



- CONSTRUCTION NOTES:**
- FOR DETAILED TEST HOLE INFORMATION, SEE SPECIFICATION.
 - THE LOCATION OF ALL SERVICES IS TO BE CONFIRMED IN THE FIELD.
 - INSTALL NEW SEWERS AND CATCHBASIN LEADS BY TRENCHLESS METHODS WHEREVER POSSIBLE.
 - RENEW/REHABILITATE CATCHBASINS & RENEW CATCHBASIN LEADS WHERE NOTED.

GENERAL NOTES:
RAILWAY MILEAGE & SUBDIVISION P Lead, crossing at Higgins Avenue, adjacent to mile 0.33 Carberry Subdivision
MUNICIPAL DESCRIPTIONS OF ADJOINING PROPERTIES HIGGINS AVENUE AT STANLEY STREET
NAME OF PIPELINE OWNER CITY OF WINNIPEG

	CARRIER PIPE	CASING PIPE
OUTSIDE DIAMETER	STORM RELIEF SEWER	N/A
	762 mm	N/A
PIPE MATERIAL	REINFORCED CONCRETE	N/A
SPECIFICATION AND GRADE	ASTM C76 CLASS 5	N/A
WALL THICKNESS	76mm	N/A
MAXIMUM OPERATING PRESSURE	NON-SURCHARGED GRAVITY	
MAXIMUM SURGE & TEST PRESSURE	N/A	
MAXIMUM OPERATING TEMPERATURE	ATMOSPHERIC	
MINIMUM OPERATING TEMPERATURE		
TYPE OF JOINT	PUSH-ON BELL AND SPIGOT-RUBBER GASKET	
COATING	N/A	
METHOD OF INSTALLATION	TRENCHLESS IN A CORED HOLE	
BURY: BASE OF RAIL TO TOP OF CARRIER	5.33 m	
BURY: (NOT BENEATH TRACKS)	5.53 m	
BURY: (ROADWAY DITCHES)	N/A	
EXTENT OF CASING MEASURED PERPENDICULAR TO CENTRE-LINE OF TRACK	N/A	
TYPE, SIZE AND SPACING OF INSULATORS OR SUPPORTS	N/A	
DISTANCE C.L. TRACK TO FACE OF JACKING/RECEIVING PITS	7.62 m (MIN)	
BURY: BASE OF RAIL TO BOTTOM JACKING/RECEIVING PITS	5.7 m	
CATHODIC PROTECTION	NO	
GEOTECHNICAL BOREHOLES:	YES (ON HIGGINS AVENUE AT LIZZIE STREET AND AT KING STREET)	
SOIL TYPE	CLAY, 1760 kg/m ³	
BASE OF RAIL TO GROUND WATER	N/A	

DESIGN PARAMETERS:
DEAD LOAD 5.90 M COVER, UNIT WT 1760 kg/m³
LIVE LOAD COOPER E80, IMPACT FACTOR = 1.0

ALL WORK CONDUCTED IN ACCORDANCE WITH RAC TCE-10 AND CPR SPEC SP-TS-2.39

WARNING
IF POWER EQUIPMENT OR EXPLOSIVES ARE TO BE USED FOR EXCAVATION ON THIS PROJECT, THE CONTRACTOR MUST:
1) NOTIFY THE GAS COMPANY OF THE PROPOSED LOCATION OF EXCAVATION.
2) TAKE PRECAUTION TO AVOID DAMAGE TO GAS COMPANY INSTALLATIONS.
SEE PROVINCIAL REGULATION 140/92 FOR DETAILS

APEGM
Certificate of Authorization
AECOM Canada Ltd.
No. 4671 Date: July 7, 2009

BID OPPORTUNITY NO. 499-2009

150 WM	WATERMAIN	150 WM		CURB STOP		150 WM	WATERMAIN	150 WM	
+	HYDRANT	+		REDUCER		+	HYDRANT	+	
+	VALVE	+		COUPLING		+	VALVE	+	
+	LAND DRAINAGE SEWER	+		ANODE		+	LAND DRAINAGE SEWER	+	
+	WASTE WATER SEWER	+		HYDRO		+	WASTE WATER SEWER	+	
○	MANHOLE	●		MTS		○	PAVEMENT CROWN	○	
□	CATCH BASIN	■		GAS		○	N/W PROPERTY LINE	○	
△	CURB INLET	▲		TESTHOLE		○	S/E PROPERTY LINE	○	
▭	CULVERT	▭		LAMP STANDARD		○	N/W GUTTER	○	
—	PIPE ABANDONMENTS	—		TREE		○	S/E GUTTER	○	
+	SURVEY BAR	+							
+	EXISTING	+	NEW	EXISTING	NEW	+	EXISTING	+	NEW

LOCATION APPROVED UNDERGROUND STRUCTURES
SUPR. U/G STRUCTURES DATE COMMITTEE
NOTE: LOCATION OF UNDERGROUND STRUCTURES AS SHOWN ARE BASED ON THE BEST INFORMATION AVAILABLE. BUT NO GUARANTEE IS GIVEN THAT ALL EXISTING UTILITIES ARE SHOWN OR THAT THE GIVEN LOCATIONS ARE EXACT. CONFIRMATION OF EXISTENCE AND EXACT LOCATION OF ALL SERVICES MUST BE OBTAINED FROM THE INDIVIDUAL UTILITIES BEFORE PROCEEDING WITH CONSTRUCTION.

NO.	ISSUED FOR CONSTRUCTION	DATE	BY
0	ISSUED FOR CONSTRUCTION	09/07/06	KMB
	NO. REVISIONS	YYMMDD	BY

AECOM

DESIGNED BY	GEB	CHECKED BY	FMI
DRAWN BY	KMB	APPROVED BY	BTW
HOR. SCALE	1:250	RELEASED FOR CONSTRUCTION	C. Boulet
VERT. SCALE	1:50	DATE	July 7, 2009

PROFESSIONAL'S SEAL
ISSUE / REVISION 0
ISSUED FOR CONSTRUCTION
WAS SEALED BY
A. NAGY
AND DATED
July 7, 2009
CONSULTANT DRAWING NO.
D265-177-05_01-C-1014_RX.dwg

THE CITY OF WINNIPEG
WATER AND WASTE DEPARTMENT

ALEXANDER/BANNATYNE
COMBINED SEWER RELIEF
CONTRACT 5
HIGGINS AVENUE
MATCHLINE 0+740
TO MATCHLINE 0+850

SHEET 14 OF 20
CITY DRAWING NUMBER
LD-5416
REV 0