15-0122

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	STP-RESF(297)		1	44

INDEX

INDEX

SHEET NO.	DESCRIPTION
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STATE OF RHODE ISLAND

DEPARTMENT OF TRANSPORTATION

PLAN, PROFILE AND SECTIONS OF PROPOSED

1R HIGHWAY IMPROVEMENTS TO MAIN STREET (RI ROUTE 107)

FROM R.I. ROUTE 100 TO 250 FEET WEST OF UNION AVENUE

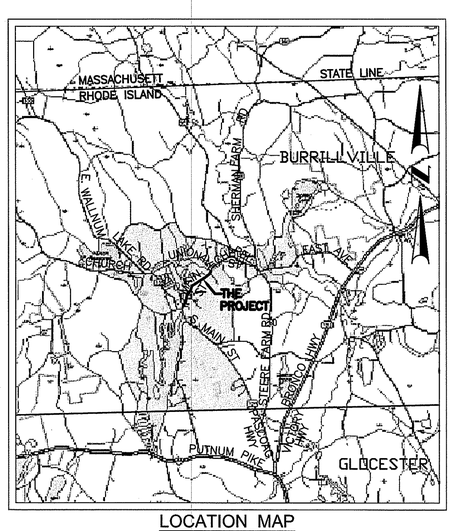
TOWN OF BURRILLVILLE
COUNTY OF PROVIDENCE

R.I. CONTRACT NO. 2015-CH-065 R.I. FEDERAL AID PROJECT NO. STP-RESF(297)

PAVEMENT STRUCTURE

2" CLASS 12.5 DENSE GRADED HOT MIX ASPHALT SURFACE COURSE
4" CLASS 19.0 DENSE GRADED HOT MIX ASPHALT BASE COURSE

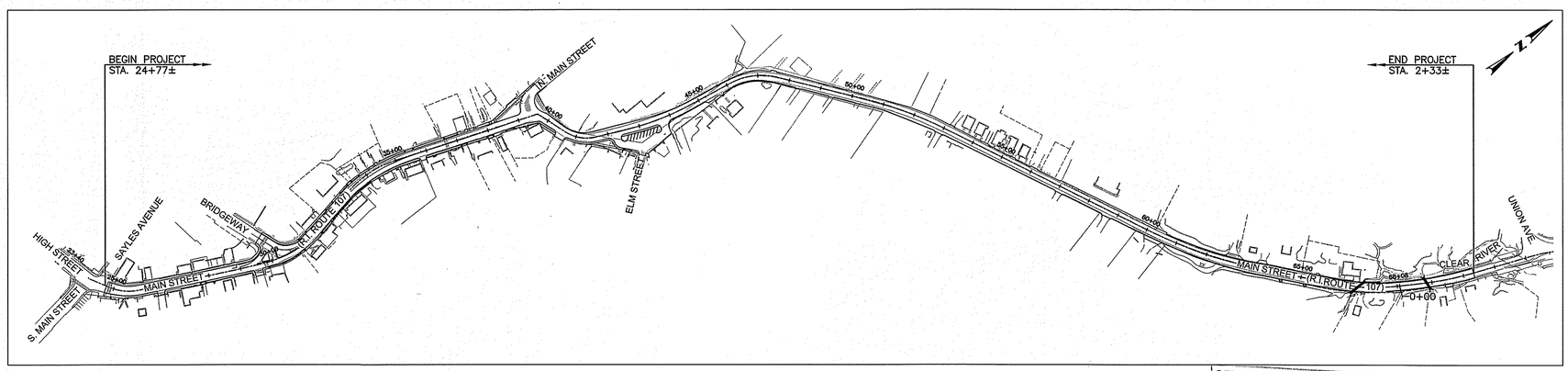
0.86 ± MILES



LOCATION MAP
NOT TO SCALE

DESIGN DESIGNATION (2012)
MAIN STREET

	ONE-WAY	TWO-WAY
AADT	3,900 V.P.D.	7,300 V.P.D.
2032 AADT	4,600 V.P.D.	8,500 V.P.D.
D	0/100	52/48
K	11.3%	8.3%
T	4%	4%
DDHV	380 V.P.H.	320 V.P.H.
DHV	380 V.P.H.	610 V.P.H.
2032 DHV	440 V.P.H.	710 V.P.H.
SPEED LIMIT	25 M.P.H.	25 M.P.H.



LAYOUT PLAN
NOT TO SCALE

SCALES OF DRAWINGS

PLANS 1 INCH = 20 FEET
PROFILES H 1 INCH = 20 FEET
V 1 INCH = 4 FEET

BASE OF LEVELS
NGVD 1929

NAD '83 (1996)

R.I. STANDARD SPECIFICATIONS AND STANDARD DETAILS

SPECIFICATIONS TO GOVERN THIS PROJECT ARE THE R.I. STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, AMENDED AUGUST 2013, WITH ALL REVISIONS, AND THE STATE AND FEDERAL SPECIAL PROVISIONS INCLUDED IN THE CONTRACT DOCUMENTS. STANDARD DETAILS FOR THIS PROJECT ARE R.I. STANDARD DETAILS, 1998 EDITION, WITH ALL REVISIONS.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

Contract Number 2015-CH-065
Number of Sheet 1
Total Sheets 44

RIDEM SUBMISSION
DATE: 8/2015

R.I. DEPARTMENT OF TRANSPORTATION

APPROVED
AUG 21 2015
DEPUTY CHIEF ENGINEER DATE

APPROVED
CHIEF ENGINEER DATE

APPROVED
DIRECTOR DATE

DEPARTMENT OF TRANSPORTATION
FEDERAL HIGHWAY ADMINISTRATION

APPROVED
DIVISION ADMINISTRATOR DATE

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ-(XYZ)		2	44

EXISTING		NEW
	EDGE OF PAVEMENT	
	BERM	
	CURB	
	GUARDRAIL	
MB	MAILBOX	
NO.	UTILITY POLE	NO.
	POLE GUY	GUY
	LUMINARE	
SIGN	SIGN	
(SIZE)SD	SUBDRAIN	N(SIZE)SD
(SIZE)D	STORMDRAIN	(Length → Size)
(SIZE)S	SANITARY SEWER	(Length → Size)
(SIZE)W	WATER MAIN	N(SIZE)W
(SIZE)G	GAS MAIN	N(SIZE)G
(SIZE)T	TELEPHONE DUCT	N-#(SIZE)T
(SIZE)E	ELECTRIC DUCT	N-#(SIZE)E
	PLUG AND CAP PIPE	
	ABANDONED UTILITY	
	FLARED END SECTION	
	HEADWALL	
WG OR GG	WATER OR GAS GATE	
CB	CATCH BASIN	
MH	MANHOLE	
HYD	HYDRANT	
1+00	BASELINE OR CENTERLINE	1+00
EXIST. S.H.L. PLAT NO. XX	STATE HIGHWAY LINE	*NEW S.H.L. PLAT NO. XX*
EXIST. S.F.L. PLAT NO. XX	STATE FREEWAY LINE	*NEW S.F.L. PLAT NO. XX*
EXIST. P.E.B.	PERMANENT EASEMENT LINE	NEW P.E.B.
EXIST. T.E.B.	TEMPORARY EASEMENT LINE	NEW T.E.B.
	PROPERTY LINE	
CITY NAME TOWN NAME	CITY OR TOWN LINE	
PWW	PAVED WATERWAY	
ELEV.	CONTOUR LINE	ELEV
	OPEN DITCH	
R.I.H.B.	R.I. HIGHWAY BOUND	
S.B.	STONE BOUND	
	RETAINING WALL	
	FIELD STONE WALL	
NO.	BORINGS	NO.
TYPE	FENCE	
	WOOD OR BRUSH LINE	
	TREES	
(NAME)	RIVER OR STREAM	
	WETLAND AREA	
NO. TYPE MATERIAL	BUILDING	
	FOUNDATION	
	BUILDING TO BE REMOVED	
	RAILROAD TRACKS	
	CUT AND MATCH	
	RIP-RAP	
	CUT SLOPE	ROADWAY TOP OF SLOPE
	FILL SLOPE	ROADWAY TOE OF SLOPE
	ROCK CUT	ROCK SHELF ROCK CUT
00x00	SPOT GRADE	x00.00
	AREA GRADED TO DRAIN	ELEV. x→
	BALED HAY RI STD 9.1.0	
	BALED HAY & SILT FENCE RI STD. 9.3.0	
123 124 125	EDGE OF WETLAND	
	WETLAND PERIMETER	
ASSF	AREA SUBJECT TO STORM FLOW	
100 YR. FLOOD BOUNDARY	100-YEAR FLOOD PLAIN	
	LIMIT OF DISTURBANCE	LIMIT OF DISTURBANCE
	LIMIT OF CLEARING	LIMIT OF CLEARING

1.1.0		UNDERDRAIN
1.3.0		CONCRETE CONNECTING COLLAR
2.1.0		CONCRETE HEADWALLS FOR PIPE CULVERTS
2.2.0		STANDARD HEADWALLS FOR MULTIPLE 3'-6" TO 7'-0' PIPE CULVERTS
2.3.0	(DIA.)	PRECAST CONCRETE FLARED END SECTION
3.2.0		BRICK/SOLID BLOCK 4'-0" ROUND MANHOLE
3.2.1	(DIA.)	BRICK/SOLID BLOCK 5'-0" OR 6'-0" ROUND MANHOLE
3.3.0		BRICK/SOLID BLOCK TYPE "D" SQUARE CATCH BASIN
3.3.2		BRICK/SOLID BLOCK TYPE "F" SQUARE CATCH BASIN
3.3.3		SOLID BLOCK FLUSH SQUARE CATCH BASIN
3.4.0		BRICK/SOLID BLOCK TYPE "D" ROUND CATCH BASIN
3.4.1		BRICK/SOLID BLOCK ROUND CATCH BASIN WITH GUTTER INLET
3.4.2		BRICK/SOLID BLOCK TYPE "F" ROUND CATCH BASIN
3.4.3		BRICK/SOLID BLOCK TYPE "R" CATCH BASIN
3.4.4		SOLID BLOCK FLUSH ROUND CATCH BASIN
3.4.5	(DIA.)	BRICK/SOLID BLOCK 5'-0" OR 6'-0" ROUND CATCH BASIN
3.5.0		SOLID BLOCK SHALLOW TYPE "F" SQUARE CATCH BASIN
3.5.1	(SIZE)	SOLID BLOCK SHALLOW 5'-0" OR 6'-0" SQUARE CATCH BASIN
3.6.0		BRICK/SOLID BLOCK DROP INLET
3.7.0	(DIA.)	BRICK/SOLID BLOCK ROUND MANHOLE OR CATCH BASIN GREATER THAN 12'-0"
4.2.0		PRECAST 4'-0" ROUND MANHOLE
4.2.1		PRECAST 5'-0" ROUND MANHOLE
4.2.2		PRECAST 6'-0" ROUND MANHOLE
4.3.0	(SIZE)	PRECAST 4'-0" OR 6'-0" SQUARE MANHOLE OR CATCH BASIN
4.4.0	(DIA.)	PRECAST 4'-0", 5'-0", OR 6'-0" ROUND CATCH BASIN
4.5.0		PRECAST CONCRETE DROP INLET
4.5.1		PRECAST CONCRETE DROP INLET LATERAL OUTLET
4.5.2		PRECAST CONCRETE DROP INLET LONGITUDINAL OUTLET
5.3.0		CATCH BASIN AND MANHOLE STEP
5.4.0		CONCRETE COLLARS
6.1.0		LIGHT-DUTY SQUARE FRAME AND ROUND COVER
6.1.1		HEAVY DUTY SQUARE FRAME AND ROUND COVER
6.2.0		LIGHT-DUTY ROUND FRAME AND COVER
6.2.1		HEAVY-DUTY ROUND FRAME AND COVER
6.3.0		SQUARE FRAME AND GRATE
6.3.1		SQUARE FRAME AND GRATE
6.3.2		SQUARE FRAME AND GRATE (BICYCLE SAFE)
6.3.3		HIGH CAPACITY FRAME AND GRATE
6.3.4		HIGH CAPACITY FRAME AND GRATE (BICYCLE SAFE)
6.4.0		ROUND FRAME AND GRATE
7.1.0S		PRECAST CONCRETE CURB (STRAIGHT)
7.1.0C		PRECAST CONCRETE CURB (CIRCULAR)
7.1.1		3'-0' PRECAST CONCRETE TRANSITION CURB
7.1.2		6'-0" PRECAST CONCRETE TRANSITION CURB
7.1.4		PRECAST 2'-0" RADIUS CORNER
7.1.5		PRECAST CONCRETE INLET STONE (FOR SQUARE CATCH BASIN)
7.1.6		PRECAST CONCRETE INLET STONE (FOR ROUND CATCH BASIN)
7.1.7		PRECAST CONCRETE APRON STONE (FOR SQUARE CATCH BASIN)
7.1.8		PRECAST CONCRETE APRON STONE (FOR ROUND CATCH BASIN)
7.2.0S		PRECAST CONCRETE SLOPED FACE CURB (STRAIGHT)
7.2.0C		PRECAST CONCRETE SLOPED FACE CURB (CIRCULAR)
7.2.1		PRECAST CONCRETE SLOPED FACE TRANSITION CURB
7.2.2		PRECAST CONCRETE TRANSITION CURB (VERTICAL FACE TO SPLOPED FACE)
7.3.0S		GRANITE CURB (STRAIGHT)
7.3.0C		GRANITE CURB (CIRCULAR)
7.3.1		3'-0" GRANITE TRANSITION CURB
7.3.2		6'-0" GRANITE TRANSITION CURB
7.3.3		GRANITE WHEELCHAIR RAMP TRANSITION CURB
7.3.4		GRANITE 2'-0" RADIUS CORNER
7.3.5		GRANITE INLET STONE (FOR SQUARE CATCH BASIN)
7.3.6		GRANITE INLET STONE (FOR ROUND CATCH BASIN)
7.3.7		GRANITE APRON STONE (FOR SQUARE CATCH BASIN)
7.3.8		GRANITE APRON STONE (FOR ROUND CATCH BASIN)
7.4.0		GRANITE SLOPED FACE CURB
7.4.1		GRANITE SLOPED FACE TRANSITION CURB
7.4.2		GRANITE TRANSITION CURB (VERTICAL FACE TO SLOPE FACE)
7.5.0		BITUMINOUS CONCRETE LIP CURB
7.5.1A		BITUMINOUS BERM (CONSTRUCTION METHOD A)
7.5.1B		BITUMINOUS BERM (CONSTRUCTION METHOD B)
7.6.0		CURB SETTING DETAIL
8.2.0		BITUMINOUS CONCRETE DITCH
8.3.0		RIP-RAP DITCH
8.4.0		PAVED WATERWAY
9.1.0		BALED HAY EROSION CHECK
9.2.0		SILT FENCE DETAIL
9.3.0		BALED HAY DITCH EROSION CHECK AND SILT FENCE COMBINED
9.4.0		BALED HAY DITCH AND SWALE EROSION CHECK
9.5.0		LOG AND HAY CHECK DAM
9.7.0		DEWATERING BASIN
9.8.0		BALED HAY CATCH BASIN INLET PROTECTION
9.9.0		CONSTRUCTION ACCESS
10.1.0		WET STONE MASONRY RETAINING WALL
10.2.0		RUBBLE MASONRY WALL
10.3.0		CONCRETE RETAINING WALL
10.4.0		STONE MASONRY STEPS
14.1.0		CONCRETE HIGHWAY BOUND
15.1.0		POST AND MOUNTINGS FOR RURAL MAILBOX
15.2.0	(NO.)	POST AND MULTIPLE MOUNTINGS FOR RURAL MAILBOXES
18.2.0		PRECAST TYPE "A" HANDHOLE
18.2.2		HEAVY DUTY TYPE "H" HANDHOLE
18.3.0		ALUMINUM LIGHTING STANDARDS
20.2.0		BI-DIRECTIONAL CONTROL DEVICE
24.6.1		STREET SIGN MOUNTING DETAIL
26.2.0		POLYETHYLENE DRUM WITH MARKINGS
26.3.0		PVC PLASTIC PIPE TYPE III BARRICADE
31.1.0		CHAIN LINK FENCE 3'-0" TO 4'-0"
31.2.0		CHAIN LINK FENCE 5'-0" TO 6'-0"
31.2.1		CHAIN LINK FENCE 5'-0" TO 6'-0" INTERMEDIATE POST
31.3.0		WOVEN WIRE RIGHT-OF-WAY FENCE (STEEL POST)
34.1.0		TYPICAL GUARDRAIL INSTALLATION
34.2.0		STEEL BEAM GUARDRAIL
34.2.1		STEEL BEAM GUARDRAIL DETAILS
34.2.2		STEEL BEAM GUARDRAIL DOUBLE FACED ASSEMBLY
34.2.3		STEEL BEAM GUARDRAIL FIXTURES
34.2.5		STEEL BEAM GUARDRAIL REFLECTORIZED TRIANGULAR DELINEATOR
34.3.1		GUARDRAIL END SECTION
34.3.2		TERMINAL END SECTION (SINGLE FACE)
34.3.3		ANCHORAGE DETAILS APPROACH END SECTION
34.3.4		ANCHORAGE DETAILS TRAILING END SECTION
34.4.0		STEEL BACKED TIMBER GUARDRAIL
34.4.1		STEEL BACKED TIMBER GUARDRAIL TERMINAL SECTION-TYPE 1
40.1.0		DOUBLE-FACED PRECAST MEDIAN BARRIER
40.2.0		SINGLE-FACED PRECAST MEDIAN BARRIER
40.2.1		SINGLE-FACED PRECAST MEDIAN BARRIER
40.3.0		PRECAST MEDIAN BARRIER TRANSITION UNIT
40.5.0		PRECAST MEDIAN BARRIER FOR TEMPORARY TRAFFIC CONTROL
43.1.0		CEMENT CONCRETE SIDEWALK
43.2.0		BITUMINOUS CONCRETE SIDEWALK
43.3.0		WHEELCHAIR RAMP
43.3.1		WHEELCHAIR RAMP FOR LIMITED RIGHT-OF-WAY AREAS
43.4.0		DRIVEWAY DEVELOPMENT FOR 3'-0" TRANSITION CURB
43.4.1		DRIVEWAY DEVELOPMENT FOR 6'-0" TRANSITION CURB
43.5.0		CEMENT CONCRETE DRIVEWAYS
48.1.0		DETECTABLE WARNING SYSTEM
51.1.0		TREE PROTECTION DEVICE
51.1.1		DRIP LINE TREE PROTECTION DEVICE FOR EXISTING TREES
51.2.0		SHRUB PROTECTION DEVICE
51.3.0		TREE WELL
51.4.0		TREE WALL

AB		ADJUST CATCH BASIN TO GRADE
ABM		ADJUST CATCH BASIN TO MANHOLE
AC		ADJUST CURB STOP TO GRADE
AD		ADJUST DRAINAGE MANHOLE TO GRADE
AE		ADJUST ELECTRIC MANHOLE TO GRADE
AFC		ADJUST FRAME AND COVER TO GRADE
AFG		ADJUST FRAME AND GRATE TO GRADE
AG		ADJUST GAS GATE BOX TO GRADE
AHH		ADJUST HANDHOLE TO GRADE
AS		ADJUST SANITARY SEWER MANHOLE TO GRADE
AT		ADJUST TELEPHONE MANHOLE TO GRADE
AW		ADJUST WATER GATE BOX TO GRADE
BCD		BITUMINOUS CONCRETE DRIVEWAY 3" BITUMINOUS CONCRETE TYPE I-2 8" GRAVEL BORROW SUBBASE COURSE
BPS		BUILD NEW STRUCTURE OVER EXISTING PIPE
CCB		CLEAN CATCH BASIN
CCP		CUT AND CAP PIPE WITH RESTRAINT (ALL SIZES)
CFP		CLEAN AND FLUSH PIPE
CG		CLEARING AND GRUBBING
CMH		CLEAN MANHOLE
CP	(DEPTH)	COLD PLANE
CPP		CUT AND PLUG PIPE (ALL TYPES, ALL SIZES)
DB		REMOVE AND DISPOSE BITUMINOUS CURB
DC		REMOVE AND DISPOSE CONCRETE CURB
DCB		REMOVE AND DISPOSE CATCH BASIN
DDI		REMOVE AND DISPOSE DROP INLET
DF		REMOVE AND DISPOSE FENCE
DFC		REMOVE AND DISPOSE FRAME AND COVER
DFE		REMOVE AND DISPOSE FLARED END SECTION
DFG		REMOVE AND DISPOSE FRAME AND GRATE
DFH		REMOVE AND DISPOSE FIRE HYDRANT
DFP		REMOVE AND DISPOSE FLEXIBLE PAVEMENT
DG		REMOVE AND DISPOSE GUARDRAIL
DH		REMOVE AND DISPOSE HEADWALL
DHB		REMOVE AND DISPOSE HIGHWAY BOUND
DHH		REMOVE AND DISPOSE HANDHOLE
DL		REMOVE AND DISPOSE LIGHT AND FOUNDATION
DMB		REMOVE AND DISPOSE MEDIAN BARRIER
DMH		REMOVE AND DISPOSE MANHOLE
DMM		REMOVE AND DISPOSE MEDIAN MARKER
DOW		REMOVE AND DISPOSE OBSERVATION WELL
DP		REMOVE AND DISPOSE PIPE
DPB		REMOVE AND DISPOSE PAVEMENT AND RIGID BASE
DRB		REMOVE AND DISPOSE RIGID BASE
DS		REMOVE AND DISPOSE SIGN
DSS		REMOVE AND DISPOSE TRAFFIC SIGNAL SYSTEM
DSW		REMOVE AND DISPOSE SIDEWALK
DTD		REMOVE AND DISPOSE TELEPHONE DUCT BANKS
DUP		REMOVE AND DISPOSE UTILITY POLE
DWW		REMOVE AND DISPOSE PAVED WATERWAY
FF		FILTER FABRIC RIPRAP FLARED END UNDERLAYMENT
GET		FLARED GUARDRAIL END TREATMENT
IA		IMPACT ATTENUATOR
IDL		IMPERVIOUS DITCH LINER
LOD		LIMIT OF DISTURBANCE
LOR		LIMIT OF REGRADING
LS		4" LOAM AND SEED
NFH		NEW FIRE HYDRANT WITH GATE VALVE
NIC		NOT IN THIS CONSTRUCTION CONTRACT
NWB		FURNISH AND INSTALL NEW WATER GATE VALVE BOX
NWVB		FURNISH AND INSTALL NEW WATER GATE VALVE AND BOX
NWCB		FURNISH AND INSTALL NEW WATER CURB STOP BOX
NWSB		FURNISH AND INSTALL NEW WATER CURB STOP AND BOX
PCD		PERMANENT CHECK DAM
PS		4" PLANTABLE SOIL AND SEED
RCB		RECONSTRUCT TYPE "D" CATCH BASIN, TO CATCH BASIN WITH GUTTER INLET
RCM		R.I.D.O.T. COMMUNICATIONS MANHOLE
RHH		REMOVE, HANDLE, HAUL, TRIM, RESET CURB EDGING, STRAIGHT, CIRCULAR (ALL TYPES)
RLP		RELOCATE LAMP POST
RMB		RELOCATE MAILBOX (BY OTHERS)
RPM		REMOVE PAVEMENT MARKINGS
RRP		RIP-RAP PAD (SEE DETAIL)
RRS		REMOVE AND RELOCATE SIGN
RUP		RELOCATE UTILITY POLE (BY OTHERS)
SB		STONE BAFFLE
SBAE		STEEL BEAM BRIDGE CONNECTION APPROACH END (W/O NESTED RAIL)
SBTE		STEEL BEAM BRIDGE CONNECTION TRAILING END (W/NESTED RAIL)
SD-		STRUCTURAL DISPOSITION - SEE CS PAGES OF SPECIFICATION
SF		REMOVE AND STOCKPILE FENCE
SGA		SPECIAL GRADED AGGREGATE
SGC		REMOVE AND STOCKPILE GRANITE CURB
SGR		REMOVE AND STOCKPILE GUARDRAIL
SH		REMOVE AND STOCKPILE HYDRANT
SS		REMOVE AND STOCKPILE SIGN
STS		REMOVE AND STOCKPILE TRAFFIC SIGNAL SYSTEM
TB		CONCRETE THRUST BLOCK
TEP		TIE EXISTING PIPE INTO NEW STRUCTURE
TNP		TIE NEW PIPE INTO EXISTING STRUCTURE
TBT		THRIE BEAM TRANSITION
TBBC		THRIE BEAM BRIDGE CONNECTION
TT		TREE TRIMMING
WCM		4" WOOD CHIP MULCH
4DY		4" EPOXY RESIN PAVEMENT MARKINGS - DOUBLE YELLOW
6W		6" EPOXY RESIN PAVEMENT MARKINGS - WHITE
12W		12" EPOXY RESIN PAVEMENT MARKINGS - WHITE
6WT		6" PREFORMED PATTERNED MARKING (HIGH PERFORMANCE TAPE)
4Y		4" EPOXY RESIN PAVEMENT MARKINGS - YELLOW
6Y		6" EPOXY RESIN PAVEMENT MARKINGS - YELLOW
P.G.L.		PROFILE GRADE LINE

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 2 2 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Environmental Management JUN 11 2015

THIS PLAN SHALL NOT BE ALTERED

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO MAIN STREET (RI ROUTE 107)

FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

STANDARD PLAN SYMBOLS & STANDARD LEGEND

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. B, Suite 100
Lincoln, Rhode Island 02865

CHECKED BY ________ DATE ________ SCALE NO SCALE

0076X_V1_002_STDSYM

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		3	44

GENERAL NOTES:

1. ANY DAMAGE TO EXISTING PAVEMENT, BRIDGES, CONDUIT, SIDEWALK, FENCES, ETC., CAUSED BY THE CONTRACTOR SHALL BE REPAIRED BY THE CONTRACTOR AT NO ADDITIONAL COST TO THE STATE.

2. THE CONTRACTOR SHALL PLACE ALL EQUIPMENT AND MATERIAL AS FAR AWAY AS POSSIBLE FROM THE EDGE OF THE TRAVEL LANE SO AS NOT TO CAUSE A SAFETY HAZARD, IN ACCORDANCE WITH SECTION 106.06 OF THE R.I.D.O.T. STANDARD SPECIFICATION, LATEST EDITION.

3. IT IS THE CONTRACTOR'S RESPONSIBILITY TO ENSURE THAT THE EXISTING CONDITIONS ARE NOT OBLITERATED BEFORE CONTROL POINTS ARE LOCATED AND CONSTRUCTION LAYOUT IS ESTABLISHED. THE CONSTRUCTION LAYOUT SHALL BE PROVIDED IN SUFFICIENT DETAIL, THEREBY ENABLING HIM TO CONSTRUCT THE PROJECT IN CONFORMITY WITH THE PLANS AND SPECIFICATIONS. SURVEY WILL BE PROVIDED BY THE CONTRACTOR. THE RESIDENT ENGINEER WILL NOT AUTHORIZE CONSTRUCTION ACTIVITIES TO BEGIN UNTIL HE IS SATISFIED THAT ALL GROUND CONTROL HAS BEEN ESTABLISHED, TIED DOWN, AND DULY RECORDED IN STANDARD FIELD BOOKS.

4. ALL R.I. STD. 9.9.0 CONSTRUCTION ACCESS ROADS SHALL BE CONSTRUCTED PRIOR TO ANY ROADWAY ACCEPTING CONSTRUCTION TRAFFIC.

5. THE FREQUENCY AND APPLICATION RATES FOR THE DUST CONTROL ITEMS WILL BE AS DIRECTED BY THE ENGINEER.

6. ALL SIDEWALK AND DRIVEWAYS DESIGNATED FOR REPLACEMENT SHALL BE CUT AND MATCHED AT LOCATIONS SHOWN ON THE PLANS OR AS DIRECTED BY THE ENGINEER.

7. ASPHALT EMULSION TACK COAT SHALL BE PLACED PRIOR TO PAVEMENT PLACEMENT ON THE CONCRETE BASE OR COLD PLANED PAVEMENT, AND ON ANY NEW COURSE WHICH HAS BEEN OPEN TO TRAFFIC, OR ANY NEW COURSE WHICH HAS BEEN EXPOSED FOR MORE THAN 3 DAYS, AND/OR AS DIRECTED BY THE ENGINEER. IT SHALL ALSO BE APPLIED TO VERTICAL PAVEMENT FACES BETWEEN ADJOINING PAVEMENT SECTIONS. ALL APPLICATIONS ON BOTH HORIZONTAL AND VERTICAL SURFACES SHALL BE PAID FOR UNDER THE CONTRACT UNIT BID PRICE FOR CODE 403.0300 "ASPHALT EMULSION TACK COAT."

8. THE LIMITS OF CLEARING AND SURFACE DISTURBANCE MUST BE STRICTLY ADHERED TO IN ALL AREAS. IN ADDITION TO THOSE AREAS SPECIFICALLY DESIGNATED ON THE PLANS, THE CONTRACTOR WILL BE RESPONSIBLE FOR PROVIDING AND PLACING, AT HIS OWN EXPENSE, PLANTABLE SOIL AND SEED IN AREAS WHICH ARE OUTSIDE OF THE PROJECT'S AREAS OF DISTURBANCE AND WHICH ARE IMPACTED BY CONSTRUCTION OPERATIONS INCLUDING THOSE AREAS WHERE VEHICLES, EQUIPMENT AND MATERIALS ARE STORED WITH THE PERMISSION OF THE ENGINEER.

9. UNDER NO CIRCUMSTANCE WILL THE CONTRACTOR BE ALLOWED TO STOCKPILE REMOVED PAVEMENT MATERIALS WITHIN THE PROJECT LIMITS.

10. CLEANING AND SWEEPING OF PAVEMENT WILL INCLUDE REMOVAL OF ALL PAVEMENT DEBRIS PRIOR TO THE PLACEMENT OF EACH BITUMINOUS PAVEMENT LIFT. ALL CLEANING AND SWEEPING SHALL BE DONE TO THE SATISFACTION OF THE ENGINEER.

11. PRIOR TO INSTALLATION, ALL SIGNS, MOUNTINGS AND LOCATIONS SHALL BE APPROVED OR MODIFIED BY THE ENGINEER.

12. THE COORDINATE SYSTEM, IF SHOWN, IS THE RHODE ISLAND STATE PLANE COORDINATE SYSTEM.

13. PAVEMENT OPERATIONS FOR CURBED SECTIONS: IN AREAS WHERE CURBING IS SET TO FINISH LINE AND GRADE, THE CONTRACTOR WILL NOT BE REQUIRED TO UTILIZE THE SENSOR AND SKY-TYPE DEVICE FOR AUTOMATIC GRADE CONTROL, BUT WILL BE ALLOWED TO MANUALLY ADJUST THE BITUMINOUS PAVER FOR CONTROLLING GRADE.

14. THE CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTAINING ALL ROADWAYS FREE OF DEBRIS RESULTING FROM THEIR CONSTRUCTION OPERATIONS. ALL DEBRIS SHALL BE REMOVED TO THE SATISFACTION OF THE ENGINEER AT NO ADDITIONAL COST TO THE STATE.

15. NO FUEL STORAGE, VEHICLE REFUELING, OR EQUIPMENT STORAGE SHALL TAKE PLACE IN DESIGNATED WETLANDS, NOR WITHIN 100' OF ANY WATER BODY. THIS REQUIREMENT SHALL NOT SUPERSEDE ANY FEDERAL, STATE OR LOCAL LAW, ORDINANCE, RULE OR REGULATION THAT APPLIES TO THE SAME, UNLESS THIS REQUIREMENT IS MORE STRINGENT THAN SAID LAW, ORDINANCE, RULE OR REGULATION.

16. THE CONTRACTOR SHALL BE RESPONSIBLE TO ENSURE THAT AT THE END OF FINAL PAVING OPERATIONS, FLOW TO EXISTING DRAINAGE STRUCTURES HAS BEEN REESTABLISHED AND THAT NO ISOLATED DEPRESSIONS REMAIN. THERE SHALL BE NO SEPARATE PAYMENT FOR THIS PROVISION; IT SHALL BE CONSIDERED INCIDENTAL TO PAVING AND COLD PLANING OPERATIONS.

17. ALL EMBANKMENTS SHALL BE PLACED IN HORIZONTAL LAYERS NOT EXCEEDING 12" (AFTER COMPACTION) AND SHALL BE COMPACTED AS SPECIFIED BEFORE THE NEXT LAYER IS PLACED. ALSO, EMBANKMENT CONSTRUCTION SHALL CONFORM TO SECTION 202.03.2 OF THE R.I.D.O.T. STANDARD SPECIFICATIONS, LATEST EDITION.

18. IF THIS PROJECT IS ON A HURRICANE EVACUATION AND DIVERSIONARY ROUTE, AS DESIGNATED ON THE COVERSHEET, THE CONTRACTOR IS ADVISED THAT UPON 12 (TWELVE) HOURS NOTICE THE ROADWAY SHALL BE OPEN TO EVACUEES AND EMERGENCY PERSONNEL. ANY EXTRA WORK NECESSARY TO COMPLY WITH THIS REQUIREMENT WILL BE REIMBURSED UNDER FORCE ACCOUNT PROCEDURES.

19. THE CONTRACTOR SHALL READ, BECOME FAMILIAR WITH, AND ADHERE TO ALL OF THE PROVISIONS, CONDITIONS, AND STIPULATIONS STATED IN THE ENVIRONMENTAL APPROVALS ISSUED FOR THE PROJECT FROM THE DEPARTMENT OF ENVIRONMENTAL MANAGEMENT (RIDEM). AND/OR THE ARMY CORPS OF ENGINEERS (ACOE). AND/OR THE COASTAL RESOURCES MANAGEMENT COUNCIL (CRMC). COPIES OF EACH OF THESE PERMITS ARE INCLUDED IN THE CS PAGES OF THE CONTRACT DOCUMENTS. ALL COSTS ASSOCIATED WITH THESE CONDITIONS SHALL BE CONSIDERED INCIDENTAL TO THE CONSTRUCTION AND INCLUDED WITH THE COST FOR THE ASSOCIATED BID ITEM(S).

20. FOR ALL PROJECTS INVOLVING KNOWN SITE REMEDIATION ISSUES, THE CONTRACTOR SHALL READ, BECOME FAMILIAR WITH, AND ADHERE TO ALL OF THE CONSTRUCTION RELATED PROVISIONS, CONDITIONS, AND STIPULATIONS OF ANY REMEDIAL PLANS DEVELOPED FOR THE PROJECT. COPIES OF THESE DOCUMENTS ARE INCLUDED IN THE CS PAGES OF THE CONTRACT DOCUMENTS. ALL COSTS ASSOCIATED WITH COMPLIANCE WITH THESE DOCUMENTS SHALL BE CONSIDERED INCIDENTAL TO THE CONSTRUCTION AND INCLUDED WITH THE COST FOR THE ASSOCIATED BID ITEM(S).

21. NO UNPROTECTED CONSTRUCTED FEATURE MAY PROJECT MORE THAN 4 INCHES ABOVE THE FINISHED GRADE OF A TRAVERSABLE SLOPE IN A CLEAR ZONE, e.g. HEADWALL, DRAINAGE INLET, ETC.

22. THE REMAINING SECTION OR STUB OF A BREAKAWAY BASE MAY NOT PROJECT MORE THAN 4 INCHES ABOVE THE FINISHED GRADE OF A TRAVERSABLE SLOPE IN A CLEAR ZONE, e.g. SIGN POSTS, LIGHT POLES, FIRE HYDRANTS, ETC.

DRAINAGE AND EROSION CONTROL NOTES:

1. FOR ALL PROJECTS WITH AT LEAST ONE(1) ACRE OF SOIL DISTURBANCE. R.I.D.O.T. IS REQUIRED TO DEVELOP AND ENFORCE A SITE SPECIFIC STORM WATER POLLUTION PREVENTION PLAN (SWPPP) IN ORDER TO REMAIN IN COMPLIANCE WITH THE RIPDES GENERAL PERMIT FOR STORMWATER DISCHARGES ASSOCIATED WITH CONSTRUCTION ACTIVITIES. THE CONTRACTOR SHALL READ, BECOME FAMILIAR WITH, AND ADHERE TO ALL OF THE PROVISIONS, CONDITIONS, AND STIPULATIONS OF THE GENERAL PERMIT AND THE SITE SPECIFIC SWPPP FOR THIS PROJECT. COPIES OF THESE DOCUMENTS ARE INCLUDED IN THE CS PAGES OF THE CONTRACT DOCUMENTS. ALL COSTS ASSOCIATED WITH ADHERENCE TO THE SWPPP SHALL BE CONSIDERED INCIDENTAL TO THE CONSTRUCTION AND INCLUDED WITH THE COST FOR THE ASSOCIATED BID ITEM(S).

2. NO UNDISTURBED AREAS SHALL BE CLEARED OF EXISTING VEGETATION AFTER OCTOBER 15 OF ANY CALENDAR YEAR OR DURING ANY PERIOD OF FULL OR LIMITED WINTER SHUTDOWN. ALL DISTURBED SOILS EXPOSED PRIOR TO OCTOBER 15 OF ANY CALENDAR YEAR SHALL BE SEEDED OR PROTECTED BY THAT DATE. ANY SUCH AREAS THAT DO NOT HAVE ADEQUATE VEGETATIVE STABILIZATION, AS DETERMINED BY THE RESIDENT ENGINEER OR ENVIRONMENTAL INSPECTOR, BY NOVEMBER 15 OF ANY CALENDAR YEAR, MUST BE STABILIZED THROUGH THE USE OF EROSION CONTROL MATTING OR HAY MULCH, IN ACCORDANCE WITH SPECIFICATIONS CONTAINED WITHIN THE R.I. SOIL EROSION AND SEDIMENT CONTROL HANDBOOK. IF WORK CONTINUES WITHIN ANY OF THESE AREAS DURING THE PERIOD FROM OCTOBER 15 THROUGH APRIL 15, CARE MUST BE TAKEN TO ENSURE THAT ONLY THE AREA REQUIRED FOR THAT DAY'S WORK IS EXPOSED, AND ALL ERODIBLE SOIL MUST BE RESTABILIZED WITHIN 5 WORKING DAYS. ANY WORK TO CORRECT PROBLEMS RESULTING FROM FAILURE TO COMPLY WITH THIS PROVISION SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR. THERE WILL BE NO SEPARATE PAYMENT FOR THIS PROVISION, IT SHALL BE CONSIDERED INCIDENTAL TO CONSTRUCTION OPERATIONS. STABILIZATION OF ONE FORM OR ANOTHER AS DESCRIBED ABOVE SHALL BE ACHIEVED WITHIN 2 WEEKS OF FINAL GRADING.

3. STOCKPILES OF MATERIAL SHALL NOT BE LOCATED WITHIN REGULATED WETLANDS OR BUFFER ZONE AREAS. THEY SHALL HAVE SIDE SLOPES NO GREATER THAN 30% AND STOCKPILES OF ERODABLE MATERIAL SHALL ALSO BE SEEDED AND RINGED WITH R.I. STD. 9.1.0 TO STABILIZE.

4. IF THE PLANS INCLUDE SPECIFIC AREAS FOR PLACEMENT OF CONSTRUCTION DEWATERING BASINS AND/OR EQUIPMENT AND MATERIALS STORAGE AND STOCKPILING, AND IF THE CONTRACTOR ELECTS TO UTILIZE ANY OTHER AREAS FOR THESE PURPOSES, THIS SHALL BE APPROVED BY THE ENGINEER ONLY AFTER OBTAINING ANY NECESSARY PERMITS AND/OR PERMIT MODIFICATIONS FROM THE APPROPRIATE REGULATORY AUTHORITY(IES). ANY PERMITTING REQUIREMENTS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR AND SHALL BE ACCOMPLISHED AT NO COST TO THE STATE. THE ENGINEER WILL COORDINATE SUBMISSION OF ANY REQUIRED PERMIT APPLICATION MATERIALS WITH THE R.I.D.O.T. OFFICE OF ENVIRONMENTAL PROGRAMS.

5. JUTE MESH SHALL BE USED TO STABILIZE PLANTABLE SOIL AND/OR LOAM IN ALL DITCHES, ON ALL SLOPES ADJACENT TO WETLANDS AND WETLAND PERIMETERS, AND ON ALL SLOPES WITHIN WATER QUALITY BASINS. JUTE MESH IN DITCHES SHALL EXTEND TO AN ELEVATION 2 FEET ABOVE THE BOTTOM OF THE DITCH.

6. SEEDING ON ALL SLOPES 3 TO 1 OR STEEPER SHALL CONSIST OF THE FOLLOWING APPLICATIONS UNLESS CHANGED IN THE CONTRACT.
   a. SEEDING TYPE I.
   b. ADHESIVE MULCH STABILIZER

7. UNVEGETATED SLOPES SHALL NOT BE UNATTENDED OR EXPOSED FOR PERIODS IN EXCESS OF 2 WEEKS OR THROUGH THE INACTIVE WINTER SEASON.

8. PRIOR TO DRAINAGE AND UTILITY CONSTRUCTION, THE CONTRACTOR IS RESPONSIBLE FOR VERIFYING THE LOCATION (HORIZONTAL AND VERTICAL) OF ALL EXISTING PIPES AND/OR STRUCTURES WHICH ARE TO BE CONNECTED. ANY VARIATION FOUND FROM THE PLANS MUST BE BROUGHT TO THE ENGINEER'S ATTENTION PRIOR TO DRAINAGE AND UTILITY CONSTRUCTION. WORK CAN COMMENCE ONLY UPON THE ENGINEER'S AUTHORIZATION.

9. ALL DRAINAGE AND UTILITY STRUCTURES WITHIN THE PAVED ROADWAY SHALL BE ADJUSTED TO GRADE WITH THE SURROUNDING PAVEMENT PRIOR TO THE WINTER SHUTDOWN.

10. DURING CONSTRUCTION, THE CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTAINING DRAINAGE AND RUNOFF FLOW DURING STORMS AND PERIODS OF RAINFALL THROUGHOUT THE WORK AREA.

11. CATCH BASIN RIM GRADES NOTED ON PLANS ARE DEPRESSED 0.1' LOWER THAN THE GUTTER GRADE. RIM ELEVATIONS SHOWN ARE FINAL GRADES. THE CONTRACTOR SHALL PLACE FRAMES AND GRATES 0.1' BELOW THE GRADE CONSTRUCTED IN THIS CONTRACT OR AS DIRECTED BY THE ENGINEER.

12. PROVISIONS FOR CLEARING TO ACCESS OUTFALLS DURING THE CLEANING AND FLUSHING OF THE CLOSED DRAINAGE SYSTEM SHALL BE KEPT TO A MINIMUM.
   a. ANY VEGETATIVE CLEARING SHALL BE LIMITED TO BRUSH AND TREES LESS THAN 3" DIAMETER.
   b. NO HEAVY EQUIPMENT MAY ENCROACH UPON VEGETATED PERIMETER OR RIVERBANK WETLANDS AS WELL AS BIOLOGICAL WETLANDS.

13. THE CONTRACTOR SHALL INSTALL ALL EROSION CONTROL DEVICES FOR OUTLET PROTECTION PRIOR TO CLEANING AND FLUSHING STORM WATER DRAINAGE. EROSION CONTROL DEVICES SHALL REMAIN IN PLACE UNTIL ALL FLUSHED SEDIMENTS ARE REMOVED. AT ALL OUTFALL LOCATIONS WHERE PIPES ARE TO BE CLEANED AND FLUSHED, OUTLET PROTECTION (R.I. STD. 9.1.0 OR 9.3.0) SHALL BE INSTALLED TO TRAP SEDIMENTS. THESE SEDIMENTS SHALL THEN BE REMOVED AND DISPOSED OF LEGALLY BEFORE THE OUTLET PROTECTION DEVICES ARE REMOVED. IF OUTLET PROTECTION AT THE OUTFALL IS NOT FEASIBLE, THEN THE OUTLET PIPE OF THE LAST DRAINAGE STRUCTURE TO BE CLEANED SHALL BE PLUGGED TO CAPTURE ALL MATERIALS FLUSHED FROM PIPES. AFTER THE MATERIALS ARE REMOVED FROM THE DRAINAGE STRUCTURE, THE OUTLET SHALL BE UNPLUGGED TO RESUME NORMAL FUNCTIONING.

14. R.I. STD. 9.8.0 BALED HAY INLET PROTECTION SHALL BE INSTALLED AT ALL CATCH BASINS AND INLETS WHENEVER SUBBASE IS EXPOSED, AND SHALL REMAIN IN PLACE UNTIL THE ABUTTING GROUND SURFACES ARE STABILIZED.

15. WHERE BALED HAY INLET PROTECTION AND SILT FENCES ARE USED AT CATCH BASINS, THEY SHALL BE REMOVED AT THE END OF THE PROJECT OR AS DIRECTED BY THE ENGINEER IN ORDER TO PREVENT CLOGGING OF THE INLET.

DRAINAGE AND EROSION CONTROL NOTES (CONTINUED):

16. DETENTION AND RETENTION BASINS MAY BE ROUGH GRADED AND STABILIZED WITH VEGETATION AND/OR OTHER EROSION CONTROL MEASURES AS REQUIRED BY THE ENGINEER PRIOR TO USE AS TEMPORARY SEDIMENTATION BASINS DURING PROJECT CONSTRUCTION. FINAL BASIN CONSTRUCTION SHALL NOT COMMENCE UNTIL ALL SOURCES OF SEDIMENT HAVE BEEN ELIMINATED, FINAL ROADSIDE VEGETATION IS ESTABLISHED AND USE OF TEMPORARY BASINS IS NO LONGER REQUIRED AS DIRECTED BY THE ENGINEER. ANY ISSUES RELATING TO EROSION AND/OR SEDIMENT TRANSPORT INTO WETLAND AREAS RESULTING FROM SUCH USE OF SEDIMENTATION BASINS DURING CONSTRUCTION SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR. ANY CORRECTIVE ACTION REQUIRED TO RESOLVE SUCH ISSUES SHALL BE COMPLETED BY THE CONTRACTOR.

17. THE TOE OF ANY FILL SLOPE IS TO REMAIN AT LEAST 1' INSIDE OF ALL EROSION CONTROLS. UNDER NO CIRCUMSTANCES SHALL THE CONTRACTOR COVER ANY PORTION OF THE EROSION CONTROL MEASURES WITH MATERIAL. ANY MATERIAL THAT IS PLACED ON ANY EROSION CONTROLS BY THE CONTRACTOR, OR ANY AGENT OF THE CONTRACTOR, SHALL BE IMMEDIATELY REMOVED BY THE CONTRACTOR, AND ANY NECESSARY REPAIRS TO THE EROSION CONTROLS ACCOMPLISHED.

18. PRIOR TO COMMENCING CONSTRUCTION ACTIVITIES, EROSION AND SEDIMENTATION CONTROLS SHALL BE INSTALLED AT THOSE AREAS INDICATED ON THE PLANS. CLEARING MAY OCCUR PRIOR TO INSTALLATION OF SUCH CONTROLS, HOWEVER NO GRUBBING, GRADING, FILLING, OR OTHER SOIL DISTURBANCE SHALL OCCUR PRIOR TO INSTALLATION. THE LIMITS OF CLEARING AND SURFACE DISTURBANCE MUST BE STRICTLY ADHERED TO IN ALL AREAS.

19. ALL HAY BALES, SILT FENCE OR TEMPORARY PROTECTION SHALL REMAIN IN PLACE UNTIL AN ACCEPTABLE STAND OF GRASS IS ESTABLISHED. IF NEEDED, TEMPORARY SEEDING CAN HELP TO MINIMIZE EROSION. TEMPORARY SEED WILL CONFORM TO R.I.D.O.T. STANDARD TEMPORARY SEED MIX.

20. THE CONTRACTOR MUST REPAIR AND/OR RESEED ANY AREAS THAT DO NOT DEVELOP WITHIN THE PERIOD OF ONE YEAR AND HE SHALL DO SO AT NO ADDITIONAL EXPENSE TO THE STATE.

21. THE NORMAL ACCEPTABLE SEASONAL SEEDING DATES ARE SPECIFIED IN SUBSECTION L.02.03 OF THE R.I.D.O.T. STANDARD SPECIFICATIONS, LATEST EDITION.

22. ADDITIONAL EROSION CONTROLS, SHALL BE INSTALLED AS DIRECTED BY THE RESIDENT ENGINEER. THESE ADDITIONAL ITEMS WILL BE PAID AT THE UNIT PRICE FOR THAT BID ITEM.

UTILITY NOTES:

1. EXISTING UTILITIES HAVE BEEN SHOWN ON THE PLANS USING THE BEST AVAILABLE INFORMATION AND ARE APPROXIMATE. BUILDING SERVICE CONNECTIONS (ELECTRIC, GAS, TELEPHONE, WATER AND SANITARY) ARE NOT SHOWN. CONTRACTOR IS TO ASSUME SERVICES ARE PRESENT TO ALL BUILDINGS.

2. THE CONTRACTOR SHALL VERIFY THE LOCATIONS OF ALL EXISTING DRAINAGE AND UTILITIES BOTH UNDERGROUND AND OVERHEAD BEFORE EXCAVATION BEGINS IN ACCORDANCE WITH CHAPTER 39-1.2 OF THE R.I. GENERAL LAWS ENTITLED "EXCAVATION NEAR UNDERGROUND UTILITY FACILITIES", WITH AMENDMENTS EFFECTIVE AS OF NOVEMBER 1, 2009 AND, WHEN NECESSARY, BY CONTACTING THE INDIVIDUAL UTILITY COMPANIES. EXCAVATION SHALL BE IN ACCORDANCE WITH ALL STATUTES, ORDINANCES, RULES AND REGULATIONS OF ANY APPLICABLE CITY, TOWN, STATE OR FEDERAL AGENCY. THE CONTRACTOR SHOULD UNDERSTAND THAT NOT ALL UTILITIES SUBSCRIBE TO THE DIG SAFE PROGRAM. IT IS THE CONTRACTOR'S RESPONSIBILITY TO NOTIFY ALL UTILITY COMPANIES AND ENSURE THAT ALL UTILITIES HAVE BEEN MARKED PRIOR TO COMMENCING THEIR WORK. ANY DAMAGE TO EXISTING UTILITIES MARKED IN THE FIELD, OR AS A RESULT OF FAILING TO CONTACT THE APPROPRIATE UTILITY COMPANY, SHALL BE REPAIRED OR REPLACED AT NO ADDITIONAL COST TO THE STATE.

3. ALL EXISTING UTILITIES TO BE ABANDONED SHALL BE CAPPED.

4. EXISTING WATER SERVICES SHALL BE RECONNECTED TO THE NEW WATER MAINS.

5. UTILITY SERVICE CONNECTIONS SHALL BE MAINTAINED TO ALL EXISTING FACILITIES TO REMAIN.

6. FIRE HYDRANTS SHALL NOT BE REMOVED FROM SERVICE WITHOUT WRITTEN AUTHORIZATION FROM THE FIRE DEPARTMENT OR THE WATER AUTHORITY.

7. ALL NEW WATER LINES SHALL BE DISINFECTED TO THE SATISFACTION OF THE WATER AUTHORITY IN ACCORDANCE WITH THE SPECIFICATIONS.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 2 2 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marian D. Woodbury

RECEIVED JUN 11 2015 Environmental Management Water Resources

THIS PLAN SHALL NOT BE ALTERED

REVISIONS		
NO.	DATE	BY
1	4/07	TRB
2	3/10	RBH
3	4/14	MLP

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

STANDARD NOTES - 1

CHECKED BY _____ DATE _____ SCALE NO SCALE

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		4	44

LANDSCAPE NOTES:

1. ALL PLANT MATERIAL MUST BE TAGGED AT THE NURSERY (A RECOGNIZED GROWER OF PLANT MATERIAL) IN ACCORDANCE WITH THE R.I.D.O.T. STANDARD SPECIFICATIONS, LATEST EDITION. ALL PLANT MATERIAL MUST BE NURSERY GROWN; NO PLANTATION GROWN PLANT MATERIAL WILL BE ACCEPTED.
2. ALL PLANT SUBSTITUTIONS AND/OR CHANGES IN PLANT LOCATION MUST BE APPROVED IN ACCORDANCE WITH THE R.I.D.O.T. STANDARD SPECIFICATIONS, LATEST EDITION.
3. ALL PLANT MATERIAL IS TO BE FIELD LOCATED BY A REPRESENTATIVE FROM THE R.I.D.O.T. LANDSCAPE ARCHITECTURE UNIT.
4. A R.I.D.O.T. LANDSCAPE REPRESENTATIVE MUST BE ON SITE TO APPROVE ALL TRIMMING AND CLEARING NECESSARY TO COMPLETE THE WORK AS SHOWN ON THE PLANS.
5. ANY TOPSOIL USED AS PLANTABLE SOIL SHALL HAVE A SANDY LOAM TEXTURE RELATIVELY FREE OF SUBSOIL MATERIAL, STONES, ROOTS, LUMPS OF SOIL, TREE LIMBS, TRASH OR CONSTRUCTION DEBRIS, AND SHALL CONFORM TO SECTION M.18 OF THE R.I.D.O.T. STANDARD SPECIFICATIONS, LATEST EDITION.
6. ALL TREES AND SHRUBS SHALL BE MULCHED WITH PINE BARK MULCH IN ACCORDANCE WITH THE R.I.D.O.T. STANDARD SPECIFICATIONS, LATEST EDITION.
7. ALL TREES AND/OR SHRUBS THAT ARE PLANTED AS A BED SHALL BE MULCHED AS A BED.
8. PROVIDE A MINIMUM 6'-8" BRANCHING STANDARD ON ALL TREES INSTALLED ADJACENT TO SIDEWALKS AND/OR PEDESTRIAN ACCESS AREAS.

STRUCTURAL NOTES FOR HIGHWAY SIGNS, LUMINAIRES AND TRAFFIC SIGNALS:

GENERAL

1. ALL SUPPORT DESIGNS AND ASSOCIATED SHOP DRAWING REVIEWS SHALL BE IN CONFORMANCE WITH THE LATEST EDITION, OF THE AASHTO STANDARD SPECIFICATIONS FOR STRUCTURAL SUPPORTS FOR HIGHWAY SIGNS, LUMINAIRES AND TRAFFIC SIGNALS (THE "SPECIFICATIONS"), INCLUDING THE LATEST INTERIM SPECIFICATIONS, EXCEPT AS MODIFIED HEREIN.

CONSTRUCTION DRAWINGS AND DETAILS

1. THE FOLLOWING NOTES SHALL BE INCLUDED ON ALL PLANS AND/OR SHOP DRAWINGS IN REFERENCE TO ANCHOR BOLTS:
   - "PRETENSIONING OF ALL ANCHOR NUTS IS REQUIRED, AND SHALL BE ACCOMPLISHED BY TIGHTENING TO 1/6TH TURN BEYOND THE SNUG-TIGHT POSITION."
   - "THE MAXIMUM CLEARANCE BETWEEN THE BOTTOM OF THE LEVELING NUTS AND THE TOP OF THE CONCRETE IS CRITICAL AND SHALL NOT EXCEED THE AMOUNT SPECIFIED ON THIS DRAWING."
2. THE USE OF GROUT UNDER BASE PLATES SHALL GENERALLY NOT BE PERMITTED. IF SPECIFIC CONDITIONS WARRANT ITS USE, THE GROUT SHALL NOT BE CONSIDERED LOAD CARRYING; LOADS SHALL BE DIRECTLY SUPPORTED BY THE ANCHOR BOLTS. ADEQUATE DRAINAGE SHALL BE PROVIDED.
3. THE DAMPENING EFFECTS OF VIBRATION MITIGATION DEVICES SHALL NOT BE CONSIDERED IN THE DESIGN OF STRUCTURAL SUPPORTS FOR SIGNS AND TRAFFIC SIGNALS. IF THE CONTRACTOR CHOOSES TO USE THESE DEVICES FOR WARRANTY PURPOSES, THE TYPE OF DEVICES PROPOSED SHALL BE APPROVED BY THE DEPARTMENT PRIOR TO FABRICATION OF SUPPORTS.

TRAFFIC SIGNAL NOTES:

1. ALL SALVAGED TRAFFIC SIGNAL EQUIPMENT SHALL BE DELIVERED TO THE R.I.D.O.T. MAINTENANCE HEADQUARTERS, 360 LINCOLN AVENUE, WARWICK, RHODE ISLAND, 02888.
2. BACK PLATES SHALL BE INSTALLED ON ALL TRAFFIC SIGNAL HEADS.
3. THE CONTRACTOR SHALL SUPPLY AND INSTALL ON THE UPPER LEFT HAND CORNER OF THE BACK OF THE CONTROLLER CABINET DOOR A LAMINATED INTERSECTION GRAPHIC AND TABLE DEPICTING THE TRAFFIC DETECTOR RELAY CHANNEL ASSIGNMENTS. THE DIAGRAM SHALL BE A GRAPHIC OF THE INDIVIDUAL INTERSECTION ORIENTED SIMILAR TO THE PLANS SHOWING THE LOCATIONS OF EACH OF THE LOOP DETECTORS. THE DIAGRAM SHALL, AT A MINIMUM, INCLUDE DETECTOR NUMBERS, STREET NAME LABELS, NORTH ARROW, AND CONTROLLER CABINET LOCATION. THE ASSIGNMENT INFORMATION SHALL BE INCLUDED IN A TABLE WHICH SHALL INCLUDE, AT A MINIMUM, THE APPROACH NAME, DETECTOR NUMBER, TERMINAL NUMBER, DETECTOR RACK SLOT NUMBER, RELAY NUMBER, RELAY CHANNEL NUMBER, AND PHASE ASSOCIATED WITH EACH DETECTOR.
4. TRAFFIC CONTROLLER CABINETS, UNLESS OTHERWISE NOTED, SHALL BE NEMA TS2 TYPE 1 CABINET SIZE 6 ("P" TYPE) WITH NOMINAL DIMENSIONS OF 52"Hx44"Wx24"D.
5. ALL DELAY AND EXTENSION TIMES, AS CALLED FOR ON THE PLANS, FOR PROPOSED LOOP DETECTORS SHALL BE PROGRAMMED IN THE TRAFFIC SIGNAL CONTROLLER AND NOT THE DETECTOR RELAY.
6. A BARE GROUND WIRE SHALL BE PLACED IN ALL PVC CONDUITS AND SHALL BE BONDED TO GROUND RODS IN ACCORDANCE WITH SECTION T.03 OF THE RHODE ISLAND DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION.
7. THE FINAL POSITION OF SIGNAL HEADS, PEDESTRIAN PUSHBUTTONS, DETECTORS, AND STOP LINE AND CROSSWALK PAVEMENT MARKINGS SHALL BE AS DIRECTED BY THE ENGINEER IN THE FIELD ACCORDING TO ACTUAL INTERSECTION CHARACTERISTICS.
8. A 2' MINIMUM BUFFER SHALL BE PROVIDED BETWEEN THE CURB AND ALL LATERAL OBSTRUCTIONS (INCLUDING ALL SIGNAL POLES AND TRAFFIC/PEDESTRIAN SIGNAL HEADS) TO PROVIDE ADEQUATE CLEARANCE FOR TURNING VEHICLES.
9. ALL FOUNDATIONS MUST HAVE CONES OR BARRELS BOLTED TO FOUNDATION BASES UNTIL ACTUAL POLE IS INSTALLED.
10. WHEN PLACING TRAFFIC SIGNAL HANDHOLES OR CONDUIT IN EXISTING PORTLAND CEMENT CONCRETE SIDEWALKS, THE ENTIRE SIDEWALK SQUARE OF CONCRETE SHALL BE REPLACED IN ACCORDANCE WITH R.I. STD. 43.1.0. NO PATCHES WILL BE ALLOWED.
11. ALL PEDESTRIAN PUSHBUTTONS SHALL BE COMPLIANT WITH "THE AMERICANS WITH DISABILITIES ACT ACCESSIBILITY GUIDELINES FOR BUILDINGS AND FACILITIES" (ADAAG) AND SHALL INCLUDE A PRESSURE-ACTIVATED (NON-MOVING) BUTTON. SIGNS APPLICABLE TO PUSHBUTTON ACTUATION SHALL BE INSTALLED SUCH THAT THE CROSSING ASSIGNED TO EACH BUTTON IS CLEARLY INDICATED. IF SITE CONDITIONS DO NOT ALLOW PEDESTRIAN PUSHBUTTONS TO BE INSTALLED WHERE CALLED FOR ON THE PLANS, THE R.I.D.O.T. TRAFFIC ENGINEERING UNIT SHALL BE CONSULTED WITH THROUGH AN R.F.I. PRIOR TO INSTALLING THE PUSHBUTTONS. THE FINAL PLACEMENT OF ALL PEDESTRIAN PUSHBUTTONS SHALL BE IN ACCORDANCE WITH ADAAG AND THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES, LATEST EDITION.
12. ALL LOOP DETECTORS SHALL BE CENTERED WITHIN EACH LANE AS DELINEATED, UNLESS OTHERWISE DIMENSIONED ON PLANS.
13. ALL LOOP DETECTORS SHALL BE CUT INTO THE FINAL PAVEMENT SURFACE COURSE.
14. TRAFFIC SIGNAL CONTROLLERS SHALL BE WIRED SO THAT ANY FIRE PRE-EMPTION SHALL OVERRIDE MANUAL (PUSH BUTTON) OPERATION.
15. THE CONTRACTOR SHALL WORK CONTINUOUSLY TO RESTORE TRAFFIC SIGNAL OPERATION TO ITS INTENDED PURPOSE WHEN REPLACING THE TRAFFIC SIGNAL EQUIPMENT. A POLICE DETAIL IS REQUIRED TO DIRECT TRAFFIC AT THE INTERSECTION AT ALL TIMES WHEN THE TRAFFIC SIGNAL IS INOPERATIVE. AT NO TIME SHALL THE CONTRACTOR LEAVE THE SITE BEFORE RESTORING FULL TRAFFIC OPERATIONS.

MAINTENANCE AND PROTECTION OF TRAFFIC NOTES:

1. ALL MAINTENANCE AND PROTECTION OF TRAFFIC CONTROL SETUPS, SIGNS, CHANNELIZING DEVICES, ETC., SHALL BE IN ACCORDANCE WITH THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES, LATEST EDITION.
2. ALL SIGN MOUNTINGS FOR TEMPORARY AND CONSTRUCTION SIGNS SHALL BE IN ACCORDANCE WITH THE R.I.D.O.T. STANDARD SPECIFICATIONS, LATEST EDITION.
3. THE CONTRACTOR SHALL COVER ALL EXISTING AND/OR TEMPORARY SIGNS THAT ARE NOT RELEVANT TO THE TRAFFIC CONTROL REQUIRED DURING ANY PARTICULAR STAGE OF THE CONTRACT.
4. ADVANCE FLAGPERSON SIGNS (W20-7A) SHALL BE USED IN ADVANCE OF ANY POINT AT WHICH A FLAGPERSON OR A POLICE OFFICER HAS BEEN STATIONED TO CONTROL TRAFFIC. WHEN NEEDED, AN APPROPRIATE DISTANCE MESSAGE MAY BE DISPLAYED ON A SUPPLEMENTAL PLATE (24"x18") BELOW THE FLAGPERSON SYMBOL SIGN. THE SIGN SHALL BE PROMPTLY REMOVED OR COVERED WHENEVER THE FLAGPERSON IS NOT AT THE STATION.
5. POLICE OFFICERS (AND NOT FLAGPERSONS) SHALL BE UTILIZED WHEN WORK WILL IMPACT SIGNALIZED INTERSECTIONS AND LIMITED ACCESS HIGHWAYS.
6. POLYETHYLENE DRUMS SHALL BE UTILIZED AS A CHANNELIZING DEVICE WHEN A TRAFFIC CONTROL SET-UP IS TO REMAIN BEYOND WORKING HOURS WHEN NO WORKERS ARE PRESENT. CONES SHALL BE UTILIZED WHEN A TRAFFIC CONTROL SET-UP IS TO REMAIN ONLY DURING WORKING HOURS AND IS SUBSEQUENTLY BROKEN DOWN AT THE END OF THE WORKDAY.
7. ARROW PANELS SHALL BE SET IN THE FLASHING FOUR CORNERS CAUTION MODE UNLESS UTILIZED FOR A MERGING TAPER. ARROW PANELS SET IN THE FLASHING ARROW MODE SHALL NOT BE UTILIZED FOR LANE SHIFTS.
8. TEMPORARY CONSTRUCTION SIGNS AND OTHER WORKZONE TRAFFIC CONTROL DEVICES THAT ARE DAMAGED OR REQUIRE RELOCATION SHALL BE REPLACED AND / OR RELOCATED UNDER THE PAY ITEM FOR "MAINTENANCE AND MOVEMENT TRAFFIC PROTECTION."
9. THE PRIVATE VEHICLES OF CONSTRUCTION WORKERS SHALL NOT BE PARKED ON THE TRAVEL LANES OR SHOULDERS. THEY MAY BE PARKED WITHIN THE STATE RIGHT-OF-WAY ONLY IN AREAS 30' BEYOND THE OUTSIDE EDGE OF THE TRAVEL LANES AND/OR IN AREAS APPROVED BY THE ENGINEER.
10. TEMPORARY CONSTRUCTION SIGNS AND OTHER TEMPORARY TRAFFIC CONTROL DEVICES SHALL BE INSTALLED PRIOR TO THE START OF WORK IN ANY AREA OPEN TO TRAFFIC, AND SHALL BE REMOVED AS SOON AS PRACTICAL WHEN THEY ARE NO LONGER APPROPRIATE.
11. THE INTENDED VEHICLE PATHS THROUGH EACH WORK ZONE SHALL BE CLEARLY MARKED AT ALL TIMES. WATERBORNE PAVEMENT MARKINGS SHALL BE INSTALLED BEFORE THE END OF THE WORK SHIFT ON ALL COLD-PLANED AND NEW ROADWAY SURFACES THAT WILL BE OPENED TO TRAFFIC AT THE END OF THE SHIFT.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Environmental Protection Agency
JUN 11 2015
Office of Water Resources

THIS PLAN SHALL NOT BE ALTERED

REVISIONS		
NO.	DATE	BY
1	4/07	TRB
2	11/07	TRB
3	03/10	RBH

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

STANDARD NOTES - 2

CHECKED BY _____ DATE _____ SCALE NO SCALE

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		5	44

JOB SPECIFIC PLAN SYMBOLS:

EXISTING	NEW
(POLE NO.)	LIGHT POLE
NPAT	NO PARKING AT ANYTIME SIGN
P	PAY PHONE
WG OR UG	WATER OR GAS CURB STOP
RD	ROOF DRAIN
	CATCH BASIN ■
	MANHOLE ●
(C-NO.)	PAVEMENT CORES
BOR.#	BORINGS
TP-#	TEST PITS
	HEDGE
(SIZE)	TREE
	EVERGREEN
	SHRUB
	ROCK
(NO.)	BUILDING LOCATION (NOT VERIFIED)
	LOAM AND SEED
	RIP RAP
	CURED IN PLACE PIPE (CIP) (LENGTH-SIZE-MATERIAL)
OHW	OVERHEAD WIRE
	COMPOST FILTER SOCK WITH STAKE
	SANDBAG DIKE WATER DIVERSION
	CUT AND MATCH LINE
	GRADE PAVEMENT TO DRAIN
LOD	LIMIT OF DISTURBANCE

ABBREVIATIONS:

PC POINT OF CURVATURE
PRC POINT OF REVERSE CURVE
PT POINT OF TANGENCY
RCP REINFORCED CONCRETE PIPE
TP TURNING POINT

JOB SPECIFIC PROPOSED SIGN

X-X — SIGN LOCATION NO.
XX-X — MUTCD/SIGN ID NO.
XX"xXX" — SIGN SIZE
XX.X.X — SIGN MOUNTING NO.

JOB SPECIFIC LEGEND

7.2.3	CEMENT CONCRETE EDGING 24 INCH LOT CURB, R.I. STD. 7.2.3
7.3.9	GRANITE RAMP STONE
8.3.0M	RIP RAP WATERWAY (SEE DETAILS SHEET NO. 3)
43.4.0M	DRIVEWAY DEVELOPMENT FOR 3'-0" TRANSITION CURB (SEE DETAILS SHEET NO. 3)
47.1.1	TRANSVERSE PAVEMENT CUT AND MATCH, R.I. STD. 47.1.1
ACBM	ADJUST CATCH BASIN FRAME AND GRATE TO MANHOLE FRAME AND COVER
AMW	ADJUST MONITORING WELL TO GRADE
BHY	BREAK-AWAY HYDRANT
CCTV	CLOSED CIRCUIT TELEVISION INSPECTION
CFS	COMPOST FILTER SOCK WITH STAKE
CIP	CURED IN PLACE PIPE
CW	CROSSWALK DETAIL - 12" EPOXY RESIN PAVEMENT MARKINGS WITH 2' SPACES - WHITE (SEE DETAILS SHEET NO. 1)
DBB	REMOVE AND DISPOSE BITUMINOUS BERM
DCE	REMOVE AND DISPOSE COBBLESTONE EDGE
DFCI	REMOVE AND DISPOSE FLUSH CONCRETE ISLAND
DGC	REMOVE AND DISPOSE GRANITE CURB
DSC	REMOVE AND DISPOSE STONE CULVERT
DT	CUTTING AND DISPOSING ISOLATED TREES AND STUMPS (4"-24")
DW	REMOVE AND DISPOSE RETAINING WALL
ECB	EROSION CONTROL BLANKET
ETEA	GUARDRAIL END TREATMENT - ENERGY ABSORBING TERMINAL
GTD	GRADE PAVEMENT TO DRAIN
ISC	INLET SEDIMENT CONTROL
NGR	NESTED STEEL BEAM GUARDRAIL
P	2" CLASS 12.5 DENSE GRADED HOT MIX ASPHALT SURFACE COURSE 4" CLASS 19.0 DENSE GRADED HOT MIX ASPHALT (1 LIFT) BASE COURSE
P1	2" CLASS 12.5 DENSE GRADED HOT MIX ASPHALT SURFACE COURSE
P2	3" CLASS 12.5 DENSE GRADED HOT MIX ASPHALT SURFACE COURSE
PLC	PIPELINE CLEANING
RCV DEPTH	RECONSTRUCT CATCH BASIN VERTICAL WALL
RMV DEPTH	RECONSTRUCT MANHOLE VERTICAL WALL
RRG	REMOVE AND RESET GUARDRAIL (PER RI STD 34.1.0)
RW	REBUILD WALL
S-1	FULL DEPTH SAWCUT OF BITUMINOUS PAVEMENT DRIVEWAY
SDP	REMOVE, STOCKPILE, AND DELIVER PLAQUES
SCR1	SPECIAL CURB RAMP, TYPE 1 (SEE DETAILS SHEET NO. 2)
SCR2	SPECIAL CURB RAMP, TYPE 2 (SEE DETAILS SHEET NO. 2)
SCR3	SPECIAL CURB RAMP, TYPE 3 (SEE DETAILS SHEET NO. 2)
SCR4	SPECIAL CURB RAMP, TYPE 4 (SEE DETAILS SHEET NO. 2)
SCR5	SPECIAL CURB RAMP, TYPE 5 (SEE DETAILS SHEET NO. 2)
STM	SHRUB PRUNING
8W	8" EPOXY RESIN PAVEMENT MARKINGS - WHITE
8Y	8" EPOXY RESIN PAVEMENT MARKINGS - YELLOW
12DY	12" DIAGONAL EPOXY RESIN PAVEMENT MARKINGS WITH 4' O.C. CROSS HATCHING AT 45° ANGLES - YELLOW

JOB SPECIFIC GENERAL NOTES

1. THE EXISTING SURVEY WAS PREPARED BY BRYANT ASSOCIATES AND CONFORMS TO A CLASS III SURVEY. THE HIGHWAY AND PROPERTY LINES SHOWN ON THE PLANS CONFORM TO CLASS I STANDARD.
2. THE CONTRACTOR SHALL BE RESPONSIBLE FOR REMOVING AND LEGALLY DISPOSING (R&D) ALL MATERIALS INDICATED ON THE PLANS TO INCLUDE BUT NOT BE LIMITED TO: CONCRETE, BITUMINOUS PAVEMENT, ETC.
3. ALL ITEMS NOT REFERENCED FOR MODIFICATION WILL BE EXISTING TO REMAIN, UNLESS OTHERWISE DIRECTED BY THE ENGINEER.
4. FINAL PAVEMENT MARKINGS SHALL BE WHITE AND YELLOW EPOXY RESIN PAVEMENT MARKINGS. THE TEMPORARY WATERBORNE PAVEMENT MARKINGS SHALL BE PLACED ON THE FINISHED COURSE OF PAVEMENT AFTER PLACEMENT OF THE FINAL SURFACE COURSE. THE EPOXY PAVEMENT MARKINGS SHALL BE PLACED ON THE FINISHED COURSE OF PAVEMENT NO SOONER THAN 2 WEEKS BUT NO LONGER THAN 4 WEEKS AFTER PLACEMENT OF THE FINAL SURFACE COURSE.
5. NEW CONCRETE SIDEWALKS SHALL BE PLACED WITHIN SEVEN (7) CONSECUTIVE CALENDAR DAYS AFTER REMOVAL OF THE EXISTING SIDEWALKS.
6. THE CONTRACTOR SHALL PLACE ALL EQUIPMENT AND MATERIAL IN HIS/HER FIELD YARD OR ON SITE AND OUTSIDE THE CLEAR ZONE TO AVOID INTERFERENCE WITH VEHICULAR OR PEDESTRIAN TRAFFIC, IN A LOCATION APPROVED BY THE ENGINEER AND THE TOWN OF BURRILLVILLE. NO EQUIPMENT OR MATERIAL MAY BE STORED IN ANY AREA UNDER RIDEM JURISDICTION INCLUDING, BUT NOT LIMITED TO, BIOLOGICAL WETLANDS AND THEIR ASSOCIATED PERIMETER WETLANDS. NO STORAGE OF MATERIALS OR EQUIPMENT ON PRIVATE PROPERTY IS ALLOWED WITHOUT WRITTEN PERMISSION.
7. THE CONTRACTOR SHALL TAKE ALL NECESSARY PRECAUTIONS TO PREVENT DAMAGE TO PUBLIC AND PRIVATE PROPERTY ABUTTING SIDEWALKS AND DRIVEWAYS DESIGNATED FOR REPLACEMENT INCLUDING, BUT NOT LIMITED TO, BUILDINGS, WALLS, FENCES, AND WALKS. WHERE INDICATED OR DIRECTED, NEW SIDEWALKS SHALL MEET SAID BUILDINGS, WALLS, AND FENCES UNLESS OTHERWISE SPECIFIED.
8. THE FINAL LOCATION OF ALL CURB RAMPS SHALL BE COORDINATED IN THE FIELD WITH PROPOSED AND/OR EXISTING LOCATIONS OF DRAINAGE STRUCTURES, UTILITY POLES, LIGHT POLES, AND OTHER APPURTENANCES TO ENSURE A MINIMUM 36" CLEAR PEDESTRIAN PATH.
9. PRIOR TO SIDEWALK REMOVAL, AT THE DIRECTION OF THE ENGINEER, A FULL DEPTH SAWCUT SHALL BE PROVIDED IN ALL SIDEWALKS TO BE REMOVED A DISTANCE (6 INCHES MIN.), TO BE DETERMINED BY THE ENGINEER, FROM THE FACE OF ADJACENT BUILDINGS AND RETAINING WALLS. IF A DETERMINATION IS MADE IN THE FIELD BY THE ENGINEER THAT THE FINAL 6 INCHES (MIN.) OF SIDEWALK WILL BE REMOVED, IT WILL BE CAREFULLY REMOVED BY HAND IN A MANNER SUCH THAT THE ADJACENT STRUCTURE IS NOT DAMAGED. THERE WILL BE NO SEPARATE PAYMENT FOR THIS ITEM. HAND REMOVAL WILL BE INCLUDED IN THE BID PRICE OF ITEM 201.0403. THE SAWCUT WILL BE PAID FOR SEPARATELY UNDER THE APPLICABLE ITEM CODE. NEW SIDEWALK WILL MATCH AT CUT LINE LOCATIONS TO BE DETERMINED. IF THE NEW SIDEWALK MATCHES AT A LONGITUDINAL CUT LINE, THE REQUIRED EXPANSION JOINT MATERIAL WILL BE CONSIDERED INCIDENTAL TO THE PRICE OF THE NEW SIDEWALK. CONTRACTOR WILL BE RESPONSIBLE FOR REMEDYING ANY DAMAGE DIRECTLY RESULTING FROM FAILURE TO CONSULT AND/OR FOLLOW ENGINEER'S DIRECTION.
10. THE CONTRACTOR IS SOLELY RESPONSIBLE FOR PROTECTING FRESHLY PLACED CONCRETE SIDEWALKS AND DRIVEWAYS FROM DAMAGE UNTIL THE CONCRETE HAS CURED SUFFICIENTLY. COSTS TO REPLACE DAMAGE TO FRESHLY PLACED CONCRETE WILL BE THE CONTRACTOR'S RESPONSIBILITY WITH NO ADDITIONAL CHARGE TO THE STATE.
11. DIMENSIONS SHOWN ON THE PLANS ARE APPROXIMATE.
12. THE CONTRACTOR SHALL NOTIFY IN WRITING ALL BUSINESS AND PROPERTY OWNERS ABUTTING THE SIDEWALK WORK 48 HOURS PRIOR TO COMMENCING WORK.
13. NO UNPROTECTED CONSTRUCTED FEATURE, e.g. HEADWALL, DRAINAGE INLET, ETC., MAY PROJECT MORE THAN 4 INCHES ABOVE THE FINISHED GRADE OF A TRAVERSABLE SLOPE IN A CLEAR ZONE.
14. THE REMAINING SECTION OR STUB OF BREAKAWAY BASE e.g. SIGN POSTS, LIGHT POLES, FIRE HYDRANTS, ETC., MAY NOT PROJECT MORE THAN 4 INCHES ABOVE THE FINISHED GRADE OF A TRAVERSABLE SLOPE IN A CLEAR ZONE.
15. THE PROPOSED SIDEWALK SHALL BE INSTALLED SO AS TO NOT BLOCK ANY DOWNSPOUTS OR WEEP HOLES LOCATED AT THE BACK OF SIDEWALK FOR BUILDINGS OR RETAINING WALLS.
16. IF THE CONTRACTOR CHOOSES TO DO NIGHT WORK, IT SHALL BE DONE AT NO ADDITIONAL COST TO THE STATE. NO ADDITIONAL PAYMENT WILL BE MADE FOR WORK ZONE LIGHTING.
17. THE COST FOR REMOVAL AND DISPOSAL OF THE BITUMINOUS BERM SHALL BE INCLUDED IN THE PRICE OF REMOVAL AND DISPOSAL OF FLEXIBLE PAVEMENT.

Environmental Management JUN 11 2015 Coastal Resources

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

REVISIONS		
NO.	DATE	BY

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

JOB SPECIFIC
PLAN SYMBOLS, LEGEND, AND NOTES NO. 1

CHECKED BY _____ DATE _____ SCALE NO SCALE

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FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		6	44

JOB SPECIFIC UTILITY NOTES:

1. UTILITY POLE NO. 550 AT STATION 66+83, 16.8' LT IS TO BE TEMPORARILY SUPPORTED DURING THE CONSTRUCTION OF THE ADJACENT CULVERTS. IF REQUIRED, TEMPORARY SUPPORT WILL ALSO BE PROVIDED FOR UTILITY POLE NOS. 548 AND 548S. THERE SHALL BE NO SEPARATE PAYMENT FOR THE TEMPORARY SUPPORT.
2. EXISTING UTILITIES AND SERVICE CONNECTIONS (ELECTRIC, GAS, TELEPHONE, WATER, SANITARY, CABLE TELEVISION, ETC.) HAVE BEEN SHOWN ON THE PLANS USING THE BEST AVAILABLE INFORMATION AND ARE APPROXIMATE. CONTRACTOR IS TO ASSUME THAT OTHER SERVICES ARE PRESENT TO ALL BUILDINGS. LOCATIONS OF THE SERVICES WILL BE CHECKED BY THE CONTRACTOR WITH THE APPROPRIATE UTILITY COMPANIES.
3. PRIOR TO UTILITY CONSTRUCTION, THE CONTRACTOR IS RESPONSIBLE FOR VERIFYING THE LOCATION (HORIZONTAL AND VERTICAL) OF ALL EXISTING PIPES AND/OR STRUCTURES WHICH ARE TO BE CONNECTED. ANY VARIATION FROM THE PLANS MUST BE BROUGHT TO THE ENGINEER'S ATTENTION PRIOR TO UTILITY CONSTRUCTION. WORK CAN COMMENCE ONLY UPON THE ENGINEER'S AUTHORIZATION.
4. DURING CONSTRUCTION, THE CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTAINING DRAINAGE AND RUNOFF FLOW DURING STORMS AND PERIODS OF RAINFALL THROUGHOUT THE WORK AREA.
5. ALL EXISTING MANHOLES, CATCH BASINS, ROADWAY BOXES, AND SIDEWALK CURB STOPS FOR ALL UTILITIES WITHIN THE PROJECT WORK LIMITS SHALL BE ADJUSTED TO GRADE AS REQUIRED EXCEPT WHERE REPLACEMENT OR RECONSTRUCTION IS CALLED FOR ON THE PLANS, IN THE CONTRACT DOCUMENTS OR DIRECTED BY THE ENGINEER.
6. ONLY NON-MECHANICAL MEANS OF EXCAVATION SHALL BE USED IN AREAS ADJACENT TO UNDERGROUND UTILITIES UNLESS OTHERWISE DIRECTED BY THE ENGINEER.
7. THE CLEANING OF CATCH BASINS SHALL BE CONDUCTED AFTER THE ROADWAY IS PAVED.
8. SEDIMENTS REMOVED FROM THE CATCH BASINS SHALL BE LEGALLY DISPOSED OF.
9. WHERE AN EXISTING UTILITY IS FOUND TO CONFLICT WITH THE PROPOSED WORK, THE LOCATION, ELEVATION, AND SIZE OF THE UTILITY SHALL BE ACCURATELY DETERMINED WITHOUT DELAY BY THE CONTRACTOR, AND THE INFORMATION FURNISHED TO THE ENGINEER FOR RESOLUTION OF THE CONFLICT.

JOB SPECIFIC SIGN & PAVEMENT MARKING NOTES:

1. ALL NEW REGULATORY, WARNING AND GUIDE SIGNS SHALL HAVE NEW SIGN SUPPORTS. UNLESS OTHERWISE INDICATED, SIGN MOUNTINGS SHALL BE R.I. STD. 24.2.0.
2. SIGNS SHALL HAVE A MINIMUM VERTICAL CLEARANCE OF 7' OVER THE SIDEWALK.
3. ALL SIGN RADII, BORDERS, AND ARROWS SHALL BE AS SPECIFIED IN THE LATEST EDITION OF THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MUTCD), WITH ALL REVISIONS.
4. THE LOCATION OF PAVEMENT MARKINGS SHALL BE IN ACCORDANCE WITH THE LATEST EDITION OF THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MUTCD), WITH ALL REVISIONS.
5. PROPOSED SIGN LOCATIONS SHOWN ON THE PLANS ARE APPROXIMATE. THE FINAL LOCATION OF THE SIGNS SHALL BE COORDINATED IN THE FIELD SO THAT THE SIGN IS NOT OBSTRUCTED BY THE TREE LINE, UTILITY POLES, AND OTHER APPURTENANCES AND SHALL BE APPROVED BY THE ENGINEER. EXISTING SIGNS DESIGNATED TO BE REMOVED AND DISPOSED SHALL BE DISPOSED PRIOR TO PLACING NEW SIDEWALKS. CUTTING THE EXISTING SIGN POST AFTER SIDEWALKS ARE PLACED IS NOT ACCEPTABLE.

JOB SPECIFIC MAINTENANCE AND PROTECTION OF TRAFFIC NOTES:

1. ALL EXISTING TRAVEL LANES SHALL BE OPEN TO TRAFFIC WHENEVER CONSTRUCTION IS NOT TAKING PLACE. SAFE ACCESS AND EGRESS TO DRIVEWAYS AND SIDE STREETS SHALL BE MAINTAINED AT ALL TIMES, EXCEPT AS PREVIOUSLY APPROVED BY THE ENGINEER.
2. AT NO TIME WILL THE CONES, BARRICADES OR DRUMS BE ALLOWED TO COVER THE LANES OR EXTEND INTO A LANE OPEN TO TRAFFIC.
3. END CONSTRUCTION SIGNS (G20-2A) SHALL BE MOUNTED ON THE RIGHT-SIDE OF THE ROADWAY 500 FEET BEYOND THE PROJECT LIMITS. THESE SHALL REMAIN IN PLACE UNTIL THE PROJECT IS COMPLETE.
4. THE CONTRACTOR SHALL MAINTAIN ACCESS TO THE FRONT DOORS OF ALL BUSINESSES AND RESIDENCES LOCATED WITHIN THE PROJECT LIMITS AND IS RESPONSIBLE TO MAINTAIN SAFE ACCESS FOR PEDESTRIAN TRAFFIC TO BUILDING OPENINGS DURING HIS OPERATIONS TO THE SATISFACTION OF THE ENGINEER. ACCESS "BOARDWALK" TYPES SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL. NO ADDITIONAL PAYMENT WILL BE MADE TO PROVIDE ACCESS/EGRESS TO PROPERTIES.
5. THE CONTRACTOR SHALL NOTIFY THE ENGINEER AND THE MUNICIPALITY SEVEN DAYS IN ADVANCE OF ANY PROPOSED STREET CLOSURE OF MORE THAN FOUR HOURS.
6. PEDESTRIANS SHOULD BE PROVIDED WITH A REASONABLY SAFE, CONVENIENT, AND ACCESSIBLE PATH THAT REPLICATES, AS NEARLY AS PRACTICAL, THE CHARACTERISTICS OF THE EXISTING SIDEWALKS.
7. A PEDESTRIAN ROUTE SHALL NOT BE SEVERED AND/OR MOVED FOR NON-CONSTRUCTION ACTIVITIES SUCH AS PARKED VEHICLES OR EQUIPMENT.
8. UNLESS A REASONABLY SAFE ROUTE THAT DOES NOT INVOLVE CROSSING THE ROADWAY CAN BE PROVIDED, PEDESTRIANS SHOULD BE APPROPRIATELY DIRECTED WITH ADVANCED SIGNING THAT ENCOURAGES THEM TO CROSS TO THE OPPOSITE SIDE OF THE ROADWAY.

JOB SPECIFIC SOIL EROSION AND SEDIMENTATION CONTROL NOTES:

1. NO UNDISTURBED AREAS SHALL BE CLEARED OF EXISTING VEGETATION AFTER OCTOBER 15 OF ANY CALENDAR YEAR OR DURING ANY PERIOD OF FULL OR LIMITED WINTER SHUTDOWN. ALL DISTURBED SOILS EXPOSED PRIOR TO OCTOBER 15 OF ANY CALENDAR YEAR SHALL BE SEEDED OR PROTECTED BY THAT DATE. ANY SUCH AREAS THAT DO NOT HAVE ADEQUATE VEGETATIVE STABILIZATION, AS DETERMINED BY THE RESIDENT ENGINEER OR ENVIRONMENTAL INSPECTOR, BY NOVEMBER 15 OF ANY CALENDAR YEAR, MUST BE STABILIZED THROUGH THE USE OF EROSION CONTROL MATTING OR HAY MULCH IN ACCORDANCE WITH SPECIFICATIONS CONTAINED WITHIN THE R.I. SOIL EROSION AND SEDIMENT CONTROL HANDBOOK. IF WORK CONTINUES WITHIN ANY OF THESE AREAS DURING THE PERIOD FROM OCTOBER 15 THROUGH APRIL 15, CARE MUST BE TAKEN TO ENSURE THAT ONLY THE AREA REQUIRED FOR THAT DAY'S WORK IS EXPOSED, AND ALL ERODIBLE SOIL MUST BE RESTABILIZED WITHIN 5 WORKING DAYS. ANY WORK TO CORRECT PROBLEMS RESULTING FROM FAILURE TO COMPLY WITH THIS PROVISION SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR. THERE WILL BE NO SEPARATE PAYMENT FOR THIS PROVISION, IT SHALL BE CONSIDERED INCIDENTAL TO CONSTRUCTION OPERATIONS. STABILIZATION OF ONE FORM OR ANOTHER AS DESCRIBED ABOVE SHALL BE ACHIEVED WITHIN 2 WEEKS OF FINAL GRADING.
2. ALL TEMPORARY SOIL STOCKPILE AREAS SHALL BE PROTECTED WITH COMPOST FILTER SOCK, AND, WHEN LEFT EXPOSED FOR LONG PERIODS OF TIME (GREATER THAN 20 DAYS), WITH A SPREAD HAY MULCH AND WOVEN NETTING (OR EXCELSIOR EROSION CONTROL MATTING). THERE SHALL BE NO SEPARATE PAYMENT FOR THESE PROVISIONS, IT SHALL BE CONSIDERED INCIDENTAL TO CONSTRUCTION OPERATIONS.
3. ANY PUMPING OF ACCUMULATED GROUNDWATER OR SURFACE WATER IN THE PROPOSED PROJECT CONSTRUCTION AREA, WHICH MAY BE NECESSARY FOR DEWATERING, SHALL BE DISCHARGED INTO SEDIMENT TRAPS (R.I. STD. 9.7.0) CONSISTING OF A CHAMBER CONSTRUCTED OF CONCRETE MEDIAN BARRIERS (R.I. STD 40.2.0) TO BE LINED WITH A FILTER FABRIC (INCLUDING WALLS), ENCLOSED CRUSHED STONE TO DISPERSE INFLOW VELOCITY. FILTER FABRIC SHALL BE ANCHORED WITH SAND BAGS ATOP THE MEDIAN. BARRIERS AND HAYBALES SHALL BE INSTALLED AT THE OUTLET LOCATION ONE CORNER OF THE CHAMBER. THE COMPLETE REMOVAL OF THESE DEVICES (HAYBALES, STONE, BARRIER, SEDIMENT, ETC.) SHALL OCCUR UPON CONSTRUCTION COMPLETION.
4. DURING THE CONSTRUCTION, THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALL EROSION CONTROL MAINTENANCE AND SHALL INSPECT/REPLACE ALL CONTROLS AS NEEDED. MAINTENANCE SHALL BE CARRIED OUT IN ACCORDANCE WITH SECTION 212 OF THE LATEST RIDOT STANDARD SPECIFICATIONS. THE CONTRACTOR IS RESPONSIBLE FOR CARRYING OUT NECESSARY MAINTENANCE DURING ALL PHASES OF THE PROJECT CONSTRUCTION, INCLUDING PERIODS OF "WINTER SHUTDOWN".
5. UPON COMPLETION OF PROJECT CONSTRUCTION, AND PRIOR TO VACATING THE SITE, THE CONTRACTOR SHALL CONDUCT A FINAL INSPECTION AND REPAIR ANY VEGETATIVE SOIL EROSION AND SEDIMENTATION CONTROL MEASURES (SEEDING, PLANTING, ETC.) WHERE REQUIRED, AND REPAIR (OR REMOVE WHERE APPROPRIATE) ANY TEMPORARY SOIL EROSION AND SEDIMENTATION CONTROL DEVICE (COMPOST FILTER SOCKS, SANDBAGS, ETC). AFTER PERMANENT SOIL STABILIZATION ON THE ENTIRE SITE HAS OCCURRED, ALL TEMPORARY CONTROL MEASURES MUST BE REMOVED.

JOB SPECIFIC FRESHWATER WETLAND NOTES:

1. PRIOR TO COMMENCING CONSTRUCTION ACTIVITIES, EROSION AND SEDIMENTATION CONTROLS WILL BE INSTALLED AT THOSE AREAS INDICATED ON THE PLANS OR AS DICTATED BY RIDEM. CLEARING MAY OCCUR PRIOR TO THE INSTALLATION OF SUCH CONTROLS, HOWEVER NO GRUBBING, GRADING, FILLING OR OTHER SOIL DISTURBANCE SHALL OCCUR PRIOR TO INSTALLATION.
2. ALL EXCESS SOIL, STUMPS, TREES, ROCKS, BOULDERS. AND OTHER NON-ROADWAY RELATED (I.E. PAVEMENT MILLINGS, ETC.) REFUSE SHALL BE LEGALLY DISCARDED OFF-SITE IN AN APPROPRIATE UPLAND LOCATION, OUTSIDE OF ALL REGULATED FRESHWATER WETLAND AREAS AND NOT ON PRIVATE PROPERTY.
3. THE COMPOST FILTER SOCK ILLUSTRATED ON THESE PLANS, TO BE STAKED IN THE FIELD PRIOR TO CONSTRUCTION, SHALL SERVE AS THE STRICT LIMITS OF DISTURBANCE FOR THE PROJECT WITHIN OR ADJACENT TO REGULATED FRESHWATER WETLAND AREAS. NO ALTERATIONS, INCLUDING VEGETATIVE CLEARING OR SURFACE DISTURBANCE, SHALL OCCUR BEYOND THIS COMPOST FILTER SOCK LINE. ALL COMPOST FILTER SOCKS ARE TO BE INSTALLED AS SHOWN ON THE PLANS OR AS DIRECTED BY THE ENGINEER.
4. THE LIMITS OF DISTURBANCE OUTLINED ON THE GENERAL PLAN REPRESENTS PROPOSED ACTIVITIES WITHIN AREAS REGULATED UNDER THE RULES AND REGULATIONS GOVERNING THE ADMINISTRATION AND ENFORCEMENT OF THE FRESHWATER WETLANDS ACT (JUNE 2010).
5. COLD PLANE AND OVERLAY OPERATIONS PERFORMED WITHIN THE EXISTING RIGHT OF WAY ARE EXEMPT UNDER PROVISIONS OF RULE 6.0 GOVERNING THE ADMINISTRATION AND ENFORCEMENT OF THE FRESHWATER WETLANDS ACT (JUNE 2010).
6. THE LIMITS OF CLEARING, GRADING, AND DISTURBANCES (WITHIN THE LOD SHOWN ON THE PLANS) SHALL BE KEPT TO A MINIMUM WITHIN THE PROPOSED AREA OF CONSTRUCTION. ALL AREAS OUTSIDE OF THESE LIMITS, AS DEPICTED ON THE PROJECT PLANS, SHALL BE TOTALLY UNDISTURBED, AND TO REMAIN IN A COMPLETELY NATURAL CONDITION.
7. MOST OF THE PROJECT AREA IS LOCATED WITHIN THE 200' RIVERBANK WETLAND OF THE CLEAR RIVER (RIDEM RIVER > 10' WIDE), THE UNNAMED INTERMITTENT STREAMS (RIDEM STREAM < 10-FEET WIDE) AND THEIR ASSOCIATED WETLANDS,
8. NO CONSTRUCTION VEHICLES SHALL BE DRIVEN WITHIN WETLANDS OR INTO THE CLEAR RIVER. CONSTRUCTION MATERIALS AND DEBRIS, WHICH FALLS INTO THE WETLANDS OR RIVER, SHALL BE IMMEDIATELY REMOVED.
9. THE PROJECT IS LOCATED APPROXIMATELY 250 FEET WEST OF THE INTERSECTION OF UNION AVENUE AND MAIN STREET (ROUTE 107) IN THE TOWN OF BURRILLVILLE, R.I.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
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NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

RECEIVED JUN 11 2015 Environmental Management

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

JOB SPECIFIC
PLAN SYMBOLS, LEGEND, AND NOTES NO. 2

CHECKED BY _____ DATE _____ SCALE NO SCALE

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FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ–ZZZZ(XYZ)		7	44

JOB SPECIFIC GENERAL CONSTRUCTION NOTES:

1. ALL CONSTRUCTION INDICATED ON THESE PLANS SHALL BE IN ACCORDANCE WITH:
   - THE AMENDED AUGUST 2013 EDITION OF, AND SUPPLEMENTS TO, THE RHODE ISLAND DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION (RI STANDARD SPECIFICATIONS).
   - THE AMERICAN ASSOCIATION OF STATE HIGHWAY AND TRANSPORTATION OFFICIALS (AASHTO) LRFD BRIDGE CONSTRUCTION SPECIFICATIONS, THE LATEST RHODE ISLAND EDITION, INCLUDING THE LATEST INTERIM SPECIFICATIONS.
   - THE SPECIFICATIONS ACCOMPANYING THESE PLANS.
2. DIMENSIONS, STATIONS, AND ELEVATIONS ARE SHOWN TO THE NEAREST ONE–HUNDREDTH OF A FOOT OR ONE–EIGHTH OF AN INCH, EXCEPT STRUCTURAL STEEL DIMENSIONS WHICH ARE TO THE NEAREST ONE–SIXTEENTH OF AN INCH.
3. FOR BENCHMARKS AND TIES, SEE GENERAL PLAN AND PROFILE.
4. ANGLES ARE SHOWN TO THE NEAREST SECOND.
5. ALL WORKING POINTS ARE SHOWN AT THE CENTERLINES OF CULVERT OR WALL FASCIA, UNLESS OTHERWISE NOTED.
6. ALL WALLS ARE DRAWN LOOKING AT THE EXPOSED FACES.

JOB–SPECIFIC FOUNDATION NOTES:

1. PRECAST CULVERT AND FOOTINGS SHALL BE PLACED ON COMPACTED CRUSHED STONE OVERLAYING UNDISTURBED SOIL. PLACEMENT OF CRUSHED STONE AND FOOTING CONSTRUCTION SHALL BE COMPLETED IN THE DRY.
2. COMPACTED CRUSHED STONE SHALL BE APPROVED BY THE ENGINEER AS TO DIMENSIONS, ELEVATIONS, AND STABILITY PRIOR TO PLACEMENT OF ALL PRECAST UNITS.
3. PROTRUDING COBBLES AND BOULDERS ENCOUNTERED AT THE FINAL EXCAVATION LEVEL SHALL BE REMOVED AND REPLACED WITH CRUSHED STONE.
4. CONTROL OF WATER WITHIN THE EXCAVATION SHALL BE CONDUCTED IN SUCH A MANNER AS TO PREVENT DISTURBANCE OF THE BEARING SOIL. WELL POINTS, SUMPS, OR OTHER PUMPING AREAS SHALL BE LOCATED OUTSIDE THE FOOTING LIMITS AND PROPERLY FILTERED TO PREVENT PUMPING OF STRATIFIED SANDS AND SILTY SANDS BELOW THE EXCAVATION SUBGRADE. ALL COSTS SHALL BE INCLUDED IN ITEM 203.9902, WATER DIVERSION.
5. ANY FOUNDATION SOIL WEAKENED AS A RESULT OF INSUFFICIENT CARE TAKEN IN MAINTAINING A DEWATERED CONDITION SHALL BE REMOVED AND REPLACED WITH CRUSHED STONE UNDER STRUCTURES AT THE CONTRACTOR'S EXPENSE.

JOB SPECIFIC PRECAST BOX CULVERT AND WINGWALL NOTES:

1. THE DESIGN AND FABRICATION OF ALL PRECAST ELEMENTS SHALL BE IN ACCORDANCE WITH THE LATEST REVISION OF SECTION 809 "PRECAST/PRESTRESSED STRUCTURE CONCRETE MASONRY" OF THE RHODE ISLAND STANDARD SPECIFICATIONS.
2. THE CONTRACTOR IS REQUIRED TO SUBMIT DESIGN CALCULATIONS IN ACCORDANCE WITH CRITERIA OUTLINED IN THE PLANS AND SPECIFICATIONS FOR CULVERTS, HEADWALLS, WINGWALLS, FOOTINGS, AND ALL CONNECTIONS. HEADWALLS AND WINGWALLS AND THEIR CONNECTIONS TO THE POSTS SHALL BE DESIGNED TO RESIST VEHICULAR RAILING IMPACT IN ACCORDANCE WITH AASHTO LRFD CRITERIA. CALCULATIONS SHALL BE PREPARED AND STAMPED BY A RHODE ISLAND LICENSED PROFESSIONAL ENGINEER AND SUBMITTED TO THE ENGINEER FOR REVIEW AND APPROVAL.
3. ALL CALCULATIONS AND SHOP DRAWINGS SHALL BE SUBMITTED TO THE ENGINEER TO PERMIT CHECKING IN ACCORDANCE WITH SECTION 109.02.
4. ANY PRECAST MANUFACTURING PLANT FURNISHING PRECAST PRESTRESSED BRIDGE MEMBERS SHALL BE CERTIFIED BY THE PRECAST PRESTRESSED CONCRETE INSTITUTE PLAN CERTIFICATION PROGRAM. THE CERTIFICATION SHALL BE AT A MINIMUM IN THE B3 CATEGORY, EXCEPT FOR DRAPED STRAND BRIDGE MEMBERS, IN WHICH CASE A CATEGORY B4 CERTIFICATION WILL BE REQUIRED. THE MANUFACTURER SHALL SUBMIT PROOF OF CERTIFICATION PRIOR TO THE START OF PRODUCTION.
5. ALL COSTS FOR DESIGN AND ERECTION/INSTALLATION OF THE PRECAST BOX CULVERT, WINGWALLS, AND FOOTINGS SHALL BE INCLUDED IN ITEM 809.9901, PRECAST CONCRETE CULVERT AND APPURTENANCES.
6. THE FABRICATOR IS FULLY RESPONSIBLE FOR THE DESIGN OF THE LIFTING AND ANCHORAGE DEVICES THAT SHALL BE ADEQUATE FOR THE SAFETY FACTORS REQUIRED BY THE ERECTION PROCEDURE.
7. THE CONCRETE SHALL BE CLASS HP CONCRETE AND SHALL HAVE A MINIMUM 28–DAY COMPRESSIVE STRENGTH OF 5,000 PSI.
8. REINFORCEMENT SHALL CONFORM TO AASHTO DESIGNATION M 31 (ASTM DESIGNATION A 615) GRADE 60 AND SHALL BE GALVANIZED.
9. EXPOSED CORNERS SHALL BE CHAMFERED ¾" OR AS SHOWN ON PLANS.
10. ANY STRUCTURAL MEMBERS DAMAGED DURING FABRICATION, SHIPPING, OR ERECTION, SUCH THAT THEIR STRUCTURAL INTEGRITY IS COMPROMISED, SHALL BE REJECTED AND REPLACED AT THE CONTRACTOR'S OWN EXPENSE. THE ENGINEER SHALL BE THE SOLE JUDGE IN DETERMINING THE STRUCTURAL INTEGRITY OF DAMAGED PRECAST MEMBERS. ANY DAMAGE THAT IS NOT STRUCTURAL IN NATURE SHALL BE REPAIRED TO THE SATISFACTION OF THE ENGINEER AT NO ADDITIONAL COST TO THE STATE.
11. THE CONTRACTOR SHALL BE REQUIRED TO PREPARE AND SUBMIT AN ERECTION PLAN FOR DOCUMENTATION IN ACCORDANCE WITH ITEM 809.9901, PRECAST CONCRETE CULVERT AND APPURTENANCES. ERECTION PLAN SUBMITTALS SHALL BE DESIGNED AND STAMPED OR SEALED BY A PROFESSIONAL ENGINEER LICENSED IN THE STATE OF RHODE ISLAND.
12. SHOP DRAWINGS FOR PRECAST CONCRETE BOX CULVERT SECTIONS SHALL INCLUDE A PLAN FOR SHIMMING AND LEVELING THE CULVERT AND WINGWALL SECTIONS. ALL COSTS SHALL BE INCLUDED IN ITEM 809.9901, PRECAST CONCRETE CULVERT AND APPURTENANCES.
13. DIMENSIONAL TOLERANCES SHALL NOT EXCEED THOSE RECOMMENDED IN THE LATEST EDITION OF THE PCI MANUAL FOR QUALITY CONTROL FOR PLANTS AND OF PRECAST CONCRETE PRODUCTS. THE CONTRACTOR IS RESPONSIBLE FOR PROPER FIT–UP OF THE PRECAST AND ANY CAST–IN–PLACE ELEMENTS, PER FABRICATOR'S RECOMMENDATIONS, APPROVED SHOP AND ENGINEERING DRAWINGS, AND TO THE SATISFACTION OF THE ENGINEER.
14. DIMENSIONS AND GEOMETRIC LAYOUT OF THE STRUCTURE (LAYOUT DIMENSIONS, ELEVATIONS, AND WORKING POINT COORDINATES) WERE DEVELOPED BASED ON THE PRECAST CONCRETE BOX CULVERT AND WINGWALL DIMENSIONS SHOWN IN THESE PLANS. IF THE DIMENSIONS OR GEOMETRY OF THE PRECAST BOX CULVERT OR THE PRECAST WINGWALLS ARE ALTERED BY THE DESIGN, THE AFFECTED DIMENSIONS, ELEVATIONS, AND WORKING POINT COORDINATES SHALL BE ADJUSTED BY THE FABRICATOR ACCORDINGLY. ANY REQUIRED CHANGES TO THE DIMENSIONS OR GEOMETRIC LAYOUT ON THE PLANS SHALL BE INCLUDED IN ITEM 809.9901, PRECAST CONCRETE CULVERT AND APPURTENANCES.
15. ITEM 813.0200, 2–PLY PREFORMED WATERPROOFING MEMBRANE SHALL BE APPLIED IN A 16" WIDE STRIP CENTERED AT ALL JOINTS IN THE TOP SLAB AND EXTEND 2'0" DOWN THE SIDES OF THE BOX CULVERT. IT SHALL ALSO BE APPLIED AT THE JOINTS BETWEEN THE OUTSIDE FACE OF THE BOX CULVERT AND PRECAST WINGWALLS. THE LENGTH OF APPLICATION SHALL BE FROM TOP OF THE FOOTING TO 6" BELOW FINISHED GRADE BEHIND THE PRECAST WINGWALL.
16. THE DETAILS OF ALL INSERTS, ANCHORS, AND ANY OTHER ITEMS REQUIRED TO BE CAST INTO THE PRECAST UNITS (WHETHER DETAILED ON THE CONTRACT DRAWINGS OR PROVIDED FOR THE CONTRACTOR'S CONVENIENCE) SHALL BE SHOWN ON THE SHOP DRAWINGS. PRECAST UNITS SHALL NOT BE FIRED OR DRILLED INTO FOR ATTACHMENT PURPOSES. ALL HARDWARE SHALL BE GALVANIZED.
17. THE NON–SHRINK GROUT SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH OF 5,000 PSI AFTER 28 DAYS AS DETERMINED BY TESTING UNDER ASTM DESIGNATION C–109 AND SHALL NOT EXHIBIT ANY MEASURABLE DECREASE IN VOLUME AFTER CURING. THE CONTRACTOR SHALL STRICTLY FOLLOW THE MANUFACTURER'S RECOMMENDATIONS. NO TRAFFIC OR EQUIPMENT SHALL BE PERMITTED ON THE STRUCTURE UNTIL THE GROUT IS CURED FOR AT LEAST 72 HOURS OR AS DIRECTED BY THE ENGINEER. GROUTING SHALL BE PERFORMED IN ACCORDANCE WITH THE DETAILS SHOWN. THE GROUT SHALL BE ON THE RIDOT–APPROVED MATERIAL LIST.
18. ALLOWANCES FOR FABRICATION TOLERANCES SHALL BE PERMITTED IN ACCORDANCE WITH AASHTO AND PCI MANUAL.

JOB SPECIFIC DESIGN DATA:

1. DESIGN SPECIFICATIONS
   - THE AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS, 6TH EDITION, 2012, INCLUDING ALL INTERIM REVISIONS TO DATE.
   - THE RHODE ISLAND LRFD BRIDGE DESIGN MANUAL, 2007 EDITION, INCLUDING ALL REVISIONS TO DATE.
   - ALL OTHER APPLICABLE DESIGN SPECIFICATIONS ARE REFERENCED IN SECTION 1 OF THE RHODE ISLAND LRFD BRIDGE DESIGN MANUAL DATED 2007.
   - THE AMENDED AUGUST 2013 REVISION OF AND SUPPLEMENTS TO THE RHODE ISLAND DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION (RI STANDARD SPECIFICATIONS).
   - IN CASE OF CONFLICT, THE RHODE ISLAND LRFD BRIDGE DESIGN MANUAL SHALL GOVERN.
2. LOAD MODIFIERS

   THE LOAD MODIFIERS FOR THIS PROJECT ARE AS FOLLOWS:
   - THE LOAD MODIFIER FOR DUCTILITY SHALL BE TAKEN AS 1.0 FOR ALL LIMIT STATES.
   - THE LOAD MODIFIER FOR REDUNDANCY SHALL BE TAKEN AS 1.0
   - THE LOAD MODIFIER FOR OPERATIONAL IMPORTANCE SHALL BE TAKEN AS 1.05 FOR ADT ≥ 5,000, OTHERWISE 1.0.
3. LOAD FACTORS

   ALL LOAD FACTORS SHALL BE IN ACCORDANCE WITH THE AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS, EXCEPT AS MODIFIED IN THE RHODE ISLAND LRFD BRIDGE DESIGN MANUAL (SPECIFIED BELOW).
   - THE LOAD FACTOR FOR LIVE LOAD FOR THE EXTREME EVENT I SHALL BE TAKEN AS ZERO.
   - THE LOAD FACTOR FOR DEAD LOAD FOR THE EXTREME EVENT I AND EXTREME EVENT II SHALL BE TAKEN AS 1.0
   - THE LOAD FACTOR FOR SETTLEMENT FOR ALL LIMIT STATES SHALL BE TAKEN AS 1.0.
4. LIVE LOADS
   - THE DESIGN VEHICULAR LIVE LOAD SHALL BE THE HL–93 DESIGNATION ADJUSTED FOR DYNAMIC LOAD ALLOWANCE AND MULTIPLE PRESENCE FACTOR.
   - WHERE BRIDGE RAIL OR GUARDRAIL IS ATTACHED TO THE PRECAST CONCRETE HEADWALLS AND WINGWALLS, THE DESIGN OF THE HEADWALLS AND WINGWALLS SHALL INCLUDE VEHICULAR COLLISION FORCES IN ACCORDANCE WITH THE REQUIREMENTS OF THE LRFD BRIDGE DESIGN SPECIFICATIONS, 6TH EDITION, AS NOTED ABOVE.
5. FOUNDATION DESIGN DATA

   SPREAD FOOTINGS

   THE FACTORED BEARING RESISTANCE FOR THE VARIOUS TYPES OF BEARING MATERIAL ARE AS FOLLOWS: SEE GEOTECHNICAL DESIGN REPORT PREPARED BY BRYANT ASSOCIATES, DATED 08/14/13.
6. THERMAL DESIGN FORCE DATA

   UNIFORM TEMPERATURE EFFECTS HAVE BEEN TAKEN INTO CONSIDERATION IN ACCORDANCE WITH THE PROCEDURE A OF THE AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS. THE MINIMUM DESIGN TEMPERATURE SHALL BE 0 DEGREES F, AND THE MAXIMUM TEMPERATURE SHALL BE 80 DEGREES FAHRENHEIT.
7. SEISMIC DESIGN DATA

   THE SEISMIC ANALYSIS AND DESIGN SHALL BE IN ACCORDANCE WITH THE RHODE ISLAND LRFD BRIDGE DESIGN MANUAL.

   THE COMBINATION OF SEISMIC FORCE EFFECTS IS IN ACCORDANCE WITH THE RHODE ISLAND LRFD BRIDGE DESIGN MANUAL.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 2 2 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

[illegible]

JUN 11 2015

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

JOB SPECIFIC
PLAN SYMBOLS, LEGEND, AND NOTES NO. 3

CHECKED BY ________ DATE ________ SCALE NO SCALE

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		8	44

JOB SPECIFIC MATERIALS:

REINFORCING STEEL:

- AASHTO DESIGNATION M 31 (ASTM DESIGNATION A 615, GRADE 60).

CONCRETE STRENGTHS:

- CLASS HP 3/4"f'c = 5,000 PSI PRECAST CULVERTS, HEADWALLS, AND CAPS
- CLASS XX 3/4"f'c = 4,000 PSI REINFORCED FOOTINGS
- CLASS A 3/4"f'c = 3,000 PSI ALL OTHER CONCRETE

JOB-SPECIFIC CONCRETE NOTES:

1. CLASSES OF CONCRETE SHALL BE HIGH PERFORMANCE CLASS HP, CLASS XX, CLASS X, AND CLASS A, AS DESCRIBED IN THE RI STANDARD SPECIFICATIONS AND THE SPECIAL PROVISIONS OF THE SPECIFICATIONS. REFER TO THE "MATERIAL" NOTES FOR CLASSES OF CONCRETE SPECIFIED FOR VARIOUS COMPONENTS.

2. THE CONTRACTOR MAY, AT THE APPROVAL OF THE ENGINEER, PROPOSE THE USE OF SELF-CONSOLIDATING CONCRETE FOR ANY CLASS OF CONCRETE ON THIS PROJECT. SECTION 606, "SELF CONSOLIDATING CONCRETE (SCC)", CONTAIN THE REQUIREMENTS FOR MODIFYING ALL CLASSES OF CONCRETE MIX DESIGN FOR SELF-CONSOLIDATING APPLICATIONS.

3. ALL PORTLAND CEMENT CONCRETE SHALL BE AIR-ENTRAINED.

4. EXCEPT FOR FOOTINGS CAST BELOW GRADE, ALL REINFORCING STEEL SHALL BE GALVANIZED. ALL WIRE TIES AND MISCELLANEOUS HARDWARE USED FOR PLACEMENT OF GALVANIZED REINFORCING SHALL ALSO BE GALVANIZED. GALVANIZING FOR REINFORCING STEEL SHALL CONFORM TO ASTM A767.

5. ALL CRITICAL LAP SPLICES SHALL BE AS SHOWN ON THE PLANS. ALL SPLICES NOT SHOWN ON THE PLANS SHALL BE LAPPED IN ACCORDANCE WITH THE AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS FOR CLASS C LAP SPLICES.

6. ALL REINFORCING BARS SHALL HAVE THE FOLLOWING MINIMUM COVER:

	MINIMUM COVER
• CONCRETE CAST AGAINST OR PERMANENTLY EXPOSED TO EARTH (FOOTINGS, ABUTMENT AND WALL FACES, BACKWALLS)	3"
• CONCRETE DIRECTLY EXPOSED TO SALT OR BRACKISH WATER (TO MAIN REINFORCING)	4"
• ALL OTHER BARS	2"

   COVER TO TIES AND STIRRUPS MAY BE 0.5 INCH LESS THAN THE ABOVE VALUES SPECIFIED FOR MAIN REINFORCING BUT IN NO CASE LESS THAN 1.5 INCHES.

7. UNLESS OTHERWISE NOTED ON THE PLANS, ALL ANCHOR BOLTS SHALL BE ASTM DESIGNATION A 307 AND SHALL BE GALVANIZED IN ACCORDANCE WITH AASHTO DESIGNATION M 232 (ASTM DESIGNATION A 153) OR METALIZED IN A MANNER APPROVED BY THE ENGINEER. SUCH APPROVAL DOES NOT RELIEVE THE CONTRACTOR OF THE RESPONSIBILITY TO PREVENT CONCRETE STAINS OR DISCOLORATIONS. SWEDGED RODS SHALL BE AASHTO DESIGNATION M 270 (ASTM DESIGNATION A 709) GRADE 36 AND SHALL BE GALVANIZED IN ACCORDANCE WITH AASHTO DESIGNATION M 232 (ASTM DESIGNATION A 153).

8. ALL ANCHOR BOLTS SHALL BE SET PRIOR TO PLACEMENT OF CONCRETE UNLESS OTHERWISE AUTHORIZED BY THE ENGINEER.

9. HORIZONTAL CONSTRUCTION JOINTS OTHER THAN THOSE SHOWN ON THE PLANS WILL NOT BE PERMITTED WITHOUT A WRITTEN REQUEST BY THE CONTRACTOR AND PRIOR AUTHORIZATION BY THE ENGINEER.

10. UNLESS OTHERWISE NOTED ON THE PLANS, ALL EXPOSED CONCRETE SURFACES VISIBLE IN ELEVATION TO ONE FOOT BELOW FINAL GROUND LINE, AND THE UNDERSIDE OF ALL CONCRETE DECK SLABS OUTSIDE OF THE FASCIA BEAM, SHALL RECEIVE A CONCRETE SURFACE RUBBED FINISH IN ACCORDANCE WITH THE RI STANDARD SPECIFICATIONS.

11. ALL EXPOSED EDGES AND REENTRANT CORNERS NOT OTHERWISE DETAILED ON THE PLANS SHALL HAVE A MINIMUM ¾" CHAMFER.

12. ALL JOINT SEALANT SHALL BE POLYURETHANE BASE OR SILICONE SEALANT UNLESS OTHERWISE DESIGNATED ON THE PLANS. THE COLOR OF THE JOINT SEALANT, WHERE EXPOSED, SHALL BE NEUTRAL (LIGHT GRAY OR TAN). COLOR OF THE SEALANT, WHERE NOT EXPOSED, WILL BE AT THE DISCRETION OF THE CONTRACTOR.

13. THE CONTRACTOR SHALL BE RESPONSIBLE FOR PREVENTING CONCRETE STAINS OR DISCOLORATIONS DURING CONSTRUCTION UNTIL SUCH TIME AS THE SURFACES ARE APPROVED AND ACCEPTED. ANY CONCRETE STAINS OR DISCOLORATIONS OCCURRING PRIOR TO ACCEPTANCE OF THE SURFACES SHALL BE REMOVED BY THE CONTRACTOR AT HIS OWN EXPENSE.

14. UNLESS OTHERWISE NOTED ON THE PLANS, JOINT FILLER IS TO BE PREFORMED, NON-EXPANSIVE, NON-EXTRUDING TYPE IN ACCORDANCE WITH SECTION M.02.11.1 OF THE RI STANDARD SPECIFICATIONS.

JOB SPECIFIC CONCRETE (CONTINUED):

15. PLACEMENT, FINISHING, AND CURING OF PRECAST CULVERT CONCRETE SHALL BE IN ACCORDANCE WITH SECTION 814 OF THE RI STANDARD SPECIFICATIONS AND IN ACCORDANCE WITH THE SEQUENCE AND DIRECTION OF POURS, AS SHOWN ON THE PLANS.

16. IN ACCORDANCE WITH THE RI STANDARD SPECIFICATIONS, ALL METAL TIES OR ANCHORAGES THAT ARE REQUIRED FOR CONCRETE FORMWORK SHALL BE SO CONSTRUCTED THAT THEY CAN BE REMOVED TO AT LEAST TWO INCHES FROM THE EXPOSED SURFACE OF THE CONCRETE WITHOUT CAUSING DAMAGE TO THE CONCRETE SURFACE. SNAP TIES MAY BE USED ONLY IF APPROVED BY THE ENGINEER. IF A CONTRACTOR PROPOSES TO USE THEM, HE MUST SUBMIT A CATALOG CUT AND OTHER NECESSARY INFORMATION TO THE ENGINEER TO DEMONSTRATE THAT THE TIES WILL SNAP OFF FAR ENOUGH INTO THE CONCRETE TO ALLOW FOR PROPER PATCHING. SNAP TIES MUST PROVIDE ADEQUATE STRENGTH TO SUPPORT THE FORMS. ALL CAVITIES SHALL BE FILLED WITH AN APPROVED CEMENT MORTAR TO THE SATISFACTION OF THE ENGINEER.

JOB-SPECIFIC SHOP DRAWING SUBMITTALS:

1. CONCRETE MIX DESIGNS, PLACING, METHODS, EQUIPMENT, CURING PLAN AND METHODS, PERSONNEL RESOURCES.

2. PRECAST FOOTINGS, PRECAST WINGWALLS, PRECAST HEADWALLS, CURING AND CAPS, PRECAST CULVERT, REINFORCING STEEL, SPLICES, AND INSERTS, INCLUDING STRUCTURAL DESIGN CALCULATIONS FOR EACH.

3. PRECAST CONCRETE CULVERT, WINGWALLS, AND HEADWALL CONNECTIONS AND ANY DRILLING AND GROUTING REINFORCING REQUIRED FOR CONNECTIONS, INCLUDING STRUCTURAL DESIGN CALCULATIONS FOR EACH.

4. ERECTION PROCEDURES (INCLUDING QUALITY CONTROL PLAN, EQUIPMENT (TYPE/SIZE AND PLACEMENT), DETAILED SEQUENCE OF WORK).

5. BRIDGE RAIL, BEAM GUARDRAIL FOR APPROACHES, RAIL POSTS, BASE PLATES, ANCHOR RODS, WELD SPLICES AND WELDING PROCEDURES, AS NECESSARY, AND CONNECTIONS TO EXISTING BEAM GUARDRAIL.

6. DEWATERING AND WATER DIVERSION.

7. WATERPROOFING MEMBRANE AND DAMPPROOFING.

8. CULVERT DEMOLITION, EQUIPMENT, AND DETAILED SEQUENCE OF WORK.

9. STONE FACING SUPPORT, TREATMENT, AND SEQUENCE OF WORK.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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DATED SEP 2 2 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marion D. Gaboriault

Environmental Management
JUN 11 2015
Received

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

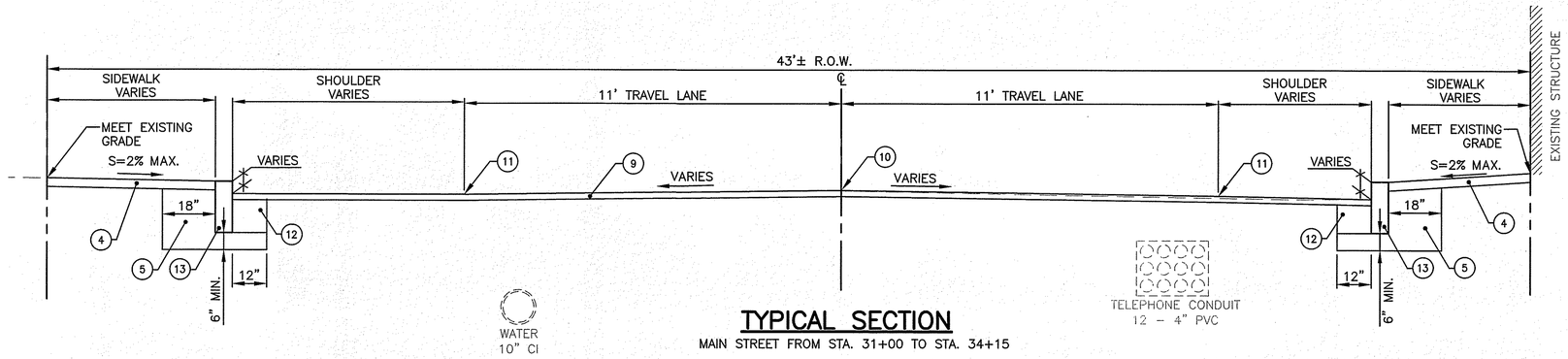
1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

JOB SPECIFIC
PLAN SYMBOLS, LEGEND, AND NOTES NO. 4

CHECKED BY _____ DATE _____ SCALE NO SCALE

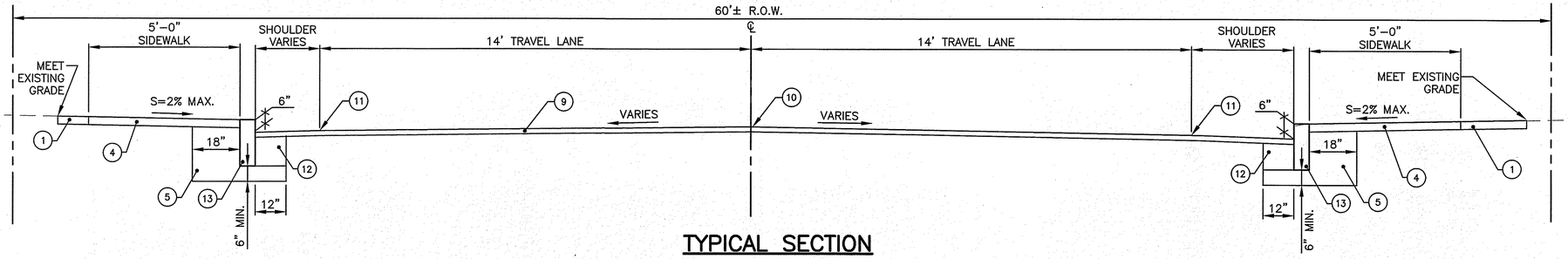
BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		9	44



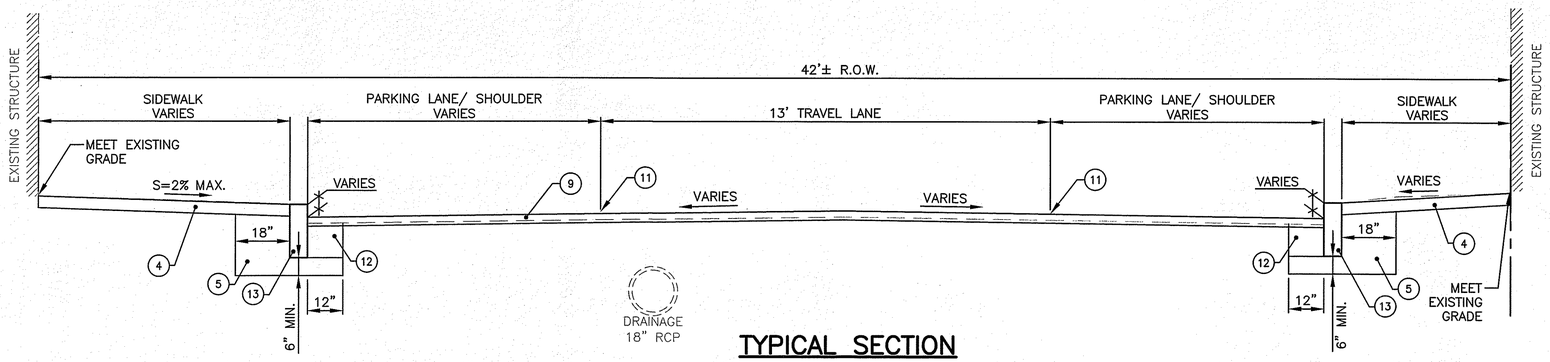
TYPICAL SECTION

MAIN STREET FROM STA. 31+00 TO STA. 34+15



TYPICAL SECTION

BRIDGEWAY



TYPICAL SECTION

MAIN STREET FROM STA. 24+77 TO STA. 29+50

LEGEND

1. LOAM BORROW 4" DEEP AND RESIDENTIAL SEEDING, TYPE 2
2. EROSION CONTROL BLANKET
3. STEEL BEAM GUARDRAIL, R.I. STD. 34.2.0
4. 4" CEMENT CONCRETE SIDEWALK R.I. STD. 43.1.0/ DRIVEWAY R.I. STD. 43.5.0
5. GRAVEL BORROW SUBBASE, SEE DETAILS SHEET NO. 1 FOR CURB RESETTING DETAIL
6. BITUMINOUS BERM R.I. STD. 7.5.1A MODIFIED, CLASS 12.5 MODIFIED/ GRADE TO DRAIN, SEE GENERAL PLANS FOR LOCATIONS
7. RETAINING WALL/ CULVERT WING WALL
8. 2" MODIFIED CLASS 12.5 DENSE GRADED HOT MIX ASPHALT 4" CLASS 19.0 DENSE GRADED HOT MIX ASPHALT
9. 2"/3" MODIFIED CLASS 12.5 DENSE GRADED HOT MIX ASPHALT, SEE GENERAL PLANS FOR LOCATIONS
10. 4" EPOXY RESIN PAVEMENT MARKINGS - DOUBLE YELLOW
11. 6" EPOXY RESIN PAVEMENT MARKINGS - WHITE
12. CLASS A PORTLAND CEMENT CONCRETE R.I. STD. 7.6.0
13. REMOVE, HANDLE, HAUL, TRIM, RESET CURB EDGING, STRAIGHT, CIRCULAR (ALL TYPES)/ GRANITE CURB, R.I. STD. 7.3.0, 7.3.1, 7.3.2, AS APPLICABLE, SEE GENERAL PLANS FOR LOCATIONS.
14. REMOVE AND RESET GUARDRAIL (PER RI STD 34.1.0)
15. DRY RIP-RAP

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE
Martha D. Wenck

RECEIVED Department of Environmental Management JUN 11 2015

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

TYPICAL SECTIONS NO. 1

CHECKED BY _____ DATE _____ SCALE NO SCALE

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

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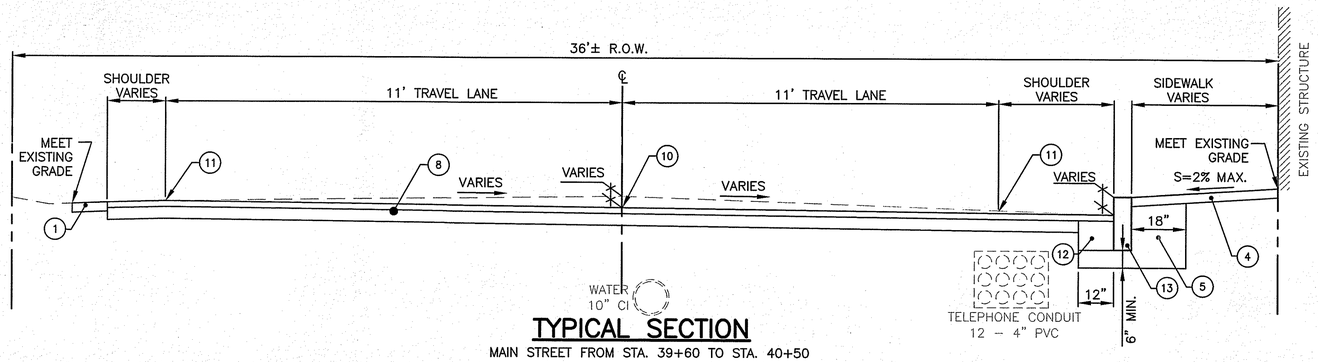
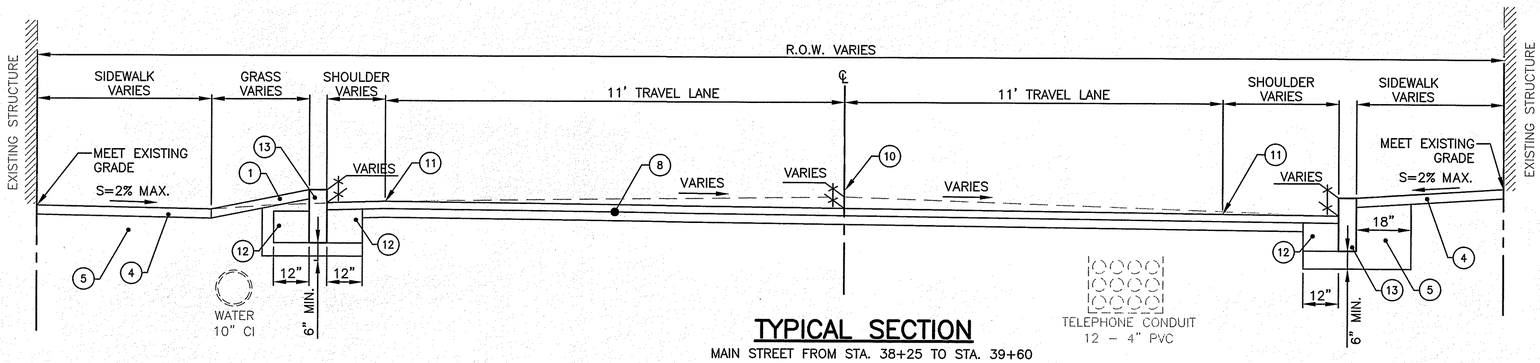
FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		10	44



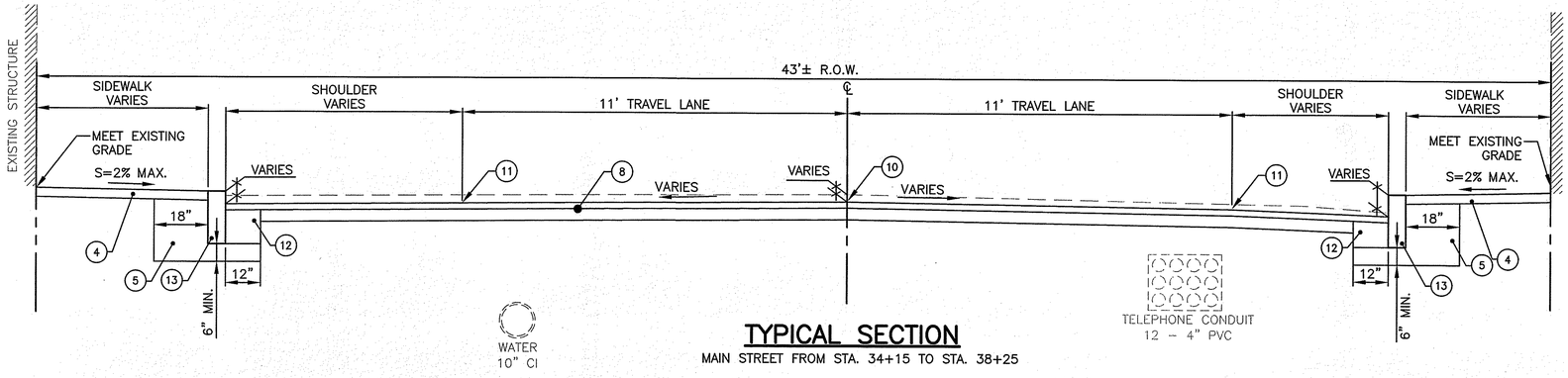
TYPICAL SECTION

MAIN STREET FROM STA. 39+60 TO STA. 40+50



TYPICAL SECTION

MAIN STREET FROM STA. 38+25 TO STA. 39+60



TYPICAL SECTION

MAIN STREET FROM STA. 34+15 TO STA. 38+25

LEGEND

1. LOAM BORROW 4" DEEP AND RESIDENTIAL SEEDING, TYPE 2
2. EROSION CONTROL BLANKET
3. STEEL BEAM GUARDRAIL, R.I. STD. 34.2.0
4. 4" CEMENT CONCRETE SIDEWALK R.I. STD. 43.1.0/ DRIVEWAY R.I. STD. 43.5.0
5. GRAVEL BORROW SUBBASE, SEE DETAILS SHEET NO. 1 FOR CURE RESETTING DETAIL
6. BITUMINOUS BERM R.I. STD. 7.5.1A MODIFIED, CLASS 12.5 MODIFIED/ GRADE TO DRAIN, SEE GENERAL PLANS FOR LOCATIONS
7. RETAINING WALL/ CULVERT WING WALL
8. 2" MODIFIED CLASS 12.5 DENSE GRADED HOT MIX ASPHALT 4" CLASS 19.0 DENSE GRADED HOT MIX ASPHALT
9. 2"/3" MODIFIED CLASS 12.5 DENSE GRADED HOT MIX ASPHALT, SEE GENERAL PLANS FOR LOCATIONS
10. 4" EPOXY RESIN PAVEMENT MARKINGS – DOUBLE YELLOW
11. 6" EPOXY RESIN PAVEMENT MARKINGS – WHITE
12. CLASS A PORTLAND CEMENT CONCRETE R.I. STD. 7.6.0
13. REMOVE, HANDLE, HAUL, TRIM, RESET CURB EDGING, STRAIGHT, CIRCULAR (ALL TYPES)/ GRANITE CURB, R.I. STD. 7.3.0, 7.3.1, 7.3.2, AS APPLICABLE, SEE GENERAL PLANS FOR LOCATIONS.
14. REMOVE AND RESET GUARDRAIL (PER RI STD 34.1.0)
15. DRY RIP-RAP

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 2 2 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Environmental Management JUN 11 2015 OFFICE OF WATER RESOURCES

REVISIONS NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

TYPICAL SECTIONS NO. 2

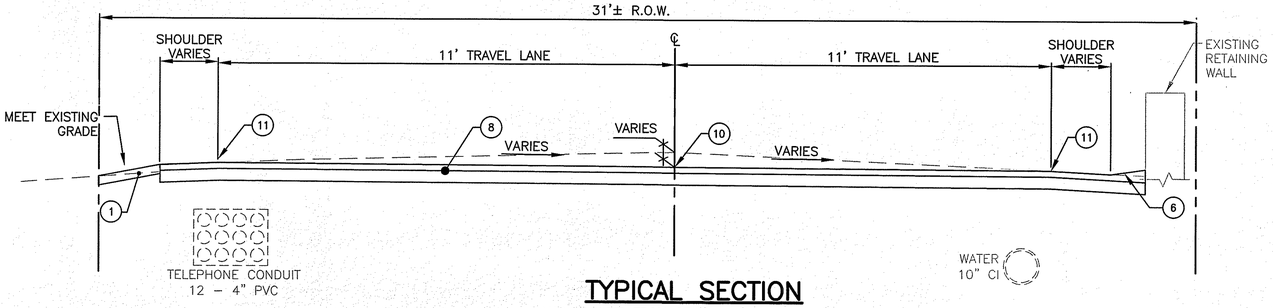
CHECKED BY _____ DATE _____ SCALE NO SCALE

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-205.dwg June 03, 2015 - 12:57pm lalmeida

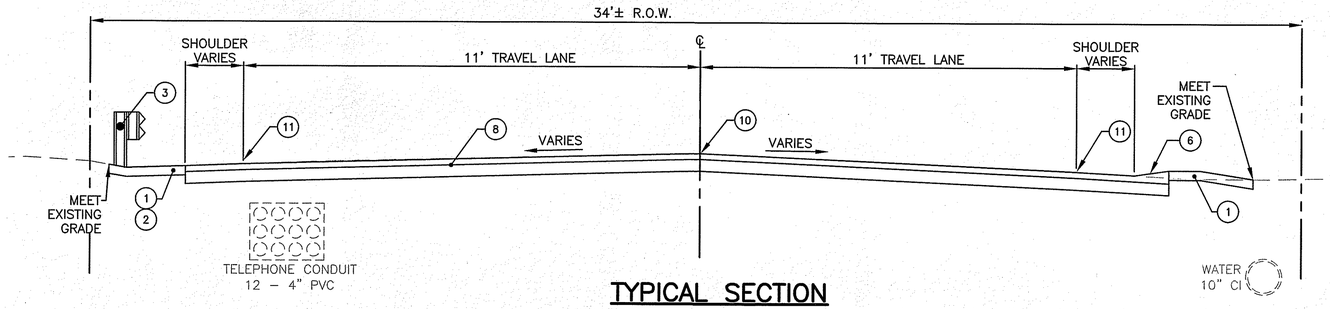
0076V_V1_010_TYPSEC2

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		11	44



TYPICAL SECTION

MAIN STREET FROM STA. 46+00 TO STA. 48+25
AND FROM STA. 50+25 TO STA. 53+25

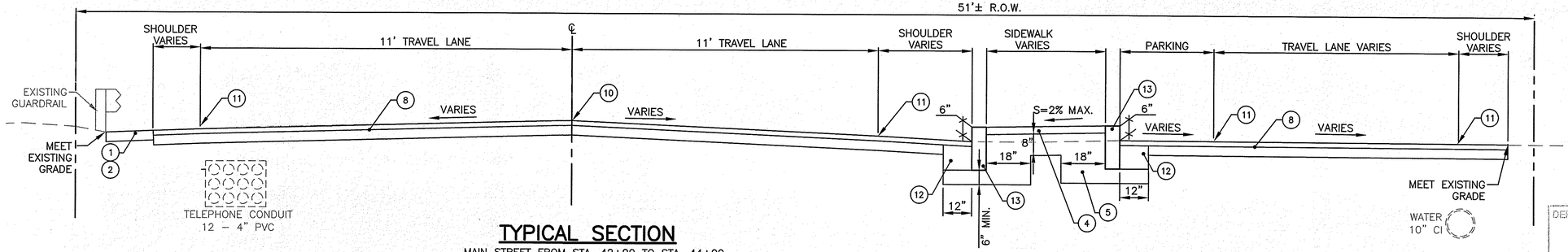


TYPICAL SECTION

MAIN STREET FROM STA. 44+00 TO STA. 46+00

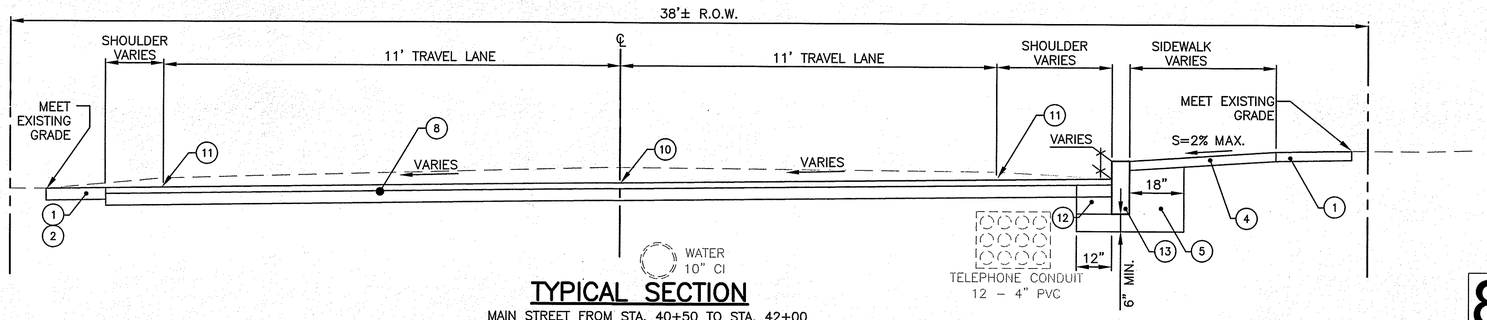
LEGEND

1. LOAM BORROW 4" DEEP AND RESIDENTIAL SEEDING, TYPE 2
2. EROSION CONTROL BLANKET
3. STEEL BEAM GUARDRAIL, R.I. STD. 34.2.0
4. 4" CEMENT CONCRETE SIDEWALK R.I. STD. 43.1.0/ DRIVEWAY R.I. STD. 43.5.0
5. GRAVEL BORROW SUBBASE, SEE DETAILS SHEET NO. 1 FOR CU RESETTING DETAIL
6. BITUMINOUS BERM R.I. STD. 7.5.1A MODIFIED, CLASS 12.5 MODIFIED/ GRADE TO DRAIN, SEE GENERAL PLANS FOR LOCATIONS
7. RETAINING WALL/ CULVERT WING WALL
8. 2" MODIFIED CLASS 12.5 DENSE GRADED HOT MIX ASPHALT 4" CLASS 19.0 DENSE GRADED HOT MIX ASPHALT
9. 2"/3" MODIFIED CLASS 12.5 DENSE GRADED HOT MIX ASPHALT SEE GENERAL PLANS FOR LOCATIONS
10. 4" EPOXY RESIN PAVEMENT MARKINGS – DOUBLE YELLOW
11. 6" EPOXY RESIN PAVEMENT MARKINGS – WHITE
12. CLASS A PORTLAND CEMENT CONCRETE R.I. STD. 7.6.0
13. REMOVE, HANDLE, HAUL, TRIM, RESET CURB EDGING, STRAIGHT CIRCULAR (ALL TYPES)/ GRANITE CURB, R.I. STD. 7.3.0, 7.3.1, 7.3.2, AS APPLICABLE, SEE GENERAL PLANS FOR LOCATIONS.
14. REMOVE AND RESET GUARDRAIL (PER RI STD 34.1.0)
15. DRY RIP-RAP



TYPICAL SECTION

MAIN STREET FROM STA. 42+00 TO STA. 44+00



TYPICAL SECTION

MAIN STREET FROM STA. 40+50 TO STA. 42+00

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marian D. Warnock

Environmental Management
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

TYPICAL SECTIONS NO. 3

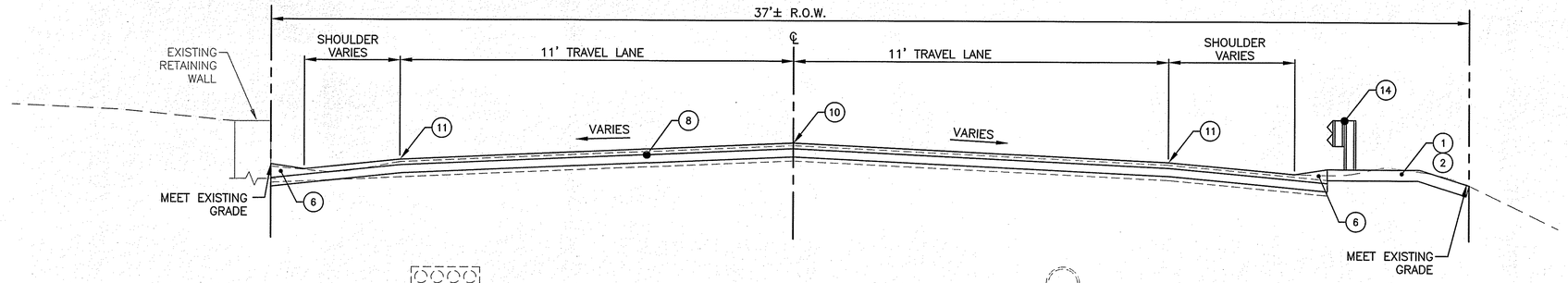
CHECKED BY _____ DATE _____ SCALE NO SCALE

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-205.dwg June 03, 2015 – 12:57pm lalmeida

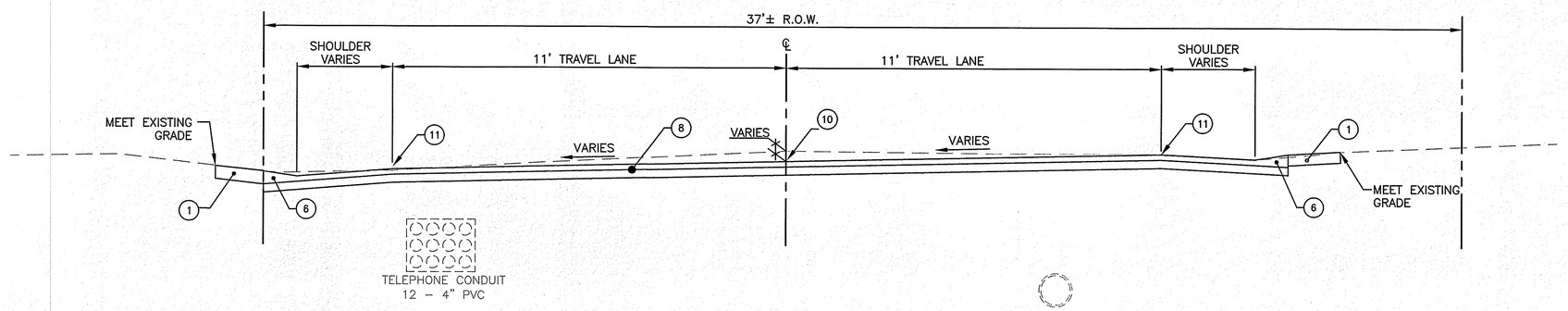
0076V_V1_011_TYPSEC3

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		12	44



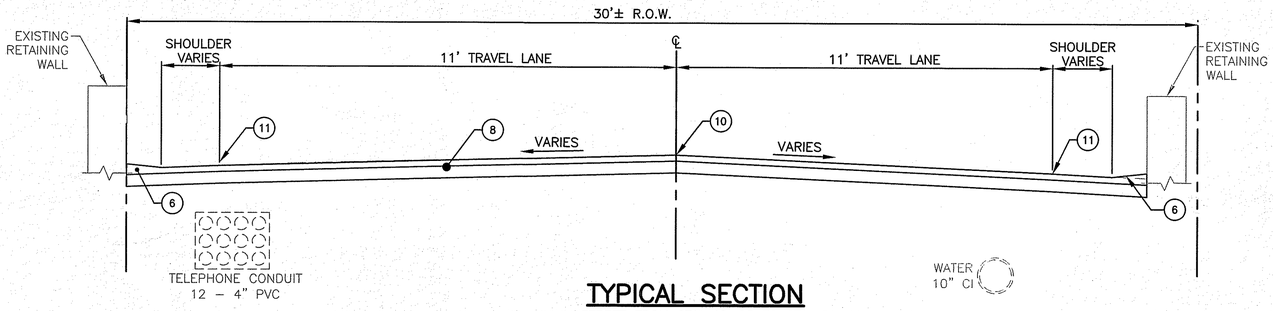
TYPICAL SECTION

MAIN STREET FROM STA. 63+75 TO STA. 66+75



TYPICAL SECTION

MAIN STREET FROM STA. 59+75 TO STA. 63+75



TYPICAL SECTION

MAIN STREET FROM STA. 48+25 TO STA. 50+25
AND FROM STA. 53+25 TO STA. 59+75

LEGEND

1. LOAM BORROW 4" DEEP AND RESIDENTIAL SEEDING, TYPE 2
2. EROSION CONTROL BLANKET
3. STEEL BEAM GUARDRAIL, R.I. STD. 34.2.0
4. 4" CEMENT CONCRETE SIDEWALK R.I. STD. 43.1.0/ DRIVEWAY R.I. STD. 43.5.0
5. GRAVEL BORROW SUBBASE, SEE DETAILS SHEET NO. 1 FOR CURE RESETTING DETAIL
6. BITUMINOUS BERM R.I. STD. 7.5.1A MODIFIED, CLASS 12.5 MODIFIED/ GRADE TO DRAIN, SEE GENERAL PLANS FOR LOCATIONS
7. RETAINING WALL/ CULVERT WING WALL
8. 2" MODIFIED CLASS 12.5 DENSE GRADED HOT MIX ASPHALT 4" CLASS 19.0 DENSE GRADED HOT MIX ASPHALT
9. 2"/3" MODIFIED CLASS 12.5 DENSE GRADED HOT MIX ASPHALT, SEE GENERAL PLANS FOR LOCATIONS
10. 4" EPOXY RESIN PAVEMENT MARKINGS – DOUBLE YELLOW
11. 6" EPOXY RESIN PAVEMENT MARKINGS – WHITE
12. CLASS A PORTLAND CEMENT CONCRETE R.I. STD. 7.6.0
13. REMOVE, HANDLE, HAUL, TRIM, RESET CURB EDGING, STRAIGHT, CIRCULAR (ALL TYPES)/ GRANITE CURB, R.I. STD. 7.3.0, 7.3.1, 7.3.2, AS APPLICABLE, SEE GENERAL PLANS FOR LOCATIONS.
14. REMOVE AND RESET GUARDRAIL (PER RI STD 34.1.0)
15. DRY RIP-RAP

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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DATED SEP 2 2 2015 FILE # 15-0122
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Environmental Management
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

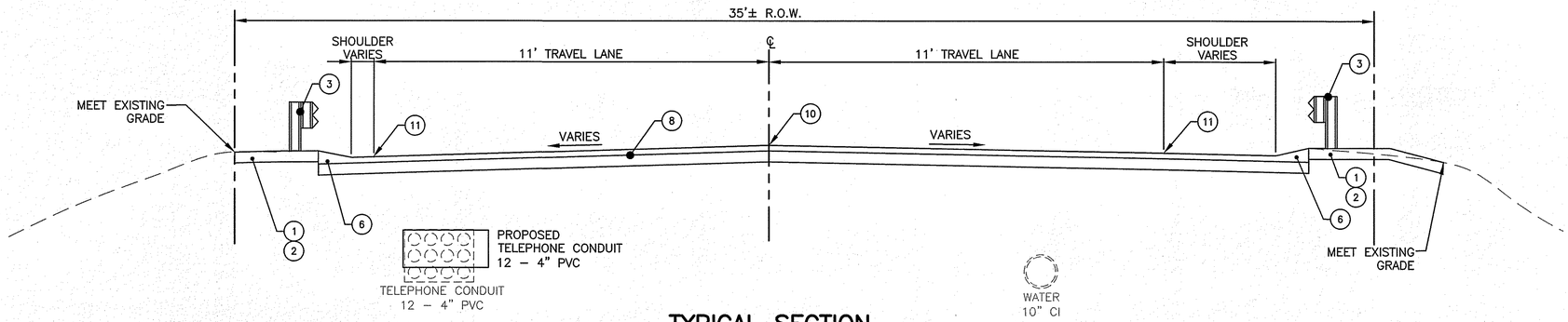
1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

TYPICAL SECTIONS NO. 4

CHECKED BY _____ DATE _____ SCALE NO SCALE

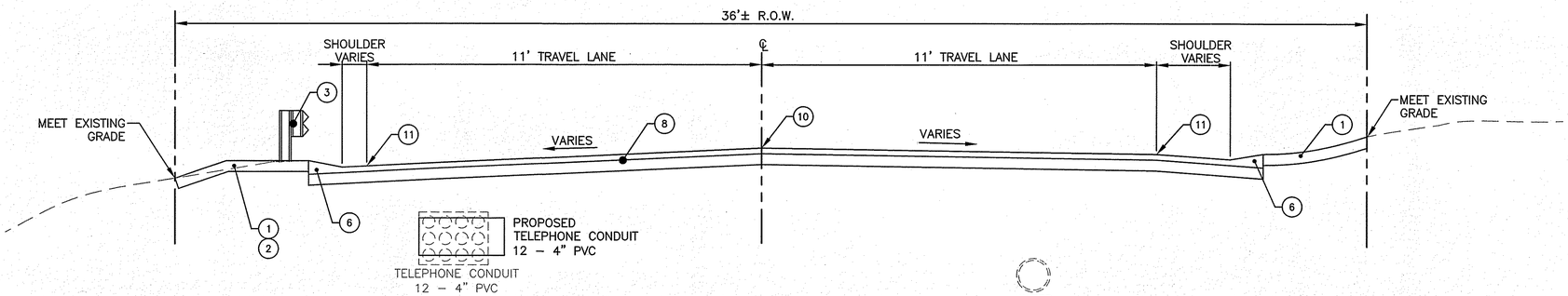
BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		13	44



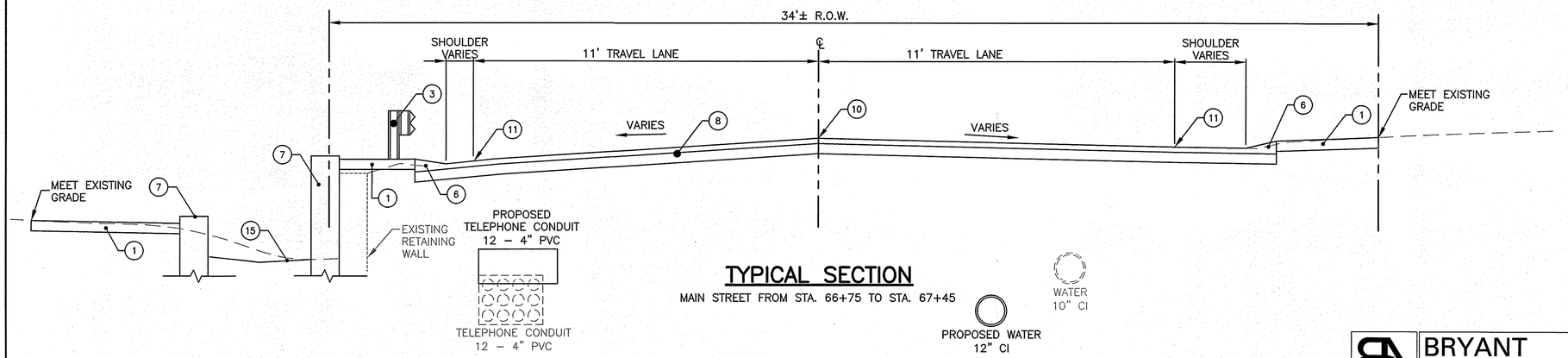
TYPICAL SECTION

MAIN STREET FROM STA. 0+20 TO STA. 1+30



TYPICAL SECTION

MAIN STREET FROM STA. 67+45 TO STA. 0+20
FROM STA. 1+30 TO STA. 2+33



TYPICAL SECTION

MAIN STREET FROM STA. 66+75 TO STA. 67+45

LEGEND

1. LOAM BORROW 4" DEEP AND RESIDENTIAL SEEDING, TYPE 2
2. EROSION CONTROL BLANKET
3. STEEL BEAM GUARDRAIL, R.I. STD. 34.2.0
4. 4" CEMENT CONCRETE SIDEWALK R.I. STD. 43.1.0/ DRIVEWAY R.I. STD. 43.5.0
5. GRAVEL BORROW SUBBASE, SEE DETAILS SHEET NO. 1 FOR CURE RESETTING DETAIL
6. BITUMINOUS BERM R.I. STD. 7.5.1A MODIFIED, CLASS 12.5 MODIFIED/ GRADE TO DRAIN, SEE GENERAL PLANS FOR LOCATIONS
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12. CLASS A PORTLAND CEMENT CONCRETE R.I. STD. 7.6.0
13. REMOVE, HANDLE, HAUL, TRIM, RESET CURB EDGING, STRAIGHT, CIRCULAR (ALL TYPES)/ GRANITE CURB, R.I. STD. 7.3.0, 7.3.1, 7.3.2, AS APPLICABLE, SEE GENERAL PLANS FOR LOCATIONS.
14. REMOVE AND RESET GUARDRAIL (PER RI STD 34.1.0)
15. DRY RIP-RAP

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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DATED SEP 2 2 2015 FILE # 15-0122
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APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marlene D. Wenzel

Environmental Management JUN 11 2015 Office of Water Resources

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NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

TYPICAL SECTIONS NO. 5

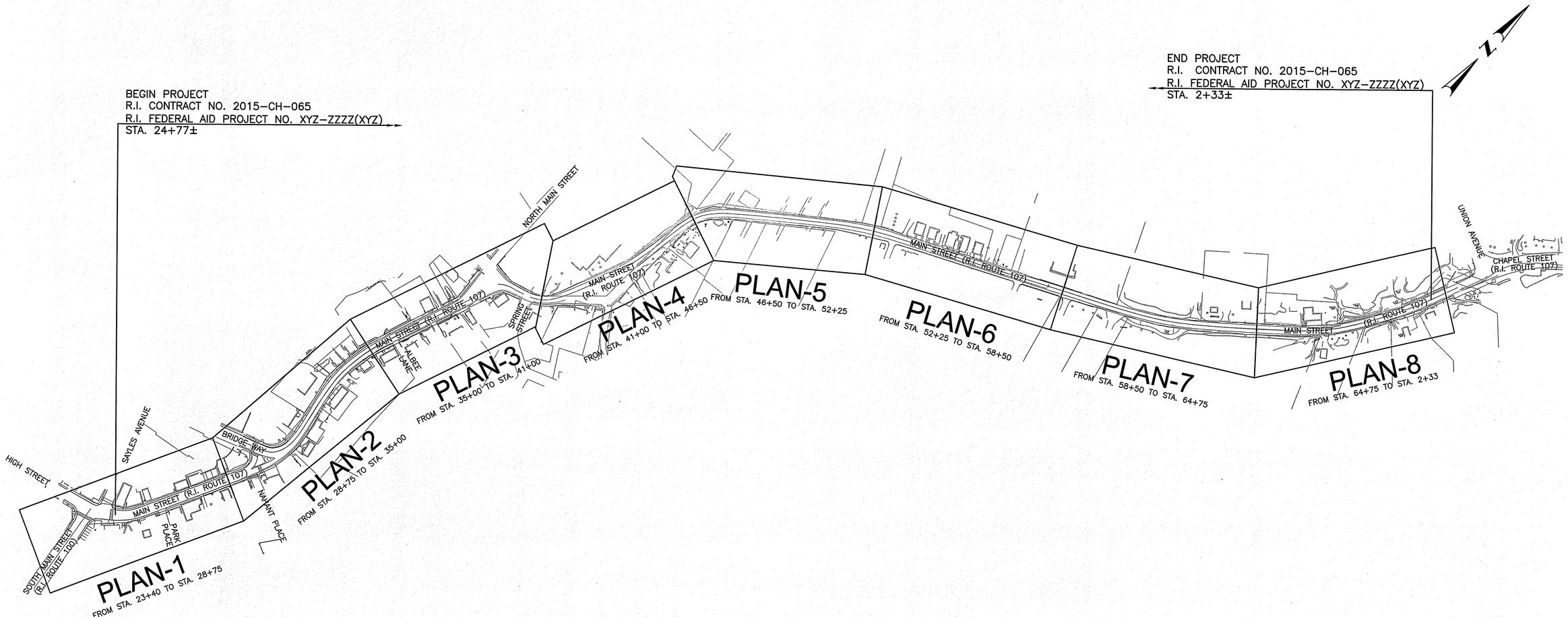
CHECKED BY _____ DATE _____ SCALE NO SCALE

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		14	44

BEGIN PROJECT
R.I. CONTRACT NO. 2015-CH-065
R.I. FEDERAL AID PROJECT NO. XYZ-ZZZZ(XYZ)
STA. 24+77±

END PROJECT
R.I. CONTRACT NO. 2015-CH-065
R.I. FEDERAL AID PROJECT NO. XYZ-ZZZZ(XYZ)
STA. 2+33±



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 2 2 2015 FILE # 15-0122
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Environmental Management
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

KEY PLAN

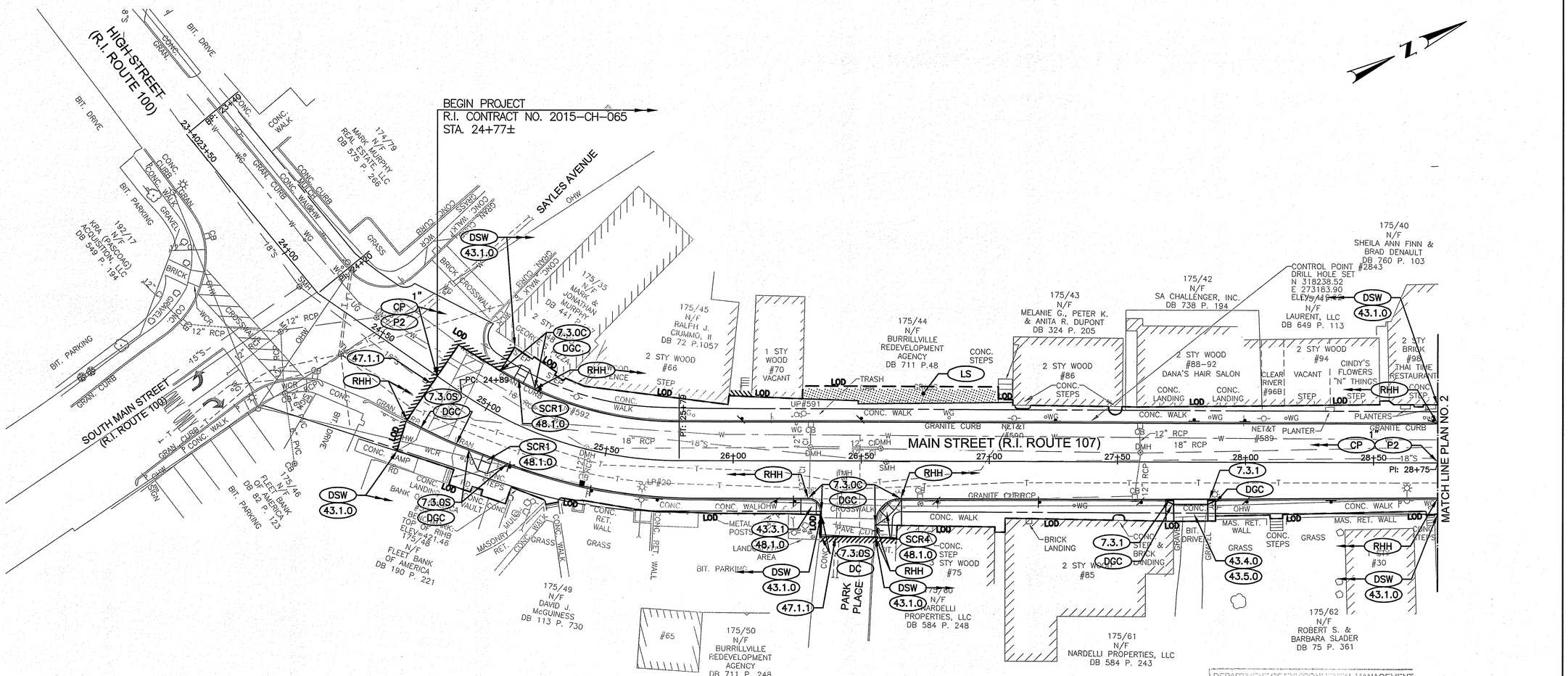
CHECKED BY _____ DATE _____ SCALE NO SCALE

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-206.dwg June 01, 2015 - 7:45pm lalmeida

0076X_V1-014_KEY

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		15	44



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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Environmental Management JUN 11 2015 Office of Water Resources

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

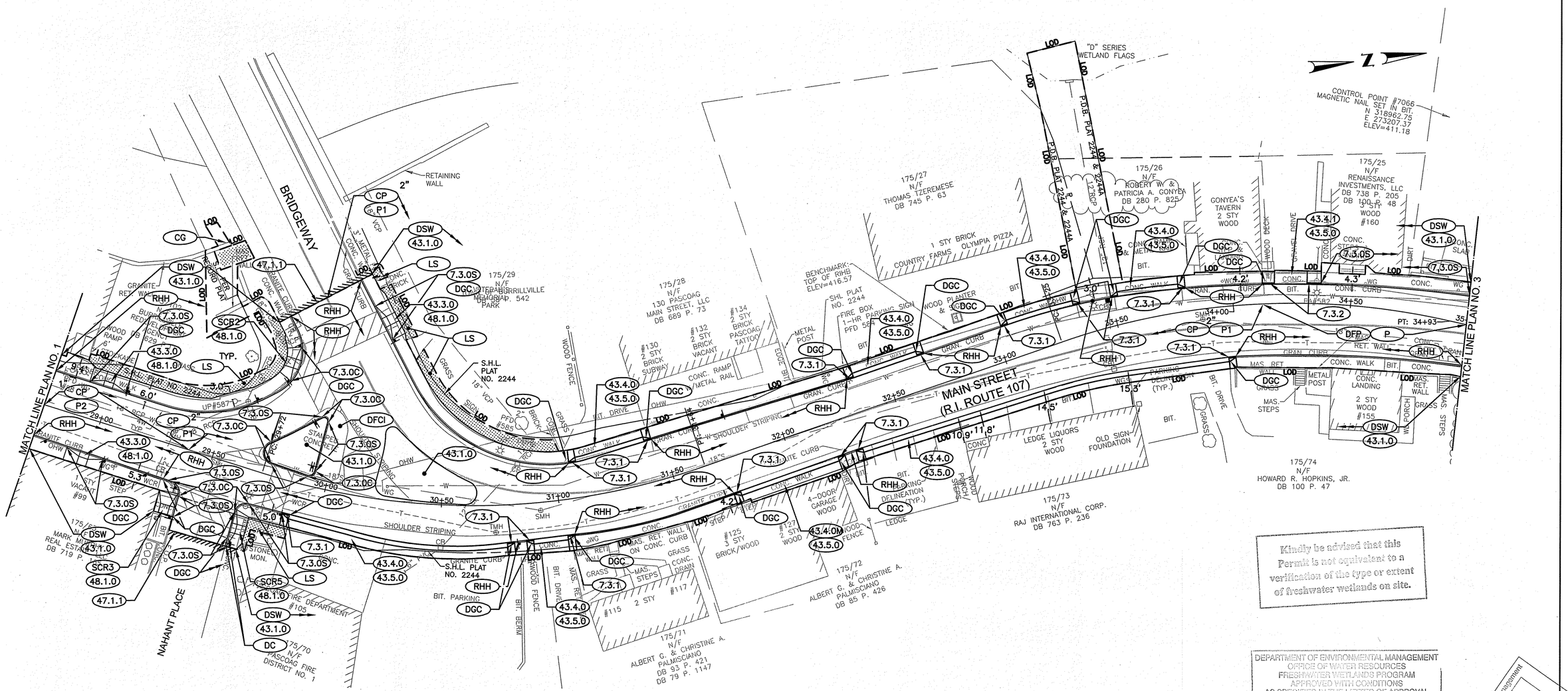
GENERAL PLAN NO. 1

CHECKED BY _____ DATE _____ SCALE 1"=20'

H:\p\03016\Dwg\03016-207.dwg June 01, 2015 - 7:47pm lalmeida

0076N_V1_015_GENERAL001

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		16	44



Kindly be advised that this Permit is not equivalent to a verification of the type or extent of freshwater wetlands on site.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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DATED SEP 22 2015 FILE # 15-0122
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Environmental Management
JUN 11 2015
Office of Water Resources

SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO MAIN STREET (RI ROUTE 107)

FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

GENERAL PLAN NO. 2

CHECKED BY _____ DATE _____ SCALE 1"=20"

H:\p\03016\Dwg\03016-208.dwg June 01, 2015 - 7:49pm lalmeida

0076N_V1_016_GENERAL002

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		17	44

17

"E" SERIES WETLAND FLAGS

DRAINAGE AGREEMENT TO STATE OF RI
PLAN BOOK 2, P. 89, VOL. 48 P. 13

175/23
N/F
K & S CARTER
BROTHERS REALTY, LLC
DB 243 P. 99

175/24
N/F
ZHENG DA XIANG &
DAN QIN LIN
DB 219 P. 91

175/20
N/F
DEBRA A. GLEDHILL &
MAURICE E. SCANLON, JR.
DB 210 P. 861

175/21
N/F
RIVERVIEW CONDOS
DB 532 P. 260

175/22
N/F
RIVERVIEW CONDOS
DB 470 P. 33

175/19
N/F
COLEEN CONLEY
DB 228 P. 122

2 STY #200

3 STY VINYL #188 CARTER BROS. CH

3 STY WOOD #196A

MAIN STREET
(R.I. ROUTE 107)

NORTH MAIN STREET

SPRING STREET

ALBEE LANE

MATCH LINE PLAN NO. 2

MATCH LINE PLAN NO. 4

BENCHMARK:
CHISEL "+" SET ON
BOLT OF HYDRANT
ELEV=401.78

CONTROL
POINT #4345
DRILL HOLE
ON CONC. PAD
N 319253.11
E 273428.83
ELEV=405.93

175/75
N/F
HOWARD R. HOPKINS, JR.
DB 769 P. 138

175/76
N/F
RUSSELL J. HOPKINS
DB 223 P. 106

175/77
N/F
TRI-TOWN ECONOMIC
OPPORTUNITY COMMISSION
DB 137 P. 526

175/78
N/F
ALAN B. & SHERRI
CHAMBERLAND
DB 503 P. 206

175/79
N/F
ALAN B. & SHERRI
CHAMBERLAND
DB 532 P. 238

175/80
N/F
RICHARD M. COREY
DB 767 P. 1

BRADFORD COURT
DB 265 P. 927

TOWN STREET LINE

Kindly be advised that this Permit is not equivalent to a verification of the type or extent of freshwater wetlands on site.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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Environmental Management
JUN 11 2015
Office of Water Resources

20 0 10 20 40
SCALE IN FEET 1"=20'

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

GENERAL PLAN NO. 3

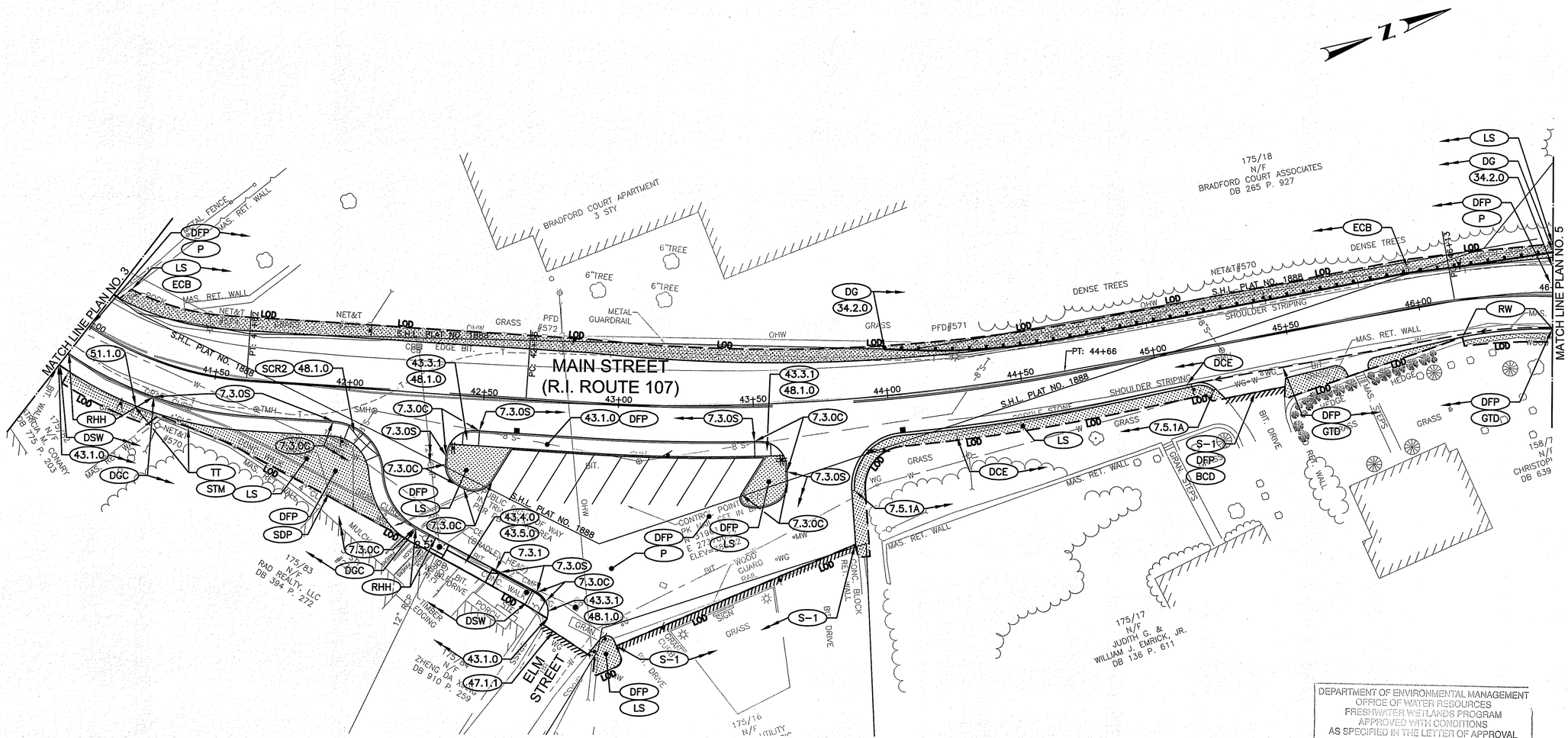
CHECKED BY _____ DATE _____ SCALE 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-209.dwg June 01, 2015 - 7:52pm lalmeida

0076N_V1_017_GENERAL003

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		18	44



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
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Environmental Management
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

20 0 10 20 40
SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

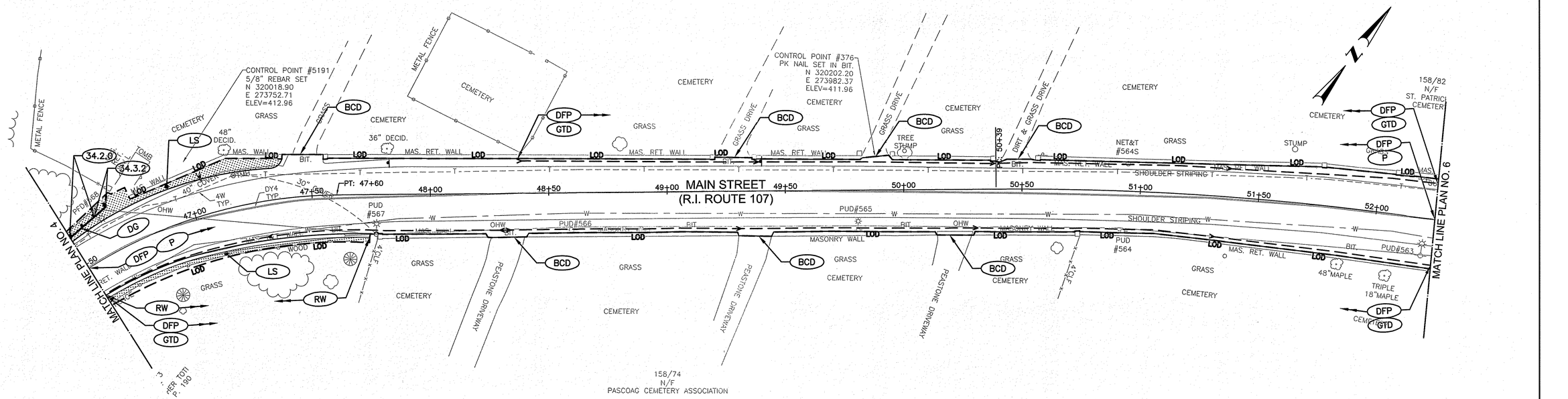
GENERAL PLAN NO. 4

CHECKED BY _____ DATE _____ SCALE 1"=20"

H:\p\03016\Dwg\03016-210.dwg June 01, 2015 - 7:55pm lalmeida

0076N_V1_018_GENERAL004

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		19	44



20 0 10 20 40

SCALE IN FEET 1"=20'

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 2 2 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

JUN 11 2015

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

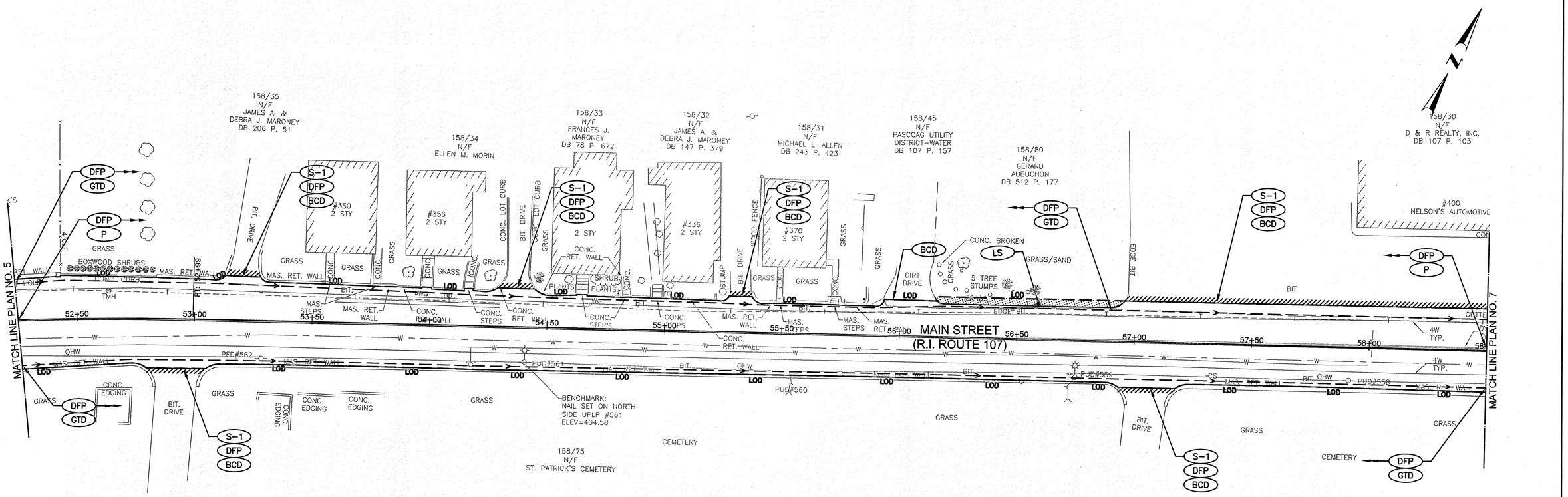
1R HIGHWAY IMPROVEMENTS TO MAIN STREET (RI ROUTE 107)

FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

GENERAL PLAN NO. 5

CHECKED BY _____ DATE _____ SCALE 1"=20"

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		20	44



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
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JUN 11 2015
OFFICE OF WATER RESOURCES

SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
440 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO MAIN STREET (RI ROUTE 107)

FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

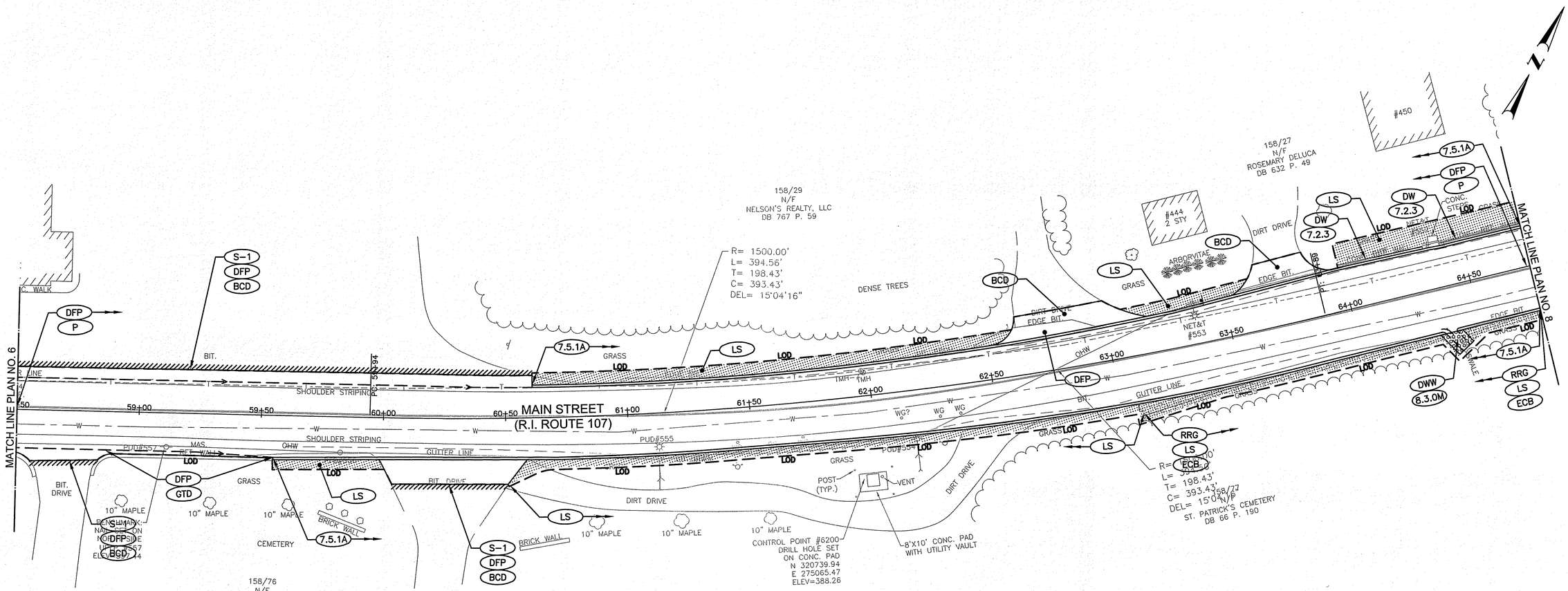
GENERAL PLAN NO. 6

CHECKED BY _____ DATE _____ SCALE 1"=20"

H:\p\03016\Dwg\03016-212.dwg June 01, 2015 - 8:01pm lalmeida

0076N_V1_020_GENERAL006

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		21	44



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
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Environmental Management
OCT 1 1 2015

20 0 10 20 40
SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO MAIN STREET (RI ROUTE 107)

FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

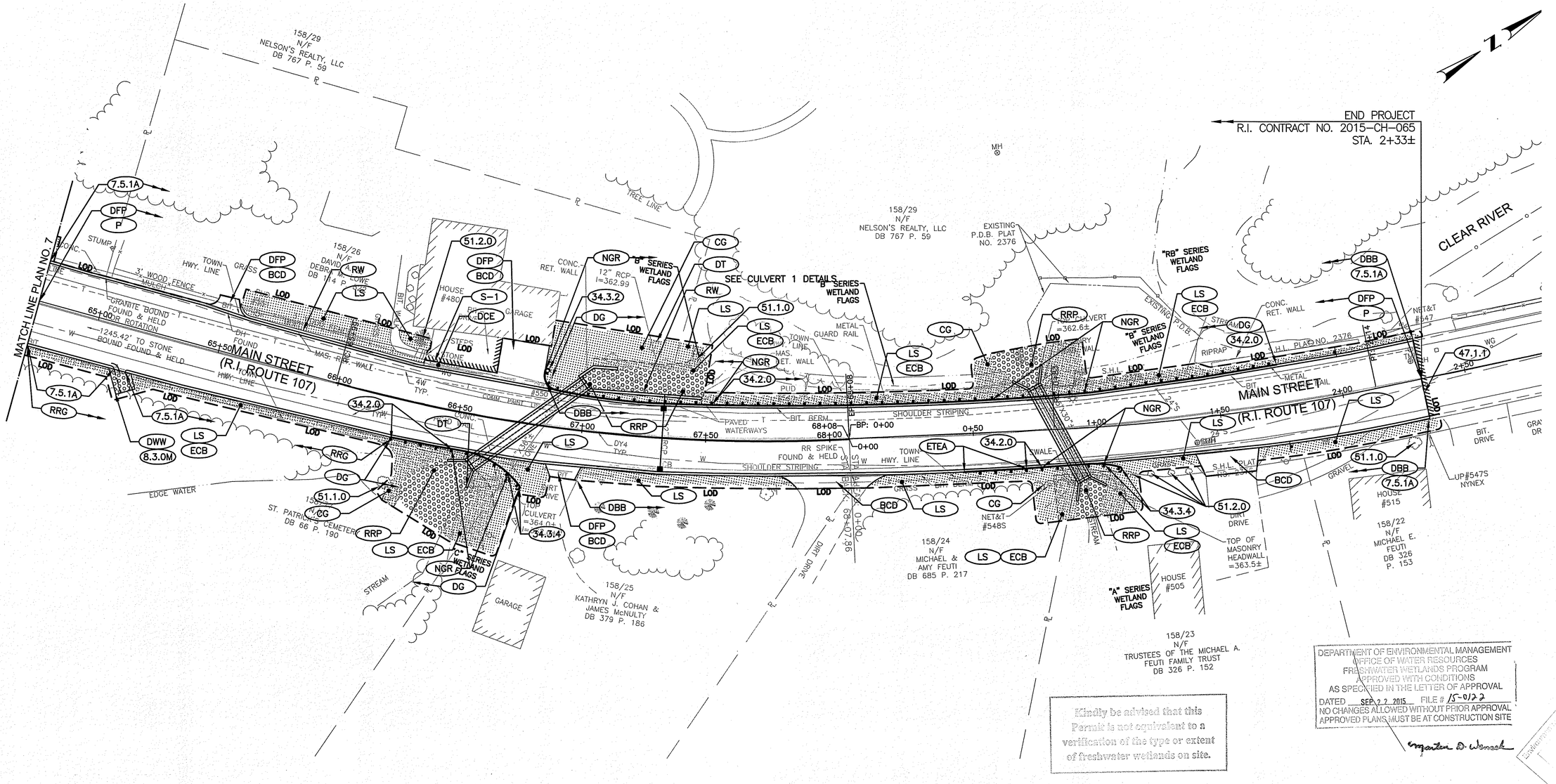
GENERAL PLAN NO. 7

CHECKED BY _____ DATE _____ SCALE 1"=20'

H:\p\03016\Dwg\03016-213.dwg June 01, 2015 - 8:04pm lalmeida

0076N_V1_021_GENERAL007

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		22	44



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Kindly be advised that this Permit is not equivalent to a verification of the type or extent of freshwater wetlands on site.

REVISIONS		
NO.	DATE	BY

20 0 10 20 40
SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

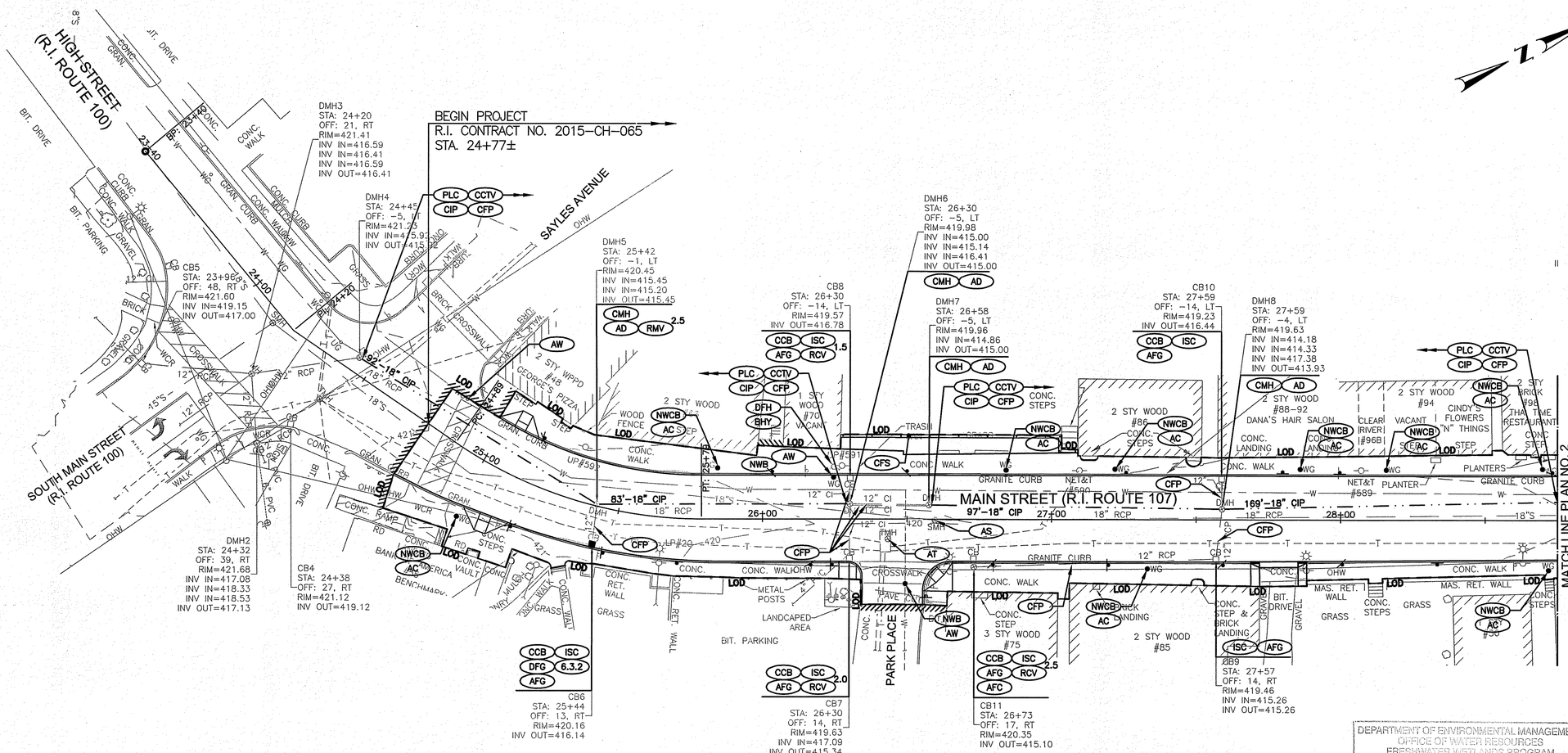
RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

GENERAL PLAN NO. 8

CHECKED BY _____ DATE _____ SCALE 1"=20"

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		23	44



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
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Marilyn D. Wilcox

Environmental Management JUN 11 2015

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

DRAINAGE AND UTILITY
PLAN NO. 1

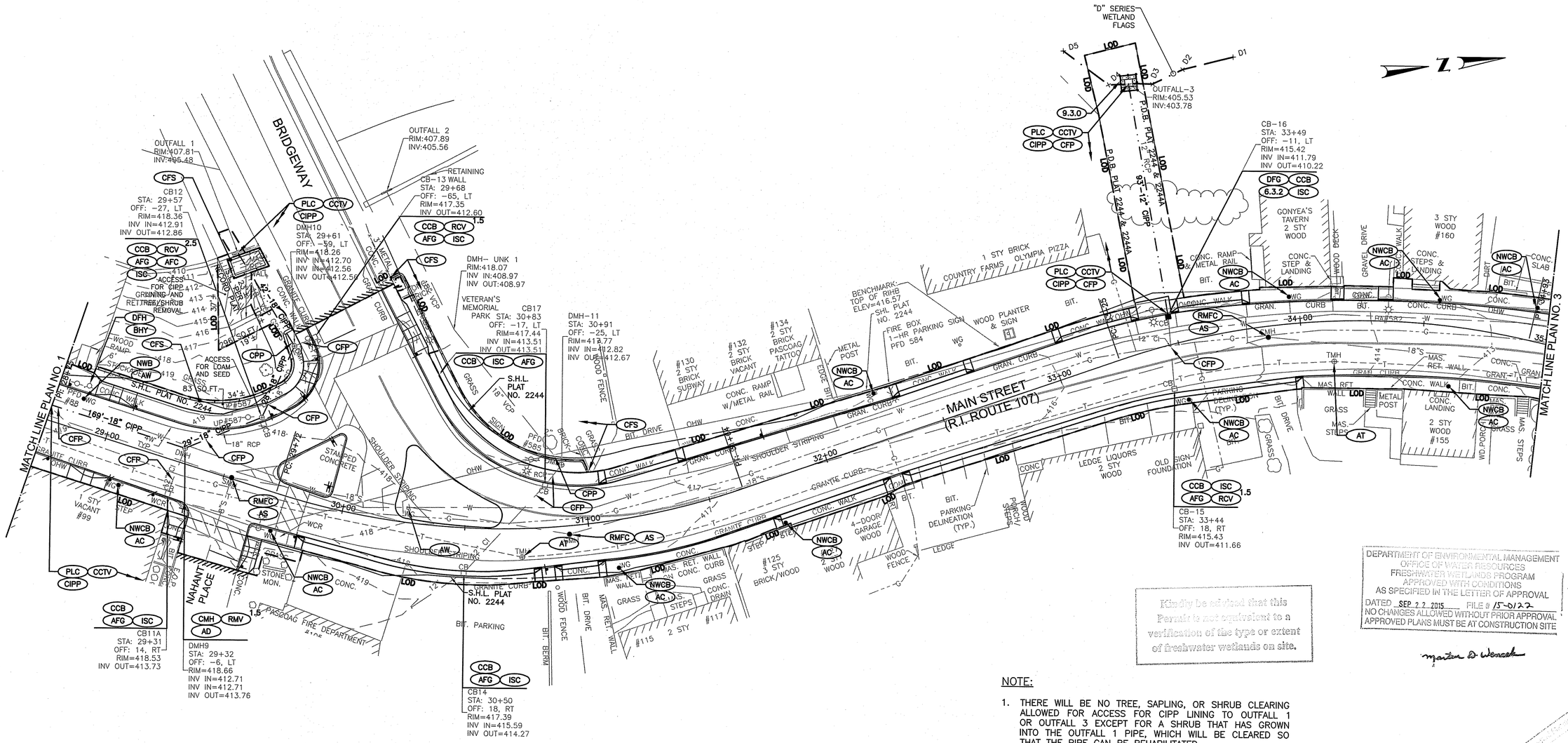
CHECKED BY _____ DATE _____ SCALE 1"=20"

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-215.dwg June 01, 2015 - 8:08pm lalmeida

0076N_V1_023_D&U001

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	STP-RESF(297)		24	44



H:\p\03016\Dwg\03016-216.dwg August 12, 2015 - 2:01pm lalmeida

Kindly be advised that this Permit is not equivalent to a verification of the type or extent of freshwater wetlands on site.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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DATED SEP 22 2015 FILE # 15-0122
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APPROVED PLANS MUST BE AT CONSTRUCTION SITE

marsha D. Worcek

NOTE:

1. THERE WILL BE NO TREE, SAPLING, OR SHRUB CLEARING ALLOWED FOR ACCESS FOR CIPP LINING TO OUTFALL 1 OR OUTFALL 3 EXCEPT FOR A SHRUB THAT HAS GROWN INTO THE OUTFALL 1 PIPE, WHICH WILL BE CLEARED SO THAT THE PIPE CAN BE REHABILITATED.
2. ACCESS INTO THE PASCOAG RIVER AT OUTFALLS 1 AND 3 IS REQUIRED TO RECEIVE THE CIPP DURING INSTALLATION.

RECEIVED AUG 21 2015

20 0 10 20 40
SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
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REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

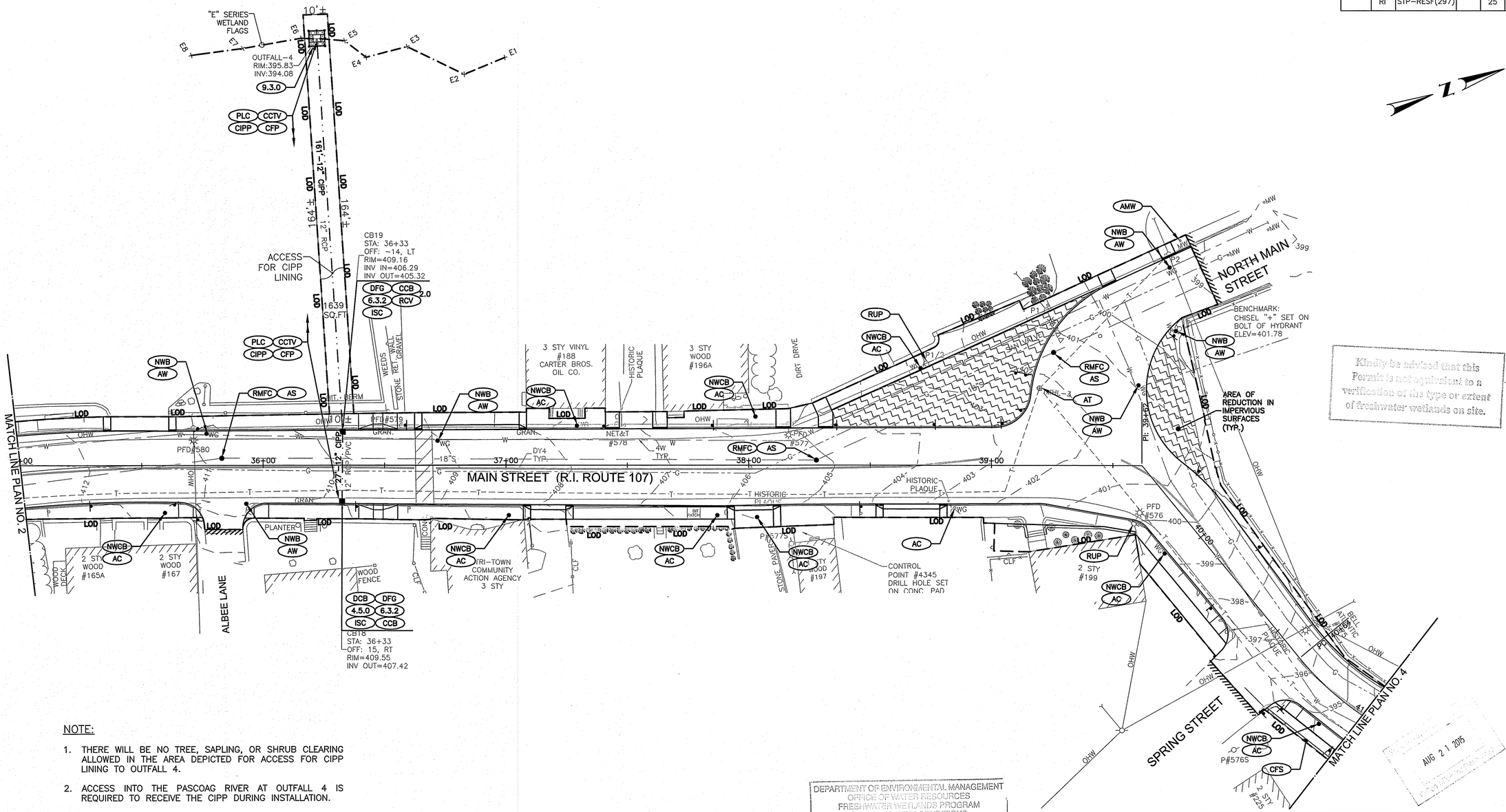
1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

DRAINAGE AND UTILITY
PLAN NO. 2

CHECKED BY _____ DATE _____ SCALE 1"=20"

0076N_V1_024_D&U002

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	STP-RESF(297)		25	44



NOTE:

1. THERE WILL BE NO TREE, SAPLING, OR SHRUB CLEARING ALLOWED IN THE AREA DEPICTED FOR ACCESS FOR CIPP LINING TO OUTFALL 4.
2. ACCESS INTO THE PASCOAG RIVER AT OUTFALL 4 IS REQUIRED TO RECEIVE THE CIPP DURING INSTALLATION.

Kindly be advised that this Permit is not equivalent to a verification of the type or extent of freshwater wetlands on site.

AUG 21 2015

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
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DATED SEP 2 2 2015 FILE # 15-0123
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
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SCALE IN FEET 1"=20'

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

DRAINAGE AND UTILITY
PLAN NO. 3

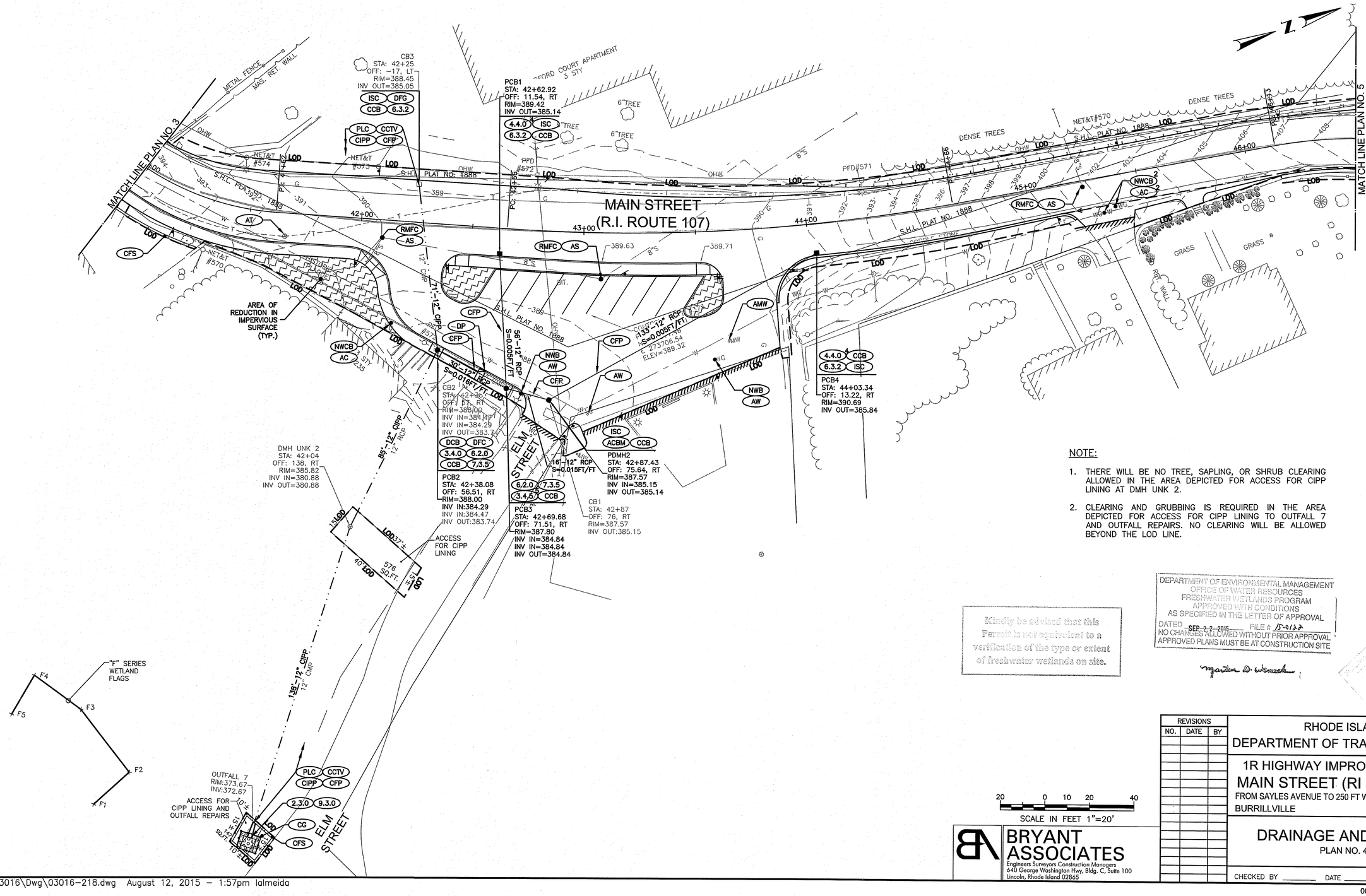
CHECKED BY _____ DATE _____ SCALE 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-217.dwg August 12, 2015 - 1:58pm lalmeida

0076N_V1_025_D&U003

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	STP-RESF(297)		26	116



NOTE:

1. THERE WILL BE NO TREE, SAPLING, OR SHRUB CLEARING ALLOWED IN THE AREA DEPICTED FOR ACCESS FOR CIPP LINING AT DMH UNK 2.
2. CLEARING AND GRUBBING IS REQUIRED IN THE AREA DEPICTED FOR ACCESS FOR CIPP LINING TO OUTFALL 7 AND OUTFALL REPAIRS. NO CLEARING WILL BE ALLOWED BEYOND THE LOD LINE.

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DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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AUG 21 2015

20 0 10 20 40
SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

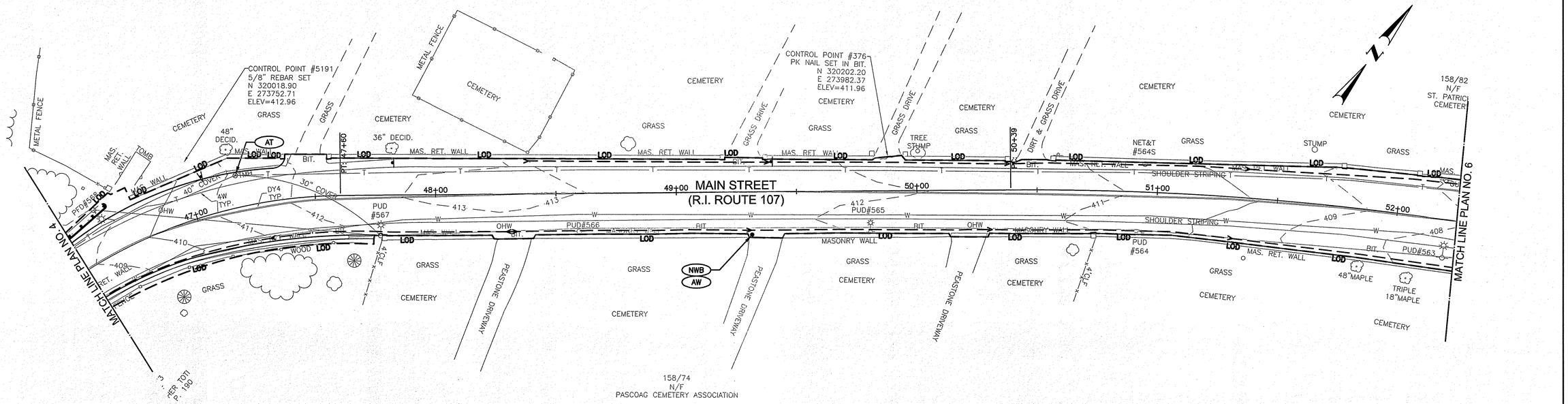
DRAINAGE AND UTILITY
PLAN NO. 4

CHECKED BY _____ DATE _____ SCALE 1"=20"

H:\p\03016\Dwg\03016-218.dwg August 12, 2015 - 1:57pm lalmeida

0076N_V1_026_D&U004

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		27	44



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
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DATED SEP 2 2 2015 FILE # 15-0122
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Environmental Management JUN 11 2015

20 0 10 20 40
SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

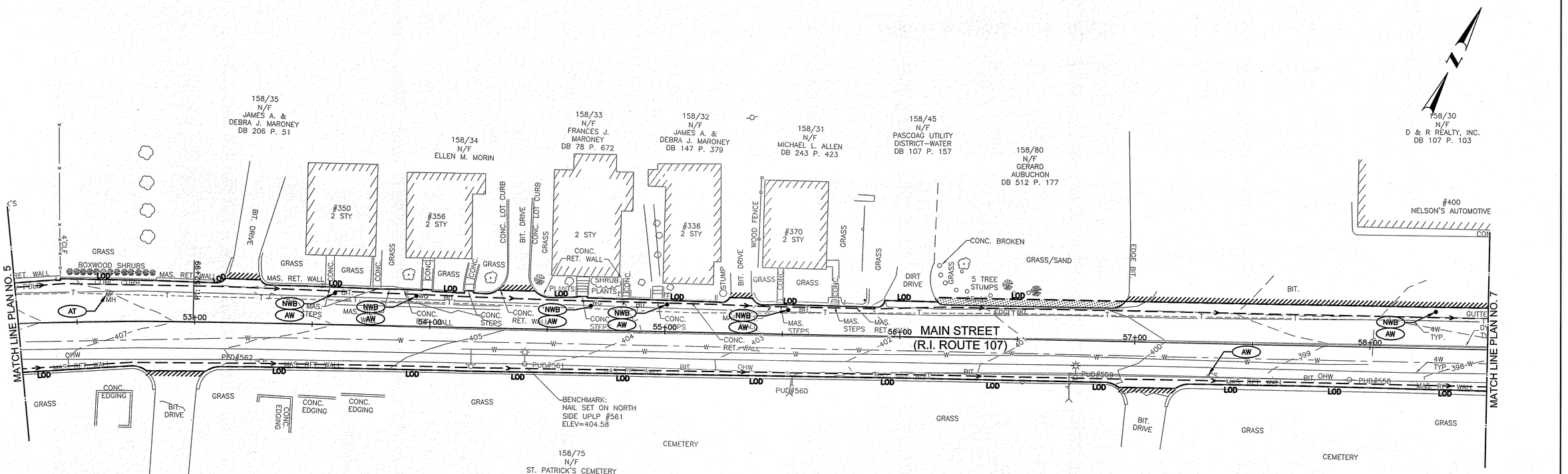
DRAINAGE AND UTILITY
PLAN NO. 5

CHECKED BY _____ DATE _____ SCALE 1"=20'

H:\p\03016\Dwg\03016-219.dwg June 01, 2015 - 8:20pm lalmeida

0076N_V1_0XX_D&U005

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		28	44



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
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DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

jennifer D. Wenck

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SCALE IN FEET 1"=20'

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Engineers Surveyors Construction Managers
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Lincoln, Rhode Island 02865

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NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

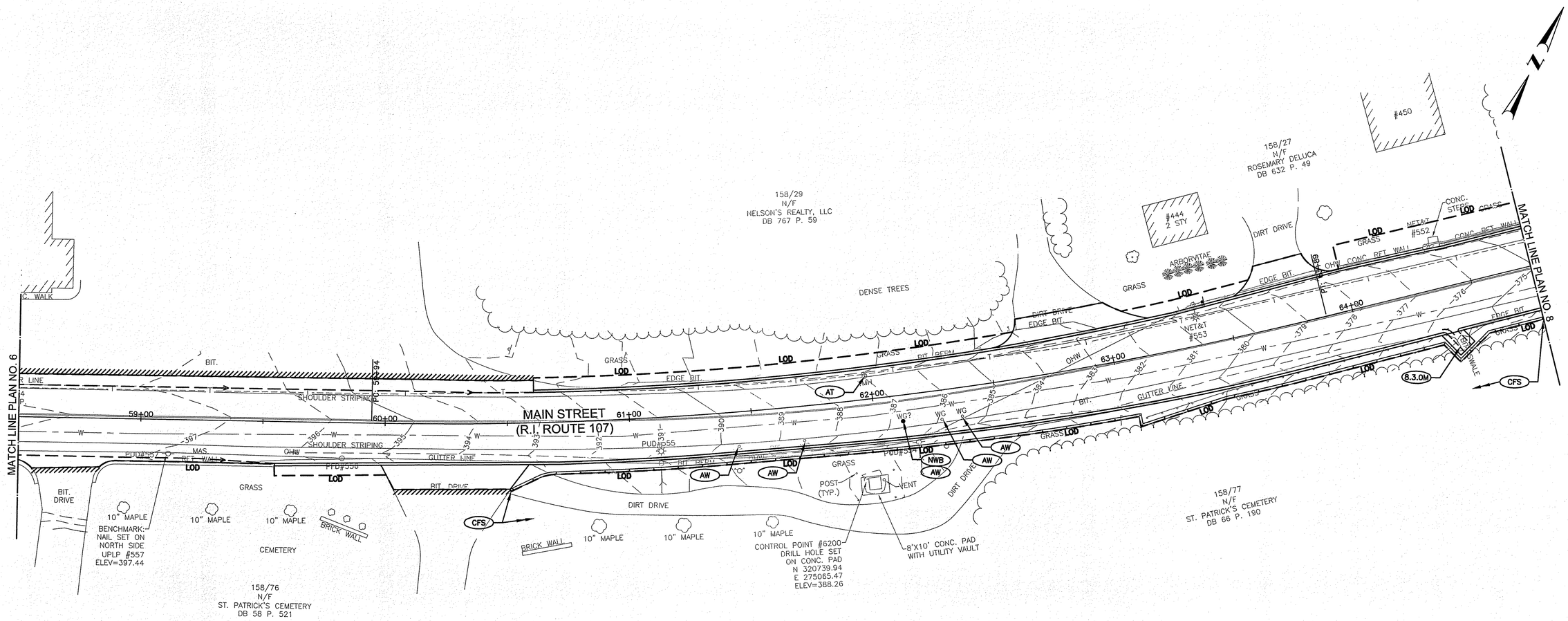
DRAINAGE AND UTILITY
PLAN NO. 6

CHECKED BY _____ DATE _____ SCALE 1"=20"

H:\p\03016\Dwg\03016-220.dwg June 01, 2015 - 8:22pm lalmeida

0076N_V1_0XX_D&U006

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		29	44



DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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Marilyn D. Wescott

Environmental Management
JUN 11 2015
Received

20 0 10 20 40
SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

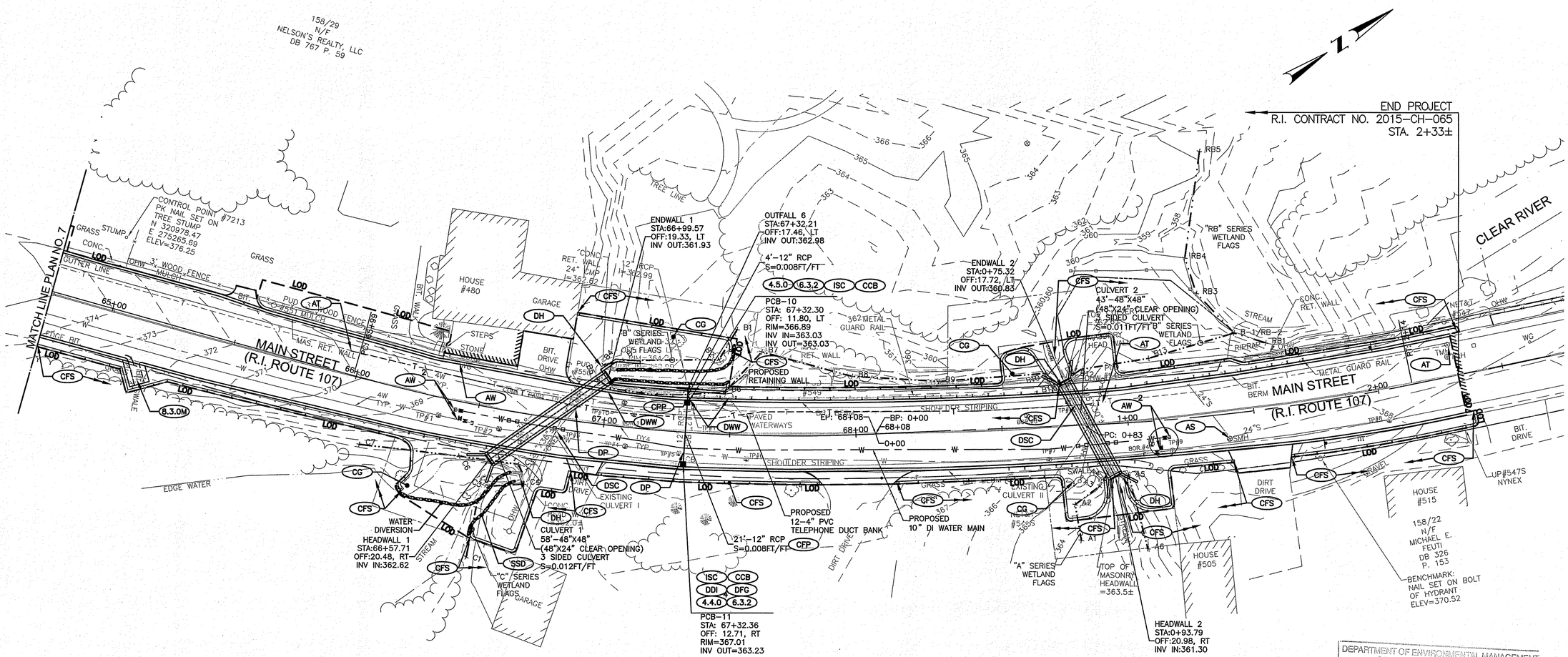
DRAINAGE AND UTILITY
PLAN NO. 7

CHECKED BY _____ DATE _____ SCALE 1"=20"

H:\p\03016\Dwg\03016-221.dwg June 02, 2015 - 10:38am lalmeida

0078N_V1_0XX_D&U007

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		30	44



NOTE:

1. THE TELEPHONE DUCT BANK RELOCATION INFORMATION CAN BE FOUND ON THE TELEPHONE PLAN AND PROFILE. THE WORK WILL BE DONE BY VERIZON.
2. THE WATER MAIN REPLACEMENT INFORMATION CAN BE FOUND ON THE WATER MAIN PLAN AND PROFILE.
3. THE WATER DIVERSION INFORMATION CAN BE FOUND ON THE WATER DIVERSION PLAN. THE WATER DIVERSION WILL BE DESIGNED BY THE CONTRACTOR.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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DATED SEP 22 2015 FILE # 15-0132
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marina D. Wenzel

Kindly be advised that this Permit is not equivalent to a verification of the type or extent of freshwater wetlands on site.

20 0 10 20 40
SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

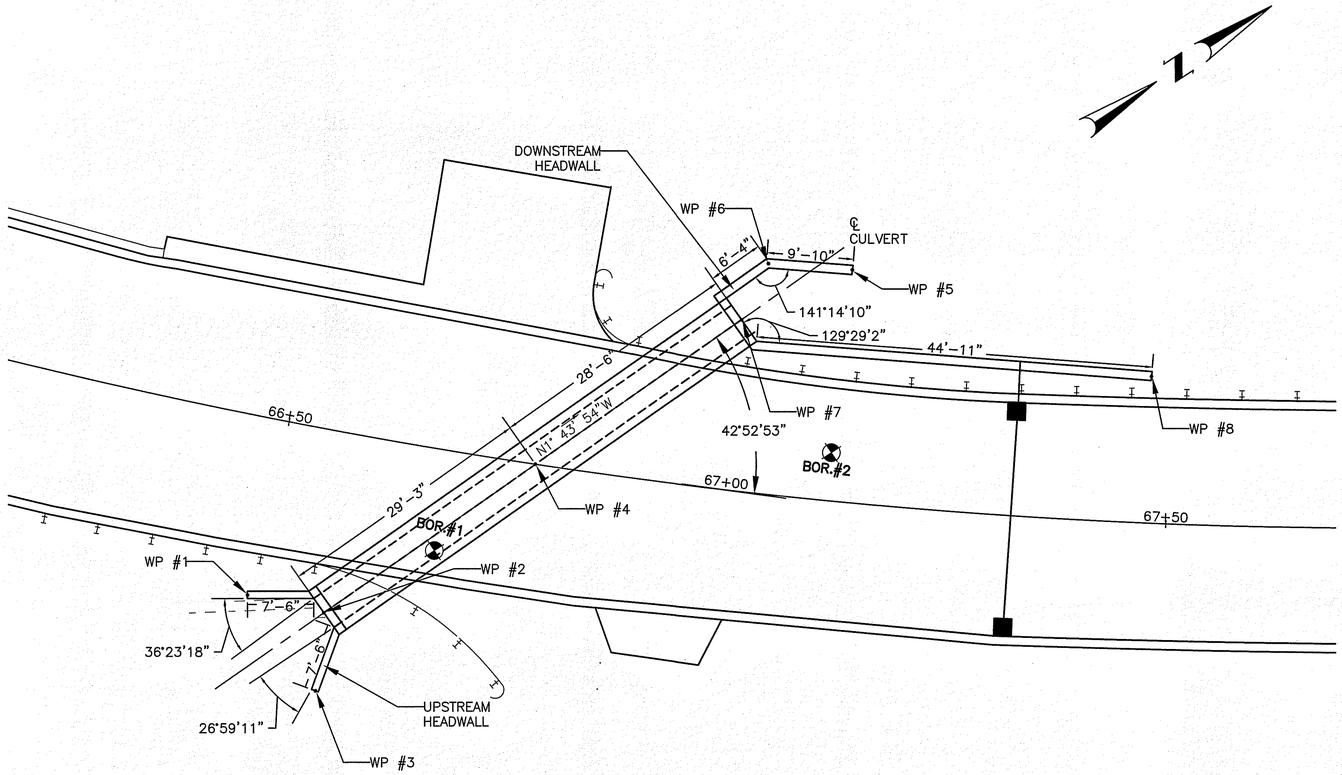
DRAINAGE AND UTILITY
PLAN NO. 8

CHECKED BY _____ DATE _____ SCALE 1"=20'

H:\p\03016\Dwg\03016-222.dwg June 02, 2015 - 9:07am lalmeida

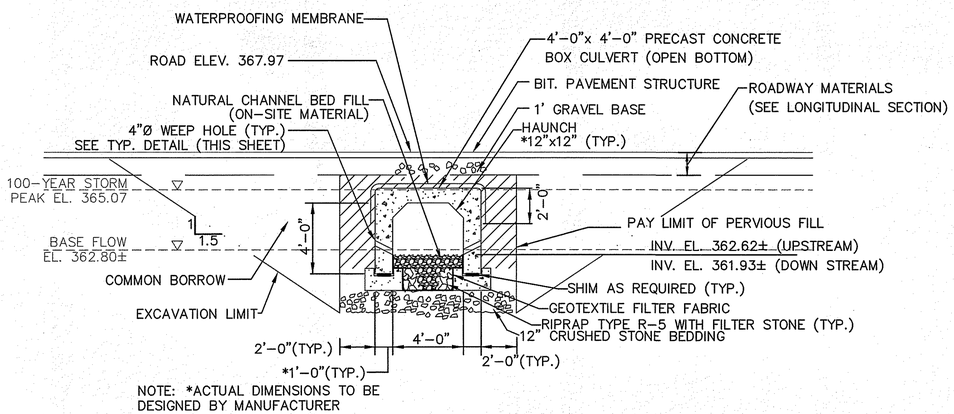
0076N_V1_0XX_D&U008

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		31	44



CULVERT LAYOUT PLAN

SCALE: ⅛" = 1'-0"



NOTE: *ACTUAL DIMENSIONS TO BE DESIGNED BY MANUFACTURER

CULVERT 1 TRANSVERSE SECTION

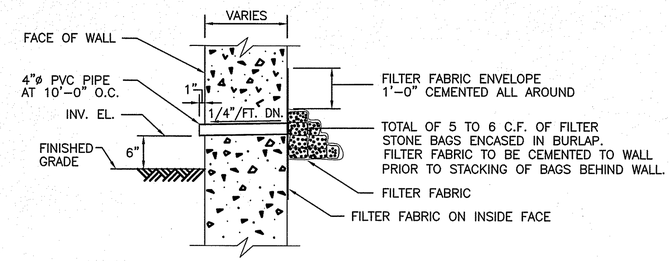
SCALE 1/4"=1'-0"

NOTES:

1. FOR ADDITIONAL NOTES, SEE "GENERAL NOTES" SHEETS AND NOTES ON THE PRECAST CULVERT DETAILS SHEET.
2. FOR ADDITIONAL INFORMATION REGARDING THE HIGHWAY LAYOUT, EROSION CONTROLS, AND RIPRAP SEE GENERAL PLAN NO. 8 AND DRAINAGE AND UTILITY PLAN NO. 8.
3. MATERIALS AND METHODS OF CONSTRUCTION SHALL BE IN CONFORMANCE WITH THE RHODE ISLAND DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, AMENDED 2013, AND ALL ADDENDA THERETO.
4. ALL CONSTRUCTION SHALL BE IN ACCORDANCE WITH THE PRECAST MANUFACTURER'S APPROVED SHOP DRAWINGS AND IN ACCORDANCE WITH THE REQUIREMENTS OF SPECIAL PROVISION CODE 809.9901 "PRECAST CONCRETE CULVERT AND APPURTENANCES" OF THE PROJECT SPECIFICATIONS.
5. SUBBASE MATERIAL SHALL CONFORM TO SECTION 203 – CRUSHED STONE FILL UNDER STRUCTURES OF THE RIDOT STANDARD SPECIFICATIONS AND THE TYPE CALLED OUT IN THESE DRAWINGS.
6. THE CULVERT SECTIONS AND WINGS SHALL BE DESIGNED TO HANDLE FULL DEPTH HYDROSTATIC PRESSURE IF WEEP HOLES ARE NOT UTILIZED. WEEP HOLES SHALL BE LOCATED A MINIMUM HEIGHT OF 6 INCHES ABOVE THE INFILL LINE AND HAVE A MAXIMUM SPACING OF 10 FEET.
7. ALL WORK SHOWN OR NOTED ABOVE IS INCIDENTAL TO THE RELATED PAY ITEMS.
8. THE DESIGN, CONSTRUCTION, HANDLING, AND ASSEMBLY OF THE PRECAST REINFORCED CONCRETE THREE-SIDED CULVERT UNITS AND PRECAST WINGWALLS SHALL BE IN ACCORDANCE WITH SPECIAL PROVISIONS ITEM 809.9901 PRECAST CONCRETE CULVERT AND APPURTENANCES AND THE MANUFACTURER'S SPECIFICATIONS AS APPLICABLE.
9. FOR SUBMITTAL REQUIREMENTS AND SUBMITTAL OF WORKING DRAWINGS, SEE SPECIAL PROVISIONS.
10. THE FILL INSIDE THE CULVERT SHALL CONSIST OF A COMBINATION OF NATURAL CHANNEL BED FILL (ON-SITE MATERIAL), CRUSHED STONE BEDDING, AND RIP RAP. THE MATERIAL SHALL BE PLACED AS DIRECTED BY THE RESIDENT ENGINEER. PAYMENT SHALL BE MADE UNDER THE CRUSHED STONE BEDDING, CULVERT, AND RIP RAP PAY ITEMS.
11. THE CONTRACTOR SHALL INSTALL NON-WOVEN GEOTEXTILE FABRIC BETWEEN THE SOIL AND THE RIP RAP / NATURAL CHANNEL BED FILL (ON-SITE MATERIAL). THE GEOTECTILE FABRIC SHALL RUN THE LENGTH OF THE CULVERTS AND EXTEND THROUGH THE APRONS. GEOTEXTILE FABRIC SHALL BE ONE OF THOSE MATERILAS INCLUDED ON THE DEPARTMENT'S APPROVED MATERIALS LIST. GEOTEXTILE FILTER MATERIAL FOR RIPRAP / NATURAL CHANNEL BED FILL (ON-SITE MATERIAL) INSTALLATION SHALL BE CONSIDERED INCIDENTAL AND NO DIRECT COMPENSATION SHALL BE MADE.
12. THE WORK RELATED TO THE CULVERT REPLACEMENTS AND IN-STREAM WORK SHALL BE LIMITED TO BETWEEN JULY 1 AND OCTOBER 1.

WORKING POINT COORDINATES

WP #	STATION	OFFSET	NORTHING	EASTING	ELEVATION
1	66+49.14	20.1' R	321043.94	275411.16	363.75
2	66+57.75	20.5' R	321050.05	275417.62	365.45
3	66+58.30	29.4' R	321044.34	275424.43	363.75
4	66+78.29	0.0'	321079.29	275416.73	365.09
5	67+11.89	26.3' L	321121.38	275418.08	364.50
6	67+01.93	25.9' L	321113.77	275412.27	367.50
7	66+99.57	19.3' L	321107.79	275415.87	364.75
8	67+47.71	16.6' L	321143.07	275446.75	367.50



TYP. WEEP DRAIN

N.T.S

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0182
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Received JUN 11 2015 Department of Environmental Management Office of Water Resources

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

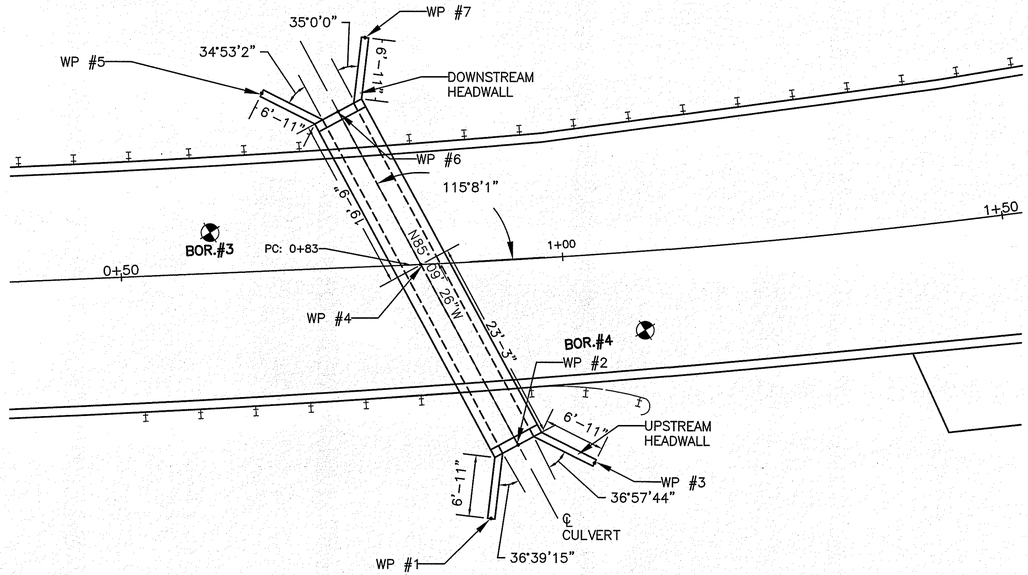
CULVERT 1 DETAILS

CHECKED BY _____ DATE _____ SCALE 1/8"=1'-0"

H:\p\03016\Dwg\03016-229.dwg June 05, 2015 - 3:44pm lalmeida

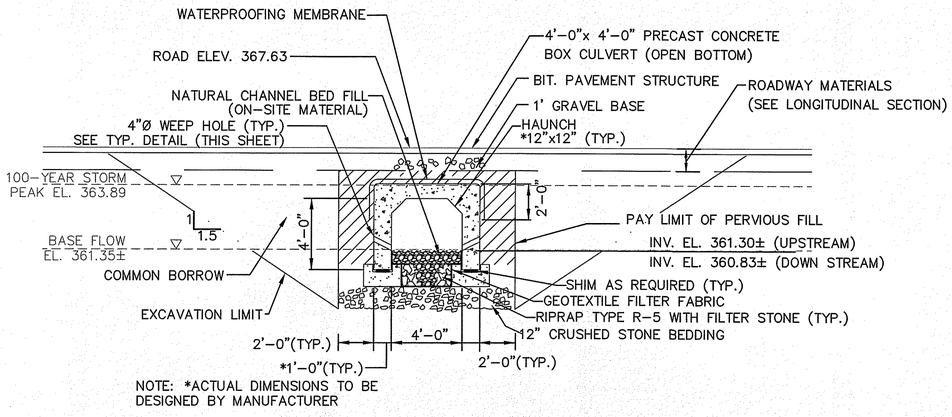
0076N_V1_039_CUL01

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		32	44



CULVERT LAYOUT PLAN

SCALE: ⅛" = 1'-0"



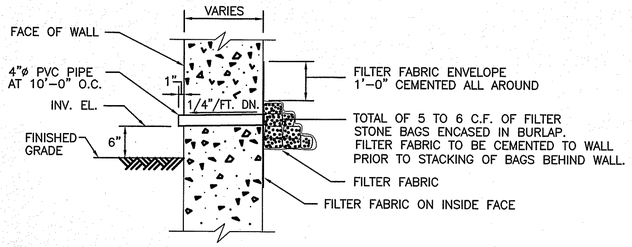
NOTE: *ACTUAL DIMENSIONS TO BE DESIGNED BY MANUFACTURER

CULVERT 2 TRANSVERSE SECTION

SCALE 1/4"=1'-0"

NOTES:

1. FOR ADDITIONAL NOTES, SEE "GENERAL NOTES" SHEETS AND NOTES ON THE PRECAST CULVERT DETAILS SHEET.
2. FOR ADDITIONAL INFORMATION REGARDING THE HIGHWAY LAYOUT, EROSION CONTROLS, AND RIPRAP SEE GENERAL PLAN NO. 8 AND DRAINAGE AND UTILITY PLAN NO. 8.
3. MATERIALS AND METHODS OF CONSTRUCTION SHALL BE IN CONFORMANCE WITH THE RHODE ISLAND DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, AMENDED 2013, AND ALL ADDENDA THERETO.
4. ALL CONSTRUCTION SHALL BE IN ACCORDANCE WITH THE PRECAST MANUFACTURER'S APPROVED SHOP DRAWINGS AND IN ACCORDANCE WITH THE REQUIREMENTS OF SPECIAL PROVISION CODE 809.9901 "PRECAST CONCRETE CULVERT AND APPURTENANCES" OF THE PROJECT SPECIFICATIONS.
5. SUBBASE MATERIAL SHALL CONFORM TO SECTION 203 – CRUSHED STONE FILL UNDER STRUCTURES OF THE RIDOT STANDARD SPECIFICATIONS AND THE TYPE CALLED OUT IN THESE DRAWINGS.
6. THE CULVERT SECTIONS AND WINGS SHALL BE DESIGNED TO HANDLE FULL DEPTH HYDROSTATIC PRESSURE IF WEEP HOLES ARE NOT UTILIZED. WEEP HOLES SHALL BE LOCATED A MINIMUM HEIGHT OF 6 INCHES ABOVE THE INFILL LINE AND HAVE A MAXIMUM SPACING OF 10 FEET.
7. ALL WORK SHOWN OR NOTED ABOVE IS INCIDENTAL TO THE RELATED PAY ITEMS.
8. THE DESIGN, CONSTRUCTION, HANDLING, AND ASSEMBLY OF THE PRECAST REINFORCED CONCRETE THREE-SIDED CULVERT UNITS AND PRECAST WINGWALLS SHALL BE IN ACCORDANCE WITH SPECIAL PROVISIONS ITEM 809.9901 PRECAST CONCRETE CULVERT AND APPURTENANCES AND THE MANUFACTURER'S SPECIFICATIONS AS APPLICABLE.
9. FOR SUBMITTAL REQUIREMENTS AND SUBMITTAL OF WORKING DRAWINGS, SEE SPECIAL PROVISIONS.
10. THE FILL INSIDE THE CULVERT SHALL CONSIST OF A COMBINATION OF NATURAL CHANNEL BED FILL (ON-SITE MATERIAL), CRUSHED STONE BEDDING, AND RIP RAP. THE MATERIAL SHALL BE PLACED AS DIRECTED BY THE RESIDENT ENGINEER. PAYMENT SHALL BE MADE UNDER THE CRUSHED STONE BEDDING, CULVERT, AND RIP RAP PAY ITEMS.
11. THE CONTRACTOR SHALL INSTALL NON-WOVEN GEOTEXTILE FABRIC BETWEEN THE SOIL AND THE RIP RAP / NATURAL CHANNEL BED FILL (ON-SITE MATERIAL). THE GEOTECTILE FABRIC SHALL RUN THE LENGTH OF THE CULVERTS AND EXTEND THROUGH THE APRONS. GEOTEXTILE FABRIC SHALL BE ONE OF THOSE MATERILAS INCLUDED ON THE DEPARTMENT'S APPROVED MATERIALS LIST. GEOTEXTILE FILTER MATERIAL FOR RIPRAP / NATURAL CHANNEL BED FILL (ON-SITE MATERIAL) INSTALLATION SHALL BE CONSIDERED INCIDENTAL AND NO DIRECT COMPENSATION SHALL BE MADE.
12. THE WORK RELATED TO THE CULVERT REPLACEMENTS AND IN-STREAM WORK SHALL BE LIMITED TO BETWEEN JULY 1 AND OCTOBER 1.



TYP. WEEP DRAIN

N.T.S

WORKING POINT COORDINATES

WP #	STATION	OFFSET	NORTHING	EASTING	ELEVATION
1	0+90.41	29.2' R	321246.77	275564.47	363.30
2	0+93.79	21.0' R	321253.88	275559.14	364.12
3	1+02.06	23.6' R	321260.00	275565.59	363.30
4	0+83.93	0.0'	321255.84	275535.99	363.89
5	0+66.77	20.2' L	321251.40	275509.90	362.34
6	0+75.32	17.7' L	321257.51	275516.35	363.67
7	0+78.72	25.9' L	321264.63	275511.04	362.34

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
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NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marian D. Weresko

Environmental Management JUN 11 2015 Received

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

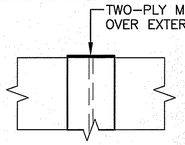
CULVERT 2 DETAILS

CHECKED BY _____ DATE _____ SCALE 1/8"=1'-0"

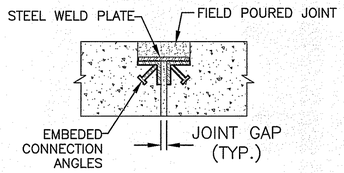
H:\p\03016\Dwg\03016-229.dwg June 05, 2015 - 3:46pm lalmeida

0076N_V1_040_CUL02

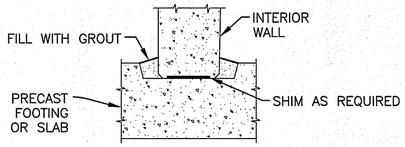
FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		33	44



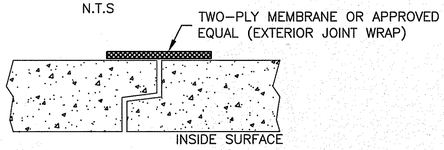
1 EXTERIOR WALL/ TOP JOINT
N.T.S TYPICAL FOR MATING TOP SECTIONS



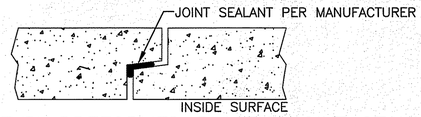
2 TYP. WELD CONNECTION
N.T.S TYPICAL BETWEEN TOP SECTIONS AND FLAT SLAB BASE SECTIONS



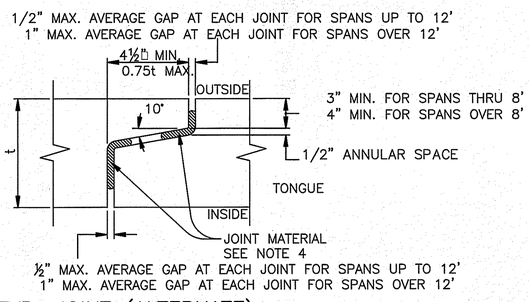
3 TYP.FOOTING KEYWAY
N.T.S



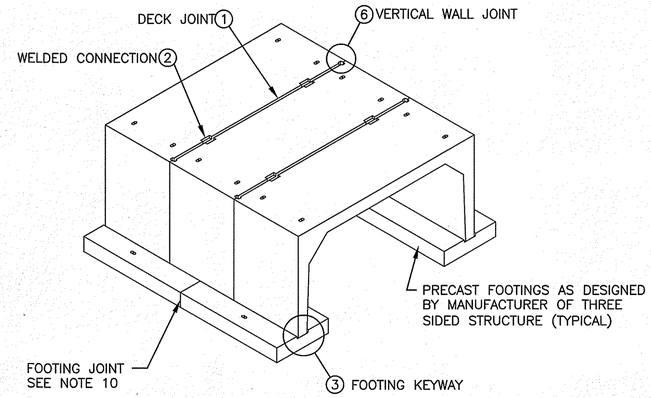
4 TYP. EXTERNAL JOINT SEAL
N.T.S PER ASTM C-877



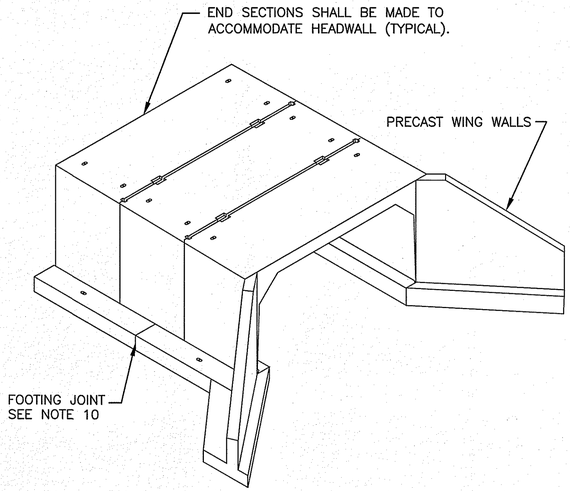
5 TYP. PREFORMED PLASTIC JOINT SEALANT (ALTERNATE)
N.T.S PER ASTM C-990



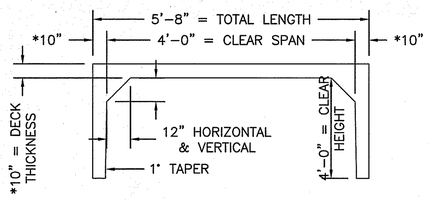
6 TYP. JOINT (ALTERNATE)
N.T.S



CULVERT WITH FOOTINGS
(NOT TO SCALE)

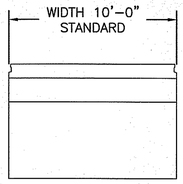


CULVERT AND FULL END TREATMENTS
(NOT TO SCALE)



NOTE: *ACTUAL DIMENSIONS TO BE DESIGNED BY MANUFACTURER

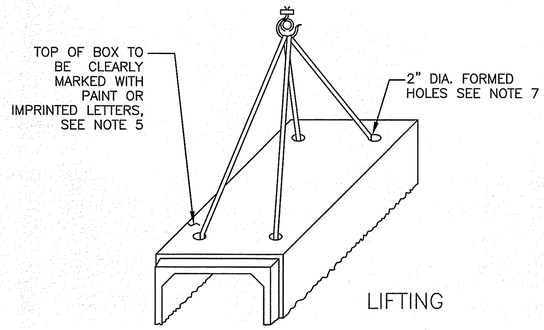
TYPICAL LONGITUDINAL SECTION
(NOT TO SCALE)



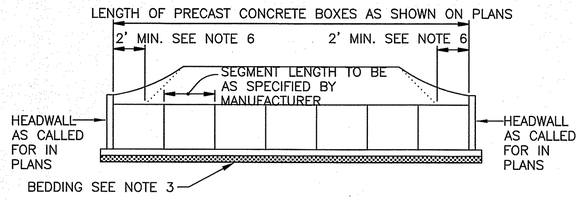
TRANSVERSE SECTION
WIDTH MAY VARY FROM STANDARD TO ECONOMIZE ON FREIGHT AND LABOR

NOTES:

1. CONCRETE SHALL BE AS SPECIFIED IN AASHTO M259 OR M273 (ASTM C1433), AS MODIFIED IN SPECIAL PROVISION 809.9901.
2. REINFORCING STEEL SHALL BE AASHTO M31 (ASTM A615) GRADE 60. WELDED WIRE FABRIC SHALL BE AASHTO M55 (ASTM A185) (SMOOTH WIRE), OR AASHTO M22 (ASTM A497) (DEFORMED WIRE). ALL STEEL REINFORCEMENT SHALL BE GALVANIZED AND MEET THE REQUIREMENTS OF ASTM A767.
3. BEDDING MATERIAL SHALL BE 12" CRUSHED STONE FILL MEETING THE GRADATION REQUIREMENTS OF RIDOT STANDARD SPECIFICATIONS SUBSECTION M.01.09, COLUMN II.
4. JOINT MATERIAL SHALL BE A PREFORMED JOINT MATERIAL MEETING AASHTO M198 TYPE B. THE MATERIAL SHALL BE INSTALLED IN ACCORDANCE WITH THE MANUFACTURERS RECOMMENDATIONS. ANY JOINT MATERIAL EXTRUDING FROM THE INTERIOR OF THE JOINT SHALL BE REMOVED FLUSH WITH THE BOX WALL.
5. IN ADDITION TO THE MARKINGS REQUIRED BY THE AASHTO AND ASTM SPECIFICATIONS, MARK EACH BOX SECTION WITH THE APPROPRIATE RIDOT CONTRACT NUMBER.
6. THE LENGTH OF EACH STRUCTURE SEGMENT SHALL BE DETERMINED BY THE CONTRACTOR. IF PHASED CONSTRUCTION IS EMPLOYED, THE PRECAST THREE SIDED STRUCTURE SEGMENT LENGTH MUST BE COMPATIBLE WITH PHASING REQUIREMENTS.
7. FILL CYLINDRICAL LIFTING HOLES (LOCATED BY MANUFACTURER) WITH AN APPROVED EPOXY NON-SHRINK GROUT. HOLES WITH AN APPROVED CONICAL SHAPE FOR THE BOTTOM 3" MAY BE FILLED WITH A CONCRETE GROUT COMPOSED OF ONE PART BY VOLUME OF CEMENT TO TWO PARTS BY VOLUME OF SAND WITH ONLY ENOUGH WATER TO PERMIT PLACING AND TAMPING. AN APPROVED CUSTOM PLUG MAY BE USED. AN OPTIONAL METHOD OF LIFTING MAY BE USED WITH APPROVAL.
8. THE PRECAST THREE SIDED STRUCTURE IS A DESIGN/BUILD ELEMENT OF THESE PLANS. THE TYPICAL DETAILS ARE SHOWN TO PROVIDE A BASIS FOR THE CONTRACTOR'S BID, AND SHALL BE MODIFIED BE THE CONTRACTOR AS REQUIRED AND NECESSARY FOR A COMPLETE INSTALLATION. REFER TO SPECIAL PROVISION 809.9901 FOR ADDITIONAL INFORMATION REGARDING DESIGN AND SUBMITTAL REQUIREMENTS.
9. END SECTION(S) SHALL BE MADE TO ACCOMMODATE HEADWALL.
10. FOOTINGS AND WINGWALLS SHALL BE PRECAST AND AS DESIGNED BY THE PRECAST THREE SIDED STRUCTURE MANUFACTURER. PRECAST FOOTING JOINTS MUST BE AT THE MID-POINT OF THE STRUCTURE SEGMENT JOINTS. ALL JOINTS, INCLUDING JOINTS BETWEEN WINGWALLS AND END SECTIONS SHALL RECIEVE EXTERNAL JOINT WRAP.
11. DETAILS ON THE DRAWINGS LABELED AS "NOT TO SCALE (N.T.S.)" ARE INTENTIONALLY DRAWN NOT TO SCALE FOR VISUAL CLARITY. CONTRACTOR IS NOT TO SCALE OFF THESE DETAILS OR DRAWINGS.



LIFTING



TYPICAL CULVERT INSTALLATION
(NOT TO SCALE)

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 2 2 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marston D. Wescott

RECEIVED JUN 11 2015 Office of Engineering

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

PRECAST CULVERT DETAILS

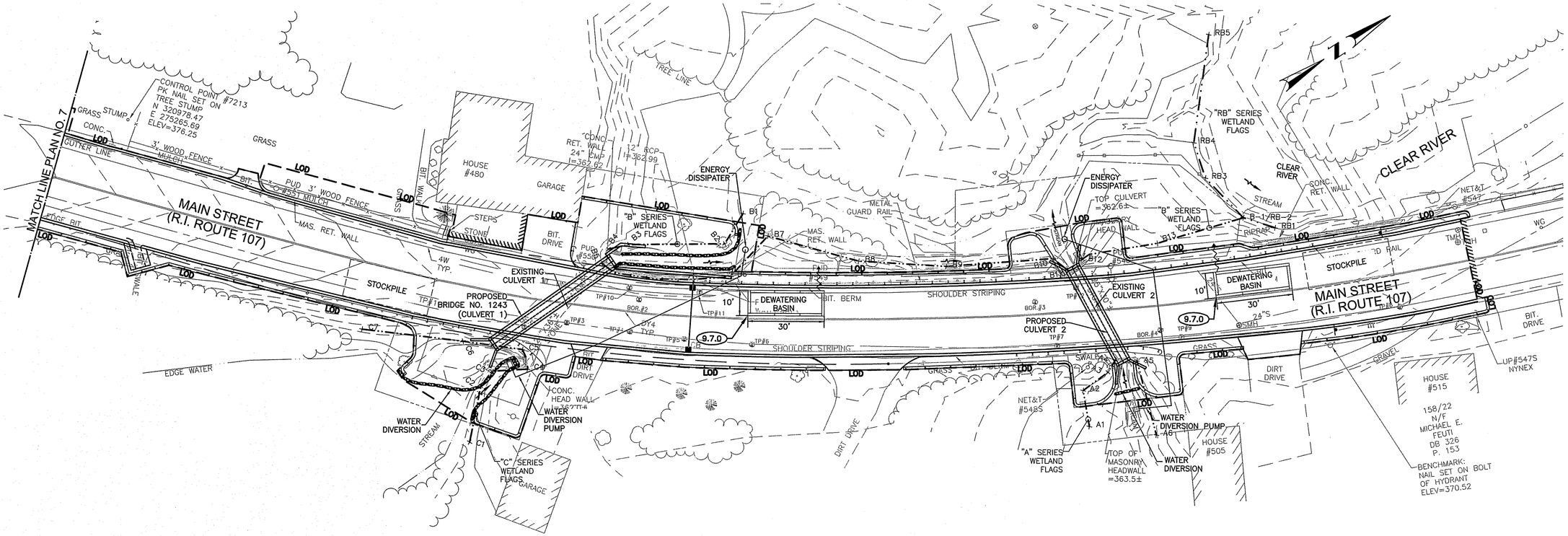
CHECKED BY _____ DATE _____ SCALE 1/8"=1'-0"

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-230.dwg June 05, 2015 - 11:57am rblandin

0076N_V1_041_CULDETAILS

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	STP-RESF(297)		34	44



WATER DIVERSION NOTES:

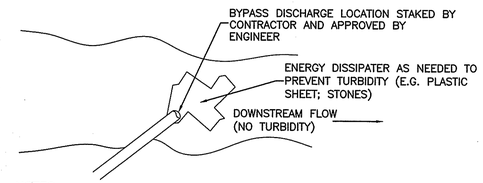
1. DIVERTED STREAM FLOW SHALL NOT BE DIRECTED TO OR THROUGH UNSTABILIZED AREAS.
2. IF THE CONTRACTOR PROPOSES A WATER DIVERSION METHOD WHICH INVOLVES THE PUMPING OF STREAM WATER, ALL WATER INTAKE HOSES SHALL BE SCREENED TO PROTECT AQUATIC LIFE. THE SCREEN OPENING SIZE SHALL BE NO LARGER THAN 1/4 INCH (6mm) SQUARE.
3. THE CONTRACTOR MAY NEED TO INSTALL MATERIALS DOWNSTREAM OF THE STREAM WORK AREA TO PREVENT DIVERTED STREAM WATER FROM BACKFLOWING INTO THE WORK AREA. THE CONTRACTOR MAY ALSO NEED TO INSTALL MATERIALS TO PREVENT GROUNDWATER, STORMWATER, OR PRECIPITATION THAT ENTERS THE STREAM WORK AREA FROM EXITING THE WORK AREA IN A TURBID CONDITION. ANY MATERIALS INSTALLED SHALL BE LOCATED WITHIN THE PROPOSED LIMIT OF DISTURBANCE SHOWN ON THE PLANS. MATERIALS NECESSARY TO ACCOMPLISH THIS SHALL BE PAID FOR UNDER THE WATER DIVERSION ITEM 203.9902.
4. IF THE CONTRACTOR ELECTS TO LAY BACK AN EXCAVATION THAT IS ADJACENT TO THE TEMPORARY WATERWAY DIVERSION STRUCTURE, ANY REQUIRED EXTENSION OR ADJUSTMENT OF THE DIVERSION STRUCTURE TO PREVENT WATER FROM ENTERING THE EXCAVATION SHALL BE FURNISHED AND INSTALLED BY THE CONTRACTOR AT NO ADDITIONAL COST TO THE STATE.
5. IF THE CONTRACTOR ELECTS TO USE WATER FROM THE STREAM FOR CONSTRUCTION PURPOSES, ALL WATER INTAKE HOSES SHALL BE SCREENED TO PROTECT AQUATIC LIFE. THE SCREEN OPENING SIZE SHALL BE NO LARGER THAN 1/4 INCH (6mm) SQUARE. THE WITHDRAWAL OF WATER SHALL NOT CAUSE A DECREASE IN WATER ELEVATION AT THE INTAKE SITE OR DOWNSTREAM OF THE SITE. WATER WITHDRAWAL FOR CONSTRUCTION PURPOSES, IF REQUIRED, SHALL BE INCLUDED IN THE UNIT PRICE BID FOR THE TEMPORARY WATERWAY DIVERSION STRUCTURE – ITEM 203.9902.
6. THE CONTRACTOR SHALL BE REQUIRED TO CONSTRUCT THE STRUCTURE IN THE DRY. A WATER DIVERSION STRUCTURE IS ANTICIPATED FOR THE EXCAVATION AND PLACEMENT OF THE BRIDGE AND THE CULVERT. THE STREAM MAY BE DIVERTED THROUGH OR ADJACENT TO THE PROPOSED BRIDGE AND BOX CULVERT. PLANS AND CALCULATIONS FOR THE WATER DIVERSION STRUCTURE SHALL BE DESIGNED AND STAMPED BY A PROFESSIONAL ENGINEER LICENSED IN THE STATE OF RHODE ISLAND. STREAM FLOW IS TO BE MAINTAINED THROUGHOUT CONSTRUCTION.
7. THE CONTRACTOR SHALL SUBMIT SHOP DRAWINGS DETAILING WATER DIVERSION, INCLUDING PROCEDURE AND EMBANKMENT RESTORATION.
8. THE STREAM SHALL BE RESTORED TO ITS ORIGINAL CONDITION AFTER THE PRECAST BRIDGE AND CULVERT HAVE BEEN COMPLETED.
9. THE CONTRACTOR SHALL RESTORE DISTURBED AREAS TO THEIR ORIGINAL CONDITION, UNLESS SHOWN OTHERWISE ON THE PLANS. THE CONTRACTOR SHALL USE 18 INCHES OF RIPRAP WITH AN UNDERLYING GEOTEXTILE TO RESTORE DISTURBED STREAM EMBANKMENTS.
10. ALL COSTS FOR WATER DIVERSION, INCLUDING ALL LABOR AND MATERIAL FOR RESTORATION OF DISTURBED AREAS OUTSIDE THE LIMITS SHOWN ON THE CONTRACT PLANS, SHALL BE INCLUDED IN ITEM 203.9902, WATER DIVERSION.

DEWATERING BASIN NOTES:

1. SEE R.I. STANDARD 9.7.0 FOR DEWATERING BASIN DETAILS.
2. SUGGESTED LOCATIONS FOR DEWATERING BASINS ARE SHOWN ON THE PLAN. BASED ON ACTUAL CONSTRUCTION OPERATIONS, THE THE CONTRACTOR MAY CHOOSE ALTERNATE LOCATIONS FOR THE DEWATERING BASINS WITH THE APPROVAL OF THE ENGINEER. ACTUAL LOCATIONS SHALL REMAIN WITHIN INDICATED LOD.
3. ARROWS SHOWN AT DEWATERING BASINS INDICATE THE REQUIRED LOCATION OF THE FILTER BASIN DISCHARGE.
4. DEWATERING OPERATIONS SHALL NOT DISCHARGE, EITHER DIRECTLY OR INDIRECTLY, TO ANY WATERBODIES UNLESS THE DISCHARGE WATER IS AT LEAST AS FREE AND CLEAR OF SEDIMENT AS THE ADJACENT WATERBODY.

Kindly be advised that this Permit is not equivalent to a verification of the type or extent of freshwater wetlands on site.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0127
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE



NOTES:

1. THE ENERGY DISSIPATER SHALL BE DESIGNED BY THE CONTRACTOR AND SUBMITTED TO THE ENGINEER FOR APPROVAL.
2. THE ENERGY DISSIPATERS SHALL BE INSTALLED WITHOUT VEGETATIVE CLEARING AND SHALL MINIMIZE SURFACE AND SUBSURFACE DISTURBANCE.

TYPICAL ENERGY DISSIPATER DETAIL
(NOT TO SCALE)

RI Dept. of Env. Mgt. Received AUG 21 2015 Office of Water Resources

20 0 10 20 40
SCALE IN FEET 1"=20'

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

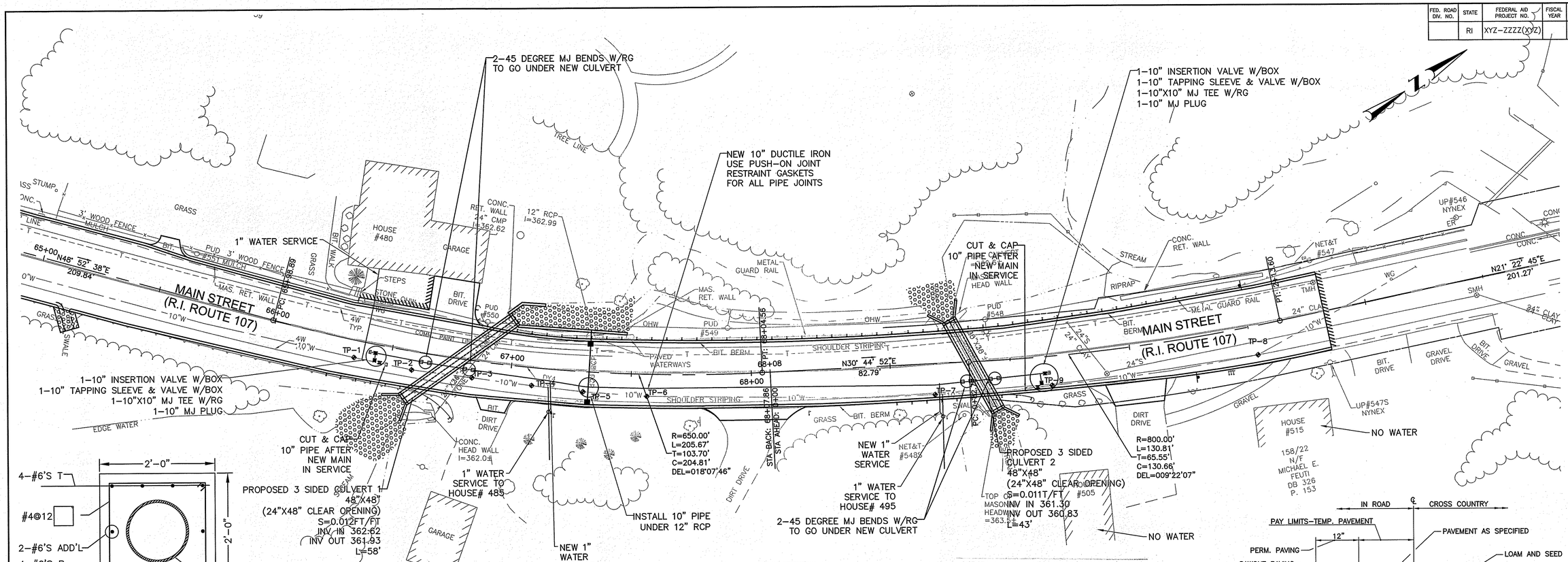
WATER DIVERSION PLAN

CHECKED BY _____ DATE _____ SCALE 1"=20"

H:\p\03016\Dwg\03016-231.dwg August 12, 2015 - 2:27pm lalmeida

0076N_V1_034_WDIV

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		35	44

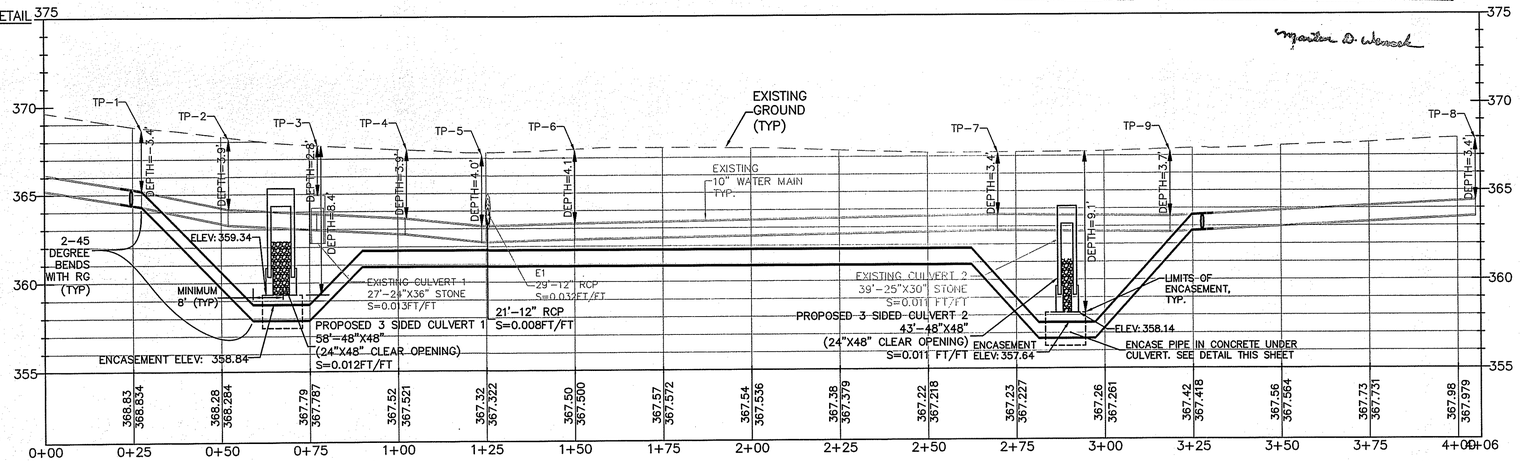


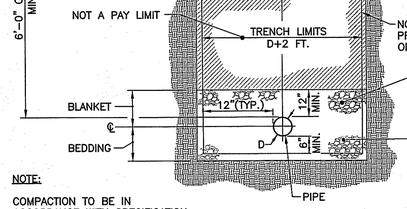
NOTES:
1. ALL CONCRETE 4000 PSI AT 28 DAYS.
2. ALL REINFORCED GRADE 60.
3. EXTEND PIPE ENCASEMENT BEYOND THE CULVERT MEASURED FROM INSIDE FACE OF CULVERT A DISTANCE EQUAL TO 0.5 TIMES VERTICAL DISTANCE FROM TOP OF ENCASEMENT TO TOP SURFACE OF THE PROPOSED CULVERT.

Kindly be advised that this Permit is not equivalent to a verification of the type or extent of freshwater wetlands on site.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

PIPE ENCASEMENT DETAIL
1"=10'





NOTE:
COMPACTION TO BE IN ACCORDANCE WITH SPECIFICATION SECTION 02225

DUCTILE IRON PIPE
TYPICAL TRENCH DETAIL
NOT TO SCALE

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

WATERMAIN PLAN
AND PROFILE

CHECKED BY _____ DATE _____ SCALE H1"=20' V1"=4'

Stantec
Stantec Consulting Services Inc.
5 LAN Drive, Suite 300
Westford MA
01886
Tel. 978.692.1913
Fax. 978.692.4578
www.stantec.com

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		36	44

END PROJECT
R.I. CONTRACT NO. 2015-CH-065
STA. 2+33±

158/29
N/F
NELSON'S REALTY, LLC
DB 767 P. 59

158/26
N/F
DAVID A. &
DEBRA M. LOWE
DB 114 P. 822

CLEAR RIVER

MAIN STREET
(R.I. ROUTE 107)

PROPOSED 3 SIDED CULVERT 1
48"X48"
(24"X48" CLEAR OPENING)
S=0.012FT/FT
INV IN 362.62
INV OUT 361.93
L=58'

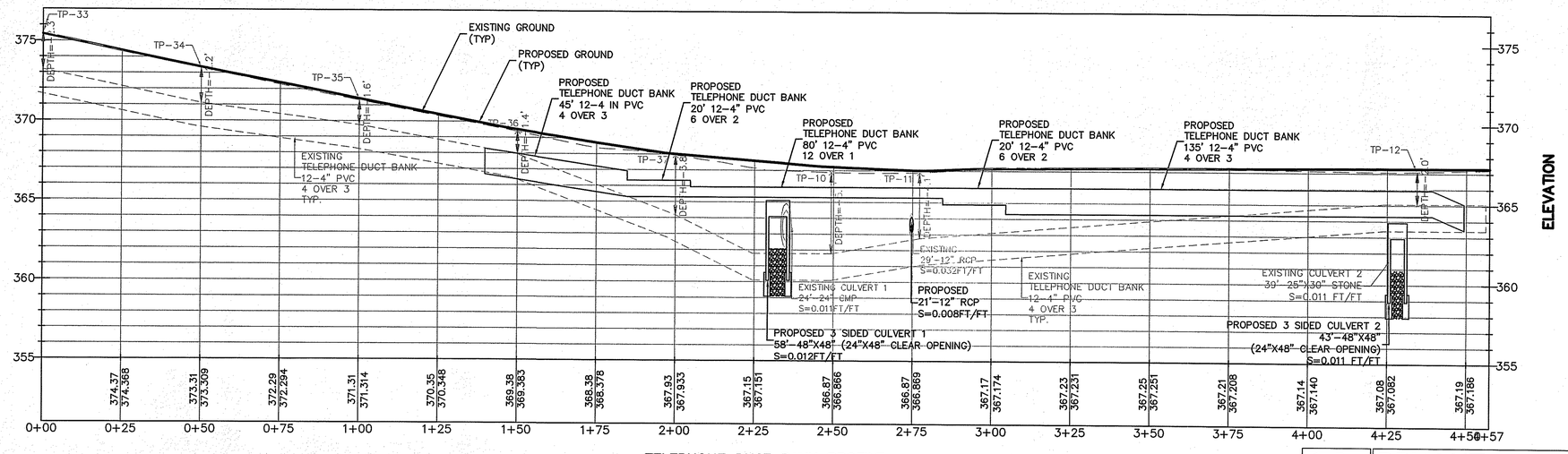
PROPOSED 3 SIDED CULVERT 2
48"X48"
(24"X48" CLEAR OPENING)
S=0.011T/FT
INV IN 361.30
INV OUT 360.83
L=43'

PROPOSED
12" RCP
S=0.008FT/FT
INV IN 363.23
INV OUT 360.03
L=21'

PROPOSED
12" RCP
S=0.008FT/FT
INV IN 363.03
INV OUT 362.98
L=4'

R=650.00'
L=205.67'
T=103.70'
C=204.81'
DEL=018°07'46"

R=800.00'
L=130.81'
T=65.55'
C=130.66'
DEL=009°22'07"



Kindly be advised that this Permit is not equivalent to a verification of the type or extent of freshwater wetlands on site.

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marilee D. Wenzel

ENVIRONMENTAL MANAGEMENT JUN 11 2015 RECEIVED

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

TELEPHONE PLAN
AND PROFILE

CHECKED BY _____ DATE _____ SCALE H1"=20' H1"=4'

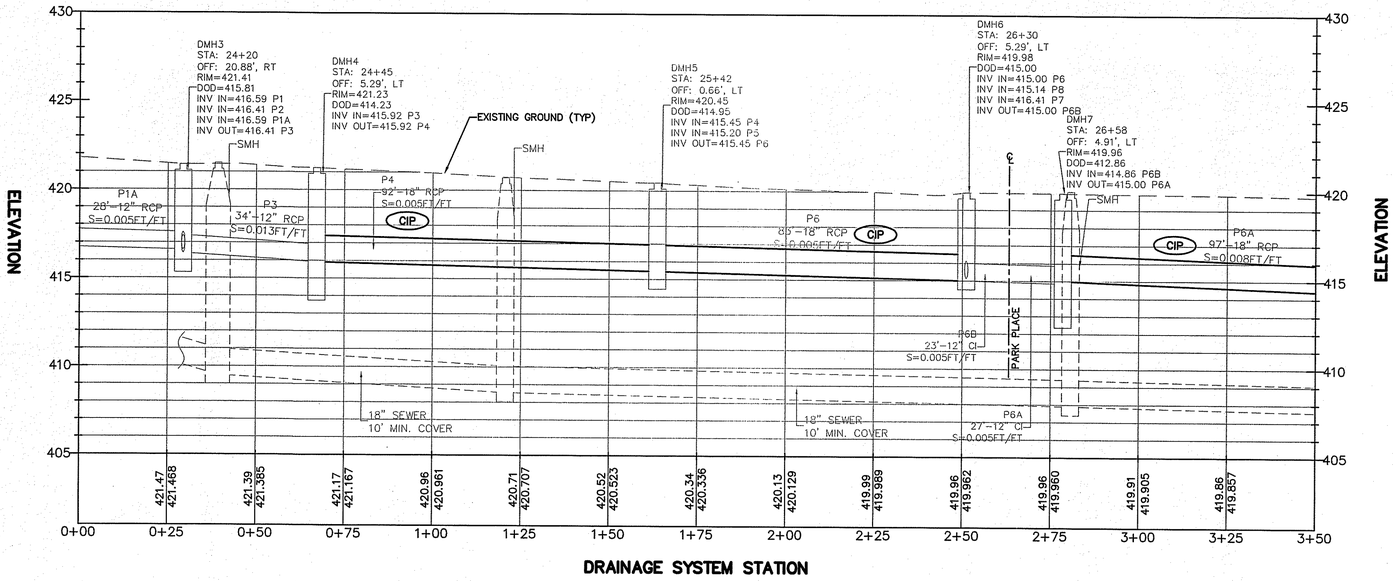
BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-226.dwg June 01, 2015 - 8:37pm lalmeida

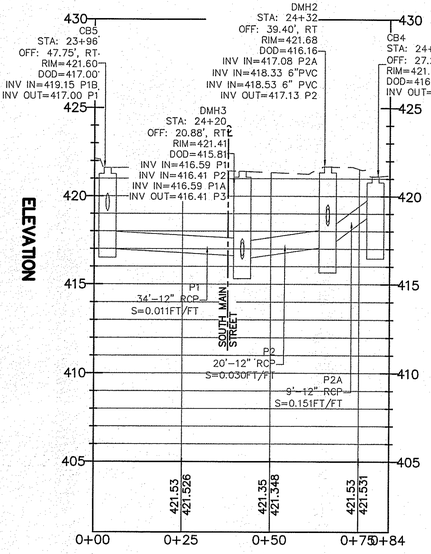
0076X_V1_TPROFILE

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		37	44

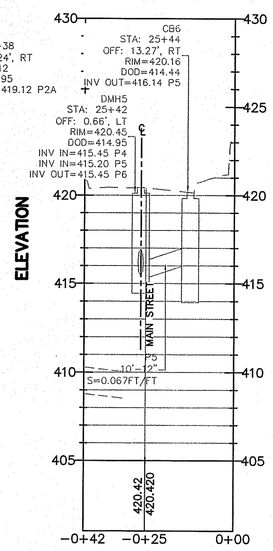
DRAINAGE SYSTEM I PROFILE



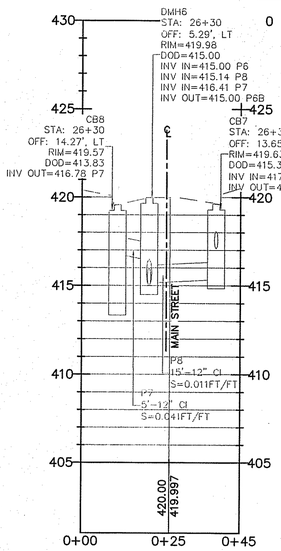
LATERAL I.I PROFILE



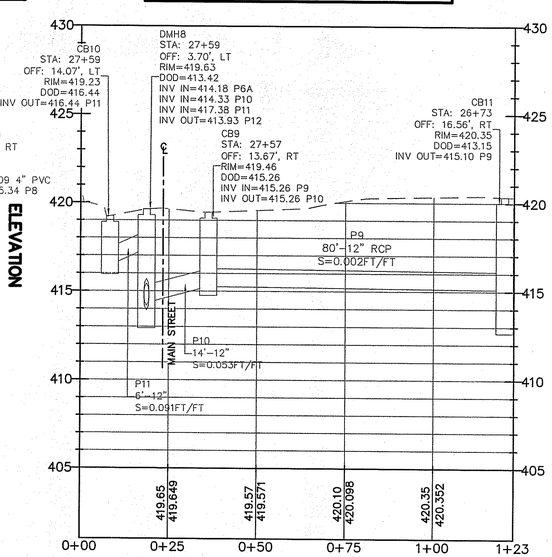
LATERAL I.II PROFILE



LATERAL I.III PROFILE



LATERAL I.IV PROFILE



DRAINAGE SYSTEM I – MAIN STREET (STA 24+45 TO STA 28+75)

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marian D. Warenda

Environmental Protection
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

DRAINAGE PROFILE NO. 1

CHECKED BY _____ DATE _____ SCALE 1"=20' 1"=4'

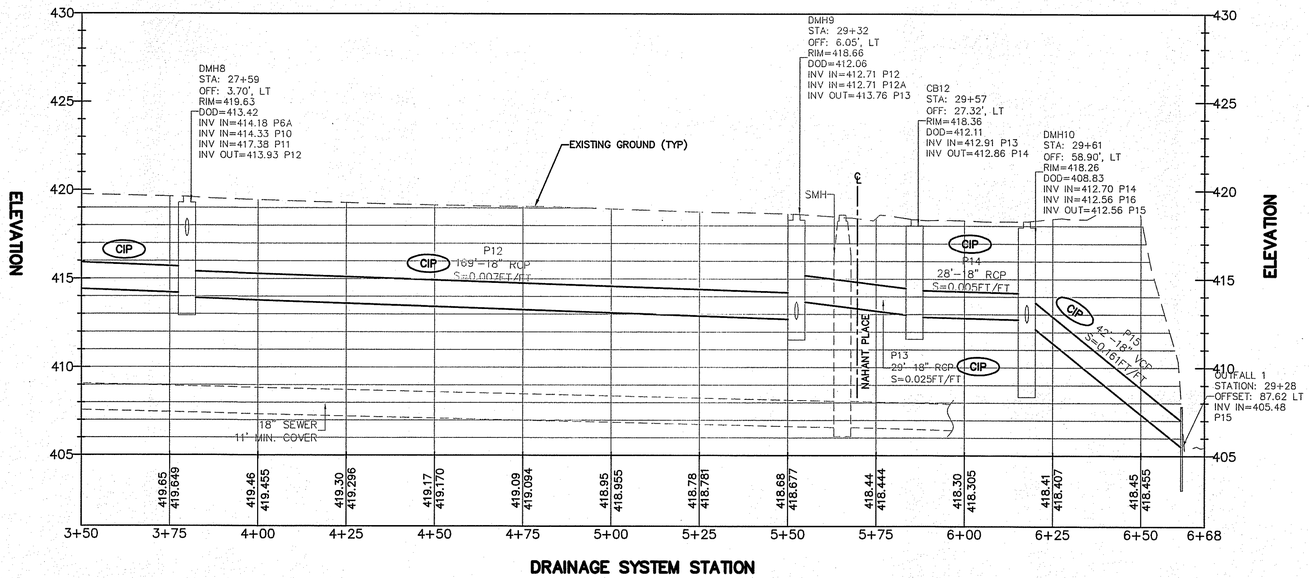
BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-225.dwg June 01, 2015 - 8:39pm lalmeida

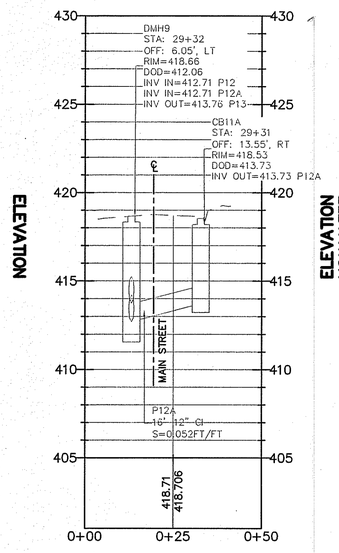
0076V_V1_0XX_DPROF1

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		38	44

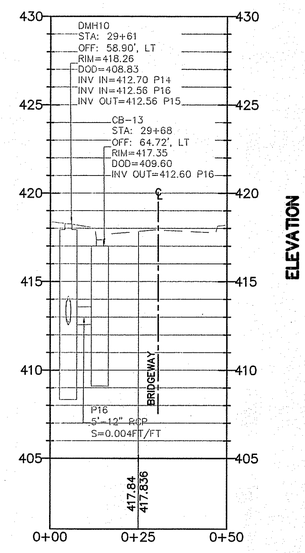
DRAINAGE SYSTEM I PROFILE



LATERAL I.V PROFILE



LATERAL I.VI PROFILE



DRAINAGE SYSTEM STATION

DRAINAGE SYSTEM STATION

DRAINAGE SYSTEM I – MAIN STREET (STA 28+75 TO STA 29+68)

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 2 2 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Engineering and Technical Services
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

DRAINAGE PROFILE NO. 2

CHECKED BY _____ DATE _____ SCALE 1"=20' 1"=4'

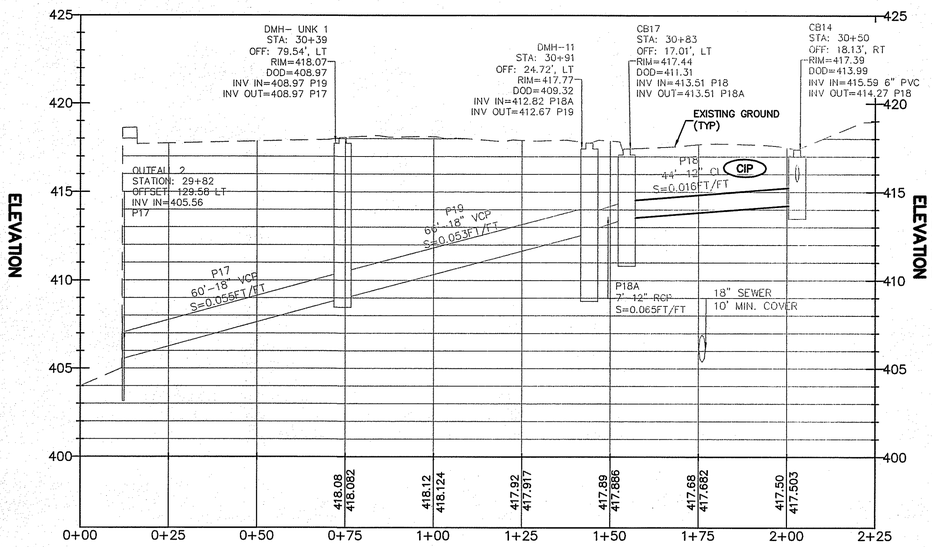
BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-225.dwg June 01, 2015 - 8:39pm lalmeida

0076V_V1_0XX_DPROF2

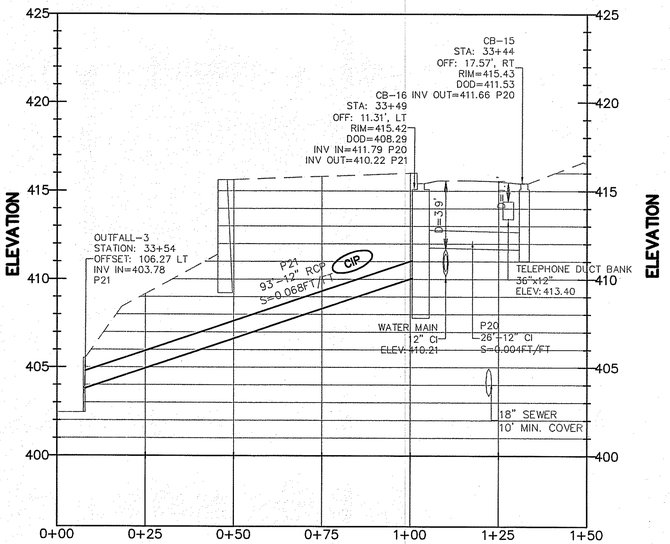
FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		39	44

DRAINAGE SYSTEM II PROFILE



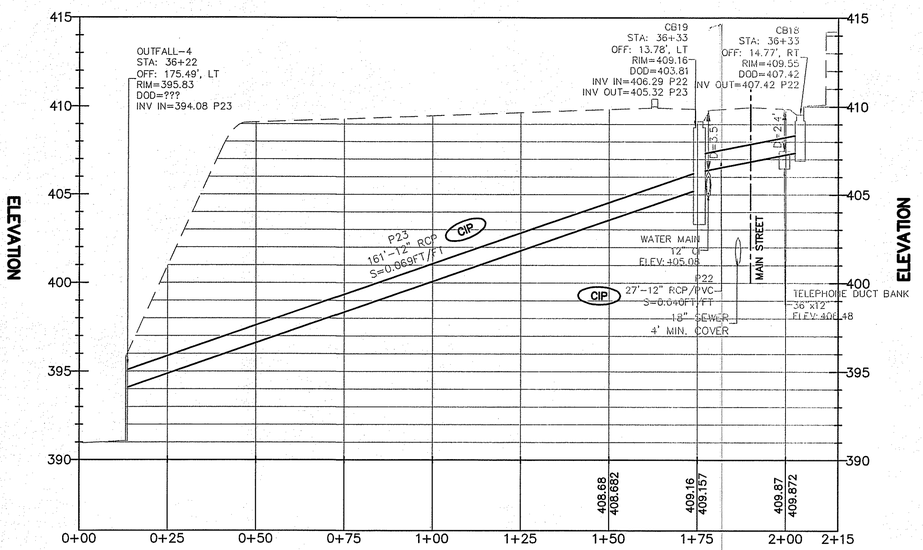
DRAINAGE SYSTEM II – MAIN STREET (STA 30+50 TO STA 30+83)

DRAINAGE SYSTEM III PROFILE



DRAINAGE SYSTEM III – MAIN STREET (STA 33+49 TO STA 33+54)

DRAINAGE SYSTEM IV PROFILE



DRAINAGE SYSTEM IV – MAIN STREET (STA 36+22 TO STA 36+33)

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
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Environmental Management
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

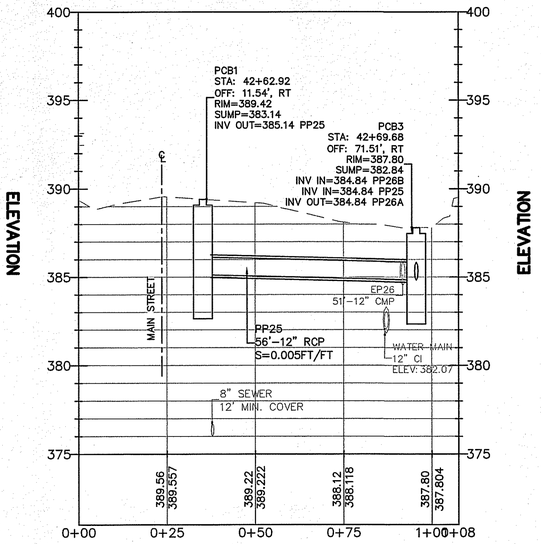
DRAINAGE PROFILE NO. 3

CHECKED BY _____ DATE _____ SCALE 1"=20' 1"=4'

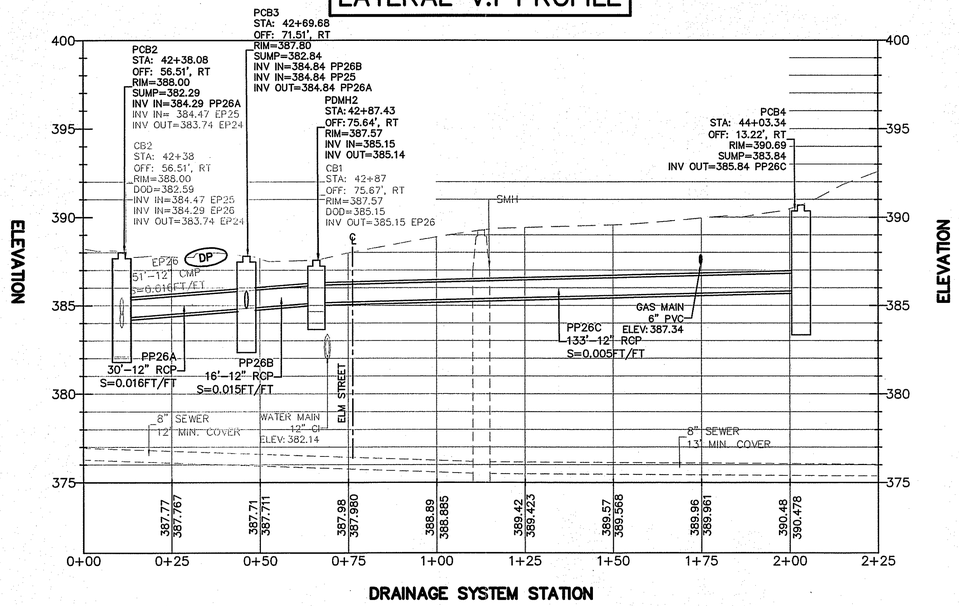
BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		40	44

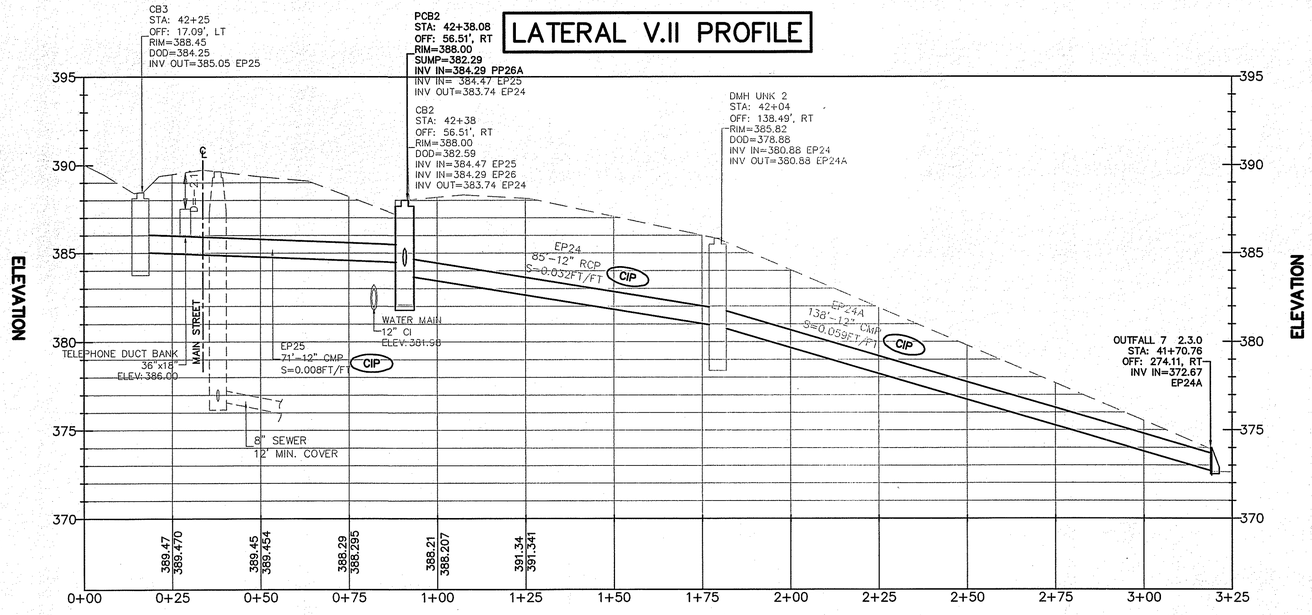
DRAINAGE SYSTEM V PROFILE



LATERAL V.I PROFILE



LATERAL V.II PROFILE



DRAINAGE SYSTEM V – MAIN STREET (STA 41+93 TO STA 44+03)

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP-2 2-2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
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Environmental Management
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

DRAINAGE PROFILE NO. 4

CHECKED BY _____ DATE _____ SCALE 1"=20'
1"=4'

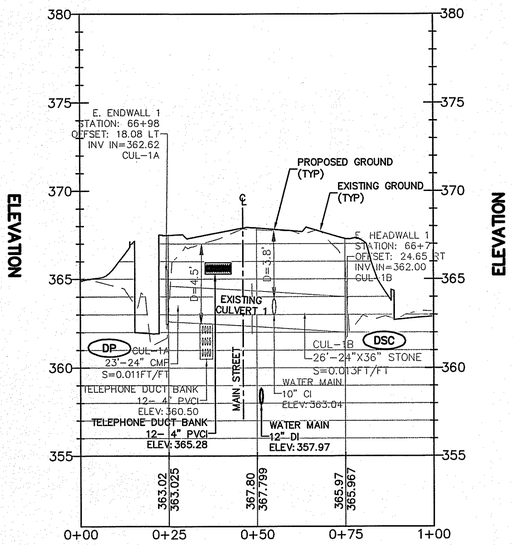
BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-225.dwg June 01, 2015 - 8:39pm lalmeida

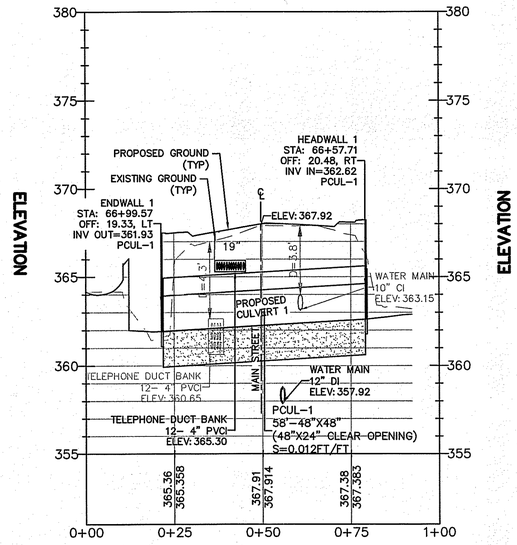
0076V_V1_0XX_DPR0F4

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		41	44

CULVERT I PROFILE

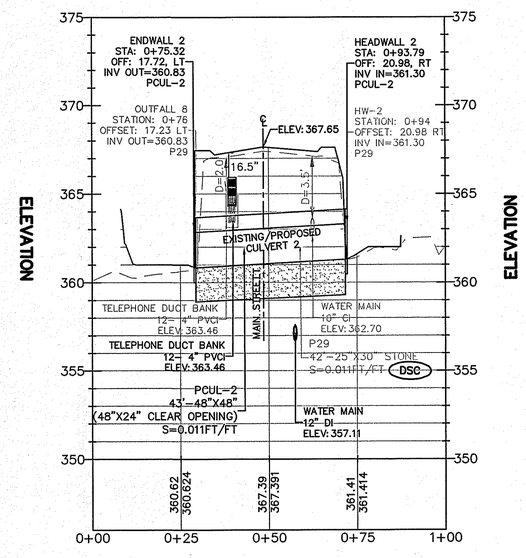


PROPOSED CULVERT I PROFILE

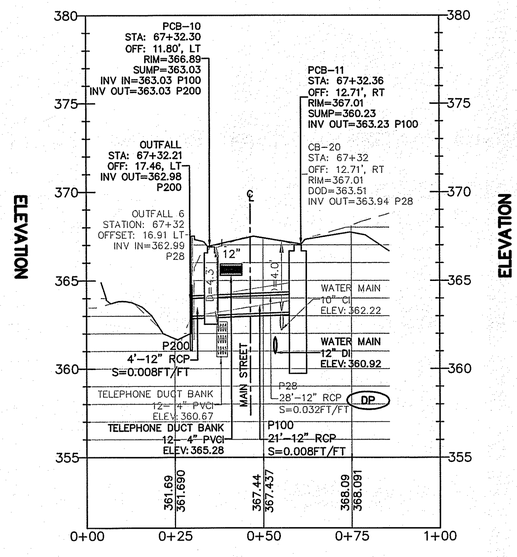


DRAINAGE SYSTEM VI – MAIN STREET (STA 68+80)

CULVERT II PROFILE



DRAINAGE SYSTEM VI PROFILE



DRAINAGE SYSTEM VI – MAIN STREET (STA 67+32 AND STA 0+80)

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 2 2 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Environmental Management
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

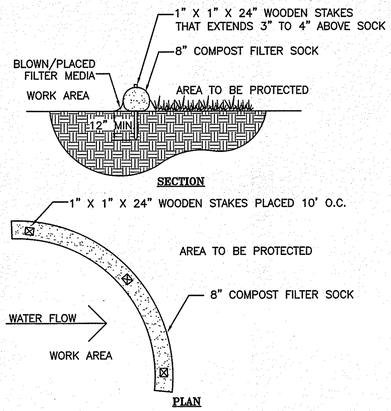
DRAINAGE PROFILE NO. 5

CHECKED BY _____ DATE _____ SCALE 1"=20' / 1"=4'

H:\p\03016\Dwg\03016-225.dwg June 01, 2015 - 8:39pm lalmeida

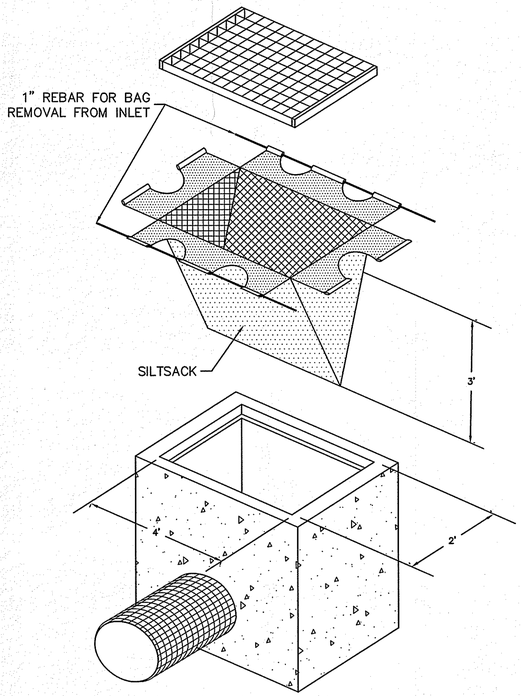
0076V_V1_042_DPROF5

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		42	44

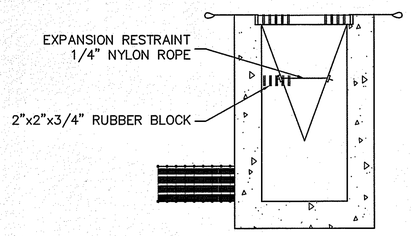


COMPOST FILTER SOCK DETAIL (CFS)

(NOT TO SCALE)

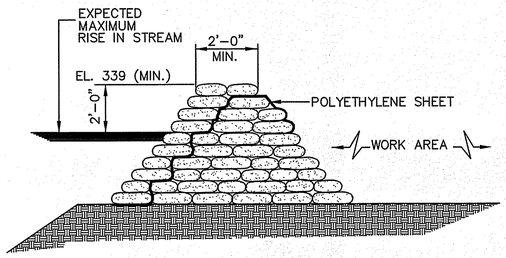


NOTE:
REGULAR FLOW=40 GAL./MIN/SF
HIGH FLOW=200 GAL./MIN/SF



INLET SEDIMENT CONTROL (ISC)

(NOT TO SCALE)

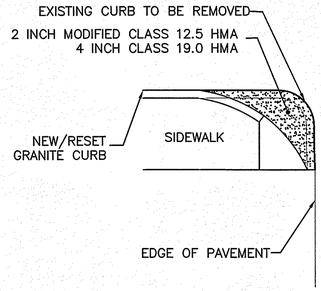


NOTES:

1. ACTUAL SANDBAG DIKE DIMENSIONS TO BE DETERMINED BY THE CONTRACTOR BASED ON SITE CONDITIONS.
2. SANDBAGS SHALL BE IN ACCORDANCE WITH SECTION 207 OF THE STANDARD SPECIFICATIONS.
3. SANDBAG DIKE SHALL BE PAID FOR UNDER ITEM CODE 203.9902, WATER DIVERSION

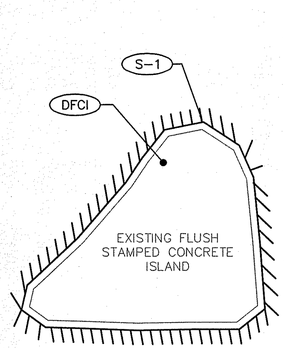
SCHEMATIC SANDBAG DIKE DETAIL

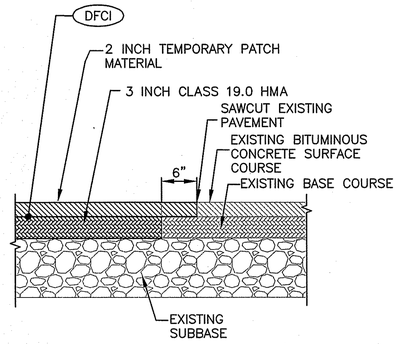
(NOT TO SCALE)



PAVEMENT REPLACEMENT NEAR PROPOSED CURB RAMP

(NOT TO SCALE)

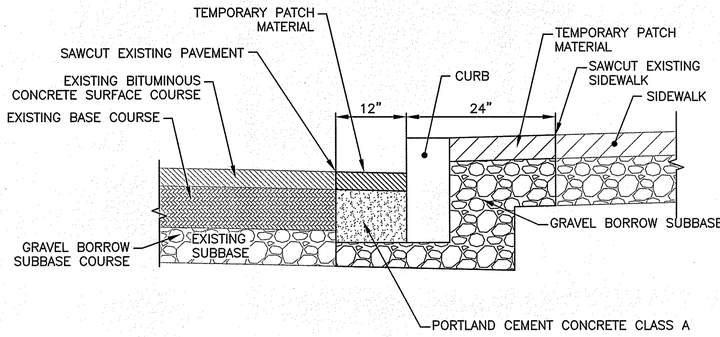




NOTE:
THE REMOVAL AND DISPOSAL OF THE FLUSH CONCRETE ISLAND WILL BE PAID FOR UNDER ITEM CODE 201.0408, REMOVE AND DISPOSE RIGID PAVEMENT.

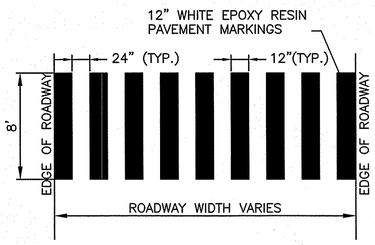
REMOVE AND DISPOSE FLUSH CONCRETE ISLAND (DFCI)

(NOT TO SCALE)



CURB RESETTING DETAIL

(NOT TO SCALE)



CROSSWALK DETAIL (CW)

(NOT TO SCALE)

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0127
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Environmental Management JUN 11 2015 Office of Water Resources

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

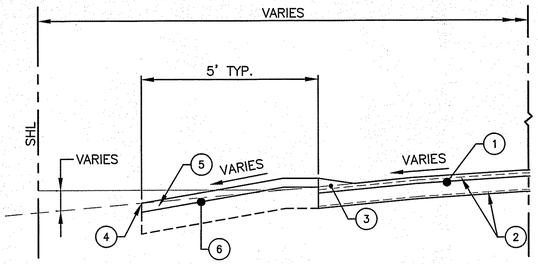
1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

DETAILS SHEET NO. 1

CHECKED BY _____ DATE _____ SCALE NO SCALE

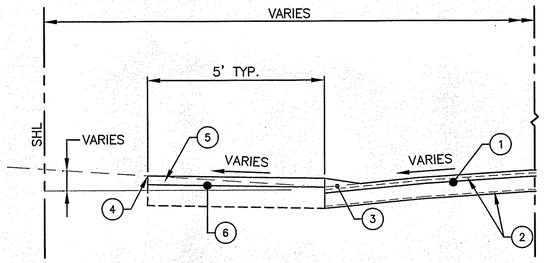
BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		43	44



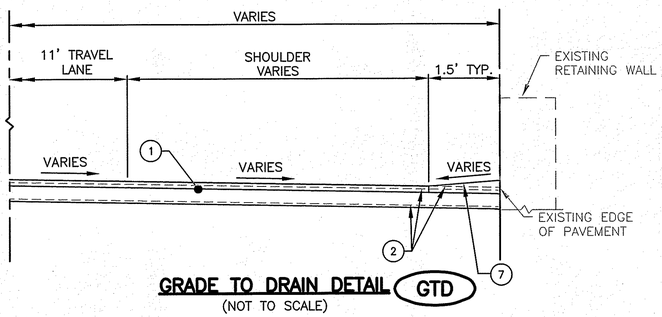
BITUMINOUS CONCRETE DRIVEWAY GRADE BELOW PROPOSED ROADWAY GRADE BCD

(NOT TO SCALE)



BITUMINOUS CONCRETE DRIVEWAY GRADE ABOVE PROPOSED ROADWAY GRADE BCD

(NOT TO SCALE)

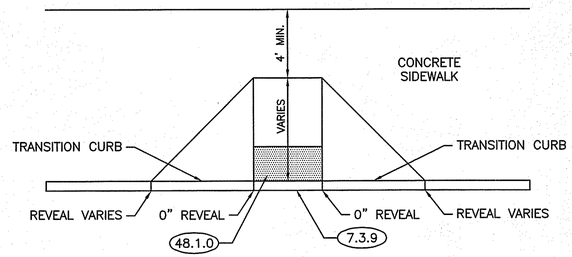


GRADE TO DRAIN DETAIL GTD

(NOT TO SCALE)

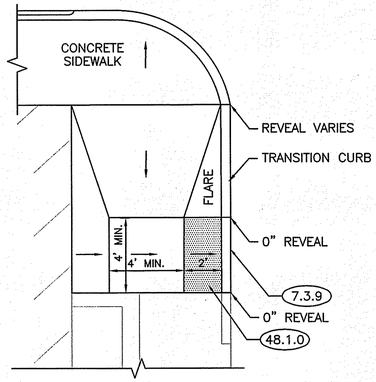
LEGEND

1. PROPOSED ROADWAY PAVEMENT
2. EXISTING ROADWAY STRUCTURE
3. BITUMINOUS BERM R.I. STD. 7.5.1A MODIFIED, CLASS 12.5 MODIFIED/ GRADE TO DRAIN, SEE GENERAL PLANS AND DRAINAGE AND UTILITY PLANS FOR LOCATIONS.
4. FULL DEPTH SAW CUT FOR EXISTING BITUMINOUS DRIVEWAYS
5. REMOVE AND DISPOSE EXISTING FLEXIBLE PAVEMENT
6. EXISTING BITUMINOUS DRIVEWAYS: THICKNESS TO MATCH EXISTING PAVEMENT
   EXISTING GRAVEL DRIVEWAYS: 3 INCHES CLASS 12.5 HMA FOR MISCELLANEOUS WORK
   8 INCHES GRAVEL BORROW
7. GRADE TO DRAIN: CLASS 12.5 HMA FOR MISCELLANEOUS WORK



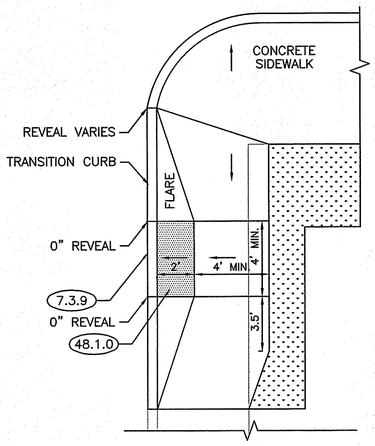
SPECIAL CURB RAMP, TYPE 1 SCR1

(NOT TO SCALE)



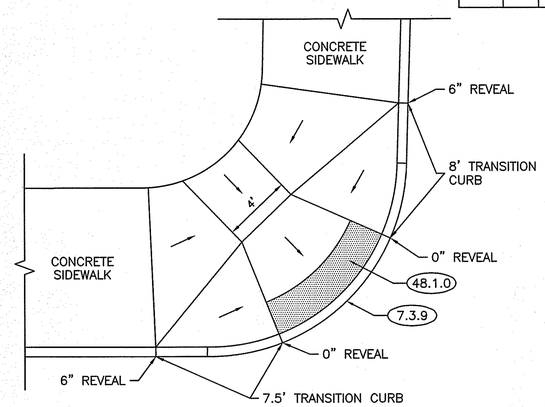
SPECIAL CURB RAMP, TYPE 3 SCR3

(NOT TO SCALE)



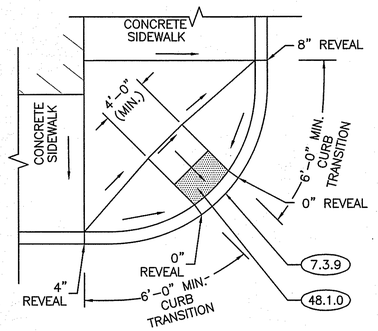
SPECIAL CURB RAMP, TYPE 3 SCR5

(NOT TO SCALE)



SPECIAL CURB RAMP, TYPE 2 SCR2

(NOT TO SCALE)



SPECIAL CURB RAMP, TYPE 4 SCR4

(NOT TO SCALE)

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
NO CHANGES ALLOWED WITHOUT PRIOR APPROVAL
APPROVED PLANS MUST BE AT CONSTRUCTION SITE

Marian D. Warwick

Environmental Management
JUN 11 2015
Office of Water Resources

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

DETAILS SHEET NO. 2

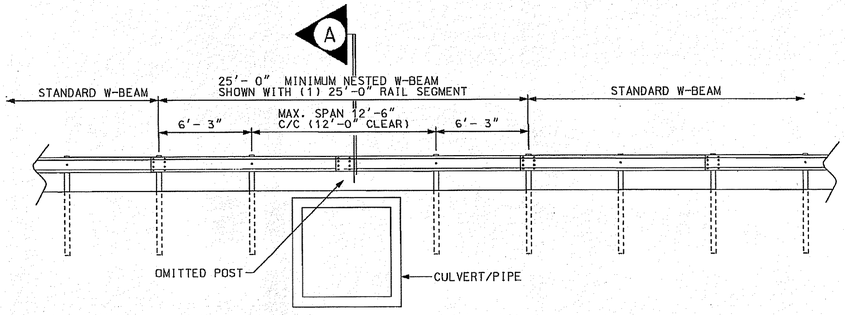
CHECKED BY _____ DATE _____ SCALE NO SCALE

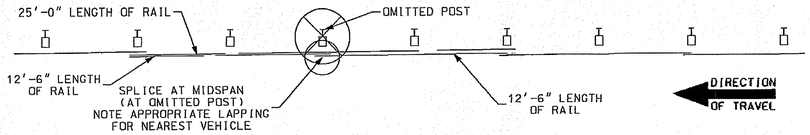
BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

H:\p\03016\Dwg\03016-228.dwg June 01, 2015 - 8:40pm lalmeida

0076V_V1_042_DETAIL2

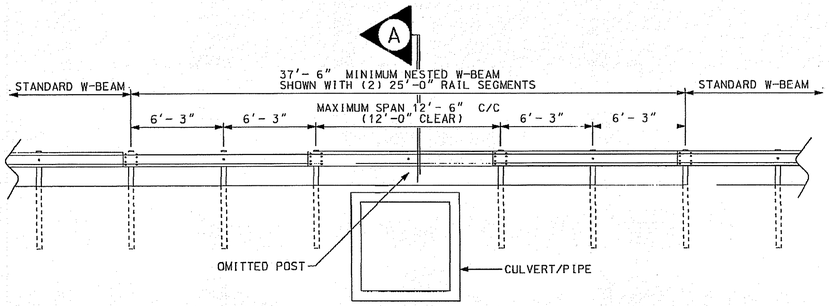
FED. ROAD DIV. NO.	STATE	FEDERAL AID PROJECT NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
	RI	XYZ-ZZZZ(XYZ)		44	44

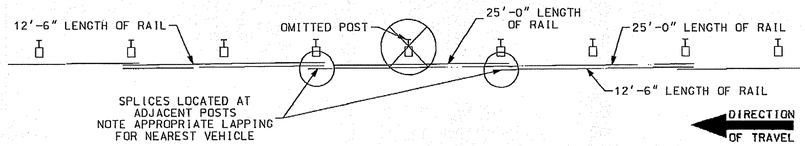




W-BEAM 12-6" SPAN WHEN STANDARD SPLICE FALLS AT MIDSPAN (NGR)

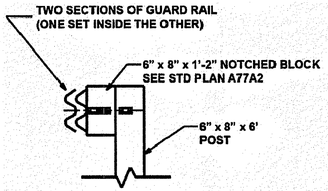
(NOT TO SCALE)





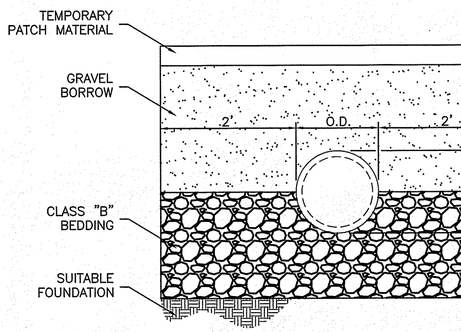
W-BEAM 12-6" SPAN WHEN STANDARD SPLICES FALL ON ADJACENT POSTS (NGR)

(NOT TO SCALE)



SECTION A W-BEAM 12'-6" SPAN

(NOT TO SCALE)

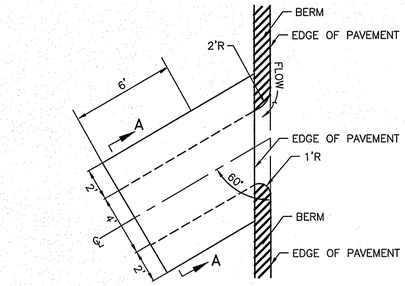


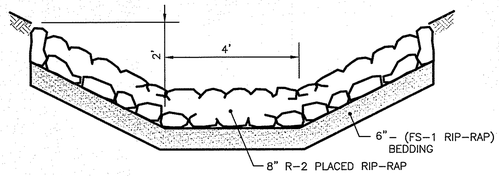
NOTES:

1. PLACE TWO 2"± LIFTS OF TEMPORARY PATCHING MATERIAL TO MATCH EXISTING PAVEMENT.
2. THE TEMPORARY PATCHING MATERIAL SHALL BE REMOVED WHILE REMOVING AND DISPOSING THE FLEXIBLE PAVEMENT. SURFACE COURSE AND BASE COURSE WILL BE PLACED DURING THE FINAL PAVING OPERATION. NO ROLLING VIBRATORY COMPACTORS SHALL BE USED OVER THE TRENCH.
3. IF IT IS NECESSARY TO ROUTE TRAFFIC OVER THE TRENCHES, THE CONTRACTOR SHALL SIZE, PROVIDE, AND INSTALL STEEL PLATING IN ACCORDANCE WITH THE LATEST EDITION OF THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MUTCD). THERE WILL BE NO SEPARATE PAY ITEM FOR THIS WORK.

RCP PIPE TRENCH DETAIL

(NOT TO SCALE)

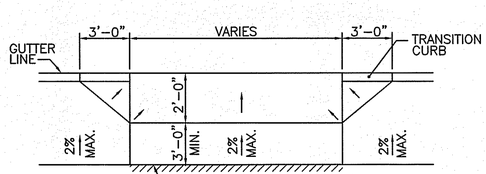




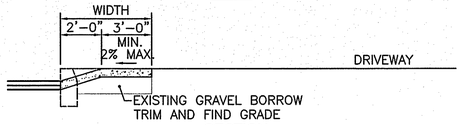
SECTION A-A

RIP-RAP WATERWAY (8.3.0M)

(NOT TO SCALE)



PLAN



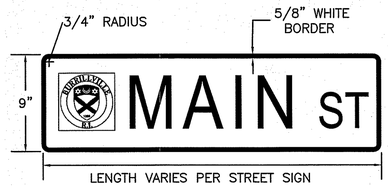
SECTION

NOTE:

1. SHALL BE IN ACCORDANCE WITH SECTION 905 OF THE R.I. STANDARD SPECIFICATIONS.

DRIVEWAY DEVELOPMENT FOR 3'-0" TRANSITION CURB (MODIFIED) (43.4.0M)

(NOT TO SCALE)



NOTES:

1. STREET NAME SIGNS TO BE INSTALLED AT LOCATIONS SHOWN ON THE PLANS, UNLESS OTHERWISE DIRECTED BY THE ENGINEER.
2. ALL FINISHED STREET SIGNS SHALL BE DOUBLE SIDED WITH WHITE LETTERING ON GREEN BACKGROUND.
3. THE TOWN EMBLEM IS 6" X 6". CONTACT THE TOWN OF BURRILLVILLE DIRECTOR OF PUBLIC WORKS FOR EMBLEM DETAIL.
4. THE STREET SIGNS SHALL BE IN ACCORDANCE WITH SECTION T.15 OF R.I. STANDARD SPECIFICATIONS (LATEST EDITION WITH ALL REVISIONS) AND THE CONTRACT DOCUMENTS, UNLESS OTHERWISE DIRECTED BY THE ENGINEER.

STREET SIGN DETAIL

(NOT TO SCALE)

Environmental Management
JUN 11 2015
Office of Water Resources

DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF WATER RESOURCES
FRESHWATER WETLANDS PROGRAM
APPROVED WITH CONDITIONS
AS SPECIFIED IN THE LETTER OF APPROVAL
DATED SEP 22 2015 FILE # 15-0122
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APPROVED PLANS MUST BE AT CONSTRUCTION SITE
Maureen D. Winsor

BRYANT ASSOCIATES
Engineers Surveyors Construction Managers
640 George Washington Hwy, Bldg. C, Suite 100
Lincoln, Rhode Island 02865

REVISIONS		
NO.	DATE	BY

RHODE ISLAND
DEPARTMENT OF TRANSPORTATION

1R HIGHWAY IMPROVEMENTS TO
MAIN STREET (RI ROUTE 107)
FROM SAYLES AVENUE TO 250 FT WEST OF UNION AVENUE
BURRILLVILLE RHODE ISLAND

DETAILS SHEET NO. 3

CHECKED BY _____ DATE _____ SCALE NO SCALE

H:\p\03016\Dwg\03016-228.dwg June 03, 2015 - 12:47pm lalmeida

0076V_V1_043_DETAIL3