



75 State Street, Suite 701
Boston, Massachusetts 02109
tel: 617 452-6000

October 6, 2021

Boston Conservation Commission
1 City Hall Square, Room 709
Boston, Massachusetts 02201

Subject: Response to Comments on the Notice of Intent, DEP File No. 006-1821
Millennium Park Design Improvements
Applicant: Boston Parks and Recreation Department

Dear Ms. Oetheimer:

On behalf of the City of Boston (the City), CDM Smith Inc. (CDM Smith) is submitting responses to your comments on the Notice of Intent (NOI) for the Millennium Park Design Improvements. Your comments are provided in italics followed by our responses.

Comment #1: The Applicant name on the WPA 3 Form should read Ryan Woods, not Christopher Cook.

Response: See enclosed revised WPA 3 form page 1. We also revised and enclosed page 4 of the WPA form.

Comment #2: The Boston NOI form was not provided.

Response: See enclosed Boston NOI Form.

Comment #3: In addition to the narrative provided, we need the Stormwater Checklist. This must be signed and stamped by the engineer responsible for this project.

Response: The original and 1 copy of the Stormwater Checklist signed and stamped by Mary Mancini, P.E. are enclosed.

The site is being inspected and maintained in accordance with MassDEP post closure use requirements. We included the last inspection report submitted to MassDEP back in December 2020. We have also included copies of the MassDEP approvals for Post Closure Use and Conditional Plan Approval. These are approvals from MassDEP certifying that the site meets MassDEP guidelines to be constructed. Review of the existing stormwater management system was included under this approval. No changes to the existing stormwater management system is proposed under the NOI.

Comment #4: The plans provided need to be signed and stamped as well.





Boston Conservation Commission
October 7, 2021
Page 2

Response: 2 sets of signed and stamped plans are enclosed.

Comment #5: *The alternatives analysis for the Riverfront Area is not sufficient. It should include a more extensive analysis of alternatives other than the proposed project and the no build alternative.*

Response: Proposed work within the Riverfront Area consists of maintenance of the existing perimeter walking pathways. No new structures are proposed within the Riverfront Area. CDM Smith reviewed the following alternatives for the perimeter pathway repairs/maintenance. Keep in mind that all proposed maintenance work is within the impervious landfill cap.

No Action Alternative: This alternative would leave the degraded pavement within the perimeter walking pathways in their existing condition. This alternative does not meet the project purpose and was therefore eliminated from further consideration.

Adding 2 inches of topcoat overlay with limited tree root removal (Preferred Alternative): Under this alternative the walking pathways would receive 2 inches of a topcoat overlay with no disturbance to the existing pavement or existing dense graded base stone except for limited areas along the north park perimeter walking pathway. In these limited areas existing tree root systems have caused heaving in the existing pavement. In these areas, the existing pavement will need to be removed, and tree roots cut and removed by excavating 6 inches down prior to new pavement being installed. The proposed excavation would disturb the dense graded base stone other than to remove the tree roots. The areas where tree root removal is required are located at the edge of the existing landfill cap and care will need to be taken so there is less potential to damage or disturb the landfill cap from the proposed shallow excavations. A certified arborist will review these locations with the selected Contractor, Boston Parks representatives and CDM Smith prior to any pavement or root removal.

Full Removal and Replacement: Under this alternative, both the pavement and the dense graded base stone would be removed and replaced. This alternative would result in significant temporary disturbance to the Riverfront Area from heavy equipment access and temporary stockpiling of pavement and stone subgrade. It would also result in potential erosion and subsequent sediment accumulation in the Riverfront Area due to the excavation and exposure of underlying landfill drainage sand layers. This alternative was not selected due to the potential of disturbing the existing impervious landfill cap liner, drainage sand layers, and potential erosion and sedimentation to the adjacent Riverfront Area.

Comment #6: *The 100ft Buffer Zone is regulated under the local Ordinance. The text from the Ordinance regarding the Buffer Zone should be cited in the project narrative and the narrative should*



Boston Conservation Commission

October 7, 2021

Page 3

describe what mitigation measures will be in place to protect the interests associated with that resource area.

Response: "In reviewing activities within the Buffer Zone, the Commission shall presume the buffer zone is important to the protection of other resource areas because activities undertaken in close proximity have a reasonable probability of adverse impact, either immediately, as a consequence of construction, or over time, as a consequence of daily operation or existence of the activities. These adverse impacts from construction and use can include, without limitation, erosion, siltation, loss of groundwater recharge, poor water quality, loss of wildlife habitat, degradation of wetland plant habitat, alteration of hydrology, and proliferation of invasive plants. The Commission may establish, in its regulations, design specifications, performance standards, and other measures and safeguards, including setbacks, and other work limits for protection of such lands, including without limitation strips of continuous, undisturbed vegetative cover, unless the Commission determines, based on adequate evidence, that the buffer zone or part of it may be altered without harm to the values protected by the Ordinance".

The proposed work does not include any new construction as work is limited to maintenance of the perimeter walking pathway by adding 2 inches of top course overlay and limited pathway root removal. Additional work in the buffer zone consists of maintenance of the southern parking lot which will be repaved. Compost logs will be placed at the limits of work along the perimeter path where root removal is required to prevent sediment from entering the buffer zone and downgradient BVW. In these areas the existing pavement will need to be removed, and tree roots cut and removed by excavating max. 16 inches down prior to new pavement being installed. Compost logs will also be placed along the limit of work of southern parking lot which will receive milling of existing pavement and overlay with new pavement, and limited spot repairs.

Japanese knotweed treatment areas within the 100-ft buffer zone will be seeded with a landfill seed mixture upon completion of the second treatment in spring of 2022.

Comment #7: *Similarly, the text from the local Ordinance regarding the Waterfront Area should be cited in the project narrative as well.*

Response: The Buffer Zone is presumed important to the protection of the resource areas because activities undertaken in close proximity to resource areas have a reasonable probability of adverse impact upon the wetland or other resource, either immediately, as a consequence of construction, or over time, as a consequence of daily operation or existence of the activities. These adverse impacts from construction and use can include, without limitation, erosion, siltation, loss of groundwater



Boston Conservation Commission

October 7, 2021

Page 4

recharge, degraded water quality, loss of wildlife habitat, degradation of wetland plant habitat, alteration of hydrology, soil contamination, and proliferation of invasive plants. The Commission therefore may require that any person filing an application (hereinafter, the Applicant) restore or maintain a strip of continuous, undisturbed or restored vegetative cover or waterfront public access throughout the Waterfront Area, unless the Commission determines, based on adequate evidence, that the area or part of it may be altered without harm to the values of the resource areas protected by the Ordinance. Such disturbed areas must be minimized to the greatest extent possible."

The project site is a capped and closed landfill and the Waterfront Area on site consists of seeded landfill slope. Please refer to response under Comment #6 above.

Comment #8: *The discussion on climate change and resiliency in the project narrative was not sufficient. Please include a more detailed discussion on the consideration of the effect that changes in storm intensity and frequency, the urban heat island effect, and other consequences of climate change may have on the resource areas and proposed activities.*

Response: The entire site is a closed and capped landfill site (regulated by MassDEP) with an impervious liner designed to prevent contamination of the resource areas by landfill materials beneath the cap. The goal of the original project was to move stormwater off the cap. Infiltration is not possible in the form of rain gardens, additional stormwater basins or other GI techniques. The proposed project consists of maintenance and repair with no new construction and no new impervious area proposed. Since the park is built on a capped landfill, there is limited opportunities to enhance the climate resiliency of the site however BPRD is proposing new tree and shrub plantings (see Sheet C-6: Playground Planting) as part of the new playground (which is outside of the Boston Conservation Commission's jurisdiction) which will help the heat island effect by providing evapotranspiration.

Comment #9: *More detail on the means and methods of work is also required in the project narrative. Specifically, the Commission will likely want to see more detail about the aerial spraying of herbicides that is being proposed and how the impacts to the resources areas from that spraying will be mitigated.*

Response: As stated in the NOI, proposed work also includes the permanent removal of several patches of Japanese knotweed (*Polygonum japonicum*) within the 100-ft buffer zone and waterfront Area using the herbicide TZone plus methylated seed oil for surface penetration (see Materials Safety Data Sheet and knotweed removal plan in Attachment C on the NOI). Barrett Tree has been contracted by the BPRD to perform the targeted herbicide application once this fall and then in the



Boston Conservation Commission

October 7, 2021

Page 5

Spring of 2022 when the knotweed is in bloom. The herbicide will be applied using handheld or backpack sprayers. No aerial spraying is proposed. Treatment areas will be seeded with a wetland seed mixture or a landfill seed mixture upon completion of the second treatment in spring of 2022.

The limited root removal along the perimeter walking pathways will use a two-step process described below. Note that all tree root removal will be done under the supervision of a Certified Arborist.

Step 1: Mark the limit of excavation for tree root removal with wood stakes. Depth of excavation will be 10 inches for pavement removal and 6 inches within the dense graded sub stone base. Root removal would only occur within the staked area.

Step 2: Roots will be removed using a root pruner, Air Spade, hydro excavation, and/or hand excavation.

Tree roots will be covered with damp burlap until excavation is backfilled and roots are covered with soil to avoid exposed tree roots to dry out. Damaged tree roots shall be flush cut back to uninjured tissue. No jagged cuts will be permitted.

Comment #10: Based on the 2021 maps, the project location is within NHESP Priority Habitat.

Response: There will be no alteration of Estimated nor Priority Habitats from the proposed paving program as all work is located outside of mapped protected habitats. However, the knotweed treatment program is partially located within the mapped polygon. A 30-day streamlined WPA/MESA review will be requested with the Massachusetts Natural Heritage & Endangered Species Program (NHESP).

Please contact me at (617) 452-6597 if you have any questions. Thank you in advance for your attention to this matter.

Very truly yours,

A handwritten signature in blue ink, appearing to read "Glen Howard". The signature is fluid and cursive, written over a white background.

Glen Howard
Project Manager



Boston Conservation Commission
October 7, 2021
Page 6

CDM Smith Inc.

cc: Ryan Woods, BPRD

Enclosures

- Revised WPA 3 Form, pages 1 and 4
- Local Notice of Intent Form
- Stormwater Checklist
- Project Plans

Revised pages 1 and 4 of WPA 3 Form

Massachusetts Department of Environmental Protection

Bureau of Resource Protection - Wetlands

WPA Form 3 - Notice of Intent

Massachusetts Wetlands Protection Act M.G.L. c. 131, §40

Provided by MassDEP:
MassDEP File #:
eDEP Transaction #:1289634
City/Town:BOSTON

A.General Information

1. Project Location:

a. Street Address GARDNER STREET
b. City/Town BOSTON c. Zip Code 02132
d. Latitude 42.28300N e. Longitude 71.18496W
f. Map/Plat # 2009010010 g.Parcel/Lot # N/A

2. Applicant:

Individual Organization

a. First Name RYAN b.Last Name WOODS
c. Organization BOSTON PARKS AND RECREATION DEPARTMENT
d. Mailing Address 1010 MASSACHUSETTS AVENUE, 3RD FLOOR
e. City/Town BOSTON f. State MA g. Zip Code 02118
h. Phone Number i. Fax j. Email

3.Property Owner:

more than one owner

a. First Name CHRISTOPHER b. Last Name COOK
c. Organization BOSTON PARKS AND RECREATION DEPARTMENT
d. Mailing Address 1010 MASSACHUSETTS AVENUE, 3RD FLOOR
e. City/Town BOSTON f.State MA g. Zip Code 02118
h. Phone Number i. Fax j.Email

4.Representative:

a. First Name GLEN b. Last Name HOWARD
c. Organization CDM SMITH INC.
d. Mailing Address 75 STATE STREET, SUITE 701
e. City/Town BOSTON f. State MA g. Zip Code 02109
h.Phone Number 617-452-6630 i.Fax 617-345-3901 j.Email HOWARDGD@cdmsmith.com

5.Total WPA Fee Paid (Automatically inserted from NOI Wetland Fee Transmittal Form):

a.Total Fee Paid b.State Fee Paid c.City/Town Fee Paid

6.General Project Description:

REPLACE EXISTING PAVING OR MILLING AND OVERLAYING EXISTING PAVEMENT WITHIN THE LIMITS OF THE EXISTING PAVED ACCESS ROADWAYS, PARKING AREAS, AND RE-SETTING EXISTING GRANITE CURB. ADD 2 INCHES OF TOP COURSE OVERLAY ON WALKING PATHS.

7a.Project Type:

- 1. Single Family Home 2. Residential Subdivision
3. Limited Project Driveway Crossing 4. Commercial/Industrial
5. Dock/Pier 6. Utilities
7. Coastal Engineering Structure 8. Agriculture (eg., cranberries, forestry)
9. Transportation 10. Other

Massachusetts Department of Environmental Protection
Bureau of Resource Protection - Wetlands
WPA Form 3 - Notice of Intent
Massachusetts Wetlands Protection Act M.G.L. c. 131, §40

Provided by MassDEP:
MassDEP File #:
eDEP Transaction #:1289634
City/Town:BOSTON

Project Involves Stream Crossings

If the project involves Stream Crossings, please enter the number of new stream crossings/number of replacement stream crossings.

a. number of new stream crossings

b. number of replacement stream crossings

C. Other Applicable Standards and Requirements

Streamlined Massachusetts Endangered Species Act/Wetlands Protection Act Review

1. Is any portion of the proposed project located in **Estimated Habitat of Rare Wildlife** as indicated on the most recent Estimated Habitat Map of State-Listed Rare Wetland Wildlife published by the Natural Heritage of Endangered Species program (NHESP)?

a. Yes No

If yes, include proof of mailing or hand delivery of NOI to:
Natural Heritage and Endangered Species
Program
Division of Fisheries and Wildlife
1 Rabbit Hill Road
Westborough, MA 01581

b. Date of map: October 6, 2021

If yes, the project is also subject to Massachusetts Endangered Species Act (MESA) review (321 CMR 10.18)...

c. Submit Supplemental Information for Endangered Species Review * (Check boxes as they apply)

1. Percentage/acreage of property to be altered: Parcel size is 362,420 sf (8.3 acres)
(a) within Wetland Resource Area 1,850 sf percentage/acreage 0.5% (0.04 acre)
(b) outside Resource Area 6,094 sf percentage/acreage 1.7% (0.14 acre)

2. Assessor's Map or right-of-way plan of site

3. Project plans for entire project site, including wetland resource areas and areas outside of wetland jurisdiction, showing existing and proposed conditions, existing and proposed tree/vegetation clearing line, and clearly demarcated limits of work **

a. Project description (including description of impacts outside of wetland resource area & buffer zone)

b. Photographs representative of the site

c. MESA filing fee (fee information available at: <http://www.mass.gov/eea/agencies/dfg/dfw/natural-heritage/regulatory-review/mass-endangered-species-act-mesa/mesa-fee-schedule.html>)

Make check payable to "Natural Heritage & Endangered Species Fund" and **mail to NHESP** at above address

Projects altering 10 or more acres of land, also submit:

d. Vegetation cover type map of site

e. Project plans showing Priority & Estimated Habitat boundaries

d. OR Check One of the following

1. Project is exempt from MESA review. Attach applicant letter indicating which MESA exemption applies. (See 321 CMR 10.14, <http://www.mass.gov/eea/agencies/dfg/dfw/laws-regulations/cmr/321-cmr-1000-massachusetts-endangered-species-act.html#10.14>; the NOI must still be sent to NHESP if the project is within estimated habitat pursuant to 310 CMR 10.37 and 10.59.)

2. Separate MESA review ongoing.

a. NHESP Tracking Number

Local Notice of Intent Form



A. GENERAL INFORMATION

1. Project Location

<u>Gardner Street</u>	<u>Boston</u>	<u>02132</u>
a. Street Address	b. City/Town	c. Zip Code
<u>42.28300</u>	<u>71.18496</u>	
f. Assessors Map/Plat Number	g. Parcel /Lot Number	

2. Applicant

<u>Ryan</u>	<u>Woods</u>	<u>Boston Parks and Recreation Department</u>
a. First Name	b. Last Name	c. Company
<u>1010 Massachusetts Avenue, 3rd Floor</u>		
d. Mailing Address		
<u>Boston</u>	<u>MA</u>	<u>02118</u>
e. City/Town	f. State	g. Zip Code
<u>617-635-4505</u>		<u>ryan.woods@boston.gov</u>
h. Phone Number	i. Fax Number	j. Email address

3. Property Owner

<u>City of Boston (same as above)</u>		
a. First Name	b. Last Name	c. Company
d. Mailing Address		
e. City/Town	f. State	g. Zip Code
h. Phone Number	i. Fax Number	j. Email address

Check if more than one owner

(If there is more than one property owner, please attach a list of these property owners to this form.)

4. Representative (if any)

<u>Glenn</u>	<u>Howard</u>	<u>CDM Smith Inc.</u>
a. First Name	b. Last Name	c. Company
<u>75 State Street, Suite 701</u>		
d. Mailing Address		
<u>Boston</u>	<u>MA</u>	<u>02108</u>
e. City/Town	f. State	g. Zip Code
<u>617-452-6630</u>		<u>howardgd@cdmsmith.com</u>
h. Phone Number	i. Fax Number	j. Email address



5. Is any portion of the proposed project jurisdictional under the Massachusetts Wetlands Protection Act M.G.L. c. 131 §40?

- Yes No

If yes, please file the WPA Form 3 - Notice of Intent with this form

6. General Information

Replace existing paving or milling and overlaying existing pavement within the limits of the existing paved access roadways, parking areas, and re-setting existing granite curb. Add 2 inches of top course overlay on walking paths. Proposed work also includes the permanent removal of several patches Japanese knotweed (*Polygonum japonicum*) within the 100-ft buffer zone using the herbicide TZone plus methylated seed oil for surface penetration.

7. Project Type Checklist

- a. Single Family Home
- b. Residential Subdivision
- c. Limited Project Driveway Crossing
- d. Commercial/Industrial
- e. Dock/Pier
- f. Utilities
- g. Coastal Engineering Structure
- h. Agriculture – cranberries, forestry
- i. Transportation
- j. Other

8. Property recorded at the Registry of Deeds

Suffolk

a. County

Parcel ID: 2009010010

c. Book

b. Page Number

d. Certificate # (if registered land)

9. Total Fee Paid

N/A

a. Total Fee Paid

N/A

b. State Fee Paid

N/A

c. City Fee Paid

B. BUFFER ZONE & RESOURCE AREA IMPACTS

Buffer Zone Only - Is the project located only in the Buffer Zone of a resource area protected by the Boston Wetlands Ordinance?

- Yes No

1. Coastal Resource Areas



<u>Resource Area</u>	<u>Resource Area Size</u>	<u>Proposed Alteration*</u>	<u>Proposed Mitigation</u>
<input type="checkbox"/> Coastal Flood Resilience Zone	_____ Square feet	_____ Square feet	_____ Square feet
<input type="checkbox"/> 25-foot Waterfront Area	_____ Square feet	_____ Square feet	_____ Square feet
<input type="checkbox"/> 100-foot Salt Marsh Area	_____ Square feet	_____ Square feet	_____ Square feet
<input type="checkbox"/> Riverfront Area	_____ Square feet	_____ Square feet	_____ Square feet

2. Inland Resource Areas

<u>Resource Area</u>	<u>Resource Area Size</u>	<u>Proposed Alteration*</u>	<u>Proposed Mitigation</u>
<input type="checkbox"/> Inland Flood Resilience Zone	_____ Square feet	_____ Square feet	_____ Square feet
<input type="checkbox"/> Isolated Wetlands	_____ Square feet	_____ Square feet	_____ Square feet
<input type="checkbox"/> Vernal Pool	_____ Square feet	_____ Square feet	_____ Square feet
<input type="checkbox"/> Vernal Pool Habitat (vernal pool + 100 ft. upland area)	_____ Square feet	_____ Square feet	_____ Square feet
<input checked="" type="checkbox"/> 25-foot Waterfront Area	App. 180,000 _____ Square feet	31,557 _____ Square feet	31,557 _____ Square feet
<input checked="" type="checkbox"/> Riverfront Area	72,200 _____ Square feet	21,184 _____ Square feet	21,184 _____ Square feet

C. OTHER APPLICABLE STANDARDS & REQUIREMENTS

1. What other permits, variances, or approvals are required for the proposed activity described herein and what is the status of such permits, variances, or approvals?

MassDEP SW36 Major Modification Permit - preapplication meeting

held with MassDEP. Application to be submitted in Oct. 2021



- 2. Is any portion of the proposed project located in Estimated Habitat of Rare Wildlife as indicated on the most recent Estimated Habitat Map of State-Listed Rare Wetland Wildlife published by the Natural Heritage and Endangered Species Program (NHESP)? To view habitat maps, see the Massachusetts Natural Heritage Atlas or go to <http://www.mass.gov/dfwele/dfw/nhosp/nhregmap.htm>.

Yes No

If yes, the project is subject to Massachusetts Endangered Species Act (MESA) review (321 CMR 10.18).

A. Submit Supplemental Information for Endangered Species Review

<input checked="" type="checkbox"/>	Percentage/acreage of property to be altered:	
	(1) within wetland Resource Area	0.5% (0.04 acre)
		percentage/acreage
	(2) outside Resource Area	1.7% (0.14 acre)
		percentage/acreage

Assessor's Map or right-of-way plan of site

- 3. Is any portion of the proposed project within an Area of Critical Environmental Concern?

Yes No

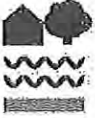
If yes, provide the name of the ACEC: _____

- 4. Is the proposed project subject to provisions of the Massachusetts Stormwater Management Standards?

- Yes. Attach a copy of the Stormwater Checklist & Stormwater Report as required.
 - Applying for a Low Impact Development (LID) site design credits
 - A portion of the site constitutes redevelopment
 - Proprietary BMPs are included in the Stormwater Management System
- No. Check below & include a narrative as to why the project is exempt
 - Single-family house
 - Emergency road repair
 - Small Residential Subdivision (less than or equal to 4 single family houses or less than or equal to 4 units in a multifamily housing projects) with no discharge to Critical Areas

- 5. Is the proposed project subject to Boston Water and Sewer Commission Review?

Yes No



D. SIGNATURES AND SUBMITTAL REQUIREMENTS

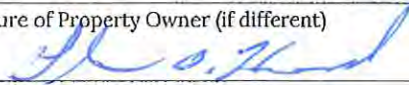
I hereby certify under the penalties of perjury that the foregoing Notice of Intent and accompanying plans, documents, and supporting data are true and complete to the best of my knowledge. I understand that the Conservation Commission will place notification of this Notice in a local newspaper at the expense of the applicant in accordance with the Wetlands Protection Ordinance.

 Ryan Woods, Commissioner
Signature of Applicant

10/7/2021
Date

Signature of Property Owner (if different)

Date


Signature of Representative (if any)

10/7/2021
Date

Stormwater Checklist



Checklist for Stormwater Report

A. Introduction

Important: When filling out forms on the computer, use only the tab key to move your cursor - do not use the return key.



A Stormwater Report must be submitted with the Notice of Intent permit application to document compliance with the Stormwater Management Standards. The following checklist is NOT a substitute for the Stormwater Report (which should provide more substantive and detailed information) but is offered here as a tool to help the applicant organize their Stormwater Management documentation for their Report and for the reviewer to assess this information in a consistent format. As noted in the Checklist, the Stormwater Report must contain the engineering computations and supporting information set forth in Volume 3 of the [Massachusetts Stormwater Handbook](#). The Stormwater Report must be prepared and certified by a Registered Professional Engineer (RPE) licensed in the Commonwealth.

The Stormwater Report must include:

- The Stormwater Checklist completed and stamped by a Registered Professional Engineer (see page 2) that certifies that the Stormwater Report contains all required submittals.¹ This Checklist is to be used as the cover for the completed Stormwater Report.
- Applicant/Project Name
- Project Address
- Name of Firm and Registered Professional Engineer that prepared the Report
- Long-Term Pollution Prevention Plan required by Standards 4-6
- Construction Period Pollution Prevention and Erosion and Sedimentation Control Plan required by Standard 8²
- Operation and Maintenance Plan required by Standard 9

In addition to all plans and supporting information, the Stormwater Report must include a brief narrative describing stormwater management practices, including environmentally sensitive site design and LID techniques, along with a diagram depicting runoff through the proposed BMP treatment train. Plans are required to show existing and proposed conditions, identify all wetland resource areas, NRCS soil types, critical areas, Land Uses with Higher Potential Pollutant Loads (LUHPPL), and any areas on the site where infiltration rate is greater than 2.4 inches per hour. The Plans shall identify the drainage areas for both existing and proposed conditions at a scale that enables verification of supporting calculations.

As noted in the Checklist, the Stormwater Management Report shall document compliance with each of the Stormwater Management Standards as provided in the Massachusetts Stormwater Handbook. The soils evaluation and calculations shall be done using the methodologies set forth in Volume 3 of the Massachusetts Stormwater Handbook.

To ensure that the Stormwater Report is complete, applicants are required to fill in the Stormwater Report Checklist by checking the box to indicate that the specified information has been included in the Stormwater Report. If any of the information specified in the checklist has not been submitted, the applicant must provide an explanation. The completed Stormwater Report Checklist and Certification must be submitted with the Stormwater Report.

¹ The Stormwater Report may also include the Illicit Discharge Compliance Statement required by Standard 10. If not included in the Stormwater Report, the Illicit Discharge Compliance Statement must be submitted prior to the discharge of stormwater runoff to the post-construction best management practices.

² For some complex projects, it may not be possible to include the Construction Period Erosion and Sedimentation Control Plan in the Stormwater Report. In that event, the issuing authority has the discretion to issue an Order of Conditions that approves the project and includes a condition requiring the proponent to submit the Construction Period Erosion and Sedimentation Control Plan before commencing any land disturbance activity on the site.



Checklist for Stormwater Report

B. Stormwater Checklist and Certification

The following checklist is intended to serve as a guide for applicants as to the elements that ordinarily need to be addressed in a complete Stormwater Report. The checklist is also intended to provide conservation commissions and other reviewing authorities with a summary of the components necessary for a comprehensive Stormwater Report that addresses the ten Stormwater Standards.

Note: Because stormwater requirements vary from project to project, it is possible that a complete Stormwater Report may not include information on some of the subjects specified in the Checklist. If it is determined that a specific item does not apply to the project under review, please note that the item is not applicable (N.A.) and provide the reasons for that determination.

A complete checklist must include the Certification set forth below signed by the Registered Professional Engineer who prepared the Stormwater Report.

Registered Professional Engineer's Certification

I have reviewed the Stormwater Report, including the soil evaluation, computations, Long-term Pollution Prevention Plan, the Construction Period Erosion and Sedimentation Control Plan (if included), the Long-term Post-Construction Operation and Maintenance Plan, the Illicit Discharge Compliance Statement (if included) and the plans showing the stormwater management system, and have determined that they have been prepared in accordance with the requirements of the Stormwater Management Standards as further elaborated by the Massachusetts Stormwater Handbook. I have also determined that the information presented in the Stormwater Checklist is accurate and that the information presented in the Stormwater Report accurately reflects conditions at the site as of the date of this permit application.

Registered Professional Engineer Block and Signature



Mary C Mancini 10/7/2021
Signature and Date

Checklist

Project Type: Is the application for new development, redevelopment, or a mix of new and redevelopment?

- New development
- Redevelopment
- Mix of New Development and Redevelopment



Checklist for Stormwater Report

Checklist (continued)

LID Measures: Stormwater Standards require LID measures to be considered. Document what environmentally sensitive design and LID Techniques were considered during the planning and design of the project:

- No disturbance to any Wetland Resource Areas
- Site Design Practices (e.g. clustered development, reduced frontage setbacks)
- Reduced Impervious Area (Redevelopment Only)
- Minimizing disturbance to existing trees and shrubs
- LID Site Design Credit Requested:
 - Credit 1
 - Credit 2
 - Credit 3
- Use of “country drainage” versus curb and gutter conveyance and pipe
- Bioretention Cells (includes Rain Gardens)
- Constructed Stormwater Wetlands (includes Gravel Wetlands designs)
- Treebox Filter
- Water Quality Swale
- Grass Channel
- Green Roof
- Other (describe): _____
No new impervious areas, only redevelopment of existing impervious areas on top of closed landfill cap in accordance with MassDEP Solid Waste Regulations 310 CMR 19.000.

Standard 1: No New Untreated Discharges

- No new untreated discharges
- Outlets have been designed so there is no erosion or scour to wetlands and waters of the Commonwealth
- Supporting calculations specified in Volume 3 of the Massachusetts Stormwater Handbook included.



Checklist for Stormwater Report

DOES NOT APPLY, NO CHANGES TO STORMWATER RUNOFF SITE
STORMWATER DESIGNED FOR 25-YEAR STORM PER MassDEP SOLID
WASTE REGULATIONS

Checklist (continued)

Standard 2: Peak Rate Attenuation

- Standard 2 waiver requested because the project is located in land subject to coastal storm flowage and stormwater discharge is to a wetland subject to coastal flooding.
- Evaluation provided to determine whether off-site flooding increases during the 100-year 24-hour storm.
- Calculations provided to show that post-development peak discharge rates do not exceed pre-development rates for the 2-year and 10-year 24-hour storms. If evaluation shows that off-site flooding increases during the 100-year 24-hour storm, calculations are also provided to show that post-development peak discharge rates do not exceed pre-development rates for the 100-year 24-hour storm.

Standard 3: Recharge

- Soil Analysis provided.
- Required Recharge Volume calculation provided.
- Required Recharge volume reduced through use of the LID site Design Credits.
- Sizing the infiltration, BMPs is based on the following method: Check the method used.
 - Static
 - Simple Dynamic
 - Dynamic Field¹
- Runoff from all impervious areas at the site discharging to the infiltration BMP.
- Runoff from all impervious areas at the site is *not* discharging to the infiltration BMP and calculations are provided showing that the drainage area contributing runoff to the infiltration BMPs is sufficient to generate the required recharge volume.
- Recharge BMPs have been sized to infiltrate the Required Recharge Volume.
- Recharge BMPs have been sized to infiltrate the Required Recharge Volume *only* to the maximum extent practicable for the following reason:
 - Site is comprised solely of C and D soils and/or bedrock at the land surface
 - M.G.L. c. 21E sites pursuant to 310 CMR 40.0000
 - Solid Waste Landfill pursuant to 310 CMR 19.000
 - Project is otherwise subject to Stormwater Management Standards only to the maximum extent practicable.
- Calculations showing that the infiltration BMPs will drain in 72 hours are provided.
- Property includes a M.G.L. c. 21E site or a solid waste landfill and a mounding analysis is included.

¹ 80% TSS removal is required prior to discharge to infiltration BMP if Dynamic Field method is used.



Checklist for Stormwater Report

Checklist (continued)

Standard 3: Recharge (continued)

- The infiltration BMP is used to attenuate peak flows during storms greater than or equal to the 10-year 24-hour storm and separation to seasonal high groundwater is less than 4 feet and a mounding analysis is provided.
- Documentation is provided showing that infiltration BMPs do not adversely impact nearby wetland resource areas.

Standard 4: Water Quality

The Long-Term Pollution Prevention Plan typically includes the following:

- Good housekeeping practices;
 - Provisions for storing materials and waste products inside or under cover;
 - Vehicle washing controls;
 - Requirements for routine inspections and maintenance of stormwater BMPs;
 - Spill prevention and response plans;
 - Provisions for maintenance of lawns, gardens, and other landscaped areas;
 - Requirements for storage and use of fertilizers, herbicides, and pesticides;
 - Pet waste management provisions;
 - Provisions for operation and management of septic systems;
 - Provisions for solid waste management;
 - Snow disposal and plowing plans relative to Wetland Resource Areas;
 - Winter Road Salt and/or Sand Use and Storage restrictions;
 - Street sweeping schedules;
 - Provisions for prevention of illicit discharges to the stormwater management system;
 - Documentation that Stormwater BMPs are designed to provide for shutdown and containment in the event of a spill or discharges to or near critical areas or from LUHPPL;
 - Training for staff or personnel involved with implementing Long-Term Pollution Prevention Plan;
 - List of Emergency contacts for implementing Long-Term Pollution Prevention Plan.
- A Long-Term Pollution Prevention Plan is attached to Stormwater Report and is included as an attachment to the Wetlands Notice of Intent.
 - Treatment BMPs subject to the 44% TSS removal pretreatment requirement and the one inch rule for calculating the water quality volume are included, and discharge:
 - is within the Zone II or Interim Wellhead Protection Area
 - is near or to other critical areas
 - is within soils with a rapid infiltration rate (greater than 2.4 inches per hour)
 - involves runoff from land uses with higher potential pollutant loads.
 - The Required Water Quality Volume is reduced through use of the LID site Design Credits.
 - Calculations documenting that the treatment train meets the 80% TSS removal requirement and, if applicable, the 44% TSS removal pretreatment requirement, are provided.

SITE IS MONITORED FOR POLLUTION PER POST CLOSURE MONITORING REQUIREMENTS UNDER MassDEP SOLID WASTE REGULATIONS 310 CMR 19.000.



Checklist for Stormwater Report

Checklist (continued)

Standard 4: Water Quality (continued)

- The BMP is sized (and calculations provided) based on:
 - The ½" or 1" Water Quality Volume or
 - The equivalent flow rate associated with the Water Quality Volume and documentation is provided showing that the BMP treats the required water quality volume.
- The applicant proposes to use proprietary BMPs, and documentation supporting use of proprietary BMP and proposed TSS removal rate is provided. This documentation may be in the form of the propriety BMP checklist found in Volume 2, Chapter 4 of the Massachusetts Stormwater Handbook and submitting copies of the TARP Report, STEP Report, and/or other third party studies verifying performance of the proprietary BMPs.
- A TMDL exists that indicates a need to reduce pollutants other than TSS and documentation showing that the BMPs selected are consistent with the TMDL is provided.

Standard 5: Land Uses With Higher Potential Pollutant Loads (LUHPPLs)

- The NPDES Multi-Sector General Permit covers the land use and the Stormwater Pollution Prevention Plan (SWPPP) has been included with the Stormwater Report.
- The NPDES Multi-Sector General Permit covers the land use and the SWPPP will be submitted **prior to** the discharge of stormwater to the post-construction stormwater BMPs.
- The NPDES Multi-Sector General Permit does **not** cover the land use.
- LUHPPLs are located at the site and industry specific source control and pollution prevention measures have been proposed to reduce or eliminate the exposure of LUHPPLs to rain, snow, snow melt and runoff, and been included in the long term Pollution Prevention Plan.
- All exposure has been eliminated.
- All exposure has **not** been eliminated and all BMPs selected are on MassDEP LUHPPL list.
- The LUHPPL has the potential to generate runoff with moderate to higher concentrations of oil and grease (e.g. all parking lots with >1000 vehicle trips per day) and the treatment train includes an oil grit separator, a filtering bioretention area, a sand filter or equivalent.

Standard 6: Critical Areas

- The discharge is near or to a critical area and the treatment train includes only BMPs that MassDEP has approved for stormwater discharges to or near that particular class of critical area.
- Critical areas and BMPs are identified in the Stormwater Report.

DOES NOT APPLY TO STANDARDS 5 & 6, NO CHANGES TO STORMWATER RUNOFF CLOSED LANDFILL SITE PER MassDEP SOLID WASTE REGULATIONS 310 CMR 19.000.



Checklist for Stormwater Report

Checklist (continued)

Standard 7: Redevelopments and Other Projects Subject to the Standards only to the maximum extent practicable

- The project is subject to the Stormwater Management Standards only to the maximum Extent Practicable as a:
 - Limited Project
 - Small Residential Projects: 5-9 single family houses or 5-9 units in a multi-family development provided there is no discharge that may potentially affect a critical area.
 - Small Residential Projects: 2-4 single family houses or 2-4 units in a multi-family development with a discharge to a critical area
 - Marina and/or boatyard provided the hull painting, service and maintenance areas are protected from exposure to rain, snow, snow melt and runoff
 - Bike Path and/or Foot Path
 - Redevelopment Project
 - Redevelopment portion of mix of new and redevelopment.
- Certain standards are not fully met (Standard No. 1, 8, 9, and 10 must always be fully met) and an explanation of why these standards are not met is contained in the Stormwater Report.
- The project involves redevelopment and a description of all measures that have been taken to improve existing conditions is provided in the Stormwater Report. The redevelopment checklist found in Volume 2 Chapter 3 of the Massachusetts Stormwater Handbook may be used to document that the proposed stormwater management system (a) complies with Standards 2, 3 and the pretreatment and structural BMP requirements of Standards 4-6 to the maximum extent practicable and (b) improves existing conditions.

Standard 8: Construction Period Pollution Prevention and Erosion and Sedimentation Control

A Construction Period Pollution Prevention and Erosion and Sedimentation Control Plan must include the following information:

- Narrative;
 - Construction Period Operation and Maintenance Plan;
 - Names of Persons or Entity Responsible for Plan Compliance;
 - Construction Period Pollution Prevention Measures;
 - Erosion and Sedimentation Control Plan Drawings;
 - Detail drawings and specifications for erosion control BMPs, including sizing calculations;
 - Vegetation Planning;
 - Site Development Plan;
 - Construction Sequencing Plan;
 - Sequencing of Erosion and Sedimentation Controls;
 - Operation and Maintenance of Erosion and Sedimentation Controls;
 - Inspection Schedule;
 - Maintenance Schedule;
 - Inspection and Maintenance Log Form.
- A Construction Period Pollution Prevention and Erosion and Sedimentation Control Plan containing the information set forth above has been included in the Stormwater Report.



Checklist for Stormwater Report

Checklist (continued)

Standard 8: Construction Period Pollution Prevention and Erosion and Sedimentation Control (continued)

- The project is highly complex and information is included in the Stormwater Report that explains why it is not possible to submit the Construction Period Pollution Prevention and Erosion and Sedimentation Control Plan with the application. A Construction Period Pollution Prevention and Erosion and Sedimentation Control has **not** been included in the Stormwater Report but will be submitted **before** land disturbance begins.
- The project is **not** covered by a NPDES Construction General Permit.
- The project is covered by a NPDES Construction General Permit and a copy of the SWPPP is in the Stormwater Report.
- The project is covered by a NPDES Construction General Permit but no SWPPP been submitted. The SWPPP will be submitted BEFORE land disturbance begins.

Standard 9: Operation and Maintenance Plan

- The Post Construction Operation and Maintenance Plan is included in the Stormwater Report and includes the following information:
 - Name of the stormwater management system owners;
 - Party responsible for operation and maintenance;
 - Schedule for implementation of routine and non-routine maintenance tasks;
 - Plan showing the location of all stormwater BMPs maintenance access areas;
 - Description and delineation of public safety features;
 - Estimated operation and maintenance budget; and
 - Operation and Maintenance Log Form.
- The responsible party is **not** the owner of the parcel where the BMP is located and the Stormwater Report includes the following submissions:
 - A copy of the legal instrument (deed, homeowner's association, utility trust or other legal entity) that establishes the terms of and legal responsibility for the operation and maintenance of the project site stormwater BMPs;
 - A plan and easement deed that allows site access for the legal entity to operate and maintain BMP functions.

Standard 10: Prohibition of Illicit Discharges

- The Long-Term Pollution Prevention Plan includes measures to prevent illicit discharges;
- An Illicit Discharge Compliance Statement is attached;
- NO Illicit Discharge Compliance Statement is attached but will be submitted **prior to** the discharge of any stormwater to post-construction BMPs.

Post Closure Use Approval Document

COMMONWEALTH OF MASSACHUSETTS
EXECUTIVE OFFICE OF ENVIRONMENTAL AFFAIRS
DEPARTMENT OF ENVIRONMENTAL PROTECTION
Metropolitan Boston – Northeast Regional Office

to files

ARGEO PAUL CELLUCCI
Governor

JANE SWIFT
Lieutenant Governor

BOB DURAND
Secretary

EDWARD P. KUNCE
Acting Commissioner

March 30, 1999

Joseph Casazza, Commissioner
Public Works Department
City of Boston
One City Hall Square
Boston, MA 02201

Re: BOSTON - Gardner St. Landfill
Post Closure Use Approval
Transmittal # P22410
FMF No.: 282467

Dear Mr. Casazza:

The Department of Environmental Protection, Northeast Regional Office (the "Department") is in receipt of the application for approval of the post closure use of the Gardner St. Landfill in the West Roxbury section of Boston (BWP SW 36, Post Closure Use - Major, Transmittal Number P22410). The Department is also in receipt of an engineering report and final engineering plans submitted on the City of Boston's (the "City") behalf by Camp Dresser & McKee, Inc. which was received by this office on February 3, 1999 which are titled:

City of Boston Massachusetts
Gardner Street
Post Closure Design Report
December 1998

and

City of Boston, Massachusetts
Gardner Street Landfill
Closure and Park Project
December, 1998

This project will consist of capping the entire 77 acres of the landfill and developing the entire site as a public recreational facility. The work will commence in the Spring of this year and is anticipated to be completed in November of 2000.

The closure of the landfill is occurring in three separate phases. The Site Preparation portion of the project consisted of waste relocation/site grading, placement and compaction of Central CA/T excavate, installation of 58 landfill gas extraction wells and installation of erosion and stormwater control measures at the site. The Site Preparation phase was approved by the Department in a letter dated July 15, 1997. The work was completed in October 1998. The second phase consisted of the delivery and preload stockpiling of 150,000 tons of coarse sand at the landfill site. In addition, ten (10) settlement monitoring platforms were installed prior to placement of the preload sand stockpiles. The third phase, will consist of capping 77 acres of the landfill site and develop the closed site as a public recreational facility.

The landfill cap was approved by the Department on March 3, 1998 and will consist of 8 inches of high organic content topsoil, 12 inches minimum of coarse sand (drainage layer), 40 mil thick HDPE barrier layer, and a gas vent layer. The City is currently requesting a reduction of the 6 inch gas venting layer to 4 inches since the majority of the site had a 5 to 25 foot layer of compacted CA/T material placed above the existing solid waste during the Site Preparation phase of the project and the site will have an active landfill gas control system. On October 29, 1998, the Department conditionally approved the final plans for the flare associated with the active gas collection system

The post closure facilities will consist of open lawn areas for multiple-use sports fields, parking, walking/jogging/bike pathways, nature study areas, children play areas, picnic areas, and scenic overlooks.

The Department has reviewed the design report and final engineering plans relative to the post closure use of the landfill. The Department hereby approves the post closure use of the landfill as described in the design report and final engineering plans (including the 4 inch gas vent layer) subject to the following conditions:

1. Construction of the recreational and post closure use areas shall be under the supervision of a Massachusetts registered Professional Engineer.
2. The City shall take all appropriate steps to adequately protect the cap during maintenance activities.
2. The City shall obtain all appropriate local permits.
3. This letter does not constitute approval of the post closure monitoring plan included with the Design report. The Department will respond separately to the City at a later date relative to the post closure monitoring plan.
4. The City shall adequately maintain the active gas collection system and flare.
5. The Department reserves the right to amend, modify or suspend this approval as necessary pursuant to law or regulation, or is otherwise necessary to protect the public health.

NOTICE OF RIGHT TO APPEAL

The City is hereby notified that it may within twenty-one (21) days file a request that this decision be deemed a provisional decision under 310 CMR 19.037(4)(b), by submitting a written statement of the basis on which the City believes it is aggrieved, together with any supporting materials. Upon timely filing of such a request, the decision shall be deemed a provisional decision with an effective date twenty-one (21) days after the Department's receipt of the request. Such a request shall reopen the administrative record, and the Department may rescind, supplement, modify, or reaffirm its decision. Failure by the City to exercise the right provided in this section shall constitute a waiver of the City's right to appeal.

Appeal. Any person aggrieved by the issuance of this decision, except as provided for under 310 CMR 19.037(4)(b), may file an appeal for judicial review of said decision in accordance with the provisions of M.G.L. c. 111, s. 150A, and M.G.L. c. 30A, not later than thirty (30) days following the receipt of the final decision. The standing of a person to file an appeal and the procedures for filing such appeal shall be governed by the provisions of M.G.L. c. 30A. Unless the person requesting an appeal requests and is granted a stay of the terms and conditions of the decision by a court of competent jurisdiction, the decision shall remain effective.

Notice of Action. Any aggrieved person intending to appeal this decision to the Superior Court shall first provide notice to the Department of their intention to commence such action. Said notice of intention shall include the Department file number and shall identify with particularity the issues and reasons why it is believed the decision was not proper. Such notice shall be provided to the Office of General Counsel of the Department and the Regional Director for the regional office which processed the application. The appropriate addresses to which to send such notices are:

General Counsel
Department of Environmental Protection
One Winter Street - 3rd Floor
Boston, MA 02108

Regional Director
Department of Environmental Protection
205a Lowell Street
Wilmington, MA 01887


No allegation shall be made in any judicial appeal of this decision unless the matter complained of was raised at the appropriate point in the administrative review procedures established in those regulations, provided that a matter may be raised upon a showing that it is material and that it was not reasonably possible with due diligence to have been raised during such procedures or that matter sought to be raised is of critical importance to the environmental impact of the permitted activity.

If you have any questions relative to this approval, please contact Tom Mahin at (978) 661-7660.

Sincerely,



Thomas Mahin
Section Chief
Municipal Services Section



Edward H. MacDonald
Regional Engineer for
Bureau of Waste Prevention

cc. Richard Spieler, CDM, 10 Cambridge Center, Cambridge, MA 02142
Alice Hennessey, Office of the Mayor, City Hall, Boston, MA 02201
Jim Belsky, BWP Permitting, DEP-NERO
Don St. Marie, Division of Municipal Services, DEP-Boston
City of Boston, Health and Hospitals
Bob Martinack, DEP-NERO

FACT SHEET

Gardner St. Landfill Post-Closure Use
Page -1-

Applicant: City Of Boston
Department of Public Works
City Hall

Facility: Gardner St. Landfill
West Roxbury, MA

Facility Number: 282467
SWM ID - SL0035.004

Application: Post Closure Use - Major (BWP SW 36)

Transmittal Number: P22410

Engineer: Camp Dresser & McKee Inc.
10 Cambridge Center
Cambridge, MA 02142
Project Engineer: Richard Spieler

Other Actions relative to this Application:

Approval by DEP of Landfill Grading Plan and Approval to Take
Central Artery/Tunnel Excavate - July 15, 1997

Closure Plan Conditional Approval (by DEP) - March 3, 1998

Conditional Approval of Flare (DEP) - October 28, 1998

Submissions relative to this Application:

report

City of Boston Massachusetts
Gardner Street
Post Closure Design Report
December 1998

plans

City of Boston, Massachusetts
Gardner Street Landfill
Closure and Park Project
December, 1998

Gardner St. Landfill Post-Closure Use

Page -2-

Purpose:

The purpose of this application is to implement the post closure recreational use of the Gardner St. Landfill.

This project will consist of capping the entire 77 acres of the landfill and developing the entire site as a public recreational facility. The work will commence in the Spring of this year and is anticipated to be completed in November of 2000.

The closure of the landfill is occurring in three separate phases. The Site Preparation portion of the project consisted of waste relocation/site grading, placement and compaction of Central CA/T excavate, installation of 58 landfill gas extraction wells and installation of erosion and stormwater control measures at the site. The Site Preparation phase was approved by the Department in a letter dated July 15, 1997. The work was completed in October 1998. The second phase consisted of the delivery and preload stockpiling of 150,000 tons of coarse sand at the landfill site. In addition, ten (10) settlement monitoring platforms were installed prior to placement of the preload sand stockpiles. The third phase, will consist of capping 77 acres of the landfill site and develop the closed site as a public recreational facility.

The landfill cap was approved by the Department on March 3, 1998 and will consist of 8 inches of high organic content topsoil, 12 inches minimum of coarse sand (drainage layer), 40 mil thick HDPE barrier layer, and a gas vent layer. The City is currently requesting a reduction of the 6 inch gas venting layer to 4 inches since the majority of the site has a 5 to 25 foot layer of compacted CA/T material placed above the existing solid waste during the Site Preparation phase of the project and the site will have an active landfill gas control system. On October 29, 1998, the Department conditionally approved the final plans for the flare associated with the active gas collection system

The post closure facilities will consist of open lawn areas for multiple-use sports fields, parking, walking/jogging/bike pathways, nature study areas, children play areas, picnic areas, and scenic overlooks.

Pose Closure Use Approval Document



COMMONWEALTH OF MASSACHUSETTS
 EXECUTIVE OFFICE OF ENVIRONMENTAL AFFAIRS
 DEPARTMENT OF ENVIRONMENTAL PROTECTION
 METROPOLITAN BOSTON - NORTHEAST REGIONAL OFFICE

3/9
 Ed/Maria
 TRUDY COXE
 Secretary
 DAVID B. STRUHS
 Commissioner

ARGEO PAUL CELLUCCI
 Governor

MAR 3 1998

Peter Scarpignato
 City of Boston
 Department of Public Works
 City Hall, Room 710
 Boston, MA 02201

Re: BOSTON - Solid Waste
 Gardner St. LF
 Closure Plan
 Conditional Plan Approval
 Transmittal No.106007

Dear Mr. Scarpignato:

The Metropolitan Boston/Northeast Region of the Department of Environmental Protection, Division of Solid Waste Management (the "Department") has completed its review of your proposed Closure Plan for the Gardner Street Landfill in the West Roxbury section of Boston, MA (application BWPSW25, Corrective Action Design, Transmittal Number 106007). The application includes design plans and technical specifications for the capping of the landfill; prepared by Camp Dresser & McKee Inc., Cambridge, MA, on behalf of the City. The design plans include a plan showing conceptual layout of the post closure use. The plans consist of eight (8) sheets, plus a cover sheet, titled:

City of Boston, Massachusetts
 Gardner Street Landfill
 Landfill Closure
 October 1997
 Revised February 1998

The technical specifications are included in a report titled:

City of Boston,
 Massachusetts
 Gardner Street
 Landfill Closure Design Report
 October 1997

The design includes capping the landfill with a flexible membrane liner (FML) type cap and the installation of an active gas collection system. The completion of the project will require the installation of an enclosed flare. A design for the flare was not included as part of this application.

Subsequent to the closure the City intends to construct an active recreational park on the landfill. However detailed designs for this post-closure use have not been included as part of this application.

The Department has determined that, subject to the City obtaining necessary federal and local permits, the proposed closure design complies with the requirements established at 310 CMR 19.000. The Department, therefore, hereby approves the closure plans, described above, subject to the following conditions:

1. Construction of the closure shall be under the supervision of a Massachusetts Registered Professional Engineer who is knowledgeable in solid waste landfill closure activities.
2. This approval shall not constitute an approval for a flare, nor for any post-closure use. Prior to installation of any flare, the City shall submit to the Department an appropriate application for an air quality control permit for the flare pursuant to 310 CMR 7.00. Prior to the construction of any recreational areas and/or their appurtenances, the City shall submit to the Department an application for post-closure use of the facility. Such application for post-closure use shall provide design details necessary for modification of the closure design to complete the recreational facility as well as to upgrade the storm water control system to its final configuration. The City shall not allow the facility to be used by the public until the post-closure application and the flare have been approved by the Department and the flare has been installed and is in operation.
3. The capping/closure of the landfill shall be completed in accordance with the schedule in the "Amendment to Consent Order Issued July 6, 1996" signed by the City and the Department.

4. The sealing "boot" at the buried gas valves (see detail "Buried Gas Valve", sheet 7, Miscellaneous Details III) shall be extended as close to the top of the valve stem as practical. The top of the "boot" shall be sealed to the valve stem with a cured-in-place sealer, filling all gaps, appropriate for submerged use. The length of the valve stem shall be such as to allow the "boot" to extend at least 6 inches above the FML.
5. By no later than March 1, 1999, the City shall submit a post-closure monitoring and maintenance program for the facility which includes the establishment of permanent points for the monitoring of ground water and surface water quality at the site.
6. No revisions, modification, deletions or other amendments shall be made to the approved plans without the prior written approval of the Department.
7. The Department reserves the right to amend, modify, suspend or revoke this approval as necessary pursuant to law or regulation, or as is otherwise necessary to protect the public health, safety and the environment, and/or to complete the closure of the landfill, including implementation of any improvements determined necessary pursuant to a Comprehensive Site Assessment.
8. No landscaping, except as proposed in the May 1997 plans as herein approved, shall be constructed or otherwise implemented, unless approved, in writing, in advance, by the Department.
9. In the event the City decides not to proceed to implement the post-closure use of the project, the City shall submit plans to upgrade the storm water outfalls to a permanent design by no later than six months prior to completion of capping of the landfill.
10. No construction shall occur in any areas of the project subject to the jurisdiction of the Boston Conservation Commission or the U.S. Army Corps of Engineers, or in any area which may adversely impact upon such area(s), without a valid Order of Conditions or permit, as applicable. All construction shall comply with all other federal, state and/or local laws and regulations as may be applicable. Any modifications to the closure plans required pursuant to such Order of Conditions or permits shall be submitted to the Department for approval prior to implementation.

11. Within ninety (90) days of completion of the closure, the City shall cause to be submitted to the Department, a written report, including "as built" plans, prepared by a Massachusetts Registered Professional Engineer independent of the contractor, certifying that the work has been completed in accordance with the approved plans.

NOTICE OF RIGHT TO APPEAL

The City of Boston (the "City") is hereby notified that it may within twenty-one (21) days file a request that this decision be deemed a provisional decision under 310 CMR 19.037(4)(b), by submitting a written statement of the basis on which the City believes it is aggrieved, together with any supporting materials. Upon timely filing of such a request, the decision shall be deemed a provisional decision with an effective date twenty-one (21) days after the Department's receipt of the request. Such a request shall reopen the administrative record, and the Department may rescind, supplement, modify, or reaffirm its decision. Failure by the City to exercise the right provided in this section shall constitute a waiver of the City's right to appeal.

Appeal. Any person aggrieved by the issuance of this decision, except as provided for under 310 CMR 19.037(4)(b), may file an appeal for judicial review of said decision in accordance with the provisions of M.G.L. c. 111, s. 150A, and M.G.L. c. 30A, not later than thirty (30) days following the receipt of the final decision. The standing of a person to file an appeal and the procedures for filing such appeal shall be governed by the provisions of M.G.L. c. 30A. Unless the person requesting an appeal requests and is granted a stay of the terms and conditions of the decision by a court of competent jurisdiction, the decision shall remain effective.

Notice of Action. Any aggrieved person intending to appeal this decision to the Superior Court shall first provide notice to the Department of their intention to commence such action. Said notice of intention shall include the Department file number and shall identify with particularity the issues and reasons why it is believed the decision was not proper. Such notice shall be provided to the Office of General Counsel of the Department and the Regional Director for the regional office which processed the application. The appropriate addresses to which to send such notices are:

City of Boston
Gardner St. Landfill Closure Plan
page 5

General Counsel
Department of Environmental Protection
One Winter Street - 3rd Floor
Boston, MA 02108

Regional Director
Department of Environmental Protection
10 Commerce Way
Woburn, MA 01801

No allegation shall be made in any judicial appeal of this decision unless the matter complained of was raised at the appropriate point in the administrative review procedures established in those regulations, provided that a matter may be raised upon a showing that it is material and that it was not reasonably possible with due diligence to have been raised during such procedures or that matter sought to be raised is of critical importance to the environmental impact of the permitted activity.

If you have any questions regarding this matter, please contact Thomas Mahin at (617) 932-7660.

Sincerely,



Thomas D. Mahin
Section Chief
Municipal Services Section

Sincerely,



Edward H. MacDonald
Regional Engineer for
Bureau of Waste Prevention

EHM/TDM/DCA/dca

attachment: Fact Sheet

cc: City of Boston, Dept. of Health and Hospitals, Office of
Environmental Affairs, 1010 Massachusetts Ave.,
Boston, MA 02118
Alice Hennessey, Office of the Mayor, City Hall, Boston, MA
02201
Camp Dresser & Mckee Inc., 10 Cambridge Center,
Cambridge, MA 02142, attn: Richard Spieler
Jim Belsky, BWP-Permitting, DEP-NERO
Alan Slater, Division of Municipal Services, DEP Boston
Glenn Gilmore, Division of Municipal Services, DEP Boston

FACT SHEET

City of Boston - Gardner Street Landfill
Landfill Closure

File Number: 106007
page 1

Facility: Gardner Street Sanitary Landfill

Location: Gardner Street
West Roxbury, Boston, MA

Owner/operator: City of Boston

Address: Department of Public Works
City Hall, Room 710
Boston, MA 02201

MEPA: none

Current Application:

Type: Corrective Action Design (BWPSW25)
Transmittal Number: 106007
date: November 25, 1997
received: December 1, 1997

Engineer of record: Camp Dresser & McKee Inc.
10 Cambridge Center
Cambridge, MA 02142
Richard Spieler, P.E.

Related submittals:

plans:

City of Boston
Department of Public Works
Gardner Street Landfill
Site Preparation
July 1997

Submittals as part of this application:

report:

City of Boston,
Massachusetts
Gardner Street
Landfill Closure Design Report
October 1997

plans:

City of Boston, Massachusetts
Gardner Street Landfill
Landfill Closure
October 1997

letter:

CDM to DEP
February 20, 1998
re: Response to DEP comments

plans:

City of Boston, Massachusetts
Gardner Street Landfill
Landfill Closure
October 1997
Revised February 1998

Proposal:

This project is the closure of the Gardner Street Landfill. The closure will be constructed in two (2) phases: Phase I, the eastern half of the landfill, Phase II the western half.

Following completion of the closure of the landfill, the City is proposing to construct a recreational park on the closed landfill. The current plans do not include design details for the park.

The landfill cap will consist of a 40 mil HDPE flexible membrane (FML) overlain by 12-18 inches of sand and 8 inches of high organic loam (8-10% organic content). The City's consultants may propose to reduce the organic content of the loam for irrigated portions of the site as part of the post-closure use plans. As part of post-closure use plan, the City may also increase the depth of cover soil above the impermeable layer to reduce the finished surface grade and/or provide structural base for the post-closure use.

Combustible gas from the landfill will be collected by an active collection system and directed to an enclosed flare for destruction. The City is pursuing a separate application for the flare.

The storm water detention basins were constructed as part of the site preparation previously approved. At that time temporary outfall structures were installed. The storm water outfalls will be up graded to permanent facilities as part of the post-closure use plans for the site.

Most recent inspection report submitted to MassDEP in December 2020

REPORT

**2020 Annual Post-Closure
Landfill Inspection Report**

Gardner Street Landfill
West Roxbury, Massachusetts

December 2020

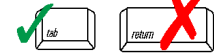




Massachusetts Department of Environmental Protection Bureau of Waste Prevention / Solid Waste Management

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

Important: When completing this form on a computer, use only the Tab key to move your cursor – not the Return key.



Instructions

Use this form to record and report the results of a Third-Party Operation and Maintenance Inspection conducted pursuant to 310 CMR 19.018. Be sure to obtain the most recent version of this form. All applicable sections of the submitted form must be completed to be accepted by MassDEP.

Pursuant to 310 CMR 19.018(8)(a), the third-party inspector and facility owner/operator must sign this Third-Party Inspection Report form and submit the completed report to the appropriate MassDEP regional office and one copy of each completed report to the board of health of the municipality in which the facility is located.

In the event that this inspection report contains a recommendation for corrective action(s), the owner/operator shall also submit the information required by 310 CMR 19.018(8)(c)2.

Forms and instructions are available online:

<http://www.mass.gov/eea/agencies/massdep/recycle/approvals/solid-waste-applications-and-forms.html#8>

Note: This form does not identify all of the requirements applicable to each solid waste management facility; other requirements and/or policies may apply to the operation, maintenance and monitoring for each facility.

MassDEP Use Only

Rec'd Date:

FMF #:

RO #:

Reviewer:

Comments:

I. Facility Information

Facility Type (check one):

- Transfer Station/Handling Facility C&D Waste Processor or C&D Waste Transfer Station Municipal Waste Combustor
- Active Landfill Closed Landfill Other: _____
Specify

Facility:

Gardner Street Landfill

Facility Name

Boston

City/Town

(617) 635-4505

Telephone Number

MA

State

02201

ZIP Code

282467

Regulated Object Account Number

FMF Number

Operator:

City of Boston - Parks and Recreation

Operator Name (Doing Business As/Company Name)

(617) 635-4505

Telephone Number

tom.timmons@boston.gov

Email Address

1010 Massachusetts Avenue, Third Floor

Mailing Address

Boston

City/Town

MA

State

02118

ZIP Code

Permittee:

City of Boston

Permittee Name (Entity Identified on Facility Permit)

1010 Massachusetts Avenue, Third Floor

Mailing Address

Boston

City/Town

MA

State

02118

ZIP Code

Responsible Official for the Facility:

Thomas Timmons

Responsible Official Name (Individual)

City of Boston

Responsible Official Company Name

tom.timmons@boston.gov

Responsible Official Email Address

(617) 635-4505

Responsible Official Telephone Number



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

II. Third-Party Inspector

Fred Santoro
Third-Party Inspector Name
SW48-0000119
MassDEP Third-Party Inspector Identification Number
617-452-6635
Telephone Number
75 State Street, Suite 701
Mailing Address
Boston
City/Town

CDM Smith
Company Name
8/25/2022
MassDEP Third-Party Inspector Expiration Date (MM/DD/YYYY)
santorofa@cdmsmith.com
Email Address
MA
State
02109
ZIP Code

Construction and Demolition Waste (C&D Waste) Processing Facility or C&D Waste Transfer Station Only:

Identify the qualified individual that conducted the observation of incoming waste loads and collection of samples of suspect asbestos-containing materials during the inspection [pursuant to 310 CMR 19.018(6)(f)]. If the entire inspection was conducted by the third-party inspector listed above, then check the box and enter only the Asbestos Inspector Certification Number.

Same as above. **Provide Asbestos Certification Number** ►

MA Dept. of Labor Standards Asbestos Inspector Certification Number

Asbestos Inspector Name

Company Name

Telephone Number

Email Address

Mailing Address

City/Town

State ZIP Code

III. Inspection Details

A. FREQUENCY

Indicate the scheduled inspection frequency for this facility as required by 310 CMR 19.018(6)(b), or a more frequent schedule set forth in the Facility Permit/Other Approval:

Bi-Monthly Quarterly Semi-Annual Annual Biennial
 Other (include permit/approval type and date of issuance):

B. DATE, TIME & PERSONNEL

Inspection Date (MM/DD/YYYY): 12/27/2020
Inspection Start Time: 9:00 AM PM
Facility Representatives in Attendance During Inspection: None.

C. CONDITIONS

Air Temperature: <i>Approximately 28 degrees F.</i>	Wind Direction (direction from which the wind is blowing):									
Weather: <input checked="" type="checkbox"/> Clear <input type="checkbox"/> Partly Cloudy <input type="checkbox"/> Cloudy <input checked="" type="checkbox"/> Dry <input type="checkbox"/> Rain <input type="checkbox"/> Snow	<table border="1" style="margin-left: auto; margin-right: auto;"> <tr> <td><input type="checkbox"/> NW</td> <td><input type="checkbox"/> N</td> <td><input type="checkbox"/> NE</td> </tr> <tr> <td><input type="checkbox"/> W</td> <td style="background-color: #cccccc;">Wind</td> <td><input type="checkbox"/> E</td> </tr> <tr> <td><input checked="" type="checkbox"/> SW</td> <td><input type="checkbox"/> S</td> <td><input type="checkbox"/> SE</td> </tr> </table>	<input type="checkbox"/> NW	<input type="checkbox"/> N	<input type="checkbox"/> NE	<input type="checkbox"/> W	Wind	<input type="checkbox"/> E	<input checked="" type="checkbox"/> SW	<input type="checkbox"/> S	<input type="checkbox"/> SE
<input type="checkbox"/> NW	<input type="checkbox"/> N	<input type="checkbox"/> NE								
<input type="checkbox"/> W	Wind	<input type="checkbox"/> E								
<input checked="" type="checkbox"/> SW	<input type="checkbox"/> S	<input type="checkbox"/> SE								
Wind Speed: <input type="checkbox"/> Calm <input type="checkbox"/> Breeze <input checked="" type="checkbox"/> Moderate <input type="checkbox"/> Strong										



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

IV. Pre-Inspection Preparation

A. FACILITY-SPECIFIC O&M REQUIREMENTS

During each third-party inspection, the third-party inspector shall examine and evaluate the facility's solid waste activities, equipment, operations, practices, procedures, and records relevant to the type of third-party inspection being conducted in order to determine the facility's compliance with all applicable requirements as set forth in 310 CMR 19.018(6)(a)1.

Therefore, pursuant to 310 CMR 19.018(6)(a)1, prior to conducting a third-party facility operation and maintenance inspection, the third-party inspector shall, without limitation, complete all of the following:

- Review and become familiar with the regulations set forth at 310 CMR 19.000 – *Massachusetts Solid Waste Regulations*.
- Identify, review and become familiar with all solid waste permits, plans, approvals, and orders (or other enforcement documents issued to the facility by the Department), and the solid waste requirements applicable to the operation and maintenance of the facility.

Relevant requirements may include, without limitation, specific practices and procedures for the operation, maintenance and monitoring of the facility, waste acceptance/storage limits, and other requirements related to the facility's solid waste activities. Without limitation, these facility-specific requirements may be contained in the Facility Permit, Authorization to Construct, Authorization to Operate, Operation and Maintenance Plan, Closure/Post-Closure Plans and Approvals, Facility Modification Approvals, Beneficial Use Determinations, Administrative Consent Orders, and other determinations, authorizations or enforcement actions issued by the Department.

I, Frederic A Santoro, have identified, reviewed and understand all of the aforementioned requirements that are applicable to this facility and the following are my observations and recommendations related to the facility-specific requirements.

► FAS
Inspector Initials

B. SOLID WASTE PERMITS, PLANS, APPROVALS & ORDERS

List all relevant solid waste permits, plans, approvals, orders or other enforcement actions issued to the facility by the Department that contain specific practices, procedures and other requirements still in effect for the operation, maintenance and monitoring or closure/post-closure of the facility. Where applicable, provide the plan or issue date for each item. For enforcement actions, include the document number, effective date, and status of implementation by the facility.

Discussion:

1. ISA/CSA Conditional Approval, September 3, 1996 (Transmittal #118619)
2. Approval to Take CA/T Excavate, July 15, 1997 (No Transmittal Number)
3. Closure Plan Conditional Plan Approval, March 3, 1998 (Transmittal #106007)
4. Post-Closure Use Approval, March 30, 1999 (Transmittal #P22410)
5. Minor Modification Post-Closure Maintenance and Monitoring Plan, January 20, 2016 (Transmittal #X262050)



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

V. Performance Standards

Examine and evaluate the facility's solid waste activities, equipment, operations, practices, procedures and records relevant to the type of solid waste facility.

Using the tables below, identify all areas evaluated by the inspector during the inspection by checking the box in the first column. Describe all deviations noted during the inspection in the third column. Provide recommendations for corrective action to return to compliance with the applicable performance standard in the fourth column.

Facility Type	Performance Standards
Transfer Station/Handling Facility (Including C&D Facility)	Complete Section A. If C&D Handling/ Processing Facility, then also complete Section B.
Municipal Waste Combustor	Complete Section A.
Active Landfill	Complete Sections C. and F. If active ash landfill, then also complete Section D.
Closed Landfill	Complete Sections E. and F.

A. TRANSFER STATION, HANDLING FACILITY, OR MUNICIPAL WASTE COMBUSTOR (INCLUDING C&D FACILITY)

Evaluated	Performance Standard	Deviation(s)	Comments/Observations and Recommended Corrective Action(s)
<input type="checkbox"/>	19.205(1) Storm Water Controls.		
<input type="checkbox"/>	19.205(2) Equipment.		
<input type="checkbox"/>	19.205(3) Weighing Facilities.		
<input type="checkbox"/>	19.207(1) General.	Discuss in Section VI.	Discuss in Section VI.
<input type="checkbox"/>	19.207(2) Supervision of Operation.		
<input type="checkbox"/>	19.207(3) Access to Facilities.		
<input type="checkbox"/>	19.207(4) Security.		
<input type="checkbox"/>	19.207(5) Posting of Handling Facility.		
<input type="checkbox"/>	19.207(6) Unloading of Refuse.		
<input type="checkbox"/>	19.207(7) Special Wastes.		
<input type="checkbox"/>	19.207(8) Banned/Restricted Wastes.		
<input type="checkbox"/>	19.207(9) Hazardous Waste.		
<input type="checkbox"/>	19.207(10) Household Hazardous Waste and Waste Oil Collections.		
<input type="checkbox"/>	19.207(11) Bulky Waste.		
<input type="checkbox"/>	19.207(12) Liquid Wastes.		



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

Evaluated	Performance Standard	Deviation(s)	Comments/Observations and Recommended Corrective Action(s)
<input type="checkbox"/>	19.207(13) Bird Hazards.		
<input type="checkbox"/>	19.207(14) Dust Control.		
<input type="checkbox"/>	19.207(15) Vector Control.		
<input type="checkbox"/>	19.207(16) Control of Wind-blown Litter.		
<input type="checkbox"/>	19.207(17) Staffing.		
<input type="checkbox"/>	19.207(18) Employee Facilities.		
<input type="checkbox"/>	19.207(19) Accident Prevention/Safety.		
<input type="checkbox"/>	19.207(20) Fire Protection.		
<input type="checkbox"/>	19.207(21) Recycling Operations.		
<input type="checkbox"/>	19.207(22) Records for Operational and Plan Execution.		
<input type="checkbox"/>	19.207(23) Screening and/or Fencing.		
<input type="checkbox"/>	19.207(24) Open Burning.		
<input type="checkbox"/>	19.207(25) Inspections.		
<input type="checkbox"/>	19.207(26) End-of-Life Mercury-added Products.		

B. CONSTRUCTION AND DEMOLITION (C&D) WASTE PROCESSING FACILITY OR C&D WASTE TRANSFER STATION

Evaluated	Performance Standard	Deviation(s)	Comments/Observations and Recommended Corrective Action(s)
<input type="checkbox"/>	19.206(1) Enclosed Operations.		
<input type="checkbox"/>	19.206(2) Storage.		
<input type="checkbox"/>	19.206(3) Contact Water.		
<input type="checkbox"/>	Suspect Asbestos-Containing Material (ACM) Inspection and Management Protocol.		
<input type="checkbox"/>	Sample collection of suspect ACM from incoming loads.	Discuss sample results: ▶ <input type="checkbox"/> Attach analytical reports.	



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

C. ACTIVE LANDFILL

Evaluated	Performance Standard	Deviation(s)	Comments/Observations and Recommended Corrective Action(s)
<input type="checkbox"/>	19.130(1) General.	Discuss in Section VI.	Discuss in Section VI.
<input type="checkbox"/>	19.130(2) Operator Supervision.		
<input type="checkbox"/>	19.130(3) Special Wastes.		
<input type="checkbox"/>	19.130(4) Banned/Restricted Wastes.		
<input type="checkbox"/>	19.130(5) Hazardous Waste.		
<input type="checkbox"/>	19.130(6) Bulky Wastes.		
<input type="checkbox"/>	19.130(7) Liquid Wastes.		
<input type="checkbox"/>	19.130(8) Solid Waste Handling.		
<input type="checkbox"/>	19.130(9) Bird Hazards.		
<input type="checkbox"/>	19.130(10) Equipment and Shelter.		
<input type="checkbox"/>	19.130(11) Staffing.		
<input type="checkbox"/>	19.130(12) Employee Facilities.		
<input type="checkbox"/>	19.130(13) Accident Prevention/Safety.		
<input type="checkbox"/>	19.130(14) Spreading and Compacting of Solid Waste.		
<input type="checkbox"/>	19.130(15) Cover Material.		
<input type="checkbox"/>	19.130(16) Vector, Dust and Odor Control.		
<input type="checkbox"/>	19.130(17) Litter Control.		
<input type="checkbox"/>	19.130(18) Top Slope and Side Slopes.		
<input type="checkbox"/>	19.130(19) Storm Water Drainage.		
<input type="checkbox"/>	19.130(20) Erosion Control.		
<input type="checkbox"/>	19.130(21) Boundary/Elevation Markers.		
<input type="checkbox"/>	19.130(22) Access Roads.		
<input type="checkbox"/>	19.130(23) Security.		
<input type="checkbox"/>	19.130(24) Posting of the Landfill.		



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

Evaluated	Performance Standard	Deviation(s)	Comments/Observations and Recommended Corrective Action(s)
<input type="checkbox"/>	19.130(25) Open Burning.		
<input type="checkbox"/>	19.130(26) Fire Protection and Control.		
<input type="checkbox"/>	19.130(27) Convenience and Recycling Drop-off Areas at Landfills.		
<input type="checkbox"/>	19.130(28) Waste Oil Collections at Landfills.		
<input type="checkbox"/>	19.130(29) Household Hazardous Waste Collections at Landfills.		
<input type="checkbox"/>	19.130(30) Leachate Collection, Treatment and Disposal.		
<input type="checkbox"/>	19.130(31) Phase Completion of the Landfill.		
<input type="checkbox"/>	19.130(32) Disruption of Landfilled Areas.		
<input type="checkbox"/>	19.130(33) Construction of Buildings.		
<input type="checkbox"/>	19.130(34) Records for Operational and Plan Execution.		
<input type="checkbox"/>	19.130(35) Inspections.		
<input type="checkbox"/>	19.130(36) Re-circulation of Leachate.		
<input type="checkbox"/>	19.130(37) End-of-Life Mercury-added Products.		

D. ASH LANDFILL

Evaluated	Performance Standard	Deviation(s)	Comments/Observations and Recommended Corrective Action(s)
<input type="checkbox"/>	19.131(1) General.	Discuss in Section VI.	Discuss in Section VI.
<input type="checkbox"/>	19.131(2) Fugitive Emissions.		
<input type="checkbox"/>	19.131(3) Ash Moisture Content.		
<input type="checkbox"/>	19.131(4) Spreading/Compacting of Ash.		
<input type="checkbox"/>	19.131(5) Vehicle Washdown / Wheelwash / Other Measures.		



Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

E. CLOSED LANDFILL

Evaluated	Performance Standard	Deviation(s)	Comments/Observations and Recommended Corrective Action(s)
<input checked="" type="checkbox"/>	19.016 Post-closure Use.	None	Phase I of the Gardner Street Landfill is being utilized as a public park and recreation. Phase II is used as athletic fields for the adjacent West Roxbury Education Complex (WREC). The Phase II closure design incorporated synthetic turf fields (football and baseball), and tennis and basketball courts into the landfill capping system. The WREC is currently closed, future plans for the building are unknown at this time.
<input checked="" type="checkbox"/>	19.142(1) General.	Discuss in Section VI.	Discuss in Section VI.
<input checked="" type="checkbox"/>	19.142(2) Post-closure Period.	None	Phase I of the landfill was capped in 2000 and Phase II was recapped in 2016. The post-closure period will continue to until at least 2046.
<input checked="" type="checkbox"/>	19.142(3) Post-closure Period Waiver.	None	No waiver is requested at this time.
<input checked="" type="checkbox"/>	19.142(4) Post-closure Period Extension.	None	No extension of the post-closure period is anticipated at this time.
<input checked="" type="checkbox"/>	19.142(5) Post-closure Requirements.	None	The City is performing post-closure monitoring and maintenance in accordance with approved plans and MassDEP regulations.
<input checked="" type="checkbox"/>	19.142(6) Inspection Requirements.	None	This inspection is performed to meet the third-party inspection requirements of 310 CMR 19.018.
<input checked="" type="checkbox"/>	19.142(7) Additional Measures.	None	The City will implement additional measures as necessary during the post-closure period as the Department deems necessary for the protection of public health or the environment. No additional measure have been required to date.
<input checked="" type="checkbox"/>	19.142(8) Termination of the Post-Closure Period.	None	The City is not requesting to terminate the post-closure period requirements at this time.
<input checked="" type="checkbox"/>	19.143(1) Applicability.	None	The landfill is not being utilized for post-closure activities other than



Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

Evaluated	Performance Standard	Deviation(s)	Comments/Observations and Recommended Corrective Action(s)
			those permitted through MassDEP.
<input checked="" type="checkbox"/>	19.143(2) Submission of Post-closure Use Plans.	None	The City is not currently considering post-closure uses for the landfill other than those currently permitted through MassDEP.
<input checked="" type="checkbox"/>	19.143(3) Criteria for Approval of Post-closure Use.	None	The City moved forward with plans to improve the playground area on the top of the landfill, asphalt path and roadway repair will also be assessed. The contract was awarded to CDM Smith and is currently in the conceptual design phase. A solid waste (SW) permit for landfill modifications will be submitted as required during the design.
<input checked="" type="checkbox"/>	19.143(4) Post-closure Construction.	None	The City is not currently considering post-closure uses for the landfill other than those currently permitted through MassDEP.



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

F. ADDITIONAL LANDFILL REQUIREMENTS

Evaluated	Performance Standard	Comments/Observations and Recommended Corrective Action(s)
<input checked="" type="checkbox"/>	19.132 Environmental Monitoring Requirements.	
	Is the monitoring of surface water, ground water, landfill gas and any other media as determined by the Department, including without limitation, soil and sediment, being conducted on the schedule established in the permit or as otherwise required by the Department? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO	
	Are the analytical results of the environmental monitoring submitted to the Department within 60 days after the date of sample collection or as otherwise specified by the Department? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO	
<input checked="" type="checkbox"/>	19.133 Maintenance of Environmental Control and Monitoring Systems.	
	Are the facility operations conducted in a manner which protects all environmental control systems as approved in the Operation and Maintenance plan and monitoring systems as approved in the Operation and Maintenance plan or permit? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO	
	Is regular maintenance of all landfill environmental control systems performed as approved in the Operation and Maintenance plan or permit? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO	
	Has the Department been notified of the existence and extent of damaged or destroyed environmental control systems, monitoring devices, or surface water sampling location markers in accordance with 310 CMR 19.133(1)(c) and/or 19.133(1)(e)? <input checked="" type="checkbox"/> N/A (if no damage to report) <input type="checkbox"/> YES <input type="checkbox"/> NO	

Continue to Next Page ►



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

F. ADDITIONAL LANDFILL REQUIREMENTS – Continued

Evaluated	Performance Standard	Comments/Observations and Recommended Corrective Action(s)
<input checked="" type="checkbox"/>	<p>19.121(4) Landfill Gas Recovery Operation and Maintenance Requirements.</p> <hr/> <p>Is condensate generation kept to a minimum and condensate recirculation, if proposed, performed in accordance with the permit? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO</p> <hr/> <p>Are the sampling and analysis of condensate conducted on the schedule established in the permit or as otherwise required by the Department? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO</p> <hr/> <p>Are the analytical results of condensate monitoring reported to the Department as established in the permit or as otherwise required by the Department? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO</p> <hr/> <p>Is an annual report on the operation of the landfill gas recovery facility submitted to the Department as specified in the permit? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO</p>	



Massachusetts Department of Environmental Protection Bureau of Waste Prevention / Solid Waste Management

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

VI. Inspection Observations

A. FACILITY CONDITION AND OPERATIONS

Examine and evaluate the facility condition and operations as observed during the inspection, including the following:

- Describe any evidence of the following conditions observed at the time of the inspection:
 - Unpermitted discharges to air, water, land or other natural resources of the Commonwealth; and
 - Dust, odors, litter, and/or other nuisance conditions.
 - Document and discuss all deviations from any specific requirements for the facility that are not addressed in the previous section (*Section V. – Performance Standards*), including without limitation, the requirements set forth in the facility's operation and maintenance plan, orders or other enforcement documents, and other solid waste permits, approvals, and authorizations issued to the facility by MassDEP.
 - List the types and estimated quantities of all waste and materials stored at the facility at the time of the inspection.
 - Provide a narrative that describes the overall status of the general condition, operation and performance of the facility as observed at the time of the inspection.
- ⇒ Attach photographs taken during the inspection that depict the general condition and operation of the facility. At a minimum, include photographs, as applicable, of the waste unloading (tipping) area, waste storage areas, recyclable material storage and, for transfer stations, the waste reloading activity.

Discussion: The closed landfill and park was overall in good condition with only minor issues noted. Most of the areas observed that require attention are included in standard annual maintenance. Several areas of erosion were noted and repairs are underway. Desire path on the side slope is a constant battle with pedestrian traffic. It has been monitored and repaired. Irrigation repairs and tree damage caused by beaver activity will be monitored. The root cracking of the pavement is being monitored. The Parks department smoothed the worst of the cracks with cold patch and are planning to repair as part of the redesign of the playground area. Also, it was noted that monitoring well MW-7D was repaired in the spring of this year.

B. RECORD REVIEW

Examine and evaluate the facility's record-keeping. Without limitation, document the status of the facility's compliance with, and any deviations from, the record-keeping required by 310 MCR 19.000; the facility's operation and maintenance plan; orders or other enforcement documents issued to the facility; and other solid waste permits, approvals, determinations and authorizations issued to the facility by the Department, including the following:

- Discuss the evaluation of the Facility's "daily log" such as, daily tonnage records.
- List and discuss any special incidents that have occurred since the previous inspection such as exceedances of the facility's permitted waste acceptance limits, nature and outcome of complaints reported to the facility operator (including the identity of the complainant, if known), fires, emergencies, or other disruptions to the routine operation of the facility.

Discussion: The facility records landfill gas flare maintenance as required and reports quarterly to MassDEP.



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

VII. Summary and Recommendations

Pursuant to 310 CMR 19.018(6)(a)4., where a third-party inspector observes that the operation or maintenance of the facility deviates from the aforementioned applicable requirements, he or she shall document all such deviations and recommend corrective actions for the facility to take to return to compliance.

A. INSPECTION RESULTS

Based on the examinations and evaluations conducted in Sections V. and VI., please summarize the inspection results by checking one of the following determinations:

No deviations from the applicable performance standards or additional requirements listed at 310 CMR 19.018(6) were identified during this inspection.
If no deviations were identified during the inspection, check this box and proceed to Section VII.B.

Deviations from the applicable performance standards or additional requirements listed at 310 CMR 19.018(6) were identified during this inspection and are discussed further in this report.
If deviations were identified during the inspection, check this box and ensure that each deviation and the recommended corrective actions are discussed in the applicable section(s) below.

B. STATUS OF PREVIOUS RECOMMENDATIONS FOR CORRECTIVE ACTION

If a previous inspection report identified deviations with recommendations for corrective action, please describe the action(s) taken since the last inspection to return the facility to compliance with the applicable requirements.

Discussion: See above.
Minor areas of erosion have continued to be monitored and repaired as necessary.
MW-7D has been repaired.
Beaver activity has continued to be monitored.
Parks Dept is monitoring the area of cracked pavement caused by nearby tree roots and has patched the area.
Pathway repair and reconstruction is included in the upcoming playground improvement project and this area will be assessed and repaired to existing conditions.

C. RECOMMENDATIONS FOR CORRECTIVE ACTION

Based on the results of this inspection, please list all deviations noted during the inspection and provide recommendations for corrective action to return to compliance with the applicable requirement.

Recommendations:
-Repair minor areas of erosion.
-Continue to monitor beaver activity.
-Repair root cracked and lifted pavement on footpaths.
-Repair sideslope desire path.

D. ADDITIONAL COMMENTS

Comments:



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

Third-Party Inspection Report – 310 CMR 19.018(8)
Operation & Maintenance

VIII. Additional Information Checklist

Attach the following additional information, as applicable, to complete the inspection report.*

- Attach photographs taken during the inspection that depict the general condition and operation of the facility, as required in Section VI.A.
- For C&D Waste facilities only, attach the analytical results, as required in Section V.B.

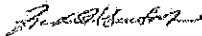
*Note: Pursuant to 310 CMR 19.018(8), MassDEP may request additional information.

Continue to Certification Statement on Next Page ►

IX. Certification – THIRD-PARTY INSPECTOR

"I attest under the pains and penalty of perjury that:

1. I have personally examined and am familiar with the information contained in this submittal, including any and all documents accompanying this certification statement;
2. Based on my inquiry of those persons responsible for obtaining the information, the information contained in this submittal is, to the best of my knowledge, true, accurate and complete;
3. I have been able to conduct the third-party inspection and prepare the third-party inspection report without being influenced by the facility owner or operator and, (if I am a municipal employee) without being influenced by my municipal employer, by any coworker or by any elected or appointed official of the municipality; and
4. I am aware that there are significant penalties, including, but not limited to, possible administrative and civil penalties for submitting false, inaccurate, or incomplete information and possible fines and imprisonment for knowingly submitting false, inaccurate, or incomplete information."


Signature of Third-Party Inspector

Frederic A Santoro
Print Full Name

CDM Smith
Company Name

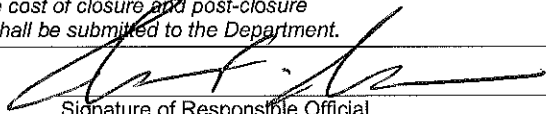
4/23/2021
Date (MM/DD/YYYY)

X. Certification – FACILITY OWNER/OPERATOR

Does the facility maintain a Financial Assurance Mechanism (FAM) pursuant to 310 CMR 19.051?	<input type="checkbox"/> YES <input checked="" type="checkbox"/> NO
If yes: • Enter the amount of the current FAM:	\$300,000
• Enter the date of the last revision of the FAM amount, pursuant to 310 CMR 19.051(6):	
<i>As a reminder, pursuant to 310 CMR 19.051(6), the estimate of the cost of closure and post-closure maintenance must be revised every year, and every second year shall be submitted to the Department.</i>	

"I certify under the penalty of law:

1. That I have personally examined and am familiar with the information submitted in this third-party inspection report, including but not limited to the statements above concerning the financial assurance mechanism in place in accordance with any facility permit and 310 CMR 19.051, and all attachments and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate and complete. I am aware that there are significant penalties both civil and criminal for submitting false information including possible fines and imprisonment.
2. That, in the event that this inspection report contains a recommendation


Signature of Responsible Official

Thomas Timmons
Print Full Name

Director, BPRD Design and Construction Division
Title

4/26/2021
Date (MM/DD/YYYY)



Massachusetts Department of Environmental Protection

Bureau of Waste Prevention / Solid Waste Management

Third-Party Inspection Report – 310 CMR 19.018(8) Operation & Maintenance

for corrective action(s), I have completed and attached to this report a Corrective Action Plan and Schedule*, pursuant to 310 CMR 19.018(8)(c)2.”

**Note: The owner or operator may elect to correct deviations identified in the Third-Party Inspection Report in a manner that is different than that recommended by the Third-Party Inspector, so long as the facility is brought back into compliance with applicable requirements.*

► Pursuant to 310 CMR 19.018(8)(c), a copy of each third-party inspection report shall be maintained at the facility in accordance with the requirements of 310 CMR 19.000. The owner and operator shall make third-party inspection reports available to personnel or authorized representatives of the Department for review at the facility upon request.

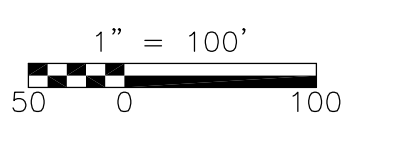
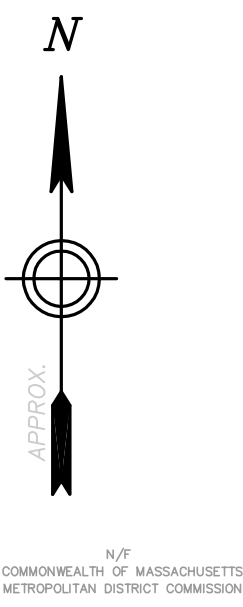
Within 30 days of the inspection date:	<ul style="list-style-type: none">• Mail this completed form to the MassDEP Regional Office that serves the municipality in which the facility is located. (Attention: Solid Waste Management)• Send one copy to the local board of health for the municipality in which the facility is located.	A list of municipalities and MassDEP Regional Offices is available online at: http://www.mass.gov/eea/agencies/massdep/about/contacts/find-the-massdep-regional-office-for-your-city-or-town.html
---	--	--

NOTES

1. PLAN AND TOPOGRAPHY OF AREA OUTSIDE THE LANDFILL CAP PREPARED FROM AERIAL PHOTOGRAPHY UTILIZING PHOTOGRAMETRIC METHODS. THE SITE WAS FLOWN ON AUGUST 18, 1999 WITH GROUND CONTROL PROVIDED BY MODERN CONTINENTAL CONSTRUCTION COMPANY.
2. PLAN AND TOPOGRAPHY OF THE AREA INSIDE THE LIMITS OF THE LANDFILL CAP PREPARED FROM SURVEY PERFORMED BY COLER AND COLANTONIO, INC. ON APRIL 17, 2001.
3. ELEVATIONS SHOWN ARE BASED ON NAVD MEAN SEA LEVEL DATUM 1929. HORIZONTAL DATUM BASED ON MASSACHUSETTS STATE PLANE CO-ORDINATE SYSTEM AND NAD27.

LEGEND

- △ SW-7 SURFACE WATER SAMPLING LOCATION
- ⊕ MW-2D GROUNDWATER MONITORING WELL
- ⊕ GW-7 GAS MONITORING WELL



REV. NO.	DATE	DRWN	CHKD	REMARKS

DESIGNED BY: E. DUDLEY
 DRAWN BY: L. BUGAY
 SHEET CHK'D BY: L. BUGAY
 APPROVED BY: L. BUGAY
 DATE: JUNE 2015



CITY OF BOSTON, MASSACHUSETTS
 GARDNER STREET LANDFILL

ENVIRONMENTAL MONITORING PLAN

PROJECT NO. 0257-47735
 FILE NAME: ENVMON
 SHEET NO. 1

Gardner Street Landfill Inspection Photos
December 2020



Photograph #1
Entrance to Millennium Park.



Photograph #2
Sign with park hours and contacts.



Photograph #3
Street signs entering the park.



Photograph #4
Signs for at the fork to upper and lower areas.



Photograph #5
Park signs with park rules and site map.



Photograph #6
Path signs for dog leashes and foot traffic only.

Gardner Street Landfill Inspection Photos
December 2020



Photograph #7
Pet waste pick up signs.



Photograph #8
Playground at the top of Millennium Park.



Photograph #9
Field A. Looking east.



Photograph #10
Field A. Reconstructed in 2017, remains in great condition.



Photograph #11
Field B. Looking east.



Photograph #12
Field C. Looking west.

Gardner Street Landfill Inspection Photos
December 2020



Photograph #13
Southern sideslope.



Photograph #14
Northern sideslope.



Photograph #11
Western sideslope.



Photograph #12
Eastern sideslope.



Photograph #13
Drainage swale on northern mid slope.



Photograph #14
Desire Path on upper southwest slope.

Gardner Street Landfill Inspection Photos
December 2020



Photograph # 15
Desire Path on lower southwest slope.



Photograph # 16
Solar condensate pump enclosure on at the foot of the northeastern sieslope.



Photograph #17
Fiberglass landfill gas system well vault.



Photograph #16
Manhole cover over landfill system well vault.



Photograph #17
Enclosed landfill gas flare system.



Photograph #18
Groundwater monitoring well MW-11W.

Gardner Street Landfill Inspection Photos
December 2020



Photograph #19

Groundwater monitoring wells MW-2W and 2D.



Photograph #20

Groundwater monitoring wells MW-7W and 7D.



Photograph #21

Groundwater monitoring well MW-3WR.



Photograph #22

Landfill gas monitoring well GW-4.



Photograph #23

Landfill gas monitoring well GW-7.



Photograph #24

Beaver tree cutting.

Gardner Street Landfill Inspection Photos
December 2020



Photograph#25

Tree roots pushing up the pathway pavement.



Photograph #26

2018 roadway ditch repair still in place.



Photograph #27

Irrigation rutting; west side of Field B.



Photograph #27

Area eroded away between field A and B; east side.



Photograph #29

Area eroded between Field A and B eastern side.



Photograph #30

Area worn away at the eastern end of Field B.

Gardner Street Landfill Inspection Photos
December 2020



Photograph #31

WREC athletic fields on eastern side of the Park.



Massachusetts Department of Environmental Protection Bureau of Waste Prevention / Solid Waste Management

Third-Party Inspections – 310 CMR 19.018(8) Corrective Action Plan & Schedule

Important: When completing this form on a computer, use only the Tab key to move your cursor – not the Return key.



Instructions

In the event that a third-party inspection report prepared in accordance with 310 CMR 19.018(8) contains a recommendation for corrective action(s) at a Solid Waste Management Facility, the owner or operator shall complete and sign **Section IV. Certification** of this form. Pursuant to 310 CMR 19.018(8)(c), the owner or operator shall submit the completed Corrective Action Plan and Schedule form, along with the third-party inspection report with attachments to the appropriate MassDEP Regional Office, and a copy of this form and each completed inspection report with attachments to the board of health of the municipality in which the facility is located. Be sure to obtain the most recent version of this form. All applicable sections of the submitted form must be completed to be accepted by MassDEP. Blank forms and additional instructions on using this form are available online:

<http://www.mass.gov/eea/agencies/massdep/recycle/approvals/solid-waste-applications-and-forms.html#8>

I. Facility Information

Identify the facility and responsible official.

A. Facility

Gardner Street Landfill

Facility Name

West Roxbury

City/Town

MA

State

02132

FMF Number

B. Responsible Official

Thomas Timmons

Responsible Official Name (Individual)

Director, BPRD Design and Construction Division

Responsible Official Company Name

tom.timmons@boston.gov

Responsible Official Email Address

617-635-4505

Responsible Official Telephone Number

II. Third-Party Inspection

Enter the date of the third-party inspection and identify the inspector that conducted the inspection related to this corrective action plan.

12/27/2020

Inspection Date (MM/DD/YYYY)

Fred Santoro

Third-Party Inspector Name

Continue to Next Page ►



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

**Third-Party Inspections – 310 CMR 19.018(8)
Corrective Action Plan & Schedule**

Important: When completing this form on a computer, use only the Tab key to move your cursor – not the Return key.



III. Plan & Schedule for Corrective Action

Pursuant to 310 CMR 19.018(8)(c)2., the owner or operator shall provide the following:

- a. A written report documenting the completion of the corrective action(s) [recommended in the report];
- b. Documentation or explanation why corrective action is not needed; or
- c. A plan and schedule for completing the corrective action(s).

Note: The owner or operator may elect to correct deviations identified in the inspection report in a manner that is different than that recommended by the third-party inspector, so long as the facility is brought back into compliance with applicable requirements.

Discuss the status of the corrective actions recommended in the third-party inspection report. For each deviation documented in the inspection report, describe the corrective action(s) that have been taken, or that will be taken, by the owner or operator to return the facility to compliance with the applicable requirements. Provide the schedule for completing each corrective action, or, as applicable, provide the date the corrective action was completed. If the facility owner/operator intends to submit a permit application in order to complete the corrective action(s), please identify the permit type and anticipated submittal schedule. Contact MassDEP (Regional Office) if you are not sure the corrective action(s) will require a filing to MassDEP prior to implementation.

The following corrective action items are recommended to be completed by the end of calendar year 2021:

1. Monitor repaired sideslope areas where unplanned pathways (Desire lines) have been created by pedestrians not following designed pathways (footpaths eroding grass and cover material on landfill side slope). Add signage to notify park users to stay off. (Previously repaired and by Parks Dept and is regularly monitored).
2. Repair by filling in and reseeding any depression areas in the playing fields. (This is done regularly by Parks Staff).
3. Repair all areas eroded away by winter drainage. Area between field A and B. Easten end of Field B.
4. Monitor the beaver activity and make sure all trees will not fall into pathways.
5. Reparation of areas where root systems are pushing up pavement on footpaths is reccomended.
6. Repair areas eroded by the Irrigation system..



**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

**Third-Party Inspections – 310 CMR 19.018(8)
Corrective Action Plan & Schedule**

Important: When completing this form on a computer, use only the Tab key to move your cursor – not the Return key.





**Massachusetts Department of Environmental Protection
Bureau of Waste Prevention / Solid Waste Management**

**Third-Party Inspections – 310 CMR 19.018(8)
Corrective Action Plan & Schedule**

Important: When completing this form on a computer, use only the Tab key to move your cursor – not the Return key.



IV. Certification

FACILITY OWNER/OPERATOR

"I certify under the penalty of law that I have personally examined and am familiar with the information submitted in this document and all attachments and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate and complete. I am aware that there are significant penalties both civil and criminal for submitting false information including possible fines and imprisonment."

Signature of Responsible Official

Thomas Timmons

Print Full Name

Director, BPRD Design and Construction Division

Title

4/26/2021

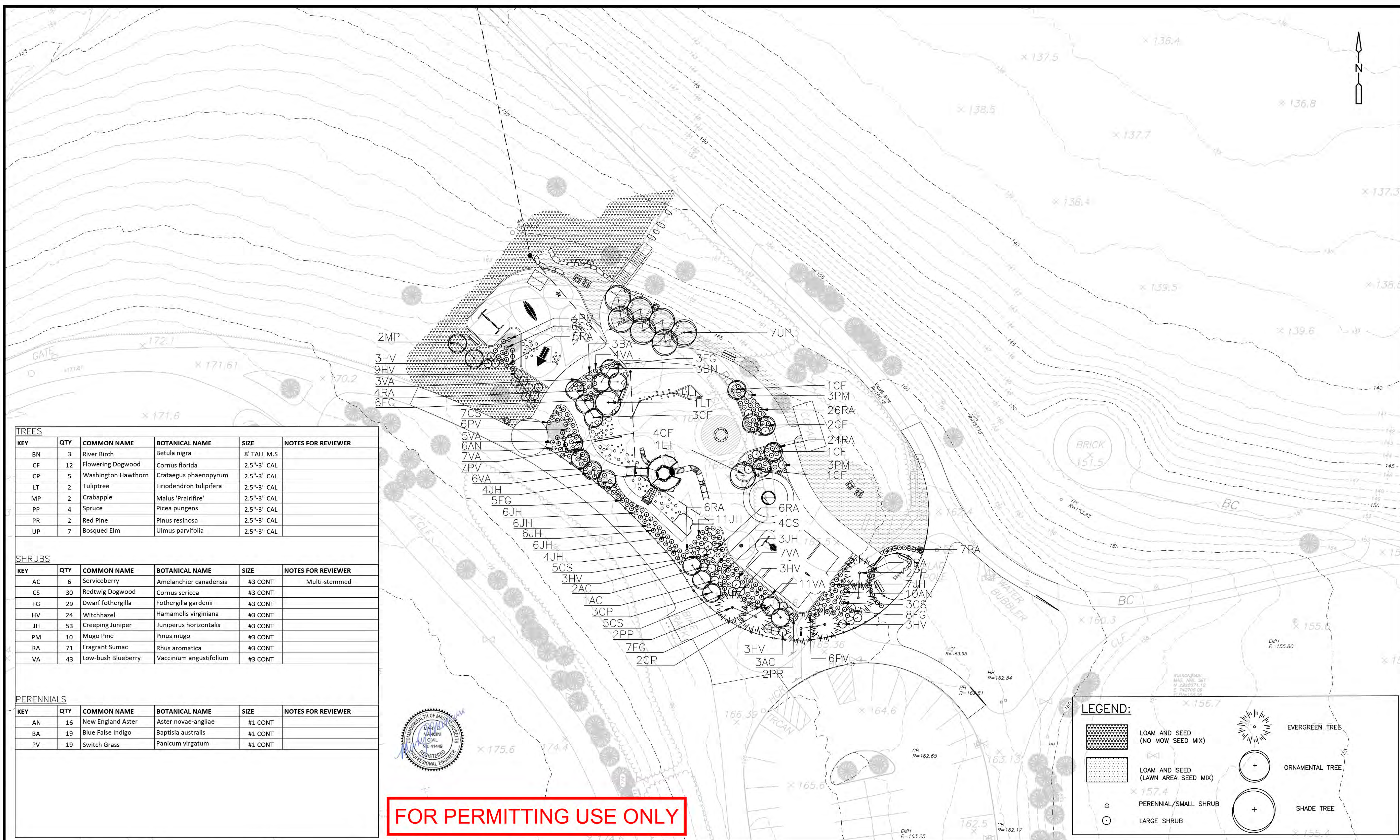
Date (MM/DD/YYYY)

The owner/operator of the facility shall submit this form along with the third-party inspection report to the Department with a copy to the board of health of the municipality in which the facility is located no later than 30 days following the date of the inspection. Pursuant to 310 CMR 19.018(8)(c), a copy of each third-party inspection report shall be maintained at the facility in accordance with the requirements of 310 CMR 19.000. The owner and operator shall make third-party inspection reports available to personnel or authorized representatives of the Department for review at the facility upon request.

<p>Within 30 days of the inspection date:</p>	<ul style="list-style-type: none"> • Mail this completed form to the MassDEP Regional Office that serves the municipality in which the facility is located. (Attention: Solid Waste Management) • Send one copy to the local board of health for the municipality in which the facility is located. 	<p>A list of municipalities and MassDEP Regional Offices is available online at: http://www.mass.gov/eea/agencies/massdep/about/contacts/find-the-massdep-regional-office-for-your-city-or-town.html</p>
--	---	--



Stamped and Signed Project Plans



TREES

KEY	QTY	COMMON NAME	BOTANICAL NAME	SIZE	NOTES FOR REVIEWER
BN	3	River Birch	Betula nigra	8' TALL M.S	
CF	12	Flowering Dogwood	Cornus florida	2.5"-3" CAL	
CP	5	Washington Hawthorn	Crataegus phaenopyrum	2.5"-3" CAL	
LT	2	Tuliptree	Liriodendron tulipifera	2.5"-3" CAL	
MP	2	Crabapple	Malus 'Prairifire'	2.5"-3" CAL	
PP	4	Spruce	Picea pungens	2.5"-3" CAL	
PR	2	Red Pine	Pinus resinosa	2.5"-3" CAL	
UP	7	Bosqued Elm	Ulmus parvifolia	2.5"-3" CAL	

SHRUBS

KEY	QTY	COMMON NAME	BOTANICAL NAME	SIZE	NOTES FOR REVIEWER
AC	6	Serviceberry	Amelanchier canadensis	#3 CONT	Multi-stemmed
CS	30	Redtwig Dogwood	Cornus sericea	#3 CONT	
FG	29	Dwarf fothergilla	Fothergilla gardenii	#3 CONT	
HV	24	Witchhazel	Hamamelis virginiana	#3 CONT	
JH	53	Creeping Juniper	Juniperus horizontalis	#3 CONT	
PM	10	Mugo Pine	Pinus mugo	#3 CONT	
RA	71	Fragrant Sumac	Rhus aromatica	#3 CONT	
VA	43	Low-bush Blueberry	Vaccinium angustifolium	#3 CONT	

PERENNIALS

KEY	QTY	COMMON NAME	BOTANICAL NAME	SIZE	NOTES FOR REVIEWER
AN	16	New England Aster	Aster novae-angliae	#1 CONT	
BA	19	Blue False Indigo	Baptisia australis	#1 CONT	
PV	19	Switch Grass	Panicum virgatum	#1 CONT	



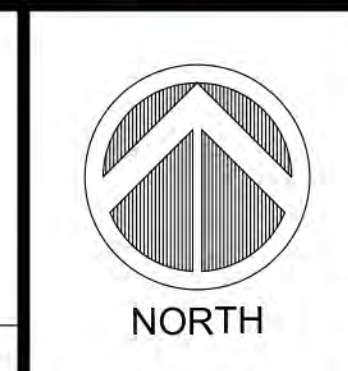
FOR PERMITTING USE ONLY

LEGEND:

- LOAM AND SEED (NO MOW SEED MIX)
- LOAM AND SEED (LAWN AREA SEED MIX)
- PERENNIAL/SMALL SHRUB
- LARGE SHRUB
- EVERGREEN TREE
- ORNAMENTAL TREE
- SHADE TREE



Prepared By: **CDM Smith**
 Consultant Project No. 254479



No.	Date	Revision

Approved By: _____ Date: _____

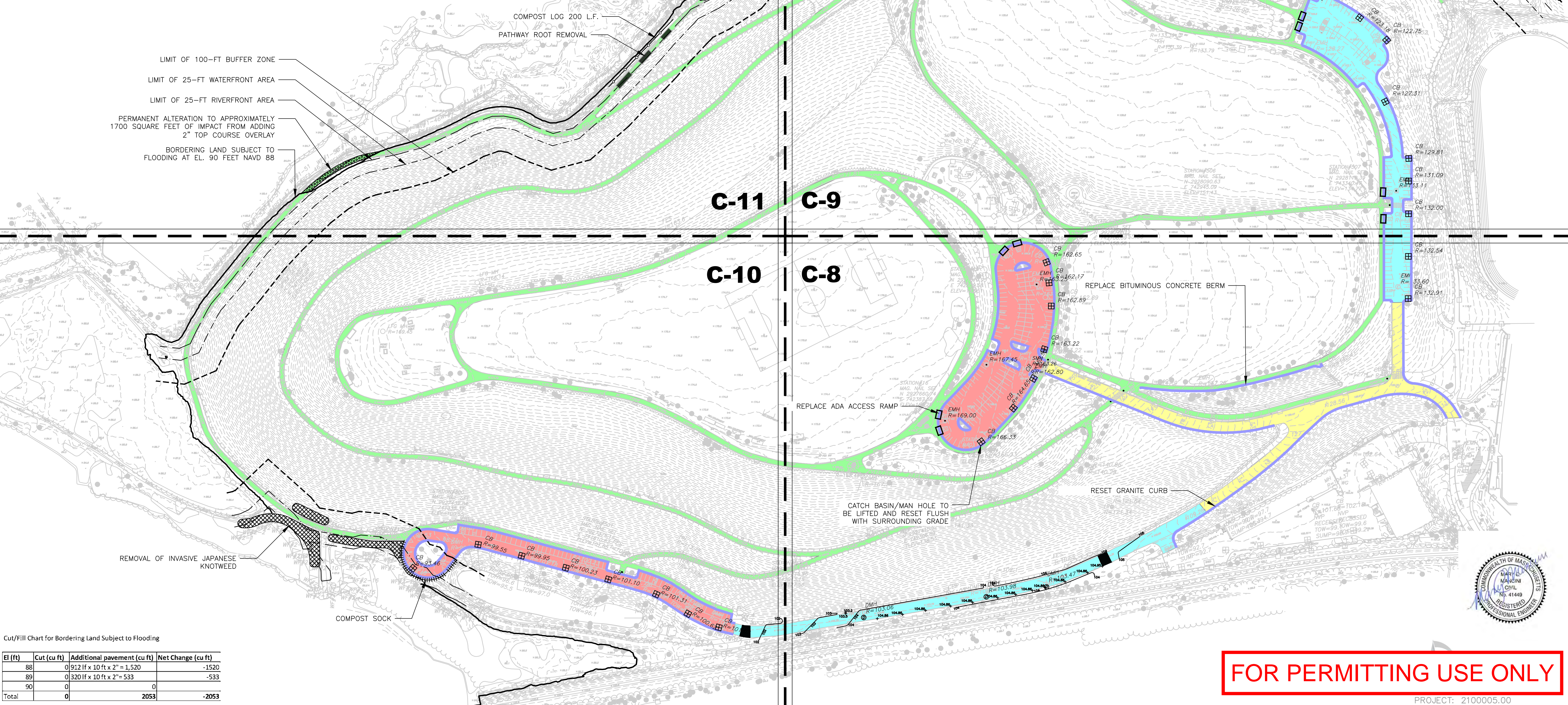
Project Name.: **Design Improvements To Millennium Park**

BPRD Project No. 51226
 Date 08/30/2021
 Scale 1" = 20'
 Drawn J. BRONKANT
 Checked G. HOWARD

Sheet Name.: **Playground Planting**
 Section: **C-6**

LEGEND

- PATHWAY PAVING
ADD 2" TOP COURSE OVERLAY
- PARKING PAVING
1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY
- ACCESS ROADS
1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY
- FULL DEPTH RECONSTRUCTION
- FULL DEPTH PATHWAY RECONSTRUCTION AND ROOT REMOVAL. UP TO 3,000 SQ. FT. LOCATIONS TO BE MARKED IN THE FIELD PRIOR TO REMOVAL ACTIVITIES
- RESET GRANITE CURB
- ADA ACCESS RAMP
- PERMANENT ALTERATION WITHIN BLSF BUFFER
- CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
- REPLACE EXISTING COLLAPSIBLE BOLLARD



LIMIT OF 100-FT BUFFER ZONE
 LIMIT OF 25-FT WATERFRONT AREA
 LIMIT OF 25-FT RIVERFRONT AREA
 PERMANENT ALTERATION TO APPROXIMATELY 1700 SQUARE FEET OF IMPACT FROM ADDING 2" TOP COURSE OVERLAY
 BORDERING LAND SUBJECT TO FLOODING AT EL. 90 FEET NAVD 88

Cut/Fill Chart for Bordering Land Subject to Flooding

Ei (ft)	Cut (cu ft)	Additional pavement (cu ft)	Net Change (cu ft)
88	0	912 If x 10 ft x 2" = 1,520	-1520
89	0	320 If x 10 ft x 2" = 533	-533
90	0	0	0
Total	0	2053	-2053

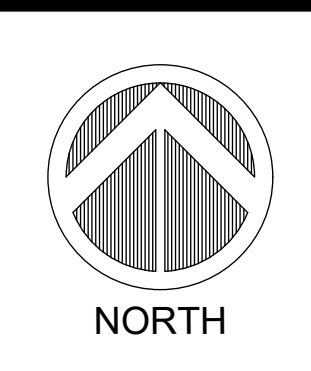
FOR PERMITTING USE ONLY

PROJECT: 2100005.00



Prepared By: **CDM Smith**

Consultant Project No. 254479



No.	Date	Revision

Approved By: _____ Date: _____

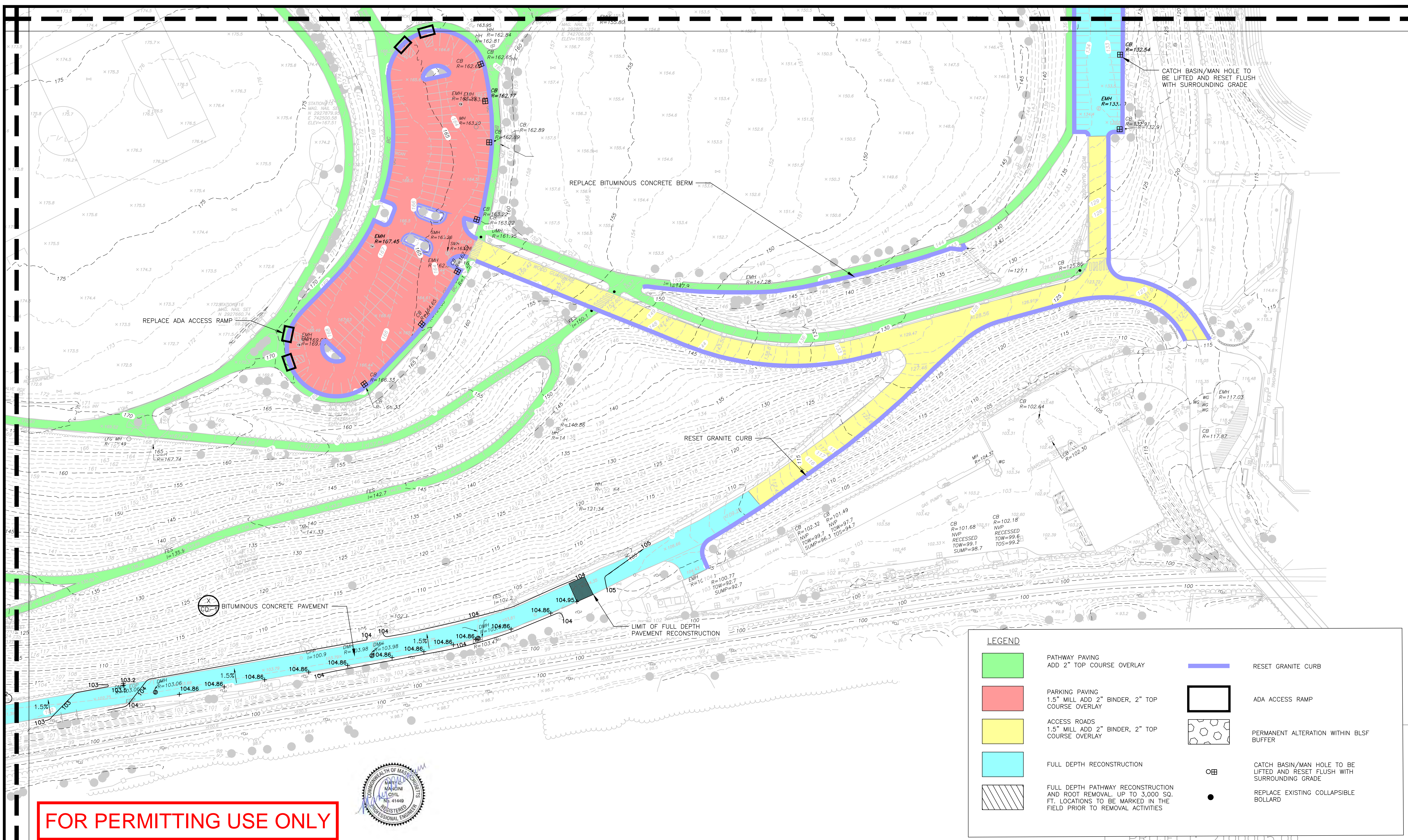
Project Name.: **Design Improvements To Millennium Park**

BPRD Project No.	51226
Date	08/30/2021
Scale	1" = 100'
Drawn	J. BRONKANT
Checked	G. HOWARD

Sheet Name.: **Paving Site Overview Plan**

Section: **C-7**





FOR PERMITTING USE ONLY



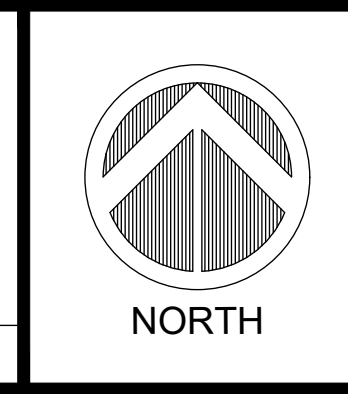
LEGEND

	PATHWAY PAVING ADD 2" TOP COURSE OVERLAY		RESET GRANITE CURB
	PARKING PAVING 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		ADA ACCESS RAMP
	ACCESS ROADS 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		PERMANENT ALTERATION WITHIN BLSF BUFFER
	FULL DEPTH RECONSTRUCTION		CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
	FULL DEPTH PATHWAY RECONSTRUCTION AND ROOT REMOVAL UP TO 3,000 SQ. FT. LOCATIONS TO BE MARKED IN THE FIELD PRIOR TO REMOVAL ACTIVITIES		REPLACE EXISTING COLLAPSIBLE BOLLARD

PROJECT: Z100005.00

Prepared By:
CDM Smith

Consultant Project No. 254479



No.	Date	Revision

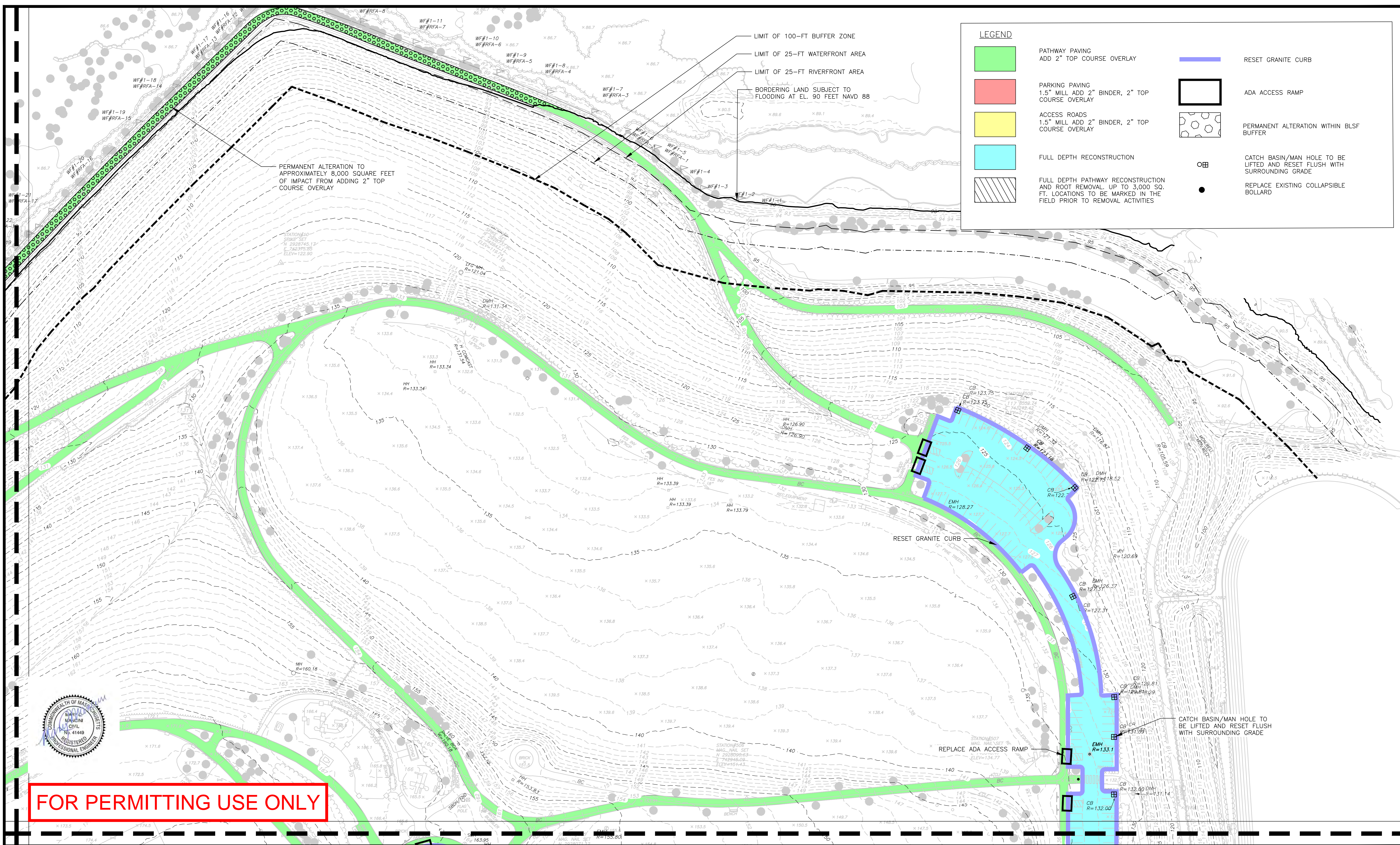
Approved By: _____ Date: _____

Project Name.:
Design Improvements To Millennium Park

BPRD Project No. 51226
Date 08/30/2021
Scale 1" = 50'
Drawn J. BRONKANT
Checked G. HOWARD

Sheet Name.:
PAVING PLAN I

Section:
C-8



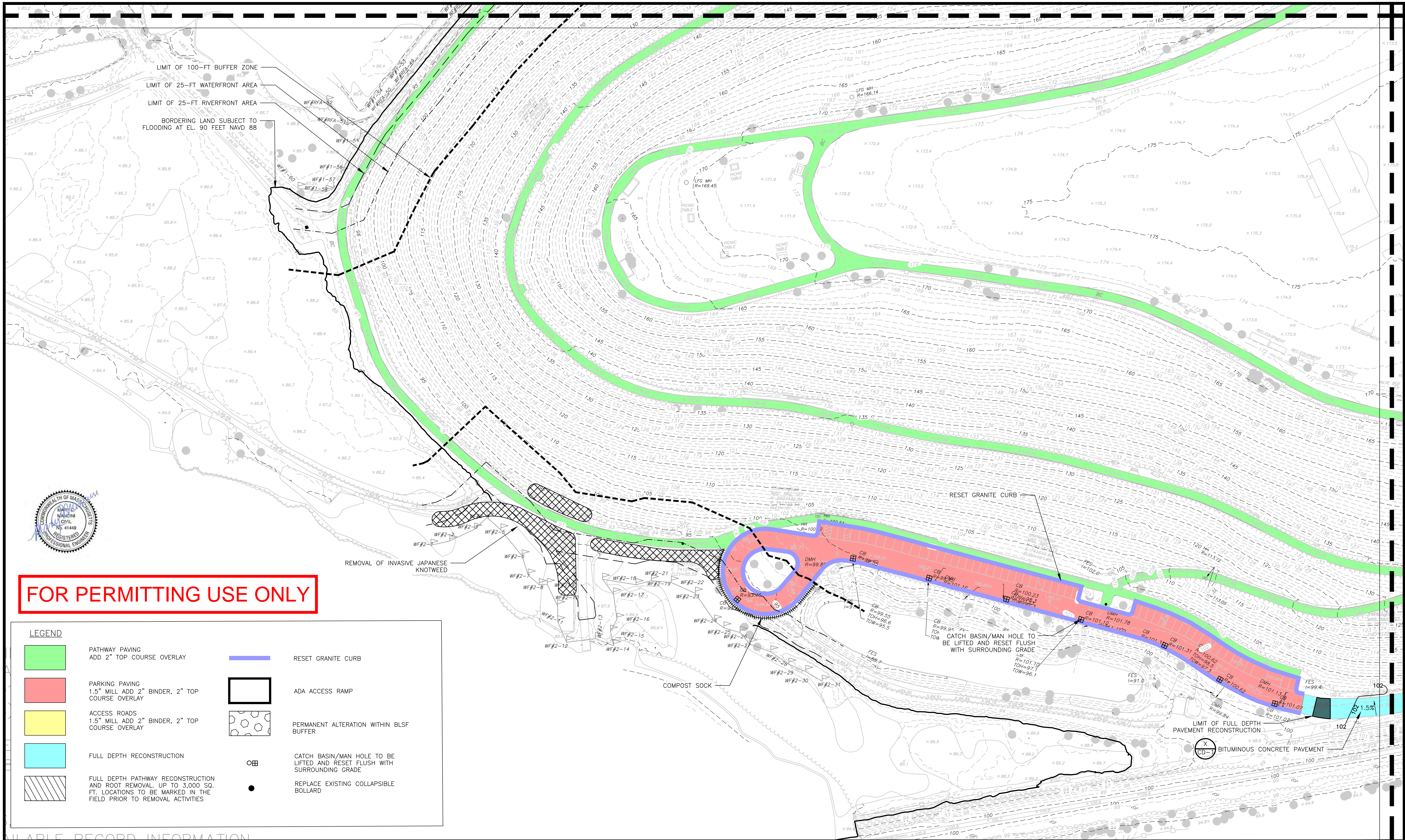
LEGEND

	PATHWAY PAVING ADD 2" TOP COURSE OVERLAY		RESET GRANITE CURB
	PARKING PAVING 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		ADA ACCESS RAMP
	ACCESS ROADS 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		PERMANENT ALTERATION WITHIN BLSF BUFFER
	FULL DEPTH RECONSTRUCTION		CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
	FULL DEPTH PATHWAY RECONSTRUCTION AND ROOT REMOVAL, UP TO 3,000 SQ. FT. LOCATIONS TO BE MARKED IN THE FIELD PRIOR TO REMOVAL ACTIVITIES		REPLACE EXISTING COLLAPSIBLE BOLLARD

FOR PERMITTING USE ONLY



Prepared By: Consultant Project No. 254479	 NORTH	No. Date Revision	Project Name.: Design Improvements To Millennium Park	BPRD Project No. 51226 Date 08/30/2021 Scale 1" = 50' Drawn J. BRONKANT Checked G. HOWARD	Sheet Name.: PAVING PLAN II	Section: C-9
		Approved By:		Date:	Sheet Name.:	Section:



LIMIT OF 100-FT BUFFER ZONE
 LIMIT OF 25-FT WATERFRONT AREA
 LIMIT OF 25-FT RIVERFRONT AREA
 BORDERING LAND SUBJECT TO FLOODING AT EL. 90 FEET NAVD 88



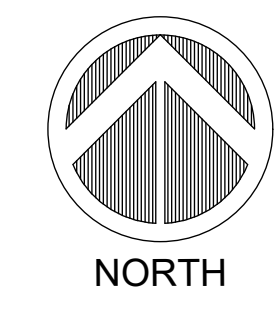
FOR PERMITTING USE ONLY

LEGEND

	PATHWAY PAVING ADD 2" TOP COURSE OVERLAY		RESET GRANITE CURB
	PARKING PAVING 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		ADA ACCESS RAMP
	ACCESS ROADS 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		PERMANENT ALTERATION WITHIN BLSF BUFFER
	FULL DEPTH RECONSTRUCTION		CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
	FULL DEPTH PATHWAY RECONSTRUCTION AND ROOT REMOVAL UP TO 3,000 SQ. FT. LOCATIONS TO BE MARKED IN THE FIELD PRIOR TO REMOVAL ACTIVITIES		REPLACE EXISTING COLLAPSIBLE BOLLARD

Prepared By:
CDM Smith

Consultant Project No. 254479



No.	Date	Revision

Approved By: _____ Date: _____



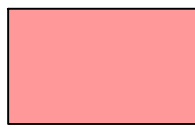

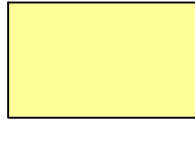
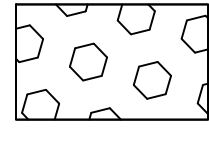
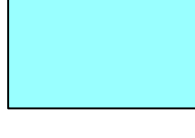

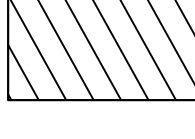

Project Name.:
Design Improvements To Millennium Park

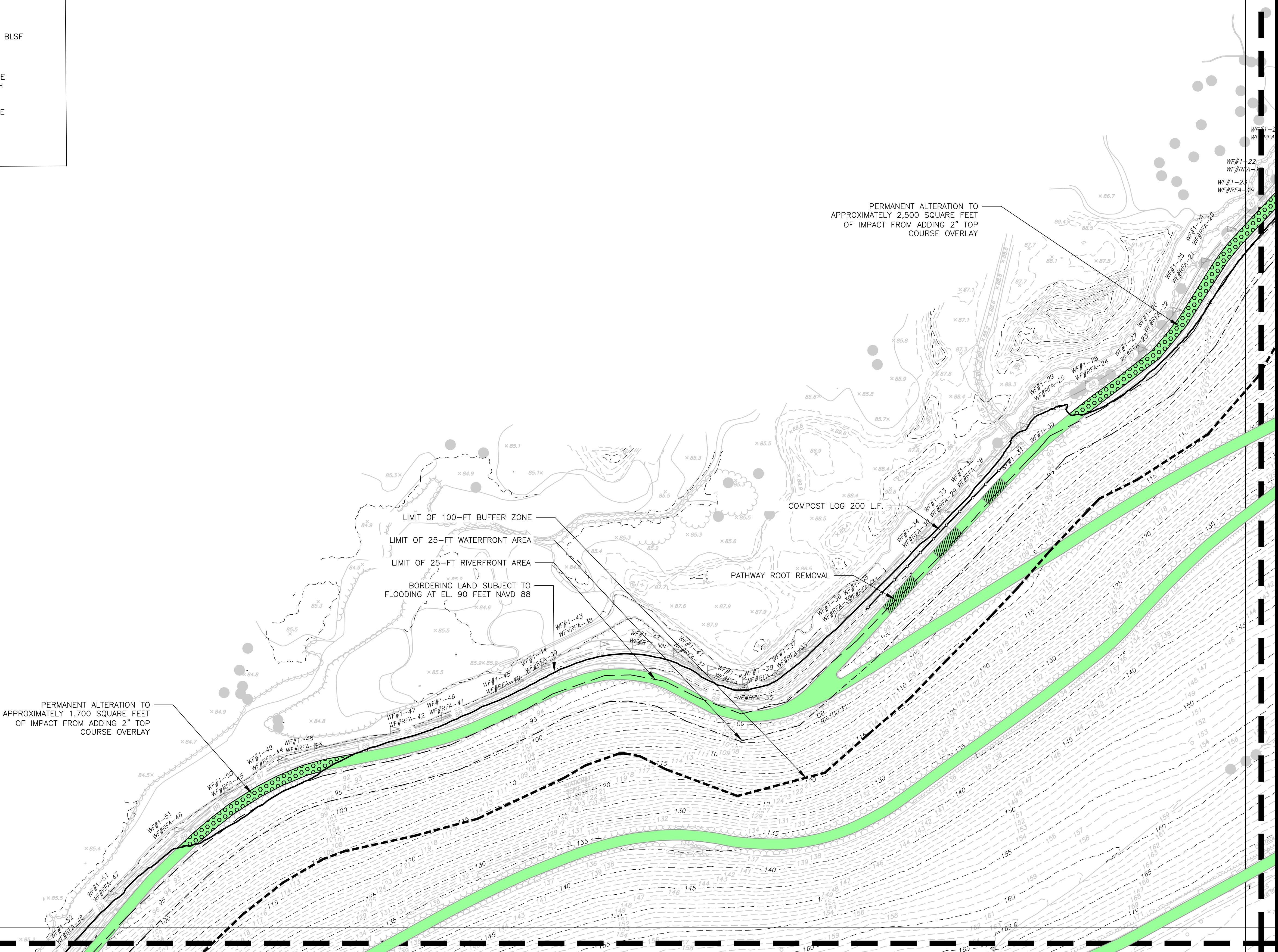
BPRD Project No. 51226
 Date 08/30/2021
 Scale 1" = 50'
 Drawn J. BRONKANT
 Checked G. HOWARD

Sheet Name.:
PAVING PLAN III



Section:
C-10

LEGEND

	PATHWAY PAVING ADD 2" TOP COURSE OVERLAY		RESET GRANITE CURB
	PARKING PAVING 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		ADA ACCESS RAMP
	ACCESS ROADS 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		PERMANENT ALTERATION WITHIN BLSF BUFFER
	FULL DEPTH RECONSTRUCTION		CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
	FULL DEPTH PATHWAY RECONSTRUCTION AND ROOT REMOVAL UP TO 3,000 SQ. FT. LOCATIONS TO BE MARKED IN THE FIELD PRIOR TO REMOVAL ACTIVITIES		REPLACE EXISTING COLLAPSIBLE BOLLARD



FOR PERMITTING USE ONLY

Prepared By:  Consultant Project No. 254479	 NORTH	No. Date Revision	Project Name.: Design Improvements To Millennium Park	BPRD Project No. 51226 Date 08/30/2021 Scale 1" = 50' Drawn J. BRONENKANT Checked G. HOWARD	Sheet Name.: PAVING PLAN IV	Section: C-11
		Approved By:		Date:	BPRD Project No. 51226 Date 08/30/2021 Scale 1" = 50' Drawn J. BRONENKANT Checked G. HOWARD	Sheet Name.: PAVING PLAN IV

NOTICE OF INTENT

Millennium Park Design Improvements

City of Boston

Parks and Recreation
Department

September 2021



Table of Contents

Notice of Intent Form

Stormwater Redevelopment Checklist

Figures

- Figure 1 Project Location and Estimated Habitats Map
- Figure 2 FEMA Floodplain Map
- Figure 3 Estimated and Priority Habitat Map

Attachment A - Project Narrative

1.0	Introduction and Proposed Work.....	A-1
2.0	Existing Conditions.....	A-2
3.0	Mitigation Measures	A-3
4.0	Compliance with Performance Standards.....	A-4
5.0	Climate Change Considerations	A-6
6.0	Summary.....	A-7

Attachment B – Abutter Notification Information

Attachment C – Materials Safety Data Sheet

Attachment D – Project Plans (bound separately)

Massachusetts Department of Environmental Protection

Bureau of Resource Protection - Wetlands

WPA Form 3 - Notice of Intent

Massachusetts Wetlands Protection Act M.G.L. c. 131, §40

Provided by MassDEP:
MassDEP File #:
eDEP Transaction #:1289634
City/Town:BOSTON

A.General Information

1. Project Location:

a. Street Address GARDNER STREET
b. City/Town BOSTON c. Zip Code 02132
d. Latitude 42.28300N e. Longitude 71.18496W
f. Map/Plat # 2009010010 g.Parcel/Lot # N/A

2. Applicant:

Individual Organization

a. First Name RYAN b.Last Name WOODS
c. Organization BOSTON PARKS AND RECREATION DEPARTMENT
d. Mailing Address 1010 MASSACHUSETTS AVENUE, 3RD FLOOR
e. City/Town BOSTON f. State MA g. Zip Code 02118
h. Phone Number i. Fax j. Email

3.Property Owner:

more than one owner

a. First Name RYAN b. Last Name WOODS
c. Organization BOSTON PARKS AND RECREATION DEPARTMENT
d. Mailing Address 1010 MASSACHUSETTS AVENUE, 3RD FLOOR
e. City/Town BOSTON f.State MA g. Zip Code 02118
h. Phone Number i. Fax j.Email

4.Representative:

a. First Name GLEN b. Last Name HOWARD
c. Organization CDM SMITH INC.
d. Mailing Address 75 STATE STREET, SUITE 701
e. City/Town BOSTON f. State MA g. Zip Code 02109
h.Phone Number 617-452-6630 i.Fax 617-345-3901 j.Email HOWARDGD@cdmsmith.com

5.Total WPA Fee Paid (Automatically inserted from NOI Wetland Fee Transmittal Form):

a.Total Fee Paid b.State Fee Paid c.City/Town Fee Paid

6.General Project Description:

REPLACE EXISTING PAVING OR MILLING AND OVERLAYING EXISTING PAVEMENT WITHIN THE LIMITS OF THE EXISTING PAVED ACCESS ROADWAYS, PARKING AREAS, AND RE-SETTING EXISTING GRANITE CURB. ADD 2 INCHES OF TOP COURSE OVERLAY ON WALKING PATHS.

7a.Project Type:

- 1. Single Family Home 2. Residential Subdivision
3. Limited Project Driveway Crossing 4. Commercial/Industrial
5. Dock/Pier 6. Utilities
7. Coastal Engineering Structure 8. Agriculture (eg., cranberries, forestry)
9. Transportation 10. Other

Massachusetts Department of Environmental Protection

Bureau of Resource Protection - Wetlands

WPA Form 3 - Notice of Intent

Massachusetts Wetlands Protection Act M.G.L. c. 131, §40

Provided by MassDEP:
 MassDEP File #:
 eDEP Transaction #:1289634
 City/Town:BOSTON

7b. Is any portion of the proposed activity eligible to be treated as a limited project subject to 310 CMR 10.24 (coastal) or 310 CMR 10.53 (inland)?

1. Yes No If yes, describe which limited project applies to this project:
 2. Limited Project

8. Property recorded at the Registry of Deeds for:

a.County: **b.Certificate:** **c.Book:** **d.Page:**
 SUFFOLK

B. Buffer Zone & Resource Area Impacts (temporary & permanent)

1. Buffer Zone & Resource Area Impacts (temporary & permanent):

This is a Buffer Zone only project - Check if the project is located only in the Buffer Zone of a Bordering Vegetated Wetland, Inland Bank, or Coastal Resource Area.

2. Inland Resource Areas: (See 310 CMR 10.54 - 10.58, if not applicable, go to Section B.3. Coastal Resource Areas)

Resource Area	Size of Proposed Alteration	Proposed Replacement (if any)
a. <input type="checkbox"/> Bank	1. linear feet	2. linear feet
b. <input type="checkbox"/> Bordering Vegetated Wetland	1. square feet	2. square feet
c. <input type="checkbox"/> Land under Waterbodies and Waterways	1. Square feet	2. square feet
	3. cubic yards dredged	
d. <input checked="" type="checkbox"/> Bordering Land Subject to Flooding	12200 1. square feet -2053 3. cubic feet of flood storage lost	12200 2. square feet 4. cubic feet replaced
e. <input type="checkbox"/> Isolated Land Subject to Flooding	1. square feet	
	2. cubic feet of flood storage lost	3. cubic feet replaced
f. <input checked="" type="checkbox"/> Riverfront Area	Sawmill Brook 1. Name of Waterway (if any)	
2. Width of Riverfront Area (check one)	<input checked="" type="checkbox"/> 25 ft. - Designated Densely Developed Areas only <input type="checkbox"/> 100 ft. - New agricultural projects only <input type="checkbox"/> 200 ft. - All other projects	
3. Total area of Riverfront Area on the site of the proposed project		72200 square feet
4. Proposed Alteration of the Riverfront Area:		
21184	21184	
a. total square feet	b. square feet within 100 ft.	c. square feet between 100 ft.

Massachusetts Department of Environmental Protection

Bureau of Resource Protection - Wetlands

WPA Form 3 - Notice of Intent

Massachusetts Wetlands Protection Act M.G.L. c. 131, §40

Provided by MassDEP:
 MassDEP File #:
 eDEP Transaction #:1289634
 City/Town:BOSTON

and 200 ft.

5. Has an alternatives analysis been done and is it attached to this NOI? Yes No

6. Was the lot where the activity is proposed created prior to August 1, 1996? Yes No

3.Coastal Resource Areas: (See 310 CMR 10.25 - 10.35)

Resource Area Size of Proposed Alteration Proposed Replacement (if any)

a. <input type="checkbox"/> Designated Port Areas	Indicate size under	Land under the ocean below,
b. <input type="checkbox"/> Land Under the Ocean	1. square feet	
	2. cubic yards dredged	
c. <input type="checkbox"/> Barrier Beaches	Indicate size under Coastal Beaches and/or Coastal Dunes, below	
d. <input type="checkbox"/> Coastal Beaches	1. square feet	2. cubic yards beach nourishment
e. <input type="checkbox"/> Coastal Dunes	1. square feet	2. cubic yards dune nourishment
f. <input type="checkbox"/> Coastal Banks	1. linear feet	
g. <input type="checkbox"/> Rocky Intertidal Shores	1. square feet	
h. <input type="checkbox"/> Salt Marshes	1. square feet	2. sq ft restoration, rehab, crea.
i. <input type="checkbox"/> Land Under Salt Ponds	1. square feet	
	2. cubic yards dredged	
j. <input type="checkbox"/> Land Containing Shellfish	1. square feet	
k. <input type="checkbox"/> Fish Runs	Indicate size under Coastal Banks, Inland Bank, Land Under the Ocean, and/or inland Land Under Waterbodies and Waterways, above	
	1. cubic yards dredged	
l. <input type="checkbox"/> Land Subject to Coastal Storm Flowage	1. square feet	

4.Restoration/Enhancement

Restoration/Replacement

If the project is for the purpose of restoring or enhancing a wetland resource area in addition to the square footage that has been entered in Section B.2.b or B.3.h above, please entered the additional amount here.

a. square feet of BVW

b. square feet of Salt Marsh

5.Projects Involves Stream Crossings

Massachusetts Department of Environmental Protection

Bureau of Resource Protection - Wetlands

WPA Form 3 - Notice of Intent

Massachusetts Wetlands Protection Act M.G.L. c. 131, §40

Provided by MassDEP:
MassDEP File #:
eDEP Transaction #:1289634
City/Town:BOSTON

Project Involves Streams Crossings

If the project involves Stream Crossings, please enter the number of new stream crossings/number of replacement stream crossings.

a. number of new stream crossings

b. number of replacement stream crossings

C. Other Applicable Standards and Requirements

Streamlined Massachusetts Endangered Species Act/Wetlands Protection Act Review

1. Is any portion of the proposed project located in **Estimated Habitat of Rare Wildlife** as indicated on the most recent Estimated Habitat Map of State-Listed Rare Wetland Wildlife published by the Natural Heritage of Endangered Species program (NHESP)?

a. Yes No

If yes, include proof of mailing or hand delivery of NOI to:

Natural Heritage and Endangered Species
Program
Division of Fisheries and Wildlife
1 Rabbit Hill Road
Westborough, MA 01581

b. Date of map: October 6, 2021

If yes, the project is also subject to Massachusetts Endangered Species Act (MESA) review (321 CMR 10.18)...

c. Submit Supplemental Information for Endangered Species Review * (Check boxes as they apply)

1. Percentage/acreage of property to be altered: Parcel size is 362,420 sf (8.3 acres)

(a) within Wetland Resource Area	1,850 sf	percentage/acreage	0.5% (0.04 acre)
(b) outside Resource Area	6,094 sf	percentage/acreage	1.7% (0.14 acre)

2. Assessor's Map or right-of-way plan of site

3. Project plans for entire project site, including wetland resource areas and areas outside of wetland jurisdiction, showing existing and proposed conditions, existing and proposed tree/vegetation clearing line, and clearly demarcated limits of work **

a. Project description (including description of impacts outside of wetland resource area & buffer zone)

b. Photographs representative of the site

c. MESA filing fee (fee information available at: <http://www.mass.gov/eea/agencies/dfg/dfw/natural-heritage/regulatory-review/mass-endangered-species-act-mesa/esa-fee-schedule.html>)

Make check payable to "Natural Heritage & Endangered Species Fund" and **mail to NHESP** at above address

Projects altering 10 or more acres of land, also submit:

d. Vegetation cover type map of site

e. Project plans showing Priority & Estimated Habitat boundaries

d. OR Check One of the following

1. Project is exempt from MESA review. Attach applicant letter indicating which MESA exemption applies. (See 321 CMR 10.14, <http://www.mass.gov/eea/agencies/dfg/dfw/laws-regulations/cmr/321-cmr-1000-massachusetts-endangered-species-act.html#10.14>; the NOI must still be sent to NHESP if the project is within estimated habitat pursuant to 310 CMR 10.37 and 10.59.)

2. Separate MESA review ongoing.

a. NHESP Tracking Number

□ **Massachusetts Department of Environmental Protection**

Bureau of Resource Protection - Wetlands

WPA Form 3 - Notice of Intent

Massachusetts Wetlands Protection Act M.G.L. c. 131, §40

Provided by MassDEP:
MassDEP File #:
eDEP Transaction #:1289634
City/Town:BOSTON

b. Date submitted to NHESP

3. Separate MESA review completed.

Include copy of NHESP "no Take" determination or valid Conservation & Management Permit with approved plan.

* Some projects **not** in Estimated Habitat may be located in Priority Habitat, and require NHESP review...

2. For coastal projects only, is any portion of the proposed project located below the mean high waterline or in a fish run?

a. Not applicable - project is in inland resource area only

b. Yes No

If yes, include proof of mailing or hand delivery of NOI to either:

South Shore - Cohasset to Rhode Island, and the Cape & Islands:

North Shore - Hull to New Hampshire:

Division of Marine Fisheries -
Southeast Marine Fisheries Station
Attn: Environmental Reviewer
836 S. Rodney French Blvd
New Bedford, MA 02744

Division of Marine Fisheries -
North Shore Office
Attn: Environmental Reviewer
30 Emerson Avenue
Gloucester, MA 01930

If yes, it may require a Chapter 91 license. For coastal towns in the Northeast Region, please contact MassDEP's Boston Office. For coastal towns in the Southeast Region, please contact MassDEP's Southeast Regional office.

3. Is any portion of the proposed project within an Area of Critical Environmental Concern (ACEC)?

a. Yes No

If yes, provide name of ACEC (see instructions to WPA Form 3 or DEP Website for ACEC locations). **Note:** electronic filers click on Website.

b. ACEC Name

4. Is any portion of the proposed project within an area designated as an Outstanding Resource Water (ORW) as designated in the Massachusetts Surface Water Quality Standards, 314 CMR 4.00?

a. Yes No

5. Is any portion of the site subject to a Wetlands Restriction Order under the Inland Wetlands Restriction Act (M.G.L.c. 131, § 40A) or the Coastal Wetlands Restriction Act (M.G.L.c. 130, § 105)?

a. Yes No

6. Is this project subject to provisions of the MassDEP Stormwater Management Standards?

a. Yes, Attach a copy of the Stormwater Report as required by the Stormwater Management Standards per 310 CMR 10.05(6)(k)-(q) and check if:

1. Applying for Low Impact Development (LID) site design credits (as described in Stormwater Management Handbook Vol.2, Chapter 3)

2. A portion of the site constitutes redevelopment

3. Proprietary BMPs are included in the Stormwater Management System

b. No, Explain why the project is exempt:

1. Single Family Home

Massachusetts Department of Environmental Protection

Bureau of Resource Protection - Wetlands

WPA Form 3 - Notice of Intent

Massachusetts Wetlands Protection Act M.G.L. c. 131, §40

Provided by MassDEP:
MassDEP File #:
eDEP Transaction #:1289634
City/Town:BOSTON

- 2. Emergency Road Repair
- 3. Small Residential Subdivision (less than or equal to 4 single-family houses or less than or equal to 4 units in multi-family housing project) with no discharge to Critical Areas.

D. Additional Information

Applicants must include the following with this Notice of Intent (NOI). See instructions for details.

Online Users: Attach the document transaction number (provided on your receipt page) for any of the following information you submit to the Department by regular mail delivery.

- 1. USGS or other map of the area (along with a narrative description, if necessary) containing sufficient information for the Conservation Commission and the Department to locate the site. (Electronic filers may omit this item.)
- 2. Plans identifying the location of proposed activities (including activities proposed to serve as a Bordering Vegetated Wetland [BVW] replication area or other mitigating measure) relative to the boundaries of each affected resource area.
- 3. Identify the method for BVW and other resource area boundary delineations (MassDEP BVW Field Data Form(s). Determination of Applicability, Order of Resource Area Delineation, etc.), and attach documentation of the methodology.
- 4. List the titles and dates for all plans and other materials submitted with this NOI.

a. Plan Title: b. Plan Prepared By: c. Plan Signed/Stamped By: d. Revised Final Date: e. Scale:

SHEET C-7: PAVING SITE PLAN OVERVIEW	J. BRONENKANT/R. BUTTON		Aug 2021	
SHEET C-8: PAVING PLAN I	J. BRONENKANT/R. BUTTON		Aug 2021	
SHEET C-9: PAVING PLAN II	J. BRONENKANT/R. BUTTON		Aug 2021	
SHEET C-10: PAVING PLAN III	J. BRONENKANT/R. BUTTON		Aug 2021	
SHEET C-11: PAVING PLAN IV	J. BRONENKANT/R. BUTTON		Aug 2021	

- 5. If there is more than one property owner, please attach a list of these property owners not listed on this form.
- 6. Attach proof of mailing for Natural Heritage and Endangered Species Program, if needed.
- 7. Attach proof of mailing for Massachusetts Division of Marine Fisheries, if needed.
- 8. Attach NOI Wetland Fee Transmittal Form.
- 9. Attach Stormwater Report, if needed.

Massachusetts Department of Environmental Protection
Bureau of Resource Protection - Wetlands
WPA Form 3 - Notice of Intent
Massachusetts Wetlands Protection Act M.G.L. c. 131, §40

Provided by MassDEP:
MassDEP File #:
eDEP Transaction #: 1289634
City/Town: BOSTON

E. Fees

1. Fee Exempt: No filing fee shall be assessed for projects of any city, town, county, or district of the Commonwealth, federally recognized Indian tribe housing authority, municipal housing authority, or the Massachusetts Bay Transportation Authority.

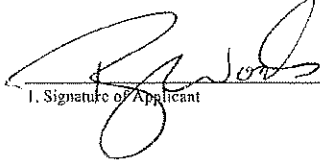
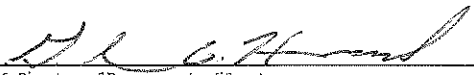
Applicants must submit the following information (in addition to pages 1 and 2 of the NOI Wetland Fee Transmittal Form) to confirm fee payment:

2. Municipal Check Number	3. Check date
4. State Check Number	5. Check date
6. Payer name on check: First Name	7. Payer name on check: Last Name

F. Signatures and Submittal Requirements

I hereby certify under the penalties of perjury that the foregoing Notice of Intent and accompanying plans, documents, and supporting data are true and complete to the best of my knowledge. I understand that the Conservation Commission will place notification of this Notice in a local newspaper at the expense of the applicant in accordance with the wetlands regulations, 310 CMR 10.05(5)(a).

I further certify under penalties of perjury that all abutters were notified of this application, pursuant to the requirements of M.G.L. c. 131, § 40. Notice must be made by Certificate of Mailing or in writing by hand delivery or certified mail (return receipt requested) to all abutters within 100 feet of the property line of the project location.

 1. Signature of Applicant	<u>9/21/2021</u> 2. Date
3. Signature of Property Owner (if different)	4. Date
 5. Signature of Representative (if any)	<u>9/22/2021</u> 6. Date

For Conservation Commission:

Two copies of the completed Notice of Intent (Form 3), including supporting plans and documents, two copies of the NOI Wetland Fee Transmittal Form, and the city/town fee payment, to the Conservation Commission by certified mail or hand delivery.

For MassDEP:

One copy of the completed Notice of Intent (Form 3), including supporting plans and documents, one copy of the NOI Wetland Fee Transmittal Form, and a copy of the state fee payment to the MassDEP Regional Office (see Instructions) by certified mail or hand delivery.

Other:

If the applicant has checked the "yes" box in Section C, Items 1-3, above, refer to that section and the Instructions for additional submittal requirements.

The original and copies must be sent simultaneously. Failure by the applicant to send copies in a timely manner may result in dismissal of the Notice of Intent.

Project: Millennium Park Design Improvements

Redevelopment Checklist

Existing Conditions

- On-site: For all redevelopment projects, proponents should document existing conditions, including a description of extent of impervious surfaces, soil types, existing land uses with higher potential pollutant loads, and current onsite stormwater management practices.

RESPONSE: See Attached Project Plans and Notice of Intent for the description and depiction of existing conditions.

- Watershed: Proponents should determine whether the project is located in a watershed or subwatershed, where flooding, low streamflow or poor water quality is an issue.

The Project

Is the project a redevelopment project?

- Maintenance and improvement of existing roadways
- Development of rehabilitation, expansion or phased project on redeveloped site, or
- Remedial stormwater project

For non-roadway projects, is any portion of the project outside the definition of redevelopment?

RESPONSE: Yes, no new impervious area proposed. The project meets the criteria as a redevelopment project under the Massachusetts Stormwater Management Standards.

- Development of previously undeveloped area
- Increase in impervious surface

If a component of the project is not a redevelopment project, the proponent shall use the checklist set forth below to document that at a minimum the proposed stormwater management system fully meets each Standard for that component. The proponent shall also document that the proposed stormwater management system meets the requirements of Standard 7 for the remainder of the project.

The Stormwater Management Standards

The redevelopment checklist reviews compliance with each of the Stormwater Management Standards in order.

Standard 1: (Untreated discharges)

No new stormwater conveyances (e.g., outfalls) may discharge untreated stormwater directly to or cause erosion in wetlands or waters of the Commonwealth.

Same rule applies for new developments and redevelopments.

Full compliance with Standard 1 is required for new outfalls.

- What BMPs are proposed to ensure that all new discharges associated with the discharge are adequately treated?
- What BMPs are proposed to ensure that no new discharges cause erosion in wetlands or waters of the Commonwealth?
- Will the proposed discharge comply with all applicable requirements of the Massachusetts Clean Waters Act and the regulations promulgated thereunder at 314 CMR 3.00, 314 CMR 4.00 and 314 CMR 5.00?

Existing outfalls shall be brought into compliance with Standard 1 to the maximum extent practicable.

- Are there any existing discharges associated with the redevelopment project for which new treatment could be provided?
- If so, the proponent shall specify the stormwater BMP retrofit measures that have been considered to ensure that the discharges are adequately treated and indicate the reasons for adopting or rejecting those measures. (See Section entitled “Retrofit of Existing BMPs”.)
- What BMPs have been considered to prevent erosion from existing stormwater discharges?

RESPONSE: No new outfalls proposed.

Standard 2: (Peak rate control and flood prevention)

Stormwater management systems must be designed so that post-development peak discharge rates do not exceed pre-development peak discharge rates. This Standard may be waived for land subject to coastal storm flowage.

Full compliance for any component that is not a redevelopment

Compliance to the Maximum Extent Practicable:

- Does the redevelopment design meet Standard 2, comparing post-development to pre-development conditions?

RESPONSE: With no new impervious area, the annual recharge from the post-development site should very closely approximate the annual recharge from the pre-development or existing site conditions.

- If not, the applicant shall document an analysis of alternative approaches for meeting the Standard. (See Menu of Strategies to Reduce Runoff and Peak Flows and/or Increase Recharge Menu included at the end of this chapter.)

Improvement of existing conditions:

- Does the project reduce the volume and/or rate of runoff to less than current estimated conditions? Has the applicant considered all the alternatives for reducing the volume and/or rate of runoff from the site? (See Menu.)
- Is the project located within a watershed subject to damage by flooding during the 2-year or 10-year 24-hour storm event? If so, does the project design provide for attenuation of the 2-year and 10-year 24-hour storm event to less than current estimated conditions? Have measures been implemented to reduce the volume of runoff from the site resulting from the 2 year or 10-year 24-hour storm event? (See Menu.)

- Is the project located adjacent to a water body or watercourse subject to adverse impacts from flooding during the 100-year 24-hour storm event? If so, are portions of the site available to increase flood storage adjacent to existing Bordering Land Subject to Flooding (BLSF)?
- Have measures been implemented to attenuate peak rates of discharge during the 100-year 24-hour storm event to less than the peak rates under current estimated conditions? Have measures been implemented to reduce the volume of runoff from the site resulting from the 100-year 24-hour storm event? (See Menu.)

RESPONSE: Not Applicable

Standard 3: (Recharge to Ground water)

Loss of annual recharge to ground water shall be eliminated or minimized through the use of infiltration measures, including environmentally sensitive site design, low impact development techniques, best management practices, and good operation and maintenance. At a minimum, the annual recharge from the post-development site shall approximate the annual recharge from the pre-development conditions based on soil type. This Standard is met when the stormwater management system is designed to infiltrate the required recharge volume as determined in accordance with the Massachusetts Stormwater Handbook.

Full compliance for any component that is not a redevelopment

RESPONSE: Yes, no new impervious area proposed.

Compliance to the Maximum Extent Practicable:

- Does the redevelopment design meet Standard 3, comparing post-development to pre-development conditions?
- If not, the applicant shall document an analysis of alternative approaches for meeting the Standard?
- What soil types are present on the site? Is the site comprised solely of C and D soils and bedrock at the land surface?
- Does the project include sites where recharge is proposed at or adjacent to an area classified as contaminated, sites where contamination has been capped in place, sites that have an Activity and Use Limitation (AUL) that precludes inducing runoff to the groundwater, pursuant to MGL Chapter 21E and the Massachusetts Contingency Plan 310 CMR 40.0000; sites that are the location of a solid waste landfill as defined in 310 CMR 19.000; or sites where groundwater from the recharge location flows directly toward a solid waste landfill or 21E site?¹
- Is the stormwater runoff from a land use with a higher potential pollutant load?
- Is the discharge to the ground located within the Zone II or Interim Wellhead Protection Area of a public water supply?
- Does the site have an infiltration rate greater than 2.4 inches per hour?

Improvements to Existing Conditions:

- Does the project increase the required recharge volume over existing (developed) conditions? If so, can the project be redesigned to reduce the required recharge volume by decreasing impervious surfaces (make building higher, put parking under the building, narrower roads,

¹ A mounding analysis is needed if a site falls within this category. See Volume 3.

sidewalks on only one side of street, etc.) or using low impact development techniques such as porous pavement?

- Is the project located within a basin or sub-basin that has been categorized as under high or medium stress by the Massachusetts Water Resources Commission, or where there is other evidence that there are rivers and streams experiencing low flow problems? If so, have measures been considered to replace the natural recharge lost as a result of the prior development? (See Menu.)
- Has the applicant evaluated measures for reducing site runoff? (See Menu.)

Standard 4: (80% TSS Removal)

Stormwater management systems must be designed to remove 80% of the average annual post-construction load of Total Suspended Solids (TSS). This standard is met when:

- a. Suitable practices for source control and pollution prevention are identified in a long-term pollution prevention plan and thereafter are implemented and maintained;***
- b. Stormwater BMPs are sized to capture the required water quality volume determined in accordance with the Massachusetts Stormwater Handbook; and***
- c. Pretreatment is provided in accordance with the Massachusetts Stormwater Handbook.***

Full compliance for any component that is not a redevelopment

Full compliance with the long-term pollution plan requirement for new developments and redevelopments.

- Has the proponent developed a long-term pollution plan that fully meets the requirements of Standard 4?
- Does the pollution prevention plan include the following source control measures?
 - Street sweeping
 - Proper management of snow, salt, sand and other deicing chemicals
 - Proper management of fertilizers, herbicides and pesticides
 - Stabilization of existing eroding surfaces

Compliance to the Maximum Extent Practicable for the other requirements:

- Does the redevelopment design provide for treatment of all runoff from existing (as well as new) impervious areas to achieve 80% TSS removal? If 80% TSS removal is not achieved, has the stormwater management system been designed to remove TSS to the maximum extent practicable?
- Have the proposed stormwater BMPs been properly sized to capture the prescribed runoff volume?
 - One inch rule applies for discharge
 - within a Zone II or Interim Wellhead Protection Area,
 - near or to another critical area,
 - from a land use with a higher potential pollutant load
 - to the ground where the infiltration rate is greater than 2.4 inches per hour
- Has adequate pretreatment been proposed?
 - 44% TSS Removal Pretreatment Requirement applies if:
 - Stormwater runoff is from a land use with a higher potential pollutant load
 - Stormwater is discharged
 - To the ground within the Zone II or Interim Wellhead Protection Area of a Public Water Supply

- To the ground with an infiltration rate greater than 2.4 inches per hour
 - Near or to an Outstanding Resource Water, Special Resource Water, Cold-Water Fishery, Shellfish Growing Area, or Bathing Beach.
- If the stormwater BMPs do not meet all the requirements set forth above, the applicant shall document an analysis of alternative approaches for meeting the these requirements. (See Section on Retrofitting Existing BMPs (the “Retrofit Section”).

Improvements to Existing Conditions:

- Have measures been provided to achieve at least partial compliance with the TSS removal standard?
- Have any of the best management practices in the Retrofit Section been considered?
- Have any of the following pollution prevention measures been considered?
 - Reduction or elimination of winter sanding, where safe and prudent to do so
 - Tighter controls over the application of fertilizers, herbicides, and pesticides
 - Landscaping that reduces the need for fertilizer, herbicides and pesticides
 - High frequency sweeping of paved surfaces using vacuum sweepers
 - Improved catch basin cleaning
 - Waterfowl control programs
- Are there any discharges (new or existing) to impaired waters? If so, see TMDL section.

RESPONSE: The existing stormwater management system provides 80% TSS removal.

Standard 5 (Higher Potential Pollutant Loads (HPPL))

For land uses with higher potential pollutant loads, source control and pollution prevention shall be implemented in accordance with the Massachusetts Stormwater Handbook to eliminate or reduce the discharge of stormwater runoff from such land uses to the maximum extent practicable. If through source control and/or pollution prevention, all land uses with higher potential pollutant loads cannot be completely protected from exposure to rain, snow, snow melt and stormwater runoff, the proponent shall use the specific stormwater BMPs determined by the Department to be suitable for such use as provided in the Massachusetts Stormwater Handbook. Stormwater discharges from land uses with higher potential pollutant loads shall also comply with the requirements of the Massachusetts Clean Waters Act, M.G.L. c. 21, §§ 26-53, and the regulations promulgated thereunder at 314 CMR 3.00, 314 CMR 4.00 and 314 CMR 5.00.

Full compliance for any component that is not a redevelopment.

Full compliance with pollution prevention requirements for new developments and redevelopments.

RESPONSE: Not applicable

Standard 6 (Critical Areas)

Stormwater discharges to a Zone II or Interim Wellhead Protection Area of a public water supply and stormwater discharges near or any other critical area require the use of the specific source control and pollution prevention measures and the specific stormwater best management practices determined by the Department to be suitable for managing discharges to such area, as provided in the Massachusetts Stormwater Handbook. A discharge is near a critical area if there is a strong likelihood of a significant impact occurring to said area, taking into account site-specific factors. Stormwater discharges to Outstanding Resource Waters or Special Resource Waters shall be set back from the receiving water and receive the highest and best practical method of treatment. A “stormwater discharge,” as defined in 314 CMR 3.04(2)(a)1. or (b), to an Outstanding Resource Water or Special

Resource Water shall comply with 314 CMR 3.00 and 314 CMR 4.00. Stormwater discharges to a Zone I or Zone A are prohibited unless essential to the operation of the public water supply.

Full compliance for component of project that is not a redevelopment

Full compliance with pollution prevention requirements for new developments and redevelopments.

RESPONSE: Not applicable

Standard 8: (Erosion, Sediment Control)

A plan to control construction-related impacts, including erosion sedimentation and other pollutant sources during construction and land disturbance activities (construction period erosion, sedimentation, and pollution prevention plan), must be developed and implemented.

All redevelopment projects shall fully comply with Standard 8.

- Has the proponent submitted a construction period erosion, sedimentation and pollution prevention plan that meets the requirements of Standard 8?

RESPONSE: Sedimentation and erosion control will consist of compost logs to be installed downgradient of the root removal work to prevent sediment from entering downstream wetland resource areas.

Standard 9: (Operation and Maintenance)

A long-term operation and maintenance plan must be developed and implemented to ensure that stormwater management systems function as designed.

All redevelopment projects shall fully comply with Standard 9.

- Has the proponent submitted a long-term Operation and Maintenance plan that meets the requirements of Standard 9?

RESPONSE: The park will continue to be maintained by the Boston Parks and Recreation Department (BPRD) in accordance with the approved O&M Plan.

Standard 10 (Illicit Discharges)

All illicit discharges to the stormwater management system are prohibited.

All redevelopment projects shall fully comply with Standard 10.

- Are there any known or suspected illicit discharges to the stormwater management system at the redevelopment project site?
- Has an illicit connection detection program been implemented using visual screening, dye or smoke testing?

RESPONSE: Not applicable

- Have an Illicit Discharge Compliance Statement and associated site map been submitted verifying that there are no illicit discharges to the stormwater management system at the site?

RESPONSE: No, an Illicit Discharge Compliance Statement has not been submitted.

Improvements to Existing Conditions:

- Once all illicit discharges are removed, has the proponent implemented any measures to prevent additional illicit discharges?

FIGURE 1
PROJECT LOCATION

My Map



0.2mi

City of Boston, City of Newton, MassGIS, Esri Canada, Esri, HERE, Garmin, INCREMENT P, USGS, METI/NASA, EPA, USDA

FIGURE 1: LOCUS MAP

FIGURE 2
FLOOD INSURANCE RATE MAP

National Flood Hazard Layer FIRMMette



71°11'19"W 42°17'8"N



71°10'42"W 42°16'42"N

Basemap: USGS National Map: Orthoimagery: Data refreshed October, 2020

Legend

SEE FIS REPORT FOR DETAILED LEGEND AND INDEX MAP FOR FIRM PANEL LAYOUT

SPECIAL FLOOD HAZARD AREAS		Without Base Flood Elevation (BFE) Zone A, V, A99
		With BFE or Depth Zone AE, AO, AH, VE, AR
		Regulatory Floodway
OTHER AREAS OF FLOOD HAZARD		0.2% Annual Chance Flood Hazard, Areas of 1% annual chance flood with average depth less than one foot or with drainage areas of less than one square mile Zone X
		Future Conditions 1% Annual Chance Flood Hazard Zone X
		Area with Reduced Flood Risk due to Levee. See Notes. Zone X
		Area with Flood Risk due to Levee Zone D
OTHER AREAS		NO SCREEN Area of Minimal Flood Hazard Zone X
		Effective LOMRs
GENERAL STRUCTURES		Area of Undetermined Flood Hazard Zone D
		Channel, Culvert, or Storm Sewer
		Levee, Dike, or Floodwall
OTHER FEATURES		20.2 Cross Sections with 1% Annual Chance
		17.5 Water Surface Elevation
		Coastal Transect
		Base Flood Elevation Line (BFE)
		Limit of Study
MAP PANELS		Jurisdiction Boundary
		Coastal Transect Baseline
		Profile Baseline
		Hydrographic Feature
		Digital Data Available
		No Digital Data Available
		Unmapped



The pin displayed on the map is an approximate point selected by the user and does not represent an authoritative property location.

This map complies with FEMA's standards for the use of digital flood maps if it is not void as described below. The basemap shown complies with FEMA's basemap accuracy standards

The flood hazard information is derived directly from the authoritative NFHL web services provided by FEMA. This map was exported on 8/1/2021 at 9:45 AM and does not reflect changes or amendments subsequent to this date and time. The NFHL and effective information may change or become superseded by new data over time.

This map image is void if the one or more of the following map elements do not appear: basemap imagery, flood zone labels, legend, scale bar, map creation date, community identifiers, FIRM panel number, and FIRM effective date. Map images for unmapped and unmodernized areas cannot be used for regulatory purposes.

FIGURE 3
ESTIMATED AND PRIORITY HABITAT MAP

My Map

NHESP_Estimated_Habitats

NHESP Estimated Habitats of Rare Wildlife



NHESP_Priority_Habitats

NHESP Priority Habitats of Rare Species



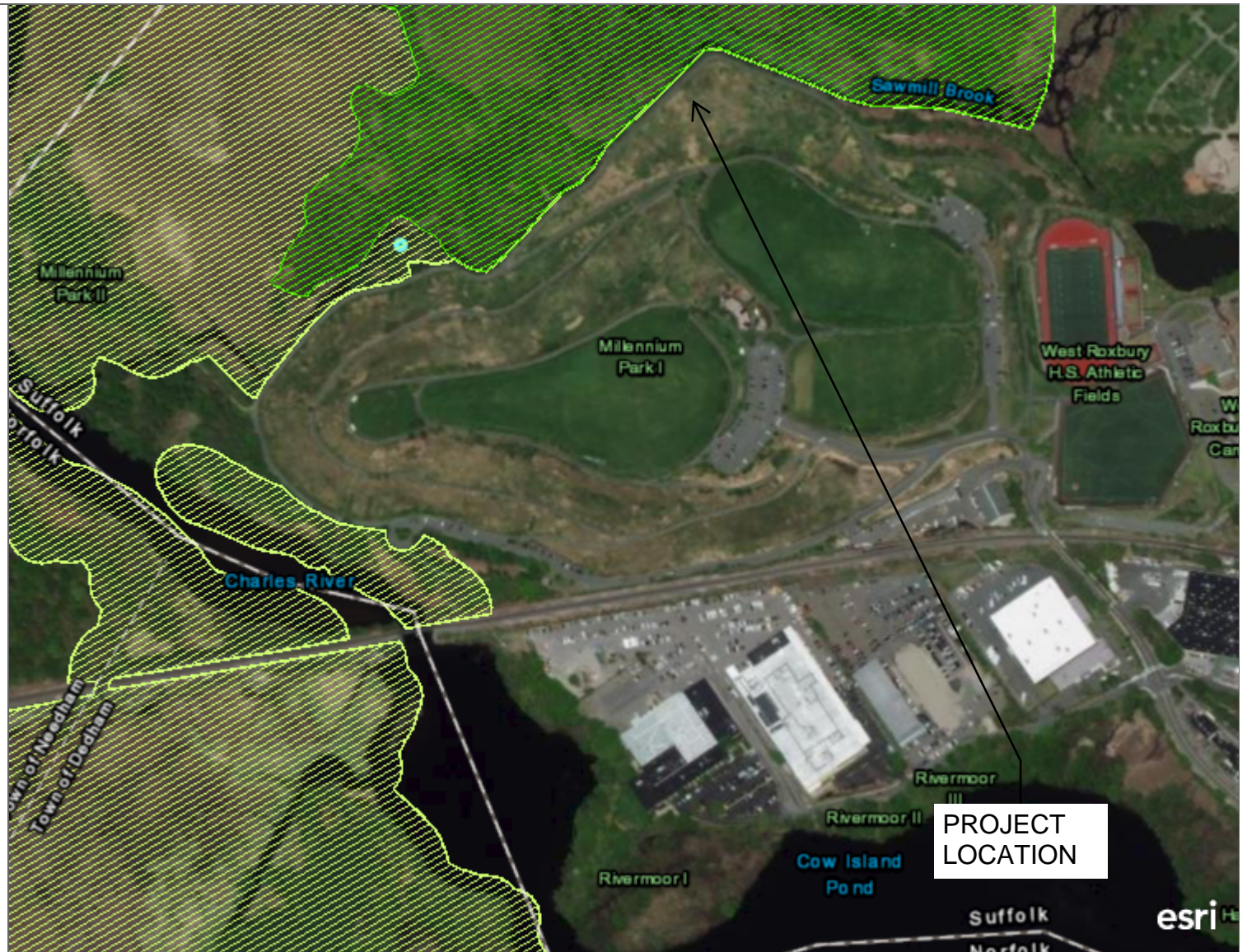
NHESP_Certified_Vernal_Pools

NHESP Certified Vernal Pools



NHESP_Potential_Vernal_Pools

NHESP Potential Vernal Pools



600ft

Maxar | Esri, HERE, Garmin, iPC | MassGIS, NHESP

FIGURE 3: ESTIMATED AND PRIORITY HABITATS MAP

ATTACHMENT A
PROJECT NARRATIVE

Project Narrative

1.0 Introduction and Proposed Work

The Boston Parks and Recreation Department (BPRD) is submitting this Notice of Intent (NOI) for the Design Improvements Project to Millennium Park (the Project) located off Gardner Street in West Roxbury (see Figure 1). Millennium Park is a former landfill (Garden Street Landfill) which was reclaimed as a public park using soils from the Big Dig and capped by installing an impermeable landfill cap. The construction of the landfill cap and park began in 1994 with Millennium Park completed in 1998 and officially opened to the public in December 2000.

The proposed Project consists of upgrading equipment in the existing children's playground (outside of the Conservation Commission's jurisdiction) and replacing existing paving or milling and overlaying existing degraded pavement within the limits of the existing paved access roadways, parking areas and walking pathways as shown on the Plan Sheets included in Attachment D. The paving program consists of the following:

- 1) The walking pathways will receive 2 inches of a topcoat overlay with no disturbance to the existing pavement or existing dense graded base stone except for limited areas noted in (2).
- 2) In limited areas along the north park perimeter walking pathway, existing tree root systems have caused heaving in the existing pavement. In these areas the existing pavement will need to be removed, and tree roots cut and removed by excavating 6 inches down prior to new pavement being installed. In these limited areas the existing dense graded base stone will not be disturbed other than to remove the tree roots. The areas where tree root removal is required are located at the edge of the existing landfill cap and care will need to be taken so there is less potential to damage or disturb the landfill cap from the proposed shallow excavations. A certified arborist will review these locations with the selected Contractor, Boston Parks representatives and CDM Smith prior to any pavement or root removal.
- 3) The southern parking lot will receive milling of existing pavement and overlay with new pavement, and limited spot repairs. There will be no disturbance to the existing dense graded base nor existing binder course.

Proposed work also includes the permanent removal of several patches Japanese knotweed (*Polygonum japonicum*) within the 100-ft buffer zone using the herbicide TZone plus methylated seed oil for surface penetration (see Materials Safety Data Sheet and knotweed removal plan in Attachment C). Barrett Tree is the has been contracted by the BPRD to perform the aerial spraying once this fall and then in the Spring of 2022 when the knotweed is in bloom. Treatment areas will be seeded with a wetland seed mixture or a landfill seed mixture upon completion of the second treatment in spring of 2022.

The proposed work is subject to review by the Boston Conservation Commission under the Massachusetts Wetlands Protection Act (MWPA) (M.G.L. c. 131, s. 40) and its implementing regulations (310 CMR 10.00) (the Regulations) and the City of Boston Ordinance Protecting Local Wetlands and Promoting Climate Change Adaptation in the City of Boston (the Ordinance) and

the Boston Wetland Regulations. Proposed work will temporarily alter Bordering Land Subject to Flooding (BLSF), 25-ft Riverfront Area (RFA), 100-foot Buffer Zone, and the locally jurisdictional Waterfront Area. There will be no expansion of the existing pathways, parking lots, or driveways beyond their existing footprints. There will be no alteration of existing vegetated areas and no change in post closure use. The proposed pavement work of the project is limited to required maintenance and repair. No pavement work has occurred since the original installation in the late 1990's.

2.0 Existing Conditions

A site inspection for wetland resource areas was conducted by Magdalena H. Lofstedt, PWS, on January 7, 2021. Existing field-delineated wetlands resource area boundaries were evaluated for conformance with the MWPA and Regulations (310 CMR 10.00), the U.S. Army Corps of Engineers 1987 Wetlands Delineation Manual (Environmental Laboratory, 1987), and the U.S. Army Corps of Engineers 2011 Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Northcentral and Northeast Region (Version 2.0).

The following wetland resource areas are present along the perimeter of Millennium Park as shown on the project plans in Attachment D.

2.1 Wetland Resource Areas Regulated by MWPA and Regulations (310 CMR 10.00)

2.1.1 Bordering Vegetated Wetland

Bordering Vegetated Wetlands (BVW) is defined as:

“Freshwater wetlands which border on creeks, rivers, streams, ponds, and lakes. The types of freshwater wetlands are wet meadows, marshes, swamps, and bogs. Bordering Vegetated Wetlands are areas where the soils are saturated and/or inundated such that they support a predominance of wetland indicator plants.” [310 CMR 10.55(2)]

The bordering vegetated wetland (BVW) associated with Sawmill Brook that flows to the north and west of Millennium Park was marked in the field with wetland flags WF 1-1 to WF 1-60End.

A second BVW associated with the Charles River was marked in the field by wetland flags WF 2-1 to 2-31End.

2.1.2 Riverfront Area

Riverfront Area (RFA) is defined as:

“the area of land between a river’s mean annual high-water line and a parallel line measured horizontally outward from the river and a parallel line located 200 feet away, except that the parallel line is located: a) 25 feet away in Boston...” [310 CMR 10.58 (2) a]

The City of Boston has a 25-ft Riverfront Area (RFA) shown on the Project Plans in Attachment D. The RFA was offset from the mean annual high water lines flags RFA-1 to RFA-52 and WF 2-1 to 2-31 End.

2.1.3 Bordering Land Subject to Flooding (BLSF)

BLSF is defined as:

“an area with low, flat topography adjacent to and inundated by flood waters rising from creeks, rivers, streams, ponds or lakes. It extends from the banks of these waterways and water bodies.” [310 CMR 10.57]

The Federal Emergency Management Agency (FEMA) Flood Insurance Rate Map (FIRM) of the project area (25025C0066G) identifies the 100-year floodplain (Zone AE) in the project area at elevation 90 feet NAVD 88 see Figure 3 and project plans in Attachment D.

2.2 Wetland Resource Areas Regulated by the Ordinance

The Ordinance regulates activities within the local Waterfront Area:

2.2.1 Waterfront Area

Waterfront Area is *“the portion of the buffer zone which extends twenty-five (25) feet horizontally from the edge of any inland bank, lake, pond, intermittent stream, brook, creek or riverfront area.”* Waterfront Area is important for the protection of adjacent wetland resource areas and for public access to the waterfront.

The portion of the buffer zone which extends twenty-five (25) feet horizontally from the edge of the following wetland resource areas: 1. Any coastal beach, dune, bank, tidal flats, rocky intertidal shores, salt marshes or land containing shellfish; or 2. Any inland bank, lake, pond, intermittent stream, brook, creek, or riverfront area.

The Waterfront Area offset from the 25-ft Riverfront Area is shown on the project plans in Attachment D.

2.3 State-listed Estimated and Priority Habitat

The Massachusetts Natural Heritage & Endangered Species Program shows mapped polygons of Estimated and Priority Habitat outside of the perimeter walking pathways (see Figure 4). There will be no alteration of Estimated nor Priority Habitats from the proposed paving program as all work is located outside of mapped protected habitats.

3.0 Construction Mitigation Measures

The following summary of mitigation measures will be implemented to protect the wetland resource areas associated with Sawmill Brook and Charles River during and after construction.

Sedimentation and Erosion Control Measures During Construction

Prior to commencement of construction, compost logs will be installed at the limits of work where excavation will occur to prevent the transport of sediment to downstream wetlands and Sawmill Brook as shown on the Project Plans in Attachment D.

Spill Control Measures

- Spill containment equipment (e.g., oil absorbent pads, oil absorbent materials, containment booms, shovels, etc.) will be stored in the equipment storage and refueling area in an easily

accessible manner for use in the clean-up of accidental releases of fuel, hydraulic fluid, or other hazardous materials. Should there be an accidental release the proper authorities will be notified in accordance with all applicable federal, state, and local laws.

- To minimize the possibility of hydraulic fluid leaks, all hydraulic lines on all construction equipment and vehicles will be inspected at the end of each workday. If any excessive wear or leakage is observed, the line will be repaired prior to further use. In addition, a supply of oil absorbent materials (i.e., pads, "speedy dry," and/or booms) will be maintained with the equipment at the work area for immediate deployment in the event of an accidental release of fuel, hydraulic fluid, oil, etc.

Post Construction Measures

The following summary of mitigation measures will be implemented to restore any areas affected by short-term impacts that occur in or adjacent wetland resource areas.

- The compost log barrier will not be removed until disturbed areas are revegetated and stabilized.

4.0 Compliance with Performance Standards

4.1 Mass Wetlands Protection Act (M.G.L. c. 131 §40) and Regulations (310 CMR 10.00)

Work proposed herein and shown on the attached project plans was designed to comply with the MWPA and Regulations. The proposed Project meets the performance standards for work in BLSF and RFA. There are no performance standards for work within the 100-foot Buffer Zone.

4.1.1 Bordering Land Subject to Flooding (BLSF)

The FEMA Flood Insurance Rate Map (FIRM) for the Project area depicts the 100-year flood plain regulated as Bordering Land Subject to Flooding (BLSF) under the MWPA and Regulations. Work within the BLSF will comply with General Performance Standards outlined in 310 CMR 10.57(4) a 1-3, listed below in italicized script with responding compliance measures in non-italicized script.

1. Compensatory storage shall be provided for all flood storage volume that will be lost as the result of a proposed project within Bordering Land Subject to Flooding, when in the judgment of the issuing authority said loss will cause an increase or will contribute incrementally to an increase in the horizontal extent and level of flood waters during peak flows.

Compensatory storage shall mean a volume not previously used for flood storage and shall be incrementally equal to the theoretical volume of flood water at each elevation, up to and including the 100-year flood elevation, which would be displaced by the proposed project. Such compensatory volume shall have an unrestricted hydraulic connection to the same waterway or water body. Further, with respect to waterways, such compensatory volume shall be provided within the same reach of the river, stream or creek.

Repair of the perimeter pathways will minimally alter approximately 12,200 square feet of BLSF by the addition of 2 inches of pavement over 1,232 linear feet of existing pathways. The additional 2 inches of pavement will not cause an increase or contribute incrementally to an

increase in the horizontal extent and level of flood waters during peak flows since the volume is De minimis in the 310 square mile Charles River watershed. Adding topcoat is the least damaging environmental alternative since it avoids removing the existing pavement and potentially disturbing the existing landfill cap layers. There is no place on site to provide compensatory flood storage as Millennium Park is constructed on top of a capped landfill and the park extends to the 100-year floodplain to the north, west, and southwest (see Figure 2). Railroad tracks borders the site to the south and playing fields borders the site to the east (see Figure 1).

2. Work within Bordering Land Subject to Flooding, including that work required to provide the above-specified compensatory storage, shall not restrict flows so as to cause an increase in flood stage or velocity.

The temporary alteration to BLSF is occurring on the northern and western portions of the park where BLSF extend up to the limits of the park. The addition of 2 inches of pavement is such a small amount in the 310 square mile Charles River watershed that is can be considered a negligible volume.

3. Work in those portions of bordering land subject to flooding found to be significant to the protection of wildlife habitat shall not impair its capacity to provide important wildlife habitat functions. Except for work which would adversely affect vernal pool habitat, a project or projects on a single lot, for which Notice(s) of Intent is filed on or after November 1, 1987, that (cumulatively) alter(s) up to 10% or 5,000 square feet (whichever is less) of land in this resource area found to be significant to the protection of wildlife habitat, shall not be deemed to impair its capacity to provide important wildlife habitat functions. Additional alterations beyond the above threshold, or altering vernal pool habitat, may be permitted if they will have no adverse effects on wildlife habitat, as determined by procedures contained in 310 CMR 10.60.

Not applicable; there are no state-listed rare species within the project area.

4.1.2 Riverfront Area

Work within the Riverfront Area will comply with General Performance Standards outlined in 310 CMR 10.58(4) a - d, listed below in italicized script with responding compliance measures in non-italicized script.

“(a) Protection of Other Resource Areas. The work shall meet the performance standards for all other resource areas within the riverfront area, as identified in 310 CMR 10.30 (Coastal Bank), 10.32 (Salt Marsh), 10.55 (Bordering Vegetated Wetland), and 10.57 (Land Subject to Flooding). When work in the riverfront area is also within the buffer zone to another resource area, the performance standards for the riverfront area shall contribute to the protection of the interests of M.G.L. c. 131, § 40 in lieu of any additional requirements that might otherwise be imposed on work in the buffer zone within the riverfront area.”

The proposed work meets the performance standards for BLSF (see Section 4.1.1 above) which is the only other wetland resource area impacted.

“(b) Protection of Rare Species. No project may be permitted within the riverfront area which will have any adverse effect on specified habitat sites of rare wetland or upland, vertebrate or

invertebrate species, as identified by the procedures established under 310 CMR 10.59 or 10.37, or which will have any adverse effect on vernal pool habitat certified prior to the filing of the Notice of Intent.”

Not applicable; there are no state-listed rare species within the project area.

“(c) Practicable and Substantially Equivalent Economic Alternatives. There must be no practicable and substantially equivalent economic alternative to the proposed project with less adverse effects on the interests identified in M.G.L. c. 131 § 40.”

Other Alternatives Considered

The No Build Alternative is not feasible since the Project is maintenance of existing paved access roadways, parking areas, and walking pathways.

“(d) No Significant Adverse Impact. The work, including proposed mitigation measures, must have no significant adverse impact on the riverfront area to protect the interests identified in M.G.L. c. 131, § 40.

1. Within 200-foot riverfront areas, the issuing authority may allow the alteration of up to 5000 square feet or 10% of the riverfront area within the lot, whichever is greater, on a lot recorded on or before October 6, 1997 or lots recorded after October 6, 1997 subject to the restrictions of 310 CMR 10.58(4)(c)2.b.vi., or up to 10% of the riverfront area within a lot recorded after October 6, 1997, provided that:

a. At a minimum, a 100-foot-wide area of undisturbed vegetation is provided. This area shall extend from mean annual high-water along the river unless another location would better protect the interests identified in M.G.L. c. 131 § 40. If there is not a 100-foot-wide area of undisturbed vegetation within the riverfront area, existing vegetative cover shall be preserved or extended to the maximum extent feasible to approximate a 100-foot-wide corridor of natural vegetation. Replication and compensatory storage required to meet other resource area performance standards are allowed within this area; structural stormwater management measures may be allowed only when there is no practicable alternative. Temporary impacts where necessary for installation of linear site-related utilities are allowed, provided the area is restored to its natural conditions. Proposed work which does not meet the requirement of 310 CMR 10.58(4)(d)1. a. may be allowed only if an applicant demonstrates by a preponderance of evidence from a competent source that an area of undisturbed vegetation with an overall average width of 100 feet will provide equivalent protection of the riverfront area, or that a partial rebuttal of the presumptions of significance is sufficient to justify a lesser area of undisturbed vegetation;”

The City of Boston has a 25-ft Riverfront Area. The proposed repaving of the existing walking pathways will temporarily alter approximately 21,184 square feet of the 25-ft Riverfront Area. There will be no alteration in the Riverfront Area beyond the existing footprint of the paths.

“b. Stormwater is managed according to standards established by the Department in its Stormwater Policy.”

The existing stormwater management system at Millennium Park was designed for the 25-year storm event. The existing stormwater management system attenuates stormwater flow, provides groundwater recharge, and provides 80% TSS removal in full compliance with the Stormwater Standards. The proposed maintenance paving program will be located within the footprints of existing pathways and parking lots with no increase in impervious area.

“c. Proposed work does not impair the capacity of the riverfront area to provide important wildlife habitat functions. Work shall not result in an impairment of the capacity to provide vernal pool habitat identified by evidence from a competent source, but not yet certified. For work within an undeveloped riverfront area which exceeds 5,000 square feet, the issuing authority may require a wildlife habitat evaluation study under 310 CMR 10.60.”

There are no potential or certified vernal pools within the proposed work area.

4.1.3 100-ft Buffer Zone

Although there are no performance standards for work within the 100-foot Buffer Zone under the MWPA and Regulations, the buffer zone is presumed significant for the protection of the resource area because activities undertaken near resource areas have a reasonable probability of adverse impact upon the wetland or other resource, because of construction and daily operation and activities. The repaving of the existing walking pathways and parking lot will temporarily alter approximately 41,944 square feet of the 100-ft Buffer Zone. The knotweed treatment program will temporarily alter an additional 9,900 square feet. The proposed trail/parking lot maintenance will protect downstream wetland resource areas for the long-term. Knotweed is considered an invasive species therefore permanent removal is important to ensure further propagation. Permanent removal will improve wildlife habitat since knotweed offers little habitat value than cover.

4.2 Wetland Resource Areas Regulated by the Ordinance

4.2.1 Waterfront Area

The proposed paving program will temporarily alter approximately 29,657 square feet of Waterfront Area. The knotweed treatment program will temporarily alter an additional 1,900 square feet. Waterfront Area is important for the protection of adjacent wetland resource areas and for public access to the waterfront. The proposed paving will not extend beyond existing limits of pavement and is considered a maintenance activity. The existing roadways and parking areas are located predominately on top of the existing landfill cap. The public access to the waterfront (i.e., canoe launch on Charles River and walking pathways along the banks of Charles River and Sawmill Brook) will remain unchanged.

5.0 Climate Change Considerations

As extreme weather events such as storms, flooding, droughts, and heat waves increase in frequency with climate change, protecting wetland resources becomes extremely important as wetlands help buffering adjacent areas from flooding. Maintaining the existing walking pathways and parking lots will prevent erosion and sedimentation that could occur if the pathways/parking lots were left to further degrade which would in turn impact the functions of the wetlands bordering Millennium Park to the north, west, and south.

6.0 Summary

All proposed maintenance and improvements work will be completed in compliance with the MWPA and the Regulations, and the Ordinance and Boston Wetland Regulations. Impacts to RFA and BLSF are temporary and limited to during the repaving efforts. The proposed work will not result in new (i.e., beyond existing footprint) permanent impacts to BLSF, RFA, or Waterfront Area.

ATTACHMENT B
ABUTTER NOTIFICATION INFORMATION



**NOTIFICATION TO ABUTTERS
BOSTON CONSERVATION COMMISSION**

In accordance with the Massachusetts Wetlands Protection Act, Massachusetts General Laws Chapter 131, Section 40, and the Boston Wetlands Ordinance, you are hereby notified as an abutter to a project filed with the Boston Conservation Commission.

A. _____ has filed a Notice of Intent with the Boston Conservation Commission seeking permission to alter an Area Subject to Protection under the Wetlands Protection Act (General Laws Chapter 131, section 40) and Boston Wetlands Ordinance.

B. The address of the lot where the activity is proposed is _____.

C. The project involves _____.

D. Copies of the Notice of Intent may be obtained by contacting the Boston Conservation Commission at CC@boston.gov.

E. Copies of the Notice of Intent may be obtained from _____ by contacting them at _____ between the hours of _____, _____.

F. In accordance with the Commonwealth of Massachusetts Executive Order Suspending Certain Provisions of the Open Meeting Law, the public hearing will take place **virtually** at <https://zoom.us/j/6864582044>. If you are unable to access the internet, you can call 1-929-205-6099, enter Meeting ID 686 458 2044 # and use # as your participant ID.

G. Information regarding the date and time of the public hearing may be obtained from the **Boston Conservation Commission** by emailing CC@boston.gov or calling **(617) 635-3850** between the hours of **9 AM to 5 PM, Monday through Friday**.

NOTE: Notice of the public hearing, including its date, time, and place, will be published at least five (5) days in advance in the **Boston Herald**.

NOTE: Notice of the public hearing, including its date, time, and place, will be posted on www.boston.gov/public-notices and in Boston City Hall not less than forty-eight (48) hours in advance. If you would like to provide comments, you may attend the public hearing or send written comments to CC@boston.gov or Boston City Hall, Environment Department, Room 709, 1 City Hall Square, Boston, MA 02201

NOTE: If you would like to provide comments, you may attend the public hearing or send written comments to CC@boston.gov or Boston City Hall, Environment Department, Room 709, 1 City Hall Square, Boston, MA 02201

NOTE: You also may contact the Boston Conservation Commission or the Department of Environmental Protection Northeast Regional Office for more information about this application or the Wetlands Protection Act. To contact DEP, call: the Northeast Region: (978) 694-3200.

NOTE: If you plan to attend the public hearing and are in need of interpretation, please notify staff at CC@boston.gov by 12 PM the day before the hearing.



**NOTIFICACIÓN PARA PROPIETARIOS Y/O VECINOS COLINDANTES
COMISIÓN DE CONSERVACIÓN DE BOSTON**

De conformidad con la Ley de protección de los humedales de Massachusetts, el Capítulo 131, Sección 40 de las Leyes Generales de Massachusetts y la Ordenanza sobre los humedales de Boston, por la presente queda usted notificado como propietario o vecino colindante de un proyecto presentado ante la Comisión de Conservación de Boston.

A. **El Departamento de Parques y Recreación de Boston** ha presentado una solicitud a la Comisión de Conservación de Boston pidiendo permiso para modificar una zona sujeta a protección en virtud de la Ley de protección de los humedales (Leyes generales, capítulo 131, sección 40) y la Ordenanza sobre los humedales de Boston.

B. La dirección del lote donde se propone la actividad es en el Parque Millenium en Gardner Road en West Roxbury.

C. El proyecto consiste en sustituir el pavimento de las vías de acceso existentes, los lugares para estacionar y las rutas para caminar.

D. Se pueden obtener copias del Aviso de Intención comunicándose con la Comisión de Conservación de Boston en CC@boston.gov.

E. Las copias de la notificación de intención pueden obtenerse comunicándose con Magdalena Lofstedt de CDM Smith Inc. a través del correo electrónico lofstedtmh@cdmsmith.com o llamando al 617-452-6597, de lunes a viernes de 9am a 5pm.

F. De acuerdo con el Decreto Ejecutivo de la Mancomunidad de Massachusetts que suspende ciertas disposiciones de la Ley de reuniones abiertas, la audiencia pública se llevará a cabo virtualmente en <https://zoom.us/j/6864582044>. Si no puede acceder a Internet, puede llamar al 1-929-205-6099, ingresar ID de reunión 686 458 2044 # y usar # como su ID de participante.

G. La información relativa a la fecha y hora de la audiencia pública puede solicitarse a la **Comisión de Conservación de Boston** por correo electrónico a CC@boston.gov o llamando al (617) 635-4416 entre las **9 AM y las 5 PM, de lunes a viernes**.

NOTA: La notificación de la audiencia pública, incluida su fecha, hora y lugar, se publicará en el **Boston Herald** con al menos cinco (5) días de antelación.

NOTA: La notificación de la audiencia pública, incluida su fecha, hora y lugar, se publicará en www.boston.gov/public-notices y en el Ayuntamiento de Boston con no menos de cuarenta y ocho (48) horas de antelación. Si desea formular comentarios, puede asistir a la audiencia pública o enviarlos por escrito a CC@boston.gov o al Ayuntamiento de Boston, Departamento de Medio Ambiente, Sala 709, 1 City Hall Square, Boston, MA 02201.

NOTA: También puede comunicarse con la Comisión de Conservación de Boston o con la Oficina Regional del Noreste del Departamento de Protección Ambiental para obtener más información sobre esta solicitud o la Ley de Protección de Humedales. Para comunicarse con el DEP, llame a la Región Noreste: (978) 694-3200.



NOTA: si tiene previsto asistir a la audiencia pública y necesita servicios de interpretación, sírvase informar al personal en CC@boston.gov antes de las 12 PM del día anterior a la audiencia.

Certification of Accuracy

Re: Translation *spanish abutter notification form 2020_SP*

I, Kamran Khan, hereby attest that that above referenced document to the best of my knowledge, ability, and belief is a true, accurate, and complete translation of the original *English* document that was provided and was translated by a qualified and experienced translation with natively fluency in Spanish.



Kamran Khan

SIGNATURE

9/21/2021

DATE

ParcelID	Street	Owner	CoOwner	Address	City	State	Zip
2008964000	670 BAKER ST	Commonwealth of Mass.		670 BAKER ST	West Roxbury	MA	02132
2008982000	1205 VFW PW	City of Boston		1 City Hall Square	Boston	MA	02201-2036
2008967000	Baker Street	HOLYHOOD CEMETERY ASSOC		584 Heath St	Chestnut Hill	MA	02467
2009224000	Gardner Street	Home Depot USA Inc.		/O B-11 TAX DEPT RE 2455 PACES FERRY RD	Atlanta	GA	30339
2009227000	99 Rivermoor Street	ROXBURY STORAGE LLC		P.O. BOX 92129 C/O ALTUS GROUP	Southlake	TX	76092
2009226010	Gardner Street	City of Boston					02132
2009226000	Gardner Street	Mass. Bay Transportation Authority		10 Park Plaza, Suite 5610	Boston	MA	02116
2009227010	151 Rivermoor Street	AMR REAL ESTATE HOLDINGS II LLC	C/O MATTHEW MCGOVERN	425 PROVIDENCE HW	Westwood	MA	02090
2009227020	155 Rivermoor Street	AMR REAL ESTATE HOLDINGS II LLC	C/O MATTHEW MCGOVERN	425 PROVIDENCE HW	Westwood	MA	02090
2009228000	201 Rivermoor Street	City of Boston		1 City Hall Square	Boston	MA	02201-2036
2009228015	Rivermoor Street	City of Boston		1 City Hall Square	Boston	MA	02201-2036
2009228040	Rivermoor Street West	U.S. Army Corps of Engineers		696 Virginia Rd	Concord	MA	01742

ATTACHMENT C
MATERIALS SAFETY DATA SHEET

ATTACHMENT D
PROJECT PLANS

LEGEND

- PATHWAY PAVING
ADD 2" TOP COURSE OVERLAY
- PARKING PAVING
1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY
- ACCESS ROADS
1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY
- FULL DEPTH RECONSTRUCTION
- FULL DEPTH PATHWAY RECONSTRUCTION AND ROOT REMOVAL. UP TO 3,000 SQ. FT. LOCATIONS TO BE MARKED IN THE FIELD PRIOR TO REMOVAL ACTIVITIES
- RESET GRANITE CURB
- ADA ACCESS RAMP
- PERMANENT ALTERATION WITHIN BLSF BUFFER
- CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
- REPLACE EXISTING COLLAPSIBLE BOLLARD

LIMIT OF 100-FT BUFFER ZONE
 LIMIT OF 25-FT WATERFRONT AREA
 LIMIT OF 25-FT RIVERFRONT AREA
 PERMANENT ALTERATION TO APPROXIMATELY 1700 SQUARE FEET OF IMPACT FROM ADDING 2" TOP COURSE OVERLAY
 BORDERING LAND SUBJECT TO FLOODING AT EL. 90 FEET NAVD 88

PERMANENT ALTERATION TO APPROXIMATELY 10,500 SQUARE FEET OF IMPACT FROM ADDING 2" TOP COURSE OVERLAY

COMPOST LOG 200 L.F.
 PATHWAY ROOT REMOVAL

REMOVAL OF INVASIVE JAPANESE KNOTWEED

C-11 C-9
 C-10 C-8

REPLACE BITUMINOUS CONCRETE BERM
 REPLACE ADA ACCESS RAMP
 CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
 RESET GRANITE CURB

Cut/Fill Chart for Bordering Land Subject to Flooding

Ei (ft)	Cut (cu ft)	Additional pavement (cu ft)	Net Change (cu ft)
88	0	912 If x 10 ft x 2" = 1,520	-1520
89	0	320 If x 10 ft x 2" = 533	-533
90	0	0	0
Total	0	2053	-2053

PROJECT: 2100005.00



No.	Date	Revision

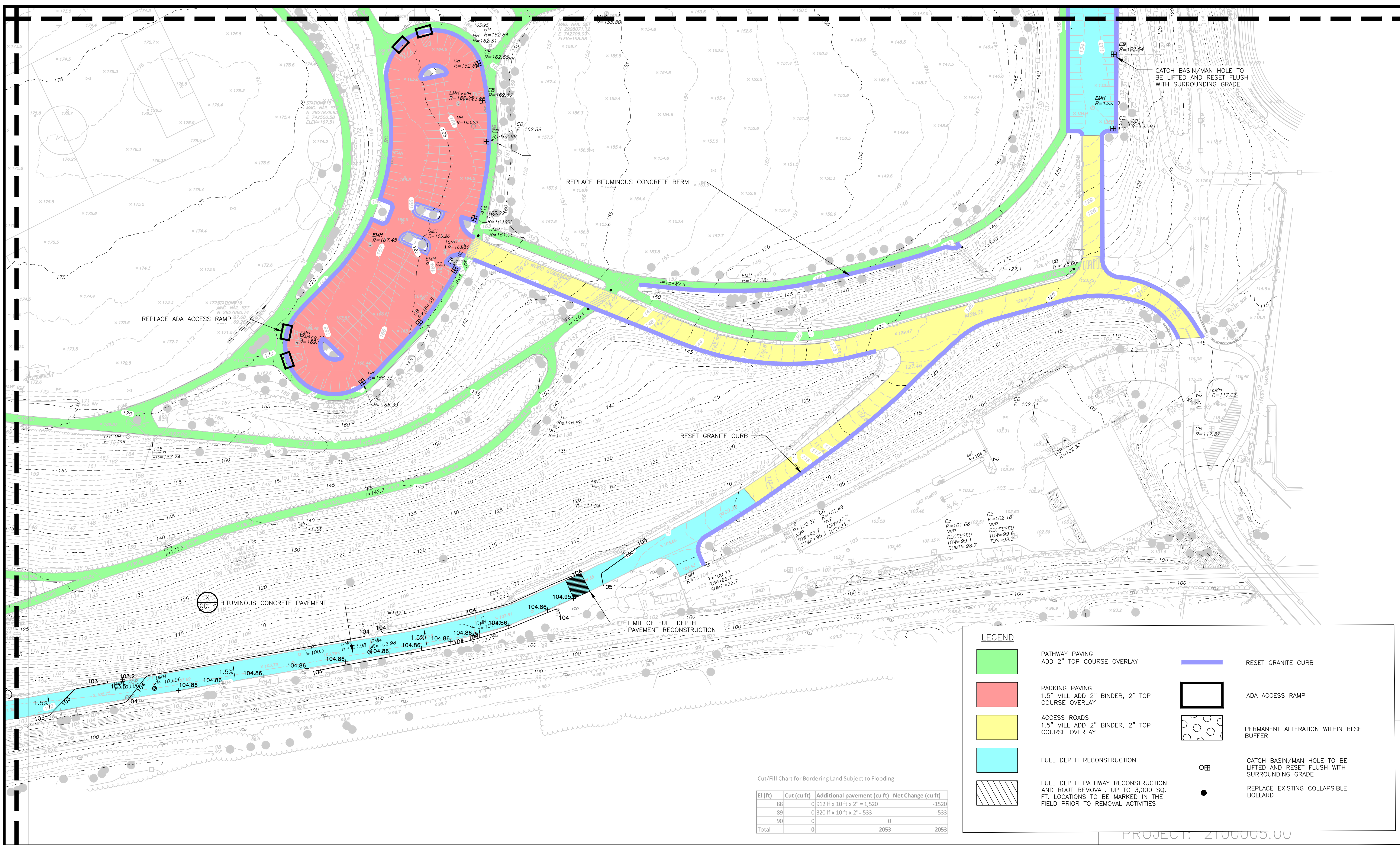
Approved By: _____ Date: _____

Project Name.:
Design Improvements To Millennium Park

BPRD Project No.	51226
Date	08/30/2021
Scale	1" = 100'
Drawn	J. BRONKANT
Checked	G. HOWARD

Sheet Name.:
Paving Site Overview Plan

Section:
C-7



CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE

REPLACE BITUMINOUS CONCRETE BERM

REPLACE ADA ACCESS RAMP

RESET GRANITE CURB

BITUMINOUS CONCRETE PAVEMENT

LIMIT OF FULL DEPTH PAVEMENT RECONSTRUCTION

LEGEND

	PATHWAY PAVING ADD 2" TOP COURSE OVERLAY		RESET GRANITE CURB
	PARKING PAVING 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		ADA ACCESS RAMP
	ACCESS ROADS 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		PERMANENT ALTERATION WITHIN BLSF BUFFER
	FULL DEPTH RECONSTRUCTION		CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
	FULL DEPTH PATHWAY RECONSTRUCTION AND ROOT REMOVAL. UP TO 3,000 SQ. FT. LOCATIONS TO BE MARKED IN THE FIELD PRIOR TO REMOVAL ACTIVITIES		REPLACE EXISTING COLLAPSIBLE BOLLARD

Cut/Fill Chart for Bordering Land Subject to Flooding

EI (ft)	Cut (cu ft)	Additional pavement (cu ft)	Net Change (cu ft)
88	0	912 If x 10 ft x 2" = 1,520	-1520
89	0	320 If x 10 ft x 2" = 533	-533
90	0	0	0
Total	0	2053	-2053

PROJECT: Z100005.00

Prepared By:
CDM Smith

Consultant Project No. 254479

NORTH

No.	Date	Revision

Approved By: _____ Date: _____

Project Name.:
Design Improvements To Millennium Park

BPRD Project No. 51226

Date 08/30/2021

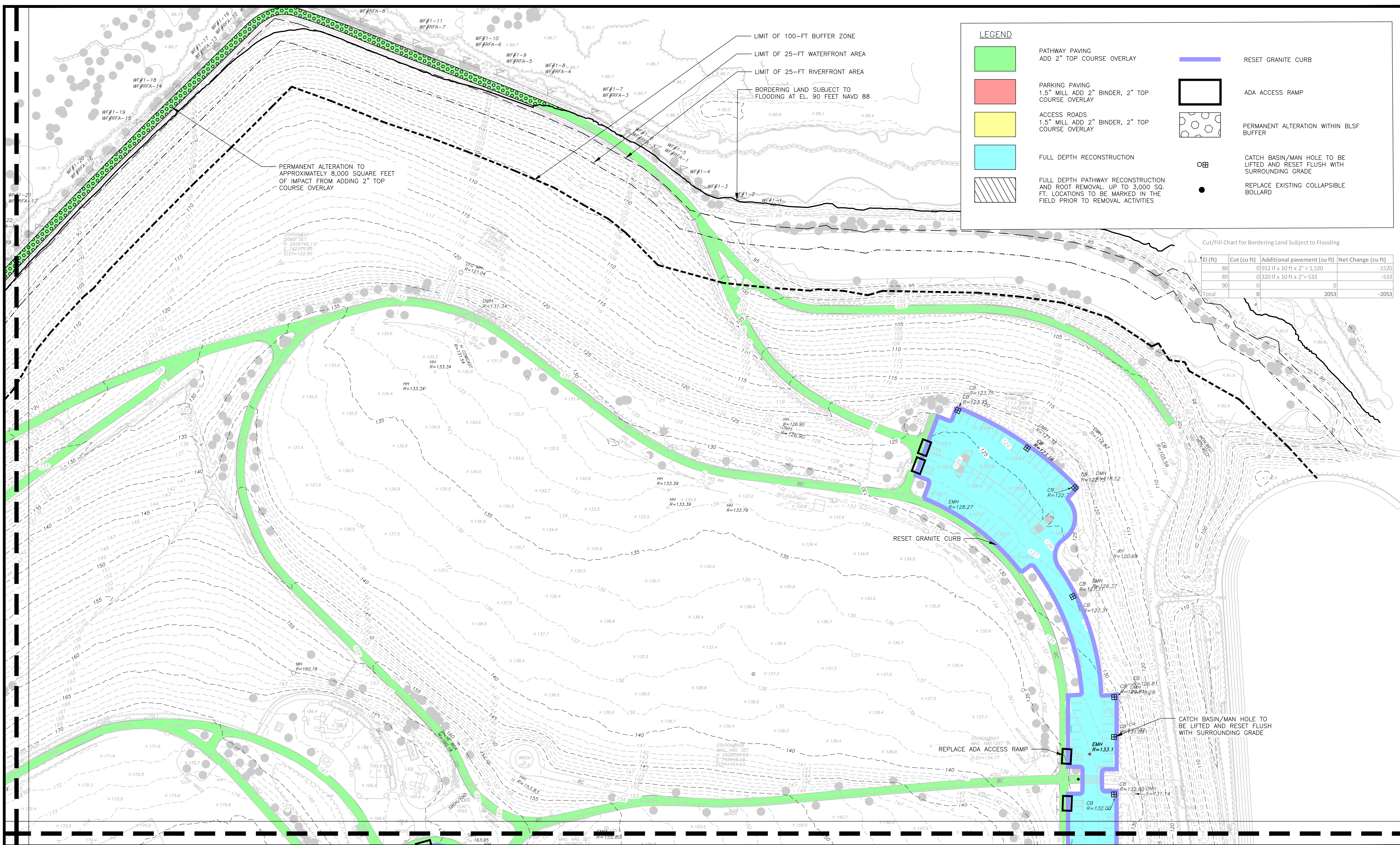
Scale 1" = 50'

Drawn J. BRONKANT

Checked G. HOWARD

Sheet Name.:
PAVING PLAN I

Section:
C-8



LEGEND

- PATHWAY PAVING
ADD 2" TOP COURSE OVERLAY
- PARKING PAVING
1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY
- ACCESS ROADS
1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY
- FULL DEPTH RECONSTRUCTION
- FULL DEPTH PATHWAY RECONSTRUCTION AND ROOT REMOVAL, UP TO 3,000 SQ. FT. LOCATIONS TO BE MARKED IN THE FIELD PRIOR TO REMOVAL ACTIVITIES
- RESET GRANITE CURB
- ADA ACCESS RAMP
- PERMANENT ALTERATION WITHIN BLSF BUFFER
- CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
- REPLACE EXISTING COLLAPSIBLE BOLLARD

Cut/Fill Chart for Bordering Land Subject to Flooding

EI (ft)	Cut (cu ft)	Additional pavement (cu ft)	Net Change (cu ft)
88	0	9121f x 10 ft x 2" = 1,520	-1520
89	0	3201f x 10 ft x 2" = 533	-533
90	0	0	0
Total	0	2053	-2053

Prepared By:

Consultant Project No. 254479

NORTH

No.	Date	Revision

Approved By: _____ Date: _____






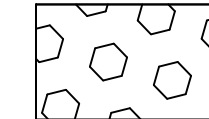

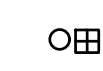
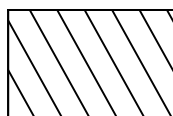

Project Name.: **Design Improvements To Millennium Park**

BPRD Project No. 51226
 Date 08/30/2021
 Scale 1" = 50'
 Drawn J. BRONKANT
 Checked G. HOWARD

Sheet Name.: **PAVING PLAN II**

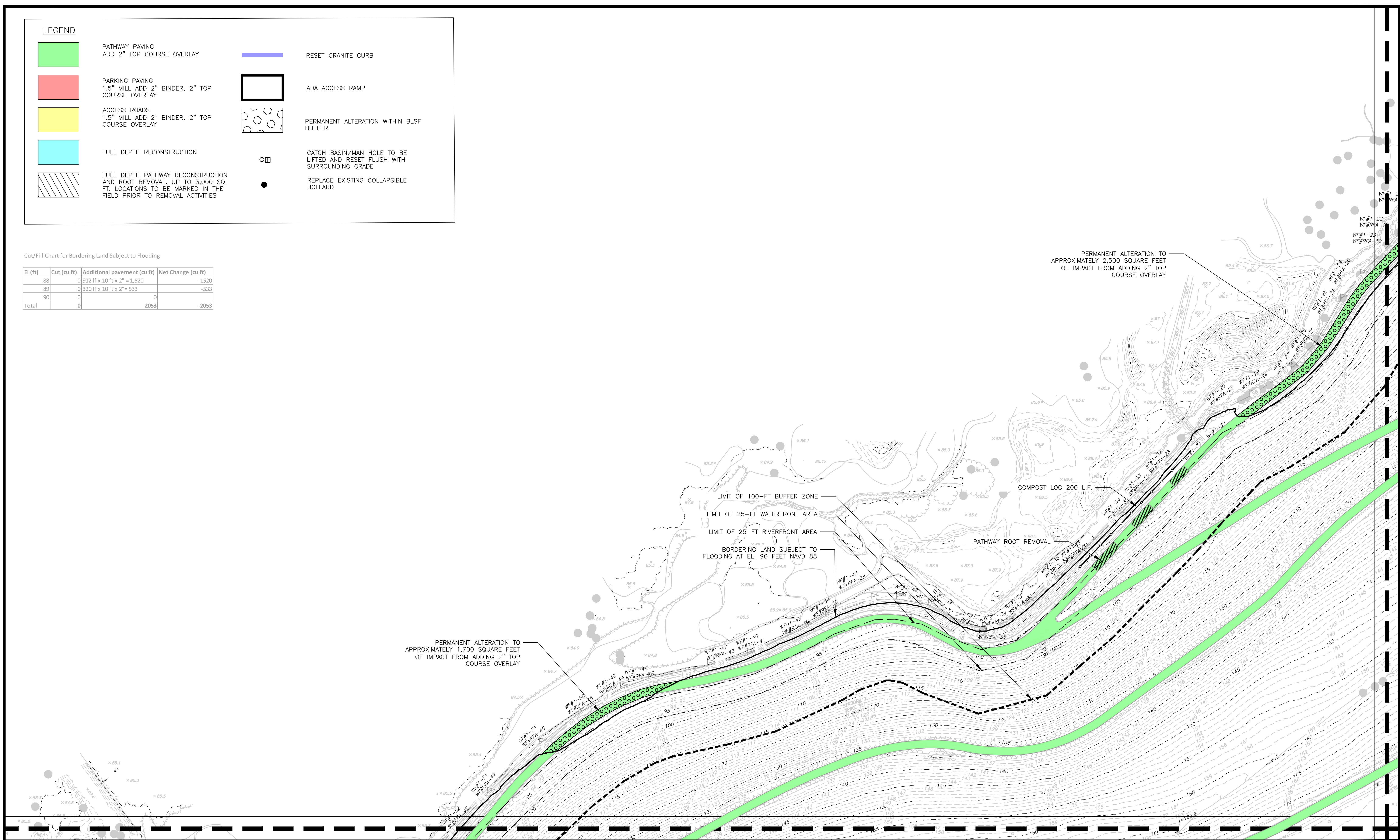
Section: **C-9**


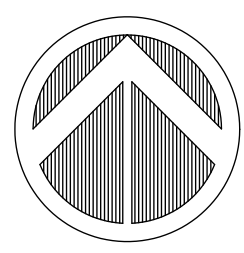

LEGEND

	PATHWAY PAVING ADD 2" TOP COURSE OVERLAY		RESET GRANITE CURB
	PARKING PAVING 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		ADA ACCESS RAMP
	ACCESS ROADS 1.5" MILL ADD 2" BINDER, 2" TOP COURSE OVERLAY		PERMANENT ALTERATION WITHIN BLSF BUFFER
	FULL DEPTH RECONSTRUCTION		CATCH BASIN/MAN HOLE TO BE LIFTED AND RESET FLUSH WITH SURROUNDING GRADE
	FULL DEPTH PATHWAY RECONSTRUCTION AND ROOT REMOVAL, UP TO 3,000 SQ. FT. LOCATIONS TO BE MARKED IN THE FIELD PRIOR TO REMOVAL ACTIVITIES		REPLACE EXISTING COLLAPSIBLE BOLLARD

Cut/Fill Chart for Bordering Land Subject to Flooding

EI (ft)	Cut (cu ft)	Additional pavement (cu ft)	Net Change (cu ft)
88	0	912 If x 10 ft x 2" = 1,520	-1520
89	0	320 If x 10 ft x 2" = 533	-533
90	0	0	0
Total	0	2053	-2053



 Prepared By:	 NORTH	No.	Date	Revision	Project Name.: Design Improvements To Millennium Park	BPRD Project No.	51226	Sheet Name.:	
		Approved By:		Date:		Date	08/30/2021	Scale	1" = 50'
						Drawn	J. BRONKANT		
						Checked	G. HOWARD		

