

REVISED 07-09 - OPEN RAIL REIN. QTY'S CHANGED WHICH CHANGED TOTAL REIN. QTY'S.  
REVISED 08-2022: UPDATED BRIDGE ENGINEER SIGNATURE. CHANGED PAVING BLOCK LIFTING HOOP BAR MARK, WAS SK1.

### BILL OF REINFORCING STEEL FOR SUPERSTRUCTURE - 120' BRIDGE

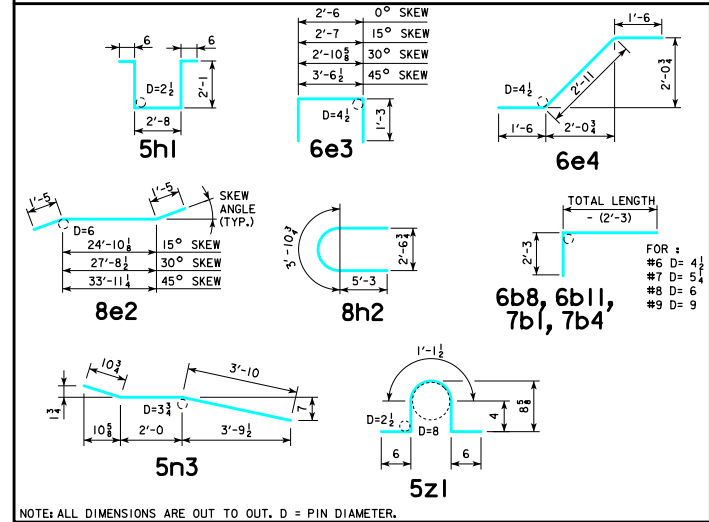
LOCATION	SKEW	SHAPE	0°				15°				30°				45°			
			BAR	NO.	LENGTH	WEIGHT	BAR	NO.	LENGTH	WEIGHT	BAR	NO.	LENGTH	WEIGHT	BAR	NO.	LENGTH	WEIGHT
SLAB LONGITUDINAL BOTTOM		9a1	31	25'-9"	2715	31	25'-9"	2715	31	25'-9"	2715	31	25'-9"	2715				
SLAB LONGITUDINAL BOTTOM		9a2	31	38'-9"	4085	31	38'-9"	4085	31	38'-9"	4085	31	38'-9"	4085				
SLAB LONGITUDINAL BOTTOM		9a3	31	36'-2"	3812	31	36'-2"	3812	31	36'-2"	3812	31	36'-2"	3812				
SLAB LONGITUDINAL BOTTOM		8a4	32	28'-3"	2414	32	28'-3"	2414	32	28'-3"	2414	32	28'-3"	2414				
SLAB LONGITUDINAL BOTTOM		9a5	16	34'-0"	1850	16	34'-0"	1850	16	34'-0"	1850	16	34'-0"	1850				
SLAB LONGITUDINAL BOTTOM, AT RAIL		9a6	8	34'-4"	934	8	34'-4"	934	8	34'-4"	934	8	34'-4"	934				
SLAB LONGITUDINAL BOTTOM, AT RAIL		9a7	8	12'-0"	327	8	12'-0"	327	8	12'-0"	327	8	12'-0"	327				
SLAB LONGITUDINAL BOTTOM, AT RAIL		9a8	4	42'-2"	574	4	42'-2"	574	4	42'-2"	574	4	42'-2"	574				
SLAB LONGITUDINAL BOTTOM, AT RAIL		8a9	8	24'-6"	524	8	24'-6"	524	8	24'-6"	524	8	24'-6"	524				
SLAB LONGITUDINAL BOTTOM, AT RAIL		8a10	4	23'-6"	251	4	23'-6"	251	4	23'-6"	251	4	23'-6"	251				
SLAB LONGITUDINAL TOP		7b1	31	8'-6"	539	31	8'-6"	539	31	8'-6"	539	31	8'-6"	539				
SLAB LONGITUDINAL TOP		10b2	31	27'-6"	3669	31	27'-6"	3669	31	27'-6"	3669	31	27'-6"	3669				
SLAB LONGITUDINAL TOP		10b3	31	24'-9"	3302	31	24'-9"	3302	31	24'-9"	3302	31	24'-9"	3302				
SLAB LONGITUDINAL TOP		7b4	31	23'-5"	1484	31	23'-5"	1484	31	23'-5"	1484	31	23'-5"	1484				
SLAB LONGITUDINAL TOP		11b5	32	27'-9"	4718	32	27'-9"	4718	32	27'-9"	4718	32	27'-9"	4718				
SLAB LONGITUDINAL TOP		6b6	16	30'-0"	721	16	30'-0"	721	16	30'-0"	721	16	30'-0"	721				
SLAB LONGITUDINAL TOP, AT RAIL		6b8	8	29'-5"	354	8	29'-5"	354	8	29'-5"	354	8	29'-5"	354				
SLAB LONGITUDINAL TOP, AT RAIL		10b9	8	27'-0"	930	8	27'-0"	930	8	27'-0"	930	8	27'-0"	930				
SLAB LONGITUDINAL TOP, AT RAIL		6b10	4	23'-10"	144	4	23'-10"	144	4	23'-10"	144	4	23'-10"	144				
SLAB LONGITUDINAL TOP, AT RAIL		6b11	8	31'-11"	384	8	31'-11"	384	8	31'-11"	384	8	31'-11"	384				
SLAB LONGITUDINAL TOP, AT RAIL		11b12	8	21'-0"	893	8	21'-0"	893	8	21'-0"	893	8	21'-0"	893				
SLAB TRANSVERSE, BOTTOM		6c1	117	26'-10"	4716	117	27'-9"	4877	106	26'-10"	4273	96	26'-10"	3870				
SLAB TRANSVERSE ENDS, BOTTOM		6c2	-	-	-	-	-	-	24	VARIES	579	44	VARIES	970				
SLAB TRANSVERSE, TOP		5d1	117	26'-10"	3275	117	27'-9"	3387	106	26'-10"	2967	96	26'-10"	2687				
SLAB TRANSVERSE ENDS, TOP		5d2	-	-	-	-	-	-	24	VARIES	402	44	VARIES	674				
SLAB, TRANSVERSE AT ABUTMENT		8e1	18	26'-10"	1290	-	-	-	-	-	-	-	-					
SLAB, TRANSVERSE AT ABUTMENT		8e2	-	-	-	18	27'-8"	1330	18	30'-7"	1470	18	36'-9"	1767				
SLAB, HAIRPINS, AT ABUTMENT		6e3	60	5'-0"	451	60	5'-1"	459	60	5'-5"	489	60	6'-1"	549				
SLAB, DIAGONALS, AT ABUTMENT		6e4	60	5'-11"	534	60	5'-11"	534	60	5'-11"	534	60	5'-11"	534				
PIER CAP HOOPS		5h1	32	7'-10"	262	32	7'-10"	262	48	7'-10"	393	48	7'-10"	393				
PIER CAP ENDS		8h2	4	14'-5"	154	4	14'-5"	154	4	14'-5"	154	4	14'-5"	154				
PIER CAP, BOTTOM LONGITUDINAL		8h3	8	23'-10"	510	8	24'-8"	527	8	27'-6"	588	8	33'-8"	720				
PIER CAP, TOP LONGITUDINAL		8h4	4	26'-10"	287	4	27'-9"	297	4	30'-11"	331	4	37'-11"	405				
TOP OF SLAB, TRANSVERSE, AT RAIL		5j1	232	8'-6"	2057	232	8'-6"	2057	232	8'-6"	2057	230	8'-6"	2040				
WING, VERTICAL		5m1	40	4'-5"	185	40	4'-5"	185	40	4'-5"	185	40	4'-5"	185				
WING, HORIZONTAL BACK FACE		5n1	24	6'-8"	167	24	6'-8"	167	24	6'-8"	167	24	6'-8"	167				
WING, HORIZONTAL TRAFFIC FACE		5n3	24	6'-9"	169	24	6'-9"	169	24	6'-9"	169	24	6'-9"	169				
PAVING BLOCK LIFTING HOOPS		5z1	8	2'-10"	24	8	2'-10"	24	8	2'-10"	24	8	2'-10"	24				
SUB TOTAL - LBS.					48,705			49,053			49,406			49,932				
OPEN RAIL - SEE LIST ON RAIL SHEET J24-41-06					8061			8061			8061			8061				
TOTAL - LBS. WITH MONOLITHIC PIER CAP AND OPEN RAIL					56,766			57,114			57,467			57,993				
TOTAL - LBS. WITH NON-MONOLITHIC PIER CAP AND OPEN RAIL					55,553			55,874			56,001			56,321				
SAME AS ABOVE EXCEPT ALL "h" BARS DELETED																		

### ESTIMATED QUANTITIES FOR SUPERSTRUCTURE - 120' BRIDGE

ITEM	SKEW	WITH MONOLITHIC PIER CAP				WITH NON-MONOLITHIC PIER CAP			
		0°	15°	30°	45°	0°	15°	30°	45°
OPEN RAIL	C.Y.	222.5	223.1	225.3	229.9	218.3	218.7	220.5	224.1
REINFORCING STEEL	LBS.	56,766	57,114	57,467	57,993	55,553	55,874	56,001	56,321
OPEN RAIL	LIN. FT.	262.0	262.2	262.9	264.5	262.0	262.2	262.9	264.5

\* INCLUDES 4 WINGS @ 0.68 C.Y. EACH AND 2 TEMPORARY PAVING BLOCKS; EXCLUDES RAIL CONCRETE.

### BENT BAR DETAILS



08-2022 LATEST REVISION DATE   APPROVED BY BRIDGE ENGINEER	 STANDARD DESIGN - 24'-0" ROADWAY, 3 SPAN BRIDGES <b>CONTINUOUS CONCRETE SLAB BRIDGES</b> NOVEMBER, 2006	
	<b>SUPERSTRUCTURE DETAILS 120'-0" BRIDGE</b>	<b>J24-13-06</b>