GENERAL NOTES:

1. ALL WORKS AND MATERIALS SHALL CONFORM TO THE LATEST REVISIONS OF THE STANDARDS AND SPECIFICATIONS OF THE CITY OF OTTAWA, AND ONTARIO PROVINCIAL STANDARD DRAWINGS (OPSD) AND SPECIFICATIONS (OPSS), AS AMENDED BY THE CITY OF OTTAWA.
2. THE CONTRACTOR SHALL CONFIRM THE LOCATION OF ALL EXISTING UTILITIES WITHIN THE SITE AND ADJACENT WORK AREAS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR PROTECTING ALL EXISTING UTILITIES TO THE SATISFACTION OF THE AUTHORITY HAVING JURISDICTION. THE CONTRACTOR SHALL BE RESPONSIBLE FOR REPAIR OR REPLACEMENT OF ANY SERVICES OR UTILITIES DISTURBED DURING CONSTRUCTION, TO THE SATISFACTION OF THE AUTHORITY HAVING JURISDICTION.
3. ALL DIMENSIONS SHALL BE CHECKED AND VERIFIED IN THE FIELD BY THE CONTRACTOR PRIOR TO THE START OF CONSTRUCTION. ANY DISCREPANCIES SHALL BE REPORTED IMMEDIATELY TO THE ENGINEER.
4. ANY AREAS BEYOND THE LIMIT OF THE SITE DISTURBED DURING CONSTRUCTION SHALL BE RESTORED TO ORIGINAL CONDITION OR BETTER TO THE SATISFACTION OF THE AUTHORITY HAVING JURISDICTION AT THE CONTRACTORS EXPENSE.
5. RELOCATION OF EXISTING SERVICES AND/OR UTILITIES SHALL BE AS SHOWN ON THE DRAWINGS OR AS DIRECTED BY THE ENGINEER AT THE EXPENSE OF THE DEVELOPER.
6. ALL WORK SHALL BE COMPLETED IN ACCORDANCE WITH THE "OCCUPATIONAL HEALTH AND SAFETY ACT AND REGULATIONS FOR CONSTRUCTION PROJECTS". THE GENERAL CONTRACTOR SHALL BE DEEMED TO BE THE CONSTRUCTOR AS DEFINED IN THE ACT.
7. ALL CONSTRUCTION SIGNING MUST CONFORM TO THE M.T.O. MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES (LATEST AMENDMENT).
8. ALL DIMENSIONS ARE IN METERS UNLESS OTHERWISE SPECIFIED.
9. THE SUPPORT OF ALL UTILITIES SHALL BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE AUTHORITY HAVING JURISDICTION.
10. THERE WILL BE NO SUBSTITUTION OF MATERIALS UNLESS PRIOR WRITTEN APPROVAL BY THE DIRECTOR OF ENGINEERING HAS BEEN OBTAINED.
11. ALL SEWERS SHALL BE INSTALLED WITH LASER AND CHECKED WITH LEVEL INSTRUMENT PRIOR TO BACKFILLING.
12. THE CONTRACTOR WILL BE RESPONSIBLE FOR ADDITIONAL BEDDING OR ADDITIONAL STRENGTH PIPE IF THE MAXIMUM TRENCH WIDTH, AS SPECIFIED BY OPSD, IS EXCEEDED.
13. ALL PIPE / CULVERT / SECTION SIZES REFER TO INSIDE DIMENSIONS.
14. SHOULD DEEPLY BURIED ARCHAEOLOGICAL REMAINS BE FOUND ON THE PROPERTY DURING CONSTRUCTION ACTIVITIES, THE HERITAGE OPERATIONS UNIT OF THE ONTARIO MINISTRY OF CULTURE MUST BE NOTIFIED IMMEDIATELY.
15. STREET LIGHTING TO CITY OF OTTAWA STANDARDS.
16. ALL NECESSARY CLEARING AND GRUBBING SHALL BE COMPLETED BY THE CONTRACTOR. REVIEW WITH CONTRACT ADMINISTRATOR AND THE CITY OF OTTAWA PRIOR TO ANY TREE CUTTING.
17. CONTRACTOR SHALL PERFORM LEAKAGE TESTING, IN THE PRESENCE OF THE CONSULTANT, FOR SANITARY SEWERS IN ACCORDANCE WITH OPSS 410 AND OPSS 407. CONTRACTOR SHALL PERFORM VIDEO INSPECTION OF ALL STORM AND SANITARY SEWERS. A COPY OF THE VIDEO AND INSPECTION REPORT SHALL BE SUBMITTED TO THE CONSULTANT FOR REVIEW.
18. AS PER GEOTECHNICAL CONSULTANT'S RECOMMENDATIONS, THE CLAY SEALS SHOULD BE AT LEAST 1.5m LONG (IN THE TRENCH DIRECTION) AND SHOULD EXTEND FROM TRENCH WALL TO TRENCH WALL. GENERALLY, THE SEALS SHOULD EXTEND FROM THE FROST LINE AND FULLY PENETRATE THE BEDDING, SUBBEDDING AND COVER MATERIAL. THE BARRIERS SHOULD CONSIST OF RELATIVELY DRY AND COMPACTABLE BROWN SILTY CLAY PLACED IN MAXIMUM 225mm THICK LOOSE LAYERS COMPACTED TO A MINIMUM OF 95% OF THE MATERIAL'S SPMDD. THE CLAY SEALS SHOULD BE PLACED AT THE SITE BOUNDARIES AND AT STRATEGIC LOCATIONS AT NO MORE THAN 60m INTERVALS IN THE SERVICE TRENCHES.
19. AS PER GEOTECHNICAL CONSULTANT'S RECOMMENDATIONS, THE CLAY SEAL IS ONLY REQUIRED WITHIN THE GRANULAR MATERIAL SURROUNDING THE PIPE. THE EXCAVATED SILTY CLAY WILL BE REUSED AS TRENCH BACKFILL WHICH WILL ACT AS A CLAY SEAL.
20. AS PER GEOTECHNICAL CONSULTANT'S RECOMMENDATIONS, AT LEAST 150mm OF OPSS GRANULAR A SHOULD BE USED FOR PIPE BEDDING FOR SEWER AND WATER PIPES. WHERE THE INVERT OF THE EXCAVATION IS BELOW THE STIFF CRUST AND INTO THE GREY SILTY CLAY, THE THICKNESS OF THE BEDDING SHOULD BE INCREASED TO 300mm. THE BEDDING SHOULD EXTEND TO THE SPRING LINE OF THE PIPE. COVER MATERIAL, FROM THE SPRING LINE TO AT LEAST 300mm ABOVE THE OBVERT OF THE PIPE SHOULD CONSIST OF OPSS GRANULAR A. THE BEDDING AND COVER MATERIALS SHOULD BE PLACED IN MAXIMUM 300mm THICK LIFTS COMPACTED TO A MINIMUM OF 99% OF THE MATERIAL'S SPMDD.
21. FOR HOUSE CONNECTIONS INSTALLED UNDER STEPS AND PORCHES, SLEEVE SHALL BE USED.

STORM NOTES:

1. ALL REINFORCED CONCRETE STORM SEWER PIPE SHALL BE IN ACCORDANCE WITH CSA A257.2 (LATEST AMENDMENT). ALL NON-REINFORCED CONCRETE STORM SEWER PIPE SHALL BE IN ACCORDANCE WITH CSA A257.1 (LATEST AMENDMENT). PIPE SHALL BE JOINTED WITH STD. RUBBER GASKETS AS PER CSA A257.3 (LATEST AMENDMENT).
2. ALL STORM SEWER TRENCH AND BEDDING SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA STD. S6 AND S7 CLASS 'B' UNLESS OTHERWISE SPECIFIED. BEDDING AND COVER MATERIAL SHALL BE SPECIFIED BY PROJECT GEOTECHNICAL ENGINEER.
3. ALL PVC STORM SEWERS ARE TO BE SDR 35 APPROVED PER C.S.A. B182.2 OR LATEST AMENDMENT, UNLESS OTHERWISE SPECIFIED.
4. ALL STORM LATERALS SHALL BE PVC SDR 28, WHITE IN COLOR AND MARKED WITH A 50mm x 100mm WOODEN MARKER EXTENDING FROM THE INVERT TO 1.0m ABOVE GRADE PAINTED GREEN. HOUSE CONNECTIONS SHALL BE 2.0 m MIN. BELOW FINISHED GRADE AT STREET LINE WHERE POSSIBLE. SINGLE CONNECTIONS SHALL BE 100mm DIA..
5. STORM MANHOLE FRAME AND COVERS SHALL BE AS PER CITY OF OTTAWA STD. S24.1 AND S25.
6. SAFETY PLATFORMS SHALL BE IN ACCORDANCE WITH OPSD 404.02.
7. DROP STRUCTURES SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA SPECIFICATIONS AND OPSD 1003.01.
8. STORM SEWER MANHOLES SERVING LOCAL SEWERS LESS THAN 900mm SHALL BE CONSTRUCTED WITH A 300mm SUMP. FOR STORM SEWERS 900mm AND OVER USE BENCHING IN ACCORDANCE WITH OPSD 701.021.
9. SINGLE AND DOUBLE CATCH BASINS SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA STD. S1. AND OPSD 705.020, RESPECTIVELY. FRAMES AND GRATE SHALL BE AS PER CITY OF OTTAWA STD. S19 FOR REAR LOT CATCH BASINS AND STREET CATCH BASINS.
10. CURB INLET TYPE CATCH BASIN (CICB) SHALL BE USED IN SPECIFIC LOCATIONS IN ACCORDANCE WITH CITY OF OTTAWA STD. S3. FRAME AND GRATE SHALL BE AS PER CITY OF OTTAWA STD. S22 AND S23, UNLESS OTHERWISE NOTED.
11. SINGLE AND DOUBLE CATCHBASIN LEADS SHALL BE 200mm DIA (MIN.), AT 1.0% SLOPE (MIN.), UNLESS OTHERWISE NOTED. WHERE REAR LOT CATCHBASINS CONNECT TO STREET CATCHBASINS, SINGLE AND DOUBLE CATCHBASIN LEADS SHALL BE 250mm DIA (MIN.), AT 1.0% SLOPE (MIN.), UNLESS OTHERWISE NOTED. CB LEAD OUT INVERT TO BE SET 1.38m BELOW TOP OF GRATE ELEVATION UNLESS OTHERWISE NOTED.
12. ALL STREET CATCHBASINS/CATCHBASIN MANHOLES SHALL HAVE 600mm SUMPS, AND ALL REAR YARD CATCHBASINS (OPSD 705.010) SHALL HAVE 300mm SUMPS UNLESS OTHERWISE NOTED. REAR YARD LANDSCAPE CATCHBASINS TO BE SUMPLESS.
13. CONTRACTOR SHALL ENSURE THAT CATCHBASINS ARE INSTALLED AT THE LOW POINT OF SAG CURB WORKS.
14. THE STORM SEWER CLASSES HAVE BEEN DESIGNED BASED ON BEDDING CONDITIONS SPECIFIED ABOVE. WHERE THE SPECIFIED TRENCH WIDTH IS EXCEEDED, THE CONTRACTOR SHALL BE REQUIRED TO PROVIDE ADDITIONAL BEDDING, A DIFFERENT TYPE OF BEDDING OR A HIGHER PIPE STRENGTH AT THEIR OWN EXPENSE AND SHALL ALSO BE RESPONSIBLE FOR EXTRA TEMPORARY AND/OR PERMANENT REPAIRS MADE NECESSARY BY THE WIDENED TRENCH.
15. THE MINIMUM DIAMETER FOR REAR LOT PERFORATED PIPE IS 250mm, REFER TO CITY STD. S29 FOR DETAIL, UNLESS OTHERWISE NOTED.
16. FOR TWO OR MORE REAR LOT CATCH BASINS CONNECTED IN SERIES, THE LEAD FROM THE LAST REAR LOT CB TO THE STORM SEWER SHALL BE SOLID PIPE.
17. ALL STORM SEWERS WITH LESS THAN 2.0m COVER TO BE INSULATED PER CITY STANDARDS S35.

SANITARY NOTES:

1. ALL SANITARY SEWER INSTALLATION SHALL CONFORM TO THE LATEST REVISIONS OF THE CITY OF OTTAWA AND THE ONTARIO PROVINCIAL STANDARD DRAWINGS (OPSD) AND SPECIFICATIONS (OPSS) AS AMENDED BY THE CITY OF OTTAWA.
2. ALL SANITARY SEWERS SHALL BE PVC SDR 35, IPEX "RING-TITE" (OR EQUIVALENT), AS PER CSA STANDARD B182.2 OR LATEST AMENDMENT, UNLESS OTHERWISE NOTED.
3. SANITARY SEWER TRENCH AND BEDDING SHALL BE AS PER CITY OF OTTAWA STD. S6 AND S7, CLASS 'B' BEDDING UNLESS OTHERWISE NOTED.BEDDING AND COVER MATERIAL SHALL BE SPECIFIED BY PROJECT GEOTECHNICAL ENGINEER.
4. ALL SANITARY LATERALS ARE TO BE PVC SDR 28, IPEX "RING-TITE" (OR EQUIVALENT), WHITE IN COLOUR AND MARKED WITH A 50mm x 100mm WOODEN MARKER, EXTENDING FROM THE INVERT TO 1.0 m ABOVE GRADE PAINTED RED. HOUSE CONNECTIONS SHALL BE 2.75m BELOW FINISHED GRADE AT STREET LINE WHERE POSSIBLE. SINGLE CONNECTIONS SHALL BE 135mm DIA..
5. SANITARY MANHOLE FRAME AND COVERS SHALL BE AS PER CITY OF OTTAWA STD. S24 AND S25.
6. SAFETY PLATFORMS SHALL BE AS PER OPSD 404.02.
7. DROP STRUCTURES SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA SPECIFICATIONS AND OPSD 1003.01.
8. SANITARY SEWER MANHOLES SHALL BE BENCHED AS PER OPSD 701.021.
9. FOR SANITARY MANHOLES, DEPENDING ON THE ELEVATION OF THE GROUNDWATER TABLE, AND SUBJECT TO THE RECOMMENDATION OF THE PROJECT GEOTECHNICAL CONSULTANT, CRETEX SEALS, OR A SIMILAR PRODUCT, SHALL BE INSTALLED IN THE FIRST PRE-CAST MANHOLE SECTION TO JUST BELOW THE MANHOLE FRAME TO PREVENT INFILTRATION.
10. SANITARY MANHOLE FRAME AND COVERS SHALL BE AS PER CITY OF OTTAWA STD. S24 AND S25, EXCEPT FOR WHERE IN PONDING AREAS, WHERE WATERTIGHT FRAME AND COVERS SHALL BE EAST JORDAN CAMPRESSION 41420049W01 AS PER CITY OF OTTAWA MS-22.15 (OR APPROVED EQUIVALENT)

WATER NOTES:

1. ALL WATERMAIN INSTALLATION SHALL CONFORM TO THE LATEST REVISIONS OF THE CITY OF OTTAWA AND THE ONTARIO PROVINCIAL STANDARD DRAWINGS (OPSD) AND SPECIFICATIONS (OPSS) AS AMENDED BY THE CITY OF OTTAWA.
2. ALL PVC WATERMAINS SHALL BE EQUAL TO AWWA C-900 CLASS 150, SDR 18.
3. WATERMAIN TRENCH AND BEDDING SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA STANDARD W17, UNLESS OTHERWISE SPECIFIED. BEDDING AND COVER MATERIAL SHALL BE SPECIFIED BY PROJECT GEOTECHNICAL ENGINEER.
4. ALL PVC WATERMAINS SHALL BE INSTALLED WITH A 10 GAUGE STRANDED COPPER TWU OR RWU TRACER WIRE IN ACCORDANCE WITH CITY OF OTTAWA STD. W36.
5. WATER SERVICES ARE TO BE TYPE K SOFT COPPER AS PER CITY OF OTTAWA STD. W26 UNLESS OTHERWISE SPECIFIED. SINGLE SERVICES SHALL BE 19mm DIA. PEX. WATER SERVICES SHALL BE MARKED WITH A "50mm x 100mm", EXTENDING FROM THE INVERT TO 1.0m ABOVE GRADE PAINTED BLUE. CURB STOPS SHALL BE INSTALLED AT THE PROPERTY LINE.
6. CATHODIC PROTECTION IS REQUIRED ON ALL METALLIC FITTINGS AS PER CITY OF OTTAWA STD. W40 AND W42.
7. CONTRACTOR TO SUPPLY HYDRANT EXTENSION TO ADJUST THE LENGTH OF HYDRANT BARREL AS REQUIRED.
8. FIRE HYDRANTS SHALL BE INSTALLED AS PER CITY OF OTTAWA STD. W19, AND LOCATED AS PER CITY STD. W18.
9. VALVE IN BOXES SHALL BE INSTALLED AS PER CITY OF OTTAWA STD. W24.
10. 50mm DIAMETER WATERMAINS SHALL BE PEX OR TYPE 'K' COPPER TUBING. WATERMAIN INSTALLATION IN CUL-DE-SAC TO BE INSTALLED AS PER CITY OF OTTAWA STD. W37.
11. WATERMAIN IN FILL AREAS TO BE INSTALLED WITH RESTRAINED JOINTS AS PER CITY OF OTTAWA STD. W25.5 AND W25.6.
12. THRUST BLOCKING OF WATERMAIN TO BE INSTALLED AS PER CITY OF OTTAWA STD. W25.3 AND W25.4.
13. THE CONTRACTOR SHALL PROVIDE ALL TEMPORARY CAPS, PLUGS AND BLOW-OFFS AND NOZZLES REQUIRED FOR TESTING AND DISINFECTION OF THE WATERMAIN.
14. INSULATION FOR WATERMAIN CROSSING OVER AND BELOW SEWER SHOULD BE IN ACCORDANCE WITH CITY OF OTTAWA STD. W25.2 AND W25, RESPECTIVELY, WHERE WATERMAIN COVER IS LESS THAN 2.4m.
15. WHERE THE SEPARATION BETWEEN SERVICES AND MANHOLES IS LESS THAN 1.2m, WATER SERVICES ARE TO BE INSULATED AS PER CITY STD. W23.
16. AS PER MOE GUIDELINE, THE MINIMUM VERTICAL CLEARANCE BETWEEN WATERMAIN AND SEWER / UTILITY IS 0.50m. FOR CROSSING UNDER SEWER, ADEQUATE STRUCTURAL SUPPORT FOR THE SEWERS IS REQUIRED TO PREVENT EXCESSIVE DEFLECTION OF JOINTS AND SETTLING. THE LENGTH OF WATER PIPE SHALL BE CENTRED AT THE POINT OF CROSSING SO THAT THE JOINTS WILL BE EQUIDISTANT AND AS FAR AS POSSIBLE FROM THE SEWER.

ROADWORK NOTES:

1. ALL TOPSOIL AND ORGANIC MATERIAL SHALL BE STRIPPED WITHIN THE ROAD ALLOWANCE PRIOR TO THE COMMENCEMENT OF CONSTRUCTION.
2. CONCRETE CURB SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA STD. SC1.1 (BARRIER CURB) AND SC1.3 (MOUNTABLE CURB). PROVISION SHALL BE MADE FOR CURB DEPRESSIONS AT SIDEWALKS AND DRIVEWAYS.
3. ROAD SUBDRAINS SHALL BE REFERENCE TO R1, AS SUGGESTED IN RG4683-2, SUBDRAIN INVERTS TO BE APPROXIMATELY 300mm BELOW SUBGRADE LEVEL
4. CONCRETE SIDEWALK SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA STD. SC3 AND SC1.4.
5. PAVEMENT REINSTATEMENT FOR SERVICE AND UTILITY CUTS SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA STD. R10 AND OPSD 509.010, OPSS 310.
6. GRANULAR "A" SHALL BE PLACED TO A MINIMUM THICKNESS OF 300mm AROUND ALL STRUCTURES WITHIN PAVEMENT AREA.
7. ALL GRANULAR FOR ROADS SHALL BE COMPACTED TO A MINIMUM OF 99% STANDARD PROCTOR DENSITY.
8. ASPHALT WEAR COURSE SHALL NOT BE PLACED UNTIL THE VIDEO INSPECTION OF SEWERS & NECESSARY REPAIRS HAVE BEEN CARRIED OUT TO THE SATISFACTION OF THE CONSULTANT.
9. SUB-EXCAVATE SOFT AREAS AND FILL WITH GRANULAR 'B' COMPACTED IN MAXIMUM 300 mm LIFTS.
10. PEDESTRIAN CURB RAMP WITH BOULEVARD SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA STD. SC7.
11. PAVEMENT DESIGN TYPE (SEE DWG. 3 FOR PAVEMENT DESIGN TYPE LAYOUT)

ACCESS LANES & HEAVY DUTY TRUCK PARKING
- 40mm SUPERPAVE 12.5 ASPHALTIC CONCRETE
- 50mm SUPERPAVE 19.0 ASPHALTIC CONCRETE
- 150mm OPSS GRANULAR A CRUSHED STONE
- 450mm OPSS GRANULAR B TYPE II
- SUBGRADE

DRIVEWAYS AND PARKING AREAS
- 50mm HL-3 OR SUPERPAVE 12.5 ASPHALTIC CONCRETE
- 150mm OPSS GRANULAR A CRUSHED STONE
- 300mm GRANULAR B TYPE II
- SUBGRADE

GRADING NOTES:

1. A FLAT AREA HAVING A WIDTH OF 0.6m SHALL BE PROVIDED AT THE BOUNDARY LIMITS ADJACENT DEVELOPED PROPERTIES IN ORDER THAT THE EXISTING BOUNDARY ELEVATIONS SHALL BE MAINTAINED.
2. ALL ROOF DOWNSPOUTS SHALL DISCHARGE TO THE GROUND ONTO SPLASH PADS AND SHALL NOT BE CONNECTED TO THE STORM SEWER, OR THE BUILDING FOUNDATION DRAIN.
3. ALL WORK SHALL BE COMPLETED IN ACCORDANCE WITH THE "OCCUPATIONAL HEALTH AND SAFETY ACT AND REGULATIONS FOR CONSTRUCTION PROJECTS." THE GENERAL CONTRACTOR SHALL BE DESIGNATED AS THE CONSTRUCTOR AS DEFINED IN THE ACT.
4. PRIOR TO THE COMMENCEMENT OF THE SITE GRADING WORKS, ALL SILTATION CONTROL DEVICES SHALL BE INSTALLED AND OPERATIONAL. THE CONTRACTOR SHALL MAINTAIN ALL WORKS UNTIL SERVICING CONSTRUCTION IS COMPLETED TO THE SATISFACTION OF THE ENGINEER AND THE CITY OF OTTAWA.
5. ALL SWALES SHALL BE 0.15m DEEP WITH 3:1 SIDE SLOPES UNLESS OTHERWISE INDICATED. THE MINIMUM LONGITUDINAL SLOPE IS 1% AND 1.5% WITH INSTALLATION OF SUBDRAIN OR WITHOUT, RESPECTIVELY.
6. TOP OF GRATE (T/G) ELEVATIONS FOR ALL STREET CATCHBASINS SHOWN ON PLANS, REFER TO THE ELEVATIONS AT GUTTER OR EDGE OF PAVEMENT, WHERE APPLICABLE.

EROSION AND SEDIMENT CONTROL NOTES:

1. PRIOR TO TOPSOIL STRIPPING, EARTHWORKS, OR UNDERGROUND CONSTRUCTION, EROSION AND SEDIMENT CONTROLS SHALL BE IMPLEMENTED TO THE SATISFACTION OF THE AUTHORITY HAVING JURISDICTION.
2. SEDIMENT CONTROL FENCE SHALL BE CLEANED AND MAINTAINED IN GOOD REPAIR BY CONTRACTOR.
3. SEDIMENT CONTROL FENCE TO REMAIN IN PLACE UNTIL THE WORKING AREA HAS BEEN STABILIZED AND REVEGETATED.
4. ACCUMULATED SEDIMENT TO BE REMOVED OFF SITE PRIOR TO THE REMOVAL OF SEDIMENT CONTROL FENCE.
5. CONTRACTOR TO INSTALL AND MAINTAIN MUD MAT AT CONSTRUCTION ACCESS IN ORDER TO PREVENT MUD TRACKING ONTO ADJACENT ROADS. MUD MAT TO BE MINIMUM 30m LONG AND 10.0m WIDE AND SHALL CONSIST OF 0.3m OF 50mm CLEAR STONE.

GEOTECHNICAL REPORT/MEMO:

1. REFER TO:
 - GEOTECHNICAL INVESTIGATION REPORT NO. PG5570-2-REV5, DATED JULY 9, 2025 BY PATERSON GROUP

INFORMATION PRESENTED ON THESE DRAWINGS HAS BEEN INTERPOLATED FROM THE GEOTECHNICAL REPORTS AND ACCURACY IS NOT GUARANTEED. CONTRACTORS ARE ADVISED TO READ THE GEOTECHNICAL REPORTS AND ASSUME THEIR OWN CONCLUSIONS.

SPILLS CONTROL NOTES:

1. ALL CONSTRUCTION EQUIPMENT SHALL BE REFUELED, MAINTAINED AND STORED NO LESS THAN 30 METERS FROM THE WATERCOURSES, STREAMS, CREEKS, WOODLOTS AND ANY ENVIRONMENTALLY SENSITIVE AREAS, OR AS OTHERWISE SPECIFIED.
2. THE CONTRACTOR MUST IMPLEMENT ALL NECESSARY MEASURES IN ORDER TO PREVENT LEAKS, DISCHARGES OR SPILLS OF POLLUTANTS, DELETERIOUS MATERIALS, OR OTHER SUCH MATERIALS OR SUBSTANCES WHICH WOULD OR COULD CAUSE AN ADVERSE IMPACT TO THE NATURAL ENVIRONMENT.
3. IN THE EVENT OF A LEAK, DISCHARGE OR SPILL OF A POLLUTANT, DELETERIOUS MATERIAL OR OTHER SUCH MATERIAL OR SUBSTANCE WHICH WOULD OR COULD CAUSE AN ADVERSE IMPACT TO THE NATURAL ENVIRONMENT, THE CONTRACTOR SHALL:

a). IMMEDIATELY NOTIFY THE APPROPRIATE FEDERAL, PROVINCIAL AND LOCAL GOVERNMENT MINISTRIES, DEPARTMENTS, AGENCIES AND AUTHORITIES OF THE INCIDENT IN ACCORDANCE WITH ALL CURRENT LAWS, LEGISLATION, ACTS, BY-LAWS, PERMITS, APPROVALS, ETC.

b). TAKE IMMEDIATE MEASURES TO CONTAIN THE MATERIAL OR SUBSTANCE, AND TO TAKE SUCH MEASURES AS THEY DEEM APPROPRIATE TO MITIGATE AGAINST THE ANY ADVERSE IMPACTS TO THE NATURAL ENVIRONMENT.

c). THE CONTRACT SHALL RESTORE THE AFFECTED AREA TO ORIGINAL CONDITION OR BETTER, ALL TO THE SATISFACTION OF THE AUTHORITIES HAVING JURISDICTION.

RETAINING WALLS:

1. PRE-CAST UNIT RETAINING WALL TYPE TO BE SPECIFIED BY PROJECT LANDSCAPE ARCHITECT AT LOCATIONS, AS SPECIFIED ON THE GRADING PLAN(S) TO BE APPROVED BY AUTHORITIES HAVING JURISDICTION.
2. ALL RETAINING WALLS SHALL BE CONCRETE, CONCRETE PRODUCT WITH TIE-BACK SYSTEM OR HEAVY BLOCK SYSTEM.
3. ALL TYPICAL RETAINING WALLS GREATER THAN 1.0m HEIGHT ARE TO BE DESIGNED, APPROVED AND STAMPED BY A CONSULTING ENGINEER SPECIALIZING IN STRUCTURAL ENGINEERING.
4. PRIOR TO THE START OF CONSTRUCTION, THE CONTRACTOR SHALL PROVIDE SHOP DRAWINGS CERTIFIED BY A STRUCTURAL ENGINEER.
5. UPON COMPLETION OF CONSTRUCTION, THE CONTRACTOR SHALL PROVIDE A CERTIFICATE FROM A STRUCTURAL ENGINEER CERTIFYING THAT THE WALL HAS BEEN CONSTRUCTED IN CONFORMANCE WITH THE APPROVED ENGINEERING DRAWINGS AND THE CERTIFIED SHOP DRAWINGS.
6. FENCES OR RAILINGS ARE REQUIRED FOR WALLS HIGHER THAN 0.6m.
7. RETAINING WALLS INCLUDING ALL COMPONENTS SHALL BE LOCATED AT A MINIMUM OF 0.15m FROM ANY PROPERTY LINE.

CITY OF OTTAWA								
SEWER AND WATERMAIN INSULATION								
CALCULATION OF THICKNESS OF INSULATION								
Depth (m)	Ti	Using Ti						
(m)	(mm)	(mm)	As per City Standard (W22):					
1.20	100	100			Ti=	(2400 - H)		
1.25	96	100				12		
1.30	92	100						
1.35	88	100						
1.40	83	100						
1.45	79	100	where:	Ti =	Thickness of Insulation (mm), 50mm min.			
1.50	75	75		H =	H Depth of Cover above OD (mm)			
1.55	71	75						
1.60	67	75						
1.65	63	75						
1.70	58	75						
1.75	54	75						
1.80	50	50						
1.85	46	50						
1.90	42	50						
1.95	38	50						
2.00	33	50						
2.05	29	50						
2.10	25	50						
2.15	21	50						
2.20	17	50						
2.25	13	50						
2.30	8	50						

LEGEND

WATERMAIN

CROSS
45° BEND
LATERAL
HYDRANT, VALVE & VB
TEE
VALVE & VC
VALVE & VB
22.5° BEND
11.25° BEND
REDUCER
CAP

SANITARY

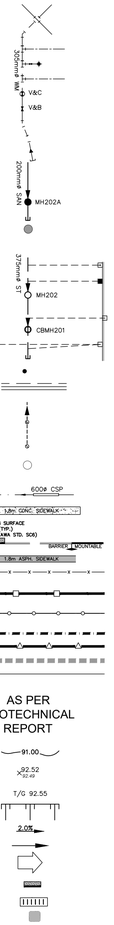
MAINTENANCE HOLE
CAP
EXISTING SANITARY MAINTENANCE HOLE

STORM

STREET CATCHBASIN & LEAD
STREET CATCHBASIN WITH CLOSED LID & LEAD
MAINTENANCE HOLE
CURB INLET CATCHBASIN & LEAD
CATCHBASIN/ MAINTENANCE HOLE
INTERCONNECTED CATCH BASIN & LEADS
CAP
WATER BOX
SINGLE SERVICE LOCATION (ST, SAN & WM)
TEE CATCHBASIN
PERFORATED PIPE
ELBOW CATCHBASIN
EXISTING STORM MAINTENANCE HOLE
DITCH AND CULVERT
CONCRETE SIDEWALK
CURB & DEPRESSED CURB
ASPHALT SIDEWALK
CHAINLINK FENCE (1.5m UNLESS OTHERWISE NOTED)
NOISE BARRIER
WOODEN POST AND RAIL FENCE
WOOD PRIVACY BARRIER
POST AND RAIL FENCE
PHASING LIMITS
PROPERTY BOUNDARY
BOREHOLE (BH)
TEST PIT (TP)
AUGER HOLE (AH)
MONITORING WELL LOCATION
CONCEPTUAL WELL LOCATION
CONTOUR
PROPOSED ELEVATION
EXISTING ELEVATION
TOP OF GRATE ELEVATION
PROPOSED TERRACING
SURFACE SLOPE
FLOW DIRECTION
MAJOR OVERLAND FLOW DIRECTION
TACTILE WALKING SURFACE INDICATOR (AS PER CITY OF OTTAWA STD. SC6)
BIKE RACK
EARTHBIN (DWG. 3 FOR DETAILS)

AS PER GEOTECHNICAL REPORT

91.00
92.52 / 92.49
T/G 92.55
2.0%



BUILDING ENVELOPE

TOP OF FOUNDATION ELEVATION — 90.56
FINISHED FLOOR ELEVATION — 92.85
UNDERSIDE OF FOOTING ELEVATION — 88.01
NUMBER OF RISERS — 6 / 7 / 31
UNITS REQUIRING PRESSURE REDUCING VALVES — PRV
WALKOUT UNITS — W.O.
SLAB ON GRADE — SOG
SANITARY DRAINAGE BOUNDARY
UPSTREAM MH TO DOWNSTREAM MH — 43A - 44A
AREA IN HECTARES — 0.78 / 61
POPULATION
STORM DRAINAGE BOUNDARY
UPSTREAM MH TO DOWNSTREAM MH — 43 - 44
AREA IN HECTARES — 0.37 / 0.51
RUNOFF COEFFICIENT
PONDING AREA
PONDING AREA ID — PA-1
PROPOSED SILT FENCE
PROPOSED SNOW FENCE
PROPOSED ROCK FLOW CHECK DAM
PROPOSED STRAW BALE BARRIER
PROPOSED STRAW BALE BARRIER WITH FILTER CLOTH
FILTER CLOTH FOR EXISTING STRUCTURE
PROPOSED RIP RAP TREATMENT
JOINT UTILITY TRENCH (HYDRO, BELL, CABLE) — H,B,C
DENOTES NUMBER OF UTILITY DUCTS — 2H,1B,1C
CONCRETE ENCASED DUCT
STREET LIGHT CABLE — SL
NATURAL GAS LINE — G
SERVICE ENTRANCE HYDRO, BELL, CABLE
END WALL BOX
CABLE PEDESTAL — C
CABLE GRADE LEVEL BOX — CGLB
BELL PEDESTAL — B
BELL GRADE LEVEL BOX FOR SPLICING — BGLB
BELL CENTRAL SPLITTING POINT — BSP
HYDRO TRANSFORMER
HYDRO MAINTENANCE HOLE
HYDRO POLE — HP
HYDRO POLE c/w GUY WIRE — HP
STREET LIGHT DISCONNECT — SD
STREET LIGHT STANDARD — S.L.S.
COMMUNITY MAILBOX — CMB
BUS STOP LOCATION c/w ASPHALT BOULEVARD — BUS
TREE
LOTS EQUIPPED WITH SUMP PUMP

NOT FOR CONSTRUCTION

TOPOGRAPHIC INFORMATION
TOPOGRAPHIC INFORMATION PROVIDED BY J.D. BARNES LIMITED
PROJECT No. 23-10-060-01. SURVEYS RECEIVED ON NOVEMBER 4, 2025.

ELEVATION NOTE
ELEVATIONS SHOWN ON THIS PLAN ARE GEODETIC RELATED TO CGVD28:78 VERTICAL DATUM

LEGAL INFORMATION
SITE PLAN: PC2025-0260
PART 2 PLAN 5R-11035 AND PART 1 PLAN 4R-34545
PROVIDED BY G4A ARCHITECTS, PROJECT No. 25026, RECEIVED ON SEPTEMBER 18, 2026.

No.	BY	DATE	DESCRIPTION
2.	M.S.	26-10-02	2nd SUBMISSION
1.	W.L.	26-01-30	1st SUBMISSION

CITY OF OTTAWA

PROJECT No. 25-1494

LICENSED PROFESSIONAL ENGINEER — M.T.H. SIU — 100674364 — 26-10-02 — PROVINCE OF ONTARIO

CAIVAN (STITTSVILLE) INC.

MAGNOLIA STACKED TOWNS

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GENERAL NOTES

DRAWN BY: M.S. & A.S.	CHECKED BY: S.L.M.	SHEET NO.
DESIGNED BY: M.S. & W.L.	CHECKED BY: C.M.	1
SCALE: N.T.S.	DATE: JANUARY 2026	

CITY FILE No. D07-12-26-0069 — CITY PLAN No. XXXXXX — ZBLA File No. D02-02-24-0042