

1. CONSTRUCT ALL SEWERS AND APPURTENANCES TO CITY OR TOWNSHIP STANDARDS (IF AVAILABLE) OR AS PER OPSD

2. SEWER TRENCHING AND BEDDING SHALL CONFORM TO OPSD 802.010 AND 802.013 UNLESS NOTED OTHERWISE. 3. BEDDING SHALL BE A MINIMUM 150mm OF GRANULAR "A", COMPACTED TO MINIMUM 95% STANDARD PROCTOR DRY DENSITY. CLEAR STONE BEDDING SHALL NOT BE PERMITTED.

4. SUB-BEDDING, IF REQUIRED SHALL BE AS PER THE DIRECTION OF A GEOTECHNICAL ENGINEER.

5. BACKFILL TO AT LEAST 300mm ABOVE TOP OF PIPE WITH GRANULAR "A" OR SAND.

GRADE) SHALL MATCH EXISTING SOIL CONDITIONS. 7. SEWERS AND CONNECTIONS 150mm DIAMETER AND SMALLER TO BE PVC SDR 28 OR APPROVED EQUIVALENT. SEWERS AND CONNECTIONS 200mm DIAMETER AND LARGER TO BE PVC SDR 35 OR APPROVED EQUIVALENT.

8. SEWER SERVICE LATERALS ARE T HAVE A MINIMUM OF 2.0m OF COVER OR SHALL BE INSULATED AS PER CITY OF OTTAW. STANDARD DRAWING W22 AND WATER SERVICE LATERALS ARE TO HAVE A MINIMUM COVER OF 2.4m OR SHALL BE INSULATED AS PER CITY OF OTTAWA STANDARD DRAWING W22.

9. SUPPLY AND INSTALL ALL PIPING AND APPURTENANCES AS SHOWN AND DETAILED TO WITHIN 1.0m OF BUILDING. ALL ENDS OF SERVICES TO BE PROPERLY CAPPED AND LOCATED WITH 2"x4"x8' LONG MARKER. 10. CONTRACTOR TO TELEVISE (CCTV) ALL PROPOSED SEWERS ONSITE, OUTLET CONNECTION TO THE MAIN AND PIPES 150mmØ OR GREATER PRIOR TO BASE COURSE ASPHALT. UPON COMPLETION OF CONTRACT, THE CONTRACTOR IS

RESPONSIBLE TO FLUSH AND CLEAN ALL SEWERS & APPURTENANCES. 11. DYE TESTING IS TO BE COMPLETED ON SANITARY SERVICE TO CONFIRM PROPER CONNECTION TO THE SANITARY SEWER

12. ALL CATCHBASIN AND CATHCBASIN MANHOLE LEADS ARE TO BE MINIMUM 200mmØ WITH MINIMUM 1.0% SLOPE

13. ALL CATCHBASINS EXCLUDING LANDSCAPE CATCHBASINS ARE TO HAVE 150 mmØ PERFORATED PIPE FOR 3.0m ON ALL AVAILABLE SIDES AS PER CITY OF OTTAWA STANDARD DRAWING 'R1'.

14. ALL MATERIALS AND CONSTRUCTION TO BE IN ACCORDANCE WITH CURRENT CITY OF OTTAWA STANDARDS AND ONTARIO PROVINCIAL STANDARDS AND SPECIFICATIONS; SEWER AND WATERMAIN MATERIAL TYPES AND DISINFECTION 15. SUPPLY AND CONSTRUCT ALL SEWERS AND APPURTENANCES IN ACCORDANCE WIH CURRENT CITY OF OTTAWA STANDARDS AND ONTARIO PROVINCIAL STANDARDS AND SPECIFICATIONS; ROADS AND PUBLIC WORKS.

16. STRICT ATTENTION AND ADHERENCE TO CITY OF OTTAWA - SEWER USE BY-LAW 2003-514 IS REQUIRED DUE TO THE NATURE OF THIS FACILITY, IN PARTICULAR SECTIONS #4,5 AND 6 AS IT PERTAINS TO BIOMEDICAL AND SIMILAR WASTE AND AS IT RELATES TO THIS APPLICATION.

1. CONSTRUCT ALL WATERMAINS AND APPURTENANCES IN ACCORDANCE WITH OPSD STANDARDS AND SPECIFICATIONS, AS WELL AS CITY OR TOWNSHIP STANDARDS.

2. INDUSTRIAL/COMMERCIAL SERVICE CONNECTIONS TO BE 50mm COPPER PIPING AND SHALL CONFORM TO ASTM B88

3. WATERMAINS AND/OR WATER SERVICES ARE TO HAVE A MINIMUM COVER OF 2.4m. OTHERWISE THERMAL INSULATION IS REQUIRED AS PER CITY OR TOWNSHIP STANDARDS (IF AVAILABLE) OR OPSD 1109.030. 4. IF THE WATERMAIN MUST BE DEFLECTED TO MEET ALIGNMENT, ENSURE THAT THE AMOUNT OF DEFLECTION USED IS

5. USE APPROVED SADDLE CONNECTION WITH MAIN (CORPORATION) STOP AS PER CITY OF OTTAWA STANDARD DRAWING

6. CONNECTION TO EXISTING BY CITY OR TOWNSHIP FORCES. EXCAVATION, BACKFILLING AND REINSTATEMENT IS TO BE

7. THERMAL INSULATION OF WATERMAINS AT OPEN STRUCTURES AS PER CITY OR TOWNSHIP STANDARDS (IF AVAILABLE)

8. THERMAL INSULATION OF WATERMAINS UNDER ROAD SIDE DITCHES AS PER CITY OF OTTAWA STANDARD DRAWING

9. WATER SERVICES GREATER THAN 19mm REQUIRE A WATER DATA CARD.

10. VALVES TO BE OPERATED BY CITY OF OTTAWA STAFF ONLY.

11. NO CONNECTION TO EXISTING WATER NETWORK SHALL BE COMPLETED UNTIL A WATER PERMIT IS OBTAINED FROM THE CITY OF OTTAWA. CITY OF OTTAWA FORCES TO COMPLETE WATERMAIN CONNECTIONS. EXCAVATION, BACKFILLING AND REINSTATEMENT TO BE COMPLETED BY CONTRACTOR.

CROSSING CONFLICT TABLE

LOCATION	DESCRIPTION	SEPARATION			
1	100mmØ STM SERVICE INV 91.45 EX. 25mmØ WTR OBV 90.57	0.88			
2	150mmØ WTR INV 90.81 135mmØ SAN OBV 90.51	0.30			
3	135mmØ SAN SERVICE OBV 91 18				
4	150mmØ WÁT SERVICE OBV 90.88 200mmØ STM INV 91.61	0.73			
5	150mmǿ WTR OBV 90.46 EX. 150mmǿ SAN INV 90.85	0.39			
*NOTE: CONTRACTOR TO ENSURE A MINIMUM OF 0.30m OF VERTICAL SEPARATION					

BETWEEN EXISTING UTILITIES, SEWERS, AND PROPOSED SERVICES **NOTE: CONTRACTOR TO VERIFY ALL EXISTING SEWER AND UTILITY ELEVATIONS AND IMMEDIATELY ADVISE THE ENGINEER OF ANY DISCREPANCIES

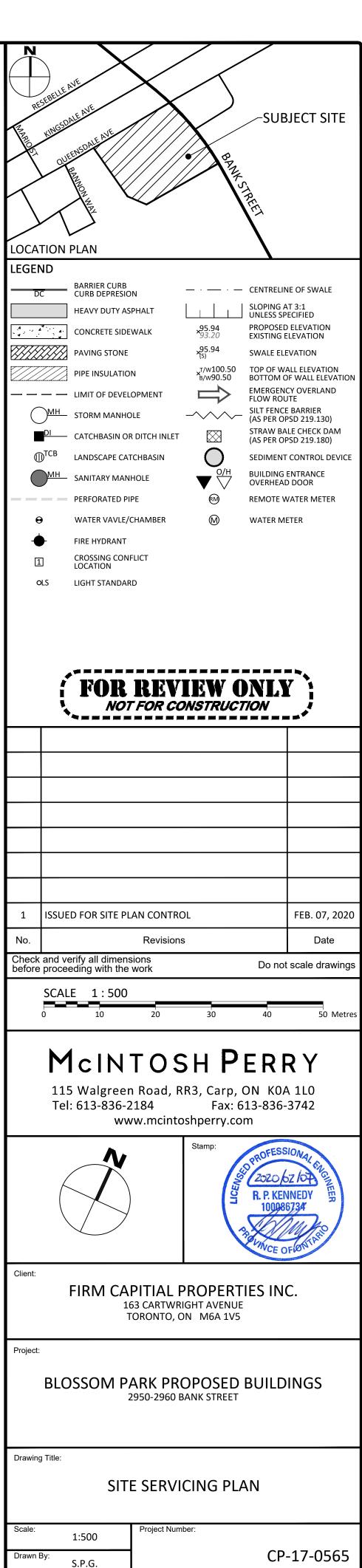
WATER COVER TABLE

RIM

LOCATION	STATION	FINISHED GRADE	TOP OF PIPE	COVER
150 X 150 TEE	0+000.00	92.88	90.37	2.51
45° BEND	0+0011.01	92.92	90.52	2.40
150 X 50 TEE A	0+0038.69	93.30	90.90	2.40
45° BEND	0+0040.92	93.22	90.82	2.40
VALVE	0+050.28	93.35	90.95	2.40
BLDG	0+058.66	93.65	91.25	2.40
150X150 TEE	1+000.00	93.17	90.63	2.54
L50 X 150 TEE B	1+035.07	93.51	91.11	2.40
VALVE	1+046.31	92.72	90.32	2.40
BLDG	1+055.35	93.95	91.55	2.40
150 X 50 TEE A	2+000.00	93.30	90.90	2.40
VALVE	2+001.20	93.31	90.91	2.40
HYDRANT	2+003.11	93.45	91.05	2.40
150 X 50 TEE B	3+000.00	93.51	91.11	2.40
VALVE	3+001.00	93.50	91.10	2.40
HYDRANT	3+002.00	93.60	91.20	2.40

STM PIP	ES STRUCT	URE TABLE

	INVERT IN	INVERT OUT	DESCRIPTION			
		SW 91.79	OPSD 705.010 FRAME S19 COVER S19			
		W 91.94	OPSD 705.010 FRAME S19 COVER S19			



Checked By:

Designed By:

R.P.K.

S.P.G.

Drawing Number:

C102 #XXXXX