



# Phase I Environmental Site Assessment

9 Erskine Lane,  
View Royal, British Columbia

Prepared for:

## **WestUrban Developments Ltd.**

1-1170 Shoppers' Row  
Campbell River, BC V9W 2C8

Attn: Frank Limshue  
Development Manager

July 25, 2019

Pinchin File: 243564.000



**Issued To:** WestUrban Developments Ltd.  
**Contact:** Frank Limshue  
Development Manager  
**Issued On:** July 25, 2019  
**Pinchin File:** 243564.000  
**Issuing Office:** Richmond, BC  
**Primary Contact:** Rio Roessaptono, M.Eng., P.Eng., Project Manager,  
604.238.2908  
[rroessaptono@pinchin.com](mailto:rroessaptono@pinchin.com)

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Author: \_\_\_\_\_  
Jessica Pagotto, B.Sc.  
Senior Project Coordinator  
250.551.6875  
[jpagotto@pinchin.com](mailto:jpagotto@pinchin.com)

Reviewer: \_\_\_\_\_  
Tadd Berger, M.Sc., EP, P.Ag., CSAP  
Operations Manager; Practice Leader  
604.238.2938  
[tberger@pinchin.com](mailto:tberger@pinchin.com)



## **EXECUTIVE SUMMARY**

Pinchin Ltd. (Pinchin) was retained on June 7, 2019 through an Authorization to Proceed, Limit of Liability and Terms of Engagement signed by Frank Limshue of WestUrban Developments Ltd. (Client) to conduct a Phase I Environmental Site Assessment (ESA) of the property located at 9 Erskine Lane, View Royal, British Columbia (hereafter referred to as the Site).

The Site is developed with a two-storey single-family residential dwelling (Site Building A), and a detached garage (Site Building B).

Pinchin was advised by the Client that the purpose of the Phase I ESA was to assess potential issues of environmental concern in relation to the potential acquisition and future redevelopment of the Site.

The Phase I ESA was completed in general accordance with the Canadian Standards Association (CSA) document entitled "*Phase I Environmental Site Assessment, CSA Standard Z768-01*" dated November 2001 (reaffirmed 2016) and the general requirements of the BC Contaminated Sites Regulation (CSR), including a review of readily-available historical records, a review of readily-accessible regulatory records, a Site reconnaissance, interviews, an evaluation of information and reporting, subject to the limitations outlined in Section 8.0 of this report.

Based on the results of the Phase I ESA completed by Pinchin, the following could result in potential subsurface impacts at the Site:

- On-Site metal impacted fill resulting for landfilling on 7 Erskine Lane; and
- Metal and hydrocarbon impacted soils on 7 Erskine Lane resulting from historical welding, machine shops, boat building/repair, paint removal, landfilling and sandblasting.

Based on information reviewed in Section 3.6, it is Pinchin's understanding that the owner of 7 Erskine Lane intends to conduct independent remediation both on their property and on-Site in an effort to obtain a Certificate of Compliance (CoC) for both properties. It is proposed that remedial activities and closure soil sampling will be conducted prior to the redevelopment of each property. Pinchin notes that a CoC would be required prior to the redevelopment of the Site and would also improve environmental quality by reducing risks to human health and the environment. As such, Pinchin is not recommending a Phase II ESA at this time. However, progress towards obtaining a CoC for 7 Erskine and the affected portions of the Site should be monitored.

Given the year of construction of the Site Buildings (i.e., approximately 1940s), there is a potential for friable and non-friable asbestos-containing materials (ACMs) to be present in the Site Buildings. Pinchin did not conduct an asbestos survey as part of this Phase I ESA, nor was any destructive or intrusive sampling or inspection conducted as part of this Phase I ESA. The Site Representative advised Pinchin



that no asbestos surveys have been previously conducted at the Site, and that an Asbestos Management Program has not been developed for or implemented at the Site.

*This Executive Summary is subject to the same standard limitations as contained in the report and must be read in conjunction with the entire report.*



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## **1.0 INTRODUCTION**

### **1.1 Background**

Pinchin Ltd. (Pinchin) was retained on June 7, 2019 through an Authorization to Proceed, Limit of Liability and Terms of Engagement signed by Frank Limshue of WestUrban Developments Ltd. (Client) to conduct a Phase I Environmental Site Assessment (ESA) of the property located at 9 Erskine Lane, View Royal, British Columbia (hereafter referred to as the Site).

The Site is developed with a two-storey single-family residential dwelling (Site Building A), and a detached garage (Site Building B).

Pinchin was advised by the Client that the purpose of the Phase I ESA was to assess potential issues of environmental concern in relation to the potential acquisition and future redevelopment of the Site.

### **1.2 Scope of Work**

The Phase I ESA was completed in general accordance with the Canadian Standards Association (CSA) document entitled "*Phase I Environmental Site Assessment, CSA Standard Z768-01*" dated November 2001 (reaffirmed 2016) and the general requirements of the BC Contaminated Sites Regulation (CSR), including a review of readily available historical and regulatory records, a Site reconnaissance, interviews, an evaluation of information and reporting, all subject to the limitations outlined in Section 8.0 of this report.

Pinchin conducted a Site reconnaissance on June 12, 2019, and was accompanied by Ms. Joanne Adams, part owner of the Site since their family acquired the Site in 1963, and hereafter referred to as the Site Representative.

In addition, Pinchin reviewed the following documents as provided by the Client:

- Report entitled "*Draft PSI, DSI and Remediation Plan, 7 Erskine Lane, View Royal, BC*" prepared for 1132785 BC Ltd., prepared by Islander Engineering (Islander) and dated April 2018 (2018 Islander Draft PSI, DSI and Remediation Plan Report);
- Memo entitled "*Scenario 5 Release Request –Rezoning and Development Permit Application Approved Professional Opinion Letter for 7 Erskine Lane, View Royal, PID: 018-361-790*" prepared for the Ministry of Environment and Climate Change Strategy Land Remediation Section, prepared by TRI Environmental Consulting Inc. (TRI) and dated April 25, 2018 (2018 TRI Scenario 5 Release Request); and
- Report entitled "*Authorization Agreement, Proposed Remediation for 7 Erskine Lane, View Royal, BC*" between 1132785 BC Ltd. (Dustin Lamoureux), owner of 7 Erskine Lane



and Darlene Grigull, Executrix of the Site and dated May 29, 2018 (2018 Proposed Remediation Agreement).

## 2.0 SITE DESCRIPTION

### 2.1 Site Location and Physical Description

As indicated on Figure 1 (Key Map), the Site is located immediately east of the intersection of Erskine Lane and Watkiss Way, in View Royal, British Columbia. Pinchin notes that View Royal is a town in Greater Victoria. A right-of-way for a municipal water line transects the Site, separating it into a north and south portion. The Site is situated in an area that predominantly consists of commercial and residential land uses. Figure 2 illustrates the Site and surrounding area.

A summary of the physical description of the Site, including the Site Buildings, is provided below:

Topic	Details
Latitude and Longitude	48° 27' 54.27" North and 123° 26' 10.24" West.
Approximate Site Area	2.1 hectares (5.3 acres).
Buildings on-Site	Site Building A: Located on the south-central portion of the Site. Site Building B: Located on the south-central portion of the Site.
Approximate Year of Construction and Significant Additions or Renovations	1940s.
Number of Floors (Including ground level)	Site Building A: Two, in addition to one subsurface level. Site Building B: One.
Subsurface Levels	Site Building A: One. Site Building B: None observed and none reported by the Site Representative.
Approximate Footprint Areas of Buildings	Site Building A: 115 square metres (m <sup>2</sup> ) (1,215 square feet (ft <sup>2</sup> )). Site Building B: 20 m <sup>2</sup> (200 ft <sup>2</sup> ).
Approximate Total Areas of Buildings	Site Building A: 345 m <sup>2</sup> (3,645 ft <sup>2</sup> ). Site Building B: 20 m <sup>2</sup> (200 ft <sup>2</sup> ).
Heating / Cooling	Site Building A: Oil-fuelled forced air furnace. Site Building B: None observed and none reported by the Site Representative.





Topic	Details
Elevators	None observed and none reported by the Site Representative.
Emergency Generators	None observed and none reported by the Site Representative.
Landscaped / Grassed/Bare Ground Areas	The majoring of the Site is occupied by forested land.
Paved or Other Sealed Surface Materials	None observed.

## 2.2 Topographic, Geologic and Hydrogeological Setting

Topic	Findings
Topography of Site and Surrounding Area	The Site is generally at a higher elevation than the surrounding properties. There is a regional slope down to the south-southwest.
Site Grade Relative to the Adjoining Properties	The adjoining property to the north of the northern portion of the Site is approximately 2 meters (m) higher in elevation than the Site. The adjoining property to the north of the south portion of the Site is between approximately 1 m and 10 m lower in elevation than the Site. The adjoining property to the east of the Site is between approximately 0 m and 4 m higher in elevation than the Site, with a gradual slope downgradient beyond the adjacent property. The adjoining property to the south of the Site is between approximately 0 m and 10 m lower in elevation than the Site. The adjoining property to the west of the Site is between approximately 0 m and 5 m lower in elevation than the Site.
Subsurface Soils	Based on the findings of the 2018 Islander Draft PSI, DSI and Remediation Plan Report, the subsurface generally consists of sandy gravel with crushed rock, sandy silt, silty sand and clay.
Fill Materials	Based on information reviewed in Section 3.6, landfilling has been identified at 7 Erskine Lane (adjacent property to the east). Metal impacted fill has also been identified to be encroaching onto the Site by approximately 5 to 6 m. Refer to Section 3.6 for further discussion on fill materials.
Bedrock Type	Westcoast Crystalline Complex; quartz diorite, tonalite, hornblende-plagioclase gneiss, quartz-feldspar gneiss, amphibolite, diorite, agmatite, gabbro, marble and metasediments (iMap BC).
Inferred Bedrock Depth	During the Site reconnaissance Pinchin observed bedrock outcrops to the north and east of the Site.



<b>Topic</b>	<b>Findings</b>
Inferred Groundwater Depth	Based on the findings of the 2018 Islander Draft PSI, DSI and Remediation Plan Report groundwater is located between 5 meters below ground surface (mbgs) and 6 mbgs.
Nearest Open Water Body	Craigflower Creek is located approximately 130 m southwest of the Site.
Inferred Groundwater Flow Direction	South-southwest based on topography and the nearest body of water.

### **2.3 Site Operations**

Site Building A is a two-storey single-family dwelling with a basement. Site Building B is a detached garage and is located adjacent to the west of Site Building A. A pool and pump house are located to the south of the Site Buildings. A diesel aboveground storage tank (AST) and a propane AST are located on the exterior of Site Building A. A municipal water line divides the Site into north and south portions. The remainder of the Site is treed land.

Further details regarding on-Site operations are provided in Section 5.0.

## **3.0 HISTORICAL RECORDS REVIEW**

### **3.1 Site Interviews and Records**

The Site Representative advised Pinchin of the following with respect to the historical occupancy and operations at the Site:

- The Site Buildings were constructed in approximately 1940 with minor interior renovations in subsequent years;
- Occupants of the Site Buildings have always been residents;
- No dry cleaning operations have historically taken place at the Site;
- No retail fuel outlets (RFOs) have operated at the Site; and
- The adjacent property to the east (7 Erskine Lane) has submitted a Notification about Likely or Actual Substance Migration pertaining to landfilling which has encroached onto the Site. Refer to Section 3.6 for further discussion on the environmental impacts resulting from on-property activities at 7 Erskine Lane.

Pinchin also interviewed Mr. Josh Bartley from Islander Engineering Ltd. Mr. Bartley is the lead engineer overseeing the environmental investigations both at 7 Erskine Lane as well as on-Site.



### 3.2 Aerial Photographs and Satellite Imagery

Copies of aerial photographs dated 1932, 1946, 1949, 1956, 1964, 1968, 1974, 1979, 1986, 1992, 1997 and 2005 were obtained from the UBC Geographic Information Centre (GIC) in Vancouver, BC and reviewed by Pinchin. In addition, Pinchin reviewed Google Earth™ satellite imagery dated 2010, 2015 and 2018.

A summary of information inferred with respect to the Site is provided in the following table:

Year of Photograph	Site
1932	The Site appears to be occupied by undeveloped forested land.
1946 to 1968	The Site appears to be occupied by a building similar in size and configuration to the current Site Building A as well as forested land.
1974	Similar to 1968; however, the Site appears to be separated into north and south portions by the present-day municipal water line. Site Building A is constructed on the south portion of the Site.
1979 to 2018	Similar to 1974. A building similar in size and configuration to the current the Site Building B appears to have been constructed. A pool also appears to be located to the south of the Site Buildings.

A summary of information inferred with respect to the surrounding area is provided in the following table:

Year of Photograph	North	East	South	West
1932 to 1946	Undeveloped forested and agricultural land.	Undeveloped forested and agricultural land.	Erskine Lane followed by undeveloped forested and agricultural land.	Undeveloped forested and agricultural land.
1949 to 1968	Similar to 1946.	An agricultural property followed by single-family residential dwellings and Highway 1.	Erskine Lane followed by few single-family residential dwellings and undeveloped land.	Similar to 1946.



<b>Year of Photograph</b>	<b>North</b>	<b>East</b>	<b>South</b>	<b>West</b>
1974	Similar to 1968.	A commercial property with an exterior storage yard used for boats and vehicles. This is followed by single-family residential dwellings and Highway 1.	Similar to 1968.	Similar to 1968.
1979	Undeveloped forested land followed by a property which appears to be under development.	Similar to 1974.	Similar to 1974.	Similar to 1974.
1986	Undeveloped forested followed by a portion of Hospital Way. This is followed by an inferred hospital.	Similar to 1979.	Similar to 1979.	Similar to 1979.
1992	Undeveloped forested and gravelled land followed by a portion of Hospital Way. This is followed by an inferred hospital.	Similar to 1986.	Similar to 1986.	Similar to 1986.
1997	Similar to 1992; however, Hospital Way has been fully constructed.	Similar to 1992.	Similar to 1992 with the construction of additional single-family residential dwellings.	Watkiss Way followed by agricultural and undeveloped land.



Year of Photograph	North	East	South	West
2005 to 2015	Similar to 1997.	Similar to 1997.	Similar to 1997.	Watkiss Way followed by single-family residential dwellings and undeveloped land.
2018	Similar to 2015.	Similar to 2015.	Similar to 2015.	Similar to 2015; however, the majority of the previously observed undeveloped land appears to be occupied by agricultural land.

Based on information reviewed in Sections 3.4 and 3.6, Jenkins Marine Ltd. (boat repair/servicing facility), has operated to the east of the Site since the 1970s (also identified as 7 Erskine Lane). Pinchin has identified that the commercial property with an exterior storage yard used for boats and vehicles to be Jenkins Marine Ltd. This property appeared to be occupied by Jenkins Marine Ltd. in the 1974 to 2018 aerials photographs. Refer to Section 3.6 for further discussion on the environmental impacts resulting from on-property activities at 7 Erskine Lane.

### 3.3 Fire Insurance Plans

The Catalogue of Canadian Fire Insurance Plans 1875-1975 does not list the Site or surrounding area. Therefore, no Fire Insurance Plans (FIPs) could be obtained for review.

### 3.4 City Directories

City directories for the years 1940 to 1999 were reviewed by Pinchin at the Vancouver Public Library, in Vancouver, British Columbia. It should be noted that no city directories were available for the City of Victoria subsequent to 1999. A summary of information obtained with respect to the Site is provided in the following table:

Year(s)	Occupant Listings for Site Address
1940 to 1960	Not listed
1970 to 1999	Residential



In general, the city directories indicated that the surrounding area has historically consisted of commercial and residential land uses since 1940. No historical dry cleaning operations, RFOs or other operations of potential environmental concern were identified, with the exception of the following:

- Jenkins Marine Ltd. (boat repair/servicing facility) and Don's Boat Transport, were listed at 5 Erskine Lane from 1975 until 1999. Pinchin notes that 5 Erskine Lane is located approximately 60 m southeast of the Site and is situated hydraulically down to transgradient of the Site relative to the inferred groundwater flow direction. Based on information reviewed in Section 3.6, Pinchin notes that 5 Erskine Lane and 7 Erskine Lane may have historically comprised a larger property. Refer to Section 3.6 for further discussion on the environmental impacts resulting from on-property activities at 7 Erskine Lane.

### **3.5 Land Titles**

A copy of the current land title was obtained by Pinchin from BC Online. Based on information obtained from BC Online, the Site is described as "Lot B, Section 93, Esquimalt District Plan 26648, Except Part in Plan VIP62088". The land title indicated that "Beverley Adams" was listed as the registered owner of the Site at the time of this assessment. No liens or other encumbrances indicating potential environmental concern were noted within the current title.

A copy of the current land title is included in Appendix I.

### **3.6 Previous Environmental Reports**

#### 2018 Islander Draft PSI, DSI and Remediation Plan Report

Islander conducted a series of investigations at 7 Erskine Lane in order to supplement previous investigations in the overall effort to obtain a Certificate of Compliance (CoC) for the property. According to the report, Areas of Potential Environmental Concern (APECs) were identified at the property resulting from previous on-property activities under the ownership of Jenkins Marine. The APECs included:

- Welding or machine shops;
- Dry docks, ship building or boat repair and maintenance, including pain removal from hulls;
- Construction demolition material, including without limitation asphalt and concrete landfilling; and
- Sand blasting waste disposal.



Pinchin notes that the main on-property building, located approximately 10 m east of the Site, contains a repair shop, fabrication bay and storage bay. The landfilling was identified throughout the property and adjacent to the east of the southern portion of the Site. The landfilling was also identified to be encroaching onto the Site by approximately 5 to 6 m.

It was reported that the proposed future redevelopment plans for the property included a multi-tenant residential complex with a single level of underground parking. As such, High Density Residential land use standards, which include intake of contaminated soil, groundwater used for drinking water, toxicity to soil invertebrates and plants and groundwater used for freshwater and marine aquatic life, were considered applicable to the property. Pinchin notes that the future redevelopment plans for the Site are similar to that of 7 Erskine Lane. Therefore, these standards are also considered applicable to the Site.

Test pitting and drilling were conducted on the property between April and August 2017. Three boreholes were installed on the property (IEL-BH131-MW, IEL-BH130-MW and IEL-BH127- MW), one of which was installed near the eastern Site boundary (IEL-BH130-MW), in the location of the identified fill. Several test pits were also dug along the eastern Site boundary as well as on-Site. Submitted soil samples were analyzed for light and heavy extractable petroleum hydrocarbons (LEPH and HEPH), polycyclic aromatic hydrocarbons (PAH), volatile petroleum hydrocarbons (VPH), volatile organic compounds (VOCs), metals and leachate quality (TCLP). Select metals, LEPH, HEPH and benzene concentrations were reported above the applicable CSR standards on the property. A metal exceedance was reported within the Site boundaries. In addition, several soil samples exceeded CSR Protocol 11 Upper Cap Concentrations for Human Health and Ecological Health, including locations adjacent to the Site boundary. No exceedances of the Hazardous Waste Regulation (HWR) Schedule 4 Table 1 standards for leachate quality were reported

Submitted groundwater samples were analyzed for LEPH, HEPH, PAH, VPH, VOCs, dissolved metals and glycols. Concentrations in groundwater met the applicable CSR standards. It was reported that the groundwater wells were dry in the summer months and two of the three wells had groundwater present in the winter months. Given that the property has a moderate steep slope to the south-southwest, it was inferred that groundwater flow is in a similar direction.

No direct soil vapour sampling was completed; however, soil vapour concentrations were estimated using detectable parameters in soil. No parameters for groundwater were detectable, however soil vapour concentrations were estimated using detection limits for those parameters detected in soils. Estimates were made using recommended partitioning equations, as described in Exhibit 2 of Health Canada's Federal Contaminated Risk Assessment in Canada: Guidance for Soil Vapour Intrusion Assessment at Contaminated Sites. Estimated soil vapour concentrations meet applicable standards for the property without the application of any attenuating factors.



Following the investigations, contaminated soils were identified in the following two areas:

- Placed Fill Soils (approximately 1500m<sup>3</sup>): along the south slope and along the toe of the slope of the property near the south and west sides and extending west onto the Site; and
- Surficial Soils (approximately 750m<sup>3</sup>): primarily near the historical boat fabrication areas. The main contamination in this area is metals with one location indicating a shallow hydrocarbon impact. In the northeast portion of the property, the surficial contamination is bounded vertically by shallow bedrock.

It was reported that contaminated soils would be removed from the property during redevelopment, which was projected to begin in the summer of 2018.

#### 2018 TRI Scenario 5 Release Request

TRI completed a Scenario 5 Release Request as part of a rezoning and development permit application for 7 Erskine Lane. TRI reviewed the historical investigations completed at the property and concluded that the extent of contamination in the fill areas have been estimated from the placement of the fill which can be visually distinguished by elevation and stratigraphy.

As it pertains specifically to the Site, TRI reported that soil contamination extends onto the Site and is associated with the metal impacted fill soil. The extent of the fill soil is visible by depth, colour and texture and it appears visually to only exceed the western property line by approximately 6 m. Only metal contamination was identified in samples collected from soils along the property's western property boundary. TRI reported that there remains a need for horizontal and vertical delineation through soil analyses on-Site. Ten soil samples reported metal concentrations of one or more of arsenic, copper, lead or zinc above either or both of the Human Health or Ecological Upper Cap Concentrations listed in Protocol 11. Six of the samples are present at less than one meter below grade and four at depths greater than one meter below grade. Two of the samples are located on the western property line between the property the Site; however, these samples are located at depths greater than one meter below grade.

TRI reported that hydrocarbon impacts associated with the fill layers have been horizontally and vertically delineated and are present within the property boundaries. However, it was reported that there is incomplete analytical delineation of one petroleum hydrocarbon sample exceeding the standards in the surficial soils located west of the main fabrication building, both horizontally to the west and vertically. TRI reported that there are plans to finalize the delineation during proposed the excavation and disposal of the impacted soils.





TRI reported that there is a commitment from the property owner to pursue independent remediation and to procure a CoC for their property as well as the Site.

#### 2018 Proposed Remediation Agreement

The Proposed Remediation Agreement between Dustin Lamoureux of 1132785 BC Ltd. (owner of 7 Erskine Lane) and Darlene Grigull (Executrix of the Site) was established as part of the proposed re-development of 7 Erskine Lane. According to the agreement, former on-property activities at 7 Erskine Lane have included boat maintenance and repair as well as landfilling with soils of unknown origin. These activities have resulted in on-property subsurface contamination as well as subsurface contamination at the shared Site boundary (approximately 6 m into the Site from the shared boundary). It is proposed that as part of the re-development process, subsurface contamination at the property and Site will be remediated. The proposed scope of work for this remediation will include 5 m from the Site boundary into the Site and will include:

- Sediment and erosion control measures;
- Grubbing and shrubbery removal as needed;
- Excavation and removal of approximately 100 m<sup>3</sup> of contamination soil;
- Collection of surficial soil samples following the excavation to confirm sufficient contaminated soil removal; and
- Placement of clean fill soils in the excavation.

The agreement also includes a Notice of Likely or Actual Migration dated April 2018 between the source property and the Site. The notice reports the presence of benzene, arsenic, antimony, cadmium, copper, molybdenum, lead and zinc in fill materials encroaching onto the Site.

Based on a review of the above-noted reports, Pinchin notes that following:

- Metal impacted fill soil has been identified on-Site. The extent of the fill soil is visible by depth, colour and texture and it appears visually to only encroach onto the Site by approximately 6 m. However, the vertical and horizontal extent of the metal impacted fill has not been fully delineated;
- Metal and hydrocarbon contamination in soil have been identified on the property located adjacent to the east of the Site. While full delineation has not been achieved on the property, hydrocarbon impacted soil has been reportedly delineated within the property boundaries. Groundwater and soil vapour impacts have not been identified;
- Ten soil samples reported metal concentrations of one or more of arsenic, copper, lead or zinc above either or both of the Human Health or Ecological Upper Cap



Concentrations listed in Protocol 11. Six of the samples are present at less than one meter below grade and four at depths greater than one meter below grade. Two of the samples are located on the western property line between the property the Site; however, these samples are located at depths greater than one meter below grade; and

- No exceedances of the HWR Schedule 4 Table 1 standards for leachate quality were reported.

Based on the information reviewed above, as well as Pinchin's telephone correspondence with Islander, there is an agreement with the owner of 7 Erskine Lane to pursue independent remediation and to obtain a CoC for their property as well as the Site. Remedial activities on-Site will include excavation and closure soil sampling in order to confirm remediation has been achieved.

Pinchin notes that a CoC would be required for the future redevelopment of the Site and would certify that the Site has been satisfactorily remediated to meet the applicable standards set by the Environmental Management Act and CSR. A CoC for the Site and 7 Erskine Lane would also improve environmental quality by reducing risks to human health and the environment.

### **3.7 Historical Summary**

Based on the results of the historical review, the following could result in potential subsurface impacts at the Site:

- Jenkins Marine Ltd., located at 7 Erskine Lane, which has operated adjacent to the east of the Site since the 1970s and has resulted in subsurface impacts in soil, both on-property and at the Site.

## **4.0 REGULATORY INFORMATION AND CORRESPONDENCE**

### **4.1 Site Regulatory Information**

The Client provided Pinchin with a copy of the following regulatory information:

- A Notice of Likely or Actual Substance Migration from a Neighbouring Property dated April 2018 was submitted for off-site migration from 7 Erskine Lane (source property) and the Site. The notice identifies the presence of benzene, arsenic, antimony, cadmium, copper, molybdenum, lead and zinc in fill materials encroaching onto the Site.

### **4.2 Local and Municipal Government**

The Town of View Royal Fire Department was contacted to request copies of any records pertaining to the installation or removal of storage tanks. The Town indicated that it does not maintain records related to storage tanks.



#### **4.3 British Columbia Ministry of Environment and Climate Change Strategy Water Resource Atlas**

A search of existing wells in the area on the British Columbia Ministry of Environment and Climate Change Strategy (MOECCS) Water Resource Atlas well database indicated that there were six wells located within a 500 m radius of the Site; four of unknown use and two of private domestic use. The nearest well is located approximately 90 m south of the Site. The search results are located in Appendix II.

#### **4.4 ERIS and British Columbia Ministry of Environment and Climate Change Strategy Site Registry**

Pinchin submitted a request to Environmental Risk Information Service Ltd. (ERIS) for a review of the following databases, as they pertain to the Site and surrounding properties:

- *“Authorization Management System (formerly WASTE)”;*
- *“Compliance and Enforcement Summary”;*
- *“Contaminated Sites on Federal Land”;*
- *“Inventory of PCB Storage Sites”;*
- *“Scott’s Manufacturing Directory”;*
- *“National Pollutant Release Inventory”;*
- *“Waste Receivers Summary”;*
- *“Receivers - Special Waste Information System (SWIS)”;*
- *“Waste Generators Summary”;*
- *“Generators - Special Waste Information System (SWIS)”;*
- *“Waste Disposal Site Inventory”;*
- *“National Environmental Emergencies System (NEES)”;*
- *“Hazardous Waste Facilities”;*
- *“BC Oil and Gas Commission Incidents”;*
- *“Surrey Tank Construction Permits”;*
- *“Site Registry”;* and
- *“Retail Fuel Storage Tanks”.*

A copy of the ERIS report is provided in Appendix III. Based on a review of the information obtained from the above-noted sources, Pinchin notes the following:

- The Site was listed in the Site Registry (ID 21587). According to the detailed report, a Notice of Likely or Actual Substance Migration from a Neighbouring Property dated April 2018 was submitted for off-site migration from 7 Erskine Lane (ID 21586) (the source property to the east) and the Site. The Site is identified as a non-high risk. Refer to Section 3.6 for further discussion on the environmental impacts resulting from on-property activities at 7 Erskine Lane;
- 7 Erskine Lane is listed in the Site Registry (ID 21586). According to the detailed report, a Notice of Independent Remediation Initiation and a Notice of Likely or Actual Substance Migration from a Neighbouring Property were submitted to the MOECCS in May 2018. The affected parcel is the Site (ID 21587). The property was identified as high risk. The property was issued a freeze release under Scenario 5 in July 2018. The MOECCS noted that remediation on the property was to be completed within five years of the issuance of the freeze release. Refer to Section 3.6 for further discussion on the environmental impacts resulting from on-property activities at 7 Erskine Lane;
- Jenkins Marine Ltd., located at 5 Erskine Lane, is listed in Scott's Manufacturing Directory for boat building. This business is also listed in the unplotable summary for the generation of used waste oil absorbent products. Pinchin notes that 5 Erskine Lane is located approximately 60 m southeast of the Site and is situated hydraulically down to transgradient of the Site relative to the inferred groundwater flow direction. Based on information reviewed in Section 3.6, Pinchin notes that 5 Erskine Lane and 7 Erskine Lane may have historically comprised a larger property. Refer to Section 3.6 for further discussion on the environmental impacts resulting from on-property activities at 7 Erskine Lane; and
- The remaining properties, including those listed in the unplotable summary, are located more than 100 m from the Site. Based on distance, these properties did not warrant further discussion.

#### **4.5 Regulatory Information Summary**

Based on Pinchin's review of the regulatory information reviewed, the following could result in potential subsurface impacts at the Site:

- Jenkins Marine Ltd., located at 7 Erskine Lane, which has operated adjacent to the east of the Site since the 1970s and has resulted in subsurface impacts in soil, both on-property and at the Site.



## 5.0 SITE RECONNAISSANCE

Pinchin (see Appendix IV for assessor qualifications) conducted a Site reconnaissance on June 12, 2019, and was accompanied by the Site Representative. The Site reconnaissance included a walk-through of accessible areas of the interior of the Site Buildings and exterior areas. At the time of the Site reconnaissance, the ground surface was dry, and the weather was clear. The Site reconnaissance was documented with notes and photographs. The results of the Site reconnaissance are discussed below. Photographs of some of the features noted during the Site reconnaissance are attached in Appendix V.

### 5.1 Hazardous Materials

Topic	Findings
Chemicals	Chemicals typically used for general purpose cleaning, body aesthetics and building maintenance (e.g., window cleaners, hair dye, bleach, paints, deodorizers, etc.) were noted on-Site at the time of the Site reconnaissance. Chemicals observed on-Site were stored within manufacturer-supplied containers in various locations throughout Site Building A.  Pool chemicals are stored in the pump house.  Diesel stored in a steel AST is located adjacent to Site Building A.
Compressed Gases	Propane (500-pound (lb) tank), used to fuel the on-Site dryer, is located adjacent to Site Building A. 20-lb cylinders of propane are stored in Site Building B. Based on the nature of propane gas, it is Pinchin's opinion that the storage of this compressed gas is unlikely to result in potential subsurface impacts at the Site.
Hazardous Waste	None observed and none reported by the Site Representative.

No spills or evidence of historical spills (i.e., staining) were observed in the chemical storage areas noted above. The interior floor slabs were observed to be in good condition (i.e., no cracking or pitting) and the exterior ground surface in the vicinity of the diesel AST (a concrete slab surrounded by bare ground), was also in good condition. No floor drains or catch basins were present in the vicinity of the chemical storage areas.

### 5.2 Storage Tanks

#### 5.2.1 Aboveground Storage Tanks

The following ASTs were observed on-Site:



Size	Construction Material	Single or Double Wall	Age	Product Stored	Location
250 litres	Steel	Single	Unknown	Diesel	Adjacent to Site Building A.
500 lbs	Steel	Single	Unknown	Propane	Adjacent to Site Building A.

Based on the nature of propane gas, it is Pinchin’s opinion that the storage of this compressed gas is unlikely to result in potential subsurface impacts at the Site.

No spills or evidence of historical spills (i.e., staining) were observed in the vicinity of the diesel AST. The ground surface in the vicinity of the diesel AST (a concrete slab surrounded by bare ground), was also in good condition. No floor drains or catch basins were present in the vicinity of the diesel AST. Based on this, it is Pinchin’s opinion that the diesel AST is unlikely to result in potential subsurface impacts at the Site.

### 5.2.2 *Underground Storage Tanks*

No evidence of underground storage tanks (USTs) (i.e., fill/vent pipes) was observed on-Site, and none were reported by the Site Representative. However, Pinchin notes that the Site Representative has not been associated with the Site since its development. Although USTs are commonly associated with buildings of this age (i.e., approximately 1940s), Pinchin was unable to confirm or refute the presence of former on-Site USTs. No evidence of former USTs was observed by Pinchin.

### 5.3 **Water and Wastewater**

Topic	Findings
Water Supply Source	Capital Regional District. Water is obtained by the CRD from the Sooke watershed. Groundwater is not used as a source of potable water.
Water Use	Water is primarily used for domestic-related activities.
Sanitary/Process Wastewater Receptor	A septic tank and associated septic bed are located on-Site; however, at the time of the Site reconnaissance, the Site Representative could not confirm the location. The Site Representative advised Pinchin that the septic system is strictly utilized for sanitary effluent. It was reported that the septic system is cleaned every five years by Coast VI.
Pits, Sumps or Lagoons	None observed and none reported by the Site Representative.



<b>Topic</b>	<b>Findings</b>
Grease Traps	A grease trap is associated with the septic tank in order to filter grease from kitchen drains prior to entering the septic tank.
Oil/Water Separators	None observed and none reported by the Site Representative.
Storm Water Flow and Receptor	Storm water would likely run overland to percolate naturally through the soil.
Wells	None observed and none reported by the Site Representative.
Watercourses, Ditches or Standing Water	None observed and none reported by the Site Representative.

#### **5.4 Hydraulic Equipment**

No evidence of hydraulic equipment (i.e., hydraulic hoists, elevators, compactors, dock levels, etc.) was identified at the Site during the Site reconnaissance.

#### **5.5 Polychlorinated Biphenyls**

The use of polychlorinated biphenyls (PCBs) as dielectric fluids in electrical equipment such as transformers, fluorescent lamp ballasts, and capacitors was common up to about 1980. The Federal PCB Regulations, SOR/2008-273, regulate the manufacture, import, export, sale, use and processing of PCBs. In addition, these regulations aim to eliminate the use of high level PCBs (greater than 500 milligrams per kilogram (mg/kg)), as well as low level PCBs (50-500 mg/kg) on or within 100 m of a “Sensitive Site” (e.g., drinking water treatment facility, feed/food processing plant, child care facility, schools, hospitals, etc.), by December 31, 2009. Light ballasts, pole top transformers, and other electrical equipment with low level PCBs (50-500 mg/kg) in non-sensitive sites are aimed to be eliminated by December 31, 2025.

Given the year of construction of the Site Buildings (i.e., approximately 1940s), there is a potential that the electrical equipment observed on-Site may contain PCBs. No transformers were observed on-Site. No hydraulic equipment was observed on-Site.

Typical buildings of this age may contain PCBs in paint, caulking and window putties. Testing for the presence of PCBs in these materials is beyond the scope of this Phase I ESA. The potential presence of PCBs in these materials could result in future costs if extensive renovation requiring removal of these materials or demolition activities are undertaken at the Site. The extent of such potential issues could not be assessed as part of this Phase I ESA.



## **5.6 Asbestos-Containing Materials**

Asbestos-containing materials (ACMs) are commonly found in building construction materials (particularly in older buildings constructed prior to 1985). Friable asbestos (friable is defined as a material that can be crumbled, powdered or pulverized by hand pressure) was widely used in sprayed fireproofing until 1973, and in decorative or finishing plasters, and thermal systems insulation until the early 1980s. Non-friable or manufactured asbestos products were widely used in building construction including in vinyl floor tiles, sheet flooring, ceiling tiles, pipe gaskets, roofing materials, asbestos cement boards, and numerous other products until the mid-1980s. A very limited number of non-friable asbestos products in limited quantities are still in use currently in building construction.

Given the year of construction of the Site Buildings (i.e., approximately 1940s), there is a potential for friable and non-friable ACMs to be present in the Site Buildings. Pinchin did not conduct an asbestos survey as part of this Phase I ESA, nor was any destructive or intrusive sampling or inspection conducted as part of this Phase I ESA. The Site Representative advised Pinchin that no asbestos surveys have been previously conducted at the Site, and that an Asbestos Management Program (AMP) has not been developed for or implemented at the Site.

The potential presence of ACMs could result in management issues and future costs if renovation or demolition activities are undertaken at the Site. The extent of such potential issues could not be assessed as part of this Phase I ESA.

## **5.7 Lead-Containing Paints**

Lead was commonly used as an additive in paints with no restricted level up until the mid-1970s. This included architectural paints used on interior and exterior surfaces, primers and coatings for anti-corrosive purposes, consumer paints, and paint on furniture and other household items. Beginning in 1976, the federal government limited the amount of lead in consumer paints to 5,000 parts per million (ppm) and steadily reduced the lead content, primarily in the interest of public safety. In 2005, the limit was reduced to 600 ppm and in 2010, the limit was further reduced to 90 ppm, however, there is no restriction on lead in paints used for anti-corrosion purposes (e.g., steel primers and exterior coatings) and road and line markings. In June 2016, these exemptions were removed and as of this date, any paint sold should not contain more than 90 ppm, even if sold for anti-corrosion purposes.

Pinchin did not conduct an assessment of lead in painted surfaces as part of this Phase I ESA, and the Site Representative advised Pinchin that no surveys have been previously conducted at the Site. Prior to any demolition or renovation activities, a designated substance survey (including lead) would be required. During Pinchin's Site reconnaissance, painted surfaces (where observed) were in good condition (i.e., no peeling or flaking).





## **5.8 Ozone-Depleting Substances**

The bulk storage of ozone-depleting substances (ODSs) was not observed. The Site Representative reported that the bulk storage of ODSs has not been carried out at the Site.

Residential refrigeration units were observed on-Site. These units may include refrigerants, such as R22 or R12, that are noted within the phase-out schedules for elimination in both Provincial and Federal regulations. No other sources of ODSs were observed at the time of the Site reconnaissance.

## **5.9 Radon**

Radon is a radioactive gas formed by naturally occurring radioactive breakdown of uranium in soil, rocks and even groundwater. Radon is invisible and odourless and, as such, cannot be detected by humans. Furthermore, radon escapes from the ground and mixes with outdoor air forming concentrations that are too low to be of concern; however, if radon enters a building the concentrations can increase to higher levels. Health Canada has developed guidelines for acceptable levels of radon in dwellings and public buildings and has indicated that radon levels should not exceed 200 Becquerel per cubic metre (Bq/m<sup>3</sup>); however, there are currently no regulations governing acceptable levels of radon within buildings, and no requirements for testing or mitigation if levels are found to exceed the current Health Canada guidelines. Testing for radon in the Site Buildings was beyond the scope of this Phase I ESA. The Site Representative reported that no radon surveys have been carried out at the Site.

## **5.10 Mould or Microbial Contamination**

The presence of mould or other microbiological contamination in buildings has become a concern to building tenants and owners due to potential health effects on occupants and users. Provincial Ministries of Labour have recently issued guidelines on enforced regulations to protect the health of construction workers who are exposed to mould in the course of building renovation. The presence of water leaks or high humidity can cause the growth or amplification of mould within building environments.

A comprehensive inspection for mould, which would require intrusive testing, was not performed as part of this Phase I ESA. Visible mould or water-damaged areas were not observed at the time of the Site reconnaissance. The Site Representative was not aware of the presence of mould in the Site Buildings. In addition, the Site Representative was not aware of any historical leaks in the Site Buildings or past flooding events.



### 5.11 Air Emissions

Topic	Findings
Washroom Vents	Washroom vent exhausts are discharged through roof stacks.
Kitchen Vents	Kitchen exhausts are discharged through roof stacks.
Heating/Cooling	Site Building A: Oil-fuelled forced air furnace. Site Building B: None observed and none reported by the Site Representative.
Emergency Generators	None observed and none reported by the Site Representative.
Process Vents	None observed and none reported by the Site Representative.
Odours	No strong, pungent or noxious odours were identified.
Permits / Approvals	The Site Representative advised Pinchin that Site Owner (Beverley Adams), does not hold any permits/approvals for the Site, as related to air emissions or discharges.

### 5.12 Staining and Stressed Vegetation

No evidence of historical chemical discharges or releases (i.e., staining or stressed vegetation) was observed during the Site reconnaissance. The Site Representative reported that no known historical chemical spills have occurred on-Site.

### 5.13 Non-Hazardous Wastes

Topic	Findings
Non-hazardous Wastes	Domestic refuse is deposited in plastic bins. The domestic refuse is removed for off-Site disposal weekly by the Town of View Royal.
Recyclables	Recyclables (i.e., cans, bottles, newsprint, plastics, and cardboard) are stored in plastic totes and are removed to an off-Site recycling facility bi-weekly by the Town of View Royal.

## 6.0 ACTIVITIES ON ADJACENT PROPERTIES

The Site is located in an urban area that predominantly consists of residential and commercial land use. A description of the adjacent properties is summarized in the following table, based on Pinchin's observations from the Site and publicly accessible locations:



	<b>North</b>	<b>East</b>	<b>South</b>	<b>West</b>
Operation or Activity	Undeveloped forested and gravelled land (a quarry). This is followed by Hospital Way and a hospital.	Jenkins Marine followed by single-family residential dwellings and Highway 1.	Erskine Lane followed by single-family residential dwellings.	Watkiss Way followed by single-family residential dwellings and agricultural land.
Direction with Respect to Inferred Groundwater Flow	Upgradient.	Down to transgradient.	Downgradient.	Down to transgradient.
Visible Emissions	None observed.	None observed.	None observed.	None observed.
Visible Outdoor Storage of Hazardous Materials	None observed.	Steel drums were observed adjacent to the Site boundary.	None observed.	None observed.

Based on Pinchin’s observations of the adjacent properties at the time of the Site reconnaissance, the following could result in potential subsurface impacts at the Site:

- Jenkins Marine Ltd., located at 7 Erskine Lane, which has operated adjacent to the east of the Site since the 1970s and has resulted in subsurface impacts in soil, both on-property and at the Site.

## 7.0 FINDINGS AND RECOMMENDATIONS

Based on the results of the Phase I ESA completed by Pinchin, the following could result in potential subsurface impacts at the Site:

- On-Site metal impacted fill resulting for landfilling on 7 Erskine Lane; and
- Metal and hydrocarbon impacted soils on 7 Erskine Lane resulting from historical welding, machine shops, boat building/repair, paint removal, landfilling and sandblasting.

Based on information reviewed in Section 3.6, it is Pinchin’s understanding that the owner of 7 Erskine Lane intends to conduct independent remediation both on their property and on-Site in an effort to obtain a Certificate of Compliance (CoC) for both properties. It is proposed that remedial activities and closure soil sampling will be conducted prior to the redevelopment of each property. Pinchin notes that a CoC would be required prior to the redevelopment of the Site and would also improve environmental quality by reducing risks to human health and the environment. As such, Pinchin is not recommending a Phase II



ESA at this time. However, progress towards obtaining a CoC for 7 Erskine and the affected portions of the Site should be monitored.

Given the year of construction of the Site Buildings (i.e., approximately 1940s), there is a potential for friable and non-friable ACMs to be present in the Site Buildings. Pinchin did not conduct an asbestos survey as part of this Phase I ESA, nor was any destructive or intrusive sampling or inspection conducted as part of this Phase I ESA. The Site Representative advised Pinchin that no asbestos surveys have been previously conducted at the Site, and that an AMP has not been developed for or implemented at the Site.

## **8.0 TERMS AND LIMITATIONS**

This Phase I ESA was performed in order to identify potential issues of environmental concern associated with the Site located at 9 Erskine Lane, View Royal, British Columbia, at the time of the Site reconnaissance. This Phase I ESA was performed in general compliance with currently acceptable practices for environmental site investigations, and specific Client requests, as applicable to this Site.

This report was prepared for the exclusive use of WestUrban Developments Ltd. (Client), subject to the terms, conditions and limitations contained within the duly authorized proposal for this project. Any use which a third party makes of this report, or any reliance on or decisions to be made based on it, is the sole responsibility of such third parties. Pinchin accepts no responsibility for damages suffered by any third party as a result of decisions made or actions conducted.

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The information provided in this report is based upon analysis of available documents, records and drawings, and personal interviews. In evaluating the Site, Pinchin has relied in good faith on information provided by other individuals noted in this report. Pinchin has assumed that the information provided is factual and accurate. In addition, the findings in this report are based, to a large degree, upon information provided by the current owner/occupant. Pinchin accepts no responsibility for any deficiency, misstatement or inaccuracy contained in this report as a result of omissions, misinterpretations or fraudulent acts of persons interviewed or contacted, or contained in reports that were reviewed. The scope of work for this Phase I ESA did not include an intrusive investigation for designated substances (i.e., asbestos, mould, etc.) and, therefore, these materials may be present in concealed areas.



Pinchin makes no other representations whatsoever, including those concerning the legal significance of its findings, or as to other legal matters touched on in this report, including, but not limited to, ownership of any property, or the application of any law to the facts set forth herein. With respect to regulatory compliance issues, regulatory statutes are subject to interpretation and these interpretations may change over time.

The CSA document entitled "*Phase I Environmental Site Assessment, CSA Standard Z768-01*" dated November 2001 (reaffirmed 2016), does not apply to environmental auditing or environmental management systems. Therefore, with respect to Site operations and conditions, compliance with applicable Federal, Provincial or Municipal acts, regulations, laws and/or statutes was not evaluated as part of the Phase I ESA.

## 9.0 REFERENCES

1. BC Centre for Disease control website radon contamination:  
<http://www.bccdc.ca/healthenv/Contaminants/Radon/default.htm>
2. Health Canada. "*Cross-Canada Survey of Radon Concentrations in Homes – Final Report*", dated March 2012.
3. BC Online Site Registry.
4. British Columbia Ministry of the Environment On-Line Water Resource Atlas.
5. Canadian Standards Association (CSA) Standard. CSA Z768-01, Phase I Environmental Site Assessment, Canadian Standards Association International, November 2001, reaffirmed 2012.
6. City of Capital Regional District Online GIS.
7. ERIS report entitled "9 Erskine Lane, View Royal, British Columbia", and dated June 12, 2019 (ERIS Project # 20190607238).
8. Google™ Earth.
9. Report entitled "*Draft PSI, DSI and Remediation Plan, 7 Erskine Lane, View Royal, BC*" prepared for 1132785 BC Ltd., prepared by Islander and dated April 2018.
10. Memo entitled "*Scenario 5 Release Request –Rezoning and Development Permit Application Approved Professional Opinion Letter for 7 Erskine Lane, View Royal, PID: 018-361-790*" prepared for the Ministry of Environment and Climate Change Strategy Land Remediation Section, prepared by TRI and dated April 25, 2018.
11. Report entitled "*Authorization Agreement, Proposed Remediation for 7 Erskine Lane, View Royal, BC*" between 1132785 BC Ltd. (Dustin Lamoureux), owner of 7 Erskine Lane and Darlene Grigull, Executrix of the Site and dated May 29, 2018.

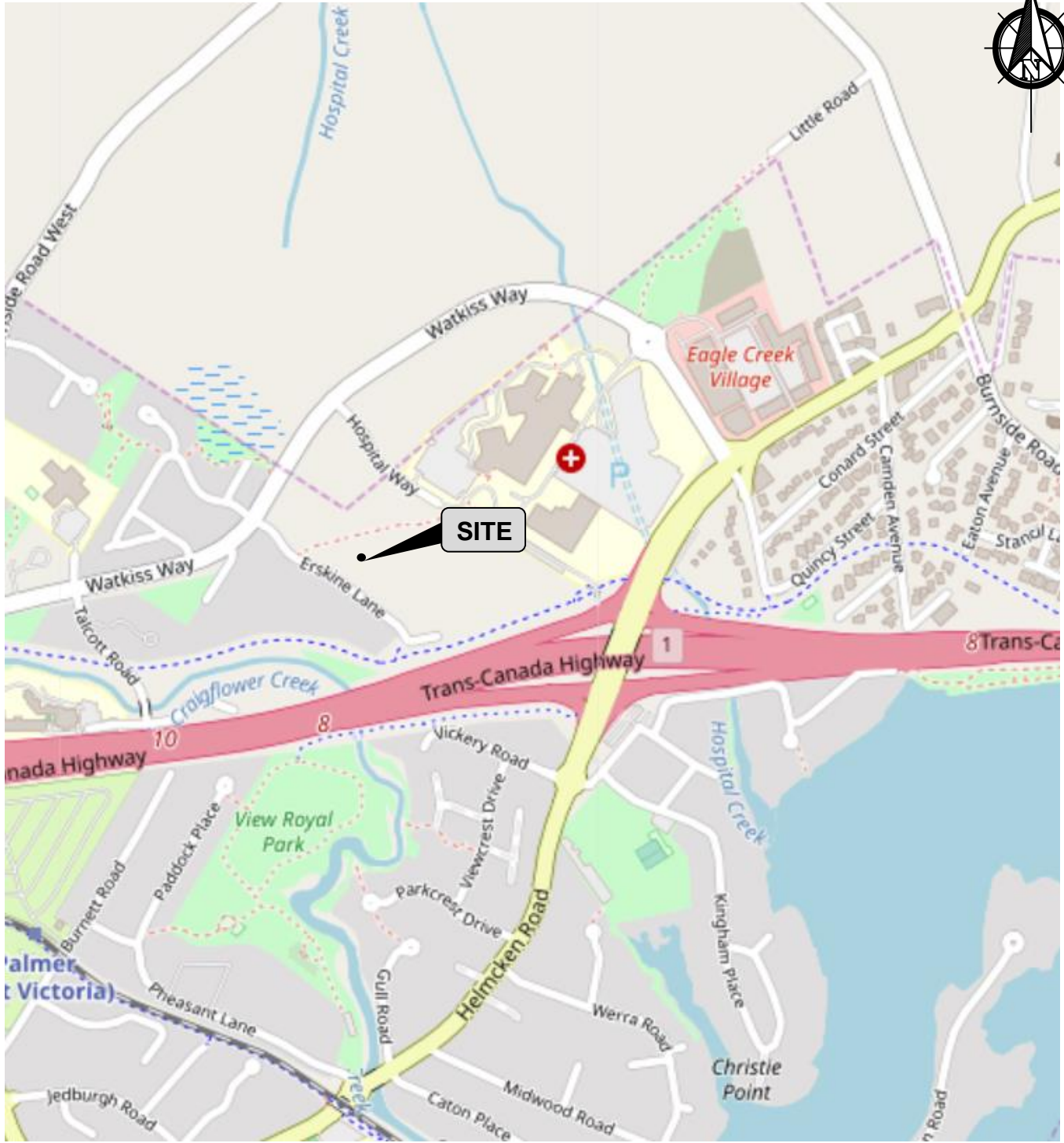


12. Ministry of Environment, Environmental Management Act, Contaminated Sites Regulation (BC Reg375/96). 2019.
13. UBC Geographic Information Centre.

243564.000 Phase I ESA Report, 9 Erskine Lane, View Royal, BC, WestUrban, July 25, 2019

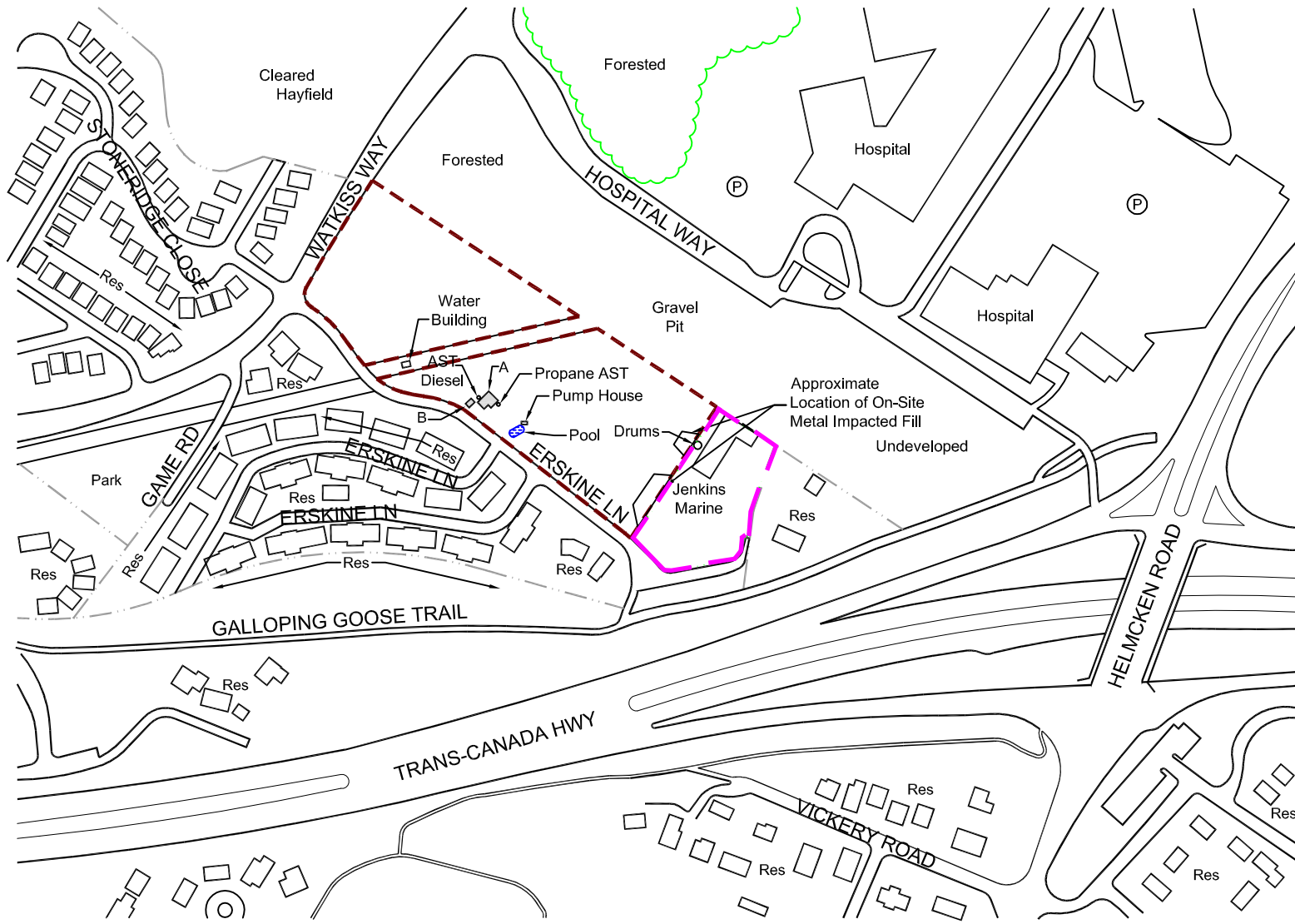
Template: Master Report for Phase I ESA Stage 1 PSI - BC, EDR, June 14, 2019

## FIGURES

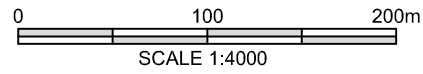


CLIENT NAME:		WESTURBAN DEVELOPMENTS LTD.			
PROJECT NAME:		PHASE I ENVIRONMENTAL SITE ASSESSMENT			
LOCATION:		9 ERSKINE LANE, VIEW ROAYL, BRITISH COLUMBIA			
TITLE:		KEY MAP			
DATE:	PROJECT #:	IMAGE SOURCE:	DRAWN BY:	CHECKED BY:	FIGURE NO.:
JUNE 2019	243564	OPEN STREET MAPS	JP	TB	1





LEGEND	
	Subject Property
	Other Property Line
	APEC : Historical welding, machine shops, boat building/repair, paint removal, land filling and sandblasting resulting in petroleum and metal impacted soils on-property and metal impacted fill on-site
	APEC Area of Potential Environmental Concern
	Roadway
	Site Building
	Off-Site Building
	Parking Lot
	Residential
	Aboveground Storage Tank
	Inferred Groundwater Flow



WESTURBAN DEVELOPMENTS LTD.	
PHASE I ENVIRONMENTAL SITE ASSESSMENT	
9 ERSKINE LANE, VIEW ROYAL, BRITISH COLUMBIA	
<b>SITE AND SURROUNDING LAND USE PLAN</b>	

DATE: JULY 2019	FIGURE: <b>2</b>
PROJECT NO: 243564	
DRAWN BY: VM/DM	CHECKED BY: J. PAGOTTO
SOURCE :	PINCHIN SITE SURVEY AND GOOGLE EARTH

PA2019070281

**APPENDIX I**  
**Current Land Title of the Site**

**TITLE SEARCH PRINT**

File Reference: 243564  
 Declared Value \$ 621800

2019-06-07, 14:00:02  
 Requestor: Jasmine Koh

**\*\*CURRENT INFORMATION ONLY - NO CANCELLED INFORMATION SHOWN\*\***

**Land Title District**

Land Title Office

VICTORIA

VICTORIA

**Title Number**

From Title Number

EW106420

EW106419

**Application Received**

2004-08-10

**Application Entered**

2004-08-23

**Registered Owner in Fee Simple**

Registered Owner/Mailing Address:

BEVERLEY ADAMS  
 9 ERSKINE LANE  
 VICTORIA, BC  
 V8Z 1R7  
 IN TRUST DDEW106420

**Taxation Authority**

View Royal, Town of

**Description of Land**

Parcel Identifier:

002-364-531

Legal Description:

LOT B, SECTION 93, ESQUIMALT DISTRICT, PLAN 26648, EXCEPT PART IN  
 PLAN VIP62088

**Legal Notations**

NONE

**Charges, Liens and Interests**

Nature:

UNDERSURFACE RIGHTS

Registration Number:

M76301

Registered Owner:

HER MAJESTY THE QUEEN IN RIGHT OF THE PROVINCE OF BRITISH  
 COLUMBIA

Remarks:

INTER ALIA  
 AFB 3.257.3685 DD 35249

Nature:

EASEMENT

Registration Number:

105260G

Registration Date and Time:

1943-03-11 14:47

Remarks:

INTER ALIA  
 THAT PART FORMERLY THE NORTHERLY 5 FEET OF LOT 2,  
 PLAN 4206, APPURTENANT TO LOT 1, PLAN 4206

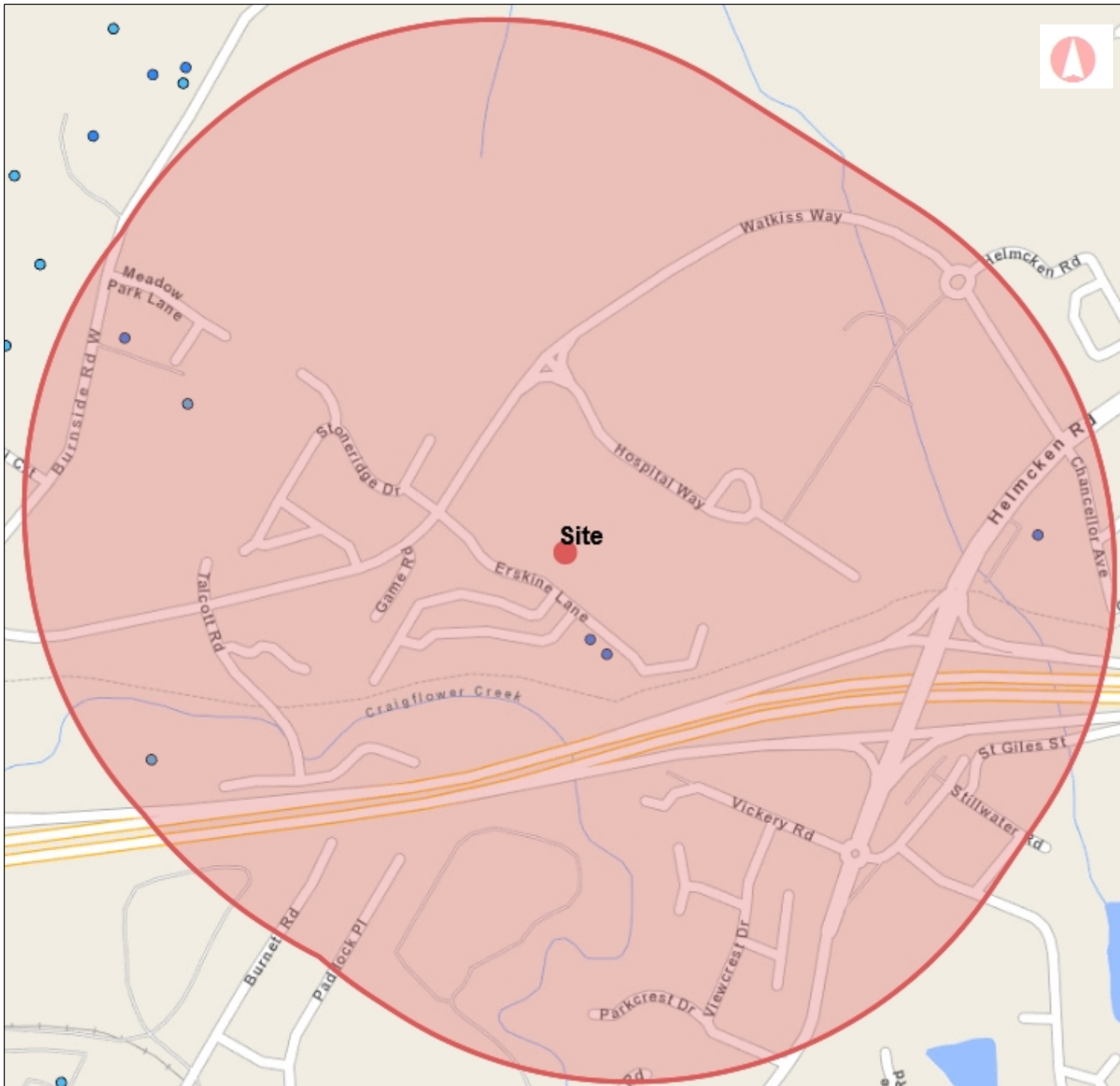
**TITLE SEARCH PRINT**

File Reference: 243564  
Declared Value \$ 621800

2019-06-07, 14:00:02  
Requestor: Jasmine Koh

<b>Duplicate Indefeasible Title</b>	NONE OUTSTANDING
<b>Transfers</b>	NONE
<b>Pending Applications</b>	NONE

**APPENDIX II**  
**BC MOECCS Water Resource Atlas Search Result**



**Legend**

- Water Wells - Private Dome:
- Provincial Groundwater Obs Active
- Provincial Groundwater Obs Inactive
- Water Wells - Artesian
- Water Wells - All



1: 10,000

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Datum: NAD83

Projection: WGS\_1984\_Web\_Mercator\_Auxiliary\_Sphere

**Key Map of British Columbia**



**APPENDIX III**  
**ERIS Report**



# DATABASE REPORT

**Project Property:** *243564, 9 Erskine Lane, View Royal, British Columbia  
9 Erskine Lane  
View Royal BC V8Z 1R7*

**Project No:** *243564*

**Report Type:** *Custom BC Standard Report Plus*

**Order No:** *20190607238*

**Requested by:** *Pinchin Ltd.*

**Date Completed:** *June 12, 2019*



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# Executive Summary

## Property Information:

**Project Property:** 243564, 9 Erskine Lane, View Royal, British Columbia  
9 Erskine Lane View Royal BC V8Z 1R7

**Project No:** 243564

## **Coordinates:**

**Latitude:** 48.46524  
**Longitude:** -123.435924  
**UTM Northing:** 5,368,103.58  
**UTM Easting:** 467,775.51  
**UTM Zone:** UTM Zone 10U

**Elevation:** 90 FT  
27.49 M

## Order Information:

**Order No:** 20190607238  
**Date Requested:** June 7, 2019  
**Requested by:** Pinchin Ltd.  
**Report Type:** Custom BC Standard Report Plus

## Historical/Products:

## Executive Summary: Report Summary

Database	Name	Searched	Search Radius	Project Property	Within 0.50 km	0.50 km to 1.00 km	Total
AMS	Authorization Management System (formerly WASTE)	Y	0.50	0	0	-	0
ARIS	Assessment Report Indexing System	N	0.50	-	-	-	-
AUWR	Automobile Wrecking & Supplies	N	0.50	-	-	-	-
BOGW	BC Oil and Gas Wells	N	0.50	-	-	-	-
CDRY	Dry Cleaning Facilities	N	0.50	-	-	-	-
CHEM	Chemical Register	N	0.50	-	-	-	-
CNG	Compressed Natural Gas Stations	N	0.50	-	-	-	-
COAL	Coal Tar Sites	N	0.50	-	-	-	-
CONV	Compliance and Enforcement Summary	Y	0.50	0	0	-	0
DIS	Wastewater Discharge Inventory	N	0.50	-	-	-	-
EEM	Environmental Effects Monitoring	N	0.50	-	-	-	-
EHS	ERIS Historical Searches	N	0.50	-	-	-	-
EIIS	Environmental Issues Inventory System	N	0.50	-	-	-	-
EM	Environmental Monitoring Locations	N	0.50	-	-	-	-
FCON	Federal Convictions	N	0.50	-	-	-	-
FCS	Contaminated Sites on Federal Land	Y	0.50	0	0	-	0
FISH	Commercial Fisheries	N	0.50	-	-	-	-
FOFT	Fisheries & Oceans Fuel Tanks	N	0.50	-	-	-	-
GEN	Waste Generators Summary	Y	0.50	0	1	-	1
GEN2	Generators - Special Waste Information System (SWIS)	Y	0.50	0	2	-	2
GHG	Greenhouse Gas Emissions from Large Facilities	N	0.50	-	-	-	-
HWF	Hazardous Waste Facilities	Y	0.50	0	0	-	0
IAFT	Indian & Northern Affairs Fuel Tanks	N	0.50	-	-	-	-
LUM	Lumber Mills	N	0.50	-	-	-	-
MINE	Canadian Mine Locations	N	0.50	-	-	-	-
MNR	Minerals Deposits Database	N	0.50	-	-	-	-
NATE	National Analysis of Trends in Emergencies System (NATES)	N	0.50	-	-	-	-
NCPL	Non-Compliance Reports	N	0.50	-	-	-	-
NDFT	National Defense & Canadian Forces Fuel Tanks	N	0.50	-	-	-	-
NDSP	National Defense & Canadian Forces Spills	N	0.50	-	-	-	-
NDWD	National Defence & Canadian Forces Waste Disposal Sites	N	0.50	-	-	-	-
NEBI	National Energy Board Pipeline Incidents	N	0.50	-	-	-	-
NEBP	National Energy Board Wells	N	0.50	-	-	-	-
NEES	National Environmental Emergencies System (NEES)	Y	0.50	0	0	-	0

<i>Database</i>	<i>Name</i>	<i>Searched</i>	<i>Search Radius</i>	<i>Project Property</i>	<i>Within 0.50 km</i>	<i>0.50 km to 1.00 km</i>	<i>Total</i>
NPCB	National PCB Inventory	N	0.50	-	-	-	-
NPRI	National Pollutant Release Inventory	Y	0.50	0	0	-	0
OG INCIDENTS	BC Oil and Gas Commission Incidents	N	0.50	-	-	-	-
OGWW	Oil and Gas Wells	N	0.50	-	-	-	-
PAP	Canadian Pulp and Paper	N	0.50	-	-	-	-
PCB	Inventory of PCB Storage Sites	Y	0.50	0	1	-	1
PCFT	Parks Canada Fuel Storage Tanks	N	0.50	-	-	-	-
PES	Pesticide Register	N	0.50	-	-	-	-
PRAI	Private Aggregate Inventory	N	0.50	-	-	-	-
PUAI	Public Aggregate Inventory	N	0.50	-	-	-	-
REC	Waste Receivers Summary	Y	0.50	0	1	-	1
REC2	Receivers - Special Waste Information System (SWIS)	Y	0.50	0	0	-	0
RST	Retail Fuel Storage Tanks	Y	0.50	0	0	-	0
SCT	Scott's Manufacturing Directory	Y	0.50	0	1	-	1
SREG	Site Registry	Y	1.00	1	1	1	3
STNK	Surrey Tank Construction Permits	Y	0.50	0	0	-	0
TCFT	Transport Canada Fuel Storage Tanks	N	0.50	-	-	-	-
VTNK	Vancouver Heating Oil Underground Storage Tanks	N	0.50	-	-	-	-
WDS	Waste Disposal Site Inventory	Y	0.50	0	0	-	0
WWIS	Water Well Information System	N	0.50	-	-	-	-
<b>Total:</b>				1	7	1	9

## Executive Summary: Site Report Summary - Project Property

<i>Map Key</i>	<i>DB</i>	<i>Company/Site Name</i>	<i>Address</i>	<i>Dir/Dist (m)</i>	<i>Elev diff (m)</i>	<i>Page Number</i>
<a href="#">1</a>	SREG	9 Erskine Lane, View Royal, Victoria	9 ERSKINE LANE VIEW ROYAL No Entry VICTORIA BC	-/0.0	0.00	<a href="#">13</a>
<i>Site ID   Updated:</i> 21587   19-Jul-2018						

## Executive Summary: Site Report Summary - Surrounding Properties

<b>Map Key</b>	<b>DB</b>	<b>Company/Site Name</b>	<b>Address</b>	<b>Dir/Dist (m)</b>	<b>Elev Diff (m)</b>	<b>Page Number</b>
<a href="#">2</a>	SREG	7 Erskine Lane, View Royal	7 ERSKINE LANE ( VIEW ROYAL) VICTORIA BC <i>Site ID   Updated:</i> 21586   19-Jul-2018	SE/100.0	3.22	<a href="#">14</a>
<a href="#">3</a>	SCT	Jenkins Marine Ltd.	5 Erskine Lane Victoria BC V8Z 1R7	ESE/165.3	5.81	<a href="#">20</a>
<a href="#">4</a>	GEN2	VICTORIA GENERAL HOSPITAL	1 HOSPITAL WAY, VICTORIA, BC BC	NE/190.4	-4.35	<a href="#">20</a>
<a href="#">4</a>	GEN2	VANCOUVER GENERAL HOSPITAL	#1 HOSPITAL WAY, VICTORIA, BC BC	NE/190.4	-4.35	<a href="#">21</a>
<a href="#">4</a>	PCB	CAPITAL HEALTH REGION	1 HOSPITAL WAY VICTORIA BC V8Z 6R5	NE/190.4	-4.35	<a href="#">21</a>
<a href="#">4</a>	REC	CAPITAL HEALTH REGION	1 Hospital Way Victoria BC V8Z 6R5	NE/190.4	-4.35	<a href="#">22</a>
<a href="#">5</a>	GEN	Capital Health Region	35 Helmcken Road, Victoria BC	NE/364.1	-7.41	<a href="#">23</a>
<a href="#">6</a>	SREG	E & N Rail Trail, Victoria	E & N RAIL TRAIL - ADJACENT TO CRAIGFLOWER CREEK No Entry VICTORIA BC <i>Site ID   Updated:</i> 17447   08-May-2015	S/995.3	-12.12	<a href="#">23</a>

# Executive Summary: Summary By Data Source

## **GEN - Waste Generators Summary**

A search of the GEN database, dated 1993-Sep 30, 2017 has found that there are 1 GEN site(s) within approximately 0.50 kilometers of the project property.

<b><u>Lower Elevation</u></b>	<b><u>Address</u></b>	<b><u>Direction</u></b>	<b><u>Distance (m)</u></b>	<b><u>Map Key</u></b>
Capital Health Region	35 Helmcken Road, Victoria BC	NE	364.10	<a href="#"><u>5</u></a>

## **GEN2 - Generators - Special Waste Information System (SWIS)**

A search of the GEN2 database, dated Jan 2011-Dec 2014 has found that there are 2 GEN2 site(s) within approximately 0.50 kilometers of the project property.

<b><u>Lower Elevation</u></b>	<b><u>Address</u></b>	<b><u>Direction</u></b>	<b><u>Distance (m)</u></b>	<b><u>Map Key</u></b>
VANCOUVER GENERAL HOSPITAL	#1 HOSPITAL WAY, VICTORIA, BC BC	NE	190.39	<a href="#"><u>4</u></a>
VICTORIA GENERAL HOSPITAL	1 HOSPITAL WAY, VICTORIA, BC BC	NE	190.39	<a href="#"><u>4</u></a>

## **PCB - Inventory of PCB Storage Sites**

A search of the PCB database, dated 1989, May 1993-2010\* has found that there are 1 PCB site(s) within approximately 0.50 kilometers of the project property.

<b><u>Lower Elevation</u></b>	<b><u>Address</u></b>	<b><u>Direction</u></b>	<b><u>Distance (m)</u></b>	<b><u>Map Key</u></b>
CAPITAL HEALTH REGION	1 HOSPITAL WAY VICTORIA BC V8Z 6R5	NE	190.39	<a href="#"><u>4</u></a>

## **REC - Waste Receivers Summary**

A search of the REC database, dated 1992-2010\* has found that there are 1 REC site(s) within approximately 0.50 kilometers of the project property.

<b><u>Lower Elevation</u></b>	<b><u>Address</u></b>	<b><u>Direction</u></b>	<b><u>Distance (m)</u></b>	<b><u>Map Key</u></b>
CAPITAL HEALTH REGION	1 Hospital Way Victoria BC V8Z 6R5	NE	190.39	<a href="#"><u>4</u></a>

## **SCT - Scott's Manufacturing Directory**

A search of the SCT database, dated 1992-Mar 2011\* has found that there are 1 SCT site(s) within approximately 0.50 kilometers of the project property.

<b><u>Equal/Higher Elevation</u></b>	<b><u>Address</u></b>	<b><u>Direction</u></b>	<b><u>Distance (m)</u></b>	<b><u>Map Key</u></b>
Jenkins Marine Ltd.	5 Erskine Lane Victoria BC V8Z 1R7	ESE	165.26	<a href="#"><u>3</u></a>

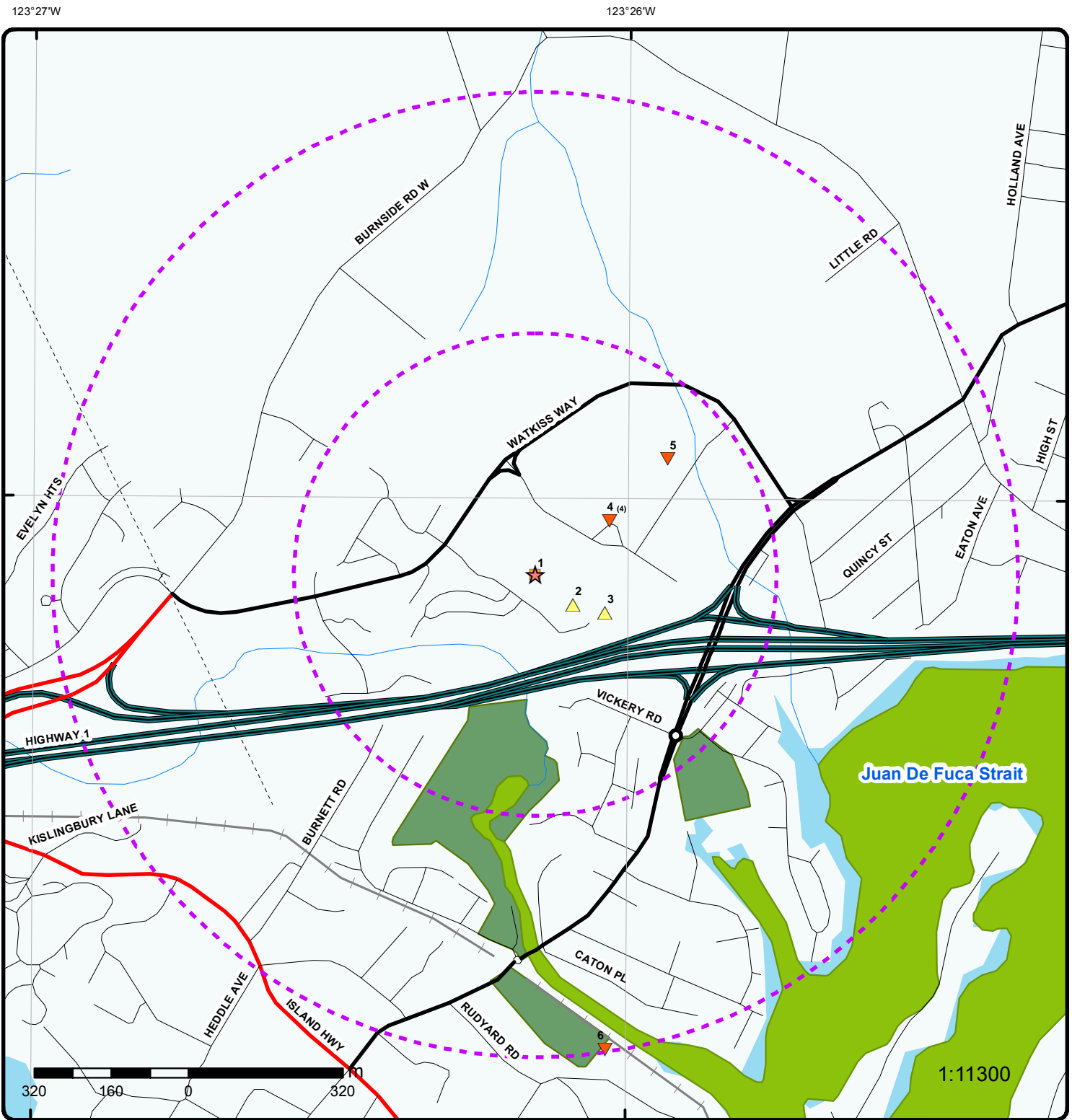
## **SREG - Site Registry**

A search of the SREG database, dated Apr 30, 2019 has found that there are 3 SREG site(s) within approximately 1.00 kilometers of the project property.

<b><u>Equal/Higher Elevation</u></b>	<b><u>Address</u></b>	<b><u>Direction</u></b>	<b><u>Distance (m)</u></b>	<b><u>Map Key</u></b>
9 Erskine Lane, View Royal, Victoria	9 ERSKINE LANE VIEW ROYAL No Entry VICTORIA BC <i>Site ID   Updated:</i> 21587   19-Jul-2018	-	0.00	<a href="#"><u>1</u></a>
7 Erskine Lane, View Royal	7 ERSKINE LANE ( VIEW ROYAL) VICTORIA BC  <i>Site ID   Updated:</i> 21586   19-Jul-2018	SE	100.01	<a href="#"><u>2</u></a>

<b><u>Lower Elevation</u></b>	<b><u>Address</u></b>	<b><u>Direction</u></b>	<b><u>Distance (m)</u></b>	<b><u>Map Key</u></b>
E & N Rail Trail, Victoria	E & N RAIL TRAIL - ADJACENT TO CRAIGFLOWER CREEK No Entry VICTORIA BC <i>Site ID   Updated:</i> 17447   08-May-2015	S	995.28	<a href="#"><u>6</u></a>





### Map : 1 Kilometer Radius

Order No: 20190607238

Address: 9 Erskine Lane, View Royal, BC, V8Z 1R7



- |                                     |                      |                                   |                                |
|-------------------------------------|----------------------|-----------------------------------|--------------------------------|
| ★ Project Property                  | Expressway           | Industrial and Resource - Regions | National Park                  |
| ○ Buffer Outline                    | Principal Highway    | Main Line                         | Provincial or Territorial Park |
| ▲ Eris Sites with Higher Elevation  | Secondary Highway    | Sidetrack                         | Other Park                     |
| ■ Eris Sites with Same Elevation    | Major Road           | Transit Line                      | Golf Course or Driving Range   |
| ▼ Eris Sites with Lower Elevation   | Local road           | Abandoned Line                    | Park or Sports Field           |
| ○ Eris Sites with Unknown Elevation | Trail                |                                   | Other Recreation Area          |
|                                     | Proposed Road        |                                   |                                |
|                                     | Ferry Route/Ice Road |                                   |                                |



310 155 0 310 m

1:12200

Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

# Aerial (2013)

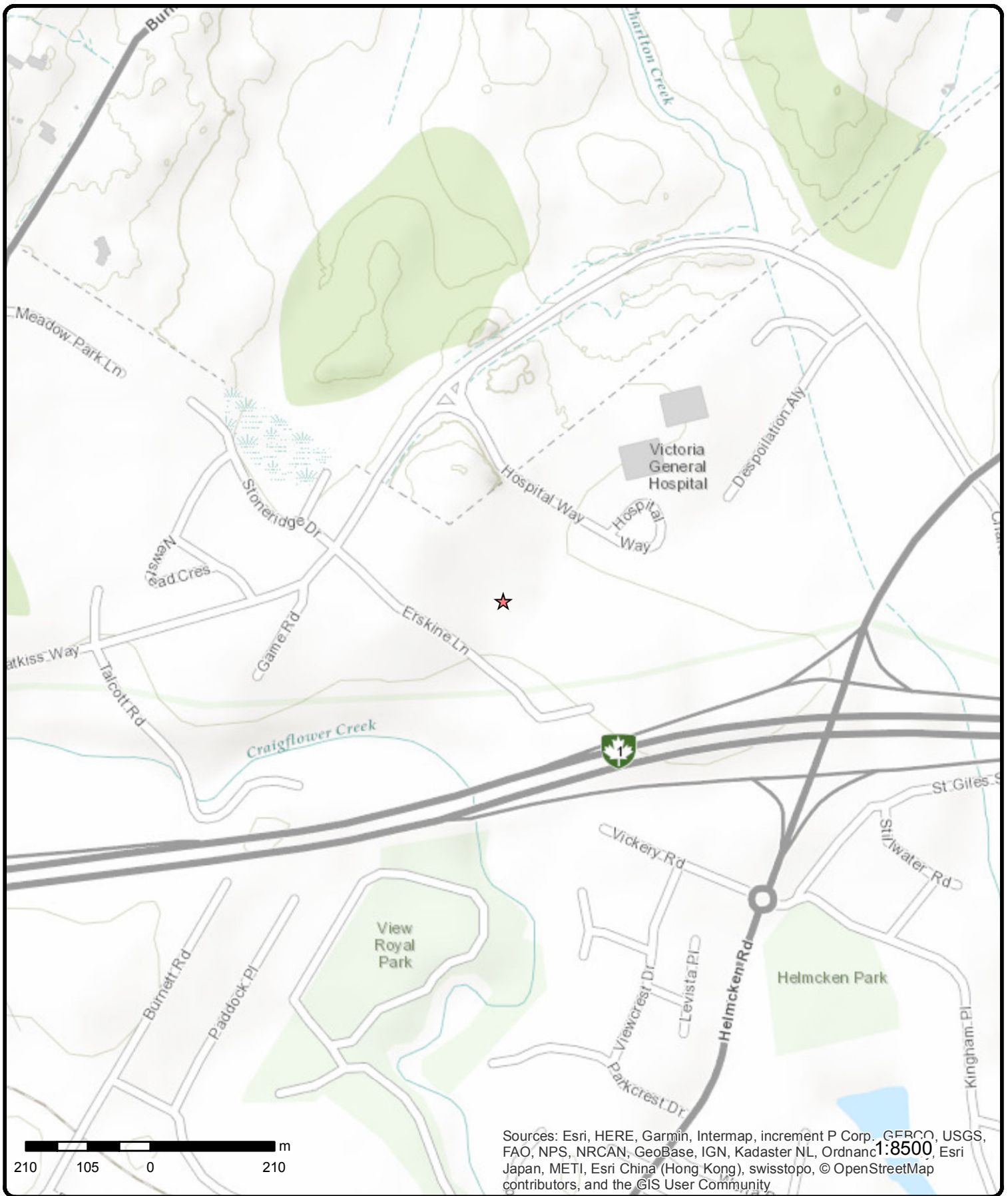
Address: 9 Erskine Lane, View Royal, BC, V8Z 1R7

Source: ESRI World Imagery

Order No: 20190607238



© ERIS Information Limited Partnership



# Topographic Map

Address: 9 Erskine Lane, View Royal, BC, V8Z 1R7

Source: ESRI World Topographic Map

Order No: 20190607238



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# Detail Report

Map Key	Number of Records	Direction/ Distance (m)	Elev/Diff (m)	Site	DB
<a href="#">1</a>	1 of 1	-/0.0	27.5 / 0.00	9 Erskine Lane, View Royal, Victoria 9 ERSKINE LANE VIEW ROYAL No Entry VICTORIA BC	SREG

<b>Site ID:</b>	21587	<b>Registered:</b>	07-May-2018
<b>Victoria File No:</b>	26250-20/21587	<b>Updated:</b>	19-Jul-2018
<b>Regional File No:</b>	No File	<b>Detail Removed:</b>	16-Jul-2018
<b>Region:</b>		<b>Postal Code:</b>	V8Z 1R7
<b>Record Status:</b>	NOT ASSIGNED	<b>Latitude DMS:</b>	48d 27m 54.4s
<b>Status as of:</b>	April 2019	<b>Longitude DMS:</b>	123d 26m 08.9s
<b>Cleanup Status:</b>		<b>Latitude:</b>	48.465111
<b>Category:</b>	Not Applicable	<b>Longitude:</b>	123.435806
<b>Location Desc:</b>	LATS/LONGS CONFIRMED USING GOOGLE EARTH AND LTSA		
<b>Site Note:</b>			

**Registry Notations**

**Event ID:** 90416  
**Notation Type and Act:** NOTIFICATION RECEIVED ABOUT LIKELY OR ACTUAL SUBSTANCE MIGRATION FROM NEIGHBOURING SITE. Environmental Management Act: General  
**Initiated Date:** 02-May-2018  
**Approved Date:** 02-May-2018  
**Region:** Nanaimo, Vancouver Island  
**Ministry Contact:** SAMWAYS, JENNIFER  
**Notation Notes:** Source Parcel 7 Erskine Lane, View Royal Victoria  
 Site: 21586  
**Required Actions:** No Actions Entered  
**Requirement Due Date:**  
**Requirement Received Date:**

**Participant:** Islander Engineering Ltd      **Role:** SUBMITTED BY

**Registry Notations**

**Event ID:** 91151  
**Notation Type and Act:** SITE RISK CLASSIFIED - SITE IS NON-HIGH RISK. Environmental Management Act: General  
**Initiated Date:** 06-Apr-2018  
**Approved Date:** 06-Apr-2018  
**Region:** Nanaimo, Vancouver Island  
**Ministry Contact:** YAN, PETER  
**Notation Notes:** Source Parcel 7 Erskine Lane, View Royal Victoria  
 Site: 21586  
**Required Actions:** No Actions Entered  
**Requirement Due Date:**  
**Requirement Received Date:**

**Participant:** Islander Engineering Ltd      **Role:** SUBMITTED BY

**Site Participants**

**Participant:** Site Information Advisor      **Start Date:** May-02-2018  
**Participation Type:** EMP      **End Date:**  
**Notes:**

Map Key	Number of Records	Direction/ Distance (m)	Elev/Diff (m)	Site	DB
<b>Participants Role:</b>		Ministry Contact			
<b>Site Participants</b>					
<b>Participant:</b>	Yan, Peter			<b>Start Date:</b>	Apr-06-2018
<b>Participation Type:</b>	EMP			<b>End Date:</b>	
<b>Notes:</b>					
<b>Participants Role:</b>		Ministry Contact			
<b>Site Participants</b>					
<b>Participant:</b>	Islander Engineering Ltd			<b>Start Date:</b>	Apr-06-2018
<b>Participation Type:</b>	ORG			<b>End Date:</b>	
<b>Notes:</b>					
<b>Participants Role:</b>		Environmental Consultant/Contractor			
<b>Site Participants</b>					
<b>Participant:</b>	Adams, Beverly			<b>Start Date:</b>	May-02-2018
<b>Participation Type:</b>	PER			<b>End Date:</b>	
<b>Notes:</b>					
<b>Participants Role:</b>		Property Owner			
<b>Associated Sites</b>					
<b>Associated Site ID:</b>	21586			<b>Effective Date:</b>	5/2/2018
<b>Notes:</b>					
		SOURCE PARCEL 21586			
		AFFECTED PARCEL 21587			
<b>Parcel Descriptions</b>					
<b>Date Added:</b>	5/2/2018			<b>Crown Land PIN#:</b>	
<b>LTO PID(s):</b>	002-364-531			<b>Crown Land File#:</b>	
<b>Land Description:</b>					
<b>2</b>	<b>1 of 1</b>	<b>SE/100.0</b>	<b>30.7 / 3.22</b>	<b>7 Erskine Lane, View Royal 7 ERSKINE LANE ( VIEW ROYAL) VICTORIA BC</b>	<b>SREG</b>
<b>Site ID:</b>	21586			<b>Registered:</b>	07-May-2018
<b>Victoria File No:</b>	26250-20/21586			<b>Updated:</b>	19-Jul-2018
<b>Regional File No:</b>	No File			<b>Detail Removed:</b>	16-Jul-2018
<b>Region:</b>				<b>Postal Code:</b>	No Entry
<b>Record Status:</b>	NOT ASSIGNED			<b>Latitude DMS:</b>	48d 27m 52.5s
<b>Status as of:</b>	April 2019			<b>Longitude DMS:</b>	123d 26m 05.5s
<b>Cleanup Status:</b>				<b>Latitude:</b>	48.464583
<b>Category:</b>	Not Applicable			<b>Longitude:</b>	123.434861
<b>Location Desc:</b>	LATS/LONGS CONFIRMED USING GOOGLE EARTH AND LTSA				
<b>Site Note:</b>					
<b>Registry Notations</b>					
<b>Event ID:</b>	91146				
<b>Notation Type and Act:</b>	RELEASE OF APPROVING AUTHORITY UNDER ACCEPTANCE OF INDEPENDENT REMEDIATION ISSUED. Environmental Management Act: General				
<b>Initiated Date:</b>	13-Jul-2018				

<b>Map Key</b>	<b>Number of Records</b>	<b>Direction/ Distance (m)</b>	<b>Elev/Diff (m)</b>	<b>Site</b>	<b>DB</b>
<b>Approved Date:</b>		13-Jul-2018			
<b>Region:</b>		Nanaimo, Vancouver Island			
<b>Ministry Contact:</b>		HANEMAYER, VINCENT (SURREY) C			
<b>Notation Notes:</b>		Release Of Soil Removal, Zoning And Development Applications Under Scenario 5 (Site Redevelopment)			
<b>Required Actions:</b>		No Actions Entered			
<b>Requirement Due Date:</b>					
<b>Requirement Received Date:</b>					
<b><u>Registry Notations</u></b>					
<b>Event ID:</b>		91147			
<b>Notation Type and Act:</b>		REQUIREMENT(S) IMPOSED UNDER EMA SECTION 54(3)(D). Environmental Management Act: General			
<b>Initiated Date:</b>		13-Jul-2018			
<b>Approved Date:</b>		13-Jul-2018			
<b>Region:</b>		Nanaimo, Vancouver Island			
<b>Ministry Contact:</b>		HANEMAYER, VINCENT (SURREY) C			
<b>Notation Notes:</b>		No Notes Entered			
<b>Required Actions:</b>		A Statement By An Approved Professional Must Be Submitted Annually To The Director Within 30 Days Of The Anniversary Of The 13 July, 2018 Release Letter.			
<b>Requirement Due Date:</b>					
<b>Requirement Received Date:</b>					
<b><u>Registry Notations</u></b>					
<b>Event ID:</b>		91148			
<b>Notation Type and Act:</b>		REQUIREMENT(S) IMPOSED UNDER EMA SECTION 54(3)(D). Environmental Management Act: General			
<b>Initiated Date:</b>		13-Jul-2018			
<b>Approved Date:</b>		13-Jul-2018			
<b>Region:</b>		Nanaimo, Vancouver Island			
<b>Ministry Contact:</b>		HANEMAYER, VINCENT (SURREY) C			
<b>Notation Notes:</b>		No Notes Entered			
<b>Required Actions:</b>		Remediation Must Be Completed Within Five Years Of The 13 July, 2018 Release Letter. Remediation Must Be Confirmed According To Applicable Legislation And Ministry Guidance. Within 90 Days Of Completing Remediation, A Report Summarizing Confirmation Of Remediation Shall Be Submitted To The Director.			
<b>Requirement Due Date:</b>					
<b>Requirement Received Date:</b>					
<b><u>Registry Notations</u></b>					
<b>Event ID:</b>		91117			
<b>Notation Type and Act:</b>		SITE PROFILE REVIEWED - FURTHER INVESTIGATION REQUIRED BY THE MINISTRY. Environmental Management Act: General			
<b>Initiated Date:</b>		11-Jul-2018			
<b>Approved Date:</b>		No Entry			
<b>Region:</b>		Nanaimo, Vancouver Island			
<b>Ministry Contact:</b>		HANEMAYER, VINCENT (SURREY) C			
<b>Notation Notes:</b>		Auto Inserted From Site Profile			
<b>Required Actions:</b>		Detailed Site Investigation			
<b>Requirement Due Date:</b>					
<b>Requirement Received Date:</b>					
<b><u>Registry Notations</u></b>					
<b>Event ID:</b>		91116			
<b>Notation Type and Act:</b>		SITE PROFILE RECEIVED. Environmental Management Act: General			
<b>Initiated Date:</b>		28-Jun-2018			
<b>Approved Date:</b>		No Entry			
<b>Region:</b>		Nanaimo, Vancouver Island			
<b>Ministry Contact:</b>		HANEMAYER, VINCENT (SURREY) C			
<b>Notation Notes:</b>		Notation Generated In Site Profile On 2018-07-10 By Vchanema			
<b>Required Actions:</b>		No Actions Entered			
<b>Requirement Due Date:</b>					

<i>Map Key</i>	<i>Number of Records</i>	<i>Direction/ Distance (m)</i>	<i>Elev/Diff (m)</i>	<i>Site</i>	<i>DB</i>
<b>Requirement Received Date:</b>					
<b>Participant:</b>	Islander Engineering Ltd			<b>Role:</b>	SITE PROFILE SUBMITTED BY
<b><u>Registry Notations</u></b>					
<b>Event ID:</b>	90414				
<b>Notation Type and Act:</b>	NOTICE OF INDEPENDENT REMEDIATION INITIATION SUBMITTED. Environmental Management Act: General				
<b>Initiated Date:</b>	02-May-2018				
<b>Approved Date:</b>	02-May-2018				
<b>Region:</b>	Nanaimo, Vancouver Island				
<b>Ministry Contact:</b>	SAMWAYS, JENNIFER				
<b>Notation Notes:</b>	Start: 2018-05-15				
<b>Required Actions:</b>	No Actions Entered				
<b>Requirement Due Date:</b>					
<b>Requirement Received Date:</b>					
<b>Participant:</b>	Islander Engineering Ltd			<b>Role:</b>	SUBMITTED BY
<b><u>Registry Notations</u></b>					
<b>Event ID:</b>	90415				
<b>Notation Type and Act:</b>	NOTIFICATION RECEIVED ABOUT LIKELY OR ACTUAL SUBSTANCE MIGRATION TO NEIGHBOURING SITE. Environmental Management Act: General				
<b>Initiated Date:</b>	02-May-2018				
<b>Approved Date:</b>	02-May-2018				
<b>Region:</b>	Nanaimo, Vancouver Island				
<b>Ministry Contact:</b>	SAMWAYS, JENNIFER				
<b>Notation Notes:</b>	Affected Parcel: 9 Erskine Lane, View Royal (Victoria, Bc) Site: 21587				
<b>Required Actions:</b>	No Actions Entered				
<b>Requirement Due Date:</b>					
<b>Requirement Received Date:</b>					
<b>Participant:</b>	Islander Engineering Ltd			<b>Role:</b>	SUBMITTED BY
<b><u>Registry Notations</u></b>					
<b>Event ID:</b>	91152				
<b>Notation Type and Act:</b>	SITE RISK CLASSIFIED - AFFECTED SITE IS NON-HIGH RISK. Environmental Management Act: General				
<b>Initiated Date:</b>	06-Apr-2018				
<b>Approved Date:</b>	06-Apr-2018				
<b>Region:</b>	Nanaimo, Vancouver Island				
<b>Ministry Contact:</b>	YAN, PETER				
<b>Notation Notes:</b>	Affected Parcel: 9 Erskine Lane, View Royal (Victoria, Bc) Site: 21587				
<b>Required Actions:</b>	No Actions Entered				
<b>Requirement Due Date:</b>					
<b>Requirement Received Date:</b>					
<b>Participant:</b>	Islander Engineering Ltd			<b>Role:</b>	SUBMITTED BY
<b><u>Registry Notations</u></b>					
<b>Event ID:</b>	91118				
<b>Notation Type and Act:</b>	SITE RISK CLASSIFIED - SITE IS HIGH RISK. Environmental Management Act: General				
<b>Initiated Date:</b>	06-Apr-2018				
<b>Approved Date:</b>	06-Apr-2018				
<b>Region:</b>	Nanaimo, Vancouver Island				
<b>Ministry Contact:</b>	HANEMAYER, VINCENT (SURREY) C				
<b>Notation Notes:</b>	No Notes Entered				
<b>Required Actions:</b>	If There Are Confirmed To Be Immediate Risks Associated With The High Risk Conditions, The Ministry Should Be Notified Immediately Of These Conditions And A Plan And Schedule For The Implementation Of Any Required				

<b>Map Key</b>	<b>Number of Records</b>	<b>Direction/ Distance (m)</b>	<b>Elev/Diff (m)</b>	<b>Site</b>	<b>DB</b>
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Mitigative Or Risk Management Measures Should Be Provided.

**Requirement Due Date:**  
**Requirement Received Date:**

**Participant:** Islander Engineering Ltd **Role:** SUBMITTED BY

**Site Participants**

**Participant:** Islander Engineering Ltd **Start Date:** Apr-01-2018  
**Participation Type:** ORG **End Date:**  
**Notes:**

**Participants Role:** Site Profile Contact  
**Participants Role:** Environmental Consultant/Contractor  
**Participants Role:** Site Profile Completor

**Site Participants**

**Participant:** Site Information Advisor **Start Date:** May-02-2018  
**Participation Type:** EMP **End Date:**  
**Notes:**

**Participants Role:** Ministry Contact

**Site Participants**

**Participant:** Hanemayer, Vincent (Surrey) C **Start Date:** Apr-06-2018  
**Participation Type:** EMP **End Date:**  
**Notes:**

**Participants Role:** Main Ministry Contact

**Site Participants**

**Participant:** 1132785 Bc Ltd **Start Date:** May-02-2018  
**Participation Type:** ORG **End Date:**  
**Notes:**

**Participants Role:** Property Owner

**Site Participants**

**Participant:** Yan, Peter **Start Date:** Apr-06-2018  
**Participation Type:** EMP **End Date:**  
**Notes:**

**Participants Role:** Ministry Contact

**Documents on File**

**Document or Report Title:** Draft - Psi, Dsi & Remediation Plan, 7 Erskine Lane, View Royal, Bc  
**Authored Date:** 01-Apr-2018  
**Submitted Date:** 28-Jun-2018

**Document Entry Notes:**

Nothing Noted



<b>Map Key</b>	<b>Number of Records</b>	<b>Direction/ Distance (m)</b>	<b>Elev/Diff (m)</b>	<b>Site</b>	<b>DB</b>
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**Participant and Role:** Islander Engineering Ltd - Author

**Associated Sites**

**Associated Site ID:** 21587 **Effective Date:** 5/2/2018  
**Notes:** SOURCE PARCEL 21586  
AFFECTED PARCEL 21587

**Suspected Land Use - Notes**

**Land Use Description:** Sandblasting Waste Disposal  
**Notes:** Inserted For Site Profile Dated 2018-04-06

**Suspected Land Use - Notes**

**Land Use Description:** Welding Or Machine Shops (Repair Or Fabrication)  
**Notes:** Inserted For Site Profile Dated 2018-04-06

**Suspected Land Use - Notes**

**Land Use Description:** Dry Docks, Ship Building Or Boat Repair Incl. Paint Removal  
**Notes:** Inserted For Site Profile Dated 2018-04-06

**Suspected Land Use - Notes**

**Land Use Description:** Const. Demo. Material Incl. Concrete And Ashpalt, Landfillin  
**Notes:** Inserted For Site Profile Dated 2018-04-06

**Parcel Descriptions**

**Date Added:** 5/2/2018 **Crown Land PIN#:**  
**LTO PID(s):** 018-361-790 **Crown Land File#:**  
**Land Description:**

**Current Site Profile Information**

**Date Entered:** May-02-2018  
**Date Completed:** Apr-06-2018  
**Decision Date:** Jul-11-2018  
**Date Received:** Jun-28-2018  
**Date Registrar Recorded:** Jun-28-2018  
**Date Answer Completed:** Apr-06-2018  
**Reg Date Entered:** Jul-10-2018  
**Investigation?:** Yes  
**Local Authority:** Town Of View Royal  
**Local Authority Date Recorded:** Jun-28-2018  
**Site Profile Comments:** No Comment

**Site Profile Note All Questions**

**Important Note:**

SPECIAL NOTE REGARDING SITE PROFILE QUESTIONS  
In the bulk data provided by the Ministry of the Environment, the Current Site Profile information for any given site ONLY INCLUDES QUESTIONS TO WHICH THE ANSWER IS YES. Here, for informational purposes only, we provide the list of ALL current site profile questions.

**All Questions:**

**AREAS OF POTENTIAL CONCERN**

- Petroleum, Solvent Or Other Polluting Substance Spills To The Environment Greater Than 100 Litres?
- Residue Left After Removal Of Piled Materials Such As Chemicals, Coal, Ore, Smelter Slag, Air Quality Control System Baghouse Dust?
- Discarded Barrels, Drums Or Tanks?
- Contamination Resulting From Migration Of Substances From Other Properties?

**FILL MATERIALS**

- Fill Dirt, Soil, Gravel, Sand Or Like Materials From A Contaminated Site Or From A Source Used For Any Of The Activities Listed Under Schedule 2?
- Discarded Or Waste Granular Materials Such As Sand Blasting Grit, Asphalt Paving Or Roofing Material, Spent Foundry Casting Sands, Mine Ore, Waste Rock Or Float?
- Dredged Sediments, Or Sediments And Debris Materials Originating From Locations Adjacent To Foreshore Industrial Activities, Or Municipal Sanitary Or Stormwater Discharges?

**WASTE DISPOSAL**

- Materials Such As Household Garbage, Mixed Municipal Refuse, Or Demolition Debris?
- Waste Or Byproducts Such As Tank Bottoms, Residues, Sludge, Or Flocculation Precipitates From Industrial Processes Or Wastewater Treatment?
- Waste Products From Smelting Or Mining Activities, Such As Smelter Slag, Mine Tailings, Or Cull Materials From Coal Processing?
- Waste Products From Natural Gas And Oil Well Drilling Activities, Such As Drilling Fluids And Muds?
- Waste Products From Photographic Developing Or Finishing Laboratories; Asphalt Tar Manufacturing; Boilers, Incinerators Or Other Thermal Facilities (Eg. Ash); Appliance, Small Equipment Or Engine Repair Or Salvage; Dry Cleaning Operations (Eg. Solvents); For From The Cleaning Or Repair Of Parts Of Boats, Ships, Barges, Automobiles Or Trucks, Including Sandblasting Grit Or Paint Scrapings? \*[1]

\*[1] Note prior to 2009, question 5 was worded as follows: "Waste Products From Photographic Developing Or Finishing Laboratories; Asphalt Tar Manufacturing; Boilers, Incinerators Or Other Thermal Facilities (Eg. Ash); Appliance, Small Equipment Or Engine Repair Or Salvage; Dry Cleaning Operations (Eg. Solvents); Or Automobile And Truck Parts Cleaning Or Repair?"

**TANKS OR CONTAINERS USED OR STORED, OTHER THAN TANKS USED FOR RESIDENTIAL HEATING FUEL\*[2]**

- Underground Fuel Or Chemical Storage Tanks Other Than Storage Tanks For Compressed Gases? \*[2A]
- Above Ground Fuel Or Chemical Storage Tanks Other Than Storage Tanks For Compressed Gases? \*[2B]

\*[2] Note prior to 2009, this section was referred to "Tanks Or Containers Used Or Stored".

\*[2A] Note prior to 2009, question 1 was worded as follows: "Underground Fuel Or Chemical Storage Tanks?"

\*[2B] Note prior to 2009, question 2 was worded as follows: "Above Ground Fuel Or Chemical Storage Tanks? "

**HAZARDOUS WASTES OR HAZARDOUS SUBSTANCES \*[3]**

- Pcb-Containing Electrical Transformers Or Capacitors Either At Grade, Attached Above Ground To Poles, Located Within Buildings, Or Stored?
- Waste Asbestos Or Asbestos Containing Materials Such As Pipe Wrapping, Blown-In Insulation Or Panelling Buried?
- Paints, Solvents, Mineral Spirits Or Waste Pest Control Products Or Pest Control Product Containers Stored In Volumes Greater Than 205 Litres?

\*[3] Note, prior to 2009, this section was referred to "Special (Hazardous) Wastes Or Substances".

**LEGAL OR REGULATORY ACTIONS OR CONSTRAINTS**

- Government Orders Or Other Notifications Pertaining To Environmental Conditions Or Quality Of Soil, Water, Groundwater Or Other Environmental Media?
- Liens To Recover Costs, Restrictive Covenants On Land Use, Or Other Charges Or Encumbrances, Stemming From Contaminants Or Wastes Remaining Onsite Or From Other Environmental Conditions?
- Government Notifications Relating To Past Or Recurring Environmental Violations At The Site Or Any Facility Located On The Site?

**Site Profile Note - Questions**

**Category Precursor:** Is there currently or to the best of your knowledge has there previously been on the site any deposit of:  
**Category and Question:** Fill Materials - Discarded Or Waste Granular Materials Such As Sand Blasting Grit, Asphalt Paving Or Roofing Material, Spent Foundry Casting Sands, Mine Ore, Waste Rock Or Float? Yes

**Site Profile Note - Questions**

**Category Precursor:** Is there currently or to the best of your knowledge has there previously been on the site any deposit of:  
**Category and Question:** Fill Materials - Fill Dirt, Soil, Gravel, Sand Or Like Materials From A Contaminated Site Or From A Source Used For Any Of The Activities Listed Under Schedule 2? Yes

Map Key	Number of Records	Direction/ Distance (m)	Elev/Diff (m)	Site	DB
<u>3</u>	1 of 1	ESE/165.3	33.3 / 5.81	Jenkins Marine Ltd. 5 Erskine Lane Victoria BC V8Z 1R7	SCT
<b>Established:</b>		01-JAN-67			
<b>Plant Size (ft²):</b>		65340			
<b>Employment:</b>					
<b>--Details--</b>					
<b>Description:</b>		Boat Building			
<b>SIC/NAICS Code:</b>		336612			
<b>Description:</b>		Boat Building			
<b>SIC/NAICS Code:</b>		336612			
<u>4</u>	1 of 4	NE/190.4	23.1 / -4.35	VICTORIA GENERAL HOSPITAL 1 HOSPITAL WAY, VICTORIA, BC BC	GEN2
<b><u>Waste Manifests - 2012</u></b>					
<b>Manifest No:</b>	BJ029294	<b>Date Shipped:</b>	08-08-2012		
<b>TDG Code:</b>	UN3261	<b>Date Received:</b>	08-13-2012		
<b>TDG Class:</b>	8.0-CORROSIVE	<b>Copy 3 Date:</b>	09-07-2012		
<b>TDG Group:</b>	II-Dangerous	<b>Qty Shipped:</b>	10 KG		
<b>Packing Code:</b>	07-Other	<b>Qty Rcvd:</b>	10 KG		
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0976		
<b>Waste Receiver:</b>	BC ENVIRONMENTAL FIELD SERVICES	<b>Waste Trans:</b>	STERICYCLE, ULC		
<b>Receiving Addr:</b>	104-1772 BROADWAY STREET, PORT COQUITLAM, BC	<b>Trans Addr:</b>	100-1407 KEBET WAY, PORT COQUITLAM, BC		
<b>Waste Name:</b>	WASTE CORROSIVE ACIDIC, ORGANIC N.O.S.				
<b>Manifest No:</b>	BJ029294	<b>Date Shipped:</b>	08-08-2012		
<b>TDG Code:</b>	UN1992	<b>Date Received:</b>	08-13-2012		
<b>TDG Class:</b>	3.0-FLAMMABLE	<b>Copy 3 Date:</b>	09-07-2012		
<b>TDG Group:</b>	II-Dangerous	<b>Qty Shipped:</b>	10 L		
<b>Packing Code:</b>	07-Other	<b>Qty Rcvd:</b>	10 L		
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0976		
<b>Waste Receiver:</b>	BC ENVIRONMENTAL FIELD SERVICES	<b>Waste Trans:</b>	STERICYCLE, ULC		
<b>Receiving Addr:</b>	104-1772 BROADWAY STREET, PORT COQUITLAM, BC	<b>Trans Addr:</b>	100-1407 KEBET WAY, PORT COQUITLAM, BC		
<b>Waste Name:</b>	Flammable liquids, poisonous, n.o.s.				
<b>Manifest No:</b>	BJ029294	<b>Date Shipped:</b>	08-08-2012		
<b>TDG Code:</b>	UN2811	<b>Date Received:</b>	08-13-2012		
<b>TDG Class:</b>	6.1-POISONOUS	<b>Copy 3 Date:</b>	09-07-2012		
<b>TDG Group:</b>	II-Dangerous	<b>Qty Shipped:</b>	400 KG		
<b>Packing Code:</b>	01-Drum	<b>Qty Rcvd:</b>	400 KG		
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0976		
<b>Waste Receiver:</b>	BC ENVIRONMENTAL FIELD SERVICES	<b>Waste Trans:</b>	STERICYCLE, ULC		
<b>Receiving Addr:</b>	104-1772 BROADWAY STREET, PORT COQUITLAM, BC	<b>Trans Addr:</b>	100-1407 KEBET WAY, PORT COQUITLAM, BC		
<b>Waste Name:</b>	POISONOUS SOLIDS, N.O.S.				
<b>Manifest No:</b>	BJ029294	<b>Date Shipped:</b>	08-08-2012		
<b>TDG Code:</b>	UN3262	<b>Date Received:</b>	08-13-2012		
<b>TDG Class:</b>	8.0-CORROSIVE	<b>Copy 3 Date:</b>	09-07-2012		
<b>TDG Group:</b>	II-Dangerous	<b>Qty Shipped:</b>	10 KG		
<b>Packing Code:</b>	07-Other	<b>Qty Rcvd:</b>	10 KG		
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0976		

Map Key	Number of Records	Direction/ Distance (m)	Elev/Diff (m)	Site	DB
<b>Waste Receiver:</b> <b>Receiving Addr:</b>	BC ENVIRONMENTAL FIELD SERVICES 104-1772 BROADWAY STREET, PORT COQUITLAM, BC			<b>Waste Trans:</b> <b>Trans Addr:</b>	STERICYCLE, ULC 100-1407 KEBET WAY, PORT COQUITLAM, BC
<b>Waste Name:</b>	WASTE CORROSIVE SOLID, INORGANIC				

4      2 of 4      NE/190.4      23.1 / -4.35      VANCOUVER GENERAL HOSPITAL  
#1 HOSPITAL WAY, VICTORIA, BC  
BC      GEN2

**Waste Manifests - 2011**

<b>Manifest No:</b>	BH302602	<b>Date Shipped:</b>	04-28-2011
<b>TDG Code:</b>	UN3139	<b>Date Received:</b>	04-29-2011
<b>TDG Class:</b>	5.2-OXIDIZING & ORGANIC	<b>Copy 3 Date:</b>	05-04-2011
<b>TDG Group:</b>	II-Dangerous	<b>Qty Shipped:</b>	5 KG
<b>Packing Code:</b>	01-Drum	<b>Qty Rcvd:</b>	5 KG
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0956
<b>Waste Receiver:</b>	R S ENVIRONMENTAL FIELD SERVICES OF B.C. INC.	<b>Waste Trans:</b>	R S ENVIRONMENTAL FIELD SERVICES OF B.C. INC.
<b>Receiving Addr:</b>	104 - 1772 BROADWAY ST, PORT COQUITLAM, BC	<b>Trans Addr:</b>	104 - 1772 BROADWAY ST, PORT COQUITLAM, BC
<b>Waste Name:</b>	OXIDIZING SUBSTANCES, LIQUID, N.O.S.		

<b>Manifest No:</b>	BH302602	<b>Date Shipped:</b>	04-28-2011
<b>TDG Code:</b>	UN2810	<b>Date Received:</b>	04-29-2011
<b>TDG Class:</b>	6.1-POISONOUS	<b>Copy 3 Date:</b>	05-04-2011
<b>TDG Group:</b>	II-Dangerous	<b>Qty Shipped:</b>	65 KG
<b>Packing Code:</b>	01-Drum	<b>Qty Rcvd:</b>	65 KG
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0956
<b>Waste Receiver:</b>	R S ENVIRONMENTAL FIELD SERVICES OF B.C. INC.	<b>Waste Trans:</b>	R S ENVIRONMENTAL FIELD SERVICES OF B.C. INC.
<b>Receiving Addr:</b>	104 - 1772 BROADWAY ST, PORT COQUITLAM, BC	<b>Trans Addr:</b>	104 - 1772 BROADWAY ST, PORT COQUITLAM, BC
<b>Waste Name:</b>	POISONOUS LIQUID, N.O.S.		

<b>Manifest No:</b>	BH302602	<b>Date Shipped:</b>	04-28-2011
<b>TDG Code:</b>	UN1760	<b>Date Received:</b>	04-29-2011
<b>TDG Class:</b>	8.0-CORROSIVE	<b>Copy 3 Date:</b>	05-04-2011
<b>TDG Group:</b>	II-Dangerous	<b>Qty Shipped:</b>	5 KG
<b>Packing Code:</b>	07-Other	<b>Qty Rcvd:</b>	5 KG
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0956
<b>Waste Receiver:</b>	R S ENVIRONMENTAL FIELD SERVICES OF B.C. INC.	<b>Waste Trans:</b>	R S ENVIRONMENTAL FIELD SERVICES OF B.C. INC.
<b>Receiving Addr:</b>	104 - 1772 BROADWAY ST, PORT COQUITLAM, BC	<b>Trans Addr:</b>	104 - 1772 BROADWAY ST, PORT COQUITLAM, BC
<b>Waste Name:</b>	CORROSIVE LIQUIDS, N.O.S.		

<b>Manifest No:</b>	BH302602	<b>Date Shipped:</b>	04-28-2011
<b>TDG Code:</b>	UN2811	<b>Date Received:</b>	04-29-2011
<b>TDG Class:</b>	6.1-POISONOUS	<b>Copy 3 Date:</b>	05-04-2011
<b>TDG Group:</b>	III-Moderately Dangerous	<b>Qty Shipped:</b>	60 KG
<b>Packing Code:</b>	01-Drum	<b>Qty Rcvd:</b>	60 KG
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0956
<b>Waste Receiver:</b>	R S ENVIRONMENTAL FIELD SERVICES OF B.C. INC.	<b>Waste Trans:</b>	R S ENVIRONMENTAL FIELD SERVICES OF B.C. INC.
<b>Receiving Addr:</b>	104 - 1772 BROADWAY ST, PORT COQUITLAM, BC	<b>Trans Addr:</b>	104 - 1772 BROADWAY ST, PORT COQUITLAM, BC
<b>Waste Name:</b>	POISONOUS SOLIDS, N.O.S.		

4      3 of 4      NE/190.4      23.1 / -4.35      CAPITAL HEALTH REGION  
1 HOSPITAL WAY  
VICTORIA BC V8Z 6R5      PCB

Map Key	Number of Records	Direction/ Distance (m)	Elev/Diff (m)	Site	DB
<b>BCG NO:</b>	BCG00316			<b>Status Date:</b>	14-NOV-00
<b>Status:</b>	ACTIVE			<b>Region:</b>	VANCOUVER ISLAND
<b>--Details--</b>					
<b>Waste Description:</b>		POLYCHLORINATED BIPHENYLS			
<b>Storage:</b>		0 KG			
<b>Waste in 30 Days:</b>		813 KG			
<b>Generating Description:</b>		GENERATED ONE TIME ONLY			
<b>Handling Description:</b>		STORAGE			
<b>Waste Description:</b>		POLYCHLORINATED BIPHENYLS			
<b>Storage:</b>		12 L			
<b>Waste in 30 Days:</b>		0 L			
<b>Generating Description:</b>		GENERATED CONTINUOUSLY			
<b>Handling Description:</b>		STORAGE			
<b>Waste Description:</b>		POLYCHLORINATED BIPHENYLS			
<b>Storage:</b>		205 L			
<b>Waste in 30 Days:</b>		0 L			
<b>Generating Description:</b>		GENERATED ONE TIME ONLY			
<b>Handling Description:</b>		STORAGE			
<b>Waste Description:</b>		POLYCHLORINATED BIPHENYLS			
<b>Storage:</b>		541 L			
<b>Waste in 30 Days:</b>		0 L			
<b>Generating Description:</b>		GENERATED ONE TIME ONLY			
<b>Handling Description:</b>		STORAGE			
<b>Waste Description:</b>		POLYCHLORINATED BIPHENYLS			
<b>Storage:</b>		0 KG			
<b>Waste in 30 Days:</b>		1376 KG			
<b>Generating Description:</b>		GENERATED ONE TIME ONLY			
<b>Handling Description:</b>		STORAGE			
<b>Waste Description:</b>		POLYCHLORINATED BIPHENYLS			
<b>Storage:</b>		0 KG			
<b>Waste in 30 Days:</b>		3588 KG			
<b>Generating Description:</b>		GENERATED ONE TIME ONLY			
<b>Handling Description:</b>		STORAGE			
<b>Waste Description:</b>		POLYCHLORINATED BIPHENYLS			
<b>Storage:</b>		0 KG			
<b>Waste in 30 Days:</b>		3818 KG			
<b>Generating Description:</b>		GENERATED ONE TIME ONLY			
<b>Handling Description:</b>		STORAGE			
<b>Waste Description:</b>		POLYCHLORINATED BIPHENYLS			
<b>Storage:</b>		0 KG			
<b>Waste in 30 Days:</b>		8575 KG			
<b>Generating Description:</b>		GENERATED ONE TIME ONLY			
<b>Handling Description:</b>		STORAGE			

[4](#)

4 of 4

NE/190.4

23.1 / -4.35

CAPITAL HEALTH REGION  
1 Hospital Way  
Victoria BC V8Z 6R5

REC

**Company NO:**  
**Year:**  
**Region:**

BCG00316  
2007  
VANCOUVER ISLAND

**--Details--**

**Type of Waste:**

Fuel oil or Gas oil

Map Key	Number of Records	Direction/ Distance (m)	Elev/Diff (m)	Site	DB
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<u>5</u>	1 of 1	NE/364.1	20.1 / -7.41	Capital Health Region 35 Helmcken Road, Victoria BC	GEN
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**Generator No:** BCG00316  
**Status:** Active  
**Region:** VANCOUVER ISLAND  
**Mailing Addr:** 1 Hospital Way, Victoria  
**Waste Generation Site:** 35 Helmcken Road, Victoria  
**Comments:** FORMERLY GREATER VICTORIA HOSPITAL SOCIETY(GVHS)

**Status Date:** 14-Nov-2000  
**Registration Dt:** 13-Jan-1995

**--Details--**

**Business Type:**  
**Physical State:**  
**Amount in Storage:**  
**TDG PIN No:**  
**Certified By Name:**  
**Waste:** Infectious substances, human, n.o.s.

**Generation Code:**  
**Handling Code:**  
**Amount per 30 Days:**  
**TDG Class:**  
**Date Certifier Signed:**

**Business Type:** GENERAL HOSPITALS  
**Physical State:** Solid  
**Amount in Storage:**  
**TDG PIN No:** UN2814  
**Certified By Name:** Wolfgang Lehwald  
**Waste:** Infectious Substances, Human, N.O.S.

**Generation Code:** Continuously  
**Handling Code:** Thermal Treatment  
**Amount per 30 Days:** 12000 KG  
**TDG Class:** 6.2  
**Date Certifier Signed:** 02-Jan-1992

<u>6</u>	1 of 1	S/995.3	15.4 / -12.12	E & N Rail Trail, Victoria E & N RAIL TRAIL - ADJACENT TO CRAIGFLOWER CREEK No Entry VICTORIA BC	SREG
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**Site ID:** 17447  
**Victoria File No:** 26250-20/17447  
**Regional File No:** No File  
**Region:**  
**Record Status:** NOT ASSIGNED  
**Status as of:** April 2019  
**Cleanup Status:**  
**Category:** Unranked  
**Location Desc:** LATS/LONGS PROVIDED BY CONSULTANT  
**Site Note:** There are no Associated Sites for this site.

**Registered:** 05-Dec-2014  
**Updated:** 08-May-2015  
**Detail Removed:** 07-May-2015  
**Postal Code:** N/A  
**Latitude DMS:** 48d 27m 23.0s  
**Longitude DMS:** 123d 26m 02.0s  
**Latitude:** 48.456389  
**Longitude:** 123.433889

**Registry Notations**

**Event ID:** 77343  
**Notation Type and Act:** NOTICE OF INDEPENDENT REMEDIATION COMPLETION SUBMITTED. Environmental Management Act:  
 General  
**Initiated Date:** 07-May-2015  
**Approved Date:** 07-May-2015  
**Region:** Nanaimo, Vancouver Island  
**Ministry Contact:** SAMWAYS, JENNIFER  
**Notation Notes:** Completed: 2014-03-25  
**Required Actions:** No Actions Entered  
**Requirement Due Date:**  
**Requirement Received Date:**

**Participant:** Mcelhanney Consulting Services Ltd  
**Role:** SUBMITTED BY

**Registry Notations**

<i>Map Key</i>	<i>Number of Records</i>	<i>Direction/ Distance (m)</i>	<i>Elev/Diff (m)</i>	<i>Site</i>	<i>DB</i>
<b>Event ID:</b> 75472					
<b>Notation Type and Act:</b> NOTICE OF INDEPENDENT REMEDIATION INITIATION SUBMITTED. Environmental Management Act: General					
<b>Initiated Date:</b> 03-Dec-2014					
<b>Approved Date:</b> 03-Dec-2014					
<b>Region:</b> Nanaimo, Vancouver Island					
<b>Ministry Contact:</b> SAMWAYS, JENNIFER					
<b>Notation Notes:</b> Start: 2014-12-03					
<b>Required Actions:</b> No Actions Entered					
<b>Requirement Due Date:</b>					
<b>Requirement Received Date:</b>					
<b>Participant:</b>	Mcelhanney Consulting Services Ltd			<b>Role:</b>	SUBMITTED BY
<b><u>Registry Notations</u></b>					
<b>Event ID:</b> 75532					
<b>Notation Type and Act:</b> SITE RISK CLASSIFIED - SITE IS NON-HIGH RISK. Environmental Management Act: General					
<b>Initiated Date:</b> 02-Dec-2014					
<b>Approved Date:</b> 02-Dec-2014					
<b>Region:</b> Nanaimo, Vancouver Island					
<b>Ministry Contact:</b> O'GRADY, TYLER					
<b>Notation Notes:</b> No Notes Entered					
<b>Required Actions:</b> No Actions Entered					
<b>Requirement Due Date:</b>					
<b>Requirement Received Date:</b>					
<b>Participant:</b>	Mcelhanney Consulting Services Ltd			<b>Role:</b>	SUBMITTED BY
<b><u>Site Participants</u></b>					
<b>Participant:</b>	Site Information Advisor			<b>Start Date:</b>	Dec-03-2014
<b>Participation Type:</b>	EMP			<b>End Date:</b>	
<b>Notes:</b>					
<b>Participants Role:</b>	Ministry Contact				
<b><u>Site Participants</u></b>					
<b>Participant:</b>	Capital Regional District			<b>Start Date:</b>	Dec-03-2014
<b>Participation Type:</b>	ORG			<b>End Date:</b>	
<b>Notes:</b>					
<b>Participants Role:</b>	Property Owner				
<b><u>Site Participants</u></b>					
<b>Participant:</b>	O'Grady, Tyler			<b>Start Date:</b>	Dec-02-2014
<b>Participation Type:</b>	EMP			<b>End Date:</b>	
<b>Notes:</b>					
<b>Participants Role:</b>	Ministry Contact				
<b><u>Site Participants</u></b>					
<b>Participant:</b>	Mcelhanney Consulting Services Ltd			<b>Start Date:</b>	Dec-02-2014
<b>Participation Type:</b>	ORG			<b>End Date:</b>	
<b>Notes:</b>					
<b>Participants Role:</b>	Environmental Consultant/Contractor				

<i>Map Key</i>	<i>Number of Records</i>	<i>Direction/ Distance (m)</i>	<i>Elev/Diff (m)</i>	<i>Site</i>	<i>DB</i>
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**Parcel Descriptions**

<b>Date Added:</b>	12/4/2014			<b>Crown Land PIN#:</b>	
<b>LTO PID(s):</b>	024-635-987			<b>Crown Land File#:</b>	
<b>Land Description:</b>	LOT 1 SECTIONS 8 AND 27 ESQUIMALT DISTRICT PLAN VIP69799				



# Unplottable Summary

Total: **4** Unplottable sites

DB	Company Name/Site Name	Address	City	Postal
GEN2	QUANTUM FACILITIES INC.	GOLDSTREAM PARK HWY 1, VICTORIA, BC	BC	
GEN2	JENKINS MARINE	D JETTY COLWOOD-WILDERT RD, VICTORIA, BC	BC	
GEN2	QUANTUM FACILITIES INC.	GOLDSTREAM PARK HWY 1, VICTORIA, BC	BC	
SCT	Northern Lights Candles 2008	RR 1 Site 9 C-5 Sany Bay	Victoria BC	V0L 1W0

# Unplottable Report

**Site:** QUANTUM FACILITIES INC.  
GOLDSTREAM PARK HWY 1, VICTORIA, BC BC

**Database:**  
GEN2

## Waste Manifests - 2012

<b>Manifest No:</b>	BH835841	<b>Date Shipped:</b>	01-06-2012
<b>TDG Code:</b>	BC0007	<b>Date Received:</b>	01-06-2012
<b>TDG Class:</b>	9.0-MISCELLANEOUS	<b>Copy 3 Date:</b>	01-16-2012
<b>TDG Group:</b>	III-Moderately Dangerous	<b>Qty Shipped:</b>	588 L
<b>Packing Code:</b>	03-Bulk	<b>Qty Rcvd:</b>	588 L
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0029
<b>Waste Receiver:</b>	NEWALTA CORPORATION	<b>Waste Trans:</b>	MCRAE'S ENVIRONMENTAL SERVICES LTD.
<b>Receiving Addr:</b>	1080 MAUGHAN RD, NANAIMO, BC	<b>Trans Addr:</b>	7783 PROGRESS WAY, DELTA, BC
<b>Waste Name:</b>	(L17 OILY WATER SLUDGE/DEBRIS) CERAMIC BEADS, WASTE OIL FILTER CAKE, ALUMINIUM, SAND		

**Site:** JENKINS MARINE  
D JETTY COLWOOD-WILDERT RD, VICTORIA, BC BC

**Database:**  
GEN2

## Waste Manifests - 2014

<b>Manifest No:</b>	BJ912234	<b>Date Shipped:</b>	01-20-2014
<b>TDG Code:</b>	BC0007	<b>Date Received:</b>	01-21-2014
<b>TDG Class:</b>	9.0-MISCELLANEOUS	<b>Copy 3 Date:</b>	03-28-2014
<b>TDG Group:</b>	III-Moderately Dangerous	<b>Qty Shipped:</b>	200 L
<b>Packing Code:</b>	03-Bulk	<b>Qty Rcvd:</b>	197 L
<b>Handling Code:</b>	03-Chemical Treatment	<b>Trans Lic No:</b>	LT0765
<b>Waste Receiver:</b>	TERVITA ENVIRONMENTAL SERVICES LTD.	<b>Waste Trans:</b>	TERVITA ENVIRONMENTAL SERVICES LTD.
<b>Receiving Addr:</b>	825 ADMIRALS ROAD, VICTORIA, BC	<b>Trans Addr:</b>	13511 VULCAN WAY, RICHMOND, BC
<b>Waste Name:</b>	(L17 OILY WATER SLUDGE/DEBRIS) CERAMIC BEADS, WASTE OIL FILTER CAKE, ALUMINIUM, SAND		

**Site:** QUANTUM FACILITIES INC.  
GOLDSTREAM PARK HWY 1, VICTORIA, BC BC

**Database:**  
GEN2

## Waste Manifests - 2012

<b>Manifest No:</b>	BH835841	<b>Date Shipped:</b>	01-06-2012
<b>TDG Code:</b>	BC0001	<b>Date Received:</b>	01-06-2012
<b>TDG Class:</b>	9.0-MISCELLANEOUS	<b>Copy 3 Date:</b>	01-16-2012
<b>TDG Group:</b>	III-Moderately Dangerous	<b>Qty Shipped:</b>	20 L
<b>Packing Code:</b>	03-Bulk	<b>Qty Rcvd:</b>	20 L
<b>Handling Code:</b>	01-Storage	<b>Trans Lic No:</b>	LT0029
<b>Waste Receiver:</b>	NEWALTA CORPORATION	<b>Waste Trans:</b>	MCRAE'S ENVIRONMENTAL SERVICES LTD.
<b>Receiving Addr:</b>	1080 MAUGHAN RD, NANAIMO, BC	<b>Trans Addr:</b>	7783 PROGRESS WAY, DELTA, BC
<b>Waste Name:</b>	LEACHABLE TOXIC -L17 OIL, COMPRESSION OIL, GEAR, HYDRAULIC. GREASE, AQUACENT, PREMIUM SOLVENT		

**Site:** Northern Lights Candles 2008  
RR 1 Site 9 C-5 Sany Bay Victoria BC V0L 1W0

**Database:**  
SCT

**Established:** 3/1/2008  
**Plant Size (ft<sup>2</sup>):** 1200  
**Employment:**

**--Details--**

**Description:**

All Other Miscellaneous Manufacturing

**SIC/NAICS Code:**

339990

# Appendix: Database Descriptions

Environmental Risk Information Services (ERIS) can search the following databases. The extent of historical information varies with each database and current information is determined by what is publicly available to ERIS at the time of update. **Note:** Databases denoted with " \* " indicates that the database will no longer be updated. See the individual database description for more information.

## **Authorization Management System (formerly WASTE):**

Provincial

[AMS](#)

AMS is the Ministry of Environment's waste permit administration system. It maintains data related to the administration of permits issued under the Environmental Management Act and registrations under various regulations where the regulation requires a discharger to register. It will include information such as companies or individuals permitted to discharge waste; type of business and locations at which waste disposal is permitted; the types, amounts and frequency of waste products that are permitted to be discharged at given locations; issue date and more. This was previously referred to as the "WASTE" database.

**Government Publication Date: 1957-Sep 30, 2018**

## **Assessment Report Indexing System:**

Provincial

[ARIS](#)

Within British Columbia, the "Mineral Tenure Act Regulation", requires that results of mineral exploration and development programs be submitted to the British Columbia Ministry of Employment and Investment, where they are then maintained and housed by the Geological Survey Branch. The assessment reports provided by the Geological Survey Branch contain summary information for reports approved to November 1998; on geology, geophysics, geochemistry, drilling, prospecting and physical work.

**Government Publication Date: Mar 31, 2019**

## **Automobile Wrecking & Supplies:**

Private

[AUWR](#)

This database provides an inventory of known locations that are involved in the scrap metal, automobile wrecking/recycling, and automobile parts & supplies industry. Information is provided on the company name, location and business type.

**Government Publication Date: 1999-Jan 31, 2019**

## **BC Oil and Gas Wells:**

Provincial

[BOGW](#)

The BC Oil and Gas Wells database was collected from the BC Oil and Gas Commission and is a comprehensive database that includes information regarding well number, well name, operator name, location, depth, status, as well as drill date and type. Please note that this database will not be updated, information on wells drilled after January 2006 can be found in the Oil and Gas Wells (OGW) database under the 'Private Source Database' section.

**Government Publication Date: 1918-Jan 2006\***

## **Dry Cleaning Facilities:**

Federal

[CDRY](#)

List of dry cleaning facilities made available by Environment and Climate Change Canada. Environment and Climate Change Canada's Tetrachloroethylene (Use in Dry Cleaning and Reporting Requirements) Regulations (SOR/2003-79) are intended to reduce releases of tetrachloroethylene to the environment from dry cleaning facilities.

**Government Publication Date: Jan 2004-Dec 2017**

## **Chemical Register:**

Private

[CHEM](#)

This database includes a listing of locations of facilities within the Province or Territory that either manufacture and/or distributes chemicals.

**Government Publication Date: 1999-Jan 31, 2019**

## **Compressed Natural Gas Stations:**

Private

[CNG](#)

Canada has a network of public access compressed natural gas (CNG) refuelling stations. These stations dispense natural gas in compressed form at 3,000 pounds per square inch (psi), the pressure which is allowed within the current Canadian codes and standards. The majority of natural gas refuelling is located at existing retail gasoline that have a separate refuelling island for natural gas. This list of stations is made available by the Canadian Natural Gas Vehicle Alliance.

**Government Publication Date: Dec 2012 - Mar 2019**

## **Coal Tar Sites:**

Provincial

[COAL](#)

This one-time study is an inventory of all known and historical coal tar sites, identifying sites that produced coal tar and other related tars during the mid 1800's to the mid 1900's.

**Government Publication Date: 1992\***

**Compliance and Enforcement Summary:**

Provincial CONV

This database summarizes orders, tickets and convictions issued by the Ministry of the Environment under applicable ministry and federal legislation. Orders are issued when action is required to prevent or stop actual or potential impact to the environment. Tickets apply to all tickets paid, deemed guilty by non-payment or expiry, or contested in court and found guilty by a judge. Convictions apply to all court convictions of ministry legislation as well as federal legislation where the ministry has taken action. This reporting summary began in January 2006, replacing Non-Compliance Reports by the former Ministry of Water, Land & Air Protection. See the Non-Compliance Reports (NCPL) database below for more information. This database is part of a larger COORS (Conservation Officer On-Line Reporting System) database controlled by the Ministry of Environment in BC.

**Government Publication Date: 1990-Dec 2018**

**Wastewater Discharge Inventory:**

Provincial DIS

This inventory contains information regarding direct dischargers of toxic pollutants for the following operations: Industrial; Commercial; Agricultural; Mining; Municipal; Urban; Aquaculture; and Pulp & Paper, operating under provincial permits. Please note that this program was discontinued and therefore the database will not be updated.

**Government Publication Date: 1957-1995\***

**Environmental Effects Monitoring:**

Federal EEM

The Environmental Effects Monitoring program assesses the effects of effluent from industrial or other sources on fish, fish habitat and human usage of fisheries resources. Since 1992, pulp and paper mills have been required to conduct EEM studies under the Pulp and Paper Effluent Regulations. This database provides information on the mill name, geographical location and sub-lethal toxicity data.

**Government Publication Date: 1992-2007\***

**ERIS Historical Searches:**

Private EHS

ERIS has compiled a database of all environmental risk reports completed since March 1999. Available fields for this database include: site location, date of report, type of report, and search radius. As per all other databases, the ERIS database can be referenced on both the map and "Statistical Profile" page.

**Government Publication Date: 1999-Apr 30, 2019**

**Environmental Issues Inventory System:**

Federal EIIS

The Environmental Issues Inventory System was developed through the implementation of the Environmental Issues and Remediation Plan. This plan was established to determine the location and severity of contaminated sites on inhabited First Nation reserves, and where necessary, to remediate those that posed a risk to health and safety; and to prevent future environmental problems. The EIIS provides information on the reserve under investigation, inventory number, name of site, environmental issue, site action (Remediation, Site Assessment), and date investigation completed.

**Government Publication Date: 1992-2001\***

**Environmental Monitoring Locations:**

Provincial EM

List of environmental monitoring locations included in the Environmental Monitoring System (EMS) maintained by BC's Ministry of the Environment. EMS is the ministry's primary monitoring data repository. The system was designed to capture data covering physical/chemical and biological analyses performed on water, air, solid waste discharges and ambient monitoring sites throughout the province.

**Government Publication Date: Mar 2011-Mar 31, 2019**

**Federal Convictions:**

Federal FCON

Environment Canada maintains a database referred to as the "Environmental Registry" that details prosecutions under the Canadian Environmental Protection Act (CEPA) and the Fisheries Act (FA). Information is provided on the company name, location, charge date, offence and penalty.

**Government Publication Date: 1988-Jun 2007\***

**Contaminated Sites on Federal Land:**

Federal FCS

The Federal Contaminated Sites Inventory includes information on known federal contaminated sites under the custodianship of departments, agencies and consolidated Crown corporations as well as those that are being or have been investigated to determine whether they have contamination arising from past use that could pose a risk to human health or the environment. The inventory also includes non-federal contaminated sites for which the Government of Canada has accepted some or all financial responsibility. It does not include sites where contamination has been caused by, and which are under the control of, enterprise Crown corporations, private individuals, firms or other levels of government.

**Government Publication Date: Jun 2000-Oct 2018**

**Commercial Fisheries:**

Provincial FISH

The Fisheries, Aquaculture & Commercial Fisheries Branch of the Ministry of Water, Land & Air Protection maintains a database of fish processing plant approvals, licenses and activities. Each year, licenses need to be renewed.

**Government Publication Date: 1993-2019**

**Fisheries & Oceans Fuel Tanks:**

Federal FOFT

Fisheries & Oceans Canada maintains an inventory of aboveground & underground fuel storage tanks located on Fisheries & Oceans property or controlled by DFO. Our inventory provides information on the site name, location, tank owner, tank operator, facility type, storage tank location, tank contents & capacity, and date of tank installation.

**Government Publication Date: 1964-Sep 2018**

**Waste Generators Summary:**

Provincial **GEN**

Within British Columbia, the Special Waste Regulation defines a waste generator as any site, equipment and/or operation involved in the production, collection, handling and/or storage of regulated wastes. A generator of regulated waste is required to register the waste generation site and each waste produced, collected, handled, or stored at the site. This database contains the registration number (BCG#), company name and address of registered generators; including the types of hazardous wastes generated and the form of treatment used in the handling of the waste. Some of "Waste Generators Summary" addresses may represent mailing addresses rather than waste/hazardous sites. This information is a summary of all years from June 1993 to September 2010. Please note that a British Columbia Generator number (BCG#) are not unique to a company. This database is part of a larger SWIS (Special Waste Information System) database controlled by the Ministry of Environment in BC. Waste Generators Summary data are historic and no longer being updated.

**Government Publication Date: 1993-Sep 30, 2017**

**Generators - Special Waste Information System (SWIS):**

Provincial **GEN2**

The Special Waste Information System (SWIS) maintained by the BC Ministry of Environment holds information related to the generation and transportation of hazardous waste under the Hazardous Waste Regulation. This is a list of waste shipper sites (waste generators) included in hazardous waste transport manifests from 2011 - 2014, accompanied by manifest details.

**Government Publication Date: Jan 2011-Dec 2014**

**Greenhouse Gas Emissions from Large Facilities:**

Federal **GHG**

List of greenhouse gas emissions from large facilities made available by Environment Canada. Greenhouse gas emissions in kilotonnes of carbon dioxide equivalents (kt CO2 eq).

**Government Publication Date: 2013-Dec 2017**

**Hazardous Waste Facilities:**

Provincial **HWF**

A list of Hazardous Waste Facilities in British Columbia made available by the Ministry of Jobs, Trade and Technology in the BC Data Catalogue.

**Government Publication Date: Sep 30, 2017**

**Indian & Northern Affairs Fuel Tanks:**

Federal **IAFT**

The Department of Indian & Northern Affairs Canada (INAC) maintains an inventory of aboveground & underground fuel storage tanks located on both federal and crown land. Our inventory provides information on the reserve name, location, facility type, site/facility name, tank type, material & ID number, tank contents & capacity, and date of tank installation.

**Government Publication Date: 1950-Aug 2003\***

**Lumber Mills:**

Provincial **LUM**

This database provides information regarding the general location and estimated annual output capacity of major timber processing facilities within the province of British Columbia.

**Government Publication Date: 1997-2017**

**Canadian Mine Locations:**

Private **MINE**

This information is collected from the Canadian & American Mines Handbook. The Mines database is a national database that provides over 290 listings on mines (listed as public companies) dealing primarily with precious metals and hard rocks. Listed are mines that are currently in operation, closed, suspended, or are still being developed (advanced projects). Their locations are provided as geographic coordinates (x, y and/or longitude, latitude). As of 2002, data pertaining to Canadian smelters and refineries has been appended to this database.

**Government Publication Date: 1998-2009\***

**Minerals Deposits Database:**

Provincial **MNR**

The Ministry of Energy and Mines maintains a database of more than 12,000 metallic mineral, industrial mineral and coal deposits and occurrences within British Columbia. Information within our report pertains to primary name, elevation, mining division, commodities, and status. Please note that as of January 27, 1999, information included within this database was divided into 2 categories: released and unreleased areas. Records for unreleased areas may contain incomplete, unedited, and/or inaccurate data.

**Government Publication Date: May 30, 2018**

**National Analysis of Trends in Emergencies System (NATES):**

Federal **NATE**

In 1974 Environment Canada established the National Analysis of Trends in Emergencies System (NATES) database, for the voluntary reporting of significant spill incidents. The data was to be used to assist in directing the work of the emergencies program. NATES ran from 1974 to 1994. Extensive information is available within this database including company names, place where the spill occurred, date of spill, cause, reason and source of spill, damage incurred, and amount, concentration, and volume of materials released.

**Government Publication Date: 1974-1994\***

**Non-Compliance Reports:**

Provincial [NCPL](#)

From 1990 to March 2001 the Ministry of Water, Land & Air Protection maintained a reporting system that identified any reported concern that pertained to compliance with authorized waste management permits or plans, approvals, orders, operational certificates and regulations, or any other activity under the Waste Management Act. This reporting system was discontinued in April of 2001; therefore there will be no updates to this database. However, beginning in January 2006 the Ministry of the Environment began publishing Compliance and Enforcement Summaries. See the Compliance and Enforcement Summary (CPL) database above for more information.

**Government Publication Date: 1990-Mar 2001\***

**National Defense & Canadian Forces Fuel Tanks:**

Federal [NDFT](#)

The Department of National Defense and the Canadian Forces maintains an inventory of all aboveground & underground fuel storage tanks located on DND lands. Our inventory provides information on the base name, location, tank type & capacity, tank contents, tank class, date of tank installation, date tank last used, and status of tank as of May 2001. This database will no longer be updated due to the new National Security protocols which have prohibited any release of this database.

**Government Publication Date: Up to May 2001\***

**National Defense & Canadian Forces Spills:**

Federal [NDSP](#)

The Department of National Defense and the Canadian Forces maintains an inventory of spills to land and water. All spill sites have been classified under the "Transportation of Dangerous Goods Act - 1992". Our inventory provides information on the facility name, location, spill ID #, spill date, type of spill, as well as the quantity of substance spilled & recovered.

**Government Publication Date: Mar 1999-Apr 2018**

**National Defence & Canadian Forces Waste Disposal Sites:**

Federal [NDWD](#)

The Department of National Defence and the Canadian Forces maintains an inventory of waste disposal sites located on DND lands. Where available, our inventory provides information on the base name, location, type of waste received, area of site, depth of site, year site opened/closed and status.

**Government Publication Date: 2001-Apr 2007\***

**National Energy Board Pipeline Incidents:**

Federal [NEBI](#)

Locations of pipeline incidents from 2008 to present, made available by the National Energy Board (NEB). Includes incidents reported under the Onshore Pipeline Regulations and the Processing Plant Regulations related to pipelines under federal jurisdiction, does not include incident data related to pipelines under provincial or territorial jurisdiction.

**Government Publication Date: 2008-Dec 31, 2018**

**National Energy Board Wells:**

Federal [NEBP](#)

The NEBW database contains information on onshore & offshore oil and gas wells that are outside provincial jurisdiction(s) and are thereby regulated by the National Energy Board. Data is provided regarding the operator, well name, well ID No./UWI, status, classification, well depth, spud and release date.

**Government Publication Date: 1920-Feb 2003\***

**National Environmental Emergencies System (NEES):**

Federal [NEES](#)

In 2000, the Emergencies program implemented NEES, a reporting system for spills of hazardous substances. For the most part, this system only captured data from the Atlantic Provinces, some from Quebec and Ontario and a portion from British Columbia. Data for Alberta, Saskatchewan, Manitoba and the Territories was not captured. However, NEES is also a repository for previous Environment Canada spill datasets. NEES is composed of the historic datasets ' or Trends ' which dates from approximately 1974 to present. NEES Trends is a compilation of historic databases, which were merged and includes data from NATES (National Analysis of Trends in Emergencies System), ARTS (Atlantic Regional Trends System), and NEES. In 2001, the Emergencies Program determined that variations in reporting regimes and requirements between federal and provincial agencies made national spill reporting and trend analysis difficult to achieve. As a consequence, the department has focused efforts on capturing data on spills of substances which fall under its legislative authority only (CEPA and FA). As such, the NEES database will be decommissioned in December 2004.

**Government Publication Date: 1974-2003\***

**National PCB Inventory:**

Federal [NPCB](#)

Environment Canada's National PCB inventory includes information on in-use PCB containing equipment in Canada including federal, provincial and private facilities. Federal out-of-service PCB containing equipment and PCB waste owned by the federal government or by federally regulated industries such as airlines, railway companies, broadcasting companies, telephone and telecommunications companies, pipeline companies, etc. are also listed. Although it is not Environment Canada's mandate to collect data on non-federal PCB waste, the National PCB inventory includes some information on provincial and private PCB waste and storage sites. Some addresses provided may be Head Office addresses and are not necessarily the location of where the waste is being used or stored.

**Government Publication Date: 1988-2008\***

**National Pollutant Release Inventory:**

Federal [NPRI](#)

Environment Canada has defined the National Pollutant Release Inventory ("NPRI") as a federal government initiative designed to collect comprehensive national data regarding releases to air, water, or land, and waste transfers for recycling for more than 300 listed substances.

**Government Publication Date: 1993-May 2017**

**BC Oil and Gas Commission Incidents:**

Provincial [OG INCIDENTS](#)

A list of oil and gas pipeline incidents in British Columbia made available by BC Oil and Gas Commission. An incident is defined as a present or imminent event or circumstance, resulting from oil and gas activity that is outside the scope of normal operations which may or may not be an emergency. Includes pipeline spills, releases, and damage to active and discontinued pipelines; does not include incidents that did not result in damage to the pipeline or a release of contents.

**Government Publication Date: Nov 30, 2018**

**Oil and Gas Wells:**

Private [OGWW](#)

The Nickle's Energy Group (publisher of the Daily Oil Bulletin) collects information on drilling activity including operator and well statistics. The well information database includes name, location, class, status and depth. The main Nickle's database is updated on a daily basis, however, this database is updated on a monthly basis. More information is available at [www.nickles.com](http://www.nickles.com).

**Government Publication Date: 1988-Feb 28, 2019**

**Canadian Pulp and Paper:**

Private [PAP](#)

This information is part of the Pulp and Paper Canada Directory. The Directory provides a comprehensive listing of the locations of pulp and paper mills and the products that they produce.

**Government Publication Date: 1999, 2002, 2004, 2005, 2009-2014**

**Inventory of PCB Storage Sites:**

Provincial [PCB](#)

The Ministry of Water, Land & Air Protection maintains a database of all active Polychlorinated Biphenyls (PCB) waste storage sites within the Special Waste Information System. Please note that there is no requirement to maintain an accurate listing of all inactive PCB waste storage equipment and/or disposal sites. The records within this database provide information regarding site name, location, an inventory of stored wastes and quantities, and status date (when site first active/inactive). Previous to May 1993, data was collected from a different source and is only available for 1989. Inventory of PCB Storage Sites data are historic and no longer being updated.

**Government Publication Date: 1989, May 1993-2010\***

**Parks Canada Fuel Storage Tanks:**

Federal [PCFT](#)

Canadian Heritage maintains an inventory of known fuel storage tanks operated by Parks Canada, in both National Parks and at National Historic Sites. The database details information on site name, location, tank install/removal date, capacity, fuel type, facility type, tank design and owner/operator.

**Government Publication Date: 1920-Jan 2005\***

**Pesticide Register:**

Provincial [PES](#)

This is a database of individuals who apply for a service or vendor license for the use of registered pesticides. A service license is denoted by an "S" in the license number, likewise, a vendor license by a "V" in the license number.

**Government Publication Date: 1989-Aug 2018**

**Private Aggregate Inventory:**

Provincial [PRAI](#)

Within British Columbia, aggregate pits are designated as mines; and as such, the Ministry of Energy and Mines is responsible for their planning, management and regulation, including permitting, health, safety and reclamation. Owners or operators of all private aggregate pits must file Notices of Work as part of the permitting and reclamation process. In 1994, the Geological Survey Branch initiated the Aggregate Program, in order to establish an inventory of natural and crushed aggregate pits. Information about each pit in the database file includes its location, NTS map sheet number, Notice of Work file number and status (active/inactive) and the type of landform hosting the pit. This database was a one-time inventory and will not be updated.

**Government Publication Date: 1975-1996\***

**Public Aggregate Inventory:**

Provincial [PUAI](#)

Information about public aggregate pits in British Columbia is collected and managed by the Ministry of Transportation and Highways. Data has been gathered on more than 2000 pits, in respect to pit name, type and geographical location.

**Government Publication Date: 1960-2001\***

**Waste Receivers Summary:**

Provincial [REC](#)

The Special Waste Regulation defines the disposal of regulated waste through an operating waste management system or a waste disposal site operated or used pursuant to the terms and conditions of a Certificate of Approval or a Provisional Certificate of Approval. A waste receiving location is any site or facility to which waste is transferred through a waste carrier. A receiver of regulated waste is required to register the waste receiving facility. This database represents registered receivers of regulated wastes, identified by registration number, company name and address. Some of "Waste Receivers Summary" addresses may represent mailing addresses rather than waste/hazardous sites. This database is part of a larger SWIS (Special Waste Information System) database controlled by the Ministry of Environment in BC. Waste Receivers Summary data are historic and no longer being updated.

**Government Publication Date: 1992-2010\***



**Receivers - Special Waste Information System (SWIS):**

Provincial **REC2**

The Special Waste Information System (SWIS) maintained by the BC Ministry of Environment holds information related to the generation and transportation of hazardous waste under the Hazardous Waste Regulation. This is a list of waste receiver sites included in hazardous waste transport manifests from 2011 - 2014, accompanied by manifest details.

**Government Publication Date: Jan 2011-Dec 2014**

**Retail Fuel Storage Tanks:**

Private **RST**

This database includes an inventory of retail fuel outlet locations (including marinas) that have on their property gasoline, oil, waste oil, natural gas and / or propane storage tanks.

**Government Publication Date: 1999-Jan 31, 2019**

**Scott's Manufacturing Directory:**

Private **SCT**

Scott's Directories is a data bank containing information on over 200,000 manufacturers across Canada. Even though Scott's listings are voluntary, it is the most comprehensive database of Canadian manufacturers available. Information concerning a company's address, plant size, and main products are included in this database.

**Government Publication Date: 1992-Mar 2011\***

**Site Registry:**

Provincial **SREG**

This information is collected from the Ministry of Environment's Site Registry. It is not a registry of contaminated sites, although some sites on the registry are contaminated. Most sites have already been investigated and require minor remediation, or have already been cleaned up to government requirements. The Registry also stores environmentally relevant historic information about sites including: names of participants, legal and administrative notations, references to pertinent documents submitted to the ministry, associations with other sites, and much more.

1. Please note the information provided in the Detail Reports have been updated to the best of our ability as provided by the source, BC Government. For more information, please contact your ERIS sales representative.

**Government Publication Date: Apr 30, 2019**

**Surrey Tank Construction Permits:**

Provincial **STNK**

A list of building permits issued for the removal, construction, and decommissioning of storage tanks in the City of Surrey. This list is made available by the City of Surrey Building Division of the Department of Planning and Development.

**Government Publication Date: Dec 31, 2018**

**Transport Canada Fuel Storage Tanks:**

Federal **TCFT**

List of fuel storage tanks currently or previously owned or operated by Transport Canada. This inventory also includes tanks on The Pickering Lands, which refers to 7,530 hectares (18,600 acres) of land in Pickering, Markham, and Uxbridge owned by the Government of Canada since 1972; properties on this land has been leased by the government since 1975, and falls under the Site Management Policy of Transport Canada, but is administered by Public Works and Government Services Canada. This inventory provides information on the site name, location, tank age, capacity and fuel type.

**Government Publication Date: 1970-Aug 2018**

**Vancouver Heating Oil Underground Storage Tanks:**

Provincial **VTNK**

A list of heating oil Underground Storage Tanks made available by the City of Vancouver. The City of Vancouver maintains records of UST removals, abandonments, and installations for heating oil storage tanks.

**Government Publication Date: Jun 1995 - Apr 2019**

**Waste Disposal Site Inventory:**

Provincial **WDS**

This inventory pertains to active, regulated waste disposal sites within the province of British Columbia. Registered companies may hold a permit or certificate for release of the following waste types: Effluent, Refuse, Air and Special Waste Storage. Information on Waste Disposal Sites after 1998 is contained within the Authorizations (AUTH) database.

**Government Publication Date: 1980-1998\***

**Water Well Information System:**

Provincial **WWIS**

This database was collected from the Groundwater Information Center of the Ministry of Water, Land & Air Protection and contains over 90,000 records. Comprehensive information is available for each well including: well location (address/site area), latitude/longitude, legal description (section, lot, plan, district lot, range, township), BCGS Mapsheet No., depth of well, construction dates, well status and lithology. The accuracy of well locations is also provided, as well as the reference source for obtaining geographic coordinates.

**Government Publication Date: Jul 31, 2018**



# Definitions

**Database Descriptions:** This section provides a detailed explanation for each database including: source, information available, time coverage, and acronyms used. They are listed in alphabetic order.

**Detail Report:** This is the section of the report which provides the most detail for each individual record. Records are summarized by location, starting with the project property followed by records in closest proximity.

**Distance:** The distance value is the distance between plotted points, not necessarily the distance between the sites' boundaries. All values are an approximation.

**Direction:** The direction value is the compass direction of the site in respect to the project property and/or center point of the report.

**Elevation:** The elevation value is taken from the location at which the records for the site address have been plotted. All values are an approximation. Source: Google Elevation API.

**Executive Summary:** This portion of the report is divided into 3 sections:

'Report Summary'- Displays a chart indicating how many records fall on the project property and, within the report search radii.

'Site Report Summary'-Project Property'- This section lists all the records which fall on the project property. For more details, see the 'Detail Report' section.

'Site Report Summary-Surrounding Properties'- This section summarizes all records on adjacent properties, listing them in order of proximity from the project property. For more details, see the 'Detail Report' section.

**Map Key:** The map key number is assigned according to closest proximity from the project property. Map Key numbers always start at #1. The project property will always have a map key of '1' if records are available. If there is a number in brackets beside the main number, this will indicate the number of records on that specific property. If there is no number in brackets, there is only one record for that property.

The symbol and colour used indicates 'elevation': the red inverted triangle will dictate 'ERIS Sites with Lower Elevation', the yellow triangle will dictate 'ERIS Sites with Higher Elevation' and the orange square will dictate 'ERIS Sites with Same Elevation.'

**Unplottables:** These are records that could not be mapped due to various reasons, including limited geographic information. These records may or may not be in your study area, and are included as reference.

**APPENDIX IV**  
**Qualifications of Assessor**



## **Qualifications of Assessors**

### ***Jessica Pagotto, B.Sc.***

Senior Project Coordinator

Pinchin Ltd.

Jessica Pagotto joined Pinchin Ltd. in February 2010 after completing her Degree in Biological Science from the University of Guelph, in Guelph, Ontario. Jessica's experience includes full project office and field work for Phase I ESAs, Phase 2 ESAs, DSIs and soil and groundwater remediation. Jessica has also conducted environmental monitoring for several projects across British Columbia. She has experience in sediment and erosion control, compliance monitoring, spill and emergency response, water monitoring as well as writing Environmental Management Plans.

**APPENDIX V**  
**Photographs**



Photo 1 – View of the south elevation of Site Building A.



Photo 2 – West elevation of Site Building B.



Photo 3 – Heating oil AST adjacent to the west wall of Site Building A.



Photo 4 – Municipal water line and associated infrastructure constructed through the Site, as well as the northern portion of the Site.





Photo 5 – Properties located north of the Site.



Photo 6 – Properties located south of the Site.



Photo 7 – Properties located east of the Site.



Photo 8 – Properties located west of the Site.