HARVARD UNIVERSITY • UNIVERSITY OPERATIONS SERVICES
Environmental Health & Safety

50 years of service excellence

November 26, 2008

US Environmental Protection Agency
Dewatering GP Processing
Municipal Assistance Unit (CMU)
1 Congress Street, Suite 1100
Boston, MA 02114-2023

Re: Notice of Intent (NOI) – Harvard University Business School – Dewatering General Permit

To Whom it May Concern:

Please find enclosed a Notice of Intent (NOI) for coverage under the Dewatering General Permit for the State of Massachusetts for the building foundation sumps located at Harvard University's Business School Campus in Allston, MA. This NOI is issued for continued coverage of the site under the previous General Permit, MAG070159. The buildings covered by this NOI on the campus include Baker Hall, Baker Library, McArthur Hall, McCullom Hall, Shad Hall, and Spangler Hall, all of which have foundation dewatering activities.

The NOI follows the requirements as defined by the EPA and is being submitted concurrently to the Massachusetts Department of Environmental Protection. The NOI includes the EPA recommended form and 6 Attachments to the form.

We note that the pH on the Baker Library sample is 9.7 s.u. We are currently investigating this value to determine if it was an analytical error or if there is another possible source. Additional information will be submitted once available.

We also note that our flow data is estimated. Additional data on flow and duration of operation will be collected in the coming weeks.

Should you have any questions, please contact me at 617-496-1359.

Sincerely,

Gordon Reynolds
Assistant Director of Environmental Programs
Harvard University

Cc: H.Joseph Griffin, HU
J. Munro, HBS
Mass DEP

Enter your transmittal number → X225625 (Transmittal Number)

Your unique Transmittal Number can be accessed online: http://mass.gov/dep/service/online/trasmfrm.shtml or call MassDEP's InfoLine at 617-338-2255 or 800-462-0444 (from 508, 781, and 978 area codes).

Massachusetts Department of Environmental Protection

Transmittal Form for Permit Application and Payment

1. Please type or print. A separate Transmittal Form must be completed for each permit application.

2. Make your check payable to the Commonwealth of Massachusetts and mail it with a copy of this form to: DEP, P.O. Box 4062, Boston, MA 02211.

3. Three copies of this form will be needed.

Copy 1 - the original must accompany your permit application. **Copy 2** must accompany your fee payment. **Copy 3** should be retained for your records

4. Both fee-paying and exempt applicants must mail a copy of this transmittal form to:

MassDEP
P.O. Box 4062
Boston, MA
02211

* **Note:** For BWSC Permits, enter the LSP.

A. Permit Information

1. Permit Code: 7 or 8 character code from permit instructions	2. Name of Permit Category
BRP WM 10 - EPA NOI Form	Request for General Permit Coverage

3. Type of Project or Activity: Building Foundation Dewatering

B. Applicant Information – Firm or Individual

1. Name of Firm - Or, if party needing this approval is an individual enter name below: Harvard University

2. **Last Name** of Individual	3. **First Name** of Individual	4. MI

5. Street Address: 46 Blackstone Street

6. City/Town	7. State	8. Zip Code	9. Telephone #	10. Ext. #
Cambridge	MA	02139	617-496-1359	

11. Contact Person	12. e-mail address (optional)
Gordon Reynolds	Gordon_Reynolds@harvard.edu

C. Facility, Site or Individual Requiring Approval

1. Name of Facility, Site Or Individual: Harvard Business School

2. Street Address: 70 North Harvard Street

3. City/Town	4. State	5. Zip Code	6. Telephone #	7. Ext. #
Boston	MA	02163	617-495-1353	

8. DEP Facility Number (if Known)	9. Federal I.D. Number (if Known)	10. BWSC Tracking # (if Known)

D. Application Prepared by (if different from Section B)*

1. Name of Firm Or Individual

2. Address

3. City/Town	4. State	5. Zip Code	6. Telephone #	7. Ext. #

8. Contact Person	9. LSP Number (BWSC Permits only)

E. Permit - Project Coordination

1. Is this project subject to MEPA review? ☐ yes ☒ no
   If yes, enter the project's EOEA file number - assigned when an Environmental Notification Form is submitted to the MEPA unit:

EOEA File Number

F. Amount Due

DEP Use Only

Permit No:

Rec'd Date:

Reviewer:

Special Provisions:

1. ☐ **Fee** Exempt (city, town or municipal housing authority)(state agency if fee is $100 or less).
   There are no fee exemptions for BWSC permits, regardless of applicant status.
2. ☐ Hardship Request - payment extensions according to 310 CMR 4.04(3)(c).
3. ☐ Alternative Schedule Project (according to 310 CMR 4.05 and 4.10).
4. ☐ Homeowner (according to 310 CMR 4.02).

Check Number	Dollar Amount	Date
	385	

II. Suggested Notice of Intent (NOI) Form

1. General facility information. Please provide the following information about the facility.

a) Name of facility:

Harvard Business School, Harvard University

Mailing Address for the Facility:

Harvard Business School
Shad Hall
70 North HARVARD ST
Boston, MA 02163

b) Location Address of the Facility (if different from mailing address):

Facility Location

longitude: 71.123 W
latitude: 42.366 N

Type of Business:
University

Facility SIC codes:
8221

c) Name of facility owner: Harvard University **Owner's email:** Gordon_Reynolds@harvard.edu

Owner's Tel #: 617-496-1359 **Owner's Fax #:** 617-495-0593

Address of owner (if different from facility address)

EHS
46 Blackstone Street

Owner is (check one): 1. Federal____ 2. State _____ 3.Tribal_____ 4. Private ✓ 4. Other _____ (Describe)

Legal name of Operator, if not owner: Harvard Business School

Operator Contact Name: Jason Munro

Operator Tel Number: (617) 495-1353 **Fax Number:** (617) 495-8640

Operator's email: jmunro@hbs.edu

Operator Address (if different from owner)

Harvard Business School, Shad Hall, 70 North Harvard Street, Boston, MA 02163

d) Attach a topographic map indicating the location of the facility and the outfall(s) to the receiving water. Map attached? ✓

See Attachment 1

e) Check Yes or No for the following:

1. **Has a prior NPDES permit been granted for the discharge? Yes ✓ No____ If Yes, Permit Number:** MAG070159
2. **Is the discharge a "new discharge" as defined by 40 CFR Section 122.22? Yes_____ No ✓**
3. **Is the facility covered by an individual NPDES permit? Yes_____ No ✓ If Yes, Permit Number ____**
4. **Is there a pending application on file with EPA for this discharge? Yes_____ No ✓ If Yes, date of submittal:**

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

a) **Name of receiving water into which discharge will occur:** Charles River
State Water Quality Classification: B **Freshwater:** Yes **Marine Water:** _____

b) **Describe the discharge activities for which the owner/applicant is seeking coverage:**
1. **Construction dewatering of groundwater intrusion and/or storm water accumulation.**
2. **Short-term or long-term dewatering of foundation sumps.**
3. **Other.**

Item 2 - Long-term dewatering of foundation sumps

c) **Number of outfalls** 3

For each outfall:

d) **Estimate the maximum daily and average monthly flow of the discharge (in gallons per day – GPD). Max Daily Flow** est. 30 gpm*GPD
Average Monthly Flow unknownGPD *The flow is estimated. There are no flow meters available on these systems.

e) **What is the maximum and minimum monthly pH of the discharge (in s.u.)? Max pH** 9.7 # **Min pH** 6.0

This value is currently under investigation. It was a one time measurement.

f) **Identify the source of the discharge (i.e. potable water, surface water, or groundwater). If groundwater, the facility shall submit effluent test results, as required in Section 4.4.5 of the General Permit.**

Groundwater See Attachment 2 for Sampling Results

g) **What treatment does the wastewater receive prior to discharge?** None

h) **Is the discharge continuous? Yes** _____ **No** ✓ **If no, is the discharge periodic (P) (occurs regularly, i.e., monthly or seasonally, but is not continuous all year) or intermittent (I) (occurs sometimes but not regularly) or both (B)** I
If (P), number of days or months per year of the discharge _____ **and the specific months of discharge** _____;
If (I), number of days/year there is a discharge unknown**
Is the discharge temporary? Yes _____ **No** ✓
If yes, approximate start date of dewatering _____ **approximate end date of dewatering** _____

i) **Latitude and longitude of each discharge within 100 feet (See http://www.epa.gov/tri/report/siting_tool): Outfall 1: long.** 71.118 W **lat.** 42.366 N ; **Outfall 2: long.** 71.122 W **lat.** 42.368 N; **Outfall 3: long.** 71.124 N **lat.** 42.369 W.

j) **If the source of the discharge is potable water, please provide the reported or calculated seven day-ten year low flow (7Q10) of the receiving water and attach any calculation sheets used to support stream flow and dilution calculations** _____ **cfs**
(See Appendix VII for equations and additional information)

** The flow from these sources is not currently measured. We are in the process of placing meters on these systems to assist with flow measurement.

MASSACHUSETTS FACILITIES: See Section 3.4 and Appendix 1 of the General Permit for more information on Areas of Critical Environmental Concern (ACEC):

k) **Does the discharge occur in an ACEC? Yes _____ No ✓** See Attachment 3
If yes, provide the name of the ACEC: _____

3. Contaminant Information

a) **Are any pH neutralization and/or dechlorination chemicals used in the discharge? If so, include the chemical name and manufacturer; maximum and average daily quantity used as well as the maximum and average daily expected concentrations (mg/l) in the discharge, and the vendor's reported aquatic toxicity (NOAEL and/or LC_{50} in percent for aquatic organism(s)).** There are no chemicals in use.

b) **Please report any known remediation activities or water-quality issues in the vicinity of the discharge.** See Attachment 4

4. Determination of Endangered Species Act Eligibility: Provide documentation of ESA eligibility as required at Part 3.4 and Appendices III and IV. In addition, respond to the following questions.

a) **Are any listed threatened or endangered species, or designated critical habitat, in proximity to the discharge? Yes___ No ✓**
b) **Has any consultation with the federal services been completed ? Yes___ No ✓** See Attachment 5
c) **Is consultation underway? Yes ____ No ✓**
d) **What were the results of the consultation with the U.S. Fish and Wildlife Service and/or NOAA Fisheries Service (check one): a "no jeopardy" opinion _____or written concurrence____ on a finding that the discharges are not likely to adversely affect any endangered species or critical habitat.**
e) **Which of the five eligibility criteria listed in Appendix 2, Section B (A,B,C,D,or E) have you met?** A
f) **Please attach a copy of the most current federal listing of endangered and threatened species, found at USF&W website.**

5. Documentation of National Historic Preservation Act requirements: Please respond to the following questions:

a) **Are any historic properties listed or eligible for listing on the National Register of Historic Places located on the facility site or in proximity to the discharge? Yes ✓ No ____** See Attachment 6
b) **Have any State or Tribal historic preservation officers been consulted in this determination? Yes _____ or No ✓ If yes, attach the results of the consultation(s).**
c) **Which of the three National Historic Preservation Act requirements listed in Appendix 3, Section C (1,2 o3) have you met?** 2

6. 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

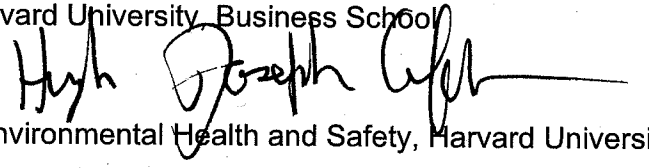
7. Signature Requirements: The Notice of Intent must be signed by the operator in accordance with the signatory requirements of 40 CFR Section 122.22 (see below) including the following certification:

I certify under penalty of law that (1) no biocides or other chemical additives except for those used for pH adjustment and/or dechlorination are used in the dewatering system; (2) the discharge consists solely of dewatering and authorized pH adjustment and/or

dechlorination chemicals; (3) the discharge does not come in contact with any raw materials, intermediate product, water product or finished product; (4) if the discharge of dewatering subsequently mixes with other permitted wastewater (i.e.stormwater) prior to discharging to the receiving water, any monitoring provided under this permit will be only for dewatering discharge; (5) where applicable, the facility has complied with the requirements of this permit specific to the Endangered Species Act and National Historic Preservation Act; and (6) 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 Name: Harvard University, Business School

Operator signature: 

Title: Director, Environmental Health and Safety, Harvard University

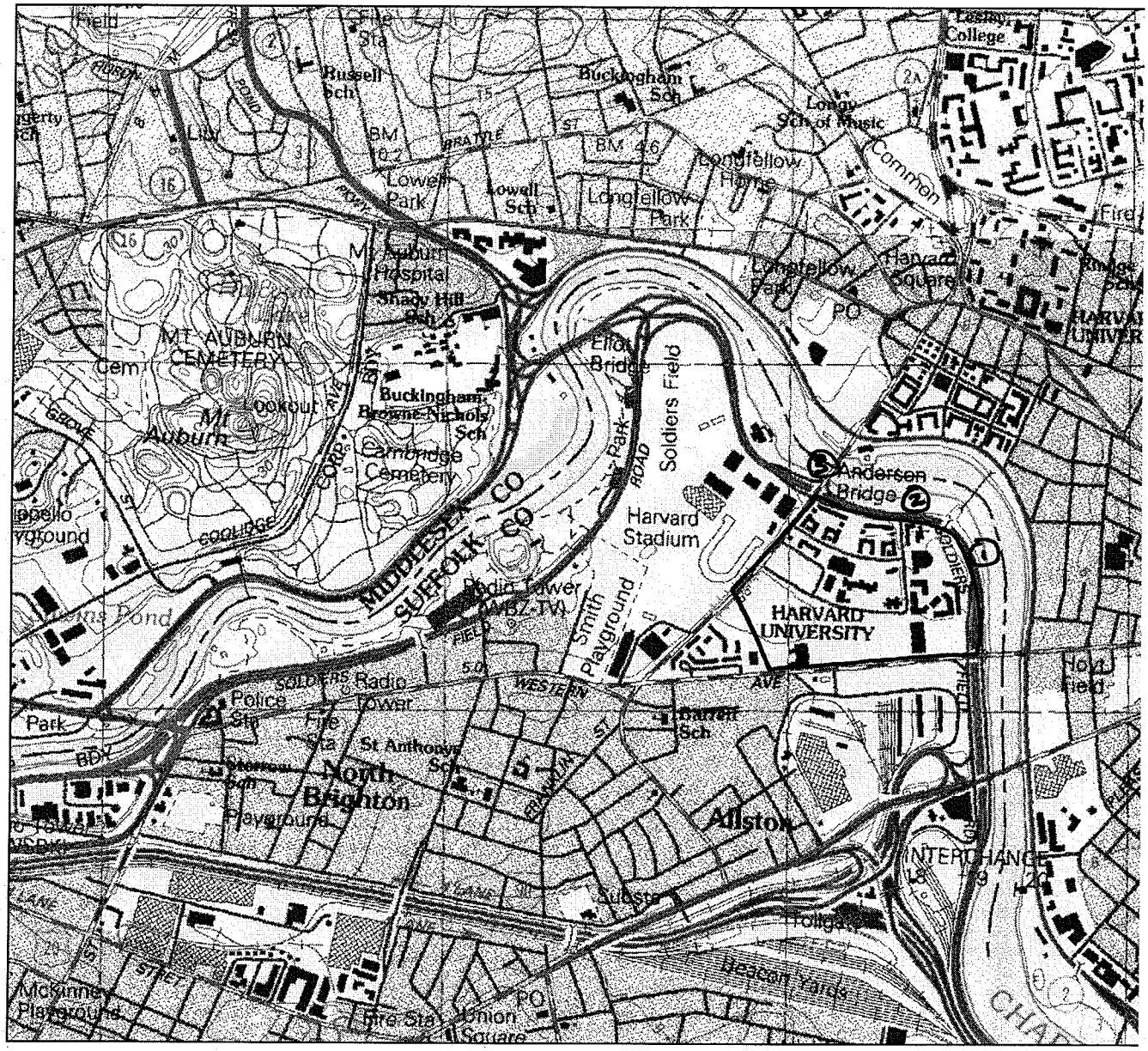
Date: 11/26/08

Federal regulations require this application to be signed as follows:

1. For a corporation, by a principal executive officer of at least the level of vice president;
2. For partnership or sole proprietorship, by a general partner or the proprietor, respectively, or,
3. For a municipality, State, Federal or other public facility, by either a principal executive officer or ranking elected official.

Attachment 1

Site Topographic Map


Lesley College
Buckingham Sch
Longy Sch of Music
Longfellow Park
Longfellow Horse
Common
Harvard Square
PO
Lowell Park
Lowell Sch
Russell Sch
Auburn Hospital
Shady Hill Sch
MT AUBURN CEMETERY
Cambridge Cemetery
Buckingham, Browne-Nichols Sch
Mt Auburn Lookout
Elliot Bridge
Soldiers Field
Andersen Bridge
Harvard Stadium
HARVARD UNIVERSITY
Radio Tower WBZ-TV
Smith Playground
MIDDLESEX CO
SUFFOLK CO
Police Sta
Fire Sta
St Anthonys Sch
North Brighton Playground
Warren Sch
Allston
INTERCHANGE
Soldiers Radio Tower
Howard Field
Mckinnon Playground
Union Square
Deacon Yards
N
0 0.5 Mi
0 2000 Ft
Map provided by MyTopo.com

Attachment 2

Groundwater Sampling Results

ALPHA ANALYTICAL

Eight Walkup Drive
Westborough, Massachusetts 01581-1019
(508) 898-9220 www.alphalab.com
MA:M-MA086 NH:2003 CT:PH-0574 ME:MA0086 RI:LAO00065 NY:11148 NJ:MA935 Army:USACE

CERTIFICATE OF ANALYSIS

Client: Harvard University

Address: c/o Blackstone Station
46 Blackstone Street
Cambridge, MA 02139

Attn: Mr. Gordon Reynolds

Project Number:

Laboratory Job Number: L0817319

Date Received: 21-NOV-2008

Date Reported: 25-NOV-2008

Delivery Method: Client

Site: HBS-STORM

ALPHA SAMPLE NUMBER	CLIENT IDENTIFICATION	SAMPLE LOCATION
L0817319-01	MAC-1A/01B	HBS
L0817319-02	BAK-01A/01B	HBS
L0817319-03	BAKL-01A/01B	HBS
L0817319-04	SHAD-01A/01B	HBS
L0817319-05	SPANG-01A/01B	HBS
L0817319-06	MCC-01A/01B	HBS
L0817319-07	RIVER 1	HBS

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

Authorized by: Michelle M. Morris
Technical Representative

ALPHA ANALYTICAL
NARRATIVE REPORT

Laboratory Job Number: L0817319

The samples were received in accordance with the chain of custody and no significant deviations were encountered during preparation or analysis unless otherwise noted below.

Chloride

L0817319-02, -03, -04 and -06 have elevated detection limits due to the 10x dilutions required to quantitate the results within the calibration range.

The WG345128-4 Laboratory Duplicate RPD associated with L0817319-01 is above the acceptance criteria (13%); however, the sample and duplicate results are less than five times the reporting limit. Therefore, the RPD is valid.

ALPHA ANALYTICAL
CERTIFICATE OF ANALYSIS

MA:M-MA086 NH:2003 CT:PH-0574 ME:MA0086 RI:LA000065 NY:11148 NJ:MA935 Army:USACE

Laboratory Sample Number: L0817319-01
MAC-1A/01B
Sample Matrix: WATER

Date Collected: 21-NOV-2008 08:30
Date Received : 21-NOV-2008
Date Reported : 25-NOV-2008

Condition of Sample: Satisfactory

Field Prep: None

Number & Type of Containers: 2-Plastic

PARAMETER	RESULT	UNITS	RDL	REF	METHOD	DATE PREP	DATE ANAL	ID
Chloride	1.6	mg/l	1.0	1	9251		1125 12:33	ED
pH	6.0	SU	-	1	9040B		1121 21:15	JO
Chromium, Hexavalent	ND	mg/l	0.010	30	3500CR-D	1121 20:30	1121 20:30	JT
Total Metals								
Antimony, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:24	AI
Arsenic, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:24	AI
Cadmium, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:24	AI
Chromium, Total	ND	mg/l	0.01	1	6010B	1122 13:00	1124 14:24	AI
Copper, Total	0.040	mg/l	0.010	1	6010B	1122 13:00	1124 14:24	AI
Iron, Total	0.09	mg/l	0.05	1	6010B	1122 13:00	1124 14:24	AI
Mercury, Total	ND	mg/l	0.0002	1	7470A	1124 17:00	1125 10:36	DM
Nickel, Total	ND	mg/l	0.025	1	6010B	1122 13:00	1124 14:24	AI
Silver, Total	ND	mg/l	0.007	1	6010B	1122 13:00	1124 14:24	AI
Zinc, Total	0.159	mg/l	0.050	1	6010B	1122 13:00	1124 14:24	AI

Comments: Complete list of References and Glossary of Terms found in Addendum I

ALPHA ANALYTICAL
CERTIFICATE OF ANALYSIS

MA:M-MA086 NH:2003 CT:PH-0574 ME:MA0086 RI:LAO00065 NY:11148 NJ:MA935 Army:USACE

Laboratory Sample Number: L0817319-02
BAK-01A/01B
Sample Matrix: WATER

Condition of Sample: Satisfactory

Number & Type of Containers: 2-Plastic

Date Collected: 21-NOV-2008 08:35
Date Received : 21-NOV-2008
Date Reported : 25-NOV-2008

Field Prep: None

PARAMETER	RESULT	UNITS	RDL	REF	METHOD	DATE PREP	DATE ANAL	ID
Chloride	420	mg/l	10	1	9251		1125 12:48	ED
pH	6.7	SU	-	1	9040B		1121 21:15	JO
Chromium, Hexavalent	ND	mg/l	0.010	30	3500CR-D	1121 20:30	1121 20:30	JT
Total Metals								
Antimony, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:35	AI
Arsenic, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:35	AI
Cadmium, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:35	AI
Chromium, Total	ND	mg/l	0.01	1	6010B	1122 13:00	1124 14:35	AI
Copper, Total	0.039	mg/l	0.010	1	6010B	1122 13:00	1124 14:35	AI
Iron, Total	1.9	mg/l	0.05	1	6010B	1122 13:00	1124 14:35	AI
Mercury, Total	ND	mg/l	0.0002	1	7470A	1124 17:00	1125 10:45	DM
Nickel, Total	ND	mg/l	0.025	1	6010B	1122 13:00	1124 14:35	AI
Silver, Total	ND	mg/l	0.007	1	6010B	1122 13:00	1124 14:35	AI
Zinc, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:35	AI

Comments: Complete list of References and Glossary of Terms found in Addendum I

ALPHA ANALYTICAL
CERTIFICATE OF ANALYSIS

MA:M-MA086 NH:2003 CT:PH-0574 ME:MA0086 RI:LAO00065 NY:11148 NJ:MA935 Army:USACE

Laboratory Sample Number: L0817319-03
BAKL-01A/01B
Sample Matrix: WATER

Condition of Sample: Satisfactory

Number & Type of Containers: 2-Plastic

Date Collected: 21-NOV-2008 09:00
Date Received : 21-NOV-2008
Date Reported : 25-NOV-2008

Field Prep: None

PARAMETER	RESULT	UNITS	RDL	REF	METHOD	DATE PREP	DATE ANAL	ID
Chloride	510	mg/l	10	1	9251		1125 12:49	ED
pH	9.7	SU	-	1	9040B		1121 21:15	JO
Chromium, Hexavalent	ND	mg/l	0.010	30	3500CR-D	1121 20:30	1121 20:30	JT
Total Metals								
Antimony, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:39	AI
Arsenic, Total	0.008	mg/l	0.005	1	6010B	1122 13:00	1124 14:39	AI
Cadmium, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:39	AI
Chromium, Total	ND	mg/l	0.01	1	6010B	1122 13:00	1124 14:39	AI
Copper, Total	0.076	mg/l	0.010	1	6010B	1122 13:00	1124 14:39	AI
Iron, Total	0.15	mg/l	0.05	1	6010B	1122 13:00	1124 14:39	AI
Mercury, Total	ND	mg/l	0.0002	1	7470A	1124 17:00	1125 10:46	DM
Nickel, Total	ND	mg/l	0.025	1	6010B	1122 13:00	1124 14:39	AI
Silver, Total	ND	mg/l	0.007	1	6010B	1122 13:00	1124 14:39	AI
Zinc, Total	0.235	mg/l	0.050	1	6010B	1122 13:00	1124 14:39	AI

Comments: Complete list of References and Glossary of Terms found in Addendum I

ALPHA ANALYTICAL
CERTIFICATE OF ANALYSIS

MA:M-MA086 NH:2003 CT:PH-0574 ME:MA0086 RI:LAO00065 NY:11148 NJ:MA935 Army:USACE

Laboratory Sample Number: L0817319-04
SHAD-01A/01B
Sample Matrix: WATER

Condition of Sample: Satisfactory

Number & Type of Containers: 2-Plastic

Date Collected: 21-NOV-2008 12:46
Date Received : 21-NOV-2008
Date Reported : 25-NOV-2008

Field Prep: None

PARAMETER	RESULT	UNITS	RDL	REF	METHOD	DATE PREP	DATE ANAL	ID
Chloride	560	mg/l	10	1	9251		1125 12:51	ED
pH	6.7	SU	-	1	9040B		1121 21:15	JO
Chromium, Hexavalent	ND	mg/l	0.010	30	3500CR-D	1121 20:30	1121 20:30	JT
Total Metals								
Antimony, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:43	AI
Arsenic, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:43	AI
Cadmium, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:43	AI
Chromium, Total	ND	mg/l	0.01	1	6010B	1122 13:00	1124 14:43	AI
Copper, Total	ND	mg/l	0.010	1	6010B	1122 13:00	1124 14:43	AI
Iron, Total	0.37	mg/l	0.05	1	6010B	1122 13:00	1124 14:43	AI
Mercury, Total	ND	mg/l	0.0002	1	7470A	1124 17:00	1125 10:48	DM
Nickel, Total	ND	mg/l	0.025	1	6010B	1122 13:00	1124 14:43	AI
Silver, Total	ND	mg/l	0.007	1	6010B	1122 13:00	1124 14:43	AI
Zinc, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:43	AI

Comments: Complete list of References and Glossary of Terms found in Addendum I

ALPHA ANALYTICAL
CERTIFICATE OF ANALYSIS

MA:M-MA086 NH:2003 CT:PH-0574 ME:MA0086 RI:LAO00065 NY:11148 NJ:MA935 Army:USACE

Laboratory Sample Number: L0817319-05
Sample Matrix: SPANG-01A/01B WATER
Condition of Sample: Satisfactory
Number & Type of Containers: 2-Plastic

Date Collected: 21-NOV-2008 13:55
Date Received : 21-NOV-2008
Date Reported : 25-NOV-2008
Field Prep: None

PARAMETER	RESULT	UNITS	RDL	REF METHOD	DATE PREP	DATE ANAL	ID
Chloride	72	mg/l	1.0	1 9251		1125 13:09	ED
pH	7.6	SU	-	1 9040B		1121 21:15	JO
Chromium, Hexavalent	ND	mg/l	0.010	30 3500CR-D	1121 20:30	1121 20:30	JT
Total Metals							
Antimony, Total	ND	mg/l	0.050	1 6010B	1122 13:00	1124 14:47	AI
Arsenic, Total	ND	mg/l	0.005	1 6010B	1122 13:00	1124 14:47	AI
Cadmium, Total	ND	mg/l	0.005	1 6010B	1122 13:00	1124 14:47	AI
Chromium, Total	ND	mg/l	0.01	1 6010B	1122 13:00	1124 14:47	AI
Copper, Total	0.015	mg/l	0.010	1 6010B	1122 13:00	1124 14:47	AI
Iron, Total	3.6	mg/l	0.05	1 6010B	1122 13:00	1124 14:47	AI
Mercury, Total	ND	mg/l	0.0002	1 7470A	1124 17:00	1125 10:50	DM
Nickel, Total	ND	mg/l	0.025	1 6010B	1122 13:00	1124 14:47	AI
Silver, Total	ND	mg/l	0.007	1 6010B	1122 13:00	1124 14:47	AI
Zinc, Total	0.188	mg/l	0.050	1 6010B	1122 13:00	1124 14:47	AI

Comments: Complete list of References and Glossary of Terms found in Addendum I

ALPHA ANALYTICAL
CERTIFICATE OF ANALYSIS

MA:M-MA086 NH:2003 CT:PH-0574 ME:MA0086 RI:LAO00065 NY:11148 NJ:MA935 Army:USACE

Laboratory Sample Number: L0817319-06
MCC-01A/01B
Sample Matrix: WATER

Date Collected: 21-NOV-2008 14:15
Date Received : 21-NOV-2008
Date Reported : 25-NOV-2008

Condition of Sample: Satisfactory

Field Prep: None

Number & Type of Containers: 2-Plastic

PARAMETER	RESULT	UNITS	RDL	REF	METHOD	DATE PREP	DATE ANAL	ID
Chloride	130	mg/l	10	1	9251		1125 12:52	ED
pH	6.7	SU	-	1	9040B		1121 21:15	JO
Chromium, Hexavalent	ND	mg/l	0.010	30	3500CR-D	1121 20:30	1121 20:30	JT
Total Metals								
Antimony, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:51	AI
Arsenic, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:51	AI
Cadmium, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:51	AI
Chromium, Total	ND	mg/l	0.01	1	6010B	1122 13:00	1124 14:51	AI
Copper, Total	ND	mg/l	0.010	1	6010B	1122 13:00	1124 14:51	AI
Iron, Total	2.2	mg/l	0.05	1	6010B	1122 13:00	1124 14:51	AI
Mercury, Total	ND	mg/l	0.0002	1	7470A	1124 17:00	1125 10:52	DM
Nickel, Total	ND	mg/l	0.025	1	6010B	1122 13:00	1124 14:51	AI
Silver, Total	ND	mg/l	0.007	1	6010B	1122 13:00	1124 14:51	AI
Zinc, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:51	AI

Comments: Complete list of References and Glossary of Terms found in Addendum I

ALPHA ANALYTICAL
CERTIFICATE OF ANALYSIS

MA:M-MA086 NH:2003 CT:PH-0574 ME:MA0086 RI:LAO00065 NY:11148 NJ:MA935 Army:USACE

Laboratory Sample Number: L0817319-07
Sample Matrix: RIVER 1 WATER

Date Collected: 21-NOV-2008 13:20
Date Received : 21-NOV-2008
Date Reported : 25-NOV-2008

Condition of Sample: Satisfactory

Field Prep: None

Number & Type of Containers: 1-Plastic

PARAMETER	RESULT	UNITS	RDL	REF METHOD	DATE PREP	DATE ANAL	ID
Total Hardness by SM 2340B							
Hardness	63	mg/l	0.66	30 2340B	1122 13:00	1124 15:07	AI

Comments: Complete list of References and Glossary of Terms found in Addendum I

ALPHA ANALYTICAL
QUALITY ASSURANCE BATCH DUPLICATE ANALYSIS

Laboratory Job Number: L0817319

Parameter	Value 1	Value 2	Units	RPD	RPD Limits
Chloride for sample(s) 01-06 (L0817319-01, WG345128-4)					
Chloride	1.6	1.4	mg/l	13	7
Chromium, Hexavalent for sample(s) 01-06 (L0817319-01, WG344818-3)					
Chromium, Hexavalent	ND	ND	mg/l	NC	20
Total Metals for sample(s) 01-06 (L0817319-01, WG344841-3)					
Antimony, Total	ND	ND	mg/l	NC	20
Arsenic, Total	ND	ND	mg/l	NC	20
Cadmium, Total	ND	ND	mg/l	NC	20
Chromium, Total	ND	ND	mg/l	NC	20
Copper, Total	0.040	0.041	mg/l	3	20
Iron, Total	0.09	0.09	mg/l	2	20
Nickel, Total	ND	ND	mg/l	NC	20
Silver, Total	ND	ND	mg/l	NC	20
Zinc, Total	0.159	0.159	mg/l	0	20
Total Hardness by SM 2340B for sample(s) 07 (L0816236-72, WG345178-3)					
Hardness	10	10	mg/l	0	20
Total Metals for sample(s) 01-06 (L0817319-01, WG345009-3)					
Mercury, Total	ND	ND	mg/l	NC	20

ALPHA ANALYTICAL
QUALITY ASSURANCE BATCH SPIKE ANALYSES

Laboratory Job Number: L0817319

Parameter	% Recovery	QC Criteria
Chloride LCS for sample(s) 01-06 (WG345128-2)		
Chloride	97	90-110
pH LCS for sample(s) 01-06 (WG344807-1)		
pH	100	99-101
Chromium, Hexavalent LCS for sample(s) 01-06 (WG344818-2)		
Chromium, Hexavalent	102	85-115
Total Metals LCS for sample(s) 01-06 (WG344841-2)		
Antimony, Total	107	80-120
Arsenic, Total	112	80-120
Cadmium, Total	112	80-120
Chromium, Total	100	80-120
Copper, Total	99	80-120
Iron, Total	98	80-120
Nickel, Total	103	80-120
Silver, Total	104	80-120
Zinc, Total	106	80-120
Total Hardness by SM 2340B LCS for sample(s) 07 (WG345178-2)		
Hardness	98	80-120
Total Metals LCS for sample(s) 01-06 (WG345009-2)		
Mercury, Total	98	80-120
Chloride SPIKE for sample(s) 01-06 (L0817319-01, WG345128-3)		
Chloride	92	58-140
Chromium, Hexavalent SPIKE for sample(s) 01-06 (L0817319-01, WG344818-4)		
Chromium, Hexavalent	104	85-115
Total Metals SPIKE for sample(s) 01-06 (L0817319-01, WG344841-4)		
Antimony, Total	109	75-125
Arsenic, Total	113	75-125
Cadmium, Total	114	75-125
Chromium, Total	100	75-125
Copper, Total	100	75-125
Iron, Total	102	75-125
Nickel, Total	105	75-125
Silver, Total	103	75-125
Zinc, Total	108	75-125
Total Hardness by SM 2340B SPIKE for sample(s) 07 (L0816236-72, WG345178-4)		
Hardness	100	75-125

ALPHA ANALYTICAL
QUALITY ASSURANCE BATCH SPIKE ANALYSES

Laboratory Job Number: L0817319

Continued

Parameter	% Recovery	QC Criteria
Total Metals SPIKE for sample(s) 01-06 (L0817319-01, WG345009-4)		
Mercury, Total	114	70-130

ALPHA ANALYTICAL
QUALITY ASSURANCE BATCH BLANK ANALYSIS

Laboratory Job Number: L0817319

PARAMETER	RESULT	UNITS	RDL	REF	METHOD	DATE PREP	DATE ANAL	ID
Blank Analysis for sample(s) 01-06 (WG345128-1)								
Chloride	ND	mg/l	1.0	1	9251		1125 12:30	ED
Blank Analysis for sample(s) 01-06 (WG344818-1)								
Chromium, Hexavalent	ND	mg/l	0.010	30	3500CR-D	1121 20:30	1121 20:30	JT
Blank Analysis for sample(s) 01-06 (WG344841-1)								
Total Metals								
Antimony, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:16	AI
Arsenic, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:16	AI
Cadmium, Total	ND	mg/l	0.005	1	6010B	1122 13:00	1124 14:16	AI
Chromium, Total	ND	mg/l	0.01	1	6010B	1122 13:00	1124 14:16	AI
Copper, Total	ND	mg/l	0.010	1	6010B	1122 13:00	1124 14:16	AI
Iron, Total	ND	mg/l	0.05	1	6010B	1122 13:00	1124 14:16	AI
Nickel, Total	ND	mg/l	0.025	1	6010B	1122 13:00	1124 14:16	AI
Silver, Total	ND	mg/l	0.007	1	6010B	1122 13:00	1124 14:16	AI
Zinc, Total	ND	mg/l	0.050	1	6010B	1122 13:00	1124 14:16	AI
Blank Analysis for sample(s) 07 (WG345178-1)								
Total Hardness by SM 2340B								
Hardness	ND	mg/l	0.66	30	2340B	1122 13:00	1124 14:16	AI
Blank Analysis for sample(s) 01-06 (WG345009-1)								
Total Metals								
Mercury, Total	ND	mg/l	0.0002	1	7470A	1124 17:00	1125 10:25	DM

REFERENCES

1. Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - IIIA, 1997.

30. Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WPCF. 18th Edition. 1992.

GLOSSARY OF TERMS AND SYMBOLS

REF	Reference number in which test method may be found.
METHOD	Method number by which analysis was performed.
ID	Initials of the analyst.
ND	Not detected in comparison to the reported detection limit.
NI	Not Ignitable.
ug/cart	Micrograms per Cartridge.
H	The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.

LIMITATION OF LIABILITIES

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

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

ALPHA ANALYTICAL

CHAIN OF CUSTODY

PAGE OF

Westborough, MA
TEL: 508-898-9220
FAX: 508-898-9193

Mansfield, MA
TEL: 508-822-9300
FAX: 508-822-3288

Client Information

Client: Harvard University - EH&S

Address: 46 Blackstone St.

Cambridge MA, 02139

Phone: 617-496-1359

Fax:

Email: gordon_reynolds@harvard.ed

☐ These samples have been Previously analyzed by Alpha

Project Information

Project Name: HBS - STorm

Project Location: HBS

Project #:

Project Manager:

ALPHA Quote #:

Turn-Around Time

☐ Standard ☒ Rush (ONLY IF PRE-APPROVED)

Due Date: 11/25/08 Time:

Date Rec'd in Lab: 11/21/08

ALPHA Job #: L0817319

Report Information Data Deliverables

☐ FAX ☒ EMAIL

☒ ADEx ☐ Add'l Deliverables

Billing Information

☐ Same as Client info PO #:

GORDON REYNOLDS

Regulatory Requirements/Report Limits

State/Fed Program | Criteria

MCP PRESUMPTIVE CERTAINTY-CT REASONABLE CONFIDENCE PROTOCO

☐ Yes ☐ No Are MCP Analytical Methods Required?

☐ Yes ☐ No Are CT RCP (Reasonable Confidence Protocols) Required?

Other Project Specific Requirements/Comments/Detection Limits:

ANALYSIS

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection Date	Collection Time	Sample Matrix	Sampler's Initials	pH, Cloride, Chrom 6	Sb, Ar, Cd, Cr, Cu, Fe, Hg Ni, Ag, Zn	Sample Specific Comments
17319-01	Mac - 1A	11/21/08	8:30 AM	GW	MK	☒	☐	
	Mac - 1B	11/21/08	8:30 AM	GW	MK	☐	☒	
-02	Bak - 01A	11/21/08	8:35 AM	GW	MK	☒	☐	
	Bak - 01B	11/21/08	8:35 AM	GW	MK	☐	☒	
-03	Bakl - 01A	11/21/08	9:00 AM	GW	MK	☒	☐	
	Bakl - 01B	11/21/08	9:00 AM	GW	MK	☐	☒	
-04	Shad - 01A	11/21/08	12:46 PM	GW	MK	☒	☐	
	Shad - 01B	11/21/08	12:46 PM	GW	MK	☐	☒	
-05	Spang - 01A	11/21/08	1:55 PM	GW	MK	☒	☐	
	Spang - 01B	11/21/08	1:55 PM	GW	MK	☐	☒	

Container Type: - - - - - - - - - - - -

Preservative: - - - - - - - - - - - -

SAMPLE HANDLING

Filtration
☐ Done
☐ Not Needed
☐ Lab to do

Preservation
☐ Lab to do

(Please specify below)

PLEASE ANSWER QUESTIONS ABOVE!

IS YOUR PROJECT MA MCP or CT RCP?

Relinquished By:	Date/Time	Received By:	Date/Time
[signature]	11/21/08 3:10 pm	[signature]	11/21/08 3:10
[signature]	11/21/08 4:11	[signature]	11/21/08 16:11

Please print clearly, legibly and completely. Samples not be logged in and turnaround time clock will start until any ambiguities resolved. All samples submitted are subject to Alpha's Payment Terms.

FORM NO: 01-01(I) (rev. 30-JUL-07)

CHAIN OF CUSTODY

PAGE OF

ALPHA ANALYTICAL

Westborough, MA TEL: 508-898-9220 FAX: 508-898-9193
Mansfield, MA TEL: 508-822-9300 FAX: 508-822-3288

Date Rec'd in Lab: 11/21/08

ALPHA Job #: L0817319

Client Information

Client: Harvard University - EH&S
Address: 46 Blackstone St.
Cambridge MA, 02139
Phone: 617-496-1359
Fax:
Email: gordon_reynolds@harvard.ed

☐ These samples have been Previously analyzed by Alpha

Project Information

Project Name: HBS - STorm
Project Location: HBS
Project #:
Project Manager:
ALPHA Quote #:

Turn-Around Time

☐ Standard ☒ Rush (ONLY IF PRE-APPROVED)

Due Date: 11/25/08 Time:

Report Information Data Deliverables

☐ FAX ☒ EMAIL
☒ ADEx ☐ Add'l Deliverables

Billing Information

☐ Same as Client info PO #:
Gordon Reynolds

Regulatory Requirements/Report Limits

State/Fed Program Criteria

MCP PRESUMPTIVE CERTAINTY-CT REASONABLE CONFIDENCE PROTOCO

☐ Yes ☐ No Are MCP Analytical Methods Required?
☐ Yes ☐ No Are CT RCP (Reasonable Confidence Protocols) Required?

Other Project Specific Requirements/Comments/Detection Limits:

ANALYSIS

SAMPLE HANDLING
Filtration
☐ Done
☐ Not Needed
☐ Lab to do
Preservation
☐ Lab to do
(Please specify below)

ALPHA Lab ID (Lab Use Only)	Sample ID	Collection Date	Collection Time	Sample Matrix	Sampler's Initials	pH, Cloride, Chrom 6	Sb, Ar, Cd, Cr, Cu, Fe, Hg Ni, Ag, Zn	Total Hardness	Sample Specific Comments
17319-06	McC - 01A	11/21/08	2:15 PM	GW	MK	☒	☐	☐	
	McC - 01B	11/21/08	2:15 PM	GW	MK	☐	☒	☐	
-07	River 1	11/21/08	1:20 PM	GW	MK	☐	☐	☒	

Container Type
Preservative

PLEASE ANSWER QUESTIONS ABOVE!

IS YOUR PROJECT MA MCP *or* CT RCP?

Relinquished By:	Date/Time	Received By:	Date/Time
	11/21/08 3:10 pm		11/21/08 5:10p
4911 11/21/08	4:11		11/21/08 16:11

Please print clearly, legib and completely. Sample not be logged in and turnaround time clock will start until any ambiguities resolved. All samples submitted are subject to Alpha's Payment Terms.

FORMNO: 01-01(I) (rev. 30-JUL-07)

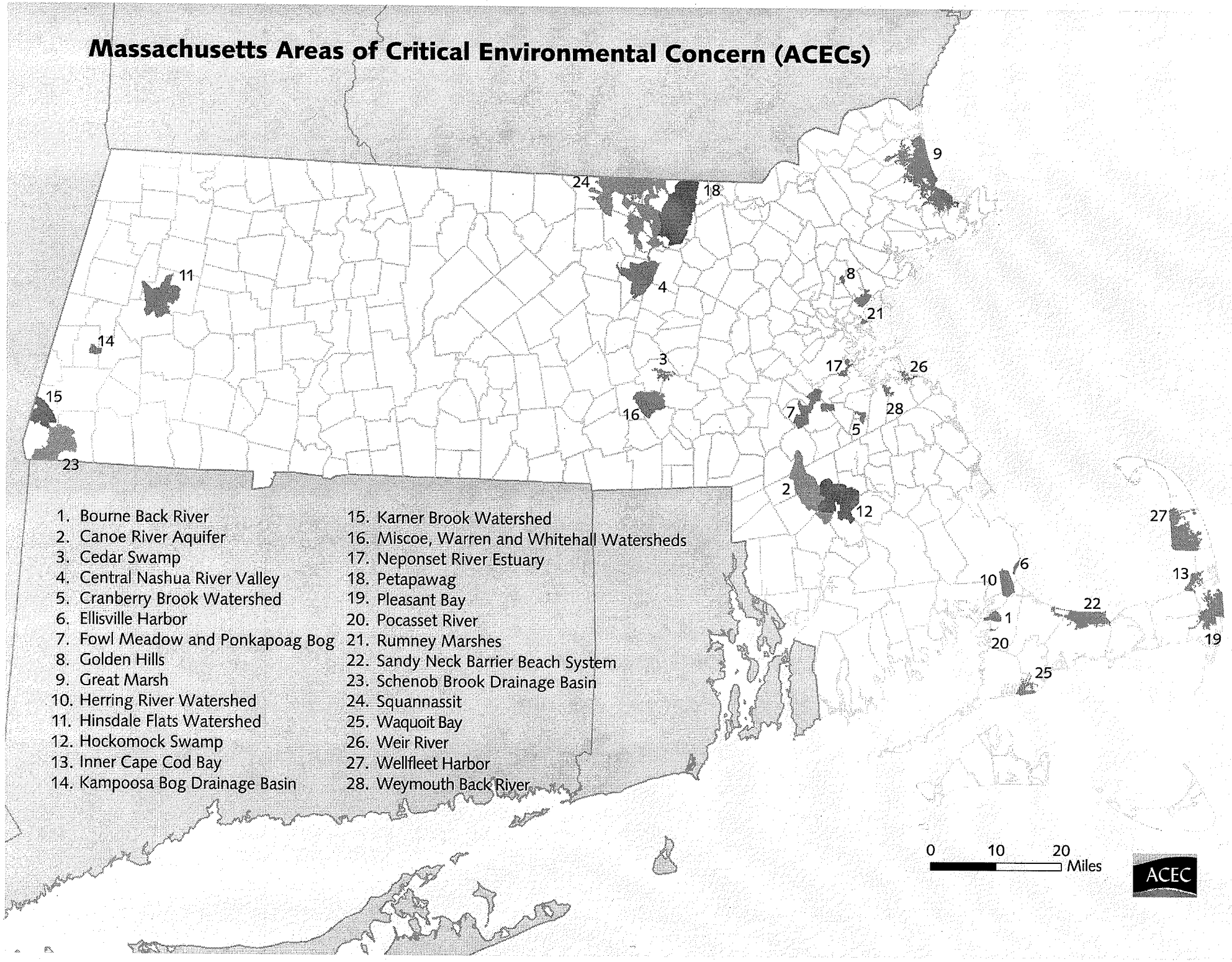
Attachment 3

Areas of Critical Environmental Concern

Attachment 3

Based on the most recent listing of Areas of Critical Environmental Concern (ACEC) provided by the Massachusetts Department of Conservation and Recreation, included herein, there are no ACECs in the vicinity of the project.

Massachusetts Areas of Critical Environmental Concern (ACECs)



MASSACHUSETTS AREAS OF CRITICAL ENVIRONMENTAL CONCERN
September 2008

Total Approximate Acreage: 255,275 acres
Approximate acreage and designation date follow ACEC names below.

Bourne Back River
(1,850 acres, 1989) Bourne

Canoe River Aquifer and Associated Areas
(17,200 acres, 1991) Easton, Foxborough, Mansfield, Norton, Sharon, and Taunton

Central Nashua River Valley
(12,900 acres,1996) Bolton, Harvard, Lancaster, and Leominster

Cranberry Brook Watershed
(1,050 acres, 1983) Braintree and Holbrook

Ellisville Harbor
(600 acres, 1980) Plymouth

Fowl Meadow and Ponkapoag Bog
(8,350 acres, 1992) Boston, Canton, Dedham, Milton, Norwood, Randolph, Sharon, and Westwood

Golden Hills
(500 acres, 1987) Melrose, Saugus, and Wakefield

Herring River Watershed
(4,450 acres, 1991) Bourne and Plymouth

Hinsdale Flats Watershed
(14,500 acres, 1992) Dalton, Hinsdale, Peru, and Washington

Hockomock Swamp
(16,950 acres, 1990) Bridgewater, Easton, Norton, Raynham, Taunton, and West Bridgewater

Inner Cape Cod Bay
(2,550 acres, 1985) Brewster, Eastham, and Orleans

Kampoosa Bog Drainage Basin
(1,350 acres, 1995) Lee and Stockbridge

Karner Brook Watershed
(7,000 acres, 1992) Egremont and Mount Washington

Miscoe-Warren-Whitehall Watersheds
(8,700 acres, 2000) Grafton, Hopkinton, and Upton

Neponset River Estuary
(1,300 acres, 1995) Boston, Milton, and Quincy

Parker River/Essex Bay
(25,500 acres, 1979) Essex, Gloucester, Ipswich, Newbury, and Rowley

Petapawag
(25,630 acres, 2002) Ayer, Dunstable, Groton, Pepperell, Tyngsborough

Pleasant Bay
(9,050 acres, 1987) Brewster, Chatham, Harwich, and Orleans

Pocasset River
(150 acres, 1980) Bourne

Rumney Marshes
(2,800 acres, 1988) Boston, Lynn, Revere, Saugus, and Winthrop

Sandy Neck/Barnstable Harbor
(8,850 acres, 1978) Barnstable and Sandwich

Schenob Brook Drainage Basin
(13,750 acres, 1990) Mount Washington and Sheffield

Squannassit
(37,450 acres, 2002) Ashby, Ayer, Groton, Harvard, Lancaster, Lunenburg, Pepperell, Shirley, Townsend

Three Mile River Watershed
(14,275 acres, 2008) Dighton, Norton, Taunton

Waquoit Bay
(2,550 acres, 1979) Falmouth and Mashpee

Weir River
(950 acres, 1986) Cohasset, Hingham, and Hull

Wellfleet Harbor
(12,350 acres, 1989) Eastham, Truro, and Wellfleet

Westborough Cedar Swamp
(1,650 acres, 1975) Hopkinton and Westborough

Weymouth Back River
(950 acres, 1982) Hingham and Weymouth

Towns with ACECs within their Boundaries — September 2008

TOWN	ACEC
Ashby	Squannassit
Ayer	Petapawag
	Squannassit
Barnstable	Sandy Neck/Barnstable Harbor
Bolton	Central Nashua River Valley
Boston	Rumney Marshes
	Fowl Meadow and Ponkapoag Bog
	Neponset River Estuary
Bourne	Pocasset River
	Bourne Back River
	Herring River Watershed
Braintree	Cranberry Brook Watershed
Brewster	Pleasant Bay
	Inner Cape Cod Bay
Bridgewater	Hockomock Swamp
Canton	Fowl Meadow and Ponkapoag Bog
Chatham	Pleasant Bay
Cohasset	Weir River
Dalton	Hinsdale Flats Watershed
Dedham	Fowl Meadow and Ponkapoag Bog
Dighton	Three Mile River Watershed
Dunstable	Petapawag
Eastham	Inner Cape Cod Bay
	Wellfleet Harbor
Easton	Canoe River Aquifer
	Hockomock Swamp
Egremont	Karner Brook Watershed
Essex	Parker River/Essex Bay
Falmouth	Waquoit Bay
Foxborough	Canoe River Aquifer
Gloucester	Parker River/Essex Bay
Grafton	Miscoe-Warren-Whitehall Watersheds
Groton	Petapawag
	Squannassit
Harvard	Central Nashua River Valley
	Squannassit
Harwich	Pleasant Bay
Hingham	Weir River
	Weymouth Back River
Hinsdale	Hinsdale Flats Watershed
Holbrook	Cranberry Brook Watershed
Hopkinton	Miscoe-Warren-Whitehall Watersheds
	Westborough Cedar Swamp
Hull	Weir River
Ipswich	Parker River/Essex Bay
Lancaster	Central Nashua River Valley
	Squannassit
Lee	Kampoosa Bog Drainage Basin
Leominster	Central Nashua River Valley
Lunenburg	Squannassit
Lynn	Rumney Marshes
Mansfield	Canoe River Aquifer
Mashpee	Waquoit Bay
Melrose	Golden Hills
Milton	Fowl Meadow and Ponkapoag Bog
	Neponset River Estuary
Mt Washington	Karner Brook Watershed
	Schenob Brook
Newbury	Parker River/Essex Bay

TOWN	ACEC
Norton	Hockomock Swamp
	Canoe River Aquifer
	Three Mile River Watershed
Norwood	Fowl Meadow and Ponkapoag Bog
Orleans	Inner Cape Cod Bay
	Pleasant Bay
Pepperell	Petapawag
	Squannassit
Peru	Hinsdale Flats Watershed
Plymouth	Herring River Watershed
	Ellisville Harbor
Quincy	Neponset River Estuary
Randolph	Fowl Meadow and Ponkapoag Bog
Raynham	Hockomock Swamp
Revere	Rumney Marshes
Rowley	Parker River/Essex Bay
Sandwich	Sandy Neck/Barnstable Harbor
Saugus	Rumney Marshes
	Golden Hills
Sharon	Canoe River Aquifer
	Fowl Meadow and Ponkapoag Bog
Sheffield	Schenob Brook
Shirley	Squannassit
Stockbridge	Kampoosa Bog Drainage Basin
Taunton	Hockomock Swamp
	Canoe River Aquifer
	Three Mile River Watershed
Truro	Wellfleet Harbor
Townsend	Squannassit
Tyngsborough	Petapawag
Upton	Miscoe-Warren-Whitehall Watersheds
Wakefield	Golden Hills
Washington	Hinsdale Flats Watershed
Wellfleet	Wellfleet Harbor
W Bridgewater	Hockomock Swamp
Westborough	Westborough Cedar Swamp
Westwood	Fowl Meadow and Ponkapoag Bog
Weymouth	Weymouth Back River
Winthrop	Rumney Marshes

Attachment 4
Remediation Activities

Attachment 4

Remediation Activities

There have been 3 releases that have been reported to the State, as documented from the copies of the State records, attached. These have included 2 sites, McCulloch Hall, (Site # 3-0011406) which occurred in 1994 from an UST and the State issued an Oral Approval of the Plan on 8/2/1994; and a release of petroleum products from an UST reported in 1994 from 70 North Harvard Street (Site 3-0011407), again closed out by an Oral Approval of the Plan issued on 8/2/1994.

In addition, a URAM was filed based on utility work in the vicinity of the project (Site # 3-0022013) based on the presence of some petroleum hydrocarbons.

There are other reports of releases that have occurred in this area, including the site at Harvard's First Science Complex (Site # 3-0026946), where a Completion Statement has been filed on 7/18/2008.

A site map showing the locations of the three sites is also attached.

Site Information

Site Number:	**3-0011406**	Category:	72 HR
Site Name:	MCCULLOCH HALL	Release Type:	RAO
Address:	44 HARVARD WAY	Current date:	12/7/1994
Town:	ALLSTON	Phase:	
Zipcode:	02134	RAO class:	A2
Official notification date:	8/2/1994	Location type:	SCHOOL
Initial status date:	8/2/1995	Source:	UST

Response Action Information

Response Action Type:	RAO - Response Action Outcome - RAO
Status:	RAORCD - RAO Statement Received
Submittal Date:	**12/7/1994**
RAO class:	A2
Activity & Use Limitation:	NONE

Response Action Information

Response Action Type:	RNF - Release Notification Form Received
Status:	REPORT - Reportable Release or Threat of Release
Submittal Date:	**11/3/1994**
RAO class:	
Activity & Use Limitation:	

Response Action Information

Response Action Type:	REL - Potential Release or Threat of Release
Status:	REPORT - Reportable Release or Threat of Release
Submittal Date:	**8/2/1994**
RAO class:	
Activity & Use Limitation:	

Response Action Information

Response Action Type:	IRA - Immediate Response Action
Status:	APORAL - Oral Approval of Plan or Action
Submittal Date:	**8/2/1994**
RAO class:	
Activity & Use Limitation:	

Chemicals

Chemical	Amount	Units
TOTAL PETROLEUM HYDROCARBONS (TPH)	132	PPM
DIESEL FUEL	132	PPMV

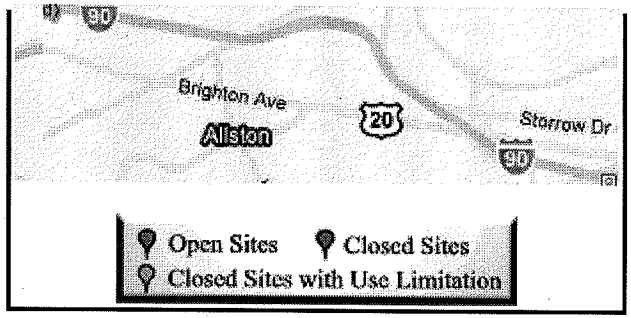
LSPs

LSP#	Name
6088	EZOVSKI, GARY S

RAO Detail

Class	Method	GW Category	Soil Category
A2	1	2	3

Location


90
Brighton Ave
Allston
20
Storrow Dr
90
Open Sites
Closed Sites
Closed Sites with Use Limitation

Site Information

Site Number:	**3-0011407**	Category:	72 HR
Site Name:	NO LOCATION AID	Release Type:	RAO
Address:	70 NORTH HARVARD ST	Current date:	12/7/1994
Town:	ALLSTON	Phase:	
Zipcode:	02134	RAO class:	A2
Official notification date:	8/2/1994	Location type:	SCHOOL
Initial status date:	8/2/1995	Source:	UST

Response Action Information

Response Action Type:	RAO - Response Action Outcome - RAO
Status:	RAORCD - RAO Statement Received
Submittal Date:	**12/7/1994**
RAO class:	A2
Activity & Use Limitation:	NONE

Response Action Information

Response Action Type:	RNF - Release Notification Form Received
Status:	REPORT - Reportable Release or Threat of Release
Submittal Date:	**10/11/1994**
RAO class:	
Activity & Use Limitation:	

Response Action Information

Response Action Type:	IRA - Immediate Response Action
Status:	APORAL - Oral Approval of Plan or Action
Submittal Date:	**8/2/1994**
RAO class:	
Activity & Use Limitation:	

Response Action Information

Response Action Type:	REL - Potential Release or Threat of Release
Status:	REPORT - Reportable Release or Threat of Release
Submittal Date:	**8/2/1994**
RAO class:	
Activity & Use Limitation:	

Chemicals

Chemical	Amount	Units
DIESEL FUEL	209	PPMV
TOTAL PETROLEUM HYDROCARBONS (TPH)	206	PPM

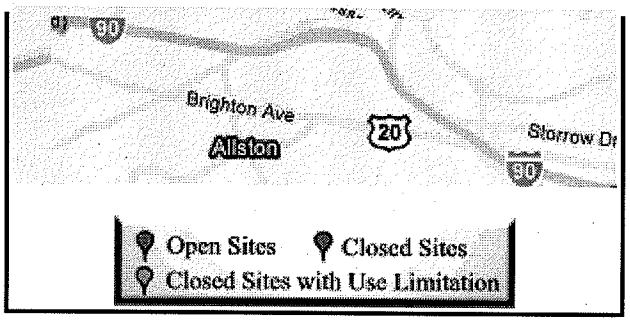
LSPs

LSP#	Name
6088	EZOVSKI, GARY S

RAO Detail

Class	Method	GW Category	Soil Category
A2	1	2	3

Location


90
Brighton Ave
Allston
20
Storrow Dr
90
Open Sites
Closed Sites
Closed Sites with Use Limitation

Site Information

Site Number:	**3-0022013**	Category:	120 DY
Site Name:	UTILITY CONNECTION	Release Type:	URAM
Address:	109 WESTERN AVE	Current date:	8/14/2002
Town:	ALLSTON	Phase:	
Zipcode:	02134-0000	RAO class:	
Official notification date:	8/9/2002	Location type:	ROADWAY
Initial status date:	8/9/2003	Source:	UNKNOWN, URBAN FILL

Response Action Information

Response Action Type:	URAM - Utility-related Abatement Measure
Status:	CSRCVD - Completion Statement Received
Submittal Date:	**12/6/2002**
RAO class:	
Activity & Use Limitation:	

Response Action Information

Response Action Type:	REL - Potential Release or Threat of Release
Status:	REPORT - Reportable Release or Threat of Release
Submittal Date:	**8/19/2002**
RAO class:	
Activity & Use Limitation:	

Response Action Information

Response Action Type:	REL - Potential Release or Threat of Release
Status:	REPORT - Reportable Release or Threat of Release
Submittal Date:	**8/9/2002**
RAO class:	
Activity & Use Limitation:	

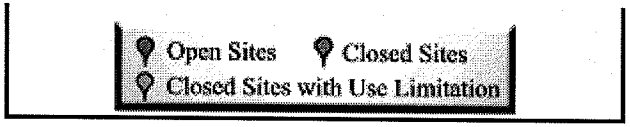
Chemicals

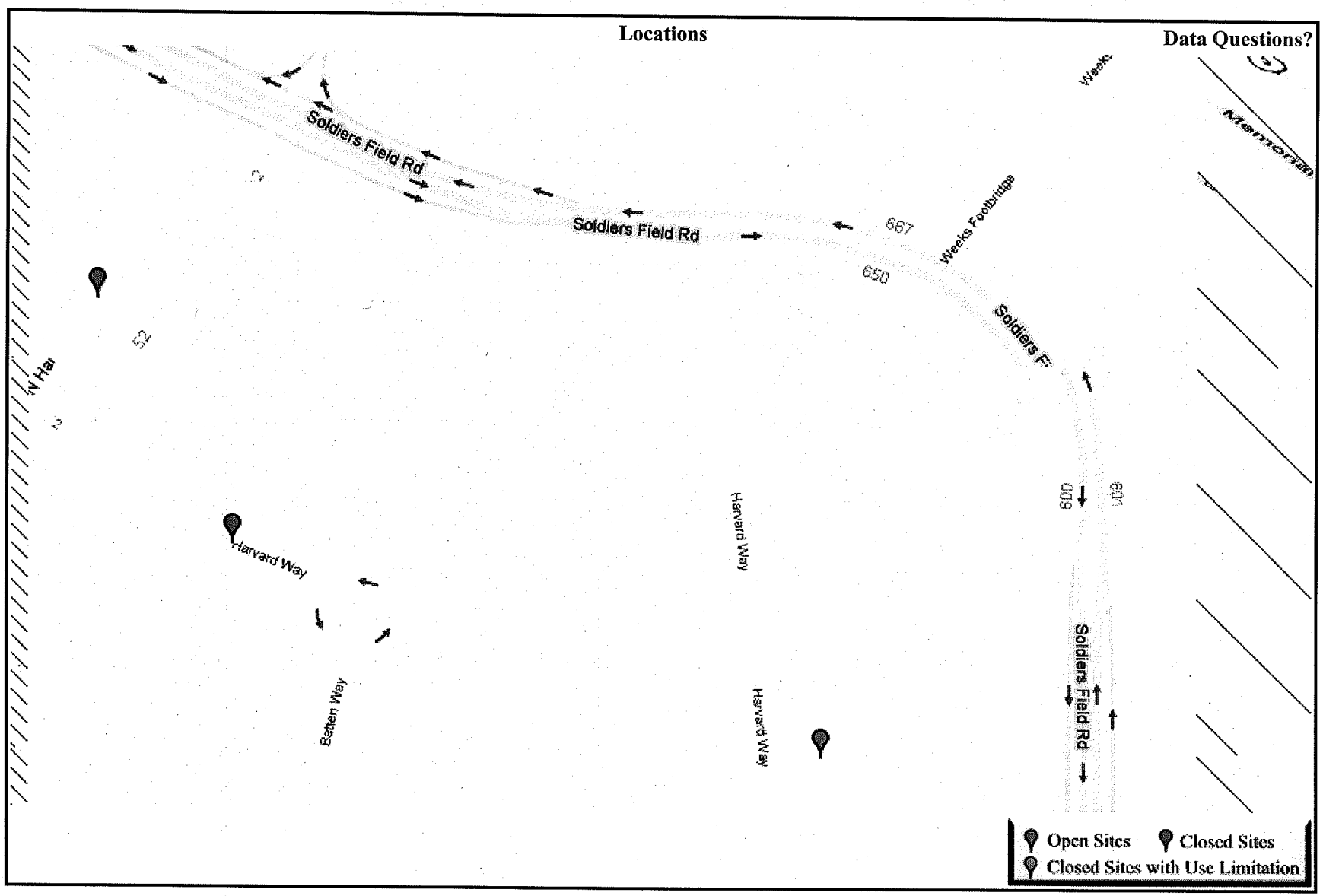
Chemical	Amount	Units
TOTAL PETROLEUM HYDROCARBONS (TPH)	630	MG/KG

LSPs

LSP#	Name
9290	GEVALT, DEBORAH H

Location


Open Sites
Closed Sites
Closed Sites with Use Limitation


Locations
Data Questions?
Soldiers Field Rd
Soldiers Field Rd
667
650
Weeks Footbridge
Weeks
Memorial
Harvard Way
Harvard Way
Harvard Way
Batten Way
Soldiers Field Rd
609
601
Open Sites
Closed Sites
Closed Sites with Use Limitation

Attachment 5
Endangered Species; Designated Critical Habitat

Attachment 5

Endangered Species Act

Based on a review of the data available to us through the US Fish and Wildlife, there are no Federally listed Endangered and Threatened Species present on the site. The latest list, dated July 31, 2008, is attached.

Furthermore, a review of the Massachusetts Priority Habitat and Estimated Habitat Natural Heritage and Endangered Species Program, there are no NHESP Priority Habitats in the location of the project. A copy of the map showing the location is attached.

As such, we meet the Eligibility Criteria Level A for this site.

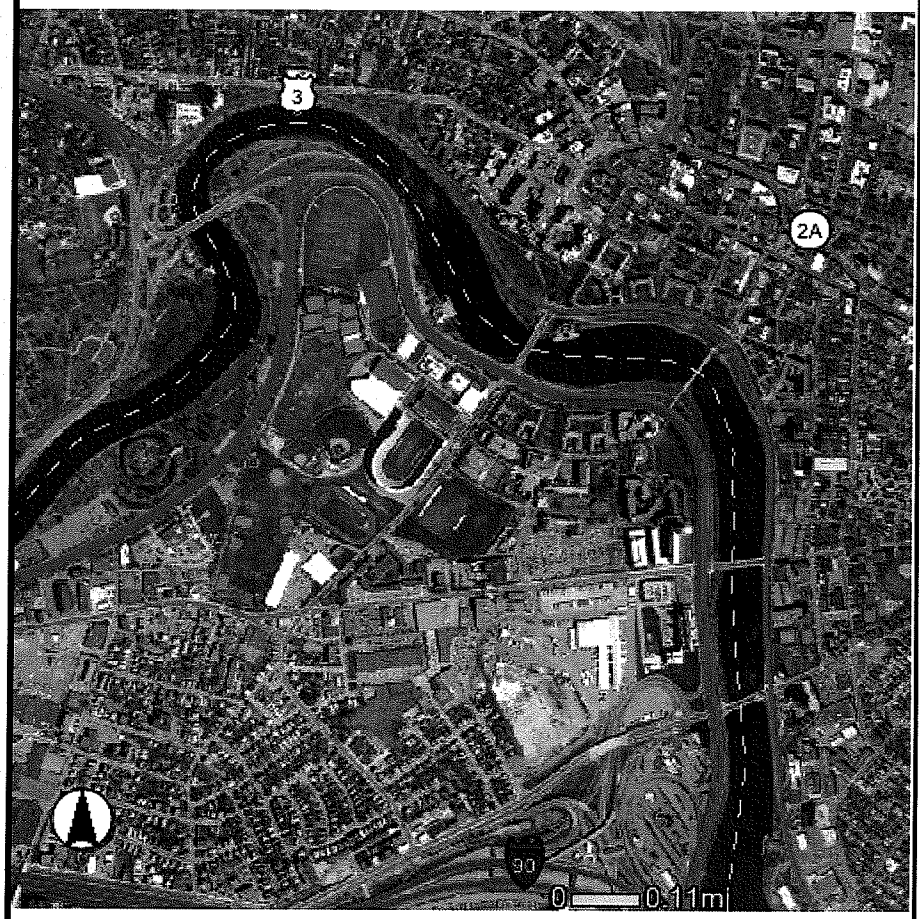
FEDERALLY LISTED ENDANGERED AND THREATENED SPECIES IN MASSACHUSETTS

COUNTY	SPECIES	FEDERAL STATUS	GENERAL LOCATION/HABITAT	TOWNS
Barnstable	Piping Plover	Threatened	Coastal Beaches	All Towns
	Roseate Tern	Endangered	Coastal beaches and the Atlantic Ocean	All Towns
	Northeastern beach tiger beetle	Threatened	Coastal Beaches	Chatham
	Sandplain gerardia	Endangered	Open areas with sandy soils.	Sandwich and Falmouth.
	Northern Red-bellied cooter	Endangered	Inland Ponds and Rivers	Bourne (north of the Cape Cod Canal)
Berkshire	Bog Turtle	Threatened	Wetlands	Egremont and Sheffield
Bristol	Piping Plover	Threatened	Coastal Beaches	Fairhaven, Dartmouth, Westport
	Roseate Tern	Endangered	Coastal beaches and the Atlantic Ocean	Fairhaven, New Bedford, Dartmouth, Westport
	Northern Red-bellied cooter	Endangered	Inland Ponds and Rivers	Raynham and Taunton
Dukes	Roseate Tern	Endangered	Coastal beaches and the Atlantic Ocean	All Towns
	Piping Plover	Threatened	Coastal Beaches	All Towns
	Northeastern beach tiger beetle	Threatened	Coastal Beaches	Aquinnah and Chilmark
	Sandplain gerardia	Endangered	Open areas with sandy soils.	West Tisbury
Essex	Small whorled Pogonia	Threatened	Forests with somewhat poorly drained soils and/or a seasonally high water table	Gloucester, Essex and Manchester
	Piping Plover	Threatened	Coastal Beaches	Glocester, Essex, Ipswich, Rowley, Revere, Newbury, Newburyport and Salisbury
Franklin	Northeastern bulrush	Endangered	Wetlands	Montague
	Dwarf wedgemussel	Endangered	Mill River	Whately
Hampshire	Small whorled Pogonia	Threatened	Forests with somewhat poorly drained soils and/or a seasonally high water table	Hadley
	Puritan tiger beetle	Threatened	Sandy beaches along the Connecticut River	Northampton and Hadley
	Dwarf wedgemussel	Endangered	Rivers and Streams.	Hadley, Hatfield, Amherst and Northampton
Hampden	Small whorled Pogonia	Threatened	Forests with somewhat poorly drained soils and/or a seasonally high water table	Southwick
Middlesex	Small whorled Pogonia	Threatened	Forests with somewhat poorly drained soils and/or a seasonally high water table	Groton
Nantucket	Piping Plover	Threatened	Coastal Beaches	Nantucket
	Roseate Tern	Endangered	Coastal beaches and the Atlantic Ocean	Nantucket
	American burying beetle	Endangered	Upland grassy meadows	Nantucket
Plymouth	Piping Plover	Threatened	Coastal Beaches	Scituate, Marshfield, Duxbury, Plymouth, Wareham and Mattapoisett
	Northern Red-bellied cooter	Endangered	Inland Ponds and Rivers	Kingston, Middleborough, Carver, Plymouth, Bourne, and Wareham
	Roseate Tern	Endangered	Coastal beaches and the Atlantic Ocean	Plymouth, Marion, Wareham, and Mattapoisett.
Suffolk	Piping Plover	Threatened	Coastal Beaches	Winthrop
Worcester	Small whorled Pogonia	Threatened	Forests with somewhat poorly drained soils and/or a seasonally high water table	Leominster

-Eastern cougar and gray wolf are considered extirpated in Massachusetts.
-Endangered gray wolves are not known to be present in Massachusetts, but dispersing individuals from source populations in Canada may occur statewide.
-Critical habitat for the Northern Red-bellied cooter is present in Plymouth County.

7/31/2008

2008 Priority Habitat and Estimated Habitat Natural Heritage & Endangered Species Program



Legend

EOT-OTP Roads

Limited Access Highway

Multi-lane Hwy, Not Limited Access

Other Numbered Hwy

Surrounding States Labels

Surrounding States

NHESP 2008 Priority Habitats of Rare Species and also Estimated Habitats of Rare Wildlife

NHESP 2008 MA Priority Habitats of Rare Species

Color Orthos 2005

Attachment 6
National Historic Preservation Act

Attachment 6

National Historic and Preservation Act

As provided below, there are several locations in the vicinity of the project listed in the State and National Registers of Historic Places and/or included in the Inventory of Historic and Archaeological Assets of the Commonwealth. Properties listed in the State and National Registers of Historic Places and properties included in the *Inventory* within or in the vicinity of the project area are listed below. Of the 32 properties listed below, only the Charles River Basin Historic District; Harvard Stadium and the Harvard Business School are in the immediate vicinity of the project. Since the project is already in place, and the project is designed to assist the Business School with proper property management, we believe there is no impact to these places.

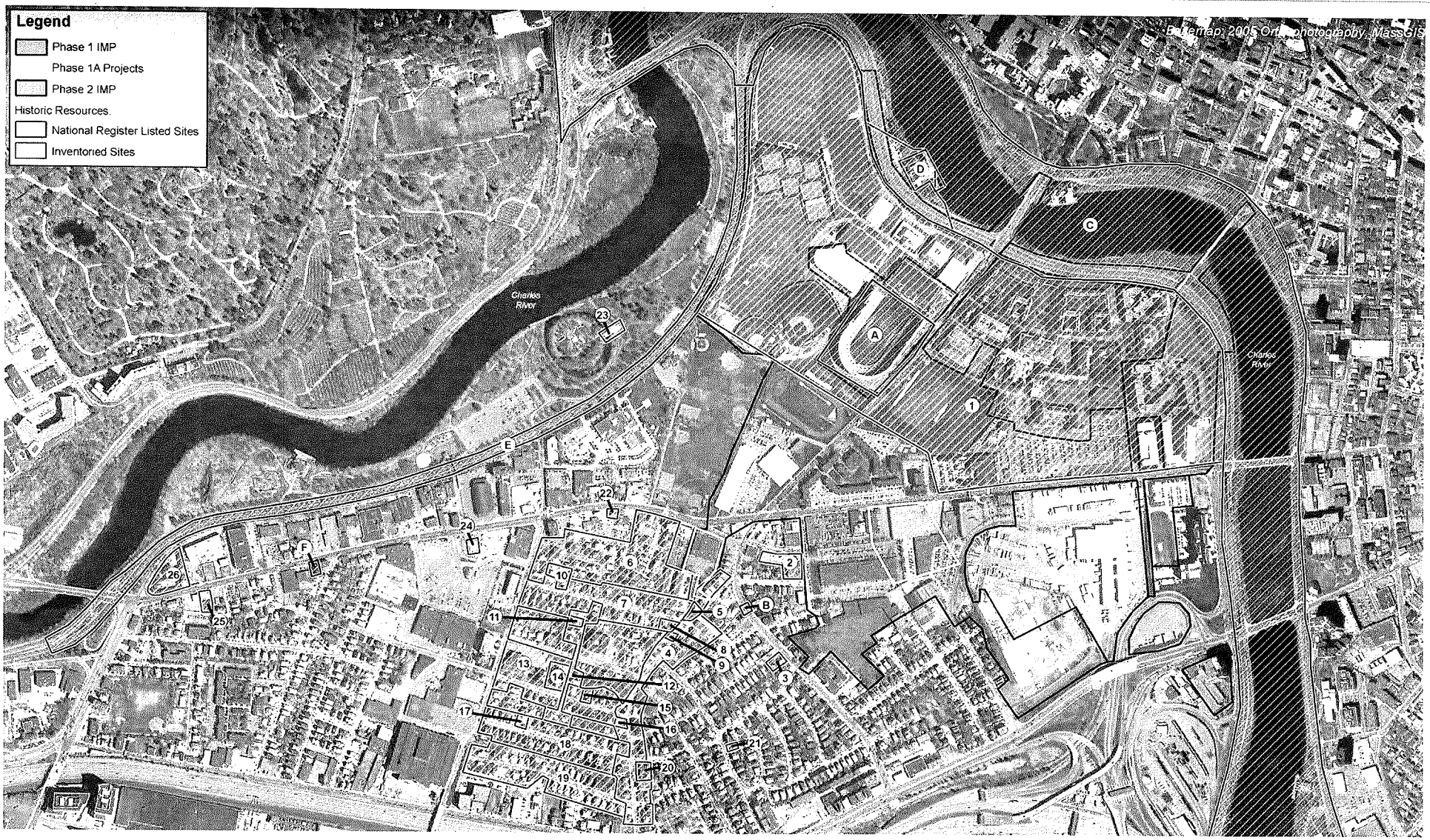
Properties Listed in the State and National Registers of Historic Places[1]

A Harvard Stadium 79 North Harvard Street
B 1767 Milestone 240 North Harvard Street
C Charles River Basin Historic District - Eliot Bridge to Charles River Dam including parkland and parkways in Boston and Cambridge
D Newell Boat House 801-805 Soldiers Field Road
E Charles River Reservation –Soldiers Field Road
F Engine Company 34 444 Western Avenue

Properties Included in the Inventory of Historic and Archaeological Assets of the Commonwealth

1 Harvard Business School - Athletic Facilities Area Soldiers Field Road, North Harvard Street
2 David L. Barrett School 25 Travis Street
3 Hill Memorial Baptist Church 279 North Harvard Street
4 Franklin Street Area 51-143 and 56-168 Franklin Street
5 John Mead Row Houses 150-168 Franklin Street and 86-98 Raymond Street
6 St. Anthony's Area Bounded by Western Avenue, Everett, Adamson, and Franklin Streets
7 Raymond Street Area 1-45 and 18-98 Raymond Street
8 Patrick McDermott House 43-45 Raymond Street
9 Moses Tucker House 134 Franklin Street
10 Westford/Raymond Street Area 4,8, 10, 3, 7, 9 Westford Street and 9 Raymond Street
11 SB Cushing House 15-17 Athol Street
12 Athol Street Area 9-71 and 4-70 Athol Street
13 Holton Street Area 7-59 and 8-60 Holton Street and 205 Everett Street
14 St. Anthony's Church 37 Holton Street
15 Jonathan Davenport House 21 Holton Street
16 John Stinson House 8 Holton Street
17 Jennie Rice House 22-24 Aldie Street
18 Aldie Street Area 2-64 and 1-75 Aldie Street
19 Adamson Street Area 4-80 and 1-87 Adamson Street
20 George Hill Row Houses 73-81 Franklin Street
21 Colonial Revival Two-Family House 57-59 Royal Street
22 Ted's Diner 270 Western Avenue
23 Institute of Contemporary Art 1175 Soldiers Field Road
24 Sewall & Day Cordage Company 342 Western Avenue
25 Stanley Service Inc. 500 Western Avenue
26 Office of the Superintendent of the Speedway 1420-1440 Soldiers Field Road

[1] **The inventory was obtained from the 2007 Harvard University Allston Campus Institutional Master Plan Notification Form**



Source: Epsilon Associates, Inc.

Figure 6-2
Historic Resources