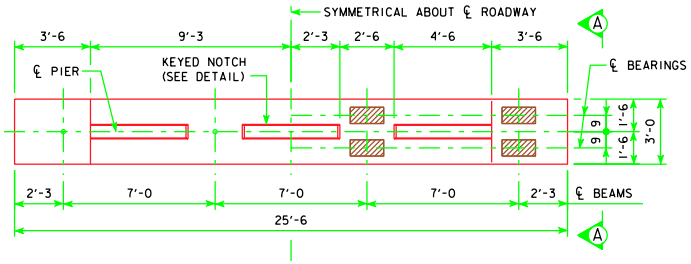
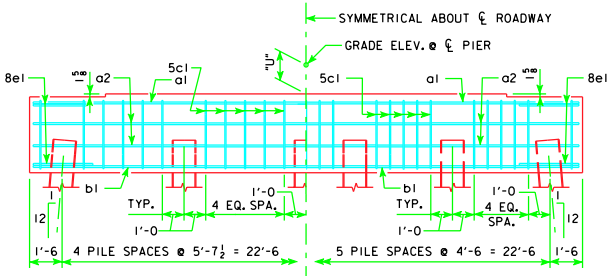


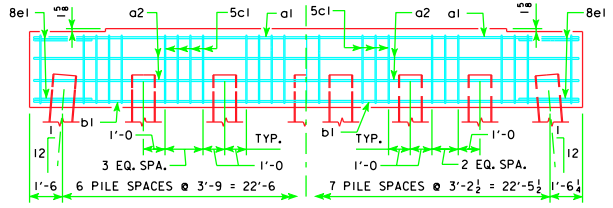
TYPICAL PLAN

NOTE:
SEE SHEET H24-09-06 FOR "U" DIMENSION.



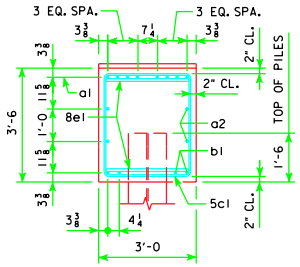
5 PILE BENT

6 PILE BENT

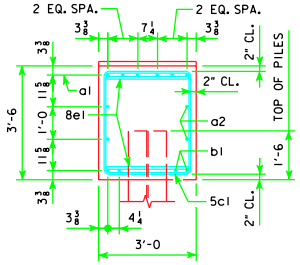


7 PILE BENT

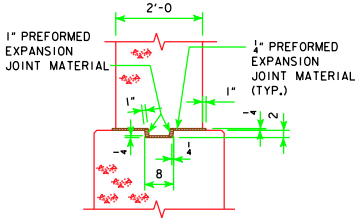
8 PILE BENT



VIEW A-A
FOR 5 & 6 PILE BENTS



VIEW A-A
FOR 7 & 8 PILE BENTS



KEYED NOTCH DETAIL

PILE BENT NOTES:

THESE PIER BENTS ARE DESIGNED FOR USE IN LOCATIONS WHERE ICE AND DRIFT CONDITIONS ARE NOT SEVERE.

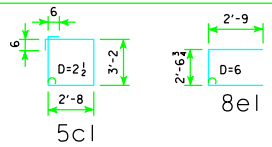
FOR DETAILS OF TRESTLE PILES, SEE STANDARD PIOL.

MINIMUM CLEAR DISTANCE FROM FACE OF CONCRETE TO NEAR REINFORCING BAR SHALL BE 2 INCHES UNLESS OTHERWISE NOTED OR SHOWN.

REINFORCING BAR LIST AND ESTIMATED QUANTITIES - PER PILE BENT

			5 PILE BENT			6 PILE BENT			7 PILE BENT			8 PILE BENT		
BAR	LENGTH	SHAPE	NO.	SIZE	WEIGHT	NO.	SIZE	WEIGHT	NO.	SIZE	WEIGHT	NO.	SIZE	WEIGHT
a1	25'-2		8	9	685	8	9	685	6	9	513	6	9	513
a2	25'-2		4	8	269	4	8	269	4	8	269	4	8	269
b1	25'-2		4	8	269	4	8	269	4	8	269	4	8	269
5c1	12'-8		22	5	291	27	5	357	26	5	343	23	5	304
8e1	8'-1		4	8	86	4	8	86	4	8	86	4	8	86
REINFORCING STEEL (LB.)			1600			1666			1480			1441		
STRUCTURAL CONCRETE (CY)		PILE TYPE 3	10.2			10.2			10.2			10.2		

BENT BAR DETAILS



NOTE: ALL DIMENSIONS ARE OUT TO OUT. D=PIN DIAMETER.

FRICTION OR POINT BEARING PILING

℄-℄ ABUTMENT BEARING	PIOL TYPE 3			
	NUMBER OF TRESTLE PILES	PILE SIZE	① DES. PILE BRG. (TONS)	② LRFD DES. BRG. (KIPS)
138'-10	5	HP14x73	59	170
	5	HP14x89	59	170
151'-4	5	HP14x73	62	179
	5	HP14x89	62	179
163'-10	6	HP14x73	55	161
	5	HP14x89	66	193
176'-4	6	HP14x73	58	168
	5	HP14x89	69	201
188'-10	6	HP14x73	60	175
	5	HP14x89	72	210
201'-4	7	HP14x73	57	166
	6	HP14x89	67	194
213'-10	7	HP14x73	60	174
	6	HP14x89	70	203
226'-4	7	HP14x73	63	184
	6	HP14x89	74	214
243'-0	8	HP14x73	58	169
	6	HP14x89	78	226

① FOR DETERMINING ACTUAL PILE LENGTHS IN FIELD.

② FOR ESTIMATING PILE LENGTHS USING AASHTO LRFD SPECIFICATIONS.

NOTE: FRICTION BEARING INCLUDES SIDE FRICTION AND END BEARING IN SOIL. POINT BEARING INCLUDES SIDE FRICTION AND POINT BEARING IN ROCK.

01-10
LATEST REVISION DATE

APPROVED BY BRIDGE ENGINEER

Iowa Department of Transportation
Highway Division

STANDARD DESIGN - 24' ROADWAY, THREE SPAN BRIDGE
PRETENSIONED PRESTRESSED CONCRETE BEAM BRIDGES
DECEMBER, 2006

PILE BENT PIERS
HP14 PILES
0° SKEW

H24-43-06

REVISED 01-10 - SHEET WAS REVISED TO MEET LRFD SPECIFICATIONS.