FUSS & O'NEILL
1550 Main Street, Suite 400
Springfield, MA 01103
413.452.0445
www.fando.com

April 29, 2025

Tim Pearson
Conservation Agent
Littleton Conservation Commission
37 Shattuck Street
P.O. Box 1305
Littleton, MA 01460

RE: Request for Amendment to Order of Conditions for DEP#204-0991,
The Reconstruction of Foster Street
Littleton, MA.

Dear Commission Members:

On behalf of the Town of Littleton Department of Public Works director Stephen Jahnle, we are requesting an Amended Order of Conditions for the Reconstruction of Foster Street Project (MassDEP File No. 204-0991). The Order of Conditions (OOC) was issued on December 12, 2023.

The request for an amendment pertains to two project changes: 1). The proposed addition of a new work item for the treatment of invasive plant species through the selective application of herbicidal treatment. 2). A reduction in the proposed number of 4.0' x 6.5' leaching catch basin structures from 5 to 1 due to the discovery of high seasonal groundwater throughout the project limits. The following background explains the two requests in more detail.

Background

Invasive Plant Management and Treatment

At the time of issuance of the OOC, the project included the planting of 88 new trees and 19 new shrubs. The only project work related to invasive plants was an inventory report of invasive plants within the project limits. The report proposed to document existing conditions and then final conditions of invasive plant species at the completion of construction. The intent was to use the inventory report to provide a basis for determining if any new invasive species had been transported into the project limits during construction.

After the start of construction, MassDOT's landscaping division walked the project limits with the contractor and advised that treatment of invasive species was desirable to MassDOT for the purpose of optimizing conditions for new plantings and for overall aesthetics. This request is for an amendment to the OOC which would add a new standard MassDOT work item called 'Herbicide Treatment of Invasive Plants' within the project work limits. MassDOT's standard specification for the work item is attached. Additionally, the contractor has sourced a detailed proposal from a subcontracting environmental and landscaping specialist, SWCA, describing a treatment plan for the project, also attached. The proposal describes the following aspects of the treatment plan:

- Treatment of Invasive species by mechanical extraction, clearing and excavating. This work is permissible under the original OOC within the project limits. No work is proposed inside of wetland boundaries.
- Equipment cleaning protocols to prevent the spread of invasives.
- Soil movement, burial, and stockpiling methods to prevent the spread of invasives.

- Selective herbicide application in Summer 2025 within the project limits including the type of herbicide by plant species, the application method, and the month of application. No work is proposed inside of wetland boundaries.
- Follow-up management in Summer 2026.
- Reporting and notification protocols to the Conservation Commission and MassDOT.

Leaching Catch Basins

The project originally included 5 underground leaching cement concrete catch basin structures, 4.0' x 6.5' in dimensional size, located along the back of curb on Foster Street. The 5 leaching catch basins were each connected to a proposed new traditional deep sump catch basin. Three of the leaching catch basins were located inside of the 100' buffer area to BVW.

As a redevelopment and limited project, it was demonstrated during review of the original NOI that the project met the Massachusetts Stormwater Standards to the maximum extent practicable. It was noted by the proponent in response to the Commission's comments on the NOI dated 12/01/2023 that the leaching catch basins were not capable of managing high flow events and had low value mitigating stormwater flows during design storms. The purpose of the leaching catch basins was to provide some additional stormwater recharge in the project limits to the maximum extent practicable.

High seasonal groundwater elevation must be two feet beneath the leaching catch basins, or 8.5' below the ground surface for successful installation. Since the start of construction, groundwater test pits performed have shown evidence of high seasonal groundwater elevations that are too high for installation of the proposed leaching catch basins at each the original proposed 5 locations. One new proposed location on Foster Street, approximately 200ft west of Balsam Lane was found to have deep enough groundwater elevation to make the installation of one leaching catch basin feasible.

Abutter Notification

An abutter's list was sourced from the Town of Littleton assessor's office including abutters that are 1,000ft from the linear project limits in accordance with M.G.L. Chapter 131: Section 40. Notification was sent the day of this request.

Sincerely,

Aaron Keegan, PE
Project Engineer
Fuss & O'Neill, Inc.
(413) 333-5461
aaron.keegan@fando.com

CC: Stephen Jahnle, DPW Director, Town of Littleton; Chris Deloge, Resident Engineer, MassDOT

Enclosed:

1). MassDOT Standard Specification for Herbicidal Treatment of Invasive Species.

2). Invasive Plant Management Proposal by SWCA Including Project Map of Invasive Species.

3). Revised Project Plans.

4). Abutter’s Notification Letter and Abutter’s List.

MassDOT Standard Specification for Herbicidal Treatment of Invasive Species

ITEM 102.3 HERBICIDE TREATMENT OF INVASIVE PLANTS HOUR

This work must be performed by persons who meet the qualifications below and are approved by the Landscape Design Section.

Work under this item consists of herbicide treatment of invasive plants currently existing within the project limits and as directed. An Invasive Plant Management Strategy (IPMS) shall be submitted to the Engineer for review and approval and the IPMS shall be implemented on-site. The IPMS shall be written and submitted per Item 102.33 Invasive Plant Management Strategy and shall be measured and paid for under that Item.

Work under this item shall be coordinated with work and schedule for Selective Clearing, Clearing and Grubbing, Mowing, Tree Removal, Planting, and Wetland Mitigation items.

Payment is per hour on-site and shall be compensation for a minimum crew of 2 licensed applicators, 2 back-pack sprayers and mist-blowers, a properly equipped spray truck with spray hoses, and a tank with sufficient capacity for a full day of work. If there is only one applicator, hourly payment shall be adjusted to 50 percent of the unit price.

Date and time stamped photos indicating start and stop time of work must be submitted if requested.

This item is not intended for manual removal of plants.

Management of plants determined to have been introduced to the site via imported loam, compost, mulch, plants, equipment, or other construction activities will be the Contractor's responsibility and at the Contractor's expense.

Herbicide shall be applied during daytime hours only.

Measures to prevent the introduction of invasive plant species to the site and to address introduction due to construction-related activities shall be covered under the Standard Specifications, Division I - Subsections 7.01(D) Plant Pest Control and 7.13 Protection and Restoration of Property as amended in these Special Provisions.

Plant species targeted for management under this item shall be as determined in the field per the site walk and as specified in the IPMS.

The definition of invasive plant species shall be as described by Massachusetts Invasive Plant Advisory Group (MIPAG): "non-native species that have spread into native or minimally managed plant systems in Massachusetts, causing economic or environmental harm by developing self-sustaining populations and becoming dominant and/or disruptive to those systems."

Control of invasive plants shall begin immediately with the initiation of construction activities and prior to any clearing or site disturbance. Treatment areas shall include stockpile locations and may, upon approval of the Engineer, extend outside the project limit. Treatment shall be done each consecutive year for the duration of the contract unless specified otherwise in the IMPS or unless directed otherwise by the MassDOT invasive species contact. Work shall be done during the growing season from May – October unless otherwise specified in the IPMS.

Areas identified for vegetation control measures shall be as shown on the plans and as determined in the field by the Engineer and a MassDOT Landscape Architect. Contact at MassDOT Landscape Design Section may be contacted at: stephanie.smoots@dot.state.ma.us.

QUALIFICATIONS

The applicators shall submit and meet the qualifications outlined below. A list of contractors specializing in invasive management and approved by MassDOT Landscape Design Section is available on the following website: https://www.mass.gov/lists/landscape-design-and-roadside-maintenance under Invasive Plant Management.

Requirements

1. Company must provide proof of qualifications by providing the following:
   a. Narrative describing company, its expertise and experience with invasive plant control.
   b. Demonstrate experience with herbicide treatment as part of restorations and in sensitive areas.
   c. Describe company's technical qualifications and past performance.

2. Company must meet licensing requirements:
   a. All crew applicators must have a Massachusetts Commercial Applicator License (CORE).
   b. At least one or more applicator must have a ROW certification, if required for work.
   c. Company must provide name(s) of applicator(s) and Applicator License/Certification number for all contractor crew leaders working on the project.
   d. Company must provide documentation of any warnings, penalties or fines received in the last three (3) years.

3. Company must provide proof of experience with invasive plant control and include following:
   a. At least five (5) references from prior invasive plant control work completed in last five (5) years. Provide contact information including address, phone number and email.
   b. Provide a summary of each of these projects including nature of the problem, specific invasive vegetation treated, dates and period of treatment, methodologies used, and summary of success or not in terms of meeting performance objectives. Include summary of equipment used.
   c. Photo documentation of these projects.
   d. GPS coordinates of project locations, if available.

4. Crew leader must have expertise with invasive plant control and provide the following:
   a. Have held Core license for at least five (5) years.
   b. Resume listing five (5) or more years of experience applying pesticides with the company or with another company specializing in vegetation management.

SUBMITTALS

No work shall begin without approval of the submittals.

Submittals include the following items:

Invasive Plant Management Strategy (IPMS)

At least thirty (30) days prior to proposed treatment the IPMS shall be submitted for approval by the Engineer and MassDOT Landscape Architect. All chemicals, methods and work done under this item shall be consistent with the IPMS. The IPMS shall be as described under Item 102.33.

Herbicide Use Report

Within two (2) weeks after each application, the Contractor shall provide to the Engineer and the MassDOT Landscape Architect a completed and signed MassDOT Herbicide Use Report.

Photo Documentation

Digital photos with date and time of herbicide application work, showing start time and completion time, are required and must be submitted for measurement of payment upon request.

MATERIALS

All proposed herbicides shall be as approved in the IPMS. Herbicides shall be labeled for the method of treatment and shall meet all federal, state and local regulation requirements. Application rates will depend on herbicide proposed and shall be per the manufacturer's label for specific application.

METHODS

All methods used shall be as approved in the IPMS which shall be determined during the Initial Site Walk as described under Item 102.33 Invasive Plant Management Strategy.

The Contractor shall be responsible for marking delineated areas and plants to be preserved, removed, or otherwise treated. Fencing or other materials needed for marking and delineating protected areas shall be incidental to this item.

The Contractor shall notify the Engineer a minimum of 3 days prior to date of expected herbicide application. Applicators shall notify the Engineer upon arriving on-site and upon leaving the site.

Herbicide Applications

All herbicide application shall conform to Massachusetts Pesticide Laws and Regulations per the Massachusetts Department of Agricultural Resources (MDAR) Pesticide Bureau.

Mixing, applying and/or disposing of herbicides shall always be in accordance with instructions on their labels and all applicable federal, state, and local regulations. Mixing shall not occur within sensitive areas, wetlands, or buffer zones.

Contractor shall not spray 2 hours prior to precipitation, during rain, or during windy conditions. The Contractor shall be responsible for monitoring weather conditions and adjusting the work schedule as appropriate for the herbicide and application method to be used.

Targeted vegetation shall be identified and marked prior to treatment. Plants treated by foliar spray, injection or glove application or other methods that leave standing vegetation, as opposed to cut-stump application, shall remain clearly marked for identification through the contract period.

Desirable vegetation shall be protected from both spray and other physical damage.

Contractor is responsible for any damage to vegetation not designated for removal or treatment. Vegetation damaged shall be restored. Cost of replacement plants and/or restoration shall be borne by the Contractor.

Contractor shall ensure that the public does not enter a work area while herbicide application or spraying is underway.

Disposal Of Invasive Plant Material

All material to be cleared shall become the property of the Contractor. The satisfactory disposal of all cleared plant material (seeds, roots, woody vegetation, associated soils, etc.) shall be the Contractor's responsibility.

The Contractor shall take measures to prevent viable plant material from leading to further infestations (seeds, roots, woody material, etc.) while stockpiled, in transit, or at final disposal locations. All precautions shall be taken to avoid contamination of natural landscapes with invasive plants or invasive plant material.

Chipping, shredding, or on-site burning of plant material must be approved by the Engineer and included in the IMPS.

For plant material taken to an incinerating facility per the IPMS, a receipt from that facility shall be submitted to the Engineer as proof of disposal.

Where feasible, it is preferable to dispose of plants on-site or to bury them on-site with on-going monitoring for re-sprouting. Disposal locations and methods must be approved and included in the IPMS. Site work such as grading and seeding to stabilize and restore disposal area shall be incidental to this item.

The Contractor shall be responsible for treating or otherwise managing areas of re-growth due to improper disposal. Treatment shall be at the Contractor's expense.

Follow-Up Treatment

Plants and areas shall be re-treated as necessary and as appropriate to the time of year. Treatment shall be for the duration of the contract and per the IPMS.

MEASURE OF SUCCESS

The expectation is a minimum of 85-95 percent control achieved after the first treatment, depending on plants targeted and extent of population, and based on the expectations laid out in the IPMS. The expectation for the contract duration is 95-100% eradication by the end of the treatment period, unless otherwise specified in the IPMS.

METHOD OF MEASUREMENT

Item 102.3 will be measured for payment by the Hour of verified crew time spent on the project doing herbicide application as and where specified herein and in the IPMS. A crew shall be defined as a minimum of two licensed applicators each equipped with (at minimum) back-pack sprayer and mist blower. The crew shall also have a properly equipped spray truck with hoses and a tank with sufficient capacity for a full day of work.

BASIS OF PAYMENT

Item 102.3 will be paid at the contract unit price per Hour, which price shall include all labor, materials, equipment, tools, and all incidentals required to complete the work.

Payment will be based upon verified time spent on the project doing herbicide application as and where specified in the IPMS and upon receipt and approval of submittals. Payment will not include travel time to and from the Contractor's place of business and nor time for investigative field trips.

If there is only one applicator, hourly payment shall be adjusted to 50 percent of the unit price.

The Invasive Plant Management Strategy will be paid for under Item 102.33.

Invasive Plant Management Proposal by SWCA Including Project Map of Existing Invasive Species

SUBMITTAL REGISTRATION FORM

ONYX JOB #EX-24-0010

MASSDOT 125644 - FOSTER STREET RECONSTRUCTION PROJECT
LITTLETON, MA

Submittal Description: INVASIVE PLANT MANAGEMENT STRATEGY - FULL PLAN

Submittal No.: 102.33-003 **Spec Section:** N/A

Revision No.: 0 **Sub Section:**

SUBMITTAL DISTRIBUTION TYPE:

- ☐ **Shop Drawing**
- ☐ **Working Drawings**
- ☐ **Schedule Submittal**
- ☐ **Miscellaneous Submittal**

SUBMITTAL NOTES:

REVIEWER STAMP & COMMENTS

The above referenced submittal has been reviewed by the undersigned and I/we certify that the material and/or equipment meets or exceeds the project specification requirements with:

N/A No deviations

☐ Deviations as noted below:

Print Name: _____

Signature: _____ Date: _____

Invasive Plant Management Strategy for Reconstruction of Foster Street in Littleton, Massachusetts

MassDOT Project No. 609054

MassDOT Contract No. 125644

PREPARED FOR

Massachusetts Department of Transportation

ON BEHALF OF

Onyx Corporation

PREPARED BY

SWCA Environmental Consultants

INVASIVE PLANT MANAGEMENT STRATEGY FOR RECONSTRUCTION OF FOSTER STREET IN LITTLETON, MASSACHUSETTS

Prepared for

Massachusetts Department of Transportation
10 Park Plaza, Suite 4160
Boston, Massachusetts 02116

On Behalf of

Onyx Corporation
18 Wetherbee Street
Acton, Massachusetts 01720

Prepared by

SWCA Environmental Consultants
15 Research Drive
Amherst, Massachusetts 01002
(413) 256-0202
www.swca.com

SWCA Project No. 0089854-000-AMH

CONTENTS

Appendices

Tables

1 INTRODUCTION

This Invasive Plant Management Strategy (IPMS) has been developed to provide the site contractor, Onyx Corporation, with specifications regarding the removal, handling, and management of invasive plants existing within the construction limits of the Reconstruction of Foster Street project (project site) in Littleton, Massachusetts. Invasive plant management is conducted on construction projects such as this one to improve the habitat value of the project site, protect the proposed landscape and/or restoration plantings, and prevent the future spread of invasive species from documented locations into uninfested project work areas. In addition to measurements of spread prevention, this plan specifies an invasive plant management goal to reduce or eliminate the cover of invasive plants found on the project site.

The measure of success for invasive plant management on this project is 85% reduction in invasive plants from preconstruction to the end of the project. This invasive reduction goal is based solely on the invasive plant populations currently existing within the bounds of the project site, as documented in this plan. Invasive plant populations frequently extend outside the project site and make total eradication infeasible.

Project construction will commence upon approval of this plan and will extend through Fall 2026. Invasive plant management will be conducted annually until project completion.

1.1 Permit Compliance

A Stormwater Pollution Prevention Plan (SWPPP) and Order of Conditions (OOC) (MassDEP File No. #204-0991) has been issued for construction work within resource areas and within the 50-foot No Disturbance Area of the Littleton Wetlands Protection bylaw. Currently, the OOC requires that herbicides proposed to be used need to be disclosed to the Conservation Commission and properly specified in an Amended OOC.

Onyx Corporation will need to request an amendment to the OOC in Fall/Winter of 2024 to allow for herbicide use during the summer of 2025.

2 DOCUMENTATION OF INVASIVE PLANTS ON SITE

SWCA conducted a survey of invasive plants within the construction limits on August 30, 2024, accompanied by representatives from MassDOT and Onyx Corporation, to identify the preconstruction locations of invasive plants across the project site.

The locations of invasive plants observed during the August 30, 2024, site visit is annotated in the Invasive Plant Locations Plan (Appendix A). SWCA also took photographs of key invasive plant populations during the August 30, 2024 visit, which are included in the attached photograph pages (Appendix B).

The invasive plant species with the greatest coverage on the project site are Asiatic bittersweet (*Celastrus orbiculatus*) and Japanese knotweed (*Fallopia japonica*). While the invasives documented in Appendix A represent preconstruction conditions on the day of the site visit, there are many invasive populations existing directly outside of the construction limits. Therefore, it is possible that these species could spread into the project area once soil has been disturbed. All invasive plants observed on-site will be targeted during each management visit and notes of new invasive plant locations will be relayed to the site contractor.

3 METHODS OF INVASIVE PLANT MANAGEMENT

A combination of chemical and mechanical management will take place for all invasive plants located within the project site. Mechanical clearing will need to be the first method of invasive management in order to keep construction activities on schedule. While several invasive plants will be managed, Japanese knotweed is of highest concern during construction activities due to its ability to spread through rhizome fragmentation. Herbicide application will be a necessary method of invasive plant management throughout the construction timeframe (through Fall 2026). Particular care needs to be given when clearing vegetation and/or mobilizing through areas where Japanese knotweed exists. See Section 3.1.1 for more details on how to carefully handle and work through areas of Japanese knotweed.

Mechanical methods can effectively manage many of the invasive plants present. Such methods include clearing, grubbing, and other excavation activities which will all occur during this project. SWCA will work with the site contractor to most effectively utilize both mechanical and chemical means of invasive plant management to meet the goals of this project as well as the construction schedule.

All herbicide applications will be conducted as detailed in Table 1 and will be applied using low-volume backpack sprayers. Herbicide will be mixed with non-ionic surfactant and a marking dye. This will allow applicators to conduct selective herbicide application and remain aware of all plants treated, which eliminates unnecessary overspray.

Table 1. Invasive Plant Species Management Details

Common Name	Scientific Name	Treatment Protocol	Management Timing
Japanese knotweed	*Fallopia japonica*	Foliar treatment; glyphosate	Late August to mid-October
Asiatic bittersweet	*Celastrus orbiculatus*	Foliar treatment (small stems); triclopyr Cut stem (large stems); triclopyr or glyphosate	June to October
Multiflora rose	*Rosa multiflora*	Foliar treatment (small stems); triclopyr or glyphosate Cut stem (large stems); triclopyr or glyphosate	June to October
Garlic mustard	*Alliaria petiolata*	Mechanical removal (small populations); hand pulling Foliar treatment (large populations); glyphosate	April to June
Porcelain berry	*Ampelopsis brevipedunculata*	Foliar treatment; glyphosate or triclopyr	June to October
Burning bush	*Euonymus alatus*	Foliar treatment (small stems); triclopyr or glyphosate Cut stem (large stems); triclopyr or glyphosate	June to October
Bush honeysuckle	*Lonicera* sp.	Foliar treatment (small stems); triclopyr or glyphosate Cut stem (large stems); triclopyr or glyphosate	June to October
Common buckthorn	*Rhamnus cathartica*	Foliar treatment (small stems); triclopyr or glyphosate Cut stem (large stems); triclopyr or glyphosate	June to October
Glossy buckthorn	*Frangula alnus*	Foliar treatment (small stems); triclopyr or glyphosate Cut stem (large stems); triclopyr or glyphosate	June to October
Autumn olive	*Elaeagnus umbellata*	Foliar treatment (small stems); triclopyr or glyphosate Cut stem (large stems); triclopyr or glyphosate	June to October
Purple loosestrife	*Lythrum salicaria*	Mechanical removal (small populations); hand pulling Foliar treatment (large populations); glyphosate	June to August

Common Name	Scientific Name	Treatment Protocol	Management Timing
Norway maple	*Acer platanoides*	Foliar treatment (small stems); glyphosate or triclopyr Hack and squirt (large stems and trees); glyphosate or triclopyr	June to October
All other invasive plants*		Young woody and herbaceous: foliar; glyphosate Mature shrubs: cut-stem; glyphosate. Mature trees: hack and squirt or cut-stem; glyphosate. Herbaceous invasives: foliar; glyphosate	April to October

Note: These herbicides are recommended for use. Either equivalent herbicides or similar herbicides may be used upon approval.

Note: "Mature" is defined as stems 1 or more inches in diameter; "Young" is defined as stems less than 1 inch in diameter.

* Any invasive plants (as defined by MIPAG and DEP's Inland Wetland Replication Guidelines), regardless of their documentation in this IPMS, will be managed if observed within the management limits.

3.1 Initial Management

3.1.1 Mechanical Management: Clearing and Excavating

Invasive plant species must be cleared to avoid delaying construction. Much of the invasive vegetation will be initially managed through clearing. Clearing will be performed with a combination of excavators and land clearing equipment. Any equipment that is used to clear vegetation or excavate soil in an area that contains invasive plants will be cleaned prior to moving into uninfested areas of the project site or beyond. Equipment cleaning will be performed outside of wetland resource areas and their buffers and will be conducted prior to moving into uninfested areas.

When the Japanese knotweed is cleared, it must be cut above ground level without dislodging or affecting the roots of the plant. All cutting implements must be cleaned after cutting and prior to use in areas not containing Japanese knotweed. Failure to do this can result in spreading the Japanese knotweed population. Any Japanese knotweed cutting planned by Onyx Corporation must be communicated with SWCA to prevent an overlap with any planned foliar treatments.

If Japanese knotweed can be excavated, then all excavated material must be buried or stockpiled according to Section 3.1.1.2. Burial is preferred over stockpiling as it has the lowest risk of spreading Japanese knotweed; however, it is not feasible on all construction sites. Section 3.1.1.1 includes best practices for equipment cleaning. Appendix A includes the planned locations for temporary stockpile areas.

If invasive plant material cannot be buried or stockpiled on-site, then it can be sent to a facility and disposed of off-site. The contractor must make the facility aware that the disposal contains invasive plant species.

3.1.1.1 EQUIPMENT CLEANING

All equipment will be cleaned using brushes, water, or compressed air prior to leaving areas with existing populations of invasive plant species. Using a combination of brushes and other hand tools to loosen compacted soil is preferable to the other two options, as brushes and hand tools will minimize the dispersal of any propagules. Any equipment that is used for the movement or clearing of soil within invasive populations will be cleaned prior to leaving the invasive-infested area. Cleaning will be performed on the tracks and buckets of the machines that have potentially come in contact with invasive root/propagule material.

If hand tools are used in clearing, they should also be cleaned prior to use in non-infested work areas. Cleaning activities shall occur outside of areas with disturbed soils and away from any surface waters to avoid the spread of seed material downstream.

If perimeter erosion controls are not already in place around these invasive-infested areas, the site contractor shall install a single line of straw bales around the area in which invasive plant propagules are cleaned from equipment. This will be performed to reduce the potential spread of invasives from infested to uninfested areas, particularly when there is bare soil in either the uninfested or infested areas in question. Final project close-out operations will include disposal of these perimeter controls. As they may contain viable invasive propagules, the receiving facility will be informed of that possibility, and the perimeter controls will not be reused after disposal.

All equipment used for the transport of invasive plant and root material will be inspected and cleaned prior to use with non-invasive materials. The site contractor will assume any soil and plant material remaining on equipment is invasive prior to use in uninfested portions of the project site. No oversight will be needed to conduct this task, but the site contractor must ensure all equipment is clear of excess soil and plant material when moving from an area of invasive infestation to one not infested.

3.1.1.2 SOIL MOVEMENT, BURIAL, AND STOCKPILING

If burying Japanese knotweed on-site is possible, the plant material may only be buried at least 6 feet deep in locations that already contain Japanese knotweed. When moving potentially viable invasive propagules (both within or outside of the project site), all material will be secured in an enclosed structure (such as a dump truck bed) to avoid spread in transport.

All invasive infested soil that need to be stockpiled will be in the location marked on the attached plan (see Appendix A). The stockpile area will be surrounded by perimeter sediment and erosion controls to eliminate the displacement of any material during rain events. Should the stockpile area remain small, silt fence and straw bales will suffice for perimeter controls. However, should the stockpile area exceed a height of 5 feet, lined jersey barriers wrapped in a semi-permeable fabric will be installed to accommodate the larger volume of sediment that could mobilize during a large storm event. Should a secondary stockpile location be required, the site contractor will report the new location to MassDOT.

The invasive stockpile area(s) will be specifically inspected and treated during each herbicide application event. All soils in areas that have been treated, and that are subsequently scheduled for excavation, shall be considered suitable for reuse contingent on the Engineer's determination that no evidence of invasive plant propagation has been documented for a 6-month period prior to excavation. SWCA can provide recommendations to the Engineer if needed. Stockpile areas shall be exposed and/or overturned multiple times before this determination is made.

3.1.2 Chemical Management: Herbicide Application

Due to construction timing, herbicide application will not be conducted prior to the start of clearing and grubbing. Where construction activities occur prior to herbicide application in areas that contain Japanese knotweed, the site contractor will follow the cleaning protocols outlined in Section 3.1.1.1. The other invasive plants on the project site will initially be well-managed through mechanical means, and all invasive plants will be re-treated with herbicide as needed in future management events (see Section 3.2).

3.2 Follow-Up Management

Additional management efforts are required to limit the spread of Japanese knotweed and other invasive plants on the project site following clearing and grubbing activities. All invasive plants will be targeted during each management visit regardless of being mapped in the preconstruction visit. Any new invasive plant locations found will be relayed to the site contractor.

Follow-up management will be conducted at least once during each year via a combination of herbicide application and mechanical removal. The proposed management schedule is included in Table 2. Any cutting to take place will be conducted with hedge trimmers, chain saws, or small hand tools (pruners, loppers, etc.) and will be performed in concert with herbicide application. Herbicide applications will be performed as indicated in Table 1. These management methods and timings have been included based on the ideal window for each invasive plant occurring on the project site. This timing is related to the flowering period for most invasive plants. The ideal timing for management is at or just after peak flowering. Any follow-up management to occur within the same growing season will occur a minimum of 2 to 3 weeks following any previous treatment.

As stated in Table 1, herbicide application may be conducted via foliar or cut-stem application. Foliar herbicide application will be performed by low-volume backpack sprayer. Cut-stem application will be conducted using Buckthorn Blasters ®, a handheld applicator with a sponge tip. Where cut-stem applications are performed, cut material will be left in place. As construction activities will remove all large material prior to herbicide application, all cut-stem applications will be performed to small woody material, if needed. The exact implementation method (herbicide application or mechanical management) will be determined by SWCA in the field based on site conditions. All dead material will be left on-site where it falls to decompose naturally (as it ultimately would if it were not cut).

All herbicides that will be used for treatments are approved for use in wetlands and can be used in sensitive areas. Herbicide Use Reports will be submitted within 2 weeks of each application. A copy of the Herbicide Use Report form is included in Appendix C.

Table 2. Invasive Plant Management Timeline

Season	Task	Location
Fall 2024	Clearing and grubbing	Entire project site
	Establish stockpile	STA 35 to STA 38+75
August/September 2025	Initial herbicide application	Within construction limits
August/September 2026	Follow-up herbicide application	Within construction limits

* Fall is assumed to include September to October, spring is assumed to include the start of the growing season through mid-June, and summer is assumed to include mid-June through August. See Table 1 for species-specific management windows.

4 SUMMARY

SWCA will work closely with MassDOT and Onyx Corporation to manage invasive plants annually (or as needed) through the end of the construction period, which is planned to be Fall 2026. Initial methods of management include mechanical clearing, and follow-up methods include a combination of chemical and manual/mechanical management techniques. SWCA will conduct herbicide application to all invasive plants observed on-site during all follow-up management events, as detailed in Section 3 of this IPMS. SWCA will submit MassDOT Herbicide Use Reports within 2 weeks of any management event.

Full inspections will be conducted by SWCA during or immediately after the final management event of each year. Results of each inspection will determine the precise invasive plant management plan for the following year. However, the management methods outlined in this IPMS include the approved methods from which annual plans will be determined. A brief report will be submitted to Onyx Corporation and MassDOT upon request by the landscape architect, describing the state of invasive plant management and the precise plan for the upcoming management season. This report will include a marked-up figure (if requested) depicting the locations of invasive plant management and will detail the state of invasive plant presence in each treatment area. The goal for this invasive plant management plan is to reduce the cover of invasive plants within the construction limits of the project by 85% of their existing (preconstruction) footprint. General progress toward this goal will be reported in each annual summary report.

APPENDIX A

Invasive Plant Locations Map

HIGHWAY GUARD DETAILS

NONE

TRAFFIC SIGNAL CONDUIT

NONE

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#-#

NOTES:

1. ALL EXISTING GRANITE CURB WITHIN PROJECT LIMITS SHALL BE REMOVED & DISCARDED UNLESS OTHERWISE NOTED ON THE PLAN.
2. FOR GUARDRAIL DETAILS REFER TO STANDARD DETAILS 400.1.2, 400.1.3, 400.1.4, 400.1.5, 400.1.6, AND 400.5.1
3. ALL PROPOSED GRANITE CURB SHALL BE TYPE VB.
4. PRIOR TO CONSTRUCTION ACTIVITIES, A SITE WALK SHALL BE CONDUCTED WITH CONTRACTOR, ENGINEER, AND LANDSCAPE ARCHITECT TO DETERMINE SELECTIVE CLEARING AND THINNING OF TREES.
5. ALL PROPOSED CLEARING AND GRUBBING IS SHOWN WITH THE PROPOSED SLOPE LINE UNLESS OTHERWISE SHOWN.
6. LOCATIONS WHERE CLASS A ROCK EXCAVATION IS ENCOUNTERED NEAR GAS LINES, CONTRACTOR MUST ALSO PROVIDE VIBRATION MONITORING. (ITEM 757.)

LITTLETON

RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	9	128
	PROJECT FILE NO.	609054	

CONSTRUCTION PLANS

Plotted on 27-Mar-2024 9:58 AM 20170044A21_HPN01.DWG

High Density Japanese knotweed, not likely to be eradicated.

<u>Invasive Management limits are outlined in red.</u>

Low density bittersweet and multiflora rose

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF CONCORD ASSOCIATES FOSTER STREET TRUST BK/PG 14680/362 PLAN NO 1314 OF 1981 PARCEL #R09 33 0 300 FOSTER STREET

FOR PROFILE: SEE SHEET NO. 17

0 20 50 100

SCALE: 1" = 20'

* **<u>Invasive population outside of temporary easement. Not to be treated</u>**

** **<u>Invasive population begins within easement but extends outside. Treatment will only occur within easement.</u>**

<u>Percent Cover of Invasives</u>

- 🟩 Green: 0-5%
- 🟨 Yellow: 6-25%
- 🟧 Orange: 26-75%
- 🟥 Red: 76-100%

HIGHWAY GUARD DETAILS

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 9+46 LT TO TANGENT END STA 10+84 LT

TRAFFIC SIGNAL CONDUIT

NONE

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

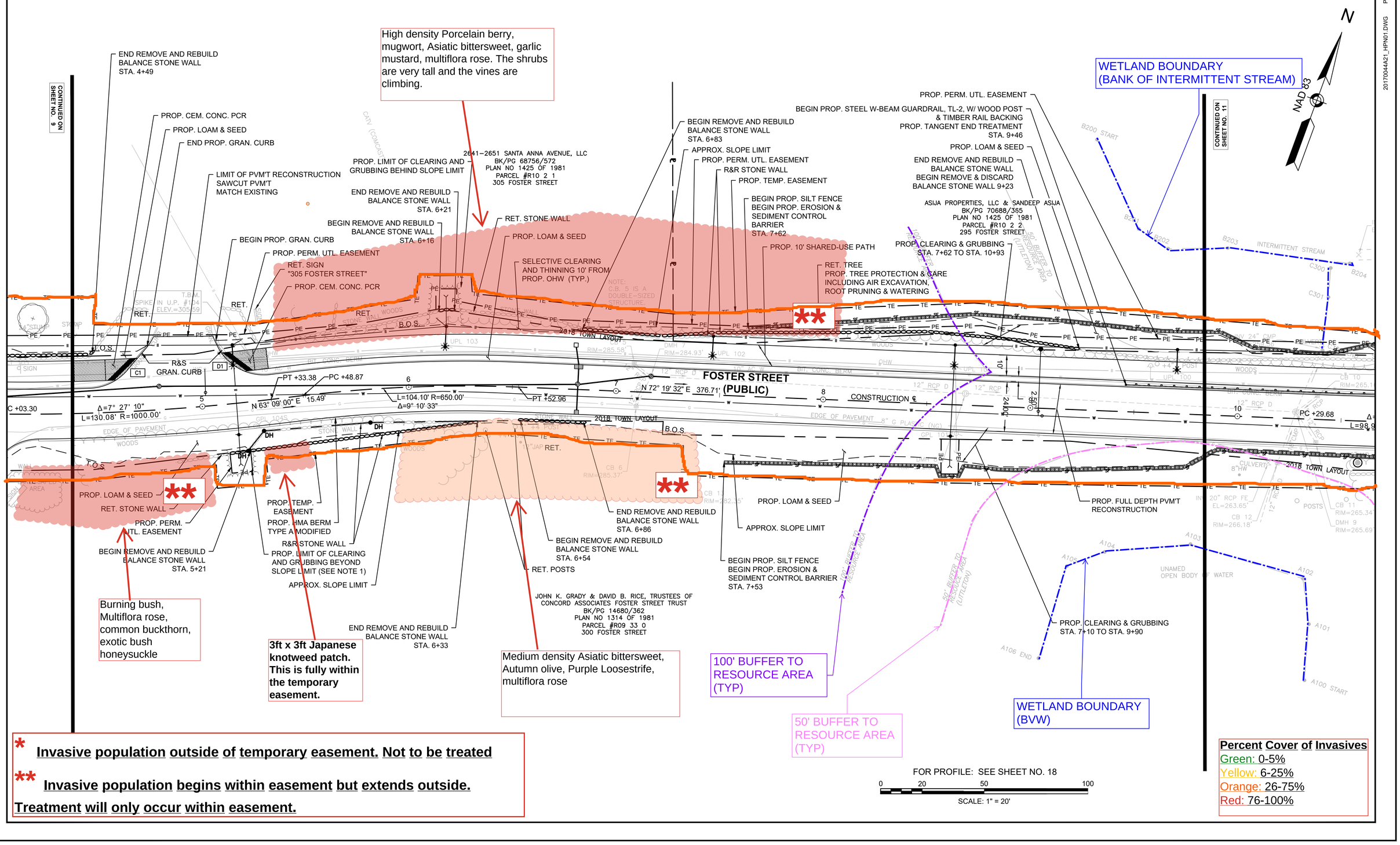
PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	10	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS



* **Invasive population outside of temporary easement. Not to be treated**

** **Invasive population begins within easement but extends outside. Treatment will only occur within easement.**

FOR PROFILE: SEE SHEET NO. 18

0 20 50 100

SCALE: 1" = 20'

Percent Cover of Invasives
Green: 0-5%
Yellow: 6-25%
Orange: 26-75%
Red: 76-100%

HIGHWAY GUARD DETAILS

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 9+46 LT TO TANGENT END STA 10+84 LT

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 11+83 LT TO TANGENT END STA 17+28 LT

TRAFFIC SIGNAL CONDUIT

NONE

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	11	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS

N

NAD 83

WETLAND BOUNDARY (BANK OF INTERMITTENT STREAM)

Dense Asiatic bittersweet and multiflora rose.

Norway maple

Medium density glossy buckthorn and Asiatic bittersweet. Scattered plants.

WETLAND BOUNDARY (BVW)

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70688/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

CONTINUED ON SHEET NO. 10

CONTINUED ON SHEET NO. 12

END PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST
PROP. TANGENT END TREATMENT & TIMBER RAIL BACKING
STA. 10+84

PROP. PERM. UTL. EASEMENT

PRIVATE SIGN TO BE RELOCATED BY OWNER

PROP. TEMP. EASEMENT

PROP. PVM'T MILLING MULCH BENEATH GUARDRAIL (TYP., SEE TYP. SECTIONS)

PROP. LOAM & SEED

PROP. CLEARING & GRUBBING STA. 7+62 TO STA. 10+93

R&D EXIST. STONE WALL

END R&D STONE WALL AT TOWN LAYOUT LINE STA. 10+93

END PROP. SILT FENCE
END PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 10+95

RET. STONE WALL

PROP. CEM. CONC. PCR

RET. SIGN

END PROP. GRAN. CURB

LIMIT OF PVM'T RECONSTRUCTION SAWCUT PVM'T MATCH EXISTING

RET. SIGN "295 FOSTER STREET"

BEGIN PROP. GRAN. CURB (MATCH EXIST. BIT. BERM)

RET. STONE WALL

BEGIN PROP. SILT FENCE
BEGIN PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 11+77

BEGIN PROP. TIMBER RAIL FENCE STA. 11+77

PROP. CEM. CONC. PCR

BEGIN PROP. STEEL W-BEAM GUARDRAIL, TL-2,W/ WOOD POST & TIMBER RAIL BACKING
PROP. TANGENT END TREAMENT
STA. 11+83

RET. TREE
PROP. TREE PROTECTION & CARE INCLUDING AIR EXCAVATION, ROOT PRUNING & WATERING

BEGIN REMOVE AND REBUILD BALANCE STONE WALL STA. 11+93

PROP. PERM. UTL. EASEMENT

REM. TREE

PROP. LOAM & SEED

PROP. CLEARING & GRUBBING (STA. 11+77 TO STA. 19+05)

PROP. PVM'T MILLING MULCH BENEATH GUARDRAIL (TYP., SEE TYP. SECTIONS)

TREE TRIMMING 10' FROM PROP. OHW (TYP.)
STA. 11+70 TO 13+60

PROP. 10' SHARED-USE PATH

END PROP. TIMBER RAIL FENCE STA. 14+61

BEGIN REMOVE AND REBUILD BALANCE STONE WALL STA. 14+58

R&D PORTION OF EXIST. STONE WALL IN FRONT OF PROP. FENCE

PROP. PERM. UTL. EASEMENT

R&D ROW OF BOULDERS

SEE UTL PLAN

END REMOVE AND REBUILD BALANCE STONE WALL STA 14+08

PROP. LIMIT OF CLEARING AND GRUBBING BEHIND SLOPE LIMIT

SEE UTL PLAN

PROP. PERM. UTL. EASEMENT

R&R STONE WALL

APPROX. SLOPE LIMIT

PROP. FULL DEPTH PVM'T RECONSTRUCTION

FOSTER STREET (PUBLIC)

PC +29.68 | Δ=1° 25' 01" | L=98.93' R=4000.00' | PT +28.61

PC +80.50

N 70° 54' 31" E 151.90'

CONSTRUCTION ℄

RET. BERM

SAWCUT PVM'T

PROP. HMA BERM TYPE A MODIFIED

PROP. CLEARING & GRUBBING

PROP. LOAM & SEED

RET. STONE WALL

APPROX. SLOPE LIMIT

PROP. TEMP. EASEMENT

PROP. LIMIT OF CLEARING AND GRUBBING BEHIND SLOPE LIMIT

PROP. CLEARING & GRUBBING

RET. STONE WALLS

END HMA BERM TYPE A MODIFIED

PROP. HMA DRIVEWAY

Δ=35° 26' 20" L=315.49' R=510.00'

2018 TOWN LAYOUT

2015 TOWN LAYOUT

WETLAND BOUNDARY (BVW)

* **Invasive population outside of temporary easement. Not to be treated**

** **Invasive population begins within easement but extends outside. Treatment will only occur within easement.**

Large Norway Maple

Medium high density of multiflora rose, mugwort and Asiatic bittersweet.

Small Japanese knotweed patch. 15ft x 5ft. Fully within easement.

Small Japanese knotweed patch. 5ft x 10ft. Fully within easement.

Medium high density of bush honeysuckle, garlic mustard, glossy buckthorn, common buckthorn, and Norway maple. Low density of purple loosestrife.

100' BUFFER TO RESOURCE AREA (TYP)

50' BUFFER TO RESOURCE AREA (TYP)

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZO
BK/PG 17691/108
PLAN NO 831 OF 1973
PARCEL #R09 5 0
290 FOSTER STREET

FOR PROFILE: SEE SHEET NO. 19

0 20 50 100
SCALE: 1" = 20'

Percent Cover of Invasives
Green: 0-5%
Yellow: 6-25%
Orange: 26-75%
Red: 76-100%

20170044A21_HPN01.DWG Plotted on 27-Mar-2024 9:59 AM

HIGHWAY GUARD DETAILS	TRAFFIC SIGNAL CONDUIT	WATER SUPPLY ALTERATIONS	DRAINAGE DETAILS
STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 11+94 TO TANGENT END STA 17+28	NONE	SEE SHEET 57-64	SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	12	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS

20170044A21_HPN01.DWG Plotted on 27-Mar-2024 9:59 AM

NAD 83

Medium density of Burning Bush, Japanese barberry, bush honeysuckle.

Medium high density of Asiastic bittersweet, glossy buckthorn, bush honeysuckle, and autumn olive.

Low density of Asiatic bittersweet and garlic mustard.

Medium density of Asiatic bittersweet and garlic mustard.

WETLAND BOUNDARY (BVW)

50' BUFFER TO RESOURCE AREA (TYP)

100' BUFFER TO RESOURCE AREA (TYP)

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70688/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

JORDAN S. MCCATHERIN
BK/PG 62917/52
PARCEL #R10 1 0
277 FOSTER STREET

GREGORY & SHERI BALZOTTI
BK/PG 50902/470
PLAN NO 831 OF 1973
PARCEL #R09 5 E
284 FOSTER ST

JOSEPH W. & AMANDA LENNON, LIVING TRUSTEES OF THE AMANDA+JOSEPH LENNON LIVING TRUST
BK/PG 64219/262
PLAN NO 1628 OF 1972
PARCEL #R09 5 A
3 BULKELEY ROAD

FOSTER STREET (PUBLIC)

BULKELEY ROAD (PUBLIC)

CONTINUED ON SHEET NO. 11

CONTINUED ON SHEET NO. 13

* **Invasive population outside of temporary easement. Not to be treated**

** **Invasive population begins within easement but extends outside. Treatment will only occur within easement.**

Percent Cover of Invasives
Green: 0-5%
Yellow: 6-25%
Orange: 26-75%
Red: 76-100%

HIGHWAY GUARD DETAILS

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 21+22 RT TO CONCRETE ABUTMENT STA 23+34 RT

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 23+26 LT TO TANGENT END STA 26+04 LT

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 24+52 RT TO TANGENT END STA 25+62 RT

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

TRAFFIC SIGNAL CONDUIT

NONE

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

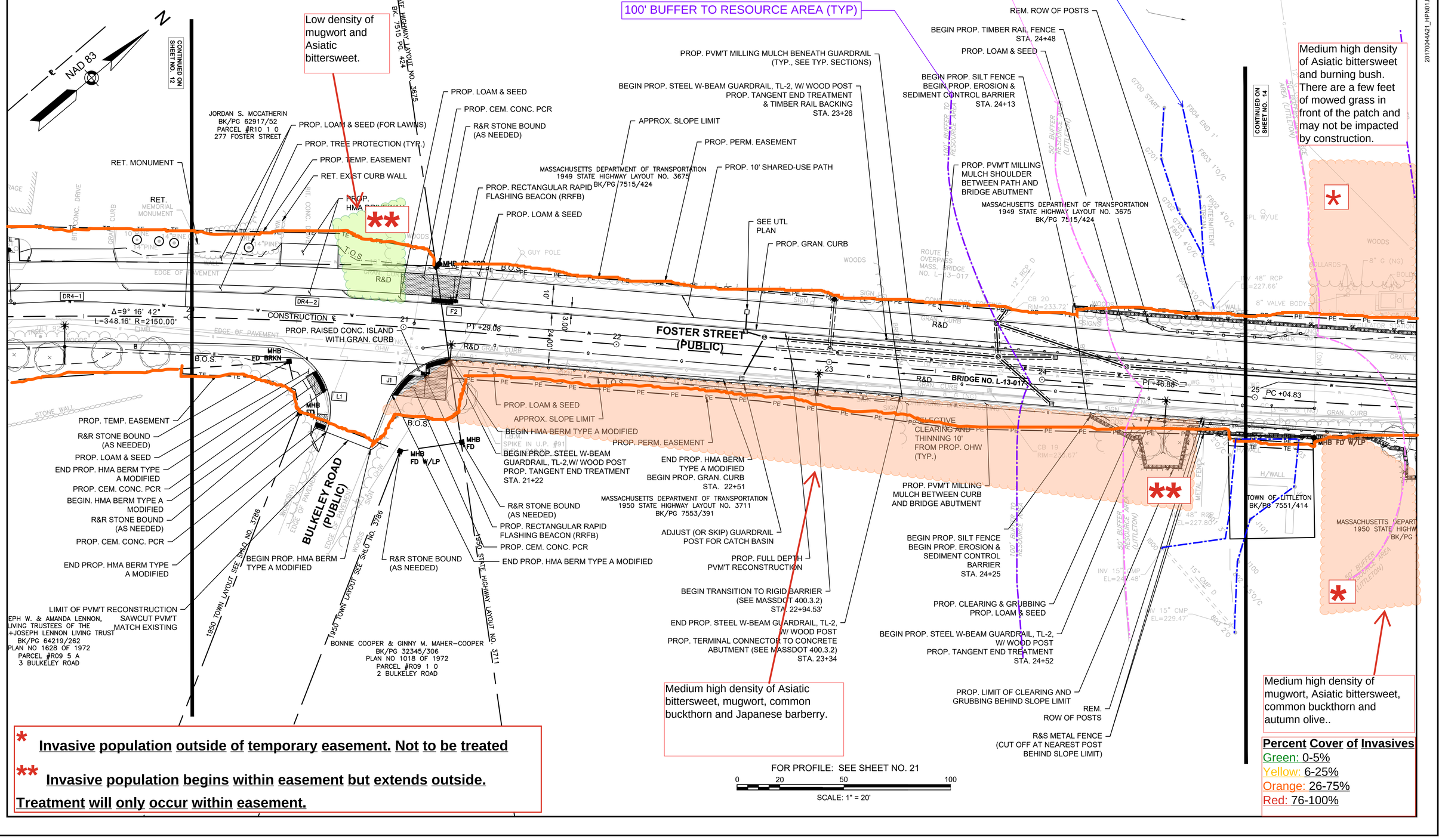
PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	13	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS

20170044A21_HPN01.DWG Plotted on 27-Mar-2024 9:59 AM



*** Invasive population outside of temporary easement. Not to be treated**

**** Invasive population begins within easement but extends outside. Treatment will only occur within easement.**

ATER SUPPLY ALTERATIONS
SEE SHEET 57-64
RAFFIC SIGNAL CONDUIT
NONE

DRAINAGE DETAILS
SEE SHEET NOS. 65-67

LEGEND:
PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#
PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	14	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS

Medium high density of Asiatic bittersweet and burning bush. There are a few feet of mowed grass in front of the patch and may not be impacted by construction.

50' BUFFER TO RESOURCE AREA (TYP)

100' BUFFER TO RESOURCE AREA (TYP)

Medium high density of Asiatic bittersweet. There are a few feet of mowed grass in front of the patch and may not be impacted by construction.

CONTINUED ON SHEET NO. 13

END PROP. STEEL W-BEAM GUARDRAIL, TL-2,W/ WOOD POST & TIMBER RAIL BACKING
PROP. TANGENT END TREATMENT
STA. 26+04

PROP. CEM. CONC. PCR

PROP. 10' SHARED-USE PATH

RET. GAS REGULATOR STATION & EXIST BOLLARDS

PROP. PVM'T MILLING MULCH BENEATH GUARDRAIL (TYP., SEE TYP. SECTIONS)

PROP. LOAM & SEED

RET. SIGN

RET.

APPROX. SLOPE LIMIT

SEE UTL PLAN

END PROP. TIMBER RAIL FENCE STA. 25+22

PROP. PERM. EASEMENT

REM. ROW OF POSTS

1949 STATE HIGHWAY LAYOUT NO. 3675 BK. 7515 PG. 424

VAF I 265 FOSTER LLC
BK/PG 80433/278
PLAN NO 266 OF 1987
PARCEL #R11 1 0
265 FOSTER STREET

END PROP. SILT FE
END PROP. EROSIO
STA. 26+14

END PROP. GRA
PROP. PERM
PROP. TEMP. EASEMENT

LIMIT OF PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING

BEGIN PROP. GRAN. CURB

RET. PRIVATE SIGN
"STONEYARD.COM"
"NEW ENGLAND STONE VENEER"
"BMS CAT"

PROP. CEM. CONC. PCR

RET. POLE
RET. PIPE
REM. HMA PVM'T & WALK
PROP. LOAM & SEED

PROP. CEM. CONC. PCR
END PROP. GRAN. CURB

SEE UTIL. PLAN

PROP. TEMP EASEMENT

NAD 83

JUNE 30, 1914 RAILROAD SIDELINE

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (f/ BOSTON & MAINE RAILROAD)

PROP. HMA PATH THROUGH RR
BEGIN PROP. GRAN. CURB

(MBTA)
BK/PG 13117/113
PARCEL #R11 2 0

UTIL. PLAN
OP. CEM. CONC. PCR
EGIN PROP. TIMBER FENCE
STA. 28+00
REMOVE HMA PVM'T & CEM. CONC. WALK

SAWCUT & MATCH EXIST.

END PROP. TIMBER FENCE STA. 28+52

RET.

2018 TOWN LAYOUT

MASSACHUSETTS BAY TRANSORTATION AUTHORITY
(PARCEL FBL 3-A)
BK/PG 57072/384
BK/PG 57072/376
PLAN NO 435 OF 2011
PARCEL #R11 3 5
263 FOSTER STREET

PROP. TEMP EASEMENT
PROP. LOAM & SEED
RETAIN CEM. CONC. WALK
SAWCUT & MATCH EXIST.
PROP. CEM. CONC. WALK
R&R PRIVATE SIGN (B.O.) "COMMUTER RAIL PARKING ONLY"
PROP. LOAM & SEED
PROP. CEM. CONC. PCR
END PROP. GRAN. CURB

MASSACHUSETTS BAY TRANSORTATI
(PARCEL FBL 3-B)
BK/PG 57072/384
BK/PG 57072/376
PLAN NO 435 OF 20
PARCEL #R11 3 5
263 FOSTER STREE

LIMIT OF FULL DEPTH PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING
BEGIN PROP. GRAN. CURB
PROP. LOAM & SEED
PROP. STONE FOR PIPE ENDS IN SWALE
PROP. CEM. CONC. PCR
PROP. TEMP EASEMENT
APPROX. SLOPE LIMIT

PT +46.88
PC +04.83
PT +57.06
CONSTRUCTION ℄
FOSTER STREET (PUBLIC)
B.O.S.
RET.
PROP. FULL DEPTH PVM'T RECONSTRUCTION
SAWCUT PVM'T LIMIT OF RECONSTRUCTION
PROP. CLEARING & GRUBBING APPROX. STA. 28+20 TO STA. 37+60
APPROX. SLOPE LIMIT
PROP. TREE (SEE LANDSCAPING PLAN) - TYP.
PROP. SILT FENCE
BEGIN PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST, DEEP POST
PROP. TANGENT END TREATMENT
STA. 28+49
R&R 5 MAILBOXES

END PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST
PROP. TANGENT END TREATMENT
STA. 25+62
REM. ROW OF POSTS
R&R STONE BOUND (AS NEEDED)
PROP. TREE (SEE LANDSCAPING PLAN) - TYP.
PROP. LIMIT OF CLEARING AND GRUBBING BEHIND SLOPE LIMIT

TOWN OF LITTLETON
BK/PG 7551/414

RET. POSTS
R&D
PROP. FULL DEPTH PVM'T RECONSTRUCTION

MASSACHUSETTS DEPARTMENT OF TRANSPORTATION
1950 STATE HIGHWAY LAYOUT NO. 3711
BK/PG 7553/391

R&R ROW OF BOULDERS TO PREVENT VEHICLE ACCESS TO GRAVEL LOT (2' OFFSET FROM BACK OF CURB)

END PROP. SILT FENCE
END PROP. EROSION & SEDIMENT CONTROL BARRIER
STA. 26+23

BEGIN PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST
PROP. TANGENT END TREATMENT
STA. 300+48

END PROP. HMA BERM TYPE A MODIFIED

R&D EXIST. GUARDRAIL (ALONG GRIMES LANE)

RET. EXIST. PAVED AREA

END PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST
PROP. TANGENT END TREATMENT
STA. 301+41

R&R EXIST. RAILROAD GATE (B.O.)
R&R EXIST. CONC. BARRIER
END PROP. HMA BERM TYPE A MODIFIED
STA. 27+14
RET. EXIST. HMA & R.R. TRACKS
BEGIN PROP. HMA BERM TYPE A MODIFIED
STA. 27+62
PROP. TEMP. EASEMENT
REM. EXIST. PAVEMENT
PROP. LOAM & SEED

1951 STATE HIGHWAY LAYOUT NO. 3711

(MBTA)
BK/PG 13117/113
PARCEL #R08 37 0

SAWCUT PVM'T

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (f/ BOSTON & MAINE RAILROAD)

GRIMES LANE (PUBLIC)

PT +65.58
301+95.23

RELOCATED RAILROAD GATE (SEE UTIL. PLAN)
PROP. LOAM & SEED
EDGE OF PAVEMENT
REM. TREE

PC +87.53

CONSTRUCTION ℄

CONTRACTOR TO STABILIZE EXISTING BOULDERS ALONG PVM'T EDGE (USE WORK ITEM. 691.01)
SUPPLEMENT BOULDERS WITH MODIFIED ROCK FILL AS NEEDED (ITEM 986.)
USE COMPOST FILL COVER AND SEED ITEM 765.490
APPROX. STA. 300+60 TO STA. 301+41

PROP. CLEARING & GRUBBING
PROP. TEMP. EASEMENT

BEGIN PROP. LAYOUT ALTERATION
PROP. GRAN. BOUND
LIMIT OF PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING
STA. 301+45

BEGIN PROP. SILT FENCE
BEGIN PROP. EROSION & SEDIMENT CONTROL BARRIER
STA. 301+65

LITTLETON AFFORDABLE HOUSING TRUST FUND
BK/PG 82357/132
PARCEL #R08 15 0
260 FOSTER STREET

END PROP. LAYOUT ALTERATION
PROP. GRAN. BOUND

STA 28+17.86 ALIGN_FOSTER
STA 300+00.00 ALIGN_GRIMES
N 3014325.4137 E 655545.0384

CONTINUED ON SHEET NO. 15

WETLAND BOUNDARY (BVW)

Medium density of Mugwort, Asiatic bittersweet, common buckthorn and autumn olive.

Medium density of common buckthorn, Asiatic bittersweet, purple loosestrife and multiflora rose.

Medium density of bush honeysuckle, mugwort, Asiatic bittersweet, purple loosestrife and leafy spurge.

WETLAND BOUNDARY (BANK OF INTERMITTENT STREAM)

Percent Cover of Invasives
Green: 0-5%
Yellow: 6-25%
Orange: 26-75%
Red: 76-100%

FOR PROFILE: SEE SHEET NO. 21, 22 & 24

0 20 50 100
SCALE: 1" = 20'

20170044A21_HPN01.DWG Plotted on 27-Mar-2024 9:59 AM

*** Invasive population outside of temporary easement. Not to be treated**

**** Invasive population begins within easement but extends outside. Treatment will only occur within easement.**

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

TRAFFIC SIGNAL CONDUIT

NONE

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	15	128
	PROJECT FILE NO.	609054	

CONSTRUCTION PLANS

20170044A21_HPN01.DWG Plotted on 27-Mar-2024 9:59 AM

NAD 83

N

CONTINUED ON SHEET NO. 14

CONTINUED ON SHEET NO. 16

MASSACHUSETTS BAY TRANSORTATION AUTHORITY (PARCEL FBL 3-A) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 2011 PARCEL #R11 3 5 263 FOSTER STREET

MASSACHUSETTS BAY TRANSORTATION AUTHORITY (PARCEL FBL 3-B) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 2011 PARCEL #R11 3 5 263 FOSTER STREET

SNS FOSTER, LLC & C/O ROBERT LONG BK/PG 72045/170 PLAN NO 435 OF 2011 PARCEL #R11 3 0 245 FOSTER STREET

LITTLETON AFFORDABLE HOUSING TRUST FUND BK/PG 82357/132 PARCEL #R08 15 0 260 FOSTER STREET

RICHARD B. VIGNONE BK/PG 13250/70 PLAN NO 847 OF 1969 PARCEL #R08 13 242 FOSTER STREET

FOSTER STREET (PUBLIC)

CONSTRUCTION ℄

R&R STONE BOUND (AS NEEDED)

BEGIN PROP. GRAN. CURB

LIMIT OF PVM'T RECONSTRUCTION SAWCUT PVM'T MATCH EXISTING

END PROP. GRAN. CURB

PROP. CEM. CONC. PCR

PROP. TEMP. EASEMENT

PROP. STONE FOR PIPE ENDS IN SWALE

PROP. MODIFIED ROCKFILL FOR SLOPES ADJENT TO SWALE WHERE 2:1 OR STEEPER

PROP. LOAM & SEED

R&D BOULDERS

PROP. STONE FOR PIPE ENDS IN SWALE

RET. CONC. PAD

PROP. TEMP. EASEMENT

R&D EXIST. GUARDRAIL

APPROX. SLOPE LIMIT

PROP. LOAM & SEED

PROP. TREE (SEE LANDSCAPING PLAN) - TYP.

PROP. FULL DEPTH PVM'T RECONSTRUCTION

BEGIN PROP. HMA BERM TYPE A MODIFIED

PROP. COMPOST FILL COVER & SEED OVER PROP. MODIFIED ROCKFILL WITH GEOTEXTILE FABRIC (ITEM 986) PROP. NEW ENGLAND ROADSIDE WET MEADOW SEED MIX

PROP. SILT FENCE

PROP. EROSION & SEDIMENT CONTROL BARRIER (TYP.)

APPROX. SLOPE LIMIT

PROP. CLEARING & GRUBBING STA. 28+20 TO STA. 37+60

END PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST, DEEP POST PROP. FLARED END TREATMENT (SEE NOTE) STA. 32+83

RET. STONE WALL

PROP. TEMP. EASEMENT

PROP. PERM. EASEMENT

PROP. CLEARING & GRUBBING STA. 32+40 TO S

APPROX. SLOPE LIMIT

SELECTIVE CLEARING AND THINNING 10' FROM PROP. OHW (TYP.)

PROP. 10' SHARED-USE PATH

PROP. LOAM & SEED

REM. TREE

RET. TREE

RET. POST

RET. STONE WALLS

R&R MAILBOX

PROP. LOAM & SEED (FOR LAWNS)

PROP. HMA DRIVEWAY

PROP. TEMP. EASEMENT

END PROP. SILT FENCE
END PROP. EROSION & SEDIMENT CONTROL BARRIER
STA. 33+84

RET. STONE WALL

PC +86.16

T.B.M. SPIKE IN U.P. ELEV.=266.98

2018 TOWN LAYOUT

100' BUFFER TO RESOURCE AREA

50' BUFFER TO RESOURCE AREA (LITTLETON)

50' BUFFER TO RESOURCE AREA

WETLAND BOUNDARY (BVW)

WETLAND BOUNDARY (BVW)

NOTE: NO RECORD OF WATER LINE NORTHEAST OF THIS HYDRANT. WATER LINE IS BELIEVED TO CONTINUE AND IS SHOWN SCHEMATICALLY FOR ILLUSTRATIVE PURPOSES ONLY.

NOTE: GAS LINE RECORDS NORTHEAST OF THIS VICINITY ARE SCHEMATIC AND ARE SHOWN SCHEMATICALLY, FOR ILLUSTRATIVE PURPOSES ONLY.

High density large patch of Japanese knotweed. Starts about 6 ft off of the road. The patch is at least 10 ft deep. This is unlikely to be eradicated within the boundaries of this project.

Medium density of Autumn olive and Asiatic bittersweet.

Medium high density patch of Japanese knotweed. 3ft x 15ft. Starts 6 ft off of the road.

Medium density of burning bush.

10ft x 10ft patch of Japanese knotweed. Fully within easement.

Medium high density of multiflora rose.

High density of Japanese knotweed. 20ft x 15ft patch.

Percent Cover of Invasives
Green: 0-5%
Yellow: 6-25%
Orange: 26-75%
Red: 76-100%

FOR PROFILE: SEE SHEET NO. 22 & 23

0 20 50 100

SCALE: 1" = 20'

*** Invasive population outside of temporary easement. Not to be treated**

**** Invasive population begins within easement but extends outside. Treatment will only occur within easement.**

WATER SUPPLY ALTERATIONS
SEE SHEET 57-64

DRAINAGE DETAILS
SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	16	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS

20170044A21_HPN01.DWG Plotted on 27-Mar-2024 9:59 AM

Low density of burning bush, garlic mustard, glossy buckthorn, common buckthorn, and Asiatic bittersweet.

NAD 83

PATRICIA A. NARGIZIAN
BK/PG 70735/467
PARCEL #R11 5 4
237 FOSTER STREET

CONTINUED ON SHEET NO. 15

PROP. LIMIT OF CLEARING AND GRUBBING BEHIND SLOPE LIMIT

PROP. CLASS A ROCK EXCAVATION IN ADVANCE OF U.P. INSTALLATION (AS ENCOUNTERED)

SNS FOSTER, LLC & C/O ROBERT LONG
BK/PG 72045/170
PLAN NO 435 OF 2011
PARCEL #R11 3 0
245 FOSTER STREET

PROP. GRAN. CURB

PROP. CLEARING & GRUBBING STA. 32+40 TO STA. 38+75

PROP. CEM. CONC. PCR

PROP. RECTANGULAR RAPID FLASHING BEACON (RRFB)

PROP. LOAM & SEED

PROP. 6' HMA BIKE RAMP (PAID FOR UNDER ITEM 702.)

END OF PROJECT
PROJ. NO. 609054
STA. 39+36.15
N 3015278.1762
E 656130.7752

NOTE: C.B. 34 IS A DOUBLE-SIZED STRUCTURE.

PROP. CLASS A ROCK EXCAVATION IN ADVANCE OF U.P. INSTALLATION (AS ENCOUNTERED)

Invasive Stockpile Location

PROP. LOAM & SEED

PROP. FULL DEPTH PVM'T RECONSTRUCTION

SELECTIVE CLEARING AND THINNING 10' FROM PROP. OHW (TYP.)

PROP. 10' SHARED-USE PATH

APPROX. SLOPE LIMIT

PROP. CLASS A ROCK EXCAVATION IN ADVANCE OF U.P. INSTALLATION (AS ENCOUNTERED)

NOTE: C.B. 32 IS A DOUBLE-SIZED STRUCTURE.

BEGIN PROP. GRAN. CURB

END PROP. GRAN. CURB

2018 TOWN LAYOUT

T.O.S.

B.O.S.

PC +06.15

Δ=9° 19' 15"
L=105.74' R=650.00'

PT +11.89
N 37° 31' 9" E 86.75'

39+98.64

FOSTER STREET (PUBLIC)

N 28° 12' 04" E

PT +90.37

Δ=3° 56' 00"
L=204.20' R=2974.57'

CONSTRUCTION ℄

PC +86.16

2018 TOWN LAYOUT

PROP. CLEARING & GRUBBING STA. 28+20 TO STA. 37+60

LIMIT OF PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING

END PROP. HMA BERM TYPE A MODIFIED

PROP. LOAM & SEED (FOR LAWNS)

BEGIN PROP. HMA BERM TYPE A MODIFIED

PROP. HMA DRIVEWAY

END PROP. GRAN. CURB

R&R MAILBOX

QUINN E. & JENNIFER A. CANFIELD
BK/PG 55588/290
PLAN NO 188 OF 1971
PARCEL #R08 13 D
238 FOSTER STREET

PROP. RECTANGULAR RAPID FLASHING BEACON (RRFB)

PROP. PERM. UTL. EASEMENT

PROP. CEM. CONC. PCR

PROP. LOAM & SEED (FOR LAWNS)

PROP. CEM. CONC. WALK

PROP. LOAM & SEED

BEGIN PROP. GRAN. CURB AND R&S EXIST. GRAN . CURB

PROP. TEMP. EASEMENT

LIMIT OF PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING

BALSAM LANE (PUBLIC)

2020 TOWN LAYOUT

RET. STONE WALL

BEGIN REMOVE AND REBUILD BALANCE STONE WALL STA. 35+19

PROP. TEMP. EASEMENT

PROP. LOAM & SEED

END REMOVE AND REBUILD BALANCE STONE WALL STA. 35+49

BEGIN PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST
PROP. TANGENT END TREAMENT (SEE NOTE)
STA. 35+90

RET. STONE WALL

NOTE: NO RECORD OF WATER LINE CONFIGURATION IN THIS AREA. WATER LINE IS SHOWN SCHEMATICALLY FOR ILLUSTRATIVE PURPOSES ONLY.

RICHARD B. VIGNONI
BK/PG 13250/70
PLAN NO 847 OF 1969
PARCEL #R08 13 E
242 FOSTER STREET

END PROP. STEEL W-BEAM GUARDRAIL , TL-2, BEGIN TRANSITION TO NCHRP 350 GUARDRAIL
STA. 36+86.

END TRANSITION TO NCHRP 350 GUARDRAIL
BEGIN RET. EXIST GUARDRAIL
STA. 37+20.

APPROX. SLOPE LIMIT

PROP. LOAM & SEED

BEGIN REMOVE AND REBUILD BALANCE STONE WALL STA. 37+28

END REMOVE AND REBUILD BALANCE STONE WALL STA. 37+40

RET. EXIST. GUARDRAIL

PROP. TEMP. EASEMENT

END PROP. HMA BERM TYPE A MODIFIED
BEGIN R&R GRAN. CURB
STA. 37+68

END R&R GRAN. CURB
BEGIN RET. GRAN. CURB

100' BUFFER TO RESOURCE AREA (TYP)

High density patch of Japanese knotweed. 15 ft x 5 ft. Likely able to be eradicated.

Low density of garlic mustard and multiflora rose.

Percent Cover of Invasives
Green: 0-5%
Yellow: 6-25%
Orange: 26-75%
Red: 76-100%

FOR PROFILE: SEE SHEET NO. 23

0 20 50 100
SCALE: 1" = 20'

APPENDIX B

Photographs

Photo Number: 1

Direction: SE

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Large Norway Maple

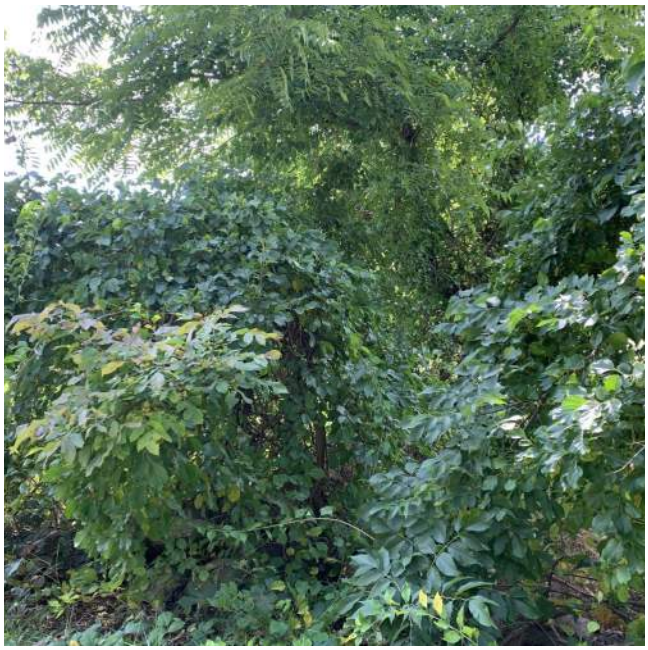


Photo Number: 2

Direction: SE

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Climbing Asiatic bittersweet.

Photo Number: 3

Direction: Down

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Small patch of Japanese knotweed near STA 5 + 50

Photo Number: 4

Direction: SE

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium density of multiflora rose, Asiatic bittersweet and autumn olive.

Photo Number: 5

Direction: SW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Large autumn olive shrub.

Photo Number: 6

Direction: SW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Large Japanese knotweed patch growing along Taylor Street.

Photo Number: 7

Direction: W

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Large Japanese knotweed patch growing along Taylor Street.

Photo Number: 8

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Low density of Asiatic bittersweet and garlic mustard by STA 6.

Photo Number: 9

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: High density of Asiatic bittersweet and buck-thorn by STA 6 +15.

Photo Number: 10

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: High density of climbing Asiatic bittersweet by STA 6 + 25.

Photo Number: 11

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: High density of Asiatic bittersweet extending past the project boundaries by STA 7.

Photo Number: 12

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: High density of climbing Asiatic bittersweet and porcelain berry between STA 7 and 8.

Photo Number: 13

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Close up of porcelain berry.

Photo Number: 14

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Close up of porcelain berry and multiflora rose.

Photo Number: 15

Direction: W

Photographer: Adriana Hughes

Date: 8.30.24

Comments: High density climbing Asiatic bittersweet.

Photo Number: 16

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium high density climbing Asiatic bittersweet.

Photo Number: 17

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: High density climbing Asiatic bittersweet.

Photo Number: 18

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium density Asiatic bittersweet and glossy buckthorn.

Photo Number: 19

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium density burning bush near STA 24 + 50.

Photo Number: 20

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: High density Japanese knotweed patch near STA 33.

Photo Number: 21

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium density Japanese knotweed near STA 34.

Photo Number: 22

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium density of glossy buckthorn and multiflora rose near STA 38.

Photo Number: 23

Direction: SE

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium density Japanese knotweed near STA 36.

Photo Number: 24

Direction: SE

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium density Japanese knotweed near STA 36.

Photo Number: 25

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium density garlic mustard, glossy buckthorn and bush honeysuckle near STA 38.

Photo Number: 26

Direction: W

Photographer: Adriana Hughes

Date: 8.30.24

Comments: High density Japanese knotweed patch.

Photo Number: 27

Direction: NW

Photographer: Adriana Hughes

Date: 8.30.24

Comments: Medium density garlic mustard, glossy buckthorn and bush honeysuckle extending outside the project boundaries near STA 38.

Photo Number: 28

Direction: SE

Photographer: Adriana Hughes

Date: 8.30.24

Comments: High density Japanese knotweed patch near STA 32 + 50.

APPENDIX C

MassDOT Herbicide Use Report Form

MassDOT Herbicide Use Report

Date Submitted:

Use multiple sheets for multiple application techniques or sites as needed.

[redacted]

Product Used:

Name: _____	Name: _____	Name: _____
EPA Reg. No: _____	EPA Reg. No: _____	EPA Reg. No: _____
% Active Ingredient	% Active Ingredient	% Active Ingredient
Dry: _____	Dry: _____	Dry: _____
Liquid: _____	Liquid: _____	Liquid: _____
Formulation (dilution rate): _____	Formulation (dilution rate): _____	Formulation (dilution rate): _____

[redacted]

Applicators:	**License Numbers:**
_____	_____
_____	_____
_____	_____
_____	_____

Upon completion, please submit form to MassDOT District Engineer and Landscape Design Section in Boston office.

11-16-2017

Revised Project Plans

MASSACHUSETTS DEPARTMENT OF TRANSPORTATION
HIGHWAY DIVISION

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	1	128
	PROJECT FILE NO.	609054	

TITLE SHEET & INDEX

PLAN AND PROFILE OF

FOSTER STREET

(BRIDGE NO. L-13-017)

IN THE TOWN OF

LITTLETON

MIDDLESEX COUNTY

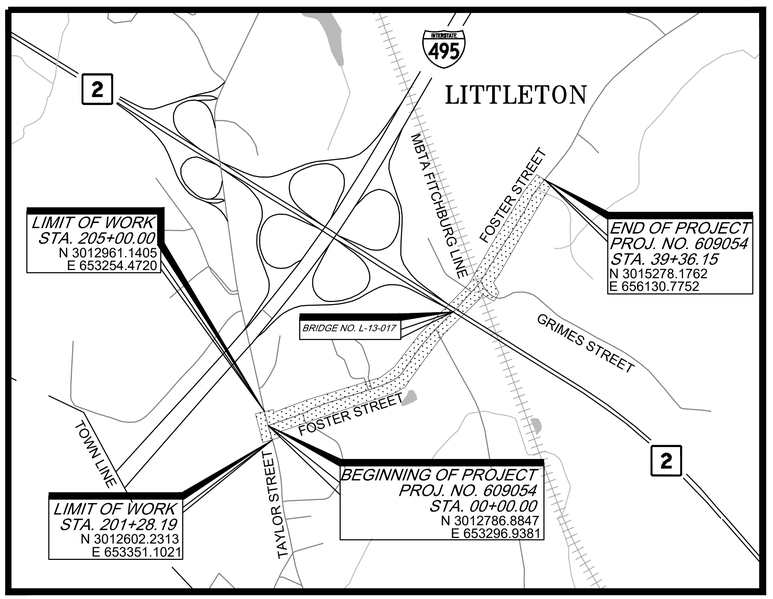
FEDERAL AID PROJECT NO. STP/CMQ/TAP-0033(037)X

PERMITTING PLAN SET

THESE PLANS ARE SUPPLEMENTED BY THE OCTOBER 2017 CONSTRUCTION STANDARD DETAILS, THE 2015 OVERHEAD SIGNAL STRUCTURE AND FOUNDATION STANDARD DRAWINGS, MASSDOT TRAFFIC MANAGEMENT PLANS AND DETAIL DRAWINGS, THE 1990 STANDARD DRAWINGS FOR SIGNS AND SUPPORTS, THE 1968 STANDARD DRAWINGS FOR TRAFFIC SIGNALS AND HIGHWAY LIGHTING, AND THE LATEST EDITION OF THE AMERICAN STANDARD FOR NURSERY STOCK.

INDEX

*NOT INCLUDED IN PERMITTING PLAN SET



750 0 750 1500
SCALE IN FEET

LENGTH OF PROJECT = 3936.15 FEET = 0.745 MILES
(FOSTER STREET)

DESIGN DESIGNATION (FOSTER STREET)

DESIGN SPEED	35 MPH
ADT (2017)	2,100
ADT (2037)	2,562
K	12%
D	69% (NB)
T (PEAK HOUR)	0.9%
T (AVERAGE DAY)	5.5%
DHV	252
DDHV	174 (NB)
FUNCTIONAL CLASSIFICATION	URBAN COLLECTOR

NOT FOR CONSTRUCTION

DATE	DESCRIPTION	REV #
4-29-2025	AMENDED OOC SUBMISION	
12-11-2023	NOI SUBMISSION	

COMMONWEALTH OF MASSACHUSETTS
DANIEL F. DELANY
CIVIL
NO. 48477
REGISTERED
PROFESSIONAL ENGINEER
5/22/2023

massDOT
Massachusetts Department of Transportation
Highway Division

APPROVED

CHIEF ENGINEER **DATE**

FUSS & O'NEILL
1550 MAIN STREET, SUITE 400
SPRINGFIELD, MA 01103
413.452.0445
www.fando.com

GENERAL SYMBOLS

EXISTING	PROPOSED	DESCRIPTION
JB	JB	JERSEY BARRIER ON BRIDGE OR JERSEY BARRIER
CB		CATCH BASIN
CBCI		CATCH BASIN CURB INLET
LB		LEACHING BASIN
DI		DROP INLET
CONC. HDR		CONCRETE HEADWALL
STONE HDR		STONE HEADWALL
FP		FLAG POLE
GP		GAS PUMP
MB		MAIL BOX
		POST SQUARE
		POST CIRCULAR
WELL		WELL
EHH		ELECTRIC HANDHOLE
		FENCE GATE POST
GG	GG	GAS GATE
BHL #	BHL #	BORING HOLE
MW #	MW #	MONITORING WELL
TP #	TP #	TEST PIT
		HYDRANT
		LIGHT POLE
CO.BD.		COUNTY BOUND
		GPS POINT
C		CABLE MANHOLE
D		DRAINAGE MANHOLE
E		ELECTRIC MANHOLE
G		GAS MANHOLE
M		MISC MANHOLE
S		SEWER MANHOLE
T		TELEPHONE MANHOLE
W		WATER MANHOLE
MHB	MHB	MASSACHUSETTS HIGHWAY BOUND
MON		MONUMENT
SB		STONE BOUND
TB		TOWN OR CITY BOUND
		TRAVERSE OR TRIANGULATION STATION
TPL or GUY		TROLLEY POLE OR GUY POLE
HTP		TRANSMISSION POLE
UFB		UTILITY POLE W/ FIREBOX
UPDL		UTILITY POLE WITH DOUBLE LIGHT
ULT		UTILITY POLE W / 1 LIGHT
UPL		UTILITY POLE
		BUSH
SIZE & TYPE		TREE
		STUMP
		SWAMP / MARSH
WF–#		WETLAND FLAG
WG	WG	WATER GATE
PM		PARKING METER
		OVERHEAD CABLE/WIRE
		CURBING
		CONTOURS
100 99		UNDERGROUND DRAIN PIPE (DOUBLE LINE 24 INCH AND OVER)
		UNDERGROUND ELECTRIC DUCT (DOUBLE LINE 24 INCH AND OVER)
		UNDERGROUND GAS MAIN (DOUBLE LINE 24 INCH AND OVER)
		UNDERGROUND SEWER MAIN (DOUBLE LINE 24 INCH AND OVER)
		UNDERGROUND TELEPHONE DUCT (DOUBLE LINE 24 INCH AND OVER)
		UNDERGROUND WATER MAIN (DOUBLE LINE 24 INCH AND OVER)
		BALANCE STONE WALL
		RETAINING WALL
		DOUBLE FACED WALL (CONCRETE OR MASONRY)
		GUARD RAIL - STEEL POSTS
		GUARD RAIL - WOOD POSTS
X	X	CHAIN LINK OR METAL FENCE
		WOOD FENCE (STOCKADE OR PICKET)
		WOOD RAIL FENCE
		EROSION CONTROL BARRIER
		TREE LINE OR LIMIT OF CLEARING AND GRUBBING
		SAWCUT LINE
		TOP OR BOTTOM OF SLOPE
		LIMIT OF EDGE OF PAVEMENT OR COLD PLANE AND OVERLAY
		BANK OF RIVER OR STREAM
		BORDER OF WETLAND
		100 FT WETLAND BUFFER
		200 FT RIVERFRONT BUFFER
		STATE HIGHWAY LAYOUT
		TOWN OR CITY LAYOUT
		COUNTY LAYOUT
		RAILROAD SIDELINE
		TOWN OR CITY BOUNDARY LINE
		PROPERTY LINE OR APPROXIMATE PROPERTY LINE
		EASEMENT

TRAFFIC SYMBOLS

EXISTING	PROPOSED	DESCRIPTION
1	1	CONTROLLER PHASE ACTUATED
		TRAFFIC SIGNAL HEAD (SIZE AS NOTED)
		WIRE LOOP DETECTOR (6' x 6' TYP UNLESS OTHERWISE SPECIFIED)
		VIDEO DETECTION CAMERA
		MICROWAVE DETECTOR
		PEDESTRIAN PUSH BUTTON, SIGN (DIRECTIONAL ARROW AS SHOWN) AND SADDLE
	*	EMERGENCY PREEMPTION CONFIRMATION STROBE LIGHT
		VEHICULAR SIGNAL HEAD
		VEHICULAR SIGNAL HEAD, OPTICALLY PROGRAMMED
		FLASHING BEACON
		PEDESTRIAN SIGNAL HEAD, (TYPE AS NOTED OR AS SPECIFIED)
RRSG	RRSG	RAILROAD SIGNAL
OR		SIGNAL POST AND BASE (ALPHA-NUMERIC DESIGNATION NOTED)
	20'	MAST ARM, SHAFT AND BASE (ARM LENGTH AS NOTED)
		HIGH MAST POLE OR TOWER
		SIGN AND POST
		SIGN AND POST (2 POSTS)
	20'	MAST ARM WITH LUMINAIRE
		OPTICAL PRE-EMPTION DETECTOR
		CONTROL CABINET, GROUND MOUNTED
		CONTROL CABINET, POLE MOUNTED
		FLASHING BEACON CONTROL AND METER PEDESTAL
		LOAD CENTER ASSEMBLY
		PULL BOX 12"x12" (OR AS NOTED)
		ELECTRIC HANDHOLE 12"x24" (OR AS NOTED)
		TRAFFIC SIGNAL CONDUIT

PAVEMENT MARKINGS SYMBOLS

EXISTING	PROPOSED	DESCRIPTION
		PAVEMENT ARROW - WHITE
ONLY	ONLY	LEGEND "ONLY" - WHITE
	SL	STOP LINE
	CW	CROSSWALK
	SWL	SOLID WHITE LINE
	SYL	SOLID YELLOW LINE
	BWL	BROKEN WHITE LINE
	BYL	BROKEN YELLOW LINE
	DWL	DOTTED WHITE LINE
	DYL	DOTTED YELLOW LINE
	DWLEx	DOTTED WHITE LINE EXTENSION
	DYLEx	DOTTED YELLOW LINE EXTENSION
	DBWL	DOUBLE WHITE LINE
	DBYL	DOUBLE YELLOW LINE

TRAFFIC SIGNAL ABBREVIATIONS

CAB.	CABINET
CCVE	CLOSED CIRCUIT VIDEO EQUIPMENT
DW	STEADY DON'T WALK
FDW	FLASHING DON'T WALK
FR	FLASHING CIRCULAR RED
FRL	FLASHING RED LEFT ARROW
FRR	FLASHING RED RIGHT ARROW
FY	FLASHING CIRCULAR AMBER
FYL	FLASHING AMBER LEFT ARROW
FYR	FLASHING AMBER RIGHT ARROW
G	STEADY CIRCULAR GREEN
GL	STEADY GREEN LEFT ARROW
GR	STEADY GREEN RIGHT ARROW
GSL	STEADY GREEN SLASH LEFT ARROW
GSR	STEADY GREEN SLASH RIGHT ARROW
GV	STEADY GREEN VERTICAL ARROW
OL	OVERLAP
PED	PEDESTRIAN
PTZ	PAN, TILE, ZOOM

TRAFFIC SIGNAL ABBREVIATIONS(cont.)

R	STEADY CIRCULAR RED
RL	STEADY RED LEFT ARROW
RR	STEADY RED RIGHT ARROW
TR SIG	TRAFFIC SIGNAL
TSC	TRAFFIC SIGNAL CONDUIT
W	STEADY WALK
Y	STEADY CIRCULAR AMBER
YL	STEADY AMBER LEFT ARROW

ABBREVIATIONS

GENERAL

AADT	ANNUAL AVERAGE DAILY TRAFFIC
ABAN	ABANDON
ADJ	ADJUST
APPROX.	APPROXIMATE
A.C.	ASPHALT CONCRETE
ACCM PIPE	ASPHALT COATED CORRUGATED METAL PIPE
BIT.	BITUMINOUS
BC	BOTTOM OF CURB
BD.	BOUND
BL	BASELINE
BLDG	BUILDING
BM	BENCHMARK
BO	BY OTHERS
BOS	BOTTOM OF SLOPE
BR.	BRIDGE
CB	CATCH BASIN
CBCI	CATCH BASIN WITH CURB INLET
CC	CEMENT CONCRETE
CCM	CEMENT CONCRETE MASONRY
CEM	CEMENT
CI	CURB INLET
CIP	CAST IRON PIPE
CLF	CHAIN LINK FENCE
CL	CENTERLINE
CMP	CORRUGATED METAL PIPE
CSP	CORRUGATED STEEL PIPE
CO.	COUNTY
CONC	CONCRETE
CONT	CONTINUOUS
CONST	CONSTRUCTION
CR GR	CROWN GRADE
DHV	DESIGN HOURLY VOLUME
DI	DROP INLET
DIA	DIAMETER
DIP	DUCTILE IRON PIPE
DW	STEADY DON'T WALK - PORTLAND ORANGE
DWY	DRIVEWAY
ELEV (or EL.)	ELEVATION
EMB	EMBANKMENT
EOP	EDGE OF PAVEMENT
EXIST (or EX)	EXISTING
EXC	EXCAVATION
F&C	FRAME AND COVER
F&G	FRAME AND GRATE
FDN.	FOUNDATION
FLDSTN	FIELDSTONE
GAR	GARAGE
GD	GROUND
GG	GAS GATE
GI	GUTTER INLET
GIP	GALVANIZED IRON PIPE
GRAN	GRANITE
GRAV	GRAVEL
GRD	GUARD
HDW	HEADWALL
HMA	HOT MIX ASPHALT
HOR	HORIZONTAL
HYD	HYDRANT
INV	INVERT
JCT	JUNCTION
L	LENGTH OF CURVE
LB	LEACH BASIN
LP	LIGHT POLE
LT	LEFT
MAX	MAXIMUM
MB	MAILBOX
MH	MANHOLE
MHB	MASSACHUSETTS HIGHWAY BOUND
MIN	MINIMUM
NIC	NOT IN CONTRACT
NO.	NUMBER
OHW	OVERHEAD WIRE
PC	POINT OF CURVATURE
PCC	POINT OF COMPOUND CURVATURE
P.G.L.	PROFILE GRADE LINE
PI	POINT OF INTERSECTION
POC	POINT ON CURVE
POT	POINT ON TANGENT
PRC	POINT OF REVERSE CURVATURE
PROJ	PROJECT
PROP	PROPOSED
PSB	PLANTABLE SOIL BORROW
PT	POINT OF TANGENCY
PVC	POINT OF VERTICAL CURVATURE
PVI	POINT OF VERTICAL INTERSECTION
PVT	POINT OF VERTICAL TANGENCY

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	2	128
PROJECT FILE NO.	609054		

LEGEND & GENERAL NOTES

GENERAL NOTES:

1. INFORMATION REGARDING THE LOCATION OF EXISTING UTILITIES HAS BEEN BASED UPON AVAILABLE INFORMATION AND MAY BE INCOMPLETE, AND WHERE SHOWN SHOULD BE CONSIDERED APPROXIMATE. NO GUARANTEE TO THE ACCURACY OF THE EXISTING UTILITIES FACILITIES SHOWN IN THIS PROJECT IS EXPRESSED OR IMPLIED UNLESS OTHERWISE NOTED. CONTRACTOR SHALL CONTACT "Mass DIG-SAFE", 1-888-344-7233. CONTRACTOR SHALL MAINTAIN MARKINGS WHERE NEEDED DURING PROJECT. ALL UTILITY LOCATIONS THAT DO NOT MATCH THE VERTICAL OR HORIZONTAL CONTROL SHOWN ON THE PLANS SHALL IMMEDIATELY BE BROUGHT TO THE ATTENTION OF THE ENGINEER FOR RESOLUTION. THE CONTRACTOR SHALL VERIFY LOCATIONS OF UTILITIES AND SERVICE LATERALS PRIOR TO CONSTRUCTION. ANY CONFLICTS WITH LOCATIONS OF LIGHT POLES, TREES, ETC. SHALL BE BROUGHT TO THE ATTENTION OF THE ENGINEER FOR RESOLUTION PRIOR TO CONSTRUCTION.
2. VERIZON UNDERGROUND TELEPHONE: THE PROPOSED UNDERGROUND TELEPHONE RELOCATIONS AS SHOWN ASSUMES INSUFFICIENT COVER DUE TO PROPOSED ROADWAY WORK. ACTUAL LIMITS OF PROPOSED UNDERGROUND TELEPHONE RELOCATIONS WILL BE DETERMINED IN THE FIELD BY TEST PITS. IF COVER CAN NOT BE ACHIEVED VERIZON PREFERS TO LOWER THE LINES IN PLACE.
3. THE CONTRACTOR IS RESPONSIBLE FOR OBTAINING ALL NECESSARY LOCAL AND STATE APPROVALS AND PERMITS PRIOR TO THE START OF CONSTRUCTION. THE CONTRACTOR SHALL CONFORM TO ALL REQUIREMENTS OF THE LOCAL AND STATE AGENCIES. THE CONTRACTOR SHALL OBTAIN AND PAY FOR ALL PERMITS AND FEES REQUIRED FOR THIS WORK INCLUDING BUT NOT LIMITED TO TOWN SIDEWALK AND EXCAVATION PERMITS AND ASSOCIATED BONDING.
4. THE CONTRACTOR SHALL PROTECT EXISTING UTILITIES AND STRUCTURES. THOSE OF WHICH HAVE BEEN DAMAGED SHALL BE PROMPTLY REPAIRED TO EXISTING OR BETTER CONDITION AT THE CONTRACTOR'S EXPENSE.
5. THE ROADWAY IS TO BE GRADED SMOOTHLY AND EVENLY IN ACCORDANCE WITH THE GRADING AND TIE PLANS, PROFILE, AND CROSS SECTIONS. THE CONTRACTOR IS RESPONSIBLE FOR INSURING A POSITIVE DRAINAGE FLOW TO ALL CATCH BASINS WITHOUT CREATING ANY FLAT SPOTS THAT WILL RESULT IN STANDING WATER.
6. THE CONTRACTOR SHALL COORDINATE WITH PROPERTY OWNERS TO REMOVE ANY PERSONAL ITEMS, PRIVATE SPRINKLER LINES/SYSTEMS, LANDSCAPING, PLANT BULBS, PAVERS LOCATED IN THE TEMPORARY EASEMENT, TOWN LAYOUT, AND MassDOT LAYOUT.
7. ANY PUBLIC OR PRIVATE PROPERTY DISTURBED AS A RESULT OF CONSTRUCTION OPERATIONS SHALL BE RESTORED AS QUICKLY AS POSSIBLE AND TO THE SATISFACTION OF THE ENGINEER.
8. RIM OR FRAME ELEVATIONS OF ALL UTILITY STRUCTURES SHALL BE ADJUSTED TO MEET FINISHED PAVED SURFACES. PRIVATE UTILITIES WHO ARE RESPONSIBLE FOR ADJUSTING THEIR OWN STRUCTURES SHALL BE NOTIFIED AT LEAST 2 WEEKS IN ADVANCE BY THE CONTRACTOR.
9. STAGING AREAS AND MATERIAL STOCK PILES SHALL BE LIMITED WITHIN THE SITE AND LOCATED SO AS NOT TO INTERFERE WITH PEDESTRIAN OR VEHICULAR TRAFFIC UNLESS APPROVED OTHERWISE BY THE MassDOT AND THE TOWN. THE CONTRACTOR SHALL PROVIDE SAFETY DEVICES (IF ORDERED BY THE ENGINEER) TO PROTECT STOCK PILES/WORK STAGING AREAS. IF THIS WORK IS SO ORDERED THERE WILL BE NO ADDITIONAL COMPENSATION MADE TO THE CONTRACTOR.
10. HOURS OF WORK SHALL BE DEFINED IN THE CONTRACT DOCUMENTS. THE MassDOT RESERVES THE RIGHT TO ADJUST THESE HOURS IN THE INTEREST OF PUBLIC SAFETY.
11. ACCESS TO PRIVATE PROPERTIES MUST BE MAINTAINED AT ALL TIMES. FOR SECURITY REASONS ALL PRIVATELY OWNED FENCING THAT IS TO BE REMOVED SHALL BE REPLACED WITHIN 72 HOURS OF REMOVAL.
12. INSTALL SEDIMENTATION AND EROSION CONTROL MEASURES PRIOR TO START OF CONSTRUCTION. EXISTING AND PROPOSED CATCH BASINS DOWNGRADE OF ALL WORK AREAS SHALL BE SURROUNDED BY EROSION CONTROL MEASURES DURING CONSTRUCTION.

ABBREVIATIONS (cont.)

GENERAL

PVMT	PAVEMENT
PWW	PAVED WATER WAY
R	RADIUS OF CURVATURE
R&D	REMOVE AND DISPOSE
RCP	REINFORCED CONCRETE PIPE
RD	ROAD
RDWY	ROADWAY
REM	REMOVE
RET	RETAIN
RET WALL	RETAINING WALL
ROW	RIGHT OF WAY
RR	RAILROAD
R&R	REMOVE AND RESET
R&S	REMOVE AND STACK
RT	RIGHT
SB	STONE BOUND
SHLD	SHOULDER
SMH	SEWER MANHOLE
ST	STREET
STA	STATION
SSD	STOPPING SIGHT DISTANCE
SHLO	STATE HIGHWAY LAYOUT LINE
SW	SIDEWALK
T	TANGENT DISTANCE OF CURVE/TRUCK %
TAN	TANGENT
TEMP	TEMPORARY
TC	TOP OF CURB
TOS	TOP OF SLOPE
TYP	TYPICAL
UP	UTILITY POLE

ABBREVIATIONS (cont.)

GENERAL

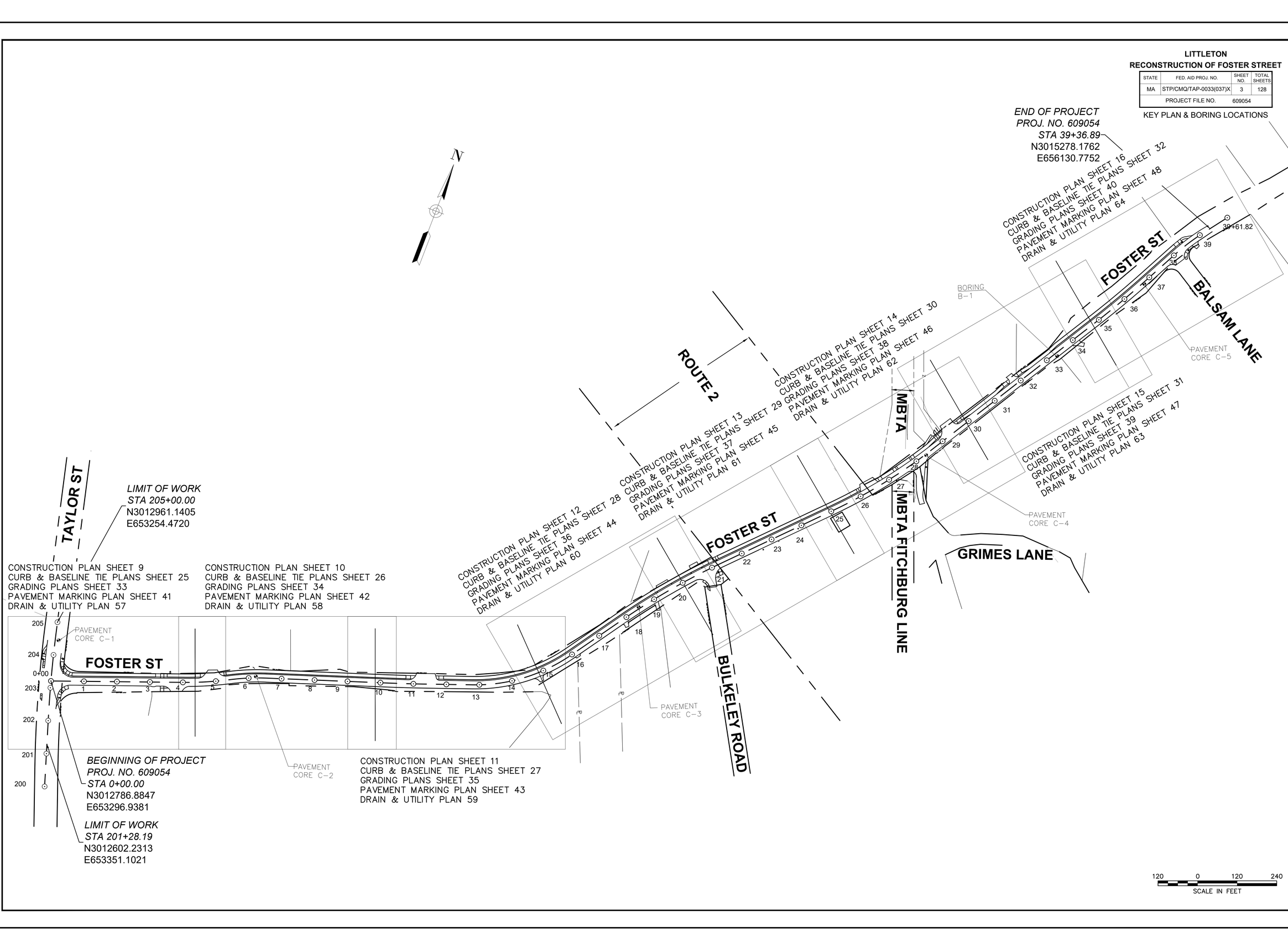
UP	UTILITY POLE
VAR	VARIES
VERT	VERTICAL
VC	VERTICAL CURVE
WCR	WHEEL CHAIR RAMP
WG	WATER GATE
WIP	WROUGHT IRON PIPE
WM	WATER METER/WATER MAIN
X-SECT	CROSS SECTION

20170044A21_GEN01.DWG Plotted on 21-Mar-2025 8:38 AM

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	3	128
	PROJECT FILE NO. 609054		

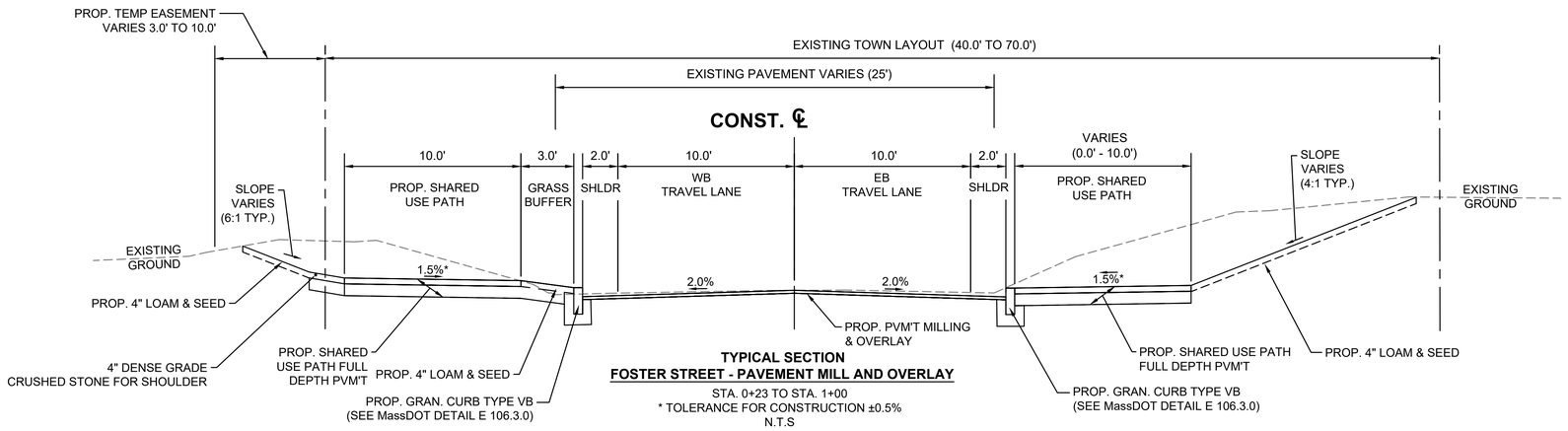
KEY PLAN & BORING LOCATIONS



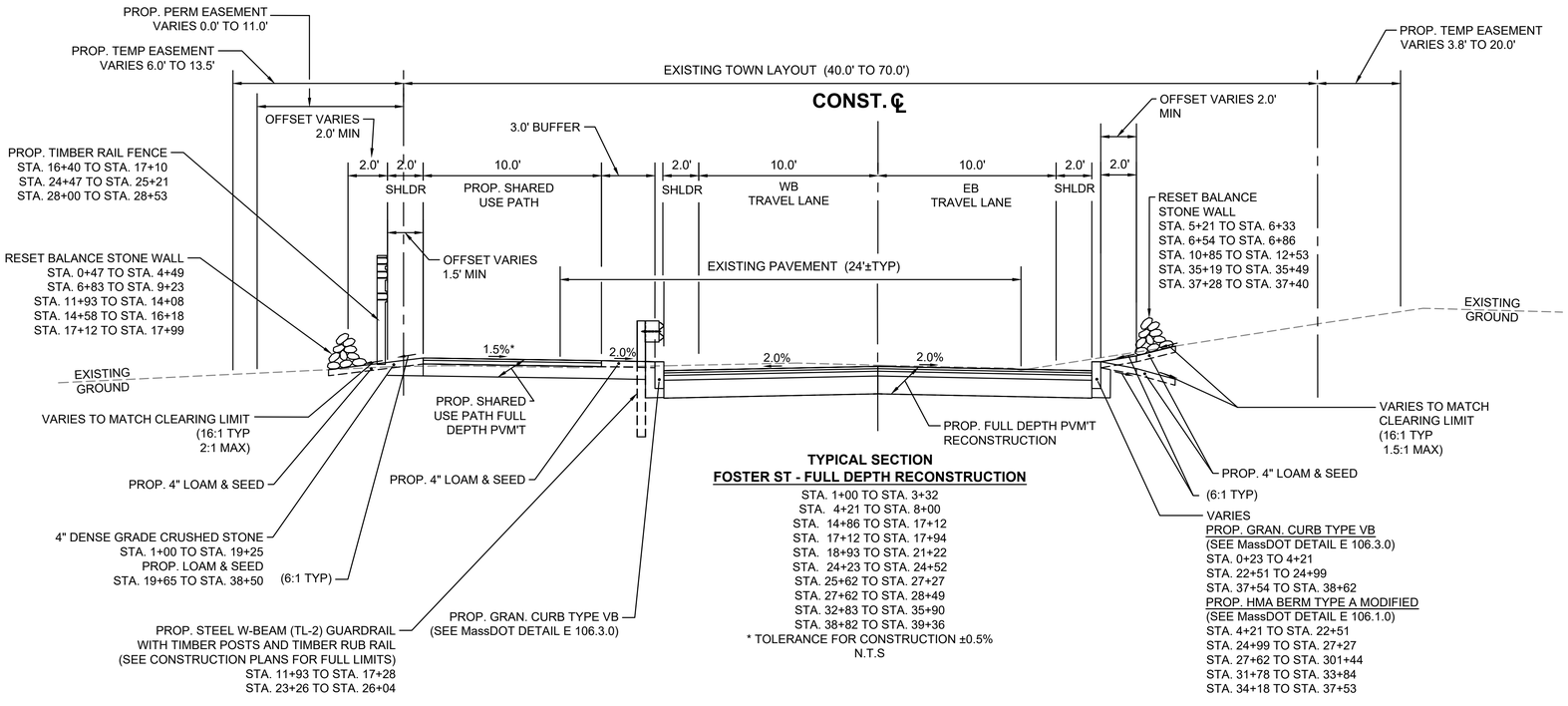
20170044A21_KEY01.DWG Plotted on 21-Mar-2025 8:45 AM

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	4	128
PROJECT FILE NO.	609054		

TYPICAL SECTIONS - FOSTER ST



TYPICAL SECTION
FOSTER STREET - PAVEMENT MILL AND OVERLAY
STA. 0+23 TO STA. 1+00
* TOLERANCE FOR CONSTRUCTION ±0.5%
N.T.S



TYPICAL SECTION
FOSTER ST - FULL DEPTH RECONSTRUCTION
STA. 1+00 TO STA. 3+32
STA. 4+21 TO STA. 8+00
STA. 14+86 TO STA. 17+12
STA. 17+12 TO STA. 17+94
STA. 18+93 TO STA. 21+22
STA. 24+23 TO STA. 24+52
STA. 25+62 TO STA. 27+27
STA. 27+62 TO STA. 28+49
STA. 32+83 TO STA. 35+90
STA. 38+82 TO STA. 39+36
* TOLERANCE FOR CONSTRUCTION ±0.5%
N.T.S

PAVEMENT NOTES:

PROPOSED PAVEMENT MILLING AND OVERLAY - FOSTER STREET

1-1/2" PAVEMENT FINE MILLING
1-1/2" SUPERPAVE SURFACE COURSE - 9.5
MILLING TO BE VARIABLE DEPTH (INCREASING) AT PROJECT LIMITS TO MEET EXISTING GRADE ON TAYLOR ST
MILLING TO BE VARIABLE DEPTH (DECREASING) AT SAWCUT TRANSITION ON FOSTER ST EAST OF BALSAM LN

PROPOSED FULL DEPTH PAVEMENT RECONSTRUCTION

SURFACE: 1-1/2" SUPERPAVE SURFACE COURSE - 9.5 (SSC - 9.5) OVER
INTERMEDIATE: 1-3/4" SUPERPAVE INTERMEDIATE COURSE - 12.5 OVER
3-1/2" SUPERPAVE INTERMEDIATE COURSE - 19.0 OVER
SUBBASE: 4" DENSE GRADED CRUSHED STONE
8 " GRAVEL BORROW, TYPE b

PROPOSED SHARED-USE PATH FULL DEPTH PAVEMENT

SURFACE: 1-1/2" SUPERPAVE SURFACE COURSE - 9.5 (SSC - 9.5) OVER
INTERMEDIATE: 2-1/2" SUPERPAVE INTERMEDIATE COURSE- 19.0 OVER
SUBBASE: 8" GRAVEL BORROW, TYPE b

PROPOSED HOT MIX ASPHALT SIDEWALK OR DRIVEWAY

SURFACE: 1-1/2" SUPERPAVE SURFACE COURSE - 9.5 (SSC - 9.5) OVER
2-1/2" SUPERPAVE INTERMEDIATE COURSE - 12.5 (SIC - 12.5)
FOUNDATION: 8" GRAVEL BORROW, TYPE b.

PROPOSED CEMENT CONCRETE SIDEWALK

SURFACE: 4" CEMENT CONCRETE
AIR ENTRAINED 4000psi, 3/4", 610
FOUNDATION: 8" GRAVEL BORROW, TYPE b.

PROPOSED CEMENT CONCRETE PEDESTRIAN CURB RAMP

SURFACE: 6" CEMENT CONCRETE
AIR ENTRAINED 4000psi, 3/4", 610
FOUNDATION: 8" GRAVEL BORROW, TYPE b.

NOTES: ASPHALT EMULSION FOR TACK COAT AND HMA JOINT SEALANT SHALL BE APPLIED PER SECTION 450 QA OF THE SPECIAL PROVISIONS.

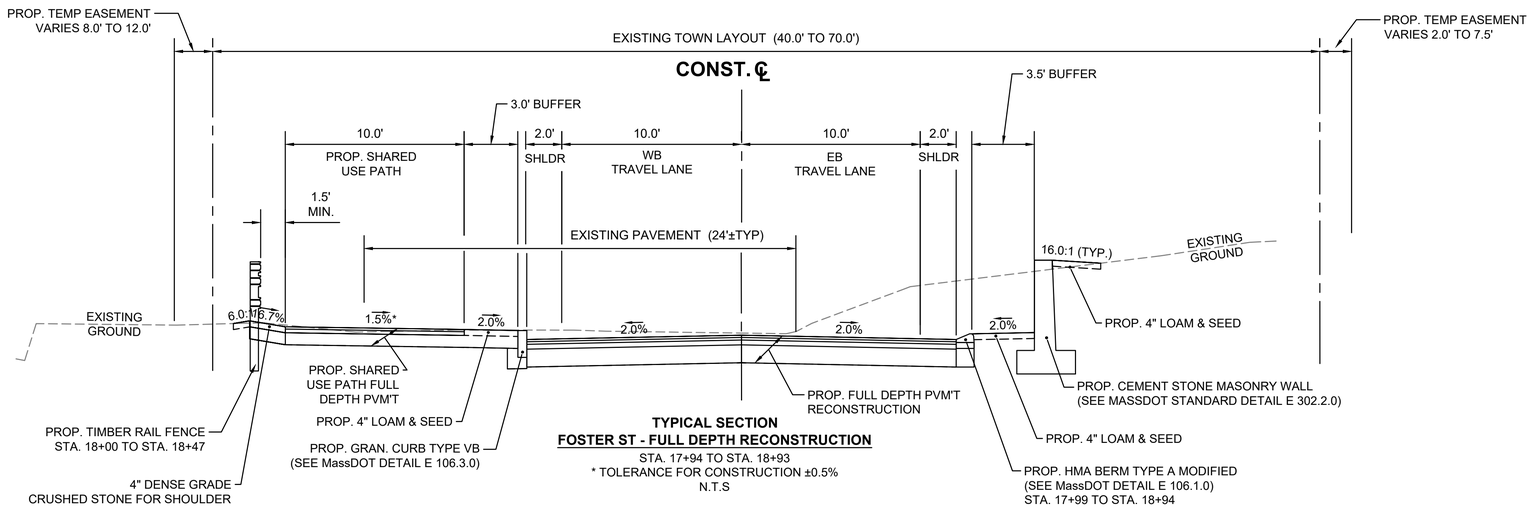
HMA FOR PATCHING SHALL BE USED FOR ALL PERMANENT, PARTIAL, AND FULL DEPTH PAVEMENT REPAIRS OF UNSOUND PAVEMENT PER SECTION 450 IN AREAS OUTSIDE OF PROPOSED FULL DEPTH RECLAMATION OR RECONSTRUCTION ROADWAY AREAS.

HMA FOR MISCELLANEOUS WORK SHALL BE USED FOR ALL TEMPORARY CONSTRUCTION, TAPER RAMPS, CURB CUT RAMPS, TEMPORARY TRENCH REPAIR, ETC.

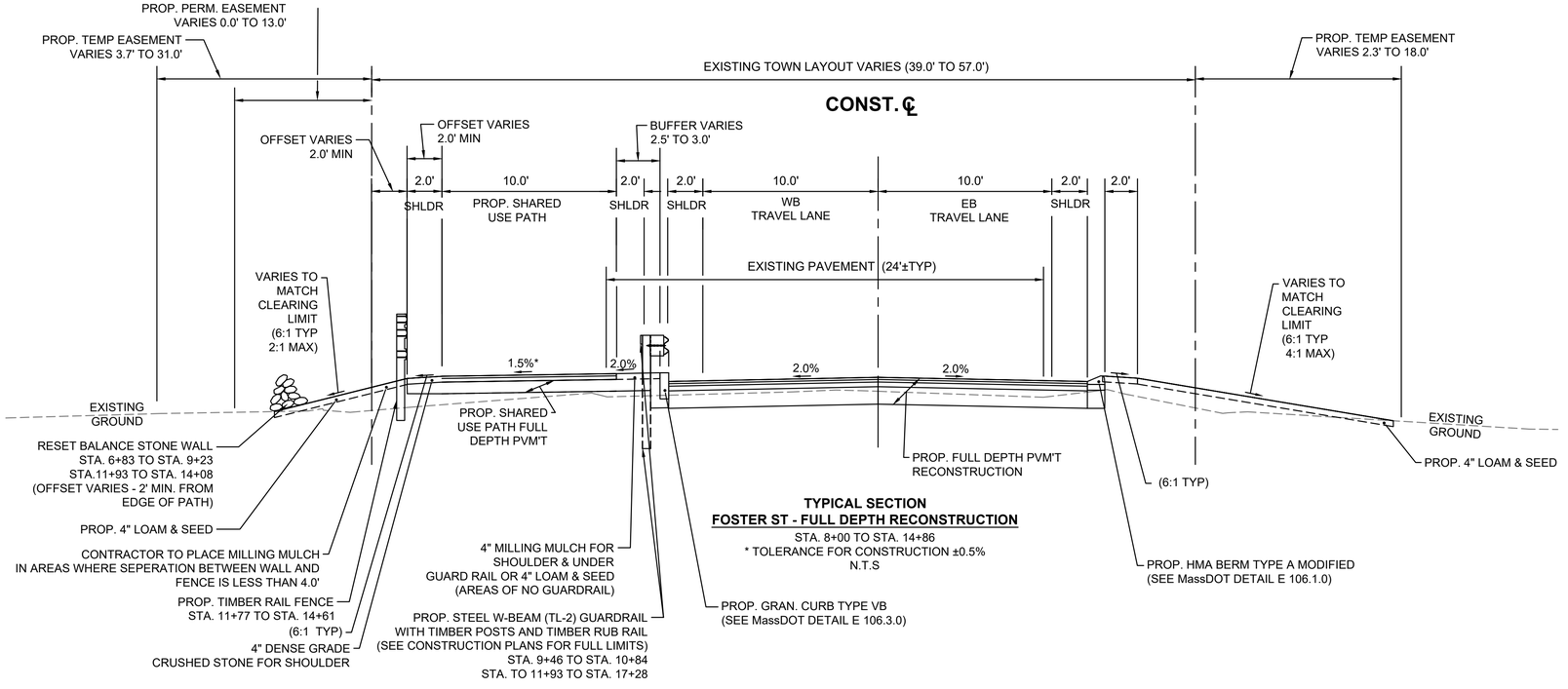
LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	5	128
PROJECT FILE NO.	609054		

TYPICAL SECTIONS - FOSTER ST



TYPICAL SECTION
FOSTER ST - FULL DEPTH RECONSTRUCTION
STA. 17+94 TO STA. 18+93
* TOLERANCE FOR CONSTRUCTION ±0.5%
N.T.S

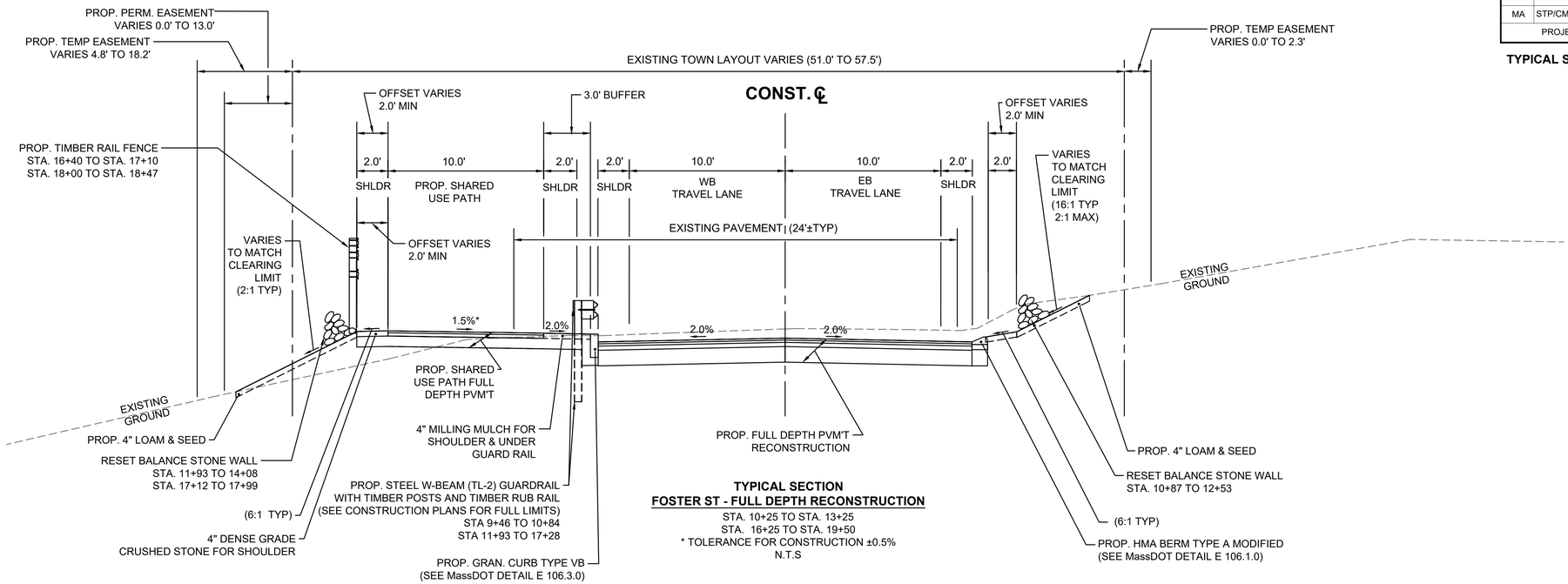


TYPICAL SECTION
FOSTER ST - FULL DEPTH RECONSTRUCTION
STA. 8+00 TO STA. 14+86
* TOLERANCE FOR CONSTRUCTION ±0.5%
N.T.S

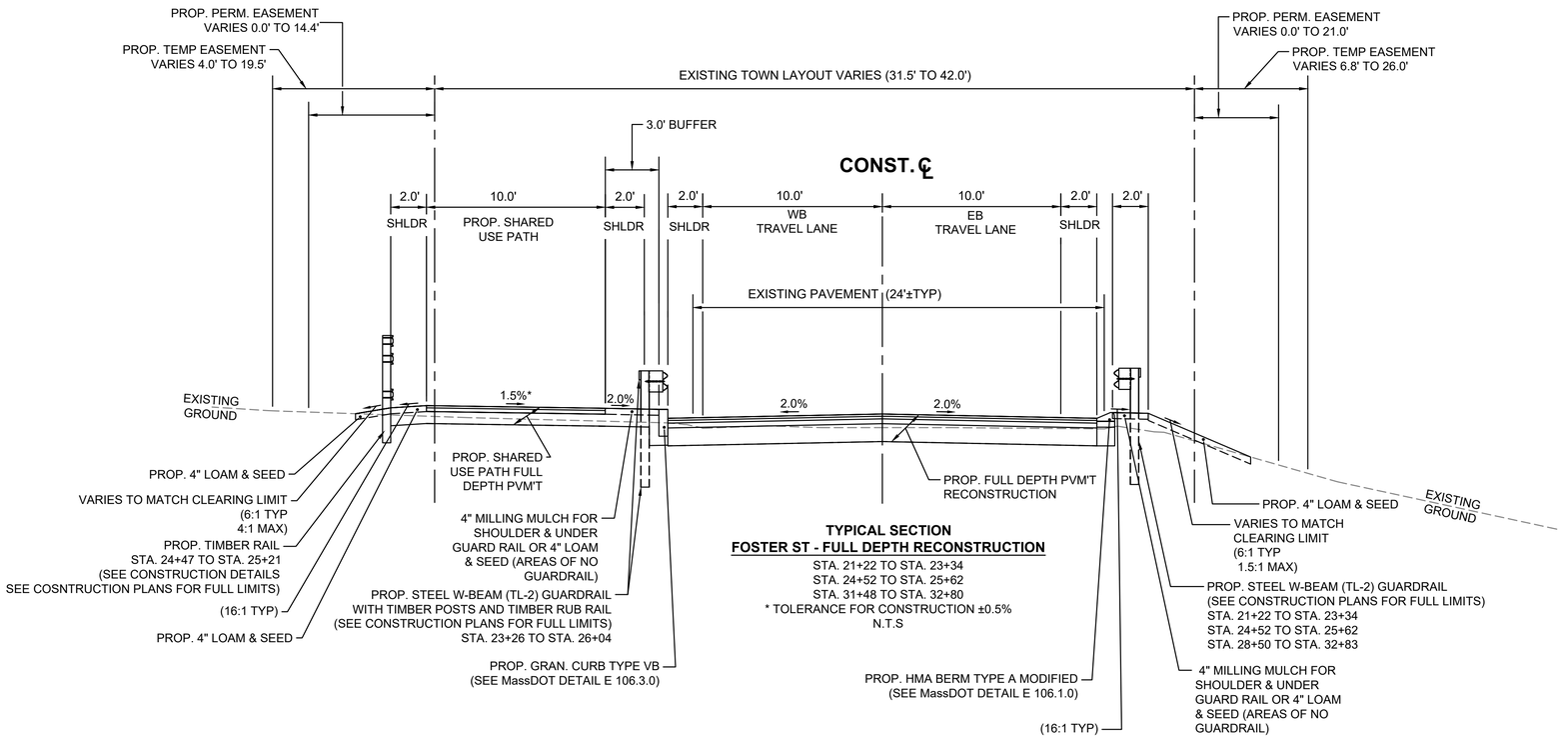
LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	6	128
PROJECT FILE NO.	609054		

TYPICAL SECTIONS - FOSTER ST



TYPICAL SECTION
FOSTER ST - FULL DEPTH RECONSTRUCTION
STA. 10+25 TO STA. 13+25
STA. 16+25 TO STA. 19+50
* TOLERANCE FOR CONSTRUCTION ±0.5%
N.T.S

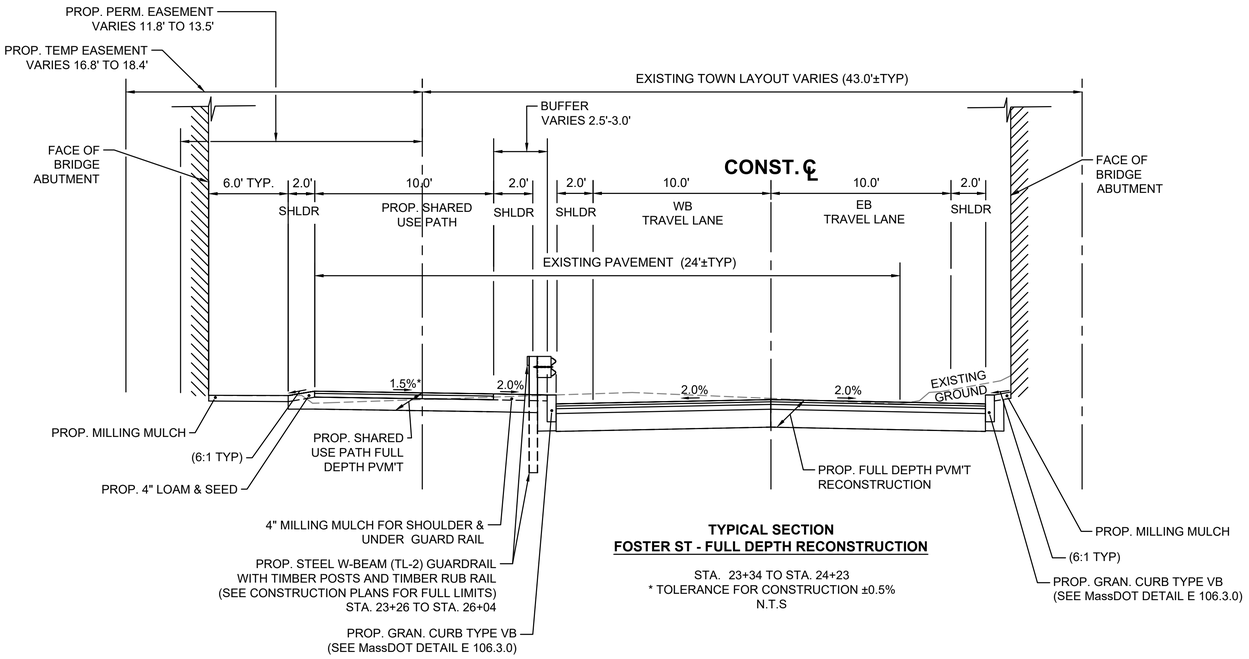


TYPICAL SECTION
FOSTER ST - FULL DEPTH RECONSTRUCTION
STA. 21+22 TO STA. 23+34
STA. 24+52 TO STA. 25+62
STA. 31+48 TO STA. 32+80
* TOLERANCE FOR CONSTRUCTION ±0.5%
N.T.S

LITTLETON
RECONSTRUCTION OF FOSTER STREET

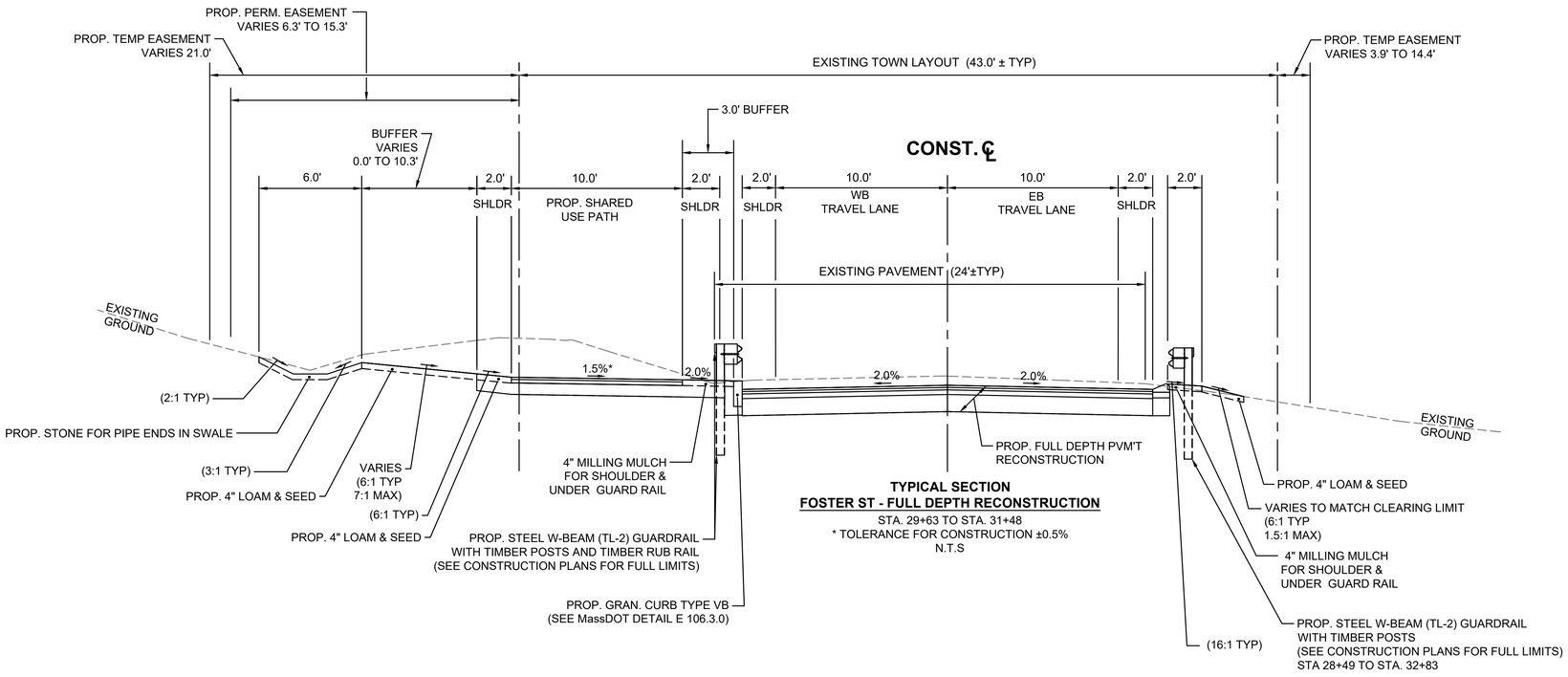
STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	7	128
PROJECT FILE NO.	609054		

TYPICAL SECTIONS - FOSTER ST



TYPICAL SECTION
FOSTER ST - FULL DEPTH RECONSTRUCTION

STA. 23+34 TO STA. 24+23
* TOLERANCE FOR CONSTRUCTION ±0.5%
N.T.S



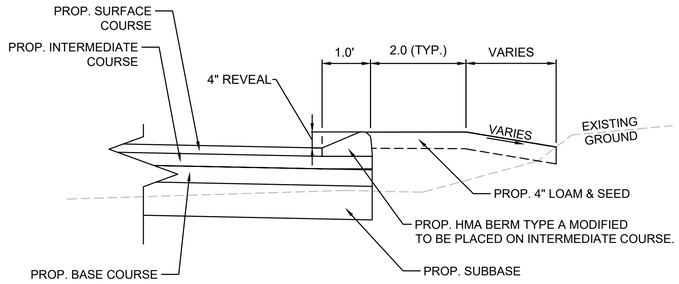
TYPICAL SECTION
FOSTER ST - FULL DEPTH RECONSTRUCTION

STA. 29+63 TO STA. 31+48
* TOLERANCE FOR CONSTRUCTION ±0.5%
N.T.S

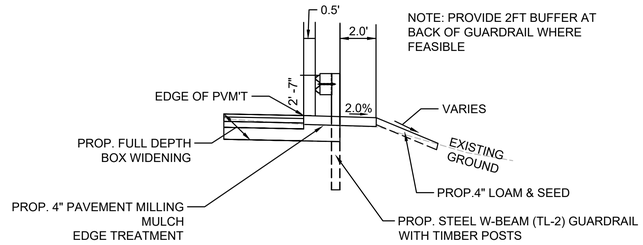
LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	8	128
PROJECT FILE NO.	609054		

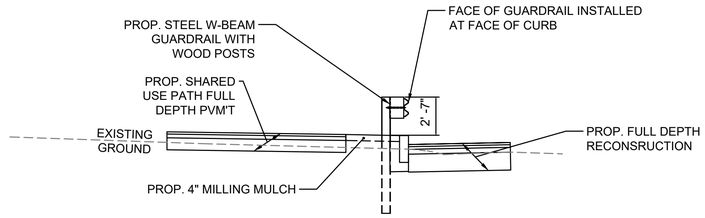
TYPICAL SECTIONS - FOSTER ST



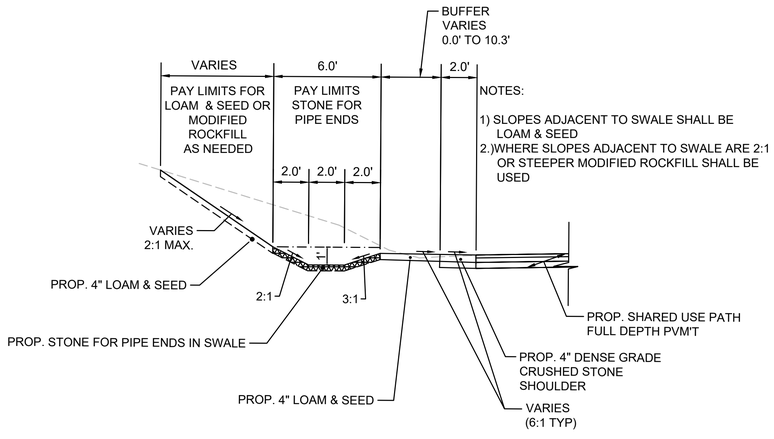
PROP. HMA BERM TYPE A MODIFIED PLACEMENT
SCALE: NTS



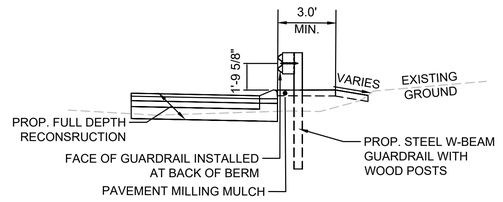
TYPICAL GUARDRAIL PLACEMENT
SCALE: NTS



TYPICAL GAURDRAIL PLACEMENT
AT GRANITE CURB TYPE VB
SCALE: NTS



GRASS SWALE WITH MODIFIED ROCK FILL
SCALE: NTS



TYPICAL GAURDRAIL PLACEMENT
AT HMA BERM TYPE A MODIFIED
SCALE: NTS

HIGHWAY GUARD DETAILS

NONE

TRAFFIC SIGNAL CONDUIT

NONE

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#–#

NOTES:

1. ALL EXISTING GRANITE CURB WITHIN PROJECT LIMITS SHALL BE REMOVED & DISCARDED UNLESS OTHERWISE NOTED ON THE PLAN.
2. FOR GUARDRAIL DETAILS REFER TO STANDARD DETAILS 400.1.2, 400.1.3, 400.1.4, 400.1.5, 400.1.6, AND 400.5.1
3. ALL PROPOSED GRANITE CURB SHALL BE TYPE VB.
4. PRIOR TO CONSTRUCTION ACTIVITIES, A SITE WALK SHALL BE CONDUCTED WITH CONTRACTOR, ENGINEER, AND LANDSCAPE ARCHITECT TO DETERMINE SELECTIVE CLEARING AND THINNING OF TREES.
5. ALL PROPOSED CLEARING AND GRUBBING IS SHOWN WITH THE PROPOSED SLOPE LINE UNLESS OTHERWISE SHOWN.
6. LOCATIONS WHERE CLASS A ROCK EXCAVATION IS ENCOUNTERED NEAR GAS LINES, CONTRACTOR MUST ALSO PROVIDE VIBRATION MONITORING. (ITEM 757.)

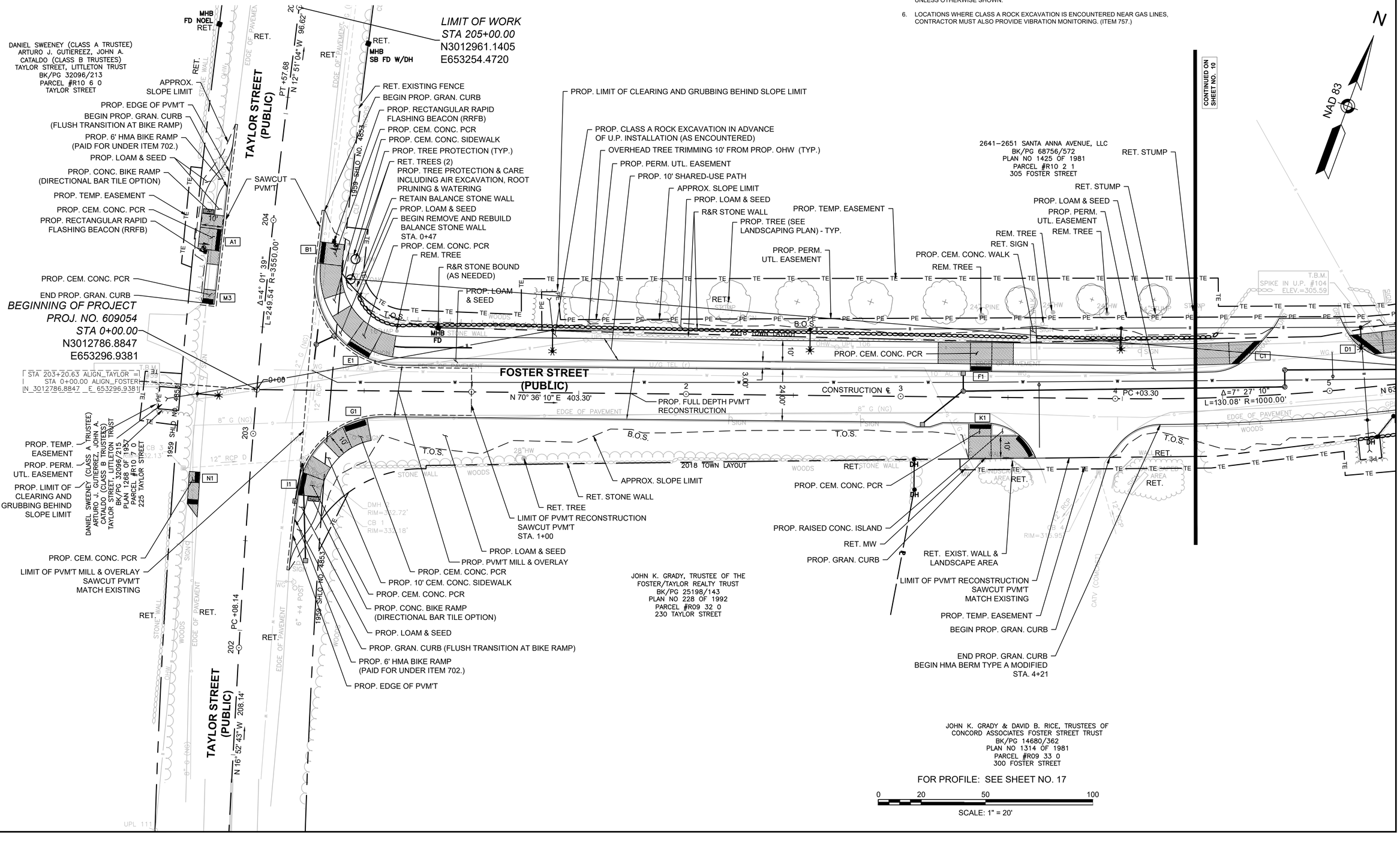
LITTLETON

RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	9	128

PROJECT FILE NO. 609054

CONSTRUCTION PLANS



20170044A21_HPN01_AMENDED_ORDER.DWG Plotted on 29-Apr-2025 3:02 PM

HIGHWAY GUARD DETAILS

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 9+46 LT TO TANGENT END STA 10+84 LT

TRAFFIC SIGNAL CONDUIT

NONE

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

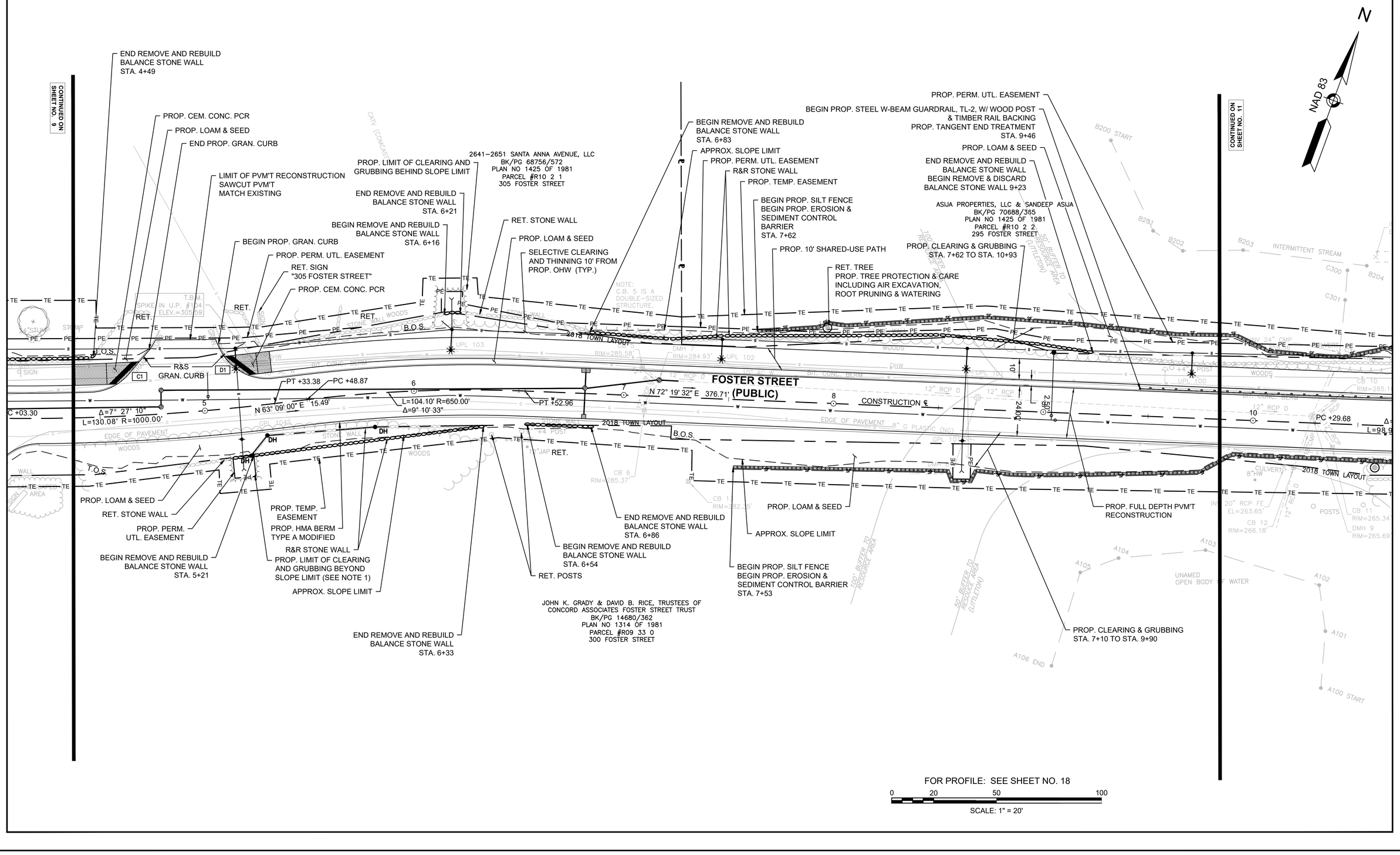
PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	10	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS



FOR PROFILE: SEE SHEET NO. 18

0 20 50 100

SCALE: 1" = 20'

HIGHWAY GUARD DETAILS

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 9+46 LT TO TANGENT END STA 10+84 LT

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 11+83 LT TO TANGENT END STA 17+28 LT

TRAFFIC SIGNAL CONDUIT

NONE

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

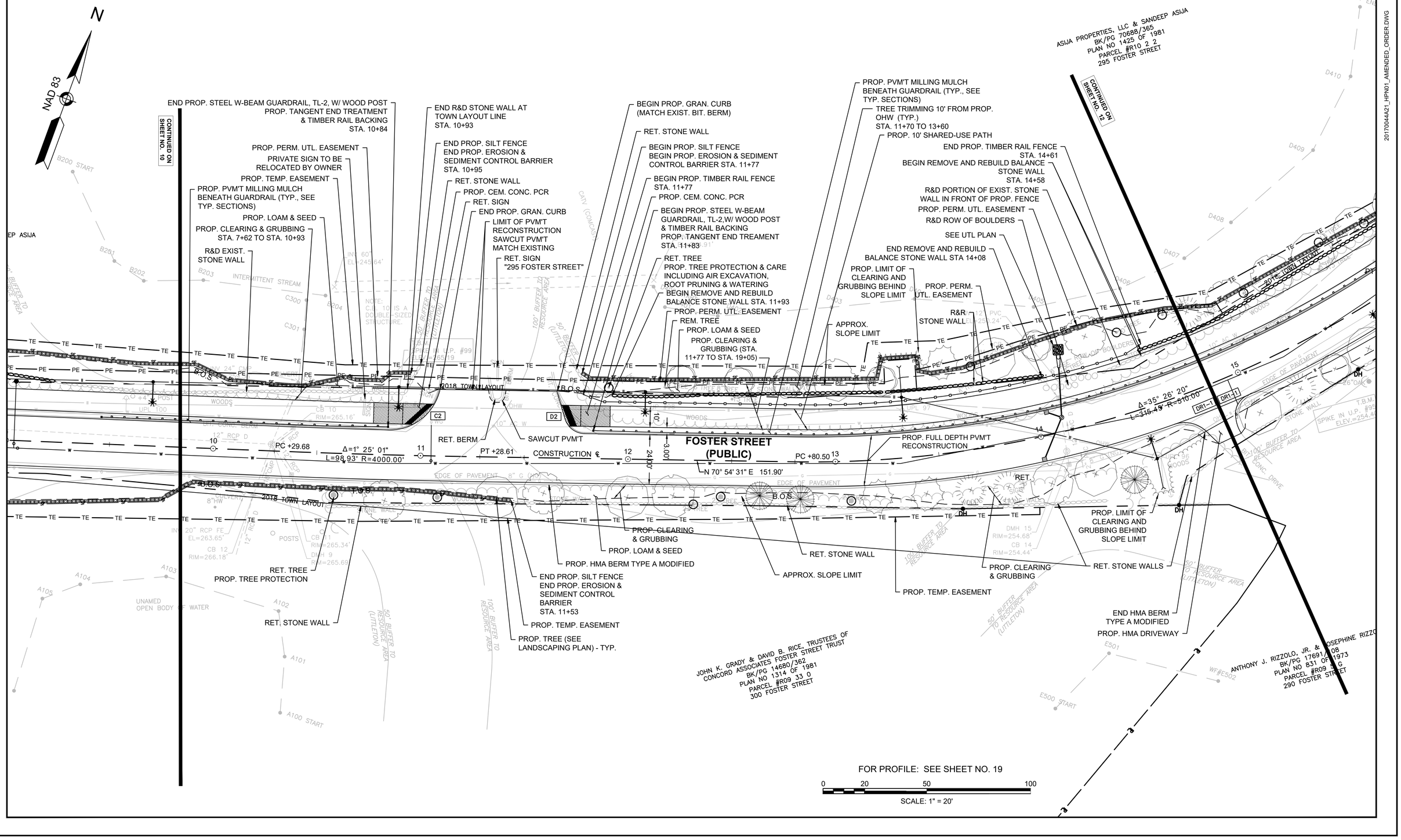
PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	11	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS



HIGHWAY GUARD DETAILS	TRAFFIC SIGNAL CONDUIT	WATER SUPPLY ALTERATIONS	DRAINAGE DETAILS
STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 11+94 TO TANGENT END STA 17+28	NONE	SEE SHEET 57-64	SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	12	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS

20170044A21_HPN01_AMENDED_ORDER.DWG Plotted on 29-Apr-2025 3:02 PM

NAD 83

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70688/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

CONTINUED ON SHEET NO. 11

CONTINUED ON SHEET NO. 13

JORDAN S. MCCATHERIN
BK/PG 62917/52
PARCEL #R10 1 0
277 FOSTER STREET

FOSTER STREET (PUBLIC)

BULKELEY ROAD (PUBLIC)

CONSTRUCTION ℄ N 35° 28' 10" E 184.96'

PC +80.91

PT +95.95

Δ=35° 26' 20" L=316.45' R=510.00'

Δ=9° 16' 42" L=348.16' R=2150.00'

24.0'

4.50'

10'

33'

2018 TOWN LAYOUT

1950 TOWN LAYOUT SEE SHLO NO. 3786

FOR PROFILE: SEE SHEET NO. 20

SCALE: 1" = 20'

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZOLO
BK/PG 17691/108
PLAN NO 831 OF 1973
PARCEL #R09 5 G
290 FOSTER STREET

BROCKTON KENYON & AINE COLLINS
BK/PG 72894/208
PLAN NO 831 OF 1973
PARCEL #R09 5 F
286 FOSTER STREET

GREGORY & SHERI BALZOTTI
BK/PG 50902/470
PLAN NO 831 OF 1973
PARCEL #R09 5 E
284 FOSTER ST

JOSEPH W. & AMANDA LENNON, LIVING TRUSTEES OF THE AMANDA+JOSEPH LENNON LIVING TRUST
BK/PG 64219/262
PLAN NO 1628 OF 1972
PARCEL #R09 5 A
3 BULKELEY ROAD

BONNIE C

HIGHWAY GUARD DETAILS

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 21+22 RT TO CONCRETE ABUTMENT STA 23+34 RT

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 23+26 LT TO TANGENT END STA 26+04 LT

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 24+52 RT TO TANGENT END STA 25+62 RT

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

TRAFFIC SIGNAL CONDUIT

NONE

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

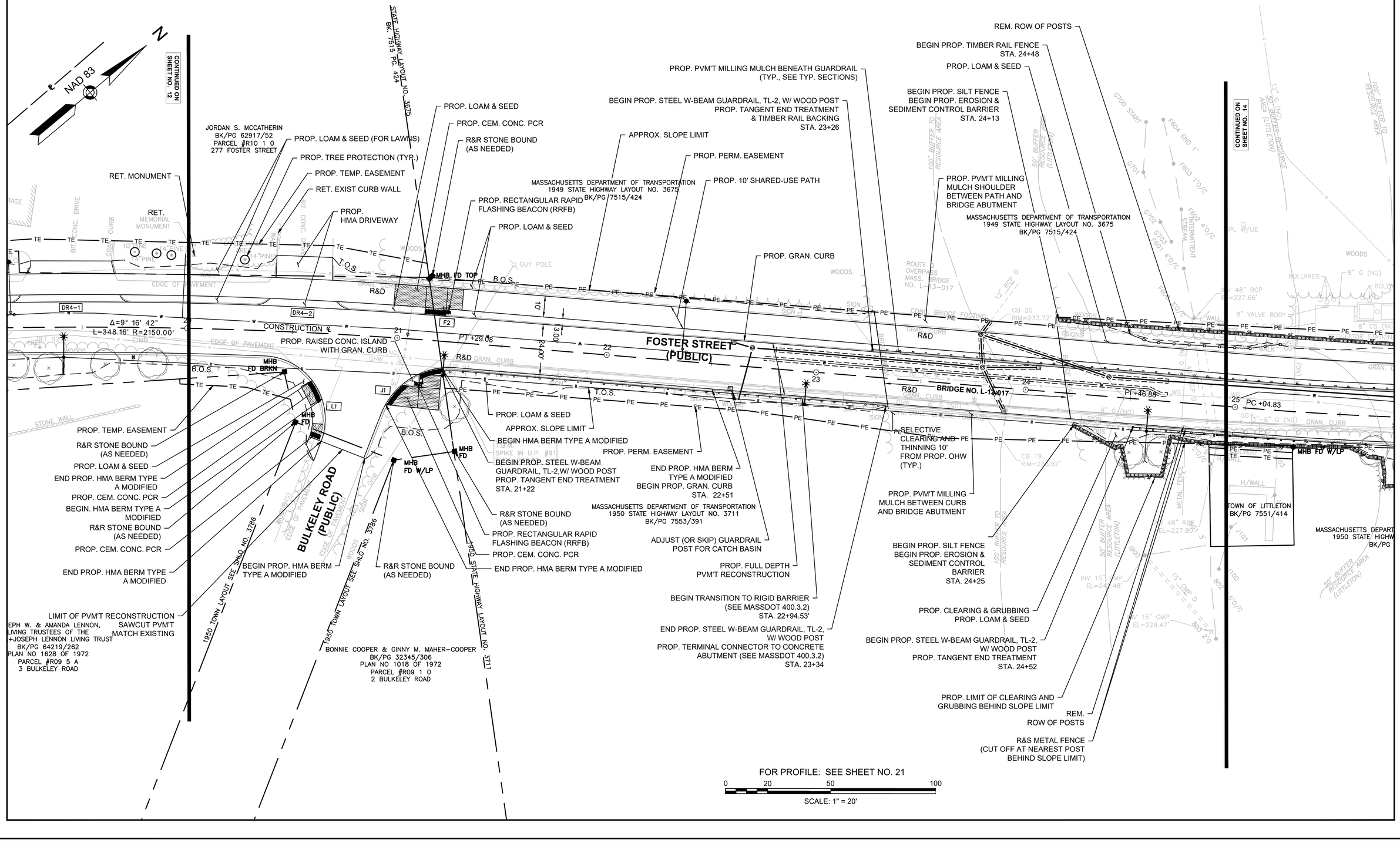
PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	13	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS



20170044A21_HPN01_AMENDED_ORDER.DWG Plotted on 29-Apr-2025 3:02 PM

HIGHWAY GUARD DETAILS

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 23+26 LT TO TANGENT END STA 26+04 LT
STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 24+52 RT TO TANGENT END STA 25+62 RT
STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 28+49 RT TO FLARED END STA 32+83 RT
STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 301+41 LT TO TANGENT END STA 300+48 LT

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

TRAFFIC SIGNAL CONDUIT

NONE

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	14	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS

20170044A21_HPN01_AMENDED_ORDER.DWG Plotted on 29-Apr-2025 3:02 PM

NAD 83

CONTINUED ON SHEET NO. 13

END PROP. SILT FENCE
END PROP. EROSION & SEDIMENT CONTROL BARRIER
STA. 26+14

END PROP. GRAN. CURB
PROP. PERM. EASEMENT
PROP. TEMP. EASEMENT
LIMIT OF PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING
BEGIN PROP. GRAN. CURB

VAF I 265 FOSTER LLC
BK/PG 80433/278
PLAN NO 266 OF 1987
PARCEL #R11 1 0
265 FOSTER STREET

END PROP. STEEL W-BEAM GUARDRAIL, TL-2,W/ WOOD POST & TIMBER RAIL BACKING
PROP. TANGENT END TREATMENT
STA. 26+04

PROP. CEM. CONC. PCR
PROP. 10' SHARED-USE PATH
RET. GAS REGULATOR STATION & EXIST BOLLARDS
PROP. PVM'T MILLING MULCH BENEATH GUARDRAIL (TYP., SEE TYP. SECTIONS)
PROP. LOAM & SEED
RET. SIGN
RET. BOLLARDS
APPROX. SLOPE LIMIT
END PROP. TIMBER RAIL FENCE STA. 25+22
PROP. PERM. EASEMENT
REM. ROW OF POSTS
RET. POSTS
B.O.S.
PT +46.88
PC +04.83
25
26
27
28
29
30
R&D
GRAN. CURB
PROP. FULL DEPTH PVM'T RECONSTRUCTION
SAWCUT PVM'T
LIMIT OF RECONSTRUCTION
FOSTER STREET (PUBLIC)
2018 TOWN LAYOUT
MHB FD W/LP
RET.
TOWN OF LITTLETON BK/PG 7551/414
END PROP. GRAN. CURB
BEGIN PROP. HMA BERM TYPE A MODIFIED STA. 24+99
REM. ROW OF POSTS
R&R STONE BOUND (AS NEEDED)
END PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST
PROP. TANGENT END TREATMENT STA. 25+62
PROP. TREE (SEE LANDSCAPING PLAN) - TYP.
PROP. LIMIT OF CLEARING AND GRUBBING BEHIND SLOPE LIMIT
PROP. LOAM & SEED
MASSACHUSETTS DEPARTMENT OF TRANSPORTATION
1950 STATE HIGHWAY LAYOUT NO. 3711
BK/PG 7553/391
R&R ROW OF BOULDERS TO PREVENT VEHICLE ACCESS TO GRAVEL LOT (2' OFFSET FROM BACK OF CURB)
END PROP. SILT FENCE
END PROP. EROSION & SEDIMENT CONTROL BARRIER
STA. 26+23
BEGIN PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST
PROP. TANGENT END TREATMENT
STA. 300+48
END PROP. HMA BERM TYPE A MODIFIED
R&D EXIST. GUARDRAIL (ALONG GRIMES LANE)
RET. EXIST. PAVED AREA
END PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST
PROP. TANGENT END TREATMENT
STA. 301+41
1949 STATE HIGHWAY LAYOUT NO. 3675
BK. 7515 PG. 424
1951 SHLO NO. 3545
1951 SHLO NO. 3711
MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (MBTA) BK/PG 13117/113 PARCEL #R08 37 0
MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (PARCEL FBL 3-A) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 2011 PARCEL #R11 3 5 263 FOSTER STREET
MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (PARCEL FBL 3-B) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 20 PARCEL #R11 3 5 263 FOSTER STREE
MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (f/ BOSTON & MAINE RAILROAD)
JUNE 30, 1914 RAILROAD SIDELINE
R&R EXIST. RAILROAD GATE (B.O.)
R&R EXIST. CONC. BARRIER
END PROP. HMA BERM TYPE A MODIFIED STA. 27+14
RET. EXIST. HMA & R.R. TRACKS
BEGIN PROP. HMA BERM TYPE A MODIFIED STA. 27+62
PROP. TEMP. EASEMENT
REM. EXIST. PAVEMENT
PROP. LOAM & SEED
SAWCUT PVM'T
PROP. HMA PATH THROUGH RR
BEGIN PROP. GRAN. CURB
(MBTA) BK/PG 13117/113 PARCEL #R08 37 0
SEE UTIL. PLAN
PROP. CEM. CONC. PCR
BEGIN PROP. TIMBER FENCE STA. 28+00
REMOVE HMA PVM'T & CEM. CONC. WALK
RET. POLE
RET. PIPE
REM. HMA PVM'T & WALK
PROP. LOAM & SEED
PROP. CEM. CONC. PCR
END PROP. GRAN. CURB
SEE UTIL. PLAN
PROP. TEMP EASEMENT
SAWCUT & MATCH EXIST.
END PROP. TIMBER FENCE STA. 28+52
RET.
PROP. TEMP EASEMENT
PROP. LOAM & SEED
RETAIN CEM. CONC. WALK
SAWCUT & MATCH EXIST.
PROP. CEM. CONC. WALK
R&R PRIVATE SIGN (B.O.) "COMMUTER RAIL PARKING ONLY"
PROP. LOAM & SEED
PROP. CEM. CONC. PCR
END PROP. GRAN. CURB
LIMIT OF FULL DEPTH PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING
BEGIN PROP. GRAN. CURB
PROP. LOAM & SEED
PROP. STONE FOR PIPE ENDS IN SWALE
PROP. CEM. CONC. PCR
PROP. TEMP EASEMENT
APPROX. SLOPE LIMIT
PROP. FULL DEPTH PVM'T RECONSTRUCTION
PROP. CLEARING & GRUBBING APPROX. STA. 28+20 TO STA. 37+60
APPROX. SLOPE LIMIT
PROP. TREE (SEE LANDSCAPING PLAN) - TYP.
B.O.S.
PROP. SILT FENCE
BEGIN PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST, DEEP POST
PROP. TANGENT END TREATMENT
STA. 28+49
R&R 5 MAILBOXES
LITTLETON AFFORDABLE HOUSING TRUST FUND
BK/PG 82357/132
PARCEL #R08 15 0
260 FOSTER STREET
END PROP. LAYOUT ALTERATION
PROP. GRAN. BOUND
RELOCATED RAILROAD GATE (SEE UTIL. PLAN)
PROP. LOAM & SEED
PROP. EDGE OF PAVEMENT
REM. TREE
PC +87.53
PT +57.06
CONSTRUCTION ℄
TOWN LAYOUT
STA 28+17.86 ALIGN_FOSTER =
STA 300+00.00 ALIGN_GRIMES
N 3014325.4137 E 655545.0384
CONTRACTOR TO STABILIZE EXISTING BOULDERS ALONG PVM'T EDGE (USE WORK ITEM. 691.01)
SUPPLEMENT BOULDERS WITH MODIFIED ROCK FILL AS NEEDED (ITEM 986.)
USE COMPOST FILL COVER AND SEED ITEM 765.490
APPROX. STA. 300+60 TO STA. 301+41
PROP. CLEARING & GRUBBING
PROP. TEMP. EASEMENT
BEGIN PROP. LAYOUT ALTERATION
PROP. GRAN. BOUND
LIMIT OF PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING
STA. 301+45
BEGIN PROP. SILT FENCE
BEGIN PROP. EROSION & SEDIMENT CONTROL BARRIER
STA. 301+65
GRIMES LANE (PUBLIC)
PT +65.58
301+95.23
CONTINUED ON SHEET NO. 15
FOR PROFILE: SEE SHEET NO. 21, 22 & 24
0 20 50 100
SCALE: 1" = 20'

HIGHWAY GUARD DETAILS

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 28+49 RT TO FLARED END STA 32+83 RT

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

TRAFFIC SIGNAL CONDUIT

NONE

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	15	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS

CONTINUED ON SHEET NO. 14

CONTINUED ON SHEET NO. 16

NAD 83 N

MASSACHUSETTS BAY TRANSORTATION AUTHORITY (PARCEL FBL 3-A) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 2011 PARCEL #R11 3 5 263 FOSTER STREET

MASSACHUSETTS BAY TRANSORTATION AUTHORITY (PARCEL FBL 3-B) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 2011 PARCEL #R11 3 5 263 FOSTER STREET

SNS FOSTER, LLC & C/O ROBERT LONG BK/PG 72045/170 PLAN NO 435 OF 2011 PARCEL #R11 3 0 245 FOSTER STREET

LITTLETON AFFORDABLE HOUSING TRUST FUND BK/PG 82357/132 PARCEL #R08 15 0 260 FOSTER STREET

RICHARD B. VIGNON BK/PG 13250/70 PLAN NO 847 OF 1969 PARCEL #R08 13 242 FOSTER STREET

FOSTER STREET (PUBLIC)

CONSTRUCTION ℄

2018 TOWN LAYOUT

T.B.M. SPIKE IN U.P. ELEV.=266.98

R&R STONE BOUND (AS NEEDED)

BEGIN PROP. GRAN. CURB

LIMIT OF PVM'T RECONSTRUCTION SAWCUT PVM'T MATCH EXISTING

END PROP. GRAN. CURB

PROP. CEM. CONC. PCR

PROP. TEMP. EASEMENT

PROP. STONE FOR PIPE ENDS IN SWALE

PROP. MODIFIED ROCKFILL FOR SLOPES ADJENT TO SWALE WHERE 2:1 OR STEEPER

PROP. LOAM & SEED

R&D BOULDERS

PROP. STONE FOR PIPE ENDS IN SWALE

RET. CONC. PAD

PROP. LIMIT OF CLEARING AND GRUBBING BEHIND SLOPE LIMIT

PROP. TEMP. EASEMENT

PROP. PERM. EASEMENT

PROP. CLEARING & GRUBBING STA. 32+40 TO STA. 38+75

APPROX. SLOPE LIMIT

SELECTIVE CLEARING AND THINNING 10' FROM PROP. OHW (TYP.)

PROP. 10' SHARED-USE PATH

PROP. LOAM & SEED

REM. TREE

PROP. EROSION & SEDIMENT CONTROL BARRIER (TYP.)

APPROX. SLOPE LIMIT

PROP. CLEARING & GRUBBING STA. 28+20 TO STA. 37+60

PROP. TEMP. EASEMENT

R&D EXIST. GUARDRAIL

APPROX. SLOPE LIMIT

PROP. LOAM & SEED

PROP. TREE (SEE LANDSCAPING PLAN) - TYP.

BEGIN PROP. HMA BERM TYPE A MODIFIED

PROP. COMPOST FILL COVER & SEED OVER PROP. MODIFIED ROCKFILL WITH GEOTEXTILE FABRIC (ITEM 986) PROP. NEW ENGLAND ROADSIDE WET MEADOW SEED MIX

PROP. SILT FENCE

PROP. FULL DEPTH PVM'T RECONSTRUCTION

END PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST, DEEP POST
PROP. FLARED END TREATMENT (SEE NOTE)
STA. 32+83

RET. STONE WALL

RET. TREE

RET. POST

RET. STONE WALLS

NOTE: NO RECORD OF WATER LINE NORTHEAST OF THIS HYDRANT. WATER LINE IS BELIEVED TO CONTINUE AND IS SHOWN SCHEMATICALLY FOR ILLUSTRATIVE PURPOSES ONLY.

NOTE: GAS LINE RECORDS NORTHEAST OF THIS VICINITY ARE SCHEMATIC AND ARE SHOWN SCHEMATICALLY, FOR ILLUSTRATIVE PURPOSES ONLY.

RET. STONE WALL

R&R MAILBOX

PROP. LOAM & SEED (FOR LAWNS)

PROP. HMA DRIVEWAY

PROP. TEMP. EASEMENT

END PROP. SILT FENCE
END PROP. EROSION & SEDIMENT CONTROL BARRIER
STA. 33+84

100' BUFFER TO RESOURCE AREA

50' BUFFER RESOURCE AREA (LITTLETON)

PC +86.16

FOR PROFILE: SEE SHEET NO. 22 & 23

0 20 50 100

SCALE: 1" = 20'

HIGHWAY GUARD DETAILS

STEEL W-BEAM GUARDRAIL (TL-2) W/ WOOD POST & TANGENT END STA. 35+90 RT

TRAFFIC SIGNAL CONDUIT

NONE

WATER SUPPLY ALTERATIONS

SEE SHEET 57-64

DRAINAGE DETAILS

SEE SHEET NOS. 65-67

LEGEND:

PROPOSED PEDESTRIAN CURB RAMP DETAIL # X#

PROPOSED DRIVEWAY TYPE # DR#

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	16	128
PROJECT FILE NO.	609054		

CONSTRUCTION PLANS

CONTINUED ON SHEET NO. 15

NAD 83

PATRICIA A. NARGIZIAN
BK/PG 70735/467
PARCEL #R11 5 4
237 FOSTER STREET

SNS FOSTER, LLC & C/O ROBERT LONG
BK/PG 72045/170
PLAN NO 435 OF 2011
PARCEL #R11 3 0
245 FOSTER STREET

PROP. LIMIT OF CLEARING AND GRUBBING BEHIND SLOPE LIMIT

PROP. CLASS A ROCK EXCAVATION IN ADVANCE OF U.P. INSTALLATION (AS ENCOUNTERED)

PROP. CLEARING & GRUBBING STA. 32+40 TO STA. 38+75

PROP. GRAN. CURB

PROP. CEM. CONC. PCR

PROP. RECTANGULAR RAPID FLASHING BEACON (RRFB)

PROP. LOAM & SEED

PROP. 6' HMA BIKE RAMP (PAID FOR UNDER ITEM 702.)

END OF PROJECT
PROJ. NO. 609054
STA. 39+36.15
N 3015278.1762
E 656130.7752

NOTE: C.B. 34 IS A DOUBLE-SIZED STRUCTURE.

PROP. CLASS A ROCK EXCAVATION IN ADVANCE OF U.P. INSTALLATION (AS ENCOUNTERED)

PROP. LOAM & SEED

SELECTIVE CLEARING AND THINNING 10' FROM PROP. OHW (TYP.)

PROP. FULL DEPTH PVM'T RECONSTRUCTION

PROP. CLASS A ROCK EXCAVATION IN ADVANCE OF U.P. INSTALLATION (AS ENCOUNTERED)

PROP. 10' SHARED-USE PATH

APPROX. SLOPE LIMIT

NOTE: C.B. 32 IS A DOUBLE-SIZED STRUCTURE.

2018 TOWN LAYOUT

T.O.S.

B.O.S.

BEGIN PROP. GRAN. CURB

END PROP. GRAN. CURB

B.O.S.

PC +06.15

Δ=9° 19' 15"
L=105.74'
R=650.00'

PT +11.89
N 37° 31' 19" E 86.75'

39+98.64

FOSTER STREET (PUBLIC)

N 28° 12' 04" E

PT +90.37

Δ=3° 56' 00"
L=204.20'
R=2974.57'

CONSTRUCTION ℄

PC +86.16

2018 TOWN LAYOUT

PROP. CLEARING & GRUBBING STA. 28+20 TO STA. 37+60

END PROP. STEEL W-BEAM GUARDRAIL , TL-2, BEGIN TRANSITION TO NCHRP 350 GUARDRAIL STA. 36+86.

RET. STONE WALL

RICHARD B. VIGNONI
BK/PG 13250/70
PLAN NO 847 OF 1969
PARCEL #R08 13 E
242 FOSTER STREET

END TRANSITION TO NCHRP 350 GUARDRAIL
BEGIN RET. EXIST GUARDRAIL STA. 37+20.

BEGIN PROP. STEEL W-BEAM GUARDRAIL, TL-2, W/ WOOD POST
PROP. TANGENT END TREAMENT (SEE NOTE)
STA. 35+90

APPROX. SLOPE LIMIT

PROP. LOAM & SEED

BEGIN REMOVE AND REBUILD BALANCE STONE WALL STA. 37+28

END REMOVE AND REBUILD BALANCE STONE WALL STA. 35+49

END REMOVE AND REBUILD BALANCE STONE WALL STA. 37+40

PROP. LOAM & SEED

PROP. TEMP. EASEMENT

RET. EXIST. GUARDRAIL

PROP. TEMP. EASEMENT

BEGIN REMOVE AND REBUILD BALANCE STONE WALL STA. 35+19

END PROP. HMA BERM TYPE A MODIFIED
BEGIN R&R GRAN. CURB STA. 37+68

RET. STONE WALL

END R&R GRAN. CURB
BEGIN RET. GRAN. CURB

BALSAM LANE (PUBLIC)

2020 TOWN LAYOUT

2018 TOWN LAYOUT
LIMIT OF PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING

END PROP. HMA BERM TYPE A MODIFIED

PROP. LOAM & SEED (FOR LAWNS)

BEGIN PROP. HMA BERM TYPE A MODIFIED

PROP. HMA DRIVEWAY

END PROP. GRAN. CURB

R&R MAILBOX

QUINN E. & JENNIFER A. CANFIELD
BK/PG 55588/290
PLAN NO 188 OF 1971
PARCEL #R08 13 D
238 FOSTER STREET

PROP. RECTANGULAR RAPID FLASHING BEACON (RRFB)

PROP. PERM. UTL. EASEMENT

PROP. CEM. CONC. PCR

PROP. LOAM & SEED (FOR LAWNS)

PROP. CEM. CONC. WALK

PROP. LOAM & SEED

BEGIN PROP. GRAN. CURB AND R&S EXIST. GRAN . CURB

PROP. TEMP. EASEMENT

LIMIT OF PVM'T RECONSTRUCTION
SAWCUT PVM'T
MATCH EXISTING

FOR PROFILE: SEE SHEET NO. 23

0 20 50 100

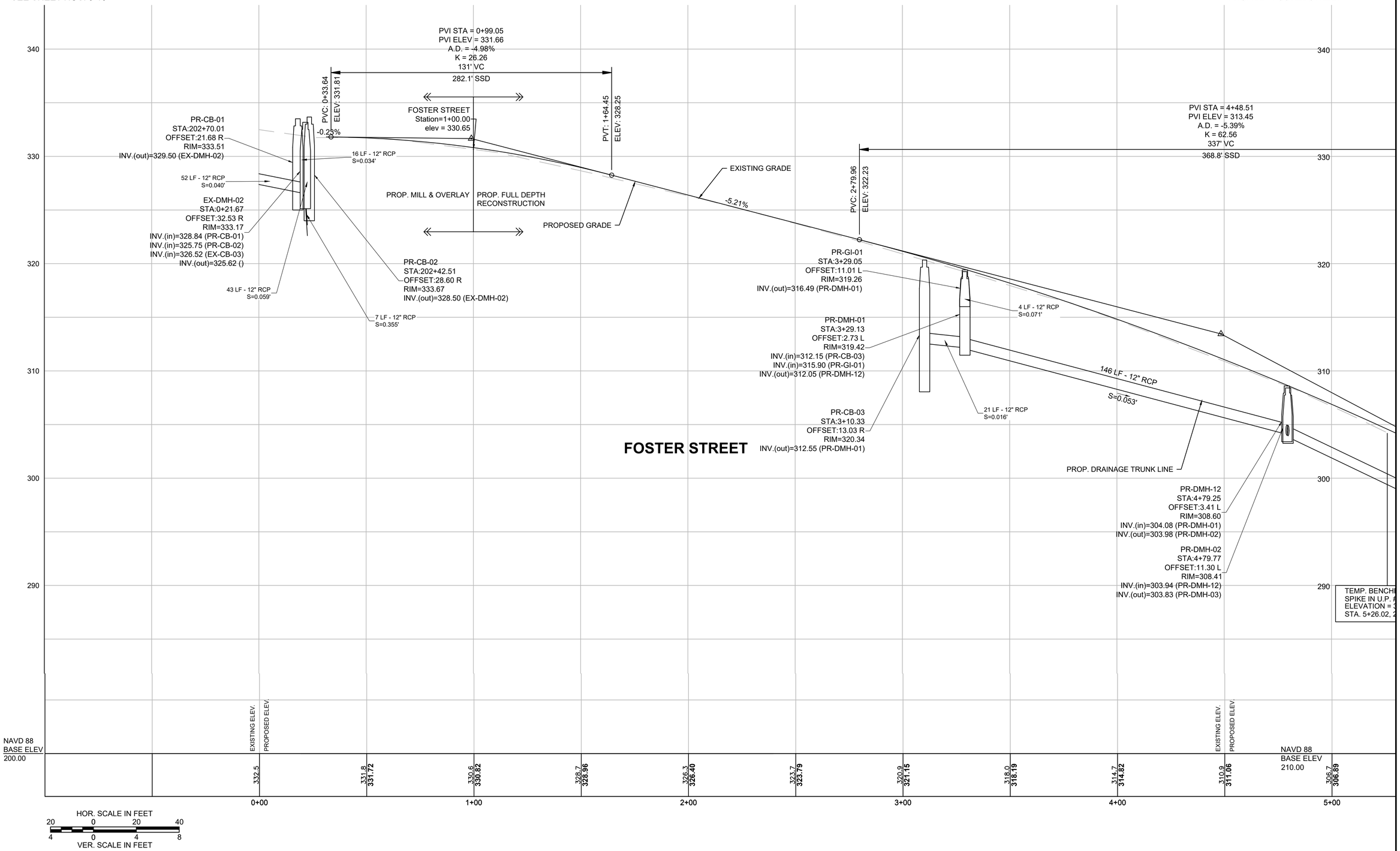
SCALE: 1" = 20'

FOR CONSTRUCTION PLANS:
SEE SHEET NOS. 9-16

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	17	128
PROJECT FILE NO.	609054		

PROFILE - FOSTER STREET



LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	18	128
PROJECT FILE NO.	609054		

PROFILE - FOSTER STREET

FOR CONSTRUCTION PLANS:
SEE SHEET NOS. 9-16

NE

PR-DMH-12
STA:4+79.25
OFFSET:3.41 L
RIM=308.60
08 (PR-DMH-01)
98 (PR-DMH-02)

PR-DMH-02
STA:4+79.77
OFFSET:11.30 L
RIM=308.41
94 (PR-DMH-12)
83 (PR-DMH-03)

199 LF - 12" RCP
S=0.096'

-10.60%

TEMP. BENCHMARK:
SPIKE IN U.P. #104
ELEVATION = 305.59'
STA. 5+26.02, 21.03' LT

PVC: 6+91.60
ELEV: 287.68

PVI STA = 8+58.14
PVI ELEV = 270.02
A.D. = 8.23%
K = 40.45
333' VC
216.1' HSD

PVT: 10+24.67
ELEV: 266.08

PROP. DRAINAGE TRUNK LINE

5 LF - 12" RCP
S=0.046'

PR-CBDB-1
STA:6+81.56
OFFSET:11.00 L
RIM=288.52
INV.(out)=284.39 (PR-DMH-03)

PR-CB-04
STA:6+81.35
OFFSET:11.00 R
RIM=288.54
INV.(out)=283.54 (PR-DMH-03)

9 LF - 12" RCP
S=0.014'

PROP DRAIN
CONCRETE PIPE
I=283.38

PROPOSED GRADE

PR-DMH-04
STA:7+16.60
OFFSET:7.83 L
RIM=284.95
INV.(in)=280.69 (PR-DMH-03)
INV.(out)=280.43 ()

7 LF - 12" RCP
S=-0.005'

32 LF - 12" RCP
S=0.032'

EXISTING GRADE

PR-DMH-03
STA:6+81.54
OFFSET:2.46 L
RIM=288.86
INV.(in)=284.00 (PR-CBDB-1)
INV.(in)=284.52 (PR-DMH-02)
INV.(in)=283.35 (PR-CB-04)
INV.(out)=281.83 (PR-DMH-04)

-2.37%

TEMP. B
SPIKE IN
ELEVAT
STA. 10+

FOSTER STREET

	300	290	280	270	260	250
EXISTING ELEV.	310.9	306.7	301.9	297.0	291.9	286.7
PROPOSED ELEV.	311.06	306.89	302.33	297.37	292.09	286.80
EXISTING ELEV.	281.8	277.3	273.7	270.7	268.5	266.7
PROPOSED ELEV.	281.91	277.64	273.99	270.96	268.54	266.74
EXISTING ELEV.						265.2
PROPOSED ELEV.						265.49

NAVD 88
BASE ELEV
210.00

NAVD 88
BASE ELEV
210.00

5+00 6+00 7+00 8+00 9+00 10+00

HOR. SCALE IN FEET
20 0 20 40
4 0 4 8
VER. SCALE IN FEET

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	19	128
PROJECT FILE NO.	609054		

PROFILE - FOSTER STREET

FOR CONSTRUCTION PLANS:
SEE SHEET NOS. 9-16

PVI STA = 11+54.78
PVI ELEV = 263.01
A.D. = -1.78%
K = 71.36
127' VC
670.5' SSD

PVI STA = 13+05.09
PVI ELEV = 256.78
A.D. = 2.82%
K = 39.98
113' VC
333.9' HSD

PVI STA = 15+15.07
PVI ELEV = 254.00
A.D. = -1.26%
K = 31.31
39' VC
877.9' SSD

PVC: 10+91.36 ELEV: 264.51
PVT: 12+18.20 ELEV: 260.38
PVC: 12+48.70 ELEV: 259.11
PVT: 13+61.47 ELEV: 256.03
PVC: 14+95.39 ELEV: 254.26
PVT: 15+34.75 ELEV: 253.49
PVC: 15+79.55 ELEV: 252.34

-2.37%
-4.14%
-1.32%
-2.58%

PROPOSED GRADE
EXISTING GRADE

TEMP. BENCHMARK:
SPIKE IN U.P. #99
ELEVATION = 265.19'
STA. 10+88.83, 23.04' LT

TEMP. BENCHMARK:
SPIKE IN U.P. #95
ELEVATION = 254.40'
STA. 15+69.90, 10.34' RT

FOSTER STREET

18 LF - 12" RCP
S=0.008'

PR-DMH-05
STA:14+11.89
OFFSET:6.83 L
RIM=255.23
INV.(in)=250.69 (PR-CB-06)
INV.(in)=250.67 (PR-CB-05)
INV.(out)=250.57 (PR-FE-01)

22 LF - 12" RCP
S=0.020'

PR-CB-05
STA:13+99.37
OFFSET:10.97 R
RIM=255.31
INV.(out)=250.85 (PR-DMH-05)

PR-CB-06
STA:14+05.22
OFFSET:11.03 L
RIM=255.23
INV.(out)=250.77 (PR-DMH-05)

PR-FE-01
STA:14+16.61
OFFSET:30.50 L
RIM=251.75
INV.(in)=250.08 (PR-DMH-05)

4 LF - 12" RCP
S=0.010'

PROP DRAIN
CONCRETE PIPE
I=250.74

PR
STA:
OFFSE
RI
INV.(in)=245.67 (P
INV.(in)=246.38 (E
INV.(out)=245.57 (F

21 LF -

INV.(in)=245

270
260
250
240
230
220

	10+00	11+00	12+00	13+00	14+00	15+00	16+00
EXISTING ELEV.	266.7	263.8	262.3	260.9	259.0	257.2	255.9	255.0	254.3	254.0	253.0	251.5
PROPOSED ELEV	266.74	264.30	262.88	261.11	259.06	257.32	256.20	255.52	254.86	254.20	253.10	251.85

NAVD 88
BASE ELEV
210.00

NAVD 88
BASE ELEV
210.00

HOR. SCALE IN FEET
20 0 20 40
4 0 4 8
VER. SCALE IN FEET

20170044A21_HWD01_AMENDED_ORDER.DWG Plotted on 29-Apr-2025 3:06 PM

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	20	128
PROJECT FILE NO.	609054		

PROFILE - FOSTER STREET

FOR CONSTRUCTION PLANS:
SEE SHEET NOS. 9-16

LOW POINT ELEV = 250.73
LOW POINT STA = 17+04.17
PVI STA = 16+85.00
PVI ELEV = 249.62
A.D. = 4.37%
K = 48.30
211' VC
252.0' HSD

HIGH POINT ELEV = 253.05
HIGH POINT STA = 19+02.31
PVI STA = 19+62.16
PVI ELEV = 254.57
A.D. = -7.83%
K = 28.12
220' VC
247.9' SSD

PVT: 15+34.75
ELEV: 253.49

PVC: 15+79.55
ELEV: 252.34

PVT: 17+90.45
ELEV: 251.50

PVC: 18+52.07
ELEV: 252.60

PVT: 20+72.26
ELEV: 247.91

-2.58%

1.79%

-6.04%

PROPOSED GRADE

EXISTING GRADE

TEMP. BENCHMARK:
SPIKE IN U.P. #95
ELEVATION = 254.40'
STA. 15+69.90, 10.34' RT

PR-DMH-06
STA:16+81.45
OFFSET:10.98 L
RIM=250.56
INV.(in)=245.67 (PR-CB-07)
INV.(in)=246.38 (EX-CB-18)
INV.(out)=245.57 (PR-FE-02)

PR-CB-07
STA:16+89.33
OFFSET:10.95 L
RIM=250.53
INV.(out)=245.77 (PR-DMH-06)

21 LF - 12" RCP
S=0.009'

4 LF - 12" RCP
S=0.013'

PR-FE-02
STA:16+80.98
OFFSET:34.28 L
RIM=247.04
INV.(in)=245.37 (PR-DMH-06)

TEMP. BENCHMARK:
SPIKE IN U.P. #91
ELEVATION = 246.01'
STA. 21+24.99, 12.68' RT

FOSTER STREET

BULKELEY
ROAD

	EXISTING ELEV.	PROPOSED ELEV								
NAVD 88 BASE ELEV 210.00	253.0	253.10	251.5	251.85	250.0	251.03	249.9	250.73	250.5	250.95
	251.6	251.67	252.7	252.56	252.8	253.05	252.3	252.64	251.1	251.35
	248.8	249.17	246.2	246.24	NAVD 88 BASE ELEV 210.00	243.0	243.22			
	16+00		17+00		18+00		19+00		20+00	21+00

HOR. SCALE IN FEET
20 0 20 40
4 0 4 8
VER. SCALE IN FEET

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	21	128
PROJECT FILE NO.	609054		

PROFILE - FOSTER STREET

FOR CONSTRUCTION PLANS:
SEE SHEET NOS. 9-16

260
250
240
230
220

LOW POINT ELEV = 233.85
LOW POINT STA = 24+03.05
PVI STA = 23+77.00
PVI ELEV = 229.50
A.D. = 10.48%
K = 32.44
340' VC
183.9' HSD

PVC: 22+07
ELEV: 239.77

PVT: 25+47
ELEV: 237.04

ROUTE 2 OVERPASS
HEIGHT = 14'-1"

-6.04%

PVI STA = 26+70.00
PVI ELEV = 242.50
A.D. = -2.75%
K = 21.84
60' VC
422.9' SSD

PVC: 26+40
ELEV: 241.17

PVT: 27+00
ELEV: 243.01

MBTA AT-GRADE CROSSIN

1.69%

4.44%

PROPOSED GRADE

EXISTING GRADE

18 LF - 8" D.I.
S=0.005'

137 LF - 8" D.I.
S=0.020'

?. BENCHMARK:
E IN U.P. #91
ATION = 246.01'
21+24.99, 12.68' RT

PR-GI-04
STA:22+59.86
OFFSET:11.00 R
RIM=236.80
INV.(out)=232.00 (PR-CB-19)

PR-GI-06
STA:23+90.50
OFFSET:10.95 R
RIM=233.66
INV.(out)=229.50 (PR-CB-21)

PR-CB-19
STA:22+63.94
OFFSET:17.18 R
RIM=237.30
INV.(in)=231.48 (PR-GI-04)
INV.(out)=232.58 (PR-DMH-07)

PR-CB-08
STA:22+59.77
OFFSET:10.93 L
RIM=237.01
INV.(out)=232.68 (PR-DMH-07)

5 LF - 12" RCP
S=0.041'

23 LF - 12" RCP
S=0.005'

106 LF - 12" RCP
S=0.014'

PR-DMH-07
STA:22+68.88
OFFSET:9.12 L
RIM=236.78
INV.(in)=232.45 (PR-CB-19)
INV.(in)=232.30 (PR-CB-08)
INV.(out)=230.50 (PR-DMH-08)

PR-CIT-01
STA:23+76.52
OFFSET:24.63 L
RIM=234.42
INV.(in)=228.82 (PR-DMH-08)
INV.(in)=228.82 (PR-DMH-09)
INV.(out)=228.72 ()

12 LF - 12" RCP
S=0.006'

12 LF - 12" RCP
S=0.005'

60 LF - 12" RCP
S=0.005'

PR-DMH-09
STA:24+38.98
OFFSET:9.33 L
RIM=233.87
INV.(in)=231.20 (PR-DMH-10)
INV.(out)=229.15 (PR-CIT-01)

PR-CB-10
STA:24+05.34
OFFSET:10.91 L
RIM=233.73
INV.(out)=229.40 (PR-DMH-08)

23 LF - 12" RCP
S=0.014'

PR-DMH-08
STA:23+78.70
OFFSET:8.96 L
RIM=233.77
INV.(in)=229.00 (PR-CB-21)
INV.(in)=229.02 (PR-CB-10)
INV.(in)=229.01 (PR-DMH-07)
INV.(out)=228.92 (PR-CIT-01)

PR-CB-21
STA:23+86.83
OFFSET:4.81 R
RIM=233.80
INV.(in)=228.39 (PR-GI-06)
INV.(out)=229.08 (PR-DMH-08)

PR-DMH-10
STA:25+80.28
OFFSET:9.36 L
RIM=238.33
INV.(in)=234.16 (PR-CB-13)
INV.(in)=234.10 (PR-CB-12)
INV.(out)=234.00 (PR-DMH-09)

5 LF - 12" RCP
S=0.040'

PR-CB-12
STA:25+89.11
OFFSET:11.00 R
RIM=238.69
INV.(out)=234.21 (PR-DMH-10)

PR-CB-13
STA:25+88.86
OFFSET:10.94 L
RIM=238.68
INV.(out)=234.51 (PR-DMH-10)

TEMP. BENCHMARK:
SPIKE IN U.P. #87
ELEVATION = 243.99'
STA. 26+89.40, 19.39' LT

FOSTER STREET

	EXISTING ELEV.	PROPOSED ELEV.									
NAVD 88 BASE ELEV 210.00	243.0	**243.22**	240.2	**240.20**	237.7	**237.46**	235.8	**235.49**	234.4	**234.28**	234.0	**233.85**	234.2	**234.19**	235.1	**235.30**	236.8	**237.18**	239.3	**239.39**	241.0	**241.59**	243.0	**243.01**	NAVD 88 BASE ELEV 210.00	243.9	**243.85**
	22+00						23+00				24+00				25+00				26+00				27+00				

HOR. SCALE IN FEET
20 0 20 40
4 0 4 8
VER. SCALE IN FEET

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	22	128
PROJECT FILE NO.	609054		

PROFILE - FOSTER STREET

FOR CONSTRUCTION PLANS:
SEE SHEET NOS. 9-16

PVI ELEV = 268.75
A.D. = -3.89%
K = 36.03
140' VC
347.7' SSD

PVT: 33+65
ELEV: 270.61

PVC: 32+25
ELEV: 264.17

PVI STA = 31+00.00
PVI ELEV = 256.00
A.D. = 2.30%
K = 43.40
100' VC
564.0' HSD

PVC: 30+50
ELEV: 253.88

PVT: 31+50
ELEV: 259.27

PVI STA = 28+55.00
PVI ELEV = 245.63
A.D. = 2.54%
K = 39.31
100' VC
409.7' HSD

PVC: 28+05
ELEV: 244.78

PVT: 29+05
ELEV: 247.74

MBTA AT-GRADE CROSSING

EXISTING GRADE

PROPOSED GRADE

1.69%

4.23%

6.54%

7 LF - 12" RCP
S=0.012'

9 LF - 12" RCP
S=0.003'

194 LF - 15" RCP
S=0.055'

99 LF - 15" RCP
S=0.027'

25 LF - 15" RCP
S=0.076'

28 LF - 15" RCP
S=0.000'

EX-CBDB 22 23
STA:30+42.39
OFFSET:33.72 L
RIM=256.60
INV.(in)=251.60 (PR-CB-14)
INV.(out)=251.54 (EX-CB-21)

PR-CB-14
STA:31+45.23
OFFSET:32.50 L
RIM=259.89
INV.(in)=255.29 (PR-CB-15)
INV.(out)=254.37 (EX-CBDB 22 23)

PR-CB-15
STA:31+73.61
OFFSET:30.26 L
RIM=262.22
INV.(out)=257.45 (PR-CB-14)

EX-CB-16
STA:31+72.28
OFFSET:10.22 R
RIM=260.63
INV.(out)=256.30 (EX-DMH-12)

PR-CB-16
STA:31+65.14
OFFSET:8.64 L
RIM=260.09
INV.(in)=255.89 (PR-GI-03)
INV.(out)=255.79 (EX-DMH-12)

EX-DMH-12
STA:31+61.92
OFFSET:1.66 R
RIM=260.02
INV.(in)=255.66 (PR-CB-16)
INV.(in)=256.26 (EX-CB-16)
INV.(in)=254.96 (EX-DMH-29)
INV.(out)=251.46 ()

STA. 28+20.24 ALIGN_FOSTER =
STA. 300+00.00 ALIGN_GRIMES
N:3014329.9564 E:655543.5938

GRIMES LANE

TEMP. BENCHMARK:
SPIKE IN U.P. #83
ELEVATION = 266.98'
STA. 32+44.53, 15.90' LT

FOSTER STREET

280
270
260
250
240
230

	EXISTING ELEV.	PROPOSED ELEV.									
NAVD 88 BASE ELEV 210.00	243.9	**243.85**	244.7	**244.70**	246.1	**245.80**	248.0	**247.54**	250.1	**249.65**	252.1	**251.77**	254.2	**253.88**	256.6	**256.29**	259.5	**259.27**	262.6	**262.54**	266.1	**265.72**	268.5	**268.30**	NAVD 88 BASE ELEV 210.00	270.3	**270.18**
	28+00					29+00				30+00				31+00				32+00				33+00					

HOR. SCALE IN FEET
20 0 20 40
4 0 4 8
VER. SCALE IN FEET

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	23	128
PROJECT FILE NO.	609054		

PROFILE - FOSTER STREET

FOR CONSTRUCTION PLANS:
SEE SHEET NOS. 9-16

PVI STA = 38+50.00
PVI ELEV = 290.00
A.D. = -0.76%
K = 79.08
60' VC
1452.3' SSD

PVC: 38+20
ELEV: 288.20

PVT: 38+88
ELEV: 291.57

FOSTER STREET
Station=39+36.88
elev = 294.55

5.24%

PVI STA = 36+55.00
PVI ELEV = 278.30
A.D. = 3.35%
K = 53.78
180' VC
312.9' HSD

PROPOSED GRADE

PVT: 37+45
ELEV: 283.70

6.00%

PVC: 35+65
ELEV: 275.91

13 LF - 12" RCP
S=0.073'

PR-GI-02
STA:35+96.94
OFFSET:11.01 L
RIM=276.64
INV.(out)=274.32 (EX-DMH-31)

PR-LB-06
STA:35+84.98
OFFSET:15.93 R
RIM=277.18
INV.(in)=272.03 (PR-CB-20)

EXISTING GRADE

EX-DMH-35
STA:38+87.45
OFFSET:2.11 R
RIM=292.70
INV.(in)=288.37 (EX-DMH-33)
INV.(out)=287.17 (EX-DMH-31)

PROP. FULL DEPTH
RECONSTRUCTION

125 LF - 12" RC
S=0.049'

PVT: 33+65
ELEV: 270.61

2.65%

227 LF - 15" RCP
S=0.020'

TEMP. BENCHMARK:
SPIKE IN U.P. #78
ELEVATION = 289.65'
STA. 38+38.16, 12.47' RT

PR-GI-05
STA:36+02.37
OFFSET:10.99 R
RIM=276.81
INV.(out)=272.00 (PR-CB-20)

PR-CB-20
STA:35+96.35
OFFSET:7.42 R
RIM=276.69
INV.(in)=271.17 (PR-GI-05)
INV.(out)=272.10 (PR-LB-06)
INV.(out)=272.15 (EX-DMH-31)

EX-DMH-31
STA:35+89.75
OFFSET:3.85 R
RIM=277.45
INV.(in)=273.12 (PR-GI-02)
INV.(in)=272.32 (EX-DMH-35)
INV.(in)=272.11 (PR-CB-20)
INV.(out)=270.52 (EX-DMH-29)

EX-DMH-29
STA:33+59.34
OFFSET:2.64 R
RIM=270.40
INV.(in)=266.00 (EX-DMH-31)
INV.(out)=265.90 (EX-DMH-12)

BALSAM LANE

FOSTER STREET

300
290
280
270
260
250

	EXISTING ELEV.	PROPOSED ELEV.											
NAVD 88 BASE ELEV 210.00	270.3	**270.18**	271.7	**271.54**	273.2	**272.86**	274.5	**274.19**	275.7	**275.51**	277.0	**276.95**	278.6	**278.84**	280.7	**281.19**	283.6	**284.00**	286.6	**287.00**	289.8	**289.94**	292.6	**292.62**	NAVD 88 BASE ELEV 210.00	295.2
	34+00						35+00				36+00				37+00				38+00				39+00			

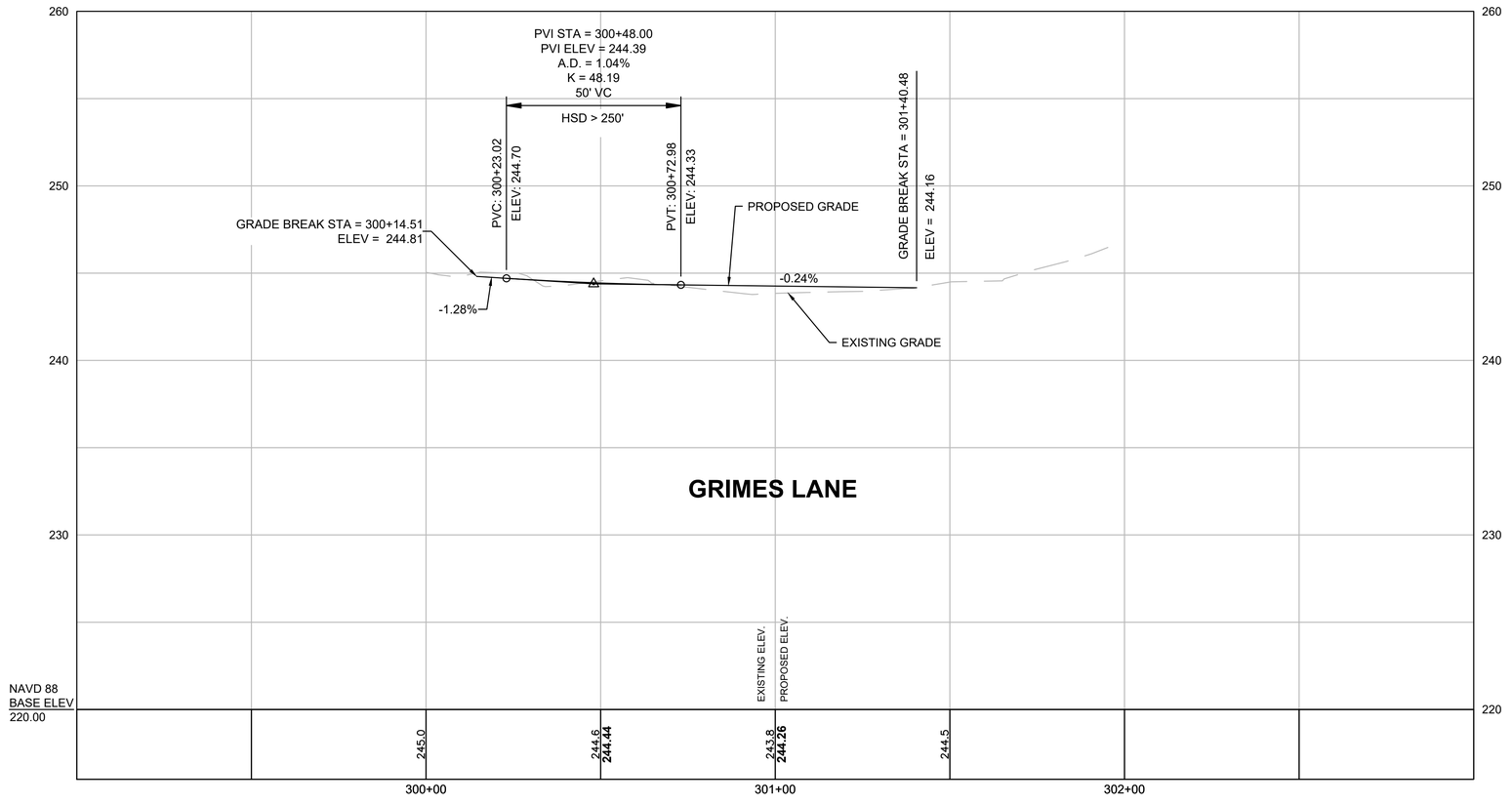
HOR. SCALE IN FEET
20 0 20 40
4 0 4 8
VER. SCALE IN FEET

FOR CONSTRUCTION PLANS:
SEE SHEET NOS. 9-16

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	24	128
PROJECT FILE NO.	609054		

PROFILE - GRIMES LANE



HOR. SCALE IN FEET
20 0 20 40
4 0 4 8
VER. SCALE IN FEET

THIS PLAN IS BASED ON FIELD SURVEY CONDUCTED BY:
SHERMAN & FRYDRYK, LLC.
FIELD DATA WAS COLLECTED BETWEEN 8/14/18 & 9/17/18

HORIZONTAL CONTROL IS BASED ON VALUES PROVIDED BY MEANS OF GLOBAL POSITION SYSTEM METHODS, AND IS BASED ON THE NORTH AMERICAN DATUM OF 1983 (NAD-1093) MASSACHUSETTS STATE PLANE COORDINATE SYSTEM MAINLAND ZONE. OR PER SURVEY NOTE: HORIZONTAL DATUM IS BASED ON THE 1983 N.A.D. SYSTEM USING SURVEY GPS CONTROL POINTS SET BY THE CITY OF LITTLETON ENGINEERING DEPARTMENT. GPS CONTROL STATION CORS_IS-HAMP, PID-DE9093

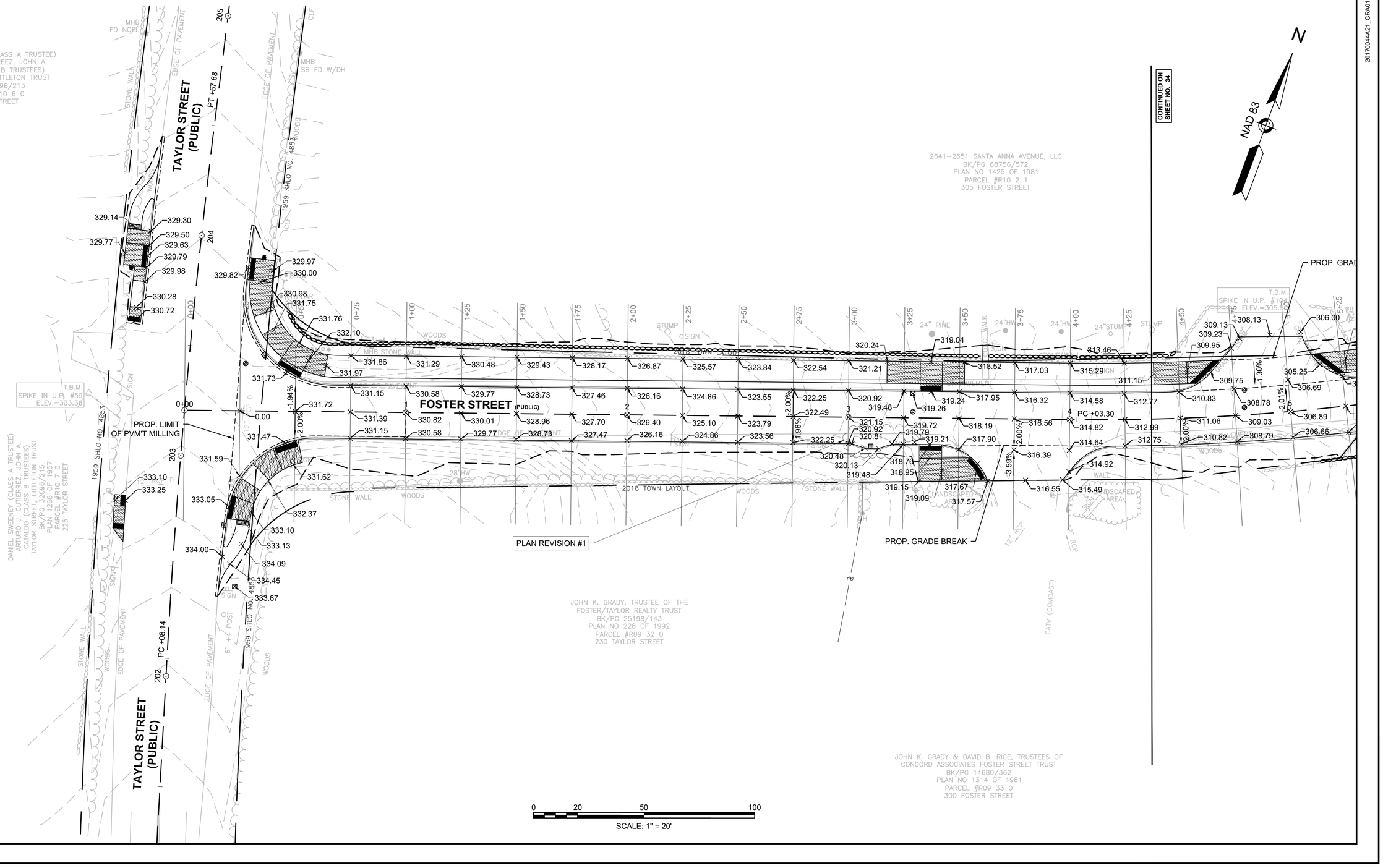
VERTICAL CONTROL IS BASED ON THE NORTH AMERICAN VERTICAL DATUM OF 1988, (NAVD-1988). OR VERTICAL DATUM IS BASED ON THE 1988 N.G.V.D. SYSTEM USING SURVEY GPS CONTROL POINTS SET BY THE CITY OF LITTLETON ENGINEERING DEPARTMENT, GPS CONTROL STATION: CORS_ID-HAMP, PID-DE8093

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	33	128
PROJECT FILE NO.	609054		

GRADING PLAN

20170044A21_GRA01.DWG Plotted on 21-Mar-2025 9:18 AM

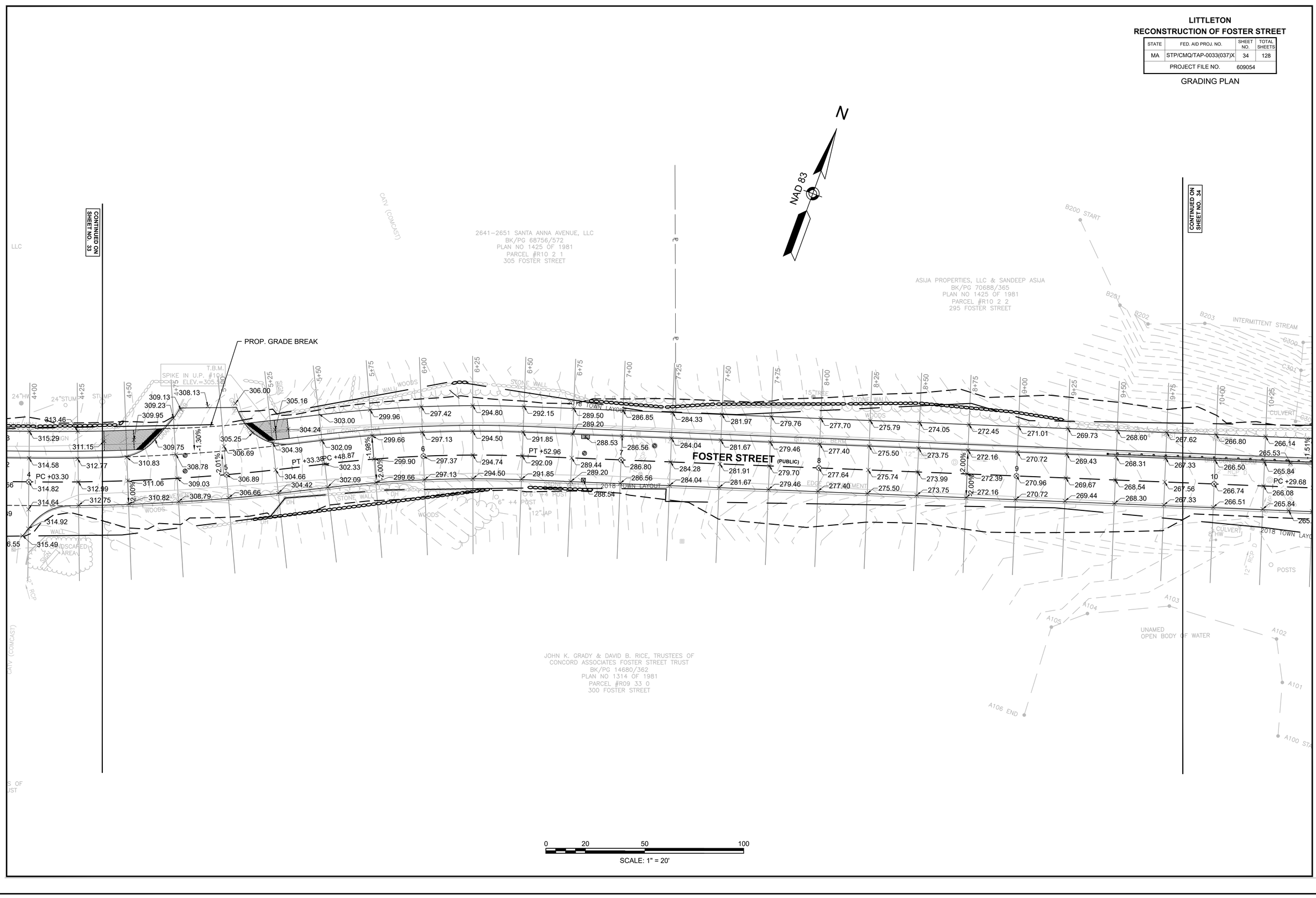


LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	34	128
PROJECT FILE NO.	609054		

GRADING PLAN

20170044A21_GRA01.DWG Plotted on 21-Mar-2025 9:18 AM



LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	35	128
PROJECT FILE NO.	609054		

GRADING PLAN

20170044A21_GRA01.DWG Plotted on 21-Mar-2025 9:18 AM

N

NAD 83

CONTINUED ON SHEET NO. 34

CONTINUED ON SHEET NO. 36

PLAN REVISION #1

FOSTER STREET (PUBLIC)

PROP. GRADE BREAK

PC +29.68

PT +28.61

PC +80.50

T.B.M. SPIKE IN U.P. #99 ELEV.=265.19

T.B.M. SPIKE IN U.P. ELEV.=254.

B200 START

B201

B202

B203

B204

INTERMITTENT STREAM

C300

C301

C302

CULVERT

D400 START

D401

D402

D403

D404

D405

D406

D407

D408

D409

D410

CATV (COMCAST)

PLAN NO. PARCEL #R10 & 295 FOSTER STREET

A100 START

A101

A102

A103

A104

A105

UNAMED OPEN BODY OF WATER

E500 START

E501

E502

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZ
BK/PG 17691/108
PLAN NO 831 OF 1973
PARCEL #R09 1 G
290 FOSTER STREET

0 20 50 100

SCALE: 1" = 20'

BW = FINISHED GRADE AT BOTTOM OF WALL
TW = FINISHED GRADE AT TOP OF WALL
SEE CONSTRUCTION DETAILS FOR WALL SPECIFICATIONS

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	36	128
PROJECT FILE NO.	609054		

GRADING PLAN

20170044A21_GRA01.DWG Plotted on 21-Mar-2025 9:18 AM

N
NAD 83

CONTINUED ON SHEET NO. 35

CONTINUED ON SHEET NO. 37

PLAN REVISION #1

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70688/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

JORDAN S. MCCATHERIN
BK/PG 62917/52
PARCEL #R10 1 0
277 FOSTER STREET

FOSTER STREET (PUBLIC)

BULKELEY ROAD (PUBLIC)

2018 TOWN LAYOUT

1950 TOWN LAYOUT SEE SHLO NO. 3786

PROP. GRADE BREAK

PC +80.91

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZOLO
BK/PG 17691/108
PLAN NO 831 OF 1973
PARCEL #R09 5 G
290 FOSTER STREET

BROCKTON KENYON & AINE COLLINS
BK/PG 72894/208
PLAN NO 831 OF 1973
PARCEL #R09 5 F
286 FOSTER STREET

GREGORY & SHERI BALZOTTI
BK/PG 50902/470
PLAN NO 831 OF 1973
PARCEL #R09 5 E
284 FOSTER ST

GREGORY & SHERI BALZOTTI
BK/PG 50902/470
PLAN NO 831 OF 1973
PARCEL #R09 5
284 FOSTER ST

JOSEPH W. & AMANDA LENNON,
LIVING TRUSTEES OF THE
AMANDA+JOSEPH LENNON LIVING TRUST
BK/PG 64219/262
PLAN NO 1628 OF 1972
PARCEL #R09 5 A
3 BULKELEY ROAD

SPIKE IN U.P. #95
ELEV.=254.40

0 20 50 100
SCALE: 1" = 20'

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	37	128
PROJECT FILE NO.	609054		

GRADING PLAN

20170044A21_GRA01.DWG Plotted on 21-Mar-2025 9:18 AM

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	38	128
PROJECT FILE NO.	609054		

GRADING PLAN

CONTINUED ON SHEET NO. 37

CONTINUED ON SHEET NO. 39

VAF I 265 FOSTER LLC
BK/PG 80433/278
PLAN NO 266 OF 1987
PARCEL #R11 1 0
265 FOSTER STREET

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY
(PARCEL FBL 3-A)
BK/PG 57072/384
BK/PG 57072/376
PLAN NO 435 OF 2011
PARCEL #R11 2 5
263 FOSTER STREET

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY
(PARCEL FBL 3-B)
BK/PG 57072/384
BK/PG 57072/376
PLAN NO 435 OF 2011
PARCEL #R11 3 5
263 FOSTER STREET

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (F/ BOSTON & M...

(MBTA)
BK/PG 13117/113
PARCEL #R11 2 0

MASSACHUSETTS DEPARTMENT OF TRANSPORTATION
1950 STATE HIGHWAY LAYOUT NO. 3711
BK/PG 7553/391

(MBTA)
BK/PG 13117/113
PARCEL #R08 37 0

LITTLETON AFFORDABLE HOUSING
TRUST FUND
BK/PG 82357/132
PARCEL #R08 15 0
260 FOSTER STREET

TOWN OF LITTLETON
BK/PG 7551/414

MASSACHUSETTS DEPARTMENT OF TRANSPORTATION
AY LAYOUT NO. 3675
7515/424

1949 STATE HIGHWAY LAYOUT NO. 3575
BK/PG 7515/424

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (F/ BOSTON & MAINE RAILROAD)

FOSTER STREET (PUBLIC)

GRIMES LANE (PUBLIC)
PT +65.58
301+95.23

PLAN REVISION #1

PROP. GRADE BREAK

MATCH EXIST. GRADE AT RAIL CROSSING

PLAN REVISION #2

NOTE: CONTRACTOR MAY ADJUST GRADING SLOPES SHOWN ON THE PLAN AS NEEDED TO STAY IN LIMITS OF WORK

PC +04.83
PI +46.88
PT +57.06
PC +87.53

N
NAD 83

0 20 50 100
SCALE: 1" = 20'

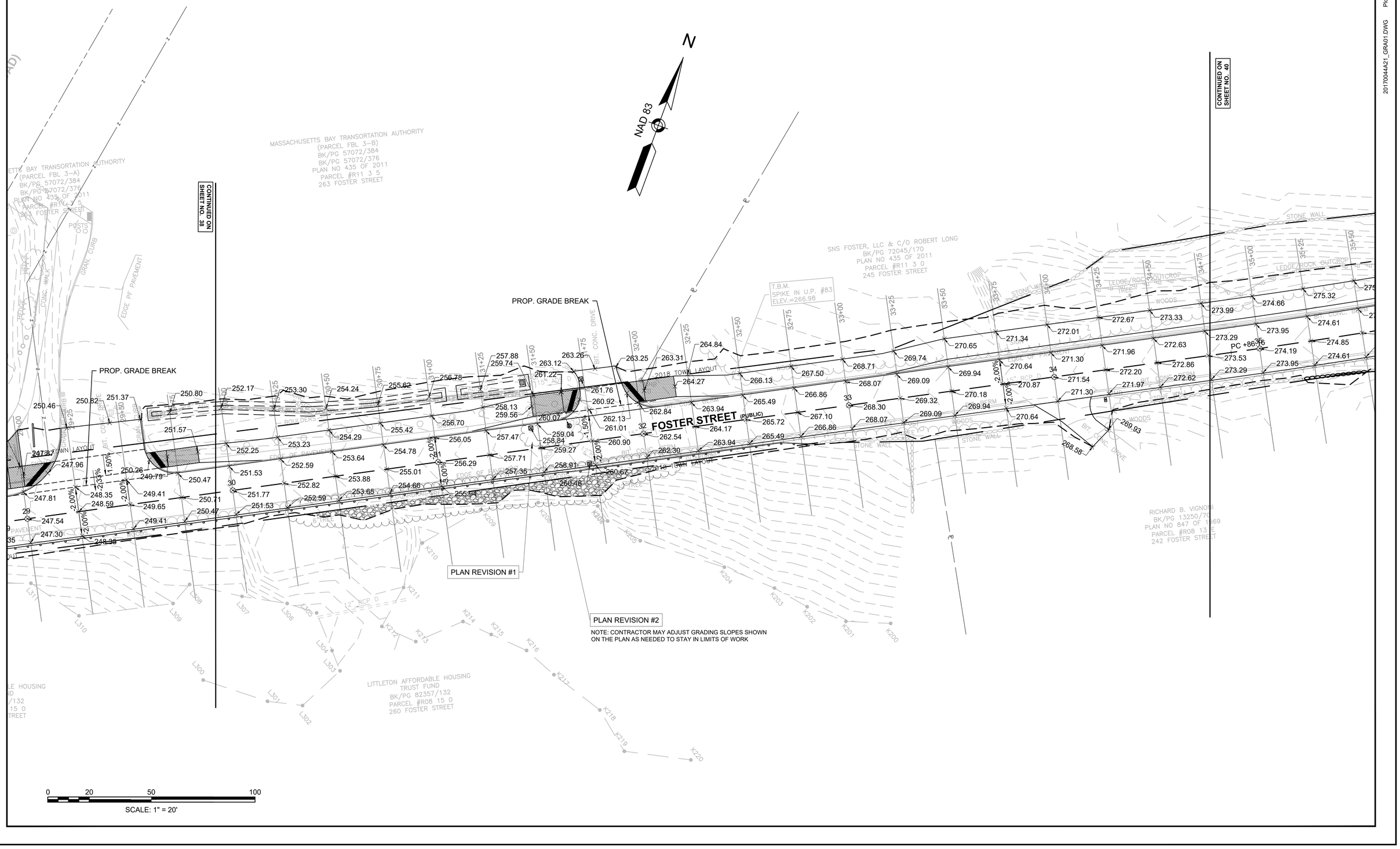
20170044A21_GRA01.DWG Plotted on 21-Mar-2025 9:18 AM

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	39	128
PROJECT FILE NO.	609054		

GRADING PLAN

20170044A21_GRA01.DWG Plotted on 21-Mar-2025 9:19 AM



LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	40	128
PROJECT FILE NO.	609054		

GRADING PLAN

20170044A21_GRA01.DWG Plotted on 21-Mar-2025 9:19 AM

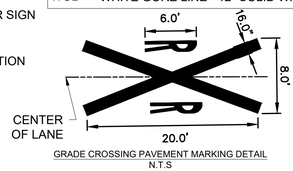
NOTES:

1. ALL EXISTING SIGNS TO REMAIN UNLESS OTHERWISE NOTED ON PLANS
2. ALL PROPOSED PAVEMENT MARKING LINES ON ROADWAYS SHALL BE WET REFLECTORIZED RECESSED THERMOPLASTIC. ALL MARKINGS SHALL BE 6" WIDE, EXCEPT STOP BARS WHICH SHALL BE 12" WIDE.
3. ALL PROPOSED PAVEMENT MARKING LINES ON SHARED-USE PATH SHALL BE PAINTED. ALL MARKINGS SHALL BE 4" WIDE, EXCEPT STOP BARS WHICH SHALL BE 12" WIDE.
4. ANY SIGN LABELED WITH AN " * " SHALL BE MOUNTED ON A SIGN SUPPORT FOR SHARED-USE PATH. THE SUPPORTS SHALL BE 4"x4" PRESSURE TREATED WOOD POSTS AND PLACED AS SHOWN ON THE "TYPICAL SIGN PLACEMENT DETAIL" IN THE CONSTRUCTION DETAILS.
5. ANY OTHER SIGN SHALL BE MOUNTED ON A STANDARD P-5 POST FACTORY COATED GLOSS BLACK AT STANDARD MUTCD HEIGHT UNLESS OTHERWISE SHOWN ON PLANS.
6. ALL R7 SERIES SIGNS (NO PARKING) SHALL BE INSTALLED AT 45 DEGREE ANGLE RELATIVE TO THE ROADWAY. REFER TO THE SIGN SYMBOLS PLACED ON PLANS
7. SEE SIGN SUMMARY ON SHEET 49 FOR SIGN DETAILS

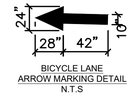
XXXX PROPOSED SIGN DESIGNATION

XXXX EXISTING SIGN DESIGNATION

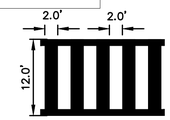
MARKING LEGEND	
▸	PROPOSED SIGN
SL	PROPOSED 12" WHITE STOP LINE / 24" AT RAILROAD CROSSING
CW	PROPOSED 24" WHITE CROSS WALK
SWL	PROPOSED 6" SINGLE WHITE LINE
SYL	PROPOSED 4" SINGLE SOLID YELLOW LINE
BYCL	PROPOSED 4" BROKEN YELLOW CENTER LINE (3' MARK - 9' SKIP)
DBYL	PROPOSED 6" DOUBLE YELLOW LINE
DWLEx	PROPOSED 6" DOTTED WHITE LANE EXTENSION LINE (2' MARK - 6' SKIP)
DYLEx	PROPOSED 6" DOTTED YELLOW LANE EXTENSION LINE (2' MARK -6' SKIP)
WGL	WHITE GORE LINE - 12" SOLID WHITE LINE



GRADE CROSSING PAVEMENT MARKING DETAIL
N.T.S



BICYCLE LANE ARROW MARKING DETAIL
N.T.S



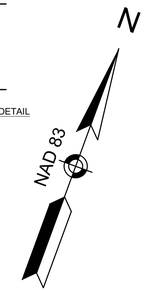
CROSSWALK DETAIL
N.T.S

BICYCLE LANE MARKING DETAIL
N.T.S

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	41	128
PROJECT FILE NO.	609054		

PAVEMENT MARKING & SIGNING PLAN



20170044A21_PVT01.DWG Plotted on 21-Mar-2025 9:20 AM

MERGE TO EXISTING MARKINGS
50 FT FROM LIMIT OF WORK
SEE INSET B

BIKE LANE R3-17

DANIEL SWEENEY (CLASS A TRUSTEE)
ARTURO J. GUTIERREZ, JOHN A. CATALDO (CLASS B TRUSTEES)
TAYLOR STREET, LITTLETON TRUST
BK/PG 32096/213
PARCEL #R10 6 0
TAYLOR STREET

LIMIT OF WORK
STA 205+00.00
N3012961.1405
E653254.4720

WEIGHT LIMIT 20 T 25 T 40 T R12-5

RRFB W11-2 (2) W16-7pL W16-7pR

Littleton/Rte 495 Sta
MA-D1-5a(T)-a

CAUTION DEAF CHILDREN RET.

D11-1* D1-1a-a* BIKE ROUTE Rail Station 0.6

D11-1* M6-1R BIKE ROUTE

R12-5 R&S

BEGINNING OF PROJECT
PROJ. NO. 609054
STA 0+00.00
N3012786.8847
E653296.9381

R1-1 R&S

STOP R1-1b*

STOP R1-1

R9-6* R4-16* YIELD TO PEDS KEEP RIGHT EXCEPT TO PASS

R9-6* R4-16* YIELD TO PEDS KEEP RIGHT EXCEPT TO PASS

W11-2 (2) W16-7pL W16-7pR

SLOW PED XING R&S

PROP. PREFORMED THERMOPLASTIC BIKE LANE MARKINGS - GREEN (SEE SPECIAL PROVISIONS) GREEN MARKING AREA TO BE INSTALLED BETWEEN THE DWLEx

COMMUTER RAIL STATION R&S

SPEED LIMIT 40 R2-1(40)

PROP. PERFORMED THERMOPLASTIC BIKE MARKINGS TYP. (SEE SPECIAL PROVISIONS)

W11-2 W16-7pL

PROP. DWP (DIRECTIONAL BAR TILE OPTION)

R2-1(40) R&S

Littleton/Rte 495 Sta
MA-D1-5a(T)-b

LIMIT OF WORK
STA 201+28.19
N3012602.2313
E653351.1021

BIKE LANE ENDS R3-17 R3-17bP

MERGE TO EXISTING MARKINGS
50 FT FROM LIMIT OF WORK
SEE INSET A

D11-1 M6-2R BIKE ROUTE

BIKE LANE R3-17

W11-2 W16-9P AHEAD

MA-D3-1a R&S

AHEAD W11-2 W16-9P

Foster St
Taylor St
MA-D3-1a (2 MOUNTED BACK TO BACK)
MA-D3-1d (2 MOUNTED BACK TO BACK)

SPEED LIMIT 40 R2-1(40)

R2-1(40) R&S

COMMUTER RAIL STATION R&S

W11-2 W16-7pL

SPEED LIMIT 30 R2-1(30)

R2-1(30) R&S

SLOW PED XING R&S

PLAN REVISION #1

W11-2 (2) W16-7pL W16-7pR

STOP R1-1

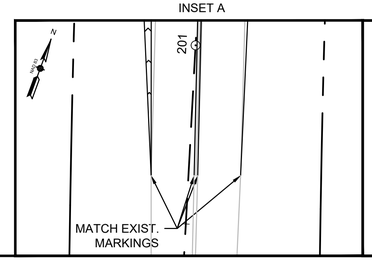
CONTINUED ON SHEET NO. 42

2641–2651 SANTA ANNA AVENUE, LLC
BK/PG 68756/572
PLAN NO 1425 OF 1981
PARCEL #R10 2 1
305 FOSTER STREET

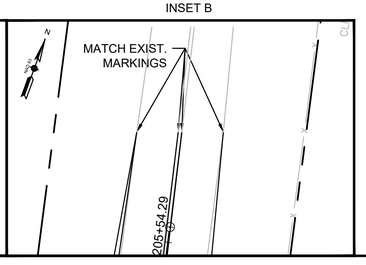
JOHN K. GRADY, TRUSTEE OF THE FOSTER/TAYLOR REALTY TRUST
BK/PG 25198/143
PLAN NO 228 OF 1992
PARCEL #R09 32 0
230 TAYLOR STREET

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

INSET A



INSET B



0 20 50 100
SCALE: 1" = 20'

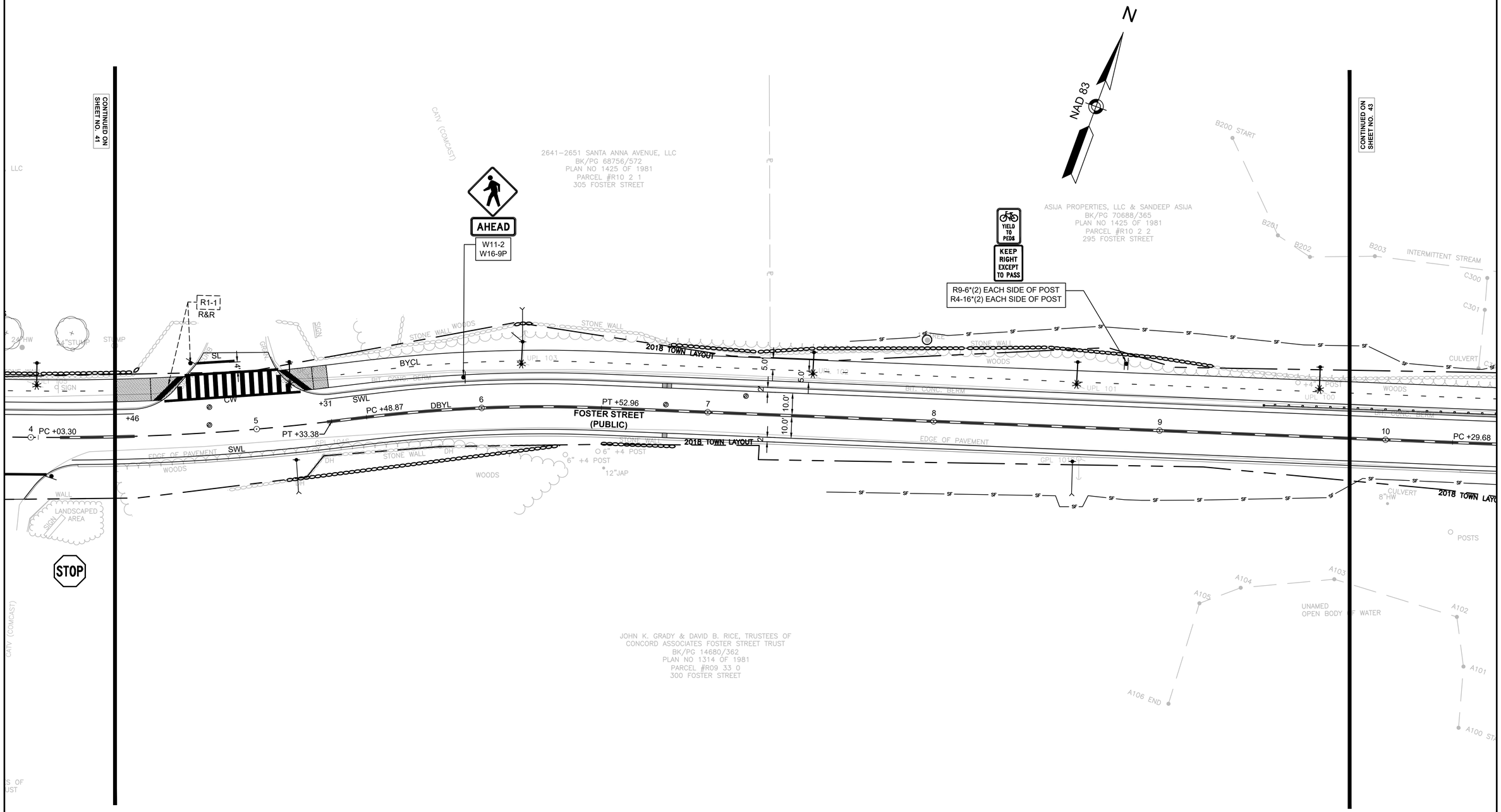
SEE SHEET 41 FOR MARKING & SIGNING NOTES

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	42	128
PROJECT FILE NO.	609054		

PAVEMENT MARKING & SIGNING PLAN

20170044A21_PVT01.DWG Plotted on 21-Mar-2025 9:20 AM



SEE SHEET 41 FOR MARKING & SIGNING NOTES

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	43	128
PROJECT FILE NO.	609054		

PAVEMENT MARKING & SIGNING PLAN

20170044A21_PVT01.DWG Plotted on 21-Mar-2025 9:20 AM

CONTINUED ON SHEET NO. 42

CONTINUED ON SHEET NO. 44

NAD 83

BIKE ROUTE
Rail Station 0.4
D11-1*
D1-1a-b*

BIKE ROUTE
Taylor St 0.2
D11-1*
D1-1a-c*

REAL ESTATE SIGN
R&S

R1-1
R&R

RETAIN ENTRANCE SIGN

PLAN REVISION #1

2018 TOWN LAYOUT

FOSTER STREET (PUBLIC)

PC +29.68
PT +28.61
PC +80.50

BYCL
SWL
CW
SL
EDGE OF PAVEMENT

14-1"
1000 FEET
W12-2
(14' 1")
W16-2P

W12-2
R&S

B200 START
B201
B202
B203
B204
INTERMITTENT STREAM
C300
C301
CULVERT
8"HW
POSTS
STONE WALL
WOODS
CATV (COMCAST)
EP ASIJA

D400 START
D401
D402
D403
D404
D405
D406
D407
D408
D409
D410

ASIJA PROPERTIES
BK/PG 7060/...
PLAN NO 1425 OF 19...
PARCEL #R10 2 2
295 FOSTER STREET

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZO
BK/PG 17697/108
PLAN NO 831 OF 1973
PARCEL #R09 1 G
290 FOSTER STREET

UNAMED OPEN BODY OF WATER
A100 START
A101
A102
A103
A104
A105

E500 START
E501
E502
WF

SCALE: 1" = 20'

SEE SHEET 41 FOR MARKING & SIGNING NOTES

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	44	128
	PROJECT FILE NO. 609054		

PAVEMENT MARKING & SIGNING PLAN

20170044A21_PVT01.DWG Plotted on 21-Mar-2025 9:20 AM

NAD 83 N

CONTINUED ON SHEET NO. 43

CONTINUED ON SHEET NO. 45

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70688/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

JORDAN S. MCCATHERIN
BK/PG 62917/52
PARCEL #R10 1 0
277 FOSTER STREET

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZOLO
BK/PG 17691/208
PLAN NO 831 OF 1973
PARCEL #R09 5 G
290 FOSTER STREET

BROCKTON KENYON & AINE COLLINS
BK/PG 72894/208
PLAN NO 831 OF 1973
PARCEL #R09 5 F
286 FOSTER STREET

GREGORY & SHERI BALZOTTI
BK/PG 50902/470
PLAN NO 831 OF 1973
PARCEL #R09 5 E
284 FOSTER ST

JOSEPH W. & AMANDA LENNON,
LIVING TRUSTEES OF THE
AMANDA+JOSEPH LENNON LIVING TRUST
BK/PG 64219/262
PLAN NO 1628 OF 1972
PARCEL #R09 5 A
3 BULKELEY ROAD

FOSTER STREET (PUBLIC)

BULKELEY ROAD (PUBLIC)

1950 TOWN LAYOUT SEE SHLO NO. 3786

1950 TOWN LAYOUT SEE S

2018 TOWN LAYOUT

PLAN REVISION #1

R7-11 R&S

R7-201 R&S

PC +80.91

PT +95.95

SWL

DBYL

BYCL

EDGE OF PAVEMENT

STONE WALL

BIT. CONC. DRIVE

GRAN. CURB

GARAGE

WOODS

LANDSCAPED AREA

MEMORIAL MONUMENT

BIT. CONC. PATH

YIELD TO PEDS

KEEP RIGHT EXCEPT TO PASS

R9-6* (2) EACH SIDE OF POST
R4-16* (2) EACH SIDE OF POST

Littleton/Rte 495 Sta

MA-D1-5a(T)-c

AHEAD

W11-2
W16-9P

400 FEET

W12-2
(14' 1")
W16-2P

14-1"

0 20 50 100

SCALE: 1" = 20'

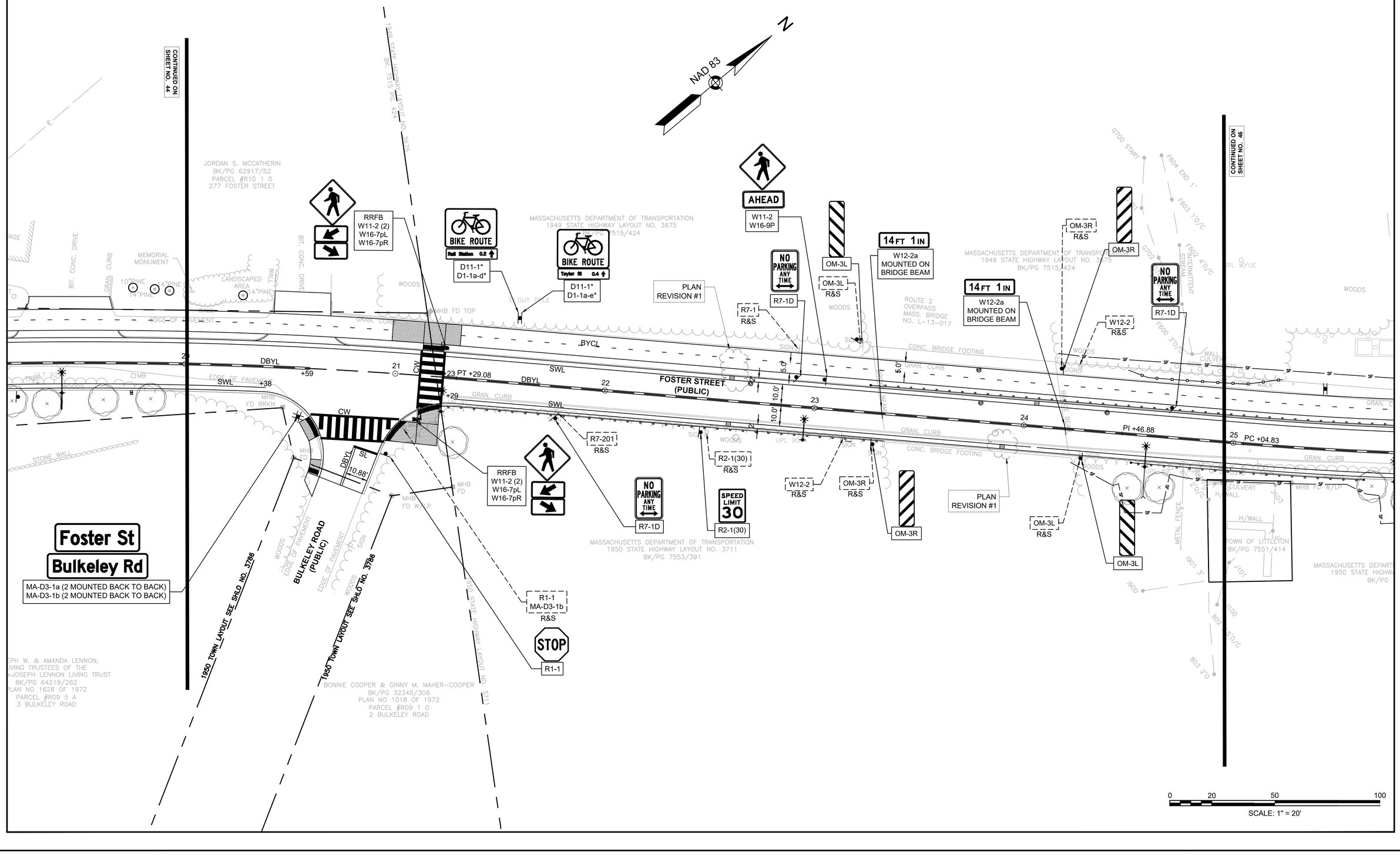
SEE SHEET 41 FOR MARKING & SIGNING NOTES

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	45	128
PROJECT FILE NO.	609054		

PAVEMENT MARKING & SIGNING PLAN

20170044A21_PVT01.DWG Plotted on 21-Mar-2025 9:20 AM



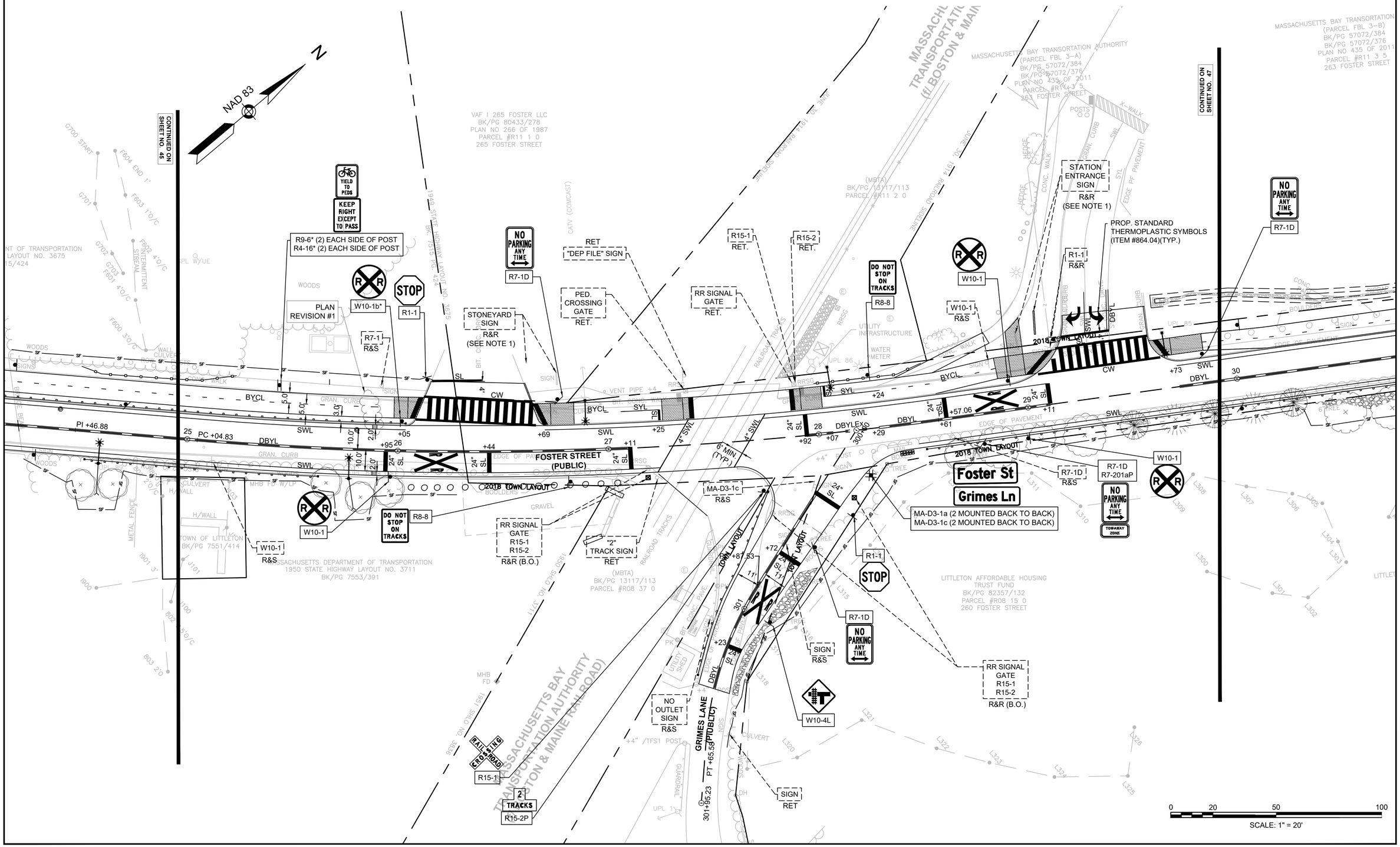
SEE SHEET 41 FOR MARKING & SIGNING NOTES

NOTES
1. REMOVE AND RESET OF THESE SIGNS SHALL BE PAID FOR UNDER ITEM 874.85

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	46	128
PROJECT FILE NO.	609054		

PAVEMENT MARKING & SIGNING PLAN



SEE SHEET 41 FOR MARKING & SIGNING NOTES

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	47	128
PROJECT FILE NO.	609054		

PAVEMENT MARKING & SIGNING PLAN

20170044A21_PVT01.DWG Plotted on 21-Mar-2025 9:20 AM

NAD 83

N

CONTINUED ON SHEET NO. 46

CONTINUED ON SHEET NO. 48

MASSACHUSETTS BAY TRANSORTATION AUTHORITY
(PARCEL FBL 3-B)
BK/PG 57072/384
BK/PG 57072/376
PLAN NO 435 OF 2011
PARCEL #R11 3 5
263 FOSTER STREET

MASSACHUSETTS BAY TRANSORTATION AUTHORITY
(PARCEL FBL 3-A)
BK/PG 57072/384
BK/PG 57072/376
PLAN NO 435 OF 2011
PARCEL #R11 3 5
263 FOSTER STREET

SNS FOSTER, LLC & C/O ROBERT LONG
BK/PG 72045/170
PLAN NO 435 OF 2011
PARCEL #R11 3 0
245 FOSTER STREET

LITTLETON AFFORDABLE HOUSING
TRUST FUND
BK/PG 82357/132
PARCEL #R08 15 0
260 FOSTER STREET

RICHARD B. VIGNOLI
BK/PG 13250/77
PLAN NO 847 OF 1959
PARCEL #R08 13
242 FOSTER STREET

FOSTER STREET
(PUBLIC)

14'-1"
600 FEET
W12-2
(14' 1")
W16-2P

R7-1D
R&S

NO PARKING ANY TIME
R7-1D

STOP
R1-1

2018 TOWN LAYOUT

SWL
DBYL
BYCL
EDGE OF PAVEMENT
BIT. CONC. BERM
BIT. CONC. DRIVE
STONE WALL
LEDGE/ROCK OUTCROP
WOODS
TREE
SIGN
CW
SL
UPL 82.5 ±
UPL 85

PLAN REVISION #1

PC +85.16

0 20 50 100
SCALE: 1" = 20'

SEE SHEET 41 FOR MARKING & SIGNING NOTES

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	48	128
PROJECT FILE NO.	609054		

PAVEMENT MARKING & SIGNING PLAN

20170044A21_PVT01.DWG Plotted on 21-Mar-2025 9:20 AM

NAD 83

N

CONTINUED ON SHEET NO. 47

SPEED LIMIT 30
R2-1(30)

PLAN REVISION #1

BIKE ROUTE
Rail Station 0.1
Taylor St 0.7
D11-1*
D1-2a*

BIKE ROUTE
END
USE PED SIGNAL
D11-1*
M4-6*
R9-5*

NO MOTOR VEHICLES
R5-3*

YIELD TO PEDS
KEEP RIGHT EXCEPT TO PASS
R9-6*
R4-16*

RRFB
W11-2 (2)
W16-7pR
W16-7pL

BIKE ROUTE
D11-1
M6-2R

Littleton/Rte 495 Sta
MA-D1-5a(T)-c

AHEAD
W11-2
W16-9p

END OF PROJECT
PROJ. NO. 609054
STA. 39+36.15
N 3015278.1762
E 656130.7752

MATCH EXISTING MARKINGS

AHEAD
W11-2
W16-9P

ON ROADWAY
W11-1
MA-W16-19P

RRFB
W11-2 (2)
W16-7pR
W16-7pL

R1-1
MA-D3-1
(BALSAM LN)
R&R

FOSTER STREET (PUBLIC)

BALSAM LANE (PUBLIC)

2018 TOWN LAYOUT

2020 TOWN LAYOUT

PC +86.16

PT +90.37

PC +06.15

SWL +61

DWLEx +82

PT +11.89

39+98.64

SNS FOSTER, LLC & C/O ROBERT LONG
BK/PG 72045/170
PLAN NO 435 OF 2011
PARCEL #R11 3 0
245 FOSTER STREET

PATRICIA A. NARGIZIAN
BK/PG 70735/467
PARCEL #R11 5 4
237 FOSTER STREET

RICHARD B. VIGNONI
BK/PG 13250/70
PLAN NO 847 OF 1969
PARCEL #R08 13 E
242 FOSTER STREET

QUINN E. & JENNIFER A. CANFIELD
BK/PG 55588/290
PLAN NO 188 OF 1971
PARCEL #R08 13 D
238 FOSTER STREET

0 20 50 100
SCALE: 1" = 20'

GENERAL NOTES:

1. IF EXISTING PIPES SHOWN TO BE REMOVED ARE WITHIN THE LIMITS OF NEW PIPE TRENCH EXCAVATION, THEN THE REMOVAL COST OF THE OLD PIPES SHALL BE INCLUDED IN THE UNIT COST FOR THE NEW PIPE THAT IS BEING INSTALLED. IF PIPES SHOWN TO BE REMOVED ARE OUTSIDE THE LIMITS OF NEW PIPE TRENCH (AS DETERMINED BY THE ENGINEER), THEN REMOVAL COST SHALL BE PAID UNDER ITEM 141. CLASS A TRENCH EXCAVATION.
2. ALL PROPOSED (NEW) CATCH BASINS SHALL HAVE 4' SUMPS.
3. ALL CATCH BASINS WITHIN THE PAVED ROADWAY SHALL HAVE CASCADE STYLE/BICYCLE SAFE GRATES UNLESS OTHERWISE NOTED ON THE PLANS.
4. ALL ELEVATIONS, STATIONS, AND OFFSETS FOR ALL CATCH BASINS AND DRAINAGE MANHOLES COME FROM CENTER OF COVER OR GRATE.
5. CONTRACTOR SHALL USE APPROPRIATELY SIZED RCP TO MATCH INTO EXISTING PIPES AS SHOWN.

TEST PIT NOTES:

1. ALL TEST PITS RELATED TO THE PROPOSED DRAINAGE SYSTEM INSTALLATIONS SHALL BE COMPLETED BY THE CONTRACTOR BEFORE DRAINAGE STRUCTURES ARE ORDERED.

ELECTRICAL NOTES:

1. CONTRACTOR SHALL COORDINATE WITH LITTLETON LIGHT AND ELECTRIC DEPT. (LELD) ON THE TIMING OF TRANSFER FOR PRIMARY RISER AT UTILITY POLES #78, #99, #104, AND #105. DISRUPTION TO COMMERCIAL PROPERTIES SHALL BE MINIMIZED BY WEEKEND WORK OR THE USE OF GENERATORS.

TREE TRIMMING NOTES:

1. LIMITS OF SELECTIVE CLEARING AND THINNING SHALL BE 10FT OFFSET BACK FROM ANY RESET OHW OR AS SHOWN ON CONSTRUCTION PLANS.

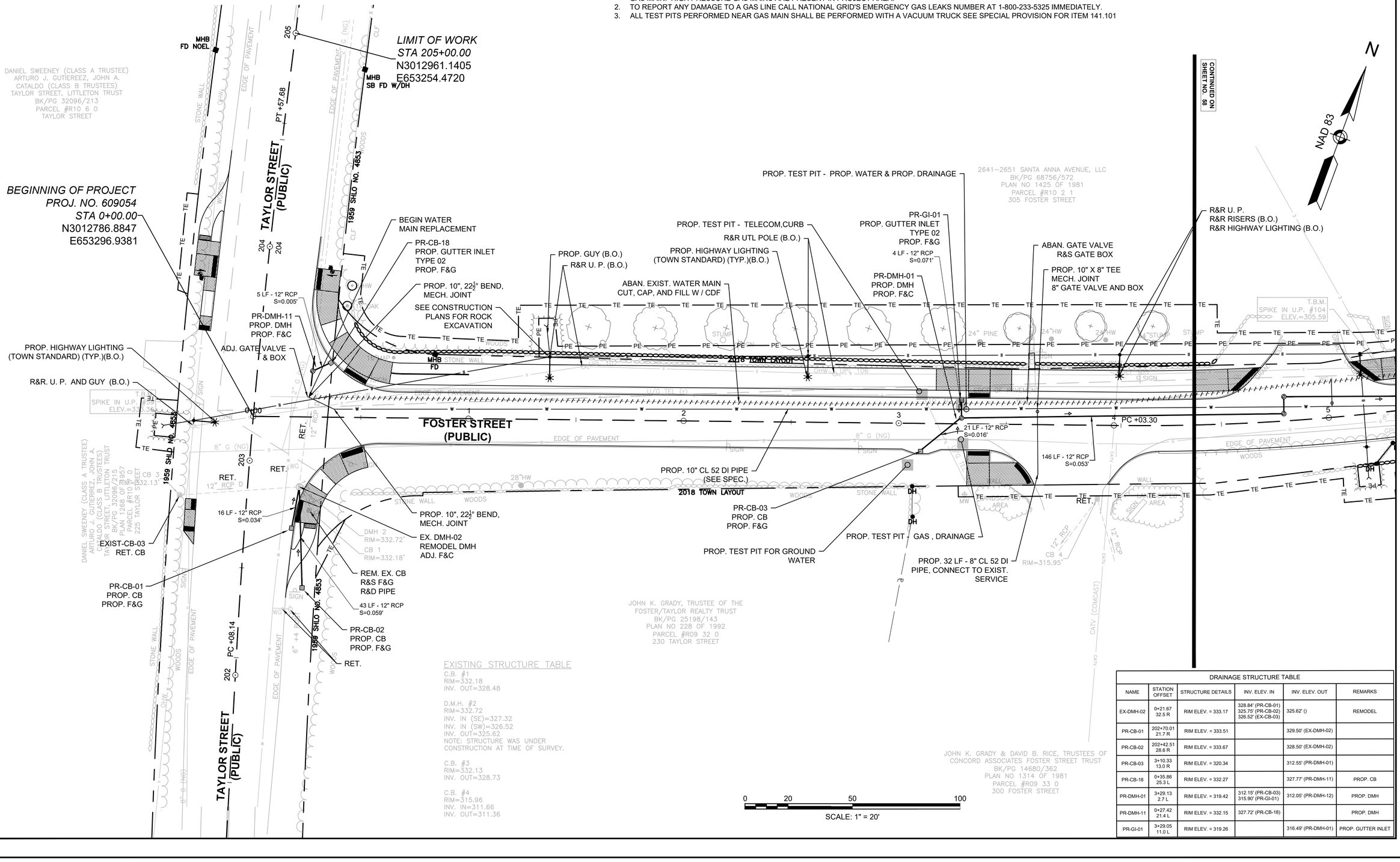
GAS NOTES:

1. NOTIFY NATIONAL GRID DAMAGE PREVENTION, MEGHAN KELLEY, AT(339) 203-0490 TWO WEEKS PRIOR TO EXCAVATING NEAR REGULATOR STATION OR GAS MAIN. HIGH PRESSURE GAS MAINS ARE PRESENT IN PROJECT AREA.
2. TO REPORT ANY DAMAGE TO A GAS LINE CALL NATIONAL GRID'S EMERGENCY GAS LEAKS NUMBER AT 1-800-233-5325 IMMEDIATELY.
3. ALL TEST PITS PERFORMED NEAR GAS MAIN SHALL BE PERFORMED WITH A VACUUM TRUCK SEE SPECIAL PROVISION FOR ITEM 141.101

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	57	128
PROJECT FILE NO.	609054		

DRAINAGE & UTILITY PLANS



DRAINAGE STRUCTURE TABLE

NAME	STATION OFFSET	STRUCTURE DETAILS	INV. ELEV. IN	INV. ELEV. OUT	REMARKS
EX-DMH-02	0+21.67 32.5 R	RIM ELEV. = 333.17	328.84' (PR-CB-01) 325.75' (PR-CB-02) 326.52' (EX-CB-03)	325.62' ()	REMODEL
PR-CB-01	202+70.01 21.7 R	RIM ELEV. = 333.51		329.50' (EX-DMH-02)	
PR-CB-02	202+42.51 28.6 R	RIM ELEV. = 333.67		328.50' (EX-DMH-02)	
PR-CB-03	3+10.33 13.0 R	RIM ELEV. = 320.34		312.55' (PR-DMH-01)	
PR-CB-18	0+35.86 25.3 L	RIM ELEV. = 332.27		327.77' (PR-DMH-11)	PROP. CB
PR-DMH-01	3+29.13 2.7 L	RIM ELEV. = 319.42	312.15' (PR-CB-03) 315.90' (PR-GI-01)	312.05' (PR-DMH-12)	PROP. DMH
PR-DMH-11	0+27.42 21.4 L	RIM ELEV. = 332.15	327.72' (PR-CB-18)		PROP. DMH
PR-GI-01	3+29.05 11.0 L	RIM ELEV. = 319.26		316.49' (PR-DMH-01)	PROP. GUTTER INLET

NOTES:
1. SEE SHEET 57 FOR GENERAL UTILITY, ELECTRICAL AND TREE TRIMMING NOTES

2. * - CONTRACTOR TO MATCH EXISTING PIPE INVERT. INVERT GIVEN IS APPROXIMATE

GAS NOTES:
1.NOTIFY NATIONAL GRID DAMAGE PREVENTION, MEGHAN KELLEY, AT(339) 203-0490 TWO WEEKS PRIOR TO EXCAVATING NEAR REGULATOR STATION OR GAS MAIN. HIGH PRESSURE GAS MAINS ARE PRESENT IN PROJECT AREA.
2.TO REPORT ANY DAMAGE TO A GAS LINE CALL NATIONAL GRID'S EMERGENCY GAS LEAKS NUMBER AT 1-800-233-5325 IMMEDIATELY.
3. ALL TEST PITS PERFORMED NEAR GAS MAIN SHALL BE PERFORMED WITH A VACUUM TRUCK SEE SPECIAL PROVISION FOR ITEM 141.101

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	58	128
PROJECT FILE NO.	609054		

DRAINAGE & UTILITY PLANS

CONTINUED ON SHEET NO. 57

CONTINUED ON SHEET NO. 59

N

NAD 83

2641–2651 SANTA ANNA AVENUE, LLC
BK/PG 68756/572
PLAN NO 1425 OF 1981
PARCEL #R10 2 1
305 FOSTER STREET

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70688/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF
CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

FOSTER STREET (PUBLIC)

PROP. TEST PIT - WATER & PROP. DRAINAGE
PR-CBDB-01
PROP. CBDB
PROP. F&G
5 LF - 12" RCP S=0.046'
32 LF - 12" RCP S=0.032'
REM. CBDB
R&S F&G
ABANDON PIPES
PR-DMH-04
PROP. DMH, PROP. F&C
REM. EX. DMH
6 LF -12" RCP
MATCH EXIST. PIPE
R&R UTL POLE (B.O.)
R&R UTL POLE
REM. GUY (B.O.)
ABAN. EXIST. WATER MAIN CUT, CAP, AND FILL W / CDF
PROP. HYDRANT
PROP. 6" CL 52 DI PIPE
PROP. 10" X 6" TEE MECH. JOINT 6" GATE VALVE AND BOX
R&S EXIST. HYDRANT
R&R UTL POLE
PROP. GUY (B.O.)
R&S GATE VALVE & BOX
PROP. HIGHWAY LIGHTING (TOWN STANDARD) (TYP.)(B.O.)
R&R U. P. (B.O.)
R&R ELEC.SERVICE RISER (B.O.)
R&R TELECOM RISER (B.O.)
PROP. 14 LF - 6" CL 52 DI PIPE, CONNECT TO EXIST. SERVICE
DMH-02
PROP. DMH
PROP. F&C
4 LF - 12" RCP S=0.005'
ADJ. GG (B.O.)
R&R U. P. (B.O.)
R&R TELECOM RISER (B.O.)
DEFLECT MECH. JOINT 4°
ABAN. EXIST. WATER MAIN CUT, CAP, AND FILL W / CDF
R&R. EX. UNGD. CONDUIT (B.O.)
NOTE: C.B. 5 IS A DOUBLE-SIZED STRUCTURE.
2018 TOWN LAYOUT
REMOVE PIPES TO NEAREST JOINT
ADJ. F&C
PC +03.30
PT +33.38
PC +48.87
PT +52.68
DEFLECT MECH. JOINT 2°
DMH-03
PROP. DMH
PROP. F&C
9 LF - 12" RCP S=0.014'
199 LF - 12" RCP S=0.096'
R&R STUB POLE & GUY WIRE (B.O.)
PROP. 10 " X 6" TEE MECH. JOINT 6" GATE VALVE AND BOX
DMH-12
PROP. DMH
PROP. F&C
PROP. TEST PIT - GAS PROP. WATER & PROP. DRAINAGE
PR-CB-04
PROP. CB
PROP. F&G
PROP. TEST PIT - GAS, PROP. WATER, AND CB
REM. EX.CB
R&S F&G
ABANDON PIPES
PROP. 10" CL 52 DI PIPE (SEE SPEC.)
R&R STUB POLE & GUY WIRE (B.O.)
PROP. TEST PIT - GAS
PROP. 10" GATE VALVE AND BOX
PC +29.68
PLAN REVISION #3

B200 START
B201
B202
B203
INTERMITTENT STREAM
C300
C301
A101
A102
A103
A104
A105
A106 END
UNAMED OPEN BODY OF WATER

EXISTING STRUCTURE TABLE

C.B. #5
RIM=285.58
INV. OUT=281.58

C.B. #6
RIM=285.37
INV. OUT=280.87

D.M.H. #7
RIM=284.93
INV. IN (S)=280.43
INV. IN (W)=280.93
INV. OUT=280.43

D.M.H. #8
RIM=272.34
INV. IN=268.74
INV. OUT=268.64

0 20 50 100
SCALE: 1" = 20'

DRAINAGE STRUCTURE TABLE

NAME	STATION OFFSET	STRUCTURE DETAILS	INV. ELEV. IN	INV. ELEV. OUT	REMARKS
PR-CB-04	6+81.35 11.0 R	RIM ELEV. = 288.54		283.54' (PR-DMH-03)	
PR-CBDB-1	6+81.56 11.0 L	RIM ELEV. = 288.52		284.39' (PR-DMH-03)	
PR-DMH-02	4+79.77 11.3 L	RIM ELEV. = 308.41	303.94' (PR-DMH-12)	303.83' (PR-DMH-03)	PROP. DMH
PR-DMH-03	6+81.54 2.5 L	RIM ELEV. = 288.86	284.00' (PR-CBDB-1) 284.52' (PR-DMH-02) 283.35' (PR-CB-04)	281.83' (PR-DMH-04)	PROP. DMH
PR-DMH-04	7+16.60 7.8 L	RIM ELEV. = 284.95	280.69' (PR-DMH-03)	280.43' ()	PROP. DMH
PR-DMH-12	4+79.25 3.4 L	RIM ELEV. = 308.60	304.08' (PR-DMH-01)	303.98' (PR-DMH-02)	PROP. DMH

Plotted on 29-Apr-2025 3:15 PM

20170044A21_COLOR_UTL01_AMENDED ORDER.DWG

NOTES:
1. SEE SHEET 57 FOR GENERAL UTILITY, ELECTRICAL AND TREE TRIMMING NOTES
2. * - CONTRACTOR TO MATCH EXISTING PIPE INVERT. INVERT GIVEN IS APPROXIMATE

GAS NOTES:
1.NOTIFY NATIONAL GRID DAMAGE PREVENTION, MEGHAN KELLEY, AT(339) 203-0490 TWO WEEKS PRIOR TO EXCAVATING NEAR REGULATOR STATION OR GAS MAIN. HIGH PRESSURE GAS MAINS ARE PRESENT IN PROJECT AREA.
2.TO REPORT ANY DAMAGE TO A GAS LINE CALL NATIONAL GRID'S EMERGENCY GAS LEAKS NUMBER AT 1-800-233-5325 IMMEDIATELY.
3. ALL TEST PITS PERFORMED NEAR GAS MAIN SHALL BE PERFORMED WITH A VACUUM TRUCK SEE SPECIAL PROVISION FOR ITEM 141.101

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	59	128
PROJECT FILE NO.	609054		

DRAINAGE & UTILITY PLANS

CONTINUED ON SHEET NO. 58

CONTINUED ON SHEET NO. 60

NAD 83

FOSTER STREET (PUBLIC)

2018 TOWN LAYOUT

RET. STONE SPILLWAY AND EXIST. OUTLET

EX-CB-10 REMODEL CB ADJ. F&G

RET.

NOTE: POWER DISRUPTIONS AT U.P. 99 SHOULD BE LIMITED TO WEEKENDS TO AVOID NEED TO PROVIDE GENERATOR FOR ADJACENT INDUSTRIAL PARK.

R&R U. P. (B.O.) PRIMARY RISER TO BE RELOCATED TO PROP. U.P.(B.O.)

R&S GATE VALVE & BOX

R&R U.P. (B.O.) R&R UNGD TELECOM RISER (B.O.)

PROP. GUY (B.O.)

CUT, CAP, AND FILL W / CDF

PROP. STONE FOR PIPE END (5'X5') (PAID UNDER ITEM #258)

PR-FE-01 PROP. 12' CONC. FLARED END MATCH EXIST. INVERT (APPROX.)

REM. EX.CB R&S F&G R&D PIPE

22 LF - 12" RCP S=0.020'

PROP. TEST PIT - WATER, DRAIN

PR-DMH-05 PROP. DMH PROP. F&C

PR-CB-06 PROP. CB PROP. F&G

18 LF - 12" RCP S=0.008'

4 LF - 12" RCP S=0.010'

REMOVE EX. DMH-09 ADJ. F&C

RET. EX. CB

RET. EX. PIPE OUTLET

DEFLECT MECH. JOINT 3°

EX-CB-11 REMODEL CB ADJ. F&G

PROP. TEST PIT - GAS, PROP.WATER, DRAIN

20 LF - 6" CL 52 DI WATER SERVICE, CONNECT TO EXIST. SERVICE

PROP. 10" X 6" TEE MECH. JOINT 6" GATE VALVE AND BOX

PROP. 10" CL 52 DI PIPE (SEE SPEC.)

ABAN. EXIST. WATER MAIN CUT, CAP, AND FILL W / CDF

PROP. 10", 11¼° BEND, MECH. JOINT

PROP. HIGHWAY LIGHTING (TOWN STANDARD) (TYP.)(B.O.)

PROP. TEST PIT - GAS

PR-CB-05 PROP. CB PROP. F&G

REM.EX.DMH

REM. EX.CB R&S F&G R&D PIPE

R&R. U. P. (B.O.)

R&R. GUY WIRES AS NEEDED (B.O.)

PROP. 10", 11¼° BEND, MECH. JOINT

PC +29.68

PT +28.61

PC +80.50

EXISTING STRUCTURE TABLE

D.M.H. #9
RIM=265.69
INV. IN (NE)=261.39
INV. IN (SE)=261.29
INV. IN (S)=260.19
INV. IN (W)=261.29
INV. OUT=260.19

C.B. #10
RIM=265.16
INV. OUT=261.66

C.B. #11
RIM=265.34
INV. OUT=261.34

C.B. #12
RIM=266.18
INV. IN (S)=264.18
INV. IN (W)=263.48
INV. OUT=261.28

C.B. #13
RIM=282.35
NOTE: FILLED WITH DEBRIS.

C.B. #14
RIM=254.44
INV. OUT=250.94

D.M.H. #15
RIM=254.68
INV. IN=250.98
INV. OUT=251.28

C.B. #16
RIM=253.58
INV. IN=250.98
INV. OUT=250.38

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

ASUA PROPERTIES
BK/PG 7068[illegible]
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZ
BK/PG 17691 108
PLAN NO 831 OF 1973
PARCEL #R09 [illegible]
290 FOSTER STREET

DRAINAGE STRUCTURE TABLE					
NAME	STATION OFFSET	STRUCTURE DETAILS	INV. ELEV. IN	INV. ELEV. OUT	REMARKS
PR-CB-05	13+99.37 11.0 R	RIM ELEV. = 255.31		250.85' (PR-DMH-05)	
PR-CB-06	14+05.22 11.0 L	RIM ELEV. = 255.23		250.77' (PR-DMH-05)	PROP-CB
PR-DMH-05	14+11.89 6.8 L	RIM ELEV. = 255.23	250.69' (PR-CB-06) 250.67' (PR-CB-05)	250.57' (PR-FE-01)	PROP. DMH
PR-FE-01	14+16.61 30.5 L	RIM ELEV. = 251.75	250.08' (PR-DMH-05)		FLARED END

0 20 50 100
SCALE: 1" = 20'

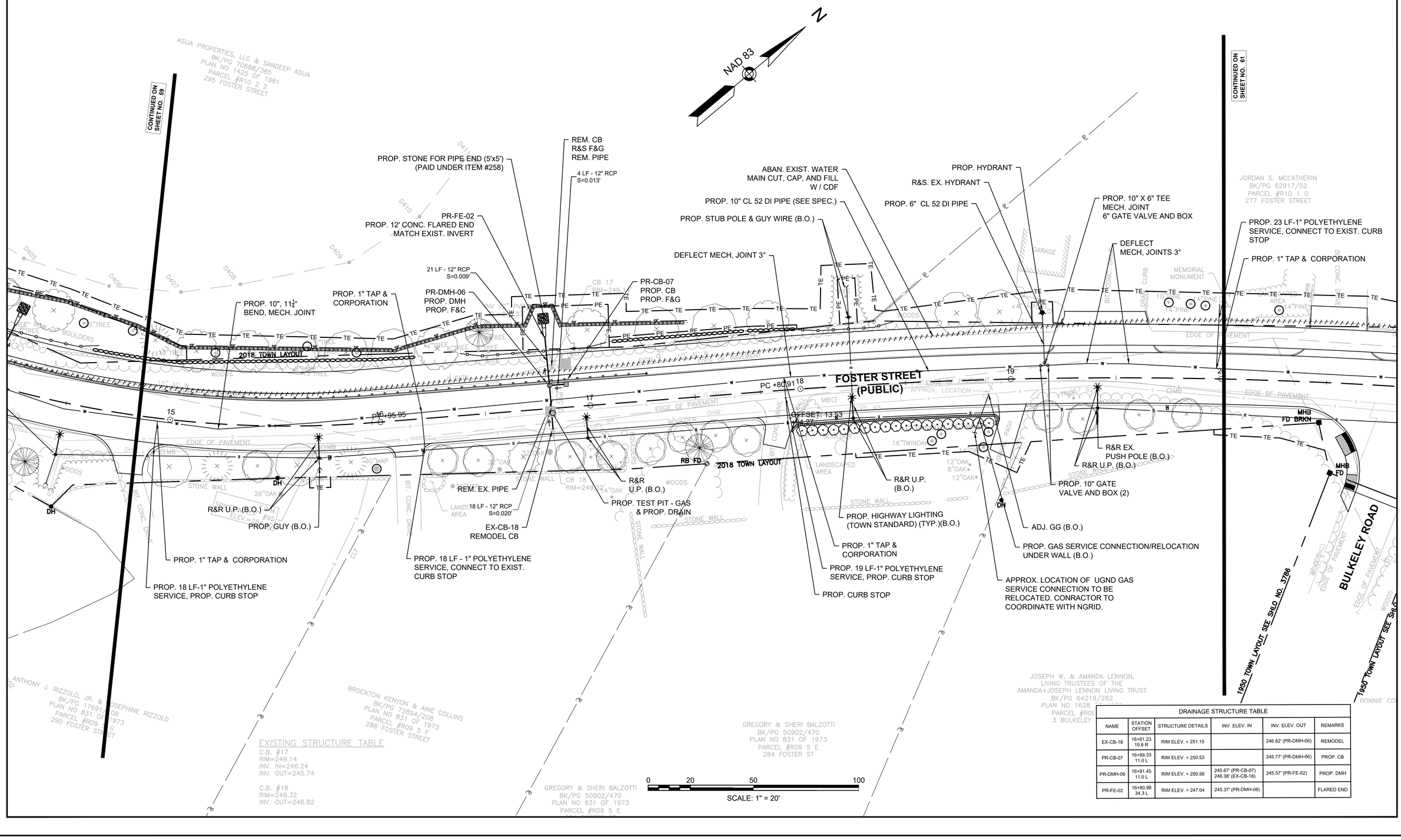
NOTES:
1. SEE SHEET 57 FOR GENERAL UTILITY, ELECTRICAL AND TREE TRIMMING NOTES
2. * - CONTRACTOR TO MATCH EXISTING PIPE INVERT. INVERT GIVEN IS APPROXIMATE

GAS NOTES:
1.NOTIFY NATIONAL GRID DAMAGE PREVENTION, MEGHAN KELLEY, AT(339) 203-0490 TWO WEEKS PRIOR TO EXCAVATING NEAR REGULATOR STATION OR GAS MAIN. HIGH PRESSURE GAS MAINS ARE PRESENT IN PROJECT AREA.
2.TO REPORT ANY DAMAGE TO A GAS LINE CALL NATIONAL GRID'S EMERGENCY GAS LEAKS NUMBER AT 1-800-233-5325 IMMEDIATELY.
3. ALL TEST PITS PERFORMED NEAR GAS MAIN SHALL BE PERFORMED WITH A VACUUM TRUCK SEE SPECIAL PROVISION FOR ITEM 141.101

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	60	128
PROJECT FILE NO.	609054		

DRAINAGE & UTILITY PLANS



EXISTING STRUCTURE TABLE

C.B. #17
RIM=249.14
INV. IN=246.24
INV. OUT=245.74

C.B. #18
RIM=249.32
INV. OUT=246.82

DRAINAGE STRUCTURE TABLE

NAME	STATION OFFSET	STRUCTURE DETAILS	INV. ELEV. IN	INV. ELEV. OUT	REMARKS
EX-CB-18	16+81.23 10.8 R	RIM ELEV. = 251.15		246.82' (PR-DMH-06)	REMODEL
PR-CB-07	16+89.33 11.0 L	RIM ELEV. = 250.53		245.77' (PR-DMH-06)	PROP. CB
PR-DMH-06	16+81.45 11.0 L	RIM ELEV. = 250.56	245.67' (PR-CB-07) 246.38' (EX-CB-18)	245.57' (PR-FE-02)	PROP. DMH
PR-FE-02	16+80.98 34.3 L	RIM ELEV. = 247.04	245.37' (PR-DMH-06)		FLARED END

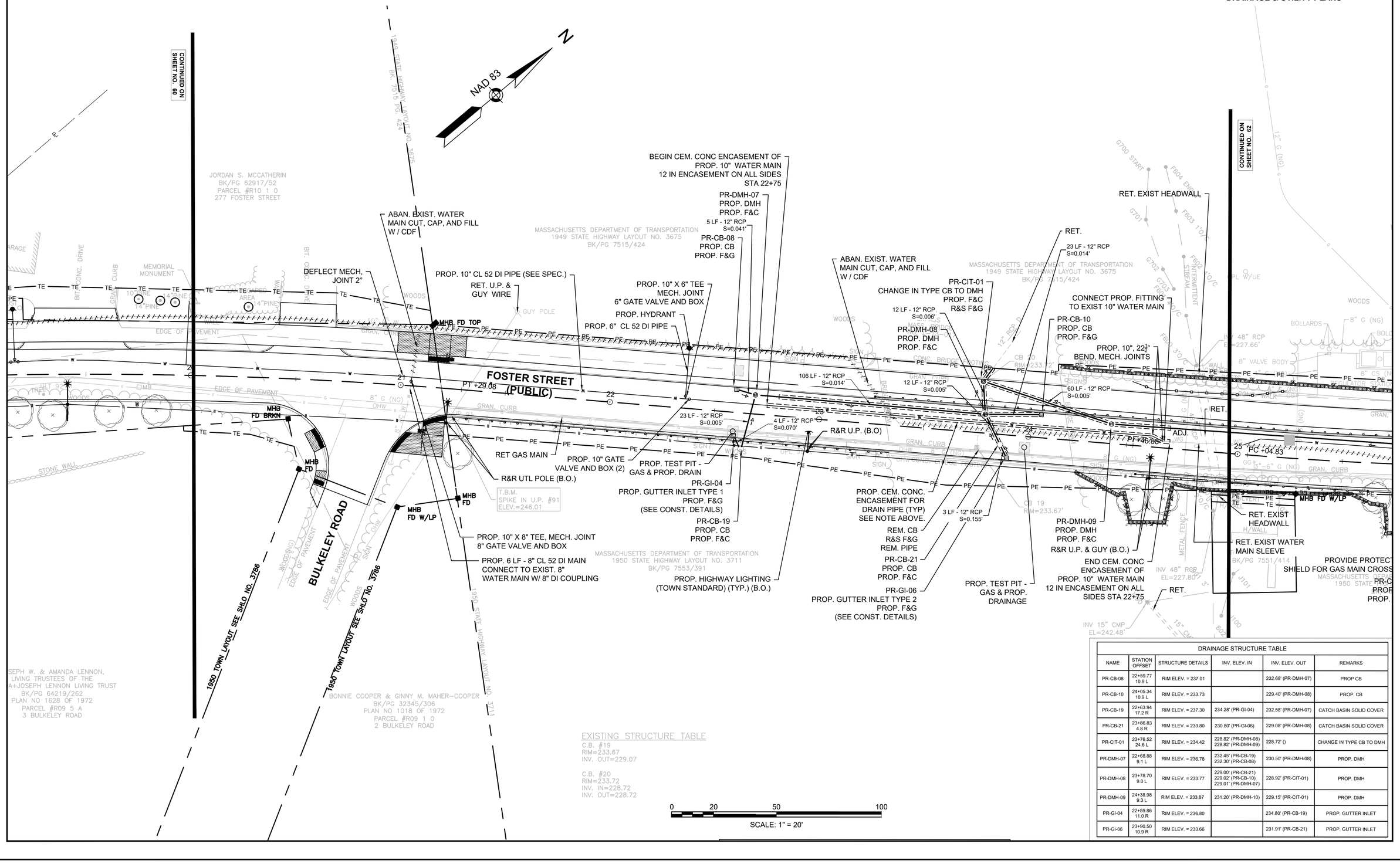
NOTES:
1. SEE SHEET 57 FOR GENERAL UTILITY, ELECTRICAL AND TREE TRIMMING NOTES
2. * - CONTRACTOR TO MATCH EXISTING PIPE INVERT. INVERT GIVEN IS APPROXIMATE

GAS NOTES:
1.NOTIFY NATIONAL GRID DAMAGE PREVENTION, MEGHAN KELLEY, AT(339) 203-0490 TWO WEEKS PRIOR TO EXCAVATING NEAR REGULATOR STATION OR GAS MAIN. HIGH PRESSURE GAS MAINS ARE PRESENT IN PROJECT AREA.
2.TO REPORT ANY DAMAGE TO A GAS LINE CALL NATIONAL GRID'S EMERGENCY GAS LEAKS NUMBER AT 1-800-233-5325 IMMEDIATELY.
3. ALL TEST PITS PERFORMED NEAR GAS MAIN SHALL BE PERFORMED WITH A VACUUM TRUCK SEE SPECIAL PROVISION FOR ITEM 141.101

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	61	128
PROJECT FILE NO.	609054		

DRAINAGE & UTILITY PLANS



EXISTING STRUCTURE TABLE

C.B. #19
RIM=233.67
INV. OUT=229.07

C.B. #20
RIM=233.72
INV. IN=228.72
INV. OUT=228.72

DRAINAGE STRUCTURE TABLE

NAME	STATION OFFSET	STRUCTURE DETAILS	INV. ELEV. IN	INV. ELEV. OUT	REMARKS
PR-CB-08	22+59.77 10.9 L	RIM ELEV. = 237.01		232.68' (PR-DMH-07)	PROP CB
PR-CB-10	24+05.34 10.9 L	RIM ELEV. = 233.73		229.40' (PR-DMH-08)	PROP. CB
PR-CB-19	22+63.94 17.2 R	RIM ELEV. = 237.30	234.28' (PR-GI-04)	232.58' (PR-DMH-07)	CATCH BASIN SOLID COVER
PR-CB-21	23+86.83 4.8 R	RIM ELEV. = 233.80	230.80' (PR-GI-06)	229.08' (PR-DMH-08)	CATCH BASIN SOLID COVER
PR-CIT-01	23+76.52 24.6 L	RIM ELEV. = 234.42	228.82' (PR-DMH-08) 228.82' (PR-DMH-09)	228.72' ()	CHANGE IN TYPE CB TO DMH
PR-DMH-07	22+68.88 9.1 L	RIM ELEV. = 236.78	232.45' (PR-CB-19) 232.30' (PR-CB-08)	230.50' (PR-DMH-08)	PROP. DMH
PR-DMH-08	23+78.70 9.0 L	RIM ELEV. = 233.77	229.00' (PR-CB-21) 229.02' (PR-CB-10) 229.01' (PR-DMH-07)	228.92' (PR-CIT-01)	PROP. DMH
PR-DMH-09	24+38.98 9.3 L	RIM ELEV. = 233.87	231.20' (PR-DMH-10)	229.15' (PR-CIT-01)	PROP. DMH
PR-GI-04	22+59.86 11.0 R	RIM ELEV. = 236.80		234.80' (PR-CB-19)	PROP. GUTTER INLET
PR-GI-06	23+90.50 10.9 R	RIM ELEV. = 233.66		231.91' (PR-CB-21)	PROP. GUTTER INLET

NOTES:
1. SEE SHEET 57 FOR GENERAL UTILITY, ELECTRICAL AND TREE TRIMMING NOTES
2. * - CONTRACTOR TO MATCH EXISTING PIPE INVERT. INVERT GIVEN IS APPROXIMATE

GAS NOTES:
1.NOTIFY NATIONAL GRID DAMAGE PREVENTION, MEGHAN KELLEY, AT(339) 203-0490 TWO WEEKS PRIOR TO EXCAVATING NEAR REGULATOR STATION OR GAS MAIN. HIGH PRESSURE GAS MAINS ARE PRESENT IN PROJECT AREA.
2.TO REPORT ANY DAMAGE TO A GAS LINE CALL NATIONAL GRID'S EMERGENCY GAS LEAKS NUMBER AT 1-800-233-5325 IMMEDIATELY.
3. ALL TEST PITS PERFORMED NEAR GAS MAIN SHALL BE PERFORMED WITH A VACUUM TRUCK SEE SPECIAL PROVISION FOR ITEM 141.101

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	62	128
PROJECT FILE NO.	609054		

DRAINAGE & UTILITY PLANS

NAD 83 N

CONTINUED ON SHEET NO. 61

REGULATOR STATION TO BE RETAINED AND UNDISTURBED
CONTRACTOR TO NOTIFY NATIONAL GRID PRIOR TO ANY WORK IN THIS AREA

CONNECT PROP 10" DI WATER MAIN TO EXIST. 10" CI WATER MAIN W/ 10" DI COUPLING
CONTRACTOR TO USE DI MECH. JOINT BEND TO COMPLETE CONNECTION IF REQUIRED.
ANGLE OF BEND SHALL BE DETERMINED FROM A TEST PIT

VAF I 265 FOSTER LLC
BK/PG 80433/278
PLAN NO 266 OF 1987
PARCEL #R11 1 0
265 FOSTER STREET

PROP. 10" CL 52 DI PIPE (SEE SPEC.)
PR-DMH-10
PROP. DMH
PROP. F&C
5 LF - 12" RCP S=0.040'
DEFLECT MECH JOINT 3°
ADJ. GG (B.O.)
137 LF - 8" D.I. S=0.020'
PROP. TEST PIT
PR-CB-13
PROP. CB
PROP. F&G
DEFLECT MECH JOINT 3°
18 LF - 8" D.I. S=0.005'
PROP. 10" GATE VALVE AND BOX (2)
CONNECT PROP. FITTING TO EXIST 12" WATER MAIN
DEFLECT MECH JOINT 4°
PROP. 10" X 6" TEE, MECH. JOINT
6" GATE VALVE AND BOX
R&S GATE BOX
PROP. 20 LF - 6" CL 52 DI PIPE
PROP. HYDRANT
R&S EXIST. HYDRANT
PROP. 2" TAP & CORPORATION WATER SERVICE CONNECTION
PROP. TEST PIT - GAS, CURB (SEE NOTE 6)
ABAN. EXIST. WATER MAIN CUT, CAP, AND FILL W / CDF
CONTINUED ON SHEET NO. 63

CONNECT PROP. FITTING TO EXIST 10" WATER MAIN
ADJ. GG (B.O.)
MHB FD W/LP
R&R U.P. & GUY (B.O.)
PROP. TEST PITS FOR GAS
PROVIDE PROTECTIVE SHIELD FOR GAS MAIN CROSSING
PR-CB-12
PROP. CB
PROP. F&G
PROP. 10", 22½° BEND, MECH. JOINTS
ABAN. EXIST. WATER MAIN CUT, CAP, AND FILL W / CDF
PROP. 25 LF - 10" CL 52 DI MAIN
PROP. 10" X 10" TEE, MECH. JOINT
10" GATE VALVE AND BOX

PROP. TEST PITS FOR GAS
PROP. 10", 11¼° BEND, MECH. JOINT
PROP. 10" X 12" DI REDUCER
CONNECT PROP. FITTING TO EXIST 12" WATER MAIN
R&R RR GATE & FOUNDATION (B.O. KEOLIS)
RET. 12" WATER MAIN SLEEVE
RET. 18" DI SLEEVE & 12" HDPE SLEEVE
PROP. 10" X 12" DI REDUCER (MBTA)
BK/PG 13117/113
PARCEL #R08 37 0
ADJ. GATE BOX
PROP. 8" CL 52 DI PIPE (25 LF)
CAP & RESTRAIN 8" DI CL 52 PIPE
RET.

PROP. 30 LF - 2" POLYETHYLENE SERVICE, PROP. NEW CURB STOP AT METER.
RET. LIGHT POLE
RET. U.P. & GUY
RET. CABINET
RET. POLE
RET. UTL. CABINET
RET. RR GATE INSTALL LARGER ARM(B.O. KEOLIS)
PROP. 10" X 8" TEE, MECH. JOINT
8" GATE VALVE AND BOX
DEFLECT MECH JOINT 4°
PROP. HIGHWAY LIGHTING (TOWN STANDARD) (TYP.) (B.O.)
RET. GUY
RET. GAS VENT PIPE
RET. RR GATE INSTALL LARGER ARM(B.O. KEOLIS)
RET. U.P.
RET.
PROP. 10" GATE VALVE AND BOX
RET. CB
RET. LP
RET.
PROP. (2) 4" GALVANIZED RIGID STEEL CONDUITS. CONTRACTOR TO INSTALL CONDUITS ONLY. FINAL ROUTING TO BE COORDINATED WITH KEOLIS. ALL OTHER WORK B.O. KEOLIS
R&R RR GATE & FOUNDATION (B.O. KEOLIS)
PC +87.53

UPGRADE U.P. (B.O.)
R&R EXIST. STONES
RET. EX. CB AND PIPE ADJ. F&G INVERT AS NEEDED TO NEW BOTTOM OF SWALE GRADE
PROP. HIGHWAY LIGHTING (TOWN STANDARD)(TYP.)(B.O.)

T.B.M.
SPIKE IN U.P. #87
ELEV.=243.99

FOSTER STREET (PUBLIC)
GRIMES LANE
MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (f/ BOSTON & MAINE RAILROAD)
MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (PARCEL FBL 3-A) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 2011 PARCEL #R11 3 5 263 FOSTER STREET
MASSACHUSETTS BAY TRANSPORTATION (PARCEL FBL 3-B) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 20 PARCEL #R11 3 5 263 FOSTER STREE
LITTLETON AFFORDABLE HOUSING TRUST FUND BK/PG 82357/132 PARCEL #R08 15 0 260 FOSTER STREET
TOWN OF LITTLETON BK/RG 7551/414
MASSACHUSETTS DEPARTMENT OF TRANSPORTATION 1950 STATE HIGHWAY LAYOUT NO. 3511 BK/PG 7515/393
1949 STATE HIGHWAY LAYOUT NO. 3525
2018 TOWN LAYOUT

EXISTING STRUCTURE TABLE
C.B. #21
RIM=250.63
INV. IN=248.13
INV. OUT=248.03

DRAINAGE STRUCTURE TABLE					
NAME	STATION OFFSET	STRUCTURE DETAILS	INV. ELEV. IN	INV. ELEV. OUT	REMARKS
PR-CB-12	25+89.11 11.0 R	RIM ELEV. = 238.69		234.21' (PR-DMH-10)	PROP CB
PR-CB-13	25+88.86 10.9 L	RIM ELEV. = 238.68		234.51' (PR-DMH-10)	PROP CB
PR-DMH-10	25+80.28 9.4 L	RIM ELEV. = 238.33	234.16' (PR-CB-13) 234.10' (PR-CB-12)	234.00' (PR-DMH-09)	PROP. DMH

0 20 50 100
SCALE: 1" = 20'

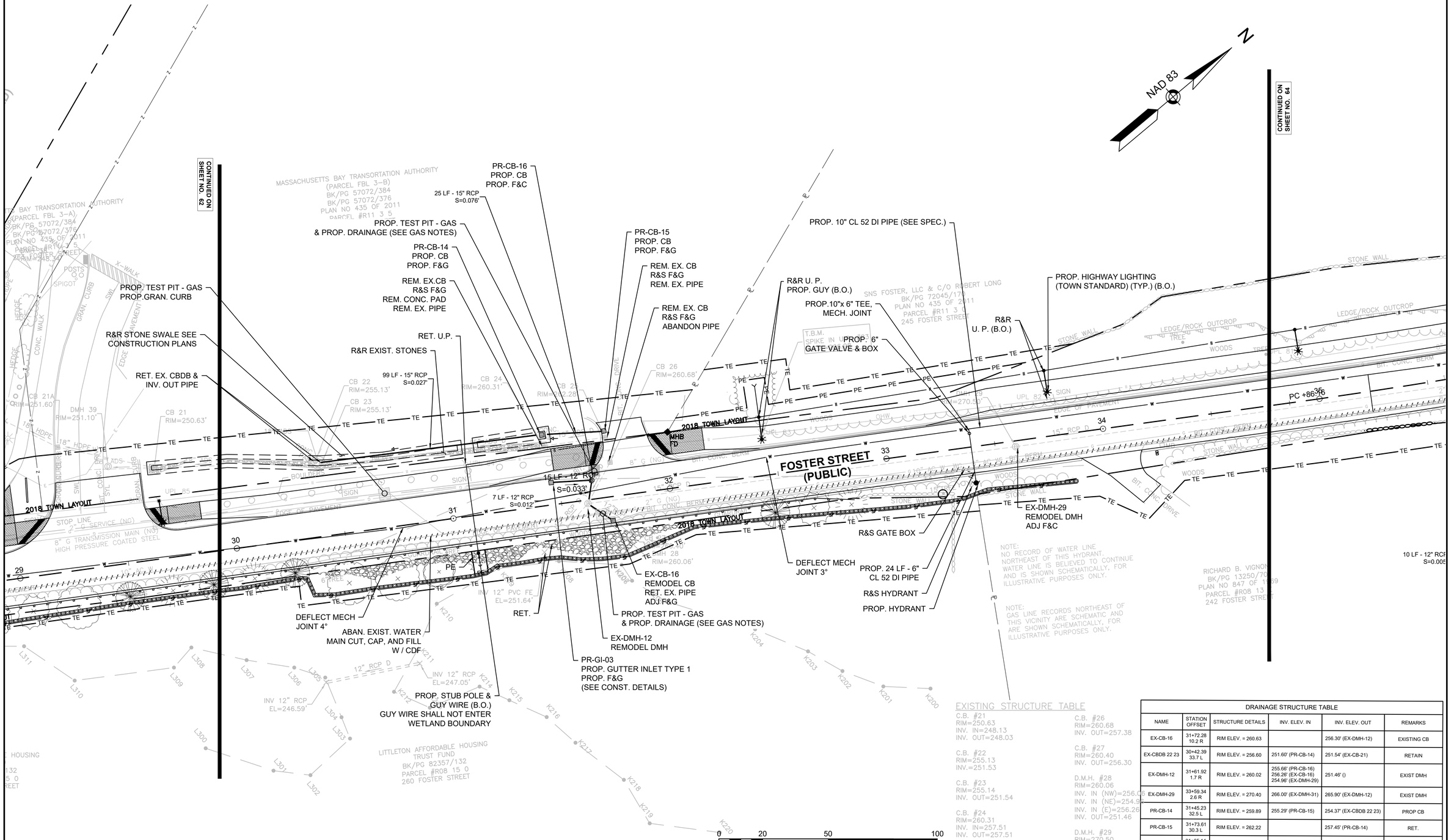
NOTES:
1. SEE SHEET 57 FOR GENERAL UTILITY, ELECTRICAL AND TREE TRIMMING NOTES
2. * - CONTRACTOR TO MATCH EXISTING PIPE INVERT. INVERT GIVEN IS APPROXIMATE

GAS NOTES:
1.NOTIFY NATIONAL GRID DAMAGE PREVENTION, MEGHAN KELLEY, AT(339) 203-0490 TWO WEEKS PRIOR TO EXCAVATING NEAR REGULATOR STATION OR GAS MAIN. HIGH PRESSURE GAS MAINS ARE PRESENT IN PROJECT AREA.
2.TO REPORT ANY DAMAGE TO A GAS LINE CALL NATIONAL GRID'S EMERGENCY GAS LEAKS NUMBER AT 1-800-233-5325 IMMEDIATELY.
3. ALL TEST PITS PERFORMED NEAR GAS MAIN SHALL BE PERFORMED WITH A VACUUM TRUCK SEE SPECIAL PROVISION FOR ITEM 141.101

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	63	128
PROJECT FILE NO.	609054		

DRAINAGE & UTILITY PLANS



EXISTING STRUCTURE TABLE

C.B. #21
RIM=250.63
INV. IN=248.13
INV. OUT=248.03

C.B. #22
RIM=255.13
INV.=251.53

C.B. #23
RIM=255.14
INV. OUT=251.54

C.B. #24
RIM=260.31
INV. IN=257.51
INV. OUT=257.51

C.B. #25
RIM=262.28
INV. OUT=258.98

C.B. #26
RIM=260.68
INV. OUT=257.38

C.B. #27
RIM=260.40
INV. OUT=256.30

D.M.H. #28
RIM=260.06
INV. IN (NW)=256.06
INV. IN (NE)=254.96
INV. IN (E)=256.26
INV. OUT=251.46

D.M.H. #29
RIM=270.50
INV. IN=266.00
INV. OUT=265.90

DRAINAGE STRUCTURE TABLE

NAME	STATION OFFSET	STRUCTURE DETAILS	INV. ELEV. IN	INV. ELEV. OUT	REMARKS
EX-CB-16	31+72.28 10.2 R	RIM ELEV. = 260.63		256.30' (EX-DMH-12)	EXISTING CB
EX-CBDB 22 23	30+42.39 33.7 L	RIM ELEV. = 256.60	251.60' (PR-CB-14)	251.54' (EX-CB-21)	RETAIN
EX-DMH-12	31+61.92 1.7 R	RIM ELEV. = 260.02	255.66' (PR-CB-16) 256.26' (EX-CB-16) 254.96' (EX-DMH-29)	251.46' ()	EXIST DMH
EX-DMH-29	33+59.34 2.6 R	RIM ELEV. = 270.40	266.00' (EX-DMH-31)	265.90' (EX-DMH-12)	EXIST DMH
PR-CB-14	31+45.23 32.5 L	RIM ELEV. = 259.89	255.29' (PR-CB-15)	254.37' (EX-CBDB 22 23)	PROP CB
PR-CB-15	31+73.61 30.3 L	RIM ELEV. = 262.22		257.45' (PR-CB-14)	RET.
PR-CB-16	31+65.14 8.6 L	RIM ELEV. = 260.09	255.89' (PR-GI-03)	255.79' (EX-DMH-12)	PROP. CB
PR-GI-03	31+46.53 10.2 L	RIM ELEV. = 258.84		256.50' (PR-CB-16)	PROP. GUTTER INLET

NOTES:
1. SEE SHEET 57 FOR GENERAL UTILITY, ELECTRICAL AND TREE TRIMMING NOTES
2. * - CONTRACTOR TO MATCH EXISTING PIPE INVERT. INVERT GIVEN IS APPROXIMATE

GAS NOTES:
1.NOTIFY NATIONAL GRID DAMAGE PREVENTION, MEGHAN KELLEY, AT(339) 203-0490 TWO WEEKS PRIOR TO EXCAVATING NEAR REGULATOR STATION OR GAS MAIN. HIGH PRESSURE GAS MAINS ARE PRESENT IN PROJECT AREA.
2.TO REPORT ANY DAMAGE TO A GAS LINE CALL NATIONAL GRID'S EMERGENCY GAS LEAKS NUMBER AT 1-800-233-5325 IMMEDIATELY.
3. ALL TEST PITS PERFORMED NEAR GAS MAIN SHALL BE PERFORMED WITH A VACUUM TRUCK SEE SPECIAL PROVISION FOR ITEM 141.101

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	64	128
PROJECT FILE NO.	609054		

DRAINAGE & UTILITY PLANS

DRAINAGE STRUCTURE TABLE

NAME	STATION OFFSET	STRUCTURE DETAILS	INV. ELEV. IN	INV. ELEV. OUT	REMARKS
EX-DMH-31	35+89.75 3.8 R	RIM ELEV. = 277.45	273.12' (PR-GI-02) 272.32' (EX-DMH-35) 272.11' (PR-CB-20)	270.52' (EX-DMH-29)	REMODEL
EX-DMH-35	38+87.45 2.1 R	RIM ELEV. = 292.70	288.37' (EX-DMH-33)	287.17' (EX-DMH-31)	RET.
PR-CB-20	35+96.35 7.4 R	RIM ELEV. = 276.69	273.40' (PR-GI-05)	272.10' (PR-LB-06) 272.15' (EX-DMH-31)	CATCH BASIN SOLID COVER
PR-GI-02	35+96.94 11.0 L	RIM ELEV. = 276.64		274.32' (EX-DMH-31)	PROP. GUTTER INLET
PR-GI-05	36+02.37 11.0 R	RIM ELEV. = 276.81		274.23' (PR-CB-20)	PROP. GUTTER INLET
PR-LB-06	35+84.98 15.9 R	RIM ELEV. = 277.18	272.03' (PR-CB-20)		LEACHING BASIN W/SOLID COVER

NOTES:

1. PROPOSED PLANTINGS MAY REQUIRE FIELD ADJUSTMENT DUE TO FINAL FIELD CONDITIONS. MASSDOT LANDSCAPE ARCHITECT AND/OR TOWN OF LITTLETON SHALL APPROVE ALL LOCATIONS PRIOR TO PLANTING.

PROJECT SUMMARY PLANT LIST

KEY	BOTANICAL NAME	COMMON NAME	HT.	QTY.	SIZE
	TREES				
AR	ACER RUBRUM 'KARPICK'	KARPICK RED MAPLE	40'–50'	12	2"–2.5" CAL.
AG	AMELANCHIER X GRANDIFLORA 'ROBIN HILL'	ROBIN HILL SERVICEBERRY	15'–30'	28	1.5"–2" CAL. (SINGLE STEM)
NS	NYSSA SYLVATICA	BLACK GUM	30'–60'	8	2"–2.5" CAL.
QP	QUERCUS PALUSTRIS	PIN OAK	50'–75'	12	2"–2.5" CAL.
QC	QUERCUS COCCINEA	SCARLET OAK	50'–70'	5	2"–2.5" CAL.
CC	CERCIS CANADENSIS	EASTERN REDBUD	20'–30'	10	1.5" CAL.
CG	CRATAEGUS CRUS–GALLI 'INFERMIS'	COCKSPUR HAWTHORN	20'–30'	7	1.5–2" CAL.
PV	PRUNUS VIRGINIANA	CHOKE CHERRY	20'–30'	6	1.5–2" CAL.
	SHRUBS				
RC	RHODODENDRON CATAWBIENSE 'ALBUM'	WHITE CATAWBA RHODODENDRON		19	3 GAL.

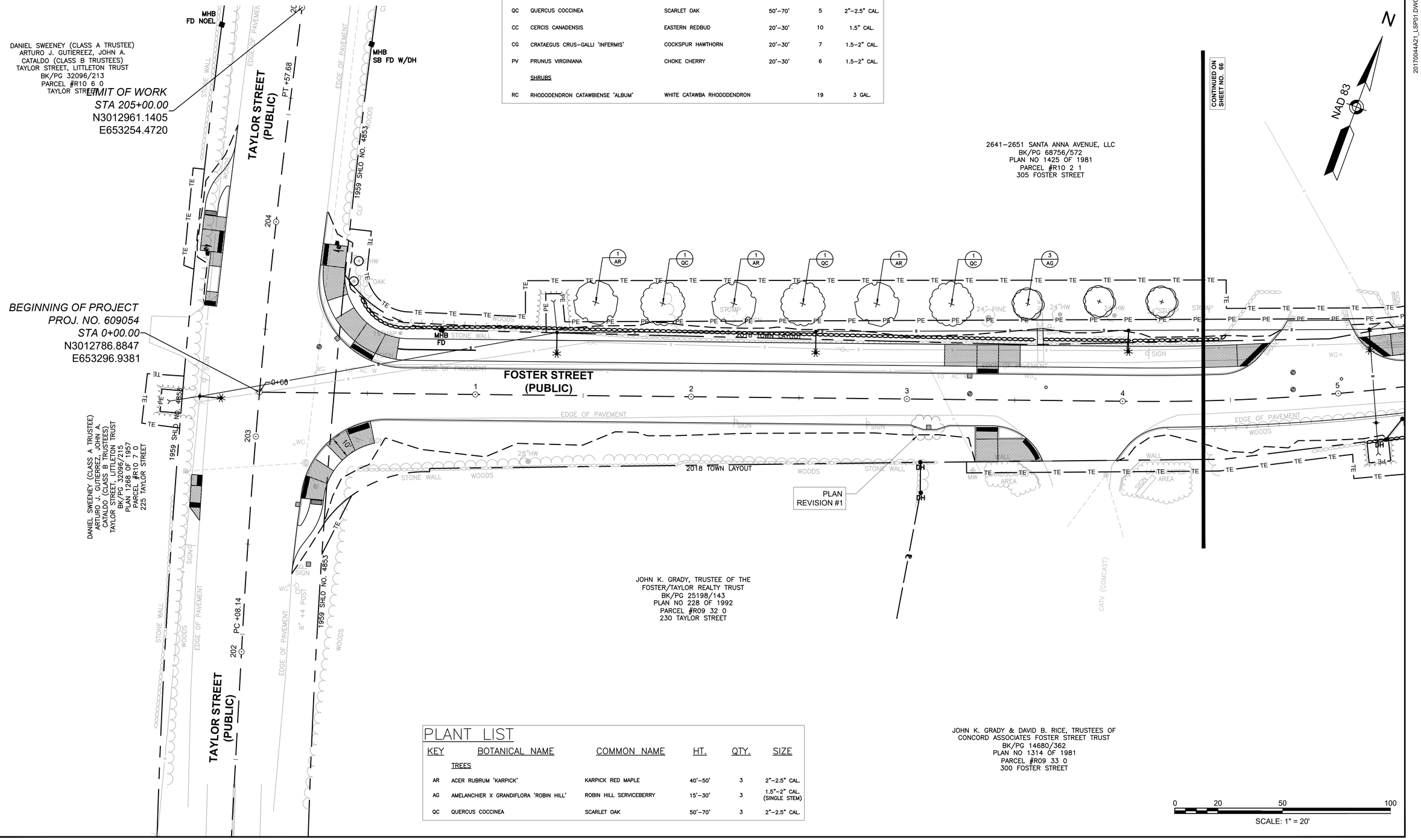
LEGEND:

PLANT QUANTITY AND SPECIES (X / XX)

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	65	128
PROJECT FILE NO.	609054		

LANDSCAPING PLANS



PLANT LIST

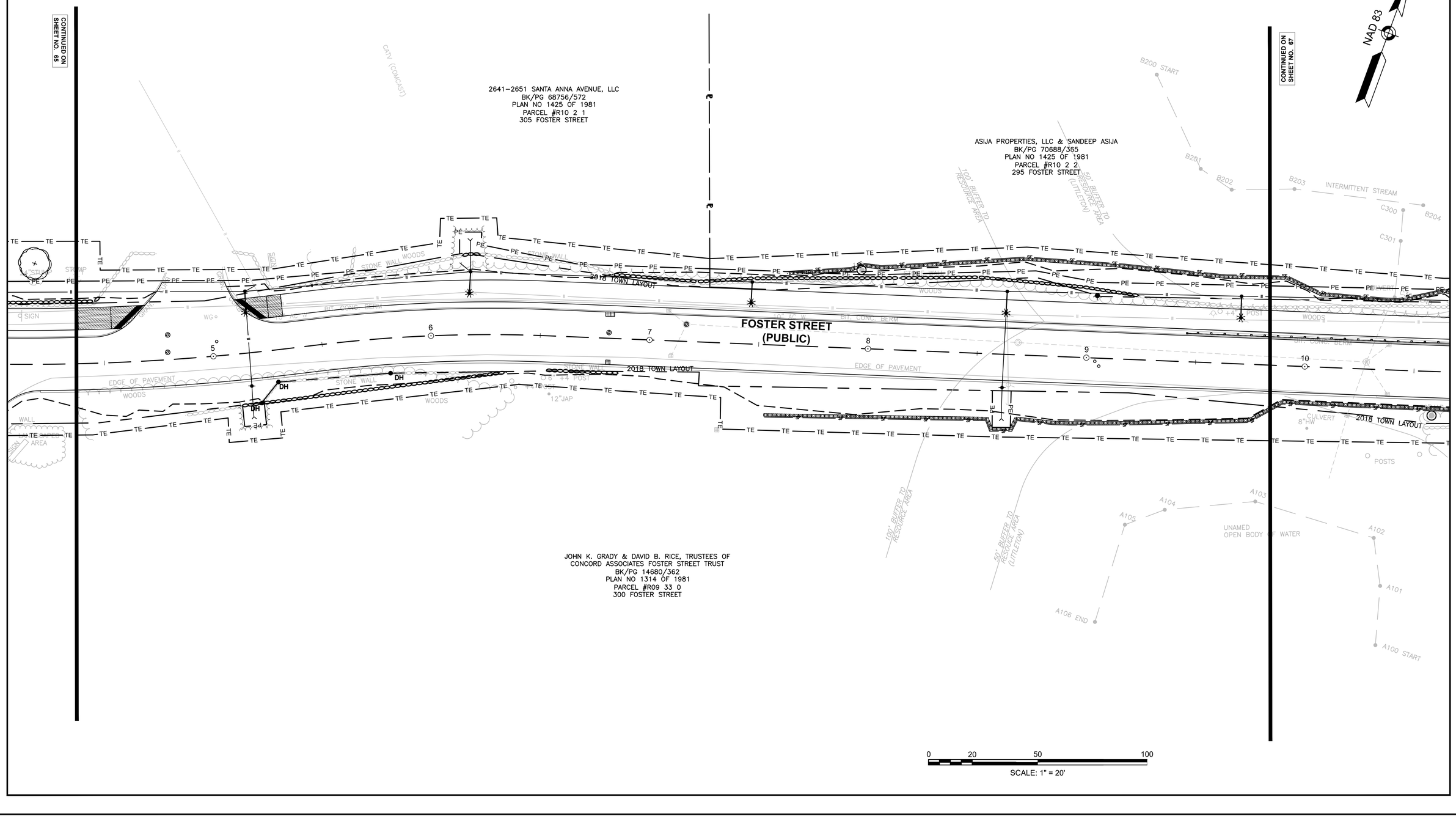
KEY	BOTANICAL NAME	COMMON NAME	HT.	QTY.	SIZE
	TREES				
AR	ACER RUBRUM 'KARPICK'	KARPICK RED MAPLE	40'–50'	3	2"–2.5" CAL.
AG	AMELANCHIER X GRANDIFLORA 'ROBIN HILL'	ROBIN HILL SERVICEBERRY	15'–30'	3	1.5"–2" CAL. (SINGLE STEM)
QC	QUERCUS COCCINEA	SCARLET OAK	50'–70'	3	2"–2.5" CAL.

20170044A21_LSP01.DWG Plotted on 21-Mar-2025 9:32 AM

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	66	128
PROJECT FILE NO.		609054	

LANDSCAPING PLANS



PLANT LIST

KEY	BOTANICAL NAME	COMMON NAME	HT.	QTY.	SIZE
	TREES				
AR	ACER RUBRUM 'KARPICK'	KARPICK RED MAPLE	40'–50'	3	2"–2.5" CAL.
AG	AMELANCHIER X GRANDIFLORA 'ROBIN HILL'	ROBIN HILL SERVICEBERRY	15'–30'	5	1.5"–2" CAL. (SINGLE STEM)
NS	NYSSA SYLVATICA	BLACK GUM	30'–60'	3	2"–2.5" CAL.
QP	QUERCUS PALUSTRIS	PIN OAK	50'–75'	4	2"–2.5" CAL.
CC	CERCIS CANADENSIS	EASTERN REDBUD	20'–30'	3	1.5" CAL.
CG	CRATAEGUS CRUS–GALLI 'INFERMIS'	COCKSPUR HAWTHORN	20'–30'	2	1.5–2" CAL.
PV	PRUNUS VIRGINIANA	CHOKE CHERRY	20'–30'	3	1.5–2" CAL.

LEGEND:

PLANT QUANTITY AND SPECIES (X / XX)

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	67	128
PROJECT FILE NO.	609054		

LANDSCAPING PLANS

N

NAD 83

CONTINUED ON SHEET NO. 66

CONTINUED ON SHEET NO. 68

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70688/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

EP ASIJA

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF
CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZO
BK/PG 17691/108
PLAN NO 831 OF 1973
PARCEL #R09 5 G
290 FOSTER STREET

FOSTER STREET
(PUBLIC)

PLAN REVISION #1

2018 TOWN LAYOUT

EDGE OF PAVEMENT

STONE WALL

WOODS

TREE LINE

CATV (COMCAST)

50' BUFFER TO RESOURCE AREA (LITTLETON)

100' BUFFER TO RESOURCE AREA

UNAMED OPEN BODY OF WATER

B200 START, B201, B202, B203, B204, INTERMITTENT STREAM, C300, C301

D400 START, D401, D402, D403, D404, D405, D406, D407, D408, D409, D410, D411 END

A100 START, A101, A102, A103, A104, A105

E500 START, E501, E502

0 20 50 100

SCALE: 1" = 20'

20170044A21_LSP01.DWG Plotted on 21-Mar-2025 9:33 AM

PLANT LIST

KEY	BOTANICAL NAME	COMMON NAME	HT.	QTY.	SIZE
	TREES				
AR	ACER RUBRUM 'KARPICK'	KARPICK RED MAPLE	40'–50'	3	2"–2.5" CAL.
AG	AMELANCHIER X GRANDIFLORA 'ROBIN HILL'	ROBIN HILL SERVICEBERRY	15'–30'	13	1.5"–2" CAL. (SINGLE STEM)
NS	NYSSA SYLVATICA	BLACK GUM	30'–60'	3	2"–2.5" CAL.
QP	QUERCUS PALUSTRIS	PIN OAK	50'–75'	8	2"–2.5" CAL.
CC	CERCIS CANADENSIS	EASTERN REDBUD	20'–30'	3	1.5" CAL.
CG	CRATAEGUS CRUS–GALLI 'INFERMIS'	COCKSPUR HAWTHORN	20'–30'	2	1.5–2" CAL.
PV	PRUNUS VIRGINIANA	CHOKE CHERRY	20'–30'	1	1.5–2" CAL.
	SHRUBS				
RC	RHODODENDRON CATAWBIENSE 'ALBUM'	WHITE CATAWBA RHODODENDRON		19	3 GAL.

LEGEND:

PLANT QUANTITY AND SPECIES (X / XX)

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	68	128
PROJECT FILE NO.	609054		

LANDSCAPING PLANS

20170044A21_LSP01.DWG Plotted on 21-Mar-2025 9:33 AM

NAD 83

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70688/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

CONTINUED ON SHEET NO. 67

CONTINUED ON SHEET NO. 69

JORDAN S. MCCATHERIN
BK/PG 62917/52
PARCEL #R10 1 0
277 FOSTER STREET

PLAN REVISION #1

FOSTER STREET (PUBLIC)

BULKELEY ROAD (PUBLIC)

Δ=9° 16' 42"
L=348.16' R=2150.00'

2018 TOWN LAYOUT

1950 TOWN LAYOUT SEE SHLO NO. 3786

50' BUFFER TO RESOURCE AREA (LITTLETON)

100' BUFFER TO RESOURCE AREA

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZOLO
BK/PG 17691/108
PLAN NO 831 OF 1973
PARCEL #R09 5 G
290 FOSTER STREET

BROCKTON KENYON & AINE COLLINS
BK/PG 72894/208
PLAN NO 831 OF 1973
PARCEL #R09 5 F
286 FOSTER STREET

GREGORY & SHERI BALZOTTI
BK/PG 50902/470
PLAN NO 831 OF 1973
PARCEL #R09 5 E
284 FOSTER ST

JOSEPH W. & AMANDA LENNON,
LIVING TRUSTEES OF THE
AMANDA+JOSEPH LENNON LIVING TRUST
BK/PG 64219/262
PLAN NO 1628 OF 1972
PARCEL #R09 5 A
3 BULKELEY ROAD

BONNIE C

0 20 50 100
SCALE: 1" = 20'

PLANT LIST

KEY	BOTANICAL NAME	COMMON NAME	HT.	QTY.	SIZE
	TREES				
AG	AMELANCHIER X GRANDIFLORA 'ROBIN HILL'	ROBIN HILL SERVICEBERRY	15'	3	1.5"-2" CAL. (SINGLE STEM)

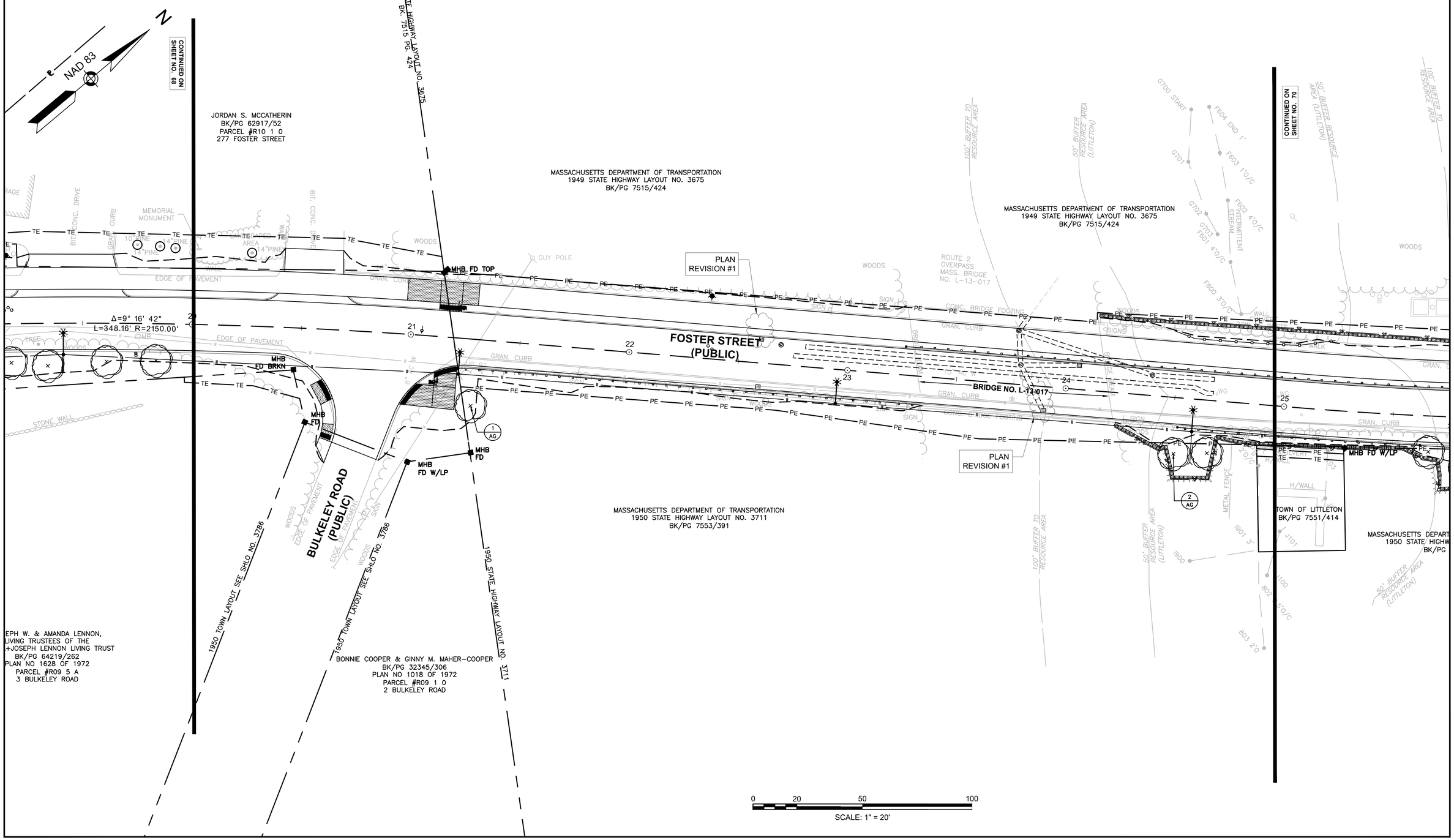
LEGEND:

PLANT QUANTITY AND SPECIES (X / XX)

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	69	128
PROJECT FILE NO.	609054		

LANDSCAPING PLANS



PLANT LIST

KEY	BOTANICAL NAME	COMMON NAME	HT.	QTY.	SIZE
	TREES				
AG	AMELANCHIER X GRANDIFLORA 'ROBIN HILL'	ROBIN HILL SERVICEBERRY	15'	4	1.5"–2" CAL. (SINGLE STEM)
NS	NYSSA SYLVATICA	BLACK GUM	30'–60'	1	2"–2.5" CAL.
QC	QUERCUS COCCINEA	SCARLET OAK	50'	1	2"–2.5" CAL.
CC	CERCIS CANADENSIS	EASTERN REDBUD	20'–30'	2	1.5" CAL.
CG	CRATAEGUS CRUS–GALLI 'INFERMIS'	COCKSPUR HAWTHORN	20'–30'	1	1.5–2" CAL.
PV	PRUNUS VIRGINIANA	CHOKE CHERRY	20'–30'	1	1.5–2" CAL.

LEGEND:

PLANT QUANTITY AND SPECIES (X / XX)

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	70	128
PROJECT FILE NO.	609054		

LANDSCAPING PLANS

NAD 83

PLAN REVISION #1

FOSTER STREET (PUBLIC)

GRIMES LANE (PUBLIC)

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (f/ BOSTON & MAINE RAILROAD)

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (PARCEL FBL 3-A) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 2011 PARCEL #R11 3 5 263 FOSTER STREET

MASSACHUSETTS BAY TRANSORTATI (PARCEL FBL 3-B) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 20 PARCEL #R11 3 5 263 FOSTER STREE

VAF I 265 FOSTER LLC BK/PG 80433/278 PLAN NO 266 OF 1987 PARCEL #R11 1 0 265 FOSTER STREET

(MBTA) BK/PG 13117/113 PARCEL #R11 2 0

(MBTA) BK/PG 13117/113 PARCEL #R08 37 0

LITTLETON AFFORDABLE HOUSING TRUST FUND BK/PG 82357/132 PARCEL #R08 15 0 260 FOSTER STREET

TOWN OF LITTLETON BK/PG 7551/414

MASSACHUSETTS DEPARTMENT OF TRANSPORTATION 1950 STATE HIGHWAY LAYOUT NO. 3711 BK/PG 7553/391

MASSACHUSETTS DEPARTMENT OF TRANSPORTATION AY LAYOUT NO. 3675 7515/424

1948 STATE HIGHWAY LAYOUT NO. 3675 BK. 7515 PG. 424

1950 SHLO NO. 3711

1957 SHLO NO. 3636

JUNE 30, 1914 RAILROAD SIDELINE

2018 TOWN LAYOUT

CONTINUED ON SHEET NO. 69

CONTINUED ON SHEET NO. 71

100' BUFFER TO RESOURCE AREA

50' BUFFER RESOURCE AREA (LITTLETON)

CATV (COMCAST)

0 20 50 100

SCALE: 1" = 20'

2017004A21_LSP01.DWG Plotted on 21-Mar-2025 9:33 AM

PLANT LIST

KEY	BOTANICAL NAME	COMMON NAME	HT.	QTY.	SIZE
	TREES				
NS	NYSSA SYLVATICA	BLACK GUM	30'–60'	1	2"–2.5" CAL.
QC	QUERCUS COCCINEA	SCARLET OAK	50'–70'	1	2"–2.5" CAL.
CC	CERCIS CANADENSIS	EASTERN REDBUD	20'–30'	2	1.5" CAL.
CG	CRATAEGUS CRUS–GALLI 'INFERMIS'	COCKSPUR HAWTHORN	20'–30'	2	1.5–2" CAL.
PV	PRUNUS VIRGINIANA	CHOKE CHERRY	20'–30'	1	1.5–2" CAL.

LEGEND:

PLANT QUANTITY AND SPECIES (X / XX)

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	71	128
PROJECT FILE NO.	609054		

LANDSCAPING PLANS

20170044A21_LSP01.DWG Plotted on 21-Mar-2025 9:33 AM

NAD 83 N

ETTS BAY TRANSORTATION AUTHORITY
(PARCEL FBL 3–A)
BK/PG 57072/384
BK/PG 57072/376
PLAN NO 435 OF 2011
PARCEL #R11 3 5
263 FOSTER STREET

MASSACHUSETTS BAY TRANSORTATION AUTHORITY
(PARCEL FBL 3–B)
BK/PG 57072/384
BK/PG 57072/376
PLAN NO 435 OF 2011
PARCEL #R11 3 5
263 FOSTER STREET

SNS FOSTER, LLC & C/O ROBERT LONG
BK/PG 72045/170
PLAN NO 435 OF 2011
PARCEL #R11 3 0
245 FOSTER STREET

CONTINUED ON SHEET NO. 70

CONTINUED ON SHEET NO. 72

FOSTER STREET (PUBLIC)

2018 TOWN LAYOUT

100' BUFFER TO RESOURCE AREA

50' BUFFER RESOURCE AREA (LITTLETON)

PLAN REVISION #1

NOTE:
NO RECORD OF WATER LINE NORTHEAST OF THIS HYDRANT. WATER LINE IS BELIEVED TO CONTINUE AND IS SHOWN SCHEMATICALLY, FOR ILLUSTRATIVE PURPOSES ONLY.

RICHARD B. VIGNON
BK/PG 13250/70
PLAN NO 847 OF 1969
PARCEL #R08 13
242 FOSTER STREET

LITTLETON AFFORDABLE HOUSING TRUST FUND
BK/PG 82357/132
PARCEL #R08 15 0
260 FOSTER STREET

E HOUSING
D
/132
15 0
TREET

0 20 50 100
SCALE: 1" = 20'

PLANT LIST

KEY	BOTANICAL NAME	COMMON NAME	HT.	QTY.	SIZE
	TREES				
AG	AMELANCHIER X GRANDIFLORA 'ROBIN HILL'	ROBIN HILL SERVICEBERRY	15'	3	1.5"-2" CAL. (SINGLE STEM)

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	72	128
PROJECT FILE NO.	609054		

LANDSCAPING PLANS

CONTINUED ON SHEET NO. 71

PLAN REVISION #1

SNS FOSTER, LLC & C/O ROBERT LONG
BK/PG 72045/170
PLAN NO 435 OF 2011
PARCEL #R11 3 0
245 FOSTER STREET

PATRICIA A. NARGIZIAN
BK/PG 70735/467
PARCEL #R11 5 4
237 FOSTER STREET

END OF PROJECT
PROJ. NO. 609054
STA. 39+36.15
N 3015278.1762
E 656130.7752

FOSTER STREET (PUBLIC)

BALSAM LANE (PUBLIC)

2018 TOWN LAYOUT

2020 TOWN LAYOUT

RICHARD B. VIGNONI
BK/PG 13250/70
PLAN NO 847 OF 1969
PARCEL #R08 13 E
242 FOSTER STREET

QUINN E. & JENNIFER A. CANFIELD
BK/PG 55588/290
PLAN NO 188 OF 1971
PARCEL #R08 13 D
238 FOSTER STREET

NOTE:
NO RECORD OF WATER LINE.
CONFIGURATION IN THIS AREA.
WATER LINE IS SHOWN SCHEMATICALLY,
FOR ILLUSTRATIVE PURPOSES ONLY.

39+98.64

NAD 83

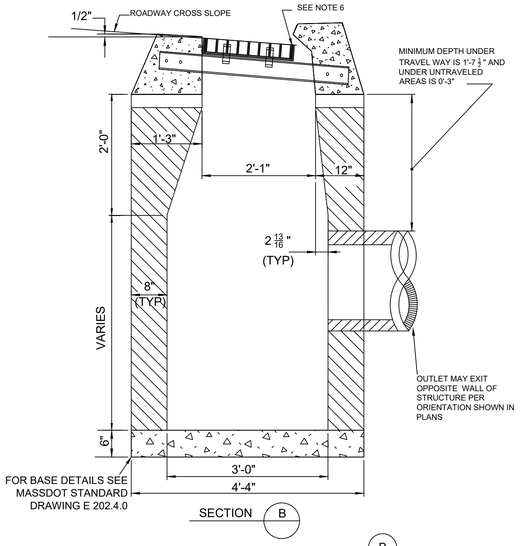
0 20 50 100
SCALE: 1" = 20'

LITTLETON
RECONSTRUCTION OF FOSTER STREET

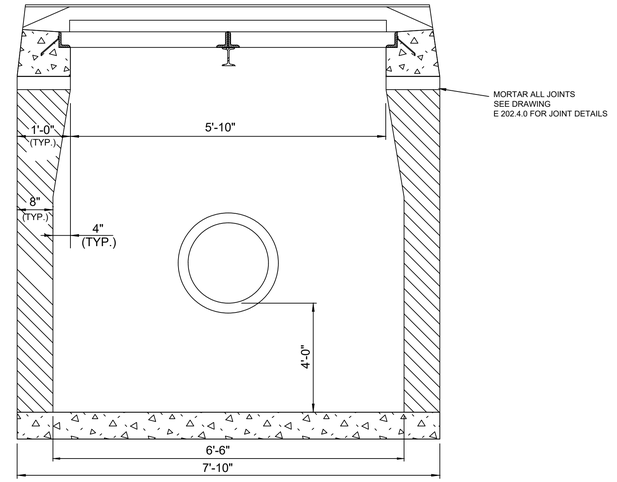
STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	73	128
PROJECT FILE NO.	609054		

DRAINAGE & UTILITY DETAILS

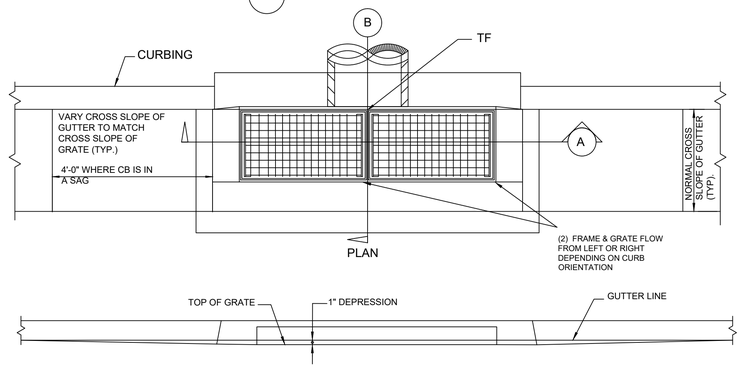
20170044A21_DET01.DWG 21-Mar-2025



SECTION B



SECTION A



FOR CATCH BASINS IN A LINE OF 6" CONCRETE OR STONE CURBING

DETAILS OF DEPRESSED GUTTER STRIP

CATCH BASIN NOTES:

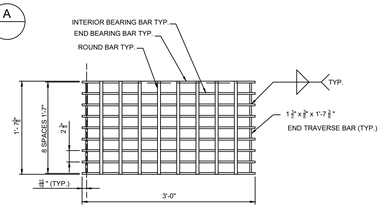
1. INVERTS AND PIPE DIAMETERS PER UTILITY PLANS
2. DETAILS NOT INDICATED ABOVE ARE TO BE SIMILAR TO THOSE SHOWN ON MASSDOT STANDARD DETAIL 201.3.0
3. FACE OF PIPE FLUSH OR NOT TO PROJECT MORE THAN 4" FROM FACE OF WALL ALONG CENTERLINE OF PIPE
4. FOR DESCRIPTION OF MATERIALS AND CONSTRUCTION METHOD, SEE STANDARD MASSDOT SPECIFICATIONS SECTION 200
5. ALL CONCRETE TO BE AIR ENTRAINED
6. TOP OF FRAME ELEVATION SHALL BE MEASURED IN THE CENTER OF THE GRATE AT GUTTER LINE

FRAME AND GRATE NOTES:

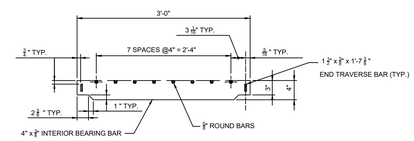
1. DIMENSIONAL TOLERANCE SHALL BE + 1/16"
2. ALL STEEL BARS SHALL BE WELDED AT ALL INTERSECTIONS
3. ALL WELDING SHALL CONFORM TO THE REQUIREMENTS OF AWS STRUCTURAL WELDING CODE, D1.1
4. STEEL AND CAST IRON MATERIALS SHALL CONFORM TO STANDARD SPECIFICATIONS SECTION 200

1 DOUBLE CATCH BASIN WITH CURB INLET

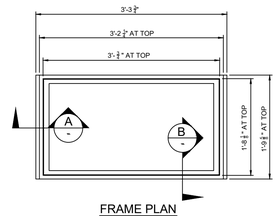
SCALE: N.T.S.



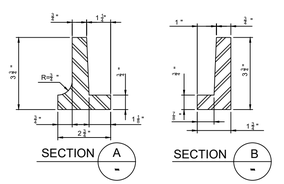
GRATE PLAN VIEW



GRATE ELEVATION-INTERIOR BEARING BAR



FRAME PLAN



SECTION A — SECTION B

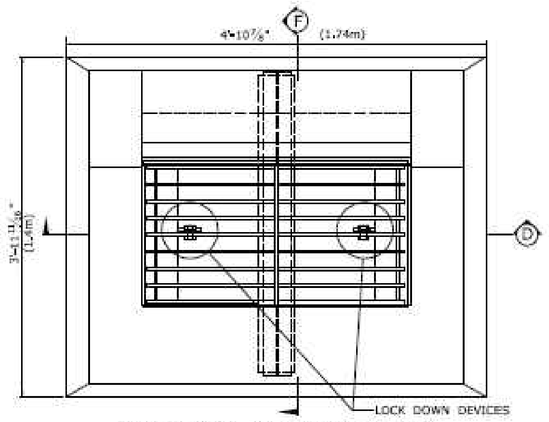
CAST IRON FRAME

LITTLETON
RECONSTRUCTION OF FOSTER STREET

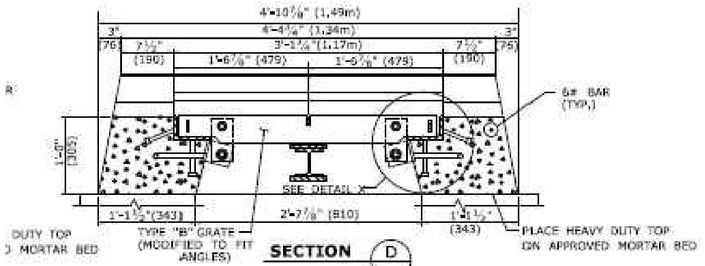
STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	74	128
PROJECT FILE NO.	609054		

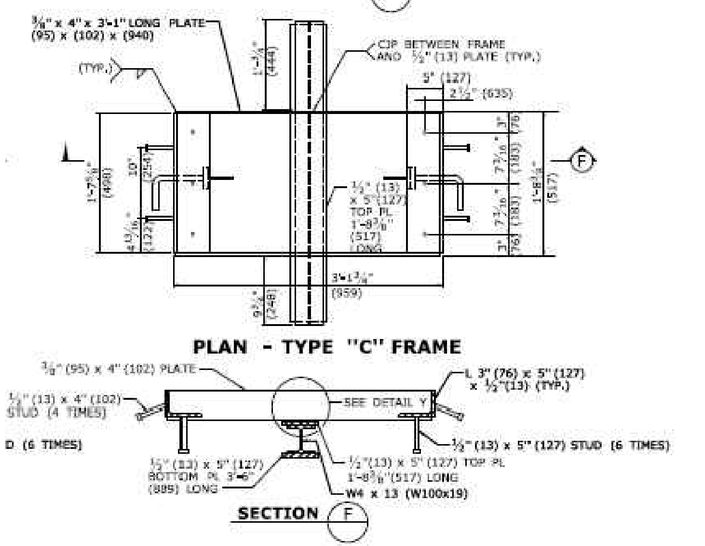
DRAINAGE & UTILITY DETAILS

20170044A21_DET01.DWG 21-Mar-2025

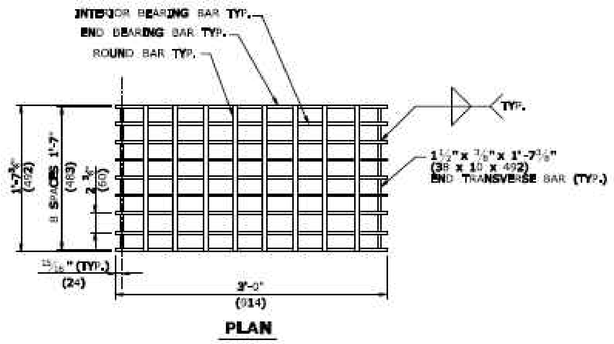


PLAN-TYPE "C" HEAVY DUTY CATCH BASIN TOP

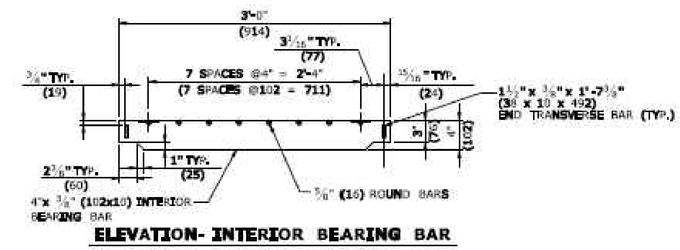




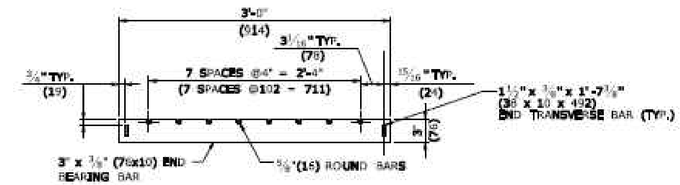
2 DOUBLE CATCH BASIN FRAME
SCALE: N.T.S.



PLAN

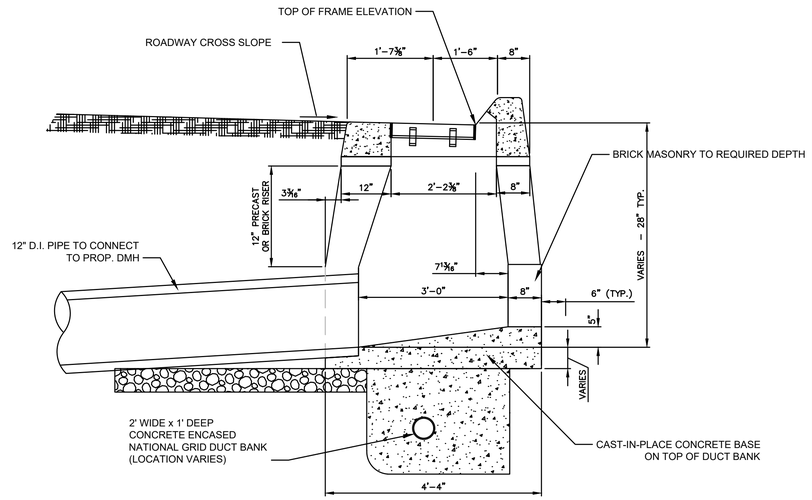


ELEVATION- INTERIOR BEARING BAR



ELEVATION- END BEARING BAR
CATCH BASIN GRATE TYPE A

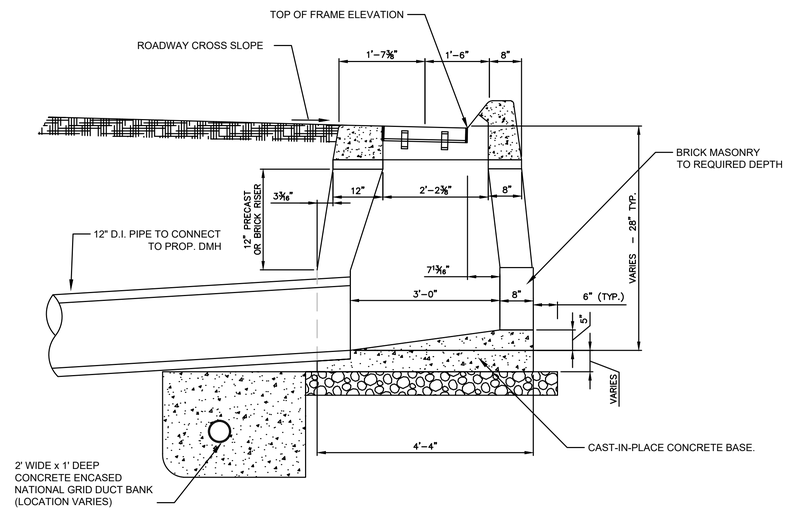
3 DOUBLE CATCH BASIN GRATE
SCALE: N.T.S.



GUTTER INLET - SPECIAL TYPE 1 GENERAL NOTES

1. IF CONCRETE MASONRY UNITS ARE REQUIRED, THE BASIN SHALL BE CONSTRUCTED IN CONFORMANCE WITH THE OVER ALL DIMENSIONS SHOWN HERE. CORBELLING WILL BE ALLOWED AT A MAXIMUM OF 1" PER BLOCK, TURN TOP COURSE 90° TO FRONT AND SIDE WALLS ONLY. RED BRICK IS NOT TO BE USED.
2. END OF PIPE SHALL EXTEND TO AND BE CUT FLUSH WITH INSIDE FACE OF FACE OF GUTTER INLET WALL.
3. MINIMUM CONCRETE COMPRESSIVE STRENGTH OF F'c = 4000 PSI SHALL BE OBTAINED PRIOR TO SHIPPING.
4. ALL KNOCKOUTS IN PRECAST UNITS SHALL BE MADE FLUSH WITH EXTERIOR / INTERIOR OF UNITS USING CONCRETE, BRICKS AND MORTAR.
5. LATEST MASSDOT STANDARD SPECIFICATIONS AND SUPPLEMENTALS SHALL GOVERN.

4 GUTTER INLET – SPECIAL TYPE 1
SCALE: N.T.S.



5 GUTTER INLET – SPECIAL TYPE 2
SCALE: N.T.S.

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	E1	128
PROJECT FILE NO.	609054		

ENVIRONMENTAL PLANS

Plotted on 29-Apr-2025 3:20 PM

20170044A21_HPN01 NOI SET.DWG

DANIEL SWEENEY (CLASS A TRUSTEE)
ARTURO J. GUTIEREEZ, JOHN A. CATALDO (CLASS B TRUSTEES)
TAYLOR STREET, LITTLETON TRUST
BK/PG 32096/213
PARCEL #R10 6 0
TAYLOR STREET

LIMIT OF WORK
STA 205+00.00
N3012961.1405
E653254.4720

MHB FD NOEL

MHB SB FD W/DH

TAYLOR STREET (PUBLIC)

PT +57.68
N 12° 51' 04" W 96.62'

205

204

Δ=4° 01' 39"
L=249.54' R=3550.00'

1959 SHLO NO. 4853

ENVIRONMENTAL PLANS LEGEND

- EXISTING TREE LINE
- PROPOSED TREE LINE
- BORDERING VEGETATED WETLANDS
- BANK/LAND UNDER WATER
- 100FT BUFFER from BVW or BANK
- 50FT NO DISTURB LIMIT from BVW or BANK
- EROSION CONTROLS
- LIMIT OF WORK

- PERM IMPACT TO BUFFER ZONE
- TEMP IMPACT TO BUFFER ZONE
- PERM IMPACT TO 50-FT NO DISTURB
- TEMP IMPACT TO 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM BUFFER ZONE

2641–2651 SANTA ANNA AVENUE, LLC
BK/PG 68756/572
PLAN NO 1425 OF 1981
PARCEL #R10 2 1
305 FOSTER STREET

CONTINUED ON SHEET NO. 10

NAD 83

BEGINNING OF PROJECT
PROJ. NO. 609054
STA 0+00.00
N3012786.8847
E653296.9381

STA 203+20.63 ALIGN_TAYLOR =
STA 0+00.00 ALIGN_FOSTER
N 3012786.8847 E 653296.9381

0+00

FOSTER STREET (PUBLIC)
N 70° 36' 10" E 403.30'

2018 TOWN LAYOUT

T.B.M.
SPIKE IN U.P. #104
ELEV.=305.59

PC +03.30

Δ=7° 27' 10"
L=130.08' R=1000.00'

N 63

TAYLOR STREET (PUBLIC)
N 16° 52' 43" W 208.14'

202

PC +08.14

203

DANIEL SWEENEY (CLASS A TRUSTEE)
ARTURO J. GUTIEREEZ, JOHN A. CATALDO (CLASS B TRUSTEES)
TAYLOR STREET, LITTLETON TRUST
BK/PG 32096/215
PLAN 1268 OF 1957
PARCEL #R10 7 0
225 TAYLOR STREET

JOHN K. GRADY, TRUSTEE OF THE
FOSTER/TAYLOR REALTY TRUST
BK/PG 25198/143
PLAN NO 228 OF 1992
PARCEL #R09 32 0
230 TAYLOR STREET

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF
CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

FOR PROFILE: SEE SHEET NO. 17

0 20 50 100
SCALE: 1" = 20'

PLANT LIST

KEY	BOTANICAL NAME	COMMON NAME	HT.	QTY.	SIZE
	TREES				
AC	ACER RUBRUM	MAPLE–RED–'OCTOBER GLORY'	50	5	2"–2.5" CAL.

PLANTING LEGEND

- PROPOSED TREE PLANTING
- X / XX — PLANT QUANTITY AND SPECIES

ENVIRONMENTAL PLANS LEGEND

- EXISTING TREE LINE
- PROPOSED TREE LINE
- BORDERING VEGETATED WETLANDS
- BANK/LAND UNDER WATER
- 100FT BUFFER from BVW or BANK
- 50FT NO DISTURB LIMIT from BVW or BANK
- EROSION CONTROLS
- LIMIT OF WORK

- PERM IMPACT TO BUFFER ZONE
- TEMP IMPACT TO BUFFER ZONE
- PERM IMPACT TO 50-FT NO DISTURB
- TEMP IMPACT TO 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM BUFFER ZONE

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	E2	128
PROJECT FILE NO.	609054		

ENVIRONMENTAL PLANS

20170044A21_HPN01 NOI SET.DWG Plotted on 29-Apr-2025 3:20 PM

CONTINUED ON SHEET NO. 9

CONTINUED ON SHEET NO. 11

N

NAD 83

2641–2651 SANTA ANNA AVENUE, LLC
BK/PG 68756/572
PLAN NO 1425 OF 1981
PARCEL #R10 2 1
305 FOSTER STREET

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70488/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF
CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

FOSTER STREET (PUBLIC)

3571 SF TEMP IMPACT TO BUFFER ZONE

7317 SF PERM IMPACT TO BUFFER ZONE

1202 SF TEMP IMPACT TO 50FT NO DISTURB ZONE

537 SF REMOVED IMPERVIOUS BUFFER ZONE TO BE REVEGETATED

863 SF TEMP IMPACT TO 50FT NO DISTURB ZONE

3332 SF TEMP IMPACT TO BUFFER ZONE

BEGIN PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 7+62

BEGIN PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 7+53

LIMIT OF GRADING

BVW

INTERMITTENT STREAM

UNAMED OPEN BODY OF WATER

BANK

100' BUFFER TO RESOURCE AREA

50' BUFFER TO RESOURCE AREA (LITTLETON)

T.B.M. SPIKE IN U.P. #104 ELEV.=305.59

2018 TOWN LAYOUT

PT +33.38 PC +48.87

Δ=7° 27' 10" L=130.08' R=1000.00'

N 63° 09' 00" E 15.49'

L=104.10' R=650.00' Δ=9° 10' 33"

PT +52.96

N 72° 19' 32" E 376.71'

PC +29.68

Δ= L=98.9

C +03.30

FOR PROFILE: SEE SHEET NO. 18

0 20 50 100

SCALE: 1" = 20'

ENVIRONMENTAL PLANS LEGEND

- EXISTING TREE LINE
- PROPOSED TREE LINE
- BORDERING VEGETATED WETLANDS
- BANK/LAND UNDER WATER
- 100FT BUFFER from BVW or BANK
- 50FT NO DISTURB LIMIT from BVW or BANK
- EROSION CONTROLS
- LIMIT OF WORK
- PERM IMPACT TO BUFFER ZONE
- TEMP IMPACT TO BUFFER ZONE
- PERM IMPACT TO 50-FT NO DISTURB
- TEMP IMPACT TO 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM BUFFER ZONE

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	E3	128
PROJECT FILE NO.	609054		

ENVIRONMENTAL PLANS

20170044A21_HPN01 NOI SET.DWG Plotted on 29-Apr-2025 3:20 PM

N

NAD 83

CONTINUED ON SHEET NO. 10

CONTINUED ON SHEET NO. 12

EP ASIJA

B200 START

B201

B202

B203

B204

BVW

INTERMITTENT STREAM

3571 SF TEMP IMPACT TO BUFFER ZONE

1202 SF TEMP IMPACT TO 50FT NO DISTURB ZONE

C300

C301

BVW

INV 60" RCP EL=245.64'

NOTE: C.B. 10 IS A DOUBLE-SIZED STRUCTURE.

END PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 10+95

BEGIN PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 11+77

CATV (COMCAST)

50' BUFFER TO RESOURCE AREA (LITTLETON)

100' BUFFER TO RESOURCE AREA

T.B.M. SPIKE ELEV.=254.68'

7317 SF PERM IMPACT TO BUFFER ZONE

2018 TOWN LAYOUT

C2

D2

537 SF REMOVED IMPERVIOUS BUFFER ZONE TO BE REVEGETATED

Δ=1° 25' 01" L=98.93' R=4000.00'

11

PT +28.61

863 SF TEMP IMPACT TO 50FT NO DISTURB ZONE

CULVERT 8"HW

CB 12 RIM=266.18'

CB 11 RIM=265.34'

DMH 9 RIM=265.69'

3332 SF TEMP IMPACT TO BUFFER ZONE

END PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 11+53

8157 SF TEMP IMPACT TO BUFFER ZONE

INV 60" RCP EL=244.91'

D400 START

D401

D402

D403

D404

D405

D406

D407

D408

D409

D410

BVW

6269 SF TEMP IMPACT TO 50FT NO DISTURB ZONE

333 SF PERM IMPACT TO 50FT NO DISTURB ZONE

7317 SF PERM IMPACT TO BUFFER ZONE

3648 SF TEMP IMPACT TO BUFFER ZONE

LIMIT OF GRADING

FOSTER STREET (PUBLIC)

PC +80.50

N 70° 54' 31" E 151.90'

13

611 SF REMOVED IMPERVIOUS BUFFER ZONE TO BE REVEGETATED

356 SF REMOVED IMPERVIOUS 50FT NO DISTURB ZONE TO BE REVEGETATED

1769 SF PERM IMPACT TO 50FT NO DISTURB ZONE

INV 12" PVC EL=250.24'

LIMIT OF GRADING

2018 TOWN LAYOUT

Δ=35° 26' 20" L=315.49' R=510.00'

DR1-1

15

44

EDGE OF PAVEMENT

STONE WALL

WOODS

DH

26 OAK

T.B.M. SPIKE IN U.P. #93 ELEV.=254.44'

100' BUFFER TO RESOURCE AREA

CONC. DRIVE

DMH 15 RIM=254.68'

CB 14 RIM=254.44'

ASIJA PROPERTIES, LLC
BK/PG 70688/3[illegible]
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

JOHN K. GRADY & DAVID B. RICE, TRUSTEES OF CONCORD ASSOCIATES FOSTER STREET TRUST
BK/PG 14680/362
PLAN NO 1314 OF 1981
PARCEL #R09 33 0
300 FOSTER STREET

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZO
BK/PG 17691/108
PLAN NO 831 OF 1973
PARCEL #R09 3 G
290 FOSTER STREET

UNAMED OPEN BODY OF WATER

BANK

A100 START

A101

A102

A103

A104

A105

BVW

E501

E500 START

WF#E502

50' BUFFER TO RESOURCE AREA (LITTLETON)

100' BUFFER TO RESOURCE AREA

FOR PROFILE: SEE SHEET NO. 19

0 20 50 100

SCALE: 1" = 20'

ENVIRONMENTAL PLANS LEGEND

- EXISTING TREE LINE
- PROPOSED TREE LINE
- BORDERING VEGETATED WETLANDS
- BANK/LAND UNDER WATER
- 100FT BUFFER from BVW or BANK
- 50FT NO DISTURB LIMIT from BVW or BANK
- EROSION CONTROLS
- LIMIT OF WORK
- PERM IMPACT TO BUFFER ZONE
- TEMP IMPACT TO BUFFER ZONE
- PERM IMPACT TO 50-FT NO DISTURB
- TEMP IMPACT TO 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM BUFFER ZONE

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	E4	128
	PROJECT FILE NO. 609054		

ENVIRONMENTAL PLANS

ASIJA PROPERTIES, LLC & SANDEEP ASIJA
BK/PG 70688/365
PLAN NO 1425 OF 1981
PARCEL #R10 2 2
295 FOSTER STREET

CONTINUED ON SHEET NO. 11

6269 SF TEMP IMPACT TO 50FT NO DISTURB ZONE

1769 SF PERM IMPACT TO 50FT NO DISTURB ZONE

356 SF REMOVED IMPERVIOUS 50FT NO DISTURB ZONE TO BE REVEGETATED

8157 SF REMOVED IMPERVIOUS BUFFER ZONE TO BE REVEGETATED

8157 SF TEMP IMPACT TO BUFFER ZONE

END PROP. EROSION & SEDIMENT CONTROL BARRIER STA 17+47

1005 SF TEMP IMPACT TO BUFFER ZONE

D405 D406 D407 D408 D409 D410 D411 END BVW

50' BUFFER TO RESOURCE AREA (LITTLETON)

100' BUFFER TO RESOURCE AREA

Δ=35° 26' 20" L=316.45' R=510.00

PT +95.95

PC +80.91

N 35° 28' 10" E 184.96'

Δ=9° 16' 42" L=348.16' R=2150.00'

2018 TOWN LAYOUT

FOSTER STREET (PUBLIC)

BULKELEY ROAD (PUBLIC)

1950 TOWN LAYOUT SEE SHLO NO. 3786

JORDAN S. MCCATHERIN
BK/PG 62917/52
PARCEL #R10 1 0
277 FOSTER STREET

CONTINUED ON SHEET NO. 13

ANTHONY J. RIZZOLO, JR. & JOSEPHINE RIZZOLO
BK/PG 17691/108
PLAN NO 831 OF 1973
PARCEL #R09 5 G
290 FOSTER STREET

BROCKTON KENYON & AINE COLLINS
BK/PG 72894/208
PLAN NO 831 OF 1973
PARCEL #R09 5 F
286 FOSTER STREET

GREGORY & SHERI BALZOTTI
BK/PG 50902/470
PLAN NO 831 OF 1973
PARCEL #R09 5 E
284 FOSTER ST

JOSEPH W. & AMANDA LENNON, LIVING TRUSTEES OF THE AMANDA+JOSEPH LENNON LIVING TRUST
BK/PG 64219/262
PLAN NO 1628 OF 1972
PARCEL #R09 5 A
3 BULKELEY ROAD

FOR PROFILE: SEE SHEET NO. 20

0 20 50 100
SCALE: 1" = 20'

ENVIRONMENTAL PLANS LEGEND

- EXISTING TREE LINE
- PROPOSED TREE LINE
- BORDERING VEGETATED WETLANDS
- BANK/LAND UNDER WATER
- 100FT BUFFER from BVW or BANK
- 50FT NO DISTURB LIMIT from BVW or BANK
- EROSION CONTROLS
- LIMIT OF WORK

- PERM IMPACT TO BUFFER ZONE
- TEMP IMPACT TO BUFFER ZONE
- PERM IMPACT TO 50-FT NO DISTURB
- TEMP IMPACT TO 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM BUFFER ZONE

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	E5	128
PROJECT FILE NO.	609054		

ENVIRONMENTAL PLANS

20170044A21_HPN01 NOI SET.DWG Plotted on 29-Apr-2025 3:20 PM

CONTINUED ON SHEET NO. 12

NAD 83

JORDAN S. MCCATHERIN
BK/PG 62917/52
PARCEL #R10 1 0
277 FOSTER STREET

HIGHWAY LAYOUT NO. 3675
BK. 7515 PG. 424

MASSACHUSETTS DEPARTMENT OF TRANSPORTATION
1949 STATE HIGHWAY LAYOUT NO. 3675
BK/PG 7515/424

LIMIT OF GRADING

MHB FD TOP

Δ=9° 16' 42"
L=348.16' R=2150.00'

PT +29.08

FOSTER STREET
(PUBLIC)

MHB FD BRKN

MHB FD

MHB FD W/LP

J1

T.B.M.
SPIKE IN U.P. #91
ELEV.=246.01

LIMIT OF GRADING

BULKELEY ROAD
(PUBLIC)

MASSACHUSETTS DEPARTMENT OF TRANSPORTATION
1950 STATE HIGHWAY LAYOUT NO. 3711
BK/PG 7553/391

1950 TOWN LAYOUT SEE SHLO NO. 3786

1950 TOWN LAYOUT SEE SHLO NO. 3786

1950 STATE HIGHWAY LAYOUT NO. 3711

EPH W. & AMANDA LENNON,
LIVING TRUSTEES OF THE
+JOSEPH LENNON LIVING TRUST
BK/PG 64219/262
PLAN NO 1628 OF 1972
PARCEL #R09 5 A
3 BULKELEY ROAD

BONNIE COOPER & GINNY M. MAHER-COOPER
BK/PG 32345/306
PLAN NO 1018 OF 1972
PARCEL #R09 1 0
2 BULKELEY ROAD

BEGIN PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 24+13

MASSACHUSETTS DEPARTMENT OF TRANSPORTATION
1949 STATE HIGHWAY LAYOUT NO. 3675
BK/PG 7515/424

2156SF TEMP IMPACT TO BUFFER ZONE

2288SF PERM IMPACT TO BUFFER ZONE

151SF REMOVED IMPERVIOUS BUFFER ZONE TO BE REVEGETATED

1378SF PERM IMPACT TO BUFFER ZONE

398SF REMOVED IMPERVIOUS 50FT NO DISTURB ZONE TO BE REVEGETATED

BEGIN PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 24+25

401SF TEMP IMPACT TO 50FT NO DISTURB ZONE

1199SF PERM IMPACT TO 50FT NO DISTURB ZONE

780SF PERM IMPACT TO 50FT NO DISTURB ZONE

1293SF TEMP IMPACT TO 50FT NO DISTURB ZONE

BRIDGE NO. L-13-017

PT +46.88

PC +04.83

BANK

BANK

TOWN OF LITTLETON
BK/PG 7551/414

CONTINUED ON SHEET NO. 14

FOR PROFILE: SEE SHEET NO. 21

0 20 50 100
SCALE: 1" = 20'

ENVIRONMENTAL PLANS LEGEND

- EXISTING TREE LINE
- PROPOSED TREE LINE
- BORDERING VEGETATED WETLANDS
- BANK/LAND UNDER WATER
- 100FT BUFFER from BVW or BANK
- 50FT NO DISTURB LIMIT from BVW or BANK
- EROSION CONTROLS
- LIMIT OF WORK
- PERM IMPACT TO BUFFER ZONE
- TEMP IMPACT TO BUFFER ZONE
- PERM IMPACT TO 50-FT NO DISTURB
- TEMP IMPACT TO 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM BUFFER ZONE

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	E6	128
PROJECT FILE NO.	609054		

ENVIRONMENTAL PLANS

20170044A21_HPN01 NOI SET.DWG Plotted on 29-Apr-2025 3:20 PM

N
NAD 83

1949 STATE HIGHWAY LAYOUT NO. 3675 BK. 7515 PG. 424

JUNE 30, 1914 RAILROAD SIDELINE

VAF I 265 FOSTER LLC
BK/PG 80433/278
PLAN NO 266 OF 1987
PARCEL #R11 1 0
265 FOSTER STREET

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY (f/ BOSTON & MAINE RAILROAD)

MASSACHUSETTS BAY TRANSPORTATION AUTHORITY
(PARCEL FBL 3-A)
BK/PG 57072/384
BK/PG 57072/376
PLAN NO 435 OF 2011
PARCEL #R11 3 5
263 FOSTER STREET

(MBTA)
BK/PG 13117/113
PARCEL #R11 2 0

(MBTA)
BK/PG 13117/113
PARCEL #R08 37 0

LITTLETON AFFORDABLE HOUSING TRUST FUND
BK/PG 82357/132
PARCEL #R08 15 0
260 FOSTER STREET

FOSTER STREET (PUBLIC)

GRIMES LANE (PUBLIC)

CONTINUED ON SHEET NO. 13

CONTINUED ON SHEET NO. 15

2156SF TEMP IMPACT TO BUFFER ZONE

401SF TEMP IMPACT TO 50FT NO DISTURB ZONE

1199SF PERM IMPACT TO 50FT NO DISTURB ZONE

2288SF PERM IMPACT TO BUFFER ZONE

END PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 26+14

LIMIT OF GRADING

1293SF TEMP IMPACT TO 50FT NO DISTURB ZONE

780SF PERM IMPACT TO 50FT NO DISTURB ZONE

1378SF PERM IMPACT TO BUFFER ZONE

END PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 26+23

2031SF PERM IMPACT TO BUFFER ZONE

LIMIT OF GRADING

375SF TEMP IMPACT TO BUFFER ZONE

588SF PERM IMPACT TO BUFFER ZONE

220SF PERM IMPACT TO 50FT NO DISTURB ZONE

72SF REMOVED IMPERVIOUS 50FT NO DISTURB ZONE

94SF REMOVED IMPERVIOUS BUFFER ZONE

LIMIT OF GRADING

3057SF PERM IMPACT TO 50FT NO DISTURB ZONE / BUFFER ZONE

PC +87.53

5694SF TEMP IMPACT TO 50FT NO DISTURB ZONE / BUFFER ZONE

BEGIN PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 301+65

PC +04.83

PT +46.88

PT +57.06

PT +65.58

301+95.23

2018 TOWN LAYOUT

1950 SHLO NO. 3711

1951 SHLO NO. 3836

50' BUFFER RESOURCE AREA (LITTLETON)

100' BUFFER TO RESOURCE AREA

BVW

FOR PROFILE: SEE SHEET NO. 21, 22 & 24

0 20 50 100
SCALE: 1" = 20'

ENVIRONMENTAL PLANS LEGEND

- EXISTING TREE LINE
- PROPOSED TREE LINE
- BORDERING VEGETATED WETLANDS
- BANK/LAND UNDER WATER
- 100FT BUFFER from BVW or BANK
- 50FT NO DISTURB LIMIT from BVW or BANK
- EROSION CONTROLS
- LIMIT OF WORK
- PERM IMPACT TO BUFFER ZONE
- TEMP IMPACT TO BUFFER ZONE
- PERM IMPACT TO 50-FT NO DISTURB
- TEMP IMPACT TO 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM BUFFER ZONE

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	E7	128
PROJECT FILE NO.	609054		

ENVIRONMENTAL PLANS

20170044A21_HPN01 NOI SET.DWG Plotted on 29-Apr-2025 3:20 PM

NAD 83 N

CONTINUED ON SHEET NO. 14

CONTINUED ON SHEET NO. 16

MASSACHUSETTS BAY TRANSORTATION AUTHORITY (PARCEL FBL 3-A) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 2011 PARCEL #R11 3 5 263 FOSTER STREET

MASSACHUSETTS BAY TRANSORTATION AUTHORITY (PARCEL FBL 3-B) BK/PG 57072/384 BK/PG 57072/376 PLAN NO 435 OF 2011 PARCEL #R11 3 5 263 FOSTER STREET

SNS FOSTER, LLC & C/O ROBERT LONG BK/PG 72045/170 PLAN NO 435 OF 2011 PARCEL #R11 3 0 245 FOSTER STREET

FOSTER STREET (PUBLIC)

2018 TOWN LAYOUT

90SF REMOVED IMPERVIOUS 50 FT NO DISTURB ZONE

562SF PERM IMPACT TO 50FT NO DISTURB ZONE

84SF REMOVED IMPERVIOUS BUFFER ZONE

614 SF TEMP IMPACT TO BUFFER ZONE

841 SF PERM IMPACT TO BUFFER ZONE

3497SF TEMP IMPACT TO BUFFER ZONE

1991SF PERM IMPACT TO BUFFER ZONE

100' BUFFER TO RESOURCE AREA

LIMIT OF GRADING

473SF PERM IMPACT TO 50FT NO DISTURB ZONE / BUFFER ZONE

425 SF TEMP IMPACT TO BUFFER ZONE

839 SF PERM IMPACT TO BUFFER ZONE

END PROP. EROSION & SEDIMENT CONTROL BARRIER STA. 33+84

3057SF PERM IMPACT TO 50FT NO DISTURB ZONE / BUFFER ZONE

5694SF TEMP IMPACT TO 50FT NO DISTURB ZONE / BUFFER ZONE

BVW

LIMIT OF GRADING

50' BUFFER RESOURCE AREA (LITTLETON)

100' BUFFER TO RESOURCE AREA

LITTLETON AFFORDABLE HOUSING TRUST FUND BK/PG 82357/132 PARCEL #R08 15 0 260 FOSTER STREET

RICHARD B. VIGNON BK/PG 13250/70 PLAN NO 847 OF 1969 PARCEL #R08 13 242 FOSTER STREET

NOTE: NO RECORD OF WATER LINE NORTHEAST OF THIS HYDRANT. WATER LINE IS BELIEVED TO CONTINUE AND IS SHOWN SCHEMATICALLY, FOR ILLUSTRATIVE PURPOSES ONLY.

NOTE: GAS LINE RECORDS NORTHEAST OF THIS VICINITY ARE SCHEMATIC AND ARE SHOWN SCHEMATICALLY, FOR ILLUSTRATIVE PURPOSES ONLY.

PC +86.16

FOR PROFILE: SEE SHEET NO. 22 & 23

0 20 50 100

SCALE: 1" = 20'

ENVIRONMENTAL PLANS LEGEND

- EXISTING TREE LINE
- PROPOSED TREE LINE
- BORDERING VEGETATED WETLANDS
- BANK/LAND UNDER WATER
- 100FT BUFFER from BVW or BANK
- 50FT NO DISTURB LIMIT from BVW or BANK
- EROSION CONTROLS
- LIMIT OF WORK
- PERM IMPACT TO BUFFER ZONE
- TEMP IMPACT TO BUFFER ZONE
- PERM IMPACT TO 50-FT NO DISTURB
- TEMP IMPACT TO 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM 50-FT NO DISTURB
- IMPERVIOUS REMOVED FROM BUFFER ZONE

LITTLETON
RECONSTRUCTION OF FOSTER STREET

STATE	FED. AID PROJ. NO.	SHEET NO.	TOTAL SHEETS
MA	STP/CMQ/TAP-0033(037)X	E8	128
PROJECT FILE NO.	609054		

ENVIRONMENTAL PLANS

20170044A21_HPN01 NOI SET.DWG Plotted on 29-Apr-2025 3:21 PM

CONTINUED ON SHEET NO. 19

NAD 83

N

SNS FOSTER, LLC & C/O ROBERT LONG
BK/PG 72045/170
PLAN NO 435 OF 2011
PARCEL #R11 3 0
245 FOSTER STREET

PATRICIA A. NARGIZIAN
BK/PG 70735/467
PARCEL #R11 5 4
237 FOSTER STREET

END OF PROJECT
PROJ. NO. 609054
STA. 39+36.15
N 3015278.1762
E 656130.7752

2018 TOWN LAYOUT

STONE WALL

NOTE: C.B. 32 IS A DOUBLE-SIZED STRUCTURE.

NOTE: C.B. 34 IS A DOUBLE-SIZED STRUCTURE.

LIMIT OF GRADING

C.B. #32
RIM=276.46

C.B. #34
RIM=299.74

GARDEN

WOODS

TREE

LEDGE/ROCK OUTCROP

BIT. CONC. BERM

BIT. CONC. DRIVE

DH

DMH 35
RIM=291.85'

8" G TRANSMISSION (NG)

39
PT +11.89
N 37° 31' 19" E 86.75'

39+98.64

Δ=9° 19' 15"
L=105.74' R=650.00'

PC +06.15

38

37
PT +90.37

N 28° 12' 04" E

FOSTER STREET
(PUBLIC)

Δ=3° 56' 00"
L=204.20' R=2974.57'

36

35
PC +86.16

34

DR3-2

DR2-2

H1

G2

CB 30
RIM=276.44'
DMH 31
RIM=276.52'

CB 36
RIM=299.76'
DMH 33
RIM=299.20'

26" PINE

14" PINE

UTILITY POLE #78
ELEV.=289.65

LANDSCAPED AREA

GRANITE CURB

BIT. CURB

GRASS

BIT. CONC. SIDEWALK

CONC. WALL

GUARDRAIL

CATV (COMCAST)

BALSAM LANE
(PUBLIC)

2020 TOWN LAYOUT

QUINN E. & JENNIFER A. CANFIELD
BK/PG 55588/290
PLAN NO 188 OF 1971
PARCEL #R08 13 D
238 FOSTER STREET

RICHARD B. VIGNONI
BK/PG 13250/70
PLAN NO 847 OF 1969
PARCEL #R08 13 E
242 FOSTER STREET

NOTE: NO RECORD OF WATER LINE CONFIGURATION IN THIS AREA. WATER LINE IS SHOWN SCHEMATICALLY, FOR ILLUSTRATIVE PURPOSES ONLY.

NOTE: GAS LINE RECORDS IN THIS AREA ARE SCHEMATIC AND ARE SHOWN SCHEMATICALLY, FOR ILLUSTRATIVE PURPOSES ONLY.

100' BUFFER TO RESOURCE AREA

FOR PROFILE: SEE SHEET NO. 23

0 20 50 100

SCALE: 1" = 20'

Abutter's Notification Letter and Abutter's List

NOTIFICATION TO ABUTTERS

Pick one:

_____Notice of Intent/Abbreviated NOI

_____Abbreviated Notice of Resource Area Delineation

_____Request for Determination of Applicability

__X__Request to Amend an Order of Conditions (MADEP File # 204_-0991_)

Modification for Virtual Meetings

Under MA Wetlands Protection Act and Littleton Wetlands Protection ByLaw (Chapter 171), this form must be completed and mailed, certified mail return receipt requested, to all abutters at their mailing addresses shown on the most recent Town Assessor's records as well as the owner (if not applicant).

In accordance with the MA Wetlands Protection Act and Littleton Wetlands Protection ByLaw Chapter 171-2D, you are hearby notified of a public hearing on the matter described below:

A. The applicant has filed a permit application with the Littleton Conservation Commission for work in an area subject to protection under the Massachusetts Wetlands Protection Act and Littleton Wetlands Protection ByLaw.

B. The name of the applicant is Stephen Jahnle, Town of Littleton Director of the Department of Public Works

C. The address of the land where the activity is proposed is The Reconstruction of Foster Street
Foster Street: from Taylor Street to Balsam Lane
Taylor Street: at the intersection at Foster Street
Grimes Lane: at the intersection at Foster Street

D. The work proposed is This request for an amendment to the Order of Conditions for project DEP 204-0991 is for the proposed targeted application of herbicide treatment to invasive plant species within the project limits and a reduction in the proposed number of underground leaching catch basin structures from 5 to 1 due to the discovery of high seasonal groundwater elevation.

E. Copies of the filing may be examined at the Conservation Commission office at 37 Shattuck Street Monday through Thursday; 9:00 – 1:00 (please call first to ensure the Conservation Agent is available and not out on site visits). The office phone number is 978-540-2428.

F. Copies of the filing may be obtained electronically from (check one) the ____applicant or __X__ the applicant's representative by calling 413-333-5461 during the following times: M-F, 9am-12pm, 1pm-5pm. Fuss & O'Neill, Inc.

G. The public hearing/meeting will be held on 05/13/2025. Information regarding the date and time of the public hearing/meeting may be obtained from the Littleton Conservation Commission (see contact info at the end of this notice).

H. Notice of the public hearing/meeting, including date and time will be published at least five business days in advance in a paper of local circulation. The agenda, noting times will be posted at Town Hall and at https://ma-littleton.civicplus.com/AgendaCenter/Search/?term=&CIDs=13,&startDate=&endDate=&dateRange=&dateSelector= at least 48 hours in advance of the meeting. It is currently anticipated that this meeting will be held entirely remotely, pursuant to "An Act Relative to Extending Certain State of Emergency Accommodations" (July 16, 2022) and the extension of that Act through March 21, 2025. If the meeting is held remotely, instructions for remote viewing of, and participation in, the meeting will be included in the agenda and may also be obtained from the Littleton Conservation Commission.

You may contact the Littleton Conservation Commission staff (Conservation@littletonma.org; 978-540-2428), or the Massachusetts Department of Environmental Protection/ Central Region (508-792-7650) at 8 New Bond Street, Worcester, MA 01606) for information about this application

9-14-2023

TOWN OF LITTLETON
BOARD OF ASSESSORS
P.O. BOX 1305
LITTLETON, MA 01460
(978) 540-2410
FAX: (978) 952-2321

Date: April 14, 2025

Re: Certified List of Abutters Conservation Commission

Applicant**:** Town of Littleton

Name of Firm: Fuss & O'Neill, Inc

Mailing Address: 39 Ayer Rd

Subject Parcel Location: Foster Street roadway from Taylor to Balsam and 219-241 Taylor St

Subject Parcel No.: NA

Subject Owner Name: Town of Littleton

M.G.L. Chapter 131: Section 40 …… "Any person filing a notice of intention with a conservation commission shall at the same time give written notification thereof, by delivery in hand or certified mail, return receipt requested, to all abutters within one hundred feet of the property line of the land where the activity is proposed, but not limited to, owners of land directly opposite said proposed activity on any public or private street or way, and in another municipality or across a body of water. When a notice of intent proposes activities on land under water bodies and waterways or on a tract of land greater than 50 acres, written notification shall be given to all abutters within 100 feet of the proposed project site. For the purposes of this action, "project site" shall mean lands where the following activities are proposed to take place: dredging, excavating, filling, grading, the erection, reconstruction or expansion of a building or structure, the driving of pilings, the construction or improvement of roads or other ways and the installation of drainage, sewerage and water systems, and "land under water bodies and waterways" shall mean the bottom of, or land under, the surface of the ocean or an estuary, creek, river stream, pond or lake. When a notice of intent proposes activity on a linear shaped project site longer than 1,000 feet in length, notification shall be given to all abutters within 1,000 feet of the proposed project site. If the linear project site takes place wholly within an easement through another person's land, notice shall also be given to the landowner**.** Said notification shall be at the applicant's expense, and shall state where copies of the notice of intention may be examined and obtained and where information regarding the date, time and place of the public hearing may be obtained. Proof of such notification, with a copy of the notice mailed or delivered, shall be filed with the conservation commission."…….

I hereby certify the attached list of abutter (s) as stated in the M.G.L. Chapter 131, Section 40.

Number of Abutter(s) 99 including the subject parcels + 0 Applicant Requesting Abutter's List. ***Certified* by:**

Name: Kim Prehl

Title: Office Assistant & Field Lister

RTE 2 R06 2 0
LUC: 911
COMMONWEALTH OF MASSACHUSETTS
MASS DOT
10 PARK PLAZA-REAL ESTATE DEPT
BOSTON, MA 02116

216 FOSTER ST R08 12 0
LUC: 101
RAUSA FAMILY TRUST
TRUSTEE RAUSA PAUL W
216 FOSTER ST
LITTLETON, MA 01460

FIR LN R08 13 0
LUC: 930
TOWN OF LITTLETON
PO BOX 1305
LITTLETON, MA 01460

5 FIR LN R08 13 2
LUC: 101
LAFERTY CRAIG WILLIAM JR
LAFERTY KRISTIN MELENEY
5 FIR LN
LITTLETON, MA 01460

3 FIR LN R08 13 3
LUC: 101
BELIN EVGENI
KUKLINA POLINA
3 FIR LN
LITTLETON, MA 01460

220 FOSTER ST R08 13 A
LUC: 101
CYNTHIA G DUBE REV TRUST
DUBE GREGORY P & CYNTHIA G TRS
220 FOSTER ST
LITTLETON, MA 01460

224 FOSTER ST R08 13 B
LUC: 101
BLANCHARD JOHN
BLANCHARD TERESA
224 FOSTER STREET
LITTLETON, MA 01460

234 FOSTER ST R08 13 C
LUC: 101
2021 JACOBS-ANDERSON FAMILY TR
TRUSTEE JACOBS DEBORAH
234 FOSTER ST
LITTLETON, MA 01460

238 FOSTER ST R08 13 D
LUC: 101
CANFIELD QUINN E
CANFIELD JENNIFER A
238 FOSTER ST
LITTLETON, MA 01460

242 FOSTER ST R08 13 E
LUC: 101
VIGNONI RICHARD B
242 FOSTER ST
LITTLETON, MA 01460

230 FOSTER ST R08 14 0
LUC: 101
BAUCOM ALLAN
230 FOSTER ST
LITTLETON, MA 01460

260 FOSTER ST R08 15 0
LUC: 931
LITTLETON AFFORDABLE HOUSING T
37 SHATTUCK ST
LITTLETON, MA 01460

6 FRASER ST R08 15 10
LUC: 101
KARNATI V V REDDY 2017 REV TR
KARNATI KAVITHA 2017 REV TR
6 FRASER ST
LITTLETON, MA 01460

8 FRASER ST R08 15 11
LUC: 101
ROTHLEUTNER KRISTOFFER BRICE
ROTHLEUTNER LAURIE ANN
8 FRASER ST
LITTLETON, MA 01460

10 FRASER ST R08 15 12
LUC: 101
ZHANG YULIAN
10 FRASER ST
LITTLETON, MA 01460

12 FRASER ST R08 15 13
LUC: 101
ZHENG MINXING
CHAN LAI SIM
12 FRASER ST
LITTLETON, MA 01460

1 FRASER ST R08 15 16
LUC: 101
XIA WENYU
SHEN LINMING
1 FRASER ST
LITTLETON, MA 01460

3 FRASER ST R08 15 17
LUC: 101
KOSINSKI-COLLINS MELISSA S
COLLINS JOHN A IV
3 FRASER ST
LITTLETON, MA 01460

5 FRASER ST R08 15 18
LUC: 101
STEVENS CLIFFORD S
STEVENS TIFFANY D
5 FRASER ST
LITTLETON, MA 01460

7 FRASER ST R08 15 19
LUC: 101
SHARMA MANOJ K
SHARMA PUJA
7 FRASER ST
LITTLETON, MA 01460

BALSAM LN R08 15 2
LUC: 930
LITTLETON TOWN OF
37 SHATTUCK ST
LITTLETON, MA 01460

4 SPRUCE ST R08 15 22
LUC: 101
PEDDI SRINIVASA
PEDDI PRASUNA
4 SPRUCE ST
LITTLETON, MA 01460

2 SPRUCE ST R08 15 23
LUC: 101
ALLA PAVAN KUMAR
JAVVADI SAI SWETHA
2 SPRUCE ST
LITTLETON, MA 01460

BALSAM LN R08 15 3
LUC: 930
LITTLETON TOWN OF
37 SHATTUCK ST
LITTLETON, MA 01460

19 GRIMES LN R08 15 38
LUC: 101
ARUMUGASAMY JEEVANANDAM
JEEVANANDAM VAIJAYANTHIMALA
19 GRIMES LN
LITTLETON, MA 01460

15 GRIMES LN R08 15 39
LUC: 101
GALLO FAMILY TRUST
GALLO JOSEPH MICHAEL
15 GRIMES LN
LITTLETON, MA 01460

FRASER ST R08 15 4
LUC: 930
LITTLETON TOWN OF
37 SHATTUCK ST
LITTLETON, MA 01460

11 GRIMES LN R08 15 40
LUC: 101
POPE CAREY NAT
POPE JING LIU
11 GRIMES LN
LITTLETON, MA 01460

7 GRIMES LN R08 15 41
LUC: 101
KELA AMITKUMAR B
KACHOLIYA MOUSHMI
7 GRIMES LN
LITTLETON, MA 01460

3 GRIMES LN R08 15 42
LUC: 101
ROSHAN RAKESH
PANKAJ SWARNICA
3 GRIMES LN
LITTLETON, MA 01460

GRIMES LN R08 15 5
LUC: 930
LITTLETON TOWN OF
37 SHATTUCK ST
LITTLETON, MA 01460

7 BALSAM LN R08 15 7
LUC: 101
MITCHELL ANDREW JAMES
LEEDO DESIREE MARIE
7 BALSAM LN
LITTLETON, MA 01460

9 BALSAM LN R08 15 8
LUC: 101
ANDERSEN MARK A
ANDERSEN JULIE
9 BALSAM LN
LITTLETON, MA 01460

2 FRASER ST R08 15 9
LUC: 101
FORSBERG JAMES M
FORSBERG MEGAN
2 FRASER ST
LITTLETON, MA 01460

FRASER ST R08 15 A
LUC: 132
DURKEE FARM BUILDERS INC
487 GROTON RD
WESTFORD, MA 01886

264 FOSTER ST R08 37 0
LUC: 901
BOSTON & MAINE RAILROAD
C/O GUILFORD TRANSPORTATION
IRON HORSE PARK
TAX DEPT 67 HIGH ST
NO BILLERICA, MA 01862

208 FOSTER ST R08 9 A
LUC: 101
SULLIVAN CONOR
SULLIVAN SAMANTHA
208 FOSTER ST
LITTLETON, MA 01460

2 BULKELEY RD R09 1 0
LUC: 101
COOPER BONNIE
MAHER-COOPER GINNY M
2 BULKELEY RD
LITTLETON, MA 01460

6 BULKELEY RD R09 1 A
LUC: 101
HORNE ALEXANDER C
MCLEOD SAMANTHA
6 BULKELEY RD
LITTLETON, MA 01460

10 BULKELEY RD R09 2 0
LUC: 105
WHEELER JOHN L + KAREN L CO-TR
OF THE J + K REALTY TRUST
63 JUNIPER CREEK BLVD
PINEHURST, NC 28374

12 BULKELEY RD R09 2 1
LUC: 101
CLARK KEVIN J
CLARK LAN
12 BULKELEY RD
LITTLETON, MA 01460

4 LIBERTY SQ R09 29 A
LUC: 101
CANNISTRARO CHANG FAM TR
CANNISTRARO DD & CHANG JC-TRS
4 LIBERTY SQUARE
LITTLETON, MA 01460

BULKELEY RD R09 3 0
LUC: 950
LITTLETON CONSERVATION TRUST
P O BOX 594
LITTLETON, MA 01460

LIBERTY SQ R09 30 0
LUC: 930
LITTLETON TOWN OF
PARK DEPARTMENT
PO BOX 1305
LITTLETON, MA 01460

238 TAYLOR ST R09 31 0
LUC: 101
MACLEOD DOUGLAS S
MACLEOD LOLA F
238 TAYLOR ST
LITTLETON, MA 01460

236 TAYLOR ST R09 31 1
LUC: 101
CURRAN JAMES P
RIGALI YOLANDA M
236 TAYLOR ST
LITTLETON, MA 01460

240 TAYLOR ST R09 31 2
LUC: 101
SCULLY KATHLEEN K
240 TAYLOR ST
LITTLETON, MA 01460

242 TAYLOR ST R09 31 3
LUC: 101
DRINKWATER LAURA J
242 TAYLOR ST
LITTLETON, MA 01460

244 TAYLOR ST R09 31 4
LUC: 101
MOHLENHOFF BENJAMIN A
MOHLENHOFF BROOKE E
244 TAYLOR ST
LITTLETON, MA 01460

230 TAYLOR ST R09 32 0
LUC: 441
GRADY JOHN K TRUSTEE OF
FOSTER/TAYLOR REALTY TRUST
CONCORD ASSC- 323 WEST MAIN ST
AYER, MA 01432

232 TAYLOR ST R09 32 A
LUC: 403
GRADY J, D RICE TRUSTEES OF
CONCORD ASSOC FOSTER ST TRUST
323 WEST MAIN STREET
AYER, MA 01432

300 FOSTER ST R09 33 0
LUC: 404
GRADY JOHN K, RICE DAVID B
OF CONCORD ASSCS FOSTER ST TR
323 WEST MAIN STREET
AYER, MA 01432

234 TAYLOR ST R09 34 0
LUC: 400
PREMIER HEALTHCARE GROUP, LLC
234 TAYLOR ST
LITTLETON, MA 01460

OFF BULKELEY RD R09 4 0
LUC: 901
BOSTON & MAINE RAILROAD
C/O GUILFORD TRANSPORTATION
IRON HORSE PARK
TAX DEPT 67 HIGH ST
NO BILLERICA, MA 01862

BULKELEY RD R09 5 0
LUC: 932
TOWN OF LITTLETON
CONSERVATION COMMISSION
P O BOX 1305
LITTLETON, MA 01460

17 BULKELEY RD R09 5 2
LUC: 101
GRAY DANA C
GRAY KARIN M
17 BULKELEY ROAD
LITTLETON, MA 01460

19 BULKELEY RD R09 5 4
LUC: 101
PRATAPA RADHA K
PUTCHA VEENA S
19 BULKELEY RD
LITTLETON, MA 01460

23 BULKELEY RD R09 5 5
LUC: 101
PAVLOVIC DRAGANA
KARLSSON JONAS
23 BULKELEY ROAD
LITTLETON, MA 01460

21 BULKELEY RD R09 5 6
LUC: 101
THE FENTON FAMILY TRUST
TRUSTEE FENTON JAMES T
21 BULKELEY RD
LITTLETON, MA 01460

3 BULKELEY RD R09 5 A
LUC: 101
LENNON JOSEPH W+AMANDA TRS OF
AMANDA+JOSEPH LENNON LIVING TR
3 BULKELEY RD
LITTLETON, MA 01460

7 BULKELEY RD — R09 5 B
LUC: 101
WARD KEITH A
7 BULKELEY RD
LITTLETON, MA 01460

11 BULKELEY RD — R09 5 C
LUC: 101
WALSH JR VANCE J V
11 BULKELEY RD
LITTLETON, MA 01460

15 BULKELEY RD — R09 5 D
LUC: 101
CROWLEY JENNIFER L TRUSTEE OF
15 BULKELEY ROAD REALTY TRUST
15 BULKELEY ROAD
LITTLETON, MA 01460

284 FOSTER ST — R09 5 E
LUC: 101
BALZOTTI GREGORY
BALZOTTI SHERI
284 FOSTER STREET
LITTLETON, MA 01460

286 FOSTER ST — R09 5 F
LUC: 101
KENYON BROCKTON
COLLINS AINE
286 FOSTER ST
LITTLETON, MA 01460

290 FOSTER ST — R09 5 G
LUC: 101
RIZZOLO ANTHONY J
RIZZOLO JOSEPHINE
290 FOSTER ST
LITTLETON, MA 01460

14 CRANE RD — R09 6 0
LUC: 101
SLUYSKI KRISTEN L
14 CRANE RD
LITTLETON, MA 01460

277 FOSTER ST — R10 1 0
LUC: 104
MCCATHERIN JORDAN S
277-279 FOSTER ST
LITTLETON, MA 01460

215 TAYLOR ST — R10 10 0
LUC: 104
CHB LITTLETON LLC
20 GARDEN ST
DANVERS, MA 01923

205 TAYLOR ST — R10 11 0
LUC: 316
CMH LITTLETON LLC
20 GARDEN ST
DANVERS, MA 01923

153 TAYLOR ST — R10 14 0
LUC: 930
LITTLETON WATER DEPARTMENT
39 AYER RD
LITTLETON, MA 01460

151 TAYLOR ST — R10 14 1
LUC: 401
LML LITTLETON LLC
401 EDGEWATER PLACE, SUITE 265
WAKEFIELD, MA 01880

200 TAYLOR ST — R10 18 0
LUC: 410
FLETCHER JOHN L /JAMES L TR
FLETCHER TRUST NO 1
192 DEPOT RD
PO BOX 401
EAST TEMPLETON, MA 01438-0401

1250 HILL RD — R10 19 0
LUC: 101
SONI DEEPAK
DHILLON SHUBHLAKHAN KAUR
1250 HILL RD
LITTLETON, MA 01460

305 FOSTER ST — R10 2 1
LUC: 404
2641-2651 SANTA ANNA AVE LLC
80 ERDMAN WAY SUITE 301
LEOMINSTER, MA 01453

295 FOSTER ST — R10 2 2
LUC: 404
ASIJA PROPERTIES LLC
C/O SANDEEP ASIJA
151 HAGGETTS POND RD
ANDOVER, MA 01810

1252 HILL RD — R10 20 0
LUC: 101
KLOCK JAMES
CAMPBELL-KLOCK PRISCILLA
1252 HILL RD
LITTLETON, MA 01460

1254 HILL RD — R10 21 0
LUC: 101
MARRESE CHRISTOPHER R
MARRESE NANCY A
1254 HILL RD
LITTLETON, MA 01460

1256 HILL RD — R10 22 0
LUC: 101
MORRISON BRUCE A
MORRISON NANCY L
1256 HILL RD
LITTLETON, MA 01460

247 TAYLOR ST — R10 23 0
LUC: 101
SHIMMEL GARY A + KATHLEEN M
TRUSTEES OF ATS REALTY TRUST
456 NEWTOWN RD
LITTLETON, MA 01460-2206

3 WESTVIEW RD — R10 3 0
LUC: 440
GUTIERREZ ARTURO+CATALDO CLASS
B TRS, SWEENEY D CLASS A TR
C/O THE GUTIERREZ COMPANY
200 WHEELER ROAD
BURLINGTON, MA 01803

1 WESTVIEW RD — R10 3 1
LUC: 440
GUTIERREZ ARTURO+CATALDO CLASS
B TRS, SWEENEY D CLASS A TR
C/O THE GUTIERREZ COMPANY
200 WHEELER ROAD
BURLINGTON, MA 01803

2 WESTVIEW RD — R10 3 2
LUC: 440
GUTIERREZ ARTURO+CATALDO CLASS
B TRS, SWEENEY D CLASS A TR
C/O THE GUTIERREZ COMPANY
200 WHEELER ROAD
BURLINGTON, MA 01803

11 WESTVIEW RD — R10 3 3
LUC: 440
GUTIERREZ ARTURO+CATALDO CLASS
B TRS, SWEENEY D CLASS A TR
C/O THE GUTIERREZ COMPANY
200 WHEELER ROAD
BURLINGTON, MA 01803

241 TAYLOR ST — R10 5 0
LUC: 014
MORRISON BRUCE AL
241 TAYLOR ST
LITTLETON, MA 01460

TAYLOR ST — R10 6 0
LUC: 440
GUTIERREZ ARTURO+CATALDO CLASS
B TRS, SWEENEY D CLASS A TR
C/O THE GUTIERREZ COMPANY
200 WHEELER ROAD
BURLINGTON, MA 01803

225 TAYLOR ST — R10 7 0
LUC: 440
GUTIERREZ ARTURO+CATALDO CLASS
B TRS, SWEENEY D CLASS A TR
C/O THE GUTIERREZ COMPANY
200 WHEELER ROAD
BURLINGTON, MA 01803

219 TAYLOR ST — R10 8 0
LUC: 101
FOSS WILLIAM R, FOSS JANICE M
CHARLTON ELIZABETH A
219 TAYLOR ST
LITTLETON, MA 01460

265 FOSTER ST — R11 1 0
LUC: 401
VAF I 265 FOSTER LLC
14241 DALLAS PKWY, SUITE 650
DALLAS, TX 75254

REAR FOSTER ST — R11 1 2
LUC: 440
VAF I 265 FOSTER LLC
14241 DALLAS PKWY, SUITE 650
DALLAS, TX 75254

REAR FOSTER ST R11 1 3

LUC: 441

VAF I 265 FOSTER LLC

14241 DALLAS PKWY, SUITE 650

DALLAS, TX 75254

FOSTER ST R11 2 0

LUC: 901

BOSTON & MAINE RAILROAD

C/O GUILFORD TRANSPORTATION

IRON HORSE PARK

TAX DEPT 67 HIGH ST

NO BILLERICA, MA 01862

245 FOSTER ST R11 3 0

LUC: 441

SNS FOSTER LLC

C/O ROBERT LONG

30 HARWOOD AV

LITTLETON, MA 01460

219 FOSTER ST R11 3 3

LUC: 101

TJIONAS GEORGE A

BOUMITRI MICHELLE M

219 FOSTER ST

LITTLETON, MA 01460

221 FOSTER ST R11 3 4

LUC: 101

GRACE JULIE DAHLBERG

GRACE FRANK P

221 FOSTER ST

LITTLETON, MA 01460

263 FOSTER ST R11 3 5

LUC: 972

MASS BAY TRANS AUTHORITY

TEN PARK PLAZA

BOSTON, MA 02116

237 FOSTER ST R11 5 4

LUC: 101

CHRISTENSEN DANE WILLIAM

GRECO DANIELLE ELIZABETH

237 FOSTER ST

LITTLETON, MA 01460

233 FOSTER ST R11 6 0

LUC: 101

CAREW MICHAEL J

WEINER MICHELLE B

233 FOSTER ST

LITTLETON, MA 01460

225 FOSTER ST R11 7 0

LUC: 101

KIERNAN KAREN A

KIERNAN TODD D

225 FOSTER ST

LITTLETON, MA 01460