



Global Operations, Environment, Health & Safety

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Via Electronic Mail

December 23, 2022

Mr. Richard Fisher
Office of Site Remediation and Restoration
U.S. Environmental Protection Agency, Region I
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Boston, MA 02109-3912

**Re: GE-Pittsfield/Housatonic River Site
East Street Area 2-North (GECD140)
Buildings 12 and 14 Complexes Demolition, Disposition, and Restoration Work Plan**

Dear Mr. Fisher:

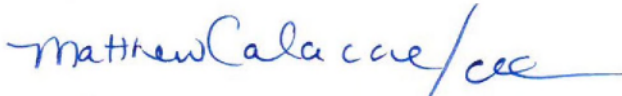
On January 31, 2020, the General Electric Company (GE) sent a letter to EPA documenting an agreement between GE and EPA, in accordance with the Consent Decree (CD) for the GE-Pittsfield/Housatonic River Site and associated *Statement of Work for Removal Actions Outside the River* (SOW), regarding the consolidation of certain building demolition debris generated within the GE Facility in the foundations of Buildings 12, 12X, and 12Y at that facility. That letter noted that, in the future, GE may demolish Buildings 12, 12X, 12Y, 14, 14A, 14D, 14E, 14H, and any extensions and consolidate the resulting building demolition material in the foundations of Buildings 12, 12X, and 12Y (the Building 12 Complex), subject to the exclusions, restrictions, and requirements specified in the SOW. It stated further that, prior to conducting such activities, GE would submit a work plan to EPA describing the demolition and material disposition procedures.

GE anticipates initiating demolition of the Buildings 12 and 14 Complexes in 2023. Accordingly, GE is submitting a *Buildings 12 and 14 Complexes Demolition, Disposition, and Restoration Work Plan*, which describes the planned demolition activities, the associated building material characterization, the placement of demolition debris in the Building 12 Complex foundations, and the proposed final site restoration activities. In accordance with the agreement described in GE's January 31, 2020 letter and the SOW, the portions of this plan describing the building demolition and associated support activities are being submitted to EPA solely for informational purposes and for any input or comments that EPA may have, and the portions identifying the procedures for the placement of building demolition debris in the Building 12 Complex foundations, as well as restoration of that complex and post-consolidation activities, are being submitted to EPA for review and approval.

As GE and EPA have agreed, since the East Street Area 2-North Removal Action has been completed, the consolidation of the building demolition materials in the foundations of the Building 12 Complex will be conducted as a Supplemental Removal Action for East Street Area 2-North, which will be limited only to that activity and will not reopen any of the other aspects or requirements of the completed East Street Area 2-North Removal Action.

Please let me know if you have any questions about this Work Plan.

Very truly yours,



Matthew Calacone
Senior Project Manager – Environmental Remediation

Enclosure

Cc: (via electronic mail)

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Buildings 12 and 14 Complexes Demolition, Disposition, and Restoration Work Plan

Pittsfield, Massachusetts

December 23, 2022

Buildings 12 and 14 Complexes Demolition, Disposition, and Restoration Work Plan

Pittsfield, Massachusetts

December 23, 2022

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1 Introduction and Objectives

On October 27, 2000, the United States District Court for the District of Massachusetts entered a Consent Decree (CD) executed in 1999 by the General Electric Company (GE), the United States, the Commonwealth of Massachusetts, the State of Connecticut, the City of Pittsfield, and the Pittsfield Economic Development Authority (PEDA) for the GE-Pittsfield/Housatonic River Site, which includes the former GE Facility in Pittsfield, Massachusetts (GE Facility; see **Figure 1**). The CD and an accompanying Statement of Work for Removal Actions Outside the River (SOW) (Appendix E to the CD) established Performance Standards and other requirements for several Removal Actions to be conducted by GE to address polychlorinated biphenyls (PCBs) and other hazardous constituents present in environmental media at the Site subject to the CD.

The demolition of buildings located within the GE Facility (or on other GE-owned property within the CD Site) does not constitute a response action under the CD and the SOW. Therefore, such demolition activities do not require approval from the U.S. Environmental Protection Agency (EPA). However, the CD and SOW do contain provisions allowing the disposition of certain building demolition debris at On-Plant Consolidation Areas and/or within the subgrade foundations (i.e., basements, vaults, and tunnels) of certain buildings located within the GE Facility – namely, Buildings 2, 3C, 12, 12X, 12Y, and 31. Such consolidation and the subsequent surface restoration activities over the consolidation areas are subject to review and approval by EPA. Since execution of the CD, GE has demolished multiple buildings with on- and off-site disposition of the demolition debris.

On January 31, 2020, GE sent a letter to EPA documenting an agreement between GE and EPA, in accordance with the provisions of the CD and SOW, regarding the consolidation of certain building demolition debris generated within the GE Facility in the foundations (vaults and tunnels) of Buildings 12, 12X, and 12Y (Consolidation Agreement). The Consolidation Agreement states that, consistent with the CD and SOW, GE will use the foundations of Buildings 12, 12X, and 12Y (located with the East Street Area 2-North Removal Action Area) for the disposition of building demolition debris generated from the demolition of Buildings 12, 12X, 12Y, 14, 14A, 14D, 14E, 14H, and any extensions, subject to the restrictions and requirements of Section 2.1.5 of the SOW. It also reaffirms that the consolidation of building demolition debris within these building foundations is subject to regulation under the CD and SOW and thus requires EPA review and approval.

The Consolidation Agreement provides further that, prior to consolidating this demolition debris, GE will prepare and submit to EPA a work plan describing the procedures for demolition of the buildings, exclusion of the types of material prohibited from placement in the building foundations, and disposition of the non-excluded material in the foundations of Buildings 12, 12X, and 12Y. It notes that the portions of that plan describing the building demolition activities will be submitted to EPA solely for informational purposes and for any input or comments that EPA may have, and that the portions identifying the procedures for the placement of building demolition debris in the building foundations will be subject to EPA's review and approval. The Consolidation Agreement also provides that, since the Removal Action required by the CD for East Street Area 2-North has been completed, the consolidation of building demolition debris in the foundations of Buildings 12, 12X, and 12Y will be conducted as a Supplemental Removal Action for East Street Area 2-North under the CD, which will be limited to that activity (i.e., on-site consolidation) only and will not reopen any of the other aspects or requirements of the completed East Street Area 2-North Removal Action.

This *Buildings 12 and 14 Complexes Demolition, Disposition, and Restoration Work Plan* (Work Plan) describes the activities GE will perform related to the demolition of Buildings 12, 12X, 12Y, 14, 14A, 14D, 14E, 14H (the Buildings 12 and 14 Complexes) and associated structures within the GE Facility. It also provides details regarding the disposition of the demolition debris, including the off-site disposal of materials prohibited from on-site consolidation (including asbestos-containing materials, free liquids, free product, intact drums and capacitors, other equipment

that contains PCBs within its internal components), and the consolidation of remaining materials from those buildings into the below-ground foundations of the Building 12 Complex. Finally, this Work Plan describes the post-demolition final surface restoration details for the Buildings 12 and 14 Complexes and the future maintenance and monitoring activities for the surface restorations associated with this project.

GE anticipates initiating demolition-related activities for the Buildings 12 and 14 Complexes in 2023 following EPA approval of the applicable portions of this Work Plan (as further described below), procurement of a demolition contractor, and the making or receipt of any additional required notifications and approvals (e.g., state asbestos notification, city demolition permit). GE will notify EPA prior to the start of work and provide updates regarding the project and schedule through periodic communications. Concurrently with preparation of this Work Plan, GE is developing a Request for Proposal (RFP) to identify qualified and experienced demolition contractors and to solicit cost proposals for the demolition and related activities described in this Work Plan.

The remainder of this Work Plan is presented in several sections as follows:

- **Section 2 - Buildings 12 and 14 Complexes** – Provides pertinent information for the Buildings 12 and 14 Complexes.
- **Section 3 - Project Overview** – Presents an overview of demolition and consolidation activities.
- **Section 4 - Building Demolition and Project Implementation** – Provides a summary of the demolition activities and ancillary support activities.
- **Section 5 - Disposition of Demolition Debris Materials** – Provides a summary of the on-site consolidation and off-site material disposition activities.
- **Section 6 - Surface Restoration** – Presents an overview of the surface restoration activities following demolition.
- **Section 7 - Decontamination** – Summarizes decontamination procedures for various equipment to be used during the demolition and consolidation activities.
- **Section 8 - Post-Demolition/Consolidation Activities** – Summarizes the proposed inspection and monitoring activities to be performed following project completion and the preparation of a project completion report.

Consistent with the SOW and the Consolidation Agreement, the portions of this Work Plan related to the building demolition and ancillary support activities are provided for informational purposes and any comments or input that EPA may have; and the portions of this Work Plan relating to on-site consolidation of the demolition debris, as well as the on-site surface restoration and post-consolidation activities, constitute the portions representing the Supplemental Removal Action for East Street Area 2-North under the CD and are therefore subject to EPA review and approval.

2 Buildings 12 and 14 Complexes

The Buildings 12 and 14 Complexes are located within the East Street Area 2-North Removal Action Area (RAA) at the GE Facility in Pittsfield, Massachusetts (**Figure 2**). The portions of these buildings to be demolished are shown on **Figure 2**. Additional details regarding the Buildings 12 and 14 Complexes are presented in the following sections.

2.1 Building 12 Complex

The Building 12 Complex includes Buildings 12 (the western portion of which is referred to as the Lean-To), 12X (Extension), 12Y, 12 Substation, and associated structures, all of which are located between the CSX Rail tracks/Merrill Road and Building 100. The buildings, which are mainly constructed of brick, concrete, masonry block, and steel, occupy a total area of approximately 177,000 square feet. The southern, eastern, and nearly all the northern building façades, including the windows, have been covered with either galvanized metal and/or galbestos siding. Galvanized metal panels were installed to cover the windows in the western façade, while the brick walls were not covered and remain exposed. The Building 12 roof (which is half flat and half pitched) was constructed of grouted concrete blocks and meshed reinforced concrete decking supported by steel framing and overlain with rigid insulation and gravel. The Building 12X roof is pitched and was constructed of a combination of gypsum slabs and metal overlain with gravel. The Building 12Y roof is flat and was constructed of metal decking. The Building 12 Substation roof consists of membrane roofing. Several vaults and tunnels are present within the buildings, as illustrated on **Figure 3**.

2.2 Building 14 Complex

The Building 14 Complex includes Buildings 14, 14A, 14D, 14E, 14H, and associated structures, which are located between Building 100 and Tyler Street. Lower stub walls around the building perimeters were constructed of concrete. Upper wall construction consists mainly of a steel framework with galbestos siding and interior transite walls. The total building area occupies approximately 271,000 square feet. Since the original construction was completed, galvanized metal panels were installed over upper portions of the northern, western, and eastern building exterior walls and windows. All building roofs are generally flat with smaller areas that are slightly pitched. Roofs were generally constructed of metal decking supported by steel framing overlain with rigid insulation and either tongue and groove four-ply roofing or gravel over the main roof with gypsum infill along the perimeter.

3 Project Overview

GE has performed numerous building demolition activities at the GE Facility, and the experience gained from those specific activities (as well as from the overall Removal Actions under the CD and SOW) serves as the design basis for the demolition, consolidation, and site restoration activities described in this Work Plan. An overview of the demolition and on-site consolidation anticipated activities associated with the Buildings 12 and 14 Complexes is provided in this section.

Prior to the initiation of building demolition activities, several activities will be performed. These activities will include locating, disconnecting, sealing, and/or re-routing affected utilities (water and electric), removal of asbestos-containing material (ACM); removal of free liquids from within equipment (if encountered), and removal of certain equipment and regulated Universal Wastes (i.e., mercury-containing lamps, mercury-containing thermostats, and batteries) located within the various buildings.

Following these activities, the foundation areas of Buildings 12, 12X, and 12Y will be prepared for placement of demolition debris. These preparations will include sealing of subgrade conduit and piping penetrations and closure of interior and exterior subsurface utility structures. Utility structures include, but are not limited to, stormwater and sanitary piping and manholes, electrical vaults, slab penetrations from a former fire suppression system, and floor drain piping. Additional details regarding the decommissioning of utilities are provided in Section 4. These activities will require removal of accumulated water from certain foundations. GE will transport any water evacuated from the foundations to the Building 64G Groundwater Treatment Facility (64G GWTF) for treatment and discharge.

Upon completion of the pre-demolition activities, the above-grade portions of the Buildings 12 and 14 Complexes will be demolished, with most of the demolition debris expected to be placed within the Building 12 Complex foundations (subject to the restrictions described in the SOW). In accordance with the SOW, several materials are specifically excluded from on-site consolidation within the Building 12 Complex foundations – namely, free liquids, free product, intact drums and capacitors, other equipment that contains PCBs within its internal components, and asbestos-containing materials. Additional details regarding the disposition of building demolition debris are provided in Section 5. The intent of the consolidation activities is to place all demolition materials within the available foundations. However, should there be insufficient capacity to place all the demolition debris within the Building 12 Complex foundations, the remaining debris will be characterized for disposal in accordance with applicable environmental regulations at an appropriate GE-approved off-site disposal facility.

Following material consolidation within the Building 12 Complex foundations, site restoration activities will commence. These activities will include the placement of additional, “clean” fill materials (as needed) to achieve the necessary surface elevations and to support the installation of a cover system over the consolidated materials and the restoration of paved and unpaved areas. As further described in Section 5, the cover systems over the consolidation areas will be similar to an engineered barrier as described in the SOW.

4 Building Demolition and Project Implementation

As previously noted, demolition of the Buildings 12 and 14 Complexes is not considered part of the response actions under the CD and does not require EPA approval. However, all work performed to complete the demolition of these buildings will comply with applicable federal, state, and local laws and regulations. A summary of the anticipated demolition activities is provided in this section for informational and contextual purposes only.

4.1 Pre-Demolition Activities

GE will perform several pre-demolition activities to prepare the Buildings 12 and 14 Complexes for demolition. These pre-demolition activities will include:

- Preparing technical submittals and local permit applications and notifications (namely, an application for a City of Pittsfield Demolition Permit and a Massachusetts Department of Environmental Protection [MassDEP] Asbestos Notification Form) necessary to implement the project;
- Mobilization of the demolition contractor and subcontractor personnel, equipment, materials, etc. to the project site, and performing initial set-up activities and personnel safety training;
- Preparing the project site by installing and/or implementing security measures; implementing measures for traffic control (including coordination with Sabic Innovative Plastics for access to Building 100), dust control, and erosion and sediment control; and establishing temporary project support facilities, equipment/materials staging areas, equipment decontamination areas, and air monitoring stations;
- Identifying, protecting, or properly disconnecting (as necessary) utilities at the project site (including electric, water, gas, and telecommunication lines) in conformance with the requirements of the entities that own/control the affected utilities/services;
- If necessary, installation and implementation of engineering controls to ensure the protection of adjacent infrastructure and properties;
- Demarcation of areas within the project site where special demolition, and/or material handling activities are required (e.g., areas subject to on-site consolidation of demolition debris within building foundations in the Building 12 Complex), as well as areas that potentially represent a workplace safety hazard (e.g., vaults, sumps, and tunnels);
- Removal of any hazardous materials (e.g., paints, solvents, chemicals) and Universal Waste (mercury-containing lamps, thermostats, batteries);
- Draining and testing of oil-containing equipment, if any, for the presence of PCBs as described in the EPA Consent Agreement Order TSCA 01-2002-0049;
- Dewatering of foundations, as necessary;
- Following submission of ACM-related notifications to state agencies, abatement of accessible interior and exterior ACM, with the proviso that abatement of ACM roofing and some siding that cannot be safely removed will be performed in place as part of subsequent demolition activities, further described below; and
- Sealing of numerous small-scale vaults in Building 14 prior to abandoning them in place.

4.1.1 Water Utility Protection

City potable water and fire protection water systems infrastructure will be protected from damage during demolition activities and consolidation of debris, including heavy equipment/vehicle traffic. As illustrated on **Figure 4**, there are several above-grade fire protection system components around the building complexes and attached to existing building foundation walls (in Building 14A). Subsurface water piping extends from Tyler Street, under Building 14A, and into a utility tunnel extending from Building 14A, under the north access road, and under Building 100 to Building 12X. Within the southeast portion of Building 14A, the fire protection control valves and piping are protected within a concrete modular unit (CMU) wall. These fire protection devices, as well as the CMU enclosure, will be protected and remain active throughout the demolition activities.

4.1.2 Sanitary and Stormwater Utility Terminations

Sanitary and stormwater system piping is present in both building complexes. The general layout of the sanitary and storm sewer systems and anticipated decommissioning activities associated with the Buildings 12 and 14 Complexes are illustrated on **Figures 5 and 6**, respectively.

The stormwater piping in the Buildings 12 and 14 Complexes consists primarily of roof drains that extend to and under the existing floor slabs and are connected to a network of interior piping and manholes, conveying the stormwater to exterior manholes and catch basins. Roof drains will be cut flush with the existing slab, followed by sealing each pipe opening at the slab level with a mechanical plug and covering it with grout.

Much of the sanitary system in the Buildings 12 and 14 Complexes was previously sealed; however, any remaining sanitary piping will be cut flush with the existing slab, followed by sealing each pipe opening at the slab level with a mechanical plug and covering it with grout. All sanitary and stormwater discharge piping within manholes immediately exterior to the building footprints will also be sealed, as appropriate, and the manhole filled with gravel. All utility decommissioning will be performed in accordance with details provided on **Figure 7**.

4.1.3 Environmental Removal Activities

Hazardous materials assessments and ACM surveys have been performed for each of the buildings within the Buildings 12 and 14 Complexes. The hazardous materials assessments have identified several materials for removal and off-site disposal prior to initiating demolition activities. These include, but are not limited to, Universal Wastes (batteries, mercury-containing equipment and lights, fluorescent bulbs, aerosol containers), oils and lubricants, degreasers, chlorofluorocarbons, light fixtures with PCB-containing ballasts, and door closers (with oil reservoirs). In addition, various pieces of equipment, such as vehicles, forklifts, and machining tools, will be drained prior to disposal. All liquids encountered within piping or equipment will be drained and tested for the presence of PCBs as described in the EPA Consent Agreement Order TSCA 01-2002-0049.

In addition, the ACM surveys have identified several ACMs to be abated prior to demolition. ACMs identified include, but are not limited to, electrical pipe wrapping, built-up asphaltic roofing, floor tile and mastic, drywall joint compound, transite panels, and galbestos siding. All accessible ACM will be abated and containerized in accordance with Massachusetts regulations in preparation for off-site disposal. Inaccessible ACM (due to safe access concerns) – namely, roofing materials, galbestos, or transite – will be abated in place as part of demolition activities under a Non-Traditional Work Plan (NTWP) submitted to MassDEP by GE. The NTWP will provide details regarding the removal, handling, bulk loading, and off-site disposal of ACM that cannot safely be removed by traditional methods.

Finally, all loose and flaking paint will be removed and containerized in preparation for off-site disposal at a GE-approved disposal facility in accordance with applicable regulations prior to any demolition activities.

4.2 Demolition Activities

Following the completion of the environmental removals described in Section 4.1.3, the demolition activities will include the demolition of the above-grade portions of the buildings, including the building infrastructure (interior and exterior walls, roof systems, structural supports, remaining windows, doors, utilities, lighting, HVAC components, etc.). These activities will also include removal of all equipment, materials, and other ancillary items (stairways, handrails, bollards, fencing, etc.) that are attached to or present within the buildings.

Upon completion of demolition activities, debris will be appropriately processed/sized for off-site disposal or on-site consolidation within the foundations of the Building 12 Complex. Access to the consolidation areas will be provided by partially removing the overlying floor slabs. Partial slab removals will allow for demolition debris to be placed within the consolidation areas and compacted while at the same time supporting the walls of the vault or tunnel structure. As debris is placed and compacted, the supporting slab portions can be removed allowing remaining areas to be effectively backfilled and compacted.

Demolition debris from the Building 14 Complex that meets the criteria of the Consolidation Agreement will be transported to the Building 12 Complex. The primary proposed on-site trucking route between the Complexes is illustrated on **Figure 8**, situated mostly within the GE Facility property. However, the alignment, width, and structural condition of the current concrete access ramp near Building 12 are not suitable for transporting consolidation debris to the Building 12 Complex. Thus, use of this route would require installation of a temporary reinforced soil ramp adjacent to the current concrete access ramp but traveling along the eastern fence line through PEDAs property. We have also identified an alternative route that would not require a temporary ramp. That route extends through PEDAs property paralleling Tyler Street and Woodlawn Avenue before crossing back towards the Building 12 Complex, as also shown on **Figure 8**. Either of these alternatives will require PEDAs agreement. **Figure 9** presents the transport route for off-site disposal.

Certain above-grade infrastructure within the Buildings 12 and 14 Complexes will not be demolished and will remain in place and maintained. Within the Building 12 Complex, the north foundation wall of the complex will remain in place to support the adjacent access road along the south side of Building 100. The floor slabs over the foundations where consolidation of the building demolition material will occur will be removed to allow access to those areas, except that some such slabs will be left in place to provide structural stability. Notably, the floor slabs covering the foundations at the north end of Buildings 12 and 12Y immediately adjacent to the north foundation wall, will remain in place to provide structural stability for that wall. In addition, portions of the floor slabs within Building 12 will be only partially removed so to support the perimeter and interior building foundation walls during debris placement. Also, the entrance to the tunnel in the northeast corner of Building 12X and the tunnel connecting to Buildings 14 and 100 will be protected to allow for continued access. Refer to illustrations on **Figure 3** for details.

Within the Building 14 Complex, all at-grade floor slabs and a portion of the north exterior above-grade foundation wall will remain in place to support the adjacent roadway embankment for Tyler Street. As noted in Section 4.1.1, the fire protection control valving and piping located at the southeast portion of Building 14A (including the adjacent interior CMU wall enclosure) will remain in place and protected throughout the demolition activities.

Several ancillary activities will be performed in conjunction with building demolition activities, including the handling and disposal of project-related materials, the management of post-demolition building materials (including on-site consolidation and off-site disposal), the implementation of several site controls within the project site during the work, and performance of certain restoration activities. These items are discussed in more detail in Sections 5 and 6.

5 Disposition of Demolition Debris Materials

This section provides details regarding the disposition of the demolition debris from the Buildings 12 and 14 Complexes. As previously indicated, it is anticipated that the majority of the building demolition materials will be consolidated on-site within the foundations of Buildings 12, 12X, and 12Y in accordance with the SOW and the Consolidation Agreement. However, certain materials that are not acceptable for on-site consolidation under the SOW and Consolidation Agreement, as well as demolition debris that cannot fit within the consolidation areas, if any, or are not suitable for consolidation, will be disposed of off-site in accordance with the applicable laws and regulations. The following sections provide additional details regarding the off-site disposal and the on-site consolidation. As previously noted, the consolidation of the building demolition debris into the sub-grade consolidation areas in the Building 12 Complex will constitute a Supplemental Removal Action under the CD for East Street Area 2-North. As specified in the Consolidation Agreement, this work will not reopen any other aspects of the previously completed East Street Area 2-North Removal Action.

5.1 Off-Site Disposal

As previously indicated, hazardous materials assessments and ACM surveys were performed for the Buildings 12 and 14 Complexes to identify materials to be segregated for off-site disposal. Based on the surveys and historical building use information, the demolition activities are anticipated to result in several distinct waste streams. As provided in the SOW and noted above, several of these waste streams are specifically excluded from on-site consolidation – namely, free liquids, free product, intact drums and capacitors, other equipment that contains PCBs within its internal components, and asbestos-containing materials required to be removed from structures prior to demolition under applicable laws and regulations. In addition, as part of the pre-demolition activities, certain other materials, including Universal Wastes and other hazardous materials, will be segregated for off-site disposal at appropriate GE-approved facilities. In addition, recyclable metals may be sent for off-site recycling subject to applicable laws and regulations. All remaining demolition materials, including brick, masonry, concrete, and steel, will be considered acceptable for on-site consolidation in accordance with the SOW provisions.

5.2 On-Site Consolidation

As shown on **Figure 3**, there are two prior consolidation areas within the Building 12 Complex, referred to as the Building 12X vault and the Building 12Y vault. Each of these consolidation areas is located in the northern portions of Buildings 12X and 12Y. These areas are covered by concrete barriers and are surveyed features shown on the existing Revised Grant of Environmental Restriction and Easement (ERE) for East Street Area 2-North (recorded on September 17, 2014) and are further described in that document and in the Final Completion Report for the East Street Area 2-North Removal Action. These existing consolidation areas will be protected with steel plating, timber mats, or an equivalent protection device(s) to prevent damage to the surface completions during demolition. Details related to the consolidation of demolition material adjacent to and on top of the Building 12Y vault are provided below.

The Building 12Y vault is L-shaped and approximately 130 feet by 71 feet along the longest dimensions, with an approximate footprint of 4,600 square feet. There is space located on all four sides of the concrete vault for additional demolition material to be consolidated adjacent to and around the existing vault. Additionally, the Building 12Y vault is situated approximately two feet below surrounding floor slab grade. As a result, additional building demolition material or other approved fill material will need to be installed on top of the Building 12Y vault in order to match existing floor grade. Details related to preparing the sub-grade of foundations receiving demolition material are provided in Section 6.

The approximate capacity of the foundations within the Building 12 Complex identified for on-site consolidation of demolition debris are shown on **Figure 3** and summarized below:

Table 5-1. Estimated On-Site Consolidation Capacity

Building	Approximate Capacity (cy)
12	6,705
12X	2,230
12Y	5,210
Total	14,145

The volumes presented above are estimated based on the physical dimensions of the foundation spaces.

Concrete floor slabs overlying the foundations will be partially removed to provide access to place demolition material for consolidation. In general, the removal of floor slabs for access to the foundations will be limited to those areas necessary to consolidate demolition debris, but will vary from building to building. Any protruding rebar will be cut flush with the outer foundation wall and placed with the demolished slab debris in the consolidation areas. Some sections of floor slab over the foundations will be left in place for structural stability purposes, as shown on **Figure 3**. Prior to performing debris consolidation, the following activities will be conducted:

- Any water that may be present in the foundations will be pumped into tanker trucks and transported to the 64G GWTF for treatment and discharge.
- Any equipment, conduit, or piping not intended to be consolidated within the foundations will be removed. Any penetrations of conduit or piping through foundation walls and floors, including any floor drains within the foundations, will be plugged and sealed as shown by the details illustrated on **Figure 7**.
- Any manholes within the foundations will be plugged and sealed as illustrated in **Figure 7**.

In addition, any tunnels that extend outside the Building 12 Complex footprint will require the installation of a concrete masonry wall at the outer wall of the building. The wall will allow the consolidation of debris within the Building 12 Complex footprint while isolating any portions of tunnels outside the complex. See **Figure 3** for the location of tunnels within Building 12 and 12Y that will require masonry walls. and **Figure 7** for additional details on wall construction.

Once these preparation activities for the foundations are completed, consolidation of acceptable building demolition materials will be performed. Compaction of debris placed within the vaults will be accomplished using heavy equipment to track over the vaults with larger openings. For all other areas that are less accessible for tracking with larger equipment, a vibratory plate compactor attached to an excavator will be used for compacting debris. Compaction will involve several passes to achieve a non-yielding condition.

If the volume of demolition debris exceeds the vault and tunnel capacity, excess debris will be transported off-site for disposal.

6 Surface Restoration

As previously described, the consolidated debris will be placed, compacted, and stabilized. Flowable fill may be used to fill excessive void spaces identified after placement/compaction of debris, or clean imported fill (as determined in accordance with the backfill sampling requirements specified in the SOW) may be used to complete backfilling up to the cover system subgrade level (generally at least 12 inches below final grade).

Following completion of demolition debris consolidation activities, a permanent cover system will be installed over the foundations within the Building 12 Complex where the materials were placed. The cover system will be generally equivalent to an engineered barrier as described in Technical Attachment G of the SOW. That Technical Attachment provides for two types of engineered barrier systems: (1) an impermeable asphalt cover; and (2) an impermeable vegetative cover. For the Building 12 Complex restoration, GE proposes, as a third alternative, use of concrete in lieu of asphalt, such as was used for the covers over the prior consolidation areas (the Building 12X vault and 12Y vaults), particularly given that the ground around the consolidation areas consists primarily of concrete slabs. At this time, GE has not made a final determination as to whether to employ an impermeable asphalt or concrete cover or an impermeable vegetative cover. Whichever type of cover is used, the cover system will, at a minimum, measure 12 inches in total thickness and be constructed of several components, as illustrated on **Figure 10**. The cover system will be composed of the following components (in descending order from top to bottom), depending on the type of cover used:

Impermeable Asphalt or Concrete Cover

- **Overlying 12-Inch Layer of Asphalt or Concrete:** An overlying layer consisting of either:
 - **Bituminous Asphalt Wearing Surface and Base Course, with Gravel Subbase Course:** This layer would consist of a gravel subbase (nine inches), bituminous asphalt base course (1.5 inches); and bituminous asphalt wearing surface (1.5 inches);
 - Or
 - **Concrete Slab, with Gravel Subbase Course:** This layer would consist of a gravel subbase (eight inches) and concrete slab (four inches);
- **Geotextile Fabric:** Included as a cushioning layer under the gravel subbase; and
- **High Density Polyethylene (HDPE) Geomembrane Liner:** The geomembrane liner is the primary component of the cover system. This geomembrane liner will have a minimum thickness of 60 mil. A geotextile fabric may be included as a cushioning layer beneath the liner depending on the condition of the subgrade material.

Impermeable Vegetative Cover

- **Topsoil with Vegetative Cover:** Minimum of four inches of imported topsoil;
- **General Soil Fill:** Minimum of eight inches of imported soil fill material;
- **Geotextile Fabric:** Included as a cushioning layer under the soil fill subbase; and
- **HDPE Geomembrane Liner:** As with the asphalt or concrete cover, the geomembrane liner is the primary component of the cover system. This geomembrane liner will have a minimum thickness of 60 mil. A geotextile fabric may be included as a cushioning layer beneath the liner depending on the condition of the subgrade material.

Buildings 12 and 14 Complexes Demolition, Disposition, and Restoration Work Plan

Within Building 12Y, the cover system will be installed over the existing consolidation area/vault constructed in the mid-1980s. The elevation of the top of this vault is approximately two feet below the Building 12Y slab level, which will require at least one foot of additional demolition debris or imported fill material to be placed over the vault before the final 12 inches of cover system are installed. Based on the construction details available, the additional two feet of fill and cover are not anticipated to cause any damage to the existing surface completion. Subbase materials will be placed and compacted in accordance with standard industry practice. Prior to application of a final cover, the subbase will be proof rolled to identify any areas that require additional compaction.

Whichever type of surface cover is used (asphalt, concrete, or vegetative), the surface covers will be placed to facilitate drainage and avoid depressions that retain standing water. In addition, other surface depressions in the slabs and surficial areas damaged by demolition activities will be repaired using asphalt or concrete patching, as necessary to facilitate drainage and avoid depressions that retain standing water.

7 Decontamination

The following site-specific decontamination practices will be implemented throughout demolition activities. Equipment used to handle material containing PCBs at concentrations equal to or greater than 50 milligrams per kilogram (mg/kg) and whose disposition is thus subject to regulation under the Toxic Substances Control Act (TSCA) will be moved to a temporary decontamination pad (within the work area) where the equipment will be cleaned with pressure washers to remove bulk material that could potentially contain PCBs at concentrations equal to or greater than 50 mg/kg. This will be carried out prior to managing materials containing PCB concentrations less than 50 mg/kg, moving from an area where handling of TSCA-regulated demolition materials was performed, or demobilizing from the project site. Only the equipment surfaces that were in contact with TSCA-regulated waste will require decontamination. Equipment will be triple-rinsed and visually inspected to confirm the removal of adhered site materials.

Solid waste materials generated during equipment decontamination will be collected and disposed of as TSCA-regulated waste. Liquids generated by decontamination activities will be containerized for transportation to the Building 64G GWTF for treatment and discharge provided that they contain no solvents, surfactants, or detergents.

Wipe samples will not be collected from each equipment item that is being re-positioned at the project site. Generally, interior building materials are assumed to be subject to TSCA disposition regulations. However, wipe samples will be collected upon completion of handling TSCA-regulated materials and prior to demobilization from the project site. After the equipment is cleaned and prior to demobilization from the project site, standard PCB wipe samples (10 centimeters [cm] by 10 cm in size, as defined in 40 CFR 761.123) will be collected from surfaces of the equipment that has been in primary contact with the building materials (e.g., grapples, shears, pulverizers/munchers, excavator bucket, excavator tracks, and excavator underbody). Wipe samples will be collected at a frequency of one sample per every 100 square feet of equipment surface area, with a maximum of three samples for any individual piece of equipment. The wipe samples will be submitted for laboratory analysis in accordance with EPA SW-846 Method 8082. If PCBs are detected for any of the wipe samples at concentrations equal to or exceeding 10 micrograms/100 cm², the portion of the equipment represented by that sample will be pressure washed again and additional samples will be collected until acceptable wipe sample results are achieved. Once acceptable wipe sampling results are obtained the equipment will be cleared to be removed from the project site.

8 Post-Demolition Activities

Following the completion of the Buildings 12 and 14 Complexes demolition, consolidation of the demolition debris in the Building 12 Complex foundations, and restoration activities at that complex, GE will conduct various post-demolition activities as described in this section.

8.1 Groundwater Monitoring

The existing Long-Term Monitoring Program for Groundwater Management Area (GMA) 1, which includes the GE Facility, monitors groundwater quality, as well as water elevation levels and the presence/absence of non-aqueous-phase liquid (NAPL), in the portion of the GE Facility that includes and is downgradient of the Building 12 Complex. This program includes groundwater quality monitoring in source and perimeter monitoring wells in portions of the East Street Area 2-South RAA downgradient of the Building 12 Complex. Additionally, active and passive remedial measures (e.g., sheet pile walls, engineered covers, groundwater extraction systems, NAPL recovery systems) have been installed and are operating between the Building 12 Complex and the Housatonic River, which is located approximately 1,000 feet downgradient from Building 12Y. The existing Long-Term Monitoring Program for GMA 1 will continue to monitor wells located adjacent to and downgradient of the Building 12 Complex to observe any significant changes in groundwater quality and to ensure compliance with applicable CD groundwater-related performance standards following the consolidation of building demolition debris in the foundations of that complex.

8.2 ERE Amendment or Revision

As previously noted, the consolidation of building demolition materials in the foundations of Buildings 12, 12X, and 12Y will be conducted as a Supplemental Removal Action for East Street Area 2-North and will be limited to that activity only and will not reopen any other aspect or requirements of the completed East Street Area 2-North Removal Action. Following completion of the building demolition, consolidation, and restoration activities described in this Work Plan, GE will draft and record an amendment to the existing Revised ERE for East Street Area 2-North (recorded in September 2014) or a further Revised ERE to reflect the location of the new and expanded Building Demolition Barrier Area encompassing the areas where the building demolition materials were consolidated in the Building 12 Complex foundations and covered with an engineered barrier. This will be accompanied by a revised Plan of Restricted Area to show that new Building Demolition Barrier Area.

8.3 Post-Restoration Inspections

An initial inspection of the revised Building Demolition Barrier Area encompassing the areas where the building demolition materials were consolidated in the Building 12 Complex foundations will be performed approximately one month after completion of final surface restoration activities. Additionally, these surfaces will be inspected every six months for a period of two years. These inspections will occur in April or May and in October or November of each year to ensure that the installed engineered barrier systems are performing as intended and providing the desired degree of protection.

For areas covered by an asphalt or concrete barrier, these inspections will include visual observations of the following: (a) excessive cracking, fissures, spalling, rutting, potholes, or other exposed subgrade material; (b) evidence of uneven settlement, depressions, surface water ponding, excessive rutting, exposed sub-base materials, or exposed sub-grade materials; (c) presence of nuisance vegetation (weeds); (d) damage to synthetic cover components; and (e) any other conditions that could potentially compromise the integrity of the engineered barrier surface completions, where installed.

For areas covered by a vegetative engineered barrier (if any), the inspections will include visual observations for the following conditions that would affect the integrity of the barrier components: (a) evidence of topsoil erosion; (b) establishment and coverage of vegetation (e.g., bare or sparsely vegetated areas); (c) deficiencies in the soil layer overlying the synthetic cover components (e.g., excessive erosion, surface water ponding, depressions, exposed synthetic cover components, vehicle ruts, or other abnormalities); (d) damage to synthetic cover components; (e) uneven settlement relative to surrounding areas; and (f) other conditions that could jeopardize the integrity of the barrier (including animal burrows, unauthorized excavation, etc.).

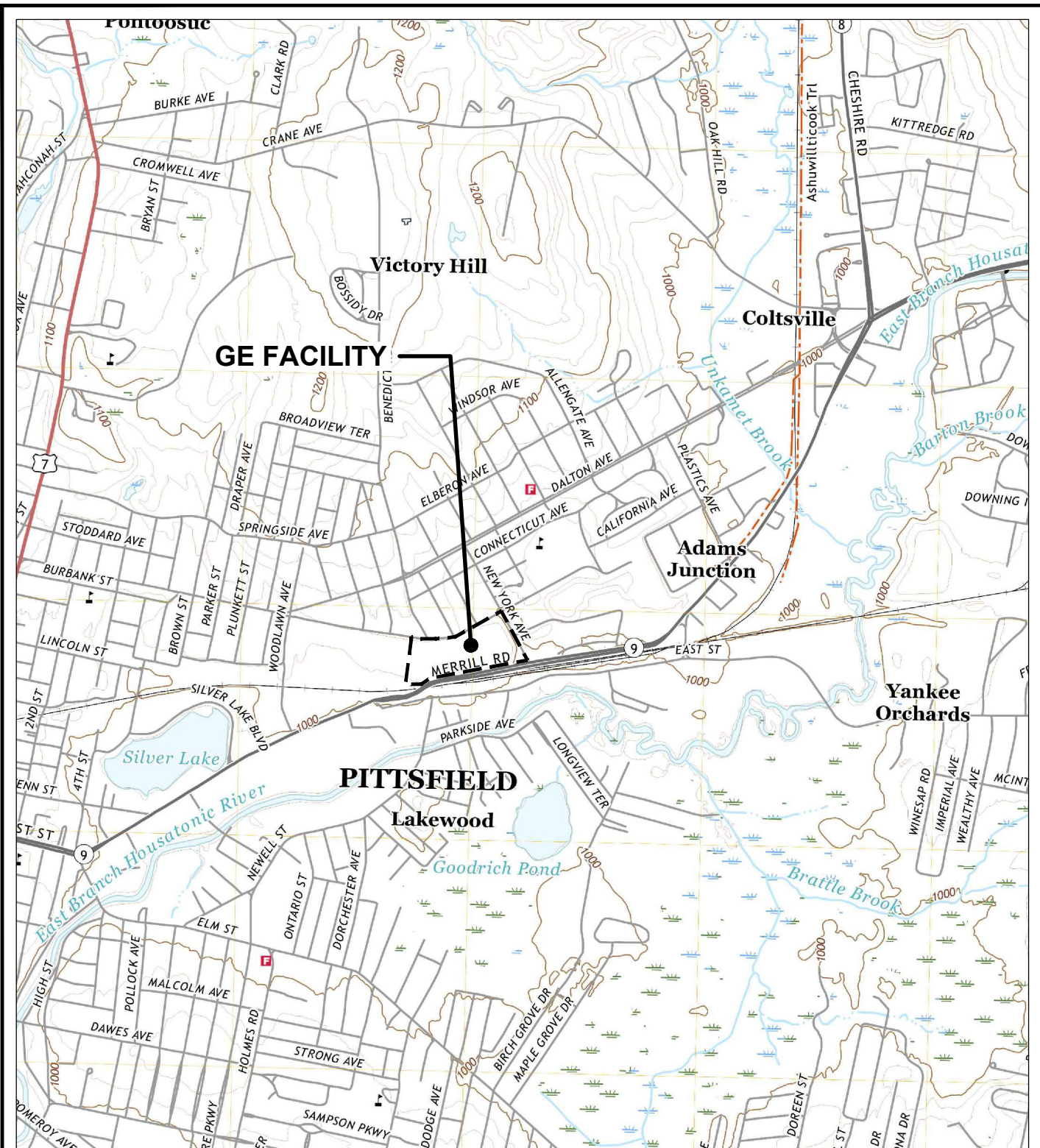
Any deficiencies observed during an inspection will be promptly repaired. After a two-year period, the inspections will be performed annually in the spring along with the other inspections performed for East Street Area 2-North under the consolidated RAA inspection program.

8.4 Project Completion Documentation

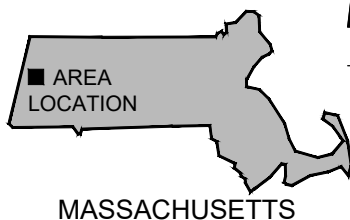
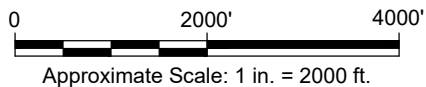
Upon completion of the project activities, an Addendum to the Final Completion Report for the East Street Area 2-North Removal Action will be prepared and submitted to EPA. That report will include the following information:

1. Narrative summary of the completed work;
2. Figures/pictures depicting the on-site material consolidation and installation of cover system;
3. As-built survey of the consolidation areas limits performed by a Massachusetts licensed land surveyor;
4. Information and documentation regarding the final quantities of controlled density fill, supplemental fill materials, and demolition debris placed in the consolidation areas; and
5. The Amended or Revised ERE, with the revised Plan of Restricted Area.

Figures



REFERENCE: BASE MAP USGS 7.5. MIN. TOPO. QUAD., PITTSFIELD EAST, MASSACHUSETTS, 2021.



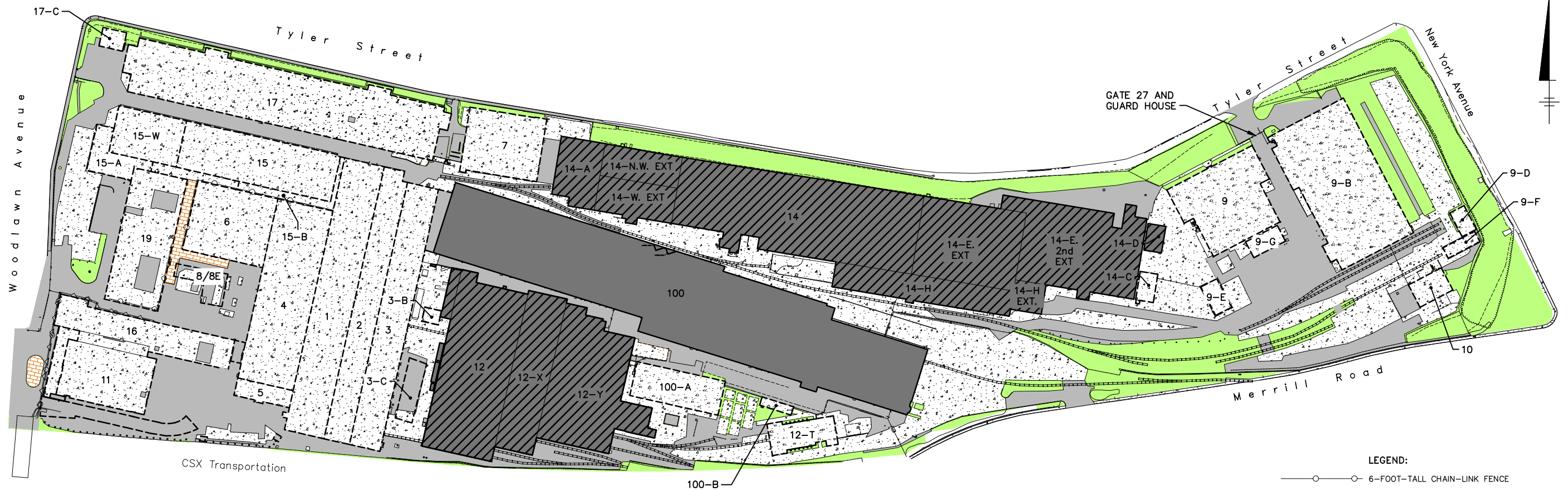
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**BUILDINGS 12 AND 14 COMPLEXES DEMOLITION,
DISPOSITION, AND RESTORATION WORK PLAN**

GE FACILITY LOCATION MAP



FIGURE

1



NOTES:

1. BASE MAPPING FROM TOPOGRAPHIC SURVEY (DRAWING S2059W01) BY FORESIGHT LAND SURVEYORS DATED 2/9/05. BASE MAPPING WAS REVISED 9/28/10 BASED ON A HILL DRAWING TITLED "OVERALL SITE PLAN", DATED 7/12/2010, AT A SCALE OF 1" = 40'.
2. NOT ALL PHYSICAL FEATURES SHOWN.
3. THE LIMITS OF THE FORMER BUILDING LOCATIONS ARE APPROXIMATE AND GENERALLY REPRESENT THE FOOTPRINT OF THE MORE SIGNIFICANT ABOVE-GRADE STRUCTURES THAT HAVE BEEN DEMOLISHED.
4. CERTAIN AREAS SHOWN HEREON AS CONCRETE HAVE BEEN COVERED WITH ASPHALT AS PART OF PAVEMENT REPAIR ACTIVITIES.
5. CONTRACTOR TO NOTIFY GE OR GE'S REPRESENTATIVE IMMEDIATELY IN THE EVENT THAT ACTUAL FIELD CONDITIONS VARY FROM THOSE SHOWN HEREON. SITE FEATURES SHOWN ARE BASED ON A FIELD SURVEY CONDUCTED BY HILL ENGINEERS, ARCHITECTS, AND PLANNERS, DATED MARCH 24, 2004.
6. CONTRACTOR TO TAKE NECESSARY MEASURES TO INSURE THAT EXISTING UTILITIES SERVING OTHER BUILDINGS REMAIN IN SERVICE.
7. THE CONTRACTOR IS RESPONSIBLE FOR OBTAINING AND COMPLYING WITH THE APPROPRIATE PERMITS FOR, AND NOT LIMITED TO, DEMOLITION OF THE STRUCTURES AND ABANDONMENT OF UTILITIES.
8. PRIOR TO ANY DEMOLITION WORK, ALL EXISTING CATCH BASINS AND MANHOLES THAT MAY BE IMPACTED BY THE DEMOLITION ACTIVITIES SHALL HAVE A DOUBLE LAYER OF POLYETHYLENE SHEETING INSTALLED BETWEEN THE FRAME AND COVER TO TRAP SEDIMENT RESULTING FROM DEMOLITION OPERATIONS AND SHALL BE MAINTAINED UNTIL DEEMED REMOVABLE BY GE.

DEMOLITION NOTES:

1. ALL FLOOR SLABS AND OTHER AREAS DESIGNATED AS PAVED ARE TO REMAIN INTACT AND UNDAMAGED EXCEPT AREAS OF 12, 12X, AND 12Y PURPOSELY REMOVED OVER PITS AND TUNNELS FOR REPLACEMENT OF DEMOLITION DEBRIS. ANY DAMAGE OCCURRING TO THE FLOOR SLABS OR EXISTING PAVED AREAS OUTSIDE OF THESE PIT AND TUNNEL AREAS IS TO BE REPAIRED BY THE CONTRACTOR (AT ITS OWN EXPENSE) TO THE SATISFACTION OF GE.
2. ALL STRUCTURES INDICATED ARE TO BE PROPERLY DEMOLISHED AND DISPOSED OF. ADDITIONALLY, ALL SITE FEATURES INCLUDING, BUT NOT LIMITED TO: BOLLARDS, STEAM LINES, POST INDICATOR VALVES, LIGHT POLES, GUARDRAILS, HOPPERS, TRESTLE SUPPORTS, RISER PIPES, HOISTS AND OTHER APPURTENANT STRUCTURES LOCATED ADJACENT TO, OR ASSOCIATED WITH, THE SUBJECT BUILDINGS ARE TO BE REMOVED UNLESS OTHERWISE NOTED. WHERE POSSIBLE, ITEMS SHALL BE CUT TO GRADE AND GROUND SMOOTH. WHERE ITEMS SHALL BE REMOVED FROM THE GROUND, VOIDS SHALL BE FILLED AND THE SURFACE SHALL BE PATCHED TO MATCH SURROUNDING CONDITIONS.
3. WALLS, FOOTERS, AND FOUNDATIONS ARE TO BE REMOVED TO THE TOP OF FLOOR SLAB GRADE UNLESS OTHERWISE NOTED.
4. ALL TANKS, VAULTS, PITS, AND ANY OTHER VOIDS SHALL BE DRAINED, EMPTIED OF THEIR CONTENTS, PENETRATIONS SHALL BE PLUGGED AND THE VOID SHALL BE FILLED TO RESTORE SURFACES TO EXISTING GRADE.
5. ANY VOIDS IN SLABS CREATED BY THE ELIMINATION OF PIPING NETWORKS SHALL BE PROPERLY PLUGGED AND FILLED WITH NON-SHRINK GROUT.
6. THE CONTRACTOR IS RESPONSIBLE FOR INSURING THAT EXISTING UTILITIES TO REMAIN IN SERVICE ARE PROTECTED. ANY DAMAGE TO EXISTING UTILITIES TO REMAIN SHALL BE CORRECTED BY THE CONTRACTOR AT ITS EXPENSE.
7. ANY DISTURBANCE OF SURFACES RESULTING FROM DEMOLITION ACTIVITIES SHALL BE CORRECTED BY THE CONTRACTOR IN ACCORDANCE WITH RESTORATION DETAILS OR OTHER DETAILS AS APPROPRIATE.

LEGEND:

- 6-FOOT-TALL CHAIN-LINK FENCE
- GUARDRAIL
- EXISTING BUILDING
- FORMER BUILDING/STRUCTURE LOCATION (SEE NOTE 4)
- BUILDING ID
- ASPHALT
- CONCRETE (SEE NOTE 5)
- BRICK
- UNPAVED AREA (GRASS/DIRT/GRAVEL)
- BUILDING TO BE DEMOLISHED

0 120' 240'
GRAPHIC SCALE

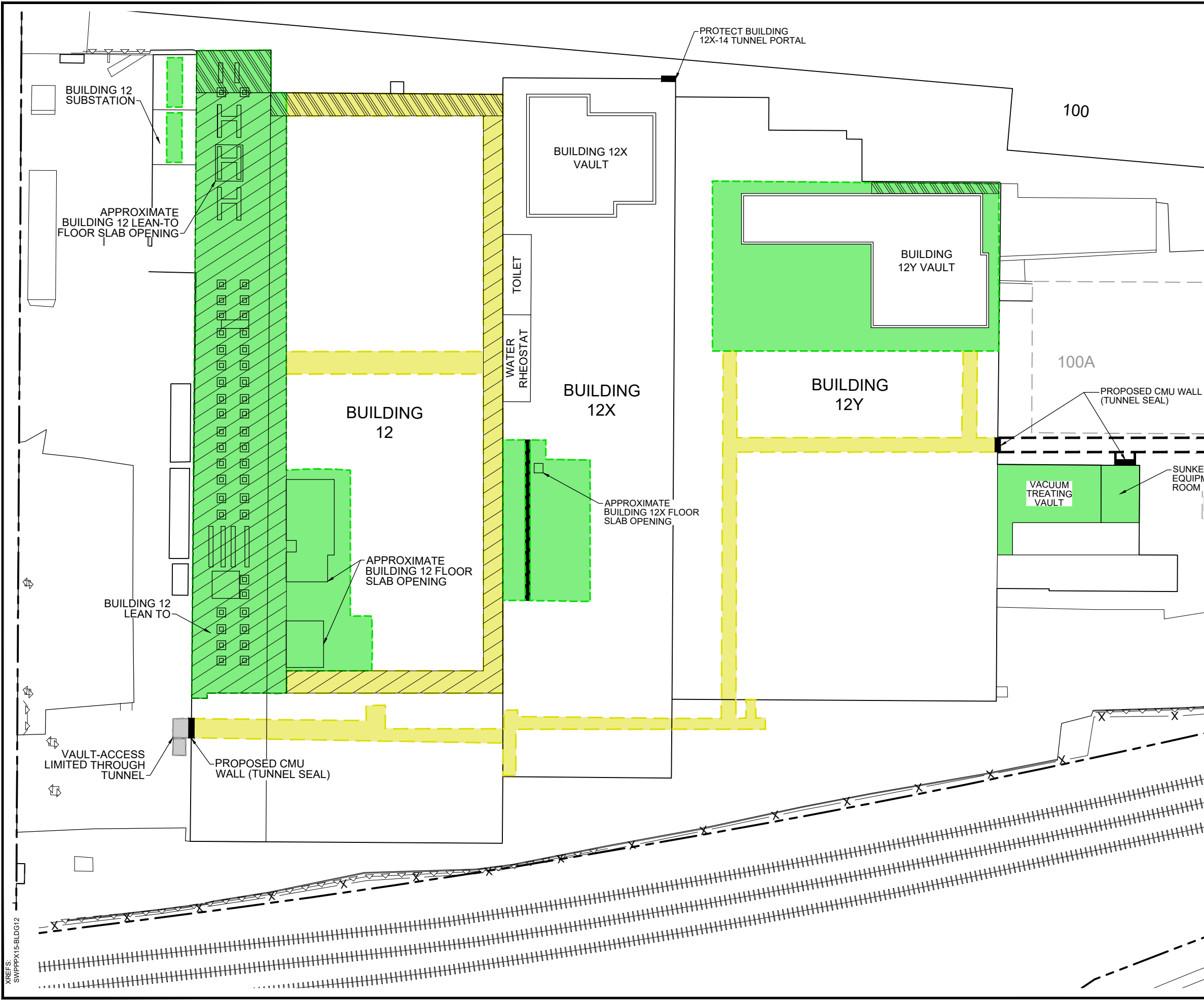
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**BUILDINGS 12 AND 14 COMPLEXES DEMOLITION,
DISPOSITION, AND RESTORATION WORK PLAN**

**BUILDINGS 12 AND 14 COMPLEXES
DEMOLITION OVERVIEW**

ARCADIS

FIGURE

2



LEGEND:

- EXISTING TUNNEL (TO BE BACKFILLED WITH DEMOLITION DEBRIS)
- EXISTING VAULTS (TO BE BACKFILLED WITH DEMOLITION DEBRIS)
- EXISTING VAULT (TO BE BACKFILLED WITH CLEAN IMPORTED FILL MATERIAL)
- SLAB AREAS TO REMAIN INTACT
- PARTIAL SLAB REMOVAL PERMITTED
- TUNNEL OUTSIDE BUILDING FOOTPRINT
- EXISTING CONSOLIDATION AREA

0 50' 100'

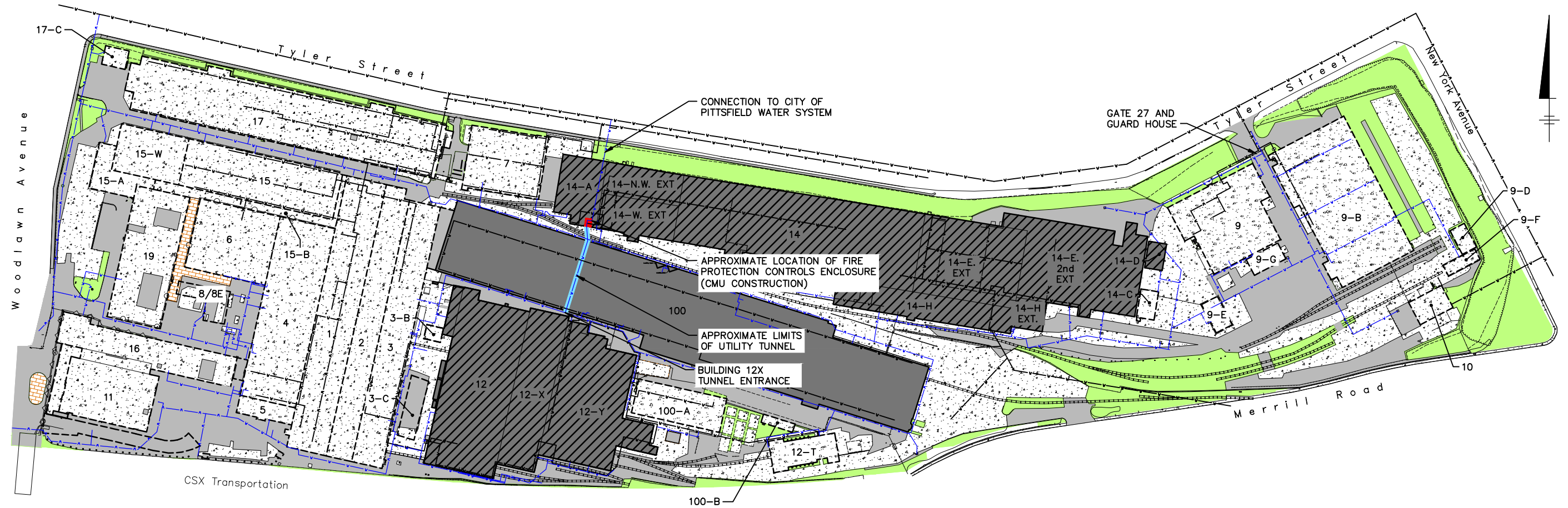
GRAPHIC SCALE

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PITTSFIELD, MASSACHUSETTS
**BUILDINGS 12 AND 14 COMPLEXES DEMOLITION,
DISPOSITION, AND RESTORATION WORK PLAN**

**BUILDING 12 COMPLEX PROPOSED
CONSOLIDATION PLACEMENT AREAS**

ARCADIS

FIGURE
3

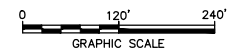


NOTES:

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2. NOT ALL PHYSICAL FEATURES SHOWN.
3. THE LIMITS OF THE FORMER BUILDING LOCATIONS ARE APPROXIMATE AND GENERALLY REPRESENT THE FOOTPRINT OF THE MORE SIGNIFICANT ABOVE-GRADE STRUCTURES THAT HAVE BEEN DEMOLISHED.
4. CERTAIN AREAS SHOWN HEREON AS CONCRETE HAVE BEEN COVERED WITH ASPHALT AS PART OF PAVEMENT REPAIR ACTIVITIES.
5. CONTRACTOR TO NOTIFY GE OR GE'S REPRESENTATIVE IMMEDIATELY IN THE EVENT THAT ACTUAL FIELD CONDITIONS VARY FROM THOSE SHOWN HEREON. SITE FEATURES SHOWN ARE BASED ON A FIELD SURVEY CONDUCTED BY HILL ENGINEERS, ARCHITECTS, AND PLANNERS, DATED MARCH 24, 2004.
6. CONTRACTOR TO TAKE NECESSARY MEASURES TO INSURE THAT THE EXISTING FIRE PROTECTION SYSTEM INCLUDING BUT NOT LIMITED TO ALL PIPING, HYDRANTS, POST INDICATOR VALVES, WALL MOUNTED VALVES, CONTROLS ENCLOSURE, AND THE CITY FEED EXTENDING FROM TYLER STREET THROUGH THE ENTIRE LENGTH OF THE EXISTING UTILITY TUNNEL SHALL BE PROTECTED AND REMAIN IN SERVICE THROUGHOUT ALL PRE-DEMOLITION, DEMOLITION, AND RESTORATION ACTIVITIES.

LEGEND:

- 6-FOOT-TALL CHAIN-LINK FENCE
- GUARDRAIL
- EXISTING BUILDING
- FORMER BUILDING/STRUCTURE LOCATION (SEE NOTE 4)
- BUILDING ID
- ASPHALT
- CONCRETE (SEE NOTE 5)
- BRICK
- UNPAVED AREA (GRASS/DIRT/GRAVEL)
- BUILDING TO BE DEMOLISHED
- WATER MAIN / FIRE PROTECTION MAIN (SEE NOTE 6)
- WATER SERVICE TERMINATED BY OTHERS



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**BUILDINGS 12 AND 14 COMPLEXES DEMOLITION,
DISPOSITION, AND RESTORATION WORK PLAN**

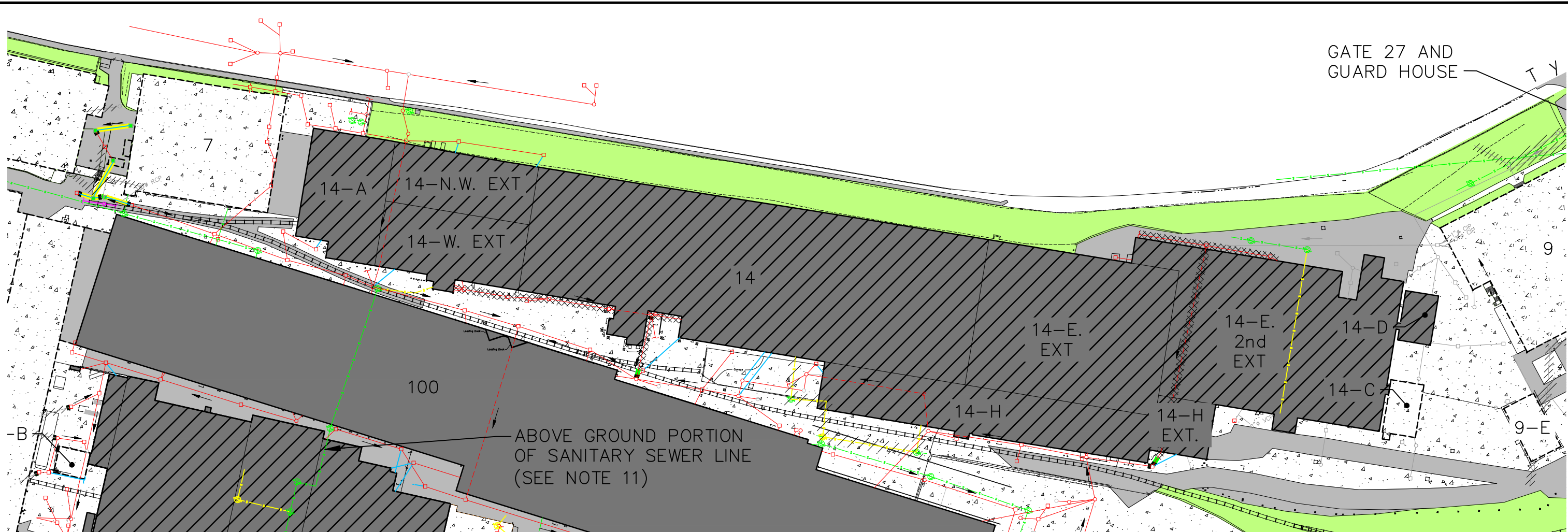
**BUILDINGS 12 AND 14 COMPLEXES
WATER UTILITY LAYOUT**



FIGURE

4





NOTES:

1. BASE MAPPING FROM TOPOGRAPHIC SURVEY (DRAWING S2059W01) BY FORESIGHT LAND SURVEYORS DATED 2/9/05. BASE MAPPING WAS REVISED 9/28/10 BASED ON A HILL DRAWING TITLED "OVERALL SITE PLAN", DATED 7/12/2010, AT A SCALE OF 1" = 40'.
2. NOT ALL PHYSICAL FEATURES SHOWN.
3. THE LIMITS OF THE FORMER BUILDING LOCATIONS ARE APPROXIMATE AND GENERALLY REPRESENT THE FOOTPRINT OF THE MORE SIGNIFICANT ABOVE-GRADE STRUCTURES THAT HAVE BEEN DEMOLISHED.
4. CERTAIN AREAS SHOWN HEREON AS CONCRETE HAVE BEEN COVERED WITH ASPHALT AS PART OF PAVEMENT REPAIR ACTIVITIES.
5. PRIOR TO ANY DEMOLITION WORK, ALL EXISTING CATCH BASINS AND MANHOLES THAT MAY BE IMPACTED BY THE DEMOLITION ACTIVITIES SHALL HAVE A DOUBLE LAYER OF POLYETHYLENE SHEETING INSTALLED BETWEEN THE FRAME AND COVER TO TRAP SEDIMENT RESULTING FROM DEMOLITION OPERATIONS AND SHALL BE MAINTAINED UNTIL DEEMED REMOVABLE BY GE.
6. PIPING AND/OR MANHOLES/CATCH BASINS NOT OBSERVED DURING FIELD INVESTIGATIONS CONDUCTED BY ARCADIS IN 2009.
7. SECTIONS OF THE STORM SEWER SYSTEM WERE ABANDONED IN 2014/2015 IN CONJUNCTION WITH THE DEMOLITION OF BUILDINGS 100A AND 100B.
8. A 6-INCH GATE VALVE WAS GROUTED INTO THE END OF THE PIPE TO ISOLATE FLOWS FROM UPGRADIENT SECTION OF THE STORM SEWER SYSTEM. GATE VALVES CAN BE OPENED IN THE EVENT THAT SURFACE CONDITIONS ADJACENT TO THE ISOLATED SECTIONS OF STORM SEWER BECOME INUNDATED.
9. THE DESTINATION OF PIPING COULD NOT BE DETERMINED/VERIFIED DURING MANHOLE/CATCH INSPECTIONS CONDUCTED BY ARCADIS IN 2009.
10. ACTIVE SANITARY SEWER TO BE MAINTAINED.
11. ABOVE GROUND SANITARY SEWER (CAST IRON PIPE) TO BE PROTECTED DURING DEMOLITION ACTIVITIES.
12. PORTIONS OF THE STORMSEWER SYSTEM CONNECTED TO THE BUILDING 14 AND 12 COMPLEXES ARE TO BE ABANDONED.

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PITTSFIELD, MASSACHUSETTS
BUILDINGS 12 AND 14 COMPLEXES DEMOLITION,
CONSOLIDATION, AND SITE RESTORATION WORK PLAN

LEGEND:

	6-FOOT-TALL CHAIN-LINK FENCE
	GUARDRAIL
	EXISTING BUILDING
	FORMER BUILDING/STRUCTURE LOCATION (SEE NOTE 4)
14	BUILDING ID
	ASPHALT
	CONCRETE (SEE NOTE 5)
	BRICK
	UNPAVED AREA (GRASS/DIRT/GRAVEL)
	BUILDING TO BE DEMOLISHED
	PEDA/GE PROPERTY BOUNDARY

	SANITARY TO BE DECOMMISSIONED
	DECOMMISSIONED SANITARY SEWER
	ACTIVE SANITARY SEWER (SEE NOTE 10)
	EXISTING STORM SEWER HAS BEEN ABANDONED (SEE NOTE 7)
	EXISTING STORM SEWER PIPING ABANDONED WITH 6" DRAIN VALVE
	STORM SEWER PIPING AND MANHOLE/CATCH BASIN NOT FOUND/INSPECTED (SEE NOTE 6)
	STORM SEWER PIPING AND MANHOLE/CATCH BASIN STRUCTURE
	STORMWATER FLOW DIRECTION
	PIPE DESTINATION UNKNOWN (SEE NOTE 9)
	CONCRETE PIPE PLUG
	6-INCH GATE VALVE (SEE NOTE 8)
	STORM SEWER PIPING AND/OR MANHOLE OR CATCH BASIN TO BE ABANDONED (SEE NOTE 12)
	STORM SEWER PIPING AND MANHOLE/CATCH BASIN STRUCTURE LOCATED WITHIN EXISTING BUILDING LIMITS



0 60' 120'
GRAPHIC SCALE

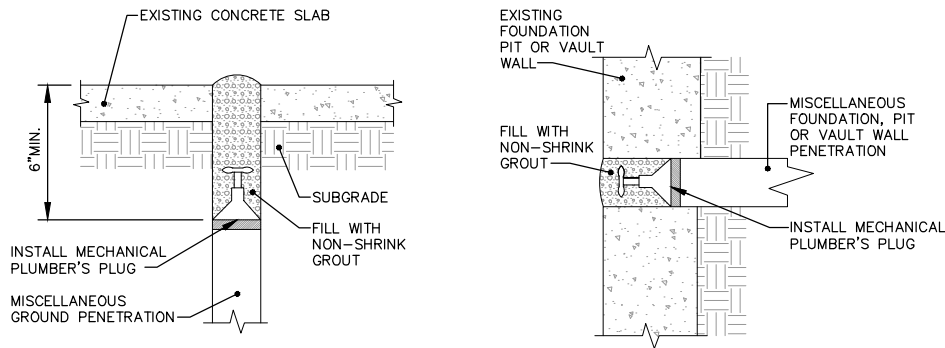
GENERAL ELECTRIC COMPANY
PITTSFIELD, MASSACHUSETTS
BUILDINGS 12 AND 14 COMPLEXES DEMOLITION,
DISPOSITION, AND RESTORATION WORK PLAN

**BUILDING 14 COMPLEX SANITARY
AND STORMWATER UTILITY LAYOUT**



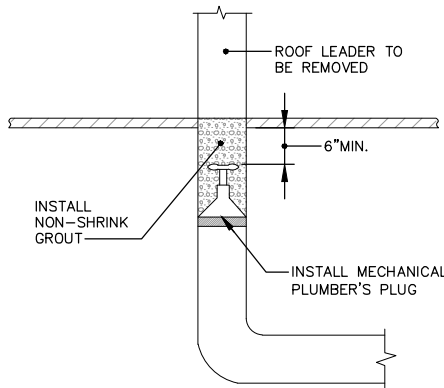
FIGURE

6



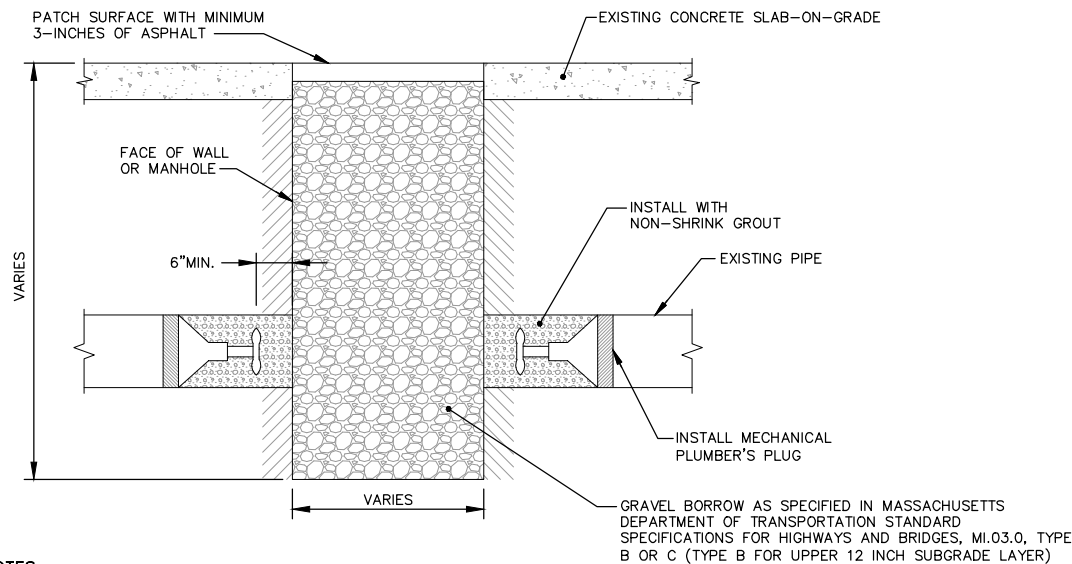
HORIZONTAL AND VERTICAL PENETRATION PLUGGING DETAIL

NOT TO SCALE



SANITARY SEWER AND ROOF LEADER PLUGGING DETAIL

NOT TO SCALE

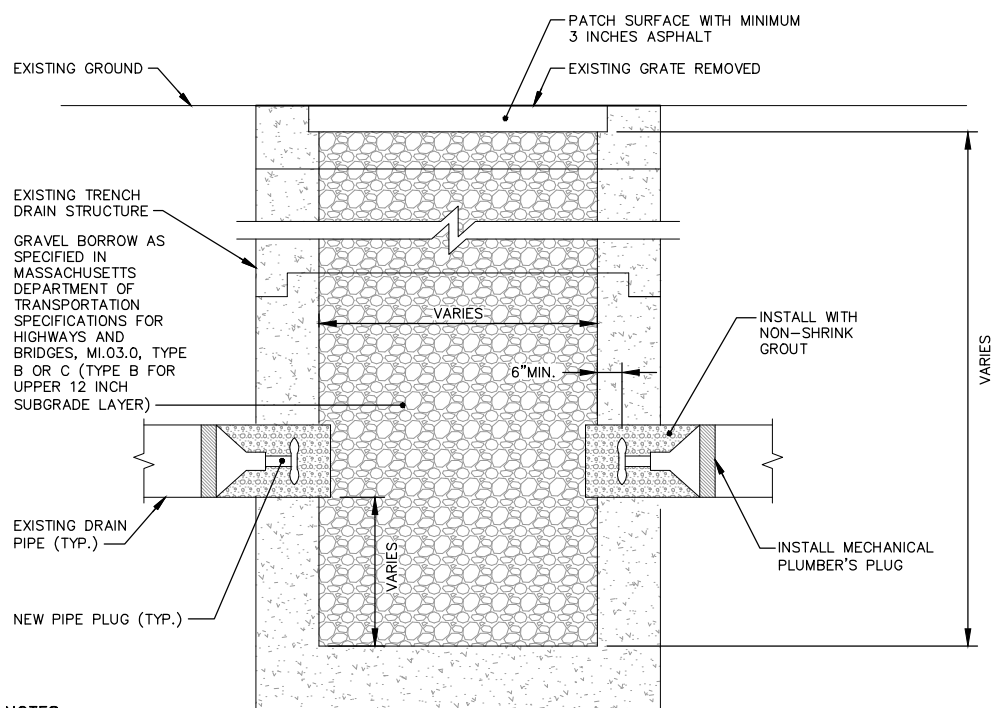


NOTES:

1. THE ABOVE IS INTENDED ONLY TO SHOW A TYPICAL/CONCEPTUAL MANHOLE ABANDONMENT PROCEDURE, AS EXISTING MANHOLE SIZES AND CONFIGURATIONS VARY. PROCEDURES MAY BE MODIFIED IN THE FIELD, AS NECESSARY, BASED ON CONDITIONS ENCOUNTERED. FIELD MODIFICATIONS MUST BE REVIEWED BY GE AND/OR GE'S REPRESENTATIVE.
2. EXISTING VAULTS, PITS, AND OTHER LARGE SUBSURFACE VOIDS SHALL BE EMPTIED OF THEIR CONTENTS, BACKFILLED, AND PATCHED CONSISTENT WITH THE PROCEDURES SHOWN ABOVE, AS APPROPRIATE (E.G., MISCELLANEOUS PENETRATIONS PLUGGED, VOID BACKFILLED WITH GRAVEL BORROW, AND SURFACE PATCHED AS SHOWN).
3. WHERE THE EXISTING SURFACE CONSISTS OF ASPHALT PAVEMENT, GRAVEL BORROW (M.I.03.0, TYPE B OR C) SHALL BE PLACED TO SUBGRADE ELEVATION AND THE SURFACE SHALL BE PATCHED WITH 3 INCH MINIMUM BINDER COURSE AS SPECIFIED IN MASSACHUSETTS DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR HIGHWAYS AND BRIDGES, M3.11.03, TABLE A. SURROUNDING EDGES OF PAVEMENT SHALL BE SAWCUT, AS NECESSARY.
4. TO THE EXTENT PRACTICAL (AS DETERMINED BY GE AND/OR GE'S REPRESENTATIVE), GRAVEL BORROW SHALL BE PLACED IN MAXIMUM 1-FOOT-THICK LIFTS AND COMPACTED.

TYPICAL MANHOLE/SUBSURFACE VOID ABANDONMENT DETAIL

NOT TO SCALE

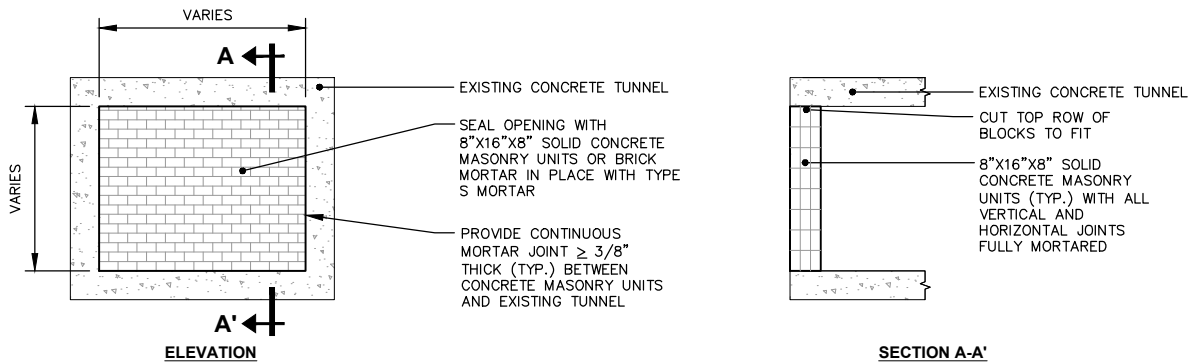


NOTES:

1. THE ABOVE IS INTENDED ONLY TO SHOW A TYPICAL/CONCEPTUAL TRENCH DRAIN ABANDONMENT PROCEDURES, AS EXISTING SIZES AND CONFIGURATIONS MAY VARY. PROCEDURES MAY BE MODIFIED IN THE FIELD, AS NECESSARY, BASED ON CONDITIONS ENCOUNTERED. FIELD MODIFICATIONS MUST BE REVIEWED BY GE.
2. EXISTING TRENCH DRAINS SHALL BE EMPTIED OF THEIR CONTENTS, BACKFILLED, DRAIN PIPES PLUGGED, AND PATCHED CONSISTENT WITH THE PROCEDURES SHOWN ABOVE.
3. WHERE THE EXISTING SURFACE CONSISTS OF ASPHALT PAVEMENT, GRAVEL BORROW (M.I.03.0, TYPE B OR C) SHALL BE PLACED TO SUBGRADE ELEVATION AND THE SURFACE PATCHED WITH 3-INCH MINIMUM BINDER COURSE AS SPECIFIED IN MASSACHUSETTS DEPARTMENT OF TRANSPORTATION STANDARD AND SPECIFICATIONS FOR HIGHWAYS AND BRIDGES, M3.11.03, TABLE A. SURROUNDING EDGES OF PAVEMENT SHALL BE SAWCUT AS NECESSARY.

TYPICAL TRENCH DRAIN CLOSURE DETAIL

NOT TO SCALE



NOTES:

1. FOR BELOW GRADE PIT/TUNNEL INTERFACE USE 3 COURSES SOLID CONCRETE MASONRY UNITS.
2. FOR AT GRADE TUNNEL ENTRANCES USE 1 COURSE SOLID CONCRETE MASONRY UNITS.
3. FOR WALL UTILITY CHASES USE 1 COURSE SOLID CONCRETE MASONRY UNITS OR 2 COURSES SOLID BRICK.

SEALING EXISTING TUNNEL OPENINGS AND WALL UTILITY CHASES

NOT TO SCALE

GENERAL ELECTRIC COMPANY
PITTSFIELD, MASSACHUSETTS
**BUILDINGS 12 AND 14 COMPLEXES DEMOLITION,
DISPOSITION, AND RESTORATION WORK PLAN**

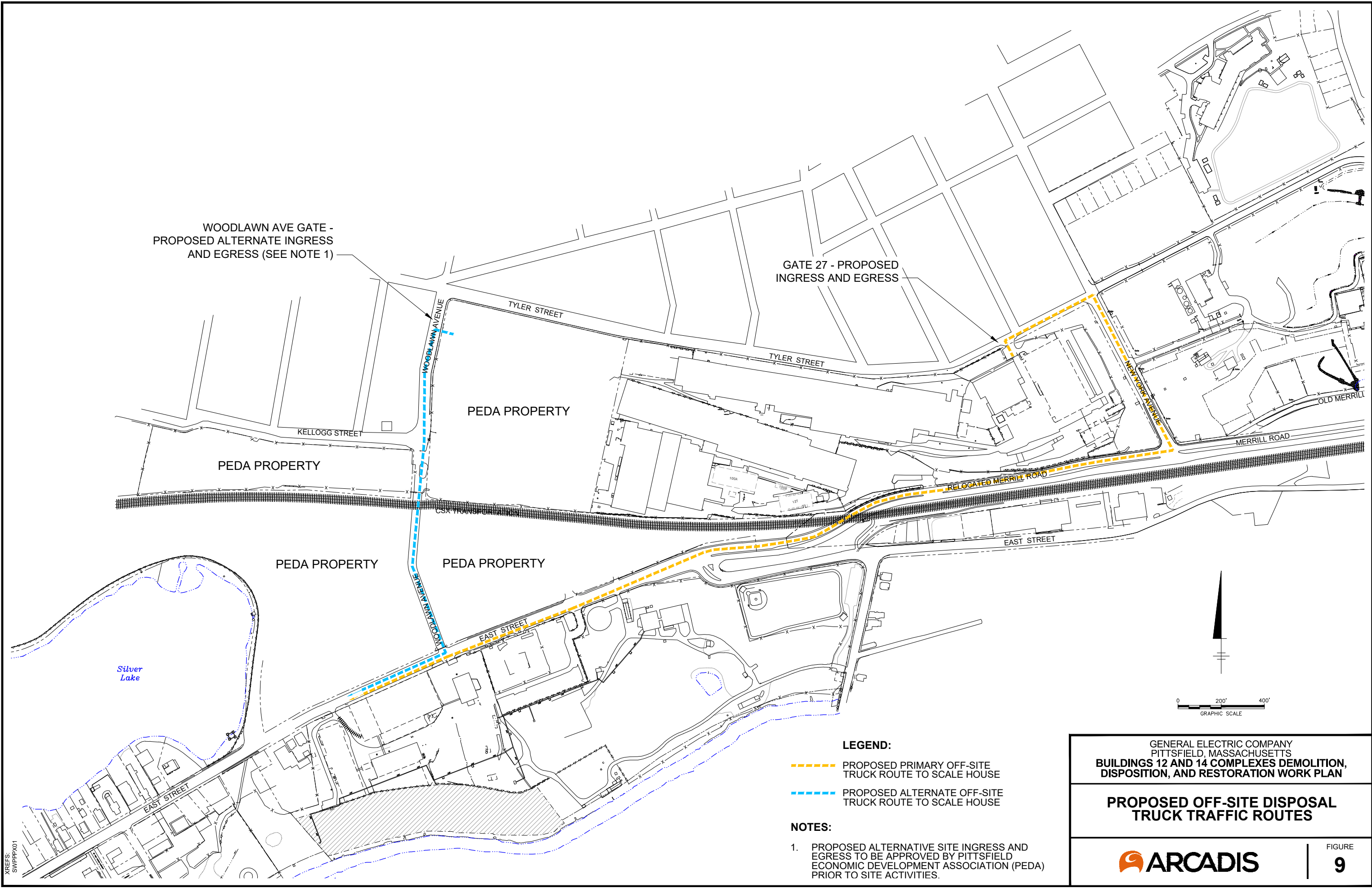
GENERAL NOTES

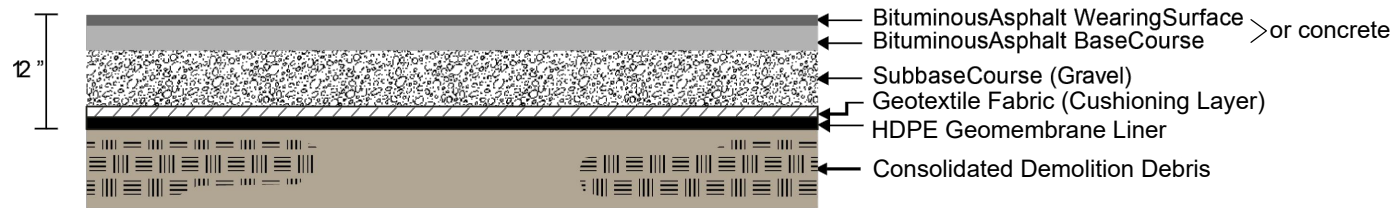


FIGURE

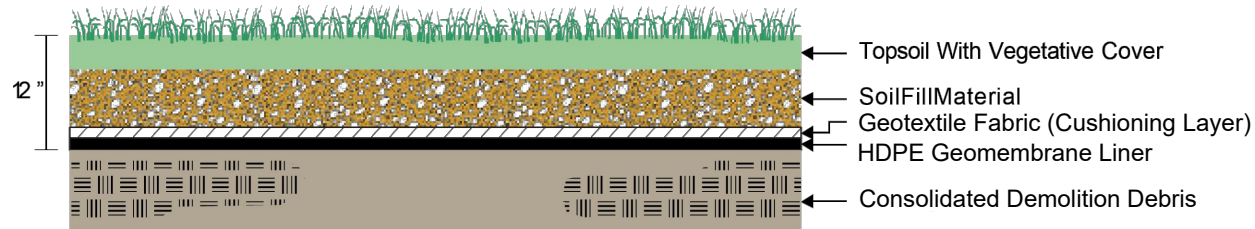
7







IMPERMEABLE ASPHALT OR CONCRETE COVER



IMPERMEABLE VEGETATIVE COVER

NOT TO SCALE

GENERAL ELECTRIC COMPANY
PITTSFIELD, MASSACHUSETTS
BUILDINGS 12 AND 14 COMPLEXES DEMOLITION,
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ENGINEERED BARRIERS-
CONCEPTUAL CROSS-SECTIONS



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