PRE-DESIGN INVESTIGATION REPORT

NEW CASSEL INDUSTRIAL AREA SITE OPERABLE UNIT NO. 3

TOWN OF NORTH HEMPSTEAD
NASSAU COUNTY, NEW YORK
SITE NO. 1-30-043

WORK ASSIGNMENT NO. D004446-6

Prepared For

New York State Department of Environmental Conservation

JUNE 2009

123778

DVIRKA AND BARTILUCCI
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

2564/NewCassel/Jobs/HW(04/13/09)RLA

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Prepared for:

NEW YORK STATE DEPARTMENT OF
ENVIRONMENTAL CONSERVATION
ALBANY, NEW YORK

Prepared by:

DVIRKA AND BARTILUCCI CONSULTING ENGINEERS
WOODBURY, NEW YORK

JUNE 2009

R2-0001358

PRE-DESIGN INVESTIGATION
NEW CASSEL INDUSTRIAL AREA SITE (OU-3)
NEW CASSEL, NEW YORK

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1.0 INTRODUCTION

1.1 Project Description

The New York State Department of Environmental Conservation (NYSDEC) issued a Remedial Design (RD) Work Assignment for Operable Unit No. 3 (OU-3) associated with the New Cassel Industrial Area (NCIA) to Dvirka and Bartilucci Consulting Engineers (D&B) of Woodbury, New York, under D&B's Superfund Standby Contract with the NYSDEC. The RD for this site is being performed with funds allocated under the New York State Superfund Program, as part of New York State's program to investigate and remediate hazardous waste sites.

The NCIA is located in the Town of North Hempstead, Nassau County, New York (Figure 1-1). It encompasses approximately 170 acres of land bounded by the Long Island Railroad to the north, Frost Street to the east, Old Country Road to the south and Grand Boulevard to the southwest. The NCIA is a Class 2 New York State Superfund site, Registry No. 1-30-043. Originally, the NCIA Registry No. 1-30-043 included 17 separate Class 2 Inactive Hazardous Waste Disposal Sites. Listing of the sites occurred during the period from May 1995 to September 1999. Of the 17 original Class 2 sites, 3 have been investigated and delisted from the registry, 2 have been investigated, remediated and delisted from the registry, and another site has been investigated, remediated and reclassified as a Class 4 site. The remaining 11 Class 2 sites are associated with the individual source area sites located within the NCIA, and are described in Section 1.2.

The NYSDEC issued a Record of Decision (ROD), dated October 2003, for Operable Unit No. 3 (OU-3) – Off-Site Groundwater South of the New Cassel Industrial Area. OU-3 addresses off-site groundwater contamination that has migrated from the Class 2 sites within the NCIA. The ROD references the existence of western, central and eastern plumes as areas of off-site groundwater contamination resulting from the NCIA.

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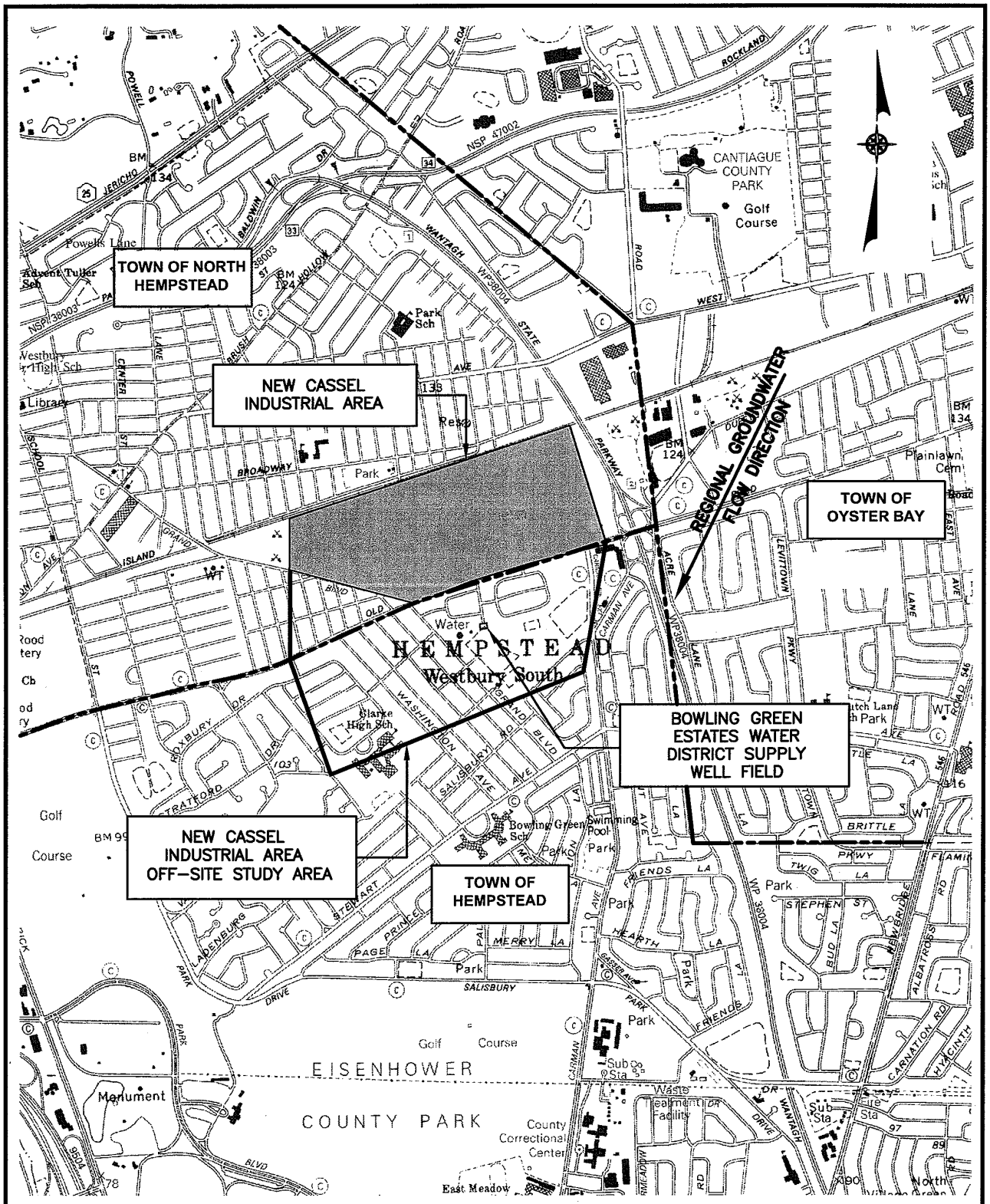

NEW CASSEL INDUSTRIAL AREA
PRE-DESIGN INVESTIGATION

SITE LOCATION MAP

0 2000
SCALE IN FEET

Dvirka and Bartilucci
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FIGURE 1-1

F:\2564-02\Rpt Figs\2564-1.dwg, FIG 1-1, 4/3/2009 10:03:22 AM, AStrauss

In general, the area where the need for off-site groundwater remediation has been identified includes the commercial and residential areas located south of Old Country Road and Grand Boulevard (see Figure 1-1). Within the NCIA off-site study area, areas south of Old Country Road are located in the Town of Hempstead, while areas north of Old Country Road but south of Grand Boulevard are located in the Town of North Hempstead.

The ROD identified in-well vapor stripping with localized vapor treatment (Alternative 8) as the intended method to remediate the off-site groundwater contamination to a depth of 225 feet below ground surface. This remedial design program is intended to verify the components of the conceptual design and provide the details necessary for the construction, operation, maintenance and monitoring of the remedial program.

The ROD anticipated a total of eleven in-well vapor stripping wells. The number of wells was to be refined based upon the results of a pilot well to be installed prior to full-scale construction of the remedial system. The ROD also anticipated that conditions (technical or economic) may not be conducive to the construction and operation of in-well vapor stripping wells. Should this situation arise, the ROD provided for the construction of extraction wells with a centralized air stripping treatment facility (pump-and-treat). Figure 1-2 was taken from the ROD and depicts a conceptual layout of the proposed 11 in-well vapor stripping wells as presented in the ROD. The NCIA topography is generally flat. Three commingled volatile organic compound (VOC) plumes are located in this area and are migrating in the direction of regional groundwater flow, which is roughly to the southwest.

1.2 Site History

The NCIA was initially developed during the early 1950s. Past light industrial activities conducted within the NCIA have resulted in extensive VOC contamination of groundwater within and in the vicinity of the NCIA. The NCIA was first recognized as an area with widespread groundwater contamination during a countywide groundwater investigation conducted by the Nassau County Department of Health (NCDH) in 1986. In 1988, the NYSDEC

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NOTE:

PROPOSED TREATMENT WELL LOCATIONS ARE APPROXIMATE AND ARE BASED ON INFORMATION PRESENTED IN THE RECORD OF DECISION

SCALE:1"=600'

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA PRE-DESIGN INVESTIGATION

Dvirka and Bartilucci CONSULTING ENGINEERS
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PROPOSED IN-WELL VAPOR STRIPPING UNITS

FIGURE 1-2

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listed NCIA as a Class 2 site in the registry of Inactive Hazardous Waste Disposal Sites in New York. In order to identify the sources of the contamination within the NCIA, and hence the responsible parties, the NYSDEC conducted Preliminary Site Assessments (PSAs) within the NCIA. Field investigations were completed during the period from 1994 to 1996. The NYSDEC also collected several soil and groundwater samples in December 1998, January 1999 and December 1999.

Based on the findings of these PSA's, a total of 17 sites were identified and listed as Class 2 Inactive Hazardous Waste Disposal Sites during the period from May 1995 to September 1999. Of the 17 Class 2 sites, three were investigated and delisted from the registry, two were investigated, remediated and delisted from the registry, and another site was investigated, remediated and reclassified as a Class 4 Inactive Hazardous Waste Disposal Site. The ROD for OU-3 includes the 11 remaining Class 2 sites as well as two Class 2 sites that were investigated, remediated and delisted from the registry, and one site that was investigated, remediated and reclassified as a Class 4 site. As a result, a total of 14 sites are included in the ROD for OU-3 and the ROD indicates these 14 sites contributed to the groundwater contamination which is the subject of OU-3. As described below, remedial activities have been conducted at several of the sites by the NYSDEC and/or potentially responsible parties (PRPs). Individual site descriptions, operational/disposal histories and remedial histories for sites at which past practices have led to inappropriate disposal of hazardous waste are provide below for the 17 active and delisted sites in the NCIA. These descriptions have been excerpted from the ROD for OU-3 dated October 2003 and have not been updated to reflect the current status of each site. Figure 1-3 depicts the location of the 11 Class 2 sites within the NCIA.

1.2.1 IMC Magnetics (Site No. 1-30-043A)

The IMC Magnetics, Inc. (IMC) site is located at 570 Main Street in the western portion of the NCIA. The site is approximately two acres in size, with one manufacturing building and a paved parking area covering most of the area. The site was occupied by IMC from the early 1950s until 1992. Products made during IMC's occupation of the site included induction motors,

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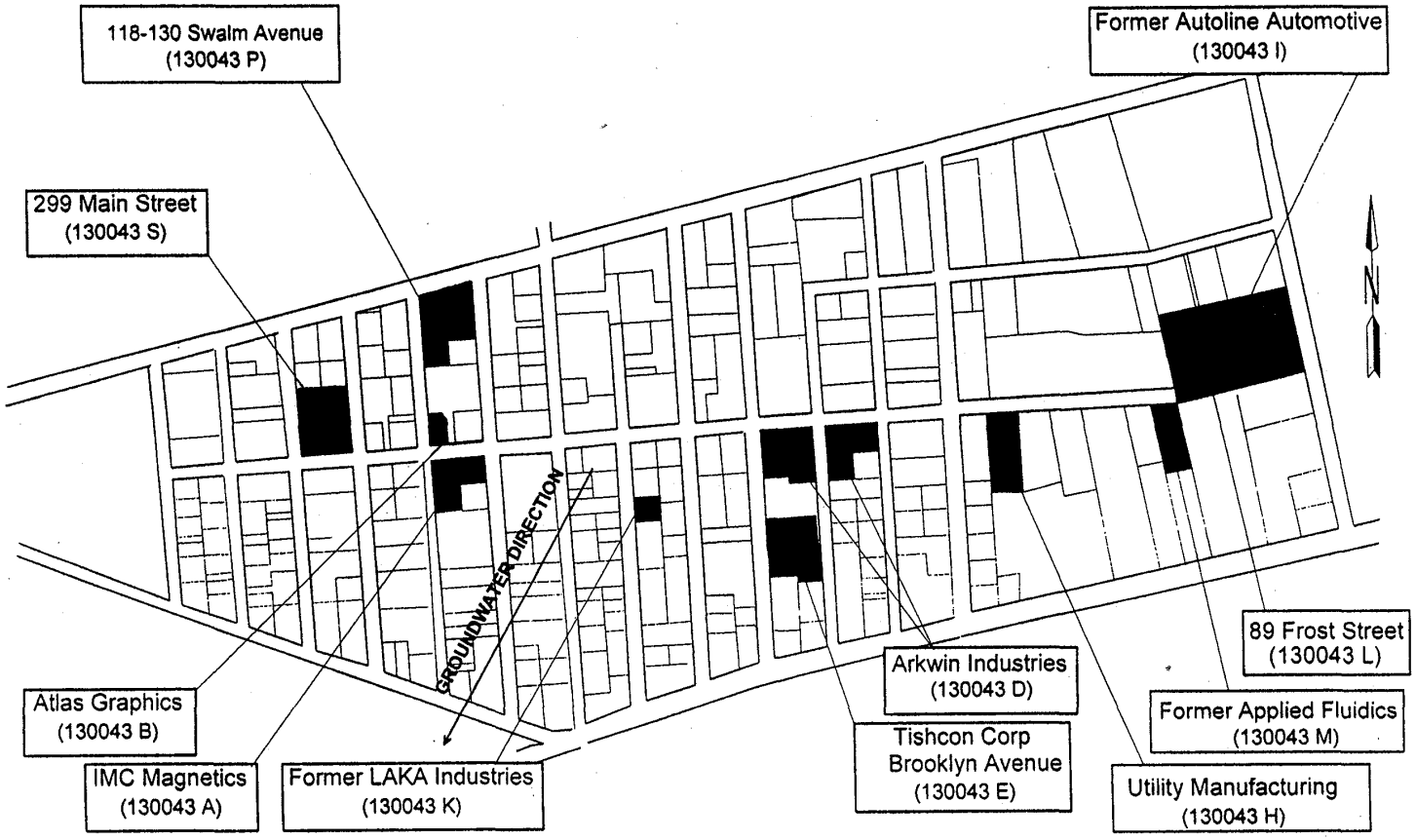

LEGEND

(130043 B) - Registry Number

0 1000 ft

APPROXIMATE SCALE IN FEET

SOURCE: NYSDEC

2564/NewCassel/Jobs/HW(05/19/09)RLA

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NEW CASSEL INDUSTRIAL AREA
PRE-DESIGN INVESTIGATION

LOCATIONS OF ELEVEN ACTIVE CLASS 2 SITES IN THE NEW CASSEL INDUSTRIAL AREA

FIGURE 1-3

fans and blowers, stepper motors and other rotating machines. Soil and groundwater at the site are contaminated with chlorinated hydrocarbons, petroleum hydrocarbons and metals. This site was listed on the Registry as a Class 2 site in 1995. Further investigations at this site revealed that the soil and groundwater were contaminated with chlorinated VOCs. IMC initiated operation of a soil vapor extraction (SVE) system in October 1997 to remediate on-site soil contamination. The Record of Decision (ROD) for OU-1, On-Site Soil Contamination, incorporating the SVE system, was issued in January of 1998. A focused on-site groundwater Remedial Investigation (RI) and Feasibility Study (FS) at this site confirmed the presence of an on-site chlorinated VOC groundwater plume. The ROD for OU-2, On-Site Groundwater, was issued by NYSDEC in March 2000. The remedy selected in the ROD for groundwater remediation at this site was in-situ oxidation using hydrogen peroxide injection. Treatment began in December 2001 and is on-going. This site is considered to be a contributor to the western groundwater plume.

1.2.2 Atlas Graphics, Inc. (Site No. 1-30-043B)

The Atlas Graphics, Inc. (Atlas) site is located at 567 Main Street in the western part of the NCIA. The site is approximately one acre, which is comprised mainly of one manufacturing building and a paved parking area. The building was constructed in 1950, and was used as a warehouse for construction vehicles until 1977. In 1977, the property was purchased by Atlas Graphics, Inc., which currently operates a photo engraving manufacturing operation at the site. This operation uses a reported 312 gallons per year of trichloroethene (TCE). The building was reportedly once connected to a cesspool for sanitary waste disposal. In 1977, there was a documented discharge of approximately 50 gallons of TCE to the cesspool.

The Atlas site was listed on the Registry as a Class 2 site in 1995. The analytical results for this site indicated that elevated levels of TCE were found on-site in both the soil and groundwater. The ROD for this site, issued in February 2000, selected air sparging/soil vapor extraction (AS/SVE) as the remedy to address the on-site contaminated soil and groundwater. The system was constructed in October 2000 and has been treating on-site groundwater since November 2000. This site is considered to be a contributor to the western groundwater plume.

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1.2.3 Tishcon Corporation (Site No. 1-30-043C)

The Tishcon Corporation (Tishcon) site is located at 125 State Street in the central part of the NCIA. The site is approximately one acre in size and is occupied by a two-story building. Tishcon was a tenant in this location from 1984 to 1996. Tishcon produced dietary supplements and vitamin products in the form of powders and tablets. The powders and tablets were produced in a dry blending process. From 1985 to 1993, the chemicals methylene chloride, 1,1,1-trichloroethane (TCA) and methanol were used in the tablet coating process. Reportedly, equipment used in the process was washed in the driveway where storm drains are located.

Based on the presence of chlorinated VOCs and metals in four storm drains at the site, the NCDH requested that contaminated sediment be removed from the storm drains and a distribution box on the property in August 1993. The site was placed on the Registry in 1995. The excavation and restoration of the contaminated source areas of two storm drains and a distribution box was completed as an Interim Remedial Measure (IRM) in October 1997. The ROD for the site was issued in January of 1998 and required the excavation and restoration of the remaining contaminated source area. Excavation and disposal of this material was conducted in spring of 1999. In March of 2000, the site was reclassified as a Class 4 site, indicating that the site was properly closed and monitoring is required. This site is considered to be a contributor to the central groundwater plume.

1.2.4 Arkwin Industries (Site No. 1-30-043D)

The Arkwin Industries (Arkwin) site is comprised of several individual lots which are located at 648, 656, 662 and 670 Main Street and 66 Brooklyn Avenue in the central part of the NCIA. The site is approximately four acres in size and is occupied by five separate buildings. Arkwin began operations at the NCIA in 1955. Arkwin receives metal stock, which is then machined, fabricated, degreased, polished, painted and assembled into finished products. Arkwin used TCA, tetrachloroethene and other solvents in their production process.

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Based on the presence of chlorinated VOCs and petroleum hydrocarbons in the soil and groundwater at the site, the Arkwin site was added to the Registry as a Class 2 site in May 1995. Contaminated soil was excavated in June 1997 as part of an IRM. A No Further Action ROD for OU-1, On-Site Soil, was issued in January 1998. A focused RI/FS for on-site groundwater (OU-2) was subsequently conducted. The RI results indicated the presence of several VOCs and associated daughter compounds at concentrations above groundwater standards in both the Upper Glacial aquifer (UGA) and the Magothy aquifer. The focused FS evaluated a number of remedial alternatives for the contaminated groundwater. Based on the FS, the NYSDEC selected AS/SVE as the remedy for the groundwater. The ROD for OU-2 was issued in December 1999. A pilot test for AS/SVE was conducted in July 2002, and continuous operation of the system began in December 2002. This site is considered to be a contributor to the central groundwater plume.

1.2.5 Tishcon Corporation Brooklyn Avenue (Site No. 1-30-043E)

The Tishcon Corporation Brooklyn Avenue (Tishcon Brooklyn Avenue) site is located at 30-36 New York Avenue and 30-33 Brooklyn Avenue in the central part of the NCIA. The site is approximately 1.5 acres in size, and is almost entirely occupied by a single structure. Tishcon has occupied this site since 1982. As part of their gelatin capsule manufacturing process, the Tishcon Corporation used TCA to remove mineral oil from the gelatin capsules. In May 1997, Tishcon phased out the use of TCA and incorporated a closed loop, petroleum-based process.

Based on information obtained from a NCIA-wide PSA, Tishcon was added to the Registry as a Class 2 site in 1995. Sampling results showed high levels of chlorinated VOCs (including TCA) in the soils and groundwater. An IRM completed in November 1997 removed contaminated soil from an out-of-service cesspool, a sealed storm drain, and an exterior floor drain. A ROD for OU-1, On-Site Soil, was issued by the NYSDEC in January 1998. This ROD required the installation of an AS/SVE system to address remaining on–site soil and groundwater contamination. Construction of the on-site AS/SVE system was completed in December 1999, and system operation began in January 2000. A focused off-site groundwater RI/FS was finalized in September 1999. The ROD for OU-2, Off-Site Groundwater, was issued in March

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2000. The selected remedy consists of installation of an AS/SVE system to remediate VOC contamination in the off-site groundwater near Old Country Road. Pilot tests for the selected remedy were conducted in July 2002, and full system installation was scheduled to begin in the fall of 2003. This site is considered to be a contributor to the central groundwater plume.

1.2.6 Former Tishcon Corporation (Site No. 1-30-043F)

The former Tishcon Corporation site is located at 68 Kinkel Street in the central part of the NCIA. The one-quarter acre site is occupied by a single story, 2-bay garage. In 1982 and 1983, Tishcon encapsulated materials at this site and utilized 1,650 gallons of TCE, 8,000 gallons of methylene chloride and 3,000 gallons of shellac in its manufacturing process. This site was added to the Registry as a Class 2 site in 1995. A State Superfund investigation was completed in July 1996. In January 1997, a ROD requiring no action was issued for this site. The site was delisted from the Registry in December 1997.

1.2.7 Metpar Steel Corporation (Site No. 1-30-043G)

The Metpar Steel Corporation (Metpar) site is located at 95, 97 and 99 State Street in the central part of the NCIA. Metpar manufactures metal toilet components. This site was listed on the Registry in 1995. The RI for the site was completed in July 1996 and a ROD was issued in January 1997, requiring no remedial action. The site was delisted from the Registry in December 1997.

1.2.8 Utility Manufacturing/Wonder King Site (Site No. 1-30-043H)

The Utility Manufacturing/Wonder King Site is located at 700 – 712 Main Street in the eastern part of the NCIA. The site is approximately one acre in size, most of which is occupied by a single building. The remainder of the site is paved. The original building on this site was constructed in 1967. The property was leased to Radalabs, which manufactured communications equipment. In 1975, Utility Manufacturing also sublet part of the building. In February 1976, Utility Manufacturing became the sole occupant. Utility Manufacturing manufactures a variety

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of cleaning and lubricating products. A NYSDEC monitoring well sampling program and a PSA confirmed that soil and groundwater were contaminated with tetrachloroethylene (PCE) and other related VOCs at concentrations above applicable standards, criteria and guidelines. Consequently, the NYSDEC listed the site as a Class 2 site in 1996. A subsequent field investigation was completed in May 1998 and included the collection of soil samples as well as the installation and sampling of monitoring wells. The NYSDEC required Utility Manufacturing to conduct an additional investigation to delineate the on-site groundwater contamination (completed December 2000) and implement an IRM (AS/SVE) to remediate on-site groundwater. The AS/SVE system was constructed and began operation in November 2001. A ROD for this site, including continued operation of the AS/SVE system and no further action, was issued in March 2003 to address on-site contamination. This site is considered to be a contributor to the eastern groundwater plume.

1.2.9 Former LAKA Industries, Inc. (Site No. 1-30-43K)

The former LAKA Industries, Inc. (LAKA) site is located at 62 Kinkel Street in the central part of the NCIA. The site is entirely paved or covered with the footprint of a one-story building with the exception of a small landscaped area on the west side of the building. The LAKA Tool and Stamping Company, Inc. occupied the site from 1971 to 1978, performing precision metal stamping operations as a defense contractor. LAKA Industries, Inc., the parent company, operated the site from 1979 to 1984 as a machine shop specializing in tools, dies and precision stamping. Both companies used TCE and lubricating oils. As the NCIA was not serviced by public sewers until the 1980s, subsurface disposal was the common means of waste disposal in the area. The site was added to the Registry as a Class 2 site in 1996. A focused RI/FS was conducted to define the nature and extent of contamination at the site.

The RI (finalized May 1999) confirmed that contamination existed in the vicinity of an on-site cesspool and that an additional source area existed in a catch basin located downgradient of the site. The NYSDEC issued a ROD for On-Site Soils in February 2000. The ROD selected excavation of the cesspool and the source area, and did not include any groundwater remediation.

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The selected remedy was implemented in May 2001. This site is considered to be a contributor to the central groundwater plume.

1.2.10 Frost Street Sites: Former Autoline Automotive (Site No. 1-30-043I), 9 Frost Street (Site No. 1-30-043L), Former Applied Fluidics (Site No. 1-30-043M)

The Frost Street sites include three adjacent sites which are located at 89 Frost Street, 101 Frost Street and 770 Main Street in the eastern part of the NCIA. The NYSDEC designated the sites as Class 2 sites in 1996.

Former Autoline Automotive (Site No. 1-30-043I)

The former Autoline Automotive site is located at 101 Frost Street in the eastern part of the NCIA. The site is approximately one acre in size, most of which is occupied by a one-story building. The remaining portion of the site is paved. Several tenants occupied the building at this site including a toy warehouse, a home laboratory supply company, a textiles manufacturer and an automobile ignition parts manufacturer. National Bassen Textiles, which occupied the property from 1974 to 1983, had documented use of degreasers and other unknown chemicals. Autoline Automotive occupied the site from 1984 to 1992, manufacturing ignitions wires and wire harness sets.

89 Frost Street (Site No. 1-30-043L)

This site is located at 89 Frost Street in the eastern part of the NCIA. This site is entirely paved. The 55,000 square foot structure, which formerly occupied the site was constructed in 1968 and rented by several facilities. Adchem Corporation, a double coated adhesive tape manufacturer, occupied the site from 1971 to 1973. Unicord, a manufacturer of music amplifiers, occupied the site from 1980 to 1987. Marvex Corporation, a processing and finishing company, occupied the site sometime during the life of the structure, although the exact time period is unknown. The last known occupant of the building was Korg Electronics from 1988 to 1994.

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Former Applied Fluidics (Site No. 1-30-043M)

The former Applied Fluidics site is located at 770 Main Street in the eastern part of the NCIA. This site is approximately one acre in size, and is currently occupied by a department store constructed in 1998. The remaining portion of the site is paved. Applied Fluidics occupied this site from 1974 to 1982. Applied Fluidics was a defense contractor that manufactured research instruments and leak detectors. The company used TCE, paint thinners and petroleum distillates. The building was demolished in 1998 and excavated to a depth of 20 feet below ground surface (bgs) as part of the redevelopment of the site. All drainage structures were removed.

In 1998, a State funded RI/FS was conducted at the Frost Street sites. The investigation determined that the VOC contaminants of concern were PCE, TCE and xylene. Based on the FS, NYSDEC issued three separate RODs in March 2000 that described the selected remedies for the contaminated soils at each of the three sites. The remedies consist of:

- SVE for deep soils with excavation and off-site disposal of surface soil for the Former Autoline site.
- SVE for deep soils for the 89 Frost Street site.
- No Action for the Former Applied Fluidics site.

The groundwater contamination was addressed as a combined operable unit since the contamination resulting from the three Frost Street sites commingle, such that the contamination from an adjacent site forms a common plume of VOC contamination. Based on the March 2000 RI/FS, the NYSDEC issued a ROD requiring the installation of an AS/SVE system to address VOC contamination in the groundwater source areas and an in-well vapor stripping system to address the deeper contamination along Old Country Road. The PRP for these sites signed a Remedial Design/Remedial Action consent order in January 2003 to implement the soil and groundwater remedies selected in the March 2000 RODs. These three sites are considered to be contributors to the eastern groundwater plume.

1.2.11 118 – 130 Swalm Street Site (Site No. 1-30-043P)

This site is located at 118–130 Swalm Street in the western part of the NCIA. The site is approximately 3 acres in size, has a one story building on the property and is bordered by the Long Island Railroad to the north. Tenants of the Swalm Street site include All Records Distributors from 1971 to 1974, Allomatic industries from 1979 to 1992, Louis Jordan Labs (a vitamin manufacturer) from 1978 to 1980 and Varitek from 1979 to 1992. The current tenant, Liqui-Mark has occupied the building since 1994. The site was listed on the Registry as a Class 2 site in 1997. Field work was completed in January 1999. RI results indicated low levels of VOC contamination in on-site cesspools and that the groundwater contamination had decreased over time. Additional investigation near the cesspool located in the southwest corner of the site and at the drains inside the building was undertaken in April of 2001. Additional groundwater sampling was carried out during September 2002.

Based on the results of the RI, a Proposed Remedial Action Plan (PRAP) addressing on-site soil and groundwater at this site is expected in the fall of 2003. This site is considered to be a contributor to the western groundwater plume.

1.2.12 299 Main Street Site (Site No. 1-30-043S)

This site is located at 299 Main Street in the western part of the NCIA. The site is approximately two acres in size and is occupied by a one-story building. The site was developed between 1950 and 1962 and is currently occupied by One Stop Auto and Truck Center. The property was formerly used as a junkyard and a transportation company (dates unknown). Island Transportation Corporation used large quantities of petroleum-related compounds including gasoline and approximately 275 gallons of TCE between July and December 1978 to clean trucks. The NYSDEC listed the 299 Main Street site on the Registry as a Class 2 site in 1997. Field work was completed in October 1999 and a draft focused RI report was submitted which indicated the soils and groundwater at the site were contaminated with chlorinated compounds, predominantly TCE. Additional investigations were undertaken in the spring of 2001 and the RI report was finalized in September 2001. Contamination was found in an on-site injection well

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and in an equipment repair bay within the building. Based on the RI results, the PRP submitted an IRM work plan which includes removal of contaminated material from the site and installation of an AS/SVE system, which began in the spring of 2003 and was scheduled to be completed in the fall of 2003. This site is considered to be a contributor to the western groundwater plume.

1.2.13 Northeast Corner of Hopper and Main Streets (Site No. 1-30-043T)

This site is located at the intersection of Hopper and Main Street in the western part of the NCIA. There are no permanent structures located on the property. The site was added to the Registry as a Class 2 site in 1997. The site was investigated from December 1998 to January 1999. No on-site contamination was found and a ROD requiring no action at this site was issued in February 2000. The site was delisted from the registry in December 2000.

1.2.14 36 Sylvester Street Site (Site No. 1-30-043U)

This site is located at 36 Sylvester Street in the central part of the NCIA. The site is approximately one half acre in size and is occupied by a one-story building. The site was initially developed in 1952 with a one-story masonry building. The building covers most of the lot, with the exception of alleys on the north and south sides of the property and a loading area on the east side. Historically, the site was used for industrial applications that included the manufacturing of precision machinery. Former occupants of the site include American Express Warehousing Corporation, Universal Transistor Products Corporation, National Machinery Exchange and National Gear Products. The property was occupied by National Gear Products from 1980 to 1996 and is currently occupied by GEL-TEC (a division of Tishcon Corporation). The results of the PSA indicated that past site operations have contaminated the groundwater beneath and downgradient of the site with TCA. The NYSDEC listed the site as a Class 2 site on the Registry in 1999. The NYSDEC negotiated a Consent Order with the PRP to conduct a RI/FS which was signed in March of 2000. An IRM to remove contaminated material from an on-site drywell was completed in May 2002. Based on the results of the IRM, a no further action

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ROD was signed in March 2003, and the site was delisted from the Registry in September 2003. This site is considered to be a contributor to the central groundwater plume.

1.2.15 Tishcon Corporation Site at 29 New York Avenue (Site No. 1-30-043V)

This site is located at 29 New York Avenue in the central part of the NCIA, is approximately one acre in size and is occupied by a single building. The site was developed in 1952 and was used to manufacture electronic equipment until the late 1970s, after which it was occupied by Tishcon from 1979 through 1991. The site was sold to Equity 1 Associates in 1991.

This site was listed on the Registry as a Class 2 site in 1995 as part of the Tishcon Corporation Brooklyn Avenue site. The 29 New York Avenue site was investigated further as part of another PSA conducted in 1996. A soil/sediment sample from an on-site catch basin contained TCA and related compounds at concentrations above cleanup guidelines. Based on these results, the NYSDEC listed the Tishcon Corporation 29 New York Avenue site as a separate Class 2 site on the Registry in March 1998. The RI report was received by NYSDEC in December 1999. An IRM was carried out in August 2000, consisting of the remediation of a cesspool at the site. Based on the results of the IRM, a no further action ROD for this site was signed in March 2002 and the site was delisted from the Registry in December 2002. This site is considered to be a contributor to the central groundwater plume.

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2.0 PRE-DESIGN INVESTIGATION ACTIVITIES

A pre-design investigation was conducted to provide information necessary to complete the remedial design for the NCIA OU-3. This investigation included groundwater quality assessment, geologic profiling, and soil testing. Access to the project area for all investigation work described below was coordinated by the NYSDEC. The Pre-Design Investigation was conducted in accordance with the NYSDEC approved Remedial Design Work Plan dated July 2007.

2.1 Scoping Session

Under this task, D&B, in coordination with the NYSDEC, held a scoping session with all affected parties to review the major elements of the proposed remedy. It should be noted that the proposed remedy will likely be installed in fully developed residential and/or commercial areas, where there is limited potential for the placement of the required treatment wells and associated appurtenances. Based on our conversations with the NYSDEC, it is our current understanding that the treatment wells associated with the final remedy will likely be confined within subsurface vaults within public streets, public property or rights-of-way. As a result, coordination with local Town and County agencies will be imperative for a successful project. The objective of the scoping session was to identify applicable regulations and associated restrictions which may be imposed on the work, as well as any permits that may be required by local regulatory agencies currently having jurisdiction over the roadways, rights-of-way and utilities that may be affected by the project.

The scoping session was held on February 8, 2008 at the offices of D&B in Woodbury, New York. Representatives of the NYSDEC, Town of North Hempstead, Nassau County Department of Public Works and D&B were present at the meeting. Provided below is a brief outline of the major results of the scoping session:

- Any subsurface vaults within public streets must be suitable for H-20 loading, flush with existing grades, and waterproof.

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- The location of public utilities (i.e., water, sanitary sewer, electric, gas, storm sewer, communications, etc.) will conflict with the installation of large subsurface vaults.

- Town of North Hempstead and Nassau County Department of Public works questioned whether alternative remedies were considered. NYSDEC reported that the alternate remedy is pump-and-treat in a central treatment plant if in-well air stripping is determined to not be feasible. Local agencies indicated that there may be land available to locate such a treatment plant.

- The feasibility of in-well air stripping within subsurface vaults in public streets was questioned by the local agencies, especially Nassau County Department of Public Works.

- The scoping session concluded with NYSDEC and D&B agreeing to move forward with the investigation, report the results to local agencies, and hold a second scoping session, if the project is to move forward, when the location of proposed treatment wells is more well defined.

2.2 Existing Monitoring Well Sampling

Existing groundwater monitoring wells MW-1 through MW-9 and Bowling Green Water District early warning wells EW-1B, EW-2B, EW-1C and EW-2C were sampled to obtain current plume delineation information and information necessary to select subsequent sample locations (see Figure 2-1). Each sample was analyzed for VOCs, ferrous iron, manganese, magnesium, calcium, total organic carbon, alkalinity, chlorides, nitrates, sulfates, carbon dioxide and methane. Field measurements of pH, temperature, oxidation-reduction potential (ORP), specific conductance, turbidity and dissolved oxygen were collected during purging and at time of sample collection.

Prior to sampling, the depth to water in each of the monitoring wells was measured to calculate the volume of standing water in the well. Water level measurements were collected using an electronic water level indicator. Water levels were not measured in the four early warning wells since dedicated pumps are installed in these wells and the casings are not accessible. Depth to water was estimated at these locations based on groundwater elevation information in the area.

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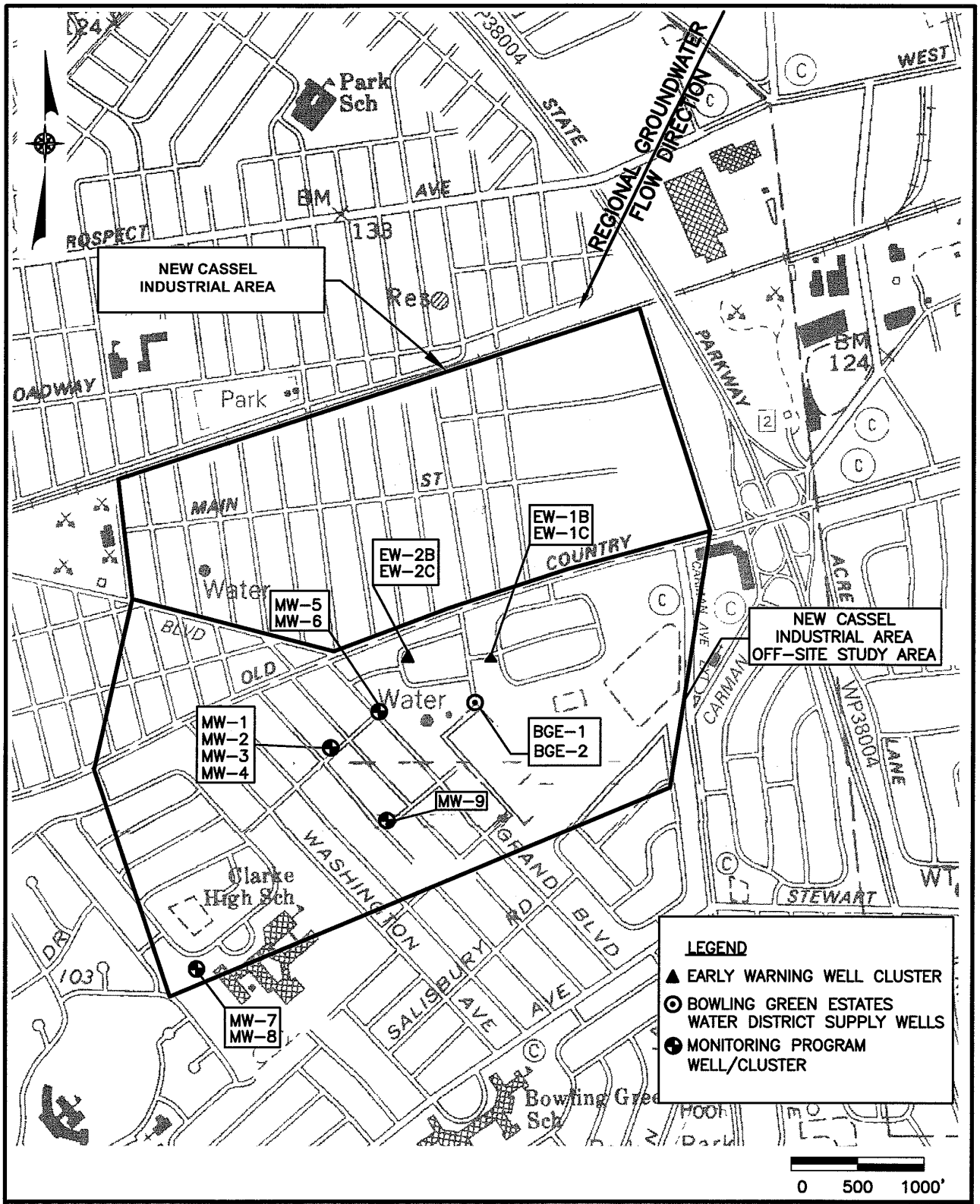

NEW CASSEL INDUSTRIAL AREA
PRE-DESIGN INVESTIGATION

Dvirka and Bartilucci CONSULTING ENGINEERS
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WELL LOCATION MAP

FIGURE 2-1

F:\2564-02\Rpt Figs\2564-2.dwg, FIG 2-1, 4/2/2009 12:29:07 PM, AStrauss

Each monitoring well and early warning well was purged to remove the standing water inside the well prior to sample collection. A minimum of three casing volumes was removed to ensure the water being sampled was representative of the aquifer. The wells were purged using submersible pumps (dedicated or decontaminated) and new dedicated discharge tubing. All purge water was discharged to the Nassau County sanitary sewer system via a nearby manhole. Correspondence with the Nassau County Department of Public Works regarding the discharge of purge water is presented in Appendix A.

During purging, pH, conductivity, temperature, turbidity, dissolved oxygen and ORP were monitored at intervals determined by the amount of water necessary for adequate purging. When the values of the field parameters stabilized to within 10 percent for at least two readings and a minimum of three casing volumes was removed, and the turbidity of the water was less than 50 Nephelometric Turbidity Units (NTUs), purging was considered complete.

Groundwater samples were collected from the dedicated discharge tubing after purging. Groundwater samples were collected at a maximum flow rate of approximately 1 gallon per minute (gpm). Samples for VOC analysis were collected first, followed by the remaining parameters. Detection limits for VOC analysis were less than or equal to 1.0 micrograms per liter (ug/L or ppb). All samples were stored in an iced cooler and shipped under Chain-of-Custody procedures to Mitkem Laboratories within 48 hours after collection.

Appropriate Quality Assurance/Quality Control (QA/QC) samples were collected. These include matrix spike samples, matrix spike duplicate samples and trip blanks.

Decontamination of the submersible pump used for purging the monitoring wells was performed in accordance with procedures described in the site-specific Quality Assurance Project Plan. Decontamination of the submersible pumps for the four early warning wells was not performed, since these pumps are dedicated to each well.

Existing monitoring well sampling results are discussed in Section 4.0 and Chain-of-Custody forms, sample information records and sample data forms are presented in Appendix B.

2.3 Temporary Well Installation and Hydropunch Sampling

In order to evaluate off-site groundwater quality, vertical profile groundwater sampling was conducted using two separate methods: temporary wells and hydropunch sampling. All drilling activities conducted in support of the pre-design investigation were conducted by Delta Well and Pump Co., Inc., of Ronkonkoma, New York. Each sampling method is described below.

Seven temporary wells were installed. At each location, 3 1/4-inch diameter hollow stem augers were advanced to approximately 285 feet below grade and the borehole was geophysically logged to provide stratigraphic information (see Section 2.5). A temporary 2-inch diameter well with 5 feet of 0.010-inch slot well screen was then placed inside the augers. The augers were removed from the borehole, allowing the formation to collapse around the well. Approximately three well casing volumes were purged from the temporary well using a submersible pump and a groundwater sample was collected from the pump discharge at the lowest sustainable flow rate. Samples for VOC analysis were collected first, followed by alkalinity, ferrous iron, manganese, magnesium, and calcium. All samples were stored in an iced cooler and shipped under Chain-of-Custody procedures to Mitkem Laboratories within 48 hours after collection. The well was then retracted at 20-foot intervals and the process repeated until the water table was reached (approximately 45 feet below grade). The submersible pump was decontaminated before its first use on-site, between samples and prior to being removed from the site. Upon completion of sampling, the temporary well was removed and any remaining open space in the borehole was backfilled with cement/bentonite grout and completed at grade with the original surface (soil, asphalt or concrete). All purge water generated from the temporary wells was discharged to the Nassau County sanitary sewer system via a nearby manhole. Correspondence with the Nassau County Department of Public Works regarding the discharge of purge water is presented in Appendix A.

Appropriate QA/QC samples were collected. These include matrix spike samples, matrix spike duplicate samples and trip blanks.

A total of 85 groundwater samples were collected from the seven temporary wells installed to approximately 285 feet below grade. Table 2-1 presents a summary of the samples collected from the seven temporary wells, including well identification number, date of sampling, sample depths, and sample analyses. For any sample with turbidity greater than 50 NTUs, dissolved metals were analyzed and the samples were filtered by the laboratory. Field measurements of pH, temperature, ORP, conductivity, turbidity and dissolved oxygen were also performed on the groundwater samples. Temporary well sampling results are discussed in Section 4.0 and Chain of Custody forms, sample information records and sample data forms are presented in Appendix B. Boring logs for the temporary wells are presented in Appendix C. Daily field activity reports for the work completed during the temporary well and hydropunch sampling are presented in Appendix D. Equipment calibration logs for equipment utilized during the field program are presented as Appendix E.

Two soil borings were constructed to a depth of 500 feet below grade. At each location, the mud-rotary drilling method with an 8-inch diameter bit was utilized. Hydropunch groundwater samples were collected at 20-foot intervals from the water table (approximately 45 feet below grade), to the terminal depth of the boring at 500 feet below grade. The hydropunch sampler was decontaminated before its first use on-site, between samples and prior to being removed from the site. After completion of the hydropunch sampling, the borehole was geophysically logged to provide stratigraphic information (see Section 2.5). In addition, split spoon sampling was conducted in each of the 500-foot deep borings (see Section 2.4). Upon completion of geophysical logging, the borehole was grouted with cement/bentonite grout and completed at grade with the original surface.

A total of 48 groundwater samples were collected from the two hydropunch borings installed to approximately 500 feet below grade. Table 2-2 presents a summary of the samples collected from the two borings, including well identification number, date of sampling, sample depths, and sample analyses. Samples for VOC analysis were collected first, followed by alkalinity, ferrous iron, manganese, magnesium, and calcium. All samples were stored in an iced

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TABLE 2-1
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
SUMMARY OF TEMPORARY WELL SAMPLING

Sample ID	Sample Depth	Date of Collection	Sample ID	Sample Depth	Date of Collection	Sample ID	Sample Depth	Date of Collection	Sample ID	Sample Depth	Date of Collection
TMW-1	72	8/29/2008	TMW-2	65	8/21/2008	TMW-4	65	8/4/2008	TMW-5	65	8/13/2008
	85	8/29/2008		85	8/21/2008		85	8/4/2008		85	8/13/2008
	115	8/29/2008		105	8/20/2008		105	8/4/2008		105	8/12/2008
	125	8/28/2008		125	8/20/2008		125	8/4/2008		125	8/12/2008
	145	8/28/2008		145	8/20/2008		145	8/1/2008		145	8/12/2008
	165	8/28/2008		165	8/19/2008		165	8/1/2008		165	8/12/2008
	185	8/28/2008		185	8/19/2008		182	8/1/2008		185	8/13/2008
	205	8/27/2008		195	8/19/2008		205	8/1/2008		205	8/11/2008
	225	8/27/2008		210	8/19/2008		225	8/1/2008		225	8/11/2008
	245	8/27/2008		225	8/18/2008		245	7/31/2008		245	8/11/2008
	265	8/26/2008		245	8/18/2008		265	7/31/2008		265	8/8/2008
	285	8/26/2008		265	8/18/2008		285	7/31/2008		285	8/8/2008
				285	8/18/2008						

Sample ID	Sample Depth	Date of Collection	Sample ID	Sample Depth	Date of Collection	Sample ID	Sample Depth	Date of Collection
TMW-6	63	6/25/2008	TMW-7	65	7/7/2008	TMW-9	60	7/21/2008
	83	6/24/2008		85	7/7/2008		80	7/21/2008
	103	6/24/2008		105	7/7/2008		100	7/21/2008
	123	6/24/2008		125	7/7/2008		120	7/21/2008
	143	6/24/2008		145	7/7/2008		140	7/18/2008
	163	6/24/2008		165	7/2/2008		160	7/18/2008
	183	6/23/2008		185	7/2/2008		180	7/18/2008
	203	6/23/2008		205	7/2/2008		200	7/17/2008
	223	6/23/2008		225	7/1/2008		220	7/17/2008
	243	6/23/2008		245	7/1/2008		240	7/17/2008
	263	6/20/2008		265	7/1/2008		260	7/16/2008
	283	6/20/2008		285	6/30/2008		280	7/16/2008

Notes:
1) All samples analyzed for TCL VOCs, Total Alkalinity, Ferrous Iron, Calcium, Magnesium and Manganese.
2) Sample TMW-2 (265' bgs) was not analyzed for Total Alkalinity due to insufficient sample volume.
3) Sample depth reported as feet below ground surface.

TABLE 2-2
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
SUMMARY OF HYDROPUNCH SAMPLING

Sample ID	Sample Depth	Date of Collection	Comments	Sample ID	Sample Depth	Date of Collection	Comments
TMW-3D	52	10/1/2008	None	TMW-8D	52	10/29/2008	None
	72	10/1/2008	Ca, Mg, Mn not analyzed, insufficient sample volume.		82	10/30/2008	Resampled, at 72' & 77' bgs contained drill fluid
	92	10/2/2008	None		92	10/30/2008	None
	112	10/2/2008	None		112	10/31/2008	None
	132	10/3/2008	None		132	10/31/2008	None
	152	10/3/2008	None		152	11/3/2008	None
	172	10/3/2008	None		177	11/3/2008	Resampled, at 172' bgs hydropunch didn't open.
	192	10/6/2008	None		192	11/4/2008	None
	212	10/6/2008	None		212	11/4/2008	None
	232	10/6/2008	None		237	11/6/2008	Resampled, at 232' bgs contained drill fluid.
	252	10/7/2008	None		272	11/7/2008	None
	272	10/7/2008	None		292	11/10/2008	None
	297	10/8/2008	No recovery at a depth of 292' bgs.		312	11/10/2008	None
	312	10/8/2008	None		337	11/10/2008	Resampled, at 332' bgs contained drill fluid.
	337	10/8/2008	None		357	11/11/2008	Resampled, at 352' bgs contained drill fluid.
	357	10/9/2008	Resampled, at 352' bgs check valve separated.		372	11/11/2008	None
	377	10/9/2008	Resampled, at 372' bgs check valve broke.		392	11/11/2008	None
	392	10/10/2008	None		437	11/13/2008	No recovery at 412' ,417', 422' & 432' bgs, clay.
	412	10/10/2008	None		457	11/13/2008	Resampled, at 452' bgs hydropunch did not open
	432	10/10/2008	None		472	11/13/2008	None
	457	10/11/2008	None		497	11/14/2008	Resampled, at 492' bgs hydropunch did not open.
	472	10/11/2008	None		502	11/14/2008	None
	492	10/11/2008	None				
	502	10/11/2008	None				

Notes:
1) All samples analyzed for TCL VOCs, Total Alkalinity, Ferrous Iron, Calcium, Magnesium and Manganese unless otherwise noted.
2) Sample depth reported as feet below ground surface.

cooler and shipped under Chain-of-Custody procedures to Mitkem Laboratories within 48 hours after collection. Hydropunch sampling results are discussed in Section 4.0 and Chain-of-Custody forms and sample information records are presented in Appendix B. Daily field activity reports for the work completed during the temporary well and hydropunch sampling are presented in Appendix D. Equipment calibration logs for equipment utilized during the field program are presented as Appendix E.

Appropriate QA/QC samples were collected. These include matrix spike samples, matrix spike duplicate samples and trip blanks.

Drilling equipment (augers, drill rods, bits and tools) was decontaminated before its first use on-site, between uses and prior to being removed from the site. A portable decontamination pad was constructed at the Bowling Green Water District well field. Decontamination fluids and purge water were collected and discharged into the Nassau County sanitary sewer system. Drill cuttings generated during the field program were contained in lined roll-off containers and transported off-site for disposal as non-hazardous waste in accordance with all applicable federal, state and local laws and regulations. Drilling fluids generated from the mud rotary drilling were contained in 55-gallon drums and a tanker truck. The 55-gallon drums were transported to the staging area and the contents transferred into the lined roll-off container. The tanker truck contents were discharged into two portable pits located at the staging area. The portable pits were allotted time for the liquids to decant and a vacuum truck was then utilized to remove the liquids for proper off-site disposal. The remaining sediment was transferred to a lined roll-off container for disposal. Since the drilling fluid contained in the lined roll-offs was still quite liquid in nature, the roll-offs could not be picked up for disposal. As a result, a vacuum truck was utilized to vacuum the drilling fluid from the roll-offs for proper off-site disposal in lieu of transporting the roll-offs off-site full with material. Records of waste disposal are presented in Appendix F.

2.4 Geological Sampling

The vertical and horizontal hydraulic conductivities represent two of the key aquifer characteristics necessary for the design of groundwater recirculation wells. In addition, particle size analyses can be utilized to determine relative conductivities and the nature of the aquifer geology. As a result, an attempt was made during the pre-design investigation to measure these parameters.

Two soil borings were constructed to a depth of 500 feet below grade using the mud rotary drilling method which allows the collection of soil samples as the boring is being advanced. All samples collected were collected utilizing split spoons and were analyzed for particle size using American Society for Testing and Materials (ASTM) Method D422 and select samples were analyzed for vertical hydraulic conductivity using ASTM Method D5084 or D2434 (due to the presence of gravel).

Six subsurface soil samples were collected from TMW-3D (77-79 ft bgs, 117-119 ft bgs, 157-159 ft bgs, 217-219 ft bgs, 257-259 ft bgs, 282-284 ft bgs). As previously stated, all of these samples were analyzed for particle size using ASTM Method D422, while the samples collected from 77-79 ft bgs, 117-119 ft bgs, 157-159 ft bgs and 282-284 ft bgs were also analyzed for vertical hydraulic conductivity using ASTM Method D5084. Five soil samples were collected from TMW-8D (57-59 ft bgs, 82-84 ft bgs, 182-184 ft bgs, 222-224 ft bgs, 262-264 ft bgs). As previously stated, all of these samples were analyzed for particle size using ASTM Method D422, while the sample collected from 82-84 ft bgs was analyzed for vertical hydraulic conductivity using ASTM Method D2434 and the samples collected from 182-184 ft bgs, 222-224 ft bgs and 262-264 ft bgs were analyzed for vertical hydraulic conductivity using ASTM Method D5084.

Attempts to collect undisturbed soil samples were made using Shelby Tube Soil Samplers. Due to the presence of sand and gravel in the formation, these attempts to collect an undisturbed sample were not successful. As a result, all soil samples were collected using a split-spoon sampler and then carefully transferred to a dedicated Shelby tube for shipment to

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Mitkem Laboratories. Each Shelby tube label included the well identification number, date of sampling, sample depths, and sample analyses.

2.5 Geophysical Logging

To characterize the lithology of the site area, geophysical logging was conducted in all seven boreholes constructed for the temporary wells and the two boreholes constructed for hydropunch sampling. For the temporary well installation, the geophysical logging was conducted through the temporary well after installation was complete. For the two 500-foot borings used for the hydropunch sampling, geophysical logging was conducted inside the borehole filled with drilling fluids. Geophysical logging was performed by taking measurements of naturally occurring gamma radiation emitted by the stratified soil encountered in the borehole. All gamma logging was performed by Delta Well and Pump Co., Inc., of Ronkonkoma, New York, using a Mount Sopris Instrument Company Model MGXII geophysical logger with a Model 2PGA-1000 Natural Gamma probe. Geophysical logging results are discussed in Section 3.0.

2.6 Ambient Air Monitoring

Air monitoring for organic vapors and particulates was conducted on a continual basis during all ground intrusive activities. Periodic monitoring for organic vapors was conducted during all non-intrusive activities such as the collection of groundwater samples. It should be noted that particulates were not monitored during mud rotary drilling due to the limited potential for the generation of particulates during this drilling method. Air monitoring was conducted in accordance with the Health and Safety Plan (HASP) prepared for this project dated October 2007. Air monitoring was conducted using a PE PhotoVac2020 photoionization detector (PID) and a MIE PDR1000AN dust meter. Air monitoring equipment was calibrated at the beginning of each working day. In addition, at no time during the investigation were the perimeter action levels of 5 parts-per-million (ppm) for the PID or 1 milligrams per cubic meter (mg/m^3) for the dust meter exceeded. Air monitoring data is presented in Appendix G.

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2.7 Site Survey

A survey of the project site and surrounding area was prepared utilizing Geographic Information System (GIS) mapping, obtained from the Nassau County Department of Public Works (NCDPW), to establish a base map for use during the design of the site-specific remedy. Approximated dimensions and locations, as applicable, of the following features were included on the base map:

- Buildings;
- Traffic Signals;
- Contour Lines;
- Integrated Planimetric Features;
- Road Centerlines;
- Public Water Supply Wells;
- Recharge Basins;
- Water Supplier District Boundaries;
- Drainage Areas;
- Sanitary Sewer System;
- Railroad;
- Lots;
- Parcels;
- Lot Lines; and
- Zip Code Boundaries.

Additionally, ground surface elevations and horizontal coordinates of each temporary well location will be obtained by a certified land surveyor licensed to practice in the State of New York. The basis for this information will be in accordance with the New York State Plane

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Coordinate System (North American Datum [NAD] 1983) for horizontal coordinates, and the National Geodetic Vertical Datum (NGVD) 1929 for vertical coordinates. The coordinates will be provided to the NYSDEC under separate cover.

2.8 Health and Safety Program

A site-specific HASP was prepared in accordance with the requirements of the Occupational Safety and Health Administration (OSHA) for the work conducted for this investigation. The HASP was prepared to provide site-specific health and safety information, and provide for worker and community protection. The Health and Safety Plan was submitted under separate cover to the NYSDEC dated October 2007. Activities conducted as part of the field investigation were conducted in accordance with the HASP.

2.9 Quality Assurance/Quality Control

Soil and groundwater analytical work was performed by Mitkem Laboratories, Inc., which is certified under the New York State Department of Health (NYSDOH) Environmental Laboratory Approval Program (ELAP) in all categories of Contract Laboratory Protocol (CLP) and Solid and Hazardous Waste analytical testing. A Data Usability Summary Report (DUSR) was prepared and is included in Section 4.0. Category B deliverables were provided by the laboratories and have been retained in the project files. The deliverables are available for full validation by a qualified independent third party, if required.

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3.0 PHYSICAL CHARACTERISTICS OF STUDY AREA

The geology and hydrogeology of the New Cassel Industrial Area were extensively investigated in order to characterize pertinent aquifer characteristics for the preparation of performance based bid documents for the construction of in-well air stripping units. Several techniques were used during the investigation and are as follows; observation of soil characteristics during drilling, installation of temporary monitoring wells, groundwater sampling, split spoon soil sampling, geophysical logging and geological sampling.

3.1 Regional Soil Classification

Based on the review of the Soil Survey of Nassau County, New York (1987), area soils are classified as predominantly Urban Land-Hempstead. Urban Land-Hempstead is described as: dominantly urban land and nearly level, well drained, medium textured soils on plains. Site soils are Urban Land-Hempstead complex, Urban Land-Mineola complex and Urban Land-Riverhead complex. Urban Land-Hempstead complex consists of urbanized areas and very deep, well-drained soils. It is on nearly level plains. Urban Land-Mineola complex consists of urbanized areas and very deep, moderately well drained soils. It is in low, nearly level areas along intermittent or shallow drainage ways. Urban Land-Riverhead complex consists of urbanized areas and very deep, well-drained Riverhead soils.

3.2 Regional Geology

Figure 3-1 presents a geologic cross section through Central Nassau County. Regional geology consists of a relatively thick sequence of unconsolidated Pleistocene and Cretaceous aged sediments underlain by Precambrian-aged bedrock. Pleistocene-aged glacial outwash plain sediments consisting of highly permeable sands and gravels, which are approximately 60 to 80 feet thick, and comprise the unconfined Upper Glacial aquifer, directly underlie the New Cassel Industrial Area. Underlying the Upper Glacial aquifer are Cretaceous aged sediments consisting of alternating layers of sand, silt, and clays comprising the Magothy aquifer. The Magothy

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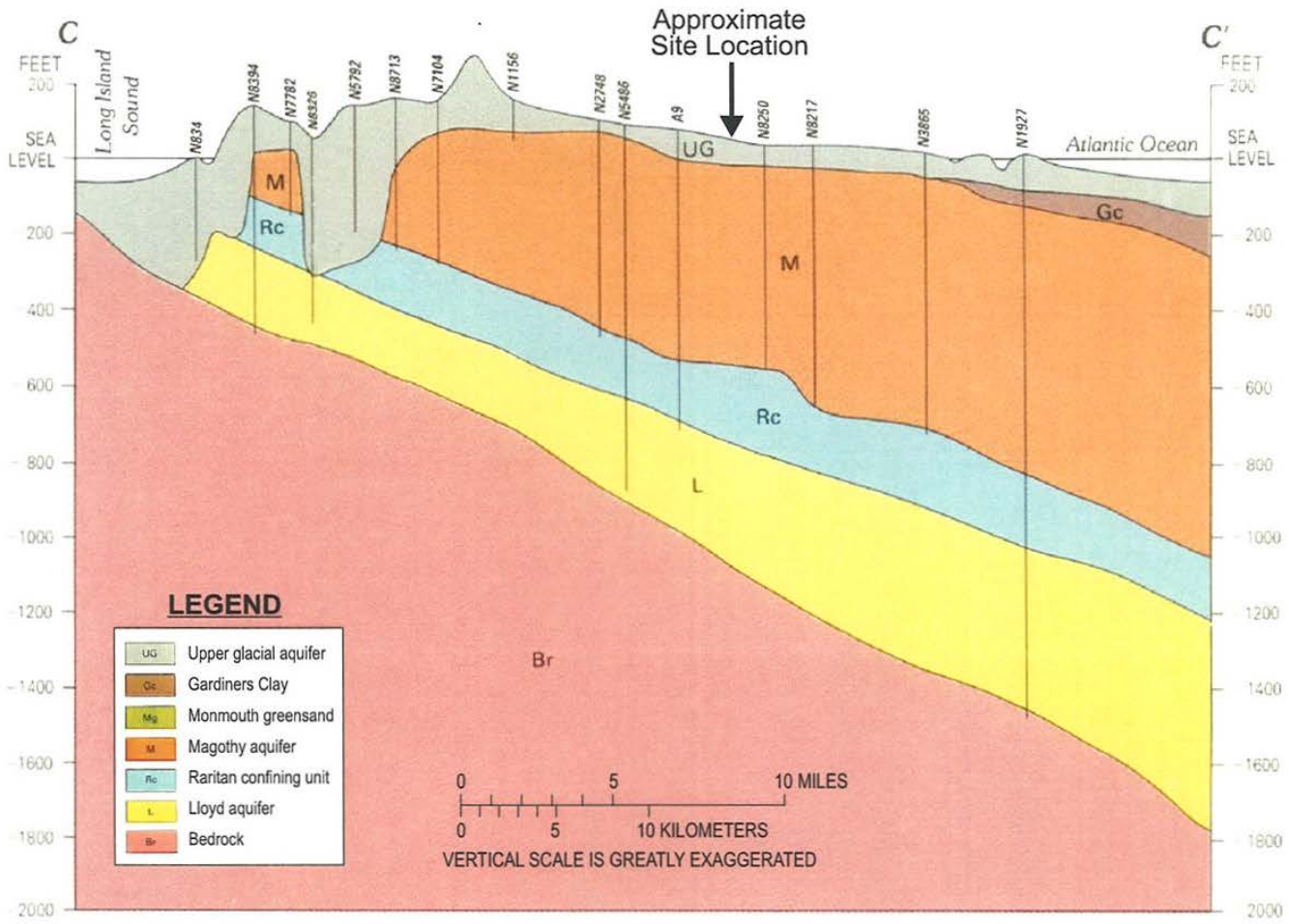

SOURCE: USGS, HA-709

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NEW CASSEL INDUSTRIAL AREA

REGIONAL GEOLOGICAL CROSS SECTION OF CENTRAL NASSAU COUNTY

FIGURE 3-1

aquifer, which is under semiconfined conditions, is approximately 600 feet thick within the area and is utilized as a public source of drinking water within Nassau County. Underlying the Magothy aquifer are additional Cretaceous aged units including, in descending order, the Raritan Clay confining unit and the Lloyd aquifer. Consolidated bedrock is approximately 1,000 feet below grade. Regional groundwater flow within the Upper Glacial and the Magothy aquifers is generally to the southwest.

3.3 Regional Hydrogeology

The saturated sands and gravels of the Lloyd, Magothy and the Upper Glacial deposits form Long Island's three major aquifers. Together, these constitute Long Island's Sole Source Aquifer System, as designated by the United States Environmental Protection Agency (USEPA) pursuant to Section 1424(e) of the Safe Drinking Water Act.

Precipitation serves as the system's only source of fresh water recharge. Recharge for the Magothy aquifer within Nassau County occurs through the Upper Glacial aquifer. A groundwater divide exists through Nassau County, with groundwater north of the divide flowing northward (into Long Island Sound and its associated bays and harbors) and groundwater south of the divide flowing southward toward various local bays and inlets and then into the Atlantic Ocean (USGS Water Supply Paper 1631-A).

In the New Cassel Industrial Area, the depth of the water table is between 55 and 65 feet bgs and groundwater flows in a south-southwesterly direction. The top of the Magothy aquifer is reported to be found at 60 to 80 feet below ground surface in the area of the NCIA. This depth is more shallow than is typical for other areas of Long Island.

Hydraulic conductivities within the Upper Glacial aquifer are relatively high, averaging about 250 ft/day for horizontal and vertical flow (McClymonds and Franke, 1972). Hydraulic conductivities in the Magothy aquifer are approximately 50 to 60 ft/day (McClymonds and Franke, 1972). However, due to the presence of numerous clay-rich zones within the Magothy

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formation, the Magothy aquifer is highly anisotropic with vertical hydraulic conductivities being approximately 0.01 (1%) of horizontal values (McClymonds and Franke, 1972).

During the RI/FS for OU-3, which was completed by others, slug tests were completed on four wells screened from 60 – 70 feet bgs to determine horizontal hydraulic conductivity values. As previously indicated, the top of the Magothy aquifer is reported to be found at 60 to 80 feet bgs in the area of the NCIA. As a result, these wells were either screened at the bottom of the Upper Glacial or top of the Magothy aquifer, or could have theoretically straddled the interface between the two aquifers. Results of the slug tests yielded horizontal hydraulic conductivities ranging from 41.79 ft/day to 290.6 ft/day. These results appear to validate the literature values for horizontal hydraulic conductivity previously reported, with the lower values consistent with literature values for the Magothy and the higher values consistent with literature values for the Upper Glacial.

3.4 Geophysical Logging and Geological Sampling

The main objective of the geophysical logging and geologic sampling was to evaluate the suitability of local geology and hydrogeology for remediation of site contaminants using in-well air stripping. The effectiveness of in-well air stripping technology depends upon the ability to generate a groundwater circulation zone within the aquifer to be remediated. One of the main hydrogeologic characteristics which influences the ability to create the groundwater circulation cells is the anisotropy of the subject aquifer. Anisotropy is defined as the ratio of the horizontal hydraulic conductivity to the vertical hydraulic conductivity. The relationship between the horizontal hydraulic conductivity and the vertical hydraulic conductivity is indicative of the likelihood that a discrete unit of groundwater will be subjected to treatment afforded by the in-well arrangement more than once. When a discrete unit of groundwater can be recaptured by the circulation cell after it is initially captured and re-injected into the aquifer, and therefore retreated, the net treatment efficiency is cumulative. The anisotropy of the aquifer influences whether the circulation cell can be established and whether the discrete unit of groundwater has progressed too far downgradient before it can be recaptured by the intake screen. In addition, the

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presence of low permeability zones such as layers of silt/clay inhibits the generation of groundwater circulation.

Geophysical logging using natural gamma logging techniques was conducted in all seven boreholes constructed for the temporary wells and the two boreholes constructed for hydropunch sampling. For the temporary wells, the geophysical logging was conducted through the temporary well casing. For the two 500-foot borings used for the hydropunch sampling, geophysical logging was conducted inside the borehole filled with drilling fluids. Each borehole was geophysically logged on the way down the borehole and again on the way back up. Copies of all gamma logs generated during geophysical logging are provided as Appendix H.

Certain elements in geologic materials emit gamma radiation as a result of spontaneous radioactive decay, becoming more stable elements in the process. This process is called natural transmutation. Clay and shale generally contain high concentrations of radioactive isotopes, such as potassium, while sand and gravel are comprised mainly of silica, which is stable, and emits only low levels of radiation. As a result, a record of the gamma radiation in a borehole can be used as a qualitative guide for determining a stratigraphic correlation and by extension, permeability. The location of low permeability clay layers are depicted on gamma logs as "peaks" where the gamma probe detects higher levels of radiation emitted by the clay. Gamma logs measure the amount of radiation emitted in counts per second (cps) as the probe passes through the borehole at a pre-determined speed. As a result, readings collected by the probe are dependent upon the sensitivity of the probe and the speed at which the probe passes through the geologic media. Each well or borehole was logged twice, once going down the well or borehole and the second time coming back up. A gamma log taken independently, with no corresponding soil sampling, only allows the reader to determine relative stratigraphy. Peaks which are present on the gamma log indicate that those zones are comprised of fine grained clay soils and are, therefore, less permeable than adjacent zones comprised of sand and gravel. However, determination of numerical values is not readily defined.

In order to more definitively quantify low permeability zones, soil samples can be collected and analyzed for parameters such as particle size and hydraulic conductivity. The

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analytical results can be compared to the gamma log readings and, in some cases, correlated to allow prediction of relative permeability using only the gamma log readings.

D&B collected a total of 11 geological soil samples from the two 500-foot borings used for the hydropunch sampling. As previously discussed, attempts to collect undisturbed soil samples were made using Shelby tube soil samplers. However, due to the presence of sand and gravel in the formation, attempts at collecting undisturbed soil samples were not successful. As a result, all soil samples were collected using a split-spoon sampler.

Sample depths were selected to characterize select low permeability zones, generally consisting of fine silts and clays, as well as to characterize the more permeable water producing zones between these layers.

All of the soil samples were analyzed for particle size distribution using ASTM D422. In addition, select samples were also analyzed for vertical hydraulic conductivity utilizing ASTM Method D5084. It should be noted that due to the presence of a high percentage of gravel, one of the samples (TMW-8D, 82'-84' bgs) selected for hydraulic conductivity analyses had to be analyzed using ASTM Method D2434 in lieu of ASTM D5084. It should also be noted that using a split-spoon sampler is considered to disturb the soil sample during sample collection. This disturbance does not affect the particle size distribution but could have an effect on hydraulic conductivity analyses. However, since the Shelby tube samplers were not effective at collecting an undisturbed sample, the use of the split spoon sampler was the only viable method available to retrieve a sample for vertical hydraulic conductivity analyses. The data obtained, in conjunction with the geophysical logging data, is suitable to determine whether significant low permeability zones exist in the proposed area of treatment which could hinder or compromise the use of in-well air stripping technology.

Laboratory results from the geotechnical sampling are presented as Appendix I.

Three soil samples were collected at depths less than 80 feet bgs and, based upon the particle size analysis, were considered to be within the Upper Glacial aquifer. Two of these

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samples were collected from TMW-8D and one was collected from TMW-3D. These samples all exhibited significant percentages of gravel, and the majority of the soil consisted of sand and gravel. The sample collected from TMW-8D at 82-84 feet bgs was also analyzed for vertical hydraulic conductivity, and a result of 6.1×10^{-2} centimeters per second (cm/sec) (173 ft./day) was obtained. This is relatively consistent with literature data for the Upper Glacial aquifer discussed above, which reports relatively high horizontal and vertical hydraulic conductivities on the order of 250 ft./day in the Upper Glacial.

Based upon the sample results, the remaining eight soil samples were considered to have been collected from the Magothy aquifer. These samples generally consisted of sand with higher percentages of silts/clays and lower percentages of gravel. The average percentages from the eight samples collected from the Magothy were 1.5% gravel, 67.1% sand and 31.4% silt/clay. This indicates a much higher relative percentage of silts/clays than the Upper Glacial aquifer, which corresponds with the literature data for the Magothy aquifer discussed above. Two of the samples were found to contain significant levels of silts/clays, suggesting interbedded, lower permeability lenses. TMW-3D (117 to 119 feet bgs) contained 48.5% silts/clay while TMW-8D (262 to 264 feet bgs) contained 98.4% silts/clays.

Neglecting the two samples containing high percentages of silts/clays, the average vertical hydraulic conductivity of the other samples collected from the Magothy aquifer was 3.3×10^{-5} cm/sec (0.1 ft./day). This value is relatively consistent with literature data for the Magothy aquifer discussed above, which suggests the Magothy aquifer is highly anisotropic and reports a vertical hydraulic conductivity of approximately 0.5 - 0.6 ft./day. In comparison, the two samples collected from areas of high silts/clays exhibited much lower vertical hydraulic conductivities of 5.7×10^{-7} cm/sec (0.002 ft./day) and 9.0×10^{-8} cm/sec (0.0003 ft./day).

Table 3-1 presents a summary of the vertical and horizontal hydraulic conductivities for the area downgradient of the NCIA. The horizontal hydraulic conductivity reported on Table 3-1 for each aquifer is based upon the literature values previously discussed, while the reported vertical hydraulic conductivities are based upon the soil sampling conducted by D&B and outlined above. In addition, the table presents the calculated anisotropy (ratio of horizontal to

TABLE 3-1
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NEW CASSEL INDUSTRIAL AREA

Summary of Horizontal and Vertical Hydraulic Conductivities

Temporary Well I.D.	Aquifer	Sample Depth	Kv (ft/day)	Kh[(1)] (ft/day)	Calculated Anisotropy	% Gravel	% Sand	% Silts/Clays	Gamma Log Reading (cps)
TMW-3D	Upper Glacial	77 - 79	0.026	250	9,589	28.6	53.1	18.3	15
TMW-3D	Magothy	117 - 119	0.00162	55	34,049	0	51.5	48.5	32
TMW-3D	Magothy	157 - 159	0.034	55	1,617	0	76.3	23.7	29
TMW-3D	Magothy	217 - 219	--	--	--	0	86.9	13.1	16
TMW-3D	Magothy	257 - 259	--	--	--	0	88.7	11.3	16
TMW-3D	Magothy	282 - 284	0.015	55	3,594	0	81.1	18.9	12
TMW-8D	Upper Glacial	57 - 59	--	--	--	49	46.5	4.5	9
TMW-8D	Upper Glacial	82 - 84	173	250	1.4	63.8	34	2.2	9
TMW-8D	Magothy	182 - 184	0.062	55	882	12.2	68.8	19	33
TMW-8D	Magothy	222 - 224	0.266	55	206	0	81.6	18.4	14
TMW-8D	Magothy	262 - 264	0.00026	55	215,642	0	1.6	98.4	67

Notes:
1) Horizontal hydraulic conductivities based upon literature data.

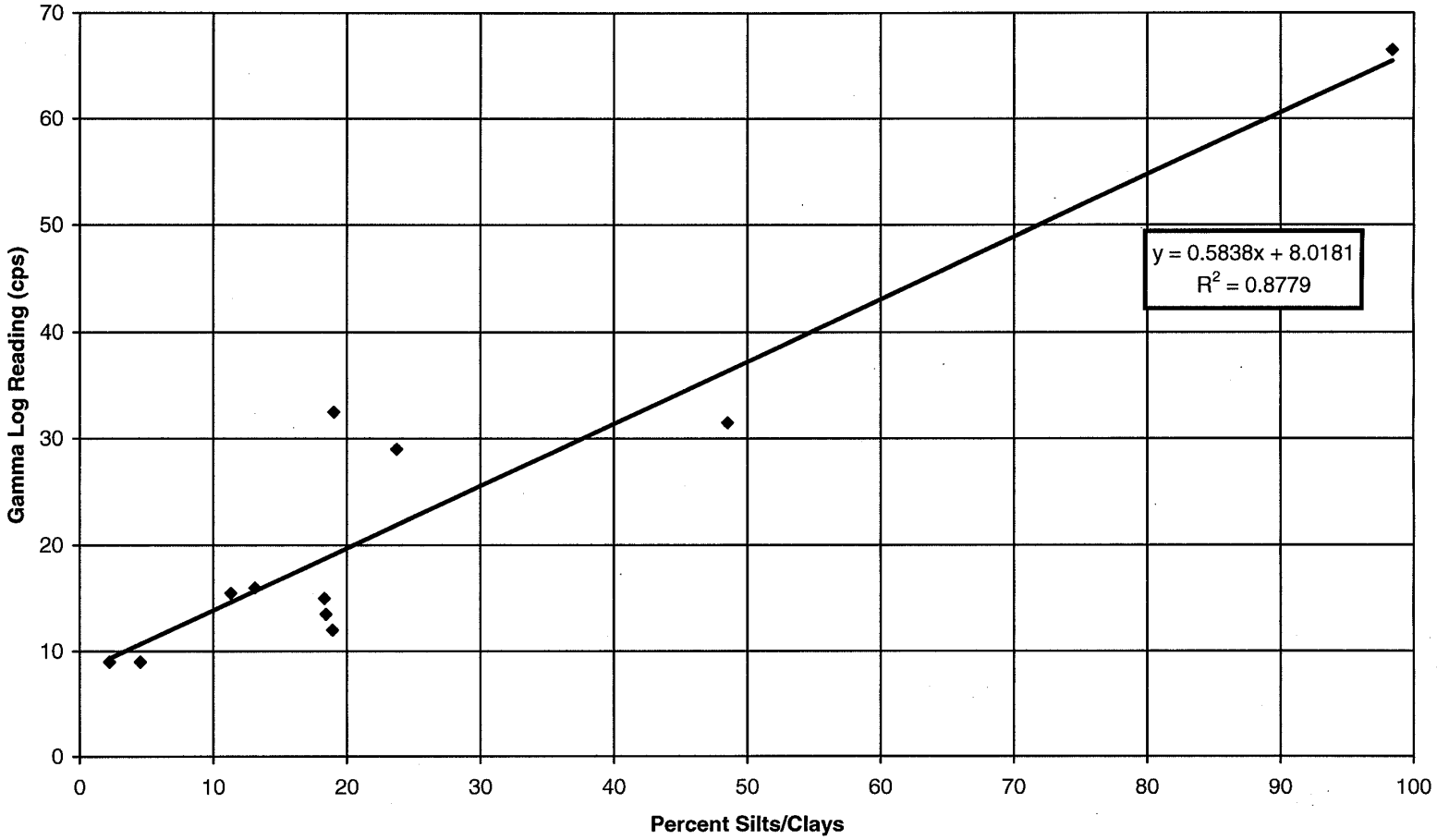
vertical hydraulic conductivity, or K_h/K_v). The data shown on Table 3-1 indicates that while the Upper Glacial aquifer is fairly isotropic, the Magothy aquifer is highly anisotropic. This is consistent with the literature values previously presented, although the degree of anisotropy exhibited by the soil samples collected during D&B's investigation is much higher than that presented in the literature. While the literature reports an anisotropy of 100 for the Magothy, D&B's sampling yielded a calculated anisotropy for the Magothy ranging from 206-215,642, with the higher anisotropies exhibited by the samples containing high concentrations of silt/clay.

Table 3-1 also presents the results of the particle size analysis and the gamma log readings at the corresponding sample interval. The gamma log readings at each sample interval were developed by taking the average of the gamma log readings taken while the probe was being lowered into the borehole with the gamma log readings taken while the probe was being subsequently raised out of the borehole. The main objective of the geophysical logging was to identify low permeability zones, which could adversely impact the development of recirculation patterns within the influence of the in-well air stripping wells.

The gamma log readings and graphs are indicative of the relative stratigraphy encountered by the borehole versus depth. The graphs allow for delineation between zones of coarse grained materials, such as sand and gravel, verses zones of fine grained materials, such as silts and clays. The gamma logs do not offer a direct reading of soil permeability, but allow for a correlation to be established between coarse grained soils which are inherently more permeable than fine grained soils, which are inherently less permeable. This correlation is supplemented by the incorporation of laboratory permeability data from the collected soil samples.

D&B correlated the gamma log readings to the percentage of silt/clay measured in each sample. This comparison is presented in Figure 3-2 and suggests a somewhat linear correlation with the percentage of silt/clay increasing in agreement with increasing gamma log readings. The presence of high concentrations of silts/clays is considered indicative of a low permeability zone. In reviewing the vertical hydraulic conductivity analytical results, one can see that the two least permeable samples were collected from sample intervals containing 48.5% and 98.1%

Figure 3-2
Correlation of Gamma Log Readings to % Silt/Clay



silts/clays. These two samples exhibited vertical hydraulic conductivities more than two orders of magnitude less than the literature values previously presented and previously discussed for the Magothy aquifer.

This correlation was utilized to interpret the gamma logs for all nine boreholes. Based upon D&B's review of the above outlined data, soil containing greater than 50% silts/clays may exhibit a vertical hydraulic conductivity more than two orders of magnitude less than the regional aquifer, and thus is indicative of a low permeability zone which could potentially inhibit groundwater circulation under an in-well air stripping scenario. It is important to note that the number of counts per second registered by the device is subject to several variables which renders the results more qualitative than quantitative. In the case of this investigation, the two deep borings were drilled using mud rotary methods. Consequently, the gamma log readings were taken in an uncased borehole in the presence of the drilling fluid. Conversely, the seven boreholes drilled to 285 feet were drilled using hollow stem auger (no drilling fluid) and the gamma log readings were taken through a temporary steel casing which was not grouted in place. The actual borehole diameters realized by each drilling method are normally different due to the drilling methods as well as the occurrence of borehole caving or sloughing at the face of the borehole. The net result of the physical conditions is that interpretation from one borehole to the next should focus on the relative changes in lithology rather than a finite number of counts per second. Using the developed correlation shown on Figure 3-2, 50% silts/clays corresponds to a gamma log reading of approximately 37 cps. As a result, in interpreting the gamma log readings, values on the order or greater than 40 cps were considered to represent low permeability zones.

Figure 3-3 depicts the location of each borehole as well as those zones identified by D&B as potential low permeability zones. The results of the geological sampling are also presented on Figure 3-3 alongside the geophysical logging results for comparison purposes. As discussed later in the report, based upon information provided by in-well air stripping vendors, low permeability zones (i.e., clay layers) 5 feet thick or more could significantly impact the ability to generate groundwater circulation. As a result, this criteria was utilized in identifying the location of potentially significant low permeability zones.

NOTE:

PROPOSED TREATMENT WELL LOCATIONS ARE APPROXIMATE AND ARE BASED ON INFORMATION PRESENTED IN THE RECORD OF DECISION

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NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA PRE-DESIGN INVESTIGATION

GEOPHYSICAL LOGGING RESULTS

SCALE: 1" = 400'

FIGURE 3-3

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Low permeability zones 5 feet thick or more were detected in each borehole. In some instances, more than one of these zones were detected at depths of concern for the treatment wells (i.e., 285 ft. bgs and shallower), including TMW-1, TMW-3D, TMW-4, TMW-5, TMW-6, TMW-7 and TMW-9.

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4.0 RESULTS OF ENVIRONMENTAL SAMPLING

The purpose of this section of the report is to discuss the results of the environmental sampling conducted during the pre-design investigation at the NCIA. The results are compared to Standards, Criteria and Guidelines (SCGs) selected for the site to determine potential impacts on human health and the environment. The nature and extent of contamination found at, and in the vicinity of the site during the investigation is described below. Electronic copies of all laboratory reports generated during the Pre-Design Investigation, including Category B Deliverables, are presented as Appendix J.

4.1 Identification of Standards, Criteria and Guidelines

The SCGs for groundwater analytical results were obtained from the NYSDEC Technical and Operational Guidance Series (TOGS) 1.1.1, Ambient Water Quality Standards and Guidance Values, dated June 1998. Analytical results obtained for groundwater samples are compared to Class GA groundwater standards and guidance values.

4.2 Discussion of Results

4.2.1 Existing Monitoring Well Sampling

As described in Section 2.0, existing groundwater monitoring wells MW-1 through MW-9 and Bowling Green Water District early warning wells EW-1B, EW-2B, EW-1C and EW-2C were sampled to obtain current plume delineation information and information necessary to select subsequent sample locations (see Figure 2-1). Each sample was analyzed for VOCs, ferrous iron, manganese, magnesium, calcium, total organic carbon, alkalinity, chlorides, nitrates, sulfates, carbon dioxide and methane.

The highest total VOC concentration was detected in MW-6 (110-130 ft bgs), which exhibited a total VOC concentration of 3,523 ug/L. In addition, well cluster MW-1 through MW-4 exhibited total VOC concentrations greater than 100 ppb increasing with depth, with a

maximum total VOC concentration of 2,331 ug/l in MW-4 (180-200 ft bgs), which is the deepest well at the cluster. Well cluster MW-7 (90 –110 ft bgs) and MW-8 (120-140 ft bgs) did not exhibit any VOC concentrations exceeding SCGs. Based upon the results of the temporary well installation and hydropunch sampling, the absence of constituents of concern in this well cluster is likely due to the relatively shallow screen depth at this location. Furthermore, only one compound, trichloroethene, was detected above SCGs in MW-9 (310-315 ft bgs). Total VOCs in MW-9 (310-315 ft bgs) were two orders of magnitude less than in MW-6 (110-130 ft bgs), which exhibited the maximum total VOC concentration of the existing wells sampled. Based upon the results of the temporary well installation and hydropunch sampling, this is likely due to the fact that this well may be placed between significant areas of contamination.

Finally, the maximum total VOC concentrations in the Early Warning Wells occurred at EW-1B (154-164 ft bgs) which exhibited a total VOC concentration of 110 ug/l. It should be noted that EW-1B has in the past exhibited higher VOC concentrations , which has generally been decreasing over time. This may be due to mitigation of some of the source impacts (refer to Section 2.0) and the continued vertical/horizontal migration of the contaminant plume. Only one compound, trichloroethene, was detected above SCGs in the deeper screened intervals (EW-1C and EW-2C). This is likely due to the deep screened intervals in these wells, (greater than 500 ft bgs) and their proximity to the NCIA sites which contributed to the plumes.

The major constituents of concern exceeding SCGs include chlorinated hydrocarbons such as trichloroethene, 1,1,1-trichloroethane, 1,1-dichloroethene, 1,1-dichloroethane and perchloroethane, all of which are either commercial solvents or breakdown products of such solvents. This is consistent with historical environmental sampling conducted at the source areas within the NCIA.

Table A-1 in Exhibit A to this section presents the VOC results. In addition to VOCs, each sample was analyzed for ferrous iron, manganese, magnesium, calcium, total organic carbon, alkalinity, chlorides, nitrates, sulfates, carbon dioxide and methane. Table A-2 in Exhibit A to this section presents the results of these analyses, which were conducted for the assessment

of natural attenuation and fouling potential in the proposed in-well air stripping units. Natural attenuation is discussed further in Section 5.0.

Introducing air into the aquifer changes the geochemical properties of the groundwater being aerated. Specifically, the act of aeration strips carbon dioxide from the water, thus raising the pH of the water and potentially precipitating dissolved metals and solids. This precipitation can clog well screens and inhibit the operation of in-well air stripping units (Naval Research Laboratory, 1999). Alkalinity, ferrous iron, calcium, magnesium and manganese are the prime candidates for fouling. Average concentrations from the existing wells for these constituents were as follows:

Alkalinity (as $CaCO_3$):	5.7 milligrams per liter (mg/l)
Ferrous Iron:	0 mg/l
Calcium:	13.8 mg/l
Magnesium:	4.5 mg/l
Manganese:	0.16 mg/l

Total hardness was also calculated for each sample, as shown on Table A-2. The maximum total hardness from the existing well sampling occurred at MW-6 and was 64 ppm. Based upon a review of these results, precipitation fouling is not a major concern since total hardness is well below 100 ppm. According to the Carbonair Inorganic Fouling in Air Strippers guidance document, groundwater with a total hardness less than 100 ppm would not generally be expected to experience significant inorganic fouling. Although this guidance is related to the ex-situ stripping of groundwater, the fouling mechanism for in-situ air stripping is similar and, as a result, the guidance can be utilized in this application.

In addition to the environmental sampling, D&B took water level measurements in each of the wells. These measurements were used to calculate vertical hydraulic gradients on the well couplets MW-1 through 4, MW-5 and 6 and MW-7 and 8. Table 4-1 presents the results of these analyses which indicate an overall downward gradient in the vicinity of the NCIA.

TABLE 4-1
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
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Summary of Calculated Vertical Hydraulic Gradients

Well I.D.	Surface E_L (ft amsl)	Depth to Water (ft bgs)	Depth to Top of Screen (ft bgs)	Depth to Bottom of Screen (ft bgs)	Calculated Gradient (ft/ft)
MW-1	114.31	42.8	90	110	
MW-2	114.27	42.84	110	130	-0.0040
MW-2	114.27	42.84	110	130	
MW-3	114.22	42.9	130	150	-0.0054
MW-3	114.22	42.9	130	150	
MW-4	114.36	43.15	180	200	-0.0022
MW-1	114.31	42.8	90	110	
MW-4	114.36	43.15	180	200	-0.0033
MW-5	116.25	44.25	90	110	
MW-6	116.24	44.31	110	130	-0.0035
MW-7	106.21	37.16	90	110	
MW-8	106.09	37.35	120	140	-0.0103

Notes:
1. Gradients for each couplet calculated using the midpoint of the screen elevations.

4.2.2 Temporary Well Installation and Hydropunch Sampling

In order to evaluate off-site groundwater quality, vertical profile groundwater sampling was conducted using two separate methods: temporary well installation and hydropunch sampling. Each sample was analyzed for VOCs, alkalinity, ferrous iron, maganese, magnesium, and calcium.

As discussed in Section 2.0, seven temporary wells (TMW-1, 2, 4, 5, 6, 7, and 9) were drilled to a depth of approximately 285 feet bgs using the hollow stem auger method. Groundwater samples were collected at 20-foot intervals from the bottom of the borehole to the groundwater table using a temporary well screen and casing that was backed out of the borehole. In addition, two temporary wells (TMW-3D and 8D) were drilled to 500 feet bgs using the mud rotary method. Groundwater samples were collected at 20-foot intervals as the drilling progressed using the hydropunch sampling method. A total of 109 samples were collected from the temporary wells for analysis.

The highest total VOC concentration was detected at TMW-07 (185 ft bgs), which exhibited a total VOC concentration of 11,734 ug/l. However, widespread elevated total VOC concentrations were detected throughout the site study area. Elevated total VOC concentrations were also observed at depths to 432 feet bgs in temporary well TMW-3D and to 502 feet bgs in temporary well TMW-8D. The highest total VOC concentrations observed in well TMW-3D were found at 357 to 377 feet bgs with concentrations of 2,109 ug/L and 2,010 ug/L, respectively. The highest total VOC concentrations observed in well TMW-8D were found at 337 feet bgs with a concentration of 886 ug/L.

In general, the depth where maximum total VOC concentrations occurred at each sampling location increased with increasing distance from the NCIA, further confirming the overall sinking nature of the contaminant plume, which is likely due to the downward gradient exhibited in the area.

Similar to the contaminants detected in the existing monitoring wells, the major constituents of concern exceeding SCGs in the temporary wells include chlorinated hydrocarbons. Table A-3 in Exhibit A to this section presents the VOC results. In addition to VOCs, each sample was analyzed for ferrous iron, manganese, magnesium, and alkalinity. Table A-4 in Exhibit A to this section presents the results of these analyses, which were conducted for the determining the fouling potential in the proposed in-well air stripping units. As previously discussed, alkalinity, ferrous iron, calcium, magnesium and manganese are the prime candidates for fouling. Average concentrations from the temporary wells for these constituents were as follows:

Alkalinity (as $CaCO_3$):	15.2 mg/l
Ferrous Iron:	0.9 mg/l
Calcium:	11.6 mg/l
Magnesium:	4.2 mg/l
Manganese:	0.24 mg/l

Total hardness was also calculated for each sample, as shown on Table A-4. The maximum total hardness calculated was 186 ppm, which was detected in sample TMW-8D (192 ft bgs). However, this appears to be an anomaly since the next highest calculated value was 60 ppm in sample TMW-3D (92 ft bgs). Based upon a review of these results, and as previously discussed, precipitation fouling is not a significant concern since total hardness is well below 100 ppm.

4.2.3 Areal and Vertical Extent of VOC Contamination

Table 4-2 presents a summary of the VOC sampling conducted as part of the Pre-Design Investigation, and identifies the number of samples collected, minimum/maximum detected concentrations, number of detections, number of exceedances of SCGs and the SCG for each VOC included in the program. As shown by Table 4-2, the most commonly detected compounds included tetrachloroethene, trichloroethene, cis-1,2-dichloroethene, 1,1-dichloroethene, 1,1-dichloroethane and 1,1,1-trichoroethene. These compounds were also generally the compounds detected at the highest concentrations, and most often exceeded SCGs. It should be

TABLE 4-2
NEW CASSEL INDUSTRIAL AREA
PRE-DESIGN STUDY INVESTIGATION
SUMMARY OF VOC GROUNDWATER SAMPLE RESULTS

COMPOUND	MINIMUM (ug/l)	MAXIMUM (ug/l)	NUMBER OF SAMPLES	NUMBER OF DETECTS	NUMBER OF EXCEEDANCES	STANDARD (ug/l)
Dichlorodifluoromethane	0.37	5	109	4	0	5
Chloromethane	0.39	4	109	5	0	5
Vinyl Chloride	1.7	81	109	15	11	2
Bromomethane	0.32	0	109	1	0	5
Chloroethane	5.3	14	109	4	4	5
Trichlorofluoromethane	0.27	66	109	15	9	5
1,1-Dichloroethene	0.23	1,300	109	78	45	5
1,1,2-Trichloro-1,2,2-trifluoroethane	0.26	59	109	26	13	5
Acetone	6.7	7	109	1	0	50
Carbon Disulfide	0.32	1	109	3	0	60
Methyl Acetate	0	0	109	0	0	--
Methylene Chloride	0.33	19	109	14	5	5
trans-1,2-Dichloroethene	0.31	4	109	16	0	5
Methyl tert-butyl Ether	0.22	4	109	29	0	10
1,1-Dichloroethane	0.28	1,800	109	73	36	5
cis-1,2-Dichloroethene	0.55	380	109	91	55	5
2-Butanone	0	0	109	0	0	50
Bromochloromethane	0	0	109	0	0	5
Chloroform	0.21	34	109	69	11	7
1,1,1-Trichloroethane	0.22	1,400	109	69	33	5
Cyclohexane	0.3	10	109	9	0	--
Carbon Tetrachloride	0.35	11	109	16	3	5
Benzene	0.21	120	109	25	14	1
1,2-Dichloroethane	0.55	10	109	13	12	0.6
Trichloroethene	0.63	5,100	109	100	89	5
Methylcyclohexane	0.33	2	109	6	0	--
1,2-Dichloropropane	0	0	109	0	0	1
Bromodichloromethane	0.24	0	109	1	0	50
cis-1,3-Dichloropropene	0	0	109	0	0	0.4
4-Methyl-2-Pentanone	0	0	109	0	0	--
Toluene	0.21	6	109	29	1	5
trans-1,3-Dichloropropene	0.43	0	109	1	1	0.4
1,1,2-Trichloroethane	0.34	3	109	16	5	1
Tetrachloroethene	0.46	11,000	109	100	88	5
2-Hexanone	0	0	109	0	0	50
Dibromochloromethane	0	0	109	0	0	50
1,2-Dibromoethane	0.75	1	109	1	1	0.006
Chlorobenzene	0.49	2	109	6	0	5
Ethylbenzene	0	0	109	0	0	5
m/p-Xylenes	0	0	109	0	0	5
o-Xylene	0.49	35	109	10	5	5
Styrene	0	0	109	0	0	5
Bromoform	0	0	109	0	0	50
Isopropylbenzene	0.62	1	109	1	0	5
1,1,2,2-Tetrachloroethane	0	0	109	0	0	5
1,3-Dichlorobenzene	0	0	109	0	0	3
1,4-Dichlorobenzene	0.29	0	109	3	0	3
1,2-Dichlorobenzene	0.37	1	109	3	0	3
1,2-Dibromo-3-Chloropropane	0	0	109	0	0	0.04
1,2,4-Trichlorobenzene	0.31	1	109	2	0	5
1,2,3-Trichlorobenzene	0.23	1	109	2	0	5
Total Targeted VOCs	0	11,734	109	109	0	--
Total TICs	0	40	109	49	0	--
Total VOCs	0	11,734	109	109	0	--

noted that relatively low concentrations of other compounds were detected, such as chloroform, benzene, toluene, xylenes, etc., which is expected given the fact that the contamination is the result of the combination of many different source areas.

Figure 4-1 depicts the location of each sampling point along with total VOC concentrations detected in samples collected by D&B during the program. In addition, the location of each of the in-well vapor stripping treatment wells proposed in the ROD are shown on Figure 4-1 for discussion purposes. The radius of influence for each of the proposed in-well vapor stripping wells is shown as 175 feet for wells constructed to a depth of 140 feet bgs, 325 feet for wells constructed to a depth of 200 feet bgs and 500 feet for wells constructed to a depth of 225 feet bgs, to be consistent with the ROD. Several important observations can be made from an analysis of Figure 4-1, as follows:

- TMW-1, 2 and 3D were installed roughly in the location of Treatment Well TW-1, which was proposed in the ROD to be 225 ft deep. However, TMW-1 and 2 exhibited total VOC concentrations of 1,446 ug/l and 1,975 ug/l, respectively, at 285 feet bgs. In addition, TMW-03D exhibited a total VOC concentration of 2,010 ug/l at 377 feet bgs. As a result, the proposed treatment wells at the furthest downgradient area of treatment are significantly too shallow to remediate the plume in this area.

- The furthest downgradient temporary well installed during the program was TMW-1, which was installed at the most downgradient edge of the area of treatment proposed in the ROD. Total VOC concentrations were detected at this location at a maximum of 4,187 ug/l at 225 ft bgs with exceedances noted to the total depth of 285 feet. As a result, the downgradient extent of the plume has not been identified and would not be treated by the proposed treatment wells.

- TMW-2 and TMW-7 were the western and eastern most temporary wells installed during the program, and were situated at areal extents of the area of treatment proposed in the ROD. TMW-2 exhibited a total VOC concentration of 7,742 ug/l at 225 ft bgs, and TMW-7 exhibited a total VOC concentration of 11,734 ug/l at 185' bgs. As a result, the areal limits of the plume have not been identified and the eastern and western extents of the contamination would likely not be treated by the proposed treatment wells.

- TMW-5 is situated generally in the middle of the area to be treated by the proposed treatment wells, in the vicinity of TW-6, a proposed 200 feet deep treatment well. The total VOC concentration at a depth of 225 feet bgs at TMW-5 was 1,466 ug/l with exceedances noted to the total depth of 285 feet. All proposed downgradient treatment wells were a maximum depth of 225 feet bgs.

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WELL	Depth (ft. bgs)	TVOC (ug/L)
EW-2B	132-142	96
EW-2C	504-514	1

WELL	Depth (ft. bgs)	TVOC (ug/L)
MW-5	90-110	8
MW-6	110-130	3,523

WELL	Depth (ft. bgs)	TVOC (ug/L)
MW-1	90-110	177
MW-2	110-130	222
MW-3	130-150	672
MW-4	180-200	2,331

TMW-2	
Depth (ft. bgs)	TVOC (ug/L)
65	105
85	165
105	390
125	225
145	297
165	648
185	1,101
195	503
210	1,063
225	7,782
245	3,343
265	5,771
285	1,975

TMW-9	
Depth (ft. bgs)	TVOC (ug/L)
60	55
80	46
100	49
120	99
140	362
160	441
180	410
200	402
220	84
240	67
260	75
280	90

TMW-6	
Depth (ft. bgs)	TVOC (ug/L)
63	25
83	35
103	35
123	110
143	30
163	20
183	37
203	88
223	132
243	93
263	59
283	32

WELL	Depth (ft. bgs)	TVOC (ug/L)
EW-1B	154-164	110
EW-1C	506-516	25

TMW-7	
Depth (ft. bgs)	TVOC (ug/L)
65	488
85	494
105	959
125	917
145	876
165	763
185	11,734
205	7,113
225	136
245	145
265	69
285	54

TMW-8D	
Depth (ft. bgs)	TVOC (ug/L)
52	0
82	0
92	0
112	7
132	5
152	4
177	1
192	6
212	2
237	1
257	11
272	9
292	796
312	513
337	886
357	549
372	247
392	2
437	51
457	41
472	80
497	159
502	42

TMW-5	
Depth (ft. bgs)	TVOC (ug/L)
65	304
85	374
105	3,876
125	4,672
145	4,637
165	3,655
185	2,714
205	1,820
225	1,466
245	863
265	369
285	294

TMW-3D	
Depth (ft. bgs)	TVOC (ug/L)
52	15
72	0
92	0
112	8
132	6
152	5
172	20
192	27
212	90
232	593
252	49
272	943
297	742
312	832
337	1,550
357	2,109
377	2,010
392	245
412	223
432	77
452	0
472	0
492	0
502	0

TMW-4	
Depth (ft. bgs)	TVOC (ug/L)
65	7
85	10
105	6
125	81
145	63
165	81
185	18
205	91
225	3
245	58
265	93
285	48

TMW-1	
Depth (ft. bgs)	TVOC (ug/L)
72	30
85	70
115	132
125	334
145	262
165	308
185	131
205	485
225	4,187
245	1,433
265	548
285	1,446

WELL	Depth (ft. bgs)	TVOC (ug/L)
MW-7	90-110	8
MW-8	120-140	7

WELL	Depth (ft. bgs)	TVOC (ug/L)
MW-9	310-315	41

LEGEND

- MW-9 ✦ MONITORING WELL
- EW-2B ▲ EW-2C EARLY WARNING DETECTION WELL
- TMW-5 ● 285' VERTICAL PROFILE LOCATION
- TMW-8D ○ 500' VERTICAL PROFILE LOCATION
- TW-11 ✕ PROPOSED 140 FT. DEEP TREATMENT WELL
- TW-5 ✕ PROPOSED 200 FT. DEEP TREATMENT WELL
- TW-1 ✕ PROPOSED 225 FT. DEEP TREATMENT WELL

NOTE:

PROPOSED TREATMENT WELL LOCATIONS ARE APPROXIMATE AND ARE BASED ON INFORMATION PRESENTED IN THE RECORD OF DECISION

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA PRE-DESIGN INVESTIGATION

SUMMARY OF TOTAL VOC CONCENTRATIONS

SCALE: 1" = 400'

FIGURE 4-1

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- TMW-9, which is upgradient of TMW-2, exhibited a maximum total VOC concentration of 441 ug/l at 160 feet bgs, even though groundwater at TMW-2 was more contaminated, with a maximum total VOC concentration of 7,782 ug/l at 225 ft bgs.

- TMW-8D and TMW-4, which are laterally downgradient of TMW-7 based upon regional groundwater direction, contained maximum total VOC concentrations of 886 ug/l and 91 ug/l, respectively, although groundwater in TMW-7 was more contaminated, with a total VOC concentration of 11,734 ug/l at 185 feet bgs.

- TMW-6, which was installed at a location most upgradient and near the NCIA sites, and along the axis of the central plume based upon previous investigations, exhibited a maximum total VOC concentration of 132 ug/l at 223 feet bgs, which is one order of magnitude less than the maximum total VOC concentration detected in TMW-5.

4.3 Data Validation

Provided below is a summary of the data validation completed by D&B during the Pre-Design Investigation at the NCIA:

4.3.1 Existing Monitoring Well Sampling

Thirteen groundwater samples and three trip blanks were collected during the period from February 25 through February 28, 2008 at the New Cassel Industrial Area Site in support of the Pre-Design Investigation. The samples were analyzed for VOCs, utilizing a low level method to detect trace levels of VOCs, and design parameters; ferrous iron, total organic carbon, alkalinity, carbon dioxide, nitrate, sulfate chloride and methane.

Sample analysis was performed by Mitkem Laboratories in accordance with NYSDEC Analytical Services Protocol (ASP) 6/00 methods. Mitkem is a subcontractor to D&B to support D&B's work assignments under our Standby Contract with the NYSDEC.

The data package submitted by Mitkem Laboratories has been reviewed to determine if the sample analyses were performed in accordance with the site work plan and if the analyses were compliant with NYSDEC 6/00 ASP methods and QA/QC requirements. The findings of the review process are summarized below.

Sample analysis was performed in accordance with the NYSDEC 6/00 ASP methods with all QA/QC requirements (i.e., surrogate recoveries, calibrations, tunes, area counts, etc.) being met. The volatile fraction of the samples was analyzed by a low concentration method (SOM1.2 Trace VOC).

All samples were analyzed within the ASP specified holding times with the exception of ferrous iron. Ferrous iron was analyzed one day out of holding time in some instances based on the date of collection. No qualification of the data was required.

Several samples required reanalysis at secondary dilutions due to compound concentrations exceeding the instrument calibration range. The results taken from the diluted analysis for the select compounds (primarily chlorinated solvents) have been included on the data summary table and qualified with a "D".

Sample EW-2B was analyzed as the matrix spike and matrix spike duplicate MS/MSD. All spike recoveries were within QC limits.

The m/p-xylene results for samples MW-1, MW-2, MW-3, MW-4 and MW-6 were qualified as estimated, possibly biased high, due to laboratory contamination. That is, the method blank associated with the sample contained m/p-xylene at a concentration of 0.21 ug/l.

No other problems were found with the data and all results are deemed usable for environmental assessment purposes, as qualified above.

4.3.2. Temporary Well Installation and Hydropunch Sampling

One hundred thirty-one groundwater samples and 47 trip blanks were collected during the period from June 20, 2008 through November 14, 2008 at the New Cassel Industrial Area Site in support of the Pre-Design Investigation. The samples were analyzed for VOCs, utilizing a low

level method to detect trace levels of VOCs, and design parameters; alkalinity, ferrous iron, calcium, magnesium and manganese.

Sample analysis was performed by Mitkem in accordance with NYSDEC ASP 6/00 methods. Mitkem is a subcontractor to D&B to support D&B's work assignments under our Standby Contract with the NYSDEC.

The sample results were submitted under 16 data packages by Mitkem. All data packages have been reviewed to determine if the sample analyses were performed in accordance with the site work plan and if the analyses were compliant with NYSDEC 6/00 ASP methods and QA/QC requirements. The findings of the review process are summarized below.

Sample analysis was performed in accordance with the NYSDEC 6/00 ASP methods with all QA/QC requirements (i.e. surrogate recoveries, calibrations, tunes, area counts, etc.) being met. The volatile fraction of the samples was analyzed by a low concentration method (SOM1.2 Trace VOC).

All samples were analyzed within the ASP specified holding times with the exception of ferrous iron. Ferrous iron was analyzed one day out of holding time in some instances based on the date of collection. No qualification of the data was required.

Several samples required reanalysis at secondary dilutions due to compound concentrations exceeding the instrument calibration range. The results taken from the diluted analysis for the select compounds (primarily chlorinated solvents) have been included on the data summary table and qualified with a "D".

Tetrachloroethylene (PCE) was detected in the trip blanks associated with several of the samples and the PCE results are qualified with a "B" on the data summary tables. The presence of PCE in the trip blanks does not affect the end use of the sample results due to the high concentration of PCE detected in the samples.

Methylene chloride and 1,1-dichlorethene were detected in the trip blank dated August 13, 2008, and, therefore, the results for these compounds were qualified "B" in samples TW5(105), TW5(125), TW5(145), TW5(165) and TW5(185). Methylene chloride was detected in several other trip blanks and the associated sample results have been qualified "B". Since the sample concentrations were greater than five times the blank concentrations, the results are considered valid results for environmental assessment purposes.

Sample TMW4(285) was originally sampled on July 22, 2008 and then re-sampled on July 31, 2008. The results for the July 31, 2008 sample are considered the "best set" and have been included on the data summary tables.

No other problems were found with the data and all results are deemed usable for environmental assessment purposes, as qualified above.

EXHIBIT A

ANALYTICAL TABLES

TABLE A-1

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

EXISTING MONITORING WELL SAMPLING

TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	MW-1	MW-2	MW-3	MW-4	MW-5	MW-6	MW-7	MW-8	MW-9	EW-1B	EW-2B	EW-1C	EW-2C	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	90-110	110-130	130-150	180-200	90-110	110-130	90-110	120-140	310-315	154-164	132-142	506-516	504-514		
Date of Collection	2/25/2008	2/25/2008	2/25/2008	2/25/2008	2/26/2008	2/26/2008	2/26/2008	2/26/2008	2/28/2008	2/27/2008	2/27/2008	2/27/2008	2/27/2008		
Dilution Factor	1/10	1/5	1/25	1/50	1.0	1/80	1.0	1.0	1/2	1/8	1/4	1/2	1.0		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	0.94	U	U	U	U	11	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	9.8	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	23 D	62 D	180 D	810 D	2.2	840 D	U	0.77	6.9	4.2	2.6	0.34 J	U	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	1.3	1.8	18	U	2.3	U	U	U	U	20	0.5	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	0.22 J	2	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	210 E	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	0.38 J	0.24 J	U	U	5.8	0.35 J	0.51	0.32 J	4.1	U	U	U	0.5	10 GV
1,1-Dichloroethane	22 D	28 D	67 D	160 D	1.1	970 D	0.33 J	1.4	2.6	0.79	1.6	0.47 J	U	0.5	5 ST
cis-1,2-Dichloroethene	3.3	6.1	13	31 D	U	5.2	4.5	1	3.6	7.4	6.5	1.1	U	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	0.47 J	0.78	1.4	1.6	U	1.2	U	0.25 J	0.55	U	U	0.39 J	U	0.5	7 ST
1,1,1-Trichloroethane	20 D	22 D	60 D	250 D	3.9	1400 D	U	0.41 J	3.8	2.8	1.1	0.25 J	U	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	0.89	U	0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	4.5	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	17	70 D	310 D	910 D	0.32 J	59 D	0.78	1.6	19 D	17	42 D	20 D	0.5 J	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	1	2	U	U	U	U	U	U	U	U	U	0.5	1 ST
Tetrachloroethene	91 D	31 D	37 D	140 D	0.5 J	18	1.7	1.1	4.7	74 D	11	0.96	U	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	0.42 J	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

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TABLE A-1 (cont.)

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

EXISTING MONITORING WELL SAMPLING

TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	MW-1	MW-2	MW-3	MW-4	MW-5	MW-6	MW-7	MW-8	MW-9	EW-1B	EW-2B	EW-1C	EW-2C	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	90-110	110-130	130-150	180-200	90-110	110-130	90-110	120-140	310-315	154-164	132-142	506-516	504-514		
Date of Collection	2/25/2008	2/25/2008	2/25/2008	2/25/2008	2/26/2008	2/26/2008	2/26/2008	2/26/2008	2/28/2008	2/27/2008	2/27/2008	2/27/2008	2/27/2008		
Dilution Factor	1/10	1/5	1/25	1/50	1.0	1/80	1.0	1.0	1/2	1/8	1/4	1/2	1.0		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
m/p-Xylenes	0.55 B*	0.27 BJ*	0.34 BJ*	0.41 BJ*	0.42 J	0.29 BJ*	0.25 J	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	0.38 J	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	0.41 J	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	0.23 J	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Total Targeted VOCs	177	222	672	2,331	8	3,523	8	7	41	110	96	25	1		--
Total TICs	0 J	0 J	0 J	0 J	0 J	0 J	0 J	0 J	0	0	0 J	0	0		--
Total VOCs	177	222	672	2,331	8	3,523	8	7	41	110	96	25	1		--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

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TABLE A-2

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

EXISTING MONITORING WELL SAMPLING

DESIGN PARAMETERS

Sample ID	MW-1	MW-2	MW-3	MW-4	MW-5	MW-6	MW-7	MW-8	MW-9	EW-1B	EW-2B	EW-1C	EW-2C	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	90-110	110-130	130-150	180-200	90-110	110-130	90-110	120-140	310-315	154-164	132-142	506-516	504-514		
Date of Collection	2/25/2008	2/25/2008	2/25/2008	2/25/2008	2/26/2008	2/26/2008	2/26/2008	2/26/2008	2/28/2008	2/27/2008	2/27/2008	2/27/2008	2/27/2008		
Chloride, mg/L	53	58	43	51	420	250	25	20	21	28	28	15	13	4.0	250 ST
Nitrogen, Nitrate (as N), mg/L	3.3	3.9 D	3.1	7	3.5	8.2	3.9	5.6	3.1	6.2	2.6	8	4.8 D	0.13	10 ST
Sulfate, mg/L	31	22	20	10	22	32	17	22	14	16	10	U	5.7	5	250 ST
Alkalinity, Total (as $CaCO_3$), mg/L	U	29	U	24	U	U	U	U	U	U	U	21	U	20	--
Ferrous Iron, mg/L	U	U	U	U	U	U	U	U	U	U	U	U	U	1	0.3 ST
Carbon Dioxide, Free, mg/L	130	120	310	100	110	82	90	110	120	72	85	38	24	10	--
Total Organic Carbon, mg/L	U	U	U	U	U	U	U	U	U	U	U	U	U	10	--
Methane, ug/L	U	U	63	U	U	U	U	U	U	U	28	U	U	14	--
Calcium, ug/L	12,200	13,700	8,930	10,700	38,200	37,700	9,240	10,600	6,960	6,570	6,720	10,300	7,870	5,000	--
Magnesium, ug/L	4,060	5,160	3,730	3,960	6,130	11,900	3,380	4,560	2,350	2,640	3,010	4,220	3,240	2,000	35,000 GV
Manganese, ug/L	779	334	40.1 B	28.2 B	201	417	9.1 B	82.8	9.5 B	20.2 B	15 B	125	43.4 B	50	500 ST*
Calculated Total Hardness, mg/L	22	27	19	21	41	64	18	23	12	13	15	21	16	--	--

Qualifiers:

U: Compound analyzed for but not detected.

B: Compound detected at a concentraion above IDL but below the CRDL.

D: Compound analyzed at a secondary dilution.

Notes:

--: Not established

ST: Standard

ST*: Standard applies to the sum of the iron and manganese concentrations.

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

Total hardness calculated by representing sum total of calcium and magnesium as calcium carbonate.

R2-0001420

TABLE A-3
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	72	85	115	125	145	165	185	205	225	245	265	285			
Date of Collection	8/29/2008	8/29/2008	8/29/2008	8/28/2008	8/28/2008	8/28/2008	8/28/2008	8/27/2008	8/27/2008	8/27/2008	8/26/2008	8/26/2008			
Dilution Factor	2.5	5	10	40	40	40	10	40	40/400	40	1/40	1/40			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U		0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	2.5	66 D		0.5	5 ST
1,1-Dichloroethene	U	U	U	U	U	U	U	U	44	35	9	35 D		0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	41	U	0.55	4.7		0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U		0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	1.2 B		0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U	U	U		0.5	10 GV
1,1-Dichloroethane	U	U	U	U	U	U	U	U	U	U	4.2	9.5		0.5	5 ST
cis-1,2-Dichloroethene	U	U	4.6 J	14 J	U	17 J	3.4 J	U	120	100	44 D	85 D		0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroform	U	U	U	U	U	U	U	U	U	U	3.3	2.3		0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	U	U	U	U	21	18 J	5	18		0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	0.38 J	0.42 J		0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	31	U	0.47 J	8.1		0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	2.1		0.5	0.6 ST
Trichloroethene	1.4	6.7	17	50	42	61	18	95	230	530	61 D	650 D		0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U		5	--
Toluene	U	U	U	U	U	U	U	U	U	U	4.2	1.6		0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	1		0.5	1 ST
Tetrachloroethene	29	63	110	270	220	230	110	390	3700 D	750	410 D	530 D		0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST

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TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	72	85	115	125	145	165	185	205	225	245	265	285			
Date of Collection	8/29/2008	8/29/2008	8/29/2008	8/28/2008	8/28/2008	8/28/2008	8/28/2008	8/27/2008	8/27/2008	8/27/2008	8/26/2008	8/26/2008			
Dilution Factor	2.5	5	10	40	40	40	10	40	40/400	40	1/40	1/40			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	1.3	15		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	0.62		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	0.5	J	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	30	70	132	334	262	308	131	485	4,187	1,433	546	1,431			--
Total TICs	0	0	0	0	0	0	0	0	0	0	1.88	15.4			--
Total VOCs	30	70	132	334	262	308	131	485	4,187	1,433	548	1,446			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001422

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	195	210	225	245	265	285		
Date of Collection	8/21/2008	8/21/2008	8/20/2008	8/20/2008	8/20/2008	8/19/2008	8/19/2008	8/19/2008	8/19/2008	8/18/2008	8/18/2008	8/18/2008	8/18/2008		
Dilution Factor	4	8	40	10	10	40	1/40	1/25	1/40	1/400	1/200	1/160	1/80		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	3.5	1.9	15	2.7	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	U	U	U	5 J	18 J	15	14	7.6	18	36 E	200 D	7.6	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	0.41 B	0.33 B	1.6 B	0.6 B	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	0.53	U	0.55	3.9	1.9	3.4	0.91	0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U	0.33 J	U	0.55	0.5	10 GV
1,1-Dichloroethane	U	U	U	U	U	U	3.7	7	6.8	6.6	4.3	13	1.4	0.5	5 ST
cis-1,2-Dichloroethene	4.8	8.9	30	12	16	36	120 D	28 D	39 D	350 D	120 D	310 D	91 D	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	U	U	U	U	U	U	2.3	3.1	2.6	11	3.3	19	1.1	0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	3.4 J	U	7.6	7.8	2.7	6.7	21 E	88 D	3.4	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	2.7	0.78	U	4	3.6	0.88	3.2	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	1.3	1.9	0.35 J	U	U	U	0.5	5 ST
Benzene	1.4 J	2.5 J	U	U	3 J	34	120 D	36 D	0.57	6.1	3.8	7.5	28 DJ	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	51	90	230	120	140	310	540 D	200 D	510 D	5100 D	2000 D	2400 D	1400 D	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	0.79	0.45 J	U	2.4	2.2	U	1.8	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	U	0.35 J	0.37 J	U	0.37 J	U	0.43 J	0.34 J	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	0.55	U	0.34 J	1.1	1	0.72	0.37 J	0.5	1 ST
Tetrachloroethene	48	64	130	93	130	250 B	240 D	190 D	490 D	2200 D	1100 D	2700 D	390 D	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	0.75	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

R2-0001423

TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	195	210	225	245	265	285		
Date of Collection	8/21/2008	8/21/2008	8/20/2008	8/20/2008	8/20/2008	8/19/2008	8/19/2008	8/19/2008	8/19/2008	8/18/2008	8/18/2008	8/18/2008	8/18/2008		
Dilution Factor	4	8	40	10	10	40	1/40	1/25	1/40	1/400	1/200	1/160	1/80		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	6.5	4.9	0.49 J	35 E	22 E	4.4	11	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	0.71	U	U	U	U	U	0.37 J	0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Total Targeted VOCs	105	165	390	225	297	648	1,061	494	1,063	7,749	3,322	5,764	1,944		--
Total TICs	0	0	0	0	0	0	39.79	9.28	0	32.6	21.12	6.69	30.63		--
Total VOCs	105	165	390	225	297	648	1,101	503	1,063	7,782	3,343	5,771	1,975		--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001424

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/. GUIDANCE VALUES
Sample Depth, ft	52	72	92	112	132	152	172	192	212	232	252	272	297		
Date of Collection	10/1/2008	10/1/2008	10/2/2008	10/2/2008	10/3/2008	10/3/2008	10/3/2008	10/6/2008	10/6/2008	10/6/2008	10/7/2008	10/7/2008	10/8/2008		
Dilution Factor	1	1	1	1	1	1	1	1	40	20	40	40	40		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	U	U	0.23 J	U	U	U	2.5	U	16	U	29	21	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	0.43 J	U	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	U	U	0.53	0.42 J	0.48 J	2	3.1	U	U	U	U	U	0.5	10 GV
1,1-Dichloroethane	U	U	U	0.29 J	U	0.28 J	0.39 J	1.4	U	24	U	14 J	12 J	0.5	5 ST
cis-1,2-Dichloroethene	U	U	U	2.4	U	U	3.1	3.4	39	300	13 J	220	160	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	1.2	U	U	U	0.36 J	0.29 J	0.87	0.31 J	U	7.7 J	U	U	8.5 J	0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	U	U	U	3.3	U	5.3 J	U	10 J	U	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	10 J	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	U	U	U	0.92	U	U	5.2	3.8	32	130	23	220	180	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	0.23 J	U	0.21 J	U	U	U	U	U	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Tetrachloroethene	U	U	U	3.2	U	U	7.1	7.9	19 J	110	13 J	440	360	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

R2-0001425

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	52	72	92	112	132	152	172	192	212	232	252	272	297		
Date of Collection	10/1/2008	10/1/2008	10/2/2008	10/2/2008	10/3/2008	10/3/2008	10/3/2008	10/6/2008	10/6/2008	10/6/2008	10/7/2008	10/7/2008	10/8/2008		
Dilution Factor	1	1	1	1	1	1	1	1	40	20	40	40	40		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	0.31 J	U	U	U	U	U	0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	0.23 J	0.62	U	U	U	U	U	0.5	5 ST
Total Targeted VOCs	1	0	0	8	1	1	19	27	90	593	49	943	742		--
Total TICs	13.62	0	0	0	5.39	3.8	1	0	0	0	0	0	0		--
Total VOCs	15	0	0	8	6	5	20	27	90	593	49	943	742		--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001426

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D			Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	312	337	357	377	392	412	432	452	472	492	502				
Date of Collection	10/8/2008	10/8/2008	10/9/2008	10/9/2008	10/10/2008	10/10/2008	10/10/2008	10/11/2008	10/11/2008	10/11/2008	10/11/2008				
Dilution Factor	40	40	40/80	40/80	10	8	2	1	1	1	1				
Units	ug/l	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L			ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U			0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Trichlorofluoromethane	U	51	14 J	U	20	36	38	U	U	U	U			0.5	5 ST
1,1-Dichloroethene	39	55	300	450	7.8	3 J	0.99 J	U	U	U	U			0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U			5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U			0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U			0.5	--
Methylene Chloride	19 BJ	16 BJ	U	U	U	U	U	U	U	U	U			0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U	U			0.5	10 GV
1,1-Dichloroethane	24	23	46	46	7.9	4.1	3.2	U	U	U	U			0.5	5 ST
cis-1,2-Dichloroethene	230	380	360	210	50	36	5.6	U	U	U	U			0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U			5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Chloroform	9.8 J	34	29	14 J	4 J	4.5	0.92 J	U	U	U	U			0.5	7 ST
1,1,1-Trichloroethane	U	11 J	120	200	3.6 J	2 J	0.8 J	U	U	U	U			0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U			0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	1.1	U	U	U	U			0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U			0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	0.6 ST
Trichloroethene	130	620	900 D	930 D	130	110	19	U	U	U	U			0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U			0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U			0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U			0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U			5	--
Toluene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U			0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	1 ST
Tetrachloroethene	380	360	340	160	22	27	1.3	U	U	U	U			0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U			5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U			0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST

R2-0001427

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D			Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	312	337	357	377	392	412	432	452	472	492	502				
Date of Collection	10/8/2008	10/8/2008	10/9/2008	10/9/2008	10/10/2008	10/10/2008	10/10/2008	10/11/2008	10/11/2008	10/11/2008	10/11/2008				
Dilution Factor	40	40	40/80	40/80	10	8	2	1	1	1	1				
Units	ug/l	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L			ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U			0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U			0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Total Targeted VOCs	832	1,550	2,109	2,010	245	223	71	0	0	0	0				--
Total TICs	0	0	0	0	0	0	6.1	0	0	0	0				--
Total VOCs	832	1,550	2,109	2,010	245	223	77	0	0	0	0				--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001428

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	8/4/2008	8/4/2008	8/4/2008	8/4/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	7/31/2008	7/31/2008	7/31/2008			
Dilution Factor	1	1	1	5	1/4	1/4	1	1/4	1	1/4	1/5	1/4			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U		0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1-Dichloroethene	0.36 J	U	0.3 J	2.9	1.8	7.1	2.1	11	U	4.9	8.1	2.6		0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	0.36 J	U	U		0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	0.3 J	0.68	0.63	1.1	0.68	0.59		0.5	10 GV
1,1-Dichloroethane	U	U	U	3.8 U	2.6	13	0.38 J	1.9	U	0.84	1.2	0.53		0.5	5 ST
cis-1,2-Dichloroethene	U	U	U	U	0.85	1.7	0.55	3.7	U	1.7	2.6	1.4		0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroform	1.3	0.41 J	U	U	0.81	0.81	1	4.6	1	1.3	2.3	2.5		0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	0.6	2	0.58	1.7	U	0.87	1.8	0.76		0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.6 ST
Trichloroethene	1.1	0.63	0.94	17	8.9	16	11	56 D	1.2	38 D	65 D	29 D		0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U		5	--
Toluene	0.57	U	U	U	0.69	0.54	U	0.56	U	3	1.9	2.8		0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
Tetrachloroethene	3.3	9.1	4.6	57	47 D	40 D	1.8	11	0.46 J	5.8	9.4	8.1		0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST

R2-0001429

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	8/4/2008	8/4/2008	8/4/2008	8/4/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	7/31/2008	7/31/2008	7/31/2008			
Dilution Factor	1	1	1	5	1/4	1/4	1	1/4	1	1/4	1/5	1/4			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	7	10	6	81	63	81	18	91	3	58	93	48			--
Total TICs	0	0	0	0	0	0	0	0	0	0	0	0			--
Total VOCs	7	10	6	81	63	81	18	91	3	58	93	48			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001430

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	8/13/2008	8/13/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/11/2008	8/11/2008	8/11/2008	8/8/2008	8/8/2008			
Dilution Factor	8	8	1/80	1/80	1/160	1/50	1/50	1/50	1/40	1/50	1/20	1/20			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	0.37 J	U	U	U	U	U		0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Vinyl Chloride	U	U	4.5	7.5	8.4	59 D	71 D	81 D	53 D	1.7	3.2	U		0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroethane	U	U	12	14	14	5.3	U	U	U	U	U	U		0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1-Dichloroethene	84	100	1200 DB	1300 DB	1300 DB	1000 DB	690 DB	220 D	150 D	31 D	26 D	18		0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	5.3	8.8	18	31 D	40 D	59 D	47 D	7.9	5.9	0.79		0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	0.32 J	U		0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
Methylene Chloride	U	U	2.5 B	5.2 B	8.6 B	5.6 B	4.2 B	2.5 B	2.6 B	U	U	U		0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	2.1	2.2	1.6	1.4	0.52	0.35 J	0.35 J		0.5	5 ST
Methyl tert-butyl Ether	U	3.5 J	1.9	1.3	1.8	0.35 J	U	U	U	U	U	U		0.5	10 GV
1,1-Dichloroethane	110	120	1000 D	1600 D	1800 D	770 D	280 D	96 D	79 D	7.7	11	9.6		0.5	5 ST
cis-1,2-Dichloroethene	2.9 J	4.5	18	26 DJ	32 E	120 D	130 D	150 D	130 D	60 D	40 D	37 D		0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroform	U	U	1.5	1.8	1.9	6.6	8	4	3.8	2.7	2.9	1.6		0.5	7 ST
1,1,1-Trichloroethane	73	91	1400 D	1400 D	1100 D	440 D	170 D	59 D	43 D	5.5	6.9	5.4		0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	0.3 J	U	U	U		0.5	--
Carbon Tetrachloride	U	U	U	U	U	1.6	1.3	0.79	0.82	0.53	0.43 J	U		0.5	5 ST
Benzene	U	U	U	0.41 J	0.3 J	0.56	0.66	3.5	4.5	U	0.4 J	U		0.5	1 ST
1,2-Dichloroethane	U	U	U	5	5.5	4.8	4.4	3.5	3.9	9.5	8.8	U		0.5	0.6 ST
Trichloroethene	22	38	160 D	200 D	190 D	870 D	990 D	810 D	660 D	590 D	190 D	180 D		0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U		5	--
Toluene	U	U	U	0.36 J	U	0.33 J	0.35 J	U	U	U	2.6	1.1		0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	0.38 J	U	0.85	2.5	2.6	1.6	1.3	0.4 J	U	U		0.5	1 ST
Tetrachloroethene	12	17	66 D	98 D	150 D	330 D	310 D	320 D	280 D	140 D	67 D	38 D		0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.006 ST
Chlorobenzene	U	U	U	U	0.49 J	1	1.2	1.8	1.3	U	U	U		0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST

R2-0001431

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	8/13/2008	8/13/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/11/2008	8/11/2008	8/11/2008	8/8/2008	8/8/2008			
Dilution Factor	8	8	1/80	1/80	1/160	1/50	1/50	1/50	1/40	1/50	1/20	1/20			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	0.35 J	0.3 J	U	U	U		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	304	374	3,872	4,668	4,632	3,651	2,706	1,815	1,461	857	366	292			--
Total TICs	0	0	3.61	3.4	5.5	4.51	7.92	5.5	5.48	5.9	3	1.7			--
Total VOCs	304	374	3,876	4,672	4,637	3,655	2,714	1,820	1,466	863	369	294			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001432

TABLE A-3 (continued)

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

VERTICAL PROFILE WELLS

TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	63	83	103	123	143	163	183	203	223	243	263	283		
Date of Collection	6/25/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/23/2008	6/23/2008	6/23/2008	6/23/2008	6/20/2008	6/20/2008		
Dilution Factor	1.0	1.0	1.0	1/8	1.0	1.0	1.0	1/2.5	1/5	1/2.5	1.0	1.0		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	3.7	4.3	2.4	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	1.7	2.7	3.4	**11**	**5.2**	2.1	4.3	**12**	**44 D**	**30 D**	**18**	**7.3**	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	0.6	3.1	U	0.56	0.26 J	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	U	0.36 J	0.3 J	U	U	U	U	U	U	U	U	0.5	10 GV
1,1-Dichloroethane	1.3	1.9	1.3	0.86	1.5	1.3	3.6	**9.9**	**20**	**33 D**	**12**	**11**	0.5	5 ST
cis-1,2-Dichloroethene	1.1	1.3	1.8	**9.8**	1.6	0.91	**7.5**	**18**	0.81	0.84	0.95	0.68	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	0.23 J	0.33 J	0.47 J	U	U	0.23 J	U	0.45 J	0.4 J	0.33 J	0.22 J	0.21 J	0.5	7 ST
1,1,1-Trichloroethane	0.94	2.2	2.3	**7.9**	4	1.8	3	**6.1**	**16**	**17**	**9.9**	4.8	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Benzene	0.55	0.51	0.21 J	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	**2.4**	U	U	U	U	0.5	0.6 ST
Trichloroethene	5	**8.4**	**11**	**63 D**	**8.9**	**6.2**	**12**	**16**	2.7	**5.8**	2.4	1.2	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	0.24 J	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	1.5	0.79	0.28 J	U	0.4 J	U	U	U	U	U	U	U	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.37 J	0.35 J	U	U	0.5	1 ST
Tetrachloroethene	2.9	4.6	**5.5**	**14**	**8.6**	3.5	**6.6**	**22 D**	**48 D**	**5.9**	**16**	**6.4**	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

R2-0001433

TABLE A-3 (continued)

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

VERTICAL PROFILE WELLS

TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	63	83	103	123	143	163	183	203	223	243	263	283			
Date of Collection	6/25/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/23/2008	6/23/2008	6/23/2008	6/23/2008	6/20/2008	6/20/2008			
Dilution Factor	1.0	1.0	1.0	1/8	1.0	1.0	1.0	1/2.5	1/5	1/2.5	1.0	1.0			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	0.29 J		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	19	27	30	110	30	17	37	87	132	93	59	32			--
Total TICs	5.72 J	8.2 J	5.6 J	0 J	0 J	3.3 J	0 J	1 J	0 J	0 J	0 J	0 J			--
Total VOCs	25	35	35	110	30	20	37	88	132	93	59	32			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001434

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285		
Date of Collection	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/2/2008	7/2/2008	7/2/2008	7/1/2008	7/1/2008	7/1/2008	6/30/2008		
Dilution Factor	50.0	50.0	50/100	50/100	50/100	1/50	1/1000	1/500	1/10	1/10	1/2.5	1/2.5		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	4.8	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	1.9	1.8	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	U	U	U	U	0.3 J	2.4	3	2.7	3.4	0.88	1.1	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST.
trans-1,2-Dichloroethene	U	U	U	U	U	U	1.4	1.3	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	0.7	U	U	U	U	0.34 J	U	0.5	10 GV
1,1-Dichloroethane	U	U	U	U	U	0.35 J	0.9	1.1	5.1	5.3	0.5 J	1.5	0.5	5 ST
cis-1,2-Dichloroethene	11 J	10 J	44	36	32	14	330 DJ	300 D	1	1.2	0.82	0.58	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	U	U	U	U	U	U	0.25 J	0.34 J	0.66	0.65	U	0.36 J	0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	U	0.22 J	1.8	2	1.6	1.7	0.44 J	0.63	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	10	11	1.6	5.7	0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	17 J	14 J	45	41	44	21 DJ	390 DJ	300 D	100 D	110 D	35 D	34 D	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	1.3	2.9	2.6	5.6	U	U	1.4	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Tetrachloroethene	460	470	870 D	840 D	800 D	720 DB	11,000 DB	6,500 DB	9.3	12	29 D	9.2 B	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	1.2	0.65	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

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TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/2/2008	7/2/2008	7/2/2008	7/1/2008	7/1/2008	7/1/2008	6/30/2008			
Dilution Factor	50.0	50.0	50/100	50/100	50/100	1/50	1/1000	1/500	1/10	1/10	1/2.5	1/2.5			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	0.46 J	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	0.69	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	488	494	959	917	876	763	11,734	7,113	136	145	69	54			--
Total TICs	0	0	0	0	0	0	0	0	0	0	0	0			--
Total VOCs	488	494	959	917	876	763	11,734	7,113	136	145	69	54			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	52	82	92	112	132	152	177	192	212	237	257	272	292		
Date of Collection	10/29/2008	10/30/2008	10/30/2008	10/31/2008	10/31/2008	11/3/2008	11/3/2008	11/4/2008	11/4/2008	11/6/2008	11/7/2008	11/7/2008	11/10/2008		
Dilution Factor	1	1	1	20	20	1	1	1	1	1	10	1	10/25		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	72	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	0.31 JB	U	U	7 BJ	5.4 BJ	0.23 BJ	U	U	U	U	U	U	2.1 J	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	10 GV
1,1-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	16	0.5	5 ST
cis-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	19	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	U	U	U	U	U	U	0.27 J	U	U	0.58	U	1.4	U	0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	0.22 J	37	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	U	U	U	U	U	U	U	U	U	0.66	U	1.2	360 D	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Tetrachloroethene	U	U	U	U	U	U	U	U	U	U	U	1.6	290 D	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	3.3	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

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TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	52	82	92	112	132	152	177	192	212	237	257	272	292		
Date of Collection	10/29/2008	10/30/2008	10/30/2008	10/31/2008	10/31/2008	11/3/2008	11/3/2008	11/4/2008	11/4/2008	11/6/2008	11/7/2008	11/7/2008	11/10/2008		
Dilution Factor	1	1	1	20	20	1	1	1	1	1	10	1	10		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Total Targeted VOCs	0	0	0	7	5	4	0	0	0	1	0	4	796		--
Total TICs	0	0	0	0	0	0	0.71	5.63	2.1	0	11	4.33	0		--
Total VOCs	0	0	0	7	5	4	1	6	2	1	11	9	796		--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

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TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D				Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	312	337	357	372	392	437	457	472	497	502					
Date of Collection	11/10/2008	11/10/2008	11/11/2008	11/11/2008	11/11/2008	11/13/2008	11/13/2008	11/13/2008	11/14/2008	11/14/2008					
Dilution Factor	10/20	10/50	10/40	10	1	2	1.6	1.6	10	10					
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L				ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U				0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
1,1-Dichloroethene	73	50	32	25	0.54	4.6	0.96	13	4.2 J	4.2 J				0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U				5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U				0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U				0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	3.2 BJ	2.9 BJ				0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U				0.5	10 GV
1,1-Dichloroethane	14	9.9	7.9	6.1	0.57	7.1	1.3	20	3.2 J	U				0.5	5 ST
cis-1,2-Dichloroethene	14	43	26	13	U	5.6	6.8	6.9	15	2.2 J				0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U				5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Chloroform	U	U	U	U	U	0.7 J	1	0.41 J	U	U				0.5	7 ST
1,1,1-Trichloroethane	46	36	25	16	0.43 J	3	0.82	9.7	2.7 J	4.2 J				0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U				0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U				0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U				0.5	0.6 ST
Trichloroethene	280 D	67	38	27	0.32 J	20	23	24	120	14				0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U				0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U				0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U				0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U				0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U				5	--
Toluene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U				0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U				0.5	1 ST
Tetrachloroethene	86	680 D	420 D	160	0.47 J	10	6.7	5.9	11	14				0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U				5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U				0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U				0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST

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TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D				Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	312	337	357	372	392	437	457	472	497	502					
Date of Collection	11/10/2008	11/10/2008	11/11/2008	11/11/2008	11/11/2008	11/13/2008	11/13/2008	11/13/2008	11/14/2008	11/14/2008					
Dilution Factor	10/20	10/50	10/40	10	1	2	1.6	1.6	10	10					
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L				ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U				0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U				0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Total Targeted VOCs	513	886	549	247	2	51	41	80	159	42					--
Total TICs	0	0	0	0	0	0	0	0	0	0					--
Total VOCs	513	886	549	247	2	51	41	80	159	42					--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001440

TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	60	80	100	120	140	160	180	200	220	240	260	280		
Date of Collection	7/21/2008	7/21/2008	7/21/2008	7/21/2008	7/18/2008	7/18/2008	7/18/2008	7/17/2008	7/17/2008	7/17/2008	7/16/2008	7/16/2008		
Dilution Factor	1/2.5	1/2.5	1/2	1/5	1/20	1/25	1/25	1/25	1/5	1	1	1		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	0.39 J	1.5	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	0.55	U	0.39 J	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	0.32 J	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	0.32 J	U	0.35 J	U	0.27 J	1.1	3	6.2	8.5	20	0.5	5 ST
1,1-Dichloroethene	0.53	0.63	0.58	1.1	2.8	2.6	2.5	3.4	1.9	17	20	18	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	0.89	1	0.87	1.5	9.6	13	7.5	4.4	U	U	U	U	0.5	5 ST
Acetone	6.3	U	6.7	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	0.55	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	0.31 J	U	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	0.74	1.3	3.9	1.1	0.22 J	U	0.35 J	0.42 J	U	U	U	0.5	10 GV
1,1-Dichloroethane	0.4 J	0.36 J	0.4 J	0.65	1.2	1.7	1.8	3.5	2.9	15	15	16	0.5	5 ST
cis-1,2-Dichloroethene	2.1	2	1.3	3.7	12	23 D	24 D	17	4.4	0.71	0.85	0.84	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	0.51	0.53	0.54	1	3.3	8.1	3.9	11	2.5	1.6	1.7	1.7	0.5	7 ST
1,1,1-Trichloroethane	U	U	0.43 J	0.4 J	1.4	1.3	1.1	1.6	0.79	8.5	8.1	8.7	0.5	5 ST
Cyclohexane	U	U	0.31 J	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Benzene	U	U	0.31 J	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	0.55	0.72	0.96	0.5	0.6 ST
Trichloroethene	12	13	15	28 D	120 D	110 D	99 D	90 D	55 D	15	17	19	0.5	5 ST
Methylcyclohexane	U	U	0.33 J	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,3-Dichloropropene	U	U	0.43 J	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Tetrachloroethene	25 D	25 D	18 D	57 D	210 D	280 D	270 D	270 DB	13 B	2.4 B	3.1	4.3	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

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TABLE A-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	60	80	100	120	140	160	180	200	220	240	260	280			
Date of Collection	7/21/2008	7/21/2008	7/21/2008	7/21/2008	7/18/2008	7/18/2008	7/18/2008	7/17/2008	7/17/2008	7/17/2008	7/16/2008	7/16/2008			
Dilution Factor	1/2.5	1/2.5	1/2	1/5	1/20	1/25	1/25	1/25	1/5	1	1	1			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	0.9	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	48	43	49	99	362	441	410	402	84	67	75	90			--
Total TICs	6.78 J	3 J	0	0.64 J	0	0	0	0	0	0	0	0			--
Total VOCs	55	46	49	99	362	441	410	402	84	67	75	90			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001442

TABLE A-4

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

VERTICAL PROFILE WELLS

DESIGN PARAMETERS

Sample ID	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	72	85	115	125	145	165	185	205	225	245	265	285			
Date of Collection	8/29/2008	8/29/2008	8/29/2008	8/28/2008	8/28/2008	8/28/2008	8/28/2008	8/27/2008	8/27/2008	8/27/2008	8/26/2008	8/26/2008			
Alkalinity, Total (as CaCQ), mg/L	U	U	39	41	U	38	23	U	U	U	U	20		20	--
Ferrous Iron, mg/L	**1.3**	U	U	**3.1**	**1.3**	**1.2**	U	U	U	**1.6**	U	U		1	0.3 ST
Calcium, ug/L	37,400	28,500	14,500	12,300	11,500	10,800	9,560	9,360	14,600	12,700	2,210 B	12,500		5,000	--
Magnesium, ug/L	5,740	5,460	4,000 B	3,580 B	3,010 B	3,310 B	3,600 B	3,180 B	4,750 B	4,400 B	836 B	4,110 B		2,000	35,000 GV
Manganese, ug/L	**898**	**899**	496	448	234	195	35.7	59.5	49.8	194	61.1	61.5		50	500 ST*
Calculated Total Hardness, mg/L	39	34	22	20	17	18	19	17	25	23	4	22		--	--

Sample ID	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	195	210	225	245	265	285		
Date of Collection	8/21/2008	8/21/2008	8/20/2008	8/20/2008	8/20/2008	8/19/2008	8/19/2008	8/19/2008	8/19/2008	8/18/2008	8/18/2008	8/18/2008	8/18/2008		
Alkalinity, Total (as CaCQ), mg/L	21	29	U	U	U	U	30	U	U	U	U	U	U	20	--
Ferrous Iron, mg/L	**1.8**	U	**1.2**	U	U	U	U	**1**	U	**1.2**	U	**1**	**1.3**	1	0.3 ST
Calcium, ug/L	13,200	16,600	12,300	16,700	11,800	10,300	10,700	11,300	15,900	11,300	13,600	13,600	11,100	5,000	--
Magnesium, ug/L	3,670 B	5,090	3,910 B	6,030	4,310 B	3,900 B	4,530 B	4,420 B	5,960	4,000 B	5,200	4,620 B	4,000 B	2,000	35,000 GV
Manganese, ug/L	**1,190**	**1,360**	**911**	**610**	161	131	158	163	77.3	43	62.6	55.7	79.6	50	500 ST*
Calculated Total Hardness, mg/L	20	28	21	31	22	20	23	23	31	21	27	24	21	--	--

Qualifiers:

U: Compound analyzed for but not detected.

B: Compound detected at a concentraion above IDL but below the CRDL.

D: Compound analyzed at a secondary dilution.

Notes:

--: Not established

ST: Standard

ST*: Standard applies to the sum of the iron and manganese concentrations.

GV: Guidance Value

Bold: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

Total hardness calculated by representing sum total of calcium and magnesium as calcium carbonate.

R2-0001443

TABLE A-4
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
DESIGN PARAMETERS

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	52	72	92	112	132	152	172	192	212	232	252	272	297		
Date of Collection	10/1/2008	10/1/2008	10/2/2008	10/2/2008	10/3/2008	10/3/2008	10/3/2008	10/6/2008	10/6/2008	10/6/2008	10/7/2008	10/7/2008	10/8/2008		
Alkalinity, Total (as CaCQ), mg/L	U	U	U	U	U	U	U	32	28	52	22	U	23	20	--
Ferrous Iron, mg/L	**1.6**	U	**1.3**	U	U	U	**1.3**	**4.2**	**3.6**	**2.7**	U	U	**1.2**	1	0.3 ST
Calcium, ug/L	11,200	NA	50,300	11,600	7,570	12,800	14,100	9,910	11,400	11,200	18,200	12,400	17,600	5,000	--
Magnesium, ug/L	2,820 B	NA	9,670	3,940 B	2,920 B	4,600 B	7,340	4,420 B	5,510	3,900 B	6,860	4,030 B	6,440	2,000	35,000 GV
Manganese, ug/L	**1,170**	NA	**812**	452	204	136	171	449	155	363	334	114	146	50	500 ST*
Calculated Total Hardness, mg/L	16	NA	60	21	15	24	36	22	27	21	36	22	34	--	--

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D			Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	312	337	357	377	392	412	432	452	472	492	502				
Date of Collection	10/8/2008	10/8/2008	10/9/2008	10/9/2008	10/10/2008	10/10/2008	10/10/2008	10/11/2008	10/11/2008	10/11/2008	10/11/2008				
Alkalinity, Total (as CaCQ), mg/L	31	U	22	28	30	U	U	U	U	U	U			20	--
Ferrous Iron, mg/L	U	U	U	U	U	U	U	U	**1.9**	U	U			1	0.3 ST
Calcium, ug/L	19,600	12,500	12,700	13,900	5,710	6,010	6,610	1,620 B	1,180 B	1,580 B	751 B			5,000	--
Magnesium, ug/L	7,390	4,300 B	4,810 B	5,230	2,100 B	2,310 B	2,580 B	571 B	427 B	592 B	101 B			2,000	35,000 GV
Manganese, ug/L	273	158	171	211	167	146	78.6	30.6	34.4	55.3	9.7 B			50	500 ST*
Calculated Total Hardness, mg/L	38	23	25	27	11	12	13	3	2	3	1			--	--

Qualifiers:

U: Compound analyzed for but not detected.

B: Compound detected at a concentraion above IDL but below the CRDL.

D: Compound analyzed at a secondary dilution.

NA: Not analyzed due to insufficient sample volume.

Notes:

--: Not established

ST: Standard

ST*: Standard applies to the sum of the iron and manganese concentrations.

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

Total hardness calculated by representing sum total of calcium and magnesium as calcium carbonate.

R2-0001444

TABLE A-4
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
DESIGN PARAMETERS

Sample ID	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285		
Date of Collection	8/4/2008	8/4/2008	8/4/2008	8/4/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	7/31/2008	7/31/2008	7/31/2008		
Alkalinity, Total (as CaCQ), mg/L	U	U	U	U	U	U	U	U	U	U	U	U	20	--
Ferrous Iron, mg/L	U	U	U	U	U	U	U	U	U	U	U	U	1	0.3 ST
Calcium, ug/L	18,300	12,900	11,900	11,500	9,260	12,700	8,400	4,380 B	4,290 B	4,590 B	9,190	5,990	5,000	--
Magnesium, ug/L	4,430 B	5,450	6,040	4,050 B	3,230 B	4,420 B	3,720 B	1,630 B	1,760 B	1,680 B	3,380 B	2,190 B	2,000	35,000 GV
Manganese, ug/L	**1,510**	138	58.2	266	95.4	68.0	30.1	37.1	24.8	43.4	19.3	20.1	50	500 ST*
Calculated Total Hardness, mg/L	26	28	30	21	17	23	19	8	9	9	18	11	--	--

Sample ID	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285		
Date of Collection	8/13/2008	8/13/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/11/2008	8/11/2008	8/11/2008	8/8/2008	8/8/2008		
Alkalinity, Total (as CaCQ), mg/L	U	U	U	31	150	26	23	23	U	U	U	U	20	--
Ferrous Iron, mg/L	U	U	**1.3**	**3.3**	U	**1.4**	**1.3**	U	U	U	U	U	1	0.3 ST
Calcium, ug/L	21,000	19,100	21,700	11,000	15,800	9,530	7,350	7,680	7,410	7,650	4,820 B	5,980	5,000	--
Magnesium, ug/L	5,790	3,950 B	5,170	4,040 B	5,990	3,680 B	2,730 B	2,800 B	2,450 B	2,560 B	1,700 B	2,130 B	2,000	35,000 GV
Manganese, ug/L	**665**	328	357	**665**	**502**	292	124	50.3	38.2	40.9	120	58	50	500 ST*
Calculated Total Hardness, mg/L	32	24	30	21	31	19	14	15	13	14	9	11	--	--

Qualifiers:

U: Compound analyzed for but not detected.

B: Compound detected at a concentraion above IDL but below the CRDL.

D: Compound analyzed at a secondary dilution.

Notes:

--: Not established

ST: Standard

ST*: Standard applies to the sum of the iron and manganese concentrations.

GV: Guidance Value

Bold: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

Total hardness calculated by representing sum total of calcium and magnesium as calcium carbonate.

R2-0001445

TABLE A-4

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

VERTICAL PROFILE WELLS

DESIGN PARAMETERS

Sample ID	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	63	83	103	123	143	163	183	203	223	243	263	283		
Date of Collection	6/25/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/23/2008	6/23/2008	6/23/2008	6/23/2008	6/20/2008	6/20/2008		
Alkalinity, Total (as CaCQ), mg/L	22	U	U	U	U	U	U	U	U	U	U	--	20	--
Ferrous Iron, mg/L	4	U	U	U	U	U	U	U	U	U	U	U	1	0.3 ST
Calcium, ug/L	8,750	9,410	7,120	7,530	6,040	7,450	3,970 B	6,520	13,000	12,200	11,600	13,800	5,000	--
Magnesium, ug/L	3,200 B	3,290 B	2,540 B	3,100 B	2,330 B	2,990 B	1,520 B	2,400 B	4,420 B	4,280 B	4,310 B	5,130	2,000	35,000 GV
Manganese, ug/L	650	510	297	133	157	136	45.5	33.8	41.4	29.1	28.6	56.4	50	500 ST*
Calculated Total Hardness, mg/L	17	17	13	16	12	15	8	12	23	22	22	27	--	--

Sample ID	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285		
Date of Collection	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/2/2008	7/2/2008	7/2/2008	7/1/2008	7/1/2008	7/1/2008	6/30/2008		
Alkalinity, Total (as CaCQ), mg/L	U	U	U	U	U	U	U	U	U	U	U	U	20	--
Ferrous Iron, mg/L	4.7	1.3	2.5	U	1.8	U	U	U	2.1	U	U	U	1	0.3 ST
Calcium, ug/L	7,970	7,620	7,400	9,140	7,780	11,800	11,700	9,460	12,900	12,500	19,800	18,100	5,000	--
Magnesium, ug/L	2,940 B	2,690 B	2,470 B	2,810 B	2,480 B	3,730 B	4,650 B	3,580 B	5,330	5,170	7,850	6,880	2,000	35,000 GV
Manganese, ug/L	416	223	302	167	177	153	92.7	111	67.4	38.2	29	36.7	50	500 ST*
Calculated Total Hardness, mg/L	15	14	13	15	13	20	24	19	27	26	40	36	--	--

Qualifiers:

U: Compound analyzed for but not detected.

B: Compound detected at a concentraion above IDL but below the CRDL.

D: Compound analyzed at a secondary dilution.

Notes:

--: Not established

ST: Standard

ST*: Standard applies to the sum of the iron and manganese concentrations.

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

Total hardness calculated by representing sum total of calcium and magnesium as calcium carbonate.

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TABLE A-4

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

VERTICAL PROFILE WELLS

DESIGN PARAMETERS

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	52	82	92	112	132	152	177	192	212	237	272	292	312		
Date of Collection	10/29/2008	10/30/2008	10/30/2008	10/31/2008	10/31/2008	11/3/2008	11/3/2008	11/4/2008	11/4/2008	11/6/2008	11/7/2008	11/10/2008	11/10/2008		
Alkalinity, Total (as CaCQ), mg/L	120	100	75	56	95	75	46	21	34	24	U	21	25	20	--
Ferrous Iron, mg/L	2.6	5.7	2.6	1.4	2.3	2.8	3.2	2.2	U	2.2	U	U	U	1	0.3 ST
Calcium, ug/L	916 B	587 B	2,240 B	8,180	1,140 B	1650 B	769 B	41,800	19,400	11,300	9,150	7,530	7,720	5,000	--
Magnesium, ug/L	196 B	121 B	310 B	2,110 B	211 B	265 B	176 B	41,100	5,180	7,430	3,140 B	2,470 B	2,580 B	2,000	35,000 GV
Manganese, ug/L	31.5	48	224	565	98.4	25.4	13.3 B	465	124	95.2	429	102	183	50	500 ST*
Calculated Total Hardness, mg/L	1	1	2	12	1	2	1	186	29	35	17	13	14	--	--

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D					Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	337	357	372	392	437	457	472	497	502						
Date of Collection	11/10/2008	11/11/2008	11/11/2008	11/11/2008	11/13/2008	11/13/2008	11/13/2008	11/14/2008	11/14/2008						
Alkalinity, Total (as CaCQ), mg/L	32	52	51	31	20	U	21	55	72					20	--
Ferrous Iron, mg/L	2	2.3	3	4.4	1.1	1.7	1.8	8.5	5.8					1	0.3 ST
Calcium, ug/L	11,000	4,600 B	8,040	5,030	10,000	7,850	9,800	2,640 B	772 B					5,000	--
Magnesium, ug/L	3,830 B	1,330 B	2,520 B	1,700 B	3,690 B	2,630 B	3,620 B	816 B	219 B					2,000	35,000 GV
Manganese, ug/L	218	190	451	128	67.1	198	159	98.3	22.4					50	500 ST*
Calculated Total Hardness, mg/L	20	7	14	9	19	14	19	4	1					--	--

Qualifiers:

U: Compound analyzed for but not detected.

B: Compound detected at a concentraion above IDL but below the CRDL.

D: Compound analyzed at a secondary dilution.

NA: Not analyzed due to insufficient sample volume.

Notes:

--: Not established

ST: Standard

ST*: Standard applies to the sum of the iron and manganese concentrations.

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

Total hardness calculated by representing sum total of calcium and magnesium as calcium carbonate.

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TABLE A-4

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

VERTICAL PROFILE WELLS

DESIGN PARAMETERS

Sample ID	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	60	80	100	120	140	160	180	200	220	240	260	280			
Date of Collection	7/21/2008	7/21/2008	7/21/2008	7/21/2008	7/18/2008	7/18/2008	7/18/2008	7/17/2008	7/17/2008	7/17/2008	7/16/2008	7/16/2008			
Alkalinity, Total (as CaCQ), mg/L	U	U	U	U	U	U	U	33	42	34	28	U		20	--
Ferrous Iron, mg/L	U	U	U	**1.5**	U	U	U	U	U	**1.8**	**1.3**	U		1	0.3 ST
Calcium, ug/L	12,200	24,100	24,900	18,100	16,700	11,900	12,400	11,400	16,000	20,400	20,000	16,200		5,000	--
Magnesium, ug/L	3,300 B	5,840	6,160	6,080	6,030	5,050	4,440 B	6,300	8,730	8,250	8,440	6,730		2,000	35,000 GV
Manganese, ug/L	367	**597**	**612**	**551**	**664**	111	53.1	50.2	50.6	74	23.5	51.2		50	500 ST*
Calculated Total Hardness, mg/L	18	34	35	32	31	26	23	30	42	42	43	34		--	--

Qualifiers:

U: Compound analyzed for but not detected.

B: Compound detected at a concentraion above IDL but below the CRDL.

D: Compound analyzed at a secondary dilution.

Notes:

--: Not established

ST: Standard

ST*: Standard applies to the sum of the iron and manganese concentrations.

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

Total hardness calculated by representing sum total of calcium and magnesium as calcium carbonate.

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5.0 EVALUATION OF NATURAL ATTENUATION OF THE VOLATILE ORGANIC COMPOUND PLUME

Previous investigations at the NCIA included a detailed evaluation to determine whether natural attenuation was occurring in the chlorinated VOC plume migrating from the NCIA sites. These evaluations were completed as part of the Annual Reports prepared by D&B during quarterly groundwater monitoring activities at the NCIA under a prior work assignment. This prior task included an evaluation of the breakdown or transformation of the chlorinated VOCs, as well as the occurrence and changes in natural attenuation monitoring parameters within the plume. The incorporation of data collected as part of this Pre-Design Investigation into the prior evaluations was not part of the scope of this project. However, D&B reviewed the current data to determine whether it corresponds with or contradicts any of the conclusions of the previous reports regarding natural attenuation.

5.1 Breakdown of Ethanes and Ethenes

A review of the chlorinated VOCs detected at and downgradient of the NCIA reveals that the compounds comprise two general suites of parent and degradation (daughter) products, ethanes and ethenes. The general degradation pathways for these suites are as follows:

1. TCA → 1,1-DCA and/or 1,2-DCA
2. PCE → TCE → cis-1,2-DCE and/or trans-1,2-DCE and/or 1,1-DCE → VC

TCA: 1,1,1-Trichloroethane
1,1-DCA: 1,1-Dichloroethane
1,2-DCA: 1,2-Dichloroethane

PCE: Tetrachloroethene
TCE: Trichloroethene
cis-1,2-DCE: cis-1,2-Dichloroethene
trans-1,2-DCE: trans-1,2-Dichloroethene
1,1-DCE: 1,1- Dichloroethene
VC: Vinyl Chloride

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Table 5-1 shows the chlorinated VOCs organized into these ethane and ethene suites. This table also provides the total VOC (TVOC) concentrations and relative percentages for the ethanes and ethenes. Only data from the 11 locations sampled that contained greater than 500 ug/l total VOCs is included.

Evaluation of the degradation of the ethane and ethene suite compounds is provided below.

Ethane Compound Suite

Previous evaluations concluded that the occurrence and distribution of ethane compounds in the VOC plume suggested that degradation was occurring. This was due to the fact that historically, the parent compound TCA was the primary ethane species constituent detected in on-site wells. However, in off-site groundwater, the percentage of TCA decreased relative to the on-site wells while the percentage of 1,1-DCA increased relative to the on-site wells, indicating the degradation of TCA to 1,1-DCA.

While no on-site wells were sampled as part of the Pre-Design Investigation, the results appear to reaffirm the conclusions of previous evaluations. As shown by Table 5-1, a significant portion of the TVOC concentration in the off-site locations sampled during the Pre-Design Investigation consisted of 1,1-DCA when compared to TCA. The average percentage of TCA was 8.9% while the average 1,1-DCA percentage was 8.4%. This means that roughly 50% of the ethane compounds in off-site groundwater are comprised of the breakdown product 1,1-DCA, whereas historic information suggests that on-site ethane compounds consisted primarily of the parent product TCA.

Ethene Compound Suite

Previous evaluations were not able to determine whether breakdown of ethene constituents was occurring. This was due to the varying occurrence and distribution of the parent

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TABLE 5-1
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VOC CONSTITUENT PERCENTAGES IN GROUNDWATER

	Central Plume							Western Plume		Eastern Plume		
	TMW-6	MW-6	MW-3	MW-4	TMW-5	TMW-3D	TMW-1	TMW-9	TMW-2	TMW-7	TMW-8D	TMW-4
	Upgradient → *Downgradient*							*Upgradient* → *Downgradient*		*Upgradient* → *Downgradient*		
Ethane Suite												
1,1,2,2-Tetrachloroethane	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1,1,2-Trichloroethane	0.1%	0.0%	0.1%	0.1%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
1,1,1-Trichloroethane	11.3%	39.7%	8.9%	10.7%	19.2%	3.7%	0.7%	1.5%	0.6%	0.0%	5.3%	1.5%
1,2-Dichloroethane	0.4%	0.0%	0.0%	0.2%	0.2%	0.0%	0.0%	0.1%	0.0%	0.0%	0.0%	0.0%
1,1-Dichloroethane	14.5%	27.5%	10.0%	6.9%	23.5%	2.2%	0.1%	2.7%	0.2%	0.1%	2.5%	4.3%
Chloroethane	0.0%	0.3%	0.0%	0.0%	0.2%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Ethene Suite												
Tetrachloroethene	21.4%	0.5%	5.5%	6.0%	7.3%	23.7%	72.9%	54.3%	34.5%	91.5%	49.8%	35.3%
Trichloroethene	21.2%	1.7%	46.1%	39.0%	19.6%	36.1%	18.8%	27.3%	56.4%	4.8%	28.8%	43.8%
trans-1,2-Dichloroethene	0.0%	6.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
cis-1,2-Dichloroethene	6.7%	0.1%	1.9%	1.3%	3.0%	21.2%	4.2%	4.2%	5.0%	3.3%	4.5%	2.2%
1,1-Dichloroethene	21.0%	23.8%	26.8%	34.8%	24.5%	9.7%	1.3%	3.3%	1.4%	0.1%	8.3%	7.4%
Vinyl Chloride	0.0%	0.0%	0.0%	0.0%	1.2%	0.0%	0.0%	0.0%	0.1%	0.0%	0.0%	0.0%
Total Targeted VOCs	674	3,523	672	2,331	24,998	9,513	9,349	2,169	23,228	23,748	3,388	559

Notes:
1. Only locations exhibiting greater than 500 ug/l total VOCs are shown to promote comparison of data collected from within the areas of contamination.
2. For TMW locations, percentages shown represent the total percentage from all samples at all sample depths.

and breakdown ethene compounds between the NCIA and the downgradient wells, which may have been the result of the many contaminant releases and/or overlapping plumes.

Historically, the distribution of ethene constituents in the on-site wells was comprised mainly of breakdown products 1,1-DCE and 1,2-DCE, while off-site wells contained relatively higher amounts of the parent products PCE and TCE. While no on-site wells were sampled as part of the Pre-Design Investigation, the results appear to reaffirm the conclusions of previous evaluations. Prior investigations described the contamination with three plumes: a central, main plume, with a smaller eastern and western plume. As shown by Table 5-1, sample locations along the axis of the main, central plume contained relatively higher percentage of the breakdown products closer to the NCIA, while more downgradient locations contained relatively higher percentages of the parent products. However, this distribution of parent and breakdown products may be the result of the use of a combination of these constituents in commercial form at the source areas rather than an indication of the presence or absence of any degradation. Sample locations closer to the eastern and western plumes contained mainly the parent products PCE and TCE. Significant levels of vinyl chloride were not present in any of the sample locations, indicating that ultimate breakdown of the ethene suite is not taking place.

Based upon the above, it is not clear whether significant breakdown of the ethene suite is taking place, which confirms the conclusions of the previous evaluations.

5.2 Natural Attenuation Parameters

A recommended list of parameters to be monitored to evaluate natural attenuation (NA) was presented in the RI/FS Report for the NCIA. These parameters were analyzed during the quarterly groundwater monitoring program, completed by D&B under a prior work assignment, and included laboratory analysis of iron, total organic carbon (TOC), alkalinity, chloride, nitrate, sulfate, carbon dioxide and methane, and field measurements of pH, dissolved oxygen and oxidation/reduction potential (Eh). Prior evaluations concluded that it was unlikely that natural attenuation and significant biodegradation were occurring in the off-site VOC plume. The

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current data from the Pre-Design Investigation was evaluated to determine whether the prior conclusions are still valid.

Table 5-2 presents the values of the NA monitoring parameters for the February 2008 sampling event for the early warning wells and permanent off-site monitoring wells. This table also includes the TVOC concentrations detected in the wells for the same sampling period.

According to the United States Environmental Protection Agency (USEPA) 1998 document entitled, "Technical Protocol for Evaluating Natural Attenuation of Chlorinated Solvents in Ground Water," biodegradation of chlorinated VOCs would be indicated by:

- Low dissolved oxygen concentrations/anaerobic conditions;
- Negative Eh readings, and low nitrate and sulfate concentrations indicating reducing conditions;
- Elevated concentrations of alkalinity, carbon dioxide and chloride, which are produced as byproducts of biodegradation; and
- Total organic carbon concentrations greater than 20 mg/l to provide an energy source for microbes capable of biodegradation of chlorinated VOCs.

Since an unimpacted upgradient monitoring well is not available to serve as baseline, well MW-7 was selected as the reference for the evaluation of the NA parameters. MW-7 is the farthest downgradient well and contained low levels of VOCs.

Ferrous iron was not detected in any of the monitoring wells, indicating that a reducing environment may not be present at these locations. In addition, only EW-1C contained sulfate concentrations significantly lower than MW-7 and none of the wells had significantly lower nitrate concentrations, again indicating that a reducing environment may not be present. No negative Eh values were detected during the monitoring well sampling.

Total organic carbon was not detected in any of the monitoring wells, so this potential energy source for biodegradation does not appear to be present.

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Table 5-2
NEW CASSEL INDUSTRIAL AREA
PRE-DESIGN INVESTIGATION
NATURAL ATTENUATION PARAMETER MONITORING RESULTS

Sample Identification	EW - 1B	EW - 1C	EW - 2B	EW - 2C
Sample Depth, ft	154 - 164	506 - 516	132 - 142	504 - 514
Date of Collection	2/27/2008	2/27/2008	2/27/2008	2/27/2008
Laboratory Results				
Ferrous Iron, mg/L	U	U	U	U
Total Organic Carbon, mg/L	U	U	U	U
Alkalinity,Total (as CaCO3), mg/L	U	21	U	U
Chloride, mg/L	28	15	28	13
Nitrogen, Nitrate (as N), mg/L	6.2	8	2.6	4.8 D
Sulfate, mg/L	16	U	10	5.7
Carbon Dioxide, Free, mg/L	72	38	85	24
Methane, ug/L	U	U	28	U
Field Measurements				
pH, millivolts	5.52	5.95	5.3	5.99
Dissolved Oxygen, mg/l	0.43	7.21	2.58	6.57
Eh, mV	172	113	246	136
Total VOC, ug/L	110	25	96	1

Sample Identification	MW - 1	MW - 2	MW- 3	MW - 4	MW - 5	MW - 6	MW - 7	MW - 8	MW - 9
Sample Depth, ft	90 - 110	110 - 130	130 - 150	180 - 200	90 - 110	110 - 130	90 - 110	120 - 140	310 - 315
Date of Collection	2/25/2008	2/25/2008	2/25/2008	2/25/2008	2/26/2008	2/26/2008	2/26/2008	2/26/2008	2/28/2008
Laboratory Results									
Ferrous Iron, mg/L	U	U	U	U	U	U	U	U	U
Total Organic Carbon, mg/L	U	U	U	U	U	U	U	U	U
Alkalinity,Total (as CaCO3), mg/L	U	29	U	24	U	U	U	U	U
Chloride, mg/L	53	58	43	51	420	250	25	20	21
Nitrogen, Nitrate (as N), mg/L	3.3	3.9 D	3.1	7	3.5	8.2	3.9	5.6	3.1
Sulfate, mg/L	31	22	20	10	22	32	17	22	14
Carbon Dioxide, Free, mg/L	130	120	310	100	110	82	90	110	120
Methane, ug/L	U	U	63	U	U	U	U	U	U
Field Measurements									
pH, millivolts	5.1	5.52	4.53	5.77	5.27	5.66	5.2	5.15	5.06
Dissolved Oxygen, mg/l	5.55	2.95	0.43	0.0	7.69	7.7	6.03	5.5	7.1
Eh, mV	267	203	303	212	264	247	266	237	301
Total VOC, ug/L	177	222	672	2,331	8	3,523	8	7	41

Notes:
TVOC: Total volatile organic compounds
U: Compound analyzed but not detected
82: Value varies at least one order-of-magnitude from average value of well sample results.

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Alkalinity was only detected in three wells, EW-1C, MW-2 and MW-4. In addition, alkalinity is naturally occurring in aquifers and the detected levels are not significantly elevated. Carbon dioxide levels are relatively consistent when compared to MW-7, with the exception of MW-3 which contained approximately 3 times the amount of carbon dioxide as MW-7. However, none of the other byproducts of biodegradation (i.e., alkalinity, chlorides, carbon dioxide, methane) were detected at elevated concentrations in MW-3. Similar to carbon dioxide, only MW-5 and MW-6 contained elevated levels of chlorides when compared to MW-7. However, none of the other byproducts of biodegradation were detected at elevated concentrations in these wells.

Finally, only three of the thirteen wells exhibited dissolved oxygen concentrations less than 1.0 mg/l, ranging from 0.0 to 0.43 mg/l in these wells. As a result, the groundwater in the off-site area is, in general, aerobic. Only two of the wells exhibited detectable methane concentrations, again indicating that, in general, breakdown products of biodegradation are not present.

Based on these factors, it appears unlikely that significant biodegradation of the off-site VOC plume is occurring. However, the presence of some breakdown products, as discussed in Section 5.1, suggests that a zone of biodegradation is or was present upgradient of the wells sampled during this program, possibly within the NCIA source areas. In addition, fairly elevated chloride levels were also detected in several samples. These results reaffirm earlier natural attenuation evaluations conducted for the site.

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6.0 FINDINGS, CONCLUSIONS AND RECOMMENDATIONS

Based on D&B's evaluation of data collected as part of the New Cassel Industrial Area Pre-Design Investigation, we present the following findings, conclusions and recommendations:

6.1 Findings

- Based upon literature data for the Magothy aquifer in the vicinity of the area of proposed treatment, anisotropies of approximately 100 or greater are not uncommon. Vertical hydraulic conductivity sampling conducted as part of this investigation revealed even higher degrees of anisotropy.

- Potentially significant low permeability zones exist within the Magothy aquifer in areas of proposed treatment.

- Local Town and County officials expressed concern during coordination efforts that the installation and operation of in-well air stripping units within public rights-of-way will be logistically difficult given the presence of many utilities, including water, gas, electric, sanitary sewer and storm sewer.

- Local Town and County officials offered to assist in the identification and use of potential public lands within the New Cassel area in order to locate a central treatment plant if conventional pump-and-treat remediation methods are chosen over in-well air stripping.

6.2 Conclusions

- The significant low permeability zones in the Magothy aquifer within the area targeted for treatment inhibit remediation with in-well vapor stripping. These zones may require that multiple, smaller recirculation wells be constructed in lieu of the larger recirculation wells anticipated in the ROD. The smaller wells would have the inlet and outlet screen sections arranged to accommodate the aquifer intervals bounded by the low permeability zones. Consequently, multiple wells would be required to span the vertical limits of the aquifer targeted for treatment by one larger well.

- According to the Naval Research Laboratories document entitled, "Groundwater Circulating Well Technology Assessment," the ideal anisotropy for groundwater recirculation wells is between 3 and 10. Based upon the results of this investigation, the Magothy exhibits anisotropy of 100 or greater. Under an in-well air stripping scenario, this results in water discharged from the upper screen traveling horizontally

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much faster than it does vertically, in many cases outside the reach of the recirculation influence. Figure 6-1 depicts the effects of non-ideal anisotropy on the operation of in-well vapor stripping technology.

- The aquifer thickness requiring treatment at many locations is greater than 200 feet, likely exceeding that which can be treated with a single set of screens. As a result, each treatment well would likely require multiple sets of screens and recirculation zones.

- Based upon the results of the environmental sampling, relatively significant VOC contamination exists beyond the extents of the area of treatment proposed in the Record of Decision. The contamination is both deeper vertically and outside the areal extents horizontally than the area of proposed treatment in the ROD.

- The Pre-Design Investigation included sample locations at much greater depths and at locations further downgradient than previous investigations, which has significantly increased information available regarding the location of the contamination.

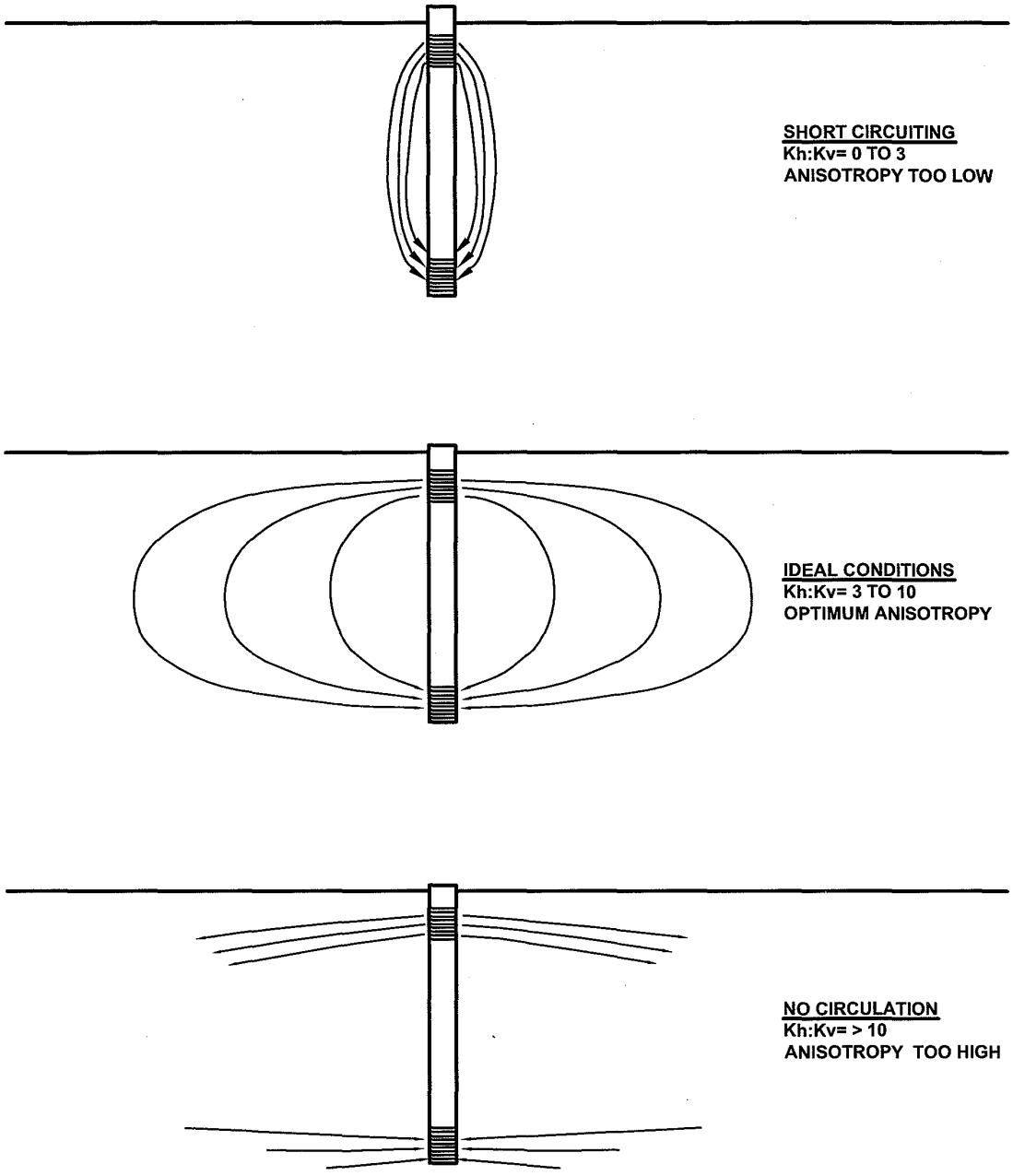
- The vertical and horizontal extents of the commingled plumes have not been delineated by prior investigations, as outlined in prior reports. As the current investigation only included nine additional sampling locations, and was not intended to define the vertical and horizontal extents of contamination but to confirm areas of proposed treatment, the limits of the commingled plumes remain undefined.

In addition to the above, D&B contacted three in-well air stripping technology vendors to discuss the data obtained during our investigation and determine whether their technology would be feasible for this project. Provided below is a summary of the information obtained from the vendors:

- The maximum radius of influence of 500' suggested by the figures in the ROD would likely not be achieved in practice. A maximum radius of influence is closer to 150'.

- Adjacent treatment wells need to be placed in an overlapping fashion in order to prevent gaps in the area of treatment at the upper and lower limits of the groundwater recirculation zones. This is due to the elliptical shape of the circulation patterns generated in a properly functioning well.

- The low permeability zones identified by the gamma logs and soil sampling could likely inhibit the development of proper groundwater recirculation patterns. While no continuous, regional aquitards were identified during D&B's investigation, several relatively thick (>5') low permeability zones were identified within the areas of



SOURCE: NAVAL RESEARCH LABORATORIES. "GROUNDWATER CIRCULATING WELL TECHNOLOGY ASSESSMENT"

NEW CASSEL INDUSTRIAL AREA
PRE-DESIGN INVESTIGATION

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

CONCEPTUAL EFFECT OF ANISOTROPY ON GROUNDWATER CIRCULATION PATTERNS

FIGURE 6-1

F:\2564-02\Rpt Figs\2564-6-1.dwg, FIG 2-2, 4/3/2009 10:07:57 AM, dbcadd

proposed treatment. In-well air stripping technology generally relies upon the recirculation of groundwater through the well several times to achieve maximum contaminant removal. The intermittent low permeability zones identified during our investigation could result in groundwater reinjected into the aquifer from the upper screen of the treatment wells having to take a tortuous path in order to be recirculated back down to the lower screen.

- If groundwater only circulates once through a given treatment well due to the low permeability zones or degrees of anisotropy which are not conducive to the formation of recirculation cells, more limited contaminant removal (70-90% according to one vendor) may be realized.

- All equipment can generally be placed within a subsurface vault. However, adequate ventilation of the vault is required to provide air for the air compressor and to exhaust heat generated by the air compressor. Depending upon the well spacing, multiple wells could be serviced from one air compressor.

6.3 Recommendations

The remediation goals selected for the Off-Site Groundwater south of the NCIA, as defined in the ROD, are as follows:

- Elimination of ingestion of groundwater affected by the sites in the NCIA that does not attain NYSDEC Class GA Ambient Water Quality and New York State drinking water standards as outlined in 10 NYCRR Part 5, Subpart 5-1.

- Elimination of, to the extent practicable, off-site migration of groundwater that does not attain NYSDEC Class GA Ambient Water Quality Standards.

Based on an evaluation of the data collected as part of the NCIA Pre-Design Investigation, the following recommendations have been established. D&B recommends that the alternate remedy of ex-situ groundwater pump-and-treat specified by the ROD be chosen in lieu of in-well air stripping. The technical limitations and logistical hurdles associated with the implementation of in-well air stripping technology result in the alternate remedy being more effective at achieving the goals stated in the ROD. Since the vertical and horizontal extents of the contamination have not yet been identified, D&B recommends that further investigation or evaluation of existing data in the vicinity of the NCIA gathered by others under separate work

R2-0001459

assignments be performed to finalize the proposed areas of treatment under guidance provided by the NYSDEC.

In addition, D&B's current work assignment includes provisions for the completion of a Pre-Design Investigation and Remedial Design geared toward performance-based specifications for in-well air stripping. Since the alternate remedy of ex-situ pump-and-treat is now recommended, D&B recommends that an updated Remedial Design Work Plan be prepared to address the proposed alternate remedy and field investigation.

R2-0001460

APPENDIX A

NCDPW CORRESPONDENCE

2564

Dvirka
and
Bartilucci
CONSULTING ENGINEERS

330 Crossways Park Drive, Woodbury, New York 11797-2015
516-364-9890 ▪ 718-460-3634 ▪ Fax: 516-364-9045
e-mail: findingsolutions@db-eng.com

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Michael R. Hofgren
Sean Pepling, P.G.
Edward J. Reilly
Daniel Shabat, P.E.
Charles J. Wachsmuth, P.E.

April 27, 2007

Richard Cotugno
Superintendent of Sewage Plants
Cedar Creek Water Pollution Control Plant
3340 Merrick Road
Wantagh, NY 11793

Re: New Cassel Industrial Area
Design Investigation Activities
D&B No. 2564

Dear Mr. Cotagno:

The purpose of this letter is to request authorization to utilize the Nassau County Sanitary Sewer System for discharge of decontamination, development and purge water generated during design investigation activities at the referenced site (refer to Figure 1). The investigation is being conducted on behalf of the New York State Department of Environmental Conservation by Dvirka and Bartilucci Consulting Engineers (D&B) and involves groundwater characterization and plume delineation of the New Cassel Industrial Off-Site Study Area through the use of existing and temporary groundwater monitoring wells that will be sampled as part of this project. The temporary vertical profile well locations are not defined at this time, but will be located in the vicinity of the off-site study area. The designated public sewer manhole locations that will be utilized to discharge the water in the study area will be approved by your office. The discharge to the manholes will be under constant supervision of D&B personnel and all appropriate traffic control will be utilized.

The total discharge quantity for the project, over a three- to four-month period, is expected to be approximately 10,000 gallons. Prior groundwater results in the study area indicated chlorinated volatile organic compounds. It should be noted that D&B had previously obtained authorization from Nassau County to utilize the local sanitary sewer system for similar discharges related to prior investigation activities conducted in 2001 through 2004.

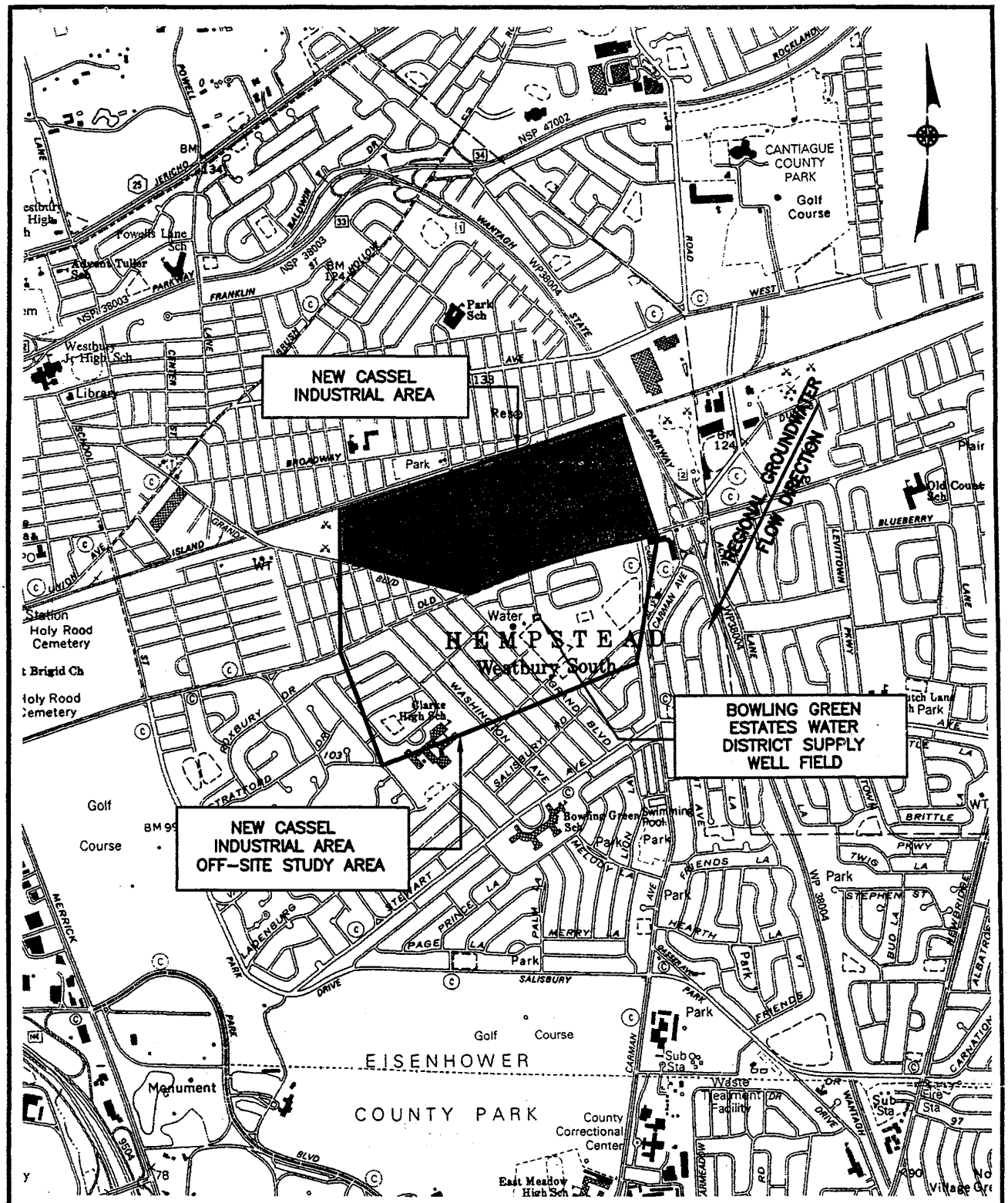
If you have any questions or need additional information, please call me at (516) 364-9890.

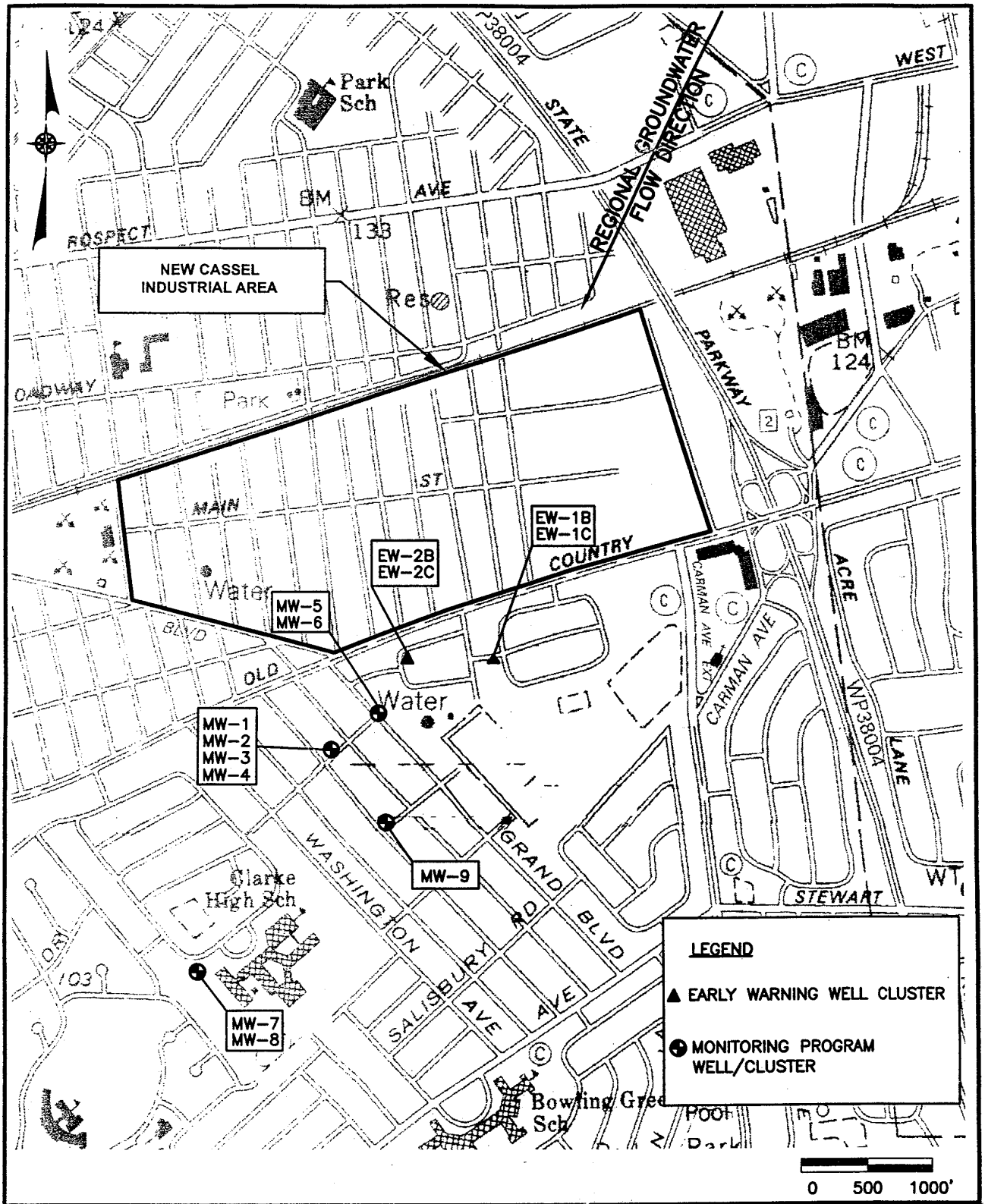
Sincerely,

Keith S. Robins

Keith S. Robins
Senior Geologist

KSR/lb,jmy
cc: T. Jones (NYSDEC)
F. DeVita (D&B)
M. DeVinney (D&B)
♦2564/KSR07LTR-01(R03)


NEW CASSEL INDUSTRIAL AREA
BOWLING GREEN ESTATES WATER DISTRICT SUPPLY WELL FIELD
NEW CASSEL INDUSTRIAL AREA OFF-SITE STUDY AREA
REGIONAL GROUNDWATER FLOW DIRECTION
CANTIAGUE COUNTY PARK
Golf Course
HEMPSTEAD
Westbury South
EISENHOWER
COUNTY PARK
Golf Course
Monument
Waste Treatment Facility
County Correctional Center
East Meadow High Sch
Clarke High Sch
Bowling Green Sch
Swimming Pool
Park Sch
Powells Lane Sch
Edward Tuller Sch
Westbury Jr High Sch
Holy Rood Cemetery
St Brigid Ch
Old Country Sch
Water
Sub Sta
Fire Sta
Park
Golf Course
BM 124
BM 99
NSP 47002
NSP 38003
WP 38004
WANTAGH STATE PARKWAY
NORTHERN STATE PARKWAY
MEADOWBROOK PARKWAY
SALISBURY BLVD
OLD COUNTRY RD
BROADWAY
FRANKLIN AVE
POWELL LANE
JERICHO TPKE
ROCKLAND RD
WEST BLVD
CARMAN AVE
BLUEBERRY LANE
BRITTLE PKWY
STEPHEN ST
FRIENDS LA
MERRICK RD
ARMEDOW RD
CARNATION DR
ALBATROSS RD
SEAMAN AVE
UNION AVE
GRAND ISLAND
SCHOOL ST
CENTER ST
MAPLE DR
HOLLOW DR
WASHINGTON BLVD
STEWART AVE
PRINCE LA
PAGE LA
MERRY LA
MELODY LA
LION AVE
PALM LA
HEARTH LA
TWIG LA
BUD LA
TOWN LA
FOXBURY DR
LADENBURG DR
PARK DRIVE
WANTAGH DRIVE
95S
95N
135
107
106
108
97
NEW CASTLE INDUSTRIAL AREA
REMEDIAL DESIGN WORK PLAN
SITE LOCATION MAP
0
2000
SCALE IN FEET
Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.
FIGURE 1
F:\2564\2564-1.dwg, FIG 1-1, 11/02/06 04:34:15 PM, PMartorano
R2-0001464



NEW CASSEL INDUSTRIAL AREA
REMEDIAL DESIGN WORK PLAN

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

WELL LOCATION MAP

FIGURE 2

\\Nt4\CADwork\25641\25641-3.dwg, 11/06/06 09:05:33 AM, MDeVinney

THOMAS R. SUOZZI
COUNTY EXECUTIVE

RAYMOND A. RIBEIRO, P.E.
COMMISSIONER

COUNTY OF NASSAU
DEPARTMENT OF PUBLIC WORKS
1194 Prospect Avenue
Westbury, New York 11590-2723

May 9, 2007

Mr. Keith S. Robins
Dvirka and Bartilucci, Consulting Engineers
330 Crossways Park Drive
Woodbury, New York 11797-2015

Re: Disposal of Development and Monitoring Well Purge Water
New Cassel Industrial Area, New Cassel, New York

Dear Mr. Robins:

This letter is in response to your letter dated April 27, 2007, requesting approval to dispose of approximately 10,000 gallons of development and monitoring well purge water to the County's Sanitary Sewer System located at the above referenced site.

The request is hereby conditionally approved. The purge water collected from the developments and the monitoring wells will be batched and each batch must be analyzed by Method 8260 for volatile organics prior to discharge. All batches of purge water must have a Total Volatile Organics level not to exceed 1 part per million (ppm). This approval is limited to only the liquid phase wastes pumped from the above referenced site's monitoring wells. The water can be discharged at a rate not to exceed 100 gallons per minute (gpm).

This Department reserves the right to cancel this temporary approval at any time. Please notify this office prior to any discharges at (516) 571-7353, such that this Department can approve the designated public sewer manhole to be used.

In accordance with requirements of this Department, a disposal fee of $500.00 shall be accessed. A check in the amount of $500.00, made payable to the "Nassau County Treasurer" must be remitted, in advance to:

Nassau County Department of Public Works
Cedar Creek Water Pollution Control Plant
3340 Merrick Road
Wantagh, New York 11793-4341
Attn: Peter J. Witkowski

If you have any questions concerning the above matter, please call me at (516) 571-7352.

Very truly yours,

Peter J. Witkowski
Director of Hazardous Waste Services

PJW:jld

c. Joseph L. Davenport, NCDPW
Richard Cotugno, NCDPW

Dvirka and Bartilucci
CONSULTING ENGINEERS

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Christopher W. Francis
Michael R. Hofgren
Edward J. Reilly
Daniel Shabat, P.E.
Charles J. Wachsmuth, P.E.

February 8, 2008

Mr. Peter J. Witkowski
Nassau County Department of Public Works
Cedar Creek Water Pollution Control Plant
3340 Merrick Road
Wantagh, NY 11793-4341

Re: Disposal of Development and Monitoring Well Purge Water
New Cassel Industrial Area
New Cassel, New York
D&B No. 2564

Dear Mr. Witkowski:

As requested during our phone conversation on January 10, 2008, Dvirka and Bartilucci Consulting Engineers (D&B) has prepared this letter to outline the procedures that will be implemented to comply with your May 9, 2007 correspondence regarding the disposal of groundwater monitoring well development and purge water associated with the completion of the above referenced project.

As you are aware, D&B will be completing a remedial investigation on behalf of the New York State Department of Environmental Conservation (NYSDEC). The project involves groundwater characterization and plume delineation of the New Cassel Industrial Off-Site Study Area through the use of existing and temporary groundwater monitoring wells. D&B submitted a formal request to the Nassau County Department of Public Works (NCDPW) dated April 27, 2007 for authorization to discharge decontamination, development and purge water generated during the investigation activities. The NCDPW conditionally approved the discharge in its correspondence dated May 9, 2007, subject to the following conditions:

- The discharge be "batched", sampled and analyzed for volatile organic compounds utilizing United States Environmental Protection Agency (USEPA) Method 8260;
- Each batch must contain no more than 1 part-per-million (ppm) total volatile organic compounds (VOCs);

- Only liquid phase waste pumped from the above referenced site's monitoring wells shall be discharged;
- The water must be discharged at a rate not to exceed 100 gallons-per-minute (gpm); and
- A disposal fee of $500 be remitted to the NCDPW.

Upon receipt of the authorization, D&B contacted you to discuss the above requirements on January 10 and again on February 7, 2008. Among the items discussed were results of historic groundwater sampling conducted at the existing monitoring wells. In particular, D&B explained that groundwater concentrations at those locations were, for the most part, less than 1 ppm total VOCs. However, 5 of the 13 existing wells sampled exhibited VOC concentrations exceeding 1 ppm. The maximum historic VOC concentration was 5.46 ppm. See Attachment 1 for a summary of the most recent VOC sampling conducted at the existing monitoring wells.

Based upon these conversations, it is our understanding that the NCDPW is willing to approve the direct discharge of decontamination, development and purge water generated during the sampling of the 13 existing monitoring wells to the NCDPW sanitary sewer. As part of D&B's investigation, groundwater samples will be collected from the existing wells and will be analyzed for total VOCs via USEPA Method 8260 and the results will be transmitted to the NCDPW for your records. Pending the results of the existing monitoring well sampling, D&B will contact the NCDPW to determine any additional requirements which may be warranted with regard to the discharge of decontamination, development and purge water during completion of the temporary wells.

It should be noted that D&B also intends to discharge decontamination water generated during the program in addition to the well development and purge water. This water will be similar in nature to the well development and purge water, but will also contain sediment and an environmentally safe detergent used in decontamination procedures. In addition, it is our understanding that since the work is being completed on behalf of the NYSDEC under the State Superfund program, the $500 fee will be waived.

The designated sanitary sewer manhole locations that will be utilized to discharge the water during the investigation will be coordinated with the NCDPW prior to initiating investigation activities.

If you have any questions and/or comments regarding the above, please do not hesitate to contact me at (516) 364-9890.

Very truly yours,

Frank DeVita
Environmental Engineer

FD/MRDt/lb,kap
Attachments
cc: J. Jones (NYSDEC)
J. Dyber (NYSDEC)
R. Walka (D&B)
♦2564\FD08LTR-01(R05)

ATTACHMENT 1

TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	EW-1B	EW-1B	EW-1B	EW-1B	EW-1B	EW-1B	EW-1B	EW-1B	Contract	NYSDEC Class GA
Sample Depth, ft	154-164	154-164	154-164	154-164	154-164	154-164	154-164	154-164	Required	Groundwater
Date of Collection	09/25/01	01/28/02	04/25/02	07/18/02	10/16/02	01/29/03	05/08/03	07/30/03	Detection	Standard or
Dilution Factor	1.0	50.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	39	45	39	38	47 D	31	31	28	0.5	5 ST
Methylene Chloride	U	26	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	0.6	U	U	0.8	U	0.7	0.51	0.52	0.5	5 ST
1,1-Dichloroethane	3.8	U	10	7	8	6	4.5	3.1	0.5	5 ST
2,2-Dichloropropane	**	U	U	U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	58 **D	87	64 D	44 D	68 D	53 D	50 D	39	0.5	5 ST
Chloroform	U	U	0.3 J	U	9	U	U	U	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	40	59	52 D	41 D	59 D	34 D	40 D	31	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	U	U	0.5	5 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	66 D	120	91 D	67 D	87 D	64 D	71 D	40 D	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	630 D	1000	780 D	640 D	830 D	470 D	670 D	420 D	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	1.1	U	U	2	2	2	1.7	1	0.5	3 ST
1,4-Dichlorobenzene	0.7	U	0.8	0.9	U	0.9	0.86	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	0.57	1.8	0.5	—
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	1	U	1.6		0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	2	U	0.71	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	0.8	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	839.2	1337	1037.1	840.7	1111.8	663.6	871.74	565.13		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2 -dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

R2-0001474

TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	EW-1B	EW-1B	EW-1B	EW-1B	EW-1B	EW-1B	EW-1B	EW-1B	Contract	NYSDEC Class GA
Sample Depth, ft	154-164	154-164	154-164	154-164	154-164	154-164	154-164	154-164	Required	Groundwater
Date of Collection	12/09/03	03/10/04	12/09/04						Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	U	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	23	19	15						0.5	5 ST
Methylene Chloride	U	U	U						0.5	5 ST
trans-1,2-Dichloroethene	0.49 J	U	U						0.5	5 ST
1,1-Dichloroethane	3.5	3 J	2 J						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	39	38	29						0.5	5 ST
Chloroform	U	U	U						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	28	25	13						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U*	U	2 J						0.5	5 ST
1,2-Dichloroethane	U*	U	U						0.5	0.6 ST
Trichloroethene	39 D	48	32						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	390 D	500 D	370 D*						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	0.9 J	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	U	U	U						0.5	---
Benzene	U	U	U						0.5	1 ST
Toluene	U	U	1 J						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	1 J						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	1.3	NA	U						0.5	5 ST
4-Chlorotoluene	1.1	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	1.4	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	U						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	---
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	---
Methyl Acetate	NA	U	NA						0.5	---
Methylcyclohexane	NA	U	NA						0.5	---
Total VOCs	526.79	633.9	465	0	0	0	0	0		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2 -dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
U*: Result qualified as non-detect based on validation criteria
D*: result quailfied as estimated based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	EW-1C	EW-1C	EW-1C	EW-1C	EW-1C	EW-1C	EW-1C	EW-1C	Contract	NYSDEC Class GA
Sample Depth, ft	506-516	506-516	506-516	506-516	506-516	506-516	506-516	506-516	Required	Groundwater
Date of Collection	09/25/01	01/28/02	04/25/02	07/18/02	10/16/02	01/29/03	05/08/03	07/30/03	Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
Methylene Chloride	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
2,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	U	U	U	U	U	U	U	U	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	0.5	0.6	U	0.49 J	0.5	5 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	12	13	15	13	18	21	13	20	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	U	0.6	5	U	2	U	U	0.78	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	U	U	0.5	---
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U*	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	12	13.6	20	13	20.5	21.6	13	21.27		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	EW-1C	EW-1C	EW-1C	EW-1C	EW-1C	EW-1C	EW-1C	EW-1C	Contract	NYSDEC Class GA
Sample Depth, ft	506-516	506-516	506-516	506-516	506-516	506-516	506-516	506-516	Required	Groundwater
Date of Collection	12/11/03	03/10/04	12/08/04						Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	U	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	U	U	U						0.5	5 ST
Methylene Chloride	U	U	U						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	U	U	U						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	U	0.2 J	U						0.5	5 ST
Chloroform	U	0.3 J	U						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	U	U	U						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U	0.3 J	U						0.5	5 ST
1,2-Dichloroethane	U	U	U						0.5	0.6 ST
Trichloroethene	14	18	20						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	0.86	0.8 J	U						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	U	U	U						0.5	—
Benzene	U	U	1.3						0.5	1 ST
Toluene	U	U	3 J						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	4 J						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	2 J						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	3 J						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	U						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	—
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	—
Methyl Acetate	NA	U	NA						0.5	—
Methylcyclohexane	NA	U	NA						0.5	—
Total VOCs	14.86	19.6	33.3	0	0	0	0	0		—

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
—: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	EW-2B	EW-2B	EW-2B	EW-2B	EW-2B	EW-2B	EW-2B	EW-2B	Contract	NYSDEC Class GA
Sample Depth, ft	132-142	132-142	132-142	132-142	132-142	132-142	132-142	132-142	Required	Groundwater
Date of Collection	09/25/01	01/28/02	04/25/02	07/19/02	10/16/02	01/29/03	05/08/03	07/28/03	Detection	Standard or
Dilution Factor	1.0	5.0	5.0	5.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	51 D	32	24	29	32	28	29	37	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	2.6	U	24	19	U	U	U	U	0.5	5 ST
Fluorotrichloromethane	0.6	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	43 D	10	8	U	7	5	5.5	5.9	0.5	5 ST
Methylene Chloride	1.5	3 J	U	U	U	U	U	U*	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethane	150 D	24	9	5	4	3	3.3	4.7	0.5	5 ST
2,2-Dichloropropane	**	U		U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	36 **	25	19	18	19	19	17	18	0.5	5 ST
Chloroform	U	U	U	U	U	0.5	0.5	0.56	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	85 D	16	8	5	4	3	3.1	3.6	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	U	U	0.5	5 ST
1,2-Dichloroethane	0.7	U	0.5	U	0.6	0.7	0.67	U	0.5	0.6 ST
Trichloroethene	140 D	130	100 D	84 D	98	110 D	93 D	95 D	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	20	21	17	21	17	16	18	16	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	1.3	U	U	U	0.9	1	1.1	0.78	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	0.5	U	U	U	U	U	0.87	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	U	U	0.5	----
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	532.2	261	209.5	181	182.5	186.2	172.04	181.54		----

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
----: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	EW-2B	EW-2B	EW-2B	EW-2B	EW-2B	EW-2B	EW-2B	EW-2B	Contract	NYSDEC Class GA
Sample Depth, ft	132-142	132-142	132-142	132-142	132-142	132-142	132-142	132-142	Required	Groundwater
Date of Collection	12/10/03	03/10/04	12/08/04						Detection	Standard or
Dilution Factor	1.0	5.0	1.0	5.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	27	25	34						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	U	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	4.5	4 J	4 J						0.5	5 ST
Methylene Chloride	U	U	U						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	2.9	2 J	3 J						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	17	16	16						0.5	5 ST
Chloroform	U	0.4 J	U						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	2.8	2 J	2 J						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U	U	U						0.5	5 ST
1,2-Dichloroethane	0.66	U	U						0.5	0.6 ST
Trichloroethene	74 D	89	77						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	16	18	15						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	1	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	U	U	U						0.5	---
Benzene	U	U	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	27	31						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	---
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	---
Methyl Acetate	NA	U	NA						0.5	---
Methylcyclohexane	NA	U	NA						0.5	---
Total VOCs	145.86	183.4	151	0	0	0	0	0		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	EW-2C	EW-2C	EW-2C	EW-2C	EW-2C	EW-2C	EW-2C	EW-2C	Contract	NYSDEC Class GA
Sample Depth, ft	504-514	504-514	504-514	504-514	504-514	504-514	504-514	504-514	Required	Groundwater
Date of Collection	09/25/01	01/28/02	04/25/02	07/19/02	10/16/02	01/29/03	05/08/03	07/29/03	Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
Methylene Chloride	U	U	U	U	U	U	U	U*	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
2,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	U	U	U	U	U	U	U	U	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	U	U	0.5	5 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	U	U	U	U	U	U	0.7	U	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	U	U	U	1	U	0.8	1.8	U	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	U	U	0.5	---
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U	1.4	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	0	0	0	1	0	0.8	2.5	1.4		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2 -dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	EW-2C	EW-2C	EW-2C	EW-2C	EW-2C	EW-2C	EW-2C	EW-2C	Contract	NYSDEC Class GA
Sample Depth, ft	504-514	504-514	504-514	504-514	504-514	504-514	504-514	504-514	Required	Groundwater
Date of Collection	12/11/03	03/10/04	12/08/04						Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	U	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	U	U	U						0.5	5 ST
Methylene Chloride	U	U	U						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	U	U	U						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	U	U	U						0.5	5 ST
Chloroform	U	U	U						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	U	U	U						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U	U	U						0.5	5 ST
1,2-Dichloroethane	U	U	U						0.5	0.6 ST
Trichloroethene	U	U	U						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	U	U	U						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	U	U	U						0.5	---
Benzene	U	U	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	U						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	---
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	---
Methyl Acetate	NA	U	NA						0.5	---
Methylcyclohexane	NA	U	NA						0.5	---
Total VOCs	0	0	0	0	0	0	0	0		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2 -dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

R2-0001481

TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-1	MW-1	MW-1	MW-1	MW-1	MW-1	MW-1	MW-1	Contract	NYSDEC Class GA
Sample Depth, ft	90-110	90-110	90-110	90-110	90-110	90-110	90-110	90-110	Required	Groundwater
Date of Collection	11/02/01	01/24/02	04/25/02	07/16/02	10/17/02	02/03/03	05/06/03	07/30/03	Detection	Standard or
Dilution Factor	1.0	1.0	2.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	16	8	26	24	49	33	19	17	0.5	5 ST
Methylene Chloride	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethane	2.8	2	5	4	6	7	3.5	2.5	0.5	5 ST
2,2-Dichloropropane	**	U		U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	1.1 **	1	3	3	5	5	2.1	1.6	0.5	5 ST
Chloroform	0.5	U	U	1	2	2	1.3	U	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	7.8	4	10 J	10	15	16	7.8	5.9	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	U	U	0.5	5 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	21	16	52 DJ	55 E	79	51 D	34	27	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	4.1	3	9	9	13	10	5.8	7.6	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	U	3.4	0.5	—
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U*	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	53.3	34	105	106	169	124	73.5	65		—

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
—: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-1	MW-1	MW-1	MW-1	MW-1	MW-1	MW-1	MW-1	Contract	NYSDEC Class GA
Sample Depth, ft	90-110	90-110	90-110	90-110	90-110	90-110	90-110	90-110	Required	Groundwater
Date of Collection	12/09/03	03/10/04	12/07/04						Detection	Standard or
Dilution Factor	1.0	1.0	2.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	U	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	19	25	21						0.5	5 ST
Methylene Chloride	U	U	U						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	3.7	5 J	5						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	2.5	4 J	3 J						0.5	5 ST
Chloroform	1.3	2 J	1 J						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	7.6	10 J	8						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U*	U	U						0.5	5 ST
1,2-Dichloroethane	U*	U	U						0.5	0.6 ST
Trichloroethene	38	55	37						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	8	10	7						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	0.78	0.5 J	U						0.5	---
Benzene	U	U	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	2 J						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	---
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	---
Methyl Acetate	NA	U	NA						0.5	---
Methylcyclohexane	NA	U	NA						0.5	---
Total VOCs	80.88	111.5	82	0	0	0	0	0		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
☐ Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-2	MW-2	MW-2	MW-2	MW-2	MW-2	MW-2	MW-2	Contract	NYSDEC Class GA
Sample Depth, ft	110-130	110-130	110-130	110-130	110-130	110-130	110-130	110-130	Required	Groundwater
Date of Collection	11/02/01	01/24/02	04/24/02	07/16/02	10/18/02	02/03/03	05/06/03	07/30/03	Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	1	2	U	0.8	0.9	0.7	0.86	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	540 D	440 D	480 D	190 E	420	130 D	230 D	310 D	0.5	5 ST
Methylene Chloride	1.9	U	U	U	0.9	U	U*	0.74	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	0.77	0.5	5 ST
1,1-Dichloroethane	140 D	140 D	140 D	52 E	95	63 D	83 D	70 D	0.5	5 ST
2,2-Dichloropropane	**	U		U	U		U	U	0.5	5 ST
cis-1,2-Dichloroethene	48 **E	35	42 D	17	39	38	32	36	0.5	5 ST
Chloroform	5.2	2	4	2 B	4	4	4.9	4.4	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	230 D	220 D	210 D	75 E	140	82 D	100 D	110 D	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	0.8	U	0.5	5 ST
1,2-Dichloroethane	2.2	U	2	U	2	2	2	1.6	0.5	0.6 ST
Trichloroethene	580 D	500 D	450 D	190 E	360	210 D	320 D	350 D	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	1.5	2	U	U	1	2	1.4	1.2	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	49 JD	53 D	52 D	26	50	39	38 D	45 D	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	U	U	0.5	---
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U*	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	1597.8	1393	1382	552	1112.7	570.9	812.8	930.57		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2 -dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

R2-0001484

TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-2	MW-2	MW-2	MW-2	MW-2	MW-2	MW-2	MW-2	Contract Required Detection Limit	NYSDEC Class GA Groundwater Standard or Guidance Value
Sample Depth, ft	110-130	110-130	110-130	110-130	110-130	110-130	110-130	110-130		
Date of Collection	12/09/03	03/10/04	12/07/04							
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0		
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	1.1	0.8 J	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	220 D	250 D	300 D						0.5	5 ST
Methylene Chloride	0.76	U	U						0.5	5 ST
trans-1,2-Dichloroethene	0.53	U	U						0.5	5 ST
1,1-Dichloroethane	65 D	87	53						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	29	30	30						0.5	5 ST
Chloroform	4.3	3 J	3 J						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	93 D	140	130						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U	U	17						0.5	5 ST
1,2-Dichloroethane	1.5	1 J	1 J						0.5	0.6 ST
Trichloroethene	240 D	290 D	380 D						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	1.3	U	2 J						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	38 D	43	42						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	U	U	U						0.5	---
Benzene	U	U	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	3 J						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	---
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	---
Methyl Acetate	NA	U	NA						0.5	---
Methylcyclohexane	NA	U	NA						0.5	---
Total VOCs	694.49	844.8	958	0	0	0	0	0		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2 -dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-3	MW-3	MW-3	MW-3	MW-3	MW-3	MW-3	MW-3	Contract	NYSDEC Class GA
Sample Depth, ft	130-150	130-150	130-150	130-150	130-150	130-150	130-150	130-150	Required	Groundwater
Date of Collection	11/02/01	01/24/02	04/24/02	07/16/02	10/16/02	02/03/03	05/06/03	07/30/03	Detection	Standard or
Dilution Factor	1.0	1.0	50.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	0.7	1	U	1	U	1	0.7	0.98	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	900 D	770 D	390 D	670 E	275 D	190 D	380 D	730 D	0.5	5 ST
Methylene Chloride	7.1	U	50 D	3	0.9	3	U*	2.2	0.5	5 ST
trans-1,2-Dichloroethene	0.5	U	U	U	U	U	U	1	0.5	5 ST
1,1-Dichloroethane	230 D	250 D	130 D	210 E	70 D	110 D	140 D	150 D	0.5	5 ST
2,2-Dichloropropane	**	U	**	U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	54 **E	40	25 **D	40 E	21	34	32	34 D	0.5	5 ST
Chloroform	5.7	3	U	U	2	4	4.1	4.1	0.5	7 ST
Bromochloromethane	U	U	U	4 B	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	350 D	350 D	160 D	270 E	107 D	120 D	180 D	270 D	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	0.93	U	0.5	5 ST
1,2-Dichloroethane	5.1	U	U	U	2	5	3.4	4.1	0.5	0.6 ST
Trichloroethene	1200 D	1000 D	490 D	920 E	322 D	440 D	700 D	1000 D	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	2.1	2	U	2	0.8	2	2	1.7	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	67 E	74 D	28 D	70 E	22	27 D	55 D	73 D	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	U	U	0.5	—
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U*	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	2822.2	2490	1273	2190	822.7	936	1498.13	2271.08		—

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
*: Sample result highly estimated, based on validation criteria
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
—: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-3	MW-3	MW-3	MW-3	MW-3	MW-3	MW-3	MW-3	Contract Required Detection Limit	NYSDEC Class GA Groundwater Standard or Guidance Value
Sample Depth, ft	130-150	130-150	130-150	130-150	130-150	130-150	130-150	130-150		
Date of Collection	12/09/03	03/10/04	12/07/04							
Dilution Factor	10.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0		
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	0.5 J	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	380	500 D	280 D						0.5	5 ST
Methylene Chloride	U	U	U						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	100	110	77						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	29	30	23						0.5	5 ST
Chloroform	U	3 J	2 J						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	170	200 D	110						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U*	U	15						0.5	5 ST
1,2-Dichloroethane	U*	U	1 J						0.5	0.6 ST
Trichloroethene	580 D	700 D	440 D						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	1 J						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	51	55	34						0.5	5 ST
Dibromochloromethane	U	U	25						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	0.4 J	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	U	U	U						0.5	—
Benzene	U	0.1 J	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	2 J						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	----
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	----
Methyl Acetate	NA	U	NA						0.5	—
Methylcyclohexane	NA	U	NA						0.5	----
Total VOCs	1310	1599	1008	0	0	0	0	0		—

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
*: Sample result highly estimated, based on validation criteria
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
—: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-4	MW-4	MW-4	MW-4	MW-4	MW-4	MW-4	MW-4	Contract	NYSDEC Class GA
Sample Depth, ft	180-200	180-200	180-200	180-200	180-200	180-200	180-200	180-200	Required	Groundwater
Date of Collection	11/02/01	01/24/02	04/24/02	07/16/02	10/17/02	02/03/03	05/06/03	07/30/03	Detection	Standard or
Dilution Factor	1.0	1.0	50.0	1.0	10.0	10.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	0.7	1	U	U	U	1	1.1	0.95	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	1100 D	750 D	530 D	520 D	911 D	660 D	550 D	720 D	0.5	5 ST
Methylene Chloride	8.9	U	55 D	U	7	3	U*	3.6	0.5	5 ST
trans-1,2-Dichloroethene	0.8	U	U	U	U	U	0.54	1.5	0.5	5 ST
1,1-Dichloroethane	310 D	280 D	180 D	170 D	310	250 D	250 D	200 D	0.5	5 ST
2,2-Dichloropropane	**	U	**	U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	82 **E	64 D	43 **D	38 D	64	57 D	57 D	43 D	0.5	5 ST
Chloroform	2.4	3	U	37 BD	4 J	3	3.2	3	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	350 D	280 D	180 D	170 D	320	270 D	190 D	210 D	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	1.2	U	0.5	5 ST
1,2-Dichloroethane	7	U	U	U	7	6	5.6	6.4	0.5	0.6 ST
Trichloroethene	1000 D	790 D	550 D	480 D	895 D	760 D	750 D	680 D	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	3.6	3	U	4	4 J	3	3	2.7	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	150 D	130 D	38 D*	77 D	130	120 D	99 D	110 D	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	U	U	0.5	---
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	3015.4	2301	1576	1496	2652	2163	1910.64	1981.15		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-4	MW-4	MW-4	MW-4	MW-4	MW-4	MW-4	MW-4	Contract	NYSDEC Class GA
Sample Depth, ft	180-200	180-200	180-200	180-200	180-200	180-200	180-200	180-200	Required	Groundwater
Date of Collection	12/09/03	03/10/04	38328						Detection	Standard or
Dilution Factor	10.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	1 J	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	600 D	850 D	620 D						0.5	5 ST
Methylene Chloride	U	3 J	2 J						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	200	210 D	150 D						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	45	47	36						0.5	5 ST
Chloroform	U	3 J	3 J						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	250	280 D	230 D						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U*	U	39						0.5	5 ST
1,2-Dichloroethane	8.1	7 J	7						0.5	0.6 ST
Trichloroethene	680 D	780 D	630 D						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	3 J						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	120	140	150						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	0.4 J	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	U	U	U						0.5	---
Benzene	U	0.2 J	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	7						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	---
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	---
Methyl Acetate	NA	U	NA						0.5	---
Methylcyclohexane	NA	U	NA						0.5	---
Total VOCs	1903.1	2321.6	1870	0	0	0	0	0		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*:Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-5	MW-5	MW-5	MW-5	MW-5	MW-5	MW-5***	MW-5	Contract	NYSDEC Class GA
Sample Depth, ft	90-110	90-110	90-110	90-110	90-110	90-110	90-110	90-110	Required	Groundwater
Date of Collection	11/05/01	01/24/02	04/25/02	07/17/02	10/18/02	01/30/03	05/07/03	07/29/03	Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	5.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	0.68	U	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U		U	U	0.5	5 ST
1,1-Dichloroethene	11	10	3	2	8	55 D	180 D	17	0.5	5 ST
Methylene Chloride	U	U	U	U	U	U	U*	U*	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethane	1.5	2	0.8	U	2	13	50 D	6.4	0.5	5 ST
2,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	U	0.5	1	6	12	6	9.4	U	0.5	5 ST
Chloroform	U	U	0.3 J	U	U	U	1.2	0.55	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	15	15	4	3	7	39	190 D	35	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	0.74	U	0.5	5 ST
1,2-Dichloroethane	U	U	U	U	U	U	0.99	U	0.5	0.6 ST
Trichloroethene	2.5	2	2	1	7	35	84 D	2.6	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	3.7	16	25	19	9	18	64 D	11	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	0.72	U	0.5	---
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	33.7	45.5	36.1	31	45	166	581.73	72.55		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

***: Based upon review of historical results and the 8th quarter results it appears that samples MW-5 and MW-6 were inadvertantly switched during the May 2003 sampling event.

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-5	MW-5	MW-5	MW-5	MW-5	MW-5	MW-5***	MW-5	Contract	NYSDEC Class GA
Sample Depth, ft	90-110	90-110	90-110	90-110	90-110	90-110	90-110	90-110	Required	Groundwater
Date of Collection	12/10/03	03/08/04	12/07/04						Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	5.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	U	4 J						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	13	21	210 D						0.5	5 ST
Methylene Chloride	U	U	U						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	5.6	11	140						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	U	U	U						0.5	5 ST
Chloroform	U	U	U						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	31	64	560 D						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U*	U	82						0.5	5 ST
1,2-Dichloroethane	U	U	U						0.5	0.6 ST
Trichloroethene	1.4	1 J	13						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	5.6	7 J	14						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	U	0.5 J	U						0.5	----
Benzene	U	U	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	U						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	----
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	----
Methyl Acetate	NA	U	NA						0.5	----
Methylcyclohexane	NA	U	NA						0.5	----
Total VOCs	56.6	104.5	1023	0	0	0	0	0		----

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
----: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for
***: Based upon review of historical results and the 8th quarter results it appears that samples MW-5 and MW-6 were inadvertantly switched during the May 2003 sampling event.

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-6	MW-6	MW-6	MW-6	MW-6	MW-6	MW-6***	MW-6	Contract	NYSDEC Class GA
Sample Depth, ft	110-130	110-130	110-130	110-130	110-130	110-130	110-130	110-130	Required	Groundwater
Date of Collection	11/05/01	01/25/02	04/26/02	07/17/02	10/18/02	01/30/03	05/07/03	07/29/03	Detection	Standard or
Dilution Factor	1.0	1.0	10.0	1.0	5.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	1.4	0.5	5 ST
Fluorotrichloromethane	U	U	1 J	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	270 D	72 D	100 D	99 D	135	150 D	36	190 D	0.5	5 ST
Methylene Chloride	1.3	U	U	5 D	U	12	U	U*	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethane	52 D	36	33	29	31	47 D	8.4	68 D	0.5	5 ST
2,2-Dichloropropane	**	U	**	U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	22 **	13	9 **	9	21	15	2.5	7.4	0.5	5 ST
Chloroform	1.1	U	1	U	U	1	U	1.4	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	240 D	89 D	96 D	90 D	122	170 D	23	270 D	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	U	U	0.5	5 ST
1,2-Dichloroethane	0.8	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	93 D	54 D	43	51 D	59	89 D	27	45 D	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	80 D	37 D	68 E	47 D	60	58 D	15	56 D	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	1 B	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	U	U	0.5	---
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	761.2	301	351	330	428	542	111.9	639.2		—

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

***: Based upon review of historical results and the 8th quarter results it appears that samples MW-5 and MW-6 were inadvertantly switched during the May 2003 sampling event.

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-6	MW-6	MW-6	MW-6	MW-6	MW-6	MW-6***	MW-6	Contract	NYSDEC Class GA
Sample Depth, ft	110-130	110-130	110-130	110-130	110-130	110-130	110-130	110-130	Required	Groundwater
Date of Collection	12/10/03	03/08/04	12/07/04						Detection	Standard or
Dilution Factor	1.0	1.0	10.0	1.0	5.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	5						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	2	2 J	22						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	180 D	290 D	970 D						0.5	5 ST
Methylene Chloride	0.58	U	7						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	83 D	130	1700 D						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	10	13	12						0.5	5 ST
Chloroform	1.4	1	U						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	300 D	480 D	2300 D						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U*	U	290 D						0.5	5 ST
1,2-Dichloroethane	U*	U	U						0.5	0.6 ST
Trichloroethene	60 D	110	76						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	51 D	91	78						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	0.83	U	U						0.5	---
Benzene	U	U	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	5 J						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	---
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	---
Methyl Acetate	NA	U	NA						0.5	---
Methylcyclohexane	NA	U	NA						0.5	---
Total VOCs	688.81	1117	5460	0	0	0	0	0		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

***: Based upon review of historical results and the 8th quarter results it appears that samples MW-5 and MW-6 were inadvertantly switched during the May 2003 sampling event.

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-7	MW-7	MW-7	MW-7	MW-7	MW-7	MW-7	MW-7	Contract	NYSDEC Class GA
Sample Depth, ft	90-110	90-110	90-110	90-110	90-110	90-110	90-110	90-110	Required	Groundwater
Date of Collection	11/05/01	01/25/02	04/24/02	07/16/02	10/18/02	01/29/03	05/07/03	07/30/03	Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	0.5	0.7	2	0.5	0.6	0.74	1.8	0.5	5 ST
Methylene Chloride	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethane	0.7	1	1	2	1	2	1.4	1.8	0.5	5 ST
2,2-Dichloropropane	**	U	**	U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	23 **	18	15 **	18	22	27	15	19	0.5	5 ST
Chloroform	U	U	U	U	U	U	U	U	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	U	0.5	0.6	2	0.5	0.7	0.7	1.1	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	U	U	0.5	5 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	2	3	3	8	4	4	2.6	6	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	5.2	6	4	6	U	7	5.3	7.8	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	2	U	2	1.6	3.7	0.5	---
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	30.9	29	24.3	40	28	43.3	27.34	41.2		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

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TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-7	MW-7	MW-7	MW-7	MW-7	MW-7	MW-7	MW-7	Contract	NYSDEC Class GA
Sample Depth, ft	90-110	90-110	90-110	90-110	90-110	90-110	90-110	90-110	Required	Groundwater
Date of Collection	12/10/03	03/08/04	12/07/04						Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	U	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	0.47 J	U	U						0.5	5 ST
Methylene Chloride	U	U	U						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	1	1 J	U						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	12	12	8						0.5	5 ST
Chloroform	U	U	U						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	U	0.3 J	U						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U	U	U						0.5	5 ST
1,2-Dichloroethane	U	U	U						0.5	0.6 ST
Trichloroethene	1.6	2 J	1 J						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	4.1	5 J	2 J						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	1.1	0.8 J	U						0.5	---
Benzene	U	U	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	U						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	---
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	---
Methyl Acetate	NA	U	NA						0.5	---
Methylcyclohexane	NA	U	NA						0.5	---
Total VOCs	20.27	21.1	11	0	0	0	0	0		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
☐ Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

R2-0001495

TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-8	MW-8	MW-8	MW-8	MW-8	MW-8	MW-8	MW-8	Contract	NYSDEC Class GA
Sample Depth, ft	120-140	120-140	120-140	120-140	120-140	120-140	120-140	120-140	Required	Groundwater
Date of Collection	11/05/01	01/25/02	04/24/02	07/17/02	10/18/02	01/29/03	05/07/03	07/30/03	Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	0.8	U	0.5	1	1	1.5	2.3	0.5	5 ST
Methylene Chloride	U	0.6	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	0.9	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethane	1.3	2	2	1	3	3	2.7	3.4	0.5	5 ST
2,2-Dichloropropane	**	U	**	U	U	U	U	U	0.5	5 ST
cis-1,2-Dichloroethene	1.7 **	2	2 **	2	4	4	3.5	4.3	0.5	5 ST
Chloroform	U	U	U	U	U	U	0.57	U	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1-Trichloroethane	0.7	0.7	0.8	U	1	1	1.3	1.4	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	U	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	U	U	0.5	5 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	1.1	2	U*	0.8	2	2	2.3	3.6	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	U	U	0.5	5 ST
Tetrachloroethene	1.1	1	1	0.8	2	3	1.5	2.9	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	U	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	U	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	U	U	U	U	U	0.5	----
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	U	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Total VOCs	5.9	9.1	6.7	5.1	13	14	13.37	17.9		----

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
----: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value

R2-0001496

TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-8	MW-8	MW-8	MW-8	MW-8	MW-8	MW-8	MW-8	Contract Required Detection Limit	NYSDEC Class GA Groundwater Standard or Guidance Value
Sample Depth, ft	120-140	120-140	120-140	120-140	120-140	120-140	120-140	120-140		
Date of Collection	12/10/03	03/08/04	12/07/04							
Dilution Factor	1.0	1.0	1.0							
Units	(ug/l)	(ug/l)	(ug/l)						(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U						0.5	5 ST
Chloromethane	U	U	U						0.5	5 ST
Vinyl Chloride	U	U	U						0.5	2 ST
Bromomethane	U	U	U						0.5	5 ST
Chloroethane	U	U	U						0.5	5 ST
Fluorotrichloromethane	U	U	U						0.5	5 ST
1,1-Dichloroethene	1.4	1 J	2 J						0.5	5 ST
Methylene Chloride	U	U	U						0.5	5 ST
trans-1,2-Dichloroethene	U	U	U						0.5	5 ST
1,1-Dichloroethane	3	3 J	3 J						0.5	5 ST
2,2-Dichloropropane	U	NA	U						0.5	5 ST
cis-1,2-Dichloroethene	3.6	3 J	3 J						0.5	5 ST
Chloroform	U	0.3 J	U						0.5	7 ST
Bromochloromethane	U	NA	U						0.5	5 ST
1,1,1-Trichloroethane	1.3	1 J	1 J						0.5	5 ST
1,1-Dichlorpropene	U	NA	U						0.5	5 ST
Carbon Tetrachloride	U	U	U						0.5	5 ST
1,2-Dichloroethane	U	U	U						0.5	0.6 ST
Trichloroethene	2.4	2 J	2 J						0.5	5 ST
1,2-Dichloropropane	U	U	U						0.5	1 ST
Bromodichloromethane	U	U	U						0.5	50GV
Dibromomethane	U	NA	U						0.5	5 ST
cis-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U						0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U						0.5	1 ST
1,3-Dichloropropane	U	NA	U						0.5	5 ST
Tetrachloroethene	2.3	2 J	2 J						0.5	5 ST
Dibromochloromethane	U	U	U						0.5	50GV
Chlorobenzene	U	U	U						0.5	5 ST
1,1,1,2-Tetrachloroethane	U	NA	U						0.5	5 ST
Bromoform	U	U	U						0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U						0.5	5 ST
1,2,3-Trichloropropane	U	NA	U						0.5	0.04 ST
Bromobenzene	U	NA	U						0.5	5 ST
1,3-Dichlorobenzene	U	U	U						0.5	3 ST
1,4-Dichlorobenzene	U	U	U						0.5	3 ST
1,2-Dichlorobenzene	U	U	U						0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U						0.5	5 ST
Hexchlorobutadiene	U	NA	U						0.5	0.5 ST
1,2,3-Trichlorobenzene	U	NA	U						0.5	5 ST
Methyl-tert-butyl ether	U	U	U						0.5	---
Benzene	U	U	U						0.5	1 ST
Toluene	U	U	U						0.5	5 ST
Ethylbenzene	U	U	U						0.5	5 ST
m-Xylene	U	U	U						0.5	5 ST
p-Xylene	U	U	U						0.5	5 ST
o-Xylene	U	U	U						0.5	5 ST
Styrene	U	U	U						0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U						0.5	5 ST
n-Propylbenzene	U	NA	U						0.5	5 ST
1,3,5-Trimethylbenzene	U	NA	U						0.5	5 ST
2-Chlorotoluene	U	NA	U						0.5	5 ST
4-Chlorotoluene	U	NA	U						0.5	5 ST
tert-Butylbenzene	U	NA	U						0.5	5 ST
1,2,4-Trimethylbenzene	U	NA	U						0.5	5 ST
sec-Butylbenzene	U	NA	U						0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	NA	U						0.5	5 ST
n-Butylbenzene	U	NA	U						0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	U	U						0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	U	U						0.5	0.04 ST
1,2-Dibromoethane	NA	U	U						0.5	0.0006 ST
2-Butanone	NA	U	U						0.5	50 GV
2-Hexanone	NA	U	U						0.5	50 GV
4-Methyl-2-pentanone	NA	U	U						0.5	---
Acetone	NA	U	U						0.5	50 GV
Carbon Disulfide	NA	U	U						0.5	---
Methyl Acetate	NA	U	NA						0.5	---
Methylcyclohexane	NA	U	NA						0.5	---
Total VOCs	14	12.3	13	0	0	0	0	0		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

R2-0001497

TABLE 2
NEW CASSEL INDUSTRIAL AREA
OFF-SITE GROUNDWATER MONITORING AND ASSESSMENT PROGRAM
MONITORING WELL SAMPLE RESULTS
VOLATILE ORGANIC COMPOUNDS

Sample Identification	MW-9	MW-9	MW-9	MW-9	MW-9	MW-9	MW-9	MW-9	Contract	NYSDEC Class GA
Sample Depth, ft	310-315	310-315	310-315	310-315	310-315	310-315	310-315	310-315	Required	Groundwater
Date of Collection	07/17/02	10/18/02	02/03/03	05/09/03	08/01/03	12/08/03	03/10/04	12/09/04	Detection	Standard or
Dilution Factor	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	Limit	Guidance Value
Units	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)	(ug/l)
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
Fluorotrichloromethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	1	2	U*	1.3	1.3	1.5	0.7 J	U	0.5	5 ST
Methylene Chloride	U	U	0.8	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethane	U	U	U*	U	U	U	U	U	0.5	5 ST
2,2-Dichloropropane	**	U	U	U	U	U	NA	U	0.5	5 ST
cis-1,2-Dichloroethene	0.8 **	1	1	0.81	0.67	0.63	U	U	0.5	5 ST
Chloroform	U	U	U	U	0.72	0.73	0.8 J	1 J	0.5	7 ST
Bromochloromethane	U	U	U	U	U	U	NA	U	0.5	5 ST
1,1,1-Trichloroethane	2	2	U*	1.6	1.5	1.5	1 J	1 J	0.5	5 ST
1,1-Dichlorpropene	U	U	U	U	U	U	NA	U	0.5	5 ST
Carbon Tetrachloride	U	U	U	U	U	U	U	U	0.5	5 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	15	21	22	13	13	11	8	5 J	0.5	5 ST
1,2-Dichloropropane	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Dibromomethane	U	U	U	U	U	U	NA	U	0.5	5 ST
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	0.5	0.4 ST *
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.5	1 ST
1,3-Dichloropropane	U	U	U	U	U	U	NA	U	0.5	5 ST
Tetrachloroethene	1	1	2	0.67	1.1	1.3	0.6 J	U	0.5	5 ST
Dibromochloromethane	U	U	U	U	U	U	U	U	0.5	50GV
Chlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,1,2-Tetrachloroethane	U	U	U	U	U	U	NA	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	0.5	50GV
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichloropropane	U	U	U	U	U	U	NA	U	0.5	0.04 ST
Bromobenzene	U	U	U	U	U	U	NA	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	0.5	3 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	0.5	5 ST
Hexchlorobutadiene	U	U	U	U	U	U	NA	U	0.5	0.5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	NA	U	0.5	5 ST
Methyl-tert-butyl ether	U	U	U	0.51	U	U	U	U	0.5	---
Benzene	U	U	U	U	U	U	U	U	0.5	1 ST
Toluene	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	0.5	5 ST
m-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
p-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	0.5	5 ST
Isopropylbenzene (Cumene)	U	U	U	U	U	U	U	U	0.5	5 ST
n-Propylbenzene	U	U	U	U	U	U	NA	U	0.5	5 ST
1,3,5-Trimethylbenzene	U	U	U	U	U	U	NA	U	0.5	5 ST
2-Chlorotoluene	U	U	U	U	U	U	NA	U	0.5	5 ST
4-Chlorotoluene	U	U	U	U	U	U	NA	U	0.5	5 ST
tert-Butylbenzene	U	U	U	U	U	U	NA	U	0.5	5 ST
1,2,4-Trimethylbenzene	U	U	U	U	U	U	NA	U	0.5	5 ST
sec-Butylbenzene	U	U	U	U	U	U	NA	U	0.5	5 ST
p-Isopropyltoluene(p-Cymene)	U	U	U	U	U	U	NA	U	0.5	5 ST
n-Butylbenzene	U	U	U	U	U	U	NA	U	0.5	5 ST
1,1,2-Trichlorotrifluoroethane	NA	NA	NA	NA	NA	NA	U	U	0.5	5 ST
1,2-Dibromo-3-chloropropane	NA	NA	NA	NA	NA	NA	U	U	0.5	0.04 ST
1,2-Dibromoethane	NA	NA	NA	NA	NA	NA	U	U	0.5	0.0006 ST
2-Butanone	NA	NA	NA	NA	NA	NA	U	U	0.5	50 GV
2-Hexanone	NA	NA	NA	NA	NA	NA	U	U	0.5	50 GV
4-Methyl-2-pentanone	NA	NA	NA	NA	NA	NA	U	U	0.5	---
Acetone	NA	NA	NA	NA	NA	NA	U	U	0.5	50 GV
Carbon Disulfide	NA	NA	NA	NA	NA	NA	U	U	0.5	---
Methyl Acetate	NA	NA	NA	NA	NA	NA	U	NA	0.5	---
Methylcyclohexane	NA	NA	NA	NA	NA	NA	U	NA	0.5	---
Total VOCs	19.8	27.0	25.8	17.9	18.3	16.66	11.1	7		---

QUALIFIERS:
U: Compound analyzed for but not detected
J: Compound found at a concentration below the CRDL, value estimated
**: Result reported as a sum of 2,2- dichloropropane and cis-1,2-dichloroethene
E: Compound concentration exceeds instrument calibration range, value estimated
D: Result taken from reanalysis at a secondary dilution
B: Compound found in the method blank as well as the sample
U*: Result qualified as non-detect based on validation criteria

NOTES:
*: Value pertains to the sum of the isomers
ST: Standard
GV: Guidance Value
---: Not established
Indicates value exceeds NYSDEC Class GA groundwater standard or guidance value
NA: Not Analyzed for

R2-0001498

THOMAS R. SUOZZI
COUNTY EXECUTIVE

RAYMOND A. RIBEIRO, P.E.
COMMISSIONER

COUNTY OF NASSAU
DEPARTMENT OF PUBLIC WORKS
1194 Prospect Avenue
Westbury, New York 11590-2723

February 19, 2008

Mr. Frank DeVita
Dvirka and Bartilucci, Consulting Engineers
330 Crossways Park Drive
Woodbury, New York 11797-2015

Re: Disposal of Decontamination, Development and Monitoring Well Purge Water
New Cassel Industrial Area, New Cassel, New York

Dear Mr. DeVita:

This letter is in response to your letter dated February 8, 2008, requesting approval to dispose decontamination, development and monitoring well purge water from 13 existing groundwater monitoring wells to the County's Sanitary Sewer System resulting form sampling activities at the above referenced site.

The request is hereby conditionally approved. The analytical results for each of the 13 monitoring wells will be transmitted to this Department for our records. Based on past sampling data, water from the 13 monitoring wells will have a Total Volatile Organics level of approximately 1 part per million (ppm). This approval is limited to only the liquid phase wastes pumped from the above referenced site's monitoring wells. The water can be discharged at a rate not to exceed 100 gallons per minute (gpm).

This Department reserves the right to cancel this temporary approval at any time. Please notify this office prior to any discharges at (516) 571-7353, such that this Department can approve the designated public sewer manhole to be used.

If you have any questions concerning the above matter, please call me at (516) 571-7352.

Very truly yours,

Peter J. Witkowski
Director of Hazardous Waste Services

PJW:jld

c. Joseph L. Davenport, NCDPW
Richard Cotugno, NCDPW

Y:\INDUSTRIAL PRETREATMENT PROGRAM\SEWER DISCHARGES\SEWER DISCHARGES - 2008\D&B NEW CASSEL INDUSTRIAL AREA DEVELOPMENT AND PURGE WATER DISPOSAL 2-08 APPROVAL.DOC

Matt DeVinney

From: Frank DeVita
Sent: Thursday, May 29, 2008 2:49 PM
To: Peter Witkowski (E-mail)
Cc: Jeffrey Dyber (E-mail); Al Jaroszewski (E-mail); Matt DeVinney
Subject: New Cassel Industrial Area Site (D&B Job no. 2564) - Disposal of Development and Purge Water

Peter,

As a follow-up to our February 8, 2008 letter (see copy attached below), please find attached to this e-mail the analytical results of the initial groundwater sampling conducted at the New Cassel Industrial Area which included sampling of the 13 existing groundwater monitoring wells. As shown by the attached tables, the total VOC concentrations ranged from 1 ppb to 3,523 ppb, with an average total VOC concentration of 555 ppb (0.555 ppm).

At this time, Dvirka and Bartilucci Consulting Engineers (D&B) is moving forward with the second phase of the pre-design investigation program which includes the installation of seven 285' deep and two 500' deep vertical profile borings. Decontamination, development and purge water similar in nature to the water discharged during the sampling of the 13 existing groundwater monitoring wells will be generated during the second phase of the project. As a result, D&B is requesting approval for the direct discharge of decontamination, development and purge water to the Nassau County sanitary sewer system for the second phase of the project, which is tentatively scheduled to begin on June 10, 2008. Attached to this e-mail is a map depicting the approximate location of the 9 vertical profile borings. The boring locations are generally situated in close proximity to Nassau County sanitary sewer manholes, which will be accessed for discharge in accordance with the previously utilized procedures.

Please do not hesitate to contact me at 516-364-9890 with any questions and/or comments regarding the above, or if you need any additional information.

Thank you for your time,

Existing Well Sampling Results...

Vertical Profile Location Plan...

FRANK DeVITA
Dvirka and Bartilucci Consulting Engineers
330 Crossways Park Drive
Woodbury, New York 11797
(516) 364-9890 (Office)
(516) 364-9045 (Fax)
(516) 852-7228 (Cell)
e-mail: fdevita@db-eng.com

TABLE 1

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

EXISTING MONITORING WELL SAMPLING

TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	MW-1	MW-2	MW-3	MW-4	MW-5	MW-6	MW-7	MW-8	MW-9	EW-1B	EW-2B	EW-1C	EW-2C	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	90-110	110-130	130-150	180-200	90-110	110-130	90-110	120-140	310-315	154-164	132-142	506-516	504-514		
Date of Collection	2/25/2008	2/25/2008	2/25/2008	2/25/2008	2/26/2008	2/26/2008	2/26/2008	2/26/2008	2/28/2008	2/27/2008	2/27/2008	2/27/2008	2/27/2008		
Dilution Factor	1/10	1/5	1/25	1/50	1.0	1/80	1.0	1.0	1/2	1/8	1/4	1/2	1.0		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	0.94	U	U	U	U	11	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	9.8	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	23 D	62 D	180 D	810 D	2.2	840 D	U	0.77	6.9	4.2	2.6	0.34 J	U	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	1.3	1.8	18	U	2.3	U	U	U	U	20	0.5	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	0.22 J	2	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	210 E	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	0.38 J	0.24 J	U	U	5.8	0.35 J	0.51	0.32 J	4.1	U	U	U	0.5	10 GV
1,1-Dichloroethane	22 D	28 D	67 D	160 D	1.1	970 D	0.33 J	1.4	2.6	0.79	1.6	0.47 J	U	0.5	5 ST
cis-1,2-Dichloroethene	3.3	6.1	13	31 D	U	5.2	4.5	1	3.6	7.4	6.5	1.1	U	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	0.47 J	0.78	1.4	1.6	U	1.2	U	0.25 J	0.55	U	U	0.39 J	U	0.5	7 ST
1,1,1-Trichloroethane	20 D	22 D	60 D	250 D	3.9	1400 D	U	0.41 J	3.8	2.8	1.1	0.25 J	U	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	0.89	U	0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	4.5	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	17	70 D	310 D	910 D	0.32 J	59 D	0.78	1.6	19 D	17	42 D	20 D	0.5 J	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	1	2	U	U	U	U	U	U	U	U	U	0.5	1 ST
Tetrachloroethene	91 D	31 D	37 D	140 D	0.5 J	18	1.7	1.1	4.7	74 D	11	0.96	U	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	0.42 J	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

R2-0001502

TABLE 1

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

EXISTING MONITORING WELL SAMPLING

TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	MW-1	MW-2	MW-3	MW-4	MW-5	MW-6	MW-7	MW-8	MW-9	EW-1B	EW-2B	EW-1C	EW-2C	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	90-110	110-130	130-150	180-200	90-110	110-130	90-110	120-140	310-315	154-164	132-142	506-516	504-514		
Date of Collection	2/25/2008	2/25/2008	2/25/2008	2/25/2008	2/26/2008	2/26/2008	2/26/2008	2/26/2008	2/28/2008	2/27/2008	2/27/2008	2/27/2008	2/27/2008		
Dilution Factor	1/10	1/5	1/25	1/50	1.0	1/80	1.0	1.0	1/2	1/8	1/4	1/2	1.0		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
m/p-Xylenes	0.55 B*	0.27 BJ*	0.34 BJ*	0.41 BJ*	0.42 J	0.29 BJ*	0.25 J	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	0.38 J	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	0.41 J	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	0.23 J	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Total Targeted VOCs	177	222	672	2,331	8	3,523	8	7	41	110	96	25	1		--
Total TICs	0 J	0 J	0 J	0 J	0 J	0 J	0 J	0 J	0	0	0 J	0	0		--
Total VOCs	177	222	672	2,331	8	3,523	8	7	41	110	98	25	1		--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001503

TABLE 2

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

EXISTING MONITORING WELL SAMPLING

DESIGN PARAMETERS

Sample ID Sample Depth, ft Date of Collection	MW-1 90-110 2/25/2008	MW-2 110-130 2/25/2008	MW-3 130-150 2/25/2008	MW-4 180-200 2/25/2008	MW-5 90-110 2/26/2008	MW-6 110-130 2/26/2008	MW-7 90-110 2/26/2008	MW-8 120-140 2/26/2008	MW-9 310-315 2/28/2008	EW-1B 154-164 2/27/2008	EW-2B 132-142 2/27/2008	EW-1C 506-516 2/27/2008	EW-2C 504-514 2/27/2008	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Chloride, mg/L	53	58	43	51	420	250	25	20	21	28	28	15	13	4.0	250 ST
Nitrogen, Nitrate (as N), mg/L	3.3	3.9 D	3.1	7	3.5	8.2	3.9	5.6	3.1	6.2	2.6	8	4.8 D	0.13	10 ST
Sulfate, mg/L	31	22	20	10	22	32	17	22	14	16	10	U	5.7	5	250 ST
Alkalinity, Total (as $CaCO_3$), mg/L	U	29	U	24	U	U	U	U	U	U	U	21	U	20	--
Ferrous Iron, mg/L	U	U	U	U	U	U	U	U	U	U	U	U	U	1	0.3 ST
Carbon Dioxide, Free, mg/L	130	120	310	100	110	82	90	110	120	72	85	38	24	10	--
Total Organic Carbon, mg/L	U	U	U	U	U	U	U	U	U	U	U	U	U	10	--
Methane, ug/L	U	U	63	U	U	U	U	U	U	U	28	U	U	14	--
Calcium, ug/L	12,200	13,700	8,930	10,700	38,200	37,700	9,240	10,600	6,960	6,570	6,720	10,300	7,870	5,000	--
Magnesium, ug/L	4,060	5,160	3,730	3,960	6,130	11,900	3,380	4,560	2,350	2,640	3,010	4,220	3,240	2,000	35,000 GV
Manganese, ug/L	779	334	40.1 B	28.2 B	201	417	9.1 B	82.8	9.5 B	20.2 B	15 B	125	43.4 B	50	500 ST*

Qualifiers:

U: Compound analyzed for but not detected.

B: Compound detected at a concentraion above IDL but below the CRDL.

D: Compound analyzed at a secondary dilution.

Notes:

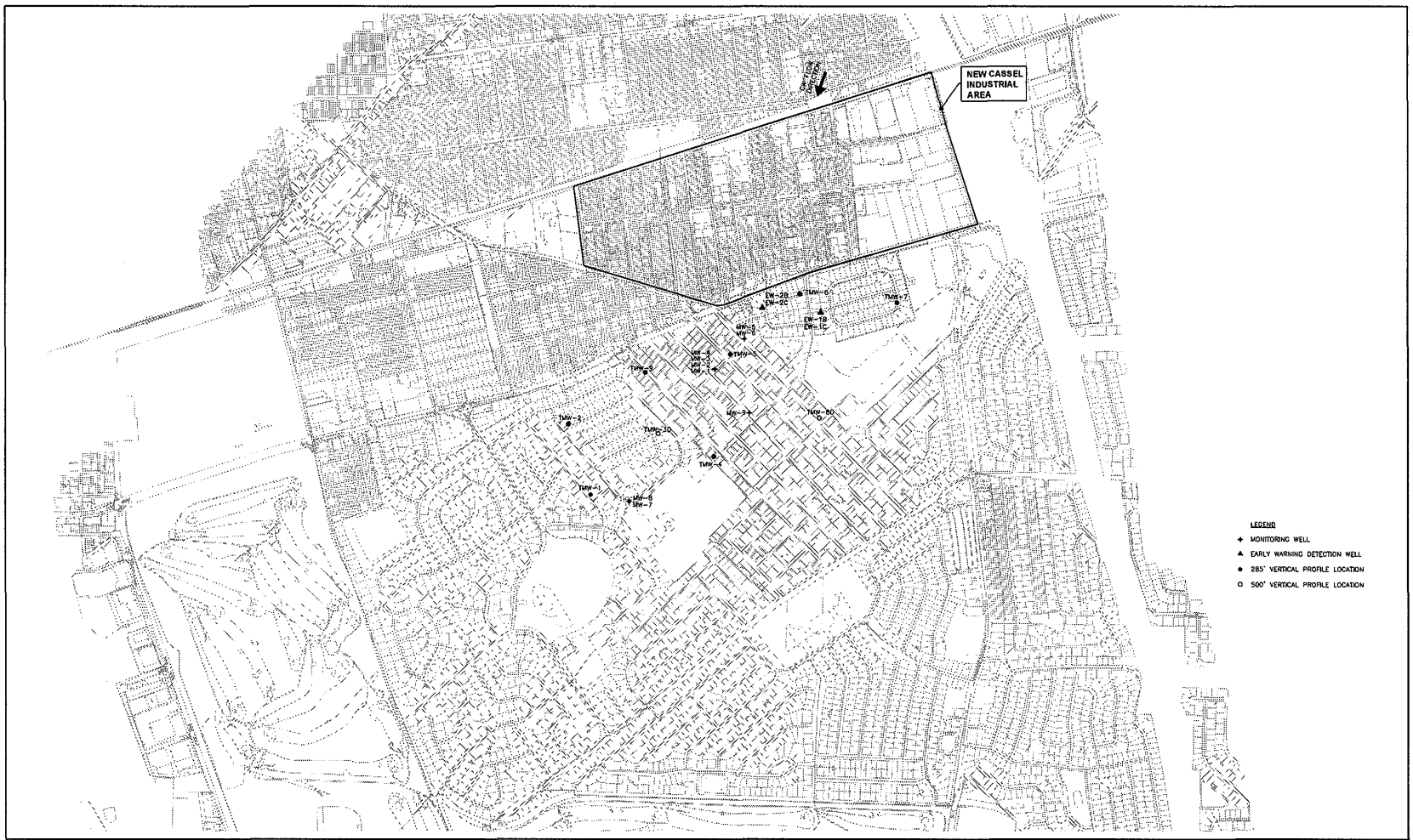
--: Not established

ST: Standard

ST*: Standard applies to the sum of the iron and manganese concentrations.

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value



NO.	DATE	REVISION	INT.

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PROJECT ENGINEER	APPROVED BY
FD	LVG
DESIGNED BY	CHECKED BY
MD	FD

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NASSAU COUNTY NEW YORK
NEW CASSEL INDUSTRIAL AREA
PRE-DESIGN INVESTIGATION

VERTICAL PROFILE LOCATION PLAN

PROJECT NO.	DRAWING NO.
2564	1
DATE	
MAY 2008	
SCALE	
1"=500'	

R2-0001506

THOMAS R. SUOZZI
COUNTY EXECUTIVE

RAYMOND A. RIBEIRO, P.E.
COMMISSIONER

COUNTY OF NASSAU
DEPARTMENT OF PUBLIC WORKS
1194 Prospect Avenue
Westbury, New York 11590-2723

June 2, 2008

Mr. Frank DeVita
Dvirka and Bartilucci, Consulting Engineers
330 Crossways Park Drive
Woodbury, New York 11797-2015

Re: Disposal of Decontamination, Development and Monitoring Purge Water, Phase II Work
New Cassel Industrial Area, New Cassel, New York

Dear Mr. DeVita:

This letter is in response to your request dated May 29, 2008, requesting approval to dispose decontamination, development and monitoring purge water from the installation of seven (7) deep vertical profile borings to the County's Sanitary Sewer System resulting form sampling activities at the above referenced site.

The request is hereby conditionally approved. The analytical results for each of the seven (7) deep vertical profile borings will be transmitted to this Department for our records. Based on expected water quality, the seven (7) vertical profile borings should have an avergage Total Volatile Organics level of approximately 1 part per million (ppm). This approval is limited to only the liquid phase wastes pumped from the above referenced site's monitoring wells. The water can be discharged at a rate not to exceed 100 gallons per minute (gpm).

This Department reserves the right to cancel this temporary approval at any time. Please notify this office prior to any discharges at (516) 571-7353, such that this Department can approve the designated public sewer manhole to be used.

If you have any questions concerning the above matter, please call me at (516) 571-7352.

Very truly yours,

Peter J. Witkowski
Director of Hazardous Waste Services

PJW:jld

c. Joseph L. Davenport, Deputy Commissioner of Public Works for Engineering
Richard Cotugno, NCDPW

Y:\INDUSTRIAL PRETREATMENT PROGRAM\SEWER DISCHARGES - SPECIAL OR ONE TIME\SEWER DISCHARGES - 2008\D&B NEW CASSEL INDUSTRIAL AREA DEVELOPMENT AND PURGE WATER DISPOSAL PHASE II 6-08 APPROVAL.DOC

PRIVILEGED AND CONFIDENTIALITY NOTICE
The information in this fax is intended for the named recipients only. It may contain privileged and confidential matter. If you have received this fax in error, please notify us immediately by a collect telephone call to (516) 364-9890 and return the original to the sender my mail. We will reimburse you for postage. Do not disclose the contents to anyone. Thank-you.

Dvirka and Bartilucci CONSULTING ENGINEERS
330 Crossways Park Drive, Woodbury, New York, 11797-2015
516-364-9890 • Fax: 516-364-9045

D&B FAX NO: (516) 364 - 9045 **DATE: 6/17/08**

COMPANY NAME: NCDPW

ATTENTION: Peter Witkowski

FAX NO.: (516) 571-7357

FROM: Al Jaroszewski

SUBJECT: New Cassel Industrial Area **JOB: 2564**

Disposal of Pre-Design Purgewater

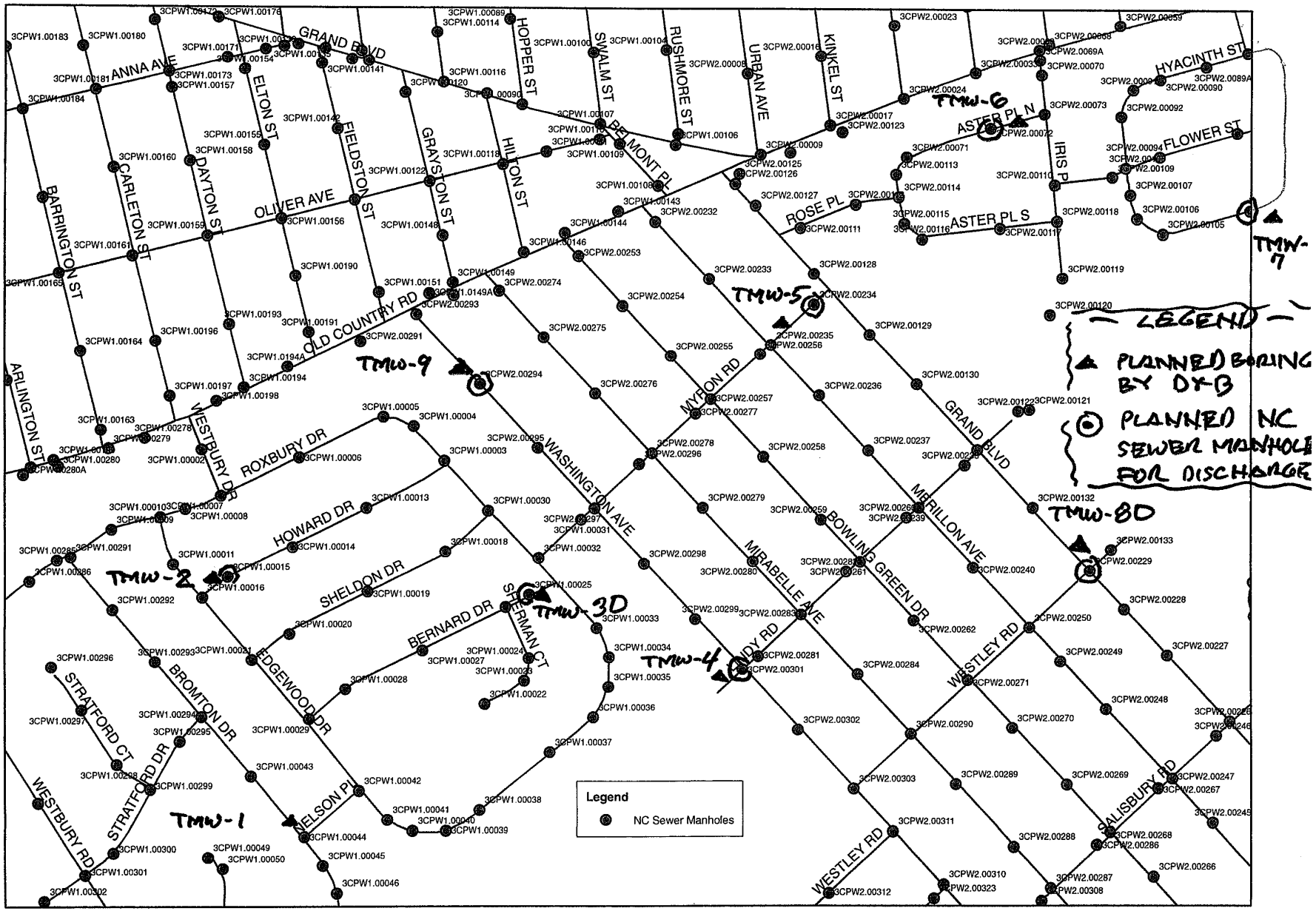
NO. OF PAGES: 2
(including cover sheet)

Peter,

As we discussed on June 12, 2008, and as you requested in your June 2, 2008 letter, attached is a map showing the locations of Nassau County Sewer manholes planned to be used for the discharge of purge water associated with the project profile borings. As you also requested, we will provide you with the volume of water discharged at each of the nine boring locations.

I appreciate your assistance. Please do not hesitate to contact me with any questions.

THANK YOU:



NCIA - PREDESIGN INVESTIGATION

Matt DeVinney

From: Matt DeVinney
Sent: Friday, February 13, 2009 9:50 AM
To: 'pwitkowski@nassaucountyny.gov'
Cc: 'jldyber@gw.dec.state.ny.us'; 'jgjones@gw.dec.state.ny.us'; Frank DeVita
Subject: 2564: NCIA Disposal of Development and Purge Water

Peter,

In accordance with your letter dated June 2, 2008, please find attached to this e-mail the analytical results of the groundwater sampling conducted during the installation of seven vertical profile wells south of the New Cassel Industrial Area. As can be seen from the enclosed, the average VOC concentration from all of the samples was approximately 742 ppb, which is less than the 1,000 ppb (1 ppm) average concentration specified in your letter.

Thank you for all of your assistance with this project. Please do not hesitate to contact me at 516-364-9890 with any questions and/or comments regarding the above, or if you need any additional information.

VerticalProfileGWRe
sults(VOCs)...

MATT DEVINNEY, P.E.
Dvirka and Bartilucci Consulting Engineers
330 Crossways Park Drive
Woodbury, New York 11797
516-364-9890;9045(Fax)
mdevinney@db-eng.com

R2-0001512

TABLE 4-3
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	72	85	115	125	145	165	185	205	225	245	265	285		
Date of Collection	8/29/2008	8/29/2008	8/29/2008	8/28/2008	8/28/2008	8/28/2008	8/28/2008	8/27/2008	8/27/2008	8/27/2008	8/26/2008	8/26/2008		
Dilution Factor	2.5	5	10	40	40	40	10	40	40/400	40	1/40	1/40		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	2.5	66 D	0.5	5 ST
1,1-Dichloroethene	U	U	U	U	U	U	U	U	44	35	9	35 D	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	41	U	0.55	4.7	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	1.2 B	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U	U	U	0.5	10 GV
1,1-Dichloroethane	U	U	U	U	U	U	U	U	U	U	4.2	9.5	0.5	5 ST
cis-1,2-Dichloroethene	U	U	4.6 J	14 J	U	17 J	3.4 J	U	120	100	44 D	85 D	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	U	U	U	U	U	U	U	U	U	U	3.3	2.3	0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	U	U	U	U	21	18 J	5	18	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	0.38 J	0.42 J	0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	31	U	0.47 J	8.1	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	2.1	0.5	0.6 ST
Trichloroethene	1.4	6.7	17	50	42	61	18	95	230	530	61 D	650 D	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	U	U	U	U	U	4.2	1.6	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	1	0.5	1 ST
Tetrachloroethene	29	63	110	270	220	230	110	390	3700 D	750	410 D	530 D	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

R2-0001514

TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1	TMW-1		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	72	85	115	125	145	165	185	205	225	245	265	285			
Date of Collection	8/29/2008	8/29/2008	8/29/2008	8/28/2008	8/28/2008	8/28/2008	8/28/2008	8/27/2008	8/27/2008	8/27/2008	8/26/2008	8/26/2008			
Dilution Factor	2.5	5	10	40	40	40	10	40	40/400	40	1/40	1/40			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	1.3	15		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	0.62		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	0.5	J	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	30	70	132	334	262	308	131	485	4,187	1,433	546	1,431			--
Total TICs	0	0	0	0	0	0	0	0	0	0	1.88	15.4			--
Total VOCs	30	70	132	334	262	308	131	485	4,187	1,433	548	1,446			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001515

TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	195	210	225	245	265	285		
Date of Collection	8/21/2008	8/21/2008	8/20/2008	8/20/2008	8/20/2008	8/19/2008	8/19/2008	8/19/2008	8/19/2008	8/18/2008	8/18/2008	8/18/2008	8/18/2008		
Dilution Factor	4	8	40	10	10	40	1/40	1/25	1/40	1/400	1/200	1/160	1/80		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	3.5	1.9	15	2.7	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	U	U	U	5 J	18 J	15	14	7.6	18	36 E	200 D	7.6	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	0.41 B	0.33 B	1.6 B	0.6 B	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	0.53	U	0.55	3.9	1.9	3.4	0.91	0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U	0.33 J	U	0.55	0.5	10 GV
1,1-Dichloroethane	U	U	U	U	U	U	3.7	7	6.8	6.6	4.3	13	1.4	0.5	5 ST
cis-1,2-Dichloroethene	4.8	8.9	30	12	16	36	120 D	28 D	39 D	350 D	120 D	310 D	91 D	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	U	U	U	U	U	U	2.3	3.1	2.6	11	3.3	19	1.1	0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	3.4 J	U	7.6	7.8	2.7	6.7	21 E	88 D	3.4	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	2.7	0.78	U	4	3.6	0.88	3.2	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	1.3	1.9	0.35 J	U	U	U	0.5	5 ST
Benzene	1.4 J	2.5 J	U	U	3 J	34	120 D	36 D	0.57	6.1	3.8	7.5	28 DJ	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	51	90	230	120	140	310	540 D	200 D	510 D	5100 D	2000 D	2400 D	1400 D	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	0.79	0.45 J	U	2.4	2.2	U	1.8	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	U	0.35 J	0.37 J	U	0.37 J	U	0.43 J	0.34 J	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	0.55	U	0.34 J	1.1	1	0.72	0.37 J	0.5	1 ST
Tetrachloroethene	48	64	130	93	130	250 B	240 D	190 D	490 D	2200 D	1100 D	2700 D	390 D	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	0.75	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	TMW-2	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	195	210	225	245	265	285		
Date of Collection	8/21/2008	8/21/2008	8/20/2008	8/20/2008	8/20/2008	8/19/2008	8/19/2008	8/19/2008	8/19/2008	8/18/2008	8/18/2008	8/18/2008	8/18/2008		
Dilution Factor	4	8	40	10	10	40	1/40	1/25	1/40	1/400	1/200	1/160	1/80		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	6.5	4.9	0.49 J	35 E	22 E	4.4	11	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	0.71	U	U	U	U	U	0.37 J	0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Total Targeted VOCs	105	165	390	225	297	648	1,061	494	1,063	7,749	3,322	5,764	1,944		--
Total TICs	0	0	0	0	0	0	39.79	9.28	0	32.6	21.12	6.69	30.63		--
Total VOCs	105	165	390	225	297	648	1,101	503	1,063	7,782	3,343	5,771	1,975		--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	52	72	92	112	132	152	172	192	212	232	252	272	297		
Date of Collection	10/1/2008	10/1/2008	10/2/2008	10/2/2008	10/3/2008	10/3/2008	10/3/2008	10/6/2008	10/6/2008	10/6/2008	10/7/2008	10/7/2008	10/8/2008		
Dilution Factor	1	1	1	1	1	1	1	1	40	20	40	40	40		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	U	U	0.23 J	U	U	U	2.5	U	**16**	U	**29**	**21**	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	0.43 J	U	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	U	U	0.53	0.42 J	0.48 J	2	3.1	U	U	U	U	U	0.5	10 GV
1,1-Dichloroethane	U	U	U	0.29 J	U	0.28 J	0.39 J	1.4	U	**24**	U	**14 J**	**12 J**	0.5	5 ST
cis-1,2-Dichloroethene	U	U	U	2.4	U	U	3.1	3.4	**39**	**300**	**13 J**	**220**	**160**	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	1.2	U	U	U	0.36 J	0.29 J	0.87	0.31 J	U	**7.7 J**	U	U	**8.5 J**	0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	U	U	U	3.3	U	**5.3 J**	U	**10 J**	U	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	10 J	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	U	U	U	0.92	U	U	**5.2**	3.8	**32**	**130**	**23**	**220**	**180**	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	0.23 J	U	0.21 J	U	U	U	U	U	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Tetrachloroethene	U	U	U	3.2	U	U	**7.1**	**7.9**	**19 J**	**110**	**13 J**	**440**	**360**	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	52	72	92	112	132	152	172	192	212	232	252	272	297		
Date of Collection	10/1/2008	10/1/2008	10/2/2008	10/2/2008	10/3/2008	10/3/2008	10/3/2008	10/6/2008	10/6/2008	10/6/2008	10/7/2008	10/7/2008	10/8/2008		
Dilution Factor	1	1	1	1	1	1	1	1	40	20	40	40	40		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	0.31 J	U	U	U	U	U	0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	0.23 J	0.62	U	U	U	U	U	0.5	5 ST
Total Targeted VOCs	1	0	0	8	1	1	19	27	90	593	49	943	742		–
Total TICs	13.62	0	0	0	5.39	3.8	1	0	0	0	0	0	0		–
Total VOCs	15	0	0	8	6	5	20	27	90	593	49	943	742		–

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

–: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D			Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	312	337	357	377	392	412	432	452	472	492	502				
Date of Collection	10/8/2008	10/8/2008	10/9/2008	10/9/2008	10/10/2008	10/10/2008	10/10/2008	10/11/2008	10/11/2008	10/11/2008	10/11/2008				
Dilution Factor	40	40	40/80	40/80	10	8	2	1	1	1	1				
Units	ug/l	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L			ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U			0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Trichlorofluoromethane	U	51	14 J	U	20	36	38	U	U	U	U			0.5	5 ST
1,1-Dichloroethene	39	55	300	450	7.8	3 J	0.99 J	U	U	U	U			0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U			5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U			0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U			0.5	--
Methylene Chloride	19 BJ	16 BJ	U	U	U	U	U	U	U	U	U			0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U	U			0.5	10 GV
1,1-Dichloroethane	24	23	46	46	7.9	4.1	3.2	U	U	U	U			0.5	5 ST
cis-1,2-Dichloroethene	230	380	360	210	50	36	5.6	U	U	U	U			0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U			5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Chloroform	9.8 J	34	29	14 J	4 J	4.5	0.92 J	U	U	U	U			0.5	7 ST
1,1,1-Trichloroethane	U	11 J	120	200	3.6 J	2 J	0.8 J	U	U	U	U			0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U			0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	1.1	U	U	U	U			0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U			0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	0.6 ST
Trichloroethene	130	620	900 D	930 D	130	110	19	U	U	U	U			0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U			0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U			0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U			0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U			5	--
Toluene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U			0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	1 ST
Tetrachloroethene	380	360	340	160	22	27	1.3	U	U	U	U			0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U			5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U			0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U			0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D	TMW-3D			Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	312	337	357	377	392	412	432	452	472	492	502				
Date of Collection	10/8/2008	10/8/2008	10/9/2008	10/9/2008	10/10/2008	10/10/2008	10/10/2008	10/11/2008	10/11/2008	10/11/2008	10/11/2008				
Dilution Factor	40	40	40/80	40/80	10	8	2	1	1	1	1				
Units	ug/l	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L			ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U			0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U			0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U			0.5	5 ST
Total Targeted VOCs	832	1,550	2,109	2,010	245	223	71	0	0	0	0				--
Total TICs	0	0	0	0	0	0	6.1	0	0	0	0				--
Total VOCs	832	1,550	2,109	2,010	245	223	77	0	0	0	0				--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285		
Date of Collection	8/4/2008	8/4/2008	8/4/2008	8/4/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	7/31/2008	7/31/2008	7/31/2008		
Dilution Factor	1	1	1	5	1/4	1/4	1	1/4	1	1/4	1/5	1/4		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	0.36 J	U	0.3 J	2.9	1.8	7.1	2.1	11	U	4.9	8.1	2.6	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	0.36 J	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	0.3 J	0.68	0.63	1.1	0.68	0.59	0.5	10 GV
1,1-Dichloroethane	U	U	U	3.8 U	2.6	13	0.38 J	1.9	U	0.84	1.2	0.53	0.5	5 ST
cis-1,2-Dichloroethene	U	U	U	U	0.85	1.7	0.55	3.7	U	1.7	2.6	1.4	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	1.3	0.41 J	U	U	0.81	0.81	1	4.6	1	1.3	2.3	2.5	0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	0.6	2	0.58	1.7	U	0.87	1.8	0.78	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	1.1	0.63	0.94	17	8.9	16	11	56 D	1.2	38 D	65 D	29 D	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	0.57	U	U	U	0.69	0.54	U	0.56	U	3	1.9	2.8	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Tetrachloroethene	3.3	9.1	4.6	57	47 D	40 D	1.8	11	0.46 J	5.8	9.4	8.1	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4	TMW-4		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	8/4/2008	8/4/2008	8/4/2008	8/4/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	8/1/2008	7/31/2008	7/31/2008	7/31/2008			
Dilution Factor	1	1	1	5	1/4	1/4	1	1/4	1	1/4	1/5	1/4			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	7	10	6	81	63	81	18	91	3	58	93	48			--
Total TICs	0	0	0	0	0	0	0	0	0	0	0	0			--
Total VOCs	7	10	6	81	63	81	18	91	3	58	93	48			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	8/13/2008	8/13/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/11/2008	8/11/2008	8/11/2008	8/8/2008	8/8/2008			
Dilution Factor	8	8	1/80	1/80	1/160	1/50	1/50	1/50	1/40	1/50	1/20	1/20			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	0.37 J	U	U	U	U	U		0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Vinyl Chloride	U	U	4.5	7.5	8.4	59 D	71 D	81 D	53 D	1.7	3.2	U		0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroethane	U	U	12	14	14	5.3	U	U	U	U	U	U		0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1-Dichloroethene	84	100	1200 DB	1300 DB	1300 DB	1000 DB	690 DB	220 D	150 D	31 D	26 D	18		0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	5.3	8.8	18	31 D	40 D	59 D	47 D	7.9	5.9	0.79		0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	0.32 J	U		0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
Methylene Chloride	U	U	2.5 B	5.2 B	8.6 B	5.6 B	4.2 B	2.5 B	2.6 B	U	U	U		0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	2.1	2.2	1.6	1.4	0.52	0.35 J	0.35 J		0.5	5 ST
Methyl tert-butyl Ether	U	3.5 J	1.9	1.3	1.8	0.35 J	U	U	U	U	U	U		0.5	10 GV
1,1-Dichloroethane	110	120	1000 D	1600 D	1800 D	770 D	280 D	96 D	79 D	7.7	11	9.6		0.5	5 ST
cis-1,2-Dichloroethene	2.9 J	4.5	18	26 DJ	32 E	120 D	130 D	150 D	130 D	60 D	40 D	37 D		0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroform	U	U	1.5	1.8	1.9	6.6	8	4	3.8	2.7	2.9	1.6		0.5	7 ST
1,1,1-Trichloroethane	73	91	1400 D	1400 D	1100 D	440 D	170 D	59 D	43 D	5.5	6.9	5.4		0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	0.3 J	U	U	U		0.5	--
Carbon Tetrachloride	U	U	U	U	U	1.6	1.3	0.79	0.82	0.53	0.43 J	U		0.5	5 ST
Benzene	U	U	U	0.41 J	0.3 J	0.56	0.66	3.5	4.5	U	0.4 J	U		0.5	1 ST
1,2-Dichloroethane	U	U	U	5	5.5	4.8	4.4	3.5	3.9	9.5	8.8	U		0.5	0.6 ST
Trichloroethene	22	38	160 D	200 D	190 D	870 D	990 D	810 D	660 D	590 D	190 D	180 D		0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U		5	--
Toluene	U	U	U	0.36 J	U	0.33 J	0.35 J	U	U	U	2.6	1.1		0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	0.38 J	U	0.85	2.5	2.6	1.6	1.3	0.4 J	U	U		0.5	1 ST
Tetrachloroethene	12	17	66 D	98 D	150 D	330 D	310 D	320 D	280 D	140 D	67 D	38 D		0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.006 ST
Chlorobenzene	U	U	U	U	0.49 J	1	1.2	1.8	1.3	U	U	U		0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5	TMW-5		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	8/13/2008	8/13/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/12/2008	8/11/2008	8/11/2008	8/11/2008	8/8/2008	8/8/2008			
Dilution Factor	8	8	1/80	1/80	1/160	1/50	1/50	1/50	1/40	1/50	1/20	1/20			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	0.35 J	0.3 J	U	U	U		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	304	374	3,872	4,668	4,632	3,651	2,706	1,815	1,461	857	386	292			--
Total TICs	0	0	3.61	3.4	5.5	4.51	7.92	5.5	5.48	5.9	3	1.7			--
Total VOCs	304	374	3,876	4,672	4,637	3,655	2,714	1,820	1,466	863	389	294			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

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TABLE 4-3 (continued)

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

VERTICAL PROFILE WELLS

TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	63	83	103	123	143	163	183	203	223	243	263	283		
Date of Collection	6/25/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/23/2008	6/23/2008	6/23/2008	6/23/2008	6/20/2008	6/20/2008		
Dilution Factor	1.0	1.0	1.0	1/8	1.0	1.0	1.0	1/2.5	1/5	1/2.5	1.0	1.0		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	3.7	4.3	2.4	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	1.7	2.7	3.4	**11**	**5.2**	2.1	4.3	**12**	**44 D**	**30 D**	**18**	**7.3**	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	0.6	3.1	U	0.56	0.26 J	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	U	0.36 J	0.3 J	U	U	U	U	U	U	U	U	0.5	10 GV
1,1-Dichloroethane	1.3	1.9	1.3	0.86	1.5	1.3	3.6	**9.9**	**20**	**33 D**	**12**	**11**	0.5	5 ST
cis-1,2-Dichloroethene	1.1	1.3	1.8	**9.8**	1.6	0.91	**7.5**	**18**	0.81	0.84	0.95	0.68	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	0.23 J	0.33 J	0.47 J	U	U	0.23 J	U	0.45 J	0.4 J	0.33 J	0.22 J	0.21 J	0.5	7 ST
1,1,1-Trichloroethane	0.94	2.2	2.3	**7.9**	4	1.8	3	**6.1**	**16**	**17**	**9.9**	4.8	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Benzene	0.55	0.51	0.21 J	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	**2.4**	U	U	U	U	0.5	0.6 ST
Trichloroethene	5	**8.4**	**11**	**63 D**	**8.9**	**6.2**	**12**	**16**	2.7	**5.8**	2.4	1.2	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	0.24 J	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	1.5	0.79	0.28 J	U	0.4 J	U	U	U	U	U	U	U	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	0.37 J	0.35 J	U	U	0.5	1 ST
Tetrachloroethene	2.9	4.6	**5.5**	**14**	**8.6**	3.5	**6.6**	**22 D**	**48 D**	**5.9**	**16**	**6.4**	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

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TABLE 4-3 (continued)

NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION

NEW CASSEL INDUSTRIAL AREA

VERTICAL PROFILE WELLS

TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6	TMW-6		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	63	83	103	123	143	163	183	203	223	243	263	283			
Date of Collection	6/25/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/24/2008	6/23/2008	6/23/2008	6/23/2008	6/23/2008	6/20/2008	6/20/2008			
Dilution Factor	1.0	1.0	1.0	1/8	1.0	1.0	1.0	1/2.5	1/5	1/2.5	1.0	1.0			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	0.29 J		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	19	27	30	110	30	17	37	87	132	93	59	32			--
Total TICs	5.72 J	8.2 J	5.6 J	0 J	0 J	3.3 J	0 J	1 J	0 J	0 J	0 J	0 J			--
Total VOCs	25	35	35	110	30	20	37	88	132	93	59	32			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/2/2008	7/2/2008	7/2/2008	7/1/2008	7/1/2008	7/1/2008	6/30/2008			
Dilution Factor	50.0	50.0	50/100	50/100	50/100	1/50	1/1000	1/500	1/10	1/10	1/2.5	1/2.5			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	4.8	U	U	U	U	U	U		0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	1.9	1.8	U	U	U	U		0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1-Dichloroethene	U	U	U	U	U	0.3 J	2.4	3	2.7	3.4	0.88	1.1		0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U		0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	1.4	1.3	U	U	U	U		0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	0.7	U	U	U	U	0.34 J	U		0.5	10 GV
1,1-Dichloroethane	U	U	U	U	U	0.35 J	0.9	1.1	5.1	5.3	0.5 J	1.5		0.5	5 ST
cis-1,2-Dichloroethene	11 J	10 J	44	36	32	14	330 DJ	300 D	1	1.2	0.82	0.58		0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroform	U	U	U	U	U	U	0.25 J	0.34 J	0.66	0.65	U	0.38 J		0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	U	0.22 J	1.8	2	1.6	1.7	0.44 J	0.63		0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	10	11	1.6	5.7		0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.6 ST
Trichloroethene	17 J	14 J	45	41	44	21 DJ	390 DJ	300 D	100 D	110 D	35 D	34 D		0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U		5	--
Toluene	U	U	U	U	U	1.3	2.9	2.6	5.6	U	U	1.4		0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
Tetrachloroethene	460	470	870 D	840 D	800 D	720 DB	11,000 DB	6,500 DB	9.3	12	29 D	9.2 B		0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	1.2	0.65	U	U	U	U		0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7	TMW-7		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	65	85	105	125	145	165	185	205	225	245	265	285			
Date of Collection	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/7/2008	7/2/2008	7/2/2008	7/2/2008	7/1/2008	7/1/2008	7/1/2008	6/30/2008			
Dilution Factor	50.0	50.0	50/100	50/100	50/100	1/50	1/1000	1/500	1/10	1/10	1/2.5	1/2.5			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	0.46 J	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	0.69	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	488	494	959	917	876	763	11,734	7,113	136	145	69	54			--
Total TICs	0	0	0	0	0	0	0	0	0	0	0	0			--
Total VOCs	488	494	959	917	876	763	11,734	7,113	136	145	69	54			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

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TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	52	82	92	112	132	152	177	192	212	237	257	272	292		
Date of Collection	10/29/2008	10/30/2008	10/30/2008	10/31/2008	10/31/2008	11/3/2008	11/3/2008	11/4/2008	11/4/2008	11/6/2008	11/7/2008	11/7/2008	11/10/2008		
Dilution Factor	1	1	1	20	20	1	1	1	1	1	10	1	10/25		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	72	0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Methylene Chloride	0.31 JB	U	U	7 BJ	5.4 BJ	0.23 BJ	U	U	U	U	U	U	2.1 J	0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	10 GV
1,1-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	16	0.5	5 ST
cis-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U	U	U	19	0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Chloroform	U	U	U	U	U	U	0.27 J	U	U	0.58	U	1.4	U	0.5	7 ST
1,1,1-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	0.22 J	37	0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.6 ST
Trichloroethene	U	U	U	U	U	U	U	U	U	0.66	U	1.2	360 D	0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	--
Toluene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	1 ST
Tetrachloroethene	U	U	U	U	U	U	U	U	U	U	U	1.6	290 D	0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U	U	5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	3.3	U	U	U	U	U	U	U	0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST

R2-0001530

TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	52	82	92	112	132	152	177	192	212	237	257	272	292		
Date of Collection	10/29/2008	10/30/2008	10/30/2008	10/31/2008	10/31/2008	11/3/2008	11/3/2008	11/4/2008	11/4/2008	11/6/2008	11/7/2008	11/7/2008	11/10/2008		
Dilution Factor	1	1	1	20	20	1	1	1	1	1	10	1	10		
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U	U	0.5	5 ST
Total Targeted VOCs	0	0	0	7	5	4	0	0	0	1	0	4	796		--
Total TICs	0	0	0	0	0	0	0.71	5.63	2.1	0	11	4.33	0		--
Total VOCs	0	0	0	7	5	4	1	6	2	1	11	9	796		--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001531

TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D				Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	312	337	357	372	392	437	457	472	497	502					
Date of Collection	11/10/2008	11/10/2008	11/11/2008	11/11/2008	11/11/2008	11/13/2008	11/13/2008	11/13/2008	11/14/2008	11/14/2008					
Dilution Factor	10/20	10/50	10/40	10	1	2	1.6	1.6	10	10					
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L				ug/L	ug/L
Dichlorodifluoromethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Chloromethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U				0.5	2 ST
Bromomethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Trichlorofluoromethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
1,1-Dichloroethene	73	50	32	25	0.54	4.6	0.96	13	4.2 J	4.2 J				0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Acetone	U	U	U	U	U	U	U	U	U	U				5	50 GV
Carbon Disulfide	U	U	U	U	U	U	U	U	U	U				0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U				0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	3.2 BJ	2.9 BJ				0.5	5 ST
trans-1,2-Dichloroethene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Methyl tert-butyl Ether	U	U	U	U	U	U	U	U	U	U				0.5	10 GV
1,1-Dichloroethane	14	9.9	7.9	6.1	0.57	7.1	1.3	20	3.2 J	U				0.5	5 ST
cis-1,2-Dichloroethene	14	43	26	13	U	5.6	6.8	6.9	15	2.2 J				0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U				5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Chloroform	U	U	U	U	U	0.7 J	1	0.41 J	U	U				0.5	7 ST
1,1,1-Trichloroethane	46	36	25	16	0.43 J	3	0.82	9.7	2.7 J	4.2 J				0.5	5 ST
Cyclohexane	U	U	U	U	U	U	U	U	U	U				0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Benzene	U	U	U	U	U	U	U	U	U	U				0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	U				0.5	0.6 ST
Trichloroethene	280 D	67	38	27	0.32 J	20	23	24	120	14				0.5	5 ST
Methylcyclohexane	U	U	U	U	U	U	U	U	U	U				0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U				0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U				0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U				0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U				5	--
Toluene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
trans-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U				0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U				0.5	1 ST
Tetrachloroethene	86	680 D	420 D	160	0.47 J	10	6.7	5.9	11	14				0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U				5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U				0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U				0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST

R2-0001532

TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D	TMW-8D				Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	312	337	357	372	392	437	457	472	497	502					
Date of Collection	11/10/2008	11/10/2008	11/11/2008	11/11/2008	11/11/2008	11/13/2008	11/13/2008	11/13/2008	11/14/2008	11/14/2008					
Dilution Factor	10/20	10/50	10/40	10	1	2	1.6	1.6	10	10					
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L				ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
o-Xylene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U				0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U				0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U				0.5	5 ST
Total Targeted VOCs	513	886	549	247	2	51	41	80	159	42					--
Total TICs	0	0	0	0	0	0	0	0	0	0					--
Total VOCs	513	886	549	247	2	51	41	80	159	42					--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001533

TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	60	80	100	120	140	160	180	200	220	240	260	280			
Date of Collection	7/21/2008	7/21/2008	7/21/2008	7/21/2008	7/18/2008	7/18/2008	7/18/2008	7/17/2008	7/17/2008	7/17/2008	7/16/2008	7/16/2008			
Dilution Factor	1/2.5	1/2.5	1/2	1/5	1/20	1/25	1/25	1/25	1/5	1	1	1			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
Dichlorodifluoromethane	U	U	0.39 J	1.5	U	U	U	U	U	U	U	U		0.5	5 ST
Chloromethane	0.55	U	0.39 J	U	U	U	U	U	U	U	U	U		0.5	5 ST
Vinyl Chloride	U	U	U	U	U	U	U	U	U	U	U	U		0.5	2 ST
Bromomethane	U	U	0.32 J	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Trichlorofluoromethane	U	U	0.32 J	U	0.35 J	U	0.27 J	1.1	3	6.2	8.5	20		0.5	5 ST
1,1-Dichloroethene	0.53	0.63	0.58	1.1	2.8	2.6	2.5	3.4	1.9	17	20	18		0.5	5 ST
1,1,2-Trichloro-1,2,2-trifluoroethane	0.89	1	0.87	1.5	9.6	13	7.5	4.4	U	U	U	U		0.5	5 ST
Acetone	6.3	U	6.7	U	U	U	U	U	U	U	U	U		5	50 GV
Carbon Disulfide	U	U	0.55	U	U	U	U	U	U	U	U	U		0.5	60 GV
Methyl Acetate	U	U	U	U	U	U	U	U	U	U	U	U		0.5	--
Methylene Chloride	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
trans-1,2-Dichloroethene	U	U	0.31 J	U	U	U	U	U	U	U	U	U		0.5	5 ST
Methyl tert-butyl Ether	U	0.74	1.3	3.9	1.1	0.22 J	U	0.35 J	0.42 J	U	U	U		0.5	10 GV
1,1-Dichloroethane	0.4 J	0.36 J	0.4 J	0.65	1.2	1.7	1.8	3.5	2.9	15	15	16		0.5	5 ST
cis-1,2-Dichloroethene	2.1	2	1.3	3.7	12	23 D	24 D	17	4.4	0.71	0.85	0.84		0.5	5 ST
2-Butanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Bromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Chloroform	0.51	0.53	0.54	1	3.3	8.1	3.9	11	2.5	1.6	1.7	1.7		0.5	7 ST
1,1,1-Trichloroethane	U	U	0.43 J	0.4 J	1.4	1.3	1.1	1.6	0.79	8.5	8.1	8.7		0.5	5 ST
Cyclohexane	U	U	0.31 J	U	U	U	U	U	U	U	U	U		0.5	--
Carbon Tetrachloride	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Benzene	U	U	0.31 J	U	U	U	U	U	U	U	U	U		0.5	1 ST
1,2-Dichloroethane	U	U	U	U	U	U	U	U	U	0.55	0.72	0.96		0.5	0.6 ST
Trichloroethene	12	13	15	28 D	120 D	110 D	99 D	90 D	55 D	15	17	19		0.5	5 ST
Methylcyclohexane	U	U	0.33 J	U	U	U	U	U	U	U	U	U		0.5	--
1,2-Dichloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
Bromodichloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
cis-1,3-Dichloropropene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
4-Methyl-2-Pentanone	U	U	U	U	U	U	U	U	U	U	U	U		5	--
Toluene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
trans-1,3-Dichloropropene	U	U	0.43 J	U	U	U	U	U	U	U	U	U		0.5	0.4 ST*
1,1,2-Trichloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	1 ST
Tetrachloroethene	25 D	25 D	18 D	57 D	210 D	280 D	270 D	270 DB	13 B	2.4 B	3.1	4.3		0.5	5 ST
2-Hexanone	U	U	U	U	U	U	U	U	U	U	U	U		5	50 GV
Dibromochloromethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
1,2-Dibromoethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.006 ST
Chlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Ethylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST

R2-0001534

TABLE 4-3 (continued)
NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION
NEW CASSEL INDUSTRIAL AREA
VERTICAL PROFILE WELLS
TCL VOLATILE ORGANIC COMPOUNDS

Sample ID	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9	TMW-9		Contract Required Detection Limit	NYSDEC TOGS 1.1.1 CLASS GA GROUNDWATER STANDARDS/ GUIDANCE VALUES
Sample Depth, ft	60	80	100	120	140	160	180	200	220	240	260	280			
Date of Collection	7/21/2008	7/21/2008	7/21/2008	7/21/2008	7/18/2008	7/18/2008	7/18/2008	7/17/2008	7/17/2008	7/17/2008	7/16/2008	7/16/2008			
Dilution Factor	1/2.5	1/2.5	1/2	1/5	1/20	1/25	1/25	1/25	1/5	1	1	1			
Units	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L	ug/L		ug/L	ug/L
m/p-Xylenes	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
o-Xylene	U	U	U	U	U	0.9	U	U	U	U	U	U		0.5	5 ST
Styrene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Bromoform	U	U	U	U	U	U	U	U	U	U	U	U		0.5	50 GV
Isopropylbenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,1,2,2-Tetrachloroethane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,3-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,4-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	3 ST**
1,2-Dibromo-3-Chloropropane	U	U	U	U	U	U	U	U	U	U	U	U		0.5	0.04 ST
1,2,4-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
1,2,3-Trichlorobenzene	U	U	U	U	U	U	U	U	U	U	U	U		0.5	5 ST
Total Targeted VOCs	48	43	49	99	362	441	410	402	84	67	75	90			--
Total TICs	6.78 J	3 J	0	0.64 J	0	0	0	0	0	0	0	0			--
Total VOCs	55	46	49	99	362	441	410	402	84	67	75	90			--

Qualifiers:

U: Compound analyzed for but not detected.

J: Compound detected at a concentration below the Contract Required Detection Limit (CRDL), Value estimated.

B: Compound detected in method blank as well as the sample.

D: Compound analyzed at a secondary dilution as noted in column header.

E: Compound concentration exceeds instrument calibration range, value estimated

*: Result qualified as estimated, possibly biased high based on validation criteria

Notes:

TIC: Tentatively Identified Compound

--: Not established

ST: Standard

ST*: Applies to sum of isomers

ST**: Applies to sum of isomers

GV: Guidance Value

: Result exceeds TOGS 1.1.1 class GA Groundwater Standard or Guidance Value

R2-0001535

APPENDIX B

CHAIN OF CUSTODY FORMS, SAMPLE INFORMATION RECORDS, SAMPLE DATA FORMS

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed:_____
- · All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- · Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2015
(516) 364-9890

Project Mgr.: Frank D. Vita

Invoice To: Same

P.O. No.: _____ RQN: _____

Project No.: 2564-02

Site Name: New Cassel Industrial Area

Location: TMW-6 State: NY

Sampler(s): Kevin Metcalf

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Magnesium	Magnesium	Calcium				QA Reporting Notes: (check if needed)
	TMW-6 (283)	6-20-08	12:05	G	GW	2/4	3			3	✓	✓	✓	✓	✓	✓				☐ Provide MA DEP MCP CAM Report ☐ Provide CT DEP RCP Report
	TMW-6 (263)	6-20-08	2:05	G	GW	2/4	3			3	✓	✓	✓	✓	✓	✓				**QA/QC Reporting Level** ☐ Standard ☐ No QC ☐ Other_____ State specific reporting standards:

☐ Fax results when available to (____) _____

☒ E-mail to FDevita@dvirka.com

EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Metcalf		6/20/08	2:35

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R2-0001537

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-6

Sample Date: 6-20-08

Total Well Depth (from top of casing to bottom of screen): 283'

Depth to Water (from top of casing): 44.4'

Well Diameter: 2"

Volume of Standing Water in well: 38.976 gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 10 50 Finish: 12 00

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12 00 Finish: 12 02

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10 50	I	I	8.48	0.125	12.79	15.92	--	80.1	155	
11 00	2	20	5.94	0.152	4.80	15.77	--	999	135	
11 10	2	40	7.14	0.199	1.96	15.71	--	999	165	
11 20	2	60	5.56	0.217	1.33	15.65	--	999	177	
11 30	2	80	5.19	0.226	0.63	15.63	--	999	183	
11 40	2	100	5.18	0.230	0.31	15.62	--	999	187	
11 50	2	120	5.46	0.232	0.03	15.55	--	999	190	
12 00	2	140	5.12	0.226	0.00	16.25	--	999	190	

R2-0001538

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-20-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Mettiff

Sample Location/Well No. TMW-6

Field Sample I.D. Number TMW-6 @ 283' **Time** 1205

Weather Sunny, light humidity, 78° NNW Steady wind **Temperature** 78°

Sample Type:

Groundwater ✓ **Sediment** - -

Surface Water/Stream - - **Air** - -

Soil - - **Other (describe, i.e. water, septage, etc.)** - -

Well Information (fill out for groundwater samples)

Depth to Water 44.4' **Measurement Method** Water Level Indicator

Depth of Well 283' **Measurement Method** Sounding Tape

Volume Removed 140 gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.12 **Odor** No Odor

Temperature (°F) 16.25 **Specific Conductance (umhos/cm)**

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Ferrous Iron, Magnese, Magnesium
Calcium, Alkalinity

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-6

Sample Date: 6-20-08

Total Well Depth (from top of casing to bottom of screen): 263'

Depth to Water (from top of casing): 44.4'

Well Diameter: 2"

Volume of Standing Water in well: 34.976 gallons

Sampling Crew: Kevin Mottkiff

Purge Time: Start: 12 35 / Finish: 2 05

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 2 05 / Finish: 2 07

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12 35	I	I	5	0.224	5.98	17.20	--	142	166	
12 45	2	20	5.34	0.164	4.13	16.04	--	999	168	
12 55	2	40	--	--	--	--	--	~~184~~	--	
13 05	2	60	5.12	204	3.07	16.07	--	189	204	
13 15	2	80	5.14	208	2.41	16.00	--	199	208	
13 25	2	100	5.44	212	1.99	15.86	--	195	212	
13 35	2	120	5.05	213	1.73	15.79	--	395	213	
13 45	2	140	5.03	215	1.56	15.78	--	338	215	
13 55	2	160	5.05	216	1.36	15.74	--	328	216	
14 05	2	180	5.02	217	1.24	15.76	--	354	217	

R2-0001540

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-20-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Mehkiff

Sample Location/Well No. TMW-6

Field Sample I.D. Number TMW-6 @ 263' **Time** 1405

Weather Sunny, light humidity, wind NNW 5mph **Temperature** 78°

Sample Type:

Groundwater ✓ **Sediment** - -

Surface Water/Stream - - **Air** - -

Soil - - **Other (describe, i.e. water, septage, etc.)** - -

Well Information (fill out for groundwater samples)

Depth to Water 44.4' **Measurement Method** Water Level Indicator

Depth of Well 263' **Measurement Method** Sounding tape

Volume Removed 180 gallons **Removal Method** Pump

Field Test Results

Color - - **pH** 5.02 **Odor** No Odor

Temperature (°F) 60.36 **Specific Conductance (umhos/cm)**

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOC's | Ferrous Iron | Magnese | Magnesium

Calcium | Alkalinity

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16 (circled)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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CHAIN OF CUSTODY RECORD

Page _____ of _____

Special Handling:

☒ Standard TAT - 7 to 10 business days

☐ Rush TAT - Date Needed: _____

- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartlucci
330 Crossways Park Drive
Woodbury NY 11797-2015
(516) 364-9890

Project Mgr.: Frank DeVita

Invoice To: Same

P.O. No.: _____ RQN: _____

Project No.: 2564-02

Site Name: New Cassel Industrial Area

Location: TMW-6 Ashley Pl. State: NY

Sampler(s): Kevin Metkiff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

QA Reporting Notes: (check if needed)

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	# of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	VOCs	Alkalinity	Ferrous Iron	Magnesium	Magnesium	Calcium				
	TMW-6 (243')	6-23-08	9:30	G	GW	2/4	3			3	✓	✓	✓	✓	✓	✓				
	TMW-6 (223')	6-23-08	11:25	G	GW	2/4	3			3	✓	✓	✓	✓	✓	✓				High [illegible]
	TMW-6 (203')	6-23-08	1:30	G	GW	2/4	9			9	✓	✓	✓	✓	✓	✓				w/samples are MS+MSD
	TMW-6 (183')	6-23-08	2:50	G	GW	2/4	3			4	✓	✓	✓	✓	✓	✓				High [illegible]
	TMW-6 (163')	6-24-08	8:05	G	GW	2	3			4	✓	✓	✓	✓	✓	✓				High [illegible]
	TMW-6 (143')	6-24-08	10:25	G	GW	2	3			3	✓	✓	✓	✓	✓	✓				High [illegible]
	TMW-6 (123')	6-24-08	11:30	G	GW	2	3			3	✓	✓	✓	✓	✓	✓				High [illegible]
	TMW-6 (103')	6-24-08	1:00	G	GW	2	3			3	✓	✓	✓	✓	✓	✓				High [illegible]
	TMW-6 (83')	6-24-08	2:45	G	GW	2	3			3	✓	✓	✓	✓	✓	✓				High [illegible]

☐ Fax results when available to (____) _____

☒ E-mail to FDevita@do-eng.com

EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Metkiff		6/24/08	1520

R2-0001542

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW - 6

Sample Date: 6-23-08

Total Well Depth (from top of casing to bottom of screen): 243'

Depth to Water (from top of casing): 44.4'

Well Diameter: 2"

Volume of Standing Water in well: 31.776 gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 7 50 Finish: 9 30

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 9 30 Finish: 9 32

Sample Analysis: VOCs Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7 50	I	I	6.14	0.235	1.60	16.10	-	86	-27	
8 00	2	20	6.36	0.240	0.00	15.85	-	999	-46	
8 10	2	40	5.23	0.188	2.36	15.75	-	999	154	
8 20	2	60	5.05	0.197	2.49	15.65	-	658	195	
8 30	2	80	4.97	0.207	3.12	15.72	-	227	218	
8 40	2	100	4.94	0.209	2.41	15.77	-	196	224	
8 50	2	120	4.92	0.211	2.27	15.77	-	231	233	
9 00	2	140	4.90	0.213	2.20	15.67	-	202	237	
9 10	2	160	4.90	0.216	2.97	15.70	-	20	239	
9 20	2	180	4.88	0.218	2.22	15.69	-	19	244	
9 30	2	200	4.88	0.218	2.19	15.73	-	21.8	246	

R2-0001543

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-23-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-6

Field Sample I.D. Number TMW-6 @ 243' **Time** 9^30

Weather Overcast, hazy, muggy, humid, drizzle **Temperature** 70°

Sample Type:

Groundwater ✓ **Sediment** --

Surface Water/Stream -- **Air** --

Soil -- **Other (describe, i.e. water, septage, etc.)** --

Well Information (fill out for groundwater samples)

Depth to Water 44.4 **Measurement Method** Water Level Indicator

Depth of Well 243' **Measurement Method** Sounding Tape

Volume Removed 200 gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 4.88 **Odor** No Odor

Temperature (°F) 60.314 **Specific Conductance (umhos/cm)**

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Ferrous Iron | Manganese | Magnesium

Calcium | Alkalinity

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-6

Sample Date: 6-23-08

Total Well Depth (from top of casing to bottom of screen): 223'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 28.96 gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 9^55 Finish: 11^25

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 11^25 Finish: 11^27

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magenese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
9^55	I	I	6	0.170	3.99	17.73	-	173	68	
10^05	2	20	5.38	0.216	2.05	16.67	-	999	179	
10^15	2	40	5.06	0.245	1.34	16.61	-	999	205	
10^25	2	60	5.05	0.248	1.56	16.47	-	278	217	
10^35	2	80	4.85	0.251	1.65	16.54	-	63.5	228	
10^45	2	100	4.83	0.251	1.66	16.54	-	69	232	
10^55	2	120	4.82	0.250	1.69	16.49	-	96	234	
11^05	2	140	4.83	0.248	1.76	16.51	-	53	232	
11^15	2	160	4.83	0.248	1.73	16.44	-	96.7	236	
11^25	2	180	4.86	0.247	1.73	16.43	-	173	236	

R2-0001545

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-23-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-6

Field Sample I.D. Number TMW-6 @ 223' **Time** 11^25

Weather Overcast, hazy, muggy, humid, rain **Temperature** 80

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 223' **Measurement Method** Sounding Tape

Volume Removed 180 gallons **Removal Method** Pump

Field Test Results

Color Slightly Cloudy **pH** 4.86 **Odor** No Odor

Temperature (°F) 61.574 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOC's | Ferrous Iron | Maganese | Magnesium

Calcium | Alkalinity | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-6

Sample Date: 6-23-08

Total Well Depth (from top of casing to bottom of screen): 203'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 25.76 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 11^40 Finish: 13^00

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13^00 Finish: 13^02

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnesse Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
11^40	I	I	5.22	0.235	2.74	17.50	-	748	173	
11^50	2	20	5.24	0.179	1.17	16.79	-	999	164	
12^00	2	40	5.16	0.156	1.35	16.53	-	395	174	
12^10	2	60	5.13	0.146	1.81	17.38	-	192	185	
12^20	2	80	5.12	0.143	1.84	17.35	-	184	189	
12^30	2	100	5.15	0.140	2.12	17.03	-	64	197	
12^40	2	120	5.14	0.137	2.24	17.46	-	72	201	
12^50	2	140	5.04	0.136	2.34	17.54	-	57	205	
13^00	2	160	5.06	0.134	2.36	17.72	-	33.6	205	

R2-0001547

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-23-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-6

Field Sample I.D. Number TMW-6 @ 203' **Time** 13^00

Weather Overcast, hazy, muggy, humid, rain **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 203' **Measurement Method** Sounding Tape

Volume Removed 160 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.06 **Odor** No Odor

Temperature (°F) 63.896 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Ferrous Iron, Manganese, Magnesium, Calcium, Alkalinity

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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R2-0001548

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-6

Sample Date: 6-23-08

Total Well Depth (from top of casing to bottom of screen): 183'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 22.56 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 13 40 / Finish: 14 50

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14 50 / Finish: 14 52

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA										
Sample Time:	**Flow Rate** (gpm)	**Volume Purged** (gallons)	**pH** (pH units)	**Conductivity** (mS/cm)	**Dissolved Oxygen** (mg/l)	**Temperature** (Celcius)	**Salinity** (Percent)	**Turbidity** (NTU)	**Redox Potential** (mV)	**General Comments**
13 40	I	I	5.58	0.155	3.90	17.18	—	66.3	192	
13 50	2	20	5.29	0.151	0.00	17.01	—	715.0	164	
14 00	2	40	5.14	0.150	0.00	16.88	—	96.4	182	
14 10	2	60	5.11	0.149	0.00	16.92	—	86.50	184	
14 20	2	80	5.21	0.149	0.00	16.87	—	87.70	189	
14 30	2	100	5.08	0.149	0.00	16.81	—	83.60	190	
14 40	2	120	5.04	0.149	0.00	16.98	—	83.20	193	
14 50		140	5.02	0.149	0.00	17.00	—	83	194	

R2-0001549

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-23-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-6

Field Sample I.D. Number tmw-6 @ 183' **Time** 14^50

Weather Overcast, hazy, muggy, humid, rain **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 183' **Measurement Method** Sounding Tape

Volume Removed 140 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.02 **Odor** No Odor

Temperature (°F/°C) 17.00 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOC's | Ferrous Iron | Maganese | Magnesium

Calcium | Alkalinity | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001550

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-6 @ 163'

Sample Date: 6-24-08

Total Well Depth (from top of casing to bottom of screen): 163'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 19.04 Gallons

Sampling Crew: Kevin Methoff

Purge Time: Start: 7^25 Finish: 8^05

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 8^05 Finish: 8^07

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7^25	F	I	5.78	0.197	0.00	16.03	--	467	38	
7^30	2	10	6.58	0.170	0.10	16.45	--	999	37	
7^35	2	20	5.87	0.156	1.03	16.64	--	999	71	
7^40	2	30	5.66	0.159	1.98	16.73	--	798	97	
7^45	2	40	5.63	0.164	2.42	16.72	--	405	112	
7^50	2	50	5.69	0.166	2.56	16.77	--	321	114	
7^55	2	60	5.69	0.169	2.63	16.73	--	274	120	
8^00	2	70	5.71	0.173	2.68	16.72	--	211	122	
8^05	2	80	5.66	0.176	2.63	16.73	--	191	124	

R2-0001551

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Mettkiff

Sample Location/Well No. TMW 6 @ 163' Aster Place North

Field Sample I.D. Number TMW 6 @ 163' **Time** 805

Weather Sunny, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 165' **Measurement Method** Sounding Tape

Volume Removed 160 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.66 **Odor** No Odor

Temperature (°F) 16.73 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Ferrous Iron, Magnese, Magnesium

Calcium, Alkalinity

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001552

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 6 @ 143'

Sample Date: 6-24-08

Total Well Depth (from top of casing to bottom of screen): 143'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 16.16 gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 8^30 Finish: 10^25

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 10^25 Finish: 10^27

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^30	I	I	5.81	0.186	4.80	16.40	--	999	130	
8^35	4	20	5.74	0.173	2.92	17.10	--	999	84	
8^40	4	40	5.84	0.162	2.35	18.01	--	999	52	
8^45	4	60	5.87	0.159	4.34	18.90	--	999	52	Water Became extremely Silty and is pumping slower
10^25	--	80	5.64	0.158	7.61	22.33	--	999	67	Had problems with the pump. Slowed the pump down drastically. However, this was the last reading before sampling. Had to sample right away due to the draw down.

R2-0001553

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Ken's Methiff

Sample Location/Well No. TMW - 6

Field Sample I.D. Number TMW-6 @ 143' **Time** 10^25

Weather Sunny, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 145' **Measurement Method** Sounding Tape

Volume Removed 80 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.64 **Odor** No Odor

Temperature (°F) 22.33 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese

Magnesium | Calcium | |

Remarks:

Pump slowed down and shut off a couple of times. The sample was taken when it seemed necessary before the pump shut off again.

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001554

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-6 @ 123'

Sample Date: 6-24-08

Total Well Depth (from top of casing to bottom of screen): 125'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 12.64 gallons

Sampling Crew: Kevin Mettkiff

Purge Time: Start: 10^45 Finish: 11^30

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 11^30 Finish: 11^32

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10^45	I	I0	5.92	0.159	5.02	17.74	--	999	47	
10^50	2	10	5.82	0.169	0.58	18.54	--	999	46	
10^55	2	20	5.63	0.160	2.85	18.33	--	999	105	
11^00	2	30	5.60	0.157	3.24	18.53	--	999	119	
11^05	2	40	5.52	0.152	3.79	18.41	--	999	133	
11^10	2	50	5.43	0.155	3.96	17.24	--	999	130	
11^15	2	60	5.44	0.156	4.01	18.62	--	999	138	
11^20	2	70	5.43	0.155	4.06	18.57	--	790	143	
11^25	2	80	5.41	0.155	4.12	18.60	--	645	148	
11^30	2	90	5.40	0.155	4.19	18.49	--	533	151	

R2-0001555

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-6

Field Sample I.D. Number TMW-6 @ 123' **Time** 11^30

Weather Sunny, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 125' **Measurement Method** Sounding Tape

Volume Removed 90 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.40 **Odor** No Odor

Temperature (°F/°C) 18.49 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Maganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001556

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 6 @ 103'

Sample Date: 6-24-08

Total Well Depth (from top of casing to bottom of screen): 105'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 9.76 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 11^55 Finish: 1^00

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 1^00 Finish: 1^02

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium.

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
11^55	I	I	5.51	0.172	6.19	19.56	--	456	150	
12^00	4	20	5.71	0.167	3.40	21.64	--	999	64	Pumping began slow
12^20	2	40	5.68	0.164	1.60	21.99	--	999	86	
12^30	1	50	5.68	0.163	2.36	21.94	--	668	91	Pumping slowed to 1 gal/min
12^40	1	60	5.65	0.162	2.81	21.98	--	898	94	
12^50	1	70	5.66	0.162	2.98	21.50	--	596	96	
1^00	1	80	5.65	0.163	3.15	21.32	--	483	99	

R2-0001557

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW - 6

Field Sample I.D. Number TMW-6 @ 103' **Time** 13^00

Weather Sunny, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 105' **Measurement Method** Sounding Tape

Volume Removed 80 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.65 **Odor** No Odor

Temperature (°F) 21.32 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnesium
Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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R2-0001558

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 6 @ 83'

Sample Date: 6-24-08

Total Well Depth (from top of casing to bottom of screen): 85'

Depth to Water (from top of casing): 37'

Well Diameter: 2"

Volume of Standing Water in well: 7.36 Gallons

Sampling Crew: Kevin Mettkiff

Purge Time: Start: 13^15 Finish: 14^45

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14^45 Finish: 14^47

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13^15	I	I	5.87	0.173	4.68	19.53	--	999	112	The Pump was shut down
13^35	1/4	5	6.77	0.180	5.40	21.96	--	999	41	numerous times. The pump
14^05	~1/4	10	5.93	0.191	5.56	22.61	--	999	44	was unable to pump the
14^40	~1/2	15	6.80	0.204	3.61	27.52	--	999	27	silty water. After several
14^45	~1	20	8.30	0.211	3.39	26.71	--	999	24	attempts at pumping and
										cleaning the pump. It was
										decided that a sample
										should be taken right
										away once the pump was
										turned on in order to
										sample this specific zone.
										* Flow Rate varied due to
										the stopping and restarting of pump.

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-6

Field Sample I.D. Number TMW-6 @ 83' **Time** 14^45

Weather Sunny, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 37 feet **Measurement Method** Water Level Indicator

Depth of Well 85' **Measurement Method** Sounding Tape

Volume Removed 20 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 8.30 **Odor** No Odor

Temperature (°F) 26.71 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Pump kept shutting down. After multiple tries it was decided to start the pump and sample right away.

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001560

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

☒ Standard TAT - 7 to 10 business days

☐ Rush TAT - Date Needed:_____

· All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.

· Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvicka and Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2015
(516) 364-9890

Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02

Site Name: New Cassel Industrial Area

Location: TMW-6 Aster Place State: NY

Sampler(s): Kevin Metkiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	VOCs	Analyses: Alkalinity	Ferrous Iron	Magnesium	Magnesium	Calcium				QA Reporting Notes: (check if needed)
	TMW-6	6-25-08	0915	G	GW	2	6			3	✓	✓	✓	✓	✓	✓				High Turbidity - unpreserved for decanting

☐ Fax results when available to (____) _____

☒ E-mail to Frank Devita FDevita@db-eng.com

EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Metkiff		6-25-08	9:45

QA Reporting Notes: (check if needed)

☐ Provide MA DEP MCP CAM Report

☐ Provide CT DEP RCP Report

QA/QC Reporting Level

☐ Standard ☐ No QC

☐ Other_____

State specific reporting standards:

175 Metro Center Boulevard • Warwick, RI 02886-1755 • 401-732-3400 • Fax 401-732-3499 • www.mitkem.com

R2-0001561

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-6 @ 63'

Sample Date: 6-25-08

Total Well Depth (from top of casing to bottom of screen): 65'

Depth to Water (from top of casing): 41'

Well Diameter: 2"

Volume of Standing Water in well: 3.52 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 8^00 Finish: 9^15

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 9^15 Finish: 9^17

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^00	I	I	6.57	0.257	9.64	21.31	--	237	-30	This zone did not pump
9^12	--	--	5.61	.001	9.47	21.64	--	999	31	well at all. The sample was
										taken at 9^15 after numerous
										attempts at pumping. Pumping
										would only last about two
										minutes. It was decided
										that we sample right
										away once the pump
										started in order to grab
										a sample for this zone.

R2-0001562

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-25-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-6

Field Sample I.D. Number TMW-6 @ 63' **Time** 9^15

Weather Sunny, Cool, low humidity SSW wind 5mph, **Temperature** 70°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 41 feet **Measurement Method** Water Level Indicator

Depth of Well 65 feet **Measurement Method** Sounding Tape

Volume Removed - - **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.61 **Odor** No Odor

Temperature (°F/C) 21.64 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Sample TMW 6 @ 63' was taken at 9^15 after several attempts at pumping. The pump kept shutting down due to a draw down of water.

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001563

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Anika Gaylord
330 Cochran Pond Dr.
Wakefield, RI 02879-2015
(401) 364-9890

Invoice To: Same

Project No.: 2564-02
Site Name: New Cent Tech Bank Area
Location: TMW-7 Hanover St State: RI
Sampler(s): Kevin Mitchell

Project Mgr.: Eric Hess

P.O. No.: _____ RQN: _____

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOC								QA Reporting Notes: (check if needed)
	TMW-7(GW)	6/30/08	1125	G	GW	2	6			4	✓	✓	✓	✓	✓	✓			

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (_____) _____
☒ E-mail to EHess@mitkem.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		6/30/08	1125

R2-0001564

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7 @ 285'

Sample Date: 6-30-08

Total Well Depth (from top of casing to bottom of screen): 285'

Depth to Water (from top of casing): 42.6'

Well Diameter: 2"

Volume of Standing Water in well: 38.784 Gallons

Sampling Crew: Kevin Mettiff

Purge Time: Start: 13^00 Finish: 14^20

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13^25 Finish: 14^27

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13^00	I	I	5.69	0.143	5.02	17.04	--	170	165	
13^10	2	20	8.14	0.124	0.00	16.97	--	280	-5	
13^20	2	40	9.10	0.198	3.29	16.48	--	999	116	
13^30	2	60	6.56	0.241	6.12	15.60	--	469	180	
13^40	2	80	6.51	0.255	5.87	15.37	--	420	200	
13^50	2	100	5.13	0.262	5.69	15.22	--	302	209	
14^00	2	120	5.09	0.267	5.90	15.11	--	300	215	
14^10	2	140	5.07	0.272	5.56	15.29	--	218	218	
14^20	2	160	5.07	0.277	5.57	15.28	--	231	221	

R2-0001565

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-30-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW 7 @ 285' **Time** 14 25

Weather Sunny, Hot, Humid, west wind < 5mph **Temperature** 88°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42.6' **Measurement Method** Water Level Indicator

Depth of Well 285' **Measurement Method** Sounding Tape

Volume Removed 160 gallons **Removal Method** Pump

Field Test Results

Color Slightly Cloudy **pH** 5.07 **Odor** No Odor

Temperature (°F) 15.28 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Burke & Bartlett
330 Crossways Park Drive
Woodbury NY 11797-2015
516-364-9892

Project Mgr.: _____

Invoice To: Same

P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW 7 Hicksville, NY State: NY
Sampler(s): Kevin Mott

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOC	Ferrous Iron	Manganese	Magnesium	Calcium	Alkalinity			QA Reporting Notes (check if needed)
	TMW 7 (265')	7-1-08	0925	G	GW	2	3			3	X	X	X	X	X	X			Analyze 1 w/ TB
	TMW 7 (245')	7-1-08	1340	G	GW	2	3			4	X	X	X	X	X	X			Analyze 1 w/ TB
	TMW 7 (225')	7-1-08	1500	G	GW	2/4	3			3	X	X	X	X	X	X			

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to Aaronse@db-engineers.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Mott		7-1-08	1510

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 7

Sample Date: 7-1-08

Total Well Depth (from top of casing to bottom of screen): 265'

Depth to Water (from top of casing): 44.4'

Well Diameter: 2"

Volume of Standing Water in well: 35.296 Gallons

Sampling Crew: Kevin Methiff

Purge Time: Start: 7 50 / Finish: 9 20

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 9 25 / Finish: 9 27

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7 50	I	I	5.44	0.198	8.07	16.44	--	81	80	
8 00	2	20	6.21	0.369	0.00	16.35	--	84.1	-32	
8 10	2	40	5.42	0.381	4.52	16.33	--	999	128	
8 20	2	60	5.25	0.380	5.69	15.23	--	999	163	
8 30	2	80	5:13	0.385	6.40	15.05	--	490	178	
8 40	2	100	5:08	0.384	6.59	15.02	--	207	183	
8 50	2	120	5.07	0.384	6.72	15.04	--	228	187	
9 00	2	140	5:07	0.385	6.87	15.03	--	126	190	
9 10	2	160	5:06	0.384	6.88	15.00	--	110	196	
9 20	2	180	5:05	0.384	6.89	15.00	--	121	206	

R2-0001568

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-1-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW 7 @ 265' **Time** 9^25

Weather Sunny, mild, light humidity, S wind **Temperature** 75°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44.4' **Measurement Method** Water Level Indicator

Depth of Well 265' **Measurement Method** Sounding Tape

Volume Removed 180 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.05 **Odor** No Odor

Temperature (°F) 15.00 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001569

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 7

Sample Date: 7-1-08

Total Well Depth (from top of casing to bottom of screen): 245'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 32.48 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12^10 Finish: 13^40

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13^40 Finish: 13^42

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^10	I	I	5.90	0.209	3.24	18.31	--	128.0	87	
12^20	2	20	6.17	0.266	1.86	19.36	--	223	77	
12^30	2	40	5.81	0.320	0.82	20.51	--	999	63	
12^40	2	60	5.57	0.273	0.00	20.49	--	999	59	
12^50	2	80	5.41	0.258	0.91	20.22	--	999	83	
13^00	2	100	5.37	0.255	1.58	19.61	--	999	96	
13^10	2	120	5.31	0.253	1.79	19.52	--	999	105	
13^20	2	140	5.28	0.253	1.89	19.47	--	999	109	
13^30	2	160	5.26	0.253	1.95	19.62	--	999	111	
13^40	2	180	5.27	0.253	1.97	19.49	--	999	114	

R2-0001570

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-1-08

SAMPLE INFORMATION RECORD

Site: New Castel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW 7 @245' **Time** 13^40

Weather Sunny, Hot, Humid, S wind <5mph **Temperature** 88°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 245' **Measurement Method** Sonding Tape

Volume Removed 180 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.27 **Odor** No Odor

Temperature (°F/°C) 19.49 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium,

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 7

Sample Date: 7-1-08

Total Well Depth (from top of casing to bottom of screen): 225'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 29.28 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 13 55 / Finish: 14 55

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14 55 / Finish: 14 57

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13 55	I	I	5.73	0.177	9.33	22.01	--	284	80	
14 05	2	20	6.29	0.195	3.40	24.39	--	158	37	
14 15	2	40	6.74	0.211	6.77	23.08	--	131	58	
14 25	2	60	5.54	0.261	3.19	20.72	--	73	109	
14 35	2	80	5.44	0.264	2.11	20.46	--	62	104	
14 45	2	100	5.45	0.262	2.57	21.56	--	44	99	
14 55	2	120	5.45	0.260	2.57	21.50	--	422	102	

R2-0001572

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-1-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW7 @ 225' **Time** 1455

Weather Sunny, Hot, Humid, Swy <5mph **Temperature** 88°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 225' **Measurement Method** Sandy Tape

Volume Removed 120 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.45 **Odor** No Odor

Temperature (°F) 21.50 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese
Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

R2-0001573

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed:_____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Bartlucci
330 Crossways Park Drive
Wood Bury New York 11797-2050
(516) 364-9892
Project Mgr.: Frank DeVita

Invoice To: Same
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW 7 Hyacinth St. State: NY
Sampler(s): Kevin Metcalf

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	# of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic		VOC	Ferrous Iron	Magnesium	Manganese	Calcium	Alk			QA Reporting Notes: (check if needed)
	TMW 7 (205')	7.2.08	1015	G	GW	2	3			4		X	X	X	X	X	X			High [illegible]
	TMW 7 (185')	7.2.08	1220	G	GW	2	3			3		X	X	X	X	X	X			High [illegible]
	TMW 7 (165')	7.2.08	1500	G	GW	2	3			4		X	X	X	X	X	X			High [illegible]

QA Reporting Notes: (check if needed)
- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other_____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to FDevita@db-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Metcalf		7.2.08	1520

R2-0001574

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 7

Sample Date: 7-2-08

Total Well Depth (from top of casing to bottom of screen): 205'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 26.08 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 7^35 Finish: 10^15

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 10^15 Finish: 10^17

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7^35	I	II	5.36	0.277	7.30	16.26	--	999	26	
7^45	2	20	10.09	0.224	0.53	16.47	--	999	-65	
8^05	2	40	7.00	0.223	10.24	18.07	--	999	-103	
8^15	1	50	9.62	0.230	10.02	18.45	--	999	-58	
8^25	1	60	9.32	0.228	6.03	18.60	--	999	-51	
8^35	1	70	7.05	0.232	4.77	18.13	--	999	-39	
8^45	1	80	5.99	0.220	2.25	18.68	--	999	-9	
8^55	1	90	6.70	0.209	4.17	18.78	--	999	30	
9^05	1	100	6.10	0.207	4.30	18.77	--	999	31	
9^15	1	110	5.67	0.205	2.15	19.11	--	999	41	
9^25	1	120	5.59	0.201	1.57	18.95	--	999	58	
9^35	1	130	5.57	0.197	0.00	18.88	--	999	66	

R2-0001575

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7

Sample Date: 7-2-08

Total Well Depth (from top of casing to bottom of screen): 205'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 26.08 Gallons

Sampling Crew: Kevin Methiff

Purge Time: Start: 7^35 Finish: 10^15

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 10^15 Finish: 10^17

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
9^45	1	140	5.73	0.210	2.66	18.52	--	999	37	
9^55	1	150	5.61	0.201	3.76	18.99	--	783	61	
10^05	1	160	5.51	0.198	3.51	19.27	--	792	81	
10^15	1	170	5.47	0.197	0.93	19.31	--	654	89	

R2-0001576

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-2-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Mettloff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW 7 @ 205' **Time** 10^15

Weather Sunny, low humidity, cool, SW wind **Temperature** 70°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 205' **Measurement Method** Sounding Tape

Volume Removed 170 Gallons **Removal Method** Pump

Field Test Results

Color Slightly Cloudy **pH** 5.47 **Odor** No Odor

Temperature (°F) 19.31 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001577

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7

Sample Date: 7-2-08

Total Well Depth (from top of casing to bottom of screen): 185'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 22.88 Gallons

Sampling Crew: Kevin Methiff

Purge Time: Start: 10 35 Finish: 12 20

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12 20 Finish: 12 22

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Maganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10 35	I	I	5.66	0.209	7.38	16.48	--	301	111	
10 45	2	20	5.79	0.224	0.00	16.94	--	917	43	
10 50	4	30	5.89	0.219	0.00	17.14	--	949	36	
11 00	1	40	5.74	0.222	0.00	17.99	--	999	42	
11 10	1	50	5.72	0.223	0.00	18.24	--	999	38	
11 20	1	60	5.61	0.215	0.00	18.11	--	999	67	
11 30	1	70	5.62	0.213	5.51	18.46	--	999	102	
11 40	1	80	5.62	0.216	1.76	17.38	--	881	92	
11 50	1	90	5.61	0.214	0.00	18.73	--	592	90	
12 00	1	100	5.57	0.212	0.00	18.96	--	488	96	
12 10	1	110	5.57	0.212	0.00	18.24	--	467	97	
12 20	1	120	5.56	0.213	0.00	18.22	--	467	98	

R2-0001578

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-2-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW-7

Field Sample I.D. Number TMW-7 @ 185' **Time** 12^20

Weather Sunny, Hot, Humid W wind **Temperature** 88°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 185' **Measurement Method** Sounding Tape

Volume Removed 120 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.56 **Odor** No Odor

Temperature (°F) 18.22 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7

Sample Date: 7-2-08

Total Well Depth (from top of casing to bottom of screen): 165'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 19.68 Gallons

Sampling Crew: Kevin Mettkiff

Purge Time: Start: 12^45 Finish: 15^00

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 15^00 Finish: 15^02

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^45	I	I	5.80	0.220	12.19	16.68	--	490	123	
12^50	2	10	5.69	0.220	0.00	16.94	--	999	84	
12^55	2	20	5.69	0.221	0.00	17.70	--	999	63	
13^00	2	30	5.75	0.221	0.00	17.98	--	999	48	
13^10	1	40	5.76	0.222	0.00	18.75	--	999	48	
13^20	1	50	5.70	0.231	0.03	19.61	--	912	74	
13^30	1	60	5.65	0.246	0.25	19.28	--	987	83	
13^50	1/2	70	5.62	0.266	0.49	19.57	--	355	93	
1400	1	80	5.57	0.267	0.52	19.67	--	363	103	
14^10	1	90	5.56	0.275	0.92	19.02	--	332	114	
14^20	1	100	5.70	0.280	0.74	18.58	--	384	98	
14^30	1	110	5.64	0.287	0.55	18.33	--	390	92	

R2-0001580

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7

Sample Date: 7-2-08

Total Well Depth (from top of casing to bottom of screen): 165'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 19.68 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12^45 Finish: 15^00

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 15^00 Finish: 15^02

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
14^40	1	120	5.58	0.285	0.72	18.53	--	412	114	
14^50	1	130	5.53	0.285	0.75	18.18	--	291	119	
15^00	1	140	5.49	0.286	0.76	18.25	--	261	128	

R2-0001581

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-2-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW 7 @ 165' **Time** 15^00

Weather Sunny, Hot, Humid West wind **Temperature** 88°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 165' **Measurement Method** Sounding Tape

Volume Removed 140 Gallons **Removal Method** Pump

Field Test Results

Color Slightly Cloudy **pH** 5.49 **Odor** No Odor

Temperature (°F) 18.25 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese
Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001582

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Bartlucci
330 Crossways Park Drive
Woodbury NY 11797-2050
516-364-9892
Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: Hyacinth Place TMW 7 State: NY
Sampler(s): Kevin Mehaffey

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Methane	Calcium
	TMW 7 (145')	7-7-08	10:40	G	GW	2	3			4	X	X	X	X	X	X
	TMW 7 (125')	7-7-08	11:55	G	GW	2	9			12	X	X	X	X	X	X
	TMW 7 (105')	↓	12:55	G	GW	2	3			4	X	X	X	X	X	X
	TMW 7 (85')		14:00	G	GW	2/4	3			3	X	X	X	X	X	X
	TMW 7 (65')		14:55	G	GW	2	3			4	X	X	X	X	X	X
	Trip Blank	7-7-08	10:05	G	GW	—	3									

QA Reporting Notes: (check if needed)
- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to FDevita@nb-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Mehaffey		7-7-08	3:15 pm

R2-0001583

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7

Sample Date: 7-7-08

Total Well Depth (from top of casing to bottom of screen): 145'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 16.48 Gallons

Sampling Crew: Kevin Mottoff

Purge Time: Start: 8^10 Finish: 10^40

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 10^40 Finish: 10^42

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^10	I	I	4.53	0.015	11.15	16.22	--	999	3	
8^20	1	10	6.77	0.300	2.33	17.17	--	999	-152	
8^30	1	20	6.82	0.274	2.16	17.43	--	999	-154	
8^40	1	30	6.79	0.273	1.99	17.25	--	999	-130	
8^50	1	40	6.71	0.254	2.09	17.81	--	999	-37	
9^00	1	50	6.21	0.255	2.27	18.63	--	999	-1	
9^20	1/2	60	5.66	0.243	4.31	19.33	--	999	72	
9^40	1/2	70	6.13	0.255	3.77	18.35	--	709	60	
10^00	1/2	80	5.77	0.238	4.29	18.84	--	458	111	
10^20	1/2	90	5.70	0.228	4.74	19.04	--	360	133	
10^40	1/2	100	6.08	0.231	4.58	18.18	--	728	57	

R2-0001584

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW 7 @ 145' **Time** 10^40

Weather Sunny, Hot, Humid **Temperature** 75°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 145' **Measurement Method** Sounding Tape

Volume Removed 100 Gallons **Removal Method** Pump

Field Test Results

Color Cloudy **pH** 6.08 **Odor** No Odor

Temperature (°F) 18.18 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7

Sample Date: 7-7-08

Total Well Depth (from top of casing to bottom of screen): 125'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 13.28 Gallons

Sampling Crew: Kevin Methiff

Purge Time: Start: 11^20 Finish: 11^55

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 11^55 Finish: 11^57

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
11^20	I	I	6.10	0.203	9.51	16.73	--	999	32	
11^25	2	10	6.11	0.208	3.17	16.99	--	999	41	
11^30	2	20	6.12	0.210	3.05	17.17	--	999	27	
11^35	2	30	6.03	0.197	2.76	17.45	--	999	47	
11^40	2	40	5.91	0.190	2.62	17.94	--	999	67	
11^45	2	50	5.79	0.184	2.68	17.92	--	999	89	
11^50	2	60	5.78	0.186	2.74	18.03	--	728	91	
11^55	2	70	5.74	0.185	7.53	18.45	--	999	102	

R2-0001586

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW 7 @ 125' **Time** 1155

Weather Sunny, Hot, Humid **Temperature** 75°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 125' **Measurement Method** Sounding Tape

Volume Removed 70 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.74 **Odor** No Odor

Temperature (°F) 18.45 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7

Sample Date: 7-7-08

Total Well Depth (from top of casing to bottom of screen): 105'

Depth to Water (from top of casing): 50'

Well Diameter: 2"

Volume of Standing Water in well: 8.8 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12^25 Finish: 12^55

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12^55 Finish: 12^57

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^25	I	I	6.04	0.185	11.04	17.85	--	999	35	
12^30	2	10	6.23	0.200	4.34	17.18	--	999	57	
12^35	2	20	6.06	0.204	3.81	17.66	--	999	39	
12^40	2	30	6.23	0.217	3.05	18.08	--	999	4	
12^45	2	40	6.35	0.217	3.79	18.62	--	999	-12	
12^50	2	50	6.23	0.212	5.06	19.58	--	999	-12	
12^55	2	60	6.20	0.205	6.85	20.22	--	999	-7	

R2-0001588

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-7

Field Sample I.D. Number TMW-7 @ 105' **Time** 12^55

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** Water Level Indicator

Depth of Well 105' **Measurement Method** Sounding Tape

Volume Removed 60 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 6.20 **Odor** No Odor

Temperature (°F/C) 20.22 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7

Sample Date: 7-7-08

Total Well Depth (from top of casing to bottom of screen): 85'

Depth to Water (from top of casing): 48'

Well Diameter: 2"

Volume of Standing Water in well: 5.92 Gallons

Sampling Crew: Kevin Methiff

Purge Time: Start: 13 30 Finish: 14 00

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14 00 Finish: 14 02

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13 30	I	I	5.99	0.202	8.46	20.82	--	999	17	
13 35	1	5	6.16	0.206	3.65	19.67	--	0.0	4	
13 40	1	10	7.90	0.188	3.99	19.75	--	0.0	28	
13 45	1	15	6.81	0.185	4.49	19.81	--	0.0	59	
13 50	1	20	6.06	0.185	4.48	19.93	--	0.0	83	
13 55	1	25	5.80	0.184	5.38	20.10	--	0.0	106	
14 00	1	30	5.78	0.184	5.80	20.23	--	0.0	114	

R2-0001590

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW 7 @ 85' **Time** 14^00

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 48' **Measurement Method** Water Level Indicator

Depth of Well 85' **Measurement Method** Sounding Tape

Volume Removed 30 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.78 **Odor** No Odor

Temperature (°F/C) 20.23 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnesium

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-7

Sample Date: 7-7-08

Total Well Depth (from top of casing to bottom of screen): 65'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 3.68 Gallons

Sampling Crew: Kevin Mothiff

Purge Time: Start: 14[15] Finish: 14[55]

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14[55] Finish: 14[57]

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
14[15]	I	I	5.74	0.190	8.85	22.47	--	999	88	Pump shut down multiple
14[16]	~~1~~ ½	2	5.76	0.193	6.79	20.52	--	999	97	times. Allowed time to pass
14[17]	2	4	6.01	0.193	6.36	19.80	--	999	100	for well to recharge. After
14[20]	~2	6	5.79	0.191	6.24	20.30	--	999	99	waiting about forty five minutes
14[25]	~2	8	5.74	0.190	6.96	20.81	--	999	91	well did not recharge.
										Began pump and took
										sample TMW 7@65'
										right away.

R2-0001592

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW 7

Field Sample I.D. Number TMW 7 @ 65' **Time** 1455

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 65' **Measurement Method** Sounding Tape

Volume Removed about 10 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.74 **Odor** No Odor

Temperature (°F/°C) 20.81 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Had trouble with pump and well recharge. Waited a while for well to recharge. It did not so it was decided to pump and sample right away in order to get a sample for this zone.

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed:_____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka + Bartilucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9892
Project Mgr.: Frank D. Vita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW 9 Watkins St. State: NY
Sampler(s): Kevin Mitkoff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	# of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic		VOCs	Ferrous Iron	Alkalinity	Magnesium	Manganese	Calcium			QA Reporting Notes: (check if needed)
	TMW 9 (260')	7-16-08	1200	G	GW	2	3			3		X	X	X	X	X	X			[illegible]
	TMW 9 (260')	7-16-08	1430	G	GW	2	9			9		X	X	X	X	X	X			↓
	Trip Blank	7-16-08	1200				3					X	X	X	X	X	X			↓

QA Reporting Notes: (check if needed)

- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level

☐ Standard ☐ No QC
☐ Other_____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to FDevita@dbcinc.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Mitkoff		~~152~~ 7-16-08	1520

R2-0001594

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Sample Date: 7.16.08

Total Well Depth (from top of casing to bottom of screen): 280'

Depth to Water (from top of casing): 46'

Well Diameter: 2"

Volume of Standing Water in well: 37.44 gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 8^40 Finish: 12^00

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12^00 Finish: 12^02

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^40	I	I	4.69	0.008	12.09	19.05	--	139	266	
9^00	1	20	10.55	0.140	6.36	15.88	--	274	-20	
9^20	1	40	9.43	0.233	6.77	15.85	--	999	152	
9^40	1	60	5.80	0.269	6.92	16.04	--	999	154	
10^00	1	80	7.08	0.280	6.77	15.82	--	999	152	
10^20	1	100	5.59	0.288	6.78	15.88	--	999	147	
10^40	1	120	5.33	0.292	6.72	16.02	--	283	152	
11^00	1	140	5.34	0.294	7.08	16.13	--	183	157	
11^20	1	160	5.38	0.298	7.25	15.86	--	155	154	
11^40	1	180	5.38	0.299	6.70	16.02	--	137	158	
12^00	1	200	5.41	0.301	11.53	16.58	--	192	154	

R2-0001595

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7·16·08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkoff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW 9 @280' **Time** 12^00

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 46' **Measurement Method** Water Level Indicator

Depth of Well 280' **Measurement Method** Sounding Tape

Volume Removed 200 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.41 **Odor** No Odor

Temperature (°F/C) 16.58 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001596

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-9

Total Well Depth (from top of casing to bottom of screen): 260'

Well Diameter: 2"

Sampling Crew: Kevin Metkoff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Sample Date: 7.16.08

Depth to Water (from top of casing): 46'

Volume of Standing Water in well: 34.24 Gallons

Purge Time: Start: 12 40 Finish: 14 30

Sample Time: Start: 14 30 Finish: 14 32

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12 40	I	I	5.62	0.166	12.06	20.18	--	229	132	
12 50	2	20	5.56	0.316	6.57	15.69	--	354	99	
13 00	2	40	5.30	0.328	4.70	15.79	--	838	123	
13 10	2	60	5.32	0.344	4.30	15.48	--	323	129	
13 20	2	80	5.35	0.348	3.95	15.37	--	153	127	
13 30	2	100	5.35	0.349	3.81	15.32	--	159	127	
13 40	2	120	5.30	0.349	3.88	15.41	--	182	133	
13 50	2	140	5.37	0.342	4.22	15.60	--	143	131	Pump shut down
14 10	2	160	5.39	0.352	4.73	15.43	--	178	129	
14 20	2	180	5.38	0.351	4.10	15.32	--	153	130	
14 30	2	200	5.33	0.342	4.85	16.01	--	99	133	

R2-0001597

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.16.08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-9

Field Sample I.D. Number TMW-9 @ 260' **Time** 1430

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 46' **Measurement Method** Water-Level Indicator

Depth of Well 260' **Measurement Method** Sounding Tape

Volume Removed 200 Gallons **Removal Method** Pump

Field Test Results

Color Clear - Cloudy **pH** 5.33 **Odor** No Odor

Temperature (°F/°C) 16.01 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	**1¼" = 0.077**	**2" = 0.16**	**3" = 0.37**	**4" = 0.65**
	1½ =0.10	**2½ " = 0.24**	**3½ = 0.50**	**6" = 1.46**

D&B_SIR/kb Rev. 03/09/98

R2-0001598

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed:_____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avilka + Bartolucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9892

Project Mgr.: _____

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02

Site Name: New Cassel Industrial Area

Location: TMW 9 Washington St. State: NY

Sampler(s): Kevin Metkoff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	# of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic		VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes: (check if needed)
	TMW9 (240')	7.17.08	1215	G	GW	2/4	3			3		X	X	X	X	X	X			
	TMW9 (220')	↓	1335	G	GW	2/4	3			3		X	X	X	X	X	X			
	TMW9 (200')	↓	1500	G	GW	2/4	3			3		X	X	X	X	X	X			
	Trip Blank	↓	1500				3													

QA Reporting Notes: (check if needed)

- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level

☐ Standard ☐ No QC

☐ Other_____

State specific reporting standards: _____

☐ Fax results when available to (____) _____

☒ E-mail to FDevita@dd-eng.com

EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Metkoff		7.17.08	1530

R2-0001599

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Total Well Depth (from top of casing to bottom of screen): 240'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

Sample Date: 7.17.08

Depth to Water (from top of casing): 44'

Volume of Standing Water in well: 31.36 gallons

Purge Time: Start: 10^45 Finish: 12^15

Sample Time: Start: 12^15 Finish: 12^17

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10^45	I	I	6.53	0.221	13.93	16.93	--	166	72	
10^55	2	20	9.39	0.343	5.95	15.93	--	999	68	
11^05	2	40	10.47	0.365	4.81	15.84	--	482	36	
11^15	2	60	8.26	0.360	4.54	15.62	--	434	52	
11^25	2	80	7.40	0.359	4.21	15.69	--	108	65	
11^35	2	100	5.47	0.359	4.01	15.58	--	91.3	76	
11^45	2	120	6.01	0.359	3.85	15.58	--	104	85	
11^55	2	140	5.42	0.361	3.72	15.44	--	82.3	90	
12^05	2	160	5.40	0.358	3.57	15.46	--	102	93	
12^15	2	180	5.38	0.357	3.53	15.49	--	3.1	98	

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.17.08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW9 @ 240' **Time** 12'15

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 240' **Measurement Method** Sounding Tape

Volume Removed 180 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.38 **Odor** No Odor

Temperature (°C) 15.49 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001601

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Sample Date: 7.17.08

Total Well Depth (from top of casing to bottom of screen): 220'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 28.16 gallons

Sampling Crew: Kevin Mothiff

Purge Time: Start: 12 35 / Finish: 13 35

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13 35 / Finish: 13 37

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12 55	I	I	6.38	0.284	6.89	16.86	--	125	66	
12 45	2	20	6.40	0.313	4.45	15.71	--	999	91	
12 55	2	40	5.83	0.335	4.11	16.67	--	230	115	
13 05	2	60	5.32	0.344	3.81	15.71	--	140	121	
13 15	2	80	5.42	0.347	3.62	15.49	--	11.1	120	
13 25	2	100	5.35	0.348	3.62	15.65	--	0.0	121	
13 35	2	120	5.35	0.349	3.63	15.65	--	0.0	121	

R2-0001602

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.17.08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW 9 @ 220' **Time** 13 35

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 220' **Measurement Method** Sounding Tape

Volume Removed 120 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.35 **Odor** No Odor

Temperature (°F/C) 15.65 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001603

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-9

Total Well Depth (from top of casing to bottom of screen): 200'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Sample Date: 7.17.08

Depth to Water (from top of casing): 44'

Volume of Standing Water in well: 24.96 Gallons

Purge Time: Start: 13^50 Finish: 15^00

Sample Time: Start: 15^00 Finish: 1502

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13^50	I	I	5.77	0.257	7.59	17.14	--	136	45	
14^00	2	20	9.78	0.302	4.06	15.99	--	999	89	
14^10	2	40	8.54	0.300	3.92	16.05	--	271	104	
14^20	2	60	9.90	0.300	3.86	16.01	--	220	105	
14^30	2	80	5.44	0.301	3.83	16.12	--	202	107	
14^40	2	100	7.30	0.295	4.17	15.93	--	240	108	
14^50	2	120	5.46	0.296	4.07	16.13	--	218	110	
15^00	2	140	5.47	0.297	4.11	16.40	--	16	112	

R2-0001604

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.17.08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkoff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW9 @ 200' **Time** 1500

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 200' **Measurement Method** Sounding Tape

Volume Removed 140 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.47 **Odor** No Odor

Temperature (°F/C) 16.40 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 7 to 10 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka & Bartlucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9892
Project Mgr.: Frank DeVito

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW 9 Washington St State: NY
Sampler(s): Kevin Metkiff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes (check if needed)
	TMW 9 (180')	7/18/08	855	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW 9 (160')	7/18/08	1055	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW 9 (140')	7/18/08	1405	G	GW	2	3			3	X	X	X	X	X	X	
	Trip Blank	7/18/08	1405				3										

- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDevito@dvb-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Metkiff		7/18/08	1435

R2-0001606

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Total Well Depth (from top of casing to bottom of screen): 180'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

Sample Date: 7.18.08

Depth to Water (from top of casing): 42'

Volume of Standing Water in well: 22.08 gallons

Purge Time: Start: 7^45 Finish: 8^55

Sample Time: Start: 8^55 Finish: 8^57

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7^45	I	I	5.18	0.360	10.27	16.70	--	92	36	
7^55	2	20	7.05	0.253	5.59	15.84	--	999	50	
8^05	2	40	5.64	0.248	5.09	15.93	--	292	82	
8^15	2	60	5.59	0.246	5.05	15.95	--	150	94	
8^25	2	80	5.65	0.246	5.05	15.90	--	111	98	
8^35	2	100	5.58	0.245	5.10	15.87	--	93	105	
8^45	2	120	5.52	0.247	5.06	15.88	--	154	111	
8^55	2	140	5.46	0.246	5.06	15.90	--	46	116	

R2-0001607

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-18-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW 9 @ 180' **Time** 855

Weather Sunny, Cool, low humidity **Temperature** 73°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 180' **Measurement Method** Sounding Tape

Volume Removed 140 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.46 **Odor** No Odor

Temperature (°F/°C) 15.90 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½" = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Sample Date: 7.18.08

Total Well Depth (from top of casing to bottom of screen): 160'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 18.56 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 9 10 / Finish: 10 55

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 10 55 / Finish: 10 57

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
9 10	I	I	5.80	0.246	11.64	17.28	--	337	-34	
9 15	2	10	6.93	0.258	5.80	16.71	--	327	-48	
9 20	2	20	7.36	0.257	5.35	17.31	--	999	-22	
9 25	2	30	5.99	0.267	5.22	17.65	--	999	8	
9 30	2	40	6.47	0.265	5.21	17.57	--	999	32	
9 35	2	50	6.29	0.264	5.16	17.62	--	772	46	
9 45	1	60	5.55	0.263	5.14	17.76	--	408	64	
9 55	1	70	5.52	0.262	5.14	17.85	--	342	73	
10 05	1	80	5.49	0.262	5.24	17.66	--	306	82	
10 15	1	90	5.44	0.267	6.05	18.16	--	411	85	
10 25	1	100	5.51	0.265	5.09	17.63	--	122	71	
10 35	1	110	5.41	0.267	4.86	17.57	--	89	89	

R2-0001609

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Sample Date: 7.18.08

Total Well Depth (from top of casing to bottom of screen): 160'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 18.56 Gallons

Sampling Crew: Kevin Methoff

Purge Time: Start: 9^10 Finish: 10^55

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 10^55 Finish: 10^57

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10^45	1	120	5.39	0.266	4.98	17.62	--	81	93	
10^55	1	130	5.45	0.266	4.91	17.65	--	71.8	99	

R2-0001610

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.15.08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW 9 @ 160' **Time** 10^55

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 160' **Measurement Method** Sounding Tape

Volume Removed 130 Gallons **Removal Method** Pump

Field Test Results

Color Clear - Cloudy **pH** 5.45 **Odor** ~~PID 0.0~~ No Odor

Temperature (°F/°C) 17.65 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Sample Date: 7.18.08

Total Well Depth (from top of casing to bottom of screen): 140'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 15.36 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 11^25 Finish: 14^05

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14^05 Finish: 14^07

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
11^25	I	I	5.65	0.276	9.49	20.85	--	203	55	
11^35	1	10	6.06	0.260	12.08	19.01	--	121	-4	
11^45	1	20	6.77	0.263	10.87	21.70	--	999	-36	
11^55	1	30	6.40	0.290	11.48	20.54	--	999	-69	
12^05	1	40	6.54	0.288	11.89	19.28	--	999	-68	
12^15	1	50	6.27	0.311	11.16	21.03	--	999	-42	
12^35	1/2	60	6.14	0.302	11.07	22.66	--	999	-16	Purging became extremely
13^05	.333	70	5.87	0.308	10.18	23.43	--	999	1	slow around this time. It
13^35	.333	80	5.68	0.329	9.74	24.04	--	751	11	sped up in spurts. The
14^05	.333	90	5.65	0.338	9.77	24.09	--	887	23	readings may have been
										affected by the extreme heat
										Especially the temperature.

R2-0001612

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.18.08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW 9 @140' **Time** 1405

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 140' **Measurement Method** Sounding Tape

Volume Removed 90 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.64 **Odor** No Odor

Temperature (°F) 24.09 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka + Bartilucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9892
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW 9 - Washington St State: NY
Sampler(s): Kevin Mekiff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes (check if needed)
	TMW9 (120')	7-21-08	1045	G	GW	2	3			3	X	X	X	X	X	X			☐ Provide MA DEP MCP CAM Report
	TMW9 (100')	7-21-08	1220	G	GW	2	3			3	X	X	X	X	X	X			☐ Provide CT DEP RCP Report
	TMW9 (80')	7-21-08	1350	G	GW	2	3			3	X	X	X	X	X	X			**QA/QC Reporting Level**
	TMW9 (60')	7-21-08	1530	G	GW	2	3			3	X	X	X	X	X	X			☐ Standard ☐ No QC
	Trip Blank	7-21-08	1530				3												☐ Other _____
																			State specific reporting standards:

☐ Fax results when available to (____) _____
☒ E-mail to FDevita@db-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
Kevin Mekiff		7-21-08	1615

R2-0001614

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Sample Date: 7-21-08

Total Well Depth (from top of casing to bottom of screen): 120'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 12.16 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 7 45 / Finish: 10 45

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 10 45 / Finish: 10 47

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7 45	I	I	6.16	0.538	8.41	16.22	--	0.0	-120	
8 05	½	10	7.33	0.491	6.16	17.38	--	999	-131	
8 25	½	20	6.48	0.433	5.94	17.10	--	999	-52	
8 45	½	30	6.01	0.419	5.74	17.42	--	999	1	
9 05	½	40	6.11	0.408	5.65	17.30	--	858	30	
9 25	½	50	8.03	0.399	5.70	17.67	--	631	78	
9 45	½	60	5.49	0.390	11.64	18.13	--	687	87	
10 00	about 1	70	5.47	0.392	11.20	17.99	--	353	92	
10 45	0.02	80	5.49	0.394	6.53	18.20	--	430	92	

R2-0001615

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-21-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW 9 @ 120' **Time** 10^45

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 120' **Measurement Method** Sounding Type

Volume Removed 80 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.49 **Odor** No Odor

Temperature (°F) 18.20 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Sample Date: 7-21-08

Total Well Depth (from top of casing to bottom of screen): 100'

Depth to Water (from top of casing): 42'

Well Diameter: 2"

Volume of Standing Water in well: 9.28 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 11^25 Finish: 12^20

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12^20 Finish: 12^22

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
11^25	I	I	5.80	0.414	9.51	16.33	--	999	53	
11^30	1	5	7.71	0.455	7.22	17.19	--	999	46	
11^35	1	10	6.12	0.467	7.05	17.30	--	999	47	
11^40	1	15	9.60	0.482	6.94	17.40	--	999	64	
11^45	1	20	5.68	0.502	6.81	17.55	--	999	87	
11^50	1	25	8.24	0.518	6.84	17.59	--	999	95	
11^55	1	30	10.58	0.516	6.44	17.89	--	999	92	
12^00	1	35	10.82	0.518	6.22	17.94	--	999	89	
12^05	1	40	10.83	0.520	6.11	17.85	--	999	85	
12^10	1	45	10.82	0.523	5.99	17.71	--	999	78	
12^15	1	50	5.89	0.524	5.95	17.70	--	999	76	
12^20	1	55	6.32	0.525	5.80	17.73	--	999	74	

R2-0001617

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-21-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW9

Field Sample I.D. Number TMW9 @ 100' **Time** 12^20

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 42' **Measurement Method** Water Level Indicator

Depth of Well 100' **Measurement Method** Sounding Tape

Volume Removed 55 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 6.32 **Odor** No Odor

Temperature (°F) 17.73 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Maganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

R2-0001618

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Sample Date: 7-21-08

Total Well Depth (from top of casing to bottom of screen): 80'

Depth to Water (from top of casing): 43'

Well Diameter: 2"

Volume of Standing Water in well: 5.92 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12 45 / Finish: 13 50

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13 50 / Finish: 13 52

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12 45	I	I	6.01	0.435	11.13	20.83	--	252	-39	
12 50	1	5	6.96	0.446	7.49	18.13	--	999	-45	
12 55	1	10	6.95	0.468	7.07	17.95	--	999	24	
13 00	1	15	5.81	0.470	7.22	17.55	--	999	64	
13 05	1	20	5.71	0.473	6.88	17.67	--	999	79	
13 10	1	25	6.00	0.478	6.75	17.70	--	871	89	
13 30	1/4	30	5.99	0.487	6.55	18.01	--	237	103	Pump slowed down
13 45	.33	35	5.79	0.492	6.60	18.10	--	198	107	
13 50	1	40	5.70	0.495	6.68	17.93	--	195	114	Pump picked up again.

R2-0001619

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-21-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW 9 @ 80' **Time** 13 50

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 43' **Measurement Method** Water Level Indicator

Depth of Well 80' **Measurement Method** Sounding Tape

Volume Removed 40 Gallons **Removal Method** Pump

Field Test Results

Color Cloudy **pH** 5.70 **Odor** No Odor

Temperature (°F/C) 17.93 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnesium

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 9

Sample Date: 7-21-08

Total Well Depth (from top of casing to bottom of screen): 60'

Depth to Water (from top of casing): 41'

Well Diameter: 2"

Volume of Standing Water in well: 3.04 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 1407 Finish: 1530

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 1530 Finish: 1532

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
1407	I	1	5.75	0.480	9.51	21.97	--	999	24	
1409	2	2	5.94	0.476	6.80	19.72	--	999	8	
1412	1/3	3	6.01	0.465	9.16	20.45	--	999	0	
1435	0.043	4	6.09	0.448	7.76	23	--	999	6	
1440	0.2	5	6.06	0.441	6.85	23.49	--	999	13	
1450	0.1	6	6.07	0.383	6.80	23.53	--	999	22	
1526	0.003	7	6.00	0.319	7.38	25.01	--	999	44	
1536	0.25	8	5.95	0.296	7.41	25.22	--	999	51	

R2-0001621

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.21.08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW 9

Field Sample I.D. Number TMW 9 @ 60' **Time** 15 30

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 41' **Measurement Method** Water Level Indicator

Depth of Well 60' **Measurement Method** Sounding Tape

Volume Removed 8 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.95 **Odor** No Odor

Temperature (°F/°C) 25.22 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese
Magnesium | Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001622

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 7 to 10 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Bartolucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9892
Project Mgr.: _____

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-09
Site Name: New Cassel Industrial Area
Location: TMW-4 Lindy Rd State: NY
Sampler(s): Kevin Metkiff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes: (check if needed)
	TMW4 (285')	7-31-08	1140	G	GW	2/4	3			3	X	X	X	X	X	X			
	TMW4 (265')	7-31-08	1330	G	GW	2	3			3	X	X	X	X	X	X			High Turbidity & Ascorbic
	TMW4 (245')	7-31-08	1505	G	GW	2	3			3	X	X	X	X	X	X			↓
	TMW4 (245' MS)	7-31-08	1505	G	GW	2	3			3	X	X	X	X	X	X			
	TMW4 (245' MSD)	7-31-08	1505	G	GW	2	3			3	X	X	X	X	X	X			
	Trip Blank	7-31-08	1505				3												

QA Reporting Notes (check if needed):
- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FJevita@d6-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		7/31/08	1535

R2-0001623

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 7-31-08

Total Well Depth (from top of casing to bottom of screen): 285'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 39.52 Gallons

Sampling Crew: Kevin Metkoff

Purge Time: Start: 8^50 Finish: 11^40

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 11^40 Finish: 11^42

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^50	I	I	5.57	0.149	9.69	22.28	-	999	351	
9^10	2	20	7.08	0.132	5.72	17.14	-	295	-65	
10^20	2	40	5.74	0.124	7.39	16.04	-	999	102	Pump shut down at 10^10 hrs
10^30	2	60	7.04	0.118	7.96	15.99	-	735	174	restarted shortly after at 10^10
10^40	2	80	9.49	0.116	7.84	15.92	-	188	195	
10^50	2	100	9.98	0.117	7.73	15.95	-	114	197	
11^00	2	120	6.99	0.116	7.55	15.96	-	83	193	
11^10	2	140	5.28	0.116	7.54	15.93	-	78.8	205	
11^20	2	160	8.12	0.115	7.55	15.77	-	60	198	
11^30	2	180	8.49	0.115	7.60	15.59	-	57.6	227	
11^40	2	200	9.27	0.116	7.46	15.87	-	50.4	212	

R2-0001624

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-31-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4 @ 285' **Time** 11^40

Weather Overcast, Cool, Hazy **Temperature** 76°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 285' **Measurement Method** Sounding Tape

Volume Removed 200 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 9.27 **Odor** No Odor

Temperature (°F) 15.87 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnesium

Magnesium | Calcium | | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 7-31-08

Total Well Depth (from top of casing to bottom of screen): 265'

Depth to Water (from top of casing): 39'

Well Diameter: 2"

Volume of Standing Water in well: 36.16 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12^00 Finish: 13^30

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13^30 Finish: 13^32

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^00	I	I	5:88	0.001	7.61	19.07	--	232	58	
12^10	2	20	6.50	0.148	7.29	16.40	--	999	142	
12^20	2	40	5:48	0.165	7.25	16.78	--	818	182	
12^30	2	60	6.48	0.166	7.16	16.64	--	157	191	
12^40	2	80	5.85	0.166	7.15	16.36	--	102	192	
12^50	2	100	8.15	0.166	6.96	16.85	--	84.7	191	
13^00	2	120	6.92	0.167	7.00	16.38	--	75	193	
13^10	2	140	5:46	0.167	6.95	16.63	--	70	193	
13^20	2	160	5:50	0.167	6.95	16.46	--	71.8	193	
13^30	2	180	5:49	0.167	6.91	16.61	--	72.3	193	

R2-0001626

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-31-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4 @ 265' **Time** 13 30

Weather Partly cloudy, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 39' **Measurement Method** Water Level Indicator

Depth of Well 265' **Measurement Method** Sounding Tape

Volume Removed 180 Gallons **Removal Method** Pump

Field Test Results

Color Clear - Cloudy **pH** 5.49 **Odor** No Odor

Temperature (°F) 16.61 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | | |

Remarks:

Well Casing Volumes

GAL/FT	**1¼" = 0.077**	**2" = 0.16**	**3" = 0.37**	**4" = 0.65**
	1½ =0.10	**2½ " = 0.24**	**3½ = 0.50**	**6" = 1.46**

D&B_SIR/kb Rev. 03/09/98

R2-0001627

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 7-31-08

Total Well Depth (from top of casing to bottom of screen): 245'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 33.12 Gallons

Sampling Crew: Kevin Meitkiff

Purge Time: Start: 13^45 Finish: 15^05

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 15^05 Finish: 15^07

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13^45	I	I	5.96	0.157	9.20	16.02	--	270	122	
13^55	2	20	7.93	0.154	5.71	18.64	--	80	116	
14^05	2	40	6.92	0.151	5.34	18.78	--	999	84	
14^15	2	60	6.51	0.128	6.05	18.16	--	845	100	
14^25	2	80	5.88	0.120	6.74	18.57	--	237	117	
14^35	2	100	5.88	0.113	6.91	19.55	--	167	131	
14^45	2	120	5.70	0.113	7.10	18.77	--	126	128	
14^55	2	140	5.70	0.111	7.20	18.80	--	103	131	
15^05	2	160	5.66	0.111	7.23	18.47	--	110	133	

R2-0001628

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-31-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4@245' **Time** 1505

Weather Partly Cloudy, Humid, Hot **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 245' **Measurement Method** Sounding Tape

Volume Removed 160 gallons **Removal Method** Pump

Field Test Results

Color Cloudy **pH** 5.66 **Odor** No Odor

Temperature (°F/C) 18.47 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 7 to 10 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka & Bartholomew
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9892
Project Mgr.: Frank DeVito

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-4 Cindy Road State: NY
Sampler(s): Kevin McKiff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Manganese	Magnesium	Ferrous Iron	Calcium	QA Reporting Notes:
	TMW-4 (225')	8-1-08	0855	G	GW	2	3			3	X	X	X	X	X	X	High Turb. Fe Necessary
	TMW-4 (205')	8-1-08	1040	G	GW	2	3			3	X	X	X	X	X	X	High Turb. Fe Necessary
	TMW-4 (185')	8-1-08	1210	G	GW	2	3			3	X	X	X	X	X	X	High Turb. Fe Necessary
	TMW-4 (165')	8-1-08	1325	G	GW	2	3			3	X	X	X	X	X	X	High Turb. Fe Necessary
	TMW-4 (145')	8-1-08	1455	G	GW	2	3			3	X	X	X	X	X	X	High Turb. Fe Necessary
	Trip Blank	8-1-08	1455				3										

QA Reporting Notes (check if needed):
- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDeVito@db-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		8/1/08	1505

R2-0001630

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 8-1-08

Total Well Depth (from top of casing to bottom of screen): 225'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 29.92 Gallons

Sampling Crew: Kevin Methff

Purge Time: Start: 7^35 Finish: 8^55

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 8^55 Finish: 8^57

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7^35	I	I	5.85	0.159	7.31	15.67	--	110	-29	
7^45	2	20	9.88	0.128	9.84	15.08	--	999	116	
7^55	2	40	10.14	0.124	10.42	15.14	--	114	173	
8^05	2	60	8.86	0.123	10.49	15.13	--	78.9	186	
8^15	2	80	9.55	0.122	10.44	15.20	--	72	195	
8^25	2	100	8.23	0.122	10.37	15.24	--	66.2	196	
8^35	2	120	9.47	0.122	10.39	15.15	--	68.7	199	
8^45	2	140	9.46	0.121	10.29	15.31	--	68.1	199	
8^55	2	160	10.21	0.121	10.23	15.44	--	70.1	200	

R2-0001631

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4 @225' **Time** 76°

Weather Sunny, Hot, Humid **Temperature** 85

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 225' **Measurement Method** Sounding Tape

Volume Removed 160 Gallons **Removal Method** Pump

Field Test Results

Color Cloudy - Clear **pH** 10.21 **Odor** No Odor

Temperature (°C) 15.44 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Irons, Manganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

R2-0001632

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 8-1-08

Total Well Depth (from top of casing to bottom of screen): 205'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 26.72 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 9^30 Finish: 10^40

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 10^40 Finish: 10^42

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
9^30	I	I	5.80	0.142	8.84	19.13	--	122	-1	
9^40	2	20	5.87	0.124	8.31	15.53	--	92.3	148	
9^50	2	40	8.54	0.119	8.33	15.55	--	12.3	181	
10^00	2	60	9.07	0.117	8.26	15.57	--	96.7	191	
10^10	2	80	6.03	0.116	8.28	15.55	--	93.4	196	
10^20	2	100	7.76	0.116	8.23	15.60	--	87.1	199	
10^30	2	120	9.02	0.116	8.19	15.65	--	83.1	201	
10^40	2	140	6.57	0.116	8.11	15.90	--	87.7	201	

R2-0001633

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Mettkoff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4 @ 205' **Time** 10^40

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 205' **Measurement Method** Sounding Tape

Volume Removed 140 Gallons **Removal Method** Pump

Field Test Results

Color Clear - Cloudy **pH** 6.57 **Odor** No Odor

Temperature (°F) 15.90 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese
Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 8-1-08

Total Well Depth (from top of casing to bottom of screen): 185'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 23.52 Gallons

Sampling Crew: Kevin Mettkiff

Purge Time: Start: 11^00 Finish: 12^10

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12^10 Finish: 12^12

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
11^00	I	I	6.57	0.135	8.37	16.96	--	189	32	
11^10	2	20	9.85	0.160	8.37	15.78	--	141	173	
11^20	2	40	10.22	0.160	8.61	15.85	--	85.7	189	
11^30	2	60	7.80	0.160	8.63	15.84	--	73.7	197	
11^40	2	80	7.56	0.160	8.65	15.80	--	69.4	199	
11^50	2	100	6.28	0.160	8.66	15.83	--	68	201	
12^00	2	120	5.65	0.160	8.65	15.92	--	68.5	203	
12^10	2	140	6.86	0.160	8.67	15.92	--	68.9	204	

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4 @ 185' **Time** 12^10

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 185' **Measurement Method** Sanding Tape

Volume Removed 140 Gallons **Removal Method** Pump

Field Test Results

Color Clear - Cloudy **pH** 6.86 **Odor** No Odor

Temperature (°F) 15.92 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 8-1-08

Total Well Depth (from top of casing to bottom of screen): 165'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 20.32 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12^25 Finish: 13^25

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13^25 Finish: 13^27

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^25	I	I	8.19	0.156	9.0	17.40	--	145	-3	
12^35	2	20	6.00	0.204	5.23	17.87	--	999	88	
12^45	2	40	5.38	0.222	5.61	17.36	--	274	150	
12^55	2	60	5.25	0.224	5.85	17.24	--	142	173	
13^05	2	80	5.20	0.223	5.81	17.63	--	82.3	183	
13^15	2	100	5.13	0.223	5.95	17.46	--	63.7	191	
13^25	2	120	7.21	0.222	5.96	18.25	--	66.0	196	

R2-0001637

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4 @ 165' **Time** 13 25

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 165' **Measurement Method** Sounding Tape

Volume Removed 120 Gallons **Removal Method** Pump

Field Test Results

Color Cloudy **pH** 7.21 **Odor** No Odor

Temperature (°F) 18.25 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Total Well Depth (from top of casing to bottom of screen): 145'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

Sample Date: 8-1-08

Depth to Water (from top of casing): 37'

Volume of Standing Water in well: 17.28 Gallons

Purge Time: Start: 13^35 Finish: 14^55

Sample Time: Start: 14^55 Finish: 14^57

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13^35	1	1	5.66	0.219	8.29	17.29	--	94.2	182	
13^40	2	10	5.45	0.222	6.31	16.89	--	76.0	135	
13^45	2	20	10.12	0.190	4.86	18.83	--	999	36	
14^05	1	30	5.73	0.207	4.92	21.20	--	999	75	
14^15	1	40	5.47	0.219	4.64	20.60	--	327	113	
14^25	1	50	5.42	0.221	4.70	20.25	--	98.8	126	
14^35	1	60	5.38	0.223	4.71	19.86	--	87.7	138	
14^45	1	70	5.33	0.223	4.64	19.71	--	73.8	145	
14^55	1	80	5.31	0.223	4.58	19.62	--	76.9	150	

R2-0001639

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4@145' **Time** 1455

Weather Sunny, Hot, Humid **Temperature** 90°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 37' **Measurement Method** Water Level Indicator

Depth of Well 145' **Measurement Method** Sounding Tape

Volume Removed 80 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.31 **Odor** No Odor

Temperature (°F) 19.62 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese
Magnesium | Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed:
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
(516) 364-9892
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: RQN:

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-4 Lindy Road State: NY
Sampler(s): Kevin Metkiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9= 10=

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1= X2= X3=

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	# of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic		VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes: (check if needed)
	TMW4 (125')	8-4-08	1110	G	GW	2	3			3		X	X	X	X	X	X			High Turb. For Decanting
	TMW4 (105')	8-4-08	1235	G	GW	2	3			3		X	X	X	X	X	X			↓
	TMW4 (85')	8-4-08	1330	G	GW	2	3			3		X	X	X	X	X	X			↓
	TMW4 (65')	8-4-08	1455	G	GW	2	3			3		X	X	X	X	X	X			↓
	Trip Blank	8-4-08	1455																	

Containers: Analyses:

QA Reporting Notes: (check if needed)
- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other

State specific reporting standards:

☐ Fax results when available to (____)
☒ E-mail to FDevita@db-eng.com
EDD Format

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C

Relinquished by:	Received by:	Date:	Time:
[signature]		8-4-08	1500

R2-0001641

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 8-4-08

Total Well Depth (from top of casing to bottom of screen): 125'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 13.92 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 8^00 Finish: 11^10

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 11^10 Finish: 11^12

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^00	I	I	5.69	0.352	9.31	15.38	--	364	-82	
8^05	2	10	6.39	0.297	5.07	16.78	--	999	-142	Pump shut down and restarted.
9^30	1/2	20	5.48	0.229	5.01	23.47	--	176	58	
9^50	1/2	30	5.35	0.230	4.72	24.60	--	127	70	
10^10	1/2	40	5.31	0.237	4.42	25.75	--	162	72	
10^30	1/2	50	5.41	0.245	4.41	26.40	--	166	72	
11^50	1/2	60	5.33	0.252	4.34	26.91	--	194	71	
11^10	1/2	70	5.24	0.253	7.29	27.69	--	310	71	

R2-0001642

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-4-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4@125' **Time** 11^10

Weather Sunny, Cool, No Humidity **Temperature** 69°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 125' **Measurement Method** Sounding Tape

Volume Removed 70 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.24 **Odor** No Odor

Temperature (°F) 27.69 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	**1¼" = 0.077**	**(2" = 0.16)**	**3" = 0.37**	**4" = 0.65**
	1½ =0.10	**2½ " = 0.24**	**3½ = 0.50**	**6" = 1.46**

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New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 8-4-08

Total Well Depth (from top of casing to bottom of screen): 105'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 10.72 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 11:30 Finish: 12:30

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12:30 Finish: 12:32

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
11:30	I	I	6.31	0.262	7.06	20.56	--	999	1	
11:40	1	10	9.32	0.221	7.77	18.34	--	999	131	
11:50	1	20	10.20	0.222	8.31	19.08	--	714	155	
12:00	1	30	9.30	0.228	8.41	18.47	--	500	167	
12:10	1	40	6.05	0.228	8.15	19.30	--	263	174	
12:20	1	50	7.58	0.229	8.52	17.65	--	257	179	
12:30	1	60	5.34	0.228	8.15	18.91	--	208	180	

R2-0001644

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-4-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4 @ 105' **Time** 12 30

Weather Sunny, Hot, Humid **Temperature** 88°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 105' **Measurement Method** Sandy Tape

Volume Removed 60 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.34 **Odor** No Odor

Temperature (°F) 18.91 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs Alkalinity Ferrous Iron Magnese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 8-4-08

Total Well Depth (from top of casing to bottom of screen): 85'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 7.52 Gallons

Sampling Crew: Kevin Mettkiff

Purge Time: Start: 12 30 / Finish: 13 30

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13 30 / Finish: 13 32

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12 50	I	I	5.58	0.248	8.96	20.64	--	999	-1	
12 55	1	5	5.65	0.223	8.32	17.12	--	999	120	
13 00	1	10	5.12	0.223	8.54	16.98	--	999	163	
13 05	1	15	9.16	0.224	8.49	16.93	--	574	177	
13 10	1	20	8.25	0.224	8.45	16.69	--	358	188	
13 15	1	25	7.15	0.225	8.25	17.24	--	187	196	
13 20	1	30	7.35	0.225	8.19	17.23	--	264	201	
13 25	1	35	6.42	0.226	8.18	17.30	--	218	206	
13 30	1	40	6.70	0.227	8.21	17.41	--	150	210	

R2-0001646

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-4-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4 @ 85' **Time** 13 30

Weather Sunny, Hot, Humid **Temperature** 88°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 85' **Measurement Method** Sounding Tape

Volume Removed 40 Gallons **Removal Method** Pump

Field Test Results

Color Cloudy **pH** 6.70 **Odor** No Odor

Temperature (°F) 17.41 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001647

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-4

Sample Date: 8-4-08

Total Well Depth (from top of casing to bottom of screen): 65'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 4.32 Gallons

Sampling Crew: Kevin Methoff

Purge Time: Start: 13 50 Finish: 14 55

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14 55 Finish: 14 57

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13 50	1	1	5.77	0.259	6.93	18.63	--	999	-20	The well would
14 00	—	—	5.80	0.262	6.81	23.17	--	633	2	pump dry after two
14 25	—	—	5.88	0.275	8.34	22.10	--	999	42	minutes of purging.
14 40	—	—	5.55	0.274	7.51	21.57	--	999	84	It was left to recharge
14 55	—	—								before purging resumed.
										This was repeated
										several times before a
										sample was taken at
										14 55.

R2-0001648

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-4-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-4

Field Sample I.D. Number TMW-4 @ 65' **Time** 14^55

Weather Sunny, Hot, Humid **Temperature** 88°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 65' **Measurement Method** Sounding Tape

Volume Removed — **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.55 **Odor** No Odor

Temperature (°F) 21.57 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka & Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-5 State: NY
Sampler(s): Kevin Mettlf

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes (check if needed)
	TMW5 (285')	8-8-08	900	G	GW	2/1	3			3	X	X	X	X	X	X	☐ Provide MA DEP MCP CAM Report
	TMW5 (265')	8-8-08	1500	G	GW	2/1	3			3	X	X	X	X	X	X	☐ Provide CT DEP RCP Report
	Trip Blank	8-8-08	1500				3										**QA/QC Reporting Level** ☐ Standard ☐ No QC ☐ Other _____
																	State specific reporting standards:

☐ Fax results when available to (____) _____
☒ E-mail to FDeVita@db-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		8-8-08	1510

175 Metro Center Boulevard • Warwick, RI 02886-1755 • 401-732-3400 • Fax 401-732-3499 • www.mitkem.com

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-8-08

Total Well Depth (from top of casing to bottom of screen): 285'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 38.56 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 8^00 Finish: 9^00

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 9^02 Finish: 9^04

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^00	I	I	5.16	0.153	9.62	16.16	--	105	179	
8^10	2	20	6.09	0.158	5.67	15.45	--	201	-57	
8^20	2	40	5.10	0.140	7.09	15.24	--	205	172	
8^30	2	60	4.99	0.139	7.12	15.20	--	76.4	211	
8^40	2	80	4.99	0.139	7.07	15.18	--	21.5	219	
8^50	2	100	5.01	0.139	7.00	15.18	--	0.0	220	
9^00	2	120	4.99	0.140	6.96	15.15	--	0.0	222	

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-8-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW-5 @ 285' **Time** 9:00

Weather Sunny, Cool, Low Humidity **Temperature** 66°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 285' **Measurement Method** Sounding Tape

Volume Removed 120 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 4.99 **Odor** No Odor

Temperature (°F) 15.15 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese
Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001652

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Total Well Depth (from top of casing to bottom of screen): 265'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

Sample Date: 8-8-08

Depth to Water (from top of casing): 44'

Volume of Standing Water in well: 35.36 Gallons

Purge Time: Start: 9^35 Finish: 15^00

Sample Time: Start: 15^00 Finish: 15^02

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
9^35	I	I	5.56	0.138	8.30	16.34	--	166	51	The flow rate was
10^00	~	20	5.78	0.138	6.19	18.02	--	51.5	75	variable through out
11^40	~	40	6.00	0.138	5.05	18.84	--	999	-15	the purging operation.
1^55	-	60	5.93	0.002	9.81	19.37	--	153	28	
2^20	-	80	5.87	0.003	9.75	18.26	--	95.6	34	
2^40	-	100	5.84	0.003	9.53	18.74	--	56.3	42	
3^00	-	120	5.83	0.005	9.52	18.80	--	22.2	45	

R2-0001653

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-8-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW-5 @ 265' **Time** 1500

Weather Partly Cloudy, Showers, Cool **Temperature** 74°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 265' **Measurement Method** Sounding Tape

Volume Removed 120 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.83 **Odor** No Odor

Temperature (°F) 18.80 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka and Bartlucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVito

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-03
Site Name: New Cassel Industrial Area
Location: TMW-5 State: NY
Sampler(s): Kevin Metkiff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes (check if needed)
	TMW-5 (245')	8-11-08	0930	G	GW	2/4	3			3	X	X	X	X	X	X	☐ Provide MA DEP MCP CAM Report
	TMW-5 (225')	8-11-08	1115	G	GW	2/4	3			3	X	X	X	X	X	X	☐ Provide CT DEP RCP Report
	TMW5 (225' MS)	8-11-08	1115	G	GW	2/4	3			3	X	X	X	X	X	X	**QA/QC Reporting Level**
	TMW5 (225' MSD)	8-11-08	1115	G	GW	2/4	3			3	X	X	X	X	X	X	☐ Standard ☐ No QC
	TMW5 (205')	8-11-08	1400	G	GW	2/4	3			3	X	X	X	X	X	X	☐ Other _____
	Trip Blank	8-11-08	1400				3										State specific reporting standards:

☐ Fax results when available to (____) _____
☒ E-mail to FDevita@db-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		8-11-08	1415

R2-0001655

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-11-08

Total Well Depth (from top of casing to bottom of screen): 245'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 32.16 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 8^10 Finish: 9^30

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 9^30 Finish: 9^35

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^10	I	I	8.50	0.175	11.19	15.82	--	0.0	30	
8^20	2	20	7.77	0.174	6.23	15.62	--	135	-16	
8^30	2	40	6.89	0.171	6.62	15.64	--	999	26	
8^40	1	50	6.42	0.165	6.72	15.55	--	213	96	
9^00	1/2	60	5.21	0.163	6.80	15.56	--	0.0	136	
9^15	~1	80	5.15	0.163	6.74	15.57	--	0.0	147	
9^30	~1	100	5.16	0.163	6.39	15.60	--	0.0	150	

R2-0001656

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-11-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW5 @ 245' **Time** 0930

Weather Sunny, Cool, No Humidity **Temperature** 69°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 245' **Measurement Method** Sounding Tape

Volume Removed 100 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.16 **Odor** No Odor

Temperature (°F) 15.60 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 2.7

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Remarks:

PID readings during purging were 1.6ppm at 8:30 and 1.7ppm at 9:00 and 2.7ppm at 9:30.

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001657

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-11-08

Total Well Depth (from top of casing to bottom of screen): 225'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 28.96 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 10^25 Finish: 11^15

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 11^15 Finish: 11^17

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10^25	I	I	5.64	0.171	10.33	16.66	--	0.0	21	
10^35	2	20	5.08	0.206	6.49	15.49	--	999	106	
10^45	2	40	5.03	0.204	5.90	15.52	--	369	133	
10^55	2	60	4.95	0.204	5.59	15.47	--	36	142	
11^05	2	80	4.99	0.204	5.38	15.53	--	0.0	141	
11^15	2	100	5.02	0.204	5.34	15.69	--	0.0	146	

R2-0001658

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-11-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW-5 @ 225' **Time** 11^15

Weather Partly cloudy, cool, no humidity **Temperature** 70°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 225' **Measurement Method** Sounding Tape

Volume Removed 100 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.02 **Odor** No Odor

Temperature (°F) 15.69 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Maganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-11-08

Total Well Depth (from top of casing to bottom of screen): 205'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 25.76 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12^40

Finish: 1400

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 1400

Finish: 1402

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^40	I	I	5.73	0.209	8.90	15.37	--	13.0	11	
13^00	1	20	5.19	0.213	5.55	15.59	--	59.8	110	
13^20	1	40	5.17	0.214	4.91	15.69	--	0.0	123	
13^40	1	60	5.19	0.213	4.87	15.98	--	0.0	127	
14^00	1	80	5.24	0.213	5.28	15.90	--	0.0	127	

R2-0001660

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-11-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW-5@205' **Time** 1400

Weather Sunny, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 205' **Measurement Method** Sounding Tape

Volume Removed 80 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.24 **Odor** No Odor

Temperature (°F) 15.90 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 7 to 10 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Barthucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-5 State: NY
Sampler(s): Kevin Metkiff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Iron	Manganese	Magnesium	Calcium	QA Reporting Notes: (check if needed)
	TMW5 (185')	8-12-08	0945	G	GW	3/4	3			3	X	X	X	X	X	X	
	TMW5 (165')	8-12-08	1105	G	GW	3/4	3			3	X	X	X	X	X	X	
	TMW5 (145')	8-12-08	1220	G	GW	3/4	3			3	X	X	X	X	X	X	
	TMW5 (125')	8-12-08	1340	G	GW	3/4	3			3	X	X	X	X	X	X	
	TMW5 (105')	8-12-08	1440	G	GW	3/4	3			3	X	X	X	X	X	X	
	Trip Blank	8-12-08	1440				3										

- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDevita@db-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		8-12-08	1500

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-12-08

Total Well Depth (from top of casing to bottom of screen): 185'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 22.56 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 7:45 Finish: 9:45

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 9:45 Finish: 9:47

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7:45	I	I	5.55	0.286	8.82	15.73	--	0.0	-37	
8:10		20	5.76	0.245	5.70	16.22	--	999	13	
8:30		40	5.35	0.230	5.56	16.29	--	0.0	67	
8:50		50	5.42	0.223	5.41	16.53	--	0.0	81	
9:25		60	5.24	0.217	6.13	16.89	--	0.0	96	
9:35		70	5.26	0.215	5.62	16.62	--	0.0	100	
9:45		80	5.21	0.215	5.58	16.60	--	0.0	103	

R2-0001663

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW 5 @ 185' **Time** 945

Weather Sunny, Cool, No Humidity **Temperature** 64°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 185' **Measurement Method** Sounding Tape

Volume Removed 80 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.21 **Odor** No Odor

Temperature (°F) 16.60 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 4.2

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-12-08

Total Well Depth (from top of casing to bottom of screen): 165'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 19.36 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 10^05 Finish: 11^05

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 11^05 Finish: 11^07

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10^05	I	I	5.58	0.236	11.59	15.58	- -	20.5	-1	
10^10	2	10	6.05	0.244	11.09	16.19	- -	305	-31	
10^15	2	20	5.85	0.254	11.15	16.79	- -	999	-3	
10^25	1	30	5.58	0.263	11.26	16.83	- -	999	42	
10^35	1	40	5.48	0.256	11.00	16.73	- -	252	64	
10^45	1	50	5.42	0.252	11.41	16.71	- -	215	69	
10^55	1	60	5.53	0.254	5.68	16.89	- -	0.0	80	
11^05	1	70	5.31	0.252	5.27	16.84	- -	0.0	82	

R2-0001665

Dvirka and Bartilucci
CONSULTING ENGINEERS
IVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW-5 @ 165' **Time** 1105

Weather Sunny, Cool, No Humidity **Temperature** 64°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 165' **Measurement Method** Sounding Tape

Volume Removed 70 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.31 **Odor** No Odor

Temperature (°F) 16.84 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.4

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-12-08

Total Well Depth (from top of casing to bottom of screen): 145'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 16.16 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 11^30 Finish: 12^20

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12^20 Finish: 12^22

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
11^30	I	I	5.87	0.240	8.87	16.91	--	657	-2	
11^40	1	10	5.39	0.316	5.76	16.39	--	999	62	
11^50	1	20	5.30	0.327	5.50	16.36	--	27.1	73	
12^00	1	30	5.31	0.331	5.24	16.39	--	0.0	73	
12^10	1	40	5.29	0.334	5.05	16.41	--	0.0	75	
12^20	1	50	5.22	0.335	5.00	16.50	--	0.0	80	

R2-0001667

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW5-0145 **Time** 1220

Weather Partly Cloudy, Cool, low humidity **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 145' **Measurement Method** Sounding Tape

Volume Removed 50 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.22 **Odor** No Odor

Temperature (°F) 16.50 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	**1¼" = 0.077**	**2" = 0.16**	**3" = 0.37**	**4" = 0.65**
	1½ =0.10	**2½ " = 0.24**	**3½ = 0.50**	**6" = 1.46**

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New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-12-08

Total Well Depth (from top of casing to bottom of screen): 125'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 12.96 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12^40 Finish: 13^40

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13^40 Finish: 13^42

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnesium Magnese, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^40	I	I	5.90	0.286	8.84	16.44	—	888	-33	
12^50	1	10	5.95	0.298	4.96	18.88	--	999	-37	
13^00	1	20	5.05	0.001	8.89	19.49	--	364	39	
13^10	1	30	5.66	0.244	6.32	19.68	--	215.0	30	
13^20	1	40	5.70	0.249	6.15	18.94	--	41.5	24	
13^30	1	50	5.63	0.254	6.16	19.22	--	10.9	43	
13^40	1	60	5.54	0.263	6.26	19.24	--	13	56	

R2-0001669

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW-5 @ 125' **Time** 13^40

Weather Partly Cloudy, Cool, low humidity **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 125' **Measurement Method** Sandy Tape

Volume Removed 60 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.54 **Odor** No Odor

Temperature (°F) 19.24 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-12-08

Total Well Depth (from top of casing to bottom of screen): 105'

Depth to Water (from top of casing): 40'

Well Diameter: 2"

Volume of Standing Water in well: 10.40 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 13^50 Finish: 14^40

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14^40 Finish: 14^42

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese Magnesium Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13^50	I	I	6.20	0.256	9.95	19.88	--	69.3	25	
14^00	1	10	6.62	0.282	5.75	17.63	--	999	-12	
14^10	1	20	5.28	0.345	6.40	17.84	--	999	87	
14^20	1	30	5.23	0.362	6.88	17.11	--	88.7	107	
14^30	1	40	5.21	0.364	6.80	17.34	--	35	111	
14^40	1	50	5.21	0.365	6.73	17.38	--	0.0	114	

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW-5 @ 105' **Time** 1440

Weather Partly Cloudy, cool, low humidity **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 40' **Measurement Method** Water Level Indicator

Depth of Well 105' **Measurement Method** Sounding Tape

Volume Removed 50 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.21 **Odor** No Odor

Temperature (°F) 17.38 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese
Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 7 to 10 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka and Bartilucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-5 State: NY
Sampler(s): Kevin McKiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes: (check if needed)
	TMW5 (85')	8-13-08	0845	G	GW	2/4	3			3	X	X	X	X	X	X			
	TMW 5 (65')	8-13-08	0925	G	GW	2/4	3			3	X	X	X	X	X	X			
	Trip Blank	8-13-08	0925				3												

- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDeVita@d6-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		8-13-08	0940

R2-0001673

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-13-08

Total Well Depth (from top of casing to bottom of screen): 85'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 6.56 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 8^10 Finish: 8^45

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 8^45 Finish: 8^47

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^10	I	I	6.05	0.384	10.01	15.64	--	999	-51	
8^15	1	5	5.80	0.328	9.69	15.93	--	999	57	
8^20	1	10	5.47	0.316	10.29	15.95	--	933	107	
8^25	1	15	5.31	0.315	10.13	15.98	--	317	125	
8^30	1	20	5.26	0.313	10.05	15.97	--	0.0	137	
8^35	1	25	5.21	0.313	9.98	15.93	--	0.0	140	
8^40	1	30	5.19	0.313	9.90	15.95	--	0.0	143	
8^45	1	35	5.16	0.313	9.84	15.97	--	0.0	148	

R2-0001674

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-13-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW-5 @ 85' **Time** 0845

Weather Sunny, Cool, Low Humidity **Temperature** 67°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 85' **Measurement Method** Sounding Tape

Volume Removed 3.5 Gallons **Removal Method** Pump

Field Test Results

Color Color **pH** 5.16 **Odor** No Odor

Temperature (°F/°C) 15.97 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-5

Sample Date: 8-13-08

Total Well Depth (from top of casing to bottom of screen): 65'

Depth to Water (from top of casing): 44'

Well Diameter: 2"

Volume of Standing Water in well: 3.36 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 9^00 Finish: 9^25

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 9^25 Finish: 9^27

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
9^00	I	I	5.53	0.310	9.82	18.30	--	475	-20	
9^05	1	5	5.51	0.660	10.32	16.48	--	999	109	
9^10	1	10	5.23	0.599	10.91	16.45	--	0.0	151	
9^15	1	15	5.13	0.539	11.00	16.46	--	0.0	164	
9^20	1	20	5.07	0.489	11.07	16.47	--	0.0	174	
9^25	1	25	5.04	0.476	11.08	16.48	--	0.0	178	

R2-0001676

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-13-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-5

Field Sample I.D. Number TMW-5@65' **Time** 0925

Weather Sunny, Cool, Low Humidity **Temperature** 67°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 65' **Measurement Method** Sounding Tape

Volume Removed 25 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.04 **Odor** No Odor

Temperature (°F/C) 16.48 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001677

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 7 to 10 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Bartlucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-2 State: NY
Sampler(s): Frank DeVita

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes (check if needed)
	TMW-2 (285')	8-18-08	9:35	G	GW	2,4	3			3	✓	✓	✓	✓	✓	✓	
	TMW-2(285')	8-18-08	11:40	G	GW	2,4	3			3	✓	✓	✓	✓	✓	✓	
	TMW-2(245)	8-18-08	13:20	G	GW	2,4	3			3	✓	✓	✓	✓	✓	✓	
	TMW-2(285)	8-18-08	14:40	G	GW	2,4	3			3	✓	✓	✓	✓	✓	✓	

QA Reporting Notes (check if needed)
- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDevita@d6-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
Matt DeVries	Fed Ex	8-18-08	3:30

R2-0001678

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-2

Total Well Depth (from top of casing to bottom of screen): 285'

Well Diameter: 2"

Sampling Crew: Frank DeVita

Purging Method: Grundfos Redi-Flo

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ca, Mg, Mn, Ferrous Iron

Sample Date: 8-18-08

Depth to Water (from top of casing): 39'

Volume of Standing Water in well: ~~36.16~~ 39.52

Purge Time: Start: ~~10:05~~ 8:05; Finish: 9:35

Sample Time: Start: 9:35; Finish: 9:37

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8:05	2	1	5.37	0.159	12.47	16.76	--	234	228	
8:15	2	20	7.08	0.145	7.46	14.81	--	548	165	
8:25	2	40	8.10	0.234	8.24	14.68	--	999	146	
8:35	2	60	7.76	0.255	6.96	14.64	--	586	161	
8:45	2	80	5.07	0.264	6.31	14.57	--	492	157	
8:55	2	100	5.04	0.268	5.91	14.58	--	368	146	
9:05	2	120	5.03	0.269	5.6	14.60	--	156	148	
9:15	2	140	5.06	0.269	5.5	14.60	--	211	147	
9:25	2	160	5.05	0.269	5.41	14.62	--	154	147	
9:35	2	180	5.03	0.270	5.32	14.63	--	186	146	

R2-0001679

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-15-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Frank DeVita

Sample Location/Well No. TMW-2

Field Sample I.D. Number TMW-2 @ 285' **Time** 9:35

Weather Sunny, hot, humid **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water level indicator

Depth of Well 285' **Measurement Method** Sounding tape

Volume Removed 180 Gallons **Removal Method** Pump

Field Test Results - See Sample Data form

Color _____ **pH** _____ **Odor** _____

Temperature (°F) _____ **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

VOCs	Alkalinity	Ferrous Iron	Mg, Mn, Ca

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-2

Sample Date: 8-18-08

Total Well Depth (from top of casing to bottom of screen): 265'

Depth to Water (from top of casing): 39'

Well Diameter: 2"

Volume of Standing Water in well: 36.16

Sampling Crew: Matt DeVinney

Purge Time: Start: 10:05 Finish: 11:40

Purging Method: Grundfos Redi-Flo

Sampling Method: Grab

Sample Time: Start: 11:40 Finish: 11:42

Sample Analysis: Vocs, Alkalinity, Ca, Mg, Mn, Ferrous Iron

PURGE DATA										
Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10:05	1.5	1	7.59	0.205	7.87	15.53	--	256	53	
10:20	1.5	20	5.44	0.315	10.57	15.32	--	399	68	
10:33	1.5	40	5.30	0.331	5.67	15.24	--	74.4	105	
10:46	1.5	60	5.24	0.332	8.55	15.35	--	0.0	119	
10:59	1.5	80	5.18	0.337	5.33	15.37	--	0.0	116	
11:12	1.5	100	5.14	0.338	5.45	15.39	--	3.6	119	
11:25	1.5	120	5.10	0.338	5.26	15.33	--	0.0	119	
11:37	1.5	140	5.11	0.338	5.19	15.27	--	0.0	118	

R2-0001681

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-18-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area Sample Crew: Matt DeVinney

Sample Location/Well No. TNW-2

Field Sample I.D. Number TNW-2 @ 265' Time 11:40

Weather Sunny, Hot, Humid Temperature 80°

Sample Type:

Groundwater ✓ Sediment _____

Surface Water/Stream _____ Air _____

Soil _____ Other (describe, i.e. water, septage, etc.) _____

Well Information (fill out for groundwater samples)

Depth to Water 39' Measurement Method Water level indicator

Depth of Well 265' Measurement Method Sounding tape

Volume Removed 140 Gallons Removal Method Pump

Field Test Results - See Sample Data Form

Color _____ pH _____ Odor _____

Temperature (°F) _____ Specific Conductance (umhos/cm) _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

VOCs	Alkalinity	Ferrous Iron	Ca, Mg, Mn

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-2

Total Well Depth (from top of casing to bottom of screen): 245'

Well Diameter: 2"

Sampling Crew: Matt DeVinney

Purging Method: Grundfos Redi-Flo

Sampling Method: Grab

Sample Analysis: VOCs, Ca, Mg, Mn, Alkalinity, Ferrous Iron

Sample Date: 8-18-08

Depth to Water (from top of casing): 39.5'

Volume of Standing Water in well: 32.88

Purge Time: Start: 12:10 Finish: 13:20

Sample Time: Start: 13:20 Finish: 13:22

PURGE DATA										
Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12:10	2	1	5.46	0.334	7.48	15.60	--	0.0	62	
12:20	2	20	5.15	0.334	7.10	15.36	--	999	101	
12:30	2	40	5.24	0.324	5.27	15.21	--	13.5	119	
12:40	2	60	5.05	0.322	4.99	15.26	--	0.0	135	
12:50	2	80	5.05	0.321	4.9	15.24	--	0.0	138	
13:00	2	100	5.05	0.321	4.81	15.24	--	0.0	139	
13:10	2	120	5.16	0.321	4.74	15.22	--	0.0	140	
13:20	2	140	5.15	0.322	4.74	15.12	--	0.0	140	

R2-0001683

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-18-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Matt DeViney

Sample Location/Well No. TMW-2

Field Sample I.D. Number TMW-2 @ 245' **Time** 13:20

Weather Sunny, hot, humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 39.5' **Measurement Method** Water level indicator

Depth of Well 245' **Measurement Method** Sounding tape

Volume Removed 140 Gallons **Removal Method** Pump

Field Test Results - See Sample Data Form

Color _____ **pH** _____ **Odor** _____

Temperature (°F) _____ **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Ca, Mg, Mn

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-2

Sample Date: 8-18-08

Total Well Depth (from top of casing to bottom of screen): 225'

Depth to Water (from top of casing): 38.5'

Well Diameter: 2"

Volume of Standing Water in well: 29.84

Sampling Crew: Matt DeVimey

Purge Time: Start: 13:40

Purging Method: Grundfos Redi-flo

Finish: 14:40

Sampling Method: Grab

Sample Time: Start: 14:40

Sample Analysis: VOCs, Alkalinity, Ca, Mg, Mn, Ferrous Iron

Finish: 14:42

PURGE DATA										
Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13:40	2	1	5.81	0.277	6.97	16.34	--	112	37	
13:50	2	20	5.07	0.304	5.16	15.50	--	999	93	
14:00	2	40	5.08	0.293	4.98	15.82	--	61.8	137	
14:10	2	60	5.03	0.293	4.77	15.85	--	95.2	146	
14:20	2	80	4.95	0.293	4.68	15.63	--	0.0	152	
14:30	2	100	5.02	0.292	4.63	16.11	--	0.0	148	
14:40	2	120	5.01	0.292	4.66	16.19	--	0.0	150	

R2-0001685

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 5-15-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Matt DeVinney

Sample Location/Well No. TMW-2

Field Sample I.D. Number TMW-2 @ 285' **Time** 14:40

Weather Sunny, hot, humid **Temperature** 85°

Sample Type:

Groundwater √ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38.5' **Measurement Method** Water level indicator

Depth of Well 285' **Measurement Method** Sounding tape

Volume Removed 120 Gallons **Removal Method** Pump

Field Test Results – See Sample Data Form

Color _____ **pH** _____ **Odor** _____

Temperature (°F) _____ **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

VOCs	Alkalinity	Ferrous Iron	Ca, Mg, Mn

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Barthucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-2 State: NY
Sampler(s): Kevin Metkiff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes: (check if needed)
	TMW 2 (210')	8-19-08	0930	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW 2 (195')	8-19-08	1130	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW 2 (185')	8-19-08	1310	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW 2 (185' MS)	8-19-08	1310	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW 2 (185' MSD)	8-19-08	1310	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW 2 (165')	8-19-08	1440	G	GW	2/4	3			3	X	X	X	X	X	X	
	Trip Blank	8-19-08	1440				3										

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to FDeVita@d6-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		8-19-08	1450

R2-0001687

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-2

Total Well Depth (from top of casing to bottom of screen): 210'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Sample Date: 8-19-08

Depth to Water (from top of casing): 39'

Volume of Standing Water in well: 27.36 Gallons

Purge Time: Start: 7 55 Finish: 9 25

Sample Time: Start: 9 30 Finish: 9 32

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7 55	I	I	5.64	0.352	9.23	16.61	--	19	-3	
8 15	1	20	9.92	0.383	5.54	15.76	--	999	-20	
8 35	1	40	5.86	0.367	5.11	15.69	--	0.0	76	
8 55	1	60	6.20	0.364	4.88	15.78	--	0.0	95	
9 15	1	80	5.11	0.362	4.83	15.79	--	0.0	104	
9 25	1	90	5.06	0.361	4.81	15.79	--	0.0	109	

R2-0001688

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-19-08

SAMPLE INFORMATION RECORD

Site: New Castle Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-2

Field Sample I.D. Number TMW-2 @ 210' **Time** 0930

Weather Sunny, Cool, No Humidity **Temperature** 73°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 39' **Measurement Method** Water Level Indicator

Depth of Well 210' **Measurement Method** Sounding Tape

Volume Removed 90 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.06 **Odor** No Odor

Temperature (°F/°C) 15.79 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-2

Total Well Depth (from top of casing to bottom of screen): 195'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Sample Date: 8-19-08

Depth to Water (from top of casing): 41'

Volume of Standing Water in well: 24.64 Gallons

Purge Time: Start: 9^50 Finish: 11^30

Sample Time: Start: 11^30 Finish: 11^32

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
9^50	I	I	5.78	0.353	7.20	17.35	-	9.0	41	
10^00	1	10	5.37	0.365	5.24	17.81	-	0.0	67	
10^10	1	20	6.91	0.390	5.06	18.37	-	596	20	
10^20	1	30	5.95	0.359	4.81	19.25	-	999	-4	
10^30	1	40	5.71	0.324	4.81	20.08	-	999	22	
10^40	1	50	5.50	0.322	4.77	20.77	-	999	29	
10^50	1	60	5.48	0.310	4.82	20.85	-	999	35	
11^00	1	70	5.36	0.308	4.96	20.55	-	999	50	
11^10	1	80	4.69	0.308	7.43	20.46	-	104	75	
11^20	1	90	5.41	0.303	4.99	20.26	-	14.6	52	
11^30	1	100	5.36	0.301	4.82	20.21	-	6.4	54	

R2-0001690

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-19-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 2

Field Sample I.D. Number TMW 2 @ 195' **Time** 1130

Weather Sunny, Hot, Humid **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 41' **Measurement Method** Water Level Indicator

Depth of Well 195' **Measurement Method** Sounding

Volume Removed 100 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.36 **Odor** No Odor

Temperature (°F/C) 20.21 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-2

Sample Date: 8-19-08

Total Well Depth (from top of casing to bottom of screen): 185'

Depth to Water (from top of casing): 39'

Well Diameter: 2"

Volume of Standing Water in well: 23.36 Gallons

Sampling Crew: Kevin Mettiff

Purge Time: Start: 12^00 Finish: 13^10

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13^10 Finish: 13^12

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA										
Sample Time:	**Flow Rate** (gpm)	**Volume Purged** (gallons)	**pH** (pH units)	**Conductivity** (mS/cm)	**Dissolved Oxygen** (mg/l)	**Temperature** (Celcius)	**Salinity** (Percent)	**Turbidity** (NTU)	**Redox Potential** (mV)	**General Comments**
12^00	I	I	5.73	0.312	7.70	20.06	—	105	7.70	
12^10	1	10	8.11	0.324	5.43	18.30	—	74.2	5.43	
12^20	1	20	6.20	0.318	5.04	19.17	—	281	5.04	
12^30	1	30	5.60	0.357	4.79	19.51	—	999	4.79	
12^40	1	40	5.49	0.359	5.02	18.93	—	301	5.02	
12^50	1	50	5.63	0.359	4.82	19.16	—	144	4.82	
13^00	1	60	5.34	0.364	4.86	19.07	—	14.0	4.86	
13^10	1	70	5.34	0.367	4.85	18.77	—	0.0	4.85	

R2-0001692

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-19-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Mettkiff

Sample Location/Well No. TMW-2

Field Sample I.D. Number TMW-2 @ 185' **Time** 1310

Weather Sunny, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 39' **Measurement Method** Water Level Indicator

Depth of Well 185' **Measurement Method** Sounding Tape

Volume Removed 70 gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.34 **Odor** No Odor

Temperature (°F/C) 18.77 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001693

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-2

Total Well Depth (from top of casing to bottom of screen): 165'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Sample Date: 8-19-08

Depth to Water (from top of casing): 38'

Volume of Standing Water in well: 20.32 Gallons

Purge Time: Start: 13^40 Finish: 14^40

Sample Time: Start: 14^40 Finish: 14^42

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13^40	I	I	5.70	0.386	7.61	16.44	—	117	25	
13^50	1	10	6.84	0.396	4.70	18.70	—	999	-14	
14^00	1	20	5.68	0.355	4.68	18.06	—	999	3	
14^10	1	30	5.46	0.333	4.54	18.28	—	125	30	
14^20	1	40	5.37	0.330	4.67	18.50	—	0.0	51	
14^30	1	50	5.33	0.329	4.61	18.27	—	0.0	56	
14^40	1	60	5.28	0.328	4.55	18.30	—	0.0	63	

R2-0001694

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-19-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 2

Field Sample I.D. Number TMW 2 @ 165' **Time** 1440

Weather Sunny, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 165' **Measurement Method** Sounding Tape

Volume Removed 60 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.28 **Odor** No Odor

Temperature (°F/C) 18.30 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs Alkalinity Ferrous Iron Magnese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVito

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-07
Site Name: New Cassel Industrial Area
Location: TMW 2 State: NY
Sampler(s): Kevin Metcliff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes: (check if needed)
	TMW 2 (145')	8-20-08	0935	G	GW	3/4	3			3	X	X	X	X	X	X	
	TMW 2 (125')	8-20-08	1200	G	GW	3/4	3			3	X	X	X	X	X	X	
	TMW 2 (105')	8-20-08	1430	G	GW	2	3			3	X	X	X	X	X	X	High Turbidity Need Analysis For Accuracy
	Trip Blank	8-20-08	1430				3										

- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDevita@dd6-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [x] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		8-20-08	1445

R2-0001696

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 2

Total Well Depth (from top of casing to bottom of screen): 145'

Well Diameter: 2"

Sampling Crew: Kevin Mettoff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnesium, Calcium

Sample Date: 8-20-08

Depth to Water (from top of casing): 39'

Volume of Standing Water in well: 16.96 Gallons

Purge Time: Start: 8^05 Finish: 9^35

Sample Time: Start: 9^35 Finish: 9^37

PURGE DATA										
Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^05	I	I	5.55	0.463	10.23	15.97	—	0.0	-45	
8^15	1	10	8.48	0.479	5.80	16.91	—	999	-164	
8^25	1	20	6.44	0.373	5.93	17.24	—	999	-36	
8^35	1	30	5.42	0.350	6.47	17.39	—	999	44	
8^45	1	40	5.40	0.347	6.46	17.50	-	451	51	
8^55	1	50	5.34	0.342	6.67	17.54	—	203	65	
9^05	1	60	5.26	0.339	6.36	17.72	—	301	71	
9^15	1	70	5.27	0.341	6.14	17.88	—	58.4	77	
9^25	1	80	5.24	0.340	5.94	18.05	—	28.4	82	
9^35	1	90	5.23	0.340	5.90	18.18	—	9.7	84	

R2-0001697

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-20-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 2

Field Sample I.D. Number TMW 2 @ 145' **Time** 0935'

Weather Sunny, Cool, No Humidity **Temperature** 62°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 39' **Measurement Method** Water Level Indicator

Depth of Well 145' **Measurement Method** Sounding Tape

Volume Removed 90 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.23 **Odor** No Odor

Temperature (°C) 18.18 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 2

Total Well Depth (from top of casing to bottom of screen): 125'

Well Diameter: 2"

Sampling Crew: Kevin Methiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Sample Date: 8-20-08

Depth to Water (from top of casing): 38'

Volume of Standing Water in well: 13.92 Gallons

Purge Time: Start: 10^00 Finish: 12^00

Sample Time: Start: 12^00 Finish: 12^02

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10^00	I	I	5.77	0.360	8.72	17.80	—	766	-2	
10^20	1/2	10	5.94	0.382	4.99	21.99	—	999	-75	
10^40	1/2	20	5.60	0.417	5.31	22.65	—	655	-11	
11^00	1/2	30	5.49	0.464	5.79	23.12	—	574	25	
11^20	1/2	40	5.41	0.488	5.86	23.40	—	0.0	38	
11^40	1/2	50	5.36	0.505	6.09	22.95	—	0.0	50	
12^00	1/2	60	5.32	0.511	6.44	22.22	—	0.0	63	

R2-0001699

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-20-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 2

Field Sample I.D. Number TMW 2 @ 125' **Time** 1200

Weather Sunny, Hot, low Humidity **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 125' **Measurement Method** Sounding Tape

Volume Removed 60 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.32 **Odor** No Odor

Temperature (°F/°C) 2222 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001700

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-2

Sample Date: 8-20-08

Total Well Depth (from top of casing to bottom of screen): 105'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 10.72 Gallons

Sampling Crew: Kevin McKiff

Purge Time: Start: 12^30 Finish: 14^30

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14^30 Finish: 14^32

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magonese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^30	I	I	5.61	0.494	9.88	19.67	—	999	9.88	
12^50	1/2	10	6.04	0.428	5.79	24.72	—	999	5.79	
1^10	1/2	20	6.05	0.384	4.44	26.27	—	999	4.44	
1^30	1/2	30	5.95	0.369	4.86	26.88	—	999	4.86	
1^50	1/2	40	5.78	0.363	4.93	16.18	—	707	4.93	
2^10	1/2	50	5.67	0.370	4.84	27.29	—	374	4.84	
2^30	1/2	60	5.58	0.384	5.03	26.63	—	198	5.03	

R2-0001701

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-20-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kerry Metkiff

Sample Location/Well No. TMW 2

Field Sample I.D. Number TMW 2 @ 105' **Time** 1430

Weather Sunny, Hot, low humidity **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 105' **Measurement Method** Sounding Tape

Volume Removed 60 Gallons **Removal Method** Pump

Field Test Results

Color Cloudy **pH** 5.58 **Odor** No Odor

Temperature (°F/C) 26.63 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Durrka & Bartolucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW 2 State: NY
Sampler(s): Kevin Metkiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Manganese	Calcium	QA Reporting Notes: (check if needed)
	TMW 2 (85')	8-21-08	0935	G	GW	2	3			3	X	X	X	X	X	X	High Turbidity for Metals
	TMW 2 (65')	8-21-08	1115	G	GW	2	3			3	X	X	X	X	X	X	
	Trip Blank	8-21-08	1115				3										

- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDevita@db-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		8-21-08	1130

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 2

Sample Date: 8-21-08

Total Well Depth (from top of casing to bottom of screen): 85'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 7.52 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 7^50 Finish: 9^30

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 9^35 Finish: 9^37

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7^50	I	I	6.06	0.508	2.41	15.59	—	999	-60	High Turbidity
8^10	1/2	10	10.78	0.415	4.60	18.36	—	999	-138	↓
8^30	1/2	20	6.70	0.368	5.10	19.36	—	999	-77	
8^50	1/2	30	6.10	0.382	5.81	20.75	—	999	-40	
9^10	1/2	40	6.14	0.407	6.00	21.74	—	999	11	
9^30	1/2	50	5.92	0.448	5.86	22.41	—	999	48	

R2-0001704

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-21-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 2

Field Sample I.D. Number TMW 2 @85' **Time** 935

Weather Sunny, Cool, No humidity **Temperature** _____

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 85' **Measurement Method** Sounding Tape

Volume Removed 50 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.92 **Odor** No Odor

Temperature (°C) 22.41 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnesium

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 2

Total Well Depth (from top of casing to bottom of screen): 65'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Sample Date: 8-21-08

Depth to Water (from top of casing): 32'

Volume of Standing Water in well: 5.28 Gallons

Purge Time: Start: 9^55 Finish: 11^10

Sample Time: Start: 11^10 Finish: 11^15

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
9^55	N/A	N/A	5.70	0.497	9.24	20.12	—	999	-10	Well purged dry when
10^30	N/A	5.28	5.83	0.004	9.18	20.52	—	999	19	started purging operations.
10^52	N/A	5.28	5.90	0.324	6.56	26.23	—	999	1	It was decided to
11^10	N/A	5.28	5.69	0.316	5.20	23.77	—	999	7	pump the well dry, then
										allow time to recharge
										and repeat at least
										three times before sampling.

R2-0001706

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-21-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 2

Field Sample I.D. Number TMW 2 @ 65' **Time** 11^15

Weather Sunny, Cool, No Humidity **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 32' **Measurement Method** Water Level Indicator

Depth of Well 65' **Measurement Method** Sounding Tape

Volume Removed 15.84 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** ~~5.89~~ **Odor** No Odor

Temperature (°F) ~~23.73~~ **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. P/S --

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

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A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka and Bartlucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVito

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-1 State: NY
Sampler(s) Kevin Metkiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes: (check if needed)
	TMW-1 (285')	8-26-08	0945	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW-1 (285' MS)	8-26-08	0945	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW-1 (285' MSD)	8-26-08	0945	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW-1 (265')	8-26-08	1410	G	GW	2/4	3			3	X	X	X	X	X	X	
	Trip Blank	8-26-08	1410	G			3										

- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard
- [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDevita@db-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
K Metkiff		8-26-08	1420

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 1

Sample Date: 8-26-08

Total Well Depth (from top of casing to bottom of screen): 285'

Depth to Water (from top of casing): 37'

Well Diameter: 2"

Volume of Standing Water in well: 39.68 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 8^25 Finish: 9^43

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 9^45 Finish: 9^47

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnesium Manganese, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^25	I	I	5.09	0.191	9.96	14.63	-	826	170	
8^38	1½	20	6.41	0.231	5.62	14.35	-	999	-14	
8^51	1½	40	5.14	0.290	5.93	14.09	-	999	100	
9^04	1½	60	4.98	0.327	5.00	14.04	-	0.0	120	
9^17	1½	80	4.92	0.325	4.75	14.04	-	0.0	129	
9^30	1½	100	4.89	0.324	4.63	14.06	-	0.0	134	
9^43	1½	120	4.85	0.324	4.54	14.03	-	0.0	138	

R2-0001709

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-26-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 1

Field Sample I.D. Number TMW-1 @285' **Time** 0945

Weather Sunny, Cool, No Humidity **Temperature** 60°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 37' **Measurement Method** Water Level Indicator

Depth of Well 285' **Measurement Method** Sounding Tape

Volume Removed 120 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 4.85 **Odor** No Odor

Temperature (°F) 14.03 C **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. --

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesese, Magnesium, Calcium.

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW - 1

Sample Date: 8-26-08

Total Well Depth (from top of casing to bottom of screen): 265'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 36.32 Gallons

Sampling Crew: Kevin Metkoff

Purge Time: Start: 10^15 Finish: 14^07

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 14^10 Finish: 14^12

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10^15	I	I	5.42	0.216	8.79	16.86	—	441	75	
10^35	1	20	5.37	0.279	4.87	17.97	—	419	51	Pump shut down
11^53	1	40	5.58	0.313	9.97	15.65	—	217	-13	Pump restarted
12^07	1	60	5.79	0.304	7.42	18.17	—	221	-21	
12^25	1	80	5.85	0.308	5.06	20.25	—	999	-39	
12^47	1	100	5.79	0.170	5.48	20.91	—	999	-9	
13^07	1	120	5.74	0.134	5.40	21.09	—	654	14	
13^27	1	140	5.62	0.102	5.88	21.42	—	284	47	
13^47	1	160	5.48	0.089	6.36	21.65	—	11.4	70	
14^07	1	180	5.45	0.084	6.44	21.86	—	0.0	80	

R2-0001711

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-26-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Mettiff

Sample Location/Well No. TMW 1

Field Sample I.D. Number TMW 1 @ 265' **Time** 1410

Weather Sunny, Hot, Humid **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 265' **Measurement Method** Sounding Tape

Volume Removed 180 gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.45 **Odor** No Odor

Temperature (°F) 21.86 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirkan and Bartilucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-1 State: NY
Sampler(s): Kevin Metkoff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium
	TMW-1 (245')	8-27-08	1045	G	GW	2	3			3	X	X	X	X	X	X
	TMW-1 (225')	8-27-08	1240	G	GW	2/4	3			3	X	X	X	X	X	X
	TMW-1 (205')	8-27-08	1540	G	GW	2/4	3			3	X	X	X	X	X	X
	Trip Blank	8-27-08	1540	G			3									

QA Reporting Notes: (check if needed)
- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to _____
- EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		8-27-08	1550

R2-0001713

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-1

Sample Date: 8-27-08

Total Well Depth (from top of casing to bottom of screen): 245'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 33.12 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 8^05 Finish: 10^45

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 10^45 Finish: 10^45

Sample Analysis: VOCs, Alkalinity, Ferous Iron, Moganese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^05	I	I	4.80	0.185	8.69	15.93	-	0.0	83	Due to low yield time
8^45	1/4	10	6.32	0.150	5.08	18.47	-	0.0	-102	decided to purge one
9^25	1/4	20	6.29	0.146	4.58	20.14	-	999	-98	well volume then sample.
9^45	1/4	25	5.84	0.287	4.54	20.73	-	999	-43	
10^05	1/4	30	5.77	0.304	4.71	20.48	-	999	-30	
10^25	1/4	35	5.66	0.309	4.71	21.14	-	948	-15	
10^45	1/4	40	5.60	0.323	4.60	21.60	-	491	-8	

R2-0001714

Duffy and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-27-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 1

Field Sample I.D. Number TMW 1 @ 245' **Time** 1045

Weather Sunny, Cool, No Humidity **Temperature** 62°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 245' **Measurement Method** Sounding Tape

Volume Removed 40 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 5.60 **Odor** No Odor

Temperature (°F) 21.60 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW - 1

Sample Date: 8-27-08

Total Well Depth (from top of casing to bottom of screen): 225'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 29.92 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 11^05 Finish: 12^35

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12^40 Finish: 12^42

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
11^05	I	I	5.81	0.211	7.22	21.02	--	999	-14	
11^25	1	20	5.29	0.333	4.13	16.00	--	999	64	
11^45	1	40	5.07	0.332	4.16	15.62	--	326	110	
12^05	1	60	5.47	0.330	4.23	15.79	--	0.0	127	
12^25	1	80	5.13	0.331	4.22	15.87	--	0.0	136	
12^35	1	90	4.96	0.331	4.25	15.86	--	0.0	139	

R2-0001716

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-27-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-1

Field Sample I.D. Number TMW-1 @ 225' **Time** 1240

Weather Sunny, Cool, low humidity **Temperature** 68°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 225' **Measurement Method** Sounding Tape

Volume Removed 90 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 4.96 **Odor** No Odor

Temperature (°F/C) 15.86 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-1

Sample Date: 8-27-08

Total Well Depth (from top of casing to bottom of screen): 205'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 26.72 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12^55 Finish: 15^35

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 15^40 Finish: 15^42

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^55	I	I	8.63	0.249	6.34	19.49	–	999	-40	
13^15	1/2	10	6.65	0.323	3.90	21.89	–	67.6	18	
13^35	1/2	20	5.47	0.302	3.60	22.13	–	999	38	
13^55	1/2	30	5.31	0.288	4.23	21.55	–	586	69	
14^15	1/2	40	5.19	0.287	4.37	21.45	–	185	83	
14^35	1/2	50	5.13	0.287	4.41	21.35	–	86	92	
14^55	1/2	60	5.11	0.289	4.39	21.36	–	47.5	97	
15^15	1/2	70	5.07	0.289	4.32	21.85	–	32.0	101	
15^35	1/2	80	5.09	0.290	4.37	21.56	–	25.5	103	

R2-0001718

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-27-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-1

Field Sample I.D. Number TMW-1@205' **Time** 1540

Weather Sunny, Hot, Humid **Temperature** 85°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 205' **Measurement Method** Sounding Tape

Volume Removed 80 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.09 **Odor** No Odor

Temperature (°C) 21.56 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka and Cartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
(516) 364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-00
Site Name: New Cassel Industrial Area
Location: TMW-1 State: NY
Sampler(s): Kevin Mehiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes: (check if needed)
	TMW 1 (185')	8.28.08	0845	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW 1 (165')	8.28.08	0954	G	GW	2	3			3	X	X	X	X	X	X	
	TMW 1 (145')	8.28.08	1330	G	GW	2	3			3	X	X	X	X	X	X	
	TMW 1 (125')	8.28.08	1445	G	GW	2	3			3	X	X	X	X	X	X	
	Trip Blank	8.28.08	1445	G			3										

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to FDevita@dl-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		8.28.08	1510

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-1

Total Well Depth (from top of casing to bottom of screen): 185'

Well Diameter: 2"

Sampling Crew: Kevin Mothiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

Sample Date: 8-28-08

Depth to Water (from top of casing): 38'

Volume of Standing Water in well: 23.52 Gallons

Purge Time: Start: 8^00 Finish: 8^45

Sample Time: Start: 8^45 Finish: 8^47

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
8^00	I	I	4.12	0.359	9.32	16.96	--	121	68	
8^05	2	10	6.22	0.340	4.71	14.98	--	999	-78	
8^10	2	20	5.71	0.297	5.57	14.93	--	999	17	
8^15	2	30	5.82	0.292	6.03	14.96	--	999	62	
8^20	2	40	5.43	0.291	5.94	15.00	--	764	84	
8^25	2	50	5.50	0.290	5.93	15.01	--	579	92	
8^30	2	60	5.44	0.290	5.91	15.01	--	360	98	
8^35	2	70	5.40	0.293	6.05	15.13	--	70.2	109	
8^40	2	80	5.39	0.293	5.95	15.08	--	25.3	113	
8^45	2	90	5.39	0.293	5.94	15.07	--	0.0	119	

R2-0001721

D'Appolonia
and
Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-28-08

SAMPLE INFORMATION RECORD

Site: New Castle Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-1

Field Sample I.D. Number TMW-1 @ 185' **Time** 08^45

Weather Sunny, Mild, low humidity **Temperature** 70°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 185' **Measurement Method** Sounding Tape

Volume Removed 90 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.39 **Odor** No Odor

Temperature (°F) ~~°F~~ C 15.07 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW 1

Sample Date: 8-28-08

Total Well Depth (from top of casing to bottom of screen): 165'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 20.32 Gallons

Sampling Crew: Kevin Methoff

Purge Time: Start: 900 Finish: 954

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 954 Finish: 956

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
900	I	I	4.80	0.273	8.36	19.23	-	127	156	It was decided to sample
906	.25	10	6.34	0.360	4.53	16.19	-	999	-103	after purging one well
914	1/4	12	6.83	0.339	4.68	20.02	-	209	-101	volume due to low yield.
922	1/4	14	6.48	0.336	4.76	20.23	-	262	-101	
930	1/4	16	6.22	0.326	4.67	21.56	-	305	-85	
938	1/4	18	6.12	0.321	4.57	22.63	-	457	-74	
946	1/4	20	6.04	0.310	4.54	23.55	-	682	-55	
954	1/4	22	6.08	0.310	4.59	24.23	-	999	-26	

R2-0001723

D'Appolonia
and
Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-28-08

SAMPLE INFORMATION RECORD

Site: New Castel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-1

Field Sample I.D. Number TMW-1 @ 165' **Time** 0954

Weather Sunny, Mild, low humidity **Temperature** 70°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 165' **Measurement Method** Sounding Tape

Volume Removed 22 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 6.08 **Odor** No Odor

Temperature (°F) 24.23 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001724

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW - 1

Sample Date: 8-28-08

Total Well Depth (from top of casing to bottom of screen): 145'

Depth to Water (from top of casing): 38'

Well Diameter: 2"

Volume of Standing Water in well: 17.12 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 10^40 Finish: 13^30

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 13^30 Finish: 13^32

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnesium, Calcium, Magnesium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
10^40	I	I	4.82	0.271	8.02	22.08	--	999	-22	
11^00	1/2	10	7.93	0.299	4.28	22.36	--	999	-35	
11^20	1/2	20	6.25	0.314	4.41	23.41	--	999	-33	
11^40	1/2	30	6.06	0.312	4.65	24.17	--	598	10	
12^00	1/2	40	5.55	0.308	4.94	24.36	--	425	35	
12^20	1/2	50	5.47	0.304	5.22	24.78	--	352	48	
12^40	1/2	60	5.39	0.289	5.48	24.78	--	230	61	
1^00	1/2	70	5.38	0.282	5.60	25.14	--	233	69	
1^20	1/2	80	5.36	0.276	5.77	25.87	--	212	74	
1^30	1/2	85	5.26	0.274	5.89	25.95	--	231	77	

R2-0001725

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-28-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW-1

Field Sample I.D. Number TMW-1 @ 145' **Time** 1330

Weather Sunny, Mild, low humidity **Temperature** 75°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 145' **Measurement Method** Sounding Tape

Volume Removed 85 Gallons **Removal Method** Pump

Field Test Results

Color Turb'd **pH** 5.26 **Odor** No Odor

Temperature (°C) 25.95 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-1

Total Well Depth (from top of casing to bottom of screen): 125'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnesium, Manganese, Calcium

Sample Date: 8-28-08

Depth to Water (from top of casing): 44'

Volume of Standing Water in well: 12.96 Gallons

Purge Time: Start: 13^47 Finish: 14^43

Sample Time: Start: 14^45 Finish: 14^47

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
13^47	I	I	5.61	0.295	6.77	23.68	~	999	-12	
13^55	1/4	2	7.16	0.285	5.39	22.23	~	999	7	
14^03	1/4	4	7.28	0.290	5.71	22.27	~	999	8	
14^11	1/4	6	5.73	0.294	4.70	22.67	~	999	4	
14^19	1/4	8	5.74	0.295	4.26	23.81	~	999	-1	
14^27	1/4	10	5.69	0.292	4.26	24.45	~	999	-3	
14^35	1/4	12	5.99	0.290	4.38	25.08	~	999	-4	
14^43	1/4	13	6.32	0.289	4.73	25.66	~	999	-6	

R2-0001727

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-28-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-1

Field Sample I.D. Number TMW-1 @ 125' **Time** 1445

Weather Sunny, Hot, Humid **Temperature** 83°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 44' **Measurement Method** Water Level Indicator

Depth of Well 125' **Measurement Method** Sounding Tape

Volume Removed 12 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 6.32 **Odor** No Odor

Temperature (°F) 25.66 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	**1¼" = 0.077**	**2" = 0.16**	**3" = 0.37**	**4" = 0.65**
	1½ =0.10	**2½ " = 0.24**	**3½ = 0.50**	**6" = 1.46**

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [X] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avitka and Gastlucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-1 State: NY
Sampler(s) Kevin Mattiff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes: (check if needed)
	TMW-1 (115')	8.29.08	0850	G	GW	2	3			3	X	X	X	X	X	X	High Turbidity Metals analysis for dissolved
	TMW-1 (85')	8.29.08	1145	G	GW	2/4	3			3	X	X	X	X	X	X	
	TMW-1 (72')	8.29.08	1250	G	GW	2/4	3			3	X	X	X	X	X	X	
	Trip Blank	8.29.08	1250				3										

QA Reporting Notes (check if needed):
- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [X] E-mail to FDevita@db-eng.com
- EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		8.29.08	1310

R2-0001729

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-1

Total Well Depth (from top of casing to bottom of screen): 115'

Well Diameter: 2"

Sampling Crew: Kevin Metkiff

Purging Method: Pump

Sampling Method: Grab

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnesse Magnesium, Calcium

Sample Date: 8.29.08

Depth to Water (from top of casing): 38'

Volume of Standing Water in well: 12.32 Gallons

Purge Time: Start: 7^55 Finish: 8^45

Sample Time: Start: 8^50 Finish: 8^52

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
7^55	I	I	5.32	0.403	9.69	15.92	--	999	2	
8^05	1	10	6.50	0.358	4.79	16.97	--	999	+104	
8^15	1	20	6.65	0.370	4.08	18.69	--	999	-125	
8^25	1	30	9.26	0.384	4.15	19.36	--	999	-80	
8^35	1	40	10.30	0.385	4.73	19.45	--	999	-32	
8^45	1	50	9.26	0.382	5.95	19.55	--	999	-4	

R2-0001730

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-29-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW-1

Field Sample I.D. Number TMW-1 @ 115' **Time** 0850

Weather Sunny, Cool, no humidity **Temperature** 66°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 38' **Measurement Method** Water Level Indicator

Depth of Well 115' **Measurement Method** Sounding Tape

Volume Removed 50 Gallons **Removal Method** Pump

Field Test Results

Color Turbid **pH** 9.26 **Odor** No Odor

Temperature (°F) 19.55 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-1

Sample Date: 8-29-08

Total Well Depth (from top of casing to bottom of screen): 85'

Depth to Water (from top of casing): 20'

Well Diameter: 2"

Volume of Standing Water in well: 10.40 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 9^35 Finish: 11^42

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 11^45 Finish: 11^47

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
9^35	I	I	6.87	0.437	7.10	15.71	—	999	9	
10^05	0.16	5	8.80	0.505	3.89	21.10	—	999	-25	
10^45	0.12	10	5.34	0.610	5.76	23.80	—	643	62	
11^10	0.08	13	5.29	0.646	6.86	24.13	—	119	77	
11^26	0.12	15	5.22	0.659	6.76	24.73	—	17.6	89	
11^34	0.25	17	5.18	0.664	6.82	24.73	—	22	93	
11^42	0.25	19	5.18	0.672	6.87	24.60	—	29	98	

R2-0001732

and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-29-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-1

Field Sample I.D. Number TMW-1@85' **Time** 11:45

Weather Sunny, Hot, Humid **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 20' **Measurement Method** Water Level Indicator

Depth of Well 85' **Measurement Method** Sounding Tape

Volume Removed 19 Gallons **Removal Method** Pump

Field Test Results

Color Clear **pH** 5.18 **Odor** No Odor

Temperature (°F) 24.60 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW-1

Sample Date: 8-29-08

Total Well Depth (from top of casing to bottom of screen): 72'

Depth to Water (from top of casing): 24'

Well Diameter: 2"

Volume of Standing Water in well: 7.68 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12^05 Finish: 12^46

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12^50 Finish: 12^52

Sample Analysis: VOCs, Alkalinity, Ferrous Iron, Magnese Magnesium, Calcium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12^05	I	I	6.00	0.359	9.75	20.75	-	999	21	
12^10	2	10	7.84	0.530	7.09	18.11	-	999	20	
12^12	1	12	6.43	0.645	5.91	18.25	-	999	43	
12^14	1	14	6.05	0.824	6.79	18.02	-	999	74	
12^16	1	16	7.86	0.890	7.28	17.97	-	999	85	
12^18	1	18	7.36	0.929	7.72	17.88	-	999	100	
12^20	1	20	7.15	0.958	7.90	17.97	-	999	114	
12^22	1	22	7.05	0.974	8.09	17.81	-	999	124	
12^24	1	24	6.13	0.996	8.26	17.68	-	999	134	
12^26	1	26	5.14	1.21	9.98	17.60	-	999	139	
12^28	1	28	5.11	1.24	9.07	17.52	-	999	150	
12^30	1	30	5.64	1.25	8.99	17.72	-	999	156	

R2-0001734

New Cassel Industrial Area

Vertical Profile Well Sampling Data Form

Vertical Profile Well ID: TMW - 1

Sample Date: 8-29-08

Total Well Depth (from top of casing to bottom of screen): 72'

Depth to Water (from top of casing): 24'

Well Diameter: 2"

Volume of Standing Water in well: 7.68 Gallons

Sampling Crew: Kevin Metkiff

Purge Time: Start: 12 05 Finish: 12 46

Purging Method: Pump

Sampling Method: Grab

Sample Time: Start: 12 50 Finish: 12 52

Sample Analysis: VOCs, Calcium, Alkalinity, Ferrous Iron, Magnese Magnesium

PURGE DATA

Sample Time:	Flow Rate (gpm)	Volume Purged (gallons)	pH (pH units)	Conductivity (mS/cm)	Dissolved Oxygen (mg/l)	Temperature (Celcius)	Salinity (Percent)	Turbidity (NTU)	Redox Potential (mV)	General Comments
12 32	1	34	5.40	1.26	9.05	17.70	—	828	160	
12 34	1	36	5.50	1.27	9.11	17.70	—	746	165	
12 36	1	38	4.97	1.25	9.78	17.64	—	265	170	
12 38	1	40	4.96	1.29	9.29	17.69	—	192	177	
12 40	1	42	4.88	1.29	9.31	17.60	—	157	182	
12 42	1	44	4.90	1.29	9.32	17.52	—	166	185	
12 46	1/2	46	4.85	1.29	9.25	17.79	—	167	197	

R2-0001735

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-29-08

SAMPLE INFORMATION RECORD

Site: New Cassel Industrial Area **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-1

Field Sample I.D. Number TMW-1@ 72' **Time** 12^50

Weather Sunny, Hot, Humid **Temperature** 80°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 24' **Measurement Method** Water Level Indicator

Depth of Well 72' **Measurement Method** Sounding Tape

Volume Removed 46 Gallons **Removal Method** Pump

Field Test Results

Color Cloudy **pH** 4.85 **Odor** No Odor

Temperature (°F) 17.79 **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka & Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2250
516-364-9810

Project Mgr.: Frank Devita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02

Site Name: NCIA

Location: TMW-3D State: NY

Sampler(s) K. McHaff

1=Na_2S2O_3 2=HC1 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	# of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic		VOCs	Ferrous Iron	Alkalinity	Magnesium	Manganese	Calcium	ASTM D422		QA Reporting Notes: (check if needed)
	TMW 3D@52'	10.1.08	1010	G	GW	—	3			1		X	X	X	X	X	X			[illegible]
	TMW 3D@72'	10.1.08	1200	G	GW	—	3			1		X	X	X	X	X	X			[illegible]
	Trip Blank	10.1.08	1200																	[illegible]
																				[illegible]
	TMW 3D@77'	10.1.08	1420	G	SO													X		[illegible]
																				[illegible]
																				[illegible]
																				[illegible]

QA Reporting Notes: (check if needed)

- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level

☐ Standard ☐ No QC

☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____

☒ E-mail to FDevita@db-eng.com

EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
K. McHaff		10.1.08	1610

175 Metro Center Boulevard • Warwick, RI 02886-1755 • 401-732-3400 • Fax 401-732-3499 • www.mitkem.com

R2-0001737

and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-1-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW.3D @ 52' **Time** 10^10

Weather 65° Partly Cloudy, Cool **Temperature** 65°

Sample Type:

Groundwater Hydropunch **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 52' bg. **Measurement Method** Based on drill rods

Volume Removed 1 liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnesse

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001738

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-1-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D @72' **Time** 12^00

Weather Partly Cloudy, Cool **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 72' bg **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnanese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½" = 0.24	3½ = 0.50	6" = 1.46

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MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 7 to 10 business days
- ☐ Rush TAT - Date Needed:_____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Gartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: NCIA
Location: TMW-3D State: NY
Sampler(s): Kevin Metkiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8= $NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW= Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

QA Reporting Notes: (check if needed)
- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other_____

State specific reporting standards: _____

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	# of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Shelby Tube	VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	ASTM Method 0422		QA Reporting Notes
	TMW-3D@92'	10.2.08	1000	G	GW	2	3			3		X	X	X	X	X	X			
	TMW-3D@112'	10.2.08	1145	G	GW	2	3			3		X	X	X	X	X	X			
	Trip Blank	10.2.08	1145	G			3													
	TMW-3D 117-119'	10.2.08	1415	G	SO						1							X		*Taken from a Split Spoon

☐ Fax results when available to (____) _____
☒ E-mail to FDevita@db-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
K. Metkiff		10.2.08	1445

R2-0001740

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-2-08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3A

Field Sample I.D. Number TMW-3A @ 92' **Time** 10^00

Weather Sunny, Cool **Temperature** 55°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 92' bg **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color clear **pH** N/A **Odor** No odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs Alkalinity Ferrous Iron Maganese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001741

D&B and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·2·08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3A

Field Sample I.D. Number TMW-3A @ 112' **Time** 11^45

Weather Sunny, Cool **Temperature** 55°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 112' **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnesese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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R2-0001742

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 7 to 10 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Bvirka and Bartlucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-3D State: NY
Sampler(s): Kevin Mehoff

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Shelby Tube	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	ASTM D4428 Methane	QA Reporting Notes (check if needed)
	TMW 3D @ 132'	10.3.08	1020	G	GW	2	3			3		X	X	X	X	X	X		
	TMW 3D @ 152'	10.3.08	1200	G	GW	2	3			3		X	X	X	X	X	X		
	TMW 3D @ 157-159'	10.3.08	1250	G	SO	—					1							X	* Sediment from a split spoon that was placed in a shelby tube.
	Trip Blank	10.3.08	1300	G			3												
	TMW 3D @ 172'	10.3.08	1430	G	GW	2	3			3		X	X	X	X	X	X		

QA Reporting Notes (check if needed):
- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDeVita@db-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		10.3.08	1445

R2-0001743

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-3-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D @ 132' **Time** 10^20

Weather Partly Cloudy cool **Temperature** 54°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 132' **Measurement Method** based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-3-08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D@152' **Time** 12^00

Weather Overcast, Cool **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 152' **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese
Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-3-08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-31

Field Sample I.D. Number TMW-31@172' **Time** 14 30

Weather Overcast, Cool **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 172' **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs Alkalinity Ferrous Iron Magnese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001746

MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka and Bottilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW-3D State: NY
Sampler(s): Kevin Metkiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Shelby Tube	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	ASTM Method D422		QA Reporting Notes: (check if needed)
	TMW3D@192'	10.6.08	0945	G	GW	2	3			3		X	X	X	X	X	X			
	TMW3D@212'	10.6.08	1120	G	GW	2	3			3		X	X	X	X	X	X			
	TMW3D@232'	10.6.08	1420	G	GW	2	3			3		X	X	X	X	X	X			
	TMW3D@217'	10.6.08	1215	G	SO			2										X		*Reanalysis
	Trip Blank	10.6.08	1420	G			3													

QA Reporting Notes (check if needed):
- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard
- [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDevita@db-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		10.6.08	1435

R2-0001747

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-6-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 3-D

Field Sample I.D. Number TMW 3D @ 192' **Time** 945

Weather Partly Cloudy, Cool **Temperature** 53°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 192'bg **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.6.08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 3D

Field Sample I.D. Number TMW 3D @ 212' **Time** 11^20

Weather Partly Cloudy, Cool **Temperature** 53°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 212'bg **Measurement Method** Based on drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Maganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·6·08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 3A

Field Sample I.D. Number TMW 3A @ 232' **Time** 14^20

Weather Sunny, Warm **Temperature** 66°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 232'bg **Measurement Method** Based on Drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Bartilucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890

Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564.02

Site Name: New Cassel Industrial Area

Location: TMW-3D State: NY

Sampler(s) Kevin Metkiff

1=Na_2S2O_3 2=HC1 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9= _____ 10= _____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1= _____ X2= _____ X3= _____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Shelby Tube	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	ASTM method D422		QA Reporting Notes: (check if needed)
	TMW3D@252'	10.7.08	1035	G	GW	2	3			3		X	X	X	X	X	X			
	TMW3D@272'	10.7.08	1305	G	GW	2	3			3		X	X	X	X	X	X			
	TMW3D@257-259'	10.7.08	1115	G	SO						1							X		* reconstitute, sediment from split spoon
	TMW3D@282-284'	10.7.08	1335	G	SO						1							X		↓
	Trip Blank	10.7.08	1520	G			3					X								

☐ Fax results when available to (____) _____

☒ E-mail to FDevita@db-eng.com

EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
[signature]		10.7.08	1520

QA Reporting Notes: (check if needed)

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

175 Metro Center Boulevard • Warwick, RI 02886-1755 • 401-732-3400 • Fax 401-732-3499 • www.mitkem.com

R2-0001751

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.7.08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D @252' **Time** 10^35

Weather Sunny, Cool **Temperature** 46°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 252' **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Maganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	**1¼" = 0.077**	~~**2" = 0.16**~~	**3" = 0.37**	**4" = 0.65**
	1½ =0.10	**2½ " = 0.24**	**3½ = 0.50**	**6" = 1.46**

D&B_SIR/kb Rev. 03/09/98

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·7·08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW - 3D

Field Sample I.D. Number TMW-3D @ 272' **Time** 13^05

Weather Sunny, Mild **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 272' **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs Alkalinity Ferrous Iron Manganese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka + Bartilucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890
Project Mgr.: Frank Sevia

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564.02
Site Name: New Cassel Industrial Area
Location: TMW-3D State: NY
Sampler(s) Kevin Mettiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes: (check if needed)
	TMW3D@297'	10.8.08	0935	G	GW	2	3			3	X	X	X	X	X	X	
	TMW3D@312'	10.8.08	1120	G	GW	2	3			3	X	X	X	X	X	X	
	TMW3D@337'	10.8.08	1520	G	GW	2	3			3	X	X	X	X	X	X	
	Trip Blank	10.8.08	1530				3				X						

- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDevia@dvl-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		10.8.08	1545

R2-0001754

and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.8.08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D@297 **Time** 9^35

Weather Sunny, Cold **Temperature** 50°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 297' **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	**1¼" = 0.077**	**2" = 0.16**	**3" = 0.37**	**4" = 0.65**
	1½ =0.10	**2½ " = 0.24**	**3½ = 0.50**	**6" = 1.46**

D&B_SIR/kb Rev. 03/09/98

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10 · 8 · 08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D @ 312' **Time** 11^20

Weather Sunny, Mild **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 312' **Measurement Method** Based on drillrods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½" = 0.24	3½ = 0.50	6" = 1.46

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.8.08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D @ 337' **Time** 15^20

Weather Sunny, Mild **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 337' **Measurement Method** Based on Drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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R2-0001757

MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartlucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890

Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02

Site Name: New Cassel Industrial Area

Location: TMW-3D State: NY

Sampler(s) Kevin Mettiff

1=Na_2S2O_3 2=HC1 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9= _____ 10= _____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1= _____ X2= _____ X3= _____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	# of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic		VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes: (check if needed)
	TMW3D@357'	10.9.08	1150	G	GW	2	3			3		X	X	X	X	X	X			* This is a Sample as well as MS/MSD
	TMW3D@377'	10.9.08	1520	G	GW	2	3			3		X	X	X	X	X	X			
	Trip Blank	10.9.08	1530	G			3					X								

QA Reporting Notes: (check if needed)

- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level

☐ Standard ☐ No QC

☐ Other _____

State specific reporting standards:

☐ Fax results when available to (____) _____

☒ E-mail to FDevita@db-eng.com

EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
[signature]		10.9.08	1535

R2-0001758

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-9-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D@357' **Time** 1150

Weather Sunny, Warm **Temperature** ~~75~~°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 357' **Measurement Method** Based on Drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** N/A

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

* This sample was also used for MS/MSD

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb

Rev. 03/09/98

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.9.08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D@377' **Time** 15[20]

Weather Sunny, Warm **Temperature** 75°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 377' **Measurement Method** Based on Drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb

Rev. 03/09/98

R2-0001760

MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartlucci
330 Crossways Park Drive
Woodbury New York 11797-2050
516-364-9890

Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564-02

Site Name: New Cassel Industrial Area

Location: TMW-3D State: NY

Sampler(s) Kevin Mettiff

1=Na_2S2O_3 2=HC1 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic		Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes: (check if needed)
	TMW3D@392'	10.10.08	1025	G	GW	2	3			3		X	X	X	X	X	X			
	TMW3D@412'	10.10.08	1210	G	GW	2	3			3		X	X	X	X	X	X			
	TMW3D@432'	10.10.08	1500	G	GW	2	3			3		X	X	X	X	X	X			
	Trip Blank	10.10.08	1500	G			3					X	X	X	X	X	X			

QA Reporting Notes: (check if needed)

- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____

☒ E-mail to FDevita@db-eng.com

EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
[signature]		10.10.08	1500

175 Metro Center Boulevard • Warwick, RI 02886-1755 • 401-732-3400 • Fax 401-732-3499 • www.mitkem.com

R2-0001761

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.10.08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Methiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D@392' **Time** 10^25

Weather Dark, Cool **Temperature** 55°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 392' **Measurement Method** Based on drill rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.10.08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D@412' **Time** 12^10

Weather Sunny, Warm **Temperature** 72°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 412' **Measurement Method** Based on Drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½" = 0.24	3½ = 0.50	6" = 1.46

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and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·10·08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D@ 432' **Time** 15^00

Weather Sunny, Warm **Temperature** 75°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 432' **Measurement Method** Based on Drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs Alkalinity Ferrous Iron Maganese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797
516-364-9890

Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564.02
Site Name: New Cassel Industrial Area
Location: TMW-3D State: NY
Sampler(s): Kevin Metcalf

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes (check if needed)
	TMW3D@452'	10.11.08	1000	G	GW	2	3			3	X	X	X	X	X	X	
	TMW3D@472'	10.11.08	1145	G	GW	2	3			3	X	X	X	X	X	X	
	TMW3D@492'	10.11.08	1400	G	GW	2	3			3	X	X	X	X	X	X	
	TMW3D@502'	10.11.08	1545	G	GW	2	3			3	X	X	X	X	X	X	
	Trip Blank	10.11.08	1550	G			3				X						

- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FJevita@D-B-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		10.13.08	0715

R2-0001765

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-11-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D @ 452' **Time** 10^00

Weather Sunny, Cool **Temperature** 55°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 452' **Measurement Method** Based on Drill Rods Used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

R2-0001766

and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.11.08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D@472' **Time** 1145

Weather Sunny, Warm **Temperature** 72°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 472' **Measurement Method** Based on Drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	**1¼" = 0.077**	**2" = 0.16**	**3" = 0.37**	**4" = 0.65**
	1½ =0.10	**2½ " = 0.24**	**3½ = 0.50**	**6" = 1.46**

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·11·08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D @ 492' **Time** 14^00

Weather Sunny, Warm **Temperature** 72°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 492' **Measurement Method** Based on Drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·11·08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-3D

Field Sample I.D. Number TMW-3D @502' **Time** 15⁴⁵

Weather Sunny, Warm **Temperature** 72°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 502' **Measurement Method** Based on Drill Rods used

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Maganeve, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Bartlucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
(516) 364-9890
Project Mgr.: Frank DeVita

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: NCIA
Location: TMW 8S State: NY
Sampler(s): Kevin McKiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Sleeve Tube	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Iron	Calcium	ASTM D422	QA Reporting Notes (check if needed)
	TMW8S @ 52'	10.29.08	1120	G	GW	2	3			3		X	X	X	X	X	X		
	Trip Blank	10.29.08	1200	G			3	*				X							
	TMW8S 57-59'	10.29.08	1150	G	SO						1							X	

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to FDeVita@d6-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		10.29.08	1500

R2-0001770

Dvirka and Bartilucci
CONSULTING ENGINEERS
/ISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·29·08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW 8J

Field Sample I.D. Number TMW 8J @ 52' **Time** 1120

Weather Mostly Cloudy, Cold **Temperature** 40°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 52' **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Turbid (silty) **pH** N/A **Odor** No Odor present

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. N/A

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-29-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D@ 57-59' **Time** 1150

Weather Sunny, Cold **Temperature** 40°

Sample Type:

Groundwater _____ **Sediment** ✓

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water _____ **Measurement Method** _____

Depth of Well _____ **Measurement Method** _____

Volume Removed _____ **Removal Method** _____

Field Test Results

Color _____ **pH** _____ **Odor** _____

Temperature (°F) _____ **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

ASTM method D422 and D5084

Remarks:

One foot recovery 0-6" Brown fine-medium SAND, wet, no odor or staining
6"-1' medium - coarse gravel

Well Casing Volumes

GAL/FT	**1¼" = 0.077**	**2" = 0.16**	**3" = 0.37**	**4" = 0.65**
	1½ =0.10	**2½ " = 0.24**	**3½ = 0.50**	**6" = 1.46**

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka & Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890

Project Mgr.: Frank DeVita

Invoice To: SAME

P.O. No.: _____ RQN: _____

Project No.: 2564.02

Site Name: NCIA

Location: TMW 8D State: NY

Sampler(s) Kevin Metkoff

1=Na_2S2O_3 2=HC1 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9= _____ 10= _____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1= _____ X2= _____ X3= _____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic		Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes: (check if needed)
	TMW 8D @ 82'	10/30/08	1200	G	GW	2	3			3		X	X	X	X	X	X			
	TMW 8D @ 92'	10/30/08	1450	G	GW	2	3			3		X	X	X	X	X	X			*Sample/MS/MSD
	[illegible]																			
	Trip Blank	10/30/08	1450	G			3					X								

QA Reporting Notes: (check if needed)

- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____

☒ E-mail to: FDevita@dh-eng.com

EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
[signature]		10/30/08	1500

R2-0001773

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-30-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @82' **Time** 12^00

Weather Sunny, Cool **Temperature** 46°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 82' bg **Measurement Method** Sandy Joyce

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Brown/Silty **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT				
	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-30-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW-8A

Field Sample I.D. Number TMW-8A @ 92' **Time** 14^50

Weather Sunny, Cool **Temperature** 46°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 92' bg **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear / Slightly silty towards the end **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT				
	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka & Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
(516) 364-9890
Project Mgr.: Frank DeVito

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: N.C.I.A
Location: TMW 8D State: NY
Sampler(s): Kevin Merkel

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes: (check if needed)
	TMW8S @ 112'	10.31.08	1124	G	GW	2	3			3	X	X	X	X	X	X	
	TMW8D @ 132'	10.31.08	1440	G	GW	2	3			3	X	X	X	X	X	X	
	Trip Blank	10.31.08	1440	G			3				X						

- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to FDeVita@dvb-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		10.31.08	1500

R2-0001776

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-31-08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 112' **Time** 11^24

Weather Sunny, Cold **Temperature** 33°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 112' **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.31.08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 132' bg **Time** 1440

Weather Sunny, Mild **Temperature** 55°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 132' bg **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Manganese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM CORPORATION
175 Metro Center Boulevard
Warwick, Rhode Island 02886-1755
(401) 732-3400 • Fax (401) 732-3499
email: mitkem@mitkem.com

CHAIN-OF-CUSTODY RECORD

Page 1 of 1

REPORT TO			INVOICE TO		
COMPANY Dvirka and Bartilucci	PHONE 516-364-4890		COMPANY Same as Report	PHONE	LAB PROJECT #: [redacted]
NAME Matt DeVinney	FAX 516-364-9047		NAME	FAX	
ADDRESS 330 Crossways Park Drive			ADDRESS		TURNAROUND TIME: Std.
CITY/ST/ZIP Woodbury, NY 11797			CITY/ST/ZIP		

CLIENT PROJECT NAME:	CLIENT PROJECT #:	CLIENT P.O.#:
New Cassel	2564	2564

SAMPLE IDENTIFICATION	DATE/TIME SAMPLED	COMPOSITE	GRAB	WATER	SOIL	OTHER	LAB ID	# OF CONTAINERS	TCL VOCs	Ferrous Iron	Ca / Mg / Mn Alkalinity											COMMENTS
TMW-6D(150)	1/13/08 15:50		✓	✓				6	✓	✓	✓	✓										Filter Metals Analysis
TMW-6D(177)	1/13/08 15:20		✓	✓				6	✓	✓	✓	✓										
	/																					
	/																					
	/																					
	/																					
	/																					
	/																					
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	/																					
	/																					

TSF#	RELINQUISHED BY	DATE/TIME	ACCEPTED BY	DATE/TIME	ADDITIONAL REMARKS:	COOLER TEMP:
	Matt DeVinney	1/13/08 17:00		/		
		/		/		
		/		/		

WHITE: LABORATORY COPY YELLOW: REPORT COPY PINK: CLIENT'S COPY

R2-0001779

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/3/08

SAMPLE INFORMATION RECORD

Site: NCIA **Sample Crew:** Matt Delaney

Sample Location/Well No. TMW-8D

Field Sample I.D. Number TMW-8D @ 152' **Time** 1050

Weather Sunny, Cool **Temperature** 47°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 152' **Measurement Method** Sounding Tape/rods

Volume Removed 1 liter **Removal Method** Hydropunch

Field Test Results

Color Turbid / Brown **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID = 0.0 ppm

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Manganese
Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/3/08

SAMPLE INFORMATION RECORD

Site: NCIA **Sample Crew:** Matt DeVinney

Sample Location/Well No. TMW-8D

Field Sample I.D. Number TMW-8D @ 177' **Time** 1520

Weather Cloudy, Cool **Temperature** 55°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 177' **Measurement Method** Sounding Tape/rods

Volume Removed 1 liter **Removal Method** Hydropunch

Field Test Results

Color Turbid / Brown **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID - 0.0 ppm

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 7 to 10 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Matt DeVinney
Dvirka Bartilucci Consulting Engineers
330 Crossways Park Dr.
Woodbury, NY 11797
Project Mgr.: Matt DeVinney

Invoice To: Same as Report

P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: New Cassel State: NY
Sampler(s): Matt DeVinney

1=$Na_2S_2O_3$ 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=None 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	TCL VOCs	Analyses: Alkalinity	Ferrous Iron	Ca/Mg/Mn	Asmindh2					QA Reporting Notes: (check if needed)
	TMW-4D(192)	11/4/08	12:40	G	GW	3/4	3	0	0	3	✓	✓	✓	✓						Filter metals analysis
	TMW-5D(212)	11/4/08	2:40	G	GW	2/4	3	0	0	3	✓	✓	✓	✓						
	TMW-6D(182)	11/4/08	10:35	G	SO	9	0	0	0	0					✓					Shelby Tube Sample

QA Reporting Notes (check if needed):
- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [x] Standard
- [ ] No QC
- [ ] Other Cat B

State specific reporting standards: NYSDEC

- [ ] Fax results when available to (_____) _____
- [ ] E-mail to _____
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
Matt DeVinney		11/4/08	4:05

R2-0001782

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/4/08

SAMPLE INFORMATION RECORD

Site: NCIA **Sample Crew:** Matt DeVinney

Sample Location/Well No. TMW-8D

Field Sample I.D. Number TMW-8D @ 182' **Time** 1035

Weather cloudy, breezy **Temperature** 50°

Sample Type:

Groundwater _____ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil ✓ Split Spoon **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water _____ **Measurement Method** _____

Depth of Well _____ **Measurement Method** _____

Volume Removed _____ **Removal Method** _____

Field Test Results

Color NA **pH** NA **Odor** NA

Temperature (°F) NA **Specific Conductance (umhos/cm)** NA

Other (OVA, Methane Meter, etc. PID - 0.0 ppm

Constituents Sampled

ASTM D422

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/4/08

SAMPLE INFORMATION RECORD

Site: NCIA **Sample Crew:** Matt DeVinney

Sample Location/Well No. TMW-8D

Field Sample I.D. Number TMW-8D @ 192' **Time** 1240

Weather Cloudy, breezy **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 192' **Measurement Method** Sounding tape/rods

Volume Removed 1 liter **Removal Method** Hydropunch

Field Test Results

Color Relatively Clear **pH** NA **Odor** NA

Temperature (°F) NA **Specific Conductance (umhos/cm)** NA

Other (OVA, Methane Meter, etc. PID - 0.1 ppm

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/4/08

SAMPLE INFORMATION RECORD

Site: NCIA **Sample Crew:** Matt DeVinney

Sample Location/Well No. TMW-6D

Field Sample I.D. Number **Time** 1440

Weather Cloudy, breezy **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment**

Surface Water/Stream **Air**

Soil **Other (describe, i.e. water, septage, etc.)**

Well Information (fill out for groundwater samples)

Depth to Water 56' **Measurement Method**

Depth of Well 212' **Measurement Method** Rod Depth

Volume Removed 1 liter **Removal Method** Hydropunch

Field Test Results

Color Relatively clear **pH** NA **Odor** NA

Temperature (°F) NA **Specific Conductance (umhos/cm)** NA

Other (OVA, Methane Meter, etc. PID - 0.0ppm

Constituents Sampled

VOCs Alkalinity Ferrous Iron Manganese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka + Bartolucci
330 Crossways Park Drive
Woodbury New York 11797-2050
(516) 364-9890
Project Mgr.: Matt DeVinney

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564.02
Site Name: New Cassel Industrial Area
Location: TMW 8D State: NY
Sampler(s): Kevin Metkiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	QA Reporting Notes (check if needed)
	TMW8D@237'	11/6/08	1455	G	GW	2	3			3	X	X	X	X	X	X	
	Trip Blank	11/6/08	1455	G			3										

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (_____) _____
☒ E-mail to MDevinney@dl-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		11/6/08	1535

R2-0001786

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.6.08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @237' **Time** 14^55

Weather Overcast, Cool **Temperature** 63°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 237'bg **Measurement Method** Based on rods/Sandy Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. N/A

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
(516) 364-9890
Project Mgr.: Matt DeVinney

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564.02
Site Name: New Cassel Industrial Area
Location: TMW 8D State: NY
Sampler(s) Kevin Mettkiff

1=Na_2S2O_3 2=HC1 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Shelby Tube	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium	ASTM Method D422		QA Reporting Notes: (check if needed)
	TMW 8D @ 257'	11.7.08	1240	G	GW		3					X								
	Trip Blank	11.7.08	1240	G			3					X								
	TMW 8D 262-264'	11.7.08	1346	G	SO						X							X		* reconstitute Sample
	TMW 8D @ 272'	11.7.08	1510	G	GW	2	3			3		X	X	X	X	X	X			

QA Reporting Notes: (check if needed)
- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other_____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to MDevinney@db-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
[signature]		11/7/08	1530

175 Metro Center Boulevard • Warwick, RI 02886-1755 • 401-732-3400 • Fax 401-732-3499 • www.mitkem.com

R2-0001788

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.7.08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 257' **Time** 12^40

Weather Overcast, Mild **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 257'6g **Measurement Method** Sandy Tape

Volume Removed 120mL (VOAs only) **Removal Method** Hydropunch

Field Test Results

Color Grey / Silty **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.7.08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 262-264' **Time** 13^46

Weather Overcast, Mild **Temperature** 65°

Sample Type:

Groundwater _____ **Sediment** ✓

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 262' **Measurement Method** Sounding Tape

Volume Removed 2' **Removal Method** Split Spoon

Field Test Results

Color Blackish Grey Clay **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

ASTM Method D422

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·7·08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 272' **Time** 15:10

Weather Overcast, Mild **Temperature** 65°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 272' **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartholucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890
Project Mgr.: Matt DeVinney

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW 8D State: NY
Sampler(s): Kevin Methiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes: (check if needed)
	TMW8D@292'	11.10.08	1030	G	GW	2	3			3	X	X	X	X	X	X			*Sample plus MS/MSD
	TMW8D@312'	11.10.08	1220	G	GW	2	3			3	X	X	X	X	X	X			
	Trip Blank	11.10.08	1220	G			3				X								
	TMW8D@337'	11.10.08	1515	G	GW	2	3			3	X	X	X	X	X	X			

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to MDevinney@dbe-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		11/10/08	1530

R2-0001792

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·10·08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 292' pNS MS/MSD **Time** 10 30

Weather Sunny, Cool **Temperature** 46°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 292' **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Manganese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT				
	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·10·08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8A

Field Sample I.D. Number TMW 8A @ 312'6 **Time** 12^20

Weather Sunny, Mild **Temperature** 55°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 312' **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear/Silty towards the end **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs Alkalinity Ferrous Iron Magnese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·10·08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Meitkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 337' **Time** 15-15

Weather Sunny, Mild **Temperature** 55°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 337'bg **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear/Silty towards end **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs Alkalinity Ferrous Iron Magnanese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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MITKEM LABORATORIES

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- [x] Standard TAT - 10 to 15 business days
- [ ] Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Avirka and Battucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
(516) 364-9890
Project Mgr.: Matt DeVinney

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW 8D State: NY
Sampler(s) Kevin Metkoff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium
	TMW 8A @ 357'	11.11.08	1150	G	GW	2	3			3	X	X	X	X	X	X
	TMW 8D @ 372'	11.11.08	1340	G	GW	2	3			3	X	X	X	X	X	X
	Trip Blank	11.11.08	1340	G			3				X					
	TMW 8B @ 392'	11.11.08	1515	G	GW	2	3			3	X	X	X	X	X	X

QA Reporting Notes: (check if needed)
- [ ] Provide MA DEP MCP CAM Report
- [ ] Provide CT DEP RCP Report

QA/QC Reporting Level
- [ ] Standard [ ] No QC
- [ ] Other _____

State specific reporting standards: _____

- [ ] Fax results when available to (____) _____
- [x] E-mail to MDevinney@dd-eng.com
EDD Format _____

Condition upon receipt: [ ] Iced [ ] Ambient [ ] °C _____

Relinquished by:	Received by:	Date:	Time:
		11/11/08	1530

R2-0001796

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.11.08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkoff

Sample Location/Well No. TMW 8A

Field Sample I.D. Number TMW 8A @ 357' **Time** 11^50

Weather Sunny, Cold **Temperature** 38°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 357' **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Slightly Turbid/Silty **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT				
	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·11·08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8S

Field Sample I.D. Number TMW 8S @ 372' **Time** 13^40

Weather Sunny, Mild **Temperature** 50°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 372' bg **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear / Silty towards the end **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs | Alkalinity | Ferrous Iron | Magnese

Magnesium | Calcium | |

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.11.08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8A

Field Sample I.D. Number TMW 8A @ 392' **Time** 15^15

Weather Sunny, Mild **Temperature** 50°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50° **Measurement Method** _____

Depth of Well 392' bg **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
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Report To: Svirka and Barthucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
(516) 364-9890
Project Mgr.: Matt DeVinney

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: New Cassel Industrial Area
Location: TMW8D State: NY
Sampler(s): Kevin McKiff

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Shelby Tube	Analyses: ASTM method D422	ASTM method D5084	QA Reporting Notes: (check if needed)
	TMW8D@82-84'	10/30/08	1217	G	SO						1	X	X	*Reconstitute sediment
	TMW8D@222-224'	11/6/08	1040	G	SO						1	X	X	"

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to MDeVinney@db-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		11/12/08	1530

R2-0001800

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-30-08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 82-84' **Time** 12'17

Weather Sunny, Cool **Temperature** 46°

Sample Type:

Groundwater _____ **Sediment** ✓

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water _____ **Measurement Method** _____

Depth of Well _____ **Measurement Method** _____

Volume Removed _____ **Removal Method** _____

Field Test Results

Color _____ **pH** _____ **Odor** _____

Temperature (°F) _____ **Specific Conductance (umhos/cm)** _____

Other (OVA, Methane Meter, etc. _____

Constituents Sampled

ASTM Method D422 and D5084

Remarks:

2' recovery: Fine-medium gravel, some coarse gravel, little brown med-coarse sand, wet, no odor or staining

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·6·08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D from 222'-224' **Time** 1043

Weather Overcast, Cool **Temperature** 61°

Sample Type:

Groundwater _____ **Sediment** ✓

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 222' **Measurement Method** Sandy Tape

Volume Removed 18" **Removal Method** Split Spoon

Field Test Results

Color _____ **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. N/A

Constituents Sampled

ASTM Method D422

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2" = 0.16~~	3" = 0.37	4" = 0.65
	1½ =0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

D&B_SIR/kb Rev. 03/09/98

MITKEM LABORATORIES

A DIVISION OF SPECTRUM ANALYTICAL, INC. Featuring HANIBAL TECHNOLOGY

CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:
- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Jurka & Gottlieb
330 Crossways Park Drive
Woodbury, New York 11797-2050
516-364-9890
Project Mgr.: Matt McKinney

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564.02
Site Name: NCIA
Location: TMW 8S State: NY
Sampler(s): Kevin McKitt

1=Na_2S2O_3 2=HCl 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9=_____ 10=_____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1=_____ X2=_____ X3=_____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	Containers: # of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic	Analyses: VOCs	Alkalinity	Ferrous Iron	Manganese SP	Magnesium	Calcium	QA Reporting Notes: (check if needed)
	TMW8S@437'	11.13.08	1050	G	GW	2	3			3	X	X	X	X	X	X	
	TMW8S@457'	11.13.08	1340	G	GW	2	3			3	X	X	X	X	X	X	
	TMW8S@472'	11.13.08	1510	G	GW	2	3			3	X	X	X	X	X	X	
	Trip Blank	11.13.08	1510	G			3				X						

☐ Provide MA DEP MCP CAM Report
☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to mckinney@dl6-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
		11/13/08	1530

R2-0001803

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·13·08

SAMPLE INFORMATION RECORD

Site: N.C.I.A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 437' **Time** 10^50

Weather Overcast, Mild **Temperature** 53°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 437' bg **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	(2" = 0.16)	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11-13-08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 457' **Time** 13 40

Weather Overcast, light rain **Temperature** 53°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 457' **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. N/A

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnese, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·13·08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Methoff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 472' **Time** 15^10

Weather Overcast, light rain **Temperature** 53°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 472' bg **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Clear **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. N/A

Constituents Sampled

VOCs Alkalinity Ferrous Iron Magnese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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CHAIN OF CUSTODY RECORD

Page 1 of 1

Special Handling:

- ☒ Standard TAT - 10 to 15 business days
- ☐ Rush TAT - Date Needed: _____
- All TATs subject to laboratory approval. Min. 24-hour notification needed for rushes.
- Samples disposed of after 60 days unless otherwise instructed.

Report To: Dvirka and Bartilucci
330 Crossways Park Drive
Woodbury, New York 11797-2050
(516) 364-9890
Project Mgr.: Matt DeVinney

Invoice To: SAME
P.O. No.: _____ RQN: _____

Project No.: 2564-02
Site Name: N.C.I.A
Location: TMW 8D State: NY
Sampler(s) Kevin Metkiff

1=Na_2S2O_3 2=HC1 3=H_2SO_4 4=HNO_3 5=NaOH 6=Ascorbic Acid
7=CH_3OH 8=$NaHSO_4$ 9= _____ 10= _____

DW=Drinking Water GW=Groundwater WW=Wastewater
O=Oil SW=Surface Water SO=Soil SL=Sludge A=Air
X1= _____ X2= _____ X3= _____

G=Grab C=Composite

Lab Id:	Sample Id:	Date:	Time:	Type	Matrix	Preservative	# of VOA Vials	# of Amber Glass	# of Clear Glass	# of Plastic		VOCs	Alkalinity	Ferrous Iron	Manganese	Magnesium	Calcium			QA Reporting Notes: (check if needed)
	TMW8D@497'	11-14-08	1130	G	GW	2	3			3		X	X	X	X	X	X			
	TMW8D@502	11-14-08	1325	G	GW	2	3			3		X	X	X	X	X	X			
	Trip Blank	11-14-08	1325	G			3					X								

QA Reporting Notes: (check if needed)

- ☐ Provide MA DEP MCP CAM Report
- ☐ Provide CT DEP RCP Report

QA/QC Reporting Level
☐ Standard ☐ No QC
☐ Other _____

State specific reporting standards: _____

☐ Fax results when available to (____) _____
☒ E-mail to MDeVinney@db-eng.com
EDD Format _____

Condition upon receipt: ☐ Iced ☐ Ambient ☐ °C _____

Relinquished by:	Received by:	Date:	Time:
[signature]		11/14/08	1350

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R2-0001807

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.14.08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 497' **Time** 11 30

Weather Partly Cloudy, Mild **Temperature** 60°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 497' **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Orang Brown / Silty **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs Alkalinity Ferrous Iron Magnese

Magnesium Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	2" = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11-14-08

SAMPLE INFORMATION RECORD

Site: N. C. I. A **Sample Crew:** Kevin Metkiff

Sample Location/Well No. TMW 8D

Field Sample I.D. Number TMW 8D @ 502' **Time** 13^25

Weather Partly Cloudy, Mild **Temperature** 60°

Sample Type:

Groundwater ✓ **Sediment** _____

Surface Water/Stream _____ **Air** _____

Soil _____ **Other (describe, i.e. water, septage, etc.)** _____

Well Information (fill out for groundwater samples)

Depth to Water 50' **Measurement Method** _____

Depth of Well 502' bg **Measurement Method** Sounding Tape

Volume Removed 1 Liter **Removal Method** Hydropunch

Field Test Results

Color Turbid / Silty **pH** N/A **Odor** No Odor

Temperature (°F) N/A **Specific Conductance (umhos/cm)** N/A

Other (OVA, Methane Meter, etc. PID 0.0

Constituents Sampled

VOCs, Alkalinity, Ferrous Iron, Magnesium, Magnesium, Calcium

Remarks:

Well Casing Volumes

GAL/FT	1¼" = 0.077	~~2"~~ = 0.16	3" = 0.37	4" = 0.65
	1½ = 0.10	2½ " = 0.24	3½ = 0.50	6" = 1.46

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APPENDIX C

BORING LOGS

Dvirka and Bartilucci CONSULTING ENGINEERS

Project No.: 2564-02 Project Name: New Cassel Industrial Area		Boring No.: Sheet 1 of 2 By: Kevin Metkiff
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F 10 Date Started: 6-12-08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Augers Drive Hammer Weight: NA Date Completed: 6-19-08	Boring Completion Depth: 285' Ground Surface Elevation: 116' Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
0-1'	0.006	0.0	Black fine-medium SAND and ASPHALT, some small cobbles, dry, no odor or staining.	
1'-2'	0.000	0.0	Light Brown medium SAND, some coarse sand, little fine gravel, dry, no odor or staining	
2'-4'	0.000	0.0	Light brown medium SAND, some coarse sand, little fine gravel, dry, no odor or staining.	
4'-5'	0.000	0.0	Light brown medium-coarse SAND, some fine gravel, trace coarse gravel, dry, no odor or staining.	
5'-10'	0.007	0.0	(At this point in drilling, drill cuttings are not visible)	
10'-15'	0.007	0.0	Light brown medium-coarse SAND, some fine gravel, dry, no odor or staining.	
15'-40'	0.007	0.0	Brown medium-coarse SAND, little fine gravel, dry, no odor or staining.	
40'-45'	0.007	0.0	Brown medium-coarse SAND, some medium to coarse gravel, dry, no odor or staining.	
45'-50'	0.007	0.0	Brown fine-medium SAND, some coarse sand, little coarse gravel, moist, no odor, or staining	
50'-60'	0.045	0.0	Brown light grey SILTY SAND, little fine gravel, wet, no odor or staining.	
60'-65'	0.045	0.0	Brown light grey SILTY SAND, trace fine gravel, wet, no odor or staining.	

NOTES:
Lithology derived from cuttings/drilling remnants.
Dust Monitor and PID readings were taken every half hour during drilling.

R2-0001811

Dvirka and Bartilucci CONSULTING ENGINEERS	Project No.: 2564-02 Project Name: New Cassel Industrial Area	Boring No.: Sheet 2 of 2 By: Kevin Metkiff
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F-10 Date Started: 6-12-08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Augers Drive Hammer Weight: NA Date Completed: 6-19-08	Boring Completion Depth: 285' Ground Surface Elevation: 116' Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
65'-85'	0.045	0.0	Brown SILTY SAND, wet, no odor or staining	
85'-235'	0.022	0.0	Light brown SILTY SAND, wet, no odor or staining.	
235'-285'	0.018	0.0	No visible drill cuttings.	

NOTES:
Lithology derived from cuttings / drilling remnants

Dust Monitor and PID readings were taken every half hour during drilling

Dvirka and Bartilucci CONSULTING ENGINEERS	Project No.: 2564-02 Project Name: New Cassel Industrial Area	Boring No.: TMW-7 Sheet 1 of 2 By:
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F10 Date Started: 6-26-08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Augers Drive Hammer Weight: Date Completed: 6-27-08	Boring Completion Depth: 285' Ground Surface Elevation: 116' Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
0-6"	0.000	0.0	ASPHALT and LARGE GRAVEL	
6"-1'	0.000	0.0	Black coarse SAND, some medium sand and some fine-medium gravel, little coarse gravel, little small angular cobbles, dry, no odor or staining.	
1'-2"	0.000	0.0	Dark brown medium-coarse SAND and fine to medium GRAVEL, little coarse gravel and trace small cobbles, dry, no odor or staining.	
2'-5'	0.000	0.0	Dark brown medium-coarse SAND and fine to medium gravel, some coarse gravel, little small cobbles, dry, no odor or staining.	
5'-10'	0.000	0.0	Light brown medium-coarse SAND and fine-medium GRAVEL, little coarse gravel dry, no odor or staining.	
10'-20'	0.000	0.0	Light brown medium-coarse SAND and fine GRAVEL some medium gravel, little coarse gravel, dry, no odor or staining.	
20'-25'	0.000	0.0	Light brown medium-coarse SAND and fine GRAVEL, some medium gravel, dry, no odor or staining.	
25'-50'	0.000	0.0	Light brown medium-coarse SAND, some fine sand, little fine-medium gravel, dry, no odor or staining.	
50'-55'	0.000	0.0	Light Brown fine-medium SAND, some coarse sand, trace coarse gravel, dry, no odor or staining.	

NOTES:
Lithology based on drill cuttings/remnants.

Dvirka and Bartilucci CONSULTING ENGINEERS

	Project No.: 2564-02 **Project Name:** New Cassel Industrial Area	**Boring No.:** TMW-7 **Sheet** 2 **of** 2 **By:**
Drilling Contractor: Delta **Driller:** Bobby Devine **Drill Rig:** F 10 **Date Started:** 6-26-08	**Geologist:** Kevin Metkiff **Drilling Method:** Hollow Stem Augers **Drive Hammer Weight:** **Date Completed:** 6-27-08	**Boring Completion Depth:** 285' **Ground Surface Elevation:** 116' **Boring Diameter:**

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
55'-60'	0.000	0.0	Light Brown fine to medium SAND, some coarse sand, trace gravel, moist, no odor or staining	
60'-65'	0.000	0.0	Light grey SILTY CLAY, trace coarse sand, moist, no odor or staining.	
65'-90'	0.000	0.0	Light grey SILTY CLAY, wet, no odor or staining	
90'-95'	0.000	0.0	Brownish grey SILTY CLAY, wet, no odor or staining	
95'-140'	0.000	0.0	Brownish grey SILTY SAND, wet, no odor or staining.	
140'-185'	0.000	0.0	Brown SILTY SAND, wet, no odor or staining.	
185'-195'			Brownish grey SILTY SAND, wet, no odor or staining.	
195'-200'	0.000	0.0	Brownish grey SILT, wet, no odor or staining.	
200'-285'	0.000	0.0	Brown SILTY SAND, wet, no odor or staining	

NOTES:
Lithology based on drill cuttings / remnants

Dvirka and Bartilucci CONSULTING ENGINEERS

Project No.: 2564-02 Project Name: New Cassel Industrial Area		Boring No.: Sheet 1 of 2 By: Kevin Metkiff
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F-10 Date Started: 7-9-08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Augers Drive Hammer Weight: Date Completed: 7-15-08	Boring Completion Depth: 280' Ground Surface Elevation: Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
0-6"	0.006	0.0	Black ASPHALT, some fine to coarse black sand, little fine gravel, dry, no odor or staining.	
6"-2'	0.006	0.0	Black medium-coarse SAND and fine gravel, dry, no odor or staining.	
2-3'	0.006	0.0	Black medium to coarse sand and fine to medium gravel, dry, no odor or staining.	
3-4'	0.006	0.0	Black medium to coarse SAND and fine to medium GRAVEL, some coarse gravel, dry, no odor or staining.	
4-5'	0.009	0.0	Brown medium to coarse SAND and medium GRAVEL, trace coarse gravel, dry, no odor or staining.	
5-10'	0.009	0.0	Blackish Brown medium-coarse SAND, some fine to medium gravel, dry, no odor or staining.	
10-15'	0.002	0.0	Brown medium to coarse SAND, some medium to coarse gravel, dry, no odor or staining.	
15-25'	0.002	0.0	Light brown medium to coarse SAND, some fine to medium gravel, dry, no odor or staining	
25-30'	0.002	0.0	Light brown medium to coarse SAND, some fine gravel, little coarse gravel, dry, no odor or staining.	

NOTES: Lithology is based on drill cuttings/remnants. Boring depth should be 285', however the screen broke off and hole had to be redrilled. The second time drilling was to a total depth of 280' in the original hole.

R2-0001815

Dvirka and Bartilucci CONSULTING ENGINEERS

Project No.: 2564-02 Project Name: New Cassel Industrial Area		Boring No.: Sheet 2 of 2 By: Kevin Metkiff
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F-10 Date Started: 7-9-08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Auger Drive Hammer Weight: Date Completed: 7-15-08	Boring Completion Depth: 280' Ground Surface Elevation: Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
30-35'	0.002	0.0	Light brown medium to coarse SAND, some fine sand, little fine to medium gravel, dry, no odor or staining.	
35-45'	0.002	0.0	Light brown fine to medium SAND, some coarse sand, trace fine gravel, dry, no odor or staining.	
45'-50'	0.002	0.0	Light brown fine to medium SAND, trace coarse sand, dry, no odor or staining.	
50-65'	0.010	0.0	Orange brown fine to medium SAND, trace coarse sand, dry, no odor or staining.	
65-85'	0.010	0.0	Light brown fine to medium SAND, moist, no odor or staining.	
85-95'	0.010	0.0	Light brown fine to medium SAND, trace medium sand, wet, no odor or staining.	
95-130'	0.024	0.0	Light brown fine SAND, wet, no odor or staining. (Drilling became tight around a depth of 115')	
130-180'	0.024	0.0	Grey CLAY, wet, no odor or staining	
180'-235'	0.000	0.0	Grey SILT, wet, no odor or staining	
235'-275'	0.000	0.0	Grownish Grey SILTY SAND, wet, no odor or staining.	
275-285'	0.000	0.0	Light brown SILTY SAND, wet, no odor or staining.	

NOTES: Lithology is based on drill cuttings / remnants

Dvirka and Bartilucci CONSULTING ENGINEERS

	Project No.: 2564 - 02 Project Name: New Cassel Industrial Area	Boring No.: Sheet 1 of 2 By: Kevin Metkiff
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F-10 Date Started: 7/29/08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Auger Drive Hammer Weight: Date Completed: 7/30/08	Boring Completion Depth: 285' Ground Surface Elevation: Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
0-6"	0.000	0.0	Black ASPHALT	
6"-1'	0.000	0.0	Medium to coarse GRAVEL, some small cobbles and coarse sand, little medium sand, dry, no odor or staining.	
1-3'	0.000	0.0	Brown medium to coarse SAND and fine-medium GRAVEL some coarse gravel, dry, no odor or staining.	
3-5'	0.000	0.0	Orange brown fine to medium SAND and coarse SAND, some fine gravel, dry, no odor or staining.	
5-10'	0.000	0.0	Orange brown fine to medium SAND, some coarse sand, little fine gravel, dry, no odor or staining.	
25'-40'	0.000	0.0	Orange brown fine to medium SAND, little coarse sand and fine to medium gravel, dry, no odor or staining.	
40-45'	0.000	0.0	Brown fine to medium SAND, trace coarse sand and fine to medium gravel, dry, no odor or staining.	
45-55'	0.000	0.0	Light brown fine to medium SAND, trace coarse sand and fine to medium gravel, dry, no odor or staining.	
55-60'	0.000	0.0	Brown fine to medium SAND some coarse sand and fine to medium gravel, dry, no odor or staining.	
60-65'	0.000	0.0	Orange brown fine to coarse SAND and fine to medium GRAVEL, dry, no odor or staining.	
65-80'	0.000	0.0	Orange brown fine to medium SAND, trace coarse sand, moist, no odor or staining.	
80-110'	0.000	0.0	Light brown fine to medium SAND, trace coarse sand, wet, no odor or staining.	

NOTES:
- Boring Log Lithology is based on drill cuttings/remnants
- Boring Log is based on second drill location of TMW-4

Dvirka and Bartilucci CONSULTING ENGINEERS	Project No.: 2564-02 Project Name: New Cassel Industrial Area	Boring No.: Sheet 2 of 2 By: Kevin Metkiff
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F-10 Date Started: 7/29/08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Auger Drive Hammer Weight: Date Completed: 7/30/08	Boring Completion Depth: 285' Ground Surface Elevation: Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
110-135'	0.000	0.0	Light brown fine to medium SAND, wet, no odor or staining.	
135-140'	0.000	0.0	Grey silty SAND, wet, no odor or staining.	
140-160'	0.000	0.0	Dark grey CLAY, wet, no odor or staining.	
160-185'	0.000	0.0	Light grey CLAY, wet, no odor or staining.	
185-205'	0.000	0.0	Grey SILT, wet, no odor or staining.	
205-285'	0.000	0.0	Light grey silty SAND, wet, no odor or staining.	

NOTES:
- Lithology is based on drill cuttings/remnants.
- Boring Log is based on the second drill location of TMW-4

Dvirka and Bartilucci CONSULTING ENGINEERS

Project No.: 2564-02 Project Name: New Cassel Industrial Area		Boring No.: TMW-4 Sheet 1 of 2 By: Kevin Metkiff
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F-10 Date Started: 8-6-08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Auger Drive Hammer Weight: Date Completed: 8-7-08	Boring Completion Depth: 285' Ground Surface Elevation: Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
0-1"	0.000	0.0	Black ASPHALT, dry, no odor or staining.	
1"-6"	0.000	0.0	Black medium to coarse SAND and coarse SAND, some fine gravel, little medium cobbles, dry, no odor or staining.	
at 10'	0.000	0.0	Black CLAY and coarse SAND, some fine to medium gravel, dry, no odor or staining.	
at 15'	0.000	0.0	Light brown fine to medium SAND, some coarse sand, little fine to medium gravel, dry, no odor or staining.	
at 20'	0.000	0.0	Brown fine to medium SAND and coarse SAND, some fine to medium gravel, dry, no odor or staining.	
at 25'	0.000	0.0	Light brown fine to medium SAND, some coarse sand, little fine gravel, trace medium gravel, dry, no odor or staining.	
at 30'-35'	0.000	0.0	Light brown fine to medium SAND, some coarse sand, trace fine gravel, dry, no odor or staining.	
40-45'	0.000	0.0	Light brown fine to medium SAND and coarse SAND, little fine to medium gravel, dry, no odor or staining.	
at 50'	0.041	0.0	Light brown fine to medium SAND, some coarse sand, trace fine to medium gravel, dry, no odor or staining.	
at 55'	0.041	0.0	Light brown fine to medium SAND, some coarse sand and fine gravel, trace medium gravel, dry, no odor or staining.	

NOTES:
Boring log is based on drill cuttings/remnants.

R2-0001819

Dvirka and Bartilucci CONSULTING ENGINEERS	Project No.: 2564 - 02 Project Name: New Cassel Industrial Area	Boring No.: TMW-4 Sheet 2 of 2 By: Kevin Metkiff
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F-10 Date Started: 8-6-08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Augers Drive Hammer Weight: Date Completed: 8-7-08	Boring Completion Depth: 285' Ground Surface Elevation: Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
60-65'	0.041	0.0	Light brown fine to medium SAND, trace coarse sand, moist, no odor or staining.	
70-285'	0.000	0.0	Light brown fine to medium SAND, trace coarse sand, wet, no odor or staining. (Drilling became tight at depths of: 145', 195', 250', 270', 280')	

NOTES:
Borrig log is based on drill cuttings/remnants.

Dvirka and Bartilucci CONSULTING ENGINEERS

	Project No.: 2564-02 Project Name: New Cassel Industrial Area	Boring No.: TMW 2 Sheet 1 of 2 By: Kevin Metkiff
Drilling Contractor: Delta Driller: Bobby Devine Drill Rig: F-10 Date Started: 8/14/08	Geologist: Kevin Metkiff Drilling Method: Hollow Stem Auger Drive Hammer Weight: Date Completed: 8/15/08	Boring Completion Depth: 285' Ground Surface Elevation: Boring Diameter:

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
0-6"	0.000	0.0	Black ASPHALT, dry, no odor or staining	
6"-1'	0.000	0.0	Brown medium to coarse SAND, some fine to medium gravel, dry, no odor or staining.	
1-5'	0.000	0.0	Brown fine to medium SAND, some coarse sand and fine to medium gravel, dry, no odor or staining.	
@ 10'	0.000	0.0	Brown fine to medium SAND, some coarse sand and fine to medium gravel, dry, no odor or staining.	
@ 15'	0.000	0.0	Orange Brown fine to medium SAND, some coarse sand, and fine to medium gravel, dry, no odor or staining.	
@ 20'-25'	0.000	0.0	Orange Brown fine to medium SAND, some coarse sand, dry, no odor or staining.	
@ 30'	0.000	0.0	Orange Brown fine to medium SAND, little coarse sand, dry, no odor or staining.	
@ 35'	0.000	0.0	Orange Brown fine to medium SAND, some fine to medium gravel, little coarse sand, dry, no odor or staining.	
@ 40'	0.000	0.0	Brown fine to medium SAND and medium to coarse SAND and GRAVEL, trace coarse sand, dry, no odor or staining.	
@ 45'-50'	0.000	0.0	Red Brown SILTY SAND, trace coarse sand, dry, no odor or staining.	
@ 55'	0.000	0.0	Red Brown SILTY SAND, trace coarse sand, moist, no odor or staining.	
@ 60'	0.000	0.0	Greyish Brown SILTY SAND, trace coarse sand, wet, no odor or staining.	

NOTES:
Lithology is based on drill cuttings/remnants.

Dvirka and Bartilucci CONSULTING ENGINEERS

Project No.: 2564-02 **Project Name:** New Cassel Industrial Area		**Boring No.:** TMW 2 **Sheet** 2 **of** 2 **By:** Kevin Metkiff
Drilling Contractor: DeHo **Driller:** Bobby Devine **Drill Rig:** F-10 **Date Started:** 8-14-08	**Geologist:** Kevin Metkiff **Drilling Method:** Hollow Stem Auger **Drive Hammer Weight:** **Date Completed:** 8-15-08	**Boring Completion Depth:** 285' **Ground Surface Elevation:** **Boring Diameter:**

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
70 - 75'	0.000	0.0	Red Brown SILTY SAND, trace coarse sand, wet, no odor or staining.	
80 - 135'	0.000	0.0	Brown fine to medium SAND, trace coarse sand, wet, no odor or staining.	
140 - 150'	0.000	0.0	Brown fine to medium SAND, wet, no odor or staining.	
155 - 165'	0.000	0.0	Greyish Brown fine to medium SAND, wet, no odor or staining	
170 - 175'	0.000	0.0	Grey SILTY SAND, wet, no odor or staining.	
@ 180'	0.050	0.0	Grey SILTY SAND, wet, no odor or staining.	
185' - 285'	0.000	0.0	Brown SILTY SAND, wet, no odor or staining.	

NOTES:
Lithology based on drill cuttings / remnants.

Dvirka and Bartilucci CONSULTING ENGINEERS

Project No.: 2564-02 Project Name: New Cassel Industrial Area		Boring No.: TMW-1 Sheet 1 of 2 By: Kevin Metkiff
Drilling Contractor: Delta **Driller:** Bobby Devine **Drill Rig:** F-10 **Date Started:** 8-22-08	**Geologist:** Kevin Metkiff **Drilling Method:** Hollow Stem Auger **Drive Hammer Weight:** **Date Completed:** 8-25-08	**Boring Completion Depth:** 285' **Ground Surface Elevation:** **Boring Diameter:**

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
0-6"	0.000	0.0	Blackish Grey ASPHALT, dry, no odor or staining.	
6"-1'	0.000	0.0	Brown medium to coarse SAND, some fine gravel, dry, no odor or staining.	
1-4'	0.000	0.0	Brown fine to medium SAND, some coarse sand, dry, no odor or staining.	
4-5'	0.002	0.0	Brown fine to medium SAND, some coarse sand, trace fine to medium gravel, dry, no odor or staining.	
5-25'	0.002	0.0	Brown fine to medium SAND, some coarse sand, little fine gravel, dry, no odor or staining.	
25-35'	0.007	0.0	Brown fine to medium SAND, some coarse sand and fine to medium gravel, dry, no odor or staining.	
35-45'	0.007	0.0	Brown fine to medium SAND, coarse sand and fine gravel, dry, no odor or staining.	
45-50'	0.007	0.0	Brown fine to medium SAND and coarse SAND, dry, no odor or staining.	
50-55'	0.007	0.0	Greyish Brown fine to medium SAND, some coarse sand, moist, no odor or staining.	
55-60'	0.007	0.0	Brown fine to medium SAND, trace coarse sand, wet, no odor or staining.	
60-80'	0.007	0.0	Reddish Brown fine to medium SAND, trace coarse sand, wet, no odor or staining.	
80-160'	0.000	0.0	Brown fine to medium SAND, trace coarse sand, wet, no odor or staining.	

NOTES:
Lithology is based on drill cuttings/remnants.

R2-0001823

Dvirka and Bartilucci CONSULTING ENGINEERS

Project No.: 2564-02 Project Name: New Cassel Industrial Area		Boring No.: Sheet 2 of 2 By: Kevin Metkiff
Drilling Contractor: Delta **Driller:** Bobby Devine **Drill Rig:** F-10 **Date Started:** 8-22-08	**Geologist:** Kevin Metkiff **Drilling Method:** Hollow Stem Auger **Drive Hammer Weight:** **Date Completed:** 8-25-08	**Boring Completion Depth:** 285' **Ground Surface Elevation:** **Boring Diameter:**

Depth (ft.)	Dust Monitor (mg/m^3)	Photo-ionization Detector (ppm)	Sample Description	USCS
160-180'	0.004	0.0	Grey SILTY SAND, wet, no odor, or staining.	
180-210'	0.004	0.0	Grey SILT, wet, no odor or staining.	
210-215'	0.004	0.0	Light Grey SILTY SAND, wet, no odor or staining.	
215-245'	0.004	0.0	Greyish Brown SILTY SAND, wet, no odor or staining.	
245-285'	0.000	0.0	Light Brown SILTY SAND, wet, no odor or staining.	

NOTES:
Lithology based on drill cuttings / remarks.

APPENDIX D

DAILY FIELD ACTIVITY REPORTS

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6/10/08

DAILY FIELD ACTIVITY REPORT

Report Number: 1 Project Number: 2564-02

Field Log Book Page Number: 1-2

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York

Weather: (AM) Sunny, hot and humid Rainfall: (AM) 0 Inches
(PM) (PM) Inches

Temperature: (AM) 82 °F Wind Speed: (AM) -- MPH Wind Direction: (AM) --
(PM) °F (PM) MPH (PM)

Site Condition: Work conducted at Barling Green Water District - Site is dry, asphalt curbs intact

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
Truck Driver	Nicholas J. Carting		7:20	7:35
PS	BGWD		7:25	7:25
Dick Taylor	Brookside Environmental		7:45	7:45
Matt DeVinney	Dvirka and Bartilucci		7:20	7:55

Subcontractor Work Commencement: (AM) 7:20 (PM)

Subcontractor Work Completion: (AM) 7:35 (PM)

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6/10/08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

-Nicholas J. Carting delivered and placed 30-yard roll-off at the Bowling Green Water District property for use by Delta Well and Pump during drilling activities for the project.

R2-0001827

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6/10/08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

DB coordinated access to the site, documented pre-mobilization conditions @ the BCWD property and installed lock on BCWD gate for use during the project. Keys for DB's lock were distributed to BCWD and Brookside Environmental.

List specific inspection(s) performed and results (include problems and corrective actions):

List type and location of tests performed and results (include equipment used and monitoring results):

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

epared by: _____ Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-11-08

DAILY FIELD ACTIVITY REPORT

Report Number: 2 Project Number: 2564-02

Field Log Book Page Number: 7-10

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Aster Place N.

Weather: (AM) Sunny, Hot, Humid Rainfall: (AM) -- Inches
(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 80 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) --
(PM) 89 °F (PM) < 5 MPH (PM) --

Site Condition: Bowling Green Water District - Site is in good condition, set up for drilling

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Jason	Delta Environmental	9^00	3^30
	Dan	Delta Environmental	9^00	3^30
	Kevin Methiff	Dvirka + Bartilucci	10^10	3^30
	Al J.	Dvirka + Bartilucci	10^20	12^50
	Jeff Dyber	NYSDEC	1^30	1^50

Subcontractor Work Commencement: (AM) 9^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
* DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-11-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Dropped off Bobcat, Augers, well casing, steamer, decon. equip., traffic cones.
- Decon. drilling equipment, getting ready for next day drilling.
- Set up perimeter around drilling work zone for TMW-6. Drove drill rig F10-3 to site. Put up cattle fencing, caution tape, and road cones to secure site while not working.
- Organized and prepared equipment for tomorrows drilling.

R2-0001830

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-11-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

Met drillers at site to discuss upcoming work for New Cassel Project. Drove to all site locations and discussed work issues: nearest sewer for purge water disposal, nearest water source (fire hydrant), and best (safest and most sufficient) location for equipment while working at each particular site.

List specific inspection(s) performed and results (include problems and corrective actions):

Inspected each site for nearest sewer, fire hydrant, and a good/safe work zone

List type and location of tests performed and results (include equipment used and monitoring results):

Calibrated PID at 8^{30} however todays work did not call for such monitoring.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Jason (driller) of Delta Environmental spoke with Kevin and Al from Dvirka & Bartilucci about starting the drilling process tomorrow 6-12-08. Claimed that Monday would most likely be the first day (round) of sampling.

epared by: Kevin Metkiff Reviewed by:

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-12-08

DAILY FIELD ACTIVITY REPORT

Report Number: 3 Project Number: 2564-02

Field Log Book Page Number: 11-15

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York, Astor Place N.

Weather: (AM) Sunny, Hot, Humid Rainfall: (AM) -- Inches
(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 72 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N
(PM) 85 °F (PM) < 5 MPH (PM) NNE

Site Condition: The site (drilling location for TMW-6) in good condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Jason	Delta Envir.	7:05	3:30
	Dan	Delta Envir.	7:05	3:30
	Jeff Dyber	NYSDEC	10:55	11:20
			2:35	2:50
	Cliff	Delta Envir.	11:12	1:20
	Chris Morris	Dvirka & Bartilucci	7:35	10:45
			11:30	2:00
	Kevin Metkiff	Dvirka & Bartilucci	7:00	3:30

Subcontractor Work Commencement: (AM) 7:05 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6/12/08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

7^05 - 7^50 Delta Picked up Augers from BGWD site and other equipment including shovels, level, etc.

7^50 - 10^00 Drilled from 0 - 25' - had to stop due to an antifreeze leak from the drill rig.

10^00 - 11^12 waited for Mechanic from Delta to come to site

11^12 - 11^30 Mechanic sealed leak

11^30 - 12^15 Drilled down to 55'

12^15 - 12^45 - Lunch

12^45 - 3^00 - Drilled down to 135'

3^00 - 3^30 - Secured site for the night and unloaded equipment at BGWD.

R2-0001833

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-12-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

Calibrated and zeroed PID and Dust Monitor. Over see drilling operations as well as logged lithology of underlying sediment at the site of TMW-06. Monitored air quality down wind of drilling location.

List specific inspection(s) performed and results (include problems and corrective actions):

List type and location of tests performed and results (include equipment used and monitoring results):

Monitored air quality down wind of site by using a PID and Dust Monitor. Both tests displayed results which met the safe guidlines for a working environment for the workers as well as the general public.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

epared by: Kevin Methoff Reviewed by:

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-13-08

DAILY FIELD ACTIVITY REPORT

Report Number: 4 Project Number: 2564-02

Field Log Book Page Number: 16 - 19

Project: New Cassel Industrial Area

Address: New Cassel North Hempstead New York, Aster Place N.

Weather: (AM) Sunny, moderate Rainfall: (AM) - - Inches

(PM) Sunny, moderate (PM) - - Inches

Temperature: (AM) 70° °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) NE

(PM) 80 °F (PM) < 5 MPH (PM) NE

Site Condition: In good condition in morning and afternoon. Safe work zone.

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Jason	Delta Env.	7^00	1^15
	Dan	Delta Env.	7^00	1^15
	Tom King	Delta Env.	10^15	10^45
			12^00	12^01
	Frank DeVita	Dvirka & Bartilucci	9^50	10^45
	Kevin Metkiff	Dvirka & Bartilucci	6^45	1^15

Subcontractor Work Commencement: (AM) 7^00 (PM)

bcontractor Work Completion: (AM) (PM) 1^15

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R2-0001835

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-13-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

On Friday 6-13-08 Delta Environmental was able to drill to a depth of 200 feet. At this point the drilling operation was put on hold due to the drill rig leaking anti-freeze and hydraulic fluid. The leak was noticed before it became a problem and will be fixed over the weekend. Equipment was moved from the staging area to the work zone in preparation for Monday's drilling. The work zone was also secured using cattle fencing for the weekend.

R2-0001836

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-13-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

Air monitoring equipment (PID and Dust Monitor) were both zeroed, calibrated, and set up down wind of the work zone. D+B employees monitored the air in order to ensure a safe environment for the general public as well as the site workers. D+B employees also oversaw the drilling operation and logged a detailed explanation of the work zone's underlying stratigraphy.

List specific inspection(s) performed and results (include problems and corrective actions):

It was noticed that the drill cuttings began to spread out from the work zone into the street. The situation was taken care of by Delta Environmental employees soon after the problem was first noticed.

List type and location of tests performed and results (include equipment used and monitoring results):

Air monitoring was performed down wind of drilling location. The tests displayed results which met specific guidlines for a safe work zone.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

The drill rig was moved off site for the weekend for repairs.

Prepared by: Kevin Methiff

Reviewed by:

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R2-0001837

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-16-08

DAILY FIELD ACTIVITY REPORT

Report Number: 5 Project Number: 2564-02

Field Log Book Page Number: 20-23

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County New York, Aster Place N. TMW6

Weather: (AM) Overcast, Cool Rainfall: (AM) - - Inches

(PM) Partly Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 65 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) S

(PM) 78 °F (PM) 5-10 MPH (PM) SSE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Motkiff	Dvirka + Bartilucci	6 50	8 20
			11 05	4 00
	Driver	Call-A-Head		
	Bobby	Delta	11 05	3 45
	Dan	Delta	11 05	3 45
	Tom King	Delta	1 03	2 20

Subcontractor Work Commencement: (AM) 11 05 (PM)

Subcontractor Work Completion: (AM) (PM) 3 45

R2-0001838

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-16-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Set new drill rig into place when first arriving on site.
- Call-A-Head dropped a porta-head at BGWD - staging area.
- Drillers placed plastic sheeting under drill rig.
- Drillers cleaned out the roll off with Bob cat.
- Drillers secured work zone for the night.

R2-0001839

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-16-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- Zeroed and Calibrated air monitoring equipment (PID & Dust Monitor).
- Organized the setting up of new drilling and work zone.
- Logged daily activities as well as spoke with office personel about current work progress.

List specific inspection(s) performed and results (include problems and corrective actions):

Discussed current method with the disposal of drill cuttings. It was decided that the roll off used for disposal needed a lining and a cover. Corrective actions will take place on 6-17-08 in the morning.

List type and location of tests performed and results (include equipment used and monitoring results):

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta recommended we line the roll off and have a cover placed on top.

epared by: Kevin Metkiff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-17-08

DAILY FIELD ACTIVITY REPORT

Report Number: 6 Project Number: 2564-02

Field Log Book Page Number: 24-30

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County New York, Astor Place N. TMW-6

Weather: (AM) Sunny, Cool, Moderate Rainfall: (AM) - - Inches
(PM) Mostly Cloudy, Cool (PM) - - Inches

Temperature: (AM) 70 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) West
(PM) 75 °F (PM) 5-10 MPH (PM) West

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka and Bartilucci	6 50 am	7 30 pm
	Brian Grahm	Brookside	7 00 am	7 15 am
	Bobby	Delta	7 15 am	7 30 pm
	Tom	Delta	7 15 am	7 30 pm
	Pat	Delta	9 25 am	9 30 am
	Bill	Delta	10 30 am	11 13 am
	Tom King	Delta	12 15 am	7 30 pm

Subcontractor Work Commencement: (AM) 7 00 (PM)

bcontractor Work Completion: (AM) (PM) 7 30 pm

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-17-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Brockside on site in the morning to place a liner in roll-off
- Delta was able to drill down to 285' and was able to get the well into augers. However, it was not possible to knock the bottom plate out of the augers. Two attempts were made to no avail. The method used was to set the well in the augers. Then a driving hammer was hoisted, using a pulley system aided by a capstan, to power the well through the bottom plate. After each attempt was made a 10 foot bailer was use in order to remove sediment from augers. Many attempts were made with little to no effect. After the second attempt was made at setting the well. The well as well as 90 feet of augers were removed.
- Site was secured for the day.

R2-0001842

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-17-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

Open site for daily work. Oversaw worked performed by Brookside as well as Delta. Monitored air down wind from work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

List type and location of tests performed and results (include equipment used and monitoring results):

PID and Dust Monitor were used during working hours. All results fell within the safe guidelines for contractors and the general public.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Discussed current work progress and problems encountered during the day. The problems encountered was the unsuccessful attempts at knocking the plate off the bottom of augers. The recommendations made was to take all equipment, well piping and augers, out of hole and start fresh in the morning.

Prepared by: Kevin Metkiff

Reviewed by:

D&B_DFAR/kb

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-18-08

DAILY FIELD ACTIVITY REPORT

Report Number: 7 Project Number: 2564-02

Field Log Book Page Number: 31-

Project: New Cassel, Nassau County, New York, Aster Place N.

Address: New Cassel Industrial Area TMW-6

Weather: (AM) Cool, Sunny, Moderate Rainfall: (AM) - - Inches

(PM) Cool, Partly Cloudy, Moderate (PM) - - Inches

Temperature: (AM) 62 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) WNW

(PM) 75 °F (PM) <5 MPH (PM) WSW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methiff	Dvirka and Bartilucci	6 55	3 25
	Brian Grahn	Brookside	7 00	8 12
	Bobby	Delta	7 25	3 25
	Tom	Delta	7 25	3 25
	Al J.	Dvirka & Bartilucci	8 53	9 55

Subcontractor Work Commencement: (AM) 7 25 (PM)

Subcontractor Work Completion: (AM) (PM) 3 25

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-18-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

-Brookside Environmental was on site in the morning to drop off the new roll off. Brookside representative was Brian Grahm. The new roll off is lined and has a cover.

- Delta completed the task of removing the remaining augers from the drill hole. The augers were then brought to the staging area to be cleaned off. After cleaning, the augers where then brought back to the work zone for the second drilling attempt. The drillers made sure that each auger that was used was wire brushed, clean from all sediment around the ends, and had a gasket placed in between each auger. At the end of the work day a depth of 180' was reached. Delta then cleaned up their work zone and headed towards the staging area in order to create a new decon. pit and to clean up the original one.

R2-0001845

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-18-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

Oversaw drilling operation, clean up of work zone, and decon. pit. D&B employees also monitored the air using a PID PE Photovac as well as a MIE pDR 1000 AN Dust Monitor.

List specific inspection(s) performed and results (include problems and corrective actions):

List type and location of tests performed and results (include equipment used and monitoring results):

D&B employees set up a air monitory station down wind from the work zone. The equipment used was a PID PE Photovac and a MIE pDR 1000AN.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta recommended ~~to~~ stop drilling at 180' for the day. It is not advised to keep augers at a greater depth overnight. Work will continue the following day to the target depth of 285'

epared by: Kevin Methiff Reviewed by:

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-19-08

DAILY FIELD ACTIVITY REPORT

Report Number: 8 Project Number: 2564-08

Field Log Book Page Number: 36-42

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Aster Place N. TMW-6

Weather: (AM) Hazy, Cool, No Humidity Rainfall: (AM) - - Inches
(PM) Cool, Low Humidity (PM) - - Inches

Temperature: (AM) 65 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N
(PM) 70 °F (PM) < 5 MPH (PM) still wind

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka + Bartilucci	6^45	5^30
	Bobby	Delta	7^00	5^30
	Tommy	Delta	7^00	5^33
	Tom King	Delta	11^05	12^00
	~~Chris Okon~~		1^00	3^30
	Chris Okon	Delta	3^15	3^25

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 5^30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-19-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta drillers, Bobby and Tommy, were able to drill TMW-6 to a total depth of 285'.
- Delta drillers used a bailer before installing well casing in order remove sediment from augers.
- Delta drillers installed well casing which included a five foot screen which made up the first section of the well. Once the well was placed within the augers, a hammer was then attached to the drill rig and used to knock the plate out from the augers. The plate was knocked out after several attempts. At one point in the day around 11:30 the well was removed and reinstalled before the plate was finally removed. During the process of removing augers from TMW 6 it was noticed that a weld on the drill rig's drill head needed repair. Tom King from Delta was on site and able to fix the problem.
- Delta finished removing augers from TMW-6 after installing the well.
- Delta cleaned up equipment and prepared for the following day.

R2-0001848

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-19-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B Engineers oversaw drilling operation and well installation. D&B also monitored the air in the work zone as well as down wind of the work zone. These measures were taken in order to ensure a safe work zone for employees as well as for the surrounding public area and residents.

List specific inspection(s) performed and results (include problems and corrective actions):

It was discovered early on in the day that it was difficult to knock out the plate located at the bottom of the augers. Corrective actions were implemented as soon as possible which included using a heavier hammer.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and dust monitor, models PID-PE Photovac and MIE pDR-1000 AN, were set up down wind in order to monitor the air in the work zone and surrounding area. All results fell within the safe guidlines for workers and the general public.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

A weld located on the drill head of the drilling was repaired. A larger hammer was used to knock the plate from the augers. These were recommendations and resulting actions that took place after the problems were encountered

Prepared by: Kevin Methiff

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-20-08

DAILY FIELD ACTIVITY REPORT

Report Number: 9 Project Number: 2564-02

Field Log Book Page Number: 43-46

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Aster Place North

Weather: (AM) Sunny, low humidity, cool Rainfall: (AM) -- Inches
(PM) Sunny, low humidity warm (PM) -- Inches

Temperature: (AM) 63 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) WNW
(PM) 78 °F (PM) 5 MPH (PM) NNW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka & Bartilucci	6 50	3 30
	Chris Okon	Delta	7 30	9 46
	Tommy	Delta	7 30	3 30
	Bobby	Delta	8 02	3 30
	Al J.	Dvirka & Bartilucci	12 55	1 30

Subcontractor Work Commencement: (AM) 7 30 (PM)

ubcontractor Work Completion: (AM) (PM) 3 30

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R2-0001850

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-20-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta workers took a gamma log of TMW-6. Two logs were recorded by Chris Okon one on the way down the other coming back up.
- Delta workers set up equipment for groundwater sampling which included a pump, plastic hosing and decon. buckets. After the initial sampling was performed at a depth of 283', Delta workers backed the well out of the ground in 20' sections for sampling.
- The last zone of sampling was taken at a depth of 263 feet.
- Delta workers broke down equipment for the day and prepared site for the following days.

R2-0001851

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-20-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

Calibrated air monitoring equipment. Oversaw gamma logging activities, set up and breakdown of equipment and took groundwater samples at depths of 283', and 263'. Calibrated and operated Horiba - U-22. Calculated well volumes for each sampled zone.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

Air monitoring done with from workzone using a PID-PE Photovac and MIE pDR-1000AN Dust monitor.

A Horiba U-22 was also used during sampling to measure pH, Temp., Cond., Turb., DO., and ORP.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Methkiff Reviewed by:

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R2-0001852

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-23-08

DAILY FIELD ACTIVITY REPORT

Report Number: 10 Project Number: 2564-02

Field Log Book Page Number: p. 47 - 51

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Aster Place North

Weather: (AM) Overcast, hazy, muggy, humid Rainfall: (AM) Light rain Inches
(PM) Overcast, hazy, muggy, humid (PM) Rain Heavy at times Inches

Temperature: (AM) 70 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) SSE
(PM) 80 °F (PM) <5 MPH (PM) SSE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka & Bartilucci	6 55	3 30
	Bobby	Delta	7 15	3 30
	Tom	Delta	7 15	3 30

Subcontractor Work ~~Commencement~~: (AM) 7 15 (PM) 3 30

R2-0001853

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-23-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta employees set up equipment and prepared pump for sampling. After each round of sampling, Delta backed the well out in twenty foot intervals for next round of sampling.
- At the end of the day Delta decon. equipment and secured site for the evening.

R2-0001854

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-23-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

Monitored air down wind from work zone.
Took ground water samples from TMW-6 at depths of 243', 223', 203' and 183'. Took readings during sampling for pH, Conductivity, Turbidity, Temperature, DO and ORP in groundwater.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

Air Monitoring was performed using a PID - PE Photovac and MIE pDR-1000AN. A Horiba U-22 was used during sampling and purging the well to measure pH, Conductivity, Turbidity, DO, and ORP.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff Reviewed by:

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

DAILY FIELD ACTIVITY REPORT

Report Number: 11 Project Number: 2564-02

Field Log Book Page Number: 52-58

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County New York - Aster Place North

Weather: (AM) Sunny, low humidity Rainfall: (AM) -- Inches
(PM) Sunny, Humid, hot (PM) -- Inches

Temperature: (AM) 71 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) W
(PM) 85 °F (PM) 5 MPH (PM) WNW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Mothiff	Dvirka and Bartilucci	6^50	3^25
	Bobby	Delta	7^00	3^25
	Tom	Delta	7^00	3^25
	Steve Tauss	Dvirka and Bartilucci	9^25	10^10

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^25

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R2-0001856

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees set up equipment which prepared the work site for sampling. After each zone of sampling, Delta employees backed the well up in twenty foot intervals.

At the end of the work day Delta cleaned equipment and secured the site for the evening.

R2-0001857

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B calibrated PID, Dust Meter, and Horiba U-22 in preparation for sampling. Samples were taken from depths of 163', 143', 123', 103', 83'. D&B employees monitored the air quality down wind from the work zone

List specific inspection(s) performed and results (include problems and corrective actions):

Some problems occured during pumping when the water became extremely silty. This problem was maintained by slowing the pump down to a speed that allowed the groundwater ~~flow~~ flow at a steady flow rate.

List type and location of tests performed and results (include equipment used and monitoring results):

Air monitoring was performed down wind from the work zone using a PID Photovac and a MIE pDR1000AN Dust Monitor.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

epared by: Kevin Methoff

Reviewed by:

D&B_DFAR/kb

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-25-08

DAILY FIELD ACTIVITY REPORT

Report Number: 12 Project Number: 2564-02

Field Log Book Page Number: 64-69

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York Aster Place North

Weather: (AM) Sunny, low humidity Rainfall: (AM) -- Inches
(PM) Sunny, low humidity (PM) -- Inches

Temperature: (AM) 70 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) SSW
(PM) 70 °F (PM) 5 MPH (PM) SSW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka and Bartilucci	6 50	1 50
	Bobby	Delta	7 25	3 00
	Tommy	Delta	7 25	3 00

Subcontractor Work Commencement: (AM) 7 25 (PM)

bcontractor Work Completion: (AM) (PM) 3 00

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-25-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees set up equipment for pumping. After pumping was completed, Delta cleared equipment from drilling site and prepared to grout the hole. Delta poured a total of seven batches of grout in the hole. Each batch was made in a 55 gallon drum with water and two 94lb. bags of Type I Regular Portland Cement mix.

After the hole was filled with grout, just below grade by about one foot, a road cone was placed over the hole. Cattle fencing was then placed around the hole for safety purposes.

All equipment was then transported to the next site for TMW 7.

R2-0001860

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-25-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

Took last sample of TMW 6 @ 63 feet. Monitored the air down wind from the drill site and oversaw subcontractors daily work.
Measured location of TMW 6 and measured total amount of purge water that was disposed of in sewer #3CPW2.00072

List specific inspection(s) performed and results (include problems and corrective actions):

Pumping was difficult and it was decided to sample right away while the pump was working.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID Photovac along with a MIE pDR1000AN Dust Monitor were used to monitor the air down wind from work zone.
A Horiba U-22 was used to measure the parameters of the groundwater being purged from the well.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta stated that the next day they will pack asphalt in TMW 6 to complete the process of sealing the hole.

Prepared by: Kevin Metkiff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-26-08

DAILY FIELD ACTIVITY REPORT

Report Number: 13 Project Number: 2564-02

Field Log Book Page Number: 64-69

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County New York, Hyacinth Street

Weather: (AM) Cool, Sunny, low humidity Rainfall: (AM) -- Inches
(PM) Mostly Cloudy, Humid (PM) Light rain Inches

Temperature: (AM) 72 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) S
(PM) 85 °F (PM) <5 MPH (PM) S

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka & Bartilucci	6^45	4^00
	Bobby	Delta	7^15	4^00
	Tommy	Delta	7^15	4^00

Subcontractor Work Commencement: (AM) 7^05 (PM)

Subcontractor Work Completion: (AM) (PM) 4^00

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-26-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta engeloyees used asphalt to seal the hole on Aster Place TMW 6. The asphalt filled the hole from grade to about one foot below grade. Delta transported drill rig and equipment to TMW 7 location on Hyacinth Street on the previous day. After packing the asphalt on TMW 6 they moved to TMW 7 to begin drilling. At the end of the day Delta reached a total depth of 190 feet below grade.

D&B_DFAR/kb

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-26-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B employees inspected the final condition and status of TMW 6 and took photos. D&B monitored the air down wind from the work zone, classified the drill cuttings, and oversaw the whole drilling operations.

List specific inspection(s) performed and results (include problems and corrective actions):

It was determined that drilling would end for the day around 200'. This is a safe depth to leave augers over night.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID ppRae Photonic and MIE pDR1000AN dust monitor were used during the drilling activities in order to ensure a safe work zone for employees and the surrounding residents.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta drillers stopped at 190' today. They feel it is a good depth to stop at for the day. Tomorrow they will continue to drill to a depth of 285' and install the well.

epared by: Kevin Metkiff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-27-08

DAILY FIELD ACTIVITY REPORT

Report Number: 14 Project Number: 2564-02

Field Log Book Page Number: 70-73

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County New York, Hyacinth Street

Weather: (AM) Sunny, light humidity Rainfall: (AM) -- Inches
(PM) Sunny, Humid (PM) -- Inches

Temperature: (AM) 75 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) S
(PM) 80 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka and Bartilucci	6^55	3^00
	Bobby	Delta	6^55	3^00
	Tommy	Delta	6^55	3^00

Subcontractor Work Commencement: (AM) 6^55 (PM)

bcontractor Work Completion: (AM) (PM) 3^00

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-27-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees finished drilling to a total depth of 285'. Once drilling was completed, Delta installed the temporary well and removed the augers from the ground. At the end of the work day, Delta secured the site for the evening and prepared for the first round of sampling the next day.

R2-0001866

Dvirka and Bartilucci
CONSULTING ENGINEERS
* DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-27-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

Monitored the air around the work zone, oversaw drilling operation, and classified drill cuttings.

List specific inspection(s) performed and results (include problems and corrective actions):

Drilling became extremely tight around 200 feet below grade.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PE Photovac along side a MIE pDR1000AN were used to monitor the air down wind from the work zone. All readings fell within the guidelines for a safe work zone.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

The drilling became tight around 200 feet below grades. There could be multiple clay layers around this depth.

Prepared by: Kevin Metcliff Reviewed by: _____

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-30-08

DAILY FIELD ACTIVITY REPORT

Report Number: 15 Project Number: 2564-02

Field Log Book Page Number: 74-76

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Hyacinth Street

Weather: (AM) Partly cloudy, mild humidity Rainfall: (AM) -- Inches
(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 70 °F Wind Speed: (AM) still MPH Wind Direction: (AM) --
(PM) 85 °F (PM) <5 MPH (PM) W

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka & Bartilucci	6:45	3:30
	Bobby	Delta	7:30	3:30
	Tommy	Delta	7:30	3:30
	Pat	Delta	10:45	11:40
	Chris Okon	Delta	11:30	12:25
	Bob Sr.	Delta	11:30	11:40

Subcontractor Work Commencement: (AM) 7:30 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-30-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees prepared TMW 7 for the first round of sampling as well as a gamma log. Delta also steam cleaned the augers in preparation for the next well. Delta employees then gamma logged TMW 7 once on the way down the well and once on the way up. This process recorded the lithology of TMW 7. At the end of the day Delta cleaned and secured the work zone for the evening.

R2-0001869

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-30-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B employees oversaw subcontractors work. D&B also evaluated the gamma log, monitored the air around the work zone, and took the first round of groundwater samples for TMW 7.

List specific inspection(s) performed and results (include problems and corrective actions):

After analyzing the gamma log, it was noticed that there were multiple layers of clay in the surrounding subsurface. To correct or avoid any problems associated with the clay it was determined that it would be best to try and avoid pumping in these zones.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PePhotovac was used in order to monitor the air down wind from the work zone in order to ensure a safe working environment. Also, a Horiba U-22 was used during sampling in order to monitor the pH, temp, turbidity, conductivity, Dissolved Oxygen, and ORP of the purged water.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta's van which holds the gamma log equipment broke down in the morning. The van was fixed and brought to the site as soon as it was possible.

epared by: Kevin Metkiff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-1-08

DAILY FIELD ACTIVITY REPORT

Report Number: 16 Project Number: 2564-02

Field Log Book Page Number: 77-82

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York, Hyacinth Street

Weather: (AM) Sunny, humid, hot Rainfall: (AM) -- Inches

(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 75 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) S

(PM) 88 °F (PM) 25 MPH (PM) S

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methiff	Dvirka and Bartilucci	6 40	3 30
	Bobby	Delta	7 00	3 30
	Tommy	Delta	7 00	3 30
	Pat	Delta	11 55	12 30

Subcontractor Work Commencement: (AM) 7 00 (PM)

bcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-1-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta was responsible for running the pumps used to pump purge water from the well #TMW 7. Delta employees also were responsible for pulling the well from the hole in order to place the screen in the next sampling zone.

At the end of the work day Delta cleared and secured work site for the evening.

R2-0001872

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-1-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D+B monitored the air down wind from the work zone. D+B employees also took samples from three different zones at depths of 265', 245', and 225'. D+B also spoke to Mitkem lab to place a bottle order. D+B oversaw subcontractors daily activities.

List specific inspection(s) performed and results (include problems and corrective actions):

The pump that was being used began to fail. Several attempts were made at this well using the first pump and it was decided to use a new one. The back up pump however did not work at all. To correct our problem Delta contacted their office and had a coworker deliver a new pump to the work site.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID was used during the sampling operations. All readings were 0.0ppm

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

D+B discussed current progress with Delta employees. The issue with the pump was brought up and was decided that the new pump should stay on site.

Prepared by: Kevin Metkiff

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-2-08

DAILY FIELD ACTIVITY REPORT

Report Number: 17 Project Number: 2564-02

Field Log Book Page Number: 83-88

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York, -Hyacinth Street

Weather: (AM) Sunny, Cool, Low Humidity Rainfall: (AM) -- Inches
(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 70 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) SW
(PM) 88 °F (PM) <5 MPH (PM) W

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka and Bartilucci	6^45	3^30
	Frank DeVita	Dvirka and Bartilucci	9^20	9^30
	Bobby	Delta	7^00	3^30
	Tommy	Delta	7^00	3^30

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-2-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees were in charge of setting up work zone for the days pumping operations. Delta ran the pumps as well as backed the well out of its hole in twenty foot incriments for each zone of sampling. The zones sampled were at depths of 205', 185', and 165'. Delta cleaned up and secured the site at the end of the work day.

R2-0001875

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-2-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B monitored the air during the sampling @ depths of 165', 185', and 205'. D&B was also in chge of the groundwater sampling of these zones. D&B also oversaw subcontractors daily activities.

List specific inspection(s) performed and results (include problems and corrective actions):

At times pumping became slow. When this occurred, pumping rate was turned down in order to find an equilibrium between pumping and recharge. When this did not work, the pumping operation was put on hold to allow well to recharge.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID was used in order to monitor any vapors that may be present during sampling.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

DAILY FIELD ACTIVITY REPORT

Report Number: 18 Project Number: 2564-02

Field Log Book Page Number: 89-95

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York, - Hyacinth Street

Weather: (AM) Sunny, Hot, Humid Rainfall: (AM) - - Inches

(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 75 °F Wind Speed: (AM) - - MPH Wind Direction: (AM) - -

(PM) 90° °F (PM) < 5 MPH (PM) S

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Mettkiff	Dvirka + Bartilucci	6 50	3 20
	Bobby	Delta	7 30	3 20
	Tommy	Delta	7 30	3 20

Subcontractor Work Commencement: (AM) 7 30 (PM)

bcontractor Work Completion: (AM) (PM) 3 20

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta contractors opened the fencing around the work zone in preparation for daily work. Delta ran the pump during pumping operations. Delta also backed the well out of the hole in twenty foot increments in order for D&B to sample in each zone. The depth of each zone was 145', 125', 105', 85', and 65'. Delta cleaned and secured the work zone for the evening and prepared to break down equipment. The next day they will mobilize equipment to next work site.

R2-0001878

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B monitored the air around the work zone. D&B also took measurements and sampled zones at depths of 65', 85', 105', 125', and 145'.
D&B also oversaw subcontractors daily work.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID was used during sampling in order to test for vapors that might be present during sampling.
A Horiba U-22 was used while pumping to measure the pH, Temperature, Turbidity, Conductivity, Dissolved Oxygen, and ORP

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta stated they will break down all equipment the next day and move to next location. They will also grout and asphalt pack TMW-7 in order to seal the hole

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-8-08

DAILY FIELD ACTIVITY REPORT

Report Number: 19 Project Number: 2564-02

Field Log Book Page Number: 96-98

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Hyacinth Street

Weather: (AM) Sunny, Hot, Humid Rainfall: (AM) -- Inches

(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 75 °F Wind Speed: (AM) still MPH Wind Direction: (AM) --

(PM) 98 °F (PM) still MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Dvirka and Bartilucci	6^50	12^30
	Bobby	Delta	7^00	3^30
	Tommy	Delta	7^00	3^30

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-8-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees cleared drill rig and other equipment from TMW 7 to allow space to grout hole. Delta then cleaned the area and poured two 94 lb. bags of grout in the hole. Once site was cleaned and cleared, Delta drove to next location of TMW 5. After noticing the utility markouts it was decided to move to TMW 9 to allow time to figure a new location for TMW 5.

Delta workers moved all the necessary equipment to TMW 9 in preparation for the following day. Delta then steam cleaned well pipe and secured work zone for the following day.

R2-0001881

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-8-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B employees oversaw all of subcontractors work. D&B also decided to move to TMW 9 as the next site of work. D&B located the location and took pictures as well as a daily log of site conditions.

List specific inspection(s) performed and results (include problems and corrective actions):

It was noticed that the utilities at TMW 5 would be in the way and therefore cause the drill rig to block the road. The decision was made to move on to TMW-9 instead.

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta is transporting all equipment to new site.

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-9-08

DAILY FIELD ACTIVITY REPORT

Report Number: 20 Project Number: 2564-02

Field Log Book Page Number: 99 - 104

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Washington Street

Weather: (AM) Sunny, Hot, Humid Rainfall: (AM) - - Inches

(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 75 °F Wind Speed: (AM) Still MPH Wind Direction: (AM) - -

(PM) 90 °F (PM) 5 MPH (PM) SSE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	6 55	2 15
	Bobby	Delta	7 00	3 30
	Tommy	Delta	7 00	3 30
	Matt Devinny	D&B	11 30	12 20

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-9-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees moved equipment to site location TMW 9. Drilling began on this day and Delta was able to reach a total depth of 180 feet below grade. Delta felt this was an appropriate depth at which to leave the augers over night. Delta cleared work zone and removed all drill cuttings by using a back hoe.

Delta then moved equipment back to the staging area and began placing the wells pipe together in twenty foot sections. Delta workers then cleaned and secured the work zone for the evening.

R2-0001884

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-9-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B monitored the air down wind from the work zone. D&B also oversaw subcontractor and their daily activities. D&B also identified and logged all drill cuttings which became visible while drilling.

List specific inspection(s) performed and results (include problems and corrective actions):

At a depth of about 115' the driller noticed that the augers and drilling became extremely tight. Once a depth of 135' was reached it became impossible to break through this zone. Delta workers decided it would be best to back out the augers to a depth of 115' and try again. This corrective action seemed to work and drilling loosened up.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID Photovac and a MIE pDR1000AN were used down wind from the work zone in order to monitor the air. All readings showed results for a safe work zone.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow, Delta workers said they will reach a depth of 285' and install the well. Once the well is set the augers will be backed out.

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-10-08

DAILY FIELD ACTIVITY REPORT

Report Number: 21 Project Number: 2564-02

Field Log Book Page Number: 105-111

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Washington Ave TM 9

Weather: (AM) Sunny, cool, low humidity Rainfall: (AM) - - Inches

(PM) Partly Cloudy, Hot, Humid (PM) - - Inches

Temperature: (AM) 73 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) NNE

(PM) 88 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	J & B	6 55	3 30
	Bobby	Delta	6 55	3 30
	Tommy	Delta	6 55	3 30
	Chris Okon	Delta	2 13	3 15

Subcontractor Work Commencement: (AM) 6 55 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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R2-0001886

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-10-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees gathered equipment upon arrival to prepare themselves to complete a depth of 285'. Once 285' was reached a 2" well was installed through the hollow stem augers. After the well installation was complete a weighted hammer was used to push the well through a steal plate that was welded to the drill head. Pushy the well through this plate allows Delta to back the augers out of the ground without disturbing the well.

Delta backed all 285' of augers from the ground and cleaned up the work zone. At 2'13 Delta employee Chris Okon arrived on site in order to gamma log the subsurface of TMW 9. Delta then finished cleanup the site and prepared for the first round of sampling in the morning.

R2-0001887

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-10-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B employees oversaw subcontractors work. D&B also monitored the air in and around the workzone in order to ensure a safe working conditions. D&B also logged and identified the drill cuttings once they became visible.

List specific inspection(s) performed and results (include problems and corrective actions):

Delta workers had a few problems breaking through the plate with the well. Several attempts were made until problem was corrected.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID & Dust monitor were used down wind from the work zone to monitor the air. All readings showed safe working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff Reviewed by:

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-11-08

DAILY FIELD ACTIVITY REPORT

Report Number: 22 Project Number: 2564-02

Field Log Book Page Number: 112-115

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York, TMW 9 Washington Avenue

Weather: (AM) Sunny, cool, low humidity Rainfall: (AM) - - Inches

(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 73 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) NW

(PM) 88 °F (PM) - - MPH (PM) still

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7 35	3 30
	Bobby	Delta	8 00	4 00
	Tommy	Delta	8 00	4 00
	Tom King	Delta	12 45	3 15
	Brian Gohm	Brookside	8 05	8 16

Subcontractor Work Commencement: (AM) 8 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-11-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees set up site in the morning to prepare for daily work. Work performed today consisted of set up and break down of site and equipment. Delta workers also tried to flush out the well screen using two different methods. One using an air compressor and the other with water. Both methods did not work.

Delta then pulled the well because the poly tubing was caught inside the well. Once the well was pulled Delta cleaned and secured site for the evening.

Brookside Environmental was on site early in the morning to take a soil sample from the roll-off located at the staging area.

R2-0001890

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-11-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B employees oversaw all subcontractors daily activities for both companies Delta and Brookside Environmental.

D&B also used a PID & Dust monitor in order to monitor the air quality around the work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

Delta wanted to flush out any silt build up in the well. They tried numerous times using air and water. The equipment used (poly-tubing) got caught inside the well. It was determined that the only alternative to the problem would be to pull the well and start fresh.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID & Dust monitor were stationed down wind from the work zone to monitor the air. All readings showed a safe working environment.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Once the well was pulled it was noticed that the screen had snapped off well. It was determined that we must abandon this hole and start fresh. The next work day this hole TMW-9 will be grated and a new hole will be drilled.

Prepared by: Kevin Metkiff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 07/14/08

DAILY FIELD ACTIVITY REPORT

Report Number: 23 Project Number: 2564-02

Field Log Book Page Number: 116

Project: New Cassel

Address: Washington Ave., New Cassel, New York

Weather: (AM) M. Cloudy Rainfall: (AM) - Inches
(PM) M. Cloudy (PM) - Inches

Temperature: (AM) 75 °F Wind Speed: (AM) 5-10 MPH Wind Direction: (AM) NW
(PM) 80 °F (PM) 0-5 MPH (PM) N

Site Condition:

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Chris Kiernan	D&B	0720	1400
	Bobby DeVine	Delta	0815	1400
	Tommy E.	Delta	0815	1400

Subcontractor Work Commencement: (AM) 0815 (PM)

Subcontractor Work Completion: (AM) (PM) 1400

R2-0001892

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 07/14/08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):
Chris Kiernan arrives on-site at 0720. Calibrates MiniRae dust monitor and PID monitor. Sets up station downwind of work area. At 0748 Chris Kiernan speaks to Bobby Devine from Delta, says that they will be on-site in about 20 minutes. Delta arrives on-site at 0810. Delta refuels equipment. At 0840 Bobby speaks to Frank DeVita, will drill down original hole to 200 feet today. Delta drills down in five foot increments. Drill down 180 feet in total during today's work. Chris Kiernan takes dust and PID readings every 30 minutes. Delta will finish drill down to 270 feet during tomorrow's work.

	PID	Dust
0845	0.00	0.018
0915	0.00	0.016
0945	0.00	0.017
1015	0.00	0.017
1045	0.00	0.018
1115	0.00	0.020
1145	0.00	0.020
1215	0.00	0.021
1245	0.00	0.022
1315	0.00	0.024
1345	0.00	0.025

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 07/14/08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:
Provided oversight for installation of temporary well, as well as took period dust and PID readings.

List specific inspection(s) performed and results (include problems and corrective actions):
None

List type and location of tests performed and results (include equipment used and monitoring results):
Dust and PID readings were taken every 30 minutes, downwind of drilling activity.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):
Will drill down original hole to save on time by not having to move equipment. However, they will only be able to go down to 270 feet to avoid screen that had broken off during the first installation of the temporary well.

Prepared by: Christopher Kiernan

Reviewed by:

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-15-08

DAILY FIELD ACTIVITY REPORT

Report Number: 24 Project Number: 2564-02

Field Log Book Page Number: 118-122

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - TMW 9 Washington Avenue

Weather: (AM) Sunny, Hot, Humid Rainfall: (AM) -- Inches
(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 80 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N
(PM) 90 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7^05	
	Bobby	Delta	6^50	
	Tommy	Delta	6^50	
	Bill	Brookside Env.	1^30	1^50

Subcontractor Work Commencement: (AM) 6^50 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-15-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees prepared equipment on site of TMW9 as well as the staging area for the days work. Delta completed drilling from 180' to a total depth of 280' below grade. After the total depth was reached, Delta installed a well through the Hollow stem Augers. Once the well installation was complete, the augers were then backed out of the ground.

At the end of the work day, Delta workers cleaned up and secured the work zone for the evening.

R2-0001896

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-15-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D+B oversaw subcontractors daily work activities. D+B also monitored the air down wind from the work zone to ensure a safe environment for all workers and residents in the nearby area.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and a MIE pDR1000AN air monitor were used down wind from the work zone. All readings showed safe working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Drilling and well installation went smoothly. Tomorrow Jeff to along with D+B will begin sampling TMW9.

Prepared by: Kevin Methot Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7·16·08

DAILY FIELD ACTIVITY REPORT

Report Number: 25 Project Number: 2564-02

Field Log Book Page Number: 123-125

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 9 Washington St.

Weather: (AM) 80 Sunny, Hot, Hum'd Rainfall: (AM) -- Inches
(PM) Sunny, Hot, Hum'd (PM) -- Inches

Temperature: (AM) 80 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) N
(PM) 90 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	A+B	7~~15~~	3 30
	Bobby	Delta	7 00	3 30
	Tommy	Delta	7 00	3 30
	Jeff Dyber	NYSDEC	2 30	3 10

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7·16·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees set up TMW 9 for sampling. We were able to sample two zones. In between each zone of sampling Delta workers backed the well casing out in twenty foot sections.

During pumping Delta regulated the pumps controls and poly-tubing. Delta cleaned and secured the work zone at the end of the day.

R2-0001899

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-16-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw Delta employees daily activities. D&B also monitored the water purged from well TMW9 using a Horiba and PID. D&B took samples from depths of 280 and 260 feet from well TMW9.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID RaePhotovac and Horiba U-22 were used during sampling to check for vapors as well as ph, temperature, turbidity, conductivity, dissolved oxygen, and ORP of the purge water.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Pumping went well but rather slow. On average the pumping rate was one gallon a minute. Tomorrow we will pick up where we left off.

Prepared by: Kevin McKiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.17.08

DAILY FIELD ACTIVITY REPORT

Report Number: 26 Project Number: 2564-02

Field Log Book Page Number: 126-130

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - TMW 9 Washington St.

Weather: (AM) Sunny, Hot, Humid Rainfall: (AM) - - Inches

(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 75 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) N

(PM) 90 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methoff	D+B	7 00	4 00
	Bobby	Delta	7 00	3 30
	Tommy	Delta	7 00	3 30
	Tom King	Delta	10 03	10 47

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7·17·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers set up equipment in the morning in preparation for sampling. Three 55 gallon drums were positioned accordingly. Delta then began putting the pump together and placing it down the well casing.

Delta monitored the pump during sampling and purging operations. Delta would back the well out in twenty foot sections after each round of sampling.

At the end of the day Delta employees cleaned up and secured the work zone for the day.

R2-0001902

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7·17·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D+B monitored vapors that may be present during sampling as well as monitored the purge water. D+B took samples at depths of 240', 220', and 200' below grade.
D+B also oversaw subcontractors daily activities.

List specific inspection(s) performed and results (include problems and corrective actions):

In the morning the pump would not work. Tom King from Delta came on site to replace a few parts. The pump worked well afterwards.

List type and location of tests performed and results (include equipment used and monitoring results):

A Horiba U-22 & PID PePhotams were used during purging. All results showed good conditions for sampling and a safe work zone.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kenn Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

R2-0001903

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7·18·08

DAILY FIELD ACTIVITY REPORT

Report Number: 27 Project Number: 2564-08

Field Log Book Page Number: 131 - 135

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TM# 9 Washington 51

Weather: (AM) Sunny, Cool, low Humidity Rainfall: (AM) -- Inches

(PM) Sunny, Hot, humid (PM) -- Inches

Temperature: (AM) 73 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) SW

(PM) 90 °F (PM) < 5 MPH (PM) NE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	7⁰⁰	3³⁰
	Bobby	Delta	7⁰⁵	3⁰⁰
	Tommy	Delta	7⁰⁵	3⁰⁰

Subcontractor Work Commencement: (AM) 7⁰⁵ (PM)

Subcontractor Work Completion: (AM) (PM) 3⁰⁰

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.18.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees set up site in preparation for rounds of sampling.
Delta monitored the pump during purging operations and sampling.
Delta also locked out the well in twenty foot sections when neccessary.
Delta cleaned and secured work site at the end of the work day.

R2-0001905

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.18.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B monitored the air and purgewater throughout the days. D&B also took groundwater samples at depths of 180, 160, and 140 feet. D&B also oversaw subcontractors daily work.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID RAE Photovac was used to pick up any vapors that might be present during purging.
A Horiba U-22 was used while purging to monitor the pH, temperature, turbidity, conductivity, dissolved oxygen and ORP of purge water.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Monday we will pick up where we left of and continue sampling

Prepared by: Kevin Methiff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-21-08

DAILY FIELD ACTIVITY REPORT

Report Number: 28 Project Number: 2564-02

Field Log Book Page Number: 136-141

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York, TMW 9 - Washington Ave.

Weather: (AM) Sunny, Hot, Humid Rainfall: (AM) -- Inches
(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 75 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) NW
(PM) 90 °F (PM) still MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methoff	D+B	7^00	4^20
	Bobby	DeHa	7^10	4^00
	Tommy	DeHa	7^10	4^00

Subcontractor Work Commencement: (AM) 7^10 (PM)

Subcontractor Work Completion: (AM) (PM) 4^00

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-21-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta employees prepared TMW9 work zone for rounds of groundwater sampling. In between each zone of sampling Delta barbed the well out in twenty foot sections.

During all pumping operations Delta monitored and ran the wells pump. At the end of the work day Delta workers cleaned and secured the work zone for the evening.

R2-0001908

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.21.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D+B employees oversaw subcontractors daily work. D+B also monitored the air in the workzone for the presence of harmful vapors. D+B was able to complete all rounds of groundwater samples. The zones were at depths of 120', 100', 80', and 60'.

List specific inspection(s) performed and results (include problems and corrective actions):

The last zone of sampling, at a depth of 60 feet, had a extremely low yield. Corrective actions were taken by slowing the pumping rate to the lowest possible.

List type and location of tests performed and results (include equipment used and monitoring results):

All measurements from the Horiba U-22 and PID RE Photovac showed results perfect for sampling and working.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow the well will be completely out of hole and the hole will be grouted.

Prepared by: Kevin Metkoff Reviewed by: _____

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-22-08

DAILY FIELD ACTIVITY REPORT

Report Number: 29 Project Number: 2564-02

Field Log Book Page Number: 142-144

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TM W9 Washington Ave.

Weather: (AM) Sunny, cool, low humidity Rainfall: (AM) - - Inches
(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 75 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) SW
(PM) 90 °F (PM) 5 MPH (PM) SW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 45	3 20
	Bobby	Delta	7 25	3 20
	Tommy	Delta	7 25	3 20

Subcontractor Work Commencement: (AM) 7 25 (PM)

Subcontractor Work Completion: (AM) (PM) 3 20

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-22-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers set up work zone in preparation to pull remaining well pipe from the ground. There was exactly 60 feet of pipe that remained including a five foot well screen.

Once the well was extracted from the ground, Delta prepared concrete grout as fill for the hole. A total of 14.5 94lb. bags of grout were used to complete the fille. After the grout fill was in place, Delta placed a road cone over the hole and secured the site of TMW 9 for the evening.

Delta drove to the site of TMW 4 with Kevin Metkiff of D&B so they could choose the safest route to transport equipment. Delta set up the drill rig at TMW 4 and prepared for the next days drilling.

Delta cleaned up and secured the work zone for TMW 4 for the evening.

R2-0001911

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-22-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of subcontractors work. D&B chose the next location for work as well as took photos of TMW9.

List specific inspection(s) performed and results (include problems and corrective actions):

The grout fill was not dry by the end of the work day. Therefore Delta will asphalt pack the remaining void below grade in the morning.

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta workers said they will asphalt pack TMW9 tomorrow morning and begin drilling operation at TMW4.

Prepared by: Kevin Methoff Reviewed by: _____

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-23-08

DAILY FIELD ACTIVITY REPORT

Report Number: 30 Project Number: 2564-02

Field Log Book Page Number: 145-149

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 4 Lindy Road

Weather: (AM) Overcast, light rain, cool Rainfall: (AM) Light rain on and off ~3 in. Inches

(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 75 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) NE

(PM) 85 °F (PM) < 5 MPH (PM) ENE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7^05	12^50
	Bobby	Delta	7^00	3^30
	Tommy	Delta	7^00	3^30

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-23-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta worker prepared TMW 4 on Lindy Road for drilling operation. Delta was able to reach a total depth of 180' for the day. They feel that this is a safe depth to leave augers in the ground over night.

Delta employees then secured TMW 4 work zone for the day and moved back to TMW 9. Once at TMW 9 the cattle fencing was broken down and TMW 9 was sealed with asphalt packing.

Delta workers then moved to the staging area to steam clean the well pipes in preparation for installation. Delta then secured the staging area for the evening.

R2-0001914

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-23-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B employees oversaw subcontractors daily activities. D&B logged and identified the lithology of TMW4 subsurface during drilling. D&B also monitored the air down wind from the work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID ReIntevac and a MIE pDR1000AW Dust Monitor were used during the days drilling to monitor the air down wind from the work zone. All readings ensured a safe working environment.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Drilling will be performed to a depth of 180' and will resume first thing the following morning.

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-24-08

DAILY FIELD ACTIVITY REPORT

Report Number: 31 Project Number: 2564-02

Field Log Book Page Number: 150-153

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-4 Lindy Road

Weather: (AM) Overcast, Heavy Rain, Cool Rainfall: (AM) ~2 Inches

(PM) Partly Cloudy, Hot, Humid (PM) -- Inches

Temperature: (AM) 70 °F Wind Speed: (AM) -- MPH Wind Direction: (AM) --

(PM) 80 °F (PM) 5-10 MPH (PM) SW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7:00	3:15
	Bobby	Delta	7:05	3:15
	Tommy	Delta	7:05	3:15
	Chris Okon	Delta	1:40	2:50
	Jeff Dyber	NYSDEC	9:05	9:46
			9:55	11:50
			12:35	2:30

Subcontractor Work Commencement: (AM) 7:05 (PM)

Subcontractor Work Completion: (AM) (PM) 3:15

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-24-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta prepared equipment for drilling operations. Delta was able to reach a total depth of 285' below grade. Once this depth was reached Delta installed a 2 inch well and began to back out the augers in five foot sections.

After all the augers were backed out, Delta took a gamma log through the well casing on the way down and up. After all work was completed Delta cleaned up and secured the site for the evening.

R2-0001917

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-24-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of Seltas work activities. D&B logged and identified the lithology of TMW 4 subsurface, and took PID readings during work hours.

List specific inspection(s) performed and results (include problems and corrective actions):

A dust monitor was not used during this day due to heavy rain.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PePhotovac was used in order to detect the presence of vapors in the work zone.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

All goals for the day were reached. Sampling will begin first thing in the morning.

Prepared by: Kara Methoff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-25-08

DAILY FIELD ACTIVITY REPORT

Report Number: 32 Project Number: 2564

Field Log Book Page Number: 1-4

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW4 - Lindy Road

Weather: (AM) Sunny, Cool, low humidity Rainfall: (AM) - - Inches
(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 75 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N
(PM) 85 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site: Name	Affiliation	Arrival Time	Departure Time
Kevin Metkiff	D&B	6^55	1^30
Bobby	Delta	6^50	1^30
Tommy	Delta	6^50	1^30

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 1^30

R2-0001919

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-25-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta prepared the site for purging and groundwater sampling. Delta monitored and ran the pump during pumping operations. Delta lowered the well out twenty feet to next zone after sampling was completed at a depth of 285' bg. Delta had trouble with the first pump and tried two back up pumps. All three pumps were considered unusable (did not work). Delta secured the site of TMW 4 for the evening.

R2-0001920

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-25-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of subcontractors daily work. D&B took groundwater samples at a depth of 285' bg. D&B also took readings during sampling and purging using a PID and Horiba.

List specific inspection(s) performed and results (include problems and corrective actions):

First pump used at a depth of 285' failed when moved to the next zone of 265'. Two back up pumps were then tried but all three did not work. They were sent back to Delta's shop for repairs.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Horiba were used during sampling and purging activities. All measurements taken showed perfect sampling and working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta will get all three pumps repaired over the week end.

Prepared by: Kevin Metkiff

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-28-08

DAILY FIELD ACTIVITY REPORT

Report Number: 33 Project Number: 2564-02

Field Log Book Page Number: 5-9

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York, TMW 4 Lindy Road

Weather: (AM) Overcast, Cool, low humidity Rainfall: (AM) -- Inches

(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 73 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) N

(PM) 88 °F (PM) 5 MPH (PM) SW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Ken's Methoff	D&B	6^55	1^15
	Bobby	Delta	7^20	3^30
	Tommy	Delta	7^20	3^30

Subcontractor Work Commencement: (AM) 7^20 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-28-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta prepared and set up the work site of MW 4 located on Lindy Road for ground water sampling. Delta monitored and ran the pump during pumping operations. Some trouble was encountered while pumping. Delta retracted the pump from the well to find the source of the problem. Delta investigated the situation by measuring total depth with a sounding tape and a water level indicator. After the problem was found, Delta removed the well from the ground and used four 94lb. bags of grout to fill the hole.

Delta then relocated the drill rig five feet east of first location, cleaned, and secured the site for the evening. Delta then moved to the staging area where they steam cleared all of the hollow stem augers and well casing.

R2-0001923

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-28-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of Delta's daily activities. D&B monitored the air down wind from the work zone while the drilling was in operation. D&B also took readings of purged water using an Horiba.

List specific inspection(s) performed and results (include problems and corrective actions):

While attempting to pump well TMW 4 at a depth of 265' it was discovered that the well casing separated at a depth of 220' bg. Once this was discovered it was decided that the well must be redrilled.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID, Dust Monitor, and Horiba were used during purging and other work performed. All readings showed results supporting a safe working environment.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

All well pipes will be removed from the ground and will be steam cleaned along with hollow stem augers. TMW 4 will be grouted and relocated 5 feet east of first hole. On 7-29-08 Delta will begin to redrill the hole.

Prepared by: Kevin Metkiff Reviewed by:

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-29-08

DAILY FIELD ACTIVITY REPORT

Report Number: 34 Project Number: 2564-02

Field Log Book Page Number: 10-14

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-4 Lindy Road

Weather: (AM) Sunny, cool, low humidity Rainfall: (AM) - - Inches
(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 73 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) N
(PM) 90 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	6^50	3^30
	Bobby	Delta	7^20	3^30
	Tommy	Delta	7^20	3^30
	Mark	Nicholas LLC	6^50	7^25
	Brian	Brookside	9^00	9^30

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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R2-0001925

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-29-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Early in the morning Mark from Nicholas LLC was on site at the Bowling Green Water District to remove the 30 yard roll off. He was unable due to the weight of the roll off. It was later decided between Delta, D&G, Brookside, and Nicholas LLC that the roll off will be lightered and then removed on the following day.

Delta began drilling the well for TMW-4 (second time due to complications) and reached a total depth of 180' below grade. Delta feels this is a safe depth to leave the augers at over night. Delta then began to prepare the well pipe for installation on the following day.

Delta also asphalt patched the first hole to complete the fill. Once this was complete Delta workers secured the site for the evening and moved on to the staging area to lighter the 30 yard roll off.

R2-0001926

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-29-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D & B oversaw all of subcontractors daily work activities. D & B also monitored the air down wind from the work zone. D & B coordinated the pick up, removal, and drop off of roll off containers.

List specific inspection(s) performed and results (include problems and corrective actions):

It was misunderstood as to which roll off would be removed from staging area. There was also a misunderstanding as to the weight capacity and load of the roll off containers. All parties involved were contacted and the situation was resolved.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Dust Monitor were used during daily work activities. All of the readings and measurements supported a safe work environment.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow the drilling operation will be completed and the well installed.

Prepared by: Kevin Metkiff Reviewed by: _____

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-30-08

DAILY FIELD ACTIVITY REPORT

Report Number: 35 Project Number: 2564-02

Field Log Book Page Number: 15-18

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York Town-4 Lindy Road

Weather: (AM) Sunny, Cool, low humidity Rainfall: (AM) - - Inches

(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 76 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) E

(PM) 90 °F (PM) <5 MPH (PM) SW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methiff	D+B	6:50	2:30
	Bobby	Delta	7:00	3:30
	Tommy	Delta	7:00	3:30
	Mark	Nicholas LLC	7:03	7:13

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-30-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Early in the morning Mark (truck driver from Nicholas LLC) came on site to remove the first roll off container.

Delta picked up equipment from the staging area and greased the work zone to TMW-4. Delta completed their target depth of 285' below grade. Once this depth was reached Delta installed a 2 inch well to a depth of 285' below grade and removed all of the augers.

Delta then proceeded to clean up the work zone in preparation for tomorrows work which will include groundwater sampling. Delta secured the site for the evening following clean up.

R2-0001929

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-30-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of subcontractors daily activities. D&B also monitored the air in the work zone and down wind from the work zone to ensure a safe working environment.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Dust Monitor were used to monitor the air down wind from the work zone. All of the readings and measurements taken showed safe working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow morning groundwater sampling will start

Prepared by: Kevin Metkiff Reviewed by: _____

D&B_DFAR/kb Rev. 03/09/98

R2-0001930

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-31-08

DAILY FIELD ACTIVITY REPORT

Report Number: 36 Project Number: 2564-02

Field Log Book Page Number: 19-24

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-4 Lindy Road

Weather: (AM) Overcast, Hazy, low humidity Rainfall: (AM) -- Inches
(PM) Partly Cloudy, hot, humid (PM) -- Inches

Temperature: (AM) 76 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) S
(PM) 85 °F (PM) 5 MPH (PM) SW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6:50	3:30
	Bobby	Delta	7:20	3:30
	Tommy	Delta	7:20	3:30
	Chris Okon	Delta	11:10	11:15
	Mark	Nicholas LLC	6:50	7:00

Subcontractor Work Commencement: (AM) 6:50 (PM)

Subcontractor Work Completion: (AM) (PM) 3:50

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-31-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Mark from Nicholas LLC was on site early in the day to drop off a clean roll off.

Delta workers gathered equipment and prepared the work zone for rounds of sampling. Samples were taken at depths of 285', 265', and 245' below grade. In between each round of samples Delta extracted the well in twenty foot sections.

At the end of the work day Delta workers cleaned and secured the work zone for the evening.

R2-0001932

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-31-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B employees oversaw all of subcontractors daily work. D&B monitored the air around the work zone for vapors and monitored the purged water using a Horiba. D&B was successful in taking groundwater samples at depths of 285', 265', and 245' below grade.

List specific inspection(s) performed and results (include problems and corrective actions):

The first pump used in the day failed after 30 minutes of pumping. A back up pump was used and pumping was successful.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Horiba were used during pumping operations. All readings and measurements ensured safe working conditions and proper sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metcalf Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

DAILY FIELD ACTIVITY REPORT

Report Number: 37 Project Number: 2564-02

Field Log Book Page Number: 25-31

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York, TMW - 4 Lindy Road

Weather: (AM) Sunny, Hot, Humid Rainfall: (AM) - - Inches
(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 76 °F Wind Speed: (AM) - - MPH Wind Direction: (AM) - -
(PM) 90 °F (PM) <5 MPH (PM) NW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 50	3 30
	Bobby	Delta	7 00	3 30
	Tommy	Delta	7 00	3 30
	Cliff	Delta	8 53	9 15
	Jeff Dyber	NYSDEC	1 55	2 05

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers cleared site and prepared equipment in preparation for sampling. Delta retracted the well in twenty foot sections after each zone was sampled. Four zones were completed. Delta mechanic, Cliff, was on site to investigate a leak in the hydraulic fluid line as well as a slight oil leak in the drill rig. Delta workers cleaned and secured the site for the evening.

R2-0001935

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D+B oversaw all of subcontractors daily work. D+B took groundwater samples at depths of 225', 205', 185', 165', and 145' below grade. D+B also used a PID and Horiba to take readings during sampling and purging.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Horiba were used during groundwater sampling and purging. All readings and measurements showed ideal sampling and working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Sampling should be completed on the next work day.

Prepared by: Kevin Metkiff Reviewed by:

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-4-08

DAILY FIELD ACTIVITY REPORT

Report Number: 38 Project Number: 2564-02

Field Log Book Page Number: 32-37

Project: New Cassel Industorial Area

Address: New Cassel, Nassau County, New York TMW-4 Lindy Road

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) -- Inches
(PM) Sunny, Hot, Humid (PM) -- Inches

Temperature: (AM) 69 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) NE
(PM) 88 °F (PM) 5 MPH (PM) NE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	6 50	3 30
	Bobby	Delta	7 15	3 30
	Tommy	Delta	7 15	3 30

Subcontractor Work Commencement: (AM) 7 15 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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R2-0001937

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-4-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers opened site and prepared site and equipment for rounds of groundwater sampling. Delta backed the well out in twenty foot sections after each round of samples were taken. Delta monitored and ran the pump during sampling and purging activities. At the end of the day Delta cleaned up and secured the site for the evening.

R2-0001938

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-4-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of subcontractors daily work. D&B took groundwater samples from depths of 125', 105', 85', and 65' below grade. D&B used a PID & Horiba during sampling and purging.

List specific inspection(s) performed and results (include problems and corrective actions):

The last zone at 65' bg, began to draw down during pumping. Pumping would only last for about two minutes before it would bog down. It was decided to pump the well dry then allow for it to recharge. This action was repeated three times before a round of samples were taken. This was to garantee three well volumes were purged before the samples were taken.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID & Horiba were used during sampling and purging activities. All readings and measurements showed ideal sampling and work conditions

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

R2-0001939

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-5-08

DAILY FIELD ACTIVITY REPORT

Report Number: 39 Project Number: 2564-02

Field Log Book Page Number: 38-

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County New York TMW-4+5

Weather: (AM) Sunny, Cool, Low Humidity Rainfall: (AM) - - Inches
(PM) Mostly Cloudy, Hot, Humid (PM) - - Inches

Temperature: (AM) 71 °F Wind Speed: (AM) Still MPH Wind Direction: (AM) —
(PM) 80 °F (PM) 5-10 MPH (PM) SW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 50	2 00
	Bobby	Delta	7 25	3 30
	Tommy	Delta	7 25	3 30

Subcontractor Work Commencement: (AM) 7 25 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-5-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers secured work zone TMW-4 for work activities. Delta removed the remaining well pipes from the ground. Three 94lb bags of grout were used to fill the void in TMW-4. Delta then cleaned the site and began breaking down all equipment and relocating it to TMW 5 location. After all of Delta's equipment was relocated to TMW 5, Delta then went back to TMW 4 to pack asphalt in the remaining void. Delta then cleaned the site of TMW 4 and TMW 5 and secured TMW 5 for the evening.

R2-0001941

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-5-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of subcontractors daily work. D&B prepared daily field forms and made arrangements with Brookside environmental for the next roll off sampling.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow Delta will begin drilling on the location of TMW-5

Prepared by: Kevin Methoff

Reviewed by:

D&B_DFAR/kb

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-6-08

DAILY FIELD ACTIVITY REPORT

Report Number: 40 Project Number: 2564-02

Field Log Book Page Number: 40-43

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-5

Weather: (AM) Heavy Rain, Lightning, cool Rainfall: (AM) ~1 Inches
(PM) Overcast, Hot, Humid (PM) -- Inches

Temperature: (AM) 72 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) SE
(PM) 80 °F (PM) still MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6^55	12^05
	Bobby	Delta	7^15	3^30
	Tommy	Delta	7^15	3^30

Subcontractor Work Commencement: (AM) 7^15 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

R2-0001943

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-6-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers prepared work zone to begin drilling TMW-5e When drilling was completed for the day a total depth of 150' bg was reached. After drilling Delta cleaned and secured the site for the evening. Delta then moved to the staging area to steam clean the well pipes.

R2-0001944

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-6-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw subcontractors daily work. D&B categorized the lithology of the subsurface based on drill cuttings. D&B also monitored the air down wind from the work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

Early in the morning a lightning storm passed through. All workers stayed sheltered until storm passed.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Dust monitor were used during drilling operation. All readings and measurements showed ideal drilling and working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Methoff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-7-08

DAILY FIELD ACTIVITY REPORT

Report Number: 41 Project Number: 2564-02

Field Log Book Page Number: 44-47

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-5

Weather: (AM) Overcast, Cool, Foggy Rainfall: (AM) — — Inches
(PM) Sunny, Hot, Humid (PM) — — Inches

Temperature: (AM) 69 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) S
(PM) 80 °F (PM) <5 MPH (PM) SW

Site Condition: Good Condition

Personnel On Site: Name	Affiliation	Arrival Time	Departure Time
Kevin Methiff	D+B	6^50	2^45
Bobby	Delta	7^00	2^45
Tommy	Delta	7^00	2^45
Chris Okon	Delta	12^50	1^55

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 2^45

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-7-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta opened the work zone and prepared equipment for drilling activities. Delta reached the target depth of 285' below grade. Once drilling was complete a two inch well was installed through the augers. The well was installed to a depth of 285' below grade, then all of the augers were backed out of the ground. Delta then took a gamma log of the underlying stratigraphy. At the completion of the days work, Delta cleaned and secured the work zone for the evening.

R2-0001947

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-7-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D+B oversaw all of subcontractors daily work. D+B also monitored the air in and around the work zone during the drilling operations.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and a Dust Monitor were used to monitor the air. All measurements and readings showed ideal working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Ground water sampling will begin tomorrow.

Prepared by: Kevin Methoff. Reviewed by:

D&B_DFAR/kb

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-8-08

DAILY FIELD ACTIVITY REPORT

Report Number: 42 Project Number: 2564-02

Field Log Book Page Number: 48-51

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-5

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) - - Inches

(PM) Partly Cloudy, low Humidity (PM) Light Sprinkle Inches

Temperature: (AM) 66 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N

(PM) 74 °F (PM) 5-10 MPH (PM) NE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	7^10	3^30
	Bobby Devine	Delta	7^00	3^30
	Tommy Ewers	Delta	7^00	3^30

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-8-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers geared site and prepared for groundwater sampling. Delta ran and monitored the pump during purging and sampling activities. In between each zone sampled, Delta backed the well out in twenty foot sections to prepare for the next round of samples. Delta cleaned the site at the end of the work day and secured the site for the evening.

R2-0001950

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-8-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw subcontractors daily work activities. D&B was able to sample at depths of 285' and 265' below grade. D&B monitored the air in the work zone during purging and sampling activities.

List specific inspection(s) performed and results (include problems and corrective actions):

At a depth of 265' below grade the well had a low yield.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Horiba were used during purging and sampling. All measurements and readings showed a safe work environment and ideal sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff Reviewed by:

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-11-08

DAILY FIELD ACTIVITY REPORT

Report Number: 43 Project Number: 2564-02

Field Log Book Page Number: 52-57

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-5

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) - - Inches
(PM) Sunny, Cool, light humidity (PM) ~ 2 Inches

Temperature: (AM) 66 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) SE
(PM) 78 °F (PM) 5 MPH (PM) SE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7^00	3^30
	Tommy E.	Delta	7^10	3^30
	Bobby J.	Delta	7^10	3^30

Subcontractor Work Commencement: (AM) 7^10 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-11-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers opened site and prepared for sampling. Delta workers ran and monitored the pump during purging and sampling activities. Delta backed the well out in twenty foot sections in between zones of sampling. Delta cleaned and secured the work zone at the end of the work day.

R2-0001953

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-11-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B employees oversaw all of subcontractors work activities. D&B also monitored the air during purging and sampling activities

List specific inspection(s) performed and results (include problems and corrective actions):

At this location while purging at a depth of 24.5' bg. The PID PE Photovac used detected low concentrations of vapors. The PID was monitored continuously throughout the purging operation for any changes in these readings.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PE Photovac and a Horiba U-22 were used during purging and sampling. All measurements and readings showed ideal sampling and working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Methoff Reviewed by:

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R2-0001954

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

DAILY FIELD ACTIVITY REPORT

Report Number: 44 Project Number: 2564-02

Field Log Book Page Number: 58-64

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-5

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) - - Inches

(PM) Partly Cloudy, Cool, low Humidity (PM) - - Inches

Temperature: (AM) 64 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) NW

(PM) 85 °F (PM) 5-10 MPH (PM) NE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	7:00	3:30
	Bobby	Delta	7:00	3:30
	Tommy	Delta	7:00	3:30

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers opened and prepared work zone for daily activities. On this day Delta ran and monitored pumps during purging and sampling activities. Delta backed the well out in twenty foot sections in between each sampled zone. Delta also cleaned up and secured the work zone for the evening.

R2-0001956

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw subcontractors daily work. D&B took groundwater samples from depths of 185', 165', 145', 125', and 105' below grade. D&B also monitored the air in the work zone during purging and sampling activities.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Horiba were used during sampling and purging activities. All measurements and readings fell within the guidelines for a safe work zone and ideal sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow the last two zones will be sampled.

Prepared by: _____ Reviewed by: _____

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Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-13-08

DAILY FIELD ACTIVITY REPORT

Report Number: 45 Project Number: 2564-02

Field Log Book Page Number: 65-68

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-5

Weather: (AM) Sunny, Cool, Low Humidity Rainfall: (AM) - - Inches
(PM) Sunny, Warm, Low Humidity (PM) - - Inches

Temperature: (AM) 67 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N
(PM) 80 °F (PM) < 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	7⁰⁰	3³⁰
	Bobby Devine	Delta	7⁰⁵	3³⁰
	Tommy Evers	Delta	7⁰⁵	3³⁰

Subcontractor Work Commencement: (AM) 7⁰⁵ (PM)

Subcontractor Work Completion: (AM) (PM) 3³⁰

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-13-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers greased work zone and prepared site for last two zones of groundwater sampling. The well was backed out in twenty foot sections. After the last round of samples were taken, Delta pulled the remaining well pipes out of the ground. Delta then used 9 94lb bags of cement to grout the hole. Once this was done delta cleaned and secured the work zone of TMW-5. Delta then moved the drilling to the site of TMW-2.

R2-0001959

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-13-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of subcontractors daily work. D&B was able to take groundwater samples at depths of 85' and 65' below grade. D&B used a PID and Horiba during purging and sampling.

List specific inspection(s) performed and results (include problems and corrective actions):

The water district was contacted and asked to mark out the water main at TMW-2.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID & Horiba were used during purging and sampling. All readings and measurements showed ideal work and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin McHoff Reviewed by:

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-14-08

DAILY FIELD ACTIVITY REPORT

Report Number: 46 Project Number: 2564-02

Field Log Book Page Number: 69-72

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-2

Weather: (AM) Partly Cloudy, Cool, low Humidity Rainfall: (AM) - - Inches
(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 71 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N
(PM) 85 °F (PM) < 5 MPH (PM) NE

Site Condition: Good Site

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	6 50	1 30
	Bobby Devine	Delta	7 00	3 30
	Tommy Evers	Delta	7 00	3 30
	Colleen	Delta	7 40	9 10

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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R2-0001961

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-14-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers opened work zone and prepared site for drilling operation. Delta reach a depth of 180' below grade. Once completed, Delta prepared well pipe by connecting them in twenty foot sections. Delta received a shipment of new pipes. They had to be prepped by putting tack welds on the cuff links.

Delta employee Colleen also came on site to make sure exact location of future drill sites.

At the end of the work day Delta workers cleared and secured the work zone for the evening.

R2-0001962

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-14-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of subcontractors daily work. D&B also monitored the air in and around the work zone during drilling. D&B logged the lithology of the work zones subsurface.

List specific inspection(s) performed and results (include problems and corrective actions):

New well pipe that was delivered needs tack welds.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID & Dust monitor were used during drilling operations. All measurements and readings showed ideal work conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow Delta will asphalt pack TMW-5. Then they will drill to a depth of 285' below grade at TMW-2 and install a temporary well.

Prepared by: Kevin Mettiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-15-08

DAILY FIELD ACTIVITY REPORT

Report Number: 47 Project Number: 2564-02

Field Log Book Page Number: 73-76

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 2

Weather: (AM) Overcast, Cool, No Humidity Rainfall: (AM) - - Inches

(PM) Overcast, Cool, Low Humidity (PM) - - Inches

Temperature: (AM) 67 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N

(PM) 80° °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkoff	D&B	7⁰⁰	3¹⁰
	Bobby Devine	Delta	7⁰⁰	3³⁰
	Tom Evers	Delta	7⁰⁰	3³⁰
	Chris Okon	Delta	1⁵⁵	3⁰⁰

Subcontractor Work Commencement: (AM) 7⁰⁰ (PM)

Subcontractor Work Completion: (AM) (PM) 3³⁰

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8/15/08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta Workers opened site and prepared to complete drilling operation. Delta reached a total depth of 285' below grade. Once this depth was reached Delta installed a 2 inch well and began to pull all of the augers from the ground. Delta then gamma logged the well labeled TMW-2.

At the end of the work day Delta cleaned and secured the work zone for the evening.

R2-0001965

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-15-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of subcontractors daily activities. D&B monitored the air in and around the workzone. D&B also logged and identified the drill cuttings as they became visible.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Dust Monitor were used during drilling operations. All readings and measurements showed ideal working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Groundwater sampling will begin on Monday. The clay layers shown on the gamma log will be avoided during pumping operations.

Prepared by: Kevin Methoff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-18-08

DAILY FIELD ACTIVITY REPORT

Report Number: 48 Project Number: 2564

Field Log Book Page Number: 77-81

Project: New Cassel Industrial Area - NYSDEC

Address: New Cassel, Nassau County, New York

Weather: (AM) Sunny, hot, humid Rainfall: (AM) -- Inches
(PM) Sunny, hot, humid (PM) -- Inches

Temperature: (AM) 80 °F Wind Speed: (AM) 10 MPH Wind Direction: (AM) SW
(PM) 85 °F (PM) 15 MPH (PM) SW

Site Condition:

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	DB	7:10	
	Frank DeVita	DB	7:10	11:40
	Bobby	Delta	7:10	3:30
	Tommy	Delta	7:10	3:30
	Matt DeViney	DB	10:10	3:30

Subcontractor Work Commencement: (AM) 7:10 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-18-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta mobilized to TMW-02 to initiate groundwater sampling @ 285' depth interval.
- Delta operated a Grundfos Redi-Flo 2 submersible pump to assist DB w/ groundwater sampling. The pump was powered by a gasoline generator supplied by Delta.
- Between sampling activities @ each zone, Delta decontaminated the pump, backed the temporary well point out of the ground in 20-foot sections and reinstalled the pump.
- Delta assisted DB w/ determination of pumping rates, depth to water in the well and collection of samples.
- Delta decontaminated hollow-stem augers used during the drilling of TMW-2. These activities took place @ the decontamination pad located @ the BGWD.
- Delta secured the site @ the end of the day w/ temporary fencing. Equipment was relocated back to the staging area @ BGWD

R2-0001968

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 5-18-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

DB oversaw all Delta activities. In addition DB collected groundwater samples @ 4-depth intervals (285', 265', 245', 225'). Groundwater samples were monitored in the field using a Horiba U-22 and PID.

List specific inspection(s) performed and results (include problems and corrective actions):

Not Applicable

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PE Photovac and Horiba U-22 were used during sampling to check for volatile vapors and measure groundwater for pH, temperature, conductivity, dissolved oxygen, and ORP.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Not Applicable

Prepared by: Matt DeVincy

Reviewed by:

D&B_DFAR/kb

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-19-08

DAILY FIELD ACTIVITY REPORT

Report Number: 49 Project Number: 2564-02

Field Log Book Page Number: 82-86

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-2

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) - - Inches
(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 73 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) NW
(PM) 85 °F (PM) 5 MPH (PM) NW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	6 55	3 30
	Bobby Devine	Delta	7 00	3 30
	Tommy Evans	Delta	7 00	3 30
	Bobby Devine Sr.	Delta	2 30	3 30
	Colleen	Delta	2 30	3 30

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-19-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Delta workers opened the work zone in preparation for ground water sampling. Delta ran and monitored the pump during purging and sampling operations. Delta locked the well out in between sample zones. Delta also cleaned up and secured the work zone for the evening.

Delta employees Colleen and Bob Devine Sr. came on-site to check out work sites. The purpose is to prepare utility mark outs.

R2-0001971

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-19-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of subcontractors daily work. D&B monitored purge water and took four rounds of groundwater samples. D&B also monitored the air in the work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

During sampling, clay layers were avoided by referencing the gamma log.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID & Horiba were used during purging and sampling. All readings showed perfect sampling conditions and a safe work zone.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Groundwater sampling will continue tomorrow.

Prepared by: Kevin Mothiff Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-20-08

DAILY FIELD ACTIVITY REPORT

Report Number: 50 Project Number: 2564-02

Field Log Book Page Number: 87-91

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-2

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) - - Inches

(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 62° °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N

(PM) 80° °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	6^58	3^15
	Bobby Devine	Delta	6^50	3^15
	Tom Ewers	Delta	6^50	3^15
	Tom	Nicholas LLC.	6^50	7^10

Subcontractor Work Commencement: (AM) 6^50 (PM)

Subcontractor Work Completion: (AM) (PM) 3^15

R2-0001973

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-20-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened site in preparation for groundwater sampling.
- Delta operated and monitored the pump used for purging and sampling well TMW-2.
- Delta backed the well out in twenty foot sections after each round of samples were taken.
- Delta cleaned the work zone and secured the site at the end of the day.

R2-0001974

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-20-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B workers oversaw all of subcontractors daily activities. D&B completed groundwater sampling at depths of 145', 125', and 105' bg. D&B scheduled and oversaw the removal of drill cuttings from the staging area. D&B also monitored the work zone and purge water during daily work.

List specific inspection(s) performed and results (include problems and corrective actions):

Sample zones at 125' and 105' below grade produced a low yield during purging operations.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Horiba were used during sampling and purging activities. All measurements and readings showed ideal working and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metcalf Reviewed by:

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R2-0001975

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-21-08

DAILY FIELD ACTIVITY REPORT

Report Number: 51 Project Number: 2564-02

Field Log Book Page Number: 92-96

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 2

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) — — Inches
(PM) Sunny, Hot, Humid (PM) — — Inches

Temperature: (AM) 62 °F Wind Speed: (AM) N/A MPH Wind Direction: (AM) SW
(PM) 80 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7:00	2:15
	Bobby Levine	Delta	7:00	3:30
	Tommy Ewers	Delta	7:00	3:30

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-21-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone and prepared site for sampling.
- Delta operated and monitored pump while purging and sampling.
- Delta backed well out in twenty foot sections to appropriate depths.
- Delta fully retracted well from TMW 2 when sampling was completed.
- Delta used 17 (94lb.) bags of cement to grout the remaining void.
- After grouting was completed Delta cleaned up and secured the work zone @ TMW 2 for the evening.
- All equipment including the drill rig was then trasported to the next work zone (TMW-1).

R2-0001977

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-21-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B oversaw subcontractors daily work.
- D&B took groundwater samples from depths of 85' and 65' below grade.
- D&B also monitored the air and purge water during work activities.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID & Horiba were used during sampling and purging activities. All readings and measurements showed ideal sampling and working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Drilling operation will begin tomorrow at TMW-1

Prepared by: Kevin McHoff Reviewed by: _____

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-22-08

DAILY FIELD ACTIVITY REPORT

Report Number: 52 Project Number: 2564-02

Field Log Book Page Number: 97-100

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-1

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) — — Inches
(PM) — — (PM) — — Inches

Temperature: (AM) 63 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) N
(PM) — °F (PM) — MPH (PM) —

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 55	12 45
	Bobby Devine	Delta	7 15	3 30
	Tommy Ewers	Delta	7 15	3 30

Subcontractor Work Commencement: (AM) 7 15 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

R2-0001979

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-22-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone and prepared to drill.
- Delta reached a depth of 180' below grade.
- Delta steam cleaned well pipes
- Delta cleaned and secured work zone at the end of the work day.

R2-0001980

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-22-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors work.
- D+B monitored the air in and down wind of work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

n/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Dust monitor were used during drilling activities. All readings and measurements showed ideal working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

On monday drilling will be completed to a depth of 285' below grade. A well will then be installed to a depth of 285'. The hole will then be gamma logged.

Prepared by: Kerri Metcalf Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

R2-0001981

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-25-08

DAILY FIELD ACTIVITY REPORT

Report Number: 53 Project Number: 2564-02

Field Log Book Page Number: 101 - 104

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-1

Weather: (AM) Sunny, Cool, low humidity Rainfall: (AM) — — Inches
(PM) Mostly cloudy, low humidity, Hot (PM) — — Inches

Temperature: (AM) 71 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) N
(PM) 80 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	7:00	3:20
	Bobby Devine	Delta	7:05	3:20
	Tommy Evers	Delta	7:05	3:20
	Chris Okon	Delta	2:10	3:05

Subcontractor Work Commencement: (AM) 7:05 (PM)

Subcontractor Work Completion: (AM) (PM) 3:20

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R2-0001982

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-25-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened and prepared the work zone for drilling operations.
- Delta workers were able drill to a total depth of 285' below grade.
- After this depth was reached a 2" temporary well was installed to a depth of 285' bg and all of the augers were backed out.
- Delta then ~~th~~ took a gamma log of TMW 1.
- At the end of the day Delta cleaned and secured work zone for the evening.

R2-0001983

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-25-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D+B oversaw all of subcontractors work. D+B also monitored the air down wind from work zone. D+B logged the lithology of TMW 1 subsurface based on drill cuttings.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID & Dust Monitor were used during drilling operations. All readings showed ideal and safe work conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Ground water sampling will begin tomorrow

Prepared by: Kevin Methoff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-26-08

DAILY FIELD ACTIVITY REPORT

Report Number: 54 Project Number: 2564-02

Field Log Book Page Number: 105-108

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW - 1.

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) - - Inches
(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 60 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) N
(PM) 84 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7 00	3 00
	Bobby Devine	Delta	7 10	2 45
	Tommy Ewers	Delta	7 10	2 45

Subcontractor Work Commencement: (AM) 7 10 (PM)

Subcontractor Work Completion: (AM) (PM) 2 45

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-26-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone and prepared site for sampling.
- Delta operated and monitored a pump while purging and sampling were performed.
- Inbetween sampling zones, Delta workers backed well in twenty foot sections.
- Delta cleaned and secured the work zone at the end of the day.

R2-0001986

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-26-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors daily work
- D+B monitored the purged water and took samples from depths of 285' + 265' bg.
- D+B completed field forms + mailed sample coolers.

List specific inspection(s) performed and results (include problems and corrective actions):

At 265' below grade, we experienced extremely low yield while purging. One well volume was purged before the well drew down and the pump shut off. The well took about one hour to recharge. The pump was started again and we were able to pump at a rate of 1gal/min.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID + Horiba were used during sampling and purging activities. All readings showed ideal sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin McKiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8.27.08

DAILY FIELD ACTIVITY REPORT

Report Number: 55 Project Number: 2564-02

Field Log Book Page Number: 109 - 113

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW - 1

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) - - Inches

(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 62° °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) N

(PM) 80 °F (PM) 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	7 00	4 00
	Bobby DeVine	Delta	7 15	3 50
	Tommy Ewers	Delta	7 15	3 50
	Frank DeVita	D&B	1 45	2 32
	Matt DeVinney	D&B	1 45	2 32
	3 Reps from TOH	TOH Health Department	2 20	3 00

Subcontractor Work Commencement: (AM) 7 15 (PM)

Subcontractor Work Completion: (AM) (PM) 3 50

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-27-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

-Delta opened and prepared the work zone of TMW-1 for groundwater sampling.
- Delta operated and monitored the pump during purging and pumping activities.
- Delta backed the well out in twenty foot sections inbetween each sampled zones.
-Delta cleaned and secured the work zone at the end of the work day.

R2-0001989

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-27-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors daily work.
- D+B monitored the purgewater during purging and sampling.
- D+B took samples from three zones at depths of 205', 225', and 245' below grade.
- D+B completed field forms and mailed cooler with samples to Mitken lab.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID + Horiba were used during purging and sampling operations. All readings and measurements showed ideal sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-28-08

DAILY FIELD ACTIVITY REPORT

Report Number: 56 Project Number: 2564-02

Field Log Book Page Number: 114-119

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-1

Weather: (AM) Sunny, Cool, no Humidity Rainfall: (AM) — — Inches
(PM) Sunny, Mild, low Humidity (PM) — — Inches

Temperature: (AM) 62 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) N
(PM) 80 °F (PM) 5 MPH (PM) SW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	6^55	3^30
	Bobby Devine	DeHa	6^55	9^30
			1^30	3^30
	Tommy Evers	Delta	6^55	3^30

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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R2-0001991

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-28-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened and prepared work zone for rounds of groundwater sampling.
- Delta operated and monitored the pump used during purging and sampling activities.
- In between each sampled zone Delta workers backed the well out to the next zone.
- At the end of the day Delta cleaned and secured the work zone for the day.

R2-0001992

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-28-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors daily work.
- D+B took samples (groundwater) from four zones (185', 165', 145', and 125' bg)
- D+B monitored the air in the work zone during purging and sampling.

List specific inspection(s) performed and results (include problems and corrective actions):

Low yield while purging

List type and location of tests performed and results (include equipment used and monitoring results):

A PID + Horiba were used while purging and sampling operations were taking place. All readings showed ideal sampling and working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

n/A

Prepared by: Kevin Methoff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-29-08

DAILY FIELD ACTIVITY REPORT

Report Number: 57 Project Number: 2564-02

Field Log Book Page Number: 120-124

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-1

Weather: (AM) Sunny, Cool, no humidity Rainfall: (AM) - - Inches

(PM) Sunny, Hot, Humid (PM) - - Inches

Temperature: (AM) 66 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) N

(PM) 80 °F (PM) 5 MPH (PM) SE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 55	3 30
	Bobby Devine	Delta	7 00	3 30
	Tommy Ewers	Delta	7 00	3 30
	Jeff Dyber	NYSDEC	8 30	1 30

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-29-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta prepared work zone TMW 1 for rounds of groundwater sampling
- Delta operated and monitored the pump used during purging and sampling.
- Delta backed the well out of the ground inbetween each sampled zone.
- After sampling was complete, Delta removed the remaing well pipes.
- Delta then cleaned the site and cleared all remaing pieces of equipment.
- Once the site was cleared, Delta used 4 1/2 94 lb. bags of cement to grout the remaing void.
- Delta then brought equipment to the staging area to store.
- Delta then asphalt packed the hole sealing the hole up to grade.
- The staging area was then secured for the weekend.

R2-0001995

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-29-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B oversaw all of subcontractors daily work
- D&B completed groundwater sampling for TMW 1 - samples were taken from depths of 115', 85', and 72' below grade.
- D&B monitored the air around the work zone and the purged water.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID and Horiba were used during purging and sampling. All readings showed ideal sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff Reviewed by:

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-2-08

DAILY FIELD ACTIVITY REPORT

Report Number: 58 Project Number: 2564-02

Field Log Book Page Number: 125

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York

Weather: (AM) Sunny, Cool, No Humidity (PM) – –

Rainfall: (AM) – – Inches (PM) – – Inches

Temperature: (AM) 66 °F (PM) – – °F

Wind Speed: (AM) < 5 MPH (PM) – – MPH

Wind Direction: (AM) N (PM) – –

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D & B	7 00	10 20
	Two Contractors	Delta	10 00	– –

Subcontractor Work Commencement: (AM) 10 00 (PM)

Subcontractor Work Completion: (AM) (PM) – –

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-2-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta on site at the staging area (Bowling Green Water District)
- Todays work will consist of steam cleaning well pipe and removal of equipment.

R2-0001998

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-2-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B opened staging area for Delta workers.
- D&B organized daily work.

List specific inspection(s) performed and results (include problems and corrective actions):

n/A

List type and location of tests performed and results (include equipment used and monitoring results):

n/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

n/A

Prepared by: Kevin Metkiff Reviewed by:

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Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-3-08

DAILY FIELD ACTIVITY REPORT

Report Number: 59 Project Number: 2564-02

Field Log Book Page Number: 126

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York

Weather: (AM) Sunny, Cool, No Humidity Rainfall: (AM) - - Inches
(PM) - - (PM) - - Inches

Temperature: (AM) 67 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N
(PM) - °F (PM) - MPH (PM) -

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7^00	9^05
	Two Contractors	Delta	8^00	-

Subcontractor Work Commencement: (AM) 8^00 (PM)

Subcontractor Work Completion: (AM) (PM) - -

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-3-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta workers began to remove remaining field equipment.
- Delta removed well pipe, drums, timbers, temporary fencing, and garbage.
- The previous day, the decon pt was broken down and removed along with augers and trailer.

R2-0002001

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-3-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D+B oversaw all work performed by subcontractor.
D+B organized and arranged for the clean up and removal of equipment from the Bowling Green Water District (staging area).

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta will leave the Bobcat and Backhoe on site.

Prepared by: Kevin Metkiff Reviewed by: _____

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-4-08

DAILY FIELD ACTIVITY REPORT

Report Number: 60 Project Number: 2564-02

Field Log Book Page Number: 127

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York

Weather: (AM) - - Rainfall: (AM) - - Inches

(PM) Sunny, Hot, Very Humid (PM) - - Inches

Temperature: (AM) 90 °F Wind Speed: (AM) Still wind MPH Wind Direction: (AM) - -

(PM) - - °F (PM) - - MPH (PM) - -

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methiff	D&B	12^20	12^35
	Brian	Brookside	12^20	12^33

Subcontractor Work Commencement: (AM) 12^20 (PM)

Subcontractor Work Completion: (AM) (PM) 12^33

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-4-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Brookside was on site at the Bowling Green Water District to take a soil sample from the roll off container. This is the third roll off container that was used for this project to hold drill cuttings.

R2-0002004

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-4-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B opened work zone for subcontractor.
D&B oversaw subcontractors work and then secured the site.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

The next phase of the project was explained to Brookside. It was noticed that the roll off stationed at the staging area is categorized as a liquid tight container. For the next phase of the project a mud box will be required to guarantee full containment of mud/cuttings produced during drilling.

Prepared by: Kevin Methoff Reviewed by: _____

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-18-08

DAILY FIELD ACTIVITY REPORT

Report Number: 61 Project Number: 2564-02

Field Log Book Page Number: 128-129

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Staging Area

Weather: (AM) Sunny, Cool Rainfall: (AM) - - Inches

(PM) - - (PM) - - Inches

Temperature: (AM) 60 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) N

(PM) - - °F (PM) - MPH (PM) -

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	A&B	6^55	7^56
	Brian	Brookside	6^55	7^48
	Tom Vasta	Rainbow Transport	7^45	7^55

Subcontractor Work Commencement: (AM) 6^55 (PM)

Subcontractor Work Completion: (AM) (PM) 7^55

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Bartilucci
CONSULTING ENGINEERS
* DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9·18·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Brookside and Rainbow transport on site for roll-off container removal.

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9.18.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- Oversaw subcontractors work

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Spoke with Brian from Brookside about next roll off needed (mud box).

Prepared by: Kevin Methot

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9.23.08

DAILY FIELD ACTIVITY REPORT

Report Number: 62 Project Number: 2564-02

Field Log Book Page Number: 130

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-31

Weather: (AM) -- Rainfall: (AM) -- Inches

(PM) -- (PM) -- Inches

Temperature: (AM) -- °F Wind Speed: (AM) -- MPH Wind Direction: (AM) --

(PM) -- °F (PM) -- MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methiff	AYB	1 00	1 40
	Keith Cronin	Delta	1 00	1 40
	Bill Murphy	Delta	1 00	1 40
	Tom King	Delta	1 00	1 40

Subcontractor Work Commencement: (AM) 1 00 (PM)

Subcontractor Work Completion: (AM) (PM) 1 40

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-23-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Discussed upcoming work at TMW-3D

R2-0002010

Dufrin and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9.23.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- Spoke with Delta employees on site of TMW-3D about up coming work.
- Equipment needed and work zone space.
- Drilling fluid and cuttings disposal.

List specific inspection(s) performed and results (include problems and corrective actions):

n/A

List type and location of tests performed and results (include equipment used and monitoring results):

n/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

n/A

Prepared by: Kevin Metkiff

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

R2-0002011

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-24-08

DAILY FIELD ACTIVITY REPORT

Report Number: 63 Project Number: 2564-02

Field Log Book Page Number: 131-132

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-3D

Weather: (AM) Sunny, Cool (PM) Sunny, Warm

Rainfall: (AM) - - Inches (PM) - - Inches

Temperature: (AM) 58 °F (PM) 65 °F

Wind Speed: (AM) 5-10 MPH (PM) 5-10 MPH

Wind Direction: (AM) NE (PM) NE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	8:00	3:55
	Keith Cronin	Delta	8:15	3:55
	Bill Murphy	Delta	8:15	3:55

Subcontractor Work Commencement: (AM) 8:15 (PM)

Subcontractor Work Completion: (AM) (PM) 3:55

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Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
* DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-24-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

Subcontractor: Delta Well and Pump.
- Dropped off equipment used for drilling at the site of TMW-3S and the staging area.
- Delta positioned the drill rig at TMW 3S.
- Delta placed two mud pits along side the drill rig.
- Cattle fencing was set up around the entire work zone to create a boundary and security for the work zone.
- Pipe used in mud rotary drilling was placed on 6x6 timbers behind the drill rig.
- Road cones, with flashing lights, were placed along the perimeter of the work zone for security (a warning to on coming vehicles).
- Work zone and staging area were secured for the evening.

R2-0002013

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-24-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors daily work.
- D+B coordinated future work to be performed on this project.
- D+B scheduled upcoming work.

List specific inspection(s) performed and results (include problems and corrective actions):

n/A

List type and location of tests performed and results (include equipment used and monitoring results):

n/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

n/A

Prepared by: [signature]

Reviewed by: _____

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-25-08

DAILY FIELD ACTIVITY REPORT

Report Number: 64 Project Number: 2564-02

Field Log Book Page Number: 133-135

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - TMW-3D

Weather: (AM) Overcast, Cool Rainfall: (AM) - - Inches

(PM) Overcast, Cool (PM) - - Inches

Temperature: (AM) 59 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) ENE

(PM) 65 °F (PM) 5 MPH (PM) ENE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methiff	D+B	8 10	2 45
	Keith Cronin	Delta	9 45	2 45
	Bill Murphy	Delta	9 45	2 45

Subcontractor Work Commencement: (AM) 9 45 (PM)

Subcontractor Work Completion: (AM) (PM) 2 45

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9·25·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta unloaded equipment in preparation for daily work
- Delta constructed a sand barrier around three points of the drill rig. At this time it is about 90% complete. It will be completed on the next day. As of now a total of 14 ~~6~~ sections were used to build the barrier. Each section is 10 feet in height, 4 feet in with and is constructed with 2x4's and plywood.
- Delta cut a 18" square out of the street for the service casing.
- Delta secured the work zone.

R2-0002016

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-25-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw subcontractors daily work.
- D+B contacted Brookside to schedule the drop off of the mud box.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

So far work is on time and moving along well where drilling should begin on Tuesday 9/30.

Prepared by: Kevin Methiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-26-08

DAILY FIELD ACTIVITY REPORT

Report Number: 65 Project Number: 2564-02

Field Log Book Page Number: 136-137

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-3D

Weather: (AM) Overcast, Cool, Rain Rainfall: (AM) Light Rain Inches
(PM) Overcast, Cool (PM) — — Inches

Temperature: (AM) 64 °F Wind Speed: (AM) 10-15 MPH Wind Direction: (AM) ENE
(PM) 66 °F (PM) <5 MPH (PM) ENE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	8:20	3:00
	Keith Cronin	Delta	8:15	3:00
	Bill Murphy	Delta	8:15	3:00
	Driver (Baker Corp)	Baker Corp	11:05	11:30

Subcontractor Work Commencement: (AM) 8:15 (PM)

Subcontractor Work Completion: (AM) (PM) 3:00

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Dvirka and Bartilucci CONSULTING ENGINEERS
* DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-26-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone and prepared equipment for daily work.
- Delta hand dug first four feet of TMW 39 in order to be able to place service casing in the ground.
- Delta cut and welded service casing, trough, and t-joint to fit this job sites mud pits.
- Delta cleaned and secured work zone at the end of the days.

- Brookside environmental sent a driver from Baker corp with a new roll off container (mud box).

Dalton and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9-26-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

-D&B oversaw subcontractors work
-D&B inspected mud box
-D&B opened and secured staging area

List specific inspection(s) performed and results (include problems and corrective actions):

n/A

List type and location of tests performed and results (include equipment used and monitoring results):

n/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

All work so far seems to be going well and on time.

Prepared by: Kevin Mettiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

R2-0002020

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9.29.08

DAILY FIELD ACTIVITY REPORT

Report Number: 66 Project Number: 2564-02

Field Log Book Page Number: 138-139

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-3D

Weather: (AM) Sunny, Mild Rainfall: (AM) - - Inches

(PM) (PM) Inches

Temperature: (AM) 65 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) N

(PM) 75 °F (PM) <5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	7:00	10:30
			12:00	2:45
	Leo	Delta	8:30	9:30
	Keith Cronin	Delta	8:40	2:45
	Bill Murphy	Delta	8:40	2:45

Subcontractor Work Commencement: (AM) 8:30 (PM)

Subcontractor Work Completion: (AM) (PM) 2:45

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9.29.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta made grout to fill void around service casing.
- Delta connect all hosing needed for mud gun, mud pits, and drilling.
- Delta helped D&B line roll off container.
- Delta made repairs to drilling pumps.
- Delta checked hydrant to make sure it is working properly.
- Delta secured work zone.

R2-0002022

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9.29.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B lined roll off container
- D+B oversaw all of subcontractors work

List specific inspection(s) performed and results (include problems and corrective actions):

n/A

List type and location of tests performed and results (include equipment used and monitoring results):

n/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

They hope to begin drilling on Wednesday morning (10-01-08) the latest. Looks like a possible start for Tuesday afternoon.

Prepared by: Kevin Metcalf Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9·30·08

DAILY FIELD ACTIVITY REPORT

Report Number: 67 Project Number: 2564-02

Field Log Book Page Number: 140-142

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-3D

Weather: (AM) Sunny, Cool Rainfall: (AM) — — Inches

(PM) Sunny, Mild (PM) — — Inches

Temperature: (AM) 65 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) N

(PM) 70 °F (PM) <5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7 45	3 40
	Keith Cronin	Delta	7 45	3 40
	Bill Murphy	Delta	7 45	3 40
	Mike	Delta	8 07	3 40
	Tom King	Delta	1 16	1 35
	John (Gt Watch)	Delta	2 25	7 00 AM 10/1/08

Subcontractor Work Commencement: (AM) 7 45 (PM)

Subcontractor Work Completion: (AM) (PM) 7 00 A.M. 10/1/08

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R2-0002024

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9.30.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone
- Hooked flow meter to fire hydrant backflow and connected backflow to hydrant.
- Filled mud pits with water (1,380 Gallons)
- Circulated mud pits to check rig, pumps, pits, hoses and connections for leaks.
- Mixed mud in mud pits (used a total of 12 50lb bags of Bentonite super Gel-X)
- Assembled two hydropunch samplers and coring hammer.
- Drilled to a depth of 42' bg.
- Cleaned and Secured work zone for the evening.

*Flow meter beginning (start of job) reading 57,160 Gallons

*Flow meter end of day reading 59,560 Gallons

R2-0002025

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 9·30·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- Oversaw all of subcontractors work.
- Organized a list of sample times, depth, and type.
- Logged and identified drill cuttings.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow sampling will begin at a depth of 52' bg.

Prepared by: Kevin Meikoff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-1-08

DAILY FIELD ACTIVITY REPORT

Report Number: 68 Project Number: 2564-02

Field Log Book Page Number: 143-145

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-35

Weather: (AM) Overcast, Cool Rainfall: (AM) - - Inches

(PM) Partly Cloudy, Cool (PM) - - Inches

Temperature: (AM) 65 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) N

(PM) 65 °F (PM) <5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	John (PtWatch)	Delta	3pm 35 10/1	7 00 AM 10/1
	Kevin Methoff	D&B	6 50	3 35
	Keith Cronin	Delta	6 50	3 35
	Bill Murphy	Delta	6 50	3 35
	Mike Vasquez	Delta	6 50	3 35
	Keith Robbins	D&B	8 30	12 10
	Frank DeMa	D&B	9 50	12 05
	Bob Devine	Delta	1 10	2 08
	Colleen	Delta	1 10	2 08

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 35

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-1-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone
- Started drilling and began to circulate mud in pits.
- Began to drill
- Took hydropunch samples at depths of 52', 72' bg.
- Took a splitspoon sample at a depth of 77' bg.
- Delta cleaned and secured the work zone at the end of the work day.

R2-0002028

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-1-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractor (Delta Well + Pump) daily work.
- D+B took hydropunch and split spoon samples.
- D+B monitored work zone for vapors.
- D+B logged drill cuttings.

List specific inspection(s) performed and results (include problems and corrective actions):

The Shelby tubes do not seem to withstand the pressure put on them during sampling. Decided to take split spoon samples for soil only.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID Photovac was used during work. All readings came back 0.0, which shows ideal work conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kerri Methoff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-2-08

DAILY FIELD ACTIVITY REPORT

Report Number: 69 Project Number: 2564-02

Field Log Book Page Number: 146-148

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 3A

Weather: (AM) Sunny, Cool Rainfall: (AM) -- Inches

(PM) Sunny, Mild (PM) -- Inches

Temperature: (AM) 55 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) W

(PM) 65 °F (PM) 5 MPH (PM) W

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkoff	D+B	7^00	3^30
	Keith Cronin	Delta	7^00	3^30
	Bill Murphy	Delta	7^00	3^30
	Mike Vasquez	Delta	7^00	3^30
	John	Delta	2^30 pm 1/2	7^00 am 1/2

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-2-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone and began to circulate mud in pits.
- Delta shoveled sediment from pits
- Took hydropunch samples at depths of 92' and 112' bg.
- Took split spoon sample at a depth of 117-119' bg.
- Delta cleaned and secured the work zone for the evening.

R2-0002031

Dufresne and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-2-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractor (Delta) daily work.
- Took hydropunch samples at depths of 92' and 112' bg.
- Took a split spoon sample at a depth of 117-119' bg.
- Monitored air in work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

n/A

List type and location of tests performed and results (include equipment used and monitoring results):

D+B used a PID PE Photovac during drilling to detect any possible vapors that might be present.
All readings came back 0.0

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

n/A

Prepared by: Kevin Metkiff Reviewed by: _____

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·3·08

DAILY FIELD ACTIVITY REPORT

Report Number: 70 Project Number: 2564-02

Field Log Book Page Number: 149-151

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TM# 33

Weather: (AM) Partly Cloudy, Cool Rainfall: (AM) -- Inches
(PM) Overcast, Cool (PM) -- Inches

Temperature: (AM) 54 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) W
(PM) 65 °F (PM) 10 MPH (PM) SW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 43	3 30
	Keith Cronis	Delta	6 40	3 30
	Bill Murphy	Delta	6 40	3 30
	Mike Vasquez	Delta	6 40	3 30
	John	Delta	2 20 pm 10/3	7 00 am 10/3
	Bobby Devine	Delta	9 27	9 47
	Tammy Evers	Delta	9 27	9 47
	Shannon Flatley	D+B	2 52	2 58

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·3·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened and prepared work zone TMW 3A for daily work.
- Delta reach a total depth of 172'bg
  * three Hydropunch samples were taken at depths of 132', 152', and 172'bg.
  * ~~Two~~ split spoons were taken from 152'-154'bg and 157-159'bg
- Delta cleaned and secured the work zone for the evening.
- Delta also provided a pit watch for the evening hours.

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-3-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw subcontractors daily work.
- Three groundwater samples were taken using a hydropunch at depths of 132', 152', and 172' bg.
- Two split spoon were taken from 152-154' bg. and 157-159' bg.
- D+B monitored the air in the workzone by using a PID PEPhotovac 2020

List specific inspection(s) performed and results (include problems and corrective actions):

- All hydropunch samples were successful.
- The split spoon taken from 152-154' only had a recovery containing drill mud. a second attempt was made at a depth of 157-159' bg.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PEPhotovac 2020 was used during drilling. All readings showed that work and sampling was completed under safe conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff Reviewed by:

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R2-0002035

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-6-08

DAILY FIELD ACTIVITY REPORT

Report Number: 71 Project Number: 2564-02

Field Log Book Page Number: 152-154

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-3D

Weather: (AM) Partly Cloudy, Cool Rainfall: (AM) -- Inches
(PM) Sunny, Warm (PM) -- Inches

Temperature: (AM) 53 °F Wind Speed: (AM) 5-10 MPH Wind Direction: (AM) NE
(PM) 66 °F (PM) <5 MPH (PM) NE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	7^00	3^30
	Keith Cronin	Delta	7^00	3^30
	Bill Murphy	Delta	7^00	3^30
	Mike Vasquez	Delta	7^00	3^30
	John	Delta	3^05 pm 10/6	7^00 am 10/6

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·6·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened and prepared the work zone for drilling.
- A total depth of 232'bg was reached.
  * Groundwater samples were taken at depths of 192', 212', and 232'bg.
    - These samples were taken with a Hydropunch.
  * One split spoon sample (soil) was taken from 217-219'bg.
- Delta cleared and secured the work zone at the end of the work day.
- Delta also provided a pit watch for the evening.

R2-0002037

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.6.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D + B oversaw all of subcontractors daily work.
- Three groundwater samples were taken using a hydropunch sampler at depths of 192', 212', and 232' bg.
- One split spoon soil sample was taken from 217-219' bg.
- D+B also monitored the air in the work zone during the drilling operations.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PE Photovac was used during drilling to detect any vapors that may be present. All readings showed a safe work environment.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Methoff Reviewed by: _____

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·7·08

DAILY FIELD ACTIVITY REPORT

Report Number: 72 Project Number: 2564.02

Field Log Book Page Number: 1-4

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TM# 33

Weather: (AM) Sunny, Cool (PM) Sunny, Mild

Rainfall: (AM) -- Inches (PM) -- Inches

Temperature: (AM) 46 °F (PM) 65 °F

Wind Speed: (AM) < 5 MPH (PM) < 5 MPH

Wind Direction: (AM) NE (PM) NE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	6^50	4^00
	Keith Cronin	Delta	6^50	4^00
	Bill Murphy	Delta	6^50	4^00
	Mike Vasquez	Delta	6^50	4^00
	John	Delta	2^30 pm 10/7	7^00 am 10/7
	Colleen	Delta	11^25	11^03

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 4^00

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Dvirka and Bartilucci CONSULTING ENGINEERS
* DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·7·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone
- Delta circulated mud pits, checked the oil and added bentonite to the mud pits.
- A depth of 292' bg was reached at the end of the day. Samples were taken at depths of 252', 272' and 292' bg using a hydropunch.
- Two split spoon samples were taken from 257-259' bg and 282-284' bg.
- Delta cleaned and secured the work zone for the evening.

R2-0002040

Divine and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·7·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors daily tasks.
- D+B monitored the air in the work zone by using a PID PE Photovac
- Samples were taken at depths of 252', 272' and 292' bg using a hydropunch sampler.
- D+B also took a split spoon sample at a depth of 257-259' bg and 282-284' bg.

List specific inspection(s) performed and results (include problems and corrective actions):

n/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PE Photovac was used during drilling. All readings showed ideal work and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

n/A

Prepared by: K. Moloff Reviewed by:

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·8·08

DAILY FIELD ACTIVITY REPORT

Report Number: 73 Project Number: 2564

Field Log Book Page Number: 5 - 7

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW. - 3D

Weather: (AM) Sunny, Cold Rainfall: (AM) - - Inches
(PM) Sunny, Mild (PM) - - Inches

Temperature: (AM) 50 °F Wind Speed: (AM) - - MPH Wind Direction: (AM) - -
(PM) 65 °F (PM) < 5 MPH (PM) NE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkoff	A & B	6 45	4 05
	Keith Cronin	Delta	6 45	4 05
	Bill Murphy	Delta	6 45	4 05
	Mike Vasquez	Delta	6 45	4 05
	John	Delta	2 40 pm 10/8	7 00 am 10/8

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 4 00

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.8.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta geared site
- Delta prepared mud pits
- Delta reached a total depth of 337' for the day.
- Four hydropunch samples were attempted. Only three were recovered containing groundwater. The fourth sample taken at a depth of 332' bg was contaminated with drilling fluid (mud).
- The three successful samples were taken at depths of 297', 312', and 337' below grade.
- Delta used a total of three bags of bentonite to thicken mud mixture.
- Delta cleaned and secured the work zone for the evening.

R2-0002043

Dufresne and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-8-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw subcontractors work.
- D+B took groundwater samples from depths of 297', 312', 337' bg.
- D+B monitored the air in the work zone.
- D+B mailed cooler containing samples to Mitkem Lab.

List specific inspection(s) performed and results (include problems and corrective actions):

Hydropunch sample taken at a depth of 332' bg came up filled with drill fluid.
Delta drilled five feet to a depth of 337' and a second attempt was made. This time the sample was a success.

List type and location of tests performed and results (include equipment used and monitoring results):

A PID photovac was used to monitor the work zone. All readings showed ideal work and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Motkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·9·08

DAILY FIELD ACTIVITY REPORT

Report Number: 74 Project Number: 2564.02

Field Log Book Page Number: 8-10

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York, TMW-3D

Weather: (AM) Overcast, Cool Rainfall: (AM) < 1 Inches

(PM) Sunny, Warm (PM) - - Inches

Temperature: (AM) 65 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) W

(PM) 75 °F (PM) 5 MPH (PM) W

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 45	4 00
	Keith Cronin	Delta	6 45	4 00
	Bill Murphy	Delta	6 45	4 00
	Mike Vasquez	Delta	6 45	4 00
	John	Delta	~~7~~ 6 45 am 10/9	7 00 am 10/9

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 4 00

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.9.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta greased work zone
- Delta mixed mud pits and greased drill rig.
- A total depth of 377'bg was reached.
- Four hydropunch samples were attempted. Only two were successful.
  - Attempt one was at 352'bg - which was unsuccessful sample was empty.
  - Attempt two was at 357'bg. - Good Sample
  - Number three was at 372'bg - Sample was full of drill mud.
  - Number four was taken at a depth of 377'bg. - Good sample.
- Delta cleaned and secured the work zone.

R2-0002046

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.9.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors work.
- D+B was able to collect two groundwater samples at depths of 357' and 377' bg.
- D+B also monitored the air in the work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

n/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID RAE tank was used to monitor the air during drilling. All readings showed ideal sampling and working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

n/A

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·10·08

DAILY FIELD ACTIVITY REPORT

Report Number: 75 Project Number: 256402

Field Log Book Page Number: 11-13

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMV-3D

Weather: (AM) Dark, Cool Rainfall: (AM) - - Inches

(PM) Sunny, Warm (PM) - - Inches

Temperature: (AM) 55 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) W

(PM) 72 °F (PM) < 5 MPH (PM) NW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 45	3 17
	Keith Cronin	Delta	6 45	3 30
	Bill Murphy	Delta	6 45	3 30
	Mike Vasquez	Delta	6 45	3 30
	John	Delta	2 45 pm 10/10	7 00 am 10/10

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·10·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta geared work zone and prepared site for daily work.
- A total depth of 432'bg was reached.
- Three hydropunch samples were taken at depths of 392', 412', and 432'bg.
- Delta decontaminated hydropunch in between each sampled zone.
- Delta cleaned and secured the work zone for the evening.

R2-0002049

Dufresne and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·10·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B oversaw all of Delta's daily work.
- Groundwater samples were taken at depths of 392', 412', and 432' by using a hydropunch.
- D&B also monitored the air in the work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PE Photovac was used during drilling - All readings showed ideal sampling and working conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

We will continue work on Saturday in order to complete sampling by Monday. This way Delta can gamma log the hole on Monday.

Prepared by: Kerry Metkoff Reviewed by: _____

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.11.08

DAILY FIELD ACTIVITY REPORT

Report Number: 76 Project Number: 2564-02

Field Log Book Page Number: 15-16

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-3D

Weather: (AM) Sunny, Cool Rainfall: (AM) - - Inches

(PM) Sunny, Warm (PM) - - Inches

Temperature: (AM) 55 °F Wind Speed: (AM) ~~K~~ 5 MPH Wind Direction: (AM) NW

(PM) 72 °F (PM) <5 MPH (PM) NW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methiff	D+B	6 50	4 20
	Keith Cronin	Delta	6 50	4 20
	Bill Murphy	Delta	6 50	4 20
	Mike Vasquez	Delta	6 50	4 20
	John	Delta	3 45 pm 10/11	7 00 am 10/11

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 4 20

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·11·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone and prepared equipment for daily work.
- Groundwater samples were taken by using a hydropunch. The depths sampled were from 452', 472', 492', and 502' bg.
- Delta then cleaned and secured the work zone for the evening.

R2-0002052

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·11·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors work.
- D+B took groundwater samples from depths of 452', 472', 492', and 502' bg using a hydropunch.
- D+B monitored the air in the work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID RE Photovac was used to monitor the air in the work zone. All readings showed ideal sampling and work conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

- TMW 38 is complete. Next step is to Gamma Log the hole on Monday.

Prepared by: Kevin McKiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

R2-0002053

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-13-08

DAILY FIELD ACTIVITY REPORT

Report Number: 77 Project Number: 2564-02

Field Log Book Page Number: 17-18

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-3D

Weather: (AM) Sunny, Cool Rainfall: (AM) - - Inches

(PM) (PM) - - Inches

Temperature: (AM) 55 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) N

(PM) 60° °F (PM) <5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7 00	3 15
	Bill Murphy	Delta	7 00	3 15
	Keith Cronin	Delta	7 00	3 15
	Mike Vasquez	Delta	7 00	3 15
	Chris Okon	Delta	8 10	10 15
	John	Delta	2 30 pm 10/13	7 00 am 10/13

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM)

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Bartilucci
CONSULTING ENGINEERS
* DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·13·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened the work zone and prepared the site for work.
- Delta began to clean the site and removed equipment.
- A gamma log was taken of TMW 3S by Chris Okon to a depth of 500' bg.
- Delta removed every drill rod from TMW 3S
- Four pallets of grout were delivered to the work zone.
- A second liner was added to the roll off container.
- Delta cleaned and secured the work zone for the evening

R2-0002055

Dufresne and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·13·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

-D&B oversaw subcontractors daily work.
-D&B received a copy of the gamma log taken
-D&B helped line the roll off container.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A gamma log was taken of TMW 3D

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kara Methoff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·14·08

DAILY FIELD ACTIVITY REPORT

Report Number: 78 Project Number: 2564.02

Field Log Book Page Number: 19

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMV 30

Weather: (AM) Sunny, Clear Skies Rainfall: (AM) - - Inches
(PM) - - (PM) - - Inches

Temperature: (AM) 65 °F Wind Speed: (AM) - - MPH Wind Direction: (AM) - -
(PM) - - °F (PM) - - MPH (PM) - -

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Keith Robbins	A+B	8⁰⁰	10³⁰
	Bill Murphy	Delta	7⁰⁰	- -
	Mike Vasquez	Delta	7⁰⁰	- -
	Keith Cronin	Delta	7⁰⁰	- -

Subcontractor Work Commencement: (AM) 7⁰⁰ (PM)

Subcontractor Work Completion: (AM) (PM) - -

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Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-14-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

-Delta informed Keith Robbins that the days activities will be removing the well pipe from TMW 3D to the staging area.
-Delta transported grout pipe from staging area to work zone TMW 3D

D&B_DFAR/kb

Rev. 03/09/98

Deiss and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-14-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B met subcontractor (Delta Well and Pump) on site.
- D&B discussed daily work.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta will not grout today. Today they will transport well pipe to staging area.

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·15·08

DAILY FIELD ACTIVITY REPORT

Report Number: 79 Project Number: 2564-02

Field Log Book Page Number: 20 - 22

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, Ne-York TMW 3D

Weather: (AM) Sunny, Clear skies Rainfall: (AM) - - Inches

(PM) Partly Cloudy, cool (PM) - - Inches

Temperature: (AM) 65 °F Wind Speed: (AM) - - MPH Wind Direction: (AM) - -

(PM) 70's °F (PM) - - MPH (PM) - -

Site Condition: Good Condition

ersonnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Keith Robbins	D+B	8 00	1 00
	Mike Vasquez	Delta	7 00	- -
	Bill Murphy	Delta	7 00	- -

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) - -

D&B_DFAR/kb Rev. 03/09/98

R2-0002060

Bartilucci
CONSULTING ENGINEERS
* DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·15·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta placed 400' of tremie pipe down TMW 3D in order to grout. This left 100' of space in the hole. (Tremie pipe is 1" diameter)
- Delta added 80 gallons of water per 5 bags of cement (each bag is 94lbs.) - Type I Regular Portland Cement.
- 55 bags of cement were used on this day to grout hole.
- an estimated 880 gallons of cement was mixed.
- Delta removed tremie pipe from the hole.
- Delta cleaned and secured the work zone for the evening.

R2-0002061

Dufresne and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·15·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B oversaw subcontractors daily work

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

D&B informed Delta that they are to add Bentonite to the grout mixture.

Prepared by: Kevin Metkiff

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·16·08

DAILY FIELD ACTIVITY REPORT

Report Number: 80 Project Number: 2564-02

Field Log Book Page Number: 22-25

Project: New Cassel, Industrial Area

Address: New Cassel, Nassau County, New York TMW-3A

Weather: (AM) Partly Cloudy Rainfall: (AM) -- Inches

(PM) -- (PM) -- Inches

Temperature: (AM) 50-60 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) --

(PM) -- °F (PM) -- MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Keith Robbins	A+B	8 00	1 15
	Bill Murphy	Delta	7 00	--
	Mike Vasquez	Delta	7 00	--

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) --

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CONSULTING ENGINEERS
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Date: 10.16.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta installed tremie pipe to a depth of 40' bg.
- Delta began to make grout: 8 bags to 80 gallons of water. plus one cup of bentonite quick gel powder.
  - Total of 25 bags of cement was used.
  - 240 gallons of cement added bringing the total amount for TMW 3D to 1120 gallons of cement.
- Delta pumped mud from pits into their 7500 gallon tanker truck.
- Delta also shoveled sand from pits into 55 gal. drums.
- Delta cleaned and secured the work zone for the evening.

R2-0002064

D'Appolonia
Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-16-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B oversaw Delta's daily work.
- D&B approved location of next well TMW 8D.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta will leave TMW 3D around 7'6g for the day. Tomorrow they will continue to grout the hole and finish at grade with asphalt.

Prepared by: Kerri Methoff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

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Date: 10-17-08

DAILY FIELD ACTIVITY REPORT

Report Number: 81 Project Number: 2564.02

Field Log Book Page Number: 26-27

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 30

Weather: (AM) Sunny, Cool Rainfall: (AM) -- Inches
(PM) -- (PM) -- Inches

Temperature: (AM) 52 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) NW
(PM) -- °F (PM) -- MPH (PM) --

Site Condition: Good Site

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7:00	10:35
	Bill Murphy	Delta	7:00	--
	Mike Vasquez	Delta	7:00	--
	John	Delta	--	7:00 am 10/17
	Bill	Delta	10:15	--

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM)

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Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-17-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta began breaking down all equipment.
- Delta's tanker truck is still on location of TMW 3D (Bernard Drive)
- The end reading for TMW 3D flow meter is 71860.
- Delta emptied drums into roll off container.
- Delta cleaned and secured work zone for the evening.

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Date: 10.17.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw subcontractors daily work.
- D+B checked out new location of next work zone TMW 3B located on the east end of Lindy Road.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta will continue to break down TMW 3B.

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-20-08

DAILY FIELD ACTIVITY REPORT

Report Number: 82 Project Number: 2564-02

Field Log Book Page Number: 28-30

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-3D

Weather: (AM) Sunny, Cool Rainfall: (AM) -- Inches
(PM) Sunny, Mild (PM) -- Inches

Temperature: (AM) 41 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) NNW
(PM) 59 °F (PM) <5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	7^00	3^35
	Bill Murphy	Delta	7^00	3^30
	Mike Vasquez	Delta	7^00	3^30
	Brian G.	Brookside	1^15	1^55
	Brian	Brookside	1^15	1^55

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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Date: 10-20-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta set up a decon. pit at the BGWS staging area.
- Delta transported tanker truck and mud pits to the staging area.
- Taker truck contains about 2,000 gallons of mud.

- Brookside Environmental came on site to sample drill mud in tanker truck.
- Delta continued to break down the work zone of TMW-31.
- Delta cleaned and secured the work zone for the evening.

R2-0002070

D'Appolonia
and
Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.20.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B oversaw subcontractors daily work.
- D&B arranged for subcontractor Brookside Environmental to sample drill mud.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

- Tom King from Delta expressed his concern about transfering drill mud from tanker truck to roll off.
- A decision needs to be made between Delta and D&B about where the tanker truck will discharge its contents.

Prepared by: Kevin Metkiff

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.22.08

DAILY FIELD ACTIVITY REPORT

Report Number: 83 Project Number: 2564.02

Field Log Book Page Number: 31

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 3D

Weather: (AM) Sunny, Mild Rainfall: (AM) -- Inches

(PM) _____ (PM) -- Inches

Temperature: (AM) 53 °F Wind Speed: (AM) 15 MPH Wind Direction: (AM) NW

(PM) -- °F (PM) -- MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	1 30	2 40
	Bill Murphy	Delta	7 00	--
	Mike Vasquez	Delta	7 00	--

Subcontractor Work Commencement: (AM) 7 00 (PM) _____

Subcontractor Work Completion: (AM) _____ (PM) -- --

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Date: 10.22.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta completed TMW 3D by packing asphalt in remaining void to grade.
- Delta steam cleaned drill rods and other equipment in preparation of upcoming work.

D'Appolonia
and
Bartilucci
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Date: 10.22.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B took photos of TMW 3D and TMW 8D (next location)
- D+B spoke to neighbors at TMW 8D about upcoming work.
- D+B oversaw subcontractors work.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Subcontractor and D+B spoke about next site and its location.

Prepared by: Kerri Metkoff Reviewed by: _____

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-23-08

DAILY FIELD ACTIVITY REPORT

Report Number: 84 Project Number: 2564-02

Field Log Book Page Number: 32-33

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-8D

Weather: (AM) Still Dark, Cold Rainfall: (AM) -- Inches
(PM) Sunny, Mild (PM) -- Inches

Temperature: (AM) 39 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) N
(PM) 50 °F (PM) <5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6:45	3:30
	Bill Murphy	DeHa	6:50	3:30
	Mike Vasquez	DeHa	7:00	3:30
	Leo	DeHa	7:46	2:30

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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Date: 10.23.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta gathered equipment that needs to be transported to TMW 8J
- Delta transported the Drill Rig (Portadrill), mud tubs, and sound barrier to the work zone of TMW 8J
- All of the drill rods were brought to work zone
- Delta built a sound barrier on the North side of drill rig
- Delta cleaned and secured the work zone for the evening.

Dufresne and Bartilucci
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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-23-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors work.
- Completed daily field report.

List specific inspection(s) performed and results (include problems and corrective actions):

There is now a work zone set up on Lindy road (TMW8)

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow Delta will continue to set up the site for drilling

Prepared by: Kevin Metkiff

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·24·08

DAILY FIELD ACTIVITY REPORT

Report Number: 85 Project Number: 2564-02

Field Log Book Page Number: 34-35

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 81

Weather: (AM) Sunny, Cold Rainfall: (AM) -- Inches

(PM) Sunny, Mild (PM) -- Inches

Temperature: (AM) 37 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) NW

(PM) 45 °F (PM) <5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7:15	7:25
	Kevin Metkiff	D+B	9:00	3:15
	Bill Murphy	Delta	8:00	3:15
	Mike Vasquez	Delta	8:00	3:15

Subcontractor Work Commencement: (AM) 8:00 (PM)

Subcontractor Work Completion: (AM) (PM) 3:15

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Date: 10.24.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta leveled drill rig and prepared to hand dig first four feet of the hole.
  * This is to make sure we do not contact any utilities that may be in the area.
  * This also allows delta to install a service casing.
- Delta Hand dug first four feet then installed casing.
- Delta then setting up mud pits and trench.
- The site was cleaned and secured at the end of the work day.

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·24·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors daily work.
- D+B logged the soil cuttings for the first four feet of the hole.
- D+B completed field forms & log.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

As of now the remaining work includes: setting up the pumps, grouting service casing, and filling the mud pits.

Prepared by: Kevin Mothiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.27.08

DAILY FIELD ACTIVITY REPORT

Report Number: 86 Project Number: 2564.02

Field Log Book Page Number: 36

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Sunny, Cold Rainfall: (AM) -- Inches

(PM) -- (PM) -- Inches

Temperature: (AM) 46 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) WNW

(PM) -- °F (PM) -- MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	8:00	10:15
	Bill Murphy	Delta	7:00	3:30
	Mike Vasquez	Delta	7:00	3:30

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.27.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta plans to finish setting up the work zone.
  * Set up mud pit pumps and hoses
  * replace parts on coring tool as well as setting it up.
- Delta had to replace (fix) sound barrier
  - upon arrival it was noticed that sound barrier fell down due to high winds the previous night.
- Delta grouted empty void around the service casing.
- Delta cleaned and secured the work zone.

R2-0002082

Dufresne and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.27.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw subcontractors daily activities.

List specific inspection(s) performed and results (include problems and corrective actions):

- Upon arriving on site, it was noticed that the sound barrier had been knocked down due to high winds.
- The wall was then re-built

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Drilling will begin tomorrow

Prepared by: Kevin Metcalf Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-28-08

DAILY FIELD ACTIVITY REPORT

Report Number: 87 Project Number: 2564.02

Field Log Book Page Number: 37-39

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Overcast, Rain Rainfall: (AM) 1/2 Inches
(PM) Overcast, Rain (PM) 1/2 Inches

Temperature: (AM) 46 °F Wind Speed: (AM) 5-10 MPH Wind Direction: (AM) ESE
(PM) 50 °F (PM) 5-10 MPH (PM) ESE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7 00	3 35
	Bill Murphy	Delta	7 00	3 35
	Mike Vasquez	Delta	7 20	3 35
	John	Delta	2 00 pm 10/08	7 00 am 10/28
	Colleen	Delta	11 05	11 10

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

D&B_DFAR/kb Rev. 03/09/98

R2-0002084

Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.28.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta set up the work zone and equipment for drilling.
- Delta filled the mud pits with water. Then the rig was started and Delta began to circulate the mud pits to check for any leaks.
- Once it was clear that there were no leaks Delta began to add Bentonite Super Gel X to the water to create the drilling fluid.
- A total of 13 50lb bags were used on this day.
- Once the preferred consistency was made Delta began drilling activities. A total depth of 42'6g was reached.
- Delta cleaned and secured the work zone at the end of the day.

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.28.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work.
- D+B employees pieced together two hydropunch samplers.
- D+B contacted BGWD about a malfunctioning fire hydrant

List specific inspection(s) performed and results (include problems and corrective actions):

The fire hydrant located on the NE corner of Grand Ave and Lindy Road is broken. The town of Hempstead BGWD was contacted and the hydrant was fixed.

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow morning will be the first day of sampling

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

R2-0002086

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.29.08

DAILY FIELD ACTIVITY REPORT

Report Number: 88 Project Number: 2564.02

Field Log Book Page Number: 40-42

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Dark, Cold Rainfall: (AM) - - Inches

(PM) Overcast - Partly Cloudy, Cool (PM) Showers Inches

Temperature: (AM) 40 °F Wind Speed: (AM) 0-5 MPH Wind Direction: (AM) W

(PM) 48 °F (PM) 5-10 MPH (PM) NW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time	
	Kevin Methiff	D+B	6^50	3^30	
	Bill Murphy	Delta	7^00	3^30	
	Mike Vasquez	Delta	7^00	3^30	
	John	Delta	2^50 pm 10/29	8^30 am 10/29	off duty @ 7^00
	Jeff Dyber	NYSDEC	12^33	3^36	

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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CONSULTING ENGINEERS
* DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.29.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

-Delta shoveled sediment from the mud pits and placed it in 55 gal. drums.
- Delta added a total of four bags of Bentonite Super Gel X to the mud pits bring the total to 17 bags.
- Two hydropunch samples were attempted today at depths of 52 and ~~57~~ 72' bg.
* The sample taken at 52' was a good sample
* The sample taken at 72' came up containing drilling fluid. When the hydropunch sample was retrieved it was fully intact. This leads me to believe that the hydropunch was not fully embedded in the sediment.
- One split spoon was taken from 57-59' bg containg a 1' recovery.
- Delta cleaned and secured the work zone for the evening.

Date: 10.29.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B oversaw all of subcontractors daily work.
- D&B placed together and decontaminated each hydropunch sampler after each use.
- D&B logged and packaged sediment taken from a split spoon.
- D&B completed field forms and a daily log as well as mail samples to lab.

List specific inspection(s) performed and results (include problems and corrective actions):

The second hydropunch taken at 72'bg contained drilling fluid. A second attempt will be taken tomorrow at 77'bg.

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkoff Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·30·08

DAILY FIELD ACTIVITY REPORT

Report Number: 89 Project Number: 2564-02

Field Log Book Page Number: 43 - 46

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8J

Weather: (AM) Dark, Cold Rainfall: (AM) - - Inches

(PM) Sunny, Cool (PM) - - Inches

Temperature: (AM) 38 °F Wind Speed: (AM) 0 - 5 MPH Wind Direction: (AM) WNW

(PM) 46 °F (PM) 10-15 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7 00	3 30
	Mike Vasquez	Delta	7 00	3 30
	Bill Murphy	Delta	7 20	3 30
	John	Delta	3 00	7 46 am 10/31

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-30-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened and prepared the work zone for daily work.
  * Filled Decon. buckets
  * Shoveled mud pits / transferred drums
  * Circulated mud pits / added Bentonite to mud pits.
- Delta drilled to a depth of 77' to take first hydropunch of the day.
  * Sample was recovered containing drilling fluid.
- a 5' rod was added to next hydropunch sample at a depth of 82' bg.
  * Sample was turbid / very silty water (possibly slightly contaminated with drilling fluid)
    * a split spoon was then taken from 82-84' bg to check the underlying sediment.
      + The split spoon had a 2' recovery (fine-medium gravel, some coarse gravel, little medium-coarse sand)
- Another hydropunch was taken at 92' bg - Good Sample.
- Delta fueled equipment / cleaned / and secured work zone for the evening.

D&B_DFAR/kb

Rev. 03/09/98

R2-0002091

Dufour and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-30-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B oversaw all of subcontractors daily work,
- D&B took hydropunch samples at depths of 77', 82', and 92' bg.
- A split spoon was taken at 82-84' bg.
- D&B monitored the air in the work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

- A leaking drum needed to be contained. Situation was controlled

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PEPhotovac 2020 was used during drilling operations. All reading showed safe and ideal work and sampling conditions

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: [signature] Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

R2-0002092

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.31.08

DAILY FIELD ACTIVITY REPORT

Report Number: 90 Project Number: 2564.02

Field Log Book Page Number: 47-50

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Dark, Cold Rainfall: (AM) -- Inches

(PM) Sunny, Mild (PM) -- Inches

Temperature: (AM) 33 °F Wind Speed: (AM) 0-5 MPH Wind Direction: (AM) NW

(PM) 55 °F (PM) 5-10 MPH (PM) W

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 47	3 30
	Bill Murphy	Delta	6 47	3 30
	Mike Vasquez	Delta	7 00	3 36
	John	Delta	3 00 pm 10/31	7 05 am 10/31

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.31.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened the work zone and prepared for daily work activities.
- Bill and Mike transfered drums containing drill cuttings into the liquid tight rolloff container.
- Delta shoveled the mud pits / circulated the drilling fluid and added Bentonite Super Gel X to the mixture.
- Four Bags of Bentonite were added bringing the total to 26 50lb. bags.
- Two Groundwater samples were taken at depths of 112' and 132' bg using a hydropunch sampler.
- One split spoon was taken from 127-129' bg.
- A total depth of 132' bg was reached.

R2-0002094

Dufresne and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.31.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors work.
- Groundwater samples were taken from depths of 112' and 132' bg.
- One split spoon was taken from 127-129' bg.
- D+B monitored the air in the work zone.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID RaePhotovac 2020 was used during drilling operations. All readings showed ideal work and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/3/08

DAILY FIELD ACTIVITY REPORT

Report Number: 41 Project Number: 2564-02

Field Log Book Page Number: 51-55

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-8D

Weather: (AM) Sunny, Cool Rainfall: (AM) -- Inches
(PM) Cloudy, Cool (PM) -- Inches

Temperature: (AM) 47 °F Wind Speed: (AM) 5-10 MPH Wind Direction: (AM) ESE/S
(PM) 55 °F (PM) 5-15 MPH (PM) S/SW

Site Condition: Dry, clean and in order

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Matt DeViney	DB	7:00 am	4:00 pm
	Kevin Metkiff	DB	7:00 am	8:30 am
	Bill Murphy	Delta	7:30 am	4:00 pm
	Mike Visgner	Delta	7:00 am	4:00 pm
	John	Delta	3:55 pm	7:00 am (11/4)
	Weekend Watch	Delta		7:00 am

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM) 4:00

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Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/3/08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone and prepared for daily work activities
- Delta shoveled the mud pits / circulated the drilling fluid and added bentonite (Super Gel-X)
  - 5 bags of bentonite in total were added during the day, for a total of 31 bags for TMW-8D
- Two hydropunch samples were taken @ 158' and 177'
  - A total depth of 177' was obtained

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/3/08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- DB oversaw all subcontractor work
- Groundwater samples collected by DB @ 150' and 177'
- DB monitored the air in the work zone using a PID

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PE Photovac was used during drilling operations. All readings showed ideal work and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

- One hydropunch @ 177' did not open properly. Delta indicated that screen mechanism had seized
- Both hydropunch samples were turbid. Cause unknown. Delta indicated that a thick drilling fluid is being used and that the sampler is being properly slammed ahead of the borehole

Prepared by: Matt DeVinney

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/4/08

DAILY FIELD ACTIVITY REPORT

Report Number: 92 Project Number: 2564-62

Field Log Book Page Number: 56-60

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-8D

Weather: (AM) Cloudy, fog, breezy Rainfall: (AM) -- Inches

(PM) Cloudy, breezy (PM) -- Inches

Temperature: (AM) 50 °F Wind Speed: (AM) 5-10 MPH Wind Direction: (AM) SSE

(PM) 65 °F (PM) 0-5 MPH (PM) SE

Site Condition: Dry, clean and in order

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Matt DeVinney	DB	7^00 am	4^10 pm
	Bill Murphy	Delta	<7^00 am	>4^10 pm
	Mike Vasquez	Delta	<7^00 am	7 4^10 pm
	John	Delta	2^45 pm	7^00 am (11/5/08)
	Tom King	Delta	10^15 am	10^30 am
	Tom King	Delta	3^10 pm	7 4^10 pm

Subcontractor Work Commencement: (AM) <7^00 (PM)

Subcontractor Work Completion: (AM) (PM) >4^10

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Date: 11/4/08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

-Delta emptied contents of 55-gallon drums into the mud box @ the staging area. A total of six drums were emptied

-Five 55-gallon drums of cuttings generated on 11/3/08 were loaded, transported and off-loaded @ the staging area

-Delta shoveled the mud pits, circulated the drilling fluid and added bentonite (Super Gel-X)

- 3 bags of bentonite in total were added during the day, for a total of 34 bags for TMW-8D

-Two hydropunch samples were taken @ 19' and 21'

-one split spoon sample was taken @ 18'

R2-0002100

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/4/08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- DB oversaw all subcontractor work
- groundwater samples collected by DB @ 192' and 212'
- split spoon sample collected by DB @ 182'
- DB monitored the air in the work zone using a PID

List specific inspection(s) performed and results (include problems and corrective actions):

- Delta inspected drill rig and determined that repairs are required. Replacement parts have been ordered for delivery on 11/5/08

List type and location of tests performed and results (include equipment used and monitoring results):

A PID PE Photovac was used during drilling operations. All readings showed ideal work and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

- Drill rig requires repair @ the end of the day.

Prepared by: Matt DeVinney

Reviewed by:

D&B_DFAR/kb

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/5/08

DAILY FIELD ACTIVITY REPORT

Report Number: 93 Project Number: 2564-02

Field Log Book Page Number: 61-63

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW-8D

Weather: (AM) Cloudy, Breezy (PM) Overcast, Rainy, Cool

Rainfall: (AM) - - Inches (PM) Light Rain Inches

Temperature: (AM) 50 °F (PM) 63 °F

Wind Speed: (AM) 5-10 MPH (PM) 5 MPH

Wind Direction: (AM) NNE (PM) NE

Site Condition: Clean and In order - Dry am, wet PM From rainfall

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Matt DeVinney	DB	7^00 am	10^30 am
	Matt DeVinney	DB	2^05 pm	2^45
	Bill Murphy	Delta	7^00 am	4^30
	Mike Vasquez	Delta	7^15 am	4^30
	John	~~Delta~~	3^00 pm 11/5	7^00 am 11/5
	Kevin Metkiff	D+B	3^20	4^30
	Tom King	Delta	--	4^20

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 4^30

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Date: 11/5/08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta needs replacement parts to repair drill rig. As a result, drilling crew worked at staging area emptying drums into the mud roll-off. A total of 30 drums were emptied into the mud roll-off
- New parts for damaged drill head arrived on site.
- Tom King along with Bill Murphy and Mike Vasquez began repairing the drill rig.
- Delta complete repairs on the drill rig's drill head.
- Delta secured and cleaned the work zone for the evening.

R2-0002103

Dufresne and Bartilucci
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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/5/08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B Oversaw all subcontractor work

List specific inspection(s) performed and results (include problems and corrective actions):

NA

List type and location of tests performed and results (include equipment used and monitoring results):

NA

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

- According to Delta, replacement parts scheduled for delivery by 10^00 am. However, parts did not arrive. As a result, the drill rig could not be repaired. Delta spend work day emptying 55-gal drums of cuttings into mud roll-off.

Prepared by: Matt DeVinney

Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11-6-08

DAILY FIELD ACTIVITY REPORT

Report Number: 94 Project Number: 2564.02

Field Log Book Page Number: 64-66

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Overcast, Cool Rainfall: (AM) -- Inches

(PM) Overcast, Cool (PM) light showers early afternoon Inches

Temperature: (AM) 61 °F Wind Speed: (AM) 5- MPH Wind Direction: (AM) E

(PM) 63 °F (PM) 5-10 MPH (PM) NNE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D&B	8:16	3:30
	Bill Murphy	Delta	7:00	3:30
	Mike Vasquez	Delta	7:00	3:30
	Keith Cronin	Delta	8:35	9:20
	Bob DeVine	Delta	11:54	12:40
	Brian W.	Delta	11:54	12:40
	Rep. for Delta	Delta	11:54	12:40
	John (Portwatch)	Delta	3:00 pm 11/6	7:00 am 11/6

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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CONSULTING ENGINEERS
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Date: 11·6·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened the work zone and prepared for work.
- Delta connected new hose that connects the drillhead to the drillings pump system.
- The drilling equipment was topped off with fuel.
- A split spoon was taken from 222'-224' bg.
  - 18" recovery on the split spoon.
- A hydropunch was taken at 232' bg. The sample was recovered containing drill mud. This sample can not be used. It was decided to drill 5' and try again.
- A hydropunch sample was collected at 237' bg. This sample was good.
- Delta cleaned and secured the work zone for the evening.

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11-6-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work.
- A split spoon was taken from 222'-224' bg.
- Two hydropunch samples were taken from 232' and 237' bg. The sample taken at 232' could not be used.

List specific inspection(s) performed and results (include problems and corrective actions):

The hydropunch taken at 232' bg once taken apart showed that the top screen (mesh screen) had collapsed.

List type and location of tests performed and results (include equipment used and monitoring results):

- Only one PID reading was taken during this day. This was due to the amount of moisture in the air.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkoff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.7.08

DAILY FIELD ACTIVITY REPORT

Report Number: 95 Project Number: 2564.02

Field Log Book Page Number: 67-69

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Overcast, Mild Rainfall: (AM) -- Inches

(PM) Overcast, Mild (PM) -- Inches

Temperature: (AM) 58 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) ENE

(PM) 65 °F (PM) <5 MPH (PM) ENE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 50	3 40
	Bill Murphy	Delta	6 50	3 40
	Mike Vasquez	Delta	7 00	3 40
	Keith Crosin	Delta	6 50	7 25
	John	Delta	2 35 pm 11/7	7 00 am 11/7

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 40

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·7·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone for the day.
- Delta fueled drilling / changed fuel filters.
- All of the 20' rods were removed and replaced with 15' rods.
- Took a hydropunch sample at 252' belowgrade. The sample came up containing drill mud. a 5' rod was added on a reattempt was made at 257'bg. This sample came up with little recovery the white screen was caked with clay. I was only able to sample VOCs.

A split spoon was taken from 262-264'bg. Full recovery containing clay.

One last hydropunch was taken at 272'bg. - Good Sample (clear)

- Delta cleaned and secured work zone for the weekend.

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.7.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work
- Two hydropunch samples were taken from depths of 257' and 272' bg.
- One soil gas was taken from 262-264' bg

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID was used during drilling activities. All readings showed ideal sampling and work conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·10·08

DAILY FIELD ACTIVITY REPORT

Report Number: 96 Project Number: 2564·02

Field Log Book Page Number: 70 - 72

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8

Weather: (AM) Sunny, Cool Rainfall: (AM) -- Inches
(PM) Sunny, Mild (PM) -- Inches

Temperature: (AM) 46 °F Wind Speed: (AM) 5-10 MPH Wind Direction: (AM) WNW
(PM) 55 °F (PM) 10 MPH (PM) NW

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	A+B	6 55	3 36
	Bill Murphy	Delta	6 55	3 36
	Mike Vasquez	Delta	7 05	3 36
	John L	Delta	2 30 pm 11/10	6 55 am 11/10
	Keith Conin	Delta	7 30	7 50
	Soun	Delta	7 30	7 50

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 36

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CONSULTING ENGINEERS
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Date: 11·10·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened the work zone
- A total depth of 337'bg was reached.
- Three hydropunch samples were taken from depths of 292', 312', and 337'bg.
- One attempt was made at a depth of 332'bg. However the hydropunch was retrieved containing no water.
  * It appeared that the white screen was only opened about ½ an inch and was coated with black clay.
- Delta cleaned and secured the work zone for the evening.
- Delta had also added 2 bags of Bentonite SuperGel X to the mud pits. This brings the total to 37 bags to date.

R2-0002112

Dufresne and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.10.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work.
- Three hydropunch samples were taken from depths of 292', 312', 337'bg.
- D+B mailed the samples to Mitkem Labs.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

A PID was used during drilling activities. All readings showed ideal sampling and work conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A.

Prepared by: Kevin Moffitt Reviewed by:

D&B_DFAR/kb

Rev. 03/09/98

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.11.08

DAILY FIELD ACTIVITY REPORT

Report Number: 97 Project Number: 2564.02

Field Log Book Page Number: 73-75

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW. 8S

Weather: (AM) Sunny, Cold Rainfall: (AM) -- Inches

(PM) Sunny, Mild (PM) -- Inches

Temperature: (AM) 38 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) NW

(PM) 50 °F (PM) 5-10 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methiff	D+B	6:55	3:30
	Bill Murphy	Delta	7:15	3:30
	Mike Vasquez	Delta	7:15	3:30
	John	Delta	2:38 pm 11/11	7:15 am 11/11

Subcontractor Work Commencement: (AM) 7:15 (PM)

Subcontractor Work Completion: (AM) (PM) 3:30

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Date: 11.11.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened work zone
- Delta picked up empty drums from the staging area / Delta loaded full drums onto flat bed truck.
- Delta shoveled sediment out of mud pits
- Three hydropunch samples were taken from depths of 357', 372', 392' bg.
- One attempt was made at 352' bg, however the hydropunch did not open. The point of the hydropunch was caked with silty clay.
- Two bags of bentonite were added to the mud pits for a total of 39 bags.
- Delta cleaned and secured the work zone for the evening.

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·11·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractor (Delta) daily work.
- Three hydropunch samples were taken at depths of 357, 372, and 392' bg.
- D+B monitored the air in the work zone during all drilling activities.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

t type and location of tests performed and results (include equipment used and monitoring results):

A PID was used during drilling operations to monitor the air in the work zone. All readings showed ideal sample and work conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

We currently have six zones to sample.

pared by: Kevin Metkiff Reviewed by:

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R2-0002116

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11-12-08

DAILY FIELD ACTIVITY REPORT

Report Number: 98 Project Number: 2564-02

Field Log Book Page Number: 76-78

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 80

Weather: (AM) Sunny, Cold Rainfall: (AM) -- Inches

(PM) Sunny, Mild (PM) -- Inches

Temperature: (AM) 37 °F Wind Speed: (AM) -- MPH Wind Direction: (AM) --

(PM) 50 °F (PM) 5 MPH (PM) NE

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	A+B	6^55	3^30
	Bill Murphy	Delta	6^55	3^30
	Mike Vasquez	Delta	7^00	3^30
	John	Delta	2^30 pm 11/12	7^00 am 11/12

Subcontractor Work Commencement: (AM) 7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 3^30

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.12.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened the work zone and prepared the site for work.
- Delta shoveled sediment from the mud pits into drums.
- Two bags of Bentonite Super Gel X were added to the mud pits. This brings the total to 41 bags of Bentonite.
- Three attempts were made to collect a ground water sample from depths of 412', 417', and 422' bg. All three attempts were unsuccessful.
  * Three times the hydropunch was retrieved with the white screen fully exposed and completely covered with black clay.
- Delta removed 120' of 20' rods and replaced them with 15' rods.
- Delta cleaned and secured the work zone for the evening.

s_DFAR/kb

Rev. 03/09/98

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.12.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work.
- Three hydropunch samples were attempted at depths of 412', 417', and 422' bg.
- D+B monitored the air in the work zone while drilling took place.

List specific inspection(s) performed and results (include problems and corrective actions):

All three hydropunch samples were retrieved with no recovery. The white screen was fully exposed and caked with black clay.

t type and location of tests performed and results (include equipment used and monitoring results):

A PID RaeSystems 2020 was used to monitor the air in the work zone. All readings showed ideal working and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

nared by: Kevin Metkiff Reviewed by: _____

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.13.08

DAILY FIELD ACTIVITY REPORT

Report Number: 99 Project Number: 2564.02

Field Log Book Page Number: 79-81

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TM# 81

Weather: (AM) Overcast, Mild, light Rain Rainfall: (AM) light rain Inches
(PM) Overcast, Mild, Rain (PM) light rain Inches

Temperature: (AM) 53 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) SE
(PM) 53 °F (PM) 10 MPH (PM) S

Site Condition: Good Conditions

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7 40	3 40
	Bill Murphy	Delta	7 00	3 40
	Mike Vasquez	Delta	7 00	3 40
	John L	Delta	2 45 pm 11/13	7 00 am 11/13

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 40

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Date: 11·13·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

-Delta arrived on site and began preparing the work zone for daily activities.
*Delta shoveled the mud pits
* Transfered 55 gal. drums
* and mixed mud pits. - throughout the day Delta ended up adding three bags of Bentonite to the mixture for a total of 44 bags.
- Five attempts were made at taking groundwater samples using a hydropunch. However only three attempts were successful. These were at depths of 437, 457, and 472' bg.
- Delta cleaned and secured the work zone for the evening.

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Date: 11.13.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractor (Delta's) daily work.
- Three groundwater samples were taken from depths of 437', 457' and 472' bg.
- D+B monitored the air in the work zone during drilling activities.

List specific inspection(s) performed and results (include problems and corrective actions):

Two hydropunch attempts were unsuccessful. The attempts were made at 432' and 452' bg. Both times the hydropunch did not open.

t type and location of tests performed and results (include equipment used and monitoring results):

A PID was used during all drilling operations to monitor the air in the work zone. All readings showed ideal working and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

pared by: Kevin Metkoff Reviewed by:

B_DFAR/kb Rev. 03/09/98

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Date: 11.14.08

DAILY FIELD ACTIVITY REPORT

Report Number: 100 Project Number: 2564.02

Field Log Book Page Number: 82-83

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMV 8D

Weather: (AM) Overcast, Fog, Mild Rainfall: (AM) - - Inches
(PM) Partly Cloudy, Mild (PM) - - Inches

Temperature: (AM) 55 °F Wind Speed: (AM) Still MPH Wind Direction: (AM) Still
(PM) 60 °F (PM) Still MPH (PM) Still

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methoff	D+B	7 15	3 30
	Bill Murphy	Delta	7 00	3 30
	Mike Vasquez	Delta	7 00	3 30
	John	Delta	2 40 pm 11/14	7 00 am 11/14
	Chris Okon	Delta	12 50	2 50

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Date: 11-14-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta arrived on site and prepared the work zone for daily work.
- Delta began to shovel mud pits. One bag of Bentonite Super Gel X was added to the mud pits for a total of 45 bags.
- Three hydropunch samples were attempted at depths of 492', 497', and 502' bg. Only two were successful at 497' and 502' bg.
- Chris Olson from Delta took a gamma log of the temporary well once sampling was completed.
- Delta cleaned and secured the workzone for the evening.

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Date: 11.14.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work.
- Two hydropunch (groundwater) samples were collected at depths of 497' and 502' bg.
- D+B monitored the air in the work zone during drilling activities.

List specific inspection(s) performed and results (include problems and corrective actions):

The hydropunch taken at 492' bg did not open.

t type and location of tests performed and results (include equipment used and monitoring results):

A PID was used during drilling activities to monitor the air in the work zone. All readings showed ideal work and sampling conditions.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

pared by: Kevin Methoff Reviewed by: _____

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Date: 11-17-08

DAILY FIELD ACTIVITY REPORT

Report Number: 101 Project Number: 2564.02

Field Log Book Page Number: 84

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Sunny, Cold Rainfall: (AM) -- Inches

(PM) -- (PM) -- Inches

Temperature: (AM) 46 °F Wind Speed: (AM) 10-15 MPH Wind Direction: (AM) NW

(PM) -- °F (PM) -- MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	A+B	9 30	3 45
	Bill Murphy	Delta	~9 30	3 50
	Mike Vasquez	Delta	~9 30	3 50
	John	Delta	~3 00	7 00 am 11/17

Subcontractor Work Commencement: (AM) 9 30 (PM)

Subcontractor Work Completion: (AM) (PM) 3 50

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Date: 11.17.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta prepared the work zone for daily work.
All sampling activities have been completed. Delta will prepare to grout the hole and break down all equipment.
- Delta removed all 500 feet of drill rods plus one two foot drill bit.
- All drill rods were removed from the work zone and transported to the staging area.
- 400 feet of grout pipe was then transfered to the work zone
- Delta cleaned and secured the work zone for the evening.

R2-0002127

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Date: 11.17.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw subcontractors daily work.
- D+B organized the disposal of the drilling mud and drill cuttings which were produced during field work.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

t type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow Delta will set the grout pipe and begin to grout the hole.

pared by: Kevin Metkiff Reviewed by:

B_DFAR/kb

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Date: 11·18·08

DAILY FIELD ACTIVITY REPORT

Report Number: 102 Project Number: 2564-02

Field Log Book Page Number: 85-88

Project: New Cassel, Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Partly Cloudy, Cold Rainfall: (AM) - - Inches

(PM) Partly Cloudy, Cold (PM) - - Inches

Temperature: (AM) 34 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) N

(PM) 38 °F (PM) 5-10 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6[47]	3[00]
	Hank	Brookside Env.	6[58]	9[15]
	Domingo	Clean Water	6[58]	9[28]
	Mike Vasquez	Delta	7[25]	3[30]
	Bill Murphy	Delta	7[30]	4[00]
	John	Delta	--	7[00] am 11/18
	New Pit Watch	Delta	4[00] pm 11/18	7[00] am 11/19
	Bill	Delta	9[45]	3[30]

Subcontractor Work Commencement: (AM) 6[58] (PM)

Subcontractor Work Completion: (AM) (PM) 4[00]

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Date: 11·18·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Brookside rep. Hank was on site with a vac. truck from Clean Waters.
  * Hank skimmed water from the tanker truck as well as from the roll off container.
  * A total of 2,161 gallons was taken from tanker and roll off.
- Delta pumped remaining sediment from the tanker into the roll off container.
  * Delta also transfered three drums from work zone to the staging area.
- Delta cleaned and secured the work zone for the evening.

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Date: 11·18·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of subcontractors daily work.
- D+B coordinated rolloff removal, sample date, and the drop off of a new container.

List specific inspection(s) performed and results (include problems and corrective actions):

Delta and D+B discussed the removal of sediment from the tanker truck. It was decided that the best method would be to pump all of the tankers contents (sed.) into the rolloff container.

t type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta plans to begin grouting TMW 8D

pared by: Kevin Mettiff

Reviewed by:

B_DFAR/kb

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R2-0002131

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Date: 11·19·08

DAILY FIELD ACTIVITY REPORT

Report Number: 103 Project Number: 2564·02

Field Log Book Page Number: 89-91

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW8Δ

Weather: (AM) Sunny, Cold Rainfall: (AM) - - Inches

(PM) Sunny, Cold (PM) - - Inches

Temperature: (AM) 35 °F Wind Speed: (AM) 10-15 MPH Wind Direction: (AM) N

(PM) 38 °F (PM) 10-15 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	Δ+B	11 50	5 35
	Bill Murphy	Delta	~7	5 35
	Matt DeVinney	Δ+B	~7	12 12
	Mike Vasquez	Delta	~7	5 35
	Tommy Ewers	Delta	3 05	3 15

Subcontractor Work Commencement: (AM) ~7 (PM)

Subcontractor Work Completion: (AM) (PM) 5 35

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Date: 11.19.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened the work zone and prepared the work zone to grout TMW 8D
- Delta used a grout tub to mix the grout mixture before sending it down the pipe.
  * As the grout was sent down the hole the drilling fluid was displaced into the mud pits. From there the drilling fluid was pumped into Delta's tanker truck.
  * At the end of the day a total of 68 bags of cement was used with about one pound of Bentonite.
  * About 80 gallons of water is used every 5 bags of cement (Lafarge Type I Regular Portland Cement) for a total of about 1088 gallons of water and 68 bags of cement.
  * The grout pipe was 1" in diameter and was placed together in 20' sections reaching a total depth of 400' bg.
- At the end of all grouting activities for the day, Delta winterized all of their equipment (drained hoses & pumps)
- Delta then moved to the staging area to pump some water from the roll off container into empty drums. A total of 9 55 gallon drums were filled.
- Delta then cleaned and secured the work zone for the evening.

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R2-0002133

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Date: 11.19.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors work.
- D+B took a detailed log of events and completed field forms.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

t type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta should complete grouting MW 8D tomorrow.

ared by: Kevin Metkoff Reviewed by: _____

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Date: 11.20.08

DAILY FIELD ACTIVITY REPORT

Report Number: 104 Project Number: 2564.02

Field Log Book Page Number: 92-93

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Mostly Cloudy, Cold Rainfall: (AM) -- Inches
(PM) -- (PM) -- Inches

Temperature: (AM) 30 °F Wind Speed: (AM) <5 MPH Wind Direction: (AM) NW
(PM) -- °F (PM) -- MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methoff	D&B	6 45/14 00	7 35/15 35
	Bill Murphy	Delta	7 00	3 35
	Mike Vasquez	Delta	7 00	3 35
	Matt DeVinney	D&B	--	2 35
	Hank	Brookside	2 15	3 00
	Brian G.	Brookside	2 15	3 30

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 35

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Date: 11.20.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

-Delta opened work zone and prepared the work zone for grouting activities.

* 16 bags of cement were used to complete grouting. This brings the total amount to 84 bags. About 80 gallons of water was used every 5 bags. This brings the total amount of water to about 1,344 gallons.

- Delta winterized, cleaned, and secured the work zone for the evening.

-Brookside Env. came onsite to sample the soil and water contained in the roll off container and Delta's tanker truck.

3_DFAR/kb

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Date: 11-20-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work
- D+B coordinated sampling activities and the removal of the roll off containers.
- A daily log was taken and field forms completed

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

t type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow Delta will begin to break down the work zone.

nared by: Kevin Metkiff Reviewed by:

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Date: 11.21.08

DAILY FIELD ACTIVITY REPORT

Report Number: 105 Project Number: 2564.02

Field Log Book Page Number: 94-95

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 8D

Weather: (AM) Sunny, Cold Rainfall: (AM) -- Inches
(PM) Sunny, Cold (PM) -- Inches

Temperature: (AM) 38 °F Wind Speed: (AM) < 5 MPH Wind Direction: (AM) N
(PM) 40's °F (PM) < 5 MPH (PM) N

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Matt DeVinney	D+B	--	--
	Frank DeVita	D+B	--	--
	Kevin Metkiff	D+B	11^00	4^00
	Bill Murphy	Delta	~7^00	4^00
	Mike Vasquez	Delta	~7^00	4^00

Subcontractor Work Commencement: (AM) ~7^00 (PM)

Subcontractor Work Completion: (AM) (PM) 4^00

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Date: 11.21.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened the work zone and began to break down equipment.
  * All grouting equipment, the Drill Rig, along with other equipment was transported to the staging area.
- Delta pumped water from the roll off container into their tanker truck.
- Delta cleaned and secured the work zone for the evening.

d'Ambra Bartilucci
CONSULTING ENGINEERS
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Date: 11.21.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B oversaw all of the subcontractors daily work.
- D&B marked out all of the temporary monitoring well locations for future survey.
- D&B kept a daily log & completed field forms.

List specific inspection(s) performed and results (include problems and corrective actions):

The drilling would not start. Delta had to jump start the rig.

t type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Monday Delta plans to asphalt pack the remaining void in TMW 8J and continue to break down equipment.

ared by: Kevin Mettiff. Reviewed by: _____

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Date: 11.24.08

DAILY FIELD ACTIVITY REPORT

Report Number: 106 Project Number: 2564.02

Field Log Book Page Number: 96-98

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 81

Weather: (AM) Partly Cloudy Cold Rainfall: (AM) -- Inches
(PM) Sunny, Mild (PM) -- Inches

Temperature: (AM) 25 °F Wind Speed: (AM) -- MPH Wind Direction: (AM) --
(PM) 36 °F (PM) -- MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	AB	6 53	3 45
	Bill Murphy	Delta	7 30	2 10
	Mike Vasquez	Delta	7 30	3 30
	Bill	Delta	11 36	1 35
	Hank	Brookside	10 40	12 15
	Carlos	Clean Waters	10 55	12 15

Subcontractor Work Commencement: (AM) 7 30 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Date: 11.24.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta opened the work zone and began daily work
- Delta broke down the sound barrier at the work zone.
- Brookside and Cleanwaters onsite to skim liquid from Delta's tanker truck and the roll off container.
  * A total of 3,250 Gallons were taken.
- Delta set up mudpits at the staging area.
- Once the mud boxes were in place Delta began to discharge the tanker's contents into the mud boxes.
- Delta broke down their equipment and began to clean and secure the work zone.

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Date: 11.24.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D & B oversaw all of subcontractors work.
- A daily log was kept and field forms were completed.

List specific inspection(s) performed and results (include problems and corrective actions):

While discharging the tanker truck into the mud pits on several occasions the hose became blocked with ice.

t type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow Delta will continue to clean out their tanker truck and break down their equipment.

pared by: Kevin Metcalf Reviewed by:

D&B_DFAR/kb

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Date: 11-25-08

DAILY FIELD ACTIVITY REPORT

Report Number: 107 Project Number: 2564-02

Field Log Book Page Number: 99-

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 80

Weather: (AM) Overcast, Cool, Rain Rainfall: (AM) Rainy Inches
(PM) -- (PM) -- Inches

Temperature: (AM) 44 °F Wind Speed: (AM) Still MPH Wind Direction: (AM) Still
(PM) -- °F (PM) -- MPH (PM) --

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	J+B	7:15	9:40
	Bill Murphy	Delta	7:00	--
	Mike Vasquez	Delta	7:00	--

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM) --

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Date: 11.25.08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta began to set up their equipment used to clean out their tanker.
  * The tanker truck was completely emptied into the mud pits.
- Delta prepared to decon. the drill rig (portadrill) and drill rods.
- Delta decontaminated all drilling equipment.
- A flatbed truck was brought on site to remove equipment from the work zone.
  * All sound barriers, cattle fencing, and other equipment such as drill rods and grout pipe were removed from the staging area.
  * The drill rig was also removed.

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.25.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors work.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

t type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow Delta will concentrate on emptying drill cuttings into the roll off container

nared by: Kevin Methoff Reviewed by:

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Date: 11.26.08

DAILY FIELD ACTIVITY REPORT

Report Number: 108 Project Number: 2564.02

Field Log Book Page Number: 101 - 102

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 88 and Staging Area

Weather: (AM) Sunny, Cool Rainfall: (AM) - - Inches

(PM) Mostly Cloudy, Cool (PM) - - Inches

Temperature: (AM) 36 °F Wind Speed: (AM) Still MPH Wind Direction: (AM) - -

(PM) 45 °F (PM) 5-10 MPH (PM) W

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	7 00	3 30
	Bill Murphy	Delta	7 00	3 30
	Mike Vasquez	Delta	7 15	3 30
	Bill Roth	Delta	7 15	7 45

Subcontractor Work Commencement: (AM) 7 00 (PM)

Subcontractor Work Completion: (AM) (PM) 3 30

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Date: 11-26-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta prepared staging area to empty drums into the roll off container.
  * Delta placed two poly. liners in the roll off.
  * A total of 35 drums were unloaded
- Delta cleaned and secured the work zone.

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Date: 11·26·08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work.
- A detailed log was kept during the day and field forms were completed.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

t type and location of tests performed and results (include equipment used and monitoring results):

N/A.

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Delta will continue to break down equipment.

pared by: Kevin Metkiff Reviewed by:

D&B_DFAR/kb Rev. 03/09/98

R2-0002149

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Date: 12-1-08

DAILY FIELD ACTIVITY REPORT

Report Number: 109 Project Number: 2564-02

Field Log Book Page Number: 103

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW 85. / Staging Area

Weather: (AM) Overcast, Cool, Damp Rainfall: (AM) - - Inches
(PM) - - (PM) - - Inches

Temperature: (AM) 42 °F Wind Speed: (AM) MPH Wind Direction: (AM)
(PM) - - °F (PM) - - MPH (PM) - -

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	D+B	6 50	8 50
	Mike Vazquez	Delta	7 45	- -
	Bill Murphy	Delta	7 50	- -

Subcontractor Work Commencement: (AM) 7 45 (PM)

Subcontractor Work Completion: (AM) (PM) - -

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R2-0002150

Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12·1·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Delta arrived on site at the staging area to continue breaking down their equipment.
  * All drums were removed from site.
  * Other equipment (lumber, pump, hoses, etc)
- Delta cleaned and secured the work zone for the evening.

ana Bartilucci
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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12-1-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work.
- D+B coordinated the removal of the rolloff containers as well as scheduled a vacuum truck to skim water from the mud pits.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

- The vacuum truck will be on site tomorrow around 8am along with a roll off truck.

Prepared by: Kevin Mothiff Reviewed by:

D&B_DFAR/kb

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and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12.2.08

DAILY FIELD ACTIVITY REPORT

Report Number: 110 Project Number: 2564.02

Field Log Book Page Number: 104

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TM# 81 / Staging Area

Weather: (AM) Partly Cloudy Rainfall: (AM) -- Inches
(PM) (PM) Inches

Temperature: (AM) 36 °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) N
(PM) °F (PM) MPH (PM)

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Methiff	A+B	7:00	11:30
	Bill Murphy	Delta	7:18	--
	Sean	Delta	7:18	--
	Nick	Brookside	8:12	10:35
	Mike M.	EnviroWaste	8:15	10:35
	Brian G.	Brookside	9:00	9:30
	Driver Nicholas LLC	Nicholas LLC	7:00	9:30

Subcontractor Work Commencement: (AM) 7:18 (PM)

Subcontractor Work Completion: (AM) (PM) --

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Date: 12·2·08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- EnviroVaste on site with a vacuum truck to skim water which had settle in the roll off containers and portable mud pits.
- Nicholas LLC on site to remove one of the roll off containers from the staging area.
  * The roll off container was left on site, the truck was unable to pick the roll off up due to the shifting weight.
  * It was decided that a super sucker will be brought on site to remove all contents from both roll off containers.
- Delta was on site for the removal of their equipment.
  * Both portable mud pits were cleaned (all sediment was removed and placed in a roll off container, all of the water was removed by a vacuum truck)
  * The portable mud pits were then decontaminated for their removal.
  * Delta removed all of their remaining equipment from the staging area.
  * Delta swept the site of TMW 8 and the staging area.

ana Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12.2.08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D+B oversaw all of the subcontractors daily work.
- D+B scheduled the removal of roll off containers as well as othe equipment.

List specific inspection(s) performed and results (include problems and corrective actions):

The truck brought on site by Nicholas LLC was unable to pick up the roll off container. Several attempts were made to no avail.

t type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Tomorrow 12/3/08 we hope to have a super sucker on site to remove all of the contents from both roll off containers.

nared by: Kevin Metcalf Reviewed by:

D&B_DFAR/kb

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R2-0002155

ana Bartilucci
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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12-19-08

DAILY FIELD ACTIVITY REPORT

Report Number: 111 Project Number: 2564.02

Field Log Book Page Number: 106 - 108

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York - Staging Area

Weather: (AM) Overcast, Cold, Snow Rainfall: (AM) - - Inches
(PM) - - (PM) - - Inches

Temperature: (AM) 30's °F Wind Speed: (AM) 5 MPH Wind Direction: (AM) ENE
(PM) -- °F (PM) -- MPH (PM) - -

Site Condition: Good Condition

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Kevin Metkiff	A+B	7:05	12:25
	Brian Ga	Brookside	7:05	7:09
			7:35	7:43
			9:45	10:03
			11:48	12:24
	Driver/Helper	Earth Care	7:43	9:50

Subcontractor Work Commencement: (AM) 7:00 (PM)

Subcontractor Work Completion: (AM) (PM) 12:24

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12-19-08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Subcontractors Brookside Env and Earthcare onsite (staging area) for the disposal of drill cuttings.
- One roll off was emptied of it contents (drill cuttings) down to the poly liner.
- A second roll off was skimmed until vacuum truck was topped off.
- Brookside brought a box truck on site containing empty drums. Neither the truck or drums were used.
- Earthcare called off second trip @ 1220 due to heavy snow. They said the roads were unsafe.

ana Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12-19-08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

- D&B coordinated subcontractors arrival.
- D&B oversaw all of subcontractors work.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

t type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

Work will continue on another day when the weather subsides. Heavy snow.

pared by: _____ Reviewed by: _____

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12/31/08

DAILY FIELD ACTIVITY REPORT

Report Number: 112 Project Number: 2564-02

Field Log Book Page Number: 111-116

Project: New Cassel Industrial Area

Address: New Cassel, Nassau County, New York TMW8D/ Staging Area

Weather: (AM) cold, cloudy Rainfall: (AM) Inches

(PM) rain/snow, windy, cloudy (PM) 0.04 Inches

Temperature: (AM) 32 °F Wind Speed: (AM) 11 MPH Wind Direction: (AM) E

(PM) 32 °F (PM) 20 MPH (PM) NNE

Site Condition:

Personnel On Site:	Name	Affiliation	Arrival Time	Departure Time
	Albert E.	Earth care	7:00 am	13:36
	Sean Larkin	Earth care	7:00 am	13:36
	Nick Holdener	Brookside	7:00 am	13:55
	Will Ryan	Brookside	7:00 am	13:55
	Lindsay Peppe	D&B	7:00 am	14:00

Subcontractor Work Commencement: (AM) 7:14 (PM)

Subcontractor Work Completion: (AM) (PM) 13:45

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12/31/08

DAILY FIELD ACTIVITY REPORT

Work Performed by subcontractor(s) (includes equipment and labor breakdown):

- Earthcare (2 workers) and Brookside (2 workers) both on site In seperate trucks. Earthcare on site with vacuum truck to vac up soil + some water in roll-offs, namely Roll-off #1. Residual material from Roll-off #2 was vac'd up. In total, 22 cubic yards of material was vacuumed into the truck and transported. Any additional debris (such as concrete blocks, poly-liners, etc.) was gathered and disposed of in "NON-HAZ" labeled drums, and left on site. There are a total of 5 drums.

- Earthcare was responsible for vacuuming, however Brookside greatly assisted, especially when clearing residual materials.

- Both roll-offs were completely cleared of sediment, debris or water, poly-liner was removed, and empty roll-offs remain on site.

R2-0002160

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 12/31/08

DAILY FIELD ACTIVITY REPORT

General work performed today by D&B Engineers:

D&B oversaw all of the subcontractors' daily work.

List specific inspection(s) performed and results (include problems and corrective actions):

N/A

List type and location of tests performed and results (include equipment used and monitoring results):

N/A

Verbal comments received from subcontractor (include construction and testing problems, and recommendations/resulting actions):

N/A

Prepared by: Lindsay Peppe

Reviewed by: _____

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APPENDIX E

EQUIPMENT CALIBRATION LOGS

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-11-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
Photovac Model 2020	Isobutylene	8:30	100 ppm

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-12-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
Photovac Model 2020	Isobutylene	7^10	99.4 ppm
MIE pDR-1000 AN	Zeroed	7^10	zeroed

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-13-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
Photovac Model 2020	Isobutylene	7^05	99.8
MIE pDR -1000 AN	zeroed	7^05	zeroed

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-16-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID - PE Photovac	Isobutylene	7^00	Zeroed / 99.8
MIE pDR-1000 AN	zeroed	7^00	zeroed

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Date: 6-17-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID - PE Photovac	Isobutylene	720	Zeroed / 103 ppm
MIE pDR-1000 AN	Zeroed	720	Zeroed

R2-0002167

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-18-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area

Project Number: 2564-02

Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID -PE Photovac	Isobutylene	7:10	Zeroed / 102 ppm
MIE pDR-1000AN	zeroed	7:10	zeroed

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VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-19-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID - PE Photovac	Zeroed / Isobutylene	7:10	100ppm / Zeroed
MIE pDR-1000 AN	Zeroed	7:10	Zeroed

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Date: 6-20-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
MIE pDR-1000AN	Zeroed	7^{45}	Calibrated
PID - PE Photovac	Isobutylene	7^{45}	100ppm / Zeroed
Horiba - U22	Auto Cal Solution	9^{30}	Calibrated

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Date: 6-23-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID-PE Photovac	Isobutylene	7^{45}	100 ppm / Zeroed
MIE pDR-1000 AN	Zeroed	7^{45}	Zeroed
Horiba U-22	Auto Cal Solution	7^{45}	Calibrated

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RaePhotovac	Isobutylene / Zeroed	7am	Calibrated
MIE pDR 1000AN	Zeroed	7am	Zeroed
Horiba U-22	Auto Cal Solution	7am	Calibrated

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-25-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene / Zeroed	7:30	Calibrated
MIE pDR 1000AN	Zeroed	7:30	Zeroed
Horiba U-22	Auto Cal. Solution	7:40	Calibrated

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R2-0002173

Dvirka and Bartilucci
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IVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-26-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	10 40	100ppm / Zeroed
MIE pDR 1000AN	zoroed	10 40	Calibrated

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R2-0002174

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-27-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7⁰⁰	100ppm/zeroed
MIE pDR 1000 AN	zeroed	7⁰⁰	Calibrated.

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-30-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	12^40	100ppm / Zeroed
Horiba U-22	Auto Cal Solution	12^45	Calibrated

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-1-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 30	100ppm / Zero L
Horiba U-22	Auto Cal. Solution	7 30	Calibrated

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-2-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PeP Photovac	Isobutylene	7 10	100ppm / zeroed
Horiba U-22	Auto cal. Solution	7 15	calibrated

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Methff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	750	100ppm / Zeroed
Horiba U-22	Auto Cal. Solution	750	Calibrated

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CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-9-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 40	100ppm / zeroed
MIE pDR 1000 AN	zeroed	7 40	calibrated

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Date: 7-10-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	720	Calibrated/Zeroed
MIE pDR 1000AN	Zeroed	720	calibrated

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Date: 7-11-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	8:35	100 ppm / Zeroed
MIE pDR 1000 AN	Zeroed	8:35	Zeroed

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Date: 07/14/08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel

Project Number: 2564-02

Calibrated by: Chris Kiernan

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID		0845	
MiniRae		0845	

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Date: 7-15-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-04
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	720	100ppm / zeroed
MIE pDR 1000 AN	Zeroed	720	Zeroed Calibrated

R2-0002184

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7·16·08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Methoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 40	100ppm / Zeroed
Horiba U-22	Auto Cal Solution	7 40	Calibrated

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7·17·08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	7^{25}	100ppm / Zeroed
Horiba U-22	Auto Cal Solution	7^{25}	calibrated.

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-18-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Methiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7:15	99.3ppm / zeroed
Horiba U-22	Auto Cal. Solution	7:15	calibrated

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Date: 7-21-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 35	99ppm / zeroed
Horiba U-22	Auto Cal. Solution	7 35	calibrated

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-23-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 40	100ppm / Zeroed
MIE/DR 1000 AN	zeroed	7 40	Calibrated

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-24-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Methoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	745	100ppm / zeroed

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Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-25-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 30	99ppm / Zeroed
Horiba U-22	Auto Cal. Solution	7 30	Calibrated

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-28-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 30	100ppm / Calibrated
Horiba U-22	Auto Cal. Solution	7 30	Calibrated
MIE pDR 1000AN	Zeroed	10 30	Calibrated

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-29-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	8^20	100 ppm/zeroed
MIE pDR 1000AN	Zeroed	8^20	Calibrated

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-30-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 30	100ppm/Zeroed
MIE pDR 1000AN	Zeroed	7 30	Calibrated

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-31-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7:45	100ppm / Zeroed
Horiba U-22	Auto Cal. Solution	7:45	Calibrated

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7^25	100ppm / Zeroed
Horiba U-22	Auto Cal. Solution	7^25	Calibrated

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-4-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 30	Calibrated 100ppm
Horiba U-22	Auto Cal. Solution	7 50	Calibrated

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-6-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PEPhotovac	Isobutylene	8:10	100ppm
MIE pDR 1000AN	Zeroed	8:10	Calibrated

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R2-0002198

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-7-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	720	100ppm
MIE pDR 1000AN	Zeroed	720	Calibrated

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-8-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	7 30	100ppm
Horiba U-22	Auto Cal. Solution	7 30	Calibrated

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-11-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	746	Calibrated @ 99.8 ppm
Horiba U-22	Auto Cal. Solution	750	Calibrated

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	735	100ppm / Zeroed
Horiba U-22	Auto Cal. Solution	740	Calibrated.

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-13-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7:45	100ppm
Horiba U-22	Auto Cal. Solution	7:45	Calibrated

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-14-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area

Project Number: 2564-02

Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PEPhotovac	Isobutylene	9:10	100ppm
MIEpDR1000AN	Zeroed	9:10	Calibrated

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Rev. 03/09/98

R2-0002204

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-15-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	7:50	99.8 ppm
MIE pDR 1000AN	Zeroed	7:47	Calibrated

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Rev. 03/09/98

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-18-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7:45	100ppm/Zeroed
Horiba U-22	Auto Cal 5-In.	7:40	Calibrated

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-19-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Matkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 35	100ppm/ Calibrated
Horiba U-22	Auto Cal, Solution	7 40	Calibrated

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-20-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7 47	100 ppm
Horiba U-22	Auto Cal. Solution	7 45	Calibrated.

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-21-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02

Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PePhotovac	Isobutylene	7 30	100 ppm
Horiba U-22	Auto Cal. Solution	7 40	Calibrated

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-22-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RaePhotovac	Isobutylene	753	100ppm
MiniRae 1000AN	Zeroed	753	Calibrated

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-25-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7^40	100ppm
MIE pDR 1000 AN	Zeroed	7^40	Calibrated

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-26-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	7^40	99.0 ppm
Horiba U-22	Auto Cal. Solution	7^45	Calibrated

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Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-27-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	7^45	100 ppm
Horiba U-22	Auto Cal Solution	7^50	Calibrated

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-28-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	7 35	100ppm
Horiba U-22	Auto Calibration	7 40	Calibrated

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-29-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PePhotovac	Isobutylene	7:55	100ppm
Horiba U-22	Auto Cal. Solution	7:55	Calibrated

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-1-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	710	Calibrated

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A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-2-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Methiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	710	100ppm

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DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-3-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Methoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PEPhotovac 2020	Isobutylene	7 15	100ppm

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-6-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Methiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac	Isobutylene	7'0	100ppm

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·7·08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Methoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PePhotovac	Isobutylene	7 05	100 ppm

Date: 10·8·08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564.02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	7[15]	100ppm * After calibration PID went into Fault 2 mode.
PID RE Photovac	Isobutylene	10[57]	PID was recalibrated after speaking to tech. support at Rae Environmental. PID read 100ppm and is working properly.

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R2-0002221

Dvirka and Bartilucci CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.9.08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02

Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	~40	99.8 ppm

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Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·10·08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RaeRotovac	Isobutylene	715	100ppm

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·11·08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RaePhotovac	Isobutylene	7:30	100ppm

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Divita and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-30-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac 2020	Isobutylene	7'16	99.8 ppm

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and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-31-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564.02
Calibrated by: Kevin Metkoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RaePhotovac 2020	Isobutylene	9[15]	100ppm

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Rev. 03/09/98

Date: 11/3/08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area

Project Number: 2564-02

Calibrated by: Matt DeVinney

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac 2020	Isobutylene	740	99.8

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/4/08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564-02
Calibrated by: Matt DeVinney

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
DID PE Photovac	Isobutylene	845	100 ppm

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Rev. 03/09/98

Date: 11·6·08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area

Project Number: 2564·02

Calibrated by: Kevin Methoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac 2020	Isobutylene	8:30	100ppm

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.7.08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564.02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac 2020	Isobutylene	7^25	100ppm

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and Bartilucci
CONSULTING ENGINEERS
IVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11-10-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Cassel Industrial Area
Project Number: 2564.02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac 2020	Isobutylene	8^05	100 ppm

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CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.11.08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Castel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metkiff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac 2020	Isobutylene	8:00	100 ppm

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and Bartilucci
CONSULTING ENGINEERS
IVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11-12-08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Castel Industrial Area
Project Number: 2564-02
Calibrated by: Kevin Metcalf

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RE Photovac	Isobutylene	7:53	98.8 ppm

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CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·13·08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Castle Industrial Area
Project Number: 2564.02
Calibrated by: Kevin Methoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID RaePhotovac 2020	Isobutylene	7^{55}	98.8ppm

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and Bartilucci
CONSULTING ENGINEERS
IVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.14.08

DAILY EQUIPMENT CALIBRATION LOG

Project Name: New Castle Industrial Area
Project Number: 2564.02
Calibrated by: Kevin Metkoff

Instrument Name and Model Number	Calibration Method	Time	Readings and Observations
PID PE Photovac 2020	Isobutylene	8^00	100ppm

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Rev. 03/09/98

APPENDIX F

WASTE DISPOSAL RECORDS

Log Number

SOIL SAFE, INC.

NON-HAZARDOUS MATERIAL MANIFEST

GENERATOR

Generator Name NYSDEC

Address 625 Broadway
Albany, NY 12207

Phone No. 800-452-1925

Generator Site/Location (Brookside Project)

Address Bowling Green Water Dist.
New Cassel, New York

Phone No.

Approval Number 24-5768

Description of Material

Non-Regulated Petroleum Contaminated Soil

Non DOT/RCRA Regulated

ID .0036
GROSS 37.17 GROSS
RECALLED
TARE 18.17 T TARE
NET 19.00 T
LOG 20 NET
07/30/2008
10:29AM TONNAGE

I hereby certify that the above named material does not contain free liquid as defined by 40 CFR Part 260.10 or any applicable state law, is not a hazardous waste as defined by 40 CFR Part 261 or any applicable state law, has been properly described, classified and packaged, and is in proper condition for transportation according to applicable regulations.

Generator Authorized Agent Name | Signature | Shipment Date 7-28-08

TRANSPORTER

Transporter Name Rainbow Trans

Address Stephens Park Rd.
Hailcettsburn

Driver Name (Print) Mark O'Gray

Vehicle License No. / State / EPA No. A12806

Truck Number 836

I hereby certify that the above named material was picked up at the generator site listed above.

Driver Signature | Shipment Date

I hereby certify that the above named material was delivered without incident to the destination listed below.

Driver Signature | Delivery Date

DESTINATION

Site Name **Soil Safe, Inc. - Bridgeport** Phone No. **1-856-467-8030**

Address **378 Route 130 Logan Township, NJ 08085**

No left turn on Rt. 130 North into the facility.
Business hours are: Monday through Friday 7 AM to 5 PM. 5 PM to 10 PM By Appointment only. Saturday by appointment only.

I hereby certify that the above named material has been accepted and to the best of my knowledge the foregoing is true and accurate.

Name of Authorized Agent | Signature J Garcia | Receipt Date 7 30 08

White - Facility Green - Facility Yellow - Generator Pink - Broker Goldenrod - Contractor Blue - Trucking Co.

R2-0002237

Log Number

SOIL SAFE, INC.

NON-HAZARDOUS MATERIAL MANIFEST

GENERATOR

Generator Name NYSDEC

Address 625 Broadway
Albany, NY 12207

Phone No. 800-452-1925

Generator Site/Location New Cassel Ind. Area 00-3

Address Bowling Green Water Dist.
New Cassel, NY

Phone No.

Approval Number
L4
5768

Description of Material

Non-Regulated Petroleum
Contaminated Soil

Non DOT/RCRA Regulated

ID .0836
GROSS 39.95 T GROSS
RECALLED
TARE 18.35 T TARE
NET 21.60 T NET
LOG 28
08/20/2008 TONNAGE
10:29AM

I hereby certify that the above named material does not contain free liquid as defined by 40 CFR Part 260.10 or any applicable state law, is not a hazardous waste as defined by 40 CFR Part 261 or any applicable state law, has been properly described, classified and packaged, and is in proper condition for transportation according to applicable regulations.

Generator Authorized Agent Name | Signature | 8-20-08 Shipment Date

TRANSPORTER

Transporter Name Rainbow Transport

Address 167 Stephens Park Rd.
Hacketts Town, NJ

Driver Name (Print) Tommy Vasta

Vehicle License No. / State / EPA No. A1280G NJ581

Truck Number 836

I hereby certify that the above named material was picked up at the generator site listed above.

Driver Signature | 8-20-08 Shipment Date

I hereby certify that the above named material was delivered without incident to the destination listed below.

Driver Signature | 8-20-08 Delivery Date

DESTINATION

Site Name **Soil Safe, Inc. - Bridgeport** Phone No. **1-856-467-8030**

Address **378 Route 130 Logan Township, NJ 08085**

No left turn on Rt. 130 North into the facility.
Business hours are: Monday through Friday 7 AM to 5 PM. 5 PM to 10 PM By Appointment only. Saturday by appointment only.

I hereby certify that the above named material has been accepted and to the best of my knowledge the foregoing is true and accurate.

Name of Authorized Agent | J. Coarc Signature | 8 20 0 4 Receipt Date

White - Facility Green - Facility Yellow - Generator Pink - Broker Goldenrod - Contractor Blue - Trucking Co.

R2-0002238

Log Number

SOIL SAFE, INC.

NON-HAZARDOUS MATERIAL MANIFEST

GENERATOR

Generator Name NYSDEC

Address 625 BROADWAY
ALBANY, NY 12207

Phone No. 800-452-1925

Generator Site/Location

Address IRIS PLACE
NEW CASSEL, NY

Phone No.

Approval Number L4-5768

Description of Material

Non-Regulated Petroleum Contaminated Soil

Non DOT/RCRA Regulated

ID .08:36
GROSS 28.21 GROSS
RECALLED
TARE 18.14 TARE
NET 10.07 T NET
53
09/18/2008
11:34AM TONNAGE

I hereby certify that the above named material does not contain free liquid as defined by 40 CFR Part 260.10 or any applicable state law, is not a hazardous waste as defined by 40 CFR Part 261 or any applicable state law, has been properly described, classified and packaged, and is in proper condition for transportation according to applicable regulations.

Kevin Mitkoff — Generator Authorized Agent Name
Signature
9-18-08 — Shipment Date

TRANSPORTER

Transporter Name Rainbow Transport

Address 167 St Thomas State Park Rd
Hackettstown

Driver Name (Print) Tommy VASTA

Vehicle License No. / State / EPA No. AL 2805 - NJ 58

Truck Number NJ 836

I hereby certify that the above named material was picked up at the generator site listed above.

Driver Signature
9-18-08 — Shipment Date

I hereby certify that the above named material was delivered without incident to the destination listed below.

Driver Signature
9-18-08 — Delivery Date

DESTINATION

Site Name **Soil Safe, Inc. - Bridgeport** Phone No. **1-856-467-8030**

Address **378 Route 130 Logan Township, NJ 08085**

No left turn on Rt. 130 North into the facility.
Business hours are: Monday through Friday 7 AM to 5 PM. 5 PM to 10 PM By Appointment only. Saturday by appointment only.

I hereby certify that the above named material has been accepted and to the best of my knowledge the foregoing is true and accurate.

J. Garcia — Name of Authorized Agent
Signature
9/18/08 — Receipt Date

White - Facility Green - Facility Yellow - Generator Pink - Broker Goldenrod - Contractor Blue - Trucking Co.

R2-0002239

NON-HAZARDOUS WASTE MANIFEST

1. Generator ID Number	2. Page 1 of	3. Emergency Response Phone	4. Waste Tracking Number
		(877) 318-0800	

GENERATOR

5. Generator's Name and Mailing Address: NYC DEC, 625 BROADWAY, ALBANY NY 12207
Generator's Phone: (212) 462-1925

Generator's Site Address (if different than mailing address): NEW CASSEL IND AREA, BOWLING GREEN WATER DIST, IRIS PLACE, NEW CASSEL NY.

6. Transporter 1 Company Name: WILLIAM J. LAUER CORP.
U.S. EPA ID Number: NYR000157846

7. Transporter 2 Company Name
U.S. EPA ID Number

8. Designated Facility Name and Site Address: CLEAN WATER OF NEW YORK, INC.
3249 RICHMOND TERRACE - STATEN ISLAND, NY 10303
Facility's Phone: (718) 981-4600
U.S. EPA ID Number: NY0000968545

	9. Waste Shipping Name and Description	10. Containers No.	10. Containers Type	11. Total Quantity	12. Unit Wt./Vol.	
1.	NON DOT NON RCRA DRILLING WATER	XX	TT	2161	G	
2.						
3.						
4.						

13. Special Handling Instructions and Additional Information
WM501
VAC51
JOB00852227
CUSTOMER: BROOKSIDE ENV. INC.

14. **GENERATOR'S CERTIFICATION:** I certify the materials described above on this manifest are not subject to federal regulations for reporting proper disposal of Hazardous Waste.

Generator's/Offeror's Printed/Typed Name: X [illegible] of NYSDEC
Signature: X
Month: 11 Day: 18 Year: 08

INT'L

15. International Shipments ☐ Import to U.S. ☐ Export from U.S. Port of entry/exit:
Transporter Signature (for exports only): Date leaving U.S.:

TRANSPORTER

16. Transporter Acknowledgment of Receipt of Materials

Transporter 1 Printed/Typed Name: DAMINGO A. QUEZADA
Signature:
Month: 11 Day: 18 Year: 08

Transporter 2 Printed/Typed Name
Signature
Month Day Year

DESIGNATED FACILITY

17. Discrepancy

17a. Discrepancy Indication Space ☐ Quantity ☐ Type ☐ Residue ☐ Partial Rejection ☐ Full Rejection

Manifest Reference Number:

17b. Alternate Facility (or Generator)
U.S. EPA ID Number
Facility's Phone:

17c. Signature of Alternate Facility (or Generator)
Month Day Year

18. Designated Facility Owner or Operator: Certification of receipt of materials covered by the manifest except as noted in Item 17a

Printed/Typed Name
Signature
Month Day Year

R2-0002240

NON-HAZARDOUS WASTE MANIFEST	1. Generator ID Number	2. Page 1 of 1	3. Emergency Response Phone	4. Waste Tracking Number

5. Generator's Name and Mailing Address

Generator's Site Address (if different than mailing address)

Generator's Phone: [illegible] Water District New Cassel, Nassau County, NY

6. Transporter 1 Company Name: WILLIAM J. LAUER CORP.
U.S. EPA ID Number: NJD982792364

7. Transporter 2 Company Name
U.S. EPA ID Number

8. Designated Facility Name and Site Address
CLEAN WATER OF NEW YORK, INC.
3249 RICHMOND TERRACE - STATEN ISLAND, NY 10303
Facility's Phone: (718) 981-4600
U.S. EPA ID Number: NY0000968545

9. Waste Shipping Name and Description	10. Containers No.	10. Containers Type	11. Total Quantity	12. Unit Wt./Vol.
1. NON-DOT-NON-RCRA waste water/sludge for recycling	001	TT	3250	GALS
2.				
3.				
4.				

13. Special Handling Instructions and Additional Information

EMERGENCY RESPONSE # (877) 319-0800

T # 503
VA # 50
Brookside Env. Job

14. GENERATOR'S CERTIFICATION: I certify the materials described above on this manifest are not subject to federal regulations for reporting proper disposal of Hazardous Waste.

Generator's/Offeror's Printed/Typed Name: x Kevin Mitchell agent of NYSDEC
Signature: x [signature]
Month 11 Day 24 Year 08

15. International Shipments ☐ Import to U.S. ☐ Export from U.S. Port of entry/exit:
Transporter Signature (for exports only): Date leaving U.S.:

16. Transporter Acknowledgment of Receipt of Materials

Transporter 1 Printed/Typed Name: Carlos Maldonado
Signature: Carlos Maldonado
Month 11 Day 24 Year 08

Transporter 2 Printed/Typed Name
Signature
Month Day Year

17. Discrepancy

17a. Discrepancy Indication Space ☐ Quantity ☐ Type ☐ Residue ☐ Partial Rejection ☐ Full Rejection

Manifest Reference Number:

17b. Alternate Facility (or Generator)
U.S. EPA ID Number
Facility's Phone:

17c. Signature of Alternate Facility (or Generator)
Month Day Year

18. Designated Facility Owner or Operator: Certification of receipt of materials covered by the manifest except as noted in Item 17a

Printed/Typed Name
Signature
Month Day Year

GENERATOR — INT'L — TRANSPORTER — DESIGNATED FACILITY

R2-0002241

Brookside Environmental, Inc.

757 Foxhurst Rd., Baldwin, New York 11510
(516) 377-6300 Fax (516) 377-6846

Transporter Permit #1A-644
EPA ID #NYR000081661

NON-HAZARDOUS MANIFEST

1. Customer's US EPA ID NO.: NA
Document No.:
2. Page 1

3. Customer's Name and Mailing Address: New Cassel Ind Area Bowling Green Water Dist. New Cassel, NY
NYSDEC 625 Broadway Albany, NY 12207
4. Phone ( ): 800-452-1925

A. Document Number:
B. State ID:

5. Transporter 1 Company Name: EnviroWaste Oil Recovery
6. US EPA ID Number: NYD044825636
C. State Transporter's ID: 3A-562
D. Transporter's Phone: 845-279-0263

7. Transporter 2 Company Name:
8. US EPA ID Number:
E. State Transporter's ID:
F. Transporter's Phone:

9. Designated Facility Name and Site Address: Clean Water of NY 3249 Richmond Terrace Staten Island, NY 10303
10. US EPA ID Number:
G. State Facility's ID: NY 0000968545
H. Facility's Phone: 718-981-4600

11. US DOT Description (Including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	12. Containers Type	13. Total Quantity	14. Unit Wt/Vol	L. Waste No.
a. Non-hazardous waste Liquid, N.O.S.	001	TT	1500	G	
b.					
c.					
d.					

J. Additional Descriptions for Materials Listed Above:
K. Handling Codes for Wastes Listed Above:

15. Special Handling Instructions and Additional Information:

16. CUSTOMER CERTIFICATION: I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and national government regulations.

Printed / Type Name: [illegible] NYSAFC
Signature: [signature]
DATE: Month 12 Day 2 Year 08

17. Transporter 1 Acknowledgement of Receipt of Materials
Printed / Type Name: Michael Maglia
Signature: [signature]
DATE: Month 12 Day 2 Year 08

18. Transporter 2 Acknowledgement of Receipt of Materials
Printed / Type Name:
Signature:
DATE: Month Day Year

20. Facility Owner or Operator: Certification of receipt of waste materials covered by this manifest except as noted in item 19.

Printed / Typed Name:
DATE: Month Day Year

GENERATOR

TRANSPORTER

FACILITY

R2-0002242

EarthCare
Residuals Management Services, Inc.

RMS Manifest Number
10917

972 Nicolls Road, Deer Park, NY 11729
Office: (631) 586-0002 Fax: (631) 586-0530
New York State DEC Licensed Transfer Facility
Permit Number: 1-4720-00317/00001

Waste Discharge Manifest

GENERATOR OF WASTE:

1. Customer Name: brookside environmental 2. Phone Number: 516-377-6300

3. Street Address: 1 mis place 4. City, State & Zip Code: westbury ny 1159

ALL WASTES ARE SUBJECT TO THE TERMS AND CONDITIONS CONTAINED IN THE NYS DEC OPERATING PERMIT

The undersigned, being duly authorized, does hereby certify to the best of their knowledge to the accuracy of the source and type of waste identified and subject to this manifest. **NOTE: GENERATOR SIGNATURE REQUIRED**

5. Signature of Generator or Agent: AS agent to the NYSDEC Date: 12/31/08

WASTE STREAM IDENTIFICATION: CIRCLE / FILL OUT ALL BOXES

Description of Waste:	Unit: (Circle One)			Quantity	NYS DEC N-Code
Non Hazardous Contaminated Soil	Cubic Yards	Gallons	Tons	16	

Others and special handling instructions, if any:

TRANSPORTER OF WASTE **NOTE: TRANSPORTER SIGNATURE REQUIRED**

1. Company Name: RMS/EarthCare 2. Address: 972 nicolls rd

3. Phone : 631-586-0002 4. Pump Out Date: deer park ny 11729

5. Vehicle License No: AK 305-W 6. NYS DEC Permit No:

I certify that to the best of my knowledge the waste that is being delivered into EarthCare transfer facility located at 972 Nicolls Road, Deer Park, NY 11729 contains no hazardous waste.

Printed Name: Albert Ebali Signature: Albert Ebali Date: 12/31/08

ACCEPTANCE BY EARTHCARE

The above transporter delivered the described waste to the Transfer facility and it was accepted.

Transfer Date: 12.31.08 Time: 9.43 Sample ID #:

Signature of authorized agent:

WHITE: TRANSFER FACILITY YELLOW: TRANSPORTER PINK: GENERATOR GOLD: ACCOUNTING

R2-0002243

EarthCare
Residuals Management Services, Inc.

RMS Manifest Number
08691

972 Nicolls Road, Deer Park, NY 11729
Office: (631) 586-0002 Fax: (631) 586-0530
New York State DEC Licensed Transfer Facility
Permit Number: 1-4720-00317/00001

Waste Discharge Manifest

GENERATOR OF WASTE:

1. Customer Name: brookside environmental 2. Phone Number: 516-377-6300

3. Street Address: IRIS place 4. City, State & Zip Code: WEST GUAY NY 11570

ALL WASTES ARE SUBJECT TO THE TERMS AND CONDITIONS CONTAINED IN THE NYS DEC OPERATING PERMIT

The undersigned, being duly authorized, does hereby certify to the best of their knowledge to the accuracy of the source and type of waste identified and subject to this manifest. **NOTE: GENERATOR SIGNATURE REQUIRED**

5. Signature of Generator or Agent: As agent to NYSDEC [signature] Date: 12/17/08

WASTE STREAM IDENTIFICATION: CIRCLE / FILL OUT ALL BOXES

Description of Waste:	Unit: (Circle One)	Quantity	NYS DEC N-Code
NON HAZARDOUS bentonite / sludge / clay / sand	Cubic Yards Gallons Tons	16	

Others and special handling instructions, if any:

TRANSPORTER OF WASTE **NOTE: TRANSPORTER SIGNATURE REQUIRED**

1. Company Name: RMS / EARTH CARE 2. Address: 972 NICOLLS RD DEERPARK NY 11729

3. Phone: 631 586-0002 4. Pump Out Date:

5. Vehicle License No: AK 305 -W 6. NYS DEC Permit No:

I certify that to the best of my knowledge the waste that is being delivered into EarthCare transfer facility located at 972 Nicolls Road, Deer Park, NY 11729 contains no hazardous waste.

Printed Name: ALBERT EADI Signature: [signature] Date: 12/17/08

ACCEPTANCE BY EARTHCARE

The above transporter delivered the described waste to the Transfer facility and it was accepted.

Transfer Date: 12-19-08 Time: 1038 Sample ID #:

Signature of authorized agent: [signature]

WHITE: TRANSFER FACILITY YELLOW: TRANSPORTER PINK: GENERATOR GOLD: ACCOUNTING

R2-0002244

EarthCare
Residuals Management Services, Inc.

RMS Manifest Number
10919

972 Nicolls Road, Deer Park, NY 11729
Office: (631) 586-0002 Fax: (631) 586-0530
New York State DEC Licensed Transfer Facility
Permit Number: 1-4720-00317/00001

Waste Discharge Manifest

GENERATOR OF WASTE:

1. Customer Name: brookside environmental 516 2. Phone Number: -377-6300

3. Street Address: IRIS PLACE 4. City, State & Zip Code: WESTBURY NY 11590

ALL WASTES ARE SUBJECT TO THE TERMS AND CONDITIONS CONTAINED IN THE NYS DEC OPERATING PERMIT

The undersigned, being duly authorized, does hereby certify to the best of their knowledge to the accuracy of the source and type of waste identified and subject to this manifest. **NOTE: GENERATOR SIGNATURE REQUIRED**

5. Signature of Generator or Agent: As agent to the NYSDEC [signature] Date: 12/31/08

WASTE STREAM IDENTIFICATION: CIRCLE / FILL OUT ALL BOXES

Description of Waste:	Unit: (Circle One)	Quantity	NYS DEC N-Code
Non Hazardous bentonite/sludge sand	Cubic Yards Gallons Tons	6	

Others and special handling instructions, if any:

TRANSPORTER OF WASTE **NOTE: TRANSPORTER SIGNATURE REQUIRED**

1. Company Name: RMS/EARTHCARE 2. Address: 972 Nicolls Rd Deer Park NY 11729

3. Phone: 631-586-0002 4. Pump Out Date:

5. Vehicle License No: AK 305-W 6. NYS DEC Permit No:

I certify that to the best of my knowledge the waste that is being delivered into EarthCare transfer facility located at 972 Nicolls Road, Deer Park, NY 11729 contains no hazardous waste.

Printed Name: ALBERT EAGLE Signature: [signature] Date: 12/31/08

ACCEPTANCE BY EARTHCARE

The above transporter delivered the described waste to the Transfer facility and it was accepted.

Transfer Date: 1/2/09 Time: 8am Sample ID #:

Signature of authorized agent: [signature]

WHITE: TRANSFER FACILITY YELLOW: TRANSPORTER PINK: GENERATOR GOLD: ACCOUNTING

R2-0002245

WRE / EarthCare

An RMS Company

Making Water Clean Again

Site # _____
WO. # 839183
Date 12/19/08 PO # _____

Suffolk 631-961-7999 • 631-586-0002 • Nassau 516-933-8820
East End Suffolk 631-369-6567 • Toll Free 1-888-75-DRAIN

SERVICE ADDRESS

Customer Name: BROOKSIDE ENVIRONMENTAL
Address: 3 PAIS PLACE
City/State: WESTBURY NY Zip: 11590
Contact: 516-877-6300

BILLING ADDRESS

Customer Name: _____
Address: _____
City/State: _____ Zip: _____

TIME RECORD

Departure: 6:15 A
Arrival: 7:00 A
Departure from Customer: P
Arrival at Disposal Site: _____
Departure from Disposal Site: _____
Total Time: _____
Reason for Delay _____

INVOICE DATA

Payment Check # _____
Credit Card ☐ Amex ☐ Discover ☐ MC ☐ Visa
Card # Exp. Date: _____
Gals _____ @ _____
Tons ~~Yards~~ 16 @ _____
Jet/Vactor Rate _____ Hours _____
Labor _____
Misc. _____
Emergency Charge _____
Sub Total _____
Tax _____
Total _____
Customer's Signature _____
Driver/Helper Name: AL / JOSE

Customer Disclosure: In the event of payment delinquency, EARTHCARE is a consumer reporting company, in accordance with the Fair Debt Reporting and Fair Debt Collection Practices. Reasonable costs associated with the collection of past due or delinquent accounts are the full responsibility of the customer.

☐ Raw Sewage ☐ Grease Trap
☐ Sewage Sludge ☐ Alum
☐ Leachate ☐ Industrial
☐ Septic Tank/Cesspool ☐ Wet Well/Ejector Pit
☐ Holding Tank ☐ Other

COMMENTS / NOTES:

S/S 1 ROLL OFF

JOB NOT COMPLETE (SNOW)

3. TOOK OUT 16 YARDS SLUDGE

Disposal Ticket # _____ **Manifest #** _____

FORM 126

R2-0002246

WRE / EarthCare

An RMS Company

Making Water Clean Again

Site # _____
WO. # 839725
Date 12/31/08 PO # _____

Suffolk 631-961-7999 • 631-586-0002 • Nassau 516-933-8820
East End Suffolk 631-369-6567 • Toll Free 1-888-75-DRAIN

SERVICE ADDRESS

Customer Name: brookside environmental
Address: IRIS PL
City/State: WEST GURY NY Zip: 11590
Contact: 516-377-6300

BILLING ADDRESS

Customer Name: _____
Address: _____
City/State: _____ Zip: _____

TIME RECORD

Departure: 6:00 A
Arrival: 7:00 A
Departure from Customer: 1:30 P
Arrival at Disposal Site: _____
Departure from Disposal Site: _____
Total Time: _____
Reason for Delay _____

INVOICE DATA

Payment Check # _____
Credit Card ☐ Amex ☐ Discover ☐ MC ☐ Visa
Card # Exp. Date: _____
Gals _____ @ _____
Tons/Yards 22 @ _____
Jet/Vactor Rate _____ Hours _____
Labor _____
Misc. _____
Emergency Charge _____
Sub Total _____
Tax _____
Total _____

☐ Raw Sewage ☐ Grease Trap
☐ Sewage Sludge ☐ Alum
☐ Leachate ☐ Industrial
☐ Septic Tank/Cesspool ☐ Wet Well/Ejector Pit
☐ Holding Tank ☐ Other

Customer's Signature L Repp
Driver/Helper Name: AL / Sean

Customer Disclosure: In the event of payment delinquency, EARTHCARE is a consumer reporting company, in accordance with the Fair Debt Reporting and Fair Debt Collection Practices. Reasonable costs associated with the collection of past due or delinquent accounts are the full responsibility of the customer.

COMMENTS / NOTES:

S/S 2 ROLL offs
3 TOOK OUT 22 YARDS (2 LOADS)
bentonite sand

Disposal Ticket # _____ **Manifest #** _____

FORM 126

R2-0002247

FAC I.D. # 7002738

TICKET

MID ISLAND SALVAGE CORP.

1007 Long Island Avenue
Deer Park, New York 11729
(631) 667-5040 No. 35732

CUSTOMER NAME:

EARTH CARE

TRUCK #640

ID#: 5193
09:34:37
Wed 12/31/08
82520 Wt. (IN)

17.44

09:34:44
Wed 12/31/08
82520 Gross
82520 Tare
0 Net

Thank you for your scrap

HAVE A NICE DAY!!

41.26 41.26
~~23.19~~ 23.82
~~18.07~~ 17.44

MATERIAL:

CUSTOMER SIGNATURE: _____

THIS IS TO CERTIFY THAT I DELIVERED THE ABOVE MATERIAL FOR THE NAMED SUPPLIER. This will also certify that I, on behalf of the above named supplier am familiar with M.I.S.C. list of unacceptable/prohibited materials, and that the above load does not contain any unacceptable/prohibited materials, including any Class I (chlorofluorocarbons) or Class II (hydrochlorofluorocarbons) refrigerants (FREON), which under the federal Clean Air Act must be reclaimed, not vented.

2738

TIC

MID ISLAND SALVAGE CORP.

1007 Long Island Avenue
Deer Park, New York 11729
(631) 667-5040 No. 35743

CUSTOMER NAME:

~~BARTH~~ GRE

THACK
#6458

14.29
tons

ID#: 5209
07:28:25
Fri 01/02/09
76220 Wt. (IN)

07:28:33
Fri 01/02/09
76220 Gross
76220 Tare
0 Net

Thank you for your scrap

HAVE A NICE DAY!!

38.11 38.1
~~23.19~~ 23.8
~~14.92~~ 14.2

MATERIAL:

CUSTOMER SIGNATURE: _____

THIS IS TO CERTIFY THAT I DELIVERED THE ABOVE MATERIAL FOR THE NAMED SUPPLIER. This will also certify I, on behalf of the above named supplier am familiar with M.I.S.C. list of unacceptable/prohibited materials, and tha above load does not contain any unacceptable/prohibited materials, including any Class I (chlorofluorocarbons) or (II (hydrochlorofluorocarbons) refrigerants (FREON), which under the federal Clean Air Act must be reclaimed, not ve

R2-0002249

FAC I.D. # 7002738

TICKET

MID ISLAND SALVAGE CORP.

1007 Long Island Avenue
Deer Park, New York 11729
(631) 667-5040 No. 35626

CUSTOMER NAME:

20.95

ID#: 5031
10:31:46
Fri 12/19/08
89540 Wt. (IN)

10:31:54
Fri 12/19/08
89540 Gross
89540 Tare
0 Net

Thank you for your scrap

HAVE A NICE DAY!!

44.77 44.77
~~23.19~~ 23.82
21.58 20.95

MATERIAL:

Jose Gomez

CUSTOMER SIGNATURE: _____

THIS IS TO CERTIFY THAT I DELIVERED THE ABOVE MATERIAL FOR THE NAMED SUPPLIER. This will also certify that I, on behalf of the above named supplier am familiar with M.I.S.C. list of unacceptable/prohibited materials, and that the above load does not contain any unacceptable/prohibited materials, including any Class I (chlorofluorocarbons) or Class II (hydrochlorofluorocarbons) refrigerants (FREON), which under the federal Clean Air Act must be reclaimed, not vented.

FAC I.D. # 7002738

TICKET

MID ISLAND SALVAGE CORP.

1007 Long Island Avenue
Deer Park, New York 11729
(631) 667-5040 No. 36185

CUSTOMER NAME:

TRUCK

5465

ID#: 5465
14:37:12
Thu 01/15/09
47680 Mt. (IN)

14:37:20
Thu 01/15/09
47680 Gross
47640 Tare
40 Net

light weight

23.82/tons

Thank you for your scrap

Ticket

HAVE A NICE DAY!!

MATERIAL:

CUSTOMER SIGNATURE: _____

THIS IS TO CERTIFY THAT I DELIVERED THE ABOVE MATERIAL FOR THE NAMED SUPPLIER. This will also certify that I, on behalf of the above named supplier am familiar with M.I.S.C. list of unacceptable/prohibited materials, and that the above load does not contain any unacceptable/prohibited materials, including any Class I (chlorofluorocarbons) or Class II (hydrochlorofluorocarbons) refrigerants (FREON), which under the federal Clean Air Act must be reclaimed, not vented.

Clean Water of New York, Inc.
3249 Richmond Terrace
Staten Island, NY 10303
Phone: 718-981-4600 Fax: 718-981-5213

JOB RECEIPT

Job Number	Date	Time	Job Type
JOB0085460	11/24/08	4:00 pm	Truck Job

Generator

BROOKSIDE ENVIRONMENTAL
7 Willis Court
Hicksville, NY 11801
(516) 377-6300
EPA Permit # NYR000081661

Customer

BROOKSIDE ENVIRONMENTAL
7 Willis Court
Hicksville, NY 11801

PO #:
Profile Sheet: No Approval Code:

Transporter

WILLIAM J. LAUER CORP.
3249 Richmond Terrace
Staten Island, NY 10303

EPA Permit #: NYR000157644
NYS DEC Permit #: 2A-531

Transport / Vessel Name: VAC # 54
# of Tanks: 1
Total Capacity: 6,300 U of M: Gallons

Coast Guard #:
Generator / Vessel Name

Received 3,250 Gallons Of Oily Water For Proper Treatment and Disposal.

Products & Test Results	Category	Code	Description	Quantity	UoM
	D	N018	Oily Water	3,250	Gallons

Compartment	% Water	% Oil	% Solid	Halogens (ppm)	Flash Point (oF)
1	79.00	1.00	20.00	0	>= 100

Other Tests Peformed: No

Did this load or any portion of this load orginate at a utility? No

GENERATOR: NYS DEC, NEW CASSEL, NY

Diana Cleems 11/24/08
Receiver's Signature and Date — Generator's Representative Signature and Date

R2-0002252

APPENDIX G

AIR MONITORING DATA

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-12-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID

Recorded by: Kevin Metkiff Calibration Date: 6-12-08

Weather Conditions: 72° a.m 85° p.m Moderate, light N wind, Sunny

Time	Location	Wind Speed and Direction	Reading	Observations
7^10	TMW-6	< 5 N	99.4	Calibrated Ready / Isobutylene
7^50	TMW-6	< 5 N	0.0	- -
8^15	TMW-6	< 5 N	0.0	- -
8^45	TMW-6	< 5 N	0.0	- -
9^20	TMW-6	< 5 N	0.0	- -
9^45	TMW-6	< 5 N	0.0	- -
10^15	TMW-6	< 5 N	0.0	- -
10^45	TMW-6	< 5 N	0.0	- -
11^12	TMW-6	< 5 N	0.0	- -
11^40	TMW-6	< 5 N	0.0	- -
12^15	TMW-6	< 5 NNE	0.0	- -
12^45	TMW-6	< 5 NNE	0.0	- -
1^15	TMW-6	< 5 NNE	0.0	- -
1^45	TMW-6	< 5 NNE	0.0	- -
2^15	TMW-6	< 5 NNE	0.0	- -
2^45	TMW-6	< 5 NNE	0.0	- -

Recording Procedures/Remarks: PID readings were taken place down wind of drilling location as well as from hollow stem auger.

R2-0002254

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-12-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR-1000 AN

Recorded by: Kevin Metkiff Calibration Date: 6-12-08

Weather Conditions: 72° am 85° pm Moderate, light N wind, Sunny

Time	Location	Wind Speed and Direction	Reading mg/m³	Observations
7:10	TMW-6	<5 N	Zeroed 0.000	Zeroed Monitor
7:50	TMW-6	<5 N	0.004	--
8:15	TMW-6	<5 N	0.006	--
8:45	TMW-6	<5 N	0.000	--
9:20	TMW-6	<5 N	0.030	--
9:45	TMW-6	<5 N	0.007	--
10:15	TMW-6	<5 N	0.001	--
10:45	TMW-6	<5 N	0.005	--
11:12	TMW-6	<5 N	0.005	--
11:40	TMW-6	<5 N	0.007	--
12:15	TMW-6	<5 NNE	0.007	--
12:45	TMW-6	<5 NNE	0.045	--
1:15	TMW-6	<5 NNE	0.011	--
1:45	TMW-6	<5 NNE	0.035	--
2:15	TMW-6	<5 NNE	0.016	--
2:45	TMW-6	<5 NNE	0.001	--

Recording Procedures/Remarks: Dust monitoring was taken place down wind of drilling location.

R2-0002255

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-13-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area
Project Number: 2564-02 Instrument: PID
Recorded by: Kevin Metkiff Calibration Date: 6-13-08
Weather Conditions: 70° am 80° pm Sunny, Moderate, light NE wind

Time	Location	Wind Speed and Direction	Reading	Observations
7 05	TMW-6	< 5 NE	0.0 / 99.8	Calibrated + Zeroed PID
7 30	TMW-6	< 5 NE	0.0	— —
8 00	TMW-6	< 5 NE	0.0	— —
8 30	TMW-6	< 5 NE	0.0	— —
9 00	TMW-6	< 5 NE	0.0	— —
9 30	TMW-6	< 5 NE	0.0	— —
10 00	TMW-6	< 5 NE	0.0	— —
10 30	TMW-6	< 5 NE	0.0	— —
10 50	TMW-6	< 5 NE	0.0	— —

Recording Procedures/Remarks: PID reading were taken down wind of drilling location as well as from hollow stem augers.

R2-0002256

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-13-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR-1000 AN

Recorded by: Kevin Metkiff Calibration Date: 6-13-08

Weather Conditions: 70° am 80° pm Sunny, Moderate, light NE wind

Time	Location	Wind Speed and Direction	Reading	Observations
7^05	TMW-6	<5 NE	Zeroed 0.000	Zeroed Calibrated
7^30	TMW-6	<5 NE	0.000	- -
8^00	TMW-6	<5 NE	0.000	- -
8^30	TMW-6	<5 NE	0.061	- -
9^00	TMW-6	<5 NE	0.000	- -
9^30	TMW-6	<5 NE	0.000	- -
10^00	TMW-6	<5 NE	0.000	- -
10^30	TMW-6	<5 NE	0.000	- -
10^50	TMW-6	<5 NE	0.000	- -

Recording Procedures/Remarks: Dust readings were taken down wind of drilling location.

R2-0002257

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-17-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR-1000 AN

Recorded by: Kevin Metkiff Calibration Date: 6-17-08

Weather Conditions: Cool, Sunny, 70° in am light w wind / Mostly Cloudy, cool, 75° wind 5-10 in the pm.

Time	Location	Wind Speed and Direction mph	Reading	Observations
7^20	TMW-6	<5 W	zeroed	calibrated
8^00	TMW-6	<5 W	0.000	--
8^30	TMW-6	<5 W	0.000	--
9^00	TMW-6	<5 W	0.000	--
9^30	TMW-6	<5 W	0.000	--
9^55	TMW-6	<5 W	0.002	--
10^25	TMW-6	<5 W	0.022	--
10^57	TMW-6	<5 W	0.018	--
11^30	TMW-6	<5 W	0.018	--
12^00	TMW-6	<5 W	0.021	--
12^30	TMW-6	5-10 W	0.032	--
12^55	TMW-6	5-10 W	0.016	--
1^30	TMW-6	5-10 W	0.020	--
1^56	TMW-6	5-10 W	0.020	--
2^35	TMW-6	5-10 W	0.028	--
3^00	TMW-6	5-10 W	0.000	--
3^30	TMW-6	5-10 W	0.050	--
4^00	TMW-6	5-10 W	0.050	--

Recording Procedures/Remarks: Set up air monitoring station down wind.

R2-0002258

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-17-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID - PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 6-17-08

Weather Conditions: Sunny, cool, light W wind 70° in a.m. Mostly cloudy, cool, W wind 5-10 mph 75° in the pm.

Time	Location	Wind Speed and Direction	Reading	Observations
4 30	TMW-6	5-10 W	0.0	--
5 06	TMW-6	5-10 W	0.0	--
5 50	TMW-6	5-10 W	0.0	--

Recording Procedures/Remarks: Set up air monitoring station down wind.

R2-0002259

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-17-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID - PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 6-17-08

Weather Conditions: Sunny, cool, light w wind 70° in a.m. Mostly cloudy, cool w wind 5-10 mph 75° in p.m.

Time	Location	Wind Speed and Direction mph	Reading	Observations
7 20	TMW-6	< 5 W	103 ppm	Calibration
8 00	TMW-6	< 5 W	0.0	- -
8 30	TMW-6	< 5 W	0.0	- -
9 00	TMW-6	< 5 W	0.0	- -
9 30	TMW-6	< 5 W	0.0	- -
9 55	TMW-6	< 5 W	0.0	- -
10 25	TMW-6	< 5 W	0.0	- -
10 57	TMW-6	< 5 W	0.0	- -
11 30	TMW-6	< 5 W	0.0	- -
12 00	TMW-6	< 5 W	0.0	- -
12 30	TMW-6	5-10 W	0.0	- -
12 55	TMW-6	5-10 W	0.0	- -
1 30	TMW-6	5-10 W	0.0	- -
1 56	TMW-6	5-10 W	0.0	- -
2 35	TMW-6	5-10 W	0.0	- -
3 00	TMW-6	5-10 W	0.0	- -
3 30	TMW-6	5-10 W	0.0	- -
4 00	TMW-6	5-10 W	0.0	- -

Recording Procedures/Remarks: Set up air monitoring station down wind

R2-0002260

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-17-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR-1000 AN

Recorded by: Kevin Metkiff Calibration Date: 6-17-08

Weather Conditions: Cool, Sunny, 70° light in a.m. Mostly Cloudy, cool, 75° wind 5-10 in p.m.

Time	Location	Wind Speed and Direction	Reading	Observations
4^30	TMW-6	5-10 W	0.030	--
5^06	TMW-6	5-10 W	0.032	--
5^50	TMW-6	5-10 W	0.028	--

Recording Procedures/Remarks: Set up air monitoring station down wind.

D&B_AMF/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-18-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID-PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 6-18-08

Weather Conditions: 62° WNW wind <5mph No humidity in the a.m. / Sunny, upper 70's West wind 5mph and no humidity in the p.m.

Time	Location	Wind Speed and Direction mph	Reading	Observations
7 10	TMW-6	<5 WNW	100ppm	Zeroed and Calibrated
8 30	TMW-6	<5 WNW	0.0	Started Air Monitoring
9 50	TMW-6	<5 WNW	0.0	--
10 33	TMW-6	<5 WNW	0.0	--
11 00	TMW-6	<5 WNW	0.0	--
11 28	TMW-6	<5 WNW	0.0	--
11 55	TMW-6	<5 WNW	0.0	--
12 30	TMW-6	5 W	0.0	--
1 00	TMW-6	5 W	0.0	--
1 27	TMW-6	5 W	0.0	--
2 05	TMW-6	5 W	0.0	--

Recording Procedures/Remarks: Air Monitoring Station was set up down wind from the work zone.

R2-0002262

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-18-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR-1000AN

Recorded by: Kevin Metkiff Calibration Date: 6-18-08

Weather Conditions: 62° WNW wind < 5 mph / Sunny, upper 70's west wind abat 5mph
No humidity in the morning / and no humidity in the afternoon.

Time	Location	Wind Speed and Direction mph	Reading	Observations
7^10	Tmw-6	<5 WNW	zeroed	calibrated
8^30	Tmw-6	<5 WNW	0.000	--
9^50	Tmw-6	<5 WNW	0.034	--
10^33	Tmw-6	<5 WNW	0.000	--
11^00	Tmw-6	<5 WNW	0.008	--
11^28	Tmw-6	<5 WNW	0.006	--
11^55	Tmw-6	<5 WNW	0.000	--
12^30	Tmw-6	5 W	0.002	--
1^00	Tmw-6	5 W	0.000	--
1^27	Tmw-6	5 W	0.007	--
2^05	Tmw-6	5 W	0.006	--

Recording Procedures/Remarks: Air monitoring took place down wind from work zone.

D&B_AMF/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-19-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID - PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 6-19-08

Weather Conditions: 65° light N wind, cool, hazy low humidity in the morning / 70's low humidity, Partly cloudy still wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^10	TMW-6	<5 N	100 ppm	Calibrated & Zeroed
8^00	TMW-6	<5 N	0.0	--
8^30	TMW-6	<5 N	0.0	--
9^00	TMW-6	<5 N	0.0	--
9^30	TMW-6	<5 N	0.0	--
9^55	TMW-6	<5 N	0.0	--
10^30	TMW-6	<5 N	0.0	--
11^05	TMW-6	<5 N	0.0	--
11^25	TMW-6	<5 N	0.0	--
12^00	TMW-6	<5 N	0.0	--
12^33	TMW-6	<5 N	0.0	--
12^55	TMW-6	<5 N	0.0	--
1^30	TMW-6	<5 N	0.0	--
2^00	TMW-6	<5 N	0.0	--
2^30	TMW-6	<5 N	0.0	--
3^00	TMW-6	<5 N	0.0	--
3^36	TMW-6	<5 N	0.0	--
4^00	TMW-6	<5 N	0.0	Last PID reading of the day PID lost power.

Recording Procedures/Remarks: PID was set up with other air monitoring equipment down wind of the work zone. This was to ensure a safe work zone and air quality for the workers and the general public in the surrounding area.

R2-0002264

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-19-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR-1000 AN

Recorded by: Kevin Metkiff Calibration Date: 6-19-08

Weather Conditions:

Time	Location	Wind Speed and Direction	Reading	Observations
7 10	TMW-6	<5 N	zeroed	Calibrated
8 00	TMW-6	<5 N	0.000	--
8 30	TMW-6	<5 N	0.000	--
9 00	TMW-6	<5 N	0.000	--
9 30	TMW-6	<5 N	0.000	--
9 55	TMW-6	<5 N	0.000	--
10 30	TMW-6	<5 N	0.000	--
11 05	TMW-6	<5 N	0.000	--
11 25	TMW-6	<5 N	0.000	--
12 00	TMW-6	<5 N	0.000	--
12 33	TMW-6	<5 N	0.000	--
12 55	TMW-6	<5 N	0.000	--
1 30	TMW-6	<5 N	0.000	--
2 00	TMW-6	<5 N	0.000	--
2 30	TMW-6	<5 N	0.000	--
3 00	TMW-6	<5 N	0.000	--
3 30	TMW-6	<5 N	0.000	--
3 58	TMW-6	<5 N	0.000	--
4 30	TMW-6	<5 N	0.000	--

Recording Procedures/Remarks:

The dust Monitor, MIE pDR-1000 AN, was set up along side a PID to monitor the air downwind from the work zone.

R2-0002265

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-20-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID-PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 6-20-08

Weather Conditions: 63° Sunny, low humidity, <5mph wind WNW in the morning / Sunny, 78°, low humidity wind 5mph NNW in the afternoon.

Time	Location	Wind Speed and Direction mph	Reading	Observations
7^45	TMW-6	<5 WNW	100ppm / zeroed	Calibrated
8^35	TMW-6	<5 WNW	0.0	- -
9^05	TMW-6	<5 WNW	0.0	- -
9^30	TMW-6	<5 WNW	0.0	- -
10^10	TMW-6	<5 WNW	0.0	- -
11^30	TMW-6	<5 WNW	0.0	- -
12^05	TMW-6	5 NNW	0.0	- -
12^55	TMW-6	5 NNW	0.0	- -
1^30	TMW-6	5 NNW	0.0	- -
2^00	TMW-6	5 NNW	0.0	- -
2^30	TMW-6	5 NNW	0.0	- -

Recording Procedures/Remarks: Air Monitoring Station was set up down wind from work zone.

R2-0002266

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-20-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR-1000 AN

Recorded by: Kevin Metkiff Calibration Date: 6-20-08

Weather Conditions: 63° Sunny, light humidity light wind WNW in the morning / 78°, Sunny, light humidity, light NNW wind 5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^45	TMW-6	<5 WNW	Zeroed	Calibrated
8^35	TMW-6	<5 WNW	0.000	- -
9^05	TMW-6	<5 WNW	0.000	- -
9^30	TMW-6	<5 WNW	0.000	- -
10^10	TMW-6	<5 WNW	0.000	- -
11^30	TMW-6	<5 WNW	0.000	- -
12^05	TMW-6	5 NNW	0.000	- -
12^55	TMW-6	5 NNW	0.000	- -
1^30	TMW-6	5 NNW	0.000	- -
2^00	TMW-6	5 NNW	0.000	- -
2^30	TMW-6	5 NNW	0.000	- -

Recording Procedures/Remarks: Air monitoring station was set up down wind from work zone.

R2-0002267

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-23-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID-AE Photovac

Recorded by: Kevin Metkiff Calibration Date: 6-23-08

Weather Conditions: Overcast, hot, humid 70° SSE wind <5 mph in the morning / Overcast periods of rain-heavy at times, humid 80° SSE wind, still in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7 45	TMW-6	<5 SSE	100 ppm / Zeroed	Calibrated
8 30	TMW-6	<5 SSE	0.0	--
9 00	TMW-6	<5 SSE	0.0	--
9 30	TMW-6	<5 SSE	0.0	--
10 00	TMW-6	<5 SSE	0.0	--
10 30	TMW-6	<5 SSE	0.0	--
11 00	TMW-6	<5 SSE	0.0	--
11 30	TMW-6	<5 SSE	0.0	--
1 25	TMW-6	<5 SSE	0.0	--
3 05	TMW-6	<5 SSE	0.0	--
		←		

Recording Procedures/Remarks: PID was set up down wind from work zone to monitor the air.

R2-0002268

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-23-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR-1000AN

Recorded by: Kevin Metkiff Calibration Date: 6-23-08

Weather Conditions: Overcast hot humid 70° SSE wind 25 mph in the morning / Overcast Periods of rain-heavy at times, humid 80° SSE, still wind in afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7:45	TMW-6	<5 SSE	Zeroed	Calibrated
8:30	TMW-6	<5 SSE	0.000	--
9:00	TMW-6	<5 SSE	0.000	--
9:30	TMW-6	<5 SSE	0.000	--
10:00	TMW-6	<5 SSE	0.000	--
10:30	TMW-6	<5 SSE	0.000	--
11:00	TMW-6	<5 SSE	0.000	--
11:30	TMW-6	<5 SSE	0.000	--
1:25	TMW-6	<5 SSE	0.000	--
3:05	TMW-6	<5 SSE	0.000	--

Recording Procedures/Remarks: Dust Monitor was set up along side a PID monitor down wind from work zone.

R2-0002269

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Methoff Calibration Date: 6-24-08

Weather Conditions: 71° Sunny, low humidity, light West wind in the morning Weather 80's, humid, sunny wind 5 mph WNW in the afternoon

Time	Location	Wind Speed and Direction mph	Reading	Observations
7^00	TMW-6	<5 W	100ppm	Calibrated
7^30	TMW-6	<5 W	0.0	--
8^47	TMW-6	<5 W	0.0	--
9^25	TMW-6	<5 W	0.0	--
11^40	TMW-6	5 WNW	0.0	--
12^30	TMW-6	5 WNW	0.0	--
1^00	TMW-6	5 WNW	0.0	--
3^00	TMW-6	5 WNW	0.0	--

Recording Procedures/Remarks: Set up air monitoring station down wind of site.

R2-0002270

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-24-08

AIR MONITORING FORM

Project Name: New Castel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Methoff Calibration Date: 6-24-08

Weather Conditions: 71° Sunny, low humidity, light west wind in the morning 80's, humid, Sunny, wind 5mph WNW in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7:00	TMW-6	<5 W	Zeroed	Calibrated
7:30	TMW-6	<5 W	0.000	--
8:47	TMW-6	<5 W	0.008	--
9:25	TMW-6	<5 W	0.006	--
11:40	TMW-6	5 WNW	0.000	--
12:30	TMW-6	5 WNW	--	Batteries died
1:00	TMW-6	5 WNW	--	Batteries died
3:00	TMW-6	5 WNW	--	Batteries died

Recording Procedures/Remarks: MIE pDR 1000AN was set up down wind of work zone to monitor dust in the surrounding area.

D&B_AMF/kb Rev. 03/09/98

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-25-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 6-25-08

Weather Conditions: Light SSW wind 5mph, Sunny, cool 70°, low humidity

Time	Location	Wind Speed and Direction mph	Reading	Observations
7:30	TMW-6	5 SSW	100 ppm	Calibrated
9:45	TMW-6	5 SSW	0.0	--
10:10	TMW-6	5 SSW	0.0	--
10:20	TMW-6	5 SSW	0.0	--
10:45	TMW-6	5 SSW	0.0	--
11:05	TMW-6	5 SSW	0.0	--
11:30	TMW-6	5 SSW	0.0	--
12:20	TMW-6	5 SSW	0.0	--
12:45	TMW-6	5 SSW	0.0	--
12:50	TMW-6	5 SSW	0.0	--

Recording Procedures/Remarks:

R2-0002272

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-25-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000 AN

Recorded by: Kevin Metkiff Calibration Date: 6-25-08

Weather Conditions: Light SSW wind 5mph, Sunny, Cool 70°, low humidity

Time	Location	Wind Speed and Direction	Reading	Observations
7:30	TMW-6	5 SSW	Zeroed	Calibrated
9:45	TMW-6	5 SSW	0.039	--
10:10	TMW-6	5 SSW	0.004	--
10:20	TMW-6	5 SSW	0.014	--
10:45	TMW-6	5 SSW	0.019	--
11:05	TMW-6	5 SSW	0.009	--
11:30	TMW-6	5 SSW	0.430	--
12:20	TMW-6	5 SSW	0.010	--
12:45	TMW-6	5 SSW	0.028	--
12:50	TMW-6	5 SSW	0.019	--

Recording Procedures/Remarks:

R2-0002273

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-26-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID & Photovac

Recorded by: Kevin Methkiff Calibration Date: 6-26-08

Weather Conditions: 72° cool, wind S < 5mph low humidity in the morning / 85°, Humid, Mostly Cloudy, S wind < 5mph and light rain in the afternoon.

Time	Location	Wind Speed and Direction mph	Reading	Observations
10^40	TMW-7	<5 S	100ppm	Calibrated
11^00	TMW-7	<5 S	0.0	--
11^20	TMW-7	<5 S	0.0	--
11^45	TMW-7	<5 S	0.0	--
12^25	TMW-7	<5 S	0.0	--
1^06	TMW-7	<5 S	0.0	--
1^30	TMW-7	<5 S	0.0	--
2^05	TMW-7	<5 S	0.0	--
2^40	TMW-7	<5 S	0.0	--
3^00	TMW-7	<5 S	0.0	--

Recording Procedures/Remarks: PID was set up down wind from the work zone.

R2-0002274

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-26-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Metkiff Calibration Date: 6-26-08

Weather Conditions: 72° cool, wind S < 5 mph low humidity in the morning / 85°, Humid, Mostly Cloudy, S wind < 5 mph and light rain in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
10^40	TMW-7	<5 S	zeroed	Calibrated
11^00	TMW-7	<5 S	0.000	--
11^20	TMW-7	<5 S	0.000	--
11^45	TMW-7	<5 S	0.000	--
12^25	TMW-7	<5 S	0.000	--
1^05	TMW-7	<5 S	0.000	--
1^30	TMW-7	<5 S	0.000	--
2^05	TMW-7	<5 S	0.000	--
2^40	TMW-7	<5 S	0.000	--
3^00	TMW-7	<5 S	0.000	--

Recording Procedures/Remarks: The dust monitor MIE pDR 1000AN was set up down wind from work zone.

R2-0002275

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-27-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Methoff Calibration Date: 6-27-08

Weather Conditions: Sunny, humid, S wind <5mph in the morning and 75° / 80°, N wind <5mph Humid and sunny in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^00	TMW-7	<5 S	100ppm	Calibrated
7^30	TMW-7	<5 S	0.0	--
7^50	TMW-7	<5 S	0.0	--
8^33	TMW-7	<5 S	0.0	--
8^56	TMW-7	<5 S	0.0	--
9^05	TMW-7	<5 S	0.0	--
9^15	TMW-7	<5 S	0.0	--
10^00	TMW-7	<5 S	0.0	--
10^45	TMW-7	<5 S	0.0	--
11^15	TMW-7	<5 N	0.0	--
12^00	TMW-7	<5 N	0.0	--
12^30	TMW-7	<5 N	0.0	--
1^03	TMW-7	<5 N	0.0	--
1^30	TMW-7	<5 N	0.0	--

Recording Procedures/Remarks: PID was stationed down wind from work zone along side a MIE pDR1000AN dust monitor.

R2-0002276

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-27-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564 - 02 Instrument: MIE pDR 1000 AN

Recorded by: Kevin Metkiff Calibration Date: 6-27-08

Weather Conditions: Sunny, Humid, S wind <5mph in the morning and 75° / 80° N wind <5mph, Humid, and Sunny in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7:00	TMW-7	<5 S	zeroed	calibrated
7:30	TMW-7	<5 S	0.000	--
7:50	TMW-7	<5 S	0.000	--
8:33	TMW-7	<5 S	0.000	--
8:56	TMW 7	<5 S	0.000	--
9:05	TMW 7	<5 S	0.000	--
9:15	TMW 7	<5 S	0.000	--
10:00	TMW 7	<5 S	0.000	--
10:45	TMW 7	<5 S	0.000	--
11:15	TMW 7	<5 N	0.000	--
12:00	TMW 7	<5 N	0.000	--
12:30	TMW 7	<5 N	0.000	--
1:03	TMW 7	<5 N	0.000	--
1:30	TMW 7	<5 N	0.000	--

Recording Procedures/Remarks: MIE pDR 1000AN was stationed along side a PID, down wind from the work zone.

R2-0002277

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 6-30-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RE Photovac

Recorded by: Kevin Metkiff Calibration Date: 6-30-08

Weather Conditions: 70°, muggy, humid, Partly cloudy and a still wind in the morning / 88°, Sunny, Hot, Humid light West wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
12^40	TMW 7	<5 W	100ppm	Calibrated/Zeroed
1^00	TMW 7	<5 W	0.0	--
1^30	TMW 7	<5 W	0.0	--
2^00	TMW 7	<5 W	0.0	--
2^25	TMW 7	<5 W	0.0	--

Recording Procedures/Remarks: PID was used to monitor the air around the work zone.

R2-0002278

Dvirka and Bartilucci
CONSULTING ENGINEERS
DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-1-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 7-1-08

Weather Conditions: 75° in the morning, 88° by the afternoon, sunny, hot, and humid high South wind.

Time	Location	Wind Speed and Direction	Reading	Observations
7^30	TMW 7	<5 S	100ppm	Calibrated
8^00	TMW 7	<5 S	0.0	--
8^30	TMW 7	<5 S	0.0	--
9^00	TMW 7	<5 S	0.0	--
9^30	TMW 7	<5 S	0.0	--
10^00	TMW 7	<5 S	0.0	--
11^00	TMW 7	<5 S	0.0	--
12^10	TMW 7	<5 S	0.0	--
12^30	TMW 7	<5 S	0.0	--
1^00	TMW 7	<5 S	0.0	--
1^30	TMW 7	<5 S	0.0	--
2^00	TMW 7	<5 S	0.0	--

Recording Procedures/Remarks: PID was used during sampling.

R2-0002279

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-2-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 7-2-08

Weather Conditions: 70° Sunny, cool, low humidity SW wind <5 mph in the morning / 88° Sunny, Hot, Humid, light west wind in the afternoon.

Time	Location	Wind Speed and Direction		Reading	Observations
7^10	TMW 7	<5	SW	100 ppm	Calibrated / zeroed
7^30	TMW 7	<5	SW	0.0	--
8^00	TMW 7	<5	SW	0.0	--
8^30	TMW 7	<5	SW	0.0	--
9^30	TMW 7	<5	SW	0.0	--
10^35	TMW 7	<5	W	0.0	--
11^00	TMW 7	<5	W	0.0	--
11^30	TMW 7	<5	W	0.0	--
12^00	TMW 7	<5	W	0.0	--
12^30	TMW 7	<5	W	0.0	--
1^00	TMW 7	<5	W	0.0	--
1^15	TMW 7	<5	W	--	Battery died - checked back up battery but it is dead as well

Recording Procedures/Remarks: PID was used during sampling to detect any vapors that might be present.

R2-0002280

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-7-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Methiff Calibration Date: 7-7-08

Weather Conditions: 75° in the morning, 90° by the afternoon, Sunny Hot & Humid wind light < 5mph out of the west

Time	Location	Wind Speed and Direction	Reading	Observations
7^50	TMW 7	still	100 ppm	Calibrated / Zeroed
8^10	TMW 7	still	0.0	- -
8^30	TMW 7	still	0.0	- -
9^00	TMW 7	still	0.0	- -
10^00	TMW 7	still	0.0	- -
10^30	TMW 7	still	0.0	- -
10^45	TMW 7	still	0.0	- -
11^00	TMW 7	still	0.0	- -
11^25	TMW 7	still	0.0	- -
12^30	TMW 7	still	0.0	- -
1^05	TMW 7	still	0.0	- -
1^30	TMW 7	still	0.0	- -
2^00	TMW 7	<5 S	0.0	- -
2^26	TMW 7	<5 S	0.0	- -
				- -
				-

Recording Procedures/Remarks: PID was used in order to detect the presence of vapors while sampling.

R2-0002281

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-9-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RE Photovac

Recorded by: Kevin Methiff Calibration Date: 7-9-08

Weather Conditions: Sunny, Hot, Humid, 75° and a still wind in the morning. / Mostly cloudy, hot, humid, 90° SSE wind 5mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 40	TMW-9	<5 S wind almost still	100 ppm	Calibrated / Zeroed
8 30	TMW-9	<5 S wind almost still	0.0	--
9 00	TMW-9	<5 S wind almost still	0.0	--
9 30	TMW-9	<5 S wind almost still	0.0	--
9 53	TMW-9	<5 S wind almost still	0.0	--
10 25	TMW-9	<5 S wind almost still	0.0	--
10 59	TMW-9	<5 S wind almost still	0.0	--
11 30	TMW-9	<5 S wind almost still	0.0	--
12 05	TMW-9	5 SSE	0.0	--
12 30	TMW-9	5 SSE	0.0	--
12 58	TMW-9	5 SSE	0.0	--
1 20	TMW-9	5 SSE	0.0	--

Recording Procedures/Remarks: PID was set up along side a dust monitor down wind from work zone.

R2-0002282

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-9-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000 AN

Recorded by: Kevin Metkiff Calibration Date: 7-9-08

Weather Conditions: Sunny, Hot, Humid, 75° and a still wind in the morning / Mostly cloudy, hot, humid, 90° SSE wind 5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 40	TMW-9	< 5 S-wind almost still	Zeroed	Calibrated
8 30	TMW-9	↓	0.006	- -
9 00	TMW-9		0.009	- -
9 30	TMW-9		0.002	- -
9 53	TMW-9		0.010	- -
10 25	TMW-9		0.010	- -
10 59	TMW-9		0.013	- -
11 30	TMW-9		0.024	- -
12 05	TMW-9	5 SSE	0.010	- -
12 30	TMW-9	5 SSE	0.032	- -
12 58	TMW-9	5 SSE	0.016	- -
1 20	TMW-9	5 SSE	0.010	- -

Recording Procedures/Remarks: MIE pDR 1000 AN dust monitor was set up down wind from work zone along side a PID.

R2-0002283

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-10-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RE Photovac

Recorded by: Kevin Metkiff Calibration Date: 7-10-08

Weather Conditions: 73° Sunny, cool, low humidity, NNE wind <5 mph

Time	Location	Wind Speed and Direction	Reading	Observations
7^20	TMW 9	<5 NNE	100ppm	Calibrated
7^59	TMW 9	<5 NNE	0.0	--
8^41	TMW 9	<5 NNE	--	Battery died / Back up dead

Recording Procedures/Remarks: PID was set up alongside a dust monitor down wind in order to monitor the air from work zones.

R2-0002284

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-10-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Metkiff Calibration Date: 7-10-08

Weather Conditions: 73° Sunny, cool / low humidity / 88° Partly Cloudy, humid, hot
NNE wind <5 mph in the morning / N wind <5 mph.

Time	Location	Wind Speed and Direction	Reading	Observations
7:20	TMW 9	<5 NNE	Zeroed	Calibrated
7:59	TMW9	<5 NNE	0.009	--
8:41	TMW9	<5 NNE	0.000	--
9:00	TMW9	<5 NNE	0.016	--
9:40	TMW9	<5 NNE	0.002	--
10:00	TMW9	<5 NNE	0.002	--
10:30	TMW9	<5 NNE	0.005	--
11:00	TMW9	<5 NNE	0.000	--
11:26	TMW9	<5 NNE	0.003	--
11:49	TMW9	<5 NNE	0.003	--
12:45	TMW9	<5 NNE	0.000	--
1:01	TMW9	<5 N	0.000	--
1:29	TMW9	<5 N	0.000	--
2:02	TMW9	<5 N	0.000	--
2:28	TMW9	<5 N	0.000	--

Recording Procedures/Remarks: MIE pDR1000AN was set up along side a PID to monitor air down wind from work zone.

R2-0002285

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-11-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Methoff Calibration Date: 7-11-08

Weather Conditions: 73° Sunny, cool, low humidity NW wind <5 mph in the morning / 88°, Sunny, Hot, Humid still wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
8:35	TMW 9	<5 NW	100 ppm	Calibrated
9:00	↓	↓	0.0	- -
9:30			↓	↓
10:25				
11:00				
11:40		↓		
12:00		- -		
12:25		- -		
1:00		- -		
1:30		- -		
2:06		- -		
2:30		- -		
3:08		- -		
3:15	↓	- -	↓	↓

Recording Procedures/Remarks: PID was stationed along side a Dust monitor down wind from work zone.

R2-0002286

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-11-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Metkiff Calibration Date: 7-11-08

Weather Conditions: 73 Sunny, cool, low humidity NW wind <5 mph in the morning / 88° Sunny, Hot, Humid still wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
8:35	TMW 9	< 5 NW	Zeroed	Calibrated
9:00	TMW 9	< 5 NW	0.002	- -
9:30	TMW 9	< 5 NW	0.000	- -
10:25	TMW 9	< 5 NW	0.005	- -
11:00	TMW 9	< 5 NW	0.004	- -
11:40	TMW 9	< 5 NW	0.007	- -
12:00	TMW 9	- -	0.000	- -
12:25	TMW 9	- -	0.010	- -
1:00	TMW 9	- -	0.016	- -
1:30	TMW 9	- -	0.007	- -
2:06	TMW 9	- -	0.046	- -
2:30	TMW 9	- -	0.003	- -
3:08	TMW 9	- -	0.024	- -
3:15	TMW 9	- -	0.010	- -

Recording Procedures/Remarks: Dust monitor was stationed along side a PID located downwind from work zone.

R2-0002287

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 07/14/08

AIR MONITORING FORM

Project Name: New Cassel
Project Number: 2564-02
Instrument: MiniRae/PID
Recorded by: Chris Kiernan
Calibration Date: 07/14/08
Weather Conditions: M. Cloudy

Time	Location	Wind Speed and Direction	Reading	Observations
0845	Southwest of drilling	NW5	Dust: 0.018/PID: 0.0	None
0915	SW of drilling	NW10	0.016/0.0	None
0940	SW of drilling	NW10	0.017/0.0	None
1015	SW of drilling	W10	0.017/0.0	None
1045	SW of drilling	W5	0.018/0.0	None
1115	SW of drilling	NW10	0.020/0.0	None
1145	SW of drilling	NW5	0.020/0.0	None
1215	South of drilling	N5	0.021/0.0	None
1245	S of drilling	N5	0.022/0.0	None
1315	S of drilling	N10	0.024/0.0	None
1345	S of drilling	N5	0.025/0.0	None

Recording Procedures/Remarks: Meters checked every 30 minutes & recorded in field book as well as form. Meters calibrated in morning as per instructions provided by Pine Env.

R2-0002288

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-15-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PePhotovac

Recorded by: Kevin Metkiff Calibration Date: 7-15-08

Weather Conditions: 80° Sunny, Hot, Low Humidity N wind <5 mph in the morning / 90° Sunny, Hot, Humid N wind 5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 26	TMW9	N <5 mph	100ppm	Calibrated
7 56	TMW9	N <5	0.0	- -
8 40	TMW9	N <5	0.0	- -
9 00	TMW9	N <5	0.0	- -
9 30	TMW9	N <5	0.0	- -
10 00	TMW9	N <5	0.0	- -
10 27	TMW9	N <5	0.0	- -
11 00	TMW9	N <5	0.0	- -
11 30	TMW9	N <5	0.0	- -
12 10	TMW9	N 5	0.0	- -
12 30	TMW9	N 5	0.0	- -
1 00	TMW9	N 5	0.0	- -
1 30	TMW9	N 5	0.0	- -
2 00	TMW9	N 5	0.0	- -

Recording Procedures/Remarks: The PID was set up down wind from the work zone along side a MIE pDR1000AN dust monitor.

R2-0002289

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-15-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Metkiff Calibration Date: 7-15-08

Weather Conditions: 80° Sunny, Hot, Low Humidity N wind <5 mph in the morning / 90° Sunny, Hot, Humid N wind 5 mph in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7^26	TMW 9	N <5mph	zeroed	Calibrated
7^56	TMW 9	N <5	0.000	--
8^40	TMW9	N <5	0.000	--
9^00	TMW9	N <5	0.000	--
9^30	TMW9	N <5	0.000	--
10^00	TMW9	N <5	0.000	--
10^27	TMW9	N <5	0.000	--
11^00	TMW9	N <5	0.000	--
11^30	TMW9	N <5	0.000	--
12^10	TMW9	N 5	0.000	--
12^30	TMW9	N 5	0.000	--
1^00	TMW9	N 5	0.000	--
1^30	TMW9	N 5	0.000	--
2^00	TMW9	N 5	0.000	--

Recording Procedures/Remarks: The MIE pDR 1000AN dust monitor was set up down wind from the work zone along side a PID RE Photovac.

R2-0002290

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7/16/08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RaePhotovac

Recorded by: Kevin Metkiff Calibration Date: 7/16/08

Weather Conditions: 80° in the morning 90° by the afternoon, Sunny, Hot, Humid, N wind 5mph.

Time	Location	Wind Speed and Direction	Reading	Observations
7:40	TMW9	N 5	100ppm	Calibrated
8:40	TMW9	N 5	0.0	--
9:00	TMW9	N 5	0.0	--
9:20	TMW9	N 5	0.0	--
10:00	TMW9	N 5	0.0	--
10:25	TMW9	N 5	0.0	--
11:00	TMW9	N 5	0.0	--
11:30	TMW9	N 5	0.0	--
11:55	TMW9	N 5	0.0	--
12:00	TMW9	N 5	0.0	--
12:40	TMW9	N 5	0.0	--
1:00	TMW9	N 5	0.0	--
1:30	TMW9	N 5	0.0	--
1:55	TMW9	N 5	0.0	--
2:00	TMW9	N 5	0.0	--
2:30	TMW9	N 5	0.0	--

Recording Procedures/Remarks: PID was stationed alongside an Horiba during sampling and purging.

R2-0002291

Dvirka and Bartilucci CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.17.08

AIR MONITORING FORM

Project Name: New Castel Industrial Area

Project Number: 2564-02 Instrument: PID RaePhotovac

Recorded by: Kevin Methkiff Calibration Date: 7.17.08

Weather Conditions: 70° in the morning 90° by the afternoon, Sunny, Hot, Humid, N wind 5mph.

Time	Location	Wind Speed and Direction	Reading	Observations
7 25	TMW9	N 5	100ppm	Calibrated
8 05	TMW9	N 5	0.0	--
8 35	TMW9	N5	0.0	Shut down PID after ready the Pump would not work.
11 00	TMW9	N5	0.0	Turned on PID began purging again.
11 25	TMW9	N5	0.0	--
11 55	TMW9	N5	0.0	--
12 30	TMW9	N5	0.0	--
1 00	TMW9	N5	0.0	--
1 30	TMW9	N5	0.0	--
2 00	TMW9	N5	0.0	--
2 30	TMW9	N5	0.0	--
3 00	TMW9	N5	0.0	--

Recording Procedures/Remarks:

R2-0002292

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7.18.08

AIR MONITORING FORM

Project Name: New Castel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 7.18.08

Weather Conditions: 73° Sunny cool, low humidity, <5 mph SW wind in the morning
90° Sunny, Hot, Humid NE wind 5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^15	TMW9	<5 SW	99.3 ppm	Calibrated
8^00	TMW9	<5 SW	0.0	- -
8^30	TMW9	<5 SW	0.0	- -
9^00	TMW9	<5 SW	0.0	- -
9^30	TMW9	<5 SW	0.0	- -
10^00	TMW9	<5 SW	0.0	- -
10^30	TMW9	<5 SW	0.0	- -
11^30	TMW9	<5 SW	0.0	- -
12^00	TMW9	5 NE	0.0	- -
12^30	TMW9	5 NE	0.0	- -
1^00	TMW9	5 NE	0.0	- -
1^30	TMW9	5 NE	0.0	- -
2^00	TMW9	5 NE	0.0	- -

Recording Procedures/Remarks:

R2-0002293

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-21-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 7-21-08

Weather Conditions: 75° in the morning 90° in the afternoon, Sunny, Hot, Hum'd wind is <5 mph out of the NW in the morning and still in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 35	TMW 9	<5 NW	99 ppm	Calibrated / Zeroed
8 00	TMW 9	<5 NW	0.0	- -
8 30	TMW 9	<5 NW	0.0	- -
9 00	TMW 9	<5 NW	0.0	- -
9 30	TMW 9	<5 NW	0.0	- -
10 00	TMW 9	<5 NW	0.0	- -
10 30	TMW 9	<5 NW	0.0	- -
11 00	TMW 9	<5 NW	0.0	- -
11 30	TMW 9	<5 NW	0.0	- -
12 00	TMW 9	- -	0.0	- -
12 40	TMW 9	- -	0.0	- -
1 00	TMW 9	- -	0.0	- -
1 30	TMW 9	- -	0.0	- -
2 05	TMW 9	- -	0.0	- -
2 40	TMW 9	- -	0.0	- -
3 00	TMW 9	- -	0.0	- -

Recording Procedures/Remarks:

R2-0002294

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-23-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PePhotovac

Recorded by: Kevin Metkaff Calibration Date: 7-23-08

Weather Conditions: overcast, rainy, cool about 75° with a light NE wind in the morning / Sunny, Hot, Humid about 85° light ENE wind by the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 40	TMW 4	<5 NE	100 ppm	Calibrated
8 00	TMW 4	<5 NE	0.0	--
8 27	TMW 4	<5 NE	0.0	--
9 03	TMW 4	<5 NE	0.0	--
9 20	TMW 4	<5 NE	0.0	--
9 56	TMW 4	<5 NE	0.0	--
10 27	TMW 4	<5 NE	0.0	--
10 55	TMW 4	<5 NE	--	Shut down PID during lightning storm
11 50	TMW 4	<5 ENE	0.0	--
12 00	TMW 4	<5 ENE	0.0	--
12 10	TMW 4	<5 ENE	0.0	--

Recording Procedures/Remarks: The PID was set up along side a dust monitor down wind from work zone.

R2-0002295

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-23-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000 AN

Recorded by: Kevin Metkiff Calibration Date: 7-23-08

Weather Conditions: Overcast, rainy, cool about 75° with a light NE wind in the morning / Sunny, Hot, Humid about 85° light ENE wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
740	TMW 4	<5 NE	100ppm	Calibrated
800	TMW 4	<5 NE	0.0	--
827	TMW 4	<5 NE	0.0	--
903	TMW 4	<5 NE	0.0	--
920	TMW 4	<5 NE	0.0	--
956	TMW 4	<5 NE	0.0	--
1027	TMW 4	<5 NE	0.0	--
1055	TMW 4	<5 NE	--	Shut down MIE during lightning storm
1150	TMW 4	<5 ENE	0.0	--
1200	TMW 4	<5 ENE	0.0	--
1210	TMW 4	<5 ENE	0.0	--

Recording Procedures/Remarks: The dust monitor was set up along side a PID down wind from the work zone.

R2-0002296

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-24-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID Photovac

Recorded by: Kevin Metkiff Calibration Date: 7-24-08

Weather Conditions: Overcast, Heavy Rain, Cool 70° and no wind in the morning / Partly Cloudy, Hot, Humid, 80° SW wind 5-10 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^45	TMW-4	- -	100 ppm	Calibrated
8^00	TMW-4	- -	0.0	- -
8^28	TMW-4	- -	0.0	- -
9^10	TMW-4	- -	0.0	- -
9^30	TMW-4	- -	0.0	- -
10^02	TMW-4	- -	0.0	- -
10^30	TMW-4	- -	0.0	- -
11^00	TMW-4	- -	0.0	- -
11^30	TMW-4	- -	0.0	- -
12^00	TMW-4	5-10 SW	0.0	- -
12^35	TMW-4	5-10 SW	0.0	- -
1^05	TMW-4	5-10 SW	0.0	- -
1^30	TMW-4	5-10 SW	0.0	- -
2^00	TMW-4	5-10 SW	0.0	- -

Recording Procedures/Remarks: The PID was used in the workzone during work activities to detect vapors that may be present.

R2-0002297

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-25-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RAE Photovac

Recorded by: Kevin Metkiff Calibration Date: 7-25-08

Weather Conditions: 75° in the morning 85° by the afternoon, Sunny, hot, humid, light N wind

Time	Location	Wind Speed and Direction	Reading	Observations
7^30	TMW4	<5 N	99 ppm	Calibrated
8^00	TMW4	<5 N	0.0	--
8^30	TMW4	<5 N	0.0	--
9^00	TMW4	<5 N	0.0	--
9^30	TMW4	<5 N	0.0	--
10^00	TMW4	<5 N	0.0	--
10^30	TMW4	<5 N	0.0	--

Recording Procedures/Remarks: PID was along side Horiba during sampling and purging operations.

R2-0002298

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-28-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 7-28-08

Weather Conditions: Overcast, cool, low humidity 73° / Sunny, Hot, Humid, 88° SW
N wind <5 mph in the morning / wind 5 mph in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7:30	TMW 4	<5 N	100 ppm	Calibrated/Zeroed
8:00	TMW 4	<5 N	0.0	--
8:30	TMW 4	<5 N	0.0	--
8:35	TMW 4	<5 N	--	Shut down PID
10:35	TMW 4	<5 N	0.0	Started PID
11:00	TMW 4	<5 N	0.0	--
11:25	TMW 4	<5 N	0.0	--

Recording Procedures/Remarks:

R2-0002299

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-28-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Metkiff Calibration Date: 7-28-08

Weather Conditions: Overcast, cool, low humidity, 73° N wind <5 mph in the morning / Sunny, Hot, Humid, 88° SW wind 5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
10^{30}	TMW4	<5 N	Zeroed	Calibrated
10^{35}	TMW4	<5 N	0.000	--
11^{00}	TMW4	<5 N	0.000	--
11^{25}	TMW4	<5 N	0.000	--

Recording Procedures/Remarks:

R2-0002300

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-29-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RaePhotorac

Recorded by: Kevin Metkiff Calibration Date: 7-29-08

Weather Conditions: 73° in the morning 90° by the afternoon, Sunny, Hot, Humid N wind 5mph.

Time	Location	Wind Speed and Direction		Reading	Observations
8^20	TMW-4	5	N	100 ppm	Calibrated
9^00	TMW-4	5	N	0.0	- -
10^00	TMW-4	5	N	0.0	- -
10^30	TMW-4	5	N	0.0	- -
10^58	TMW-4	5	N	0.0	- -
11^25	TMW-4	5	N	0.0	- -
11^58	TMW-4	5	N	0.0	- -
1^30	TMW-4	5	N	0.0	- -
2^00	TMW-4	5	N	0.0	- -
2^30	TMW-4	5	N	0.0	- -

Recording Procedures/Remarks: PID was set up alongside a Dust Monitor down wind from work zone.

R2-0002301

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-29-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Metkiff Calibration Date: 7-29-08

Weather Conditions: 73° in the morning 90° by the afternoon, Sunny, Hot, Humid, N wind 5mph.

Time	Location	Wind Speed and Direction	Reading	Observations
8:20	TMW 4	5 N	Zeroed	Calibrated
9:00	TMW 4	5 W	0.000	--
10:00	TMW 4	5 N	0.000	--
10:30	TMW 4	5 N	0.000	--
10:58	TMW 4	5 N	0.000	--
11:25	TMW 4	5 N	0.000	--
11:58	TMW 4	5 N	0.000	--
1:30	TMW 4	5 N	0.000	--
2:00	TMW 4	5 N	0.000	--
2:30	TMW 4	5 N	0.000	--

Recording Procedures/Remarks: MIE pDR 1000AN

R2-0002302

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-30-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02

Instrument: PID PE Photovac

Recorded by: Kevin Methoff

Calibration Date: 7-30-08

Weather Conditions: 76° cool, Sunny, low humidity light E wind in the morning / 90° Sunny, Hot, Humid, light SW wind in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7:30	TMW-4	<5 E	100 ppm	Calibrated
8:06	TMW-4	<5 E	0.0	--
8:30	TMW-4	<5 E	0.0	--
8:55	TMW-4	<5 E	0.0	--
9:28	TMW-4	<5 E	0.0	--
10:00	TMW-4	<5 E	0.0	--
10:28	TMW-4	<5 E	0.0	--
11:00	TMW-4	<5 E	0.0	--
11:30	TMW-4	<5 SW	0.0	--
12:00	TMW-4	<5 SW	0.0	--
1:00	TMW-4	<5 SW	0.0	--
1:30	TMW-4	<5 SW	0.0	--

Recording Procedures/Remarks: PID was located next to a dust monitor down wind from the work zone.

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-30-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Metkiff Calibration Date: 7-30-08

Weather Conditions: 76° cool, Sunny, low humidity light E wind in the morning / 90° Sunny, Hot, Humid, light SW wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7:30	TMW-4	<5 E	Zeroed	Calibrated
8:06	TMW-4	<5 E	0.000	--
8:30	TMW-4	<5 E	0.008	--
8:55	TMW-4	<5 E	0.003	--
9:28	TMW-4	<5 E	0.000	--
10:00	TMW-4	<5 E	0.006	--
10:28	TMW-4	<5 E	0.009	--
11:00	TMW-4	<5 E	0.008	--
11:30	TMW-4	<5 SW	0.010	--
12:00	TMW-4	<5 SW	0.012	--
1:00	TMW-4	<5 SW	0.028	--
1:30	TMW-4	<5 SW	0.020	--

Recording Procedures/Remarks: Dust monitor was set up down wind from work zone along side a PID.

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 7-31-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 7-31-08

Weather Conditions: 76° Cool, Overcast low humidity light South wind in the morning / 85° Partly cloudy, Hot, Humid SW wind 5mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^45	TMW-4	<5 S	100ppm	Calibrated
8^45	TMW-4	<5 S	0.0	- -
10^30	TMW-4	<5 S	0.0	- -
11^00	TMW-4	<5 S	0.0	- -
11^30	TMW-4	<5 S	0.0	- -
12^00	TMW-4	5 SW	0.0	- -
12^30	TMW-4	5 SW	0.0	- -
1^00	TMW-4	5 SW	0.0	- -
1^30	TMW-4	5 SW	0.0	- -
2^05	TMW-4	5 SW	0.0	- -
2^30	TMW-4	5 SW	0.0	- -
3^00	TMW-4	5 SW	0.0	- -

Recording Procedures/Remarks: PID was used along side a Hornbo while purging and sampling.

R2-0002305

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-1-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Methiff Calibration Date: 8-1-08

Weather Conditions: 76° in the morning, 90° by the afternoon, Sunny, Hot, Humid, Light NW wind

Time	Location	Wind Speed and Direction	Reading	Observations
7 25	TMW-4	--	100ppm	Calibrated
7 55	TMW-4	--	0.0	--
8 25	TMW-4	--	0.0	--
10 00	TMW-4	--	0.0	--
10 30	TMW-4	--	0.0	--
11 00	TMW-4	--	0.0	--
11 30	TMW-4	--	0.0	--
12 00	TMW-4	<5 NW	0.0	--
12 25	TMW-4	<5 NW	0.0	--
1 00	TMW-4	<5 NW	0.0	--
1 30	TMW-4	<5 NW	0.0	--
2 00	TMW-4	<5 NW	0.0	--
2 30	TMW-4	<5 NW	0.0	--

Recording Procedures/Remarks: The PID was used during sampling and purging.

R2-0002306

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-4-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PePhotovac

Recorded by: Kevin Metkiff Calibration Date: 8-4-08

Weather Conditions: 69° Sunny, Cool, No humidity Light NE wind in the morning / 88° NE wind 5mph, Sunny, Hot, Humid in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 30	TMW-4	<5 NE	100ppm	Calibrated
8 00	TMW-4	<5 NE	0.0	- -
9 00	TMW-4	<5 NE	0.0	- -
9 30	TMW-4	<5 NE	0.0	- -
10 00	TMW-4	<5 NE	0.0	- -
10 30	TMW-4	<5 NE	0.0	- -
11 00	TMW-4	<5 NE	0.0	- -
11 30	TMW-4	<5 NE	0.0	- -
12 00	TMW-4	5 NE	0.0	- -
12 30	TMW-4	5 NE	0.0	- -
1 00	TMW-4	5 NE	0.0	- -
1 30	TMW-4	5 NE	0.0	- -
2 00	TMW-4	5 NE	0.0	- -
2 25	TMW-4	5 NE	0.0	- -

Recording Procedures/Remarks: The PID was used during purging and sampling activities.

R2-0002307

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-6-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RaePhotovac

Recorded by: Kevin Metkiff Calibration Date: 8-6-08

Weather Conditions: Heavy Rain, Lightning, Cool 72° light SE wind in the morning / Overcast, Hot, Humid, 80°, still wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
8^{10}	TMW-5	<5 SE	100ppm	Calibrated
8^{32}	TMW-5	<5 SE	0.0	--
9^{00}	TMW-5	<5 SE	0.0	--
9^{30}	TMW-5	<5 SE	0.0	--
10^{00}	TMW-5	<5 SE	0.0	--
10^{30}	TMW-5	<5 SE	0.0	--
11^{00}	TMW-5	--	0.0	The wind became still

Recording Procedures/Remarks:

R2-0002308

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-6-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Metkiff Calibration Date: 8-6-08

Weather Conditions: Heavy Rain, Lightning, Cool, 72° light SE wind in the morning / Overcast, Hot, Humid, 80°, still wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
8:10	TMW-5	<5 SE	Zeroed	Calibrated
8:32	TMW-5	<5 SE	0.000	--
9:00	TMW-5	<5 SE	0.041	--
9:30	TMW-5	<5 SE	0.046	--
10:00	TMW-5	<5 SE	0.044	--
10:30	TMW-5	<5 SE	0.000	--
11:00	TMW-5	--	0.000	Wind became still

Recording Procedures/Remarks:

R2-0002309

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-7-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID & Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-7-08

Weather Conditions: 69° Overcast, foggy, cool light South wind in the morning / 80° Sunny, Hot, Humid, light South west wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 20	TMW 5	<5 S	100ppm	Calibrated
8 00	TMW 5	<5 S	0.0	--
8 34	TMW 5	<5 S	0.0	--
9 00	TMW 5	<5 SW	0.0	--
9 25	TMW 5	<5 SW	0.0	--
10 00	TMW 5	<5 SW	0.0	--
10 35	TMW 5	<5 SW	0.0	--
11 00	TMW 5	<5 SW	0.0	--
11 30	TMW 5	<5 SW	0.0	--
10 57	TMW 5	<5 SW	0.0	--
12 30	TMW 5	<5 SW	0.0	--

Recording Procedures/Remarks: A PID was used along side a dust monitor during all drilling activities.

R2-0002310

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-7-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000AN

Recorded by: Kevin Metkiff Calibration Date: 8-7-08

Weather Conditions: 69° Overcast, foggy, cool light / 80°, Sunny, Hot, Humid light South wind in the morning - Southwest wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7:20	TMW5	<5 S	Zeroed	Calibrated
8:00	TMW5	<5 S	0.000	--
8:34	TMW5	<5 S	0.000	--
9:00	TMW5	<5 SW	0.000	--
9:25	TMW5	<5 SW	0.000	--
10:00	TMW5	<5 SW	0.000	--
10:35	TMW5	<5 SW	0.000	--
11:00	TMW5	<5 SW	0.000	--
11:30	TMW5	<5 SW	0.005	--
11:57	TMW5	<5 SW	0.000	--
12:30	TMW5	<5 SW	0.006	--

Recording Procedures/Remarks: The Dust Monitor was used along side a PID during drilling operations.

R2-0002311

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-8-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-8-08

Weather Conditions: 66° Sunny, Cool, light North wind in the morning / 74° Partly Cloudy, light rain, NE wind 5-10 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 30	TMW 5	<5 N	100 ppm	Calibrated
8 30	TMW 5	<5 N	0.0	- -
9 00	TMW 5	<5 N	0.0	- -
9 30	TMW 5	<5 N	0.0	- -
10 00	TMW 5	<5 N	0.0	- -
10 30	TMW 5	<5 N	0.0	- -
11 00	TMW 5	<5 N	0.0	- -
11 25	TMW 5	<5 N	0.0	- -
12 00	TMW 5	5-10 NE	0.0	- -
12 30	TMW 5	5-10 NE	0.0	- -
1 00	TMW 5	5-10 NE	0.0	- -
1 30	TMW 5	5-10 NE	0.0	- -
2 00	TMW 5	5-10 NE	0.0	- -

Recording Procedures/Remarks:

R2-0002312

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-11-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-11-08

Weather Conditions: 66° Sunny, Cool, No humidity / Heavy Rain, Thunder/lightning, cool, 70°
SE wind 5mph in the morning. / SE wind 5mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
746	TMW-5	5 SE	99.8ppm	Calibrated
830	TMW-5	5 SE	1.6ppm	--
900	TMW-5	5 SE	1.7ppm	--
930	TMW-5	5 SE	2.7ppm	--
1035	TMW-5	5 SE	0.0	--
1055	TMW-5	5 SE	0.0	--
1240	TMW-5	5 SE	0.0	--
130	TMW-5	5 SE	0.0	--

Recording Procedures/Remarks: _____

R2-0002313

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-12-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-12-08

Weather Conditions: 64° Sunny, Cool, light North wind in the morning. / 85° Partly Cloudy, cool, mild humidity NE wind 5-10 mph in the afternoon.

Time	Location	Wind Speed and Direction		Reading	Observations
7^40	TMW-5	5	N	100 ppm	Calibrated
7^45	TMW-5	5	N	0.0	--
7^55	TMW-5	5	N	1.3	--
8^30	TMW-5	5	N	3.6	--
8^50	TMW-5	5	N	2.3	--
9^15	TMW-5	5	N	2.7	--
9^45	TMW-5	5	N	4.2	--
10^10	TMW-5	5	N	0.0	--
10^30	TMW-5	5	N	2.3	--
10^45	TMW-5	5	N	0.0	--
10^55	TMW-5	5	N	0.5	--
11^30	TMW-5	5	N	3.0	--
12^00	TMW-5	5-10	NE	0.0	--
12^10	TMW-5	5-10	NE	0.4	--
12^40	TMW-5	5-10	NE	0.0	--
1^00	TMW-5	5-10	NE	0.0	--
1^30	TMW-5	5-10	NE	0.0	--
2^00	TMW-5	5-10	NE	0.0	--

Recording Procedures/Remarks:

R2-0002314

Dvirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-13-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-13-08

Weather Conditions: 67°, Cool, Sunny, low Humidity / 80°, Sunny, Hot, Humid
light North wind in the morning / N wind light in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7 45	TMW-5	5 N	100ppm	Calibrated
8 10	TMW-5	5 N	0.0	- -
8 30	TMW-5	5 N	0.0	- -
9 00	TMW-5	5 N	0.0	- -

Recording Procedures/Remarks:

R2-0002315

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-14-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photoval

Recorded by: Kevin Metkiff Calibration Date: _____

Weather Conditions: 71° Partly Cloudy, Cool, light North Wind in the Morning / 85° Sunny, Hot, Humid, Light NE wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
9:10	TMW-2	<5 N	100ppm	Calibrated
9:53	TMW-2	<5 N	0.0	--
10:26	TMW-2	<5 N	0.0	--
11:00	TMW-2	<5 N	0.0	--
11:28	TMW-2	<5 N	0.0	--
11:54	TMW-2	<5 N	0.0	--

Recording Procedures/Remarks: The PID was used along side a Dust Monitor during drilling.

D&B_AMF/kb

Rev. 03/09/98

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-14-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02

Instrument: MIE pDR1000AN

Recorded by: Kevin Metkiff

Calibration Date: 8-14-08

Weather Conditions: 71° Partly Cloudy, Cool, Light North wind in the morning / 85° Sunny, Hot, Humid, Light NE wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
9:10	TMW-2	<5 N	Zeroed	Calibrated
9:53	TMW-2	<5 N	0.001	--
10:26	TMW-2	<5 N	0.003	--
11:00	TMW-2	<5 N	0.000	--
11:28	TMW-2	<5 N	0.000	--
11:54	TMW-2	<5 N	0.050	--

Recording Procedures/Remarks: The dust Monitor was used along side a PID during drilling.

D&B_AMF/kb

Rev. 03/09/98

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-15-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-15-08

Weather Conditions: 67° Overcast, Cool, light N wind in the morning. / 80° Overcast Cool, Low Humidity N wind 5 mph in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7:50	TMW-2	<5 N	99.8 ppm	Calibrated
8:00	TMW-2	<5 N	0.0	--
8:30	TMW-2	<5 N	0.0	--
8:58	TMW-2	<5 N	0.0	--
9:30	TMW-2	<5 N	0.0	--
10:15	TMW-2	<5 N	0.0	--
10:30	TMW-2	<5 N	0.0	--
11:00	TMW-2	<5 N	0.0	--
11:30	TMW-2	<5 N	0.0	--
12:00	TMW-2	5 N	0.0	--
12:30	TMW-2	5 N	0.0	--
1:00	TMW-2	5 N	0.0	--

Recording Procedures/Remarks: PID was used during drilling operation.

R2-0002318

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-15-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR1000AN

Recorded by: Kevin Metkiff Calibration Date: 8-15-08

Weather Conditions: 67° Overcast, Cool, light N wind in the morning / 80° Overcast, Cool, Low Humidity, N wind 5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^47	TMW-2	<5 N	Zeroed	Calibrated
8^00	TMW-2	<5 N	0.000	--
8^30	TMW-2	<5 N	0.000	--
8^58	TMW-2	<5 N	0.000	--
9^30	TMW-2	<5 N	0.000	--
10^15	TMW-2	<5 N	0.000	--
10^30	TMW-2	<5 N	0.000	--
11^00	TMW-2	<5 N	0.000	--
11^36	TMW-2	<5 N	0.000	--
12^00	TMW-2	5 N	0.000	--
12^30	TMW-2	5 N	0.000	--
1^00	TMW-2	5 N	0.000	--

Recording Procedures/Remarks: Dust Monitor was located down wind from work zone.

R2-0002319

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: _____

AIR MONITORING FORM

Project Name: New Cassel Industrial Area
Project Number: 2564 Instrument: PID PE Photovac
Recorded by: Frank DeVita / Matt DeVinney Calibration Date: 8-18-08
Weather Conditions: 80-85°F, Sunny, hot, humid.

Time	Location	Wind Speed and Direction	Reading	Observations
8:05	TMW-2	10mph / SW	0.0	
8:35	↓	↓	0.0	
9:05			0.0	
9:35			0.0	
10:05			0.0	
10:35			0.0	
11:10			0.0	
11:40		↓	0.0	
12:10		15mph / SW	0.0	
12:40			0.0	
13:10			0.0	
13:40			0.0	
14:10			0.0	
14:40	↓	↓	0.0	

Recording Procedures/Remarks: PID was stationed alongside Horiba U-22 to monitor workspace during groundwater sampling.

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D'Appolonia and Bartilucci
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VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-19-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-19-08

Weather Conditions: 73° Sunny Cool, A bit Humidity NW wind 5 mph in the morning / 85° Sunny, Hot, Humid, light NW wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 35	TMW-2	5 NW	100ppm	Calibrated
8 00	TMW-2	5 NW	7.3	--
8 15	TMW-2	5 NW	14.3	--
8 35	TMW-2	5 NW	3.4	--
8 55	TMW-2	5 NW	0.5	--
9 15	TMW-2	5 NW	0.0	--
9 25	TMW-2	5 NW	0.0	--
9 50	TMW-2	5 NW	5.4	--
10 30	TMW-2	5 NW	0.0	--
11 00	TMW-2	5 NW	0.0	--
11 30	TMW-2	5 NW	0.0	--
12 00	TMW-2	5 NW	0.0	--
12 30	TMW-2	5 NW	0.0	--
1 00	TMW-2	5 NW	0.0	--
1 30	TMW-2	5 NW	0.0	--
2 00	TMW-2	5 NW	0.0	--
2 30	TMW-2	5 NW	0.0	--

Recording Procedures/Remarks: PID was used during Purging & Sampling

R2-0002321

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-20-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-20-08

Weather Conditions: 62° Sunny, Cool, No Humidity Light N wind in the morning / 80° Sunny, Hot, Humid, N wind 5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 47	TMW 2	<5 N	100ppm	Calibrated
8 05	TMW 2	<5 N	6.7ppm	--
8 15	TMW 2	<5 N	0.3	--
8 30	TMW 2	<5 N	0.0	--
9 05	TMW 2	<5 N	0.0	--
9 35	TMW 2	<5 N	0.0	--
10 00	TMW 2	<5 N	2.6	--
10 20	TMW 2	<5 N	0.0	--
11 00	TMW 2	<5 N	0.0	--
11 30	TMW 2	<5 N	0.0	--
12 00	TMW 2	5 N	0.0	--
12 30	TMW 2	5 N	0.0	--
1 00	TMW 2	5 N	0.0	--
1 30	TMW 2	5 N	0.0	--
2 00	TMW 2	5 N	0.0	--
2 30	TMW 2	5 N	0.0	--
				--

Recording Procedures/Remarks: The PID was used to detect vapors that may be present during purging and sampling.

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Rev. 03/09/98

R2-0002322

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-21-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-21-08

Weather Conditions: 62° Sunny, Cool, Still wind in the morning. / 80° Sunny, Cool, Light N wind no humidity in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7 30	TMW 2	—	100ppm	Calibrated
7 50	TMW 2	—	6.3	- -
8 10	TMW 2	—	1.4	- -
8 30	TMW 2	—	0.0	- -
8 50	TMW 2	—	0.0	- -
9 10	TMW 2	—	0.0	- -
9 30	TMW 2	—	0.0	- -
9 55	TMW 2	—	2.3	- -
10 30	TMW 2	—	2.0	- -
10 52	TMW 2	—	0.8	- -
11 10	TMW 2	—	0.0	- -

Recording Procedures/Remarks: A PID was used during pumping and sampling to detect the presence of vapors.

R2-0002323

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-22-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-22-08

Weather Conditions: 63° Sunny, Cool, No Humidity high ~~North~~ wind

Time	Location	Wind Speed and Direction	Reading	Observations
7 53	TMW-1	<5 N	100ppm	Calibrated
8 30	TMW-1	<5 N	0.0	--
9 01	TMW-1	<5 N	0.0	--
9 29	TMW-1	<5 N	0.0	--
10 14	TMW-1	<5 N	0.0	--
10 28	TMW-1	<5 N	0.0	--
10 46	TMW-1	<5 N	0.0	--

Recording Procedures/Remarks: PID was used alongside a Dust Monitor during drilling activities.

D&B_AMF/kb

Rev. 03/09/98

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-22-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area
Project Number: 2564-02 Instrument: MIE pDR 1000AN
Recorded by: Kevin Metkiff Calibration Date: 8-22-08
Weather Conditions: 63° Sunny, Cool, No Humidity, light North wind

Time	Location	Wind Speed and Direction	Reading	Observations
7^53	TMW-1	<5 N	Zeroed	Calibrated
8^30	TMW-1	<5 N	0.002	--
9^01	TMW-1	<5 N	0.007	--
9^21	TMW-1	<5 N	0.001	--
10^14	TMW-1	<5 N	0.000	--
10^28	TMW-1	<5 N	0.000	--
10^46	TMW-1	<5 N	0.004	--

Recording Procedures/Remarks: The miniram dust monitor was stationed down wind during drilling operations.

R2-0002325

and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-25-08

AIR MONITORING FORM

Project Name: New Castel Industrial Area

Project Number: 2564-02 Instrument: PID PhotoVac

Recorded by: Kevin Methoff Calibration Date: 8-25-08

Weather Conditions: 71° Sunny, Cool, Low Humidity / 80° Mostly cloudy, Hot, low Humidity
light N wind in the morning / light North wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7:40	TMW 1	5 N	100ppm	Calibrated
8:30			0.0	--
8:58				--
9:28				--
10:05				--
10:23				--
11:00				--
11:40				--
12:00				--
12:20				--
1:00				--
1:15				--

Recording Procedures/Remarks:

R2-0002326

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-25-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: MIE pDR 1000 AN

Recorded by: Kevin Metkiff Calibration Date: 8-25-08

Weather Conditions: 71° Sunny, Cool, low Humidity / 80° Mostly Clady, Hot, low Humidity light N wind in the morning / light North wind in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7 40	TMW-1	5 N	Zeroed	Calibrated
8 30			0.010	- -
8 58			0.004	- -
9 28			0.000	- -
10 05			0.009	- -
10 23			0.010	- -
11 00			0.024	- -
11 40			0.008	- -
12 00			0.030	- -
12 20			0.029	- -
1 00			0.029	- -
1 15			0.033	- -

Recording Procedures/Remarks:

R2-0002327

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-26-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-26-08

Weather Conditions: 60° Sunny, Cool, No Humidity, North wind 5 mph in the morning / 84° Sunny, Hot, Humid North wind 5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^40	TMW 1	5 N	99.0 ppm	Calibrated
8^25	TMW 1	5 N	0.0	- -
8^51	TMW 1	5 N	2.7	- -
9^04	TMW 1	5 N	5.5	- -
9^17	TMW 1	5 N	9.9	- -
9^43	TMW 1	5 N	7.2	- -
10^15	TMW 1	5 N	8.4	- -
10^35	TMW 1	5 N	1.5	- -
11^53	TMW 1	5 N	0.0	- -
12^07	TMW 1	5 N	0.0	- -
12^27	TMW 1	5 N	0.6	- -
12^47	TMW 1	5 N	2.2	- -
13^07	TMW 1	5 N	1.5	- -
13^27	TMW 1	5 N	2.7	- -
13^47	TMW 1	5 N	2.2	- -
14^07	TMW 1	5 N	3.0	- -
			2.0	- -

Recording Procedures/Remarks: PID was used during purging and sampling to detect the presence of vapors.

R2-0002328

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-27-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2584-02 Instrument: PID RaeRotovac

Recorded by: Kevin Metkiff Calibration Date: 8-27-08

Weather Conditions: 62° Sunny, Cool, No Humidity, North wind 5mph in the morning / 85° Sunny, Hot, Humid, NE wind 5mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^45	TMW-1	5 N	100 ppm	Calibrated
8^05	TMW-1	5 N	7.3	--
9^25	TMW-1	5 N	0.0	--
9^45	TMW-1	5 N	1.9	--
10^05	TMW-1	5 N	2.5	--
10^25	TMW-1	5 N	8.9	--
10^45	TMW-1	5 N	7.2	--
11^05	TMW-1	5 N	11.6	--
11^45	TMW-1	5N	24.2	--
12^05	TMW-1	5N	47.2	--
12^25	TMW-1	5N	36.1	--
12^35	TMW-1	5 NE	37	--
12^55	TMW-1	5NE	37.1	--
1^15	TMW-1	5 NE	8.7	--
1^35	TMW-1	5 NE	2.3	--
1^55	TMW-1	5NE	3.5	--
2^15	TMW-1	5NE	4.4	--
2^35	TMW-1	5NE	2.1	--

Recording Procedures/Remarks: PID was used during purging and sampling activities to detect any vapors that might be present.

R2-0002329

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-27-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-27-08

Weather Conditions: 62° Sunny, Cool, no humidity, north wind 5 mph in the morning / 85° Sunny, Hot, Humid, NE wind 5 mph in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
2^55	TMW-1	5 NE	2.0	--
3^15	TMW-1	5 NE	0.1	--
3^35	TMW-1	5 NE	0.9	--

Recording Procedures/Remarks:

R2-0002330

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-28-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-28-08

Weather Conditions: 62° Sunny, Cool, No Humidity North / 80° Sunny, Mild, low humidity
wind 5mph in the morning light SW wind in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7 35	TMW 1	5 N	100ppm	Calibrated.
8 00			16.8	--
8 05			12.3	
8 10			10.1	
8 15			0.0	
9 00			0.0	
9 30			0.0	
10 00			0.0	
10 40			7.7	
11 00			0.0	
11 40			0.0	
12 00		5 SW	0.0	
12 30			0.0	
1 00			0.0	
1 30			0.0	
2 00			0.0	
2 30			0.0	

Recording Procedures/Remarks: PID was used during purging and sampling to detect the presence of any possible vapors.

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Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 8-29-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 8-29-08

Weather Conditions: 66° Sunny, Cool, no humidity light North wind in the morning / 80° Sunny, Hot, Humid wind is 5mph out of the SE in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^55	TMW-1	5 N	100ppm	Calibrated
8^05	TMW-1	5 N	0.0	- -
8^35	TMW-1	5 N	0.0	- -
8^45	TMW-1	5 N	0.0	- -
9^35	TMW-1	5 N	0.0	- -
10^05	TMW-1	5 N	0.0	- -
10^45	TMW-1	5 N	0.0	- -
11^10	TMW-1	5 N	0.0	- -
11^34	TMW-1	5 N	0.0	- -
11^42	TMW-1	5 N	0.0	- -
12^05	TMW-1	5 SE	0.0	- -
12^30	TMW-1	5 SE	0.0	- -
12^45	TMW-1	5 SE	0.0	- -

Recording Procedures/Remarks: A PID was used during purging & sampling to detect any vapors that may be present.

R2-0002332

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-1-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area
Project Number: 2564-02 Instrument: PID RE Photovac
Recorded by: Kevin Methiff Calibration Date: 10-1-08
Weather Conditions: 65° Partly Cloudy, Cool, N wind <5 mph

Time	Location	Wind Speed and Direction	Reading	Observations
7[10]	TMW 3D	N <5	100ppm	Calibrated
8[27]	TMW 3D	N <5	0.0	--
10[38]	TMW 3D	N <5	0.0	--
12[49]	TMW 3D	N<5	0.0	--
2[08]	TMW 3D	N<5	0.0	--

Recording Procedures/Remarks:

R2-0002333

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-2-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Methiff Calibration Date: 10-2-08

Weather Conditions: 55° Sunny and Cool. Light west wind

Time	Location	Wind Speed and Direction	Reading	Observations
7^10	TMW 3D	W <5	100ppm	Calibrated
8^37	TMW 3D	W <5	0.0	--
10^20	TMW 3D	W <5	0.0	--
11^55	TMW 3D	W <5	0.0	--
12^53	TMW 3D	W <5	0.0	--

Recording Procedures/Remarks:

R2-0002334

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-3-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PeRhotovac 2020

Recorded by: Kevin Metkiff Calibration Date: 10-3-08

Weather Conditions: 54° Partly Cloudy, cool, light West wind in the morning / 65° Overcast, Cool, South West wind around 10mph in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7^15	TMW 31	W <5	100ppm	Calibrated
10^32	TMW 31	W <5	0.0	--
12^20	TMW 31	W <5	0.0	--

Recording Procedures/Remarks:

R2-0002335

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·6·08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PetRotorac 2020

Recorded by: Kevin Mettiff Calibration Date: 10·6·08

Weather Conditions: 53° Partly Cloudy, Cool, light NE / 66° Sunny, Warm with NE winds 5-10 mph in the morning winds 5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^10	TMW 3D	NE 5-10	100ppm	Calibrated
8^16	TMW 3D	NE 5-10	0.0	--
9^41	TMW 3D	NE 5-10	0.0	--
11^30	TMW 3D	NE 5-10	0.0	--
12^35	TMW 3D	NE <5	0.0	--
2^25	TMW 3D	NE <5	0.0	--

Recording Procedures/Remarks:

R2-0002336

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·7·08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac

Recorded by: Kevin Mettkiff Calibration Date: 10.7.08

Weather Conditions: 46° Sunny, Cold, light NE wind in the morning / 65° Sunny, Mild, NE wind <5 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7⁰⁵	TMW 3D	NE <5	100 ppm	Calibrated
8⁰⁵	TMW 3D	NE <5	0.1	--
8²⁸	TMW3D	NE <5	0.0	--
8⁵⁴	TMW3D	NE <5	0.0	--
9¹⁰	TMW3D	NE <5	0.0	--
10⁴⁰	TMW3D	NE <5	0.0	--
11³³	TMW3D	NE <5	0.0	--
11⁵⁷	TMW3D	NE <5	0.0	--
1¹⁰	TMW3D	NE <5	0.0	--
1⁵³	TMW3D	NE <5	0.0	--

Recording Procedures/Remarks: _____

R2-0002337

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·8·08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RE Photovac

Recorded by: Kevin Metkiff Calibration Date: 10·8·08

Weather Conditions: 65° Sunny, Mild, Light NE wind.

Time	Location	Wind Speed and Direction	Reading	Observations
7^15	TMW 3D	NE <5	100ppm	Calibrated
10^57	TMW 3D	NE <5	100ppm	Re-calibrated-technical difficulty.
11^15	TMW 3D	NE <5	0.0	--
11^35	TMW 3D	NE <5	0.0	--
11^55	TMW 3D	NE <5	0.3	--
1^45	TMW 3D	NE <5	0.0	--

Recording Procedures/Remarks:

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R2-0002338

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.9.08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564.02 Instrument: PID PE Photovac

Recorded by: Kevin Methoff Calibration Date: 10.9.08

Weather Conditions: 65° Overcast, Cool, light rain, W wind <5 mph in the morning / 75° Sunny, Warm, West wind 5mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^40	TMW 3D	W <5	99.8 ppm	Calibrated
8^36	TMW 3D	W <5	0.0	--
11^43	TMW 3D	W <5	0.0	--
1^36	TMW 3D	W 5	0.0	--
1^50	TMW 3D	W 5	0.0	--

Recording Procedures/Remarks:

R2-0002339

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.10.08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RaePhotovac

Recorded by: Kevin Metkoff Calibration Date: 10.10.08

Weather Conditions: 55° Dark, cool, light West wind in the morning / 72° Sunny, Hot, Light NW wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7^15	TMW 3D	W <5	100ppm	Calibrated
8^32	TMW 3D	W <5	0.0	--
10^35	TMW 3D	W <5	0.0	--
12^50	TMW 3D	W <5	0.0	--
1^25	TMW 3D	NW <5	0.0	--

Recording Procedures/Remarks:

R2-0002340

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10·11·08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564.02 Instrument: PID RaePhotovac

Recorded by: Kevin Metkiff Calibration Date: 10·11·08

Weather Conditions: 55° Sunny, Cool, light NW wind in the morning / 72° Sunny, Warm, light NW wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 30	TMW 3D	NW <5	100 ppm	Calibrated
8 10	TMW 3D	NW <5	0.0	--
8 40	TMW-3D	NW <5	0.0	--
10 10	TMW-3D	NW <5	0.0	--
12 10	TMW-3D	NW <5	0.0	--
1 50	TMW-3D	NW <5	0.0	--
2 12	TMW-3D	NW <5	0.0	--

Recording Procedures/Remarks:

R2-0002341

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10-30-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PE Photovac 2020

Recorded by: Kevin Metkiff Calibration Date: 10-30-08

Weather Conditions: 38° dark, cold, light WSW wind in the morning / 46° Sunny, Cool, N wind 10-15mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7:16	TMW 8D	0-5 WNW	99.8	Calibrated
8:53	TMW 8D	0-5 WNW	0.0	--
9:07	TMW 8D	0-5 WNW	0.0	--
10:36	TMW 8D	0-5 WNW	0.0	--
12:05	TMW 8D	10-15 N	0.0	--
1:23	TMW 8D	10-15 N	0.0	--

Recording Procedures/Remarks:

R2-0002342

Dvirka and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 10.31.08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564.02 Instrument: PID RE Photovac 2020

Recorded by: Kevin Metkiff Calibration Date: 10.31.08

Weather Conditions: 33° Dark, Cold, light NW wind in the morning / 55° Sunny, Mild, west wind 5-10 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
9 15	TMW 8D	0-5 NW	100 ppm	Calibrated
9 38	TMW 8D	0-5 NW	0.0	--
10 06	TMW 8D	0-5 NW	0.0	--
11 30	TMW 8D	0 5 NW	0.0	--
12 00	TMW 8D	5-10 W	0.0	--
12 48	TMW 8D	5-10 W	0.0	--
2 35	TMW 8D	5-10 W	0.0	--

Recording Procedures/Remarks:

D&B_AMF/kb

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DVirka and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/3/08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PePhotovac 2020

Recorded by: Matt DeVinney Calibration Date: 11/3/08

Weather Conditions: 47°, Sunny, Cool - Am / 55, Cloudy - PM

Time	Location	Wind Speed and Direction	Reading	Observations
7:40	TMW-8D	ESE 5	99.8 ppm	Calibrated
9:05	TMW-8D	ESE 5	0 ppm	--
9:20	TMW-8D	ESE 5	0 ppm	--
9:40	TMW-8D	S 5-10	0 ppm	--
11:15	TMW-8D	S 10	0 ppm	--
14:00	TMW-8D	S 10	0 ppm	--
				--

Recording Procedures/Remarks:

D&B_AMF/kb Rev. 03/09/98

R2-0002344

D'APPOLONIA and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11/4/08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID PePhotovac

Recorded by: MattDeVinney Calibration Date: 11/4/08

Weather Conditions: 50°F, cloudy, fog, breezy am / 65°, cloudy, breezy pm

Time	Location	Wind Speed and Direction	Reading	Observations
8^{45}	TMW-8D	SSE 5-10	100 ppm	Calibrated
9^{55}	TMW-8D	SSE 5-10	0 ppm	--
10^{35}	TMW-8D	SSE 5-10	0 ppm	--
11^{15}	TMW-8D	SSE 5-10	0 ppm	--
12^{40}	TMW-8D	SE 0-5	0.1 ppm	--
12^{55}	TMW-8D	SE 0-5	0.0 ppm	--
14^{40}	TMW-8D	SE 0-5	0.0 ppm	--

Recording Procedures/Remarks:

R2-0002345

D'APPOLONIA and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.6.08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564.02 Instrument: PID PE Photovac

Recorded by: Kevin Metkiff Calibration Date: 11.6.08

Weather Conditions: 61° Overcast, Cool, E wind 5mph / 63° Overcast, Cool, light showers, NNE wind in the morning 5-10 mph in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
8 30	TMW 8D	E 5	100ppm	Calibrated
9 34	TMW 8D	E 5	0.0	--
				*Last reading taken on this day due to rain.

Recording Procedures/Remarks:

D&B_AMF/kb

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R2-0002346

D'Appolonia and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·7·08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564.02 Instrument: PID PE Photovac 2020

Recorded by: Kevin Metcalf Calibration Date: 11·7·08

Weather Conditions: 58° Overcast, mild, light ENE wind in the morning / 65° Overcast, mild, light ENE wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
7 25	TMW 8D	ENE < 5	100ppm	Calibrated
8 15	TMW 8D	ENE < 5	0.0	--
9 20	TMW 8D	ENE < 5	0.0	--
9 50	TMW 8D	ENE < 5	0.0	--
11 15	TMW 8D	ENE < 5	0.0	--
12 55	TMW 8D	ENE < 5	0.0	--

Recording Procedures/Remarks:

D&B_AMF/kb

Rev. 03/09/98

D'APPOLONIA and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.10.08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564.02 Instrument: PID RE Photovac 2020

Recorded by: Kevin Methiff Calibration Date: 11.10.08

Weather Conditions: 46° Sunny, Cool, WNW wind 5-10 mph in the morning / 55° Sunny, Mild, NW wind 10 mph in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
8^05	TMW 8D	WNW 5-10	100ppm	Calibrated
8^25	TMW 8D	WNW 5-10	0.0	--
9^28	TMW 8D	WNW 5-10	0.0	--
11^10	TMW 8D	WNW 5-10	0.0	--
12^55	TMW 8D	WNW 5-10	0.0	--
2^02	TMW 8D	NW 10	0.0	--
3^01	TMW 8D	NW 10	0.0	--

Recording Procedures/Remarks:

R2-0002348

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.11.08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564.02 Instrument: PID RaeMotorac 2020

Recorded by: Kevin Metkiff Calibration Date: 11.11.08

Weather Conditions: 38° Sunny, Cold, light NW wind in the morning / 50° Sunny, Mild, N wind 5-10mph in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
8^00	TMW 81	NW < 5	100ppm	Calibrated
9^00	TMW 81	NW < 5	0.0	--
10^36	TMW 81	NW < 5	0.0	--
12^03	TMW 81	NW < 5	0.0	--
1^38	TMW 81	N 5-10	0.0	--
2^15	TMW 81	N 5-10	0.0	--

Recording Procedures/Remarks:

D&B_AMF/kb

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D'APPOLONIA and Bartilucci
CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11·12·08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564-02 Instrument: PID RaePhotovac 2020

Recorded by: Kevin Metkiff Calibration Date: 11·12·08

Weather Conditions: 37° Sunny, Cold, still wind in the morning / 50° Sunny, Mild, NE wind 5mph in the afternoon

Time	Location	Wind Speed and Direction	Reading	Observations
7^53	TMW 8D	still wind	98.8	calibrated
8^30	TMW 8D	still wind	0.0	--
9^04	TMW 8D	still wind	0.0	--
10^10	TMW 8D	still wind	0.0	--
11^43	TMW 8D	still wind	0.0	--
12^00	TMW 8D	5 NE	0.0	--
12^24	TMW 8D	5 NE	0.0	--
1^20	TMW 8D	5 NE	0.0	--
2^20	TMW 8D	5 NE	0.0	--

Recording Procedures/Remarks:

R2-0002350

Dvirka and Bartilucci CONSULTING ENGINEERS
VISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11-13-08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564.02 Instrument: PID RE Photovac 2020

Recorded by: Kevin Metkiff Calibration Date: 11-13-08

Weather Conditions: 53° Overcast, Mild, light SE wind / 53° Overcast, light rain, Snow in the morning.

Time	Location	Wind Speed and Direction	Reading	Observations
7^55	TMW 81	SE 5	98.8 ppm	Calibrated
8^03	TMW 81	SE 5	0.0	--
9^20	TMW 81	SE 5	0.0	--
9^35	TMW 81	SE 5	0.0	--
10^58	TMW 81	SE 5	0.0	--
				*After this reading the PID was shut down due to rain.

Recording Procedures/Remarks:

D&B_AMF/kb

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D'Appolonia and Bartilucci
CONSULTING ENGINEERS
A DIVISION OF WILLIAM F. COSULICH ASSOCIATES, P.C.

Date: 11.14.08

AIR MONITORING FORM

Project Name: New Cassel Industrial Area

Project Number: 2564.02 Instrument: PID RE Photovac 2020

Recorded by: Kevin Methoff Calibration Date: 11.14.08

Weather Conditions: 55° Overcast, Fog, mild, still wind in the morning. / 60° Partly Cloudy, Mild, still wind in the afternoon.

Time	Location	Wind Speed and Direction	Reading	Observations
8^00	TMW 8D	--	100ppm	Calibrated
8^31	TMW 8D	--	0.0	--
9^40	TMW 8D	--	0.0	--
10^16	TMW 8D	--	0.0	--
11^15	TMW 8D	--	0.0	--
12^05	TMW 8D	--	0.0	--
1^10	TMW 8D	--	0.0	--

Recording Procedures/Remarks:

D&B_AMF/kb

Rev. 03/09/98

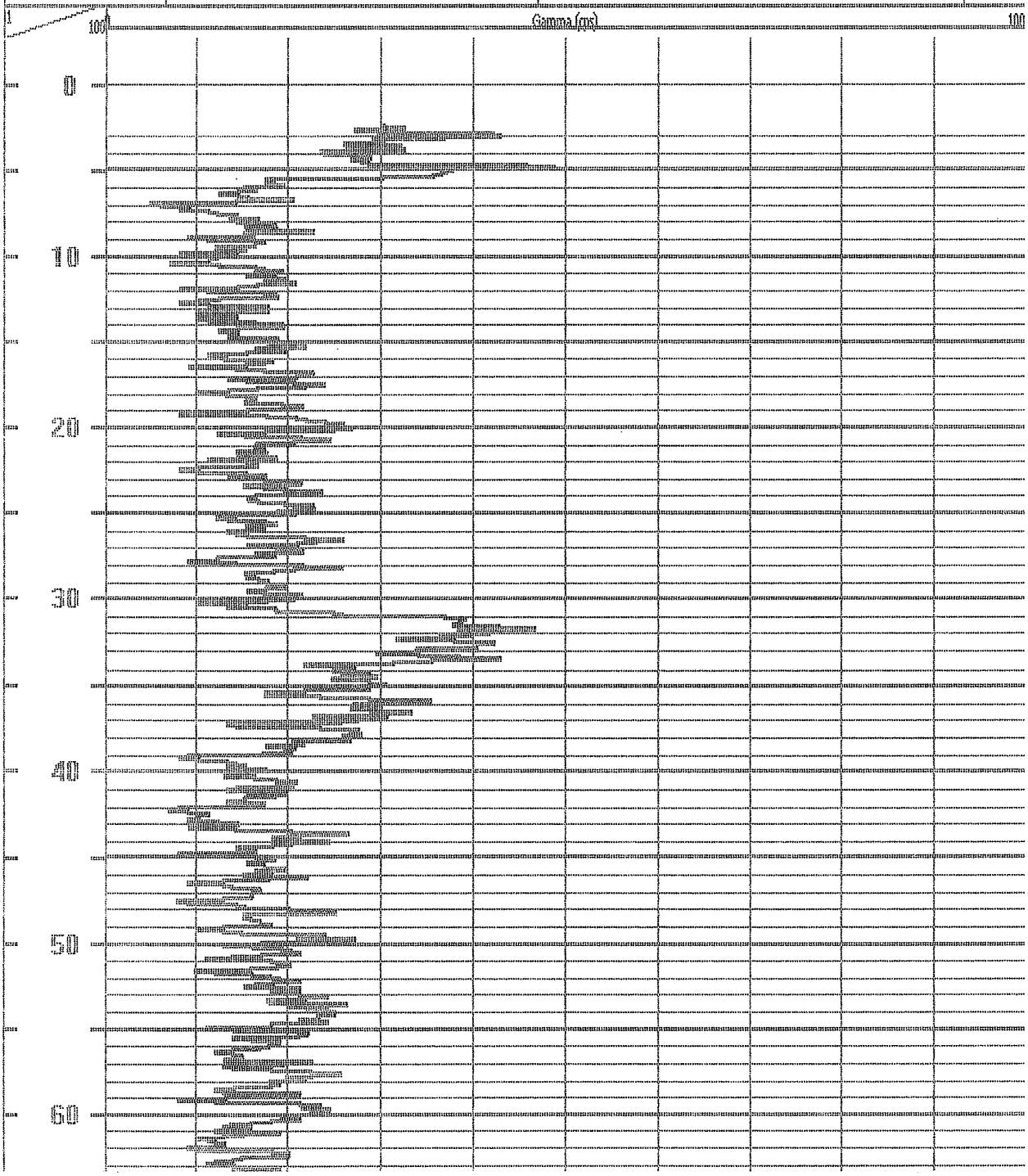
APPENDIX H

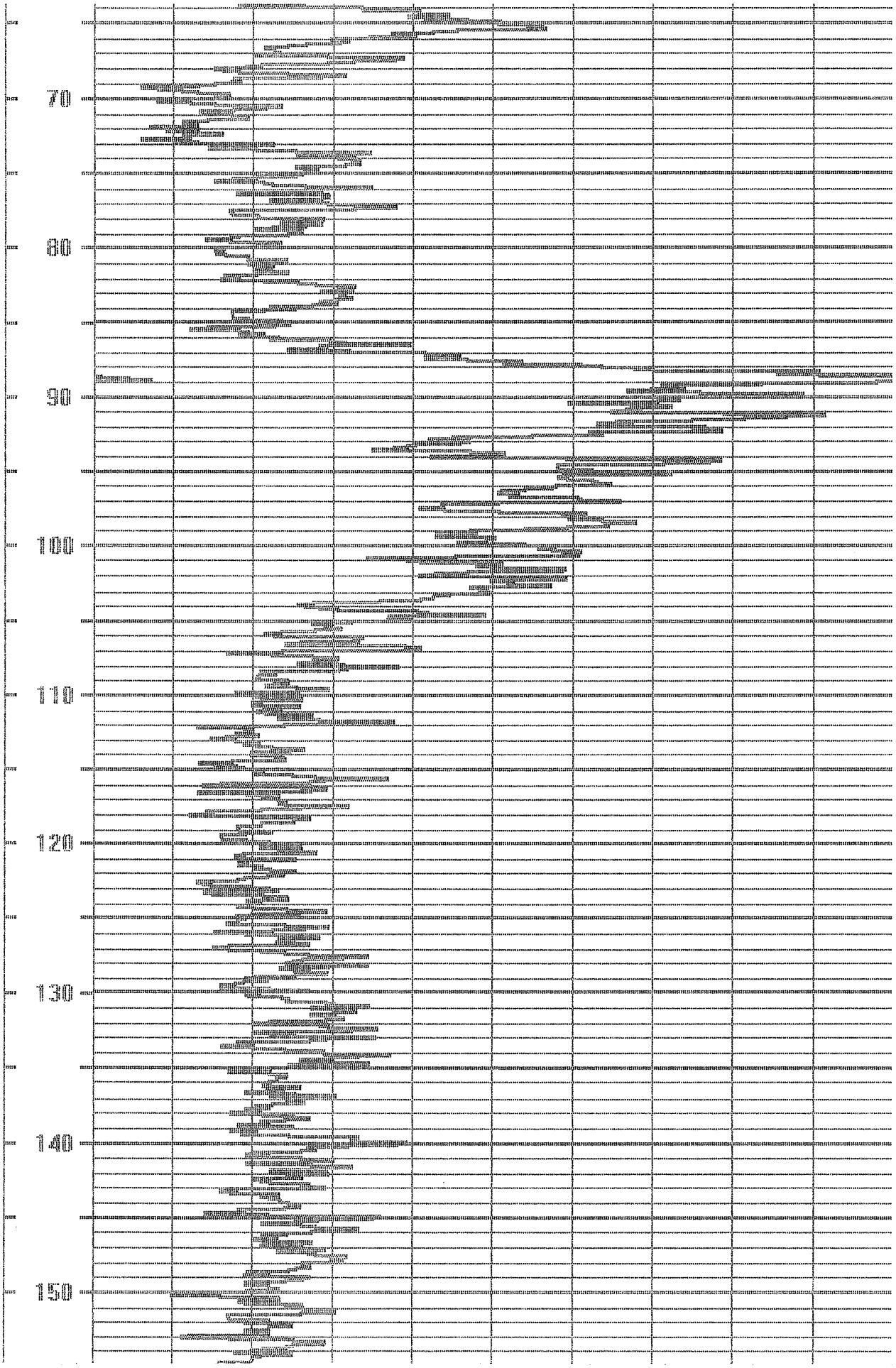
GAMMA LOGS

GAMMA LOGS WHILE PROBE WAS BEING LOWERED INTO THE BOREHOLE

Date: Monday, August 25, 2008 Time: 14:27 File: C:\My Documents\698\TMW01.rd

	COMPANY: DELTA WELL & PUMP CO., INC.		Casing
	Location: NCIA BROMTON DRIVE		
Well: YMW-01		Depth Driller:	
		Depth Logger:	
Date: 08-25-08	BH Fluid:	Logged by: Chris Okon	
File Name: 698		Witness: KEVIN	

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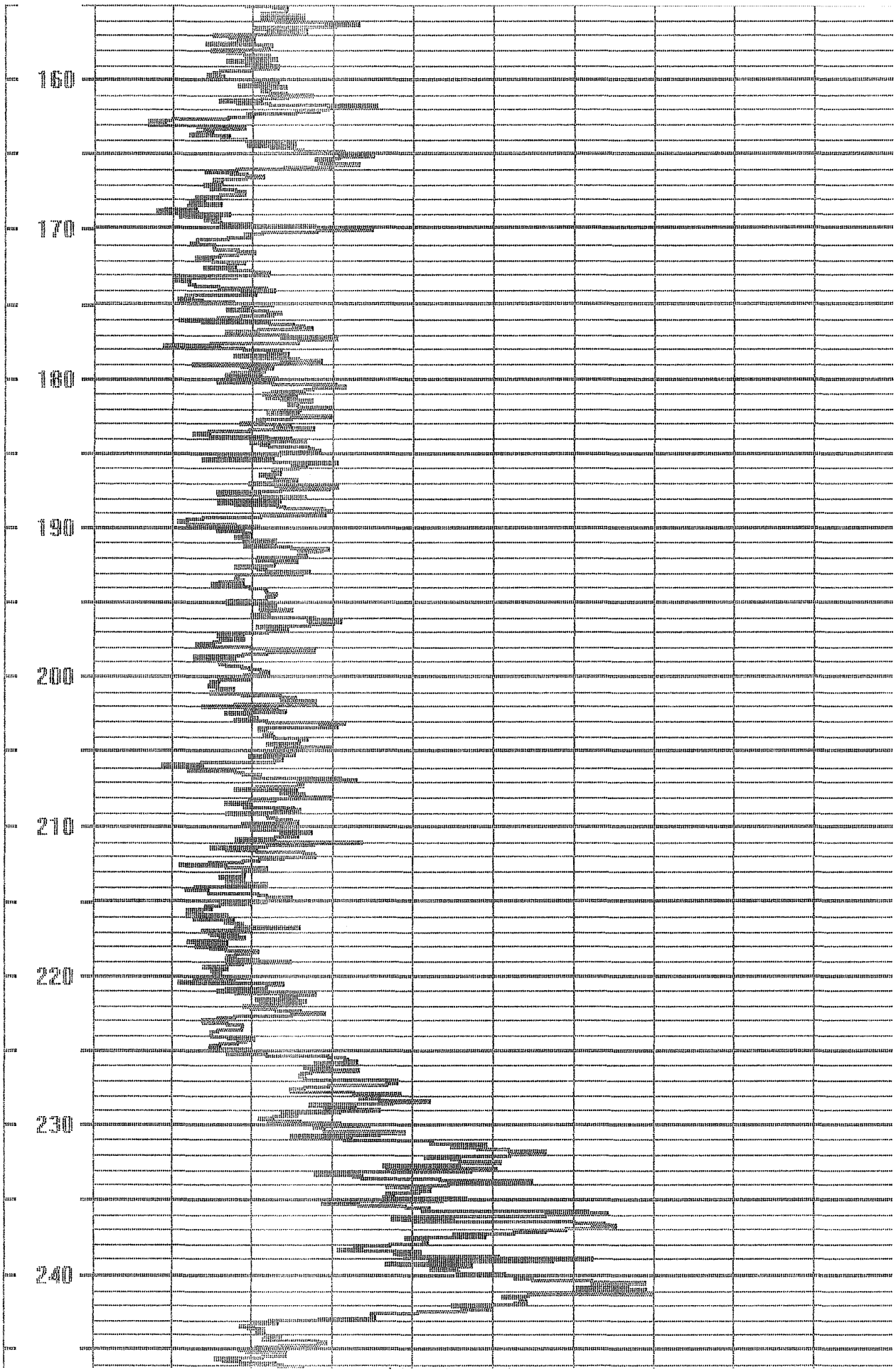
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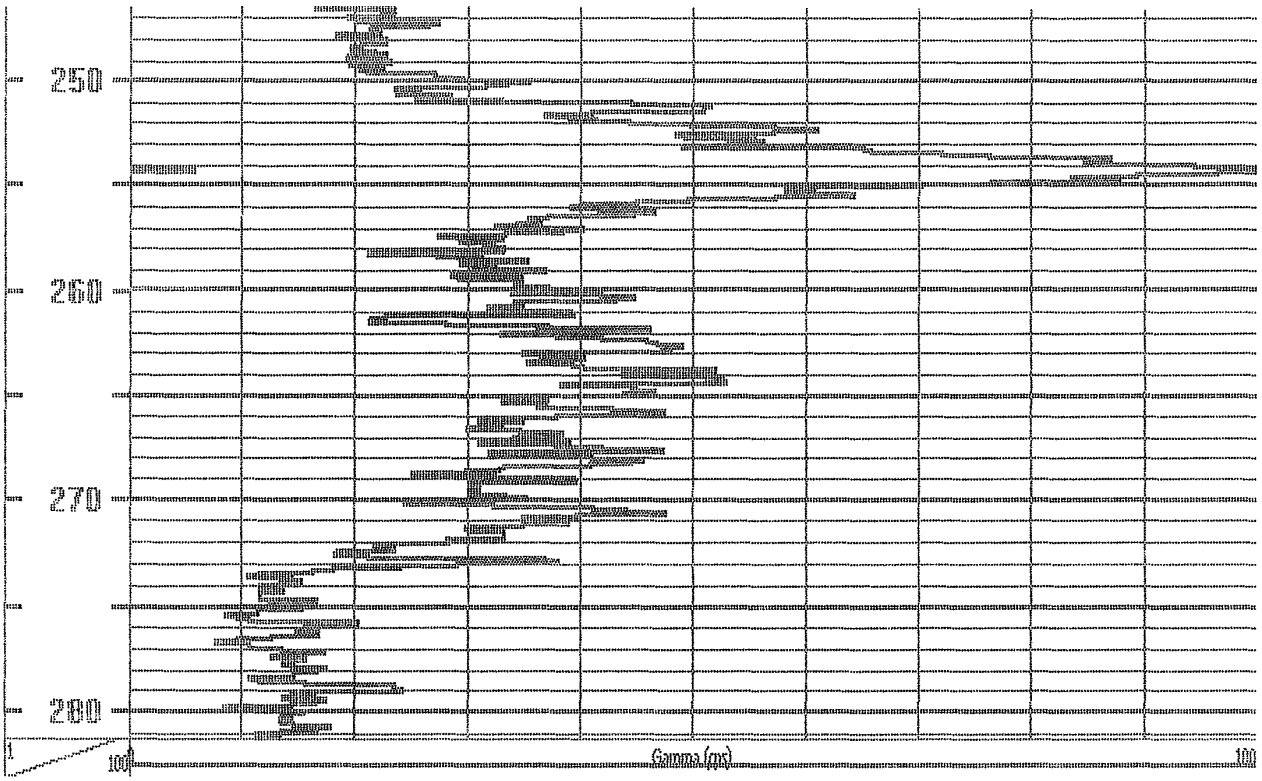
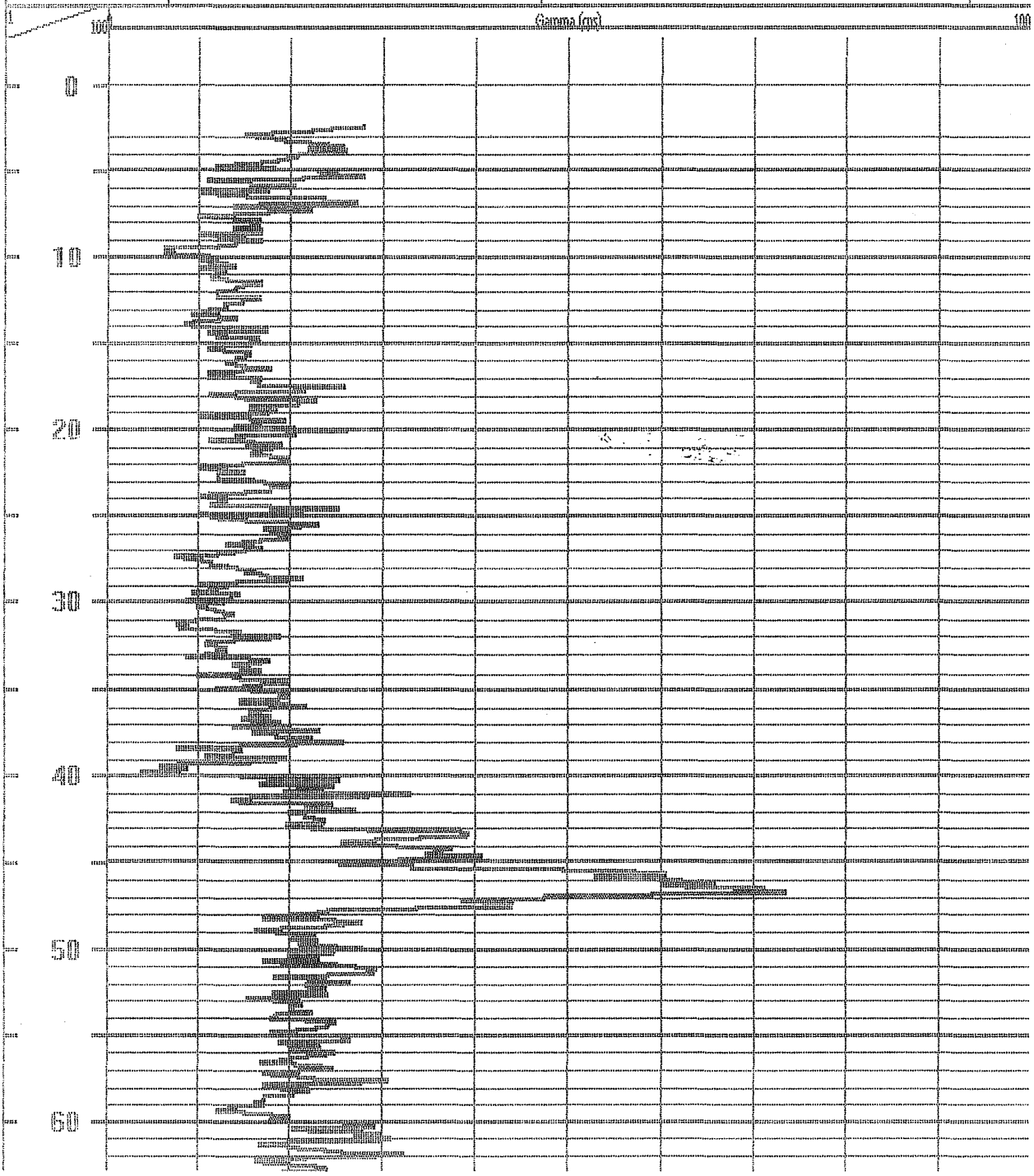


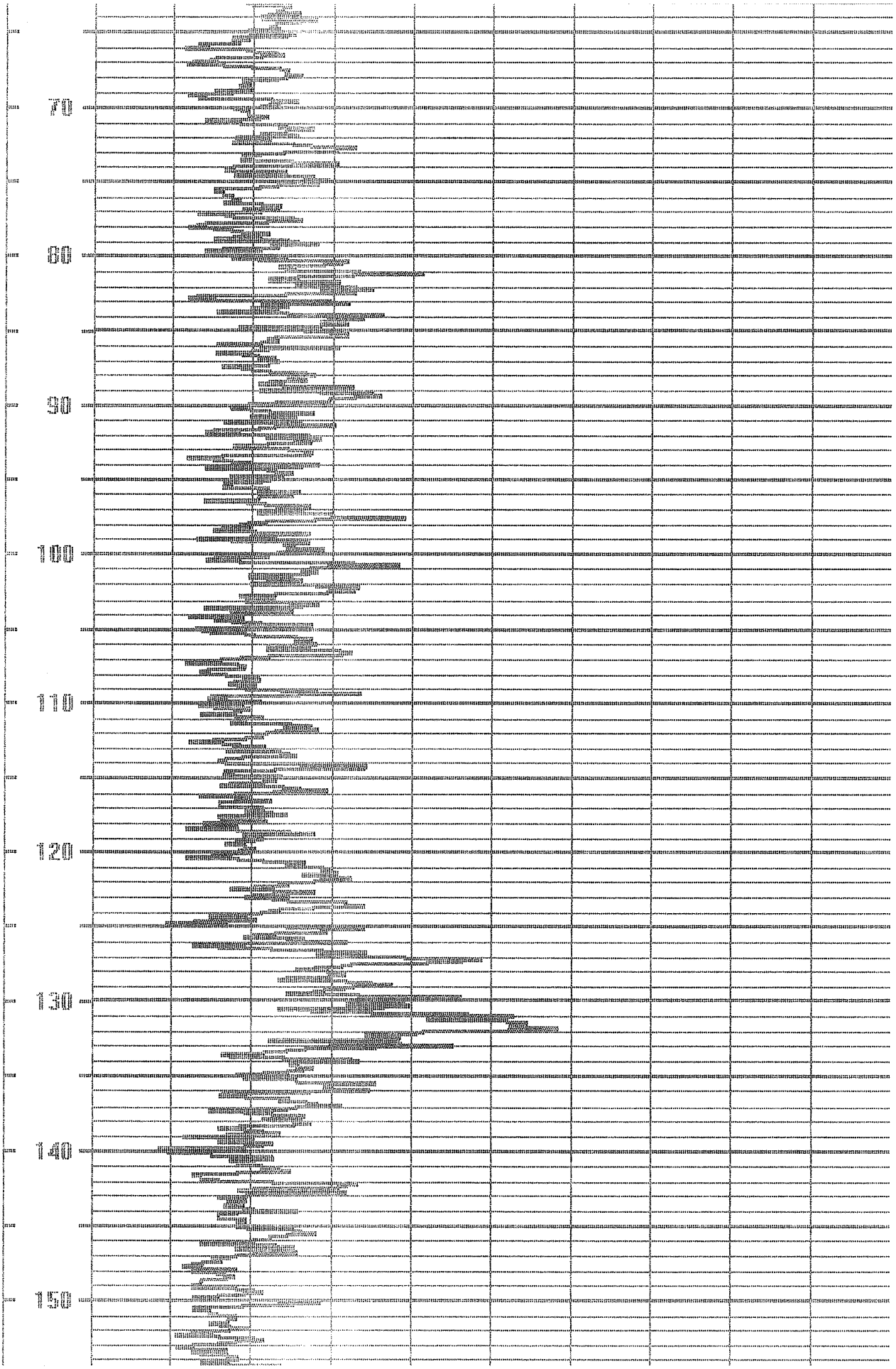
Date: Monday, August 25, 2008 Time: 14:27 File: C:\My Documents\698\TMW01.rd

Date: Friday, August 15, 2008 Time: 14:18 File: C:\My Documents\698\TMW02.xl

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: NCIA HOWARD DRIVE	

Well	TMW02.			Depth Driller	
				Depth Logger	
Date	08-15-08	BH Fluid		Logged by:	Chris Okon
File Name	698			Witness:	KEVIN

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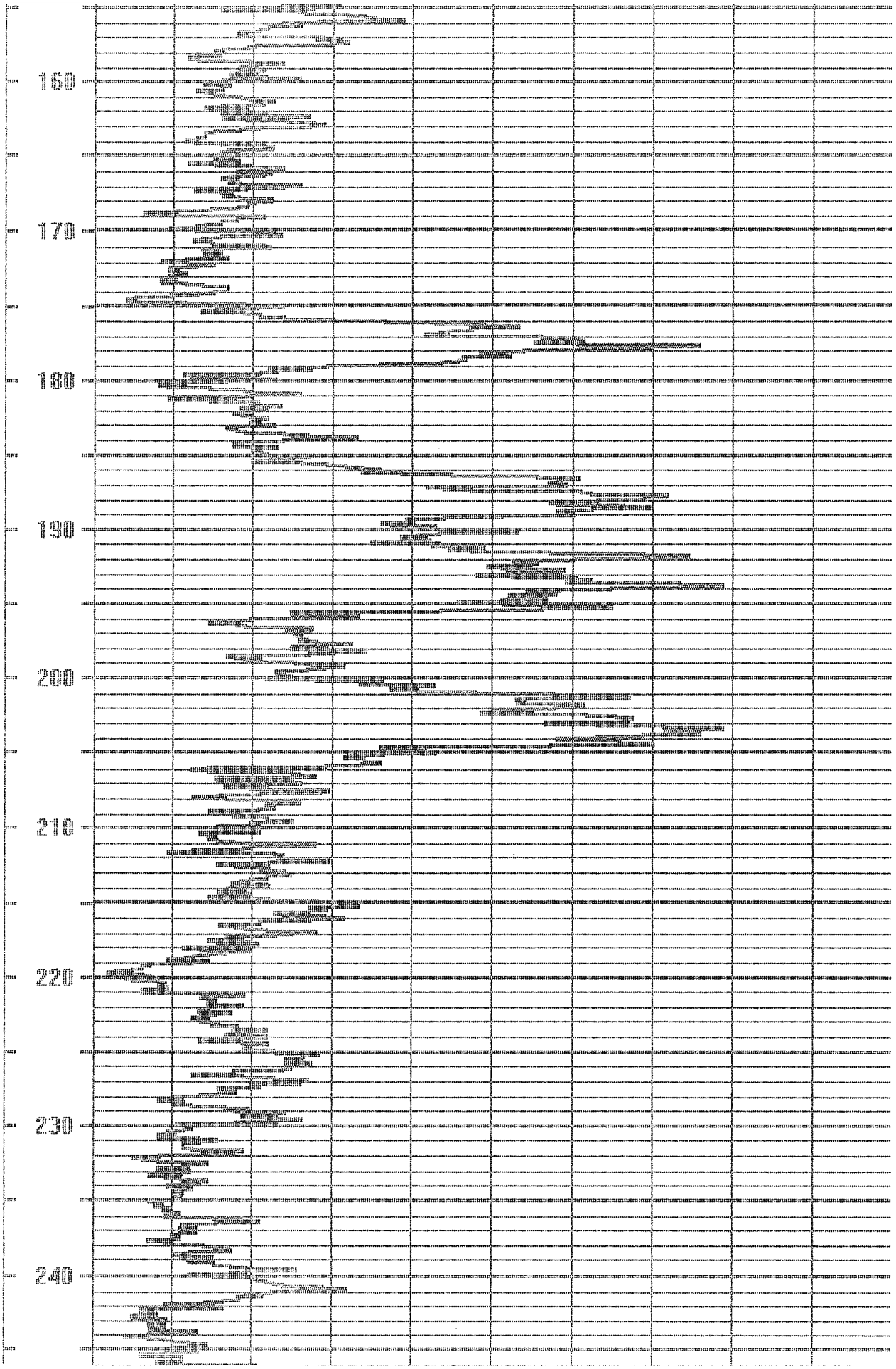
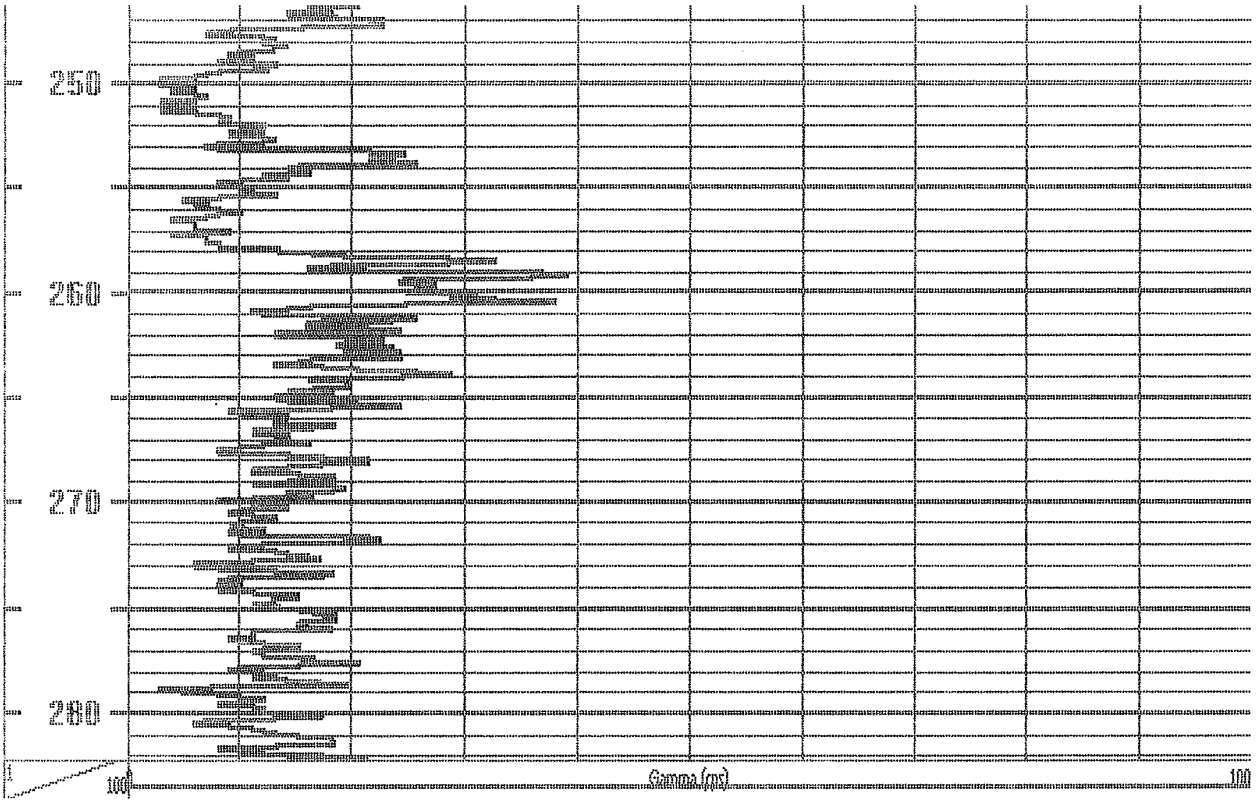


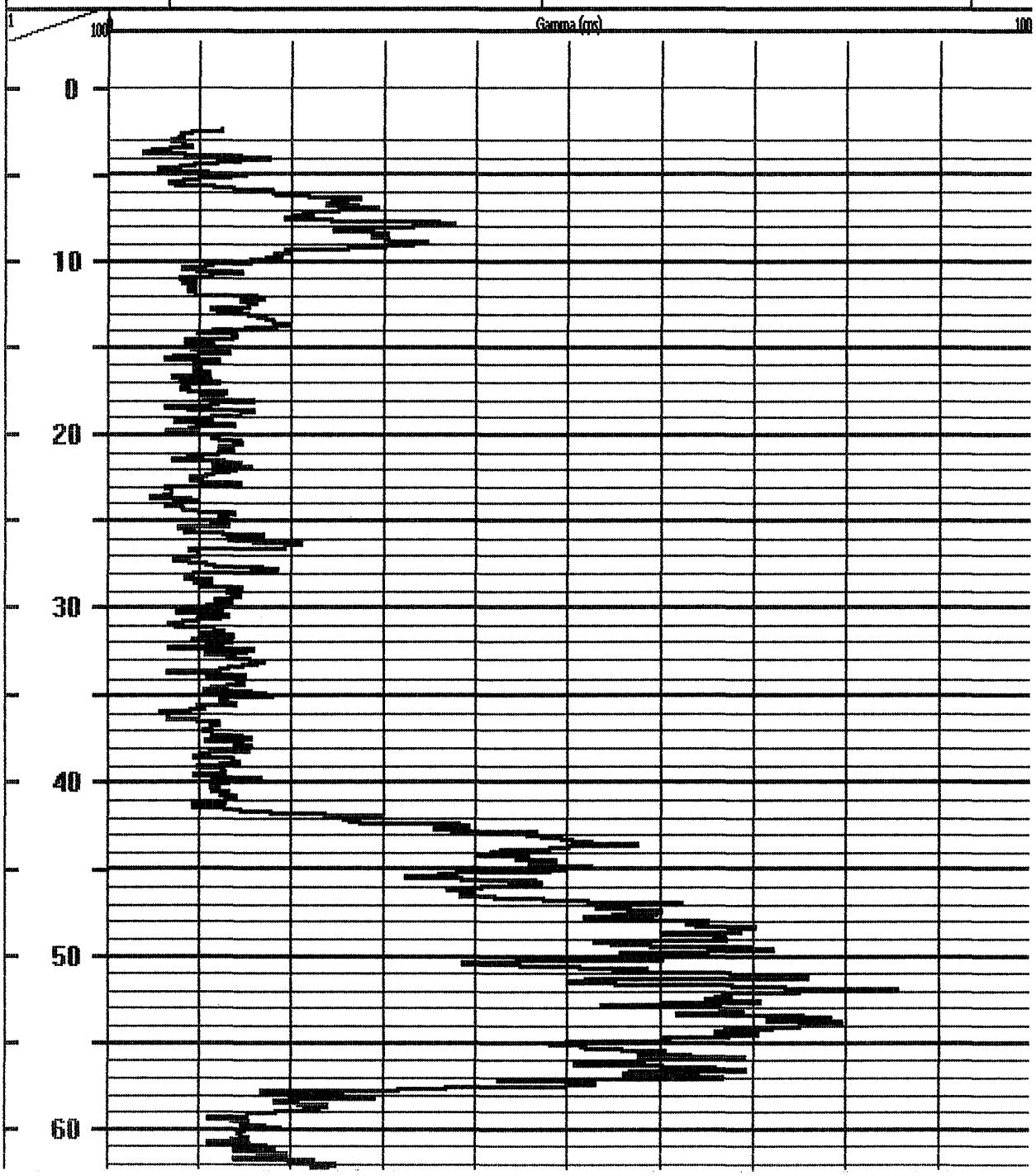
R2-0002363

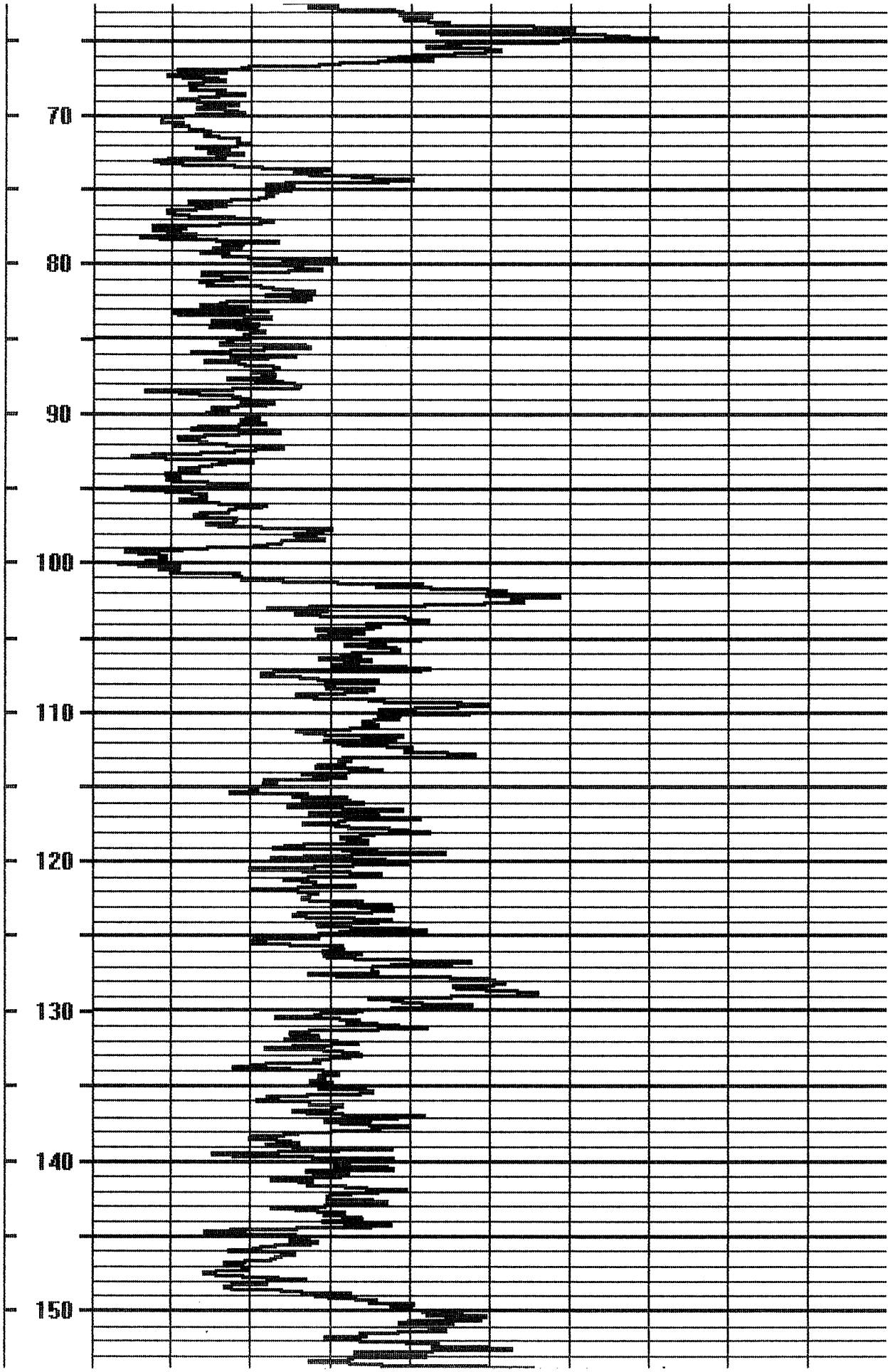


Date: Friday, August 15, 2008 Time: 14:18 File: C:\My Documents\699\TMW02.rd

Date: Monday, October 13, 2008 Time: 09:02 File: C:\My Documents\698\TMW03D.rd

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: NCIA BERNARD DRIVE	
Well: TMW-03D	Depth Driller / Depth Logger:	
Date: 10-13-08	BH Fluid:	Logged by: Chris Okon
File Name: 698		Witness: Kevin Melkiff

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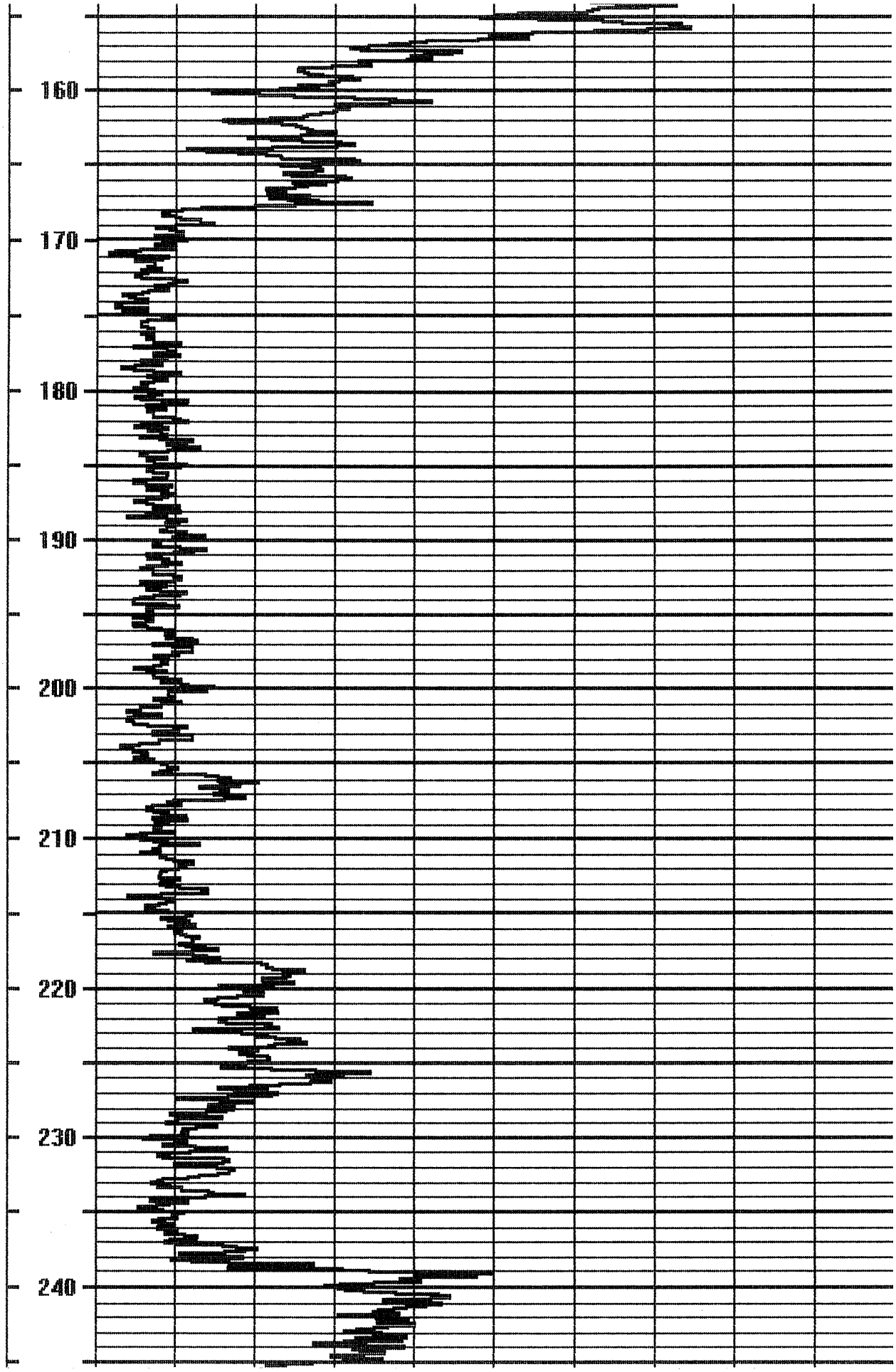
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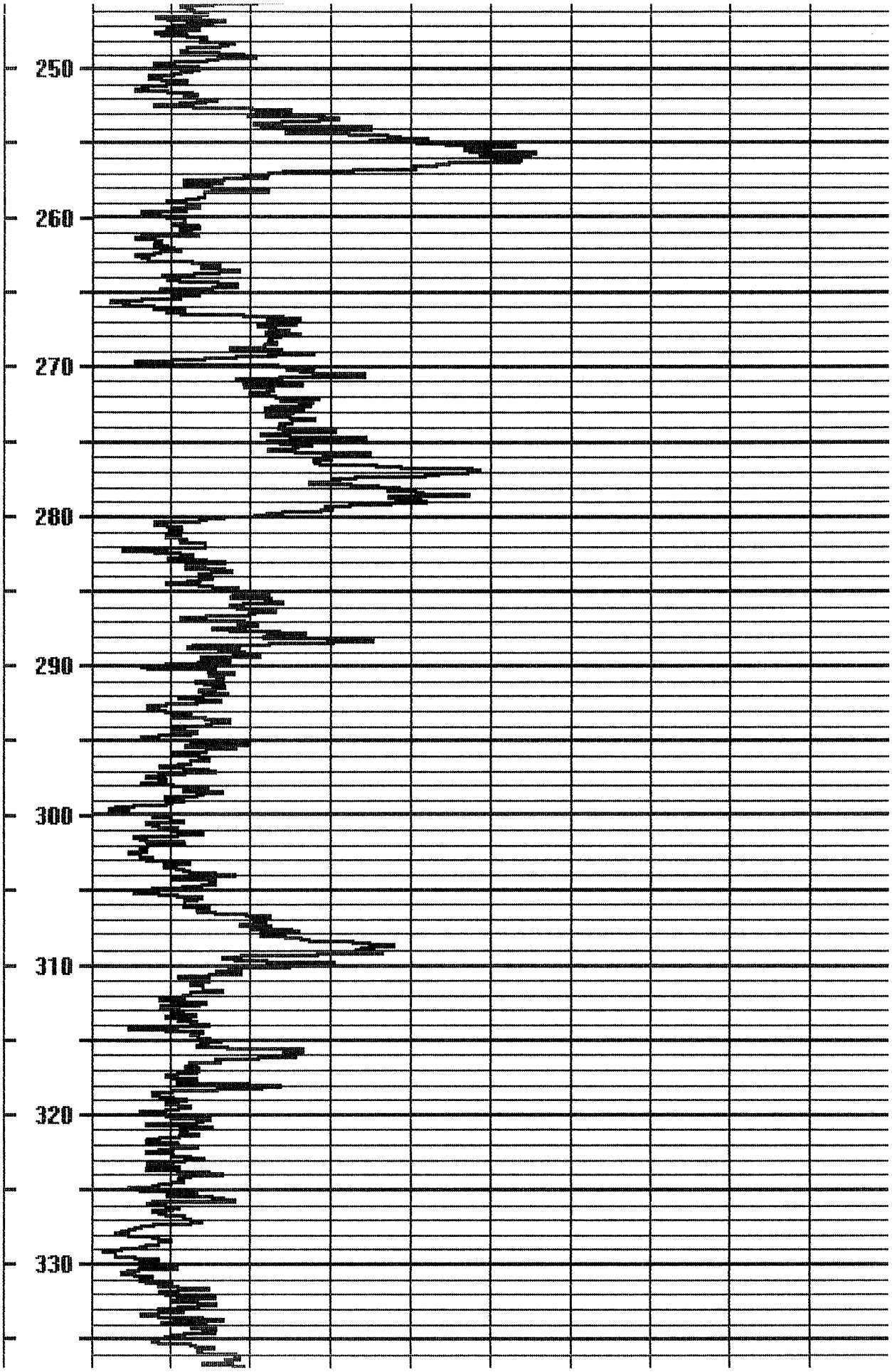
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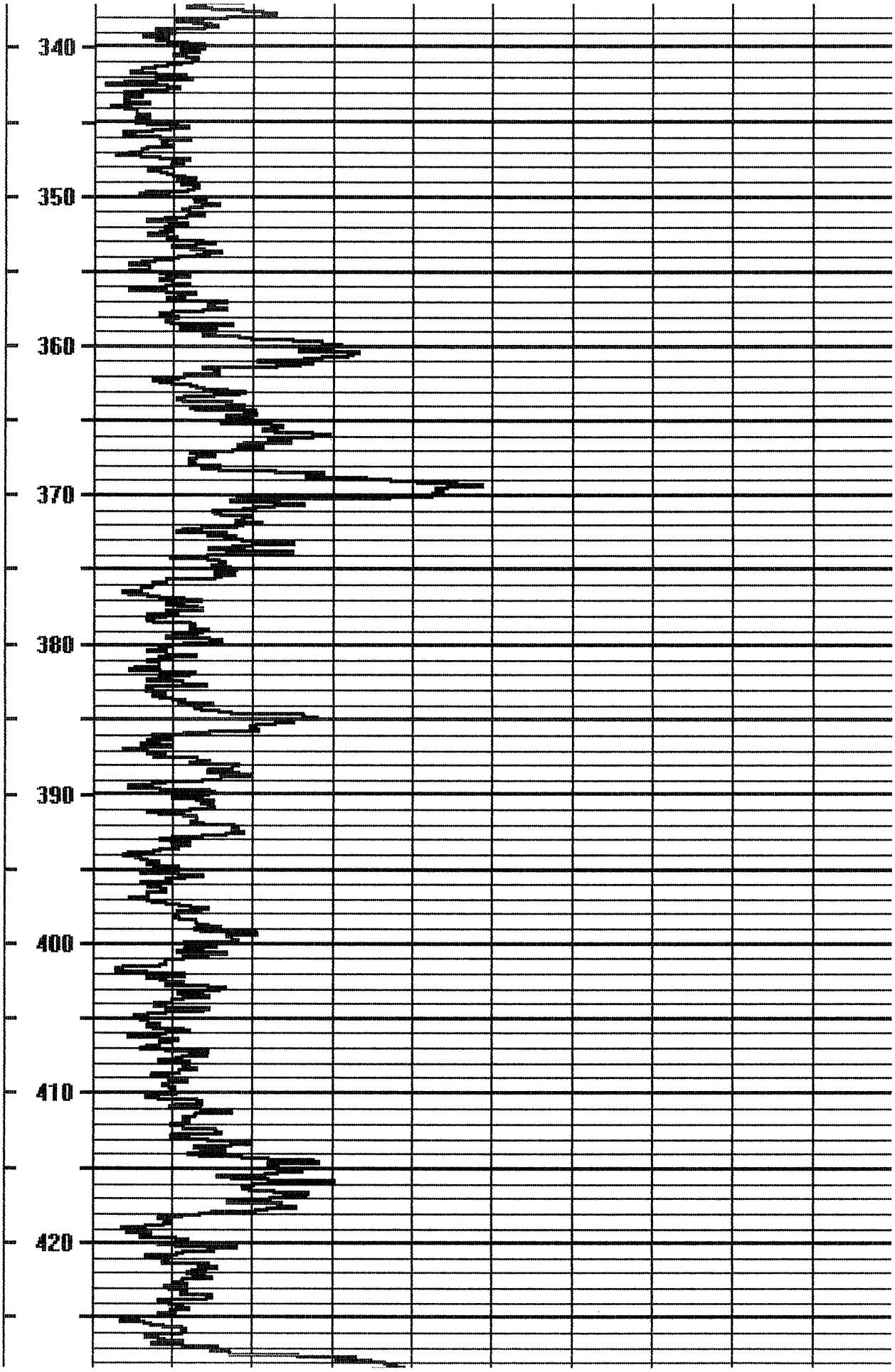
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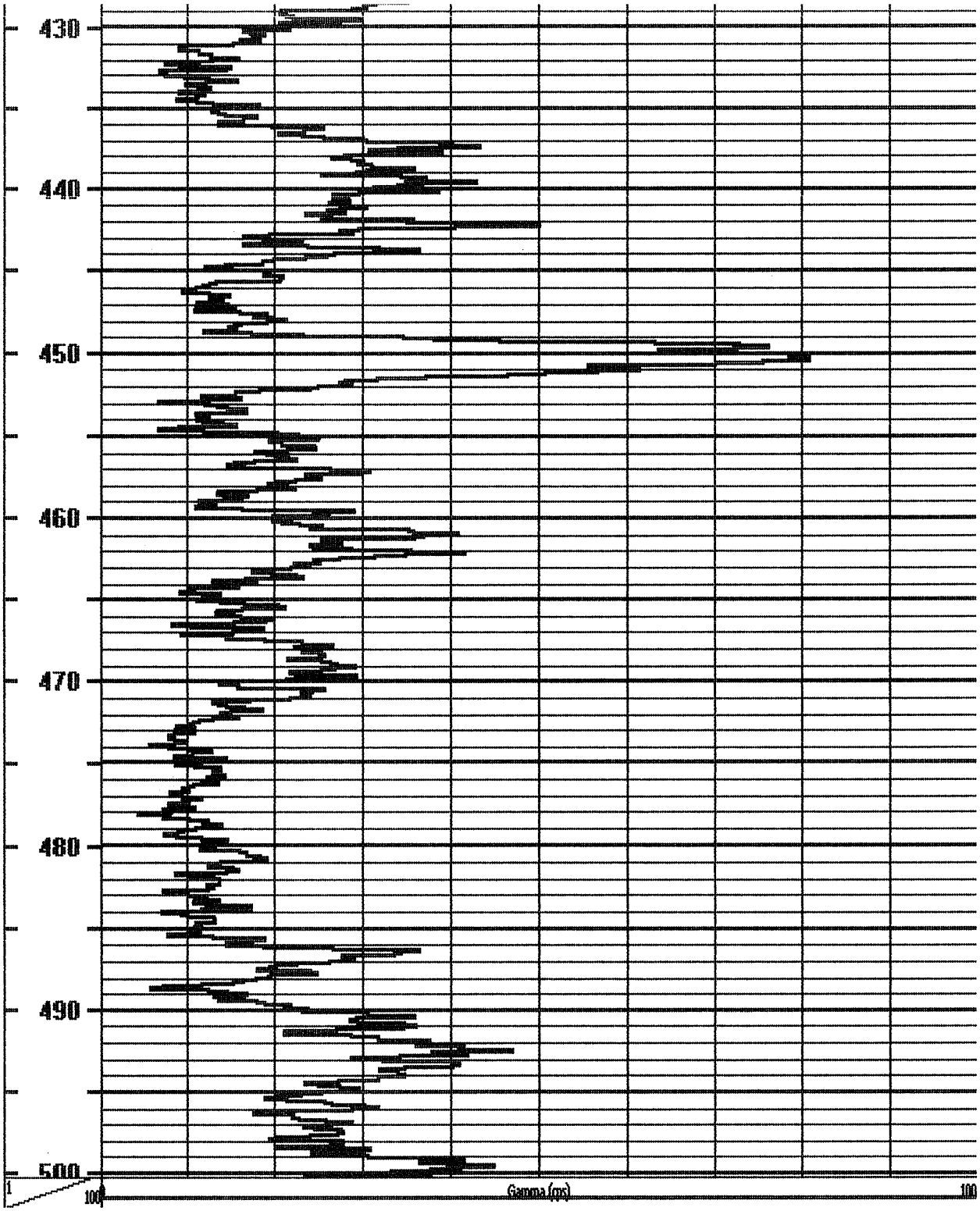
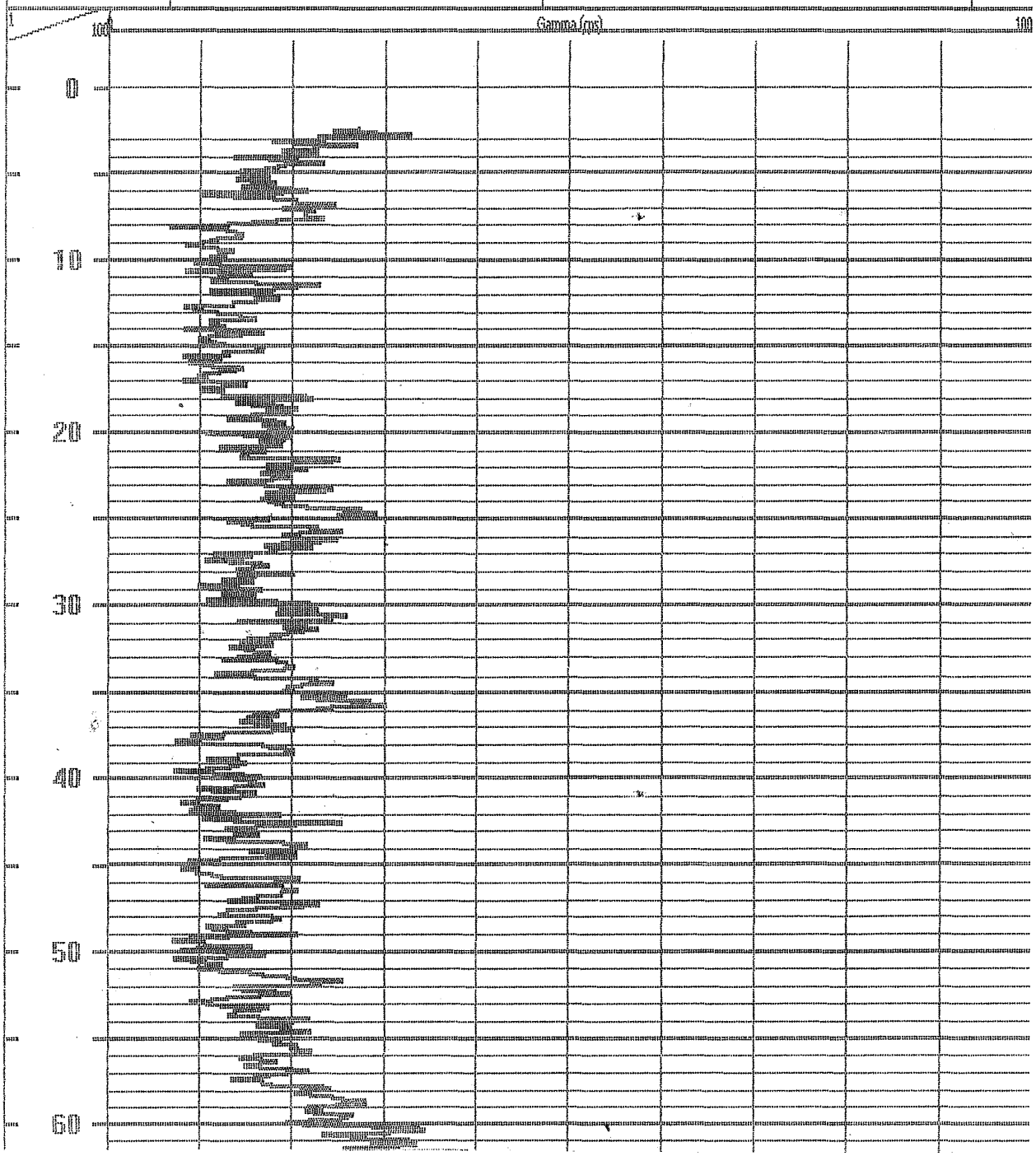
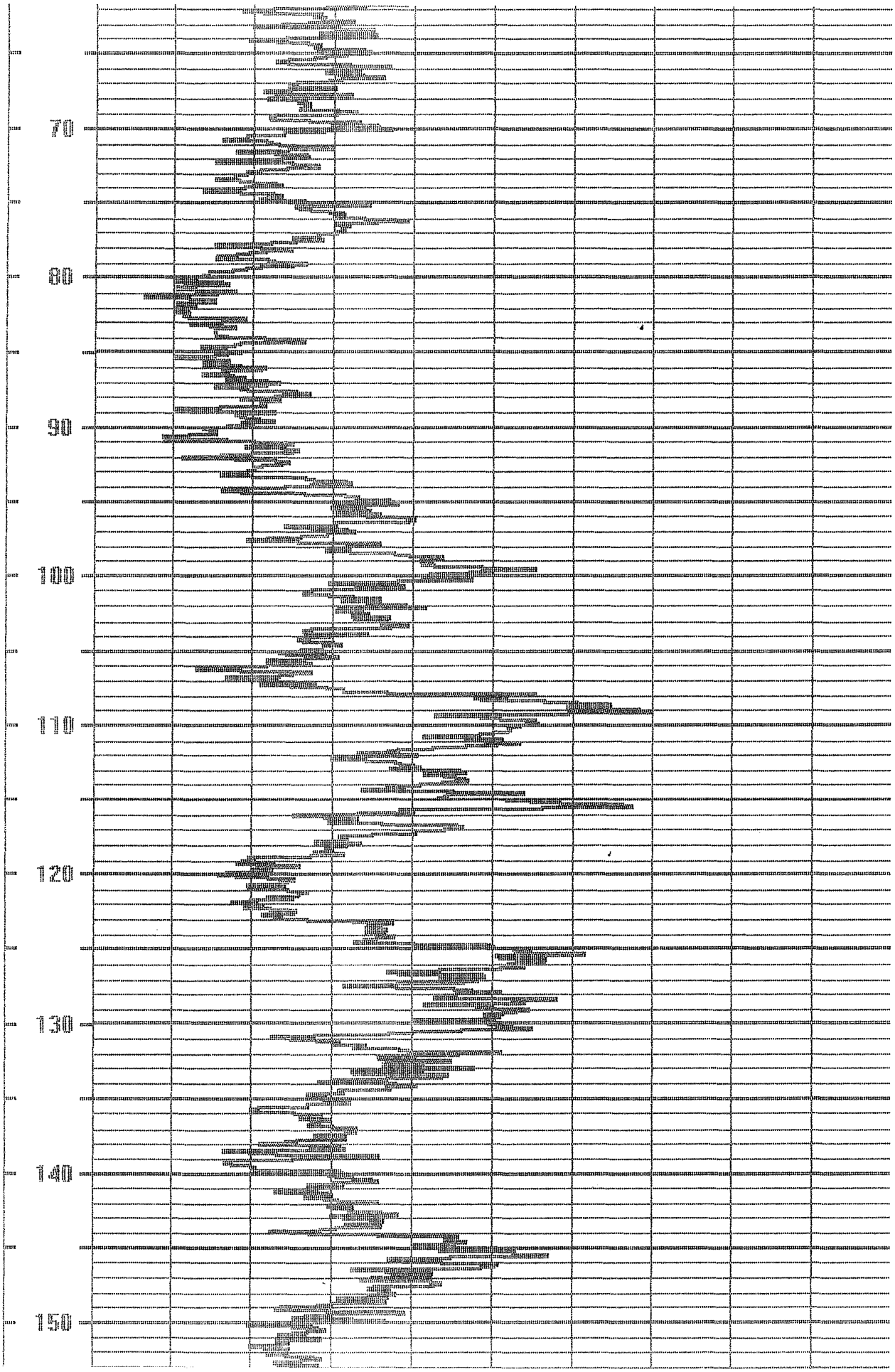


Date: Monday, October 13, 2008 Time: 09:02 File: C:\My Documents\698\TMW03D.rd

Date: Thursday, July 24, 2008 Time: 13:59 File: C:\My Documents\698\TMW04.rd

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: NCIA LINDY ROAD	
Well: TMW04	Depth Driller / Depth Logger	
Date: 07-24-08 / BH Fluid	Logged by: Chris Okon	
File Name: 698	Witness: KEVIN	

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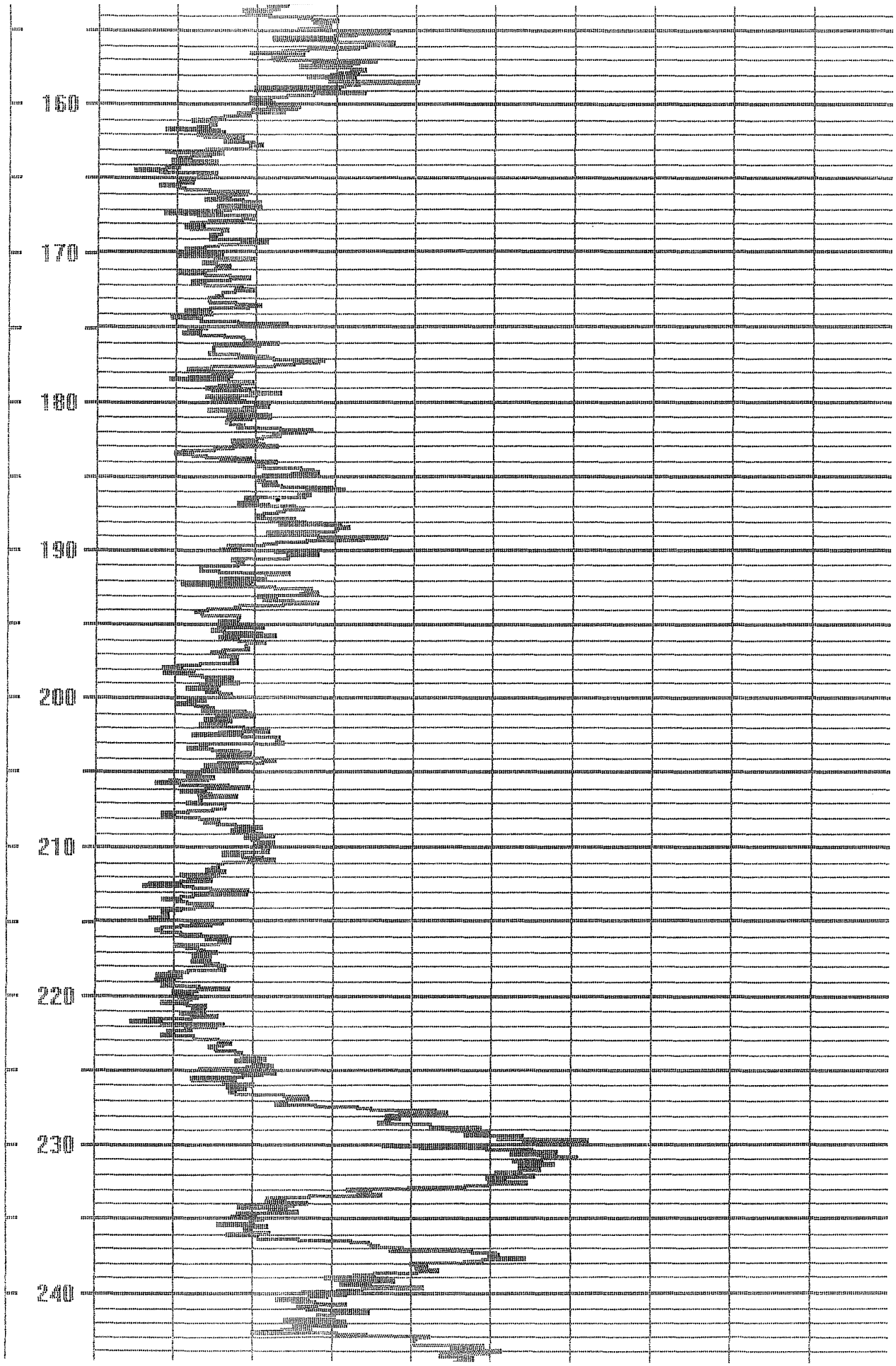
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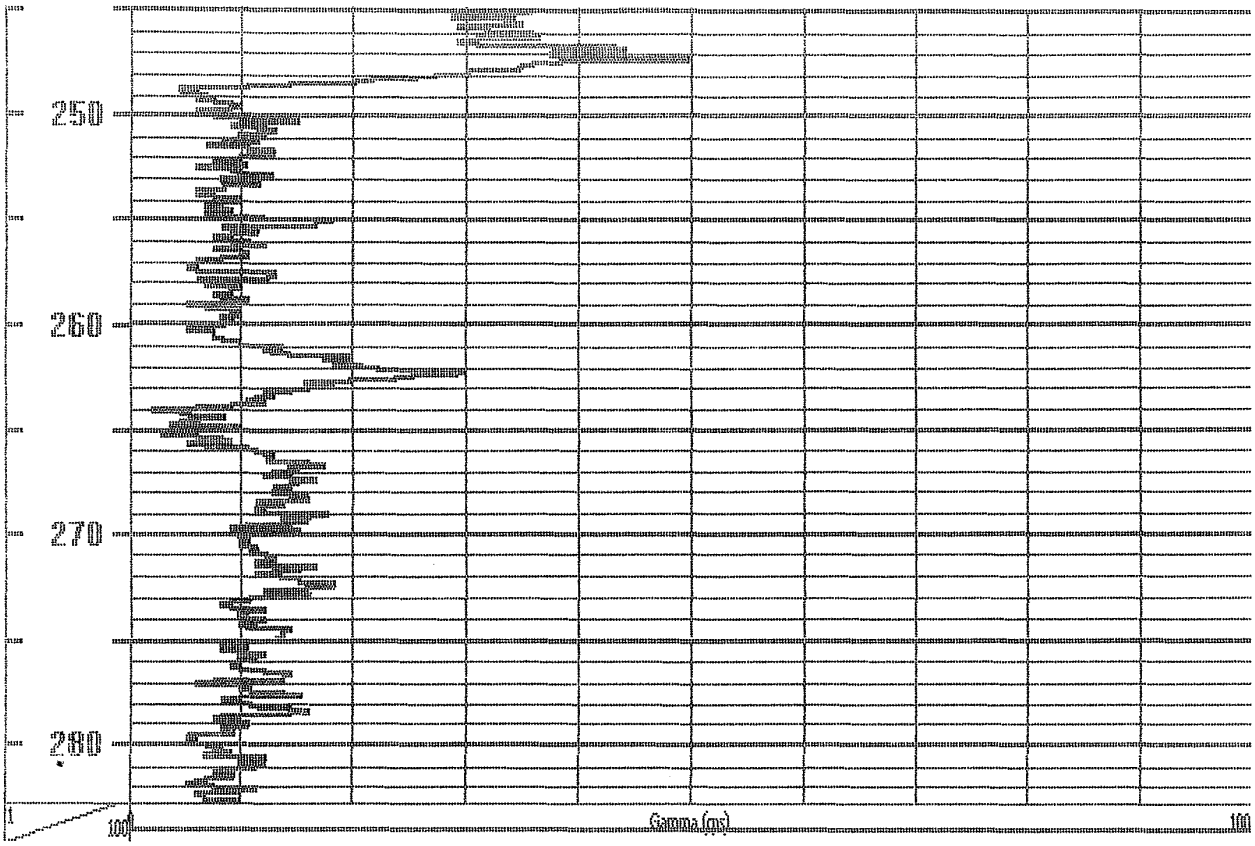
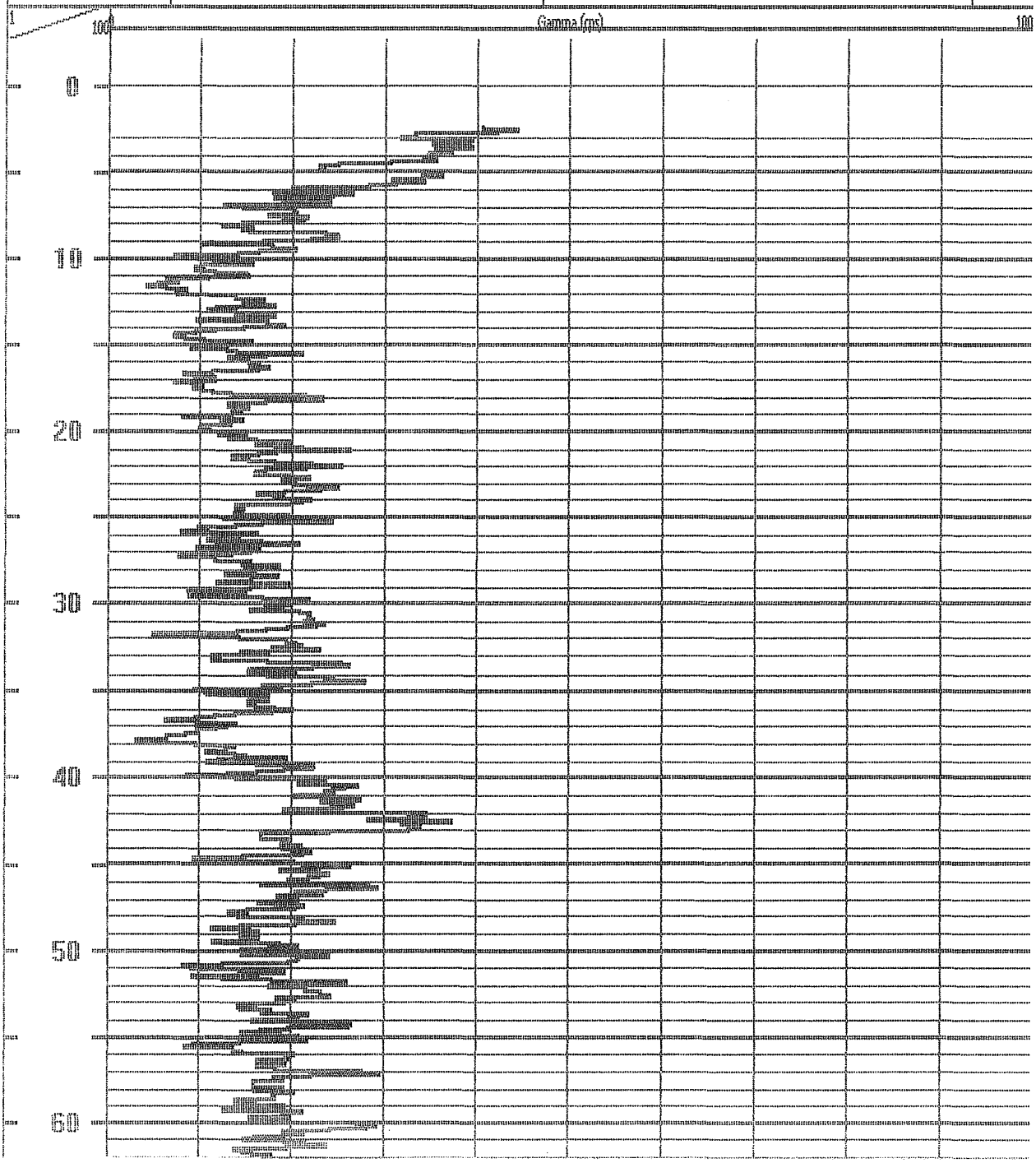
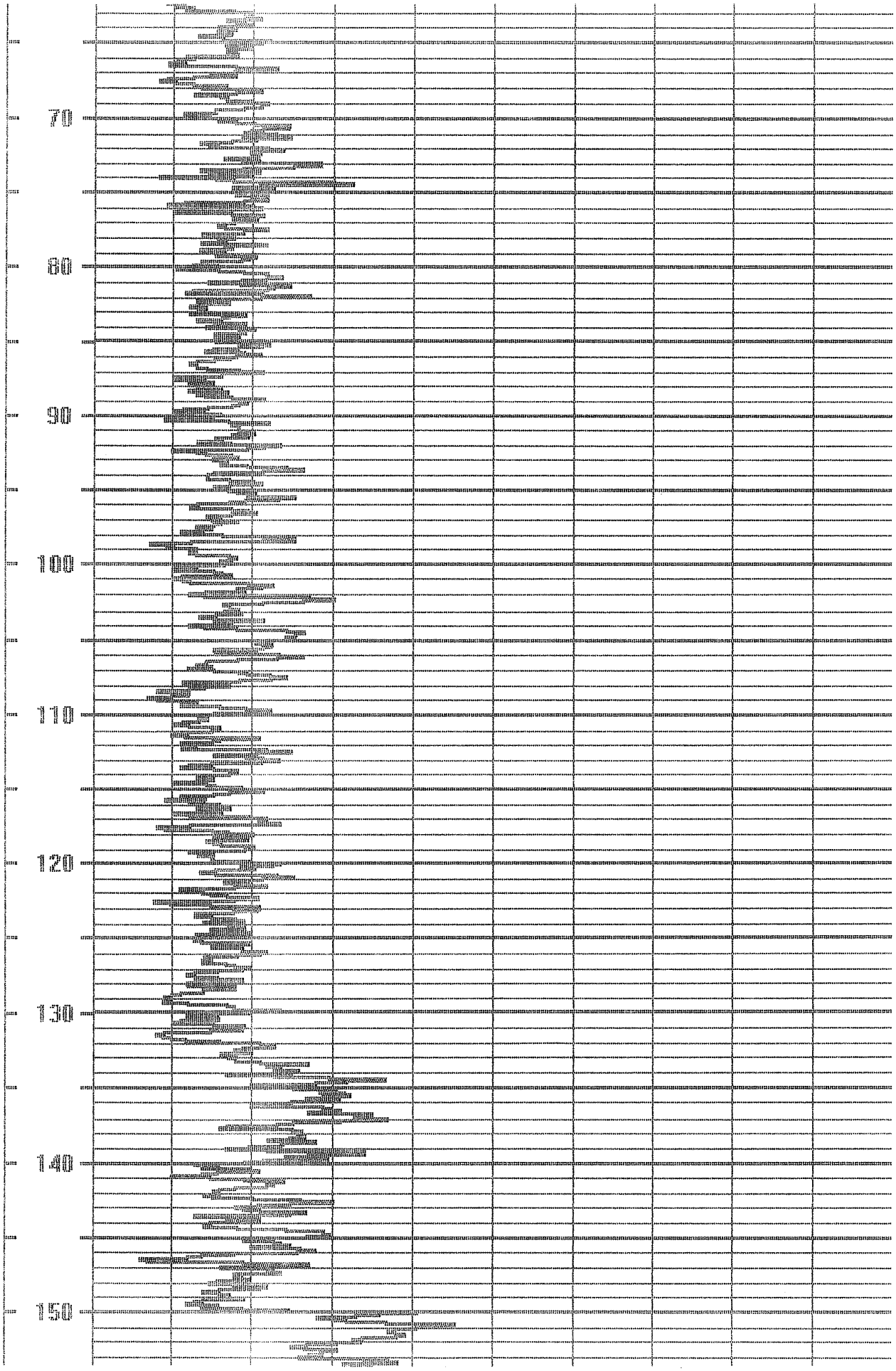


Date: Thursday, July 24, 2008 Time: 13:59 File: C:\My Documents\698\TMW04.rd

Date: Thursday, August 07, 2008 Time: 13:13 File: C:\My Documents\698\TMW-05.rd

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: NCIA MERILLON AVE	
Well: TMW05	Depth Driller:	
	Depth Logger:	
Date: 08-07-08	BH Fluid:	Logged by: Chris Okon
File Name: 698		Witness: KEVIN

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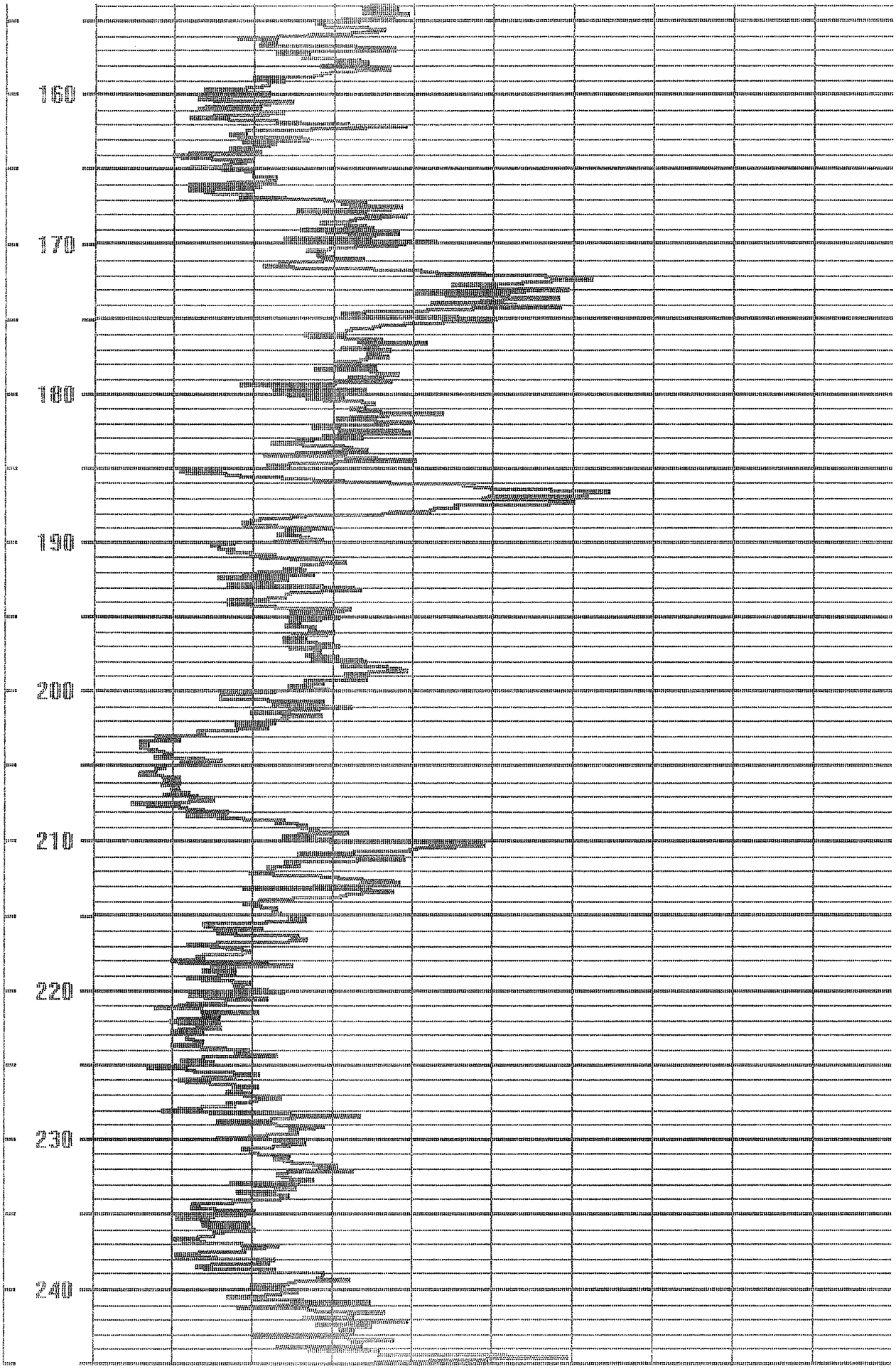
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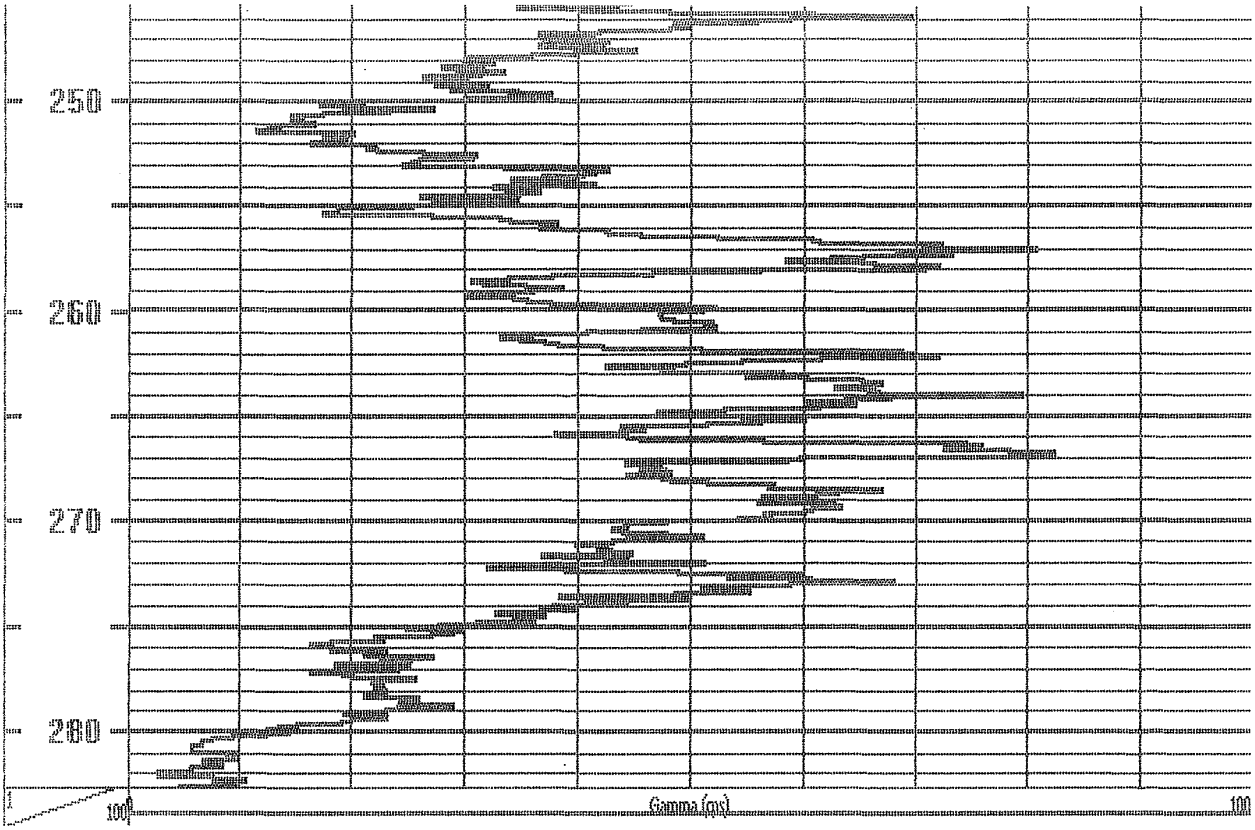
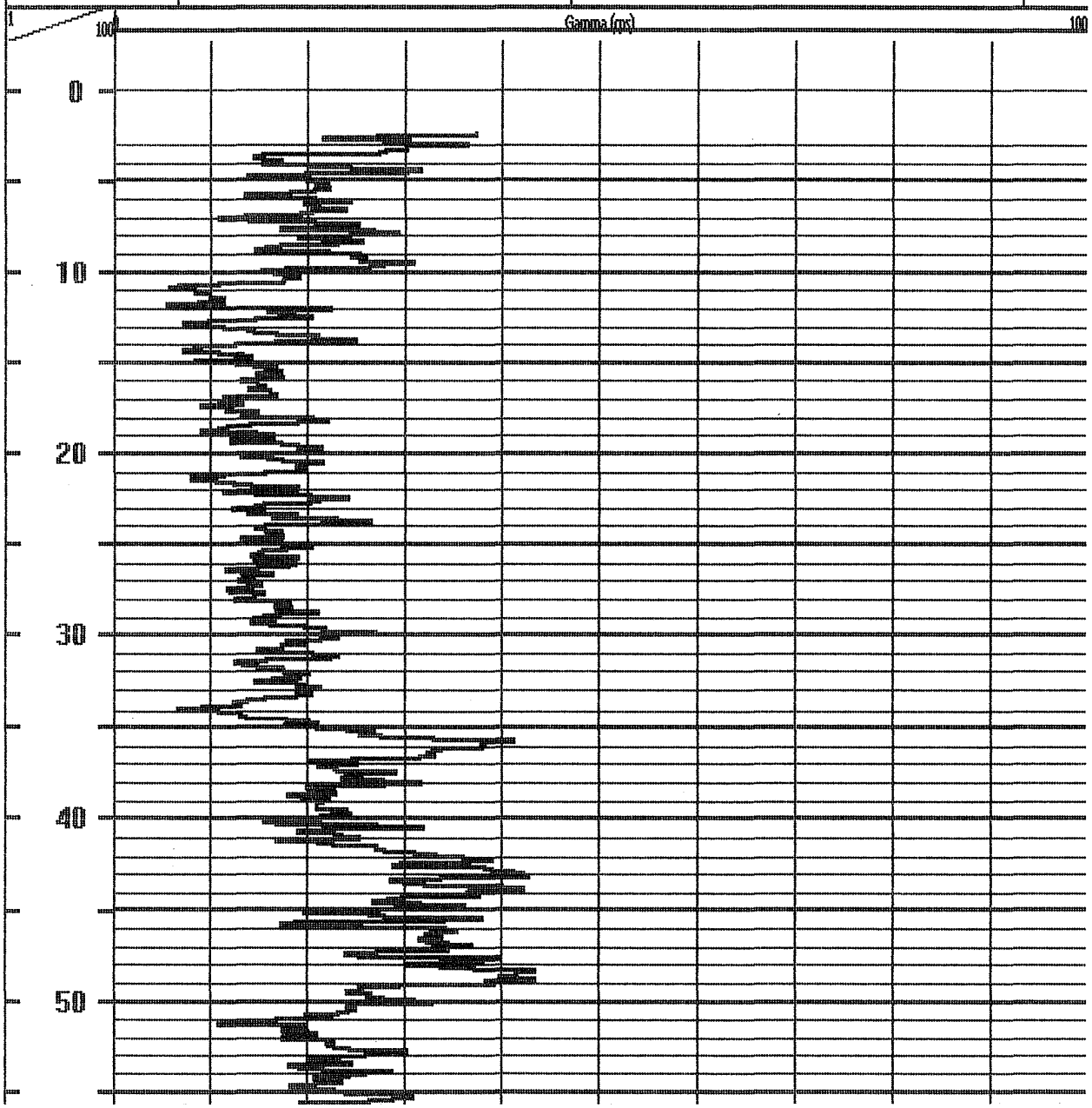
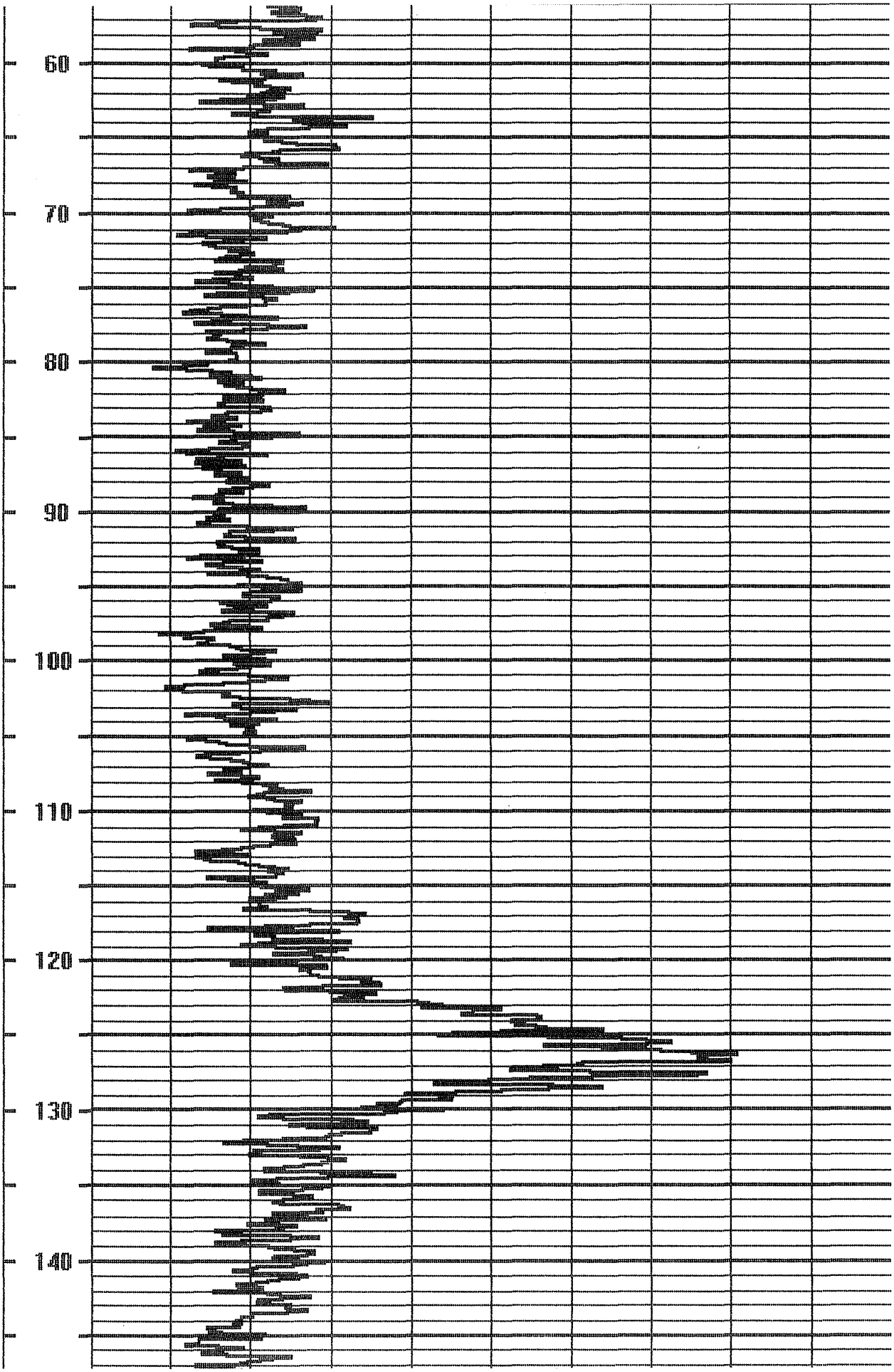


Date: Thursday, August 07, 2008 Time: 13:13 File: C:\My Documents\698\TMW-05.rd

Date: Friday, June 20, 2008 Time: 07:52 File: C:\My Documents\698\tw06.rd

	COMPANY: DELTA WELL & PUMP CO., INC.			Casing
	Location: NCIA ASTER PLACE			
Well	TW-06		Depth Driller Depth Logger	
Date	06-20-08	BH Fluid	Logged by: Chris Okon	
File Name	698		Witness: Kevin Melkiff	

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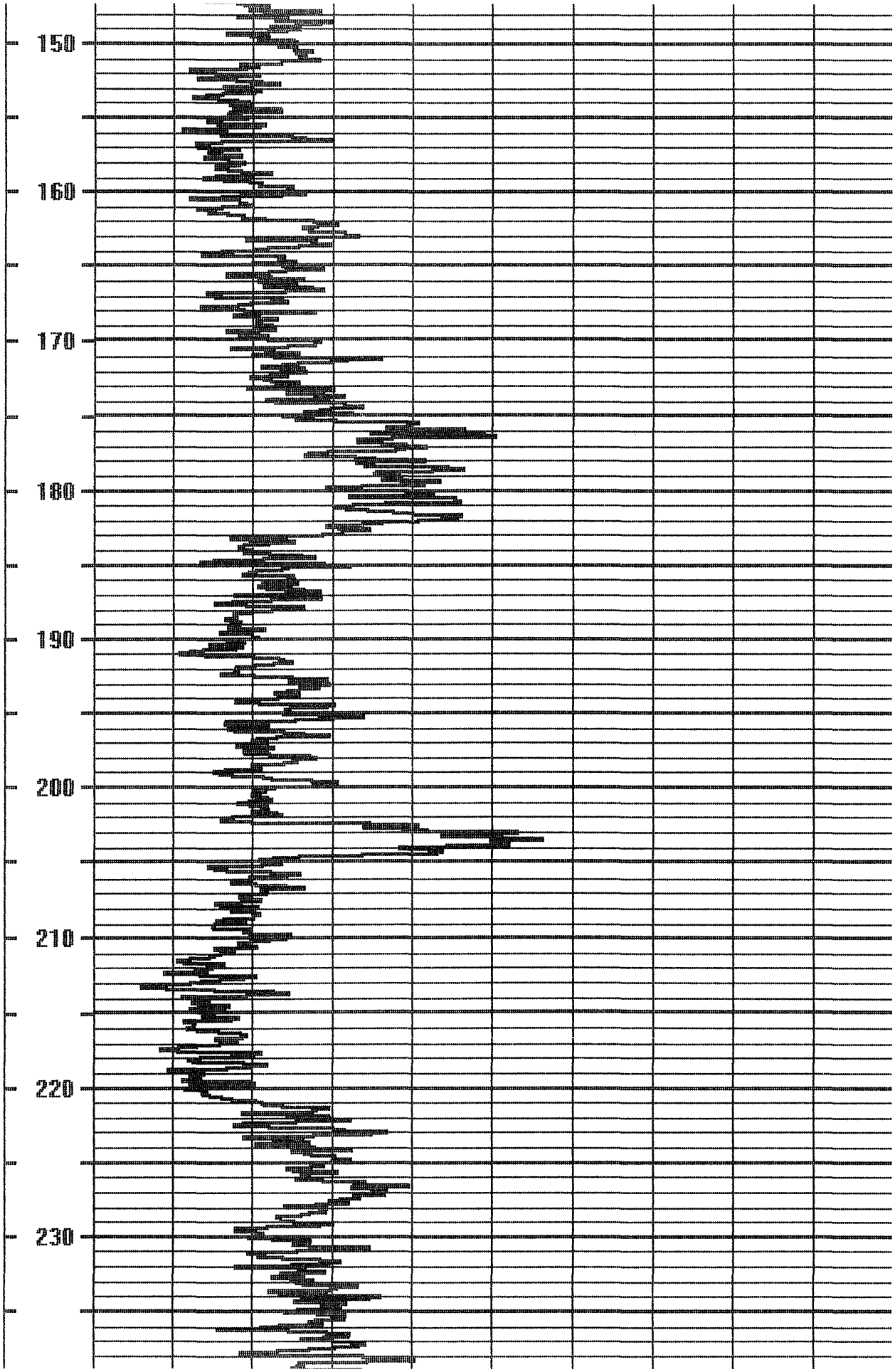
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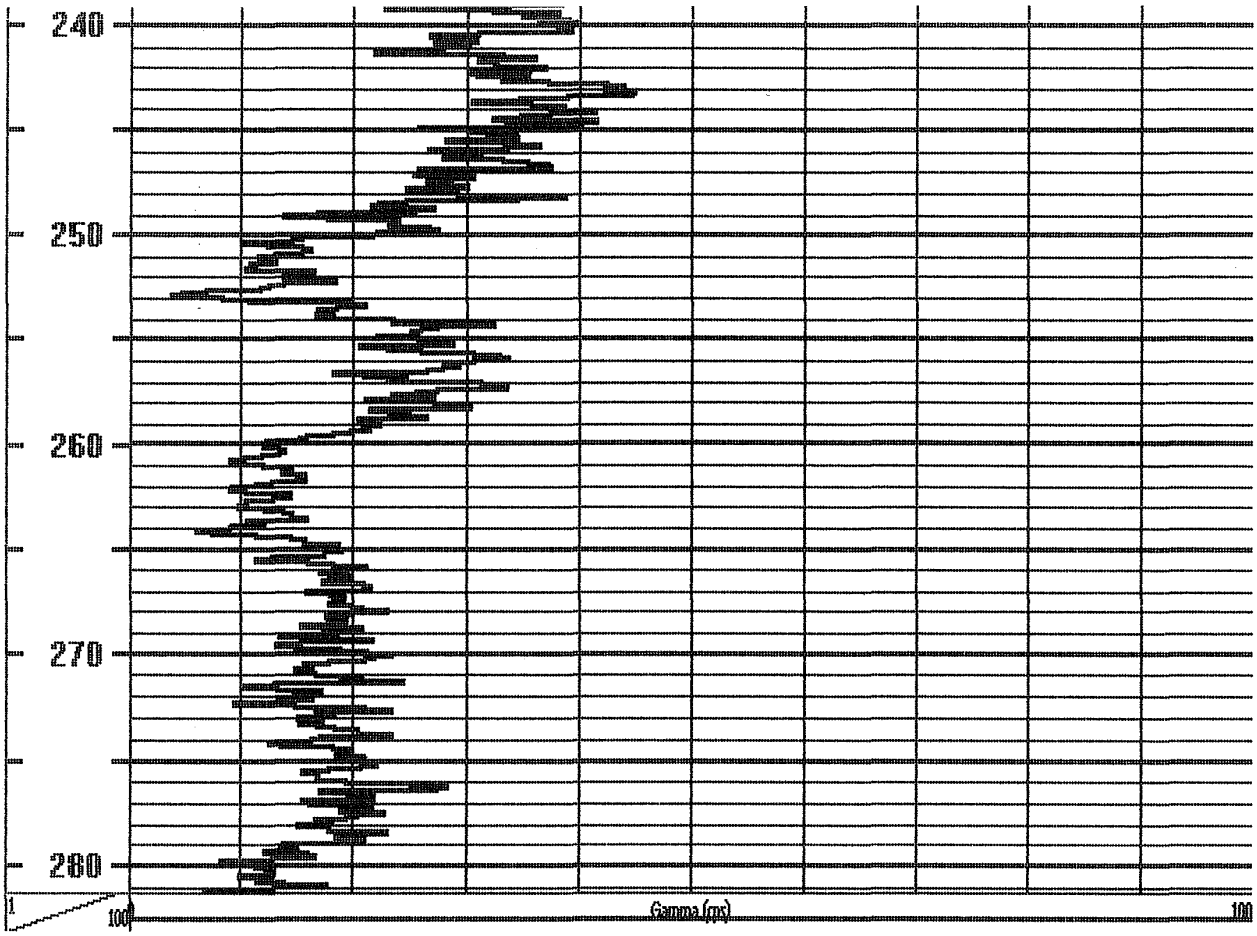
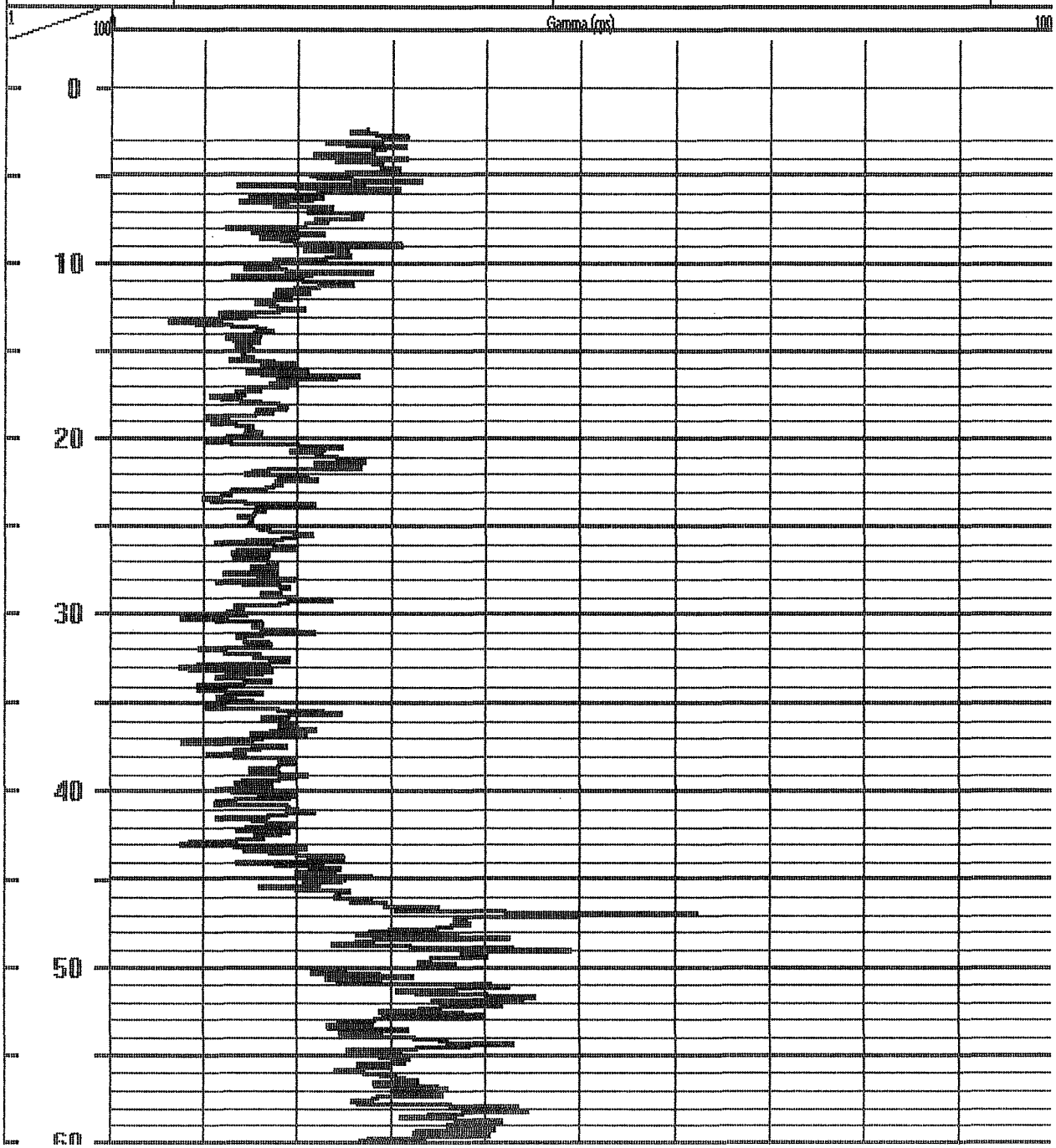
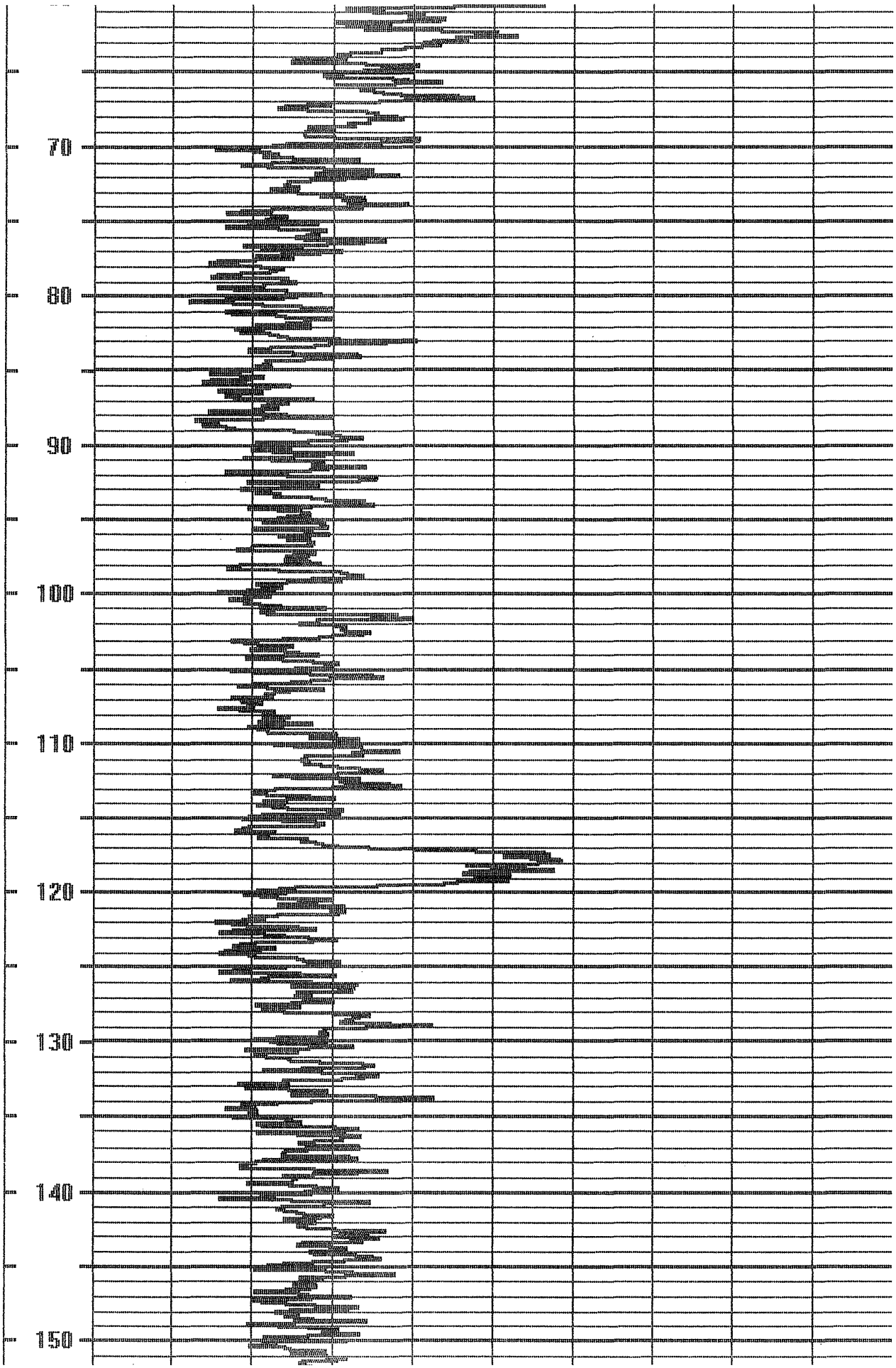


Date: Friday, June 20, 2008 Time: 07:52 File: C:\My Documents\698\tw06.rd

Date: Monday, June 30, 2008 Time: 11:42 File: C:\My Documents\698\tmw07.rd

	COMPANY: DELTA WELL & PUMP CO., INC.			Casing
	Location: HYACINTH PLACE			
Well	NCIA TMW-07		Depth Driller Depth Logger	
Date	06-30-08	BH Fluid	Logged by: Chris Okon	
File Name	698		Witness: Kevin	

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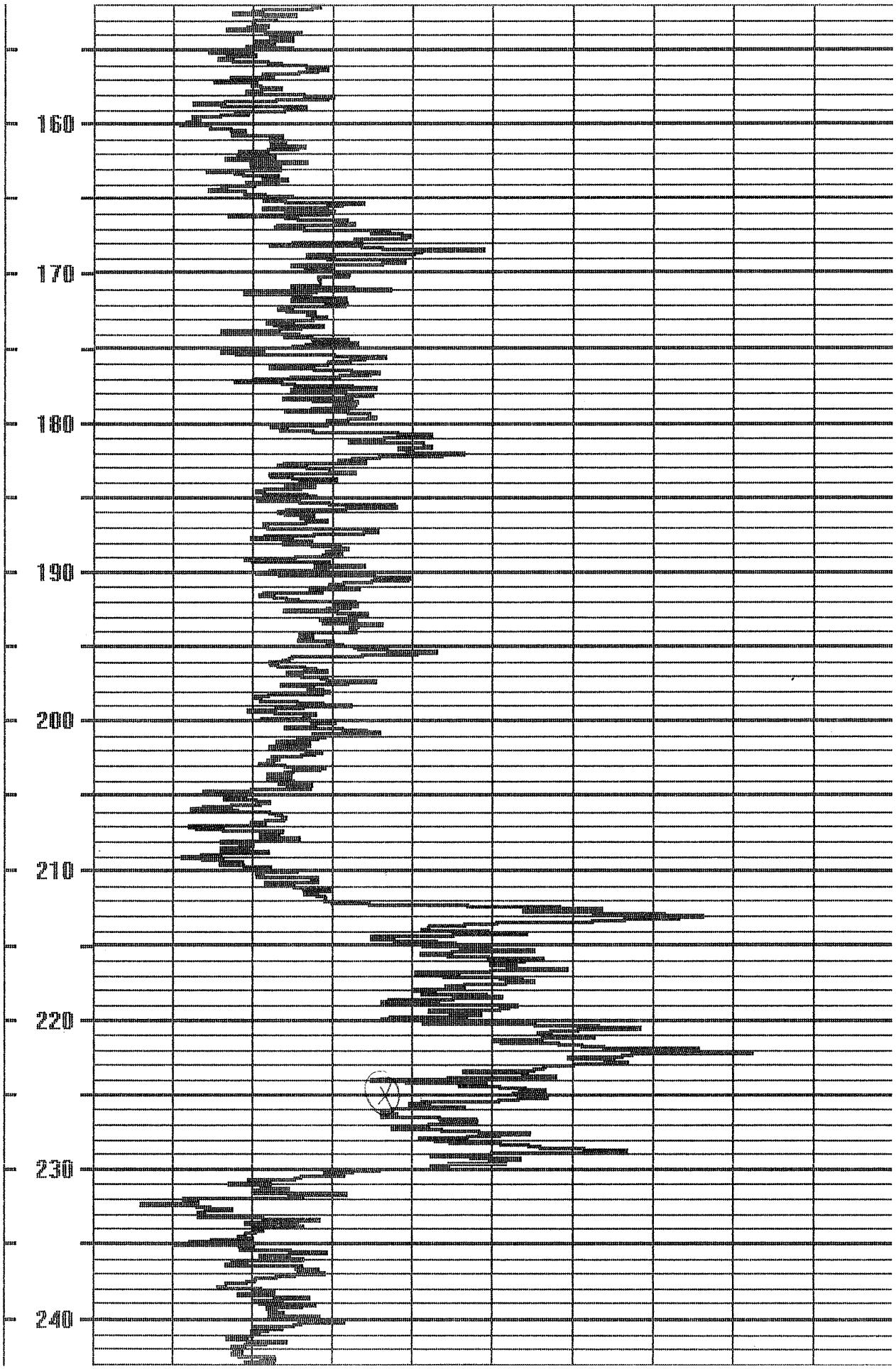
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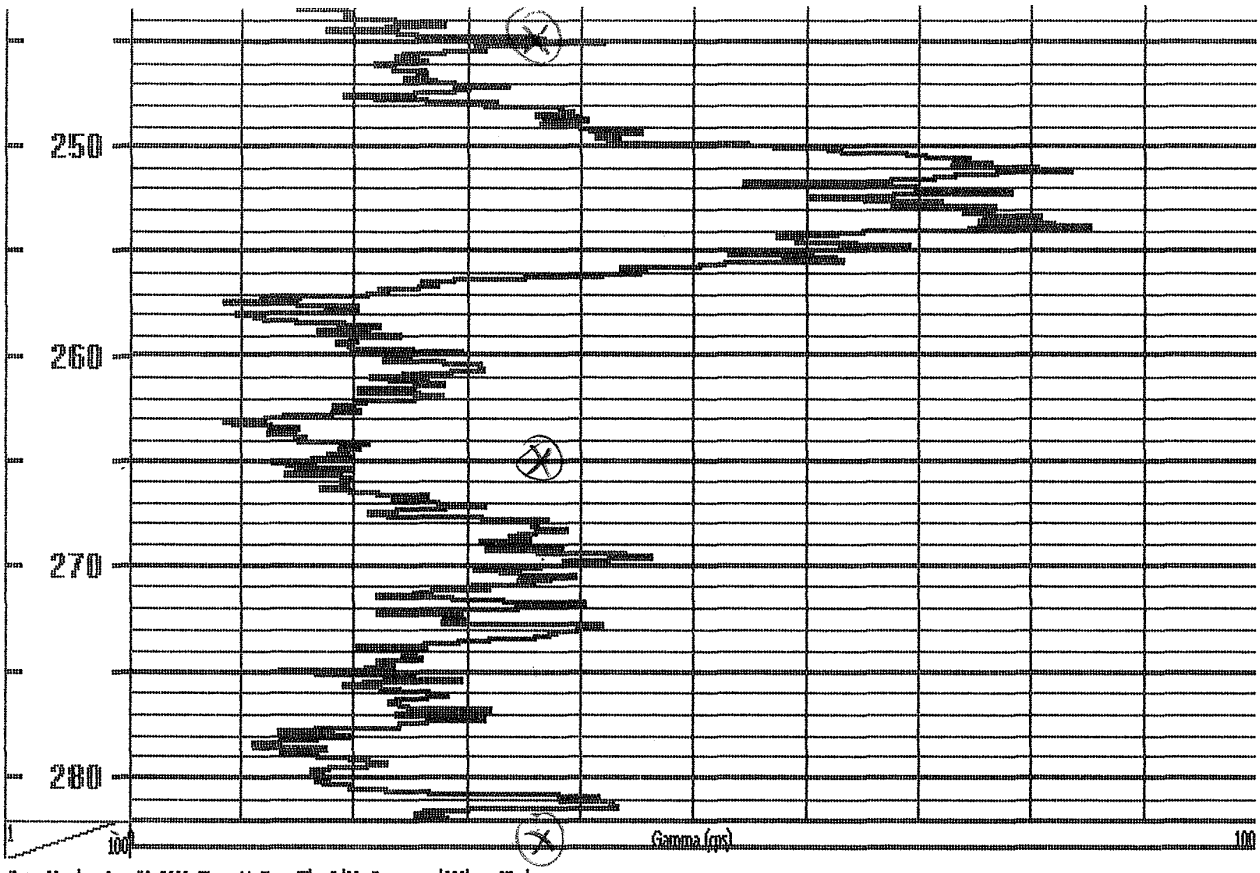
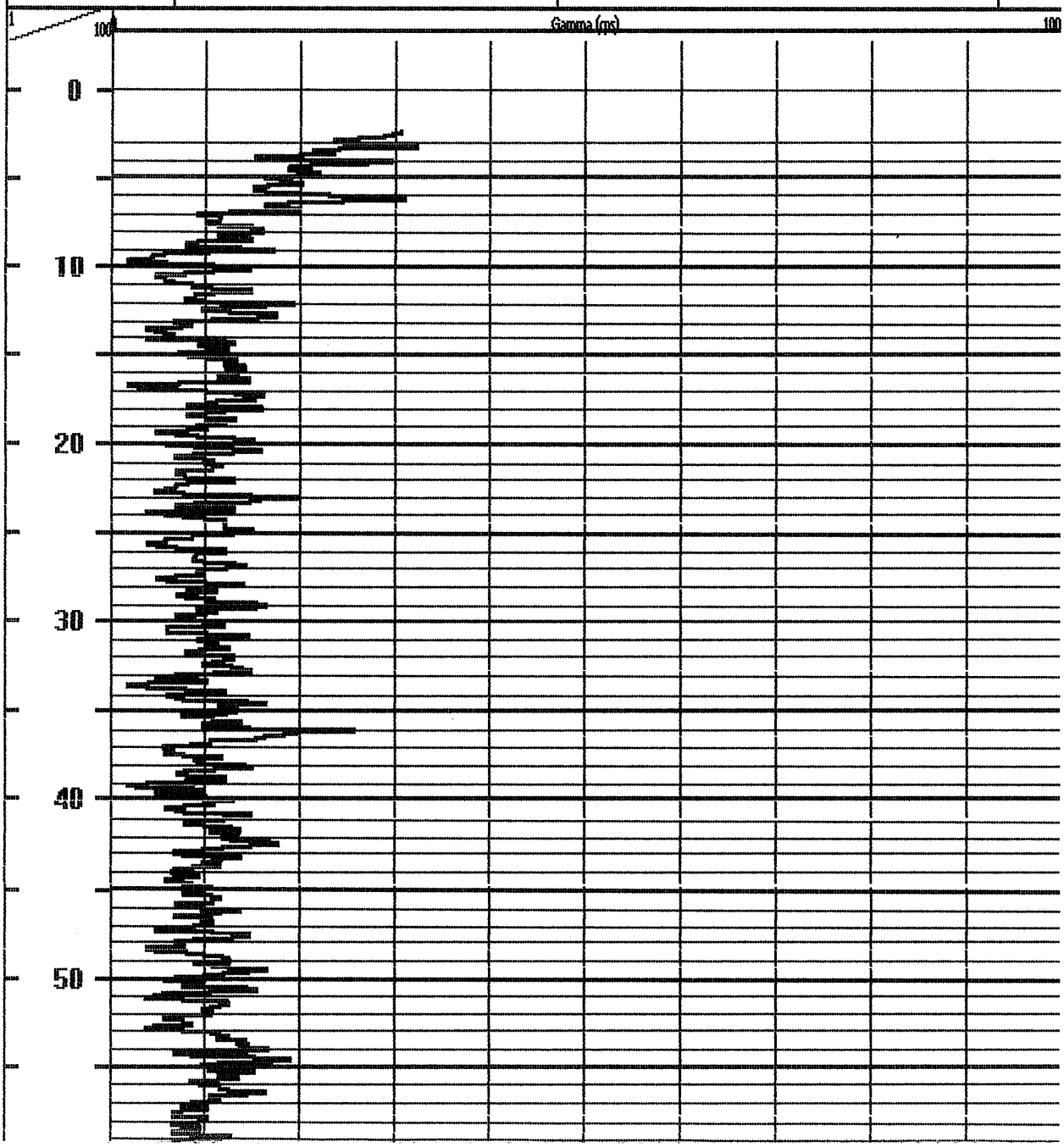
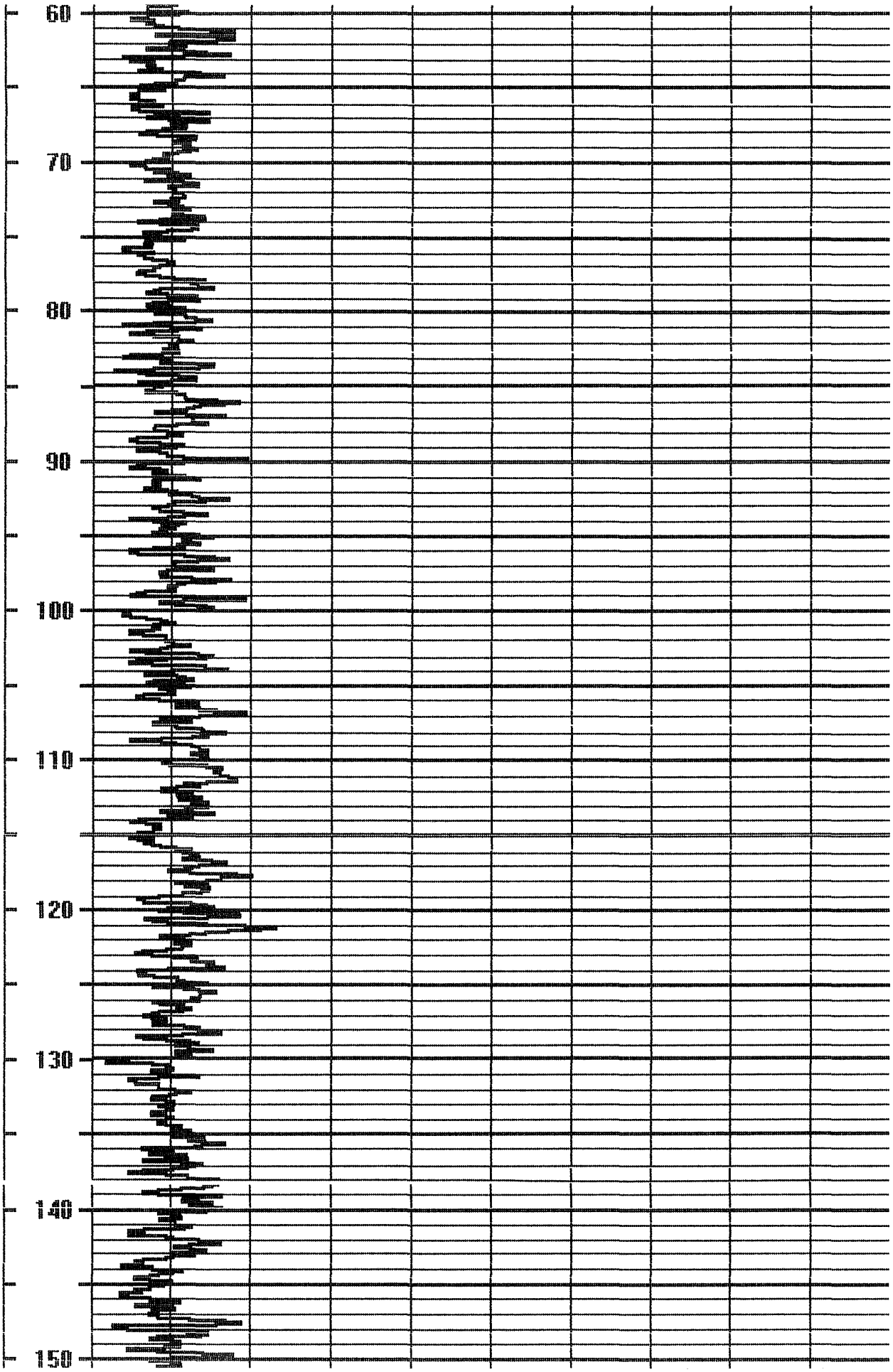


Date: Monday, June 30, 2008 Time: 11:42 File: C:\My Documents\598tmw07.rd

Date: Friday, November 14, 2008 Time: 14:44 File: C:\My Documents\698\TMW8D.rd

	COMPANY: DELTA WELL & PUMP CO., INC.		Casing
	Location: NCIA - LINDY ROAD		
Well	TMW-8D	Depth Driller Depth Logger	
Date	11-14-08 BH Fluid	Logged by: Chris Okon	
File Name	698	Witness: Kevin	

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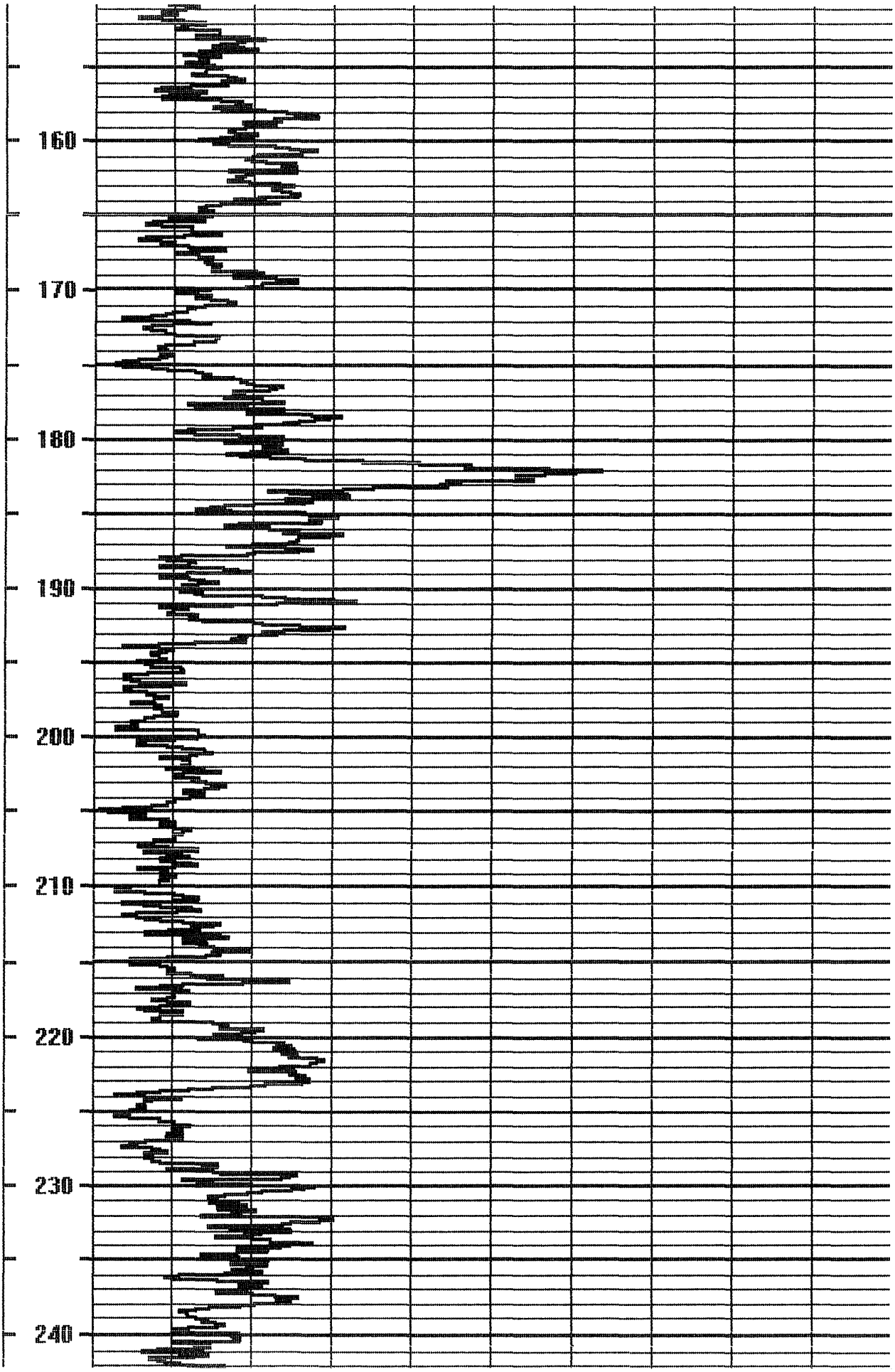
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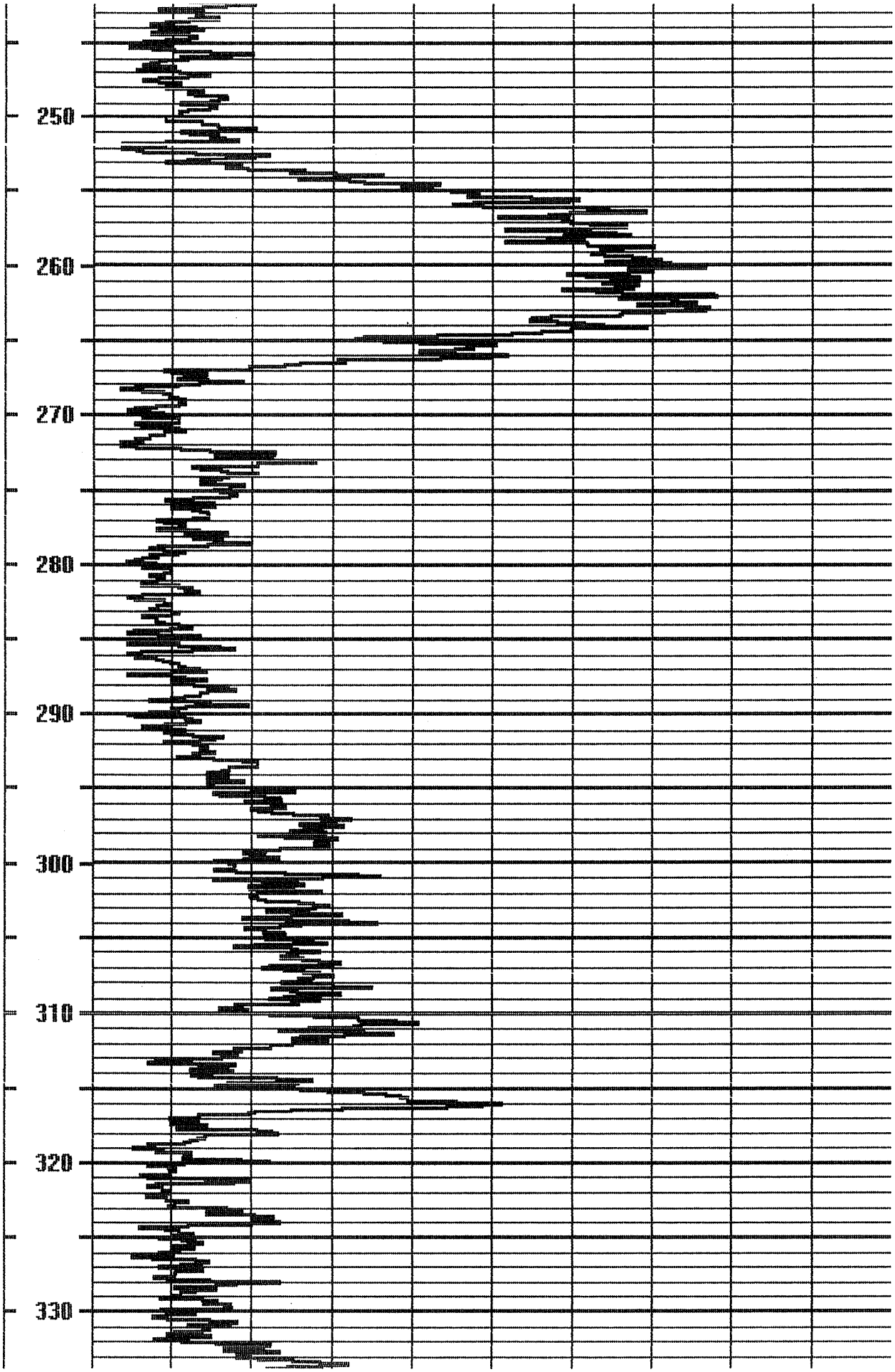
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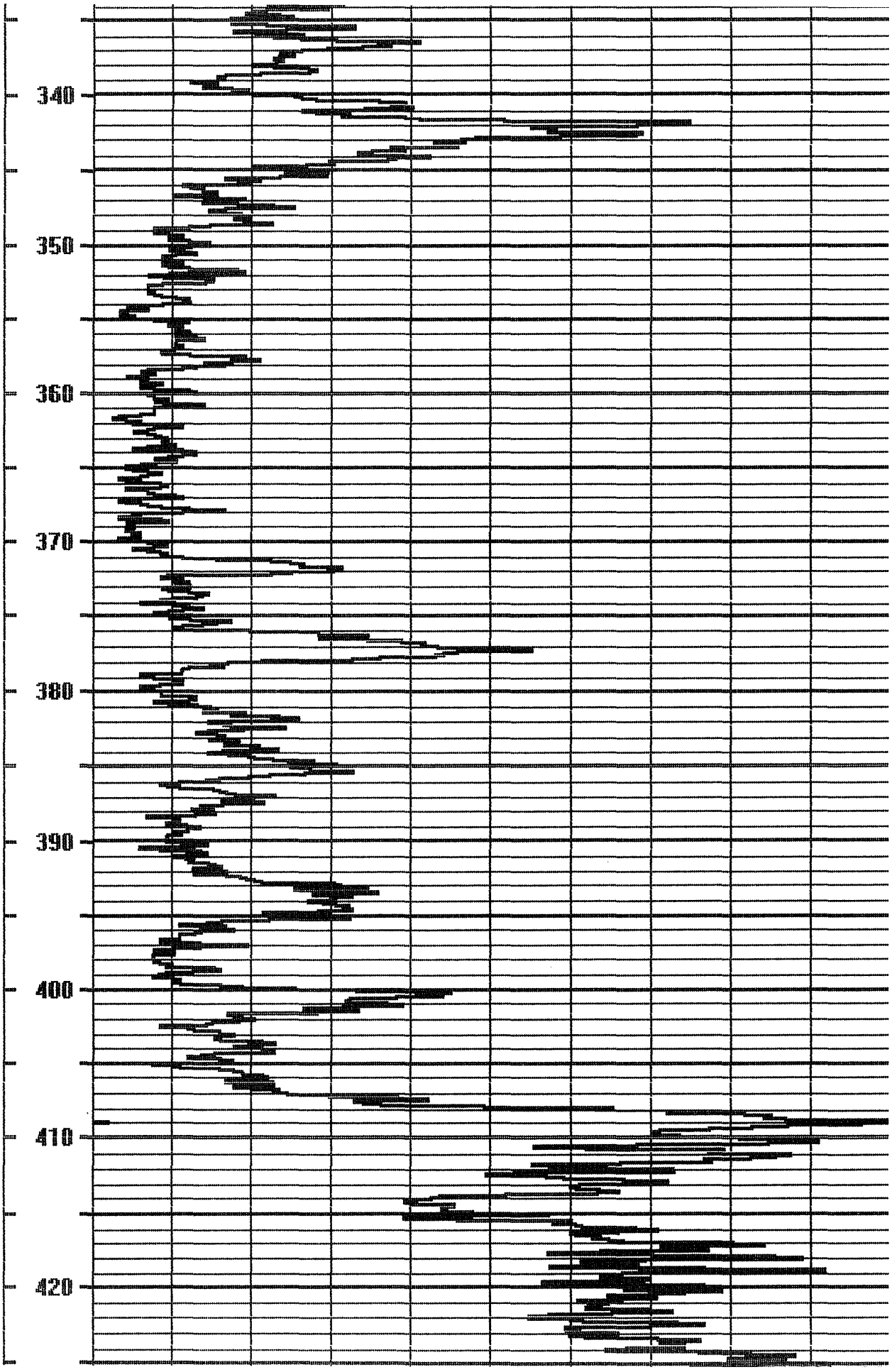
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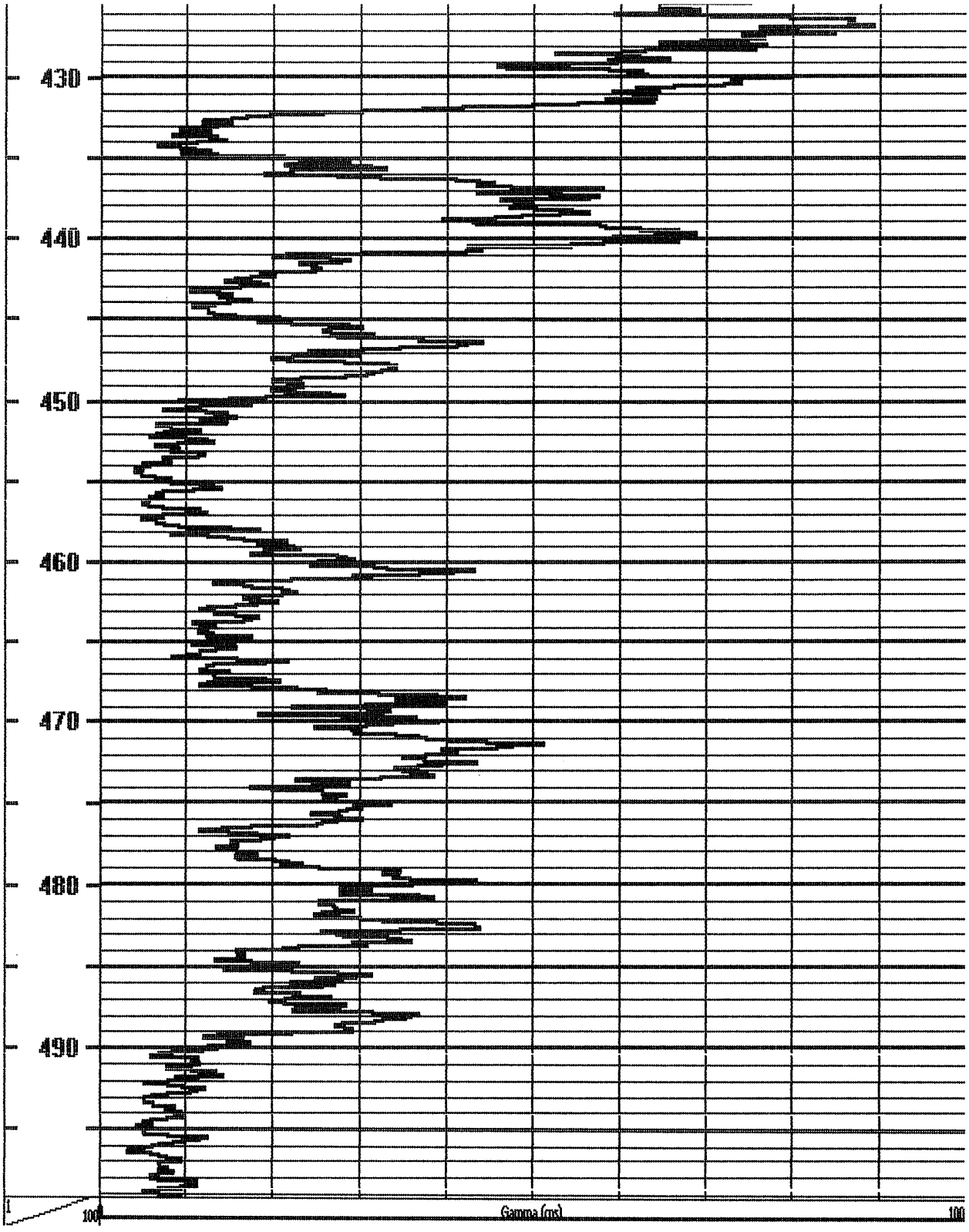
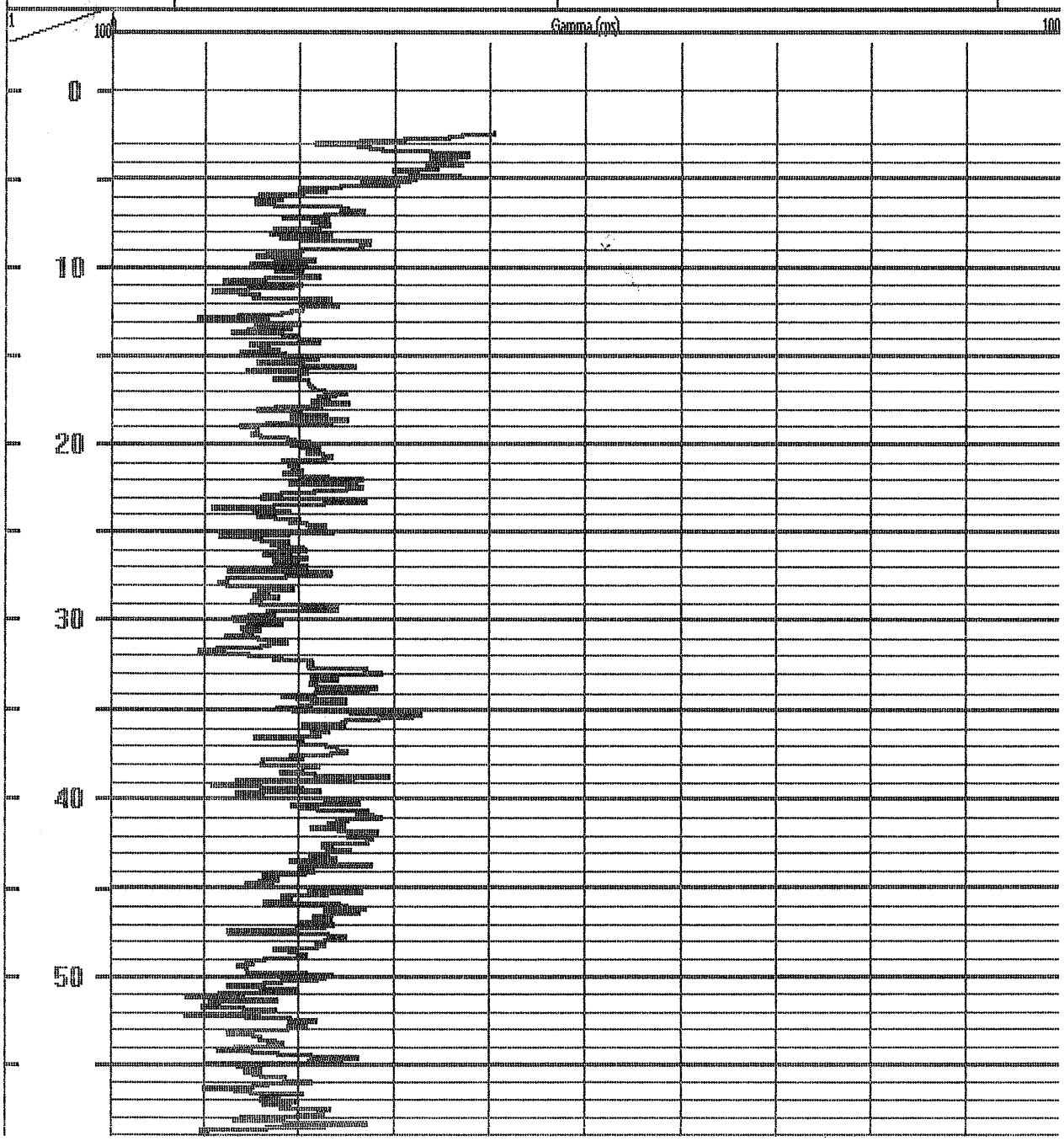


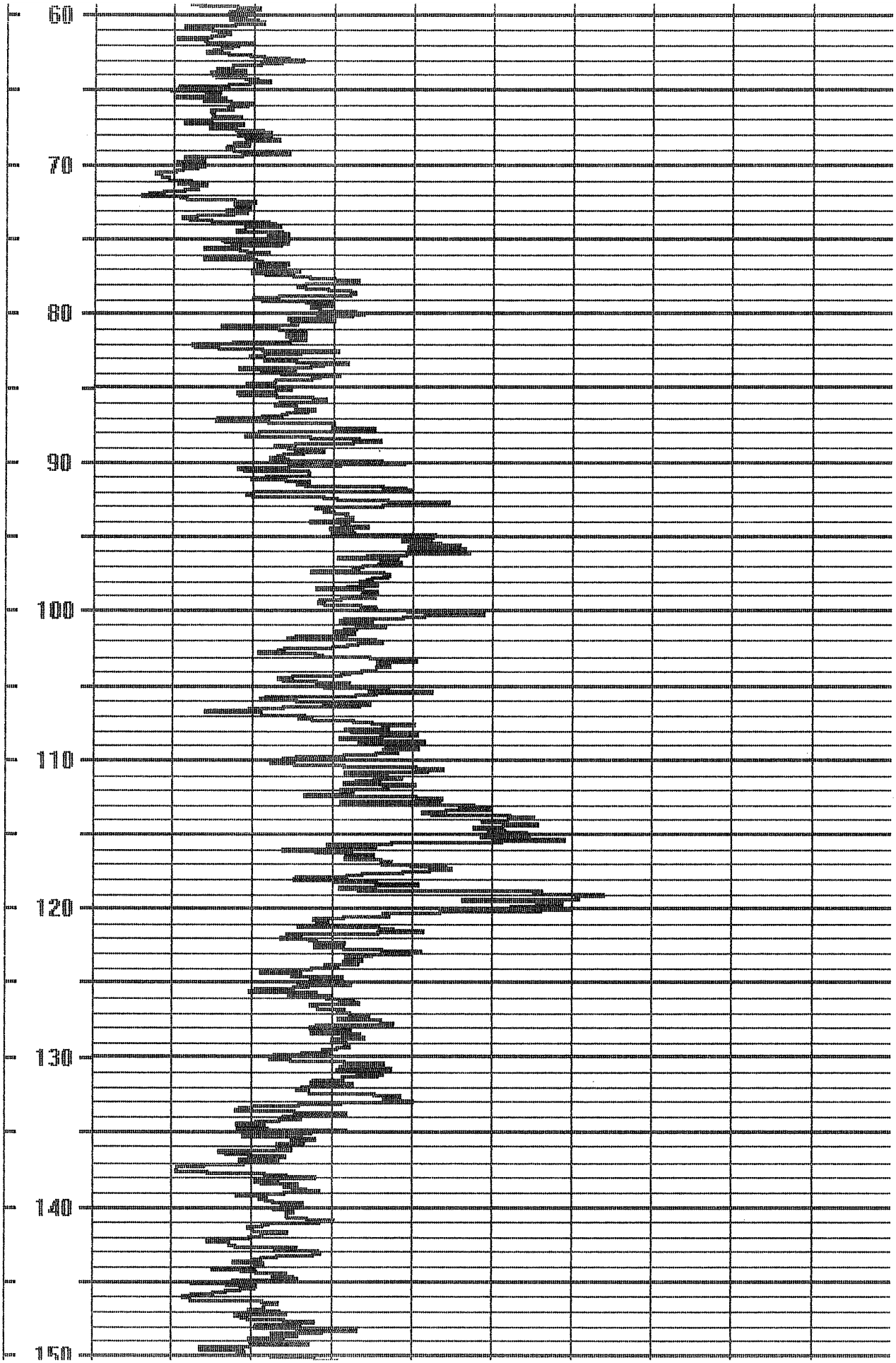
Date: Friday, November 14, 2008 Time: 14:44 File: C:\My Documents\698\TMW88D.rd

Date: Thursday, July 10, 2008 Time: 14:31 File: C:\My Documents\698\TMW09.rd

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: WASHINGTON AVE	

Well	NCIA TMW-09			Depth Driller Depth Logger	
Date	07-10-08	BH Fluid		Logged by: Chris Okon	
File Name	698			Witness: Kevin	

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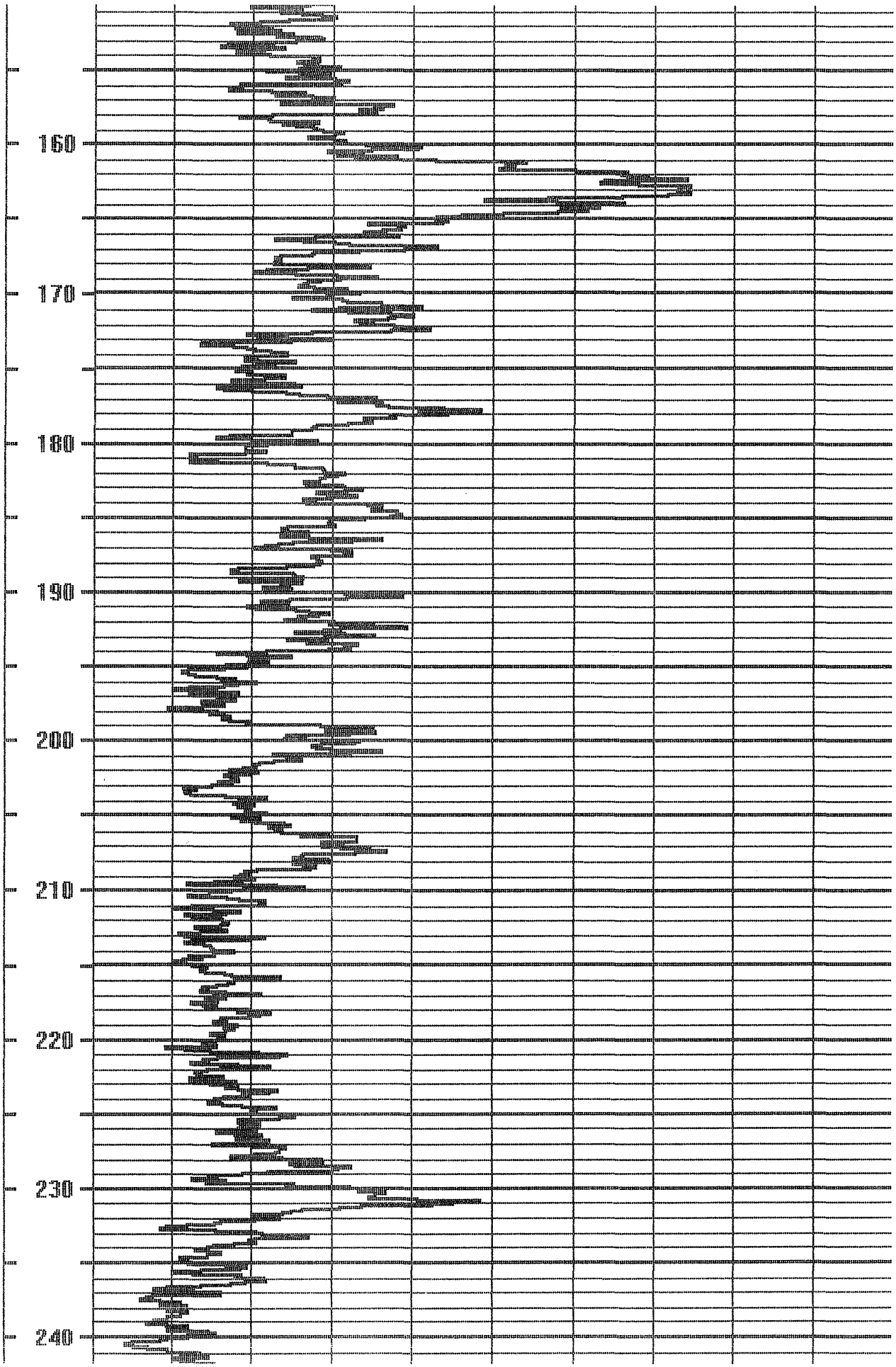
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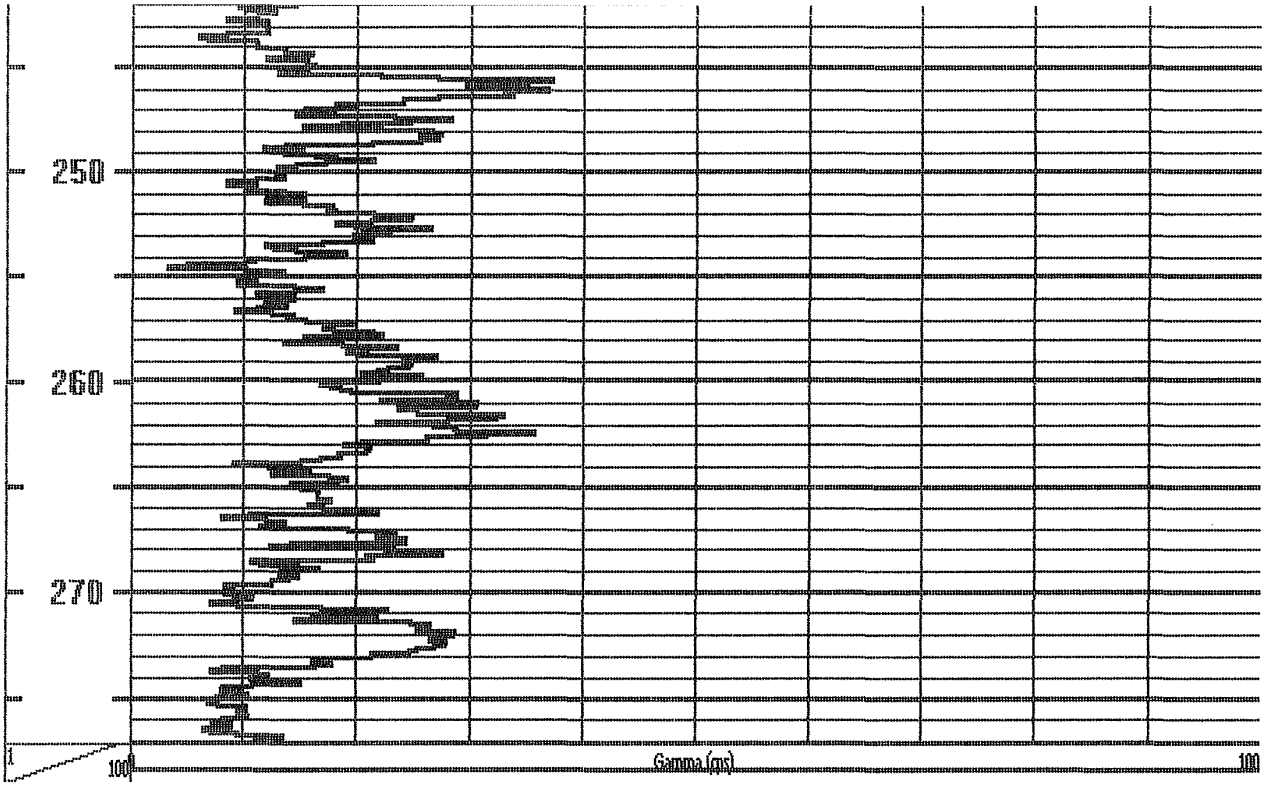
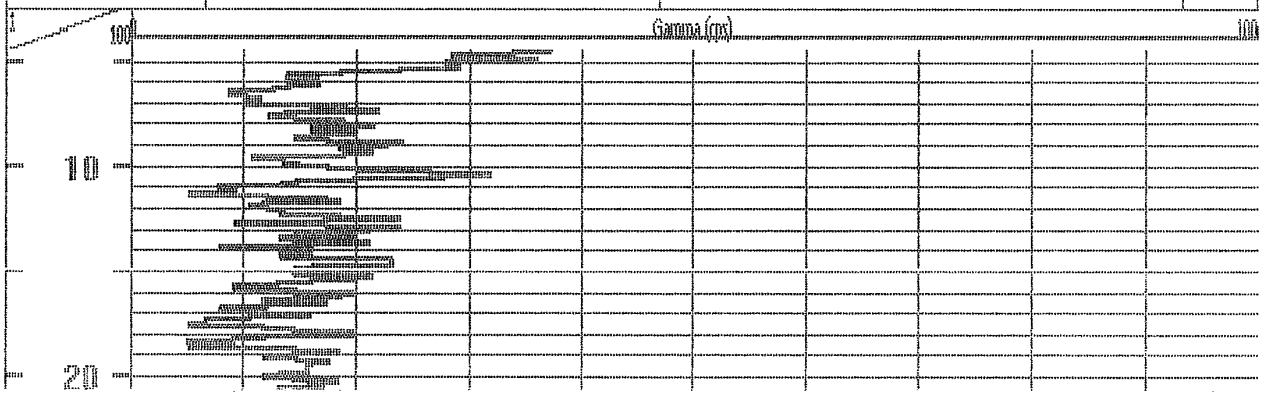


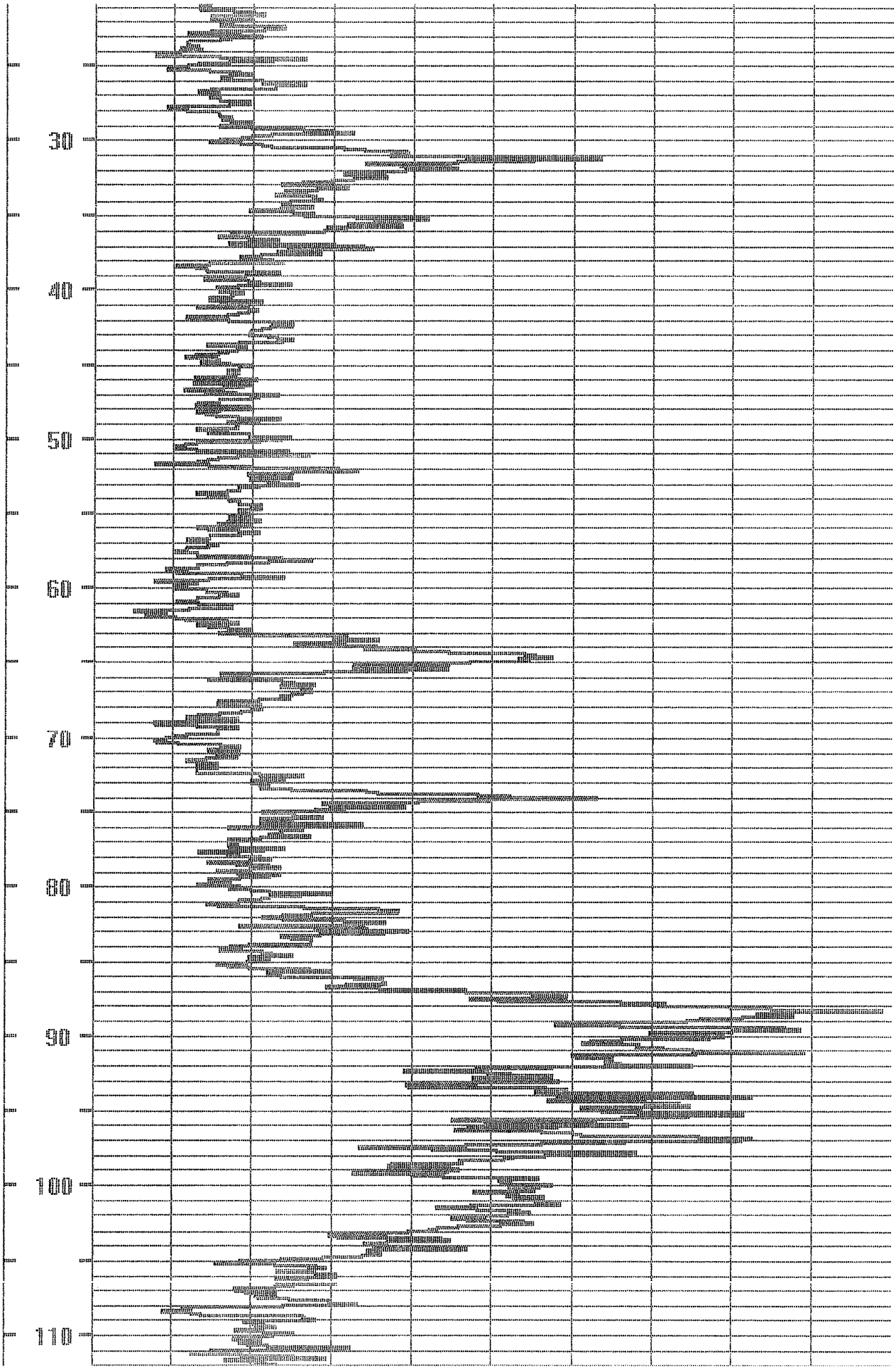
Date: Thursday, July 10, 2008 Time: 14:31 File: C:\My Documents\698\TMW09.rd

GAMMA LOGS WHILE PROBE WAS BEING RAISED OUT OF THE BOREHOLE

Date: Monday, August 25, 2008 Time: 14:45 File: C:\My Documents\698\TMW01up.rd

	COMPANY: DELTA WELL & PUMP CO., INC.			Casing
	Location: NCIA BROMTON DRIVE			
Well	YMW-01		Depth Driller / Depth Logger	
Date	08-25-08	BH Fluid	Logged by: Chris Okon	
File Name	698		Witness: KEVIN	

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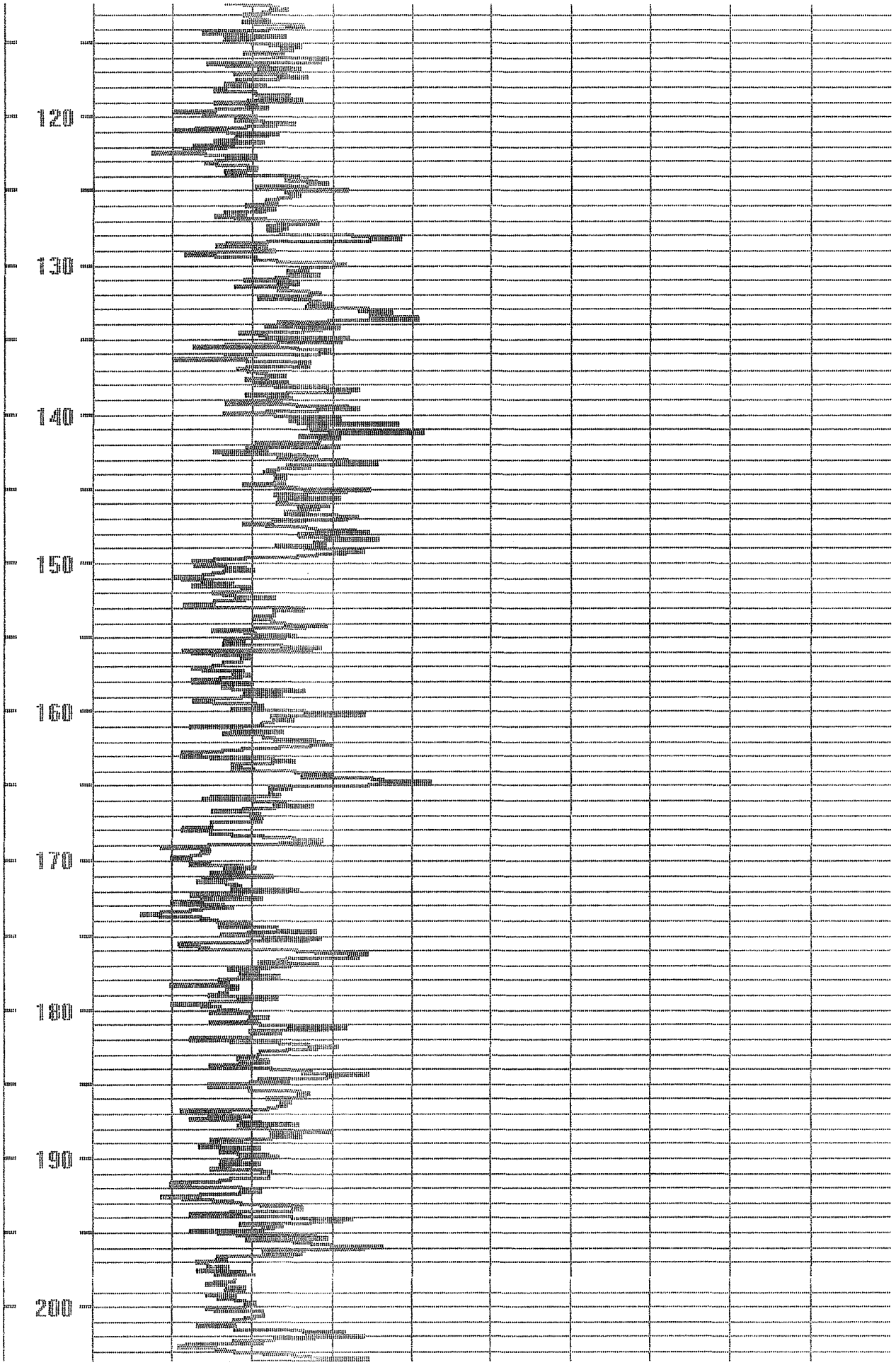
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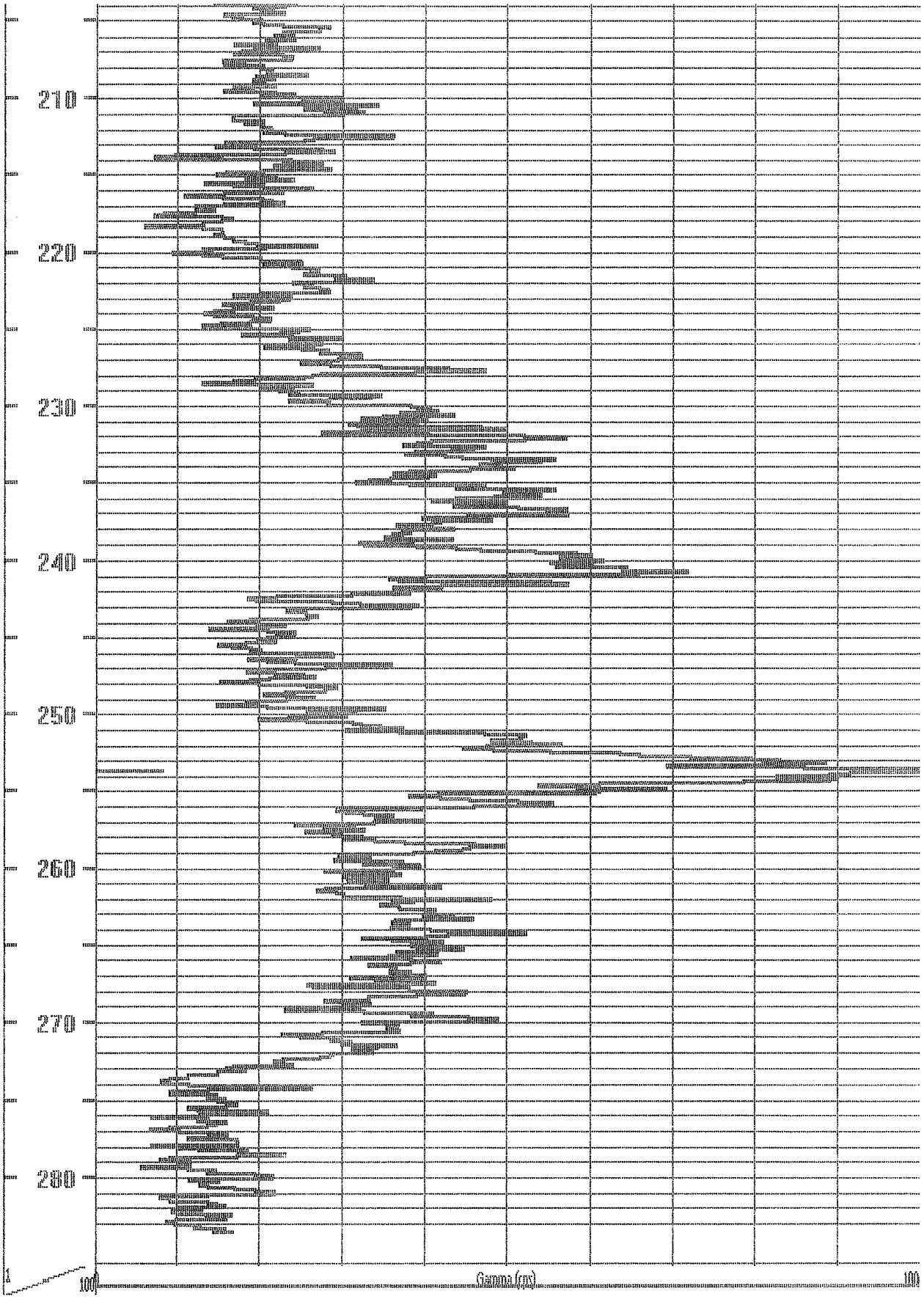
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280
1
100
Gamma (ms)
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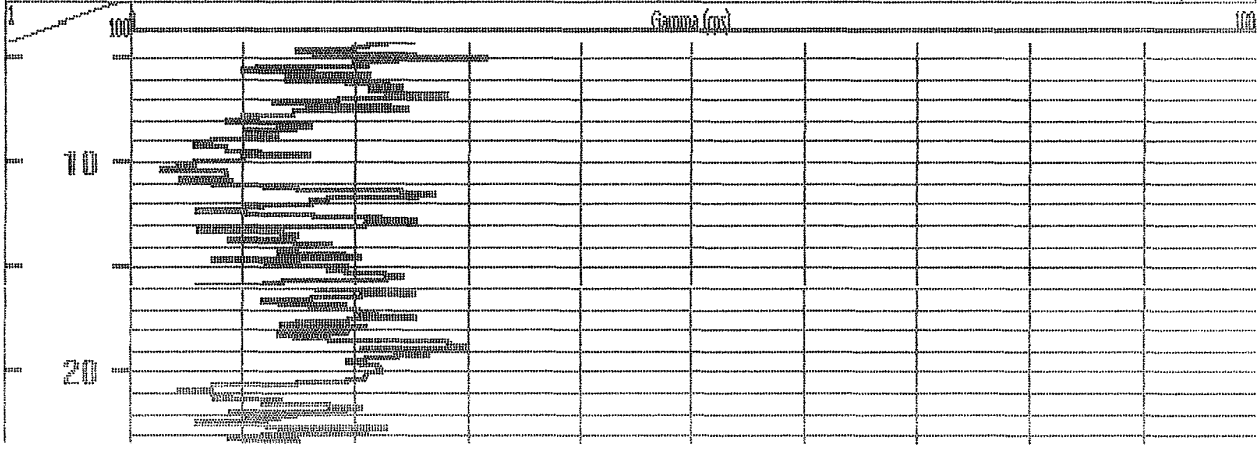
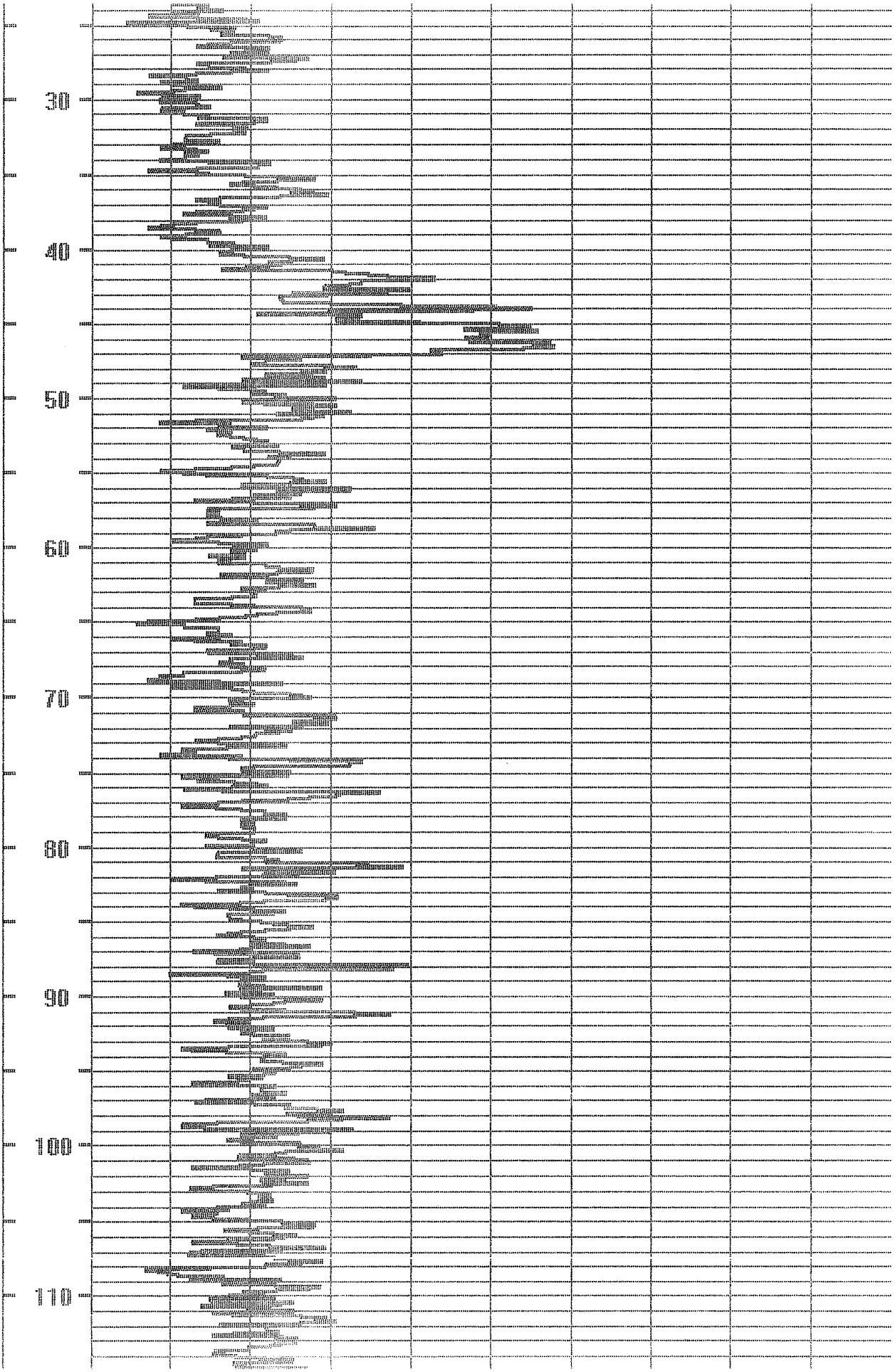
Date: Monday, August 25, 2008 Time: 14:45 File: C:\My Documents\698\TMW01up.rtf

Date: Friday, August 15, 2008 Time: 14:39 File: C:\My Documents\698\TMW02up.rd

	COMPANY: DELTA WELL & PUMP CO., INC.			Casing
	Location: NCIA HOWARD DRIVE			
Well	TMW02		Depth Driller Depth Logger	
Date	08-15-08	BH Fluid	Logged by: Chris Okon	
File Name	698		Witness: KEVIN	

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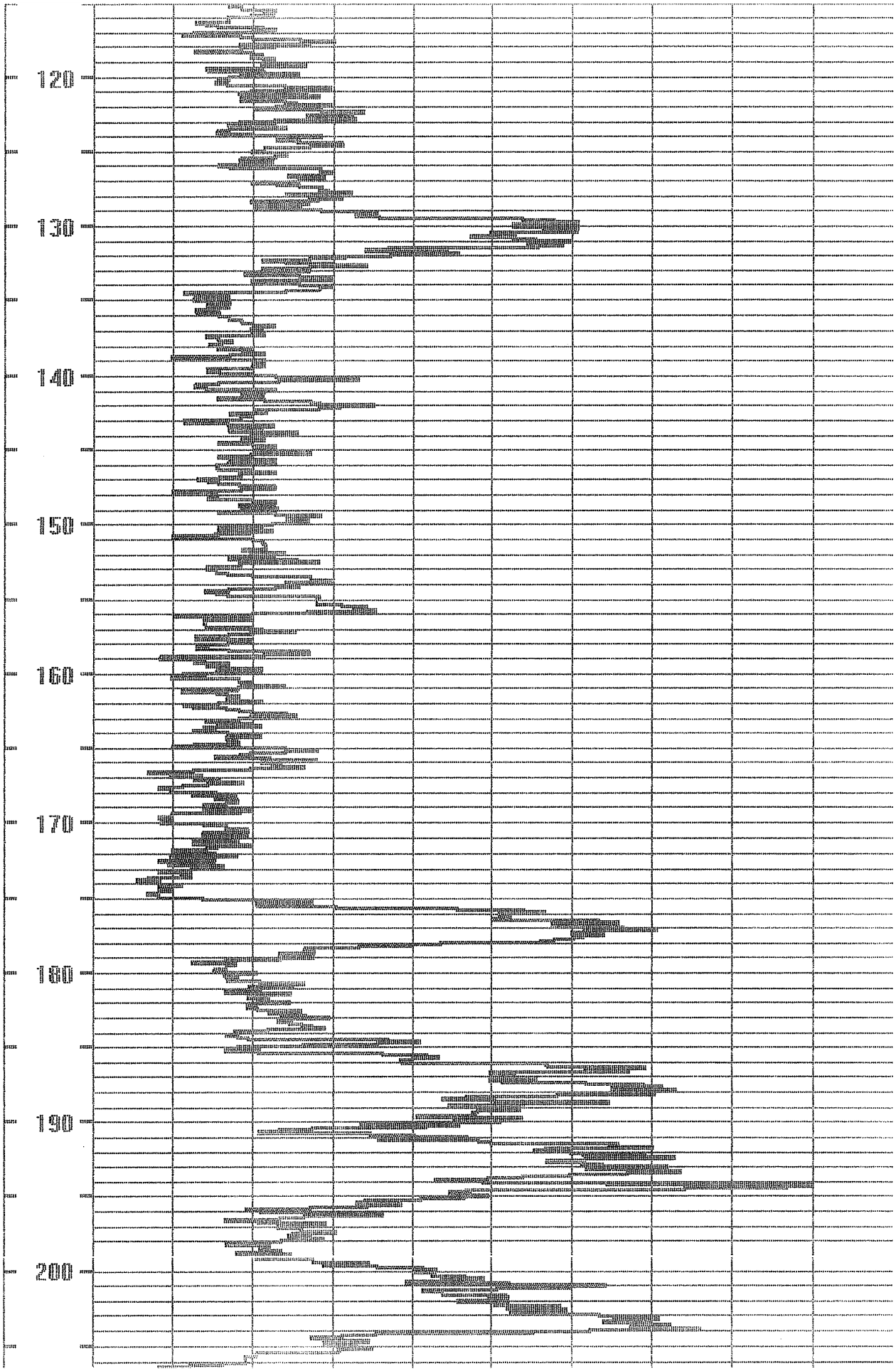
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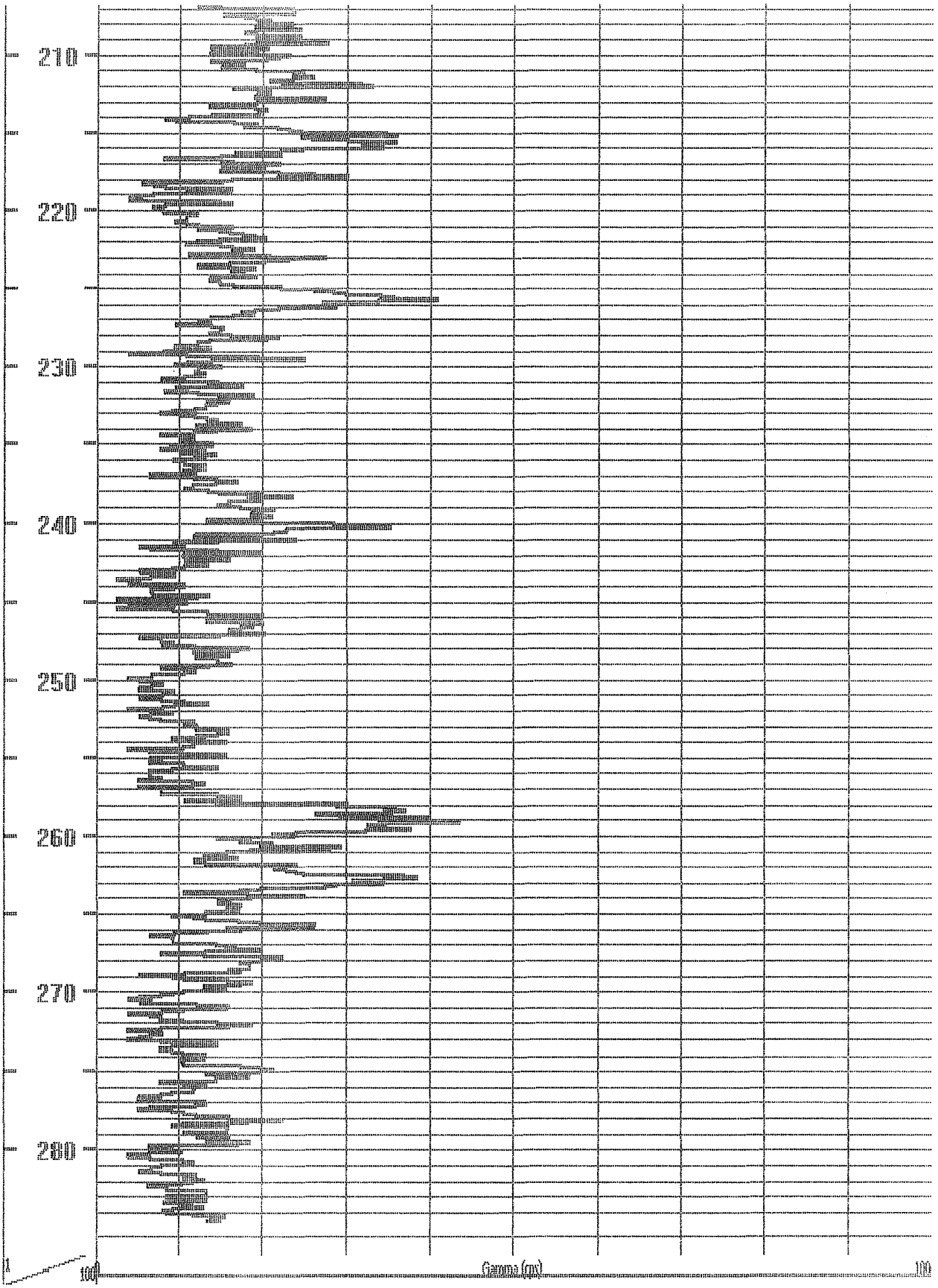
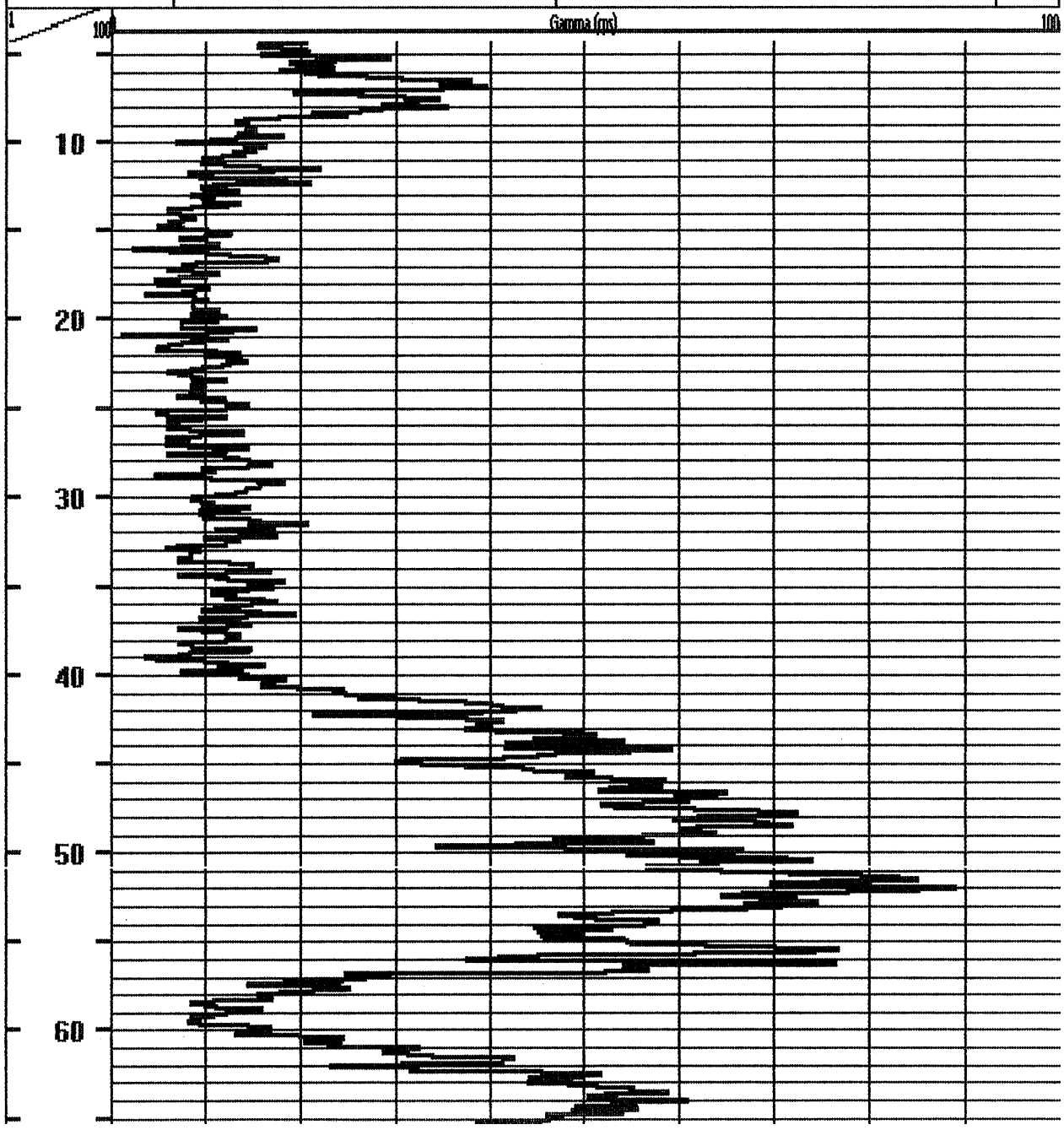
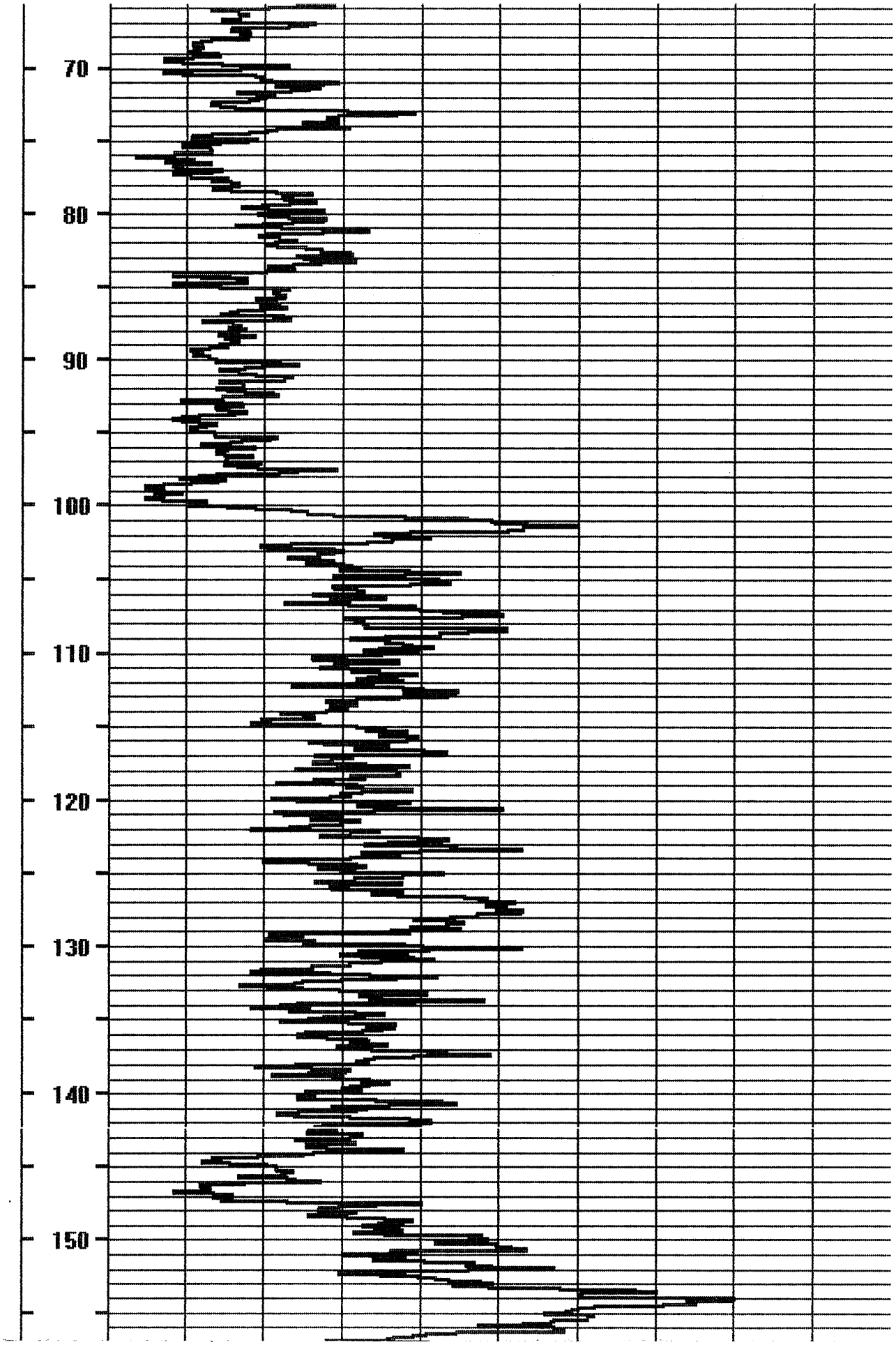


Date: Friday, August 15, 2008 Time: 14:39 File: C:\My Documents\698\TMW02up.rl

Date: Monday, October 13, 2008 Time: 09:40 File: C:\My Documents\698\TMW03Dup.rd

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: NCIA BERNARD DRIVE	
Well: TMW-03D	Depth Driller / Depth Logger	
Date: 10-13-08 / BH Fluid	Logged by: Chris Okon	
File Name: 698	Witness: Kevin Metkiff	

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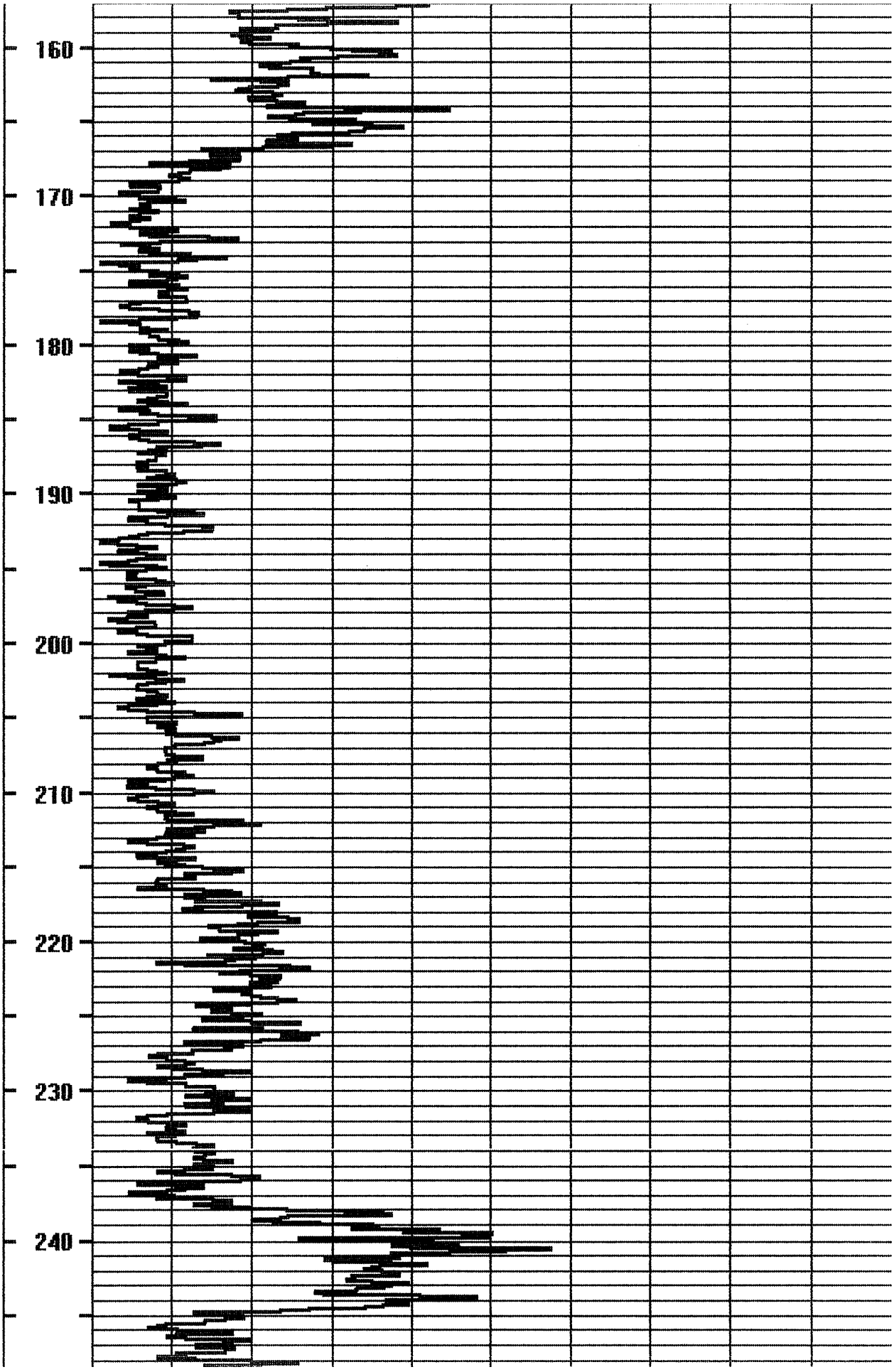
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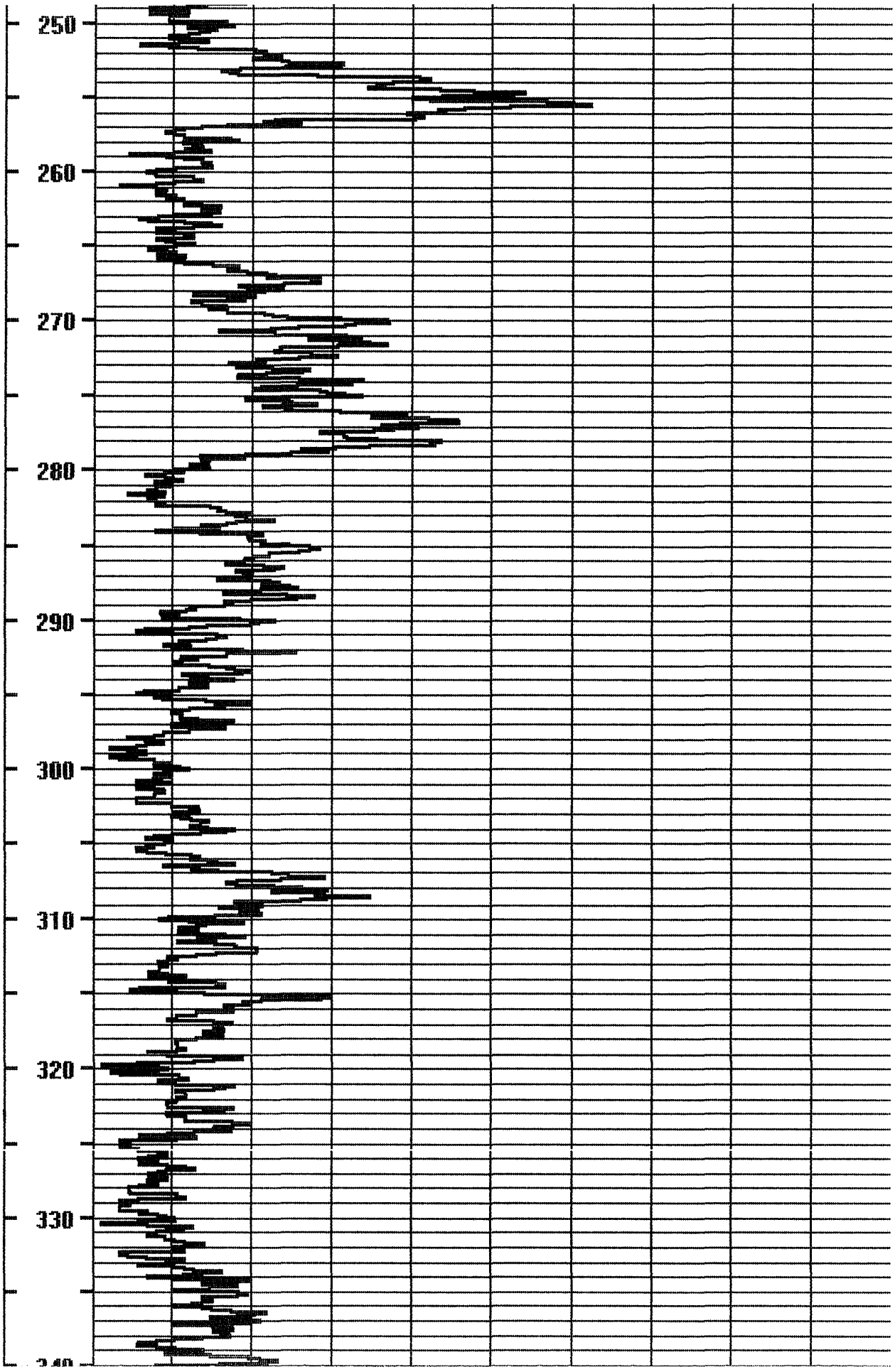
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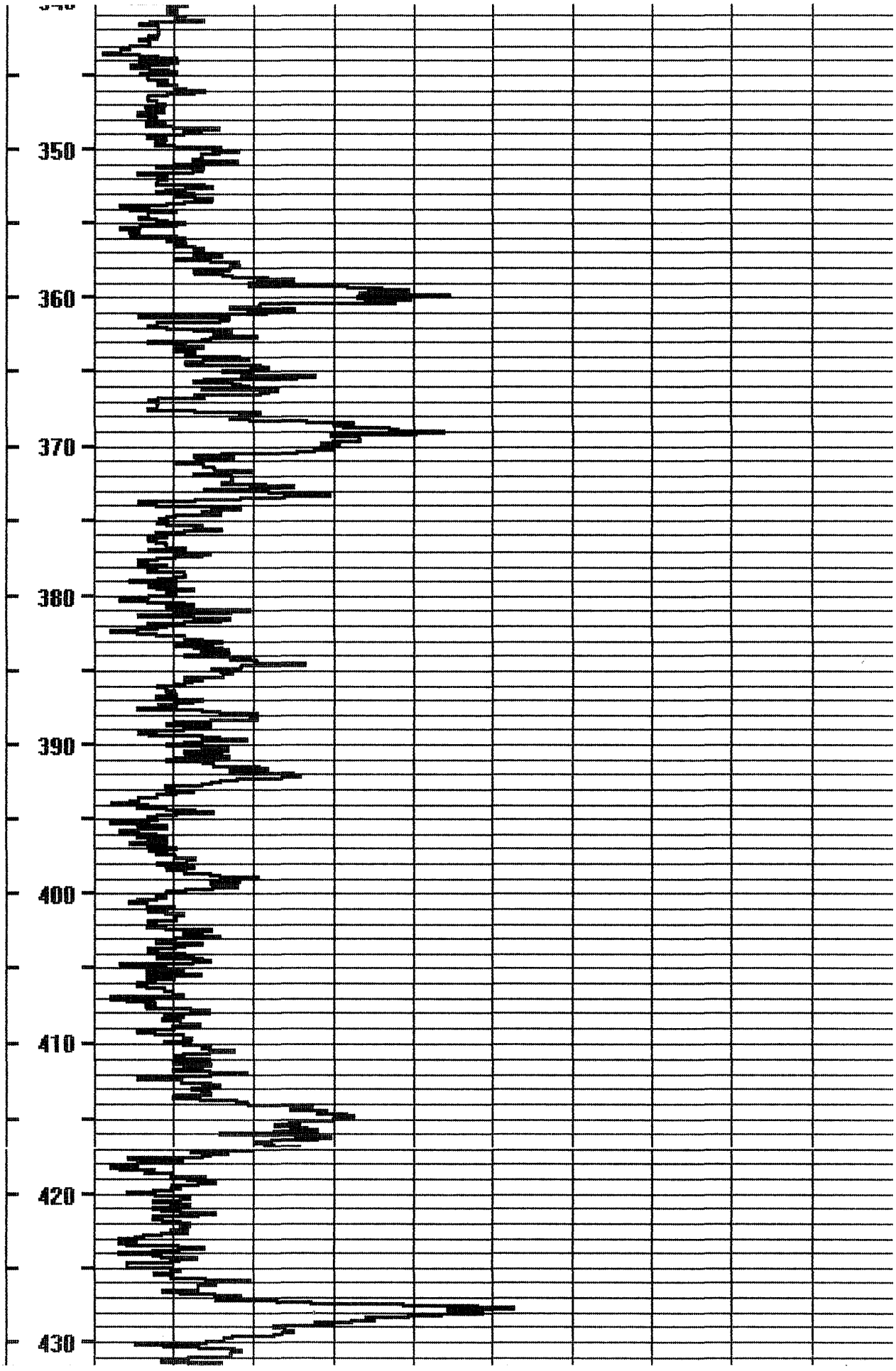
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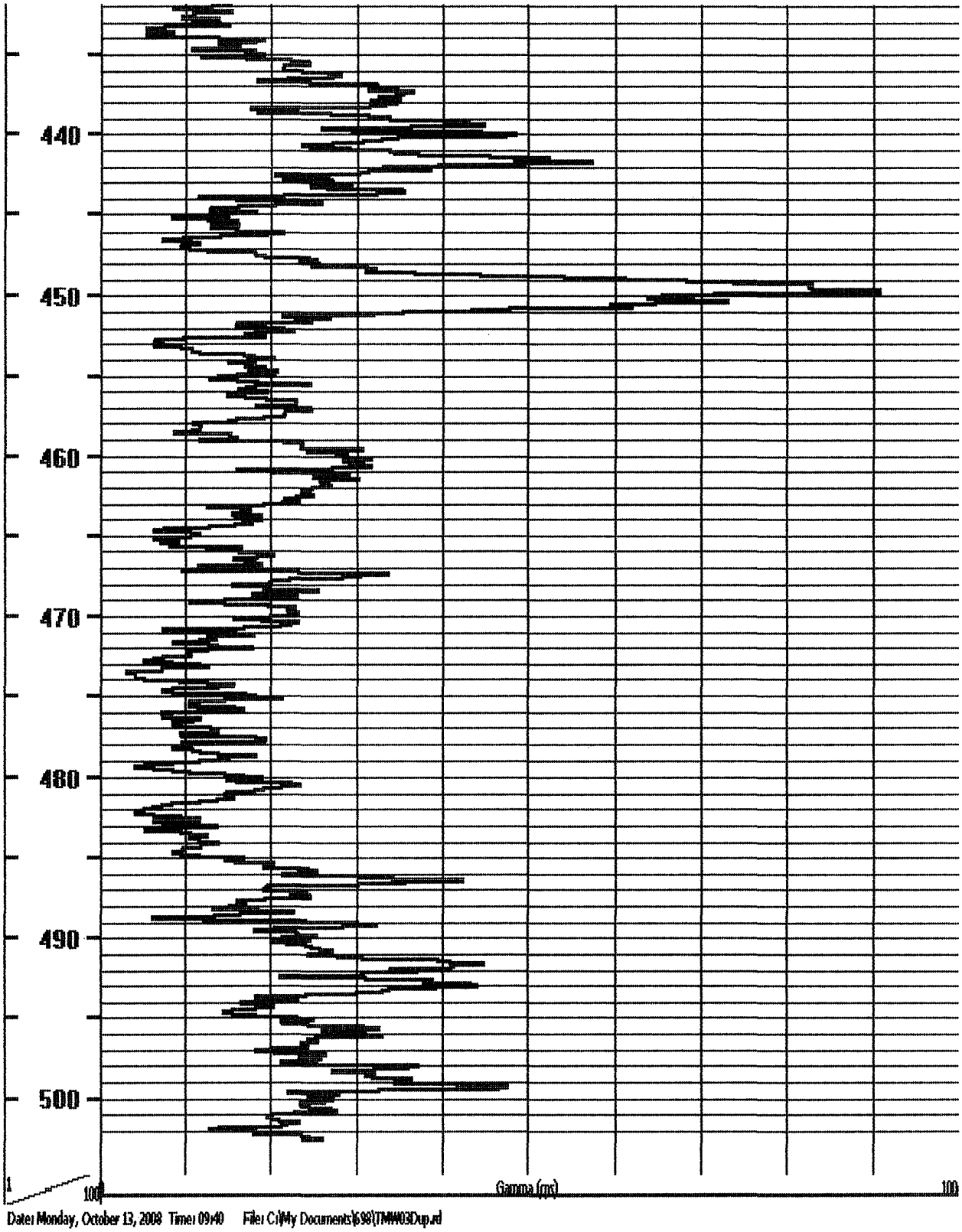
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1
100
Gamma (cps)
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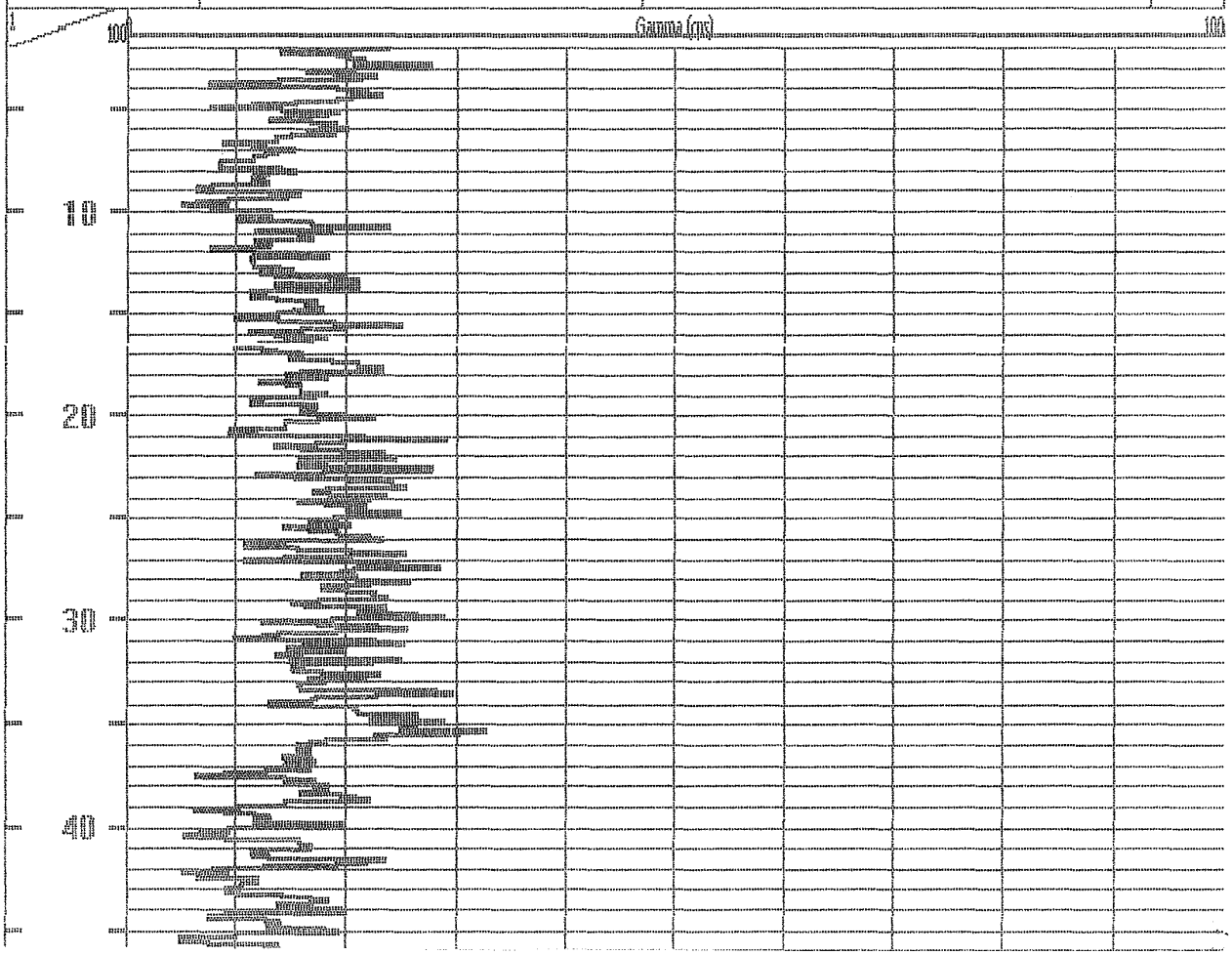
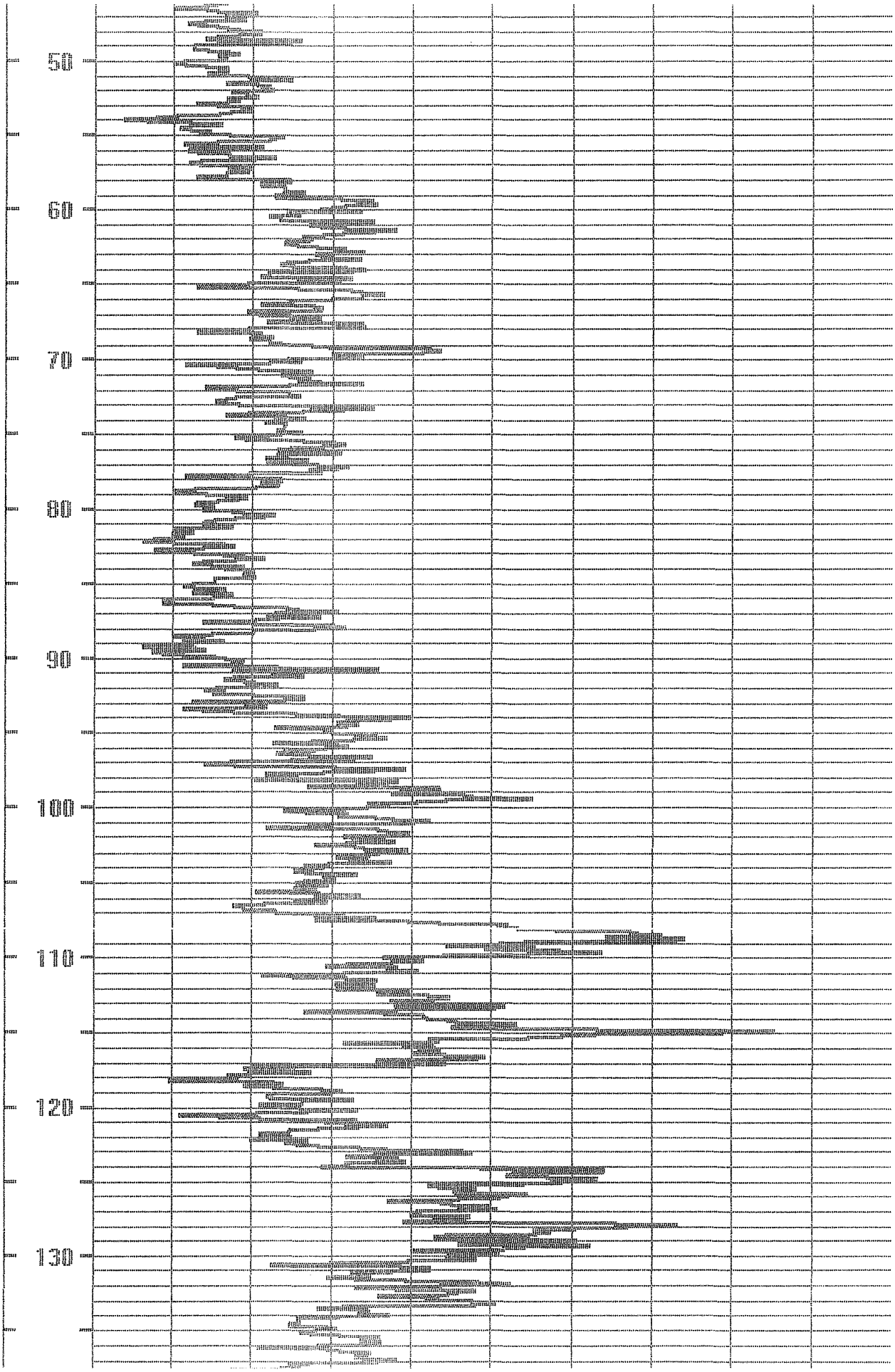
Date: Monday, October 13, 2008 Time: 09:40 File: C:\My Documents\698\TMW03Dup.rd

Date: Thursday, July 24, 2008 Time: 14:22 File: C:\My Documents\698\TMW04up.xl

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: NCIA LINDY ROAD	
Well: TMW04	Depth Driller / Depth Logger:	
Date: 07-24-08	BH Fluid:	Logged by: Chris Okon
File Name: 698		Witness: KEVIN

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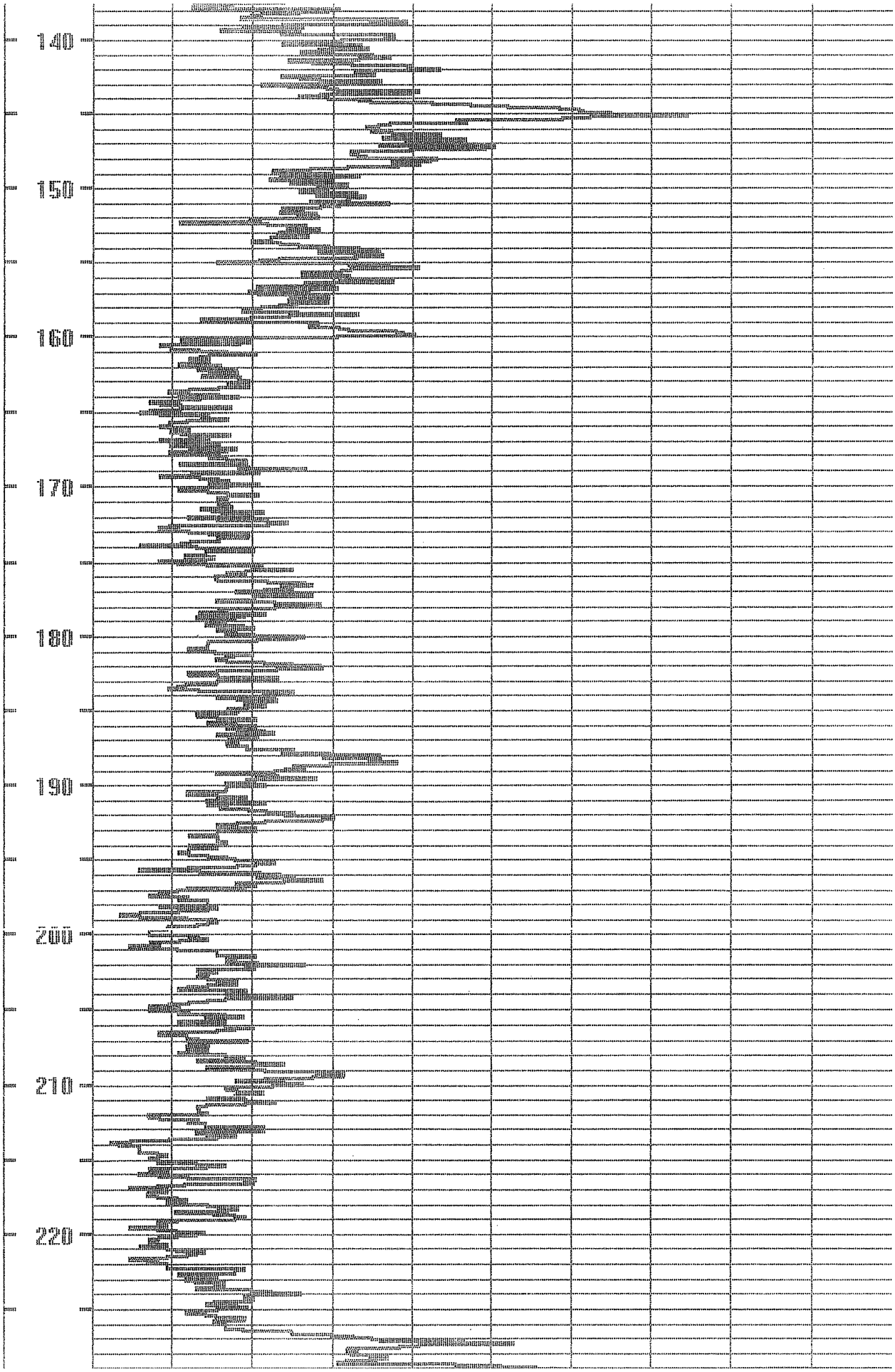
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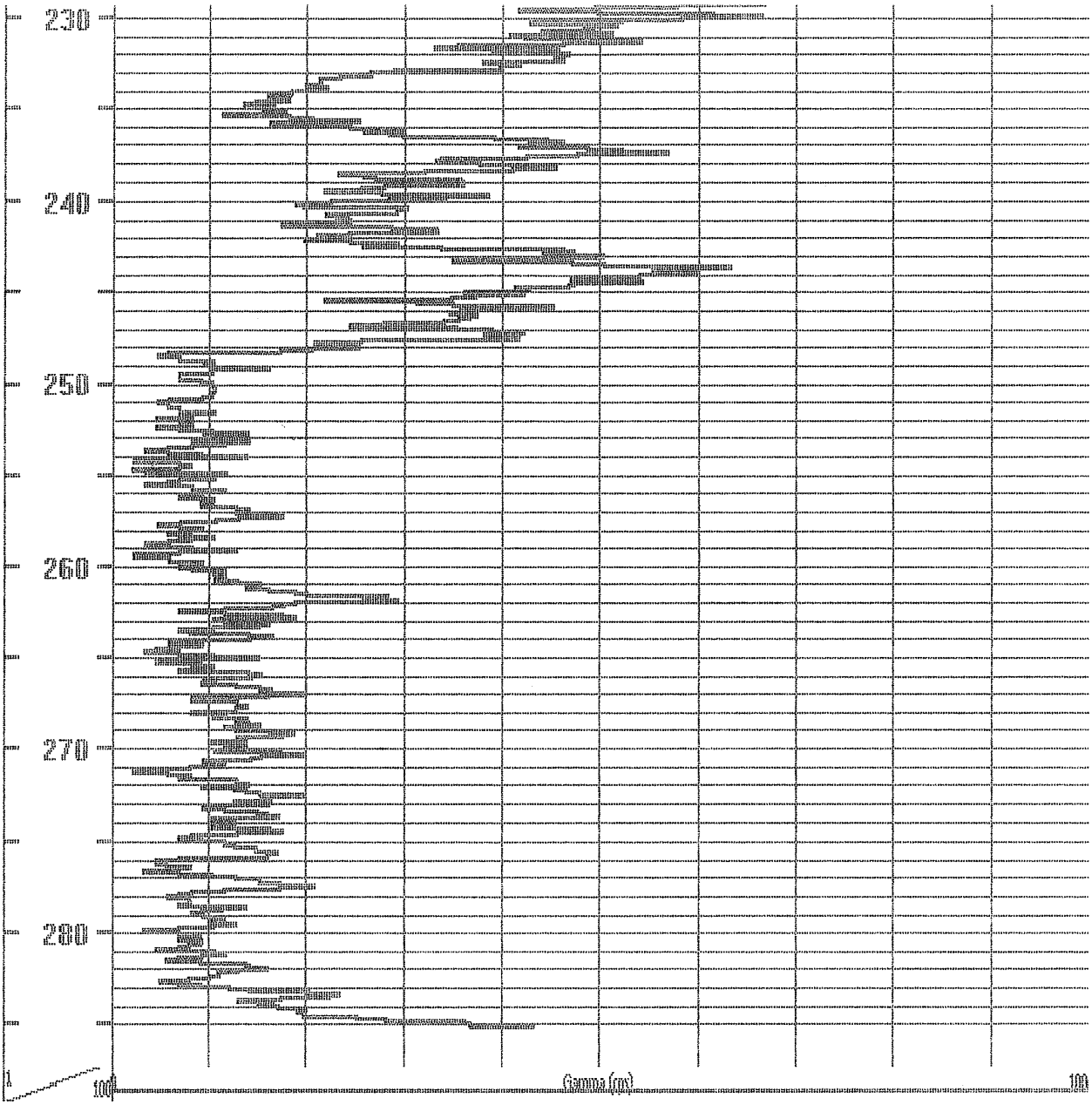
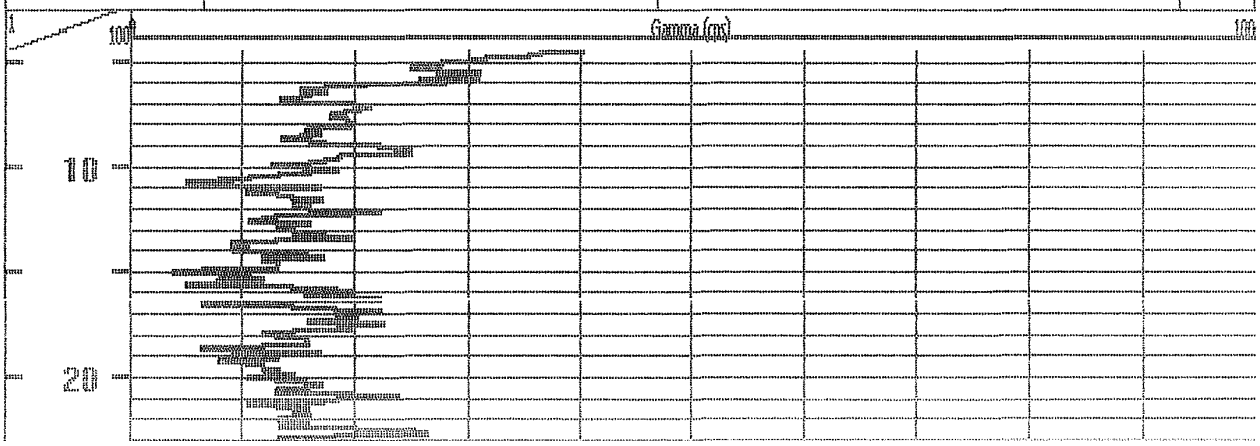


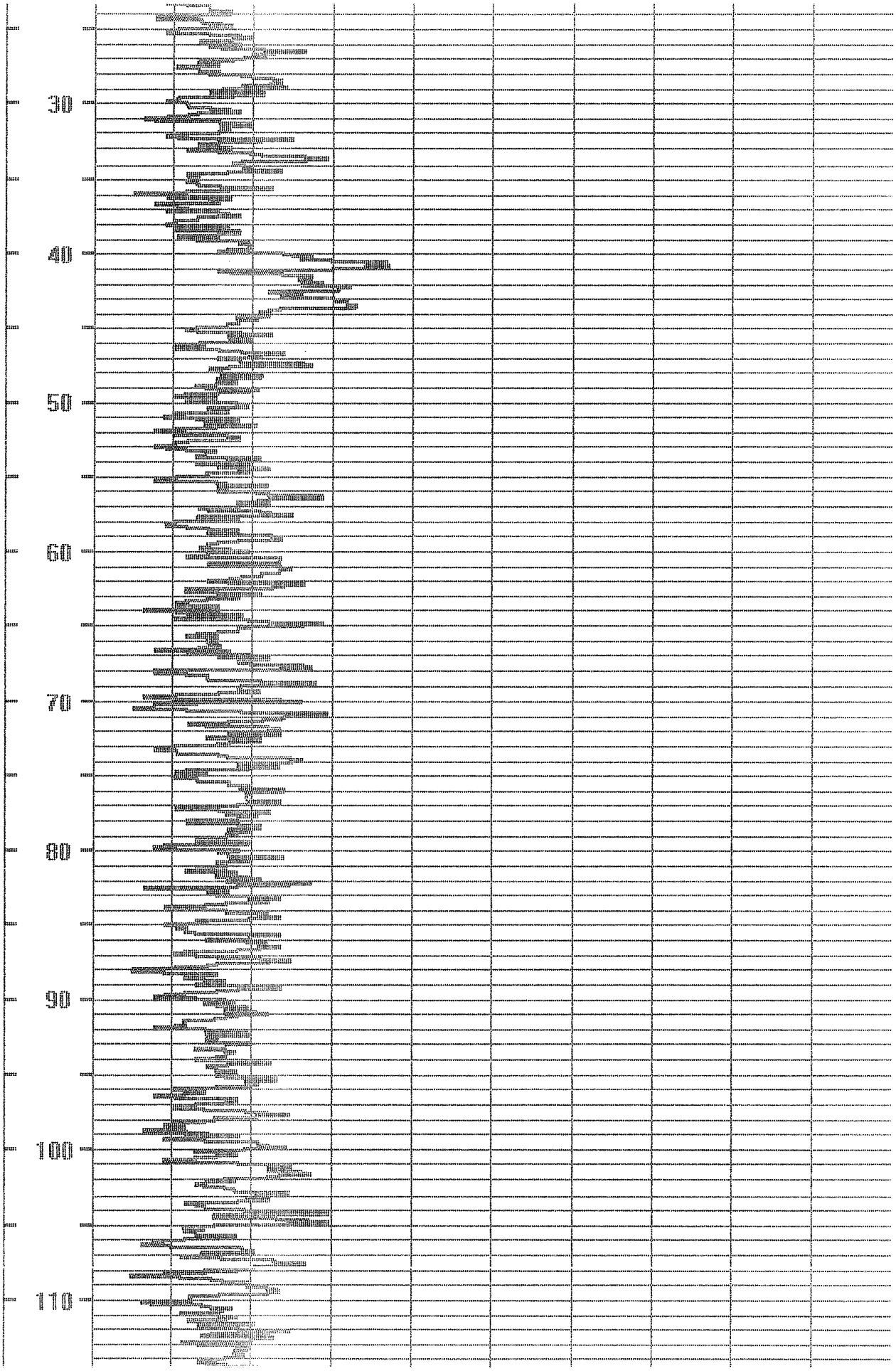
Date: Thursday, July 24, 2008 Time: 14:22 File: C:\My Documents\6581TM4W04up.xl

Date: Thursday, August 07, 2008 Time: 13:32 File: C:\My Documents\698\TMW05up.rd

	COMPANY: DELTA WELL & PUMP CO., INC.				Casing
	Location: NCIA MERILLON AVE				
Well	TMW05			Depth Driller	
				Depth Logger	
Date	08-07-08	BH Fluid		Logged by: Chris Okon	
File Name	698			Witness: KEVIN	



R2-0002416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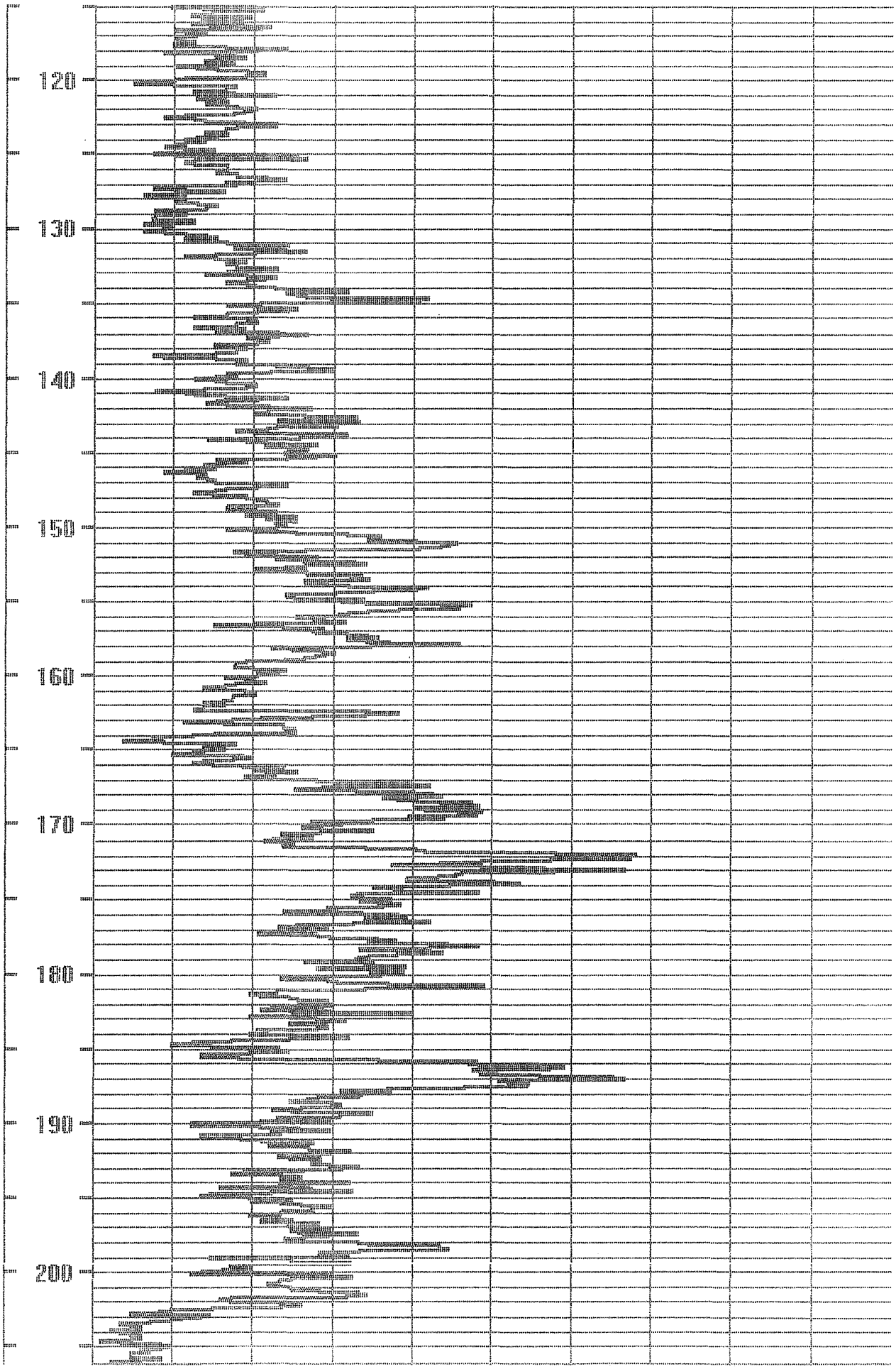
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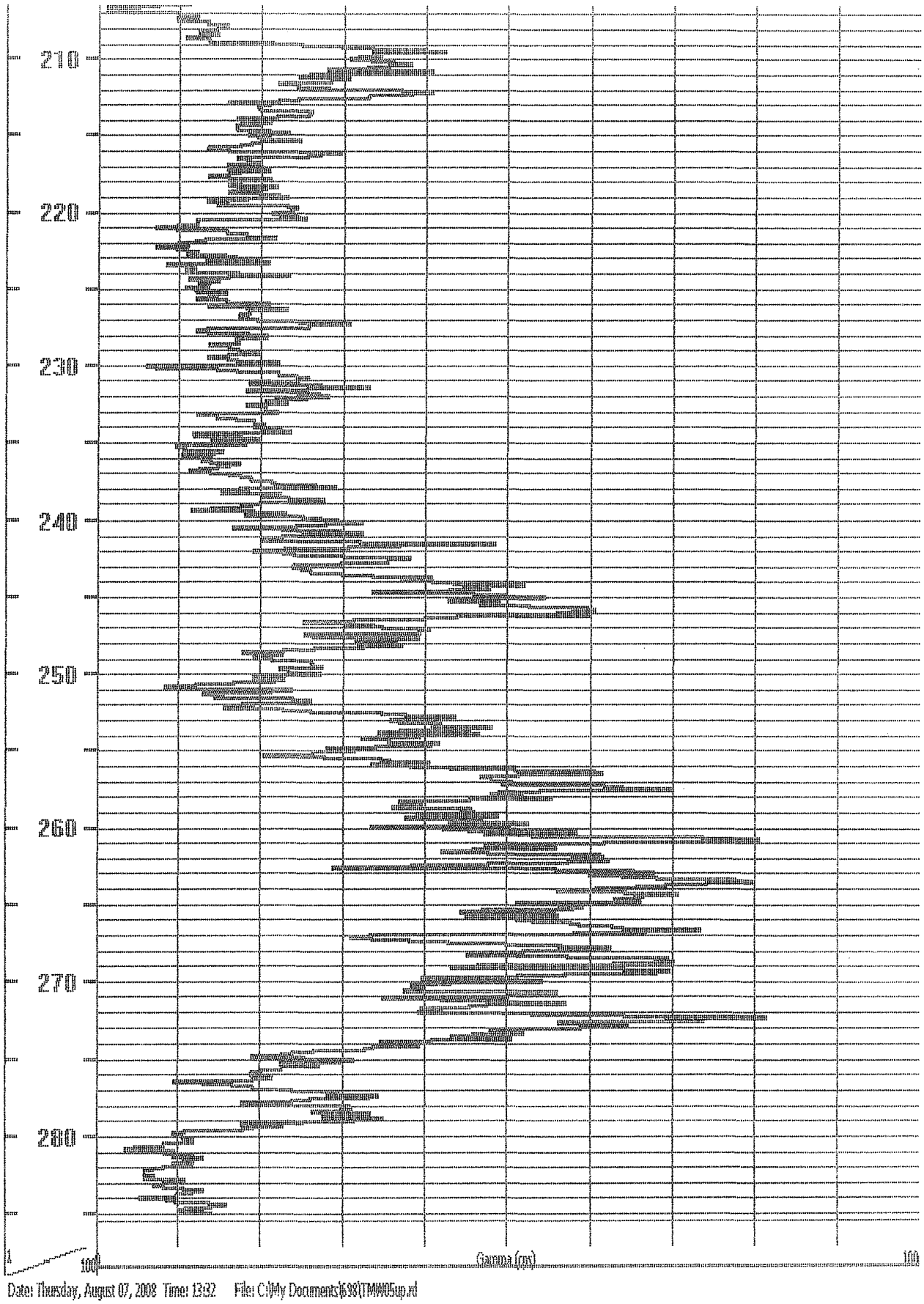
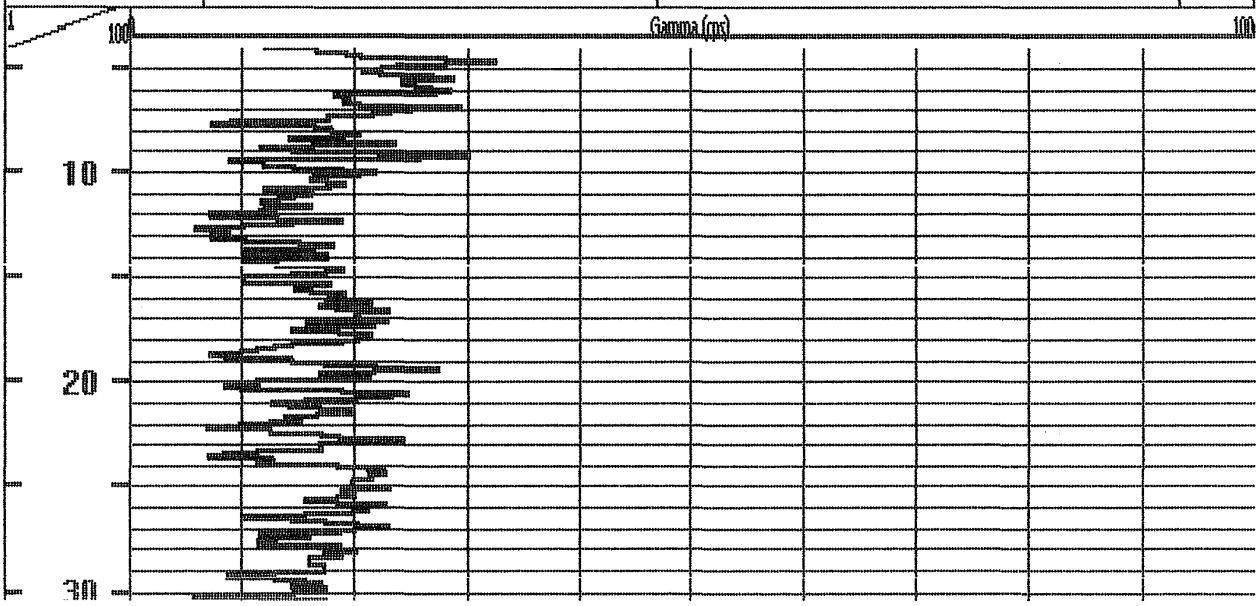


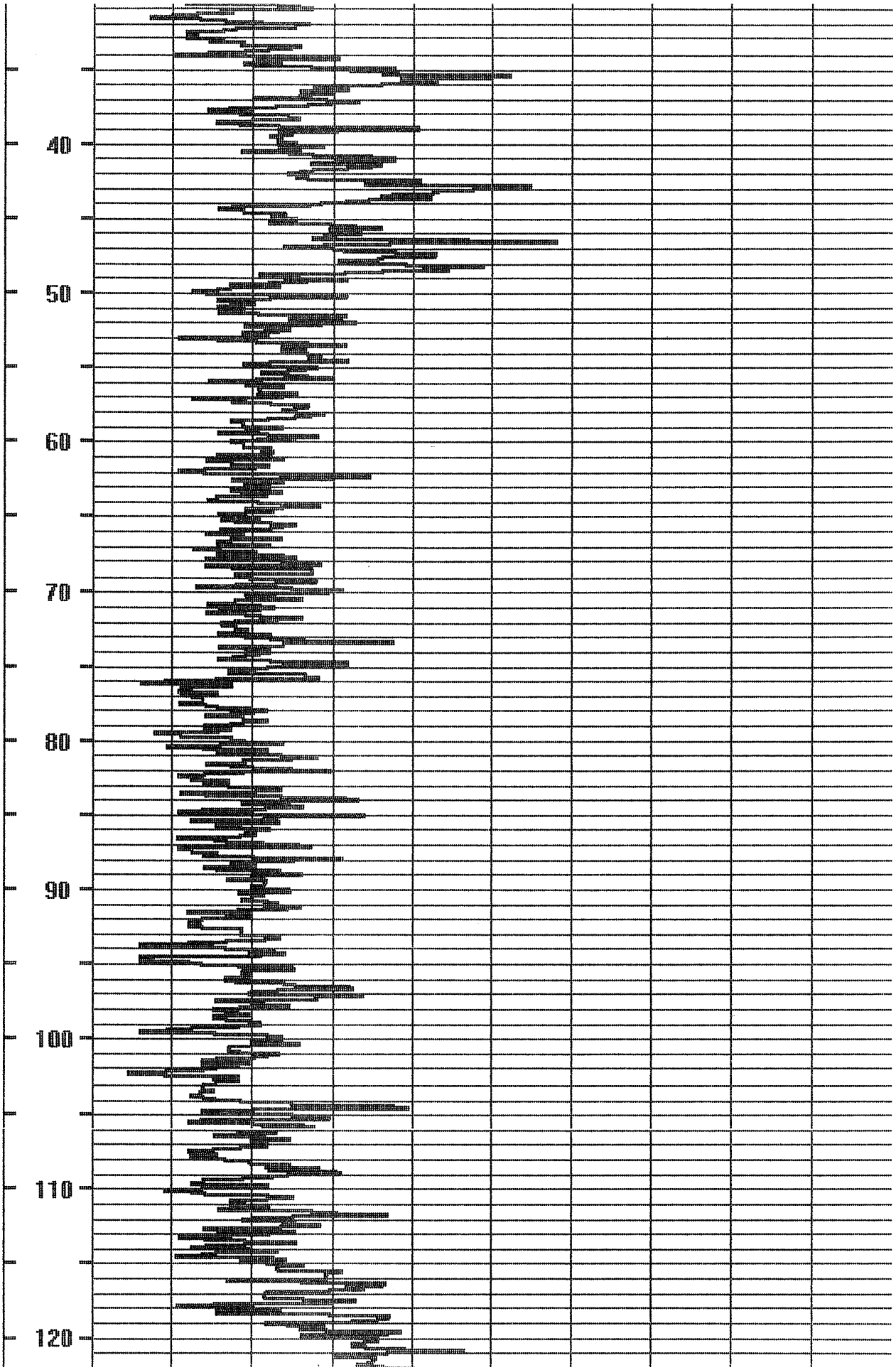
Date: Thursday, August 07, 2008 Time: 13:32 File: C:\My Documents\698\TMW05up.rd

Date: Friday, June 20, 2008 Time: 08:17 File: C:\My Documents\698\tw06up.rd

	COMPANY: DELTA WELL & PUMP CO., INC.					Casing
	Location: NCIA ASTER PLACE					
Well	TW-06			Depth Driller		
				Depth Logger		
Date	06-20-08	BH Fluid		Logged by:	Chris Okon	
File Name	698			Witness:	Kevin Metkiff	



R2-0002420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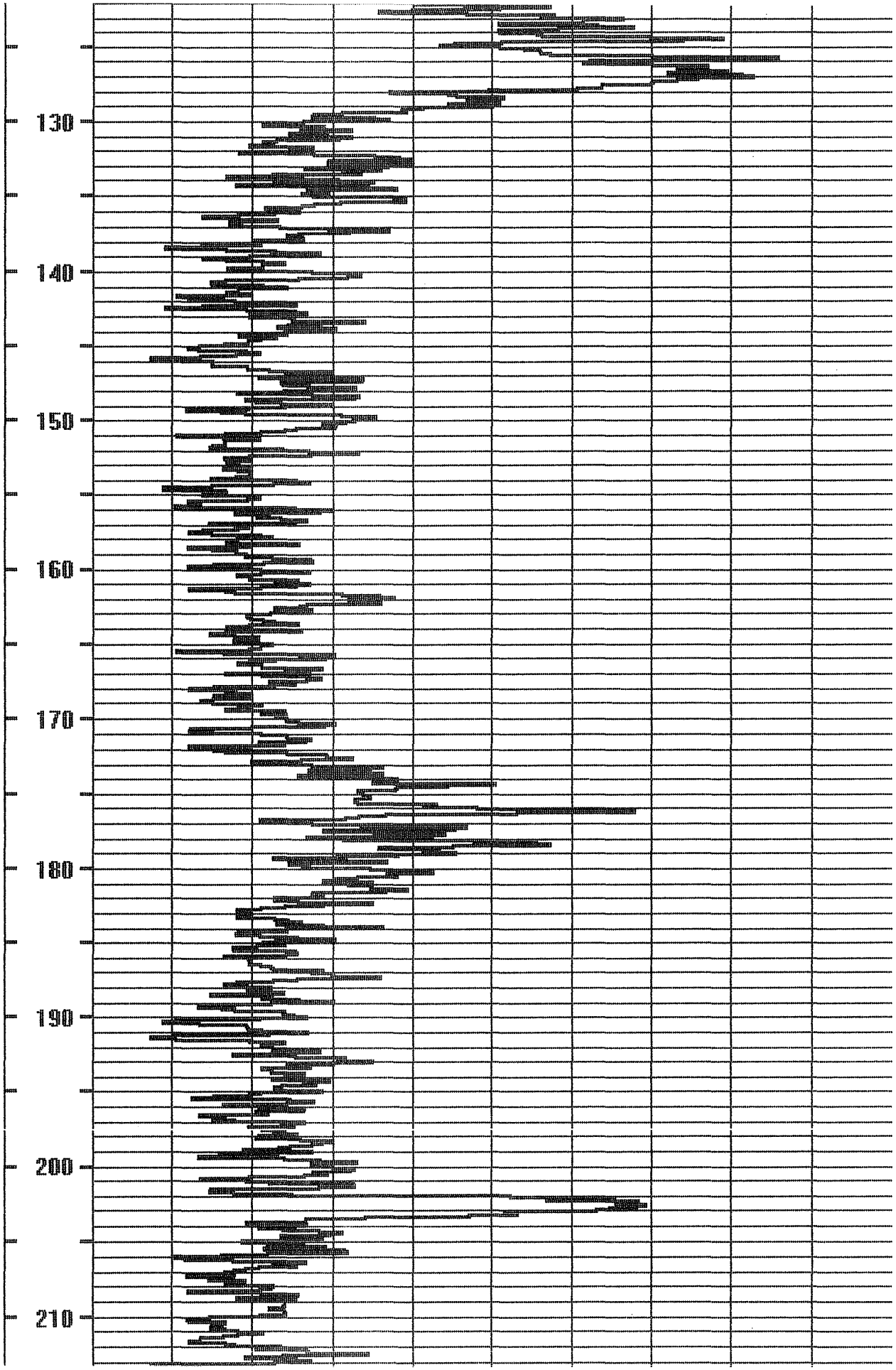
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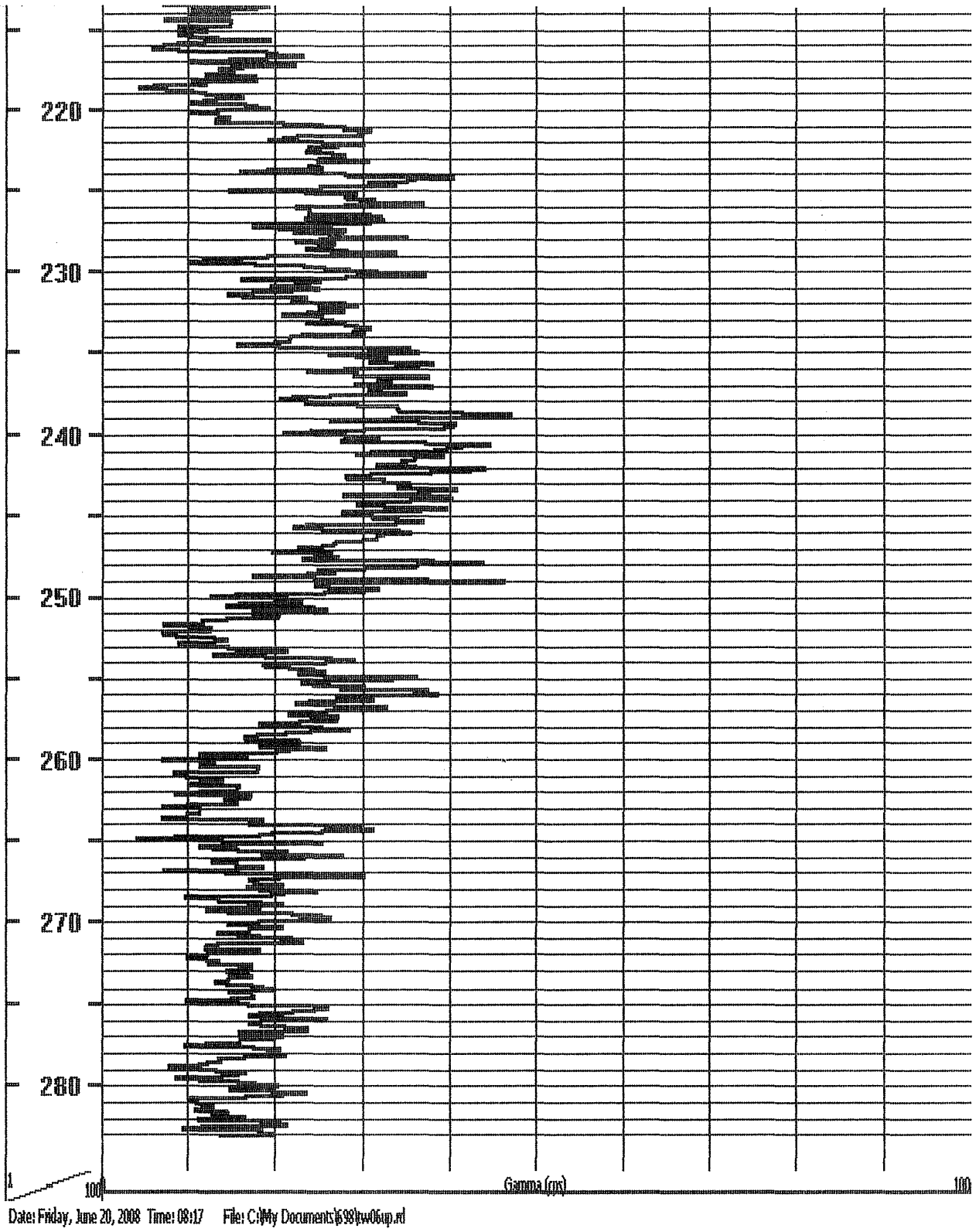
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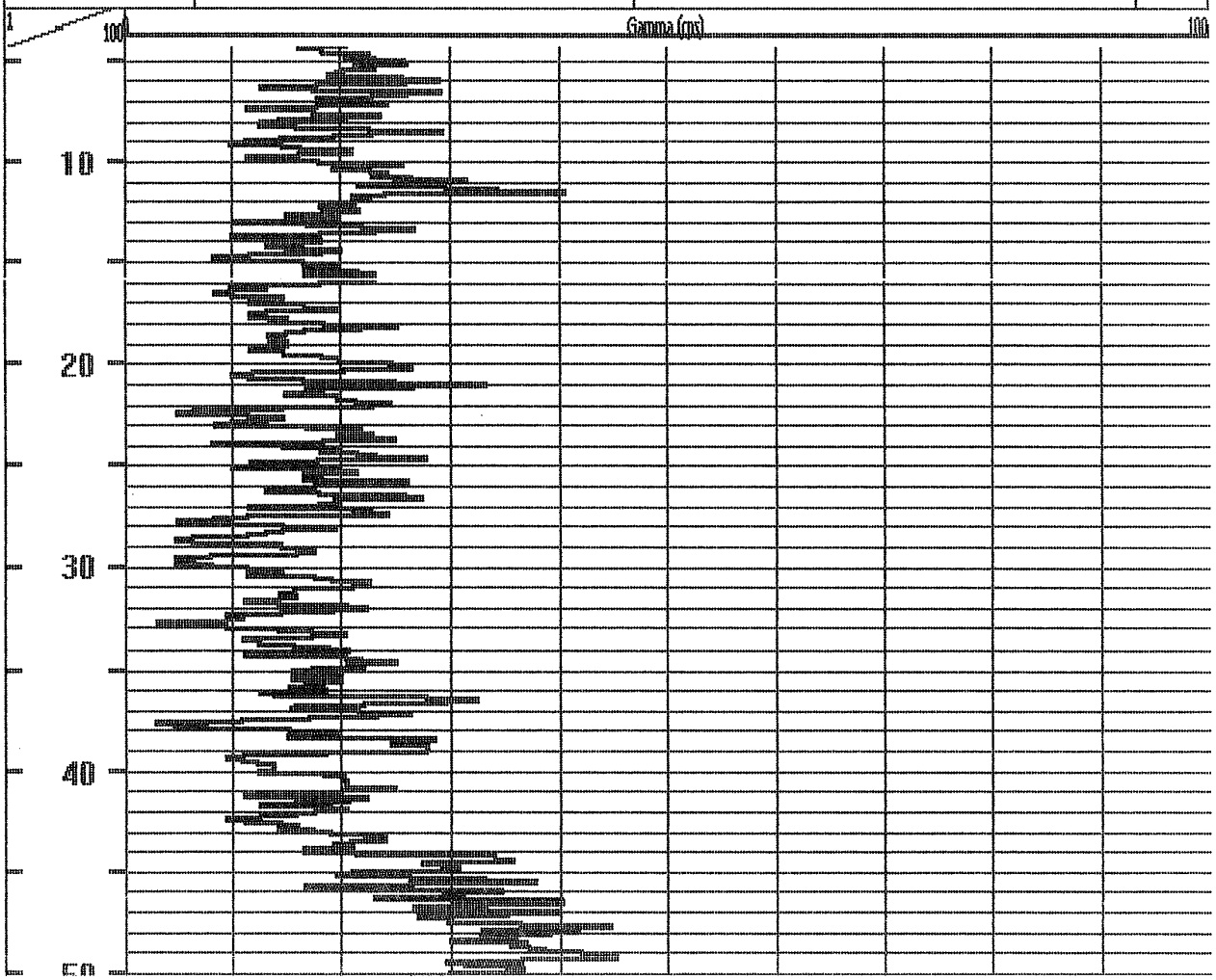
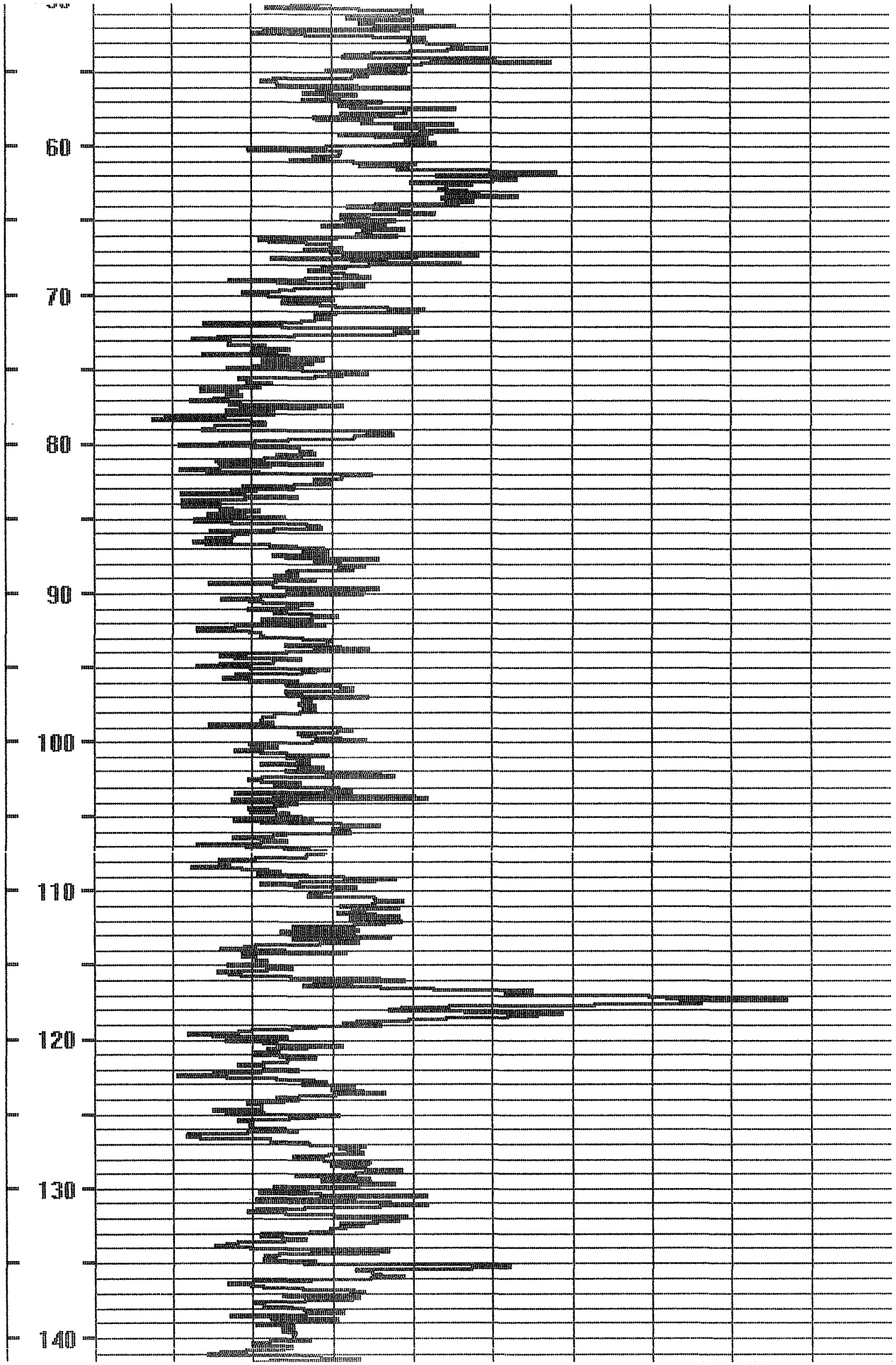
100
Gamma (cps)
100
Date: Friday, June 20, 2008 Time: 08:17 File: C:\My Documents\699\tw06up.rl

Date: Monday, June 30, 2008 Time: 12:02 File: C:\My Documents\698\tmw07up.rd

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: HYACINTH PLACE	
Well: NCIA TMW-07	Depth Driller / Depth Logger	
Date: 06-30-08	BH Fluid	Logged by: Chris Okon
File Name: 698		Witness: Kevin

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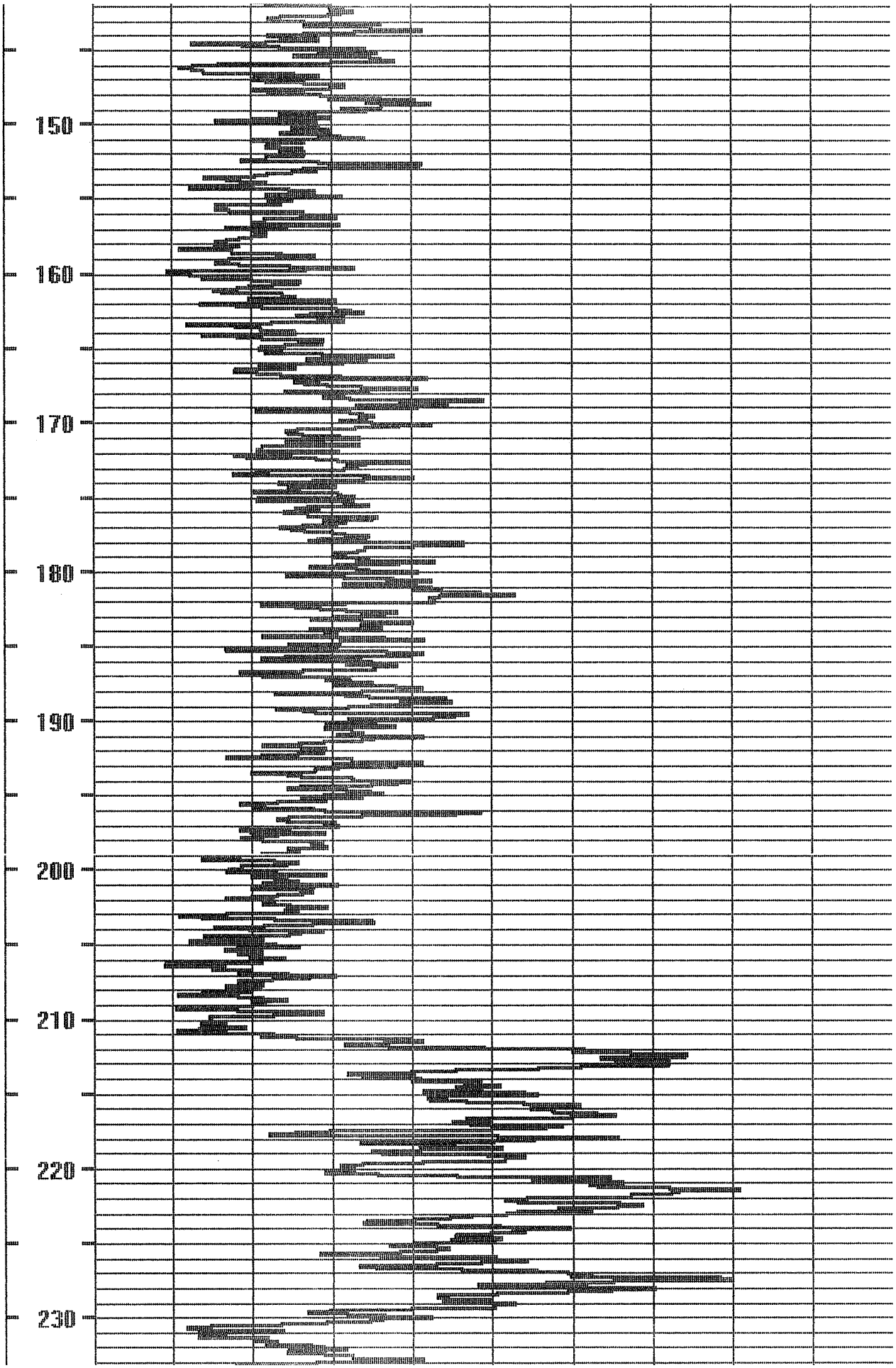
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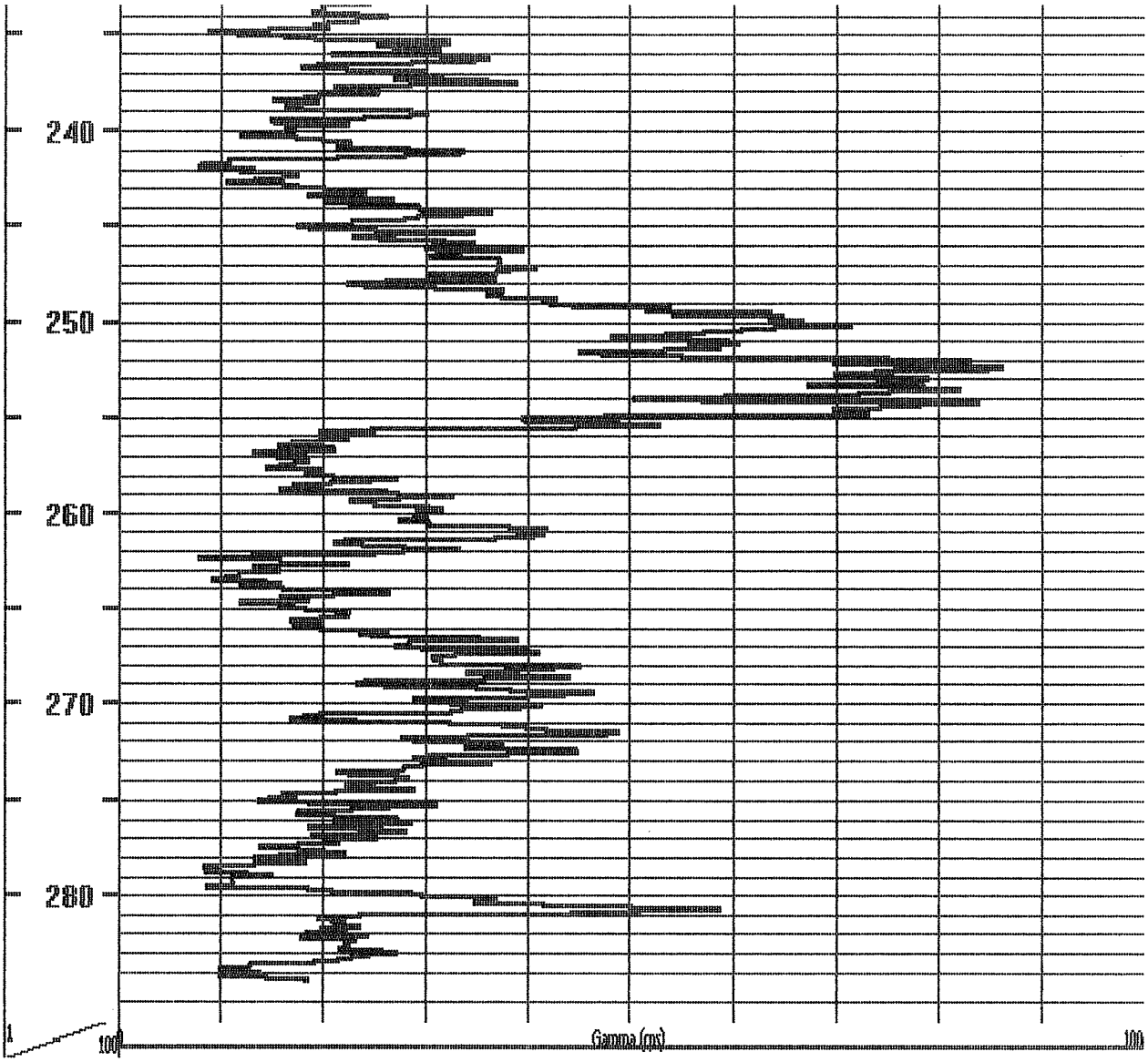
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Gamma (cps)
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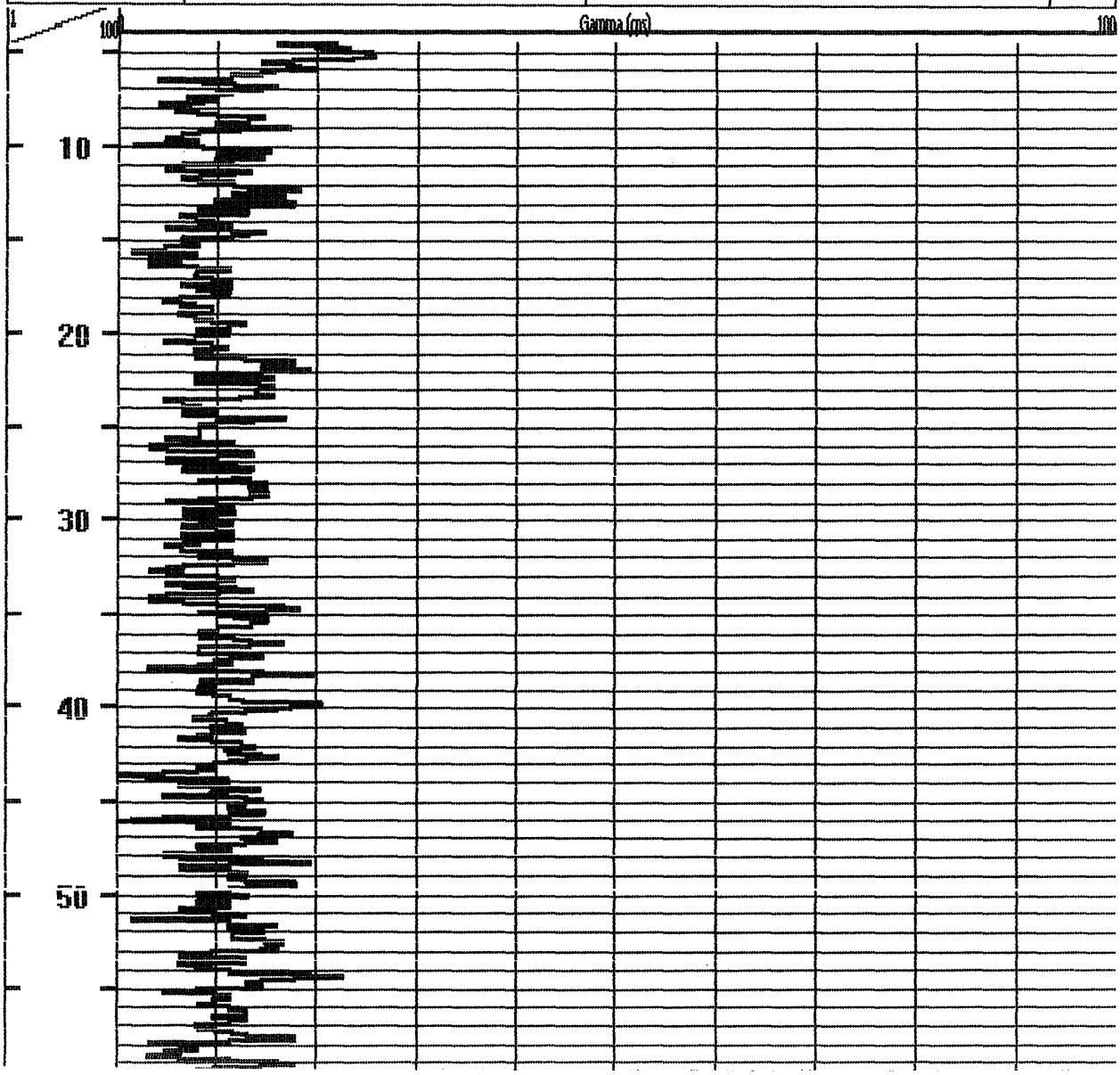
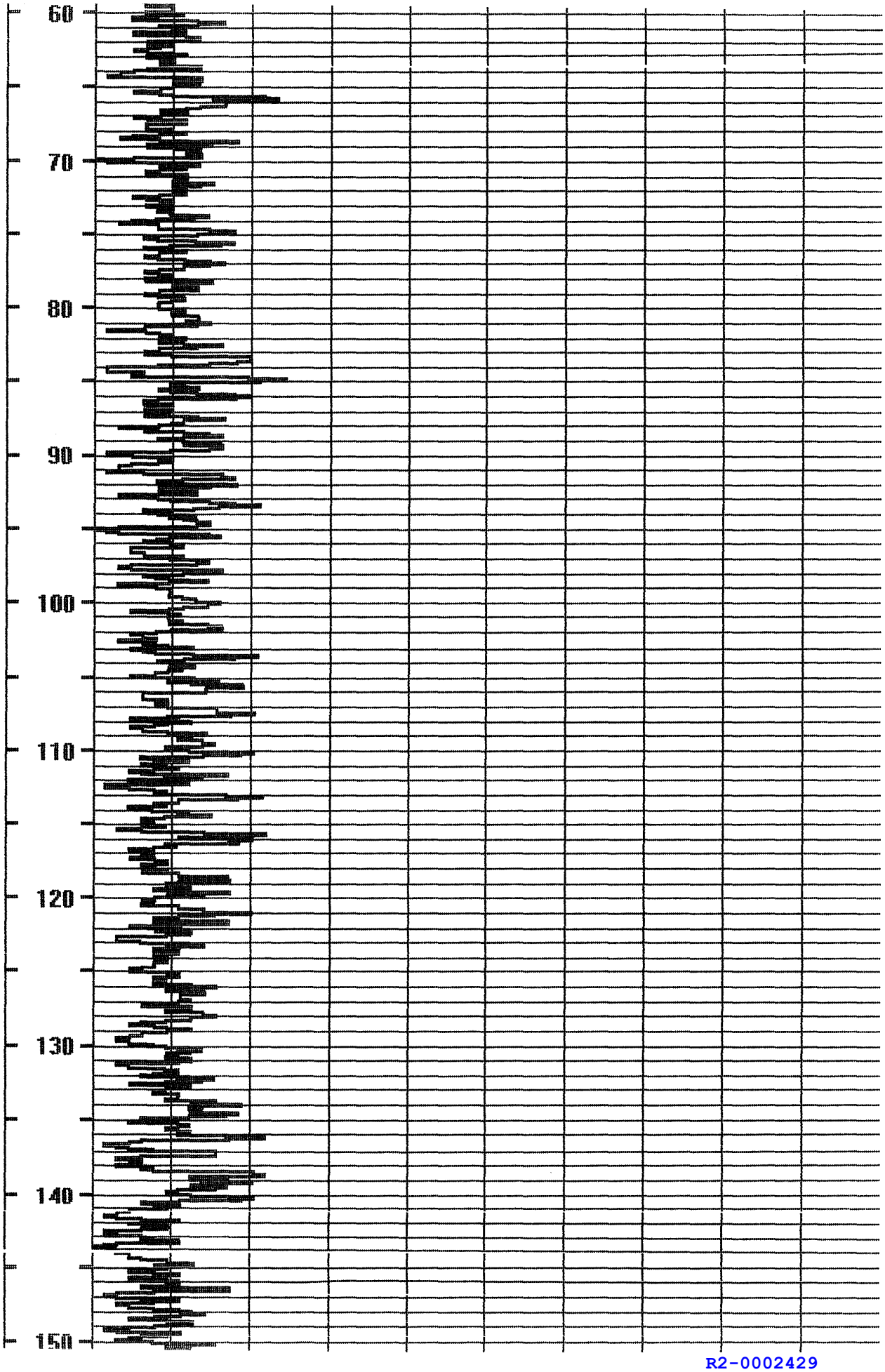
Date: Monday, June 30, 2008 Time: 12:02 File: C:\My Documents\698\mw07up.rd

Date: Friday, November 14, 2008 Time: 15:18 File: C:\My Documents\698\TMW8Dup.rd

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: NCIA - LINDY ROAD	
Well: TMW-8D		Depth Driller / Depth Logger
Date: 11-14-08	BH Fluid	Logged by: Chris Okon
File Name: 698		Witness: Kevin

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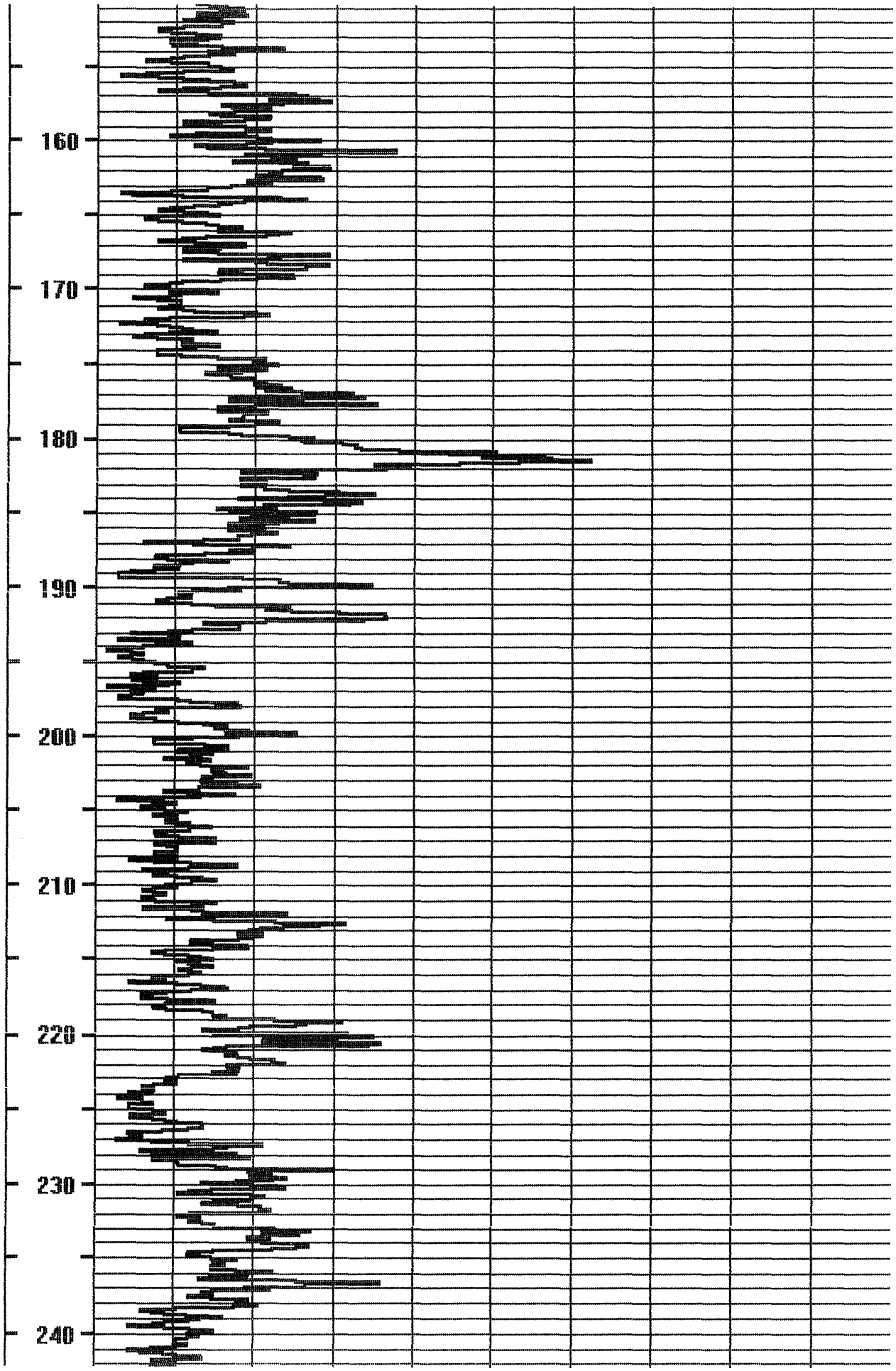
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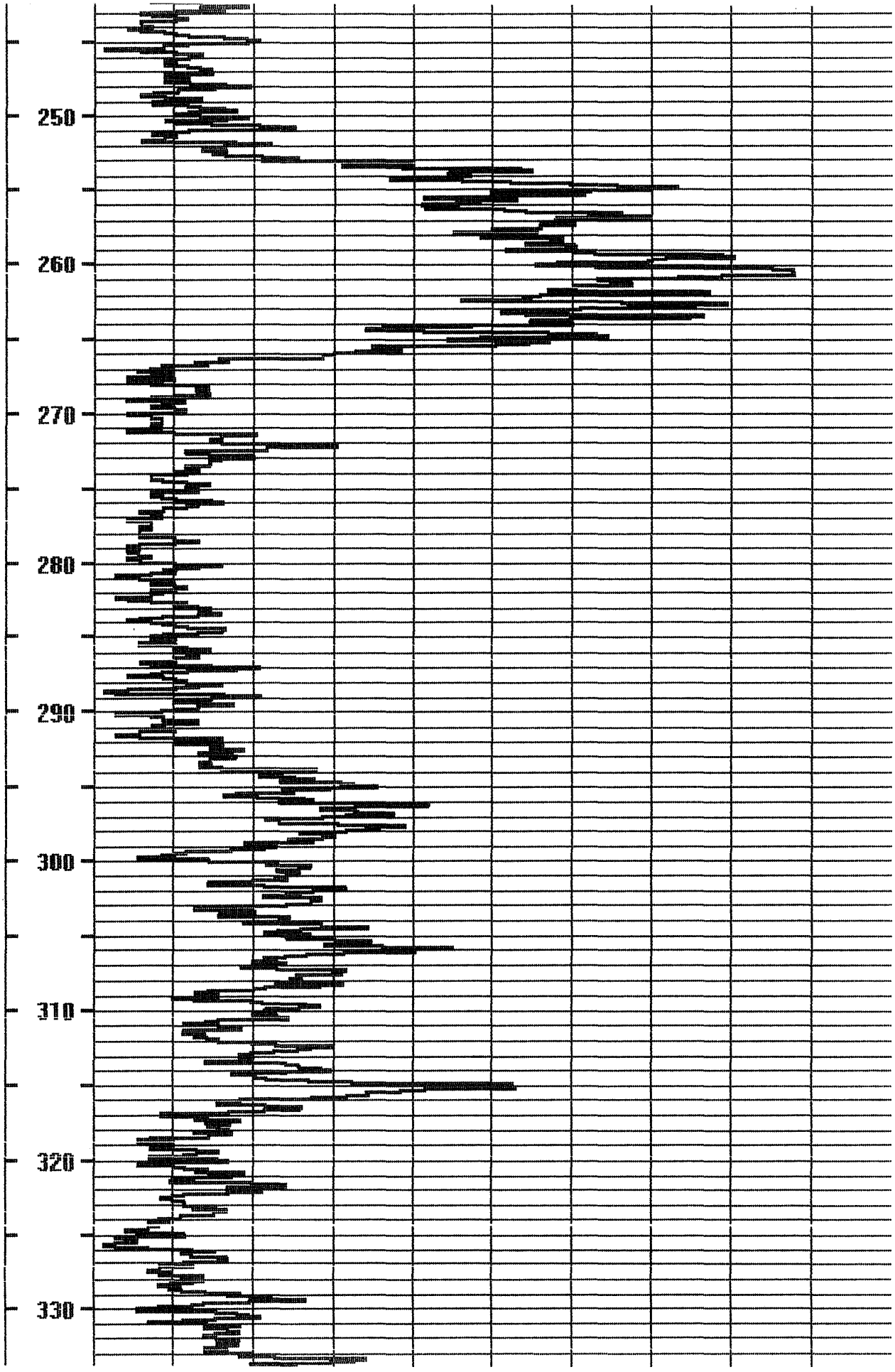
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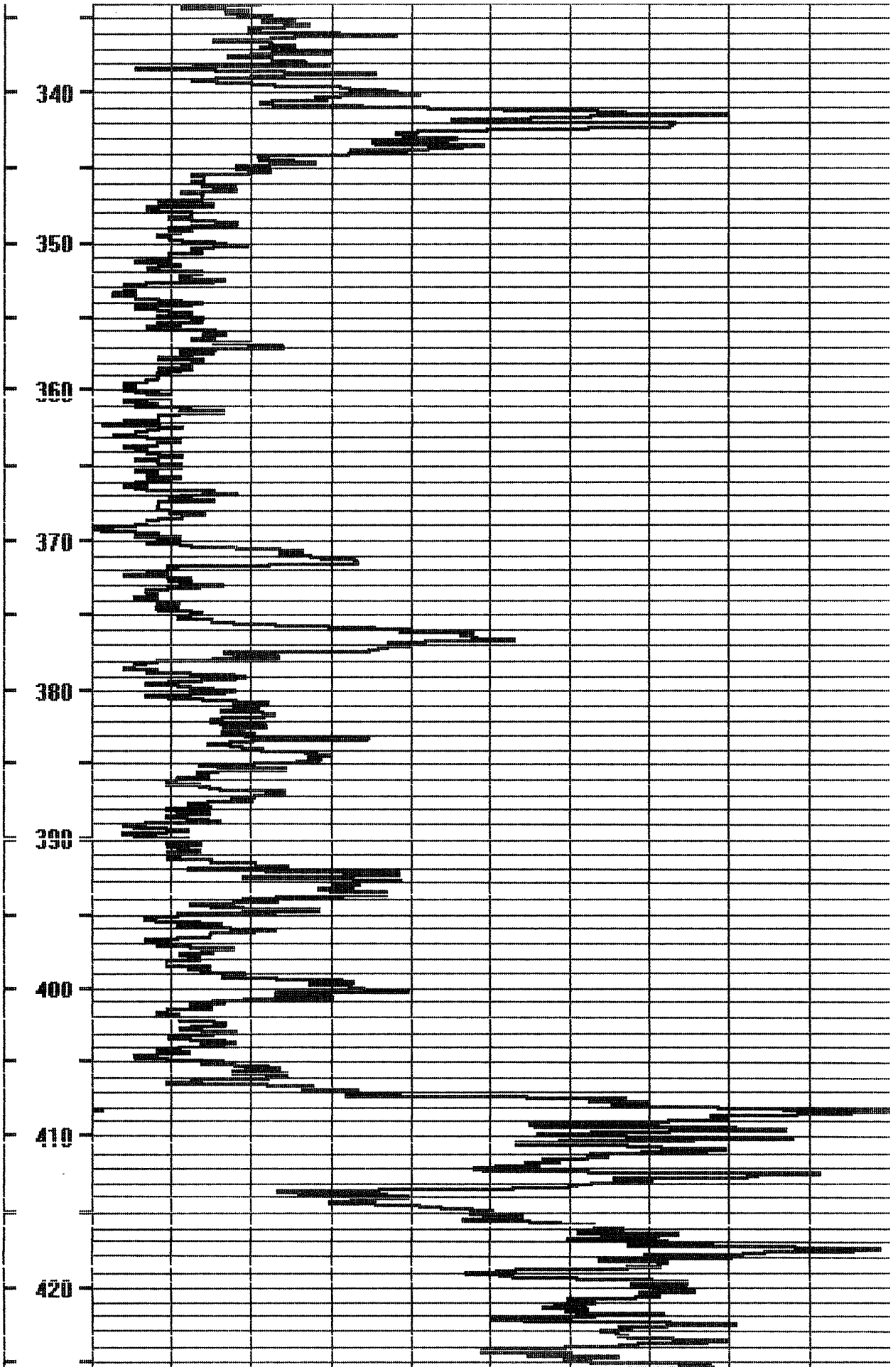
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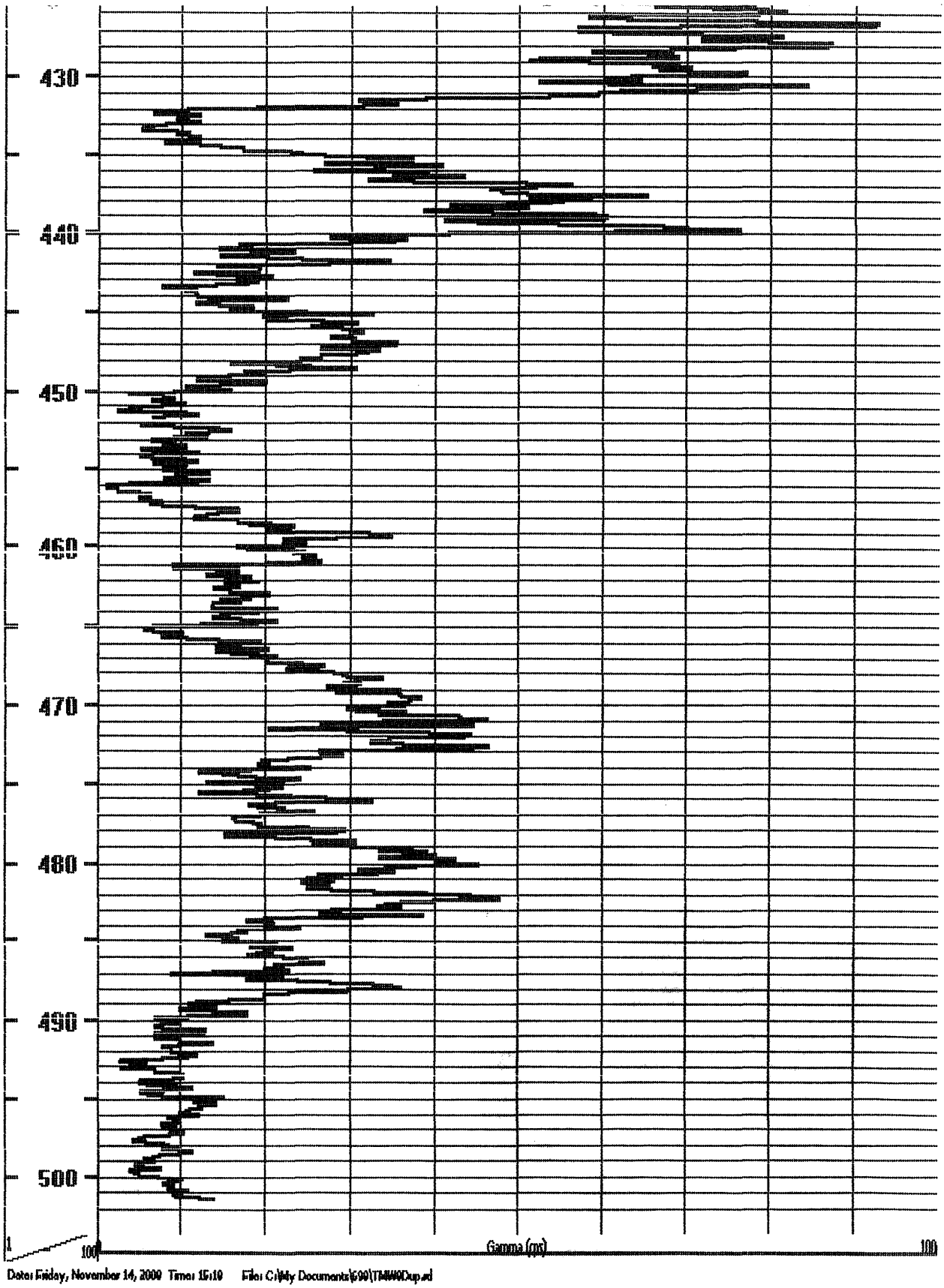
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490
500
1
100
Gamma (cps)
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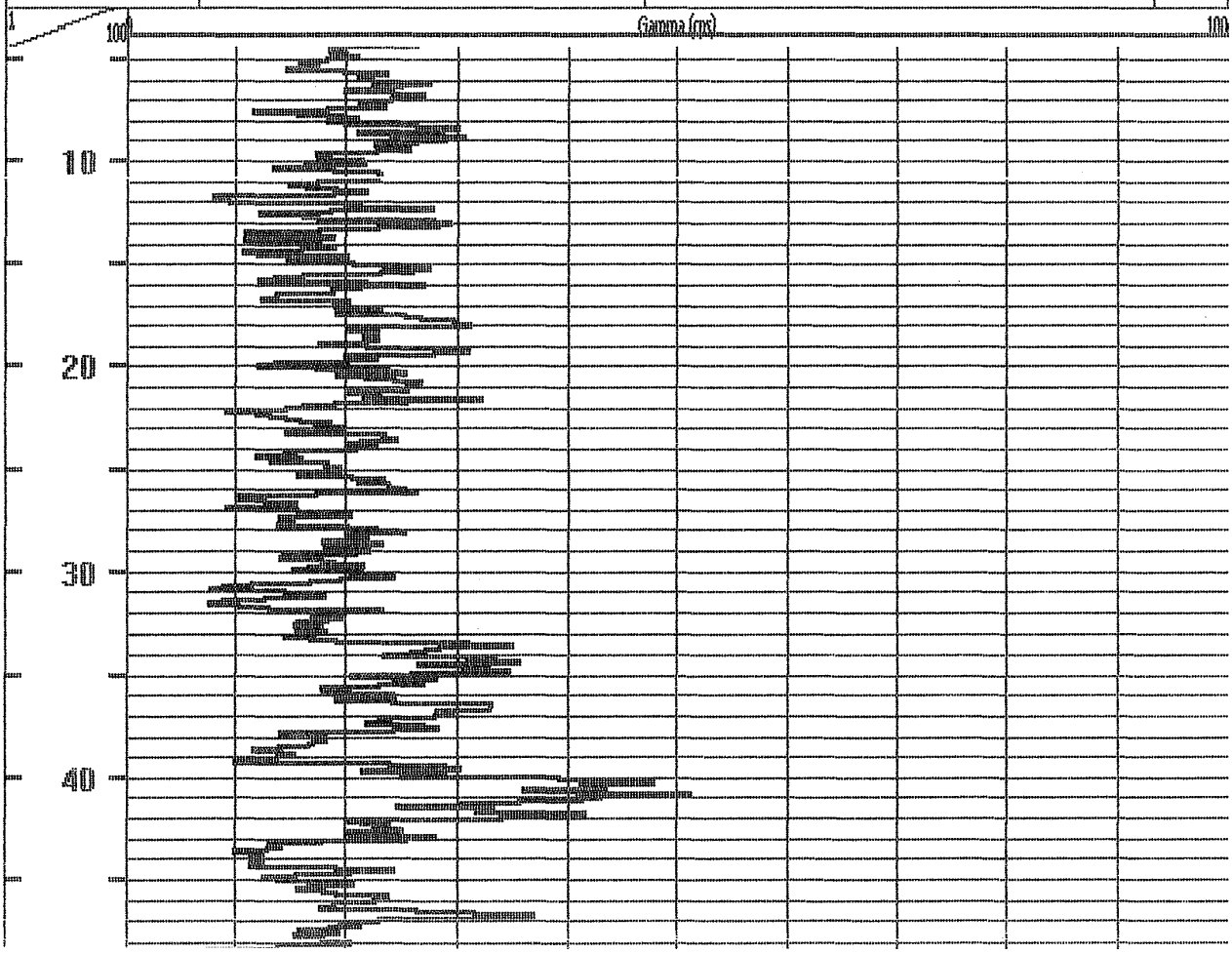
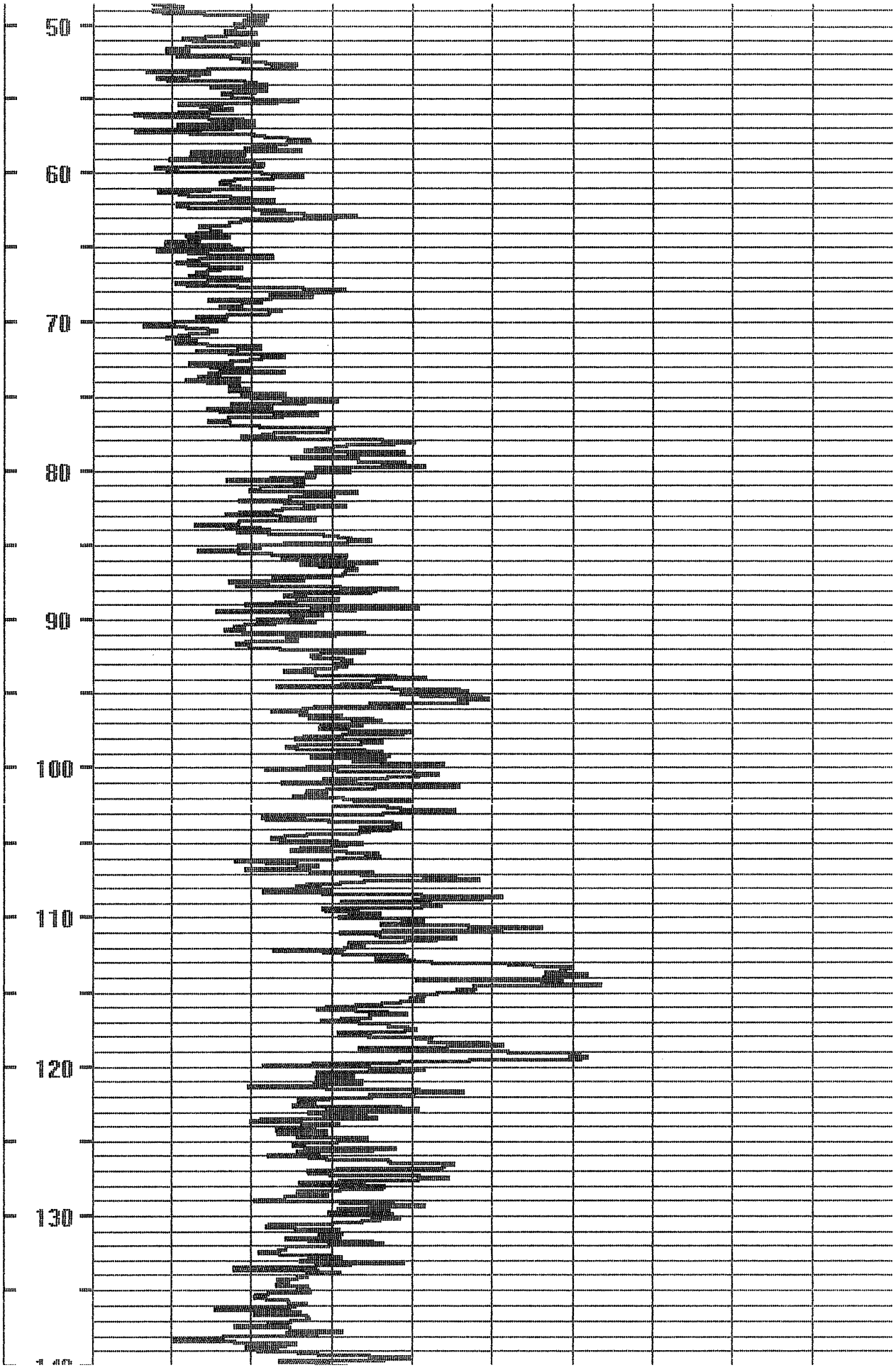
Date: Friday, November 14, 2000 Time: 15:10 File: C:\My Documents\699\TM440Dup.ad

Date: Thursday, July 10, 2008 Time: 14:50 File: C:\My Documents\698\TMW09up.rd

	COMPANY: DELTA WELL & PUMP CO., INC.	Casing
	Location: WASHINGTON AVE	
Well: NCIA TMW-09	Depth Driller:	
	Depth Logger:	
Date: 07-10-08	BH Fluid:	Logged by: Chris Okon
File Name: 698		Witness: Kevin

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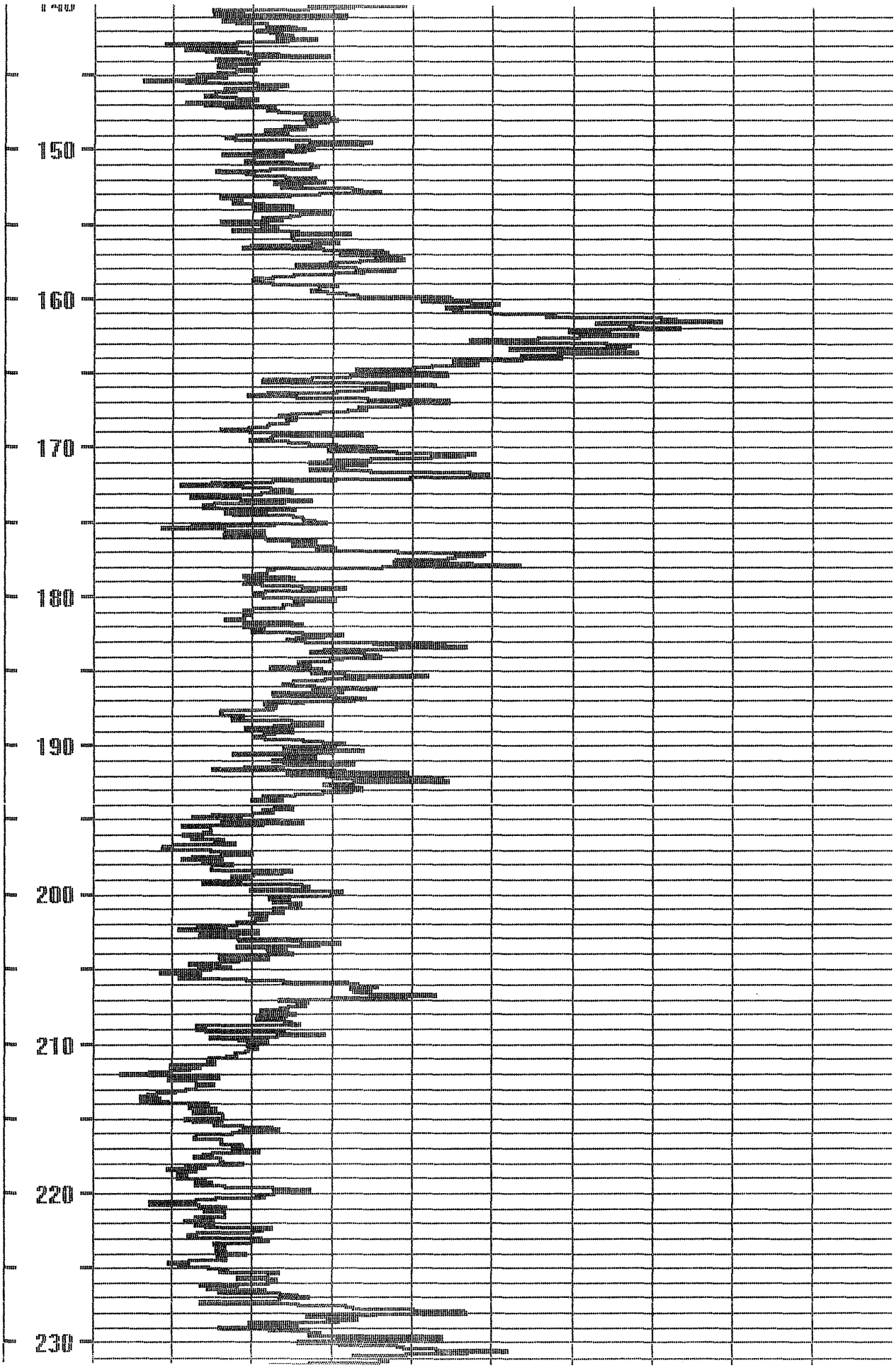
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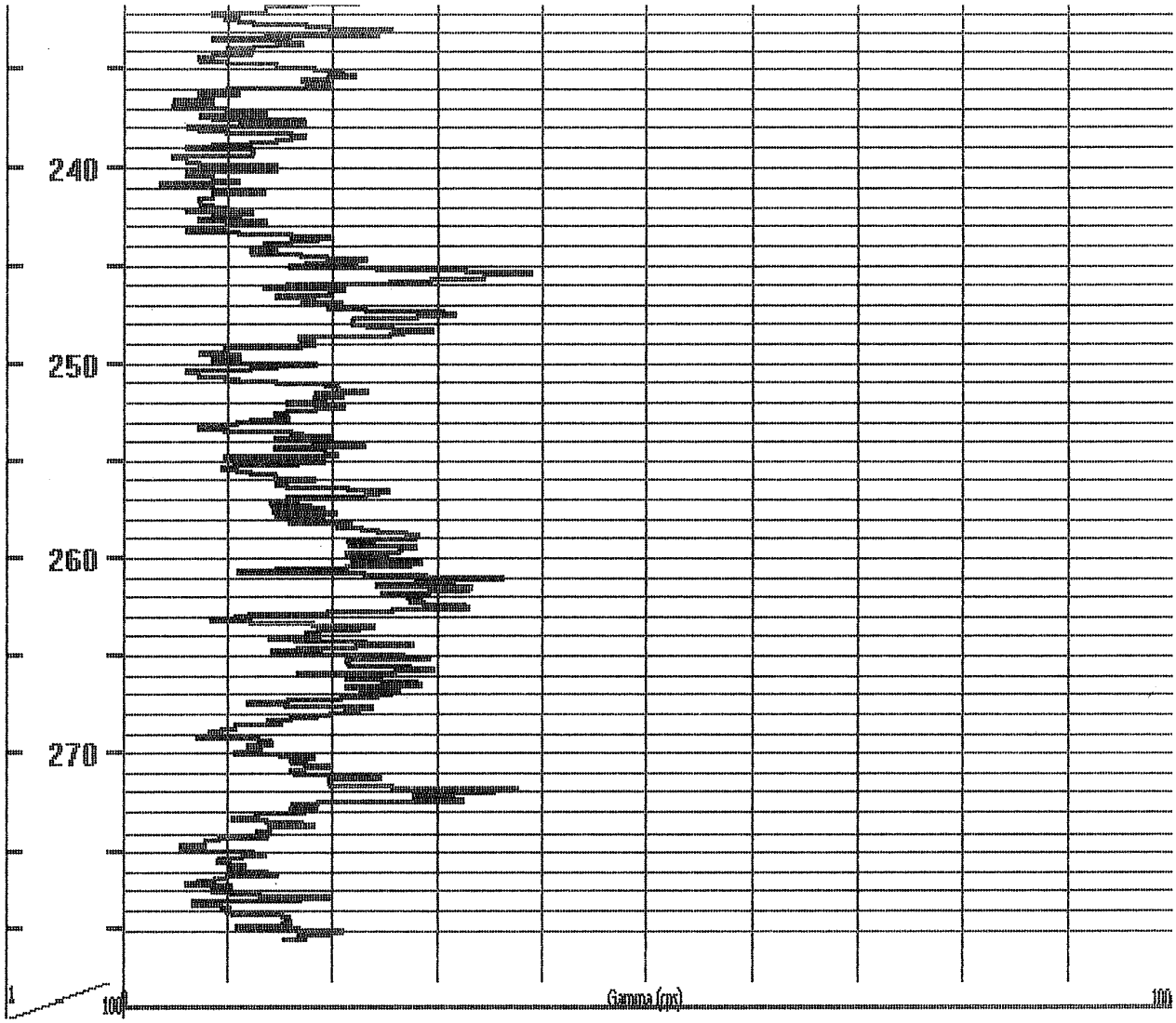


Date: Thursday, July 10, 2008 Time: 1450 File: C:\My Documents\698\TW09up.rl

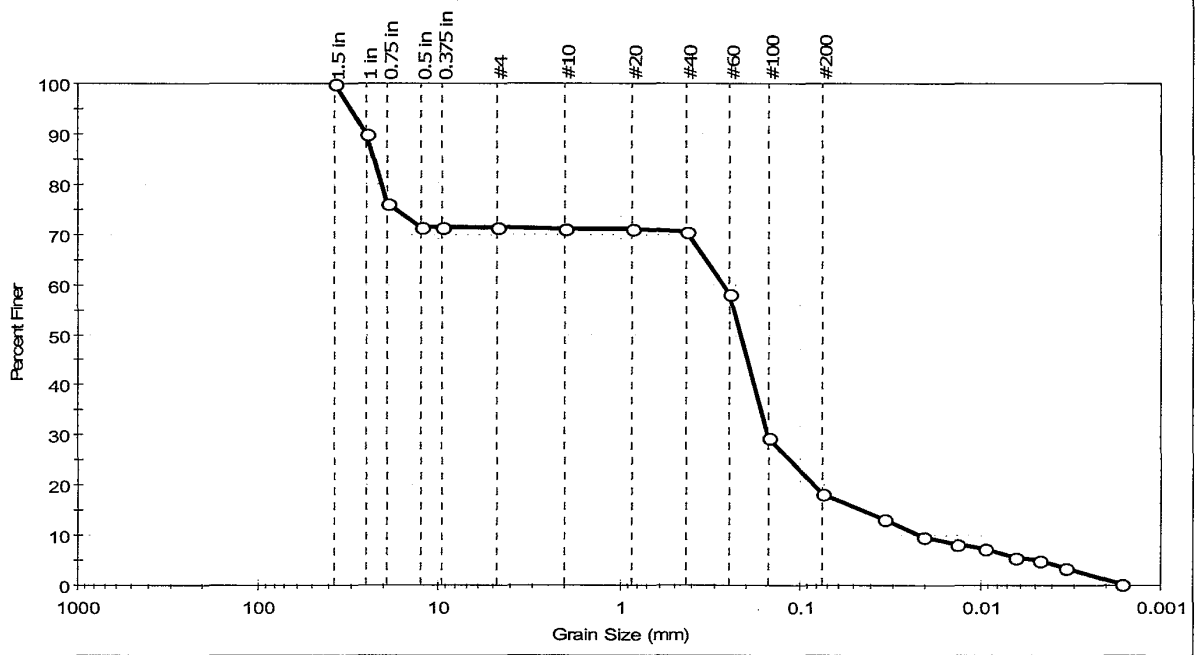
APPENDIX I

GEOTECHNICAL TESTING RESULTS

GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation				
Project:	G1705				
Location:	---			Project No:	GTX-8568
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW-3D	Test Date:	10/11/08	Checked By:	jdt
Depth :	77 ft	Test Id:	139908		
Test Comment:	---				
Sample Description:	Moist, reddish yellow silty sand with gravel				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
—	28.6	53.1	18.3

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
1.5 in	37.50	100		
1 in	25.00	90		
0.75 in	19.00	76		
0.5 in	12.50	71		
0.375 in	9.50	71		
#4	4.75	71		
#10	2.00	71		
#20	0.85	71		
#40	0.42	70		
#60	0.25	58		
#100	0.15	29		
#200	0.075	18		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0344	13		
---	0.0209	10		
---	0.0134	8		
---	0.0095	7		
---	0.0065	6		
---	0.0048	5		
---	0.0034	3		
---	0.0017	0		

Coefficients

D_{85} =22.6516 mm	D_{30} =0.1515 mm
D_{60} =0.2708 mm	D_{15} =0.0447 mm
D_{50} =0.2162 mm	D_{10} =0.0213 mm
C_u =N/A	C_c =N/A

Classification

ASTM N/A

AASHTO Silty Gravel and Sand (A-2-4 (0))

Sample/Test Description

Sand/Gravel Particle Shape : ROUNDED

Sand/Gravel Hardness : HARD

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R2-0002439

GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation		
Project Name:	G1705		
Project Location:	---		
GTX #:	8568		
Start Date:	11/18/2008	Tested By:	ema
End Date:	11/20/2008	Checked By:	jdt
Boring #:	---		
Sample #:	TMW-3D		
Depth:	77 ft		
Visual Description:	Moist, mottled yellowish brown and light gray sandy silt		

Hydraulic Conductivity of Saturated Porous Materials Using a Flexible Wall Permeameter by ASTM D 5084
Constant Gradient

Sample Type:	tube	Permeant Fluid:	de-aired tap water
Orientation:	Vertical	Cell #:	16

Sample Preparation: Extruded from tube, cut, trimmed and placed into permeameter at as-received density and moisture content. Trimmings moisture content = 11.7%.

Parameter	Initial	Final
Height, in	3.61	3.30
Diameter, in	1.60	1.62
Area, in^2	2.01	2.06
Volume, in^3	7.26	6.80
Mass, g	259	259
Bulk Density, pcf	136	145
Moisture Content, %	12	12
Dry Density, pcf	121	130
Degree of Saturation, %	---	99

B COEFFICIENT DETERMINATION

Cell Pressure, psi:	95.1	Pressure Increment, psi:	5.00
Sample Pressure, psi:	91.4	B Coefficient:	0.99

FLOW DATA

Date	Time, sec	Pressure, psi Cell	Inlet	Outlet	Gradient	Flow Volume, cc In	Out	Δ In	Δ Out	Temp, °C	R_t	Permeability K @ 20 °C, cm/sec
11/19	---	90.0	86.5	83.5	25.2	1.00	23.80	---	---	---	---	---
11/19	2460	90.0	86.5	83.5	25.2	9.00	15.90	8.00	7.90	20	1.000	9.7E-06
11/19	----	90.0	86.5	83.5	25.2	9.00	15.90	---	---	---	---	---
11/19	3420	90.0	86.5	83.5	25.2	18.80	6.20	9.80	9.70	20	1.000	8.5E-06
11/19	----	90.0	86.5	83.5	25.2	1.20	23.40	---	---	---	---	---
11/19	1980	90.0	86.5	83.5	25.2	7.50	17.10	6.30	6.30	20	1.000	9.5E-06
11/19	----	90.0	86.5	83.5	25.2	7.50	17.10	---	---	---	---	---
11/19	2800	90.0	86.5	83.5	25.2	16.40	8.80	8.90	8.30	20	1.000	9.2E-06

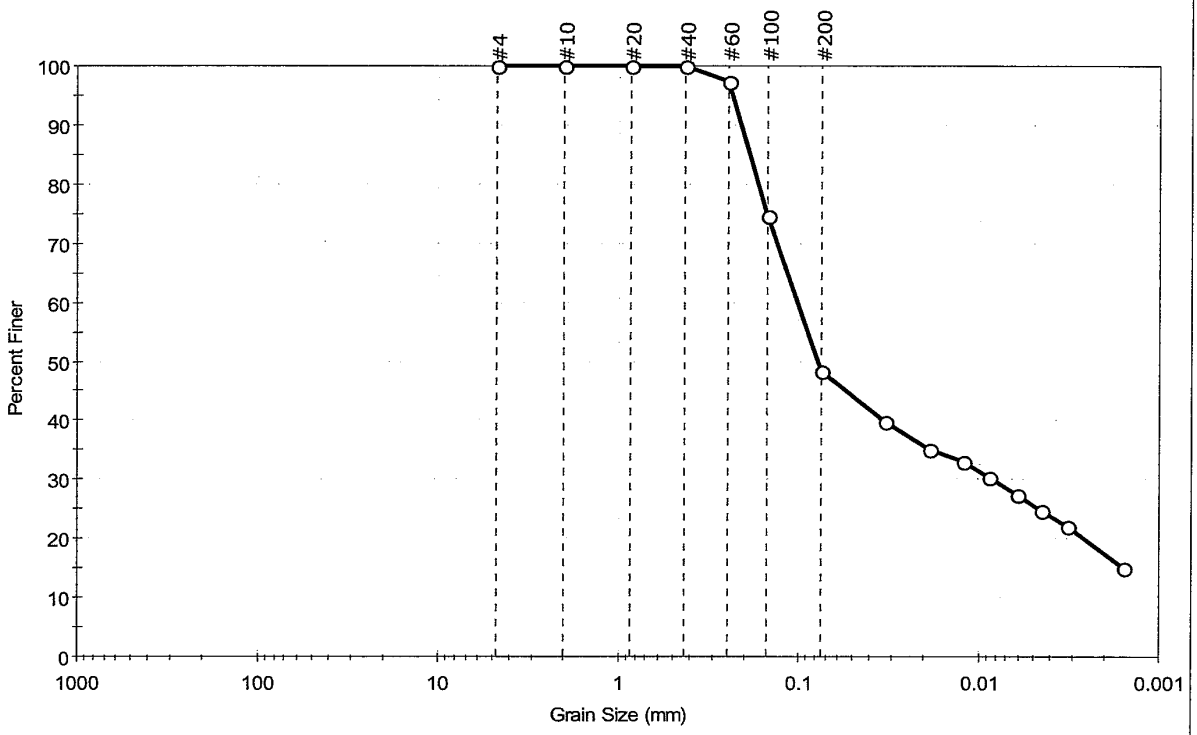
PERMEABILITY AT 20° C: 9.2×10^{-6} cm/sec (@ 5 psi effective stress)

0032

GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation				
Project:	G1705				
Location:	---			Project No:	GTX-8568
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW-3D	Test Date:	10/11/08	Checked By:	jdt
Depth :	117-119 ft	Test Id:	139909		
Test Comment:	---				
Sample Description:	Moist, pinkish gray silty sand				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
—	0.0	51.5	48.5

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
#4	4.75	100		
#10	2.00	100		
#20	0.85	100		
#40	0.42	100		
#60	0.25	97		
#100	0.15	75		
#200	0.075	49		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0334	40		
---	0.0189	35		
---	0.0124	33		
---	0.0088	30		
---	0.0061	27		
---	0.0045	25		
---	0.0032	22		
---	0.0016	15		

Coefficients

D_{85} = 0.1893 mm D_{30} = 0.0085 mm
D_{60} = 0.1016 mm D_{15} = 0.0016 mm
D_{50} = 0.0780 mm D_{10} = 0.0010 mm
C_u = N/A C_c = N/A

Classification

ASTM N/A

AASHTO Silty Soils (A-4 (0))

Sample/Test Description

Sand/Gravel Particle Shape : ROUNDED

Sand/Gravel Hardness : HARD

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GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation		
Project Name:	G1705		
Project Location:	---		
GTX #:	8568		
Start Date:	11/18/2008	Tested By:	ema
End Date:	11/21/2008	Checked By:	jdt
Boring #:	---		
Sample #:	TMW-3D		
Depth:	117-119 ft		
Visual Description:	Moist, mottled yellow brown and light gray silt		

Hydraulic Conductivity of Saturated Porous Materials Using a Flexible Wall Permeameter by ASTM D 5084
Constant Gradient

Sample Type:	tube	Permeant Fluid:	de-aired tap water
Orientation:	Vertical	Cell #:	7/6/16

Sample Preparation: Extruded from tube, cut, trimmed and placed into permeameter at as-received density and moisture content. Trimmings moisture content = 20.8%.

Parameter	Initial	Final
Height, in	2.68	2.55
Diameter, in	1.85	1.85
Area, in^2	2.69	2.69
Volume, in^3	7.20	6.85
Mass, g	238	235
Bulk Density, pcf	126	130
Moisture Content, %	23.3	21.8
Dry Density, pcf	102	107
Degree of Saturation, %	---	99

B COEFFICIENT DETERMINATION

Cell Pressure, psi:	95.2	Pressure Increment, psi:	5.03
Sample Pressure, psi:	91.2	B Coefficient:	0.98

FLOW DATA

Date	Time, sec	Pressure, psi			Gradient	Flow Volume, cc				Temp, °C	R_t	Permeability K @ 20 °C, cm/sec
		Cell	Inlet	Outlet		In	Out	Δ In	Δ Out			
11/20	---	90.0	86.3	83.8	27.1	2.20	24.40	---	---	---	---	---
11/20	3780	90.0	86.3	83.8	27.1	3.30	23.30	1.10	1.10	20	1.000	6.2E-07
11/20	----	90.0	86.3	83.8	27.1	3.30	23.30	---	---	---	---	---
11/20	2760	90.0	86.3	83.8	27.1	4.10	22.50	0.80	0.80	20	1.000	6.2E-07
11/20	----	90.0	86.3	83.8	27.1	4.10	22.50	---	---	---	---	---
11/20	4680	90.0	86.3	83.8	27.1	5.40	21.30	1.30	1.20	20	1.000	5.7E-07
11/20	----	90.0	86.3	83.8	27.1	5.40	21.30	---	---	---	---	---
11/20	2400	90.0	86.3	83.8	27.1	6.00	20.80	0.60	0.50	20	1.000	4.9E-07

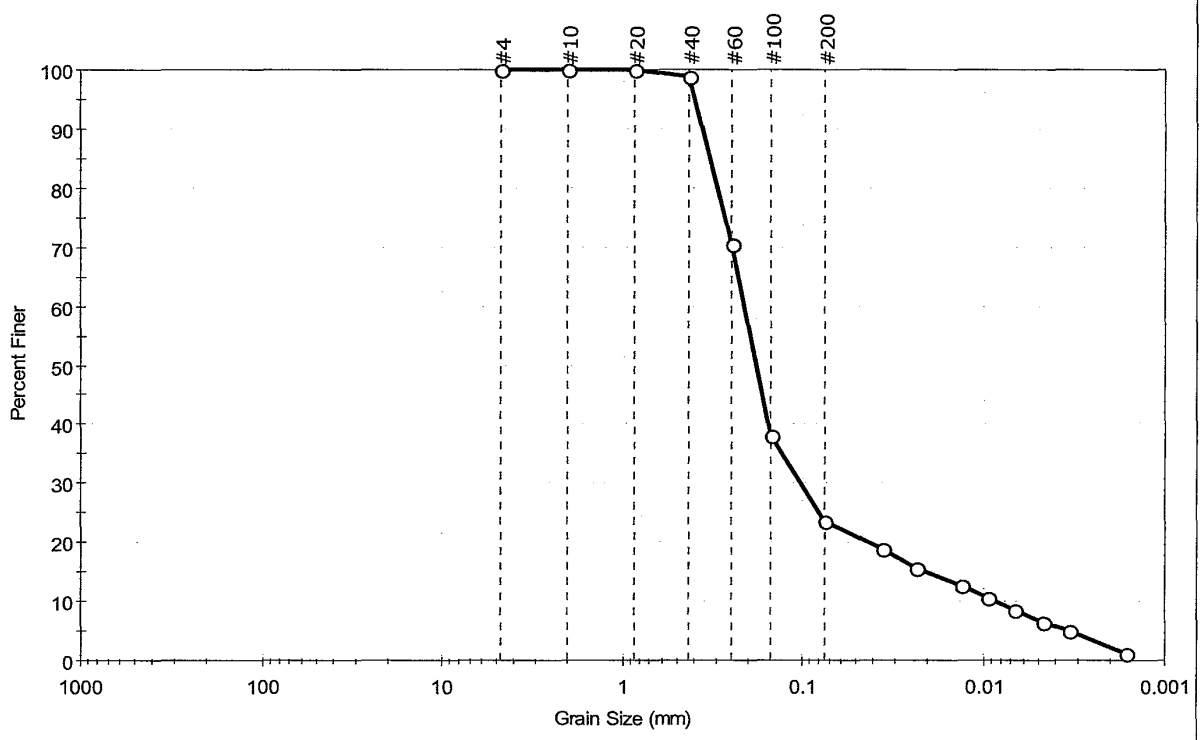
PERMEABILITY AT 20° C: 5.7×10^{-7} cm/sec (@ 5 psi effective stress)

0033

GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation				
Project:	G1705				
Location:	---			Project No:	GTX-8568
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW-3D	Test Date:	10/10/08	Checked By:	jdt
Depth :	157-159 ft	Test Id:	139910		
Test Comment:	---				
Sample Description:	Moist, brown silty sand				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
—	0.0	76.3	23.7

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
#4	4.75	100		
#10	2.00	100		
#20	0.85	100		
#40	0.42	99		
#60	0.25	70		
#100	0.15	38		
#200	0.075	24		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0359	19		
---	0.0231	16		
---	0.0133	13		
---	0.0094	11		
---	0.0067	8		
---	0.0048	7		
---	0.0034	5		
---	0.0017	1		

Coefficients

D_{85} =0.3281 mm	D_{30} =0.1014 mm
D_{60} =0.2120 mm	D_{15} =0.0203 mm
D_{50} =0.1809 mm	D_{10} =0.0086 mm
C_u =N/A	C_c =N/A

Classification

ASTM N/A

AASHTO Silty Gravel and Sand (A-2-4 (0))

Sample/Test Description

Sand/Gravel Particle Shape : ROUNDED

Sand/Gravel Hardness : HARD

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GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation		
Project Name:	G1705		
Project Location:	---		
GTX #:	8568		
Start Date:	11/20/2008	Tested By:	ema
End Date:	11/21/2008	Checked By:	jdt
Boring #:	---		
Sample #:	TMW-3D		
Depth:	157-159 ft		
Visual Description:	Moist, yellow silty sand		

Hydraulic Conductivity of Saturated Porous Materials Using a Flexible Wall Permeameter by ASTM D 5084
Constant Gradient

Sample Type:	tube	Permeant Fluid:	de-aired tap water
Orientation:	Vertical	Cell #:	6/23/6

Sample Preparation: Extruded from tube, cut, trimmed and placed into permeameter at as-received density and moisture content. Trimmings moisture content = 14.6%.

Parameter	Initial	Final
Height, in	2.96	2.73
Diameter, in	1.70	1.74
Area, in^2	2.27	2.38
Volume, in^3	6.72	6.49
Mass, g	234	232
Bulk Density, pcf	132	136
Moisture Content, %	19.1	18.1
Dry Density, pcf	111	115
Degree of Saturation, %	---	109

B COEFFICIENT DETERMINATION

Cell Pressure, psi:	95.3	Pressure Increment, psi:	4.99
Sample Pressure, psi:	91.0	B Coefficient:	0.97

FLOW DATA

Date	Time, sec	Pressure, psi			Gradient	Flow Volume, cc				Temp, °C	R_t	Permeability K @ 20 °C, cm/sec
		Cell	Inlet	Outlet		In	Out	Δ In	Δ Out			
11/20	---	90.0	86.5	83.5	30.4	0.70	24.40	---	---	---	---	---
11/20	1620	90.0	86.5	83.5	30.4	9.60	16.00	8.90	8.40	20	1.000	1.1E-05
11/20	----	90.0	86.5	83.5	30.4	9.60	16.00	---	---	---	---	---
11/20	2880	90.0	86.5	83.5	30.4	25.00	2.00	15.40	14.00	20	1.000	1.1E-05
11/20	----	90.0	86.5	83.5	30.4	0.50	24.20	---	---	---	---	---
11/20	1680	90.0	86.5	83.5	30.4	11.80	13.00	11.30	11.20	20	1.000	1.4E-05
11/20	----	90.0	86.5	83.5	30.4	11.80	13.00	---	---	---	---	---
11/20	1620	90.0	86.5	83.5	30.4	21.70	3.30	9.90	9.70	20	1.000	1.3E-05

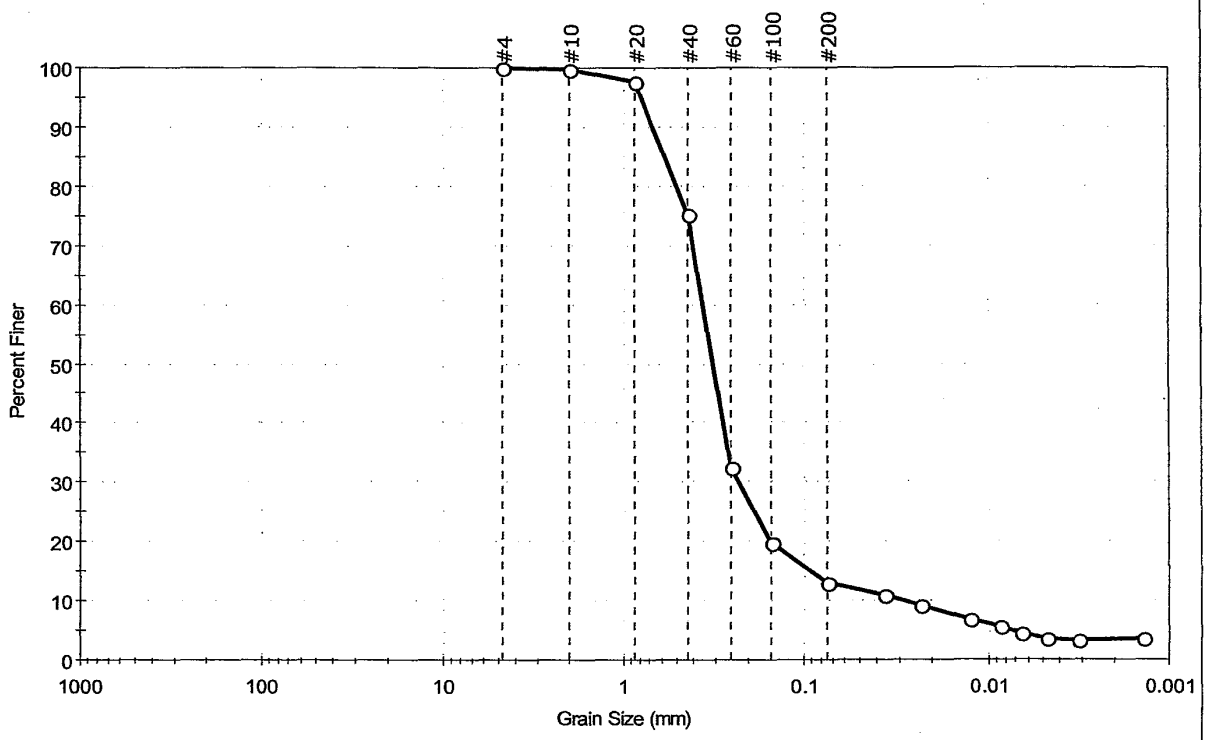
PERMEABILITY AT 20° C: 1.2×10^{-5} cm/sec (@ 5 psi effective stress)

0034

GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation				
Project:	G1733				
Location:	---			Project No:	GTX-8595
Boring ID:	---	Sample Type:	jar	Tested By:	ap
Sample ID:	TMW3D@217	Test Date:	10/20/08	Checked By:	jdt
Depth :	---	Test Id:	140335		
Test Comment:	---				
Sample Description:	Moist, yellowish brown silty sand				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
---	---	86.9	13.1

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
#4	4.75	100		
#10	2.00	100		
#20	0.85	98		
#40	0.42	75		
#60	0.25	32		
#100	0.15	20		
#200	0.075	13		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0365	11		
---	0.0234	9		
---	0.0126	7		
---	0.0087	6		
---	0.0066	5		
---	0.0047	3		
---	0.0032	3		
---	0.0014	3		

Coefficients

D_{85} =0.5742 mm	D_{30} =0.2274 mm
D_{60} =0.3519 mm	D_{15} =0.0918 mm
D_{50} =0.3110 mm	D_{10} =0.0293 mm
C_u =N/A	C_c =N/A

Classification

ASTM N/A

AASHTO Silty Gravel and Sand (A-2-4 (0))

Sample/Test Description

Sand/Gravel Particle Shape : ROUNDED

Sand/Gravel Hardness : HARD

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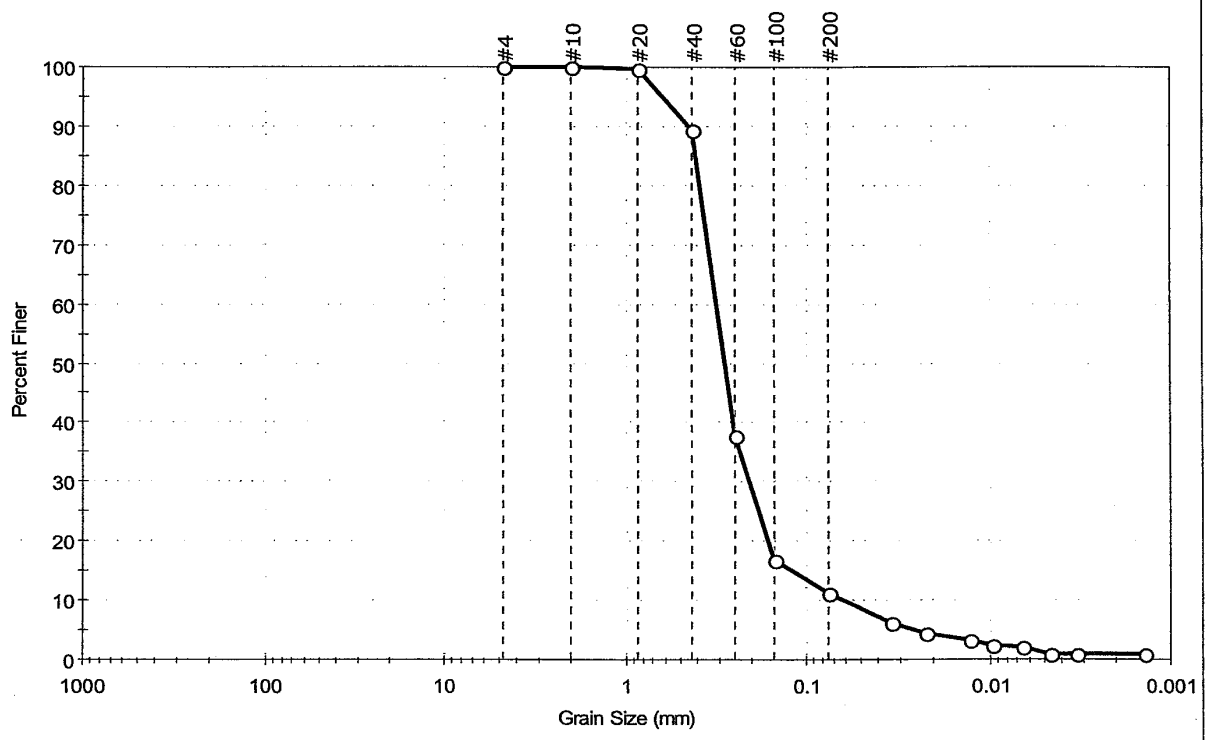
GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation				
Project:	G1733				
Location:	---			Project No:	GTX-8595
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW3D@257-259	Test Date:	10/20/08	Checked By:	jdt
Depth :	---	Test Id:	140336		
Test Comment:	---				
Sample Description:	Moist, light yellowish brown sand with silt				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
—	—	88.7	11.3

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
#4	4.75	100		
#10	2.00	100		
#20	0.85	100		
#40	0.42	89		
#60	0.25	38		
#100	0.15	17		
#200	0.075	11		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0340	6		
---	0.0224	4		
---	0.0130	3		
---	0.0096	2		
---	0.0066	2		
---	0.0046	1		
---	0.0033	1		
---	0.0014	1		

Coefficients

D_{85} =0.4066 mm	D_{30} =0.2075 mm
D_{60} =0.3146 mm	D_{15} =0.1202 mm
D_{50} =0.2839 mm	D_{10} =0.0608 mm
C_u =5.174	C_c =2.251

Classification

ASTM N/A

AASHTO Silty Gravel and Sand (A-2-4 (0))

Sample/Test Description

Sand/Gravel Particle Shape : ROUNDED

Sand/Gravel Hardness : HARD

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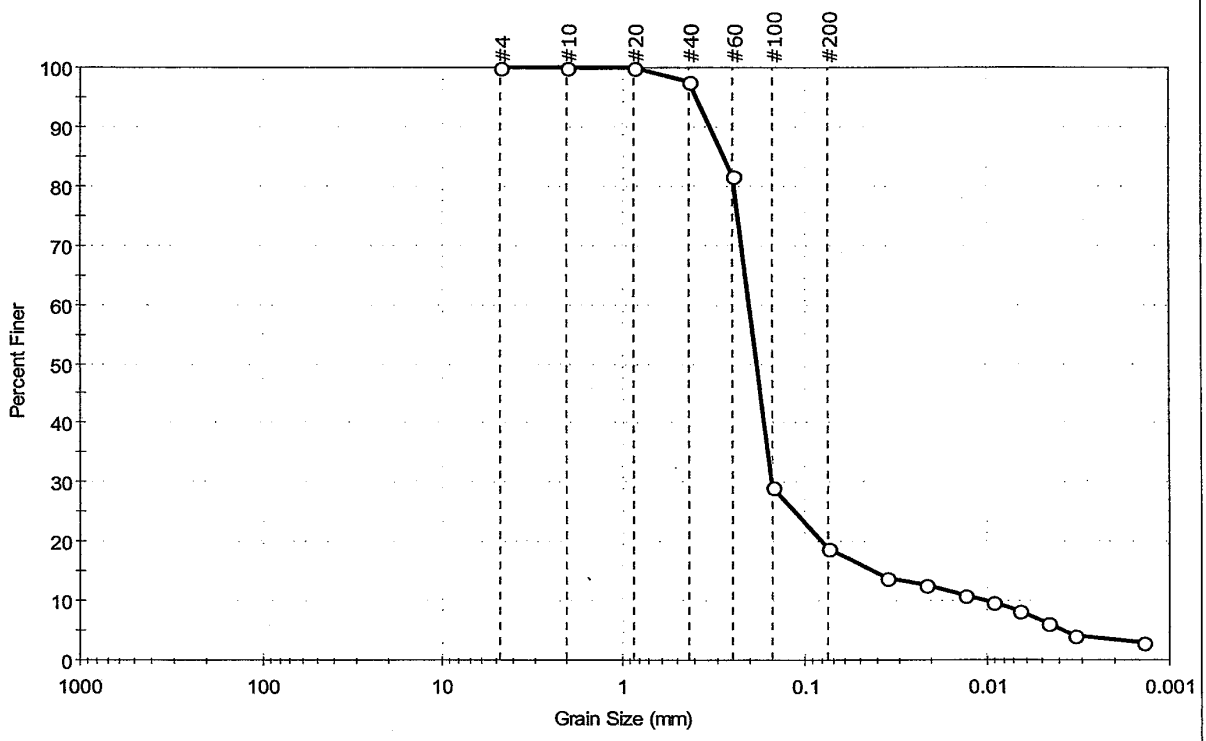
Client:	Mitkem Corporation				
Project:	G1733				
Location:	---			Project No:	GTX-8595
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW3D@282-284	Test Date:	10/20/08	Checked By:	jdt
Depth :	---	Test Id:	140337		
Test Comment:	---				
Sample Description:	Moist, light gray silty sand				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
—	0.0	81.1	18.9

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
#4	4.75	100		
#10	2.00	100		
#20	0.85	100		
#40	0.42	98		
#60	0.25	82		
#100	0.15	29		
#200	0.075	19		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0361	14		
---	0.0215	13		
---	0.0131	11		
---	0.0093	10		
---	0.0066	8		
---	0.0046	6		
---	0.0033	4		
---	0.0014	3		

Coefficients

D_{85} =0.2786 mm D_{30} =0.1510 mm
D_{60} =0.2022 mm D_{15} =0.0427 mm
D_{50} =0.1835 mm D_{10} =0.0101 mm
C_u =N/A C_c =N/A

Classification

ASTM N/A

AASHTO Silty Gravel and Sand (A-2-4 (0))

Sample/Test Description

Sand/Gravel Particle Shape : ROUNDED
Sand/Gravel Hardness : HARD

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R2-0002447

GeoTesting express
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Client:	Mitkem Corporation		
Project Name:	G1733		
Project Location:	---		
GTX #:	8595		
Start Date:	11/18/2008	Tested By:	ema
End Date:	11/20/2008	Checked By:	jdt
Boring #:	---		
Sample #:	TMS-3D		
Depth:	282-284 ft		
Visual Description:	Moist, mottled grayish brown and dark gray sandy silt		

Hydraulic Conductivity of Saturated Porous Materials Using a Flexible Wall Permeameter by ASTM D 5084
Constant Gradient

Sample Type:	tube	Permeant Fluid:	de-aired tap water
Orientation:	Vertical	Cell #:	9/9/9

Sample Preparation: Extruded from tube, cut, trimmed and placed into permeameter at as-received density and moisture content. Trimmings moisture content = 19.5%.

Parameter	Initial	Final
Height, in	3.39	3.00
Diameter, in	1.76	1.86
Area, in^2	2.43	2.72
Volume, in^3	8.25	8.15
Mass, g	286	284
Bulk Density, pcf	132	132
Moisture Content, %	20.6	19.8
Dry Density, pcf	109	111
Degree of Saturation, %	---	98

B COEFFICIENT DETERMINATION

Cell Pressure, psi:	95.2	Pressure Increment, psi:	4.99
Sample Pressure, psi:	90.8	B Coefficient:	0.98

FLOW DATA

Date	Time, sec	Pressure, psi			Gradient	Flow Volume, cc				Temp, °C	R_t	Permeability K @ 20 °C, cm/sec
		Cell	Inlet	Outlet		In	Out	Δ In	Δ Out			
11/19	---	90.0	86.5	83.5	27.7	1.90	24.00	---	---	---	---	---
11/19	2880	90.0	86.5	83.5	27.7	9.80	16.40	7.90	7.60	20	1.000	5.5E-06
11/19	----	90.0	86.5	83.5	27.7	9.80	16.40	---	---	---	---	---
11/19	3060	90.0	86.5	83.5	27.7	17.40	8.90	7.60	7.50	20	1.000	5.1E-06
11/19	----	90.0	86.5	83.5	27.7	17.40	8.90	---	---	---	---	---
11/19	3720	90.0	86.5	83.5	27.7	25.40	0.40	8.00	8.50	20	1.000	4.6E-06
11/19	----	90.0	86.5	83.5	27.7	0.50	24.30	---	---	---	---	---
11/19	1620	90.0	86.5	83.5	27.7	5.30	19.20	4.80	5.10	20	1.000	6.3E-06

PERMEABILITY AT 20° C: 5.4×10^{-6} cm/sec (@ 5 psi effective stress)

0039

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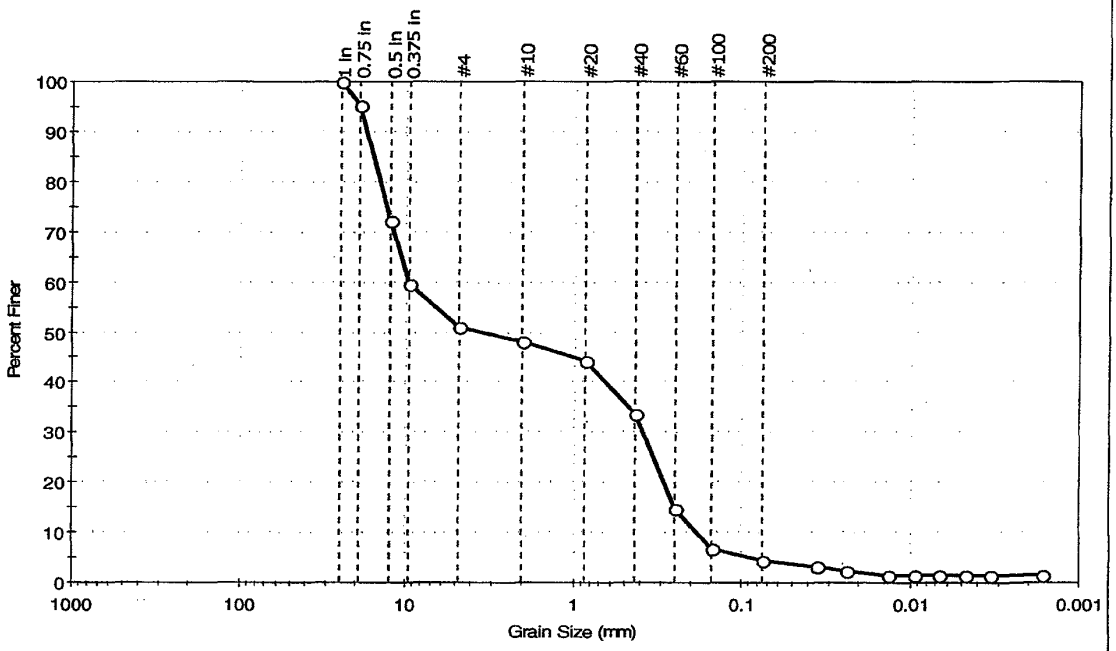
Client:	Mitkem Corporation				
Project:	G1962				
Location:	---			Project No:	GTX-8635
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW8D57-59	Test Date:	11/06/08	Checked By:	jdt
Depth :	---	Test Id:	141252		
Test Comment:	---				
Sample Description:	Moist, olive yellow gravel with sand				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



%Cobble	%Gravel	%Sand	%Silt & Clay Size
—	49.0	46.5	4.5

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
1 in	25.00	100		
0.75 in	19.00	95		
0.5 in	12.50	72		
0.375 in	9.50	60		
#4	4.75	51		
#10	2.00	48		
#20	0.85	44		
#40	0.42	34		
#60	0.25	15		
#100	0.15	7		
#200	0.075	5		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0361	3		
---	0.0236	2		
---	0.0135	2		
---	0.0095	2		
---	0.0067	2		
---	0.0048	2		
---	0.0033	2		
---	0.0017	2		

Coefficients

D_{85} =15.7825 mm	D_{30} =0.3828 mm
D_{60} =9.5627 mm	D_{15} =0.2514 mm
D_{50} =3.4800 mm	D_{10} =0.1838 mm
C_u =52.028	C_c =0.083

Classification

ASTM Poorly graded gravel with sand (GP)

AASHTO Stone Fragments, Gravel and Sand (A-1-b (0))

Sample/Test Description

Sand/Gravel Particle Shape : ROUNDED

Sand/Gravel Hardness : HARD

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0015

R2-0002449

GeoTesting express
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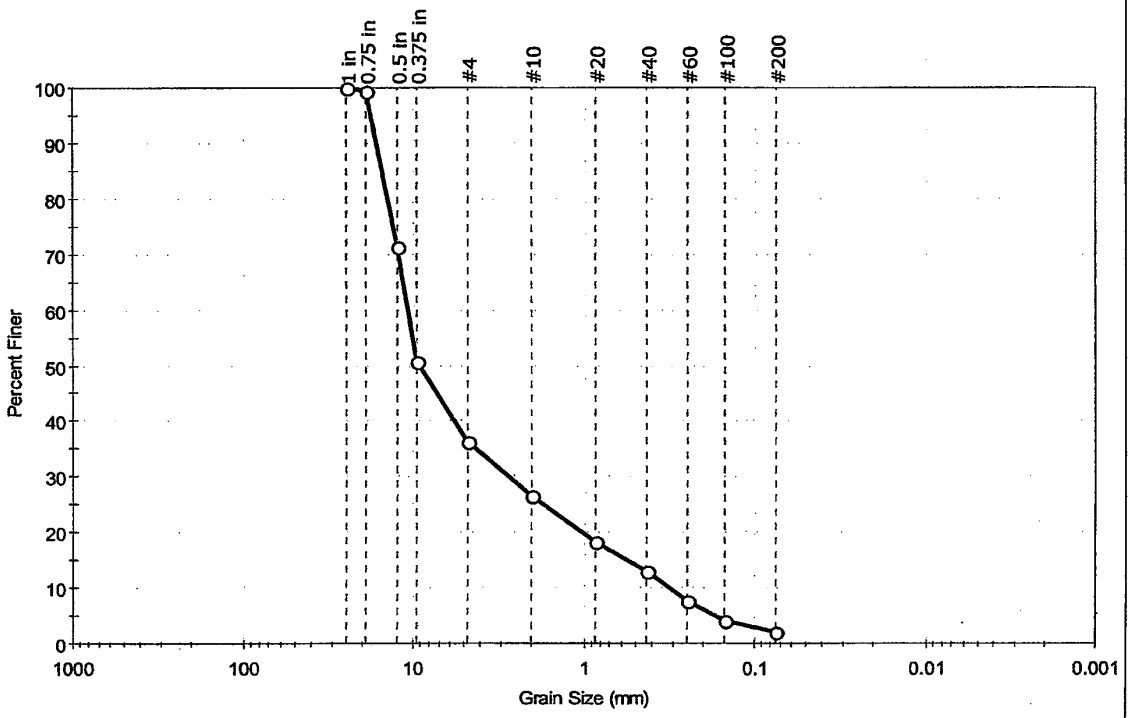
Client:	Mitkem Corporation				
Project:	G2084				
Location:	---			Project No:	GTX-8685
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW-8D	Test Date:	11/25/08	Checked By:	jdt
Depth :	82-84 ft	Test Id:	142489		
Test Comment:	---				
Sample Description:	Moist, pale yellow gravel with sand				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
—	63.8	34.0	2.2

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
1 in	25.00	100		
0.75 in	19.00	99		
0.5 in	12.50	71		
0.375 in	9.50	51		
#4	4.75	36		
#10	2.00	26		
#20	0.85	18		
#40	0.42	13		
#60	0.25	8		
#100	0.15	4		
#200	0.075	2		

Coefficients

D_{85} =15.3429 mm	D_{30} =2.7500 mm
D_{60} =10.7527 mm	D_{15} =0.5579 mm
D_{50} =9.1678 mm	D_{10} =0.3174 mm
C_u =33.877	C_c =2.216

Classification

ASTM Well-graded gravel with sand (GW)

AASHTO Stone Fragments, Gravel and Sand (A-1-a (0))

Sample/Test Description

Sand/Gravel Particle Shape : ROUNDED

Sand/Gravel Hardness : HARD

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0134

R2-0002450

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Client:	Mitkem Corporation		
Project Name:	G2084		
Project Location:	---		
GTX #:	8685		
Start Date:	11/24/08	Tested By:	ema
End Date:	11/25/08	Checked By:	jdt
Boring #:	---		
Sample #:	TMW-8D		
Depth:	82-84 ft		
Visual Description:	Moist, pale yellow gravel with sand		

Permeability of Granular Soils (Constant Head) by ASTM D 2434

Sample Type: Remolded

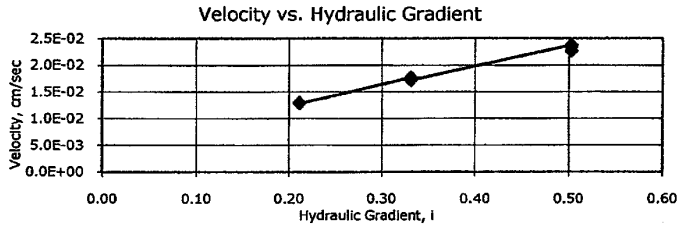
Sample Information:

Maximum Dry Density:	--- pcf
Optimum Moisture Content:	--- %
Compaction Test Method:	---
Classification (ASTM D 2487):	GW
Assumed Specific Gravity:	2.65

Sample Preparation / Test Setup: Sample compacted with moderate effort at air-dried moisture content; >3/8 inch material screened out of sample prior to testing (49% of sample). A larger diameter test could not be performed because of limited sample quantity provided. 5.27 lb surcharge

Parameter	Initial	Final
Height, in	1.99	1.99
Diameter, in	3.98	3.98
Area, in^2	12.4	12.4
Volume, in^3	24.8	24.8
Mass, g	617	773
Bulk Density, pcf	94.9	119
Moisture Content, %	2.2	28.1
Dry Density, pcf	92.9	92.9
Degree of Saturation, %	---	95.2
Void Ratio, e	---	0.78

Date	Reading #	Volume of Flow, cc	Time of Flow, sec	Flow Rate, cc/sec	Gradient	Permeability, cm/sec	Temp., °C	Correction Factor	Permeability @ 20 °C, cm/sec
11/24	1	10.43	10	1.04	0.21	6.2E-02	15.0	1.135	7.0E-02
11/24	2	10.43	10	1.04	0.21	6.2E-02	15.0	1.135	7.0E-02
11/24	3	10.25	10	1.02	0.21	6.1E-02	15.0	1.135	6.9E-02
11/24	4	14.17	10	1.42	0.33	5.3E-02	15.0	1.135	6.0E-02
11/24	5	13.87	10	1.39	0.33	5.2E-02	15.0	1.135	5.9E-02
11/24	6	13.75	10	1.38	0.33	5.2E-02	15.0	1.135	5.9E-02
11/24	7	19.08	10	1.91	0.50	4.7E-02	15.0	1.135	5.4E-02
11/24	8	18.18	10	1.82	0.50	4.5E-02	15.0	1.135	5.1E-02
11/24	9	18.72	10	1.87	0.50	4.6E-02	15.0	1.135	5.3E-02



PERMEABILITY @ 20 °C =

6.1×10^{-2} cm/sec

0135

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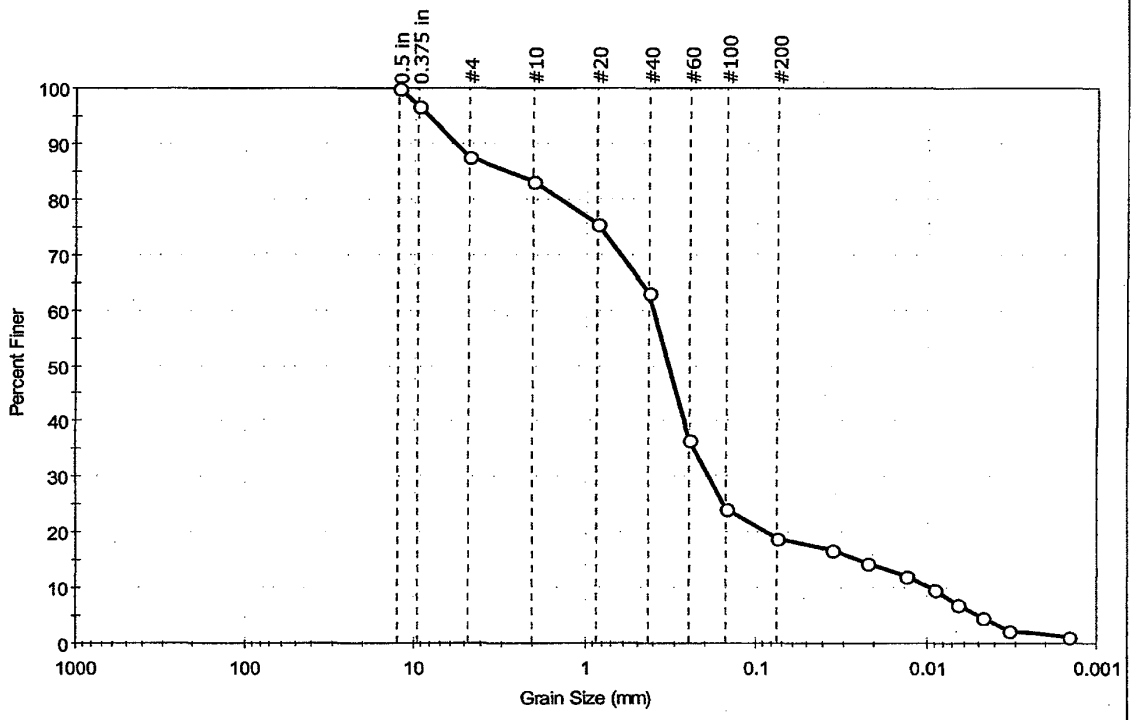
Client:	Mitkem Corporation				
Project:	G1996				
Location:	---			Project No:	GTX-8660
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW-8D	Test Date:	11/14/08	Checked By:	jdt
Depth :	182-184 ft	Test Id:	142028		
Test Comment:	---				
Sample Description:	Moist, olive yellow silty sand				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
—	12.2	68.8	19.0

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
0.5 in	12.50	100		
0.375 in	9.50	97		
#4	4.75	88		
#10	2.00	83		
#20	0.85	76		
#40	0.42	63		
#60	0.25	36		
#100	0.15	24		
#200	0.075	19		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0360	17		
---	0.0225	14		
---	0.0131	12		
---	0.0091	10		
---	0.0066	7		
---	0.0047	5		
---	0.0033	2		
---	0.0015	1		

Coefficients

D_{85} =2.8050 mm D_{30} =0.1910 mm
D_{60} =0.3998 mm D_{15} =0.0251 mm
D_{50} =0.3275 mm D_{10} =0.0096 mm
C_u =N/A C_c =N/A

Classification

ASTM N/A

AASHTO Silty Gravel and Sand (A-2-4 (0))

Sample/Test Description

Sand/Gravel Particle Shape : ROUNDED
Sand/Gravel Hardness : HARD

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0023

GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation		
Project Name:	G1996		
Project Location:	---		
GTX #:	8660		
Start Date:	11/11/2008	Tested By:	ema
End Date:	11/13/2008	Checked By:	jdt
Boring #:	---		
Sample #:	TMW-8D		
Depth:	182-184 ft		
Visual Description:	Moist, olive yellow silty sand		

Hydraulic Conductivity of Saturated Porous Materials Using a Flexible Wall Permeameter by ASTM D 5084
Constant Gradient

Sample Type:	tube	Permeant Fluid:	de-aired tap water
Orientation:	Vertical	Cell #:	9/9/9

Sample Preparation: Extruded from tube, cut, trimmed and placed into permeameter at as-received density and moisture content. Trimmings moisture content = 11.4%.

Parameter	Initial	Final
Height, in	3.84	3.29
Diameter, in	1.87	1.88
Area, in^2	2.75	2.78
Volume, in^3	10.5	9.13
Mass, g	335	337
Bulk Density, pcf	121	140
Moisture Content, %	13.8	14.5
Dry Density, pcf	106	123
Degree of Saturation, %	---	99

B COEFFICIENT DETERMINATION

Cell Pressure, psi:	95.1	Pressure Increment, psi:	5.21
Sample Pressure, psi:	91.4	B Coefficient:	0.99

FLOW DATA

Date	Time, sec	Pressure, psi			Gradient	Flow Volume, cc				Temp, °C	R_t	Permeability K @ 20 °C, cm/sec
		Cell	Inlet	Outlet		In	Out	Δ In	Δ Out			
11/12	---	90.0	86.5	83.5	25.2	2.80	23.00	---	---	---	---	---
11/12	1680	90.0	86.5	83.5	25.2	20.90	5.00	18.10	18.00	20	1.000	2.4E-05
11/12	----	90.0	86.5	83.5	25.2	0.80	24.50	---	---	---	---	---
11/12	2220	90.0	86.5	83.5	25.2	23.10	2.20	22.30	22.30	20	1.000	2.2E-05
11/12	----	90.0	86.5	83.5	25.2	0.60	24.60	---	---	---	---	---
11/12	1800	90.0	86.5	83.5	25.2	17.90	7.00	17.30	17.60	20	1.000	2.1E-05
11/12	----	90.0	86.5	83.5	25.2	0.60	24.50	---	---	---	---	---
11/12	2062	90.0	86.5	83.5	25.2	18.90	6.10	18.30	18.40	20	1.000	2.0E-05

PERMEABILITY AT 20° C: 2.2×10^{-5} cm/sec (@ 5 psi effective stress)

0024

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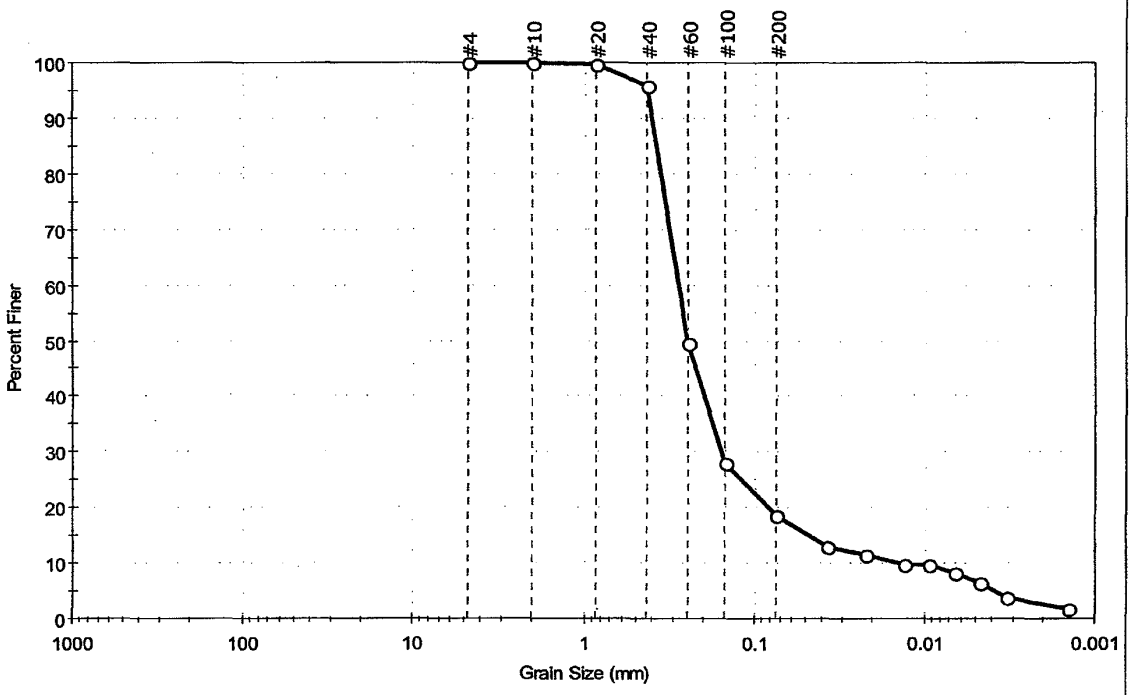
Client:	Mitkem Corporation				
Project:	G2084				
Location:	---			Project No:	GTX-8685
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW-8D	Test Date:	11/21/08	Checked By:	jdt
Depth :	222-224 ft	Test Id:	142490		
Test Comment:	---				
Sample Description:	Moist, light yellowish brown silty sand				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
--	0.0	81.6	18.4

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
#4	4.75	100		
#10	2.00	100		
#20	0.85	100		
#40	0.42	96		
#60	0.25	50		
#100	0.15	28		
#200	0.075	18		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0372	13		
---	0.0225	11		
---	0.0133	10		
---	0.0094	10		
---	0.0066	8		
---	0.0047	7		
---	0.0033	4		
---	0.0014	2		

Coefficients

D_{85} = 0.3750 mm D_{30} = 0.1572 mm
D_{60} = 0.2818 mm D_{15} = 0.0480 mm
D_{50} = 0.2514 mm D_{10} = 0.0143 mm
C_u = N/A C_c = N/A

Classification

ASTM N/A

AASHTO Silty Gravel and Sand (A-2-4 (0))

Sample/Test Description

Sand/Gravel Particle Shape : ---
Sand/Gravel Hardness : ---

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0136

GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation		
Project Name:	G2084		
Project Location:	---		
GTX #:	8685		
Start Date:	11/20/2008	Tested By:	ema
End Date:	11/24/2008	Checked By:	jdt
Boring #:	---		
Sample #:	TMW-8D		
Depth:	222-224 ft		
Visual Description:	Moist, light yellowish brown silty sand		

Hydraulic Conductivity of Saturated Porous Materials Using a Flexible Wall Permeameter by ASTM D 5084
Constant Gradient

Sample Type:	tube	Permeant Fluid:	de-aired tap water
Orientation:	Vertical	Cell #:	9/9/9

Sample Preparation: Extruded from tube, cut, trimmed and placed into permeameter at as-received density and moisture content. Trimmings moisture content = 16.9%.

Parameter	Initial	Final
Height, in	2.58	1.97
Diameter, in	1.77	2.02
Area, in^2	2.46	3.20
Volume, in^3	6.35	6.31
Mass, g	220	220
Bulk Density, pcf	132	132
Moisture Content, %	16.7	16.6
Dry Density, pcf	113	114
Degree of Saturation, %	---	96

B COEFFICIENT DETERMINATION

Cell Pressure, psi:	95.3	Pressure Increment, psi:	4.98
Sample Pressure, psi:	90.9	B Coefficient:	0.95

FLOW DATA

Date	Time, sec	Pressure, psi			Gradient	Flow Volume, cc				Temp, °C	R_t	Permeability K @ 20 °C, cm/sec
		Cell	Inlet	Outlet		In	Out	Δ In	Δ Out			
11/21	---	90.0	86.0	84.0	28.1	2.50	23.60	---	---	---	---	---
11/21	240	90.0	86.0	84.0	28.1	16.50	9.20	14.00	14.40	20	1.000	1.0E-04
11/21	----	90.0	86.0	84.0	28.1	0.80	24.20	---	---	---	---	---
11/21	390	90.0	86.0	84.0	28.1	20.70	4.30	19.90	19.90	20	1.000	8.8E-05
11/21	----	90.0	86.0	84.0	28.1	1.10	24.40	---	---	---	---	---
11/21	450	90.0	86.0	84.0	28.1	25.00	0.30	23.90	24.10	20	1.000	9.2E-05
11/21	----	90.0	86.0	84.0	28.1	0.50	24.50	---	---	---	---	---
11/21	300	90.0	86.0	84.0	28.1	17.00	7.90	16.50	16.60	20	1.000	9.5E-05

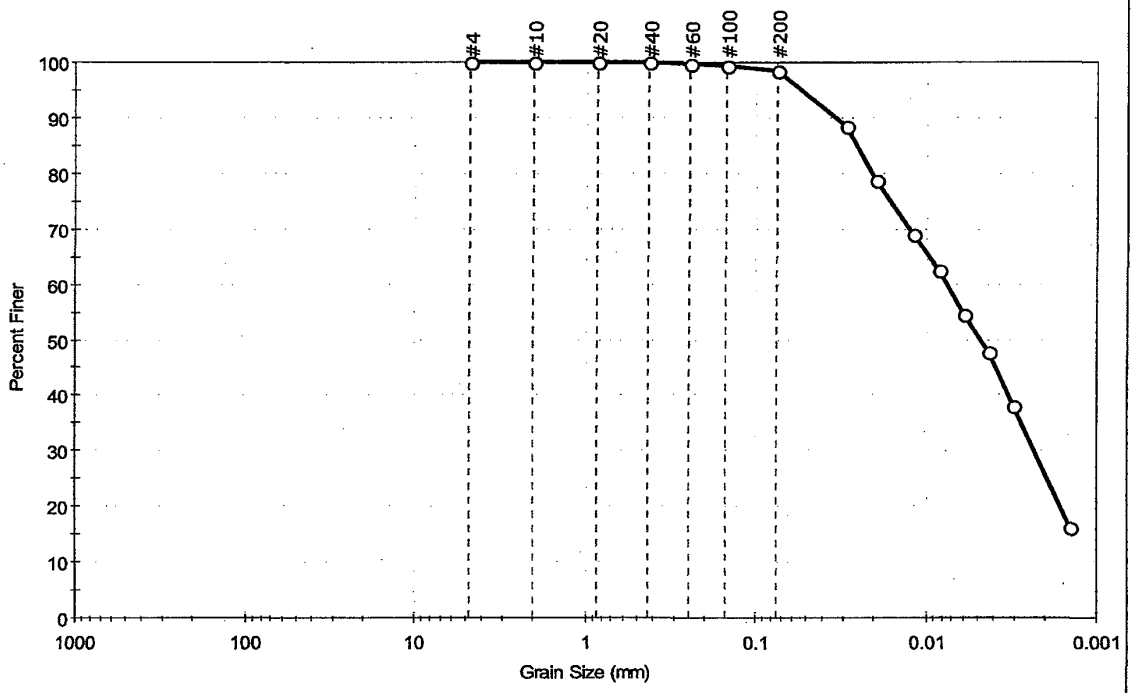
PERMEABILITY AT 20° C: 9.4×10^{-5} cm/sec (@ 5 psi effective stress)

0137

GeoTesting express
a subsidiary of Geocomp Corporation

Client:	Mitkem Corporation				
Project:	G1996				
Location:	---			Project No:	GTX-8660
Boring ID:	---	Sample Type:	tube	Tested By:	ap
Sample ID:	TMW-8D	Test Date:	11/14/08	Checked By:	jdt
Depth :	262-264 ft	Test Id:	142029		
Test Comment:	---				
Sample Description:	Moist, light yellowish brown clay				
Sample Comment:	---				

Particle Size Analysis - ASTM D 422-63 (reapproved 2002)



% Cobble	% Gravel	% Sand	% Silt & Clay Size
—	0.0	1.6	98.4

Sieve Name	Sieve Size, mm	Percent Finer	Spec. Percent	Complies
#4	4.75	100		
#10	2.00	100		
#20	0.85	100		
#40	0.42	100		
#60	0.25	100		
#100	0.15	99		
#200	0.075	98		
---	Particle Size (mm)	Percent Finer	Spec. Percent	Complies
---	0.0300	88		
---	0.0196	79		
---	0.0118	69		
---	0.0085	63		
---	0.0060	54		
---	0.0043	48		
---	0.0031	38		
---	0.0014	16		

Coefficients

D_{85} =0.0259 mm	D_{30} =0.0023 mm
D_{60} =0.0076 mm	D_{15} =N/A
D_{50} =0.0048 mm	D_{10} =N/A
C_u =N/A	C_c =N/A

Classification

ASTM N/A

AASHTO Silty Soils (A-4 (0))

Sample/Test Description

Sand/Gravel Particle Shape : ---

Sand/Gravel Hardness : ---

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R2-0002456

GeoTesting express
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Client:	Mitkem Corporation		
Project Name:	G1996		
Project Location:	---		
GTX #:	8660		
Start Date:	11/12/2008	Tested By:	ema
End Date:	11/14/2008	Checked By:	jdt
Boring #:	---		
Sample #:	TMW-8D		
Depth:	262-284 ft		
Visual Description:	Moist, light yellowish brown clay		

Hydraulic Conductivity of Saturated Porous Materials Using a Flexible Wall Permeameter by ASTM D 5084
Constant Gradient

Sample Type:	tube	Permeant Fluid:	de-aired tap water
Orientation:	Vertical	Cell #:	16

Sample Preparation: Extruded from tube, cut, trimmed and placed into permeameter at as-received density and moisture content. Trimmings moisture content = 23.7%.

Parameter	Initial	Final
Height, in	2.76	2.74
Diameter, in	1.55	1.51
Area, in^2	1.89	1.79
Volume, in^3	5.21	4.91
Mass, g	170	170
Bulk Density, pcf	124	132
Moisture Content, %	21.6	21.8
Dry Density, pcf	102	108
Degree of Saturation, %	---	99

B COEFFICIENT DETERMINATION

Cell Pressure, psi:	95.2	Pressure Increment, psi:	5.06
Sample Pressure, psi:	91.2	B Coefficient:	0.97

FLOW DATA

Date	Time, sec	Pressure, psi			Gradient	Flow Volume, cc				Temp, °C	R_t	Permeability K @ 20 °C, cm/sec
		Cell	Inlet	Outlet		In	Out	Δ In	Δ Out			
11/13	---	90.0	86.3	83.8	25.3	7.40	23.60	---	---	---	---	---
11/13	4500	90.0	86.3	83.8	25.3	7.50	23.50	0.10	0.10	20	1.000	7.6E-08
11/13	----	90.0	86.3	83.8	25.3	7.50	23.50	---	---	---	---	---
11/13	3360	90.0	86.3	83.8	25.3	7.60	23.40	0.10	0.10	20	1.000	1.0E-07
11/13	----	90.0	86.3	83.8	25.3	7.60	23.40	---	---	---	---	---
11/13	3840	90.0	86.3	83.8	25.3	7.70	23.30	0.10	0.10	20	1.000	8.9E-08
11/13	----	90.0	86.3	83.8	25.3	7.70	23.30	---	---	---	---	---
11/13	5460	90.0	86.3	83.8	25.3	7.90	23.20	0.20	0.10	20	1.000	9.4E-08

PERMEABILITY AT 20° C: 9.0 x 10^{-8} cm/sec (@ 5 psi effective stress)

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APPENDIX J

LABORATORY ANALYTICAL REPORTS