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August 14, 2013

Letter Report

Mr. Kevin Kotelly
U.S. Army Corps of Engineers, New England District
Policy Analysis/Technical Support Branch, Regulatory Division
696 Virginia Road
Concord, MA 01742-2751

143688

Subject: USACOE General Permit #NAE 2008-3065
Spring 2013 Wetland Inspection Report
0 Brook Street, Holliston, MA

Dear Mr. Kotelly,

On behalf of Browning-Ferris Industries, Inc. (BFI), Brown and Caldwell (BC) is submitting this letter report documenting the Spring 2013 Semi-Annual Inspection of the above referenced wetlands in accordance with special condition #52 of the August 2011, Holliston Order of Conditions. This letter report has also been submitted to the Holliston Conservation Commission and the Massachusetts Department of Environmental Protection in Worcester, Massachusetts (Central Region).

Investigation Methodology

On April 24, 2013, BC and Wetland Preservation Inc. (WPI) conducted a site inspection at the above referenced wetlands. Since the majority of shrub vegetation had just begun to leaf out, BC and WPI determined that a second inspection in June was required to fully inspect the vegetation. BC and WPI conducted this site inspection on June 26, 2013. Mr. Charles Katuska of the Holliston Conservation Commission accompanied BC and WPI during both site inspections.

Summary of Findings

Spring 2013 is the beginning of the second growing season since the wetland plantings were completed on June 6, 2012.

During the April 24, 2013 wetland inspection, WPI and BC observed that all restored upland and wetland areas were stable with trees beginning to bud and vegetation beginning to leaf out with no signs of stress. The water level in the vernal pool was seasonally high and water quality was clear to the bottom in shallow areas.WPI observed ducks, fingernail clams, isopods, dragonfly and caddis fly larvae, and salamander and frog egg masses. These findings and accompanying photographs are summarized in WPI's inspection report dated July 29, 2013 included in Attachment A.

During the June 26, 2013 wetland inspection, WPI and BC observed that all restored upland and wetland areas were stable with both planted and natural vegetation healthy and viable. Vegetation within and around the vernal pool and the adjacent wetland

areas were in good health with no signs of stress. Vegetation in the bordering wetlands and restored stream was in good health with the exception of some deer browsing, however, new growth was sprouting from the remaining shoots. All vegetation adjacent to the restored wetland area and stream are in good health with no dead or dying trees or shrubs. The water level in the vernal pool was high, and water quality was clear. The natural hydraulic drainage features were functioning properly, and Mr. Katuska indicated that the erosion silt control fencing could be removed. WPI observed tadpoles, green frogs, water striders, leaches, dranflies, and water fowl. These findings and accompanying photographs are summarized in WPI's inspection report dated July 29, 2013 and included in Attachment A.

WPI and BC will conduct the next inspection in the Fall of 2013 and two additional inspections semiannually in 2014.

Per Holliston Conservation Commission approval, BC conducted a site visit on July 9, 2013 to remove the erosion silt control fencing. Fencing was removed from all three areas of the wetland where it had been installed.

If you have any questions please feel free to contact us at (978) 794-0336.

Sincerely,

Brown and Caldwell

Charles F. Myette, LSP
Vice President

Jane Metzger, Geologist
Project Manager

JLCM:cfm

cc: Mr. Joseph Montello, Republic
Mr. Thomas A. Mackie, Mackie Shea O'Brien, PC
Gail Magenau Hire, Mackie Shea O'Brien, PC

Attachments (1)

- Attachment A: WPI Site Inspection Report, July 29, 2013

Limitations:

This document was prepared solely for Republic Services Procurment, Inc. In accordance with professional standards at the time the services were performed and in accordance with the contract between Republic Services Procurment, Inc. and Brown and Caldwell dated April 10, 2013. This document is governed by the specific scope of work authorized by Republic Services Procurment, Inc. ; it is not intended to be relied upon by any other party except for regulatory authorities contemplated by the scope of work. We have relied on information or instructions provided by Republic Services Procurment, Inc. and other parties and, unless otherwise expressly indicated, have made no independent investigation as to the validity, completeness, or accuracy of such information.

WETLANDS PRESERVATION INC.

July 29, 2013

Mr. Charles Myette
Brown & Caldwell
1 Technology Drive
Andover, MA 01810

Re: Semiannual Wetland Monitoring
0 Brook Street
Holliston, MA
Wetland Mitigation
DEP #185-0712; NHESP File No. 08-25195

Dear Mr. Myette:

In compliance with the Order of Conditions (DEP Wetlands File No. 185-0712), dated April 13, 2011, Condition Number 52, Wetlands Preservation, Inc. ("WPI") is submitting this report detailing semiannual wetland monitoring conducted to identify and summarize the status of the vernal pool/wetland mitigation completed for the above referenced project. The site conditions recorded during the inspections included the following data: natural conditions, vegetation, vigor and viability of plantings, general stability of the site, signs of wildlife, and general observations.

The soil remediation in the vernal pool was completed in the fall of 2011 as per the approved permits for the project. Planting of the vernal pool was initiated on May 10, 2012 with the installation of shrub species and was completed on June 6, 2012 with the installation of the aquatic species. Modifications to the planting were necessary due to the hydrology present in the vernal pool and the anticipated water levels through this growing season. Water levels were within the Mean High Water range as documented prior to the soil remediation effort. The water levels are controlled by the elevation of the outlet located at the southern end of the pool which drains south to the restored Bordering Vegetated Wetland ("BVW") area. These modifications were eventually approved by the Holliston Conservation Commission in the summer of 2012.

A visual egg mass survey and dip net sampling of the vernal pool was conducted during a site inspection on April 24, 2013. The visual survey included observation and the identification of approximately 15 salamander and 4 pickerel frog egg masses. Dip net sampling identified dragonfly and caddisfly larvae, isopods and fingernail clams. Two ducks were also observed. Water quality in the vernal pool was clear to the bottom in shallow areas, and water levels were seasonally high. Since the vegetation was just beginning to leaf out, a second inspection was planned for June 2013.

The shrub species planted in the vernal pool are sand bar willow (*Salix exigua*) and buttonbush (*Cephalanthus occidentalis)*. The aquatic species planted include white water lily (*Nymphaea odorata*), pond weed (*Potomogeton Nodas*), wild celery (*Vallisneria americana*), hard-stem bulrush (*Schoenoplectus acutus*) and pickerelweed (Pontedeia cirdata). At the time of the site visit on June 26, 2013, all shrubs planted in the vernal pool where viable, with new growth and advantageous roots appearing just above the water line. The existing indigenous plant species including tree, shrub and herbaceous vegetation around the

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perimeter and on hummocks within the vernal pool were vigorous. All soil conditions were stable and rapidly vegetating. Visual water quality in the vernal pool was clear with the bottom observed in shallow water areas and, the water level was still high with flow exiting into the intermittent stream. The restored wetland area was saturated with surface water to the silt fence line, and Mr. Katuska of the Holliston Conservation Commission agreed that the silt fence could be removed from all areas. WPI observed tadpoles, green frogs, water striders, leaches, dragon flies traversing over the water surface, and water fowl in the vernal pool.

The intermittent stream channel and BVW downstream of the vernal pool were restored to grade to original grades in the fall of 2011. The intermittent stream channel was sown with a wetland seed mix and covered with erosion control matting. Plantings along the intermittent stream channel and BVW wetland included red-oiser dogwood (*Cornus sericea*), sweet gale (*Myrica gale*), arrow-wood (*Viburnum dentatum*), winterberry (*Ilex verticillata*) and wild raisin (*Viburnum cassinoides*). The newly planted shrubs had been browsed by deer with new growth sprouting from the remaining shoots. The herbaceous vegetation was rapidly growing to stabilize the exposed soil areas.

In summary, the vernal pool, intermittent stream and the BVW restored are progressing well. All the newly planted shrub and aquatic species will be monitored through the next growing season to ensure compliance with the approved permits.

Should you have any questions or require additional information regarding this report, please contact the undersigned.

Cordially,

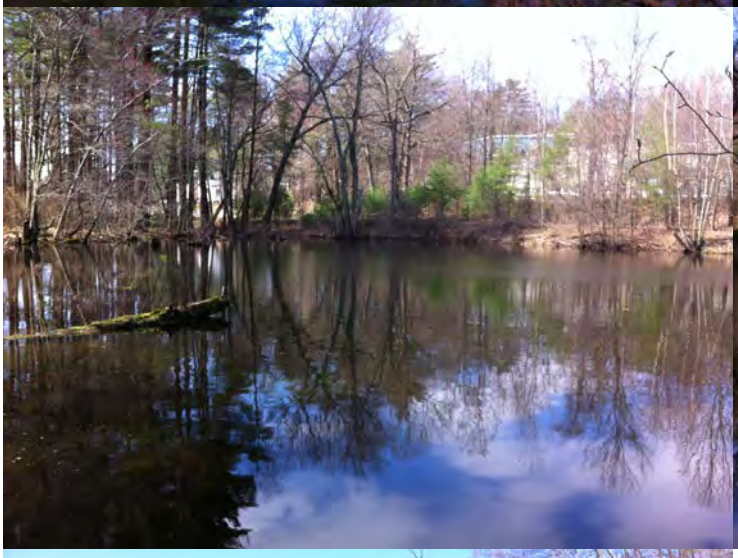
Geoffrey C. Andrews
Senior Wetland Scientist

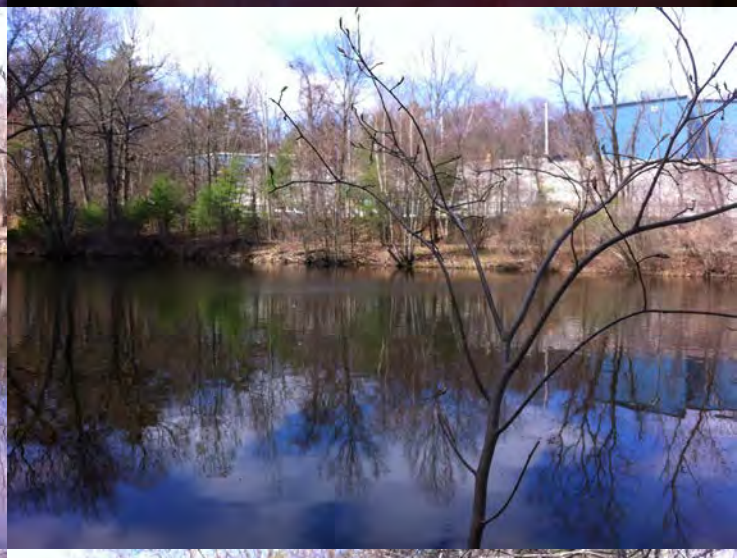
cc: Jane Metzger
Job File

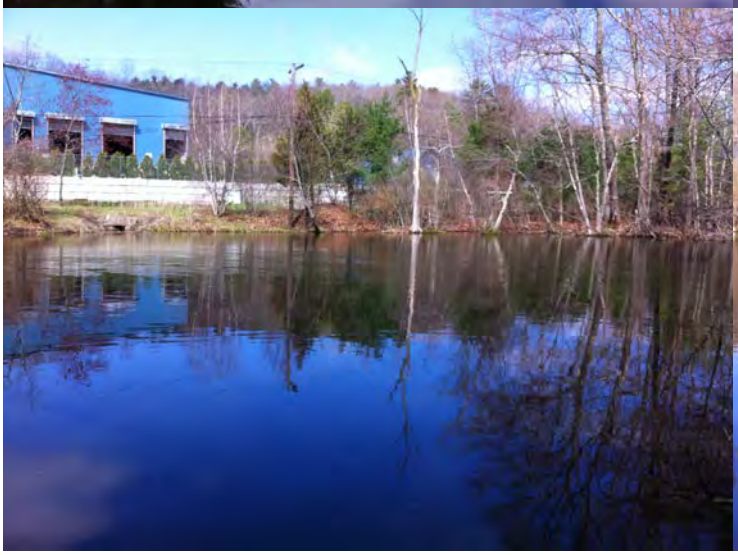
3628.0 WRA Report 07.29.2013

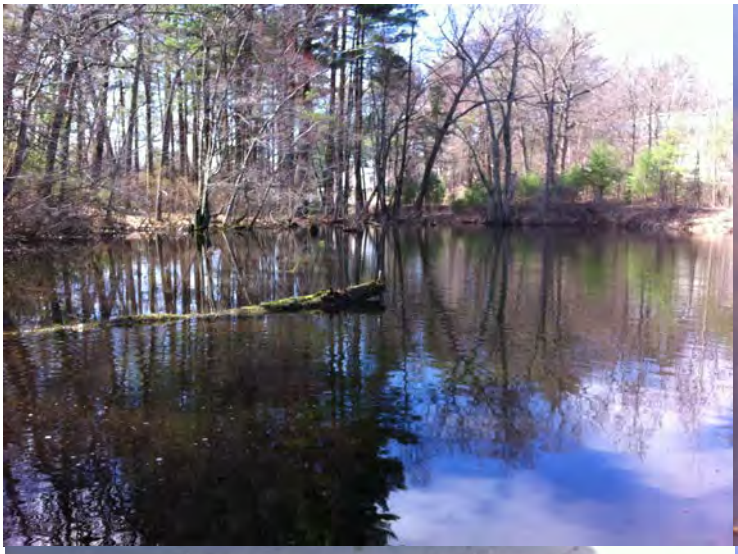
Brook Street Holliston, MA
Vernal Pool / Wetland Restoration
Photographs April 24, 2013

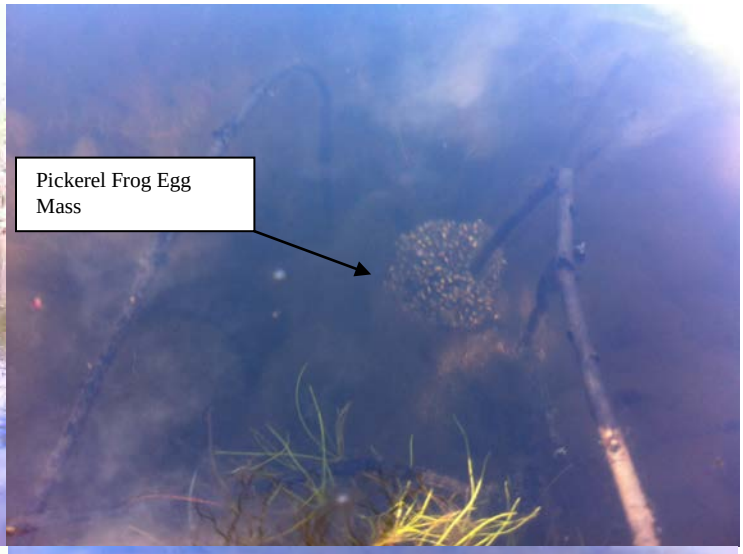

Finger Nail Clam









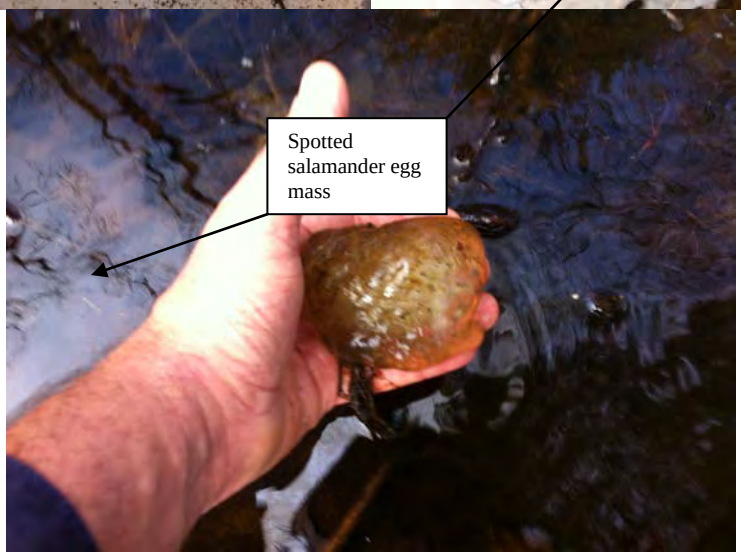

Pickerel Frog Egg Mass


Spotted salamander egg mass


Isopod


Dragon Fly Larvae


Dragon Fly
Larvae


Spotted
salamander egg
mass

Brook Street Holliston, MA
Vernal Pool / Wetland Restoration
Photographs June 26, 2013

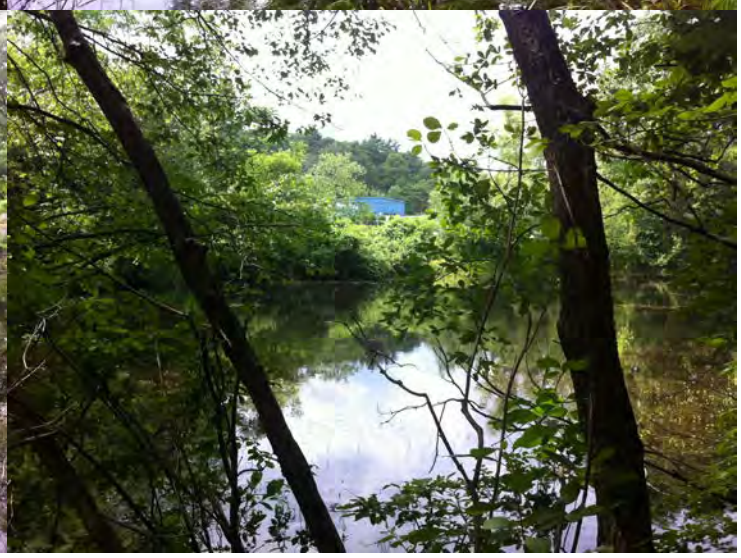





Brook Street Holliston, MA
Vernal Pool / Wetland Restoration
Photographs June 26, 2013





Brook Street Holliston, MA
Vernal Pool / Wetland Restoration
Photographs June 26, 2013