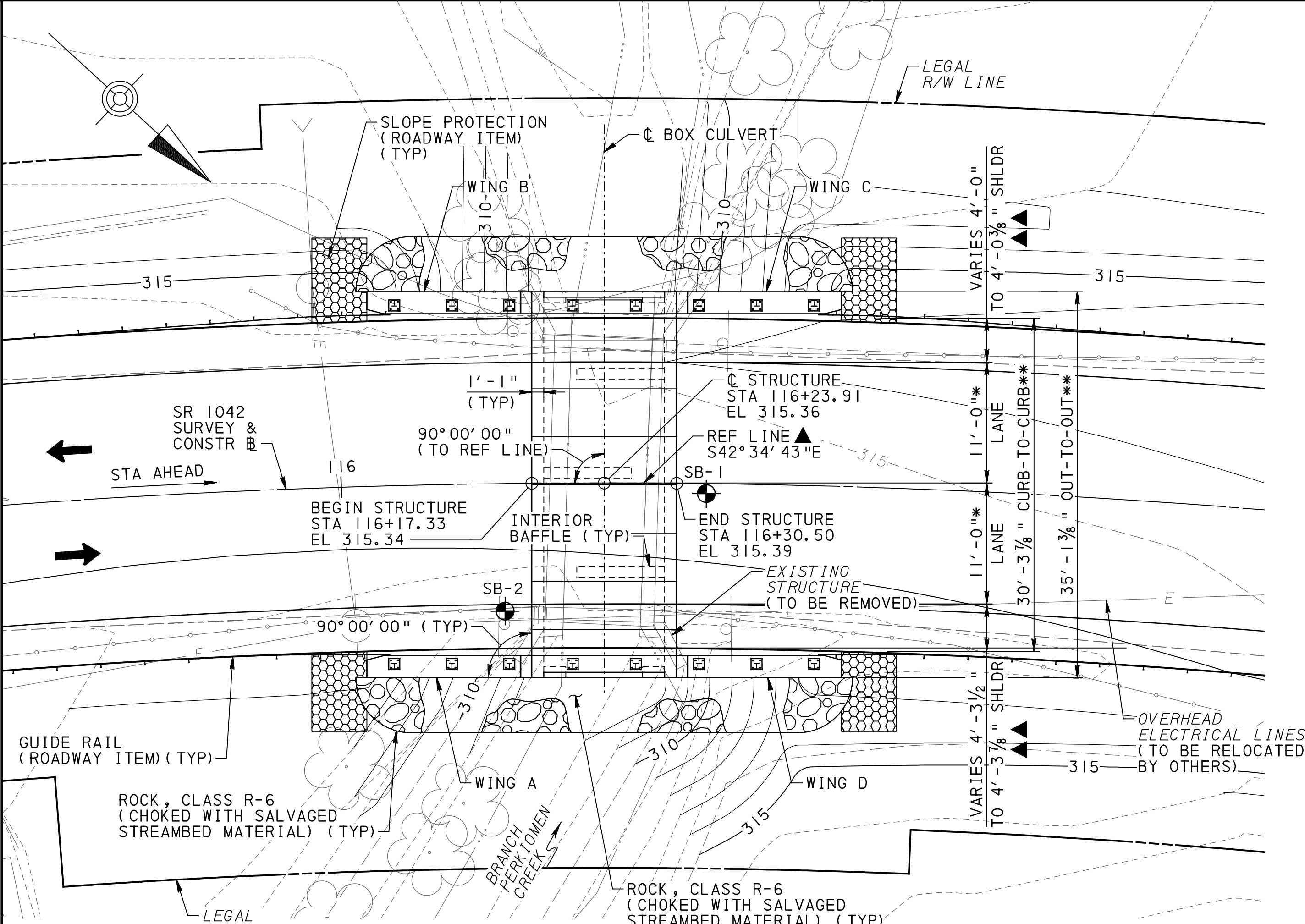
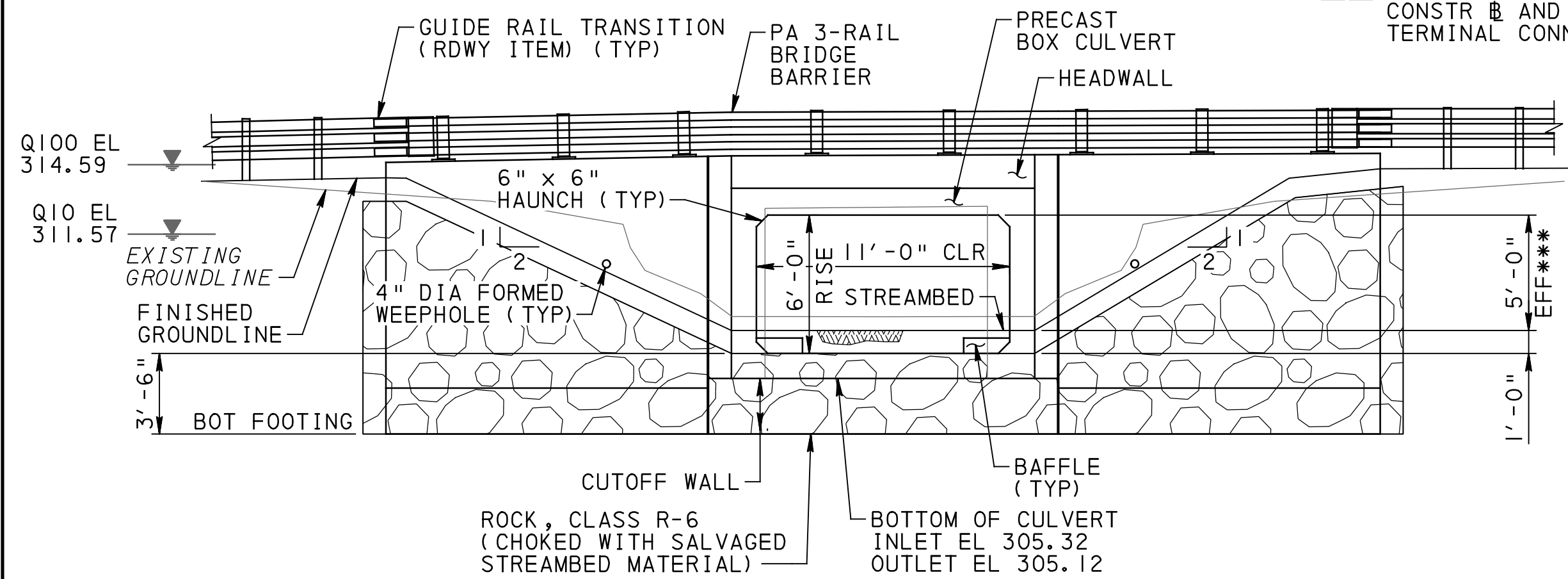




PLAN

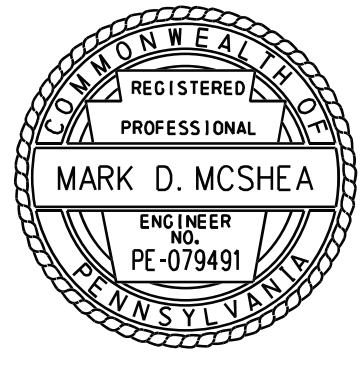
2 0 4 8 FEET



ELEVATION

2 0 2 4 6 FEET

*** MIN VERTICAL CLEARANCE REQUIRED = 5'-0"
MIN VERTICAL CLEARANCE PROVIDED = 5'-0"



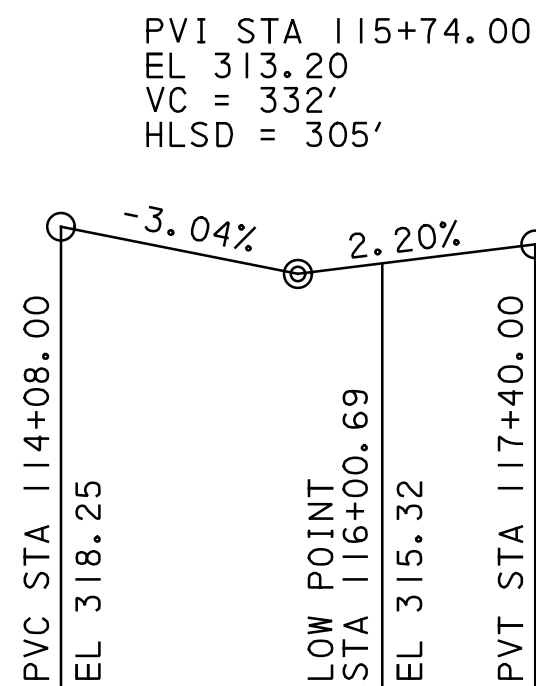
PREPARED BY:
HDR
HDR ENGINEERING, INC.
3025 CHEMICAL ROAD
SUITE 110
PLYMOUTH MEETING, PA 19462

SIGNATURE & DATE *Mark McShea* 12/12/2024

HORIZONTAL CURVE DATA

SR 1042 SURVEY & CONSTR
PI STA 116+69.99
 $\Delta = 28^\circ 24' 27''$ RT
T = 186.80'
L = 365.91'
R = 738.00'
E = 23.27'
PC STA 114+83.19
PT STA 118+49.10
DESIGN SPEED 40 MPH

VERTICAL PROFILE DATA



HYDRAULIC DATA
BRANCH PERKIOMEN CREEK

RETURN PERIOD - 10 YR FLOOD (DESIGN)

EXISTING: WATER SURFACE EL = 313.59
Q = 263.00 CFS
V = 2.6 FPS
PROPOSED: WATER SURFACE EL = 311.57
Q = 263.00 CFS
V = 4.9 FPS

RETURN PERIOD - 100 YR FLOOD

EXISTING: WATER SURFACE EL = 315.81
Q = 577.00 CFS
V = 2.0 FPS
PROPOSED: WATER SURFACE EL = 314.59
Q = 577.00 CFS
V = 5.3 FPS

DRAINAGE AREA 0.37 SQ MILES
FLOOD OF RECORD - UNKNOWN

AS-DRILLED BORING TABLE

BORING	STATION	OFFSET
SB-1	116+33.20	0.9' RT
SB-2	116+14.90	11.6' RT

	EXISTING CONDITIONS	PROPOSED CONDITIONS
D/S LOW CHORD EL (FT)	313.62	312.20
U/S LOW CHORD EL (FT)	312.70	312.40
HYDRAULIC OPENING (SF)	43.00	55.00

INDEX OF SHEETS	
SHEET NO	DESCRIPTION
1	GENERAL PLAN AND ELEVATION
2	GENERAL NOTES AND LOAD RATINGS
3	QUANTITIES
4	BOX PROFILE, TYPICAL SECTION AND DETAILS
5	STAKE-OUT PLAN AND DECK DETAILS
6	WINGWALL A AND C DETAILS
7	WINGWALL B AND D DETAILS
8	BARRIER DETAILS
9	REINFORCEMENT BAR SCHEDULE
10	BAFFLE DETAILS
11	CULVERT DETAILS
12	TEST BORINGS

LEGEND

- AS-DRILLED SOIL BORING
- INDICATES TRAFFIC DIRECTION
- EXISTING CONTOURS
- PROPOSED CONTOURS
- OVERHEAD ELECTRICAL LINES

LIST OF ABBREVIATIONS:

- BOT - BOTTOM
- CLR - CLEAR
- CONSTR - CONSTRUCTION
- DIA - DIAMETER
- EA - EACH
- EF - EACH FACE
- EFF - EFFECTIVE
- EL - ELEVATION
- EQ - EQUAL
- EXP - EXPANSION
- FF - FRONT FACE
- GALV - GALVANIZED
- JT - JOINT
- KSF - KIPS PER SQUARE FOOT
- NTS - NOT TO SCALE
- PREM - PREMOLDED
- RF - REAR FACE
- SPA - SPACING
- TYP - TYPICAL

NOTES:

- FOR GENERAL NOTES, SEE SHEET 2.
- FOR QUANTITIES, SEE SHEET 3.

Mark	Description	By	Chk'd.	Recm'd.	Date
REVISIONS					

S.R. 1042 PREVIOUSLY KNOWN AS L.R. 46167
BMS STR ID: 46-1042-0060-0000 MPMS/ECMS PROJ: 96069 BRKEY: 69559

COMMONWEALTH OF PENNSYLVANIA
DEPARTMENT OF TRANSPORTATION

MONTGOMERY COUNTY
S.R. 1042 SECTION HBV
SEG. 0060 OFF. 0000
S.R. 1042 STA. 116+23.91

CHURCH ROAD OVER BRANCH PERKIOMEN CREEK
11'-0" x 6'-0" PRECAST CONCRETE BOX CULVERT
GENERAL PLAN AND ELEVATION

RECOMMENDED	SHEET 1 OF 12 +SUPPLEMENTAL DRAWINGS
DISTRICT BRIDGE ENGINEER	S-39985

PA 3-RAIL BRIDGE BARRIER	BC-706M	10-07-24
ANCHOR SYSTEMS	BC-734M	2-19-21
WALL CONST & EXP JOINT DETAILS	BC-735M	9-30-16
REINFORCEMENT BAR FABRICATION DETAILS	BC-736M	11-23-22
BRIDGE DRAINAGE	BC-751M	1-31-19
TYPICAL WATERPROOFING AND EXPANSION DETAILS	BC-788M	11-23-22
MECHANICAL CONNECTION DETAILS	BC-798M	2-14-23
CLASSIFICATION OF EARTHWORK FOR STRUCTURES	RC-11M	6-01-10
BACKFILL AT STRUCTURES	RC-12M	11-01-22
GUIDE RAIL TO BRIDGE BARRIER TRANSITIONS	RC-50M	12-18-24
TYPE 31 STRONG POST GUIDE RAIL	RC-51M	12-18-24
DESCRIPTION	DWG. NO.	APP. DATE
SUPPLEMENTAL DRAWINGS		