

December 15, 2015

Mr. John Radcliffe, Chairman New Bedford Conservation Commission New Bedford City Hall 133 William Street New Bedford, MA 02744

RE: SE 49-0718, VVK Realty, Inc. 1494 E. Rodney French Blvd

Dear Mr. Radcliffe:

This letter is provided in response to the review comments provided to the Commission by Nitsch Engineering dated December 11, 2015. Accompanying this letter are the following plans/documents:

- 1. Revised plan set titled "Proposed Float System, Moorings, Existing Pier Rehabilitation & Site Improvements", prepared by CLE Engineering, Inc., 2 sheets, revised thru 12/14/15, stamped by Susan E. Nilson, P.E., dated 12/15/15
- 2. Revised Operation and Maintenance Plan also includes Long Term Pollution Prevention Plan, dated December 15, 2015

Comments and CLE responses from Nitsch letter dated December 11, 2015

2. Since a MassDEP designated Shellfish Suitability Area encroaches onto the eastern portion of the project site, there are additional stormwater treatment requirements that should also be considered under Standard 6. For new construction projects located in critical areas, 80% total suspended solids (TSS) removal for a 1-inch water quality depth is required and 44% pretreatment prior to discharging to an infiltration structure. There are also specific BMPs outlined in Table CA1 Standard 6 that MassDEP accepts for stormwater discharges to shellfish growing areas. As a redevelopment, the project is required to comply with the structural pretreatment and treatment requirements of Standards 4 and 6 to the maximum extent practicable.

For this redevelopment project, the Applicant is proposing a treatment train includes a sediment forebay and vegetated filter strip (greater than 50 feet) that achieves 59% TSS removal and does improve the existing condition. Both of these BMPs are acceptable for discharges to shellfish growing areas (Table CA1 Standard 6). To bring the site into full compliance, the Applicant would evaluate additional BMPs that may include a conventional closed drainage system (catch basins, water quality units, etc.) or low impact development approach (sediment forebays, bioretention basins, etc.). While these would provide additional stormwater treatment, they may increase design and construction costs for the site.

The Massachusetts Stormwater Handbook describes an alternative as practicable if it can be implemented within the site being redeveloped, taking into consideration cost, land area requirements, soils and other site constraints. The existing pavement of the parking area is proposed to be resurfaced such that the stormwater runoff will be directed easterly to the proposed sediment forebay to the maximum extent practicable. There is no increase in paved area. The inclusion of a conventional closed drainage system would significantly increase the scope and cost of the project both from a design and a construction perspective.



The MassDEP Stormwater Management Checklist indicates that the project includes a water quality swale and bioretention basin. These BMPs are not indicated on the Site Plan.

These BMPs were inadvertently included in the Checklist and are not included in the plans or calculations provided.

A Long-Term Pollution Prevention Plan was not provided by the Applicant and is required for redevelopment projects. The requirements for the plan are outlined under Standard 4 and, specific to redevelopments, in Volume 2, Chapter 3 of the MassDEP Stormwater Handbook.

See attached Long Term Pollution Prevention Plan.

5. A construction period erosion and sedimentation control plan was not provided by the Applicant and is required for redevelopment projects. The requirements for the plan are outlined under Standard 8 and, specific to redevelopments, in Volume 2, Chapter 3 of the MassDEP Stormwater Handbook. The site plan indicates that wattles are proposed along the project boundary, but a detail is not provided. Details of all erosion controls should also be provided in the plan set.

Construction period erosion and sedimentation control was added to the plan set and includes details for the straw wattles.

An Operation and Maintenance Plan was provided and includes maintenance requirements for the 6. proposed sediment forebay and vegetated filter strip. Nitsch Engineering recommends adding the maintenance measures for the proposed pervious pavement walkway to the Plan.

Maintenance measures for the pervious pavement have been added to the Operation and Maintenance Plan.

Please confirm if the crushed stone that was placed around the relocated tiki bar is to remain, or will be 7. converted to grass.

The crushed stone west of the tiki bar is planned to be converted to grass.

8. Design details should be provided for the permeable paver walkway.

A detail for the pervious pavement has been added to the plan set.

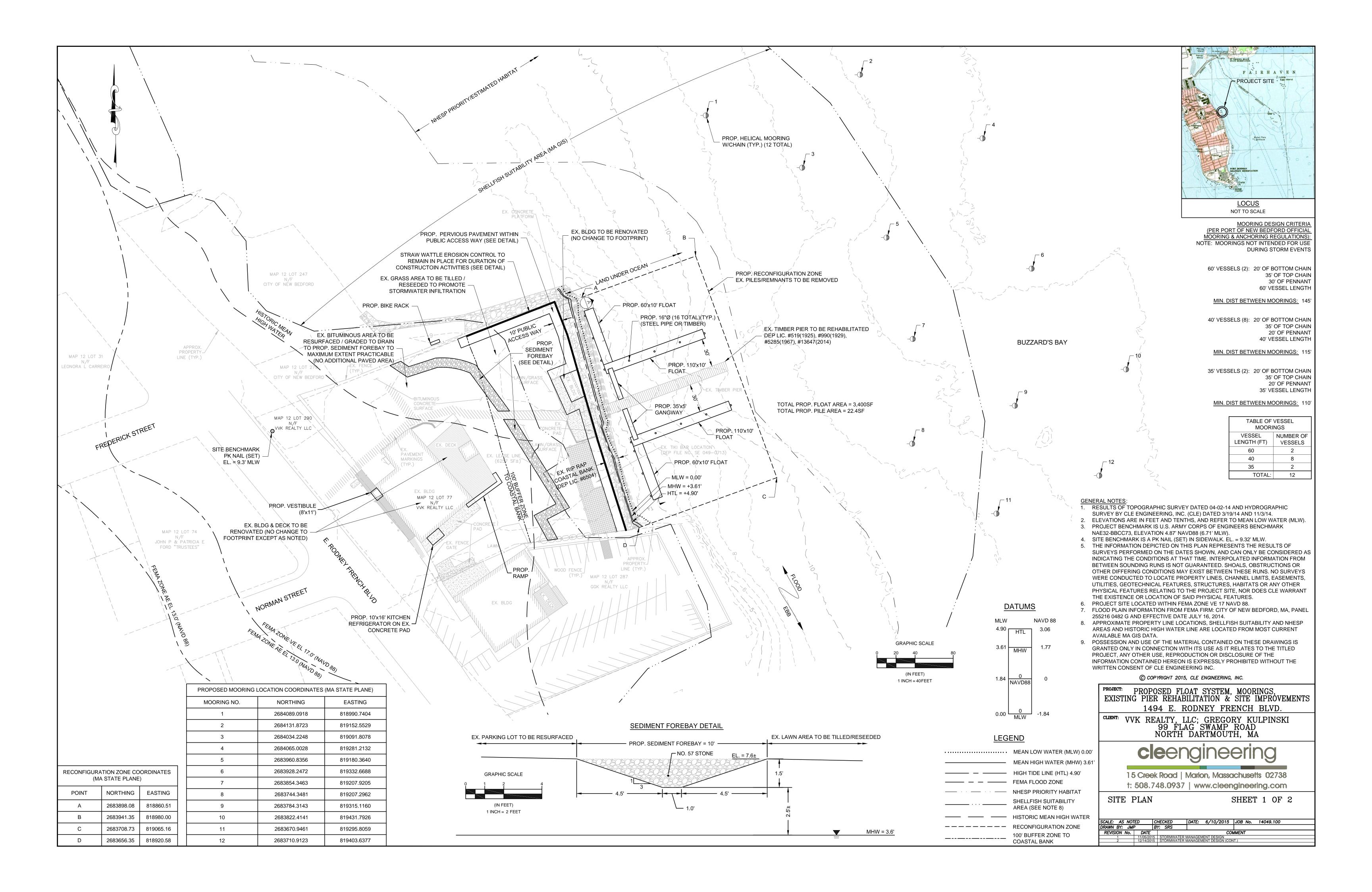
We trust that these responses and revisions will allow the project review to be completed by the Commission. If you have any questions, please feel free to contact me.

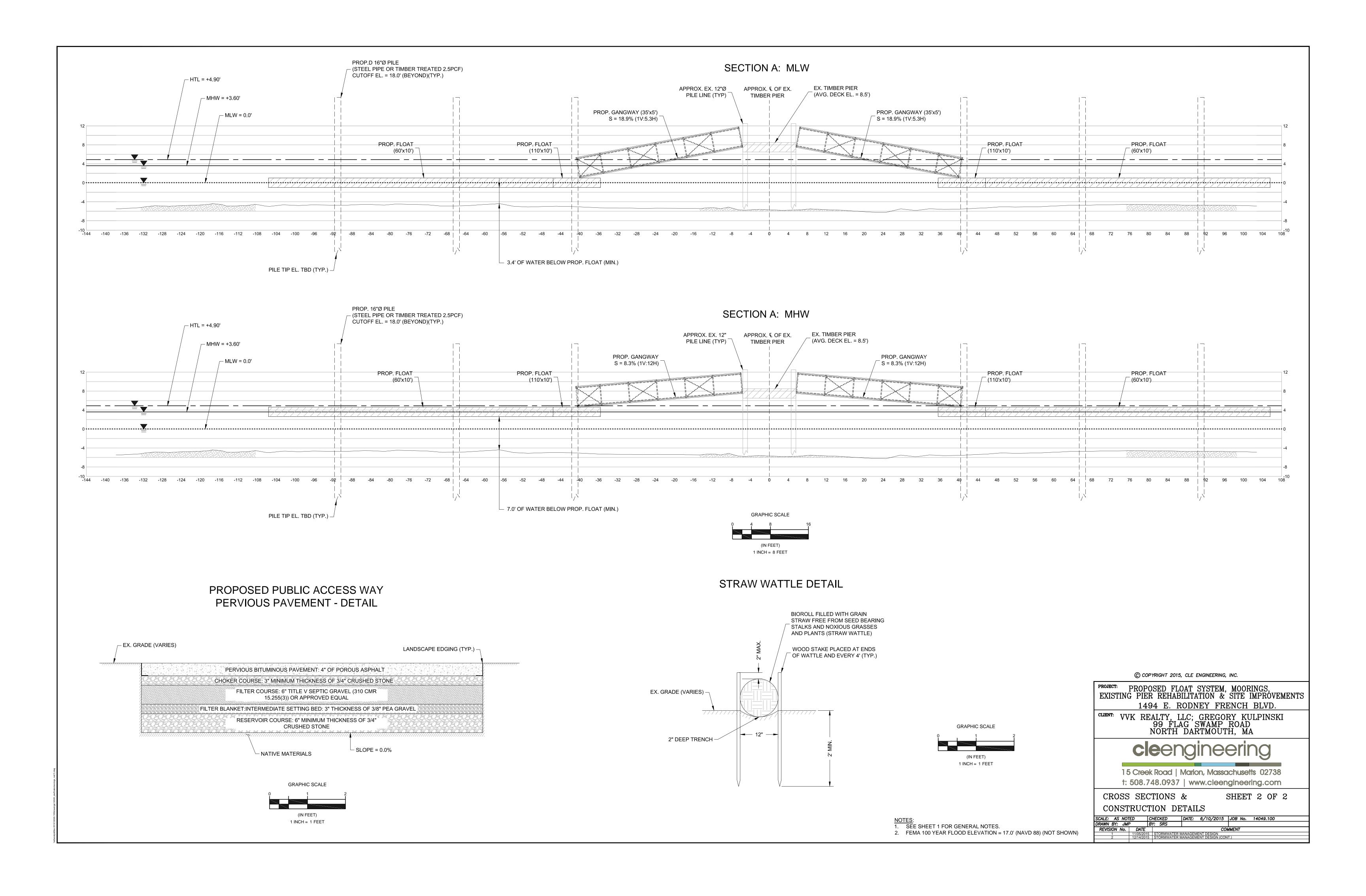
Respectfully submitted,

CLE Engineering, Inc.

Susan E. Nilson, P.E.

Cc: Gregory Kulpinski, VVK Realty, Inc.





VVK Realty, LLC

1494 E. Rodney French Blvd. Operation and Maintenance Plan and Long Term Pollution Prevention Plan

December 15, 2015

This Operation and Maintenance Plan for the Sediment Forebay / Vegetated Filter Strip (greater than 50') stormwater management system at 1494 E. Rodney French Blvd. has been prepared in accordance the Massachusetts Department of Environmental Protection Stormwater Management Policy. The Plan contains the following required information:

- Stormwater management system owner
- Party or parties responsible for operation and maintenance
- A schedule for inspection and maintenance
- The routine and non-routine maintenance tasks to be undertaken

<u>Stormwater Management System Owner:</u> VVK Realty, LLC shall be the stormwater management system owner. The system lies entirely on property owned by VVK Realty, LLC.

<u>Parties Responsible for Operation and Maintenance:</u> VVK Realty, LLC shall be responsible for the operation and maintenance of the stormwater management system.

Inspection and Maintenance Schedule:

- The Sediment Forebay and Vegetated Filter Strip (lawn area) at the eastern edge of the parking lot will be inspected upon completion of their construction and every 4 months during the first year of operation. After the first year, the frequency of inspection will be once per year and after each major storm event. Inspections shall include noting accumulation of sediment in Sediment Forebay, condition of the vegetation, and the degree of soil erosion.
- Maintenance of the Sediment Forebay will consists of removal of accumulated sand and replenishment of crushed stone, as necessary.
- Maintenance of the Vegetated Filter Strip consists of reseeding as necessary to maintain a healthy lawn cover.
- Sediment build up in the Sediment Forebay will be removed and disposed of offsite.
- Pervious pavement shall be monitored as needed to ensure that the paving surface drains properly after storms.
- The pervious pavement surface shall be periodically cleaned using a power washer to dislodge trapped particles and then the area will be vacuum swept.
- The pervious pavement surface shall be inspected annually for deterioration

Routine and Non-Routine Maintenance: Trash and litter that collects in the Sediment Forebay will be removed during routine maintenance. Vegetated Filter Strip will be inspected for slope integrity, soil stability and compaction, plant health, ponding and sedimentation. Vegetation within the Vegetated Filter Strip will be maintained at approximately 3" to ensure efficient flow and sediment removal.

Long Term Pollution Prevention Plan:

Long-term pollution prevention includes the following:

- Wind blown litter from off site sources shall be routinely picked up and disposed of properly;
- Deicing chemicals will be used sparingly at the building entrances; there is no proposed bulk storage.
- Plowed snow will be stockpiled to the extent practicable outside the limits of the sediment forebay.
- Lawn area will be maintained through mowing and fertilizing, with limited pesticides as needed. Organic materials will be utilized to the extent practicable.
- Fertilizers, herbicides, and pesticides shall be properly stored with protection from rain or snow;
- Pet waste will be managed by providing a "mutt mitt" station along the pedestrian walkway.