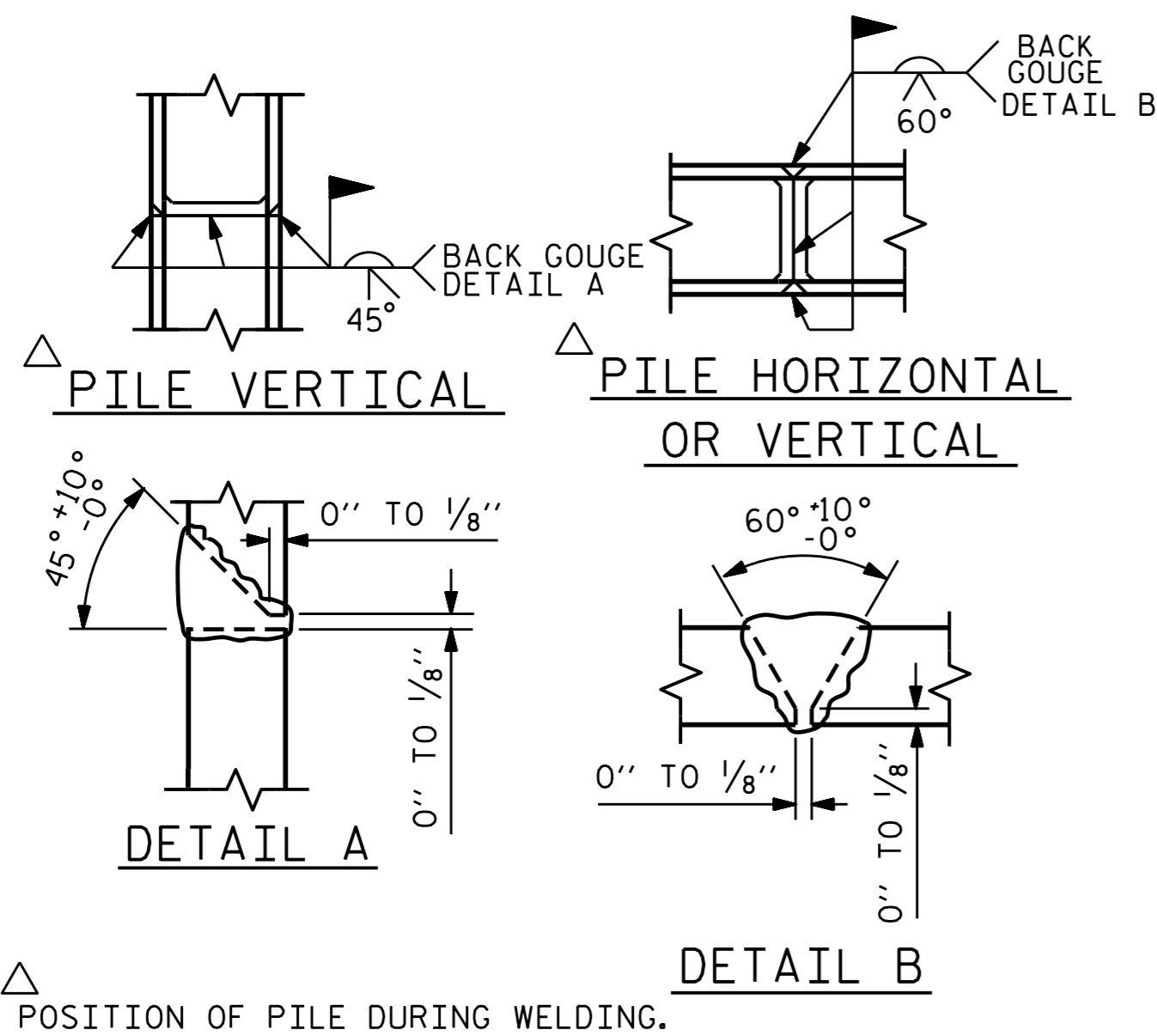


BAGGED STONE AND PIPE SHALL BE PLACED IMMEDIATELY AFTER COMPLETION OF END BENT EXCAVATION. PIPE MAY BE EITHER CONCRETE, CORRUGATED STEEL, CORRUGATED ALUMINUM ALLOY, OR CORRUGATED PLASTIC. PERFORATED PIPE WILL NOT BE ALLOWED.

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

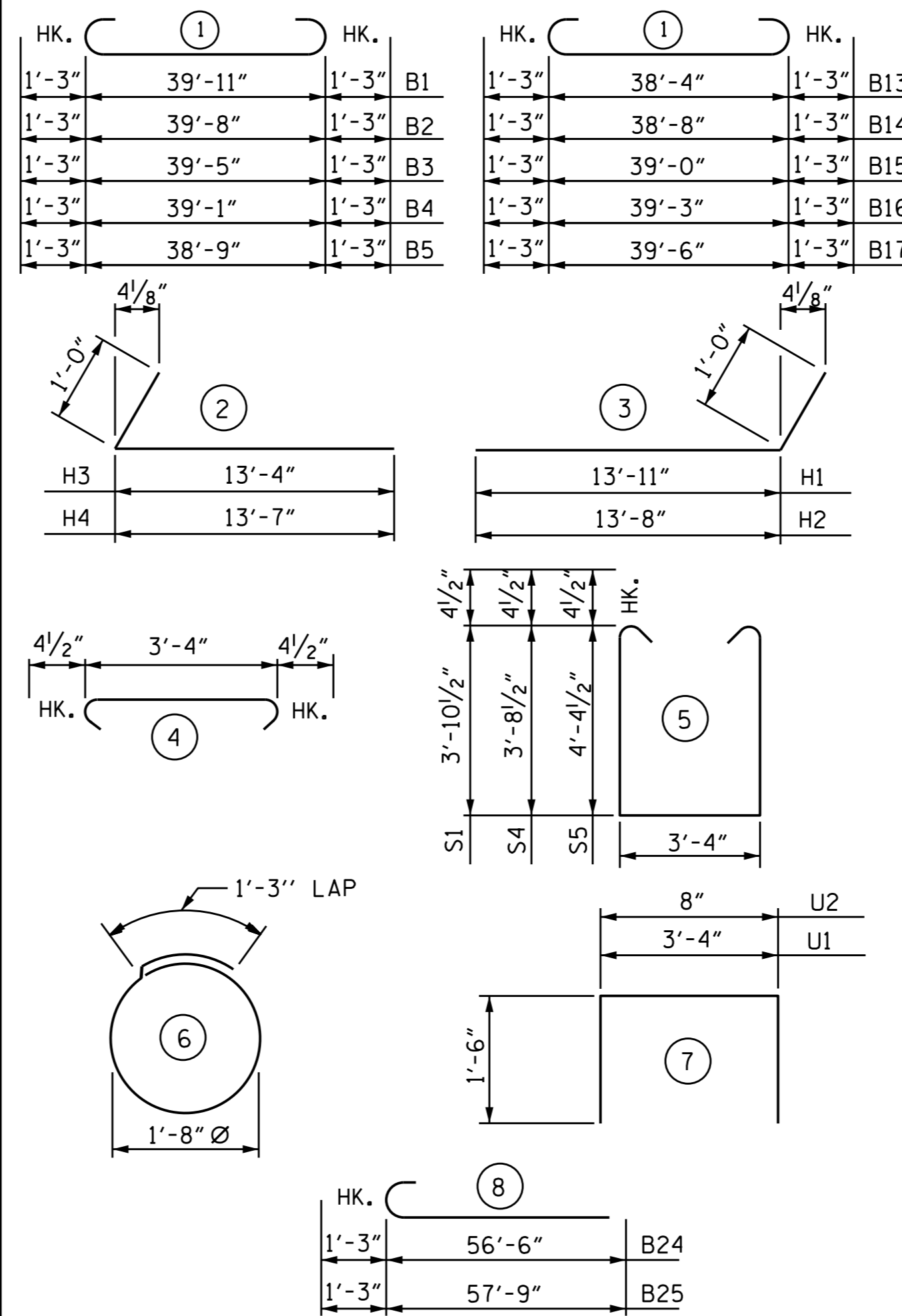


PILE SPLICE DETAILS

DRAWN BY : B.N.BARODAWALA DATE : 4-6-15
 CHECKED BY : DAVID GLADDEN DATE : 4-6-15
 DESIGN ENGINEER OF RECORD: ASHVIN PATEL DATE : 8-6-15

14-OCT-2015 11:50
 R:\Structures\Plans\FINAL PLANS\I-3318BB.SMU.EB2.dgn
 kpaschal

BAR TYPES



ALL BAR DIMENSIONS ARE OUT TO OUT.

TOTAL BILL OF MATERIAL

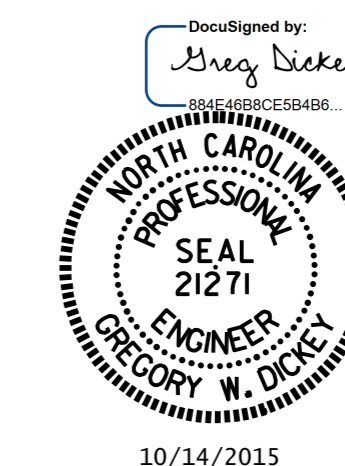
	REINFORCING STEEL LBS.	CLASS 'A' CONCRETE CU. YDS.	HP 12 x 53 STEEL PILES	
			NO.	LIN. FT.
STAGE I (LEFT)	5076	36.3	6	120
STAGE I (RIGHT)	4926	36.1	6	120
STAGE II	10696	94.7	16	370
TOTAL	20698	167.1	28	610

BILL OF MATERIAL

END BENT #2										BILL OF MATERIAL							
STAGE I (LEFT SIDE)					(STAGE I (RIGHT SIDE))					STAGE II							
BAR NO.	SIZE	TYPE	LENGTH	WEIGHT	BAR NO.	SIZE	TYPE	LENGTH	WEIGHT	BAR NO.	SIZE	TYPE	LENGTH	WEIGHT			
B1	2	#9	1	42'-5"	288	B13	2	#9	1	40'-10"	278	B24	10	#9	8	57'-9"	1964
B2	2	#9	1	42'-2"	287	B14	2	#9	1	41'-2"	280	B25	10	#9	8	59'-0"	2006
B3	2	#9	1	41'-11"	285	B15	2	#9	1	41'-6"	282	B26	8	#5	STR	54'-6"	455
B4	2	#9	1	41'-7"	283	B16	2	#9	1	41'-9"	284	B27	12	#5	STR	54'-11"	687
B5	2	#9	1	41'-3"	281	B17	2	#9	1	42'-0"	286	B28	27	#4	STR	3'-4"	60
B6	4	#5	STR	39'-11"	167	B18	4	#5	STR	38'-6"	161	B29	16	#4	STR	28'-6"	305
B7	4	#5	STR	38'-9"	162	B19	4	#5	STR	39'-8"	165	B30	5	#4	STR	11'-2"	37
B8	11	#4	STR	3'-4"	24	B20	11	#4	STR	3'-4"	24	B31	5	#4	STR	14'-5"	48
B9	8	#4	STR	21'-0"	112	B21	8	#4	STR	20'-10"	111	B32	10	#4	STR	9'-8"	65
B10	5	#4	STR	3'-2"	11	B22	10	#4	STR	3'-2"	21	B33	5	#4	STR	13'-2"	44
B11	5	#4	STR	13'-6"	45	B23	5	#4	STR	13'-6"	45	B34	15	#4	STR	3'-2"	32
B12	5	#4	STR	10'-4"	35												
D1	6	#6	STR	3'-0"	27	D2	5	#4	STR	3'-0"	10	K4	40	#4	STR	28'-7"	764
D2	5	#4	STR	3'-0"	10							S2	127	#4	4	4'-1"	346
H1	20	#6	3	14'-11"	448	H3	20	#6	2	14'-4"	431	S3	64	#4	6	6'-6"	278
H2	20	#6	3	14'-8"	441	H4	20	#6	2	14'-7"	438	S5	127	#4	6	12'-10"	1089
K1	20	#4	STR	21'-2"	283	K2	20	#4	STR	20'-8"	276	U1	58	#4	7	6'-4"	245
K2	4	#4	STR	2'-9"	7							U2	107	#4	7	3'-8"	262
S1	57	#4	5	11'-10"	451	S2	57	#4	4	4'-1"	155	V5	214	#5	STR	9'-0"	2009
S2	57	#4	4	4'-1"	155	S3	24	#4	6	6'-6"	104	REINFORCING STEEL LBS. 10696					
S3	24	#4	6	6'-6"	104	U1	16	#4	7	6'-4"	68	CLASS 'A' CONCRETE					
U1	20	#4	7	6'-4"	85	U2	36	#4	7	3'-8"	88	POUR #1 CAP & COLLAR _____ CU. YDS. 76.4					
U2	37	#4	7	3'-8"	91							POUR #2 BACKWALL _____ CU. YDS. 18.3					
V1	74	#5	STR	8'-0"	617	V3	72	#5	STR	8'-1"	607	TOTAL CU. YDS. 94.7					
V2	38	#5	STR	9'-6"	377	V4	34	#5	STR	9'-7"	340	HP 12 x 53 STEEL PILES NO. 16 370 LIN. FT.					
REINFORCING STEEL LBS. 5076					REINFORCING STEEL LBS. 4926												
CLASS 'A' CONCRETE					CLASS 'A' CONCRETE					CLASS 'A' CONCRETE							
POUR #1 CAP, COLLAR & LOWER WINGS _____ CU. YDS. 26.4					POUR #1 CAP, COLLAR & LOWER WINGS _____ CU. YDS. 26.5					POUR #1 CAP, COLLAR & LOWER WINGS _____ CU. YDS. 26.5							
POUR #2 BACKWALL & UPPER WINGS _____ CU. YDS. 9.9					POUR #2 BACKWALL & UPPER WINGS _____ CU. YDS. 9.6					POUR #2 BACKWALL & UPPER WINGS _____ CU. YDS. 9.6							
TOTAL CU. YDS. 36.3					TOTAL CU. YDS. 36.1					TOTAL CU. YDS. 36.1							
HP 12 x 53 STEEL PILES NO. 6 120 LIN. FT.					HP 12 x 53 STEEL PILES NO. 6 120 LIN. FT.					HP 12 x 53 STEEL PILES NO. 6 120 LIN. FT.							

PROJECT NO. I-3318BB
 JOHNSTON COUNTY
 STATION: 24+68.00 -L-

SHEET 6 OF 6



STATE OF NORTH CAROLINA
 DEPARTMENT OF TRANSPORTATION
 RALEIGH

SUBSTRUCTURE
 END BENT #2
 STAGE I & II

REVISIONS						SHEET NO.	
NO.	BY:	DATE:	NO.	BY:	DATE:	S-66	
1			3			TOTAL SHEETS 78	
2			4				