PART A - BRIDGE WORK

CITY OF WPG. DWG. NUMBER	W.E.I. DWG. NUMBER	DWG. DESCRIPTION
B109-11-006	0900070502-DWG-S0001	COVER SHEET
B109-11-007	0900070502-DWG-S0002	DESIGN DATA AND DRAWING LIST
B109-11-008	0900070502-DWG-S0003	SITE PLAN - GENERAL LAYOUT
B109-11-009	0900070502-DWG-S0004	GENERAL ARRANGEMENT - PLAN AND ELEVATION
B109-11-010	0900070502-DWG-S0005	DECK PROFILE 1
B109-11-011	0900070502-DWG-S0006	DECK PROFILE 2
B109-11-012	0900070502-DWG-S0007	DECK PROFILE 3
B109-11-013	0900070502-DWG-S0008	GENERAL ARRANGEMENT - CROSS SECTIONS
B109-11-014	0900070502-DWG-S0009	BRIDGE - SCOPE OF WORK
B109-11-015	0900070502-DWG-S0010	CONSTRUCTION STAGING - PHASE 1 REMOVAL AND PHASE 1 & 1A CONSTRUCTION 2011
B109-11-016	0900070502-DWG-S0011	CONSTRUCTION STAGING - BETWEEN PHASE 1 AND 2 AND PHASE 2 REMOVAL 2012
B109-11-017	0900070502-DWG-S0012	CONSTRUCTION STAGING - PHASE 2 & PHASE 2A CONSTRUCTION 2012
B109-11-018	0900070502-DWG-S0013	OVERALL LAYOUT AND BEARING DATA
B109-11-019	0900070502-DWG-S0014	NORTH AND SOUTH ABUTMENTS BEARING DETAILS
B109-11-020	0900070502-DWG-S0015	PIER 1 AND PIER 3 - BEARING DETAILS
B109-11-021	0900070502-DWG-S0016	PIER 2 - BEARING DETAILS
B109-11-022	0900070502-DWG-S0017	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1 REMOVAL
B109-11-023	0900070502-DWG-S0018	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1 REMOVAL
B109-11-024	0900070502-DWG-S0019	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1 CONSTRUCTION
B109-11-025	0900070502-DWG-S0020	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1 CONSTRUCTION
B109-11-026	0900070502-DWG-S0021	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1 CONSTRUCTION
B109-11-027	0900070502-DWG-S0022	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1 REINFORCING
B109-11-028	0900070502-DWG-S0023	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1 REINFORCING
B109-11-029	0900070502-DWG-S0024	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1 REINFORCING
B109-11-030	0900070502-DWG-S0025	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1A REMOVAL
B109-11-031	0900070502-DWG-S0026	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1A CONSTRUCTION
B109-11-032	0900070502-DWG-S0027	NORTH ABUTMENT AND APPROACH SLAB - PHASE 1A REINFORCING
B109-11-033	0900070502-DWG-S0028	NORTH ABUTMENT AND APPROACH SLAB - PHASE 2 REMOVAL
B109-11-034	0900070502-DWG-S0029	NORTH ABUTMENT AND APPROACH SLAB - PHASE 2 REMOVAL
B109-11-035	0900070502-DWG-S0030	NORTH ABUTMENT AND APPROACH SLAB - PHASE 2 CONSTRUCTION
B109-11-036	0900070502-DWG-S0031	NORTH ABUTMENT AND APPROACH SLAB - PHASE 2 CONSTRUCTION
B109-11-037	0900070502-DWG-S0032	NORTH ABUTMENT AND APPROACH SLAB - PHASE 2 REINFORCING
B109-11-038	0900070502-DWG-S0033	NORTH ABUTMENT AND APPROACH SLAB - PHASE 2 REINFORCING
B109-11-039	0900070502-DWG-S0034	NORTH ABUTMENT AND APPROACH SLAB - PHASE 2 REINFORCING
B109-11-040	0900070502-DWG-S0035	NORTH ABUTMENT AND APPROACH SLAB - PHASE 2A CONSTRUCTION
B109-11-041	0900070502-DWG-S0036	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1 REMOVAL
B109-11-042	0900070502-DWG-S0037	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1 REMOVAL
B109-11-043	0900070502-DWG-S0038	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1 CONSTRUCTION
B109-11-044	0900070502-DWG-S0039	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1 CONSTRUCTION
B109-11-045	0900070502-DWG-S0040	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1 CONSTRUCTION
B109-11-046	0900070502-DWG-S0041	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1 REINFORCING
B109-11-047	0900070502-DWG-S0042	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1 REINFORCING
B109-11-048	0900070502-DWG-S0043	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1 REINFORCING
B109-11-049	0900070502-DWG-S0044	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1A REMOVAL
B109-11-050	0900070502-DWG-S0045	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1A CONSTRUCTION
B109-11-051	0900070502-DWG-S0046	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 1A REINFORCING
B109-11-052	0900070502-DWG-S0047	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 2 REMOVAL
B109-11-053	0900070502-DWG-S0048	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 2 REMOVAL
B109-11-054	0900070502-DWG-S0049	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 2 CONSTRUCTION
B109-11-055	0900070502-DWG-S0050	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 2 CONSTRUCTION
B109-11-056	0900070502-DWG-S0051	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 2 CONSTRUCTION
B109-11-057	0900070502-DWG-S0052	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 2 REINFORCING
B109-11-058	0900070502-DWG-S0053	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 2 REINFORCING
B109-11-059	0900070502-DWG-S0054	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 2 REINFORCING
B109-11-060	0900070502-DWG-S0055	SOUTH ABUTMENT AND APPROACH SLAB - PHASE 2A CONSTRUCTION
B109-11-061	0900070502-DWG-S0056	BRIDGE DECK - PHASE 1 REMOVAL
B109-11-062	0900070502-DWG-S0057	BRIDGE DECK - PHASE 1 REMOVAL
B109-11-063	0900070502-DWG-S0058	POST TENSIONING TENDONS - INSPECTION AND REPAIRS
B109-11-064	0900070502-DWG-S0059	POST TENSIONING TENDONS - INSPECTION AND REPAIRS

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PART A - BRIDGE WORK (CONT'D)

CITY OF WPG. DWG. NUMBER	W.E.I. DWG. NUMBER	DWG. DESCRIPTION
B109-11-065	0900070502-DWG-S0060	BRIDGE DECK - PHASE 1 CONSTRUCTION
B109-11-066	0900070502-DWG-S0061	BRIDGE DECK - PHASE 1 CONSTRUCTION
B109-11-067	0900070502-DWG-S0062	BRIDGE DECK - PHASE 1 CONSTRUCTION
B109-11-068	0900070502-DWG-S0063	DECK DRAIN DETAILS
B109-11-069	0900070502-DWG-S0064	BRIDGE DECK - PHASE 1 CONSTRUCTION
B109-11-070	0900070502-DWG-S0065	BRIDGE DECK - PHASE 1 REINFORCING
B109-11-071	0900070502-DWG-S0066	BRIDGE DECK - PHASE 1 REINFORCING
B109-11-072	0900070502-DWG-S0067	BRIDGE DECK - PHASE 1 REINFORCING
B109-11-073	0900070502-DWG-S0068	BRIDGE DECK - PHASE 2 REMOVAL
B109-11-074	0900070502-DWG-S0069	BRIDGE DECK - PHASE 2 REMOVAL
B109-11-075	0900070502-DWG-S0070	PIER CAP & INTERMEDIATE DIAPHRAGM - CONCRETE INFILL PLAN
B109-11-076	0900070502-DWG-S0071	PIER CAP & INTERMEDIATE DIAPHRAGM - CONCRETE INFILL DETAILS
B109-11-077	0900070502-DWG-S0072	PIER CAP & INTERMEDIATE DIAPHRAGM - REINFORCING
B109-11-078	0900070502-DWG-S0073	PIER CAP & INTERMEDIATE DIAPHRAGM - REINFORCING
B109-11-079	0900070502-DWG-S0074	BRIDGE DECK - PHASE 2 CONSTRUCTION
B109-11-080	0900070502-DWG-S0075	BRIDGE DECK - PHASE 2 CONSTRUCTION
B109-11-081	0900070502-DWG-S0076	BRIDGE DECK - PHASE 2 CONSTRUCTION
B109-11-082	0900070502-DWG-S0077	BRIDGE DECK - PHASE 2A CONSTRUCTION
B109-11-083	0900070502-DWG-S0078	BRIDGE DECK - PHASE 2 REINFORCING
B109-11-084	0900070502-DWG-S0079	BRIDGE DECK - PHASE 2 REINFORCING
B109-11-085	0900070502-DWG-S0080	BRIDGE DECK - PHASE 2 REINFORCING
B109-11-086	0900070502-DWG-S0081	CONCRETE BARRIER LAYOUT
B109-11-087	0900070502-DWG-S0082	CONCRETE BARRIER - SECTIONS AND DETAILS
B109-11-088	0900070502-DWG-S0083	CONCRETE BARRIER - REINFORCING DETAILS
B109-11-089	0900070502-DWG-S0084	ALUMINUM PEDESTRIAN HANDRAIL LAYOUT
B109-11-090	0900070502-DWG-S0085	ALUMINUM PEDESTRIAN HANDRAIL ELEVATIONS, SECTIONS AND DETAILS
B109-11-091	0900070502-DWG-S0086	ALUMINUM PEDESTRIAN HANDRAIL SECTIONS AND DETAILS
B109-11-092	0900070502-DWG-S0087	ALUMINUM PEDESTRIAN HANDRAIL EXPANSION PANEL DETAILS
B109-11-093	0900070502-DWG-S0088	ALUMINUM PEDESTRIAN HANDRAIL - ART LAYOUT
B109-11-094	0900070502-DWG-S0089	ALUMINUM PEDESTRIAN HANDRAIL - ART DETAILS
B109-11-095	0900070502-DWG-S0090	ALUMINUM PEDESTRIAN HANDRAIL - ART LAYOUT
B109-11-096	0900070502-DWG-S0091	ALUMINUM PEDESTRIAN HANDRAIL - ART DETAILS
B109-11-097	0900070502-DWG-S0092	EXPANSION JOINT LAYOUT AND SECTIONS
B109-11-098	0900070502-DWG-S0093	NORTH EXPANSION JOINT - PHASE 1 CONSTRUCTION
B109-11-099	0900070502-DWG-S0094	NORTH EXPANSION JOINT - PHASE 1A CONSTRUCTION
B109-11-100	0900070502-DWG-S0095	NORTH EXPANSION JOINT - PHASE 2 CONSTRUCTION
B109-11-101	0900070502-DWG-S0096	NORTH EXPANSION JOINT
B109-11-102	0900070502-DWG-S0097	NORTH EXPANSION JOINT
B109-11-103	0900070502-DWG-S0098	SOUTH EXPANSION JOINT - PHASE 1 CONSTRUCTION
B109-11-104	0900070502-DWG-S0099	SOUTH EXPANSION JOINT - PHASE 1A CONSTRUCTION
B109-11-105	0900070502-DWG-S0100	SOUTH EXPANSION JOINT - PHASE 2 CONSTRUCTION
B109-11-106	0900070502-DWG-S0101	SOUTH EXPANSION JOINT
B109-11-107	0900070502-DWG-S0102	SOUTH EXPANSION JOINT
B109-11-108	0900070502-DWG-S0103	NORTH EXPANSION JOINT - PHASE 1 & PHASE 1A REINFORCING
B109-11-109	0900070502-DWG-S0104	NORTH EXPANSION JOINT - PHASE 2 REINFORCING
B109-11-110	0900070502-DWG-S0105	SOUTH EXPANSION JOINT - PHASE 1 & PHASE 1A REINFORCING
B109-11-111	0900070502-DWG-S0106	SOUTH EXPANSION JOINT - PHASE 2 REINFORCING
B109-11-112	0900070502-DWG-S0107	ACTIVATED ZINC ARC SPRAY DETAILS
B109-11-113	0900070502-DWG-S0108	SLOPE PAVING DETAILS
B109-11-114	0900070502-DWG-S0109	NAVIGATION LIGHTING AND DETAILS
B109-11-115	0900070502-DWG-S0110	REINFORCING SCHEDULE
B109-11-116	0900070502-DWG-S0111	REINFORCING SCHEDULE
B109-11-117	0900070502-DWG-S0112	REINFORCING SCHEDULE
B109-11-118	0900070502-DWG-E0001	BRIDGE LIGHTING AND DETAILS
B109-11-119	0900070502-DWG-E0002	BRIDGE LIGHTING AND DETAILS
B109-11-120	0900070502-DWG-E0003	ELECTRICAL ELEVATION, SECTIONS, AND DETAILS
B109-11-121	0900070502-DWG-E0004	BRIDGE DETAILS AND PANEL SCHEDULE AND LUMINAIRE SCHEDULE

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PART B - ROADWORKS

CITY OF WPG. DWG. NUMBER	DILLON DWG. NUMBER	DWG. DESCRIPTION
B109-11-122	117	CONTROL LINE GEOMETRY
B109-11-123	118	PAVING & GRADING - STA 0+930 TO 1+075
B109-11-124	119	PAVING & GRADING - STA 1+075 TO 1+245
B109-11-125	120	PAVING & GRADING - STA 1+245 TO 1+345
B109-11-126	121	PAVING & GRADING - STA 1+315 TO 1+485
B109-11-127	122	PAVING & GRADING - STA 1+455 TO 1+580
B109-11-128	123	PAVING & GRADING - STA 1+580 TO 1+ 755
B109-11-129	124	CROSS SECTIONS
B109-11-130	125	DETAILS 1 OF 2
B109-11-131	126	DETAILS 2 OF 2
B109-11-132	127	TRAFFIC STAGING - PHASE 1A
B109-11-133	128	TRAFFIC STAGING - PHASE 1B
B109-11-134	129	TRAFFIC STAGING - PHASE 1C
B109-11-135	130	TRAFFIC STAGING - PHASE 2A
B109-11-136	131	TRAFFIC STAGING - PHASE 2B

DESIGN DATA:

DESIGN SPECIFICATIONS: CANADIAN HIGHWAY BRIDGE DESIGN CODE CAN/CSA-S6-06

LIVE LOADING: CHBDC CL-625 TRUCK AND LANE LOAD

CONCRETE:

TYPE 1: FOR MISCELLANEOUS REPAIRS AND SLOPE PAVING
CLASS C-1, f'c = 35 MPa @ 28 DAYS

TYPE 2: FOR DECK SLAB, SIDEWALK SLAB, AND ABUTMENT MODIFICATIONS
CLASS C-1, f'c = 35 MPa @ 28 DAYS, Ri = 0.15, AND CORROSION INHIBITOR

TYPE 3: FOR NORTH ABUTMENT SLAB, TRAFFIC AND MEDIAN BARRIERS, AND APPROACH SLABS
CLASS C-1, f'c = 35 MPa @ 28 DAYS, Ri = 0.15

TYPE 4: FOR PIER CAP MODIFICATIONS
CLASS C-1, f'c = 35 MPa @ 28 DAYS, Ri = 0.15, AND SELF COMPACTING CONCRETE

TYPE 5: FOR HIGH PERFORMANCE CONCRETE (HPC) OVERLAY
CLASS C-XL, f'c = 50 MPa @ 56 DAYS, Ri = 0.15, AND MINIMUM OF 28 MPa PRIOR TO OPENING THE BRIDGE TO NORMAL TRAFFIC

TYPE 6: SIDEWALK WEARING SURFACE OVERLAY
CLASS C-1, f'c = 35 MPa @ 28 DAYS, COLOURED

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REINFORCING STEEL:

CONCRETE COVER SHALL BE 60mm UNLESS OTHERWISE NOTED
ALL REINFORCING TO BE ASTM A955, 300 SERIES, MINIMUM GRADE 420, UNS S24100, UNS S31653 OR UNS S31803
EXCEPT SLOPE PAVING, WINGWALLS, RETAINING WALL, ABUTMENT MODIFICATIONS AND BOTTOM REINFORCEMENT OF NORTH ABUTMENT SLAB - CSA G30.18, GRADE 400W

MINIMUM LAP LENGTH (UNLESS OTHERWISE NOTED):
15M OR 16SS - 600mm
20M OR 19SS - 800mm
25M OR 25SS - 1200mm

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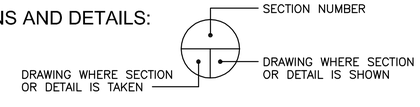
ROADWAY GEOMETRY

CONFORM TO REQUIREMENTS OF THE LATEST CITY OF WINNIPEG STREET AND TRANSPORTATION STANDARD MANUAL, TRANSPORTATION ASSOCIATION OF CANADA (TAC) OR AASHTO

REFERENCE DOCUMENTS:

- DRAWINGS FOR OSBORNE STREET BRIDGE REPLACEMENT ACROSS THE ASSINIBOINE RIVER (CONTRACT No. P.D. 75-197)
- DRAWINGS FOR 2007 BRIDGE MAINTENANCE, OSBORNE STREET BRIDGE AT ASSINIBOINE RIVER.

SECTIONS AND DETAILS:



APEGM
Certificate of Authorization
Wardrop Engineering Inc.
No. 195 Date: April 30, 2011

B.M. ELEV.	F.B.		
01	ISSUED FOR ADDENDUM 1	11.03.07	VB
00	ISSUED FOR TENDER	11.02.18	VB
NO.	REVISIONS	DATE	BY

WARDROP
A TETRA TECH COMPANY

DESIGNED BY	S.Y.	CHECKED BY	V.B.
DRAWN BY	B.M.	APPROVED BY	R.H.W.
HOR. SCALE: / VERTICAL:	AS NOTED	RELEASED FOR CONSTRUCTION	DATE
DATE	10.10.13	ORIGINAL SIGNED	11.02.16
		MATT CHISLETT, P.ENG BRIDGE PROJECTS ENGINEER	

PROVINCE OF MANITOBA
ORIGINAL SIGNED 11.02.16
V. BANTHIA
Member
23477
REGISTERED PROFESSIONAL ENGINEER

CONSULTANT DRAWING NO.
0900070502-DWG-S0002

Winnipeg

THE CITY OF WINNIPEG
PUBLIC WORKS DEPARTMENT
ENGINEERING DIVISION

OSBORNE STREET BRIDGE
REHABILITATION & RELATED WORKS

DESIGN DATA AND DRAWING LIST

CITY DRAWING NUMBER: B109-11-007
SHEET 2 OF 131
2