

## JUAN DE FUCA LAND USE COMMITTEE

Notice of Meeting on Tuesday, November 18, 2025, at 7 pm

Juan de Fuca Local Area Services Building, #3 – 7450 Butler Road, Otter Point, BC

## **AGENDA**

- 1. Territorial Acknowledgment
- 2. Approval of Agenda
- 3. Adoption of Minutes of September 16, 2025
- 4. Chair's Report
- 5. Planner's Report
- 6. Development Variance Permit and Flood Exemption Application
  - a) DV000093 Lot 3, Section 15, Otter District, Plan 11437 Except Parcel A (DD33503W) (3139 Otter Point Road)
- 7. Zoning Amendment Application
  - a) RZ000291 That Part of Section 90, Renfrew District, Shown Outlined in Red on Plan 913R Lying to the North of the Southerly Boundary of Plan 503RW (9260 Invermuir Road)
- 8. Adjournment

PLEASE NOTE: The public may attend the meeting in-person or electronically through video or teleconference. To attend electronically, please contact us by email at jdfinfo@crd.bc.ca so that staff may forward meeting details.



Minutes of a Meeting of the Juan de Fuca Land Use Committee Held Tuesday, September 16, 2025, at the Juan de Fuca Local Area Services Building 3 – 7450 Butler Road, Otter Point, BC

**PRESENT:** Director Al Wickheim (Chair), Les Herring, Vern McConnell, Roy McIntyre,

Ron Ramsay, Dale Risvold, Anna Russell

**Staff:** Iain Lawrence, Senior Manager, Juan de Fuca Administration;

Darren Lucas, Planner; Wendy Miller, Recorder

**PUBLIC:** 4 in-person; 3 EP

**EP** – Electronic Participation

The meeting was called to order at 7:00 pm.

## 1. Territorial Acknowledgement

The Chair provided a Territorial Acknowledgement.

## 2. Approval of the Agenda

**MOVED** by Dale Risvold, **SECONDED** by Vern McConnell that the agenda be approved.

**CARRIED** 

# 3. Adoption of Minutes of July 15, 2025

**MOVED** by Roy McIntrye, **SECONDED** by Dale Risvold that the minutes from the meeting of July 15, 2025, be adopted.

**CARRIED** 

## 4. Chair's Report

The Chair welcomed everyone to the meeting and stated that tonight's agenda item provides an opportunity to discuss an application that proposes a location to purchase local food and goods in the community of Shirley.

# 5. Planner's Report

It was reported that the Request for Proposal for the Juan de Fuca Electoral Area Official Community Plan Consolidation and Willis Point Official Community Plan/Local Area Plan Update Project is now posted to the CRD website and to BC Bid.

## 6. Zoning and Official Community Plan Amendment Application

# a) RZ000289 - Lot A, District Lot 87, Renfrew District, Plan VIP85195 (9730 West Coast Road)

Darren Lucas spoke to the application to amend the Shirley-Jordan River Official Community Plan, Bylaw No. 4001, by redesignating a 0.5 ha portion of the subject property from Coastal Uplands (CU) to Commercial (CO), and the remaining 3.5 ha portion from CU to Pacific Acreage (PA) and to amend the Juan de Fuca Land Use Bylaw, Bylaw No. 2040, by rezoning a 0.5 ha portion of the subject property from the Forestry (AF) zone to a new Commercial Rural Market (C-2) zone, and the remaining 3.5 ha portion ha from the AF zone to the Rural Residential 3 (RR-3) zone.

The subject property, site plan and conceptual drawing were highlighted. Current and proposed land use designations and zones were outlined.

LUC discussion ensued regarding:

- potential for increased water consumption associated with uses permitted by the C-2 zone
- opportunities for water conservation measures such as rainwater capture and water recycling
- confirmation that staff would seek comment on the proposal from the Juan de Fuca Electoral Area (JdF EA) Parks and Recreation Advisory Commission

Staff responded to questions from the LUC advising that:

- the applicant has submitted a preliminary groundwater feasibility report in support of the application
- proof of potable water would be required at the time of subdivision, should subdivision be pursued
- Bylaw No. 2040 currently includes a "C-2" zone short form described as "Village Commercial", but no properties are currently zoned Village Commercial (C-2)
- the proposed bylaw deletes the Village Commercial (C-2) zone in its entirety, establishes a new Commercial Rural Market zone and recycles the "C-2" zone short form
- the proposal would be referred to the JdF EA Parks and Recreation Advisory Commission as an internal agency, should the LUC support referral.

Staff confirmed that the applicant was present.

Applicant comments included:

- the focus of the market proposal is to provide both local residents and visitors to the area with a venue to purchase produce and staples
- the market would provide opportunity to reside and work in Shirley
- support for exploring potential opportunities to implement water capture systems
- support for obtaining required water licences
- there is space available for parking without significant land clearing

**MOVED** by Anna Russell, **SECONDED** by Vern McConnell that the agency referral list be amended to add the JdF EA Parks and Recreation Advisory Commission.

**CARRIED** 

**MOVED** by Vern McConnell, **SECONDED** by Anna Russell that staff be directed to refer proposed Bylaw No. 4705, "Shirley - Jordan River Official Community Plan Bylaw No. 5, 2018, Amendment Bylaw No. 3, 2025"; and proposed Bylaw No. 4706, "Juan de Fuca Land Use Bylaw, 1992, Amendment Bylaw No. 168, 2025"; to the Shirley-Jordan River Advisory Planning Commission, appropriate CRD departments, and the following First Nations and external agencies, as amended, for comment:

- paa?čiid?atx (Pacheedaht) First Nation
- T'Sou-ke First Nation
- BC Hydro
- BC Parks
- District of Sooke
- Island Health

- JdF EA Parks and Recreation Advisory Commission
- Ministry of Forests Archaeology Branch
- Ministry of Forests Water Protection Section
- Ministry of Land, Water and Resource Stewardship
- Ministry of Transportation & Transit
- RCMP
- Sooke School District #62

**CARRIED** 

7.	Adjournment The meeting adjourned at 7:44 pm.		
		_	
Ch	air		



# REPORT TO THE JUAN DE FUCA LAND USE COMMITTEE MEETING OF TUESDAY, NOVEMBER 18, 2025

**SUBJECT** 

Development Variance Permit and Floodplain Exemption for Lot 3, Section 15, Otter District, Plan 11437, except Parcel A (DD33503W) – 3139 Otter Point Road

# **ISSUE SUMMARY**

A request has been made for a development variance permit to reduce the yard setbacks of the Rural (A) zone to address the undue hardship designation under the *Riparian Areas Protection Regulation* (*RAPR*); and for a floodplain exemption in order to construct a single-family dwelling within the floodplain setbacks specified by Part 5 of the Juan de Fuca Land Use Bylaw, 1992, Bylaw No. 2040.

## **BACKGROUND**

The .059 ha subject property is located at the corner of Otter Point and Young Lake Roads in Otter Point and is zoned Rural (A) under the Juan de Fuca Land Use Bylaw, 1992, Bylaw No. 2040 (Appendix A). All abutting parcels are also zoned Rural (A). At the time the application was submitted, the parcel was vacant; however, a fence was recently constructed along the Otter Point Road frontage and excavation work has commenced in contravention of the requirement for authorization under a development permit.

Since portions of the parcel are designated as Steep Slopes and Watercourses and Wetlands Areas development permit areas, a development permit for land alteration and construction of a dwelling is required; however, the landowner must first request a variance to reduce the restricted area of the site from the local government to meet the conditions of undue hardship under the *RAPR*. The applicants have requested variances to reduce all yard setback requirements to 4.5 m save for the rear yard designation (Appendix B).

The floodplain regulations, as outlined in Part 5, Section 2.0 (2)(a) of Bylaw No. 2040, specify that the floodplain setback is 30 m from the natural boundary of DeMamiel Creek. Since the entire west side of the property, which includes the proposed building site (Appendix C), is located within 30 m of DeMamiel Creek, a floodplain setback exemption is required pursuant to Section 524(7)(b) of the *Local Government Act (LGA)* and Part 5 of Bylaw No. 2040. In support of the exemption, a geotechnical engineer's report has been submitted (Appendix D).

## **ALTERNATIVES**

## Alternative 1

The Land Use Committee recommends to the Capital Regional District Board:

That Development Variance Permit and Floodplain Exemption DV000093 to authorize the siting of a proposed dwelling on Lot 3, Section 15, Otter District, Plan 11437, except Parcel A (DD33503W) be approved as follows:

- 1. Juan de Fuca Land Use Bylaw, 1992, Bylaw No. 2040, Schedule A, Part 2:
  - a) Section 2.07(a) is varied by reducing the front yard setback requirement from 7.5 m to 4.5 m:
  - b) Section 2.07(b) is varied by reducing the side yard setback requirement from 6 m to 4.5 m and
  - c) Section 2.07(c) is varied by reducing the flanking yard setback requirement from 6 m CTS to 4.5 m.

- 2. Pursuant to Section 524 of the Local Government Act, the floodplain setback for DeMamiel Creek specified by Juan de Fuca Land Use Bylaw, 1992, Bylaw No. 2040, Schedule A, Part 5, Section 2(a) is reduced from 30 m from the natural boundary to 11 m from the crest of the slope above the western side of the creek as shown in the geotechnical report certified by Shane Moore, P.Geo., dated July 15, 2025, revised July 30, 2025, subject to the following:
  - a) That the professional geotechnical engineer's report certified by Shane Moore, P.Geo., dated July 15, 2025, revised July 30, 2025, be secured via a restrictive covenant registered on title pursuant to section 524(8)(c) of the *Local Government Act*;
  - b) That development of the property comply with the recommendations outlined in the professional engineer's report certified by Shane Moore, P.Geo., dated July 15, 2025, revised July 30, 2025; and
  - c) That the building setbacks be verified by BCLS survey prior to completion of the building permit.

## Alternative 2

That the Development Variance Permit and Floodplain Exemption DV000093 be denied.

## **IMPLICATIONS**

# Legislative Implications

Section 524 of the *LGA* authorizes local governments to designate areas as floodplains and to specify flood levels, setbacks and other related provisions. Part 5 of Bylaw No. 2040 outlines requirements for floodplain management. A local government may exempt a person from the floodplain requirement pursuant to Section 524(7) of the *LGA*.

The Juan de Fuca Land Use Bylaw, 1992, Bylaw No. 2040, Section 2.07 specifies yard setback requirements for the Rural (A) zone. In order to meet the conditions of undue hardship under the *RAPR*, a variance is required to authorize the siting of the proposed dwelling in the front and flanking setbacks.

## Public Consultation Implications

There is no statutory or bylaw requirement to notify members of the public about a request for a floodplain exemption.

Pursuant to Section 499 of the *LGA*, if a local government is proposing to pass a resolution to issue a development variance permit it must give notice to each resident/tenant within a given distance as specified by bylaw. Juan de Fuca Development Fees and Procedures Bylaw No. 3885, states that the Board at any time may refer an application to an agency or organization for their comment. In addition, it states that a notice of intent must be mailed to adjacent property owners within a distance of not more than 500 metres. JdF Community Planning will provide notice accordingly. Any responses received from the public will be circulated to the Land Use Committee in advance of its November 18, 2025, meeting.

# Land Use Implications

The parcel was originally created by subdivision in 1956, prior to the implementation of zoning, development permit areas and the *Riparian Areas Protection Regulation*. The parcel is roughly bisected by DeMamiel Creek and there is currently no means of access to the eastern portion of the lot. The western portion has historically been accessed by a driveway from Otter Point Road to the south.

The parcel is now partially designated as Steep Slopes and Watercourses and Wetlands development permit areas by the Otter Point Official Community Plan, Bylaw No. 3819. The Watercourses and Wetlands Areas DP corresponds with the Riparian Assessment Area defined by the *RAPR* and severely restricts the building envelope on the property. To meet the conditions of undue hardship that may be considered by the Province under the *RAPR*, the local government must first consider a variance to shift the building envelope away from the watercourse. Once the variances have been considered, the Provincial riparian assessment report review and CRD development permit approval process can be completed.

## Variances:

The Juan de Fuca Land Use Bylaw specifies that in the Rural (A) zone, front yards shall be provided of not less than 7.5 m in width, side yards shall be not less than 6 m, and flanking yards shall not be less than 6 m CTS (clear to sky). Since the dwelling is also proposed to be located 4.5 m from the front and flanking yards to allow for the 11 m setback from the crest of the slope recommended by the engineers, a variance approval is required.

The extent of all proposed works will be reviewed during the development permit and building permit process by JdF Planning staff to confirm compliance with the requirements of the zone and other applicable land use regulations. Since the proposed siting of the dwelling is adjacent to roads and not the neighboring parcels, the variance is not anticipated to substantially alter the use and enjoyment of adjacent land. The application was referred to the Ministry of Transportation and Transit and no comments were received. Approval from the Ministry is not required unless a structure is proposed to be located less than 4.5 m from the road right-of-way.

# Floodplain Exemption:

The floodplain regulations in Part 5, Section 2.0 (2)(e) of Bylaw No. 2040, specify a minimum setback of 30 m from the natural boundary of DeMamiel Creek. This encompasses most of the western portion of the property.

The Engineers' assessment submitted as a requirement of the floodplain exemption request stated that their analysis was based on a 2 m by 10 m dwelling identified on the 3D Geomatics Land Survey Drawing, dated May 14, 2025 (Appendix B). At this time, the final building design has not been confirmed with Planning or Building Inspection staff. Staff highlight that the dwelling will be required to meet the standards of Part 9 of the *BC Building Code*.

The Engineers modelled a building site in the southwest corner of the property, setback 11 m from the slope crest and 4.5 m from property lines. The Report confirmed that the proposed building location was safe from geological hazards and suitable for the use intended provided that the recommendations outlined in the report are implemented. This meets the requirements of Section 524(7)(b) of the *LGA*. Therefore, a floodplain exemption could be granted subject to the conditions outlined in the Report, the Report being secured via a restrictive covenant, and verification of the building foundation location by a BC Land Surveyor.

Should the variances and floodplain exemption be approved, the applicant will be required to:

- Register a covenant on the title of the property securing the Geotechnical Report.
- Obtain approval from the Province for a Riparian Areas Assessment Report prepared by a Qualified Environmental Professional (QEP).
- Obtain approval for a Development Permit.
- Obtain approval for a Building Permit.

A draft of Development Variance Permit and Floodplain Exemption DV000093 is attached as Appendix E for consideration.

## CONCLUSION

The applicant has requested a development variance permit and floodplain exemption to reduce the yard setback requirements of the Rural (A) zone and to reduce the floodplain setback from DeMamiel Creek to meet *RAPR* undue hardship criteria for the purpose of constructing a dwelling. A report, certified by a qualified professional specified a safe building area for a 2 m by 10 m dwelling located 11 m from the crest of the slope above the creek, subject to the recommendations of the report. Development Variance Permit and Floodplain Exemption DV000093 has been prepared for consideration. If the Permit is approved by the Board, the Corporate Officer will proceed to issue the Permit and register a Notice of Permit on Title.

## **RECOMMENDATION**

The Land Use Committee recommends to the Capital Regional District Board:

That Development Variance Permit and Floodplain Exemption DV000093 to authorize the siting of a proposed dwelling on Lot 3, Section 15, Otter District, Plan 11437, except Parcel A (DD33503W) be approved as follows:

- 1. Juan de Fuca Land Use Bylaw, 1992, Bylaw No. 2040, Schedule A, Part 2:
  - a) Section 2.07(a) is varied by reducing the front yard setback requirement from 7.5 m to 4.5 m:
  - b) Section 2.07(b) is varied by reducing the side yard setback requirement from 6 m to 4.5 m; and
  - c) Section 2.07(c) is varied by reducing the flanking yard setback requirement from 6 m CTS to 4.5 m.
- 2. Pursuant to Section 524 of the Local Government Act, the floodplain setback for DeMamiel Creek specified by Juan de Fuca Land Use Bylaw, 1992, Bylaw No. 2040, Schedule A, Part 5, Section 2(a) is reduced from 30 m from the natural boundary to 11 m from the crest of the slope above the western side of the creek as shown in the geotechnical report certified by Shane Moore, P.Geo., dated July 15, 2025, revised July 30, 2025, subject to the following:
  - a) That the professional geotechnical engineer's report certified by Shane Moore, P.Geo., dated July 15, 2025, revised July 30, 2025, be secured via a restrictive covenant registered on title pursuant to section 524(8)(c) of the *Local Government Act*;
  - b) That development of the property comply with the recommendations outlined in the professional engineer's report certified by Shane Moore, P.Geo., dated July 15, 2025, revised July 30, 2025; and
  - c) That the building setbacks be verified by BCLS survey prior to completion of the building permit.

Submitted by:	lain Lawrence, MCIP, RPP, Senior Manager, JdF Administration
Concurrence:	Stephen Henderson, MBA, P.G.Dip.Eng., B.Sc., General Manager, Electoral Area Services
Concurrence:	Ted Robbins, B.Sc., C. Tech, Chief Administrative Officer

## **ATTACHMENTS**

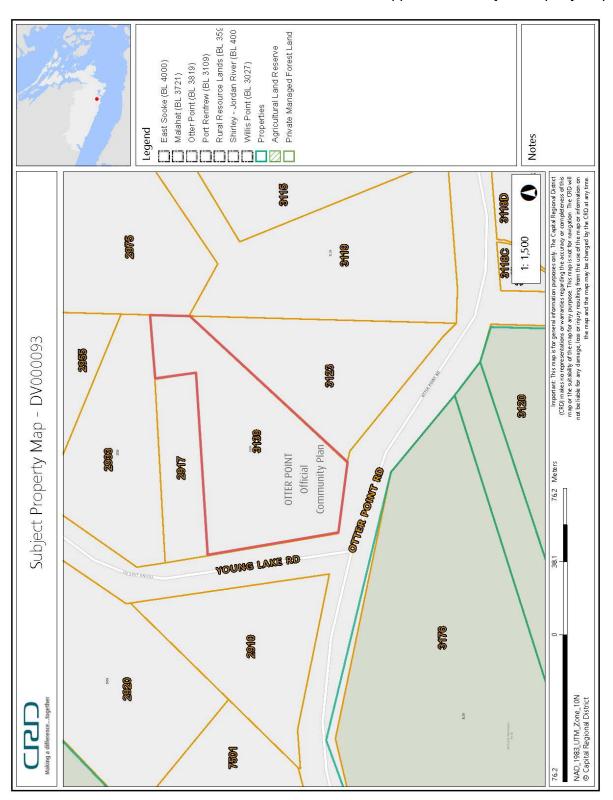
Appendix A: Subject Property Map

Appendix B: Site Plan - Yard Setback Variance Requests

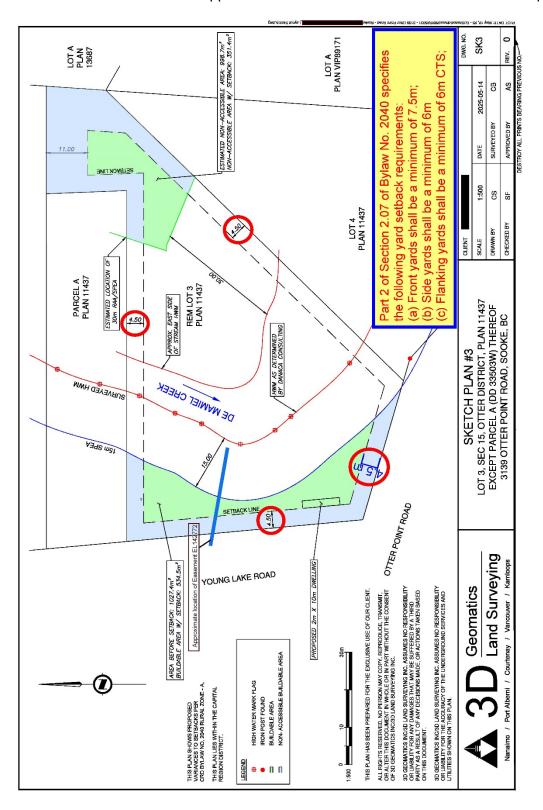
Appendix C: Geotechnical Report Site Plan (Safe Building Area and Floodplain Exemption)

Appendix D: Geotechnical Report Appendix E: Permit DV000093

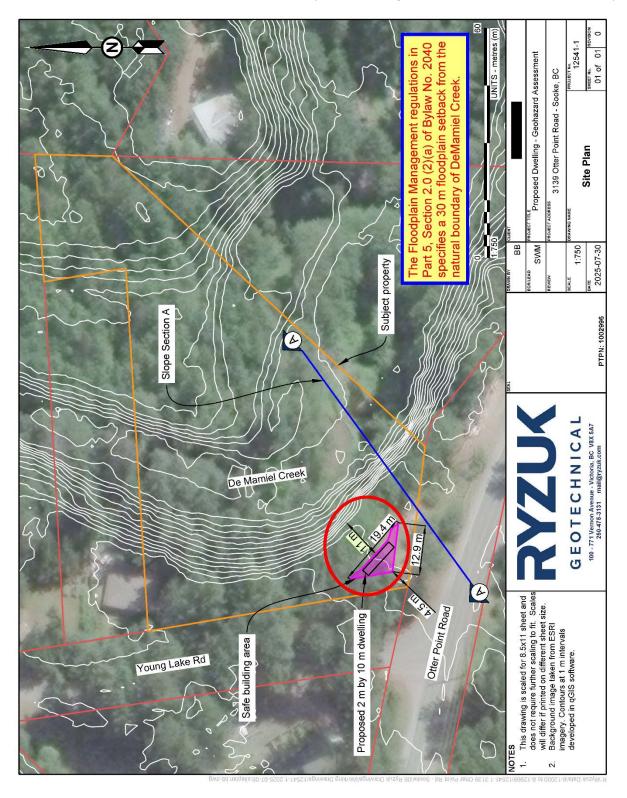
Appendix A: Subject Property Map



Appendix B: Site Plan - Yard Setback Variance Requests



Appendix C: Geotechnical Report Site Plan (Safe Building Area and Floodplain Exemption)



Appendix D: Geotechnical Report



July 15, 2025 Project #: 12541-1 Revised: July 30, 2025



#### PROPOSED DWELLING - GEOHAZARD ASSESSMENT

3139 Otter Point Road - Sooke, BC

## 1. INTRODUCTION

As requested, we attended the referenced property on June 18, 2025, and completed an assessment of the potential geohazards affecting the site as such relates to the proposed dwelling. We herein provide our associated observations, comments, recommendations, and conclusions to be incorporated into the design/construction. This has been completed in accordance with Sections 488 and 491 of the Local Government Act for development permit and so that the land may be used safely for the use intended in accordance with Section 56 of the Community Charter for building permit. Our work has been completed in accordance with, and is subject to, the previously accepted Terms of Engagement.

Our recommendations consider the guidance/requirements provided by the:

- Engineers and Geoscientists of BC Professional Practice Guidelines for Landslide Assessments in BC V4.1 – March 1, 2023, and
- Capital Regional District (CRD) Juan de Fuca 3819 Otter Point Official Community Plan – Bylaw No. 1, 2014 – Section 6.3 – Development Permit Area (DPA) No. 1: Steep Slopes, Section 6.5 – DPA No. 3: Watercourses and Wetlands Areas

Pursuant to Section E.6.1.3(e) of DPA 6 above, a development permit exemption may be granted provided the work is carried out in accordance with recommendations from a qualified professional. Furthermore, confirmation that the proposed dwelling location is not exposed to significant risk from geohazard is included in this assessment, pursuant to Section 56 of the Community Charter. The CRD is considered an authorized user of this report and may rely on its contents when making decisions related to the property.



3139 Otter Point Road - Sooke, BC

## 2. SITE LOCATION AND PROPOSED DEVELOPMENT

The subject property is located in the Otter Point community of the Juan de Fuca Electoral Area – CRD approximately 3.8 km to the northwest of the Sooke community center. The property is approximately 6522 square meters in area and is bounded by partially developed single-family residential properties to the north and east, Otter Point Road to the south, and Young Lake Road to the west. Based on our review of the 3D Geomatics Land Surveying drawing dated May 14, 2025, we understand that a 2 m by 10 m dwelling is proposed near the southwestern corner of the property.

# 3. GEOHAZARD ASSESSMENT

Our geotechnical assessment has involved an office-based review of available information, a site reconnaissance to complete a visual assessment for signs of geohazard that would impact the proposed development area, and an office-based slope stability analysis.

#### 3.1 OFFICE-BASED STUDY

The office-based work included review of development drawings as well as perusal of geological/terrain mapping, BC LiDAR data, and BC Water Resources Atlas (well information).

Based on our review of the CRD GIS map satellite imagery and contours and BC LiDAR data (BCGS 092b032, Year: 2019) analyzed in QGIS software, the natural grade on the property significantly varies. The dwelling is proposed on a relatively flat plateau at the southwestern corner of the property that has a geodetic surface elevation between 83 and 84 m. To the northeast of the plateau, the grade steeply slopes down at an angle of 66 degrees a height of 11 m to the base of the western side of De Mamiel Creek. On the northeastern side or inside of the creek where its point bar formation exists, the surface topography gently slopes upwards at a relatively consistent rate to 83 m geodetic elevation at the northeast corner of the property. In the QGIS software, we produced Section A from BC LiDAR data to analyze the slope geometry on the property. The location of Section A can be seen on the attached Site Plan and will be discussed further in the Slope Stability section of the report.

Based on our review of BC Geological Survey – Geological Fieldwork 1991 mapping of the Sooke Land District, we expected the native soil conditions to consist of sand, gravel, silt, and clay of the Capilano Sediments of the Quaternary period. Well installation soil logs from the BC Water Resources Atlas located approximately 140 m to the northwest of the property indicated that bedrock was encountered at a depth of 7 m below the ground surface.

## 3.2 SITE RECONNAISSANCE

During our site reconnaissance we traversed the property to identify any notable surface features typically associated with steep slopes, such as past/current indication of erosion, land slip,



3139 Otter Point Road - Sooke, BC

overland flow, and/or rock fall. Our visual assessment generally confirmed the findings of our office-based study.

The southeastern plateau was generally cleared of vegetation and a fence was constructed at the crest of the soil slope above De Mamiel Creek. A hand dug test pit was advanced on the plateau and we determined the topsoil layer was approximately 0.6 m thick atop native silty sand and gravel. The steepest portion of the slope is located at the south end of the property where the cutbank on the western outside curve of De Mamiel Creek is undergoing the most significant erosion. The slope crest was lined with young to middle aged trees that increased in size and age towards the north where the slope becomes less steep. In this area trees were also observed on the slope itself due to its shallower inclination and there is an access foot path to the base of the slope. A very dense "cemented" silty sand and gravel (inferred basal glacial till) was observed within the soil slope on the foot path down to the creek and at the toe of the cutbank of the slope. Basal glacial till is formed directly beneath a glacial which explains its very dense nature. The upper 1 m of the slope below the topsoil layer was noted to be lighter in colour indicating that it may be ablation till meaning it was formed by the melting of glacial ice, particularly from the upper layers of a glacier, and is considered to have a lower density than basal till. Small vegetation was visible on the steepest portions of the slope and a few trees on sloping areas of the property were 'pistol-butted'. There was loose soil collected at the base of the slope. The vertical scour height likely due to swift-flowing water at the base of the western cutbank of De Mamiel Creek was approximately 1.5 m in height. The material at the base of the creek was sorted to only contain primarily large gravel, cobbles, and boulders. This indicates that transportation of smaller sediment particles has occurred and that seasonally or in storm events the creek has a relatively high flow rate. At the time of our site reconnaissance, the creek was not flowing and shallow in depth.

# 3.3 SLOPE STABILITY ASSESSMENT

The native basal glacial till soil observed within the creek slope is typically hard/very dense and globally stable therefore deep-seated failure is considered unlikely. The high friction angle and cohesion of this material is shown through its steep inclination observed in static conditions. However, the slope section is considered over-steepened and potentially susceptible to movement in an earthquake event. Therefore, we have completed a slope stability analysis to confirm that the global slope stability factor of safety and movement meets the minimum requirements for both static and seismic conditions outlined in the EGBC guidelines. Another contributing factor to slope instability that has been considered in our analysis is the erosion rate of the creek at the toe of the slope that could be amplified by the effects of climate change.

We completed limit equilibrium slope stability analysis using RocScience Slide2 software and topography contour information extracted from the online BC LiDAR data (Section A). Section A was produced for our slope stability modelling and is a cross section of the steepest topography of the slope at the southwestern cutbank of the creek. We have modelled a proposed dwelling location offset approximately 11 m to the southwest of the slope crest determined from LiDAR. We understand that a variance is being requested to reduce the side yard setback from 6 m to 4.5 m. To model the most conservative case, we used the furthest setback of the proposed dwelling (4.5 m from the southwest property line) in combination with the steepest slope cross



3139 Otter Point Road - Sooke, BC

section (Section A). Conservative soil strength properties were applied based on our observations, background review, and our past experience with similar soil types, and bedrock was not assumed to be present.

As part of our slope reconnaissance, we traversed near the toe of the ravine slope where the De Mamiel Creek has produced a cutbank from its seasonal flow scouring. We observed very dense "cemented" basal glacial till at the toe of the slope that is considered to have a low susceptibility to erosion due to its relatively high cohesion. However, we have conservatively incorporated into our analysis models the potential effects of slope regression including the effect of long-term scour, erosion, and bank undercutting. Additionally, we have included the potential impacts of climate change, including increased frequency and intensity of extreme rainfall events, that could also contribute to long-term erosion and subsequent regression of the ravine slopes. We determined that a horizontal slope regression of 5 m was appropriate to account for long-term erosion over the anticipated 75-year design life of the ravine slope. The slope crest in our modelling has been modified to be 5 m further back from the 2019 LiDAR slope crest geometry.

The pseudo-static analysis was run with seismic loading based on the Earth Design Ground Motion from the BC Building Code (BCBC) 2024 (National Building Code of Canada [NBCC] 2020 seismic hazard values) for a 2% probability of exceedance in 50 years (1 in 2475-year event), which is the requirement of the current 2024 BCBC. The associated peak ground acceleration (PGA) k value is 0.818 g which was determined using the online 2020 NBCC Seismic Hazard Tool and an estimated Site Classification for Seismic Site Response of 'C' based on observed soil conditions.

The results of our modelling indicate a minimum Factor of Safety (FS) of 1.53 in static conditions and a minimum FS of 0.60 in seismic conditions. Acceptable values of FS are typically >1.5 in static and >1.0 in seismic, as stated within the EGBC Landslide Guidelines Table B-6: Types of Static and Seismic Slope Stability Analysis. Given the NBCC 2020 seismic Factor of Safety resulted in less than the required threshold, and as per the methodology outlined in the guidelines, we used advanced functionality in the software to determine the critical seismic yield coefficient (k<sub>y</sub>) value (0.408) and used this value in Travasarou's equation to estimate the anticipated permanent displacement resulting from a seismic event. The calculation using Travasarou's "Method 1" (2007) and conservative parameters resulted in a displacement of 12.1 cm, which is within the acceptable maximum limit of 15 cm.

The attached Slope Stability Analysis Results show the stratigraphy, soil parameters, and slip plane in static conditions, seismic 2%, and seismic  $(k_v)$  conditions.

For the purposes of the attached Appendix D: Landslide Assessment Assurance Statement, in accordance with Section 219 of the Land Title Act, we recommend a covenant be registered on title indicating that the steep slope above the creek is subject to geohazard, that the indicated safe building area is considered safe, and that any future building site(s) contemplated closer to the crest of the slope above the creek be assessed by a geotechnical professional to confirm such location is safe for residential construction. Given the above, it is our professional opinion that the proposed safe building area, as indicated on the attached Site Plan, setback 11 m from the slope crest is not subject to risk of geohazard.



3139 Otter Point Road - Sooke, BC

The steep topography and location of De Mamiel Creek creates an access constraint to the northeast portion of the property, upslope from the point bar formation. Therefore, we consider that construction of a building on the northeast portion of the property to be impractical.

#### 3.4 FLOOD ASSESSMENT

Under Bylaw No. 2040 of Schedule "A" of the CRD Juan de Fuca Land Use Bylaw, Part 5, we understand that a Floodplain Setback of a minimum of 30 m is required from the Natural Boundary of De Mamiel Creek. Due to the significant change in elevation from the toe of the slope at De Mamiel Creek (72 m geodetic) to the building site of the proposed dwelling (83 m geodetic), we consider the flooding risk on the property due to the creek to be negligible.

#### 3.5 LIQUEFACTION ASSESSMENT

Based on our past experience in the area, soil mapping, and observed surficial soil deposits at the property, we expect the subsurface soils to be of glacial origin and over-consolidated. Generally being of cohesive and of a stiff consistency or well graded and of a dense consistency; therefore, we do not consider the soils at the site to be susceptible to liquefaction.

## 4. PRELIMINARY GEOTECHNICAL DESIGN

We anticipate site preparation for the proposed dwelling would include minor excavation and removal of any organic and loamy soils, as well as potential fills associated with previous land development. We recommend that the proposed dwelling is founded directly atop native very dense basal glacial till as analyzed in our slope stability modelling. It may also be desirable to utilize minor amounts of engineered fill (crushed gravel, shot rock etc.) to create a flatter and more level building site or to achieve the design bottom of footing grade. We anticipate that the building would be constructed on conventional shallow spread footings. We consider that foundation elements placed directly on undisturbed native very dense basal glacial till, or approved engineered fill atop such, will provide suitable long-term support for the construction of the proposed dwelling. For design purposes, foundations may be dimensioned considering Serviceability and Ultimate Limit State bearing resistance values of 150 kPa (SLS) and 225 kPa (ULS), respectively. We recommend that foundation subgrade surfaces, as well as engineered fill placed below foundation areas (if any), be reviewed by a geotechnical professional prior to pouring concrete. Additionally, footings should be embedded at least 450 mm below finished grade for protection from frost.

Based on our background review and observations of the soil conditions at site, we consider the appropriate Site Classification for Seismic Site Response (Site Class) would be 'C', as per the current BC Building Code.

We expect that conventional perimeter foundation drainage tied into a free draining backfill material would be suitable to limit hydrostatic pressure on the foundation walls. This, however, does not



Shane Moore, P.Geo.

Senior Geoscientist

3139 Otter Point Road - Sooke, BC

preclude the possibility of dampness and/or minor seepage, which would be considered building envelop concerns.

The foundation drain arrangement (perforated pipe and uniform gravel/drain rock) should be covered with a non-woven geotextile filter fabric (not landscape fabric), or a suitably graded granular medium as approved by ourselves, to prevent the migration of finer materials from the backfill into voids within the drain arrangement.

To maintain the long-term surficial stability of the slope, the native soils should be protected from erosion caused by turbulent waterflows within drainage channels and at discharge locations. We recommend that all water from collected from perimeter drains and roof leaders is transmitted via closed piping to a municipal stormwater system or downslope and discharged onto a splash pad or atop the creek at the base of the slope.

## 5. CLOSURE

Provided the above recommendations are followed, we consider the land may be used safely for the use intended, that being the construction of a single-family dwelling. Our assessment is in accordance with Section 56 of the Community Charter, Sections 488 and 491 of the Local Government Act, Section 219 of the Land Title Act, the CRD Juan de Fuca Otter Point OCP, the BC Building Code, and the Professional Practice Guidelines for Legislated Landslide and Flood Assessments in BC (assurance statements attached). Our assessment has considered a design seismic occurrence with a 2% probability of exceedance in 50 years as well as the potential effects of future climate change.

We trust the preceding is suitable for your purposes at present. Please do not hesitate to contact the undersigned if we can be of further assistance.

Sincerely,

Ryzuk Geotechnical

Ben Brownoff, EIT Advanced Junior Engineer

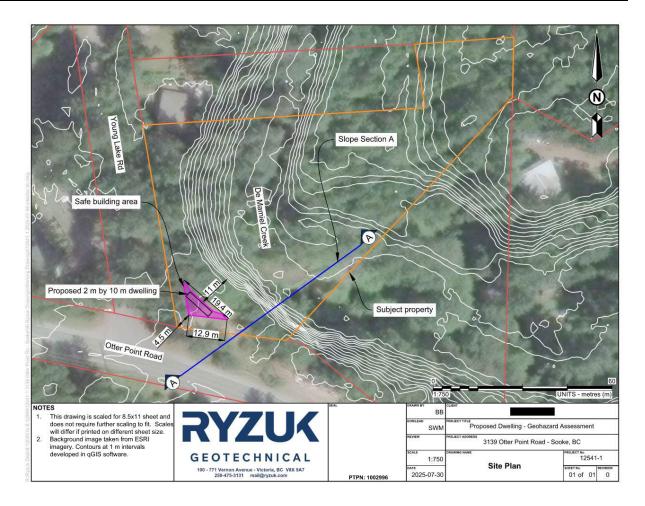
Permit to Practice Number: 1002996

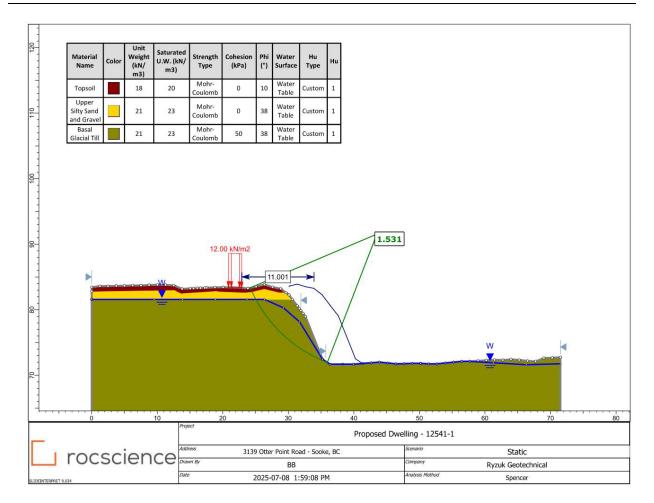
Attachments:

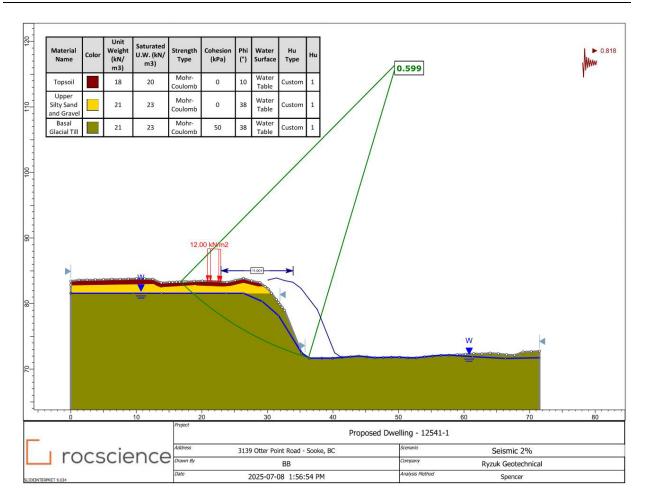
Site Plan

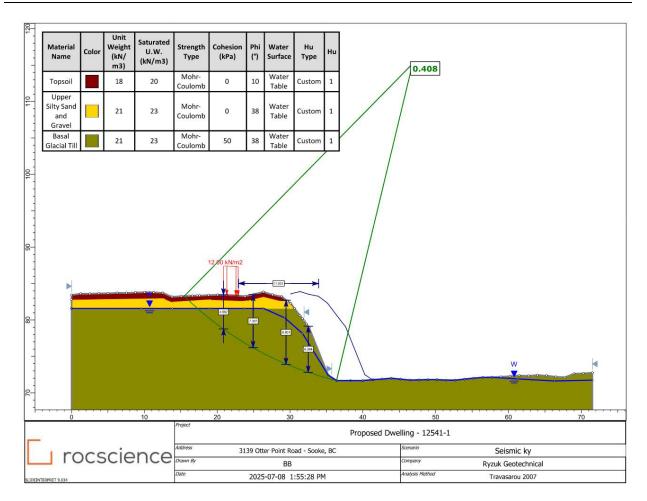
Slope Stability Analysis Results

EGBC Landslide Assurance Statement









## LANDSLIDE ASSESSMENT ASSURANCE STATEMENT

Notes: This statement is to be read and completed in conjunction with the Engineers and Geoscientists BC *Professional Practice Guidelines – Landslide Assessments in British Columbia* ("the guidelines") and the current *BC Building Code* (*BCBC*), and is to be provided for Landslide Assessments (not floods or flood controls), particularly those produced for the purposes of the *Land Title Act, Community Charter*, or *Local Government Act*. Some jurisdictions (e.g., the Fraser Valley Regional District or the Cowichan Valley Regional District) have developed more comprehensive assurance statements in collaboration with Engineers and Geoscientists BC. Where those exist, the Qualified Professional is to fill out the local version only. Defined terms are capitalized; see the Defined Terms section of the guidelines for definitions.

o:	The	Approv	ving Authority (or Client)	Date:	July 15, 2025		
	Ca	pital	Regional District - Juan de Fuca	4			
	62	625 Fisgard Street, Victoria, BC, V8W 1R7					
	Juris	sdiction	/name and address				
Vith	refe	rence t	O (CHECK ONE):				
		B. <i>L</i> C. C D. N	and Title Act (Section 86) – Subdivision Approval ocal Government Act (Sections 919.1 and 920) – Developmen Community Charter (Section 56) – Building Permit Ion-legislated assessment	t Permit			
			ter Point Road - Sooke, BC				
		Civic a	address of the Property				
			d hereby gives assurance that they are a Qualified Professional by fulfils the education, training, and experience requirements as		[100 THE BOOK OF THE STATE OF		
	· ·	500 900	uthenticated, and dated, and thereby certified, the attached La the guidelines. That report must be read in conjunction this st		ssment Report on the Property in		
n pr	repar	ing tha	t report I have:				
CHE	CK TO	THE LE	EFT OF APPLICABLE ITEMS]				
~	1.	Collec	sted and reviewed appropriate background information				
亘	2.	Revie	wed the proposed Residential Development or other developm	ent on the Pro	operty		
<b>v</b>	3.	Condu	ucted field work on and, if required, beyond the Property				
/	4.	Repor	ted on the results of the field work on and, if required, beyond	the Property			
~	5.	Consi	dered any changed conditions on and, if required, beyond the l	Property			
	6.		Landslide Hazard analysis or Landslide Risk analysis, I have:				
		6.1	reviewed and characterized, if appropriate, any Landslide that	t may affect t	he Property		
		6.2 6.3	estimated the Landslide Hazard	and if require	ad have ad the Droporty		
	V	6.4	identified existing and anticipated future Elements at Risk on estimated the potential Consequences to those Elements at F		ea, beyond the Property		
	7		e the Approving Authority has adopted a Level of Landslide Sat				
		7.1	compared the Level of Landslide Safety adopted by the Apprinvestigation		y with the findings of my		
		7.2	made a finding on the Level of Landslide Safety on the Prope	rty based on	the comparison		
		7.3	made recommendations to reduce Landslide Hazards and/or	Landslide Ris	sks		
			PROFESSIONAL PRACTICE GUIDE	LINES			

LANDSLIDE ASSESSMENTS IN BRITISH COLUMBIA

99

VERSION 4.1

## LANDSLIDE ASSESSMENT ASSURANCE STATEMENT

		e the Approving Authority has <b>not</b> adopted a Level of Landslide Safety, or where the Landslide Assessment is no
		ced in response to a legislated requirement, I have:
	8.1	described the method of Landslide Hazard analysis or Landslide Risk analysis used
	8.2	referred to an appropriate and identified provincial, national, or international guideline for Level of Landslide Safety
	8.3	compared those guidelines (per item 8.2) with the findings of my investigation
	8.4	made a finding on the Level of Landslide Safety on the Property based on the comparison
	8.5	made recommendations to reduce Landslide Hazards and/or Landslide Risks
	9. Repor	rted on the requirements for future inspections of the Property and recommended who should conduct those
	inspec	ctions
Ва	sed on my co	omparison between:
[CH	ECK ONE]	
	the findings	s from the investigation and the adopted Level of Landslide Safety (item 7.2 above)
~	the approp	riate and identified provincial, national, or international guideline for Level of Landslide Safety (item 8.4 above)
		Islide Assessment is not produced in response to a legislated requirement, I hereby give my assurance that, unditions 1 contained in the attached Landslide Assessment Report:
A.	SUBDIVISI	ION APPROVAL
	For subdivi	ision approval, as required by the Land Title Act (Section 86), "the land may be used safely for the use intended"
	[CHECK ONE	
		ne or more recommended additional registered Covenants
	withou	ut an additional registered Covenant(s)
B.	DEVELOP	MENT PERMIT
V		lopment permit, as required by the Local Government Act (Sections 488 and 491), my report will "assist the local at in determining what conditions or requirements it will impose under subsection (2) of [Section 491]"
	with o	ne or more recommended additional registered Covenants
	withou	ut an additional registered Covenant(s)
C.	BUILDING	PERMIT
V	For a <u>buildi</u> intended"	ing permit, as required by the Community Charter (Section 56), "the land may be used safely for the use
	[CHECK ONE	
		ne or more recommended additional registered Covenants
	withou	ut any additional registered Covenant(s)

"The primary objective of seismic design is to provide an acceptable level of safety for building occupants and the general public as the building responds to strong ground motion; in other words, to minimize loss of life. This implies that, although there will likely be extensive structural and non-structural damage, during the DGM (design ground motion), there is a reasonable degree of confidence that the building will not collapse, nor will its attachments break off and fall on people near the building. This performance level is termed 'extensive damage' because, although the structure may be heavily damaged and may have lost a substantial amount of its initial strength and stiffness, it retains some margin of resistance against collapse."

PROFESSIONAL PRACTICE GUIDELINES
LANDSLIDE ASSESSMENTS IN BRITISH COLUMBIA

VERSION 4.1 100

<sup>&</sup>lt;sup>1</sup> When seismic slope stability assessments are involved, Level of Landslide Safety is considered to be a "life safety" criteria, as described in Commentary JJJ of the National Building Code of Canada (NBC) 2015, Structural Commentaries (User's Guide – NBC 2015; part 4 of division B). This states:

# LANDSLIDE ASSESSMENT ASSURANCE STATEMENT

Shane Moore, P.Geo.		July 15, 2025
Name (print)		Date
#100-771 Vernon Ave	enue	
Address		
Victoria, BC V8X 5A7	<u> </u>	
250-475-3131		S W MASSINE
Telephone		Jul. 31 2025
shane@ryzuk.com		Jul. 31 2023
Email		(Affix PROFESSIONAL SEAL and signature here)
The Qualified Professional, as a	registrant on the r	oster of a registrant firm, must complete the following:
I am a member of the firm	Ryzuk 0	Geotechnical Ltd.
	(	Print name of firm)
with Permit to Practice Number	1002996	

PROFESSIONAL PRACTICE GUIDELINES
LANDSLIDE ASSESSMENTS IN BRITISH COLUMBIA

VERSION 4.1 101

Appendix E: Permit DV000093



#### **CAPITAL REGIONAL DISTRICT**

#### **DEVELOPMENT VARIANCE PERMIT AND FLOODPLAIN EXEMPTION NO. DV000093**

- This Development Variance Permit and Floodplain Exemption is issued under the authority of Sections 498 and 524 of the Local Government Act and subject to compliance with all of the bylaws of the Regional District applicable thereto, except as specifically authorized by this Permit.
- 2. This Development Variance Permit and Floodplain Exemption applies to a building area for a proposed dwelling within the Regional District described below (legal description) in accordance with the plans submitted to the CRD and attached herein:

PID: 001-759-299;

Legal Description: Lot 3, Section 15, Otter District, Plan 11437 except Parcel A (DD33503W) ("the Land")

- The Capital Regional District's Bylaw No. 2040, Part 2 is varied under section 498 of the Local Government Act for the purpose of authorizing the siting of a dwelling on the Land as follows:
  - a. Section 2.07(a) is varied by reducing the front yard setback requirement from 7.5 m to 4.5 m;
  - b. Section 2.07(b) is varied by reducing the side yard setback requirement from 6 m to 4.5 m; and
  - Section 2.07(c) is varied by reducing the flanking yard setback requirement from 6 m CTS to 4.5 m
- 4. Pursuant to Section 524 of the Local Government Act, the floodplain setback for DeMamiel Creek specified by Juan de Fuca Land Use Bylaw, 1992, Bylaw No. 2040, Schedule A, Part 5, Section 2(a) is reduced from 30 m from the natural boundary to 11 m from the crest of the slope above the western side of the creek as shown in the geotechnical report certified by Shane Moore, P.Geo., dated July 15, 2025, revised July 30, 2025, subject to the following:
  - a. That the professional geotechnical engineer's report certified by Shane Moore, P.Geo., dated July 15, 2025, revised July 30, 2025, be secured via a restrictive covenant registered on title pursuant to section 524(8)(c) of the Local Government Act;
  - That development of the property comply with the recommendations outlined in the professional engineer's report certified by Shane Moore, P.Geo., dated July 15, 2025, revised July 30, 2025; and
  - c. That the building setbacks be verified by BCLS survey prior to completion of the building permit.
- Notice of this Permit shall be filed in the Land Title Office at Victoria as required by Section 503 of the Local Government Act, and the terms of this Permit (DV000093) or any amendment hereto shall be binding upon all persons who acquire an interest in the land affected by this Permit.
- 6. If the holder of a permit does not substantially start any construction permitted by this Permit within 2 years of the date it is issued, the permit lapses.
- The land described herein shall be developed strictly in accordance with the terms and conditions and provisions of this Permit, and any plans and specifications attached to this Permit which shall form a part hereof
- 8. The following plans and specifications are attached to and form part of this Permit:

Attachment 1: Site Plan - Yard Setback Variance Requests

Attachment 2: Geotechnical Report Site Plan (Safe Building Area and Floodplain Exemption)

Attachment 3: Geotechnical Report prepared by Ben Brownoff, EIT, and Shane Morre, P.Geo.,

of Ryzuk Geotechnical, dated July 15, 2025, revised July 30, 2025.



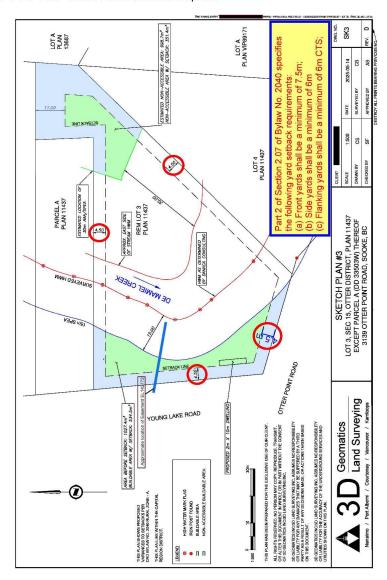
9. This Permit is NOT a Building Permit.
10. In issuing this Development Permit, the CRD does not represent or warrant that the land can be safely developed and used for the use intended and is acting in reliance upon the conclusions of the

Geotechnical Report regarding the conditions to be followed for the safe development of the land.

RESOLUTION PASSED BY THE BOARD, THE day of				
ISSUED this day of	, 2025			
Kristen Morley				
Corporate Officer				

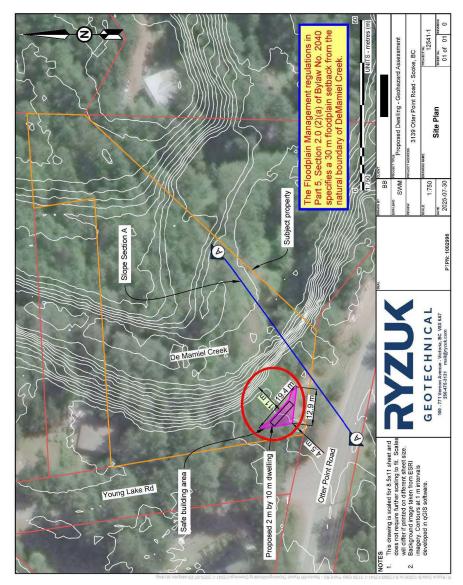


Attachment 1: Site Plan - Yard Setback Variance Requests





Attachment 2: Geotechnical Report Site Plan (Safe Building Area and Floodplain Exemption)



4



Attachment 3: Geotechnical Report



July 15, 2025 Project #: 12541-1 Revised: July 30, 2025



PROPOSED DWELLING - GEOHAZARD ASSESSMENT

3139 Otter Point Road - Sooke, BC

#### 1. INTRODUCTION

As requested, we attended the referenced property on June 18, 2025, and completed an assessment of the potential geohazards affecting the site as such relates to the proposed dwelling. We herein provide our associated observations, comments, recommendations, and conclusions to be incorporated into the design/construction. This has been completed in accordance with Sections 488 and 491 of the Local Government Act for development permit and so that the land may be used safely for the use intended in accordance with Section 56 of the Community Charter for building permit. Our work has been completed in accordance with, and is subject to, the previously accepted Terms of Engagement.

Our recommendations consider the guidance/requirements provided by the:

- Engineers and Geoscientists of BC Professional Practice Guidelines for Landslide Assessments in BC V4.1 – March 1, 2023, and
- Capital Regional District (CRD) Juan de Fuca 3819 Otter Point Official Community Plan – Bylaw No. 1, 2014 – Section 6.3 – Development Permit Area (DPA) No. 1: Steep Slopes, Section 6.5 – DPA No. 3: Watercourses and Wetlands Areas

Pursuant to Section E.6.1.3(e) of DPA 6 above, a development permit exemption may be granted provided the work is carried out in accordance with recommendations from a qualified professional. Furthermore, confirmation that the proposed dwelling location is not exposed to significant risk from geohazard is included in this assessment, pursuant to Section 56 of the Community Charter. The CRD is considered an authorized user of this report and may rely on its contents when making decisions related to the property.

#100-771 Vernon Avenue Victoria, BC V8X 5A7 1 OF 6

250-475-3131 mail@ryzuk.com





#### PROPOSED DWELLING - GEOHAZARD ASSESSMENT

3139 Otter Point Road - Sooke, BC

## 2. SITE LOCATION AND PROPOSED DEVELOPMENT

The subject property is located in the Otter Point community of the Juan de Fuca Electoral Area – CRD approximately 3.8 km to the northwest of the Sooke community center. The property is approximately 6522 square meters in area and is bounded by partially developed single-family residential properties to the north and east, Otter Point Road to the south, and Young Lake Road to the west. Based on our review of the 3D Geomatics Land Surveying drawing dated May 14, 2025, we understand that a 2 m by 10 m dwelling is proposed near the southwestern corner of the property.

#### 3. GEOHAZARD ASSESSMENT

Our geotechnical assessment has involved an office-based review of available information, a site reconnaissance to complete a visual assessment for signs of geohazard that would impact the proposed development area, and an office-based slope stability analysis.

#### 3.1 OFFICE-BASED STUDY

The office-based work included review of development drawings as well as perusal of geological/terrain mapping, BC LiDAR data, and BC Water Resources Atlas (well information).

Based on our review of the CRD GIS map satellite imagery and contours and BC LiDAR data (BCGS 092b032, Year: 2019) analyzed in QGIS software, the natural grade on the property significantly varies. The dwelling is proposed on a relatively flat plateau at the southwestern corner of the property that has a geodetic surface elevation between 83 and 84 m. To the northeast of the plateau, the grade steeply slopes down at an angle of 66 degrees a height of 11 m to the base of the western side of De Mamiel Creek. On the northeastern side or inside of the creek where its point bar formation exists, the surface topography gently slopes upwards at a relatively consistent rate to 83 m geodetic elevation at the northeast corner of the property. In the QGIS software, we produced Section A from BC LiDAR data to analyze the slope geometry on the property. The location of Section A can be seen on the attached Site Plan and will be discussed further in the Slope Stability section of the report.

Based on our review of BC Geological Survey – Geological Fieldwork 1991 mapping of the Sooke Land District, we expected the native soil conditions to consist of sand, gravel, silt, and clay of the Capilano Sediments of the Quaternary period. Well installation soil logs from the BC Water Resources Atlas located approximately 140 m to the northwest of the property indicated that bedrock was encountered at a depth of 7 m below the ground surface.

## 3.2 SITE RECONNAISSANCE

During our site reconnaissance we traversed the property to identify any notable surface features typically associated with steep slopes, such as past/current indication of erosion, land slip,

July 15, 2025

2 OF 6

12541-1 v. 4.2





#### PROPOSED DWELLING - GEOHAZARD ASSESSMENT

3139 Otter Point Road - Sooke, BC

overland flow, and/or rock fall. Our visual assessment generally confirmed the findings of our office-based study.

The southeastern plateau was generally cleared of vegetation and a fence was constructed at the crest of the soil slope above De Mamiel Creek. A hand dug test pit was advanced on the plateau and we determined the topsoil layer was approximately 0.6 m thick atop native silty sand and gravel. The steepest portion of the slope is located at the south end of the property where the cutbank on the western outside curve of De Mamiel Creek is undergoing the most significant erosion. The slope crest was lined with young to middle aged trees that increased in size and age towards the north where the slope becomes less steep. In this area trees were also observed on the slope itself due to its shallower inclination and there is an access foot path to the base of the slope. A very dense "cemented" silty sand and gravel (inferred basal glacial till) was observed within the soil slope on the foot path down to the creek and at the toe of the cutbank of the slope. Basal glacial till is formed directly beneath a glacial which explains its very dense nature. The upper 1 m of the slope below the topsoil layer was noted to be lighter in colour indicating that it may be ablation till meaning it was formed by the melting of glacial ice, particularly from the upper layers of a glacier, and is considered to have a lower density than basal till. Small vegetation was visible on the steepest portions of the slope and a few trees on sloping areas of the property were 'pistol-butted'. There was loose soil collected at the base of the slope. The vertical scour height likely due to swift-flowing water at the base of the western cutbank of De Mamiel Creek was approximately 1.5 m in height. The material at the base of the creek was sorted to only contain primarily large gravel, cobbles, and boulders. This indicates that transportation of smaller sediment particles has occurred and that seasonally or in storm events the creek has a relatively high flow rate. At the time of our site reconnaissance, the creek was not flowing and shallow in depth.

#### 3.3 SLOPE STABILITY ASSESSMENT

The native basal glacial till soil observed within the creek slope is typically hard/very dense and globally stable therefore deep-seated failure is considered unlikely. The high friction angle and cohesion of this material is shown through its steep inclination observed in static conditions. However, the slope section is considered over-steepened and potentially susceptible to movement in an earthquake event. Therefore, we have completed a slope stability analysis to confirm that the global slope stability factor of safety and movement meets the minimum requirements for both static and seismic conditions outlined in the EGBC guidelines. Another contributing factor to slope instability that has been considered in our analysis is the erosion rate of the creek at the toe of the slope that could be amplified by the effects of climate change.

We completed limit equilibrium slope stability analysis using RocScience Slide2 software and topography contour information extracted from the online BC LiDAR data (Section A). Section A was produced for our slope stability modelling and is a cross section of the steepest topography of the slope at the southwestern cutbank of the creek. We have modelled a proposed dwelling location offset approximately 11 m to the southwest of the slope crest determined from LiDAR. We understand that a variance is being requested to reduce the side yard setback from 6 m to 4.5 m. To model the most conservative case, we used the furthest setback of the proposed dwelling (4.5 m from the southwest property line) in combination with the steepest slope cross

July 15, 2025 3 OF 6 12541-1





#### PROPOSED DWELLING - GEOHAZARD ASSESSMENT

3139 Otter Point Road - Sooke, BC

section (Section A). Conservative soil strength properties were applied based on our observations, background review, and our past experience with similar soil types, and bedrock was not assumed to be present.

As part of our slope reconnaissance, we traversed near the toe of the ravine slope where the De Mamiel Creek has produced a cutbank from its seasonal flow scouring. We observed very dense "cemented" basal glacial till at the toe of the slope that is considered to have a low susceptibility to erosion due to its relatively high cohesion. However, we have conservatively incorporated into our analysis models the potential effects of slope regression including the effect of long-term scour, erosion, and bank undercutting. Additionally, we have included the potential impacts of climate change, including increased frequency and intensity of extreme rainfall events, that could also contribute to long-term erosion and subsequent regression of the ravine slopes. We determined that a horizontal slope regression of 5 m was appropriate to account for long-term erosion over the anticipated 75-year design life of the ravine slope. The slope crest in our modelling has been modified to be 5 m further back from the 2019 LiDAR slope crest geometry.

The pseudo-static analysis was run with seismic loading based on the Earth Design Ground Motion from the BC Building Code (BCBC) 2024 (National Building Code of Canada [NBCC] 2020 seismic hazard values) for a 2% probability of exceedance in 50 years (1 in 2475-year event), which is the requirement of the current 2024 BCBC. The associated peak ground acceleration (PGA) k value is 0.818 g which was determined using the online 2020 NBCC Seismic Hazard Tool and an estimated Site Classification for Seismic Site Response of 'C' based on observed soil conditions.

The results of our modelling indicate a minimum Factor of Safety (FS) of 1.53 in static conditions and a minimum FS of 0.60 in seismic conditions. Acceptable values of FS are typically >1.5 in static and >1.0 in seismic, as stated within the EGBC Landslide Guidelines Table B-6: Types of Static and Seismic Slope Stability Analysis. Given the NBCC 2020 seismic Factor of Safety resulted in less than the required threshold, and as per the methodology outlined in the guidelines, we used advanced functionality in the software to determine the critical seismic yield coefficient ( $k_y$ ) value (0.408) and used this value in Travasarou's equation to estimate the anticipated permanent displacement resulting from a seismic event. The calculation using Travasarou's "Method 1" (2007) and conservative parameters resulted in a displacement of 12.1 cm, which is within the acceptable maximum limit of 15 cm.

The attached Slope Stability Analysis Results show the stratigraphy, soil parameters, and slip plane in static conditions, seismic 2%, and seismic  $(k_y)$  conditions.

For the purposes of the attached Appendix D: Landslide Assessment Assurance Statement, in accordance with Section 219 of the Land Title Act, we recommend a covenant be registered on title indicating that the steep slope above the creek is subject to geohazard, that the indicated safe building area is considered safe, and that any future building site(s) contemplated closer to the crest of the slope above the creek be assessed by a geotechnical professional to confirm such location is safe for residential construction. Given the above, it is our professional opinion that the proposed safe building area, as indicated on the attached Site Plan, setback 11 m from the slope crest is not subject to risk of geohazard.

July 15, 2025 4 OF 6 12541-1





#### PROPOSED DWELLING - GEOHAZARD ASSESSMENT

3139 Otter Point Road - Sooke, BC

The steep topography and location of De Mamiel Creek creates an access constraint to the northeast portion of the property, upslope from the point bar formation. Therefore, we consider that construction of a building on the northeast portion of the property to be impractical.

#### 3.4 FLOOD ASSESSMENT

Under Bylaw No. 2040 of Schedule "A" of the CRD Juan de Fuca Land Use Bylaw, Part 5, we understand that a Floodplain Setback of a minimum of 30 m is required from the Natural Boundary of De Mamiel Creek. Due to the significant change in elevation from the toe of the slope at De Mamiel Creek (72 m geodetic) to the building site of the proposed dwelling (83 m geodetic), we consider the flooding risk on the property due to the creek to be negligible.

#### 3.5 LIQUEFACTION ASSESSMENT

Based on our past experience in the area, soil mapping, and observed surficial soil deposits at the property, we expect the subsurface soils to be of glacial origin and over-consolidated. Generally being of cohesive and of a stiff consistency or well graded and of a dense consistency; therefore, we do not consider the soils at the site to be susceptible to liquefaction.

## 4. PRELIMINARY GEOTECHNICAL DESIGN

We anticipate site preparation for the proposed dwelling would include minor excavation and removal of any organic and loamy soils, as well as potential fills associated with previous land development. We recommend that the proposed dwelling is founded directly atop native very dense basal glacial till as analyzed in our slope stability modelling. It may also be desirable to utilize minor amounts of engineered fill (crushed gravel, shot rock etc.) to create a flatter and more level building site or to achieve the design bottom of footing grade. We anticipate that the building would be constructed on conventional shallow spread footings. We consider that foundation elements placed directly on undisturbed native very dense basal glacial till, or approved engineered fill atop such, will provide suitable long-term support for the construction of the proposed dwelling. For design purposes, foundations may be dimensioned considering Serviceability and Ultimate Limit State bearing resistance values of 150 kPa (SLS) and 225 kPa (ULS), respectively. We recommend that foundation subgrade surfaces, as well as engineered fill placed below foundation areas (if any), be reviewed by a geotechnical professional prior to pouring concrete. Additionally, footings should be embedded at least 450 mm below finished grade for protection from frost.

Based on our background review and observations of the soil conditions at site, we consider the appropriate Site Classification for Seismic Site Response (Site Class) would be 'C', as per the current BC Building Code.

We expect that conventional perimeter foundation drainage tied into a free draining backfill material would be suitable to limit hydrostatic pressure on the foundation walls. This, however, does not

July 15, 2025

5 OF 6

12541-1 v. 4.2





## PROPOSED DWELLING - GEOHAZARD ASSESSMENT

Shane Moore, P.Geo.

Senior Geoscientist

3139 Otter Point Road - Sooke, BC

preclude the possibility of dampness and/or minor seepage, which would be considered building envelop concerns.

The foundation drain arrangement (perforated pipe and uniform gravel/drain rock) should be covered with a non-woven geotextile filter fabric (not landscape fabric), or a suitably graded granular medium as approved by ourselves, to prevent the migration of finer materials from the backfill into voids within the drain arrangement.

To maintain the long-term surficial stability of the slope, the native soils should be protected from erosion caused by turbulent waterflows within drainage channels and at discharge locations. We recommend that all water from collected from perimeter drains and roof leaders is transmitted via closed piping to a municipal stormwater system or downslope and discharged onto a splash pad or atop the creek at the base of the slope.

## 5. CLOSURE

Provided the above recommendations are followed, we consider the land may be used safely for the use intended, that being the construction of a single-family dwelling. Our assessment is in accordance with Section 56 of the Community Charter, Sections 488 and 491 of the Local Government Act, Section 219 of the Land Title Act, the CRD Juan de Fuca Otter Point OCP, the BC Building Code, and the Professional Practice Guidelines for Legislated Landslide and Flood Assessments in BC (assurance statements attached). Our assessment has considered a design seismic occurrence with a 2% probability of exceedance in 50 years as well as the potential effects of future climate change.

We trust the preceding is suitable for your purposes at present. Please do not hesitate to contact the undersigned if we can be of further assistance.

Sincerely,

Ryzuk Geotechnical

Ben Brownoff, EIT Advanced Junior Engineer

Permit to Practice Number: 1002996

Attachments:

Site Plan

Slope Stability Analysis Results

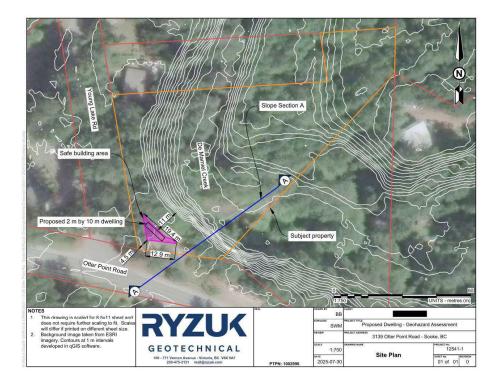
EGBC Landslide Assurance Statement

July 15, 2025

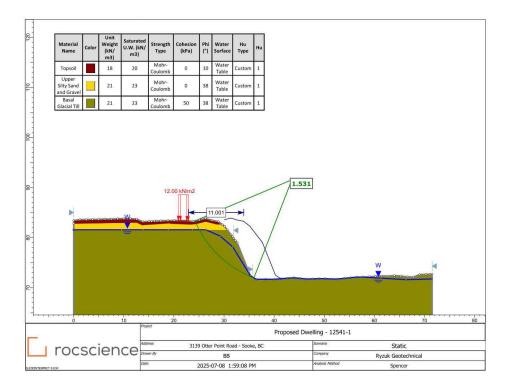
6 OF 6

12541-1 v. 4.2



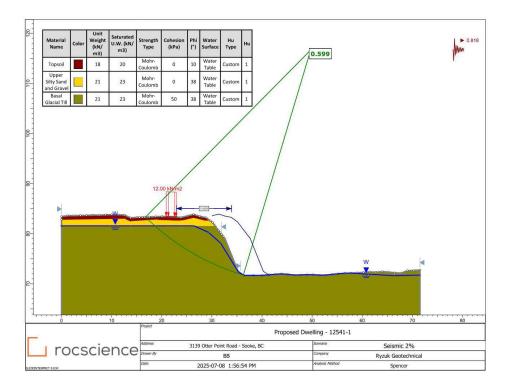






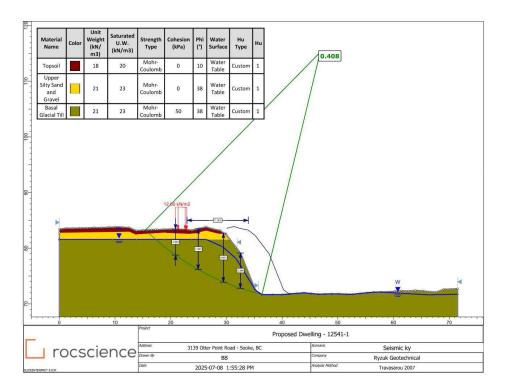


# DV000093





# DV000093



To: The Approving Authority (or Client)



DV000093

July 15, 2025

#### LANDSLIDE ASSESSMENT ASSURANCE STATEMENT

Notes: This statement is to be read and completed in conjunction with the Engineers and Geoscientists BC Professional Practice Guidelines – Landslide Assessments in British Columbia ("the guidelines") and the current BC Building Code (BCBC), and is to be provided for Landslide Assessments (not floods or flood controls), particularly those produced for the purposes of the Land Title Act, Community Charter, or Local Government Act. Some jurisdictions (e.g., the Fraser Valley Regional District or the Cowichan Valley Regional District) have developed more comprehensive assurance statements in collaboration with Engineers and Geoscientists BC. Where those exist, the Qualified Professional is to fill out the local version only. Defined terms are capitalized; see the Defined Terms section of the guidelines for definitions.

Date: \_

100	25 Fisgard Street, Victoria, BC, V8W 1R7
Juri	sdiction/name and address
Nith refe	erence to (CHECK ONE):
	A. Land Title Act (Section 86) – Subdivision Approval
	B. Local Government Act (Sections 919.1 and 920) - Development Permit
	C. Community Charter (Section 56) – Building Permit
	D. Non-legislated assessment
or the f	following property (the "Property"):
	9 Otter Point Road - Sooke, BC
	Civic address of the Property
	ersigned hereby gives assurance that they are a Qualified Professional and a professional engineer or professional ntist who fulfils the education, training, and experience requirements as outlined in the guidelines.
	gned, authenticated, and dated, and thereby certified, the attached Landslide Assessment Report on the Property in nce with the guidelines. That report must be read in conjunction this statement.
n prepa	ring that report I have:
CHECK T	O THE LEFT OF APPLICABLE ITEMS]
<b>v</b> 1.	Collected and reviewed appropriate background information
<b>]</b> 2.	Reviewed the proposed Residential Development or other development on the Property
<b>√</b> 3.	Conducted field work on and, if required, beyond the Property
V 4.	Reported on the results of the field work on and, if required, beyond the Property
<b>v</b> 5.	Considered any changed conditions on and, if required, beyond the Property
6.	For a Landslide Hazard analysis or Landslide Risk analysis, I have:
V	6.1 reviewed and characterized, if appropriate, any Landslide that may affect the Property
V	
7.	Where the Approving Authority has adopted a Level of Landslide Safety, I have:
	7.1 compared the Level of Landslide Safety adopted by the Approving Authority with the findings of my investigation
	7.2 made a finding on the Level of Landslide Safety on the Property based on the comparison
	7.3 made recommendations to reduce Landslide Hazards and/or Landslide Risks
	17.5 Hade recommendations to reduce Educatice Flazards and of Educatic Flakes
	PROFESSIONAL PRACTICE GUIDELINES

15

VERSION 4.1



DV000093

## LANDSLIDE ASSESSMENT ASSURANCE STATEMENT

<ol><li>Where the Approving Authority has not adopted a Level of Landslide Safety, or where the Landslide Assessment is not produced in response to a legislated requirement, I have:</li></ol>
■ 8.1 described the method of Landslide Hazard analysis or Landslide Risk analysis used  ■ 8.1 described the method of Landslide Hazard analysis or Landslide Risk analysis used
8.2 referred to an appropriate and identified provincial, national, or international guideline for Level of Landslide
Safety
=
9. Reported on the requirements for future inspections of the Property and recommended who should conduct those inspections
Based on my comparison between:
[CHECK ONE]
the findings from the investigation and the adopted Level of Landslide Safety (item 7.2 above)  the appropriate and identified provincial, national, or international guideline for Level of Landslide Safety (item 8.4 above)
Where the Landslide Assessment is not produced in response to a legislated requirement, I hereby give my assurance that, based on the conditions 1 contained in the attached Landslide Assessment Report:
A. SUBDIVISION APPROVAL
For <u>subdivision approval</u> , as required by the Land Title Act (Section 86), "the land may be used safely for the use intended" [CHECK ONE]
with one or more recommended additional registered Covenants
without an additional registered Covenant(s)
B. DEVELOPMENT PERMIT
For a <u>development permit</u> , as required by the <i>Local Government Act</i> (Sections 488 and 491), my report will "assist the local government in determining what conditions or requirements it will impose under subsection (2) of [Section 491]"
[CHECK ONE]
with one or more recommended additional registered Covenants
without an additional registered Covenant(s)
C. BUILDING PERMIT
For a <u>building permit</u> , as required by the Community Charter (Section 56), "the land may be used safely for the use intended"
[CHECK ONE]
with one or more recommended additional registered Covenants
without any additional registered Covenant(s)
When seismic slope stability assessments are involved, Level of Landsilde Safety is considered to be a "life safety" criteria, as described in Commentary JJJ of the National Building Code of Canada (NBC) 2015, Structural Commentaries (User's Guide – NBC 2015; part 4 of division B). This states:
"The primary objective of seismic design is to provide an acceptable level of safety for building occupants and the general public as the building responds to strong ground motion; in other words, to minimize loss of life. This implies that, although there will likely be extensive structural and non-structural damage, during the DGM (design ground motion), there is a reasonable degree of confidence that the building will not collapse, nor will list attachments break off and fall on people near the building. This performance level is termed 'extensive damage' because, although the structure may be heavily damaged and may have lost a substantial amount of its initial strength and stiffness, it retains some margin of resistance against collapse."

PROFESSIONAL PRACTICE GUIDELINES
LANDSLIDE ASSESSMENTS IN BRITISH COLUMBIA

16



DV000093

## LANDSLIDE ASSESSMENT ASSURANCE STATEMENT

Name (print)	Date
#100-771 Vernon Ave	enue
Address	
Victoria, BC V8X 5A7	7
250-475-3131	( ) ( ) ( ) ( ) ( ) ( ) ( ) ( ) ( ) ( )
Telephone	
shane@ryzuk.com	Jul. 31 2025
Email	(Affiv PROFESSIONAL SEAL and signature he
	(Affix PROFESSIONAL SEAL and signature he
	(Affix PROFESSIONAL SEAL and signature he registrant on the roster of a registrant firm, must complete the following:
The Qualified Professional, as a	registrant on the roster of a registrant firm, must complete the following:
The Qualified Professional, as a	registrant on the roster of a registrant firm, must complete the following:  Ryzuk Geotechnical Ltd.

PROFESSIONAL PRACTICE GUIDELINES
LANDSLIDE ASSESSMENTS IN BRITISH COLUMBIA

VERSION 4.1



# REPORT TO THE JUAN DE FUCA LAND USE COMMITTEE MEETING OF TUESDAY, NOVEMBER 18, 2025

#### SUBJECT

Zoning Amendment Application for That Part of Section 90, Renfrew District, Shown Outlined in Red on Plan 913R Lying to the North of the Southerly Boundary of Plan 503RW – 9260 Invermuir Road

# **ISSUE SUMMARY**

The applicant is proposing to rezone the property (Appendix A) from the Rural (A) and Forestry (AF) zones (Appendix B) to the Rural 2 (RU2) zone (Appendix C) for the purpose of facilitating a two-lot subdivision (Appendix D) and permitting agriculture and farm buildings.

# **BACKGROUND**

The 13.7 ha property is located at 9260 Invermuir Road in Shirley. The property is split-zoned Rural (A) and Forestry (AF) under the Juan de Fuca Land Use Bylaw, 1992, Bylaw No. 2040. There is an RU2 zoned parcel to the west, a Resource Land (RL) zoned parcel to the north and east, and Rural (A) zoned parcels to the east and across Invermuir Road to the south.

The property is designated as Coastal Upland (CU) in the Shirley – Jordan River Official Community Plan (OCP), Bylaw No. 4001. Portions of the property are designated as Riparian and Sensitive Ecosystem Development Permit (DP) areas. The parcel is within the Shirley Fire Protection Service Area, but outside a community water service area.

There is an existing dwelling on the parcel that was completed in 2023. Should the rezoning and subdivision proceed, the dwelling would be located on proposed Lot B. An easement registered on title of the property allows Timberwest Forest Ltd. (Mosaic Forest Management) to continue to conduct various forestry related uses on the property; however, the property is no longer classified as Managed Forest under the *Private Managed Forest Land Act* (PMFL).

Staff have prepared Bylaw No. 4716 (Appendix E) for consideration and referral to external agencies, departments and First Nations.

## **ALTERNATIVES**

Alternative 1

That staff be directed to refer proposed Bylaw No. 4716, "Juan de Fuca Land Use Bylaw, 1992, Amendment Bylaw No. 169, 2025" to the Shirley – Jordan River Advisory Planning Commission, appropriate CRD departments, external agencies and First Nations for comment.

Alternative 2

That proposed Bylaw No. 4716 not be referred.

#### **IMPLICATIONS**

Legislative

The Advisory Planning Commissions (APCs) were established to make recommendations to the Land Use Committee on land use planning matters referred to them related to Part 14 of the *Local Government Act (LGA)*. Staff recommend referring the proposed amendment bylaw to the Shirley – Jordan River APC.

Should the proposal proceed, a public hearing pursuant to Part 14, Division 3 of the *LGA* will be required subsequent to the amendment passing second reading by the CRD Board. Property owners

and residents within 500 m of the subject property will be sent notice of the proposed bylaw amendment and the public hearing will be advertised in the local paper and on the CRD website.

# First Nations Implications

The CRD places a high value on its relationship with First Nations and the enhancement of reciprocal engagement procedures that advance reconciliation. The subject property is located within the traditional territory of the paa?čiid?atx (Pacheedaht) and T'Sou-ke First Nations. Each Nation will be invited to participate in the land use review and referral process to inform the Nations of proposed development activity within their territory and seek meaningful dialogue and comment with respect to the proposal.

# Regional Growth Strategy Implications

Section 445 of the *LGA* requires that all bylaws adopted by a regional district board after the board has adopted a Regional Growth Strategy (RGS) be consistent with the RGS. In accordance with CRD policy, where a zoning bylaw amendment that applies to land within the Shirley – Jordan River OCP area is consistent with the OCP, it does not proceed to the CRD Board for a determination of consistency with the RGS. The proposed zoning amendment is consistent with the policies of the OCP.

# Land Use Implications

The subject property is designated Coastal Uplands (CU) in the Shirley – Jordan River OCP which supports the continued use of these lands for forestry purposes. However, if lands are removed from PMFL, then uses such as low-impact recreation, low-impact tourism, community parks, single-family residential and agriculture are also supported. The CU designation supports a density of one parcel per 4 ha and one dwelling and one accessory dwelling unit per parcel. The proposal to rezone the property to RU2 is consistent with CU designation policy.

The property is split-zoned Forestry (AF) and Rural (A) under Bylaw No. 2040. The split-zone boundary has been in place since the adoption of Bylaw No. 282, 1976, but there is no obvious rationale for this divide. The AF zoned portion of the parcel is 12.6 ha, and the A zoned portion is 1.1 ha. While the total parcel area is 13.7 ha and the minimum parcel size of both the AF and A zones is 4 ha, the location of the zone boundary has the effect or preventing subdivision, since the zone boundary acts as a property boundary for the purposes of determining use and density and the A zoned portion is less than 8 ha (2 x 4 ha).

The property is partially designated as Riparian and Sensitive Ecosystem DP areas in Bylaw No. 4001. A development permit is required prior to any land alteration, subdivision or building construction in those areas.

Staff recommend referral of the rezoning application and proposed Bylaw No. 4716 to the Shirley – Jordan River APC, and to appropriate external agencies, CRD departments and First Nations for comment.

# CONCLUSION

The purpose of this zoning bylaw amendment application is to rezone the 13.7 ha property on Invermuir Road from the Rural (A) and Forestry (AF) zones to the Rural 2 (RU2) zone to facilitate a two-lot subdivision and permit agriculture and farm buildings. Staff have prepared proposed Bylaw No. 4716 and recommend referral to the Shirley – Jordan River Advisory Planning Commission, First Nations, CRD departments and external agencies for comment. All comments received will be returned to the Land Use Committee. At that time, the Committee may consider a recommendation for first and second reading.

# **RECOMMENDATION**

That staff be directed to refer proposed Bylaw No. 4716, "Juan de Fuca Land Use Bylaw, 1992, Amendment Bylaw No. 169, 2025" to the Shirley – Jordan River Advisory Planning Commission, appropriate CRD departments, external agencies and First Nations for comment.

Submitted by: Iain Lawrence, MCIP, RPP, Senior Manager, JdF Administration	
Concurrence:	Stephen Henderson, MBA, P.G.Dip.Eng., B.Sc., General Manager, Electoral Area Services

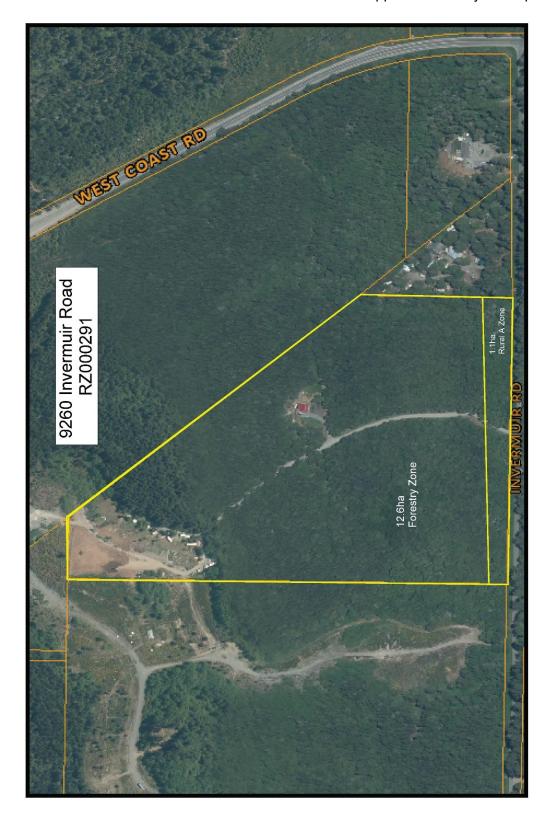
# **ATTACHMENTS**

Appendix A: Subject Property Map

Appendix B: Forestry (AF) and Rural (A) Zone Regulations

Appendix C: Rural 2 (RU2) Zone Regulations
Appendix D: Proposed Plan of Subdivision
Appendix E: Proposed Bylaw No. 4716

Appendix A: Subject Property Map



# Appendix B: Forestry (AF) and Rural (A) Zone Regulations

## Schedule "A" of Capital Regional District Bylaw No. 2040 Juan de Fuca Land Use Bylaw

#### 3.0 FORESTRY ZONE - AF

#### 3.01 Permitted Uses

In addition to the uses permitted by Section 4.15 of Part 1 of this Bylaw, the following uses and no others shall be permitted in the Forestry AF Zone:

- (a) Silviculture except within 300m of a highway;
- (b) Offices, mechanical shops, fuel storage, and storage buildings accessory to mining or silviculture;
- (c) One-family dwelling;
- (d) Home Based Business Categories One, Two and Three;

Bylaw 3705

(e) Two Boarders or lodgers;

(f) Secondary Suite pursuant to Part 1, Subsection 4.19;

Bylaw 3849 Bylaw 3849

- (g) Detached Accessory Suite pursuant to Part 1, Subsection 4.20:
- Portable sawmill accessory to a principal residential use on That Part of Lot 87, Renfrew District, Lying to the East of a Boundary Parallel to the Easterly Boundary of Said Lot and Extending From a Point on the Northerly Boundary of Said Lot Distant 10 Chains from the North East Corner of Said Lot and to the South of the Northerly Boundary of Plan 109 RW, Except Part in Plan 16260, PID: 006-452-230.

  Bylaw 4407

#### 3.02 <u>Minimum Parcel Size for Subdivision</u> Purposes

The minimum lot size is 4ha;

3.03 Density

- a) One one-family dwelling per lot;
- b) One secondary suite or one detached accessory suite per lot;
- The maximum area devoted to an accessory portable sawmill use shall be 0.5 ha.

Bylaws 3849 4407

3.04 Height

Maximum height shall be 11 m.

3.05 Lot Coverage

Maximum lot coverage shall be 10 percent.

## 3.06 Maximum Size of for Residential Buildings

Provided applicants having either met the Sewerage System Regulation (e.g., a filing) or acceptance by VIHA via referral.

Bylaw 3705

- (i) On lots of less than 1ha in area, residential buildings and structures shall not exceed a Floor Area Ratio of 0.45 or a Total Floor Area of 418 m<sup>2</sup>, whichever is less:
- (ii) On lots of 1ha or more in size, residential buildings and structures shall not exceed a Floor Area Ratio of 0.45.

3.07 Yard	Requirements
-----------	--------------

- a) The front, side, rear and flanking yards for an accessory portable sawmill use shall be a minimum of 30 m;
- For all other buildings and structures, the front, side, rear and flanding yards shall be a minimum of 15 m

Bylaws 3849, 4407

## 3.08 Screening

a) A vegetative screen, consisting of coniferous vegetation native to the region that is not less than 2 m high and 5 m deep and spaced no less than 2 m apart, or a solid fence, at least 2.5 m in height, shall be located and maintained around the perimeter of the portable sawmill operation.

Bylaw 4407

#### 3.09 Portable Sawmill

- Persons employed at a portable sawmill operation are limited to persons normally resident in the dwelling unit to which it is incidental plus up to three non-resident employees;
- A portable sawmill shall operate between the hours of 9 am and 3 pm, Monday to Friday, excluding statutory holidays;
- c) In addition to the hours specified in paragraph 3.09(b), sales from a portable sawmill shall be permitted on Saturdays between the hours of 9 am and 5 pm, excluding statutory holidays;
- Notwithstanding Part 1, Section 4.01(2)(c), the maximum total floor area of buildings and structures devoted to an accessory portable sawmill use shall be 60 m<sup>2</sup>;
- Portable sawmill and related operations shall not create noise that exceeds a level of 55 dB when measured at the property line.

Bylaw 4407

#### 2.0 RURAL ZONE - A

#### 2.01 Permitted Uses

In addition to the uses permitted by Section 4.15 of Part 1 of this Bylaw, the following uses and no others shall be permitted in the Rural A Zone:

- (a) Agriculture;
- (b) Intensive Agriculture, except that sites for piggeries, fur farming and other similar agricultural, horticultural and animal raising activities in which the intensity and nature of the use would be materially more offensive by reason of noise, odour or appearance shall be located at least 150m from the nearest Residential or Multiple Family Residential Zone;
- (c) Silviculture
- (d) Home Based Business Categories One, Two and Three;

Bylaw 3705

- (e) One-family dwelling;
- (f) Two-family dwelling;
- (g) Animal Hospitals;
- (h) Veterinary Clinics;
- One travel trailer or one camper may be permitted in conjunction with a permitted residential use on a lot, which may be used but not rented for the temporary accommodation of guests or visitors;
- (i) Two Boarders or Lodgers;
- (k) Accessory uses such as on-site logging, and pole- or post- or shake-cutting from trees grown on-site;
- (I) Finfish culture, land-based;
- (m) One secondary suite per lot pursuant to Part 1, Subsection 4.19; Bylaw 2674
- (n) Detached Accessory Suites pursuant to Part 1, Subsection 4.20. Bylaw 3605

#### 2.02 <u>Minimum Parcel Size for</u> <u>Subdivision Purposes</u>

The minimum lot size shall be 4.0ha.

# 2.03 Number of Dwelling Units

The maximum density for residential buildings (comprised of one- and/or two-family dwellings) shall not exceed the following:

- (a) On lots of 0.4ha or less, one one-family dwelling;
- (b) On lots of more than 0.4ha and less than 0.8ha, not more than two one-family or one two-family dwelling;
- (c) On lots of more than 0.8ha and less than 4ha, not more than three one-family dwellings or three dwelling units;
- (d) On lots of more than 4ha and less than 16ha, not more than four one-family dwellings or four dwelling units:
- (e) On lots of more than 16ha and less than 32ha, not more than five one-family dwellings or five dwelling units;
- (f) On lots of more than 32ha, not more than eight onefamily dwellings or eight dwelling units.

### 2.04 Height

The maximum height permitted shall be 11m.

# 2.05 Lot Coverage

The maximum lot coverage permitted shall be 15 percent.

CRD Bylaw No. 2040

47

Consolidated for Convenience April 2023

2.06	Maximum Size of Residential Buildings	Provided applicants having either met the Sewerage System Regulation (e.g., a filing) or acceptance by VIHA via referral:
		(a) On lots of less than 1ha in area, residential buildings and structures shall not exceed a Floor Area Ratio of 0.45 or a Total Floor Area of 418m², whichever is less; (b) On lots of 1ha or more in size, residential buildings and structure shall not exceed a Floor Area Ratio of 0.45.  Bylaw 3705
2.07	Yard Requirements for Residential Buildings	<ul> <li>(a) Front yards shall be a minimum of 7.5m;</li> <li>(b) Side yards shall be a minimum of 6m except for lots of greater than 1ha in size and where residential uses exceed a Total Floor Area of 418m², minimum side yards shall be 15 m each side;</li> <li>(c) Flanking yards shall be a minimum of 6m CTS;</li> <li>(d) Rear yards shall be a minimum of 11m.</li> </ul>
2.08	Yard Requirements for Farm Buildings	<ul><li>(a) Front yards shall be a minimum of 30m;</li><li>(b) Side, flanking and rear yards shall be a minimum of 15m.</li></ul>
2.09	Yard Requirements for Finfish Culture, Land-Based Uses and Structures	Front, side, flanking and rear yards shall be a minimum of 30m.
2.10	Yard Requirements for Intensive Agriculture Uses and Buildings	<ul><li>(a) Front yards shall be a minimum of 30 m;</li><li>(b) Side, rear and flanking yards shall be a minimum of 30m.</li></ul>
		Bylaw 2103

# Appendix C: Rural 2 (RU2) Zone Regulations

## Schedule "A" of Capital Regional District Bylaw No. 2040 Juan de Fuca Land Use Bylaw

#### 3A.0 RURAL 2 ZONE - RU2

# Bylaw 4259

#### 3A.01 Permitted Principal Uses & Buildings

In addition to the uses permitted by Section 4.15 of Part 1 of this Bylaw, the following uses and no others shall be permitted by the Rural 2 RU2 Zone:

- (a) Agriculture:
- (b) Farm Buildings on Farms;
- (c) Residential;
- (d) One-family Dwelling.

#### 3A.02 Permitted Accessory Uses

- (a) Accessory buildings and structures ancillary to a permitted use pursuant to Part 1, section 4.01;
- (b) Secondary Suite pursuant to Part 1, Subsection 4.19;
- (c) Detached Accessory Suite pursuant to Part 1, Subsection 4.20;
- (d) Home Based Business Categories One, Two and Three;
- (e) Two Boarders or Lodgers;
- (f) One recreation vehicle may be permitted in conjunction with a permitted residential use on a lot, which may be used but not rented for the temporary accommodation of guests or visitors;
- (g) Composting of waste generated on-site.

# 3A.03 Minimum Parcel Size for Subdivision Purposes

(a) The minimum lot size is 4 ha.

# 3A.04 Density

- (a) One one-family dwelling per lot is permitted.
- (b) One secondary suite or one detached accessory suite per lot is permitted.
- (c) Farm buildings and structures shall not exceed a total floor area 1,000m<sup>2</sup>.
- (d) Residential buildings and structures shall not exceed a total floor area of 418 m<sup>2</sup>.

# 3A.05 Height

(a) The maximum height of principal buildings is 11 m.

#### 3A.06 Lot Coverage

(a) The maximum lot coverage shall be 10%

# 3A.07 Yard Requirements

- (a) Residential buildings and structures shall be set back a minimum of:
  - a. 7.5 m from the front lot line;
  - b. 6 m from side lot lines;
  - c. 10 m from the rear lot line; and
  - d. 6 m CTS from flanking lot lines.
- (b) Except for grazing of livestock and growing of agricultural crops, agricultural uses and farm buildings shall be set back a minimum of:
  - a. 30 m from the front lot line;
  - b. 15 m from side, rear and flanking lot lines.

## 3A.08 Watercourse Setbacks

(a) Agricultural uses and farm buildings and structures shall be a minimum of 15 m from the natural boundary of a watercourse.

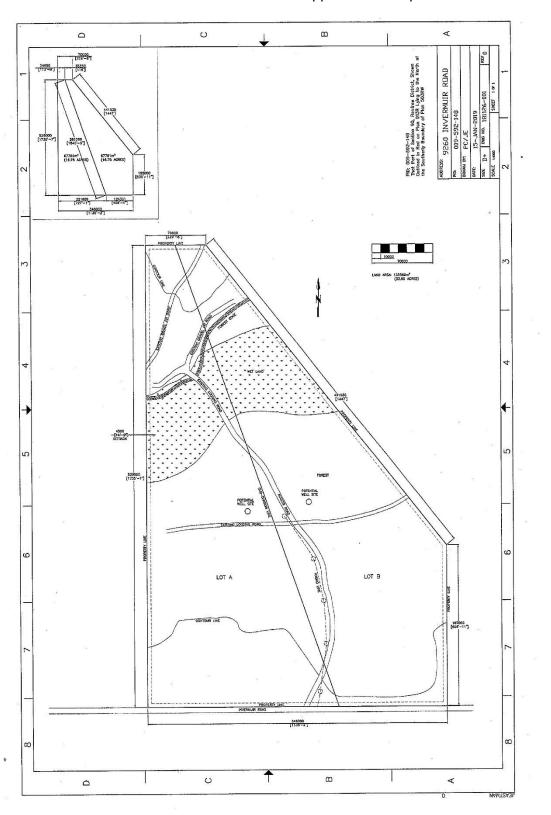
#### 3A.09 Definitions

(a) For the purpose of the RURAL 2 zone – RU2, the following definitions apply:

**Agriculture** means the growing, rearing, producing or harvesting agricultural crops or livestock; apiculture; horticulture; silviculture; the use and storage of associated farm machinery, implements and agricultural supplies; includes the ancillary sale, storage and processing on a parcel of the primary products harvested, reared or produced on that parcel; excludes intensive agriculture, intensive agriculture — medical marihuana, licenced cannabis production pursuant to the *Cannabis Act*, kennels, aquaculture, growing of mushrooms within a building and the permanent confinement of livestock or animals of any kind within a building.

**Farm Building** means a structure which does not contain a residential occupancy and is: i) associated with and located on land devoted to the practice of farming; and ii) used essentially for the housing of agricultural crops or equipment or livestock including storage and processing of agricultural products produced on site; but excludes abattoirs, indoor equestrian riding arenas, and buildings for the permanent confinement of livestock or animals of any kind.

Appendix D: Proposed Plan of Subdivision



Appendix E: Proposed Bylaw No. 4716

## CAPITAL REGIONAL DISTRICT BYLAW NO. 4716

A BYLAW TO AMEND BYLAW NO. 2040, THE "JUAN DE FUCA LAND USE BYLAW, 1992"

The Capital Regional District Board, in open meeting assembled, enacts as follows:

1. Bylaw No. 2040 being the "Juan de Fuca Land Use Bylaw, 1992" is hereby amended:

## A. SCHEDULE B, MAP 3 - SHIRLEY - JORDAN RIVER ZONING MAP

(a) By deleting That Part of Section 90, Renfrew District, Shown Outlined in Red on Plan 913R Lying to the North of the Southerly Boundary of Plan 503RW from the Rural (A) zone and from the Forestry (AF) zone, and adding said lot to the Rural 2 (RU2) zone, as shown on Plan No.1.

RL

Area to be deleted from the Forestry (AF) Zone and added to the Rural 2 (RU2) Zone

Zoning

Subject Property

Lot Boundaries

RL

AF

RR-3

RR-3

AF

AF

AF

AF

AF

AF

AF

Plan No. 1: Bylaw 4716, an amendment to Bylaw No. 2040

CRD Bylaw No. 4716 2					
2. This bylaw may be cited as "Juan de Fuca Land Use Bylaw, 1992, Amendment Bylaw No. 169, 2025".					
READ A FIRST TIME THIS	day of	, 2026.			
READ A SECOND TIME THIS	day of	, 2026.			
READ A THIRD TIME THIS	day of	, 2026.			
ADOPTED THIS	day of	, 2026.			
CHAIR	CORPORATE OFFICER				