UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 2
290 Broadway
New York, NY 10007-1866

November 16, 2015

CERTIFIED MAIL --
RETURN RECEIPT REQUESTED

Mrs. Mary Lou Capichioni
Director, Remedial Services
Environmental, Health & Regulatory Services
The Sherwin-Williams Company
101 Prospect Avenue, N.W.
Cleveland, Ohio 44115-1075

Re: Administrative Order on Consent for Remedial Investigation/Feasibility Study
Index No. II CERCLA-02-99-2035
March 2015 Site Characterization Summary Report - United States Avenue Burn Site, Gibbsboro, Camden County, New Jersey

Dear Ms. Capichioni:

The U.S. Environmental Protection Agency (EPA) has reviewed the March 2015 Site Characterization Summary Report (SCSR) for the United States Avenue Burn Superfund Site (Burn Site), located in Gibbsboro, Camden County, New Jersey and provides the following comments (attachment).

EPA is requesting that the comments provided on the draft Site Characterization Summary Report for the United States Avenue Burn Site be incorporated into a draft Remedial Investigation (RI) Report for the United States Avenue Burn Site within 30 days of receipt of this letter.

Sincerely yours,

Ray Klimcsak, Project Manager
New Jersey Remediation Branch

Attachment

412366

Attachment

General Comments:

1. EPA is directing Sherwin-Williams to submit the draft RI report in the format consistent with the 1988 EPA Guidance for Conducting Remedial Investigations and Feasibility Studies under CERCLA. Specifically, the RI report format should follow the sections that are described on pages 3-30 and 3-31 of the guidance document. Present the facts on the study area investigation, physical characteristics of the study area, nature and extent of contamination, and contaminant fate and transport in their specific sections of the RI report and limit conclusions to the final section of the report titled "Summary and Conclusions". The draft SCSR had conclusions threaded throughout the report which, if carried through to the RI, would reduce the clarity of the document.

2. It is stated in the Burn Site SCSR that data collected prior to the initiation of the remedial investigation (RI) activities will not be used in the report to define nature and extent. However, this is not consistent with in the 2003 Work Plan and 1999 Administrative Order on Consent (AOC). EPA is directing Sherwin-Williams to incorporate the pre-RI soil data along with the existing RI soil data into the draft RI report and to use both data sets to define the nature and extent of contamination at the Burn Site.

3. A significant oversight of the SCSR is the lack of discussion on the relatively high, above 3,000 parts per billion (ppb) concentration of total semi-volatile organic compounds (SVOC) tentatively identified compounds (TICs) and nearly 8,000 ppb concentration of total volatile organic compounds (VOCs) TICs in groundwater at the site. EPA is directing Sherwin-Williams to evaluate and discuss the individual VOC and SVOC TICs, as well as the total VOC and SVOC TICs in the groundwater and other media (where available) present at the Burn Site. EPA is directing Sherwin-Williams to evaluate the substantially robust data set available for the FMP Area and evaluate if contaminated groundwater from the FMP area is impacting the Burn Site.

   Please note, pursuant to the New Jersey Department of Environmental Protection (NJDEP) Ground Water Quality Standards N.J.A.C. 7:9C-1.7(c) 6, the Interim Generic Criteria apply to VOC and SVOC TICs and any targeted compounds which lack specific or interim specific criteria. The applicable Interim Generic Criteria are: 5 ug/l each and 25 ug/l total for Synthetic Organic Chemical (SOC) defined as carcinogens; and 100 ug/l each and 500 ug/l total for SOCs defined as non-carcinogens as defined in N.J.A.C. 7:9C-1.4.

4. The depiction of the former landfill area within the Burn site fenced area, in particular the "green lines" used in figures and referenced in the various sections of the text summarized historic excavation activities that were performed by Sherwin-Williams to address the disposal areas within the Burn Site. However, the RI sampling results indicate the presence of contamination and or "sludge" thereby making the lines irrelevant when depicting the

current nature and extent of contamination. Remove the green lines from all of the figures that depict the current site condition

5. The following soil sample locations were used in the Burn Site SCSR to define the limits of soil contamination: BSSB0065, 66, 67, and 68 and are cited as being below the NJDEP Residential Direct Contact Soil Remediation Standards (RDCSRS), however, they were collected at depths ranging between 28.0 – 35.5 feet below ground surface, well below known soil contamination. It is acknowledged in the SCSR that these samples were collected from the "mid-point" of monitoring wells being installed, however, the field notes, and X-Ray Fluorescence (XRF) results indicate it is apparent that these borings have high levels of contamination in more shallow (from ground surface in some instances and down to approximately 10 feet) intervals. The contamination that exists in a majority of the locations cited above (confirmed through visual observation and XRF screening results) do not support conclusions presented in the SCSR, which describes these areas as "clean", when they contain contamination Additionally, including pre-RI data will aid in defining the nature and extent of soil contamination.

6. Throughout the Burn Site SCSR, conclusions are drawn that contaminants in the groundwater, surface water and pore water are the result of partitioning of constituents from soil to groundwater, or "solids entrainment" for surface water and pore water concentrations. However, there is no dissolved data collected for groundwater and only very limited (dissolved) data for surface water and pore water. Note, the same conclusions are drawn for what Sherwin-Williams terms "naturally-occurring constituents". Conclusions, which are to be presented in the conclusion section of the RI and not throughout the draft RI, should be based on available data, whether it is from site-related activities, or other available literature. However, if off-site data is discussed to support background conditions, this data must be submitted to EPA as an appendix to the RI.

7. The data table for the Burn Site groundwater monitoring wells presents a complete list of the individual VOC and SVOC TICs, as well VOC and SVOC TIC "totals". EPA is directing Sherwin-Williams to present the VOC and SVOC TIC totals for surface water and pore water and ensure that the complete list of individual VOC and SVOC TICs are included for all media as well.

8. The Burn Site SCSR concludes that all sludge material within the Burn Site has been removed. EPA does not concur with this conclusion. Within areas of the Burn Site, previously indicated by Sherwin-Williams as having been addressed, there exists what appears to be sludge, or "sludge-like material" (i.e., BSSB0001, 0020, 0074, 0075 and 0066). Additional locations, outside of what has been termed the (former) landfill area, but still south of Honey Run, exhibit staining or sludge-like material include: BSSB0007, 0008, and 0009 (Attachment 2 – EPA Oversight notes).

EPA is directing Sherwin-Williams to include the data from Appendix G (suspect material), with the soil data (both the Excel tables and any figures depicting the extent of soil contamination). Additionally, EPA is directing Sherwin-Williams to generate a figure, to depict the areal extent of the material based on visual observation of the material at the ground surface.

9. Table 4 includes a frequency of contaminant detection for soil and sediment, as well as the frequency of exceedances (as compared to the media-specific criteria), but not for the other media (surface water, groundwater and pore water) collected at the Burn Site. EPA is directing Sherwin-Williams to create tables for each media. Each of the tables should also include a column, which indicates the frequency at which the method detection limit exceeded the media-specific criteria/standard.

10. The use of the term, Former Manufacturing Plant, as it used on page 2-3, "..that finished goods were move to and from the FMP", is inaccurate. The term FMP should not be used in the context of referring to the former facility (when it was active). The term "former facility" should be used.

11. Page 4-5, first paragraph of Section 4.1 – EPA does not concur with the statement that, "Although other constituents, including other metals, PCBs, and SVOCs (PAHs and PCP) are found at concentrations greater than the RDCSRS in one or more samples, the frequency at which they were found at levels above the RDCSRS and the levels in comparison to the RDCSRS are lower than those for arsenic and lead." PCP was found to be present at a level of 2,200 times the RDCSRS in the "suspect material" which contradicts the assertion of the sentence above.

12. General comment on Section 4.1 Soil Results – The discussion of soil results begins with what constituents are detected most frequently and at concentrations greater than the RDCSRS in soil. It is then followed by what constituents are not detected frequently, but does not accurately present with how frequently (in areas of detections) the constituent was analyzed for. This needs to be presented transparently. In addition, it is briefly discussed that the XRF was utilized. However, an explanation needs to be presented in the RI indicating that the XRF readings presented in the report are the result of taking the average of the three field readings, at the time of sampling.

    As per General Comment #2, EPA is directing Sherwin-Williams to incorporate the available pre-RI data (soil data) into the draft RI report, along with existing RI data. This data, along with the XRF readings and RI data, should be synthesized and discussed in the RI Report. As a result, when a reviewer reads the statement, "The highest arsenic and lead concentrations in the Burn Area are generally found in the upper 2 to 4 feet of soil.", it is not apparent whether this statement includes the assessment of validated data only, or includes XRF analyses. Again, such conclusions should draw upon: pre-RI data, RI data and XRF results.

13. Page 4-6, Section 4.1.1.1 – EPA does not concur with the statement that arsenic and lead are located in only the central and southern portions of the Burn Area. Burn Site soil boring location BSSB0067 underwent laboratory analysis at the 28.0 – 28.5 foot interval. It is acknowledged that soil from this interval was below the RDCSRS. However, when the average XRF values are observed for the 4.0 to 8.0 foot interval, there is gross contamination of arsenic and lead. This is further supported by soil boring location BSSB0024, which did undergo laboratory analysis and validated results indicated comparable levels of arsenic and lead contamination, validating the XRF results from BSSB0067. Since the closest sample is nearly 100 feet away (BSSB0061) and outside the Burn Area, it cannot be concluded that contamination is solely in the central and southern portions of the Burn Area.

14. In Section 2.6.3 of the report, the section goes back and forth between discussing one private well and five community wells. The paragraphs in this section should be rearranged so one well type is discussed in its entirety followed by discussion of the other well type.

15. The September 24, 2007 scoping document indicated that in samples with noted evidence of potential organic constituents, such as high PID readings significantly above background, a sample (soil) would be collected. For example, the well construction log for the installation of MW-9A shows the interval at 3.5 to 4.0 feet had a PID reading of 740 ppm. However, there is no record of a soil sample from this interval. EPA is requesting an explanation, as to why no sample was collected.

Specific Comments on the SCSR text:

1. In the list of Acronyms, please include the acronym for SCC.

2. Page ES-2, first bullet on page – Revise the statement to indicate that the former plant wastewater lagoons are part of the Former Manufacturing Plant area, not south "of" the FMP area.

3. Page ES-2, fourth bullet on page – Revise statement to indicate that the "Railroad Track" is historic and not a currently active railroad track.

4. Page 1-2, bullet for White Sand Branch – Revise to state, "This is the portion of White Sand Branch, which originates within the Route 561 Dump Site, as it enters the northeast portion of the fenced portion of the Burn Site and flows in a southern direction, where Honey Run joins it and then passes through a culvert, beneath U.S. Avenue and subsequently discharges into Bridgewood Lake."

5. Page 1-2, bullet for Railroad Track Area – Indicate that it is a historic portion of a former (previously functioning) railroad track.

6. Page 2-1, fourth paragraph – Third sentence, in lieu of using the term "…, it flows across the "top" of the Burn Site", replace with "northern part of the Burn Site".

7. Page 2-1, last paragraph on page – In lieu of the term "unused", please use "historic".

8. Page 2-1, last paragraph on page – Remove the second sentence of the last paragraph on the page, as it adds no value to the report.

9. Page 2-2, Site History, first paragraph – Early in the paragraph it is stated that "Lucas" and Sherwin-Williams used the area as a landfill until 1972, yet the last sentence in the paragraph states that between 1950 and 1977, Sherwin-Williams constructed bermed storage areas to store wastewater sludge. As the former landfill area and the area that was used to store wastewater sludge are generally close in proximity, EPA is requesting that these time periods cited be confirmed.

10. Page 2-2, Section 2.2, last sentence on page – Text on this page makes reference to an unnamed "sportsman's club and the cemetery association", yet, Wards Sand and Materials Company is specifically cited on the same page. Either name commercial entities explicitly, or keep them "unnamed".

11. Page 2-3, first paragraph on page – Replace all references to "FMP" with "former facility". In addition, in the second paragraph on the page, please confirm whether the portion of the rail line right of way (which was donated to the Borough of Gibbsboro) is only for the Railroad Track Area, or for the rail right of way that would have (and may still) exist on Brandywine Operating L.P.'s property?

12. Page 2-4, third bullet – Introduces the term NJDEP "soil cleanup criteria" (SCC). As it is later discussed, the text needs to provide some reference to it and how it relates to RDCSRS. Later, the term "screening criteria" only (and not SCC) is used.

13. Page 2-7, EPA is requesting that a figure be provided which depicts the approximate aerial extent at which the removal action occurred at the Railroad Track area, as well as the approximate depths of excavation.

14. Page 2-13, bottom of page – States that boring logs for all soil samples are in Appendix D. However, various boring locations appear to be missing. Please clarify.

15. Page 2-16, Section 2.6.2, fourth paragraph – The reference to Figure 10 (groundwater contours) does not cite whether the data used to develop groundwater contours (i.e., single event or average of selected events). The source of the data used to develop the groundwater contours should be explained.

16. Page 3-2 and 3-3 – Page 3-2 introduces the term "screening levels", whereas Page 3-3 then uses the term "media-specific screening criteria". Page 3-4 later uses "screening criteria". Clarify that they are one in the same.

17. Page 3-3, Section 3.0 – Please clarify whether the site-specific hardness for the surface water standard was calculated based on average hardness data for Bridgewood Lake, Honey Run and White Sand Branch individually, or collectively.

18. Page 3-7, discussion of groundwater – States that during installation of new monitoring wells, soil samples were collected from the mid-point of the screened interval and analyzed for TAL metals and TOC, yet these samples are included in "delineation figures". Further, clearly state the 7 samples that were collected, since 7 wells were installed.

19. Page 3-8, discussion of surface water sampling – It is stated that 10 locations were sampled for surface water from Bridgewood Lake, yet page 3-4/3-5 cites that 2 locations from BWL were collected (inflow and outflow). EPA is requesting confirmation if any of these 2 locations, are included in the 10 cited previously.

20. Page 4-9, first paragraph. EPA is directing Sherwin-Williams to remove the statement which concludes that antimony is not considered a site-related constituent. The following Hilliards Creek (Floodplain) soil sample locations exhibited antimony above the NJDEP RDCSRS: HCSB111/138, HCSB0113/140, HCSB0114/141, HCSB0115/142, HCSB0116/143, HCSB0118/145, HCSB0120/147 – to cite several, as there are more within the floodplain of Hilliards Creek above West Clementon Ave. These soil samples are downstream and in the vicinity of the former lagoons (which were known to release to Hilliards Creek), and "lagoon wastes" are one of the known materials disposed of at the Burn Site, EPA considers antimony to be site-related.

21. Page 4-9, Section 4.1.3, last paragraph – It is stated that, "No samples were collected in United States Avenue." However, referenced Figures: 25, 27A, and 27B illustrate that samples RSSB0010 – 17 and RSSB0031 were all collected in United States Avenue. Please clarify.

22. Page 4-20, Section 4.3, third paragraph, first sentence – It is stated that, "..aluminum and <u>lead</u>..", please confirm that the text should read "lead" and not "<u>iron</u>".

23. Figure 15 – Depicts soil sample location HRSB0032 as below NJDEP RDCSRS, which is accurate for laboratory data. However, Table 5 and Figure 16D both omit that soil samples, screened with the XRF at the 4.0 to 4.5 foot interval are above criteria for arsenic and lead.

Specific Comments on Figures:

1. Figure 1 - For completeness purposes, New Jersey should be labeled on this figure.

2. Figure 2 – Some indication as to why areas, outside of the fenced portions of the Burn Site and waterbodies, need to be provided. Perhaps it was shaded to indicate that RI sampling activities occurred outside of these areas, but that would need to be clarified, as it could also be confused with the fact that it is being shaded because it has been determined that everything shaded is contaminated.

3. Figure 3 – EPA is requesting that separate figures be created to depict the associated wetlands and flood areas for the Burn Site (as they are now depicted in one figure). Additionally, portions of areas not associated with the Burn Site, should not be presented in the figure.

4. Figure 4 – Similar to comment on Figure 2 (above), areas outside the fenced area are shown as part of the Burn Site. If the intent is to accurately depict areas of known contamination, this needs to be clarified, or, if the intent is to depict areas that were sampled, then that needs to be clarified.

5. Figure 6 – See comments on Figure 2 and 4 regarding site "boundary" lines.

6. Figure 6 – The title of the figure is "Local Bedrock Geology", but formations shown on the figure are unconsolidated. The inset on the figure is statewide and not local. Please revise the title of the figure.

7. Figure 7 – Same as Specific Comment #6, the figure does not depict what the title states. Please revise.

8. Figure 8 – See comments on Figure 2, 4, and 6 (See Specific Comment #5 above, regarding boundary lines).

9. Figure 9 – The shapes highlighted in "yellow" should be identified in the legend as to what they are being used to identify.

10. Figure 17 – Sample BSSB0071 is depicted as clean, yet it has PCP in the 0-0.5 interval above RDCSRS.

Specific Comments on Appendix C:

1. Pages C-9 and C-11 – On Page C-9, third paragraph, it is stated that the deep well is "semi-confined", however, on Page C-11, fifth paragraph, it is stated that the deep well is "unconfined". Please clarify.