

Via Electronic Mail/Dated as of the date signed below

Kevin Mooney Senior Project Manager General Electric Company 1 Plastics Avenue Pittsfield, MA 01201

Re: Conditional Approval of GE's December 20, 2023, *Quality of Life Compliance Plan* GE-Pittsfield/Housatonic River Site, Rest of River

Dear Mr. Mooney:

On December 20, 2023, the General Electric Company (GE) submitted to the United States Environmental Protection Agency (EPA) its *Quality of Life Compliance Plan* (the "Plan"). GE submitted the Plan as a requirement of the *Revised Final Resource Conservation and Recovery Act Permit* (Revised Final Permit), issued by EPA to GE on December 16, 2020; the approved *Final Revised Rest of River Statement of Work* (Final Revised SOW), dated September 14, 2021; and the approved *Revised Overall Strategy and Schedule for Implementation of Corrective Measures Plan*, dated July 5, 2022. The Plan is subject to the terms and conditions specified in the Consent Decree (CD) that was entered in U.S. District Court on October 27, 2000.

Pursuant to Section XV of the Consent Decree governing the response action, EPA, after providing reasonable opportunity for review and comment by the Commonwealth of Massachusetts and the State of Connecticut, conditionally approves the Plan subject to the following conditions. GE shall submit a Revised Plan for EPA review and approval by November 22, 2024.

1. The Revised Plan shall be amended to discuss mitigation of the potential quality-of-life impacts of rail transportation that are described in the *Revised On-Site and Off-Site Transportation and Disposal Plan* (due on October 15, 2024) to the extent that rail transport is proposed in that plan, or the Revised Plan may reference such a discussion in the Revised Transportation and Disposal Plan. Without limitation, such a discussion shall be included in any location in the Revised Plan where truck or material transport is discussed, provided that rail transport is relevant to the subject portion of the Revised Plan.

- 2. Section 1.2, page 2, 3rd paragraph: In the Revised Plan, GE shall define what "construction activities" might entail, in general terms.
- 3. Section 1.3, page 3, 1st paragraph: The Revised Plan shall insert the following sentence at the end of the paragraph: "In case of conflict between this Revised Plan and the Revised Updated Project Operations Plan, this Revised Plan shall control."
- 4. Section 3: In the Revised Plan, Section 3 shall be revised to omit the terms "as necessary" and "as needed" when discussing coordination with local governments.
- Section 4.1, 1st paragraph, 2nd bullet: In the Revised Plan, this bullet shall be changed to, "Implement routine control measures and supplemental control measures, as needed, to attain the applicable QOL standards."
- 6. Section 4.1, 1st paragraph, 3rd bullet: In the Revised Plan, this bullet shall be changed to, "Conduct monitoring during the remediation activities, and supplemental monitoring as necessary in response to complaints regarding QOL impacts, to assess whether the project is meeting the applicable QOL standards."
- Section 4.1, 1st paragraph, 6th bullet: In the Revised Plan, this bullet shall be changed to, "Evaluate and implement engineering controls, operational adjustments, or other contingency measures in the following circumstances: (1) if there is an exceedance of a quantitative QOL standard; (2) if there is a failure to meet a qualitative QOL standard; or (3) where appropriate in response to complaints."
- 8. Section 4.3.1: The Revised Plan shall include a qualitative standard to address observations of visible dust leaving the immediate work area and caused by the remediation.
- 9. Section 4.3.1.2: The Revised Plan shall state that EPA has set the Notification and Action Levels for PCBs in air and that the rationale for these health-based levels is described in the EPA Fact Sheet entitled *Rest of River Cleanup and the Upland Disposal Facility Will Not Pose a Health Threat from Airborne PCBs*, which is attached to this letter. GE shall attach the Fact Sheet to the Revised Plan.
- 10. Section 4.3.2, first sentence: In the Revised Plan, the phrase "to the extent practicable" shall be omitted.
- 11. Section 4.3.3: The Revised Plan shall require that observations of conditions that could cause project-related quality-of-life issues or complaints or result in an exceedance of the QOL standards (for example, visible dust or noticeable uncomfortable odors due to remediation activities) shall trigger an evaluation of whether additional mitigation measures or BMPs, such as those listed in Section 4.3.4, should be implemented to address such observations and

mitigate the potential for exceedances of QOL standards.

- 12. Section 4.3.3, page 11, 3rd paragraph: The Plan states that, "Specific locations for [air monitoring] stations will be identified on an RU-specific basis in the associated RD/RA work plans or SIPs for the RUs and, for the UDF, in the UDF OMM Plan." In the Revised Plan, Section 4.3.3 shall expand on monitoring location criteria and include a cross-reference to the Monitoring Location section of the Revised Ambient Air Monitoring Plan (AAMP) in the Revised Updated Project Operations Plan (POP) for an overview of the decision-making criteria that GE will use to identify air monitoring locations at all RUs (for example, prevailing wind direction, forecasted wind direction, nearest receptor, etc.). The Revised Plan shall also note that RU-specific plans will include additional work area-specific criteria that will be used to identify air monitoring locations (for example, multiple receptors, local geography) and will identify the specific locations for air monitoring.
- 13. Section 4.3.3, page 12, 3rd paragraph: The Plan states that PM10 monitoring "will be conducted daily for approximately 10 hours during construction-related activities..." However, Appendix G, Section IV of the Revised Field Sampling Plan/Quality Assurance Plan states that "real-time particulate [PM10] monitoring will be conducted during the entire duration of intrusive activities (e.g., excavation) or other soil or sediment handling activities performed as part of remediation or supporting activities at a given area..." Most of the Rest of River Remedial Action work will occur between the hours of 7:00 a.m. and 9:00 p.m., as stated in Section 4.4 of the Plan, which is a 14-hour window. The Revised Plan shall clarify that PM10 monitoring will be "conducted daily for a minimum of 10 hours when construction is ongoing and throughout the duration of construction activities." In addition, Table 4-1 shall be updated to include, for PM10 monitoring, "a minimum of 10 hours when construction is ongoing and throughout the duration of construction activities."
- 14. Section 4.3.3, page 12, 3rd paragraph: The Revised Plan shall include a requirement that PM10 particulate monitoring be conducted during all sediment removal activities, including wet excavation or hydraulic dredging, with an option that if such monitoring during the initial two weeks of a particular sediment removal activity conducted under wet conditions indicates that PM10 levels are acceptable (that is, below the Notification Level), GE may request that the PM10 monitoring frequency be reduced during the remainder of that activity.
- 15. Section 4.3.3, page 12, 4th paragraph: The Revised Plan shall include a cross-reference to and brief general discussion of the baseline ambient air monitoring for PCBs outlined in the Revised AAMP, which will be included as part of the Revised Updated POP.
- 16. Section 4.3.3, page 12, 4th paragraph: The Revised Plan shall include a discussion of the turnaround time for PCB analytical air sample results, even if included in other Work Plans.
- 17. Section 4.3.3.1, page 13, 1st paragraph: The Revised Plan shall clarify that EPA will be notified as soon as practicable, but no later than 24 hours after receipt of data from a downwind monitor

showing an exceedance of the PM10 Notification or Action Levels, regardless of the comparison of upwind and downwind monitoring locations. GE can include a discussion of upwind sources in this notification.

- 18. Section 4.3.3.1: The Revised Plan shall require GE to set a PM10 particulate monitoring alarm notification system that is triggered by an exceedance of the PM10 Notification Level and that prompts GE to evaluate the cause of the exceedance and, if necessary, take appropriate actions to prevent a PM10 Action Level exceedance from occurring.
- 19. Section 4.3.3.2: The Revised Plan shall add a stop-work requirement that will be triggered when the PM10 Action Level is exceeded on two consecutive days or whenever the PCB Action Level is exceeded. In such cases, immediately upon receipt of the data showing the exceedance, GE shall temporarily stop dust-generating or PCB-generating work (as applicable) in the vicinity of the location at which the exceedance was observed and shall notify EPA of this stop-work event. This stop-work requirement shall continue until potential additional operational and engineering controls, such as those listed in Section 4.3.4, have been discussed with EPA (or EPA's oversight representative) and implemented to prevent another exceedance of the applicable Action Level from occurring. In such cases, EPA approval of appropriate response actions shall be required before GE can restart operations in the subject area. If an immediate stoppage of work will result in a safety hazard, then GE shall take actions to discontinue work activities as soon as possible in a safe manner.
- 20. Section 4.3.4, 1st sentence: In the Revised Plan, the phrase "measures as appropriate" shall be deleted and revised to read "measures to address such exceedance."
- 21. Section 4.3.4: Where prior EPA approval of additional mitigation measures is not required, the Revised Plan shall state that GE will consult with EPA (if there is time to do so) prior to implementing additional response actions or additional mitigation measures. If time-critical actions are needed, GE will consult with EPA as soon practicable after implementing such actions.
- 22. Section 4.4, 1st paragraph: The Revised Plan shall include a statement indicating that, in some cases, work may be performed on weekends, subject to Condition #26.
- 23. Sections 4.4.1 and 4.6.1: The Revised Plan shall list the noise and light ordinances for the municipalities where active remediation will occur. Although compliance with municipal ordinances is not required for on-site actions, if the noise and light QOL standards defined in the Plan differ from the ordinances of any of such municipalities, GE shall provide a rationale for this difference.
- 24. Section 4.4.1, 1st paragraph: The Revised Plan shall define how residential and non-residential receptors will be determined based on a tangible metric that GE will propose. In addition, GE shall produce RU-specific maps that show the nearest residential and non-residential receptors

to the associated remediation areas and provide these maps in the respective Final Remedial Design/Remedial Action Work Plans for each RU.

- 25. Section 4.4.1, 1st paragraph: The Revised Plan shall state that when nighttime work occurs in an area with adjacent residential and non-residential receptors, the more stringent residential nighttime noise standard shall apply. Furthermore, GE shall revise the Plan to elaborate on whether any construction activities will be prohibited from occurring during nighttime work.
- 26. Section 4.4.1, 1st paragraph: The Revised Plan shall state that GE shall obtain EPA approval prior to working before 7:00 a.m. or after 9:00 p.m. or on weekends or state or federal holidays, except in the case of emergencies, in which case EPA shall be notified of such work as soon as practicable.
- 27. Section 4.4.1, 1st paragraph: Similar to the noise QOL standards chosen at the Hudson River Project, the Revised Plan shall add a residential daytime noise QOL Notification Level of a maximum hourly average of 75 dBA.¹ This level will establish the threshold at which GE shall evaluate whether mitigation is appropriate, while the daytime residential standard of 80 dBA will establish a noise QOL Action Level at which noise mitigation is required.
- 28. Section 4.4.1: The Revised Plan shall include a figure or table that compares predicted construction related noise levels to common sounds. For an example, see Figure 6-5 in EPA's Hudson River PCBs Superfund Site Quality of Life Performance Standards.¹
- 29. Section 4.4.2, 1st paragraph, 1st sentence: Delete "to the extent practicable."
- 30. Section 4.4.2: While EPA recognizes that details regarding the equipment to be used during the remediation will be determined during the design and contractor procurement phases, the Revised Plan shall discuss the potential use of electric-powered equipment to reduce noise pollution in residential areas. The use of such equipment could also result in fewer greenhouse gas emissions and potential odor complaints relative to the gas-powered equipment. GE shall discuss with electricity providers in the area connections that could be used throughout the cleanup remedy to promote the use of electric equipment.
- 31. Section 4.4.3, 2nd paragraph: The Revised Plan shall state that noise monitoring events, both initial and subsequent, should be continuous during hours of operation so that one-hour averages can be computed across the entire construction day as activities will likely vary. In addition, initial noise monitoring shall be conducted on a day that is representative of full-scale operations as opposed to the first day of any operations in a given area.

¹ EPA's Hudson River PCBs Superfund Site Quality of Life Performance Standards (<u>https://www.epa.gov/sites/default/files/2020-04/documents/final_quality_of_life.pdf</u>)

- 32. Section 4.4.4, 1st sentence: The first sentence shall be revised as follows: "In the event of an exceedance of the noise standards, GE will implement additional response actions or additional mitigation measures to address such exceedance."
- 33. Section 4.5: The Revised Plan shall propose a numeric odor QOL standard for hydrogen sulfide that is in accordance with applicable federal or state standards while noting that people can detect hydrogen sulfide at concentrations much lower than would result in health impacts. When monitoring for hydrogen sulfide is conducted in response to an odor complaint that is identified as potentially hydrogen sulfide, the standard shall be used to evaluate the results of the monitoring.
- 34. Section 4.6: Excessive instances of light could cause distractions to drivers and potentially impact traffic. The Revised Plan shall discuss routine control measures and best management practices that will be implemented to protect against potential light impacts on traffic safety.
- 35. Section 5.1, 3rd paragraph: In addition to marking restricted recreational areas with signage and/or fencing, GE shall design, in coordination with EPA, and install descriptive panels to be deployed at key recreational locations within the project area that describe the Rest of River remedial activities, where to find information (the project website), and how to receive relevant notifications. This kind of signage will be important to visitors to the area who may be unfamiliar with the Rest of River project, such as tourists or recreational users coming from outside the Berkshires area.
- 36. Section 5.2: Opportunities for potential post-remediation recreational enhancements between the confluence of the River and Woods Pond (that is, Reaches 5A, 5B, 5C, and 6) may only make sense if considered across those multiple reaches prior to the submittal of the Reach 5A Final RD/RA Work Plan (for example, bike paths, hiking trails, interconnections of existing recreational areas). The Revised Plan shall state that if the local municipalities formally propose to EPA or GE an enhancement that extends over multiple reaches, GE will consider such an enhancement.
- 37. Section 6.1: The Revised Plan shall include best management practices, where appropriate, to minimize or eliminate accidents (for example, information about the potential need for flaggers, etc., to the extent that such information is available).
- 38. Section 6.2: Section 4.3.1.3 of the Final Revised SOW states that GE will utilize "360-degree road imaging technology plus three-dimensional road surfacing imaging technology to document pre-existing condition of municipal roads to be used during remediation." However, it is not clear in the Plan if these methods to monitor roadway infrastructure will be utilized. The Revised Plan shall clarify how the technologies described in the Plan relate to the technologies specified in the Final Revised SOW or, if not related, how 360-degree road imaging and three-dimensional road surface imaging technologies will be utilized.

- 39. Section 6.2: The Revised Plan shall clarify that the documentation requirement in Section 6.2 applies to the transport of any materials, including clean backfill and other commercial vehicles above a proposed weight, not just the transport of contaminated material.
- 40. Section 6.2: The Revised Plan shall clarify that if vibration monitoring is required in connection with work on roads and associated infrastructure, it will be outlined in RU-specific submittals.
- 41. Sections 6.2.1, 6.2.2, and 6.2.3: The Revised Plan shall include a requirement for GE to discuss the road assessments with EPA and the affected local municipalities, regardless of whether or not GE believes there was any damage and/or if the damage was caused by GE.
- 42. Section 6.2.2: In the Revised Plan, GE shall add the following as the next to last sentence: "If the stress or damage that is attributed to the ROR Remedial Action is a safety hazard, GE will correct such stress or damage as soon as possible, after discussing such correction with the affected municipality."
- 43. Section 6.2.3: In the Revised Plan, GE shall revise the second paragraph as follows: "If any stress or damage is attributed to the ROR Remedial Action, GE will submit to EPA for review and approval a plan and schedule for maintenance and/or repair of such stress or damage. GE will discuss the appropriate steps for maintenance or repair with EPA and the affected local municipality." GE shall delete the third and last paragraph in this section.
- 44. Section 7.1.2: The Revised Plan shall elaborate on what kinds of data will be available on the project website to be developed by GE. At a minimum, GE's website shall include a summary of the quality-of-life monitoring data (including any exceedances of Notification and Action levels) within 72 hours following receipt of the data, schedules and location of upcoming activities, general anticipated hours of operation, relevant project data, project fact sheets, upcoming meetings, and a link to EPA's website.
- 45. Section 7.1.2: Once GE's project website is live, GE shall send out a localized mailer that notifies the respective town administrators of the municipalities along Reaches 5 through 8 and the residents in or adjacent to those reaches and along transport routes and provides a URL to the website. GE shall have the website live 30 days prior to the start of the UDF construction.
- 46. Section 7.1.6: The Plan describes how initial coordination with affected residents and landowners will be performed. However, it is likely that coordination with affected residents and landowners will be a continuous effort that will need to be undertaken throughout the remediation. The Revised Plan shall describe how GE plans to maintain open and transparent communications with affected residents and landowners throughout the duration of the remedy.
- 47. Section 7.1.6: EPA's approval of the Revised Plan shall not be deemed to obviate the need for GE to obtain access to private properties needed to conduct the work.

- 48. Section 7.2.2.3: The Revised Plan shall describe how GE will coordinate with the municipalities in the event that an emergency takes place during remediation activities.
- 49. The Revised Plan shall include a requirement to submit an updated Plan or an addendum to the Plan for EPA review and approval when the RU-specific RD/RA Work Plans indicate the need for revised quality-of-life activities that are not already described in the RU-specific work plans.

EPA reserves all of its rights under the Consent Decree and GE's Revised Final Permit (December 2020), including but not limited to, the right to perform and/or require additional sampling or response actions. If there is any conflict between the Performance Standards as stated in the submittal and the Performance Standards as stated in the Consent Decree or the Revised Final Permit, the Consent Decree and/or the Revised Final Permit shall control.

Please do not hesitate to contact me at (617) 918-1049 or at <u>CarliDorsey.Alexander@epa.gov</u> should you have any questions on this letter.

Sincerely, ALEXANDER CARLI-DORSEY Alexander Carli-Dorsey Project Manager

Attachment: EPA Fact Sheet, Rest of River Cleanup and the Upland Disposal Facility Will Not Pose a Health Threat from Airborne PCBs

cc: (via electronic mail only)

Andrew Silfer, GE Matthew Calacone, GE Andrew Thomas, GE James Bieke, Counsel for GE Dean Tagliaferro, EPA Anni Loughlin, EPA Josh Fontaine, EPA Christopher Smith, EPA Rich Fisher, EPA John Kilborn, EPA Christopher Ferry, ASRC Thomas Czelusniak, HDR Inc. Scott Campbell, Taconic Ridge Environmental Izabela Zapisek, Taconic Ridge Environmental Cathrine Skiba, Massachusetts DEP Ben Guidi, Massachusetts DEP Michael Gorski, Massachusetts DEP Jeff Mickelson, Massachusetts DEP Michelle Craddock, Massachusetts DEP, Lead Administrative Trustee Mark Tisa, Massachusetts DFG Eve Schluter, Massachusetts DFG Andrew Madden, Massachusetts DFW Betsy Harper, Massachusetts Attorney General's Office Traci lott, Connecticut DEEP Susan Peterson, Connecticut DEEP Carol Papp, Connecticut DEEP Graham Stevens, Connecticut DEEP Lori DiBella, Connecticut Attorney General's Office Molly Sperduto, U.S. Fish and Wildlife, Trustee Mark Barash, U.S. Department of Interior Katherine Zarada, NOAA Mayor Peter Marchetti, City of Pittsfield Jim McGrath, City of Pittsfield Andy Cambi, Pittsfield Health Director Michael Coakley, Pittsfield Economic Development Authority Nate Joyner, City of Pittsfield, Community Development & Housing Program Melissa Provencher, Berkshire Regional Planning Commission Smitty Pignatelli, Town Manager, Lenox Christopher Brittain, Town Administrator, Lee Mark Pruhenski, Town Manager, Great Barrington Michael Canales, Town Administrator, Stockbridge Rhonda LaBombard, Town Administrator, Sheffield Jim Wilusz, Health Agent for Tri Town Health Department Bettina Washington, THPO, Wampanoag Tribe of Gay head (Aguinnah) Mark Andrews, TCRM Wampanoag Tribe of Gay head (Aquinnah) Bonnie Hartley, SMC Chuck Kilson, STN Chairman Russell, SIT Jeffery Bendremer, THPO, Stockbridge-Munsee Community Brona Simon, Massachusetts Historical Commission Edward Bell, Massachusetts Historical Commission Repository, David M. Hunt Library in Falls Village, CT

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GE-Pittsfield/Housatonic Rest of River Cleanup

Rest of River Cleanup and the Upland Disposal Facility Will Not Pose a Health Threat from Airborne PCBs

SUMMARY

EPA's peer-reviewed human health risk assessment conducted from 2003 to 2005, which included PCB air sampling south of New Lenox Road and off October Mountain Road, concluded that there is no current human health threat from airborne PCBs from the Housatonic River. See Section 5 of EPA's 2005 Human Health Risk Assessment for details. Furthermore, air sampling for PCBs conducted over 20 years by both EPA and GE during past cleanups at the Site demonstrates that the Rest of River cleanup can be safely implemented.



SAMPLING FOR AIRBORNE PCBs

PCBs can become airborne through volatilization (vapor phase) and attached to dust (particulate phase). The sampling methods used by both EPA and GE are 24-hour samples that collect both phases. After collection, the samples are sent to a laboratory for PCB analysis. The results are then presented as the amount (mass) of PCBs contained in a cubic meter of air, typically expressed as micrograms of PCBs per cubic meter (μ g/m³).

For each construction area, before beginning work, GE must perform baseline ambient air sampling for PCBs, and then two back-to-back 24-hour monitoring events at the beginning of the work. If the initial sampling shows that PCB levels are acceptable, GE must then perform one 24-hour PCB sampling event per week for the duration of construction in each construction area. In addition, two back-to-back 24-hour monitoring events will be repeated when a new type of remediation activity occurs in an area. For the Upland Disposal Facility (UDF), GE must also perform baseline ambient air PCB sampling and sampling during construction, placement of material, and post-capping. EPA will periodically collect air samples at the same location of one of GE's monitors as a quality assurance check.

Concentrations of PCBs in air are highest at active work areas and decrease significantly with distance from these areas. That is why sampling is done at or near active work locations to ensure protection of public health in the nearby area, including excavation areas and the UDF. If data shows concentrations are protective at these locations, there is no reason to believe that concentrations would be higher farther away. Additionally, EPA will require all trucks and rail cars used for the transport of contaminated material during the cleanup be secured to inhibit dust from being released during transport. Therefore, there is no need to sample along transportation routes or other locations.

PCB AIR NOTIFICATION AND ACTION LEVELS DURING CLEANUP

To ensure the safety of the surrounding community and workers during cleanup and construction, EPA will set protective Notification and Action Levels for PCB air monitoring at the Rest of River cleanup:

- The Notification Level will be 0.050 μ g/m³.
- The Action Level will be 0.100 μ g/m³.



continued >

SEMS Doc ID 678381

The purpose of these levels is twofold:

- To monitor the concentration of PCBs in air to ensure the cleanup is being conducted safely for the public, nearby residents, and workers.
- To monitor active construction, placement of material, and post-capping monitoring of the Upland Disposal Facility (UDF).

If a PCB Notification Level is exceeded, GE must notify EPA as soon as practicable, but no later than 24 hours after receipt of the data. GE also must post a summary of the data or note the exceedance on a web page that GE will establish, within 72 hours after receipt of the data. GE is also required to implement additional response actions in consultation with EPA to prevent exceedances of the Action Level.

If a PCB Action Level is exceeded, GE must notify EPA as soon as practicable, but no later than 24 hours after receipt of the data. GE also must post a summary of the data or note the exceedance on a web page that GE will establish, within 72 hours after receipt of the data. Also, GE must stop work temporarily in the area of the exceedance; discuss with EPA appropriate immediate or short-term response actions; conduct additional air sampling, if warranted, to confirm the exceedance; evaluate the cause of the exceedance; and propose to EPA appropriate engineering controls or other corrective actions. EPA approval of appropriate response actions will be required before GE can restart work in the subject area.

In addition to PCB monitoring, GE is required to conduct monitoring for dust (also known as particulates). GE will conduct particulate monitoring daily during dry excavation for a minimum of 10 hours when construction is ongoing and throughout the duration of construction activities using real-time airborne particulate monitors. The monitors will be equipped with alarms that will indicate whether concentrations exceed a Notification or Action Level for dust.

PREVENTION OF AIRBORNE PCBs DURING CLEANUP & CONSTRUCTION

During the cleanup, GE will be required to implement control measures and best management practices to control dust and PCB air emissions. These measures include dust suppression (such as applying a water spray to unpaved haul roads and material staging piles), using covers on trucks and rail cars, proper decontamination of work equipment and vehicles, and preventing tracking of soils onto haul roads.

In the event of an exceedance of an air quality Notification or Action Level at active work areas additional response actions, mitigation measures, and/or engineering and operational controls will be evaluated and implemented, such as:

- Modifying dust-producing operations;
- Use or increasing use of dust suppression measures, such as application of water spray to unpaved haul roads and material staging piles;
- Reducing the speed of material-handling equipment;
- Prioritizing management of and reducing staging time for sediments and soils containing high PCB concentrations;
- Using a spray-on cover, biodegradable vapor-suppressive foam, or other temporary cover on exposed soil/sediment or over material stockpiles; and/or
- Erecting wind screens around material handling operations.



Example of secured truck used at the Raymark Superfund Site in Stratford, Connecticut

CLOSER LOOK

Past PCB Air Monitoring Results are Below Protective Levels:

Past air monitoring data collected during Site cleanups by both EPA and GE for over 20 years show that almost all cleanup monitoring results are much lower than the airborne PCB Notification and Action Levels. Moreover, the concentrations of PCBs in soil and sediment at these past cleanups were, in most cases, much greater (orders of magnitude) than those that will be encountered in the Rest of River. When there were isolated exceedances of the Notification or Action Levels at active work areas, GE implemented engineering controls such as limiting the duration an excavation area remained open, covering an active excavation area nightly, expediting the removal of temporary stockpiles, and increasing wetting of the exposed soils.

This Site-specific air monitoring data demonstrates that the upcoming remediation, transportation, placement, and operation of the UDF can be done safely.

Specific examples of this past data are as follows:

Air Monitoring Example One: In the four years of excavation that EPA conducted in the 1½-Mile Reach of the River in Pittsfield, there were no exceedances of the health-based PCB Action Level and only one exceedance of the PCB Notification Level. A large percentage of samples did not even detect PCBs. See graph below. The 1½-Mile Reach had sediment PCB concentrations similar to or higher than those that currently exist in the Rest of River. For more details, see EPA's 2020 Response to Comments, page 33.



Note to Figure: The maximum concentration of PCBs detected in air during the $1\frac{1}{2}$ -Mile Removal action was observed on June 10, 2004, with a concentration of 0.07857 µg/m³. This air sample was a duplicate sample, with the parent sample having a concentration of 0.04297 µg/m³. Duplicate samples are collected for quality assurance purposes and the concentrations are compared to a parent sample. The duplicate sample was identified as an anomaly based on very low air volume collected in the sample resulting in a potential high bias in the data's analytical result. Both the parent and duplicate samples were below the Action Level of 0.1 µg/m³.

Approximately 71% of all air samples collected were below the laboratory's detection limits, meaning the concentrations were so low that the laboratory instruments were unable to quantify the concentration of PCBs in the collected air samples, and a large percentage of all detected results were well below the Notification and Action Levels. Note the data is plotted by station location and not chronologically.

Air Monitoring Example Two: EPA has conducted outdoor PCB air sampling at Allendale School in Pittsfield. Since the sampling began in December 2005, the maximum PCB concentration detected was 0.0059 μ g/m³ in 2006, which was during placement of contaminated material into the nearby Building 71 landfill. Since 2007, after the capping of the Building 71 landfill, the maximum (0.0021 μ g/m³) and average (0.0005 μ g/m³) PCB air detections were well below the Notification/Action Levels for Allendale School. A large percentage of samples did not even detect PCBs. For more details, see EPA's 2020 Response to Comments document, page 16. The figure below graphically demonstrates the data.



Note to Figure: Approximately 140 air samples have been collected through 2023. Over 50% of the results were below the laboratory detection limits. All other samples were below the Notification/Action Level of 0.050 µg/m³. The Allendale-1 Co-located sample is a duplicate location of the parent Allendale-1 sample.

Air Monitoring Example Three: Placement of PCB-contaminated material in GE's landfills in Pittsfield did not exceed either the Action Level or the Notification Level for PCBs in air for the On-Plant Consolidation Area (OPCA) air sampling. Further, the PCB levels of the material placed in those landfills were much higher than the material that will be placed in the UDF in the Town of Lee. For more details, see EPA's 2020 Response to Comments document (pages 15 and 16) and EPA's March 17, 2023, letter to the Town of Lee Board of Health (page 4). The figure below graphically demonstrates the data.



Summary: The past Site-specific PCB air monitoring data demonstrate that past concentrations of PCBs in air sampling during cleanups are lower than the protective air levels, even when monitoring cleanups of materials with much higher concentrations of PCBs than those that will be encountered in the Rest of River.

HOW EPA'S NOTIFICATION/ACTION LEVELS PROTECT HUMAN HEALTH

Based upon the scientific evidence and data, airborne PCBs pose a risk only if people are exposed to high levels of PCBs for a long period of time.

Nationally, for carcinogens, EPA estimates cancer risk in terms of the probability of a chemical causing cancer. For example, based upon scientific studies, EPA estimates that exposure to a particular carcinogenic chemical at a certain amount may result in a 1 in 1,000,000 increased risk of developing cancer assuming an estimated lifetime of exposure. EPA's acceptable risk range for carcinogens is an excess risk of cancer of 1 in 1,000,000 to 1 in 10,000 assuming a lifetime of exposure.

The Rest of River air Notification Level of $0.050 \ \mu\text{g/m}^3$ and the Action Level of $0.100 \ \mu\text{g/m}^3$ correspond to an excess lifetime cancer risk in the middle of EPA's acceptable cancer risk range. This means that exposure to these Notification and Action Levels over many years would lead to a 1 in 100,000 increased risk of cancer above a person's baseline risk.

These health-based Notification and Action Levels are set based on the conservative assumption that exposure occurs over an extended period of time (many years) every day. A one-time exceedance of the Action Level would not result in increased cancer risks.

The Notification and Action Levels for PCBs in air fall well within the EPA's and Massachusetts Department of Environmental Protection's protective range for cancer for waste cleanups.

THE REST OF RIVER AIR LEVELS COMPARED TO AIR LEVELS AT OTHER SITES

For EPA's New Bedford Harbor Site, EPA set a protective health-based "trigger" level at 0.110 μ g/m³. This level is protective for cancer and non-cancer risks for a child and an adult. See Section 2 and Appendix A of the New Bedford Harbor Draft Final Ambient Air Monitoring Plan for Remediation Activities, February 2020. EPA also approved the 0.110 μ g/m³ level for the Hudson River PCBs Superfund Site as a Quality-of-Life Performance Standard in residential areas.

The Housatonic Rest of River Action/Notification Levels are more protective than these cancer and non-cancer levels. This is a very conservative assumption for this Site. For there to be a health concern, the PCB air concentrations would have to average greater than the Notification Level/Action Level for an extended period of time every day. A one-time exceedance would not result in increased risks.

ADDITIONAL INFORMATION:

EPA web page, Superfund Risk Assessment https://www.epa.gov/risk/superfund-risk-assessment

EPA Region I, 2005, Rest of River, Human Health Risk Assessment, Section 5 <u>https://semspub.epa.gov/src/document/01/219190</u>

EPA Region I, 2020 Response to Comments https://semspub.epa.gov/src/document/01/650441

EPA Region I, March 17, 2023 Letter to the Lee Board of Health https://semspub.epa.gov/src/document/01/673138

EPA Region I, November 2021 Graphical Representation of Polychlorinated Biphenyl (PCB) Air Sampling Data at Allendale School Playground and General Electric On-Plant Consolidation Areas (OPCAs) <u>https://semspub.epa.gov/src/document/01/661268</u>

EPA Region I/Jacobs, New Bedford Harbor Draft Final Ambient Air Monitoring Plan for Remediation Activities, April 2018 https://semspub.epa.gov/src/document/01/100013055.pdf