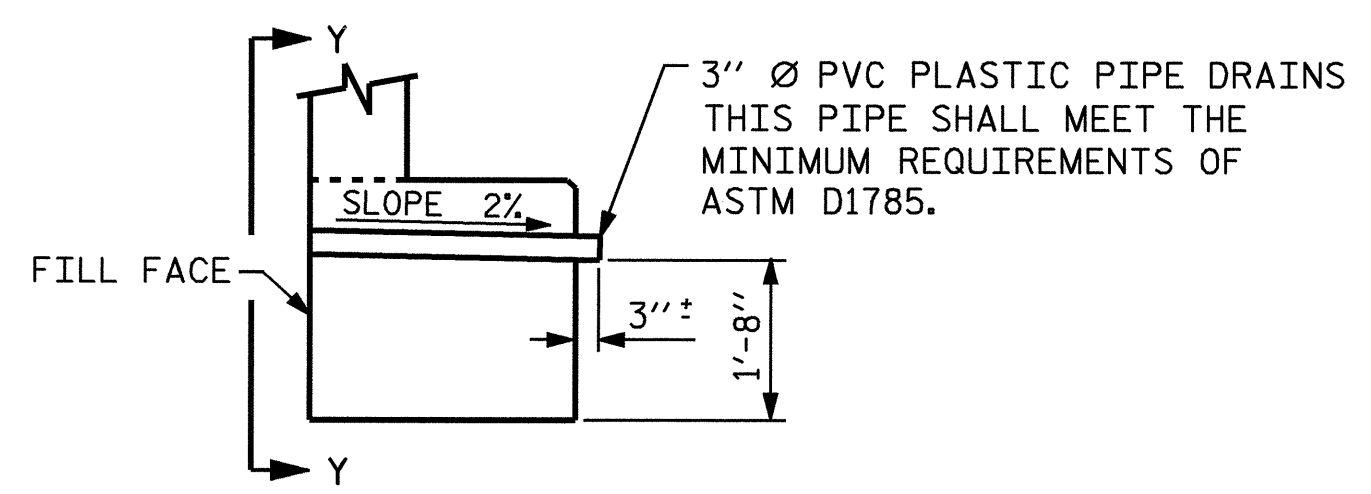


BAGGED STONE AND PIPE SHALL BE PLACED IMMEDIATELY AFTER COMPLETION OF END BENT EXCAVATION. PIPE MAY BE EITHER CONCRETE, CORRUGATED STEEL, CORRUGATED ALUMINUM ALLOY, OR CORRUGATED PLASTIC. PERFORATED PIPE WILL NOT BE ALLOWED.

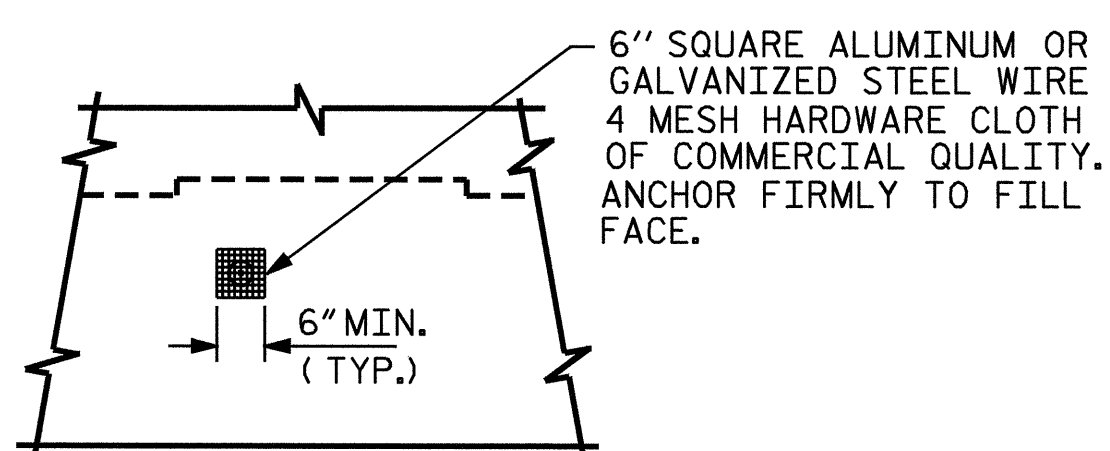
BAGGED STONE SHALL REMAIN IN PLACE UNTIL THE ENGINEER DIRECTS THAT IT BE REMOVED. THE CONTRACTOR SHALL REMOVE AND DISPOSE OF SILT ACCUMULATIONS AT BAGGED STONE WHEN SO DIRECTED BY THE ENGINEER. BAGS SHALL BE REMOVED AND REPLACED WHENEVER THE ENGINEER DETERMINES THAT THEY HAVE DETERIORATED AND LOST THEIR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

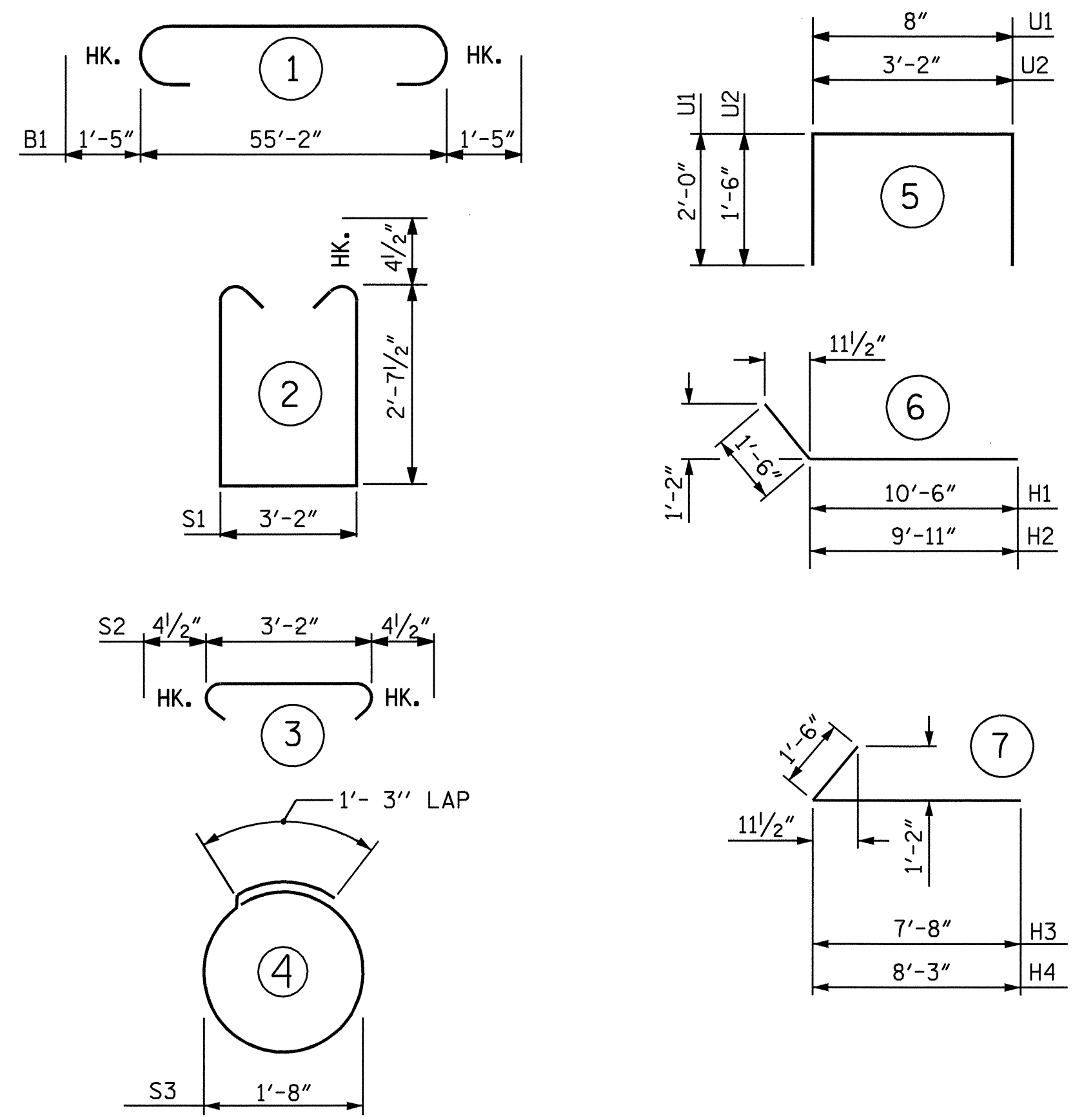


VIEW Y-Y

NOTE: NO SEPARATE PAYMENT WILL BE MADE FOR FURNISHING AND INSTALLING THE PVC PLASTIC PIPE DRAINS, HARDWARE CLOTH AND FASTENERS. THE ENTIRE COST OF THIS WORK SHALL BE INCLUDED IN THE UNIT CONTRACT PRICE BID FOR THE SEVERAL PAY ITEMS.

**PIPE DRAIN DETAILS**

**BAR TYPES**



ALL BAR DIMENSIONS ARE OUT TO OUT.

**BILL OF MATERIAL**

END BENT #2					
BAR	NO.	SIZE	TYPE	LENGTH	WEIGHT
B1	8	#10		58'-0"	1997
B2	4	#5	STR	55'-2"	230
B3	8	#4	STR	28'-10"	154
B4	14	#4	STR	3'-2"	30
B5	4	#4	STR	2'-0"	5
H1	8	#6		12'-0"	144
H2	8	#6		11'-5"	137
H3	8	#6		9'-2"	110
H4	8	#6		9'-9"	117
K1	12	#4	STR	28'-10"	231
K2	8	#4	STR	4'-6"	24
S1	58	#4		9'-2"	355
S2	58	#4		3'-11"	152
S3	16	#4		6'-6"	69
U1	45	#4		4'-8"	140
U2	3	#4		6'-2"	12
V1	90	#5	STR	5'-6"	516
V2	8	#5	STR	6'-7"	55
V3	10	#5	STR	6'-9"	70
V4	34	#5	STR	6'-11"	245

REINFORCING STEEL LBS. 4793

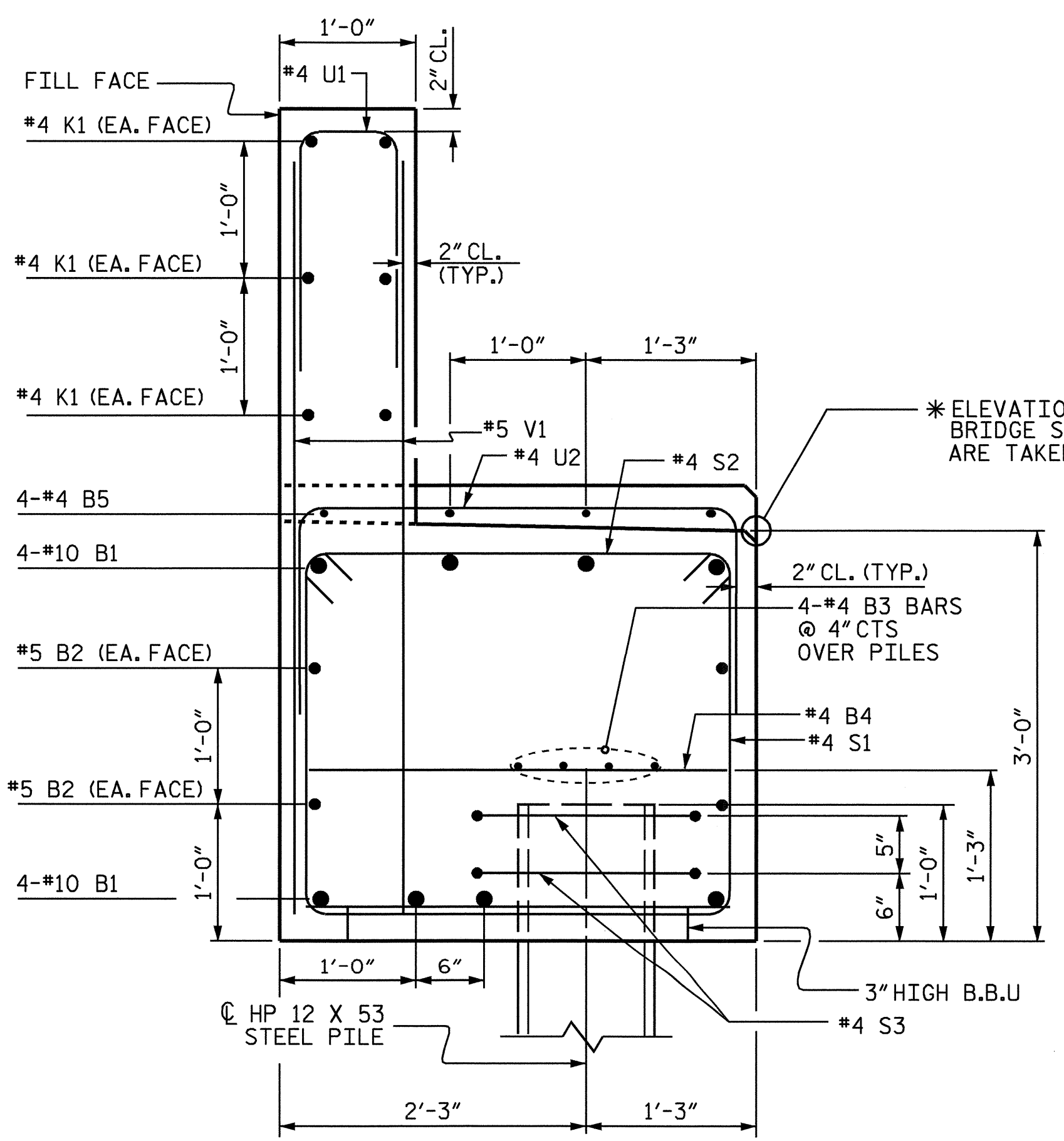
CLASS A CONCRETE  
 POUR 1 (CAP & LOWER WINGS) 23.7 CU. YD.  
 POUR 2 (UPPER WINGS & BACKWALL) 9.1 CU. YD.  
 TOTAL 32.8 CU. YD.

HP 12 X 53 STEEL PILES  
 NUMBER = 8 LIN. FT. = 240

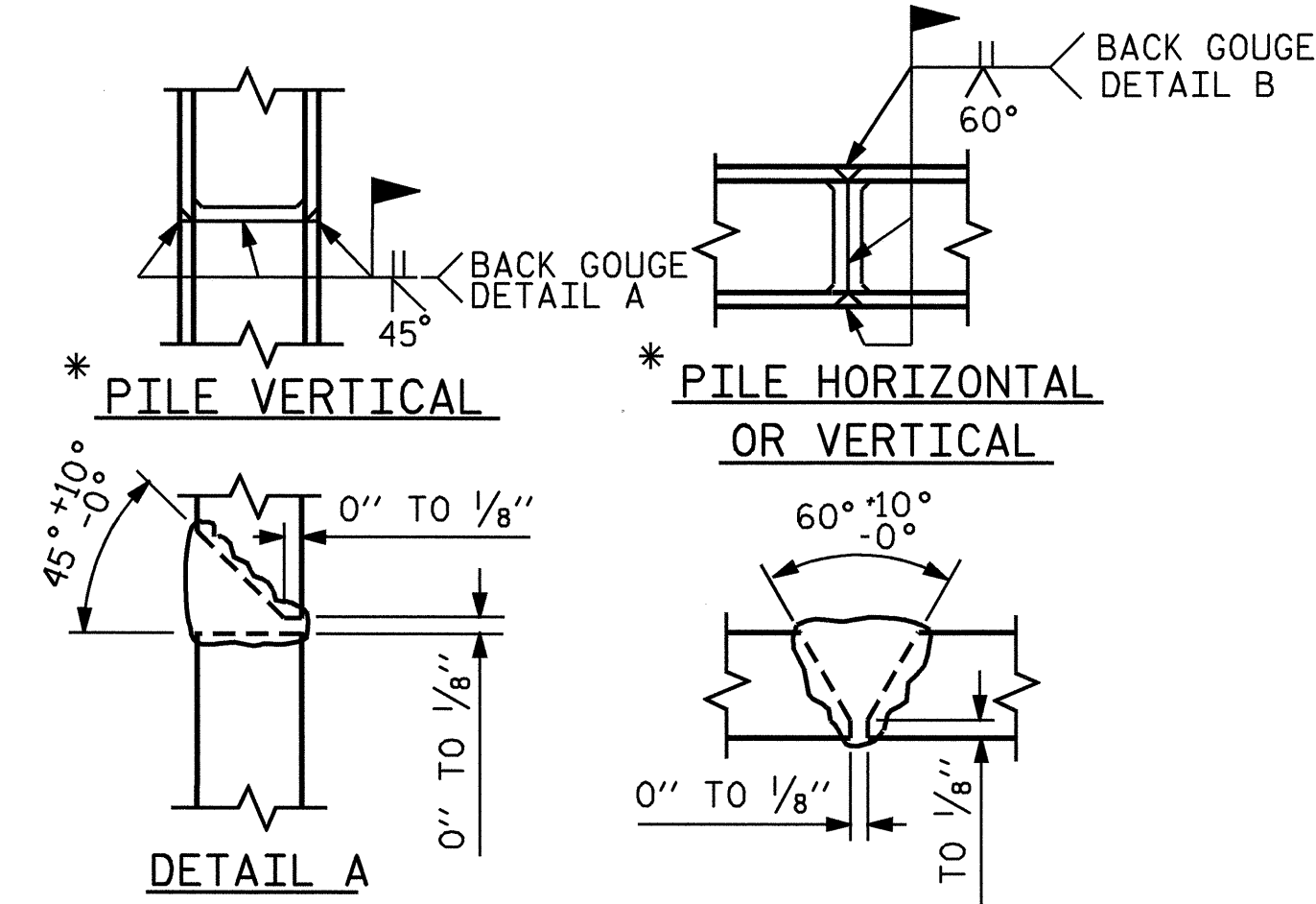
STEEL PILE POINTS EACH 8

PILE EXCAVATION IN SOIL LIN. FT. = 55

PILE EXCAVATION NOT IN SOIL LIN. FT. = 25

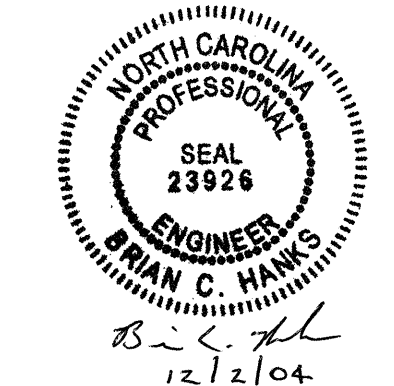


SECTION A-A



POSITION OF PILE DURING WELDING. **PILE SPLICE DETAILS**

DRAWN BY : K. K. PUROHIT DATE : 01/12/04  
 CHECKED BY : A. B. NAIK DATE : 02/05/04



PROJECT NO. B-3659  
HAYWOOD COUNTY  
 STATION: 14+42.00 -L-

SHEET 3 OF 3

STATE OF NORTH CAROLINA  
 DEPARTMENT OF TRANSPORTATION  
 RALEIGH  
 SUBSTRUCTURE  
 END BENT 2

REVISIONS						SHEET NO. S-19
NO.	BY:	DATE:	NO.	BY:	DATE:	
1			3			TOTAL SHEETS 23
2			4			