#### DRAWING INDEX

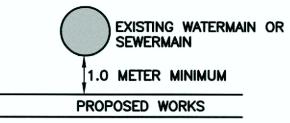
SHEET NUMBER	CONSULTANT DRAWING NUMBER	CITY OF WINNIPEG DRAWING NUMBER	DRAWING TITLE
1	11-0107-18-C13_C00	LD-12995	COVER SHEET
2	11-0107-18-C13_C01	LD-12996	DRAWING INDEX & GENERAL NOTES
3	11-0107-18-C13_C02	LD-12997	KEY PLAN & MANHOLE SCHEDULE
4	11-0107-18-C13-1_C03	LD-12998	POSEIDON BAY - TAYLOR AVENUE TO CAMBRIDGE STREET - TAYLOR AVENUE TO STA 1+75
5	11-0107-18-C13-1_C04	LD-12999	POSEIDON BAY - TAYLOR AVENUE TO CAMBRIDGE STREET - STA 1+75 TO STA 2+85
6	11-0107-18-C13-1_C05	LD-13000	POSEIDON BAY - TAYLOR AVENUE TO CAMBRIDGE STREET - STA 2+85 TO STA 4+10
7	11-0107-18-C13-1_C06	LD-13001	POSEIDON BAY - TAYLOR AVENUE TO CAMBRIDGE STREET - STA 4+10 TO STA CAMBRIDGE STREET
8	11-0107-18-C13-1_C07	LD-13002	HECTOR AVENUE - CAMBRIDGE STREET TO POSEIDON BAY
9	11-0107-18-C13-1_C08	LD-13003	EBBY AVENUE - CAMBRIDGE STREET TO POSEIDON BAY
10	11-0107-18-C13-2_C03	LD-13004	NATHANIEL STREET - TAYLOR AVENUE TO GRANT AVENUE - TAYLOR AVENUE TO STA 1+85
11	11-0107-18-C13-2_C04	LD-13005	NATHANIEL STREET - TAYLOR AVENUE TO GRANT AVENUE - STA 1+85 TO STA 3+15
12	11-0107-18-C13-2_C05	LD-13006	NATHANIEL STREET - TAYLOR AVENUE TO GRANT AVENUE - STA 3+15 TO STA 4+30
13	11-0107-18-C13-2_C06	LD-13007	NATHANIEL STREET - TAYLOR AVENUE TO GRANT AVENUE - STA 4+30 TO STA 5+50
14	11-0107-18-C13-2_C07	LD-13008	NATHANIEL STREET - TAYLOR AVENUE TO GRANT AVENUE - STA 5+50 TO GRANT AVENUE
15	11-0107-18-C13-2_C08	LD-13009	HECTOR AVENUE - NATHANIEL STREET TO HECTOR BAY W - EAST LEG - NATHANIEL STREET TO STA 1+65
16	11-0107-18-C13-2_C09	LD-13010	HECTOR AVENUE - NATHANIEL STREET TO HECTOR BAY W - EAST LEG - STA 1+65 TO HECTOR BAY W - EAST LEG
17	11-0107-18-C13-2_C10	LD-13011	HECTOR BAY W - WEST LEG
18	11-0107-18-C13-2_C11	LD-13012	HECTOR BAY W - SOUTH LEG
19	11-0107-18-C13-2_C12	LD-13013	HECTOR BAY W - EAST LEG
20	11-0107-18-C13-2_C13	LD-13014	MANHOLE DETAILS - SHEET 1
21	11-0107-18-C13-2_C14	LD-13015	MANHOLE DETAILS - SHEET 2
22	11-0107-18-C13-1_C09	LD-13016	MISCELLANEOUS DETAILS

### **CONSTRUCTION NOTES**

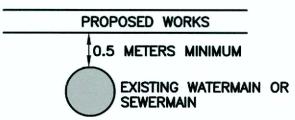
- 1. ALL UNDERGROUND WORKS TO BE CONSTRUCTED IN ACCORDANCE WITH THE LATEST REVISION OF THE CITY OF WINNIPEG STANDARD CONSTRUCTION SPECIFICATIONS.
- 2. ALL EXISTING UNDERGROUND SERVICES SHOWN ON DRAWINGS ARE APPROXIMATE ONLY.
- CONTRACTOR TO VERIFY LOCATIONS OF ALL EXISTING UNDERGROUND UTILITIES AND SERVICES PRIOR TO START OF CONSTRUCTION. HYDROVAC TO CONFIRM DEPTHS AND
- 4. FOR DETAILS OF STANDARD MANHOLE AND LARGE DIAMETER MANHOLES SEE DWG. LD-13014 & LD-13015.
- 5. STANDARD DROP MANHOLE SHALL COMPLY WITH C.O.W. DETAIL SD-010D.
- 6. ALL NEW CATCH BASINS LEADS TO BE 2500 OR 3000 PVC SDR 35 PIPES (AS SHOWN ON THE DRAWINGS).
- 7. ALL PIPE SHALL HAVE CLASS B BEDDING WHEN INSTALLED BY TRENCH METHOD.
- 8. CONTRACTOR TO INSTALL PIPE BY TRENCHLESS METHODS.
- 9. BACKFILL UNDER PAVEMENT & WITHIN 1.0 OF PAVEMENT ON REGIONAL STREETS TO BE
- 10. BACKFILL UNDER PAVEMENT & WITHIN 1.0 OF PAVEMENT ON OTHER ROADWAYS TO BE CLASS 3.
- 11. BACKFILL IN BOULEVARDS TO BE CLASS 5.
- 12. EXISTING SEWER AND WATER SERVICES TO BE REGRADED AS REQUIRED FOR CONSTRUCTION OF THE NEW LDS PIPING.
- 13. EXISTING SERVICES OF THE COMBINED SEWER TO BE ABANDONED SHALL BE INSPECTED IN ADVANCE OF ABANDONING TO CONFIRM THAT NO REMAINING ACTIVE SERVICE CONNECTIONS EXIST.
- 14. ALL EXISTING COMBINED SEWERS IN CLOSE PROXIMITY OF ANY EXCAVATIONS OR SHAFTS TO BE INSPECTED PRE- AND POST-CONSTRUCTION.
- 15. CONTRACTOR TO INSTALL SEWER SERVICE RISERS TO AN ELEVATION WHERE MINIMUM SLOPE OF 2.0% IS MAINTAINED FOR ALL SERVICES.
- 16. CONTRACTOR SHALL MITIGATE IMPACTS TO THE WORK AREA FROM SITE SURFACE
- 17. PEDESTRIAN ACCESS MUST BE MAINTAINED DURING CONSTRUCTION AT ALL TIMES UNLESS OTHERWISE STATED. ALTERNATE ACTIVE TRANSPORTATION PATHWAY ROUTING TO BE PROVIDED IN ACCORDANCE WITH CITY OF WINNIPEG REQUIREMENTS.
- 18. RESTORE ALL EXISTING SURFACES AND STRUCTURES, INCLUDING BUT NOT LIMITED TO PAVEMENT, CURBS, SIDEWALKS, SOD TO PRE CONSTRUCTION CONDITIONS OR BETTER.
- 19. FOR ANY EXISTING GAS LINES THAT ARE IN CONFLICT WITH OR IN CLOSE PROXIMITY TO EXCAVATIONS AND SHAFTS THE CONTRACTOR SHALL ENSURE THAT SUITABLE TEMPORARY SUPPORT OF THE GAS LINES IS PROVIDED AS PER MANITOBA HYDRO STANDARD DETAIL "TEMPORARY SUPPORT FOR EXCAVATED GAS PIPELINES" (SD.610.10).

#### MINIMUM REQUIRED CLEARANCE DISTANCES BETWEEN EXISTING WATERMAIN / SEWERMAIN AND PROPOSED WORKS

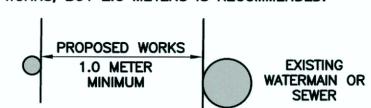
1. A MINIMUM CLEARANCE OF 1.0 MUST BE PROVIDED BETWEEN THE UNDERSIDE OF ANY EXISTING WATERMAIN OR SEWERMAIN AND THE TOP OF THE PROPOSED WORKS. THIS INSTALLATION BY TRENCHLESS METHOD ONLY.



2. A MINIMUM CLEARANCE OF 0.5 MUST BE PROVIDED BETWEEN THE UNDERSIDE OF THE PROPOSED WORKS AND THE TOP OF ANY EXISTING WATERMAIN OR SEWERMAIN BY TRENCHLESS OR OPEN TRENCH.



3. A MINIMUM LATERAL CLEARANCE OF 1.0 METER MUST BE PROVIDED BETWEEN ANY EXISTING WATERMAIN OR SEWERMAIN PIPE AND THE PROPOSED WORKS, BUT 2.0 METERS IS RECOMMENDED.



ELEV.

4. A SHAFT MUST BE EXCAVATED BY SOFT DIG METHODS 4.0 METERS FROM THE CENTRELINE OF THE EXISTING WATERMAIN OR SEWERMAIN TO CONFIRM THE ALIGNMENT AND ELEVATION OF THE DRILLING ROD BEFORE IT CROSSES OVER OR UNDER THE EXISTING WATERMAIN OR SEWERMAIN. THIS CONFIRMATION MUST BE WITNESSED BY A CITY REPRESENTATIVE.

## **ABBREVIATIONS**

wws	WASTE WATER SEWER	
cs	COMBINED SEWER	
LDS	LAND DRAINAGE SEWER	
PL	PROPERTY LINE	
Ę	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	WATER MAIN	
CULV	CULVERT	
MH	MANHOLE	
СВ	CATCH BASIN	
CI	CURB INLET	
СР	CATCH PIT	
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	
	HIGH DENSITY POLYETHYLENE	
HDPE	PRESTRESSED CONCRETE CYLINDER PIPE	
PCCP	TRESTRESSED CONCRETE CILINDER PIPE	

# **LEGEND**

	PLAN VIEW	
DESCRIPTION	EXISTING	PROPOSED
WATER PIPE		
FIRE HYDRANT	<b></b>	+
VALVE	⊗	8
CURB STOP	ď	•
REDUCER	△	4
COUPLING OR SLIDER	x	χ
CROSS	<b>⊕</b>	<b>#</b>
BEND - 11.25, 22.5, 45, 90*	H H 4 4	н ч ч ч
TEE	д	А
VERTICAL BEND	н	Н
ANODE	Ð	7
PLUG	3	1
SEWER PIPE		
MANHOLE	0	•
CATCH BASIN		
CURB INLET	∇	<b>_</b>
JUNCTION		
SURVEY BAR	<b>+</b>	<u>.</u>
SURVEY MONUMENT	<u>*</u>	<u>~</u>
TREE - DECIDUOUS	$\bigcirc$	
TREE - CONIFEROUS		
HYDRO		
HYDRO POLE	•н	
LAMP STANDARD	•••	
HYDRO POLE W/STREET LIGHTING	H <b>•</b> -•	
POLE	•	
GUY ANCHOR	<del></del>	
M.T.S. POLE	•M	
PEDESTAL OR BOX	⊠	
M.T.S., SHAW, OR VIDEON		
TRAFFIC SIGNALS		
TRAFFIC LIGHT STANDARD	<b>→</b>	
GAS		
FIBRE OPTIC		
FENCE		
EDGE OF PAVEMENT OR GUTTER		
EDGE UNPAVED OR GRAVEL ROAD		
PE		
PROJECTED P		
LOT LINE		
SIDEWALK - PATHWAY		
SIDEMALL - FAIIIMAT	77777777777	
EDGE OF BUILDING	(/////////////////////////////////////	
MAILBOX	M	
TEST HOLE	<b>*</b>	<del>•</del>

	PROFILE	
DESCRIPTION	EXISTING	PROPOSED
WATER PIPE		•
HYDRANT TOP	+	+
VALVE		X
TEE OR CROSS		0
COUPLING OR BEND		
REDUCER	=====	
END OF PIPE	8	8
SEWER PIPE		
UNPAVED GROUND SURFACE		
PAVED GROUND SURFACE - & PIPE		
GUTTER (NORTH AND WEST)		
GUTTER (SOUTH AND EAST)		
€ DITCH (NORTH AND WEST)		
© DITCH (SOUTH AND EAST)		
STRUCTURE		
MANHOLE OR CATCH BASIN		:

VGINEERS GEOSCIENTISTS MANITOBA Certificate of Authorization KGS Group No. 245

**METRIC** WHOLE NUMBERS INDICATE MILLIMETRES DECIMALIZED NUMBERS INDICATE METRES

SHEET **2** OF **22** 

# KGS

DESIGNED CHECKED MID APPROVED **GEL** RELEASED FOR

CONSTRUCTION

CONSULTANT DRAWING NUMBER 11-0107-18-C13\_C01

Winnipeg IANKOVA DEDOVA Member | 3 615 COCKBURN & CALROSSIE SEWER RELIEF WORKS

DRAWING INDEX & GENERAL NOTES

CONTRACT 13 CITY DRAWING NUMBER LD-12996

THE CITY OF WINNIPEG

WATER AND WASTE DEPARTMENT

ENGINEERING DIVISION

**METRIC** WHOLE NUMBERS INDICATE MILLIMETRES

DECIMALIZED NUMBERS INDICATE METRES

PROPERTY LIMITS DELINEATION DELINEATION OF PROPERTY LIMITS AS SHOWN ON THIS DWG DOES NOT REPRESENT "LEGAL SURVEY". KGS GROUP MAKES NO REPRESENTATION OR WARRANTY AS TO THE ACCURACY OF PROPERTY LIMITS DELINEATED ON THIS DWG, NOR ON THE DIMENSIONAL ACCURACY OF DWG FEATURES RELATIVE TO THOSE PROPERTY LIMITS.

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 210/72 FOR DETAILS

SUPV. U/G STRUCTURES COMMITTEE DATE LOCATION OF UNDERGROUND STRUCTURES AS SHOWN ARE BASED ON THE BEST INFORMATION AVAILABLE BUT NO GUARANTEE IS GIVEN THAT ALI 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.

LOCATION APPROVED

UNDERGROUND STRUCTURES

NOTE:

ISSUED FOR CONSTRUCTION 2024/06/18 DATE

DATE 2 DATE 2024 06 18

HORIZONTAL AS NOTED

DRAWN

SCALE:

VERTICAL

ENGINEER'S SEAL

FILE PATH: P:\Projects\2011\11-0107-18\Dwg\Mun\C13 - Poseidon-Nathaniel-Hector\FILE NAME: 11-0107-18-C13\_INDEX SHEET.dwg