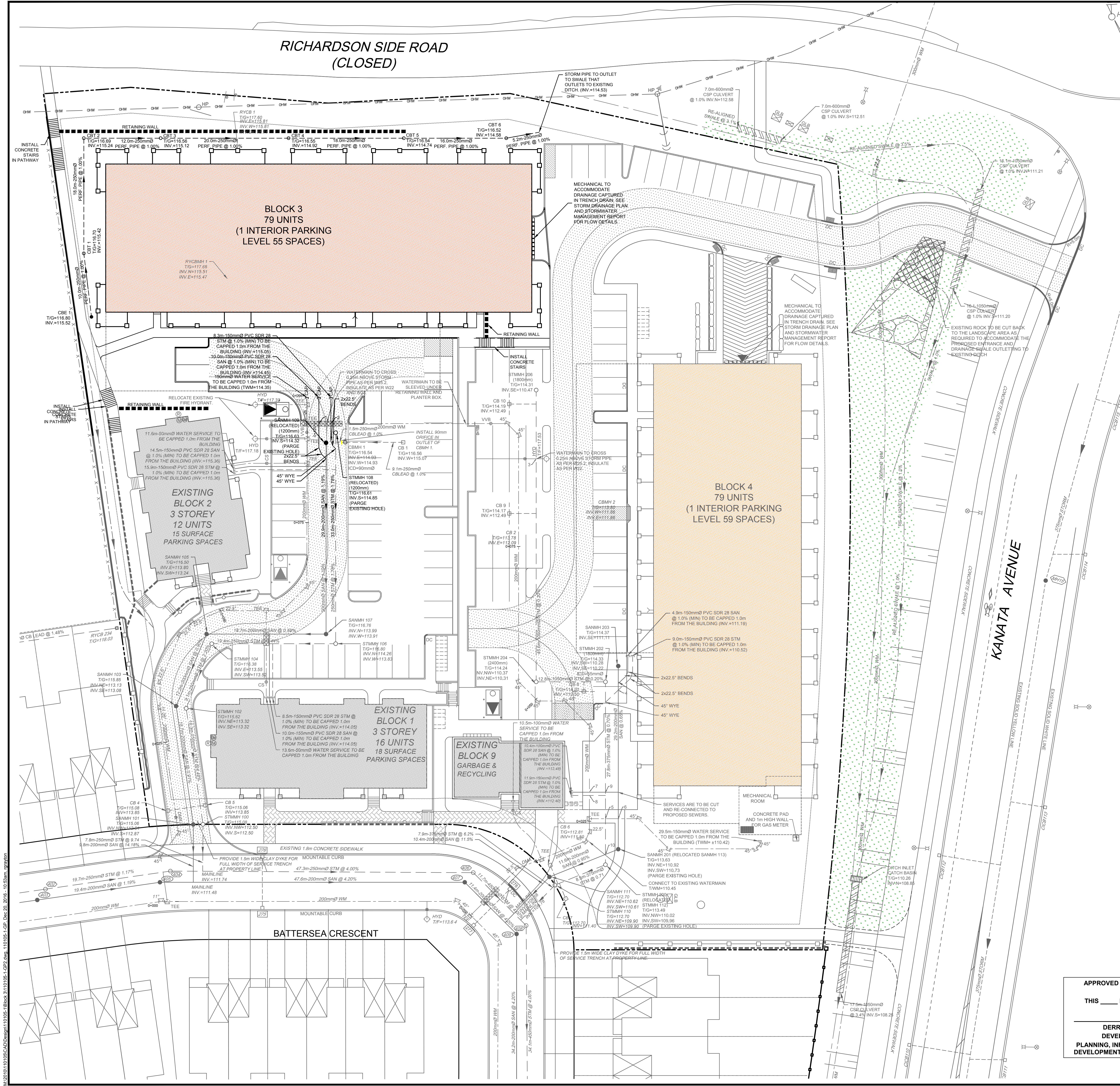




WATERMAIN TABLE - BLOCKS 1 TO 4			
STATION	SURFACE ELEVATION	T/W ELEVATION	COMMENTS
0+000	115.16a	112.63	200 x 200 TEE
0+003.00	115.16a	112.78a	WM CROSSING OVER 200 SANITARY SEWER
0+003.18	115.16a	112.78a	45° VERTICAL BEND
0+003.63	115.16a	113.20	45° VERTICAL BEND
0+004.74	115.16a	113.20	WM CROSSING OVER 250 STORM SEWER
0+005.88	115.16a	113.20a	45° VERTICAL BEND
0+006.33	115.16a	112.69	45° VERTICAL BEND
0+007.05	115.00	112.62	45° BEND CW THURSTBLOCK
0+010.73	114.83	112.62	45° BEND CW THURSTBLOCK
0+013.17	115.03	112.68	DISTRICT METERING AREA CHAMBER
0+025.00	115.44	113.14	
0+030.55	115.85	113.45	11.25° BEND CW THURSTBLOCK
0+034.48	116.07	113.67	22.5° BEND CW THURSTBLOCK
0+042.47	116.40	113.85	22.5° BEND CW THURSTBLOCK
0+045.19	116.50	114.03	22.5° BEND CW THURSTBLOCK
0+050.12	116.55	114.18	22.5° BEND CW THURSTBLOCK
0+057.12	116.60	114.22	50 x 200 TEE
0+059.66	116.83	114.35	45° BEND CW THURSTBLOCK
0+065.04	116.92	114.48	45° BEND CW THURSTBLOCK
0+075.00	116.78	114.38	
0+084.26	116.65	114.28	50 x 200 TEE
0+088.09	116.71	114.45	HYDRANT AND VALVE
0+089.08	116.71	114.50	VALVE AND VALVE BOX
0+090.47	116.70	114.58	200 x 200 TEE
0+093.42	116.93	114.58	HYDRANT AND VALVE
0+094.57	116.76	114.43	CAP

WATERMAIN TABLE - BLOCK 4			
STATION	SURFACE ELEVATION	T/W ELEVATION	COMMENTS
0+000	112.99a	110.66	200 x 200 TEE
0+003.00	113.08a	110.80a	WM CROSSING OVER 200 SANITARY
0+003.22	112.97a	110.80a	45° VERTICAL BEND
0+003.72	112.97a	111.17a	45° VERTICAL BEND
0+005.00	112.99a	111.17a	WM CROSSING OVER 450 STORM
0+006.44	112.97a	111.17a	45° VERTICAL BEND
0+006.94	112.97a	110.62a	45° VERTICAL BEND
0+010.33	113.02	110.62	22.5° BEND CW THURSTBLOCK
0+013.44	113.10	110.66	DISTRICT METERING AREA CHAMBER
0+014.34	113.10	111.01	25 x 200 TEE
0+021.77	112.85	110.45	45° BEND CW THURSTBLOCK
0+023.41	113.02	110.62	22.5° BEND CW THURSTBLOCK
0+025.00	113.60	111.20	
0+025.41	113.60	111.20	200 x 200 x 150 TEE
0+039.94	114.33	111.93	45° BEND CW THURSTBLOCK
0+045.41	114.31	111.91	45° BEND CW THURSTBLOCK
0+049.59	114.38	111.98	45° BEND CW THURSTBLOCK
0+053.86	114.39	111.99	45° BEND CW THURSTBLOCK
0+075.00	114.34	111.98	
0+088.70	114.37	111.97	HYDRANT AND VALVE
0+092.42	114.29	111.89	45° BEND CW THURSTBLOCK
0+094.94	114.25	111.85	45° BEND CW THURSTBLOCK
0+097.50	114.27	111.87	VALVE AND VALVE BOX
0+100.00	115.19	111.67	
0+101.77	116.88	111.67	45° VERTICAL BEND
0+104.57	116.89	114.59	45° VERTICAL BEND
0+118.58	116.72	114.32	45° VERTICAL BEND
0+119.83	116.72	115.57	45° VERTICAL BEND
0+121.73	116.72	115.57	CROSSING OVER 250 STORM
0+123.23	116.71	115.57	CROSSING OVER 200 SANITARY
0+123.55	116.70	115.57	45° VERTICAL BEND
0+124.81	116.70	114.56	45° VERTICAL BEND
0+126.23	116.70	114.56	200 x 200 TEE

ROOF DRAIN TABLE - NUMBER OF NOTCHES AND MAXIMUM RELEASE RATES FOR EACH ROOF DRAIN (AREA 10 & AREA 11 - IDENTICAL ROOFS FOR BLOCK 3 AND BLOCK 4)						
ROOF DRAIN ID	CATCHMENT AREA (ha)	NUMBER OF NOTCHES ¹	MODIFIED RATIONAL METHOD (100yr EVENT) RELEASE RATE (L/s)	MAXIMUM STORAGE USED (m³)	MAXIMUM RELEASE RATE ² (L/s)	MAXIMUM STORAGE (m³)
R1	0.007	1	0.52	2.50	0.56	3.08
R2	0.009	2	0.94	2.33	1.12	3.88
R3	0.010	2	0.96	2.78	1.12	4.41
R4	0.009	2	0.94	2.27	1.12	3.61
R5	0.006	2	0.95	1.98	1.12	3.23
R6	0.019	4	1.88	5.50	2.24	9.20
R7	0.015	3	1.44	4.28	1.68	6.75
R8	0.020	4	1.89	5.72	2.24	9.45
R9	0.008	1	0.53	2.93	0.56	3.54
R10	0.007	1	0.50	2.10	0.56	2.86
R11	0.006	1	0.50	2.09	0.56	2.85
R12	0.007	1	0.50	2.13	0.56	2.90
R13	0.008	1	0.53	2.91	0.56	3.51

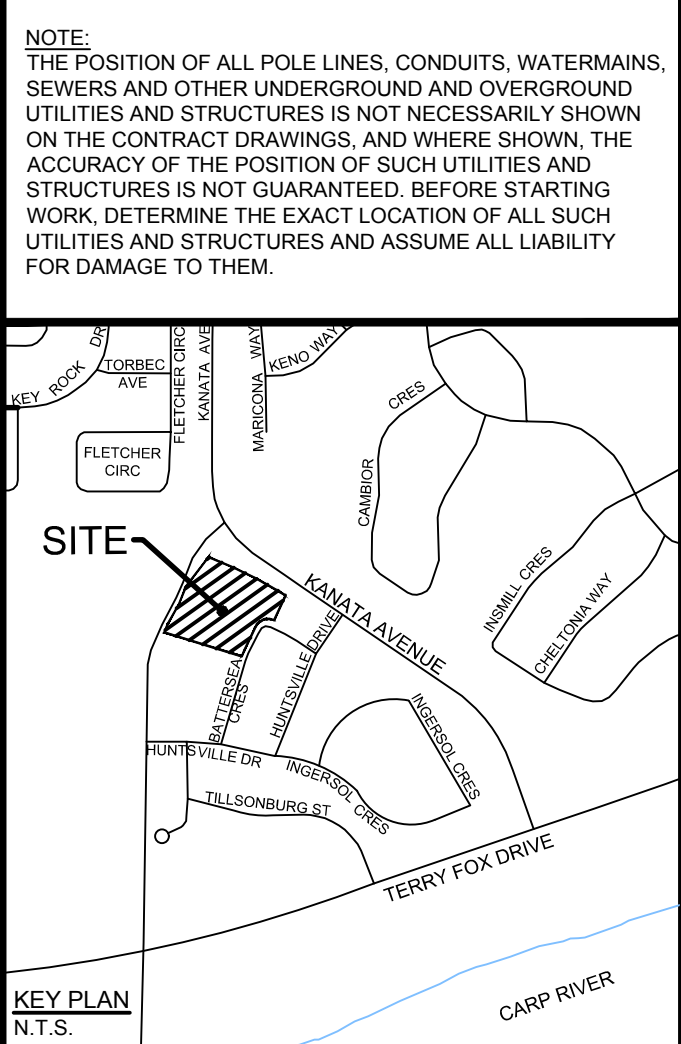
NOTE:
1) ZURN FLOW CONTROL TYPE ROOF DRAIN X4 MAX REDUCED; PROVIDES 0.98L/s / NOTCH @ 0.15m OF HEAD.
2) ASSUMES 0.15m OF HEAD.

PROPOSED PIPE CROSSING TABLE			
CROSSING #	WATERMAIN	STORM	SANITARY
1	115.37 BWM 115.57 TWV		114.41 INV 114.55 OBV
2	115.37 BWM 115.57 TWV		115.11 OBV
3	111.88 BWM 112.08 TWV		110.32 INV 111.63 OBV
4	111.18 BWM 111.38 TWV		110.45 INV 111.28 OBV
5	111.28 BWM 111.43 TWV		110.95 INV 111.15 OBV
6	111.04 BWM 111.24 TWV		112.45 INV 112.55 OBV
7	111.04 BWM 111.24 TWV		112.45 INV 112.55 OBV
8	111.04 BWM 111.24 TWV		112.45 INV 112.55 OBV
9	111.04 BWM 111.24 TWV		112.45 INV 112.55 OBV
10		110.03 INV 110.41 OBV	110.71 INV 110.91 OBV

* OBVERT AND INVERT INCLUDE THICKNESS OF CONCRETE PIPE

APPROVED ☐ REFUSED ☐
THIS ____ DAY OF _____, 20____
DERRICK MOODIE, MANAGER
DEVELOPMENT REVIEW WEST
PLANNING, INFRASTRUCTURE AND ECONOMIC
DEVELOPMENT DEPARTMENT, CITY OF OTTAWA

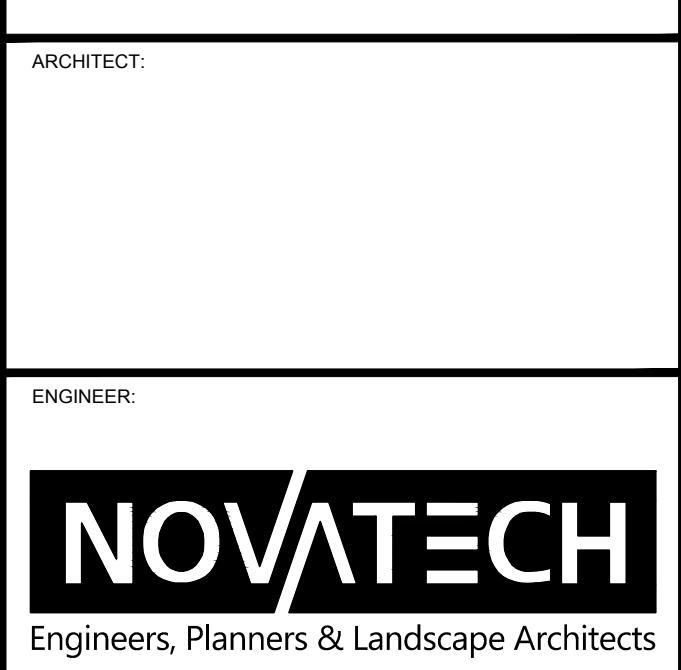
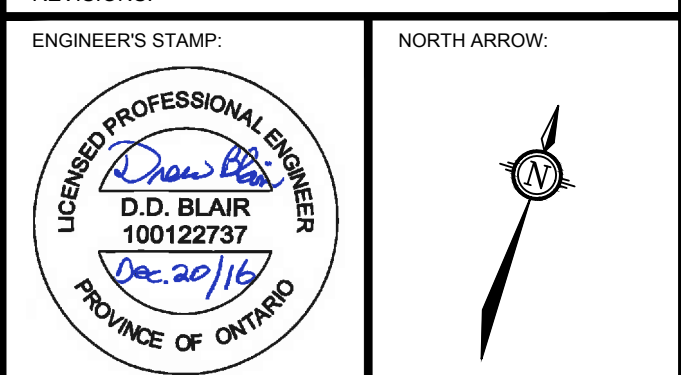
REFER TO 110105-LEG2 FOR ADDITIONAL NOTES



NOTE:
THE POSITION OF ALL POLE LINES, CONDUITS, WATERMAINS, SEWERS AND OTHER UNDERGROUND AND OVERGROUND UTILITIES AND STRUCTURES IS NOT NECESSARILY SHOWN ON THE CONTRACT DRAWINGS, AND WHERE SHOWN, THE ACCURACY OF THE POSITION OF SUCH UTILITIES AND STRUCTURES IS NOT GUARANTEED. BEFORE STARTING WORK, DETERMINE THE EXACT LOCATION OF ALL SUCH UTILITIES AND STRUCTURES AND ASSUME ALL LIABILITY FOR DAMAGE TO THEM.

GEODEIC BENCHMARK	
HUNTLEY	IRON PIPE WITH BRASS CAP, IN EASTERN SECTION OF A CROSSROAD INTERSECTION ALONG HUNTLEY MARCH TOWNSHIP ROAD, 6.1m SOUTHEAST FROM JUNCTION WITH HIGHWAY NO. 17, 40.8m NORTHEAST FROM CENTRE OF INTERSECTION, 13.7m FROM MIDDLE OF ROAD, 60m BELOW ROAD LEVEL
UTM ZONE 18	
N: 5017820	
E: 452840	
ELEV: 98.710	

23	REVISED SITE PLAN APPLICATION	DEC 2016
22	ISSUED FOR CONSTRUCTION	NOV 28/16
21	GRADING AND SERVING REVISED PER CLIENT COMMENTS	NOV 16/16
20	REISSUED FOR SITE PLAN APPROVAL	JUNE 24/16
19	ISSUED FOR SITE PLAN APPROVAL	JUNE 3/16
18	REISSUED FOR SITE PLAN APPLICATION	MAR 04/16
17	REISSUED FOR SITE PLAN APPLICATION	JAN 21/16
16	REVISED SITE PLAN APPLICATION	SEPT 4/15
15	REVISED PHASING	AUG 14/14
14	REVISED CURB LAYOUT AND CBS LOCATION	JULY 18/14
13	REVISED WATER SERVICE CONNECTION TO BLOCK 1	JAN 27/14
12	ISSUED FOR CONSTRUCTION	JULY 08/13
11	REVISED SERVING AND USE ELEVATIONS	FEB 12/13
10	REVISED BLOCK 9 FOR APPROVAL	FEB 8/13
9	ISSUED BUILDING SERVICES	FEB 4/13
8	ISSUED FOR CONTACT EXECUTION/ CONSTRUCTION BLASTING ONLY	JAN 09/13
7	CONSTRUCTION PHASING	DEC 14/12
6	FINAL ISSUE FOR SITE PLAN APPROVAL	FEB 01/12
5	ISSUED FOR TENDER	JAN 30/12
4	REVISED PER TRANSFORMER LOCATIONS	JAN 05/12
3	REVISED PER CITY COMMENTS	NOV 3/11
2	REVISED PER CITY COMMENTS	SEPT 07/11
1	ISSUED FOR SITE PLAN CONTROL APPLICATION	MAR 28/11
No.	DESCRIPTION	DATE



KANATA LAKES
124 BATTERSEA CRESCENT
OTTAWA ONTARIO

PROJECT TITLE:
SHEET TITLE:
GENERAL PLAN OF SERVICES
DRAWN: RBG
SCALE: 1:250
PROJECT No: 110105
CHECKED: MSP
SHEET No:
110105-GP2

D07-12-15-0150