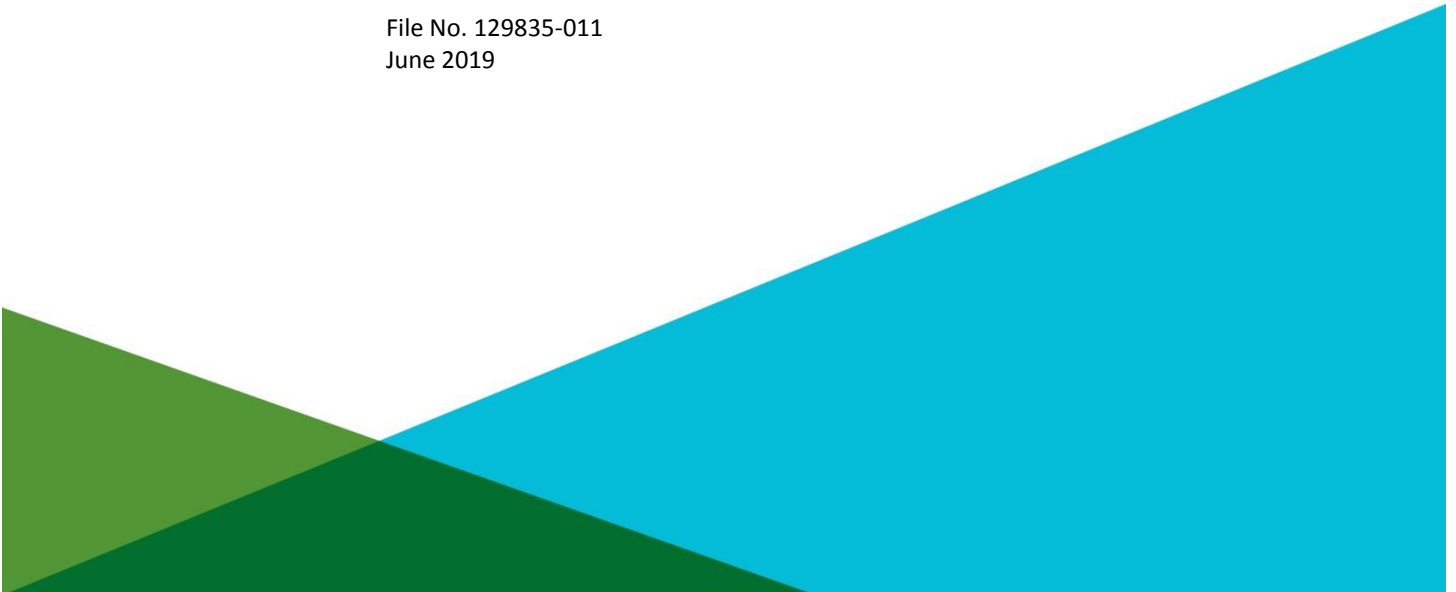


NPDES RGP APPLICATION FOR TEMPORARY
CONSTRUCTION DEWATERING
1000 BOYLSTON STREET
BOSTON, MASSACHUSETTS

by Haley & Aldrich, Inc.
Boston, Massachusetts

for Environmental Protection Agency (EPA) Region 1
Boston, Massachusetts

File No. 129835-011
June 2019





HALEY & ALDRICH, INC.
465 Medford St.
Suite 2200
Boston, MA 02129
617.886.7400

6 June 2019
File No. 129835-011

Environmental Protection Agency (EPA) Region 1
5 Post Office Square, Suite 100
Mail Code OEP06-4
Boston, Massachusetts 02109

Attention: Shelly Puleo

Subject: NPDES RGP Application for Temporary Construction Dewatering
1000 Boylston Street
Boston, Massachusetts

Ladies and Gentlemen:

On behalf of our client, 1000 Boylston Street Owner LLC, Haley & Aldrich, Inc. (Haley & Aldrich) is submitting this application to request authorization under the National Pollutant Discharge Elimination System (NPDES) Remediation General Permit (RGP) for off-site discharge of temporary construction dewatering during construction activities at a portion of the planned redevelopment project at 1000 Boylston Street in Boston, Massachusetts (herein referred to as the "Work Area"). A copy of the Notice of Intent (NOI) is included in Appendix A.

PROPOSED DEVELOPMENT

The 1000 Boylston Street project includes the construction of a mixed-use development of air rights above the Boston Extension of the Massachusetts Turnpike (I-90), the Massachusetts Bay Transportation Authority (MBTA) CSX rail alignment, a portion of Cambria Street, and a landscaped lot referred to as the Scotia Parcel. The development will include a 27-story tower, a 5- to 6-story podium base, and a 2-story parking garage. The development will be used for residences, amenities, and retail and restaurant space.

The Work Area subject to this application is an irregular-shaped area composed of four parcels, bounded by Scotia Street to the south, St. Cecilia Street to the west, Boylston Street to the north, and Dalton Street, Cambria Street and the parking garage at 50 Dalton Street to the east. The limits of the Work Area are shown on Figure 2.

The proposed development will be supported on new retaining foundation walls to be constructed. Three existing retaining or parapet walls will be demolished, and the contractor will be excavating to

depths of 8 to 28 feet (corresponding to El. 2 to -18 (BCB)) for the installation of the new foundation walls.

Groundwater is expected to be encountered at approximately El. 9 (BCB) or lower and the excavation will need to be dewatered to enable excavation in-the-dry.

SITE CONDITIONS & HISTORY

The Work Area is bordered by the MBTA rail tracks and the space above the I-90 interstate to the north, Dalton Street to the east, Scotia Street to the south, and St. Cecilia Street to the west. The Cambria Street Parcel of the Work Area is currently occupied by an active roadway, and the Scotia Parcel of the Work Area is currently occupied by a vacant grassy lot. Mobilization and enabling activities at the Site are expected to begin in June 2019.

The Work Area is located in the Back Bay neighborhood of Boston. Historic filling of the tidal marshes of the Charles River was conducted in the late 1800s to create additional developable land to support real estate growth and expansion. The Work Area is located on the edge of the original Colonial shoreline. The east side of the Work Area was filled during the late 1800s to create developable land. The west side of the Work Area was referred to as Gravelly Pit. The Work Area has seen previous periods of development for residential and commercial building, railroad and roadway transportation uses prior to construction of the Massachusetts Turnpike (I-90) in the 1960s. Along the north side of Cambria Street, various commercial properties were located including printing, carpentry, tin shops, vulcanizing, forges, auto storage and parts manufacturing, and other trades. Similar uses were evident on adjacent properties including residential flats. The area further north of these Cambria Street properties, in the present alignment of the Massachusetts Turnpike, were railroad tracks of the Boston & Worcester railroad.

REGULATORY BACKGROUND

A portion of the Cambria Street Parcel is located within the Disposal Site for a Massachusetts Department of Environmental Protection (MassDEP) historic release. The release, documented under Release Tracking Number (RTN) 3-22618, is associated with petroleum-related compounds in soil and groundwater at 50 Dalton Street, which abuts the Work Area, related to two former gasoline underground storage tanks (USTs). RTN 3-22618 was assigned to the 50 Dalton Street site in February 2003. The USTs were removed during RAM activities and a Class A-2 RAO was submitted for the Site in 2004, which relied on a Method 3 Risk Characterization which determined No Significant Risk existed for the site.

The Scotia Parcel is associated with the RTN 3-27939 Disposal Site. A site investigation was conducted at the subject site in 2008 and included the advancement of test borings, installation of monitoring wells, and laboratory analysis of soil and groundwater samples. Based on visual, olfactory and field screening data, two soil samples were submitted for laboratory analysis for RCRA 8 Metals, extractable petroleum hydrocarbon (EPH) carbon ranges and target analytes, volatile organic compounds (VOCs), volatile petroleum hydrocarbon (VPH) carbon ranges, and polychlorinated biphenyls (PCBs). Concentrations of chemical constituents detected in soil were either below the laboratory reporting limits, at or below the Method 1 S-1 Standards, and/or below background levels for fill containing coal ash, with one exception. Benzo(a)anthracene was detected in one soil sample (designated SB-5) at a concentration exceeding Method 1 S-1/GW-2 and GW-3 Standards, however the concentration was considered associated with

ash and therefore exempt from reporting in accordance with the MCP at 310 CMR 40.0317(9). Groundwater samples were submitted for laboratory analysis of EPH carbon ranges and target analytes, VOCs, dissolved RCRA 8 metals, and VPH carbon ranges. Concentrations of dissolved cadmium and dissolved lead exceeding applicable RCGW-2reportable concentrations were detected at the subject site. A Method 1/Method 2 Risk Characterization determined that a condition of No Significant Risk existed at the site and a Class B-1 RAO was submitted in October 2008.

SOURCE WATER INFORMATION

To evaluate groundwater quality at the Site, a groundwater sample was collected from monitoring well HA14-3(OW) on 30 August 2018. HA14-3(OW) is located within the Work Area shown on Figure 2. The sample was submitted to Alpha Analytical, Inc. of Westborough, Massachusetts (Alpha) for analysis of VOCs, semi-volatile organic compounds (SVOCs), total metals, and PCBs.

A second groundwater sample was collected from monitoring well HA14-3(OW) on 13 May 2019 to meet the requirements of the 2017 NPDES RGP NOI. The groundwater sample was submitted to Alpha Analytical Laboratories, Inc. of Westborough, Massachusetts for analysis of VOCs, SVOCs, total metals, total petroleum hydrocarbons (TPH), pesticides, PCBs, total suspended solids (TSS), total residual chlorine, chloride, total cyanide, ammonia, total phenolics and hardness. The source water quality data is summarized in Table II. Laboratory data reports are included in Appendix F.

RECEIVING WATER INFORMATION

On 13 May 2019, one sample was collected from the Charles River upstream of BWSC Outfall Number MWR018 and submitted to Alpha Analytical for analysis of hardness, ammonia and total metals. The laboratory data report is enclosed in Appendix F. The results of this sampling program are provided in Table II.

The pH and temperature readings collected in the field were used to calculate the site Water Quality Based Effluent Limitations (WQBELs). It is our understanding that since the receiving water is a freshwater body, salinity does not need to be analyzed on either the effluent water or receiving water.

The seven-day-ten-year flow (7Q10) of the receiving water was established using the U.S. Geological Survey (USGS) StreamStats program. A copy of the report is included in Appendix B.

EFFLUENT CRITERIA DETERMINATION

Groundwater and receiving water data were input into the WQBEL Calculation spreadsheet and used to calculate the effluent criteria for the Site. Copies of the “EnterData” and “FreshwaterResults” tabs from the excel file provided as a resource by EPA are included in Appendix B. The effluent limitations calculated are included for reference in Table I.

DISCHARGE INFORMATION

The temporary dewatering will take place in the excavations and conducted with sumps. Construction dewatering will include piping and discharging into up to four storm drains located as shown on Figure 2. Two of the storm drains are located within Cambria Street south of the Work Area and two are located within Dalton Street above and east of the Work Area. The proposed discharge routes are shown on

Figure 2. We anticipate effluent discharge rates to be about 50 gallons per minute (gpm) or less, with occasional peak flows of about 100 gpm during significant precipitation events.

DEWATERING TREATMENT SYSTEM INFORMATION

A dewatering treatment system will be designed and implemented by the Contractor to meet the applicable 2017 RGP Discharge Effluent Criteria. Prior to discharge, collected water will be routed through a sedimentation tank and 5-micron bag filters to remove suspended solids and undissolved chemical constituents. The treatment schematic is shown on Figure 3.

Additional treatment may be implemented as needed to meet effluent criteria. Additional treatment will be designed by the Contractor.

DETERMINATION OF ENDANGERED SPECIES ACT ELIGIBILITY

According to the guidelines outlined in Appendix I of the 2017 NPDES RGP, a preliminary determination for the action area associated with this project was established using the U.S. Fish and Wildlife Service (FWS) Information, Planning, and Conservation (IPAC) online system. A copy of the determination is attached in Appendix D. Based on the results of the determination, the project and action area are considered to meet FWS Criterion A as no endangered or threatened species or critical habitats are present within the project action area.

DOCUMENTATION OF NATURAL HISTORIC PRESERVATION ACT REQUIREMENTS

Based on a review of the resources provided by the U.S. National Register of Historic Places and a review of the Massachusetts Cultural Resource Information System (MACRIS), no historic properties have been established to be present at the project site, and discharges and discharge-related activities are not considered to have the potential to affect historic properties. The discharge is considered to meet Criterion A. Documentation is included in Appendix E.

SUPPLEMENTAL INFORMATION

A permit for temporary construction dewatering will also be required from the Boston Water and Sewer Commission (BWSC). The permit application is being submitted concurrently with this NOI. A copy of the permit application is provided in Appendix C.

Owner and operator information are provided below for reference:

Owner:

1000 Boylston Street Owner LLC
200 Clarendon Street, Floor 50
Boston, MA 02116
Attn: Adam Weiner, Manager

Operator:


Suffolk Construction
65 Allerton Street
Boston, MA 02119
Attn: Zach Hammond, Senior Project Manager


CLOSING

Thank you very much for your consideration. Feel free to contact us should you wish to discuss the information contained herein or if you need additional information.

Sincerely yours,
HALEY & ALDRICH, INC.


Grace Howard, EIT
Staff Environmental Engineer


Peter Zawadzka
Senior Scientist | Project Manager


Douglas M. Lindsay, PG, LSP
Associate | Senior Project Manager

Enclosures

- Table I – Summary of Groundwater Quality Data
- Table II – Summary of Receiving Water Quality Data
- Figure 1 – Project Locus
- Figure 2 – Proposed Dewatering Discharge Location Plan
- Figure 3 – Proposed Treatment System Schematic
- Appendix A – Notice of Intent (NOI)
- Appendix B – Effluent Limit Documentation
- Appendix C – Copy of City of Boston Dewatering Permit Application
- Appendix D – Endangered Species Act Assessment
- Appendix E – National Historic Preservation Act Review
- Appendix F – Laboratory Data Reports

c: 1000 Boylston Street Owner LLC; Attn: Adam Weiner
Suffolk Construction; Attn: Zachary Hammond
Boston Water and Sewer Commission; Attn: Matthew Tuttle

G:\129835a - MassDOT Air Rights Parcel 15\11_PERMITTING\Dewatering\NPDES RGP\2019-0606-HAI-1000 Boylston RGP Dewatering Permit-F.docx

TABLES

TABLE I
SUMMARY OF GROUNDWATER QUALITY DATA
1000 BOYLSTON STREET
BOSTON, MA
FILE NO.: 129835-011

Well ID Sample ID Lab Sample ID Sample Date	2017 NPDES Site-Specific Discharge Limitations	HA14-3(OW)	
		HA14-3(OW) L1834432 8/30/2018	HA14-3_051319 L1919950-01 5/13/2019
Volatile Organic Compounds (mg/L)			
SUM of VOCs	NA	ND	ND
Volatile Organic Compounds SIM (mg/L) 1,4-Dioxane	0.2	-	ND(0.05)
Semivolatile Organic Compounds (mg/L)			
SUM of SVOCs	0.19	ND	ND
Semivolatile Organic Compounds SIM (mg/L) Benzo(a)anthracene	0.001	-	0.0002
Benzo(a)pyrene	0.001	-	0.00019
Benzo(b)fluoranthene	0.001	-	0.00027
Benzo(k)fluoranthene	0.001	-	0.00016
Indeno(1,2,3-cd)pyrene	0.001	-	0.00017
SUM of Group I PAHs	0.001	-	0.00099
Benzo(ghi)perylene	NA	ND(0.002)	0.00016
Chrysene	NA	ND(0.002)	0.0002
Fluoranthene	NA	ND(0.002)	0.00038
Phenanthrene	NA	ND(0.002)	0.00017
Pyrene	NA	ND(0.002)	0.00033
SUM of Group II PAHs	0.1	ND	0.00124
Total Petroleum Hydrocarbons (mg/L) TPH	5	-	ND(4)
Total Metals (mg/L) Antimony	0.206	ND(0.05)	ND(0.004)
Arsenic	0.104	ND(0.005)	0.01924
Cadmium	0.0102	ND(0.005)	0.00498
Chromium, Total	NA	0.02	0.01729
Chromium, Hexavalent	0.323	-	ND(0.01)
Chromium, Trivalent	0.323	-	0.017
Copper	0.003	ND(0.01)	0.04675
Cyanide, Total	178	-	ND(0.005)
Iron	5	-	26.6
Lead	0.00213	0.019	0.07502
Mercury	0.00739	ND(0.0002)	ND(0.0002)
Nickel	1.45	ND(0.025)	0.2161
Selenium	0.2358	ND(0.01)	0.04378
Silver	0.0351	ND(0.007)	ND(0.0004)
Zinc	0.42	0.056	1.859
Polychlorinated Biphenyls (mg/L)			
SUM PCBs	0.000000064	ND	ND
Pesticides (mg/L) 1,2-Dibromoethane	0.00005	-	ND(0.00001)
Pentachlorophenol	0.001	ND(0.005)	ND(0.001)
Other Hardness (mg/L)	NA	-	768
Chloride (mg/L)	Report	-	125
Total Residual Chlorine (mg/L)	0.2	-	ND(0.02)
Nitrogen, Ammonia (mg/L)	Report	-	0.892
Phenolics, Total (mg/L)	1.08	-	ND(0.03)
Total Suspended Solids (mg/L)	30	-	350

NOTES AND ABBREVIATIONS:
- ND(2.5): Result not detected above reporting limit (shown in parentheses)
- VOC, SVOC, and PCB compounds detected in at least one sample are reported herein. For a full list of analytes see the laboratory data sheets.

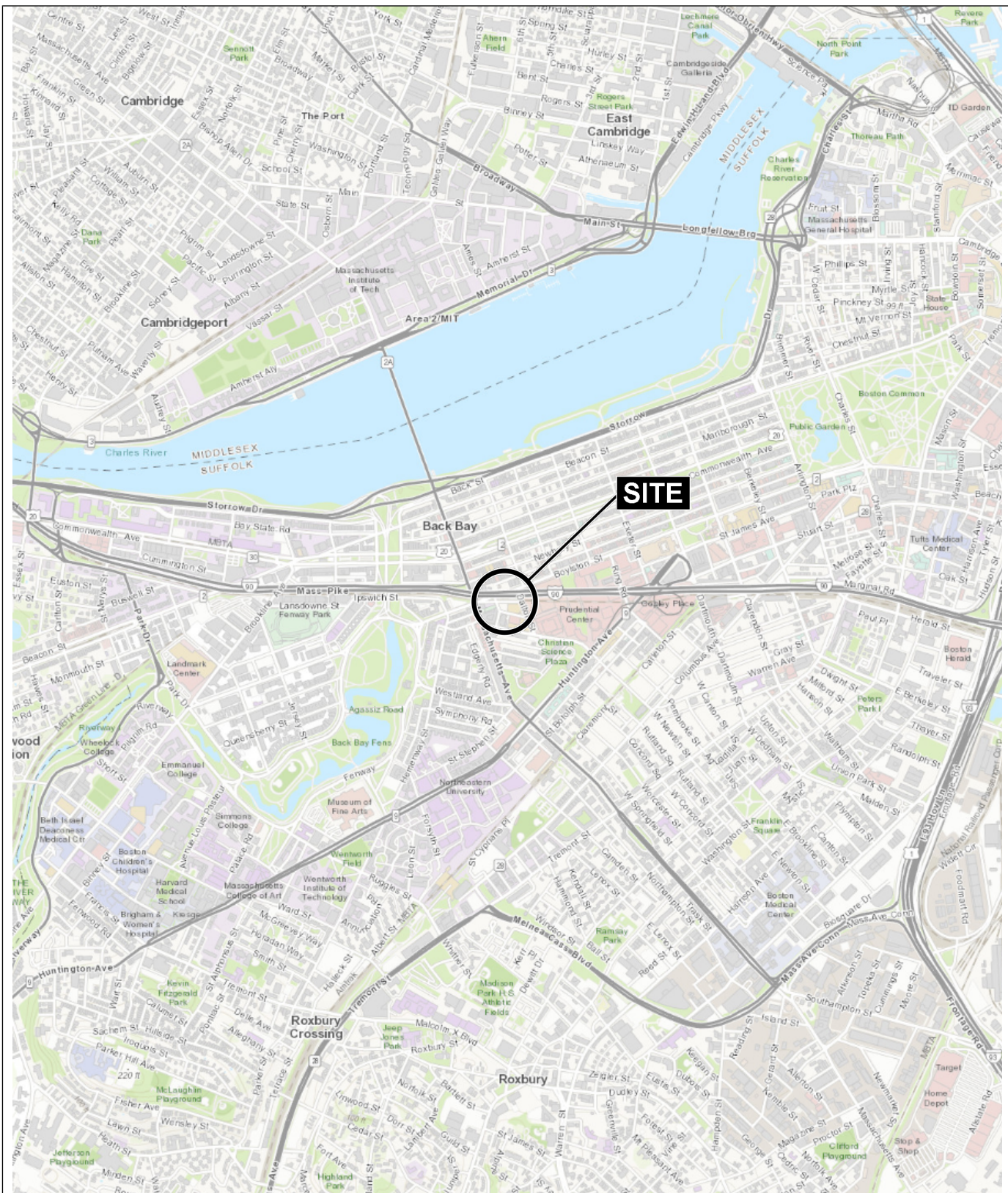
TABLE II
SUMMARY OF RECEIVING WATER QUALITY DATA
1000 BOYLSTON STREET
BOSTON, MA
FILE NO.: 129835-011

Location Name	Charles River
Sample ID	RW5_051319
Lab Sample ID	L1919950-02
Sample Date	5/13/2019
Total Metals (mg/L)	
Antimony	ND(0.004)
Arsenic	ND(0.001)
Cadmium	ND(0.0002)
Chromium, Total	ND(0.001)
Copper	0.00255
Iron	0.609
Lead	0.00241
Mercury	ND(0.0002)
Nickel	ND(0.002)
Selenium	ND(0.005)
Silver	ND(0.0004)
Zinc	ND(0.01)
Other	
Temperature (°C)	9.82
Hardness (mg/L)	69.6
Nitrogen, Ammonia (mg/L)	0.172
pH (SU)	7.7

NOTES AND ABBREVIATIONS:

- ND(2.5): Results not detected above reporting limit (shown in parentheses)
- Temperature reading measured in the field

FIGURES



MAP SOURCE: ESRI

SITE COORDINATES: 42°20'50"N, 71°5'10"W

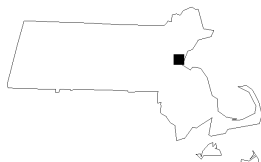
**HALEY
ALDRICH**

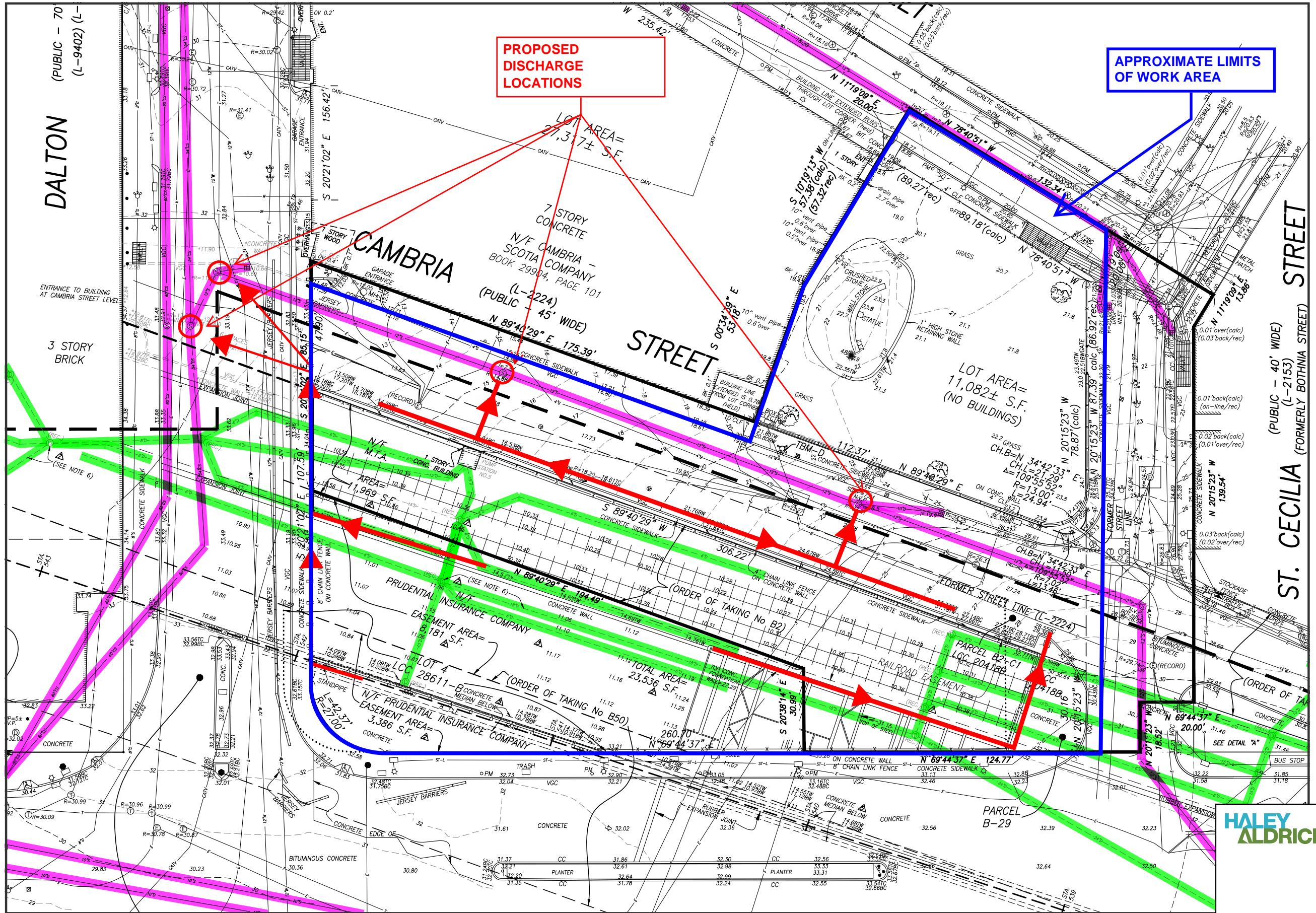
1000 BOYLSTON STREET
MASS DOT AIR RIGHTS PARCEL 15
BOSTON, MASSACHUSETTS

PROJECT LOCUS

APPROXIMATE SCALE: 1 IN = 2000 FT
MAY 2019




FIGURE 1





NOTES:

1. BASE PLAN TAKEN FROM
BWSC ELKUS-MANFREDI
ARCHITECTS EXISTING
CONDITIONS DRAWING
C100, DATED 1 JANUARY
2018.

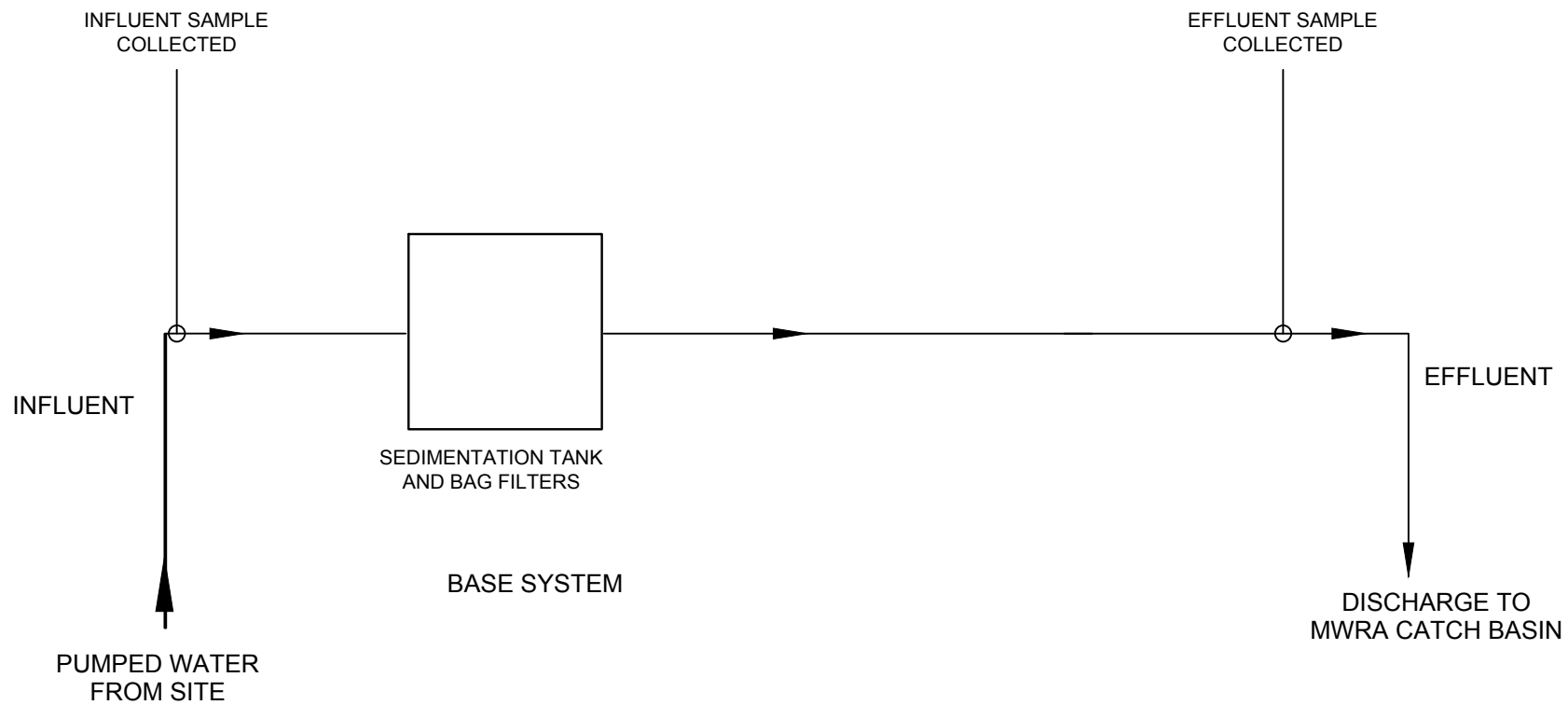
-  MASSDOT
-  BWSC
-  DEWATERING FLOW

HALEY ALDRICH
1000 BOYLSTON STREET
SCOTIA PARCEL
BOSTON, MASSACHUSETTS

**PROPOSED DEWATERING
DISCHARGE LOCATION PLAN**

NOT TO SCALE
MAY 2019

FIGURE 2



LEGEND:

—▶ DIRECTION OF FLOW

NOTE:

1. DETAILS OF TREATMENT SYSTEM MAY VARY FROM SYSTEM INDICATED ABOVE. SPECIFIC MEANS AND METHODS OF TREATMENT TO BE SELECTED BY CONTRACTOR. WATER WILL BE TREATED TO MEET REQUIRED EFFLUENT STANDARDS.

**HALEY
ALDRICH**

1000 BOYLSTON STREET
SCOTIA PARCEL
BOSTON, MASSACHUSETTS

**PROPOSED TREATMENT SYSTEM
SCHEMATIC**

SCALE: AS SHOWN
MAY 2019

FIGURE 3

APPENDIX A

NOTICE OF INTENT

II. Suggested Format for the Remediation General Permit Notice of Intent (NOI)

A. General site information:

1. Name of site: 1000 Boylston Street	Site address: 1000 Boylston Street Street:		
2. Site owner 1000 Boylston Street Owner LLC Owner is (check one): <input type="checkbox"/> Federal <input type="checkbox"/> State/Tribal <input checked="" type="checkbox"/> Private <input type="checkbox"/> Other; if so, specify:	City: Boston	State: MA	Zip: 02215
3. Site operator, if different than owner Suffolk Construction	Contact Person: Adam Weiner Telephone: 617-236-0200 Email: Mailing address: 200 Clarendon Street Street: Floor 50 City: Boston State: MA Zip: 02116		
4. NPDES permit number assigned by EPA: Not applicable NPDES permit is (check all that apply): <input checked="" type="checkbox"/> RGP <input type="checkbox"/> DGP <input type="checkbox"/> CGP <input type="checkbox"/> MSGP <input type="checkbox"/> Individual NPDES permit <input type="checkbox"/> Other; if so, specify:	5. Other regulatory program(s) that apply to the site (check all that apply): <div style="display: flex; justify-content: space-between;"> <div> <input checked="" type="checkbox"/> MA Chapter 21e; list RTN(s): 3-27939, 3-22618 <input type="checkbox"/> NH Groundwater Management Permit or Groundwater Release Detection Permit: </div> <div> <input type="checkbox"/> CERCLA <input type="checkbox"/> UIC Program <input type="checkbox"/> POTW Pretreatment <input type="checkbox"/> CWA Section 404 </div> </div>		

B. Receiving water information:

1. Name of receiving water(s): Charles River	Waterbody identification of receiving water(s): MA72-38	Classification of receiving water(s): Class B
Receiving water is (check any that apply): <input type="checkbox"/> Outstanding Resource Water <input type="checkbox"/> Ocean Sanctuary <input type="checkbox"/> territorial sea <input type="checkbox"/> Wild and Scenic River		
2. Has the operator attached a location map in accordance with the instructions in B, above? (check one): <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No Are sensitive receptors present near the site? (check one): <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No If yes, specify:		
3. Indicate if the receiving water(s) is listed in the State's Integrated List of Waters (i.e., CWA Section 303(d)). Include which designated uses are impaired, and any pollutants indicated. Also, indicate if a final TMDL is available for any of the indicated pollutants. For more information, contact the appropriate State as noted in Part 4.6 of the RGP. TMDL for phosphorus and pathogens		
4. Indicate the seven day-ten-year low flow (7Q10) of the receiving water determined in accordance with the instructions in Appendix V for sites located in Massachusetts and Appendix VI for sites located in New Hampshire.		29.2
5. Indicate the requested dilution factor for the calculation of water quality-based effluent limitations (WQBELs) determined in accordance with the instructions in Appendix V for sites in Massachusetts and Appendix VI for sites in New Hampshire.		132.04
6. Has the operator received confirmation from the appropriate State for the 7Q10 and dilution factor indicated? (check one): <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No If yes, indicate date confirmation received: 05/23/2019		
7. Has the operator attached a summary of receiving water sampling results as required in Part 4.2 of the RGP in accordance with the instruction in Appendix VIII? (check one): <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		

C. Source water information:

1. Source water(s) is (check any that apply):			
<input checked="" type="checkbox"/> Contaminated groundwater Has the operator attached a summary of influent sampling results as required in Part 4.2 of the RGP in accordance with the instruction in Appendix VIII? (check one): <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Contaminated surface water Has the operator attached a summary of influent sampling results as required in Part 4.2 of the RGP in accordance with the instruction in Appendix VIII? (check one): <input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> The receiving water	<input type="checkbox"/> Potable water; if so, indicate municipality or origin: <input type="checkbox"/> Other; if so, specify:
		<input type="checkbox"/> A surface water other than the receiving water; if so, indicate waterbody:	

2. Source water contaminants: Cadmium, Lead, Nickel, Zinc, SVOCs	
a. For source waters that are contaminated groundwater or contaminated surface water, indicate are any contaminants present that are not included in the RGP? (check one): <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No If yes, indicate the contaminant(s) and the maximum concentration present in accordance with the instructions in Appendix VIII.	b. For a source water that is a surface water other than the receiving water, potable water or other, indicate any contaminants present at the maximum concentration in accordance with the instructions in Appendix VIII? (check one): <input type="checkbox"/> Yes <input type="checkbox"/> No
3. Has the source water been previously chlorinated or otherwise contains residual chlorine? (check one): <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	

D. Discharge information

1.The discharge(s) is a(n) (check any that apply): <input type="checkbox"/> Existing discharge <input checked="" type="checkbox"/> New discharge <input type="checkbox"/> New source	
Outfall(s): BWSC Outfall Number MWR 018	Outfall location(s): (Latitude, Longitude) 42.352698, -71.087297
<p>Discharges enter the receiving water(s) via (check any that apply): <input type="checkbox"/> Direct discharge to the receiving water <input type="checkbox"/> Indirect discharge, if so, specify:</p> <p><input type="checkbox"/> A private storm sewer system <input checked="" type="checkbox"/> A municipal storm sewer system</p> <p>If the discharge enters the receiving water via a private or municipal storm sewer system:</p> <p>Has notification been provided to the owner of this system? (check one): <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No</p> <p>Has the operator has received permission from the owner to use such system for discharges? (check one): <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No, if so, explain, with an estimated timeframe for obtaining permission: BWSC permit is being submitted concurrently. Approval will be received prior to start of discharge.</p> <p>Has the operator attached a summary of any additional requirements the owner of this system has specified? (check one): <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No</p>	
Provide the expected start and end dates of discharge(s) (month/year): June 2019 - June 2021	
Indicate if the discharge is expected to occur over a duration of: <input type="checkbox"/> less than 12 months <input checked="" type="checkbox"/> 12 months or more <input type="checkbox"/> is an emergency discharge	
Has the operator attached a site plan in accordance with the instructions in D, above? (check one): <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	

2. Activity Category: (check all that apply)	3. Contamination Type Category: (check all that apply)	
<input checked="" type="checkbox"/> I – Petroleum-Related Site Remediation <input type="checkbox"/> II – Non-Petroleum-Related Site Remediation <input checked="" type="checkbox"/> III – Contaminated Site Dewatering <input type="checkbox"/> IV – Dewatering of Pipelines and Tanks <input type="checkbox"/> V – Aquifer Pump Testing <input type="checkbox"/> VI – Well Development/Rehabilitation <input type="checkbox"/> VII – Collection Structure Dewatering/Remediation <input type="checkbox"/> VIII – Dredge-Related Dewatering	<p>a. If Activity Category I or II: (check all that apply)</p> <p><input type="checkbox"/> A. Inorganics</p> <p><input type="checkbox"/> B. Non-Halogenated Volatile Organic Compounds</p> <p><input type="checkbox"/> C. Halogenated Volatile Organic Compounds</p> <p><input type="checkbox"/> D. Non-Halogenated Semi-Volatile Organic Compounds</p> <p><input type="checkbox"/> E. Halogenated Semi-Volatile Organic Compounds</p> <p><input checked="" type="checkbox"/> F. Fuels Parameters</p>	
	<p>b. If Activity Category III, IV, V, VI, VII or VIII: (check either G or H)</p>	
	<table border="1"> <tr> <td data-bbox="970 799 1419 873"><input checked="" type="checkbox"/> G. Sites with Known Contamination</td><td data-bbox="1419 799 2003 873"><input type="checkbox"/> H. Sites with Unknown Contamination</td></tr> </table>	<input checked="" type="checkbox"/> G. Sites with Known Contamination
<input checked="" type="checkbox"/> G. Sites with Known Contamination	<input type="checkbox"/> H. Sites with Unknown Contamination	
<table border="1"> <tr> <td data-bbox="970 873 1419 1409"> <p>c. If Category III-G, IV-G, V-G, VI-G, VII-G or VIII-G: (check all that apply)</p> <p><input checked="" type="checkbox"/> A. Inorganics</p> <p><input type="checkbox"/> B. Non-Halogenated Volatile Organic Compounds</p> <p><input type="checkbox"/> C. Halogenated Volatile Organic Compounds</p> <p><input checked="" type="checkbox"/> D. Non-Halogenated Semi-Volatile Organic Compounds</p> <p><input type="checkbox"/> E. Halogenated Semi-Volatile Organic Compounds</p> <p><input type="checkbox"/> F. Fuels Parameters</p> </td><td data-bbox="1419 873 2003 1409"> <p>d. If Category III-H, IV-H, V-H, VI-H, VII-H or VIII-H Contamination Type Categories A through F apply</p> </td></tr> </table>	<p>c. If Category III-G, IV-G, V-G, VI-G, VII-G or VIII-G: (check all that apply)</p> <p><input checked="" type="checkbox"/> A. Inorganics</p> <p><input type="checkbox"/> B. Non-Halogenated Volatile Organic Compounds</p> <p><input type="checkbox"/> C. Halogenated Volatile Organic Compounds</p> <p><input checked="" type="checkbox"/> D. Non-Halogenated Semi-Volatile Organic Compounds</p> <p><input type="checkbox"/> E. Halogenated Semi-Volatile Organic Compounds</p> <p><input type="checkbox"/> F. Fuels Parameters</p>	<p>d. If Category III-H, IV-H, V-H, VI-H, VII-H or VIII-H Contamination Type Categories A through F apply</p>
<p>c. If Category III-G, IV-G, V-G, VI-G, VII-G or VIII-G: (check all that apply)</p> <p><input checked="" type="checkbox"/> A. Inorganics</p> <p><input type="checkbox"/> B. Non-Halogenated Volatile Organic Compounds</p> <p><input type="checkbox"/> C. Halogenated Volatile Organic Compounds</p> <p><input checked="" type="checkbox"/> D. Non-Halogenated Semi-Volatile Organic Compounds</p> <p><input type="checkbox"/> E. Halogenated Semi-Volatile Organic Compounds</p> <p><input type="checkbox"/> F. Fuels Parameters</p>	<p>d. If Category III-H, IV-H, V-H, VI-H, VII-H or VIII-H Contamination Type Categories A through F apply</p>	

4. Influent and Effluent Characteristics

Parameter	Known or believed absent	Known or believed present	# of samples	Test method (#)	Detection limit (µg/l)	Influent		Effluent Limitations	
						Daily maximum (µg/l)	Daily average (µg/l)	TBEL	WQBEL
A. Inorganics									
Ammonia		✓	1	4500NH3-	75	892	892	Report mg/L	---
Chloride		✓	1	300.0	12500	125000	125000	Report µg/l	---
Total Residual Chlorine	✓		1	4500CL-D	20	ND	ND	0.2 mg/L	
Total Suspended Solids		✓	1	2540D	25000	350000	350000	30 mg/L	---
Antimony	✓		2	200.8	4	ND	ND	206 µg/L	
Arsenic		✓	2	200.8	1	19.24	19.24	104 µg/L	
Cadmium		✓	2	200.8	2	4.98	4.98	10.2 µg/L	
Chromium III		✓	1	107	10	17	17	323 µg/L	
Chromium VI	✓		1	7196A	0.01	ND	ND	323 µg/L	
Copper		✓	1	200.8	1	46.75	46.75	242 µg/L	
Iron		✓	1	200.7	50	26600	26600	5,000 µg/L	
Lead		✓	2	200.8	1	75.02	75.02	160 µg/L	2.13
Mercury	✓		2	245.1	2	ND	ND	0.739 µg/L	
Nickel		✓	2	200.8	2	216.1	216.1	1,450 µg/L	
Selenium		✓	2	200.8	5	43.78	43.78	235.8 µg/L	
Silver	✓		2	200.8	4	ND	ND	35.1 µg/L	
Zinc		✓	2	200.8	10	1859	1859	420 µg/L	
Cyanide	✓		1	4500CN-C	5	ND	ND	178 mg/L	
B. Non-Halogenated VOCs									
Total BTEX	✓		2	8260C	NA	ND	ND	100 µg/L	---
Benzene	✓		2	8260C	1	ND	ND	5.0 µg/L	---
1,4 Dioxane	✓		1	8260C	50	ND	ND	200 µg/L	---
Acetone	✓		2	8260C	10	ND	ND	7.97 mg/L	---
Phenol	✓		1	8270	30	ND	ND	1,080 µg/L	

Parameter	Known or believed absent	Known or believed present	# of samples	Test method (#)	Detection limit (µg/l)	Influent		Effluent Limitations	
						Daily maximum (µg/l)	Daily average (µg/l)	TBEL	WQBEL
C. Halogenated VOCs									
Carbon Tetrachloride	✓		2	8260C	1	ND	ND	4.4 µg/L	
1,2 Dichlorobenzene	✓		2	8260C	5	ND	ND	600 µg/L	---
1,3 Dichlorobenzene	✓		2	8260C	5	ND	ND	320 µg/L	---
1,4 Dichlorobenzene	✓		2	8260C	5	ND	ND	5.0 µg/L	---
Total dichlorobenzene	✓		2	8260C	NA	ND	ND	763 µg/L in NH	---
1,1 Dichloroethane	✓		2	8260C	1	ND	ND	70 µg/L	---
1,2 Dichloroethane	✓		2	8260C	1.5	ND	ND	5.0 µg/L	---
1,1 Dichloroethylene	✓		2	8260C	1	ND	ND	3.2 µg/L	---
Ethylene Dibromide	✓		1	8260C	10	ND	ND	0.05 µg/L	---
Methylene Chloride	✓		2	8260C	1	ND	ND	4.6 µg/L	---
1,1,1 Trichloroethane	✓		2	8260C	2	ND	ND	200 µg/L	---
1,1,2 Trichloroethane	✓		2	8260C	1.5	ND	ND	5.0 µg/L	---
Trichloroethylene	✓		2	8260C	1	ND	ND	5.0 µg/L	---
Tetrachloroethylene	✓		2	8260C	1	ND	ND	5.0 µg/L	
cis-1,2 Dichloroethylene	✓		2	8260C	1	ND	ND	70 µg/L	---
Vinyl Chloride	✓		2	8260C	1	ND	ND	2.0 µg/L	---
D. Non-Halogenated SVOCs									
Total Phthalates	✓		2	8270D	NA	ND	ND	190 µg/L	
Diethylhexyl phthalate	✓		2	8270D	NA	ND	ND	101 µg/L	
Total Group I PAHs		✓	1	8270D-SI	NA	0.99	0.99	1.0 µg/L	---
Benzo(a)anthracene		✓	1	8270D-SI	0.1	0.2	0.2	As Total PAHs	
Benzo(a)pyrene		✓	1	8270D-SI	0.1	0.19	0.19		
Benzo(b)fluoranthene		✓	1	8270D-SI	0.1	0.27	0.27		
Benzo(k)fluoranthene		✓	1	8270D-SI	0.1	0.16	0.16		
Chrysene		✓	2	8270D-SI	0.1	0.2	0.2		
Dibenzo(a,h)anthracene	✓		1	8270D-SI	0.1	ND	ND		
Indeno(1,2,3-cd)pyrene		✓	1	8270D-SI	0.1	0.17	0.17		

[illegible]

E. Treatment system information

<p>1. Indicate the type(s) of treatment that will be applied to effluent prior to discharge: (check all that apply)</p> <p><input type="checkbox"/> Adsorption/Absorption <input type="checkbox"/> Advanced Oxidation Processes <input type="checkbox"/> Air Stripping <input type="checkbox"/> Granulated Activated Carbon (“GAC”)/Liquid Phase Carbon Adsorption <input type="checkbox"/> Ion Exchange <input type="checkbox"/> Precipitation/Coagulation/Flocculation <input checked="" type="checkbox"/> Separation/Filtration <input type="checkbox"/> Other; if so, specify:</p>	
<p>2. Provide a written description of all treatment system(s) or processes that will be applied to the effluent prior to discharge. See attached Figure 3.</p> <p>Identify each major treatment component (check any that apply):</p> <p><input checked="" type="checkbox"/> Fractionation tanks <input type="checkbox"/> Equalization tank <input type="checkbox"/> Oil/water separator <input type="checkbox"/> Mechanical filter <input type="checkbox"/> Media filter <input type="checkbox"/> Chemical feed tank <input type="checkbox"/> Air stripping unit <input checked="" type="checkbox"/> Bag filter <input type="checkbox"/> Other; if so, specify:</p> <p>Indicate if either of the following will occur (check any that apply):</p> <p><input type="checkbox"/> Chlorination <input type="checkbox"/> De-chlorination</p>	
<p>3. Provide the design flow capacity in gallons per minute (gpm) of the most limiting component. Indicate the most limiting component: Bag filters Is use of a flow meter feasible? (check one): <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No, if so, provide justification:</p>	<p>100</p>
<p>Provide the proposed maximum effluent flow in gpm.</p>	<p>100</p>
<p>Provide the average effluent flow in gpm.</p>	<p>50</p>
<p>If Activity Category IV applies, indicate the estimated total volume of water that will be discharged:</p>	
<p>4. Has the operator attached a schematic of flow in accordance with the instructions in E, above? (check one): <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No</p>	

F. Chemical and additive information

<p>1. Indicate the type(s) of chemical or additive that will be applied to effluent prior to discharge or that may otherwise be present in the discharge(s): (check all that apply)</p> <p><input type="checkbox"/> Algaecides/biocides <input type="checkbox"/> Antifoams <input type="checkbox"/> Coagulants <input type="checkbox"/> Corrosion/scale inhibitors <input type="checkbox"/> Disinfectants <input type="checkbox"/> Flocculants <input type="checkbox"/> Neutralizing agents <input type="checkbox"/> Oxidants <input type="checkbox"/> Oxygen <input type="checkbox"/> scavengers <input type="checkbox"/> pH conditioners <input type="checkbox"/> Bioremedial agents, including microbes <input type="checkbox"/> Chlorine or chemicals containing chlorine <input type="checkbox"/> Other; if so, specify:</p>
<p>2. Provide the following information for each chemical/additive, using attachments, if necessary:</p> <p>Not Applicable</p> <p>a. Product name, chemical formula, and manufacturer of the chemical/additive;</p> <p>b. Purpose or use of the chemical/additive or remedial agent;</p> <p>c. Material Safety Data Sheet (MSDS) and Chemical Abstracts Service (CAS) Registry number for each chemical/additive;</p> <p>d. The frequency (hourly, daily, etc.), duration (hours, days), quantity (maximum and average), and method of application for the chemical/additive;</p> <p>e. Any material compatibility risks for storage and/or use including the control measures used to minimize such risks; and</p> <p>f. If available, the vendor's reported aquatic toxicity (NOAEL and/or LC50 in percent for aquatic organism(s)).</p>
<p>3. Has the operator attached an explanation which demonstrates that the addition of such chemicals/additives may be authorized under this general permit in accordance with the instructions in F, above? (check one): <input type="checkbox"/> Yes <input type="checkbox"/> No; if no, has the operator attached data that demonstrates each of the 126 priority pollutants in CWA Section 307(a) and 40 CFR Part 423.15(j)(1) are non-detect in discharges with the addition of the proposed chemical/additive? (check one): <input type="checkbox"/> Yes <input type="checkbox"/> No</p>

G. Endangered Species Act eligibility determination

<p>1. Indicate under which criterion the discharge(s) is eligible for coverage under this general permit:</p> <p><input checked="" type="checkbox"/> FWS Criterion A: No endangered or threatened species or critical habitat are in proximity to the discharges or related activities or come in contact with the “action area”.</p> <p><input type="checkbox"/> FWS Criterion B: Formal or informal consultation with the FWS under section 7 of the ESA resulted in either a no jeopardy opinion (formal consultation) or a written concurrence by FWS on a finding that the discharges and related activities are “not likely to adversely affect” listed species or critical habitat (informal consultation). Has the operator completed consultation with FWS? (check one): <input type="checkbox"/> Yes <input type="checkbox"/> No; if no, is consultation underway? (check one): <input type="checkbox"/> Yes <input type="checkbox"/> No</p> <p><input type="checkbox"/> FWS Criterion C: Using the best scientific and commercial data available, the effect of the discharges and related activities on listed species and critical habitat have been evaluated. Based on those evaluations, a determination is made by EPA, or by the operator and affirmed by EPA, that the discharges and related activities will have “no effect” on any federally threatened or endangered listed species or designated critical habitat under the jurisdiction of the FWS. This determination was made by: (check one) <input type="checkbox"/> the operator <input type="checkbox"/> EPA <input type="checkbox"/> Other; if so, specify:</p>
--

- ☐ **NMFS Criterion:** A determination made by EPA is affirmed by the operator that the discharges and related activities will have “no effect” or are “not likely to adversely affect” any federally threatened or endangered listed species or critical habitat under the jurisdiction of NMFS and will not result in any take of listed species. Has the operator previously completed consultation with NMFS? (check one): ☐ Yes ☒ No

2. Has the operator attached supporting documentation of ESA eligibility in accordance with the instructions in Appendix I, and G, above? (check one): ☒ Yes ☐ No

Does the supporting documentation include any written concurrence or finding provided by the Services? (check one): ☐ Yes ☒ No; if yes, attach.

H. National Historic Preservation Act eligibility determination

1. Indicate under which criterion the discharge(s) is eligible for coverage under this general permit:

- ☒ **Criterion A:** No historic properties are present. The discharges and discharge-related activities (e.g., BMPs) do not have the potential to cause effects on historic properties.
- ☐ **Criterion B:** Historic properties are present. Discharges and discharge related activities do not have the potential to cause effects on historic properties.
- ☐ **Criterion C:** Historic properties are present. The discharges and discharge-related activities have the potential to have an effect or will have an adverse effect on historic properties.

2. Has the operator attached supporting documentation of NHPA eligibility in accordance with the instructions in H, above? (check one): ☒ Yes ☐ No

Does the supporting documentation include any written agreement with the State Historic Preservation Officer (SHPO), Tribal Historic Preservation Officer (TPHO), or other tribal representative that outlines measures the operator will carry out to mitigate or prevent any adverse effects on historic properties? (check one): ☐ Yes ☒ No

I. Supplemental information

Describe any supplemental information being provided with the NOI. Include attachments if required or otherwise necessary.

Has the operator attached data, including any laboratory case narrative and chain of custody used to support the application? (check one): ☒ Yes ☐ No

Has the operator attached the certification requirement for the Best Management Practices Plan (BMPP)? (check one): ☒ Yes ☐ No

J. Certification requirement

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I have no personal knowledge that the information submitted is other than true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

A BMPP meeting the requirements of this general permit will be implemented upon initiation of
BMPP certification statement: **discharge**

Notification provided to the appropriate State, including a copy of this NOI, if required.

Check one: Yes ☐ No ☐ **N/A**

Notification provided to the municipality in which the discharge is located, including a copy of this NOI, if requested.

Check one: Yes ☒ No ☐

Notification provided to the owner of a private or municipal storm sewer system, if such system is used for site discharges, including a copy of this NOI, if requested.

Check one: Yes ☒ No ☐ NA ☐

Permission obtained from the owner of a private or municipal storm sewer system, if such system is used for site discharges. If yes, attach additional conditions. If no, attach explanation and timeframe for obtaining permission.

Check one: Yes ☒ No ☐ NA ☐

Notification provided to the owner/operator of the area associated with activities covered by an additional discharge permit(s). Additional discharge permit is (check one): ☐ RGP ☐ DGP ☐ CGP ☐ MSGP ☐ Individual NPDES permit
☐ Other; if so, specify:

Check one: Yes ☐ No ☐ NA ☒

Signature:



Date: 6/6/19

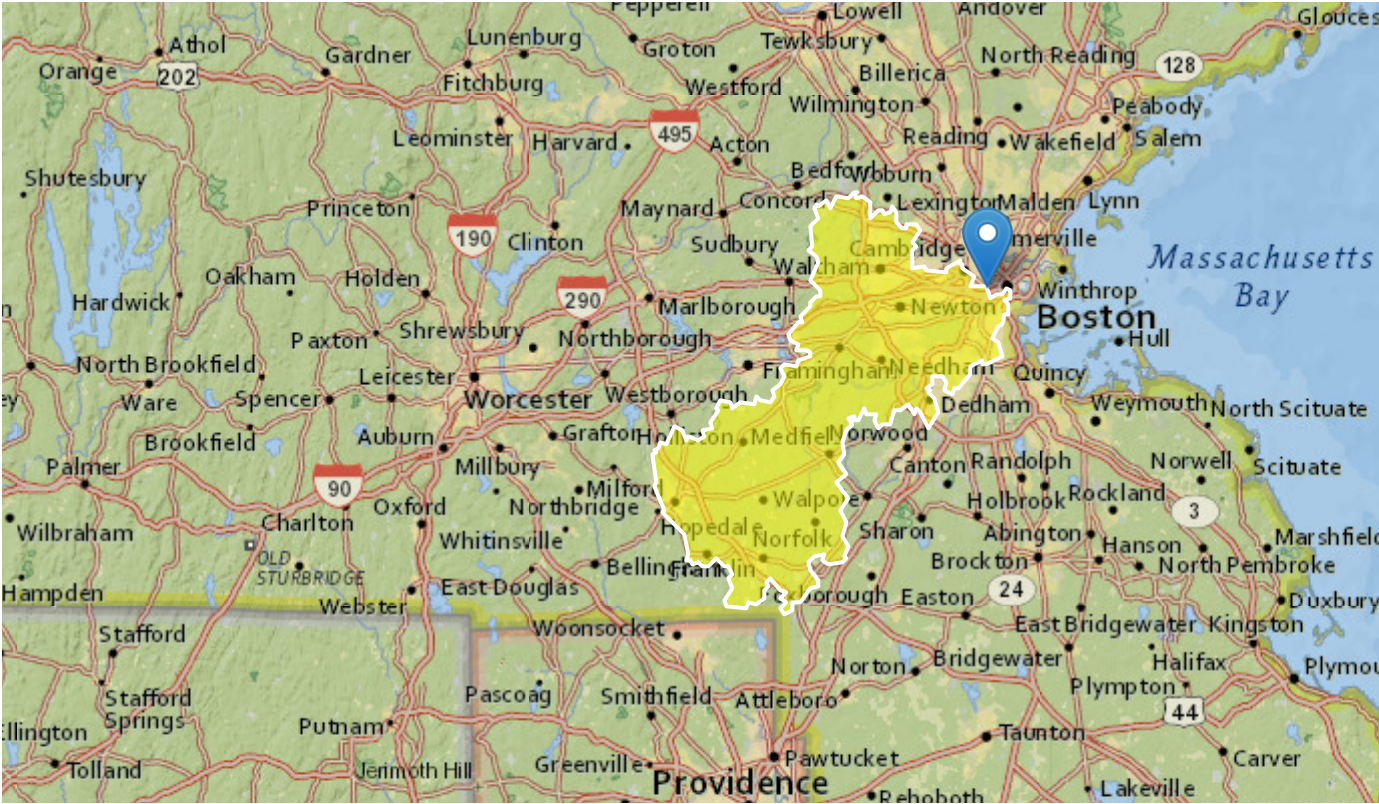
Print Name and Title: **Suffolk Construction, Senior Project Manager**

APPENDIX B

EFFLUENT LIMIT DOCUMENTATION

StreamStats Report

Region ID: MA
Workspace ID: MA20180905164419834000
Clicked Point (Latitude, Longitude): 42.35561, -71.08841
Time: 2018-09-05 12:44:34 -0400



Basin Characteristics

Parameter Code	Parameter Description	Value	Unit
MAREGION	Region of Massachusetts 0 for Eastern 1 for Western	0	dimensionless
BSLDEM250	Mean basin slope computed from 1:250K DEM	2.34	percent
DRNAREA	Area that drains to a point on a stream	307	square miles
DRFTPERSTR	Area of stratified drift per unit of stream length	0.25	square mile per mile

Low-Flow Statistics Parameters [Statewide Low Flow WRIR00 4135]

Parameter Code	Parameter Name	Value	Units	Min Limit	Max Limit
DRNAREA	Drainage Area	307	square miles	1.61	149
BSLDEM250	Mean Basin Slope from 250K DEM	2.34	percent	0.32	24.6
DRFTPERSTR	Stratified Drift per Stream Length	0.25	square mile per mile	0	1.29
MAREGION	Massachusetts Region	0	dimensionless	0	1

Low-Flow Statistics Disclaimers [Statewide Low Flow WRIR00 4135]

One or more of the parameters is outside the suggested range. Estimates were extrapolated with unknown errors

Low-Flow Statistics Flow Report [Statewide Low Flow WRIR00 4135]

Statistic	Value	Unit
7 Day 2 Year Low Flow	57.2	ft ³ /s
7 Day 10 Year Low Flow	29.2	ft ³ /s

Low-Flow Statistics Citations

Ries, K.G., III, 2000, Methods for estimating low-flow statistics for Massachusetts streams: U.S. Geological Survey Water Resources Investigations Report 00-4135, 81 p. (<http://pubs.usgs.gov/wri/wri004135/>)

USGS Data Disclaimer: Unless otherwise stated, all data, metadata and related materials are considered to satisfy the quality standards relative to the purpose for which the data were collected. Although these data and associated metadata have been reviewed for accuracy and completeness and approved for release by the U.S. Geological Survey (USGS), no warranty expressed or implied is made regarding the display or utility of the data for other purposes, nor on all computer systems, nor shall the act of distribution constitute any such warranty.

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Application Version: 4.2.1

HALEY & ALDRICH, INC.		CALCULATIONS	FILE NO.	129835-013	
			SHEET	1	of 1
CLIENT	1000 Boylston Owner LLC		DATE	22-May-19	
PROJECT	1000 Boylston Street, Boston MA		COMPUTED BY	GKH	
SUBJECT	DILUTION FACTOR CALCULATIONS				
PURPOSE:	Calculate Dilution Factor (DF) for project based on 7 Day 10 Year (7Q10) Low Flow values.				
APPROACH:	Calculate DF based on EPA formula $(Q_s + Q_D)/Q_D$, where Q_s is 7Q10 in million gallons per day (MGD) and Q_D is the maximum discharge flow in MGD.				
ASSUMPTIONS:	1. 7Q10 is 29.2 cfs (from StreamStats 4.0) 2. A conversion of 7.48 is used to convert cubic feet to gallons 3. A discharge flowrate of 100 gpm is assumed				
CALCULATIONS:					
<i>7Q10 Low Flow Value (Q_s)</i>					
$Q_s =$	$\frac{29.2 \text{ ft}^3}{\text{sec}}$	X	$\frac{7.48 \text{ gallons}}{\text{ft}^3}$	X	$\frac{86,400 \text{ sec}}{\text{day}}$ X $\frac{1 \text{ MG}}{1,000,000 \text{ gallons}}$
$Q_s = 18.87 \text{ MGD}$					
<i>Discharge Flowrate (Q_D)</i>					
$Q_D =$	$\frac{100 \text{ gallons}}{\text{min}}$	X	$\frac{1,440 \text{ min}}{\text{day}}$	X	$\frac{1 \text{ MG}}{1,000,000 \text{ gallons}}$
$Q_D = 0.144 \text{ MGD}$					
<i>Dilution Factor (DF)</i>					
$DF =$	$\frac{Q_s + Q_D}{Q_D}$	=	$\frac{18.87 \text{ MGD} + 0.144 \text{ MGD}}{0.144 \text{ MGD}}$	=	132.04
CONCLUSION	The dilution factor for this project is calculated to be 132.04 based on the provided 7Q10 low flow value and discharge flowrate.				

Howard, Grace

From: Vakalopoulos, Catherine (DEP) <catherine.vakalopoulos@state.ma.us>
Sent: Thursday, May 23, 2019 10:48 AM
To: Howard, Grace
Cc: Zawadzkas, Peter; Ruan, Xiaodan (DEP)
Subject: RE: NPDES RGP Application - 7Q10 and Dilution Factor Confirmation

CAUTION: External Email

Hi Grace,

I can confirm that your dilution factor calculation of 132 for this proposed discharge from 1000 Boylston St Boston to the Charles River using a design flow of 100 gpm is correct.

To assist you with filling out the NOI for coverage under the RGP, this segment of the Charles River is identified as MA72-38, is classified as Class B, and is not listed as an Outstanding Resource Water. There are two approved TMDLs for pathogens and nutrients. To see the causes of impairments, go to: https://www.mass.gov/files/documents/2016/08/sa/14list2_0.pdf and search for "MA72-38".

As you probably remember, if this is not a *current* MCP site then you will also have to apply to MassDEP by following the instructions at: <https://www.mass.gov/how-to/wm-15-npdes-general-permit-notice-of-intent>. There is also a \$500 fee unless the applicant is fee-exempt (e.g. a municipality).

Please let me know if you have any questions.

Cathy

Cathy Vakalopoulos, Massachusetts Department of Environmental Protection
1 Winter St., Boston, MA 02108, 617-348-4026

 Please consider the environment before printing this e-mail

From: Howard, Grace [mailto:GHoward@haleyaldrich.com]
Sent: Wednesday, May 22, 2019 5:08 PM
To: Vakalopoulos, Catherine (DEP)
Cc: Zawadzkas, Peter
Subject: RE: NPDES RGP Application - 7Q10 and Dilution Factor Confirmation

Hi Cathy,

This project was on hold for a little while, but I am reaching back out now for your confirmation on the 7 Day 10 Year low flow value and Dilution Factor for our project. Project information is below, and attached are the USGS StreamStats report and calculation sheet for reference. The values in this revised version are representative of the design flow of the proposed system.

Project:
1000 Boylston Street
Boston, Massachusetts

Enter number values in green boxes below

Enter values in the units specified

↓	
29.2	Q _R = Enter upstream flow in MGD
0.144	Q _P = Enter discharge flow in MGD
0	Downstream 7Q10

Enter a dilution factor, if other than zero

↓	
132.04	

Enter values in the units specified

↓	
768	C _I = Enter influent hardness in mg/L CaCO ₃
69.6	C _S = Enter receiving water hardness in mg/L CaCO ₃

Enter **receiving water** concentrations in the units specified

↓	
7.7	pH in Standard Units
9.82	Temperature in °C
0.172	Ammonia in mg/L
69.6	Hardness in mg/L CaCO ₃
0	Salinity in ppt
0	Antimony in µg/L
0	Arsenic in µg/L
0	Cadmium in µg/L
0	Chromium III in µg/L
0	Chromium VI in µg/L
2.55	Copper in µg/L
609	Iron in µg/L
2.41	Lead in µg/L
0	Mercury in µg/L
0	Nickel in µg/L
0	Selenium in µg/L
0	Silver in µg/L
0	Zinc in µg/L

Enter **influent** concentrations in the units specified

↓	
0	TRC in µg/L
0.892	Ammonia in mg/L
0	Antimony in µg/L
19.24	Arsenic in µg/L
4.98	Cadmium in µg/L
17	Chromium III in µg/L
0	Chromium VI in µg/L
46.75	Copper in µg/L
26.6	Iron in µg/L
75.02	Lead in µg/L
0	Mercury in µg/L
216.1	Nickel in µg/L
43.78	Selenium in µg/L
0	Silver in µg/L
1859	Zinc in µg/L
0	Cyanide in µg/L
0	Phenol in µg/L
0	Carbon Tetrachloride in µg/L
0	Tetrachloroethylene in µg/L
0	Total Phthalates in µg/L
0	Diethylhexylphthalate in µg/L
0.2	Benzo(a)anthracene in µg/L
0.19	Benzo(a)pyrene in µg/L
0.27	Benzo(b)fluoranthene in µg/L
0.16	Benzo(k)fluoranthene in µg/L
0.2	Chrysene in µg/L
0	Dibenzo(a,h)anthracene in µg/L
0.17	Indeno(1,2,3-cd)pyrene in µg/L
0	Methyl-tert butyl ether in µg/L

Notes:Freshwater: Q_R equal to the 7Q10; enter alternate Q_R if approved by the State; enter 0 if no dilution factor approvedSaltwater (estuarine and marine): enter Q_R if approved by the State; enter 0 if no entry

Discharge flow is equal to the design flow or 1 MGD, whichever is less

Only if approved by State as the entry for Q_R; leave 0 if no entry

Saltwater (estuarine and marine): only if approved by the State

Leave 0 if no entry

Freshwater only

pH, temperature, and ammonia required for all discharges

Hardness required for freshwater

Salinity required for saltwater (estuarine and marine)

Metals required for all discharges if present and if dilution factor is > 1

Enter 0 if non-detect or testing not required

if >1 sample, enter maximum

if >10 samples, may enter 95th percentile

Enter 0 if non-detect or testing not required

Dilution Factor	203.8					
	TBEL applies if bolded		WQBEL applies if bolded		Compliance Level applies if shown	
A. Inorganics						
Ammonia	Report	mg/L	---			
Chloride	Report	µg/L	---			
Total Residual Chlorine	0.2	mg/L	2242	µg/L	---	µg/L
Total Suspended Solids	30	mg/L	---			
Antimony	206	µg/L	130418	µg/L		
Arsenic	104	µg/L	2038	µg/L		
Cadmium	10.2	µg/L	43.6895	µg/L		
Chromium III	323	µg/L	13575.5	µg/L		
Chromium VI	323	µg/L	2330.1	µg/L		
Copper	242	µg/L	936.2	µg/L		
Iron	5000	µg/L	80286	µg/L		
Lead	160	µg/L	2.13	µg/L		
Mercury	0.739	µg/L	184.60	µg/L		
Nickel	1450	µg/L	8147.6	µg/L		
Selenium	235.8	µg/L	1018.9	µg/L		
Silver	35.1	µg/L	449.1	µg/L		
Zinc	420	µg/L	18707.0	µg/L		
Cyanide	178	mg/L	1059.6	µg/L	---	µg/L
B. Non-Halogenated VOCs						
Total BTEX	100	µg/L	---			
Benzene	5.0	µg/L	---			
1,4 Dioxane	200	µg/L	---			
Acetone	7970	µg/L	---			
Phenol	1,080	µg/L	61133	µg/L		
C. Halogenated VOCs						
Carbon Tetrachloride	4.4	µg/L	326.0	µg/L		
1,2 Dichlorobenzene	600	µg/L	---			
1,3 Dichlorobenzene	320	µg/L	---			
1,4 Dichlorobenzene	5.0	µg/L	---			
Total dichlorobenzene	---	µg/L	---			
1,1 Dichloroethane	70	µg/L	---			
1,2 Dichloroethane	5.0	µg/L	---			
1,1 Dichloroethylene	3.2	µg/L	---			
Ethylene Dibromide	0.05	µg/L	---			
Methylene Chloride	4.6	µg/L	---			
1,1,1 Trichloroethane	200	µg/L	---			
1,1,2 Trichloroethane	5.0	µg/L	---			
Trichloroethylene	5.0	µg/L	---			
Tetrachloroethylene	5.0	µg/L	672.5	µg/L		
cis-1,2 Dichloroethylene	70	µg/L	---			
Vinyl Chloride	2.0	µg/L	---			
D. Non-Halogenated SVOCs						
Total Phthalates	190	µg/L	---	µg/L		
Diethylhexyl phthalate	101	µg/L	448.3	µg/L		
Total Group I Polycyclic Aromatic Hydrocarbons	1.0	µg/L	---			
Benzo(a)anthracene	1.0	µg/L	0.7744	µg/L	---	µg/L
Benzo(a)pyrene	1.0	µg/L	0.7744	µg/L	---	µg/L
Benzo(b)fluoranthene	1.0	µg/L	0.7744	µg/L	---	µg/L
Benzo(k)fluoranthene	1.0	µg/L	0.7744	µg/L	---	µg/L
Chrysene	1.0	µg/L	0.7744	µg/L	---	µg/L
Dibenzo(a,h)anthracene	1.0	µg/L	0.7744	µg/L	---	µg/L
Indeno(1,2,3-cd)pyrene	1.0	µg/L	0.7744	µg/L	---	µg/L
Total Group II Polycyclic Aromatic Hydrocarbons	100	µg/L	---			
Naphthalene	20	µg/L	---			
E. Halogenated SVOCs						
Total Polychlorinated Biphenyls	0.000064	µg/L	---		0.5	µg/L
Pentachlorophenol	1.0	µg/L	---			
F. Fuels Parameters						
Total Petroleum Hydrocarbons	5.0	mg/L	---			
Ethanol	Report	mg/L	---			
Methyl-tert-Butyl Ether	70	µg/L	4076	µg/L		
tert-Butyl Alcohol	120	µg/L	---			
tert-Amyl Methyl Ether	90	µg/L	---			

APPENDIX C

COPY OF CITY OF BOSTON DEWATERING PERMIT APPLICATION



Boston Water and
Sewer Commission
980 Harrison Avenue
Boston, MA 02119-2540

DEWATERING DISCHARGE PERMIT APPLICATION

OWNER / AUTHORIZED APPLICANT PROVIDE INFORMATION HERE:

Company Name: 1000 Boylston Street Owner LLC Address: 200 Clarendon Street, Floor 50, Boston, MA 02116

Phone Number: 617-236-0200 Fax number: N/A

Contact person name: Adam Weiner Title: Manager

Cell number: 617-236-0200 Email address: aweiner@weinerventures.com

Permit Request (check one): ☒ New Application ☐ Permit Extension ☐ Other (Specify): _____

Owner's Information (if different from above):

Owner of property being dewatered: _____

Owner's mailing address: _____ Phone number: _____

Location of Discharge & Proposed Treatment System(s):

Street number and name: 1000 Boylston Street Neighborhood Fenway

Discharge is to a: ☐ Sanitary Sewer ☐ Combined Sewer ☒ Storm Drain ☐ Other (specify): _____

Describe Proposed Pre-Treatment System(s): Sedimentation tank, bag filters

BWSC Outfall No. MWR 018 Receiving Waters Charles River

Temporary Discharges (Provide Anticipated Dates of Discharge): From June 2019 To June 2021

<input type="checkbox"/> Groundwater Remediation	<input type="checkbox"/> Tank Removal/Installation	<input checked="" type="checkbox"/> Foundation Excavation
<input type="checkbox"/> Utility/Manhole Pumping	<input type="checkbox"/> Test Pipe	<input type="checkbox"/> Trench Excavation
<input checked="" type="checkbox"/> Accumulated Surface Water	<input type="checkbox"/> Hydrogeologic Testing	<input checked="" type="checkbox"/> Other <u>Precipitation</u>

Permanent Discharges

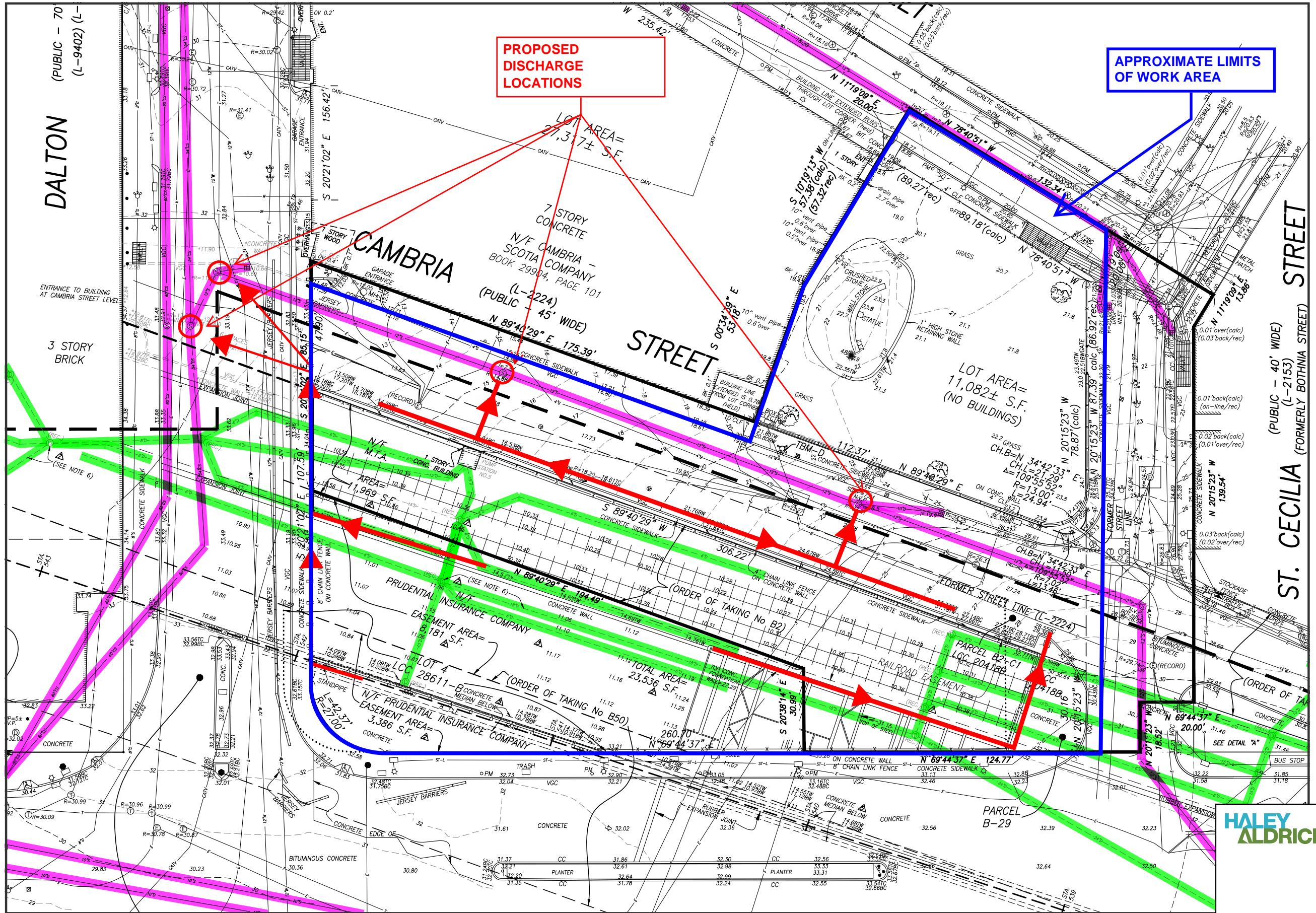
<input type="checkbox"/> Foundation Drainage	<input type="checkbox"/> Crawl Space/Footing Drain
<input type="checkbox"/> Accumulated Surface Water	<input type="checkbox"/> Non-contact/Uncontaminated Cooling
<input type="checkbox"/> Non-contact/Uncontaminated Process	<input type="checkbox"/> Other: _____

1. Attach a Site Plan showing the source of the discharge and the location of the point of discharge (i.e. the sewer pipe or catch basin). Include meter type, meter number, size, make and start reading. Note. All discharges to the Commission's sewer system will be assessed current sewer charges.
2. If discharging to a sanitary or combined sewer, attach a copy of MWRA's Sewer Use Discharge permit or application.
3. If discharging to a separate storm drain, attach a copy of EPA's NPDES Permit or NOI application, or NPDES Permit exclusion letter for the discharge, as well as other relevant information.
4. Dewatering Drainage Permit will be denied or revoked if applicant fails to obtain the necessary permits from MWRA or EPA.

Submit Completed Application to: Boston Water and Sewer Commission
Engineering Customer Services
980 Harrison Avenue, Boston, MA 02119
Attn: Matthew Tuttle, Engineering Customer Service
E-mail: tuttlemp@bwsc.org
Phone: 617-989-7204 Fax: 617-989-7716




Signature of Authorized Representative for Property Owner: _____

Date: 5/31/2019



NOTES:

1. BASE PLAN TAKEN FROM
BWSC ELKUS-MANFREDI
ARCHITECTS EXISTING
CONDITIONS DRAWING
C100, DATED 1 JANUARY
2018.

-  MASSDOT
-  BWSC
-  DEWATERING FLOW

HALEY ALDRICH
1000 BOYLSTON STREET
SCOTIA PARCEL
BOSTON, MASSACHUSETTS

**PROPOSED DEWATERING
DISCHARGE LOCATION PLAN**

NOT TO SCALE
MAY 2019

FIGURE 1

APPENDIX D

ENDANGERED SPECIES ACT ASSESSMENT



United States Department of the Interior

FISH AND WILDLIFE SERVICE
New England Ecological Services Field Office
70 Commercial Street, Suite 300
Concord, NH 03301-5094
Phone: (603) 223-2541 Fax: (603) 223-0104
<http://www.fws.gov/newengland>



In Reply Refer To:

August 24, 2018

Consultation Code: 05E1NE00-2018-SLI-2868

Event Code: 05E1NE00-2018-E-06721

Project Name: 1000 Boylston Street Development

Subject: List of threatened and endangered species that may occur in your proposed project location, and/or may be affected by your proposed project

To Whom It May Concern:

The enclosed species list identifies threatened, endangered, proposed and candidate species, as well as proposed and final designated critical habitat, that may occur within the boundary of your proposed project and/or may be affected by your proposed project. The species list fulfills the requirements of the U.S. Fish and Wildlife Service (Service) under section 7(c) of the Endangered Species Act (Act) of 1973, as amended (16 U.S.C. 1531 *et seq.*).

New information based on updated surveys, changes in the abundance and distribution of species, changed habitat conditions, or other factors could change this list. Please feel free to contact us if you need more current information or assistance regarding the potential impacts to federally proposed, listed, and candidate species and federally designated and proposed critical habitat. Please note that under 50 CFR 402.12(e) of the regulations implementing section 7 of the Act, the accuracy of this species list should be verified after 90 days. This verification can be completed formally or informally as desired. The Service recommends that verification be completed by visiting the ECOS-IPaC website at regular intervals during project planning and implementation for updates to species lists and information. An updated list may be requested through the ECOS-IPaC system by completing the same process used to receive the enclosed list.

The purpose of the Act is to provide a means whereby threatened and endangered species and the ecosystems upon which they depend may be conserved. Under sections 7(a)(1) and 7(a)(2) of the Act and its implementing regulations (50 CFR 402 *et seq.*), Federal agencies are required to utilize their authorities to carry out programs for the conservation of threatened and endangered species and to determine whether projects may affect threatened and endangered species and/or designated critical habitat.

A Biological Assessment is required for construction projects (or other undertakings having similar physical impacts) that are major Federal actions significantly affecting the quality of the human environment as defined in the National Environmental Policy Act (42 U.S.C. 4332(2)(c)). For projects other than major construction activities, the Service suggests that a biological evaluation similar to a Biological Assessment be prepared to determine whether the project may affect listed or proposed species and/or designated or proposed critical habitat. Recommended contents of a Biological Assessment are described at 50 CFR 402.12.

If a Federal agency determines, based on the Biological Assessment or biological evaluation, that listed species and/or designated critical habitat may be affected by the proposed project, the agency is required to consult with the Service pursuant to 50 CFR 402. In addition, the Service recommends that candidate species, proposed species and proposed critical habitat be addressed within the consultation. More information on the regulations and procedures for section 7 consultation, including the role of permit or license applicants, can be found in the "Endangered Species Consultation Handbook" at:

<http://www.fws.gov/endangered/esa-library/pdf/TOC-GLOS.PDF>

Please be aware that bald and golden eagles are protected under the Bald and Golden Eagle Protection Act (16 U.S.C. 668 *et seq.*), and projects affecting these species may require development of an eagle conservation plan (http://www.fws.gov/windenergy/eagle_guidance.html). Additionally, wind energy projects should follow the wind energy guidelines (<http://www.fws.gov/windenergy/>) for minimizing impacts to migratory birds and bats.

Guidance for minimizing impacts to migratory birds for projects including communications towers (e.g., cellular, digital television, radio, and emergency broadcast) can be found at: <http://www.fws.gov/migratorybirds/CurrentBirdIssues/Hazards/towers/towers.htm>; <http://www.towerkill.com>; and <http://www.fws.gov/migratorybirds/CurrentBirdIssues/Hazards/towers/comtow.html>.

We appreciate your concern for threatened and endangered species. The Service encourages Federal agencies to include conservation of threatened and endangered species into their project planning to further the purposes of the Act. Please include the Consultation Tracking Number in the header of this letter with any request for consultation or correspondence about your project that you submit to our office.

Attachment(s):

- Official Species List
-

Official Species List

This list is provided pursuant to Section 7 of the Endangered Species Act, and fulfills the requirement for Federal agencies to "request of the Secretary of the Interior information whether any species which is listed or proposed to be listed may be present in the area of a proposed action".

This species list is provided by:

New England Ecological Services Field Office

70 Commercial Street, Suite 300

Concord, NH 03301-5094

(603) 223-2541

Project Summary

Consultation Code: 05E1NE00-2018-SLI-2868

Event Code: 05E1NE00-2018-E-06721

Project Name: 1000 Boylston Street Development

Project Type: DEVELOPMENT

Project Description: The 1000 Boylston Street project includes the construction of a mixed-use development of air rights above the Boston Extension of the Massachusetts Turnpike (I-90), the Massachusetts Bay Transportation Authority (MBTA) CSX rail alignment, a portion of Cambria Street, and a landscaped lot referred to as the Scotia Parcel. The development will include a 35-story tower, a 5- to 6-story podium base, and a 2-story parking garage. The development will be used for residences, amenities, and retail and restaurant space.

Project Location:

Approximate location of the project can be viewed in Google Maps: <https://www.google.com/maps/place/42.347377130815374N71.0860508003176W>



Counties: Suffolk, MA

Endangered Species Act Species

There is a total of 0 threatened, endangered, or candidate species on this species list.

Species on this list should be considered in an effects analysis for your project and could include species that exist in another geographic area. For example, certain fish may appear on the species list because a project could affect downstream species.

IPaC does not display listed species or critical habitats under the sole jurisdiction of NOAA Fisheries¹, as USFWS does not have the authority to speak on behalf of NOAA and the Department of Commerce.

See the "Critical habitats" section below for those critical habitats that lie wholly or partially within your project area under this office's jurisdiction. Please contact the designated FWS office if you have questions.

-
1. [NOAA Fisheries](#), also known as the National Marine Fisheries Service (NMFS), is an office of the National Oceanic and Atmospheric Administration within the Department of Commerce.

Critical habitats

THERE ARE NO CRITICAL HABITATS WITHIN YOUR PROJECT AREA UNDER THIS OFFICE'S JURISDICTION.

IPaC resource list

This report is an automatically generated list of species and other resources such as critical habitat (collectively referred to as *trust resources*) under the U.S. Fish and Wildlife Service's (USFWS) jurisdiction that are known or expected to be on or near the project area referenced below. The list may also include trust resources that occur outside of the project area, but that could potentially be directly or indirectly affected by activities in the project area. However, determining the likelihood and extent of effects a project may have on trust resources typically requires gathering additional site-specific (e.g., vegetation/species surveys) and project-specific (e.g., magnitude and timing of proposed activities) information.

Below is a summary of the project information you provided and contact information for the USFWS office(s) with jurisdiction in the defined project area. Please read the introduction to each section that follows (Endangered Species, Migratory Birds, USFWS Facilities, and NWI Wetlands) for additional information applicable to the trust resources addressed in that section.

Location

Suffolk County, Massachusetts



Local office

New England Ecological Services Field Office

☎ (603) 223-2541

📠 (603) 223-0104

70 Commercial Street, Suite 300
Concord, NH 03301-5094

<http://www.fws.gov/newengland>

Endangered species

This resource list is for informational purposes only and does not constitute an analysis of project level impacts.

The primary information used to generate this list is the known or expected range of each species. Additional areas of influence (AOI) for species are also considered. An AOI includes areas outside of the species range if the species could be indirectly affected by activities in that area (e.g., placing a dam upstream of a fish population, even if that fish does not occur at the dam site, may indirectly impact the species by reducing or eliminating water flow downstream). Because species can move, and site conditions can change, the species on this list are not guaranteed to be found on or near the project area. To fully determine any potential effects to species, additional site-specific and project-specific information is often required.

Section 7 of the Endangered Species Act **requires** Federal agencies to "request of the Secretary information whether any species which is listed or proposed to be listed may be present in the area of such proposed action" for any project that is conducted, permitted, funded, or licensed by any Federal agency. A letter from the local office and a species list which fulfills this requirement can **only** be obtained by requesting an official species list from either the Regulatory Review section in IPaC (see directions below) or from the local field office directly.

For project evaluations that require USFWS concurrence/review, please return to the IPaC website and request an official species list by doing the following:

1. Draw the project location and click CONTINUE.
2. Click DEFINE PROJECT.
3. Log in (if directed to do so).
4. Provide a name and description for your project.
5. Click REQUEST SPECIES LIST.

Listed species¹ and their critical habitats are managed by the [Ecological Services Program](#) of the U.S. Fish and Wildlife Service (USFWS) and the fisheries division of the National Oceanic and Atmospheric Administration (NOAA Fisheries²).

Species and critical habitats under the sole responsibility of NOAA Fisheries are **not** shown on this list. Please contact [NOAA Fisheries](#) for [species under their jurisdiction](#).

-
1. Species listed under the [Endangered Species Act](#) are threatened or endangered; IPaC also shows species that are candidates, or proposed, for listing. See the [listing status page](#) for more information.
 2. [NOAA Fisheries](#), also known as the National Marine Fisheries Service (NMFS), is an office of the National Oceanic and Atmospheric Administration within the Department of Commerce.

THERE ARE NO ENDANGERED SPECIES EXPECTED TO OCCUR AT THIS LOCATION.

Migratory birds

Certain birds are protected under the Migratory Bird Treaty Act¹ and the Bald and Golden Eagle Protection Act².

Any person or organization who plans or conducts activities that may result in impacts to migratory birds, eagles, and their habitats should follow appropriate regulations and consider implementing appropriate conservation measures, as described [below](#).

1. The [Migratory Birds Treaty Act](#) of 1918.
2. The [Bald and Golden Eagle Protection Act](#) of 1940.

Additional information can be found using the following links:

- Birds of Conservation Concern <http://www.fws.gov/birds/management/managed-species/birds-of-conservation-concern.php>
- Measures for avoiding and minimizing impacts to birds <http://www.fws.gov/birds/management/project-assessment-tools-and-guidance/conservation-measures.php>
- Nationwide conservation measures for birds <http://www.fws.gov/migratorybirds/pdf/management/nationwidestandardconservationmeasures.pdf>

The birds listed below are birds of particular concern either because they occur on the [USFWS Birds of Conservation Concern](#) (BCC) list or warrant special attention in your project location. To learn more about the levels of concern for birds on your list and how this list is generated, see the FAQ [below](#). This is not a list of every bird you may find in this location, nor a guarantee that every bird on this list will be found in your project area. To see exact locations of where birders and the general public have sighted birds in and around your project area, visit the [E-bird data mapping tool](#) (Tip: enter your location, desired date range and a species on your list). For projects that occur off the Atlantic Coast, additional maps and models detailing the relative occurrence and abundance of bird species on your list are available. Links to additional information about Atlantic Coast birds, and other important information about your migratory bird list, including how to properly interpret and use your migratory bird report, can be found [below](#).

For guidance on when to schedule activities or implement avoidance and minimization measures to reduce impacts to migratory birds on your list, click on the PROBABILITY OF PRESENCE SUMMARY at the top of your list to see when these birds are most likely to be present and breeding in your project area.

NAME

BREEDING SEASON (IF A
BREEDING SEASON IS INDICATED
FOR A BIRD ON YOUR LIST, THE
BIRD MAY BREED IN YOUR
PROJECT AREA SOMETIME WITHIN
THE TIMEFRAME SPECIFIED,
WHICH IS A VERY LIBERAL
ESTIMATE OF THE DATES INSIDE
WHICH THE BIRD BREEDS
ACROSS ITS ENTIRE RANGE.

"BREEDS ELSEWHERE" INDICATES
THAT THE BIRD DOES NOT LIKELY
BREED IN YOUR PROJECT AREA.)

Bald Eagle *Haliaeetus leucocephalus*

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

<https://ecos.fws.gov/ecp/species/1626>

Breeds Oct 15 to Aug 31

Black-billed Cuckoo *Coccyzus erythrophthalmus*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9399>

Breeds May 15 to Oct 10

Bobolink *Dolichonyx oryzivorus*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds May 20 to Jul 31

Canada Warbler *Cardellina canadensis*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds May 20 to Aug 10

Cerulean Warbler *Dendroica cerulea*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/2974>

Breeds Apr 29 to Jul 20

Dunlin *Calidris alpina arctica*

This is a Bird of Conservation Concern (BCC) only in particular Bird Conservation Regions (BCRs) in the continental USA

Breeds elsewhere

Evening Grosbeak *Coccothraustes vespertinus*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds elsewhere

Kentucky Warbler *Oporornis formosus*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds Apr 20 to Aug 20

Lesser Yellowlegs *Tringa flavipes*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9679>

Breeds elsewhere

Nelson's Sparrow *Ammodramus nelsoni*

Breeds May 15 to Sep 5

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Prairie Warbler *Dendroica discolor*

Breeds May 1 to Jul 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Prothonotary Warbler *Protonotaria citrea*

Breeds Apr 1 to Jul 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Red-headed Woodpecker *Melanerpes erythrocephalus*

Breeds May 10 to Sep 10

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Red-throated Loon *Gavia stellata*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Rusty Blackbird *Euphagus carolinus*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Saltmarsh Sparrow *Ammodramus caudacutus*

Breeds May 15 to Sep 5

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Semipalmated Sandpiper *Calidris pusilla*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Snowy Owl *Bubo scandiacus*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Wood Thrush *Hylocichla mustelina*

Breeds May 10 to Aug 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Probability of Presence Summary

The graphs below provide our best understanding of when birds of concern are most likely to be present in your project area. This information can be used to tailor and schedule your project activities to avoid or minimize impacts to birds. Please make sure you read and understand the FAQ

"Proper Interpretation and Use of Your Migratory Bird Report" before using or attempting to interpret this report.

Probability of Presence (■)

Each green bar represents the bird's relative probability of presence in the 10km grid cell(s) your project overlaps during a particular week of the year. (A year is represented as 12 4-week months.) A taller bar indicates a higher probability of species presence. The survey effort (see below) can be used to establish a level of confidence in the presence score. One can have higher confidence in the presence score if the corresponding survey effort is also high.

How is the probability of presence score calculated? The calculation is done in three steps:

1. The probability of presence for each week is calculated as the number of survey events in the week where the species was detected divided by the total number of survey events for that week. For example, if in week 12 there were 20 survey events and the Spotted Towhee was found in 5 of them, the probability of presence of the Spotted Towhee in week 12 is 0.25.
2. To properly present the pattern of presence across the year, the relative probability of presence is calculated. This is the probability of presence divided by the maximum probability of presence across all weeks. For example, imagine the probability of presence in week 20 for the Spotted Towhee is 0.05, and that the probability of presence at week 12 (0.25) is the maximum of any week of the year. The relative probability of presence on week 12 is $0.25/0.25 = 1$; at week 20 it is $0.05/0.25 = 0.2$.
3. The relative probability of presence calculated in the previous step undergoes a statistical conversion so that all possible values fall between 0 and 10, inclusive. This is the probability of presence score.

To see a bar's probability of presence score, simply hover your mouse cursor over the bar.

Breeding Season (■)

Yellow bars denote a very liberal estimate of the time-frame inside which the bird breeds across its entire range. If there are no yellow bars shown for a bird, it does not breed in your project area.

Survey Effort (|)

Vertical black lines superimposed on probability of presence bars indicate the number of surveys performed for that species in the 10km grid cell(s) your project area overlaps. The number of surveys is expressed as a range, for example, 33 to 64 surveys.

To see a bar's survey effort range, simply hover your mouse cursor over the bar.

No Data (—)

A week is marked as having no data if there were no survey events for that week.

Survey Timeframe

Surveys from only the last 10 years are used in order to ensure delivery of currently relevant information. The exception to this is areas off the Atlantic coast, where bird returns are based on all years of available data, since data in these areas is currently much more sparse.

■ probability of presence ■ breeding season | survey effort — no data

SPECIES

JAN

FEB

MAR

APR

MAY

JUN

JUL

AUG

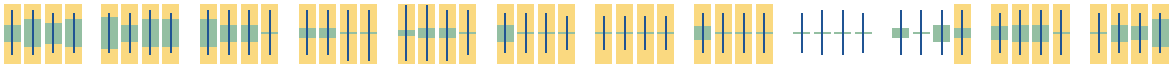
SEP

OCT

NOV

DEC

Bald Eagle
Non-BCC Vulnerable
(This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.)



Black-billed Cuckoo
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)



Bobolink
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)



Canada Warbler
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)



Cerulean Warbler
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)

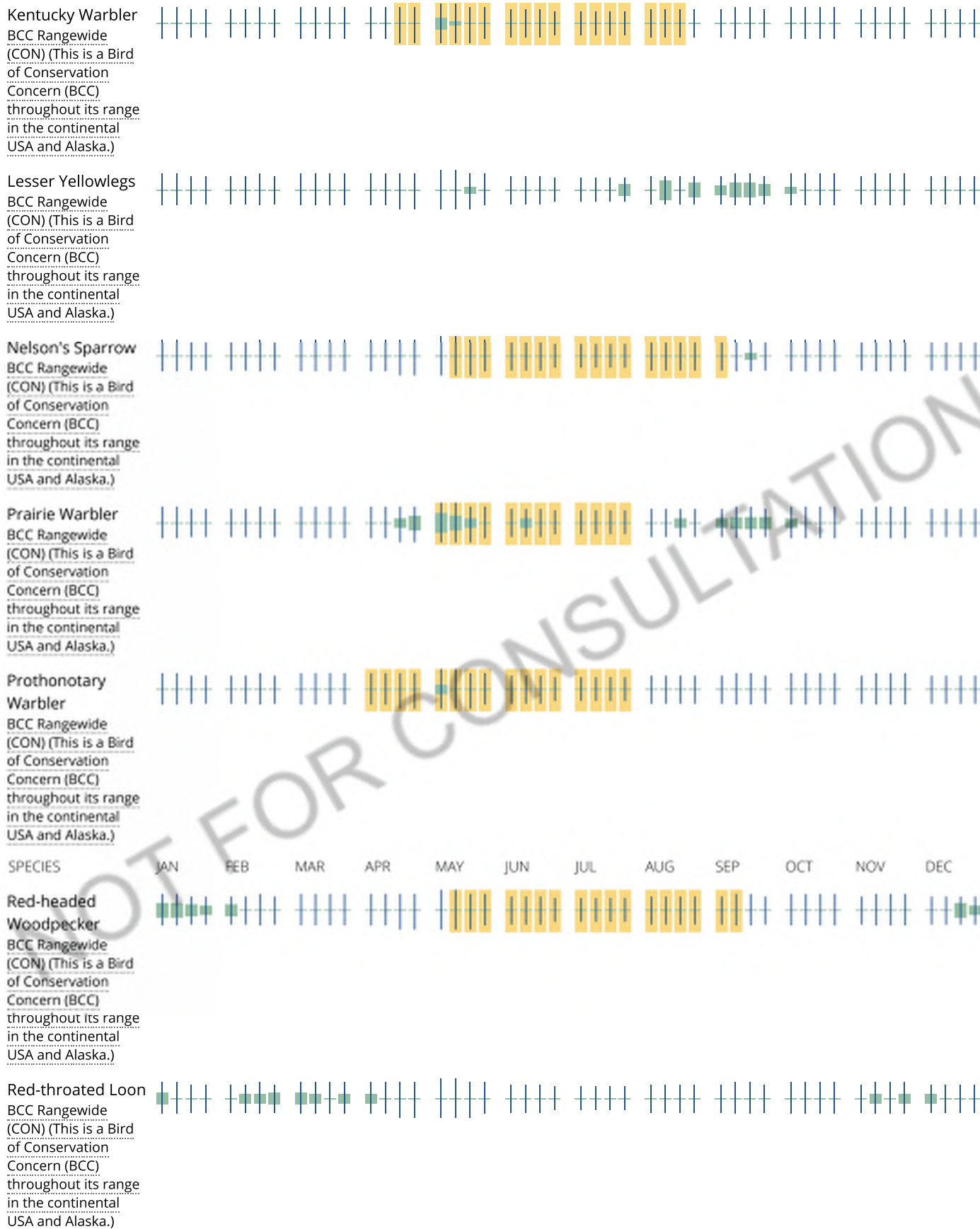


Dunlin
BCC - BCR (This is a Bird of Conservation Concern (BCC) only in particular Bird Conservation Regions (BCRs) in the continental USA)



Evening Grosbeak
BCC Rangewide (CON) (This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.)

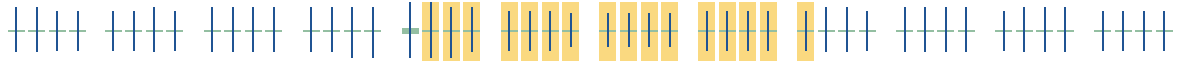




Rusty Blackbird
BCC Rangewide
(CON) (This is a Bird
of Conservation
Concern (BCC)
throughout its range
in the continental
USA and Alaska.)



Saltmarsh Sparrow
BCC Rangewide
(CON) (This is a Bird
of Conservation
Concern (BCC)
throughout its range
in the continental
USA and Alaska.)



Semipalmated
Sandpiper
BCC Rangewide
(CON) (This is a Bird
of Conservation
Concern (BCC)
throughout its range
in the continental
USA and Alaska.)



Snowy Owl
BCC Rangewide
(CON) (This is a Bird
of Conservation
Concern (BCC)
throughout its range
in the continental
USA and Alaska.)



Wood Thrush
BCC Rangewide
(CON) (This is a Bird
of Conservation
Concern (BCC)
throughout its range
in the continental
USA and Alaska.)



Tell me more about conservation measures I can implement to avoid or minimize impacts to migratory birds.

[Nationwide Conservation Measures](#) describes measures that can help avoid and minimize impacts to all birds at any location year round. Implementation of these measures is particularly important when birds are most likely to occur in the project area. When birds may be breeding in the area, identifying the locations of any active nests and avoiding their destruction is a very helpful impact minimization measure. To see when birds are most likely to occur and be breeding in your project area, view the Probability of Presence Summary. [Additional measures](#) and/or [permits](#) may be advisable depending on the type of activity you are conducting and the type of infrastructure or bird species present on your project site.

What does IPaC use to generate the migratory birds potentially occurring in my specified location?

The Migratory Bird Resource List is comprised of USFWS [Birds of Conservation Concern \(BCC\)](#) and other species that may warrant special attention in your project location.

The migratory bird list generated for your project is derived from data provided by the [Avian Knowledge Network \(AKN\)](#). The AKN data is based on a growing collection of [survey, banding, and citizen science datasets](#) and is queried and filtered to return a list of those birds reported as occurring in the 10km grid cell(s) which your project

intersects, and that have been identified as warranting special attention because they are a BCC species in that area, an eagle ([Eagle Act](#) requirements may apply), or a species that has a particular vulnerability to offshore activities or development.

Again, the Migratory Bird Resource list includes only a subset of birds that may occur in your project area. It is not representative of all birds that may occur in your project area. To get a list of all birds potentially present in your project area, please visit the [E-bird Explore Data Tool](#).

What does IPaC use to generate the probability of presence graphs for the migratory birds potentially occurring in my specified location?

The probability of presence graphs associated with your migratory bird list are based on data provided by the [Avian Knowledge Network \(AKN\)](#). This data is derived from a growing collection of [survey, banding, and citizen science datasets](#).

Probability of presence data is continuously being updated as new and better information becomes available. To learn more about how the probability of presence graphs are produced and how to interpret them, go the Probability of Presence Summary and then click on the "Tell me about these graphs" link.

How do I know if a bird is breeding, wintering, migrating or present year-round in my project area?

To see what part of a particular bird's range your project area falls within (i.e. breeding, wintering, migrating or year-round), you may refer to the following resources: [The Cornell Lab of Ornithology All About Birds Bird Guide](#), or (if you are unsuccessful in locating the bird of interest there), the [Cornell Lab of Ornithology Neotropical Birds guide](#). If a bird on your migratory bird species list has a breeding season associated with it, if that bird does occur in your project area, there may be nests present at some point within the timeframe specified. If "Breeds elsewhere" is indicated, then the bird likely does not breed in your project area.

What are the levels of concern for migratory birds?

Migratory birds delivered through IPaC fall into the following distinct categories of concern:

1. "BCC Rangewide" birds are [Birds of Conservation Concern](#) (BCC) that are of concern throughout their range anywhere within the USA (including Hawaii, the Pacific Islands, Puerto Rico, and the Virgin Islands);
2. "BCC - BCR" birds are BCCs that are of concern only in particular Bird Conservation Regions (BCRs) in the continental USA; and
3. "Non-BCC - Vulnerable" birds are not BCC species in your project area, but appear on your list either because of the [Eagle Act](#) requirements (for eagles) or (for non-eagles) potential susceptibilities in offshore areas from certain types of development or activities (e.g. offshore energy development or longline fishing).

Although it is important to try to avoid and minimize impacts to all birds, efforts should be made, in particular, to avoid and minimize impacts to the birds on this list, especially eagles and BCC species of rangewide concern. For more information on conservation measures you can implement to help avoid and minimize migratory bird impacts and requirements for eagles, please see the FAQs for these topics.

Details about birds that are potentially affected by offshore projects

For additional details about the relative occurrence and abundance of both individual bird species and groups of bird species within your project area off the Atlantic Coast, please visit the [Northeast Ocean Data Portal](#). The Portal also offers data and information about other taxa besides birds that may be helpful to you in your project review. Alternately, you may download the bird model results files underlying the portal maps through the [NOAA NCCOS Integrative Statistical Modeling and Predictive Mapping of Marine Bird Distributions and Abundance on the Atlantic Outer Continental Shelf](#) project webpage.

Bird tracking data can also provide additional details about occurrence and habitat use throughout the year, including migration. Models relying on survey data may not include this information. For additional information on marine bird tracking data, see the [Diving Bird Study](#) and the [nanotag studies](#) or contact [Caleb Spiegel](#) or [Pam Loring](#).

What if I have eagles on my list?

If your project has the potential to disturb or kill eagles, you may need to [obtain a permit](#) to avoid violating the Eagle Act should such impacts occur.

Proper Interpretation and Use of Your Migratory Bird Report

The migratory bird list generated is not a list of all birds in your project area, only a subset of birds of priority concern. To learn more about how your list is generated, and see options for identifying what other birds may be in your project area, please see the FAQ "What does IPaC use to generate the migratory birds potentially occurring in my specified location". Please be aware this report provides the "probability of presence" of birds within the 10 km grid cell(s) that overlap your project; not your exact project footprint. On the graphs provided, please also look carefully at the survey effort (indicated by the black vertical bar) and for the existence of the "no data" indicator (a red horizontal bar). A high survey effort is the key component. If the survey effort is high, then the probability of presence score can be viewed as more dependable. In contrast, a low survey effort bar or no data bar means a lack of data and, therefore, a lack of certainty about presence of the species. This list is not perfect; it is simply a starting point for identifying what birds of concern have the potential to be in your project area, when they might be there, and if they might be breeding (which means nests might be present). The list helps you know what to look for to confirm presence, and helps guide you in knowing when to implement conservation measures to avoid or minimize potential impacts from your project activities, should presence be confirmed. To learn more about conservation measures, visit the FAQ "Tell me about conservation measures I can implement to avoid or minimize impacts to migratory birds" at the bottom of your migratory bird trust resources page.

Facilities

National Wildlife Refuge lands

Any activity proposed on lands managed by the [National Wildlife Refuge](#) system must undergo a 'Compatibility Determination' conducted by the Refuge. Please contact the individual Refuges to discuss any questions or concerns.

THERE ARE NO REFUGE LANDS AT THIS LOCATION.

Fish hatcheries

THERE ARE NO FISH HATCHERIES AT THIS LOCATION.

Wetlands in the National Wetlands Inventory

Impacts to [NWI wetlands](#) and other aquatic habitats may be subject to regulation under Section 404 of the Clean Water Act, or other State/Federal statutes.

For more information please contact the Regulatory Program of the local [U.S. Army Corps of Engineers District](#).

THERE ARE NO KNOWN WETLANDS AT THIS LOCATION.

Data limitations

The Service's objective of mapping wetlands and deepwater habitats is to produce reconnaissance level information on the location, type and size of these resources. The maps are prepared from the analysis of high altitude imagery. Wetlands are identified based on vegetation, visible hydrology and geography. A margin of error is inherent in the use of imagery; thus, detailed on-the-ground inspection of any particular site may result in revision of the wetland boundaries or classification established through image analysis.

The accuracy of image interpretation depends on the quality of the imagery, the experience of the image analysts, the amount and quality of the collateral data and the amount of ground truth verification work conducted. Metadata should be consulted to determine the date of the source imagery used and any mapping problems.

Wetlands or other mapped features may have changed since the date of the imagery or field work. There may be occasional differences in polygon boundaries or classifications between the information depicted on the map and the actual conditions on site.

Data exclusions

Certain wetland habitats are excluded from the National mapping program because of the limitations of aerial imagery as the primary data source used to detect wetlands. These habitats include seagrasses or submerged aquatic vegetation that are found in the intertidal and subtidal zones of estuaries and nearshore coastal waters. Some deepwater reef communities (coral or tubercled worm reefs) have also been excluded from the inventory. These habitats, because of their depth, go undetected by aerial imagery.

Data precautions

Federal, state, and local regulatory agencies with jurisdiction over wetlands may define and describe wetlands in a different manner than that used in this inventory. There is no attempt, in either the design or products of this inventory, to define the limits of proprietary jurisdiction of any Federal, state, or local government or to establish the geographical scope of the regulatory programs of government agencies. Persons intending to engage in activities involving modifications within or adjacent to wetland areas should seek the advice of appropriate federal, state, or local agencies concerning specified agency regulatory programs and proprietary jurisdictions that may affect such activities.

APPENDIX E

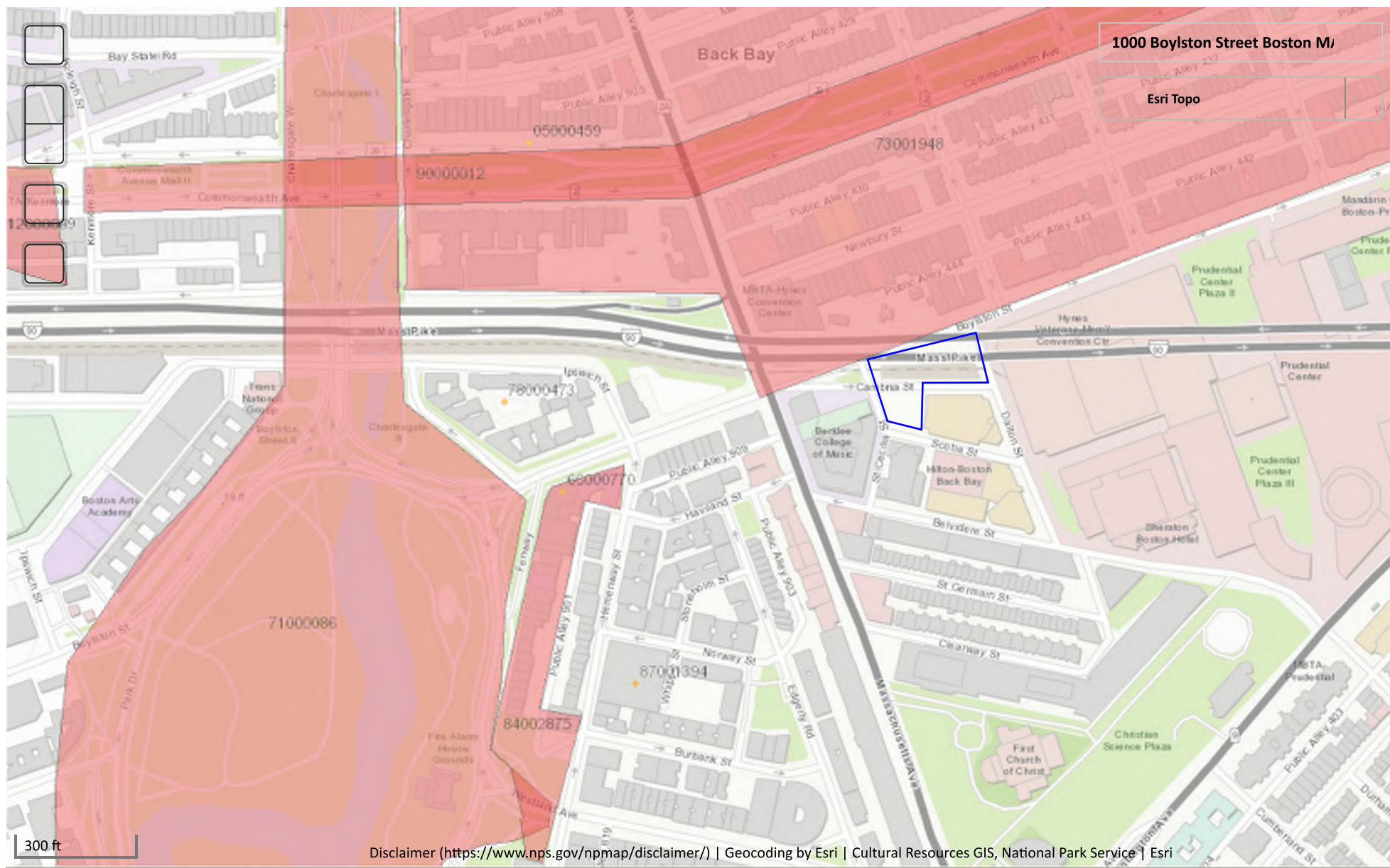
NATIONAL HISTORICAL PRESERVATION ACT REVIEW

National Register of Historic Places

National Park Service
U.S. Department of the Interior

Public, non-restricted data depicting National Register spatial data processed by the Cultural Resources GIS facility. ...

— Approximate limits of Work Area



Massachusetts Cultural Resource Information System

MACRIS

MACRIS Search Results

Search Criteria: Town(s): Boston; Place: Back Bay; Resource Type(s): Area, Building, Burial Ground, Object, Structure;

Inv. No.	Property Name	Street	Town	Year
BOS.BT	Back Bay Historic District		Boston	
BOS.BW	Back Bay Architectural District		Boston	
BOS.BX	Commonwealth Avenue Mall		Boston	
BOS.CA	Charles River Basin Historic District		Boston	
BOS.ZF	Park Square - Stuart Street Historic District		Boston	
BOS.ZI	Charles River Esplanade		Boston	
BOS.ACD	Emmanuel Church		Boston	
BOS.3899	Simmons, J. L. - Weld, William House	1 Arlington St	Boston	1861
BOS.3900	Simmons, J. L. - Faulkner, John House	2 Arlington St	Boston	1861
BOS.3901	Simmons, J. L. - Dana, S. T. House	3 Arlington St	Boston	1861
BOS.3902	Atkins, Henry House	4 Arlington St	Boston	1861
BOS.3903	Simmons, Seth House	5 Arlington St	Boston	1861
BOS.3904	Abbott, Josiah House	6 Arlington St	Boston	1861
BOS.3905	Lawrence, William House - Junior League Club	7 Arlington St	Boston	1861
BOS.3906	Corey, Barney House	8 Arlington St	Boston	1870
BOS.3907	Brewster, Oliver House	9 Arlington St	Boston	1861
BOS.3908	Cazenove, Sarah House	10 Arlington St	Boston	1861
BOS.3909	Homans, John House	11 Arlington St	Boston	1861
BOS.3910	Bates, John House	12 Arlington St	Boston	1860
BOS.3911	Moreland, William House	13 Arlington St	Boston	1860
BOS.3912	Williams, H. H. House	14 Arlington St	Boston	1860
BOS.3913	Ritz Carlton Hotel	15 Arlington St	Boston	1931
BOS.3914	Preston, William Gibbons House	16 Arlington St	Boston	1869
BOS.3915	Conant, A. F. House	17 Arlington St	Boston	1864
BOS.3916	Clark, E. H. House	18 Arlington St	Boston	1861
BOS.3917	Bates, Benjamin House	19 Arlington St	Boston	1864
BOS.2359	Statler Hotel and Office Building	54-78 Arlington St	Boston	1925

Friday, August 24, 2018

Page 1 of 42

Inv. No.	Property Name	Street	Town	Year
BOS.2360	Paine Furniture Building	75-81 Arlington St	Boston	1913
BOS.2371	Armory of the First Corps of Cadets	97-105 Arlington St	Boston	r 1895
BOS.2361	Boston Consolidated Gas Company Building	100 Arlington St	Boston	1927
BOS.4140		100 Beacon St	Boston	1924
BOS.2696	Devins, Arthur House	101 Beacon St	Boston	1862
BOS.4141		102 Beacon St	Boston	1938
BOS.2697	Tilton, Sam House	103 Beacon St	Boston	1862
BOS.4142	Beal, James House	104 Beacon St	Boston	1856
BOS.2698	Adams, Louisa House	105 Beacon St	Boston	1862
BOS.4143	Ellis, Rufus House	106 Beacon St	Boston	1868
BOS.2699	Bradlee, Fred House	107 Beacon St	Boston	1862
BOS.4144	Coolidge, J. T. House	108 Beacon St	Boston	1856
BOS.2700	Upham, George House	109 Beacon St	Boston	1862
BOS.4145	Coolidge, Joseph House	110 Beacon St	Boston	1856
BOS.2701	Dale, Eben House	111 Beacon St	Boston	1863
BOS.4146	Hooper, Nathan House	112 Beacon St	Boston	1856
BOS.2702	Bradlee, John House	113 Beacon St	Boston	1863
BOS.4147	Hooper, Robert House	114 Beacon St	Boston	1856
BOS.2703	Bradlee, John House	115 Beacon St	Boston	1863
BOS.4148	Perkins, Tom House	116 Beacon St	Boston	1856
BOS.2704	Freeland, C. W. House	117 Beacon St	Boston	1864
BOS.4149	King, H. P. House	118 Beacon St	Boston	1907
BOS.2705	Blake, Charles House	119 Beacon St	Boston	1865
BOS.4150		120 Beacon St	Boston	1937
BOS.2706	McKinney, Andrew House	121 Beacon St	Boston	1865
BOS.4151	Upham, George House	122 Beacon St	Boston	1857
BOS.4152	Stoddard, Charles House	124 Beacon St	Boston	1860
BOS.2707	Kelsey, Albert House	125 Beacon St	Boston	1866
BOS.4153	Jeffries, John House	126 Beacon St	Boston	1860
BOS.2708	Wharton, W. C. House	127 Beacon St	Boston	1862
BOS.4154	Manning, Francis House	128 Beacon St	Boston	1860
BOS.2709	Dunbar, John House	129 Beacon St	Boston	1862
BOS.4155	Hunnewell, Hollis House	130 Beacon St	Boston	1861
BOS.2710	Perkins, S. House	131 Beacon St	Boston	1861
BOS.2719	Sears, David House	132 Beacon St	Boston	1861
BOS.2711	Perkins, S. - Sturgis, John House	133 Beacon St	Boston	1861
BOS.2720	Bramhall, William House	134 Beacon St	Boston	1860
BOS.2712	Russell, S. H. House	135 Beacon St	Boston	1860

Inv. No.	Property Name	Street	Town	Year
BOS.2721	Kirby, Charles House	136 Beacon St	Boston	1860
BOS.2713	Gibson, Charles, Jr. House	137 Beacon St	Boston	1860
BOS.2722	Kirby, Charles House	138 Beacon St	Boston	1860
BOS.2714	Upham, George House	139 Beacon St	Boston	1860
BOS.2723	Brewer, Gardner House	140 Beacon St	Boston	1860
BOS.2715	Hooper, E. and M. House	141 Beacon St	Boston	1860
BOS.2724		142 Beacon St	Boston	1936
BOS.2716	Gardner, J. L. House	143 Beacon St	Boston	1861
BOS.2725	Blanchard, John House	144 Beacon St	Boston	1860
BOS.2717	Gardner, J. L. House	145 Beacon St	Boston	1861
BOS.2726	Wells, Susan House	146 Beacon St	Boston	1863
BOS.2718	Gardner, J. L. - Coolidge, Randolph House	147 Beacon St	Boston	1861
BOS.2727	Warren, George House	148 Beacon St	Boston	1913
BOS.2742	Bourne and Leavitt House	149 Beacon St	Boston	1861
BOS.2728	Loring, B. T. House	150 Beacon St	Boston	1860
BOS.2743	Bourne and Leavitt - Lowell, George House	151 Beacon St	Boston	1861
BOS.2729	Draper, E. S. House	152 Beacon St	Boston	1904
BOS.2744	Bourne and Leavitt - Morse, John House	153 Beacon St	Boston	1861
BOS.2730	Chandler, Peleg House	154 Beacon St	Boston	1861
BOS.2745	Bourne and Leavitt House	155 Beacon St	Boston	1861
BOS.2731	Kirby, Charles House	156 Beacon St	Boston	1861
BOS.2746	Bourne and Leavitt - Goddard, Thomas House	157 Beacon St	Boston	1861
BOS.2732	Walker, Grant House	158 Beacon St	Boston	1917
BOS.2747	Bourne and Leavitt House	159 Beacon St	Boston	1861
BOS.2748	Rand, J. H. House	161 Beacon St	Boston	1863
BOS.2749	Whitwell, H. House	163 Beacon St	Boston	1871
BOS.2733	Homans, John House	164 Beacon St	Boston	1889
BOS.2750	Flager, Annie House	165 Beacon St	Boston	1869
BOS.2734	Shattuck, George House	166 Beacon St	Boston	1882
BOS.2751	Whitwell, H. House	167 Beacon St	Boston	1871
BOS.2735	Gardner, J. L. - Cushing, Robert House	168 Beacon St	Boston	1861
BOS.2752	Wallis, Paul House	169 Beacon St	Boston	1866
BOS.2736	Gay, E. H. House	170 Beacon St	Boston	1900
BOS.2753	Wallis, Paul - Moors, J. B. House	171 Beacon St	Boston	1866
BOS.2737		172 Beacon St	Boston	1926
BOS.2754	Wallis, Paul House	173 Beacon St	Boston	1866
BOS.2738		174 Beacon St	Boston	1927
BOS.2755	Mudge, Andrew House	175 Beacon St	Boston	1866

Inv. No.	Property Name	Street	Town	Year
BOS.2739	Mackay, R. C. House	176 Beacon St	Boston	1863
BOS.2756	Weston, Henry House	177 Beacon St	Boston	1871
BOS.2740	Reed, B. T. House	178 Beacon St	Boston	1862
BOS.2757	Hall, Alfred House	179 Beacon St	Boston	1867
BOS.2741		180 Beacon St	Boston	1964
BOS.2758	Whitwell, H. House	181 Beacon St	Boston	1863
BOS.2768	Gardner, J. L. House	182 Beacon St	Boston	1866
BOS.2759	Silsbee, Nathan House	183 Beacon St	Boston	1863
BOS.2769	Gardner, J. L. - Coolidge, T. J. House	184 Beacon St	Boston	1866
BOS.2760	Anderson, John House	185 Beacon St	Boston	1872
BOS.2770	Appleton, William House	186 Beacon St	Boston	1869
BOS.2761	Tobey, James House	187 Beacon St	Boston	1866
BOS.2771	deHautville, Fred House	188 Beacon St	Boston	1864
BOS.2762	Farrington, John House	189 Beacon St	Boston	1866
BOS.2772	Cushing, Thomas House	190 Beacon St	Boston	1864
BOS.2763	Blake, James - Thayer, Frank House	191 Beacon St	Boston	1872
BOS.2773	Storrow, Charles House	192 Beacon St	Boston	1862
BOS.2764	Curtis, N. House	193 Beacon St	Boston	1872
BOS.2774	Meyer, George House	194 Beacon St	Boston	1862
BOS.2765	Blake, James House	195 Beacon St	Boston	1872
BOS.2775		196 Beacon St	Boston	1936
BOS.2766	Tobey, James House	197 Beacon St	Boston	1867
BOS.2776	Rollins, John House	198 Beacon St	Boston	1862
BOS.2767	Farrington, John House	199 Beacon St	Boston	1867
BOS.2777	Rollins, John House	200 Beacon St	Boston	1862
BOS.2778	Rollins, John House	202 Beacon St	Boston	1862
BOS.2779	Rollins, John House	204 Beacon St	Boston	1862
BOS.2795	Freeland, C. W. House	205 Beacon St	Boston	1874
BOS.2780	Rollins, John House	206 Beacon St	Boston	1862
BOS.2781	Rollins, John House	208 Beacon St	Boston	1862
BOS.2796	Freeland, C. W. House	209 Beacon St	Boston	1874
BOS.2782	Hubbard, Nathan House	210 Beacon St	Boston	1863
BOS.2797	Freeland, Charles House	211 Beacon St	Boston	1866
BOS.2783	Sturgis, John House	212 Beacon St	Boston	1863
BOS.2798	Freeland, Charles House	213 Beacon St	Boston	1866
BOS.2784	Barstow, John House	214 Beacon St	Boston	1863
BOS.2799	Freeland, Charles House	215 Beacon St	Boston	1866
BOS.2785	Dehon, William House	216 Beacon St	Boston	1863

Inv. No.	Property Name	Street	Town	Year
BOS.2800	Freeland, Charles House	217 Beacon St	Boston	1866
BOS.2786	Tucker, Alson House	218 Beacon St	Boston	1863
BOS.2801	Freeland, Charles - Mixter, Mary House	219 Beacon St	Boston	1866
BOS.2787	Tucker, William House	220 Beacon St	Boston	1863
BOS.2802	Wheatland, G. House	221 Beacon St	Boston	1870
BOS.2788	Kirby, Charles House	222 Beacon St	Boston	1865
BOS.2803	Wheatland, G. - Blake, J. R. House	223 Beacon St	Boston	1869
BOS.2789	Kirby, Charles House	224 Beacon St	Boston	1865
BOS.2804	Wheatland, G. House	225 Beacon St	Boston	1869
BOS.2790	Upham, George - Haskell, Adaline House	226 Beacon St	Boston	1864
BOS.2805	Wheatland, G. House	227 Beacon St	Boston	1869
BOS.2791	Upham, George House	228 Beacon St	Boston	1864
BOS.2806	Wheatland, G. House	229 Beacon St	Boston	1869
BOS.2792	Tucker, William House	230 Beacon St	Boston	1863
BOS.2807	Morland, William House	231 Beacon St	Boston	1869
BOS.2793	Reed, Alfred House	232 Beacon St	Boston	1863
BOS.2808	Morland, William House	233 Beacon St	Boston	1869
BOS.2794	Chase, George House	234 Beacon St	Boston	1863
BOS.2809	Silsbee, Nathan Hosue	235 Beacon St	Boston	1870
BOS.2820	Slater, John - Bartlett, Francis House	236 Beacon St	Boston	1869
BOS.2810	Silsbee, Nathan Hosue	237 Beacon St	Boston	1870
BOS.2821	Wolcott, Huntington House	238 Beacon St	Boston	1869
BOS.2811	Whitwell, Fred House	239 Beacon St	Boston	1869
BOS.2822	Bangs, Edward House	240 Beacon St	Boston	1871
BOS.2812	Whitwell, H. - Howe, Julia Ward House	241 Beacon St	Boston	1868
BOS.2823	Boardman, T. D. House	242 Beacon St	Boston	1880
BOS.2813	Whitwell, H. - Whitney, Ada House	243 Beacon St	Boston	1868
BOS.2824	Boardman, T. D. House	244 Beacon St	Boston	1882
BOS.2814	Whitwell, H. House	245 Beacon St	Boston	1868
BOS.2825	West, Mary House	246 Beacon St	Boston	1887
BOS.2815	Whitwell, H. - Bancroft, Hannah House	247 Beacon St	Boston	1868
BOS.2816	Whitwell, H. - Pickering, H. W. House	249 Beacon St	Boston	1869
BOS.2826		250 Beacon St	Boston	1925
BOS.2817	Whitwell, H. House	251 Beacon St	Boston	1869
BOS.2827		252 Beacon St	Boston	1925
BOS.2818	Goodrich, Charles House	253 Beacon St	Boston	1869
BOS.2828		254-256 Beacon St	Boston	1870
BOS.2819		255 Beacon St	Boston	1939

Inv. No.	Property Name	Street	Town	Year
BOS.2829	Williams, H. B. House	256 Beacon St	Boston	1871
BOS.2830	Williams, H. B. House	258 Beacon St	Boston	1871
BOS.2840		259 Beacon St	Boston	1888
BOS.2831	Williams, H. B. House	260 Beacon St	Boston	1871
BOS.2841		261 Beacon St	Boston	1888
BOS.2832		262 Beacon St	Boston	1938
BOS.2842	Wheatland, G. House	263 Beacon St	Boston	1871
BOS.2833		264 Beacon St	Boston	1927
BOS.2843	Wheatland, G. House	265 Beacon St	Boston	1871
BOS.2834	Skinner, Elizabeth House	266 Beacon St	Boston	1886
BOS.2844	Wheatland, G. House	267 Beacon St	Boston	1871
BOS.2845	Wheatland, G. House	269 Beacon St	Boston	1871
BOS.2835		270 Beacon St	Boston	1956
BOS.2846	Freeland, G. W. House	271 Beacon St	Boston	1876
BOS.2847	Freeland, G. W. House	273 Beacon St	Boston	1876
BOS.2836		274 Beacon St	Boston	1929
BOS.2837		274-276 Beacon St	Boston	c 1929
BOS.2848	Freeland, G. W. House	275 Beacon St	Boston	1876
BOS.2849	Freeland, G. W. House	277 Beacon St	Boston	1876
BOS.2838		278 Beacon St	Boston	1938
BOS.2850	Freeland, G. W. House	279 Beacon St	Boston	1881
BOS.2839		280 Beacon St	Boston	1946
BOS.2851	Freeland, G. W. House	281 Beacon St	Boston	1881
BOS.2859		282 Beacon St	Boston	c 1926
BOS.2852	Bush, S. D. House	283 Beacon St	Boston	1885
BOS.2860		284 Beacon St	Boston	1927
BOS.2853	Cox, Benjamin House	285 Beacon St	Boston	1885
BOS.2861		286-288 Beacon St	Boston	c 1869
BOS.2854	Vinal and Dodge House	287 Beacon St	Boston	1881
BOS.2862		288 Beacon St	Boston	1945
BOS.2855	Vinal and Dodge House	289 Beacon St	Boston	1881
BOS.2863	Snelling, Anne House	290 Beacon St	Boston	1869
BOS.2856	Lane, Daniel House	291 Beacon St	Boston	1881
BOS.2864	Stackpole, J. L. House	292 Beacon St	Boston	1870
BOS.2857	Gray, Ed House	293 Beacon St	Boston	1884
BOS.2865	Weld, Stephen House	294 Beacon St	Boston	1870
BOS.2858	Hotel Royal	295 Beacon St	Boston	1885
BOS.2866		296 Beacon St	Boston	1951

Inv. No.	Property Name	Street	Town	Year
BOS.2867	Brown and Leavitt - Dabney, Louis House	298 Beacon St	Boston	1871
BOS.2885	Wheatland, G. House	299 Beacon St	Boston	1870
BOS.2868	Whitwell, H. House	300 Beacon St	Boston	1869
BOS.2886	Niles, G. E. House	301 Beacon St	Boston	1883
BOS.2869	Whitwell, H. House	302 Beacon St	Boston	1933
BOS.2887	Pope, Fred House	303 Beacon St	Boston	1871
BOS.2870	Twombly, Carol House	304 Beacon St	Boston	1871
BOS.2888	Pope, Fred House	305 Beacon St	Boston	1871
BOS.2871	Kirby, Charles House	306 Beacon St	Boston	1871
BOS.2889	Pope, Fred House	307 Beacon St	Boston	1871
BOS.2872	Davis, Dan House	308 Beacon St	Boston	1871
BOS.2890	Pope, Fred - Rogers, R. M. House	309 Beacon St	Boston	1871
BOS.2873	Richmond, J. B. House	310 Beacon St	Boston	1903
BOS.2891	Pope, Fred - Prince, Helen House	311 Beacon St	Boston	1871
BOS.2874	Davis, Dan - Boardman, B. G. House	312 Beacon St	Boston	1871
BOS.2892	Pope, Fred House	313 Beacon St	Boston	1871
BOS.2875	Davis, Dan House	314 Beacon St	Boston	1871
BOS.2893	Pope, Fred House	315 Beacon St	Boston	1871
BOS.2876	Tyler, E. R. House	316 Beacon St	Boston	1885
BOS.2894	Pope, Fred House	317 Beacon St	Boston	1871
BOS.2877	Dana, George M. House	318 Beacon St	Boston	1881
BOS.2895	Pope, Fred House	319 Beacon St	Boston	1871
BOS.2878	Staigg, R. M. House	320 Beacon St	Boston	1878
BOS.2896	Pope, Fred House	321 Beacon St	Boston	1872
BOS.2879	Whitmore, Charles House	322 Beacon St	Boston	1877
BOS.2897	Pope, Fred House	323 Beacon St	Boston	1872
BOS.2880		324-330 Beacon St	Boston	1959
BOS.2898	Pope, Fred House	325 Beacon St	Boston	1872
BOS.2881	Ballantyne, S. House	326 Beacon St	Boston	1890
BOS.2899	Pope, Fred - Proctor, Thomas House	327 Beacon St	Boston	1872
BOS.2882		328 Beacon St	Boston	1935
BOS.2900	Pope, Fred House	329 Beacon St	Boston	1874
BOS.2883	Eaton, James House	330 Beacon St	Boston	1871
BOS.2901	Dabney, Roxana House	331 Beacon St	Boston	1880
BOS.2884		332 Beacon St	Boston	1959
BOS.2902	Ames, S. T. House	333 Beacon St	Boston	1881
BOS.2910	Pope, Fred House	334 Beacon St	Boston	1871
BOS.2903	Ames, S. T. House	335 Beacon St	Boston	1881

Inv. No.	Property Name	Street	Town	Year
BOS.2911	Smith, F. W. House	336 Beacon St	Boston	1876
BOS.2904	Ames, S. T. House	337 Beacon St	Boston	1881
BOS.2912	Morey, Edwin House	338 Beacon St	Boston	1877
BOS.2905	Ames, S. T. House	339 Beacon St	Boston	1881
BOS.2913	Stackpole, H. House	340 Beacon St	Boston	1880
BOS.2906	Ames, S. T. House	341 Beacon St	Boston	1881
BOS.2914	Washburn, M. House	342 Beacon St	Boston	1880
BOS.2907	Pope, Fred House	343 Beacon St	Boston	1873
BOS.2915	Knowlton, D. C. House	344 Beacon St	Boston	1880
BOS.2908	Pope, Fred House	345 Beacon St	Boston	1873
BOS.2916	Carr, Lucien House	346 Beacon St	Boston	1882
BOS.2909	Converse, James House	347 Beacon St	Boston	1884
BOS.2917	Converse, C. C. House	348 Beacon St	Boston	1886
BOS.2918	Pierce, Wallace House	350 Beacon St	Boston	1893
BOS.2930	Pope, Fred House	351 Beacon St	Boston	1870
BOS.2919	Derby, Hasket House	352 Beacon St	Boston	1885
BOS.2931	Pope, Fred House	353 Beacon St	Boston	1870
BOS.2920		354 Beacon St	Boston	1937
BOS.2932	Pope, Fred - Bancroft, Sarah House	355 Beacon St	Boston	1870
BOS.2921	Ames, S. T. House	356 Beacon St	Boston	1883
BOS.2933	Dalton, H. R. House	357 Beacon St	Boston	1885
BOS.2934	Stone, Albert House	359 Beacon St	Boston	1886
BOS.2935	Wainwright, H. C. House	361 Beacon St	Boston	1872
BOS.2936	Wainwright, H. C. House	363 Beacon St	Boston	1872
BOS.2937	Wainwright, H. C. House	365 Beacon St	Boston	1872
BOS.2938	Devens, A. L. House	367 Beacon St	Boston	1886
BOS.2939	Avery, Alden House	369 Beacon St	Boston	1886
BOS.2940	Briggs, Andrew House	371 Beacon St	Boston	1886
BOS.2941	Wells, C. B. House	375 Beacon St	Boston	1886
BOS.2942	Gibson and Pope House	377 Beacon St	Boston	1869
BOS.2943	Gibson and Pope House	379 Beacon St	Boston	1869
BOS.2944	Jordan - Pope - Bealls - Cotting House	381 Beacon St	Boston	1869
BOS.2945	Jordan - Pope - Bealls - Cotting House	383 Beacon St	Boston	1869
BOS.2946	Jordan - Pope - Bealls - Cotting House	385 Beacon St	Boston	1869
BOS.2922	Ames, S. T. House	386 Beacon St	Boston	1883
BOS.2947	Jordan - Pope - Bealls - Cotting House	387 Beacon St	Boston	1869
BOS.2923	Brown and Leavitt House	388 Beacon St	Boston	1872
BOS.2948	Jordan - Pope - Bealls - Cotting House	389 Beacon St	Boston	1869

Inv. No.	Property Name	Street	Town	Year
BOS.2924	Brown and Leavitt House	390 Beacon St	Boston	1872
BOS.2949	Jordan - Pope - Bealls - Cotting House	391 Beacon St	Boston	1869
BOS.2925	Brown and Leavitt House	392 Beacon St	Boston	1872
BOS.2950	Jordan - Pope - Bealls - Cotting House	393 Beacon St	Boston	1869
BOS.2926		394 Beacon St	Boston	1926
BOS.2951	Jordan - Pope - Bealls - Cotting House	395 Beacon St	Boston	1869
BOS.2927		396 Beacon St	Boston	1953
BOS.2928		398 Beacon St	Boston	1964
BOS.2929	Brown and Leavitt House	400 Beacon St	Boston	1872
BOS.2963		401 Beacon St	Boston	1921
BOS.2964	Gregerson, J. R. House	403 Beacon St	Boston	1867
BOS.2965	Pratt, R. M. - Hunt, W. M. House	405 Beacon St	Boston	1867
BOS.2952	Abbott, J. House	406 Beacon St	Boston	1887
BOS.2966	Fiske, Anne House	407 Beacon St	Boston	1867
BOS.2953	Hodges, R. M. House	408 Beacon St	Boston	1886
BOS.2967	Pratt, R. M. House	409 Beacon St	Boston	1867
BOS.2954	Burr, I. T. House	410 Beacon St	Boston	1886
BOS.2968	Dabney, Walter House	411 Beacon St	Boston	1867
BOS.2955	Head, Charles House	412 Beacon St	Boston	1887
BOS.2969	Wainwright, Henry House	413 Beacon St	Boston	1867
BOS.2956	Blake, M. C. House	414 Beacon St	Boston	1887
BOS.2970	Wainwright, Henry House	415 Beacon St	Boston	1867
BOS.2957	Fay, H. H. House	416 Beacon St	Boston	1890
BOS.2971	Wainwright, Henry House	417 Beacon St	Boston	1867
BOS.2958	Fay, H. H. House	418 Beacon St	Boston	1897
BOS.2972	Beal and Lilley House	419 Beacon St	Boston	1869
BOS.2959	Sears, Emily House	420 Beacon St	Boston	1892
BOS.2973	Beal and Lilley House	421 Beacon St	Boston	1869
BOS.2960	Leland, L. House	422 Beacon St	Boston	1899
BOS.2974	Beal and Lilley - Child, Helen House	423 Beacon St	Boston	1869
BOS.2961	Williams, Ralph House	424 Beacon St	Boston	1904
BOS.2975	Beal and Lilley House	425 Beacon St	Boston	1869
BOS.2962	Sears, Ruth House	426 Beacon St	Boston	1904
BOS.2976	Beal and Lilley House	427 Beacon St	Boston	1869
BOS.2977	Beal and Lilley House	429 Beacon St	Boston	1869
BOS.2978	Beal and Lilley House	431 Beacon St	Boston	1869
BOS.3001	Whitwell, H. S. House	435 Beacon St	Boston	1879
BOS.3002	Avery, Alden House	441 Beacon St	Boston	1887

Inv. No.	Property Name	Street	Town	Year
BOS.3003	Davis, Daniel House	443 Beacon St	Boston	1872
BOS.3004	Davis, Daniel House	445 Beacon St	Boston	1872
BOS.3005	Davis, Daniel House	447 Beacon St	Boston	1872
BOS.2979	Hooper, R. C. House	448 Beacon St	Boston	1889
BOS.3006	Davis, Daniel - Briggs, Oliver House	449 Beacon St	Boston	1876
BOS.2980	Fenno, E. H. House	450 Beacon St	Boston	1895
BOS.3007	Dow, C. A. House	451 Beacon St	Boston	1882
BOS.2981	Quincy, H. P. House	452 Beacon St	Boston	1887
BOS.3008	Ames, S. T. House	453 Beacon St	Boston	1885
BOS.2982	Rice, F. B. House	454 Beacon St	Boston	1890
BOS.3009	Caton, Asa House	455 Beacon St	Boston	1886
BOS.2983	Mathews, N. House	456 Beacon St	Boston	1886
BOS.3010	Caton, Asa House	457 Beacon St	Boston	1886
BOS.2984	White, T. R. House	458 Beacon St	Boston	1890
BOS.3011	Caton, Asa House	459 Beacon St	Boston	1887
BOS.2985	Davenport, G. House	460 Beacon St	Boston	1891
BOS.3012	Caton, Asa House	461 Beacon St	Boston	1887
BOS.2986	Appleton, W. S. House	462 Beacon St	Boston	1891
BOS.3013	Macomber, F. G. House	463 Beacon St	Boston	1887
BOS.2987	Curtis, Louis House	464 Beacon St	Boston	1891
BOS.3014	Weeks, A. G. House	465 Beacon St	Boston	1887
BOS.3015	Caton, Asa House	467 Beacon St	Boston	1888
BOS.2988	Case, J. House	468 Beacon St	Boston	1891
BOS.3016	Caton, Asa House	469 Beacon St	Boston	1888
BOS.2989	Case, J. House	470 Beacon St	Boston	1891
BOS.3017	Shapleigh, J. House	471 Beacon St	Boston	1889
BOS.2990	Hall, T. A. House	472 Beacon St	Boston	1892
BOS.3018	Shapleigh, J. House	473 Beacon St	Boston	1889
BOS.2991	Pierce, Nathaniel W. House	474 Beacon St	Boston	1891
BOS.3019	Caffin, H. M. House	475 Beacon St	Boston	1889
BOS.2992	Frothingham, E. House	476 Beacon St	Boston	1891
BOS.3020	Page, J. F. House	477 Beacon St	Boston	1889
BOS.2993	Ely, P. V. R. House	478 Beacon St	Boston	1892
BOS.3021	Baker, Seth House	479 Beacon St	Boston	1891
BOS.2994	Ellis, Lucy House	480 Beacon St	Boston	1892
BOS.3022	Baker, Seth House	481 Beacon St	Boston	1891
BOS.2995	Fay, E. H. House	482 Beacon St	Boston	1892
BOS.3023	Hotel Cambridge	483 Beacon St	Boston	1898

Inv. No.	Property Name	Street	Town	Year
BOS.2996	Fay, E. H. House	484 Beacon St	Boston	1892
BOS.2997	Fay, E. H. House	486 Beacon St	Boston	1892
BOS.2998	Fay, E. H. House	488 Beacon St	Boston	1892
BOS.2999	Fay, E. H. House	490 Beacon St	Boston	1892
BOS.3000	Mount Vernon Church	490-492 Beacon St	Boston	1881
BOS.3036	Baker, Seth House	491 Beacon St	Boston	1891
BOS.3037		497 Beacon St	Boston	1890
BOS.3038		499 Beacon St	Boston	1888
BOS.3039	Parker, F. V. House	501 Beacon St	Boston	1888
BOS.3040	Burgess, Ed. House	503 Beacon St	Boston	1888
BOS.3024	Bradford, G. House	504 Beacon St	Boston	1894
BOS.3041	Lewis, D. House	505 Beacon St	Boston	1888
BOS.3025	Bowditch, V. Y. House	506 Beacon St	Boston	1893
BOS.3042	Dalton, H. R. House	507 Beacon St	Boston	1887
BOS.3026	Nelson, Thomas House	508 Beacon St	Boston	1890
BOS.3043	Allen, S. S. House	509 Beacon St	Boston	1887
BOS.3044	Chadwick and Stillings House	511 Beacon St	Boston	1887
BOS.3028	Maryland, The	512-514 Beacon St	Boston	r 1925
BOS.3045	Chadwick and Stillings - Sherburne, Charles House	513 Beacon St	Boston	1887
BOS.3046	Chadwick and Stillings House	515 Beacon St	Boston	1887
BOS.3047	Joslin, Allen L. Row House	517 Beacon St	Boston	1887
BOS.3029	Ayer, Mary House	518 Beacon St	Boston	1893
BOS.3048	Dennison, Lydia Row House	519 Beacon St	Boston	1887
BOS.3049	Savage, Catherine Row House	521 Beacon St	Boston	1887
BOS.3050	Chadwick and Stillings House	523 Beacon St	Boston	1887
BOS.3030		524 Beacon St	Boston	1912
BOS.3051	Chadwick and Stillings House	525 Beacon St	Boston	1887
BOS.3031	Wadsworth, O. House	526 Beacon St	Boston	1894
BOS.3052	Chadwick and Stillings House	527 Beacon St	Boston	1887
BOS.3032	Williams, Harold House	528 Beacon St	Boston	1893
BOS.3053	Chadwick and Stillings House	529 Beacon St	Boston	1887
BOS.3033	Trazier, Charles H. House	530 Beacon St	Boston	1908
BOS.3054	Molloy, Edward B. - Holmes, Edgar House	531 Beacon St	Boston	1887
BOS.3034	Kittridge, Mary House	532 Beacon St	Boston	1900
BOS.3055	Hotel Charlesgate	535 Beacon St	Boston	1891
BOS.3035		536 Beacon St	Boston	1923
BOS.2602	First Church, Unitarian	Berkeley St	Boston	1868

Inv. No.	Property Name	Street	Town	Year
BOS.3924	First Church, Congregational	Berkeley St	Boston	1867
BOS.2362	Boston Police Department Headquarters	154 Berkeley St	Boston	1925
BOS.2363	Liberty Mutual Insurance Company Building	175-185 Berkeley St	Boston	1937
BOS.2364	Hancock, John Building (II)	190-200 Berkeley St	Boston	c 1947
BOS.3919	Wood, C. A. - Peabody, F. H. House	247 Berkeley St	Boston	1869
BOS.3920	Wood, C. A. House	249 Berkeley St	Boston	1869
BOS.3921	Chadbourn, William House	255 Berkeley St	Boston	1864
BOS.3922		299 Berkeley St	Boston	1956
BOS.3923	First Lutheran Church	299 Berkeley St	Boston	1959
BOS.3925	Wheatland, George - Dana, C. S. House	300 Berkeley St	Boston	1867
BOS.3926		301 Berkeley St	Boston	1923
BOS.3927	Wheatland, George - Jackson, Sarah House	302 Berkeley St	Boston	1867
BOS.3928	Crafts, Mariana House	304 Berkeley St	Boston	1869
BOS.2623	Trinity Church	Boylston St	Boston	1875
BOS.2626	Hotel Lenox	Boylston St	Boston	1901
BOS.2639	Museum of Natural History	Boylston St	Boston	1863
BOS.3898	New Old South Church Parsonage	Boylston St	Boston	1872
BOS.9014	Arlington Street Subway Station	Boylston St	Boston	1921
BOS.9015	Copley Square Subway Station	Boylston St	Boston	1915
BOS.9016	Copley Station Entrance Canopy	Boylston St	Boston	1925
BOS.9017	Massachusetts Avenue - Auditorium Subway Station	Boylston St	Boston	1914
BOS.9021	Brooks, Phillips Statue	Boylston St	Boston	1910
BOS.9644	Boylston Street Subway Tunnel	Boylston St	Boston	1914
BOS.2365	Garden Building	244-250 Boylston St	Boston	1911
BOS.2603	Arlington Building	324-334 Boylston St	Boston	1904
BOS.2604		336-342 Boylston St	Boston	1898
BOS.2605		344-350 Boylston St	Boston	1897
BOS.2630	Arlington Street Church	351-355 Boylston St	Boston	1861
BOS.2606	Mayflower Building	352-360 Boylston St	Boston	1906
BOS.2631		355 Boylston St	Boston	r 1910
BOS.2632	Universalist Publishing Company Building	359-363 Boylston St	Boston	1909
BOS.2607		364-368 Boylston St	Boston	1926
BOS.2608	Eldredge Building	376 Boylston St	Boston	1894
BOS.2609		380 Boylston St	Boston	1927
BOS.2610	Bigelow - Kennard Building	384-390 Boylston St	Boston	1928
BOS.2611		392 Boylston St	Boston	1861
BOS.2612		396-398 Boylston St	Boston	1861

Inv. No.	Property Name	Street	Town	Year
BOS.2633		399 Boylston St	Boston	1983
BOS.2613		400-402 Boylston St	Boston	1908
BOS.2614		406-410 Boylston St	Boston	1861
BOS.2615	Berkeley Building	414-426 Boylston St	Boston	1905
BOS.2634	Warren Chambers Building	415-421 Boylston St	Boston	1896
BOS.2635		423 Boylston St	Boston	1868
BOS.2636		429 Boylston St	Boston	1868
BOS.2637		431-439 Boylston St	Boston	1868
BOS.9022	Street Clock	439 Boylston St	Boston	
BOS.2638	Woodbury Building	443-445 Boylston St	Boston	c 1898
BOS.2616	Stuart Building	452-462 Boylston St	Boston	c 1910
BOS.2617		468-472 Boylston St	Boston	1947
BOS.2618		476 Boylston St	Boston	1910
BOS.2619		480 Boylston St	Boston	1956
BOS.2640	New England Life Insurance Building	485-519 Boylston St	Boston	1938
BOS.2620		500 Boylston St	Boston	1963
BOS.2621		510 Boylston St	Boston	1959
BOS.2622		520-530 Boylston St	Boston	1957
BOS.2641		535-541 Boylston St	Boston	1971
BOS.2642		543-547 Boylston St	Boston	1972
BOS.2643		551 Boylston St	Boston	r 1915
BOS.2644		553 Boylston St	Boston	r 1915
BOS.2645		557 Boylston St	Boston	1923
BOS.2646		561 Boylston St	Boston	r 1915
BOS.2647		567 Boylston St	Boston	1912
BOS.2648		569 Boylston St	Boston	c 1912
BOS.2649		571-575 Boylston St	Boston	1913
BOS.2650	Wesleyan Building	579-583 Boylston St	Boston	1912
BOS.2651	Chauncy Hall Building	585-591 Boylston St	Boston	1916
BOS.2652	McGraw-Hill Building	601-607 Boylston St	Boston	1959
BOS.2653	New Old South Church	635-645 Boylston St	Boston	1874
BOS.2654		647 Boylston St	Boston	1886
BOS.2655		651-655 Boylston St	Boston	r 1915
BOS.2656		657 Boylston St	Boston	r 1915
BOS.2657		661 Boylston St	Boston	r 1915
BOS.2658		665 Boylston St	Boston	r 1915
BOS.2659		667-669 Boylston St	Boston	1888
BOS.2660		671-673 Boylston St	Boston	r 1900

Inv. No.	Property Name	Street	Town	Year
BOS.2661		675-691 Boylston St	Boston	1984
BOS.2624	Boston Public Library - McKim Building	700 Boylston St	Boston	1888
BOS.2625	Boston Public Library - Johnson Building	700 Boylston St	Boston	1969
BOS.2662		707-711 Boylston St	Boston	1892
BOS.2663	Driscoll, The	715 Boylston St	Boston	1908
BOS.2664		717-723 Boylston St	Boston	r 1900
BOS.2665	Hayes, John C. Building	727-731 Boylston St	Boston	1895
BOS.2666	Boylston Chambers	733-739 Boylston St	Boston	r 1900
BOS.2667		749-751 Boylston St	Boston	1901
BOS.2668		753-757 Boylston St	Boston	1911
BOS.2627		760 Boylston St	Boston	1965
BOS.2669		761 Boylston St	Boston	c 1908
BOS.2670		777-789 Boylston St	Boston	1901
BOS.2628	Boylston Apartments	780 Boylston St	Boston	1964
BOS.2671		791 Boylston St	Boston	1901
BOS.2672		793 Boylston St	Boston	1902
BOS.2673	Fabyan, George Conservatory	799 Boylston St	Boston	1897
BOS.2674	Sunoco Gas Station	801-807 Boylston St	Boston	1960
BOS.2675		811 Boylston St	Boston	1910
BOS.2676		815-825 Boylston St	Boston	1906
BOS.2677		827-829 Boylston St	Boston	1890
BOS.2678	Sack Paris Cinema	839-841 Boylston St	Boston	1963
BOS.2679		843-845 Boylston St	Boston	1893
BOS.2680		851-855 Boylston St	Boston	1909
BOS.2681		859 Boylston St	Boston	1918
BOS.2682		863 Boylston St	Boston	c 1918
BOS.2683		867 Boylston St	Boston	1910
BOS.2684		885-889 Boylston St	Boston	1907
BOS.2685		893-901 Boylston St	Boston	1905
BOS.2686		903 Boylston St	Boston	1892
BOS.2687		907-911 Boylston St	Boston	1892
BOS.2688		915-921 Boylston St	Boston	1910
BOS.2689	Tennis and Racquet Club Lodging House	923-925 Boylston St	Boston	1902
BOS.2690	Tennis and Racquet Club	929-939 Boylston St	Boston	1902
BOS.2691	Boston Ladder 15 and Engine 33 Firehouse	943-951 Boylston St	Boston	1885
BOS.2692	Back Bay Police Station	955 Boylston St	Boston	1886
BOS.2693	Boston Division 16 Police Station	957 Boylston St	Boston	c 1920
BOS.2629	State Street Trust Company Building	1046-1050 Boylston St	Boston	1902

Inv. No.	Property Name	Street	Town	Year
BOS.3673	Minot, William Jr. House	24 Charlesgate East	Boston	1891
BOS.2366	Hancock Garage	100 Clarendon St	Boston	1970
BOS.2367	Publishers Building	131 Clarendon St	Boston	1922
BOS.2368	YWCA Boston	140 Clarendon St	Boston	1929
BOS.2369	Hancock, John Mutual Life Insurance Company (I)	197 Clarendon St	Boston	1922
BOS.13975	Hancock, John Mutual Life Insurance Company (II)	200 Clarendon St	Boston	c 1968
BOS.3929		220 Clarendon St	Boston	1883
BOS.3930	Coffin, Uriah House	232 Clarendon St	Boston	1872
BOS.2694	Trinity Rectory	233 Clarendon St	Boston	1879
BOS.3931	Talbot, Newton House	234 Clarendon St	Boston	1871
BOS.3932	Talbot, Newton House	236 Clarendon St	Boston	1871
BOS.3934	Hotel Hamilton	260 Clarendon St	Boston	1869
BOS.3935		261 Clarendon St	Boston	1925
BOS.3936	Wheatland, George House	263 Clarendon St	Boston	1870
BOS.3937	Wheatland, George - Mason, A. L. House	265 Clarendon St	Boston	1870
BOS.3938	Wheatland, George - Parker, Annie House	267 Clarendon St	Boston	1870
BOS.3939	Chadwick, James House	270 Clarendon St	Boston	1873
BOS.3940	Wheatland, George House	271 Clarendon St	Boston	1869
BOS.3941	Wheatland, George House - Hale House	273 Clarendon St	Boston	1869
BOS.3942	Wheatland, George House	275 Clarendon St	Boston	1869
BOS.3943	Wheatland, George House	277 Clarendon St	Boston	1869
BOS.3945	Hunnewell, F. W. House	278 Clarendon St	Boston	1870
BOS.3944	Wheatland, George House	279 Clarendon St	Boston	1869
BOS.3946	Perkins, Thomas House	285 Clarendon St	Boston	1864
BOS.2370		129-133 Columbus Ave	Boston	1913
BOS.2372		135-137 Columbus Ave	Boston	c 1919
BOS.2373		139-145 Columbus Ave	Boston	1881
BOS.2374		147-153 Columbus Ave	Boston	1881
BOS.2375	Carter, Dinsmore Company Ink Factory	162-172 Columbus Ave	Boston	1883
BOS.2376	Salvation Army Divisional Headquarters	187 Columbus Ave	Boston	1950
BOS.2377	Youth's Companion Building	195-215 Columbus Ave	Boston	1891
BOS.2378	District 4 Fire House	200 Columbus Ave	Boston	1970
BOS.2379	Pope Manufacturing Company Building	219-223 Columbus Ave	Boston	1897
BOS.3455	Hotel Hamilton	Commonwealth Ave	Boston	1869
BOS.3503	Hotel Vendome Addition	Commonwealth Ave	Boston	1881
BOS.9018	Hamilton, Alexander Statue	Commonwealth Ave	Boston	1865

Inv. No.	Property Name	Street	Town	Year
BOS.9019	Glover, John Statue	Commonwealth Ave	Boston	1886
BOS.9023	Ericsson, Leif Statue	Commonwealth Ave	Boston	1887
BOS.9024	Howard, Charles Pagelson Bench	Commonwealth Ave	Boston	
BOS.9025	Collins, Patrick Andrew Statue	Commonwealth Ave	Boston	1908
BOS.9026	Dewart, Rev. and Mrs. William Herbert Bench	Commonwealth Ave	Boston	
BOS.9027	Garrison, William Lloyd Statue	Commonwealth Ave	Boston	1885
BOS.9028	Sarmiento, Domingo Faustino Statue	Commonwealth Ave	Boston	1973
BOS.3378	Ward, Samuel House	1 Commonwealth Ave	Boston	1861
BOS.3392	Little, James House	2 Commonwealth Ave	Boston	1864
BOS.3379	Rotch, B. S. House	3 Commonwealth Ave	Boston	1861
BOS.3393	Brown, William House	4 Commonwealth Ave	Boston	1864
BOS.3380	Baylies, Walter House	5 Commonwealth Ave	Boston	1912
BOS.3394	Abbe, A. - Weld, William House	6 Commonwealth Ave	Boston	1864
BOS.3381	Johnson, Samuel House	7 Commonwealth Ave	Boston	1861
BOS.3395	Bigelow, Erastus House	8 Commonwealth Ave	Boston	1864
BOS.3382		9 Commonwealth Ave	Boston	1937
BOS.3396	Appleton, Thomas House	10 Commonwealth Ave	Boston	1864
BOS.3383	Bradlee, F. - Abbott, E. House	11 Commonwealth Ave	Boston	1868
BOS.3397		12-14 Commonwealth Ave	Boston	c 1927
BOS.3384	Nowell, Anna House	13 Commonwealth Ave	Boston	1907
BOS.3398		14 Commonwealth Ave	Boston	1927
BOS.3385	Pickman, William House	15 Commonwealth Ave	Boston	1867
BOS.3399	Woodbury, Charles House	16 Commonwealth Ave	Boston	1864
BOS.3386	Gardiner, William House	17 Commonwealth Ave	Boston	1866
BOS.3400	Ward, Samuel - Dorr, C. House	18 Commonwealth Ave	Boston	1864
BOS.3387	Amory, T. C. House	19 Commonwealth Ave	Boston	1867
BOS.3401	Ward, Samuel House	20 Commonwealth Ave	Boston	1861
BOS.3388	Burnham, J. A. House	21 Commonwealth Ave	Boston	1868
BOS.3402	Motley, Edward House	22 Commonwealth Ave	Boston	1861
BOS.3389	Spooner, Daniel House	23 Commonwealth Ave	Boston	1868
BOS.3403	Snelling, E. E. House	24 Commonwealth Ave	Boston	1861
BOS.3390	Hooper, Samuel House	25 Commonwealth Ave	Boston	1861
BOS.3404	Saltonstahl, H. House	26 Commonwealth Ave	Boston	1861
BOS.3391	Hooper, Samuel - Lothrop, Thornton House	27 Commonwealth Ave	Boston	1861
BOS.3405	Bigelow, G. T. House	28 Commonwealth Ave	Boston	1861
BOS.3416		29 Commonwealth Ave	Boston	1894
BOS.3406	Fitch, Jonas House	30 Commonwealth Ave	Boston	1861
BOS.3417	Sawyer, J. House	31 Commonwealth Ave	Boston	1864

Friday, August 24, 2018

Page 16 of 42

Inv. No.	Property Name	Street	Town	Year
BOS.3407	Standish, Miles House	32 Commonwealth Ave	Boston	1861
BOS.3418	Dalton, C. H. House	33 Commonwealth Ave	Boston	1864
BOS.3408	Edwards, M. A. House	34 Commonwealth Ave	Boston	1861
BOS.3419	Atkins, Elisha House	35 Commonwealth Ave	Boston	1873
BOS.3409	Lincoln, Ezra House	36 Commonwealth Ave	Boston	1861
BOS.3420	Atkins, Elisha House	37 Commonwealth Ave	Boston	1872
BOS.3410	Gibbs, Nathan House	38 Commonwealth Ave	Boston	1862
BOS.3421	Farnsworth, I. House	39 Commonwealth Ave	Boston	1872
BOS.3411	Sharp, John House	40 Commonwealth Ave	Boston	1862
BOS.3422	Drew, Elizabeth House	41 Commonwealth Ave	Boston	1869
BOS.3412	Sayles, F. W. House	42 Commonwealth Ave	Boston	1864
BOS.3423	Williams, A. R. House	43 Commonwealth Ave	Boston	1902
BOS.3413	Robbins, R. E. House	44 Commonwealth Ave	Boston	1864
BOS.3424	Drew, Elizabeth House	45 Commonwealth Ave	Boston	1869
BOS.3414	Gookin, Samuel House	46 Commonwealth Ave	Boston	1864
BOS.3425	Drew, Elizabeth House	47 Commonwealth Ave	Boston	1869
BOS.3415	Chadbourn, William House	48 Commonwealth Ave	Boston	1864
BOS.3426	Torrey, Charles House	49 Commonwealth Ave	Boston	1877
BOS.3434		50 Commonwealth Ave	Boston	1925
BOS.3427	Gardner, G. A. House	51 Commonwealth Ave	Boston	1876
BOS.3435	Browne, Edward House	52 Commonwealth Ave	Boston	1872
BOS.3436	Sharp, John House	54 Commonwealth Ave	Boston	1866
BOS.3428	Bailey, J. T. House	55 Commonwealth Ave	Boston	1875
BOS.3437		56 Commonwealth Ave	Boston	1930
BOS.3429	Burnham, J. A. House	57 Commonwealth Ave	Boston	1874
BOS.3438	Sayles, Henry House	58 Commonwealth Ave	Boston	1866
BOS.3430	Lawrence, A. A. House	59 Commonwealth Ave	Boston	1874
BOS.3439	Putnam, J. P. House	60 Commonwealth Ave	Boston	1866
BOS.3431	Lawrence, S. E. House	61 Commonwealth Ave	Boston	1879
BOS.3440	Williams, Henry House	62 Commonwealth Ave	Boston	1872
BOS.3432	Warren, Annie House	63 Commonwealth Ave	Boston	1877
BOS.3441	Williams, Henry House	64 Commonwealth Ave	Boston	1872
BOS.3433		65 Commonwealth Ave	Boston	1925
BOS.3442	Williams, Henry - Clark, J. W. House	66 Commonwealth Ave	Boston	1872
BOS.3443	Whitney, David House	68 Commonwealth Ave	Boston	1869
BOS.3444	Brewer, Catherine House	70 Commonwealth Ave	Boston	1869
BOS.3445	Brewer, J. R. House	72 Commonwealth Ave	Boston	1869
BOS.3446	Sayles, Laura House	74 Commonwealth Ave	Boston	1870

Inv. No.	Property Name	Street	Town	Year
BOS.3447	Fox, Charles House	76 Commonwealth Ave	Boston	1872
BOS.3448		78 Commonwealth Ave	Boston	1922
BOS.3449	Fox, Charles House	80 Commonwealth Ave	Boston	1872
BOS.3450	Page, Edward House	82 Commonwealth Ave	Boston	1872
BOS.3451	Burnham, Sarah House	84 Commonwealth Ave	Boston	1872
BOS.3452	Thomas, Cornelia House	86 Commonwealth Ave	Boston	1874
BOS.3453		88-90 Commonwealth Ave	Boston	1925
BOS.3454		90 Commonwealth Ave	Boston	1925
BOS.3456	Forbes, J. M. House	107 Commonwealth Ave	Boston	1879
BOS.3457	Whitwell, H. House	109 Commonwealth Ave	Boston	1872
BOS.3472	First Baptist Church	110 Commonwealth Ave	Boston	1872
BOS.3458	Whitwell, H. House	111 Commonwealth Ave	Boston	1872
BOS.3459		113 Commonwealth Ave	Boston	1937
BOS.3473		114 Commonwealth Ave	Boston	1874
BOS.3460	Hastings, Walter House	115 Commonwealth Ave	Boston	1876
BOS.3474	Daggett, H. House	116 Commonwealth Ave	Boston	1872
BOS.3461	Hastings, Walter House	117 Commonwealth Ave	Boston	1876
BOS.3475	Case, James House	118 Commonwealth Ave	Boston	1873
BOS.3462	Brown, R. C. House	119 Commonwealth Ave	Boston	1879
BOS.3476	Case, Laura House	120 Commonwealth Ave	Boston	1873
BOS.3463	Wood, Charles House	121 Commonwealth Ave	Boston	1872
BOS.3477	Case, Laura - Lawrence, William House	122 Commonwealth Ave	Boston	1871
BOS.3464	Kendall, Elizabeth House	123 Commonwealth Ave	Boston	1872
BOS.3478	Cowing, Martha House	124 Commonwealth Ave	Boston	1871
BOS.3465	Tuxbury, George House	125 Commonwealth Ave	Boston	1872
BOS.3479	Merwin, Elias House	126 Commonwealth Ave	Boston	1871
BOS.3466	Weld, William - Pratt, S. M. House	127 Commonwealth Ave	Boston	1871
BOS.3480	Shapleigh, William House	128 Commonwealth Ave	Boston	1882
BOS.3467	Ellis, Charles House	129 Commonwealth Ave	Boston	1871
BOS.3481	Rand, William House	130 Commonwealth Ave	Boston	1882
BOS.3468	Scull, Gideon House	131 Commonwealth Ave	Boston	1880
BOS.3482	Glover, J. B. House	132 Commonwealth Ave	Boston	1885
BOS.3469	Wharton, William House	133 Commonwealth Ave	Boston	1879
BOS.3470	Jacques, Francis House	135 Commonwealth Ave	Boston	1878
BOS.3483	Atherton, William House	144 Commonwealth Ave	Boston	1880
BOS.3484	Westcott, Stephen E. Row House	146 Commonwealth Ave	Boston	1876
BOS.3485	Fay, F. L. House	148 Commonwealth Ave	Boston	1876
BOS.3486	Baker, R. House	150 Commonwealth Ave	Boston	1879

Inv. No.	Property Name	Street	Town	Year
BOS.3471	Shaw, Robert G. House	151 Commonwealth Ave	Boston	1876
BOS.3487	Williams, Jarvis House	152 Commonwealth Ave	Boston	1870
BOS.3502	Hotel Vendome	160 Commonwealth Ave	Boston	1871
BOS.3488	Bates, J. D. House	161 Commonwealth Ave	Boston	1873
BOS.3489	Bates, J. D. House	163 Commonwealth Ave	Boston	1874
BOS.3490	Erskine, John House	165 Commonwealth Ave	Boston	1879
BOS.3491	Morse, E. R. House	167 Commonwealth Ave	Boston	1880
BOS.3492	Burr, I. T. House	169 Commonwealth Ave	Boston	1928
BOS.3493	Lowell, A. House	171 Commonwealth Ave	Boston	1879
BOS.3504	Bartlett, C. S. House	172 Commonwealth Ave	Boston	1885
BOS.3494	Parker, Harleston House	173 Commonwealth Ave	Boston	1917
BOS.3505	Merrill, L. M. House	174 Commonwealth Ave	Boston	1893
BOS.3495	Merriman, Charles House	175 Commonwealth Ave	Boston	1881
BOS.3506	Wesselhoeft, W. F. House	176 Commonwealth Ave	Boston	1883
BOS.3496	Adams, J. Q. House	177 Commonwealth Ave	Boston	1882
BOS.3507	Bell, J. B. House	178 Commonwealth Ave	Boston	1883
BOS.3497	Bradley, William House	179 Commonwealth Ave	Boston	1879
BOS.3508		180-182 Commonwealth Ave	Boston	1925
BOS.3498	Whitney, Charles House	181 Commonwealth Ave	Boston	1878
BOS.3509		182 Commonwealth Ave	Boston	1925
BOS.3499	Merriman, Frank House	183 Commonwealth Ave	Boston	1878
BOS.3510		184 Commonwealth Ave	Boston	1889
BOS.3500	Bradley, William House - Hotel Agassiz	185 Commonwealth Ave	Boston	1883
BOS.3511		186 Commonwealth Ave	Boston	1890
BOS.3512		188 Commonwealth Ave	Boston	1890
BOS.3513	Whitwell, H. S. House	190 Commonwealth Ave	Boston	1881
BOS.3501	Hotel Agassiz	191 Commonwealth Ave	Boston	1872
BOS.3514		192 Commonwealth Ave	Boston	1926
BOS.3515	Haven, F. C. House	195 Commonwealth Ave	Boston	1881
BOS.3533	Spooner, D. N. House	196 Commonwealth Ave	Boston	1881
BOS.3516	Rotch, T. M. House	197 Commonwealth Ave	Boston	1881
BOS.3534	Mathews, Annie House	198 Commonwealth Ave	Boston	1880
BOS.3517	Beebe, J. A. House	199 Commonwealth Ave	Boston	1890
BOS.3535	French, J. A. House	200 Commonwealth Ave	Boston	1882
BOS.3536	Stratton, Sara House	202 Commonwealth Ave	Boston	1882
BOS.3518	Morse, Leopold House	203 Commonwealth Ave	Boston	1883
BOS.3537	Rand, W. S. House	204 Commonwealth Ave	Boston	1888
BOS.3519	Peabody, Endicott House	205 Commonwealth Ave	Boston	1882

Inv. No.	Property Name	Street	Town	Year
BOS.3538	Flagg, D. House	206 Commonwealth Ave	Boston	1885
BOS.3520	Sargent, Winthrop House	207 Commonwealth Ave	Boston	1883
BOS.3539	Jackson, H. C. House	208 Commonwealth Ave	Boston	1885
BOS.3521	Mason, W. P. House	211 Commonwealth Ave	Boston	1883
BOS.3540	Munroe, B. W. House	212 Commonwealth Ave	Boston	1879
BOS.3522	White, C. T. House	213 Commonwealth Ave	Boston	1881
BOS.3541	Ames, S. T. - Quincy, G. H. House	214 Commonwealth Ave	Boston	1879
BOS.3523	Lawrence, J. House	215 Commonwealth Ave	Boston	1883
BOS.3542	McKay, George House	216 Commonwealth Ave	Boston	1879
BOS.3524	Algonquin Club	217 Commonwealth Ave	Boston	1887
BOS.3543	McKay, George House	218 Commonwealth Ave	Boston	1879
BOS.3544	McKay, Robert House	220 Commonwealth Ave	Boston	1879
BOS.3545	Guild, B. F. House	222 Commonwealth Ave	Boston	1879
BOS.3525	Higginson, G. House	223 Commonwealth Ave	Boston	1883
BOS.3546	Doe, F. J. House	224 Commonwealth Ave	Boston	1879
BOS.3526	Richardson, W. L. House	225 Commonwealth Ave	Boston	1884
BOS.3547	Caton, Asa House	226 Commonwealth Ave	Boston	1881
BOS.3527	Bartlett, N. S. House	227 Commonwealth Ave	Boston	1884
BOS.3548	Parker, C. W. House	228 Commonwealth Ave	Boston	1881
BOS.3528	Sprague, F. R. House	229 Commonwealth Ave	Boston	1882
BOS.3549	Parker, C. W. House	230 Commonwealth Ave	Boston	1881
BOS.3529	Rogers, J. C. House	231 Commonwealth Ave	Boston	1885
BOS.3550	Wheelock, A. A. House	232 Commonwealth Ave	Boston	1880
BOS.3530	Rogers, W. C. House	233 Commonwealth Ave	Boston	1886
BOS.3551	Wadleigh, H. W. House	234 Commonwealth Ave	Boston	1889
BOS.3531	Wheatland, G. House	235 Commonwealth Ave	Boston	1882
BOS.3552	Wadleigh, H. W. House	236 Commonwealth Ave	Boston	1879
BOS.3553	Wilson, C. B. House	238 Commonwealth Ave	Boston	1879
BOS.3532	Thayer House	239 Commonwealth Ave	Boston	1937
BOS.3554	Allen, Rollin House	240 Commonwealth Ave	Boston	1903
BOS.3555	Emmons, Elenor House	245 Commonwealth Ave	Boston	1877
BOS.3568	Avery, George A. House	246 Commonwealth Ave	Boston	1880
BOS.3556	Mandell, Emily House	247 Commonwealth Ave	Boston	1905
BOS.3557	Rand, W. S. House	249 Commonwealth Ave	Boston	1878
BOS.3569		250 Commonwealth Ave	Boston	c 1926
BOS.3570		250 Commonwealth Ave	Boston	1925
BOS.3558	Bigelow, J. S. House	251 Commonwealth Ave	Boston	1880
BOS.3571	Shapleigh, S. House	252 Commonwealth Ave	Boston	1879

Inv. No.	Property Name	Street	Town	Year
BOS.3559	Mansfield, N. B. House	253 Commonwealth Ave	Boston	1880
BOS.3572	Avery, George A. House	254 Commonwealth Ave	Boston	1879
BOS.3560	Roberts, H. O. House	255 Commonwealth Ave	Boston	1880
BOS.3573	Coffin, Uriah House	256 Commonwealth Ave	Boston	1879
BOS.3561	Cochrane, A. House	257 Commonwealth Ave	Boston	1886
BOS.3574	Shapleigh, J. House	258 Commonwealth Ave	Boston	1879
BOS.3575	Shapleigh, J. House	260 Commonwealth Ave	Boston	1879
BOS.3562	Hunnewell, A. House	261 Commonwealth Ave	Boston	1880
BOS.3576	Shapleigh, J. House	262 Commonwealth Ave	Boston	1880
BOS.3563	Lovering, Charles House	263 Commonwealth Ave	Boston	1880
BOS.3577	Shapleigh, J. House	264 Commonwealth Ave	Boston	1882
BOS.3564	Appleton, F. H. House	265 Commonwealth Ave	Boston	1880
BOS.3578	Shapleigh, J. House	266 Commonwealth Ave	Boston	1883
BOS.3565	Boyden, Charles House	267 Commonwealth Ave	Boston	1880
BOS.3566	Kidder, C. A. House	269 Commonwealth Ave	Boston	1881
BOS.3579	Hotel Tuileries	270 Commonwealth Ave	Boston	1896
BOS.3567	Proctor, T. E. House	273 Commonwealth Ave	Boston	1891
BOS.3580	White, H. M. House	274 Commonwealth Ave	Boston	1885
BOS.3581	Sherburne, W. House	276 Commonwealth Ave	Boston	1885
BOS.3582	Caton, Asa House	278 Commonwealth Ave	Boston	1883
BOS.3583	Hogg, John House	280 Commonwealth Ave	Boston	1894
BOS.3584	Moseley, Alexander House	282 Commonwealth Ave	Boston	1884
BOS.3585	Whitwell, H. S. House	283 Commonwealth Ave	Boston	1879
BOS.3592	Mead, Sumner House	284 Commonwealth Ave	Boston	1880
BOS.3586	Bradbury, H. J. House	285 Commonwealth Ave	Boston	1903
BOS.3593	Rand, W. S. House	286 Commonwealth Ave	Boston	1880
BOS.3587	Sears, H. M. House	287 Commonwealth Ave	Boston	1892
BOS.3594	Rand, W. S. House	288 Commonwealth Ave	Boston	1880
BOS.3595	Pope, Fred House	290 Commonwealth Ave	Boston	1890
BOS.3588	Allen, W. H. House	291 Commonwealth Ave	Boston	1884
BOS.3589	Horn, E. B. House	293 Commonwealth Ave	Boston	1890
BOS.3596	Shapleigh, J. House	294 Commonwealth Ave	Boston	1880
BOS.3597	Shapleigh, J. House	296 Commonwealth Ave	Boston	1880
BOS.3590	Draper, James House	297 Commonwealth Ave	Boston	1899
BOS.3598	Shapleigh, J. House	298 Commonwealth Ave	Boston	1880
BOS.3599	Coffin, Uriah House	300 Commonwealth Ave	Boston	1880
BOS.3600	Coffin, Uriah House	302 Commonwealth Ave	Boston	1881
BOS.2695	Nickerson, George A. House	303 Commonwealth Ave	Boston	1895

Inv. No.	Property Name	Street	Town	Year
BOS.3601	Clark, B. C. - Weld, Otis E. House	304 Commonwealth Ave	Boston	1895
BOS.3591	Thayer, N. House	305 Commonwealth Ave	Boston	1884
BOS.3602	Webster, J. G. House	306 Commonwealth Ave	Boston	1896
BOS.3603		308 Commonwealth Ave	Boston	1889
BOS.3604		311 Commonwealth Ave	Boston	1924
BOS.3605	Hobbs, Warren House	313 Commonwealth Ave	Boston	1877
BOS.3626	Burrage, Albert C. House - Boston Evening Clinic	314 Commonwealth Ave	Boston	1899
BOS.3606	Chamberlain, D. House	315 Commonwealth Ave	Boston	1878
BOS.3625	Thayer, Frank House	316 Commonwealth Ave	Boston	1881
BOS.3607	Abbott, J. G. House	317 Commonwealth Ave	Boston	1878
BOS.3627	Shapleigh, J. House	318 Commonwealth Ave	Boston	1881
BOS.3608	Caton, Asa House	319 Commonwealth Ave	Boston	1878
BOS.3628	Shapleigh, J. House	320 Commonwealth Ave	Boston	1881
BOS.3609	Caton, Asa House	321 Commonwealth Ave	Boston	1879
BOS.3629	Wheatland, George House	322 Commonwealth Ave	Boston	1882
BOS.3610	Caton, Asa House	323 Commonwealth Ave	Boston	1879
BOS.3630	Wheatland, George House	324 Commonwealth Ave	Boston	1882
BOS.3611	Thayer, Frank House	325 Commonwealth Ave	Boston	1879
BOS.3631	Wheatland, George House	326 Commonwealth Ave	Boston	1882
BOS.3612	Tobey, James House	327 Commonwealth Ave	Boston	1880
BOS.3632	Gill, R. S. House	328 Commonwealth Ave	Boston	1888
BOS.3613	Wheatland, George House	329 Commonwealth Ave	Boston	1895
BOS.3633	Edmunds, I. J. T. House	330 Commonwealth Ave	Boston	1889
BOS.3634	Fitch, Benjamin House	332 Commonwealth Ave	Boston	1878
BOS.3614	Hotel Lafayette	333 Commonwealth Ave	Boston	1895
BOS.3635	Noble, William House	334 Commonwealth Ave	Boston	1879
BOS.3636	Vinal and Dodge House	336 Commonwealth Ave	Boston	1881
BOS.3615	Caton, Asa House	337 Commonwealth Ave	Boston	1880
BOS.3637	Wheatland, George House	338 Commonwealth Ave	Boston	1882
BOS.3616	Caton, Asa House	339 Commonwealth Ave	Boston	1880
BOS.3638	Wheatland, George House	340 Commonwealth Ave	Boston	1882
BOS.3617	Caton, Asa - Rice, N. W. House	341 Commonwealth Ave	Boston	1880
BOS.3639	Wheatland, George House	342 Commonwealth Ave	Boston	1883
BOS.3618	Crocker, G. G. House	343 Commonwealth Ave	Boston	1882
BOS.3640	Wheatland, George House	344 Commonwealth Ave	Boston	1883
BOS.3619		345 Commonwealth Ave	Boston	1925
BOS.3641	Wheatland, George House	346 Commonwealth Ave	Boston	1883
BOS.3620	Mason, M. B. House	347 Commonwealth Ave	Boston	1888

Inv. No.	Property Name	Street	Town	Year
BOS.3642	Wheatland, George House	348 Commonwealth Ave	Boston	1883
BOS.3621	Merrill, L. M. House	349 Commonwealth Ave	Boston	1894
BOS.3643	Wheatland, George House	350 Commonwealth Ave	Boston	1883
BOS.3622	Merrill, L. M. House	351 Commonwealth Ave	Boston	1894
BOS.3644	Wheatland, George House	352 Commonwealth Ave	Boston	1883
BOS.3623	Merrill, L. M. House	353 Commonwealth Ave	Boston	1894
BOS.3645	Wheatland, George House	354 Commonwealth Ave	Boston	1883
BOS.3624	Ames, Oliver House	355 Commonwealth Ave	Boston	1882
BOS.3646	Wheatland, George House	356 Commonwealth Ave	Boston	1883
BOS.3647	Wheatland, George House	358 Commonwealth Ave	Boston	1883
BOS.3648	Wheatland, George House	360 Commonwealth Ave	Boston	1883
BOS.3649		362 Commonwealth Ave	Boston	1889
BOS.3650		366 Commonwealth Ave	Boston	1889
BOS.3651		371 Commonwealth Ave	Boston	1892
BOS.3652		373 Commonwealth Ave	Boston	1892
BOS.3674	Harvard Club	374 Commonwealth Ave	Boston	1912
BOS.3653	Jernegan, H. M. House	375 Commonwealth Ave	Boston	1892
BOS.3654	Knowlton, A. House	377 Commonwealth Ave	Boston	1889
BOS.3675	Park Entrance Land Company	378 Commonwealth Ave	Boston	1883
BOS.3655	Knowlton, A. House	379 Commonwealth Ave	Boston	1889
BOS.3676	Park Entrance Land Company	380 Commonwealth Ave	Boston	1883
BOS.3656	Wheatland, George House	381 Commonwealth Ave	Boston	1885
BOS.3677	Colonial, The	382 Commonwealth Ave	Boston	1895
BOS.3657	Wheatland, George House	383 Commonwealth Ave	Boston	1885
BOS.3678		384 Commonwealth Ave	Boston	1896
BOS.3658	Wheatland, George House	385 Commonwealth Ave	Boston	1885
BOS.3679		386 Commonwealth Ave	Boston	1899
BOS.3659	Wheatland, George House	387 Commonwealth Ave	Boston	1885
BOS.3680		388 Commonwealth Ave	Boston	1899
BOS.3660	Wheatland, George House	389 Commonwealth Ave	Boston	1885
BOS.3681	Puritan, The	390 Commonwealth Ave	Boston	1908
BOS.3661	Wheatland, George House	391 Commonwealth Ave	Boston	1885
BOS.3662	Dexter, Wirt House	393 Commonwealth Ave	Boston	1899
BOS.3663	Ayer, Frederick Mansion	395 Commonwealth Ave	Boston	1899
BOS.3664	Moorland Apartments	399 Commonwealth Ave	Boston	1924
BOS.3682	Hotel Somerset	400 Commonwealth Ave	Boston	1897
BOS.3665	Brown, A. T. House	401 Commonwealth Ave	Boston	1901
BOS.3666	Carr, Samuel House	403 Commonwealth Ave	Boston	1901

Inv. No.	Property Name	Street	Town	Year
BOS.3667	duBois, Loren House	405 Commonwealth Ave	Boston	1900
BOS.3668	Amory, William House	407 Commonwealth Ave	Boston	1901
BOS.3669	Minot, William House	409 Commonwealth Ave	Boston	1898
BOS.3670	Bradley, R. S. House	411 Commonwealth Ave	Boston	1899
BOS.3671	Amory, F. D. House	413 Commonwealth Ave	Boston	1890
BOS.3672	Olney, Richard House	415 Commonwealth Ave	Boston	1890
BOS.3947	Boston Art Club	270 Dartmouth St	Boston	1881
BOS.3948	Hotel Victoria	275 Dartmouth St	Boston	1886
BOS.3952	Putnam, J. P. House	277 Dartmouth St	Boston	1878
BOS.3953	Standish, James House	279 Dartmouth St	Boston	1871
BOS.3949	Stoddard, Stephan House	280 Dartmouth St	Boston	1871
BOS.3954	Standish, James House	281 Dartmouth St	Boston	1871
BOS.3950	Stoddard, Stephan House	282 Dartmouth St	Boston	1871
BOS.3955	Standish, James House	283 Dartmouth St	Boston	1871
BOS.3951	Stoddard, Stephan House	284 Dartmouth St	Boston	1871
BOS.3956	Hunnewell, Arthur House	303 Dartmouth St	Boston	1876
BOS.3957	Thayer, S. V. R. House	306 Dartmouth St	Boston	1872
BOS.3958	Wheatland, George House	312 Dartmouth St	Boston	1871
BOS.3959	Wheatland, George House	314 Dartmouth St	Boston	1871
BOS.3960	Hunnewell, Hollis House	315 Dartmouth St	Boston	1870
BOS.3961		317 Dartmouth St	Boston	1925
BOS.3962	Wheatland, George House	319 Dartmouth St	Boston	1869
BOS.3963	Wheatland, George House	321 Dartmouth St	Boston	1869
BOS.3964	Wheatland, George House	326 Dartmouth St	Boston	1872
BOS.3965	Wheatland, George House	328 Dartmouth St	Boston	1872
BOS.3966		330 Dartmouth St	Boston	1889
BOS.13252	Sarni Building	50-52 Eliot St	Boston	1923
BOS.2380	Motor Mart Garage	60-72 Eliot St	Boston	1926
BOS.3918	Spiritualist Temple - Exeter Theatre	Exeter St	Boston	1884
BOS.3977	Exeter Schoolhouse	Exeter St	Boston	1876
BOS.3978		Exeter St	Boston	1972
BOS.3979	Copley Hotel Annex	Exeter St	Boston	1889
BOS.3980	Copley Hotel	Exeter St	Boston	1890
BOS.3967	Wheatland, George House	1 Exeter St	Boston	1870
BOS.3968	Wheatland, George House	3 Exeter St	Boston	1870
BOS.3969	Wheatland, George House	5 Exeter St	Boston	1870
BOS.3970	Wheatland, George House	7 Exeter St	Boston	1872
BOS.3971	Wheatland, George House	9 Exeter St	Boston	1872

Inv. No.	Property Name	Street	Town	Year
BOS.3972	Wheatland, George House	11 Exeter St	Boston	1872
BOS.3973	Bradbury, E. P. House	16 Exeter St	Boston	1886
BOS.3974		17 Exeter St	Boston	1915
BOS.3975	Dexter, W. S. House	18 Exeter St	Boston	1885
BOS.3976	Matthews, Nathan House	25 Exeter St	Boston	1882
BOS.3981	Wainwright, H. C. - Hinckley, A. House	1 Fairfield St	Boston	1871
BOS.3982	Wainwright, H. C. House	3 Fairfield St	Boston	1871
BOS.3983	Wainwright, H. C. House	5 Fairfield St	Boston	1871
BOS.3984	Gibson, G. M. House	7 Fairfield St	Boston	1872
BOS.3986	Higginson, H. L. House	8 Fairfield St	Boston	1879
BOS.3985	Gibson, G. M. - Morse, E. H. House	9 Fairfield St	Boston	1872
BOS.3987	Higginson, H. L. - White, C. G. House	10 Fairfield St	Boston	1879
BOS.3988	Lowell, Georgiana House	12 Fairfield St	Boston	1879
BOS.3989	Grinnell, Elizabeth House	18 Fairfield St	Boston	1878
BOS.3990	Allen, Elizabeth House	20 Fairfield St	Boston	1875
BOS.3991	King, G. P. House	21 Fairfield St	Boston	1880
BOS.3992	Potter, Asa House	29 Fairfield St	Boston	1876
BOS.3993	Saltonstahl, W. G. House	30 Fairfield St	Boston	1883
BOS.3994	Potter, Asa House	31 Fairfield St	Boston	1877
BOS.3998	Potter, Asa House	32 Fairfield St	Boston	1878
BOS.3995	Potter, Asa House	33 Fairfield St	Boston	1877
BOS.3999	Potter, Asa House	34 Fairfield St	Boston	1878
BOS.3996	Potter, Asa House	35 Fairfield St	Boston	1878
BOS.4000	Potter, Asa House	36 Fairfield St	Boston	1879
BOS.3997	Potter, Asa House	37 Fairfield St	Boston	1878
BOS.4001	Potter, Asa House	38 Fairfield St	Boston	1879
BOS.4002	Avery, Alden House	39 Fairfield St	Boston	1880
BOS.4004	Merrill, Silas House	40 Fairfield St	Boston	1886
BOS.4003	Avery, Alden House	41 Fairfield St	Boston	1880
BOS.4005	Merrill, Silas House	42 Fairfield St	Boston	1886
BOS.4006	Merrill, Silas House	44 Fairfield St	Boston	1886
BOS.4007	Cook, C. E. House	1 Gloucester St	Boston	1870
BOS.4008	Loring, W. C. House	2 Gloucester St	Boston	1893
BOS.4009	Moore, F. H. House	3 Gloucester St	Boston	1872
BOS.4012	Wainwright, H. C. House	4 Gloucester St	Boston	1871
BOS.4010	Moore, F. H. House	5 Gloucester St	Boston	1872
BOS.4013	Wainwright, H. C. House	6 Gloucester St	Boston	1871
BOS.4011	Moore, F. H. House	7 Gloucester St	Boston	1872

Inv. No.	Property Name	Street	Town	Year
BOS.4014		8 Gloucester St	Boston	1912
BOS.4015	Sears, W. T. House	9 Gloucester St	Boston	1872
BOS.4019	Gerrish, Hiram House	10 Gloucester St	Boston	1872
BOS.4016	Sears, W. T. House	11 Gloucester St	Boston	1872
BOS.4020	Gerrish, Hiram House	12 Gloucester St	Boston	1872
BOS.4017	Sears, W. T. House	13 Gloucester St	Boston	1872
BOS.4021	Gerrish, Hiram House	14 Gloucester St	Boston	1872
BOS.4018	Sears, W. T. House	15 Gloucester St	Boston	1872
BOS.4022	Thayer, E. V. R. House	17 Gloucester St	Boston	1886
BOS.4023	Adams, C. F. House	20 Gloucester St	Boston	1886
BOS.4024	Morse, C. A. House	29 Gloucester St	Boston	1882
BOS.4028	Rand, William S. House	30 Gloucester St	Boston	1880
BOS.4025	Morse, C. A. House	31 Gloucester St	Boston	1882
BOS.4029	Rand, William S. House	32 Gloucester St	Boston	1880
BOS.4026	Morse, C. A. House	33 Gloucester St	Boston	1882
BOS.4030	Rand, William S. House	34 Gloucester St	Boston	1880
BOS.4027	Morse, C. A. House	35 Gloucester St	Boston	1882
BOS.4031	Rand, William S. House	36 Gloucester St	Boston	1880
BOS.4032	Merrill, Silas House	42 Gloucester St	Boston	1884
BOS.4033	Merrill, Silas House	44 Gloucester St	Boston	1884
BOS.4034	Merrill, Silas House	46 Gloucester St	Boston	1884
BOS.4035	Wheatland, George House	48 Gloucester St	Boston	1882
BOS.4040	Wheatland, George House	49 Gloucester St	Boston	1883
BOS.4036	Wheatland, George House	50 Gloucester St	Boston	1882
BOS.4041	Wheatland, George House	51 Gloucester St	Boston	1883
BOS.4037	Wheatland, George House	52 Gloucester St	Boston	1882
BOS.4042	Wheatland, George House	53 Gloucester St	Boston	1883
BOS.4038	Wheatland, George House	54 Gloucester St	Boston	1882
BOS.4043	Wheatland, George House	55 Gloucester St	Boston	1883
BOS.4039	Wheatland, George House	56 Gloucester St	Boston	1882
BOS.4044	Chapin, E. E. House	9 Hereford St	Boston	1879
BOS.4045	Chapin, E. E. House	11 Hereford St	Boston	1879
BOS.4046	Sawyer, Caroline House	12 Hereford St	Boston	1869
BOS.4047	Richardson, J. F. House	13 Hereford St	Boston	1872
BOS.4050	Gibson, G. House	14 Hereford St	Boston	1871
BOS.4048	Richardson, J. F. House	15 Hereford St	Boston	1872
BOS.4051	Gibson, G. House	16 Hereford St	Boston	1871
BOS.4049	Richardson, J. F. House	17 Hereford St	Boston	1872

Inv. No.	Property Name	Street	Town	Year
BOS.4052	Gibson, G. House	18 Hereford St	Boston	1871
BOS.4053	Gibson, G. House	20 Hereford St	Boston	1871
BOS.4054	Ames, S. J. House	27 Hereford St	Boston	1879
BOS.4055	Ames, S. T. House	29 Hereford St	Boston	1879
BOS.4056	Ames, S. T. House	31 Hereford St	Boston	1879
BOS.4057	Andrew, John House	32 Hereford St	Boston	1884
BOS.4058	Sargent, F. S. House	40 Hereford St	Boston	1886
BOS.4059	Wheatland, George House	45 Hereford St	Boston	1882
BOS.4064	Horn, E. B. House	46 Hereford St	Boston	1885
BOS.4060	Wheatland, George House	47 Hereford St	Boston	1882
BOS.4065	Horn, E. B. House	48 Hereford St	Boston	1885
BOS.4061	Wheatland, George House	49 Hereford St	Boston	1882
BOS.4066	Horn, E. B. House	50 Hereford St	Boston	1885
BOS.4062	Wheatland, George House	51 Hereford St	Boston	1882
BOS.4067	Horn, E. B. House	52 Hereford St	Boston	1885
BOS.4063	Wheatland, George House	53 Hereford St	Boston	1882
BOS.9020	Mechanics - Prudential Subway Station	Huntington Ave	Boston	1941
BOS.14297	Hotel Huntington - Triangle Building	25 Huntington Ave	Boston	1877
BOS.3056	Glidden, William House	1 Marlborough St	Boston	1863
BOS.3078	Richards, William House	2 Marlborough St	Boston	1871
BOS.3057	Shattuck, George House	3 Marlborough St	Boston	1863
BOS.3079	Sheafe, William House	4 Marlborough St	Boston	1864
BOS.3058	Sargent, Henry House	5 Marlborough St	Boston	1863
BOS.3080		6 Marlborough St	Boston	1924
BOS.3059	Hooper, J. C. House	7 Marlborough St	Boston	1863
BOS.3081	Andrews, Frank House	8 Marlborough St	Boston	1864
BOS.3060	Lombard, Charles House	9 Marlborough St	Boston	1863
BOS.3082	Perry, Arthur House	10 Marlborough St	Boston	1905
BOS.3061	Warren, George House	11 Marlborough St	Boston	1863
BOS.3083	Morse, S. T. House	12 Marlborough St	Boston	1863
BOS.3062	Brigham, E. D. House	13 Marlborough St	Boston	1864
BOS.3084	Jackson, James House	14 Marlborough St	Boston	1863
BOS.3063	Kirby, Charles House	15 Marlborough St	Boston	1864
BOS.3085	Mixter, John House	16 Marlborough St	Boston	1864
BOS.3064	Howe, George House	17 Marlborough St	Boston	1865
BOS.3086	Revere, John - Torrey, Anna House	18 Marlborough St	Boston	1865
BOS.3065	Upton, George House	19 Marlborough St	Boston	1872
BOS.3087	Revere, John - Linzee, Sarah House	20 Marlborough St	Boston	1865

Inv. No.	Property Name	Street	Town	Year
BOS.3066	Freeland, Charles House	21 Marlborough St	Boston	1866
BOS.3088	Thorndike Estate	22 Marlborough St	Boston	1863
BOS.3067	Freeland, Charles House	23 Marlborough St	Boston	1866
BOS.3089	Thorndike Estate	24 Marlborough St	Boston	1863
BOS.3068	Freeland, Charles House	25 Marlborough St	Boston	1866
BOS.3090	Thorndike Estate	26 Marlborough St	Boston	1863
BOS.3069	Freeland, Charles - Richardson, Mary House	27 Marlborough St	Boston	1866
BOS.3091	Thorndike Estate	28 Marlborough St	Boston	1863
BOS.3070	Johnson, Samuel House	29 Marlborough St	Boston	1870
BOS.3092	Thorndike Estate	30 Marlborough St	Boston	1863
BOS.3071	Freeland, James House	31 Marlborough St	Boston	1870
BOS.3093		32 Marlborough St	Boston	1956
BOS.3072	Stetson Estate	33 Marlborough St	Boston	1870
BOS.3073	Dodge and Freeland House	35 Marlborough St	Boston	1869
BOS.3074	Dodge and Freeland House	37 Marlborough St	Boston	1869
BOS.3075	Dodge and Freeland - Dodge, Helen House	39 Marlborough St	Boston	1869
BOS.3076	Minot, Charles House	41 Marlborough St	Boston	1865
BOS.3077		43 Marlborough St	Boston	1923
BOS.3094	Codman, Edward House	53 Marlborough St	Boston	1867
BOS.3095	Codman, Charles House	57 Marlborough St	Boston	1867
BOS.3096	Crafts, J. M. House	59 Marlborough St	Boston	1873
BOS.3097	Standish, J. M. House	61 Marlborough St	Boston	1873
BOS.3098	Putnam, C. P. House	63 Marlborough St	Boston	1875
BOS.3099	Minot, Francis House	65 Marlborough St	Boston	1876
BOS.3111	Kirby, Charles - Bryant, Gridley James Fox House	66 Marlborough St	Boston	1870
BOS.3100	Hodges, R. M. House	67 Marlborough St	Boston	1878
BOS.3112	Kirby, Charles House	68 Marlborough St	Boston	1870
BOS.3113	Kirby, Charles House	70 Marlborough St	Boston	1868
BOS.3101	Gardner, J. L. Estate	71 Marlborough St	Boston	1864
BOS.3114	Kirby, Charles House	72 Marlborough St	Boston	1866
BOS.3102	Gardner, J. L. Estate	73 Marlborough St	Boston	1864
BOS.3115	Kirby, Charles - Philips, J. C. House	74 Marlborough St	Boston	1866
BOS.3103	Gardner, J. L. Estate	75 Marlborough St	Boston	1864
BOS.3116	Kirby, Charles House	76 Marlborough St	Boston	1866
BOS.3104	Gardner, J. L. Estate	77 Marlborough St	Boston	1864
BOS.3117	Kirby, Charles House	78 Marlborough St	Boston	1866
BOS.3105	Gardner, J. L. Estate	79 Marlborough St	Boston	1864

Inv. No.	Property Name	Street	Town	Year
BOS.3118	Kirby, Charles - Richards, Anna House	80 Marlborough St	Boston	1866
BOS.3106	Gardner, J. L. Estate	81 Marlborough St	Boston	1864
BOS.3119	Lawrence, James House	82 Marlborough St	Boston	1876
BOS.3107	Gardner, J. L. Estate	83 Marlborough St	Boston	1864
BOS.3108	Gardner, J. L. Estate	85 Marlborough St	Boston	1864
BOS.3120	Joy, Charles House	86 Marlborough St	Boston	1872
BOS.3109	Gardner, J. L. Estate	87 Marlborough St	Boston	1864
BOS.3121	Jackson, Susan House	88 Marlborough St	Boston	1872
BOS.3110	Rogers, J. C. House	89 Marlborough St	Boston	1867
BOS.3122	Winthrop, Cornelia House	90 Marlborough St	Boston	1872
BOS.3123	Wheatland, George House	92 Marlborough St	Boston	1870
BOS.3124	Flagg, Augustus House	101 Marlborough St	Boston	1872
BOS.3125	Hill, Catherine House	103 Marlborough St	Boston	1866
BOS.3142	Sise, Albert House	104 Marlborough St	Boston	1866
BOS.3126	Kirby, Charles House	105 Marlborough St	Boston	1871
BOS.3143	Ellis, Rufus House	106 Marlborough St	Boston	1868
BOS.3127	Brooks School	107 Marlborough St	Boston	1916
BOS.3144	Thomas, William House	108 Marlborough St	Boston	1870
BOS.3128	Standish, J. House	109 Marlborough St	Boston	1871
BOS.3145	Freeland, Charles House	110 Marlborough St	Boston	1868
BOS.3129	Standish, J. - Barnes, Clara House	111 Marlborough St	Boston	1872
BOS.3146	Freeland, Charles House	112 Marlborough St	Boston	1868
BOS.3130	Kirby, Charles House	113 Marlborough St	Boston	1872
BOS.3147	Freeland, Charles House	114 Marlborough St	Boston	1868
BOS.3131	Kirby, Charles House	115 Marlborough St	Boston	1872
BOS.3148	Freeland, Charles House	116 Marlborough St	Boston	1868
BOS.3132	Standish, J. House	117 Marlborough St	Boston	1873
BOS.3149	Freeland, Charles House	118 Marlborough St	Boston	1868
BOS.3133	Tobey, James House	119 Marlborough St	Boston	1873
BOS.3150	Freeland, Charles - Griswold, A. E. House	120 Marlborough St	Boston	1868
BOS.3134	Freeland, Charles House	121 Marlborough St	Boston	1877
BOS.3151	Freeland, Charles House	122 Marlborough St	Boston	1868
BOS.3135	Freeland, Charles House	123 Marlborough St	Boston	1877
BOS.3152	Freeland, Charles House	124 Marlborough St	Boston	1868
BOS.3136	Freeland, Charles House	125 Marlborough St	Boston	1877
BOS.3153	Freeland, Charles House	126 Marlborough St	Boston	1868
BOS.3137		127 Marlborough St	Boston	1937
BOS.3154	Freeland, Charles - Page, Susan House	128 Marlborough St	Boston	1868

Inv. No.	Property Name	Street	Town	Year
BOS.3138	Freeland, Charles House	129 Marlborough St	Boston	1879
BOS.3155	Freeland, Charles House	130 Marlborough St	Boston	1868
BOS.3139	Freeland, Charles House	131 Marlborough St	Boston	1880
BOS.3156	Farrington, John House	132 Marlborough St	Boston	1871
BOS.3140	Freeland, Charles House	133 Marlborough St	Boston	1880
BOS.3157	Farrington, John - Kimball, Nancy House	134 Marlborough St	Boston	1872
BOS.3141	Lee, Henry House	135 Marlborough St	Boston	1880
BOS.3158	Farrington, John House	136 Marlborough St	Boston	1872
BOS.3159	Nason, G. W. House	138 Marlborough St	Boston	1891
BOS.3160	Farrington, John House	140 Marlborough St	Boston	1872
BOS.3161	Farrington, John House	142 Marlborough St	Boston	1872
BOS.3162	Farrington, John House	144 Marlborough St	Boston	1872
BOS.3163	Farrington, John - Guild, Mary House	146 Marlborough St	Boston	1872
BOS.3164	Farrington, John House	148 Marlborough St	Boston	1872
BOS.3165	Cushing, T. F. - Endicott House	163-165 Marlborough St	Boston	1871
BOS.3182	Crowninshield House	164 Marlborough St	Boston	1870
BOS.3183	Jordan, Eben House	166 Marlborough St	Boston	1874
BOS.3166	Gordon, Charles House	167 Marlborough St	Boston	1878
BOS.3184	Jordan, Eben House	168 Marlborough St	Boston	1874
BOS.3167	Shaw, Parkman House	169 Marlborough St	Boston	1878
BOS.3185	Jordan, Eben House	170 Marlborough St	Boston	1874
BOS.3168	Upton, G. B. House	171 Marlborough St	Boston	1881
BOS.3186	Jordan, Eben House	172 Marlborough St	Boston	1874
BOS.3169	Upton, G. B. House	173 Marlborough St	Boston	1881
BOS.3187	Jordan, Eben House	174 Marlborough St	Boston	1876
BOS.3170	Merrill, Silas House	175 Marlborough St	Boston	1871
BOS.3188	Jordan, Eben - Ellis, Effie House	176 Marlborough St	Boston	1876
BOS.3171	Merrill, Silas - Gaston, William House	177 Marlborough St	Boston	1871
BOS.3189	Sullivan, R. House	178 Marlborough St	Boston	1879
BOS.3172	Curtis, H. G. House	179 Marlborough St	Boston	1881
BOS.3190		180 Marlborough St	Boston	1925
BOS.3173	Thorndike, J. S. House	181 Marlborough St	Boston	1881
BOS.3191	Chadwick and Stillings House	182 Marlborough St	Boston	1880
BOS.3174	Peabody, J. E. House	183 Marlborough St	Boston	1882
BOS.3192	Curtis, T. B. House	184 Marlborough St	Boston	1881
BOS.3175	Grew, Edward House	185 Marlborough St	Boston	1884
BOS.3193	Shapleigh, J. W. House	186 Marlborough St	Boston	1886
BOS.3194	Minot, James House	188 Marlborough St	Boston	1884

Inv. No.	Property Name	Street	Town	Year
BOS.3176	Porter, Henry House	189 Marlborough St	Boston	1906
BOS.3195	Sturgis, Russell House	190 Marlborough St	Boston	1881
BOS.3177	Dwight, Edward House	191 Marlborough St	Boston	1881
BOS.3196	Stillings, Samuel House	192 Marlborough St	Boston	1881
BOS.3178	Ames, S. T. House	193 Marlborough St	Boston	1882
BOS.3197	Stillings, Samuel House	194 Marlborough St	Boston	1881
BOS.3179	Chandler, F. W. House	195 Marlborough St	Boston	1883
BOS.3180	Bradley, R. S. House	197 Marlborough St	Boston	1891
BOS.3181		199 Marlborough St	Boston	1890
BOS.3219		220 Marlborough St	Boston	1892
BOS.3220		224 Marlborough St	Boston	1892
BOS.3198	Wheatland, George House	225 Marlborough St	Boston	1873
BOS.3221	Blake, C. J. House	226 Marlborough St	Boston	1881
BOS.3199	Wheatland, George House	227 Marlborough St	Boston	1873
BOS.3222	Whitney, W. F. House	228 Marlborough St	Boston	1879
BOS.3200	Wheatland, George House	229 Marlborough St	Boston	1873
BOS.3223	Ames, S. T. House	230 Marlborough St	Boston	1880
BOS.3201	Wheatland, George House	231 Marlborough St	Boston	1873
BOS.3224	Ames, S. T. House	232 Marlborough St	Boston	1880
BOS.3202	Wheatland, George House	233 Marlborough St	Boston	1874
BOS.3225	Ames, S. T. House	234 Marlborough St	Boston	1880
BOS.3203	Wheatland, George House	235 Marlborough St	Boston	1874
BOS.3226	Ames, S. T. - Osborn, Emily House	236 Marlborough St	Boston	1881
BOS.3204	Wheatland, George House	237 Marlborough St	Boston	1874
BOS.3227	Ames, S. T. House	238 Marlborough St	Boston	1881
BOS.3205	Wheatland, George House	239 Marlborough St	Boston	1874
BOS.3228	Ames, S. T. House	240 Marlborough St	Boston	1881
BOS.3206	Ames, S. T. House	241 Marlborough St	Boston	1884
BOS.3229	Ames, S. T. House	242 Marlborough St	Boston	1881
BOS.3230	Ames, S. T. House	244 Marlborough St	Boston	1882
BOS.3207	Minot, G. R. House	245 Marlborough St	Boston	1883
BOS.3231	Ames, S. T. House	246 Marlborough St	Boston	1883
BOS.3208	Bradlee, J. House	247 Marlborough St	Boston	1881
BOS.3232	Parker, Wilbur House	248 Marlborough St	Boston	1885
BOS.3209	Norcross, O. House	249 Marlborough St	Boston	1880
BOS.3210	Appleton, F. H. House	251 Marlborough St	Boston	1886
BOS.3233	Ames, S. T. House	252 Marlborough St	Boston	1885
BOS.3211	Curtis, J. F. House	253 Marlborough St	Boston	1883

Inv. No.	Property Name	Street	Town	Year
BOS.3234	Merrill, S. W. House	254 Marlborough St	Boston	1887
BOS.3212	Bradley, Robert House	255 Marlborough St	Boston	1883
BOS.3235	Merrill, S. W. House	256 Marlborough St	Boston	1887
BOS.3213	Simes, William House	257 Marlborough St	Boston	1883
BOS.3236	Merrill, S. W. House	258 Marlborough St	Boston	1887
BOS.3214	White, J. C. House	259 Marlborough St	Boston	1884
BOS.3215	Whitney, H. A. House	261 Marlborough St	Boston	1887
BOS.3237	Bartlett, W. S. House	272 Marlborough St	Boston	1883
BOS.3238	Wood, Charles House	274 Marlborough St	Boston	1879
BOS.3216	Binney, G. H. House	275 Marlborough St	Boston	1886
BOS.3239		276 Marlborough St	Boston	1930
BOS.3217	Pope, Fred House	277 Marlborough St	Boston	1873
BOS.3218	Pope, Fred House	279 Marlborough St	Boston	1873
BOS.3258	Gibson, G. M. House	282 Marlborough St	Boston	1872
BOS.3259	Gibson, G. M. House	284 Marlborough St	Boston	1872
BOS.3240	Pope, Fred - Reed, H. M. House	285 Marlborough St	Boston	1871
BOS.3260	Gibson, G. M. House	286 Marlborough St	Boston	1872
BOS.3241	Pope, Fred House	287 Marlborough St	Boston	1871
BOS.3261	Gibson, G. M. House	288 Marlborough St	Boston	1872
BOS.3242	Pope, Fred House	289 Marlborough St	Boston	1871
BOS.3262	Gibson, G. M. House	290 Marlborough St	Boston	1872
BOS.3243	Pope, Fred - Goddard, H. House	291 Marlborough St	Boston	1872
BOS.3263	Gibson, G. M. - Van Brunt, Henry House	292 Marlborough St	Boston	1872
BOS.3244	Pope, Fred House	293 Marlborough St	Boston	1872
BOS.3264	Ames, J. B. House	294 Marlborough St	Boston	1877
BOS.3245	Pope, Fred - Sleeper, M. House	295 Marlborough St	Boston	1872
BOS.3265	Ames, J. B. House	296 Marlborough St	Boston	1877
BOS.3246	Pope, Fred House	297 Marlborough St	Boston	1872
BOS.3266	Ames, S. T. House	298 Marlborough St	Boston	1878
BOS.3247	Pope, Fred House	299 Marlborough St	Boston	1872
BOS.3267	Ames, S. T. House	300 Marlborough St	Boston	1878
BOS.3248	Ames, J. B. House	301 Marlborough St	Boston	1877
BOS.3268	Beckler, D. W. House	302 Marlborough St	Boston	1878
BOS.3249	Ames, J. B. House	303 Marlborough St	Boston	1877
BOS.3269	Beckler, D. W. House	304 Marlborough St	Boston	1878
BOS.3270	Beckler, D. W. House	306 Marlborough St	Boston	1878
BOS.3271	Beckler, D. W. House	308 Marlborough St	Boston	1878
BOS.3250	Beckler, D. W. House	309 Marlborough St	Boston	1877

Inv. No.	Property Name	Street	Town	Year
BOS.3272	Beckler, D. W. - Skinner, F. House	310 Marlborough St	Boston	1878
BOS.3251	Beckler, D. W. House	311 Marlborough St	Boston	1877
BOS.3273	Perry, T. S. House	312 Marlborough St	Boston	1879
BOS.3252	Beckler, D. W. House	313 Marlborough St	Boston	1877
BOS.3274	Ames, S. T. House	314 Marlborough St	Boston	1879
BOS.3253	Beckler, D. W. House	315 Marlborough St	Boston	1877
BOS.3254	Beckler, D. W. House	317 Marlborough St	Boston	1874
BOS.3255	Beckler, D. W. House	319 Marlborough St	Boston	1874
BOS.3275	Ames, S. T. House	320 Marlborough St	Boston	1879
BOS.3256	Barney, Herbert House	321 Marlborough St	Boston	1873
BOS.3276	Sears, Willard Thomas House	322 Marlborough St	Boston	1872
BOS.3257	Barney, Herbert House	323 Marlborough St	Boston	1873
BOS.3288	Gerrish, Hiram House	334 Marlborough St	Boston	1872
BOS.3289	Ames, S. T. House	336 Marlborough St	Boston	1882
BOS.3277	Gerrish, Hiram - McIntire, J. House	337 Marlborough St	Boston	1872
BOS.3290	Whitwell, Henry S. House	338 Marlborough St	Boston	1877
BOS.3278	Gerrish, Hiram House	339 Marlborough St	Boston	1872
BOS.3291	Whitwell, H. S. House	340 Marlborough St	Boston	1876
BOS.3279	Gerrish, Hiram - Wales, Susan House	341 Marlborough St	Boston	1872
BOS.3292	Whitwell, H. S. House	342 Marlborough St	Boston	1876
BOS.3280	Gerrish, Hiram House	343 Marlborough St	Boston	1872
BOS.3293	Whitwell, H. S. House	344 Marlborough St	Boston	1877
BOS.3281	Gerrish, Hiram House	345 Marlborough St	Boston	1872
BOS.3294	Whitwell, H. S. House	346 Marlborough St	Boston	1877
BOS.3282	Gerrish, Hiram House	347 Marlborough St	Boston	1872
BOS.3295	Wheatland, George House	348 Marlborough St	Boston	1878
BOS.3283	Gerrish, Hiram House	349 Marlborough St	Boston	1872
BOS.3296	Wheatland, George House	350 Marlborough St	Boston	1878
BOS.3284	Gerrish, Hiram House	351 Marlborough St	Boston	1872
BOS.3297	Wheatland, George House	352 Marlborough St	Boston	1878
BOS.3285		353 Marlborough St	Boston	1959
BOS.3298	Wheatland, George House	354 Marlborough St	Boston	1879
BOS.3286	Gerrish, Hiram House	355 Marlborough St	Boston	1872
BOS.3299	Wheatland, George House	356 Marlborough St	Boston	1879
BOS.3287	Gerrish, Hiram House	357 Marlborough St	Boston	1872
BOS.3300	Wheatland, George House	358 Marlborough St	Boston	1879
BOS.3301	Wheatland, George House	360 Marlborough St	Boston	1879
BOS.3302	Wheatland, George House	362 Marlborough St	Boston	1879

Inv. No.	Property Name	Street	Town	Year
BOS.3303	Richardson, J. F. House	363 Marlborough St	Boston	1872
BOS.3327	Ames, S. T. House	364 Marlborough St	Boston	1879
BOS.3304	Richardson, S. House	365 Marlborough St	Boston	1887
BOS.3305	Wheatland, George House	369 Marlborough St	Boston	1879
BOS.3328	Williamson, W. House	370 Marlborough St	Boston	1880
BOS.3306	Wheatland, George - Russell, E. House	371 Marlborough St	Boston	1879
BOS.3329	Skinner, F. H. House	372 Marlborough St	Boston	1880
BOS.3307	Wheatland, George House	373 Marlborough St	Boston	1879
BOS.3330	Harding, A. E. House	374 Marlborough St	Boston	1880
BOS.3308	Wheatland, George - Odin, Annie House	375 Marlborough St	Boston	1880
BOS.3331	Sever, E. and A. House	376 Marlborough St	Boston	1880
BOS.3309	Wheatland, George - Osgood, Hannah House	377 Marlborough St	Boston	1880
BOS.3332	Jones, Frank House	378 Marlborough St	Boston	1880
BOS.3310	Wheatland, George House	379 Marlborough St	Boston	1880
BOS.3333	Sprague, Charles House	380 Marlborough St	Boston	1881
BOS.3311	Wheatland, George - Calef, A. House	381 Marlborough St	Boston	1880
BOS.3334	Hubbard, J. M. House	382 Marlborough St	Boston	1881
BOS.3312	Wheatland, George House	383 Marlborough St	Boston	1880
BOS.3335	Boardman, Mary House	384 Marlborough St	Boston	1881
BOS.3313	Wheatland, George House	385 Marlborough St	Boston	1880
BOS.3336	Hubbard, C. E. House	386 Marlborough St	Boston	1882
BOS.3314	Wheatland, George - Dexter, H. M. House	387 Marlborough St	Boston	1880
BOS.3337	Sears, A. P. House	388 Marlborough St	Boston	1885
BOS.3315	Wheatland, George House	389 Marlborough St	Boston	1880
BOS.3338	Shapleigh, J. House	390 Marlborough St	Boston	1885
BOS.3316	Wheatland, George House	391 Marlborough St	Boston	1880
BOS.3339	Shapleigh, J. House	392 Marlborough St	Boston	1885
BOS.3317	Shapleigh, John House	393 Marlborough St	Boston	1883
BOS.3340	Shapleigh, J. House	394 Marlborough St	Boston	1886
BOS.3318	Shapleigh, John House	395 Marlborough St	Boston	1883
BOS.3341	Davis, Sarah House	396 Marlborough St	Boston	1887
BOS.3319	Shapleigh, John House	397 Marlborough St	Boston	1883
BOS.3342	Crowninshield and Cabot House	398 Marlborough St	Boston	1887
BOS.3320	Rollins, W. H. House	399 Marlborough St	Boston	1884
BOS.3343	Crowninshield and Cabot House	400 Marlborough St	Boston	1887
BOS.3321	Simes, William House	401 Marlborough St	Boston	1885
BOS.3344	Crowninshield and Cabot House	402 Marlborough St	Boston	1887
BOS.3322	Tilton, Charles House	403 Marlborough St	Boston	1886

Inv. No.	Property Name	Street	Town	Year
BOS.3345	Cotting, Charles House	404 Marlborough St	Boston	1888
BOS.3323		405 Marlborough St	Boston	1889
BOS.3346	Dexter, Fred House	406 Marlborough St	Boston	1888
BOS.3324		407 Marlborough St	Boston	1889
BOS.3325		409 Marlborough St	Boston	1890
BOS.3326		411 Marlborough St	Boston	1890
BOS.3347	Marlborough, The	416 Marlborough St	Boston	1895
BOS.3348		421 Marlborough St	Boston	1889
BOS.3349		423 Marlborough St	Boston	1889
BOS.3369	Vinal, W. D. House	424 Marlborough St	Boston	1889
BOS.3350	Wheatland, George House	425 Marlborough St	Boston	1886
BOS.3370	Wheatland, George House	426 Marlborough St	Boston	1887
BOS.3351	Wheatland, George House	427 Marlborough St	Boston	1886
BOS.3371	Morse, A. H. House	428 Marlborough St	Boston	1886
BOS.3352	Wheatland, George House	429 Marlborough St	Boston	1886
BOS.3372	Wheatland, George House	430 Marlborough St	Boston	1885
BOS.3353	Chadwick and Stillings House	431 Marlborough St	Boston	1885
BOS.3373	Wheatland, George House	432 Marlborough St	Boston	1885
BOS.3354	Chadwick and Stillings House	433 Marlborough St	Boston	1885
BOS.3374	Wheatland, George House	434 Marlborough St	Boston	1885
BOS.3355	Chadwick and Stillings House	435 Marlborough St	Boston	1885
BOS.3375	Wheatland, George House	436 Marlborough St	Boston	1885
BOS.3356	Chadwick and Stillings House	437 Marlborough St	Boston	1885
BOS.3376	Wheatland, George House	438 Marlborough St	Boston	1885
BOS.3357	Chadwick and Stillings House	439 Marlborough St	Boston	1885
BOS.3377	Wheatland, George House	440 Marlborough St	Boston	1885
BOS.3358	Chadwick and Stillings House	441 Marlborough St	Boston	1885
BOS.3359	Chadwick and Stillings House	443 Marlborough St	Boston	1885
BOS.3360	Chadwick and Stillings House	445 Marlborough St	Boston	1885
BOS.3361	Parker, F. J. House	447 Marlborough St	Boston	1886
BOS.3362	Wheatland, George House	449 Marlborough St	Boston	1887
BOS.3363	Wheatland, George House	451 Marlborough St	Boston	1887
BOS.3364	Wheatland, George House	453 Marlborough St	Boston	1887
BOS.3365	Wheatland, George House	455 Marlborough St	Boston	1887
BOS.3366	Wheatland, George House	457 Marlborough St	Boston	1887
BOS.3367	Barnes, G. M. House	459 Marlborough St	Boston	1889
BOS.3368	Barnes, G. M. House - Hotel Charlesgate	463 Marlborough St	Boston	1889
BOS.9040	Harvard Bridge	Massachusetts Ave	Boston	r 1890

Friday, August 24, 2018

Page 35 of 42

Inv. No.	Property Name	Street	Town	Year
BOS.9473	Leonard, Tommy Bridge	Massachusetts Ave	Boston	1937
BOS.4068		7 Massachusetts Ave	Boston	1888
BOS.4069	Adams, Brooks House	29 Massachusetts Ave	Boston	1889
BOS.3784	Spiritualist Church	Newbury St	Boston	1884
BOS.3798	Mann, Horace School for the Deaf	Newbury St	Boston	1888
BOS.3799	Hollis Street Church	Newbury St	Boston	1883
BOS.3814	Normal Art School	Newbury St	Boston	1883
BOS.3683	Fox and Studley House	3 Newbury St	Boston	1864
BOS.3687	Kidder, Henry House	4 Newbury St	Boston	1870
BOS.3684	Ritz Hotel	5 Newbury St	Boston	1931
BOS.3688	Webster, John House	6 Newbury St	Boston	1866
BOS.3685	Fox and Studley House	7 Newbury St	Boston	1864
BOS.3689		8 Newbury St	Boston	1928
BOS.3686		9 Newbury St	Boston	1924
BOS.3690	Standish, James - French, Benjamin House	10 Newbury St	Boston	1865
BOS.3691	Kittredge, Clarisa House	11 Newbury St	Boston	1863
BOS.3700	Standish, James - Dodd, J. A. House	12 Newbury St	Boston	1865
BOS.3692	Emmanuel Church Sunday School	13 Newbury St	Boston	1937
BOS.3701	Weeks, Andrew House	14 Newbury St	Boston	1864
BOS.3693	Emmanuel Church - Lindsey, Leslie Chapel	15 Newbury St	Boston	1920
BOS.16713	Emmanuel Church	15 Newbury St	Boston	1861
BOS.3702	Kendall, Elizabeth House	16 Newbury St	Boston	1864
BOS.3703	Washburn, Miles House	18 Newbury St	Boston	1873
BOS.3704	Bean, Hiram House	20 Newbury St	Boston	1867
BOS.3705	Bean, Hiram House	22 Newbury St	Boston	1867
BOS.3706	Bean, Hiram House	24 Newbury St	Boston	1867
BOS.3707	Ball, J. D. House	26 Newbury St	Boston	1872
BOS.3708	Greenleaf, R. C. House	28 Newbury St	Boston	1870
BOS.3694	Erskine, J. House	29 Newbury St	Boston	1874
BOS.3709	Greenleaf, R. C. House	30 Newbury St	Boston	1870
BOS.3695	Crehore, Lucy House	31 Newbury St	Boston	1872
BOS.3710	Badger, Ann House	32 Newbury St	Boston	1871
BOS.3696	Avery, Alden House	33 Newbury St	Boston	1881
BOS.3711	Studley, E. A. House	34 Newbury St	Boston	1871
BOS.3697	Sinclair, A. D. House	35 Newbury St	Boston	1870
BOS.3712	Standish, James House	36 Newbury St	Boston	1869
BOS.3698	Sheaf, William House	37 Newbury St	Boston	1872
BOS.3713	Standish, James House	38 Newbury St	Boston	1869

Inv. No.	Property Name	Street	Town	Year
BOS.3699		39 Newbury St	Boston	1889
BOS.3714	Standish, James House	40 Newbury St	Boston	1869
BOS.3715	Standish, James House	42 Newbury St	Boston	1868
BOS.3716	Standish, James House	44 Newbury St	Boston	1868
BOS.3717	Standish, James House	46 Newbury St	Boston	1868
BOS.3718	Hotel Kempton	48 Newbury St	Boston	1869
BOS.3719	Church of the Covenant	67 Newbury St	Boston	1867
BOS.3720	Freeland, Charles House	69 Newbury St	Boston	1869
BOS.3721	Freeland, Charles House	71 Newbury St	Boston	1869
BOS.3722	Freeland, Charles House	73 Newbury St	Boston	1869
BOS.3723	Freeland, Charles House	75 Newbury St	Boston	1874
BOS.3724	Freeland, Charles House	77 Newbury St	Boston	1874
BOS.3725	Freeland, Charles House	79 Newbury St	Boston	1876
BOS.3726	Freeland, Charles House	81 Newbury St	Boston	1876
BOS.3727	Freeland, Charles House	83 Newbury St	Boston	1876
BOS.3728	Wilson, C. P. House	85 Newbury St	Boston	1876
BOS.3729	Jordan, Eben House	91 Newbury St	Boston	1872
BOS.3730	Jordan, Eben House	93 Newbury St	Boston	1872
BOS.3731	Jordan, Eben House	95 Newbury St	Boston	1872
BOS.3732	Jordan, Eben House	97 Newbury St	Boston	1872
BOS.3733	Lauriat, Charles House	99 Newbury St	Boston	1882
BOS.3734	Lauriat, Charles House	101 Newbury St	Boston	1882
BOS.3735	Richards, J. Avery House	103 Newbury St	Boston	1881
BOS.3736	Cummings, C. A. House	109 Newbury St	Boston	1871
BOS.3753	Standish, James House	110 Newbury St	Boston	1877
BOS.3754	Standish, James House	112 Newbury St	Boston	1876
BOS.3737	Shaw, George R. House	113 Newbury St	Boston	1883
BOS.3755	Farrington, J. House	114 Newbury St	Boston	1876
BOS.3738	Rand, William S. House	115 Newbury St	Boston	1887
BOS.3756	Tobey, J. W. House	116 Newbury St	Boston	1876
BOS.3739	Rand, William S. House	117 Newbury St	Boston	1887
BOS.3757	Tobey, J. W. House	118 Newbury St	Boston	1876
BOS.3740	Underwood, Charles House	119 Newbury St	Boston	1873
BOS.3758	Rand, William S. House	120 Newbury St	Boston	1886
BOS.3741	Palmer, S. G. House	121 Newbury St	Boston	1873
BOS.3759	Rand, William S. House	122 Newbury St	Boston	1886
BOS.3742	Morse, N. House	123 Newbury St	Boston	1873
BOS.3760	Rand, William S. House	124 Newbury St	Boston	1886

Inv. No.	Property Name	Street	Town	Year
BOS.3743	Moore, F. H. House	125 Newbury St	Boston	1873
BOS.3761	Rand, William S. House	126 Newbury St	Boston	1886
BOS.3744	Moore, F. H. House	127 Newbury St	Boston	1873
BOS.3762	Freeland, Charles House	128 Newbury St	Boston	1877
BOS.3745	Tobey, J. W. House	129 Newbury St	Boston	1877
BOS.3763	Freeland, Charles House	130 Newbury St	Boston	1877
BOS.3746	Tobey, J. W. House	131 Newbury St	Boston	1877
BOS.3764	Freeland, Charles House	132 Newbury St	Boston	1877
BOS.3747	Tobey, J. W. House	133 Newbury St	Boston	1877
BOS.3765	Freeland, Charles House	134 Newbury St	Boston	1877
BOS.3748	Rand, William S. House	135 Newbury St	Boston	1877
BOS.3766	Freeland, Charles House	136 Newbury St	Boston	1877
BOS.3749	Rand, William S. House	137 Newbury St	Boston	1877
BOS.3767	Avery, Alden House	138 Newbury St	Boston	1883
BOS.3750	Shapleigh, John House	139 Newbury St	Boston	1877
BOS.3768	Avery, Alden House	140 Newbury St	Boston	1883
BOS.3751	Caton, Asa House	141 Newbury St	Boston	1876
BOS.3752		143 Newbury St	Boston	1878
BOS.3769		149 Newbury St	Boston	1883
BOS.3785	Boston Bicycle Club	152 Newbury St	Boston	1884
BOS.3770	Whitwell, H. S. House	153 Newbury St	Boston	1876
BOS.3786		154 Newbury St	Boston	1889
BOS.3771	Whitwell, H. S. House	155 Newbury St	Boston	1876
BOS.3787		156 Newbury St	Boston	1889
BOS.3772		157 Newbury St	Boston	1888
BOS.3788		158 Newbury St	Boston	1889
BOS.3773		159 Newbury St	Boston	1888
BOS.3789		160 Newbury St	Boston	1888
BOS.3774		161 Newbury St	Boston	1888
BOS.3790	Merrill, Silas House	162 Newbury St	Boston	1884
BOS.3775	Pope, A. A. House	163 Newbury St	Boston	1886
BOS.3791	Merrill, Silas House	164 Newbury St	Boston	1884
BOS.3776	Hayward, S. G. House	165 Newbury St	Boston	1885
BOS.3792	Merrill, Silas House	166 Newbury St	Boston	1884
BOS.3777	Merrill, Silas House	167 Newbury St	Boston	1881
BOS.3793	Cushing, Ernest House	168 Newbury St	Boston	1880
BOS.3778	Merrill, Silas House	169 Newbury St	Boston	1881
BOS.3794	Cushing, Henry House	170 Newbury St	Boston	1881

Inv. No.	Property Name	Street	Town	Year
BOS.3779	Merrill, Silas House	171 Newbury St	Boston	1881
BOS.3795	Merrill, Silas House	172 Newbury St	Boston	1885
BOS.3780	Merrill, Silas House	173 Newbury St	Boston	1881
BOS.3796	Merrill, Silas House	174 Newbury St	Boston	1885
BOS.3781	Merrill, Silas House	175 Newbury St	Boston	1886
BOS.3797	Searle, C. P. House	176 Newbury St	Boston	1890
BOS.3782	Merrill, Silas House	177 Newbury St	Boston	1886
BOS.3783	Allen, R. H. House	179 Newbury St	Boston	1885
BOS.3800	Merrill, Silas House	205 Newbury St	Boston	1881
BOS.3815	Merrill, Silas House	206 Newbury St	Boston	1886
BOS.3801	Merrill, Silas House	207 Newbury St	Boston	1881
BOS.3816	Merrill, Silas House	208 Newbury St	Boston	1886
BOS.3802	Merrill, Silas House	209 Newbury St	Boston	1881
BOS.3817	Rand, William S. House	210 Newbury St	Boston	1885
BOS.3803	Merrill, Silas House	211 Newbury St	Boston	1880
BOS.3818	Rand, William S. House	212 Newbury St	Boston	1885
BOS.3804	Merrill, Silas House	213 Newbury St	Boston	1880
BOS.3819	Rand, William S. House	214 Newbury St	Boston	1885
BOS.3805	Merrill, Silas House	215 Newbury St	Boston	1880
BOS.3820	Rand, William S. House	216 Newbury St	Boston	1884
BOS.3806	Merrill, Silas House	217 Newbury St	Boston	1880
BOS.3821	Rand, William S. House	218 Newbury St	Boston	1884
BOS.3807	Merrill, Silas House	219 Newbury St	Boston	1880
BOS.3822	Shapleigh, J. House	220 Newbury St	Boston	1884
BOS.3808	Merrill, Silas House	221 Newbury St	Boston	1880
BOS.3823	Shapleigh, J. House	222 Newbury St	Boston	1884
BOS.3809	Merrill, Silas House	223 Newbury St	Boston	1880
BOS.3824	Rand, William S. House	224 Newbury St	Boston	1884
BOS.3810	Merrill, Silas House	225 Newbury St	Boston	1880
BOS.3825	Rand, William S. House	226 Newbury St	Boston	1884
BOS.3811	Merrill, Silas House	227 Newbury St	Boston	1879
BOS.3826	Chadwick and Stillings House	228 Newbury St	Boston	1882
BOS.3812	Merrill, Silas House	229 Newbury St	Boston	1879
BOS.3827	Chadwick and Stillings House	230 Newbury St	Boston	1882
BOS.3813	Merrill, Silas House	231 Newbury St	Boston	1879
BOS.3828	Chadwick and Stillings House	232 Newbury St	Boston	1882
BOS.3829	Chadwick and Stillings House	234 Newbury St	Boston	1882
BOS.3830	Merrill, S. W. House	236 Newbury St	Boston	1886

Inv. No.	Property Name	Street	Town	Year
BOS.3831	Merrill, S. W. House	238 Newbury St	Boston	1886
BOS.3832		240 Newbury St	Boston	1928
BOS.3850	Avery, Alden House	242 Newbury St	Boston	1880
BOS.3851	Avery, Alden House	244 Newbury St	Boston	1880
BOS.3833	Nash, W. C. House	245 Newbury St	Boston	1884
BOS.3852	Avery, Alden House	246 Newbury St	Boston	1884
BOS.3834	Webster, A. J. House	247 Newbury St	Boston	1884
BOS.3853	Avery, Alden House	248 Newbury St	Boston	1884
BOS.3835	Briggs, John House	249 Newbury St	Boston	1881
BOS.3854	Avery, Alden House	250 Newbury St	Boston	1884
BOS.3836	Briggs, John House	251 Newbury St	Boston	1881
BOS.3855	Avery, Alden House	252 Newbury St	Boston	1884
BOS.3837	Hall, Prescott House	253 Newbury St	Boston	1882
BOS.3856	Merrill, Silas House	254 Newbury St	Boston	1882
BOS.3838	Nash, Herbert House	255 Newbury St	Boston	1882
BOS.3857	Merrill, Silas House	256 Newbury St	Boston	1882
BOS.3839	Nash, Herbert House	257 Newbury St	Boston	1882
BOS.3858	Merrill, Silas House	258 Newbury St	Boston	1882
BOS.3840	Merrill, Silas House	259 Newbury St	Boston	1882
BOS.3859	Merrill, Silas House	260 Newbury St	Boston	1882
BOS.3841	Avery, Alden House	261 Newbury St	Boston	1881
BOS.3860	Merrill, Silas House	262 Newbury St	Boston	1882
BOS.3842	Avery, Alden House	263 Newbury St	Boston	1881
BOS.3861	Merrill, Silas House	264 Newbury St	Boston	1882
BOS.3843	Shapleigh, J. House	265 Newbury St	Boston	1884
BOS.3862	Merrill, Silas House	266 Newbury St	Boston	1882
BOS.3844	Lowe, A. T. House	267 Newbury St	Boston	1881
BOS.3863	Merrill, Silas House	268 Newbury St	Boston	1882
BOS.3845	Lewis, William House	269 Newbury St	Boston	1881
BOS.3864	Merrill, Silas House	270 Newbury St	Boston	1882
BOS.3846	Ames, S. T. House	271 Newbury St	Boston	1884
BOS.3865	Merrill, Silas House	272 Newbury St	Boston	1882
BOS.3847	Ames, S. T. House	273 Newbury St	Boston	1884
BOS.3866	Merrill, Silas House	274 Newbury St	Boston	1882
BOS.3848	Ames, S. T. House	275 Newbury St	Boston	1884
BOS.3867	Merrill, Silas House	276 Newbury St	Boston	1882
BOS.3868	Merrill, Silas House	278 Newbury St	Boston	1882
BOS.3849		279 Newbury St	Boston	1981

Inv. No.	Property Name	Street	Town	Year
BOS.3869	Merrill, Silas House	280 Newbury St	Boston	1882
BOS.3872	Coffin, U. F. House	281 Newbury St	Boston	1886
BOS.3870		282 Newbury St	Boston	1919
BOS.3873	Coffin, U. F. House	283 Newbury St	Boston	1886
BOS.3883		284 Newbury St	Boston	1975
BOS.3874	Coffin, U. F. House	285 Newbury St	Boston	1884
BOS.3884	Merrill, Silas House	286 Newbury St	Boston	1885
BOS.3875	Coffin, U. F. House	287 Newbury St	Boston	1884
BOS.3885	Merrill, Silas House	288 Newbury St	Boston	1885
BOS.3876	Coffin, U. F. House	289 Newbury St	Boston	1886
BOS.3886	Merrill, Silas House	290 Newbury St	Boston	1885
BOS.3877	Coffin, U. F. House	291 Newbury St	Boston	1886
BOS.3887	Merrill, Silas House	292 Newbury St	Boston	1885
BOS.3878	Post, Elizabeth House	293 Newbury St	Boston	1885
BOS.3888	Merrill, Silas House	294 Newbury St	Boston	1885
BOS.3879	Edwards, George House	295 Newbury St	Boston	1885
BOS.3889	Merrill, Silas House	296 Newbury St	Boston	1885
BOS.3880	Avery, Alden House	297 Newbury St	Boston	1889
BOS.3890	Merrill, Silas House	298 Newbury St	Boston	1886
BOS.3881	Avery, Alden House	299 Newbury St	Boston	1887
BOS.3891	Merrill, Silas House	300 Newbury St	Boston	1886
BOS.3882	Avery, Alden House	301 Newbury St	Boston	1887
BOS.3892	Merrill, Silas House	302 Newbury St	Boston	1886
BOS.3893	Chadwick and Stillings House	304 Newbury St	Boston	1888
BOS.3894	Chadwick and Stillings House	306 Newbury St	Boston	1888
BOS.3895	Chadwick and Stillings House	308 Newbury St	Boston	1888
BOS.3896	Horn, Edward B. House	314 Newbury St	Boston	1885
BOS.3897		316 Newbury St	Boston	1885
BOS.9013	Emancipation Group	Providence St	Boston	1879
BOS.9612	Emancipation Group Park	Providence St	Boston	r 1875
BOS.9613	Emancipation Group Park Granite Retaining Wall	Providence St	Boston	r 1925
BOS.2381	Park Square Building	1-59 Saint James Ave	Boston	1922
BOS.2382	Greyhound Bus Terminal	10 Saint James Ave	Boston	1949
BOS.13976		10 Saint James Ave	Boston	2000
BOS.2383	Copley Plaza Hotel	138-148 Saint James Ave	Boston	1911
BOS.2384	Peabody, Francis H. - Kidder, Henry P. Stables	13-19 Stanhope St	Boston	r 1870
BOS.2385	Leland, Amory Stable	21 Stanhope St	Boston	r 1870
BOS.2386	Minot, Charles Building	25-27 Stanhope St	Boston	r 1870

Inv. No.	Property Name	Street	Town	Year
BOS.2387		29 Stanhope St	Boston	r 1870
BOS.2388	Robbins, Royal E. Stable	31-33 Stanhope St	Boston	r 1870
BOS.2389	Andrews, Frank W. Stable	35 Stanhope St	Boston	r 1870
BOS.2390	Richard - Follett - Pfaff Stables	39-45 Stanhope St	Boston	1974
BOS.9042	Storrow, James J. Memorial Drive	Storrow Dr	Boston	c 1951
BOS.9043	Storrow Memorial Embankment	Storrow Dr	Boston	1931
BOS.9614	Statler Park	Stuart St	Boston	c 1919
BOS.9615	Statler Park - Statler Fountain	Stuart St	Boston	1930
BOS.2391	57 Park Plaza Hotel and Restaurant	196-200 Stuart St	Boston	1969
BOS.2392	Salada Tea Building	330 Stuart St	Boston	1916
BOS.2393	Pettingell - Andrews Building	372-378 Stuart St	Boston	1924
BOS.2394	U. S. Post Office - Back Bay Annex	390 Stuart St	Boston	1926
BOS.2395	University Club of Boston	420-432 Stuart St	Boston	1925
BOS.2396	New England Power Building	441 Stuart St	Boston	1936

APPENDIX F

LABORATORY DATA REPORTS



ANALYTICAL REPORT

Lab Number:	L1834432
Client:	Haley & Aldrich, Inc. 465 Medford Street, Suite 2200 Charlestown, MA 02129-1400
ATTN:	Peter Zawadzkas
Phone:	(617) 886-7335
Project Name:	1000 BOYLSTON ST.
Project Number:	129835-013
Report Date:	09/06/18

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NJ (MA935), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-17-00196).

Eight Walkup Drive, Westborough, MA 01581-1019
508-898-9220 (Fax) 508-898-9193 800-624-9220 - www.alphalab.com



Project Name: 1000 BOYLSTON ST.
Project Number: 129835-013

Lab Number: L1834432
Report Date: 09/06/18

Alpha Sample ID	Client ID	Matrix	Sample Location	Collection Date/Time	Receive Date
L1834432-01	HA14-3 (OW)	WATER	BOSTON, MA	08/30/18 08:30	08/30/18
L1834432-02	HA14-3 (OW)	WATER	BOSTON, MA	08/30/18 09:55	08/30/18
L1834432-03	HA14-3 (OW)	WATER	BOSTON, MA	08/30/18 12:30	08/30/18
L1834432-04	HA14-3 (OW)	WATER	BOSTON, MA	08/30/18 12:48	08/30/18

Project Name: 1000 BOYLSTON ST.
Project Number: 129835-013

Lab Number: L1834432
Report Date: 09/06/18

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

Project Name: 1000 BOYLSTON ST.
Project Number: 129835-013

Lab Number: L1834432
Report Date: 09/06/18

Case Narrative (continued)

Volatile Organics

The WG1153423-3 LCS recovery, associated with L1834432-01 (HA14-3 (OW)), is above the acceptance criteria for vinyl acetate (148%); however, the associated sample is non-detect to the RL for this target analyte. The results of the original analysis are reported.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Kelly Stenstrom

Title: Technical Director/Representative

Date: 09/06/18

ORGANICS

VOLATILES

Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**SAMPLE RESULTS**

Lab ID: L1834432-01
 Client ID: HA14-3 (OW)
 Sample Location: BOSTON, MA

Date Collected: 08/30/18 08:30
 Date Received: 08/30/18
 Field Prep: Not Specified

Sample Depth:

Matrix: Water
 Analytical Method: 128,624.1
 Analytical Date: 08/31/18 12:21
 Analyst: NK

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by GC/MS - Westborough Lab						
Methylene chloride	ND		ug/l	1.0	--	1
1,1-Dichloroethane	ND		ug/l	1.5	--	1
Chloroform	ND		ug/l	1.0	--	1
Carbon tetrachloride	ND		ug/l	1.0	--	1
1,2-Dichloropropane	ND		ug/l	3.5	--	1
Dibromochloromethane	ND		ug/l	1.0	--	1
1,1,2-Trichloroethane	ND		ug/l	1.5	--	1
2-Chloroethylvinyl ether	ND		ug/l	10	--	1
Tetrachloroethene	ND		ug/l	1.0	--	1
Chlorobenzene	ND		ug/l	3.5	--	1
Trichlorofluoromethane	ND		ug/l	5.0	--	1
1,2-Dichloroethane	ND		ug/l	1.5	--	1
1,1,1-Trichloroethane	ND		ug/l	2.0	--	1
Bromodichloromethane	ND		ug/l	1.0	--	1
trans-1,3-Dichloropropene	ND		ug/l	1.5	--	1
cis-1,3-Dichloropropene	ND		ug/l	1.5	--	1
1,3-Dichloropropene, Total	ND		ug/l	1.5	--	1
Bromoform	ND		ug/l	1.0	--	1
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	--	1
Benzene	ND		ug/l	1.0	--	1
Toluene	ND		ug/l	1.0	--	1
Ethylbenzene	ND		ug/l	1.0	--	1
Chloromethane	ND		ug/l	5.0	--	1
Bromomethane	ND		ug/l	5.0	--	1
Vinyl chloride	ND		ug/l	1.0	--	1
Chloroethane	ND		ug/l	2.0	--	1
1,1-Dichloroethene	ND		ug/l	1.0	--	1
trans-1,2-Dichloroethene	ND		ug/l	1.5	--	1



Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**SAMPLE RESULTS****Lab ID:** L1834432-01**Date Collected:** 08/30/18 08:30**Client ID:** HA14-3 (OW)**Date Received:** 08/30/18**Sample Location:** BOSTON, MA**Field Prep:** Not Specified**Sample Depth:**

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by GC/MS - Westborough Lab						
cis-1,2-Dichloroethene	ND		ug/l	1.0	--	1
Trichloroethene	ND		ug/l	1.0	--	1
1,2-Dichlorobenzene	ND		ug/l	5.0	--	1
1,3-Dichlorobenzene	ND		ug/l	5.0	--	1
1,4-Dichlorobenzene	ND		ug/l	5.0	--	1
p/m-Xylene	ND		ug/l	2.0	--	1
o-xylene	ND		ug/l	1.0	--	1
Xylenes, Total	ND		ug/l	1.0	--	1
Styrene	ND		ug/l	1.0	--	1
Acetone	ND		ug/l	10	--	1
Carbon disulfide	ND		ug/l	5.0	--	1
2-Butanone	ND		ug/l	10	--	1
Vinyl acetate	ND		ug/l	10	--	1
4-Methyl-2-pentanone	ND		ug/l	10	--	1
2-Hexanone	ND		ug/l	10	--	1
Acrolein	ND		ug/l	8.0	--	1
Acrylonitrile	ND		ug/l	10	--	1
Dibromomethane	ND		ug/l	1.0	--	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Pentafluorobenzene	94		60-140
Fluorobenzene	100		60-140
4-Bromofluorobenzene	96		60-140

Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Method Blank Analysis Batch Quality Control

Analytical Method: 128,624.1
 Analytical Date: 08/31/18 09:53
 Analyst: NK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1153423-4					
Methylene chloride	ND		ug/l	1.0	--
1,1-Dichloroethane	ND		ug/l	1.5	--
Chloroform	ND		ug/l	1.0	--
Carbon tetrachloride	ND		ug/l	1.0	--
1,2-Dichloropropane	ND		ug/l	3.5	--
Dibromochloromethane	ND		ug/l	1.0	--
1,1,2-Trichloroethane	ND		ug/l	1.5	--
2-Chloroethylvinyl ether	ND		ug/l	10	--
Tetrachloroethene	ND		ug/l	1.0	--
Chlorobenzene	ND		ug/l	3.5	--
Trichlorofluoromethane	ND		ug/l	5.0	--
1,2-Dichloroethane	ND		ug/l	1.5	--
1,1,1-Trichloroethane	ND		ug/l	2.0	--
Bromodichloromethane	ND		ug/l	1.0	--
trans-1,3-Dichloropropene	ND		ug/l	1.5	--
cis-1,3-Dichloropropene	ND		ug/l	1.5	--
1,3-Dichloropropene, Total	ND		ug/l	1.5	--
Bromoform	ND		ug/l	1.0	--
1,1,2,2-Tetrachloroethane	ND		ug/l	1.0	--
Benzene	ND		ug/l	1.0	--
Toluene	ND		ug/l	1.0	--
Ethylbenzene	ND		ug/l	1.0	--
Chloromethane	ND		ug/l	5.0	--
Bromomethane	ND		ug/l	5.0	--
Vinyl chloride	ND		ug/l	1.0	--
Chloroethane	ND		ug/l	2.0	--
1,1-Dichloroethene	ND		ug/l	1.0	--
trans-1,2-Dichloroethene	ND		ug/l	1.5	--
cis-1,2-Dichloroethene	ND		ug/l	1.0	--



Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Method Blank Analysis Batch Quality Control

Analytical Method: 128,624.1
 Analytical Date: 08/31/18 09:53
 Analyst: NK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1153423-4					
Trichloroethene	ND		ug/l	1.0	--
1,2-Dichlorobenzene	ND		ug/l	5.0	--
1,3-Dichlorobenzene	ND		ug/l	5.0	--
1,4-Dichlorobenzene	ND		ug/l	5.0	--
p/m-Xylene	ND		ug/l	2.0	--
o-xylene	ND		ug/l	1.0	--
Xylenes, Total	ND		ug/l	1.0	--
Styrene	ND		ug/l	1.0	--
Acetone	ND		ug/l	10	--
Carbon disulfide	ND		ug/l	5.0	--
2-Butanone	ND		ug/l	10	--
Vinyl acetate	ND		ug/l	10	--
4-Methyl-2-pentanone	ND		ug/l	10	--
2-Hexanone	ND		ug/l	10	--
Acrolein	ND		ug/l	8.0	--
Acrylonitrile	ND		ug/l	10	--
Dibromomethane	ND		ug/l	1.0	--

Surrogate	%Recovery	Qualifier	Acceptance Criteria
Pentafluorobenzene	98		60-140
Fluorobenzene	101		60-140
4-Bromofluorobenzene	92		60-140



Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1153423-3								
Methylene chloride	100		-		60-140	-		28
1,1-Dichloroethane	95		-		50-150	-		49
Chloroform	110		-		70-135	-		54
Carbon tetrachloride	115		-		70-130	-		41
1,2-Dichloropropane	110		-		35-165	-		55
Dibromochloromethane	100		-		70-135	-		50
1,1,2-Trichloroethane	90		-		70-130	-		45
2-Chloroethylvinyl ether	80		-		1-225	-		71
Tetrachloroethene	100		-		70-130	-		39
Chlorobenzene	95		-		65-135	-		53
Trichlorofluoromethane	110		-		50-150	-		84
1,2-Dichloroethane	110		-		70-130	-		49
1,1,1-Trichloroethane	110		-		70-130	-		36
Bromodichloromethane	110		-		65-135	-		56
trans-1,3-Dichloropropene	90		-		50-150	-		86
cis-1,3-Dichloropropene	100		-		25-175	-		58
Bromoform	90		-		70-130	-		42
1,1,2,2-Tetrachloroethane	80		-		60-140	-		61
Benzene	110		-		65-135	-		61
Toluene	105		-		70-130	-		41
Ethylbenzene	105		-		60-140	-		63
Chloromethane	90		-		1-205	-		60
Bromomethane	39		-		15-185	-		61

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Project Number: 129835-013

Lab Number: L1834432

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1153423-3								
Vinyl chloride	115		-		5-195	-		66
Chloroethane	100		-		40-160	-		78
1,1-Dichloroethene	100		-		50-150	-		32
trans-1,2-Dichloroethene	100		-		70-130	-		45
cis-1,2-Dichloroethene	100		-		60-140	-		30
Trichloroethene	95		-		65-135	-		48
1,2-Dichlorobenzene	85		-		65-135	-		57
1,3-Dichlorobenzene	85		-		70-130	-		43
1,4-Dichlorobenzene	90		-		65-135	-		57
p/m-Xylene	102		-		60-140	-		30
o-xylene	95		-		60-140	-		30
Styrene	85		-		60-140	-		30
Acetone	106		-		40-160	-		30
Carbon disulfide	100		-		60-140	-		30
2-Butanone	114		-		60-140	-		30
Vinyl acetate	148	Q	-		60-140	-		30
4-Methyl-2-pentanone	112		-		60-140	-		30
2-Hexanone	120		-		60-140	-		30
Acrolein	92		-		60-140	-		30
Acrylonitrile	105		-		60-140	-		60
Dibromomethane	95		-		70-130	-		30

Lab Control Sample Analysis**Batch Quality Control****Project Name:** 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
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Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1153423-3

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
Pentafluorobenzene	101				60-140
Fluorobenzene	104				60-140
4-Bromofluorobenzene	92				60-140

SEMIVOLATILES

Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**SAMPLE RESULTS**

Lab ID: L1834432-03

Date Collected: 08/30/18 12:30

Client ID: HA14-3 (OW)

Date Received: 08/30/18

Sample Location: BOSTON, MA

Field Prep: Not Specified

Sample Depth:

Matrix: Water

Extraction Method: EPA 625.1

Analytical Method: 129,625.1

Extraction Date: 09/02/18 12:14

Analytical Date: 09/04/18 12:54

Analyst: SZ

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Semivolatile Organics by GC/MS - Westborough Lab						
Acenaphthene	ND		ug/l	2.0	--	1
Benzidine ¹	ND		ug/l	20	--	1
1,2,4-Trichlorobenzene	ND		ug/l	5.0	--	1
Hexachlorobenzene	ND		ug/l	2.0	--	1
Bis(2-chloroethyl)ether	ND		ug/l	2.0	--	1
2-Chloronaphthalene	ND		ug/l	2.0	--	1
3,3'-Dichlorobenzidine	ND		ug/l	5.0	--	1
2,4-Dinitrotoluene	ND		ug/l	5.0	--	1
2,6-Dinitrotoluene	ND		ug/l	5.0	--	1
Azobenzene ¹	ND		ug/l	2.0	--	1
Fluoranthene	ND		ug/l	2.0	--	1
4-Chlorophenyl phenyl ether	ND		ug/l	2.0	--	1
4-Bromophenyl phenyl ether	ND		ug/l	2.0	--	1
Bis(2-chloroisopropyl)ether	ND		ug/l	2.0	--	1
Bis(2-chloroethoxy)methane	ND		ug/l	5.0	--	1
Hexachlorobutadiene	ND		ug/l	2.0	--	1
Hexachlorocyclopentadiene ¹	ND		ug/l	10	--	1
Hexachloroethane	ND		ug/l	2.0	--	1
Isophorone	ND		ug/l	5.0	--	1
Naphthalene	ND		ug/l	2.0	--	1
Nitrobenzene	ND		ug/l	2.0	--	1
NDPA/DPA ¹	ND		ug/l	2.0	--	1
n-Nitrosodi-n-propylamine	ND		ug/l	5.0	--	1
Bis(2-ethylhexyl)phthalate	ND		ug/l	2.2	--	1
Butyl benzyl phthalate	ND		ug/l	5.0	--	1
Di-n-butylphthalate	ND		ug/l	5.0	--	1
Di-n-octylphthalate	ND		ug/l	5.0	--	1
Diethyl phthalate	ND		ug/l	5.0	--	1



Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**SAMPLE RESULTS****Lab ID:** L1834432-03**Date Collected:** 08/30/18 12:30**Client ID:** HA14-3 (OW)**Date Received:** 08/30/18**Sample Location:** BOSTON, MA**Field Prep:** Not Specified**Sample Depth:**

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Semivolatile Organics by GC/MS - Westborough Lab						
Dimethyl phthalate	ND		ug/l	5.0	--	1
Benzo(a)anthracene	ND		ug/l	2.0	--	1
Benzo(a)pyrene	ND		ug/l	2.0	--	1
Benzo(b)fluoranthene	ND		ug/l	2.0	--	1
Benzo(k)fluoranthene	ND		ug/l	2.0	--	1
Chrysene	ND		ug/l	2.0	--	1
Acenaphthylene	ND		ug/l	2.0	--	1
Anthracene	ND		ug/l	2.0	--	1
Benzo(ghi)perylene	ND		ug/l	2.0	--	1
Fluorene	ND		ug/l	2.0	--	1
Phenanthrene	ND		ug/l	2.0	--	1
Dibenzo(a,h)anthracene	ND		ug/l	2.0	--	1
Indeno(1,2,3-cd)pyrene	ND		ug/l	2.0	--	1
Pyrene	ND		ug/l	2.0	--	1
n-Nitrosodimethylamine ¹	ND		ug/l	2.0	--	1
2,4,6-Trichlorophenol	ND		ug/l	5.0	--	1
p-Chloro-m-cresol ¹	ND		ug/l	2.0	--	1
2-Chlorophenol	ND		ug/l	2.0	--	1
2,4-Dichlorophenol	ND		ug/l	5.0	--	1
2,4-Dimethylphenol	ND		ug/l	5.0	--	1
2-Nitrophenol	ND		ug/l	5.0	--	1
4-Nitrophenol	ND		ug/l	10	--	1
2,4-Dinitrophenol	ND		ug/l	20	--	1
4,6-Dinitro-o-cresol	ND		ug/l	10	--	1
Pentachlorophenol	ND		ug/l	5.0	--	1
Phenol	ND		ug/l	5.0	--	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2-Fluorophenol	57		25-87
Phenol-d6	36		16-65
Nitrobenzene-d5	83		42-122
2-Fluorobiphenyl	78		46-121
2,4,6-Tribromophenol	80		45-128
4-Terphenyl-d14	88		47-138



Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Method Blank Analysis Batch Quality Control

Analytical Method: 129,625.1
 Analytical Date: 09/04/18 11:25
 Analyst: CB

Extraction Method: EPA 625.1
 Extraction Date: 09/02/18 12:14

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 03 Batch: WG1153072-1					
Acenaphthene	ND		ug/l	2.0	--
Benzidine ¹	ND		ug/l	20	--
1,2,4-Trichlorobenzene	ND		ug/l	5.0	--
Hexachlorobenzene	ND		ug/l	2.0	--
Bis(2-chloroethyl)ether	ND		ug/l	2.0	--
2-Chloronaphthalene	ND		ug/l	2.0	--
3,3'-Dichlorobenzidine	ND		ug/l	5.0	--
2,4-Dinitrotoluene	ND		ug/l	5.0	--
2,6-Dinitrotoluene	ND		ug/l	5.0	--
Azobenzene ¹	ND		ug/l	2.0	--
Fluoranthene	ND		ug/l	2.0	--
4-Chlorophenyl phenyl ether	ND		ug/l	2.0	--
4-Bromophenyl phenyl ether	ND		ug/l	2.0	--
Bis(2-chloroisopropyl)ether	ND		ug/l	2.0	--
Bis(2-chloroethoxy)methane	ND		ug/l	5.0	--
Hexachlorobutadiene	ND		ug/l	2.0	--
Hexachlorocyclopentadiene ¹	ND		ug/l	10	--
Hexachloroethane	ND		ug/l	2.0	--
Isophorone	ND		ug/l	5.0	--
Naphthalene	ND		ug/l	2.0	--
Nitrobenzene	ND		ug/l	2.0	--
NDPA/DPA ¹	ND		ug/l	2.0	--
n-Nitrosodi-n-propylamine	ND		ug/l	5.0	--
Bis(2-ethylhexyl)phthalate	ND		ug/l	2.2	--
Butyl benzyl phthalate	ND		ug/l	5.0	--
Di-n-butylphthalate	ND		ug/l	5.0	--
Di-n-octylphthalate	ND		ug/l	5.0	--
Diethyl phthalate	ND		ug/l	5.0	--
Dimethyl phthalate	ND		ug/l	5.0	--



Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Method Blank Analysis Batch Quality Control

Analytical Method: 129,625.1
 Analytical Date: 09/04/18 11:25
 Analyst: CB

Extraction Method: EPA 625.1
 Extraction Date: 09/02/18 12:14

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 03 Batch: WG1153072-1					
Benzo(a)anthracene	ND		ug/l	2.0	--
Benzo(a)pyrene	ND		ug/l	2.0	--
Benzo(b)fluoranthene	ND		ug/l	2.0	--
Benzo(k)fluoranthene	ND		ug/l	2.0	--
Chrysene	ND		ug/l	2.0	--
Acenaphthylene	ND		ug/l	2.0	--
Anthracene	ND		ug/l	2.0	--
Benzo(ghi)perylene	ND		ug/l	2.0	--
Fluorene	ND		ug/l	2.0	--
Phenanthrene	ND		ug/l	2.0	--
Dibenzo(a,h)anthracene	ND		ug/l	2.0	--
Indeno(1,2,3-cd)pyrene	ND		ug/l	2.0	--
Pyrene	ND		ug/l	2.0	--
n-Nitrosodimethylamine ¹	ND		ug/l	2.0	--
2,4,6-Trichlorophenol	ND		ug/l	5.0	--
p-Chloro-m-cresol ¹	ND		ug/l	2.0	--
2-Chlorophenol	ND		ug/l	2.0	--
2,4-Dichlorophenol	ND		ug/l	5.0	--
2,4-Dimethylphenol	ND		ug/l	5.0	--
2-Nitrophenol	ND		ug/l	5.0	--
4-Nitrophenol	ND		ug/l	10	--
2,4-Dinitrophenol	ND		ug/l	20	--
4,6-Dinitro-o-cresol	ND		ug/l	10	--
Pentachlorophenol	ND		ug/l	5.0	--
Phenol	ND		ug/l	5.0	--

Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**Method Blank Analysis**
Batch Quality ControlAnalytical Method: 129,625.1
Analytical Date: 09/04/18 11:25
Analyst: CBExtraction Method: EPA 625.1
Extraction Date: 09/02/18 12:14

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 03 Batch: WG1153072-1					

Surrogate	%Recovery	Qualifier	Acceptance Criteria
2-Fluorophenol	49		25-87
Phenol-d6	33		16-65
Nitrobenzene-d5	73		42-122
2-Fluorobiphenyl	68		46-121
2,4,6-Tribromophenol	62		45-128
4-Terphenyl-d14	86		47-138

Lab Control Sample Analysis Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Project Number: 129835-013

Lab Number: L1834432

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 03 Batch: WG1153072-2								
Acenaphthene	83		-		60-132	-		30
Benzidine ¹	37		-		0-70	-		30
1,2,4-Trichlorobenzene	74		-		57-130	-		30
Hexachlorobenzene	76		-		8-142	-		30
Bis(2-chloroethyl)ether	82		-		43-126	-		30
2-Chloronaphthalene	77		-		65-120	-		30
3,3'-Dichlorobenzidine	38		-		8-213	-		30
2,4-Dinitrotoluene	94		-		48-127	-		30
2,6-Dinitrotoluene	85		-		68-137	-		30
Azobenzene ¹	94		-		44-115	-		30
Fluoranthene	94		-		43-121	-		30
4-Chlorophenyl phenyl ether	83		-		38-145	-		30
4-Bromophenyl phenyl ether	81		-		65-120	-		30
Bis(2-chloroisopropyl)ether	90		-		63-139	-		30
Bis(2-chloroethoxy)methane	88		-		49-165	-		30
Hexachlorobutadiene	68		-		38-120	-		30
Hexachlorocyclopentadiene ¹	62		-		7-118	-		30
Hexachloroethane	71		-		55-120	-		30
Isophorone	93		-		47-180	-		30
Naphthalene	76		-		36-120	-		30
Nitrobenzene	88		-		54-158	-		30
NDPA/DPA ¹	86		-		45-112	-		30
n-Nitrosodi-n-propylamine	94		-		14-198	-		30

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Project Number: 129835-013

Lab Number: L1834432

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 03 Batch: WG1153072-2								
Bis(2-ethylhexyl)phthalate	93		-		29-137	-		30
Butyl benzyl phthalate	98		-		1-140	-		30
Di-n-butylphthalate	93		-		8-120	-		30
Di-n-octylphthalate	101		-		19-132	-		30
Diethyl phthalate	88		-		1-120	-		30
Dimethyl phthalate	83		-		1-120	-		30
Benzo(a)anthracene	89		-		42-133	-		30
Benzo(a)pyrene	97		-		32-148	-		30
Benzo(b)fluoranthene	96		-		42-140	-		30
Benzo(k)fluoranthene	88		-		25-146	-		30
Chrysene	86		-		44-140	-		30
Acenaphthylene	80		-		54-126	-		30
Anthracene	91		-		43-120	-		30
Benzo(ghi)perylene	90		-		1-195	-		30
Fluorene	83		-		70-120	-		30
Phenanthrene	86		-		65-120	-		30
Dibenzo(a,h)anthracene	90		-		1-200	-		30
Indeno(1,2,3-cd)pyrene	89		-		1-151	-		30
Pyrene	90		-		70-120	-		30
n-Nitrosodimethylamine ¹	54		-		15-68	-		30
2,4,6-Trichlorophenol	86		-		52-129	-		30
p-Chloro-m-cresol ¹	97		-		68-130	-		30
2-Chlorophenol	83		-		36-120	-		30

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Project Number: 129835-013

Lab Number: L1834432

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 03 Batch: WG1153072-2								
2,4-Dichlorophenol	83		-		53-122	-		30
2,4-Dimethylphenol	97		-		42-120	-		30
2-Nitrophenol	82		-		45-167	-		30
4-Nitrophenol	63		-		13-129	-		30
2,4-Dinitrophenol	80		-		1-173	-		30
4,6-Dinitro-o-cresol	84		-		56-130	-		30
Pentachlorophenol	77		-		38-152	-		30
Phenol	41		-		17-120	-		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
2-Fluorophenol	57				25-87
Phenol-d6	40				16-65
Nitrobenzene-d5	86				42-122
2-Fluorobiphenyl	75				46-121
2,4,6-Tribromophenol	77				45-128
4-Terphenyl-d14	84				47-138

PETROLEUM HYDROCARBONS

Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**SAMPLE RESULTS**

Lab ID: L1834432-02

Client ID: HA14-3 (OW)

Sample Location: BOSTON, MA

Date Collected: 08/30/18 09:55

Date Received: 08/30/18

Field Prep: Not Specified

Sample Depth:

Matrix: Water

Analytical Method: 98,EPH-04-1.1

Analytical Date: 09/05/18 01:51

Analyst: MEO

Extraction Method: EPA 3510C

Extraction Date: 09/01/18 15:39

Cleanup Method1: EPH-04-1

Cleanup Date1: 09/03/18

Quality Control Information

Condition of sample received:

Satisfactory

Aqueous Preservative:

Laboratory Provided Preserved
Container

Sample Temperature upon receipt:

Received on Ice

Sample Extraction method:

Extracted Per the Method

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
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Extractable Petroleum Hydrocarbons - Westborough Lab

C9-C18 Aliphatics	ND		ug/l	100	--	1
C19-C36 Aliphatics	ND		ug/l	100	--	1
C11-C22 Aromatics	ND		ug/l	100	--	1
C11-C22 Aromatics, Adjusted	ND		ug/l	100	--	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Chloro-Octadecane	55		40-140
o-Terphenyl	66		40-140
2-Fluorobiphenyl	74		40-140
2-Bromonaphthalene	67		40-140



Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Method Blank Analysis Batch Quality Control

Analytical Method: 98,EPH-04-1.1

Analytical Date: 09/04/18 22:40

Analyst: MEO

Extraction Method: EPA 3510C

Extraction Date: 08/31/18 16:56

Cleanup Method: EPH-04-1

Cleanup Date: 09/03/18

Parameter	Result	Qualifier	Units	RL	MDL
Extractable Petroleum Hydrocarbons - Westborough Lab for sample(s): 02 Batch: WG1152772-1					
C9-C18 Aliphatics	ND		ug/l	100	--
C19-C36 Aliphatics	ND		ug/l	100	--
C11-C22 Aromatics	ND		ug/l	100	--
C11-C22 Aromatics, Adjusted	ND		ug/l	100	--

Surrogate	%Recovery	Qualifier	Acceptance Criteria
Chloro-Octadecane	60		40-140
o-Terphenyl	59		40-140
2-Fluorobiphenyl	64		40-140
2-Bromonaphthalene	59		40-140

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Project Number: 129835-013

Lab Number: L1834432

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Extractable Petroleum Hydrocarbons - Westborough Lab Associated sample(s): 02 Batch: WG1152772-2 WG1152772-3								
C9-C18 Aliphatics	66		74		40-140	11		25
C19-C36 Aliphatics	82		85		40-140	4		25
C11-C22 Aromatics	90		89		40-140	1		25
Naphthalene	70		69		40-140	1		25
2-Methylnaphthalene	73		72		40-140	1		25
Acenaphthylene	80		79		40-140	1		25
Acenaphthene	80		80		40-140	0		25
Fluorene	85		84		40-140	1		25
Phenanthrene	90		88		40-140	2		25
Anthracene	91		89		40-140	2		25
Fluoranthene	94		93		40-140	1		25
Pyrene	96		94		40-140	2		25
Benzo(a)anthracene	94		92		40-140	2		25
Chrysene	94		92		40-140	2		25
Benzo(b)fluoranthene	96		94		40-140	2		25
Benzo(k)fluoranthene	93		91		40-140	2		25
Benzo(a)pyrene	92		90		40-140	2		25
Indeno(1,2,3-cd)Pyrene	90		90		40-140	0		25
Dibenzo(a,h)anthracene	88		91		40-140	3		25
Benzo(ghi)perylene	85		85		40-140	0		25
Nonane (C9)	42		49		30-140	15		25
Decane (C10)	50		58		40-140	15		25
Dodecane (C12)	61		70		40-140	14		25

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Extractable Petroleum Hydrocarbons - Westborough Lab Associated sample(s): 02 Batch: WG1152772-2 WG1152772-3								
Tetradecane (C14)	67		75		40-140	11		25
Hexadecane (C16)	72		78		40-140	8		25
Octadecane (C18)	78		81		40-140	4		25
Nonadecane (C19)	79		82		40-140	4		25
Eicosane (C20)	82		83		40-140	1		25
Docosane (C22)	82		83		40-140	1		25
Tetracosane (C24)	81		83		40-140	2		25
Hexacosane (C26)	81		83		40-140	2		25
Octacosane (C28)	81		83		40-140	2		25
triacontane (C30)	80		82		40-140	2		25
Hexatriacontane (C36)	78		80		40-140	3		25

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
Chloro-Octadecane	67		68		40-140
o-Terphenyl	72		71		40-140
2-Fluorobiphenyl	80		70		40-140
2-Bromonaphthalene	74		64		40-140
% Naphthalene Breakthrough	0		0		
% 2-Methylnaphthalene Breakthrough	0		0		

PCBS

Project Name: 1000 BOYLSTON ST.
Project Number: 129835-013

Lab Number: L1834432
Report Date: 09/06/18

SAMPLE RESULTS

Lab ID: L1834432-03
Client ID: HA14-3 (OW)
Sample Location: BOSTON, MA

Date Collected: 08/30/18 12:30
Date Received: 08/30/18
Field Prep: Not Specified

Sample Depth:

Matrix: Water
Analytical Method: 127,608.3
Analytical Date: 09/04/18 10:50
Analyst: WR

Extraction Method: EPA 608.3
Extraction Date: 09/02/18 09:32
Cleanup Method: EPA 3665A
Cleanup Date: 09/02/18
Cleanup Method: EPA 3660B
Cleanup Date: 09/02/18

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Column
Polychlorinated Biphenyls by GC - Westborough Lab							
Aroclor 1016	ND		ug/l	0.250	--	1	A
Aroclor 1221	ND		ug/l	0.250	--	1	A
Aroclor 1232	ND		ug/l	0.250	--	1	A
Aroclor 1242	ND		ug/l	0.250	--	1	A
Aroclor 1248	ND		ug/l	0.250	--	1	A
Aroclor 1254	ND		ug/l	0.250	--	1	A
Aroclor 1260	ND		ug/l	0.200	--	1	A

Surrogate	% Recovery	Qualifier	Acceptance Criteria	Column
2,4,5,6-Tetrachloro-m-xylene	90		37-123	B
Decachlorobiphenyl	88		38-114	B
2,4,5,6-Tetrachloro-m-xylene	94		37-123	A
Decachlorobiphenyl	77		38-114	A

Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Method Blank Analysis Batch Quality Control

Analytical Method: 127,608.3
 Analytical Date: 09/04/18 13:06
 Analyst: WR

Extraction Method: EPA 608.3
 Extraction Date: 09/02/18 09:32
 Cleanup Method: EPA 3665A
 Cleanup Date: 09/02/18
 Cleanup Method: EPA 3660B
 Cleanup Date: 09/02/18

Parameter	Result	Qualifier	Units	RL	MDL	Column
Polychlorinated Biphenyls by GC - Westborough Lab for sample(s): 03 Batch: WG1153056-1						
Aroclor 1016	ND		ug/l	0.250	--	A
Aroclor 1221	ND		ug/l	0.250	--	A
Aroclor 1232	ND		ug/l	0.250	--	A
Aroclor 1242	ND		ug/l	0.250	--	A
Aroclor 1248	ND		ug/l	0.250	--	A
Aroclor 1254	ND		ug/l	0.250	--	A
Aroclor 1260	ND		ug/l	0.200	--	A

Surrogate	%Recovery	Qualifier	Acceptance Criteria	Column
2,4,5,6-Tetrachloro-m-xylene	91		37-123	B
Decachlorobiphenyl	85		38-114	B
2,4,5,6-Tetrachloro-m-xylene	93		37-123	A
Decachlorobiphenyl	84		38-114	A

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits	Column
Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 03 Batch: WG1153056-2									
Aroclor 1016	93		-		50-140	-		36	A
Aroclor 1260	93		-		8-140	-		38	A

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria	Column
2,4,5,6-Tetrachloro-m-xylene	80				37-123	B
Decachlorobiphenyl	88				38-114	B
2,4,5,6-Tetrachloro-m-xylene	86				37-123	A
Decachlorobiphenyl	91				38-114	A

PESTICIDES

Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**SAMPLE RESULTS**

Lab ID: L1834432-03

Date Collected: 08/30/18 12:30

Client ID: HA14-3 (OW)

Date Received: 08/30/18

Sample Location: BOSTON, MA

Field Prep: Not Specified

Sample Depth:

Matrix: Water

Extraction Method: EPA 608.3

Analytical Method: 127,608.3

Extraction Date: 09/02/18 10:54

Analytical Date: 09/04/18 15:38

Cleanup Method: EPA 3620B

Analyst: SL

Cleanup Date: 09/02/18

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Column
Organochlorine Pesticides by GC - Westborough Lab							
Delta-BHC	ND		ug/l	0.020	--	1	A
Lindane	ND		ug/l	0.020	--	1	A
Alpha-BHC	ND		ug/l	0.020	--	1	A
Beta-BHC	ND		ug/l	0.020	--	1	A
Heptachlor	ND		ug/l	0.020	--	1	A
Aldrin	ND		ug/l	0.020	--	1	A
Heptachlor epoxide	ND		ug/l	0.020	--	1	A
Endrin	ND		ug/l	0.040	--	1	A
Endrin aldehyde	ND		ug/l	0.040	--	1	A
Endrin ketone ¹	ND		ug/l	0.040	--	1	A
Dieldrin	ND		ug/l	0.040	--	1	A
4,4'-DDE	ND		ug/l	0.040	--	1	A
4,4'-DDD	ND		ug/l	0.040	--	1	B
4,4'-DDT	ND		ug/l	0.040	--	1	A
Endosulfan I	ND		ug/l	0.020	--	1	A
Endosulfan II	ND		ug/l	0.040	--	1	A
Endosulfan sulfate	ND		ug/l	0.040	--	1	A
Methoxychlor ¹	ND		ug/l	0.100	--	1	A
Toxaphene	ND		ug/l	0.400	--	1	A
Chlordane	ND		ug/l	0.200	--	1	A
cis-Chlordane ¹	ND		ug/l	0.020	--	1	A
trans-Chlordane ¹	ND		ug/l	0.020	--	1	A

Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**SAMPLE RESULTS**

Lab ID: L1834432-03

Date Collected: 08/30/18 12:30

Client ID: HA14-3 (OW)

Date Received: 08/30/18

Sample Location: BOSTON, MA

Field Prep: Not Specified

Sample Depth:

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Column
Organochlorine Pesticides by GC - Westborough Lab							

Surrogate	% Recovery	Qualifier	Acceptance Criteria	Column
2,4,5,6-Tetrachloro-m-xylene	84		47-124	A
Decachlorobiphenyl	109		32-167	A
2,4,5,6-Tetrachloro-m-xylene	72		47-124	B
Decachlorobiphenyl	76		32-167	B

Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Method Blank Analysis Batch Quality Control

Analytical Method: 127,608.3
 Analytical Date: 09/04/18 17:55
 Analyst: SL

Extraction Method: EPA 608.3
 Extraction Date: 09/02/18 10:54
 Cleanup Method: EPA 3620B
 Cleanup Date: 09/02/18

Parameter	Result	Qualifier	Units	RL	MDL	Column
Organochlorine Pesticides by GC - Westborough Lab for sample(s): 03 Batch: WG1153064-1						
Delta-BHC	ND		ug/l	0.020	--	A
Lindane	ND		ug/l	0.020	--	A
Alpha-BHC	ND		ug/l	0.020	--	A
Beta-BHC	ND		ug/l	0.020	--	A
Heptachlor	ND		ug/l	0.020	--	A
Aldrin	ND		ug/l	0.020	--	A
Heptachlor epoxide	ND		ug/l	0.020	--	A
Endrin	ND		ug/l	0.040	--	A
Endrin aldehyde	ND		ug/l	0.040	--	A
Endrin ketone ¹	ND		ug/l	0.040	--	A
Dieldrin	ND		ug/l	0.040	--	A
4,4'-DDE	ND		ug/l	0.040	--	A
4,4'-DDD	ND		ug/l	0.040	--	A
4,4'-DDT	ND		ug/l	0.040	--	A
Endosulfan I	ND		ug/l	0.020	--	A
Endosulfan II	ND		ug/l	0.040	--	A
Endosulfan sulfate	ND		ug/l	0.040	--	A
Methoxychlor ¹	ND		ug/l	0.100	--	A
Toxaphene	ND		ug/l	0.400	--	A
Chlordane	ND		ug/l	0.200	--	A
cis-Chlordane ¹	ND		ug/l	0.020	--	A
trans-Chlordane ¹	ND		ug/l	0.020	--	A

Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**Method Blank Analysis**
Batch Quality ControlAnalytical Method: 127,608.3
Analytical Date: 09/04/18 17:55
Analyst: SLExtraction Method: EPA 608.3
Extraction Date: 09/02/18 10:54
Cleanup Method: EPA 3620B
Cleanup Date: 09/02/18

Parameter	Result	Qualifier	Units	RL	MDL	Column
Organochlorine Pesticides by GC - Westborough Lab for sample(s): 03 Batch: WG1153064-1						

Surrogate	%Recovery	Qualifier	Acceptance	
			Criteria	Column
2,4,5,6-Tetrachloro-m-xylene	75		47-124	A
Decachlorobiphenyl	87		32-167	A
2,4,5,6-Tetrachloro-m-xylene	74		47-124	B
Decachlorobiphenyl	73		32-167	B

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Project Number: 129835-013

Lab Number: L1834432

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits	Column
Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 03 Batch: WG1153064-2									
Delta-BHC	82		-		19-140	-		52	A
Lindane	76		-		32-140	-		39	A
Alpha-BHC	80		-		37-140	-		36	A
Beta-BHC	83		-		17-147	-		44	A
Heptachlor	67		-		34-140	-		43	A
Aldrin	83		-		42-140	-		35	A
Heptachlor epoxide	82		-		37-142	-		26	A
Endrin	87		-		30-147	-		48	A
Endrin aldehyde	73		-		30-150	-		30	A
Endrin ketone ¹	84		-		30-150	-		30	A
Dieldrin	92		-		36-146	-		49	A
4,4'-DDE	91		-		30-145	-		35	A
4,4'-DDD	89		-		31-141	-		39	A
4,4'-DDT	91		-		25-160	-		42	A
Endosulfan I	86		-		45-153	-		28	A
Endosulfan II	87		-		1-202	-		53	A
Endosulfan sulfate	80		-		26-144	-		38	A
Methoxychlor ¹	101		-		30-150	-		30	A
cis-Chlordane ¹	71		-		45-140	-		35	A
trans-Chlordane ¹	81		-		45-140	-		35	A

Lab Control Sample Analysis**Batch Quality Control****Project Name:** 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
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Organochlorine Pesticides by GC - Westborough Lab Associated sample(s): 03 Batch: WG1153064-2

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria	Column
2,4,5,6-Tetrachloro-m-xylene	75				47-124	A
Decachlorobiphenyl	88				32-167	A
2,4,5,6-Tetrachloro-m-xylene	74				47-124	B
Decachlorobiphenyl	84				32-167	B

METALS

Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**SAMPLE RESULTS**

Lab ID: L1834432-01

Date Collected: 08/30/18 08:30

Client ID: HA14-3 (OW)

Date Received: 08/30/18

Sample Location: BOSTON, MA

Field Prep: Not Specified

Sample Depth:

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
Total Metals - Mansfield Lab											
Antimony, Total	ND		mg/l	0.050	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB
Arsenic, Total	ND		mg/l	0.005	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB
Cadmium, Total	ND		mg/l	0.005	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB
Chromium, Total	0.020		mg/l	0.010	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB
Copper, Total	ND		mg/l	0.010	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB
Lead, Total	0.019		mg/l	0.010	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB
Mercury, Total	ND		mg/l	0.00020	--	1	08/31/18 11:45	08/31/18 20:22	EPA 245.1	3,245.1	EA
Nickel, Total	ND		mg/l	0.025	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB
Selenium, Total	ND		mg/l	0.010	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB
Silver, Total	ND		mg/l	0.007	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB
Zinc, Total	0.056		mg/l	0.050	--	1	09/06/18 06:40	09/06/18 14:08	EPA 3005A	19,200.7	AB



Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Method Blank Analysis Batch Quality Control

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Total Metals - Mansfield Lab for sample(s): 01 Batch: WG1152642-1										
Mercury, Total	ND		mg/l	0.0002	--	1	08/31/18 11:45	08/31/18 19:24	3,245.1	EA

Prep Information

Digestion Method: EPA 245.1

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Total Metals - Mansfield Lab for sample(s): 01 Batch: WG1154027-1										
Antimony, Total	ND		mg/l	0.050	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB
Arsenic, Total	ND		mg/l	0.005	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB
Cadmium, Total	ND		mg/l	0.005	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB
Chromium, Total	ND		mg/l	0.010	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB
Copper, Total	ND		mg/l	0.010	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB
Lead, Total	ND		mg/l	0.010	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB
Nickel, Total	ND		mg/l	0.025	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB
Selenium, Total	ND		mg/l	0.010	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB
Silver, Total	ND		mg/l	0.007	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB
Zinc, Total	ND		mg/l	0.050	--	1	09/06/18 06:40	09/06/18 13:41	19,200.7	AB

Prep Information

Digestion Method: EPA 3005A



Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Project Number: 129835-013

Lab Number: L1834432

Report Date: 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Total Metals - Mansfield Lab Associated sample(s): 01 Batch: WG1152642-2								
Mercury, Total	99		-		85-115	-		
Total Metals - Mansfield Lab Associated sample(s): 01 Batch: WG1154027-2								
Antimony, Total	95		-		85-115	-		
Arsenic, Total	110		-		85-115	-		
Cadmium, Total	108		-		85-115	-		
Chromium, Total	102		-		85-115	-		
Copper, Total	96		-		85-115	-		
Lead, Total	101		-		85-115	-		
Nickel, Total	99		-		85-115	-		
Selenium, Total	110		-		85-115	-		
Silver, Total	99		-		85-115	-		
Zinc, Total	106		-		85-115	-		

Matrix Spike Analysis **Batch Quality Control**

Project Name: 1000 BOYLSTON ST.

Project Number: 129835-013

Lab Number: L1834432

Report Date: 09/06/18

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
Total Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1152642-3 WG1152642-4 QC Sample: L1834286-01 Client ID: MS Sample												
Mercury, Total	ND	0.005	0.0048	96		0.0047	94		70-130	2		20
Total Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1152642-5 QC Sample: L1834286-02 Client ID: MS Sample												
Mercury, Total	ND	0.005	0.0048	96		-	-		70-130	-		20
Total Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1154027-3 QC Sample: L1834913-01 Client ID: MS Sample												
Antimony, Total	ND	0.5	0.517	103		-	-		75-125	-		20
Arsenic, Total	ND	0.12	0.134	112		-	-		75-125	-		20
Cadmium, Total	ND	0.051	0.054	105		-	-		75-125	-		20
Chromium, Total	ND	0.2	0.203	102		-	-		75-125	-		20
Copper, Total	ND	0.25	0.237	95		-	-		75-125	-		20
Lead, Total	ND	0.51	0.480	94		-	-		75-125	-		20
Nickel, Total	ND	0.5	0.473	95		-	-		75-125	-		20
Selenium, Total	ND	0.12	0.134	112		-	-		75-125	-		20
Silver, Total	ND	0.05	0.049	98		-	-		75-125	-		20
Zinc, Total	ND	0.5	0.529	106		-	-		75-125	-		20

Lab Duplicate Analysis
*Batch Quality Control***Project Name:** 1000 BOYLSTON ST.**Project Number:** 129835-013**Lab Number:** L1834432**Report Date:** 09/06/18

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
Total Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1152642-6 QC Sample: L1834286-02 Client ID: DUP Sample						
Mercury, Total	ND	ND	mg/l	NC		20

INORGANICS & MISCELLANEOUS

Project Name: 1000 BOYLSTON ST.**Project Number:** 129835-013**Lab Number:** L1834432**Report Date:** 09/06/18**SAMPLE RESULTS****Lab ID:** L1834432-02**Client ID:** HA14-3 (OW)**Sample Location:** BOSTON, MA**Date Collected:** 08/30/18 09:55**Date Received:** 08/30/18**Field Prep:** Not Specified**Sample Depth:****Matrix:** Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Oil & Grease, Hem-Grav	ND		mg/l	4.0	--	1	08/31/18 16:45	08/31/18 17:30	74,1664A	ML



Project Name: 1000 BOYLSTON ST.**Project Number:** 129835-013**Lab Number:** L1834432**Report Date:** 09/06/18**SAMPLE RESULTS****Lab ID:** L1834432-04**Client ID:** HA14-3 (OW)**Sample Location:** BOSTON, MA**Date Collected:** 08/30/18 12:48**Date Received:** 08/30/18**Field Prep:** Not Specified**Sample Depth:****Matrix:** Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
pH (H)	6.6		SU	-	NA	1	-	08/31/18 02:38	121,4500H+-B	MA



Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Method Blank Analysis
Batch Quality Control

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab for sample(s): 02 Batch: WG1152777-1										
Oil & Grease, Hem-Grav	ND		mg/l	4.0	--	1	08/31/18 16:45	08/31/18 17:30	74,1664A	ML



Lab Control Sample Analysis**Batch Quality Control****Project Name:** 1000 BOYLSTON ST.**Project Number:** 129835-013**Lab Number:** L1834432**Report Date:** 09/06/18

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 04 Batch: WG1152585-1								
pH	100		-		99-101	-		5
General Chemistry - Westborough Lab Associated sample(s): 02 Batch: WG1152777-2								
Oil & Grease, Hem-Grav	93		-		78-114	-		18

Matrix Spike Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Lab Number: L1834432

Project Number: 129835-013

Report Date: 09/06/18

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 02 QC Batch ID: WG1152777-4 QC Sample: L1800008-213 Client ID: MS Sample												
Oil & Grease, Hem-Grav	ND	41.7	39	94		-	-		78-114	-		18

Lab Duplicate Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON ST.

Project Number: 129835-013

Lab Number: L1834432

Report Date: 09/06/18

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 04 QC Batch ID: WG1152585-2 QC Sample: L1834432-04 Client ID: HA14-3 (OW)						
pH (H)	6.6	6.6	SU	0		5
General Chemistry - Westborough Lab Associated sample(s): 02 QC Batch ID: WG1152777-3 QC Sample: L1800008-212 Client ID: DUP Sample						
Oil & Grease, Hem-Grav	ND	ND	mg/l	NC		18

Project Name: 1000 BOYLSTON ST.**Lab Number:** L1834432**Project Number:** 129835-013**Report Date:** 09/06/18**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

Cooler Information

Cooler	Custody Seal
A	Absent

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L1834432-01A	Vial Na2S2O3 preserved	A	NA		4.2	Y	Absent		624.1-TTO(3)
L1834432-01B	Vial Na2S2O3 preserved	A	NA		4.2	Y	Absent		624.1-TTO(3)
L1834432-01C	Vial Na2S2O3 preserved	A	NA		4.2	Y	Absent		624.1-TTO(3)
L1834432-01D	Plastic 250ml HNO3 preserved	A	<2	<2	4.2	Y	Absent		NI-UI(180),SB-UI(180),AG-UI(180),ZN-UI(180),SE-UI(180),HG-U(28),CD-UI(180),CR-UI(180),AS-UI(180),CU-UI(180),PB-UI(180)
L1834432-02A	Amber 1000ml HCl preserved	A	<2	<2	4.2	Y	Absent		EPH-10(14)
L1834432-02B	Amber 1000ml HCl preserved	A	<2	<2	4.2	Y	Absent		EPH-10(14)
L1834432-02C	Amber 1000ml HCl preserved	A	NA		4.2	Y	Absent		OG-1664(28)
L1834432-02D	Amber 1000ml HCl preserved	A	NA		4.2	Y	Absent		OG-1664(28)
L1834432-03A	Amber 1000ml Na2S2O3	A	7	7	4.2	Y	Absent		PCB-608.3(7)
L1834432-03B	Amber 1000ml Na2S2O3	A	7	7	4.2	Y	Absent		PCB-608.3(7)
L1834432-03C	Amber 1000ml Na2S2O3	A	7	7	4.2	Y	Absent		PESTICIDE-608.3(7)
L1834432-03D	Amber 1000ml Na2S2O3	A	7	7	4.2	Y	Absent		PESTICIDE-608.3(7)
L1834432-03E	Amber 1000ml Na2S2O3	A	7	7	4.2	Y	Absent		625.1-TTO(7)
L1834432-03F	Amber 1000ml Na2S2O3	A	7	7	4.2	Y	Absent		625.1-TTO(7)
L1834432-04A	Plastic 60ml unpreserved	A	7	7	4.2	Y	Absent		PH-4500(.01)

Project Name: 1000 BOYLSTON ST.
Project Number: 129835-013

Lab Number: L1834432
Report Date: 09/06/18

GLOSSARY

Acronyms

EDL	- Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).
EMPC	- Estimated Maximum Possible Concentration: The concentration that results from the signal present at the retention time of an analyte when the ions meet all of the identification criteria except the ion abundance ratio criteria. An EMPC is a worst-case estimate of the concentration.
EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NDPA/DPA	- N-Nitrosodiphenylamine/Diphenylamine.
NI	- Not Ignitable.
NP	- Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.
STLP	- Semi-dynamic Tank Leaching Procedure per EPA Method 1315.
TEF	- Toxic Equivalency Factors: The values assigned to each dioxin and furan to evaluate their toxicity relative to 2,3,7,8-TCDD.
TEQ	- Toxic Equivalent: The measure of a sample's toxicity derived by multiplying each dioxin and furan by its corresponding TEF and then summing the resulting values.
TIC	- Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.

Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Final pH: As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

Frozen Date/Time: With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

Initial pH: As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

Total: With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

Report Format: Data Usability Report



Project Name: 1000 BOYLSTON ST.
Project Number: 129835-013

Lab Number: L1834432
Report Date: 09/06/18

Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).
- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- J** - Estimated value. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- ND** - Not detected at the reporting limit (RL) for the sample.

Project Name: 1000 BOYLSTON ST.
Project Number: 129835-013

Lab Number: L1834432
Report Date: 09/06/18

REFERENCES

- 3 Methods for the Determination of Metals in Environmental Samples, Supplement I. EPA/600/R-94/111. May 1994.
- 19 Inductively Coupled Plasma Atomic Emission Spectrometric Method for Trace Element Analysis of Water and Wastes. Appendix C, Part 136, 40 CFR (Code of Federal Regulations). July 1, 1999 edition.
- 74 Method 1664, Revision A: N-Hexane Extractable Material (HEM; Oil & Grease) and Silica Gel Treated N-Hexane Extractable Material (SGT-HEM; Non-polar Material) by Extraction and Gravimetry, EPA-821-R-98-002, February 1999.
- 98 Method for the Determination of Extractable Petroleum Hydrocarbons (EPH), MassDEP, May 2004, Revision 1.1 with QC Requirements & Performance Standards for the Analysis of EPH under the Massachusetts Contingency Plan, WSC-CAM-IVB, July 2010.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.
- 127 Method 608.3: Organochlorine Pesticides and PCBs by GC/HSD, EPA 821-R-16-009, December 2016.
- 128 Method 624.1: Purgeables by GC/MS, EPA 821-R-16-008, December 2016.
- 129 Method 625.1: Base/Neutrals and Acids by GC/MS, EPA 821-R-16-007, December 2016.

LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



Alpha Analytical, Inc.Facility: **Company-wide**Department: **Quality Assurance**Title: **Certificate/Approval Program Summary**ID No.: **17873**

Revision 11

Published Date: 1/8/2018 4:15:49 PM

Page 1 of 1

Certification Information

The following analytes are not included in our Primary NELAP Scope of Accreditation:

Westborough Facility**EPA 624:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 300:** DW: Bromide**EPA 6860:** SCM: Perchlorate**EPA 9010:** NPW and SCM: Amenable Cyanide Distillation**SM4500:** NPW: Amenable Cyanide, Dissolved Oxygen; SCM: Total Phosphorus, TKN, NO₂, NO₃.**Mansfield Facility****SM 2540D:** TSS**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

Westborough Facility:**Drinking Water****EPA 300.0:** Chloride, Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE,****EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH:** Ammonia-N and Kjeldahl-N, **EPA 350.1:**Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **EPA 351.1, SM4500NO3-F, EPA 353.2:** Nitrate-N, **EPA 351.1, SM4500P-E, SM4500P-B, E,****SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D.****EPA 624:** Volatile Halocarbons & Aromatics,**EPA 608:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E, SM9222D.****Mansfield Facility:****Drinking Water****EPA 200.7:** Al, Ba, Be, Cd, Cr, Cu, Mn, Ni, Na, Ag, Ca, Zn. **EPA 200.8:** Al, Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn. **EPA 245.1 Hg.****EPA 522.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.



ANALYTICAL REPORT

Lab Number:	L1919950
Client:	Haley & Aldrich, Inc. 465 Medford Street, Suite 2200 Charlestown, MA 02129-1400
ATTN:	Peter Zawadzkas
Phone:	(617) 886-7335
Project Name:	1000 BOYLSTON STREET
Project Number:	129835-011
Report Date:	05/28/19

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NJ (MA935), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-17-00196).

Eight Walkup Drive, Westborough, MA 01581-1019
508-898-9220 (Fax) 508-898-9193 800-624-9220 - www.alphalab.com



Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Alpha Sample ID	Client ID	Matrix	Sample Location	Collection Date/Time	Receive Date
L1919950-01	HA14-3_051319	WATER	BOSTON, MA	05/13/19 10:45	05/13/19
L1919950-02	RWS_051319	WATER	BOSTON, MA	05/13/19 13:00	05/13/19

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively.

When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances, the specific failure is not narrated but noted in the associated QC Outlier Summary Report, located directly after the Case Narrative. QC information is also incorporated in the Data Usability Assessment table (Format 11) of our Data Merger tool, where it can be reviewed in conjunction with the sample result, associated regulatory criteria and any associated data usability implications.

Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

HOLD POLICY - For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Alpha Project Manager and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Project Management at 800-624-9220 with any questions.

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Case Narrative (continued)

Report Submission

May 28, 2019: This final report includes the results of all requested analyses.

May 22, 2019: This preliminary report includes the results of the Ethanol analysis performed on L1919950-01 (HA14-3_051319) and Total Hardness analysis performed on L1919950-02 (RWS_051319).

The analysis of Ethanol was subcontracted. A copy of the laboratory report is included as an addendum.

Please note: This data is only available in PDF format and is not available on Data Merger.

May 18, 2019: This is a preliminary report.

Sample Receipt

The analyses performed were specified by the client.

L1919950-01 (HA14-3_051319): The Client ID was specified by the client.

Total Metals

The WG1237482-7 MS recoveries for iron (0%) and hardness (60%), performed on L1919950-01 (HA14-3_051319), do not apply because the sample concentrations are greater than four times the spike amounts added.

The WG1237488-3 MS recoveries for antimony (135%) and zinc (137%), performed on L1919950-01 (HA14-3_051319), recovered outside the 70-130% acceptance criteria. The result for this analyte is considered suspect due to either the heterogeneous nature of the sample or matrix interference.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:

 Lisa Westerlind

Title: Technical Director/Representative

Date: 05/28/19

ORGANICS

VOLATILES

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

SAMPLE RESULTS

Lab ID: L1919950-01
Client ID: HA14-3_051319
Sample Location: BOSTON, MA

Date Collected: 05/13/19 10:45
Date Received: 05/13/19
Field Prep: Refer to COC

Sample Depth:

Matrix: Water
Analytical Method: 128,624.1
Analytical Date: 05/16/19 11:14
Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by GC/MS - Westborough Lab						
Methylene chloride	ND		ug/l	1.0	--	1
1,1-Dichloroethane	ND		ug/l	1.5	--	1
Carbon tetrachloride	ND		ug/l	1.0	--	1
1,1,2-Trichloroethane	ND		ug/l	1.5	--	1
Tetrachloroethene	ND		ug/l	1.0	--	1
1,2-Dichloroethane	ND		ug/l	1.5	--	1
1,1,1-Trichloroethane	ND		ug/l	2.0	--	1
Benzene	ND		ug/l	1.0	--	1
Toluene	ND		ug/l	1.0	--	1
Ethylbenzene	ND		ug/l	1.0	--	1
Vinyl chloride	ND		ug/l	1.0	--	1
1,1-Dichloroethene	ND		ug/l	1.0	--	1
cis-1,2-Dichloroethene	ND		ug/l	1.0	--	1
Trichloroethene	ND		ug/l	1.0	--	1
1,2-Dichlorobenzene	ND		ug/l	5.0	--	1
1,3-Dichlorobenzene	ND		ug/l	5.0	--	1
1,4-Dichlorobenzene	ND		ug/l	5.0	--	1
p/m-Xylene	ND		ug/l	2.0	--	1
o-xylene	ND		ug/l	1.0	--	1
Xylenes, Total	ND		ug/l	1.0	--	1
Acetone	ND		ug/l	10	--	1
Methyl tert butyl ether	ND		ug/l	10	--	1
Tert-Butyl Alcohol	ND		ug/l	100	--	1
Tertiary-Amyl Methyl Ether	ND		ug/l	20	--	1



Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

SAMPLE RESULTS

Lab ID: L1919950-01
Client ID: HA14-3_051319
Sample Location: BOSTON, MA

Date Collected: 05/13/19 10:45
Date Received: 05/13/19
Field Prep: Refer to COC

Sample Depth:

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
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Volatile Organics by GC/MS - Westborough Lab

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Pentafluorobenzene	103		60-140
Fluorobenzene	91		60-140
4-Bromofluorobenzene	98		60-140

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

SAMPLE RESULTS

Lab ID: L1919950-01
 Client ID: HA14-3_051319
 Sample Location: BOSTON, MA

Date Collected: 05/13/19 10:45
 Date Received: 05/13/19
 Field Prep: Refer to COC

Sample Depth:

Matrix: Water
 Analytical Method: 128,624.1-SIM
 Analytical Date: 05/16/19 11:14
 Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
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Volatile Organics by GC/MS-SIM - Westborough Lab						
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1,4-Dioxane	ND		ug/l	50	--	1
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Surrogate	% Recovery	Qualifier	Acceptance Criteria
Fluorobenzene	94		60-140
4-Bromofluorobenzene	111		60-140

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

SAMPLE RESULTS

Lab ID: L1919950-01
Client ID: HA14-3_051319
Sample Location: BOSTON, MA

Date Collected: 05/13/19 10:45
Date Received: 05/13/19
Field Prep: Refer to COC

Sample Depth:

Matrix: Water
Analytical Method: 14,504.1
Analytical Date: 05/16/19 13:17
Analyst: AWS

Extraction Method: EPA 504.1
Extraction Date: 05/15/19 15:23

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Column
Microextractables by GC - Westborough Lab							
1,2-Dibromoethane	ND		ug/l	0.010	--	1	A

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Method Blank Analysis
Batch Quality Control

Analytical Method: 14,504.1
Analytical Date: 05/16/19 10:32
Analyst: AWS

Extraction Method: EPA 504.1
Extraction Date: 05/15/19 15:23

Parameter	Result	Qualifier	Units	RL	MDL
Microextractables by GC - Westborough Lab for sample(s): 01 Batch: WG1237387-1					
1,2-Dibromoethane	ND		ug/l	0.010	-- A

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Method Blank Analysis
Batch Quality Control

Analytical Method: 128,624.1
 Analytical Date: 05/16/19 08:10
 Analyst: GT

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1237856-4					
Methylene chloride	ND		ug/l	1.0	--
1,1-Dichloroethane	ND		ug/l	1.5	--
Carbon tetrachloride	ND		ug/l	1.0	--
1,1,2-Trichloroethane	ND		ug/l	1.5	--
Tetrachloroethene	ND		ug/l	1.0	--
1,2-Dichloroethane	ND		ug/l	1.5	--
1,1,1-Trichloroethane	ND		ug/l	2.0	--
Benzene	ND		ug/l	1.0	--
Toluene	ND		ug/l	1.0	--
Ethylbenzene	ND		ug/l	1.0	--
Vinyl chloride	ND		ug/l	1.0	--
1,1-Dichloroethene	ND		ug/l	1.0	--
cis-1,2-Dichloroethene	ND		ug/l	1.0	--
Trichloroethene	ND		ug/l	1.0	--
1,2-Dichlorobenzene	ND		ug/l	5.0	--
1,3-Dichlorobenzene	ND		ug/l	5.0	--
1,4-Dichlorobenzene	ND		ug/l	5.0	--
p/m-Xylene	ND		ug/l	2.0	--
o-xylene	ND		ug/l	1.0	--
Xylenes, Total	ND		ug/l	1.0	--
Acetone	ND		ug/l	10	--
Methyl tert butyl ether	ND		ug/l	10	--
Tert-Butyl Alcohol	ND		ug/l	100	--
Tertiary-Amyl Methyl Ether	ND		ug/l	20	--

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Method Blank Analysis
Batch Quality Control

Analytical Method: 128,624.1
Analytical Date: 05/16/19 08:10
Analyst: GT

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1237856-4					

Surrogate	%Recovery	Qualifier	Acceptance Criteria
Pentafluorobenzene	92		60-140
Fluorobenzene	93		60-140
4-Bromofluorobenzene	102		60-140

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Method Blank Analysis
Batch Quality Control

Analytical Method: 128,624.1-SIM
Analytical Date: 05/16/19 08:10
Analyst: GT

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS-SIM - Westborough Lab for sample(s): 01 Batch: WG1237965-4					
1,4-Dioxane	ND		ug/l	50	--

Surrogate	%Recovery	Qualifier	Acceptance Criteria
Fluorobenzene	95		60-140
4-Bromofluorobenzene	110		60-140

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET**Project Number:** 129835-011**Lab Number:** L1919950**Report Date:** 05/28/19

Parameter	<i>LCS</i> <i>%Recovery</i>	<i>Qual</i>	<i>LCSD</i> <i>%Recovery</i>	<i>Qual</i>	<i>%Recovery</i> <i>Limits</i>	<i>RPD</i>	<i>Qual</i>	<i>RPD</i> <i>Limits</i>	<i>Column</i>
Microextractables by GC - Westborough Lab Associated sample(s): 01 Batch: WG1237387-2									
1,2-Dibromoethane	93		-		80-120	-			A

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET

Project Number: 129835-011

Lab Number: L1919950

Report Date: 05/28/19

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1237856-3								
Methylene chloride	85		-		60-140	-		28
1,1-Dichloroethane	75		-		50-150	-		49
Carbon tetrachloride	90		-		70-130	-		41
1,1,2-Trichloroethane	100		-		70-130	-		45
Tetrachloroethene	105		-		70-130	-		39
1,2-Dichloroethane	90		-		70-130	-		49
1,1,1-Trichloroethane	95		-		70-130	-		36
Benzene	95		-		65-135	-		61
Toluene	105		-		70-130	-		41
Ethylbenzene	110		-		60-140	-		63
Vinyl chloride	80		-		5-195	-		66
1,1-Dichloroethene	95		-		50-150	-		32
cis-1,2-Dichloroethene	100		-		60-140	-		30
Trichloroethene	95		-		65-135	-		48
1,2-Dichlorobenzene	110		-		65-135	-		57
1,3-Dichlorobenzene	105		-		70-130	-		43
1,4-Dichlorobenzene	110		-		65-135	-		57
p/m-Xylene	108		-		60-140	-		30
o-xylene	105		-		60-140	-		30
Acetone	78		-		40-160	-		30
Methyl tert butyl ether	80		-		60-140	-		30
Tert-Butyl Alcohol	82		-		60-140	-		30
Tertiary-Amyl Methyl Ether	85		-		60-140	-		30

Lab Control Sample Analysis**Batch Quality Control****Project Name:** 1000 BOYLSTON STREET**Lab Number:** L1919950**Project Number:** 129835-011**Report Date:** 05/28/19

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
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Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1237856-3

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
Pentafluorobenzene	102				60-140
Fluorobenzene	90				60-140
4-Bromofluorobenzene	99				60-140

Lab Control Sample Analysis**Batch Quality Control****Project Name:** 1000 BOYLSTON STREET**Lab Number:** L1919950**Project Number:** 129835-011**Report Date:** 05/28/19

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01 Batch: WG1237965-3								
1,4-Dioxane	110		-		60-140	-		20

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
Fluorobenzene	94				60-140
4-Bromofluorobenzene	108				60-140

Matrix Spike Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits	Column
Microextractables by GC - Westborough Lab		Associated sample(s): 01		QC Batch ID: WG1237387-3		QC Sample: L1919376-01		Client ID: MS Sample					
1,2-Dibromoethane	ND	0.252	0.238	94		-	-		80-120	-		20	A
1,2-Dibromo-3-chloropropane	ND	0.252	0.263	104		-	-		80-120	-		20	A

SEMIVOLATILES

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

SAMPLE RESULTS

Lab ID: L1919950-01
Client ID: HA14-3_051319
Sample Location: BOSTON, MA

Date Collected: 05/13/19 10:45
Date Received: 05/13/19
Field Prep: Refer to COC

Sample Depth:

Matrix: Water
Analytical Method: 129,625.1
Analytical Date: 05/16/19 06:59
Analyst: ALS

Extraction Method: EPA 625.1
Extraction Date: 05/14/19 07:23

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Semivolatile Organics by GC/MS - Westborough Lab						
Bis(2-ethylhexyl)phthalate	ND		ug/l	2.2	--	1
Butyl benzyl phthalate	ND		ug/l	5.0	--	1
Di-n-butylphthalate	ND		ug/l	5.0	--	1
Di-n-octylphthalate	ND		ug/l	5.0	--	1
Diethyl phthalate	ND		ug/l	5.0	--	1
Dimethyl phthalate	ND		ug/l	5.0	--	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	46		42-122
2-Fluorobiphenyl	57		46-121
4-Terphenyl-d14	74		47-138

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

SAMPLE RESULTS

Lab ID: L1919950-01
Client ID: HA14-3_051319
Sample Location: BOSTON, MA

Date Collected: 05/13/19 10:45
Date Received: 05/13/19
Field Prep: Refer to COC

Sample Depth:

Matrix: Water
Analytical Method: 129,625.1-SIM
Analytical Date: 05/14/19 22:19
Analyst: CB

Extraction Method: EPA 625.1
Extraction Date: 05/14/19 07:25

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Semivolatile Organics by GC/MS-SIM - Westborough Lab						
Acenaphthene	ND		ug/l	0.10	--	1
Fluoranthene	0.38		ug/l	0.10	--	1
Naphthalene	ND		ug/l	0.10	--	1
Benzo(a)anthracene	0.20		ug/l	0.10	--	1
Benzo(a)pyrene	0.19		ug/l	0.10	--	1
Benzo(b)fluoranthene	0.27		ug/l	0.10	--	1
Benzo(k)fluoranthene	0.16		ug/l	0.10	--	1
Chrysene	0.20		ug/l	0.10	--	1
Acenaphthylene	ND		ug/l	0.10	--	1
Anthracene	ND		ug/l	0.10	--	1
Benzo(ghi)perylene	0.16		ug/l	0.10	--	1
Fluorene	ND		ug/l	0.10	--	1
Phenanthrene	0.17		ug/l	0.10	--	1
Dibenzo(a,h)anthracene	ND		ug/l	0.10	--	1
Indeno(1,2,3-cd)pyrene	0.17		ug/l	0.10	--	1
Pyrene	0.33		ug/l	0.10	--	1
Pentachlorophenol	ND		ug/l	1.0	--	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2-Fluorophenol	31		25-87
Phenol-d6	20		16-65
Nitrobenzene-d5	52		42-122
2-Fluorobiphenyl	56		46-121
2,4,6-Tribromophenol	55		45-128
4-Terphenyl-d14	64		47-138



Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Method Blank Analysis
Batch Quality Control

Analytical Method: 129,625.1
 Analytical Date: 05/14/19 12:00
 Analyst: ALS

Extraction Method: EPA 625.1
 Extraction Date: 05/13/19 08:14

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG1236442-1					
Bis(2-ethylhexyl)phthalate	ND		ug/l	2.2	--
Butyl benzyl phthalate	ND		ug/l	5.0	--
Di-n-butylphthalate	ND		ug/l	5.0	--
Di-n-octylphthalate	ND		ug/l	5.0	--
Diethyl phthalate	ND		ug/l	5.0	--
Dimethyl phthalate	ND		ug/l	5.0	--

Surrogate	%Recovery	Qualifier	Acceptance Criteria
Nitrobenzene-d5	68		42-122
2-Fluorobiphenyl	71		46-121
4-Terphenyl-d14	69		47-138

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Method Blank Analysis
Batch Quality Control

Analytical Method: 129,625.1-SIM
Analytical Date: 05/14/19 20:59
Analyst: CB

Extraction Method: EPA 625.1
Extraction Date: 05/13/19 08:14

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS-SIM - Westborough Lab for sample(s): 01 Batch: WG1236444-1					
Acenaphthene	ND		ug/l	0.10	--
Fluoranthene	ND		ug/l	0.10	--
Naphthalene	ND		ug/l	0.10	--
Benzo(a)anthracene	ND		ug/l	0.10	--
Benzo(a)pyrene	ND		ug/l	0.10	--
Benzo(b)fluoranthene	ND		ug/l	0.10	--
Benzo(k)fluoranthene	ND		ug/l	0.10	--
Chrysene	ND		ug/l	0.10	--
Acenaphthylene	ND		ug/l	0.10	--
Anthracene	ND		ug/l	0.10	--
Benzo(ghi)perylene	ND		ug/l	0.10	--
Fluorene	ND		ug/l	0.10	--
Phenanthrene	ND		ug/l	0.10	--
Dibenzo(a,h)anthracene	ND		ug/l	0.10	--
Indeno(1,2,3-cd)pyrene	ND		ug/l	0.10	--
Pyrene	ND		ug/l	0.10	--
Pentachlorophenol	ND		ug/l	1.0	--

Surrogate	%Recovery	Qualifier	Acceptance Criteria
2-Fluorophenol	46		25-87
Phenol-d6	28		16-65
Nitrobenzene-d5	82		42-122
2-Fluorobiphenyl	77		46-121
2,4,6-Tribromophenol	63		45-128
4-Terphenyl-d14	75		47-138



Lab Control Sample Analysis**Batch Quality Control****Project Name:** 1000 BOYLSTON STREET**Project Number:** 129835-011**Lab Number:** L1919950**Report Date:** 05/28/19

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG1236442-2								
Bis(2-ethylhexyl)phthalate	75		-		29-137	-		82
Butyl benzyl phthalate	75		-		1-140	-		60
Di-n-butylphthalate	79		-		8-120	-		47
Di-n-octylphthalate	72		-		19-132	-		69
Diethyl phthalate	72		-		1-120	-		100
Dimethyl phthalate	81		-		1-120	-		183

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
Nitrobenzene-d5	81				42-122
2-Fluorobiphenyl	83				46-121
4-Terphenyl-d14	82				47-138

Lab Control Sample Analysis Batch Quality Control

Project Name: 1000 BOYLSTON STREET

Project Number: 129835-011

Lab Number: L1919950

Report Date: 05/28/19

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Semivolatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01 Batch: WG1236444-2								
Acenaphthene	95		-		60-132	-		30
Fluoranthene	98		-		43-121	-		30
Naphthalene	89		-		36-120	-		30
Benzo(a)anthracene	102		-		42-133	-		30
Benzo(a)pyrene	93		-		32-148	-		30
Benzo(b)fluoranthene	103		-		42-140	-		30
Benzo(k)fluoranthene	100		-		25-146	-		30
Chrysene	98		-		44-140	-		30
Acenaphthylene	91		-		54-126	-		30
Anthracene	97		-		43-120	-		30
Benzo(ghi)perylene	102		-		1-195	-		30
Fluorene	96		-		70-120	-		30
Phenanthrene	96		-		65-120	-		30
Dibenzo(a,h)anthracene	99		-		1-200	-		30
Indeno(1,2,3-cd)pyrene	102		-		1-151	-		30
Pyrene	97		-		70-120	-		30
Pentachlorophenol	89		-		38-152	-		30

Lab Control Sample Analysis**Batch Quality Control****Project Name:** 1000 BOYLSTON STREET**Lab Number:** L1919950**Project Number:** 129835-011**Report Date:** 05/28/19

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
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Semivolatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01 Batch: WG1236444-2

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
2-Fluorophenol	56				25-87
Phenol-d6	36				16-65
Nitrobenzene-d5	91				42-122
2-Fluorobiphenyl	90				46-121
2,4,6-Tribromophenol	75				45-128
4-Terphenyl-d14	86				47-138

PCBS

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

SAMPLE RESULTS

Lab ID: L1919950-01
Client ID: HA14-3_051319
Sample Location: BOSTON, MA

Date Collected: 05/13/19 10:45
Date Received: 05/13/19
Field Prep: Refer to COC

Sample Depth:

Matrix: Water
Analytical Method: 127,608.3
Analytical Date: 05/15/19 01:58
Analyst: KEG

Extraction Method: EPA 608.3
Extraction Date: 05/14/19 07:27
Cleanup Method: EPA 3665A
Cleanup Date: 05/14/19
Cleanup Method: EPA 3660B
Cleanup Date: 05/14/19

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Column
Polychlorinated Biphenyls by GC - Westborough Lab							
Aroclor 1016	ND		ug/l	0.250	--	1	A
Aroclor 1221	ND		ug/l	0.250	--	1	A
Aroclor 1232	ND		ug/l	0.250	--	1	A
Aroclor 1242	ND		ug/l	0.250	--	1	A
Aroclor 1248	ND		ug/l	0.250	--	1	A
Aroclor 1254	ND		ug/l	0.250	--	1	A
Aroclor 1260	ND		ug/l	0.200	--	1	A

Surrogate	% Recovery	Qualifier	Acceptance Criteria	Column
2,4,5,6-Tetrachloro-m-xylene	79		37-123	B
Decachlorobiphenyl	93		38-114	B
2,4,5,6-Tetrachloro-m-xylene	76		37-123	A
Decachlorobiphenyl	80		38-114	A

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Method Blank Analysis
Batch Quality Control

Analytical Method: 127,608.3
 Analytical Date: 05/15/19 02:56
 Analyst: KEG

Extraction Method: EPA 608.3
 Extraction Date: 05/13/19 07:56
 Cleanup Method: EPA 3665A
 Cleanup Date: 05/13/19
 Cleanup Method: EPA 3660B
 Cleanup Date: 05/13/19

Parameter	Result	Qualifier	Units	RL	MDL	Column
Polychlorinated Biphenyls by GC - Westborough Lab for sample(s): 01 Batch: WG1236432-1						
Aroclor 1016	ND		ug/l	0.250	--	A
Aroclor 1221	ND		ug/l	0.250	--	A
Aroclor 1232	ND		ug/l	0.250	--	A
Aroclor 1242	ND		ug/l	0.250	--	A
Aroclor 1248	ND		ug/l	0.250	--	A
Aroclor 1254	ND		ug/l	0.250	--	A
Aroclor 1260	ND		ug/l	0.200	--	A

Surrogate	%Recovery	Qualifier	Acceptance Criteria	Column
2,4,5,6-Tetrachloro-m-xylene	85		37-123	B
Decachlorobiphenyl	96		38-114	B
2,4,5,6-Tetrachloro-m-xylene	80		37-123	A
Decachlorobiphenyl	80		38-114	A

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET

Lab Number: L1919950

Project Number: 129835-011

Report Date: 05/28/19

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits	Column
Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01 Batch: WG1236432-2									
Aroclor 1016	73		-		50-140	-		36	A
Aroclor 1260	66		-		8-140	-		38	A

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria	Column
2,4,5,6-Tetrachloro-m-xylene	78				37-123	B
Decachlorobiphenyl	96				38-114	B
2,4,5,6-Tetrachloro-m-xylene	77				37-123	A
Decachlorobiphenyl	83				38-114	A

METALS

Project Name: 1000 BOYLSTON STREET**Lab Number:** L1919950**Project Number:** 129835-011**Report Date:** 05/28/19**SAMPLE RESULTS**

Lab ID: L1919950-01

Date Collected: 05/13/19 10:45

Client ID: HA14-3_051319

Date Received: 05/13/19

Sample Location: BOSTON, MA

Field Prep: Refer to COC

Sample Depth:

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
Total Metals - Mansfield Lab											
Antimony, Total	ND		mg/l	0.00400	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Arsenic, Total	0.01924		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Cadmium, Total	0.00498		mg/l	0.00020	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Chromium, Total	0.01729		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Copper, Total	0.04675		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Iron, Total	26.6		mg/l	0.050	--	1	05/15/19 16:14	05/16/19 15:06	EPA 3005A	19,200.7	AB
Lead, Total	0.07502		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Mercury, Total	ND		mg/l	0.00020	--	1	05/15/19 12:20	05/15/19 19:25	EPA 245.1	3,245.1	EA
Nickel, Total	0.2161		mg/l	0.00200	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Selenium, Total	0.04378		mg/l	0.00500	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Silver, Total	ND		mg/l	0.00040	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Zinc, Total	1.859		mg/l	0.01000	--	1	05/15/19 16:14	05/16/19 18:23	EPA 3005A	3,200.8	AM
Total Hardness by SM 2340B - Mansfield Lab											
Hardness	768		mg/l	0.660	NA	1	05/15/19 16:14	05/16/19 15:06	EPA 3005A	19,200.7	AB

General Chemistry - Mansfield Lab

Chromium, Trivalent	0.017		mg/l	0.010	--	1		05/16/19 18:23	NA	107,-	
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Dissolved Metals - Mansfield Lab

Cadmium, Dissolved	0.0044		mg/l	0.0002	--	1	05/24/19 11:41	05/25/19 10:36	EPA 3005A	3,200.8	MG
Lead, Dissolved	0.0219		mg/l	0.0010	--	1	05/24/19 11:41	05/25/19 10:36	EPA 3005A	3,200.8	MG
Nickel, Dissolved	0.1924		mg/l	0.0020	--	1	05/24/19 11:41	05/25/19 10:36	EPA 3005A	3,200.8	MG
Zinc, Dissolved	1.444		mg/l	0.0100	--	1	05/24/19 11:41	05/25/19 10:36	EPA 3005A	3,200.8	MG



Project Name: 1000 BOYLSTON STREET**Lab Number:** L1919950**Project Number:** 129835-011**Report Date:** 05/28/19**SAMPLE RESULTS**

Lab ID: L1919950-02

Date Collected: 05/13/19 13:00

Client ID: RWS_051319

Date Received: 05/13/19

Sample Location: BOSTON, MA

Field Prep: Not Specified

Sample Depth:

Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
Total Metals - Mansfield Lab											
Antimony, Total	ND		mg/l	0.00400	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Arsenic, Total	ND		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Cadmium, Total	ND		mg/l	0.00020	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Chromium, Total	ND		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Copper, Total	0.00255		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Iron, Total	0.609		mg/l	0.050	--	1	05/15/19 16:14	05/16/19 17:38	EPA 3005A	19,200.7	AB
Lead, Total	0.00241		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Mercury, Total	ND		mg/l	0.00020	--	1	05/15/19 12:20	05/15/19 19:26	EPA 245.1	3,245.1	EA
Nickel, Total	ND		mg/l	0.00200	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Selenium, Total	ND		mg/l	0.00500	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Silver, Total	ND		mg/l	0.00040	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Zinc, Total	ND		mg/l	0.01000	--	1	05/15/19 16:14	05/16/19 18:28	EPA 3005A	3,200.8	AM
Total Hardness by SM 2340B - Mansfield Lab											
Hardness	69.6		mg/l	0.660	NA	1	05/15/19 16:14	05/16/19 17:38	EPA 3005A	19,200.7	AB



Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Method Blank Analysis Batch Quality Control

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Total Metals - Mansfield Lab for sample(s): 01-02 Batch: WG1237414-1										
Mercury, Total	ND		mg/l	0.0002	--	1	05/15/19 12:20	05/15/19 19:11	3,245.1	EA

Prep Information

Digestion Method: EPA 245.1

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Total Metals - Mansfield Lab for sample(s): 01-02 Batch: WG1237482-1										
Iron, Total	ND		mg/l	0.050	--	1	05/15/19 16:14	05/16/19 14:38	19,200.7	AB

Prep Information

Digestion Method: EPA 3005A

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Total Hardness by SM 2340B - Mansfield Lab for sample(s): 01-02 Batch: WG1237482-1										
Hardness	ND		mg/l	0.660	NA	1	05/15/19 16:14	05/16/19 14:38	19,200.7	AB

Prep Information

Digestion Method: EPA 3005A

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Total Metals - Mansfield Lab for sample(s): 01-02 Batch: WG1237488-1										
Antimony, Total	ND		mg/l	0.00400	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM
Arsenic, Total	ND		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM
Cadmium, Total	ND		mg/l	0.00020	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM
Chromium, Total	ND		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM
Copper, Total	ND		mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM



Project Name: 1000 BOYLSTON STREET

Lab Number: L1919950

Project Number: 129835-011

Report Date: 05/28/19

Method Blank Analysis Batch Quality Control

Lead, Total	ND	mg/l	0.00100	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM
Nickel, Total	ND	mg/l	0.00200	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM
Selenium, Total	ND	mg/l	0.00500	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM
Silver, Total	ND	mg/l	0.00040	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM
Zinc, Total	ND	mg/l	0.01000	--	1	05/15/19 16:14	05/16/19 17:56	3,200.8	AM

Prep Information

Digestion Method: EPA 3005A

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Dissolved Metals - Mansfield Lab for sample(s): 01 Batch: WG1240934-1										
Cadmium, Dissolved	ND		mg/l	0.0002	--	1	05/24/19 11:41	05/25/19 09:28	3,200.8	MG
Lead, Dissolved	ND		mg/l	0.0010	--	1	05/24/19 11:41	05/25/19 09:28	3,200.8	MG
Nickel, Dissolved	ND		mg/l	0.0020	--	1	05/24/19 11:41	05/25/19 09:28	3,200.8	MG
Zinc, Dissolved	ND		mg/l	0.0100	--	1	05/24/19 11:41	05/25/19 09:28	3,200.8	MG

Prep Information

Digestion Method: EPA 3005A



Lab Control Sample Analysis Batch Quality Control

Project Name: 1000 BOYLSTON STREET

Project Number: 129835-011

Lab Number: L1919950

Report Date: 05/28/19

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1237414-2								
Mercury, Total	109		-		85-115	-		
Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1237482-2								
Iron, Total	105		-		85-115	-		
Total Hardness by SM 2340B - Mansfield Lab Associated sample(s): 01-02 Batch: WG1237482-2								
Hardness	102		-		85-115	-		
Total Metals - Mansfield Lab Associated sample(s): 01-02 Batch: WG1237488-2								
Antimony, Total	88		-		85-115	-		
Arsenic, Total	98		-		85-115	-		
Cadmium, Total	104		-		85-115	-		
Chromium, Total	98		-		85-115	-		
Copper, Total	96		-		85-115	-		
Lead, Total	113		-		85-115	-		
Nickel, Total	101		-		85-115	-		
Selenium, Total	104		-		85-115	-		
Silver, Total	100		-		85-115	-		
Zinc, Total	102		-		85-115	-		

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET

Project Number: 129835-011

Lab Number: L1919950

Report Date: 05/28/19

Parameter	LCS %Recovery	LCSD %Recovery	%Recovery Limits	RPD	RPD Limits
Dissolved Metals - Mansfield Lab Associated sample(s): 01 Batch: WG1240934-2					
Cadmium, Dissolved	113	-	85-115	-	
Lead, Dissolved	111	-	85-115	-	
Nickel, Dissolved	102	-	85-115	-	
Zinc, Dissolved	113	-	85-115	-	

Matrix Spike Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
Total Metals - Mansfield Lab Associated sample(s): 01-02			QC Batch ID: WG1237414-3			QC Sample: L1919705-01			Client ID: MS Sample			
Mercury, Total	ND	0.005	0.0052	103		-	-		70-130	-		20
Total Metals - Mansfield Lab Associated sample(s): 01-02			QC Batch ID: WG1237482-3			QC Sample: L1919155-01			Client ID: MS Sample			
Iron, Total	135	1	138	300	Q	-	-		75-125	-		20
Total Hardness by SM 2340B - Mansfield Lab Associated sample(s): 01-02			QC Batch ID: WG1237482-3			QC Sample: L1919155-01			Client ID: MS Sample			
Hardness	1160	66.2	1210	76		-	-		75-125	-		20
Total Metals - Mansfield Lab Associated sample(s): 01-02			QC Batch ID: WG1237482-7			QC Sample: L1919950-01			Client ID: HA14-3_051319			
Iron, Total	26.6	1	26.6	0	Q	-	-		75-125	-		20
Total Hardness by SM 2340B - Mansfield Lab Associated sample(s): 01-02			QC Batch ID: WG1237482-7			QC Sample: L1919950-01			Client ID: HA14-3_051319			
Hardness	768	66.2	808	60	Q	-	-		75-125	-		20

Matrix Spike Analysis **Batch Quality Control**

Project Name: 1000 BOYLSTON STREET

Project Number: 129835-011

Lab Number: L1919950

Report Date: 05/28/19

Parameter	Native Sample	MS Added	MS Found	MS %Recovery		MSD Found	MSD %Recovery	Recovery Limits	RPD	RPD Limits
Total Metals - Mansfield Lab Associated sample(s): 01-02			QC Batch ID: WG1237488-3			QC Sample: L1919950-01		Client ID: HA14-3_051319		
Antimony, Total	ND	0.5	0.6749	135	Q	-	-	70-130	-	20
Arsenic, Total	0.01924	0.12	0.1485	108		-	-	70-130	-	20
Cadmium, Total	0.00498	0.051	0.06254	113		-	-	70-130	-	20
Chromium, Total	0.01729	0.2	0.2225	103		-	-	70-130	-	20
Copper, Total	0.04675	0.25	0.3081	104		-	-	70-130	-	20
Lead, Total	0.07502	0.51	0.6119	105		-	-	70-130	-	20
Nickel, Total	0.2161	0.5	0.7668	110		-	-	70-130	-	20
Selenium, Total	0.04378	0.12	0.1755	110		-	-	70-130	-	20
Silver, Total	ND	0.05	0.05408	108		-	-	70-130	-	20
Zinc, Total	1.859	0.5	2.545	137	Q	-	-	70-130	-	20

Dissolved Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1240934-3 QC Sample: L1921130-01 Client ID: MS Sample

Cadmium, Dissolved	ND	0.051	0.0586	115		-	-	70-130	-	20
Lead, Dissolved	ND	0.51	0.5702	112		-	-	70-130	-	20
Nickel, Dissolved	0.0040	0.5	0.5177	103		-	-	70-130	-	20
Zinc, Dissolved	ND	0.5	0.5655	113		-	-	70-130	-	20

Dissolved Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1240934-5 QC Sample: L1921130-02 Client ID: MS Sample

Cadmium, Dissolved	ND	0.051	0.0593	116		-	-	70-130	-	20
Lead, Dissolved	ND	0.51	0.5952	117		-	-	70-130	-	20
Nickel, Dissolved	0.0038	0.5	0.5276	105		-	-	70-130	-	20
Zinc, Dissolved	ND	0.5	0.5652	113		-	-	70-130	-	20

Lab Duplicate Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET

Project Number: 129835-011

Lab Number: L1919950

Report Date: 05/28/19

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1237414-4 QC Sample: L1919705-01 Client ID: DUP Sample						
Mercury, Total	ND	ND	mg/l	NC		20
Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1237482-8 QC Sample: L1919950-01 Client ID: HA14-3_051319						
Iron, Total	26.6	26.0	mg/l	2		20
Total Hardness by SM 2340B - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1237482-8 QC Sample: L1919950-01 Client ID: HA14-3_051319						
Hardness	768	773	mg/l	1		20
Total Metals - Mansfield Lab Associated sample(s): 01-02 QC Batch ID: WG1237488-4 QC Sample: L1919950-01 Client ID: HA14-3_051319						
Antimony, Total	ND	ND	mg/l	NC		20
Arsenic, Total	0.01924	0.01938	mg/l	1		20
Cadmium, Total	0.00498	0.00495	mg/l	1		20
Chromium, Total	0.01729	0.01605	mg/l	7		20
Copper, Total	0.04675	0.04508	mg/l	4		20
Lead, Total	0.07502	0.07086	mg/l	6		20
Nickel, Total	0.2161	0.2152	mg/l	0		20
Selenium, Total	0.04378	0.04244	mg/l	3		20
Silver, Total	ND	ND	mg/l	NC		20
Zinc, Total	1.859	1.808	mg/l	3		20

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Duplicate Analysis
Batch Quality Control

Lab Number: L1919950
Report Date: 05/28/19

Parameter	Native Sample	Duplicate Sample	Units	RPD	RPD Limits
Dissolved Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1240934-4 QC Sample: L1921130-01 Client ID: DUP Sample					
Cadmium, Dissolved	ND	ND	mg/l	NC	20
Lead, Dissolved	ND	ND	mg/l	NC	20
Nickel, Dissolved	0.0040	0.0039	mg/l	1	20
Zinc, Dissolved	ND	ND	mg/l	NC	20
Dissolved Metals - Mansfield Lab Associated sample(s): 01 QC Batch ID: WG1240934-6 QC Sample: L1921130-02 Client ID: DUP Sample					
Cadmium, Dissolved	ND	ND	mg/l	NC	20
Lead, Dissolved	ND	ND	mg/l	NC	20
Nickel, Dissolved	0.0038	0.0038	mg/l	1	20
Zinc, Dissolved	ND	ND	mg/l	NC	20

INORGANICS & MISCELLANEOUS

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

SAMPLE RESULTS

Lab ID: L1919950-01
Client ID: HA14-3_051319
Sample Location: BOSTON, MA

Date Collected: 05/13/19 10:45
Date Received: 05/13/19
Field Prep: Refer to COC

Sample Depth:
Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total Suspended	350		mg/l	25	NA	5	-	05/16/19 13:25	121,2540D	DR
Cyanide, Total	ND		mg/l	0.005	--	1	05/14/19 14:35	05/15/19 11:26	121,4500CN-CE	LH
Chlorine, Total Residual	ND		mg/l	0.02	--	1	-	05/13/19 22:05	121,4500CL-D	AS
Nitrogen, Ammonia	0.892		mg/l	0.075	--	1	05/14/19 15:32	05/14/19 22:07	121,4500NH3-BH	AT
TPH, SGT-HEM	ND		mg/l	4.00	--	1	05/14/19 15:40	05/14/19 16:00	74,1664A	DR
Phenolics, Total	ND		mg/l	0.030	--	1	05/15/19 04:47	05/16/19 04:55	4,420.1	GD
Chromium, Hexavalent	ND		mg/l	0.010	--	1	05/14/19 02:37	05/14/19 04:10	1,7196A	EJ
Anions by Ion Chromatography - Westborough Lab										
Chloride	125.		mg/l	12.5	--	25	-	05/14/19 17:37	44,300.0	JT



Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

SAMPLE RESULTS

Lab ID: L1919950-02
Client ID: RWS_051319
Sample Location: BOSTON, MA

Date Collected: 05/13/19 13:00
Date Received: 05/13/19
Field Prep: Not Specified

Sample Depth:
Matrix: Water

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
pH (H)	7.7		SU	-	NA	1	-	05/14/19 06:11	121,4500H+-B	MA
Nitrogen, Ammonia	0.172		mg/l	0.075	--	1	05/14/19 15:32	05/14/19 22:07	121,4500NH3-BH	AT



Project Name: 1000 BOYLSTON STREET**Lab Number:** L1919950**Project Number:** 129835-011**Report Date:** 05/28/19

Method Blank Analysis Batch Quality Control

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab for sample(s): 01 Batch: WG1236698-1										
Chlorine, Total Residual	ND		mg/l	0.02	--	1	-	05/13/19 22:05	121,4500CL-D	AS
General Chemistry - Westborough Lab for sample(s): 01 Batch: WG1236753-1										
Chromium, Hexavalent	ND		mg/l	0.010	--	1	05/14/19 02:37	05/14/19 04:08	1,7196A	EJ
General Chemistry - Westborough Lab for sample(s): 01 Batch: WG1236864-1										
TPH, SGT-HEM	ND		mg/l	4.00	--	1	05/14/19 15:40	05/14/19 16:00	74,1664A	DR
General Chemistry - Westborough Lab for sample(s): 01 Batch: WG1236890-1										
Cyanide, Total	ND		mg/l	0.005	--	1	05/14/19 14:35	05/15/19 11:11	121,4500CN-CE	LH
General Chemistry - Westborough Lab for sample(s): 01-02 Batch: WG1236964-1										
Nitrogen, Ammonia	ND		mg/l	0.075	--	1	05/14/19 15:32	05/14/19 21:40	121,4500NH3-BH	AT
General Chemistry - Westborough Lab for sample(s): 01 Batch: WG1237235-1										
Phenolics, Total	ND		mg/l	0.030	--	1	05/15/19 04:47	05/16/19 04:53	4,420.1	GD
Anions by Ion Chromatography - Westborough Lab for sample(s): 01 Batch: WG1237281-1										
Chloride	ND		mg/l	0.500	--	1	-	05/14/19 16:49	44,300.0	JT
General Chemistry - Westborough Lab for sample(s): 01 Batch: WG1237765-1										
Solids, Total Suspended	ND		mg/l	5.0	NA	1	-	05/16/19 13:25	121,2540D	DR



Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET

Project Number: 129835-011

Lab Number: L1919950

Report Date: 05/28/19

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01 Batch: WG1236698-2								
Chlorine, Total Residual	108		-		90-110	-		
General Chemistry - Westborough Lab Associated sample(s): 01 Batch: WG1236753-2								
Chromium, Hexavalent	98		-		85-115	-		20
General Chemistry - Westborough Lab Associated sample(s): 02 Batch: WG1236809-1								
pH	100		-		99-101	-		5
General Chemistry - Westborough Lab Associated sample(s): 01 Batch: WG1236864-2								
TPH	83		-		64-132	-		34
General Chemistry - Westborough Lab Associated sample(s): 01 Batch: WG1236890-2								
Cyanide, Total	94		-		90-110	-		
General Chemistry - Westborough Lab Associated sample(s): 01-02 Batch: WG1236964-2								
Nitrogen, Ammonia	102		-		80-120	-		20
General Chemistry - Westborough Lab Associated sample(s): 01 Batch: WG1237235-2								
Phenolics, Total	80		-		70-130	-		

Lab Control Sample Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET**Project Number:** 129835-011**Lab Number:** L1919950**Report Date:** 05/28/19

Parameter	LCS %Recovery	LCSD %Recovery	%Recovery Limits	RPD	RPD Limits
Anions by Ion Chromatography - Westborough Lab Associated sample(s): 01 Batch: WG1237281-2					
Chloride	103	-	90-110	-	

Matrix Spike Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET

Project Number: 129835-011

Lab Number: L1919950

Report Date: 05/28/19

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1236698-4 QC Sample: L1919950-01 Client ID: HA14-3_051319												
Chlorine, Total Residual	ND	0.25	0.25	100		-	-		80-120	-		20
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1236753-4 QC Sample: L1919950-01 Client ID: HA14-3_051319												
Chromium, Hexavalent	ND	0.1	0.098	98		-	-		85-115	-		20
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1236864-4 QC Sample: L1919744-03 Client ID: MS Sample												
TPH	ND	20	9.90	50	Q	-	-		64-132	-		34
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1236890-4 QC Sample: L1919950-01 Client ID: HA14-3_051319												
Cyanide, Total	ND	0.2	0.209	104		-	-		90-110	-		30
General Chemistry - Westborough Lab Associated sample(s): 01-02 QC Batch ID: WG1236964-4 QC Sample: L1919316-01 Client ID: MS Sample												
Nitrogen, Ammonia	ND	4	3.73	93		-	-		80-120	-		20
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1237235-4 QC Sample: L1920160-01 Client ID: MS Sample												
Phenolics, Total	ND	0.4	0.20	49	Q	-	-		70-130	-		20
Anions by Ion Chromatography - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1237281-3 QC Sample: L1919584-06 Client ID: MS Sample												
Chloride	22.8	4	26.1	83	Q	-	-		90-110	-		18

Lab Duplicate Analysis

Batch Quality Control

Project Name: 1000 BOYLSTON STREET

Project Number: 129835-011

Lab Number: L1919950

Report Date: 05/28/19

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1236698-3 QC Sample: L1919927-01 Client ID: DUP Sample						
Chlorine, Total Residual	1.0	1.0	mg/l	0		20
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1236753-3 QC Sample: L1919950-01 Client ID: HA14-3_051319						
Chromium, Hexavalent	ND	ND	mg/l	NC		20
General Chemistry - Westborough Lab Associated sample(s): 02 QC Batch ID: WG1236809-2 QC Sample: L1919867-01 Client ID: DUP Sample						
pH	8.1	8.0	SU	1		5
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1236864-3 QC Sample: L1919949-02 Client ID: DUP Sample						
TPH	ND	ND	mg/l	NC		34
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1236890-3 QC Sample: L1919618-01 Client ID: DUP Sample						
Cyanide, Total	ND	0.005	mg/l	NC		30
General Chemistry - Westborough Lab Associated sample(s): 01-02 QC Batch ID: WG1236964-3 QC Sample: L1919316-01 Client ID: DUP Sample						
Nitrogen, Ammonia	ND	ND	mg/l	NC		20
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1237235-3 QC Sample: L1920160-01 Client ID: DUP Sample						
Phenolics, Total	ND	ND	mg/l	NC		20
Anions by Ion Chromatography - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1237281-4 QC Sample: L1919584-06 Client ID: DUP Sample						
Chloride	22.8	22.8	mg/l	0		18
General Chemistry - Westborough Lab Associated sample(s): 01 QC Batch ID: WG1237765-2 QC Sample: L1919949-01 Client ID: DUP Sample						
Solids, Total Suspended	310	340	mg/l	9		29

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Serial_No:05281913:26
Lab Number: L1919950
Report Date: 05/28/19

Sample Receipt and Container Information

Were project specific reporting limits specified?

YES

Cooler Information

Cooler	Custody Seal
A	Absent

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L1919950-01A	Vial Na2S2O3 preserved	A	NA		4.5	Y	Absent		624.1-RGP(7),624.1-SIM-RGP(7),504(14)
L1919950-01B	Vial Na2S2O3 preserved	A	NA		4.5	Y	Absent		624.1-RGP(7),624.1-SIM-RGP(7),504(14)
L1919950-01C	Vial HCl preserved	A	NA		4.5	Y	Absent		SUB-ETHANOL(14)
L1919950-01D	Vial HCl preserved	A	NA		4.5	Y	Absent		SUB-ETHANOL(14)
L1919950-01E	Vial HCl preserved	A	NA		4.5	Y	Absent		SUB-ETHANOL(14)
L1919950-01F	Vial unpreserved	A	NA		4.5	Y	Absent		ARCHIVE()
L1919950-01G	Plastic 250ml NaOH preserved	A	>12	>12	4.5	Y	Absent		HOLD-WETCHEM(),TCN-4500(14)
L1919950-01H	Plastic 250ml HNO3 preserved	A	<2	<2	4.5	Y	Absent		PB-2008S(180),ZN-2008S(180),NI-2008S(180),CD-2008S(180)
L1919950-01I	Plastic 250ml HNO3 preserved	A	<2	<2	4.5	Y	Absent		CD-2008T(180),NI-2008T(180),ZN-2008T(180),CU-2008T(180),FE-UI(180),HARDU(180),AG-2008T(180),AS-2008T(180),HG-U(28),SE-2008T(180),CR-2008T(180),PB-2008T(180),SB-2008T(180)
L1919950-01J	Plastic 500ml H2SO4 preserved	A	<2	<2	4.5	Y	Absent		NH3-4500(28)
L1919950-01K	Plastic 950ml unpreserved	A	7	7	4.5	Y	Absent		CL-300(28),HEXCR-7196(1),TRC-4500(1)
L1919950-01L	Plastic 950ml unpreserved	A	7	7	4.5	Y	Absent		TSS-2540(7)
L1919950-01M	Amber 1000ml Na2S2O3	A	6	6	4.5	Y	Absent		625.1-RGP(7),PCB-608.3(7),625.1-SIM-RGP(7)
L1919950-01N	Amber 1000ml Na2S2O3	A	6	6	4.5	Y	Absent		625.1-RGP(7),PCB-608.3(7),625.1-SIM-RGP(7)
L1919950-01O	Amber 1000ml Na2S2O3	A	6	6	4.5	Y	Absent		625.1-RGP(7),PCB-608.3(7),625.1-SIM-RGP(7)
L1919950-01P	Amber 1000ml Na2S2O3	A	6	6	4.5	Y	Absent		625.1-RGP(7),PCB-608.3(7),625.1-SIM-RGP(7)
L1919950-01Q	Amber 950ml H2SO4 preserved	A	<2	<2	4.5	Y	Absent		TPHENOL-420(28)
L1919950-01R	Amber 1000ml HCl preserved	A	NA		4.5	Y	Absent		TPH-1664(28)
L1919950-02A	Plastic 60ml unpreserved	A	7	7	4.5	Y	Absent		PH-4500(.01)

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Serial_No:05281913:26
Lab Number: L1919950
Report Date: 05/28/19

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L1919950-02B	Plastic 250ml HNO3 preserved	A	<2	<2	4.5	Y	Absent		CD-2008T(180),NI-2008T(180),ZN-2008T(180),CU-2008T(180),FE-UI(180),HARDU(180),AG-2008T(180),AS-2008T(180),HG-U(28),SE-2008T(180),CR-2008T(180),PB-2008T(180),SB-2008T(180)
L1919950-02C	Plastic 500ml H2SO4 preserved	A	<2	<2	4.5	Y	Absent		NH3-4500(28)

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

GLOSSARY

Acronyms

DL	- Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the limit of quantitation (LOQ). The DL includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
EDL	- Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).
EMPC	- Estimated Maximum Possible Concentration: The concentration that results from the signal present at the retention time of an analyte when the ions meet all of the identification criteria except the ion abundance ratio criteria. An EMPC is a worst-case estimate of the concentration.
EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LOD	- Limit of Detection: This value represents the level to which a target analyte can reliably be detected for a specific analyte in a specific matrix by a specific method. The LOD includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
LOQ	- Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
	Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available. For Method 332.0, the spike recovery is calculated using the native concentration, including estimated values.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NDPA/DPA	- N-Nitrosodiphenylamine/Diphenylamine.
NI	- Not Ignitable.
NP	- Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.
STLP	- Semi-dynamic Tank Leaching Procedure per EPA Method 1315.
TEF	- Toxic Equivalency Factors: The values assigned to each dioxin and furan to evaluate their toxicity relative to 2,3,7,8-TCDD.
TEQ	- Toxic Equivalent: The measure of a sample's toxicity derived by multiplying each dioxin and furan by its corresponding TEF and then summing the resulting values.
TIC	- Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.

Footnotes

Report Format: Data Usability Report



Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1.8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Final pH: As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

Frozen Date/Time: With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

Initial pH: As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

PFAS Total: With respect to PFAS analyses, the 'PFAS, Total (5)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA and PFOS. If a 'Total' result is requested, the results of its individual components will also be reported.

Total: With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

Data Qualifiers

- A** - Spectra identified as "Aldol Condensation Product".
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).
- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- J** - Estimated value. This represents an estimated concentration for Tentatively Identified Compounds (TICs).
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- ND** - Not detected at the reporting limit (RL) for the sample.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.

Project Name: 1000 BOYLSTON STREET
Project Number: 129835-011

Lab Number: L1919950
Report Date: 05/28/19

REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IV, 2007.
- 3 Methods for the Determination of Metals in Environmental Samples, Supplement I. EPA/600/R-94/111. May 1994.
- 4 Methods for Chemical Analysis of Water and Wastes. EPA 600/4-79-020. Revised March 1983.
- 14 Methods for the Determination of Organic Compounds in Finished Drinking Water and Raw Source Water. EPA/600/4-88/039, Revised July 1991.
- 19 Inductively Coupled Plasma Atomic Emission Spectrometric Method for Trace Element Analysis of Water and Wastes. Appendix C, Part 136, 40 CFR (Code of Federal Regulations). July 1, 1999 edition.
- 44 Methods for the Determination of Inorganic Substances in Environmental Samples, EPA/600/R-93/100, August 1993.
- 74 Method 1664, Revision A: N-Hexane Extractable Material (HEM; Oil & Grease) and Silica Gel Treated N-Hexane Extractable Material (SGT-HEM; Non-polar Material) by Extraction and Gravimetry, EPA-821-R-98-002, February 1999.
- 107 Alpha Analytical - In-house calculation method.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.
- 127 Method 608.3: Organochlorine Pesticides and PCBs by GC/HSD, EPA 821-R-16-009, December 2016.
- 128 Method 624.1: Purgeables by GC/MS, EPA 821-R-16-008, December 2016.
- 129 Method 625.1: Base/Neutrals and Acids by GC/MS, EPA 821-R-16-007, December 2016.

LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



Alpha Analytical, Inc.Facility: **Company-wide**Department: **Quality Assurance**Title: **Certificate/Approval Program Summary**ID No.: **17873**

Revision 12

Published Date: 10/9/2018 4:58:19 PM

Page 1 of 1

Certification Information





The following analytes are not included in our Primary NELAP Scope of Accreditation:


Westborough Facility**EPA 624/624.1:** m/p-xylene, o-xylene**EPA 8260C:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), Methyl methacrylate, 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**EPA 6860:** SCM: Perchlorate**SM4500:** NPW: Amenable Cyanide; SCM: Total Phosphorus, TKN, NO₂, NO₃.**Mansfield Facility****SM 2540D:** TSS**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene, 3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.**Biological Tissue Matrix:** EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

Westborough Facility:**Drinking Water****EPA 300.0:** Chloride, Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE,****EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH:** Ammonia-N and Kjeldahl-N, **EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **EPA 351.1, SM4500NO3-F, EPA 353.2:** Nitrate-N, **SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D, EPA 300:** Chloride, Sulfate, Nitrate.**EPA 624.1:** Volatile Halocarbons & Aromatics,**EPA 608.3:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs**EPA 625.1:** SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E, EPA 1600, EPA 1603.****Mansfield Facility:****Drinking Water****EPA 200.7:** Al, Ba, Cd, Cr, Cu, Fe, Mn, Ni, Na, Ag, Ca, Zn. **EPA 200.8:** Al, Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn. **EPA 245.1 Hg. EPA 522.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Fe, Pb, Mn, Ni, K, Se, Ag, Na, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

 CHAIN OF CUSTODY <small>4 Walling Dr. Toll: 800-660-0030 Fax: 508-660-0150</small>		Service Centers <small>Brewster, ME 04412 Portland, ME 04101 Mahwah, NJ 07430 Albany, NY 12240 Towamencin, NJ 07050 Bellingham, WA 98201</small>		Page 1 of 1		Date Rec'd in Lab <div style="font-size: 1.5em; color: blue;">5/13/19</div>		ALPHA Job # <div style="font-size: 1.5em; color: blue;">L1919950</div>	
Project Information Project Name: 1300 Boylston Street Project Location: Boston, MA Project # 129835-011 (Use Project name as Proj. #)		Deliverables <input checked="" type="checkbox"/> Email <input type="checkbox"/> Fax <input type="checkbox"/> EQUS (1 File) <input type="checkbox"/> EQUS (4 File) <input type="checkbox"/> Other:		Billing Information <input checked="" type="checkbox"/> Same as Client Info PO #		Regulatory Requirements (Program/Criteria) MA: NPDES RCP		Disposal Site Information Please identify below location of applicable disposal facilities. Disposal Facility: <input type="checkbox"/> NJ <input type="checkbox"/> NY <input type="checkbox"/> Other:	
HSA Information HSA Client: 1300 Boylston Street Owner LLC HSA Address: 405 Medford St Boston, MA 02112-1400 HSA Phone: 617-686-7400 HSA Fax: HSA Email: ghowan@pawelkies.com		Turn Around Time Standard <input checked="" type="checkbox"/> Due Date: (If pre-approved) <input type="checkbox"/> # of Days:		ANALYSIS		Sample Filtration <input type="checkbox"/> Done Lab to do <input type="checkbox"/> Preservation Lab to do (Please Specify below)		Sample Specific Comments	
These samples have been previously analyzed by Alpha: <input type="checkbox"/> Other project specific requirements/comments: 3. HOLD FROM & ACH 13. Dissolved Metals ON HOLD (Field Filtered) Please sample per EPA Approved 2017 RCP Permit methods		Please specify Metals or TAs:		1. TSS - 2540 2. TSSC-4500 3. TON-4500 HOLD FROM & ACH 4. S04 5. 8050 & 8200 GEM for Chloride 6. HEDZ-3500 & Trivalent Chromium 7. THENDOL-420 8. E01 including (ethylenediamine) 9. A01-SMA or applicable method 10. CL-300 11. Total Metals - Ag, As, Cd, Cr, Cu, Mn, Pb, Se, Zn, Fe, Hg 12. Arsenic 13. Diss. Metals-Ag, As, Cd, Cr, Cu, Mn, Pb, Se, Zn, Fe, Hg 14. AL-ALCOHOL (Ethanol) 15. TPH-1084 16. PCB-608		<input type="checkbox"/> Done Lab to do <input type="checkbox"/> Preservation Lab to do (Please Specify below)		Sample Specific Comments	
ALPHA Lab ID (Lab Use Only) 19950-01		Sample ID H19-3_05/13/19		Collection Date: 5/13/19 Time: 1045		Sample Matrix AG		Sampler's Initials AF	
19950-02		RWS_05/13/19		Date: 5/13/19 Time: 1300		AA		AF	
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₈ IE = Zn Ac/NaOH J = Other		Container Code: P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = 800 Bottle		Westboro Certification No: M0035 Manchester Certification No: M0015		Container Type Preservative		Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. Alpha Analytical's services under this Chain of Custody shall be performed in accordance with terms and conditions within Blanket Service Agreements 2018-22-Alpha Analytical by and between Haley & Mohr, Inc., its subsidiaries and affiliates and Alpha Analytical.	
Relinquished By: 		Date/Time: 5/13/19 5:13:15 PM		Received By: 		Date/Time: 5/13/19 16:24		Relinquished By: 	
Date/Time: 5/13/19 5:13:15 PM		Date/Time: 5/13/19 16:24		Date/Time: 5/13/19 16:30		Date/Time: 5/13/19 16:30		Date/Time: 5/13/19 16:30	
Date/Time: 5/13/19 16:30		Date/Time: 5/13/19 16:30		Date/Time: 5/13/19 16:30		Date/Time: 5/13/19 16:30		Date/Time: 5/13/19 16:30	

		Subcontract Chain of Custody Test America (Nashville) 2980 Foster Creighton Drive Nashville, TN 37204		Alpha Job Number L1919950	
Client Information		Project Information		Regulatory Requirements/Report Limits	
Client: Alpha Analytical Labs Address: Eight Walkup Drive Westborough, MA 01581-1019 Phone: 603.319.5010 Email: mgull@alphalab.com		Project Location: MA Project Manager: Melissa Gull Turnaround & Deliverables Information Due Date: Deliverables:		State/Federal Program: Regulatory Criteria:	
Project Specific Requirements and/or Report Requirements					
Reference following Alpha Job Number on final report/deliverables: L1919950				Report to include Method Blank, LCS/LCSD:	
Additional Comments: Send all results/reports to subreports@alphalab.com					
Lab ID	Client ID	Collection Date/Time	Sample Matrix	Analysis	Batch QC
	HA14-3_051319	05-13-19 10:45	WATER	Ethanol by EPA 1871 Revision A	
Relinquished By:		Date/Time:	Received By:	Date/Time:	
Chen Zickman		5/14/19			
Form No: AL_subcoc					



Environment Testing
TestAmerica

ANALYTICAL REPORT

Eurofins TestAmerica, Nashville
2960 Foster Creighton Drive
Nashville, TN 37204
Tel: (615)726-0177

Laboratory Job ID: 490-174013-1
Client Project/Site: L1919950

For:

Alpha Analytical Inc
145 Flanders Road
Westborough, Massachusetts 01581-1019

Attn: Melissa Gulli

Authorized for release by:
5/21/2019 3:48:21 PM

Ken Hayes, Project Manager II
(615)301-5035
ken.hayes@testamericainc.com

LINKS

Review your project
results through
TotalAccess

Have a Question?



Visit us at:
www.testamericainc.com

The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

Table of Contents

Cover Page	1
Table of Contents	2
Sample Summary	3
Case Narrative	4
Definitions	5
Client Sample Results	6
QC Sample Results	7
QC Association	8
Chronicle	9
Method Summary	10
Certification Summary	11
Chain of Custody	12

Sample Summary

Client: Alpha Analytical Inc
Project/Site: L1919950

Job ID: 490-174013-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Assest ID
490-174013-1	HA14-3_051319	Water	05/13/19 10:45	05/15/19 09:20	

1

2

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Case Narrative

Client: Alpha Analytical Inc
Project/Site: L1919950

Job ID: 490-174013-1

Job ID: 490-174013-1

Laboratory: Eurofins TestAmerica, Nashville

Narrative

Job Narrative
490-174013-1

Comments

No additional comments.

Receipt

The sample was received on 5/15/2019 9:20 AM; the sample arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 0.9° C.

GC Semi VOA

Method 1671A: The laboratory control sample (LCS) laboratory control sample duplicate (LCSD), matrix spike (MS) and matrix spike duplicate (MSD) for analytical batch 490-596565 recovered outside control limits for the following analyte: Ethanol. This analyte was biased high in the QC samples and was not detected in the following associated sample(s); therefore, the data have been reported: HA14-3_051319 (490-174013-1).

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

Definitions/Glossary

Client: Alpha Analytical Inc
Project/Site: L1919950

Job ID: 490-174013-1

Qualifiers

GC VOA

Qualifier	Qualifier Description
*	LCS or LCSD is outside acceptance limits.
F1	MS and/or MSD Recovery is outside acceptance limits.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
□	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Client Sample Results

Client: Alpha Analytical Inc
Project/Site: L1919950

Job ID: 490-174013-1

Client Sample ID: HA14-3_051319

Lab Sample ID: 490-174013-1

Date Collected: 05/13/19 10:45

Matrix: Water

Date Received: 05/15/19 09:20

Method: 1671A - Ethanol (GC/FID)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethanol	ND	*	2000	500	ug/L	-		05/21/19 12:45	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Isopropyl acetate (Surr)	90		70 - 130		05/21/19 12:45	1

QC Sample Results

Client: Alpha Analytical Inc
Project/Site: L1919950

Job ID: 490-174013-1

Method: 1671A - Ethanol (GC/FID)

Lab Sample ID: MB 490-596565/4

Matrix: Water

Analysis Batch: 596565

Client Sample ID: Method Blank

Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ethanol	ND		2000	500	ug/L			05/21/19 12:27	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
Isopropyl acetate (Surr)	86		70 - 130					05/21/19 12:27	1

Lab Sample ID: LCS 490-596565/5

Matrix: Water

Analysis Batch: 596565

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethanol	30100	45350	*	ug/L		150	70 - 130
Surrogate	LCS %Recovery	LCS Qualifier	Limits				
Isopropyl acetate (Surr)	86		70 - 130				

Lab Sample ID: LCSD 490-596565/6

Matrix: Water

Analysis Batch: 596565

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	Limit
Ethanol	30100	45250	*	ug/L		150	70 - 130	0	20
Surrogate	LCSD %Recovery	LCSD Qualifier	Limits						
Isopropyl acetate (Surr)	87		70 - 130						

Lab Sample ID: 490-174167-A-1 MS

Matrix: Water

Analysis Batch: 596565

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethanol	ND	* F1	30100	43680	F1	ug/L		145	70 - 130
Surrogate	MS %Recovery	MS Qualifier	Limits						
Isopropyl acetate (Surr)	98		70 - 130						

Lab Sample ID: 490-174167-A-1 MSD

Matrix: Water

Analysis Batch: 596565

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	Limit
Ethanol	ND	* F1	30100	47650	F1	ug/L		158	70 - 130	9	20
Surrogate	MSD %Recovery	MSD Qualifier	Limits								
Isopropyl acetate (Surr)	100		70 - 130								

QC Association Summary

Client: Alpha Analytical Inc
Project/Site: L1919950

Job ID: 490-174013-1

GC VOA

Analysis Batch: 596565

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
490-174013-1	HA14-3_051319	Total/NA	Water	1671A	
MB 490-596565/4	Method Blank	Total/NA	Water	1671A	
LCS 490-596565/5	Lab Control Sample	Total/NA	Water	1671A	
LCSD 490-596565/6	Lab Control Sample Dup	Total/NA	Water	1671A	
490-174167-A-1 MS	Matrix Spike	Total/NA	Water	1671A	
490-174167-A-1 MSD	Matrix Spike Duplicate	Total/NA	Water	1671A	

Lab Chronicle

Client: Alpha Analytical Inc
Project/Site: L1919950

Job ID: 490-174013-1

Client Sample ID: HA14-3_051319

Lab Sample ID: 490-174013-1

Date Collected: 05/13/19 10:45

Matrix: Water

Date Received: 05/15/19 09:20

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	1671A		1			596565	05/21/19 12:45	AAB	TAL NSH

Laboratory References:

TAL NSH = Eurofins TestAmerica, Nashville, 2960 Foster Creighton Drive, Nashville, TN 37204, TEL (615)726-0177

Method Summary

Client: Alpha Analytical Inc
Project/Site: L1919950

Job ID: 490-174013-1

Method	Method Description	Protocol	Laboratory
1671A	Ethanol (GC/FID)	EPA	TAL NSH

Protocol References:

EPA = US Environmental Protection Agency

Laboratory References:

TAL NSH = Eurofins TestAmerica, Nashville, 2960 Foster Creighton Drive, Nashville, TN 37204, TEL (615)726-0177

Accreditation/Certification Summary

Client: Alpha Analytical Inc
Project/Site: L1919950

Job ID: 490-174013-1

Laboratory: Eurofins TestAmerica, Nashville

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

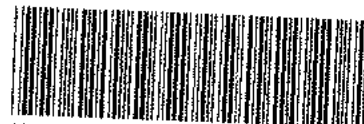
Authority	Program	EPA Region	Identification Number	Expiration Date
California	State Program	9	2938	06-30-19

The following analytes are included in this report, but the laboratory is not certified by the governing authority. This list may include analytes for which the agency does not offer certification.

Analysis Method	Prep Method	Matrix	Analyte
1671A		Water	Ethanol
Maine	State Program	1	TN00032
			11-03-19

The following analytes are included in this report, but the laboratory is not certified by the governing authority. This list may include analytes for which the agency does not offer certification.

Analysis Method	Prep Method	Matrix	Analyte
1671A		Water	Ethanol

TestAmericaTHE LEADER IN ENVIRONMENTAL TESTING
Nashville, TN**COOLER RECEIPT FORM**

490-174013 Chain of Custody


Cooler Received/Opened On 05-15-2019 @ 09:20Time Samples Removed From Cooler 09:34 Time Samples Placed in Storage _____ (2 Hour Window)1. Tracking # 1ZE306540198814217 (last 4 digits, FedEx) Courier: UPS NDA
IR Gun ID 31470368 pH Strip Lot N/A Chlorine Strip Lot N/A2. Temperature of rep. sample or temp blank when opened: 0.9 Degrees Celsius3. If Item #2 temperature is 0°C or less, was the representative sample or temp blank frozen? YES NO... NA4. Were custody seals on outside of cooler? YES... NO...NA

If yes, how many and where: _____

5. Were the seals intact, signed, and dated correctly? YES...NO... NA6. Were custody papers inside cooler? YES...NO... NAI certify that I opened the cooler and answered questions 1-6 (initial) KD7. Were custody seals on containers: YES NO and intact YES...NO... NAWere these signed and dated correctly? YES...NO... NA8. Packing mat'l used? Bubblewrap Plastic bag Peanuts Vermiculite Foam Insert Paper Other None9. Cooling process: ice Ice-pack Ice (direct contact) Dry Ice Other None10. Did all containers arrive in good condition (unbroken)? YES...NO... NA11. Were all container labels complete (#, date, signed, pres., etc)? YES...NO... NA12. Did all container labels and tags agree with custody papers? YES...NO... NA13a. Were VOA vials received? YES...NO... NAb. Was there any observable headspace present in any VOA vial? YES...NO... NA

Larger than this.

14. Was there a Trip Blank in this cooler? YES...NO... NA If multiple coolers, sequence # _____I certify that I unloaded the cooler and answered questions 7-14 (initial) KD15a. On pres'd bottles, did pH test strips suggest preservation reached the correct pH level? YES...NO... NAb. Did the bottle labels indicate that the correct preservatives were used YES...NO... NA16. Was residual chlorine present? YES...NO... NAI certify that I checked for chlorine and pH as per SOP and answered questions 15-16 (initial) KD17. Were custody papers properly filled out (ink, signed, etc)? YES...NO... NA18. Did you sign the custody papers in the appropriate place? YES...NO... NA19. Were correct containers used for the analysis requested? YES...NO... NA20. Was sufficient amount of sample sent in each container? YES...NO... NAI certify that I entered this project into LIMS and answered questions 17-20 (initial) KDI certify that I attached a label with the unique LIMS number to each container (initial) KD21. Were there Non-Conformance issues at login? YES...NO... NO Was a NCM generated? YES...NO... NO # _____

		Subcontract Chain of Custody Test America (Nashville) 2960 Foster Creighton Drive Nashville, TN 37204		Alpha Job Number L1919950	
Client Information Client: Alpha Analytical Labs Address: Eight Walkup Drive Westborough, MA 01581-1019 Phone: 603.319.5010 Email: mgulli@alphalab.com		Project Information Project Location: MA Project Manager: Melissa Gulli Turnaround & Deliverables Information Due Date: Deliverables:		Regulatory Requirements/Report Limits State/Federal Program: Regulatory Criteria:	
Project Specific Requirements and/or Report Requirements					
Reference following Alpha Job Number on final report/deliverables: L1919950				Report to include Method Blank, LCS/LCSD:	
Additional Comments: Send all results/reports to subreports@alphalab.com					
Lab ID	Client ID	Collection Date/Time	Sample Matrix	Analysis	Batch QC
	HA14-3_051319	05-13-19 10:45	WATER	Ethanol by EPA 1671 Revision A	
			Loc: 490 174013		
Relinquished By:		Date/Time:	Received By:	Date/Time:	
Chen G. Gulli		5/14/19	MSH	05-15-2019 09:20	
Form No: AL_subcoc					

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