GENERAL CONSTRUCTION NOTES

1. ALL MATERIAL (SANITARY, STORM & WATERMAIN) AND CONSTRUCTION METHODS TO BE IN ACCORDANCE WITH THE CURRENT CITY OF OTTAWA STANDARD DRAWINGS AND SPECIFICATIONS, AND ONTARIO PROVINCIAL STANDARD DRAWINGS AND SPECIFICATIONS.

2. SERVICING DESIGN DRAWINGS TO BE READ IN CONJUNCTION WITH THE SITE SERVICING REPORT (JANUARY 31, 2025) PREPARED BY J.L. RICHARDS & ASSOCIATES LIMITED (29899-003).

3. UNLESS OTHERWISE NOTED ALL DIMENSIONS ARE TO THE CENTRELINE OF SEWER OR MAINTENANCE HOLE.

4. THE NOMINAL DIAMETER OF PIPES ARE REFERRED TO IN PLAN VIEW.

5. THE CONTRACTOR SHALL BE RESPONSIBLE FOR OBTAINING LOCATES FROM ALL UTILITY COMPANIES TO LOCATE EXISTING UTILITIES PRIOR TO EXCAVATION.

6. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALL EXCAVATION, BACKFILL AND REINSTATEMENT OF ALL AREAS DISTURBED DURING CONSTRUCTION AND ALL ASSOCIATED WORKS TO THE SATISFACTION OF THE ENGINEER AND CITY OF OTTAWA.

7. ALL CONNECTIONS TO EXISTING WATERMAIN TO BE COMPLETED BY CITY OF OTTAWA FORCES. CONTRACTOR TO PROVIDE EXCAVATION BACKFILLING, COMPACTION AND REINSTATEMENTS, IN ACCORDANCE WITH CURRENT CITY SPECIFICATIONS.

8. THE CONTRACTOR SHALL BE RESPONSIBLE TO DETERMINE, VIA EXCAVATION, THE EXACT LOCATION AND ELEVATION OF THE EXISTING WATERMAINS, SEWERS AND UNDERGROUND STRUCTURES AS REQUIRED FOR ALL CONNECTIONS, RELOCATIONS, AND BLANKINGS.

9. ALL WATERMAINS SHALL CONFORM TO THE LATEST REVISIONS OF THE CITY OF OTTAWA AND THE ONTARIO PROVINCIAL STANDARD DRAWINGS (OPSD) AND SPECIFICATIONS (OPSS).

10. WATERMAINS CROSSING BELOW OR OVER A SEWER SHALL BE IN ACCORDANCE WITH CITY STANDARD DRAWING W25 AND W25.2.

11. PROVIDE A MINIMUM OF 2.4m COVER ON ALL WATERMAINS AND WATER SERVICES. OTHERWISE PROVIDE THERMAL INSULATION AS PER THE CITY STANDARD DRAWING W22 (IN SHALLOW TRENCHES) AND W23 (AT OPEN STRUCTURES).

12. WATERMAIN THRUST BLOCKS TO BE CONSTRUCTED PER CITY STANDARD DRAWINGS W25.3 AND W25.4. THRUST BLOCKS ARE REQUIRED AT ALL BENDS, TEES, PLUGS, DEAD END CAPS, VALVES, REDUCERS, OR OTHER FITTINGS WHERE CHANGES OCCUR IN PIPE DIAMETER OR DIRECTION ALL IN ACCORDANCE WITH CURRENTY CITY OF OTTAWA STANDARDS AND SPECIFICATIONS.

13. WATERMAIN SERVICE LATERAL TO BUILDING TO BE PVC DR-18. WATER SERVICE EXTENSION TO CAR WASH TO BE 50MM TYPE K COPPER

14. ALL WATER DISTRIBUTION INFRASTRUCTURE TO BE PROVIDED WITH CATHODIC CORROSION PROTECTION AS PER CITY STANDARD W40.

15. HYDRANTS SHALL BE INSTALLED AS PER CITY STANDARD DRAWING W19.

16. ALL GROUNDWATER PUMPED FROM THE SITE TO BE METERED AND A PERMIT TO TAKE WATER OBTAINED AS APPLICABLE.

17. AT ALL CONNECTION POINTS, REINSTATE SURFACES TO EXISTING CONDITION OR BETTER.
- ASPHALT RESTORATION SHALL BE IN ACCORDANCE WITH CITY OF OTTAWA STANDARD DRAWING NO. R10.
- THICKNESS OF GRANULARS AND ASPHALT LAYERS SHALL MATCH EXISTING.
- BOULEVARDS SHALL BE REINSTATED WITH MINIMUM 100mm TOPSOIL AND SOD.

17. SANITARY AND STORM SEWERS EQUAL TO OR LESS THAN 300mm DIA. SHALL BE PVC DR-35. STORM SEWERS GREATER THAN 300mm DIA. TO BE 100-D R.C. SEWERS TO BE INSULATED WHERE MINIMUM COVERAGE OF 2.0m IS NOT ACHIEVED (REFER TO INSULATION DETAIL).

18. SANITARY AND STORM SERVICE LATERALS TO BUILDING TO BE PVC DR-28.

19. SANITARY AND STORM SERVICES TO BE IN ACCORDANCE WITH CITY STANDARD DRAWING S11.1 AND PROVIDED WITH 0.3m MINIMUM VERTICAL CLEARANCE TO WATERMAIN. REFER TO WATERMAIN TABLE FOR CROSSING DETAILS.

20. SERVICES TO BE TERMINATED 1.0m FROM BUILDING WALL (TYPICAL).

21. BUILDER TO INSTALL BACKWATER VALVES ON SANITARY AND STORM SERVICE LATERALS IN ACCORDANCE WITH CITY OF OTTAWA STANDARD DETAIL DRAWINGS S14, S14.1, S14.2.

22. ALL STORM & SANITARY MAINTENANCE HOLES C/W FRAME AND COVER AS PER CITY STANDARD DRAWINGS 24 AND 24.1. SANITARY AND STORM MAINTENANCE HOLES TO HAVE WATERTIGHT COVERS PER OPSD 401.030.

23. CLAY SEALS TO BE AS PER CITY OF OTTAWA DETAIL S8 & THE GEOTECHNICAL INVESTIGATION REPORTS PREPARED BY EXP FOR THIS PROJECT DATED AUGUST 2024.

24. CLAY SEALS IN THE REAR YARD ARE TO BE PLACED TO THE UNDERSIDE OF THE TOPSOIL LAYER.

25. ALL CATCH BASIN MAINTENANCE HOLES C/W FRAME AND COVERS AS PER CITY STANDARD DRAWING S28 AND 28.1.

26. ALL STREET CATCH BASINS TO BE 600X600mm PRECAST CONCRETE PER OPSD 705.010 C/W FRAME AND COVER AS PER CITY STANDARD DRAWING S19.

27. ALL CATCH BASIN LEADS TO BE PVC DR-35 INSTALLED WITH 1% GRADIENT MINIMUM, UNLESS SPECIFIED OTHERWISE ON THE DRAWINGS.

28. 6m SUBDRAIN STUBS, WRAPPED IN FILTER SOCK, TO BE INSTALLED ON EITHER SIDE OF EACH CATCH BASIN, APPROXIMATELY 300mm BELOW THE SUBGRADE LEVEL.

29. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY THAT THE SITE BENCHMARK(S) HAS NOT BEEN ALTERED OR DISTURBED AND THAT ITS RELATIVE ELEVATION AND DESCRIPTION AGREES WITH THE INFORMATION DEPICTED ON THIS PLAN. PLEASE REFER TO THE 'VERTICAL CONTROL POINTS' SKETCH PROVIDED BY STANTEC SEPTEMBER 27, 2024 FOR LOCATION AND DESCRIPTION OF CONTROL POINTS.

30. CATCH BASINS FOR LANDSCAPED APPLICATION TO BE IN ACCORDANCE WITH CITY STANDARD DETAIL S31.

31. CONCRETE CURB TO BE BARRIER TYPE AS PER STANDARD DRAWING SC1.1.

32. CONCRETE SIDEWALKS AND WALKWAYS TO BE CONSTRUCTED AS PER CITY OF OTTAWA DETAIL SC2 (OR SC1.4) AND SC4.

33. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY THAT THE SITE BENCHMARK(S) HAS NOT BEEN ALTERED OR DISTURBED AND THAT ITS RELATIVE ELEVATION AND DESCRIPTION AGREES WITH THE INFORMATION DEPICTED ON THIS PLAN.

34. EXCAVATION FOR THE INSTALLATION OF SERVICES ALONG OR IN PROXIMITY OF A BUILDING OR A STRUCTURE IS TO BE CONTAINED WITHIN A TRENCH BOX WIDTH AND IS TO ENSURE NO CONFLICT WITH ANY FUTURE FOOTINGS. SERVICE TRENCHES SHALL BE BACKFILLED WITH GRANULAR 'A' COMPACTED TO 100% SPMDD WHERE ADJACENT TO A BUILDING FOR THE SECTION PARALLEL TO THE UNIT PLUS 5.0 M PAST THE FRONT AND REAR OF THE UNIT. SELECT SUBGRADE MATERIAL, COMPACTED TO 100% SPD TO 1.0m BELOW EXISTING GRADE FOR FULL TRENCH WIDTH OF DISTURBED AREA SHALL BE USED FOR BACKFILL, INCLUDING ALONG ANY SEWERS AND WATERMAINS ADJACENT TO A BUILDING OR OTHER STRUCTURE.

35. MATCH EXISTING ELEVATIONS AT PROPERTY LIMITS. ENSURE POSITIVE DRAINAGE TOWARDS A SUITABLE OUTLET WHETHER INDICATED OR NOT.

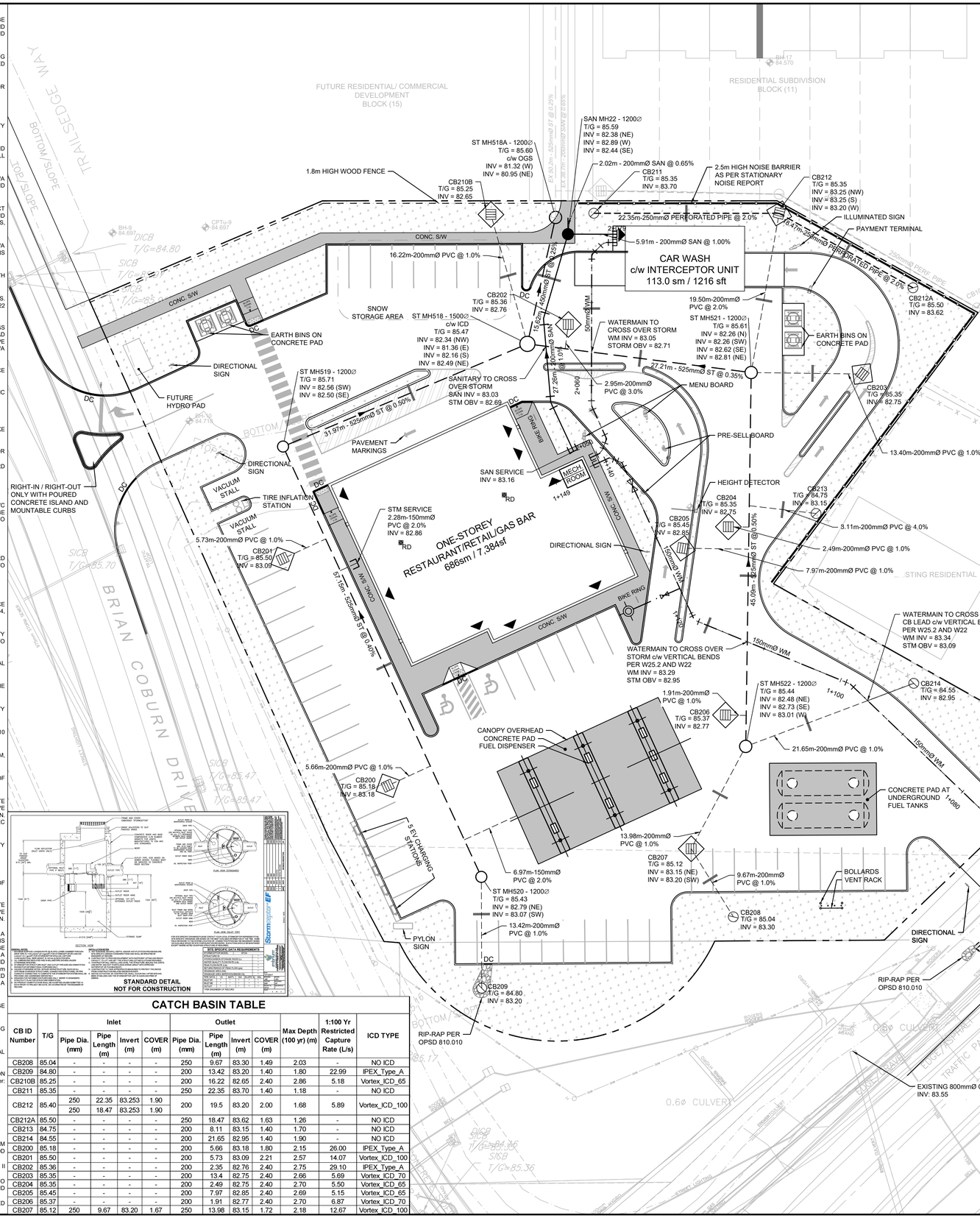
36. THE CONTRACTOR SHALL PROVIDE ALL PAVEMENT MARKINGS AS SHOWN, INCLUDING HANDICAPPED PARKING SYMBOLS.

37. ROAD STRUCTURE TO BE CONSTRUCTED IN ACCORDANCE WITH THE GEOTECHNICAL ENGINEERS RECOMMENDATIONS.

38. PAVEMENT DESIGN TO BE IN ACCORDANCE WITH GEOTECHNICAL INVESTIGATION REPORT (SEPTEMBER 12, 2024), PREPARED BY EXP SERVICES INC. (Project Number: OTT-21004743-B0):

ACCESS LANES AND HEAVY TRUCK LOADING AREAS:
- 50mm WEAR COURSE - HL-3 OR SUPERPAVE 12.5 Cat. B - ASPHALTIC CONCRETE
- 70mm BINDER COURSE - HL-8 OR SUPERPAVE 19.0 ASPHALTIC CONCRETE
- 150mm BASE - OPSS GRANULAR 'A' CRUSHED STONE
- 600mm SUBBASE - OPSS GRANULAR 'B' TYPE II

- ASPHALT CEMENT TO BE A MINIMUM PERFORMANCE GRADE (PG) 58-34
- THE PAVEMENT GRANULAR BASE AND SUBBASE SHOULD BE PLACED IN MAXIMUM 300mm LIFTS AND COMPACTED TO A MINIMUM OF 100% OF THE MATERIALS SPMDD USING SUITABLE COMPACTION EQUIPMENT.
- SUBGRADE TO BE EITHER FILL, IN-SITU SOILS, OR OPSS GRANULAR 'B' TYPE I OR II MATERIAL PLACED OVER IN SITU SOILS OR FILL.
- IF SOFT SPOTS DEVELOP IN THE SUBGRADE DURIGN COMPACTION OR DUE TO CONSTRUCTION TRAFFIC, THE AFFECTED AREAS SHOULD BE EXCAVATED AND REPLACED WITH OPSS GRANULAR 'B' TYPE I OR II MATERIAL.
- REQUIREMENT FOR ADDITIONAL GRANULAR 'B' AND/OR GEOTEXTILE TO BE CONFIRMED ON SITE BY GEOTECHNICAL ENGINEER.



CATCH BASIN TABLE

CB ID Number	T/G	Inlet				Outlet				Max Depth (100 yr) (m)	1:100 Yr Restricted Capture Rate (L/s)	ICD TYPE
		Pipe Dia. (mm)	Pipe Length (m)	Invert (m)	COVER (m)	Pipe Dia. (mm)	Pipe Length (m)	Invert (m)	COVER (m)			
CB208	85.04	-	-	-	-	250	9.67	83.30	1.49	2.03	-	NO ICD
CB209	84.80	-	-	-	-	200	13.42	83.20	1.40	1.80	22.99	IPEX_Type_A
CB210B	85.25	-	-	-	-	200	16.22	82.65	2.40	2.86	5.18	Vortex_ICD_65
CB211	85.35	-	-	-	-	250	22.35	83.70	1.40	1.18	-	NO ICD
CB212	85.40	250	22.35	83.253	1.90	200	19.5	83.20	2.00	1.68	5.89	Vortex_ICD_100
		250	18.47	83.253	1.90							
CB212A	85.50	-	-	-	-	250	18.47	83.62	1.63	1.26	-	NO ICD
CB213	84.75	-	-	-	-	200	8.11	83.15	1.40	1.70	-	NO ICD
CB214	84.55	-	-	-	-	200	21.65	82.95	1.40	1.90	-	NO ICD
CB200	85.18	-	-	-	-	200	5.66	83.18	1.80	2.15	26.00	IPEX_Type_A
CB201	85.50	-	-	-	-	200	5.73	83.09	2.21	2.57	14.07	Vortex_ICD_100
CB202	85.36	-	-	-	-	200	2.35	82.76	2.40	2.75	29.10	IPEX_Type_A
CB203	85.35	-	-	-	-	200	13.4	82.75	2.40	2.66	5.69	Vortex_ICD_70
CB204	85.35	-	-	-	-	200	2.49	82.75	2.40	2.70	5.50	Vortex_ICD_65
CB205	85.45	-	-	-	-	200	7.97	82.85	2.40	2.69	5.15	Vortex_ICD_65
CB206	85.37	-	-	-	-	200	1.91	82.77	2.40	2.70	6.87	Vortex_ICD_70
CB207	85.12	250	9.67	83.20	1.67	250	13.98	83.15	1.72	2.18	12.67	Vortex_ICD_100

WATERMAIN TABLE-Sta. 1+050.00 TO 1+145.24

PVC DR-18 CL. 150

SIZE	STATION ALONG WM	DETAIL	FINISHED GRADE	TOP OF WM
150mmØ	1+061.69	CONNECT TO EXISTING	85.23	82.80
	1+064.80	WM CROSSING UNDER CULVERT	85.24	82.84
	1+073.63	VALVE	85.57	83.17
	1+098.76	22.5° BEND	85.59	83.17
	1+119.08	45° BEND	85.57	83.17
	1+123.29	HYDRANT & VALVE	85.51	83.11
	1+136.96	VALVE	85.80	83.24
	1+140.00	45° BEND	85.68	83.28
	1+141.62	45° BEND	85.86	83.46
	1+143.72	CAP	85.94	83.54

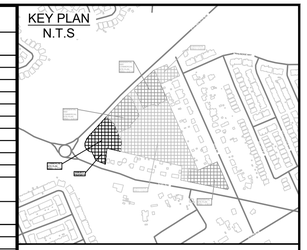
WATERMAIN TABLE-Sta. 2+050.00 TO 2+084.28

TYPE-K COPPER

SIZE	STATION ALONG WM	DETAIL	FINISHED GRADE	TOP OF WM
50mmØ	2+055.00	CAP	85.96	83.56
	2+051.50	45° BEND	85.88	83.48
	2+053.28	45° BEND	85.68	83.28
	2+057.72	22.5° BEND	85.64	83.24
	2+075.89	45° BEND	85.61	83.21
	2+077.96	45° BEND	85.78	83.38
	2+079.00	CAP	85.81	83.41

NOTE: ALL WM CONSTRUCTED AT LESS THAN 2.4m BELOW FINISHED GRADE SHALL BE INSULATED IN ACCORDANCE WITH THE CITY OF OTTAWA'S REQUIREMENTS AS SET OUT IN THE CITY OF OTTAWA SPECIFICATION (F-4415).

KEY PLAN
N.T.S



LEGEND

- SITE BOUNDARY
- DEDICATED SNOW STORAGE AREA
- EXISTING CATCH BASIN
- CATCH BASIN c/w ICD
- TEE AND ELBOW REAR YARD CATCH BASIN AND PERFORATED PIPE
- PROPOSED CATCH BASIN LEAD
- PROPOSED WATERMAIN, HYDRANT, CURB STOP AND SERVICE POST, VALVE & VALVE BOX AND REDUCER
- EXISTING WATERMAIN, VALVE & HYDRANT
- PROPOSED STORM SEWER & MANHOLE
- EXISTING STORM SEWER & MANHOLE
- PROPOSED SANITARY SEWER & MANHOLE
- EXISTING SANITARY SEWER & MANHOLE
- CONCRETE BARRIER CURB
- RD ROOF DRAINS (REFER TO MECHANICAL)
- DC DEPRESSED CURB
- CONC. SIDEWALK
- WOOD PRIV/ACY BARRIER
- NOISE BARRIER
- GRASSED AREA
- RIP-RAP PER OPSD 810.010 (TYPE B)
- CLAY SEALS
- X REMOVE AND REINSTATE

No.	ISSUE / REVISION	DD/MM/YY
3	ISSUED FOR THIRD ENGINEERING SUBMISSION	31/01/25
2	ISSUED FOR SECOND ENGINEERING SUBMISSION	13/09/24
1	ISSUED FOR FIRST ENGINEERING SUBMISSION	22/12/23

VERIFY SHEET SIZE AND SCALES. THE BAR TO THE RIGHT IS 25mm IF THIS IS A FULL SIZE DRAWING. 0 25mm

SCALE: 1:250

CLIENT: Groupe Heafey

CONSULTANT: www.jlrichards.ca
J.L.Richards ENGINEERS - ARCHITECTS - PLANNERS

CONSULTANT:

PROFESSIONAL STAMP

PROJECT NORTH

PROJECT:

GAS STATION, COMMERCIAL BUILDING, DRIVE-THRU RESTAURANT & CAR WASH

2983 NAVAN ROAD - BLOCK 16 OTTAWA, ONTARIO

DRAWING:

SITE SERVICING PLAN

DESIGN:	MM
DRAWN:	KC
CHECKED:	KF
JLR #:	29899-002

DRAWING #: C01

PLOT DATE: Friday, January 31, 2025 - 1:45:08 PM
CITY FILE No. D07-16-21-0027

File Location: P:\29000\29899-002 - Navan Subdivision\05-Production\01-Civil\3. BLOCK 16 - Gas Bar\29899-003 C SERVICING.dwg

BRIAN COBURN BLVD

FUTURE RESIDENTIAL/ COMMERCIAL DEVELOPMENT BLOCK (15)

RESIDENTIAL SUBDIVISION BLOCK (11)

EXISTING MUP AREA TO BE REINSTATED TO MATCH PROPOSED ENTRANCE

EXISTING BOULEVARD AREA TO BE REINSTATED TO EXISTING CENTRELINE OF DITCH

CAR WASH
c/w INTERCEPTOR UNIT
113.0 sm / 1216 sft

FF=86.00
UF=83.66

ONE-STOREY
RESTAURANT/RETAIL/GAS BAR
686sm / 7,384sf

1	
21.52	353.65
0.19/0.30	85.55

2A	
1.78	21.99
0.25	85.60

2B	
4.43	55.12
0.22	85.62

3	
24.13	178.09
0.30	85.65

4	
0.47	9.05
0.15	84.90

5	
8.58	146.08
0.15	85.50

6	
1.55	57.95
0.08	85.45

7	
3.47	34.75
0.30	84.85

8	
5.95	67.88
0.27	85.31

9	
8.58	84.87
0.30	85.10

10	
17.52	217.85
0.24	85.42

11	
15.68	178.49
0.30	85.42

12	
4.94	86.52
0.15	85.60

13	
8.96	169.64
0.15	85.65

KEY PLAN
N.T.S

LEGEND

- SITE BOUNDARY
- PROPOSED ELEVATION
- ORIGINAL GROUND ELEVATION INTERPOLATED FROM SURVEY
- PROPOSED SUBDIVISION GRADES
- ORIGINAL SURVEY
- PROPOSED TERRACING (MAX 3:1)
- SURFACE SLOPE
- FLOW DIRECTION
- MAJOR/EMERGENCY OVERLAND FLOW DIRECTION (> 1:100 YR)
- FF=107.72 / USF=105.92 — FINISHED FLOOR ELEVATION / UNDERSIDE OF FOOTING ELEVATION
- DEPRESSED CURB
- BUILDING ENTRANCE
- BH 5-21 / 103.58 — BOREHOLE NUMBER / GROUND SURFACE ELEVATION
- RIP-RAP PER OPSD 810.010 (TYPE B)
- GRASSED AREA
- MAXIMUM WATER LEVEL (STATIC)
- MAX. PONDING VOLUME (m³) / AREA ID / MAX. PONDING AREA (m²) / MAX. WATER LEVEL (STATIC) / PONDING DEPTH (STATIC)

26	
4.90	111.46
0.13	97.20

No.	ISSUE / REVISION	DD/MM/YY
3	ISSUED FOR THIRD ENGINEERING SUBMISSION	31/01/25
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1	ISSUED FOR FIRST ENGINEERING SUBMISSION	22/12/23

VERIFY SHEET SIZE AND SCALES. THE BAR TO THE RIGHT IS 25mm IF THIS IS A FULL SIZE DRAWING. 0 25mm

SCALE: 1:250

CLIENT: Groupe Heafey

CONSULTANT: www.jlrichards.ca
J.L.Richards ENGINEERS · ARCHITECTS · PLANNERS

CONSULTANT:

PROFESSIONAL STAMP

PROJECT NORTH

PROJECT:
GAS STATION, COMMERCIAL BUILDING, DRIVE-THRU RESTAURANT & CAR WASH
2983 NAVAN ROAD - BLOCK 16 OTTAWA, ONTARIO

DRAWING:
GRADING & PONDING PLAN

DESIGN:	MM
DRAWN:	KC
CHECKED:	KF
JLR #:	29899-002

DRAWING #: C02

File Location: P:\29000\29899-002 - Navan Subdivision\05-Production\01-Civil\3. BLOCK 16 - Gas Bar\29899-003 C GRADING.dwg

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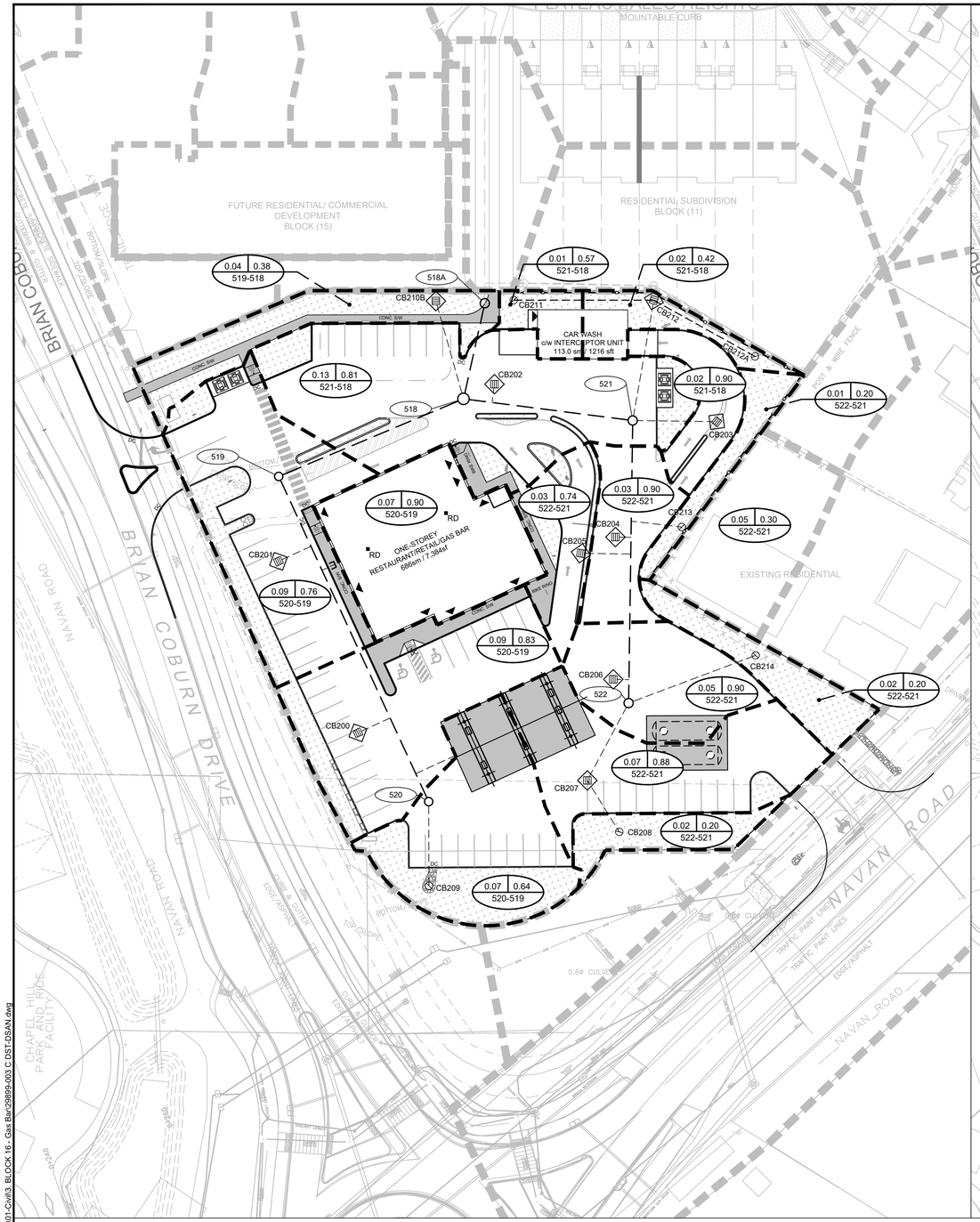
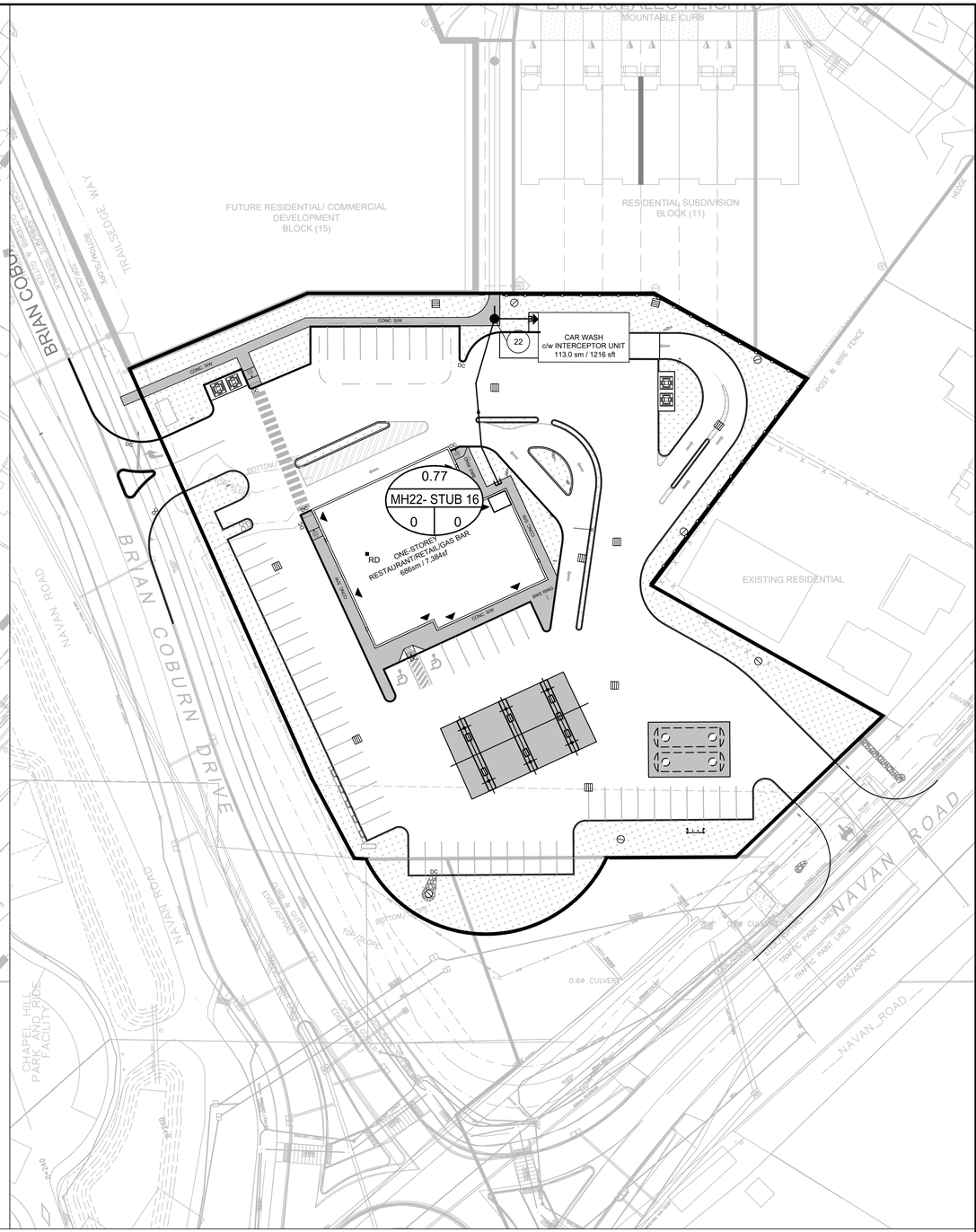
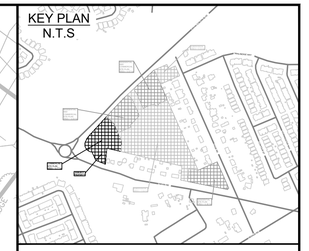




KEY PLAN
N.T.S



LEGEND

- SITE BOUNDARY
- PROPOSED STORM DRAINAGE BOUNDARY
- MAJOR OVERLAND FLOW DIRECTION
- AREA IN HECTARES
- RUNOFF COEFFICIENT
- PIPE REACH UPSTREAM CATCHBASIN TO DOWNSTREAM CATCHBASIN
- EXISTING STORM SEWER & MANHOLE
- PROPOSED STORM SEWER & MANHOLE
- PROPOSED SANITARY DRAINAGE BOUNDARY
- AREA IN HECTARES
- PIPE REACH UPSTREAM MAINTENANCE HOLE TO DOWNSTREAM MAINTENANCE HOLE
- POPULATION
- NUMBER OF UNITS
- EXISTING SANITARY SEWER & MANHOLE
- PROPOSED SANITARY SEWER & MANHOLE

No.	ISSUE / REVISION	DD/MM/YY
3	ISSUED FOR THIRD ENGINEERING SUBMISSION	31/01/25
2	ISSUED FOR SECOND ENGINEERING SUBMISSION	13/09/24
1	ISSUED FOR FIRST ENGINEERING SUBMISSION	22/12/23

VERIFY SHEET SIZE AND SCALES. THE BAR TO THE RIGHT IS 25mm IF THIS IS A FULL SIZE DRAWING. 0 25mm

SCALE: 1:400

CLIENT: GROUPE Heafey GROUP

CONSULTANT: www.jlrichards.ca

J.L.Richards ENGINEERS • ARCHITECTS • PLANNERS

CONSULTANT:

PROFESSIONAL STAMP

PROJECT NORTH

PROJECT:

GAS STATION, COMMERCIAL BUILDING, DRIVE-THRU RESTAURANT & CAR WASH

2983 NAVAN ROAD - BLOCK 16 OTTAWA, ONTARIO

DRAWING:

STORM AND SANITARY DRAINAGE PLANS

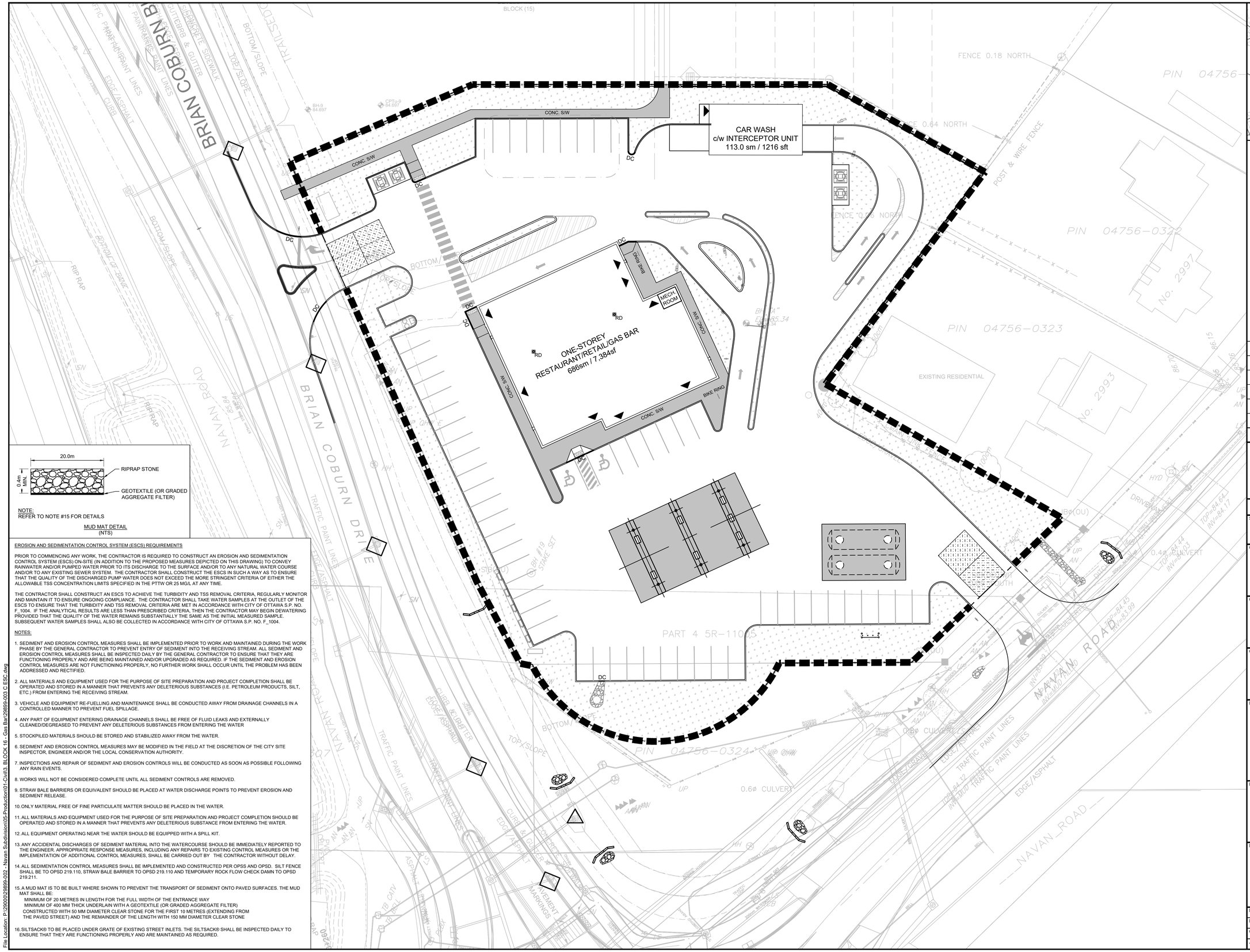
DESIGN: MM	
DRAWN: KC	DRAWING #:
CHECKED: KF	C03
JLR #: 29899-002	

STORM DRAINAGE

SANITARY DRAINAGE

File Location: P:\29000\29899-002 - Navan Subdivision\05-Production\01-Civil\3. BLOCK 16 - Gas Bar\29899-003 C DST-DSAN.dwg

PLOT DATE: Friday, January 31, 2025 1:46:04 PM
CITY FILE No. D07-16-21-0027



NOTE:
REFER TO NOTE #15 FOR DETAILS

MUD MAT DETAIL
(NTS)

EROSION AND SEDIMENTATION CONTROL SYSTEM (ESCS) REQUIREMENTS

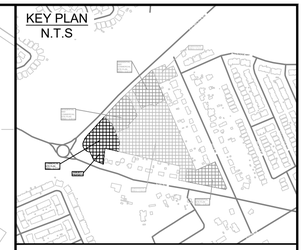
PRIOR TO COMMENCING ANY WORK, THE CONTRACTOR IS REQUIRED TO CONSTRUCT AN EROSION AND SEDIMENTATION CONTROL SYSTEM (ESCS) ON-SITE (IN ADDITION TO THE PROPOSED MEASURES DEPICTED ON THIS DRAWING) TO CONVEY RAINWATER AND/OR PUMPED WATER PRIOR TO ITS DISCHARGE TO THE SURFACE AND/OR TO ANY NATURAL WATER COURSE AND/OR TO ANY EXISTING SEWER SYSTEM. THE CONTRACTOR SHALL CONSTRUCT THE ESCS IN SUCH A WAY AS TO ENSURE THAT THE QUALITY OF THE DISCHARGED PUMP WATER DOES NOT EXCEED THE MORE STRINGENT CRITERIA OF EITHER THE ALLOWABLE TSS CONCENTRATION LIMITS SPECIFIED IN THE PTTW OR 25 MG/L AT ANY TIME.

THE CONTRACTOR SHALL CONSTRUCT AN ESCS TO ACHIEVE THE TURBIDITY AND TSS REMOVAL CRITERIA, REGULARLY MONITOR AND MAINTAIN IT TO ENSURE ONGOING COMPLIANCE. THE CONTRACTOR SHALL TAKE WATER SAMPLES AT THE OUTLET OF THE ESCS TO ENSURE THAT THE TURBIDITY AND TSS REMOVAL CRITERIA ARE MET IN ACCORDANCE WITH CITY OF OTTAWA S.P. NO. F_1004. IF THE ANALYTICAL RESULTS ARE LESS THAN PRESCRIBED CRITERIA, THEN THE CONTRACTOR MAY BEGIN DEWATERING PROVIDED THAT THE QUALITY OF THE WATER REMAINS SUBSTANTIALLY THE SAME AS THE INITIAL MEASURED SAMPLE. SUBSEQUENT WATER SAMPLES SHALL ALSO BE COLLECTED IN ACCORDANCE WITH CITY OF OTTAWA S.P. NO. F_1004.

NOTES:

1. SEDIMENT AND EROSION CONTROL MEASURES SHALL BE IMPLEMENTED PRIOR TO WORK AND MAINTAINED DURING THE WORK PHASE BY THE GENERAL CONTRACTOR TO PREVENT ENTRY OF SEDIMENT INTO THE RECEIVING STREAM. ALL SEDIMENT AND EROSION CONTROL MEASURES SHALL BE INSPECTED DAILY BY THE GENERAL CONTRACTOR TO ENSURE THAT THEY ARE FUNCTIONING PROPERLY AND ARE BEING MAINTAINED AND/OR UPGRADED AS REQUIRED. IF THE SEDIMENT AND EROSION CONTROL MEASURES ARE NOT FUNCTIONING PROPERLY, NO FURTHER WORK SHALL OCCUR UNTIL THE PROBLEM HAS BEEN ADDRESSED AND RECTIFIED.
2. ALL MATERIALS AND EQUIPMENT USED FOR THE PURPOSE OF SITE PREPARATION AND PROJECT COMPLETION SHALL BE OPERATED AND STORED IN A MANNER THAT PREVENTS ANY DELETERIOUS SUBSTANCES (I.E. PETROLEUM PRODUCTS, SILT, ETC.) FROM ENTERING THE RECEIVING STREAM.
3. VEHICLE AND EQUIPMENT RE-FUELLING AND MAINTENANCE SHALL BE CONDUCTED AWAY FROM DRAINAGE CHANNELS IN A CONTROLLED MANNER TO PREVENT FUEL SPILLAGE.
4. ANY PART OF EQUIPMENT ENTERING DRAINAGE CHANNELS SHALL BE FREE OF FLUID LEAKS AND EXTERNALLY CLEANED/DEGREASED TO PREVENT ANY DELETERIOUS SUBSTANCES FROM ENTERING THE WATER
5. STOCKPILED MATERIALS SHOULD BE STORED AND STABILIZED AWAY FROM THE WATER.
6. SEDIMENT AND EROSION CONTROL MEASURES MAY BE MODIFIED IN THE FIELD AT THE DISCRETION OF THE CITY SITE INSPECTOR, ENGINEER AND/OR THE LOCAL CONSERVATION AUTHORITY.
7. INSPECTIONS AND REPAIR OF SEDIMENT AND EROSION CONTROLS WILL BE CONDUCTED AS SOON AS POSSIBLE FOLLOWING ANY RAIN EVENTS.
8. WORKS WILL NOT BE CONSIDERED COMPLETE UNTIL ALL SEDIMENT CONTROLS ARE REMOVED.
9. STRAW BALE BARRIERS OR EQUIVALENT SHOULD BE PLACED AT WATER DISCHARGE POINTS TO PREVENT EROSION AND SEDIMENT RELEASE.
10. ONLY MATERIAL FREE OF FINE PARTICULATE MATTER SHOULD BE PLACED IN THE WATER.
11. ALL MATERIALS AND EQUIPMENT USED FOR THE PURPOSE OF SITE PREPARATION AND PROJECT COMPLETION SHOULD BE OPERATED AND STORED IN A MANNER THAT PREVENTS ANY DELETERIOUS SUBSTANCE FROM ENTERING THE WATER.
12. ALL EQUIPMENT OPERATING NEAR THE WATER SHOULD BE EQUIPPED WITH A SPILL KIT.
13. ANY ACCIDENTAL DISCHARGES OF SEDIMENT MATERIAL INTO THE WATERCOURSE SHOULD BE IMMEDIATELY REPORTED TO THE ENGINEER. APPROPRIATE RESPONSE MEASURES, INCLUDING ANY REPAIRS TO EXISTING CONTROL MEASURES OR THE IMPLEMENTATION OF ADDITIONAL CONTROL MEASURES, SHALL BE CARRIED OUT BY THE CONTRACTOR WITHOUT DELAY.
14. ALL SEDIMENTATION CONTROL MEASURES SHALL BE IMPLEMENTED AND CONSTRUCTED PER OPSS AND OPSD. SILT FENCE SHALL BE TO OPSD 219.110, STRAW BALE BARRIER TO OPSD 219.110 AND TEMPORARY ROCK FLOW CHECK DAMN TO OPSD 219.211.
15. A MUD MAT IS TO BE BUILT WHERE SHOWN TO PREVENT THE TRANSPORT OF SEDIMENT ONTO PAVED SURFACES. THE MUD MAT SHALL BE:
    - MINIMUM OF 20 METRES IN LENGTH FOR THE FULL WIDTH OF THE ENTRANCE WAY
    - MINIMUM OF 400 MM THICK UNDERLAIN WITH A GEOTEXTILE (OR GRADED AGGREGATE FILTER)
    - CONSTRUCTED WITH 50 MM DIAMETER CLEAR STONE FOR THE FIRST 10 METRES (EXTENDING FROM THE PAVED STREET) AND THE REMAINDER OF THE LENGTH WITH 150 MM DIAMETER CLEAR STONE
16. SILTSACK® TO BE PLACED UNDER GRATE OF EXISTING STREET INLETS. THE SILTSACK® SHALL BE INSPECTED DAILY TO ENSURE THAT THEY ARE FUNCTIONING PROPERLY AND ARE MAINTAINED AS REQUIRED.

KEY PLAN
N.T.S



LEGEND

- SITE BOUNDARY
- PROPOSED SILT FENCE
- PROPOSED MUD MAT
- PROPOSED STRAW BALE BARRIER
- PROPOSED ROCK FLOW CHECK DAM
- SILTSACK® FOR EXISTING STREET INLET
- SILTSACK® FOR EXISTING CURB INLET CB's

No.	ISSUE / REVISION	DD/MM/YY
3	ISSUED FOR THIRD ENGINEERING SUBMISSION	31/01/25
2	ISSUED FOR SECOND ENGINEERING SUBMISSION	13/09/24
1	ISSUED FOR FIRST ENGINEERING SUBMISSION	22/12/23

VERIFY SHEET SIZE AND SCALES. THE BAR TO THE RIGHT IS 25mm IF THIS IS A FULL SIZE DRAWING. 0 25mm

SCALE: 1:250

CLIENT: GROUPE Heafey GROUP

CONSULTANT: www.jlrichards.ca
J.L.Richards ENGINEERS • ARCHITECTS • PLANNERS

CONSULTANT:

PROFESSIONAL STAMP

PROJECT NORTH

PROJECT:

GAS STATION, COMMERCIAL BUILDING, DRIVE-THRU RESTAURANT & CAR WASH

2983 NAVAN ROAD - BLOCK 16 OTTAWA, ONTARIO

DRAWING:

EROSION AND SEDEMENT CONTROL PLAN

DESIGN: MM	DRAWING #: C04
DRAWN: KC	
CHECKED: KF	
JLR #: 29899-002	

File Location: P:\29000\29899-002 - Navan Subdivision\05-Production\01-Civil\3. BLOCK 16 - Gas Bar\29899-003 C ESC.dwg

PLOT DATE: Friday, January 31, 2025 1:46:23 PM
CITY FILE No. D07-16-21-0027