1868-4E-BDSQ

Outdoor writing products for Outdoor writing people

RECYCLED RECYCLABLE

This cover contains post-consumer recycled material

Rite in the Rain

A patented, environmentally responsible, all-weather writing paper that sheds water and enables you to write anywhere, in any weather.

Using a pencil or all-weather pen, *Rite in the Rain* ensures that your notes survive the rigors of the field, regardless of the conditions.

J. L. DARLING CORPORATION
Tacoma, WA 98424-1017 USA
www.RiteintheRain.com

Item No. 393N
ISBN: 978-1-932149-91-3

©

Made in the USA
US Pat No. 6,863,940

6 32281 39321 4

Rite in the Rain.
ALL-WEATHER
JOURNAL
№ 393N

SOUTH DAYTON
LANDFILL

CH2MHILL

Brett A. Fishwild
Associate Project Manager

CH2M HILL
One Dayton Centre
1 South Main Street
Dayton, OH 45402
Tel 937.228.4285
Direct 937.220.2955
Fax 937.228.7572
brett.fishwild@ch2m.com

CH2MHILL

Dawit Tecle
Hydrogeologist

CH2M HILL
One Dayton Centre, Suite 1100
1 South Main Street
Dayton, OH 45402
Tel 937.228.4285
Direct 937.228.3180, ext. 269
Fax 937.228.7572
dtecleha@ch2m.com

"Rite in the Rain"®
ALL-WEATHER WRITING PAPER

Name South Dayton Landfill Site

Address Moraine, Ohio

Phone

Project 20405.012.008.1868.00
SOS-0008-1206-002
SSID# B52B
Analytical
20405.016.008.1869.00
SOS-0008-1206-003

"Rite in the Rain" - a unique all-weather writing surface created to shed water and to enhance the written image. Makes it possible to write sharp, legible field data in any kind of weather.

a product of

J. L. DARLING CORPORATION
TACOMA, WA 98424-1017 USA
www.RiteintheRain.com

CONTENTS

PAGE	REFERENCE	DATE
	Greg Lewis - CRA	
	513-200-8902	
	937-657-0826	
	Brett Fishwild - CH2M Hill	
	937-220-2955	

7-19-12 Thursday

0915 START Sherrard arrives at the South Dayton Landfill Site. START meets with subcontractor, SCS, to install 6 soil gas wells. — JS

1010 SCS sets up at GP-2. ~~SCS to push to 8' and~~ JS SCS to push down to 12' and 16' depths. GP-2 will be screened at 12' and 16' below ground surface (bgs).

1110 SCS sets up at GP-5. SCS >3' from area marked with GPR. — JS

1150 SCS completes nesting 12' and 16' screens at GP-5. — JS

1155 SCS sets up at GP-6. — JS

1255 SCS completes nesting 8', 12' and 16' screens at GP-6. — JS

1305 SCS sets up at GP-4. — JS

NOTE: The weather is raining with temps in the 80-90s. — JS

NOTE: All Geoprobe locations were marked and screened for utilities by Bloodhound and OUPS. ~~John~~ JS START Sherrard and START Dave Robinson went to each Geoprobe location and doublechecked to ensure drilling would not hit a marked utility — JS

7-19-12 Thursday

1340 SCS continues to test probes at GP-4. GP-4 located by B&G Truck Body Shop. — JS

1415 SCS completes nesting 8', 12' and 16' screens in GP-4. — JS

1420 EPA OSC Renninger, Bolles, & Durno visit the site — JS

1430 SCS sets up and begins work at GP-3. — JS

NOTE: GP-3 located in front of Sim Trainer indoor firing range 2031 Dryden — JS

1520 SCS completes nesting 8', 12' and 16' screens in GP-3. — JS

Barometric Pressure today is 29.93 — JS

1525 OSC Renninger back on site — JS

1545 OSC Renninger off site. — JS

1550 SCS sets up at GP-1 — JS

1630 SCS completes nesting 8', 12', and 16' screens in GP-1 — JS

1700 SCS begins pouring concrete around soil gas probe covers. — JS

1815 Concrete work completed. SCS packing up to demobe. — JS

1830 All depart site. — JS

7/19/12

7-20-12 Friday

1500 START Shepard and OSC Renninger on site to check the soil gas probes for VOCs (using a PID) and methane. (using an MSA model 60 meter) — JS

	Screen Depth	VOCs (ppm)	% Methane
GP-1	8	0	0
	12	0	0
	16	PUMP FAIL	0
GP-2	12	98.5	10
	16	24.8	10
GP-3	8	0	0
	12	4.6	0
	16	0	0
GP-4	8	0	0
	12	0.9	0
	16	3	6
GP-5	12	1	0
	16	0	0
GP-6	8	0	0
	12	0.6	0
	16	0.1	0

Barometric Pressure = 29.92

1630 All depart site. — JS

7/20/12

7-24-12 Tuesday

START Dave Robinson conducts field screening of the soil gas probes. ~~Use~~ JS

VOCs checked with MultiRAE PID and methane checked with a GEM2000. The GEM 2000 was rented for the week. JS

	Depth	O_2%	VOCs	% Methane
GP-1	8	20.4	1.1	0
	12	20.5	0.9	0
	16	20.4	Pump Fail	0
GP-2	12	0.5	76.4	17.6
	16	0.3	49.1	22.3
GP-3	8	11.3	0.6	0
	12	11.1	0	0
	16	12.5	0	0
GP-4	8	5.1	1.2	0
	12	2.5	0.9	0
	16	1.8	1.0	0
GP-5	12	14.4	0	0
	16	14.2	0	0
GP-6	8	13.7	0	0
	12	11.5	0	0
	16	10.3	0	0

Barometric Pressure = 29.14-29.20

7/24/12

7-25-12 Wednesday

1500 START Sherrard on site to conduct field measurements at soil gas probes.

	Depth	O_2%	VOCs (ppm)	% Methane
GP-1	8	16.7	0	0
	12	16.9	0	0
	16	17.1	Pump Fail	0
GP-2	12	0.5	23.6	14.7
	16	0.5	24.3	22.2
GP-3	8	10	0	0
	12	10	0	0
	16	11.9	0	0
GP-4	8	4.2	0	0
	12	1.8	0	0
	16	1.2	0	0
GP-5	12	13.3	0.6	0
	16	13.4	0.2	0
GP-6	8	12.8	0	0
	12	11.1	0.6	0
	16	9.7	0	0

Barometric Pressure = 29.10

1630 START departs site. JS

7/25/12

7-26-12 Thursday

1300 START Sheppard onsite to collect field measurements at the soil gas probes. JS

	Depth (ft)	% O_2	VOCs (ppm)	% Methane
GP-1	8	18.4	1.1	0
	12	18.5	1.6	0
	16	18.4	Pump Fail	0
GP-2	12	0.5	15.8	16.6
	16	0.4	18.3	24.1
GP-3	8	9.8	2.3	0
	12	10.1	1.8	0
	16	11.7	0.1	0
GP-4	8	4.2	0	0
	12	1.7	0	0
	16	1.2	0.4	0
GP-5	12	12.9	0	0
	16	12.9	0	0
GP-6	8	11.6	0	0
	12	9.3	0	0
	16	8.7	0	0

Barometric Pressure = 28.97

1430 START off site. JS

7/26/12

7-27-12 Friday

1200 START Sheppard onsite to collect field measurements in the soil gas probes. JS

	Depth (ft)	% O_2	VOCs	% Methane
GP-1	8	16.8	0	0
	12	16.8	Pump Fail	0
	16	16.8	0	0
GP-2	12	0.5	20	16.4
	16	0.3	24.3	22.6
GP-3	8	9.8	0	0
	12	10	0	0
	16	11.2	0	0
GP-4	8	4.5	0	0
	12	1.9	0	0
	16	1.2	0	0
GP-5	12	13.2	0	0
	16	13.1	0	0
GP-6	8	11.8	0.3	0
	12	9.7	0.2	0
	16	8.5	0.6	0

Barometric Pressure = 29.11

1330 START off site. JS

7/27/12

7-30-12 Monday

1200 START Sheppard on site to collect soil gas samples from 5 locations. Soil Gas Samples will be a grab air sample using a 6-L SUMMA canister. Locations were selected based on historical VOC readings over the last week. (JS)

1225 START sets up at GP-1 (8' depth) Sample is collected. SUMMA can #03789. Begin vacuum = -29.78 End vacuum = -1.36
SDL-GP1-8-073012 ID#
(JS)

1255 START collects soil gas sample at GP-2 (16' depth) SUMMA can #10779 Begin vacuum = -29.42 End vacuum = -0.92
SDL-GP2-12-073012 ID#
(JS)

1310 START collects soil gas sample at GP-3 (8' depth) SUMMA can #10778 Begin vacuum = -29.5 End vacuum = -1.77
SDL-GP3-8-073012 ID#
(JS)

7/30/12

7-30-12 Monday

1325 START collects soil gas sample at GP-4 (16' depth) SUMMA can #34182 Begin vacuum = -28.94 End vacuum = -1.57 SDL-GP4-16-073012 ID#
(JS)

1340 START collects soil gas sample at GP-6 (12' depth) SUMMA can #35998 Begin vacuum = -29.65 End vacuum = -1.73
SDL-GP6-12-073012 ID#
(JS)

1400 START departs site to go back to Cincinnati office to fill out chain of custody forms. the soil gas samples will be FedEx'd to Air Toxics Ltd. in Folsom, CA for Method TO-15 and % Methane analyses. A turnaround time of 7 calendar days was requested. (JS)

1600 START delivers to FedEx a box of 4 samples for 2-day delivery. The soil gas sample from GP-2 will need to be shipped Dangerous Goods on 7-31-12 due to its historical methane readings.

7/30/12

7-31-12 Tuesday
START Randy Kirkland to meet ~~GA~~ JS
CRA Greg Lewis at 1330 hours at
2391 East River Rd. to oversee how
CRA conducts its leak testing procedure
on subslab probes. JS

John [illegible]
7/31/12

8-1-12 Wednesday
1015 START Sherrard arrives on site
to conduct split subslab sampling
at 3 residential properties with CRA
on E. River Road. START meets with
Greg Lewis from CRA and Dawit Tecle
from CH2M Hill. The first house to sample
is 2391 E. River Rd. It is a vacant residential
home. CRA uses a PID and a GEM2000 to
monitor the ambient air for VOCs and
methane, respectively. CRA then purges
the subslab probe by collecting a tedlar
bag air sample. The tedlar bag air sample
filled up for 5 minutes. CRA then took the
tedlar bag outside and checked it for
VOCs with the PID and methane with
the GEM2000 instrument. Once completed
CRA connected the Teflon tubing from the
subslab probe to a stainless steel splitter
(which was provided by the lab Test
America) which was then connected
to the CRA SUMMA and the START
SUMMA. JS
1057 Sample started at 2391 E. River Rd.
Summa #5729. Begin vac = -29.6 Reg #40248
24-hr sample 2391RIVER-SS-080112 ID#

8-1-12 Wednesday

1139 Subslab sample started at 2232 E. River Road. SUMMA can #11870 Begin Vac = -29.6 Regulator # 40102 24-hr sample 2232RIVER-SS-080112 Sample ID# (JS)

1223 Subslab sample started at 2373 E. River Road. SUMMA can #23887 Begin vac = -29.6 Regulator #40497 24-hr sample 2373RIVER-SS-080112 Sample ID# (JS)

1245 START departs site. (JS)

John Shed
8/1/12

8-2-12 Thursday

1055 START Shedrard arrives on site at 2391 E. River Rd. SUMMA canister stopped at 1020 hours with a final vacuum of -6.7 (JS)

1139 Sample at 2232 E. River Road is stopped. Final vacuum is -3.2 (JS)

NOTE:
After sample is stopped, CRA collects a Tedlar bag air sample and field checks it for VOCs and % methane. CRA also logs ambient air readings for VOCs and % methane. (JS)

1223 Sample at 2373 E. River Rd is stopped. Final vacuum reading is -6.0

1300 START departs site. (JS)

John Shed
8/2/12

8-15-12

9-7-12 S.D. Landfill D. R[illegible]

1055 Bump test GEM2000 @ Weston office (Hagen, Equip ID: 0004364) using Portacyl 4-gas cal std (Part # PCD25333A0029LN) (Lot # 041 9FC11). 2.5% CH_4 = 2.4% reading; O_2 = 21.1% for 20.9% cal std. —R

1117 Onsite @ S.D.L.-GP-7 site; Wx: Clear, 85F, winds 0-5 S/SW. P_B = 29.13" Hg. —R

Site	Depth (ft)	O_2 (%)	CH_4 (%)	Time	CO_2
GP-7	8	10.3	0.0	1127	8.1
	12	7.6	0.0	1129	10.3
	16	6.2	0.0	1130	10.9
GP-2	12	0.1	1.7	1138	11.0
	16	0.2	3.1	1140	11.3

1143 Both casings sealed; pack gear & depart site. —R

1350 @ Dayton office; bump test GEM2000. 2.5% CH_4 = 2.4%; O_2 @ 20.9% = 20.7% —R

9-7-12