

PROPOSED SELF-STORAGE FACILITY
300 HARTFORD AVENUE
BELLINGHAM, MASSACHUSETTS
FEBRUARY 12, 2018

PREPARED FOR:

JMRD2, LLC
665 CHURCH STREET
WHITINSVILLE, MA 01588

PREPARED BY:

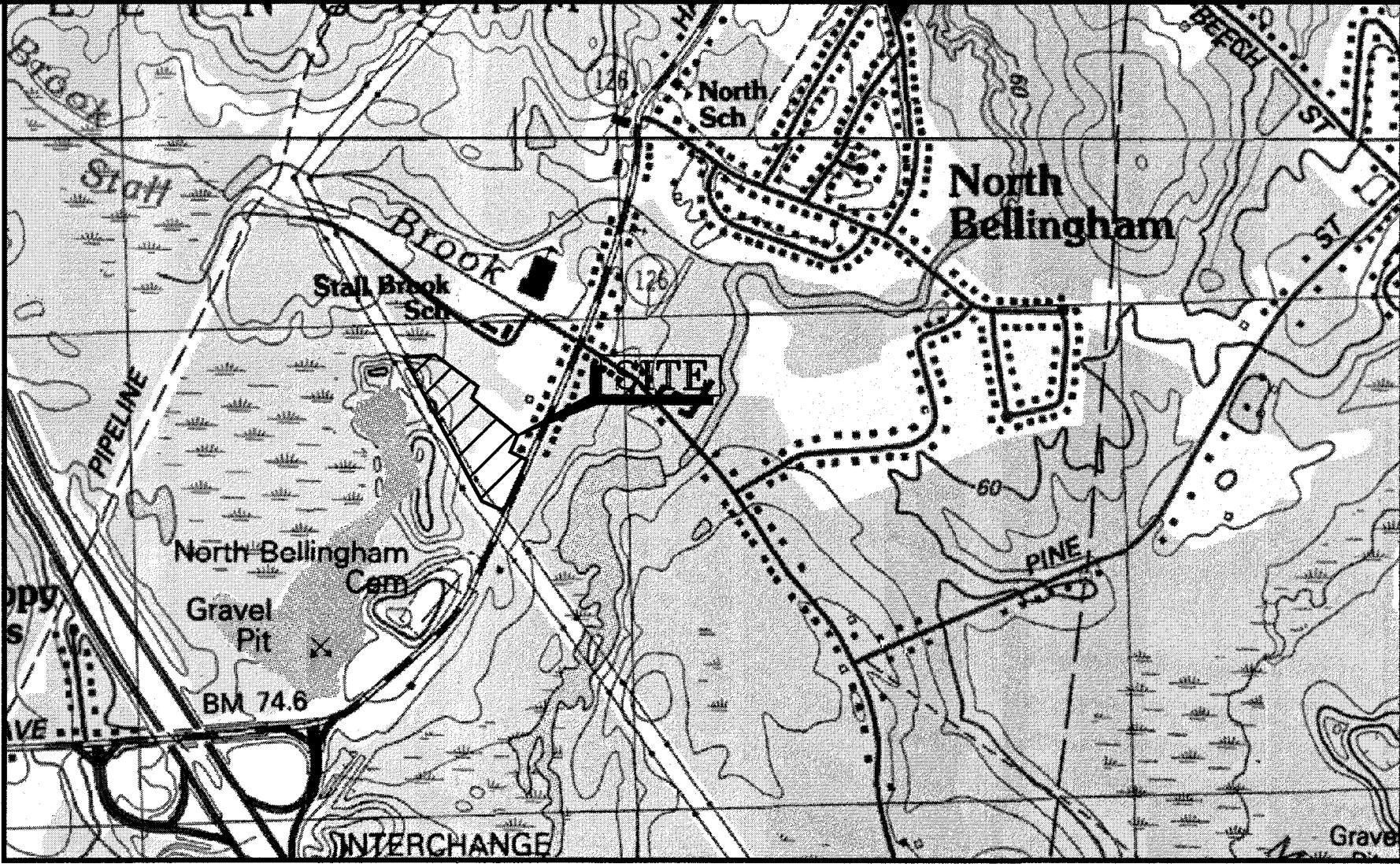
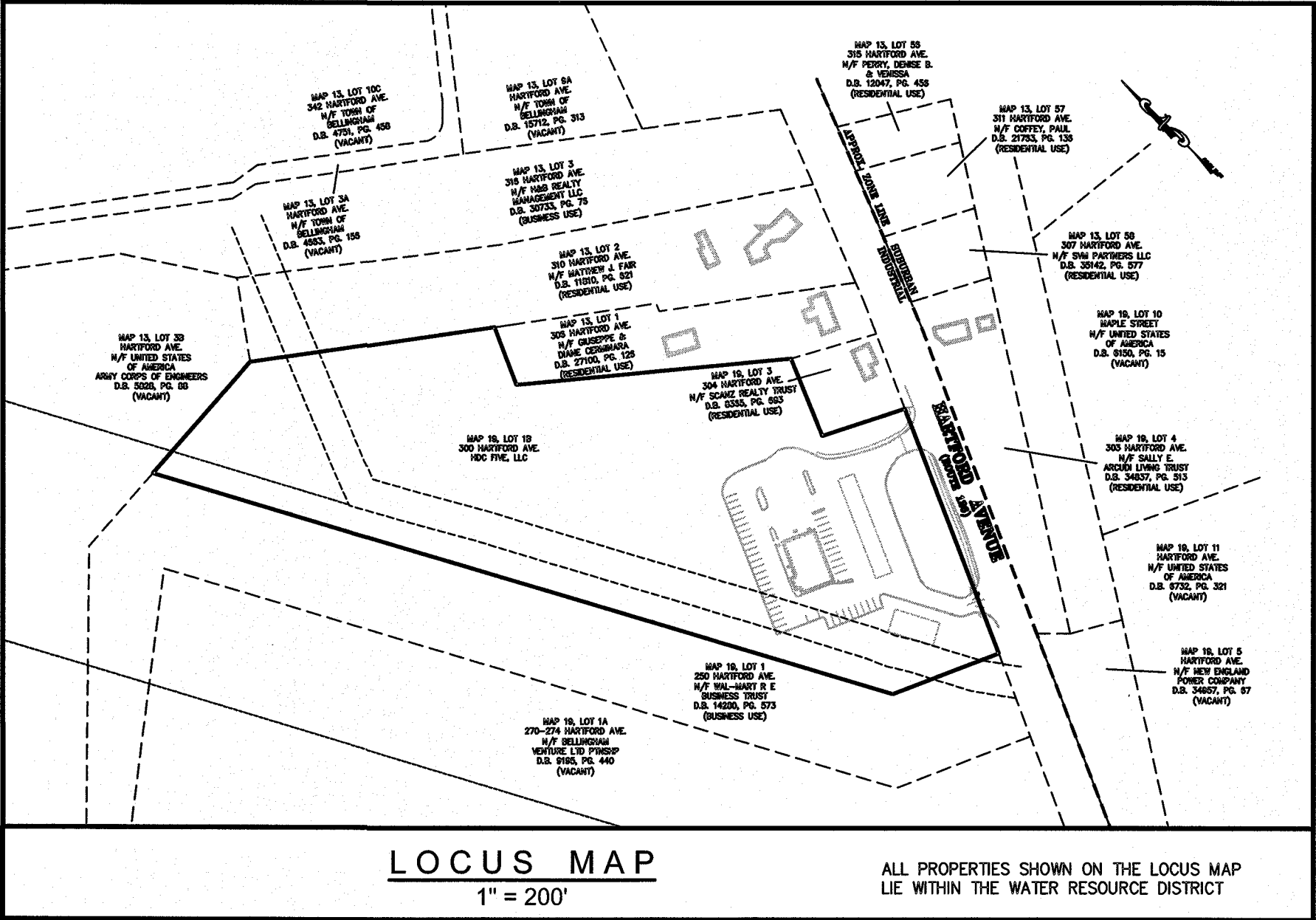
ANDREWS SURVEY & ENGINEERING, INC.
104 MENDON STREET
P.O. BOX 312
UXBRIDGE, MA 01569
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LAND SURVEYING:

ANDREWS SURVEY & ENGINEERING, INC.
104 MENDON STREET
P.O. BOX 312
UXBRIDGE, MA 01569
P: 508.278.3897
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ENVIRONMENTAL:

ENVIRONMENTAL CONSULTING
& RESTORATION, LLC
P.O. BOX 1319
PLYMOUTH, MA 02362
P: 617.529.3792



APPROVED
By Bellingham Planning Board at 12:43 pm, Nov 15, 2018

DRAWING DATE	LAST REVISION	SHEET NO.	SHEET TITLE
2/12/18	6/22/18	C-0.0	COVER SHEET
2/12/18	6/22/18	C-1.0	LEGEND, ABBREVIATIONS & GENERAL NOTES
2/12/18	6/22/18	C-2.0	EXISTING CONDITIONS & DEMOLITION PLAN
2/12/18	6/22/18	C-3.0	LAYOUT & MATERIALS PLAN
2/12/18	6/22/18	C-4.0	UTILITY PLAN
2/12/18	6/22/18	C-5.0	GRADING & DRAINAGE PLAN
2/12/18	6/22/18	C-6.0	LANDSCAPING & LIGHTING PLAN
2/12/18	6/22/18	C-7.1 - C-7.4	CONSTRUCTION DETAILS
2/12/18	6/22/18	C-8-1	EROSION & SEDIMENT CONTROL PLAN
2/12/18	6/22/18	C-8.2	EROSION & SEDIMENT CONTROL NOTES & DETAILS
2/12/18	6/22/18	C-9.0	FIRE ACCESS EXHIBIT PLAN

OWNER OF RECORD:
HDC FIVE, LLC
P.O. BOX 366
EAST LONGMEADOW, MA 01028

BELLINGHAM ASSESSORS INFORMATION:
PARCEL ID: 0019-0018-0000
TOTAL AREA: 342,861 S.F. / 7.87 ACRES

BELLINGHAM ZONING INFORMATION:
UNDERLYING ZONE: INDUSTRIAL
MINIMUM AREA: 60,000 S.F.
MINIMUM FRONTAGE: 200'
SETBACKS: FRONT 20', *SIDE 10', REAR 20'

*30' WHERE ADJOINING A RESIDENTIAL USE

OVERLAY ZONE: WATER RESOURCE DISTRICT

DEED REFERENCES:
BK. 33495, PG. 585
BK. 35291, PG. 89

PLAN REFERENCES:
PLAN NO. 125 OF 1992
PLAN NO. 642 OF 2015

GOVERNMENT/UTILITY CONTACTS		
BELLINGHAM POLICE DEPT. 6 MECHANIC STREET P: 508.966.1515 F: 508.966.4669 ATTN: GERARD L. DAIGLE, JR., CHIEF	BELLINGHAM D.P.W. 26 BLACKSTONE STREET P: 508.966.5813 (DPW) P: 508.966.5813 (WATER DIVISION) P: 508.966.5816 (HIGHWAY DIVISION) ATTN: DONALD DIMARTINO, DIRECTOR	MASSACHUSETTS ELECTRIC CO. 1.800.322.3223 VERIZON COMMUNICATIONS 1.800.870.9999
BELLINGHAM FIRE DEPT. 28 BLACKSTONE STREET P: 508.966.1112 F: 508.966.5835 ATTN: STEVEN P. GENTILE, CHIEF	BELLINGHAM BUILDING DEPT. 10 MECHANIC STREET P: 508.657.2851 F: 508.966.5844 ATTN: TIM AICARDI, BUILDING INSPECTOR	
BELLINGHAM PLANNING DEPARTMENT 2 MECHANIC STREET P: 508.657.2892 F: 508.966.2317 ATTN: JAMES S. KUPFER, PLANNER	BELLINGHAM CONSERVATION COMMISSION 2 MECHANIC STREET P: 508.657.2858 F: 508.966.4425 ATTN: ANNE MATTHEWS	

Andrews Survey & Engineering, Inc.
Land Surveying - Civil Engineering - Site Planning

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BELLINGHAM PLANNING BOARD

BEING A MAJORITY DATE:

PROJECT: PROPOSED SELF-STORAGE FACILITY
300 HARTFORD AVENUE
BELLINGHAM, MA

APPLICANT: JMRD2, LLC
665 CHURCH STREET
WHITINSVILLE, MA 01588

REVISIONS		
NO.	DATE	DESCRIPTION
1	3/26/18	PROVIDED SEPARATE EGRESS PER TOWN
2	6/5/18	PER TOWN & PEER REVIEW COMMENTS
3	6/22/18	PER TOWN & PEER REVIEW COMMENTS

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DRAWN BY TRB, SJO

CHECKED BY BJA, RMM

DATE FEBRUARY 12, 2018

PROJECT NO. 2017-235

P.E.

P.L.S.

SHEET TITLE

COVER SHEET

DRAWING NO.

C-0.0

PLAN NO. L-5443

GENERAL NOTES

PART 1 – TOPOGRAPHIC AND PROPERTY LINE INFORMATION

A. NOTICE TO CONTRACTOR: THE CONTRACTOR IS SPECIFICALLY CAUTIONED THAT THE LOCATION AND/OR ELEVATION OF EXISTING UTILITIES AND STRUCTURES AS SHOWN ON THESE PLANS IS BASED ON RECORDS OF VARIOUS UTILITY COMPANIES AND WHERE POSSIBLE, MEASUREMENTS TAKEN IN THE FIELD. THIS INFORMATION IS NOT TO BE RELED ON AS BEING EXACT OR COMPLETE. THE UNDERGROUND UTILITIES AND STRUCTURES SHALL BE VERIFIED IN THE FIELD BY THE CONTRACTOR PRIOR TO THE START OF CONSTRUCTION. THE CONTRACTOR MUST CONTACT THE APPROPRIATE UTILITY COMPANY, ANY GOVERNING PERMITTING AUTHORITY, AND "DISCOVER" AT LEAST 72 HOURS PRIOR TO ANY EXCAVATION WORK TO REQUEST EXACT FIELD LOCATION OF UTILITIES. THE ENGINEER SHALL BE NOTIFIED IN WRITING OF ANY UTILITIES INTERFERING WITH THE PROPOSED CONSTRUCTION AND APPROPRIATE REMEDIAL ACTION SHALL BE TAKEN BEFORE PROCEEDING WITH THE WORK. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO RELOCATE ALL EXISTING UTILITIES WHICH CONFLICT WITH THE PROPOSED IMPROVEMENTS SHOWN ON THE PLAN.

B. PROPERTY LINE AND TOPOGRAPHY:

- EXISTING PROPERTY BOUNDARY INFORMATION BASED UPON AN ON THE GROUND SURVEY PERFORMED BY ANDREWS SURVEY & ENGINEERING, INC.
- EXISTING TOPOGRAPHIC INFORMATION BASED UPON AN ON THE GROUND SURVEY PERFORMED BY ANDREWS SURVEY & ENGINEERING, INC.

C. WETLAND DELINEATION BY ENVIRONMENTAL CONSULTING & RESTORATION, LLC ON AUGUST 30, 2017.

D. DATUM: BELLINGHAM SEWER DATUM

E. COORDINATE SYSTEM: ASSUMED

F. CONSTRUCTION STAKING CONTROL: THE CONTRACTOR SHALL BE RESPONSIBLE FOR ESTABLISHING AND MAINTAINING ALL CONTROL POINTS AND BENCH MARKS NECESSARY TO PERFORM THE WORK.

G. FLOODPLAIN: NO WORK IS BEING PROPOSED IN A FLOOD HAZARD AREA OR 100-YEAR FLOODPLAIN ACCORDING TO THE MOST RECENT FLOOD INSURANCE RATE MAPS FOR BELLINGHAM. H. GAS PIPELINE MARKED IN FIELD BY SPECTRA ENERGY IN JANUARY OF 2018.

PART 2 – EXECUTION

2.1 DEMOLITION, SEDIMENTATION, AND EROSION CONTROL

A. THE FIRST STAGE INVOLVES ACTIVITIES NEEDED TO ADDRESS STORMWATER MANAGEMENT, EXCAVATING MATERIAL DESIGNATED FOR OFF-SITE REMOVAL OR ON-SITE RELOCATION AND FENCING SELECTED AREAS. STAGE ONE WILL PREPARE SITE FOR CONVENTIONAL CONSTRUCTION. B. THE SECOND STAGE WILL CONSIST OF ROUTINE CONSTRUCTION INVOLVING BUILDING, PAVING, LANDSCAPING, AND UTILITIES.

C. THERE ARE GENERAL PHASES OF CONSTRUCTION. IN EACH PHASE OF CONSTRUCTION, IMPLEMENT STANDARD EROSION AND SEDIMENT CONTROL PRACTICES PRIOR TO INITIATING EARTH DISTURBING ACTIVITIES, AND MAINTAIN THESE PRACTICES THROUGHOUT THE COURSE OF CONSTRUCTION.

D. DURING DEMOLITION, EXCAVATIONS AS MUCH AS 20 FEET MAY BE REQUIRED FOR THE INSTALLATION OF FOUNDATIONS, RETAINING WALLS, AND UTILITIES. EXCAVATIONS SHALL BE CUT TO A STABLE SLOPE OR BE TEMPORARILY BRACED. DEPENDING ON THE EXCAVATION DEPTH AND THE ENCOUNTERED SUBSURFACE CONDITIONS, THE CONTRACTOR MAY BE REQUIRED TO SUBMIT EXCAVATION AND SLOPE STABILIZATION METHODS PRIOR TO THE START OF CONSTRUCTION TO THE ENGINEER FOR REVIEW.

E. BASED ON THE COMPOSITION OF SOILS ENCOUNTERED DURING THE EXPLORATION PROGRAM, SITE SOILS ARE GENERALLY CLASSIFIED AS TYPES B AND C SOILS AS DEFINED BY (USGS) NATIONAL RESOURCES CONSERVATION SERVICE (NRCS), FORMERLY SOIL CONSERVATION SURVEY (SCS). TEMPORARY CONSTRUCTION SLOPES SHOULD BE DESIGNED IN STRICT COMPLIANCE WITH THE MOST RECENT GOVERNING REGULATIONS. STOCKPILES SHOULD BE PLACED WELL AWAY FROM THE EDGE OF THE EXCAVATION AND THEIR HEIGHT SHOULD BE CONTROLLED TO PREVENT SURCHARGE TO THE SIDES OF THE EXCAVATION. SURFACE DRAINAGE SHOULD BE CONTROLLED TO AVOID FLOW OF SURFACE WATER INTO THE EXCAVATIONS.

F. CONSTRUCTION SLOPES SHOULD BE REVIEWED FOR MASS MOVEMENT, IF POTENTIAL STABILITY PROBLEMS ARE OBSERVED, WORK SHOULD CEASE AND A GEOTECHNICAL ENGINEER SHOULD BE CONTACTED IMMEDIATELY. THE RESPONSIBILITY FOR EXCAVATION SAFETY AND STABILITY OF TEMPORARY CONSTRUCTION SLOPES SHOULD LIE SOLELY WITH THE CONTRACTOR.

2.2 – TYPICAL PRACTICES TO BE APPLIED TO THE SITE INCLUDE THE FOLLOWING:

A. PRIOR TO EARTH DISTURBANCE IN ANY WORK AREA, INSTALL EROSION CONTROL BARRIERS BETWEEN THE WORK AREA AND THE SURFACE WATER RESOURCE TO WHICH IT DRAINS.

B. DISCHARGE WATER FROM DEWATERING OPERATIONS TO A TEMPORARY SILTATION TRAP OR SEDIMENTATION BASIN.

C. PROVIDE TEMPORARY BERMS AND SWALES TO DIVERT SURFACE WATER AWAY FROM THE AREAS THAT WILL BE EXPOSED BY CONSTRUCTION ACTIVITY TO MINIMIZE THE AMOUNT OF SURFACE WATER COMING INTO CONTACT WITH EXPOSED SOILS. PROVIDE STABLE OUTLETS FOR THESE DEVICES, AND LINE OR VEGETATE THESE DIVERSIONS TO PROVIDE FOR THEIR STABILITY DURING CONSTRUCTION.

D. LIMIT THE EXTENT OF EXPOSED SOILS TO AREAS THAT CAN BE WORKED AND RESTABILIZED WITHIN THE CONSTRUCTION SEASON AND DURING THE SPECIFIC CONSTRUCTION PHASE.

E. WHEN EARTHWORK CONSTRUCTION ACTIVITY IN AN AREA IS COMPLETE, STABILIZE THE AREA WITH A SUITABLE SURFACE AS DESCRIBED BELOW.

F. IN ADDITION TO THESE PRACTICES, FOLLOW THE SPECIAL PRACTICES DESCRIBED BELOW. COMPLY WITH THE DIRECTIONS OF THE APPLICANT'S REPRESENTATIVE TO ADDRESS EROSION AND SEDIMENTATION CONDITIONS THAT MAY ARISE ON A CASE BY CASE BASIS DURING CONSTRUCTION.

G. THE FOLLOWING IS A DESCRIPTION OF MINIMUM CONSTRUCTION REQUIREMENTS AND DOES NOT RELIEVE THE CONTRACTOR OF HIS RESPONSIBILITIES WITH REGARD TO DETERMINING THE ADEQUACY OF MEANS AND METHODS OF CONSTRUCTION.

2.3 – CONSTRUCTION SEQUENCING

A. SEQUENCING SHALL BE AS SHOWN ON THE PLAN AND AS DICTATED BY THE REQUIREMENTS OF CONSTRUCTION. SEE SHEET C-8.2 FOR DETAILED CONSTRUCTION SEQUENCING.

2.4 – MAINTENANCE

A. DURING THE PERIOD OF CONSTRUCTION AND/OR UNTIL LONG TERM VEGETATION IS ESTABLISHED:

B. SEEDED AREAS WILL BE FERTILIZED AND RESEEDD AS NECESSARY TO INSURE VEGETATION ESTABLISHMENT.

C. TEMPORARY SEDIMENTATION BASINS WILL BE CHECKED AFTER EACH SIGNIFICANT RAINFALL AND CLEANED AS NEEDED TO RETAIN STORAGE CAPACITY.

D. TEMPORARY DRAINAGE SWALES WILL BE CHECKED WEEKLY AND REPAIRED WHEN NECESSARY.

E. THE EROSION CONTROL BARRIERS AND OTHER EROSION AND SEDIMENT CONTROL MEASURES/DEVICES SHALL BE INSPECTED, CLEANED, REPLACED AND/OR REPAIRED AS NECESSARY, PERIODICALLY AND AFTER EACH SIGNIFICANT RAINFALL.

F. SWEEP ON-SITE PAVED AREAS AND OFF-SITE STREETS AS NECESSARY TO PREVENT SILT AND DEBRIS ORIGINATING ON-SITE FROM ENTERING CLOSED DRAINAGE SYSTEMS AND/OR ENVIRONMENTALLY SENSITIVE AREAS. WHEN NECESSARY UTILIZE WATER SPRAYING, SURFACE ROUGHENING AND/OR APPLY POLYMERS, SPRAY-ON TACKIFIERS, CHLORIDES AND BARRIERS FOR DUST CONTROL.

2.5 – GENERAL

A. ALL EROSION AND SEDIMENTATION CONTROL MEASURES SHALL BE CONSTRUCTED IN ACCORDANCE WITH (USDA) NATURAL RESOURCES CONSERVATION SERVICE (NRCS, FORMERLY SCS) GUIDELINES AND ALL LOCAL, COUNTY AND MUNICIPAL REGULATIONS.

B. EROSION AND SEDIMENTATION CONTROL MEASURES SHALL BE IN PLACE PRIOR TO THE COMMENCEMENT OF ANY SITE WORK OR EARTHWORK OPERATIONS, SHALL BE MAINTAINED DURING CONSTRUCTION, AND SHALL REMAIN IN PLACE UNTIL ALL SITE WORK IS COMPLETE AND GROUNDCOVER IS ESTABLISHED.

C. ALL WORK SHALL BE IN ACCORDANCE WITH THE PERMITS AND APPROVALS ISSUED AND THE CONSTRUCTION SPECIFICATIONS. PRIOR TO ANY BLASTING, THE CONTRACTOR SHALL CONDUCT A PRE-BLAST SURVEY OF ALL DWELLINGS WITHIN THREE HUNDRED (300') FEET OF THE SITE.

D. STOCKPILES SHALL BE SURROUNDED ON THEIR PERIMETERS WITH STACKED HAYBALES AND/OR SILTATION FENCES TO PREVENT AND/OR CONTROL SILTATION AND EROSION.

E. TOPS OF STOCKPILES SHALL BE COVERED IN SUCH A MANNER THAT STORMWATER DOES NOT INFILTRATE THE MATERIALS AND THEREBY RENDER THE SAME UNSUITABLE FOR FILL USE.

F. ALL DISTURBED OR EXPOSED AREAS SHALL BE PERMANENTLY STABILIZED WITHIN FIVE (5) BUSINESS DAYS OF COMPLETION OF CONSTRUCTION OF A GIVEN AREA. EXPOSED AREAS WHERE NO WORK HAS OCCURRED FOR FOURTEEN (14) DAYS SHALL BE TEMPORARILY STABILIZED WITH HYDROSEED OR OTHER APPROVED METHOD.

PART 2 – CONTINUED

G. THE LOCATION OF TEMPORARY DRAINAGE SWALES AND SEDIMENTATION TRAPS ARE APPROXIMATE ONLY AND SHALL BE RELOCATED AS REQUIRED AS CONSTRUCTION PROGRESSES.

H. EROSION AND SEDIMENTATION CONTROL MEASURES SHALL BE IN PLACE PRIOR TO THE COMMENCEMENT OF ANY SITE WORK OR EARTHWORK OPERATIONS, SHALL BE MAINTAINED DURING CONSTRUCTION, AND SHALL REMAIN IN PLACE UNTIL ALL SITE WORK IS COMPLETE AND GROUNDCOVER IS ESTABLISHED.

I. HAYBALE DIKES SHALL BE CONSTRUCTED AT ALL EXISTING & PROPOSED CATCH BASINS LOCATED IN FILL AREAS & SUBJECT TO STORMWATER RUN-OFF FROM PROPOSED FILL AREAS DURING CONSTRUCTION, OR AS DIRECTED BY THE OWNER'S REPRESENTATIVE. NO SEDIMENTS SHALL ENTER THE ON-SITE OR OFF-SITE DRAINAGE SYSTEMS AT ANY TIME.

J. CULVERT/PIPE INLETS AND OUTFALLS SHALL BE PROTECTED BY HAYBALE FILTERS UNTIL DISTURBED AREAS ARE PERMANENTLY STABILIZED.

K. EROSION CONTROLS SHALL BE PERIODICALLY INSPECTED AND REPLACED AS REQUIRED.

L. ALL PROPOSED NON-RIPRAP SLOPES STEEPER THAN 3:1 SHALL BE STABILIZED WITH EXCelsior BLANKETS AND PROTECTED FROM EROSION.

M. THE CONTRACTOR SHALL KEEP ON SITE AT ALL TIMES ADDITIONAL HAYBALES AND EXTRA SILTATION FENCING FOR INSTALLATION AT THE DIRECTION OF THE OWNER'S REPRESENTATIVE OR LOCAL OFFICIALS TO MITIGATE ANY EMERGENCY CONDITION.

N. DISPOSAL OF ALL DEMOLISHED MATERIALS IS THE RESPONSIBILITY OF THE CONTRACTOR AND MUST BE HAULED OFF-SITE IN ACCORDANCE WITH ALL FEDERAL, STATE, AND LOCAL MUNICIPAL REQUIREMENTS.

O. HE CONTRACTOR SHALL PROTECT AND/OR CAP OFF ALL EXISTING ON-SITE UTILITY SERVICES DESIGNATED AS SUCH ON THESE DRAWINGS.

P. HE LIMIT OF WORK LINE FOR THE AREA TO BE CLEARED AND GRUBBED SHALL BE THE SAME AS THE LIMIT OF WORK LINE NECESSARY FOR GRADING PURPOSES, (I.E., THE GRADING LIMITS AROUND THE PERIMETER OF THE PROJECT AREA).

Q. HE AREA OR AREAS OF ENTRANCE AND EXIT TO AND FROM THE SITE SHALL BE MAINTAINED IN A CONDITION WHICH WILL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO PUBLIC RIGHTS-OF-WAY. ALL SEDIMENT SPILLED, DROPPED, WASHED OR TRACKED ONTO PUBLIC RIGHT-OF-WAY MUST BE REMOVED IMMEDIATELY.

R. FOLLOWING THE ADDITION OF A BINDER COURSE, THE CONTRACTOR SHALL SWEEP ALL ON-SITE PAVEMENT, IF NECESSARY, UNTIL ALL SITE CONSTRUCTION IS COMPLETED.

S. E MATERIALS AND METHODS USED IN THE CONSTRUCTION OF ROADWAYS SHALL CONFORM TO THE REQUIREMENTS OF "TOWN OF BELLINGHAM SUBDIVISION REGULATIONS". WHEN NO TOWN SPECIFICATION IS PROVIDED, THE MATERIALS AND METHODS USED IN THE CONSTRUCTION OF ROADWAYS SHALL CONFORM TO THE REQUIREMENTS OF "THE COMMONWEALTH OF MASSACHUSETTS, DEPARTMENT OF PUBLIC WORKS, STANDARDS & SPECIFICATIONS FOR HIGHWAYS & BRIDGES," LATEST EDITION.

T. FOUNDATION DRAINS SHALL BE PROVIDED AND SHALL DISCHARGE BY GRAVITY OR MECHANICAL MEANS INTO AN APPROVED DRAINAGE SYSTEM THAT COMPLIES WITH THE INTERNATIONAL PLUMBING CODE.

PART 3 – STORM DRAINS

A. STORM DRAIN PIPING (INDICATED BY LETTER "D") SHALL BE CORRUGATED POLYETHYLENE PIPE (HDPE) AS INDICATED, PER AASHTO M284 AND M252 MANUFACTURED WITH HIGH DENSITY POLYETHYLENE PLASTIC. HDPE SHALL BE ADS N-12 PIPE AS MANUFACTURED BY ADVANCED DRAINAGE SYSTEMS, INC. OR HANCOCK H Q PIPE AS MANUFACTURED BY HANCOCK, INC. OR APPROVED EQUAL.

B. STORM DRAIN MANHOLES (INDICATED BY LETTERS "DMH") SHALL BE PRECAST 4', 5' OR 6' DIAMETER CONCRETE PER ASTM C478 (AS CALLED FOR ON DRAWINGS OR FIELD CONDITIONS REQUIRE) WITH RUBBER GASKET JOINTS CONFORMING TO ASTM C443. PIPE TO MANHOLE CONNECTIONS SHALL BE MORTARED PIPE OPENINGS.

C. CATCH BASINS (INDICATED BY LETTERS "CB") SHALL BE PRECAST 5' DIAMETER CONCRETE PER ASTM C478 (ALTERNATE TOP SLAB WHERE NECESSARY) AND RUBBER GASKET JOINTS CONFORMING TO ASTM C443, WITH 4 FOOT SUMPS AND GAS TRAP OUTLET ELBOW. PIPE TO STRUCTURE CONNECTIONS SHALL BE MORTARED PIPE OPENINGS.

D. COORDINATES OF MANHOLES REFER TO CENTERS OF STRUCTURES AND CATCH BASINS REFER TO THE CENTER BACK OF THE FRAME AND GRATE.

E. FLARED END SECTIONS (FES) SHALL BE CORRUGATED POLYETHYLENE PIPE AS INDICATED, MANUFACTURED WITH HIGH DENSITY POLYETHYLENE PLASTIC. ADS N-12 OR APPROVED EQUAL.

PART 4 – UTILITIES

4.1 – WATER DISTRIBUTION AND FIRE PROTECTION

A. WATER MAINS 3" DIA. AND LARGER SHALL HAVE 5'-0" MINIMUM COVER AND SHALL BE CEMENT LINED DUCTILE IRON (CLDI), CLASS 52 MINIMUM, CONFORMING TO AMERICAN NATIONAL STANDARDS INSTITUTE (ANSI) A21.50, A21.4 AND A21.51. JOINTS AT FITTINGS, VALVES AND HYDRANT LATERALS SHALL BE MECHANICAL JOINT PER ANSI A21.11, WITH GASKETS. JOINTS AT OTHER LOCATIONS SHALL BE PUSH-ON TYPE WITH GASKETS PER ANSI A21.11. ALL FITTINGS, VALVES, HYDRANTS AND CAPS SHALL BE CLASS 350 PROVIDED WITH THRUST RESTRAINTS (THRUST BLOCKS AND RETAINING ROOFS) IN CONFORMANCE WITH THE DETAILS.

B. GENERALLY, WATER MAIN FITTINGS IDENTIFIED ON THIS DRAWING ARE SHOWN FOR INSTALLATION LOCATION PURPOSES. THE CONTRACTOR IS ADVISED THAT NOT ALL FITTINGS AND SUPPLY LINES ARE NOTED, SHOWN, OR INDICATED.

C. ALL HYDRANTS SHALL BE INSTALLED WITH A 6" CLDI LATERAL AND SHALL BE INSTALLED WITH AN ACCORDANCE WITH ALL LOCAL MUNICIPAL STANDARDS.

D. ALL WATER MAIN APPURTENANCES, MATERIALS, AND METHODS OF INSTALLATION SHALL MEET OR EXCEED ALL LOCAL MUNICIPAL REQUIREMENTS.

E. PRESSURE AND LEAKAGE TEST, DISINFECTION AND FLUSHING SHALL BE IN ACCORDANCE WITH ALL LOCAL MUNICIPAL STANDARDS AND REQUIREMENTS. CONTRACTOR SHALL BE RESPONSIBLE FOR ALL COSTS IN CONNECTIONS WITH UTILITY TESTS, FLUSHING, AND INSPECTIONS AS REQUIRED BY THE LOCAL MUNICIPALITY.

F. EXISTING SERVICES SHALL BE CUT AND A WATERTIGHT PLUG SHALL BE INSTALLED. EXISTING GATE VALVES TO BE ABANDONED SHALL BE PERMANENTLY CLOSED AND CAPPED, AND WATER SERVICES SHOULD BE SHUT OFF AT THE MAIN CORPORATION.

4.2 – GAS

INSTALLATION OF GAS LINES & EQUIPMENT SHALL BE COORDINATED AND SCHEDULED BY THE CONTRACTOR WITH THE APPROPRIATE GAS COMPANY SERVICING THE PROJECT SITE AND SHALL BE INSTALLED PER THE GAS COMPANY SPECIFICATIONS.

4.3 – UTILITY SEPARATION

A. A MINIMUM 10 FEET CLEAR HORIZONTAL DISTANCE SHALL BE MAINTAINED BETWEEN SANITARY SEWER MAINS AND WATER MAINS. WHENEVER CONDITIONS PREVENT A LATERAL SEPARATION OF 10 FEET, THE WATER MAIN SHALL BE LAID IN A SEPARATE TRENCH AND THE ELEVATION OF THE CROWN OF THE SEWER SHALL BE AT LEAST 18 INCHES BELOW THE INVERT OF THE WATER MAIN.

B. A MINIMUM OF 18" VERTICAL CLEARANCE SHALL BE MAINTAINED WHERE WATER MAINS CROSS STORM DRAIN LINES.

PART 4 – CONTINUED

C. WHERE SANITARY SEWERS CROSS WATER MAINS, THE SEWER SHALL BE LAID AT SUCH AN ELEVATION THAT THE CROWN OF THE SEWER IS AT LEAST TWO FEET BELOW THE INVERT OF THE WATER MAIN. IF THE ELEVATION OF THE SEWER CANNOT BE VARIED TO MEET THIS REQUIREMENT, THE CONTRACTOR SHALL DO THE FOLLOWING:

- THE WATER MAIN SHALL BE RELOCATED TO PROVIDE THIS SEPARATION OR CONSTRUCTED WITH MECHANICAL-JOINT PIPE AT A DISTANCE OF TEN FEET ON EACH SIDE OF THE SEWER. ONE FULL LENGTH OF WATER MAIN SHALL BE CENTERED OVER THE SEWER SO THAT BOTH JOINTS WILL BE AS FAR FROM THE SEWER AS POSSIBLE. IN ADDITION, THE WATER MAIN SHALL BE ENCASED IN CONCRETE, AS PER TOWN OF BELLINGHAM DPW STANDARDS.

D. PRIMARY ELECTRICAL ENCASED CONDUIT MUST BE SEPARATED FROM GAS BY 3' MIN. AND FROM OTHER UTILITIES BY 2' MINIMUM.

E. TELEPHONE AND FIRE ALARM WHICH SHARE THE SAME TRENCH MUST HAVE A 1" VERTICAL SEPARATION.

F. GAS MAINS MUST BE SEPARATED FROM OTHER UTILITIES BY 2' MINIMUM.

4.3 – ELECTRIC AND COMMUNICATIONS

A. INSTALLATION OF COMMUNICATIONS (TELEPHONE, CABLE AND FIRE ALARM) SYSTEMS SHALL BE COORDINATED AND SCHEDULED BY THE CONTRACTOR WITH THE APPROPRIATE UTILITY COMPANY SERVICING THE PROJECT SITE.

B. COORDINATES REFER TO THE CENTER OF STRUCTURES UNLESS OTHERWISE NOTED OR DETAILED. CONTRACTOR SHALL COORDINATE LIGHT BASE LOCATIONS WITH PROPOSED CURBING AND PARKING LOT STRIPING.

C. CONTRACTOR IS RESPONSIBLE FOR VERIFYING ELECTRICAL SERVICE PRIOR TO ORDERING ANY EQUIPMENT.

4.4 – STREET LIGHTING

A. CONTRACTOR SHALL SUPPLY ALL LIGHTING PRODUCTS (OR APPROVED EQUALS) AS SHOWN ON THIS PLAN. ADDITIONAL LIGHTS MAY BE REQUIRED FOR LIGHTING ENTRANCE WAYS, SIGNS OR OTHER OUTDOOR AREAS OF SPECIAL LIGHTING INTEREST. IN NO CASE SHALL THE CONTRACTOR USE LESS LIGHTS THAN SHOWN.

B. ALL LIGHTING PRODUCTS AND ACCESSORIES, INCLUDING POLES AND MOUNTING UNITS, SHALL BE INSTALLED ACCORDING TO MANUFACTURER'S SPECIFICATIONS. ALTERNATIVE PRODUCTS MAY BE USED IN LIGHTING ASSEMBLY AS LONG AS IT IS APPROVED BY THE MANUFACTURER.

C. EACH LIGHTING POLE IS TO BE EQUIPPED WITH LIGHTNING PROTECTION AS ESTABLISHED BY NFPA 780 (NATIONAL FIRE PROTECTION ASSOCIATION).

D. LIGHT TYPES AS INDICATED ON THIS PLAN ARE SUGGESTIONS ONLY. FINAL SELECTION OF LIGHT TYPES AND ASSEMBLIES TO BE DETERMINED AT TIME OF PURCHASE, DEPENDING ON AVAILABILITY. BALLAST WATTAGE, QUANTITY AND POLE HEIGHT ARE NOT TO CHANGE WITHOUT PRIOR APPROVAL OF THE PLANNING BOARD.

PART 5 – PAVEMENT AND CURBING

A. JOINTS BETWEEN NEW BITUMINOUS CONCRETE PAVEMENT AND SAWCUT EXISTING PAVEMENT SHALL BE SEALED WITH BITUMEN AND BACKSANDS.

B. CURBING SHALL BE INSTALLED AS FOLLOWS:

- BITUMINOUS MODIFIED CAPE COD BERM THROUGHOUT THE SELF-STORAGE FACILITY.

C. DIMENSIONS REFER TO FACE OF CURB UNLESS NOTED OTHERWISE.

D. ALL LIMITS OF PAVING SHALL BE CURBED UNLESS NOTED OR DETAILED OTHERWISE.

PART 6 – TRAFFIC CONTROL

A. INCLUDING, BUT NOT LIMITED TO, ALL CROSSWALKS, STOP LINES AND LEGENDS.

- LEGENDS SHALL BE PREFORMED PERMANENT PLASTIC. PAVEMENT MARKINGS SHALL BE THERMO PLASTIC (ALKYD). THE MARKINGS/LEGENDS SHALL BE INSTALLED IN ACCORDANCE WITH THE RELEVANT PORTIONS OF MASSACHUSETTS HIGHWAY DEPARTMENT (MHD) STANDARD SPECIFICATIONS. THE CONTRACTOR'S ATTENTION ALSO IS DIRECTED TO THE STANDARD SPECIFICATIONS, FOR REQUIREMENTS REGARDING THE AMBIENT AIR TEMPERATURE AT THE TIME OF APPLICATION.

PART 7 – QUALITY ASSURANCE

A. COMPLY WITH GOVERNING CODES AND REGULATIONS. PROVIDE PRODUCTS FROM ACCEPTABLE MANUFACTURERS. USE EXPERIENCED INSTALLERS. DELIVER, HANDLE, AND STORE MATERIALS IN ACCORDANCE WITH MANUFACTURER'S INSTRUCTIONS.

B. CONFORM TO CONDITIONS OF APPROVAL ISSUED BY REGULATORY AGENCIES INCLUDING, BUT NOT LIMITED TO, LOCAL PLANNING BOARD, CONSERVATION COMMISSION, CITY COUNCIL, BOARD OF HEALTH, PUBLIC WORKS / HIGHWAY DEPARTMENT, STATE ENVIRONMENTAL PROTECTION DEPARTMENT, AND U.S. GOVERNMENT, ENVIRONMENTAL PROTECTION AGENCY. WHERE CONDITIONS OF REGULATORY APPROVAL DIFFER FROM REQUIREMENTS CONTAINED HEREIN OR ON THE DRAWINGS, COMPLY WITH THE MORE STRINGENT REQUIREMENT.

PART 8 – INSPECTION AND MAINTENANCE

BITUMINOUS CONCRETE

A. INSPECT ALL CATCH BASINS (CB) AND MANHOLES AT LOCATIONS SHOWN ON SUBDIVISION PLANS. LOOK FOR SETTLING OF PAVEMENT, REPAIR AS REQUIRED. LOOK AT LEVEL OF SAND, SILT IN SUMPS. HAVE SUMPS CLEANED IF OUTLET PIPE IS BLOCKED. VERIFY THAT ELBOW (OIL TRAP) ON PIPE OUTLET IS SECURELY IN PLACE. CLEAN ALL LEAVES, TRASH, AND PINE NEEDLES FROM CB GRATE.

B. LOOK FOR SIGNS OF CRACKING & POTHOLES, REPAIR AS REQUIRED.

C. LOOK FOR SIGNS OF EROSION AT EDGES OF ROADWAY. INSPECT FOR BROKEN CURB. SEVERE EROSION MAY BE CAUSED BY PIPE BLOCKAGE AND RESULTING OVERFLOWS OUT OF CATCH BASINS. REMOVE DRAIN MANHOLE COVERS AND CB GRATES IN AREA AND LOOK FOR BLOCKAGES WHERE SURFACE EROSION IS EVIDENT.

LAWS

B. INSPECT AFTER EACH SIGNIFICANT RAINFALL (1/2" OR MORE) FOR FIRST 6 MONTHS AFTER CONSTRUCTION TO ENSURE SURFACE VEGETATION IS HEALTHY. DISCHARGE DEVICES ARE NOT BLOCKED AND BANKS ARE NOT ERODING. CHECK ALL COMPONENTS AFTER EACH MAJOR STORM (MORE THAN 2" RAINFALL IN 24 HOURS). CLEAN/REPAIR AS REQUIRED.

LANDSCAPING

A. INSPECT FOR DISEASED/DYING TREES, SHRUBS, GROUND COVER, & GRASS; REPLACE AS REQUIRED.

B. INSPECT MULCH BEDS. SUPPLEMENT AS REQUIRED TO PROVIDE THE SPECIFIED MINIMUM DEPTH (LOOSE MEASURE).

RIP RAP (STONE) SLOPE PROTECTION

A. INSPECT STONE SLOPE PROTECTION, CUT EMERGING YOUNG TREES GROWING IN STONES. INSPECT STONE AT PIPE OUTLETS. REMOVE DEBRIS. REPAIR AS REQUIRED.

PART 9 – LANDSCAPING

A. ALL SITE INFORMATION REPRESENTED ON THIS PLAN IS ILLUSTRATIVE, AND MUST BE VERIFIED BY THE CONTRACTOR. WRITTEN SPECIFICATIONS SHALL TAKE PRECEDENCE OVER REPRESENTATIONS ON DRAWINGS.

B. IT IS CONTRACTOR'S RESPONSIBILITY TO BECOME APPRISED OF EXISTING CONDITIONS, UNDERGROUND UTILITIES, AND OVERHEAD UTILITIES. COORDINATION WITH ALL RELEVANT COMPANIES OR AGENCIES, INCLUDING PERMITTING, AFFECTED BY THIS CONSTRUCTION IS CONTRACTOR'S RESPONSIBILITY. THE CONTRACTOR IS REQUIRED TO OBTAIN ANY NECESSARY PERMITS REQUIRED FROM LOCAL AUTHORITIES FOR ALL WORK IN THIS CONTRACT.

C. CONTRACTOR SHALL BE RESPONSIBLE FOR ON-SITE SAFETY OF CONSTRUCTION CREW, AND PARTICULARLY OF SAFETY OF PEDESTRIANS DURING PERIOD OF CONSTRUCTION PROJECT.

D. ALL UNUSED MOVEABLE MATERIALS SHALL BE REMOVED FROM THE SITE DAILY, OR STORED IN SUCH A WAY AS TO PRECLUDE LOSS OR VANDALISM. ALL DEBRIS SHALL BE REMOVED, AND ALL WALKS MADE FREE OF OBSTRUCTIONS, AND SITE LEFT IN NEAT, CLEAN CONDITION AT THE CLOSE OF EACH WORK DAY.

E. THE CONTRACTOR SHALL LOCATE AND VERIFY ALL UTILITIES PRIOR TO STARTING WORK. CONTRACTOR TO VERIFY THAT ADEQUATE DRAINAGE EXISTS PRIOR TO PLANTING.

PART 9 – CONTINUED

F. THE CONTRACTOR SHALL SUPPLY ALL PLANT MATERIALS IN QUANTITIES SUFFICIENT TO COMPLETE THE PLANTING SHOWN ON ALL DRAWINGS. PLANT COUNTS ARE FOR CONVENIENCE ONLY. CONTRACTOR SHALL USE SUFFICIENT PLANT MATERIALS TO FULFILL DESIGN INTENT, BUT IN NO CASE SHALL CONTRACTOR USE FEWER PLANTS THAN LISTED.

G. ALL MATERIAL SHALL CONFORM TO THE GUIDELINES ESTABLISHED BY THE "AMERICAN STANDARD FOR NURSERY STOCK", PUBLISHED BY THE AMERICAN ASSOCIATION OF NURSERYMEN.

H. ALL PLANT MATERIALS ARE SUBJECT TO THE APPROVAL OF THE LANDSCAPE ARCHITECT AT THE NURSERY AND AT THE SITE. ALL TREES SHALL HAVE A SINGLE LEADER UNLESS SPECIFIED OTHERWISE. NO UN-APPROVED SUBSTITUTIONS WILL BE ACCEPTED. PLANT SPECIES AND CULTIVAR, SIZE AND QUANTITY SHALL NOT CHANGE WITHOUT APPROVAL OF LANDSCAPE ARCHITECT.

I. ALL PLANTS SHALL BEAR THE SAME RELATIONSHIP TO FINISHED GRADE AS ORIGINAL GRADE BEFORE DIGGING. PLANTS TO BE TRANSPLANTED SHALL BE DUG CAREFULLY, WITH ADEQUATE ROOTBALLS AND PRUNED ACCORDING TO ANA STANDARD PRACTICE. TREES WITH ROOT FLARE COVERED BY MORE THAN 1.5" OF SOIL WILL BE REJECTED PRIOR TO INSTALLATION. SET PLANTS PLUMB.

J. ALL TREES AND SHRUBS SHALL BE BALLED IN BURLAP OR CONTAINERIZED, UNLESS SPECIFIED OTHERWISE. NO ROOT-BOUND CONTAINER GROWN STOCK WILL BE ACCEPTED. ALL PLASTIC ROOT WRAPPING AND METAL WIRE BASKETS SHALL BE CAREFULLY REMOVED AT THE TIME OF PLANTINGS, EXCEPT WIRE THAT IS DIRECTLY UNDER THE ROOTBALLS.

K. CONTRACTOR SHALL PLACE 2" TO 3" OF FINE SHREDDED, AGED 2 YEARS, DARK BROWN PINE BARK MULCH THROUGHOUT THE BED AREAS. DO NOT PLACE MULCH IN CONTACT WITH TREE TRUNK.

L. FLOOD PLANTS THOROUGHLY ONCE IMMEDIATELY AFTER PLANTING AND TWICE DURING THE FIRST TWENTY-FOUR HOUR PERIOD AFTER PLANTING.

M. DO NOT WRAP TRUNK OF TREE.

N. THE CONTRACTOR SHALL MAINTAIN THE PLANTS FOR A MINIMUM OF 60 DAYS FOLLOWING INSTALLATION, OR LONGER IF CONTRACTED BY THE OWNER. BEFORE THE END OF THE 60-DAY PERIOD, THE CONTRACTOR SHALL PROVIDE A WRITTEN MAINTENANCE OUTLINE TO THE OWNERS AND THE CONTRACTOR SHALL BE AVAILABLE TO ANSWER QUESTIONS OR CONCERNS AT THAT TIME.

O. THE CONTRACTOR SHALL GUARANTEE ALL PLANTS FOR A MINIMUM OF ONE YEAR FROM FINAL ACCEPTANCE BY OWNER/REP. THE CONTRACTOR SHALL REPLACE ANY DEAD MATERIALS AT HIS/HER OWN EXPENSE.

LEGEND

STONE BOUND W/D.H. ☐ S.B.
CATCH BASIN ☐
DOUBLE CATCH BASIN ☐
DRAIN MANHOLE ☐ OS
OUTLET STRUCTURE ☐ SMH
SEWER MANHOLE ☐ UP
UTILITY POLE ☐ WF
WETLAND FLAG ☐
PROPOSED WATER GATE VALVE ☐
EXISTING HYDRANT ☐
PROPOSED HYDRANT ☐
EXISTING WELL ☐
CURB ☐
DRAIN LINE ☐
UTILITY LINE ☐ UGU
SEWER LINE ☐ S
WATER LINE ☐ W
GUARDRAIL ☐
STONEWALL ☐
TREE LINE ☐

ABBREVIATIONS

BITUMINOUS BIT.
CONCRETE CONC.
CAPE COD BERM COB
SLOPED GRANITE CURB SGC
PRECAST CONCRETE CURB PCC
TOP CURB TC
BOTTOM CURB BC
ELEVATION ELEV.
EXISTING EXIST.
HIGH DENSITY POLYETHYLENE PIPE HDPE
INVERT INV.
RADIUS R=
HANDICAP HC
NOW OR FORMERLY N/F
PLAN BOOK P.B.
PAGE P.G.
PLAN PL.
TYPICAL TYP.
TEMPORARY BENCHMARK TBM
NOT TO SCALE N.T.S.
SEWAGE DISPOSAL SYSTEM SDS

APPROVED

By Bellingham Planning Board at 12:43 pm, Nov 15, 2018



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Land Surveying - Civil Engineering - Site Planning

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500 East Washington Street
North Attleboro, Massachusetts 02760
P: 508-316-0452 F: 508-316-0963

BELLINGHAM PLANNING BOARD

BEING A MAJORITY

DATE:

PROPOSED SELF-STORAGE FACILITY
300 HARTFORD AVENUE
BELLINGHAM, MA

JMRD2, LLC
665 CHURCH STREET
WHITINSVILLE, MA 01588

PROJECT:

APPLICANT:

REVISIONS

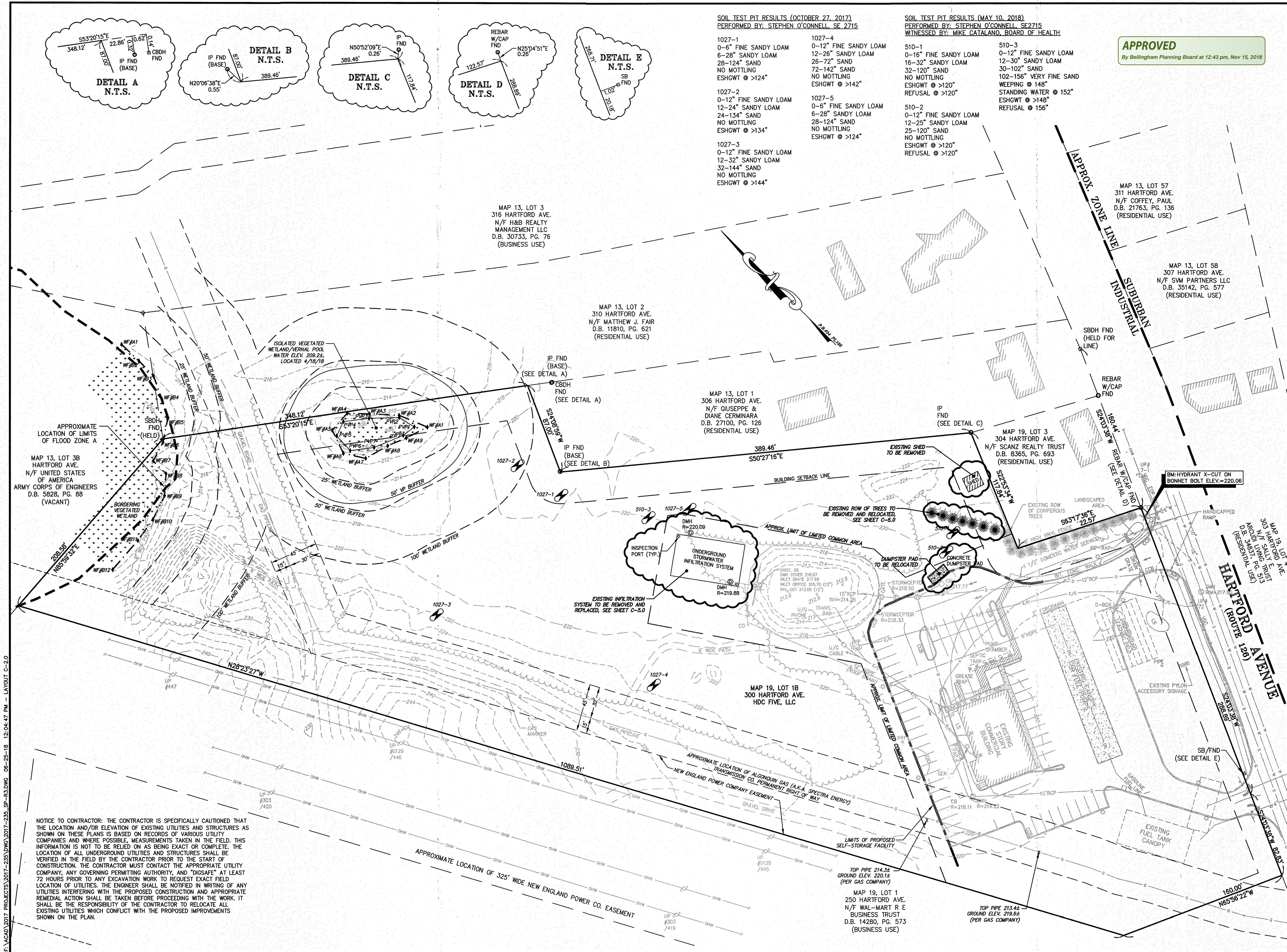
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3	6/22/18	PER TOWN & PEER REVIEW COMMENTS

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DRAWN BY	TRB, SJO
CHECKED BY	BJA, RMM
DATE	FEBRUARY 12, 2018
PROJECT NO.	2017-235

SHEET TITLE

LEGEND,
ABBREVIATIONS

NOTICE TO CONTRACTOR: THE CONTRACTOR IS SPECIFICALLY CAUTIONED THAT THE LOCATION AND/OR ELEVATION OF EXISTING UTILITIES AND STRUCTURES AS SHOWN ON THESE PLANS IS BASED ON RECORDS OF VARIOUS UTILITY COMPANIES AND WHERE POSSIBLE, MEASUREMENTS TAKEN IN THE FIELD. THIS INFORMATION IS NOT TO BE RELIED ON AS BEING EXACT OR COMPLETE. THE LOCATION OF ALL UNDERGROUND UTILITIES AND STRUCTURES SHALL BE VERIFIED IN THE FIELD BY THE CONTRACTOR PRIOR TO THE START OF CONSTRUCTION. THE CONTRACTOR MUST CONTACT THE APPROPRIATE UTILITY COMPANY, ANY GOVERNING PERMITTING AUTHORITY, AND "DIGSAFE" AT LEAST 72 HOURS PRIOR TO ANY EXCAVATION WORK TO REQUEST EXACT FIELD LOCATION OF UTILITIES. THE ENGINEER SHALL BE NOTIFIED IN WRITING OF ANY UTILITIES INTERFERING WITH THE PROPOSED CONSTRUCTION AND APPROPRIATE REMEDIAL ACTION SHALL BE TAKEN BEFORE PROCEEDING WITH THE WORK. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO RELOCATE ALL EXISTING UTILITIES WHICH CONFLICT WITH THE PROPOSED IMPROVEMENTS SHOWN ON THE PLAN.



SOIL TEST PIT RESULTS (OCTOBER 27, 2017)
PERFORMED BY: STEPHEN O'CONNELL, SE 2715

1027-1
0-6" FINE SANDY LOAM
6-28" SANDY LOAM
28-124" SAND
NO MOTTLING
ESHGWT @ >124"

1027-2
0-12" FINE SANDY LOAM
12-24" SANDY LOAM
24-134" SAND
NO MOTTLING
ESHGWT @ >134"

1027-3
0-12" FINE SANDY LOAM
12-32" SANDY LOAM
32-144" SAND
NO MOTTLING
ESHGWT @ >144"

1027-4
0-12" FINE SANDY LOAM
12-26" SANDY LOAM
26-32" SANDY LOAM
32-120" SAND
NO MOTTLING
ESHGWT @ >120"

1027-5
0-6" FINE SANDY LOAM
6-28" SANDY LOAM
28-124" SAND
NO MOTTLING
ESHGWT @ >124"

SOIL TEST PIT RESULTS (MAY 10, 2018)
PERFORMED BY: STEPHEN O'CONNELL, SE 2715
WITNESSED BY: MIKE CATALANO, BOARD OF HEALTH

510-1
0-16" FINE SANDY LOAM
16-32" SANDY LOAM
32-120" SAND
NO MOTTLING
ESHGWT @ >120"

510-2
0-12" FINE SANDY LOAM
12-25" SANDY LOAM
25-120" SAND
NO MOTTLING
ESHGWT @ >120"

510-3
0-12" FINE SANDY LOAM
12-30" SANDY LOAM
30-102" SAND
NO MOTTLING
ESHGWT @ >102"

510-4
0-12" FINE SANDY LOAM
12-30" SANDY LOAM
30-102" SAND
NO MOTTLING
ESHGWT @ >102"

510-5
0-12" FINE SANDY LOAM
12-30" SANDY LOAM
30-102" SAND
NO MOTTLING
ESHGWT @ >102"

510-6
0-12" FINE SANDY LOAM
12-30" SANDY LOAM
30-102" SAND
NO MOTTLING
ESHGWT @ >102"

APPROVED

By Bellingham Planning Board at 12:43 pm, Nov 15, 2018

ASE

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Land Surveying - Civil Engineering - Site Planning

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BELLINGHAM PLANNING BOARD

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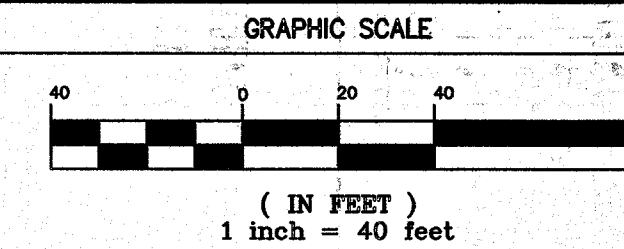
DATE:

PROPOSED SELF-STORAGE FACILITY
300 HARTFORD AVENUE
BELLINGHAM, MA

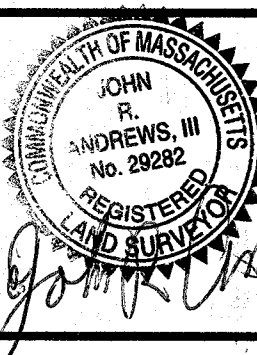
JMRD2, LLC
665 CHURCH STREET
WHITINSVILLE, MA 01588

REVISIONS	
NO.	DESCRIPTION
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2	6/5/18 PER TOWN & PEER REVIEW COMMENTS
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CAD FILE	...dwg\2017-235_SP-R3.dwg
DRAWN BY	TRB, SJO
CHECKED BY	BJA, RMM
DATE	FEBRUARY 12, 2018
PROJECT NO.	2017-235



SHEET TITLE
**EXISTING CONDITIONS
& DEMOLITION PLAN**



DRAWING NO.

C-2.0

PLAN NO. L-5443

ZONING REQUIREMENTS

UNDERLYING ZONE: INDUSTRIAL
MINIMUM AREA: 60,000 S.F.
MINIMUM FRONTAGE: 200'
SETBACKS: FRONT 20', *SIDE 10', REAR 20'
*30' WHERE ADJOINING A RESIDENTIAL USE

MINIMUM LANDSCAPED OPEN SPACE: N/A
MAXIMUM BUILDING HEIGHT: 45 FEET

OVERLAY ZONE: WATER RESOURCE DISTRICT

BUILDING DATA:

FACILITY STORAGE BUILDING AREA: 61,550 S.F.
FACILITY OFFICE BUILDING AREA: 600 S.F.
TOTAL FACILITY BUILDING AREA: 62,150 S.F.

LOT COVERAGE:

TOTAL LOT AREA: 342,861 S.F. / 7.87± ACRES
EXISTING BUILDING AREA: 9,978 S.F.
EXISTING LOT COVERAGE = 2.91%
PROPOSED BUILDING AREA:
62,150 S.F. + 9,978 S.F. (EXIST.) = 72,128 S.F.
PROPOSED LOT COVERAGE = 21.0%

PARKING REQUIRED:

OFFICES REQUIRED: 4 SPACES PER ksf GFA
OFFICE AREA: 600 S.F. / 1,000 ksf = 0.60 X 4 = 2.4
REQUIRED: 3 SPACES

GENERAL LIGHT INDUSTRIAL/WHOLESALE/WAREHOUSE REQUIRED: 2 SPACES PER ksf GFA
WAREHOUSE AREA: 61,550 S.F. / 1,000 ksf = 61.6 X 2 = 123.2
REQUIRED: 124 SPACES

TOTAL REQUIRED: 127 SPACES

PARKING PROVIDED:

STANDARD: 6 SPACES
HANDICAP: 1 SPACE
TOTAL PROVIDED: 7 SPACES

THE PARKING REQUIREMENTS FOR "WAREHOUSE" UNDER THE TOWN OF BELLINGHAM ZONING BYLAW DO NOT APPLY DUE TO THE FUNCTIONALITY AND NATURE OF A SELF-STORAGE FACILITY, THEREFORE PARKING BEYOND WHAT IS REQUIRED FOR THE OFFICE BUILDING IS PROPOSED TO BE AVOIDED.

APPROVED

By Bellingham Planning Board at 12:43 pm, Nov 15, 2018



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BELLINGHAM, MA

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665 CHURCH STREET
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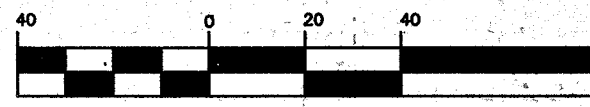
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DRAWN BY	TRB, SJO
CHECKED BY	BJA, RMM
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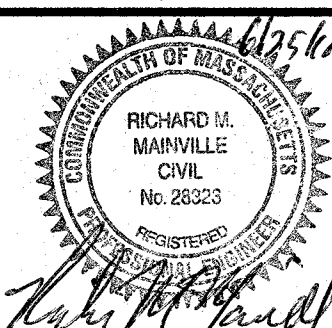
GRAPHIC SCALE



(IN FEET)
1 inch = 40 feet

SHEET TITLE

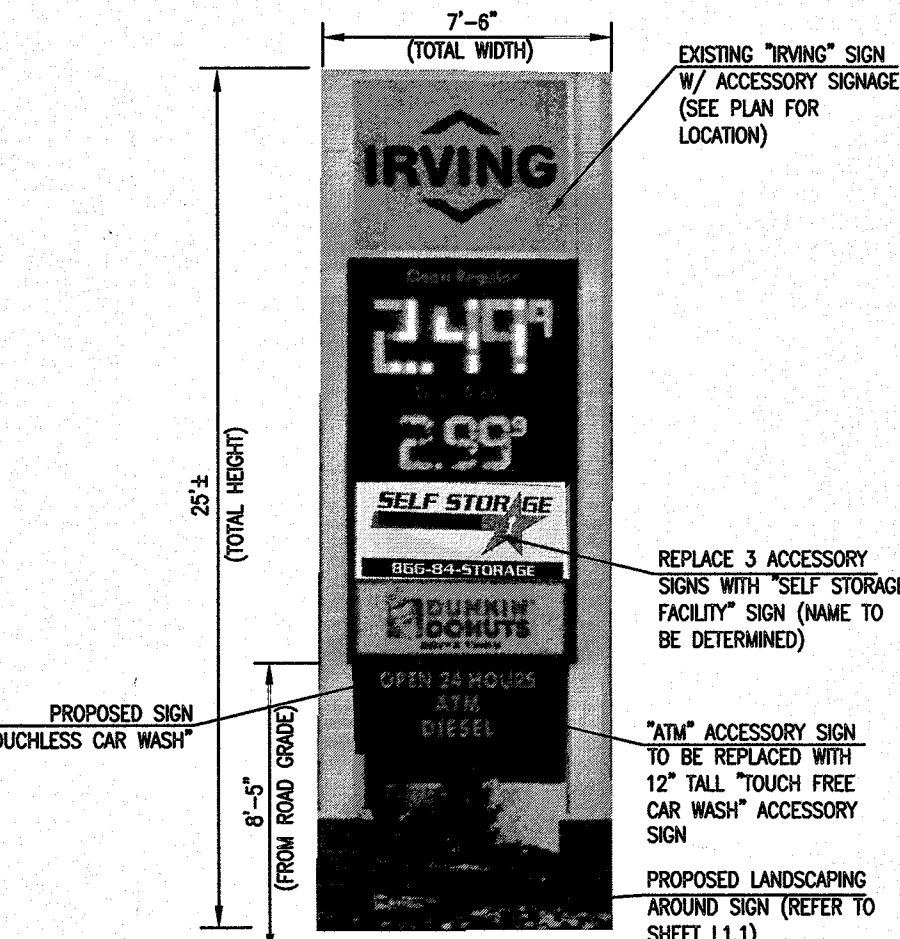
LAYOUT &
MATERIALS PLAN



DRAWING NO.

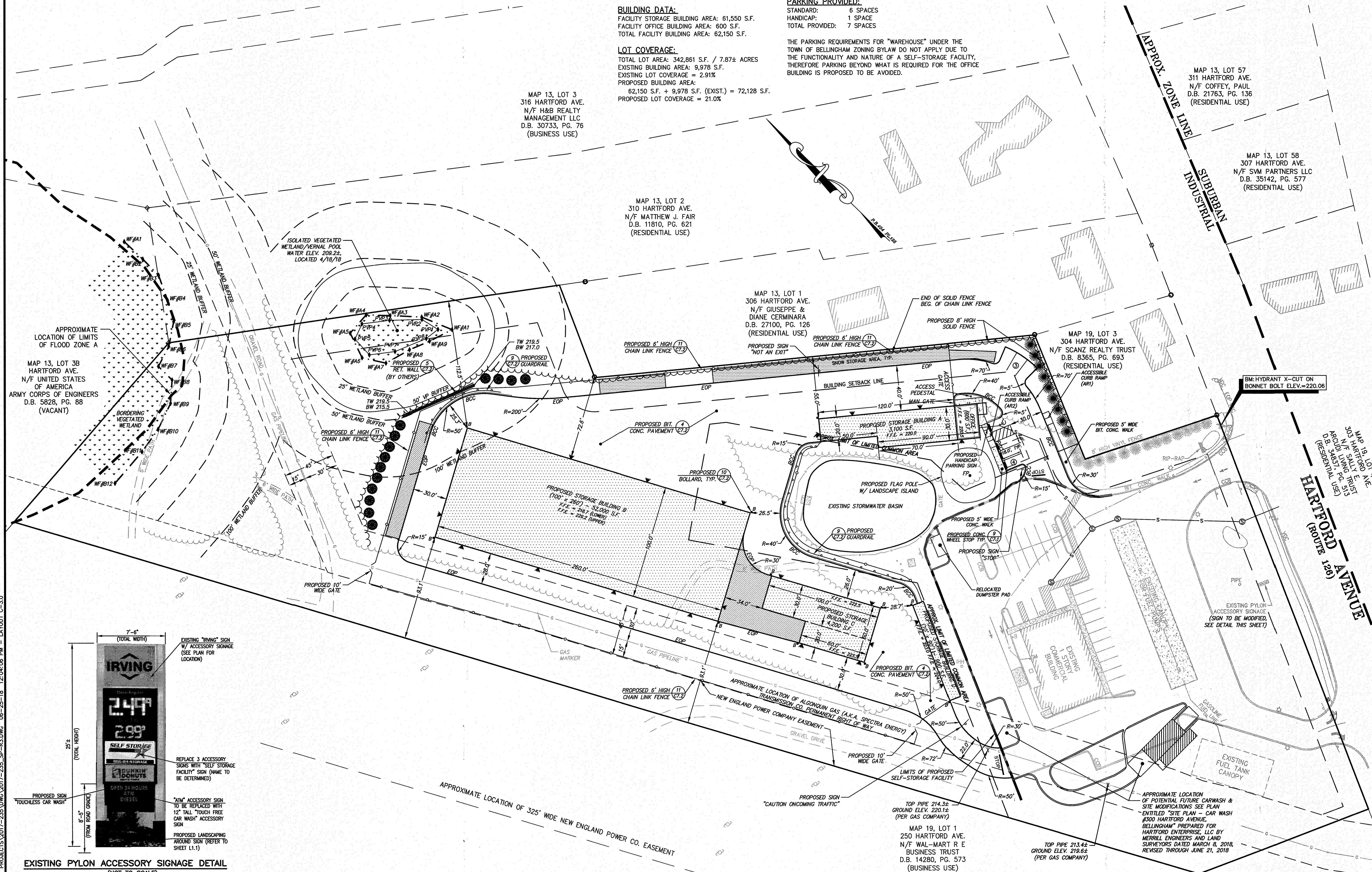
C-3.0

PLAN NO. L-5443



EXISTING PYLON ACCESSORY SIGNAGE DETAIL
(NOT TO SCALE)

NOTES:
1. THE NEW "TOUCH FREE CAR WASH" AND "SELF STORAGE" ACCESSORY SIGNS SHALL NOT BE ILLUMINATED.



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BELLINGHAM PLANNING BOARD

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300 HARTFORD AVENUE
BELLINGHAM, MA

JMRD2, LLC
665 CHURCH STREET
WHITINSVILLE, MA 01588

PROJECT:

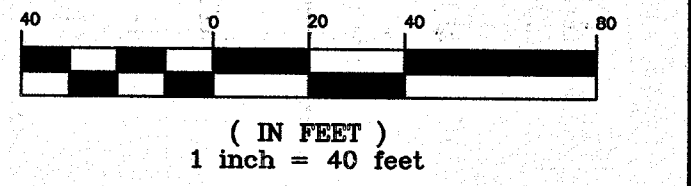
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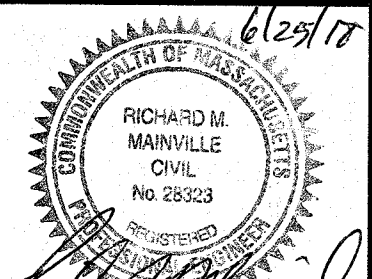
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DATE	FEBRUARY 12, 2018
PROJECT NO.	2017-235

GRAPHIC SCALE



SHEET TITLE

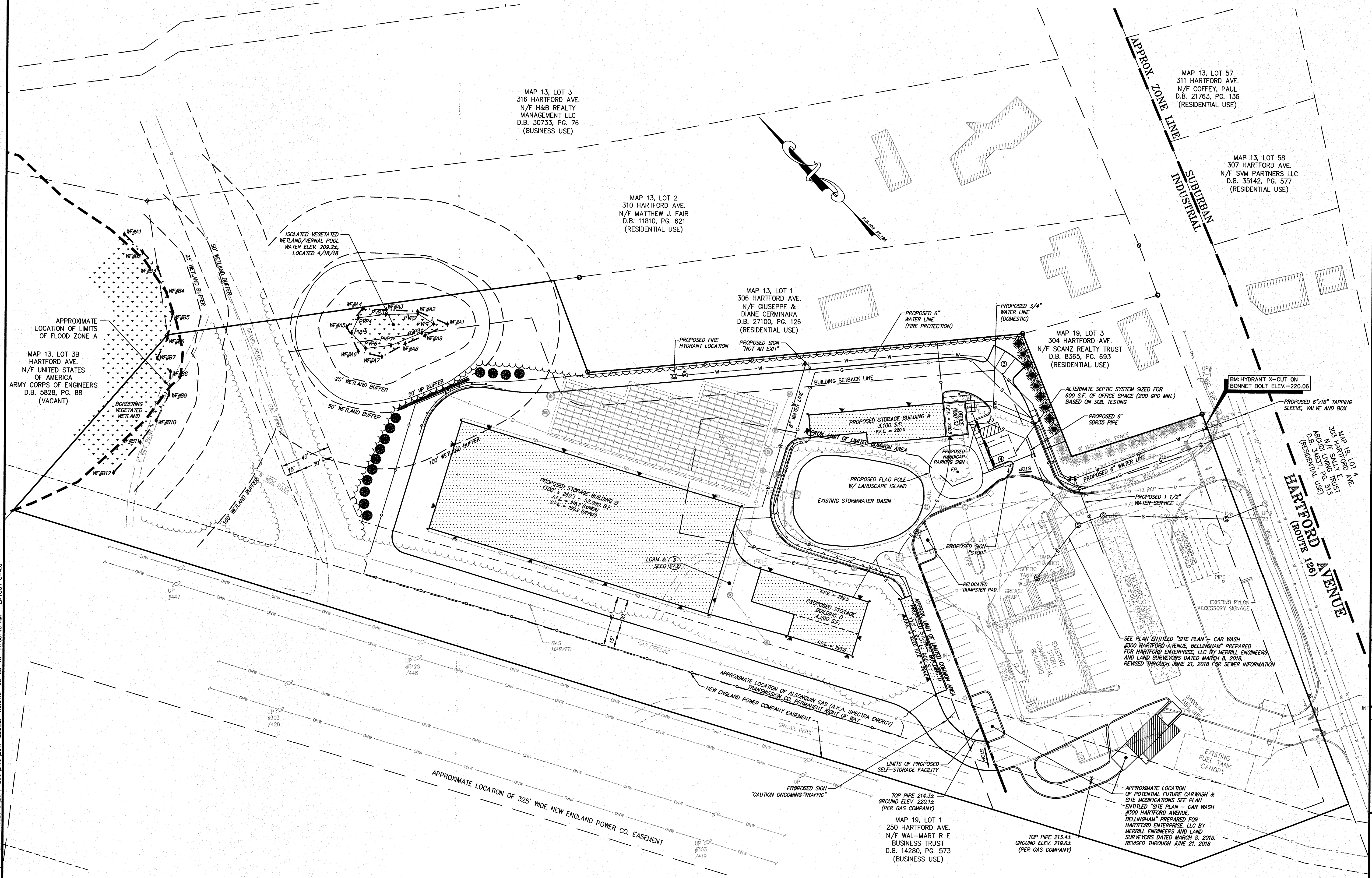
UTILITY PLAN



DRAWING NO.

C-4.0

PLAN NO. L-5443



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DRAIN SCHEDULE

CS1 RIM 218.15 INV. OUT 215.15	DMH1 RIM 217.78 INV. IN 214.35 (ROOF1) INV. IN 214.35 (CB1) INV. OUT 214.25 (HDS2)	HDS1 RIM 218.10 INV. IN 213.80 (DCB2) INV. OUT 212.80 (NF)
DCB2 RIM 217.80 INV. OUT 214.20	DMH2 RIM 226.25 INV. IN 218.85 (CB4) INV. OUT 218.75 (DMH3)	HDS2 RIM 217.56 INV. IN 213.65 (DMH1) INV. IN 213.65 (DMH4) INV. OUT 212.65 (NF)
CB3 RIM 222.15 INV. OUT 216.98	DMH3 RIM 220.00 INV. IN 216.50 (DMH2) INV. IN 216.50 (CB3) INV. OUT 216.40 (DMH4)	
CB4 RIM 223.40 INV. OUT 219.85	DMH4 RIM 217.37 INV. IN 214.35 (DMH3) INV. IN 214.15 (DCB5) INV. OUT 213.90 (HDS2)	
DCB5 RIM 217.25 INV. OUT 214.25		

PIPE SCHEDULE

NAME	SIZE/TYPE	LENGTH	SLOPE
D1	12" HDPE	9.3'	4.30%
D2	12" HDPE	6.8'	4.41%
D3	12" HDPE	31.0'	2.58%
D4	12" HDPE	175.0'	0.05%
D5	12" HDPE	14.3'	4.20%
D6	15" HDPE	4.0'	3.75%
D7	12" HDPE	95.1'	0.50%
D8	12" HDPE	49.0'	2.04%
D9	12" HDPE	53.3'	4.22%
D10	12" HDPE	53.2'	3.85%
D11	12" HDPE	8.3'	1.20%
D12	15" HDPE	11.6'	2.16%
D13	12" HDPE	9.0'	1.11%
D14	12" HDPE	36.3'	0.96%

APPROVED

By Bellingham Planning Board at 12:44 pm, Nov 15, 2018



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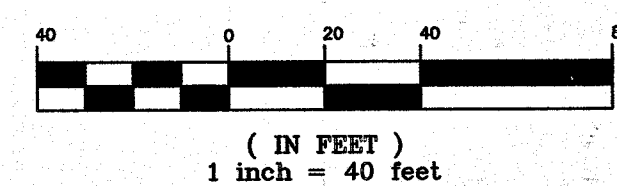
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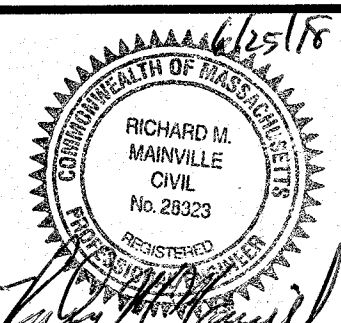
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DATE	FEBRUARY 12, 2018
PROJECT NO.	2017-235

GRAPHIC SCALE



SHEET TITLE

GRADING &
DRAINAGE PLAN



DRAWING NO.

C-5.0

PLAN NO. L-5443

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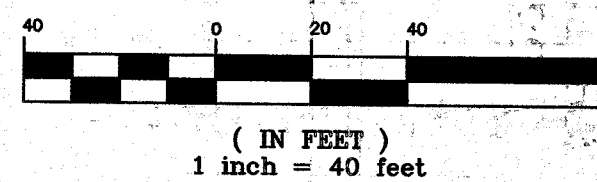
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DATE: FEBRUARY 12, 2018

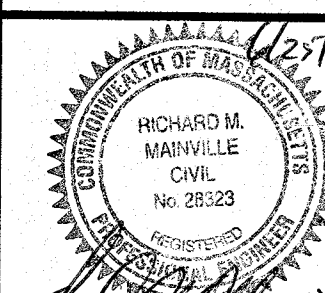
PROJECT NO.: 2017-235

GRAPHIC SCALE



SHEET TITLE

LANDSCAPING &
LIGHTING PLAN



DRAWING NO.

C-6.0

PLAN NO. L-5443

LEGEND:

- 0.1 FOOT CANDLES
- 0.25 FOOT CANDLES
- 0.5 FOOT CANDLES
- 1 FOOT CANDLES
- 2 FOOT CANDLES

MAP 13, LOT 3
316 HARTFORD AVE.
N/F H&B REALTY
MANAGEMENT LLC
D.B. 30733, PG. 76
(BUSINESS USE)

MAP 13, LOT 2
310 HARTFORD AVE.
N/F MATTHEW J. FAIR
D.B. 11810, PG. 621
(RESIDENTIAL USE)

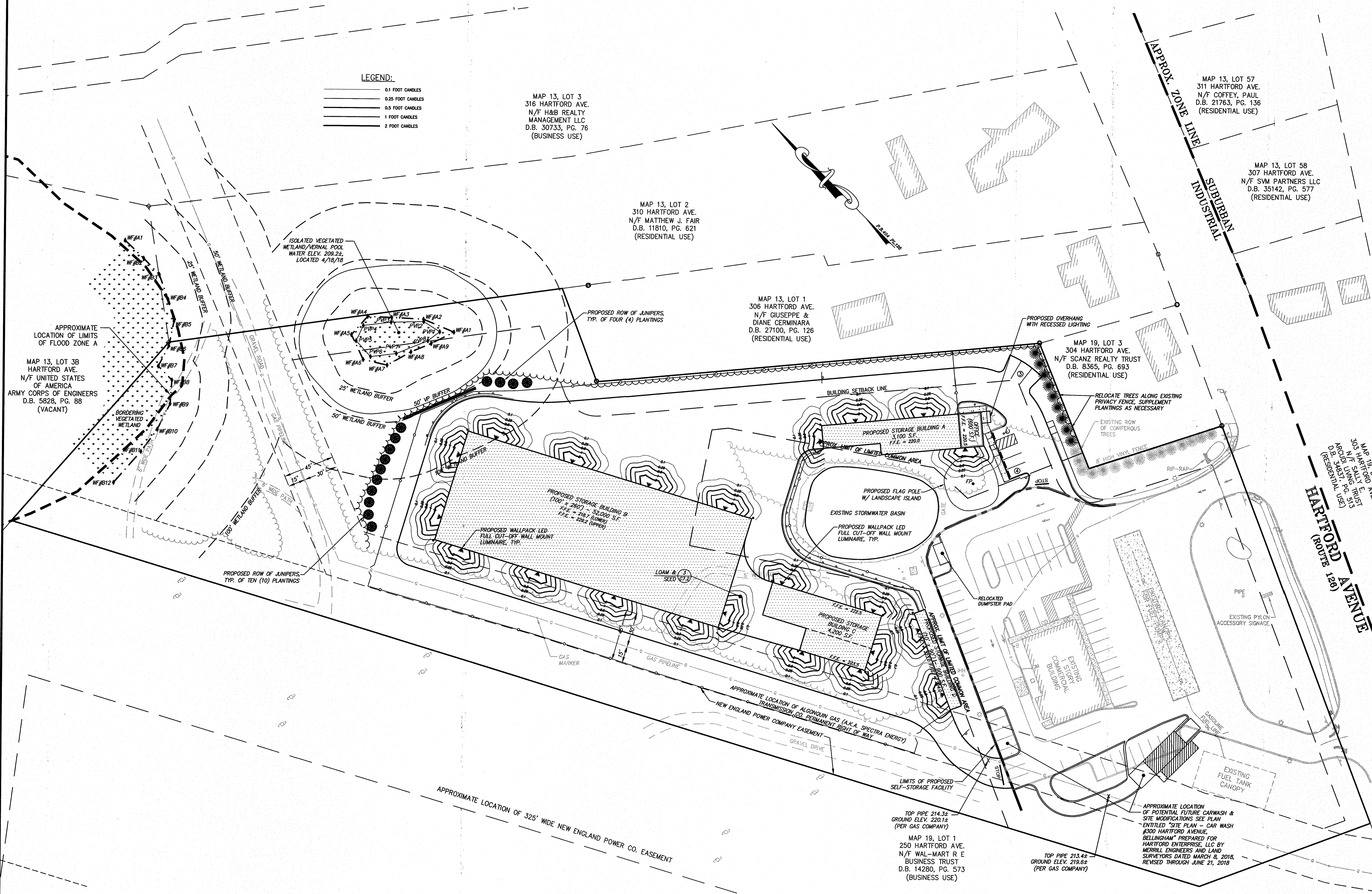
MAP 13, LOT 1
306 HARTFORD AVE.
N/F GIUSEPPE &
DIANE CERMINARA
D.B. 27100, PG. 126
(RESIDENTIAL USE)

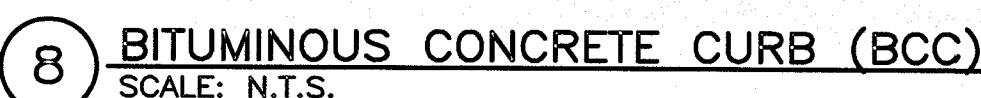
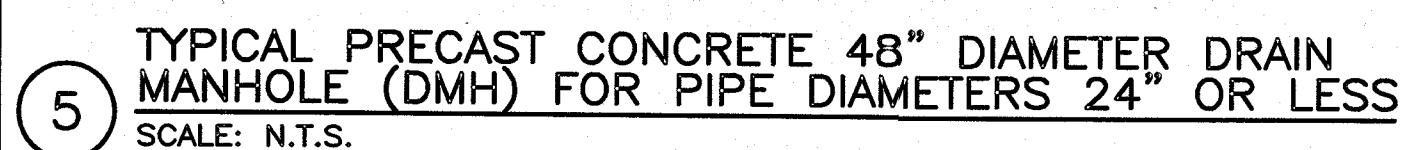
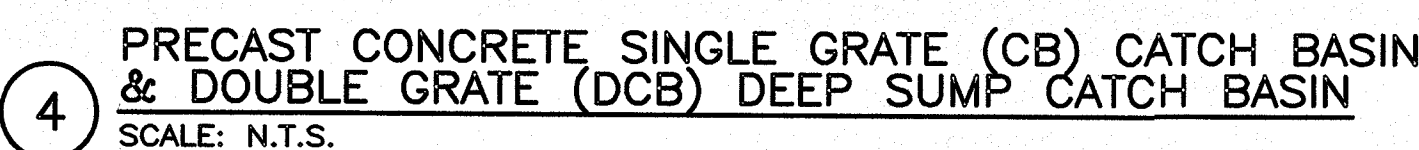
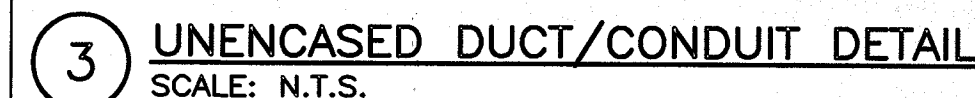
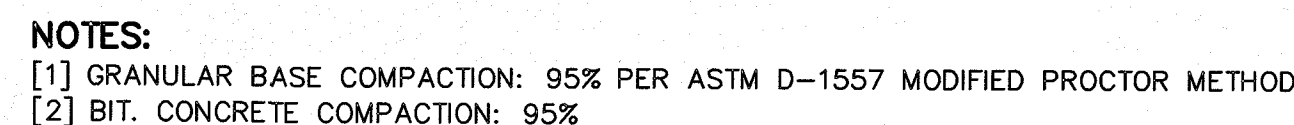
MAP 19, LOT 3
304 HARTFORD AVE.
N/F SCANZ REALTY TRUST
D.B. 8365, PG. 693
(RESIDENTIAL USE)

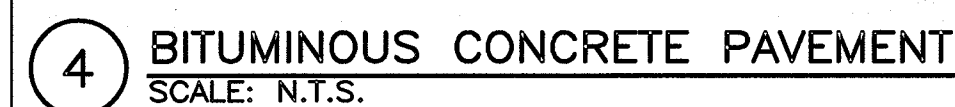
MAP 13, LOT 57
311 HARTFORD AVE.
N/F COFFEY, PAUL
D.B. 21763, PG. 136
(RESIDENTIAL USE)

MAP 13, LOT 58
307 HARTFORD AVE.
N/F SVM PARTNERS LLC
D.B. 35142, PG. 577
(RESIDENTIAL USE)

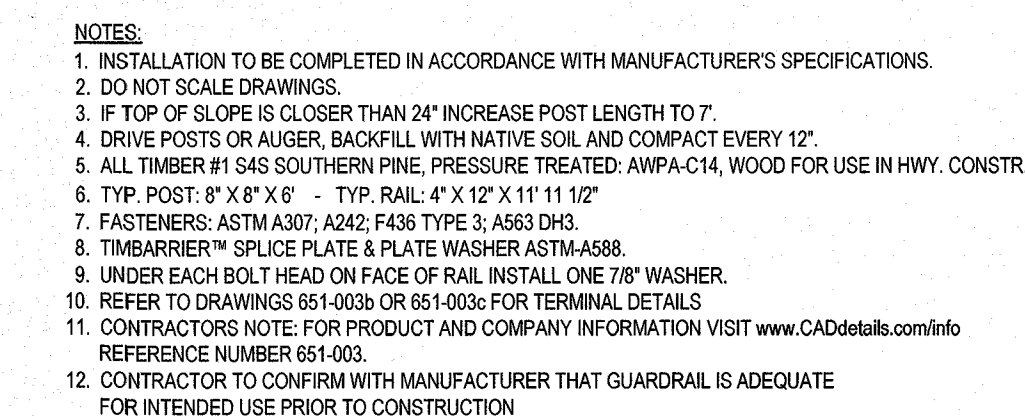
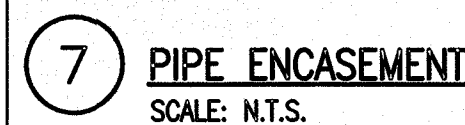
MAP 19, LOT 4
303 HARTFORD AVE.
N/F SAULY TRUST
D.B. 14871, PG. 513
(RESIDENTIAL USE)



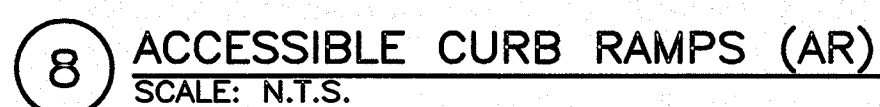




5 TYPICAL SECTION—UNREINFORCED RETAINING WALL
SCALE: N.T.S.



9 "TIMBARRIER" GUARDRAIL
SCALE: N.T.S.



10'-0" MAX.

1-5/8" O.D. TOP RAIL

TIE WIRES @24" O.C.

EXPANSION COUPLING 20" O.C. (TYP.)

FABRIC FASTENED WITH TIE WIRES @ 14" O.C. (TYP.)

2-3/8" O.D. LINE POSTS (TYP.)

9 GAUGE CORE, 2" MESH BLACK VINYL COATED WIRE, ONE WIDTH

STRETCHER BAR BANDS @12" O.C. (TYP.)

STRETCHER BAR (TYP.)

CORNER OR TERMINAL POST. 3" O.D. (MIN.) (TYP.)

TENSION WIRE 7 GAUGE (MIN.)

SLOPE TO DRAIN (TYP.)

EXIST. GRADE (VARIES)

CLEARANCE 2" MIN. 4" MAX.

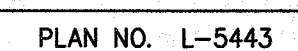
CONCRETE FOOTING, TYP.

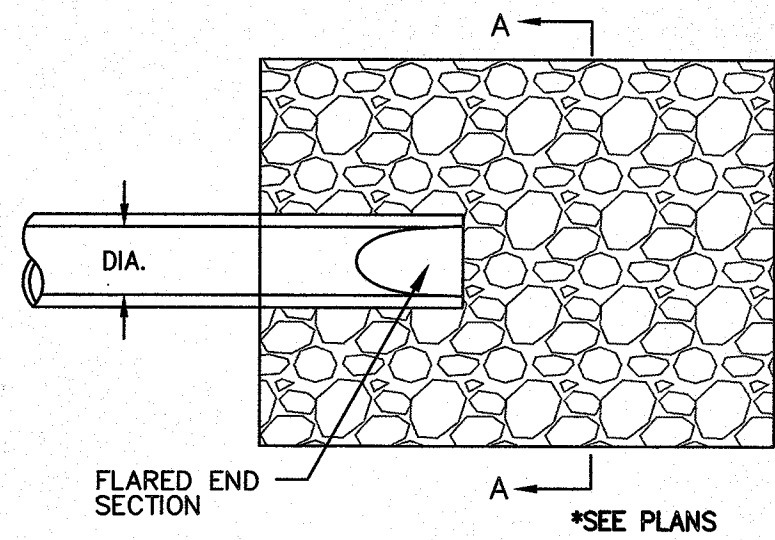
6" (TYP.)

3'-6" (TYP.)

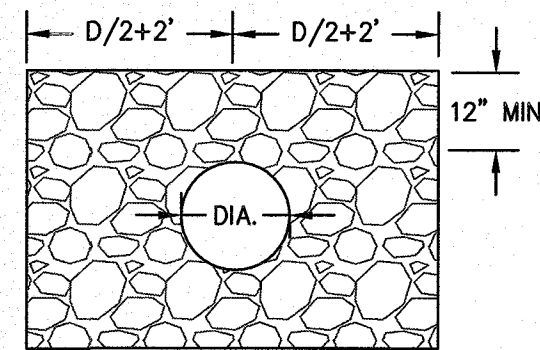
1'-4"

11 CHAIN LINK FENCE (CLF)
SCALE: N.T.S.

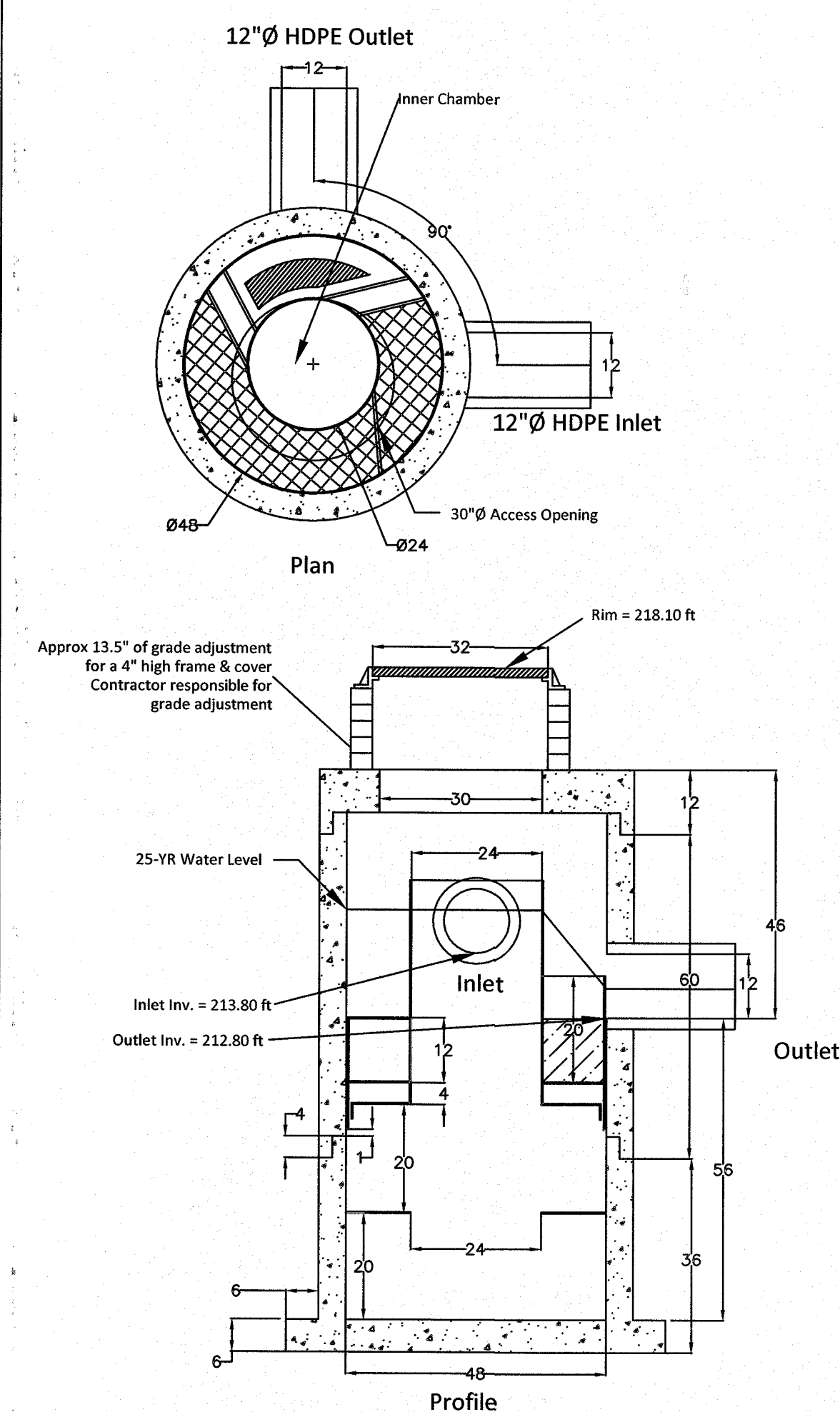




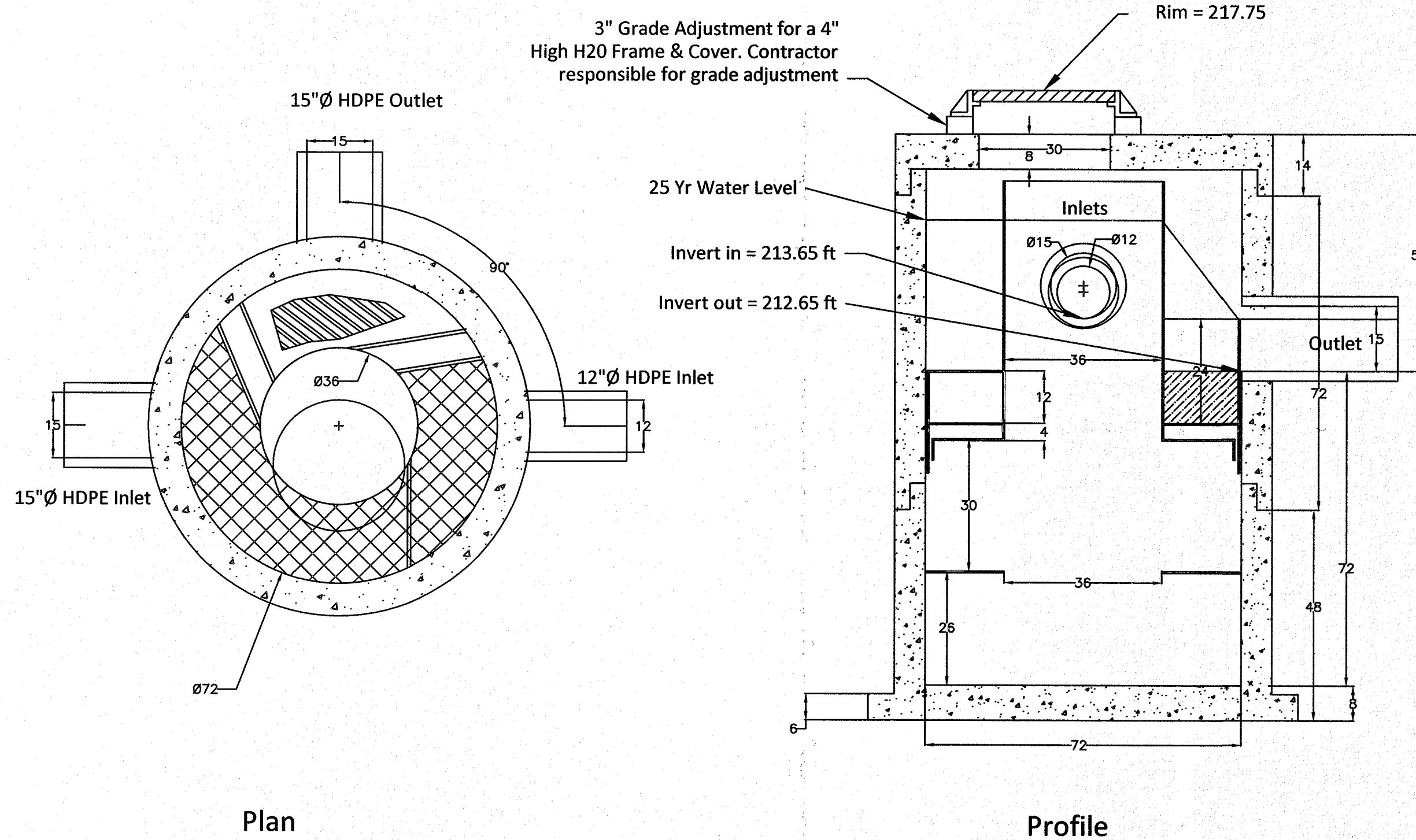
- NOTES:
1. MINIMUM STONE DIAMETER: 6"
 2. MINIMUM WEIGHT OF STONE: 50 LBS.
 3. MAXIMUM WEIGHT OF STONE: 125 LBS.
 4. PLACE ALL RIP-RAP OVER FILTER FABRIC, AMOCO 4508 OR APPROVED EQUAL.



SECTION A-A
NOT TO SCALE

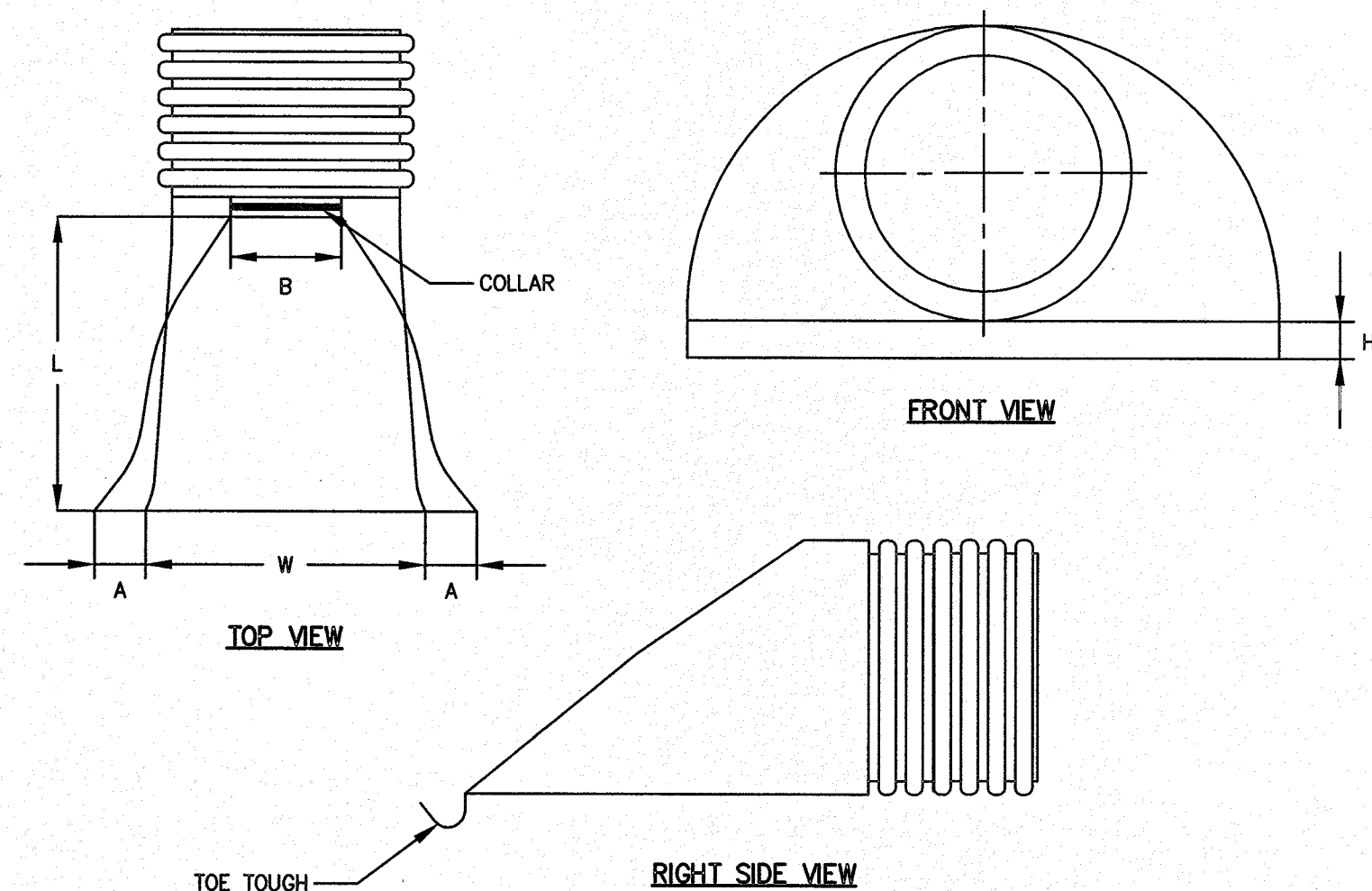


2 HW1 - HYDROWORKS HS4 (48"Ø)
SCALE: N.T.S.

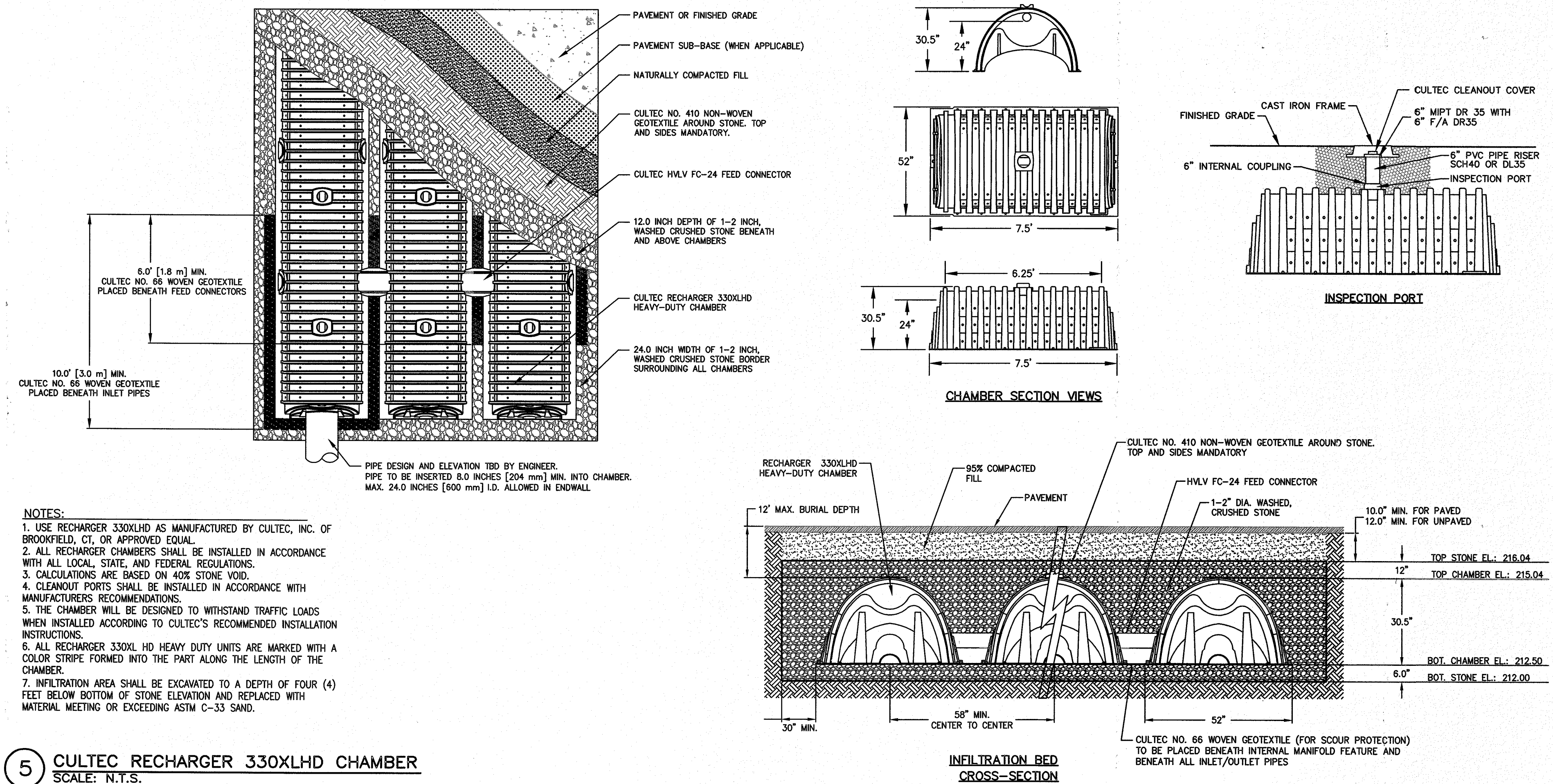


3 HW2 - HYDROWORKS HS6 (72"Ø)
SCALE: N.T.S.

PIPE DIAMETER (INCHES)						
DIAMETER (INCHES)	12	15	18	24	30	36
A (INCHES)	6.5	6.5	7.5	7.5	7.5	7.5
B (MAX) (INCHES)	10.0	10.0	15.0	18.0	22.0	25.0
H (INCHES)	6.5	6.5	6.5	6.5	8.6	8.6
L (INCHES)	25.0	25.0	32.0	36.0	58.0	58.0
W (INCHES)	29.0	29.0	35.0	45.0	63.0	63.0



4 CORRUGATED POLYETHYLENE FLARED-END SECTION (FES)
SCALE: N.T.S.



5 CULTEC RECHARGER 330XLHD CHAMBER
SCALE: N.T.S.



Andrews Survey & Engineering, Inc.
Land Surveying - Civil Engineering - Site Planning

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Uxbridge, Massachusetts 01569
P: 508-278-3897 F: 508-278-2289

500 East Washington Street
North Attleboro, Massachusetts 02760
P: 508-316-0452 F: 508-316-0963

BELLINGHAM PLANNING BOARD

BEING A MAJORITY DATE:

PROPOSED SELF-STORAGE FACILITY
300 HARTFORD AVENUE
BELLINGHAM, MA

JMRD2, LLC
665 CHURCH STREET
WHITINSVILLE, MA 01588

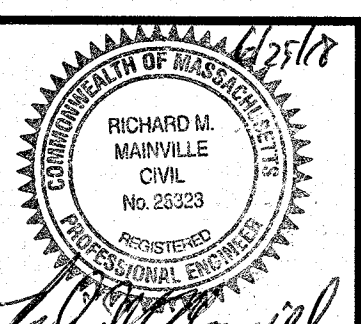
APPLICANT:

PROJECT:

REVISIONS		
NO.	DATE	DESCRIPTION
1	3/26/18	PROVIDED SEPARATE EGRESS PER TOWN
2	6/5/18	PER TOWN & PEER REVIEW COMMENTS
3	6/22/18	PER TOWN & PEER REVIEW COMMENTS

CAD FILE	...\\dwg\2017-235_SP-R3.dwg
DRAWN BY	TRB, SJO
CHECKED BY	BJA, RMM
DATE	FEBRUARY 12, 2018
PROJECT NO.	2017-235

SHEET TITLE
CONSTRUCTION
DETAILS
SHEET 3 OF 4



DRAWING NO.

C-7.3

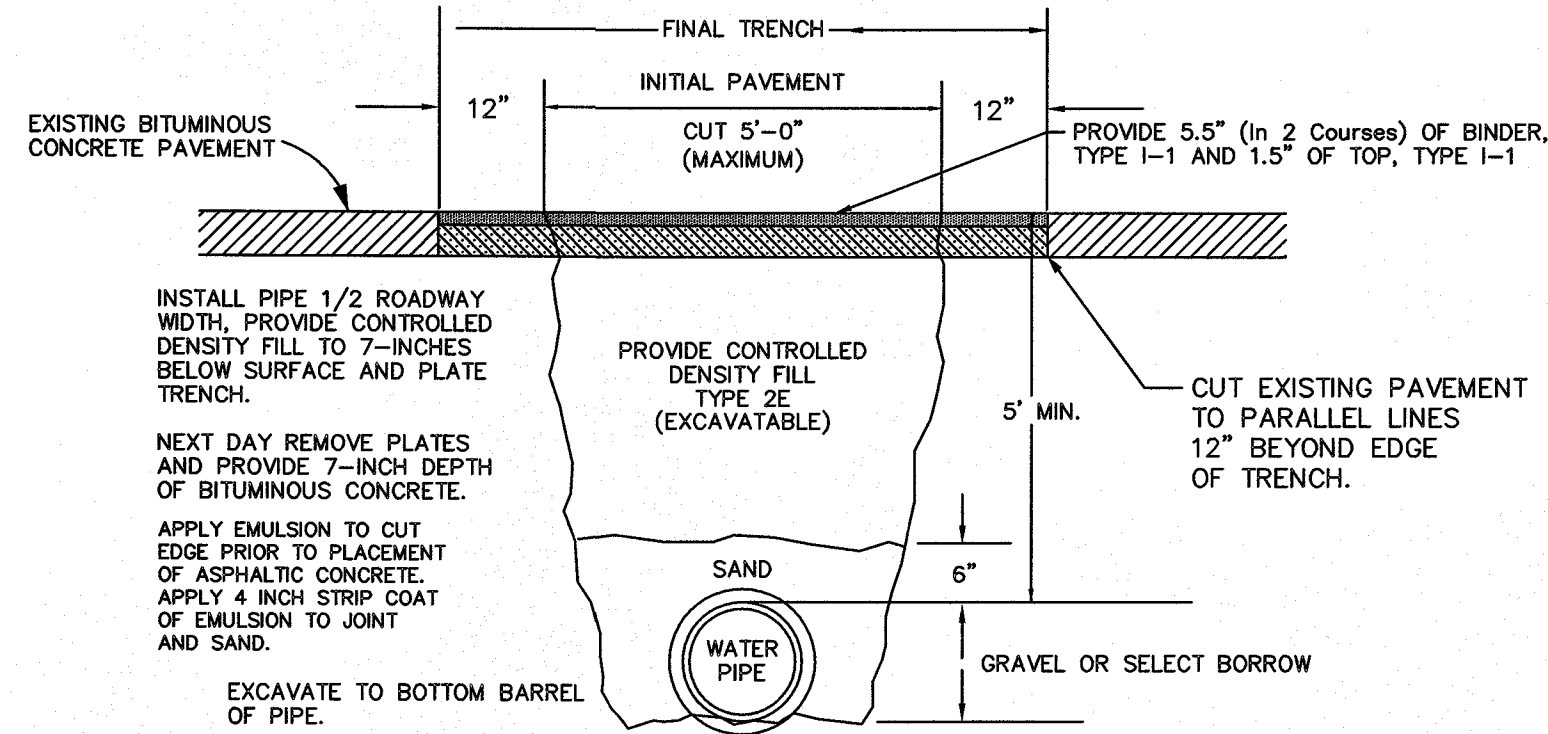
PLAN NO. L-5443

NOTES:

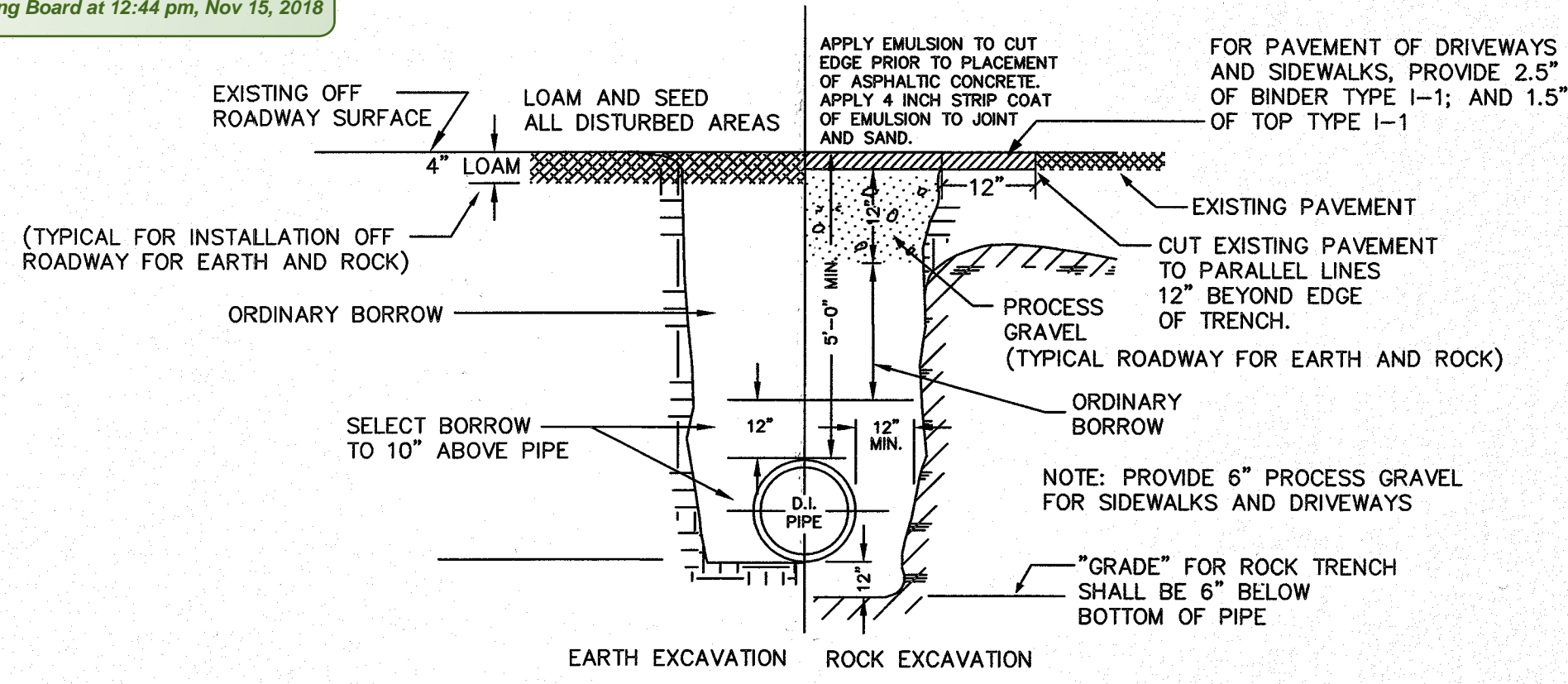
1. ALL NEW WATER MAINS FROM 6" THRU 12" DIAMETER SHALL BE DUCTILE IRON PRESSURE CLASS 350 PIPE.
2. TEFLON TAPE SHALL BE REQUIRED FOR ALL DIRECT TAPS
3. NO DIRECT TAPS GREATER THAN 1" SHALL BE ALLOWED ON 6" THRU 12" DIAM. PIPE
4. ANY BRANCH OR SERVICES LARGER THAN 1" MUST BE ACCOMPLISHED BY INSTALLATION OF APPROPRIATE DUCTILE IRON FITTING
5. ALL WATER LINES & APPURTANENCES TO BE INSTALLED PER BELLINGHAM WATER DEPARTMENT SPECIFICATIONS.

APPROVED

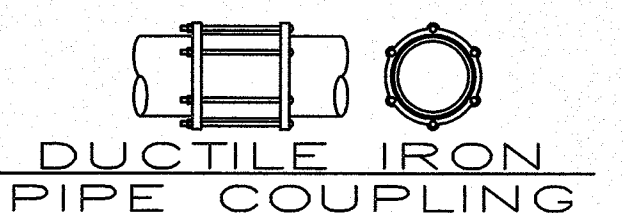
By Bellingham Planning Board at 12:44 pm, Nov 15, 2018



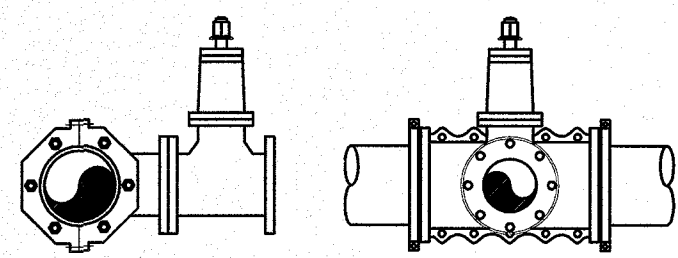
TYPICAL TRENCH RESURFACING
IN STATE HIGHWAY & ON MAIN ROADS



TYPICAL TRENCH SECTION
FOR DUCTILE IRON WATER MAINS

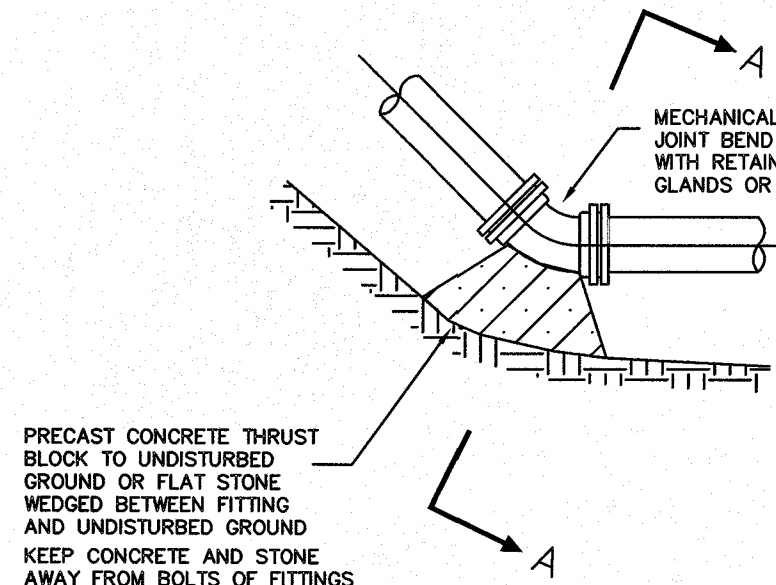


STYLE 501 & RC 501
BY ROMAC INDUSTRIES OR EQUIVALENT
TO BE USED FOR PIPE REPAIRS,
"CUT-INS", COUPLING DIFFERENT
TYPES OF PIPE, & CORRECTING
MISSALIGNED PIPE
(DI to C-900; DI to AC; C-900 to AC)

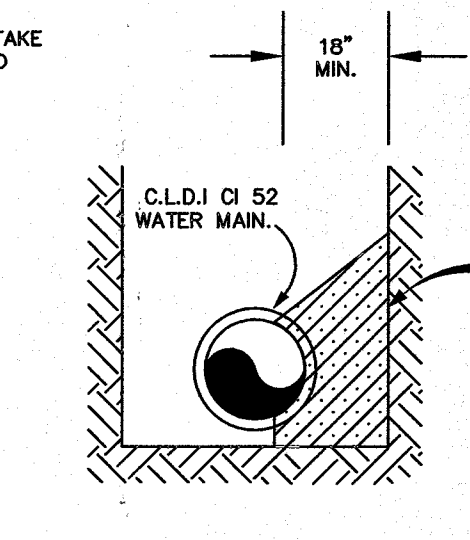
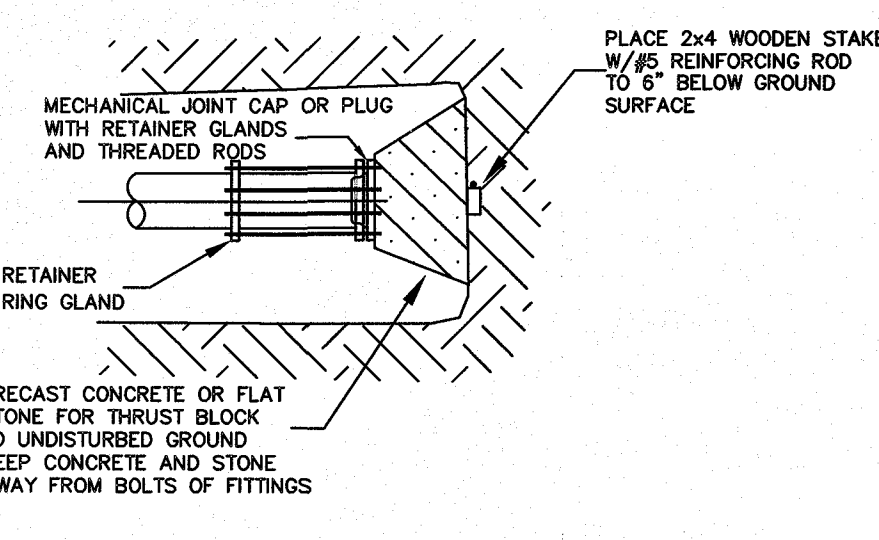
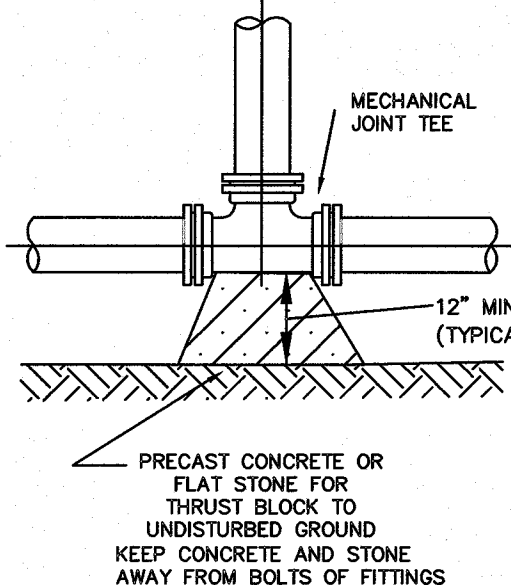


MJ TAPPING SLEEVE WITH MUELLER T-2360 (OR EQUIVALENT)
RESILIENT WEDGE TAPPING VALVE - MJ x FL ENDS
OPEN LEFT

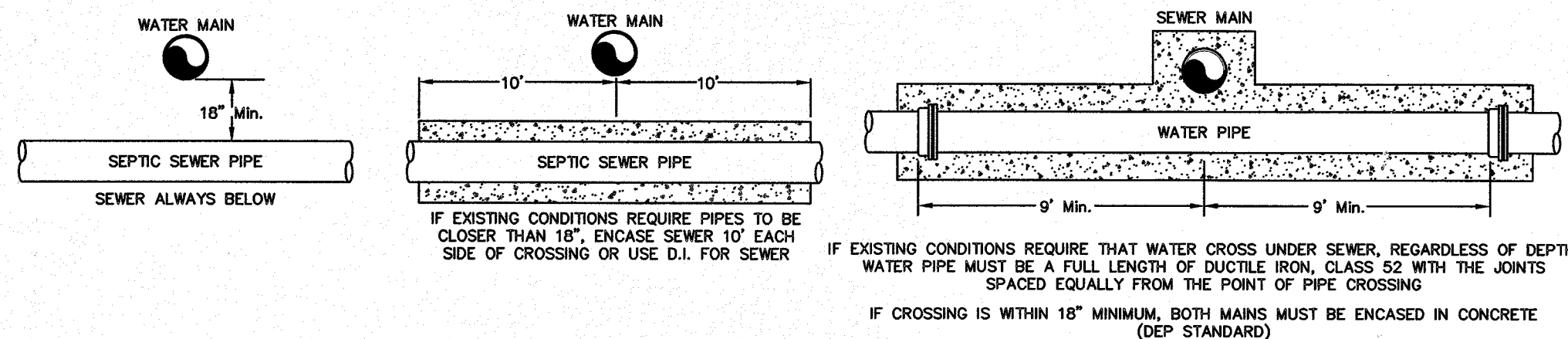
NOTE:
ALL MAIN LINE VALVES - (OPEN LEFT, NON RISING STEM)
SIZES 3" TO 12" - (GATE VALVES)
SIZES GREATER THAN 12" - (BUTTERFLY VALVES)
MUELLER - KENNEDY - DARLING - EPOXY COATED
MUELLER RESILIENT SEAT EPOXY COATED, AWWA APPROVED



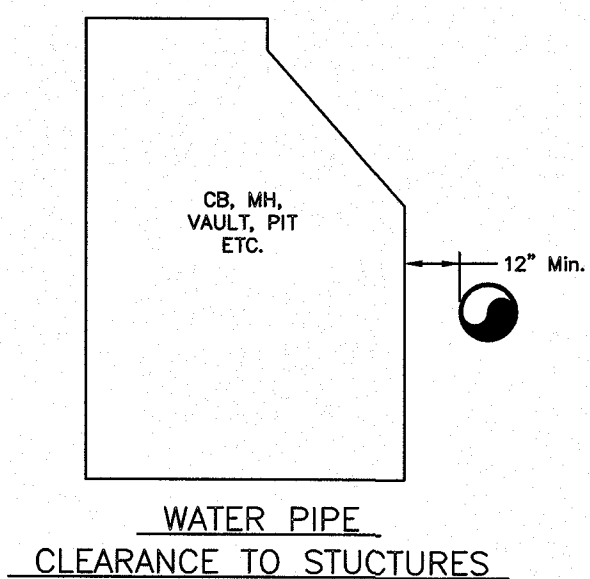
TYPICAL THRUST BLOCK DETAILS



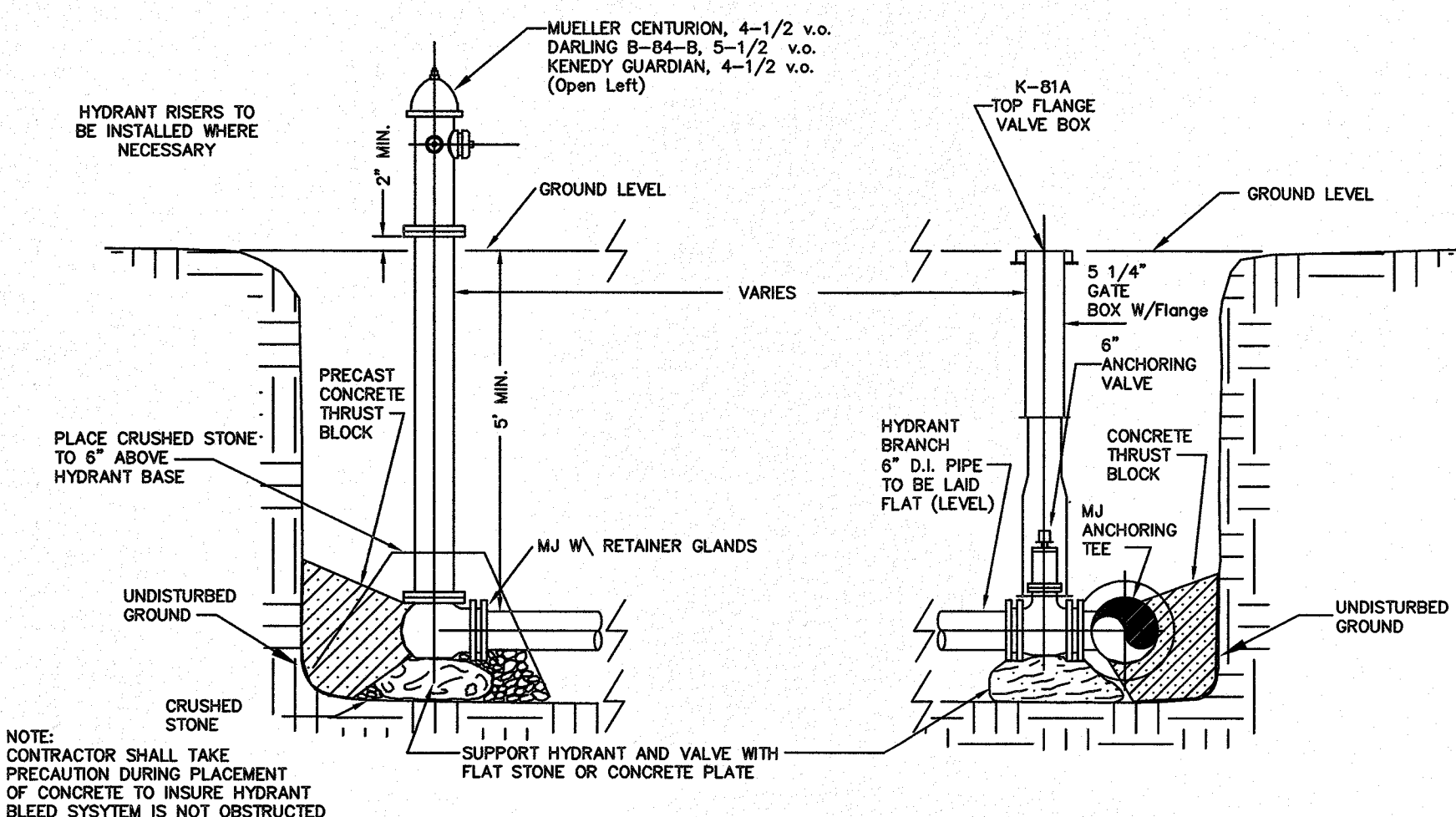
SECTION A-A
NOT TO SCALE



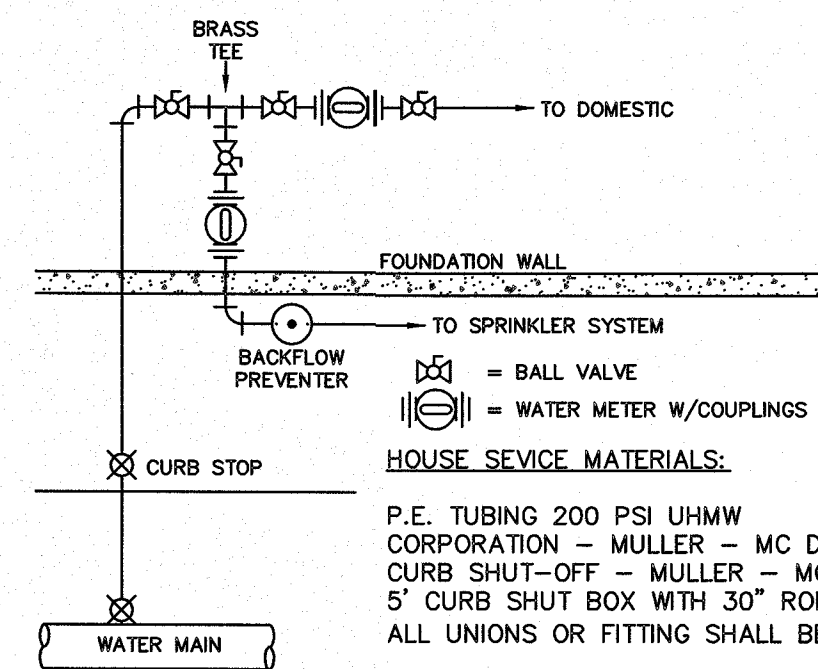
WATER / SEWER CROSSINGS



WATER PIPE
CLEARANCE TO STRUCTURES



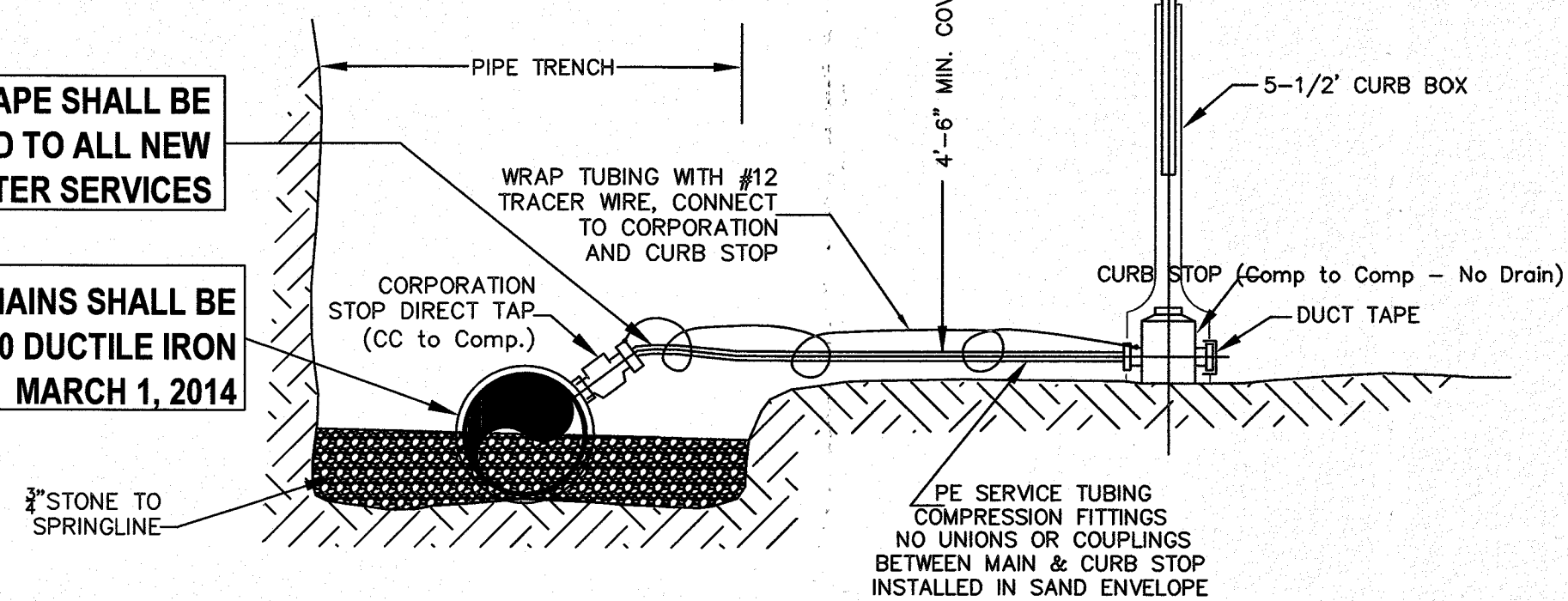
TYPICAL HYDRANT INSTALLATION



WATER SERVICE CONNECTION
WITH
SECOND METER
(LAWN SPRINKLER SYSTEMS)

TEFLON TAPE SHALL BE
ADDED TO ALL NEW
WATER SERVICES

ALL NEW WATER MAINS SHALL BE
PRESSURE CLASS 350 DUCTILE IRON
EFFECTIVE MARCH 1, 2014



TYPICAL SERVICE CONNECTION

SEE SPEC. SHEET

ASE
Andrews Survey & Engineering, Inc.
Land Surveying - Civil Engineering - Site Planning
P.O. Box 312, 104 Mendon Street
Uxbridge, Massachusetts 01569
P: 508-278-3897 F: 508-278-2289
500 East Washington Street
North Attleboro, Massachusetts 02760
P: 508-316-0452 F: 508-316-0963

BELLINGHAM PLANNING BOARD

BEING A MAJORITY DATE:

PROPOSED SELF-STORAGE FACILITY
300 HARTFORD AVENUE
BELLINGHAM, MA

JMRD2, LLC
665 CHURCH STREET
WHITINSVILLE, MA 01588

REVISIONS		
NO.	DATE	DESCRIPTION
1	3/26/18	PROVIDED SEPARATE EGRESS PER TOWN
2	6/5/18	PER TOWN & PEER REVIEW COMMENTS
3	6/22/18	PER TOWN & PEER REVIEW COMMENTS

CAD FILE	...dwg\2017-235_SP-R3.dwg
DRAWN BY	TRB, SJO
CHECKED BY	BJA, RMM
DATE	FEBRUARY 12, 2018
PROJECT NO.	2017-235

SHEET TITLE

CONSTRUCTION
DETAILS

SHEET 4 OF 4

DRAWING NO.
C-7.4

PLAN NO. L-5443

APPROVED

By Bellingham Planning Board at 12:44 pm, Nov 15, 2018



Andrews Survey & Engineering, Inc.
Land Surveying - Civil Engineering - Site Planning

P.O. Box 312, 104 Mendon Street
Uxbridge, Massachusetts 01569
P: 508-278-3897 F: 508-278-2289

500 East Washington Street
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BELLINGHAM PLANNING BOARD

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CAD FILE ...\\dwg\2017-235_SP-R3.dwg

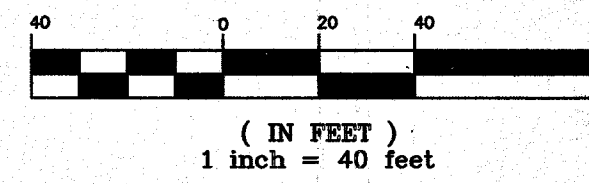
DRAWN BY TRB, SJO

CHECKED BY BJA, RMM

DATE FEBRUARY 12, 2018

PROJECT NO. 2017-235

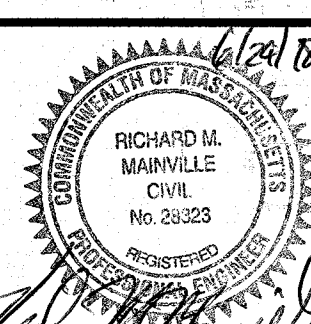
GRAPHIC SCALE



(IN FEET)
1 inch = 40 feet

SHEET TITLE

EROSION & SEDIMENT
CONTROL PLAN

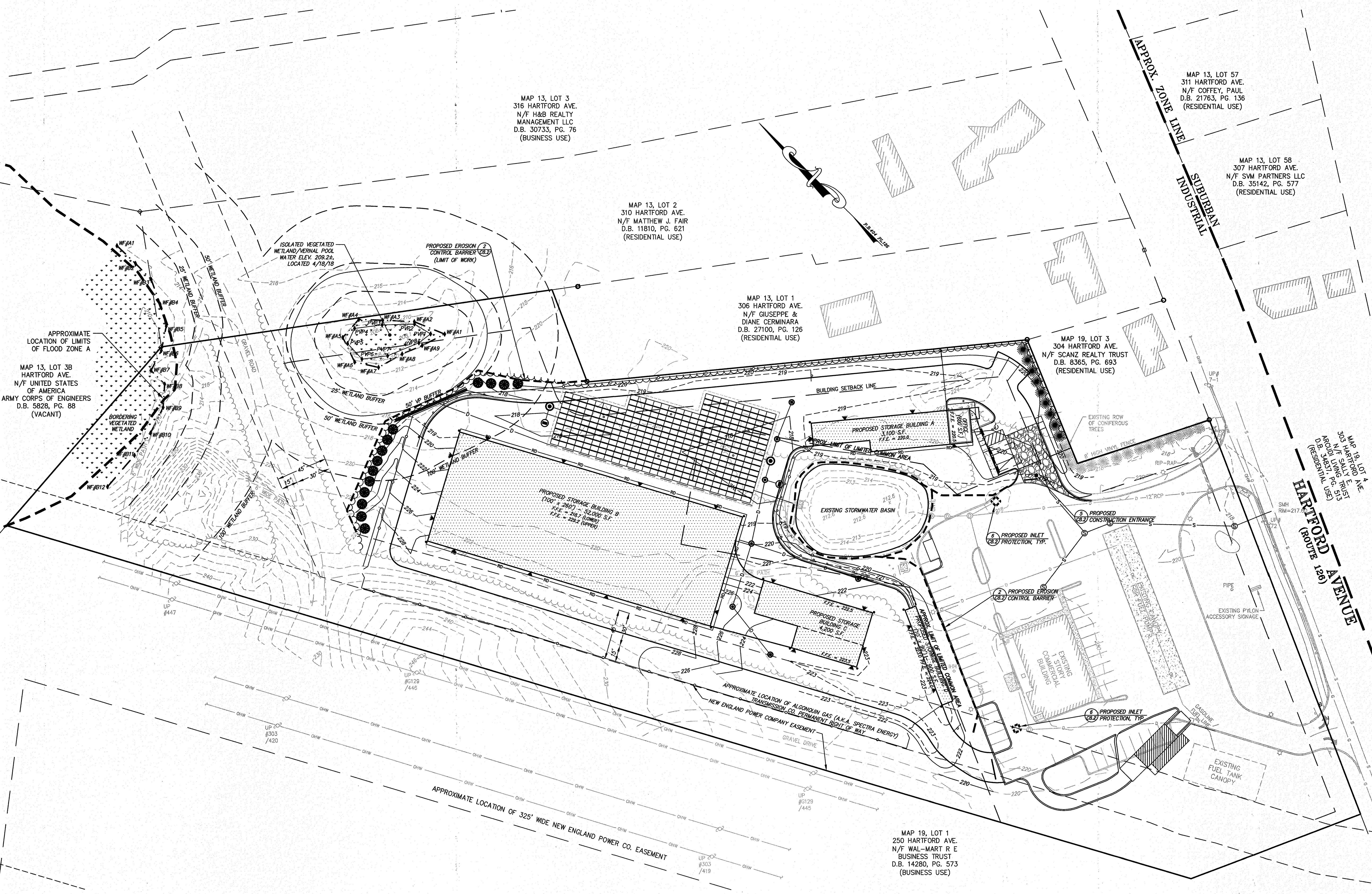


DRAWING NO.

C-8.1

PLAN NO. L-5443

F:\ACAD\2017 PROJECTS\2017-235 DWG\2017-235_SP-R3.DWG 05-25-18 11:53:31 AM - LAYOUT C-8.1



EROSION AND SEDIMENT CONTROL REQUIREMENTS

PART 1 - GENERAL

1.01 SUMMARY

A. FURNISH, INSTALL, AND MAINTAIN TEMPORARY AND PERMANENT EROSION AND SEDIMENT CONTROL MEASURES, SUCH AS, BUT NOT NECESSARILY LIMITED TO, STRAW BALE AND SILT FENCE BARRIERS, RIPRAP, VEHICLE TRACKING PADS, DIVERSION CHANNELS AND BERMS, CHECK DAMS, STRATEGICALLY LOCATED STOCKPILES, SEDIMENT BASINS, MULCH, AND SEED MIX (HEREINAFTER "CONTROL MEASURES") ADEQUATE TO PREVENT THE CONVEYANCE OF EROSION PRODUCTS (E.G. SOIL, MULCH, SOD) OFF SITE, OR INTO ENVIRONMENTALLY SENSITIVE AREAS, OR INTO AREAS WHERE WORK WILL BE ADVERSELY IMPACTED. ENVIRONMENTALLY SENSITIVE AREAS INCLUDE, BUT ARE NOT NECESSARILY LIMITED TO, WETLANDS, TRIBUTARIES TO WETLANDS, WETLAND BUFFER ZONES, INTERMITTENT AND PERENNIAL STREAMS / RIVERS, AND THEIR ATTENDANT BUFFER ZONES.

ALL METHODS AND MATERIALS USED FOR EROSION CONTROL SHALL CONFORM TO THE REQUIREMENTS SET FORTH IN "EROSION AND SEDIMENT CONTROL GUIDELINES FOR URBAN AND SUBURBAN AREAS A GUIDE FOR PLANNERS, DESIGNERS, AND MUNICIPAL OFFICIALS" AS PUBLISHED BY THE MASSACHUSETTS DEPARTMENT OF ENVIRONMENTAL PROTECTION, BUREAU OF RESOURCE PROTECTION, UNLESS OTHERWISE APPROVED IN WRITING.

1. REFER TO DRAWINGS FOR LOCATION AND DETAILS OF LIMITS OF DISTURBANCE AND CONTROL MEASURES REQUIRED TO COMMENCE WORK. LIMITS OF DISTURBANCE SHALL BE MARKED WITH TAPE, SIGNS, OR ORANGE CONSTRUCTION FENCE PRIOR TO COMMENCING ANY LAND DISTURBANCE ACTIVITIES. CONTROL MEASURES WILL BE ADEQUATE ONLY FOR VEGETATION CLEARING. THE DRAWINGS ARE NOT INTENDED TO GRAPHICALLY DEPICT ALL CONTROL MEASURES THAT WILL BE REQUIRED TO MEET THE REQUIREMENTS DESCRIBED IN 1.01.A.

2. DEVISE AND EMPLOY CONTROL MEASURES THROUGHOUT THE DURATION OF PROJECT, OVER ALL AREAS DISTURBED OR UNDISTURBED BY CONSTRUCTION, AS NECESSARY TO MEET THE REQUIREMENTS DESCRIBED IN 1.01.A.

3. DEVISE AND EMPLOY TEMPORARY CONTROL MEASURES AS NECESSARY TO MEET THE REQUIREMENTS DESCRIBED IN 1.01.A, WHILE ALLOWING WORK TO PROCEED IN AN EFFICIENT, COST EFFECTIVE MANNER.

4. DEVISE, EMPLOY AND MAINTAIN CONTROL MEASURES UNTIL SUCH TIME AS THE ENTIRE SITE IS PERMANENTLY STABILIZED BY ESTABLISHED VEGETATION, FINISH LANDSCAPE MATERIALS, PAVED SURFACES, AND/OR ROOF AREA.

5. ONCE THE SITE IS PERMANENTLY STABILIZED AND CERTIFIED AS SUCH BY ENGINEER, REMOVE TEMPORARY CONTROL MEASURES WHILE PROTECTING STABILIZED SURFACES.

1.02 SUBMITTALS

A. SUBMIT PRODUCT DATA, WARRANTY, AND TEST REPORTS AS INDICATED ON THE DRAWINGS.

B. SUBMIT SKETCH SHOWING LOCATIONS OF PROPOSED STOCKPILE AREAS, CONSTRUCTION ENTRANCES AND EROSION CONTROLS IF NOT SHOWN ON THE SITE PLAN OR DIFFERENT FROM THOSE LOCATIONS SHOWN ON THE SITE PLAN.

C. A SITE SPECIFIC SEQUENCE OF CONSTRUCTION FOR EACH PORTION OF THE SITE. NO PORTION OF THE SITE SHALL EXCEED FIVE (5) ACRES.

1.03 QUALITY ASSURANCE

A. COMPLY WITH GOVERNING CODES AND REGULATIONS. PROVIDE PRODUCTS FROM ACCEPTABLE MANUFACTURERS. USE EXPERIENCED INSTALLERS. DELIVER, HANDLE, AND STORE MATERIALS IN ACCORDANCE WITH MANUFACTURER'S INSTRUCTIONS.

B. CONFORM TO CONDITIONS OF APPROVAL ISSUED BY REGULATORY AGENCIES INCLUDING, BUT NOT NECESSARILY LIMITED TO, LOCAL PLANNING BOARD, CONSERVATION COMMISSION, CITY COUNCIL, BOARD OF HEALTH, PUBLIC WORKS / HIGHWAY DEPARTMENT, STATE ENVIRONMENTAL PROTECTION DEPARTMENT, AND U.S. GOVERNMENT, ENVIRONMENTAL PROTECTION AGENCY. WHERE CONDITIONS OF REGULATORY APPROVAL DIFFER FROM REQUIREMENTS CONTAINED HEREIN OR ON THE DRAWINGS, COMPLY WITH THE MORE STRINGENT REQUIREMENT.

PART 2 - PRODUCTS

2.01 MATERIALS

A. STRAW BALES: WEED FREE DRY GRASS OR STRAW, MACHINE BOUND WITH JUTE OR WIRE, APPROXIMATE SIZE EACH BALE 42" X 16" X 16". EACH BALE SHALL BE STAKED WITH A MINIMUM OF TWO 24" LONG HARDWOOD STAKES. NOTE: HAY SHALL NOT BE USED.

B. STRAW WATTLES: NORTH AMERICAN GREEN MODEL WS1210 OR APPROVED EQUAL.

C. SILT FENCE: NON-WOVEN, UV-RESISTANT, POLYPROPYLENE FABRIC, FLOW RATED AT 10 GPM/SF MINIMUM, GRAB TENSILE RATED AT 124 POUNDS MINIMUM, WITH INTEGRAL STAKE LOOPS, AND HARDWOOD STAKES. USE NO. 2130 BY AMOCO FABRICS & FIBERS, OR APPROVED EQUAL.

D. MULCH: ORGANICS INCLUDING STRAW, PROCESSED PINE / HEMLOCK TWIGS AND NEEDLES.

E. SEED MIXES: SHALL MEET THE REQUIREMENTS OF MASSACHUSETTS HIGHWAY DEPARTMENT STANDARD SPECIFICATIONS FOR HIGHWAYS AND BRIDGES, LATEST EDITION SECTION 6.03.0 OR 6.03.1 AS APPROPRIATE.

F. EXCELSIOR BLANKET: CURLED WOOD FIBER ON PHOTODEGRADABLE EXTRUDED PLASTIC MATRIX, 80% OF FIBERS 6-INCHES LONG OR LONGER, WEIGHT 0.975 POUNDS / SY, CONTAINING NO CHEMICAL ADDITIVES. USE CURLEX I BLANKET BY AMERICAN EXCELSIOR COMPANY, OR APPROVED EQUAL.

G. ROCK RIPRAP: SOUND, ANGULAR, 6-INCH MINUS PROCESSED ROCK, BLAST ROCK, OR TAILINGS.

H. CRUSHED STONE: SOUND, ANGULAR, 2-INCH MINUS PROCESSED CRUSHED STONE.

PART 3 - EXECUTION

3.01 THROUGHOUT CONSTRUCTION

A. DEVISE WORK SEQUENCE SO AS TO LIMIT DRAINAGE AREA THAT IS TRIBUTARY TO DISTURBED AREAS. DEVISE, EMPLOY, AND MAINTAIN CONTROL MEASURES SUCH AS DIVERSION CHANNELS AND BERMS, STRATEGICALLY LOCATED STOCKPILES, AND SEDIMENT BASINS TO SUBDIVIDE DRAINAGE AREAS INTO SMALL, MANAGEABLE SUBAREAS, THEREBY MINIMIZING RUNOFF AND THE POTENTIAL FOR EROSION.

B. MAINTAIN BARRIER AT LIMIT OF WORK AND PROTECT EXISTING VEGETATION / FACILITIES OUTSIDE OF LIMIT OF WORK.

C. MAINTAIN SPARE MATERIAL STOCKPILES FOR IMMEDIATE EMPLOYMENT / REPAIR / EXPANSION OF CONTROL MEASURES. AT A MINIMUM, SUCH MATERIALS SHALL INCLUDE HAY BALES, SILT FENCE AND STAKES, AND CRUSHED STONE.

D. INSPECT AND MAINTAIN EFFECTIVENESS OF CONTROL MEASURES BY REPAIRING AS NECESSARY TO ENSURE INTENDED FUNCTION; BY SUPPLEMENTING AS NECESSARY FOR ADEQUATE EXTENT; BY REMOVING TRAPPED PRODUCTS OF EROSION AS NECESSARY TO MAINTAIN EFFECTIVE TRAP VOLUME.

E. LIMIT EXTENT OF WORK AREA SO THAT ALL DISTURBED AREAS CAN BE STABILIZED WITH CONTROL MEASURES WITHIN A 24-HOUR PERIOD.

F. INSTALL CONTROL MEASURES AS SOON AS PRACTICABLE AFTER EACH MANAGEABLE PORTION OF EARTHWORK IS COMPLETE. EMPLOY TEMPORARY MEASURES AS NECESSARY TO STABILIZE DISTURBED AREAS, EVEN WHERE SUBSEQUENT CONSTRUCTION OPERATIONS MAY REQUIRE RE-DISTURBANCE.

PART 3 - CONTINUED

G. WHEN INTENSE RAINFALL IS EXPECTED, CONSIDER, DEVISE, AND EMPLOY REINFORCING CONTROL MEASURES PRIOR TO THE RAINFALL EVENT TO MEET THE REQUIREMENTS DESCRIBED IN 1.01.A. IF NECESSARY, EMPLOY TEMPORARY CONTROL MEASURES ON MATERIAL STOCKPILES TO COUNTERACT POTENTIAL SEDIMENT TRANSPORT DURING INTENSE RAINFALL.

H. WHEN VEHICLE REFUELING IS REQUIRED ON SITE, CONDUCT REFUELING OPERATIONS OUTSIDE OF ENVIRONMENTALLY SENSITIVE AREAS.

I. PROPERLY DISPOSE OF DEBRIS, SOLID WASTE, TRASH, AND CONSTRUCTION WASTE / BYPRODUCTS OFF SITE.

J. SWEEP ON-SITE PAVED AREAS AND OFF-SITE STREETS AS NECESSARY TO PREVENT SILT AND DEBRIS ORIGINATING ON SITE FROM ENTERING CLOSED DRAINAGE SYSTEMS AND / OR ENVIRONMENTALLY SENSITIVE AREAS. WHEN NECESSARY UTILIZE WATER SPRAYING, SURFACE ROUGHENING AND/OR APPLY POLYMERS, SPRAY-ON TACKIFIERS, CHLORIDES AND BARRIERS FOR DUST CONTROL.

K. INSPECT EROSION CONTROLS DAILY THROUGHOUT CONSTRUCTION REPAIR DAMAGED CONTROLS IMMEDIATELY.

3.02 SITE PREPARATION AND ACCESS

A. WALK SITE AND IDENTIFY LOCATIONS OF LIMIT OF WORK AND ENVIRONMENTALLY SENSITIVE AREAS. ESTABLISH CONSTRUCTION STAGING AREA, LOCATED BEYOND ENVIRONMENTALLY SENSITIVE AREAS.

B. INSTALL CONTROL MEASURES AS SHOWN ON THE DRAWINGS, INCLUDING THOSE DEFINING THE LIMIT OF WORK.

C. LIMIT VEHICULAR TRAFFIC TO AND FROM SITE TO MINIMIZE TRANSPORT OF SEDIMENT.

3.03 CLEARING, GRUBBING, AND STRIPPING

A. SCHEDULE GRUBBING AND STRIPPING TO OCCUR IMMEDIATELY PRIOR TO EARTH DISTURBANCE. DEPENDING ON SITE AREA, CONSIDER MULTIPLE GRUBBING PHASES, SEQUENCED TO TAKE ADVANTAGE OF THE EROSION PREVENTION POTENTIAL OF EXISTING VEGETATIVE COVER.

B. MINIMIZE THE AREA OF EXISTING VEGETATION REMOVED WHEREVER POSSIBLE. NO GREATER THAN FIVE (5) ACRES SHALL BE UNSTABLE AT ANY TIME.

C. LOCATE AND SIZE STOCKPILES TO MINIMIZE EROSION POTENTIAL, TAKING ADVANTAGE OF TERRAIN SLOPE AND ASPECT, WHERE APPROPRIATE.

D. PROTECT VEGETATION, INCLUDING ROOT SYSTEMS, BEYOND LIMIT OF CLEARING.

E. PROCESS TIMBER, STUMPS, SLASH, AND BRUSH SO AS TO PROTECT ENVIRONMENTALLY SENSITIVE AREAS AND INSTALLED CONTROL MEASURES. PROPERLY DISPOSE OF EXCESS OFF SITE. BURIAL OF STUMPS ON SITE IS PROHIBITED.

3.04 EXCAVATION FOR BUILDING FOUNDATIONS AND UTILITIES

A. DEVISE AND INSTALL CONTROL MEASURES ADEQUATE TO HANDLE DISCHARGES AND TRAP SEDIMENT FROM FOOTING SUMP AND WELL POINT PUMPS PRIOR TO EXCAVATION.

B. ARMOR SUMP PUMP DISCHARGE LOCATIONS TO PREVENT EROSION AT POINT OF DISCHARGE AND AREAS DOWNSTREAM.

C. IF FOUNDATION EXCAVATIONS GRADE TO DAYLIGHT ON THE LOW SIDE, DEVISE AND INSTALL CONTROL MEASURES TO HANDLE SURFACE AND GROUNDWATER FLOW FROM EXCAVATION LOW POINT.

D. STOCKPILE EXCAVATED MATERIALS TO BAFFLE OVERLAND RUNOFF, AVOIDING THE CREATION OF LENGTHY PATHS OF CONCENTRATED RUNOFF. STOCKPILE SLOPES SHALL NOT EXCEED 2:1.

E. BACKFILL UTILITY TRENCHES AS SOON AS PRACTICABLE TO PREVENT FLOODING, SLOUGHING, POTENTIAL OVERFLOW, AND REPETITIVE EARTH DISTURBANCE.

3.05 SITE GRADING

A. WHERE APPLICABLE, FOLLOW EXCAVATION AND FILL PRACTICES SHOWN ON DRAWINGS TO LOCALIZE AND MINIMIZE EROSION.

B. MONITOR SEDIMENT VOLUME IN TEMPORARY SEDIMENT BASINS AND AT DIVERSION PERIMS WITH REGARD TO FUTURE SOIL STABILITY, DRAINAGE, OR BEARING CAPACITY. REMOVE AND PROPERLY DISPOSE OF TRAPPED SEDIMENT BEFORE BRINGING SITE TO FINAL SUBGRADE.

C. EXPOSED SOILS SHALL BE PERMANENTLY STABILIZED WITHIN FIVE (5) BUSINESS DAYS OF COMPLETION OF CONSTRUCTION OF A GIVEN AREA. EXPOSED AREAS WHERE NO WORK HAS OCCURRED FOR FOURTEEN (14) DAYS SHALL BE TEMPORARILY STABILIZED WITH HYDROSEED OR OTHER APPROVED METHOD.

D. SLOPES STEEPER THAN 3:1 SHALL BE STABILIZED IMMEDIATELY AFTER COMPLETION.

3.06 LANDSCAPING

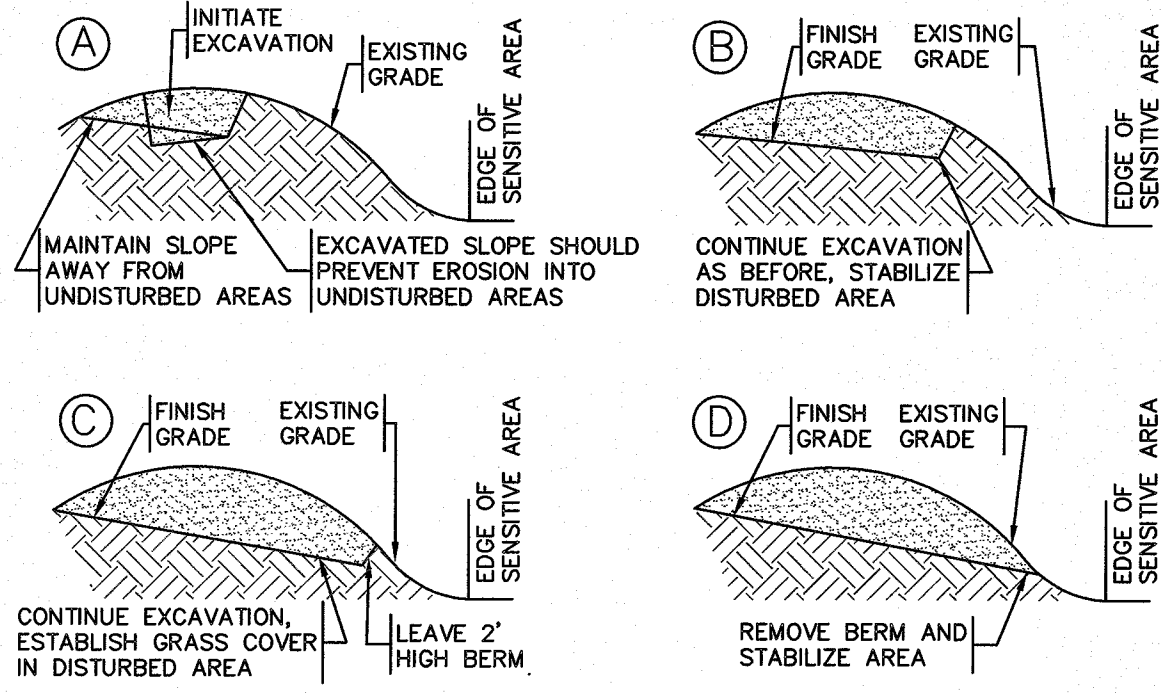
A. COMPLETE LANDSCAPING AS SOON AS POSSIBLE AFTER COMPLETION OF FINAL SUBGRADE.

B. IMMEDIATELY AFTER PLACEMENT OF TOPSOIL, STABILIZE WITH CONTROL MEASURES INCLUDING, BUT NOT NECESSARILY LIMITED TO, SEED MIX, MULCH, AND / OR BLANKET.

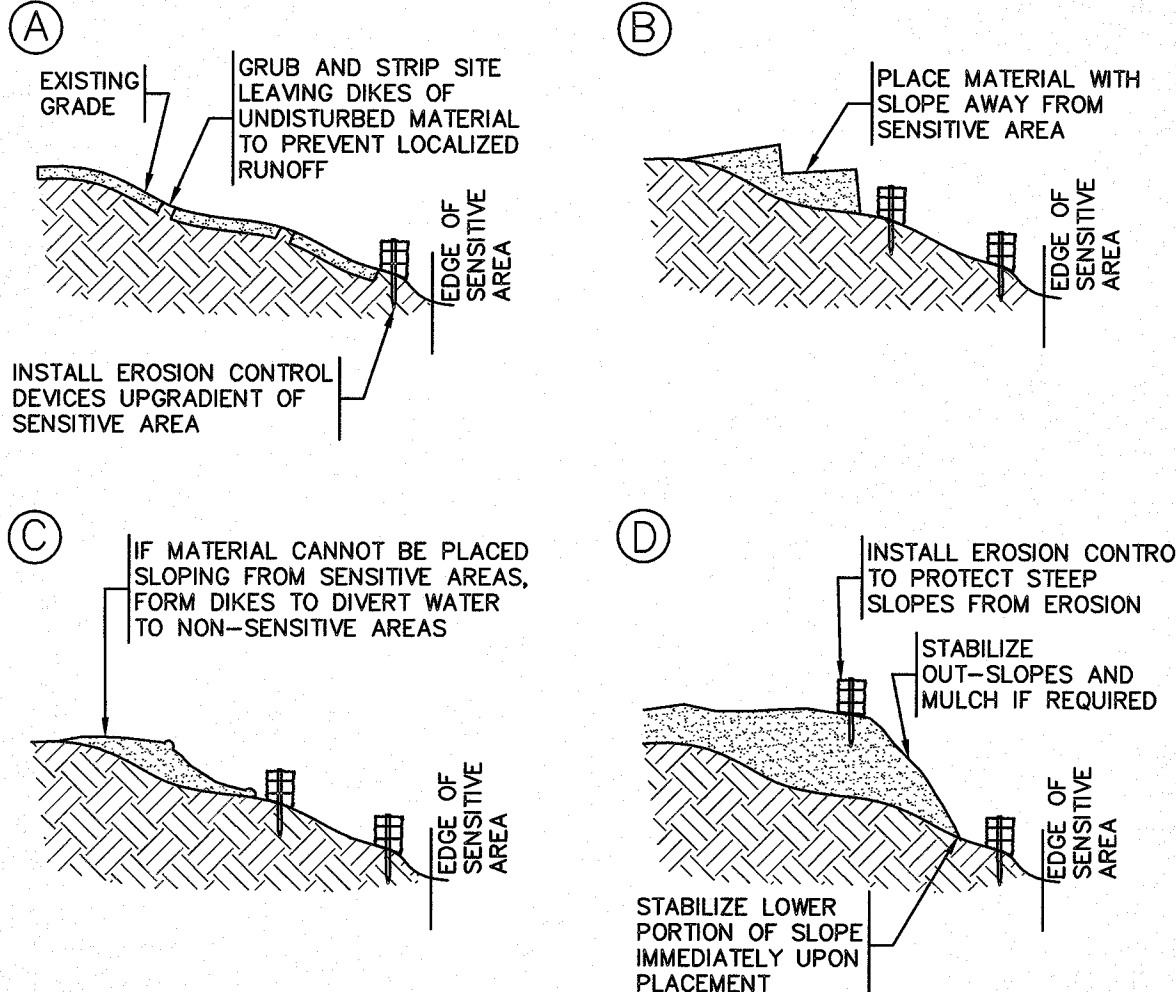
C. PERMANENT SEEDING MAY BE PERFORMED IN THE SPRING PRIOR TO JULY 1 AND IN BETWEEN AUGUST 1 AND OCTOBER 15. PERMANENT SEEDING AT OTHER TIMES SHALL BE APPROVED AND SHALL ONLY BE ALLOWED WITH AN APPROVED MULCHING AND IRRIGATION PROGRAM.

APPROVED

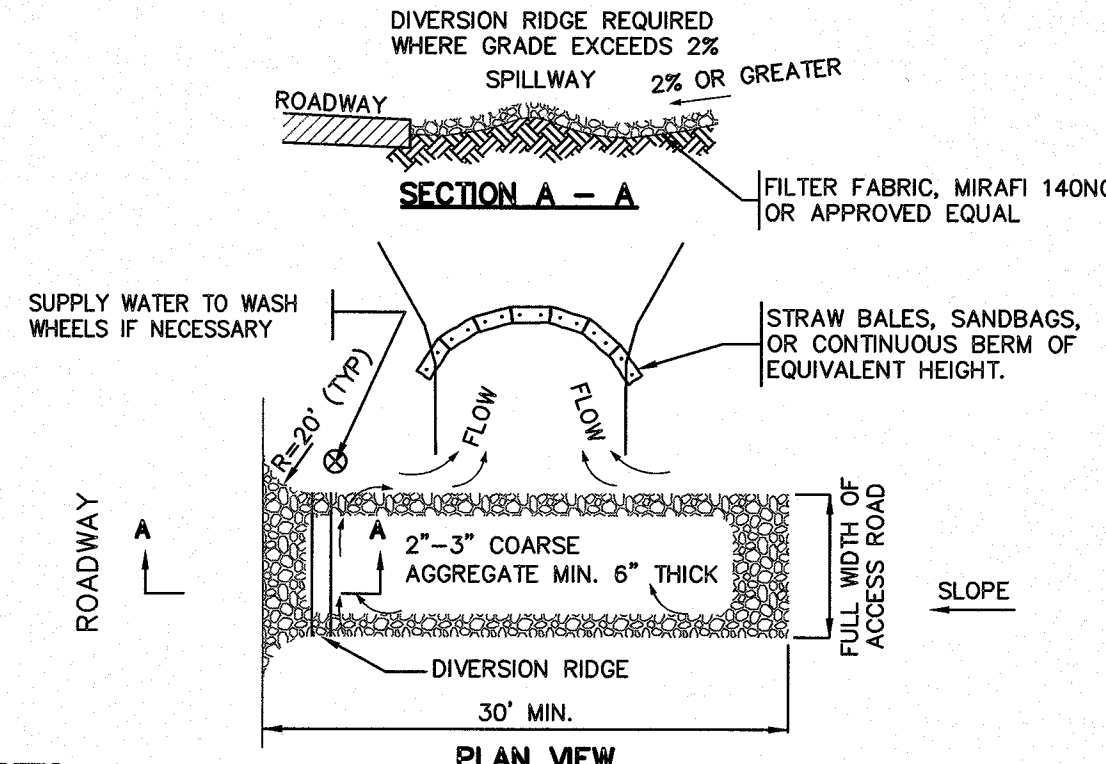
By Bellingham Planning Board at 12:44 pm, Nov 15, 2018



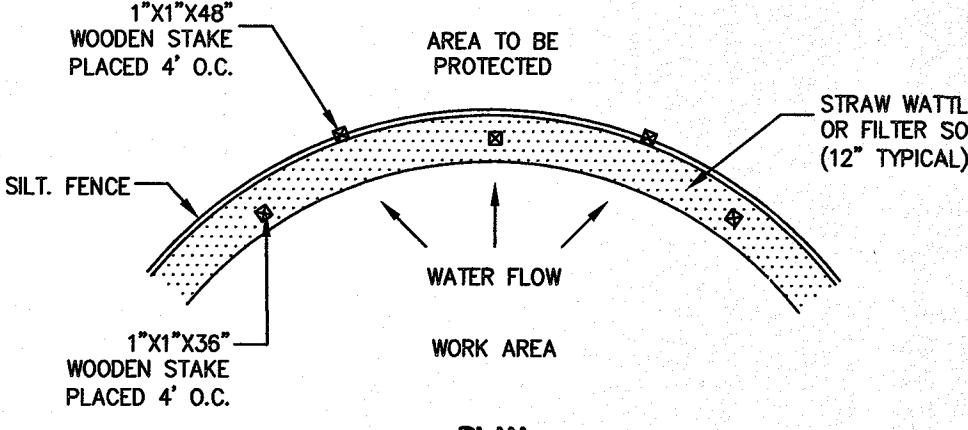
1 EXCAVATION PROCEDURE
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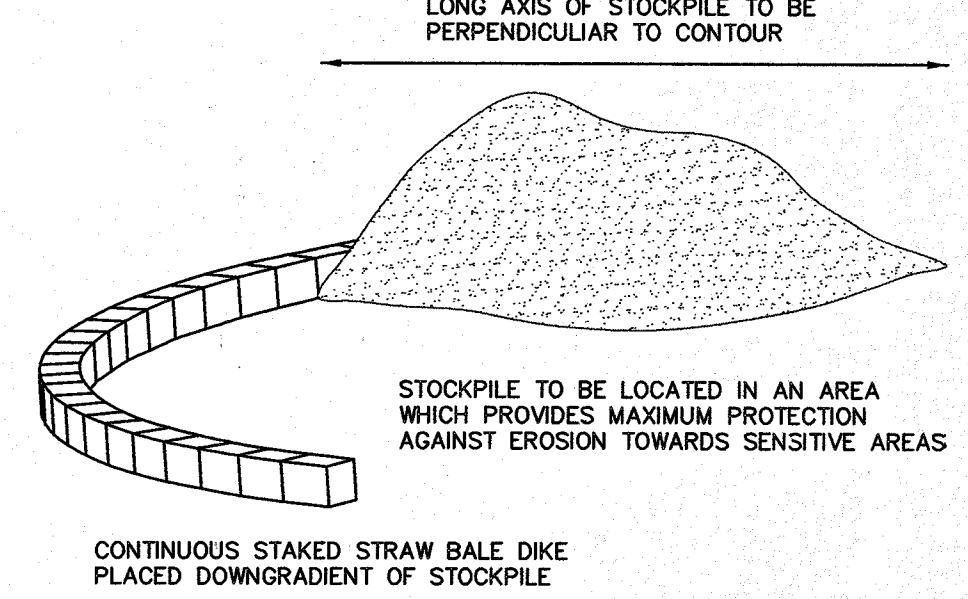
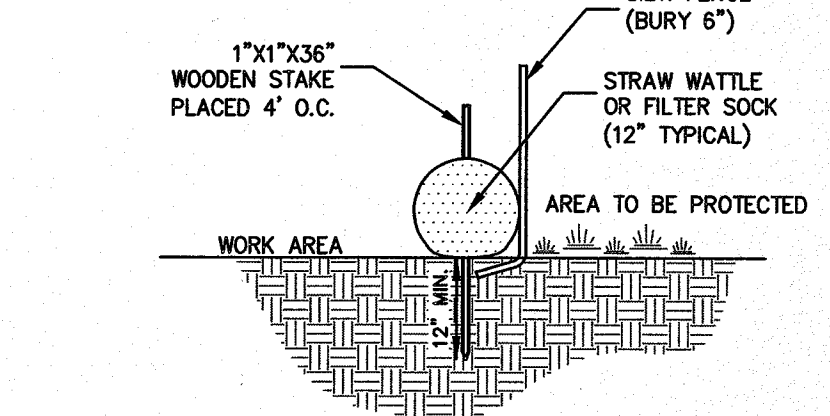
3 FILL PROCEDURE
SCALE: N.T.S.



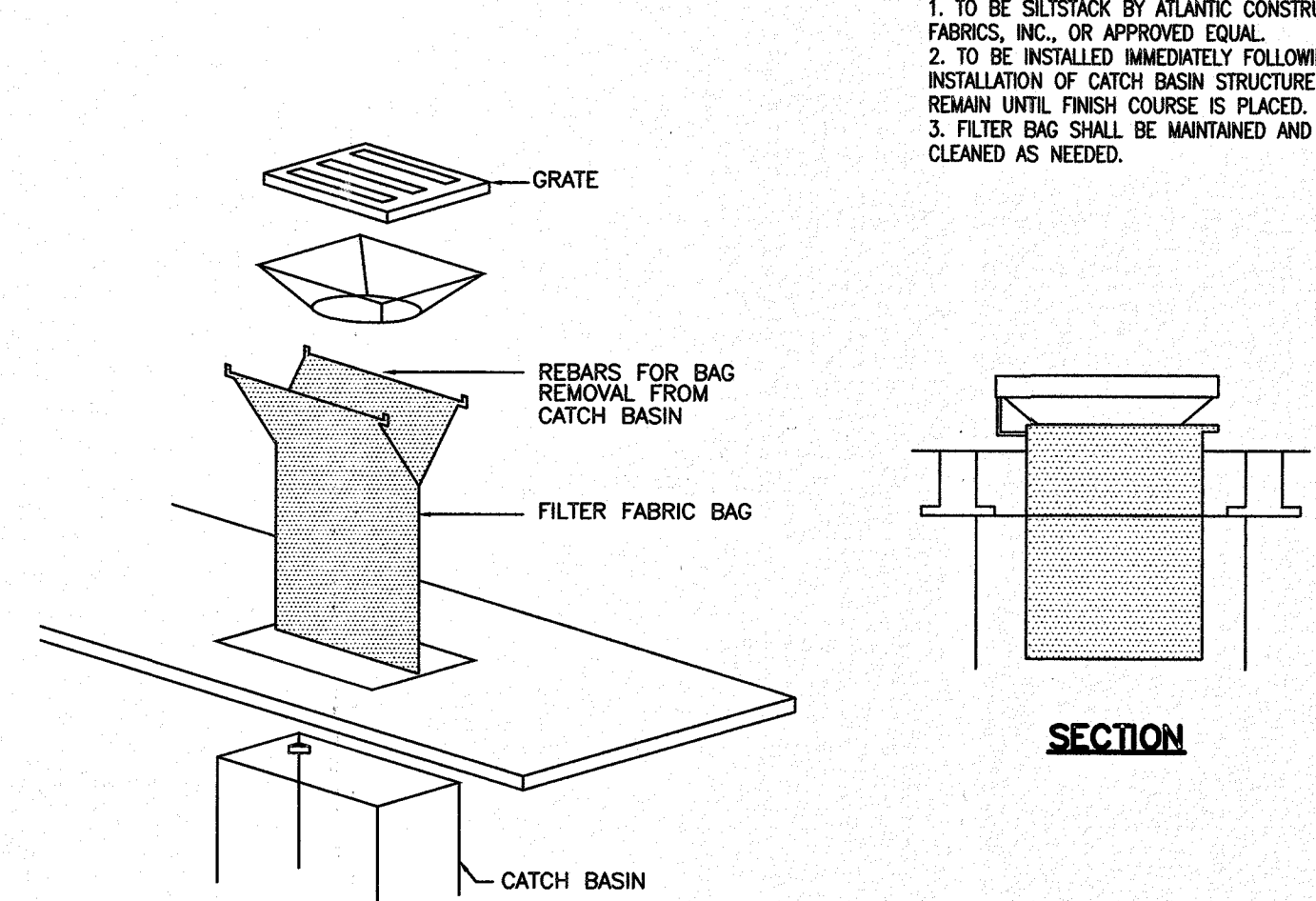
5 CONSTRUCTION ENTRANCE
SCALE: N.T.S.



2 EROSION CONTROL BARRIER (ECB)
SCALE: N.T.S.



4 TEMPORARY STOCKPILE
SCALE: N.T.S.



6 TYPICAL CATCH BASIN FILTER BAG DETAIL
SCALE: N.T.S.

ASE

Andrews Survey & Engineering, Inc.
Land Surveying - Civil Engineering - Site Planning

P.O. Box 312, 104 Mendon Street
Uxbridge, Massachusetts 01569
P: 508-278-3897 F: 508-278-2289

500 East Washington Street
North Attleboro, Massachusetts 02760
P: 508-316-0452 F: 508-316-0963

BELLINGHAM PLANNING BOARD

BEING A MAJORITY

DATE:

PROPOSED SELF-STORAGE FACILITY
300 HARTFORD AVENUE
BELLINGHAM, MA

JMRD2, LLC
665 CHURCH STREET
WHITINSVILLE, MA 01588

REVISIONS		
NO.	DATE	DESCRIPTION
1	3/26/18	PROVIDED SEPARATE EGRESS PER TOWN
2	6/5/18	PER TOWN & PEER REVIEW COMMENTS
3	6/22/18	PER TOWN & PEER REVIEW COMMENTS

CAD FILE	...\\dwg\2017-235_SP-R3.dwg
DRAWN BY	TRB, SJO
CHECKED BY	BJA, RMM
DATE	FEBRUARY 12, 2018
PROJECT NO.	2017-235

SHEET TITLE

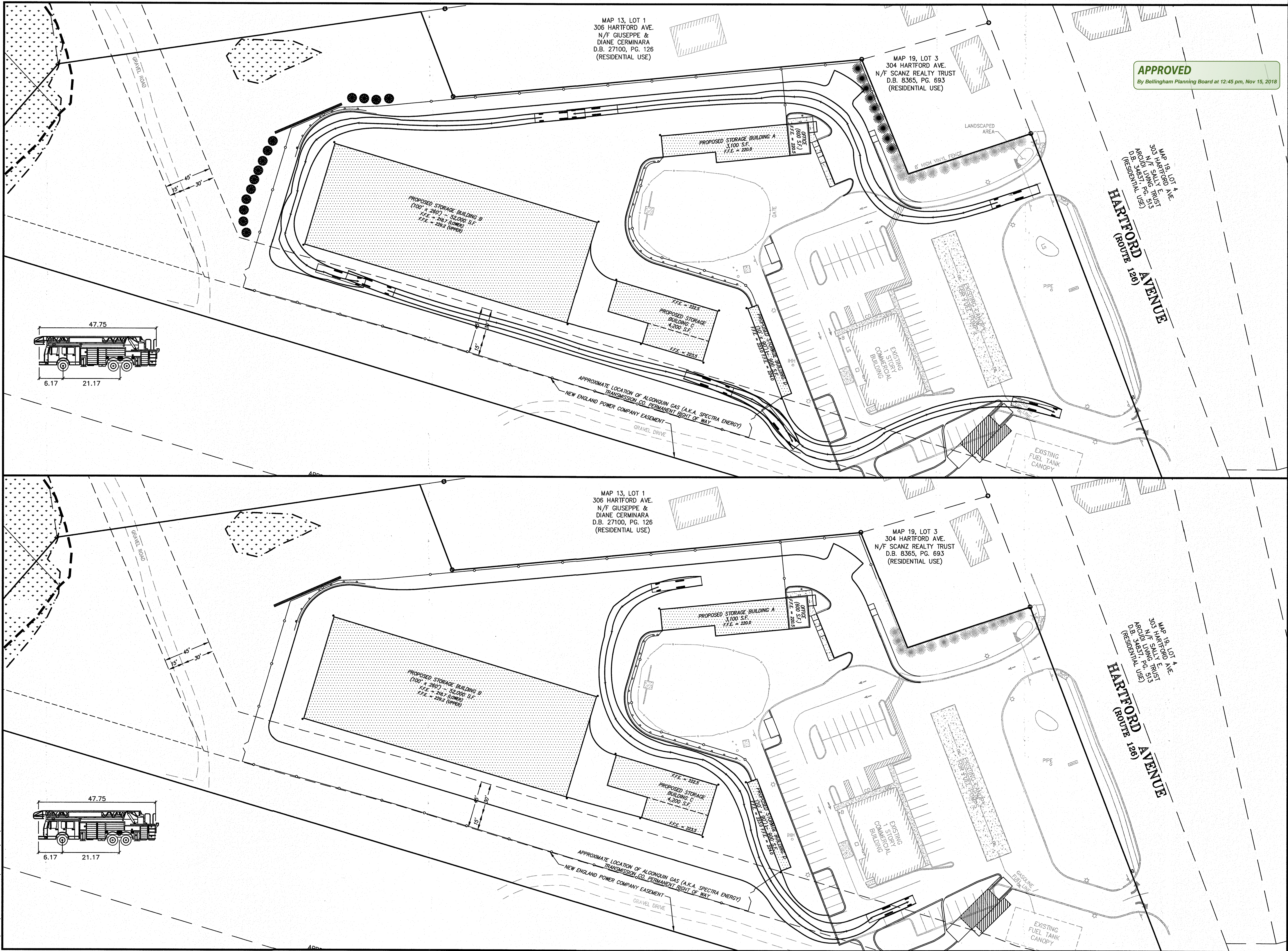
EROSION & SEDIMENT
CONTROL NOTES
& DETAILS



DRAWING NO.

C-8.2

PLAN NO. L-5443



ASE

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500 East Washington Street
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P: 508-316-0452 F: 508-316-0963

- NOTES:**
1. FIRE TRUCK DIMENSIONS, TURNING RADII AND SPECIFICATIONS PROVIDED BY THE TOWN OF BELLINGHAM.
 2. AUTOTURN SOFTWARE WAS UTILIZED TO PROVIDE PATH ANALYSIS AND TURN SIMULATION.

PROPOSED SELF-STORAGE FACILITY
300 HARTFORD AVENUE
BELLINGHAM, MA

JMRD2, LLC
665 CHURCH STREET
WHITINSVILLE, MA 01588

PROJECT:

APPLICANT:

REVISIONS

NO.	DATE	DESCRIPTION
1	3/26/18	PROVIDED SEPARATE EGRESS PER TOWN
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3	6/22/18	PER TOWN & PEER REVIEW COMMENTS

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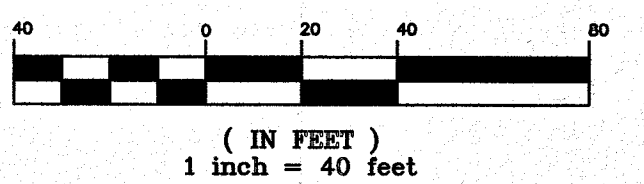
DRAWN BY: TRB, SJO

CHECKED BY: BJA, RMM

DATE: FEBRUARY 12, 2018

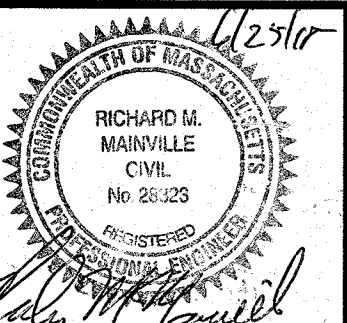
PROJECT NO.: 2017-235

GRAPHIC SCALE



SHEET TITLE

FIRE ACCESS
EXHIBIT PLAN



DRAWING NO.

C-9.0