



# BOARD REPORT

**TO:** Chair and Directors

<b>File No:</b> DVP 641-28 PL20170086
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**SUBJECT:** Electoral Area F: Development Variance Permit No. 641-28 (Mira Grande Developments)

**DESCRIPTION:** Report from Dan Passmore, Senior Planner, dated May 29, 2017. 4189, 4273, and 4275 Squilax-Anglemont Road, Scotch Creek.

**RECOMMENDATION:** THAT: in accordance with Section 498 of the Local Government Act Development Variance Permit No. 641-28 for Fractional SW 1/4, Section 35, Township 22, Range 11, West of the 6<sup>th</sup> Meridian, Kamloops Division Yale District, Except Plans 8597, 18252, 20191, 25532, and 28256 (PID: 013-812-807), varying Subdivision Servicing Bylaw No. 641, as follows:

1. Waive the requirement of Section 5.1 (c), in reference to Schedule A Levels of Service, to service the proposed new lots with a Water Supply System,

be approved for issuance this 20<sup>th</sup> day of July, 2017, subject to registration of a suitably worded Section 219 covenant on the title of the subject property, stating the following:

- That the lots are not to be used for residential purposes unless the recommendations contained within the Hydrogeological Assessment, dated May 26, 2017, by Yanfeng Yin, PhD, P.Geo., of Kala Geosciences Ltd., have been satisfied; and,
- that all lots are required to connect to a community water and sewer system when one becomes available.

### SHORT SUMMARY:

The applicant has applied to subdivide (2013-02400) the subject property into 3 new lots of around 4 ha in size. To service the subdivision the applicant is proposing to use 3 groundwater wells which have been constructed on each of the proposed new lots. The subject property is within the Scotch Creek Primary Settlement Area, and in accordance with Electoral Area F Official Community Plan Bylaw No. 830, servicing is supposed to be by community sewer and water systems. This requirement is echoed in Subdivision Servicing Bylaw Requirements for Level of Service.

The application is to waive the requirement in Subdivision Servicing Bylaw No. 641 for a connection to each of the proposed lots to a water supply system.

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<b>VOTING:</b>	Unweighted Corporate <input type="checkbox"/>	LGA Part 14 (Unweighted) <input checked="" type="checkbox"/>	Weighted Corporate <input type="checkbox"/>	Stakeholder ( <i>Weighted</i> ) <input type="checkbox"/>
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### BACKGROUND:

PROPERTY OWNER: Mira Grande Developments Ltd., Inc. No. 260212

AGENT: D.S. Cunliffe, P.Eng.

ELECTORAL AREA: F

CIVIC ADDRESS 4189, 4273, and 4275 Squilax-Anglemont Road, Scotch Creek, BC

LEGAL DESCRIPTION: Fractional SW 1/4, Section 35, Township 22, Range 11, West of the 6<sup>th</sup> Meridian, Kamloops Division Yale District, Except Plans 8597, 18252, 20191, 25532, and 28256 (PID: 013-812-807)

SIZE OF PROPERTY: 14.25 ha (35.21 ac)

SURROUNDING LAND USE PATTERN:

North: Rural Residential  
South: Residential  
East: Residential  
West: Residential

CURRENT USE: One Single Family Dwelling

PROPOSED USE: 3 Proposed Residential Lots

OCP DESIGNATION: Electoral Area F Official Community Plan Bylaw No. 830  
NR Neighbourhood Residential Scotch Creek Primary Settlement Area

ZONING: Scotch Creek/Lee Creek Zoning Bylaw No. 825  
MHP – Manufactured Home Park

**POLICY:****Electoral Area "F" Official Community Plan Bylaw No. 830**

Section 10.2 Water Supply and Distribution

Section 10.3 Liquid Waste Management

Section 12.8 Neighbourhood Residential

Section 13.1 Steep Slope Hazardous Lands Development Permit Area

See "BL830\_Policies\_DVP641-28", attached.

**Scotch Creek/Lee Creek Zoning Bylaw No. 825 – MHP Manufactured Home Park**

Principal uses are *Manufactured home space* and *Manufactured home park*. Secondary uses include *Accessory use* and *Home business*. The MHP zone allows 1 manufactured home per hectare, where the property is not serviced with a community sewer system, as in the case of this proposal. The MHP zone does not permit single family dwellings, unless they are manufactured homes, as defined in the bylaw.

**Subdivision Servicing Bylaw No. 641**

Section 5.1 (c) requires the Owner of property to provide *Works and Services* not within a *Highway* within a proposed subdivision to the level described in Schedule "A". Schedule "A", requires an owner to either provide, or connect to a *Water Supply System*, for subdivisions proposed within a Primary Settlement Area.

A Community Sewer System is also required except where proposed lot sizes are in excess of 1.0 ha, in which case an On-Site Sewage Disposal system is permitted.

#### **FINANCIAL:**

There are no financial implications to the CSRD with regard to this application.

#### **KEY ISSUES/CONCEPTS:**

##### **Access:**

Access to the subdivision will be from Squilax-Anglemont Road in 2 different locations. Internal to the lot driveway easements will be required where shared driveways are anticipated. All access driveways are required to comply with Subdivision Servicing Bylaw No. 641, Part 7, Section 7.2.

##### **Sewer Servicing**

Each lot is proposed to be serviced by an On-Site Sewage Disposal System. The applicant has engaged a Qualified Professional to design each system. Due to the steep topography on the property, effluent dispersal areas are limited, so the Qualified Professional has designed a Type 2 system for each lot that utilizes raised sand mounds to discharge the effluent into. The Owner has provided a Hydrogeological Assessment, dated May 26, 2017, by Yanfeng Yin, PhD, P.Geo., of Kala Geosciences Ltd. The Assessment report reviews whether the proposed wastewater treatment systems will negatively impact the highly vulnerable Scotch Creek aquifer. Subsurface geomorphology suggests that the design and location of the systems will not detrimentally impact the Scotch Creek Aquifer which provides drinking water to the majority of residents within the Scotch Creek Primary Settlement Area.

The Subdivision Servicing Bylaw requirements are fulfilled by the preparation of designs for each sewage disposal system, and the report submitted, however, the subdivision process does not require construction of the individual systems. Therefore, there is no guarantee that individual property owners will install the types of systems proposed and designed by the Qualified Professional when they choose to build on the proposed new lots. Moreover, the Hydrogeological Assessment recommends that Kala Geosciences should be involved in all aspects of construction of On-Site Sewage systems. In this instance, it is critical that they do so, so that neither the Scotch Creek aquifer, nor the groundwater wells constructed on each lot are compromised.

##### **Drinking Water**

The applicant has constructed 3 groundwater wells. The wells are extremely deep and are in bedrock, and do not draw from the Scotch Creek Aquifer. Well test results indicate that the wells are capable of sustainably providing the required quantity of water. The following results were observed for each well:

Well Registration No. 05040601 (Proposed Lot 1):

Well depth: 334'

Estimated Well Yield: 25USGpM

Water Quality: Test results indicate High Turbidity of 6.69 NTU, which exceeds Maximum Acceptable Concentration (MAC) of 0.1. Total Dissolved Solids exceeds aesthetic guidelines by 19%. Test indicates Flouride ions at 4.19mg/L exceed MAC of 1.5 mg/L.

Well Registration No. 06100501 (Proposed Lot 3):

Well depth: 454'

Estimated well yield: 15 USGpM

Water Quality: In addition to turbidity 5.52 NTU over MAC 0.1 NTU, Iron, Aluminum, Manganese and Flouride ion exceed MAC.

Well Registration No. 05040601 (Proposed Lot 2):

Well depth: 454'

Estimated well yield: 9 USGpM

Water Quality: In addition to turbidity 9.44 NTU over MAC 0.1 NTU, Iron, Aluminum, Manganese and Flouride ion exceed MAC.

Turbidity and Total Dissolved Solids issues can be normalized through some form of filtration system. Presence of metals and fluoride ions will require treatment to achieve potability. Please note that Subdivision Servicing Bylaw No. 641 requires registration of a Section 219 covenant against each lot dealing with water quality issues highlighted from the test results.

### **Scotch Creek Primary Settlement Area**

Policies within the OCP require that development within the Primary Settlement Area (PSA) must be serviced with community water and sewer systems.

For much of the Scotch Creek PSA, community sewer systems are not available for development, such as subdivision, to connect to, unless a developer's project includes some form of community sewer system internally. There are currently no community sewer systems in Scotch Creek that are owned and operated by the CSRD. Subdivision Servicing Bylaw regulations, however, allow for subdivision on an On-Site Sewage system as long as the proposed lots are greater than 1.0 ha in size. This 1.0 ha figure is consistent with Interior Health Authority (IHA) guidelines. It is also the figure used by the Ministry of Community, Sport, and Cultural Development in determining the baseline for Local Government land use regulation to qualify for future infrastructure grant programs.

The CSRD does own and operate a Community Water System, in the PSA. It is the Saratoga (CSRD) Water System. This system is in close proximity to the proposed development property, but is not able to provide service, as the subject property is at a much higher elevation than the reservoir for the Saratoga system, which is located on the subject property. As a result the applicant has determined that it is not feasible to obtain community water service to the proposed new lots.

Operations Management staff have reviewed the situation and support this view. Operations Management staff have also indicated that a new future reservoir at a higher elevation would benefit the Saratoga Water System and its service area.

### **The Vulnerable Scotch Creek Aquifer**

The CSRD commissioned Golder Associates, who produced a Hydrogeological Assessment of the Impact of Septic Effluent on the Scotch Creek Aquifer, dated January, 1998. The report identified that all residents of the Scotch Creek area draw their drinking water from wells into the aquifer, and discussed the aquifers vulnerability to on-site sewage effluent disposal. As a result of this study, and

based on its conclusions, future planning initiatives in the area endeavoured to place limitations on development in the study area. This is the basis for the policies in the current Official Community Plan which limits development without community infrastructure.

### **Hydrogeological Assessment**

As noted earlier in the report, the owner has provided a Hydrogeological Assessment report. The report advises that treated effluent dispersed following the design recommendations is unlikely to infiltrate into the Scotch Creek aquifer or the bedrock underlying, in which the drinking water wells for the proposed lots have been drilled.

### **Hazardous Lands (Steep Slopes) Development Permit Area**

The applicant has applied for a Development Permit for Steep Slopes which has been reviewed and issued by the Manager Development Services.

### **SUMMARY:**

The applicant has applied for a Development Variance Permit to waive the requirement for the proposed new lots within the proposed subdivision in the Scotch Creek Primary Settlement Area to be serviced by a water supply system, whether it be a connection to an existing water supply system or establishment of such a system for the benefit of the properties serviced through a utility.

The application is not supported by policies within Electoral Area F Official Community Plan Bylaw No. 830. In spite of this, staff are recommending that the Board can approve the Development Variance Permit for issuance, subject to the owner registering a suitably worded Section 219 covenant against the titles to the proposed lots, to address the Hydrogeological Assessment recommendations, and to connect to community sewer and water systems, when available. The reasons that staff are recommending this are as follows:

- OCP policy objectives to protect the sensitive Scotch Creek aquifer have been satisfied as demonstrated by the On-site septic sewer design, and the Hydrogeological Assessment;
- Groundwater wells constructed on-site are drilled to a depth where they do not draw from the Scotch Creek aquifer, but instead draw from the bedrock underlying the aquifer; and,
- It is not feasible for the owner to connect to a current Community Water System.

### **IMPLEMENTATION:**

#### **Consultation Process**

Neighbouring property owners will first become aware of the application for DVP when notice of the intent of the Board to review the issuance of DVP 641-28, is mailed out to property owners within 100 m of the subject property.

### **COMMUNICATIONS:**

If the Board approves issuance of DVP 641-28, the owner and agent will be advised of the decision and any conditions that will need to be fulfilled. Once such conditions are fulfilled, staff will prepare the Notice of Permit for submission to Land Title Office for registration on the title of the subject property. Once the CSRD is advised that the DVP permit has been registered on title, the subdivision proposal may be in a position to receive final comments from CSRD staff to the Ministry of Transportation and Infrastructure.

### **DESIRED OUTCOMES:**

That the Board endorse staff recommendation.

**BOARD'S OPTIONS:**

1. *Endorse the Recommendation.*
2. *Decline approval of the Permit.*
3. *Defer.*
4. *Any other action deemed appropriate by the Board.*

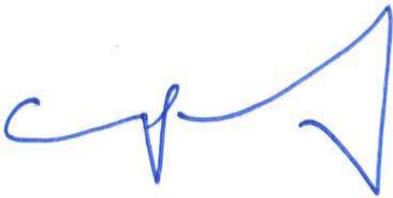
**LIST NAME OF REPORT(S) / DOCUMENT(S) AVAILABLE FROM STAFF:**

1. Kala Geosciences Ltd., Hydrogeological Assessment, May 26, 2017
2. Kala Geosciences Ltd., On-site Wastewater Treatment and Disposal Report, May 27, 2014
3. Onsite Engineering Ltd., Landslide Hazard Assessment Report, September 30, 2016

**Report Approval Details**

Document Title:	2017-07-20_Board_DS_DVP641-28_MiraGrande.docx
Attachments:	- DVP641-28.pdf - BL830_Policies_DVP641-28.pdf - Maps_Plans_DVP 641-28.pdf
Final Approval Date:	Jun 5, 2017

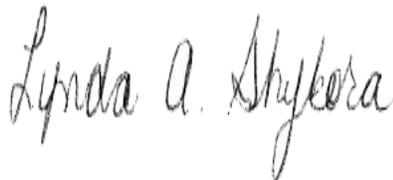
This report and all of its attachments were approved and signed as outlined below:



**Corey Paiement - May 31, 2017 - 9:27 AM**



**Gerald Christie - May 31, 2017 - 2:53 PM**



**Lynda Shykora - May 31, 2017 - 3:37 PM**



**Charles Hamilton - Jun 5, 2017 - 10:59 AM**