



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
Region 1
5 Post Office Square, Suite 100
BOSTON, MA 02109-3912

CERTIFIED MAIL RETURN RECEIPT REQUESTED

MAY 03 2012

Mark Trettel
Vice President
The Torrey Company, Inc.
25 Messenger St.
Plainville, MA 02762

Re: Authorization to discharge under the Remediation General Permit (RGP) –
MAG910000. Chestnut Hill Shopping Center site located at 55 Boylston Street, Newton,
MA 02467, Middlesex County; Authorization # MAG910533

Dear Mr. Trettel:

Based on the review of a Notice of Intent (NOI) submitted by your firm The Torrey Company, Inc., for the site referenced above, the U.S. Environmental Protection Agency (EPA) hereby authorizes you, as the named Operator, to discharge in accordance with the provisions of the RGP at that site. Your authorization number is listed above.

The checklist enclosed with this RGP authorization indicates the pollutants which you are required to monitor. Also indicated on the checklist are the effluent limits, test methods and minimum levels (MLs) for each pollutant. Please note that the checklist does not represent the complete requirements of the RGP. Operators must comply with all of the applicable requirements of this permit, including influent and effluent monitoring, narrative water quality standards, record keeping, and reporting requirements, found in Parts I and II, and Appendices I – VIII of the RGP. See EPA's website for the complete RGP and other information at: <http://www.epa.gov/region1/npdes/mass.html#dgp>.

Please note the enclosed checklist includes parameters that exceeded Appendix III limits. The checklist also includes other parameters for which your laboratory reports indicated there was insufficient sensitivity to detect these parameters at the minimum levels established in Appendix VI of the RGP.

Also, please note that the metals included on the checklist are dilution dependent pollutants and subject to limitations based on a dilution factor range (DFR). With the absence of dilution to ponds, EPA determined that the DFR for each parameter is in the one and five (1-5) range. (See the RGP Appendix IV for Massachusetts facilities) Therefore, the limits for antimony of 5.6 ug/L, arsenic of 10 ug/L, trivalent chromium of

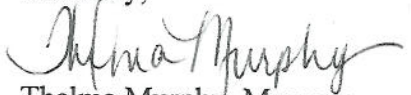
48.8 ug/L, copper of 5.2 ug/L, nickel of 29 ug/L, zinc of 66.6 ug/L and iron of 1,000 ug/L, are required to achieve permit compliance at your site.

Finally, please note the checklist of pollutants attached to this authorization is subject to a recertification if the operations at the site result in a discharge lasting longer than six months. A recertification can be submitted to EPA within six (6) to twelve (12) months of operations in accordance with the 2010 RGP regulations.

This general permit and authorization to discharge will expire on September 9, 2015. You have reported that this project will terminate on December 31, 2012. If for any reason the discharge terminates sooner you are required to submit a Notice of Termination (NOT) to the attention of the contact person indicated below within 30 days of project completion.

Thank you in advance for your cooperation in this matter. Please contact Victor Alvarez at 617-918-1572 or Alvarez.Victor@epa.gov, if you have any questions.

Sincerely,


Thelma Murphy, Manager
Storm Water and Construction
Permits Section

Enclosure

cc: Kathleen Keohane, MassDEP
Anne Phelps, Newton CC

**2010 Remediation General Permit
Summary of Monitoring Parameters^[1]**

NPDES Authorization Number:		MAG910533
Authorization Issued:	April, 2012	
Facility/Site Name:	Chestnut Hill Shopping Center	
Facility/Site Address:	55 Boylston St. Newton, MA 02467, Middlesex County	
	Email address of owner: dave.yrk@wsdevelopment.com	
Legal Name of Operator:	The Torrey Company, Inc.	
Operator contact name, title, and Address:	15 Messenger Street, Plainville, MA 02762, Norfolk County	
	Email: mark.trettel@torreyco.com	
Estimated date of Completion:	December 31, 2012	
Category and Sub-Category:	Category III- Contaminated Construction Dewatering. Sub-category A. General Urban Fill Sites	
RGP Termination Date:	September 10, 2015	
Receiving Water:	Hammond Pond	

Monitoring & Limits are applicable if checked. All samples are to be collected as grab samples

	<u>Parameter</u>	<u>Effluent Limit/Method#/ML</u> (All Effluent Limits are shown as Daily Maximum Limit, unless denoted by a **, in that case it will be a Monthly Average Limit)
✓	1. Total Suspended Solids (TSS)	30 milligrams/liter (mg/L) **, 50 mg/L for hydrostatic testing **, Me#60.2/ML5ug/L
	2. Total Residual Chlorine (TRC) ¹	Freshwater = 11 ug/L ** Saltwater = 7.5 ug/L **/ Me#330.5/ML 20ug/L
	3. Total Petroleum Hydrocarbons (TPH)	5.0 mg/L/ Me# 1664A/ML 5.0mg/L
✓	4. Cyanide (CN) ^{2, 3}	Freshwater = 5.2 ug/l ** Saltwater = 1.0 ug/L **/ Me#335.4/ML 10ug/L
	5. Benzene (B)	5ug/L /50.0 ug/L for hydrostatic testing only/ Me#8260C/ML 2 ug/L
	6. Toluene (T)	(limited as ug/L total BTEX)/ Me#8260C/ ML 2ug/L
	7. Ethylbenzene (E)	(limited as ug/L total BTEX) Me#8260C/ ML 2ug/L
	8. (m,p,o) Xylenes (X)	(limited as ug/L total BTEX) Me#8260C/ ML 2ug/L
	9. Total Benzene, Toluene, Ethyl Benzene, and Xylenes (BTEX) ⁴	100 ug/L/ Me#8260C/ ML 2ug/L

	<u>Parameter</u>	<u>Effluent Limit/Method#/ML</u> (All Effluent Limits are shown as Daily Maximum Limit, unless denoted by a **, in that case it will be a Monthly Average Limit)
	10. Ethylene Dibromide (EDB) (1,2- Dibromoethane)	0.05 ug/l/ Me#8260C/ ML 10ug/L
	11. Methyl-tert-Butyl Ether (MtBE)	70.0 ug/l/Me#8260C/ML 10ug/L
	12.tert-Butyl Alcohol (TBA) (TertiaryButanol)	Monitor Only(ug/L)/Me#8260C/ML 10ug/L
	13. tert-Amyl Methyl Ether (TAME)	Monitor Only(ug/L)/Me#8260C/ML 10ug/L
	14. Naphthalene ⁵	20 ug/L /Me#8260C/ML 2ug/L
	15. Carbon Tetrachloride	4.4 ug/L /Me#8260C/ ML 5ug/L
	16. 1,2 Dichlorobenzene (o-DCB)	600 ug/L /Me#8260C/ ML 5ug/L
	17. 1,3 Dichlorobenzene (m-DCB)	320 ug/L /Me#8260C/ ML 5ug/L
	18. 1,4 Dichlorobenzene (p-DCB)	5.0 ug/L /Me#8260C/ ML 5ug/L
	18a. Total dichlorobenzene	763 ug/L - NH only /Me#8260C/ ML 5ug/L
	19. 1,1 Dichloroethane (DCA)	70 ug/L /Me#8260C/ ML 5ug/L
	20. 1,2 Dichloroethane (DCA)	5.0 ug/L /Me#8260C/ ML 5ug/L
	21. 1,1 Dichloroethene (DCE)	3.2 ug/L/Me#8260C/ ML 5ug/L
	22. cis-1,2 Dichloroethene (DCE)	70 ug/L/Me#8260C/ ML 5ug/L
	23. Methylene Chloride	4.6 ug/L/Me#8260C/ ML 5ug/L
	24. Tetrachloroethene (PCE)	5.0 ug/L/Me#8260C/ ML 5ug/L
	25. 1,1,1 Trichloro-ethane (TCA)	200 ug/L/Me#8260C/ ML 5ug/L
	26. 1,1,2 Trichloro-ethane (TCA)	5.0 ug/L /Me#8260C/ ML 5ug/L
	27. Trichloroethene (TCE)	5.0 ug/L /Me#8260C/ ML 5ug/L
	28. Vinyl Chloride (Chloroethene)	2.0 ug/L /Me#8260C/ ML 5ug/L
	29. Acetone	Monitor Only(ug/L)/Me#8260C/ML 50ug/L
	30. 1,4 Dioxane	Monitor Only /Me#1624C/ML 50ug/L
	31. Total Phenols	300 ug/L Me#420.1&420.2/ML 2 ug/L/ Me# 420.4 /ML 50ug/L
	32. Pentachlorophenol (PCP)	1.0 ug/L /Me#8270D/ML 5ug/L, Me#604 &625/ML 10ug/L
	33. Total Phthalates (Phthalate esters) ⁶	3.0 ug/L ** /Me#8270D/ML 5ug/L, Me#606/ML 10ug/L& Me#625/ML 5ug/L
	34. Bis (2-Ethylhexyl) Phthalate [Di- (ethylhexyl) Phthalate]	6.0 ug/L /Me#8270D/ML 5ug/L, Me#606/ML 10ug/L & Me#625/ML 5ug/L
	35. Total Group I Polycyclic Aromatic Hydrocarbons (PAH)	10.0 ug/L
	a. Benzo(a) Anthracene ⁷	0.0038 ug/L /Me#8270D/ ML 5ug/L, Me#610/ML 5ug/L& Me#625/ML 5ug/L

	<u>Parameter</u>	<u>Effluent Limit/Method#/ML</u> (All Effluent Limits are shown as Daily Maximum Limit, unless denoted by a **, in that case it will be a Monthly Average Limit)
✓	✓	✓
	c. Benzo(b)Fluoranthene ⁷	0.0038 ug/L /Me#8270D/ ML 5ug/L, Me#610/ML 5ug/L& Me#625/ML 5ug/L
	d. Benzo(k)Fluoranthene ⁷	0.0038 ug/L /Me#8270D/ ML 5ug/L, Me#610/ML 5ug/L& Me#625/ML 5ug/L
	e. Chrysene ⁷	0.0038 ug/L /Me#8270D/ML 5ug/L, Me#610/ML 5ug/L& Me#625/ML 5ug/L
	f. Dibenzo(a,h)anthracene ⁷	0.0038 ug/L /Me#8270D/ML 5ug/L, Me#610/ML 5ug/L& Me#625/ML 5ug/L
	g. Indeno(1,2,3-cd) Pyrene ⁷	0.0038 ug/L /Me#8270D/ML 5ug/L, Me#610/ML 5ug/L& Me#625/ML 5ug/L
	36. Total Group II Polycyclic Aromatic Hydrocarbons (PAH)	100 ug/L
	h. Acenaphthene	X/Me#8270D/ML 5ug/L, Me#610/ML 5ug/L & Me#625/ML 5ug/L
	i. Acenaphthylene	X/Me#8270D/ML 5ug/L, Me#610/ML 5ug/L & Me#625/ML 5ug/L
	j. Anthracene	X/Me#8270D/ML 5ug/L, Me#610/ML 5ug/L & Me#625/ML 5ug/L
	k. Benzo(ghi) Perylene	X/Me#8270D/ML 5ug/L, Me#610/ML 5ug/L & Me#625/ML 5ug/L
	l. Fluoranthene	X/Me#8270D/ML 5ug/L, Me#610/ML 5ug/L & Me#625/ML 5ug/L
	m. Fluorene	X/Me#8270D/ML 5ug/L, Me#610/ML 5ug/L & Me#625/ML 5ug/L
	n. Naphthalene ⁵	20 ug/L / Me#8270/ML 5ug/L, Me#610/ML 5ug/L & Me#625/ML 5ug/L
	o. Phenanthrene	X/Me#8270D/ML 5ug/L, Me#610/ML 5ug/L & Me#625/ML 5ug/L
	p. Pyrene	X/Me#8270D/ML 5ug/L, Me#610/ML 5ug/L & Me#625/ML 5ug/L
	37. Total Polychlorinated Biphenyls (PCBs) ^{8, 9}	0.000064 ug/L/Me# 608/ ML 0.5 ug/L
✓	38. Chloride	Monitor only/Me# 300.0/ ML 0.1ug/L

		<u>Total Recoverable Metal Limit @ H ¹⁰ = 50 mg/l CaCO3 for discharges in Massachusetts (ug/l)</u> _{11/12}		<u>Minimum level=ML</u>
	<u>Metal parameter</u>	<u>Freshwater</u>	<u>Saltwater</u>	
✓	39. Antimony	5.6/ML 10		
✓	40. Arsenic **	10/ML 20	36/ML 20	
	41. Cadmium **	0.2/ML 10	8.9/ML 10	

	Metal parameter	Total Recoverable Metal Limit @ H¹⁰ = 50 mg/l CaCO₃ for discharges in Massachusetts (ug/l) 11/12		Minimum level=ML	
		Freshwater	Saltwater		
✓	42. Chromium III (trivalent) **	48.8/ML15	100/ML 15		
	43. Chromium VI (hexavalent) **	11.4/ML10	50.3/ML 10		
✓	44. Copper **	5.2/ML15	3.7/ML 15		
	45. Lead **	1.3/ML20	8.5/ML 20		
	46. Mercury **	0.9/ML0.2	1.1/ML 0.2		
✓	47. Nickel **	29/ML20	8.2/ML 20		
	48. Selenium **	5/ML20	71/ML 20		
	49. Silver	1.2/ML10	2.2/ML 10		
✓	50. Zinc **	66.6/ML15	85.6/ML 15		
✓	51. Iron	1,000/ML 20			

	Other Parameters	Limit
✓	52. Instantaneous Flow	Site specific in CFS
✓	53. Total Flow	Site specific in CFS
✓	54. pH Range for Class A & Class B Waters in MA	6.5-8.3; 1/Month/Grab ¹³
	55. pH Range for Class SA & Class SB Waters in MA	6.5-8.3; 1/Month/Grab ¹³
	56. pH Range for Class B Waters in NH	6.5-8; 1/Month/Grab ¹³
	57. Daily maximum temperature - Warm water fisheries	83°F; 1/Month/Grab ¹⁴
	58. Daily maximum temperature - Cold water fisheries	68°F; 1/Month/Grab ¹⁴
	59. Maximum Change in Temperature in MA - Any Class A water body	1.5°F; 1/Month/Grab ¹⁴
	60. Maximum Change in Temperature in MA - Any Class B water body- Warm Water	5°F; 1/Month/Grab ¹⁴
	61. Maximum Change in Temperature in MA - Any Class B water body - Cold water and Lakes/Ponds	3°F; 1/Month/Grab ¹⁴
	62. Maximum Change in Temperature in MA - Any Class SA water body - Coastal	1.5°F; 1/Month/Grab ¹⁴
	63. Maximum Change in Temperature in MA - Any Class SB water body - July to September	1.5°F; 1/Month/Grab ¹⁴
	64. Maximum Change in Temperature in MA -Any Class SB water body - October to June	4°F; 1/Month/Grab ¹⁴

Footnotes:

¹ Although the maximum values for TRC are 11ug/l and 7.5 ug/l for freshwater, and saltwater respectively, the compliance limits are equal to the minimum level (ML) of the test method used as listed in Appendix VI (i.e., Method 330.5, 20 ug/l).

² Limits for cyanide are based on EPA's water quality criteria expressed as micrograms per liter. There is currently no EPA approved test method for free cyanide. Therefore, total cyanide must be reported.

³ Although the maximum values for cyanide are 5.2 ug/l and 1.0 ug/l for freshwater and saltwater, respectively, the compliance limits are equal to the minimum level (ML) of the Method 335.4 as listed in Appendix VI (i.e., 10 ug/l).

⁴ BTEX = sum of Benzene, Toluene, Ethylbenzene, and total Xylenes.

⁵ Naphthalene can be reported as both a purgeable (VOC) and extractable (SVOC) organic compound. If both VOC and SVOC are analyzed, the highest value must be used unless the QC criteria for one of the analyses is not met. In such cases, the value from the analysis meeting the QC criteria must be used.

⁶ The sum of individual phthalate compounds(not including the #34, Bis (2-Ethylhexyl) Phthalate . The compliance limits are equal to the minimum level (ML) of the test method used as listed in Appendix VI.

Total values calculated for reporting on NOIs and discharge monitoring reports shall be calculated by adding the measured concentration of each constituent. If the measurement of a constituent is less than the ML, the permittee shall use a value of zero for that constituent. For each test, the permittee shall also attach the raw data for each constituent to the discharge monitoring report, including the minimum level and minimum detection level for the analysis.

⁷ Although the maximum value for the individual PAH compounds is 0.0038 ug/l, the compliance limits are equal to the minimum level (ML) of the test method used as listed in Appendix VI.

⁸ In the November 2002 WQC, EPA has revised the definition of Total PCBs for aquatic life as total PCBs is the sum of all homologue, all isomer, all congener, or all "Oroclor analyses."Total values calculated for reporting on NOIs and discharge monitoring reports shall be calculated by adding the measured concentration of each constituent. If the measure of a constituent is less than the ML, the permittee shall use a value of zero for that constituent. For each test, the permittee shall also attach the raw data for each constituent to the discharge monitoring report, including the minimum level and minimum detection level for the analysis.

⁹ Although the maximum value for total PCBs is 0.000064 ug/l, the compliance limit is equal to the minimum level (ML) of the test method used as listed in Appendix VI (i.e., 0.5 ug/l for Method 608 or 0.00005 ug/l when Method 1668a is approved).

¹⁰ Hardness. Cadmium, Chromium III, Copper, Lead, Nickel, Silver, and Zinc are Hardness Dependent.

¹¹ For a Dilution Factor (DF) from 1 to 5, metals limits are calculated using DF times the base limit for the metal. See Appendix IV. For example, iron limits are calculated using DF x 1,000ug/L (the iron base limit). Therefore DF is 1.5, the iron limit will be 1,500 ug/L; DF 2, then iron limit =1,000 x 2 =2,000 ug/L., etc. not to exceed the DF=5.

¹² Minimum Level (ML) is the lowest level at which the analytical system gives a recognizable signal and acceptable calibration point for the analyte. The ML represents the lowest concentration at which an analyte can be measured with a known level of confidence. The ML is calculated by multiplying the laboratory-determined method detection limit by 3.18 (see 40 CFR Part 136, Appendix B).

¹³ pH sampling for compliance with permit limits may be performed using field methods as provided for in EPA test Method 150.1.

¹⁴ Temperature sampling per Method 170.1

U.S. Environmental Protection Agency
5 Post Office Square, Suite 100
Mail Code OEP06-4
Boston, MA 02109-3912
ATTN: Remediation General Permit NOI Processing

April 10, 2012

Re: Notice of Intent for the Remediation General Permit
Temporary Construction Dewatering
Chestnut Hill Shopping Center
55 Boylston Street
Newton, Massachusetts

Dear Sir/Madam:

The Torrey Company, Inc. (Torrey) is submitting this Notice of Intent (NOI) to the USEPA for coverage under the National Pollutant Discharge Elimination System (NPDES) Remediation General Permit (RGP) MAG910000. This letter and supporting documentation were prepared in accordance with the U.S. EPA guidance for construction dewatering under the RGP program. Torrey is the general contractor for the project and will serve as Operator with primary responsibility for construction dewatering activities within the project site. Subcontractors working on the project will be required to meet the requirements of this NOI and the RGP. The proposed location of discharge into Hammond Pond is shown on Figures 1 and 2.

The project involves demolition of the existing building at 55 Boylston Street and reconstruction of a new building within the same footprint. Excavation for foundation construction and installation of subsurface utilities will result in the need for temporary construction dewatering. It is anticipated that excavation will encounter existing granular fill material underlain by naturally occurring peat and/or inorganic soils. There are no known reported releases of oil or hazardous materials within the proposed limits of work.

A completed NOI Form is provided in Appendix A. One composite groundwater sample was collected by Sanborn Head & Associates, Inc. and analyzed for the list of parameters required by the RGP. The laboratory analytical reports and a summary table of the analytical data are provided in Appendix B. A schematic diagram of the proposed treatment system that will be used for temporary construction dewatering is provided on Figure 3.

According to the Massachusetts Geographical Information System (MassGIS), the earthwork activities will not impact Areas of Critical Environmental Concern (ACEC) or Habitats of Rare Wetland Wildlife. A review of the information on the U.S. Fish and Wildlife Service website indicates the project will not impact federally-listed threatened or endangered species. A form letter from that agency is included in Appendix D.

No structures on the project site are listed on the National Register of Historic Places. Appendix E provides a list of structures in Newton, MA with designation on the National Register.

Appendix F includes a Best Management Practices Plan (BMPP). The BMPP outlines practices that will be followed during construction dewatering activities at the project site.

We anticipate that construction dewatering activities will begin on or about May 1, 2012. If you have any questions, or require additional information, please contact the undersigned.

Very truly yours,

THE TORREY COMPANY, INC.



Mark Trettel

Vice President of Project Management

FIGURES

- Encl. Figure 1 – Locus Plan
Figure 2 – Site Plan
Figure 3 – Groundwater Treatment System Schematic Diagram
Appendix A – Notice of Intent Form
Appendix B – Analytical Data
Appendix C – Dilution Calculations
Appendix D – Federal Correspondence
Appendix E – National Register of Historic Places
Appendix F – Best Management Practices Plan

cc: City of Newton Conservation Commission



NOTES:
Base map taken from "Office of Geographic and Environmental Information (MassGIS), Commonwealth of Massachusetts Executive Office of Environmental Affairs"
7.5 minute USGS Quadrangle Maps: Newton, Massachusetts, REV: 1987



Drawn By: R. HIRTLE
Designed By: M. KENNERSON
Reviewed By: V. KOKOSA
Project No: 3379.00
Date: APRIL 2012

SCALE: 1:25,000

SANBORN HEAD

FIGURE 1

LOCUS PLAN

NOTICE OF INTENT FOR
REMEDIAL GENERAL PERMIT
CHESTNUT HILL SHOPPING
CENTER - 55 BOYLSTON ST
NEWTON, MASSACHUSETTS

APPROXIMATE POINT OF DISCHARGE

APPROXIMATE LIMITS OF WORK

HAMMOND'S FUND
OF MASSACHUSETTS

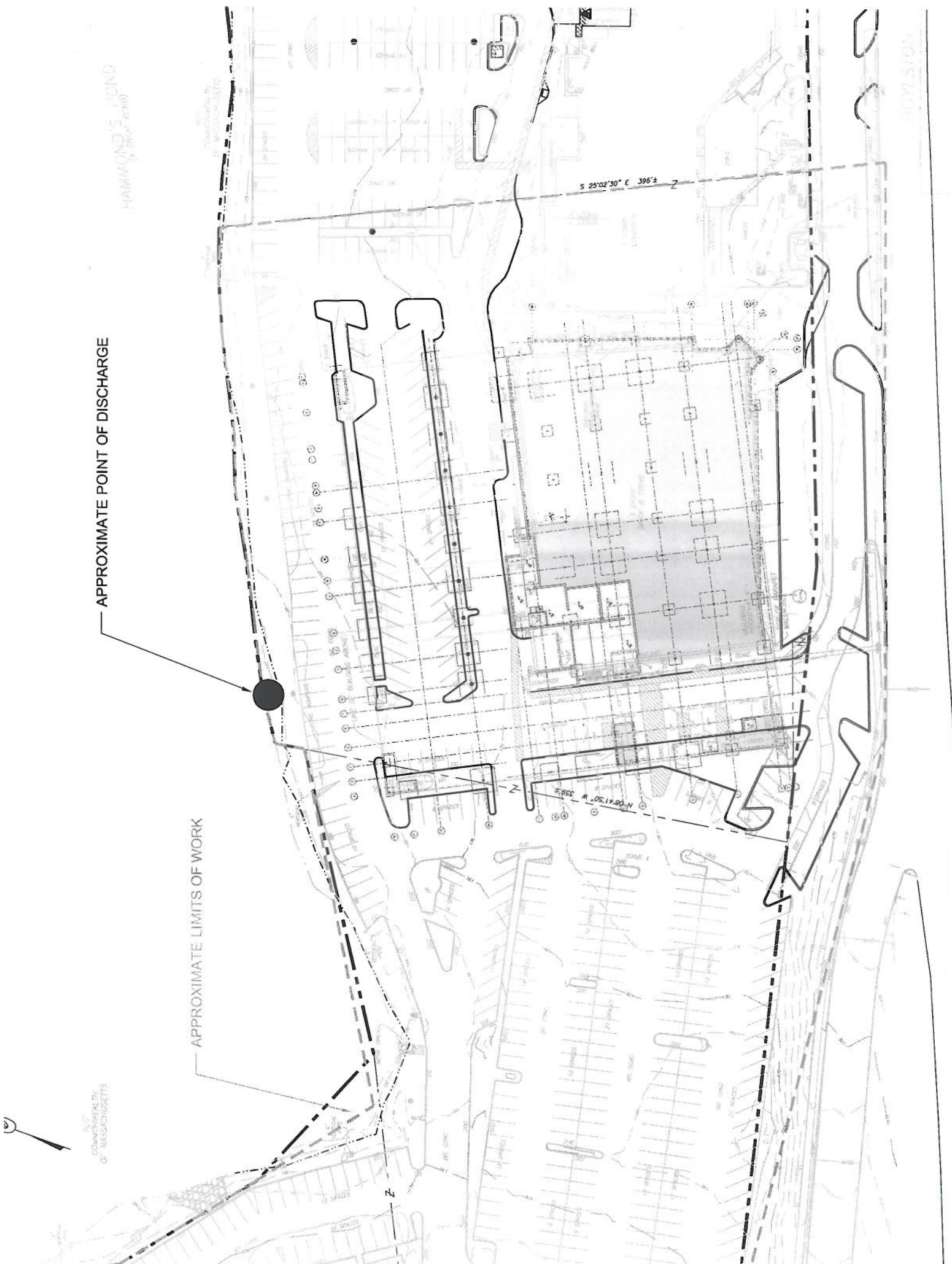
BOY STON

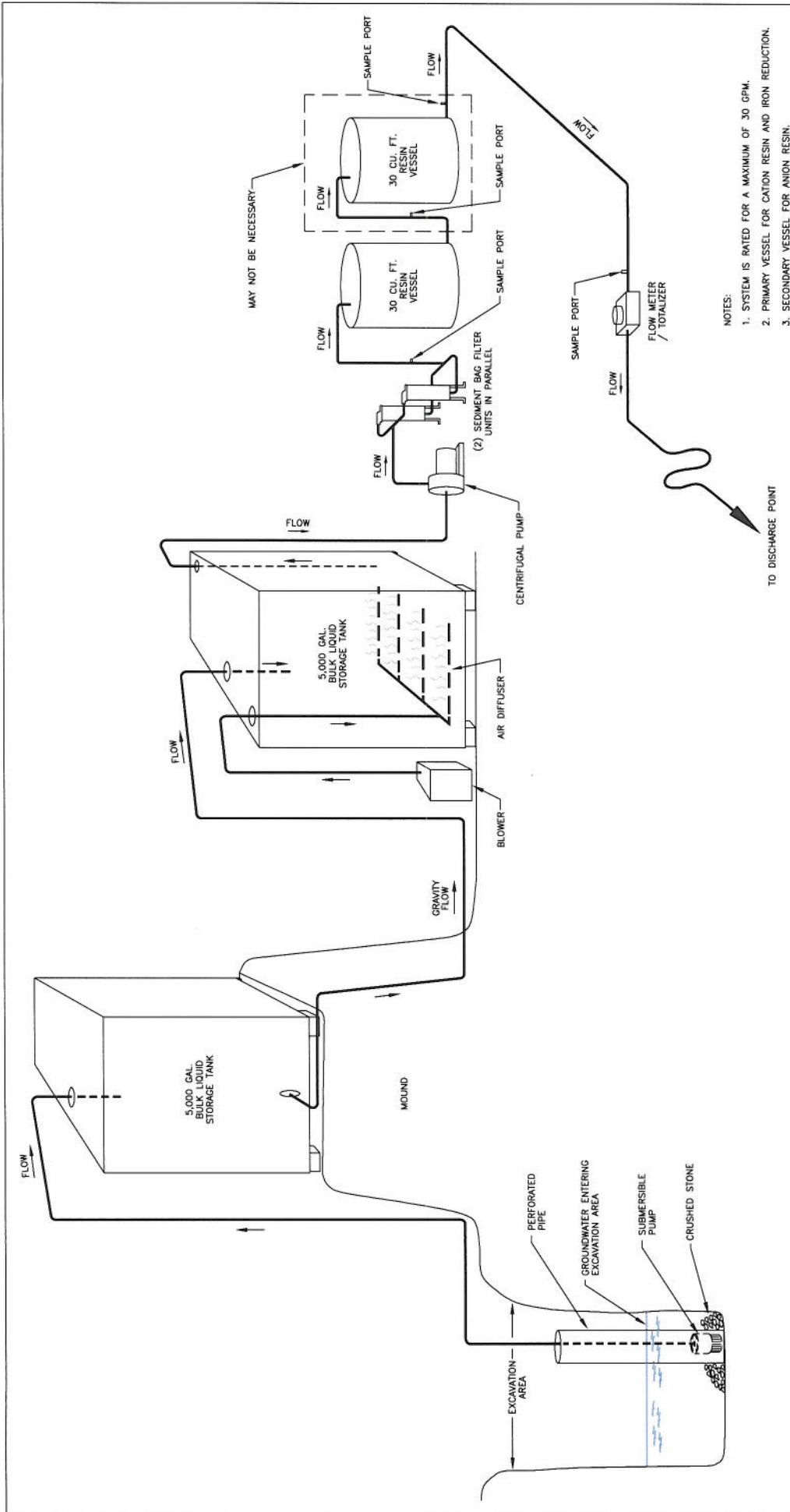
S 25°02'30" E 396±

N 05°19'00" E 65±



COMMISSIONER OF
REVENUE & TAXATION







LOCKWOOD REMEDIATION TECHNOLOGIES LLC
 127 HARTWELL STREET, SUITE 3
 WEST BOYLSTON, MA 01583
 TEL: 774.450.7177 FAX: 888.835.0617
www.lrt-llc.net

PROPOSED WATER TREATMENT SYSTEM
CHESTNUT HILL SHOPPING CENTER

SCALE: NOT TO SCALE	DR. BY: K. HAZEL	JOB NO.:	
DATE: 4-9-12	APP. BY: PL		

CLIENT: SANBORN HEAD AND ASSOCIATES

FIGURE 1

APPENDIX A

NOTICE OF INTENT FORM

B. Suggested Form for Notice of Intent (NOI) for the Remediation General Permit

1. General facility/site information. Please provide the following information about the site:

a) Name of facility/site: Chestnut Hill Shopping Center		Facility/site mailing address:	
Location of facility/site: Longitude: -71.171042 Latitude: 42.322908		Facility SIC code(s): 651201	Street: 55 Boylston Street
b) Name of facility/site owner: Chestnut Hill Shop Ctr LLC		Town: Newton	
Email address of facility/site owner: dave.york@wsdevelopment.com		State: MA	Zip: 02467
Telephone no. of facility/site owner: (617) 232-8900		County: Middlesex	
Fax no. of facility/site owner: (617) 738-1628		Owner is (check one): 1. Federal ☐ 2. State/Tribal ☐	
Address of owner (if different from site):		3. Private ☒ 4. Other ☐ if so, describe:	
Street: Chestnut Hill Shopping Center LLC, c/o W/S Development, 1330 Boylston Street			
Town: Chestnut Hill	State: MA	Zip: 02467	County: Middlesex
c) Legal name of operator:		Operator telephone no: (508) 695-6005	
The Torrey Company, Inc.		Operator fax no.: (508) 695-2123	Operator email: mark.trettel@torreyco.com
Operator contact name and title: Mark Trettel, Vice President of Project Management			
Address of operator (if different from owner):		Street: 15 Messenger Street	
Town: Plainville	State: MA	Zip: 02762	County: Norfolk

d) Check Y for "yes" or N for "no" for the following: 1. Has a prior NPDES permit exclusion been granted for the discharge? Y ☐ N ☒, if Y, number: _____ 2. Has a prior NPDES application (Form 1 & 2C) ever been filed for the discharge? Y ☐ N ☒, if Y, date and tracking #: _____ 3. Is the discharge a "new discharge" as defined by 40 CFR 122.2? Y ☒ N ☐ 4. For sites in Massachusetts, is the discharge covered under the Massachusetts Contingency Plan (MCP) and exempt from state permitting? Y ☐ N ☒	
e) Is site/facility subject to any State permitting, license, or other action which is causing the generation of discharge? Y ☐ N ☒ If Y, please list: 1. site identification # assigned by the state of NH or MA: _____ 2. permit or license # assigned: _____ 3. state agency contact information: name, location, and telephone number: _____	f) Is the site/facility covered by any other EPA permit, including: 1. Multi-Sector General Permit? Y ☐ N ☒, if Y, number: _____ 2. Final Dewatering General Permit? Y ☐ N ☒, if Y, number: _____ 3. EPA Construction General Permit? Y ☐ N ☒, if Y, number: _____ 4. Individual NPDES permit? Y ☐ N ☒, if Y, number: _____ 5. any other water quality related individual or general permit? Y ☐ N ☒, if Y, number: _____
g) Is the site/facility located within or does it discharge to an Area of Critical Environmental Concern (ACEC)? Y ☐ N ☒	
h) Based on the facility/site information and any historical sampling data, identify the sub-category into which the potential discharge falls.	
Activity Category I - Petroleum Related Site Remediation	Activity Sub-Category A. Gasoline Only Sites ☐ B. Fuel Oils and Other Oil Sites (including Residential Non-Business Remediation Discharges) ☐ C. Petroleum Sites with Additional Contamination ☐
II - Non Petroleum Site Remediation	A. Volatile Organic Compound (VOC) Only Sites ☐ B. VOC Sites with Additional Contamination ☐ C. Primarily Heavy Metal Sites ☐
III - Contaminated Construction Dewatering	A. General Urban Fill Sites ☒ B. Known Contaminated Sites ☐

IV - Miscellaneous Related Discharges	A. Aquifer Pump Testing to Evaluate Formerly Contaminated Sites ☐ B. Well Development/Rehabilitation at Contaminated/Formerly Contaminated Sites ☐ C. Hydrostatic Testing of Pipelines and Tanks ☐ D. Long-Term Remediation of Contaminated Sumps and Dikes ☐ E. Short-term Contaminated Dredging Drain Back Waters (if not covered by 401/404 permit) ☐
---------------------------------------	--

2. Discharge information. Please provide information about the discharge, (attaching additional sheets as necessary) including:

a) Describe the discharge activities for which the owner/applicant is seeking coverage:	
Temporary construction dewatering	
b) Provide the following information about each discharge:	
1) Number of discharge points: 1	2) What is the maximum and average flow rate of discharge (in cubic feet per second, ft³/s)? Max. flow ⁵⁰ Is maximum flow a design value? Y ☐ N ☒ Average flow (include units) ³⁰ Is average flow a design value or estimate? Estimate
3) Latitude and longitude of each discharge within 100 feet:	
pt. 1: lat. 42.322908 long. -71.171042	pt. 2: lat. long.
pt. 3: lat. long.	pt. 4: lat. long.
pt. 5: lat. long.	pt. 6: lat. long.
pt. 7: lat. long.	pt. 8: lat. long. etc.
4) If hydrostatic testing, total volume of the discharge (gals):	5) Is the discharge intermittent ☒ or seasonal ☐ ? Is discharge ongoing? Y ☐ N ☒
c) Expected dates of discharge (mm/dd/yy): start 5/1/2012 end 12/31/12	
d) Please attach a line drawing or flow schematic showing water flow through the facility including: 1. sources of intake water, 2. contributing flow from the operation, 3. treatment units, and 4. discharge points and receiving waters(s).	

3. Contaminant information.

a) Based on the sub-category selected (see Appendix III), indicate whether each listed chemical is **believed present** or **believed absent** in the potential discharge. Attach additional sheets as needed.

Parameter *	CAS Number	Believed Absent	Believed Present	# of Samples	Sample Type (e.g., grab)	Analytical Method Used (method #)	Minimum Level (ML) of Test Method	Maximum daily value		Average daily value	
								concentration (ug/l)	mass (kg)	concentration (ug/l)	mass (kg)
1. Total Suspended Solids (TSS)		☐	☒	1	Composite	2540	5,000	51,000			
2. Total Residual Chlorine (TRC)		☒	☐	1	Composite	4500CL-D	20	ND			
3. Total Petroleum Hydrocarbons (TPH)		☒	☐	1	Composite	1664A	4,000	ND			
4. Cyanide (CN)	57125	☐	☒	1	Composite	4500CN-CE	5	7			
5. Benzene (B)	71432	☒	☐	1	Composite	8260B	0.50	ND			
6. Toluene (T)	108883	☒	☐	1	Composite	8260B	0.75	ND			
7. Ethylbenzene (E)	100414	☒	☐	1	Composite	8260B	0.50	ND			
8. (m,p,o) Xylenes (X)	108883; 106423; 95476; 1330207	☒	☐	1	Composite	8260B	2	ND			
9. Total BTEX ²	n/a	☒	☐	1	Composite	8260B	3.75	ND			
10. Ethylene Dibromide (EDB) (1,2-Dibromoethane) ³	106934	☒	☐	1	Composite	504.1	0.01	ND			
11. Methyl-tert-Butyl Ether (MtBE)	1634044	☒	☐	1	Composite	8260B	1	ND			
12. tert-Butyl Alcohol (TBA) (Tertiary-Butanol)	75650	☒	☐	1	Composite	8260B	10	ND			

* Numbering system is provided to allow cross-referencing to Effluent Limits and Monitoring Requirements by Sub-Category included in Appendix III, as well as the Test Methods and Minimum Levels associated with each parameter provided in Appendix VI.

² BTEX = Sum of Benzene, Toluene, Ethylbenzene, total Xylenes.

³ EDB is a groundwater contaminant at fuel spill and pesticide application sites in New England.

<u>Parameter *</u>	<u>CAS Number</u>	<u>Believed Absent</u>	<u>Believed Present</u>	<u># of Samples</u>	<u>Sample Type (e.g., grab)</u>	<u>Analytical Method Used (method #)</u>	<u>Minimum Level (ML) of Test Method</u>	<u>Maximum daily value</u>		<u>Average daily value</u>	
								<u>concentration (ug/l)</u>	<u>mass (kg)</u>	<u>concentration (ug/l)</u>	<u>mass (kg)</u>
13. tert-Amyl Methyl Ether (TAME)	9940508	☒	☐	1	Composite	8260B	2	ND			
14. Naphthalene	91203	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
15. Carbon Tetrachloride	56235	☒	☐	1	Composite	8260B	0.50	ND			
16. 1,2 Dichlorobenzene (o-DCB)	95501	☒	☐	1	Composite	8260B	2.5	ND			
17. 1,3 Dichlorobenzene (m-DCB)	541731	☒	☐	1	Composite	8260B	2.5	ND			
18. 1,4 Dichlorobenzene (p-DCB)	106467	☒	☐	1	Composite	8260B	2.5	ND			
18a. Total dichlorobenzene		☒	☐	1	Composite	8260B	7.5	ND			
19. 1,1 Dichloroethane (DCA)	75343	☒	☐	1	Composite	8260B	0.75	ND			
20. 1,2 Dichloroethane (DCA)	107062	☒	☐	1	Composite	8260B	0.50	ND			
21. 1,1,1 Dichloroethene (DCE)	75354	☒	☐	1	Composite	8260B	0.50	ND			
22. cis-1,2 Dichloroethene (DCE)	156592	☒	☐	1	Composite	8260B	0.50	ND			
23. Methylene Chloride	75092	☒	☐	1	Composite	8260B	3.0	ND			
24. Tetrachloroethene (PCE)	127184	☒	☐	1	Composite	8260B	0.50	ND			
25. 1,1,1 Trichloro-ethane (TCA)	71556	☒	☐	1	Composite	8260B	0.50	ND			
26. 1,1,2 Trichloro-ethane (TCA)	79005	☒	☐	1	Composite	8260B	0.75	ND			
27. Trichloroethene (TCE)	79016	☒	☐	1	Composite	8260B	0.50	ND			

Parameter *	CAS Number	Believed Absent	Believed Present	# of Samples	Sample Type (e.g., grab)	Analytical Method Used (method #)	Minimum Level (ML) of Test Method	Maximum daily value		Average daily value	
								concentration (ug/l)	mass (kg)	concentration (ug/l)	mass (kg)
28. Vinyl Chloride (Chloroethene)	75014	☒	☐	1	Composite	8260B	1.0	ND			
29. Acetone	67641	☒	☐	1	Composite	8260B	5.0	ND			
30. 1,4 Dioxane	123911	☒	☐	1	Composite	8260-SIM	3.0	ND			
31. Total Phenols	108952	☒	☐	1	Composite	420.1	150	ND			
32. Pentachlorophenol (PCP)	87865	☒	☐	1	Composite	8270TCL-SIM	0.80	ND			
33. Total Phthalates (Phthalate esters) ⁴		☒	☐	1	Composite	8270TCL	5.0	ND			
34. Bis (2-Ethylhexyl) Phthalate [Di-(ethylhexyl) Phthalate]	117817	☒	☐	1	Composite	8270TCL	3.0	ND			
35. Total Group I Polycyclic Aromatic Hydrocarbons (PAH)		☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
a. Benzo(a) Anthracene	56553	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
b. Benzo(a) Pyrene	50328	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
c. Benzo(b)Fluoranthene	205992	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
d. Benzo(k)Fluoranthene	207089	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
e. Chrysene	21801	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
f. Dibenzo(a,h)anthracene	53703	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
g. Indeno(1,2,3-cd) Pyrene	193395	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
36. Total Group II Polycyclic Aromatic Hydrocarbons (PAH)		☒	☐	1	Composite	8270TCL-SIM	0.20	ND			

⁴ The sum of individual phthalate compounds.

<u>Parameter *</u>	<u>CAS Number</u>	<u>Believed Absent</u>	<u>Believed Present</u>	<u># of Samples</u>	<u>Sample Type (e.g., grab)</u>	<u>Analytical Method Used (method #)</u>	<u>Minimum Level (ML) of Test Method</u>	<u>Maximum daily value</u>		<u>Average daily value</u>	
								<u>concentration (ug/l)</u>	<u>mass (kg)</u>	<u>concentration (ug/l)</u>	<u>mass (kg)</u>
h. Acenaphthene	83329	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
i. Acenaphthylene	208968	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
j. Anthracene	120127	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
k. Benzo(ghi) Perylene	191242	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
l. Fluoranthene	206440	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
m. Fluorene	86737	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
n. Naphthalene	91203	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
o. Phenanthrene	85018	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
p. Pyrene	129000	☒	☐	1	Composite	8270TCL-SIM	0.20	ND			
37. Total Polychlorinated Biphenyls (PCBs)	85687; 84742; 117840; 84662; 131113; 117817.	☒	☐	1	Composite	608	0.25	ND			
	38. Chloride	☐	☒	1	Composite	CL-300	25,000	930,000			
	39. Antimony	☐	☒	1	Composite	6020T	0.5	1			
	40. Arsenic	☐	☒	1	Composite	6020T	0.5	6.4			
	41. Cadmium	☒	☐	1	Composite	6020T	0.2	ND			
42. Chromium III (trivalent)	16065831	☐	☒	1	Composite	6020T	0.5	0.9			
43. Chromium VI (hexavalent)	18540299	☒	☐	1	Composite	3500	10	ND			
44. Copper	7440508	☐	☒	1	Composite	6020T	0.5	0.6			
45. Lead	7439921	☒	☐	1	Composite	6020T	0.5	ND			
46. Mercury	7439976	☒	☐	1	Composite	245.1	0.2	ND			
47. Nickel	7440020	☐	☒	1	Composite	6020T	0.5	1.6			
48. Selenium	7782492	☒	☐	1	Composite	6020T	1	ND			
49. Silver	7440224	☒	☐	1	Composite	6020T	0.4	ND			
50. Zinc	7440666	☐	☒	1	Composite	6020T	5	19.6			
51. Iron	7439896	☐	☒	1	Composite	200.7	50	53,000			
Other (describe):		☐	☐								

Parameter *	CAS Number	Believed Absent	Believed Present	# of Samples	Sample Type (e.g., grab)	Analytical Method Used (method #)	Minimum Level (ML) of Test Method	Maximum daily value		Average daily value	
								concentration (ug/l)	mass (kg)	concentration (ug/l)	mass (kg)
		☐	☐								
		☐	☐								

b) For discharges where **metals** are believed present, please fill out the following (attach results of any calculations):

Step 1: Do any of the metals in the influent exceed the effluent limits in Appendix III (i.e., the limits set at zero dilution)? Y ☐ N ☐	If yes, which metals? iron
Step 2: For any metals which exceed the Appendix III limits, calculate the dilution factor (DF) using the formula in Part I.A.3.c (step 2) of the NOI instructions or as determined by the State prior to the submission of this NOI. What is the dilution factor for applicable metals? Metal: iron DF: Metal: DF: Metal: DF: Metal: DF: Metal: DF: Metal: DF: Metal: DF: Metal: DF: Metal: DF:	Look up the limit calculated at the corresponding dilution factor in Appendix IV. Do any of the metals in the influent have the potential to exceed the corresponding effluent limits in Appendix IV (i.e., is the influent concentration above the limit set at the calculated dilution factor)? Y ☐ N ☐ If Y, list which metals: iron

4. **Treatment system information.** Please describe the treatment system using separate sheets as necessary, including:

a) A description of the treatment system, including a schematic of the proposed or existing treatment system: A schematic diagram of the proposed treatment system is attached as Appendix B. The treatment system is intended to achieve the required effluent standards by removal of dissolved iron and sediment. Water entering the treatment system will be pumped from the ground using one or more filtered sumps. The treatment system will consist of two 5,000-gal fractionation tanks in series with aeration for primary iron removal in one of the tanks, followed by two sediment bag filters in parallel, followed by a cation exchange resin vessel for secondary iron removal. If necessary, an anion exchange resin vessel may be added after the cation exchange resin vessel if needed to achieve the cyanide effluent standard.						
b) Identify each applicable treatment unit (check all that apply):		Frac. tank ☒ Chlorination ☐	Air stripper ☐ De-chlorination ☐	Oil/water separator ☐ Other (please describe):	Equalization tanks ☐ Bag filter ☒ GAC filter ☐	air diffuser, cation exchange resin vessel (req'd for secondary iron removal), anion exchange resin vessel (optional if needed).

c) Proposed **average** and **maximum flow rates** (gallons per minute) for the discharge and the **design flow rate(s)** (gallons per minute) of the treatment system:
Average flow rate of discharge 30 gpm Maximum flow rate of treatment system 50 gpm
Design flow rate of treatment system 50 gpm

d) A description of chemical additives being used or planned to be used (attach MSDS sheets):
None.

5. Receiving surface water(s). Please provide information about the receiving water(s), using separate sheets as necessary:

a) Identify the discharge pathway:	Direct to receiving water ☒	Within facility (sewer) ☐	Storm drain ☐	Wetlands ☐	Other (describe):
b) Provide a narrative description of the discharge pathway, including the name(s) of the receiving waters: Discharge will be direct to Hammond Pond					
c) Attach a detailed map(s) indicating the site location and location of the outfall to the receiving water: 1. For multiple discharges, number the discharges sequentially. 2. For indirect discharges, indicate the location of the discharge to the indirect conveyance and the discharge to surface water The map should also include the location and distance to the nearest sanitary sewer as well as the locus of nearby sensitive receptors (based on USGS topographical mapping), such as surface waters, drinking water supplies, and wetland areas.					
d) Provide the state water quality classification of the receiving water <u>Class B</u>					
e) Provide the reported or calculated seven day-ten year low flow (7Q10) of the receiving water <u>0</u> cfs Please attach any calculation sheets used to support stream flow and dilution calculations.					
f) Is the receiving water a listed 303(d) water quality impaired or limited water? Y ☐ N ☒ If yes, for which pollutant(s)?					
Is there a final TMDL? Y ☐ N ☒ If yes, for which pollutant(s)?					

6. ESA and NHPA Eligibility.

Please provide the following information according to requirements of Permit Parts I.A.4 and I.A.5 Appendices II and VII.

- a) Using the instructions in Appendix VII and information on Appendix II, under which criterion listed in Part I.C are you eligible for coverage under this general permit?
A ☒ B ☐ C ☐ D ☐ E ☐ F ☐
- b) If you selected Criterion D or F, has consultation with the federal services been completed? Y ☐ N ☐ Underway ☐
- c) If consultation with U.S. Fish and Wildlife Service and/or NOAA Fisheries Service was completed, was a written concurrence finding that the discharge is "not likely to adversely affect" listed species or critical habitat received? Y ☒ N ☐
- d) Attach documentation of ESA eligibility as described in the NOI instructions and required by Appendix VII, Part I.C, Step 4.
- e) Using the instructions in Appendix VII, under which criterion listed in Part II.C are you eligible for coverage under this general permit?
1 ☒ 2 ☐ 3 ☐
- f) If Criterion 3 was selected, attach all written correspondence with the State or Tribal historic preservation officers, including any terms and conditions that outline measures the applicant must follow to mitigate or prevent adverse effects due to activities regulated by the RGP.

7. Supplemental information.

Please provide any supplemental information. Attach any analytical data used to support the application. Attach any certification(s) required by the general permit.

The NOI application includes the following items:

Cover letter on Operator's letterhead.

Figure 1 - Locus Plan (Site location on USGS Quadrangle Map)

Figure 2 - Site Plan

Figure 3 - Proposed Water Treatment System Schematic Diagram

Appendix A - NOI Form

Appendix B - Analytical Data (for a composite groundwater sample collected by Sanborn, Head & Associates, Inc. on March 22, 2012).

Appendix C - Dilution Factor Calculations

Appendix D - Correspondence from USF&WS information regarding Habitats of Rare Wildlife).

Appendix E - List of Historic Places (Newton MA).

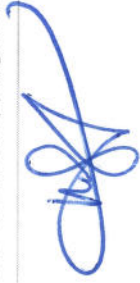
Appendix F - Best Management Practices (BMP) Plan.

8. Signature Requirements: The Notice of Intent must be signed by the operator in accordance with the signatory requirements of 40 CFR Section 122.22, including the following certification:

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 gather and evaluate 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, I certify that the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I certify that I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Facility/Site Name: Chestnut Hill Shopping Center, 55 Boylston Street, Newton, MA

Operator signature:



Printed Name & Title: Mark Trettel, Vice President, The Torrey Company, Inc.

Date:

B. Submission of NOI to EPA - All operators applying for coverage under this General Permit must submit a completed Notice of Intent (NOI) to EPA. Signed and completed NOI forms and attachments must be submitted to EPA-NE at:

U.S. Environmental Protection Agency
5 Post Office Square, Suite 100
Mail Code OEP06-4
Boston, MA 02109-3912
ATTN: Remediation General Permit NOI Processing

or electronically mailed to NPDES.Generalpermits@epa.gov

or faxed to the EPA Office at 617-918-0505

If filling out the suggested NOI form electronically on EPA's website, the signature page must be signed and faxed or mailed to EPA at the fax number and/or address listed above.

1. Filing with the states - A copy of any NOI form filed with EPA-NE must also be filed with state agencies. The state agency may elect to develop a state specific form or other information requirements.

a) Discharges in Massachusetts - In addition to the NOI, permit applicants must submit copies of the State Application Form BRPWM 12, Request for General Permit coverage for the RGP. The application form and the Transmittal Form for Permit Application and Payment may be obtained from the Massachusetts Department of Environmental Protection (MassDEP) website at www.state.ma.us/dep. Municipalities are fee-exempt, but should send a copy of the transmittal form to that address for project tracking purposes. All applicants should keep a copy of the transmittal form and a copy of the application package for their records.

1) A copy of the NOI, the transmittal form, a copy of the check, and Form BRPWM 12 should be sent to:

Massachusetts Department of Environmental Protection
Division of Watershed Management
627 Main Street, 2nd floor
Worcester, MA 01608

2) A copy of the transmittal form and the appropriate fee should be sent to:

Massachusetts Department of Environmental Protection
P.O. Box 4062
Boston, MA 02111

Please note: Applicants for discharges in Massachusetts should note that under 310 CMR 40.000, *as a matter of state law*, the general permit only applies to discharges that are **not** subject to the

Massachusetts Contingency Plan (MCP) and 310 CMR 40.000. Therefore, discharges subject to the MCP are **not** required to fill out and submit the State Application Form BRPWM 12 or pay the state fees. However, they must submit a NOI to EPA.

b) Discharges in New Hampshire - applicants must provide a copy of the Notice of Intent to:

New Hampshire Department of Environmental Services
Water Division
Wastewater Engineering Bureau
P.O. Box 95
Concord, New Hampshire 03302-0095.

2. Filing with Municipalities - A copy of the NOI must be submitted to the municipality in which the proposed discharge would be located.

APPENDIX B

ANALYTICAL DATA

Table 1
Summary of Groundwater Quality Data
NPDES Remediation General Permit
 Chestnut Hill Shopping Center
 Newton, Massachusetts

Sample ID	Laboratory Analytical Method	Units	COMPOSITE RGP	NPDES RGP Effluent Limit (2010)
Sample Date			3/22/12	
General Parameters				
Total Suspended Solids	TSS-2540	mg/l	51	30
Total Residual Chlorine ²	TRC-4500CL-D	ug/l	<20	11
Total Cyanide	TCN-4500CN-CE	ug/l	7.0	5.2
Total Phenols	TPHENOL-420.1	ug/l	<150	300
Total Petroleum Hydrocarbons (TPH)	TPH-1664A	mg/l	<4	5
Chloride	CL-300	mg/l	930	Monitor Only
Total Metals				
Antimony	SB-6020T	ug/l	1	5.6
Arsenic	AS-6020T	ug/l	6.4	10
Cadmium	CD-6020T	ug/l	<0.2	0.2
Chromium	CR-6020T	ug/l	0.9	48.8
Hexavalent Chromium	HEXCR-3500	ug/l	<10	11.4
Copper	CU-6020T	ug/l	0.6	5.2
Iron	FE-200.7	ug/l	53000	1,000
Lead	PB-6020T	ug/l	<0.5	1.3
Mercury	HG-245.1	ug/l	<0.2	0.9
Nickel	NI-6020T	ug/l	1.6	29
Selenium	SE-6020T	ug/l	<1	5.0
Silver	AG-6020T	ug/l	<0.4	1.2
Zinc	ZN-6020T	ug/l	19.6	66.6
Pesticides				
1,2-Dibromoethane (EDB) (Ethylene Dibromide)	504	ug/l	<0.010	0.05
Volatile Organic Compounds (VOCs)				
Methylene chloride (Dichloromethane) ³	8260B	ug/l	<3.0	4.6
1,1-Dichloroethane (DCA)	8260B	ug/l	<0.75	70
Carbon tetrachloride	8260B	ug/l	<0.50	4.4
1,1,2-Trichloroethane (TCA)	8260B	ug/l	<0.75	5.0
Tetrachloroethene (PCE)	8260B	ug/l	<0.50	5.0
1,2-Dichloroethane (DCA)	8260B	ug/l	<0.50	5.0
1,1,1-Trichloroethane (TCA)	8260B	ug/l	<0.50	200
Benzene (B)	8260B	ug/l	<0.50	5.0
Toluene (T)	8260B	ug/l	<0.75	see Total BTEX
Ethylbenzene (E)	8260B	ug/l	<0.50	see Total BTEX
Vinyl chloride (Chloroethene)	8260B	ug/l	<1.0	2.0
1,1-Dichloroethene (DCE)	8260B	ug/l	<0.50	3.2
cis-1,2-Dichloroethene (DCE)	8260B	ug/l	<0.50	70
Trichloroethene (TCE)	8260B	ug/l	<0.50	5.0
1,2-Dichlorobenzene (o-DCB)	8260B	ug/l	<2.5	600
1,3-Dichlorobenzene (m-DCB)	8260B	ug/l	<2.5	320
1,4-Dichlorobenzene (p-DCB)	8260B	ug/l	<2.5	5.0
p/m-Xylene	8260B	ug/l	<1.0	see Total BTEX
o-xylene	8260B	ug/l	<1.0	see Total BTEX
Xylene (Total) (X)	8260B	ug/l	<2.0	see Total BTEX
Acetone	8260B	ug/l	<5.0	Monitor Only
Methyl tert butyl ether (MtBE)	8260B	ug/l	<1.0	70.0
1,4-Dioxane ³	8260B	ug/l	<3.0	Monitor Only
Tert-Butyl Alcohol (TBA) (Tertiary-Butanol)	8260B	ug/l	<10	Monitor Only
Tertiary-Amyl Methyl Ether (TAME)	8260B	ug/l	<2.0	Monitor Only
Total BTEX ⁴		ug/l	<3.75	100

Table 1
Summary of Groundwater Quality Data
NPDES Remediation General Permit
 Chestnut Hill Shopping Center
 Newton, Massachusetts

Sample ID	Laboratory Analytical Method	Units	COMPOSITE RGP	NPDES RGP Effluent Limit (2010)
Sample Date			3/22/12	
Semivolatile Organics (SVOCs)				
Bis(2-Ethylhexyl)phthalate ⁵	8270TCL	ug/l	<3.0	6.0
Butyl benzyl phthalate ⁵	8270TCL	ug/l	<5.0	see Total Phthalates
Di-n-butylphthalate ⁵	8270TCL	ug/l	<5.0	see Total Phthalates
Di-n-octylphthalate ⁵	8270TCL	ug/l	<5.0	see Total Phthalates
Diethyl phthalate ⁵	8270TCL	ug/l	<5.0	see Total Phthalates
Dimethyl phthalate ⁵	8270TCL	ug/l	<5.0	see Total Phthalates
Total Phthalates (Phthalate esters) ⁶		ug/l	<5.0	3.0
Acenaphthene ⁷	8270TCL-SIM	ug/l	<0.20	see Total Group II PAHs
Fluoranthene ⁷	8270TCL-SIM	ug/l	<0.20	see Total Group II PAHs
Naphthalene ⁷	8270TCL-SIM	ug/l	<0.20	20
Benzo(a)anthracene ⁸	8270TCL-SIM	ug/l	<0.20	0.2
Benzo(a)pyrene ⁸	8270TCL-SIM	ug/l	<0.20	0.2
Benzo(b)fluoranthene ⁸	8270TCL-SIM	ug/l	<0.20	0.2
Benzo(k)fluoranthene ⁸	8270TCL-SIM	ug/l	<0.20	0.2
Chrysene ⁸	8270TCL-SIM	ug/l	<0.20	0.2
Acenaphthylene ⁷	8270TCL-SIM	ug/l	<0.20	see Total Group II PAHs
Anthracene ⁷	8270TCL-SIM	ug/l	<0.20	see Total Group II PAHs
Benzo(ghi)perylene ⁷	8270TCL-SIM	ug/l	<0.20	see Total Group II PAHs
Fluorene ⁷	8270TCL-SIM	ug/l	<0.20	see Total Group II PAHs
Phenanthrene ⁷	8270TCL-SIM	ug/l	<0.20	see Total Group II PAHs
Dibenzo(a,h)anthracene ⁸	8270TCL-SIM	ug/l	<0.20	0.2
Indeno(1,2,3-cd)Pyrene ⁸	8270TCL-SIM	ug/l	<0.20	0.2
Pyrene ⁷	8270TCL-SIM	ug/l	<0.20	see Total Group II PAHs
Pentachlorophenol (PCP)	8270TCL-SIM	ug/l	<0.80	1.0
Total Group I Polycyclic Aromatic Hydrocarbons (PAH) ⁹		ug/l	<0.20	10.0
Total Group II Polycyclic Aromatic Hydrocarbons (PAH) ¹⁰		ug/l	<0.20	100
Polychlorinated Biphenyls (PCBs)				
Aroclor 1016 ¹¹	PCB-608	ug/l	<0.25	0.5
Aroclor 1221 ¹¹	PCB-608	ug/l	<0.25	0.5
Aroclor 1232 ¹¹	PCB-608	ug/l	<0.25	0.5
Aroclor 1242 ¹¹	PCB-608	ug/l	<0.25	0.5
Aroclor 1248 ¹¹	PCB-608	ug/l	<0.25	0.5
Aroclor 1254 ¹¹	PCB-608	ug/l	<0.25	0.5
Aroclor 1260 ¹¹	PCB-608	ug/l	<0.25	0.5
Total PCBs ¹²		ug/l	<0.25	0.5

Notes:

- The sample was collected by Sanborn, Head & Associates, Inc. personnel on the date indicated and was submitted to Alpha Analytical, Inc. of Westborough, MA for analysis. The sample is a composite of wells MW-1, MW-2, and MW-3.
- The Laboratory Reporting Limit (RL) meets the requirements of Appendix VI of the National Pollutant Discharge Elimination System (NPDES) Remediation General Permit (RGP) even though RL exceeds RGP Effluent Limit.
- RL achieved by laboratory was above the RL required in Appendix VI of the RGP and above the Effluent Limit. Please see attached correspondence between EPA and laboratory regarding analytical requirements.
- Total BTEX = Sum of benzene, toluene, ethylbenzene, and total xylenes.
- Individual phthalate compound.
- "Total phthalates" is the sum of individual phthalate compounds; According to RGP Q&A #37, the RL for total phthalates is the highest reported phthalate RL; RL is less than the requirements in Appendix VI of RGP, even though RL exceeds RGP Effluent Limit.
- Group II PAHs.
- Group I PAHs; Although the maximum value for the individual PAH compounds is 0.0038 ug/l, the compliance limits are equal to the minimum level of the test method used as listed in Appendix VI (i.e. 0.20 ug/l for Method 8270 SIM).
- Sum of Group I PAHs.
- Sum of Group II PAHs.
- Individual PCB congener.
- Total of PCB congeners; Although the maximum value for total PCB's is 0.000064 ug/l, the compliance limit is equal to the minimum level of the test method used as listed in Appendix VI (i.e. 0.5 ug/l for Method 608).
- 'SHADED' values indicate exceedences of the NPDES RGP Effluent Limits; which were taken from Appendix III of the RGP.
'<' = analytes not detected above laboratory reporting limits
'NS' = Not Specified
- Monitor Only means that the subject compound is not subject to a (criteria) limit, however, the the Permittee is still required to monitor and report the effluent concentration.



ANALYTICAL REPORT

Lab Number:	L1204875
Client:	Sanborn, Head & Associates, Inc. 1 Technology Park Drive Westford, MA 01886
ATTN:	Stan Sadkowski
Phone:	(978) 392-0900
Project Name:	55 BS (CHSC)
Project Number:	3379.00
Report Date:	03/28/12

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NY (11148), CT (PH-0574), NH (2003), NJ NELAP (MA935), RI (LAO00065), ME (MA00086), PA (68-03671), USDA (Permit #P-330-11-00240), NC (666), TX (T104704476), DOD (L2217), US Army Corps of Engineers.

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



Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Alpha Sample ID	Client ID	Sample Location	Collection Date/Time
L1204875-01	COMPOSITE-1	NEWTON, MA	03/22/12 07:45
L1204875-02	TRIP BLANK	NEWTON, MA	03/22/12 00:00

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

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 all of the requirements of NELAC, for all NELAC accredited parameters. 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. 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. Performance criteria for CAM and RCP methods allow for some LCS compound failures to occur and still be within method compliance. In these instances, the specific failures are not narrated but are noted in the associated QC table. This information is also incorporated in the Data Usability format for 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.

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

Volatile Organics

The WG525062-1/-2 LCS/LCSD recoveries, associated with L1204875-01, are below the individual acceptance criteria for Chloromethane (42%/43%), but within the overall method allowances. The results of the associated sample are reported.

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Case Narrative (continued)

Semivolatile Organics

The surrogate recovery for L1204875-01 is outside the individual acceptance criteria for 2,4,6-Tribromophenol (128%), but within the overall method allowances. The results of the original analysis are reported.

The WG524970-2 LCS/LCSD recoveries, associated with L1204875-01, are outside the individual acceptance criteria for 2,4-Dinitrotoluene (119%/121%), Hexachlorocyclopentadiene (28%/27%), Aniline (23%/20%), P-Chloro-M-Cresol (118%/118%) and 4-Nitrophenol (LCSD at 83%), but within the overall method allowances. The results of the associated sample are reported.

The WG524970-2/-3 LCS/LCSD RPD, associated with L1204875-01, is above the acceptance criteria for Benzoic acid (61%).

The surrogate recovery for WG524970-2/-3 LCS/LCSD, associated with L1204875-01, is outside the individual acceptance criteria for 2,4,6-Tribromophenol (133%/127%), but within the overall method allowances. The results of the original analysis are reported.

Semivolatile Organics - SIM

The surrogate recovery for the WG524971-1 Method Blank, associated with L1204875-01, is outside the individual acceptance criteria for Nitrobenzene-d5 (135%), but within the overall method allowances. The results of the original analysis are reported.

The WG524971-2/-3 LCS/LCSD recoveries, associated with L1204875-01, were above the acceptance criteria for Pentachlorophenol (123%/111%); however, the associated sample was non-detect for this target compound. The results of the original analysis are reported.

The surrogate recovery for the WG524971-2 LCS, associated with L1204875-01, is outside the individual acceptance criteria for Nitrobenzene-d5 (126%), but within the overall method allowances. The results of the original analysis are reported.

Metals

The WG525107-3 Laboratory Duplicate RPD, performed on L1204875-01, is above the acceptance criteria for Antimony (36%); however, the sample and Duplicate results are less than five times the reporting limit.

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Case Narrative (continued)

Therefore, the RPD is valid.

Phenolics, Total

L1204875-01 has an elevated detection limit due to the dilution required by the sample matrix.

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:  Elizabeth Simmons

Title: Technical Director/Representative

Date: 03/28/12

ORGANICS

VOLATILES

Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01
Client ID: COMPOSITE-1
Sample Location: NEWTON, MA
Matrix: Water
Analytical Method: 1,8260B
Analytical Date: 03/24/12 13:17
Analyst: PD

Date Collected: 03/22/12 07:45
Date Received: 03/22/12
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by GC/MS - Westborough Lab						
Methylene chloride	ND		ug/l	3.0	--	1
1,1-Dichloroethane	ND		ug/l	0.75	--	1
Chloroform	ND		ug/l	0.75	--	1
Carbon tetrachloride	ND		ug/l	0.50	--	1
1,2-Dichloropropane	ND		ug/l	1.8	--	1
Dibromochloromethane	ND		ug/l	0.50	--	1
1,1,2-Trichloroethane	ND		ug/l	0.75	--	1
Tetrachloroethene	ND		ug/l	0.50	--	1
Chlorobenzene	ND		ug/l	0.50	--	1
Trichlorofluoromethane	ND		ug/l	2.5	--	1
1,2-Dichloroethane	ND		ug/l	0.50	--	1
1,1,1-Trichloroethane	ND		ug/l	0.50	--	1
Bromodichloromethane	ND		ug/l	0.50	--	1
trans-1,3-Dichloropropene	ND		ug/l	0.50	--	1
cis-1,3-Dichloropropene	ND		ug/l	0.50	--	1
1,1-Dichloropropene	ND		ug/l	2.5	--	1
Bromoform	ND		ug/l	2.0	--	1
1,1,2,2-Tetrachloroethane	ND		ug/l	0.50	--	1
Benzene	ND		ug/l	0.50	--	1
Toluene	ND		ug/l	0.75	--	1
Ethylbenzene	ND		ug/l	0.50	--	1
Chloromethane	ND		ug/l	2.5	--	1
Bromomethane	ND		ug/l	1.0	--	1
Vinyl chloride	ND		ug/l	1.0	--	1
Chloroethane	ND		ug/l	1.0	--	1
1,1-Dichloroethene	ND		ug/l	0.50	--	1
trans-1,2-Dichloroethene	ND		ug/l	0.75	--	1
Trichloroethene	ND		ug/l	0.50	--	1
1,2-Dichlorobenzene	ND		ug/l	2.5	--	1
1,3-Dichlorobenzene	ND		ug/l	2.5	--	1
1,4-Dichlorobenzene	ND		ug/l	2.5	--	1

Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01
Client ID: COMPOSITE-1
Sample Location: NEWTON, MA

Date Collected: 03/22/12 07:45
Date Received: 03/22/12
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by GC/MS - Westborough Lab						
Methyl tert butyl ether	ND		ug/l	1.0	--	1
p/m-Xylene	ND		ug/l	1.0	--	1
o-Xylene	ND		ug/l	1.0	--	1
cis-1,2-Dichloroethene	ND		ug/l	0.50	--	1
Dibromomethane	ND		ug/l	5.0	--	1
1,4-Dichlorobutane	ND		ug/l	5.0	--	1
1,2,3-Trichloropropane	ND		ug/l	5.0	--	1
Styrene	ND		ug/l	1.0	--	1
Dichlorodifluoromethane	ND		ug/l	5.0	--	1
Acetone	ND		ug/l	5.0	--	1
Carbon disulfide	ND		ug/l	5.0	--	1
2-Butanone	ND		ug/l	5.0	--	1
Vinyl acetate	ND		ug/l	5.0	--	1
4-Methyl-2-pentanone	ND		ug/l	5.0	--	1
2-Hexanone	ND		ug/l	5.0	--	1
Ethyl methacrylate	ND		ug/l	5.0	--	1
Acrylonitrile	ND		ug/l	5.0	--	1
Bromochloromethane	ND		ug/l	2.5	--	1
Tetrahydrofuran	ND		ug/l	5.0	--	1
2,2-Dichloropropane	ND		ug/l	2.5	--	1
1,2-Dibromoethane	ND		ug/l	2.0	--	1
1,3-Dichloropropane	ND		ug/l	2.5	--	1
1,1,1,2-Tetrachloroethane	ND		ug/l	0.50	--	1
Bromobenzene	ND		ug/l	2.5	--	1
n-Butylbenzene	ND		ug/l	0.50	--	1
sec-Butylbenzene	ND		ug/l	0.50	--	1
tert-Butylbenzene	ND		ug/l	2.5	--	1
o-Chlorotoluene	ND		ug/l	2.5	--	1
p-Chlorotoluene	ND		ug/l	2.5	--	1
1,2-Dibromo-3-chloropropane	ND		ug/l	2.5	--	1
Hexachlorobutadiene	ND		ug/l	0.50	--	1
Isopropylbenzene	ND		ug/l	0.50	--	1
p-Isopropyltoluene	ND		ug/l	0.50	--	1
Naphthalene	ND		ug/l	2.5	--	1
n-Propylbenzene	ND		ug/l	0.50	--	1
1,2,3-Trichlorobenzene	ND		ug/l	2.5	--	1
1,2,4-Trichlorobenzene	ND		ug/l	2.5	--	1
1,3,5-Trimethylbenzene	ND		ug/l	2.5	--	1
1,2,4-Trimethylbenzene	ND		ug/l	2.5	--	1

Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01
Client ID: COMPOSITE-1
Sample Location: NEWTON, MA

Date Collected: 03/22/12 07:45
Date Received: 03/22/12
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
-----------	--------	-----------	-------	----	-----	-----------------

Volatile Organics by GC/MS - Westborough Lab

trans-1,4-Dichloro-2-butene	ND		ug/l	2.5	--	1
Ethyl ether	ND		ug/l	2.5	--	1
Tert-Butyl Alcohol	ND		ug/l	10	--	1
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	--	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	119		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	102		70-130

Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01
Client ID: COMPOSITE-1
Sample Location: NEWTON, MA
Matrix: Water
Analytical Method: 1,8260B(M)
Analytical Date: 03/24/12 13:17
Analyst: PD

Date Collected: 03/22/12 07:45
Date Received: 03/22/12
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by GC/MS-SIM - Westborough Lab						
1,4-Dioxane	ND		ug/l	3.0	--	1

Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01
Client ID: COMPOSITE-1
Sample Location: NEWTON, MA
Matrix: Water
Analytical Method: 14,504.1
Analytical Date: 03/27/12 08:52
Analyst: SH

Date Collected: 03/22/12 07:45
Date Received: 03/22/12
Field Prep: Not Specified
Extraction Date: 03/27/12 06:45

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

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260B(M)
Analytical Date: 03/24/12 12:43
Analyst: PD

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS-SIM - Westborough Lab for sample(s): 01 Batch: WG525058-3					
1,4-Dioxane	ND		ug/l	3.0	--

Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260B

Analytical Date: 03/24/12 12:43

Analyst: PD

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG525062-3					
Methylene chloride	ND		ug/l	3.0	--
1,1-Dichloroethane	ND		ug/l	0.75	--
Chloroform	ND		ug/l	0.75	--
Carbon tetrachloride	ND		ug/l	0.50	--
1,2-Dichloropropane	ND		ug/l	1.8	--
Dibromochloromethane	ND		ug/l	0.50	--
1,1,2-Trichloroethane	ND		ug/l	0.75	--
Tetrachloroethene	ND		ug/l	0.50	--
Chlorobenzene	ND		ug/l	0.50	--
Trichlorofluoromethane	ND		ug/l	2.5	--
1,2-Dichloroethane	ND		ug/l	0.50	--
1,1,1-Trichloroethane	ND		ug/l	0.50	--
Bromodichloromethane	ND		ug/l	0.50	--
trans-1,3-Dichloropropene	ND		ug/l	0.50	--
cis-1,3-Dichloropropene	ND		ug/l	0.50	--
1,1-Dichloropropene	ND		ug/l	2.5	--
Bromoform	ND		ug/l	2.0	--
1,1,2,2-Tetrachloroethane	ND		ug/l	0.50	--
Benzene	ND		ug/l	0.50	--
Toluene	ND		ug/l	0.75	--
Ethylbenzene	ND		ug/l	0.50	--
Chloromethane	ND		ug/l	2.5	--
Bromomethane	ND		ug/l	1.0	--
Vinyl chloride	ND		ug/l	1.0	--
Chloroethane	ND		ug/l	1.0	--
1,1-Dichloroethene	ND		ug/l	0.50	--
trans-1,2-Dichloroethene	ND		ug/l	0.75	--
Trichloroethene	ND		ug/l	0.50	--
1,2-Dichlorobenzene	ND		ug/l	2.5	--
1,3-Dichlorobenzene	ND		ug/l	2.5	--
1,4-Dichlorobenzene	ND		ug/l	2.5	--



Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260B
Analytical Date: 03/24/12 12:43
Analyst: PD

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG525062-3					
Methyl tert butyl ether	ND		ug/l	1.0	--
p/m-Xylene	ND		ug/l	1.0	--
o-Xylene	ND		ug/l	1.0	--
cis-1,2-Dichloroethene	ND		ug/l	0.50	--
Dibromomethane	ND		ug/l	5.0	--
1,4-Dichlorobutane	ND		ug/l	5.0	--
1,2,3-Trichloropropane	ND		ug/l	5.0	--
Styrene	ND		ug/l	1.0	--
Dichlorodifluoromethane	ND		ug/l	5.0	--
Acetone	ND		ug/l	5.0	--
Carbon disulfide	ND		ug/l	5.0	--
2-Butanone	ND		ug/l	5.0	--
Vinyl acetate	ND		ug/l	5.0	--
4-Methyl-2-pentanone	ND		ug/l	5.0	--
2-Hexanone	ND		ug/l	5.0	--
Ethyl methacrylate	ND		ug/l	5.0	--
Acrylonitrile	ND		ug/l	5.0	--
Bromochloromethane	ND		ug/l	2.5	--
Tetrahydrofuran	ND		ug/l	5.0	--
2,2-Dichloropropane	ND		ug/l	2.5	--
1,2-Dibromoethane	ND		ug/l	2.0	--
1,3-Dichloropropane	ND		ug/l	2.5	--
1,1,1,2-Tetrachloroethane	ND		ug/l	0.50	--
Bromobenzene	ND		ug/l	2.5	--
n-Butylbenzene	ND		ug/l	0.50	--
sec-Butylbenzene	ND		ug/l	0.50	--
tert-Butylbenzene	ND		ug/l	2.5	--
o-Chlorotoluene	ND		ug/l	2.5	--
p-Chlorotoluene	ND		ug/l	2.5	--
1,2-Dibromo-3-chloropropane	ND		ug/l	2.5	--
Hexachlorobutadiene	ND		ug/l	0.50	--



Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260B

Analytical Date: 03/24/12 12:43

Analyst: PD

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG525062-3					
Isopropylbenzene	ND		ug/l	0.50	--
p-Isopropyltoluene	ND		ug/l	0.50	--
Naphthalene	ND		ug/l	2.5	--
n-Propylbenzene	ND		ug/l	0.50	--
1,2,3-Trichlorobenzene	ND		ug/l	2.5	--
1,2,4-Trichlorobenzene	ND		ug/l	2.5	--
1,3,5-Trimethylbenzene	ND		ug/l	2.5	--
1,3,5-Trichlorobenzene	ND		ug/l	2.0	--
1,2,4-Trimethylbenzene	ND		ug/l	2.5	--
trans-1,4-Dichloro-2-butene	ND		ug/l	2.5	--
Ethyl ether	ND		ug/l	2.5	--
Isopropyl Ether	ND		ug/l	2.0	--
Tert-Butyl Alcohol	ND		ug/l	10	--
Ethyl-Tert-Butyl-Ether	ND		ug/l	2.0	--
Tertiary-Amyl Methyl Ether	ND		ug/l	2.0	--

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	120		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	102		70-130

Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 14,504.1

Analytical Date: 03/27/12 07:35

Analyst: SH

Extraction Date: 03/27/12 06:45

Parameter	Result	Qualifier	Units	RL	MDL
Pesticides by GC - Westborough Lab for sample(s): 01 Batch: WG525257-1					
1,2-Dibromoethane	ND		ug/l	0.010	--
1,2-Dibromo-3-chloropropane	ND		ug/l	0.010	--

SEMIVOLATILES

Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01
Client ID: COMPOSITE-1
Sample Location: NEWTON, MA
Matrix: Water
Analytical Method: 1,8270C
Analytical Date: 03/28/12 02:53
Analyst: JB

Date Collected: 03/22/12 07:45
Date Received: 03/22/12
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 03/24/12 11:52

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Semivolatile Organics by GC/MS - Westborough Lab						
Benzidine	ND		ug/l	20	--	1
1,2,4-Trichlorobenzene	ND		ug/l	5.0	--	1
Bis(2-chloroethyl)ether	ND		ug/l	2.0	--	1
1,2-Dichlorobenzene	ND		ug/l	2.0	--	1
1,3-Dichlorobenzene	ND		ug/l	2.0	--	1
1,4-Dichlorobenzene	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	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
Hexachlorocyclopentadiene	ND		ug/l	20	--	1
Isophorone	ND		ug/l	5.0	--	1
Nitrobenzene	ND		ug/l	2.0	--	1
NitrosoDiPhenylAmine(NDPA)/DPA	ND		ug/l	2.0	--	1
Bis(2-Ethylhexyl)phthalate	ND		ug/l	3.0	--	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
Aniline	ND		ug/l	2.0	--	1
4-Chloroaniline	ND		ug/l	5.0	--	1
2-Nitroaniline	ND		ug/l	5.0	--	1
3-Nitroaniline	ND		ug/l	5.0	--	1
4-Nitroaniline	ND		ug/l	5.0	--	1
Dibenzofuran	ND		ug/l	2.0	--	1
n-Nitrosodimethylamine	ND		ug/l	2.0	--	1

Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01
Client ID: COMPOSITE-1
Sample Location: NEWTON, MA

Date Collected: 03/22/12 07:45
Date Received: 03/22/12
Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Semivolatile Organics by GC/MS - Westborough Lab						
2,4,6-Trichlorophenol	ND		ug/l	5.0	--	1
P-Chloro-M-Cresol	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	10	--	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
Phenol	ND		ug/l	5.0	--	1
2-Methylphenol	ND		ug/l	5.0	--	1
3-Methylphenol/4-Methylphenol	ND		ug/l	5.0	--	1
2,4,5-Trichlorophenol	ND		ug/l	5.0	--	1
Benzoic Acid	ND		ug/l	50	--	1
Benzyl Alcohol	ND		ug/l	2.0	--	1
Carbazole	ND		ug/l	2.0	--	1
Pyridine	ND		ug/l	5.0	--	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2-Fluorophenol	70		21-120
Phenol-d6	54		10-120
Nitrobenzene-d5	92		23-120
2-Fluorobiphenyl	94		15-120
2,4,6-Tribromophenol	128	Q	10-120
4-Terphenyl-d14	139		41-149

Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01
Client ID: COMPOSITE-1
Sample Location: NEWTON, MA
Matrix: Water
Analytical Method: 1,8270C-SIM
Analytical Date: 03/26/12 22:26
Analyst: JC

Date Collected: 03/22/12 07:45
Date Received: 03/22/12
Field Prep: Not Specified
Extraction Method: EPA 3510C
Extraction Date: 03/24/12 12:02

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Semivolatile Organics by GC/MS-SIM - Westborough Lab						
Acenaphthene	ND		ug/l	0.20	--	1
2-Chloronaphthalene	ND		ug/l	0.20	--	1
Fluoranthene	ND		ug/l	0.20	--	1
Hexachlorobutadiene	ND		ug/l	0.50	--	1
Naphthalene	ND		ug/l	0.20	--	1
Benzo(a)anthracene	ND		ug/l	0.20	--	1
Benzo(a)pyrene	ND		ug/l	0.20	--	1
Benzo(b)fluoranthene	ND		ug/l	0.20	--	1
Benzo(k)fluoranthene	ND		ug/l	0.20	--	1
Chrysene	ND		ug/l	0.20	--	1
Acenaphthylene	ND		ug/l	0.20	--	1
Anthracene	ND		ug/l	0.20	--	1
Benzo(ghi)perylene	ND		ug/l	0.20	--	1
Fluorene	ND		ug/l	0.20	--	1
Phenanthrene	ND		ug/l	0.20	--	1
Dibenzo(a,h)anthracene	ND		ug/l	0.20	--	1
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	--	1
Pyrene	ND		ug/l	0.20	--	1
1-Methylnaphthalene	ND		ug/l	0.20	--	1
2-Methylnaphthalene	ND		ug/l	0.20	--	1
Pentachlorophenol	ND		ug/l	0.80	--	1
Hexachlorobenzene	ND		ug/l	0.80	--	1
Hexachloroethane	ND		ug/l	0.80	--	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2-Fluorophenol	65		21-120
Phenol-d6	47		10-120
Nitrobenzene-d5	112		23-120
2-Fluorobiphenyl	88		15-120
2,4,6-Tribromophenol	108		10-120
4-Terphenyl-d14	112		41-149



Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8270C
Analytical Date: 03/26/12 13:59
Analyst: JB

Extraction Method: EPA 3510C
Extraction Date: 03/24/12 11:52

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG524970-1					
Acenaphthene	ND		ug/l	2.0	--
Benzidine	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	--
1,2-Dichlorobenzene	ND		ug/l	2.0	--
1,3-Dichlorobenzene	ND		ug/l	2.0	--
1,4-Dichlorobenzene	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	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	ND		ug/l	20	--
Hexachloroethane	ND		ug/l	2.0	--
Isophorone	ND		ug/l	5.0	--
Naphthalene	ND		ug/l	2.0	--
Nitrobenzene	ND		ug/l	2.0	--
NitrosoDiPhenylAmine(NDPA)/DPA	ND		ug/l	2.0	--
Bis(2-Ethylhexyl)phthalate	ND		ug/l	3.0	--
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: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8270C
Analytical Date: 03/26/12 13:59
Analyst: JB

Extraction Method: EPA 3510C
Extraction Date: 03/24/12 11:52

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG524970-1					
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	--
Aniline	ND		ug/l	2.0	--
4-Chloroaniline	ND		ug/l	5.0	--
1-Methylnaphthalene	ND		ug/l	2.0	--
2-Nitroaniline	ND		ug/l	5.0	--
3-Nitroaniline	ND		ug/l	5.0	--
4-Nitroaniline	ND		ug/l	5.0	--
Dibenzofuran	ND		ug/l	2.0	--
2-Methylnaphthalene	ND		ug/l	2.0	--
n-Nitrosodimethylamine	ND		ug/l	2.0	--
2,4,6-Trichlorophenol	ND		ug/l	5.0	--
P-Chloro-M-Cresol	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	10	--
4-Nitrophenol	ND		ug/l	10	--
2,4-Dinitrophenol	ND		ug/l	20	--
4,6-Dinitro-o-cresol	ND		ug/l	10	--



Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8270C
Analytical Date: 03/26/12 13:59
Analyst: JB

Extraction Method: EPA 3510C
Extraction Date: 03/24/12 11:52

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS - Westborough Lab for sample(s): 01 Batch: WG524970-1					
Pentachlorophenol	ND		ug/l	10	--
Phenol	ND		ug/l	5.0	--
2-Methylphenol	ND		ug/l	5.0	--
3-Methylphenol/4-Methylphenol	ND		ug/l	5.0	--
2,4,5-Trichlorophenol	ND		ug/l	5.0	--
Benzoic Acid	ND		ug/l	50	--
Benzyl Alcohol	ND		ug/l	2.0	--
Carbazole	ND		ug/l	2.0	--
Pyridine	ND		ug/l	5.0	--

Surrogate	%Recovery	Qualifier	Acceptance Criteria
2-Fluorophenol	64		21-120
Phenol-d6	43		10-120
Nitrobenzene-d5	78		23-120
2-Fluorobiphenyl	78		15-120
2,4,6-Tribromophenol	93		10-120
4-Terphenyl-d14	120		41-149

Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8270C-SIM

Analytical Date: 03/26/12 20:49

Analyst: JC

Extraction Method: EPA 3510C

Extraction Date: 03/24/12 12:02

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS-SIM - Westborough Lab for sample(s): 01 Batch: WG524971-1					
Acenaphthene	ND		ug/l	0.20	--
2-Chloronaphthalene	ND		ug/l	0.20	--
Fluoranthene	ND		ug/l	0.20	--
Hexachlorobutadiene	ND		ug/l	0.50	--
Naphthalene	ND		ug/l	0.20	--
Benzo(a)anthracene	ND		ug/l	0.20	--
Benzo(a)pyrene	ND		ug/l	0.20	--
Benzo(b)fluoranthene	ND		ug/l	0.20	--
Benzo(k)fluoranthene	ND		ug/l	0.20	--
Chrysene	ND		ug/l	0.20	--
Acenaphthylene	ND		ug/l	0.20	--
Anthracene	ND		ug/l	0.20	--
Benzo(ghi)perylene	ND		ug/l	0.20	--
Fluorene	ND		ug/l	0.20	--
Phenanthrene	ND		ug/l	0.20	--
Dibenzo(a,h)anthracene	ND		ug/l	0.20	--
Indeno(1,2,3-cd)Pyrene	ND		ug/l	0.20	--
Pyrene	ND		ug/l	0.20	--
1-Methylnaphthalene	ND		ug/l	0.20	--
2-Methylnaphthalene	ND		ug/l	0.20	--
Pentachlorophenol	ND		ug/l	0.80	--
Hexachlorobenzene	ND		ug/l	0.80	--
Hexachloroethane	ND		ug/l	0.80	--

Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8270C-SIM
Analytical Date: 03/26/12 20:49
Analyst: JC

Extraction Method: EPA 3510C
Extraction Date: 03/24/12 12:02

Parameter	Result	Qualifier	Units	RL	MDL
Semivolatile Organics by GC/MS-SIM - Westborough Lab for sample(s): 01 Batch: WG524971-1					

Surrogate	%Recovery	Qualifier	Acceptance Criteria
2-Fluorophenol	80		21-120
Phenol-d6	56		10-120
Nitrobenzene-d5	135	Q	23-120
2-Fluorobiphenyl	102		15-120
2,4,6-Tribromophenol	117		10-120
4-Terphenyl-d14	141		41-149

Lab Control Sample Analysis Batch Quality Control

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Parameter	LCS		LCSD		%Recovery		RPD	Qual	RPD Limits
	%Recovery	Qual	%Recovery	Qual	Limits				
Semivolatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG524970-2 WG524970-3									
Acenaphthene	93		93		37-111	0			30
Benzidine	13		12			8			30
1,2,4-Trichlorobenzene	67		64		39-98	5			30
Hexachlorobenzene	106		108		40-140	2			30
Bis(2-chloroethyl)ether	89		81		40-140	9			30
2-Chloronaphthalene	87		86		40-140	1			30
1,2-Dichlorobenzene	68		62		40-140	9			30
1,3-Dichlorobenzene	64		61		40-140	5			30
1,4-Dichlorobenzene	65		61		36-97	6			30
3,3'-Dichlorobenzidine	93		95		40-140	2			30
2,4-Dinitrotoluene	119	Q	121	Q	24-96	2			30
2,6-Dinitrotoluene	119		119		40-140	0			30
Azobenzene	106		110		40-140	4			30
Fluoranthene	119		119		40-140	0			30
4-Chlorophenyl phenyl ether	102		102		40-140	0			30
4-Bromophenyl phenyl ether	112		112		40-140	0			30
Bis(2-chloroisopropyl)ether	87		78		40-140	11			30
Bis(2-chloroethoxy)methane	96		90		40-140	6			30
Hexachlorobutadiene	59		56		40-140	5			30
Hexachlorocyclopentadiene	28	Q	27	Q	40-140	4			30
Hexachloroethane	60		54		40-140	11			30

Lab Control Sample Analysis Batch Quality Control

Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

Parameter	LCS		LCSD		%Recovery		RPD		RPD Limits	
	%Recovery	Qual	%Recovery	Qual	Limits		RPD	Qual		
Volatile Organics by GC/MS-SIM - Westborough Lab Associated sample(s): 01 Batch: WG525058-1 WG525058-2										
1,4-Dioxane	96		91		70-130		5			25

Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG525062-1 WG525062-2										
Methylene chloride	103		102		70-130		1			20
1,1-Dichloroethane	110		110		70-130		0			20
Chloroform	115		115		70-130		0			20
Carbon tetrachloride	85		88		63-132		3			20
1,2-Dichloropropane	116		116		70-130		0			20
Dibromochloromethane	100		104		63-130		4			20
1,1,2-Trichloroethane	118		122		70-130		3			20
Tetrachloroethene	108		106		70-130		2			20
Chlorobenzene	105		107		75-130		2			25

Lab Control Sample Analysis

Batch Quality Control

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Parameter	LCS		LCSD		%Recovery		RPD	Qual	RPD Limits
	%Recovery	Qual	%Recovery	Qual	Limits	Limits			
Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG525062-1 WG525062-2									
Trichlorofluoromethane	129		130		62-150		1		20
1,2-Dichloroethane	124		126		70-130		2		20
1,1,1-Trichloroethane	96		98		67-130		2		20
Bromodichloromethane	116		118		67-130		2		20
trans-1,3-Dichloropropene	95		100		70-130		5		20
cis-1,3-Dichloropropene	98		99		70-130		1		20
1,1-Dichloropropene	108		106		70-130		2		20
Bromoform	102		107		54-136		5		20
1,1,2,2-Tetrachloroethane	114		113		67-130		1		20
Benzene	111		109		70-130		2		25
Toluene	103		103		70-130		0		25
Ethylbenzene	110		112		70-130		2		20
Chloromethane	42	Q	43	Q	64-130		2		20
Bromomethane	122		133		39-139		9		20
Vinyl chloride	113		113		55-140		0		20
Chloroethane	112		109		55-138		3		20
1,1-Dichloroethene	104		103		61-145		1		25
trans-1,2-Dichloroethene	105		102		70-130		3		20
Trichloroethene	116		120		70-130		3		25
1,2-Dichlorobenzene	113		112		70-130		1		20
1,3-Dichlorobenzene	112		112		70-130		0		20

Lab Control Sample Analysis Batch Quality Control

Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

Parameter	LCS		LCSD		%Recovery		Limits		RPD	Qual	RPD Limits
	%Recovery	Qual	%Recovery	Qual	%Recovery	Qual	Limits				
Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG525062-1 WG525062-2											
1,4-Dichlorobenzene	112		112				70-130		0		20
Methyl tert butyl ether	99		100				63-130		1		20
p/m-Xylene	110		111				70-130		1		20
o-Xylene	107		109				70-130		2		20
cis-1,2-Dichloroethene	107		109				70-130		2		20
Dibromomethane	123		121				70-130		2		20
1,4-Dichlorobutane	107		110				70-130		3		20
1,2,3-Trichloropropane	119		122				64-130		2		20
Styrene	106		109				70-130		3		20
Dichlorodifluoromethane	80		79				36-147		1		20
Acetone	128		132				58-148		3		20
Carbon disulfide	85		83				51-130		2		20
2-Butanone	128		134				63-138		5		20
Vinyl acetate	102		105				70-130		3		20
4-Methyl-2-pentanone	110		114				59-130		4		20
2-Hexanone	122		127				57-130		4		20
Ethyl methacrylate	91		96				70-130		5		20
Acrylonitrile	114		118				70-130		3		20
Bromochloromethane	108		109				70-130		1		20
Tetrahydrofuran	111		124				58-130		11		20
2,2-Dichloropropane	71		74				63-133		4		20

Lab Control Sample Analysis Batch Quality Control

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Parameter	LCS		LCSD		%Recovery		RPD	Qual	RPD Limits
	%Recovery	Qual	%Recovery	Qual	Limits				
Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG525062-1 WG525062-2									
1,2-Dibromoethane	112		117		70-130	4		20	
1,3-Dichloropropane	116		118		70-130	2		20	
1,1,1,2-Tetrachloroethane	107		111		64-130	4		20	
Bromobenzene	113		116		70-130	3		20	
n-Butylbenzene	115		115		53-136	0		20	
sec-Butylbenzene	108		106		70-130	2		20	
tert-Butylbenzene	109		107		70-130	2		20	
o-Chlorotoluene	117		116		70-130	1		20	
p-Chlorotoluene	117		117		70-130	0		20	
1,2-Dibromo-3-chloropropane	110		113		41-144	3		20	
Hexachlorobutadiene	98		100		63-130	2		20	
Isopropylbenzene	109		108		70-130	1		20	
p-Isopropyltoluene	116		114		70-130	2		20	
Naphthalene	109		116		70-130	6		20	
n-Propylbenzene	115		113		69-130	2		20	
1,2,3-Trichlorobenzene	110		113		70-130	3		20	
1,2,4-Trichlorobenzene	112		117		70-130	4		20	
1,3,5-Trimethylbenzene	114		113		64-130	1		20	
Trichlorobenzene	100		102		70-130	2		20	
1,2,4-Trimethylbenzene	115		114		70-130	1		20	
trans-1,4-Dichloro-2-butene	88		91		70-130	3		20	

Lab Control Sample Analysis Batch Quality Control

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Parameter	LCS		LCSD		%Recovery		RPD	Qual	RPD Limits
	%Recovery	Qual	%Recovery	Qual	Limits				
Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 01 Batch: WG525062-1 WG525062-2									
Ethyl ether	109		110		59-134	1			20
Isopropyl Ether	112		113		70-130	1			20
tert-Butyl Alcohol	92		101		70-130	9			20
Ethyl-Tert-Butyl-Ether	88		92		70-130	4			20
Tertiary-Amyl Methyl Ether	98		101		66-130	3			20

Surrogate	LCS		LCSD		Acceptance	
	%Recovery	Qual	%Recovery	Qual	Criteria	
1,2-Dichloroethane-d4	117		119		70-130	
Toluene-d8	100		100		70-130	
4-Bromofluorobenzene	101		101		70-130	
Dibromofluoromethane	106		103		70-130	

PCBS

Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01
Client ID: COMPOSITE-1
Sample Location: NEWTON, MA
Matrix: Water
Analytical Method: 5,608
Analytical Date: 03/26/12 11:06
Analyst: SS

Date Collected: 03/22/12 07:45
Date Received: 03/22/12
Field Prep: Not Specified
Extraction Method: EPA 608
Extraction Date: 03/24/12 09:12
Cleanup Method1: EPA 3665A
Cleanup Date1: 03/25/12
Cleanup Method2: EPA 3660B
Cleanup Date2: 03/25/12

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

Surrogate	% Recovery	Qualifier	Acceptance Criteria
2,4,5,6-Tetrachloro-m-xylene	42		30-150
Decachlorobiphenyl	39		30-150

Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

Method Blank Analysis Batch Quality Control

Analytical Method: 5,608
 Analytical Date: 03/26/12 10:13
 Analyst: SS

Extraction Method: EPA 608
 Extraction Date: 03/24/12 09:12
 Cleanup Method1: EPA 3665A
 Cleanup Date1: 03/25/12
 Cleanup Method2: EPA 3660B
 Cleanup Date2: 03/25/12

Parameter	Result	Qualifier	Units	RL	MDL
Polychlorinated Biphenyls by GC - Westborough Lab for sample(s): 01 Batch: WG524961-1					
Aroclor 1016	ND		ug/l	0.250	--
Aroclor 1221	ND		ug/l	0.250	--
Aroclor 1232	ND		ug/l	0.250	--
Aroclor 1242	ND		ug/l	0.250	--
Aroclor 1248	ND		ug/l	0.250	--
Aroclor 1254	ND		ug/l	0.250	--
Aroclor 1260	ND		ug/l	0.250	--

Surrogate	%Recovery	Qualifier	Acceptance Criteria
2,4,5,6-Tetrachloro-m-xylene	78		30-150
Decachlorobiphenyl	70		30-150

Matrix Spike Analysis Batch Quality Control

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	MS Found	MSD %Recovery	MSD Found	Recovery Limits	RPD Qual	RPD Limits
Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01 QC Batch ID: WG524961-3 QC Sample: L1204883-02 Client ID: MS										
Aroclor 1016	ND	1.06	0.863	81	-	-	-	40-140	-	50
Aroclor 1260	ND	1.06	0.887	83	-	-	-	40-140	-	50

Surrogate	MS % Recovery	MS Qualifier	MSD % Recovery	MSD Qualifier	Acceptance Criteria
2,4,5,6-Tetrachloro-m-xylene	87				30-150
Decachlorobiphenyl	91				30-150

Lab Control Sample Analysis
Batch Quality Control

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Parameter	LCS		LCSD		%Recovery Limits		RPD	Qual	RPD Limits
	%Recovery	Qual	%Recovery	Qual	%Recovery	Limits			

Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01 Batch: WG524961-2

Atroclor 1016
Atroclor 1260

61	-	40-140	-	50
54	-	40-140	-	50

Surrogate	LCS		LCSD		Acceptance Criteria
	%Recovery	Qual	%Recovery	Qual	
2,4,5,6-Tetrachloro-m-xylene	65				30-150
Decachlorobiphenyl	67				30-150



Lab Duplicate Analysis Batch Quality Control

Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
Polychlorinated Biphenyls by GC - Westborough Lab Associated sample(s): 01 QC Batch ID: WG524961-4 QC Sample: L1204875-01 Client ID: COMPOSITE-1						
Aroclor 1016	ND	ND	ug/l	NC		50
Aroclor 1221	ND	ND	ug/l	NC		50
Aroclor 1232	ND	ND	ug/l	NC		50
Aroclor 1242	ND	ND	ug/l	NC		50
Aroclor 1248	ND	ND	ug/l	NC		50
Aroclor 1254	ND	ND	ug/l	NC		50
Aroclor 1260	ND	ND	ug/l	NC		50

Surrogate	%Recovery	Qualifier	%Recovery	Qualifier	Acceptance Criteria
2,4,5,6-Tetrachloro-m-xylene	42		74		30-150
Decachlorobiphenyl	39		49		30-150

METALS

Project Name: 55 BS (CHSC)

Project Number: 3379.00

Lab Number: L1204875

Report Date: 03/28/12

SAMPLE RESULTS

Lab ID: L1204875-01

Client ID: COMPOSITE-1

Sample Location: NEWTON, MA

Matrix: Water

Date Collected: 03/22/12 07:45

Date Received: 03/22/12

Field Prep: Not Specified

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Prep Method	Analytical Method	Analyst
Total Metals - Westborough Lab											
Antimony, Total	0.001		mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK
Arsenic, Total	0.0064		mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK
Cadmium, Total	ND		mg/l	0.0002	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK
Chromium, Total	0.0009		mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK
Copper, Total	0.0006		mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK
Iron, Total	53		mg/l	0.05	--	1	03/26/12 11:23	03/27/12 14:18	EPA 3005A	19,200.7	AI
Lead, Total	ND		mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK
Mercury, Total	ND		mg/l	0.0002	--	1	03/23/12 13:30	03/26/12 09:43	EPA 245.1	3,245.1	KL
Nickel, Total	0.0016		mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK
Selenium, Total	ND		mg/l	0.001	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK
Silver, Total	ND		mg/l	0.0004	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK
Zinc, Total	0.0196		mg/l	0.0050	--	1	03/26/12 11:23	03/27/12 10:00	EPA 3005A	1,6020	AK



Project Name: 55 BS (CHSC)

Lab Number: L1204875

Project Number: 3379.00

Report Date: 03/28/12

Method Blank Analysis Batch Quality Control

Parameter	Result Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Total Metals - Westborough Lab for sample(s): 01 Batch: WG524772-1									
Mercury, Total	ND	mg/l	0.0002	--	1	03/23/12 13:30	03/26/12 09:37	3,245.1	KL

Prep Information

Digestion Method: EPA 245.1

Parameter	Result Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Total Metals - Westborough Lab for sample(s): 01 Batch: WG525107-1									
Antimony, Total	ND	mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK
Arsenic, Total	ND	mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK
Cadmium, Total	ND	mg/l	0.0002	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK
Chromium, Total	ND	mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK
Copper, Total	ND	mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK
Lead, Total	ND	mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK
Nickel, Total	ND	mg/l	0.0005	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK
Selenium, Total	ND	mg/l	0.001	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK
Silver, Total	ND	mg/l	0.0004	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK
Zinc, Total	ND	mg/l	0.0050	--	1	03/26/12 11:23	03/27/12 09:52	1,6020	AK

Prep Information

Digestion Method: EPA 3005A

Parameter	Result Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
Total Metals - Westborough Lab for sample(s): 01 Batch: WG525109-1									
Iron, Total	ND	mg/l	0.05	--	1	03/26/12 11:23	03/27/12 13:42	19,200.7	AI

Prep Information

Digestion Method: EPA 3005A



Lab Control Sample Analysis Batch Quality Control

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Parameter	LCS		LCSD		%Recovery Limits	RPD	Qual	RPD Limits
	%Recovery	Qual	%Recovery	Qual				
Total Metals - Westborough Lab Associated sample(s): 01 Batch: WG524772-2								
Mercury, Total	107		-		85-115	-		
Total Metals - Westborough Lab Associated sample(s): 01 Batch: WG525107-2								
Antimony, Total	91		-		80-120	-		
Arsenic, Total	100		-		80-120	-		
Cadmium, Total	109		-		80-120	-		
Chromium, Total	97		-		80-120	-		
Copper, Total	100		-		80-120	-		
Lead, Total	102		-		80-120	-		
Nickel, Total	100		-		80-120	-		
Selenium, Total	112		-		80-120	-		
Silver, Total	98		-		80-120	-		
Zinc, Total	102		-		80-120	-		
Total Metals - Westborough Lab Associated sample(s): 01 Batch: WG525109-2								
Iron, Total	99		-		85-115	-		

Matrix Spike Analysis

Batch Quality Control

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	MSD Found	MSD %Recovery	MSD Recovery Limits	RPD Qual	RPD Limits
-----------	---------------	----------	----------	--------------	-----------	---------------	---------------------	----------	------------

Total Metals - Westborough Lab Associated sample(s): 01 QC Batch ID: WG524772-4 QC Sample: L1204875-01 Client ID: COMPOSITE-1

Mercury, Total	ND	0.001	0.0013	127	-	-	70-130	-	20
----------------	----	-------	--------	-----	---	---	--------	---	----

Total Metals - Westborough Lab Associated sample(s): 01 QC Batch ID: WG525107-4 QC Sample: L1204875-01 Client ID: COMPOSITE-1

Antimony, Total	0.001	0.5	0.4969	99	-	-	80-120	-	20
Arsenic, Total	0.0064	0.12	0.1303	103	-	-	80-120	-	20
Cadmium, Total	ND	0.051	0.0549	108	-	-	80-120	-	20
Chromium, Total	0.0009	0.2	0.1933	96	-	-	80-120	-	20
Copper, Total	0.0006	0.25	0.2440	97	-	-	80-120	-	20
Lead, Total	ND	0.51	0.5220	102	-	-	80-120	-	20
Nickel, Total	0.0016	0.5	0.4880	97	-	-	80-120	-	20
Selenium, Total	ND	0.12	0.134	112	-	-	80-120	-	20
Silver, Total	ND	0.05	0.0486	97	-	-	80-120	-	20
Zinc, Total	0.0196	0.5	0.5368	103	-	-	80-120	-	20

Total Metals - Westborough Lab Associated sample(s): 01 QC Batch ID: WG525109-4 QC Sample: L1204746-01 Client ID: MS Sample

Iron, Total	0.24	1	1.2	96	-	-	75-125	-	20
-------------	------	---	-----	----	---	---	--------	---	----

Lab Duplicate Analysis

Project Name: 55 BS (CHSC)
Project Number: 3379.00

Lab Number: L1204875
Report Date: 03/28/12

Batch Quality Control

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
Total Metals - Westborough Lab Associated sample(s): 01 QC Batch ID: WG524772-3 QC Sample: L1204875-01 Client ID: COMPOSITE-1						
Mercury, Total	ND	ND	mg/l	NC		20
Total Metals - Westborough Lab Associated sample(s): 01 QC Batch ID: WG525107-3 QC Sample: L1204875-01 Client ID: COMPOSITE-1						
Antimony, Total	0.001	0.0007	mg/l	36		20
Arsenic, Total	0.0064	0.0064	mg/l	1		20
Cadmium, Total	ND	ND	mg/l	NC		20
Chromium, Total	0.0009	0.0008	mg/l	17		20
Copper, Total	0.0006	0.0006	mg/l	6		20
Lead, Total	ND	ND	mg/l	NC		20
Nickel, Total	0.0016	0.0016	mg/l	2		20
Selenium, Total	ND	ND	mg/l	NC		20
Silver, Total	ND	ND	mg/l	NC		20
Zinc, Total	0.0196	0.0197	mg/l	0		20



INORGANICS & MISCELLANEOUS

APPENDIX C
DILUTION CALCULATION

PURPOSE:

To calculate the dilution factor (DF) for metal concentrations in a potential discharge from on-site construction dewatering activities.

METHOD:

$$DF = (Q_d + Q_s) / Q_d$$

Where: DF = Dilution Factor

Q_d = Maximum flow rate of the discharge in cubic feet per second (cfs)

Q_s = Receiving water 7Q₁₀ flow (cfs) where 7Q₁₀ is the minimum flow (cfs) for 7 consecutive days with a recurrence interval of 10 years

GIVEN:

1.0 gpm = 0.00223 cfs

Q_d = 100 gpm from the system = 0.223 cfs

Q_s = 0 cfs of flow in Hammond Pond

CALCULATION:

$$DF = (0.223\text{cfs} + 0\text{cfs}) / 0.223\text{cfs}$$

$$DF = 1.00$$

RESULTS:

The resulting dilution factor to be used when discharging to Hammond Pond is equal to 1.00.

REFERENCES:

APPENDIX D

FEDERAL CORRESPONDENCE



United States Department of the Interior



FISH AND WILDLIFE SERVICE

New England Field Office
70 Commercial Street, Suite 300
Concord, NH 03301-5087
<http://www.fws.gov/newengland>

January 17, 2012

To Whom It May Concern:

This project was reviewed for the presence of federally listed or proposed, threatened or endangered species or critical habitat per instructions provided on the U.S. Fish and Wildlife Service's New England Field Office website:

(<http://www.fws.gov/newengland/EndangeredSpec-Consultation.htm>)

Based on information currently available to us, no federally listed or proposed, threatened or endangered species or critical habitat under the jurisdiction of the U.S. Fish and Wildlife Service are known to occur in the project area(s). Preparation of a Biological Assessment or further consultation with us under section 7 of the Endangered Species Act is not required. No further Endangered Species Act coordination is necessary for a period of one year from the date of this letter, unless additional information on listed or proposed species becomes available.

Thank you for your cooperation. Please contact Mr. Anthony Tur of this office at 603-223-2541 if we can be of further assistance.

Sincerely yours,

Thomas R. Chapman
Supervisor
New England Field Office

APPENDIX E

NATIONAL REGISTER OF HISTORIC PLACES

Appendix E
National Register of Historic Places
Research Documentation
Chestnut Hill Square, Newton, Massachusetts

Site Name	Address	Date Listed
Adams, Amos, House	37 Park Ave.	9/4/1986
Adams, Seth, House	72 Jewett St.	9/4/1986
Agudas Achim Anshei Sfard Synagogus	168 Adams St.	2/16/1990
Allen, Nathaniel Topliff, Homestead	25 Webster St.	1/9/1978
Auburndale Congregational Church	64 Hancock St.	9/4/1986
Bartlett--Hawkes Farm	15 Winnetaska Rd.	9/4/1986
Bayley House	16 Fairmont Ave.	9/4/1986
Bemis Mill	1--3 Bridge St.	9/4/1986
Bigelow, Dr. Henry Jacob, House	742 Dedham St.	1/1/1976
Bigelow, Henry, House	15 Bigelow Terr.	9/4/1986
Blodgett, William, House	645 Centre St.	9/4/1986
Boston Edison Power Station	374 Homer St.	2/16/1990
Brackett House	621 Centre St.	9/4/1986
Brae-Burn Historic District	Brae Burn and Windmere Rds.	2/16/1990
Brandeis University President's House	66 Beaumont Ave.	8/19/1998
Bruner, Mayall, House	36 Magnolia Ave.	2/16/1990
Buckingham, John, House	33--35 Waban St.	9/4/1986
Building at 1--6 Walnut Terrace	1--6 Walnut Terr.	9/4/1986
Central Congregational Church	218 Walnut St.	9/4/1986
Chestnut Hill, The	219 Commonwealth Ave.	9/4/1986
Childs, Mayor Edwin O., House	340 California St.	2/16/1990
Church, William L., House	145 Warren St.	2/21/1990
City Stable and Garage	74 Elliot St.	2/16/1990
Claflin School	110-112 Washington Park	8/16/1984
Claflin, Adams, House	156 Grant Ave.	9/4/1986
Clark House	379 Central St.	9/4/1986
Colby Hall	141 Herrick Rd.	1/30/1978
Collins, Frederick, House	1734 Beacon St.	9/4/1986
Commonwealth Avenue Historic District	Roughly Commonwealth Ave. from Walnut St. to Waban Hill Rd.	2/16/1990
Crafts Street City Stable	90 Crafts St.	12/18/2009
Crimmins, Thomas A., House	19 Dartmouth St.	2/16/1990
Crystal Lake and Pleasant Street Historic District	Roughly bounded by Sudbury Aqueduct, Pleasant Ave., Lake Ave., and Crystal St. and Webster Ct.	9/4/1986
Curtis, Allen Crocker, House--Pillar House	26 Quinobequin Rd.	9/4/1986
Curtis, William, House	2330 Washington St.	9/4/1986
Davis, Seth, House	32 Eden Ave.	9/4/1986
Day Estate Historic District	Commonwealth Ave. and Dartmouth St.	2/16/1990
Dupee Estate	400 Beacon St.	9/4/1986
Durant, Capt. Edward, House	286 Waverly Ave.	5/13/1976
East Parish Burying Ground	Centre and Cotton Sts.	11/23/1983
Echo Bridge	Spans Charles River	4/9/1980
Eddy, George W., House	85 Bigelow Rd.	2/16/1990

Appendix E
National Register of Historic Places
Research Documentation
Chestnut Hill Square, Newton, Massachusetts

Site Name	Address	Date Listed
Elliott, Charles D., House	7 Colman St.	9/4/1986
Eminence, The	122 Islington Rd.	9/4/1986
Estabrook, Rufus, House	33 Woodland Rd.	9/4/1986
Evangelical Baptist Church	23 Chapel St.	9/4/1986
Farlow and Kendrick Parks Historic District	Roughly bounded by Franklin, Park, Church, Center and Wesley Sts. and Maple Ave.	7/8/1982
Farlow and Kendrick Parks Historic District (Boundary Increase)	223, 226, 234, 237, 242, 243, 248, and 256 Park St.	9/4/1986
Farlow Hill Historic District	Roughly bounded by Shornecliffe Rd., Franklin St., Chamberlain Rd., Huntington Rd., and Farlow Rd.	2/21/1990
Farquhar, Samuel, House	7 Channing St.	9/4/1986
Fenno, John A., House	171 Lowell Ave.	9/4/1986
Fessenden, Reginald A., House	45 Waban Hill Rd.	1/7/1976
First Baptist Church in Newton	848 Beacon St.	4/15/1982
First Unitarian Church	1326 Washington St.	9/4/1986
Fuller, Capt. Edward, Farm	59--71 North St.	9/4/1986
Gane, Henry, House	121 Adena Rd.	9/4/1986
Goodbar, Lafayette, House	614 Walnut St.	2/16/1990
Gray Cliff Historic District	35, 39, 43, 53, 54, 64, 65, and 70 Gray Cliff Rd	9/4/1986
Gray Cliff Historic District (Boundary Increase)	The Ledges and Bishopsgate Rds.	2/16/1990
Gunderson, Jos., House	983 Centre St.	9/4/1986
Hammond House	9 Old Orchard Rd.	3/9/1990
Hammond, E. C., House	35 Groveland St.	2/16/1990
Harbach, John, House	303 Ward St.	9/4/1986
Harding House--Walker Missionary Home	161--163 Grove St.	9/4/1986
Harriman, Henry I., House	825 Centre St.	2/16/1990
Harrison, C. Lewis, House	14 Eliot Memorial Rd.	2/16/1990
Haskell, Charles, House	27 Sargent St.	9/4/1986
Hayward, Fred R., House	1547 Centre St.	2/16/1990
Hopewell, Frank B., House	301 Waverley Ave.	2/16/1990
House at 1008 Beacon Street	1008 Beacon St.	9/4/1986
House at 102 Staniford Street	102 Staniford St.	9/4/1986
House at 107 Waban Hill Road	107 Waban Hill Rd.	9/4/1986
House at 115--117 Jewett Street	115--117 Jewett St.	9/4/1986
House at 15 Davis Avenue	15 Davis Ave.	9/4/1986
House at 152 Suffolk Road	152 Suffolk Rd.	9/4/1986
House at 170 Otis Street	170 Otis St.	9/4/1986
House at 173--175 Ward Street	173--175 Ward St.	9/4/1986
House at 203 Islington Road	203 Islington Rd.	9/4/1986
House at 215 Brookline Street	215 Brookline St.	9/4/1986

Appendix E
National Register of Historic Places
Research Documentation
Chestnut Hill Square, Newton, Massachusetts

Site Name	Address	Date Listed
House at 2212 Commonwealth Avenue	2212 Commonwealth Ave.	9/4/1986
House at 230 Melrose Street	230 Melrose St.	9/4/1986
House at 230 Winchester Street	230 Winchester St.	9/4/1986
House at 3 Davis Avenue	3 Davis Ave.	9/4/1986
House at 307 Lexington Street	307 Lexington St.	9/4/1986
House at 309 Waltham Street	309 Waltham St.	9/4/1986
House at 31 Woodbine Street	31 Woodbine St.	9/4/1986
House at 41 Middlesex Road	41 Middlesex Rd.	9/4/1986
House at 47 Sargent Street	47 Sargent St.	9/4/1986
House at 511 Watertown Street	511 Watertown St.	9/4/1986
House at 60 William Street	60 William St.	9/4/1986
House at 68 Maple Street	68 Maple St.	9/4/1986
House at 729 Dedham Street	729 Dedham St.	9/4/1986
House at 81--83 Gardner Street	81--83 Gardner St.	9/4/1986
Howes, C. G., Dry Cleaning--Carley Real Estate	1173 Washington St.	2/16/1990
Hyde Avenue Historic District	36, 42, 52, 59, and 62 Hyde Ave.	12/23/1986
Hyde House	27 George St.	9/4/1986
Hyde, Eleazer, House	401 Woodward St.	9/4/1986
Hyde, Gershom, House	29 Greenwood St.	9/4/1986
Jackson Homestead	527 Washington St.	6/4/1973
Jackson House	125 Jackson St.	9/4/1986
Jackson, Samuel, Jr., House	137 Washington St.	9/4/1986
Jennison, Joshua, House	11 Thornton St.	9/4/1986
Judkins, Amos, House	8 Central Ave.	9/4/1986
Kessler, William F., House	211 Highland St.	2/16/1990
King House	328 Brookline St.	9/4/1986
Kingsbury House	137 Suffolk St.	9/4/1986
Kistler House	945 Beacon St.	9/4/1986
Lasell Neighborhood Historic District	Roughly bounded by Woodland and Studio Rds., Aspen and Seminary Aves., and Grove St.	9/4/1986
Luke, Arthur F., House	221 Prince St.	2/16/1990
Maynard, Charles, House	459 Crafts St.	4/4/1996
Merriam, Galen, House	102 Highland St.	9/4/1986
Monadnock Road Historic District	Roughly Monadnock Rd., Wachusett Rd., Hudson St., Tudor Rd., Beacon St., and Hobart Rd	2/16/1990
Morton Road Historic District	Morton Rd. at Morton St.	2/16/1990
Mount Pleasant	15 Bracebridge Rd.	9/4/1986
Myrtle Baptist Church Neighborhood Historic District	Roughly Curve St. and Prospect St.	12/11/2008
Needham Street Bridge	Needham St. at Charles River	9/4/1986
Newton Centre Branch Library	1294 Centre St.	2/16/1990

Appendix E
National Register of Historic Places
Research Documentation
Chestnut Hill Square, Newton, Massachusetts

Site Name	Address	Date Listed
Newton City Hall and War Memorial	1000 Commonwealth Ave.	2/16/1990
Newton Cottage Hospital Historic	2014 Washington St.	2/21/1990
Newton Highlands Historic District	Roughly bounded by Lincoln and Hartford Sts., Erie Ave., and Woodward St.	9/4/1986
Newton Highlands Historic District (Boundary Increase)	Roughly Lincoln St., Hartford St., Erie Ave., and Woodward St.	2/16/1990
Newton Lower Falls Historic District	Roughly bounded by Hagar, Grove, Washington, and Concord Sts.	9/4/1986
Newton Street Railway Car barn	1121 Washington St.	9/4/1986
Newton Theological Institution Historic District	Roughly bounded by Braeland Ave., Ripley St. and Langley Rd., Bowdoin School Access Rd., and Cypress St.	9/4/1986
Newton Upper Falls Historic District	Roughly bounded by Boylston, Elliot, and Oak Sts., and the Charles River	9/4/1986
Newtonville Historic District	Roughly bounded by Highland Ave., Walnut Mill St., Otis St., and Lowell Ave.	9/4/1986
Newtonville Historic District (Boundary Increase)	Roughly Highland and Lowell Aves., Otis St., and Birch Hill Rd., and Walnut St. from Newtonville to Washington	2/16/1990
Nichols House	140 Sargent St.	9/4/1986
Noves, Charles W., House	271 Chestnut St.	2/16/1990
Old Chestnut Hill Historic District	Along Hammond St. and Chestnut Hill Rd. roughly bounded by Beacon St. and Essex Rd., and Suffolk Rd.	9/4/1986
Old Chestnut Hill Historic District (Boundary Increase)	Roughly Chestnut Hill, Essex, and Gate House; Middlesex, Hammond, and Longwood; and Suffolk and Old Orchard	2/16/1990
Old Chestnut Hill Historic District (Boundary Increase)	Suffolk Rd.	7/8/1999
Old Shephard Farm	1832 Washington St.	9/4/1986
Our Lady Help of Christians Historic District	Adams and Washington Sts.	9/4/1986
Page, H. P., House	110 Jewett St.	9/4/1986
Parsons, Edward, House	56 Cedar St.	9/4/1986
Peabody--Williams House	7 Norman Rd.	9/4/1986
Peirce School	87 Chestnut St.	12/6/1978
Pierce, F. Lincoln, Houses	231--237 Mill St.	2/16/1990
Pine Ridge Road--Plainfield Street Historic District	Roughly Pine Ridge Rd., Upland Rd., Plainfield St., and Chestnut St.	2/16/1990
Plummer Memorial Library	375 Auburn St.	2/16/1990
Potter Estate	65--71 Walnut Pk.	12/23/1986
Prescott Estate	770 Centre St.	9/4/1986
Putnam Street Historic District	Roughly bounded by Winthrop, Putnam, Temple, and Shaw Sts.	9/4/1986

Appendix E
National Register of Historic Places
Research Documentation
Chestnut Hill Square, Newton, Massachusetts

Site Name	Address	Date Listed
Railroad Hotel	1273--1279 Washington St.	9/4/1986
Rawson Estate	41 Vernon St.	9/4/1986
Richards, James Lorin, House	47 Kirkstall and 22 Oakwood Rds.	9/4/1986
Riley, Charles, House	93 Bellevue St.	9/4/1986
Riverside Concrete Company--Lamont's Market	2 Charles St.	2/16/1990
Sacco--Pettee Machine Shops	156 Oak St.	12/23/1986
Saco-Lowell Shops Housing Historic District	Oak, William, Butts, and Saco Sts.	2/16/1990
Salisbury, Jonas, House	85 Langley Rd.	9/4/1986
Salisbury, Jonas, House	62 Walnut Pk.	9/4/1986
Sawyer, C. A., House (Second)	221 Prince St.	2/16/1990
Second Church of Newton	60 Highland St.	2/16/1990
Simpson House	57 Hunnewell Ave.	9/4/1986
Smith, Curtis S., House	56 Fairmont Ave.	9/4/1986
Smith--Peterson House	32 Farlow Rd.	9/4/1986
South Burying Ground	Winchester St.	11/27/2004
Souther, John, House	43 Fairmont St.	9/4/1986
St. Mary's Church and Cemetery	258 Concord St.	4/16/1980
Staples--Crafts--Wiswall Farm	1615 Beacon St.	9/4/1986
Stewart, Frank H., House	41 Montvale Rd.	2/21/1990
Stone, Joseph L., House	77--85 Temple St.	9/4/1986
Stratton, Edward B., House	25 Kenmore St.	2/16/1990
Strong's Block	1637--1651 Beacon St.	9/4/1986
Sumner and Gibbs Streets Historic District	Roughly Sumner St. between Willow St. and Cotswold Terr. and 184 Gibbs St.	9/4/1986
Thaxter, Celia, House	524 California St.	9/4/1986
Thayer House	17 Channing St.	9/4/1986
Towle, Loren, Estate	785 Centre St.	2/16/1990
Union Street Historic District	Roughly Union St. between Langley Rd. and Herrick St., and 17--31 Herrick St.	9/4/1986
Waban Branch Library	1608 Beacon St.	2/16/1990
Walker Home for Missionary Children	161--63, 165, 167 Grove St., 136, 138, 144 Hancock St.	6/4/1992
Ward, Ephraim, House	121 Ward St.	9/4/1986
Ware Paper Mill	2276 Washington St.	5/22/1978
Warren, Dr. Samuel, House	432 Cherry St.	1/3/1985
Warren, Levi, Jr., High School	1600 Washington St.	2/16/1990
Washington Park Historic District	4-97 Washington Park & 5,15 Park Place	3/12/2008
Webster Park Historic District	Along Webster Pk. and Webster St. between Westwood St. and Oak Ave.	9/4/1986
Weeks Junior High School	7 Hereward Rd.	10/23/1984
West Newton Hill Historic District	Roughly bounded by Highland Ave., Lenox, Hampshire, and Chestnut Sts.	9/4/1986

Appendix E
National Register of Historic Places
Research Documentation
Chestnut Hill Square, Newton, Massachusetts

Site Name	Address	Date Listed
West Newton Village Center Historic District	Roughly Washington St. from Putnam to Davis Ct.	2/16/1990
West Parish Burying Ground	River and Cherry Sts.	11/13/2004
Wheat, Samuel, House	399 Waltham St.	9/4/1986
Whittemore's Tavern	473 Auburn St.	9/4/1986
Windsor Road Historic District	Windsor and Kent Rds.	2/16/1990
Winslow-Haskell Mansion	53 Vista Ave.	10/25/1979
Woodland, Newton Highlands, and Newton Centre Railroad Stations, and Baggage and Express Building	1897 Washington St., 18 Station Ave., 80 and 50 Union St.	6/3/1976
Woodward, John, House	50 Fairlee Rd.	9/4/1986
Working Boys Home	333 Nahanton St.	9/4/1986

Notes:

Sanborn, Head & Associates, Inc. (Sanborn Head) conducted a review of the National Register of Historic Places within Newton, Massachusetts. The search returned 189 results, none of which are located at or abutting the site.

APPENDIX F

BEST MANAGEMENT PRACTICES PLAN

BEST MANAGEMENT PRACTICES PLAN

Notice of Intent for Remediation General Permit
Temporary Construction Dewatering
Chestnut Hill Shopping Center
55 Boylston Street
Newton, Massachusetts

This Best Management Practices Plan (BMPP) has been prepared in accordance with the requirements of the National Pollutant Discharge Elimination System (NPDES) Remediation General Permit (RGP) for Massachusetts (MAG910000). This BMPP supports an application for coverage under the RGP for dewatering during construction at 55 Boylston Street in the Chestnut Hill area of Newton, Massachusetts. The treated water from temporary dewatering operations will be discharged directly to Hammond Pond in accordance with the Order of Conditions issued by the City of Newton Conservation Commission.

The following practices will be adhered to during construction dewatering at the site.

Site Security

During construction activities, the dewatering system will be secured using standard construction practices. The treatment system will be located in a fenced area to limit access. All associated piping will be secured and checked regularly. Any system failure, vandalism, or other incidents will be addressed in a timely manner to restore the treatment system to its intended operational capacity.

Minimizing Sediment in Influent

Pumping for temporary construction dewatering will be performed from filtered sumps constructed by placing crushed stone around the pump intakes(s). Filtered sumps will be cleaned of sediment and/or replaced as needed to reduce the amount of sediment in the influent to the treatment system.

Management of Generated Wastes

It is anticipated that wastes generated by the treatment system will include sediment sludge that accumulates in the fractionation tanks, spent bag filters, and backwash water for the resin vessels. Sediment and backwash water will be recycled on-site below finished grade outside the wetland buffer zone, or disposed of at a licensed facility that is permitted to accept the material. Bag filters will be discarded as solid waste at a permitted solid waste disposal facility.

Prohibition of Discharge Exceeding Design Flow

The Operator will monitor the flow rate through the treatment system using a flowmeter installed along the effluent discharge line. In the event the average daily throughput to the treatment system exceeds the maximum design flow rate for the treatment system, the

Operator will increase the design capacity of the system by methods such as, but not limited to, providing additional storage tanks to increase residence time, modifying earthwork procedures to reduce the amount of inflow to the treatment system, or providing treatment equipment with higher flow capacity.

Preventative Maintenance Required

Preventative maintenance for proper operation of the treatment system will include periodic sediment removal, replacement of bag filters, and backwashing of resin vessels. Preventative maintenance will be performed in accordance with the manufacturer's recommendations for the treatment equipment and the operational requirements outlined by the treatment system designer. The Operator shall be responsible for maintaining the treatment system as necessary to achieve the required effluent treatment standards in the RGP.

Operator Training

The Operator, or its subcontractor, shall provide field staff trained to operate the treatment system as designed, perform preventative maintenance, and collect effluent water samples for laboratory analytical testing as necessary to comply with the conditions of the RGP.

Management of Run-on and Runoff

Surface runoff from precipitation on areas surrounding the temporary dewatering area shall be controlled or diverted from entering excavations to reduce the potential for significant inflow to the treatment system from rain events. This shall be accomplished by constructing temporary berms or swales to limit the amount of surface water runoff entering the excavation area.

Erosion and Sedimentation Controls

Erosion and sediment controls will be installed prior to the start of construction in accordance with the Erosion and Sediment Control Plans prepared by Appledore/Tighe & Bond approved by the City of Newton, and the Order of Conditions issued by the City of Newton Conservation Commission.

S:\WESDATA\3300\3379.00\Source Files\2012 RGP NOI\Appendix F - BMP Plan\20120409 Const BMPP.docx