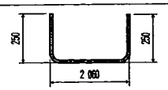
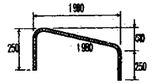
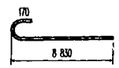
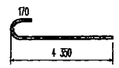
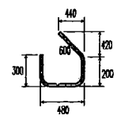
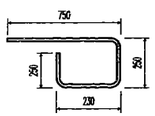
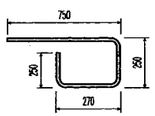
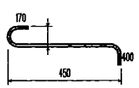
BILL OF REINFORCING STEEL FOR TWO ABUTMENTS — 693-02

MARK	TYPE	PIN DIAMETER	LENGTH	No.	MASS	BENDING DIAGRAM
15 01	BENT	90	2 560	48	192.92	
15 02	BENT	90	2 480	8	31.15	
15 03	STR		2 580	152	615.69	
15 04	BENT	90	9 000	10	141.30	
15 05	BENT	90	4 520	10	70.96	
15 06	BENT	90	1 580	76	198.53	
15 07	BENT	65	1 480	30	69.71	
15 08	BENT	65	1 520	46	109.77	
15 09	BENT	90	1 020	24	38.43	
15 10	STR		2 790	28	122.65	
15 11	STR		1 140	24	42.96	

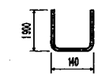
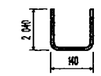
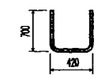
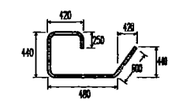
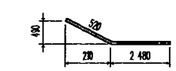
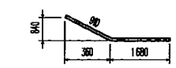
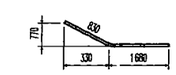
BILL OF REINFORCING STEEL FOR TWO ABUTMENTS — 693-02

MARK	TYPE	PIN DIAMETER	LENGTH	No.	MASS	BENDING DIAGRAM
15 12-1	BENT	90	2 240	2	7.03	
15 12-2	BENT	90	2 500	2	7.85	
15 12-3	BENT	90	2 760	2	8.67	
15 12-4	BENT	90	3 020	2	9.48	
15 12-5	BENT	90	3 280	2	10.30	
15 12-6	BENT	90	3 540	2	11.12	
15 12-7	BENT	90	3 800	2	11.93	
15 12-8	BENT	90	4 040	2	12.69	

BILL OF REINFORCING STEEL FOR TWO ABUTMENTS — 693-02

MARK	TYPE	PIN DIAMETER	LENGTH	No.	MASS	BENDING DIAGRAM
15 12-9	BENT	90	4 300	2	13.50	
15 13-1	BENT	90	2 120	2	6.66	
15 13-2	BENT	90	2 380	2	7.47	
15 13-3	BENT	90	2 640	2	8.29	
15 13-4	BENT	90	2 900	2	9.11	
15 13-5	BENT	90	3 160	2	9.92	
15 13-6	BENT	90	3 420	2	10.74	
15 13-7	BENT	90	3 680	2	11.56	

BILL OF REINFORCING STEEL FOR TWO ABUTMENTS — 693-02

MARK	TYPE	PIN DIAMETER	LENGTH	No.	MASS	BENDING DIAGRAM
15 13-8	BENT	90	3 940	2	12.37	
15 13-9	BENT	90	4 220	2	13.25	
15 14	STR		2 090	8	26.25	
15 15-1	STR		2 460	2	7.72	
15 15-2	STR		3 160	2	9.92	
15 16-1	STR		2 650	2	8.32	
15 16-2	STR		3 340	2	10.49	
15 17	STR		3 890	4	24.43	
15 18	BENT	90	1 820	12	34.29	
15 19	STR		3 760	8	47.21	
15 20	BENT	90	2 190	82	281.94	
15 21	BENT	90	3 000	8	37.68	
15 22	BENT	90	2 590	4	16.27	
15 23-1	STR		2 420	2	7.60	
15 23-2	STR		3 120	2	9.80	
15 24-1	STR		2 610	2	8.20	
15 24-2	STR		3 300	2	10.36	
15 25	STR		3 850	4	24.18	
15 26	STR		3 690	8	46.35	
15 27	BENT	90	2 510	4	15.76	

REVISIONS		
OCT 31/07	R.A	AS BUILT
DATE	BY	DESCRIPTION

ABUTMENT REINFORCING DETAILS

FOR PROPOSED 69 714 LONG R.C. BRIDGE
OVER SEINE RIVER DIVERSION
ON P.T.H. No. 59 SOUTH BOUND LANES, 10 900 ROADWAY
IN SEC. 28-8-4E

R.M. OF RITCHOT

PROVINCE OF MANITOBA — A. H. PANKRATZ — Oct 12, 2005 — REGISTERED PROFESSIONAL ENGINEER

Manitoba Transportation and Government Services
Bridges and Structures Branch

DESIGN	BY: A.H.P.	
	CHECKED: J.R.J.	
DETAILS	BY: D.P.W.	
	CHECKED: A.H.P.	

RELEASED FOR CONSTRUCTION BY:
Oct. 12/05
DIRECTOR OF BRIDGES AND STRUCTURES — DATE

SCALE: Not To Scale
SHEET No. 17
SITE No. 693-02

0592302\0693\02\abutment.dgn 10/11/2005 9:03:00 AM