

**DRAWING INDEX**

SHEET NUMBER	CITY OF WINNIPEG DRAWING NUMBER	DRAWING TITLE
01	D-16016	COVER PAGE
02	D-16017	DRAWING INDEX, DESIGN NOTES, LEGEND, & ABBREVIATIONS
03	D-16018	PORTAGE AVENUE - LIPTON ST TO 15.9 E OF RUBY ST
04	D-16019	PORTAGE AVENUE - 15.9 E OF RUBY ST TO 32.6 E OF LENORE ST
05	D-16020	PORTAGE AVENUE - 32.6 E OF LENORE ST TO 8.0 W OF ARLINGTON ST
06	D-16021	PORTAGE AVENUE - 8.0 W OF ARLINGTON ST TO 3.5 W OF HOME ST
07	D-16022	PORTAGE AVENUE - 3.5 W OF HOME ST TO 52.0 W OF CANORA ST
08	D-16023	PORTAGE AVENUE - 52.0 W OF CANORA ST TO 50.0 W OF BROADWAY
09	D-16024	PORTAGE AVENUE - 50.0 W OF BROADWAY TO BROADWAY
10	D-16025	EVANSON STREET - 7.2 S OF S L PORTAGE AVE TO 6.8 S OF N L PORTAGE AVE
11	D-16026	ARLINGTON STREET - 6.7 S OF S L PORTAGE AVE TO 8.2 N OF N L PORTAGE AVE
12	D-16027	HOME STREET - 4.5 S OF S L PORTAGE AVE TO 4.1 N OF N L PORTAGE AVE

**ABBREVIATIONS**

WWS	WASTE WATER SEWER
CS	COMBINED SEWER
LDS	LAND DRAINAGE SEWER
R	PROPERTY LINE
℄	CENTER LINE
G.I.S.	GEOGRAPHIC INFORMATION SYSTEM
B.M.	BENCH MARK
TH	TEST HOLE
ELEV	ELEVATION
INV	INVERT
MIN	MINIMUM
MAX	MAXIMUM
SL	STREET LIGHTING
TS	TRAFFIC SIGNALS
ABAND	ABANDONED
BLDG	BUILDING
HSE	HOUSE
CRN	CORNER
OPP	OPPOSITE
C/S OR S/C	CURB STOP
MTS	MANITOBA TELEPHONE SYSTEM
R.O.W.	RIGHT-OF-WAY
WM	WATERMAIN
CULV	CULVERT
MH	MANHOLE
CB	CATCH BASIN
CI	CURB INLET
VERT.	VERTICAL
HORZ.	HORIZONTAL
I.B.	IRON BAR
FIBRE	FIBRE OPTIC
TYP	TYPICAL
X-ING	CROSSING
HYD	HYDRANT
EXIST	EXISTING
N	NORTH
E	EAST
S	SOUTH
W	WEST
W/	WITH
C/W	CONSTRUCTED WITH
CONC	CONCRETE
AC	ASBESTOS CEMENT
VC OR CLAY	VITRIFIED CLAY
CI	CAST IRON
DI	DUCTILE IRON
PVC	POLYVINYL CHLORIDE
HDPE	HIGH DENSITY POLYETHYLENE
PCCP	PRESTRESSED CONCRETE CYLINDER PIPE

**LEGEND**

DESCRIPTION	EXISTING	PROPOSED
WATER PIPE	—	—
FIRE HYDRANT	⊕	⊕
VALVE	⊗	⊗
CURB STOP	⊕	⊕
REDUCER	◁	▷
COUPLING OR SLIDDER	X	X
CROSS	⊕	⊕
BEND - 11.25', 22.5', 45', 90'	⋈	⋈
TEE	⋈	⋈
VERTICAL BEND	⋈	⋈
ANODE	⊕	⊕
REPAIR MARKER	⊕	⊕
PLUG	⊕	⊕
SEWER PIPE	—	—
MANHOLE	○	●
CATCH BASIN	□	■
CURB INLET	▽	▽
JUNCTION	⋈	⋈
℄ DITCH	—	—
CULVERT	⊕	⊕
SURVEY BAR	⊕	⊕
SURVEY MONUMENT	⊕	⊕
TREE - DECIDUOUS	⊕	⊕
TREE - CONIFEROUS	⊕	⊕
HYDRO	—	—
HYDRO POLE	⊕	⊕
LAMP STANDARD	⊕	⊕
HYDRO POLE W/STREET LIGHTING	⊕	⊕
POLE	⊕	⊕
GUY ANCHOR	⊕	⊕
M.T.S. POLE	⊕	⊕
PEDESTAL OR BOX	⊕	⊕
CABINET	⊕	⊕
M.T.S., SHAW, OR VIDEON	⊕	⊕
TRAFFIC SIGNALS	⊕	⊕
TRAFFIC LIGHT STANDARD	⊕	⊕
GAS	⊕	⊕
STEAM	⊕	⊕
FIBRE OPTIC	⊕	⊕
FENCE	⊕	⊕
EDGE OF PAVEMENT OR GUTTER	⊕	⊕
EDGE UNPAVED OR GRAVEL ROAD	⊕	⊕
PROJECTED ℄	⊕	⊕
LOT LINE	⊕	⊕
SIDEWALK - PATHWAY	⊕	⊕
EASEMENT	⊕	⊕
EDGE OF BUILDING	⊕	⊕
MAILBOX	⊕	⊕
PARKING METER	⊕	⊕
TEST HOLE	⊕	⊕
TREE LINE OR BUSH	⊕	⊕

**PROFILE**

DESCRIPTION	EXISTING	PROPOSED
WATER PIPE	—	—
HYDRANT TOP	⊕	⊕
VALVE	⊗	⊗
TEE OR CROSS	⋈	⋈
COUPLING OR BEND	⋈	⋈
REDUCER	◁	▷
END OF PIPE	⊕	⊕
SEWER PIPE	—	—
UNPAVED GROUND SURFACE (SOUTH)	⊕	⊕
UNPAVED GROUND SURFACE (NORTH)	⊕	⊕
PAVED GROUND SURFACE - ℄ PIPE (NORTH)	⊕	⊕
PAVED GROUND SURFACE - ℄ PIPE (SOUTH)	⊕	⊕
GUTTER (NORTH AND WEST)	⊕	⊕
GUTTER (SOUTH AND EAST)	⊕	⊕
STRUCTURE	⊕	⊕
MANHOLE OR CATCH BASIN	⊕	⊕

**CONSTRUCTION NOTES**

1. EXPOSE EXISTING WATERMAIN & CONFIRMED INVERTS PRIOR TO CONSTRUCTION.
2. LOCATION OF ALL SERVICES TO BE CONFIRMED IN THE FIELD.
3. INSTALL WATERMAIN BY TRENCHLESS METHODS.
4. TRENCHES AND EXCAVATIONS WITHIN 1 METRE OF A PAVED AREA INCLUDING SIDEWALKS SHALL BE CLASS 3 BACKFILL.
5. ALL MATERIALS SHALL CONFORM TO THE CITY OF WINNIPEG STANDARD CONSTRUCTION SPECIFICATIONS.
6. MINIMUM COVER TO TOP OF WATERMAIN SHALL BE 2.4 m.
7. REPLACE ALL EXISTING LEAD SERVICES FROM PROPOSED WATERMAIN TO ℄.
8. NOTIFY ALL AFFECTED RESIDENTS AND BUSINESSES 24 HOURS IN ADVANCE OF WATER SHUTDOWNS OR DISRUPTION OF SERVICE.

**HATCH PATTERNS**

EXISTING	PROPOSED	DESCRIPTION
		EARTH OR GROUND ABOVE PIPE
		SAND OR OTHER FINE MATERIAL
		CONCRETE
		WASHED STONE OR GRANULAR MATERIAL
		INTERLOCKING STONE
		METAL
		GRAVEL OR STONE

LOCATION APPROVED UNDERGROUND STRUCTURES SUPV. U/G STRUCTURES COMMITTEE DATE 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.		B.M. IRON BAR AT NE BLVD OF WATT ST/MUNROE AVE INTERSECTION ELEV. 230.270		WSP Canada Inc. Suite 111-93 Lombard Ave Winnipeg, MB R3B 3B1 t. 204.943.3178 f. 204.943.4948 www.wsp.com		ENGINEER'S SEAL NOT FOR CONSTRUCTION		<b>THE CITY OF WINNIPEG</b> WATER AND WASTE DEPARTMENT ENGINEERING DIVISION 2021 WATER MAIN RENEWAL-CONTRACT 07		SHEET 02 OF 13 CITY DRAWING NUMBER D-16017	
DESIGNED BY R.H. CHECKED BY S.M. DRAWN BY R.H. APPROVED BY S.M. SCALE: HORIZONTAL 1:250 VERTICAL 1:50 DATE 2021 05 07		RELEASSED FOR CONSTRUCTION DATE		CONSULTANT DRAWING NUMBER 211-00299-00-02		INDEX PAGE		2021 WATER MAIN RENEWAL-CONTRACT 07		FILE PATH: P:\2021\211-00299-00 - 2021 Watermain Renewals Contract 7\14.0 Tech & Professional Services\10 Drawings\03 Work	