

Meadow Walk Sudbury

526 & 528 Boston Post Road Sudbury, Massachusetts

Proposed Grocery Store

Continuation of Presentation to The Planning Board

March 30, 2016





Agenda



Stormwater Presentation

- Project Benefits and Overall Approach
- Existing Drainage Conditions
- Proposed Master Plan Drainage Conditions
- Grocery Store Stormwater Design
- Peer Review
- Q&A





Project Benefits



- Protect Environmental Resources On and Off-Site
 - Wetlands
 - Underlying Aquifer / Zone II
- Increase Open Space / Reduction of Impervious Cover
 - Reduce Stormwater Rates and Volumes
 - Increase Recharge
- Implement new systems and BMPs per DEP and Sudbury Stormwater Regulations
- Control Erosion During Construction
- Maintain System for the Long Term





Project Approach



- Stormwater Master Plan
 - Presents a Hydrologic Model for the Entire Project (Existing and Proposed Conditions)
 - Identifies Proposed Conditions Watersheds and Impervious Coverage
 - Documents Reduction of Stormwater Rates and Volumes for Full Build-out (DEP Standard 2)
 - Documents Compliance with the Recharge Requirement (DEP Standard 3)
 - Presents an Approach for Compliance with Remaining Standards
 - Creates a Roadmap for Ease of Review of the Detailed Design for Individual Phases
- Individual Phase Stormwater Management Reports
 - Documents Consistency with the Stormwater Master Plan
 - Presents Detailed Calculations for Phase-Specific Design
- Grocery Store Stormwater Management Report



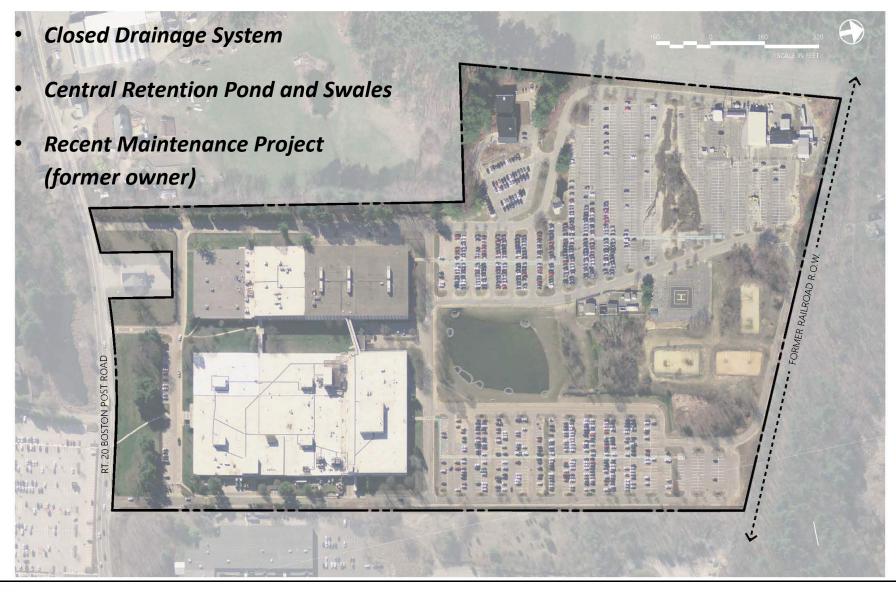








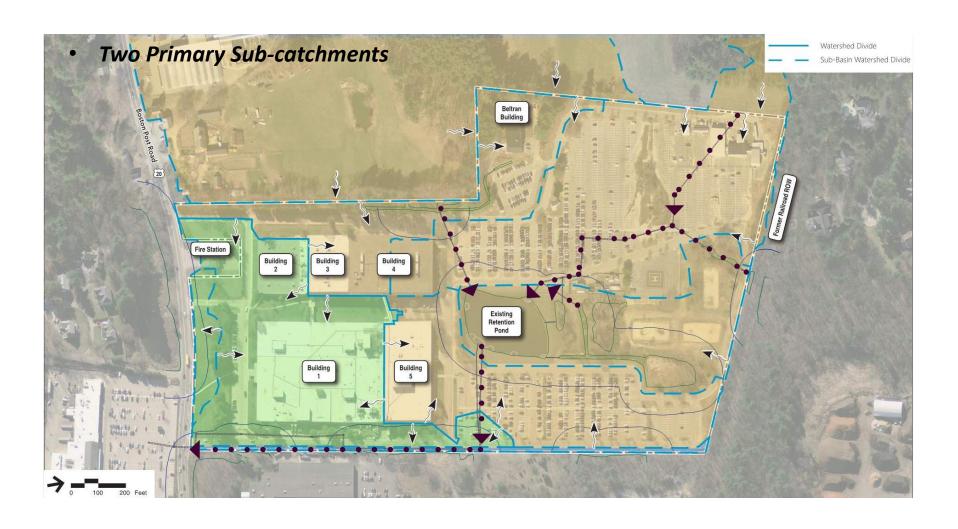










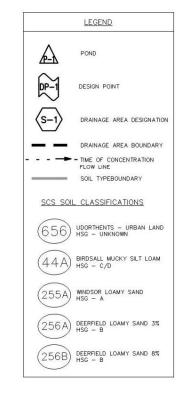














Existing Drainge Conditions Sudbury, MA











Current Master Plan

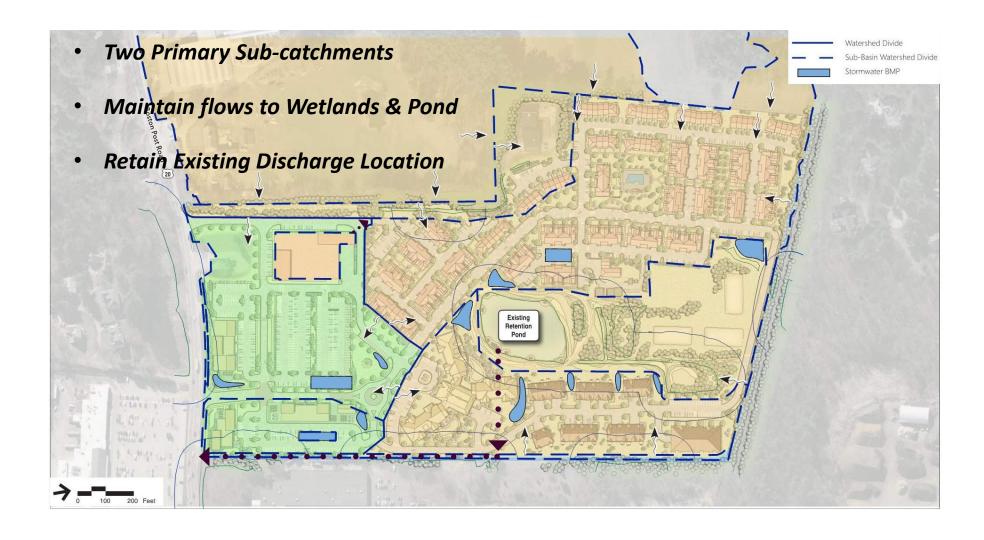




















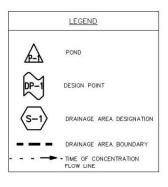




Figure #4

Proposed Drainge Conditions Sudbury, MA







- Protect Environmental Resources On and Off-Site
- Reduce Stormwater Rates and Volumes
- Increase Recharge through pervious area and recharge BMPs
- Implement new Stormwater BMPs
- Complies with DEP Stormwater Standards

Water Quality, Critical Area, LUHPPL, Construction
Phase Controls, O&M plan, Illicit Discharge Compliance







Grocery Store Proposed Conditions





Grocery Store Site Plan











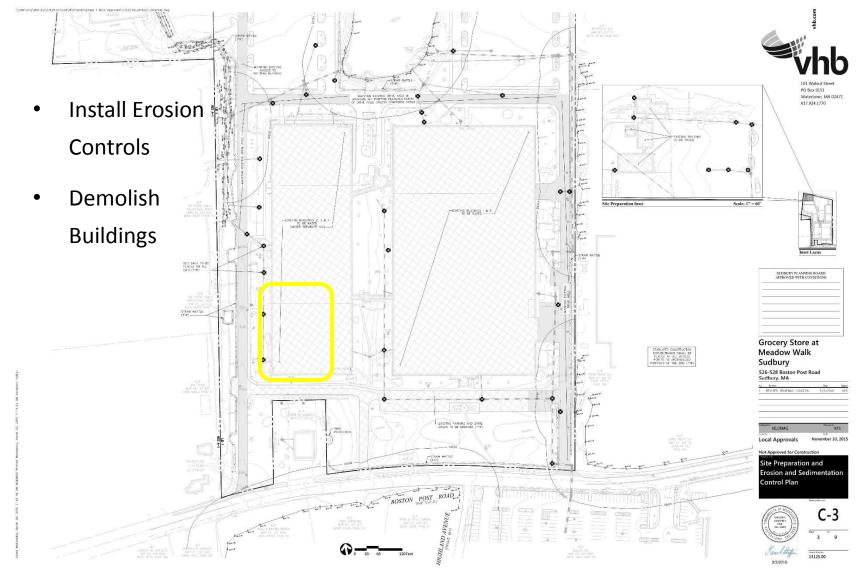
- Consistent with Master Plan
- Complies with DEP and Sudbury SW Regs
- Maximizes use of Recharge BMPs
- SWPPP
- Long Term O&M





Grocery Store Site Prep /ER Plan



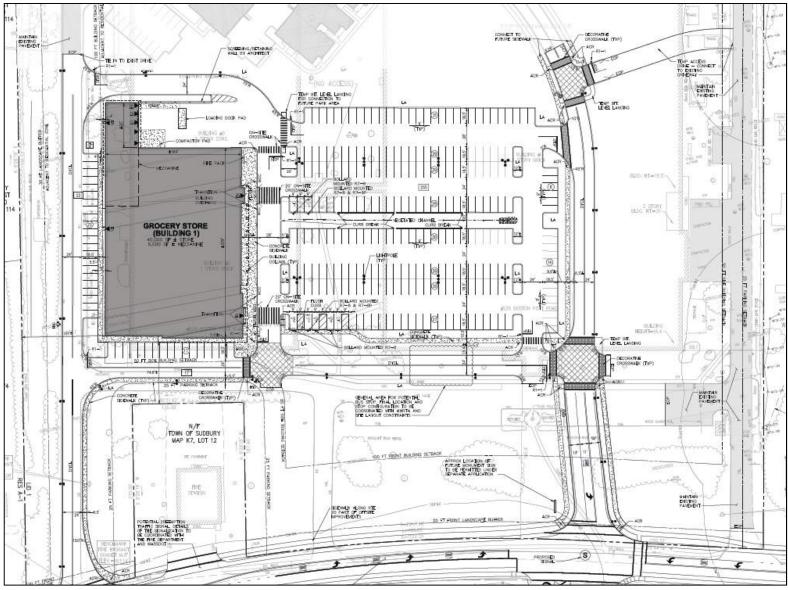






Grocery Store Layout Plan



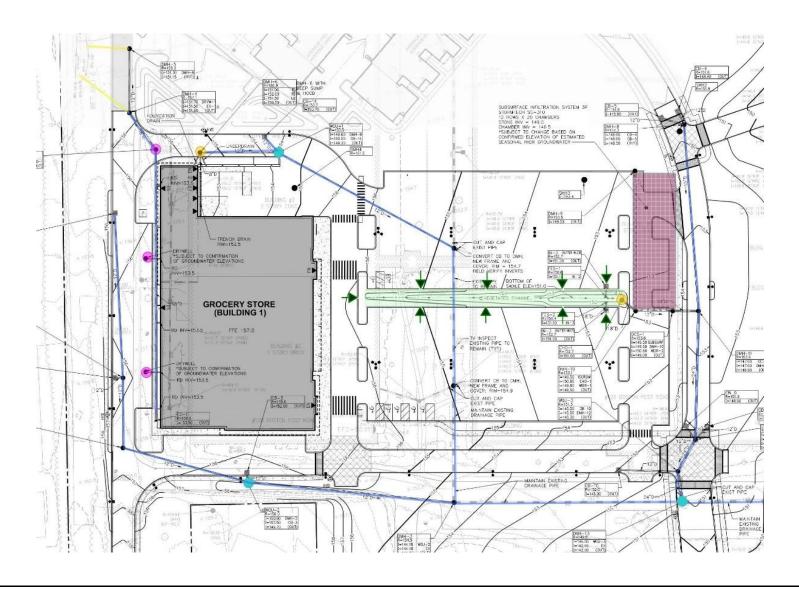






Grocery Store Grading & Drainage Plan MEADOW WALK











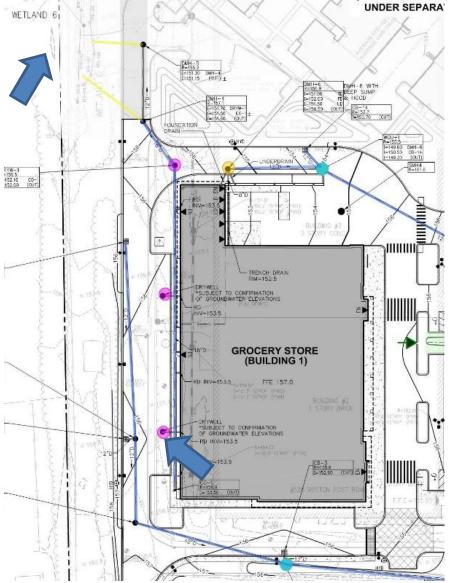






Grocery Store Grading & Drainage Plan MEADOW WALK SUDBURY



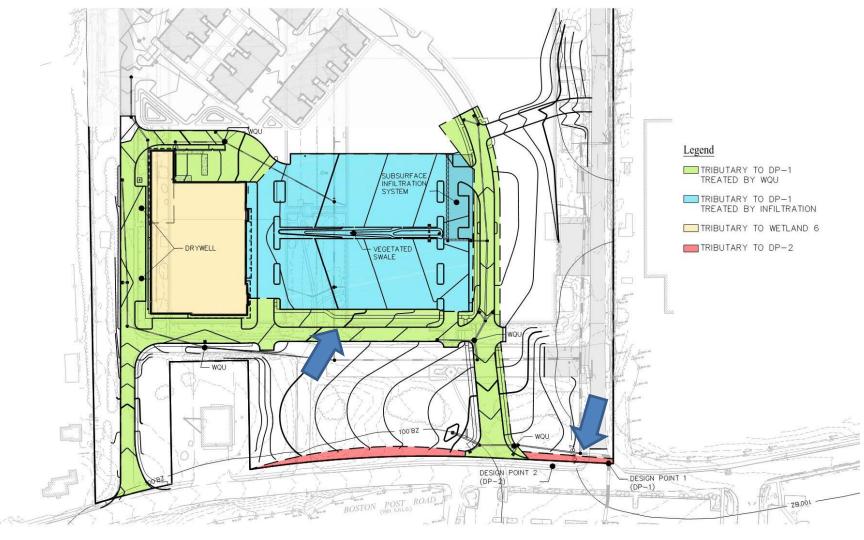


- Clean Roof Runoff
- Maintain Flows and Outfalls to Wetland 6
- Drywells Included to Maximize Recharge





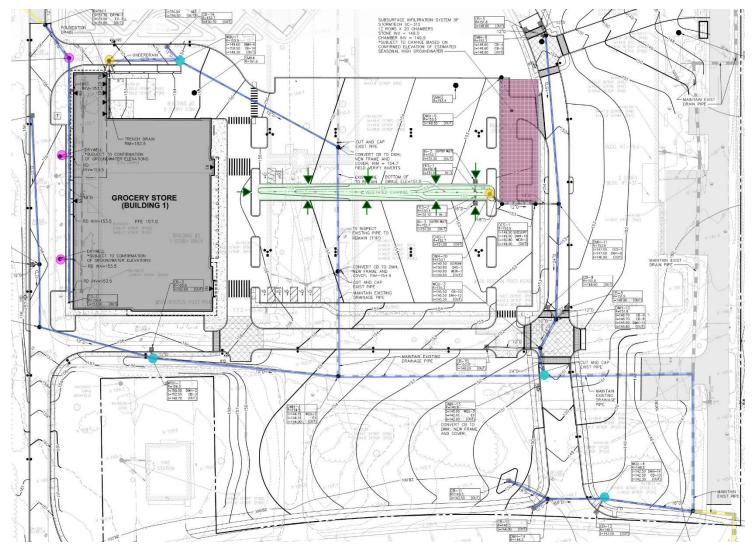










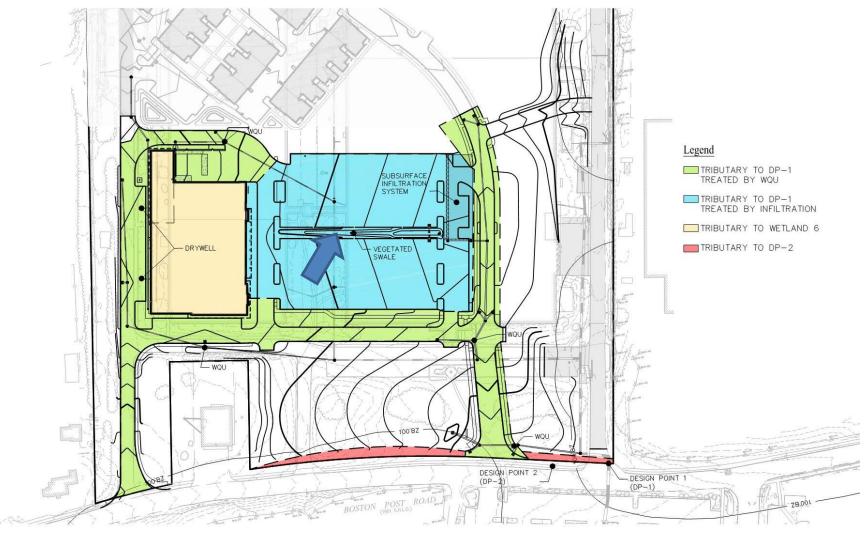


- CB's
- TD/Sump
- Water QualityUnits (4)
- Groundwater
 Limitations





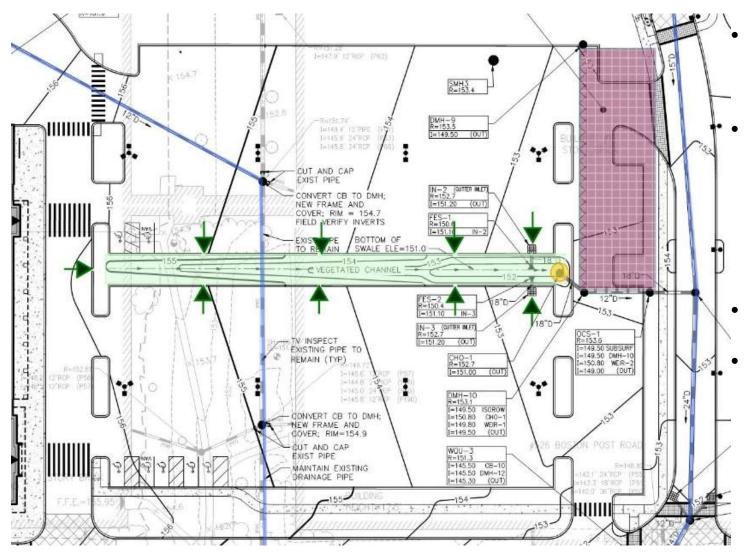












Vegetated Channel

Subsurface
Infiltration
System with
Isolator Row

Test Pits

1" Water
Quality Volume





Proposed Conditions Grocery Store



- Consistent with Master Plan
- Complies with DEP and Sudbury SW Regs
- Maximizes use of Recharge BMPs
- SWPPP
- Long Term O&M





Peer Review



- Thoughtful Input, Site Walk, Collaborative Process
- Master Plan Comment Letter 3/22
- Grocery Store Comment Letter 3/28
- Limited Items to Clarify or Update
- Next Steps







Q & A





Grocery Store Utility Plan



