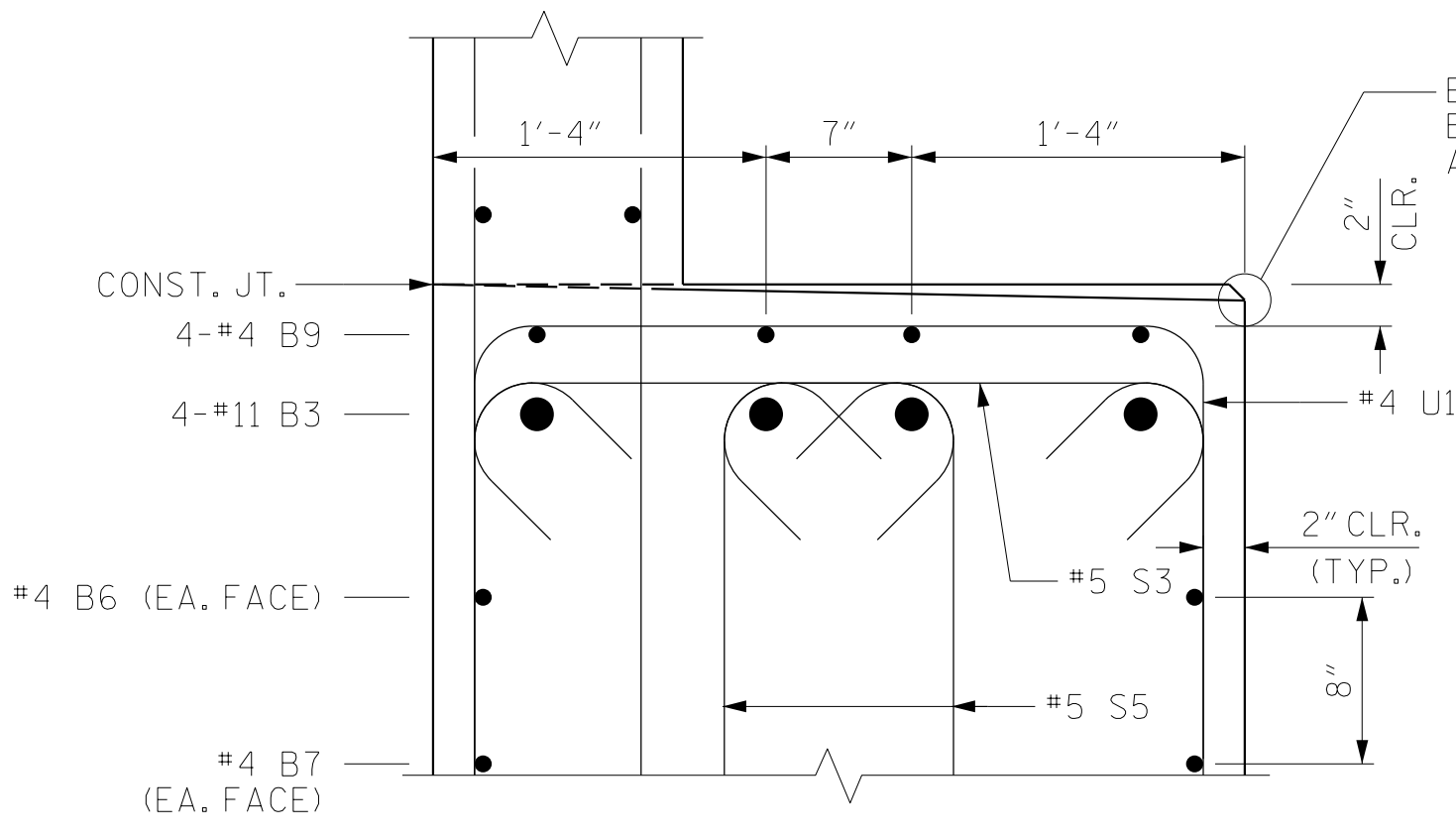


BAGGED STONE AND PIPE SHALL BE PLACED IMMEDIATELY AFTER COMPLETION OF END BENT EXCAVATION. PIPE MAY BE EITHER CONCRETE, CORRUGATED STEEL, CORRUGATED ALUMINUM ALLOY, OR CORRUGATED PLASTIC. PERFORATED PIPE WILL NOT BE ALLOWED.

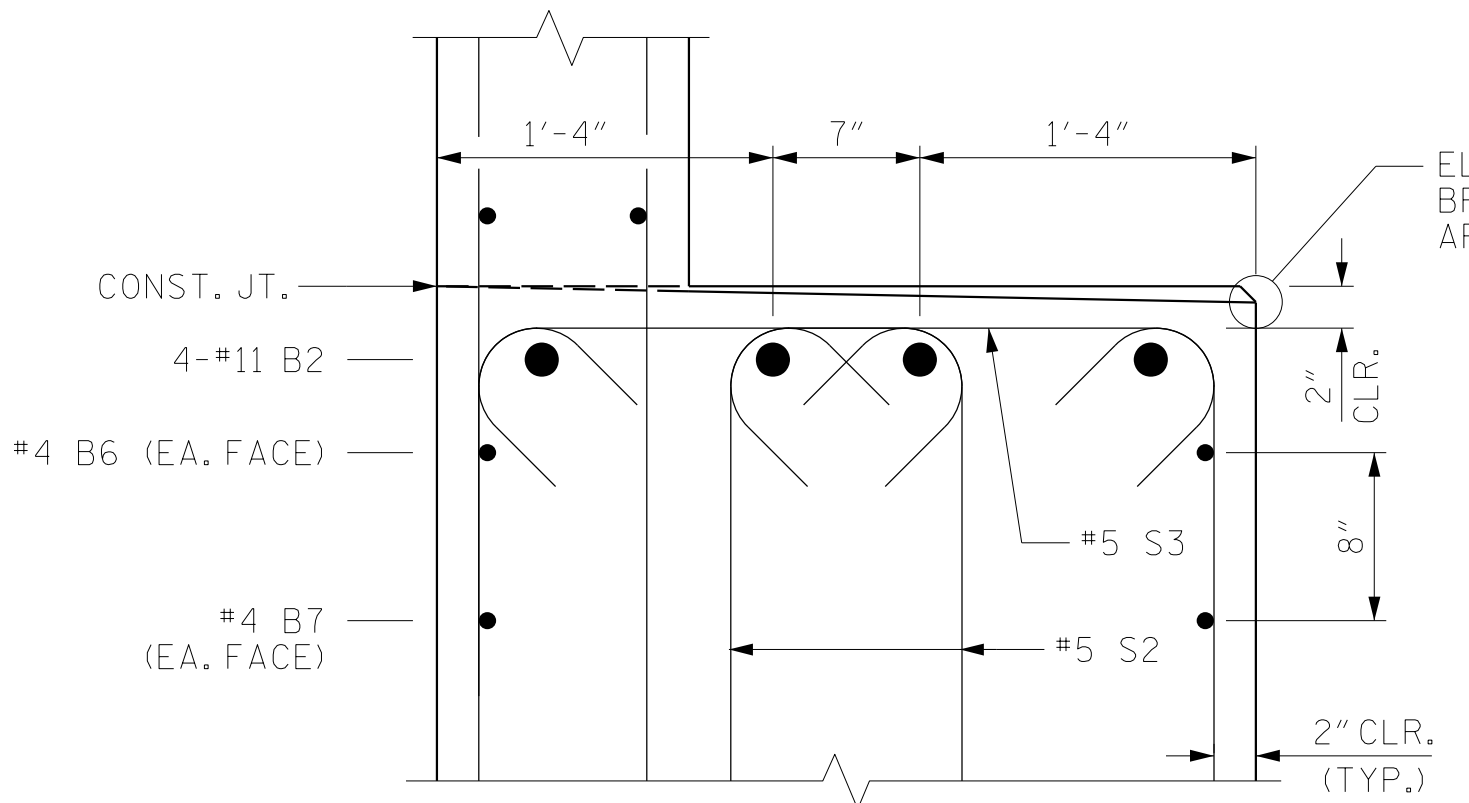
BAGGED STONE SHALL REMAIN IN PLACE UNTIL THE ENGINEER DIRECTS THAT IT BE REMOVED. THE CONTRACTOR SHALL REMOVE AND DISPOSE OF SILT ACCUMULATIONS AT BAGGED STONE WHEN SO DIRECTED BY THE ENGINEER. BAGS SHALL BE REMOVED AND REPLACED WHENEVER THE ENGINEER DETERMINES THAT THEY HAVE DETERIORATED AND LOST THEIR EFFECTIVENESS.

NO SEPARATE PAYMENT WILL BE MADE FOR THIS WORK AND THE ENTIRE COST OF THIS WORK SHALL BE INCLUDED IN THE UNIT CONTRACT PRICE BID FOR THE SEVERAL PAY ITEMS.

TEMPORARY DRAINAGE AT END BENT



SECTION B-B

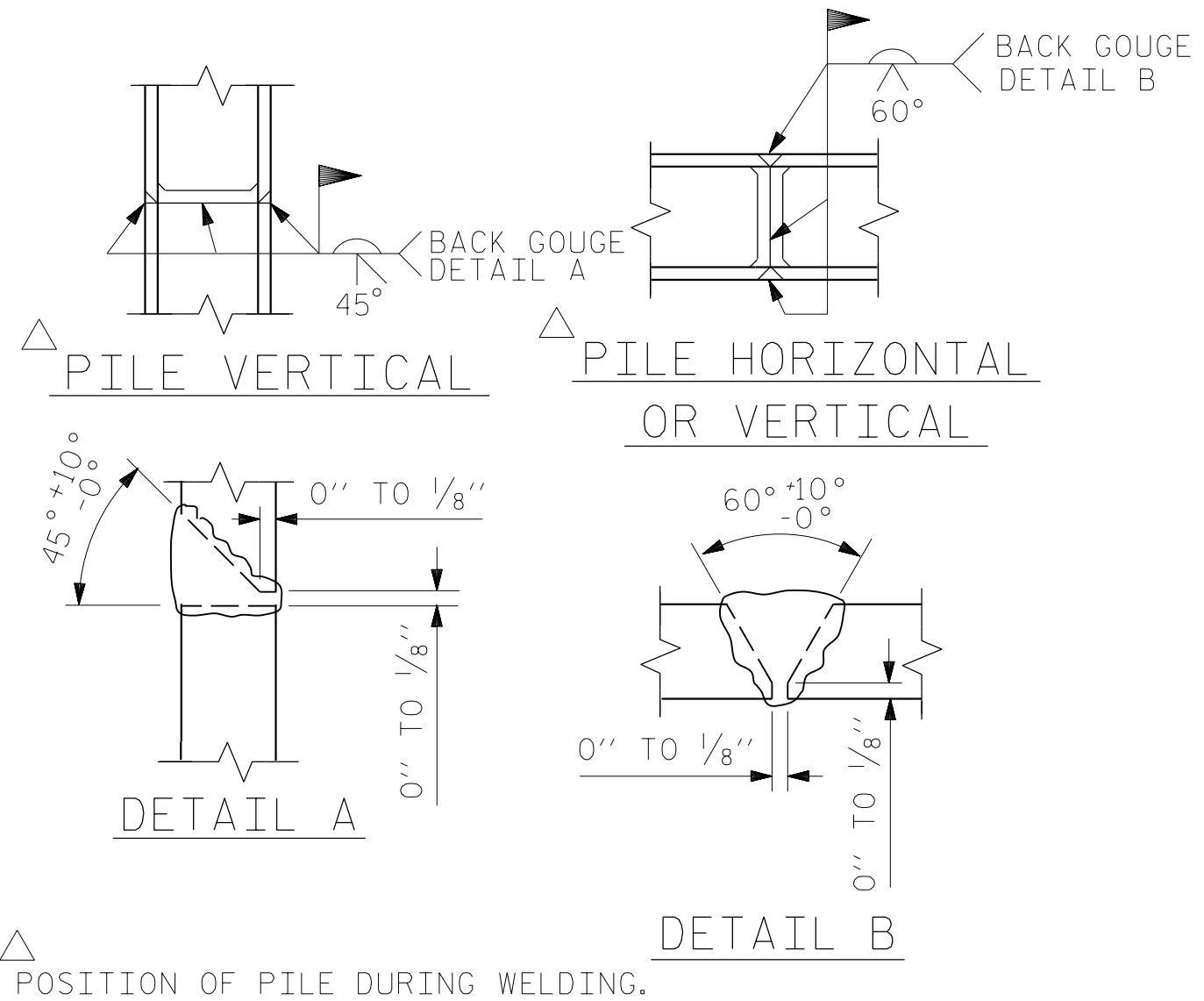


SECTION C-C

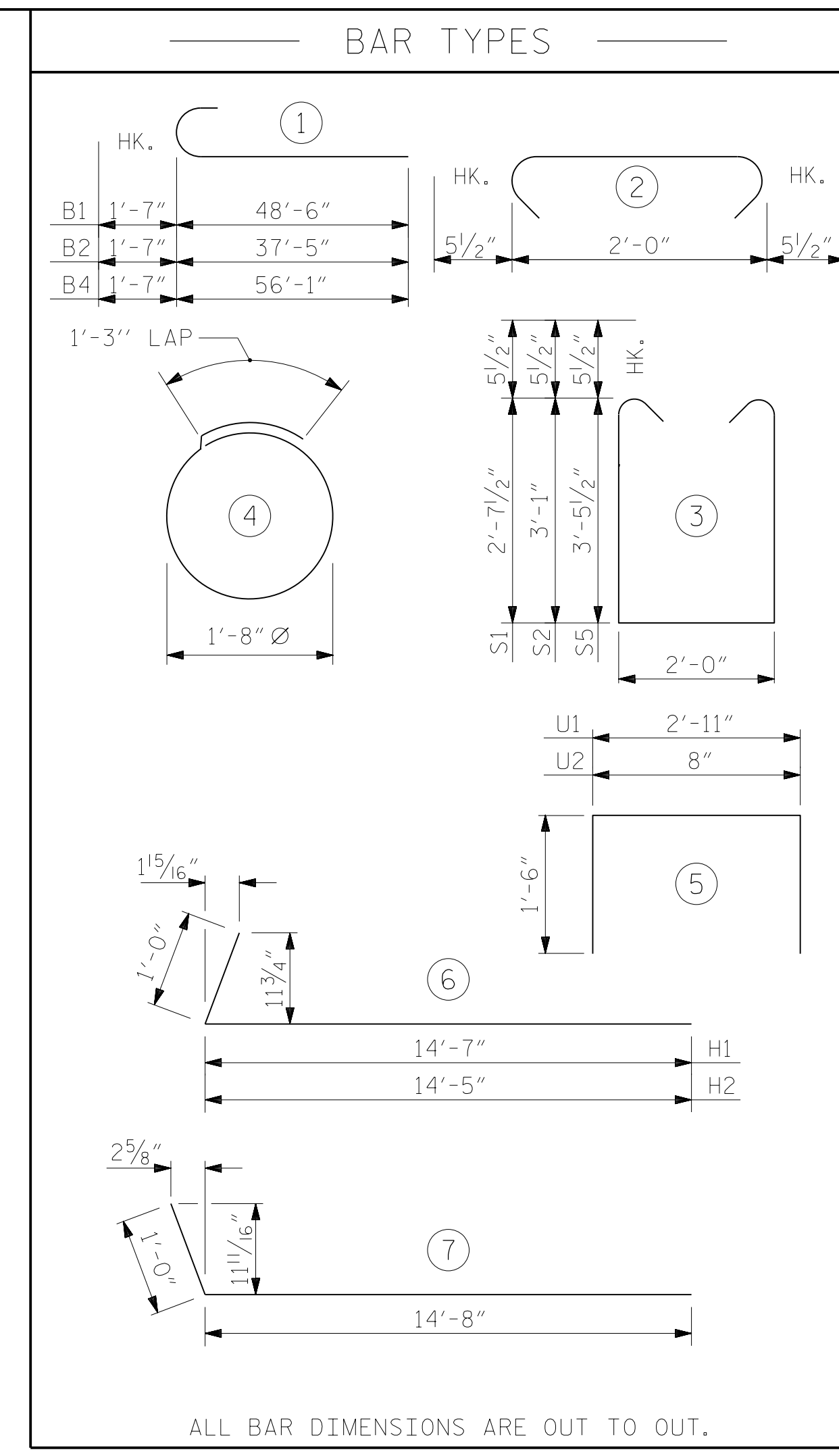
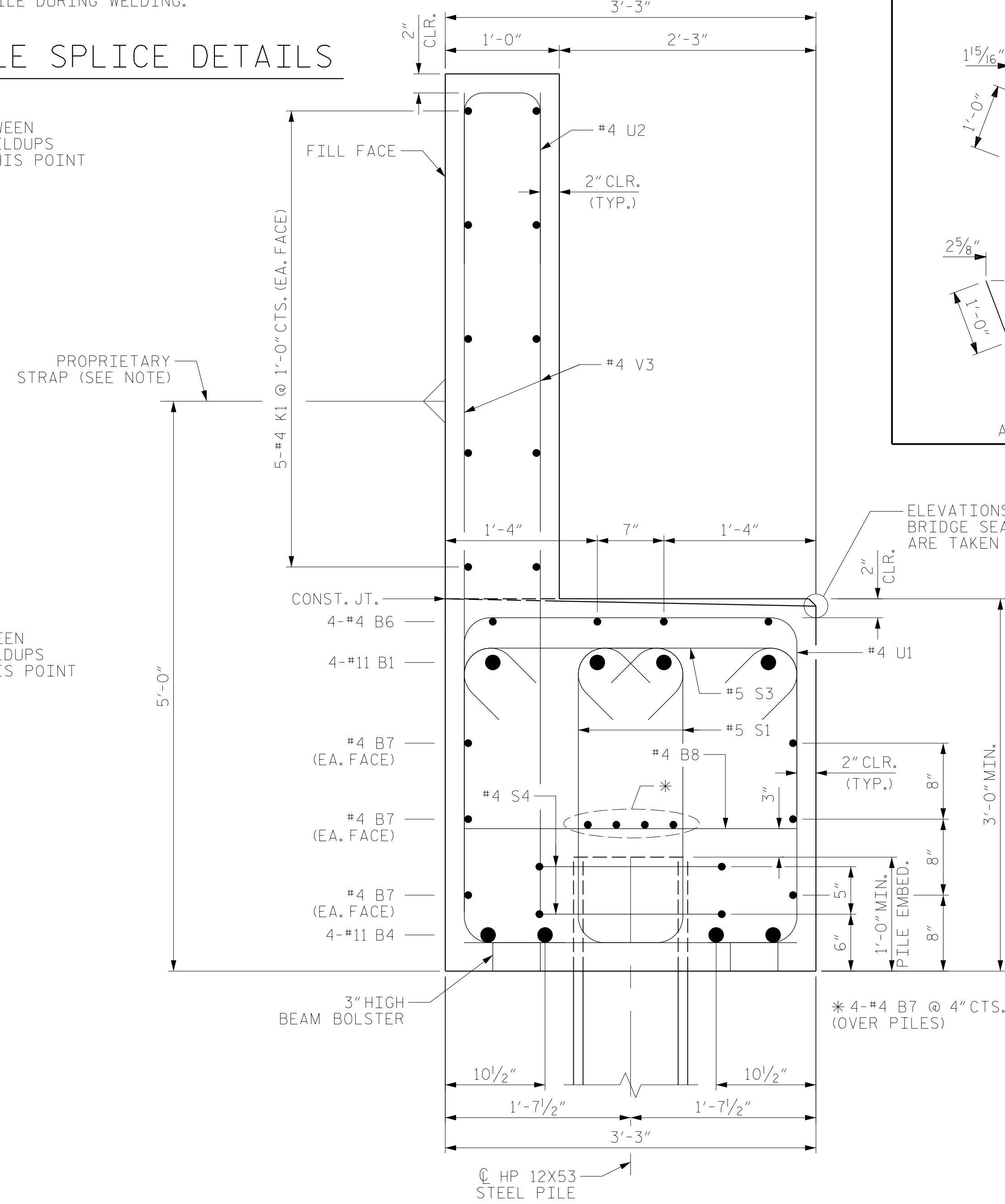
NOTE:

THE CONTRACTOR SHALL DESIGN, FURNISH, AND INSTALL A TIE BACK SYSTEM CAPABLE OF RESISTING THE FOLLOWING HORIZONTAL FORCES: 8.1 KIP/FT UNDER STRENGTH LOADING DEMAND AND 6.1 FIP/FT UNDER SERVICE LOADING DEMAND. PROPOSED CHANGES TO THE STRAP HEIGHT SHOWN IN SECTION A-A SHALL BE APPROVED BY THE DESIGN ENGINEER. THE TIE BACK SYSTEM SHALL BE SUBMITTED FOR APPROVAL BY THE ENGINEER IN THE FORM OF SHOP DRAWINGS. THE TIE BACK SYSTEM AND REINFORCED BRIDGE APPROACH FILL SHALL BE INSTALLED PRIOR TO GIRDER ERECTION.

DRAWN BY :	MRA	DATE :	08/2019
CHECKED BY :	JMR	DATE :	09/2019
DESIGN ENGINEER OF RECORD:	JMR	DATE :	10/2019



PILE SPLICE DETAILS



BILL OF MATERIAL					
END BENT NO. 1					
BAR	NO.	SIZE	TYPE	LENGTH	WEIGHT
B1	4	#11	1	50'-1"	1064
B2	4	#11	1	39'-0"	829
B3	4	#11	STR	59'-4"	1261
B4	8	#11	1	57'-8"	2451
B5	4	#11	STR	22'-9"	483
B6	10	#4	STR	27'-10"	186
B7	40	#4	STR	33'-0"	882
B8	38	#4	STR	2'-11"	74
B9	4	#4	STR	25'-9"	69
H1	18	#6	6	15'-7"	421
H2	18	#6	6	15'-5"	417
H3	38	#6	7	15'-8"	894
K1	40	#4	STR	33'-0"	882
K2	12	#4	STR	2'-8"	21
S1	136	#5	3	8'-2"	1158
S2	96	#5	3	9'-1"	909
S3	454	#5	2	2'-11"	1381
S4	36	#4	4	6'-6"	156
S5	222	#5	3	9'-10"	2277
U1	33	#4	5	5'-11"	130
U2	119	#4	5	3'-8"	291
V1	36	#4	STR	8'-10"	212
V2	36	#4	STR	9'-3"	222
V3	474	#4	STR	7'-1"	2243

REINFORCING STEEL	18,913 LBS.
CLASS A CONCRETE	
POUR #1 CAP AND LOWER PART OF WINGS	58.7 C.Y.
POUR #2 UPPER PART OF WINGS AND BACKWALL	27.9 C.Y.
TOTAL CLASS A CONCRETE	86.6 C.Y.
HP 12 X 53 STEEL PILES NO. 18	540.0 LIN. FT.
STEEL PILE POINTS	NO. 6
PILE DRIVING EQUIPMENT SETUP FOR HP 12X53 STEEL PILES	NO. 18
PILE EXCAVATION IN SOIL	90 LIN. FT.
NOT IN SOIL	90 LIN. FT.

PROJECT NO. U-2579AB  
 FORSYTH COUNTY  
 STATION: 30+67.66 -Y4-

SHEET 4 OF 4

10/14/2021

**RS&H**

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 North Carolina License No. 50737-54043-C&E

STATE OF NORTH CAROLINA DEPARTMENT OF TRANSPORTATION RALEIGH					
SUBSTRUCTURE END BENT 1 DETAILS					
REVISIONS					
NO.	BY:	DATE:	NO.	BY:	DATE:
1			3		
2			4		

SHEET NO.	S2-25
TOTAL SHEETS	37

DOCUMENT NOT CONSIDERED FINAL UNLESS ALL SIGNATURES COMPLETED