CITY OF Appendix 11 - Engineering Department Comments

SALMONARM

Memorandum from the Engineering and Public Works Department

TO:	Gary Buxton, Director of Planning
DATE:	April 8, 2025
PREPARED BY:	Chris Moore, Engineering Assistant
APPLICANT:	Bluegreen Architecture Inc
SUBJECT:	DP-460/SUB-25.03
LEGAL:	Lot 11, Section 11, Township 20, Range 10 W6M KDYD Plan 9916
CIVIC:	1231 1 Street SE

Further to your referral dated January 24, 2025, we provide the following servicing information.

Comments are based on the Subdivision/Development as proposed in the referral. If the development plans for the property change significantly, comments below may change

General:

- 1. Full municipal services are required as noted herein. Owner / Developer to comply fully with the requirements of the Subdivision and Development Services Bylaw No 4293. Notwithstanding the comments contained in this referral, it is the applicant's responsibility to ensure these standards are met.
- 2. Comments provided below reflect the best available information. Detailed engineering data, or other information not available at this time, may change the contents of these comments.
- 3. Properties shall have all necessary public infrastructure installed to ensure properties can be serviced with underground electrical and telecommunication wiring upon development.
- 4. Property under the control and jurisdiction of the municipality shall be reinstated to City satisfaction.
- 5. Owner / Developer will be responsible for all costs incurred by the City of Salmon Arm during construction and inspections. This amount may be required prior to construction. Contact City Engineering Department for further clarification.
- 6. Erosion and Sediment Control (ESC) measures will be required prior to the commencement of construction. ESC plans to be approved by the City of Salmon Arm.
- 7. Any existing services (water, sewer, hydro, telus, gas, etc) traversing the proposed lot must be protected by easement or relocated outside of the proposed building envelope. Owner/Developer will be required to prove the location of these services. Owner / Developer is responsible for all associated costs.
- 8. At the time of subdivision / building permit the applicant will be required to submit for City review and approval a detailed site servicing / lot grading plan for all on-site (private) work. This plan will show such items as parking lot design, underground utility locations, pipe sizes, pipe elevations, pipe grades, catchbasin(s), control/containment of surface water, contours (as required), lot/corner elevations, impact on adjacent properties, etc.
- 9. For the off-site improvements at the time of subdivision / building permit the applicant will be required to submit for City review and approval, detailed engineered plans for all off-site construction work. These plans must be prepared by a qualified engineer. As a condition of

subdivision / building permit approval, the applicant will be required to deposit with the City funds equaling 125% of the estimated cost for all off-site construction work.

Roads / Access:

- Street SE, on the subject property's eastern boundary, is designated as an Urban Local Road standard, requiring 20.0m road dedication (10.0m on either side of road centerline). Available records indicate that 2.38m of additional road dedication is required (to be confirmed by a BCLS). Additional dedication may also be required from the subject property at the southern end of 1 Street SE to allow the road to terminate perpendicular to the southern property line.
- 1 Street SE is currently constructed to an Interim Local Road standard. Upgrading to an Urban Local Road standard is required, in accordance with Specification Drawing No. RD-2. Upgrading may include, but is not limited to, road widening and construction, curb & gutter, sidewalk, boulevard construction, street lighting, fire hydrants, street drainage and hydro and telecommunications. Owner / Developer is responsible for all associated costs.
- 3. Owner / Developer is responsible for ensuring all boulevards and driveways are graded at 2.0% towards the existing roadway.
- 4. The maximum allowable cul-de-sac length in the urban area is 160m. Since the subject property is located approximately 150m from the centre of 10 Avenue SE a secondary means of access will not be required. However, since there is currently no turnaround at the end of 1 Street SE, the construction of a turnaround will be required. A temporary cul-de-sac is required by the bylaw (as per Specification Drawing No. RD-11A) as 1 Street SE will likely be extended south in the future. Under Section 3.4 of the bylaw, an alternate turn-around option may be requested in writing provided it meets service levels prescribed in the bylaw including the turning templates for both Fire and Refuge vehicles.

Water:

- 1. The subject property fronts a 100mm diameter Zone 1 watermain on 1 Street SE. Upgrading this watermain to 150mm diameter across the frontage of the property is required.
- The existing (southern) lot is to be serviced by a single metered water service connection (as per Specification Drawing No. W-10), adequately sized to satisfy the proposed use. Water meter will be supplied by the City at the time of subdivision, at the Owner / Developer's cost. Owner / Developer is responsible for all associated costs.
- 3. Records indicate that the existing property is serviced by a service of unknown size from the 100mm diameter watermain on 1 Street SE. Due to the size and / or age of the existing service, upgrading to a new metered service (minimum 25mm) will be required. All existing inadequate / unused services must be abandoned at the main. Owner / Developer is responsible for all associated costs.
- 4. The proposed (northern) lot is to be serviced by a single metered water service connection (as per Specification Drawing No. W-10), adequately sized to satisfy the proposed use (minimum 25mm). Water meter will be supplied by the City at the time of building permit, at the Owner / Developer's cost. Owner / Developer is responsible for all associated costs.

- 5. Bare Land Strata developments with ground oriented access have the option of a bulk water meter installed at property line at time of subdivision with invoicing to the Strata Corporation or individual strata lot metering with invoicing to each strata lot (currently on an annual flat rate). To qualify for the second option each unit requires a separate outside water service shut-off connected to the onsite private water main. Contact Engineering Department for more information. All meters will be provided at time of building permit by the City, at the owner/developers cost.
- 6. The subject property is located within an area of identified fire flow deficiency, according to the 2011 Water Study (OD&K 2012). Owner's/developer's consulting engineer shall confirm that the upgraded dead-end main has sufficient capacity to achieve required fire flows. Otherwise, Owner/Developer responsible for any upgrades to the water system required to achieve fire flows.
- 7. Fire protection requirements to be confirmed with the Building Department and Fire Department.
- 8. Fire hydrant installation will be required. Owner's consulting Engineer shall review the site to ensure placement of fire hydrants meet the medium density spacing requirements of 90 meters.

Sanitary:

- The subject property fronts a 200mm diameter sanitary sewer terminating at the northern property line on 1 Street SE. This sanitary sewer is to be extended across the frontage of the subject property to the southern property line. The subject property also fronts a 200mm diameter sanitary sewer along the western property boundary that terminates approximately 40 meters south of the north property line. An additional 3m of right of way is required adjacent to the western property line for this sewer, providing a total right of way width of 6m.
- 2. The remainder and proposed parcel(s) are each to be serviced by a single sanitary service connection adequately sized (minimum 100mm diameter) to satisfy the servicing requirements of the development. Owner / Developer is responsible for all associated costs.
- 3. Records indicate that the existing property is serviced by a 100mm service from the sanitary sewer in the right of way on the western property line. This service will traverse the proposed lot must be protected by easement and if necessary relocated outside of the proposed building envelope and inspected by the Building Inspector. Owner / Developer is responsible for all associated costs.
- 4. The subject property is in an area with no current sanitary capacity concerns according to the City Sanitary Study (Urban Systems 2016).

Drainage:

1. The subject property fronts a 250 mm diameter storm sewer stub on 1 Street SE at the northern property boundary. Owner / Developer will be required to extend the 250 mm diameter storm sewer main for the entire length of the 1 Street SE frontage.

- 2. An Integrated Stormwater Management Plan (ISMP) conforming to the requirements of the Subdivision and Development Servicing Bylaw No. 4163, Schedule B, Part 1, Section 7 shall be provided.
- 3. Where onsite disposal of stormwater is recommended by the ISMP, an "Alternative Stormwater System" shall be provided in accordance with Section 7.2.
- 4. Where discharge into the Municipal Stormwater Collection System is recommended by the ISMP, this shall be in accordance with Section 7.3. The proposed parcel(s) shall be serviced (each) by a single storm service connection adequately sized (minimum 150mm) to satisfy the servicing requirements of the development. Owner / Developer's engineer may be required to prove that there is sufficient downstream capacity within the existing City Storm System to receive the proposed discharge from the development. All existing inadequate / unused services must be abandoned at the main. Owner / Developer is responsible for all associated costs.

Geotechnical:

1. A geotechnical report in accordance with the Engineering Department's Geotechnical Study Terms of Reference for: Category A (Building Foundation Design), Category B (Pavement Structural Design), is required.

Garbage, Recycling and Food Waste:

- 1. Strata developments may apply to opt-in to the City's Garbage, Recycling and Food Waste Curbside Collection program. To qualify, strata developments must satisfy the following requirements:
 - Adequate Road widths (minimum 7.3m measured from face of curb) and truck turning movements including turnarounds shall be properly analysed to accommodate service vehicles.
 - All dwelling units within the development must have direct road access and an enclosed space for bin storage, thereby preventing wildlife access to bins and ensuring compliance with relevant bylaws.

Where these conditions cannot be met, alternative arrangements must be made for commonarea collection bins.

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