

Report
Project: 30339828-5.1.1.01

RSS TOWNCENTER BLOCK 2 - 2604 JESSIE CHENEVERT WALK SERVICING BRIEF



Prepared for Urbandale Corporation
by ARCADIS

June 2026

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1 INTRODUCTION

Arcadis Professional Services (Canada) Inc. (formerly IBI Group) has been retained by Urbandale Corporation to provide professional engineering services for the proposed residential development located at 2604 Jessie Chenevert Walk. The subject site is approximately 0.8 ha and consists of 2-storey and 3-storey stacked condo blocks adding up to a total of 67 units. Refer to key plan on **Figure 1.1** for Site location.

Figure 1.1 Site Location



The proposed site is located near the South-East intersection of Earl Armstrong Road and Portico Way. This site forms part of Block 1 of the Riverside South Town Center Phase 7A project that spans between Portico Way to the west, Limebank Road to the east, Earl Armstrong Road to the north, and the future BRT corridor to the south. The site itself is bounded by Flavescent Street to the east, Earl Armstrong Road to the north, Jessie Chenevert Walk to the south, and Extendicare Riverside to the west. Vehicle access to the site will be provided from Portico Way and Jessie Chenevert Walk. Pedestrian access is provided from Jessie Chenevert Walk.

1.1 Guidelines and Standards

This evaluation takes into consideration the City of Ottawa Sewer Design Guidelines (OSDG) (October 2012), and the February 2014 Technical Bulletin ISDTB-2014-01, the September 2016 Technical Bulletin PIEDTB-2016-01, the June 2018 Technical Bulletin ISTB-2018-04, October 2019 Technical Bulletin 2019-01, and the July Technical Bulletin 2019-02.

It also considers the City of Ottawa Water Distribution Design Guidelines (OWDDG), and the 2010 Technical Bulletin 2010-02, the 2014 Technical Bulletin 2014-02, the 2018 Technical Bulletin 2018-02 and the 2020 Technical Bulletin 2020-02.

All specifications are as per current City of Ottawa standards and specifications, and Province of Ontario (OPSS/D) standards, specifications and drawings.

1.2 Pre-Consultation Meeting

The City of Ottawa hosted a pre-consultation meeting on May 11, 2026. Notes of the meeting are provided in **Appendix A**. There were no major engineering concerns flagged in this meeting.

1.3 Geotechnical Concerns

A geotechnical report is being prepared for the subdivision.

The objective of the investigation report will include:

- Determination of the subsoil and groundwater conditions;
- Provision of geotechnical recommendations pertaining to the design and development of the subject site including construction considerations.

Among other items, the report comments on the following:

- Site grading;
- Foundation design;
- Pavement structure;
- Grad Raise Restrictions;
- Groundwater control;

The report will conclude if the subject site is considered suitable geotechnically for the proposed development.

2 WATER DISTRIBUTION

2.1 Existing Conditions

2604 Jessie Chenevert Walk will be serviced with potable water from the City of Ottawa's existing watermain. There is an existing 200mm watermain in Jessie Chenevert Walk to the South, 200mm watermain in Flavescent Lane to the East and a 400mm Watermain in Earl Armstrong Road to the North.

2.2 Design Criteria

2.2.1 Water Demands

The proposed development consists of 2-storey and 3-storey stacked condo blocks. In order to calculate water demand rates, the per unit population density and consumption rates are taken from Tables 4.1 and 4.2 of the Ottawa Design Guidelines – Water Distribution were used and are summarized as follows:

- Residential Average Day Demand 280 L/cap/day
- Peak Daily Demand 2.5 x avg. day
- Peak Hour Demand 2.2 x avg. day

A water demand calculation sheet is included in **Appendix B** and the total water demands are summarized as follows:

- Average Day 0.59 l/s
- Maximum Day 1.47 l/s
- Peak Hour 3.22 l/s

2.2.2 System Pressures

The 2010 City of Ottawa Water Distribution Guidelines states that the preferred practice for the design of a new distribution system is to have normal operating pressures range between 345 kPa (50 psi) and 552 kPa (80 psi) under maximum daily flow conditions. Other pressure criteria identified in the guidelines are as follows:

- | | |
|------------------|--|
| Minimum Pressure | Minimum system pressure under peak hour demand conditions shall not be less than 276 kPa (40 psi). |
| Fire Flow | During the period of maximum day demand, the system pressure shall not be less than 150 kPa (21 psi) during a fire flow event. |

Maximum Pressure Maximum pressure at any point in the distribution system in unoccupied areas shall not exceed 689 kPa (100 psi). In accordance with the Ontario Building/Plumbing Code the maximum pressure should not exceed 552 kPa (80 psi) in occupied areas. Pressure reduction controls may be required for buildings when it is not possible/feasible to maintain the system pressure below 552 kPa.

2.2.3 Fire Flow Rate

The Fire Underwriters Survey was used to determine the fireflow for the site. The calculations result in a fire flow of 14,000 L/min (233.34 L/s) based on wood frame construction. A copy of the FUS calculation is included in **Appendix B**.

2.2.4 Boundary Conditions

The City of Ottawa has provided hydraulic boundary conditions at the connection locations off Jessie Chenevert Walk. A copy of the boundary condition received May 13, 2026, is included in **Appendix B** and is summarized as follows:

	CONNECTION 1 EXISTING ZONE	CONNECTION 1 SUC ZONE	CONNECTION 2 - EXISTING ZONE	CONNECTION 2 SUC ZONE
Max HGL (Basic Day)	131.1 m	147.0 m	131.1 m	147.0 m
Peak Hour	124.2 m	144.5 m	124.2 m	144.5 m
Max Day + Fire (14,000 l/min Fire Flow)	111.1 m	129.0 m	111.2 m	129.1 m

2.3 Proposed Water Plan

The site will be serviced by two connections to the existing 200 mm watermain on Jessie Chenevert Walk, separated by a valve box for redundancy. There are five hydrants surrounding the site. Boundary conditions were received for both Pre- and Post-SUC Pressure Zone Reconfigurations. Since the Existing Pre-SUC conditions for fireflow and peak hour are more restrictive and the post-SUC condition for Max HGL is more restrictive, it will be this data set considered for the proposed design.

A computer model has been created for the subject site using the InfoWater Pro program with ArcGIS 3.5.5. The model includes the hydraulic boundary condition Jessie Chenevert Walk. The hydraulic model was run under basic day, maximum day with fire flows and under peak hour conditions, watermains are sized to provide sufficient pressure and to deliver the required fire flow. Proposed watermains on site are a mix of 150mm and 50mm diameter in order to provide the required pressures. Results of the hydraulic analysis for the site is included in **Appendix B** and is summarized as follows:

SCENARIO	Existing Conditions Pressure (kPa)	SUC Reconfiguration Pressure (kPa)
Basic Day (Max HGL) Pressure (kPa)		532.07 to 534.07 kPa
Peak Hour Pressure (kPa)	307.99 to 310.63 kPa	
Maximum Day plus Fire Flow Design Fire Flow of 14,000 l/min @ 150 kPa (kPa)	955.85 l/s	

A comparison of the results and design criteria is summarized as follows:

Maximum Pressure	Under Basic Day no nodes have pressure that exceeds 552 kPa (80 psi), therefore no pressure reducing control is required for the buildings.
Minimum Pressure	The lowest minimum pressure during peak hour conditions is 307.99 kPa which exceeds the minimum 276 kPa (40 psi) requirement.
Fire Flow	The minimum design fireflow under maximum day conditions with minimum system pressure of 150 kPa (21psi) is 955.85 l/s which exceeds the requirement of 233.33 l/s.

3 WASTEWATER

3.1 Existing Conditions

There is an existing 250mm sanitary sewer in Jessie Chenevert Walk to the South, 250mm sanitary sewer in Flavescent Lane to the East and a 600mm sanitary sewer in Earl Armstrong Road to the North.

3.2 Proposed Sewers

All on-site sewers have been designed to City of Ottawa design criteria which include but are not limited to the below listed criteria. The detailed sanitary sewer design sheet which is included in **Appendix C** illustrates the population densities and sewers which provide the necessary outlets. The design wastewater criteria for this analysis area:

3.2.1 Design Flow:

The sanitary sewers for the subject site will be based on the City of Ottawa design criteria. It should be noted that the sanitary sewer design for this study incorporates the latest City of Ottawa design parameters identified in Technical Bulletin ISTB-2018-01. Some of the key criteria will include the following:

- Residential 280 l/cap/day
- Infiltration allowance 0.33 l/s/ha
- Velocities 0.60 m/s min. to 3.0 m/s max.

4 SITE STORMWATER MANAGEMENT

4.1 Existing Conditions

The subject site is currently undeveloped with no known stormwater management control measures. Stormwater currently flows overland to the existing road-side ditch on Earl Armstrong Road.

An existing 1350mm storm sewer is located in Jessie Chenevert Walk to the South, a 975mm storm sewer in Flavescent Lane to the East and a 1050mm storm sewer in Earl Armstrong Road to the North.

4.2 Design Criteria

The stormwater system for the subject site was designed following the principles of dual drainage, making accommodations for both major and minor flow.

Some of the key criteria include the following:

- Design Storm 1:2-year return (Ottawa)
- Rational Method Sewer Sizing
- Initial Time of Concentration 10 minutes
- Runoff Coefficients
 - Softscape Areas C = 0.20
 - Hardscape Areas C = 0.90
- Pipe Velocities 0.80 m/s to 3.0 m/s
- Minimum Pipe Size 250 mm diameter

4.3 Stormwater Management

The subject site is identified on the City of Ottawa's official Plan (OP) Schedule C15, classified as lands within the urban boundary and is subject to development. This site is designed to have minimal impact on adjacent properties grading, drainage, access, circulation, and privacy. This will be achieved by means of Water Quantity Controls.

Stormwater for the subject site ultimately discharges to the Riverside South Pond 2 facility, therefore no quality control is required. This was noted by the City during the Pre-Consultation meeting.

4.3.1 Water Quantity Control

Per the Arcadis Design Brief Report Riverside South Town Center Phase 7A, the 2.43Ha block the subject site is situated on will be limited to a maximum minor system release rate of 478.80 L/s during a 100-year storm (see excerpt of design brief and storm drainage plan in **Appendix D**). The 0.8 Ha subject site will be restricted proportionally. This will be achieved through a combination of inlet control devices (ICD's), and surface storage where possible.

Surface flows in excess of the 100 year storm event will be directed to Jessie Chenevert Walk, Flavescent Lane and road-side ditch in Earl Armstrong Road. The surface flows and ponding allocated to this site plan are shown in the ponding plan located in **Appendix D** and grading plan located in **Appendix E**.

Along the perimeter of the site, the opportunity to capture and store runoff is limited due to grading constraints and building geometry. These areas will discharge uncontrolled to Earl Armstrong Road and Flavescent Lane. These areas are located at the perimeter of the site where it is necessary to tie into public boulevards and the half of the stacked condo blocks facing Flavescent Lane due to the building geometry.

Based on the proposed site plan, the total uncontrolled area has been calculated to be 0.24 Ha. The runoff calculations for these uncontrolled areas have been calculated and provided in **Appendix D**. For the detailed storm drainage area plan for the site, refer to Drawing 500 in **Appendix D**.

Using the restrictions set by the RSSTC 7A design brief, based on a 2-Year design return period for a runoff coefficient of 0.85, a time of concentration of 10 minutes, and for an area of 0.80 Ha, the restricted flowrate for the subject site can be determined as:

$$Q_{\text{restricted}} = 2.78 \times C_{2\text{yr}} \times i_{2\text{yr}} \times A \quad \text{where:}$$

C = Design runoff coefficient
 $i_{100\text{yr}}$ = Intensity of 2-year storm event (mm/hr)
 $= 732.951 \times (T_c + 6.199)^{0.810} = 76.81 \text{ mm/hr}$; where $T_c = 10 \text{ minutes}$
 A = Uncontrolled Area

Therefore, the restricted release rate can be determined as:

$$\begin{aligned}
 Q_{\text{restricted}} &= 2.78 \times C_{100\text{yr}} \times i_{100\text{yr}} \times A \\
 &= 2.78 \times (0.85) \times 76.81 \times 0.80 \\
 &= 145.19 \text{ L/s}
 \end{aligned}$$

Based on a 1:100-year event, the flow from the 0.25 Ha uncontrolled areas can be determined as:

$$\begin{aligned}
 Q_{\text{uncontrolled}} &= 2.78 \times C_{100\text{yr}} \times i_{100\text{yr}} \times A \quad \text{where:} \\
 C &= \text{Average runoff coefficient (100-year C-value, max 1.00)} \\
 i_{100\text{yr}} &= \text{Intensity of 100-year storm event (mm/hr)} \\
 &= 1735.688 \times (T_c + 6.014)^{0.820} = 178.56 \text{ mm/hr; where } T_c = 10 \text{ minutes} \\
 A &= \text{Uncontrolled Area}
 \end{aligned}$$

Therefore, the uncontrolled release rate can be determined as:

$$\begin{aligned}
 Q_{\text{uncontrolled1+2}} &= 2.78 \times C_{100\text{yr}} \times i_{100\text{yr}} \times A \\
 &= 2.78 \times (0.66 \times 1.25) \times 178.56 \times 0.24 \\
 &= 98.29 \text{ L/s}
 \end{aligned}$$

The Maximum allowable release rate from the site can be determined by subtracting the Uncontrolled release rate from the minor system restricted flow rate.

$$Q_{\text{max}} = Q_{\text{restricted}} - Q_{\text{uncontrolled}}$$

$$Q_{\text{max}} = 145.19 \text{ L/s} - 98.29 \text{ L/s}$$

$$Q_{\text{max}} = 46.9 \text{ L/s}$$

Therefore, the total restricted flow rate through the minor system will be the design flow rate of **46.9 L/s**. This will be achieved using Inlet Control Devices. A summary of the ICD's, their corresponding storage requirements, storage availability, and associated drainage areas has been provided below.

Drainage Area	ICD Restricted Flow (L/s)	100 Year Storage Required (m3)	2 Yr Storage Required (m3)	Storage Provided
CB1	23.00	100.71	21.40	188.01
CB2	23.00	107.69	21.37	178.84
TOTAL	46.00	208.40	42.77	366.85

Detailed stormwater management calculations for the 2-year event, 100-year event, and stress test (100-year plus 20%) event can be found in **Appendix D**.

There will be no surface ponding for the 2-year storm event per the rational method calculations, noting that a minimum concentration time of 10 min was considered for 2-year ponding. A 0.3m freeboard from downstream high points/maximum ponding elevations to first floor building openings is maintained in all scenarios including emergency overflow conditions.

Refer to geotechnical report for information regarding foundation drainage. Foundation drainage systems are to be independent and connected to the storm service downstream of any stormwater management control device.

5 SEDIMENT AND EROSION CONTROL PLAN

5.1 General

During construction, existing stream and conveyance systems can be exposed to significant sediment loadings. Although construction is only a temporary situation, it is proposed to introduce a number of mitigative construction techniques to reduce unnecessary construction sediment loadings. These will include:

- groundwater in trench will be pumped into a filter mechanism prior to release to the environment;
- bulkhead barriers will be installed at the nearest downstream manhole in each sewer which connects to an existing downstream sewer;
- seepage barriers will be constructed in any temporary drainage ditches; and
- silt sacks will remain on open surface structure such as manholes and catchbasins until these structures are commissioned and put into use.

5.2 Trench Dewatering

During construction of municipal services, any trench dewatering using pumps will be discharged into a filter trap made up of geotextile filters and straw bales similar in design to the OPSD 219.240 Dewatering Trap. These will be constructed in a bowl shape with the fabric forming the bottom and the straw bales forming the sides. Any pumped groundwater will be filtered prior to release to the existing surface runoff. The contractor will inspect and maintain the filters as needed including sediment removal and disposal and material replacement as needed.

5.3 Bulkhead Barriers

At the first manhole constructed immediately upstream of an existing sewer, a ½ diameter bulkhead will be constructed over the lower half of the outletting sewer. This bulkhead will trap any sediment carrying flows, thus preventing any construction –related contamination of existing sewers. The bulkheads will be inspected and maintained including periodic sediment removal as needed.

5.4 Seepage Barriers

These barriers will consist of both the Light Duty Straw Bale Barrier as per OPSD 219.100 or the Light Duty Silt Fence Barrier as per OPSD 219.110 and will be installed in accordance with the sediment and erosion control drawing. The barriers are typically made of layers of straw bales or geotextile fabric staked in place. All seepage barriers will be inspected and maintained as needed.

5.5 Surface Structure Filters

All catchbasins, and to a lesser degree manholes, convey surface water to sewers. However, until the surrounding surface has been completed these structures will be covered to prevent sediment from entering the minor storm sewer system. Until rear yards are sodded or until streets are asphalted and curbed, all catchbasins and manholes will be equipped with geotextile filter socks. These will stay in place and be maintained during construction and build until it is appropriate to remove them.

6 CONCLUSIONS & RECOMMENDATIONS

6.1 Conclusions

This report and the accompanying working drawings clearly indicate that the proposed development meets the requirements of the stakeholder regulators, including the City of Ottawa. The proposed development is also in general conformance with the recommendations made by the Riverside South Town Center Phase 7A Design Brief.

There is a reliable water supply available adjacent to the proposed development; a wastewater outlet is available adjacent to the site and local storm sewers have been installed adjacent to the site.

6.2 Recommendations

It is recommended that the regulators review this submission with an aim of providing the requisite approvals to permit the owners to proceed to the construction stage of the subject site.

Report prepared by:

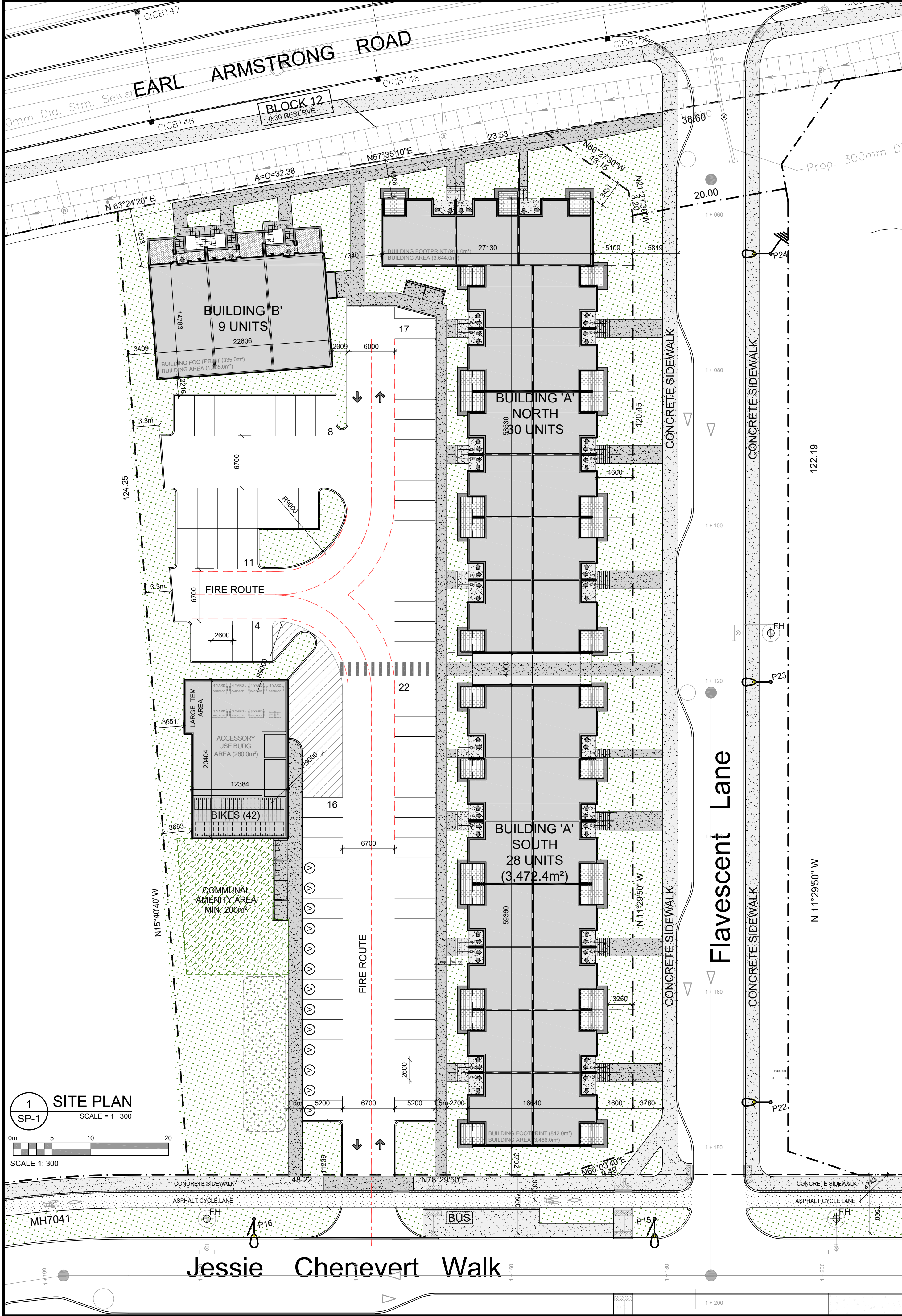
ARCADIS



Samantha E. Labadie, P. Eng
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Appendix A



KEY MAP

PROJECT INFORMATION

Zoning By-law 2008-250 / 2026-50	MC19 [2952]	SITE AREA	0.8 ha.	7,999.4 m ² 86,105 ft ²
ZONING	REQUIRED	PROVIDED		
ZONE: PLANNED UNIT DEVELOPMENT: TOWNHOUSE	MC19 [2952]	MC19 [2952]		
BUILDING HEIGHT	MIN. 3 STOREYS / MAX. ±57m (19 STOREYS)	9.7m (3 STOREYS)		
FRONT YARD SETBACK:	MAX. 3.0m	5.8m		
CORNER YARD SETBACK:	MAX. 3.0m	6.8m & 5.7m		
INTERIOR YARD SETBACK:	0.0m			
REAR YARD SETBACK:	0.0m			
BUILDING SETBACK TO A PRIVATE WAY	1.8m			
BUILDING SEPARATION (UNDER 14.5m HT.)	1.2m			
AMENITY AREA - TOTAL 6.0m ² PER UNIT (67 Units)	402.0m ²	720.0m ²		
AMENITY AREA - 50% COMMUNAL PER UNIT	201.0m ²	220.0m ²		
VEHICLE PARKING - RESIDENTIAL - 1.2 PER UNIT	80	73		
VEHICLE PARKING - VISITOR - 0.2 PER UNIT	13	12		
BICYCLE PARKING - RESIDENTIAL - 0.5 PER UNIT	34	30		
WALK & DRIVEWAY MINIMUM / MAXIMUM WIDTH	6.0m / 6.7m	6.7m		
MINIMUM WIDTH OF LANDSCAPED AREA - ABUTTING A RESIDENTIAL ZONE	3.0m			
MINIMUM WIDTH OF LANDSCAPED AREA - ABUTTING A STREET	3.5m			
MINIMUM WIDTH OF LANDSCAPED AREA - AROUND A PARKING LOT	15%			
MINIMUM LANDSCAPED AREA - IN A PLANNED UNIT DEVELOPMENT	25%			
MINIMUM AGGREGATED SOFT LANDSCAPE AREA - 3.0m SETBACK & LOT WIDTH 12m+	40%			

IT IS THE RESPONSIBILITY OF THE APPROPRIATE CONTRACTOR TO CHECK AND VERIFY ALL DIMENSIONS ON SITE AND TO REPORT ALL ERRORS AND/OR OMISSIONS TO THE ARCHITECT.

ALL CONTRACTORS MUST COMPLY WITH ALL PERTINENT CODES AND BY-LAWS.

THIS DRAWING MAY NOT BE USED FOR CONSTRUCTION UNTIL SIGNED BY THE ARCHITECT.

DO NOT SCALE DRAWINGS.

DRAWING NOTES

- PROPERTY LINE
- PARKING SPACE: STANDARD SIZE 2.6 x 5.2 METRES
- PROPOSED HYDRO TRANSFORMER
- ASPHALT DRIVING SURFACE
- IN-GROUND WASTE BINS
- ORGANIC WASTE: LOWER SIZED GARBAGE ENCLOSURE 2.0m HIGH OPAQUE SCREEN AROUND PERIMETER
- VEHICLE PARKING SPACES 0.6m x 1.8m (BY-TWO)
- PROPOSED HYDROTRANSFORMER
- PERSONAL SNOW STORAGE
- CANADA POST MAIL BOXES ON CONCRETE SURFACE
- 1.8m WIDE CONCRETE CROSSWALK PAINTED WITH TIPS
- DEPRESSED STREET CURB & SIDEWALK, CONTINUOUS AND DEPRESSED & DRIVEWAY
- SOFT LANDSCAPED AREA - SEE LANDSCAPING
- 1.8m WIDE CONCRETE WALK
- ACCESSIBLE PARKING SPACE WITH ACCESS AISLE, DEPRESSED CURB AND TIPS
- RETAINING WALL - SEE CIVIL
- EXISTING CITY SIDEWALK, WIDTH Varies
- EXISTING HYDRO TRANSFORMER WITH EASEMENT
- LIGHT POLE LOCATION TO BE CONFIRMED BY ELEC
- EXISTING CHAIN LINK FENCE TO REMAIN, ALTER AS REQUIRED FOR NEW CONNECTION PATH

GROSS BUILDING - AREAS

(CITY OF OTTAWA'S DEFINITION)	1,256.0 m ²
PROPOSED BUILDING 'A' SOUTH	13,520.0 m ²
PROPOSED BUILDING 'A' NORTH	39,224.0 m ²
PROPOSED BUILDING 'B'	3,466.0 m ²
TOTAL PROPOSED AREA	8,366.0 m ²
ACCESSORY USE BUILDING	221.0 m ²
	2,379.0 m ²

UNIT STATISTICS

2 BEDROOM UNIT	67
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CAR PARKING

REQUIRED by ZONING BY-LAW

RESIDENCE	- 1.2 PER UNIT	80
VISITOR	- 0.2 PER DWELLING UNIT	13
TOTAL		93

PROVIDED

RESIDENCE	- 1.2 PER UNIT	65
VISITOR	- 0.2 PER DWELLING UNIT	13
TOTAL		78

BICYCLE PARKING

REQUIRED	- 0.5 PER UNIT	34
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PROVIDED		34
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WASTE COLLECTION

GUIDELINES (REQUIRED)

GARBAGE	- 0.231 YARDS ³ / UNIT	15.5 YARDS ³
RECYCLING (GMP)	- 0.018 YARDS ³ / UNIT	1.2 YARDS ³
RECYCLING (FIBRE)	- 0.062 YARDS ³ / UNIT	4.2 YARDS ³
ORGANICS	- 240L CONTAINER / 50 UNITS 1.3 x 240L	

PROVIDED

GARBAGE	4 - 4 YARD CONTAINERS
RECYCLING (GMP)	1 - 3 YARD CONTAINERS
RECYCLING (FIBRE)	2 - 3 YARD CONTAINERS
ORGANICS	2 - 240L CONTAINER
LARGE ITEM GARBAGE	5 m ³

AMENITY REQUIREMENT

REQUIRED AMENITY SPACE

6.0 m ² PER UNIT =	402.0 m ²
50% COMMUNAL AMENITY AREA =	201.0 m ²

PROVIDED AMENITY SPACE

PRIVATE BALCONY / PATIOS =	500.0 m ²
COMMUNAL EXTERIOR AREA =	220.0 m ²
TOTAL =	820.0 m ²

SITE COVERAGE

BUILDING FOOTPRINT =	22.7%	3,053.5 m ²
DRIVING SURFACE =	27.2%	3,530.3 m ²
LANDSCAPE AREA =	50.1%	6,405.2 m ²
TOTAL =	100.0%	7,999.4 m ²
HARD SURFACE WALK AREA =	8.2%	1,051.0 m ²
SOFT LANDSCAPE AREA =	41.9%	5,358.5 m ²

PROJECT DEVELOPER

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LEGAL DESCRIPTION

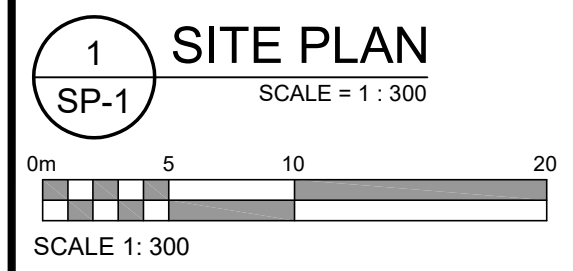
PLAN OF SUBDIVISION OF
BLOCK 2 AND 12 (0.30 RESERVES)
REGISTERED PLAN 4M-1573
CONCESSION 1 (RIDEAU FRONT)
Geographic Township of Gloucester
CITY OF OTTAWA
Surveyed by Annis, O'Sullivan, Vollebakk Ltd.

SURVEYOR

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SITE PLAN SYMBOLS

- CONCRETE UNIT PAVERS PATIOS
- SOFT LANDSCAPING
- COMMUNAL AMENITY SPACE
- SNOW STORAGE
- CONCRETE WALK / PATH
- BIKE RACK / BIKE PARKING SPOT (0.6 x 1.8m)
- TWO WAY VEHICLE CIRCULATION
- MAIN ENTRANCE
- PROPERTY LINE
- ZONING SETBACKS
- STANDARD PARKING SPACE 2.6m x 5.2m
- VISITOR PARKING SPACE 2.6m x 5.2m



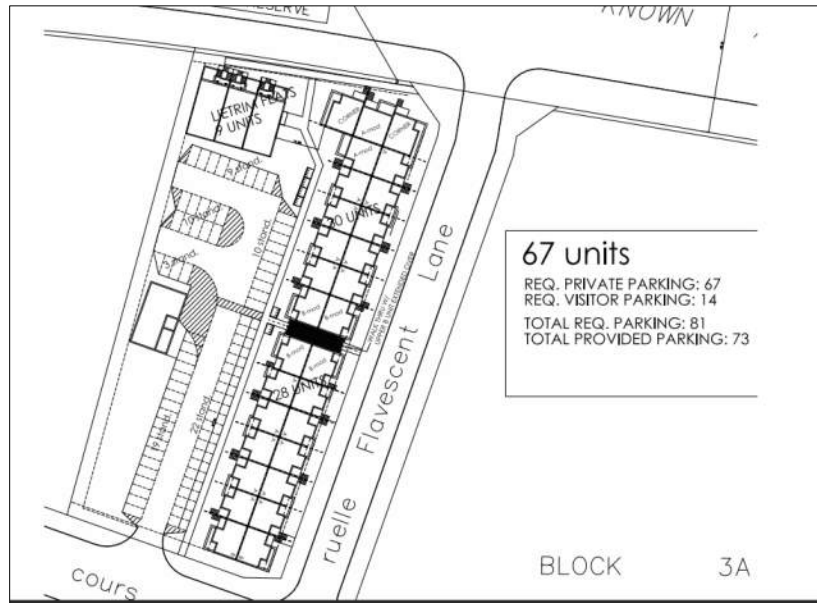
June 2, 2026

Vincent Denomme
 Urbandale Corporation
 Via email: vdenomme@urbandale.com

**Subject: Pre-Consultation: Meeting Feedback
 Proposed Site Plan Control Application – 50 Flavescent Lane**

Please find below information regarding next steps as well as consolidated comments from the above-noted pre-consultation meeting held on May 11, 2026.

Proposal:



- PUD, 67 units in B2B stacked units
- Units fronting Earl Armstrong Rd and Flavescent Lane
- Access off Jessie Chenevert
- Surface parking: 73 combined for residents and visitors (reduced from the required number of 81)
- Submitting late June
- Want to break ground this year

Pre-Consultation Preliminary Assessment

Next Steps

1. A review of the proposal and materials submitted for the above-noted pre-consultation has been undertaken. For your next submission, please submit the required Application Form, together with the necessary studies and/or plans to planningcirculations@ottawa.ca. **Please copy the file lead and other team members.**
2. In your subsequent pre-consultation or application submission, please ensure that all comments or issues detailed herein are addressed. A detailed cover letter stating how each issue has been addressed is requested with the submission materials. Please coordinate the numbering of your responses within the cover letter with the comment number(s) herein.
3. Please note, if your development proposal changes significantly in scope, design, or density it is recommended that a subsequent pre-consultation application be submitted.

Supporting Information and Material Requirements

1. The attached **Study and Plan Identification List** outlines the information and material that has been identified, during this phase of pre-consultation, as either required (R) or advised (A) as part of a future complete application submission.
 - a. The required plans and studies must meet the City's Terms of Reference (ToR) and/or Guidelines, as available on Ottawa.ca. These ToR and Guidelines outline the specific requirements that must be met for each plan or study to be deemed adequate.

Consultation with Technical Agencies

1. You are encouraged to consult with technical agencies early in the development process and throughout the development of your project concept. A list of technical agencies and their contact information is enclosed.

Planning

1. Policies and provisions OP, Secondary Plan
 - a. Official Plan: Suburban Transect/Hub: low-rise are permitted along minor corridors, such as Earl Armstrong. Buildings are to edge and define streets and the public realm.
 - b. Secondary Plan: The site is greater than 400m from transit, which allows a min 2-storey devt. This proposal complies.

2. Zoning Information:
 - a. provide all dimensions on site plan to ensure compliance with the PUD provisions, setbacks, landscaping, parking space size, garbage container sizes;
 - b. provide elevations with dimensions and show entrances and glazing with dimensions
 - c. Will it be on City waste collection? The City no longer collects recycling materials as per Provincial changes.
 - d. How will the reduced amount of parking be dealt with? Minor Variance or Minor Zoning Amendment?
 - e. Ensure both zoning by-laws (2008-250 and 2026-50) are reviewed to ensure compliance and/or needed relief.
3. Ensure ample greenspace and useable amenity spaces are provided. Use native plants when possible and do not use invasives.
4. Discuss proposal with local Councillor.

Urban Design

1. The site is within a design priority area, a high quality of design is expected. The project does not meet the threshold for attendance at URDP.
2. The New Neighbourhood design guidelines apply and should be addressed in the design of the site.
3. The City is in the process of updating our Low Rise Residential Infill guidelines, while not an infill site, please review direction on facing distances for Low Rise buildings in a Planned Unit Development.
4. A diagram is provided below to illustrate comments.
5. Provide additional building frontage on Jessie Chenevert, this is an important gateway street into the heart of Riverside South. Site access would be preferred on Flavescent.
6. Please provide tree planting and soft landscaping along Earl Armstrong.
7. Please provide individual front doors with direct access to the sidewalks on public streets. If direct connection to the sidewalk on Earl Armstrong is not feasible due to the ditch, please provide a parallel walkway connection.
8. The back of house functions of the proposed retirement home to the west are proposed along the interior side lot line, please provide landscaping along this lot line to break up hard surface and buffer noise.



Access from
Flavescent.

Walkway block into the
site provided from
Flavescent and Jessie
Chenevert

Parking internal to the
site



Access from
Flavescent.

Walkway block into the
site provided from
Flavescent and Jessie
Chenevert

Parking internal to the
site

Feel free to contact Lisa Stern, Urban Design, for follow-up questions.

Engineering

1. The Stormwater Management Criteria, for the subject site, is to be based on the following:
 - a. The quantity control criteria (100-year post-development to 2-year pre-development). Please refer to the Riverside South Community Infrastructure Servicing Study Update Phase 1 Mosquito Creek Study Area dated August 18, 2023 by Stantec and the Riverside South Phase 7A subdivision design brief dated April 2025.
 - b. A calculated time of concentration (cannot be less than 10 minutes).

2. Flows to the storm sewer in excess of the 2-year storm release rate, up to and including the 100-year storm event, must be detained on site.
3. Storm sewer outlets should not be submerged.
4. Quality control criteria is not required for this site since it discharges to Riverside South Pond 2 facility.
5. Ponding:
 - a. Permissible ponding of 350mm for the 100-year storm event. No spilling to adjacent sites.
 - b. At the 100-year ponding elevation, all drainage must be spilled to the Right-of-Way.
 - c. 100-year spill elevation must be 300mm lower than any building opening or ramp.
 - d. Demonstrate that the stress test spill elevation (100-year +20% event) does not spill onto any permanent structures.
6. Deep Services (Storm, Sanitary and/or Water Supply)
 - a. Services should be off Jessie Chenevert. Services should ideally be grouped in a common trench to minimize the number of road cuts. It is understood, townhomes fronting Flavescent have a maximum setback of 3m which limits the ability for private servicing. Coordination with the subdivision landscape plan is required to not affect public tree planting.
 - b. Provide information on the monitoring manhole requirements – should be located in an accessible location on private property near the property line (ie. Not in a parking area).
 - c. Sewer connections to be made above the springline of the sewermain as per:
 - i. Std Dwg S11.1 for flexible main sewers – connections made using approved tee or wye fittings.
 - ii. Std Dwg S11 (For rigid main sewers) – lateral must be less than 50% the diameter of the sewermain,
 - iii. Std Dwg S11.2 (for rigid main sewers using bell end insert method) – for larger diameter laterals where manufactured inserts are not available; lateral must be less than 50% the diameter of the sewermain,
 - iv. Connections to manholes permitted when the connection is to rigid main sewers where the lateral exceeds 50% the diameter of the sewermain. – Connect obvert to obvert with the outlet pipe unless pipes are a similar size.
7. Water
 - a. Water Boundary condition requests must include the location of the service (map or plan with connection location(s) indicated) and the expected loads required by the proposed development, including calculations. Please provide the following information:
 - i. Location of service
 - ii. Type of development

- iii. The amount of fire flow required (per OBC or FUS).
 - iv. Average daily demand: ____ l/s.
 - v. Maximum daily demand: ____ l/s.
 - vi. Maximum hourly daily demand: ____ l/s.
- 8. Grading - the site will have to be raised to provide positive drainage towards the right of way. Currently the road around the site is higher than site elevation. The grade raise will need to be reviewed by a geotechnical engineer and a memo will be required stating the final grading plan is acceptable.
 - 9. The Phase 1 and if required, Phase 2 Environmental Site Assessments will be required.
 - 10. Sensitive Marine Clay: Please follow the City's 2017 Tree Planting in Sensitive Marine Clay guidelines [Tree Planting in Sensitive Marine Clay Soils - 2017 Guidelines](#).

Feel free to contact Bruce Bramah, Project Manager, for follow-up questions.

Noise

- 1. A noise study will be required to ensure proper building materials are used to mitigate traffic (and other) noise.

Feel free to contact Tracey Scaramozzino for follow-up questions.

Transportation

- 1. A Transportation Impact Assessment (TIA) is not required.
- 2. Complete and submit the [Transportation Demand Management Measures Checklist](#) and the [Transportation Demand Management Supportive Development Design and Infrastructure Checklist](#) in support of the application.
- 3. As the site proposed is residential, AODA legislation applies for all areas accessible to the public (i.e. outdoor pathways, parking, etc.).
- 4. On site plan:
 - a. Ensure site access meets the City's [Access Bylaw](#) and the associated [Access Design Requirements](#).
 - b. For an access on Flavescent Lane, provide corner clearance of 30m from Earl Armstrong or 15m from Jessie Chenevert Walk.
 - c. Show all details of the roads abutting the site; include such items as pavement markings, signage, accesses, on-street parking, and/or sidewalks.

- d. Sidewalks are required along Flavescent Lane and Jessie Chenevert Walk frontages (these are to be constructed through plan of subdivision. Sidewalks must be continuous across access as per City Specification SC7.1).
 - e. Turning movement diagrams required for all accesses showing the largest vehicle to access/egress the site.
 - f. Turning movement diagrams required for internal movements (loading areas, garbage).
 - g. Show all curb radii measurements; ensure that all curb radii are reduced as much as possible and fall within TAC guidelines (Figure 8.5.1).
 - h. Show dimensions for site elements (i.e. lane/aisle widths, access width and throat length, parking stalls, sidewalks, pedestrian pathways, etc.)
5. The site is within proximity of Earl Armstrong, a Surface Transportation Noise Study is required.

Feel free to contact Josiane Gervais, Transportation Project Manager, for follow-up questions.

Environment

1. There are no natural heritage features, species-at-risk, or surface water features on or near the subject property that would trigger the need for an Environmental Impact Statement (EIS).

An EIS is not required as part of this application.

2. The City has strong policies for tree planting to help meet the urban forest canopy goals, as well as to reduce the impacts of climate change and the urban heat island effect. The applicant is encouraged to find space for additional tree plantings wherever possible. Please note that the City prefers that all plantings be of native and non-invasive species.

Feel free to contact Mark Elliott, Environmental Planner, for follow-up questions.

Forestry

1. Comments not yet received; however, a reasonable number of trees are expected, of a larger caliper with ample soil volume.
2. Additional comments/clarifications will be provided during the review of the application by Hayley.



Feel free to contact Hayley.Murray@ottawa.ca, Forester, for follow-up questions.

Parkland

1. Parkland conveyance, as per Parkland Dedication [By-law No. 2022-280](#), was provided as part of the previous Plan of Subdivision approval. The density of this proposal, does not create an additional dedication.

Feel free to contact lorraine.stevens@ottawa.ca, Parks Planner, for follow-up questions.

Community issues

1. This file is not yet public and no community comments have been received.

Submission Requirements and Fees

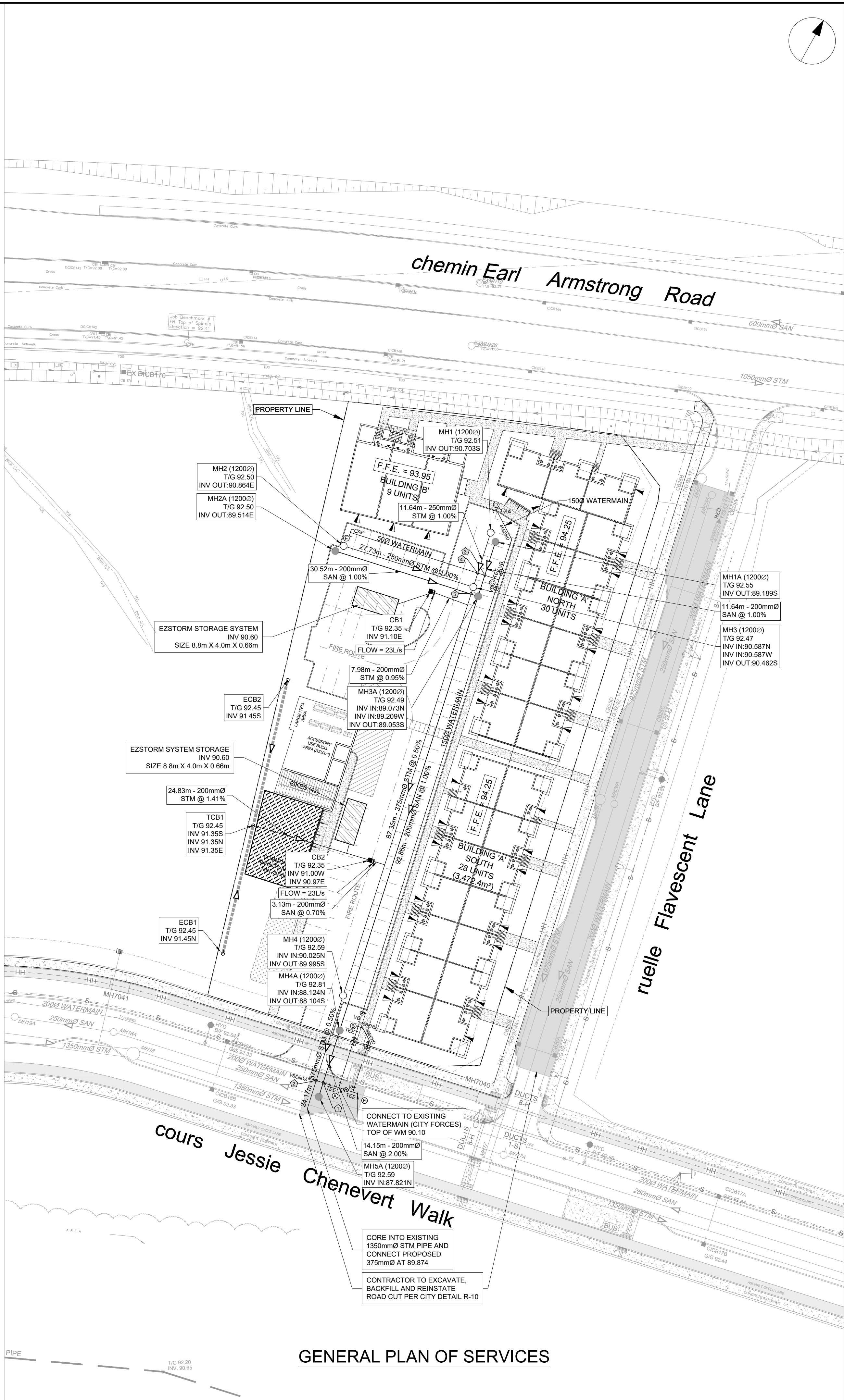
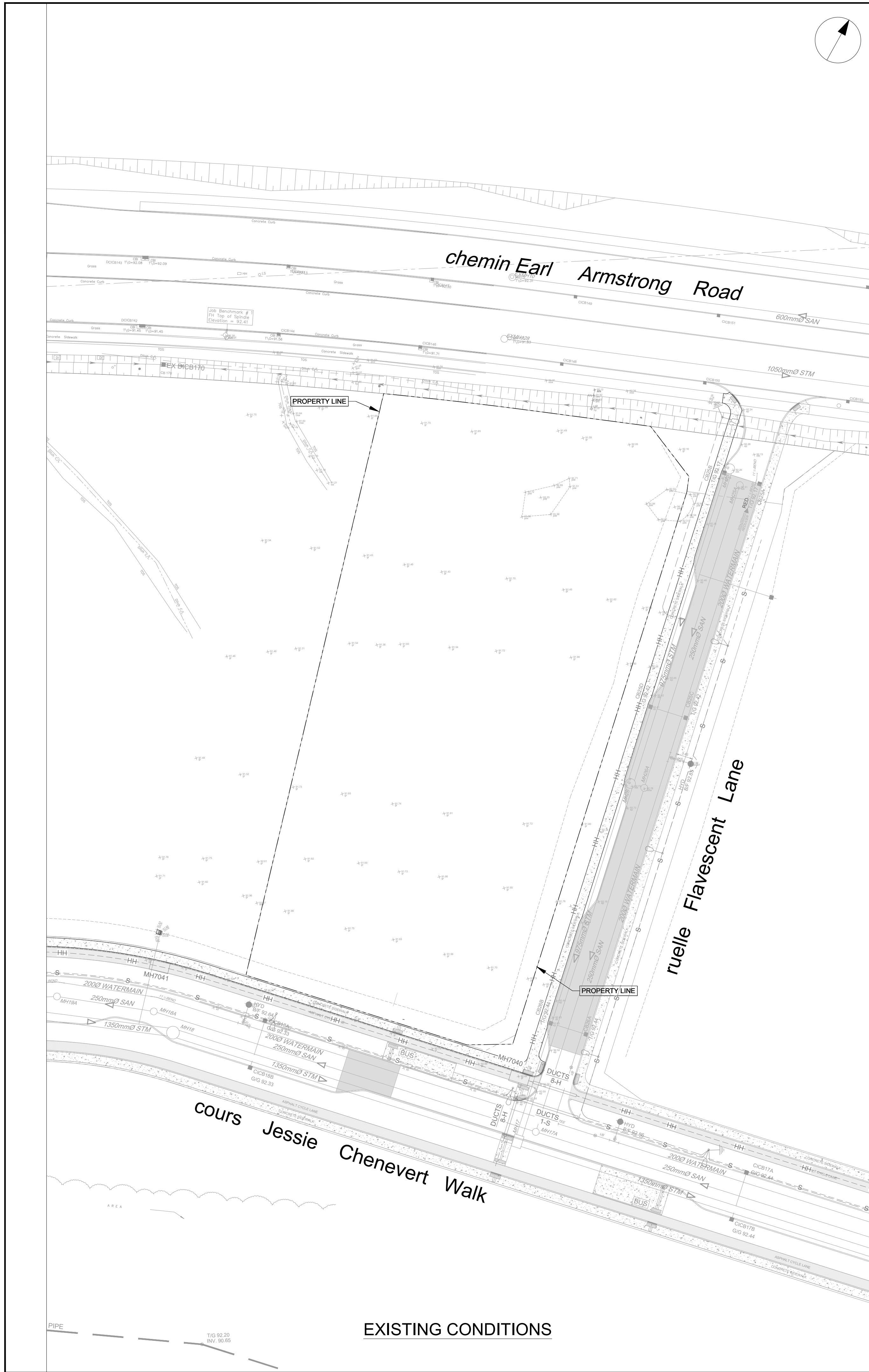
1. This will be a site plan control application and possible minor zoning or minor variance to deal with the parking rate.
 - a. Additional information regarding fees related to planning applications can be found [here](#).
2. The attached **Study and Plan Identification List** outlines the information and material that has been identified as either required (R) or advised (A) as part of a future complete application submission.
 - a. The required plans and studies must meet the City's Terms of Reference (ToR) and/or Guidelines, as available on [Ottawa.ca](#). These ToR and Guidelines outline the specific requirements that must be met for each plan or study to be deemed adequate.
3. All of the above comments or issues should be addressed to ensure the effectiveness of the application submission review.

Should there be any questions, please do not hesitate to contact myself or the contact identified for the above areas / disciplines.

A handwritten signature in black ink, appearing to read "Tracey Scaramozzino", with a stylized flourish at the end.

Yours Truly,
Tracey Scaramozzino

c.c. Lisa Stern, Urban Design
Bruce Bramah, Infrastructure Project Manager
Josiane Gervais, Transportation Project Manager
Mark Elliott, Environmental Planner
Hayley Murray, Planning Forester
Lorraine Stevens, Parks Planner





2193 Arch Street, Ottawa, ON
K1G 2H5

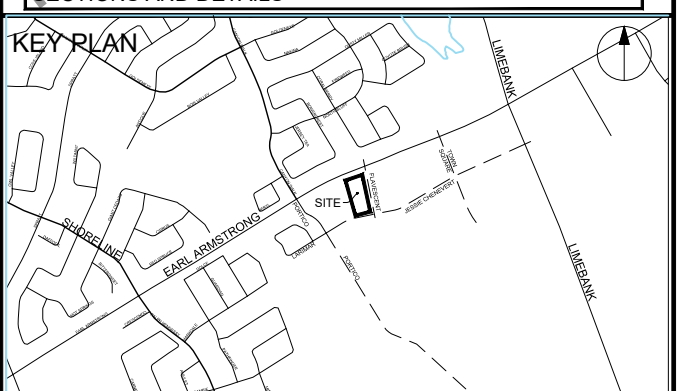
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ISSUES		
No.	DESCRIPTION	DATE
1	ISSUED FOR COORDINATION	2026-06-08
2	SUBMISSION FOR SPA	2026-06-30
3	-	-
4	-	-

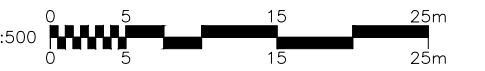
SEE 010 FOR NOTES, LEGEND, CB TABLE, STREET SECTIONS AND DETAILS

KEY PLAN



CONSULTANTS

1:500



SEAL



PROJECT

2604 JESSIE CHENEVERT WALK

PROJECT NO:

30339828

DRAWN BY:

C.C./D.D.

PROJECT MGR:

S.E.L.

CHECKED BY:

T.R.B.

APPROVED BY:

S.E.L.

SHEET TITLE

EXISTING CONDITIONS -
GENERAL PAN OF SERVICES

SHEET NUMBER

C-001

ISSUE

1

FILE # D07-XX-XX-XXXX

PLAN # xxxxx

Appendix B



ARCADIS PROFESSIONAL SERVICES (CANADA) INC.
500-333 Preston Street
Ottawa, Ontario K1S 5N4 Canada
arcadis.com

WATERMAIN DEMAND CALCULATION SHEET

WATERMAIN DEMAND CALCULATION SHEET
RSS Town Centre Bldg2 | Urbandale
x.6.0 | Rev #1 | 2026-05-01
Prepared By: SEL | Checked By: DV

NODE	RESIDENTIAL				NON-RESIDENTIAL (ICI)			AVERAGE DAILY DEMAND (l/s)			MAXIMUM DAILY DEMAND (l/s)			MAXIMUM HOURLY DEMAND (l/s)			FIRE DEMAND (l/min)
	Singele Family	Town	Apartment	POPULATION	INDUST. (ha)	COMM. (m2)	INSTIT. (ha)	RESIDENTIAL	ICI	TOTAL	RESIDENTIAL	ICI	TOTAL	RESIDENTIAL	ICI	TOTAL	
Block 2		67		180.9				0.59		0.59	1.47		1.47	3.22		3.22	14,000

POPULATION DENSITY		WATER DEMAND RATES		PEAKING FACTORS		FIRE DEMANDS
Single Family	3.4 persons/unit	Residential	280 l/cap/day	Maximum Daily		Single Family
Townhouse/Semi	2.7 persons/unit	Commercial Shopping Center	2,500 L/(1000m2)/day	Residential	2.5 x avg. day	Semi Detached & Townhouse
				Institutional	1.5 x avg. day	
Apartment	1.4 persons/unit	Institutional	75 L/cap/day	Maximum Hourly		Medium Density 14,000 l/min
				Residential	2.2 x avg. day	
				Institutional	1.8 x avg. day	

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FIRE UNDERWRITERS SURVEY

RSS Town Centre Blk2 | Urbandale
x-6.0 | Rev #1 | 2026-05-01
Prepared By: SL | Checked By: TB

STEP	Contents	Description	Adjustment Factor	Result
1	Building A, Compartment 1 3-storey residential	Area per Floor 515	Floors 3	1545 m2
	Total Effective Floor Area			1545 m2
2	Type of Construction	Type V Wood Frame 1.5 Type III Ordinary Construction 1.0 Type II Noncombustible Construction 0.8 Type I Fire Resistive Construction 0.6	Type V Wood Frame 1.5	
3	Required Fire Flow	RFF = 220C√A, rounded to nearest 1000 L/min		13000 L/min
4	Occupancy and Contents	Noncombustible Contents -25% Limited Combustible Contents -15% Combustible Contents 0% Free Burning Contents 15% Rapid Burning Contents 25%	Limited Combustible Contents -15%	-1950 L/min
	Fire Flow			11050 L/min
5	Automatic Sprinkler Protection	Automatic Sprinkler Conforming to NFPA 13 -30% Standard Water Supply for both the system and Fire Department Hose Lines -10% Fully Supervised System -10%	No No No	0 L/min
	Total Sprinkler Adjustment			0 L/min
6	Exposure Adjustment	Based on Table 6 Exposure Adjustment Charges for Subject Building		
	North	Firewall	With unprotected opening 10%	1105 L/min
	South	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%	0 L/min
		East	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%
	West		Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%
		Total Exposure Adjustment		
7	Total Required Fire Flow			12155 L/min
		Rounded to Nearest 1000 L/min		12000 L/min
				200 L/s

Notes 1. Fire flow calculation are based on Fire Underwriters Survey version 2020.

2. If any vertical opening in the building are unprotected (e.g. interconnected floor spaces, elevators etc.), consider the two largest adjoining floor area plus 50% of all floors immediately above them up to a maximum of eight.

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FIRE UNDERWRITERS SURVEY

RSS Town Centre Blk2 | Urbandale
x-6.0 | Rev #1 | 2026-05-01
Prepared By: SL | Checked By: TB

STEP	Contents	Description	Adjustment Factor	Result
1	Building A, Compartment 2 3-storey residential	Area per Floor 455	Floors 3	1365 m2
	Total Effective Floor Area			1365 m2
2	Type of Construction	Type V Wood Frame 1.5 Type III Ordinary Construction 1.0 Type II Noncombustible Construction 0.8 Type I Fire Resistive Construction 0.6	Type V Wood Frame 1.5	
3	Required Fire Flow	RFF = 220C√A, rounded to nearest 1000 L/min		12000 L/min
4	Occupancy and Contents	Noncombustible Contents -25% Limited Combustible Contents -15% Combustible Contents 0% Free Burning Contents 15% Rapid Burning Contents 25%	Limited Combustible Contents -15%	-1800 L/min
	Fire Flow			10200 L/min
5	Automatic Sprinkler Protection	Automatic Sprinkler Conforming to NFPA 13 -30% Standard Water Supply for both the system and Fire Department Hose Lines -10% Fully Supervised System -10%	No No No	0 L/min
	Total Sprinkler Adjustment			0 L/min
6	Exposure Adjustment	Based on Table 6 Exposure Adjustment Charges for Subject Building		
	North	Firewall	With unprotected opening 10%	1020 L/min
	South	Firewall	With unprotected opening 10%	1020 L/min
	East	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%	0 L/min
	West	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%	0 L/min
	Total Exposure Adjustment			2040 L/min
7	Total Required Fire Flow			12240 L/min
		Rounded to Nearest 1000 L/min		12000 L/min
				200 L/s

Notes 1. Fire flow calculation are based on Fire Underwriters Survey version 2020.

2. If any vertical opening in the building are unprotected (e.g. interconnected floor spaces, elevators etc.), consider the two largest adjoining floor area plus 50% of all floors immediately above them up to a maximum of eight.

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FIRE UNDERWRITERS SURVEY

RSS Town Centre Blk2 | Urbandale
x-6.0 | Rev #1 | 2026-05-01
Prepared By: SL | Checked By: TB

STEP	Contents	Description	Adjustment Factor	Result
1	Building A, Compartment 3 3-storey residential	Area per Floor 525	Floors 3	1575 m2
	Total Effective Floor Area			1575 m2
2	Type of Construction	Type V Wood Frame 1.5 Type III Ordinary Construction 1.0 Type II Noncombustible Construction 0.8 Type I Fire Resistive Construction 0.6	Type V Wood Frame 1.5	
3	Required Fire Flow	RFF = 220C√A, rounded to nearest 1000 L/min		13000 L/min
4	Occupancy and Contents	Noncombustible Contents -25% Limited Combustible Contents -15% Combustible Contents 0% Free Burning Contents 15% Rapid Burning Contents 25%	Limited Combustible Contents -15%	-1950 L/min
	Fire Flow			11050 L/min
5	Automatic Sprinkler Protection	Automatic Sprinkler Conforming to NFPA 13 -30% Standard Water Supply for both the system and Fire Department Hose Lines -10% Fully Supervised System -10%	No No No	0 L/min
	Total Sprinkler Adjustment			0 L/min
6	Exposure Adjustment	Based on Table 6 Exposure Adjustment Charges for Subject Building		
	North	Firewall	With unprotected opening 10%	1105 L/min
	South	Firewall	With unprotected opening 10%	1105 L/min
	East	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%	0 L/min
	West	Separation (m) 18.1 Length X Height Factor (m.storeys) 29.3 Construction Type Type V	With unprotected opening 11%	1216 L/min
	Total Exposure Adjustment			3426 L/min
7	Total Required Fire Flow			14476 L/min
		Rounded to Nearest 1000 L/min		14000 L/min

233 L/s

Notes 1. Fire flow calculation are based on Fire Underwriters Survey version 2020.

2. If any vertical opening in the building are unprotected (e.g. interconnected floor spaces, elevators etc.), consider the two largest adjoining floor area plus 50% of all floors immediately above them up to a maximum of eight.

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FIRE UNDERWRITERS SURVEY

RSS Town Centre Blk2 | Urbandale
x-6.0 | Rev #1 | 2026-05-01
Prepared By: SL | Checked By: TB

STEP	Contents	Description	Adjustment Factor	Result
1	Building A, Compartment 4 3-storey residential	Area per Floor 525	Floors 3	1575 m2
	Total Effective Floor Area			1575 m2
2	Type of Construction	Type V Wood Frame 1.5 Type III Ordinary Construction 1.0 Type II Noncombustible Construction 0.8 Type I Fire Resistive Construction 0.6	Type V Wood Frame 1.5	
3	Required Fire Flow	RFF = 220C√A, rounded to nearest 1000 L/min		13000 L/min
4	Occupancy and Contents	Noncombustible Contents -25% Limited Combustible Contents -15% Combustible Contents 0% Free Burning Contents 15% Rapid Burning Contents 25%	Limited Combustible Contents -15%	-1950 L/min
	Fire Flow			11050 L/min
5	Automatic Sprinkler Protection	Automatic Sprinkler Conforming to NFPA 13 -30% Standard Water Supply for both the system and Fire Department Hose Lines -10% Fully Supervised System -10%	No No No	0 L/min
	Total Sprinkler Adjustment			0 L/min
6	Exposure Adjustment	Based on Table 6 Exposure Adjustment Charges for Subject Building		
	North	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%	0 L/min
	South	Firewall	With unprotected opening 10%	1105 L/min
	East	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%	0 L/min
	West	Separation (m) 7.1 Length X Height Factor (m.storeys) 29.3 Construction Type Type V	With unprotected opening 16%	1768 L/min
	Total Exposure Adjustment			2873 L/min
7	Total Required Fire Flow			13923 L/min
		Rounded to Nearest 1000 L/min		14000 L/min

233 L/s

Notes 1. Fire flow calculation are based on Fire Underwriters Survey version 2020.

2. If any vertical opening in the building are unprotected (e.g. interconnected floor spaces, elevators etc.), consider the two largest adjoining floor area plus 50% of all floors immediately above them up to a maximum of eight.

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FIRE UNDERWRITERS SURVEY

RSS Town Centre Blk2 | Urbandale
x-6.0 | Rev #1 | 2026-05-01
Prepared By: SL | Checked By: TB

STEP	Contents	Description	Adjustment Factor	Result
1	Building B 2-storey residential	Area per Floor 330	Floors 2	660 m2
	Total Effective Floor Area			660 m2
2	Type of Construction	Type V Wood Frame 1.5 Type III Ordinary Construction 1.0 Type II Noncombustible Construction 0.8 Type I Fire Resistive Construction 0.6	Type V Wood Frame 1.5	
3	Required Fire Flow	RFF = 220C√A, rounded to nearest 1000 L/min		8000 L/min
4	Occupancy and Contents	Noncombustible Contents -25% Limited Combustible Contents -15% Combustible Contents 0% Free Burning Contents 15% Rapid Burning Contents 25%	Limited Combustible Contents -15%	-1200 L/min
	Fire Flow			6800 L/min
5	Automatic Sprinkler Protection	Automatic Sprinkler Conforming to NFPA 13 -30% Standard Water Supply for both the system and Fire Department Hose Lines -10% Fully Supervised System -10%	No No No	0 L/min
	Total Sprinkler Adjustment			0 L/min
6	Exposure Adjustment	Based on Table 6 Exposure Adjustment Charges for Subject Building		
	North	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%	0 L/min
	South	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%	0 L/min
	East	Separation (m) 7.1 Length X Height Factor (m.storeys) 25.2 Construction Type Type V	With unprotected opening 16%	1088 L/min
	West	Separation (m) >30 Length X Height Factor (m.storeys) Construction Type	0%	0 L/min
	Total Exposure Adjustment			1088 L/min
	7	Total Required Fire Flow		
Rounded to Nearest 1000 L/min			8000 L/min	

133 L/s

Notes 1. Fire flow calculation are based on Fire Underwriters Survey version 2020.

2. If any vertical opening in the building are unprotected (e.g. interconnected floor spaces, elevators etc.), consider the two largest adjoining floor area plus 50% of all floors immediately above them up to a maximum of eight.

Boundary Conditions 50 Flavescent Lane – 2026

Provided Information

Scenario	Demand	
	L/min	L/s
Average Daily Demand	35.4	0.59
Maximum Daily Demand	88.2	1.47
Peak Hour	193.2	3.22
Fire Flow Demand #1	14,000.0	233.33

Location



Results

Existing Conditions

Connection 1 - Jessie Chenevert Walk

Demand Scenario	Head (m)	Pressure¹ (psi)
Maximum HGL	131.1	55.7
Peak Hour	124.2	46.0
Max Day plus Fire Flow #1	111.1	27.4

¹ Ground Elevation = 91.9 m

Connection 2 - Jessie Chenevert Walk

Demand Scenario	Head (m)	Pressure¹ (psi)
Maximum HGL	131.1	55.8
Peak Hour	124.2	46.0
Max Day plus Fire Flow #1	111.2	27.6

¹ Ground Elevation = 91.8 m

SUC

Connection 1 - Jessie Chenevert Walk

Demand Scenario	Head (m)	Pressure¹ (psi)
Maximum HGL	147.0	78.4
Peak Hour	144.5	74.9
Max Day plus Fire Flow #1	129.0	52.8

¹ Ground Elevation = 91.9 m

Connection 2 - Jessie Chenevert Walk

Demand Scenario	Head (m)	Pressure¹ (psi)
Maximum HGL	147.0	78.4
Peak Hour	144.5	74.9
Max Day plus Fire Flow #1	129.1	53.0

¹ Ground Elevation = 91.8 m

Disclaimer

The boundary condition information is based on current operation of the city water distribution system. The computer model simulation is based on the best information available at the time. The operation of the water distribution system can change on a regular basis, resulting in a variation in boundary conditions. The physical properties of watermains deteriorate over time, as such must be assumed in the absence of actual field test data. The variation in physical watermain properties can therefore alter the results of the computer model simulation. Fire Flow analysis is a reflection of available flow in the watermain; there may be additional restrictions that occur between the watermain and the hydrant that the model cannot take into account.

Average Day

		ID	Demand (L/s)	Elevation (m)	Head (m)	Pressure (kPa)
1	☐	J10	0.00	92.50	147.00	534.06
2	☐	J12	0.07	92.70	147.00	532.10
3	☐	J14	0.09	92.65	147.00	532.58
4	☐	J16	0.07	92.50	147.00	534.05
5	☐	J18	0.04	92.60	147.00	533.07
6	☐	J20	0.08	92.70	147.00	532.07
7	☐	J22	0.00	92.50	147.00	534.06

Max Day + Fireflow

		ID	Capacity Assessment	Total Demand (L/s)	Hydrant Available Flow (L/s)	Critical Node ID for Design Run	Critical Node Pressure at Available Flow (kPa)	Critical Node Pressure at Fire Demand (kPa)	Critical Pressure for Design Run (kPa)	Hydrant Design Flow (L/s)	Hydrant Pressure at Design Flow (kPa)	Critical Node Pressure at Design Flow (kPa)
1	☐	J10	PASS	233.33	956.01	J10	149.96	179.94	149.96	955.85	149.97	149.97
2	☐	J22	PASS	233.33	969.56	J22	149.96	180.79	149.96	969.41	149.97	149.97

Peak Hours

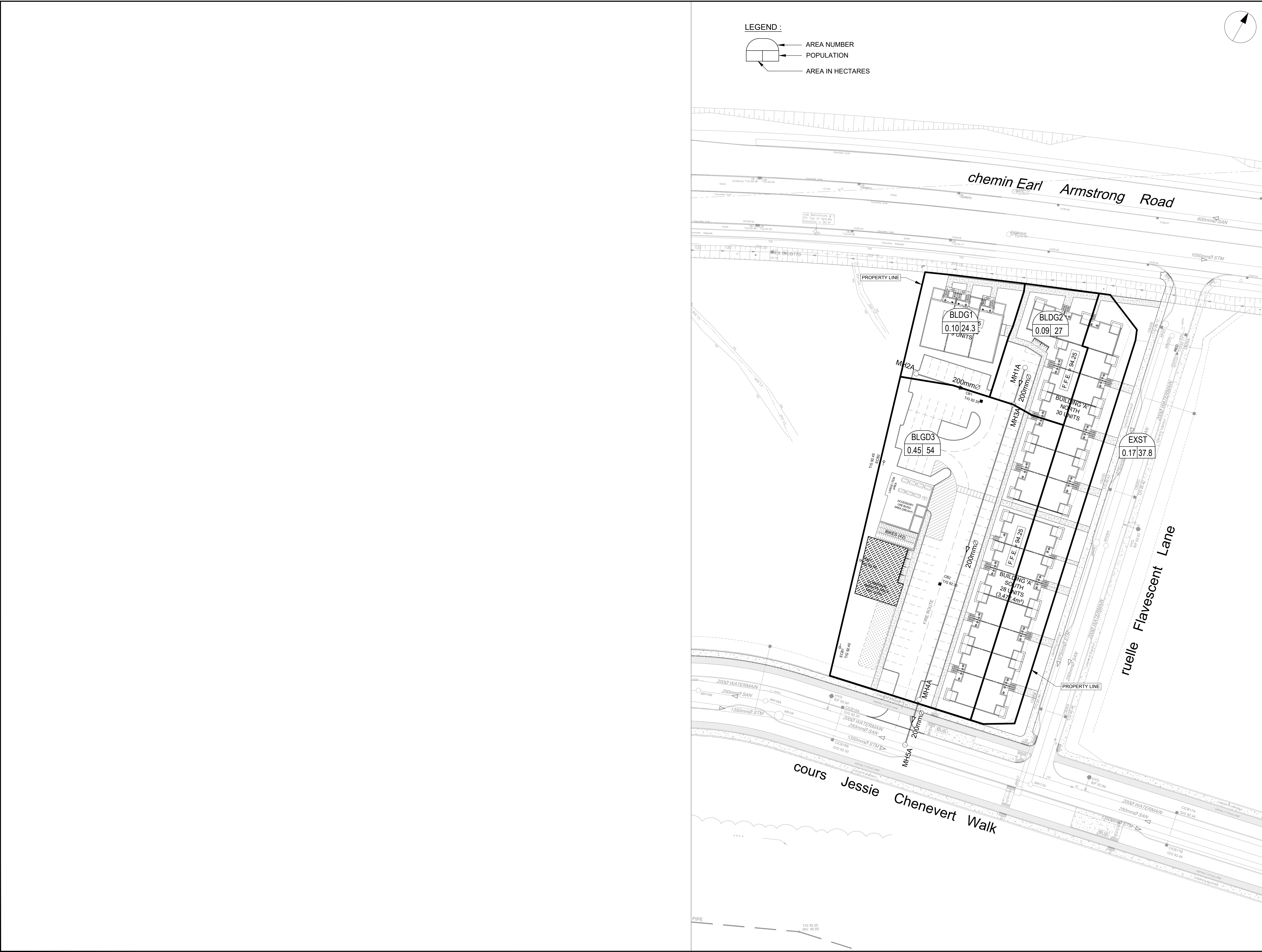
		ID	Demand (L/s)	Elevation (m)	Head (m)	Pressure (kPa)
1	☐	J10	0.00	92.50	124.20	310.63
2	☐	J12	0.39	92.70	124.20	308.67
3	☐	J14	0.48	92.65	124.19	309.09
4	☐	J16	0.39	92.50	124.19	310.55
5	☐	J18	0.19	92.60	124.19	309.57
6	☐	J20	0.43	92.70	124.13	307.99
7	☐	J22	0.00	92.50	124.20	310.63

		ID	From Node	To Node	Length (m)	Diameter (mm)	Roughness	Flow (L/s)	Velocity (m/s)	Headloss (m)	HL/1000 (m/k-m)	Status	Flow Reversal Count
1	☐	P11	J10	J12	13.06	155.00	100.00	0.99	0.05	0.00	0.05	Open	0
2	☐	P13	J12	J14	62.08	155.00	100.00	1.49	0.08	0.01	0.11	Open	0
3	☐	P15	J14	J16	33.36	155.00	100.00	1.01	0.05	0.00	0.05	Open	0
4	☐	P17	J16	J18	15.52	155.00	100.00	0.19	0.01	0.00	0.00	Open	0
5	☐	P19	J16	J20	22.84	50.00	100.00	0.43	0.22	0.06	2.67	Open	0
6	☐	P21	J22	J12	15.91	155.00	100.00	0.89	0.05	0.00	0.04	Open	0
7	☐	P23	CONN1	J10	1.00	204.00	110.00	0.99	0.03	0.00	0.01	Open	0
8	☐	P25	CONN2	J22	1.00	204.00	110.00	0.89	0.03	0.00	0.01	Open	0



Appendix C

LOCATION				RESIDENTIAL								ICI AREAS								INFILTRATION ALLOWANCE			FIXED FLOW (L/s)		TOTAL FLOW	PROPOSED SEWER DESIGN											
STREET	AREA ID	FROM MH	TO MH	AREA w/ Units (Ha)	UNIT TYPES				AREA w/o Units (Ha)	POPULATION		RES PEAK FACTOR	PEAK FLOW (L/s)	INSTITUTIONAL		COMMERCIAL		INDUSTRIAL		ICI PEAK FACTOR	PEAK FLOW (L/s)	AREA (Ha)		FLOW (L/s)	IND	CUM	(L/s)	IND	CUM	(L/s)	CAPACITY (L/s)	LENGTH (m)	DIA (mm)	SLOPE (%)	VELOCITY (full) (m/s)	AVAILABLE CAPACITY	
					1 BDRM	2 BDRM	3 BDRM			IND	CUM			IND	CUM	IND	CUM	IND	CUM			IND	CUM													L/s	(%)
Extendicare																																					
SITE PLAN		MH2A	MH3A	0.10						0.0	0.0	3.80	0.00	0.00	0.00		0.00		0.00	1.00	0.00	0.10	0.10	0.03		0.00	0.03	34.22	104.50	200	1.00	1.055	34.18	99.90%			
		MH1A	MH3A	0.09						0.0	0.0	3.80	0.00	0.00	0.00		0.00		0.00	1.00	0.00	0.09	0.09	0.03		0.00	0.03	34.22	104.50	200	1.00	1.055	34.19	99.91%			
		MH3A	MH4A	0.45						0.0	0.0	3.80	0.00	0.00	0.00		0.00		0.00	1.00	0.00	0.45	0.64	0.21		0.00	0.21	34.22	104.50	200	1.00	1.055	34.01	99.38%			
		MHA4	MH5A							0.0	0.0	3.80	0.00	0.00	0.00		0.00		0.00	1.00	0.00	0.00	0.64	0.21		0.00	0.21	48.39	104.50	200	2.00	1.492	48.18	99.56%			
Design Parameters:				Notes: 1. Mannings coefficient (n) = 0.013 2. Demand (per capita): 280 L/day 200 L/day 3. Infiltration allowance: 0.33 L/s/Ha 4. Residential Peaking Factor: Harmon Formula = 1+(14/(4+(P/1000)^0.5))0.8 where K = 0.8 Correction Factor 5. Commercial and Institutional Peak Factors based on total area, 1.5 if greater than 20%, otherwise 1.0								Designed: DV				No. 1		Revision Submission for SPA								Date 2026-06-30											
Residential		ICI Areas										Checked: SEL																									
1 BDRM	1.4	p/p/u																																			
2BDRM	2.1	p/p/u	INST	28,000	L/Ha/day																																
3BDRM	3.1	p/p/u	COM	28,000	L/Ha/day																																
3+BDRM		p/p/u	IND	35,000	L/Ha/day																																
Other	60	p/p/Ha		17000	L/Ha/day																																
				MOE Chart																																	
												Dwg. Reference: 30339838-400																									
																File Reference: 30339838.00												Date: 2026-06-30									
																										Sheet No: 1 of 1											



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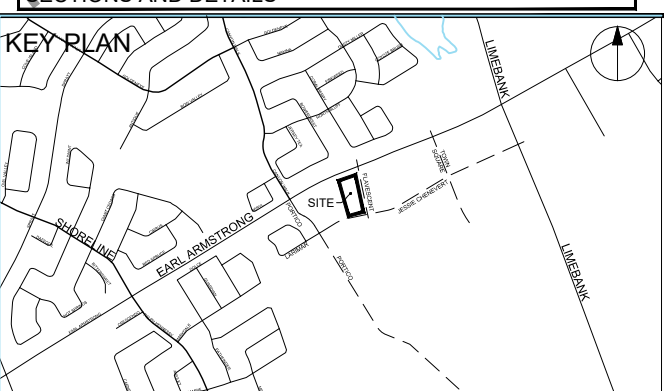
ISSUES

No.	DESCRIPTION	DATE
1	ISSUED FOR COORDINATION	2026-06-08
2	SUBMISSION FOR SPA	2026-06-30
3	-	-
4	-	-

NOT FOR CONSTRUCTION

SEE 10 FOR NOTES, LEGEND, CB TABLE, STREET SECTIONS AND DETAILS

KEY PLAN



CONSULTANTS

SEAL



PROJECT

2604 JESSIE CHENEVERT WALK

PROJECT NO:

30339828

DRAWN BY:

C.C./D.D.

PROJECT MGR:

S.E.L.

CHECKED BY:

T.R.B.

APPROVED BY:

S.E.L.

SHEET TITLE

SANITARY DRAINAGE PLAN

SHEET NUMBER

C-400

ISSUE

1

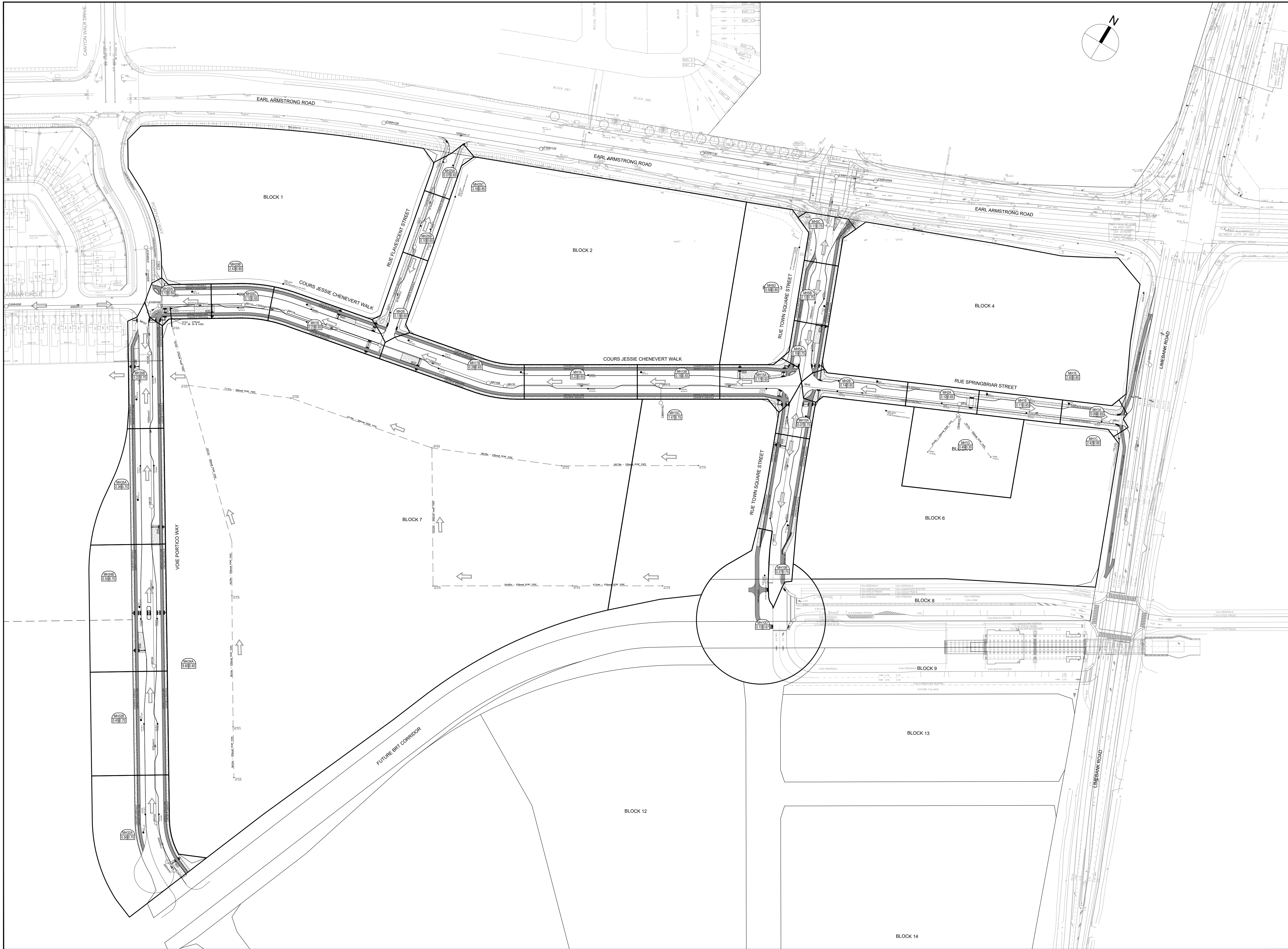
Appendix D

Design Brief Phase 7A

980 Earl Armstrong Road & 4700 Limebank Road, Riverside South

DRAINAGE AREA ID	CONTINUOUS/ SAG	ROAD TYPE	MINOR SYSTEM DESIGN TARGET (BASED ON ROAD TYPE)		100 YEAR CAPTURED FLOW (L/S) (3 HOUR CHICAGO STORM)	ICD ORIFICE SIZE (MM DIA.) (TWO ICDs PER DRAINAGE AREA)	
			MINOR SYSTEM DESIGN STORM	GENERATED FLOW ON INDIVIDUAL SEGMENT SIMULATED (L/S)			
S2B-Ph7A	Sag	26mROW-9.4mAsphalt	5	26.9	33.7	83	83
S32A-Ph7A	Sag	26mROW-9.4mAsphalt	5	127.0	141.6	178	152
S32B-Ph7A	Sag	26mROW-9.4mAsphalt	5	102.8	119.3	152	152
S20C-Ph7A	Sag	26mROW-9.4mAsphalt	5	21.8	33.8	83	83
S34B-Ph7A	Sag	26mROW-9.4mAsphalt	5	125.6	143.4	178	152
S35A-Ph7A	Sag	26mROW-9.4mAsphalt	5	82.8	134.0	178	152
S35B-Ph7A	Sag	26mROW-9.4mAsphalt	5	50.1	51.6	102	102
S5A-Ph7A	Sag	26mROW-12mAsphalt	2	16.2	33.5	83	83
S5B-Ph7A	Sag	26mROW-12mAsphalt	2	20.0	34.4	83	83
S5C-Ph7A	Sag	26mROW-12mAsphalt	2	18.3	42.4	94	94
Development Blocks							
B20B-Ph7A	Block	Rear Yard	2	478.8	479.0	n/a	
B25C-Ph7A	Block	Rear Yard	2	621.7	622.0	n/a	
B1C-Ph7A	Block	Rear Yard	2	476.2	477.0	n/a	
B1D-Ph7A	Block	Rear Yard	2	15.4	16.0	n/a	
B1E-Ph7A	Block	Rear Yard	2	492.6	493.0	n/a	
B15C-Ph7A	Block	Rear Yard	2	113.0	113.0	n/a	
B34A-Ph7A	Block	Rear Yard	2	578.7	579.0	n/a	
B5D-Ph7A	Block	Rear Yard	2	114.6	115.0	n/a	
EXT-Ph7A	External	External	100	307.4	307	n/a	

The available on-site storage and the results of the PCSWMM evaluation for Town Center Phase 7A are presented in **Table 4-**. The ponding plan is presented on **Drawing 144320-200** to **Drawing 144320-202**.



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Arcadis Professional Services (Canada) Inc.
formerly B Group Professional Services (Canada) Inc.

ISSUES		
No.	DESCRIPTION	DATE
1	SUBMISSION 1 FOR CITY REVIEW	2024-07-19
2	SUBMISSION 2 FOR CITY REVIEW	2024-10-29
3	SUBMISSION 3 FOR CITY REVIEW	2025-01-17

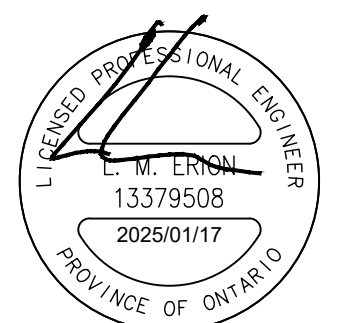
SEE 010, 011 FOR NOTES, LEGEND, CB TABLE, STREET SECTIONS AND DETAILS

KEY PLAN



1:1250 0 12.5 25 37.5 62.5m

SEAL



PRIME CONSULTANT



333 Preston Street - Suite 500
Ottawa ON K1S 5N4 Canada
tel 613 225 1311
www.arcadis.com

PROJECT

RSS TOWN CENTER
980 EARL ARMSTRONG & 4700
LIMEBANK ROAD
PHASE 7A

PROJECT NO:
144320

DRAWN BY: C.C	CHECKED BY: L.E.
PROJECT MGR: L.E.	APPROVED BY: L.E.

SHEET TITLE

STORM DRAINAGE AREA PLAN

SHEET NUMBER	500	ISSUE	3
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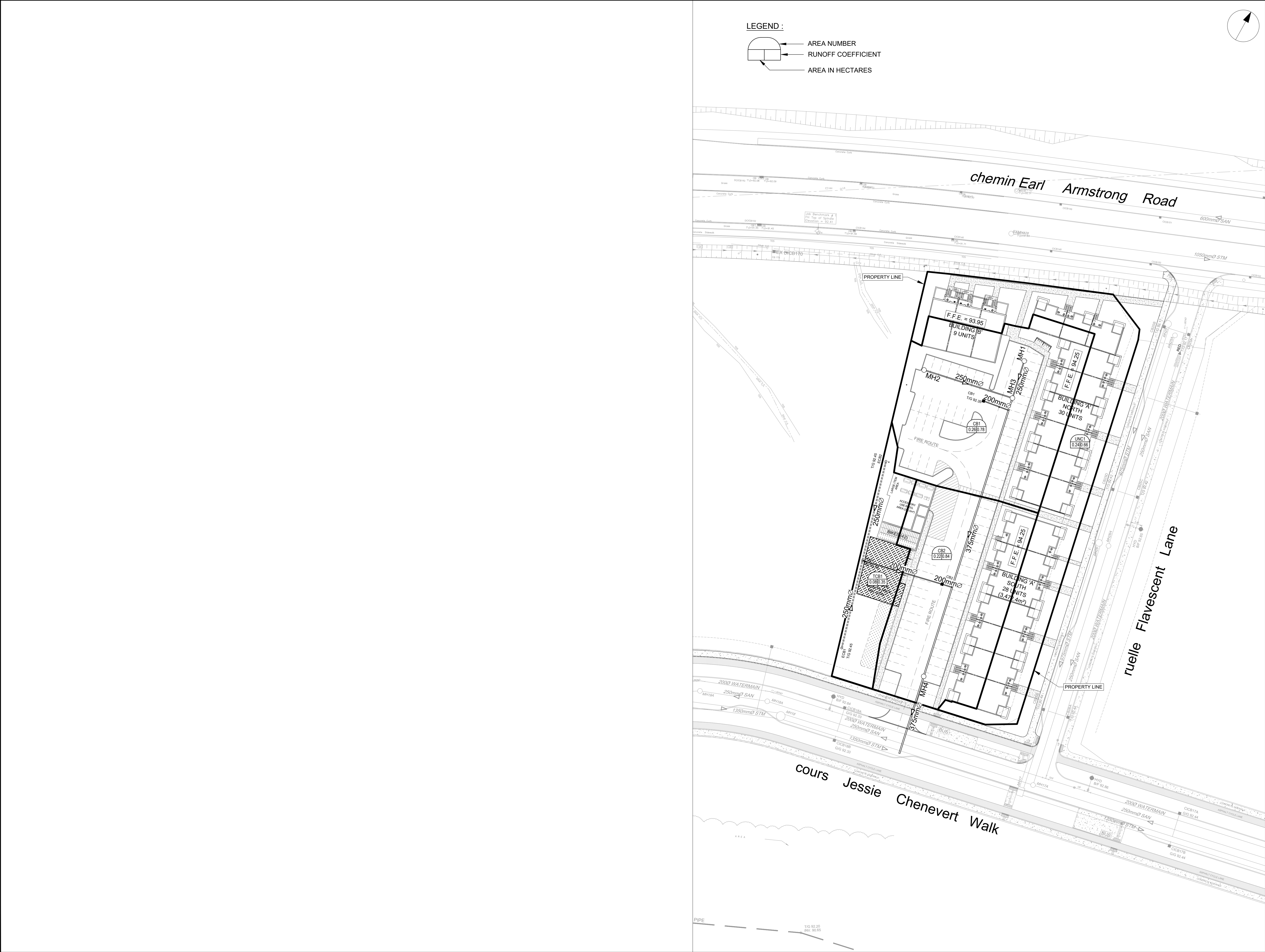


ARCADIS
500-333 Preston Street
Ottawa, Ontario K1S 5N4 Canada
tel 613 225 1311 fax 613 225 9868
arcadis.com

STORM SEWER DESIGN SHEET

2604 Jessie Chenevert
RSS PH7 Block 2
City of Ottawa

LOCATION				AREA (Ha)										RATIONAL DESIGN FLOW														SEWER DATA														
STREET	AREA ID	FROM	TO	C=	C=	C=	C=	C=	C=	C=	C=	C=	IND	CUM	INLET	TIME	TOTAL	i (2)	i (5)	i (10)	i (100)	2yr PEAK	5yr PEAK	10yr PEAK	100yr PEAK	FIXED FLOW		DESIGN	CAPACITY	LENGTH	PIPE SIZE (mm)			SLOPE	VELOCITY	AVAIL CAP (2yr)						
				0.20	0.31	0.32	0.35	0.50	0.60	0.61	0.78	0.84	0.90	2.78AC	2.78AC	(min)	IN PIPE	(min)	(mm/hr)	(mm/hr)	(mm/hr)	(mm/hr)	FLOW (L/s)	FLOW (L/s)	FLOW (L/s)	FLOW (L/s)	IND	CUM			FLOW (L/s)	DIA	W			H	(%)	(m/s)	(L/s)	(%)		
Block 2																																										
		MH2	MH3										0.00	0.00	10.00	0.38	10.38	76.81	104.19	122.14	178.56	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.04	27.73	250			1.00	1.224	62.04	100.00%					
		MH1	MH3										0.00	0.00	10.00	0.16	10.16	76.81	104.19	122.14	178.56	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.04	11.64	250			1.00	1.224	62.04	100.00%					
		MH3	MH4				0.08					0.26	0.22	1.16	1.16	10.38	1.28	11.66	75.39	102.24	119.84	175.18	87.10	118.13	138.46	202.40	0.00	0.00	87.10	129.34	87.35	375			0.50	1.134	42.24	32.66%				
		MH4	Exst										0.00	1.16	11.66	0.36	12.02	70.97	96.17	112.69	164.68	81.99	111.11	130.20	190.27	0.00	0.00	81.99	129.34	24.17	375			0.50	1.134	47.34	36.61%					
Definitions: Q = 2.78CIA, where: Q = Peak Flow in Litres per Second (L/s) A = Area in Hectares (Ha) i = Rainfall intensity in millimeters per hour (mm/hr) [i = 732.951 / (TC+6.199)^0.810] 2 YEAR [i = 998.071 / (TC+6.053)^0.814] 5 YEAR [i = 1174.184 / (TC+6.014)^0.816] 10 YEAR [i = 1735.688 / (TC+6.014)^0.820] 100 YEAR				Notes: 1. Mannings coefficient (n) = 0.013										Designed: DV				No.										Revision					Date									
																		1										Submission for SPA										2026-06-30				
														Checked: SEL																												
														Dwg. Reference: 30339839-500																												
																												File Reference: 30339838.00										Date: 2026-06-30				



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No.	DESCRIPTION	DATE
1	ISSUED FOR COORDINATION	2026-06-08
2	SUBMISSION FOR SPA	2026-06-30
3	-	-
4	-	-

NOT FOR CONSTRUCTION

SEE 010 FOR NOTES, LEGEND, CB TABLE, STREET SECTIONS AND DETAILS

KEY PLAN

CONSULTANTS

SEAL



PROJECT

2604 JESSIE CHENEVERT WALK

PROJECT NO:

30339828

DRAWN BY:

C.C./D.D.

PROJECT MGR:

S.E.L.

CHECKED BY:

T.R.B.

APPROVED BY:

S.E.L.

SHEET TITLE

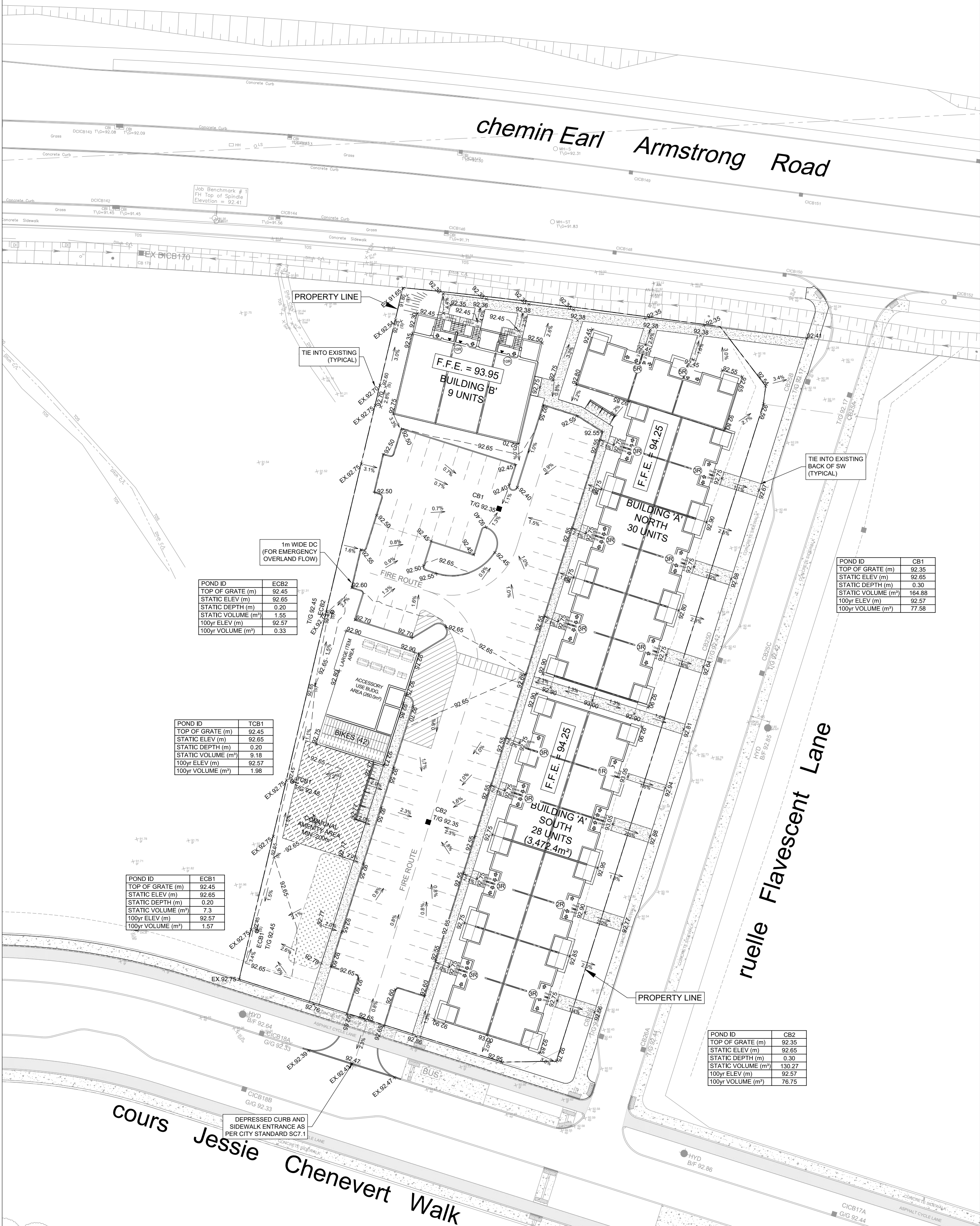
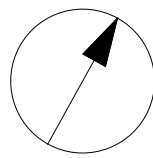
STORM DRAINAGE PLAN

SHEET NUMBER

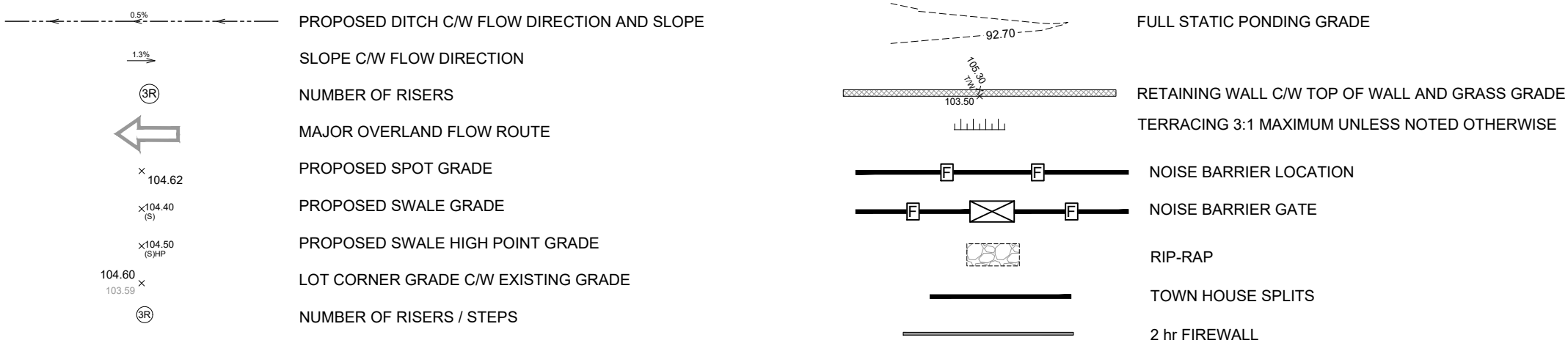
C-500

ISSUE

1



GRADING LEGEND



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ISSUES		
No.	DESCRIPTION	DATE
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2	SUBMISSION FOR SPA	2026-06-30
3	-	-
4	-	-

SEE 010 FOR NOTES, LEGEND, CB TABLE, STREET SECTIONS AND DETAILS



CONSULTANTS



PROJECT

2604 JESSIE CHENEVERT WALK

PROJECT NO:
30339828

DRAWN BY:
C.C./D.D.

PROJECT MGR:
S.E.L.

CHECKED BY:
T.R.B.

APPROVED BY:
S.E.L.

SHEET TITLE

GRADING - PONDING PLAN

SHEET NUMBER

C-200

ISSUE

1

Formulas and Descriptions

i_{2yr} = 1:2 year Intensity = $732.951 / (T_c+6.199)^{0.810}$
 i_{5yr} = 1:5 year Intensity = $998.071 / (T_c+6.053)^{0.814}$
 i_{100yr} = 1:100 year Intensity = $1735.688 / (T_c+6.014)^{0.820}$
 T_c = Time of Concentration (min)
 C = Average Runoff Coefficient
 A = Area (Ha)
 Q = Flow = $2.78CiA$ (L/s)

Maximum Allowable Release Rate

Restricted Flowrate (to reflect 5-yr storm under existing conditions)

Per Design Brief Phase 7A 908 Earl Armstrong Road & 4700 Limebank Road, Riverside South, prepared by Arcadis, dated April 2025

Design Return Period = 2-Year Event
 i_{2yr} = 76.81
Runoff Coefficient for HD/MD Block = 0.85
 T_c = 10 min
 A = 0.8 Ha

$Q_{restricted}$ = 145.19 L/s

Uncontrolled Release ($Q_{uncontrolled} = 2.78 \cdot C \cdot i_{100yr} \cdot A_{uncontrolled}$) for 100-yr storm event

UNC1
 C_{100} = 0.83 (0.66 increased 25% for 100 year)
 T_c = 10 min
 i_{100yr} = 178.56 mm/hr
 $A_{uncontrolled}$ = 0.24 Ha

Q_{unc} = 98.29 L/s

Total Uncontrolled
 $Q_{uncontrolled}$ = 98.29 L/s

Maximum Allowable Release Rate ($Q_{max\ allowable} = Q_{restricted} - Q_{uncontrolled}$)

$Q_{max\ allowable}$ = 46.91 L/s

MODIFIED RATIONAL METHOD (100-Year, 5-Year & 2-Year Ponding)

Drainage Area		CB1						
Area (Ha)	0.26	Restricted Flow ICD Actual (L/s)= 23.00						
C =	0.98	Restricted Flow Q_r for swm calc (L/s)= 11.50						
		50% reduction if sub-surface storage						
100-Year Ponding						100-Year +20% Ponding		
T_c Variable (min)	i_{100yr} (mm/hour)	Peak Flow $Q_p = 2.78 \times C i_{100yr} A$ (L/s)	Q_r (L/s)	$Q_p - Q_r$ (L/s)	Volume 100yr (m^3)	100YRQ 20% (L/s)	Qp - Qr (L/s)	Volume 100+20 (m^3)
40	75.15	52.96	11.50	41.46	99.50			
45	69.05	48.66	11.50	37.16	100.34			
50	63.95	45.07	11.50	33.57	100.71	54.08	42.58	127.75
55	59.62	42.02	11.50	30.52	100.71			
60	55.89	39.39	11.50	27.89	100.41			
Storage (m^3)						100+20		
Overflow	Required	Surface	Sub-surface	Balance	Overflow	Required	Balance	
0.00	100.71	164.88	23.13	0.00	0.00	127.75	0.00	
				convert to flow with peak T_c (L/s)	convert to flow with peak T_c (L/s)			
				0.00	0.00			
				overflows to: CB2				
				77.58				

Drainage Area		CB2	CB2, TCB1		
Area (Ha)		0.30	Restricted Flow ICD <i>Actual</i> (L/s)=		23.00
C =		0.89	Restricted Flow Q_r for swm calc (L/s)=		11.50
50% reduction if sub-surface storage					
100-Year Ponding					
T_c Variable (min)	i_{100yr} (mm/hour)	Peak Flow $Q_p = 2.78 \times C i_{100yr} A$ (L/s)	Q_r (L/s)	$Q_p - Q_r$ (L/s)	Volume 100yr (m ³)
45	69.05	51.11	11.50	39.61	106.95
50	63.95	47.34	11.50	35.84	107.51
55	59.62	44.13	11.50	32.63	107.69
60	55.89	41.37	11.50	29.87	107.54
65	52.65	38.97	11.50	27.47	107.12
100-Year +20% Ponding					
T_c Variable (min)	i_{100yr} (mm/hour)	Peak Flow $Q_p = 2.78 \times C i_{100yr} A$ (L/s)	Q_r (L/s)	$Q_p - Q_r$ (L/s)	Volume 100+20 (m ³)
45	69.05	51.11	11.50	39.61	106.95
50	63.95	47.34	11.50	35.84	107.51
55	59.62	44.13	11.50	32.63	107.69
60	55.89	41.37	11.50	29.87	107.54
65	52.65	38.97	11.50	27.47	107.12
Storage (m ³)					
Overflow	Required	Surface	Sub-surface	Balance	100+20
0.00	107.69	151.78	27.06	0.00	136.81
				0.00	0.00
				convert to flow with peak T_c (L/s)	
				overflows to: Offsite	

Drainage Area		CB1			
Area (Ha)	0.26				
C =	0.78	Restricted Flow Q_r (L/s)= 11.50			
2-Year Ponding					
T_c Variable (min)	i_{2yr} (mm/hour)	Peak Flow $Q_p = 2.78 \times C i_{2yr} A$ (L/s)	Q_r (L/s)	$Q_p - Q_r$ (L/s)	Volume 2yr (m^3)
18	55.49	31.28	11.50	19.78	21.37
19	53.70	30.27	11.50	18.77	21.40
20	52.03	29.33	11.50	17.83	21.40
21	50.48	28.46	11.50	16.96	21.37
22	49.02	27.64	11.50	16.14	21.30
Storage (m^3)					
Overflow	Required	Surface	Sub-surface	Balance	
0.00	21.40	164.88	23.13	0.00	
overflows to: CB2					

Drainage Area		CB2			
Area (Ha)		0.30			
C =	0.71	Restricted Flow Q_r (L/s)= 11.50			
2-Year Ponding					
T_c Variable (min)	i_{2yr} (mm/hour)	Peak Flow $Q_p = 2.78 \times C i_{2yr} A$ (L/s)	Q_r (L/s)	$Q_p - Q_r$ (L/s)	Volume 2yr (m ³)
18	55.49	32.86	11.50	21.36	23.07
19	53.70	31.80	11.50	20.30	23.14
20	52.03	30.81	11.50	19.31	23.17
21	50.48	29.89	11.50	18.39	23.17
22	49.02	29.03	11.50	17.53	23.14
Storage (m ³)					
Overflow	Required	Surface	Sub-surface	Balance	
0.00	23.17	151.78	27.06	0.00	
overflows to: Offsite					

Stormwater Management Summary Table				
Drainage Area	ICD Restricted Flow (L/s)	100 Year Storage Required (m3)	2 Yr Storage Required (m3)	Storage Provided
CB1	23.00	100.71	21.40	188.01
CB2	23.00	107.69	21.37	178.84
TOTAL	46.00	208.40	42.77	366.85

Max Allowable: 46.91 L/s

RUNOFF COEFFICIENT CALCULATION SHEET

INDIVIDUAL

CB1	Area (m²)	C
Softscape	455	0.20
Hardscape	2105	0.90
Total	2560	0.78

CB2	Area (m²)	C
Softscape	190	0.20
Hardscape	1998	0.90
Total	2188	0.84

TCB1	Area (m²)	C
Softscape	809	0.20
Hardscape	132	0.90
Total	809	0.35

UNC1	Area (m²)	C
Softscape	834	0.20
Hardscape	1598	0.90
Total	2432	0.66

COMBINED

CB2 DA	Area (m²)	C
CB2	2188	0.84
TCB1	809	0.35
Total	2997	0.71



IBI GROUP
400-333 Preston Street
Ottawa, Ontario K1S 5N4 Canada
tel 613 225 1311 fax 613 225 9868
ibigroup.com

PROJECT: RSS BLK 2
DATE: 2026-06-30
FILE: 30339828.5.1.1
REV #: 1
DESIGNED BY: SEL

UNDERGROUND STORAGE CALCULATIONS

Pipe Storage CB1					
From	To	Length	Diameter	X-sec Area	Volume
STORAGE	CB1	6.80	250	0.049	0.33
Total					0.33

Structure Storage CB1						
	Base	Top	Height	diameter	X-sec Area	Volume
CB1	90.76	92.15	1.39	600	0.360	0.50
EZ STORM STORAGE STRUCTURE (SEE DETAIL SHEET)						22.30
Total						22.80

TOTAL	CB1	23.13
-------	-----	-------

Pipe Storage CB2					
From	To	Length	Diameter	X-sec Area	Volume
250mm SUBDRAIN		56.00	250	0.049	2.75
TCB1	CB2	24.83	250	0.049	1.22
STORAGE	TCB1-CB1	2.00	250	0.049	0.10
Total					4.07

Structure Storage CB2						
	Base	Top	Height	diameter	X-sec Area	Volume
CB2	90.95	92.35	1.40	600	0.360	0.50
TCB1	91.35	92.45	1.10	250	0.063	0.07
ECB1	91.45	92.45	1.00	250	0.063	0.06
ECB2	91.45	92.45	1.00	250	0.063	0.06
EZ STORM STORAGE STRUCTURE (SEE DETAIL SHEET)						22.30
Total						23.00

TOTAL	CB2	27.06
-------	-----	-------

EZstorm system overview

Project details :

Project description :	RSS BLK 2
Date :	6/26/2026
Location :	OTTAWA, ON

Client details :

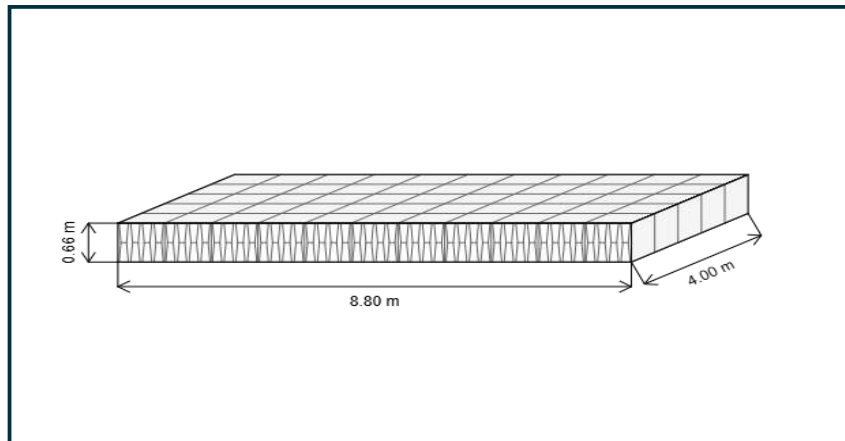
Contact:	
E-mail :	

EZstorm configuration

EZstorm application	Retention / Detention
Load type	HS25/CL-625
Height	0.66 m
Length	8.80 m
Width	4.00 m
EZstorm storage volume	22.30 m ³
Total storage volume	22.30 m ³

Fill materiel

Fill materiel	3/4" granular fill / Sand
Storage in stone	No
Stone porosity	-
Stone above system	-
Perimeter stone	-
Stone below system	-
Storage in stone	-

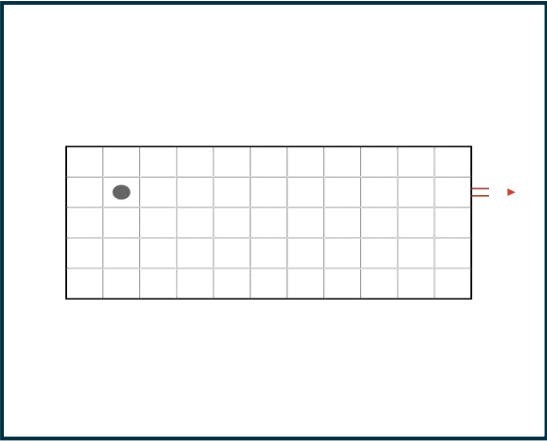


Summary

Total storage volume provided :	22.30 m ³
EZstorm storage volume	22.30 m ³
Storage in stone	-
Stone quantity (fill) required for this project :	18.25 m ³

EZstorm system accessories

-  Inlet
-  Inlet with HDS
-  Outlet
-  Inspection port
-  Pretreatment row
-  EZaccess manhole

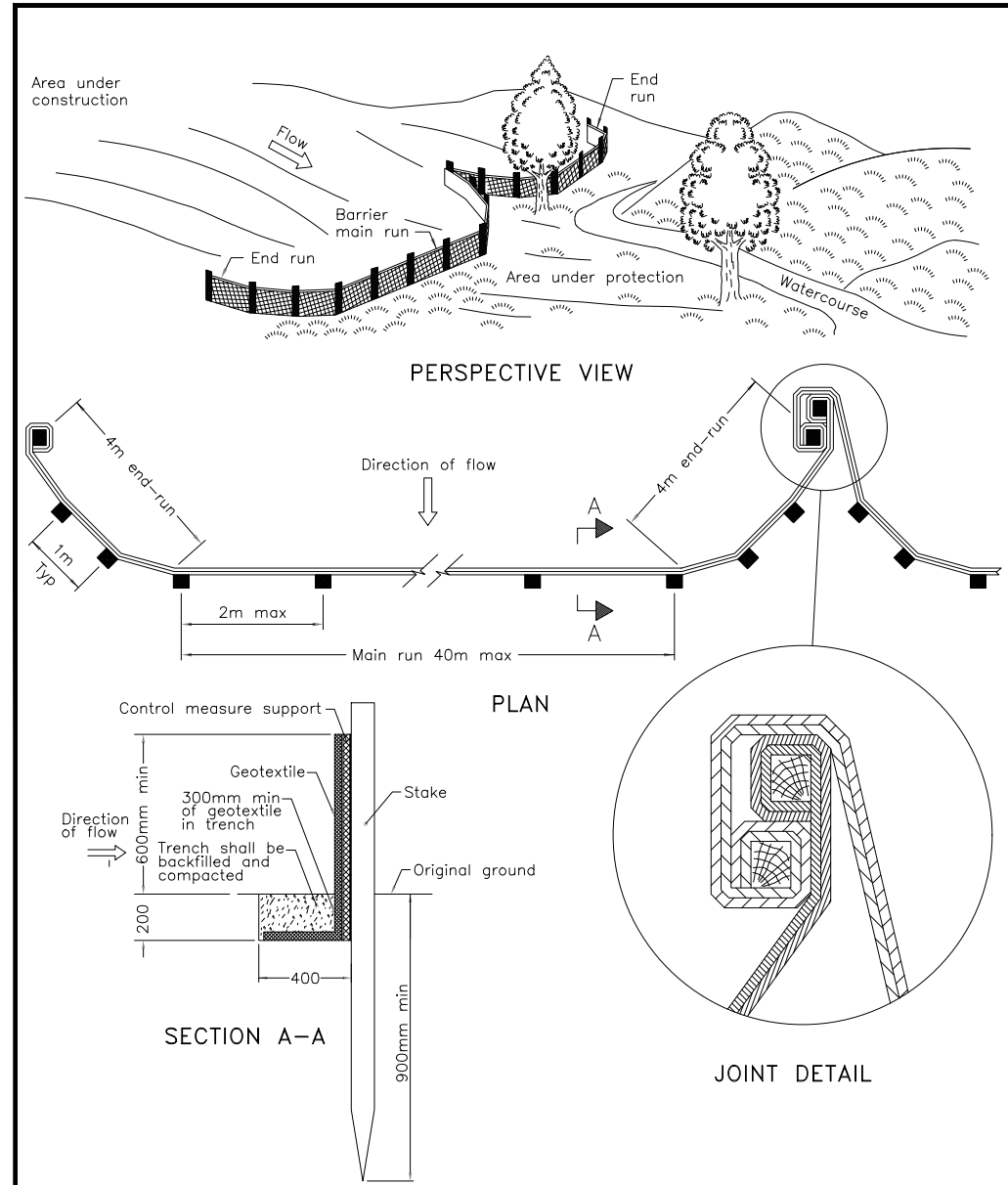


Material list

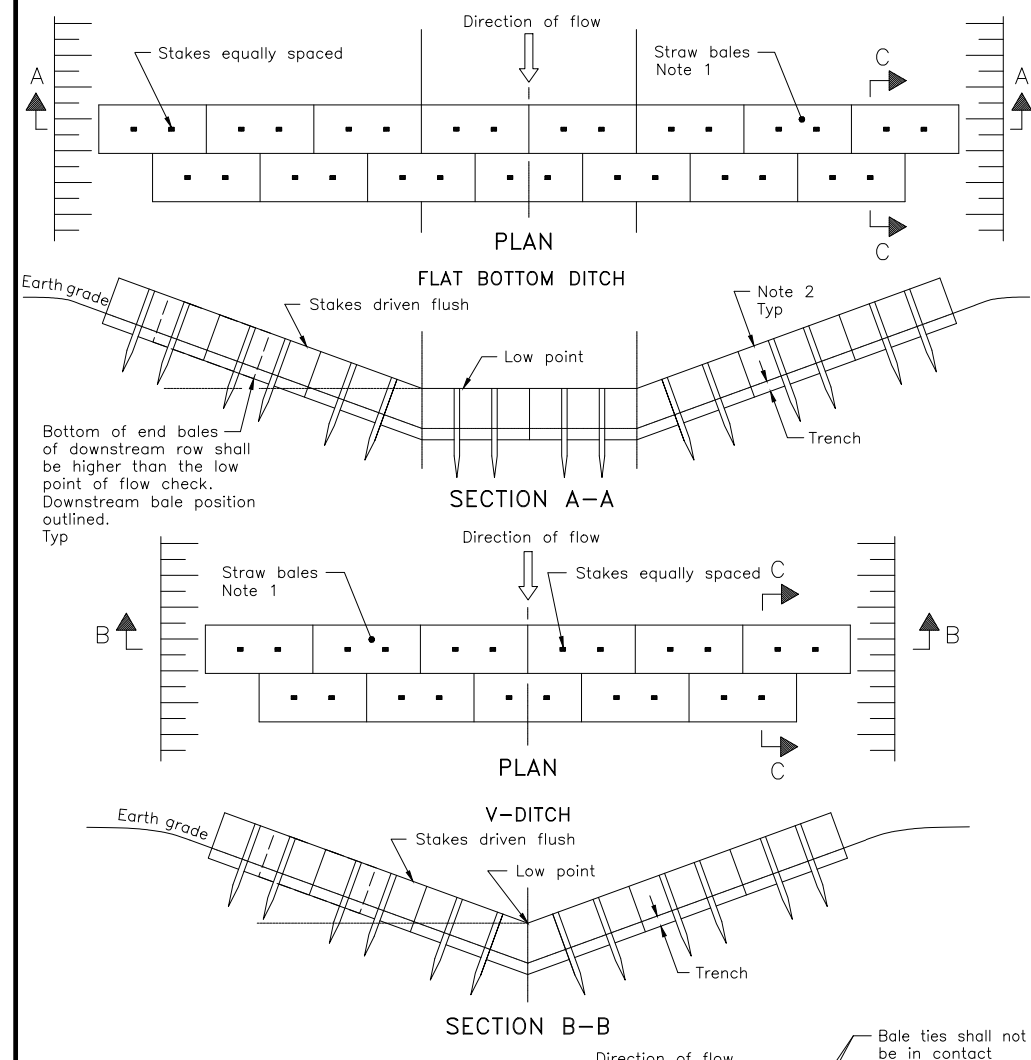
EZstorm material list		Qty
	EZstorm half blocs	0
	EZstorm lateral side grid	32
	EZstorm access chimney (frame and cover included)	1
	EZaccess (frame and cover included)	0
	Geotextile surface area required	209.51
	Geomembrane surface area required	96.03



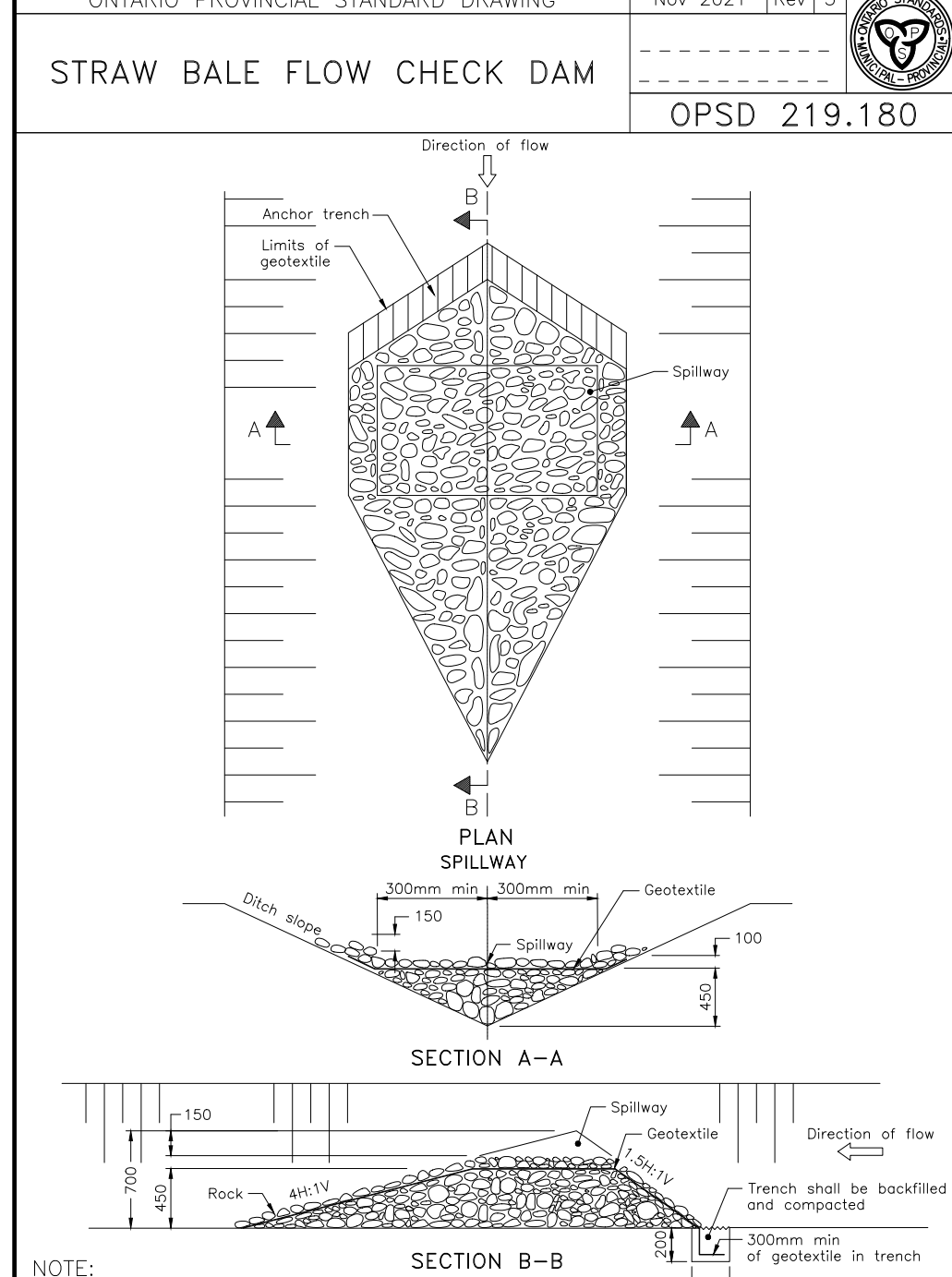
Appendix E



ONTARIO PROVINCIAL STANDARD DRAWING
HEAVY-DUTY
SILT FENCE BARRIER
OPSD 219.130



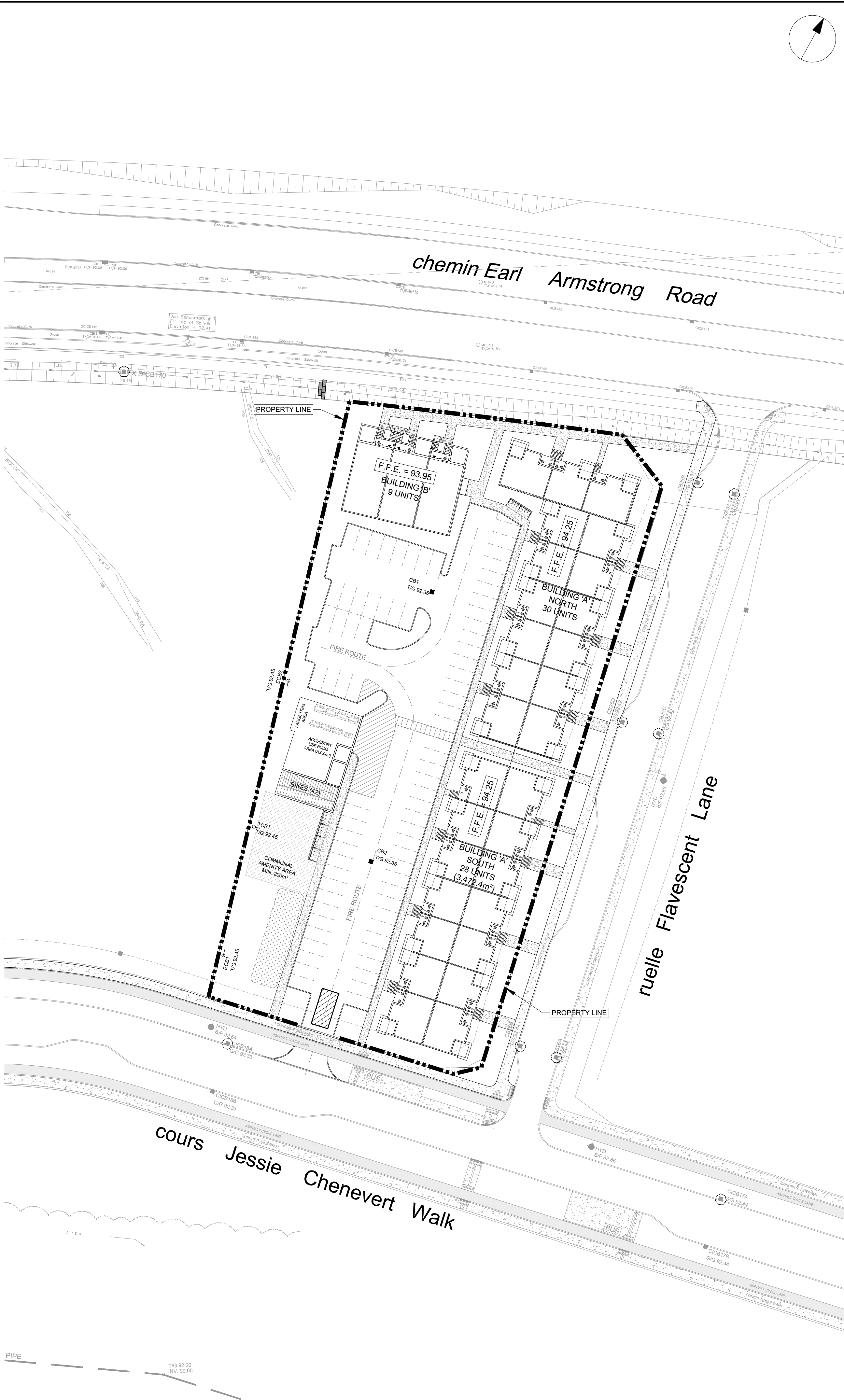
ONTARIO PROVINCIAL STANDARD DRAWING
STRAW BALE FLOW CHECK DAM
OPSD 219.180



ONTARIO PROVINCIAL STANDARD DRAWING
TEMPORARY
ROCK FLOW CHECK DAM
V-DITCH
OPSD 219.210

- NOTES:
1. THE CONTRACTOR SHALL IMPLEMENT BEST MANAGEMENT PRACTICES, TO PROVIDE FOR PROTECTION OF THE AREA DRAINAGE SYSTEM AND THE RECEIVING WATERCOURSE, DURING CONSTRUCTION ACTIVITIES. THE CONTRACTOR ACKNOWLEDGES THAT FAILURE TO IMPLEMENT APPROPRIATE EROSION AND SEDIMENT CONTROL MEASURES MAY BE SUBJECT TO PENALTIES IMPOSED BY ANY APPLICABLE REGULATORY AGENCY.
 2. SILT FENCE TO BE ERECTED PRIOR TO EARTH WORKS BEING COMMENCED. SILT FENCE TO BE MAINTAINED UNTIL VEGETATION IS ESTABLISHED OR UNTIL START OF SUBSEQUENT PHASE.
 3. STRAW BALE SEDIMENT TRAPS TO BE CONSTRUCTED IN EXISTING ROAD SIDE DITCHES. TRAPS TO REMAIN AND BE MAINTAINED UNTIL VEGETATION IS ESTABLISHED.
 4. FILTER CLOTH TO BE PLACED AND MAINTAINED UNDER COVER OF ALL PROPOSED CATCHBASINS AFTER BASE COURSE, AND EXISTING CATCHBASINS IDENTIFIED OUTSIDE OF CONSTRUCTION LIMIT. FILTER CLOTH IN STREET CB'S TO REMAIN UNTIL ALL CURBS ARE CONSTRUCTED. FILTER CLOTH IN RYCB'S TO REMAIN UNTIL VEGETATION IS ESTABLISHED. ALL CATCHBASINS TO BE REGULARLY INSPECTED AND CLEANED AS NECESSARY, UNTIL SOD AND CURBS ARE CONSTRUCTED.
 5. CONTRACTOR TO PROVIDE DETAILS ON LOCATION(S) AND DESIGN OF DEWATERING TRAP(S) PRIOR TO COMMENCING WORK. CONTRACTOR ALSO RESPONSIBLE FOR MAINTAINING TRAP(S) AND ADJUSTING SIZE(S) IF DEEMED REQUIRED BY THE ENGINEER DURING CONSTRUCTION.
 6. WORKS NOTED ABOVE ARE TO BE INSTALLED, INSPECTED, MAINTAINED AND ULTIMATELY REMOVED BY SERVICING CONTRACTOR.
 7. THIS IS A "LIVING DOCUMENT" AND MAY BE MODIFIED IN THE EVENT THE PROPOSED CONTROL MEASURES ARE INSUFFICIENT.

- LEGEND:
- HEAVY DUTY SILT FENCE AS PER OPSD-219.130
 - SNOW FENCE
 - STRAW BALE CHECK DAM AS PER OPSD-219.180
 - ROCK CHECK DAM AS PER OPSD-219.210
 - FILTER CLOTH PLACED UNDER EXISTING CB COVER
 - TEMPORARY MUD MAT 0.15m THICK 50mm CLEAR STONE ON NON WOVEN FILTER CLOTH



CLIENT

2193 Arch Street, Ottawa, ON
K1G 2H5

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ISSUES

No.	DESCRIPTION	DATE
1	ISSUED FOR COORDINATION	2026-06-08
2	SUBMISSION FOR SPA	2026-06-30
3	-	-
4	-	-

SEE 010 FOR NOTES, LEGEND, CB TABLE, STREET SECTIONS AND DETAILS

KEY PLAN

CONSULTANTS

SEAL

LICENCED PROFESSIONAL ENGINEER
S. E. LABADIE
100214983
2026/06/30
PROVINCE OF ONTARIO

PROJECT

2604 JESSIE CHENEVERT WALK

50 rte. FLAVENSCENT LANE

PROJECT NO:
30339828

DRAWN BY:
C.C./D.D.

CHECKED BY:
T.R.B.

PROJECT MGR:
S.E.L.

APPROVED BY:
S.E.L.

SHEET TITLE

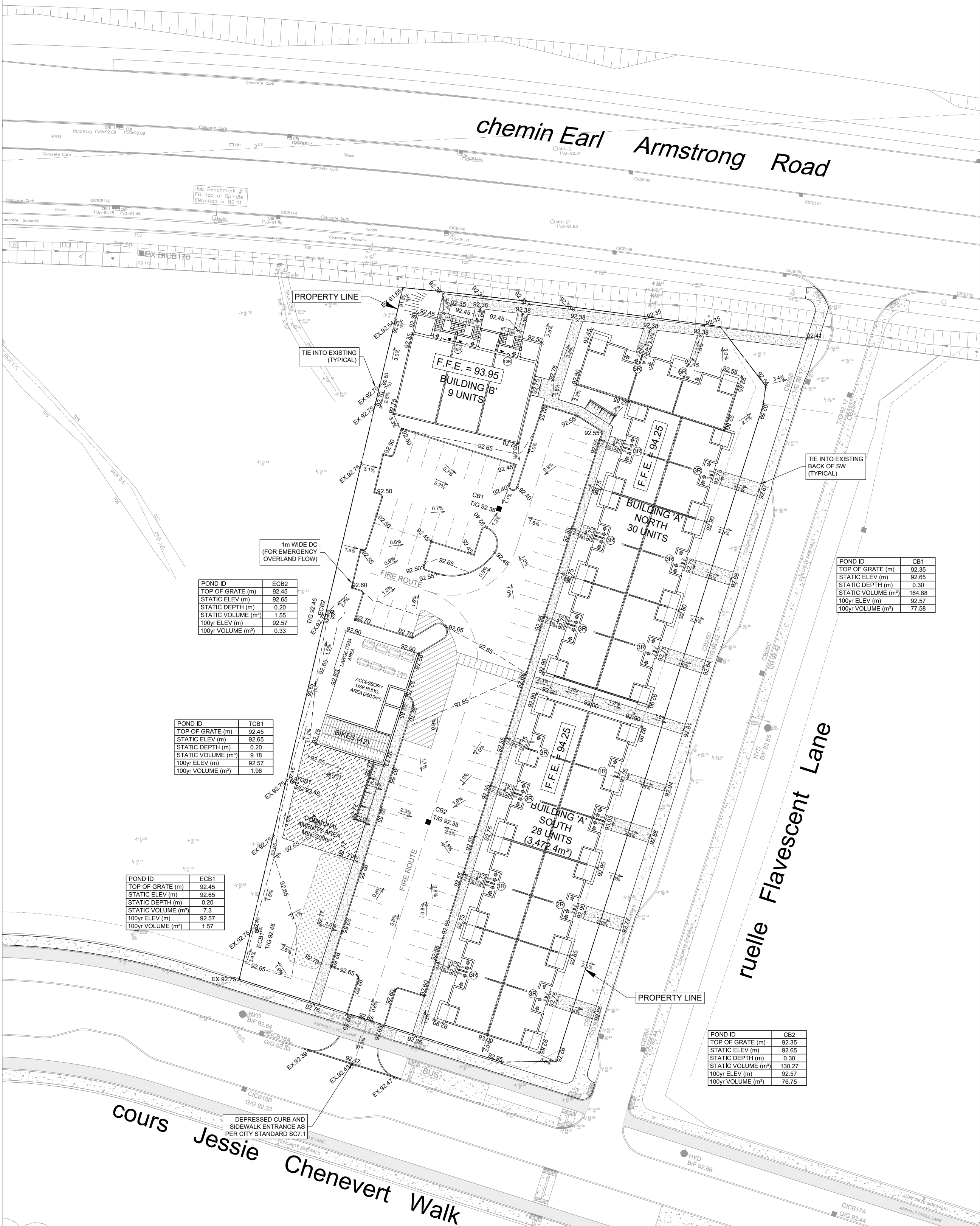
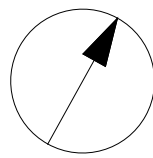
EROSION - SEDIMENT PLAN

SHEET NUMBER

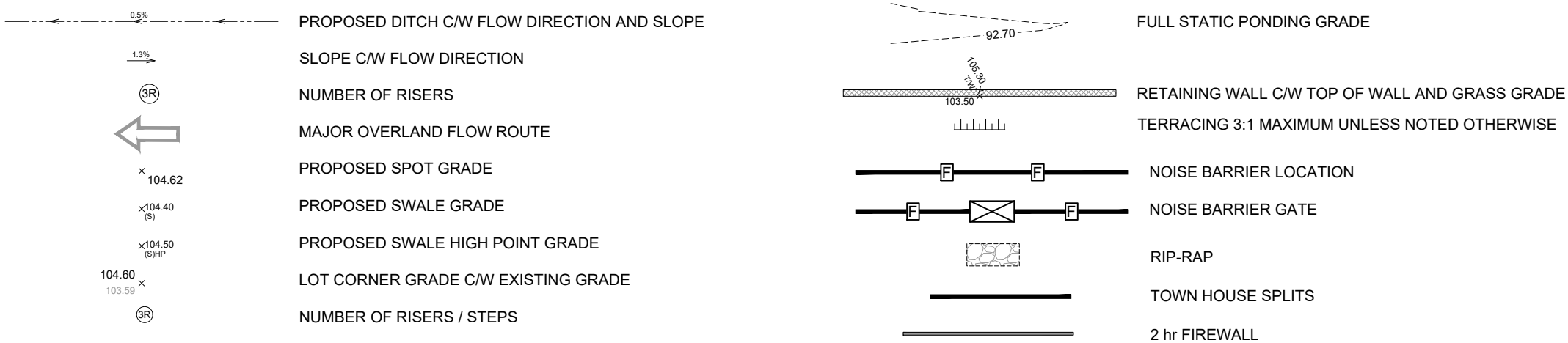
C-900

ISSUE

1



GRADING LEGEND



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K1G 2H5

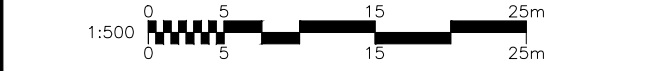
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No.	DESCRIPTION	DATE
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3	-	-
4	-	-

SEE 010 FOR NOTES, LEGEND, CB TABLE, STREET SECTIONS AND DETAILS



CONSULTANTS



PROJECT
2604 JESSIE CHENEVERT
WALK

PROJECT NO:
30339828
DRAWN BY:
C.C./D.D.
PROJECT MGR:
S.E.L.
CHECKED BY:
T.R.B.
APPROVED BY:
S.E.L.

SHEET TITLE
GRADING - PONDING PLAN

SHEET NUMBER
C-200
ISSUE
1