(401) 783-3370 Fax (401) 783-2069

PUBLIC NOTICE

File Number:	2023-06-125	Date:	October 2, 2023
This office has	under consideration the application of:		
	City of East Pro 145 Taunton		

East Providence, RI 02914

for a State of Rhode Island Assent to construct and maintain: Repair and add protection to the existing eroded bluff located at 0 Bluff Avenue. Work includes installing geotextile reinforced mechanically stabilized earth slope (MSE) with dimensions of 2:1 (horizontal to vertical). The MSE slope will present as a natural slope (i.e., no manmade structure will be visible) The design allows for implementing native vegetation combined with coir logs, jute mat reinforcement, will satisfy slope stability requirements, will restore the toe of the slope to its approximate historic position, and will provide the desired protection for Booth Avenue and its utilities.

Also interlocking concrete blocks will be installed to provide erosion protection and additional habitat for marine fauna (a constructed marsh with an artificial sill to reduce potential future erosion). Other features include an infiltrating Best Management Practice (BMP) for stormwater management and the installation of a "pocket" park.

A special exception is required for the construction of the shoreline protection along a Type 1 shoreline per RICMRP 1.3.1.G.3(a) (Shoreline Protection, Prohibitions).

Project Location:	Booth Avenue
City/Town:	East Providence
Plat/Lot:	13 / 9
Waterway:	Bullocks Cove

Plans of the proposed work can be requested at Cstaffl@crmc.ri.gov.

In accordance with the Administrative Procedures Act (Chapter 42-35 of the Rhode Island General Laws) you may request a hearing on this matter.

You are advised that if you have good reason to enter protests against the proposed work it is your privilege to do so. It is expected that objectors will review the application and plans thoroughly, visit site of proposed work if necessary, to familiarize themselves with the conditions and cite what law or laws, if any, would in their opinion be violated by the work proposed.

If you desire to protest, you must attend the scheduled hearing and give sworn testimony. A
notice of the time and place of such hearing will be furnished you as soon as possible after receipt of
your request for hearing. If you desire to request a hearing, to receive consideration, it should be in
writing (with your correct mailing address, e-mail address and valid contact number) and be
received at this office on or before November 2, 2023.

Please email your comments/hearing requests to: cstaffl@crmc.ri.gov; or mail via USPS to: Coastal Resources Management Council; O. S. Government Center, 4808 Tower Hill Road, Rm 116; Wakefield, RI 02879.

/lat

BID SET No.

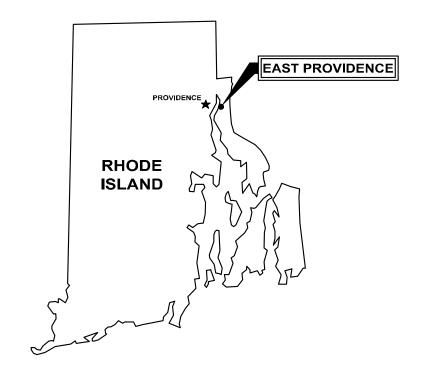
CITY OF EAST PROVIDENCE, RHODE ISLAND

CONTRACT DRAWINGS FOR

BOOTH AVENUE SLOPE STABILIZATION

JUNE 2023

RICRMC PERMIT SUBMISSION



DRAWING INDEX

GENERAL	
	COVER SHEET
CIVIL	
C-1	GENERAL NOTES, LEGEND, ABBREVIATIONS
C-2	SITE PLAN AND PROFILE
C-3	SECTIONS I
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C-5	DETAILS I
C-6	DETAILS II
C-7	LANDSCAPE PLAN
C-8	EROSION CONTROL NOTES AND DETAILS



LOCATION PLAN



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RECEIVED	4 0426	
6/23/2023	11.0150	www.wright-pierce.com

MANAGEMENT COUNCIL

FOR REVIEW June 2023

FOR BIDDING

WP PROJECT No. 13981

VINGS\CIV\13981-CS-GEN.DWG | 13981-CS-Gen | 1:10.12364677 | ---- | 6/6/2023 10:39:02 AM | DERICK.HOPK

GENERAL NOTES

- THE CITY OF EAST PROVIDENCE WILL BE RESPONSIBLE FOR OBTAINING THE PERMITS LISTED IN THE SUPPLEMENTARY OR SPECIAL CONDITIONS. IT IS THE
 RESPONSIBILITY OF THE CONTRACTOR TO BE FAMILIAR WITH THE APPLICABLE PROVISIONS OF EACH PERMIT AS THEY APPLY TO THE WORK PRIOR TO BIDDING AND
 ABIDE BY THOSE PROVISIONS DURING CONSTRUCTION. COPIES OF ALL OBTAINED PERMITS ARE AVAILABLE FOR REVIEW FROM THE CITY OF EAST PROVIDENCE.
 ALL OTHER PERMITS ARE THE RESPONSIBILITY OF THE CONTRACTOR.
- THE CITY OF EAST PROVIDENCE SHALL BE RESPONSIBLE FOR OBTAINING ALL NECESSARY RIGHTS OF WAY AND EASEMENTS. THE CONTRACTOR SHALL VERIFY THAT
 THE NECESSARY EASEMENTS HAVE BEEN SECURED BY THE CITY OF EAST PROVIDENCE. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO BE FAMILIAR WITH THE
 APPLICABLE PROVISIONS OF EACH EASEMENT AS THEY APPLY TO THE WORK PRIOR TO BIDDING AND ABIDE BY THOSE PROVISIONS DURING CONSTRUCTION.
 COPIES OF ALL RIGHTS OF WAY AND EASEMENTS ARE AVAILABLE FOR REVIEW FROM THE CITY OF EAST PROVIDENCE.
- 3. THE CONTRACTOR IS RESPONSIBLE FOR MAINTAINING TRAFFIC FLOW AT ALL TIMES. CONTRACTOR SHALL INSTALL AND MAINTAIN TRAFFIC CONTROL SIGNS IN ACCORDANCE WITH THE MUTCO AND ALL STATE AND LOCAL REGULATIONS. THE CONTRACTOR IS REQUIRED TO SUBMIT AN APPROVED TRAFFIC CONTROL PLAN PRIOR TO COMMENCING CONSTRUCTION. THE POLICE DEPARTMENT AND FIRE DEPARTMENT ARE TO BE NOTIFIED AT LEAST 24-HOURS IN ADVANCE OF ANY STREET CLOSING OR DETOUR. REFER TO SPECIFICATION SECTION 01570.
- 4. CONTRACTOR SHALL COMPLY WITH ALL APPLICABLE REGULATIONS OF THE OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION (OSHA).
- 5. CONTRACTOR SHALL COMPLY WITH THE COORDINATION REQUIREMENTS AND RELATED COSTS, IF ANY, AS SPECIFIED IN SPECIFICATION SECTION 01050.
- CONTRACTOR SHALL NOTE THAT, IN GENERAL, ALL EXISTING CONDITION INFORMATION ON THE DRAWINGS ARE SHOWN WITH A LIGHTER LINE WEIGHT AND WITH A SLANTED TYPE TEXT
- 7. ALL EXISTING SEWER AND STORM DRAIN LINES ENCOUNTERED DURING CONSTRUCTION ARE TO REMAIN IN SERVICE. ANY EXISTING SEWERS, STORM DRAIN LINES OR CULVERTS DAMAGED DURING CONSTRUCTION SHALL BE REPAIRED BY THE CONTRACTOR AT NO ADDITIONAL COST TO THE CITY OF EAST PROVIDENCE, EXCEPT WHEN IN DIRECT CONFLICT WITH THE NEW WORK OR WHEN NOT SHOWN OR INDICATED.
- ALL STRUCTURES AND PIPELINES LOCATED ADJACENT TO EXCAVATION SHALL BE PROTECTED AND FIRMLY SUPPORTED BY THE CONTRACTOR UNTIL THE
 EXCAVATION IS BACKFILLED. INJURY TO ANY SUCH STRUCTURES CAUSED BY OR RESULTING FROM THE CONTRACTOR'S OPERATIONS SHALL BE REPAIRED AT THE
 CONTRACTOR'S EXPENSE. ALL UTILITIES REQUIRING REPAIR, RELOCATION OR ADJUSTMENT AS A RESULT OF THE PROJECT SHALL BE COORDINATED THROUGH THE
 RESPECTIVE UTILITY.
- 9. IN THOSE INSTANCES WHERE POWER OR TELEPHONE POLE SUPPORT IS REQUIRED, THE CONTRACTOR SHALL PROVIDE A MINIMUM 48-HOUR NOTICE TO THE RESPECTIVE UTILITY POLE OWNER. NO ADDITIONAL PAYMENT WILL BE PROVIDED FOR TEMPORARY BRACING OF UTILITIES.
- ALL TEST PITS SHALL BE EXCAVATED PRIOR TO CONSTRUCTION LAYOUT AND RESULTS REPORTED TO THE ENGINEER FOR REVIEW FOR CONFORMANCE WITH THE PLANS. TEST PITS ARE REQUIRED WHERE SHOWN ON THE DRAWINGS AND AS DIRECTED BY THE ENGINEER. TEST PITS WILL BE DUG AT LEAST 10 CALENDAR DAYS PRIOR TO CONNECTING PROPOSED SEWERS TO EXISTING SEWERS.

EXISTING SITE CONDITIONS

- THE LOCATIONS OF UNDERGROUND UTILITIES AND STRUCTURES, AS SHOWN ON THE DRAWINGS, ARE APPROXIMATE AND MAY NOT BE COMPLETE. NO GUARANTEE IS MADE THAT UTILITIES OR STRUCTURES WILL BE ENCOUNTERED WHERE SHOWN, OR THAT ALL UNDERGROUND UTILITIES AND STRUCTURES ARE SHOWN. ALL LOCATIONS AND SIZES OF EXISTING UTILITIES AND STRUCTURES SHALL BE VERIFIED IN THE FIELD WITH TEST PITS AS REQUIRED PRIOR TO BEGINNING CONSTRUCTION OF NEW FACILITIES OR PIPING THAT MAY BE AFFECTED.
- 11. BELOW GRADE UTILITY INFORMATION IS BASED ON INFORMATION PROVIDED BY EACH UTILITY. LOCATION OF PUBLIC UTILITIES SHOWN IS ONLY APPROXIMATE AND MAY NOT BE COMPLETE. PRIVATE UNDERGROUND UTILITIES SUCH AS, BUT NOT LIMITED TO, SEWER LINES, WATER LINES AND BURIED ELECTRICAL SERVICE ENTRANCES ARE NOT SHOWN. THE CONTRACTOR SHALL ASCERTIAIN THE LOCATION AND SIZE OF EXISTING UTILITIES IN THE FIELD WITH THE RESPECTIVE UTILITY COMPANY REPRESENTATIVE PRIOR TO COMMENCING WORK. REFER TO SPECIFICATION SECTION 01050. TEST PITS, MAY BE REQUIRED. UTILITY CONTACTS ARE AS FOLLOWS:

 ELECTRIC:
 WATER/SEWER/DRAIN:
 TELEPHONE:

 RI ENBERGY
 CITY OF FAST PROVIDENCE PUBLIC WORKS
 VERIZON NEW ENGLAND

 280 MELROSE STREET
 60 COMMERCIAL WAY
 6 BOWDOIN SQURE

 PROVIDENCE RI 02907
 EAST PROVIDENCE, RI
 BOSTON, MA 02114

 (401)-784-7331
 (401)-435-7701
 (857)-415-5161

DIG SAFE: GAS:
DIG SAFE SYSTEM, INC. RI ENERGY
11 UPTON DRIVE 280 MELROSE STREET
WILMINGTON, MA 0188 PROVIDENCE, RI
B11 OR 1-(888)-344-7233 1-800-870-1664

THERE ARE NO KNOWN HAZARDOUS ENVIRONMENTAL CONDITIONS WITHIN THE AREA OF WORK. REFER TO SPECIFICATION SECTION 00800-SC-5.306. IF THE
PRESENCE OF HAZARDOUS ENVIRONMENTAL CONDITIONS ARE DISCOVERED, THE CONTRACTOR SHALL NOTIFY THE CITY OF EAST PROVIDENCE AND THE ENGINEER
IMMEDIATELY. ALL ACTIVITIES, HANDLING AND DISPOSAL OF HAZARDOUS ENVIRONMENTAL CONDITIONS AND MATERIALS SHALL BE IN ACCORDANCE WITH OSHA,
FEDRAL, STATE, AND LOCAL REGULATIONS.

SITE DEMOLITION

- 1. REFER TO THE EXISTING SITE PLAN, FOR ADDITIONAL INFORMATION REGARDING EXISTING SITE. REFER TO THE LAYOUT DRAWING FOR LIMITS OF WORK.
- $2. \quad \text{REFER TO SPECIFICATION SECTION 01010B, WHICH CONTAINS INFORMATION ON CONSTRAINTS OF CONSTRUCTION SEQUENCING.} \\$
- 3. THE CONTRACTOR SHALL BE RESPONSIBLE FOR REMOVING AND DISPOSING OF ALL DEMOLISHED PIPING, EQUIPMENT AND MATERIALS. DISPOSAL SHALL BE IN ACCORDANCE WITH ALL STATE AND LOCAL REGULATIONS. THE CITY OF EAST PROVIDENCE RESERVES THE RIGHT TO RETAIN ANY SUCH PIPING, EQUIPMENT AND MATERIALS DESIGNATED FOR DEMOLITION. SUCH MATERIALS TO BE RETAINED SHALL BE PROPERLY STORED IN AN ON-SITE LOCATION. COORDINATE LOCATION AND MATERIALS DESIGNATED FOR MY AGENT OF FAST PROVIDENCE /ENCIMERE. REFER TO SPECIFICATION SECTION 07050A
- 4. THE CONTRACTOR SHALL KEEP A RECORD OF DEMOLITION AS PART OF THE PROJECT RECORD DOCUMENTS IN ACCORDANCE WITH SPECIFICATION SECTION 01720.
- 5. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE APPROPRIATE DISPOSAL OF FLOWS RESULTING FROM PRECIPITATION AND GROUNDWATER DEWATERING OPERATIONS.

SITE CLEARING, GRUBBING AND GRADING

- STRIPPING OF TOPSOIL (LOAM) SHALL BE IN ACCORDANCE WITH SPECIFICATION SECTION 02115. REFER TO THE LAYOUT AND GRADING DRAWINGS FOR LIMIT OF WORK AND STRIPPING.
- CONTRACTOR SHALL MINIMIZE CLEARING OPERATIONS. CLEARING AND GRUBBING SHALL BE IN ACCORDANCE WITH SPECIFICATION SECTION 02110. CLEARING
 LIMITS SHALL BE AS INDICATED ON THE DRAWINGS, BUT AT ALL TIMES WITHIN EXISTING ROAD RIGHTS OF WAY AND PROPERTY LINES. ALL CLEARING AND
 GRUBBING MATERIAL SHALL BE THE PROPERTY OF THE CONTRACTOR AND SHALL BE DISPOSED OF AT A SITE PROVIDED BY THE CONTRACTOR IN COMPLIANCE WITH
 ALL STATE AND LOCAL LAWS.
- 3. CONTRACTOR SHALL PROVIDE PROPER EROSION CONTROL AND DRAINAGE MEASURES IN ALL AREAS OF WORK, AND CONFINE SOIL SEDIMENT TO WITHIN THE LIMITS OF EXCAVATION AND GRADING. PRIOR TO BEGINNING EXCAVATION WORK, EROSION CONTROL FENCE SHALL BE INSTALLED AT THE DOWN GRADIENT PERIMETER OF THE ACTUAL LIMITS OF GRUBBING AND/OR GRADING, AND AS SHOWN ON THE DRAWINGS. PRIOR TO THE START OF ANY WORK THE CONTRACTOR SHALL INSTALL AN TURBINIST CURTAIN, IN THE WATER, A THE BASE OF ANY DISTURBED SLOPES. EROSION CONTROL MEASURES SHOWN ON THE DRAWINGS ARE A MINIMUM, CONTRACTOR SHALL TAKE ALL OTHER NECESSARY MEASURES. EROSION CONTROL FENCE SHALL ALSO BE INSTALLED AT THE DOWN GRADIENT PERIMETER OF THE TOPOSIOL STOCKPHES. ALL DISTURBED EARTH SURFACES SHALL BE STABILIZED FRACTICAL TIME AND TEMPORARY EROSION CONTROL DEVICES SHALL BE EMPLOYED UNTIL SUCH TIME AS ADEQUATE SOIL STABILIZATION HAS BEEN ACHIEVED. TEMPORARY STORAGE OF EXCAVATED MATERIAL SHALL BE STABILIZED IN A MANNER THAT WILL MINIMIZE EROSION. ALL INSTALLED EROSION CONTROL FACILITIES SHALL BE REMOVED AT THE END OF THE PROJECT. REFER TO SPECIFICATION SECTION 02270.
- 4. BORING LOGS FOR THE PROJECT SITE ARE INCLUDED IN APPENDIX A OF THE SPECIFICATIONS. THESE ARE PROVIDED FOR INFORMATION PURPOSES ONLY. PLEASE NOTE THAT THE SOIL DESCRIPTIONS PROVIDED ON THE BORING LOGS. ON OOT ERPRESTED FIELD CONDITIONS OTHER THAN AT THE SPECIFIC TEST BORING LOCATION. THE CONDITIONS BETWEEN BORING LOCATIONS MAY VARY FROM THOSE SHOWN OF THE TEST BORING LOGS.
- 5. CONTRACTOR SHALL CONTROL DUST ON THE CONSTRUCTION SITE TO A REASONABLE LIMIT, AS DETERMINED BY THE ENGINEER, AND AS OUTLINED IN SPECIFICATION SECTION 01562.
- 6. CONTRACTOR SHALL NOT TRACK OR SPILL EARTH, DEBRIS OR OTHER CONSTRUCTION MATERIAL ON PUBLIC OR PRIVATE STREETS AND PLANT DRIVES. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE IMMEDIATE ASSOCIATED CLEAN UP.
- THE CONTRACTOR SHALL NOT HAVE ANY RIGHT OF PROPERTY IN ANY MATERIALS TAKEN FROM ANY EXCAVATION. SUITABLE EXCAVATED MATERIAL MAY BE INCORPORATED IN THE PROJECT, WITH EXCESS MATERIAL DISPOSED OF AT A LOCATION PROVIDED BY THE CONTRACTOR. THESE PROVISIONS SHALL IN NO WAY RELIEVE THE CONTRACTOR OF OBLIGATIONS TO PROPERLY DISPOSE OF AND REPLACE ANY MATERIAL DETERMINED BY THE ENGINEER TO BE UNSUITABLE FOR BACKFILLING. THE CONTRACTOR SHALL DISPOSE OF UNSUITABLE AND EXCESS MATERIAL IN ACCORDANCE WITH THE APPLICABLE SECTIONS OF THE CONTRACT DOCUMENTS.
- 8. CONTRACTOR SHALL REMOVE AND REPLACE, OR REPAIR, ALL CURBS, SIDEWALKS, PAVEMENT AND OTHER ITEMS DAMAGED BY CONSTRUCTION ACTIVITIES TO AT

LEAST THEIR ORIGINAL CONDITION, TO THE SATISFACTION OF THE CITY OF EAST PROVIDENCE AND ENGINEER

- 9. WHERE EXISTING PAVEMENT IS REMOVED AND REPLACED, MATCH EXISTING GRADES TO THE EXTENT POSSIBLE. COORDINATE FINE GRADING WITH THE ENGINEER.
- ALL NON-ROADWAY AREAS THAT ARE EXCAVATED, FILLED, OR OTHERWISE DISTURBED BY THE CONTRACTOR SHALL BE LOAMED, GRADED, LIMED, FERTILIZED, SEEDED AND MULCHED, UNLESS OTHERWISE NOTED. THE TOP 4-INCHES OF SOIL SHALL BE LOAM. REFER TO SPECIFICATION SECTION 02485, LANDSCAPING/LOAM AND SEED.

CIVIL SITE LAYOUT

- . THE CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTAINING THIS PROVIDED LAYOUT INFORMATION THROUGHOUT THE COURSE OF CONSTRUCTION. REPORT ANY LAYOUT DISCREPANCIES IMMEDIATELY TO THE ENGINEER.
- 2. REFER TO CIVIL PLAN SHEETS FOR ADDITIONAL LAYOUT INFORMATION.
- 3. THE LOCATIONS AND LIMITS OF ALL ON-SITE WORK AND STORAGE AREAS SHALL BE REVIEWED/COORDINATED WITH, AND ACCEPTABLE TO, THE CITY OF EAST PROVIDENCE AND ENGINEER. THE CONTRACTOR SHALL LIMIT ACTIVITIES TO THESE AREAS.
- 4. THE CONTRACTOR SHALL BE RESPONSIBLE FOR RE-ESTABLISHING AND RESETTING ALL EXISTING PROPERTY MONUMENTATION DISTURBED BY CONSTRUCTION THIS WORK SHALL BE DONE BY A LAND SURVEYOR REGISTERED IN THE STATE OR RHODE ISLAND AT NO ADDITIONAL COST TO THE CITY OF EAST PROVIDENCE.
- 5. WRITTEN DIMENSIONS SHALL PREVAIL. DO NOT SCALE DISTANCES FROM THE DRAWINGS. REPORT ANY DISCREPANCIES IMMEDIATELY TO THE ENGINEER.
- 6. ALL ELEVATIONS REFER TO THE NAVD88 DATUM. ORIENTATION IS GRID NORTH ON THE RHODE ISLAND STATE PLANE COORDINATE SYSTEM. CONTRACTOR SHALL VERIFY ELEVATIONS PRIOR TO USING IN CONSTRUCTION.
- 7. EXISTING CONDITIONS SITE PLAN DEVELOPED FROM SURVEY PERFORMED BY WATERMAN ENGINEERING COMPANY, DATED 09/18/2018, AND EXISTING RECORD DRAWING INFORMATION. ELEVATIONS AND LOCATIONS ARE APPROXIMATE AND SHALL BE CONFIRMED IN THE FIELD

CIVIL SITE PIPING

- ALL BURIED CONNECTIONS TO STRUCTURES SHALL HAVE SLEEVE TYPE FLEXIBLE CONNECTIONS APPROXIMATELY 4-FEET FROM THE STRUCTURES. ALL SLEEVE TYPE
 COUPLINGS ON PRESSURE LINES SHALL BE RESTRAINED (SOLID SLEEVE). REFER TO SPECIFICATION SECTION 02655.
- 2. MANHOLES ARE 4-FEET IN DIAMETER UNLESS OTHERWISE NOTED. THE TOP OF MANHOLE FRAMES SHALL BE SET FLUSH WITH FINISH GRADE, UNLESS OTHERWISE NOTED ON DRAWINGS. SEWER MANHOLE INVERTS SHOWN ON THE DRAWINGS ARE TO THE INSIDE FACE OF THE MANHOLE.
- 3. CONTRACTOR SHALL RE-SHAPE INVERTS AS REQUIRED WHEN CONNECTING INTO EXISTING MANHOLES.
- 4. REFER TO SPECIFICATION SECTION 02200 FOR PIPE AND STRUCTURE BEDDING AND BACKFILL REQUIREMENTS
- COMPACTION TESTS WILL BE PERFORMED IN ACCORDANCE WITH SPECIFICATION SECTION 02200. ANY SETTLEMENT OCCURRING WITHIN ONE-YEAR OF FINAL COMPLETION OF THE WORK SHALL BE CORRECTED BY THE CONTRACTOR AT NO ADDITIONAL COST.
- ALL EXISTING UTILITIES ENCOUNTERED DURING CONSTRUCTION ARE TO REMAIN IN SERVICE UNLESS OTHERWISE NOTED ON THE CIVIL EXISTING CONDITIONS AND DEMOLITION PLAN. ANY EXISTING UTILITIES DAMAGED DURING CONSTRUCTION SHALL BE REPAIRED BY THE CONTRACTOR AT NO ADDITIONAL COST TO THE CITY OF EAST PROVIDENCE.
- 7. CONTRACTOR SHALL BE RESPONSIBLE FOR REMOVAL AND DISPOSAL OF ALL DEMOLITION MATERIALS IN ACCORDANCE WITH SPECIFICATION SECTION 02050.

MHHW	2.37 —					
MHW			DHQ	0.25	Τ	
NAVD 88 MSL	0.00 —		DTL	-0.05	GT 4.84	
MLW	-2.29 —		DLQ	0.18		
MLLW	-2.47 -		DLQ	0.10		

DATUMS FOR 8454000, PROVIDENCE, RI. ALL ELEVATIONS RELATIVE TO NAVD 88

LEGEND CIVIL ABBREVIATIONS EXISTING PROPOSED PROPERTY/ROW LINE DIAMETER Ø, DIA #, NO SETBACK LINE NUMBER _ . _ . _ . _ FASEMENT LINE APP'D APPROVED CENTERI INF BRICK EDGE OF PAVEMENT BUILDING CURBING CATCH BASIN EDGE OF GRAVEL CEN CENTER CUBIC FEET PER SECONE EDGE OF CONCRETE ... + 1½+ ,14 + **4**1 CAST IRON ---122----(123)--- CONTOUR CENTERLINE BUILDING CORRUGATED METAL PIPE CLEANOUT 000000000 STONEWALL 000000000 CONCRETE $\sim\sim\sim$ TREELINE $\sim\sim\sim$ COR CORNER CHAIN LINK FENCE CUBIC YARD DEMOLITION STOCKADE FENCE DMH DRAIN MANHOLE BARB WIRE FENCE DUCTILE IRON RETAINING WALL DWG DRAWING GUARDRAIL ELEVATION SEWER ELECTRIC MANHOLE __4<u>"FM</u> ___ _ SEWER FORCE MAIN FΜ FORCE MAIN 4" GAS 8"... WATER HDPF HIGH DENSITY POLYETHYLENE 15" STORM DRAIN RELINED PIPE INVERT = = 12" CMP CULVERT --12" CMP POUNDS UNDERGROUND ELECTRIC — we LINEAR FOOT MAXIMUM OVERHEAD FLECTRIC -----MANHOLE — UNDERGROUND TELEPHONE ————— MINIMIM UNDERGROUND CABLE TV -IRON PIPE/REBAR NGVD NATIONAL GEODETIC VERTICAL DATUM NOT AVAILABLE/APPLICABLE DRILLHOLE NOT TO SCALE MONUMENT OUTSIDE DIAMETER SURVEY CONTROL POINT POUNDS PER SQUARE FOOT 134.5 SPOT ELEVATION POUNDS PER SQUARE INCH POINT OF TANGENCY **■**SMH SEWER MANHOLE DRAINAGE MANHOLE DMH REINFORCED CONCRETE PIPE REQUIRED CATCH BASIN ●CB ■ CB SLOPE, SEWER ELECTRIC MANHOLE EMH STORM DRAIN TELEPHONE MANHOLE QUARE FEET SHUTOFF VALVE SANITARY SEWER MANHOLE \bowtie SOUARE WATER SERVICE SHUTOFF STATION YARD HYDRANT TEMPORARY BENCH MARK TBM TOP OF STRUCTURE HYDRANT TYPICAL GAS SERVICE SHUTOFF UNDERDRAIN GAS GATE VALVE G UTILITY POLE UGE UNDERGROUND ELECTRIC VITRIFIED CLAY UTILITY POLE W/ GUY UTILITY POLE W/ LIGHT POTABLE WATER LIGHT POLE BOLLARD 0~ FLAGPOLE CONIFEROUS TREE 7/1/2 E DECIDUOUS TREE SHRUB € WETLAND FLAG EDGE OF WATER STREAM -----EDGE OF WETLANDS FLOODPLAIN WETI ANDS DRAINAGE FLOW \Rightarrow DRAINAGE SWALE **→** & PAVEMENT MARKINGS MAILBOX TEMPORARY BENCH MARK TEST PIT TEST BORING TEST PROBE MONITORING WELL LIMIT OF WORK SILT FENCE DADADA RIPRAP **TATATAT** RAILROAD MATCHLINE ROCK OUTCROP

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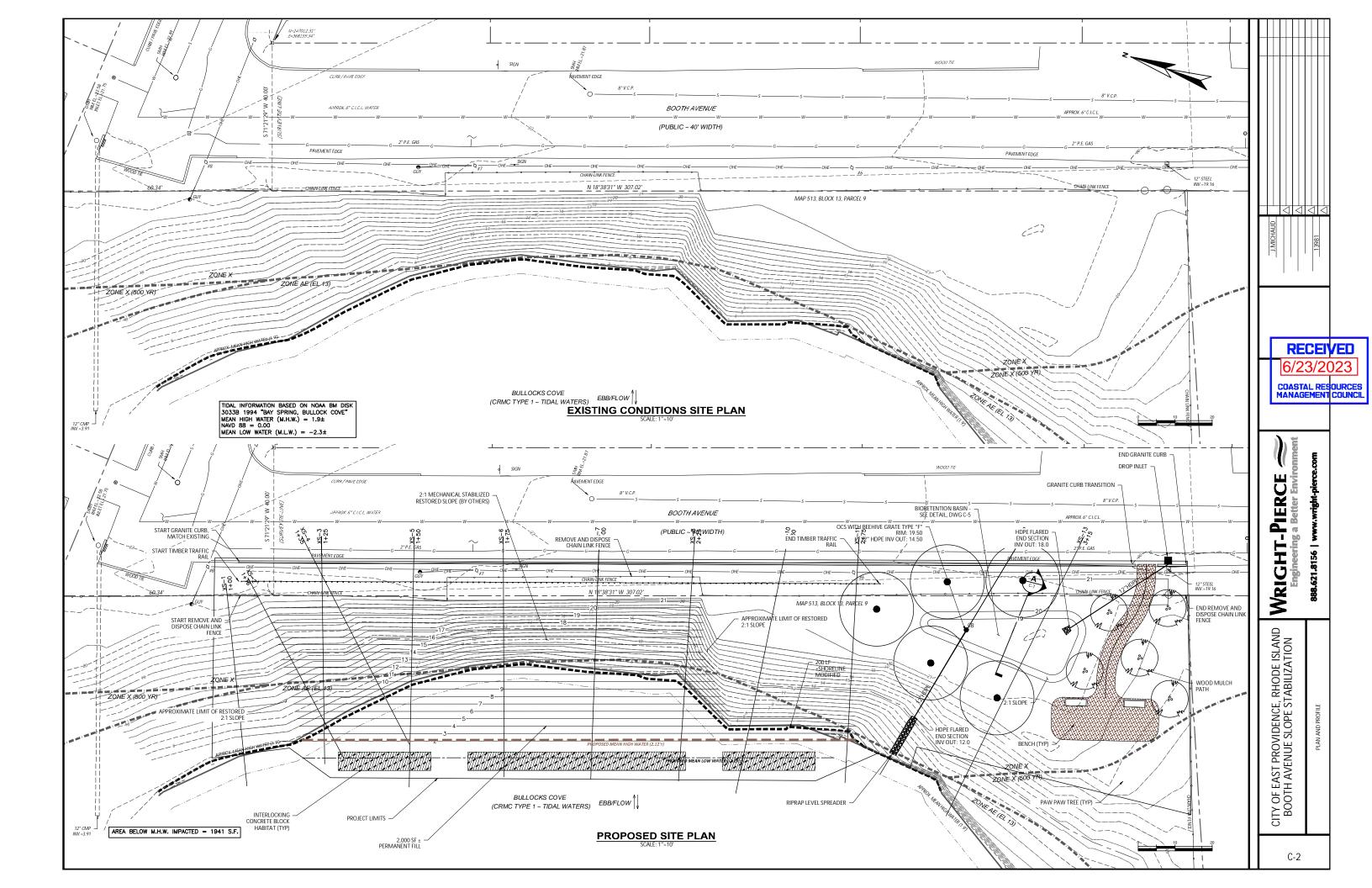
TIDAL INFORMATION BASED ON NOAA BM DISK 3033B 1994

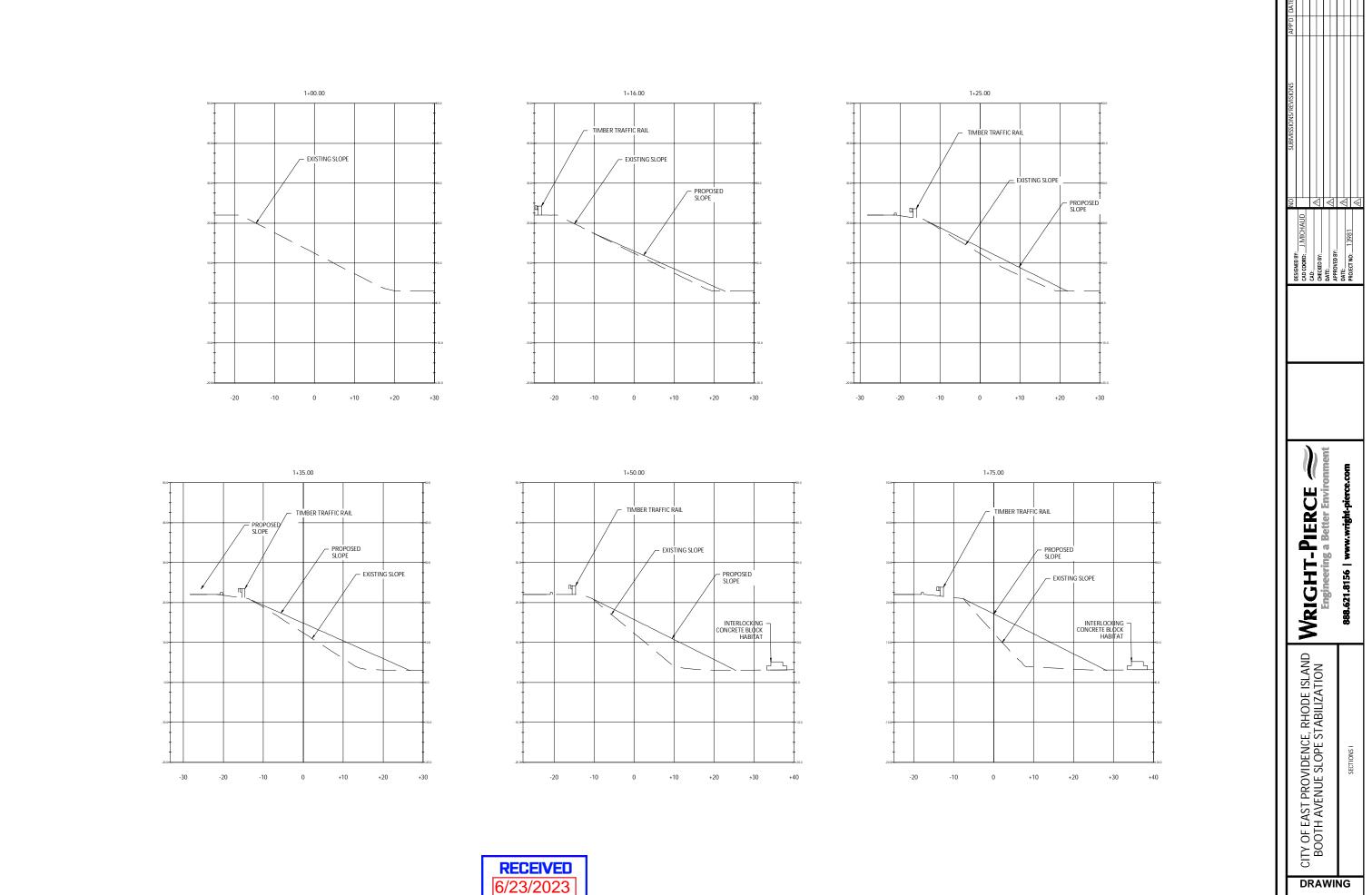
MEAN HIGH WATER (M.H.W.) = 1.9

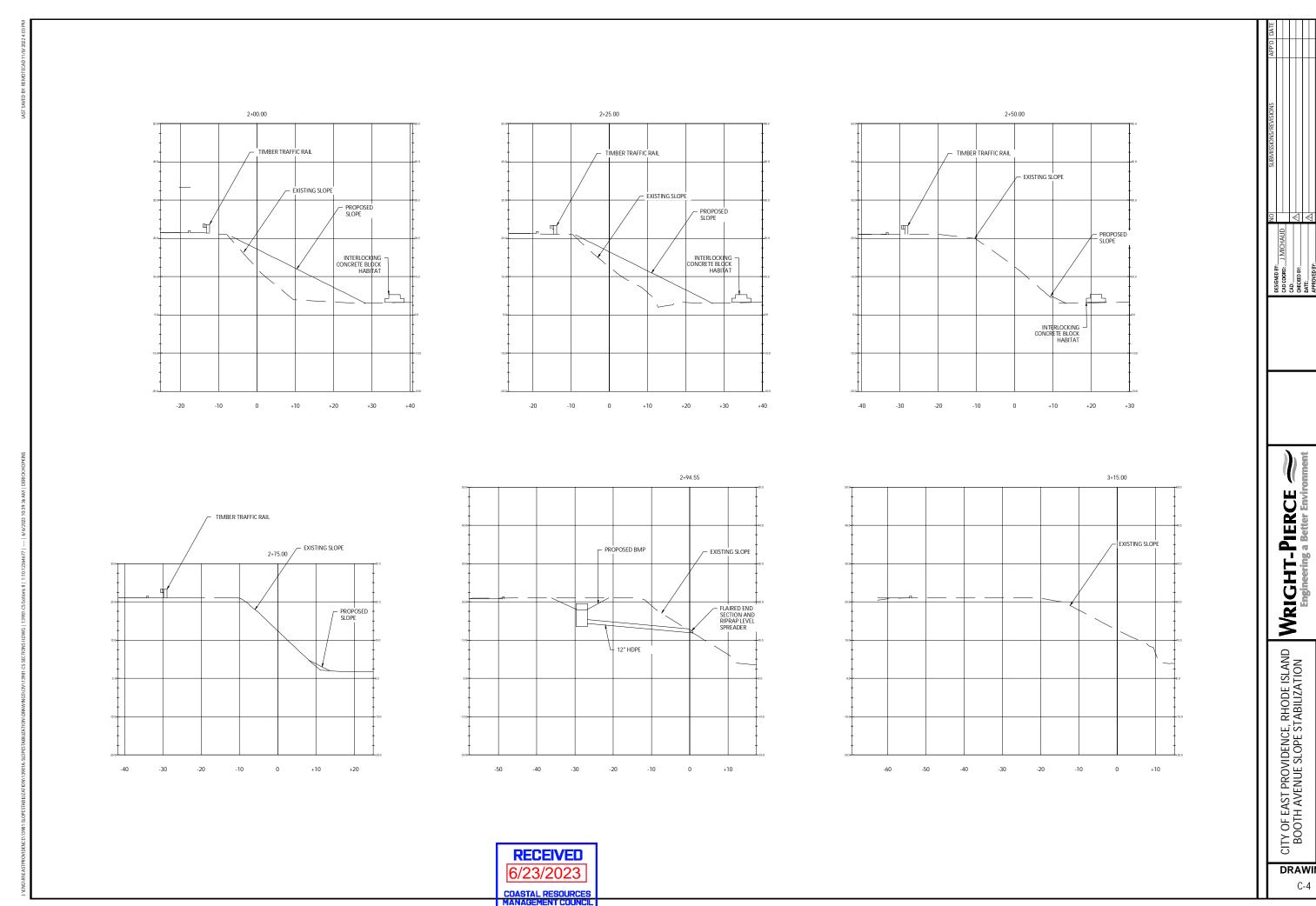
MEAN LOW WATER (M.L.W.) = -2.3

BAY SPRING BUILLOCK COVE

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6/23/2023
COASTAL RESOURCES
MANAGEMENT COUNCIL

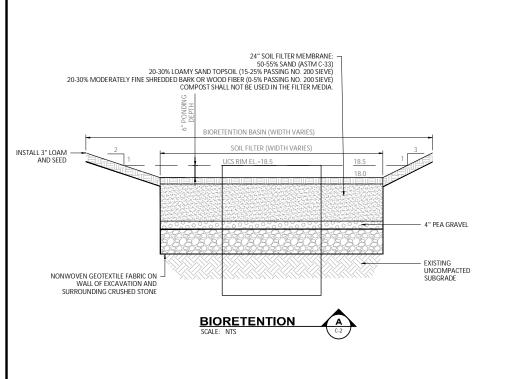






CITY OF EAST PROVIDENCE, RHODE ISLAND BOOTH AVENUE SLOPE STABILIZATION DRAWING

888.621.8156 | www.wright-pierce.com



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PLATE WASHER DETAIL

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STEEL SPLICE PLATE DETAIL

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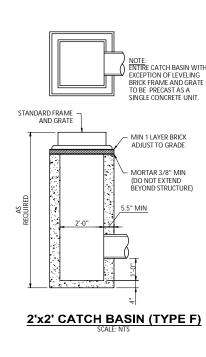
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2. A. SPALTING, STANDARD WIN METERS HER DESCRIPTION OF A STANDARD DESCRIPTION.

BHOOK SLAND DEPARTMENT OF TRANSPORTATION STEEL BACKED TIMBER GUARDRAIL

100,00





FRONT VIEW

PIPE DIAMETER (in)

HDPE FLARED END SECTION

18.0

7.5

15.0

6.5

32.0

35.0

DIAMETER

A (in)

B(max)

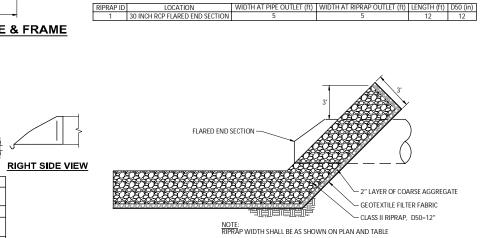
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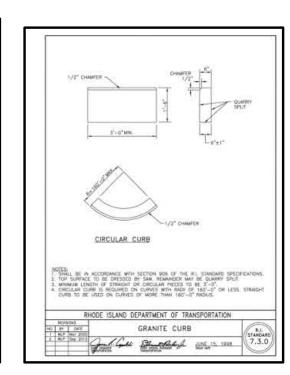
W (in)

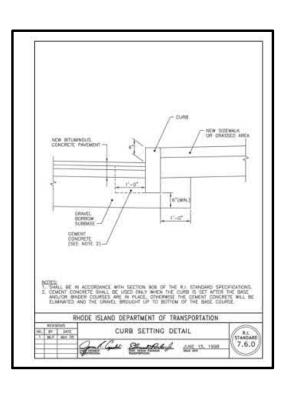
TOP VIEW

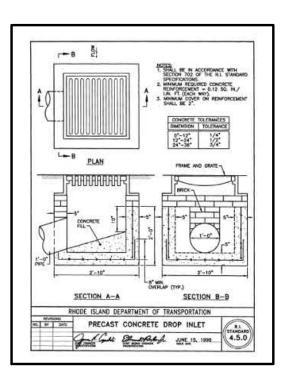


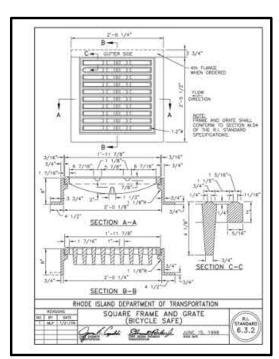
RIPRAP STABILIZATION TABLE

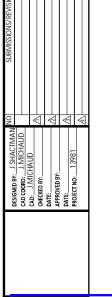
PIPE LEVEL SPREADER OUTLET w/FLARED END









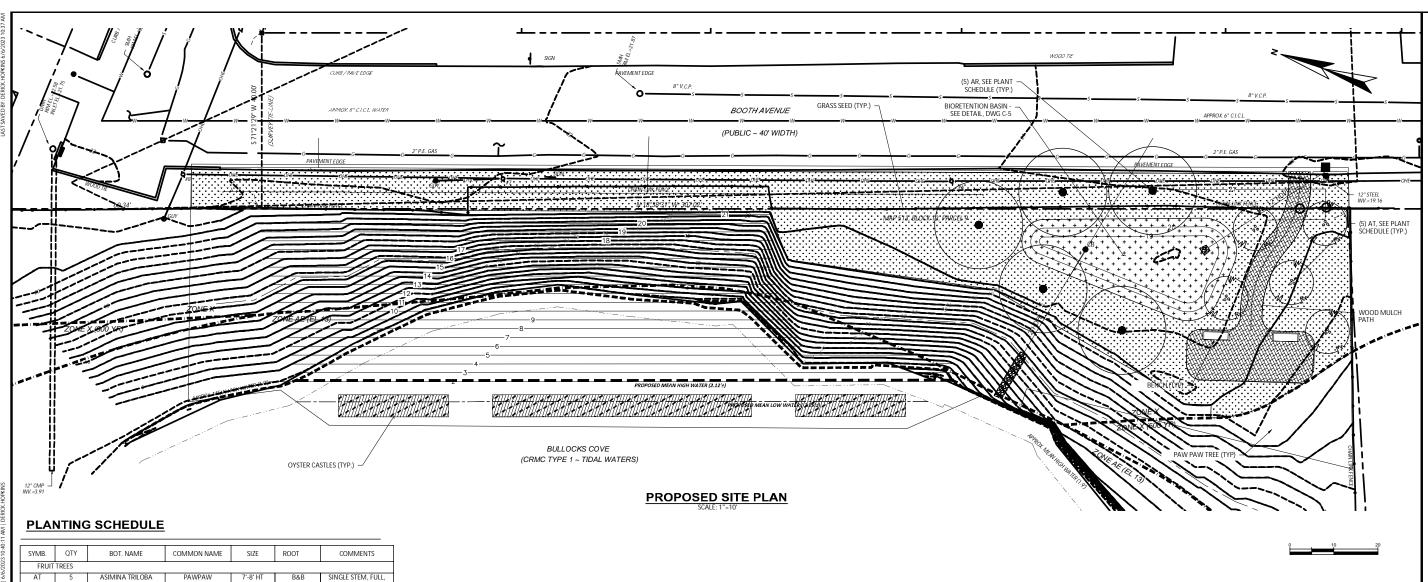


RECEIVED COASTAL RESOURCES MANAGEMENT COUNCIL

WRIGHT-PIERCE Envir 888.621.8156 | ww

CITY OF EAST PROVIDENCE, RHODE ISLAND BOOTH AVENUE SLOPE STABILIZATION

DRAWING



SYMB.	QTY	BOT. NAME	COMMON NAME	SIZE	ROOT	COMMENTS	
FRUITTREES							
AT	5	ASIMINA TRILOBA	PAWPAW	7'-8' HT	B&B	SINGLE STEM, FULL, HEAVY, MATCHED	
DECIDUOUS TREES							
AR	5	ACER RUBRUM	RED MAPLE	2 1/2"-3" CAL.	B&B	SINGLE STEM, FULL, HEAVY, MATCHED	
BRUSH BRANCHES FOR SLOPE STABILIZATION							
	200	CEPHALANTHUS OCCIDENTALIS	BUTTONBUSH	3' BRANCH	BARE ROOT	PLANT IN FALL, 3' O.C.	
	200	SALIX DISCOLOR	PUSSY WILLOW	3' BRANCH	BARE ROOT	PLANT IN FALL, 3' O.C.	
	200	VIBURNUM DENTATUM	ARROWWOOD	3' BRANCH	BARE ROOT	PLANT IN FALL, 3' O.C.	
SEED & LOAM							
	800 SF	BIORETENTION SEED MIX	SEE SPECIFICATIONS				
	4,600 SF	GRASS SEED MIX	SEE SPECIFICATIONS				

- ALL NEW PLANT MATERIAL SHALL CONFORM TO THE REQUIREMENTS AS ESTABLISHED BY THE AMERICAN ASSOCIATION OF NURSERYMAN, LATEST EDITION. IN ADDITION, ALL NEW PLANT MATERIAL FOR THE PROJECT SHALL BE OF THE HIGHEST SPECIMEN QUALITY.
 SEE SPECIFICATIONS FOR ITEMS NOT COVERED ON THE PLANS AND DETAILS.
 CONTRACTOR SHALL INSPECT SITE PRIOR TO BEGINNING PLANTING OPERATIONS AND NOTIFY THE ENGINEER OF ANY CONDITIONS THAT ARE NOT SUITABLE TO
- PERFORMING PLANTING OPERATIONS. CONTRACTOR SHALL NOTIFY THE ENGINEER OF ANY CONDITIONS THAT WOULD PREVENT HEALTHY GROWTH OF PLANT MATERIAL.
- MATERIAL.

 NO TREES SHALL BE PLANTED BEFORE ACCEPTANCE OF ROUGH GRADING. TREES SHALL BEAR SAME RELATIONSHIP TO FINISH GRADE AS THEY BORE TO PREVIOUS GRADE.

 PLANT GROUPING AND LOCATIONS ARE DIAGRAMMATIC. THE LOCATION OF PLANTS SHALL BE APPROVED IN THE FIELD BY THE LANDSCAPE ARCHITECT. PLANTS INSTALLED PRIOR TO FIELD STAKING OR DIRECTION BY THE LANDSCAPE ARCHITECT SHALL BE REPLACED AS DIRECTED BY THE LANDSCAPE ARCHITECT AT THE CONTRACTOR'S EXPENSE.

 PLANT MATERIAL DELIVERED ON SITE SHALL BE HEALED-IN AT A SHADY LOCATION UNTIL PLANTING AREA IS PREPARED FOR INSTALLATION. ANY PLANTS REMAINING UNPLANTED ON THE SITE FOR MORE THAN 24 HOURS SHALL BE PROTECTED AND MAINTAINED INCLUDING BUT NOT LIMITED TO WATER AND SHADE. DAMAGED OR STRESSED PLANTS SHALL BE REPLACED AT THE CONTRACTOR'S EXPENSE.

 THERE WILL BE NO SUBSTITUTIONS OF PLANT MATERIAL WITHOUT PRIOR WRITTEN APPROVAL BY THE LANDSCAPE ARCHITECT. ANY PROPOSED SUBSTITUTIONS OF PLANT SHALLBE MADDE WITH PLANTS OF EQUIVALENT OVERALL FORM HEIGHT, BRANCHING HABIT, FLOWER, LEAF, COLOR, FRUIT AND CULTURE ONLY AS APPROVED BY THE LANDSCAPE ARCHITECT.

- OF PLANT SPECIES SHALL BE MADE WITH PLANTS OF COUNTALENT OVERALL FORM HEIGHT, BRANCHING HABIT, FLOWER, LEAF, COLOR, FRUIT AND CULTURE ONLY AS A PROVOVED BY THE LANDSCAPE ARCHITECT/ENGINEER.
 THE GENERAL CONTRACTOR SHALL SUPPLY ALL NEW PLANT MATERIAL IN QUANTITIES SUFFICIENT TO COMPLETE THE PLANTING SHOWN ON THE DRAWINGS. THE CONTRACTOR SHALL MAINTAIN ALL PREPARED PLANTING AREAS SPEEF FROM DEBRIS. NO STORAGE OR STOCKPILING SHALL OCCUR ON PLANTING AREAS. THE CONTRACTOR IS TO USE CARE DURING EXCAVATION AND PLANTING TO AVOID DISTURBING OR DAMAGING ANY ADJACENT CONSTRUCTION SUBSURFACE DRAINAGE OR UTILITIES. ANY DAMAGE RESULTING FROM THIS CONSTRUCTION WILL BE THE CONTRACTOR'S RESPONSIBILITY AND SHALL BE RESTORED AT HIS EXPENSE TO THE SATISFACTION OF THE OWNER.
- EXPENSE OF THE SATISFACTION OF THE OWNER.
 STAKE LOCATION OF ALL PROPOSED PLANTING FOR APPROVAL BY THE LANDSCAPE ARCHITECT/ENGINEER PRIOR TO COMMENCEMENT OF PLANTING. THE CONTRACTOR SHALL SUPPLY PLANT MATERIAL IN THE QUANTITIES INDICATED ON THE PLANS. FOR DISCREPANCIES BETWEEN THE PLANS AND THE PLANT
- THE CONTRACTOR SHALL SUPPLY PLANT MATERIAL IN THE QUANTITIES INDICATED ON THE PLANS. FOR DISCREPANCIES BETWEEN THE PLANS AND THE PLANT SCHEDULE, THE PLAN QUANTITIES SHALL PREVAIL.

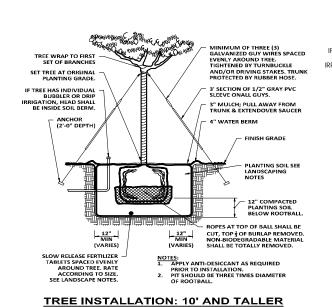
 ALL PLANT MATERIAL IN CONTAINERS SHALL BE WELL ESTABLISHED ROOTED MATERIAL THAT OCCUPIES THE ENTIRE VOLUME OF SPECIFIED CONTAINER.
 PLANTS WITH GIRDLING ROOTS SHALL BE REJECTED. CONTAINER GROWN PLANTS WITH TIGHT ROOT MASSES SHALL BE SCARFIED PRIOR TO PLANTING.
 THE TIRE ROOT FLARE SHALL BE EXPOSED AND PLANTED EVEN WITH THE FINISH GRADE. PREPARE ALL TREE PITS WITH PLANTING SOIL TO A MINIMUM DEPTH MATCHING THE DEPTH OF TREE ROOT BALLS.
- ALL PLANT BEDS ARE TO RECEIVE THREE INCHES (3") OF SHREDDED BARK MULCH AS SPECIFIED. NO SEPARATE PAY ITEM FOR MULCH OR AND/OR FERTILIZER PACKETS. PAID FOR UNDER PLANTING TIEMS.

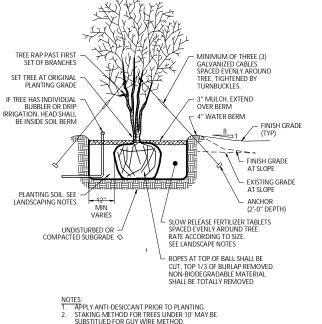
 ALL EXISTING TREES TO REMAIN SHALL BE PROPERLY PROTECTED, PRUNED AND FERTILIZED PER THE SPECIFICATIONS.
- ALL CAISTING THESE TO REDWAIN STALLE FERDERET FROTEIN, PROVIDED AND PER THE SPECIFICATIONS.

 ALL LAWN AREAS DISTURBED BY CONSTRUCTION OPERATIONS INSIDE AND OUTSIDE THE LIMIT OF WORK SHALL BE LOAMED AND SEEDED AS SPECIFIED. ALL

 AREAS TO BE SEEDED SHALL RECEIVE SOIL PREPARATION AS SPECIFIED PRIOR TO SEEDING, UNLESS OTHERWISE NOTED ON PLAN.

 ALL AREAS TO BE SEEDED WITH GRASS SEED MIX SHALL RECEIVE 6" TOPSOIL PRIOR TO SEEDING.





PIT SHOULD BE THREE TIMES DIAMETER OF ROOTBALL

TREE INSTALLATION: MULTI-STEM

COASTAL RESOURCES MANAGEMENT COUNCIL

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TY OF EAST PROVIDENCE, RHODE ISLAND BOOTH AVENUE SLOPE STABILIZATION

DRAWING

