



TOWN OF COMOX

1809 Beaufort Avenue Ph: (250) 339-2202
Comox BC V9M 1R9 Fx: (250) 339-7110

REGULAR COUNCIL MEETING AGENDA FOR WEDNESDAY MAY 16, 2018

We respectfully acknowledge that we live, work and play on the traditional lands of the K'ómoks First Nation ... Gila'kasla ... Hay ch q' a'

Meeting Location: Council Chambers, 1801B Beaufort Avenue, Comox

Call to Order: 5:30 p.m.

Adoption of the Agenda

1. DELEGATIONS:

- (59) a. [Nick and Katie Brady \(Homeowners of 600 Pritchard Road\) DVP 18-2](#)
- (71) b. [Lauren Lan \(Neighbour of Guthrie & Lazo Intersection\) DVP 17-5](#)
- c. [Derek Jensen \(McElhanney Consulting Services\) DVP 17-5](#)
- (189) d. [Neil Banich & Don Camron \(1700 Balmoral Avenue\) RZ 17-9](#)

2. MINUTES OF MEETINGS:

- (15) a. [Regular Council Meeting Minutes](#)
That the Minutes of the Regular Meeting of Council, held in Council Chambers on Wednesday May 2, 2018, be Approved.
- (19) b. [Committee of the Whole Meeting Minutes](#)
That the Minutes of the Committee of the Whole Meeting, held in Council Chambers on Wednesday May 9, 2018, be Received.

COMMITTEE RECOMMENDATIONS:

- (1) [Comox Valley Rocks for Kids - Request for Reimbursement of Fees](#)
That the Marina Park Facility booking fees for the Comox Valley Rocks for Kids event on June 9, 2018 be reimbursed.
- (21) c. [Special Council Meeting Minutes](#)
That the Minutes of the Special Council Meeting, held in Council Chambers on Wednesday May 9, 2018, be Approved.

3. COMMITTEE REPORTS: NIL

TOWN OF COMOX

REGULAR COUNCIL MEETING AGENDA OF WEDNESDAY MAY 16, 2018

4. UNFINISHED BUSINESS:

- (23) a. [Management Report - May 16, 2018](#)
That the Management Report for May 16, 2018 be received and filed for information.

5. SPECIAL REPORTS:

- (25) a. [Comox Valley Regional District Meeting Minutes](#)
That the following Comox Valley Regional District meeting minutes be received for information:
 -Comox Valley Regional District Board held on Tuesday, March 27, 2018.
 -Comox Valley Regional District Board held on Thursday, March 29, 2018.
 -Comox Valley Regional District Board held on Tuesday, April 10, 2018.
 -Comox Valley Regional District Board held on Tuesday, April 24, 2018.
 -Comox Valley Regional District (Comox Strathcona Waste Management) Board held on Thursday, April 19, 2018.
 -Comox Strathcona Regional Hospital District Board held on Thursday, April 19, 2018.

6. BYLAWS:

- (55) a. [Bylaw 1885: Comox Council Procedure Bylaw Amendment No. 3, 2018](#)
That Bylaw 1885: Comox Council Procedure Bylaw Amendment No. 3, 2018 be Adopted.

7. NEW BUSINESS:

- (59) a. [Development Variance Permit Application: DVP 18-2 \(600 Pritchard Road\)](#)
That Development Variance Permit DVP 18-2 be issued subject to the Development Variance Permit conditions listed in Schedule 1 of the May 16, 2018 Planning Report on DVP 18-2.
- (71) b. [Development Variance Permit Application: DVP 17-5 South-West Corner of Guthrie & Lazo Road Intersection](#)
That Development Variance Permit DVP 17-5 be issued subject to the Development Variance Permit Conditions listed in Schedule 1 of the May 16, 2018 Planning Report on DVP 17-5.
- (189) c. [Rezoning Application: RZ 17-9 Development Permit Application: DP 17-7 \(1700 Balmoral Avenue\)](#)
 1. *That Comox Zoning Amendment Bylaw 1877 be given First and Second Reading.*
 2. *That Comox Phased Development Agreement authorization Bylaw 1878: 1700 Balmoral Avenue be given First and Second Reading; and*
 3. *That a Public Hearing in respect of bylaw 1877 and 1878, and discharge of Restrictive covenants FB122070 and FB122076 be scheduled for June 6, 2018 at d'Esterre House, 1801 Beaufort Avenue, at 7:00 pm and staff be instructed to publish the requisite notices, as required by the Local government Act.*

8. CORRESPONDENCE:

- (471) a. [Scott Park \(Highland Senior Secondary\) Highland Grad Cruise - 2018](#)
- (473) b. [Bobbi Howard-Muir \(Camp Boomer\) BC Bike Ride](#)
- (475) c. [Alfred Albrecht - Support for DVP 17-5](#)

TOWN OF COMOXREGULAR COUNCIL MEETING AGENDA OF WEDNESDAY MAY 16, 2018

(477) d. [Norma Brown - Support for DVP 18-2](#)

9. LATE ITEMS: NIL

10. DELEGATIONS: NIL

11. REPORTS FROM MEMBERS OF COUNCIL:

12. MEDIA QUESTION PERIOD:

13. PUBLIC QUESTION PERIOD:

14. EXCLUDE THE PUBLIC:

ADJOURNMENT

Deputy Corporate Administrator



REQUEST TO APPEAR AS A DELEGATION

TOWN OF COMOX
1809 Beaufort Avenue Ph: (250) 339-2202
Comox BC V9M 1R9 Fx: (250) 339-7110

A1 A2 A3
RECEIVED

May 9, 2018

TOWN OF COMOX

REQUESTS TO APPEAR BEFORE COUNCIL OR THE COMMITTEE OF THE WHOLE MUST BE
SUBMITTED NO LATER THAN THURSDAY NOON, THE WEEK PRIOR TO THE MEETING

Name(s) of person(s) speaking: Nick and Katie Brady home owners,
possibly Bruce Manson-Draftsman @ Bird's Eye View Drafting

Organization you are representing: n/a

Primary purpose of Organization: _____ Number of members: _____

Mailing address: 600 Pritchard Road

City: Comox Postal Code: V9M 3J9

Contact name: Katie Email: kate2brady@gmail.com

Phone: 250 334 6843 Fax: _____

Subject matter: Development Variance Permit Application No. DVP 18-2

We are appearing in response to our application which goes before Council May 16 2018. We are
making ourselves available to answer any questions the town may have regarding our application.

Specific request of Council, if any (i.e., letter of support, funding): _____

Requested meeting and date: May 16, 2018 5:30 pm

Audio-visual equipment required: no

Date of application: May 9 2018 Signature of applicant: Katie Brady

Please Note: or Print Name: Katie Brady

1. Regular Council Meetings start at 5:30 p.m., while Committee of the Whole Meetings start at 4:15 p.m. Delegations are dealt with at the beginning of each meeting.
2. Maximum presentation time is 10 minutes including questions, unless previously approved by the Chair.
3. Presenters are to address Council or the Committee of the Whole, and not the audience
4. All presentation materials/handouts must be submitted no later than Thursday noon, the week prior to the meeting. If the Friday prior to the meeting is a statutory holiday, then presentation materials must be submitted by Wednesday noon.
5. Please ensure that your cell phone is turned OFF during the meeting.

LOG: 18-109	REFER:	AGENDA: RCM - May 16
FILE: DVP 18-2	ACTION: Planning	

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RECEIVED**REQUEST TO APPEAR AS A DELEGATION**

April 20, 2018

TOWN OF COMOX

1809 Beaufort Avenue Ph: (250) 339-2202
Comox BC V9M 1R9 Fx: (250) 339-7110**TOWN OF COMOX**

REQUESTS TO APPEAR BEFORE COUNCIL OR THE COMMITTEE OF THE WHOLE MUST BE
SUBMITTED NO LATER THAN THURSDAY NOON, THE WEEK PRIOR TO THE MEETING

Name(s) of person(s) speaking: Lauren LanOrganization you are representing: N/A. I am the direct neighbour of DVP17-5Primary purpose of Organization: N/A Number of members: N/AMailing address: 580B Stickleback RdCity: Comox Postal Code: V9M4H8Contact name: Lauren Lan Email: lan_lauren@yahoo.caPhone: 250-941-4290 Fax: _____Subject matter: I have questions regarding DVP17-5.

Specific request of Council, if any (i.e., letter of support, funding): _____

Requested meeting and date: April 18thAudio-visual equipment required: NoDate of application: April 10, 2018 Signature of applicant: _____**Please Note:** or Print Name: Lauren Lan

1. Regular Council Meetings start at 5:30 p.m., while Committee of the Whole Meetings start at 4:15 p.m. Delegations are dealt with at the beginning of each meeting.
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LOG: <u>18-095</u>	REFER:	AGENDA:
FILE: <u>DVP 17-5</u>	ACTION: <u>Planning</u>	<u>RCM - May 2 '18</u>

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REQUEST TO APPEAR AS A DELEGATION

May 9, 2018

TOWN OF COMOX

1809 Beaufort Avenue Ph: (250) 339-2202
Comox BC V9M 1R9 Fx: (250) 339-7110

TOWN OF COMOX

REQUESTS TO APPEAR BEFORE COUNCIL OR THE COMMITTEE OF THE WHOLE MUST BE
SUBMITTED NO LATER THAN THURSDAY NOON, THE WEEK PRIOR TO THE MEETING

Name(s) of person(s) speaking: Derek Jensen

Organization you are representing: McElhanney Consulting

Primary purpose of Organization: Engineering Number of members: 1

Mailing address: 495 Sixth Street

City: Courtenay, BC Postal Code: V9N 6V4

Contact name: Derek Jensen Email: djensen@mcelhanney.com

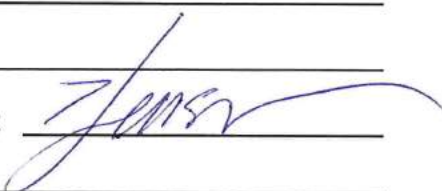
Phone: 250-338-5495 Fax: _____

Subject matter: Pertaining to the proposed residential development at Guthrie/Lazo intersection.

Specific request of Council, if any (i.e., letter of support, funding): _____

Requested meeting and date: May 16, 2018

Audio-visual equipment required: no

Date of application: May 9, 2018 Signature of applicant: 

Please Note:

or Print Name: _____

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LOG: 18-111	REFER:	AGENDA: RCM May 16 '18
FILE: DVP 17-5	ACTION: Planning	

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REQUEST TO APPEAR AS A DELEGATION

TOWN OF COMOX

1809 Beaufort Avenue Ph: (250) 339-2202
Comox BC V9M 1R9 Fx: (250) 339-7110

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May 9, 2018

TOWN OF COMOX

REQUESTS TO APPEAR BEFORE COUNCIL OR THE COMMITTEE OF THE WHOLE MUST BE SUBMITTED NO LATER THAN THURSDAY NOON, THE WEEK PRIOR TO THE MEETING

Name(s) of person(s) speaking: Neil Banich, Don Camron

Organization you are representing: Wensley Architecture

Primary purpose of Organization: development team Number of members: 4

Mailing address: 301 1444 Albernei St.

City: Vancouver B.C. Postal Code: V6G 2Z4

Contact name: Neil Banich Email: nbanich@wensleyarch.com

Phone: 604 685 3529

Fax: _____

Subject matter: Presenting our proposed Project at 1700 Balmoral Ave.

Specific request of Council, if any (i.e., letter of support, funding): _____

Requested meeting and date: _____

Audio-visual equipment required: ability to plug in a thumb drive

Date of application: _____ Signature of applicant: _____

Please Note:

or Print Name: Neil Banich

1. Regular Council Meetings start at 5:30 p.m., while Committee of the Whole Meetings start at 4:15 p.m. Delegations are dealt with at the beginning of each meeting.
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3. Presenters are to address Council or the Committee of the Whole, and not the audience
4. All presentation materials/handouts must be submitted no later than Thursday noon, the week prior to the meeting. If the Friday prior to the meeting is a statutory holiday, then presentation materials must be submitted by Wednesday noon.
5. Please ensure that your cell phone is turned OFF during the meeting.

LOG: 18-110	REFER:	AGENDA: RCM May 16 '18
FILE: Planning	ACTION: File	

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TOWN OF COMOX
Minutes of the Regular Council Meeting,
held in Council Chambers on Wednesday May 2, 2018

Present: Mayor P. Ives
 Councillors R. Arnott, K. Grant, M. Grant
 H. MacKinnon, M. Swift

Absent: B. Price

Call to Order:

The meeting was called to order at 5:30 p.m.

The Agenda was Adopted.

There was 1 visitor in attendance.

1. DELEGATIONS: NIL

2. MINUTES OF MEETINGS:

a. Regular Council Meeting Minutes

RCM Minutes

That the Minutes of the Regular Meeting of Council, held in Council Chambers on Wednesday April 18, 2018, be Approved.

(2018.100) -- CARRIED

b. Committee of the Whole Meeting Minutes

COW Minutes

That the Minutes of the Committee of the Whole Meeting, held in Council Chambers on Wednesday April 25, 2018, be Received.

(2018.101) -- CARRIED

COMMITTEE RECOMMENDATIONS:

(1) Beckton Drive Parking

Beckton Drive Parking

That staff be directed to allow on-street parking on the north side of Beckton Drive between Deerwood Place and the 90 degree bend, in accordance with the Watt Consulting Group report dated April 6, 2018 and attached to the April 19, 2018 report from the Municipal Engineer titled "Beckton Drive Parking"; and further,

That staff be directed to allow one on-street parking space on Beckton Drive west of Deerwood Place.

(2018.102) -- CARRIED

(2) Council Procedure Bylaw

Council Procedure Bylaw

That the Comox Council Procedure Bylaw Amendment No. 3, 2018 be forwarded to Council for 1st, 2nd and 3rd Readings, following advertisement of the proposed amendments as per section 33 of Council's Procedure Bylaw No. 1614.

(2018.103) -- CARRIED

TOWN OF COMOX - REGULAR COUNCIL MEETING MINUTES

COMMITTEE RECOMMENDATIONS:

- (3) Request Referred to the Budget Process for Consideration: Request for \$8000 for Potlatch 67-67 event

Potlatch 67-67

That a grant of \$1000 be provided to the Potlatch 67-67 event.

(2018.104) -- CARRIED

[Opposed: Councillors KGrant MSwift]

3. COMMITTEE REPORTS: NIL

4. UNFINISHED BUSINESS:

a. Management Report - May 2, 2018

Management Report

That the Management Report for May 2, 2018 be received and filed for information.

(2018.105) -- CARRIED

5. SPECIAL REPORTS: NIL

6. BYLAWS:

a. Bylaw 1885: Comox Council Procedure Bylaw Amendment No. 3, 2018

Council Procedure Bylaw

That Bylaw No. 1885 (Comox Council Procedure Bylaw Amendment No. 3, 2018) be given First, Second and Third Readings.

(2018.106) -- CARRIED

b. 2018 Financial Plan and Tax Rates Bylaws

2018 Financial Plan and Tax Rates Bylaws

1. *That the Comox Financial Plan Bylaw, 2018 be given First, Second and Third Readings.*

(2018.107) -- CARRIED

2. *That the Comox Tax Rates Bylaw, 2018 be given First, Second and Third Readings.*

(2018.108) -- CARRIED

7. NEW BUSINESS:

a. Planning Report PR 18-4 / Extension of Comox Downtown Vitalization Program / Comox Downtown Revitalization Tax Exemption Amendment Bylaw 1883 / Comox Planning Procedures Amendment Bylaw 1884

Downtown Vitalization

1. *That Comox Downtown Revitalization Tax Exemption Amendment Bylaw 1883 be given First Reading;*

(2018.109) -- CARRIED

2. *That having given Comox Downtown Revitalization Tax Exemption Amendment Bylaw 1883 First Reading, having received the May 2, 2018 Planning Report on PR 18-4, and in accordance with Section 226(6)(b) of the Community Charter, Council has considered the bylaw in conjunction with the objectives and policies set out under Section 165(3.1)(c) of the Community Charter in its Financial Plan;*

(2018.110) -- CARRIED

3. *That Comox Downtown Revitalization Tax Exemption Amendment Bylaw 1883 be given Second and Third Readings, and*

(2018.111) -- CARRIED

TOWN OF COMOX - REGULAR COUNCIL MEETING MINUTES

- a. **Planning Report PR 18-4 / Extension of Comox Downtown Vitalization Program / Comox Downtown Revitalization Tax Exemption Amendment Bylaw 1883 / Comox Planning Procedures Amendment Bylaw 1884**

Downtown Vitalization

4. *That Comox Planning Procedures Amendment Bylaw 1884 be given First, Second and Third Readings.*

(2018.112) -- CARRIED

8. CORRESPONDENCE:

- a. **Susan Toresdahl (CV Airport Commission) Director Re-appointment**

CVAC Re-Appointment

That the April 12, 2018 letter from Susan Toresdahl of the Comox Valley Airport Commission, advising that Director Richard Clarke's term is due to expire September 30, 2018, be received; and further,

That Council concur with the recommendation of Mr. Clarke's reappointment to the Comox Valley Airport Commission Board.

(2018.113) -- CARRIED

- b. **Donald Thomas - Guthrie and Lazo Road notice**

Guthrie and Lazo Notice

That the April 9, 2018 email from Donald Thomas, inquiring about the April 3, 2018 Development Variance Permit notice for the southwest corner of Guthrie and Lazo Roads, be received and filed for information.

(2018.114) -- CARRIED

9. LATE ITEMS: NIL

10. DELEGATIONS: NIL

11. REPORTS FROM MEMBERS OF COUNCIL:

- a. **Councillor Swift**

Councillor Swift advised that she attended the sewer commission meeting and the Association of Vancouver Island and Coastal Communities conference. She also reviewed her attendance at the Filberg board meeting and advised that she participated in McHappy Day.

- b. **Councillor Arnott**

Councillor Arnott advised that he met on site with the proponent of a brew pub and that he attended the Snow to Surf event.

- c. **Councillor Ken Grant**

Councillor Grant advised that he attended the Association of Vancouver Island and Coastal Communities conference and an in-camera sports commission meeting.

- d. **Councillor Marg Grant**

Councillor Grant reviewed her attendance at the solid waste management board meeting. She also advised that she attended a hospital board meeting, the Seniors Association volunteer appreciation lunch, the northeast Comox stormwater management plan meeting and a sports centre meeting. Councillor Grant also advised that she participated in McHappy Day.

- e. **Councillor MacKinnon**

Councillor MacKinnon reviewed his attendance at a Homelessness Coalition meeting. He also advised that he attended the Snow to Surf event and the northeast Comox stormwater management plan meeting.

TOWN OF COMOX - REGULAR COUNCIL MEETING MINUTES

f. Mayor Ives

Mayor Ives advised that he attended the Vancouver Island Real Estate Board's commercial building awards, and advised of the twin sail buildings' two awards received. He also advised that he attended the Top 20 Under 40 Event and mentioned the local recipients of those awards. Mayor Ives also advised that he attended the northeast Comox stormwater management open house, had a conversation with one of the waste to energy proponents, participated in McHappy Day and attended a meeting with K'omoks First Nation member Mark Stevens.

14. EXCLUDE THE PUBLIC: NIL**Adjournment:**

Regularly moved and seconded that the meeting adjourn at 5:54

CARRIED

Certified correct pursuant to Section 97(1)(b) of the Community Charter.

MAYOR

CORPORATE OFFICER

TOWN OF COMOX
Minutes of the Committee of the Whole Meeting,
held in Council Chambers on Wednesday May 9, 2018

Present: Mayor P. Ives
 Councillors R. Arnott, M. Grant, H. MacKinnon,
 B. Price, M. Swift

Absent: K. Grant

Call to Order:

The meeting was called to order at 4:18 p.m.

The Agenda was Adopted.

1. Delegations:

a. Cory Vanderhorst (Meyers Norris Penny) - Town of Comox Audit Findings Report

Mr. Vanderhorst summarized the 2017 audit findings for the Town of Comox, including financial statement highlights, the draft audit report and audit findings report. He advised that the audit went really well and thanked staff and Council for their assistance. He identified that it was a clean audit, with no irregularities and no conflicts of interest. Mr. Vanderhorst stated that financial sustainability is healthy and trending in a positive direction, and that flexibility is steady. He also stated that the Town is not highly vulnerable to other funding sources and that the Town's vulnerability continues to trend lower.

b. Inspector Tim Walton (CV RCMP) - RCMP Year End Report

Inspector Walton provided crime statistics for 2017. He advised that once again Comox is a very safe community. He noted that theft is up in all categories, with offenders coming in from outside the community. Inspector Walton suggested that residents lock their vehicles, as theft from vehicles doubled over last year. He also advised that their priorities continue to be crime reduction, youth, community engagement and traffic safety.

c. Geoff Crawford, Lara Greasley & John Watson (Comox Valley Economic Development Society) 2018 Spring Update

John Watson provided a 2018 Spring update for the Committee. He advised that they are working with the Comox BIA to improve services in Comox, improve services for business and improve visitor services in Comox. He advised they are working with the Comox BIA in implementing a business ambassador pilot program in Comox. Mr. Watson noted that out-of-town visitor numbers at the Visitor Centre are up by 8% and that hotel tax is up 14%. Mr. Watson also discussed some of the exciting changes with respect to the Seafood Festival this year.

2. Minutes of Meetings: NIL

3. Department Reports: NIL

TOWN OF COMOX - COMMITTEE OF THE WHOLE MEETING MINUTES

4. Staff Reports:**a. Comox Valley Rocks for Kids - Request for Reimbursement of Fees****COMMITTEE RECOMMENDATION:**

That the Marina Park Facility booking fees for the Comox Valley Rocks for Kids event on June 9, 2018 be reimbursed.

CARRIED

b. Downtown Traffic Intersections

The May 3, 2018 Report from the Municipal Engineer, titled "Downtown Traffic Intersections", was received for information.

5. Correspondence: NIL**6. Exclude the Public:****a. Exclude the Public**

That, pursuant to section 127 of the Community Charter, notice is hereby given that the Public be Excluded from the Special In-Camera Meeting of Council on Wednesday May 9, 2018, pursuant to the following sub-sections of the Community Charter:

90(1)(b) personal information about an identifiable individual who is being considered for a municipal award or honour, or who has offered to provide a gift to the municipality on condition of anonymity.

CARRIED

Adjournment:

Regularly moved and seconded that the meeting adjourn at 5:20 p.m.

CARRIED

Certified correct pursuant to Section 97(1)(b) of the Community Charter.

CHAIR

TOWN OF COMOX
Minutes of the Special Council Meeting,
held in Council Chambers on Wednesday May 9, 2018

Present: Mayor P. Ives
 Councillors R. Arnott, , M. Grant, H. MacKinnon,
 B. Price, M. Swift

Absent: K. Grant

Call to Order:

The meeting was called to order at 4:15 p.m.

The Agenda was Adopted.

There was 1 visitor in attendance.

1. 2018 FINANCIAL PLAN AND TAX RATES BYLAWS:

a. Comox Financial Plan Bylaw, 2018

2018 Financial Plan Bylaw

That the Comox Financial Plan Bylaw, 2018 be Adopted.

(2018.115) -- CARRIED

b. Comox Tax Rates Bylaw, 2018

2018 Tax Rates Bylaw

That the Comox Tax Rates Bylaw, 2018 be Adopted.

(2018.116) -- CARRIED

2. STAFF REPORTS:

A. 2017 Draft Financial Statements

2017 Draft Financial Statements

That the Draft 2017 Annual Financial Statements be received and approved.

(2018.117) -- CARRIED

3. CORRESPONDENCE:

a. Tina Lutz (Heart & Stroke Foundation of BC & Yukon) 2018 Heart and Stroke Big Bike Event

Big Bike Event

That the April 12, 2018 email from Tina Lutz of the Heart and Stroke Foundation of BC & Yukon, requesting to hold their Big Bike Event in Comox on Wednesday May 23, 2018, be received and permission granted.

(2018.118) -- CARRIED

Adjournment:

Regularly moved and seconded that the meeting adjourn at 4:17 p.m.

CARRIED

Certified correct pursuant to Section 97(1)(b) of the Community Charter.

MAYOR

CORPORATE OFFICER

TOWN OF COMOX – MANAGEMENT REPORT
May 16, 2018

Item	DATE ADDED	SUBJECT	COUNCIL DIRECTION	STATUS
1.	Mar 7, 2007	Organic Waste Collection Service	Investigate the provision of an Organic Waste Collection Service in Comox-Courtenay	Pilot project extended until the end of 2018 Organics collection for 2017 overall climbed slightly by 3.5%. Residents on average diverted a total of 124 kg per capita during the year, compared to 119 kg 2016. As per Council's Strategic Plan, staff will be looking at the feasibility of increasing organics collection by reducing the frequency of garbage collection this year.
2.	Aug 20, 2014	Fixed Wing Search and Rescue Training Facility	Investigate the feasibility of financial and other incentives that would support the selection of 19 Wing Comox.	Grant-in-aid provided to 19 Wing Comox as an incentive to develop a training facility at CFB Comox.
3.	Jan 18, 2017	Northeast Comox Storm Water Management Plan	Completion of Northeast Comox Storm Water Management Plan	Stakeholder and public meeting held April 26.
4.	Jan 18, 2017	Mack Laing Trust	That staff be directed to begin the process to modify, if necessary, the terms of the Trust.	Hearing held April 17 in Nanaimo, and deferred until week of May 28.
7.	August 2, 2017	Wayfinding Signage	Develop wayfinding signage standards, prototypes and implement Phase 1 signage	Presentation to Council mid-June. Project completion anticipated by mid-August.

Note: Shaded items will be removed from the Management Report unless otherwise directed by Council.

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COMOX VALLEY REGIONAL DISTRICT BOARD

Tuesday, March 27, 2018

**Minutes of the meeting of the Comox Valley Regional District Board of Directors held on Tuesday, March 27, 2018
in the boardroom of the Comox Valley Regional District offices located at 550B Comox Road, Courtenay, BC
commencing at 4:02 pm.**

MINUTES

Present:

Chair:	B. Jolliffe	Baynes Sound-Denman/Hornby Islands (Area 'A')
Vice-Chair:	B. Wells	City of Courtenay
Directors:	E. Eriksson	City of Courtenay
	E. Grieve	Puntledge/Black Creek (Area 'C')
	L. Jangula	City of Courtenay
	R. Nichol	Lazo North (Area 'B')
	B. Price	Town of Comox
	G. Sproule	Village of Cumberland
	M. Theos	City of Courtenay
	K. Grant	Town of Comox
Staff:	R. Dyson	Chief Administrative Officer
	B. Dunlop	Corporate Financial Officer
	A. MacDonald	General Manager of Planning and Development Services
	K. La Rose	Acting Manager of Engineering Services
	I. Smith	General Manager of Community Services
	J. Warren	General Manager of Corporate Services
	J. Bradley	Executive Manager of Human Resources

ATTENDANCE:

Director Wells was not in attendance when the meeting was called to order.

RECOGNITION OF TRADITIONAL TERRITORIES:

The Chair acknowledged that the meeting was being held on the unceded traditional territory of the K'ómoks First Nation.

IN-CAMERA MEETING:

E. Grieve/K. Grant: THAT the board adjourn to a restricted in-camera session pursuant to the following sub-section of section 90 of the Community Charter:

90(1)(a) Personal information about an identifiable individual who holds or is being considered for a position as an officer, employee or agent of the regional district or another position appointed by the regional district;

AND FINALLY THAT the restricted in-camera portion convene immediately following the open portion of the meeting.

208

Carried

ADOPTION OF MINUTES:

K. Grant/G. Sproule: THAT the Comox Valley Regional District Board minutes dated February 27, 2018 be adopted.

208

Carried

REPORTS:

ELECTORAL AREA SERVICES COMMITTEE - MARCH 5, 2018

E. Grieve/M. Theos: THAT the Electoral Area Services Committee minutes dated March 5, 2018, be received.

208

Carried

E. Grieve/B. Price: THAT the board approve the Development Variance Permit DV 1C 18 (Walker/Bruton) to decrease the minimum front yard setback from 7.5 metres to 7.0 metres for a partially constructed single detached dwelling on a property described as Lot 1, Block 29, Comox District, Plan 25378, PID 002-913-623 (2422 and 2424 Catherwood Road);

AND FINALLY THAT the Corporate Legislative Officer be authorized to execute the permit.

208 and 213

Carried

R. Nichol/B. Price: THAT the board approve the Development Variance Permit DV 2C 18 (Mavronicolas / Barbera) to increase the height for an accessory building from 6.0 metres to 6.8 metres for a property described as Fractional East 1/2 of the North East 1/4 of Section 34, Township 6, Comox District, Plan 552-E, Except Part in Plans 24264, 27876 and 45386, PID 007-991-908 (542 and 544 Williams Beach Road);

AND FINALLY THAT the Corporate Legislative Officer be authorized to execute the permit.

208 and 213

Carried

E. Grieve/R. Nichol: THAT the Comox Valley Regional District Board endorse the agency referral list as outlined in Appendix A of staff report dated February 19, 2018, and direct staff to start the external agency referral process for Lot A, District Lot 136, Comox District, Plan 8418, PID 005-548-926 (4320 & 4356 Camco Road) as part of a proposed amendment (RZ 1C 18 - Wing) of Bylaw No. 2781, being the "Comox Valley Zoning Bylaw, 2005";

AND FINALLY THAT Comox Valley Regional District staff consult with First Nations in accordance with the referrals management program dated September 25, 2012.

208 and 213

Carried

B. Price/R. Nichol: THAT the Comox Valley Regional District Board endorse the agency referral list as outlined in Appendix B of staff report dated February 23, 2018, with the addition of the Agricultural Watershed Planning Advisory Committee, the Agricultural Advisory Planning Commission and Fisheries and Oceans Canada, and direct staff to start the external agency referral process for Lot C, Block 29, Comox District, Plan 25306, PID 002-904-713 (2410 Sackville Road) as part of a proposed amendment (RZ 2C 18 - MacKenzie & Heynck) of Bylaw No. 2781, being the "Comox Valley Zoning Bylaw, 2005";

AND FINALLY THAT Comox Valley Regional District staff consult with First Nations in accordance with the referrals management program dated September 25, 2012.

208 and 213

Carried

R. Nichol/E. Grieve: THAT the recommendation pertaining to the filing of a notice with the Land Title and Survey Authority of British Columbia against land legally described as Lot 3, Block 29, Comox District, Plan 19922, PID 003-643-654 (5862 Aldergrove Dr.) be referred to the April 9, 2018 Electoral Areas Services Committee meeting.

208 and 213

Carried

Director Wells entered the meeting at 4:06 pm.

K. Grant/B. Price: THAT proposed Bylaw No. 518 being “King Coho Fees and Charges Bylaw No. 518, 2018”, attached as Appendix A in the staff report dated March 2, 2018, be brought forward for the Comox Valley Regional District Board consideration upon acceptance of a utility transfer agreement

207

Carried

COMOX VALLEY SPORTS CENTRE COMMISSION - MARCH 6, 2018

K. Grant/M. Theos: THAT the Comox Valley Sports Centre Commission minutes dated March 6, 2018, be received.

208

Carried

COMMITTEE OF THE WHOLE - MARCH 6, 2018

K. Grant/G. Sproule: THAT the Committee of the Whole minutes dated March 6, 2018, be received.

208

Carried

The board was polled on the following motion:

K. Grant/B. Price: THAT the 4,000 annual service hour expansion of the conventional transit system scheduled for September 2018 be implemented as described in the BC Transit Service Change Plan attached to this staff report dated February 27, 2018.

209

Carried

E. Grieve/B. Price: THAT as a result of a competitive process, a contract be awarded to Pacific Blue Cross for the provision of administering employee benefits at the Comox Valley Regional District for a one year period with options to renew on a yearly basis.

210

Carried

E. Eriksson/E. Grieve: THAT staff be directed to report back with a report that considers extending coverage for health and dental benefits for people 70 years old and over.

208

Carried

K. Grant/B. Wells: THAT the board provide a letter of support to the Regional District of Nanaimo with respect to proposed minor amendment process for the Regional Growth Strategy Bylaw No. 1615, forwarded by the Regional District of Nanaimo on March 1, 2018.

208

Carried

PUBLIC HEARING MINUTES - BYLAW NO. 505 (UPPER ISLAND DEVELOPMENT)

K. Grant/B. Wells: THAT the public hearing minutes dated March 22, 2018 for Bylaw No. 505 being "Comox Valley Zoning Bylaw, 2005, Amendment No. 72" (Upper Island Development - 5819 Tipton Road), be received.

208 and 213

Carried

COMOX VALLEY WATER TREATMENT PROJECT - ALTERNATIVE APPROVAL PROCESS

B. Wells/K. Grant: THAT the report dated March 22, 2018 providing the results of the alternative approval process (AAP) that was conducted to seek elector approval for Bylaw No. 504 being "Comox Valley Water Treatment Project Loan Authorization Bylaw No. 504, 2017", be received.

208

Carried

James Warren, General Manager of Corporate Services, presented information regarding the results of the alternative approval process (AAP) that was conducted to seek elector approval for Bylaw No. 504 being "Comox Valley Water Treatment Project Loan Authorization Bylaw No. 504, 2017.

CASH-IN-LIEU OF PARKLAND DEDICATION FOR A PROPOSED SUBDIVISION (2292 HAMM ROAD)

K. Grant/B. Wells: THAT the report dated March 22, 2018 to consider an option to accept cash-in-lieu of parkland dedication for parkland acquisition purposes for a four-lot subdivision proposal (2292 Hamm Road – Carr/Lewis), be received.

208 and 213

Carried

Ann MacDonald, General Manager of Planning and Development Services, presented information regarding an option to accept cash-in-lieu of parkland dedication for parkland acquisition purposes for a four-lot subdivision proposal (2292 Hamm Road – Carr/Lewis).

R. Nichol/B. Wells: THAT cash-in-lieu of parkland dedication in the amount of \$36,750 be accepted for the subdivision proposal (05171 C 17 – 2292 Hamm Road) pursuant to section 510 of the Local Government Act (LGA);

AND FINALLY THAT the cash-in-lieu payment of \$36,750 be deposited into the Baynes Sound, Areas B and C parks and greenways park acquisition reserve fund.

208 and 213

Carried

BYLAWS AND RESOLUTIONS:

K. Grant/E. Grieve: THAT Bylaw No. 515 being "Merville Fire Protection Service Establishment Bylaw No. 484, 2017, Amendment No. 2" be given first and second readings concurrently.

208

Carried

K. Grant/B. Price: THAT Bylaw No. 515 being "Merville Fire Protection Service Establishment Bylaw No. 484, 2017, Amendment No. 2" be read a third time.

208

Carried

K. Grant/B. Wells: THAT Bylaw No. 521 being "Rural Cumberland Fire Protection Service Establishment Bylaw No. 192, 2011, Amendment No. 3" be given first and second readings concurrently.

208

Carried

K. Grant/R. Nichol: THAT Bylaw No. 521 being "Rural Cumberland Fire Protection Service Establishment Bylaw No. 192, 2011, Amendment No. 3" be read a third time.

208

Carried

R. Nichol/B. Wells: THAT Bylaw No. 523 being "Comox Valley Regional District 2018 to 2022 Financial Plan and Capital Expenditure Program Bylaw No. 523" be given first and second readings concurrently.

210

Carried *NAY: L. Jangula, M.
Theos*

K. Grant/B. Wells: THAT Bylaw No. 523 being "Comox Valley Regional District 2018 to 2022 Financial Plan and Capital Expenditure Program Bylaw No. 523" be read a third time.

210

Carried *NAY: L. Jangula, M.
Theos*

E. Grieve/B. Price: THAT Bylaw No. 505 being "Comox Valley Zoning Bylaw, 2005, Amendment No. 72" (Upper Island Development - 5819 Tipton Road) be read a third time.

208 and 213

Carried

K. Grant/B. Wells: THAT Bylaw No. 504 being "Comox Valley Water Treatment Project Loan Authorization Bylaw No. 504, 2017" be adopted.

210

Carried

K. Grant/B. Wells: THAT Bylaw No. 516 being "Electoral Areas Parks Regulations Bylaw No. 103, 2010, Amendment No. 5" be adopted.

209

Carried

K. Grant/B. Wells: THAT Bylaw No. 517 being "Comox Valley Regional District Municipal Ticket Information Bylaw No. 104, 2010, Amendment No. 11" be adopted.

209

Carried

ADJOURN TO RESTRICTED IN-CAMERA:

The board adjourned to a restricted in-camera session.

Time: 4:34 pm

The board rose from its restricted in-camera session at 5:06 pm.

TERMINATION:

B. Wells/B. Price: THAT the meeting terminate.

208

Carried

Time: 5:06 pm.

Confirmed this 24th Day of April, 2018:

Bruce Jolliffe
Chair

Certified Correct and Recorded By:

James Warren

General Manager of Corporate Services



COMOX VALLEY REGIONAL DISTRICT BOARD

Thursday, March 29, 2018

Minutes of the meeting of the Comox Valley Regional District Board of Directors held on Thursday, March 29, 2018 in the boardroom of the Comox Valley Regional District offices located at 550B Comox Road, Courtenay, BC commencing at 4:00 pm.

MINUTES

Present:

Chair:	B. Jolliffe	Baynes Sound-Denman/Hornby Islands (Area 'A')
Directors:	E. Eriksson	City of Courtenay
	E. Grieve	Puntledge/Black Creek (Area 'C')
	L. Jangula	City of Courtenay
	R. Nichol	Lazo North (Area 'B')
	B. Price	Town of Comox
	G. Sproule	Village of Cumberland
	M. Theos	City of Courtenay
	K. Grant	Town of Comox
Staff:	R. Dyson	Chief Administrative Officer
	B. Dunlop	Corporate Financial Officer
	A. Mullaly	Acting General Manager of Planning Services
	K. La Rose	Acting General Manager of Engineering Services
	I. Smith	General Manager of Community Services
	J. Warren	General Manager of Corporate Services

Absent:

Vice-Chair:	B. Wells	City of Courtenay

RECOGNITION OF TRADITIONAL TERRITORIES:

The Chair acknowledged that the meeting was being held on the unceded traditional territory of the K'ómoks First Nation.

REPORTS:

2017 FINANCIAL STATEMENTS AND AUDITOR'S REPORT TO THE BOARD OF DIRECTORS

E. Grieve/K. Grant: THAT the report dated March 19, 2018 regarding the 2017 financial statements and the auditor's report to the Board of Directors; and

208

- Financial statements for the year ended December 31, 2017; and

- Supplementary financial information for the year ended December 31, 2017 (unaudited), be received.

208

Carried

Beth Dunlop, Corporate Financial Officer, and Cory Vanderhorst, MNP LLP, presented information on the 2017 financial statements and the audit findings report to the board.

R. Nichol/B. Price: THAT the financial statements of the Comox Valley Regional District for the year ended December 31, 2017 be approved.

208

Carried

BYLAWS AND RESOLUTIONS:

E. Grieve/R. Nichol: THAT Bylaw No. 523 being "Comox Valley Regional District 2018 to 2022 Financial Plan and Capital Expenditure Program Bylaw No. 523" be adopted.

210

Carried *NAY: L. Jangula, M.
Theos*

TERMINATION:

R. Nichol/G. Sproule: THAT the meeting terminate.

208

Carried

Time: 4:55 p.m.

Confirmed this 24th Day of April, 2018:

Bruce Jolliffe
Chair

Certified Correct and Recorded By:

James Warren
General Manager of Corporate Services



COMOX VALLEY REGIONAL DISTRICT BOARD

Tuesday, April 10, 2018

Minutes of the meeting of the Comox Valley Regional District Board of Directors held on Tuesday, April 10, 2018 in the boardroom of the Comox Valley Regional District offices located at 550B Comox Road, Courtenay, BC commencing at 10:31 am.

MINUTES

Present:

Chair:	B. Jolliffe	Baynes Sound-Denman/Hornby Islands (Area 'A')
Directors:	E. Eriksson	City of Courtenay
	E. Grieve	Puntledge/Black Creek (Area 'C')
	L. Jangula	City of Courtenay
	R. Nichol	Lazo North (Area 'B')
	B. Price	Town of Comox
	G. Sproule	Village of Cumberland
	M. Theos	City of Courtenay
Alt. Director:	M. Swift	Town of Comox
Staff:	J. Bradley	Executive Manager of Human Resources
	R. Dyson	Chief Administrative Officer
	J. Warren	General Manager of Corporate Services

Absent:

Vice-Chair:	B. Wells	City of Courtenay

RECOGNITION OF TRADITIONAL TERRITORIES:

The Chair acknowledged that the meeting was being held on the unceded traditional territory of the K'ómoks First Nation.

IN-CAMERA MEETING:

M. Theos/B. Price: THAT the Board adjourn to a restricted in-camera session pursuant to the following subsection of section 90 of the Community Charter:

90(1)(a) Personal information about an identifiable individual who holds or is being considered for a position as an officer, employee or agent of the regional district or another position appointed by the regional district.

208

Carried

RISE AND REPORT:

The Board rose from its restricted in-camera session at 11:07 am.

TERMINATION:

M. Theos/G. Sproule: THAT the meeting terminate.

208

Carried

Time: 11:07 am.

Confirmed this 24th Day of April, 2018:

Bruce Jolliffe
Chair

Certified Correct and Recorded By:

James Warren
General Manager of Corporate Services



COMOX VALLEY REGIONAL DISTRICT BOARD

Tuesday, April 24, 2018

Minutes of the meeting of the Comox Valley Regional District Board of Directors held on Tuesday, April 24, 2018 in the boardroom of the Comox Valley Regional District offices located at 550B Comox Road, Courtenay, BC commencing at 3:30 p.m.

MINUTES

Present:

Chair:	B. Jolliffe	Baynes Sound-Denman/Hornby Islands (Area 'A')
Vice-Chair:	B. Wells	City of Courtenay
Directors:	E. Eriksson	City of Courtenay
	E. Grieve	Puntledge/Black Creek (Area 'C')
	L. Jangula	City of Courtenay
	R. Nichol	Lazo North (Area 'B')
	B. Price	Town of Comox
	M. Theos	City of Courtenay
	K. Grant	Town of Comox
Alt. Directors:	J. Ketler	Village of Cumberland
Staff:	R. Dyson	Chief Administrative Officer
	B. Dunlop	Corporate Financial Officer
	D. Mirabelli	Acting General Manager of Planning and Development Services
	M. Rutten	General Manager of Engineering Services
	J. Warren	General Manager of Corporate Services

A Portion of the Meeting:

Directors:	B. Leigh	Oyster Bay – Buttle Lake (Area 'D')

ATTENDANCE:

Director Leigh and Director Theos were not in attendance when the meeting was called to order.

RECOGNITION OF TRADITIONAL TERRITORIES:

The Chair acknowledged that the meeting was being held on the unceded traditional territory of the K'ómoks First Nation.

IN-CAMERA:

K. Grant/B. Wells: THAT the board adjourn to an in-camera session pursuant to the following sub-sections of section 90 of the Community Charter:

90(1)(a) Personal information about an identifiable individual who holds or is being considered for a position as an officer, employee or agent of the regional district or another position appointed by the regional district;

90(1)(j) Information that is prohibited, or information that if it were presented in a document would be prohibited from disclosure under section 21 of the Freedom of Information and Protection of Privacy Act.

208

Carried

The board adjourned to its in-camera session at 3:31 p.m.

RISE AND RECONVENE:

The board rose from its in-camera session at 3:54 p.m., recessed, and reconvened the open meeting at 4:00 p.m.

Director Leigh and Director Theos were in attendance when the open meeting resumed.

ADOPTION OF MINUTES:

B. Wells/B. Price: THAT the following minutes be adopted:

- Comox Valley Regional District Board minutes dated March 27, 2018;

- Comox Valley Regional District Board minutes dated March 29, 2018; and

- Comox Valley Regional District Board minutes dated April 10, 2018.

208

Carried

REPORTS:**COMOX VALLEY REGIONAL DISTRICT 2017 ANNUAL REPORT**

K. Grant/E. Grieve: THAT the Comox Valley Regional District 2017 Annual Report be received.

208

Carried

R. Dyson, Chief Administrative Officer, provided an overview of the Comox Valley Regional District 2017 Annual report.

MINISTRY OF FORESTS, LANDS, NATURAL RESOURCE OPERATIONS AND RURAL DEVELOPMENT - COAL HILLS REMEDIATION

Duncan Williams, Executive Director, Crown Land Opportunities and Restoration Branch, presented information regarding the Coal Hills remediation in Union Bay.

VARY THE AGENDA

E. Grieve/M. Theos: THAT the agenda be varied to bring agenda items F.7, G.6, G.12 and G.13 relating to Black Creek - Oyster Bay services forward on the agenda.

Carried

BLACK CREEK - OYSTER BAY SERVICES COMMITTEE - APRIL 16, 2018

B. Leigh/E. Grieve: THAT the Black Creek - Oyster Bay Services Committee minutes dated April 16, 2018 be received.

208

Carried

B. Leigh/E. Grieve: THAT the draft Bylaw No.519 being "Black Creek – Oyster Bay Water Conservation Bylaw No.519, 2018", as attached to the staff report dated April 12, 2018, be adopted with the following changes incorporated:

- replacing "Strathcona Regional District (SRD)" in the first whereas clause with "Oyster River"; and
- removing the definition for 'local government';

AND FURTHER THAT Bylaw No.104 being "Municipal Ticket Information Bylaw No.104, 2010" be amended to reflect the new Black Creek – Oyster Bay Water Conversation Bylaw.

209

Carried

E. Grieve/B. Leigh: THAT the Comox Valley Regional District send a letter to the Strathcona Regional District Board requesting approval to complete installation of a new production well in the Oyster River Nature Park by March 31, 2019 to ensure the Clean Water and Wastewater Fund grant can be fully utilized, and the current water capacity concerns of the Black Creek Oyster Bay Water Service can be resolved prior to summer 2019.

209

Carried

B. Leigh/E. Grieve: THAT a letter be sent to the province regarding the proposed development of a new production well within the Oyster River Nature Park for the Black Creek - Oyster Bay Local Water Service and requesting clarification of the authorities for such works in respect of the crown land grant for the park and the letters patent issued by province.

209

Carried

B. Leigh/E. Grieve: THAT Bylaw No. 357 being "Black Creek – Oyster Bay Fire Protection Service Regulations Bylaw No. 357, 2014" be amended to provide for the regulation of high risk activities.

AND FURTHER THAT Bylaw No. 104 being "Municipal Ticket Information Bylaw No. 104, 2010" be amended to establish fines for the regulation of high-risk activities as outlined in the staff report dated March 29, 2018.

209

Carried

E. Grieve/B. Leigh: THAT Bylaw No. 528 being "Black Creek - Oyster Bay Fire Protection Service Regulations Bylaw No. 357, 2014, Amendment No. 1" be given first and second readings concurrently.

209

Carried

B. Leigh/E. Grieve: THAT Bylaw No. 528 being "Black Creek - Oyster Bay Fire Protection Service Regulations Bylaw No. 357, 2014, Amendment No. 1" be read a third time.

209

Carried

B. Wells/B. Price: THAT Bylaw No. 534 being "Comox Valley Regional District Municipal Ticket Information Bylaw No. 104, 2010, Amendment No. 12" be given first and second readings concurrently.

209

Carried

E. Grieve/B. Wells: THAT Bylaw No. 534 being “Comox Valley Regional District Municipal Ticket Information Bylaw No. 104, 2010, Amendment No. 12” be read a third time.

209

Carried

E. Grieve/B. Leigh: THAT Bylaw No. 519 being “Black Creek – Oyster Bay Water Conservation Bylaw No. 519, 2018” be given first and second readings concurrently.

209

Carried

B. Leigh/E. Grieve: THAT Bylaw No. 519 being “Black Creek – Oyster Bay Water Conservation Bylaw No. 519, 2018” be amended at second reading by:

- replacing "Strathcona Regional District (SRD)" in the first whereas clause with "Oyster River"; and
- removing the definition for 'local government'.

209

Carried

B. Leigh/E. Grieve: THAT Bylaw No. 519 being “Black Creek – Oyster Bay Water Conservation Bylaw No. 519, 2018” be read a third time as amended.

209

Carried

E. Grieve/B. Leigh: THAT Bylaw No. 519 being “Black Creek – Oyster Bay Water Conservation Bylaw No. 519, 2018” be adopted.

209

Carried

Note: the above resolution received at least 2/3 of the votes cast.

Director Leigh left the meeting at 4:35 p.m.

ELECTORAL AREAS SERVICES COMMITTEE - APRIL 9, 2018

K. Grant/B. Wells: THAT the Electoral Areas Services Committee minutes dated April 9, 2018 be received.

208

Carried

K. Grant/B. Wells: THAT the board approve the Development Variance Permit DV 2A 18 (Gardner/Watts) to increase the maximum permitted height for a carriage house from 7.0 metres to 7.5 metres for property described as Lot 2, Section 6, Nelson District, Plan VIP81799, PID 026-819-678 (344 Bray Road);

AND FINALLY THAT the Corporate Legislative Officer be authorized to execute the permit once the covenanted area encroaching into the proposed location of the carriage house is removed or relocated elsewhere on the property.

208 and 213

Carried

K. Grant/B. Wells: THAT the board approve the Development Permit DP 7A 18 (Kingfisher Oceanside Resort & Spa Ltd.) on the property described as Lot B, District Lot 10, Nelson District, Plan VIP66171, PID 023-933-607 (4324 & 4330 Island Highway South) for the renovation of the south wing of the resort building;

FURTHER THAT the board approve Development Variance Permit DV 4A 18 (Kingfisher Oceanside Resort & Spa Ltd.) on the property described as Lot B, District Lot 10, Nelson District, Plan VIP66171, PID 023-933-607 (4324 & 4330 Island Highway South) to vary the following:

- a. To reduce the minimum side yard setback of the south wing of the resort building from 3.5 metres to 0.3

metres;

- b. To reduce the minimum side yard setback of the eaves of the south wing of the resort building from 1.75 metres to 0.1 metres; and
- c. To increase the maximum building height of the south wing of the resort building at 0.3 metres side yard setback (excluding the eaves) from 8.0 metres to 9.3 metres;

AND FINALLY THAT the Corporate Legislative Officer be authorized to execute the permits.
208 and 213

Carried

E. Grieve/B. Wells: THAT the board approve the Development Permit DP 3B 18 (Fortis Energy BC) on the property described as that part of Lot 2 District Lots 229 and 239, Comox District, Plan VIP85435 included within Plan EPP78295, PID 030-330-327 (1700 Ryan Road E) for the development of a utility building and related works;

AND FURTHER THAT the Corporate Legislative Officer be authorized to execute the permit.
208 and 213

Carried

E. Grieve/R. Nichol: THAT the Comox Valley Regional District Board endorse the agency referral list as outlined in Appendix A of staff report dated March 27, 2018, 2018, and direct staff to start the external agency referral process for Lot C, Block 29, Comox District, Plan 32630, PID 000-168-882 (Thomas) as part of a proposed amendment (RZ 1B 18) of Bylaw No. 2781, being the "Comox Valley Zoning Bylaw, 2005";

AND FINALLY THAT Comox Valley Regional District staff consult with First Nations in accordance with the referrals management program dated September 25, 2012.
208 and 213

Carried

E. Grieve/B. Wells: THAT the board give first and second readings to Bylaw No. 522, being the "Comox Valley Zoning Bylaw, 2005, Amendment No. 73" which rezones the southern half of Lot 1, District Lot 114, Comox District, Plan 2280, PID 006-412-335 (1671, 1673 and 1675 Ryan Road East, Lenco Development Ltd., Fernco Development Ltd., and Norco Development Ltd.) from Country Residential One (CR-1) to Industrial Light (IL);

AND FINALLY THAT pursuant to Section 464(1) of the Local Government Act (RSBC, 2015, c.1), the board schedule a public hearing for Bylaw No. 522, being the "Comox Valley Zoning Bylaw, 2005, amendment No. 73" (RZ 1B 17).
208 and 213

Carried

B. Wells/E. Grieve: THAT pursuant to Section 57 of the Community Charter, the board approves filing a notice with the Land Title and Survey Authority of British Columbia against land legally described as Lot 3, Block 29, Comox District, Plan 19922, PID 003-643-654 (5862 Aldergrove Dr.), for failure to comply with Building Bylaw No. 142, being the Comox Valley Regional District Building Bylaw No. 142, 2011".
209

Carried

K. Grant/B. Wells: THAT the greater Comox Valley Water Local Service Area (Function 305) expansion / merger to include the five other local service areas being Sandwich (306), Greaves (309), Arden (311), England (314) and Marsden/Camco (317) be implemented by:

- Applying all capital and operational activities for the Comox Valley water distribution services under the greater Comox Valley water distribution service effective January 1, 2019;
- Adopting a policy to equalize reserve funds in each distribution service by December 31, 2023;
- Transferring or utilizing equalized reserve funds for the greater Comox Valley service on a per connection basis (based on the connections for each service on January 1, 2018);
- Repealing original service establishment bylaws for Sandwich (306), Greaves (309), Arden (311), England

(314) and Marsden/Camco (317) when the associated debt for each service is retired and / or reserve funds are equalized for the greater Comox Valley water service;

- Updating or adopting parcel tax bylaws to facilitate the equalized reserve fund contributions and implementing a parcel tax for 'fixed costs' associated with delivering potable water; and
- Communicating the change in service configuration and financial impact associated with the reserve fund equalization and revenue generation for operating the service in summer and fall 2018.

AND FURTHER THAT the bylaws and policies described in Appendix A to the staff report dated April 3, 2018 be forwarded to the Comox Valley Regional District Board for implementation.

209

Carried

K. Grant/R. Nichol: THAT a contribution of \$10,000 be approved to the Kumugwe Cultural Society in support of the 67-67 Indigenous Art Showcase to be funded \$800 from the Heritage Conservation service for Baynes Sound – Denman/Hornby Islands (Electoral Area A), \$100 from the Heritage Conservation service for Denman Island (Electoral Area A), \$100 from the Heritage Conservation service for Hornby Island (Electoral Area A), \$5,000 from the Heritage Conservation service for Lazo North (Electoral Area B) and \$4,000 from the Heritage Conservation service for Puntledge – Black Creek (Electoral Area C).

208

Carried

K. Grant/B. Wells: THAT the following bylaws be amended to provide for the regulation of high risk activities during periods of extreme fire danger:

- Denman Island Fire Protection Service Regulation Bylaw No. 281, 2013;
- Hornby Island Fire Protection Service Regulation Bylaw No. 282, 2013;
- Fanny Bay Fire Protection Service Regulation Bylaw No. 283, 2013;
- Rural Cumberland Fire Service Bylaw No. 258, 2013; and
- Tsolum Farnham Fire Protection Service Regulations Bylaw No. 261, 2013.

AND FURTHER THAT Bylaw No. 104 being "Municipal Ticket Information Bylaw No. 104, 2010" be amended to establish fines for the regulation of high-risk activities as outlined in the staff report dated March 29, 2018.

209

Carried

R. Nichol/K. Grant: THAT the board endorse the Comox Valley Regional District submitting a request to Ministry of Forests, Lands, and Natural Resource Operations, to amend the provisions within the land grant document for the old Hornby Island fire hall dated January 24, 1972, Crown Grant No. 4503/1116, to allow for other community purposes.

207

Carried

K. Grant/B. Price: THAT upon approval by the Ministry of Forests, Lands, and Natural Resource Operations, the board approve entering into an agreement with the Hornby Island Spark Society for the conveyance of the old Hornby Island fire hall for the nominal consideration of ten-dollars (\$10.00)

AND FINALLY THAT the Chair and Corporate Legislative Officer be authorized to execute the agreement.

210

Carried

B. Wells/K. Grant: THAT staff proceed with hiring a consultant to complete a bridge feasibility study and, if deemed feasible, construction drawings for a pedestrian bridge crossing the Inland Island Highway on the Royston to Cumberland Trail.

209

Carried

K. Grant/B. Wells: THAT the board send a thank you letter to the Village of Cumberland for their financial

support of the design for the Royston to Cumberland Trail pedestrian bridge project.

209

Carried

E. Grieve/B. Wells: THAT the board consider three readings of an amendment to Bylaw No.1567 being the “Denman Island Water Local Service Area Conversion and Establishment Bylaw No.1567, 1993” to include three new properties, as indicated on the map provided as Appendix B, within the Denman Island Water Local Service Area;

AND FURTHER THAT the Electoral Area Director for Baynes Sound – Denman/Hornby Islands (Electoral Area A), as the participant in the Denman Island Water Local Service, consent to the amendment of the service establishment bylaw in writing;

AND FINALLY THAT the board consider adoption of the amending bylaw.

207

Carried

B. Wells/K. Grant: THAT the Board consider three readings of an amendment to Bylaw No. 1886, being the “Comox Valley Water Local Service Establishment (Conversion) Bylaw No. 1886, 1996” to include ALL THAT PART OF TOWNSHIP 9, COMOX DISTRICT, BEING UNNUMBERED BUT SHOWN ON PLAN 552G AS LYING BETWEEN SECTION 10 ON THE WEST, SECTION 14 ON THE NORTH, LOT 160, COMOX DISTRICT ON THE SOUTH EAST AND LOT 192 ON THE SOUTH WEST.

AND FURTHER THAT the directors for Electoral Areas ‘A’ (Baynes Sound – Denman/Hornby Islands), ‘B’ (Lazo North) and ‘C’ (Puntledge/Black Creek), as participants in the Comox Valley water local service, consent to the amendment of the service establishment bylaw in writing;

AND FINALLY THAT the board consider adoption of the amending bylaw.

208

Carried

SEWAGE COMMISSION - APRIL 10, 2018

E. Grieve/K. Grant: THAT the Sewage Commission minutes dated April 10, 2018 be received.

208

Carried

COMOX VALLEY WATER COMMITTEE - APRIL 10, 2018

K. Grant/B. Wells: THAT the Comox Valley Water Committee minutes dated April 10, 2018 be received.

208

Carried

COMMITTEE OF THE WHOLE - APRIL 10, 2018

K. Grant/B. Wells: THAT the Committee of the Whole minutes dated April 10, 2018 be received.

208

Carried

K. Grant/B. Price: THAT the 2015 – 2018 strategic plan attached to the report dated March 23, 2018, be approved;

AND FURTHER THAT the completed items (shaded blue), excluding Function 391 items, be removed from Schedule B and added to a Schedule C titled ‘completed strategic priorities’.

208

Carried

COMOX VALLEY REGIONAL OFFICE BUILDING TENDER PROCESS

K. Grant/B. Wells: THAT the report dated April 19, 2018 providing the board with an update on the Comox Valley Regional District (CVRD) regional office building project and seeking approval to proceed to tender, be received.

208

Carried

M. Zbarsky, Manager of Transit and Sustainability, presented information regarding the Comox Valley Regional District (CVRD) regional office building project.

K. Grant/E. Grieve: THAT the Comox Valley Regional District proceed with publically tendering the contract for the construction of the Comox Valley regional office building.

AND FURTHER THAT a staff report recommending contract award be brought back to the board for consideration.

208

Carried

DIRECTOR REMUNERATION

K. Grant/B. Price: THAT the report dated April 19, 2018 recommending options for proceeding with a Directors' Remuneration review in light of Canada Revenue Agency (CRA) changes which impact the non-taxable portion of local government elected officials remuneration and a bylaw which requires revision be received.

208

Carried

B. Wells/L. Jangula: THAT the board support securing an independent consultant to review current Director Remuneration, providing a report with recommended bylaw changes no later than July 10, 2018, including reference to the Canadian Revenue Agencies changes to the tax status of Director compensation.

208

Carried

BYLAWS AND RESOLUTIONS:

K. Grant/B. Wells: THAT Bylaw No. 522 being "Comox Valley Zoning Bylaw No. 2781, 2005, Amendment No. 73" (Lenco Development Ltd., Fernco Development Ltd., and Norco Development Ltd.) be given first and second readings concurrently.

208 and 213

Carried

E. Grieve/B. Wells: THAT Bylaw No. 524 being "Denman Island Water Local Service Area Conversion and Establishment Bylaw, 1993, Amendment No. 2" be given first and second readings concurrently.

208

Carried

K. Grant/E. Grieve: THAT Bylaw No. 524 being "Denman Island Water Local Service Area Conversion and Establishment Bylaw, 1993, Amendment No. 2" be read a third time.

208

Carried

K. Grant/E. Grieve: THAT Bylaw No. 525 being ""Comox Valley Water Local Service Establishment (Conversion) Bylaw No. 1886, 1996, Amendment No. 19" be given first and second readings concurrently.

208

Carried

K. Grant/B. Wells: THAT Bylaw No. 525 being "Comox Valley Water Local Service Establishment (Conversion) Bylaw No. 1886, 1996, Amendment No. 19" be read a third time.

208

Carried

K. Grant/B. Wells: THAT the directors for Electoral Area A, B and C being the participants, consent in writing to the amendment of Bylaw No. 1886 being "Comox Valley Water Local Service Establishment (Conversion) Bylaw No. 1886, 1996".

209

Carried

K. Grant/B. Wells: THAT Bylaw No. 526 being "Comox Valley Water Local Service Establishment (Conversion) Bylaw No. 1886, 1996, Amendment No. 20, 2018" be given first and second readings concurrently.

208

Carried

K. Grant/B. Wells: THAT Bylaw No. 526 being "Comox Valley Water Local Service Establishment (Conversion) Bylaw No. 1886, 1996, Amendment No. 20, 2018" be read a third time.

208

Carried

K. Grant/B. Wells: THAT Bylaw No. 527 being "Comox Valley Water Treatment Project Temporary Borrowing Bylaw No. 527, 2018" be given first and second readings concurrently.

210

Carried

K. Grant/B. Wells: THAT Bylaw No. 527 being "Comox Valley Water Treatment Project Temporary Borrowing Bylaw No. 527, 2018" be read a third time.

210

Carried

E. Grieve/K. Grant: THAT Bylaw No. 529 being "Denman Island Fire Protection Service Regulation Bylaw No. 281, 2013, Amendment No. 1" be given first and second readings concurrently.

207

Carried

B. Wells/E. Grieve: THAT Bylaw No. 529 being "Denman Island Fire Protection Service Regulation Bylaw No. 281, 2013, Amendment No. 1" be read a third time.

207

Carried

B. Price/K. Grant: THAT Bylaw No. 530 being "Hornby Island Fire Protection Service Regulation Bylaw No. 282, 2013, Amendment No. 1" be given first and second readings concurrently.

207

Carried

E. Grieve/B. Price: THAT Bylaw No. 530 being "Hornby Island Fire Protection Service Regulation Bylaw No. 282, 2013, Amendment No. 1" be read a third time.

207

Carried

K. Grant/E. Grieve: THAT Bylaw No. 531 being "Fanny Bay Fire Protection Service Regulation Bylaw No. 283, 2013, Amendment No. 1" be given first and second readings concurrently.

207

Carried

E. Grieve/B. Wells: THAT Bylaw No. 531 being "Fanny Bay Fire Protection Service Regulation Bylaw No. 283, 2013, Amendment No. 1" be read a third time.

207

Carried

K. Grant/B. Wells: THAT Bylaw No. 532 being "Rural Cumberland Fire Service Regulations Bylaw No. 258, 2013, Amendment No. 1" be given first and second readings concurrently.

209

Carried

K. Grant/B. Price: THAT Bylaw No. 532 being "Rural Cumberland Fire Service Regulations Bylaw No. 258, 2013, Amendment No. 1" be read a third time.

209

Carried

E. Grieve/B. Wells: THAT Bylaw No. 533 being "Tsolum Farnham Fire Service Regulations Bylaw No. 261, 2013, Amendment No. 1" be given first and second readings concurrently.

207

Carried

K. Grant/B. Wells: THAT Bylaw No. 533 being "Tsolum Farnham Fire Service Regulations Bylaw No. 261, 2013, Amendment No. 1" be read a third time.

207

Carried

B. Wells/E. Grieve: THAT Bylaw No. 505 being "Comox Valley Zoning Bylaw, 2005, Amendment No. 72" be adopted.

208 and 213

Carried

NEW BUSINESS:**PUBLIC HEARING NOTICE**

K. Grant/E. Grieve: THAT the new business notice dated April 12, 2018 regarding a public hearing for Bylaw No. 522 being "Comox Valley Zoning Bylaw, 2005, Amendment No. 73" (1671, 1673 and 1675 Ryan Road East, Lenco Development Ltd., Fernco Development Ltd., and Norco Development Ltd.) be received.

208 and 213

Carried

K. Grant/E. Grieve: WHEREAS the following bylaw has received first and second readings by the regional district board:

- Bylaw No. 522 being "Comox Valley Zoning Bylaw, 2005, Amendment No. 73"

AND WHEREAS, pursuant to Section 464 (1) of the Local Government Act [RSBC 2015, c.1], it is necessary to hold a public hearing on the aforementioned bylaw;

THEREFORE BE IT RESOLVED THAT:

1. A public hearing will be held on May 9, 2018 at 7:00 pm;
2. The location of the public hearing will be at the Comox Valley Regional District boardroom located at 550b Comox Road, Courtenay, BC;
3. Director Grieve is appointed as chair of the public hearing;
4. Director Nichol is appointed as vice chair of the public hearing;
5. The directors from Electoral Areas A, B, and C are appointed to attend the public hearing; and
6. At least one (1) of the above-named persons must be in attendance at the public hearing.

208 and 213

Carried

ADJOURN IN-CAMERA:

The board adjourned to its in-camera session at 5:00 p.m.

RISE AND REPORT:

The board rose from its restricted in-camera session at 5:40 p.m.

TERMINATION:

K. Grant/E. Grieve: THAT the meeting terminate.

208

Carried

Time: 5:41 p.m.

Confirmed this _____ day of _____ 20____:

Bruce Jolliffe
Chair

Certified Correct and Recorded By:

Jake Martens
Manager of Legislative Services



**COMOX VALLEY REGIONAL DISTRICT (COMOX STRATHCONA WASTE MANAGEMENT)
BOARD**

Thursday, April 19, 2018

Minutes of the meeting of the Comox Valley Regional District (Comox Strathcona Waste Management) Board of Directors held on Thursday, April 19, 2018 at the Campbell River Maritime Heritage Centre, 621 Island Highway, Campbell River, BC commencing at 9:30 a.m.

MINUTES

Present:

Chair:

Directors:

B. Jolliffe	Baynes Sound-Denman/Hornby Islands (Area 'A')
N. Anderson	Cortes (Area 'B')
M. Babchuk	City of Campbell River
J. Colborne	Village of Zeballos
C. Cornfield	City of Campbell River
L. Jangula	City of Courtenay
E. Grieve	Puntledge/Black Creek (Area 'C')
E. Eriksson	City of Courtenay
R. Kerr	City of Campbell River
B. Leigh	Oyster Bay – Buttle Lake (Area 'D')
J. MacDonald	Village of Sayward
R. Nichol	Lazo North (Area 'B')
L. Samson	City of Campbell River
M. Theos	City of Courtenay
B. Unger	Village of Gold River
G. Whalley	Kyuquot – Nootka/Sayward (Area 'A')
B. Price	Town of Comox
Alt. Directors: D. MacKenzie	Discovery Islands - Mainland Inlets (Area 'C')
B. Overton	Village of Tahsis
C. Evans	City of Campbell River
M. Grant	Town of Comox
R. Kishi	Village of Cumberland
Staff: B. Dunlop	Corporate Financial Officer
R. Dyson	Chief Administrative Officer
M. Rutten	General Manager of Engineering Services
J. Warren	General Manager of Corporate Services
J. Martens	Manager of Legislative Services

Absent:

Directors:

B. Wells City of Courtenay

ADOPTION OF MINUTES:

M. Babchuk/B. Unger: THAT the minutes of the Comox Strathcona Waste Management Board meeting held March 8, 2018 be adopted.

208

Carried

REPORTS:**COMOX STRATHCONA WASTE MANAGEMENT ADVISORY COMMITTEE**

C. Evans/B. Unger: THAT the following minutes be received:

- Comox Strathcona Waste Management Advisory Committee meeting held on March 22, 2018; and

- Comox Strathcona Waste Management Advisory Committee meeting held on April 5, 2018.

208

Carried

REGIONAL DISTRICT OF NANAIMO - SOLID WASTE MANAGEMENT PLAN CONSULTATION

C. Cornfield/M. Theos: THAT the report dated April 12, 2018 providing a brief summary of the Regional District of Nanaimo's (RDN) current Solid Waste Management Plan (SWMP) update, be received.

209

Carried

Larry Gardner, Manager of Solid Waste Services, Regional District of Nanaimo (RDN), presented information regarding the RDN's current SWMP update.

E. Grieve/M. Babchuk: THAT the Comox Strathcona Waste Management Board provide a letter of support to the Regional District of Nanaimo in support of their Solid Waste Management Plan update, affirming that the regional solid waste boards should have autonomy over their waste management affairs.

209

Carried

WASTE TO ENERGY SELECT COMMITTEE - APRIL 5, 2018

B. Leigh/R. Kishi: THAT the Waste to Energy Select Committee minutes dated April 5, 2018 be received.

208

Carried

WASTE TO ENERGY BUSINESS CASE ASSESSMENT – SCOPE CHANGE #2 RESULTS

E. Grieve/M. Babchuk: THAT the report dated April 12, 2018 to present the final results and recommendations regarding the Comox Strathcona Waste Management (CSWM) Waste to Energy (WTE) business case assessment be received.

209

Carried

Andrew McGifford, Senior Manager CSWM Services, presented information regarding the CSWM Waste to Energy (WTE) business case assessment.

R. Nichol/G. Whalley: THAT the Comox Strathcona Waste Management Board invite Sustane Technologies Inc. and Waste Treatment Technologies (WTT) Netherlands B.V. to present information regarding each company's waste management technologies to a future CSWM Board meeting.

209

Carried NAY: B. Price, E. Grieve,
B. Leigh, N. Anderson,
M. Grant

C. Cornfield/B. Unger: THAT the Comox Strathcona Waste Management (CSWM) Board invite the Ministry of Environment to explain the provincial regulations associated with waste to energy technologies including a discussion on definitions associated with the objectives for 70% diversion and the reduce, reuse and recycle approach to solid waste management to a future CSWM Board meeting.

209

Carried NAY: B. Price, E. Grieve,
B. Leigh, N. Anderson,
M. Grant

C. Cornfield/B. Unger: THAT the Comox Strathcona Waste Management Board direct staff to monitor waste management technology proposed by Sustane Technologies Inc., in Nova Scotia, for up to one year of full operations;

AND FURTHER THAT a report on its effectiveness and efficiencies be presented to the CSWM Board following the monitoring period.

209

Carried NAY: B. Price, E. Grieve,
B. Leigh, N. Anderson,
M. Grant

E. Grieve/C. Evans: THAT the Waste to Energy Business Case Assessment staff report dated April 12, 2018, including the Waste to Energy Assessment report dated April 9, 2018 prepared by Morrison Hershfield, be referred to the Association of Vancouver Island Coastal Communities Special Committee on Waste Management for information.

209

Carried NAY: C. Cornfield, B.
Price, M. Grant

VARY THE AGENDA

E. Grieve/M. Babchuk: THAT the agenda be varied to consider item E.7 (Solid Waste Management Plan - Five Year Effectiveness Review).

208

Carried

SOLID WASTE MANAGEMENT PLAN - FIVE YEAR EFFECTIVENESS REVIEW

B. Unger/J. Colborne: THAT the report dated April 11, 2018 regarding an update of the five year effectiveness review of the Solid Waste Management Plan be received.

209

Carried

Veronica Bartlett, Solid Waste Planner, Morrison Hershfield, presented information regarding the five year effectiveness review of the Comox Strathcona Waste Management Solid Waste Management Plan.

M. Babchuk/C. Cornfield: THAT the Comox Strathcona Waste Management board continue to implement the Comox Strathcona Waste Management 2012 Solid Waste Management plan with a particular focus in the following areas:

- Closure of CSWM landfills in compliance with Ministry of Environment (MoE) requirements;
- Increased diversion of organic waste;
- Continued optimization and development of recycling programs to achieve 70 per cent diversion or greater;
- Investigation of increased environmental controls;

- Further monitoring of Waste to Energy technologies as per the April 12, 2018 Waste to Energy business case assessment staff report.

209

Carried

Alternate Director Evans left the meeting at 11:55 a.m. and was not present for the vote.

MATTRESS DIVERSION PROGRAM

J. Colborne/M. Babchuk: THAT the report dated April 12, 2018 regarding a proposed five month mattress diversion pilot program at the Comox Valley Waste Management Centre (CVWMC) be received.

209

Carried

M. Babchuk/J. Colborne: THAT the board approve the implementation of a mattress diversion pilot program, facilitated internally, utilizing staff at the Comox Valley Waste Management Center.

209

Carried *NAY: G. Whalley, E.
Grieve, L. Jangula, C.
Cornfield, J.
MacDonald*

SITE VISIT - CHESTER, NOVA SCOTIA

E. Grieve/M. Babchuk: THAT the report dated April 5, 2018 regarding a site visit, coordinated by staff, to a waste to energy facility in Chester, Nova Scotia during the Federation of Canadian Municipalities (FCM) Convention be received.

208

Carried

2015-2018 STRATEGIC PRIORITIES – STATUS REPORT

J. Colborne/M. Babchuk: THAT the report dated March 26, 2018 regarding the strategic priorities for Comox Valley Regional District staff for function 391, being Comox Strathcona Waste Management be received.

209

Carried

B. Leigh/M. Babchuk: THAT the 2015 – 2018 strategic plan attached to this report, be received;

AND FURTHER THAT the completed items (shaded blue) be removed from schedule A and added to schedule B (completed strategic priorities).

209

Carried

MANAGEMENT REPORT

M. Babchuk/J. Colborne: THAT the Comox Strathcona Waste Management Board management report dated April 2018, be received.

209

Carried

TERMINATION:

J. Colborne/M. Babchuk: THAT the meeting terminate.

208

Carried

Time: 12:30 p.m.

Confirmed this _____ day of _____ 20____:

Bruce Jolliffe
Chair

Certified Correct and Recorded by:

Jake Martens
Manager of Legislative Services



COMOX STRATHCONA REGIONAL HOSPITAL DISTRICT BOARD

Thursday, April 19, 2018

Minutes of the meeting of the Comox Strathcona Regional Hospital District Board of Directors held on Thursday, April 19, 2018 at the Campbell River Maritime Heritage Centre, 621 Island Highway, Campbell River, BC commencing at 1:00 p.m.

MINUTES**Present:**

Chair:	C. Cornfield	City of Campbell River
Vice-Chair:	R. Kishi	Village of Cumberland
Directors:	E. Eriksson	City of Courtenay
	N. Anderson	Cortes (Area 'B')
	M. Babchuk	City of Campbell River
	J. Colborne	Village of Zeballos
	L. Jangula	City of Courtenay
	B. Jolliffe	Baynes Sound-Denman/Hornby Islands (Area 'A')
	E. Grieve	Puntledge/Black Creek (Area 'C')
	R. Kerr	City of Campbell River
	B. Leigh	Oyster Bay – Buttle Lake (Area 'D')
	R. Nichol	Lazo North (Area 'B')
	L. Samson	City of Campbell River
	M. Theos	City of Courtenay
	B. Unger	Village of Gold River
	G. Whalley	Kyuquot – Nootka/Sayward (Area 'A')
	J. MacDonald	Village of Sayward
	B. Price	Town of Comox
Alt. Directors:	D. MacKenzie	Discovery Islands - Mainland Inlets (Area 'C')
	B. Overton	Village of Tahsis
	M. Wright	City of Campbell River
	M. Grant	Town of Comox
Staff:	R. Dyson	Chief Administrative Officer
	B. Dunlop	Corporate Financial Officer
	J. Warren	General Manager of Corporate Services
	J. Martens	Manager of Legislative Services

Absent:

Directors:	B. Wells	City of Courtenay
Other:	S. Christiansen	Ka:'yu : 'k't'h / Che : k'tles7et'h First Nations

ATTENDANCE:

Director Kerr was not in attendance when the meeting was called to order.

ADOPTION OF MINUTES:

B. Unger/M. Wright: THAT the minutes of the Comox Strathcona Regional Hospital District board meeting held March 8, 2018 be adopted.

HDA (9)

Carried

REPORTS:**FINANCIAL STATEMENTS AND AUDITOR'S FINAL REPORT TO THE BOARD FOR THE YEAR ENDED DECEMBER 31, 2017**

Director Kerr entered the meeting at 1:05 p.m.

R. Nichol/R. Kishi: THAT the following materials be received:

- report dated April 9, 2018 regarding the 2017 financial statements of the Comox Strathcona Regional Hospital District (CSRHD) and MNP LLP's report to the Board of Directors relating to the audit findings for the year ended December 31, 2017; and

- Comox Strathcona Regional Hospital District (CSRHD) 2017 financial statements.

HDA (9)

Carried

B. Unger/J. Colborne: THAT the financial statements of the Comox Strathcona Regional Hospital District for the year ended December 31, 2017 be approved.

HDA (9)

Carried

HOME AWAY FROM HOME INITIATIVE - CAMPBELL RIVER

M. Babchuk/J. Colborne: THAT the verbal report from Chair Cornfield regarding the Home Away From Home initiative in Campbell River be received.

HDA (9)

Carried

MANAGEMENT REPORT

J. Colborne/R. Nichol: THAT the Comox Strathcona Regional Hospital District Board management report dated April 2018 be received.

HDA (9)

Carried

TERMINATION:

R. Nichol/M. Babchuk: THAT the meeting terminate.

HDA (9)

Carried

Time: 1:14 p.m.

Confirmed this _____ day of _____ 20____:

Charles J. Cornfield
Chair

Certified Correct and Recorded By:

Jake Martens
Manager of Legislative Services

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TOWN OF COMOX

BYLAW NO. 1885

A BYLAW TO AMEND THE COMOX COUNCIL PROCEDURE BYLAW, 2009

The Council of the Town of Comox, in open meeting assembled, enacts as follows:

1. Title

This Bylaw may be cited as the “Comox Council Procedure Bylaw Amendment No. 3, 2018”

2. Amendments

The Comox Council Procedure Bylaw, 2009 is hereby amended as follows:

(a) Amend Subsection 2. (b) [Definitions] by adding “as appointed under section 148 of the *Community Charter*” immediately following the word “Comox”

(b) Delete Subsection 2. (g) [Definitions] and add replace with the following:

“(g) “Public Notice Posting Places” means the notice board located inside the Comox Town Hall (main level) and the notice board immediately outside the main door of the Comox Town Hall;”

(c) Adding a definition by inserting the following text immediately following Subsection 2. (k) [Definitions]

“(l) “Town Web Site” means the information resource found at comox.ca”

(d) Amend Subsection 3. (2) [Application of the Rules of Procedure] and delete 10th and replace with ‘11th’ and delete 2000 and replace with ‘2011’

(e) Amend Subsection 5. (1) [Inaugural Meeting] and delete ‘Monday’ and replace with ‘Wednesday’ and delete ‘December’ and replace with ‘November’

(f) Delete Subsection 5. (3) [Inaugural Meeting] and replace with the following:

“(3) In accordance with Section 198 of the *Local Government Act*, municipal director appointments to the Regional District board shall be made at pleasure by the Council from among its members”.

- (g) Amend Subsections 7. (2)(b)(ii) and 7. (3)(b)(ii) by deleting words ‘the November’ and replacing with ‘October’
- (h) Amend Subsection 7. (4)(a) by deleting the word ‘Council’ and replacing it with ‘the Agenda Committee’
- (i) Amend by inserting the following text immediately following Subsection (3) of section 8. [Notice of Regular Council and Committee of the Whole Meetings] and renumbering accordingly:
 - “(4) The meeting schedule and amendments may be posted on the Town’s Web Site and through other media and locations, if these options are available.”
- (j) Amend Subsection 9. (1)(a) by deleting in its entirety and renumbering the remaining subsections accordingly:
- (k) Amend Subsection 10. (1) [Designation of Member to Act in Place of Mayor] by deleting the word ‘Annually’ and insert the following text:
 - “(1) At the Inaugural Council meeting, and at subsequent regular or special Council meetings during the Council term when a change to members designated is required,”
- (l) Amend Section 13. [Calling Meeting to Order] by inserting the following text immediately following subsection (1) and renumbering accordingly:
 - “(2) If a quorum of Council is present, but the Mayor or the Councillor designated as the member responsible for acting in the place of the Mayor under section 10 is not present at the scheduled time for a Council meeting:
 - (a) The Corporate Officer must call to order the members present;
and
 - (b) The members present must choose a member to preside at the meeting until the Mayor or Acting Mayor arrives.”
- (m) Amend Subsection 19. (4) [Delegations] by deleting the following:
 - “If the delegation wishes to appeal the Agenda Committee’s decision, the information must be distributed under separate cover to Council for their consideration’, and adding in its place “A two-thirds majority vote is required when deciding to consider a non-jurisdictional item at a Council Meeting.

- (n) Amend Subsection 27. (3) [Reading and Adopting Bylaws] by deleting reference to 'section 882' and replacing it with 'section 477'
- (o) Amend Subsection 27. (4) [Reading and Adopting Bylaws] by deleting in its entirety and replacing with the following:
 - “(4) Despite section 135(3) of the *Community Charter* [requirements for passing bylaws], and in accordance with sections 477 and 480 of the *Local Government Act* [adoption procedures for official community plan and municipal zoning bylaw], Council may adopt a proposed official community plan or zoning bylaw at the same meeting at which the plan or bylaw passed third reading.
- (p) Amend Subsection 28. (1) and subsection 28. (1) (a) by deleting the word “City’s” and replacing it with the word “Town’s”

3. Adoption

(1) READ A FIRST, SECOND and THIRD time this 2nd day of May, 2018

(2) ADOPTED this th day of , 2018

MAYOR

CORPORATE OFFICER

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TOWN OF COMOX PLANNING REPORT

TO:	RICHARD KANIGAN, CHIEF ADMINISTRATIVE OFFICER
FROM:	MARVIN KAMENZ, MUNICIPAL PLANNER
	REGINA BOZEROCKA, PLANNER 1
	ELLIOT TURNBULL, PLANNING TECHNICIAN
SUBJECT:	DEVELOPMENT VARIANCE PERMIT APPLICATION: DVP 18-2 600 PRITCHARD ROAD
DATE:	MAY 16, 2018 – REGULAR COUNCIL MEETING


 Submitted by


 Concurrence


 Approval

Recommendation:

1. That Development Variance Permit DVP 18-2 be issued subject to the Development Variance Permit Conditions listed in Schedule 1 of the May 16, 2018 Planning Report on DVP 18-2.

Proposal:

The proposal is to vary the following section of Comox Zoning Bylaw 1850 to permit an addition to an existing single-family dwelling comprised of an expanded entry foyer and associated new exterior stairs and landing: Section 101.9 (1) Front Setback, from not less than 7.5 metres to not less than 5.75 metres.

An Application Summary is contained in **Attachment 1**. The Applicants' Submission is contained in **Attachment 2**.

Background:

In accordance with standard procedures, notification was sent to abutting property owners and tenants regarding Council's intent to consider the Development Variance Permit at the May 16, 2018 Regular Council Meeting. Submissions received prior to the May 16, 2018 Regular Council Meeting will be distributed to Council.

MAY 16, 2018

OCP Implications:

The subject property's OCP designation is Residential: Detached. This designation is intended to accommodate the following land uses: a single detached dwelling and, on the same parcel, a secondary suite or a coach house.

The subject property is located in Development Permit Area #17 Coach Houses and the proposal meets the exemption criteria of DPA #17 under Section 3.17.4 (B and C). There are no OCP implications related to the proposed variance.

Zoning Implications:

The subject property is zoned R1.1 – Single Family under Comox Zoning Bylaw 1850. The lot is 784 m² with an existing single family home with a footprint of 146 m².

The existing zoning requires a front setback of not less than 7.5 metres. The proposed variance would reduce this setback to 5.75 metres only for the proposed entry foyer. The entry foyer will require a projection into the required setback for a landing and stairs measuring no more than 1.5 metres long, 2.7 metres wide and 1 metre above the existing grade. This projection is allowed under Section 5.12(3) of the Comox Zoning Bylaw 1850 which permits certain building elements and design features to project 1.75 metres into required setback.

As a comparison, the newer R3.2 Single Family – 450 m² and R4.1 Single Family – 350 m² zones were designed as infill zones which are compatible with existing R1.1 – Single Family Neighbourhoods. These zones implement the idea of a reduced front setback to promote efficient land use and pedestrian orientation in established neighborhoods. Accordingly, these two zones permit a front setback of not less than 4.5 metres for the living area portions of the dwelling and in addition, allowance for a 1.75 metres projection into that setback for certain building elements and design features.

The proposed variance does not exceed the front setback of the R3.2 and R4.1 zones and is expected to allow the home to engage more with the street, contributing to an interesting streetscape, and promote a more efficient use of land, contributing to sustainability. However, given the limited nature of the variance (it's only a 6.3m² entry foyer) it is anticipated that the benefits will be minimal.

The front yard of the subject property is screened from the street and neighbouring properties by mature vegetation as shown in photos provided by the Applicants in **Attachment 2**. No trees will be lost as a result of this proposal.

MK/RB/ET

Attachments:

1. Application Summary
2. Applicants' Submission

cc: Katie Brady
600 Pritchard Road, Comox, BC, V9M3J9
250-334-6843

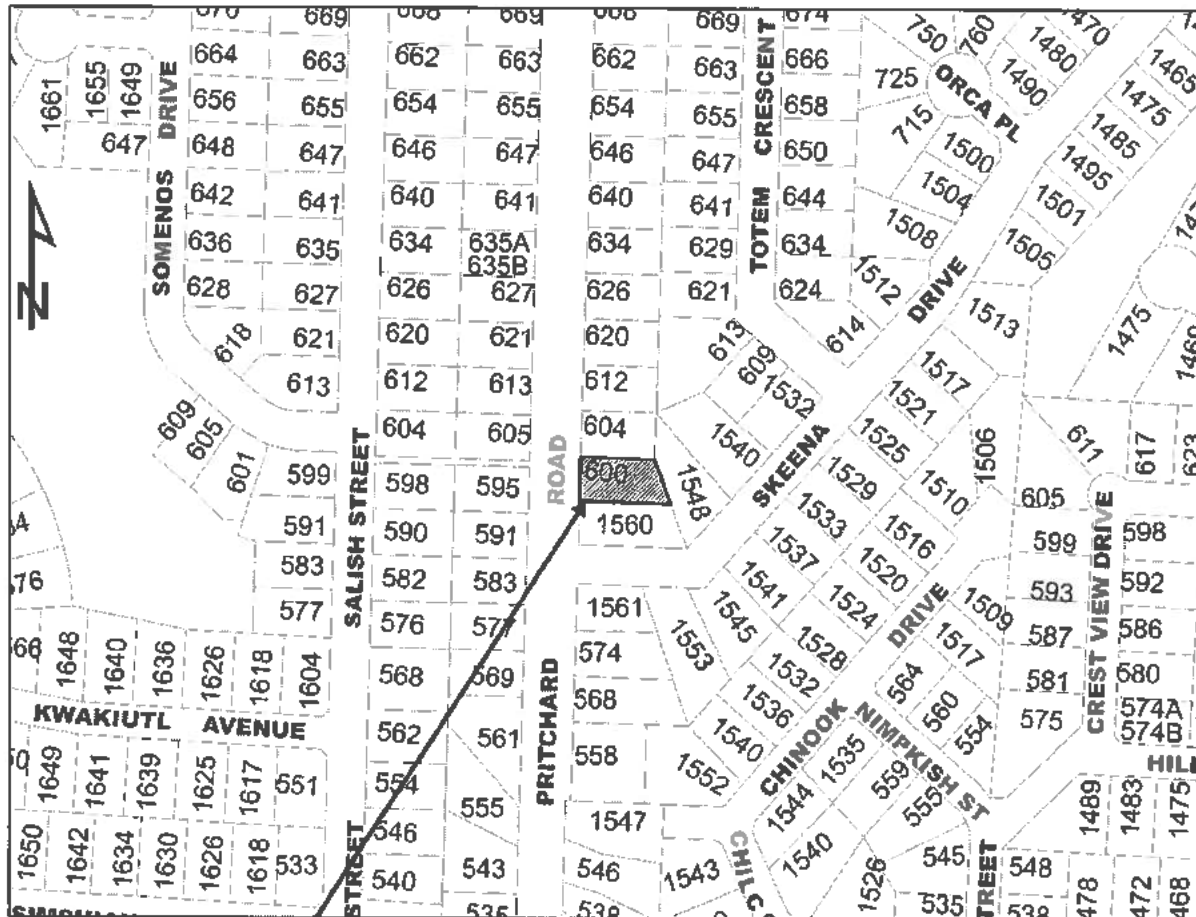
MAY 16, 2018

SCHEDULE 1 DEVELOPMENT VARIANCE PERMIT CONDITIONS

- (1) Development in accordance with drawings in Attachment 2;
- (2) This Development Variance Permit is to vary the Comox Zoning Bylaw 1850:
 - a. Section 101.9(1):
 - i. Front setback shall not be less than 5.75 metres only for a proposed entry foyer in accordance with Attachment 2.

MAY 16, 2018

ATTACHMENT 1
 APPLICATION SUMMARY



Subject Property shown shaded above:

600 Pritchard Road

LOT 28, SECTION 80, COMOX DISTRICT, PLAN 30665

MAY 16, 2018

Proposal	The proposal is to vary the following section of Comox Zoning Bylaw 1850 to permit an addition to an existing single-family dwelling comprised of an expanded entry foyer and associated new exterior stairs and landing: Section 101.9 (1) Front Setback, from not less than 7.5 metres to not less than 5.75 metres.	
Owner/ Applicant:	Katie Brady and Nicholas Brady	
Legal Description:	LOT 28, SECTION 80, COMOX DISTRICT, PLAN 30665	
Civic Address:	600 Pritchard Road	
OCP:		
Land Use Designation:	Residential: Detached	
Zoning Bylaw:	R1.1 Single Family	
Permitted Uses Include:	Accessory structures and uses, Bed and Breakfast accommodations, Coach houses, Home occupations, Secondary suites, Single-family dwellings	
Parcel Area:	650 m ²	
	Existing	
General Regulations:	Awnings, balconies, bay windows, canopies, chimneys, cornices, eaves, gutters, landings, leaders, ornamental features, pilasters, porches, sills, stairs, or sunshades may project up to 1.75 metres into a required front, rear or exterior side setback and up to 0.6 metres into a required interior side setback.	
Required Setbacks:	(1) Front setback shall not be less than <u>7.5m</u> (2) Rear setback shall not be less than <u>7.5m</u> (3) Interior side setback shall not be less than <u>2.0m</u> (4) Exterior side setback shall not be less than <u>3.5m</u>	Proposed (1) Front setback shall be not less than <u>5.75m</u> for a proposed entry foyer in accordance with Attachment 2.
Surrounding Uses:	Single-family dwellings to the north, east, south, and west. Salish Park to the west, Skeena Park to the East, and Highland Secondary School to the North.	

MAY 16, 2018

ATTACHMENT 2
APPLICANT SUBMISSION

Development Variance Application – 600 Pritchard Road, Comox, BC V9M 3J9

Home Owners: Nicholas Brady, and Katie Campbell Brady

Date: February 8, 2018

Rationale:

The present and proposed land use of the aforementioned property is a 1.5 storey, single family home. Originally built in 1979 the upper storey of the home is finished with stucco siding. The stucco has reached the end of its life and requires replacement to ensure the building envelope is no longer compromised. Understanding that a full exterior renovation is required the homeowner's Mr. and Mrs. Brady would very much like to add an addition to the front entrance of the home. The existing split-level entry measures, 1.03 metres long by 1.67 metres wide. By enlarging the entryway into a much more functional and family friendly area, the Brady family will enjoy more efficiency in their home.

When the home was originally built, it was placed on the frontage setback at the 7.5 metre mark. The current bylaw states; Comox Zoning Bylaw 1850, Schedule "A", R1.1 Single Family, Section 101, Subsection 101.9, Setbacks: (1) Front setback shall not be less than 7.5 metres.

It is proposed that Zoning Bylaw 1850, Section 101.9 be reduced from 7.5 metres to 5.75 metres.

Mr. and Mrs. Brady are requesting a front setback variance of 1.75 metres, for the purpose of building a functional entryway approximately 3.53 meters wide by 1.75 meters long; the height of which will not exceed the existing roof line.

As per protocol the adjacent neighbours have been notified by the homeowners of this Variance Application. Neighbours will not have any views obstructed by the proposed variance. Existing mature landscaping and trees already hide the existing entryway from street view. The proposed variance will not change the existing landscaping, therefore; the proposed variance will have limited, if any effect on the street view.

Granting this variance will benefit the community in the following ways;

- Population Stability – In order for families to choose to continue to reside in their homes, the homes must be functional in layout and organization. Resident longevity, is essential to; neighbourhood comradery, safety and tax revenue.
- Beautification – Remodeling and updating an existing property is less intrusive than a complete rebuild or population attrition. The environment equally benefits from remodeling and updating as opposed to full tear down and rebuild.
- Sustainable Development - By extending the life of existing properties, the sense of community, the topography of the land and the environment are all preserved.

At present there is adequate public infrastructure in the forms of: a road, sidewalk, water main, sewer, Hydro line, and gas line, none of which will be altered by the variance.

Yours Truly,

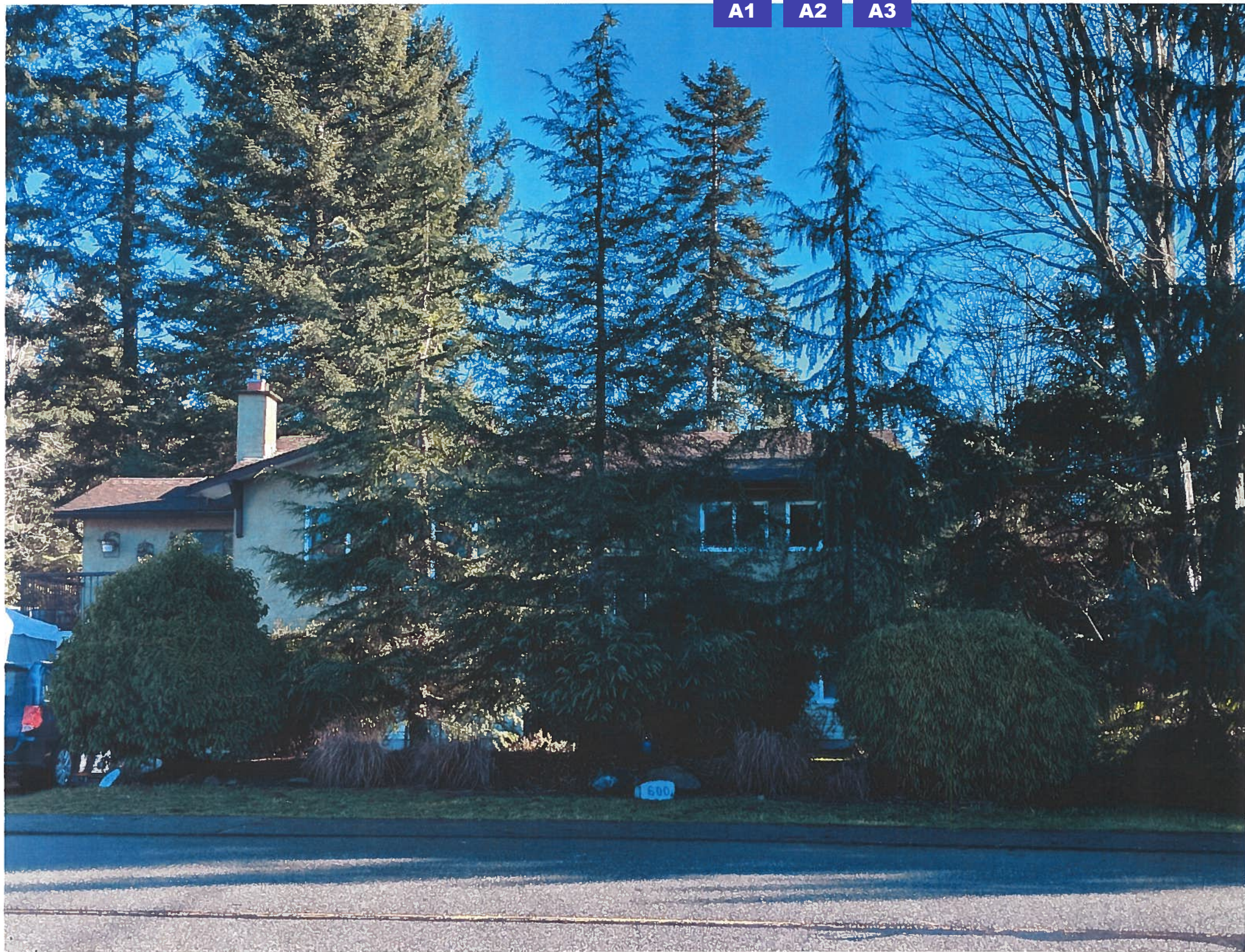

Nick Brady


Katie Brady

A1

A2

A3

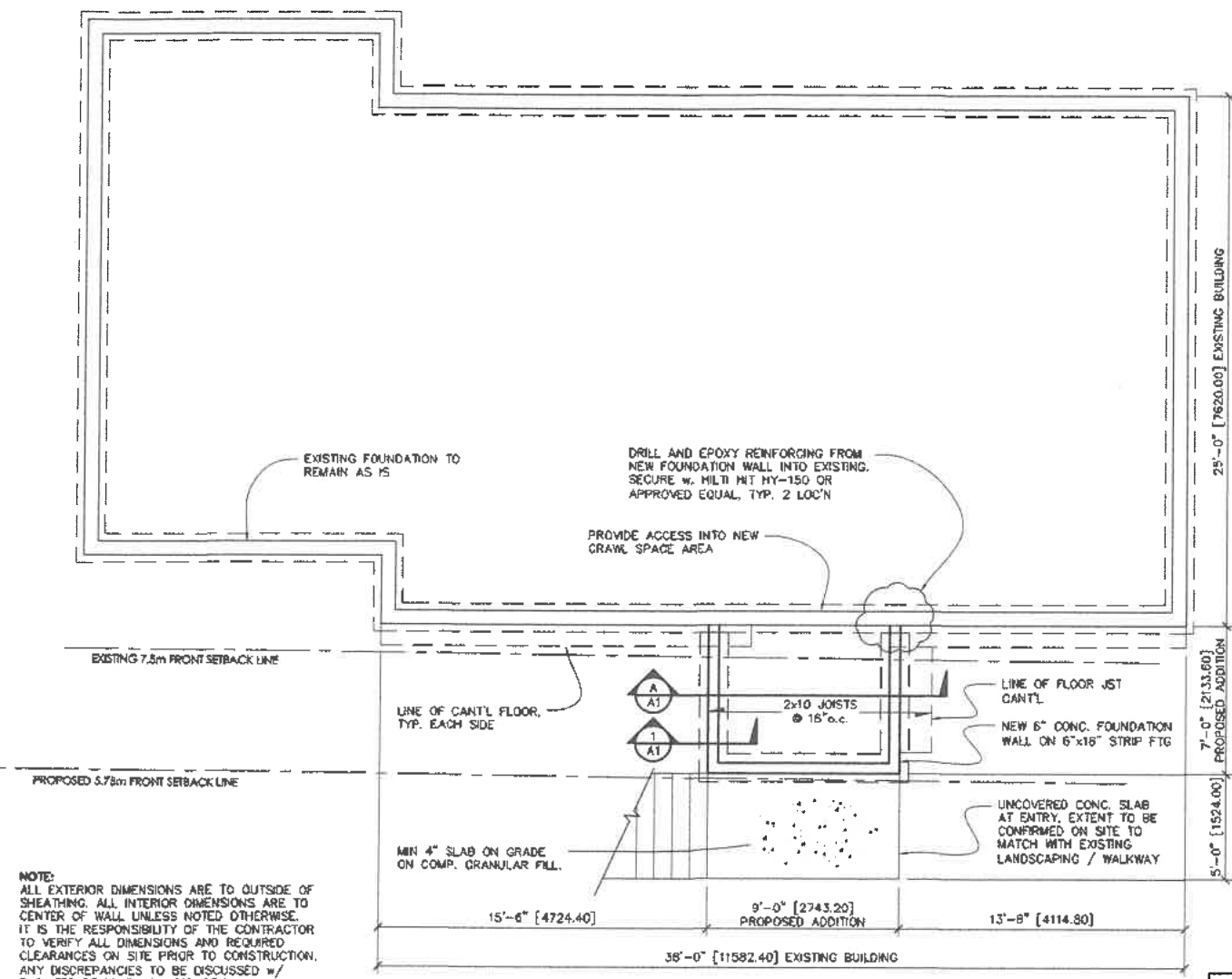


A1

A2

A3





NOTE:
ALL EXTERIOR DIMENSIONS ARE TO OUTSIDE OF SHEATHING. ALL INTERIOR DIMENSIONS ARE TO CENTER OF WALL, UNLESS NOTED OTHERWISE. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY ALL DIMENSIONS AND REQUIRED CLEARANCES ON SITE PRIOR TO CONSTRUCTION. ANY DISCREPANCIES TO BE DISCUSSED w/ ENGINEER PRIOR TO CONSTRUCTION.

INDICATES 2x4 OR 2x6 @ 16" o.c. BEARING WALL

INDICATES LOCATIONS OF POINT LOADS

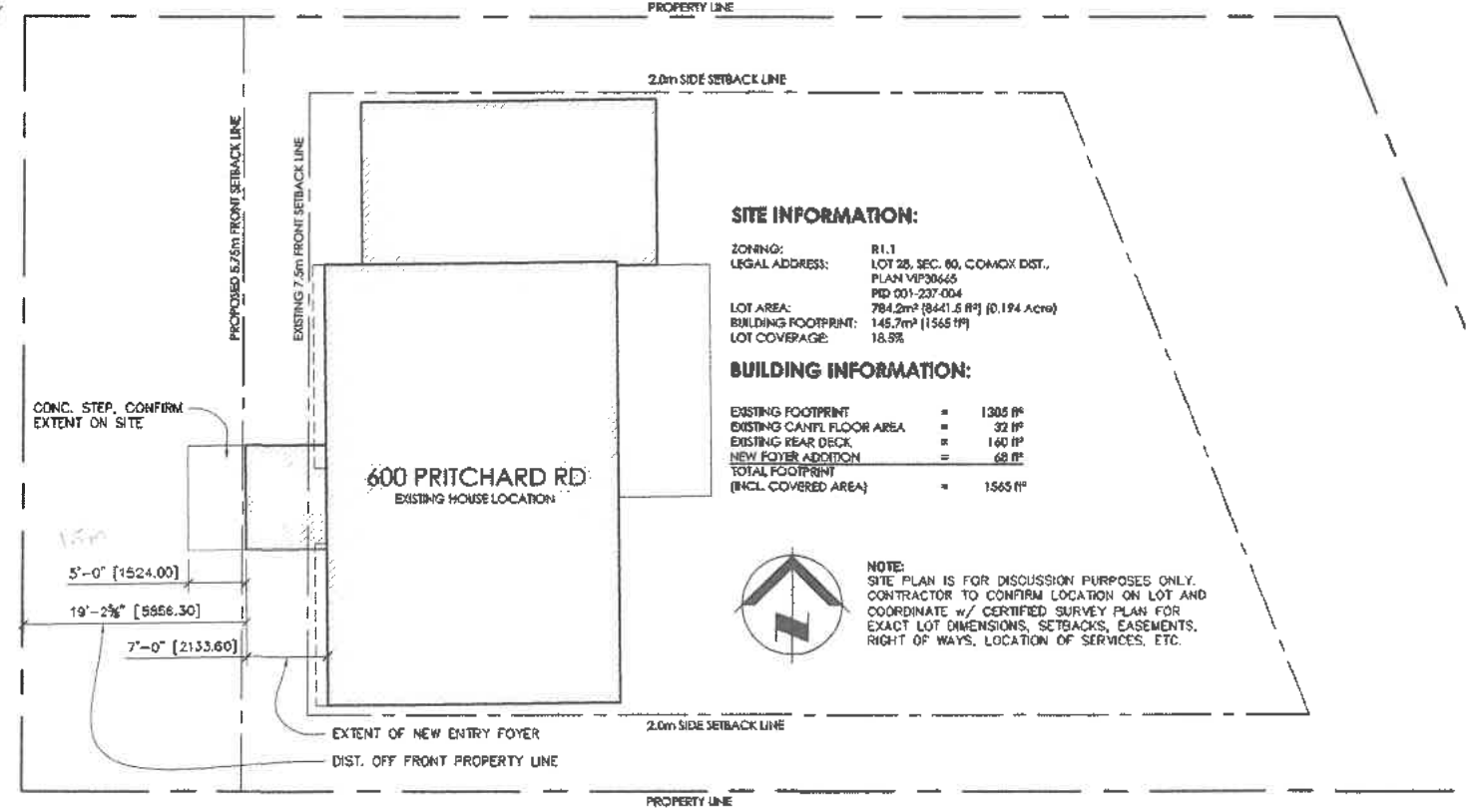
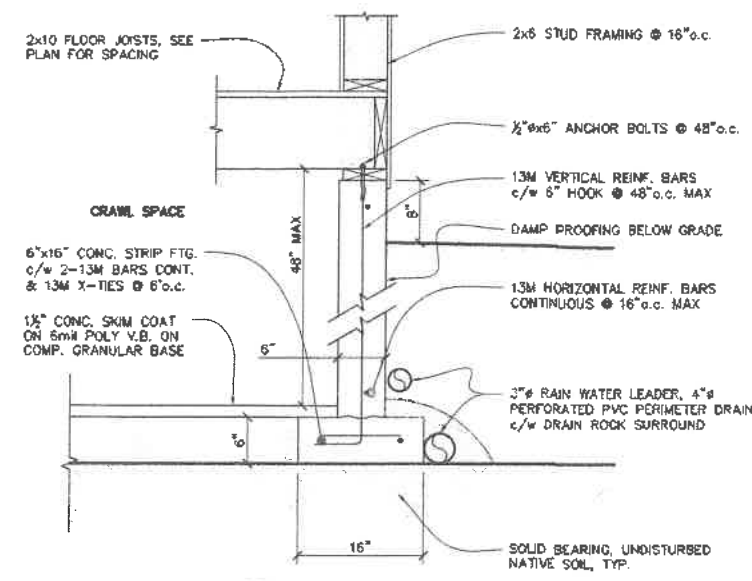
INDICATES LOCATIONS OF BEAMS/HEADERS/GRIDERS

NOTE:
GRIDER TRUSS LOCATIONS TO BE DETERMINED BY TRUSS MANUF'R. ANY DISCREPANCIES TO BE DISCUSSED w/ ENGINEER PRIOR TO CONSTRUCTION.

ALL POINT LOADS FROM ABOVE TO CONTINUE THRU FLOOR JOIST CAVITY, DOWN TO FOUNDATION BELOW.

ALL HEADERS TO BE MINIMUM 2-2x10 c/w 1 1/2" BEARING EACH END UNLESS NOTED OTHERWISE. BUILT UP COLUMNS UNDER GIRDER TRUSSES TO HAVE THE SAME NUMBER OF PLIES AS THE GIRDER, UNLESS NOTED OTHERWISE. PLIES OF ENGINEERED LVL HEADERS TO BE NAILED TOGETHER w/ 4 ROWS 16d NAILS @ 16" o.c., UNLESS NOTED OTHERWISE.

IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO OBTAIN AN ENGINEER'S APPROVAL, SHOULD IT BE REQUIRED BY THE BUILDING INSPECTOR. ENGINEER'S MARKUPS SUPERCEDE ANY NOTES INDICATED ON THESE PLANS.



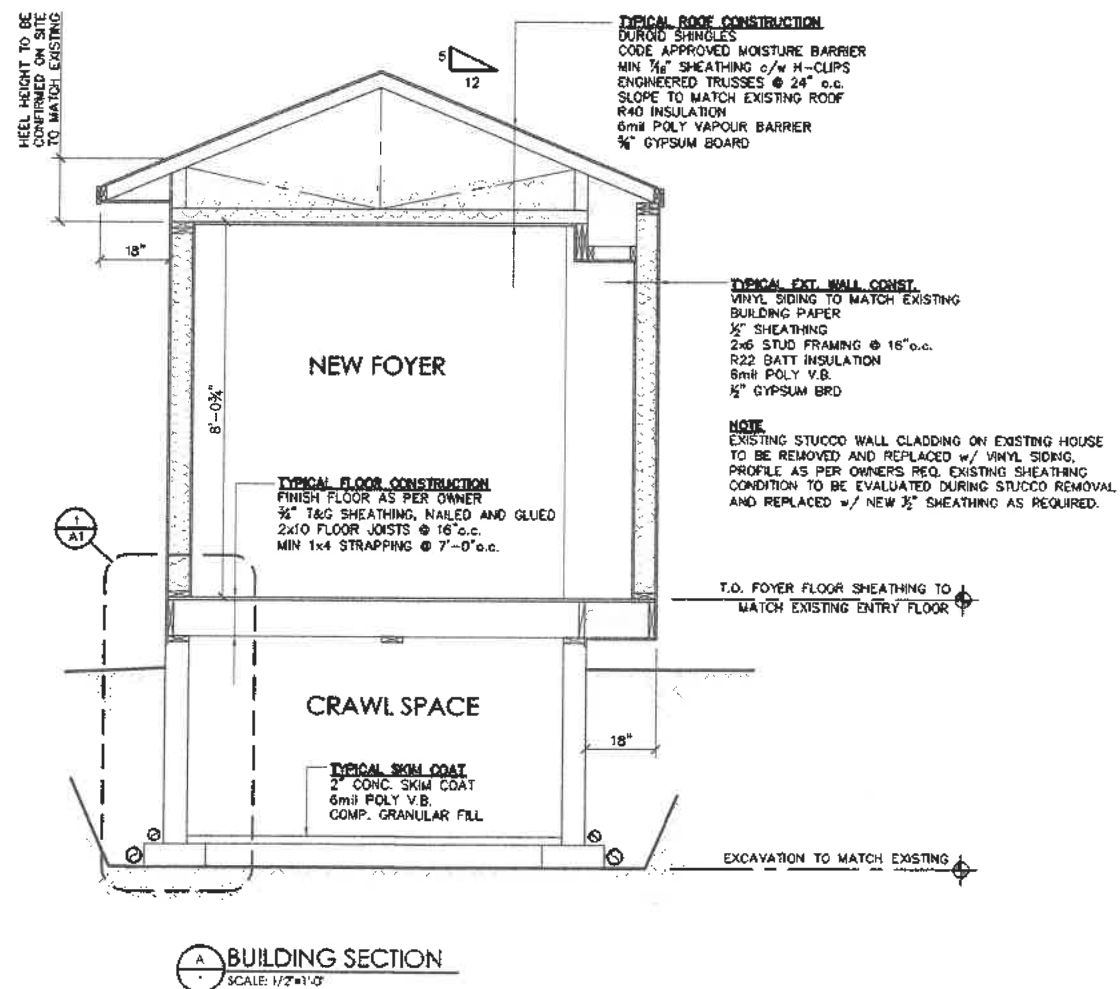
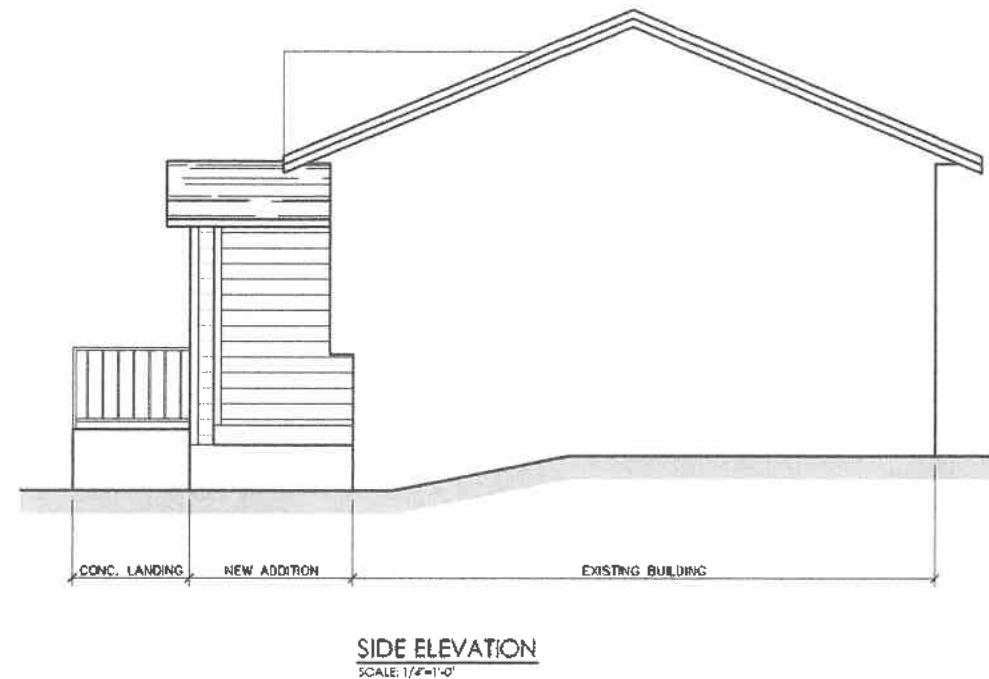
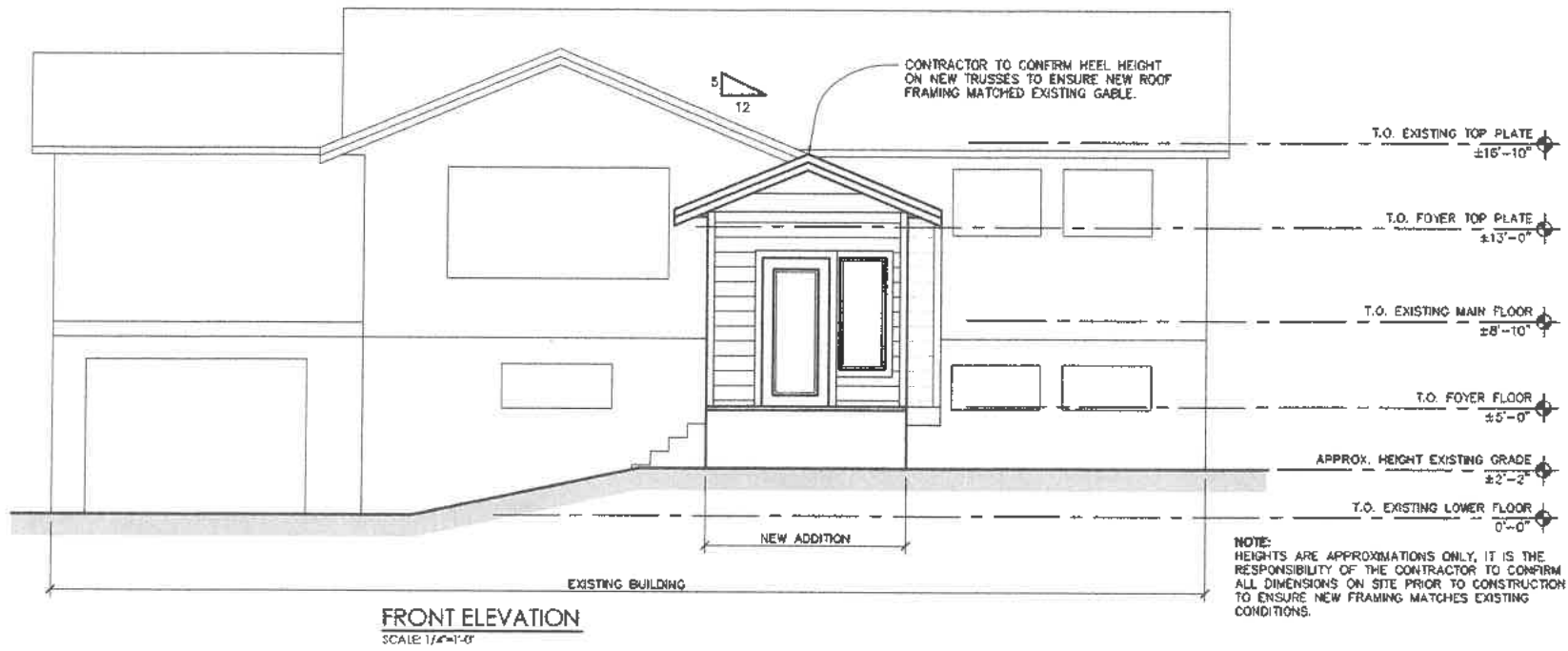
BRADY RESIDENCE
600 PRITCHARD, COMOX, BC

BIRDS EYE DRAFTING SERVICE
COMOX, BC EMAIL: btyrdrafting@gmail.com

THESE DRAWINGS ARE THE EXCLUSIVE PROPERTY OF BIRDS EYE DRAFTING AND ARE NOT TO BE REPRODUCED WITHOUT EXPRESSED WRITTEN CONSENT.

NO.	REVISION	DATE
1	ISSUED FOR PERMIT REVIEW	FEB. 7/18
2	ISSUED FOR PERMIT	FEB. 14/18





REVISIONS		DATE
No.	REVISION	DATE
1	ISSUED FOR PERM REVIEW	FEB. 21/19
2	ISSUED FOR PERM	FEB. 14/19

BRADY RESIDENCE
600 PRITCHARD, COMOX, BC
BIRDS EYE DRAFTING SERVICE
COMOX, BC EMAIL: bgrmains@gmail.com

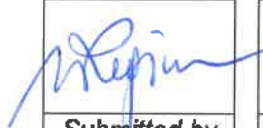


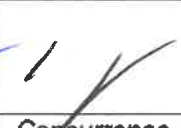
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TOWN OF COMOX PLANNING REPORT

TO:	RICHARD KANIGAN, CHIEF ADMINISTRATIVE OFFICER
FROM:	MARVIN KAMENZ, MUNICIPAL PLANNER REGINA BOZEROCKA, PLANNER I
SUBJECT:	DEVELOPMENT VARIANCE PERMIT APPLICATION: DVP 17-5 SOUTH-WEST CORNER OF GUTHRIE & LAZO ROAD INTERSECTION
DATE:	MAY 16, 2018 RCM


Submitted by


Concurrence


Approval

Planner's recommendation:

That Development Variance Permit DVP 17-5 be issued subject to the Development Variance Permit Conditions listed in Schedule 1 of the May 16, 2018 Planning Report on DVP 17-5.

Proposal:

To facilitate the development of 9 single-family residential lots, the proposed Development Variance Permit would vary Town of Comox Subdivision and Development Servicing Bylaw, 1261 to provide traffic calming, improve pedestrian infrastructure, improve neighbourhood aesthetics and allow for the provision of storm water management facilities on the site, in accordance with the "Lot B, Plan 48438, District Lot 224 Storm Water Management Plan" (SWMP), prepared by McElhanney Consulting Services Ltd, dated May 4, 2018.

The Application Summary is contained in **Attachment 1**. The applicant's submission is contained in **Attachment 2**.

Background:

In accordance with standard planning procedures, notification was mailed to abutting property owners and tenants regarding Council's intent to consider the Development Variance Permit at the May 16, 2018 Regular Council Meeting. Public submissions received to-date on the Development Variance Permit application are contained in **Attachment 3**. Submissions received prior to the May 16, 2018 Regular Council Meeting will be distributed to Council.

MAY 16, 2018

Attachment 3 also includes a copy of a February 2015 neighbourhood petition regarding the subject property¹, that predates this application. However, no comprehensive review of Town files for pre-application correspondence was done.

OCP Implications:

Under the Official Community Plan (OCP), the subject property is designated Residential: Ground Oriented Infill. This designation is intended to accommodate the following land uses: single detached dwellings, secondary suites, coach houses, duplexes, triplexes and patio homes.

The subject property is located within the following Development Permit Areas (DPAs):
2 Ground Oriented Infill (meets exemption criteria under Sections 3.2.4 (E and F);
16 Energy and Water Conservation and Reduction of Greenhouse Gas Emissions; and
17 Coach Houses (meets exemption criteria under Section 3.17.4 (B, C and F).

The applicant has submitted a development permit application (DP 17-5) in relation to DPA # 16. DPA #16 objectives include the protection of the natural environment, its ecosystems and biodiversity in relation to the integrity of the ground water supply for the Lazo Wildlife Management Area. Should Council grant the DVP 17-5, DP 17-5 application will be processed at the staff level, in accordance with past practice.

OCP Sustainability Implications:

Existing Trees

OCP Environment Policy, 2.3.13(y) encourages the protection, planting and replacement of trees, with a long term objective of increasing forest canopy cover.

The approximately 1.01 Ha subject property is located within a tree protection area under Comox Tree Management and Protection Bylaw No. 1125, 1994. A permit, issued by the Parks Superintendent, is required to remove mature trees. Trees with a diameter at breast height under 20 cm, hazardous or diseased trees and trees within road dedications and utility corridors are exempt from the requirement to obtain a permit and are not included in the calculation of the standard cut limit of 75%. The Tree Inventory Assessment – Guthrie Road Development by Walter Ernst, dated May 7, 2018 (included in **Attachment 2**) provides a tree inventory breakdown to demonstrate conformance to the Tree Protection Bylaw. Of the 347 inventoried mature trees, 139 are located within road dedications and utility corridors (including the proposed storm water detention pond) and are not included in the calculation of the standard cut. Of the remaining 208 (100%), 146 (70%) are proposed to be removed and 62 (30%) are proposed for retention.

The proposed variance to reduce the cul-de-sac road dedication radius is to facilitate a higher lot yield on the subject property, which affects the potential for tree retention. The proposed storm water management variance includes the construction of a detention pond which also reduces the

¹ Discussed under the Other Implications section of this report.

MAY 16, 2018

potential for tree retention. As the proposed development variance permit affects tree retention, Council has the ability to include tree retention requirements in addition to conformance to the Tree Protection Bylaw as development variance permit conditions.

In this regard, current Town practice has been to focus on tree retention and replanting requirements in rear yards with the goal of creating small tree groves where possible.² The proposed subdivision will involve a significant amount of land clearing and grading to install necessary infrastructure. The exact nature of the clearing and grading will in turn affect tree replanting specifications including species selection, quantity and location. Schedule 1, Development Variance Permit Conditions set the parameters for tree retention and replanting in conformance with the Tree Protection Bylaw and the current Town practice of focusing on rear yard tree retention and replanting, allowing for the creation of a detailed replanting plan acceptable to the Parks Superintendent after clearing and grading to install necessary infrastructure has been completed. The primary tree retention and replacement area is show in **Attachment 2**, drawing SK-107. Within this area, the applicant proposes to replant 50 trees in mixed-species groups.

Schedule 1 Development Variance Permit Conditions includes the provision of a Tree Protection covenant to secure the maintenance and protection of retained and replanted trees.

Park and Road Dedication

OCP Parks, Trails and Open Space Policy 2.1.8.3(q)(V), states that priorities for provision of greenways and trails include "McDonald Wood Park to the waterfront in Point Holmes. The preferred greenway is on the north and west sides of Lazo Road from Torrence Road to Colby Road consisting of a 12.0 metre wide dedication to accommodate a pedestrian/bike pathway width of 2.5 metre The greenway width, design and location may be varied . . . in response to site or servicing constraints, including topography, traffic safety, existing development patterns and parcel dimensions".

The subject property has two constraints relative to greenway width. The Guthrie/Lazo intersection to the north and to the south, an existing single-family development pattern, which limits the ability to obtain 12.0 metre greenway dedication. In addition, the existing slope of the land restricts detention pond location to the north - east corner of the subject property. Consequently, greenway dedication at time of subdivision would be restricted to the southern half of the Lazo frontage of the property, as shown in lot layout plan in **Attachment 2**, with an allowance for the greenway path to use the detention pond maintenance road along its perimeter and connect to Guthrie Road. The requirement for 5% parkland dedication at time of subdivision is sufficient to accommodate the necessary greenway dedication.

Zoning Implications:

The proposed lots meet the existing R1.1 Single-Family zone regulations. **Attachment 1**, Application Summary provides a summary of the R1.1 regulations.

² Past Town efforts to retain trees within front yards and boulevards has proven to be problematic due to conflicts with road grades, underground services and driveways.

MAY 16, 2018

Subdivision and Servicing Standards Bylaw, 1261 Implications:

The proposed Development Variance Permit would vary Town of Comox Subdivision and Development Servicing Bylaw, 1261, Schedule C.1, as follows:

1. Appendix "C", Table C-1, to reduce the minimum local road pavement width from 9.0m to 6.0m with 2.4m pull-out parallel parking; to require barrier curb for the proposed cul-de-sac road;
2. Appendix "C", Sections 10.1 and 10.2, to provide a sidewalk on the north side of cul-de-sac, adjacent to back of curb at parking pull outs and otherwise separated by boulevard from curb, so that sidewalk alignment is parallel to vehicle lane;
3. Appendix "H" Section 1.2, in accordance with drawings SH-1, SC-5 and SF-7, and to locate street trees immediately adjacent to curb; provide structural soil for the street trees of a composition and depth acceptable to the Parks Superintendent, in accordance with Figure 1 in Schedule 1; and locate storm and sanitary mains beneath the road pavement;

These proposed variances to road width, curb design and street tree location are consistent with OCP policies to encourage alternative transportation and neighbourhood identity in accordance with sustainability principles. The variances are also in keeping with those approved for the 1182 Lazo Road development and proposed for the 1170 Lazo Road development.

4. Appendix "C", Table C-1, to reduce cul-de-sac road dedication radius from 17.0 metres to 14.1 metres;

Reduction of minimum cul-de-sac road dedication radius from 17.0 metres to 14.1 metres and provision of a Statutory Right of Way for underground utilities within front yards allows for an efficient lot layout.

5. Appendix E, Specifications for Storm Drainage, Section 1.2, to provision of storm drainage servicing in accordance with the "Lot B, Plan 48438, District Lot 224 Stormwater Management Plan" prepared by McElhanney Consulting Services Ltd, dated May 4, 2018 (SWMP).

Section 1.2 of the Subdivision and Development Servicing Bylaw, states that the presence of an existing Town drainage facility and natural channel does not imply that such is a suitable or adequate point of stormwater discharge. Where existing downstream facilities are inadequate or a development is not able to connect, a special design for a stormwater management system is required.

The subject property is not able to connect to existing Town storm water infrastructure. The subject property naturally drains towards the north-east. In light of the concerns regarding the capacity of downstream drainage facilities, a SWMP based on the principles of the draft North East Comox Stormwater Management Plan has been submitted (**Attachment 2**). The NE Comox Storm Water Management Plan design principles represent a new approach to storm water management, which are beyond an administrative staff level implementation of the Subdivision Bylaw allowance for a special design. Therefore, a Development Variance Permit application was submitted for the subject property SWMP.

MAY 16, 2018

The SWMP includes the provision of infiltration facilities within a proposed cul-de-sac road dedication and construction of a detention pond³ (Town owned and operated) within additional road dedication adjacent to the Guthrie / Lazo intersection, as shown on the Proposed Subdivision Layout drawing in **Attachment 2**.

Other implications:

Schedule 2 contains a preliminary engineering analysis from the Public Works Department, pertaining to the proposed future subdivision. As the engineering analysis is preliminary, the comments are subject to change.

The 2015 petition contained in **Attachment 3** opposes road extension from Beckton Drive through to Guthrie Road and suggests access be limited to Guthrie or Lazo Road. The Approving Officer is responsible for determining a development's internal road dedication alignment and its connection to the existing road network in accordance with Provincial statutes and Town of Comox Subdivision and Development Servicing Bylaw 1261.

Guthrie Road is designated Arterial under the OCP; and Lazo Road is a rural road under Ministry of Transportation jurisdiction. Access to Guthrie Road would be inconsistent with its Arterial designation. The primary function of an Arterial road is to move high volumes of through-traffic. Each additional access point to an Arterial road introduces an additional conflict area, which decreases the safety of the Arterial road. The more interruptions on an Arterial road, the greater the likelihood motorists will try to use local neighborhood roads to avoid potential delays. Access to Lazo Road would be in conflict with the Lazo Greenway.

MK/ RB

Schedules:

1. DVP conditions
2. Preliminary Engineering Analysis

Attachments:

1. Application Summary
2. Applicant's Submissions
3. Public Submissions

cc. Derek Jensen, McElhanney Consulting Services Ltd.
495 Sixth Street, Courtenay, B.C. V9N 6V4

MAY 16, 2018

SCHEDULE 1**DEVELOPMENT VARIANCE PERMIT CONDITIONS**

1. Subdivision in substantial compliance with the Proposed Subdivision Layout (Attachment 2) and in accordance with the "Lot B, Plan 48438, District Lot 224 Stormwater Management Plan" prepared by McElhanney Consulting Services Ltd, dated May 4, 2018, (Attachment 2);
2. Provision of approximately 1,300 square metres of Road Dedication for the stormwater management facilities (detention pond) in the location shown in the Proposed Subdivision Layout, drawing SK-104 (Attachment 2);
3. Provision of 5% Park Dedication, approximately 500 square metres, in the location shown in the Proposed Subdivision Layout, drawing SK-104 (Attachment 2);
4. Prior to alteration of the land including vegetation or submission of an application for subdivision preliminary review, clear field marking of the retained trees with their respective number assigned under the Tree Inventory Assessment – Guthrie Road Development by Walter Ernst, dated May 7, 2018, to facilitate verification and communication of tree information to Council, staff and the public;
5. Tree retention in accordance the Tree Inventory Assessment – Guthrie Road Development by Walter Ernst, dated May 7, 2018;
6. Prior to application for Final Subdivision approval:
 - a. Provision of Tree Replacement Plan to the satisfaction of Parks Superintendent specifying the location, species and size of 50 trees to be planted within rear setbacks of the proposed lots, creating small tree groves where possible;
 - b. Removal of invasive species and hazard trees, per the recommendations of the Tree Inventory Assessment – Guthrie Road Development by Walter Ernst, dated May 7, 2018;
 - c. Reassessment of existing trees as per Tree Inventory Assessment – Guthrie Road Development by Walter Ernst, dated May 7, 2018; and additional replanting as required;
 - d. Planting of all Replacement Trees in accordance with the Tree Replacement Plan as approved by the Parks Superintendent; and
 - e. Provision of Section 219 Covenants to secure retention, maintenance and protection, including provision of rent charge, of all trees identified for retention in the Tree Inventory Assessment – Guthrie Road Development by Walter Ernst, dated May 7, 2018, and replacement trees as specified in Tree Replacement Plan.

MAY 16, 2018

7. Town of Comox Subdivision and Development Servicing Bylaw 1261, Schedule C.1, is to be varied as follows:

- a. Appendix "C", Specifications for Highways, Table C-1 (Minimum Requirements, Roadway Widths, Curbs and Sidewalks):

Local Road Pavement Width

From: 9.0 metres

To: 6.0 metres, with 2.4 m pull-out parallel parking

Type of curb

From: Rollover Curb

To: Barrier curb, gutter

- b. Appendix "C", Table C-1, minimum cul-de-sac road dedication radius

From: 17.0 metres

To: 14.1 metres;

- c. Appendix "C", Sections 10.1 and 10.2, Sidewalks:

From: Back of curb, in accordance with Standard Drawing SC-10

To: Back of curb at parking pull out and otherwise provision of boulevard between back of curb and sidewalk, so that sidewalk alignment is parallel to vehicle lane;

- d. Appendix E, Specifications for Storm Drainage, Section 1.2,

From: The presence of an existing Town drainage facility or natural drainage channel does not imply that such is a suitable or adequate point of discharge. Where existing downstream facilities are inadequate to handle the increased flow from the proposed subdivision, a special design is required.

To: provision of storm drainage servicing in accordance with the "Lot B, Plan 48438, District Lot 224 Stormwater Management Plan" prepared by McElhanney Consulting Services Ltd, dated May 4, 2018.

- e. Appendix "H" Section 1.2:

Street Trees and Underground utilities alignment

By addition of following text: Notwithstanding drawings SH-1, SF-7 and SC-5, street trees shall be located immediately adjacent to the curb; structural soil for street trees shall be provided of a composition and depth acceptable to the Parks Superintendent, in accordance with Figure 1, Schedule 1; and the location of storm and sanitary mains shall be beneath the road pavement.

[illegible]

MAY 16, 2018

SCHEDULE 2 PRELIMINARY ENGINEERING ANALYSIS

TO: Regina Bozerocka, Planning Technician	FILE: DVP 17-5
FROM: Shelley Ashfield, Municipal Engineer	DATE: July 4, 2017
SUBJECT: Lot B, District Lot 244, Comox District Plan 48438	

In response to your referral, dated June 13, 2017 reference file # DVP 17-5, public works offers the following:

General

- The applicant will require the services of a Professional Engineer registered within the Province of British Columbia to submit designs for review and approval by the Town of Comox and supervise all aspects of construction. The Engineer must provide cost estimates and submit certified as-built drawings and service cards for each applicable lot upon project completion. As built drawings must also include the location of non municipal utilities.
- Design and construction, shall be in accordance with the Town's Subdivision & Development Servicing Bylaw, and Subdivision & Development Specifications, unless otherwise noted.
- A performance bond for work within the Municipal right-of-way must be posted prior to commencing work within an existing road or statutory right-of-way. The amount of this bond shall be the equivalent of 125% of the cost as determined by the engineer's estimate. Works within the municipal right-of-way, or those to be transferred to the Town of Comox, shall be covered by a one-year maintenance period that shall include a maintenance bond equivalent to 10% of the total construction cost.

Water System

- This proposal shall be served from the low-pressure zone (87m). Koers and Associates will be required to assess the ability of this zone and the point(s) of connection to ensure adequate domestic and fire flow capacity. The applicant shall be responsible for all cost associated with this assessment;
- Servicing of this site will be achieved by extension of the Town of Comox water system from its current terminus on Beckton Drive at the southwest corner of the subject property;
- Extension of the Guthrie Road system from its current terminus at the Stickleback / Guthrie intersection to the point of interconnection with the 350mm diameter water main on Lazo Road is required. As the alignment is under the future road surface, this work must take place in advance of the completion of this section of Guthrie Road. This interconnection will serve to improve water quality, provide a redundant connection, and reinforce the capacity of the Town's low pressure system; and
- To enable the ultimate development of Lot 2, Plan 73560 a 20mm diameter water connection should be extended to the northwest corner of this property. This connection should be contained within a private easement generally located adjacent to the boundary between proposed Lots 7 and 8.

Sanitary Sewage System

- The 2006 "Butchers Road Area Servicing Study" found the existing sanitary main generally aligned with the east boundary of Lot 28, Plan 71013 to be undersized for the ultimate contributing area

MAY 16, 2018

formed by the Butchers Road Area. For this reason, connection to this main should be discouraged. Instead, this development should direct sewage to the existing sanitary manhole on Guthrie Road generally located in the frontage of Lot B, Plan SP5921; and

- To enable the ultimate development of Lot 2, Plan 73560 a 100mm diameter sanitary connection should be extended to the northwest corner of this property. This connection should be contained within a private easement generally located adjacent to the boundary between proposed Lots 7 and 8.

Storm Drainage System

- The Beckton Estates storm water management system does not have sufficient capacity to meet the demands resulting from this development. Instead, the Applicant's Engineer must design an independent storm water management plan (SWMP). The SWMP is to confirm no negative impact of surface and ground water flows originating from the subject property on downstream and down-slope flood frequency and flood duration for up to and including the 100 year runoff event.
- In general, both this site and the existing development above, slope from the southwest to the northeast. This results in the major overland flood path from both Beckton Drive and the rear laneway crossing this site towards the Guthrie / Lazo intersection. Currently the portion of the laneway adjacent to the east boundary of Lot 1, Plan 64775 is graded in such a manner as to redirect overland flow accumulating on Beckton Drive towards the center of the subject lands. It is recommended that this section of laneway be removed and regraded to permit runoff from both Beckton Drive and the rear lane way to be contained and directed north to Guthrie Road. Further, consideration should be given to constructing a paved walk way within the SRW adjacent to the east boundary of Lot 28, Plan 64775 that will complete the overland flood route through to Guthrie Road; and
- As a condition of the subdivision process to follow, the Applicant's engineer will be required to establish minimum habitable floor elevations for each of the proposed lots. This elevation must account for the limitations imposed by any SWMP adopted for this development.

Roads

- Guthrie Road is designated an Arterial road requiring a total road dedication of 25.0m. Under no conditions will direct vehicle access to Guthrie be permitted;
- Guthrie Road will require construction along the entire frontage of the subject property. In general, this will include road widening (bike lane), barrier curb and gutter, sidewalk and enclosure of the open ditch;
- Lazo Road is property of the Ministry of Transportation and as such will require their direct review. The Town will recommend Lazo Road to retain a rural cross section consistent with that applied to the property frontages immediately south from the subject lands (Lots 2, 3 and 4, Plan 73560. This will include enclosure of the ditch, swale, and a paved shoulder for pedestrian and cyclist. Under no conditions should direct vehicle access to Lazo be permitted;
- The onsite road serving the subject lands should be constructed to the Town's new standard (3 m wide lanes with full barrier curb and parking pullouts where available). Construction of curb and sidewalk fronting the east boundary of Lot 1, Plan 64775 will remain the responsibility of this development.

BC Hydro/Telus/Cable/Gas

- Refer to the respective utilities for their comments.

MAY 16, 2018

ATTACHMENT 1 APPLICATION SUMMARY



SUBJECT PROPERTY

Legal description:

Lot B, District Lot 244, Comox District, Plan 48438

MAY 16, 2018

Proposal:	To facilitate the development of 9 single-family residential lots, the proposed Development Variance Permit would vary Town of Comox Subdivision and Development Servicing Bylaw, 1261 to provide traffic calming, improve pedestrian infrastructure, improve neighbourhood aesthetics and allow for the provision of storm water management facilities on the site, in accordance with the "Lot B, Plan 48438, District Lot 224 Storm Water Management Plan" (SWMP), prepared by McElhanney Consulting Services Ltd, dated May 4, 2018.
Owner: Applicant:	Peter Gerritsen, Quest Homes Inc. Derek Jensen, McElhanney
Legal Description:	LOT B, DISTRICT LOT 244, COMOX DISTRICT, PLAN 48438
Civic Address:	SW Guthrie & Lazo Road intersection
Official Community Plan:	
Land Use Designation:	Residential: Ground Oriented Infill
Development Permit Areas:	DPA # 2 Ground Oriented Infill (exempt) DPA #16 Energy and Water Conservation and Reduction of Greenhouse Gas Emissions DPA # 17 Coach Houses (exempt)
Zoning:	R1.1 Single Family
Permitted uses:	Accessory structures and uses, Home occupations, Secondary suites, Single-family dwellings, Bed and Breakfast accommodations
Minimum parcel area	650 m ²
Min. parcel frontage:	20.0 m
Minimum parcel depth:	26.0 m
Maximum parcel coverage:	35%
Height and storey's:	9.0m
Minimum setbacks:	
front:	7.5 m
rear:	7.5 m
side (interior):	2.0 m
side (exterior):	3.5 m
Accessory Buildings:	60 m ² in gross floor area or 10% of parcel coverage whichever is less; Maximum 4.5 m in height
Surrounding Land Uses:	Single-Family zoned properties to the north, west and south; Lazo Road and CVRD large lot single family to the east.

Town of Comox Subdivision and Development Servicing Bylaw 1261

	REQUIRED	PROPOSED VARIANCES
Local Road		
Pavement Width	9.0 metres	6.0 metres With 2.4m pull-out parallel parking
Type of curb	Rollover Curb	Barrier curb, gutter;
Sidewalks	Back of curb, in accordance with drawing SC-10	Back of curb at parking pull-out and otherwise boulevard between back of curb and sidewalks, so that sidewalk alignment is parallel to vehicle lane
Street Trees and underground utilities alignment	In accordance with Schedule C.1, Appendix "H" Sec 1.2 drawings SH-1, SC-5 and SF-7	Location of street trees immediately adjacent to curb; provision of structural soil for the street trees of a composition and depth acceptable to the Parks Superintendent, in accordance with Figure 1, Schedule 1; and the location of storm and sanitary mains shall be beneath the road pavement.
Cul-de-sac		
Road dedication radius	17.0 metres	14.10 metres
Storm Water Management	Provision of storm drainage in accordance with Schedule C.1, Appendix E, Specifications for Storm Drainage, Section 1.2	Provision of storm drainage servicing in accordance with the "Lot B, Plan 48438, District Lot 224 Stormwater Management Plan" prepared by McElhanney Consulting Services Ltd, dated May 4, 2018.

MAY 16, 2018

**ATTACHMENT 2
APPLICANTS SUBMISSION****CONTENTS:**

1. Application
2. Proposed Subdivision Layout
3. Primary Tree Retention and Replacement Planting Area
4. Arborist Report
5. SWMP



April 11, 2018

Our File: 2211-47471-00

Mr. Marvin Kamenz
Municipal Planner
Town of Comox
1809 Beaufort Avenue
Comox, BC V9M 1R9

Dear Mr. Kamenz,

GUTHRIE ROAD / LAZO ROAD – APPLICATION FOR DEVELOPMENT VARIANCE PERMIT & DEVELOPMENT PERMIT #16 FOR LOT B, DISTRICT LOT 244, COMOX DISTRICT, PLAN 48438

We provide the following information in support of the above-noted:

Development Variance Permit

Requested variance to Town of Comox Subdivision & Servicing Bylaw 1261 to reduce the proposed cul-de-sac radius from 17m to 14.1m:

- This variance is required as a result of the overall parcel being of insufficient width to facilitate both lots meeting application zoning lot depth requirements and the standard cul-de-sac radius. Note there will be no impact to the turning movements within the proposed cul-de-sac as the curb radius geometry is unaffected by this request. A 2.9m wide SRW in favour of the Town will be established around the cul-de-sac perimeter for the provision of municipal and third-party infrastructure.

Development Permit #16

- Future homes will generally adhere to the Build Green BC Bronze building standard, including the use of low-flow plumbing fixtures and energy efficient appliances.
- Development stormwater management will be in accordance with the Town of Comox North-East Comox Stormwater Management Plan methodology towards mitigating the post-development stormwater impacts on the Lazo Marsh.
- Arborist assessment in support of DVP and DP application.

Yours truly,

MCELHANNEY CONSULTING SERVICES LTD.

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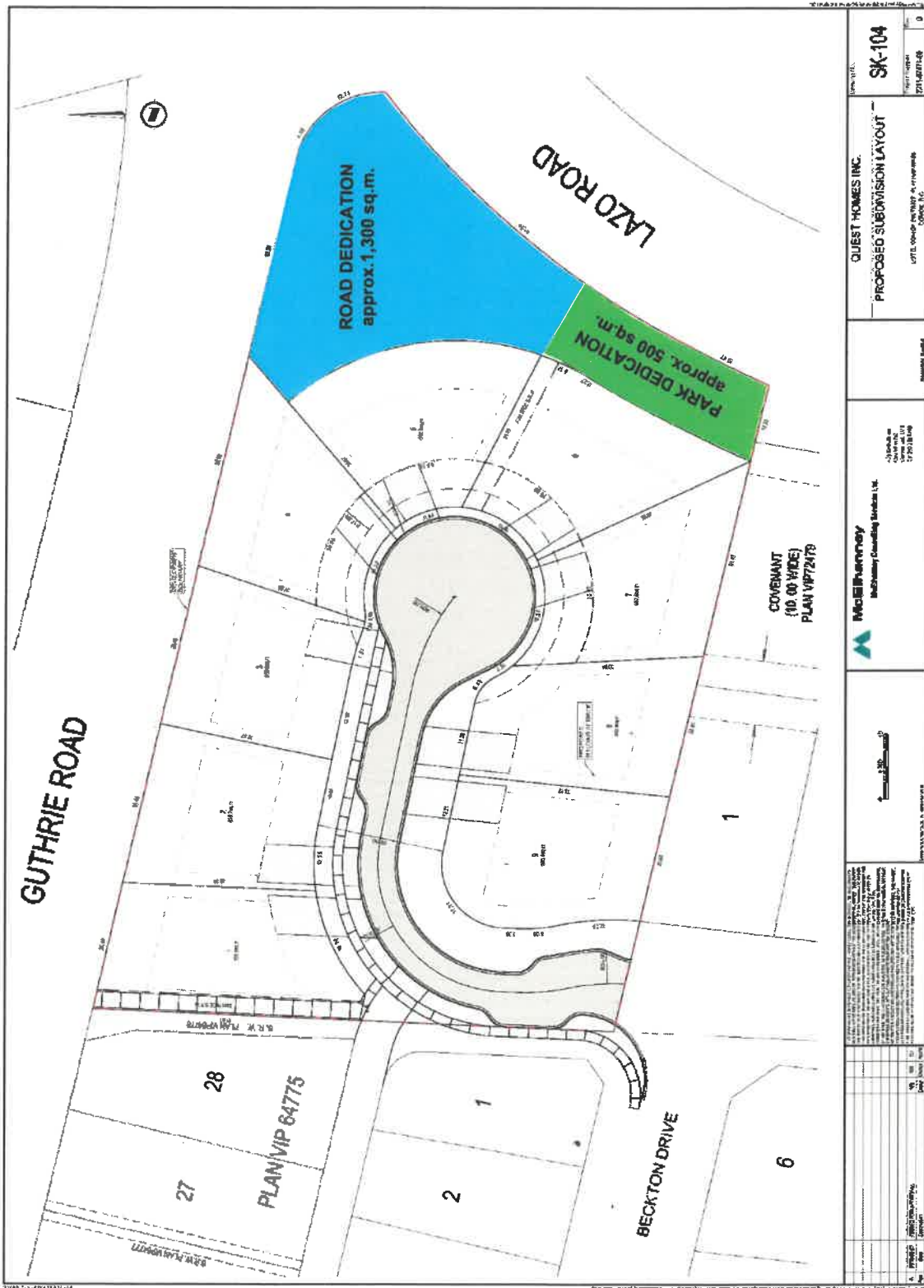
Derek Jensen, ASCT

Reviewed by:

A handwritten signature in blue ink, appearing to read 'Bob Hudson', written over a horizontal line.

Bob Hudson, P.Eng.
Branch Manager

Cc: Quest Homes, Peter Gerritsen
Town of Comox Regina Bozerocka



Proposed Subdivision Layout



May 7, 2018

Tree Inventory Assessment – Guthrie Road Development

Walter Ernst, RPF (#4071), ISA Certified Arborist (PN-7288A),
Certified Tree Risk Assessor, PMP

PROFESSIONALLY RESOURCEFUL

Table of Contents

1.0	Introduction and Background	2
1.1	Project Objectives	3
2.0	Methodology	3
3.0	Results / Discussion / Recommendations	4
4.0	Future Planning / Limitations	11
5.0	Signature and Professional Seal	12
	Appendix I – Tree Inventory Map	13
	Appendix II – Tree Inventory / Danger Tree Data	14
	Appendix III – Windthrow Assessment Map and Field Cards	15



1.0 Introduction and Background

A tree inventory assessment was completed on behalf of Quest Homes Inc. for a proposed residential site (Guthrie Road Development) on February 1st and 2nd by Walter Ernst (R.P.F. / ISA Cert. Arb. / Urban Tree Risk Assessor), and Alex Walton (ISA Cert. Arb. / Urban Tree Risk Assessor) of Strategic Natural Resource Consultants Inc. (SNRC).

The proposed development area is bound by Guthrie Road to the north, Lazo Road to the east, and existing residential lots to the south and west. The land parcel is identified as Lot B, District Lot 224, Comox District, and Plan 48438. Refer to Figure 1 for a locator map showing the development site.



Figure 1: Google Earth image showing the Guthrie Road development site.

A final site plan map showing the development design was provided by McElhanney Consulting Services Ltd. (McElhanney) following the tree inventory fieldwork (Drawing # SK105, dated 2018-03-28).

Previous discussions between Walter Ernst of SNRC and Bob Hudson of McElhanney outlined general project expectations with regards to inventory tree requirements. These initial discussions provided the basis for the methodologies used in the field and within this report.



1.1 Project Objectives

The following project objectives were determined for the field assessment:

Objective #1:

- Conduct a full tree inventory for the site and determine retention and removal trees based on tree health / defects, or where trees pose conflicts with the proposed development.

Objective #2:

- Determine the number of trees that can be retained within 7.5m rear-yard setback areas along the east, south, and north property edges.

Objective #3:

- Determine the number of trees that can be retained within a 12m Greenway buffer (proposed along the east property edge).

Objective #4:

- Determine the number of trees requiring removal as a result of the proposed pond area.

Objective #5:

- Conduct a windthrow assessment for the boundary segments associated with proposed retention trees.

Objective #6:

- Conduct the ecological classification of the site, including biogeoclimatic subzone and site series levels.

Objective #7:

- Identify invasive species concentrations within the proposed development area and incorporate management recommendations for the development phases.

2.0 Methodology

The tree inventory was conducted by identifying every tree within the project area. Each live tree with a DBH greater than or equal to 20cm (whether dead or alive) was tallied, and species information was collected for each inventory tree. For each inventory tree it was determined whether it should be retained or removed based on the following parameters:

- Existing site plan information including tree locations with respect to proposed building envelopes, a pond system, the access road, rear-yard setbacks, and
- The current health of the trees, including the risk they pose to the future development and the general public.

Based on design changes within the final site plan, updates to retention and removal tree designations were required. Marking of final retention trees in the field (pink ribbon) will require updating prior to commencement of development activities.



As previously discussed with McElhanney, rear-yard setbacks along Lots 1 to 9 were set at 7.5m in order to determine potential retention trees within those areas.

Refer to Appendix I for the tree inventory map which identifies the inventory trees and Appendix II for the tree inventory data. Equipment utilized for the field assessment included a laser, iPad (with a geo-referenced map), mallet, and a diameter tape.

Site description details were noted for the project area such as ecological information (biogeoclimatic subzone (BEC), site series), stand types, ground vegetation, soil characteristics, previous stand disturbances, drainage patterns, and overall health / site conditions through the area.

3.0 Results / Discussion / Recommendations

Site Description (Objective 6):

Based on provincial biogeoclimatic (BEC) zone mapping, the development area is located within the Very Dry Maritime Coastal Western Hemlock subzone variant (CWHxm). This subzone variant is typified by warm, dry summers and moist, mild winters with relatively little snowfall. Growing seasons are typically long with potential water deficits on zonal sites.

The site series is 01-80% and 05-20%. Soil moisture is fresh and soil nutrient level is medium with rich influences. The ground is flat to gently sloping (0-5% grades) and is well drained overall. Machine trails exist within portions of the site.

The site is fully timbered with small openings and consists of predominantly second growth Douglas-fir (*Pseudotsuga menziesii*) with minor secondary components of red alder (*Alnus rubra*), bigleaf maple (*Acer macrophyllum*), Western red cedar (*Thuja plicata*), grand fir (*Abies grandis*), Casacara (*Rhamnus purshiana*), Sitka spruce (*Picea sitchensis*), bitter cherry (*Prunus emarginata*), and a trace of Western hemlock (*Tsuga heterophylla*). Large old growth Douglas-fir stumps from historic logging were indicative of the previous stand type. Additionally fire scars were evident on the stumps indicated the site was burned post-logging. *Armillaria ostoyae* root rot is scattered within the site with approximately 5-10% of trees infected; however, the majority of the trees are still showing fairly healthy crowns. Additionally some of the older mature deciduous stems (mostly red alder and bigleaf maple) showed signs of rot in their stems. Heavy deer sign was observed within the site including scat and browse on various shrub species). Understory regeneration was very minimal and were predominantly of poorer health. Negligible recent windthrow exists on the site. Most downed logs have been on the ground for some time and were likely associated with trees that had root rot issues.

Native vegetation consists of predominantly salal, sword fern, bracken fern, dull Oregon grape, and red huckleberry. Mosses consist predominantly of Oregon beaked moss and lanky moss with lesser amounts of leafy moss. Invasive species consist predominantly of English holly, with secondary components of Scotch broom, Himalayan blackberry, and spurge laurel.

Refer to Figures 2 and 2a for a photo showing the timber and vegetation of the CWHxm 01 / 05 type.





Figure 2: Photo showing the timber and vegetation of the CWHxm 01 / 05 type.



Figure 2a: Photo showing the timber and vegetation of the CWHxm 01 / 05 type. A fir stump is evident in the foreground.

Tree Inventory (Objectives 1 to 4):

Based on the assessment a total of 355 trees were assessed, including 259 Douglas-fir, 40 red alder, 37 bigleaf maple, 4 Western red cedar, 4 grand fir, 4 cascara, 3 Sitka spruce, 3 bitter cherry, and 1 Western hemlock. Of the total inventory trees, 285 are proposed for removal and 62 are proposed for retention (8 additional trees along the Lazo Road dedication are located outside of the development and have now been excluded from the proposed retention). Of the removal trees the following was established:

- 139 of the removal trees are located within planned service structure alignment such as the access road, sidewalk structure, and the pond area. These removal trees will not count towards replacement tree calculations.
- 146 of the removal trees are located outside of the planned service structure alignments. These removal trees will count towards replacement tree calculations.

Additionally 3 hazard trees were identified (DTs 1 to 3 – Douglas-fir).

Refer to Appendix I for mapped inventory trees and Appendix II for inventory tree data and danger tree data with specific recommendations for each tree.

Very few juvenile trees of good health were observed in the understory. Approximately 2 grand fir of good health and form were noted. Overall young saplings consisted of predominantly Douglas-fir and grand fir ranging in heights from 3 to 6m. Given the scattered root rot incidence in the area it is not recommended to utilize these juvenile species given they are susceptible to the disease.

Specific to the 12m greenway, 29 trees are proposed for retention and 25 are proposed for removal. Refer to Figure 3 for a photo showing proposed retention trees with the 12m Greenway.





Figure 3: Photo showing proposed retention trees within the 12m Greenway (pink ribbon).

Within the 7.5m rear-yard setback areas of Lots 1 to 9, there are 46 trees. Of these trees, 33 are proposed for retention and 13 are proposed for removal. Refer to Figure 4 for a photo showing some retention trees along the 7.5m rear-yard setback for Lots 7 to 9.



Figure 4: Photo showing some retention trees along the 7.5m rear-yard setback for Lots 7 to 9.

All retention candidates indicated were assessed for health and defect issues and were determined to be of moderate to good health overall and of low risk. Additionally the

driplines of the proposed retention trees should not conflict with the adjacent construction works.

Windthrow Assessment (Objective 5):

A preliminary windthrow assessment was completed for the retention edges along the 7.5m rear-yard setback areas and the 12m Greenway. The windthrow hazard ratings have been summarized in Table 1 below:

Table 1: Windthrow hazard ratings along development boundary edges.

Segment Identification	Windthrow Hazard	Recommendations
A (trees within 7.5m rear-yard setback of Lots 1 to 3)	Moderate	None at this stage. Assess edge post-clearing / construction.
B (trees within 7.5m rear-yard setback of Lots 5 to 9 and the 12m Greenway)	Low	None at this stage. Assess edge post-clearing / construction.
C (remaining area of property)	Nil	None.

Segment A (trees with windward orientation to dominant SE winds) is located along the 7.5m rear-yard setback areas for Lots 1 to 3 and consists of 6 retention trees which are predominantly dominant to co-dominant Douglas-fir trees that are well established. These trees generally have moderate to good windfirmness depending on the depth of the soils. This segment has a Moderate windthrow hazard mainly due to the windward orientation of the trees in combination with the increased exposure to winds once the adjacent trees are felled. The retention trees on the south side of the property should provide some protection from the dominant southeasterly winds in the area. No recommendations are noted for this edge; however, it should be re-assessed post-clearing / construction in the event any roots have been damaged from construction activities. Additionally due to the presence of *Armillaria* root rot within the site, this adds some unpredictability with regards to windfirmness so as the stand is cleared, signs and symptoms may become more visible.

Segment B (trees with windward to leeward orientation to dominant SE winds) are located along the 7.5m rear-yard setbacks of Lots 5 to 9 and the 12m greenway area and consist of 62 retention trees which are predominantly dominant to co-dominant Douglas-fir trees that are well established. The trees along these edges have previously been exposed to the dominant southeasterly winds and should be mostly acclimated. Additionally some there is some wind protection from timbered sections adjacent the south / southeast sides of the property. Based on the above information these trees have Low windthrow hazards. No recommendations are noted for these edges; however, they should be re-assessed post-clearing / construction in the event any roots have been damaged from construction activities. Additionally due to the presence of *Armillaria* root rot within the site, this adds some unpredictability with regards to windfirmness so as the stand is cleared, signs and symptoms may become more visible.



Segment C:

This segment has a Nil windthrow risk as no trees will remain post clearing and construction activities. Therefore, no recommendations are noted.

Refer to Appendix III – Windthrow Assessment Map / Windthrow Field Cards.

Tree Removal and Tree Protection Recommendations:

- For the removal trees, specific directions were noted for falling (refer to Appendix II): All trees were prescribed for directional hand-falling away from retention trees or piecing down. However, the falling method will be up to the faller to decide the safest way to remove the trees while minimizing damage to the adjacent retention trees or structures along neighbouring properties.
- **Tree protection zones (TPZs)** are recommended to be installed around select leave trees at a radius equal to the length of the longest branch (drip-line) prior to any development activity. The critical root zone (CRZ) of trees lay within the dripline area. TPZs should be clearly visible with adequate signage (recommended plastic mesh or snow fencing secured with adequate posts (e.g. rebar stakes) to ensure stability throughout the construction phases). Refer to Figure 8 for a diagram showing the critical root zone and the tree protection zone fencing required. These areas should be discussed with construction crews to ensure that limitations within TPZs are understood. Within designated TPZs, there should be no construction works (surface and / or sub-surface), no movement of vehicles and equipment, and no material storage of any materials of any kind. If the full recommended TPZ cannot be maintained, or if any construction activities must be completed within a TPZ, a certified arborist should be consulted to determine the potential impacts to the tree(s) prior to commencement of work (refer to Appendix II – Inventory Tree Data for specific TPZ requirements for each leave tree).



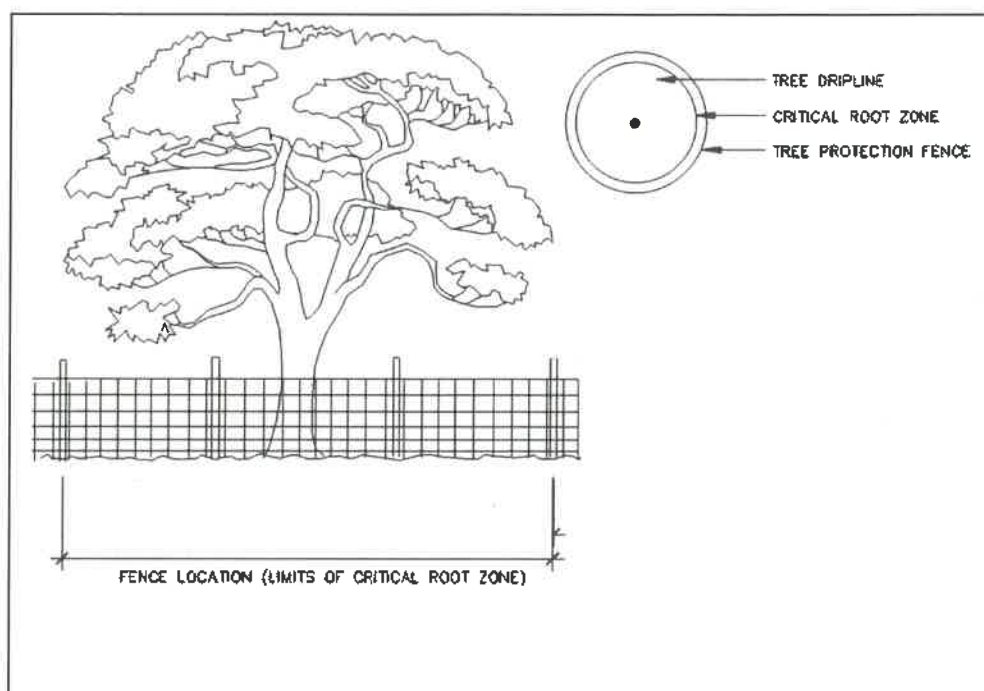


Figure 8: Diagram showing the critical root zone and tree protection zone fencing requirements.

Invasive Species Management (Objective 7):

English holly, with secondary components of Scotch broom, Himalayan blackberry, and spurge laurel exist on the site.

The following general recommendations have been made for the eradication, control, and minimization of further spread of the above species within the site and into other neighboring sites. These recommendations were taken from the Coastal Invasive Species Committee website (www.coastalisc.com/priority-invasive-plants).

- Recommend removal of all invasive species plants prior to development through manual methods (cut / pull by hand or with heavy machinery) with the goal of minimizing further spread during the construction phases. The method and timing of removal used should be tailored to the specific invasive species as indicated on the Invasive Species Committee website (ISC).
- During construction activities, ensure that all equipment (hand tools) and machinery are free of plant parts or soil prior to entering and leaving the worksite to minimize spread of invasive seed or plant parts. Consider utilizing a wash-down station for machinery at a designated location.
- For landscaping purposes, it is recommended to plant with suitable alternative (native) species as soon as possible within the eradicated areas. A layer of mulch may be incorporated within planted areas to minimize re-establishment of invasive species.
- Over the long term, repeated manual treatments of invasive plants may be required to effectively control some species.



4.0 Future Planning / Limitations

Long term planning recommendations:

- The developer should work closely with an arborist throughout the planning / development process, to ensure that the net benefit acquired through retention trees are maximized and that associated hazards are effectively mitigated.
- Specifically, a certified arborist should be present / consulted at the following times:
 - To advise on any new works and / or changes to development plans occurring near retention trees or those that have the potential to affect retention trees.
 - To monitor construction works occurring directly adjacent to trees (e.g. road grading, ditching, trenching etc.) that have the potential to affect tree roots and / or the tree stems / branches.
 - After significant weather events (high winds, storms, etc.), that may have the potential to create new hazards and / or change the suitability of retention trees.
- A post construction hazard tree assessment should be completed to ensure that retention trees are free from construction damages and / or other damaging agents.

Limitations:

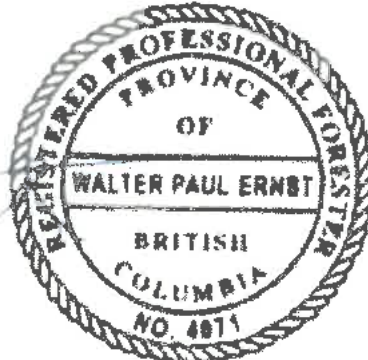
- Field observations and retention recommendations during the tree inventory were based on the preliminary schematic for the proposed development provided by engineers of McEhanney (Drawing # SK105, dated 2018-03-28) and on the proposed trail alignment. If there are significant variances to this plan or the trail alignment, it is recommended a certified arborist be consulted to review and field visit the site.
- The tree inventory assessment was completed under the site conditions (weather, natural / unnatural disturbances etc.) present at the time of the assessment and with the tools available (laser, iPad (with geo-referenced map), D-tape, mallet). If the site conditions change significantly, it is recommended a certified arborist field review the site to determine if the risk to retention trees has changed.
- Specific to the windthrow assessment details, given that *Armillaria* root rot is scattered within the development this adds some unpredictability with regards to windfirmness in Douglas-fir. Trees infected with *Armillaria* can remain visually healthy in the crown for a long period of time even though the root systems are slowly being degraded. Therefore, it is recommended to review each tree during the development phases and post-clearing / construction as signs and symptoms of the root rot may become more visible.



5.0 Signature and Professional Seal

Field work completed by: Walter Ernst, RPF (#4071), ISA Certified Arborist (PN-7288A), and Certified Tree Risk Assessor and Alex Walton, ISA Certified Arborist (PN-7140A), Certified Tree Risk Assessor.

Report completed by: Walter Ernst, RPF (#4071), ISA Certified Arborist (PN-7288A), Certified Tree Risk Assessor.

Signature and Seal	
	
2018-05-07	
Date (dd/mm/yy)	



Appendix I – Tree Inventory Map





Projection: NAD 1983 UTM Zone 10N
Scale: 1:500
Date: 4/24/2018
Produced By: zola.richards

Appendix II – Tree Inventory / Danger Tree Data



Tree Inventory Assessment Form:

Location: Guthrie Road Development
 Completed by: Walter Ernst, RPF, ISA Cert Arb., PMP and Alex Widton, ISA Cert Arb.
 Date: 2/2/2018 and 3/2/2018

Tree #	Sp.	DBH (cm)	HT (m)	Wk	Tree Location	Tree Protection Zone (TPZ)	Condition (defects, health)	Treatment Recommendations
1	Fdc	50.0	20.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
2	Fdc	51.0	20.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
3	Dw	30.0	11.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
4	Mb	21.0	18.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
5	Mb	25.0	10.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
6	Fdc	52.0	15.0	H	Within Pond Area	N/A	Tree with heavy basal form into property. Some root lifting noted. Hazard. Does not count towards replacement tree calculation.	Directionally handfall
7	Kc	23.0	12.0	H	Outside property	N/A	Heavy rot in stem and leaning towards Lake Rd. Does not count towards replacement tree calculation.	Directionally handfall
8	Kc	20.0	12.0	H	Outside property	N/A	Heavy rot in stem and leaning towards Lake Rd. Does not count towards replacement tree calculation.	Directionally handfall
9	Fdc	35.0	18.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
10	Fdc	50.0	24.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
11	Fdc	40.0	15.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
12	Fdc	32.0	18.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
13	Fdc	48.0	25.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
14	Fdc	35.0	16.0	M	Within Pond Area	N/A	Declining Fdc with potential root rot. Does not count towards replacement tree calculation.	Directionally handfall
15	Fdc	34.0	16.0	L-M	Within Pond Area	N/A	Tree slowly declining with potential root rot. Does not count towards replacement tree calculation.	Directionally handfall
16	Fdc	35.0	16.0	L	Outside property	5.0	Healthy tree. Does not count towards retention etc.	Retain
17	Mb	37.0	13.0	M	Within Pond Area	N/A	Mature to overmature maple with high rot potential. Does not count towards replacement tree calculation.	Directionally handfall or place down
18	Mb	38.0	18.0	M	Within Pond Area	N/A	Mature to overmature maple with high rot potential. Does not count towards replacement tree calculation.	Directionally handfall or place down
19	Mb	35.0	28.0	M	Within Pond Area	N/A	Mature to overmature maple with high rot potential. Does not count towards replacement tree calculation.	Directionally handfall or place down
20	Mb	43.0	23.0	M	Within Pond Area	N/A	Mature to overmature maple with high rot potential. Does not count towards replacement tree calculation.	Directionally handfall or place down
21	Fdc	45.0	26.0	L	Outside property	5.0	Healthy tree. Does not count towards retention etc.	Retain
22	Fdc	38.0	26.0	L	Outside property	4.0	Healthy tree. Does not count towards retention etc.	Retain
23	Fdc	58.0	24.0	L	Outside property	4.0	Healthy tree. Does not count towards retention etc.	Retain
24	Fdc	34.0	16.0	L	Outside property	5.5	Healthy tree. Does not count towards retention etc.	Retain
25	Fdc	48.0	28.0	L	Outside property	5.5	Healthy tree. Does not count towards retention etc.	Retain
26	Fdc	31.0	16.0	L	Outside property	3.0	Healthy tree. Does not count towards retention etc.	Retain
27	Fdc	34.0	23.0	L	12m greenway	4.0	Healthy tree.	Retain
28	Fdc	26.0	17.0	L-M	12m greenway	4.0	Moderate health.	Retain
29	Fdc	48.0	28.0	L	Outside property	5.0	Healthy tree. Does not count towards retention etc.	Retain
30	Fdc	38.0	26.0	L	12m greenway	4.0	Healthy tree.	Retain
31	Fdc	31.0	28.0	L	12m greenway	4.0	Healthy tree.	Retain
32	Dw	21.0	15.0	L-M	12m greenway	N/A	Alder with some rot.	Directionally handfall
33	Fdc	37.0	26.0	L	12m greenway	4.0	Healthy tree.	Retain
34	Fdc	36.0	22.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
35	Fdc	31.0	22.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
36	Fdc	36.0	25.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
37	Fdc	24.0	17.0	L	12m greenway	5.0	Healthy tree.	Retain
38	Mb	19.0	15.0	L	12m greenway	3.0	Healthy tree.	Retain
39	Fdc	47.0	28.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall
40	Fdc	23.0	16.0	L	12m greenway	4.0	Healthy tree.	Retain
41	Fdc	37.0	28.0	L	12m greenway	5.0	Healthy tree.	Retain
42	Fdc	44.0	26.0	L	12m greenway	5.0	Healthy tree.	Retain
43	Fdc	20.0	13.0	L	12m greenway	4.0	Healthy tree.	Retain
44	Fdc	34.0	16.0	L	12m greenway	4.0	Healthy tree.	Retain
45	Fdc	34.0	20.0	L	12m greenway	4.0	Healthy tree.	Retain
46	Fdc	34.0	24.0	L	12m greenway	4.0	Healthy tree.	Retain
47	Fdc	22.0	18.0	L	12m greenway	4.0	Healthy tree.	Retain
48	Fdc	38.0	17.0	L	12m greenway	3.0	Splendid tree.	Retain
49	Fdc	28.0	26.0	L	12m greenway	3.0		Retain
50	Fdc	34.0	24.0	L	12m greenway	5.0		Retain
51	Fdc	21.0	16.0	L	12m greenway	3.0		Retain
52	Mb	24.0	16.0	L	12m greenway	3.0		Retain
53	Fdc	40.0	24.0	L	12m greenway	3.0		Retain
54	Fdc	21.0	15.0	L	12m greenway	4.0		Retain
55	Fdc	24.0	16.0	M	12m greenway	N/A	Root rot in infected tree (Armstrong).	Directionally handfall
56	Fdc	20.0	6.0	L	12m greenway	3.0		Retain
57	Fdc	25.0	11.0	L	12m greenway	3.5		Retain
58	Fdc	47.0	30.0	L	12m greenway	4.5		Retain
59	Fdc	57.0	27.0	L	12m greenway	5.0		Retain
60	Fdc	38.0	25.0	L	12m greenway	5.0		Retain
61	Fdc	38.0	25.0	L	12m greenway	5.0		Retain
62	Fdc	24.0	20.0	L	12m greenway	4.0		Retain
63	Fdc	26.0	18.0	L	Rear yard setback	4.0	Drill hole just at edge of setback.	Retain
64	Mb	35.0	10.0	L	Rear yard setback	4.0	Healthy tree.	Retain
65	Fdc	40.0	28.0	L	Rear yard setback	5.5	Healthy tree.	Retain
66	Dw	21.0	18.0	L	Property enclosure	N/A		Directionally handfall
67	Fdc	30.0	22.0	L	Rear yard setback	N/A	Potential rot with old scar.	Directionally handfall

Tree #	Sp.	DBH (cm)	HT (m)	Rad.	Tree Location	Tree Protection Zone (TPZ)	Condition (Medicinal, Health)	Treatment Recommendations
68	Fdc	30.0	17.0	L	Rear yard setback	N/A	Significant scar and rot at base.	Directionally handfall
69	Fdc	30.0	17.0	L	Rear yard setback	4.0		Retain
70	Fdc	40.0	30.0	L	Rear yard setback	5.0		Retain
71	Ow	20.0	10.0	L	Rear yard setback	4.0		Retain
72	Dr	20.0	10.0	L	Rear yard setback	3.0		Retain
73	Fdc	40.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
74	Nb	12.0	10.0	L	Rear yard setback	5.0		Retain
75	Fdc	35.0	30.0	L	Rear yard setback	5.0		Retain
76	Fdc	35.0	23.0	L	Just in Property enclosure	N/A		Directionally handfall or piece down
77	Dr	22.0	17.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
78	Fdc	28.0	15.0	L	Rear yard setback	4.0		Retain
79	Fdc	30.0	15.0	L	Rear yard setback	5.0		Retain
80	Dr	20.0	16.0	L	Just in Property enclosure	N/A		Directionally handfall
81	Dr	20.0	16.0	L	Just in Property enclosure	N/A		Directionally handfall
82	Dr	20.0	16.0	L	Just in Property enclosure	N/A		Directionally handfall
83	Dr	27.0	14.0	L	Just in Property enclosure	N/A		Directionally handfall
84	Dr	20.0	11.0	L	Rear yard setback	N/A	Drillings significantly overlaps development.	Directionally handfall
85	Fdc	50.0	30.0	L	Just in Property enclosure	N/A		Directionally handfall or piece down
86	Fdc	47.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall
87	Dr	26.0	12.0	M	Within Property Enclosure	N/A	Alder with rot in scars at base.	Directionally handfall
88	Fdc	76.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall
89	Fdc	57.0	16.0	M	Rear yard setback	N/A	Dead standing tree.	Directionally handfall or piece down
90	Dr	25.0	10.0	L	Rear yard setback	N/A	Drillings significantly overlaps development.	Directionally handfall or piece down
91	Fdc	26.0	7.0	L	Rear yard setback	3.0		Retain
92	Fdc	20	13	L	Rear yard setback	N/A	Drillings significantly overlaps development.	Directionally handfall
93	Dr	40	28	L	Rear yard setback	N/A	Drillings significantly overlaps development.	Directionally handfall
94	Dr	36	10	L	Rear yard setback	N/A	Alder with broken top and significant rot.	Directionally handfall
95	Nb	24	10	L	Rear yard setback	4.0	Spindly tree.	Retain
96	Fdc	36	18	L	Rear yard setback	5.0		Retain
97	Fdc	86	28	L	Within Property Enclosure	N/A		Directionally handfall
98	Fdc	72	15	L	Rear yard setback	4.0		Retain
99	Fdc	92	15	L	Just in property enclosure	N/A		Directionally handfall
100	Dr	20	8	L	Just in property enclosure	N/A		Directionally handfall
101	Fdc	37	18	L	Rear yard setback	N/A	Drillings significantly overlaps development.	Directionally handfall
102	Nb	23	8	N/A	Rear yard setback	N/A	Significant split in stem.	Directionally handfall
103	Fdc	40	30	L	Rear yard setback	N/A	Drillings significantly overlaps development.	Directionally handfall
104	Fdc	37	28	L	Rear yard setback	N/A		Directionally handfall
105	Fdc	95	22	L	Rear yard setback	5.0		Retain
106	Fdc	57	20	L	Rear yard setback	5.0		Retain
107	Fdc	30	20	L	Rear yard setback	5.0		Retain
108	Dr	21	16	L	Rear yard setback	3.0		Retain
109	Fdc	40	30	L	Within Property Enclosure	N/A		Directionally handfall
110	Fdc	21	9	L	Within Property Enclosure	N/A		Directionally handfall
111	Fdc	40	28.7	L	Rear yard setback	N/A		Directionally handfall
112	Fdc	40	25.7	L	Rear yard setback	5.0		Retain
113	Fdc	36	16	L	Within Property Enclosure	N/A		Directionally handfall
114	Fdc	48.3	28	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
115	Fdc	51	28	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
116	Fdc	34	12	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
117	Fdc	47.3	20	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
118	Nb	82	12	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
119	Fdc	72	30	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
120	Nb	72	12	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
121	Fdc	50	12	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
122	Nb	54	18	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
123	Fdc	40.0	30.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
124	Dr	26.0	15.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
125	Dr	23.0	16.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
126	Fdc	20.0	14.0	L-48	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
127	Fdc	38.0	16.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
128	Dr	20.0	16.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
129	Fdc	38.0	22.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
130	Fdc	24.0	11.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
131	Nb	38.0	15.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
132	Dr	20.0	15.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
133	Nb	19.0	15.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
134	Nb	16.0	15.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
135	Nb	40.0	30.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
136	Ow	25.0	10.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
137	Dr	46.0	28.0	M	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall
138	Fdc	61.0	30.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
139	Dr	23.0	15.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
140	Ow	25.0	12.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down

Tree #	Sp.	DBH (cm)	Ht (m)	Shb	Tree Location	Tree Protection Zone (TPZ)	Condition (defects, health)	Treatment Recommendations
141	Fdc	32.0	30.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
142	Fdc	40.0	30.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
143	Fdc	36.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
144	Bg	35.0	14.0	M	Within Property Enclosure	N/A	Tree possibly dead standing but hard to tell if all needles gone.	Directionally handfall or piece down
145	Yb	20.0	13.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
146	Fdc	20.0	16.0	M	Within Property Enclosure	N/A	Tree possibly dead standing but hard to tell if all needles gone.	Directionally handfall or piece down
147	Fdc	43.0	30.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
148	Fdc	25.0	11.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
149	Fdc	43.0	30.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
150	Fdc	42.0	30.0	L	Within Service Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
151	Fdc	37.0	26.0	L	Within Service Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
152	Fdc	40.0	28.0	L	Within Service Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
153	Fdc	38.0	28.0	L	Within Service Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
154	Fdc	38.0	28.0	L	Within Service Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
155	Fdc	35.0	12.0	L	Within Service Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
156	Bg	27.0	18.0	L	Within Service Infrastructure	N/A	Does not count towards replacement tree calculation.	Piece down
157	Dr	28.0	18.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
158	Dr	14.0	20.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
159	Fdc	24.0	20.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
160	Fdc	30.0	26.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
161	Fdc	27.0	18.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
162	Fdc	35.0	26.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
163	Fdc	35.0	15.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
164	Fdc	23.0	10.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
165	Mb	20.0	17.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
166	Mb	21.0	14.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
167	Dr	21.0	18.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
168	Dr	21.0	18.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
169	Dr	20.0	17.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
170	Dr	16.0	11.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
171	Dr	20.0	10.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
172	Fdc	36.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
173	Fdc	30.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
174	Fdc	23.0	14.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
175	Fdc	13.0	10.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
176	Fdc	37.0	23.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
177	So	10.0	10.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
178	Fdc	22.0	20.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
179	Fdc	16.0	24.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
180	Fdc	18.0	24.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
181	Fdc	20.0	18.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
182	Dr	30.0	14.0	M	Within Access Rd Infrastructure	N/A	Significant rot in stem. Does not count towards replacement tree calculation.	Directionally handfall or piece down
183	Fdc	35.0	24.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
184	Fdc	28.0	15.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
185	Fdc	39.0	28.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
186	Fdc	33.0	28.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
187	Fdc	23.0	11.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
188	Fdc	20.0	20.0	M	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
189	Fdc	16.0	20.0	M	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
190	Fdc	40.0	28.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
191	Mb	28.0	18.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
192	Fdc	28.0	22.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
193	Dr	23.0	8.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
194	Dr	24.0	12.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
195	Fdc	30.0	25.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
196	Fdc	38.0	27.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
197	Fdc	22.0	17.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
198	Fdc	42.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
199	Fdc	36.0	27.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
200	Fdc	36.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
201	Mb	22.0	17.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
202	Dr	22.0	15.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
203	Mb	26.0	15.0	L	Within Property Enclosure	N/A	3 copious stems.	Directionally handfall or piece down
204	Fdc	25.0	23.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
205	Fdc	35.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
206	Fdc	32.0	18.0	M	Within Property Enclosure	N/A	Heavy pitching on tree stem.	Directionally handfall or piece down
207	Fdc	44.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
208	Fdc	40.0	28.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
209	Dr	21.0	14.0	M	Within Property Enclosure	N/A	Fungus growing on tree.	Directionally handfall or piece down
210	Dr	28.0	15.0	L-M	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
211	Dr	28.0	15.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
212	Fdc	40.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down

Tree #	Sp.	DH (cm)	H (m)	DBH	Tree Location	Tree Protection Zone (TPZ)	Condition (defects, health)	Treatment Recommendation
219	Fdc	31.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
224	Fdc	30.0	20.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
215	Fdc	36.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
216	Fdc	38.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
217	Fdc	37.0	25.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
218	MB	27.0	11.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
219	Fdc	38.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
220	Fdc	40.0	26.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
221	Fdc	35.0	17.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
222	Fdc	37.0	29.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
223	MB	22.0	18.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
224	MB	25.0	18.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
225	Fdc	34.0	26.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
226	Fdc	37.0	24.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
227	MB	20.0	16.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
228	Fdc	33.0	73.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
229	Fdc	38.0	23.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
230	Fdc	25.0	18.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
231	Fdc	37.8	27.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
232	MB	12.0	15.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
233	MB	10.0	15.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
234	Ke	12.0	10.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
235	Fdc	50.0	23.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
236	Fdc	38.0	26.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
237	Fdc	37.0	38.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
238	Fdc	35.0	26.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
239	Fdc	27.0	19.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
240	Fdc	22.0	26.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
241	Fdc	38.0	18.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
242	Fdc	36.0	28.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
243	Fdc	26.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
244	Fdc	38.0	16.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
245	Fdc	27.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
246	MB	21.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
247	Fdc	16.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
248	Fdc	32.0	28.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
249	Fdc	32.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
250	Fdc	38.0	20.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
251	Fdc	38.0	18.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
252	Fdc	24.0	26.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
253	Fdc	39.0	28.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
254	Fdc	35.0	28.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
255	Fdc	39.0	30.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
256	MB	36.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
257	Fdc	40.0	38.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
258	Fdc	22.0	18.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
259	Fdc	36.0	22.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
260	Fdc	38.0	26.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
261	Fdc	28.0	27.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
262	Fdc	38.0	20.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
263	Fdc	30.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
264	Fdc	37.0	27.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
265	Fdc	37.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
266	MB	10.0	10.0	MB	Within Property Enclosure	N/A		Directionally handfall or place down
267	Fdc	16.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
268	Fdc	12.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
269	Fdc	10.0	22.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
270	Fdc	27.0	10.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
271	Fdc	38.0	26.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
272	Fdc	12.0	12.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
273	Fdc	32.0	16.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
274	Fdc	18.0	27.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
275	Fdc	23.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
276	Fdc	40.0	30.0	L+M	Within Property Enclosure	N/A	Plentuous pine cones on stem.	Directionally handfall or place down
277	Fdc	25.0	17.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
278	MB	37.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
279	Fdc	30.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
280	MB	36.0	24.0	L	Within Property Enclosure	N/A		Directionally handfall or place down
281	Fdc	37.0	28.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
282	Fdc	22.0	14.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
283	Se	30.0	11.0	L	Within Access Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or place down
284	Fdc	16.0	11.0	H	Within Access Rd Infrastructure	N/A	Tree with heavy root lift. Does not count towards replacement tree calculation.	Directionally handfall or place down

Tree #	Sp.	DBH (cm)	Ht (m)	Skd.	Tree Location	Tree Protection Zone (TPZ)	Condition (defects, health)	Treatment Recommendations
285	Fdc	44.0	30.0	L	Within Access/Rd Infrastructure	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
286	MB	24.0	13.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
287	Fdc	22.0	15.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
288	Fdc	37.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
289	Fdc	66.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
290	Fdc	24.0	18.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
291	Fdc	33.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
292	Fdc	37.0	28.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
293	Fdc	32.0	18.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
294	Bg	23.0	16.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
295	Dr	11.0	13.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
296	Fdc	40.0	26.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
297	Fdc	37.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
298	Fdc	30.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
299	Fdc	22.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
300	Fdc	31.0	26.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
301	Fdc	28.0	23.0	L	Rear yard setback	5.0		Retain
302	Mb	10.0	17.0	L	Rear yard setback	5.0		Retain
303	Fdc	37.0	30.0	L	Rear yard setback	7.0		Retain
304	Fdc	36.0	27.0	L	Rear yard setback	7.0		Retain
305	Mb	12.0	11.0	L	Rear yard setback	4.0		Retain
306	Fdc	26.0	14.0	L	Rear yard setback	5.0		Retain
307	Mb	20.0	13.0	L	Rear yard setback	4.0		Retain
308	Fdc	24.0	20.0	L	Rear yard setback	5.0		Retain
309	Fdc	34.0	25.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
310	Dr	11.0	18.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
311	Fdc	38.0	25.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
312	Fdc	38.0	25.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
313	Fdc	30.0	25.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
314	Dr	22.0	17.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
315	Fdc	45.0	30.0	L	Rear yard setback	7.0		Retain
316	Fdc	36.0	28.0	L	Rear yard setback	5.0		Retain
317	Fdc	35.0	26.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
318	Fdc	36.0	26.0	L	Rear yard setback	5.0		Retain
319	Fdc	35.0	28.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
320	Fdc	32.0	30.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
321	Fdc	36.0	26.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
322	Fdc	37.0	28.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
323	Mb	26.0	27.0	L	Rear yard setback	6.0		Retain
324	Mb	21.0	17.0	L	Rear yard setback	4.0		Retain
325	Fdc	30.0	12.0	MM	Within Property Enclosure	N/A	Rot in stem.	Directionally handfall or piece down
326	Cw	36.0	28.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
327	Dr	39.0	18.0	MM	Within Pond Area	N/A	Rot in stem. Does not count towards replacement tree calculation.	Directionally handfall or piece down
328	Fdc	36.0	28.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
329	Fdc	40.0	30.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
330	Fdc	46.0	30.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
331	Fdc	34.0	25.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
332	Fdc	50.0	25.0	M	Within Pond Area	N/A	Included bark at fork union. Weak attachment.	Directionally handfall or piece down
333	Fdc	38.0	30.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
334	Fdc	32.0	30.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
335	Fdc	53.0	24.0	H	Within Pond Area	N/A	Root lift and heavy lean. Does not count towards replacement tree calculation.	Directionally handfall or piece down
336	Fdc	37.0	30.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
337	Fdc	23.0	9.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
338	Fdc	37.0	20.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
339	Mb	42.0	14.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
340	Fdc	37.0	30.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
341	Fdc	20.0	17.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
342	Fdc	35.0	25.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
343	Fdc	36.0	25.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
344	Fdc	22.0	10.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
345	Fdc	35.0	25.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
346	Fdc	21.0	13.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
347	Fdc	23.0	14.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
348	Fdc	37.0	20.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
349	Fdc	31.0	23.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
350	Fdc	48.0	20.0	L	Within Pond Area	N/A	Broken top. Does not count towards replacement tree calculation.	Directionally handfall or piece down
351	Fdc	50.0	10.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
352	Fdc	32.0	12.0	L	Within Pond Area	N/A	Does not count towards replacement tree calculation.	Directionally handfall or piece down
353	Ss	22.0	10.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
354	Bg	29.0	12.0	L	Within Property Enclosure	N/A		Directionally handfall or piece down
355	Fdc	37.0	30	L	Within Property Enclosure	N/A		Directionally handfall or piece down
AVG:		31.7	30.6					

Inventory Tree Summary:

Species	#	%
Fdc	259	73
Dr	40	11
Mb	27	10
Bg	4	1
Or	4	1
Ec	4	1
Ss	3	1
Ub	3	1
Na	1	0
Total	365	100

**Additional Information:

-Flagging of retention trees will require updating prior to commencement of development activities.
-Only five trees >20cm DBH were balled.

Hazard Tree Data:

Tree #	Comments
DT1	Dead standing Fdc 42cm DBH
DT2	Dead standing Fdc <30cm DBH
DT3	Dead standing Fdc <30cm DBH

139 Trees = Tree removal does not count towards replacement tree calculation (within arbor infrastructure)

9 Trees = Tree does not count towards retention trees as located outside development site

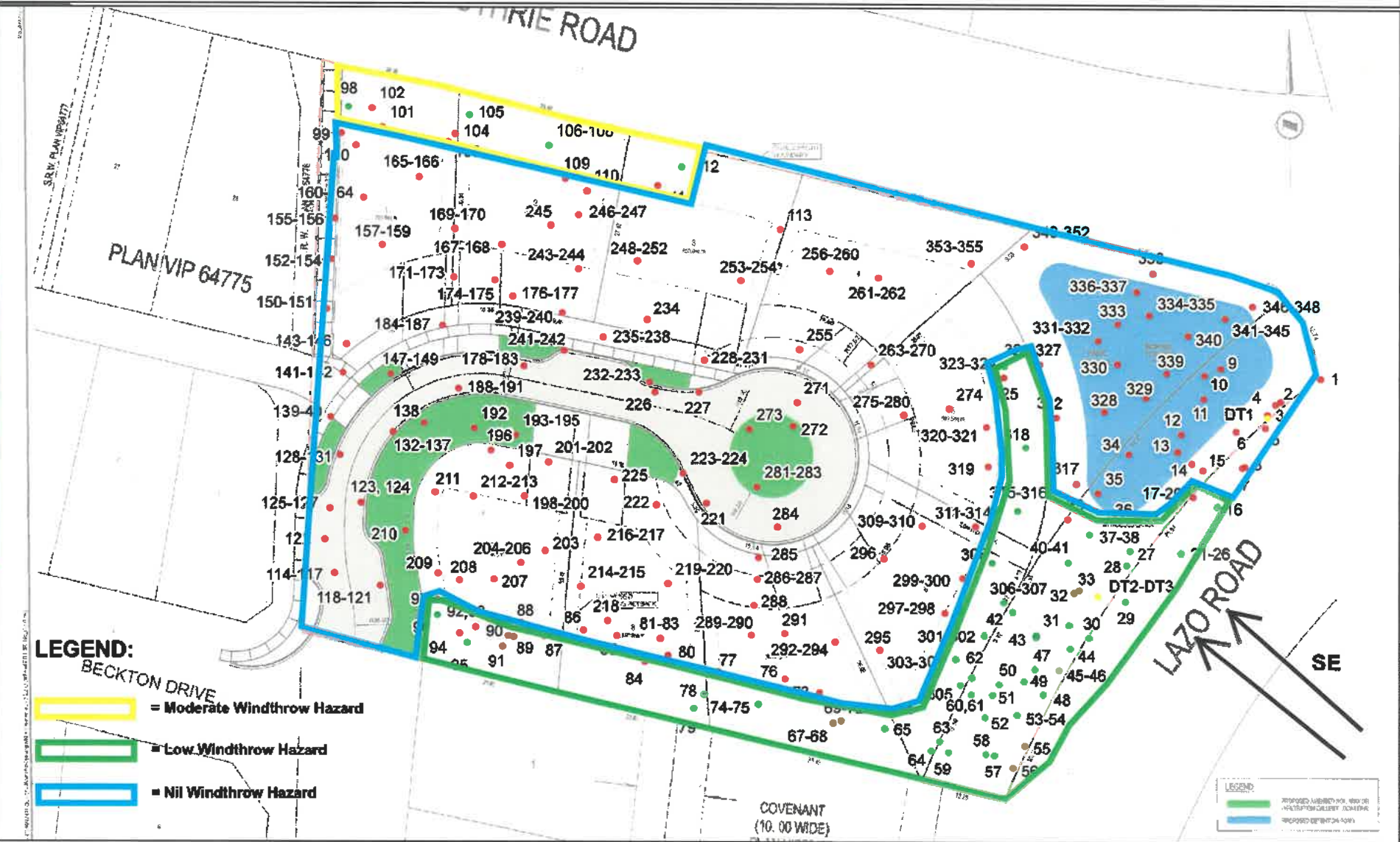
42 Trees = Proposed Retention Trees (count towards retention target)

146 Trees = Proposed Removal Trees (count towards replacement calculation)

Appendix III – Windthrow Assessment Map and Field Cards



Guthrie Road Development - Windthrow Assessment Map



● Trees Recommended for Removal ● Hazard Trees Recommended for Removal ● Trees Recommended for Retention

STRATEGIC
CAMPBELL RIVER
321-1160
p. 250.287.2246

Projection: NAD 1983 UTM Zone 10N
Scale: 1:500
Date: 4/2/2018
Produced By: zoe richards

Administrative			
Location <i>6000000</i>	Opening <i>---</i>	Block # <i>---</i>	Examiner/Date <i>W. East 2018-02-02</i>
Segment/Portion <i>A/C</i>			
Topographic Exposure Description			
Largescale Topography	High Hazard ☐ Coastal plain ☐ Plateau ☐ Rolling plateau ☐ Major coastal inlet ☒ Near large water body	Moderate Hazard ☐ Large valley ☐ Hilly	Low Hazard ☐ Mountainous ☐ Small coastal inlet ☐ Far from large water body
	Mid-scale Topography ☐ Ridge ☐ Saddle ☐ Knoll ☐ Shoulder	☒ Flat ☐ Side slope	☐ Side valley
Topographic Position	☐ Crest ☐ Upper slope	☐ Mid slope ☐ Foot	☒ Lower slope
Elevation (____m)	☐ High	☒ Middle	☐ Low
Diagnostic question: Are wind speeds normal for the area, or do they vary due to the presence of a terrain obstacle or obstruction? <i>Normal</i>			
Topographic hazard rating ☐ High (higher) ☒ Moderate (normal) ☐ Low (lower)			
Soil Description			
Parent material	High Hazard ☐ Organic ☐ Rock ☐ Fine alluvial	Moderate Hazard ☐ Fill ☐ Moderate alluvial	Low Hazard ☐ Coarse alluvial ☐ Colluvial
Texture	☐ Fine	☒ Medium ☐ V. Coarse	☐ Coarse
Coarse fragment %	☐ >70	☒ 50-70	☐ <30
Rooting depth (cm) and pattern	☐ <40 ☐ Plate roots	☐ 40-80 ☐ Flattened base	☐ >80 ☐ Rounded base
Impeding layer	☐ Water table	☐ Surface fractured rock	☒ Deep fractured rock
Soil drainage	☐ Poor	☐ Moderate	☒ Good
Diagnostic question: Is root anchorage restricted by an impeding layer, low strength soil, or poor drainage? <i>No</i>			
Soil hazard rating ☐ High (severely restricted) ☒ Moderate (somewhat restricted) ☐ Low (unrestricted)			
Stand Description			
Structure	High Hazard ☒ Uniform	Moderate Hazard ☐ Two-layer ☐ Uniform with vets	Low Hazard ☐ Multi-layer
Height (m)	☐ >30	☒ 15-30	☐ <15
Live crown ratio	☐ <30	☒ 30-70	☐ >70
Height diameter ratio	☐ >90	☒ 50-90	☐ <50
Stand density	☐ Dense	☒ Moderate	☐ Open
Root/stem rots	☐ Significant	☐ Some	☒ Minor
Species	<i>F. heterophylla</i>		
Diagnostic question: Are the individual trees within the stand adapted to wind loads? <i>Yes</i>			
Note: If damaged stems would lean back into canopy and be supported by their neighbours instead of working down through the canopy to the ground, then stand hazard is low for clearcut edges.			
Stand hazard rating ☐ High (poorly adapted) ☒ Moderate (somewhat adapted) ☐ Low (well adapted)			

Existing Windthrow Pattern					
	Recent	Older	Direction		
Existing edge	<i>None ~ 5%</i>		<i>---</i>		
Within timber	<i>None ~ 5%</i>		<i>---</i>		
Treatment Description					
Openings: Group selection patch cut, clearcut, etc.					
Treatment risk	High Risk	Moderate Risk	Lower Risk		
Orientation relative to damaging winds	☒ Downwind at right angle <i>Wind</i>	☐ Parallel <i>Wind</i>	☐ Upwind at right angle <i>Wind</i>		
Width of Opening: Upwind Direction	☐ >5 Tree lengths	☒ 2-5 Tree lengths	☐ <2 Tree lengths		
Influence of opening shape on windspeed	☐ Funnel or projects into wind <i>Wind</i>	☒ Straight <i>Wind</i>			
For Uniform Retention: Commercial thin, single tree selection, etc.					
Treatment risk	High Risk	Moderate Risk	Lower Risk		
Removal level (% basal area)	☐ >50	☒ 30-50	☐ <30		
Removal criteria	☐ Remove veterans, healthy dominants ☐ Thin from above	☐ Remove across all crown classes	☐ Retain veterans, healthy dominants ☐ Thin from below		
Species	☐ Least windfirm		☐ Most windfirm		
Diagnostic question: Will the proposed harvesting strategy increase wind loading on trees along the stand edge (opening) or retained trees (partial cut)?					
Treatment risk rating summary	☒ High (large increase)	☐ Medium (moderate increase)	☐ Low (minimal increase)		
Windthrow Risk Evaluation					
Site Hazard Exposure 	Biophysical Hazard Site hazard 	Windthrow Triangle 	Windthrow Risk Treatment risk 		
Estimated Windthrow Potential:					
	Very High	High	Moderate	Low	None
Topographic Hazard	.				.
Soil Hazard	.				.
Stand Hazard	.				.
Biophysical Hazard	.				.
Treatment Risk	.				.
Windthrow Risk	.				.

Retained trees along lots 7 to 9 may provide some protection from wind. Windward edge.



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Windthrow Field Card
Assessment Page A

Administrative			
Location <u>Guthrie</u>	Opening <u>—</u>	Block # <u>—</u>	Examiner/Date <u>Wernst B</u>
Topographic Exposure Description <u>298-02-02</u>			
Large-scale Topography	High Hazard ☒ Coastal plain ☒ Plateau ☐ Rolling plateau ☐ Major coastal inlet ☐ Near large water body	Moderate Hazard ☐ Large valley ☐ Hilly	Low Hazard ☐ Mountainous ☐ Small coastal inlet ☐ Far from large water body
Mid-scale Topography	☐ Ridge ☐ Saddle ☐ Knoll ☐ Shoulder	☐ Flat ☐ Side slope	☐ Side valley
Topographic Position	☐ Crest ☐ Upper slope	☐ Mid slope ☐ Flat	☐ Lower slope
Elevation (____m)	☐ High	☐ Middle	☐ Low
Diagnostic question: Are wind speeds normal for the area, or do they vary due to the presence of a terrain obstacle or constriction? <u>Yes</u>			
Topographic hazard rating ☐ High (higher) ☒ Moderate (normal) ☐ Low (lower)			
Soil Description			
Parent material	High Hazard ☐ Organic ☐ Rock ☐ Fine alluvial	Moderate Hazard ☐ Fill ☐ Moderate alluvial	Low Hazard ☐ Coarse alluvial ☐ Colluvial
Texture	☐ Fine	☐ Medium ☒ Coarse	☐ Coarse
Coarse fragment %	☐ >70	☐ 30-70	☐ <30
Rooting depth (cm) and pattern	☐ <40 ☐ Plate roots	☐ 40-80 ☐ Flattened base	☐ >80 ☐ Rounded base
Impeding layer	☐ Water table	☐ Surface fractured rock	☐ Deep fractured rock
Soil drainage	☐ Poor	☐ Moderate	☐ Good
Diagnostic question: Is root anchorage restricted by an impeding layer, low strength soil, or poor drainage? <u>No</u>			
Soil hazard rating ☐ High (severely restricted) ☒ Moderate (somewhat restricted) ☐ Low (unrestricted)			
Stand Description			
Structure	High Hazard ☒ Uniform	Moderate Hazard ☐ Two-layer ☐ Uniform with vets	Low Hazard ☐ Multi-layer
Height (m)	☐ >30	☐ 16-30	☐ <15
Live crown Ratio	☐ <30	☐ 30-70	☐ >70
Height diameter ratio	☐ >90	☐ 70-90	☐ <70
Stand density	☐ Dense	☒ Moderate	☐ Open
Root/stem rots	☐ Significant	☐ Some	☐ Minor
Species	<u>Fir, Cedar</u>		
Diagnostic question: Are the individual trees within the stand adapted to wind loads? <u>Yes</u>			
Note: If damaged stems would lean back into canopy and be supported by their neighbours instead of working down through the canopy to the ground, then stand hazard is low for clearcut edges.			
Stand hazard rating ☐ High (poorly adapted) ☒ Moderate (somewhat adapted) ☐ Low (well adapted)			

A1

A2

A3

Windthrow Field Card Assessment Page B

Existing Windthrow Pattern					
Existing edge Within timber	Recent <u>Yes</u>	Older <u>Yes</u>	Direction <u>—</u>		
Comments <u>—</u>					
Treatment Description					
Openings: Group selection, patch cut, clearcut, etc.					
Treatment risk	High Risk	Moderate Risk	Lower Risk		
Orientation relative to damaging winds	☐ Downwind at right angle 	☐ Parallel 	☒ Upwind at right angle 		
Width of Opening: Upwind Direction	☐ >5 Tree lengths	☐ 2-5 Tree Lengths	☐ <2 Tree Lengths		
Influence of opening shape on windspeed	☐ Funnel or projects into wind 	☐ Straight 			
For Uniform Retention: Commercial thin, single tree selection, etc.					
Treatment risk	High Risk	Moderate Risk	Lower Risk		
Removal level (% basal area)	☐ >50	☐ 30-50	☐ <20		
Removal criteria	☐ Remove veterans, healthy dominants ☐ Thin from above ☐ Least windfirm	☐ Remove across all crown classes	☐ Retain veterans, healthy dominants ☐ Thin from below ☐ Most windfirm		
Species					
Diagnostic question: Will the proposed harvesting strategy increase wind loading on trees along the stand edge (opening) or retained trees (partial cut)?					
Treatment risk rating summary	☐ High (large increase)	☐ Medium (moderate increase)	☒ Low (minimal increase)		
Windthrow Risk Evaluation					
Site Hazard 	Biophysical Hazard 	Windthrow Triangle 	Windthrow Risk Treatment risk 		
Estimated Windthrow Potential:					
	Very High	High	Moderate	Low	None
Topographic Hazard	.				.
Soil Hazard	.				.
Stand Hazard	.				.
Biophysical Hazard	.				.
Treatment Risk	.				.
Windthrow Risk					



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**Windthrow Field Card
Assessment Page A**

Administrative			
Location <i>Sutcliffe</i>	Opening <i>---</i>	Block # <i>---</i>	Examiner/Date <i>WERA 2018-02-02</i>
Segment/Portion <i>C</i>			
Topographic Exposure Description			
	High Hazard	Moderate Hazard	Low Hazard
Large-scale Topography	☐ Coastal plain ☐ Plateau ☐ Rolling plateau ☐ Major coastal inlet ☐ Near large water body	☐ Large valley ☐ Hilly	☐ Mountainous ☐ Small coastal inlet ☐ Far from large water body
Mid-scale Topography	☐ Ridge ☐ Saddle ☐ Knoll ☐ Shoulder	☒ Flat ☐ Side slope	☐ Side valley
Topographic Position	☐ Crest ☐ Upper slope	☐ Mid slope ☐ Flat	☐ Lower slope
Elevation (_____m)	☐ High	☐ Middle	☒ Low
Diagnostic question: Are wind speeds normal for the area, or do they vary due to the presence of a terrain obstacle or constriction? <i>Yes</i>			
Topographic hazard rating ☒ High (higher) ☐ Moderate (normal) ☐ Low (lower)			
Soil Description			
	High Hazard	Moderate Hazard	Low Hazard
Parent material	☐ Organic ☐ Rock ☐ Fine alluvial	☒ Till ☐ Moderate alluvial	☐ Coarse alluvial ☐ Colluvial
Texture	☐ Fine	☒ Medium/ ☐ V.Coarse	☐ Coarse
Coarse fragment %	☐ >70	☐ 30-70	☐ <30
Rooting depth (cm) and pattern	☐ <40 ☐ Plate roots	☐ 40-80 ☐ Flattened base	☐ >80 ☐ Rounded base
Impeding layer	☐ Water table	☐ Surface fractured rock	☐ Deep fractured rock
Soil drainage	☐ Poor	☐ Moderate	☒ Good
Diagnostic question: Is root anchorage restricted by an impeding layer, low strength soil, or poor drainage? <i>No</i>			
Soil hazard rating ☐ High (severely restricted) ☐ Moderate (somewhat restricted) ☐ Low (unrestricted)			
Stand Description			
	High Hazard	Moderate Hazard	Low Hazard
Structure	☐ Uniform	☐ Two-layer ☐ Uniform with vets	☐ Multi-layer
Height (m)	☐ >30	☐ 15-30	☐ <15
Live crown ratio	☐ <30	☐ 30-70	☐ >70
Height diameter ratio	☐ >90	☐ 70-90	☐ <70
Stand density	☐ Dense	☐ Moderate	☐ Open
Root/stem rots	☐ Significant	☐ Some	☐ Minor
Species	<i>No trees will be left along edge and trees removed</i>		
Diagnostic question: Are the individual trees within the stand adapted to wind loads? <i>along edge</i>			
Note: If damaged stems would lean back into canopy and be supported by their neighbours instead of working down through the canopy to the ground, then stand hazard is low for clearcut edges.			
Stand hazard rating ☐ High (poorly adapted) ☐ Moderate (somewhat adapted) ☒ Low (well adapted)			

A1

A2

A3

Windthrow Field Card Assessment Page B

Existing Windthrow Pattern					
	Recent	Older	Direction	Comments	
Existing edge	<i>N. 1</i>	<i>~5%</i>	<i>---</i>	<i>---</i>	
Within timber	<i>N. 1</i>	<i>~5%</i>	<i>---</i>	<i>---</i>	
Treatment Description					
Openings: Group selection, patch cut, clearcut, etc.					
Treatment risk	High Risk	Moderate Risk	Lower Risk		
Orientation relative to damaging winds	☐ Downwind at right angle <i>Wind</i>	☐ Parallel <i>Wind</i>	☐ Upwind at right angle <i>Wind</i>		
Width of Opening: Upwind Direction	☒ >5 Tree lengths	☐ 2-5 Tree Lengths	☐ <2 Tree Lengths		
Influence of opening shape on windspeed	☐ Funnels or projects into wind <i>Wind</i>		☐ Straight <i>Wind</i>		
For Uniform Retention: Commercial thin, single tree selection, etc.					
Treatment risk	High Risk	Moderate Risk	Lower Risk		
Removal level (% basal area)	☐ >50	☐ 30-50	☐ <30		
Removal criteria	☐ Remove veterans, healthy dominants ☐ Thin from above	☐ Remove across all crown classes	☐ Retain veterans, healthy dominants ☐ Thin from below		
Species	☐ Least windfirm		☐ Most windfirm		
Diagnostic question: Will the proposed harvesting strategy increase wind loading on trees along the stand edge (opening) or retained trees (partial cut)?					
Treatment risk rating summary	☐ High (large increase)	☐ Medium (moderate increase)	☒ Low (minimal increase)	<i>None</i>	
Windthrow Risk Evaluation					
Site Hazard Exposure L (M) H	Biophysical Hazard Site hazard L M H	Windthrow Triangle Exposure Stand Soils	Windthrow Risk Treatment risk L M H		
Estimated Windthrow Potential:					
	Very High	High	Moderate	Low	None
Topographic Hazard	<i>.</i>				<i>.</i>
Soil Hazard	<i>.</i>				<i>.</i>
Stand Hazard	<i>.</i>				<i>.</i>
Biophysical Hazard	<i>.</i>				<i>.</i>
Treatment Risk					
Windthrow Risk					

Quest Homes

**Lot B, Plan 48438, District Lot 224
Stormwater Management Plan**

McElhanney Consulting Services Ltd.
www.McElhanney.com

Mark DeGagné, P.Eng., Senior Water Resources Engineer



MCSL File: 2211-47471-0

May 2018

Quest Homes – LOT B
Town of Comox

Table of Contents

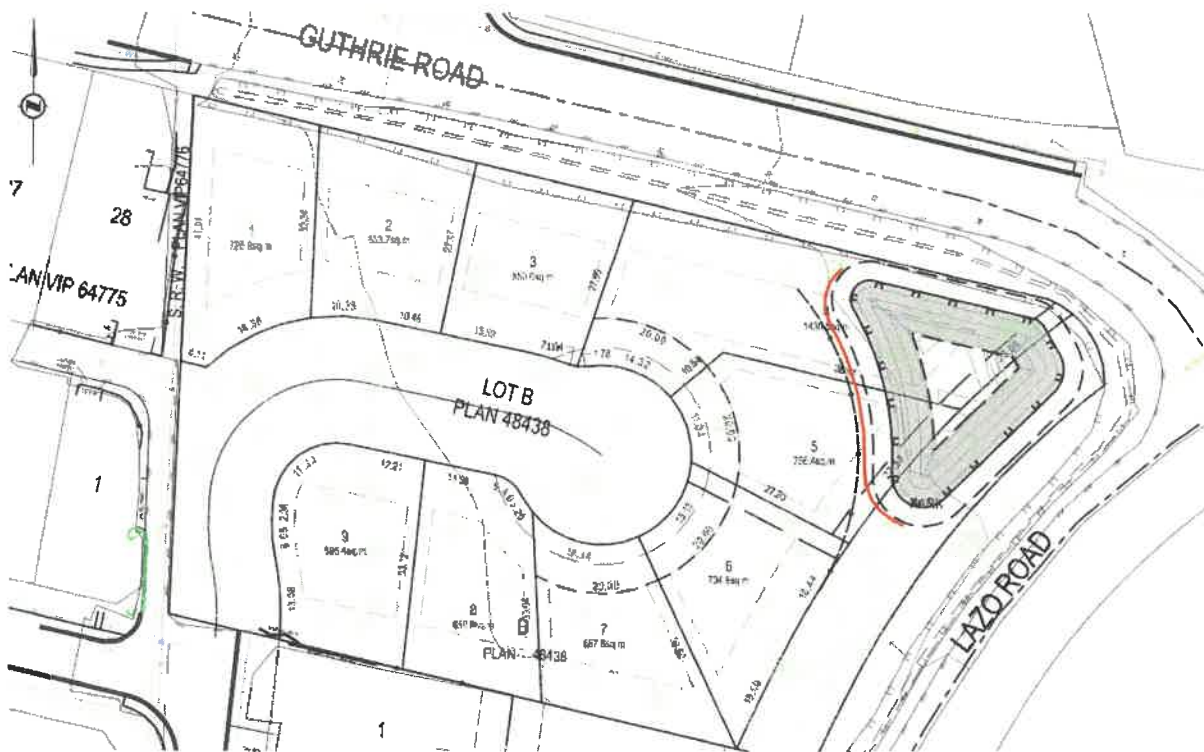
1	Introduction	1
2	The Site	2
2.1	Background on the Quest Homes Development.....	2
2.2	Site Description	2
3	Pre-Development Hydrology	3
4	Proposed SWMP	6
4.1	Site Assessments.....	6
4.2	Post Development Impacts.....	9
4.3	Low Impact Design (LID) Techniques.....	11
4.3.1	Amended Soils	11
4.3.2	Infiltration Galleries/Rain Gardens	12
4.4	Post Development LID Performance	13
5	Adaptive Management Strategy	16
6	Conclusion	19
Appendix A: Geotechnical Report		
Appendix B: Standard Drawings		
Appendix C: SK-102 and SK-105		

Quest Homes – LOT B Town of Comox

1 INTRODUCTION

This report is intended to detail the proposed Storm Water Management Plan (SWMP) for Lot B of the proposed Quest Homes Development. The property is located at the intersection of Lazo Road and Guthrie Road, as shown on Figure 1. The parcel is 1 Hectare in area, and is legally described as: Lot B, Plan 48438, District Lot 224, Comox District.

Figure 1: Site Location



In addition to comply with the Town of Comox Subdivision & Servicing Bylaw requirements, specific Stormwater Management strategies are being employed that restrict runoff velocity, flow rate, and volume to pre-existing conditions up to and including the 1:100-year event. The stringent design management requirements noted herein are the result of stormwater conveyance capacity limitations within the adjacent, downstream jurisdiction.

This SWMP is consistent with the "Water Balance Model" principles recently utilized in the North-East Comox catchment, where similar downstream conveyance capacity issues exist. To this end, the SWMP demonstrates that the expected additional stormwater resulting from development can be managed through the implementation of "Low Impact Design" (LID) techniques. Implementation of this SWMP will

Quest Homes – LOT B Town of Comox

ensure maintenance of existing flow duration relationships and hydrological balances, therefore mitigating any detrimental effects to downstream conveyance systems.

2 THE SITE

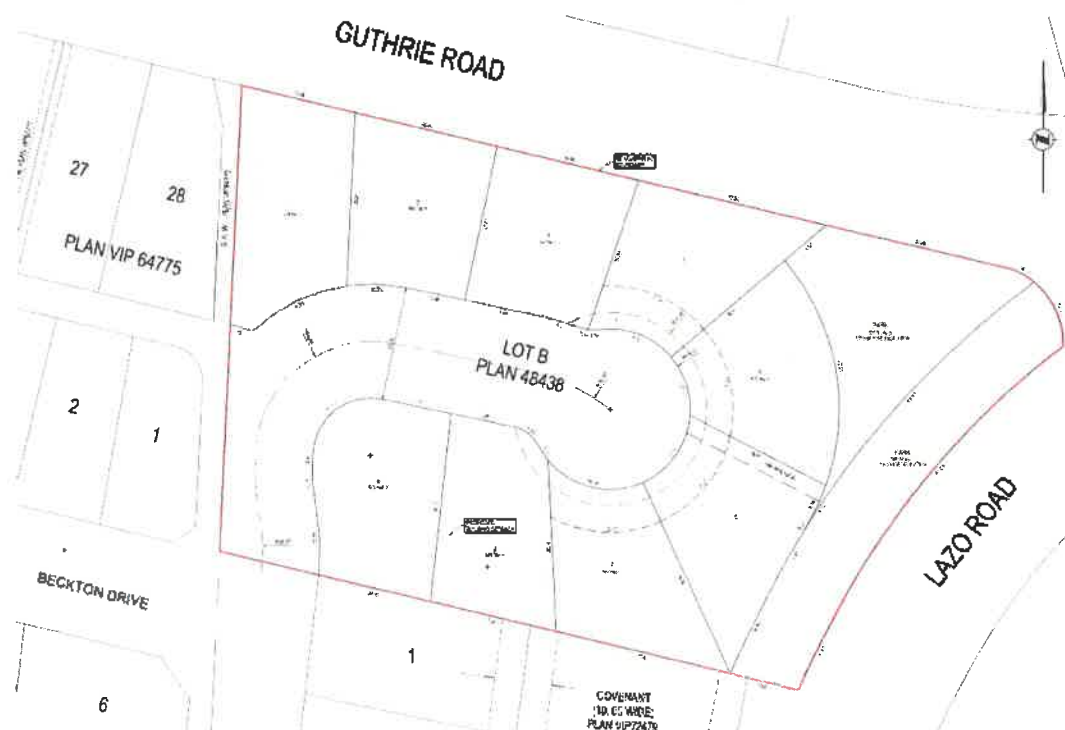
2.1 BACKGROUND ON THE QUEST HOMES DEVELOPMENT

Quest Homes is proposing a single family residential development (SFD) that spans about 1 Ha southeast of Lazo Road and Guthrie Roads. There is approximately 48 Ha of land upstream of Lot B that drains toward the intersection of Guthrie and Lazo. Stormwater from this area is collected and conveyed through the Town's stormwater infrastructure, where it ultimately discharges into the Lazo Marsh, before being released through Queen's Ditch.

2.2 SITE DESCRIPTION

The 1 Ha parcel is covered with mature trees with supporting understory growth. The existing site is essentially in a natural undeveloped condition. Development as proposed includes: 9 fee simple residential lots and the proposed concept layout is shown on Figure 2.

Figure 2: Proposed Subdivision Layout



Quest Homes – LOT B Town of Comox

Site soil lithography generally consists of the following:

- TOPSOIL, organic material with silt and fine sand matrix, loose, dark brown; overlying
- FLUVIAL DEPOSITS, Sand with some Gravel to Sand and Gravel, some silt, occasional to frequent cobbles, trace to some rootlets, loose to compact, brown; over
- GLACIAL TILL, from weathered to intact, silty to clayey sand with trace to some gravel, occasional cobble, compact to very dense, grey.

This report includes site-specific LID techniques to take advantage of site infiltration opportunities and maintain the balance of the hydrologic regime for the area.

3 PRE-DEVELOPMENT HYDROLOGY

The site is covered with mature trees and understory of vegetation with little impervious surfaces. The site is located within the Lazo Marsh/Queen's Ditch watershed and the establishment pre-development hydrology is based on past work by McElhanney for the NE Comox Neighborhood Stormwater Management Plan. The Unit Area Flow-Duration relationship graph that was used in the NE Comox study is viewed as directly applicable to this site as it is in the same watershed and is less than 2.0 km away from the site. These graphs will be used to set the overall targets for the rainfall mass balance, which includes:

- Rainfall runoff (surface flow);
- Evapotranspiration and other initial abstractions;
- Shallow groundwater infiltration that moves just below the surface eventually ending up as part of the overall stream flow in the receiving environment;
- Deep groundwater transference to replenish the deeper groundwater aquifer(s).

Model parameters used in the model for NE Comox are assumed for the proposed development site as shown on Table 1, below. These parameters were used in the modelling for the post-development pond. Some parameters were changed from the NE Comox model because it was developed based on an area greater than 80 Ha. These parameters include time to peak, and the base flow to ensure that the model simulations reflect the smaller 1 Ha parcel. To conclude, the duration-frequency relationship derived for NE Comox was used for this project as the target for post-development runoff. This target relationship is more conservative than what could be simulated in the program for the 1 Ha parcel.

Table 1: Pre-Development Model Parameters

Area (Ha)	Impervious %	Initial Abstraction		Soil Storage		
		Impervious (mm)	Pervious (mm)	Min (mm)	Max (mm)	Decay mm ⁻¹
1	5	2.5	12.0	20	250	0.04

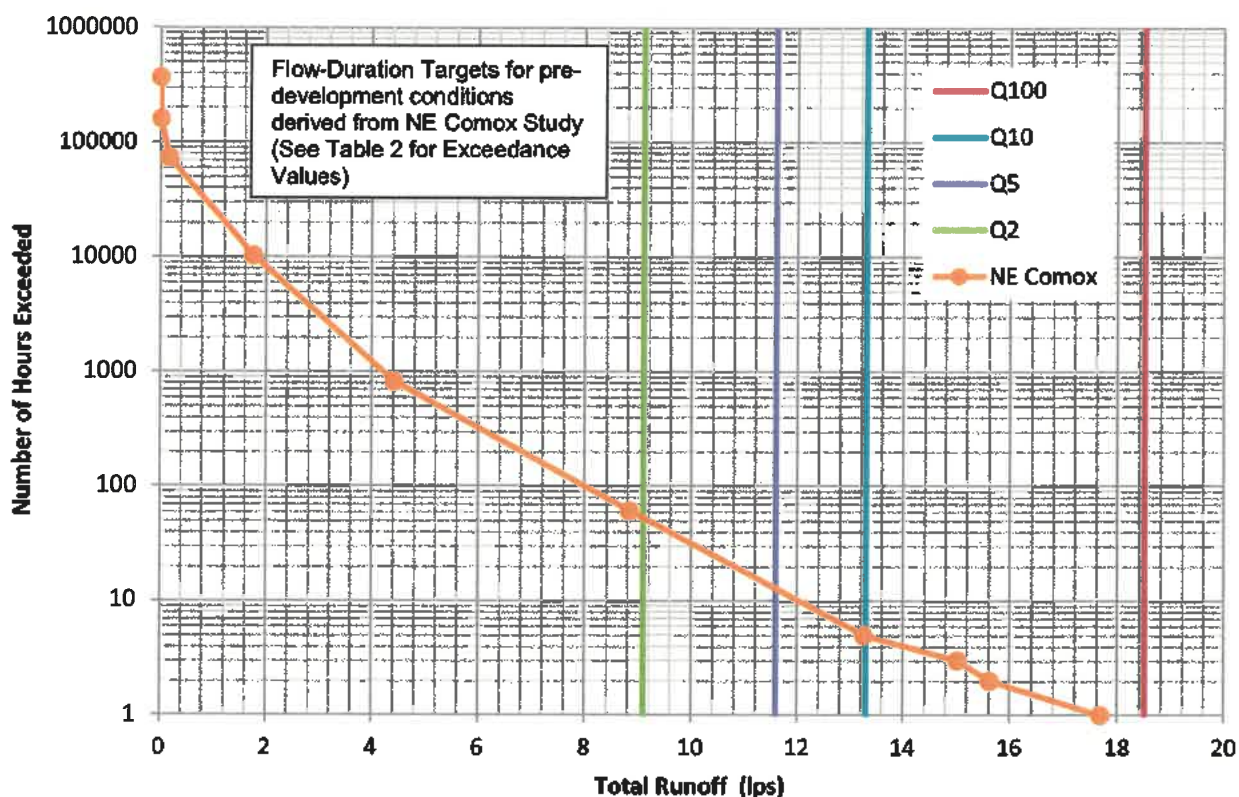
Quest Homes – LOT B

Town of Comox

The above noted parameters are consistent with the observations of the physical characteristics of the study area, namely:

- Soil Storage is significant due to the depth of organic overburden layer covering most of the site.
- Initial Abstraction of 12mm is as expected, given the vegetation and terrain within the study area.

Figure 3: Flow-Duration Relationship for the Pre-Development Condition



Verified calculations for the 2, 5, 10 and 100-year storm return periods are shown on Figure 3. This relationship establishes the targets for pre-development flows in the study area, and the metric against which post-development modeling will be compared.

The estimated 1:100-year design discharge for the storm water runoff is approximately 18.5 L/s for the one-hectare parcel. The exceedance values for the pre-development targets are listed in Table 2.

Quest Homes – LOT B
Town of Comox

Table 2: Pre-Development Duration Exceedances

Flow Rate (L/s)	Exceedance (hours)
0	368,184
0.1	160,751
0.18	73,541
1.76	10,285
4.43	813
8.84	61
13.26	5
15.03	3
15.63	2
17.7	1
18.5	0

The pre-development hydrologic mass balance for the study area over the 42 year period of analysis was calculated and reported in the North East Comox Phase 3 report, as follows.

Total Rainfall	50,964 mm
Total Surface Run-off	16,116 mm
Total Abstractions	8,194 mm
Total Volume Infiltrated	26,655 mm
Loss to Deep Groundwater	18,393 mm
Interflow	8,262 mm

The results show that approximately 32% of the total rainfall volume is total surface runoff. As the Study Area is small, it is assumed that the hydrologic response is reasonably uniform over the entire site. On this basis, post-development stormwater targets are to reflect the above stated pre-development condition. The following list summarizes the key volumetric targets for the property:

- Target surface runoff discharges are derived from the NE Comox SWMP and should not exceed 18.5 l/s in a 1:100-year return event; 13.3 L/s in a 1:20 year event; 11.6 l/s for the 1:10 year event; and 9.1 l/s for a 1:2-year event.
- Average total run-off should not exceed about 400 mm/year.
- Infiltrated volumes should meet an average of 635 mm/year.

4 PROPOSED SWMP

4.1 SITE ASSESSMENTS

A site investigation was completed by McElhanney on May 1st, 2017. The investigation included 11 open pit excavations on the site and observations included soil stratigraphy logs recorded by our geotechnical technicians (see Appendix A for geotechnical report). No soil permeability measurements were undertaken due to the presence of the shallow till layer, which is generally deemed to be relatively impermeable (typically ~2mm/hr).

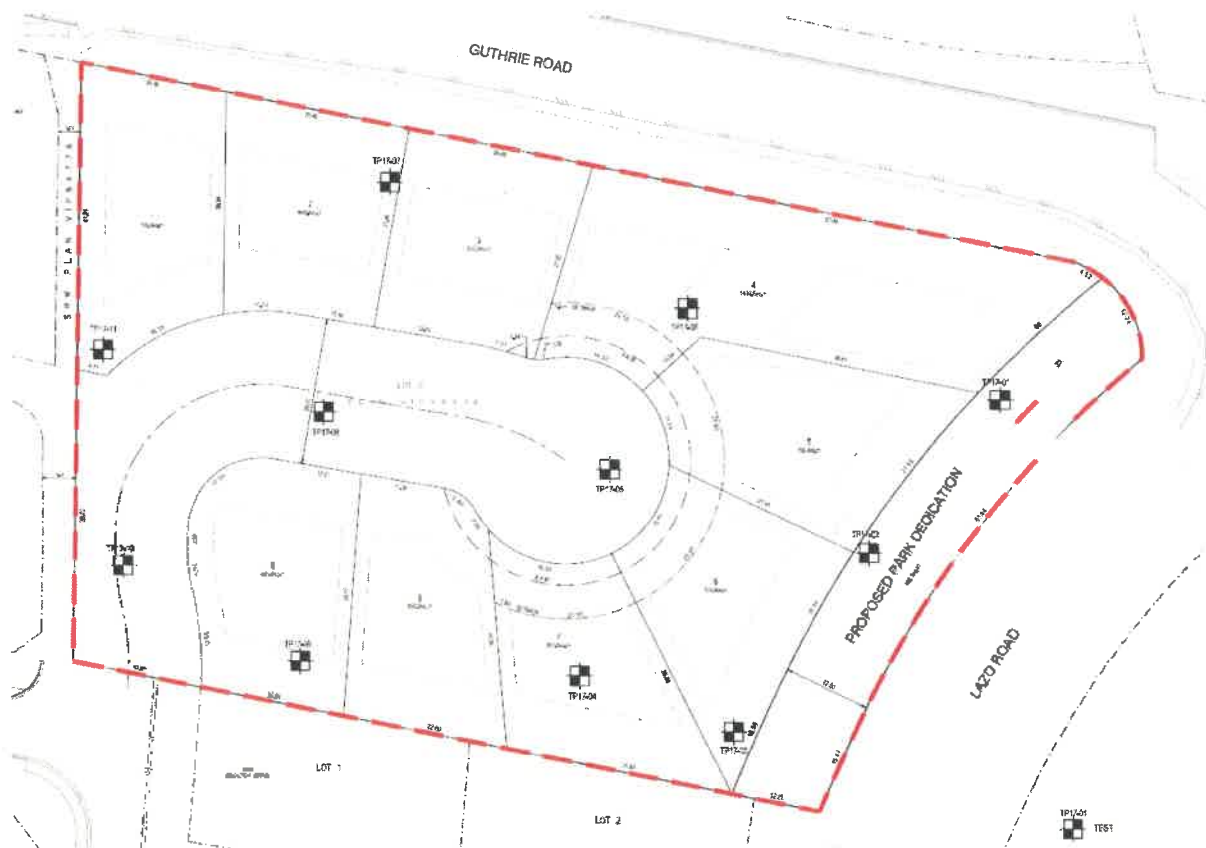
The test pit locations are shown on Figure 4 and the results are summarized on Table 3. Note that depth is measured from existing surrounding grade, and soil type is a description of what was encountered at the bottom of the auger hole. Seepage was observed within 5 of the 11 test holes, but the water table elevation was not recorded. It is assumed that the seasonal high-water table is at the interface between the granular and till layers as is typical for this region.

No infiltration tests were completed during the geotechnical investigation because of the presence of the shallow till layer. Typically, the subsurface granular layers will have infiltration rates up to 100 mm/hour and till layers have rates of 2 mm/hr. To model infiltration of runoff from the developed site, the long-term infiltration capacity, under fully saturated conditions, needs to be determined. A value of 10 mm/hr was used for this assessment based on conclusion that the infiltration galleries will be constructed above the underlying till layer. The exfiltration galleries will promote infiltration of surface runoff, primarily from the streets, to the subsurface groundwater (interflow) layer and then to the deeper aquifer layers. Once water is conveyed into the subsurface layer, it will have a greater chance to be further conducted through the till layer into the deep groundwater layer mimicking the pre-development conditions. This conservatively low assumption will result in larger gallery(s)/rain gardens but is necessary for more effective transference of the surface runoff to the subsurface system. It will also result in better long-term performance of the infiltration galleries/rain gardens, and significantly increase the area for deep groundwater infiltration through the underlying till, which is significantly less permeable.

Any infiltration galleries or rain gardens included in the design will need to be constructed above the till layer to ensure complete transference to the interflow layer. It is recommended that the design maintain about 300mm of granular materials above the till layer for this reason and will limit infiltration galleries/rain gardens to shallow surface features at a depth of 0.5m to 0.75m, unless they can be placed in areas of imported granular fill where the depths can be increased.

Quest Homes – LOT B
Town of Comox

Figure 4: Test Pit Locations



Quest Homes – LOT B
Town of Comox

Table 3: Soil Stratigraphy and Groundwater Seepage Summary

Test Pit Number	Depth of Test Pit (m)	Topsoil (m)	Fluvial Deposits: Sands & Gravels (m)	Silt/Clay (m)	Glacial Till (m)	Groundwater Seepage (m)
TP17-1	1.0	0-0.6	0.6-0.8	None	0.8-1.0	0.7
TP17-2	1.0	0-0.5	0.5-0.8	None	0.8-1.0	0.8
TP17-3	1.0	0-0.4	0.4-0.9	None	0.9-1.0	None
TP17-4	0.9	0-0.7	0.7-0.8	None	0.8-0.9	None
TP17-5	0.85	0-0.4	0.4-0.7	None	0.7-0.85	None
TP17-6	1.1	0-0.6	0.6-1.0	None	1.0-1.1	0.8
TP17-7	1.5	0-0.5	0.5-0.9	0.9-1.2	1.2-1.5	0.9
TP17-8	0.9	0-0.5	0.5-0.8	None	0.8-0.9	None
TP17-9	1.0	0-0.8	0.8-0.9	None	0.9-1.0	0.9
TP17-10	0.8	0-0.5	0.5-0.7	None	0.7-0.8	None
TP17-11	1.1	0-0.6	0.6-0.9	None	0.9-1.1	None

Quest Homes – LOT B

Town of Comox

4.2 POST DEVELOPMENT IMPACTS

Single family residential development will impose a number of changes to the landscape, including clearing of some mature trees, as well as grubbing of the upper organic layer within the proposed road dedications, and building/drive way footprints on each lot. The clearing and grubbing activities are assumed to reduce initial abstractions parameter by approximately 7mm and reduce pervious abstractions from 12mm to 5mm. Standard single-family developments of nearby neighborhoods in terms of form and character of the homes, with roads and driveways included, typically have an approximate 50% impervious surface coverage. The Town has requested a 60% impervious factor be used (to be consistent with the NE Comox Neighbourhood SWMP), which is considered conservative in estimating the unmitigated post development condition. Given the size of the lots, at greater than 600 square metres, it is recommended that no additional bylaw regulations or covenants restricting imperviousness be imposed on this development.

Based on the anticipated post development percentage of impervious surface, and initial abstraction rates in pervious areas as noted above, the QualHYMO model predicts a number of changes to the water balance for the simulated unmitigated post-development period. Table 4 represents the unmitigated post development volumes, providing a baseline assuming no LID practices are employed. A comparison of the resultant flow-duration relationship values and pre-development targets is illustrated on the following Figure 5. As can be seen, the flow-duration curve shifts up and to the right of the pre-development scenario indicating that the changes in land use result in higher surface runoff discharges from the site at greater magnitudes and for longer periods of time. This is visible in Table 4, which indicates higher volumes of surface runoff, and lower volumes of both total abstractions and infiltration are expected, in the absence of any LID.

Table 4: Comparison of Pre- and Post-Development Water Balance

	Pre-Development	Post-Development	Change in Volume
	(mm)	(mm)	(mm)
Total Rainfall	50,964	50,723*	-241
Total Surface Runoff	16,116	29,770	13,654
Total Abstractions	8,194	6,115	-2,079
Total Volume Infiltrated	26,655	14,838	-11,817
Loss to Deep Groundwater	18,393	10,238	-8,155
Interflow	8,262	4,600	-3,662

* Total Rainfall is different from NE Comox because Town of Comox supplied an updated rainfall file. The difference is considered insignificant to the results of the modelling.

Quest Homes – LOT B
Town of Comox

Figure 5: Unmitigated Post-Development Flow-Duration Relationship

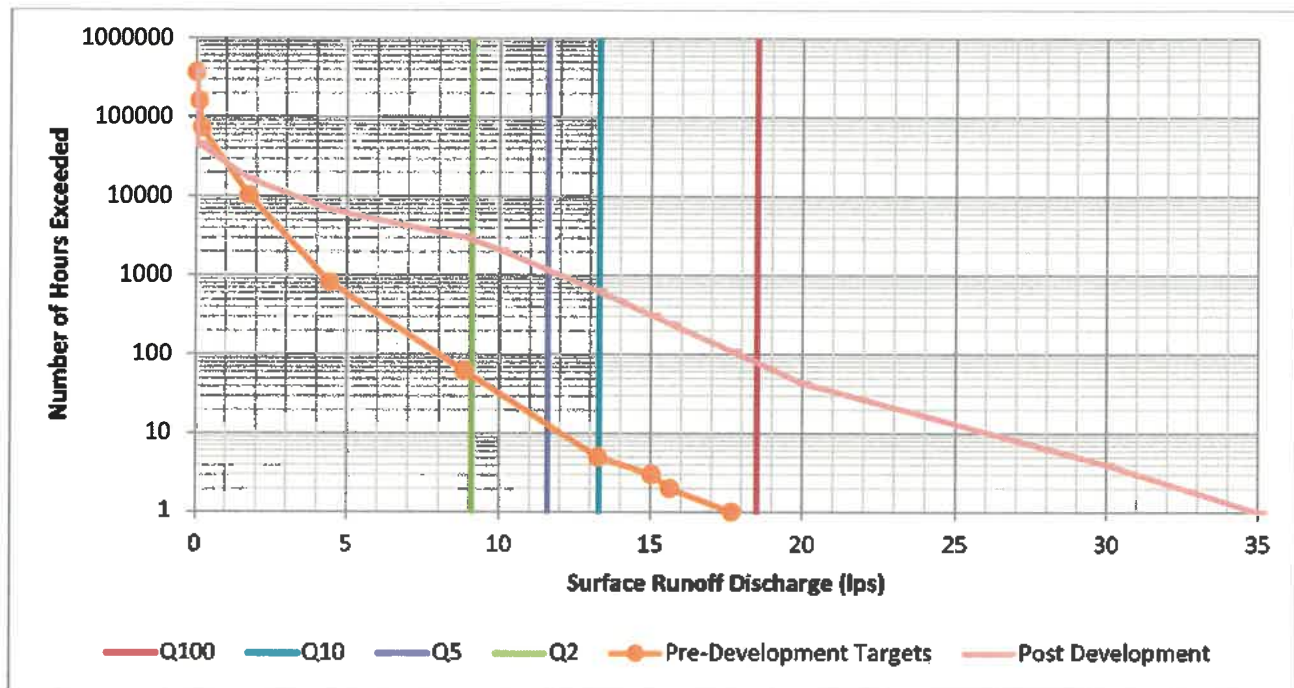


Table 5: Pre/Post Development Duration Exceedances Comparison

Flow Rate (L/s)	Pre-Development Exceedance (hours)	Post-Development Exceedance (hours)	Change in Exceedance (hours)
0	368,184	385,704	17,520
0.1	160,751	45,287	-115,464
0.18	73,541	43,510	-30,031
1.76	10,285	16,674	6,389
4.43	813	6,704	5,891
8.84	61	3,033	2,972
13.26	5	635	630
15.03	3	313	310
15.63	2	245	243
17.7	1	110	109
18.5	0	74	74
20	0	43	43
30	0	4	4
35	0	1	1

Quest Homes – LOT B

Town of Comox

4.3 LOW IMPACT DESIGN (LID) TECHNIQUES

To mitigate potential impacts to the hydrologic regime due to the development of Lot B, several LID techniques are proposed for implementation as depicted on sketch SK-105: Proposed SWMP LID Locations (Appendix C). These include:

Minor Systems:

- placement of amended soils on the public right-of-way to improve or restore the balance of initial abstractions; and/or
- infiltration galleries and trenches provide detention storage and infiltration per the NE Comox SC104 and SC105 (Appendix B)

Major Systems:

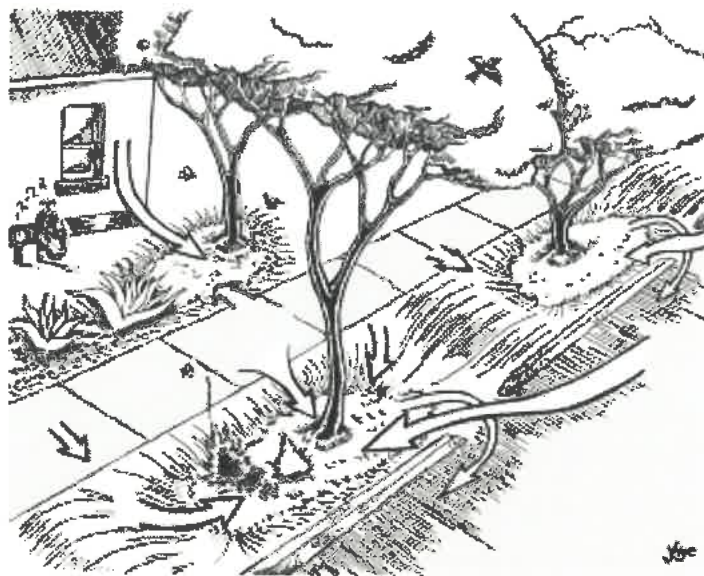
- stormwater management pond and controlled discharge per SK-102 (Appendix C)

Any additional LID methods implemented by private lot owners, such as the placement of amended soil on private land, will provide an additional factor of safety to the proven system.

4.3.1 Amended Soils

According to the Green Infrastructure Partnership of BC “Improving or adding a performing topsoil layer to a site, as a BMP for stormwater/rainwater management and water conservation, is one of the simplest and most cost effective BMPs to implement. This topsoil layer manages rainwater runoff through detention and exfiltration, effectively slowing down rainwater runoff.” Fundamental to the implementation of this BMP is the necessity to direct runoff from impervious areas to the areas with Amended Soils. It is therefore imperative that the roof leaders be disconnected from the piped drainage system and street runoff be directed to curbside areas with amended soils. Design details, including amended soil specifications, should follow the guidelines set by the Green Infrastructure Partnership.

Figure 6: Amended Topsoil BMP



As a measure of conservancy, amended soils will only be considered for use in right-of-way. An additional depth of amended soils should be provided within the boulevard between the sidewalk and curb. "Curb cuts", or reverse letdowns, will be fabricated into the curb to allow drainage into these topsoil areas prior to entering the adjacent catch basins and subsequent piped system. Surface treatment details are provided within the sections 4.2.5.1.11 of the NE Comox SWMP.

It is assumed that the proposed amended topsoil layer will equate to approximately 150mm of soil depth over the public rights-of-way within the development site, resulting in a net increase in initial abstractions from 12mm to 30mm. This assumption is based on a specified gradation for topsoil that is in accordance with the MMCD specification for growing medium, with the following amendments:

- for lawn areas, topsoil should meet or exceed the MMCD specification for growing medium with the organic content amended to be 8%, and
- for planters, shrub and groundcover areas, topsoil should meet the MMCD specification for growing medium with organic content of 8 to 15%.

4.3.2 Infiltration Galleries/Rain Gardens

The use of infiltration galleries/rain gardens is consistent with the NE Comox Neighbourhood Stormwater Management Plan. A total of 420 square metres of rain garden/infiltration area is required for this design. The proposed development concept has a total area of 530 square meters available. The infiltration galleries shall be installed above the till layer as to promote higher infiltration rates and to increase amounts of shallow ground water transition. As suggested previously, these BMPs are required to be constructed fully within the granular layer achieving about 300mm separation distance above the till layer.

Quest Homes – LOT B

Town of Comox

If required, or where practical, these features could be constructed within imported granular fill areas to improve the separation distance and overall efficacy of the infiltration of surface water.

Since the galleries will vary in depth and be relatively shallow, their corresponding volume was not included in the overall storage calculation in the hydraulic modelling process. This only adds to the conservatism of the modelling. Typical details for the infiltration galleries (SC104 and SC105) are provided in Appendix B. The infiltration galleries proposed will be accounted for when determining the MHFEs of the dwellings.

An approved sediment and erosion control plan will be implemented during infrastructure installation to keep the system free from construction runoff. It is also suggested that builders be required to install CB filters downstream of construction and keep road and sidewalk free of dust and dirt.

4.2.3 Detention Pond

Detention ponds are classified as a neighborhood level BMP in the NE Comox SWMP. They are effective and low maintenance with the ability to adapt to future flow scenarios as conditions change. The dry pond utilized in the LID, operates in tandem with a control manhole structure. The proposed detention Pond is illustrated on SK-102 and is attached to this report as Appendix C. A minimum slope across the pond should be included in the design to ensure no wet areas form at its base. The invert of the outflow pipe will, therefore, be slightly lower than the invert of the outlet of the pond to ensure complete drainage during dry periods, as to prevent the attraction of waterfowl. At peak volume, during the continuous simulation, the pond contained 448 cubic meters of active storage, which shows that over the 44-year simulation peak volumes are completely contained within the 450 cubic meter pond that has been sized to accommodate a 1:100 year event, which would be only slightly larger than that experienced to-date, according to the statistical analysis completed as part of this assessment. Results of the continuous simulation show that the depth of the pond is less than 0.1m for 87% of the time.

4.4 POST DEVELOPMENT LID PERFORMANCE

The proposed LID techniques were simulated using QualHYMO software to determine the Post Development Water Balance with proposed LID techniques in place.

Figure 7 and Table 6 illustrate how Post Development Flow-Durations simulations closely mimic the Pre-Development state, when LID strategies are employed.

Quest Homes – LOT B
Town of Comox

Figure 7: Post Development with LID Controls: Flow-Duration Comparison

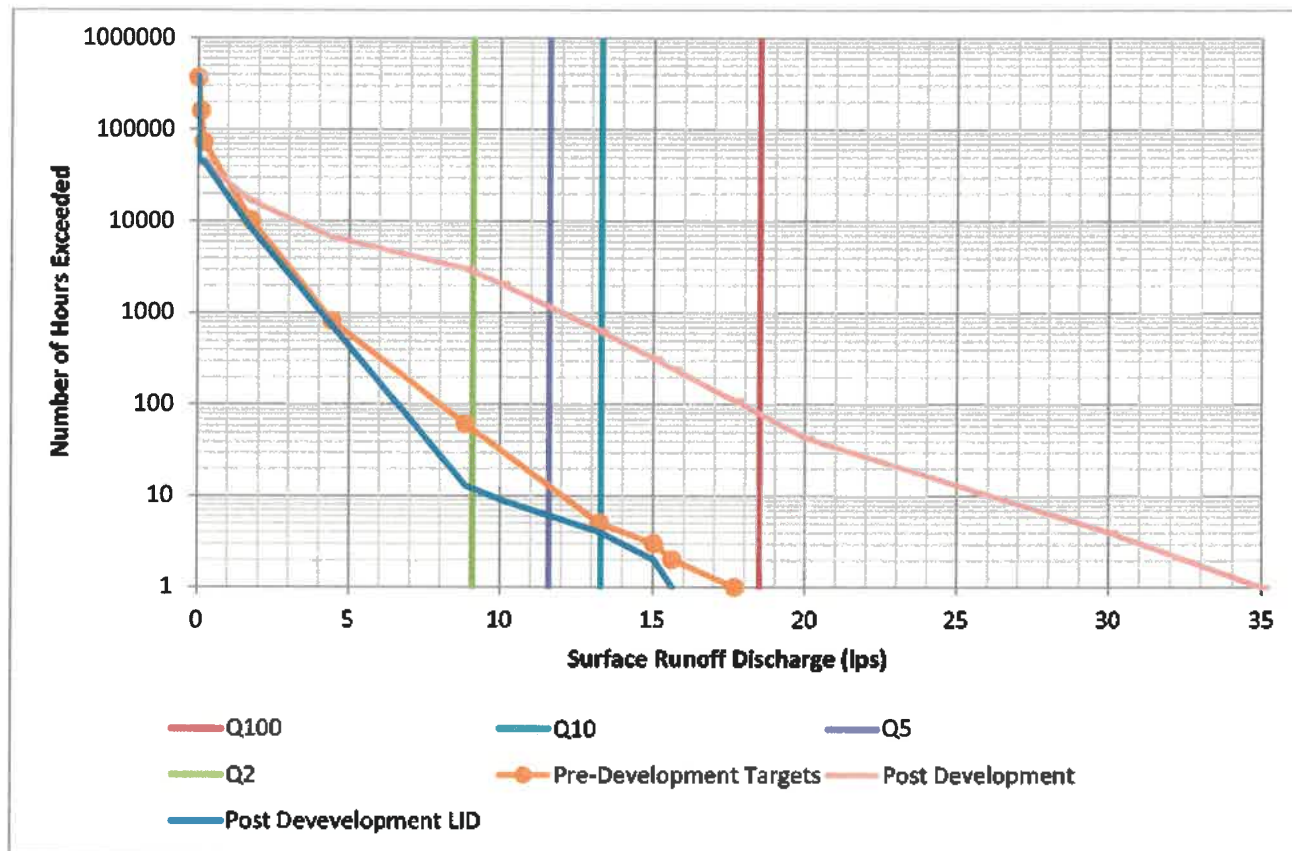


Table 6: Pre/Post Development with LID Duration Exceedances Comparison

Flow Rate (L/s)	Pre-Development Exceedance (hours)	Post-Development with LID Exceedance (hours)	Change in Exceedance (hours)
0	368,184	385,704	17,520
0.1	160,751	45,402	-115,349
0.18	73,541	44,651	-28,890
1.76	10,285	8,259	-2,026
4.43	813	728	-85
8.84	61	13	-48
13.26	5	4	-1
15.03	3	2	-1
15.63	2	1	-1
17.7	1	0	-1
18.5	0	0	0

Quest Homes – LOT B

Town of Comox

A summary of the Hydrological mass balance for the site is provided on Table 7 below.

Table 7: Comparison of Pre-Development and Post-Development (with LID) Water Balance

	Pre-Development (A)	Post-Development with LID (Adjusted to Account for Infiltration) (B)	Change in Volume (B-A)
	(mm)	(mm)	(mm)
Total Rainfall	50,964	50,723*	-241
Total Surface Runoff	16,116	15,926	-190
Total Abstractions	8,194	6,832	-1,362
Total Volume Infiltrated	26,655	27,965	1,310
Loss to Deep Groundwater	18,393	19,296	903
Interflow	8,262	8,669	407

* Total Rainfall is different from NE Comox because Town of Comox supplied an updated rainfall file. The difference is considered insignificant to the results of the modelling.

The mass balance provided by QualHYMO does not take into account the portion of the runoff that is collected and conveyed through the proposed infiltration galleries. This has been accounted for in Table 7, as the total infiltrated depth has been removed from the total surface runoff and placed into the total volume infiltrated. This was then carried through the loss to deep groundwater and interflow to mimic the pre-development condition.

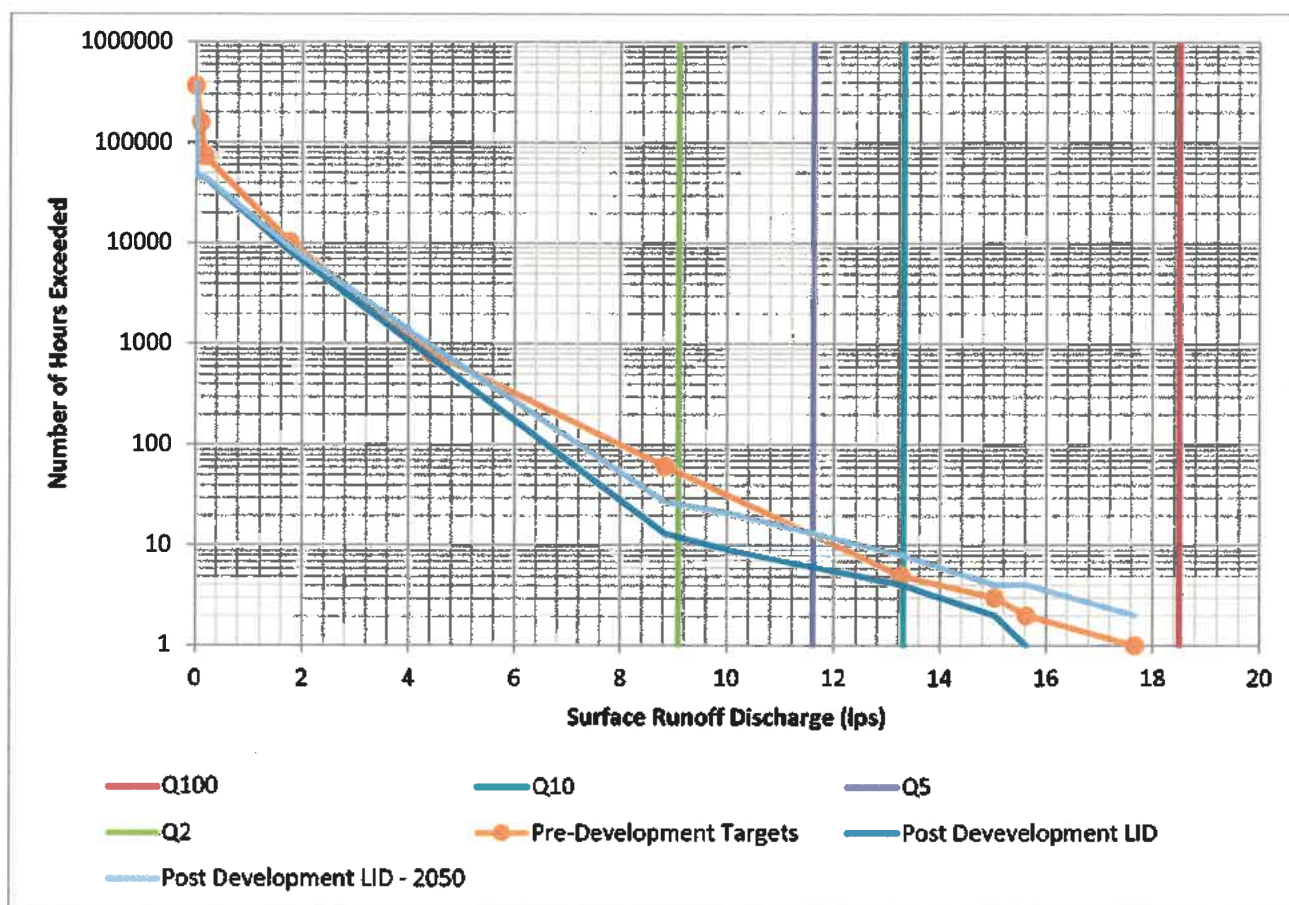
The analysis of the proposed LID scenario shows a reasonable continuation of the pre-development water balance, maintaining peak discharge flows and duration to pre-development levels for all discharges below the 1:100-year level (18.5 lps). The recommended net storage volume of 450 cubic metres will accommodate the 1:100 year design event, and provides ample opportunity to maintain the volume of water transferred to the shallow and deep groundwater systems over the long-term. In addition, the proposed LID meets the pre-development targets for average total run-off (362mm/year average) and infiltration volumes (636mm/year average)

5 ADPATIVE MANAGEMENT STRATEGY

The NE Comox plan defines requirements for an adaptive management strategy, including the requirements for monitoring the post construction performance and adapting to changes that occur whether they are deficiencies in the performance, or out performance. The adaptive strategy should also account for a changing climate, and in NE Comox the planning horizon needs to include the expectation of additional rainfall climate change scenario for the year 2050. To this end the following items form the basis of the proposed adaptive management plan.

1. Simulations of the proposed system using the adapted 2050 rainfall file shows a flow-duration relationship (Figure 8 and Table 8) consistent with the pre-development relationship.

Figure 8: 2050 Post Development with LID Controls: Flow-Duration Comparison



Quest Homes – LOT B
Town of Comox

Table 8: Pre/Post Development with LID – 2050 – Duration Exceedances Comparison

Flow Rate (L/s)	Pre-Development Exceedance (hours)	Post-Development with LID - 2050 Exceedance (hours)	Change in Exceedance (hours)
0	368,184	385,704	17,520
0.1	160,751	45,818	-114,933
0.18	73,541	44,153	-28,388
1.76	10,285	9,276	-1,009
4.43	813	961	148
8.84	61	27	-34
13.26	5	8	3
15.03	3	4	1
15.63	2	4	2
17.7	1	2	1
18.5	0	0	0

- The adaptive management strategy will also include routine monitoring of system performance. Working with the Town, a monitoring program will be initiated to determine the performance of the system relating outflows to the receiving environment to the rainfall on the development. This will be especially important during the construction of the residential dwellings. Increased monitoring of flows and sediment levels will be critical to the long-term performance of the system. Protection of the installed systems during construction will require a concerted effort to ensure sediment doesn't overload the installed components. An approved erosion and sediment control plan (ESCP) will be required to be design, implemented and monitored.
- It is recommended that quarterly review of system performance for two (2) years following 80% build-out of the development occur as part of the adaptive management strategy. The review will include measurement of sediment build-up within the catch basins, and of flows entering and exiting the galleries. If the system is performing better than expected, meaning outflows are lower than expected, the control orifices can be made larger. If the opposite performance is measured than the first step would be to reduce control orifice sizes.
- When designed, constructed and maintained correctly, infiltration galleries can have a functional life in excess of 20 years. If performance is not as expected, it will be possible to increase storage areas within the remaining road dedication area.
- Ongoing maintenance by Town of Comox Public Works crews will also be required. This maintenance would include periodic cleaning of pipes, manholes, catch basins and other appurtenances, street cleaning, and maintaining vegetation within swales and/or the rain garden. For ease of maintenance, it is imperative that key system components be easily accessible to Public Works crews. This will be address in the design of the system. Additional preventative maintenance that could be undertaken by the Town includes avoiding the use of road sand and salt, and home owner education.

Quest Homes – LOT B
Town of Comox

6. In accordance with the NE Comox Neighbourhood SWMP, the development will provide performance monitoring equipment, which will be established in consultation with the Town during the detailed design phase. The equipment will likely include a flow measuring device at the pond outlet, and observation stand pipes at appropriate locations in the infiltration/rain gardens.

Quest Homes – LOT B
Town of Comox

6 CONCLUSION

The stormwater management plan for Lot B of the Quest Homes development utilizes a number of key LID techniques, namely:

- Amended soils within the municipal road dedication; and
- Storage/infiltration systems
- Dry pond detention system with outlet flow controls.

These planned strategies maintain the existing water balance, and provide no net impact on the downstream conveyance system. The system will mitigate storm water runoff for all flows up to and including the 1:100-year design event, such that post-development storm water runoff rates are equal to or less than pre-development runoff rates.

By affixing my professional seal, I hereby certify the report to conform to the development standards for storm water management as specified by the Town of Comox.

MCELHANNEY CONSULTING SERVICES LTD.



Mark DeGagne, P.Eng.

APPENDIX A: GEOTECHNICAL REPORT



June 3, 2017

Our File: 2211-47471-08

Via email: peter@questhomes.ca

Quest Homes
PO Box 20025
Courtenay, BC
V9N 0A7

Dear Mr. Gerritsen,

**RE: GEOTECHNICAL ASSESSMENT
RESIDENTIAL SUBDIVISION DEVELOPMENT FOR LOT B, PLAN 46438
LAZO ROAD & GUTHRIE ROAD, TOWN OF COMOX**

1.0 INTRODUCTION

McElhanney Consulting Services Ltd. (McElhanney) was retained to provide a geotechnical assessment for the above referenced residential subdivision development with location shown on attached **Figure 1, Site Location Plan**. The purpose of the geotechnical assessment was to determine the soil and groundwater conditions at the site, and to provide geotechnical comments and recommendations pertaining to the design and construction of the proposed development.

It is understood that the proposed development will consist of the development of 9 to 10 building lots and supporting municipal infrastructure for construction of single family or multi-family residences of one or two-story buildings founded on conventional foundations. This report summarizes the factual results of the field investigation and provides geotechnical comments and recommendations for the above-mentioned development.

This report also confirms that McElhanney is appropriately qualified for this assessment, and the undersigned is a member 'in good standing' with the Association of Professional Engineers and Geoscientist of British Columbia (APEGBC).

2.0 SCOPE OF WORK

- 1) Assess the geotechnical suitability of site for the proposed development;
- 2) Identify potential geohazards impacting site;
- 3) Evaluate soil bearing resistances for building and road structures;
- 4) Provide recommendations for structural fill and foundation support;
- 5) Provide comments regarding the re-use of site materials;
- 6) Provide recommendations for temporary excavations (trenches & building);

Page 1 of 16



June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

- 7) Provide recommendations for road structure; and
- 8) Assess the soil permeability and the suitability for onsite ground infiltration facility.

The scope of work does not include any biological, environmental, or archeological assessments of the site, and as such no comments regarding the above are provided in this report.

3.0 ASSESSMENT METHODOLOGY

In preparation of the field investigation, a site reconnaissance was conducted by McElhanney on May 1, 2017 to view the existing site conditions, determine suitable test locations and equipment access for the field investigation.

A subsurface geotechnical investigation was completed on May 2, 2017. A tracked mini excavator was utilized to advance eleven (11) test pits (designated as TP17-1 to TP17-11). Soil and groundwater conditions were logged, and select bulk soil samples taken. Upon completion, test pits were backfilled, and nominally compacted using an excavator bucket. Test pit locations were flagged and their location recorded using a handheld GPS. The approximate test pit locations showing on the proposed development plan is attached as Figure 2.

4.0 SITE DESCRIPTION

The subject site is located on the southwest corner of Guthrie Road and Lazo Road, Comox. The site is roughly rectangular, approximately 2.4 acres in size, and about 22 m above geodetic sea level. The site is currently undeveloped, and covered with mature trees and supporting understory growth. The site is bound by Lazo Road to the east, by Guthrie Road to the north, and by single and multi-family residences to the south and west.

The site is relatively level with a gentle gradient (approximately 6.5%) sloping down to the northeast. The total relief of the site is about 9 m.

No surface water was observed on the property during the site visit. No natural water bodies or water courses were observed within or near the site. A drainage ditch was observed along the Guthrie Road and the Lazo Road. Based on the field observations, there appears to be no identifiable riparian areas within or adjacent to the site.

There are no obvious signs of geo-hazards, such as slope instability, landslides, or debris flows observed within the subject site at the time of the assessment.

Selected Site Photos are attached to this report.



June 3, 2017

2211 47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

5.0 SOIL AND GROUNDWATER CONDITIONS

5.1 Surficial Geology

Existing geology maps of the area published by the Geologic Survey Canada were reviewed. Map 32 – 1960; Surficial Geology Courtenay indicates the surficial geology covering the study area generally consists of marine deposits overlying glacial till.

The subject site is within the soil unit: **5d/3**

Soil Units are defined as follows:

- 5d:** Varied stony, gravelly and sandy marine veneer deposits, thickness generally less than 5 feet;
- 3:** Ground Moraine Deposits (Vashon Drift): Till; lenses of gravel, sand and silt.

5.2 Soil Stratigraphy

In general, the soils strata encountered at the test pits locations consists of:

- **TOPSOIL**, organic material with silt and fine sand matrix, loose, dark brown; overlying
- **FLUVIAL DEPOSITS**, Sand with some Gravel to Sand and Gravel, some silt, occasional to frequent cobbles, trace to some rootlets, loose to compact, brown; over
- **GLACIAL TILL**, from weathered to intact, silty to clayey sand with trace to some gravel, occasional cobble, compact to very dense, grey.

Dense till was encountered in all test pits at a depth ranging from about 0.7 to 1.2 m from the existing ground surface. Subsurface soil conditions identified by the test pit field program was generally consistent with surficial geology map information for this area.

Soil conditions encountered beneath the ground surface are summarized in **Table 1**.



June 3, 2017
2211- 47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

Table 1. Soil Stratigraphy and Groundwater Seepage Summary

Test Pit Number	Depth of Test Pit (m)	Topsoil (m)	Fluvial Deposits: Sands & Gravels (m)	Silt/Clay (m)	Glacial Till (m)	Groundwater Seepage (m)
TP17-1	1.0	0-0.6	0.6-0.8	None	0.8-1.0	0.7
TP17-2	1.0	0-0.5	0.5-0.8	None	0.8-1.0	0.8
TP17-3	1.0	0-0.4	0.4-0.9	None	0.9-1.0	None
TP17-4	0.9	0-0.7	0.7-0.8	None	0.8-0.9	None
TP17-5	0.85	0-0.4	0.4-0.7	None	0.7-0.85	None
TP17-6	1.1	0-0.6	0.6-1.0	None	1.0-1.1	0.8
TP17-7	1.5	0-0.5	0.5-0.9	0.9-1.2	1.2-1.5	0.9
TP17-8	0.9	0-0.5	0.5-0.8	None	0.8-0.9	None
TP17-9	1.0	0-0.8	0.8-0.9	None	0.9-1.0	0.9
TP17-10	0.8	0-0.5	0.5-0.7	None	0.7-0.8	None
TP17-11	1.1	0-0.6	0.6-0.9	None	0.9-1.1	None

Detailed discussion for each soil strata is provided below.

TOPSOIL consisted of loose, dark brown silty sand and gravel, roots and organics, ranging in thickness from 0.4 m to 0.8 m.

Fluvial SAND and GRAVEL, trace to some silt, rootlets, was encountered below the topsoil in all test pits with thickness ranging from 0.1 m to 0.5 m. The fluvial deposits were in a loose to compact condition, brown, and moist.

In TP17-7, a 0.3 m thick of silt/clay, low plastic, firm to stiff, wet and brown in colour was encountered above the silty/clayey glacial till.

GLACIAL TILL was encountered in all test pits at depth ranging from 0.7 m to 1.2 m. The till consisted of sand, some silty to silty/clayey, trace to some gravel, occasional cobbles. Generally, the upper 0.1m was weathered compact condition and the lower was dense to very dense.



June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

Detailed soil descriptions are provided in the attached **Test Pit Soil Logs**. Laboratory test results which include soil gradation analysis from selected soil samples are also attached to this report.

5.3 Groundwater Conditions

Groundwater seepage was observed during test pitting in 5 out of 11 test pits at depth ranging from about 0.7 m to 0.9 m below ground surface. However, it should be noted that groundwater conditions at other times and locations may differ from those observed within the test pits at the time of the assessment. Groundwater levels should be expected to fluctuate seasonally with cycles of precipitation.

Considering the existence of shallow till at the site, a perched groundwater table on the low permeability glacial till should be expected during heavy rain events and in prolonged wet seasons.

Generally, the groundwater will likely flow laterally above the till following the shallow ground surface gradient towards the northeast.

6.0 GEOTECHNICAL COMMENTS AND RECOMMENDATIONS

6.1 Site Preparation and Removal of Unsuitable Materials

All structures including buildings, roads and pavement sections, sidewalks, and utilities should be supported by either suitable native soils or structural fill.

All unsuitable material should be removed to expose the underlying suitable bearing subgrade, under confirmation from the geotechnical engineer. Unsuitable materials would include any non-mineral material such as existing vegetation, topsoil, peat, fill, or other materials containing organic matter. Material that is loose, soft, or disturbed should also be removed.

Glacial till is considered to be suitable bearing soil, which varies from 0.7 m to 1.2 m below existing grade, as shown in **Table 1**.

The natural fluvial sand and gravel is considered to be suitable bearing soil if found in a compact or better condition. If not, removal or additional compaction will be required for subgrade founded on fluvial sand and gravel. Geotechnical field reviews should be carried out during site preparation to confirm that the soil conditions encountered during construction is consistent with the materials assumed for design.

6.2 Excavation for Infrastructure & Foundations

Conventions outlined in the Occupational Health and Safety Regulations under Part 20, Sections 20.78 through 20.95, should be adhered to for any excavations on site. Where excavation scenarios are not clearly defined under this regulation, the geotechnical engineer should be consulted to assess potential hazards and provide recommendations.



June 3, 2017
2211 47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

The geotechnical engineer should be consulted immediately for any slope stability concerns during construction. For preliminary design layout considerations only, excavation side walls higher than 1.2 m should be sloped at 1H: 1V, or terraced with vertical heights of each terrace not exceeding 1.2 m, unless otherwise approved by the geotechnical engineer. Individual terraces should be at least as wide as they are high. The geotechnical engineer should be consulted where vertical heights for the excavation side walls exceed 1.2 m.

Ingress of groundwater into any excavation should be controlled with perimeter ditching or a combination of sumps and pumps. For foundation excavations, if groundwater is encountered, a geotechnical engineer should be consulted.

The bottom of the excavation should satisfy the required lateral dimensions to support structural fill, as shown on **Sketch 1**, Section 6.4 of this report. Soil conditions at the bottom of any excavation should be approved by the geotechnical engineer before placing structural fill.

6.3 General Foundation Support

Prior to footing excavating and placement of formwork, McElhanney should be given the opportunity to review the structure locations relative to the excavated subgrade areas or the prepared structural fill pad. Before placing structural fill, structure footprints should be clearly marked in the field to allow the geotechnical engineer to inspect the lateral space required to support the structural load conditions.

All structures should be supported on suitable bearing subgrade and/or structural fill placed on a suitable bearing strata.

Prior to the placement of concrete foundation elements, pavement structure, or structural fill, any bearing soil that has been softened, loosened, or otherwise disturbed (including test pitting and tree removal) during completion of construction activities should be removed, or re-compacted following the recommendations for placement of structural fill. All structure subgrades should be inspected and approved by a geotechnical engineer.

Building Foundation

The soil conditions at the subject site are considered suitable for a shallow foundation (standard spread/strip footings) to support the proposed single family residences.

The encountered fluvial deposits, Sand to Sand and Gravel should be removed unless it is in a compact or better condition based on field review during construction.

ULS and SLS bearing resistance values calculated in accordance with the Canadian Foundation Engineering Manual (Canadian Geotechnical Society, 2006).

The recommended limit state bearing capacities for the soil conditions encountered in the field assessment and foundation geometries are provided in Table 4-1.



June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

Table 4-1: Summary of Limit State Bearing Capacities

Subgrade Soils	Minimum Embedment (m)	Maximum Base Width (m)	Bearing Capacity		Typical Soil Parameters	
			Ultimate Limit State ¹ (kPa)	Serviceability Limit State ² (kPa)	Friction Angle (°)	Unit Weight (kN/m ³)
Native Sands in compact or better condition	0.6	2.0	135	90	31	20
Till Like Materials	0.6	2.0	225	150	42	22
Imported Structural Fill	0.6	2.0	150	100	33	21

Notes:

1. Canadian Foundation Engineering Manual, 4th Edition, 2006, Canadian Geotechnical Society, Bitech Publishing Ltd., Richmond, BC.
2. For settlements of less than the maximum of 25 mm.

Additional recommendations for shallow foundations are provided below.

- 1) Foundations and/or engineered fill for the proposed building should be founded on undisturbed, unfrozen, inorganic subgrades; free from existing fill, organic soil or loose/soft or wet soils; or approved structural fill. All subgrades should be inspected and verified by the Geotechnical Engineer prior to foundation construction.
- 2) If unsuitable soil such as organic soils, existing fill or loose/soft, wet soils, fine grained soils are encountered at the foundation level, subgrades should be sub-excavated to compact native subgrade and replaced with structural fill.
- 3) In order to reduce the potential for frost heaving during cold weather conditions, shallow foundations should be provided with a minimum soil cover of 0.45 m.
- 4) Groundwater seepage or surface water runoff may result in a loss of bearing strength; therefore, groundwater seepage or surface water runoff should not be allowed to enter foundation excavations. Any water or snow that collects in the foundation excavation should be removed. Prior to the placement of concrete foundation members or structural fill, any bearing soil that has been softened or loosened should be removed or re-compacted.
- 5) Concrete foundations are not to be placed on frozen soils, nor should soils beneath the foundation be allowed to freeze during or after construction; therefore, the foundation subgrade shall be protected from freezing during and after construction.



June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

- 6) Additional reinforcing steel should be placed in the strip footing at the crossing location of any planned utility (water/sewer) service trench, and 5-15M reinforcing bars extending 1 m beyond the edge of trench each way also be placed at such locations.

Grade Supported Floor Slabs

The following recommendations are provided for grade supported floor slabs:

- 1) Concrete slab on grades should be placed over a compacted granular pad. Where additional grade is necessary, backfill should consist of structural fill compacted to 98%, the materials standard proctor maximum dry density in 200 mm loose lifts.
- 2) A minimum of 125 mm thick crushed gravel base layer (or approved equivalent) and covered by a layer of moisture barrier should be placed below the underside of the floor slab prior to concrete placement. The base course should be compacted as per above.
- 3) In order to reduce the potential for unbalanced lateral pressures on the concrete foundation walls during construction, the placement and compaction of foundation wall backfill should be carried out simultaneously on each side of the foundation walls.
- 4) Sub-slab areas loosened by construction traffic or utility line construction should be re-compacted to recommended specifications, prior to concrete placement.

Road, Walkway and Pavement Subgrades

Structural fill, undisturbed glacial till, non-organic fluvial sand and gravel in a compact or better condition, will be considered suitable as subgrade soil for roads, walkways and parking lots. This is contingent upon the removal of any organic, or loosened or disturbed soils within the proposed area. To mitigate potential settlement, it is recommended to uniformly compact the entire subgrade soil with a heavy duty vibrating compactor before placing sub-base and base materials. Sufficient moisture conditioning should be given before compaction. A proof roll test is recommended before placing sub-base materials.

6.4 Structural Fill Specifications

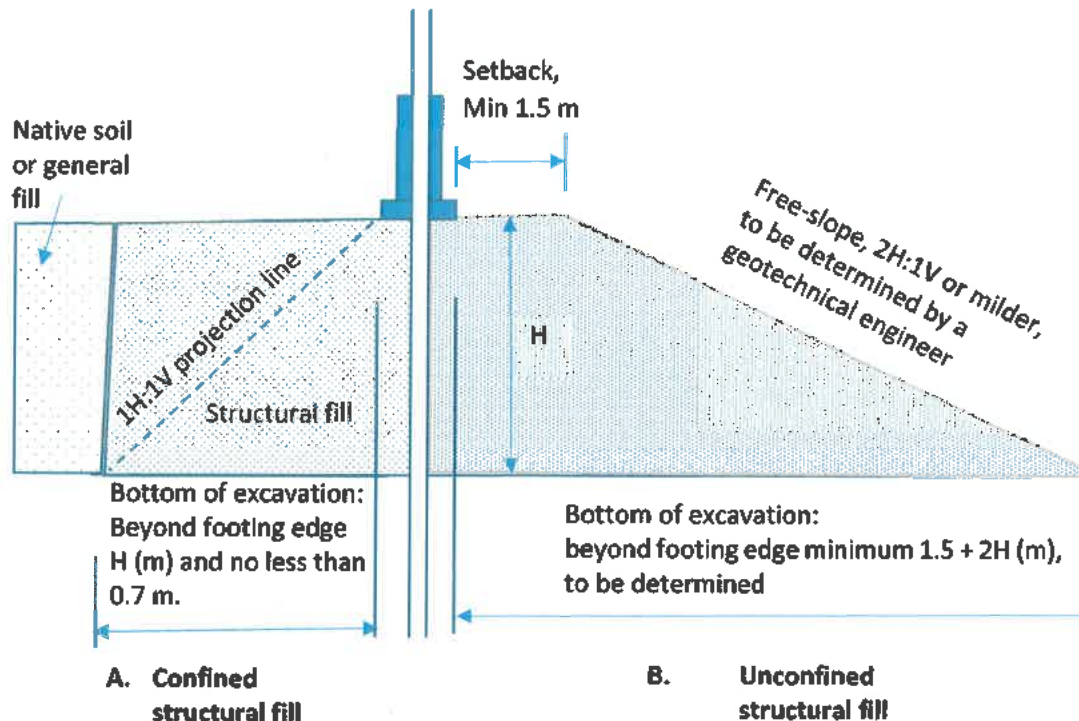
Structural fill should be used if needed to raise areas that will support buildings, slab on grade or pavement structures. The geotechnical engineer should approve the exposed subgrade prior to any placement of structural fill, to confirm that unsuitable materials have been removed.

The base of the structural fill should extend beyond the footing as shown in the following **Sketch 1**. For confined condition, the bottom of excavation should extend beyond footing edge a distance minimum the thickness of structural fill (H) and no less than 0.7 m. For unconfined structural fill, the gradient of a free-slope will be determined by slope stability assessment, which will depend on soil strength, slope height, groundwater table and surcharge loads.



June 3, 2017
2211- 47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment



Sketch 1. Foundation Setback and Dimension of Structural Fill

Structural fill should consist of inorganic, minus 75 mm well graded sands and gravels, such as pit run gravel or crushed rock, unless otherwise advised. If structural fill placement is to be carried out in the wet season or during inclement weather, free draining materials with a fines content (passing the #200 sieve) of less than 5%, should be used.

Structural fill should be compacted to a minimum of 95% of Modified Proctor maximum dry density (ASTM D1557) in any areas that will support buildings, slabs, roads or pavement.

Compaction of structural fill should include moisture conditioning as needed to bring the soils to approximately the optimum moisture content, as determined by the Proctor density-moisture relationship. It is extremely important the soils are not compacted in a dry state. Drier soils are apt to bridge and experience a higher void ratio in the lower zone of each lift, which can cause excessive settlement when higher water content conditions are encountered, post-construction.

Structural fills should be compacted using vibratory compaction equipment, and placed in lift thicknesses appropriate for the size and type of compaction equipment used. A general guideline for maximum lift thickness as measured loose is 100 mm for light hand equipment, 150 mm for a small walk-behind roller or plate tamper, and 300 mm for a large ride-on roller or



June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

heavy (>500 kg) vibratory plate compactor, a rubber-tired backhoe mounted hoe-pac, or a track-excavator mounted hoe-pac.

It is expected that the total post-construction settlement of structural fill will increase with its fill thickness. It will also be significantly affected by the materials type, the moisture content of structural fill, the compacted density and the construction schedule.

The potential total settlement of 2m thick structural fill will be generally less than 25mm, if the granular materials was compacted according to the recommendations stated above.

Should the total thickness of structural fill be over 2 m, detailed additional recommendations will be required to limit the potential total settlement. The geotechnical engineer should be consulted once a construction methodology has been determined.

It is highly recommended that structural fill placement and compaction be observed and approved by the geotechnical engineer or qualified personnel. This would include approval of the proposed fill materials, and performing a suitable program of compaction testing.

6.5 Re-Use of Natural Site Materials

The excavated fluvial sand and gravel, and encountered local fills onsite may be suitable for structural fill with additional on-site classification or laboratory testing.

Glacial Till

Generally, excavated glacial till is not considered a suitable material for structural fill due to its extreme high sensitivity to moisture content and high requirement for compaction effort. Excavated glacial till may be suitable for re-use as engineered fill at non-critical location, provided the following requirements and recommendations are satisfied, and while maintaining the placement and compaction standards for the **Structural Fill**.

The re-use of native till material should meet the following requirements:

- All till clumps should be completely broken down and restructured by the action of compaction.
- The fines content should be less than 20%.
- The moisture content should be at or near the wet-side of the optimum water content, as determined by a Proctor density test.
- A control strip compaction test should be conducted prior to use, to establish a practical compaction procedure.

If the above basic requirements cannot be achieved, till should not be re-used. The control strip compaction test should be visually reviewed by the Geotechnical Engineer.

Compaction test results should also meet the specified 95% of the materials Modified Proctor Density (ASTM 1557).



June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

As indicated, till with fines content of more than 20% is not recommended for re-use.

The following procedures has been used by others for Sandy/gravelly till (less than 20% fines):

- Before stock piling, spread newly excavated till in thin layers and track pack with kneading action to initially break down clumps under desirable weather conditions; maintain suitable moisture content or provide proper moisture conditioning, and protect stock pile from inclement weather.
- Till materials should be placed with a moisture content slightly higher (1% to 3%) than the optimum moisture content.
- When used as structural fill, place in loose lifts, no greater than 150 mm, and compacted with a large (> 10 ton) vibratory roller, kneading action may be needed to breakdown clumps.
- Vibratory plate tampers (1000 lb minimum) and hoe-pac attachments may be used to compact this material in confined trenches. Fill materials be placed in less than 100 mm loose lifts when using this equipment.
- Where used as structural fill, compacted glacial till material must be capped with a minimum of 0.3 m of pit run.
- Contractors shall submit samples of till material to the geotechnical engineer for appropriate laboratory testing to determine the suitability of the materials, prior to placement as a fill soil.
- If other soils are encountered, the above recommendations may be altered in writing by the undersigned.

6.6 On-Site Road Structural Design

Organic or deleterious materials should be removed from beneath the designated roadways, driveways, or parking areas prior to subgrade preparation.

The encountered glacial till is considered suitable for road subgrade if in an undisturbed condition. However, in the area where silty/clayey till is located, sufficient subbase materials is required. This is because the Silty/clayey till has a poor drainage and is prone to water softening after disturbance.

The fluvial sand and gravel is considered suitable for road subgrade if in a compact or better condition. Otherwise, partial removal and/or additional compaction is required.

If additional fill is required to raise grades to design elevation, structural fill should be used.

Prior to placement of road structure gravels, subgrade should be shaped to provided drainage away from the road centerline.

Subgrade should be proof rolled after final compaction, and any areas showing excessive visible deflection should be reviewed and repaired.



The subdivision access road will be classified as local. The proposed road cross-section will be suitable for the pavement structure within the proposed subdivision. Typical pavement structure is provided in Table 2 below.

Table 2. Pavement Structure

Material	Thickness (mm)
Asphaltic Concrete Pavement	50
20 mm minus Granular Base	75
75 mm minus Subbase (SGSB)	250 (min.) or 350 (min.) if directly over low permeability soil, such as weathered till or silty /clayey soil)

All construction aggregate supplied for the pavement structure should confirm to current Master Municipal Contract Document (MMCD) Specifications.

6.7 Soil Permeability, Groundwater and Stormwater Infiltration/Exfiltration

The subsurface investigation indicates that the site mainly consists of 0.7 m to 1.0 m thick layer of moderate to high permeable topsoil, alluvial sand and gravel over dense to very dense glacial till. Ground water seepage was encountered in the geographically low area above till surface. Typical hydraulic saturated conductivities for glacial till in this area would range from $ksat$ 10^{-2} to 10^{-4} m/day. The infiltration rate of this glacial till is considered to be very low to low.

The existence of shallow till will not allow for efficient vertical infiltration at this site.

Groundwater will generally flow laterally above the till surface towards northeast with minimal vertical seepage. Due to the very low to low saturated hydraulic conductivity of the till, a seasonally perched ground water table is likely to develop and will potentially reach the ground surface, especially in the low laying area during heavy rainfall events or in a prolonged wet season.

It should be noted that the suitability and design of storm water infiltration systems requires input from both geotechnical and civil engineers. From geotechnical perspective, onsite storm water infiltration systems are not recommended based on the following reasons:

- The entire site is underlain with shallow till that has a very low to low saturated hydraulic conductivity.
- till depths less than 1.0 m were encountered in the topographically lowest area in the southeast end and groundwater seepage was encountered over till surface.
- Seasonally perched groundwater on the till will not allow for rapid or safe infiltration of stormwater in wet seasons.



6.8 Permanent Dewatering

Based on the encountered soil condition, the conventional requirements of current B.C. Building Codes pertaining to building drainage systems are considered suitable for shallow footing at this site. This will generally consist of a perimeter drainage system, as specified in the current B.C. Building Code. However, the requirement of additional permanent dewatering will also depend on other conditions such as adjacent groundwater storage/infiltration facilities, the building footing depth and the storm water system. The building designer should consider all the above conditions to determine whether a conventional perimeter drainage system is sufficient or not.

6.9 Seismic Site Classification

No compressible or sizable liquefiable soils were encountered during the test pit investigation, nor are anticipated given our geotechnical knowledge of the area.

The site classification for seismic site response per the National Building Code of Canada (NBCC 2015, Section 4.1.8.4) requires an assessment of the upper 30 m of the soil profile. Based on the available soil information, the site is classified as Site Class C for seismic design purposes.

6.10 General Geohazards

Based on the above, there are no obvious signs of geohazards, such as landslide, debris flow, rock fall, liquefiable soil, or highly compressible soil existing within the proposed development area.

6.11 Slope Stability and Retaining Structure

No obvious signs of slope instability was observed in the subject site. Stable slopes with a height of less than 2 m were observed along the boundary of Guthrie Road and Lazo Road. A minimum building setback of 5 m from the slope crest is recommended.

Removal of trees and vegetation on the site will not likely have an impact on slope stability.

There are no obvious signs of slope stability issues due to groundwater seepage.

The potential of soil erosion from the upper fluvial soil could be increased along the lower property boundary slopes if lateral groundwater flow over the glacial till is increased. In such a case, an interceptor drain along the slope crest and/or proper vegetation coverage over the slopes should be considered.

At the time this report was authored, no fill slopes or engineered retaining structures were anticipated as part of the development.

However, detailed development plan was not available at the time of preparing this report. If any filled slope or any retaining structures are proposed, McElhanney should be consulted and above recommendations may need to be modified.



June 3, 2017
2211- 47471-08

Lazo & Guthrie Road Subdivision Geotechnical Assessment

6.12 Conclusion

Base on the above, it is McElhanney's opinion that the subject property is considered suitable for the proposed development, provided that the recommendations presented herein are followed.

The recommendations presented in this report are based on site observations, field and laboratory testing results, information available regarding the proposed development, and our experience with similar projects. Considering the inherent nature of soil variations, soil conditions between test holes can differ from the those indicated in the test holes during construction time. In such instance, adjustments to design and construction may be necessary.

7.0 ACKNOWLEDGEMENTS

Notwithstanding any other statement in this report this report may be relied upon by the Town of Comox in considering a subdivision application under Section 86(1)(d) of the Land Title Act. The report has been prepared for, and at the expense of the client. McElhanney has not acted as an agent for the Town of Comox in the preparation of this report.

8.0 LIMITATIONS

This report is based on the subsurface conditions observed in the geotechnical investigation described in this report. Should different soil or groundwater conditions be encountered during construction, McElhanney should be notified immediately and the recommendations submitted herein will be reviewed, and revised if necessary.

A qualified geotechnical engineer or technologist should inspect the construction of all foundations and road structures. Similarly, the placement of any structural fill on which subgrade support will be required should be monitored by both on-site visual inspection and compaction testing.

McElhanney Consulting Services Ltd. has prepared this document in a manner consistent with that level of care and skill ordinarily exercised by members of the engineering and science professions currently practicing under similar conditions in the jurisdiction in which the services are provided, subject to the time limits and physical constraints applicable to this document. No warranty, express or implied, is made.

This document, including all text, data, tables, plans, figures, drawings and other documents contained herein, has been prepared by McElhanney for the sole benefit of the client. It represents McElhanney's professional judgment based on the knowledge and information available at the time of inspection. Our recommendations are based on our field reconnaissance, limited available soils information and our geotechnical knowledge of the area. If other soil conditions are encountered, or other pertinent information becomes available, the undersigned is to be notified for geotechnical review and the recommendations may be altered or modified in writing. McElhanney is not responsible for any unauthorized use or modification



June 3, 2017
2211 47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

of this document. All third parties relying on this document with the exception of regulatory authorities do so at their own risk.

The factual data, interpretations, suggestions, recommendations and opinions expressed in this document pertain to the specific project, site conditions, design objective, development and purpose described to McElhanney by the Client, and are not applicable to any other project or site location. In order to properly understand the factual data, interpretations, suggestions, recommendations and opinions expressed in this document, reference must be made to the entire document.

It is common that soils vary on a particular site from that observed, of which our recommendations and conclusions are based. Therefore, a contingency fund should be included in the construction budget to allow for the possibility of variations, which may result in the modification of the design and construction procedures. As a condition of this report, subsequent inspection is to be carried out at the time of excavation to confirm the soil conditions. At that time, it may become necessary to modify our recommendations. It is recommended that the drawings and specifications be reviewed by McElhanney to ensure compliance with our intent and recommendations. We are available to provide this service, if requested.

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June 3, 2017

2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

9.0 CLOSURE

We trust that the information contained in this report is suitable for your current needs. If you have any questions or require additional information, please do not hesitate to contact us.

Yours truly,

McKenney Consulting Services Ltd.



Matthew Ren, P.Eng.
Project Geotechnical Engineer

Reviewed by:

W.J. (Bill) Purdy, P.Eng.
Senior Geotechnical Engineer

Attachments:

1. Figure 1, Site Location Plan
2. Figure 2, Test Pit Location Plan
3. Test Pit Soil Logs (TP17-01 to TP17-11)
4. Laboratory Soil Test Results
5. Selected Site Photos

REVISION HISTORY

Date	Status	Revision	Author
May 12, 2017	Authored		M. Ren
June 3, 2017	Final		M. Ren



June 3, 2017
2211- 47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

Attachment 1: Site Location Plan

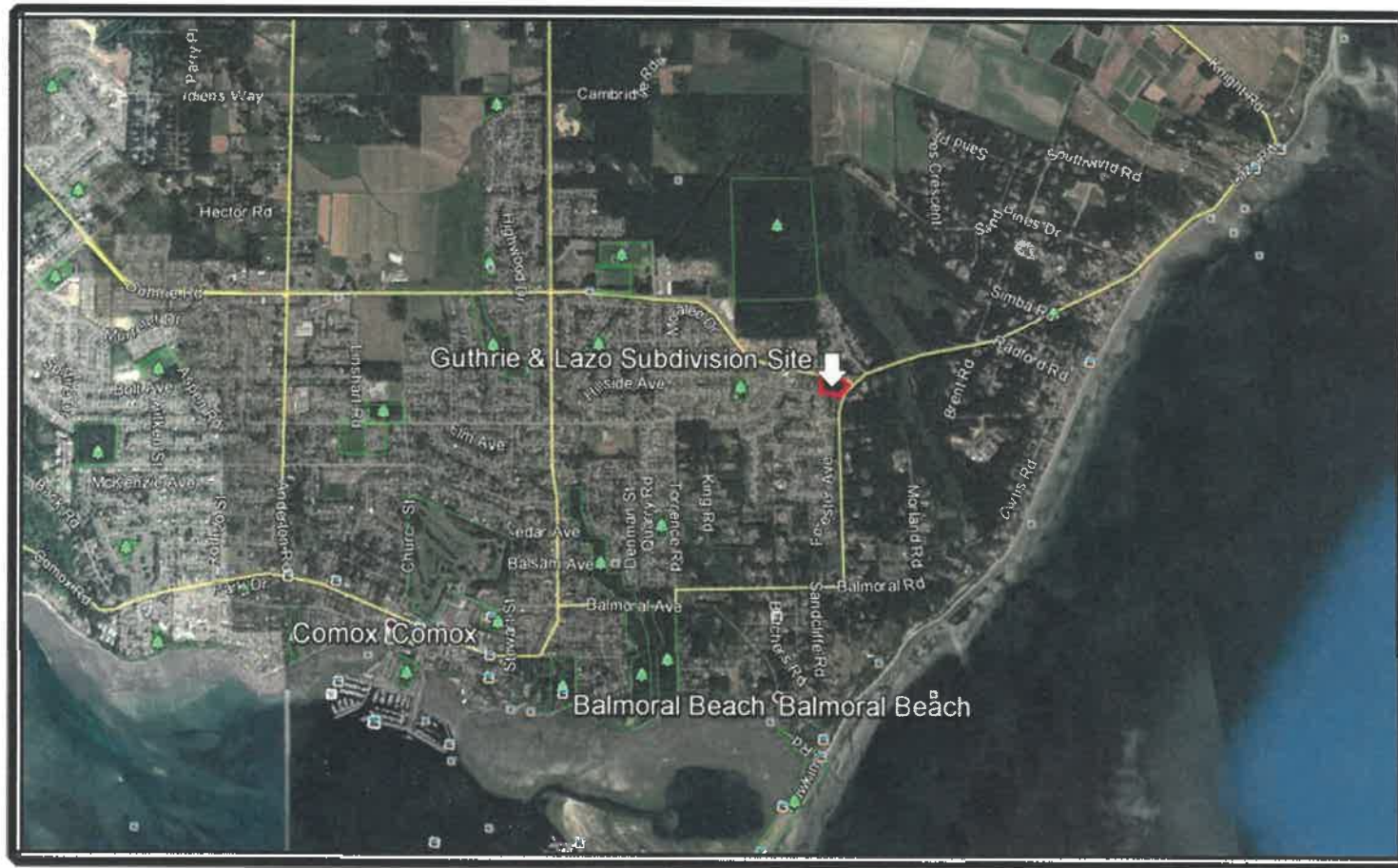


Figure 1: Site Location Plan



June 3, 2017
2211- 47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

Attachment 2: Test Pit Location Site Plan

A3





June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

**Attachment 3: Test Pit Soil Logs
(TP17-01 to TP17-11)**



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TP17-01

PAGE 1 OF 1

CLIENT Peter GerritsenPROJECT NAME Quest Homes - Lazo and Guthrie SubdivisionPROJECT NUMBER 2211-47471-08PROJECT LOCATION Comox, BCDATE STARTED 5/2/17COMPLETED 5/2/17GROUND ELEVATION _____ TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR _____

GROUND WATER LEVELS:

EXCAVATION METHOD Mini Excavator▽ AT TIME OF EXCAVATION 0.70 mLOGGED BY M. RenCHECKED BY K. BarthAT END OF EXCAVATION —NOTES WP #112AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	TESTS	GRAPHIC LOG	MATERIAL DESCRIPTION
0.5				TOPSOIL; SAND; organics, roots, very loose, dark brown, moist
	GB 1	MC = 24%		0.60 GRAVELLY SAND; some cobbles, loose to compact, brown to grey, wet ▽ -More compact with depth -Seepage @ 0.7 m
	GB 2	MC = 12%		0.80 SILT, SAND and GRAVEL (till-like); compact to very dense, grey, wet
1.0				1.00 Bottom of test pit at 1.00 meters.



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TP17-02

PAGE 1 OF 1

CLIENT Peter GerritsenPROJECT NAME Quest Homes - Lazo and Guthrie SubdivisionPROJECT NUMBER 2211-47471-08PROJECT LOCATION Comox, BCDATE STARTED 5/2/17COMPLETED 5/2/17GROUND ELEVATION _____ TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR _____

GROUND WATER LEVELS:

EXCAVATION METHOD Mini Excavator▽ AT TIME OF EXCAVATION 0.80 mLOGGED BY M. RenCHECKED BY K. BarthAT END OF EXCAVATION —NOTES WP #113AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	TESTS	GRAPHIC LOG	MATERIAL DESCRIPTION
0.5				TOPSOIL; SAND; organics, roots, very loose, dark brown, moist
	GB 1	MC = 13%		SAND; rootlets, some cobbles, some gravel, loose, brown, moist to wet -Seepage @ 0.8 m
1.0				0.80 ▽ SILT, SAND and GRAVEL (fill-like); compact to very dense, grey, wet

Bottom of test pit at 1.00 meters.



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TP17-03

PAGE 1 OF 1

CLIENT Peter GerritsenPROJECT NAME Quest Homes - Lazo and Guthrie SubdivisionPROJECT NUMBER 2211-47471-08PROJECT LOCATION Comox, BCDATE STARTED 5/2/17COMPLETED 5/2/17GROUND ELEVATION _____ TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR _____

GROUND WATER LEVELS:

EXCAVATION METHOD Mini ExcavatorAT TIME OF EXCAVATION —LOGGED BY M. RenCHECKED BY K. BarthAT END OF EXCAVATION —NOTES WP #114AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	TESTS	GRAPHIC LOG	MATERIAL DESCRIPTION
				TOPSOIL; SAND; organics, roots, very loose, dark brown, moist
0.5				
				0.40
				SAND and GRAVEL; rootlets, some cobbles, loose to compact, brown, moist
				-Becomes more compact with depth
	GB 1	MC = 8%		
				0.90
1.0				SAND and GRAVEL (till-like); some silt, compact to very dense, grey, wet
				1.00
Bottom of test pit at 1.00 meters.				



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TP17-04

PAGE 1 OF 1

CLIENT Peter Gerritsen

PROJECT NAME Quest Homes - Lazo and Guthrie Subdivision

PROJECT NUMBER 2211-47471-08

PROJECT LOCATION Comox, BC

DATE STARTED 5/2/17

COMPLETED 5/2/17

GROUND ELEVATION

TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR

GROUND WATER LEVELS:

EXCAVATION METHOD Mini Excavator

AT TIME OF EXCAVATION —

LOGGED BY M. Ren

CHECKED BY K. Barth

AT END OF EXCAVATION —

NOTES WP #115

AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	GRAPHIC LOG	MATERIAL DESCRIPTION
			TOPSOIL;
0.5			
			0.70 SAND and GRAVEL; some cobbles, loose to compact, brown, moist
			0.80 SAND and GRAVEL (till-like); some silt, compact to very dense, grey, wet
			0.90

Bottom of test pit at 0.90 meters.



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TP17-05

PAGE 1 OF 1

CLIENT Peter Gerritsen

PROJECT NAME Quest Homes - Lazo and Guthrie Subdivision

PROJECT NUMBER 2211-47471-08

PROJECT LOCATION Comox, BC

DATE STARTED 5/2/17

COMPLETED 5/2/17

GROUND ELEVATION

TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR

GROUND WATER LEVELS:

EXCAVATION METHOD Mini Excavator

AT TIME OF EXCAVATION —

LOGGED BY M. Ren

CHECKED BY K. Barth

AT END OF EXCAVATION —

NOTES WP#116

AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	TESTS	GRAPHIC LOG	MATERIAL DESCRIPTION
				TOPSOIL;
0.5				SAND; rootlets, some gravel to gravelly, occasional cobble, loose to compact, brown, moist
	GB 1	MC = 19%		SAND and GRAVEL (till-like); some silt, compact to very dense, grey, wet

Bottom of test pit at 0.85 meters.



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TP17-06

PAGE 1 OF 1

CLIENT Peter GerritsenPROJECT NAME Quest Homes - Lazo and Guthrie SubdivisonPROJECT NUMBER 2211-47471-08PROJECT LOCATION Comox, BCDATE STARTED 5/2/17COMPLETED 5/2/17GROUND ELEVATION _____ TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR _____

GROUND WATER LEVELS:

EXCAVATION METHOD Mini Excavator▽ AT TIME OF EXCAVATION 0.80 mLOGGED BY M. RenCHECKED BY K. BarthAT END OF EXCAVATION —NOTES WP #117AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	TESTS	GRAPHIC LOG	MATERIAL DESCRIPTION
0.5				TOPSOIL;
	GB 1	MC = 11%		SAND and GRAVEL; trace rootlets, few cobbles, loose to compact, brown, moist -Seepage @ 0.8 m
1.0				▽ SAND and GRAVEL (till-like); some silt, compact to very dense, grey, wet
				Bottom of test pit at 1.10 meters.



McElhanney

TP17-07

PAGE 1 OF 1

CLIENT Peter GerritsenPROJECT NAME Quest Homes - Lazo and Guthrie SubdivisionPROJECT NUMBER 2211-47471-08PROJECT LOCATION Comox, BCDATE STARTED 5/2/17COMPLETED 5/2/17GROUND ELEVATION _____ TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR _____

GROUND WATER LEVELS:

EXCAVATION METHOD Mini Excavator▽ AT TIME OF EXCAVATION 0.90 mLOGGED BY M. RenCHECKED BY K. BarthAT END OF EXCAVATION —NOTES WP #118AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	TESTS	GRAPHIC LOG	MATERIAL DESCRIPTION
0.5				TOPSOIL;
0.50				SAND and GRAVEL; rootlets, occasional cobble, loose to compact, brown, moist -Minor seepage @ 0.9 m
	GB 1	MC = 11%		
1.0				SILT/CLAY; some gravel, low plasticity, firm to stiff, grey/brown, wet
	GB 2	MC = 39%		
1.20				SILT, SAND and GRAVEL (till-like); hard to very hard, grey, wet
1.5				Bottom of test pit at 1.50 meters.

GENERAL BH / TP / WELL 2211-47471-08 GUTHRIE AND LAZO SUBDIVISION GP J GINT STD CANADA LAB. ODT 5/8/17



McElhanney

TP17-08

PAGE 1 OF 1

CLIENT Peter Gerritsen

PROJECT NAME Quest Homes - Lazo and Guthrie Subdivision

PROJECT NUMBER 2211-47471-08

PROJECT LOCATION Comox, BC

DATE STARTED 5/2/17

COMPLETED 5/2/17

GROUND ELEVATION _____ **TEST PIT SIZE** digger bucket

EXCAVATION CONTRACTOR

GROUND WATER LEVELS:

EXCAVATION METHOD Mini Excavator

AT TIME OF EXCAVATION —

LOGGED BY M. Ren

CHECKED BY K. Barth

AT END OF EXCAVATION —

NOTES WP #119

AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	TESTS	GRAPHIC LOG	MATERIAL DESCRIPTION
				TOPSOIL; SAND; organics, rootlets, very loose, dark brown, moist
0.5				SAND and GRAVEL; rootlets, few cobble, trace silt, loose to compact, brown, moist
	GB 1	MC = 12%		SILT, SAND and GRAVEL (fill-like); dense to very dense, grey, moist

Bottom of test pit at 0.90 meters.

GENERAL BH / TP / WELL 2211-47471-08 GUTHRIE AND LAZO SUBDIVISON,GPJ GINT STD CANADA LAB.GDT 5/8/17



McElhanney

TP17-09

PAGE 1 OF 1

CLIENT Peter Gerritsen

PROJECT NAME Quest Homes - Lazo and Guthrie Subdivision

PROJECT NUMBER 2211-47471-08

PROJECT LOCATION Comox, BC

DATE STARTED 5/2/17

COMPLETED 5/2/17

GROUND ELEVATION

TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR

GROUND WATER LEVELS:

EXCAVATION METHOD Mini Excavator

∇ AT TIME OF EXCAVATION 0.90 m

LOGGED BY M. Ren

CHECKED BY K. Barth

AT END OF EXCAVATION —

NOTES WP#120

AFTER EXCAVATION —

[illegible]

Bottom of test pit at 1.00 meters.

GENERAL BH / TP / WELL 2211-47471-08 GUTHRIE AND LAZO SUBDIVISION.GPJ ONT STD CANADA LAB.GDT 5/8/17



McElhanney

TP17-10

PAGE 1 OF 1

CLIENT Peter GerritsenPROJECT NAME Quest Homes - Lazo and Guthrie SubdivisonPROJECT NUMBER 2211-47471-08PROJECT LOCATION Comox, BCDATE STARTED 5/2/17COMPLETED 5/2/17

GROUND ELEVATION _____

TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR _____

GROUND WATER LEVELS:

EXCAVATION METHOD Mini ExcavatorAT TIME OF EXCAVATION —LOGGED BY M. RenCHECKED BY K. BarthAT END OF EXCAVATION —NOTES WP #121AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	TESTS	GRAPHIC LOG	MATERIAL DESCRIPTION
				TOPSOIL; SAND; organics, roots, very loose
0.5	GB 1	MC = 18%		SAND; rootlets, few cobbles, some gravel, trace silt, loose to compact, brown, moist
				SAND and GRAVEL (till-like); dense to very dense, grey, moist
				Bottom of test pit at 0.80 meters.

GENERAL BH / TP / WELL 2211-47471-08 GUTHRIE AND LAZO SUBDIVISION, GPJ GINT STD CANADA LAB.GDT 5/8/17



McElhanney

TP17-11

PAGE 1 OF 1

CLIENT Peter Gerritsen

PROJECT NAME Quest Homes - Lazo and Guthrie Subdivision

PROJECT NUMBER 2211-47471-08

PROJECT LOCATION Comox, BC

DATE STARTED 5/2/17

COMPLETED 5/2/17

GROUND ELEVATION

TEST PIT SIZE digger bucket

EXCAVATION CONTRACTOR

GROUND WATER LEVELS:

EXCAVATION METHOD Mini Excavator

AT TIME OF EXCAVATION —

LOGGED BY M. Ren

CHECKED BY K. Barth

AT END OF EXCAVATION —

NOTES WP #122

AFTER EXCAVATION —

DEPTH (m)	SAMPLE TYPE NUMBER	TESTS	GRAPHIC LOG	MATERIAL DESCRIPTION
				TOPSOIL; SAND; organics, roots, very loose
0.5				
	GB 1	MC = 17%		0.60 SAND; trace rootlets, few cobbles, some gravel, trace silt, loose to compact, brown, moist
				0.90 SILT, SAND and GRAVEL (till-like); compact to very dense, grey, wet
1.0				
				1.10

Bottom of test pit at 1.10 meters.

GENERAL BH / TP / WELL 2211-47471-08 GUTHRIE AND LAZO SUBDIVISION.GPJ GINT STD CANADA LAB.GOT 5/8/17



June 3, 2017
2211- 47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment

Attachment 4: Laboratory Soil Test Results

McElhanney Consulting Services Ltd.

495 Sixth Street
Courtenay, BC

SIEVE ANALYSIS REPORT

8 16 30 50 SERIES

PROJECT NO. 2211-47471-08

CLIENT Peter Gerritsen
C.C.

TO
Peter Gerritsen
PO Box 20025
Courtenay, BC
B9N -0A7

ATTN: Peter Gerritsen

PROJECT Quest Homes-Lazo & Guthrie Subdivision
Geotechnical Engineering

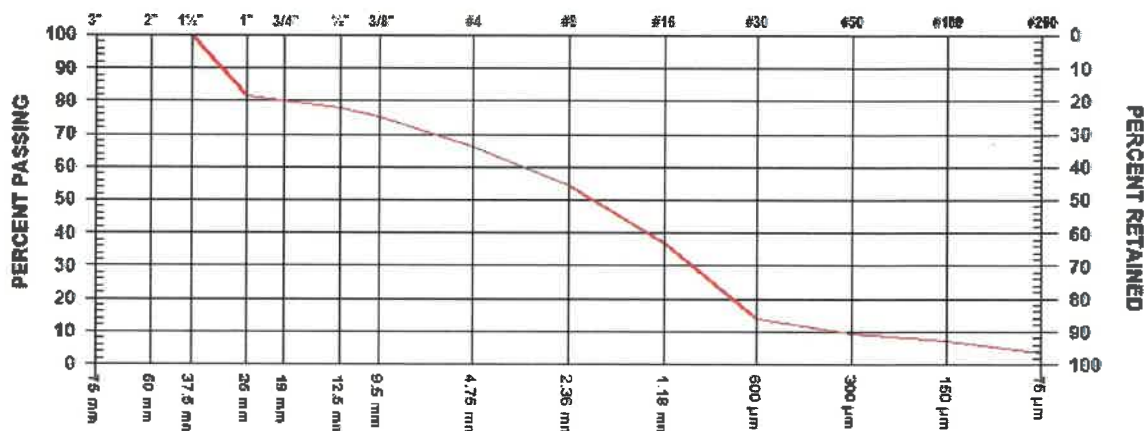
Comox

CONTRACTOR

SIEVE TEST NO. 1 DATE RECEIVED 02-May-2017 DATE TESTED 08-May-2017 DATE SAMPLED 02-May-2017

SUPPLIER N/A
SOURCE TP17-01; S-1; 0.6-0.8m
SPECIFICATION
MATERIAL TYPE Test Pit Sample

SAMPLED BY MR
TESTED BY PMD
TEST METHOD WASHED



GRAVEL SIZES		PERCENT PASSING	GRADATION LIMITS
3"	75 mm		
2"	50 mm		
1 1/2"	37.5 mm	100.0	
1"	25 mm	81.5	
3/4"	19 mm		
1/2"	12.5 mm	77.9	
3/8"	9.5 mm	75.2	

SAND SIZES AND FINES		PERCENT PASSING	GRADATION LIMITS
No. 4	4.75 mm	66.1	
No. 8	2.36 mm	54.3	
No. 16	1.18 mm	36.8	
No. 30	600 µm	13.8	
No. 50	300 µm	9.3	
No. 100	150 µm	7.1	
No. 200	75 µm	3.6	

MOISTURE CONTENT 24.0 %

COMMENTS
Lab ID#145

McElhanney Consulting Services Ltd.

495 Sixth Street
Courtenay, BC

SIEVE ANALYSIS REPORT

8 16 30 50 SERIES

PROJECT NO. 2211-47471-08

CLIENT Peter Gerritsen
C.C.

TO
Peter Gerritsen
PO Box 20025
Courtenay, BC
B9N -0A7

ATTN: Peter Gerritsen

PROJECT Quest Homes-Lazo & Guthrie Subdivision
Geotechnical Engineering

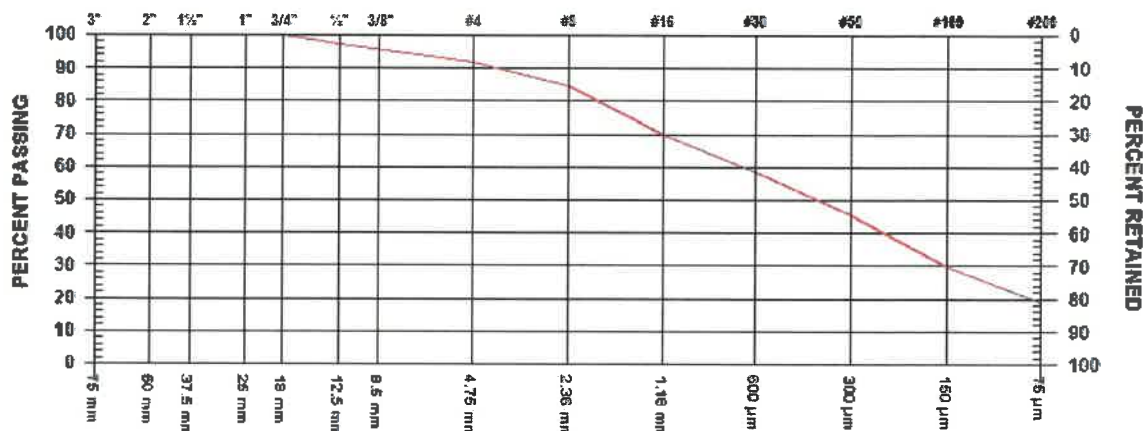
Comox

CONTRACTOR

SIEVE TEST NO. 2 DATE RECEIVED 02-May-2017 DATE TESTED 08-May-2017 DATE SAMPLED 02-May-2017

SUPPLIER N/A
SOURCE TP17-01; S2; 0.8-1.0m
SPECIFICATION
MATERIAL TYPE Test Pit Sample

SAMPLED BY MR
TESTED BY PMD
TEST METHOD WASHED



GRAVEL SIZES	PERCENT PASSING	GRADATION LIMITS
3" 75 mm	100.0	
2" 50 mm		
1 1/2" 37.5 mm		
1" 25 mm		
3/4" 19 mm		
1/2" 12.5 mm		
3/8" 9.5 mm	97.1	

SAND SIZES AND FINES	PERCENT PASSING	GRADATION LIMITS
No. 4 4.75 mm	92.1	
No. 8 2.36 mm	84.7	
No. 16 1.18 mm	70.0	
No. 30 600 µm	58.6	
No. 50 300 µm	45.5	
No. 100 150 µm	29.8	
No. 200 75 µm	19.1	

MOISTURE CONTENT 12.0 %

COMMENTS
Lab ID#145

McElhanney Consulting Services Ltd.

495 Sixth Street
Courtenay, BC

SIEVE ANALYSIS REPORT
8 16 30 50 SERIES

TO
Peter Gerritsen
PO Box 20025
Courtenay, BC
B9N -0A7

PROJECT NO. 2211-47471-08
CLIENT Peter Gerritsen
C.C.

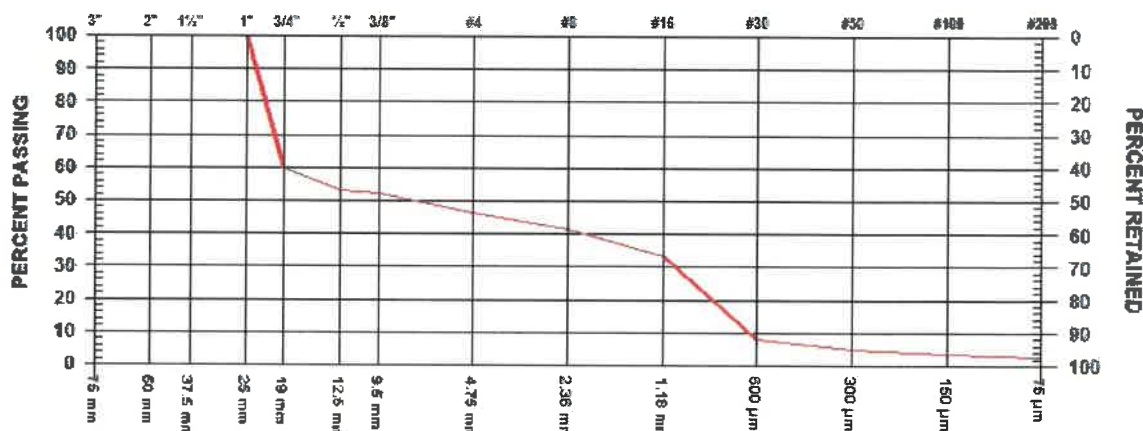
ATTN: Peter Gerritsen

PROJECT Quest Homes-Lazo & Guthrie Subdivision
Geotechnical Engineering Comox
CONTRACTOR

SIEVE TEST NO. 3 DATE RECEIVED 02-May-2017 DATE TESTED 08-May-2017 DATE SAMPLED 02-May-2017

SUPPLIER N/A
SOURCE TP17-02; S3; 0.5-0.8m
SPECIFICATION
MATERIAL TYPE Test Pit Sample

SAMPLED BY MR
TESTED BY PMD
TEST METHOD WASHED



GRAVEL SIZES	PERCENT PASSING	GRADATION LIMITS
3" 75 mm		
2" 50 mm		
1 1/2" 37.5 mm		
1" 25 mm	100.0	
3/4" 19 mm	59.7	
1/2" 12.5 mm	53.2	
3/8" 9.5 mm	52.1	

SAND SIZES AND FINES	PERCENT PASSING	GRADATION LIMITS
No. 4 4.75 mm	46.4	
No. 8 2.36 mm	41.4	
No. 16 1.18 mm	33.5	
No. 30 600 µm	8.3	
No. 50 300 µm	5.0	
No. 100 150 µm	3.8	
No. 200 75 µm	2.5	

MOISTURE CONTENT 13.0 %

COMMENTS
Lab ID#145

McElhanney Consulting Services Ltd.

495 Sixth Street
Courtenay, BC

A1

A2

A3

SIEVE ANALYSIS REPORT 8 16 30 50 SERIES

TO
Peter Gerritsen
PO Box 20025
Courtenay, BC
B9N -0A7

PROJECT NO. 2211-47471-08
CLIENT Peter Gerritsen
C.C.

ATTN: Peter Gerritsen

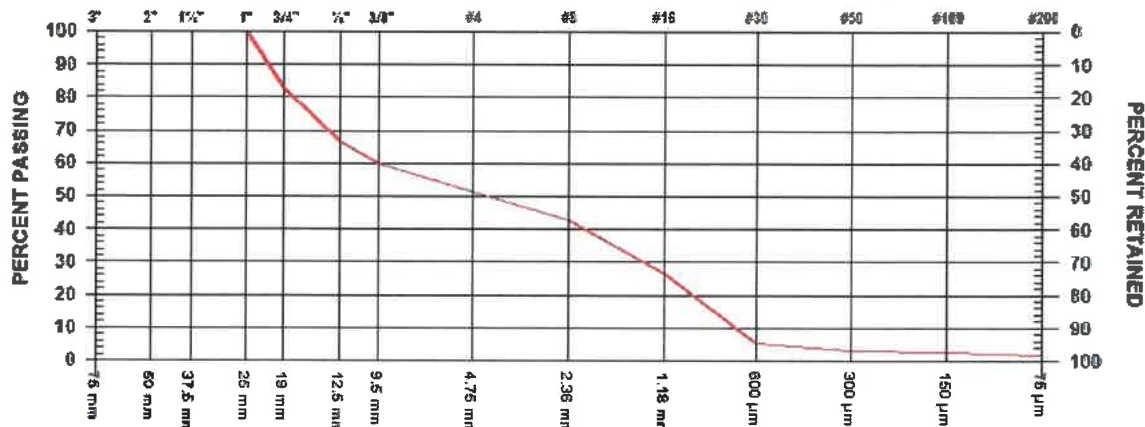
PROJECT Quest Homes-Lazo & Guthrie Subdivision
Geotechnical Engineering
CONTRACTOR

Comox

SIEVE TEST NO. 4 DATE RECEIVED 02-May-2017 DATE TESTED 08-May-2017 DATE SAMPLED 02-May-2017

SUPPLIER N/A
SOURCE TP17-03; S4; 0.6-0.8m
SPECIFICATION
MATERIAL TYPE Test Pit Sample

SAMPLED BY MR
TESTED BY PMD
TEST METHOD WASHED



GRAVEL SIZES		PERCENT PASSING	GRADATION LIMITS
3"	75 mm		
2"	50 mm		
1 1/2"	37.5 mm		
1"	25 mm	100.0	
3/4"	19 mm	82.8	
1/2"	12.5 mm	66.6	
3/8"	9.5 mm	60.0	

SAND SIZES AND FINES		PERCENT PASSING	GRADATION LIMITS
No. 4	4.75 mm	51.3	
No. 8	2.36 mm	42.8	
No. 16	1.18 mm	26.6	
No. 30	600 µm	5.5	
No. 50	300 µm	3.2	
No. 100	150 µm	2.6	
No. 200	75 µm	1.8	

MOISTURE CONTENT 8.0 %

COMMENTS
Lab ID#145



June 3, 2017
2211- 47471-08

Lazo & Guthrie Road Subdivision Geotechnical Assessment

Attachment 5: Select Site Photos



June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment



Image 1 View southwest at intersection of Guthrie Rd and Lazo Rd.



Photo 2 View west on Guthrie Rd near intersection of Lazo Rd.



June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment



Photo 2 View from southwest corner of property looking north.



Photo 3 View from south side of property, looking northwest.



June 3, 2017
2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment



Photo 4 View from west side of the property, looking northeast.



Photo 6 View east on site, between TP17-08 and TP-11. Typical forest cover, ground gently sloping down to east.



June 3, 2017
2211- 47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment



Photo 5 Test Pit TP17-01 shows typical shallow till and groundwater encountered approximately 0.7 m below ground surface.



Photo 6 Test Pit TP17-02 shows typical shallow till and minor groundwater seepage approximately 0.8 m below ground surface.



June 3, 2017

2211-47471-08

Lazo & Guthrie Road Subdivision - Geotechnical Assessment



Photo 7 Test Pit TP17-4 shows typical organic material and brown fluvial sediments over shallow till.



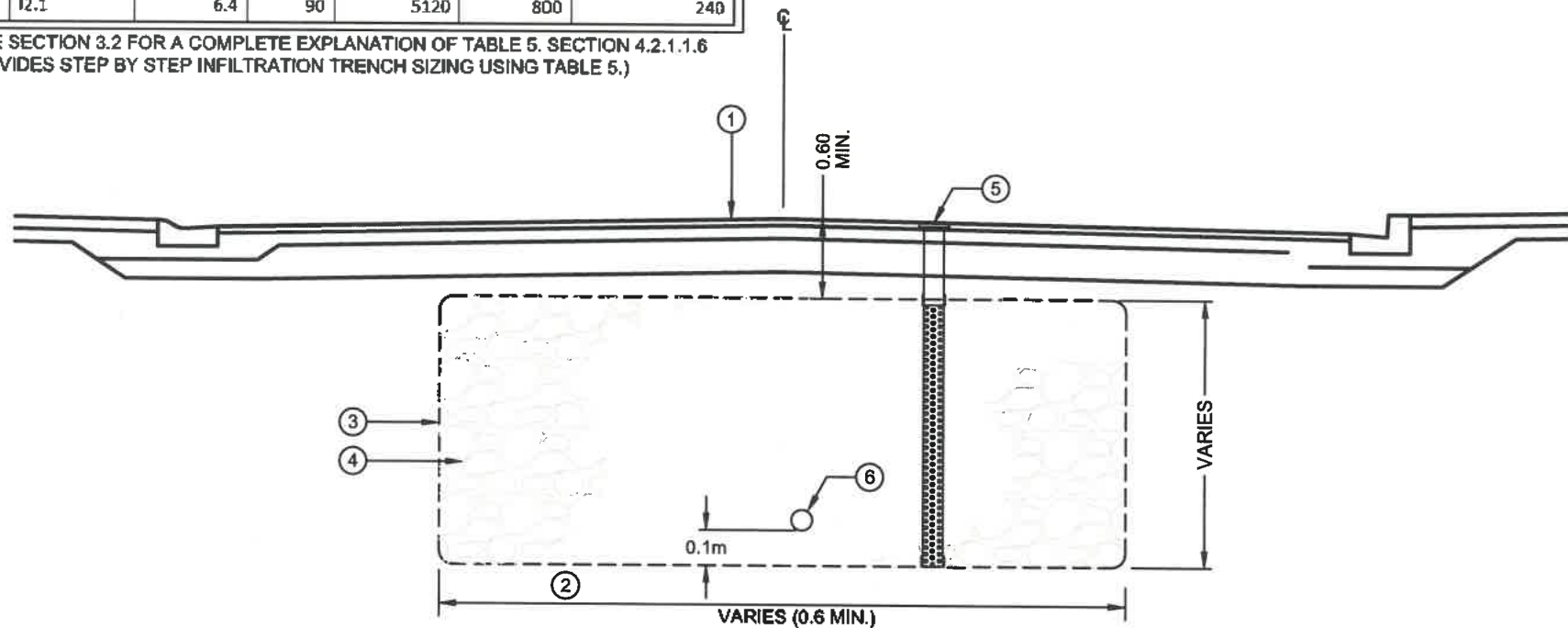
Photo 8 Test Pit TP17-7 shows shallow silty/clayey till and groundwater seepage approximately 0.9 m below ground surface.

APPENDIX B: STANDARD DRAWINGS

1. ROAD SURFACE, BASE, AND SUBBASE
2. FLAT, SCARIFIED SUB SOIL
3. GEOTEXTILE ALONG ALL SIDES OF RESERVOIR
4. DRAIN ROCK RESERVOIR
5. OBSERVATION WELL - 150Ø (MIN.) PIPE (PERFORATED INSIDE DRAIN ROCK RESERVOIR ONLY) C/W "ROBAR TYPE" CAST IRON VALVE BOX MARKED "STORM"
6. 150mm Ø MIN. PERFORATED DRAIN PIPE (PERFORATED INSIDE ROCK TRENCH ONLY). CONNECT TO CONTROL MANHOLE SC-103

Sub-Catchment				Infiltration Trench Parameters		
	Land Use	Total Area	% Imp	Total Base Area	Base Area per Hectare	Storage Volume per Hectare
{#}	{Zoning}	{ha}	{%}	{m²}	{m²/ha}	{m³/ha}
1A	R1.1	2.0	60	250	125	38
1B	R1.1	5.9	90	1180	200	60
2A	R1.1	6.0	60	2700	450	135
2B	I2.1 / PA1.1	6.4	90	1024	160	48
3	I2.1 / DND1.1	25.8	90	2580	100	30
4A	R1.1	27.5	60	4538	165	50
4B	I2.1	6.4	90	5120	800	240

(SEE SECTION 3.2 FOR A COMPLETE EXPLANATION OF TABLE 5. SECTION 4.2.1.1.6 PROVIDES STEP BY STEP INFILTRATION TRENCH SIZING USING TABLE 5.)



McElhanney

McElhanney Consulting Services Ltd.

495 SIXTH STREET
COURTENAY BC V9N 5V4

PH (250) 338-6406

NORTHEAST COMOX

STREET INFILTRATION TRENCH

Drawing No.

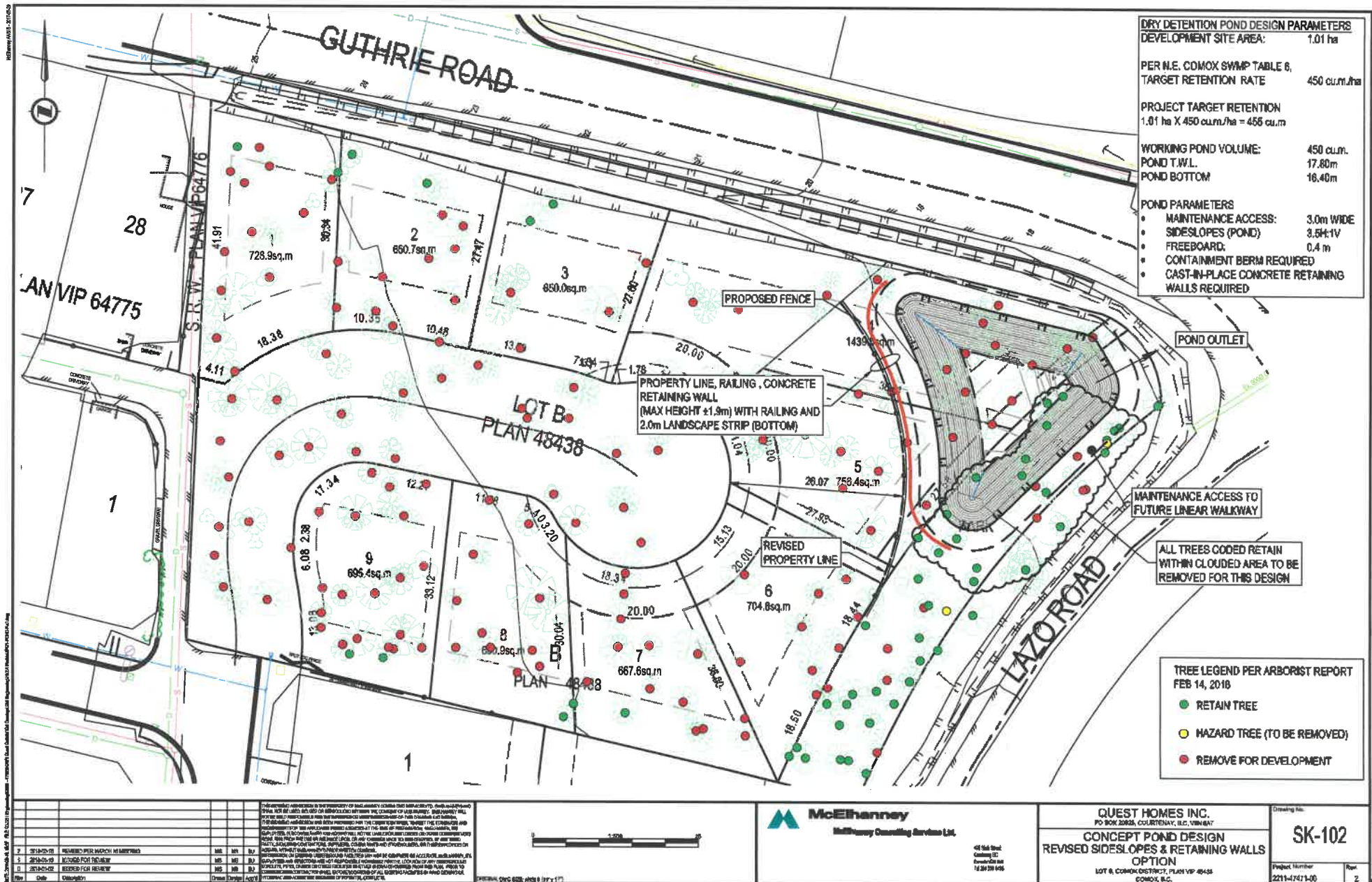
SC-105

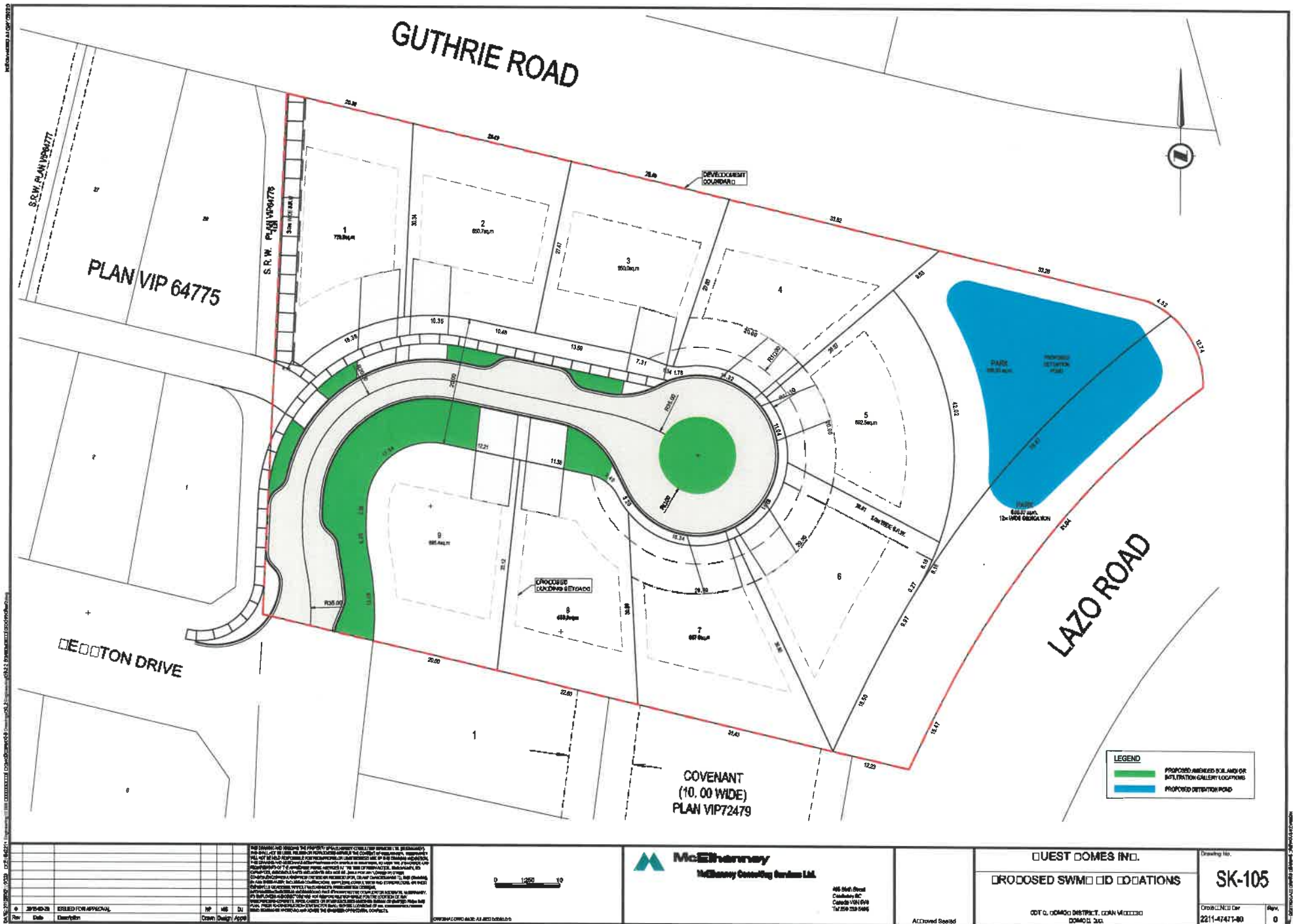
DATE: JUNE, 2015

Revision 2

Destroy all prints bearing previous number

APPENDIX C: SK-102 AND SK-105





**DVP 17-5
GUTHRIE & LAZO ROAD**

MAY 16, 2018

**ATTACHMENT 3
PUBLIC SUBMISSIONS**

Twyla Slonski

From: th_don@tbaytel.net
Sent: April 9, 2018 1:39 PM
To: council
Subject: Re: Guthrie and Lazo rds./DRT

Categories: Twyla - Outstanding

RECEIVED

April 9, 2018

TOWN OF COMOX

Council: The notice you had sent to residence is very vague. I am not sure what streets you are indicating and I'm not sure what you intend to do. Would you be more specific. If you intend to reconstruct Guthrie as you did on Robb Avenue I see no problem with that. It may end to reduce speeds on this street. thank you for your time. Donald Thomas, 1-1220 Guthrie Rd. 250-339-6397

LOG: 18-090	REFER:	AGENDA: RCM - April 18
FILE: Planning	ACTION: DVP	

o ~ planning

copies ~ Mayor & Council

RK / MK / SR

LOG: 15-064	REFER:	AGENDA:
FILE: planning	ACTION: MR	

February 11, 2015

Town of Comox
1809 Beaufort Avenue
Comox, BC
V9M 1R9

o planning
Capers Council
- RK
- SA

RECEIVED

FEB 11 2015

TOWN OF COMOX

RE: Statement Concerning Future Development of Lot B, Plan 48438

Comox Planning Department & Town Council:

Please find attached the following "Land Development Statement from the Residents of Beckton Estates..." for your review and future action.

Although Lot B, Plan 48438, is not currently being developed, the residents of this area are concerned that the Town may see fit to extend this section of Beckton Drive directly through to Guthrie in the future, thereby inviting additional traffic in this quiet residential area.

Residents would instead suggest road access to this lot be limited to either Guthrie Road, Lazo Road - or a combination of both - leaving this section of Beckton Drive as currently constructed. Accordingly, please find attached an original document, signed by affected Residents outlining our proposal for future road planning. Signatures were collected between February 1-11, 2015.

We ask that the Town of Comox Planning Department and any other relevant parties take the concerns of Residents into question when making future road access decisions concerning this Lot.

Best regards,

Residents of Beckton Estates as signed
c/o Julian Benedict
543 Beckton Drive,
Comox, BC V9M 4G3

RECEIVED

FEB 11 2015

TOWN OF COMOX

Clotted between

Feb 1 - 11, 2015

Land Development Statement from the Residents of Beckton Estates Concerning Lot B, Plan 48438 Future Development

We, the residents of Beckton Estates formally request that, if Lot B, Plan 48438 is developed, road access to this Lot be restricted to either Guthrie or Lazo (as this is a corner property), rather than expanding Beckton Drive to Guthrie – ensuring Beckton Drive residents are not subjected to increased traffic, speeding vehicles, noise, and vehicle pollution.



Figure 1: Image of Beckton Drive, Comox, looking towards Lot B, Plan 48438



Figure 2: Map of Lot in question

Full Name	Address of Resident	Signature
Julian Benedict	543 Beckton Drive	[Signature]
Stanley [unclear]	558 BECKTON DR.	[Signature]
E. Richter	559 Beckton	[Signature]
V. LEGER	2525 BECKTON	[Signature]
[unclear]	513 Beckton	[Signature]
T. J. [unclear]	1175 Beckton	[Signature]
Ginny Alliston	1160 Beckton Drive	[Signature]
Karen Frenette	483 Forester Ave	[Signature]
Bill Kelland	490 Forester Ave	[Signature]
Lisa Kelland	490 Forester Ave	[Signature]
Carol Bailey	470 Forester Ave.	[Signature]
Dave Rodgers	1202 Beckton Dr.	[Signature]
Juli Alcock	1202 Beckton Dr.	[Signature]
Cory Hendricks	1212 Beckton Dr.	[Signature]
Phillip Jones	487 Forester Ave.	[Signature]
Brandon [unclear]	531 Beckton Dr.	[Signature]
THOMAS PASO+KA	555 Beckton Dr.	[Signature]



TOWN OF COMOX PLANNING REPORT

TO:	RICHARD KANIGAN, CHIEF ADMINISTRATIVE OFFICER
FROM:	MARVIN KAMENZ, MUNICIPAL PLANNER REGINA BOZEROCKA, PLANNER I
SUBJECT:	REZONING APPLICATION: RZ 17-9 DEVELOPMENT PERMIT APPLICATION: DP 17-7 1700 BALMORAL AVENUE
DATE:	MAY 16, 2018 RCM FIRST AND SECOND READING REPORT


 Submitted by


 Concurrence


 Approval

Planner's recommendation:

1. That Comox Zoning Amendment Bylaw 1877 be given First and Second Reading (**Attachment 3**);
2. That Comox Phased Development Agreement Authorization Bylaw 1878: 1700 Balmoral Avenue be given First and Second Reading (**Attachment 4**); and
3. That a Public Hearing in respect of Bylaws 1877 and 1878, and discharge of Restrictive Covenants FB122070 and FB122076 (**Attachment 5**) be scheduled for June 6, 2018 at d'Esterre House, 1801 Beaufort Avenue, at 7:00 pm and staff be instructed to publish the requisite notices, as required by the *Local Government Act*.

Proposal:

The proposal is for a rezoning to a new comprehensive development zone and issuance of a Development Permit to remove the vacant existing single-family building and construct a five-storey, 45-unit apartment building with underground parking. Two existing covenants relating to a previous proposed apartment building, which did not proceed, are proposed to be discharged.

The Application Summary is contained in **Attachment 1**. The applicant's rationale and key development documents and drawings are contained in **Attachment 2**. Full size copies of the drawings are available in the Planning Department.

MAY 16, 2018

Background:

In 2005, rezoning and DP applications were approved for a 4-storey, 18.0 metre high, 31-unit apartment building. Underground parking was proposed, comprised of 38 parking stalls, including visitors, 15 bicycle stalls and storage lockers. The existing historical single-family building was proposed to be relocated closer to the street and used as residents' amenity space. The DP was renewed several times before expiring in December 2017.

In conformance with Comox Planning Procedures Bylaw No. 1780, the applicant conducted a pre-application neighbourhood consultation (in 2016 and 2017) for the purpose of identifying development impacts and determining if any negative impacts can be mitigated. The consultation materials, including public submissions to the applicant, are contained in **Attachment 6**.

Attachment 7 contains public submissions received by the Town to date. Several submissions that were submitted as part of the pre-application consultation were also sent to the Town and therefore appear in both Attachments 6 and 7.

Issues raised by the public in the pre-application consultation and submissions to the Town, include:

- o Building height;
- o Additional density;
- o Compatibility with existing neighbourhood;
- o Retention of the existing historical building;
- o Retention of mature trees; and
- o Traffic volumes and speeding.

Processing Procedures:

Attachment 8 lists the processing steps that will allow Council's concurrent consideration of the Rezoning and Development Permit applications and discharge of the restrictive covenants.

Attachment 9 contains a list of the external organizations and authorities to which the application was referred, along with responses.

OCP Implications:

The land use designation of the subject property is Residential: Low Rise Apartments, Townhouses & Ground Oriented Infill which among other residential land uses, is intended to accommodate low-rise apartments.

OCP, Residential Policy 2.1.1.3(f) allows for construction in excess of 4 storeys on the subject property, subject to the provision of satisfactory amenities. In relation to the 5th storey, the applicant has proposed a \$25,000 contribution for providing one or more of the following public amenities: public electrical charging stations within the Downtown area, and capital

MAY 16, 2018

improvements at Anderton Park, such as playground enhancement and site furnishings, including shade structure.

This amenity is in addition to the Affordable Housing contribution, road dedication and boulevard improvements, 10% adaptable units, BUILT GREEN construction, sound attenuation, five 220V outlets for vehicles, and tree retention covenant.

OCP Sustainability Implications:

Section 2.1.1.6 (a) Supporting Policies for Residential: Low Rise Apartments and Townhouses states that new multi-family development should be supported with full urban services and be located within 400 metres of a bus route and with convenient access to bikeways.

The subject property is centrally located on the future Balmoral Avenue bus route, bicycle route, within walking distance to Downtown amenities and services, public parks, Comox Golf Club and Marina. The proposed 45 units will benefit from the proximity to services, but also would serve to support public transit, local businesses and add to Town's social and environmental vitality.

The applicant proposes an \$18,692 Affordable Housing contribution, in accordance with OCP Policy 2.1.2.3(f)¹ for the proposed increased number of units (14) in relation to the currently permitted 31 units.

In accordance with OCP, Environment Policy 2.3.13 (k)², external third party "green building" certification is sought at the time of rezoning. Town practice has been to accept either BUILT GREEN Bronze certification, or, as an alternative, EnerGuide with a minimum 5% energy savings, or ENERGY STAR for New Homes Initiative programs.

The applicant proposes to construct to the higher, BUILT GREEN Silver standard. The Phased Development Agreement includes, as an amenity, construction to BUILT GREEN Silver, BC Energy Code Step 2³ or an equivalent energy savings standard.

¹ OCP policy 2.1.2.3(f) states that the Town may consider an affordable housing amenity for rezoning applications for four or more principal residential dwellings and the Towns Affordable Housing Strategy directs staff to enter into negotiations for an affordable housing contribution, where a rezoning process would result in more than 4 units. Town practice has been to obtain a 10% contribution, as land or cash in lieu, to be used for the creation of below-market housing.

² OCP policy 2.3.13(k) states that external third party "green building" certification will be sought for mixed use, commercial and residential development at the time of rezoning, in order to encourage energy and water conservation, solid waste reduction, attenuation of water run-off, and the reduction of GHG emissions. Third party "green building" certification programs include BUILT GREEN and Leadership in Energy and Environmental Design (LEED).

³ Step 2 provides an energy equivalency to BUILT GREEN Silver. As the applicant is voluntarily committing to a higher standard than Bronze, requiring Step 3 in recognition that BUILT GREEN provides more than just energy efficiency, was not pursued.

MAY 16, 2018

Development Permit Implications:

The subject property is located within Development Permit Area # 3 General Multi-Family. The purpose of DPA # 3 is to establish objectives for the form and character of multi-family and intensive residential development; to promote energy and water conservation; and to promote a reduction in green-house gas emissions.

Development Permit Guidelines 3.3.5.1 (4) states, "Where collection of solid waste is proposed to be centralized, garbage and recycling compounds should be provided in safe and convenient locations and not within a front or exterior side yard." While the proposed location of these facilities in the underground parkade meets this guideline, Emterra Environmental requires that either the bins be brought to the front lot line and a small staging area be provided or the parkade vertical clearance be increased to allow access by a small garbage truck. Schedule 1 Outstanding Items includes updated drawings to implement one of these options.

A number of Development Permit guidelines focus on reducing building mass and the appearance of building height, as viewed from the street level. The proposed apartment building has a staggered front elevation: the western third of its frontage has a 7.0 metres setback and the eastern two-thirds, a 17.0 metres setback. The fifth storey setback from the fourth story frontage varies from 9.5 to 4.5 metres. Extensive glazing, heavy timber elements, and metal trim provide visual interest.

Development Permit guideline 3.3.5.3(1) states, "Building orientation, scale, form and setbacks, where practical, should be consistent with the surrounding context." The proposed development is located within an established multi-family neighbourhood. The adjacent apartment building to the east at 1686 Balmoral Avenue is a 3 storey, L-shaped contemporary building with a flat roof and a front setback of approximately 14 metres. The east section of the proposed building has a comparable, 17.0 m front setback. No balconies are proposed along the east elevation. In addition, 6 deciduous trees are proposed along the east lot line of the subject property to augment the screening provided by the existing row of Douglas Fir trees on the neighbouring property.

Landscape guideline 3.3.5.5(4) states "Existing mature trees should be retained wherever possible." The proposed development includes the retention of two trees within the front yard (Red Oak and Black Locust), a three-stemmed Douglas Fir group, a 110cm diameter Douglas Fir at north property line, and an approximately 12.0 metre long cedar hedge at the west property line. In accordance with the Tree Inventory Assessment – 1700 Balmoral Ave Development report dated March 28, 2018 (included in **Attachment 2**), the remaining trees and hedges that are outside of the building footprint are not healthy or desirable long term trees (mature but diseased fruit trees, poplars, bitter cherries).

Subject to resolution of the **Outstanding Items** and **Development Permit Conditions** contained in **Schedule 1**, staff is of the opinion that the proposed development is in compliance, or substantial compliance, with the applicable DPA # 3 guidelines.

MAY 16, 2018

Comox Downtown Vitalization Program Implications

The subject property is located within the Vitalization Program Area. The Program focuses on increasing the number of Downtown residents as a mechanism to support existing businesses and the vitality of the area. The Program is comprised of priority processing, planning and building permit fee rebates and revitalization tax exemption incentives for the residential portion of developments. To qualify for the revitalization tax exemption, the building must meet BUILT GREEN Silver or equivalent construction standard and 50% adaptable units must be provided.

The applicant is not seeking the tax exemption part of the Vitalization Program (while the apartment building is proposed to meet BUILT GREEN Silver equivalency, only 10% of units will be adaptable).

Zoning Implications:

The subject property is currently zoned CD7 Comprehensive Development 7: 1700 Balmoral Avenue. The maximum height under the current zone is 18.0 metres, and no more than 4 storeys.

Attachment 1 provides a comparison between the current Comprehensive Development zone regulations and the proposed CD7.1.

The proposed height of the building is 17.80 metres, as measured from average grade. It is common practice to provide a contingency allowance in case of construction or surveying errors. In addition, increasing the parkade access clearance to allow garbage truck access may result in an increase in building height. Therefore, the CD7.1 zone has a proposed maximum height of 19.0 metres.

Restrictive Covenant Implications:

Two restrictive covenants in favour of the Town were registered on the subject property in relation to the 2005 development proposal.

Covenant FB122070 (**Attachment 5**)⁴ is for the retention of 3 trees within the front yard and for the relocation within the subject property of the existing historical single-family building and its conversion into a common amenity space for the future residents. A Deodar Cedar, one of the original protected trees, failed since registration of the covenant. It was not replaced, in anticipation of the development and construction works.

Schedule 1 Outstanding Items includes the registration of a new tree protection covenant specific to the current development proposal's retained and new trees.

⁴ One of the covenants, FB120772, is not proposed to be discharged and is not included in Attachment 5: it is for the provision and maintenance of an oil-grit separator for parking areas.

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

Covenant FB12076 (**Attachment 5**) prohibits the parking or storing on the subject property (except for temporary construction purposes) any oversized vehicles, including, but not limited to commercial vehicles and machinery, trailers, campers, motor homes, trucks (greater than 4.4 tonne gross vehicle weight) and boats. The Town no longer requires either the provision of oversize parking spaces or the registration of a restrictive prohibiting oversized vehicles.

Financial Implications:

The net effect of the proposal is positive. There are substantial benefits, given the proposed development density and that the site is fully serviced.

**Town of Comox
Estimated Financial Impact of Proposed Development
1700 BALMORAL AVENUE**

Prepared: C. Freundlich May 9, 2018

Description of Development:

Proposed 45 unit multi-family development

Initial benefit to Town finances:

Town DCCs on Downtown multi-family residential est.	\$	536,121
Planning Fees		6,140
Building permit fees (to be determined)		-
Affordable housing contribution		19,302
Other contributions (sidewalk, etc)		-
	\$	<u>561,563</u>

Near term annual Increase to Town finances:

1700 Balmoral Ave: 2017 taxes - assessment \$57,300	\$	(4,974)

Note - loss of taxation due to new development.

Long term annual increase to Town finances:

Residential Taxation on 45 Multi-Family Building	Assessed est.:	13,500,000	\$	35,497
			\$	<u>35,497</u>

Ongoing annual expenses to Town after development:

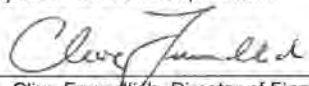
Amortization expense from new infrastructure	\$	-
Fire protection and annual inspection of building		(100)
Recreation & Parks costs for 80 new residents (on per capita basis)		(11,200)
	\$	<u>(11,300)</u>

Net long term effect of development on future finances:

\$ 24,197

Comments by Director of Finance:

There is a net financial benefit for a Multi-Family development at the site specified.


Clive Freundlich, Director of Finance

MAY 16, 2018

Other Implications:**Balmoral Avenue Traffic Volumes and Speed**

Concerns about traffic volume and safety were raised by the community at the open house and in written submissions.

Under the Official Community Plan, Balmoral Avenue and Port Augusta Street are designated as Minor Collectors. Minor Collector roads are designed to accommodate traffic in excess of 1,000 vehicles per day⁵ and connect neighbourhoods to arterial roads.

Attachment 2 includes a Traffic Impact Study prepared by McElhanney Consulting Services. As part of the McElhanney Traffic Study, vehicle speed monitoring and traffic counts were conducted to assess traffic safety. Speed data indicates 85th percentile vehicles travel at approximately 50km/hr, i.e. the posted speed. Typically, traffic calming and police enforcement are only recommended for roads where 85th percentile speeds are greater than 10km/h over posted speed limit.

Two intersections were analyzed as part of the Traffic Study: Balmoral – Pritchard and Comox – Port Augusta. Both are projected to operate at acceptable levels in the future up to 2039.

Future Downtown residential and commercial development will increase on-street parking, transit usage and pedestrian activity which in turn should result in traffic calming.

Transit Referral Response (included in Attachment 9)

The BC Transit response suggests seeking an amenity contribution for the provision of a bus shelter on the south side of Balmoral Avenue. The Town capital plan includes \$25,000 for the provision of bus shelters. The \$25,000 amenity contributions contained in the Phased Development Agreement are for public electrical vehicle charging stations within the Downtown area and capital improvements at Anderton Park, for which funding is not contained in the capital plan.

Accessibility Committee Referral Response (included in Attachment 9)

The Comox Valley Accessibility Committee recommends at least 10% “visitable” residential units. Ten percent of the proposed units will meet the Town’s Adaptable Housing standards, which provide a higher level of accessibility than “visitable” standards.

The proposed development includes several scooter parking spaces in the parkade. All elevators and hallways are wheelchair accessible and therefore usable by compatible scooters.

⁵ In accordance with Comox Transportation Study report by Boulevard Group in 2011.

RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

Three accessible parking stalls in conformance with BC Building Code specifications are proposed.

Engineering

Schedule 2 contains a preliminary engineering analysis. As the engineering analysis is preliminary the comments are subject to change.

MK/ RB

Schedules: 2
Attachments: 9

Cc: Richard Gunderson, Wensley Architecture Ltd.
301 - 1444 Alberni Street, Vancouver, BC V6G 2Z4

RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

SCHEDULE 1

OUTSTANDING ITEMS

Outstanding Items to be Resolved Prior to Adoption of proposed Bylaws 1877 and 1878 and discharge of restrictive covenants

A. Provision of the following Development Permit drawings and details:

1. Submission of Emterra Environmental confirmation that either the proposed garbage bin staging area for pick-up days is serviceable; or that parkade access clearance is sufficient to allow access by a small garbage truck.
2. Updated site plan, to include garbage staging area; two street trees within tree wells and concrete surfacing of the boulevard area along the property frontage, except within existing retained trees root zones, as recommended in Tree Inventory Assessment – 1700 Balmoral Ave Development report, sidewalk narrowed to 1.2 metres adjacent to retained trees critical root zones;
3. Updated landscaping plan, to include garbage staging area; clearly show all existing trees recommended for retention, per Tree Inventory Assessment – 1700 Balmoral Ave Development report; two street trees within tree wells and concrete surfacing of the boulevard area along the property frontage, except within existing retained trees root zones, as recommended in Tree Inventory Assessment – 1700 Balmoral Ave Development report, sidewalk narrowed to 1.2 metres adjacent to retained trees critical root zones;
4. Consideration for provision of outdoor seating within front yard, adjacent to the main building entrance and/ or ramps, where appropriate;
5. Updated east elevation drawing specifying ground storey frosted windows for the rooms adjacent to main entrance walkway;
6. Floor plans and elevation drawings to show standard 0.6 metres projection allowance for the roof overhang on east building side (between 4 and 5 storey);
7. Underground parkade bicycle and electrical scooter parking detail drawing, meeting Zoning Bylaw 1850 Class I requirements, i.e. minimum 5 Class I bicycle stalls within 6.0 metres of underground elevator lobby and staircase;
8. Underground parkade bicycle room detail drawing, meeting Zoning Bylaw 1850 Class II requirements, i.e. compartments for over 20 bicycles in a room.

MAY 16, 2018

B. Section 219 *Land Titles Act* restrictive covenants:

1. PDA strengthening covenant for the following:
 - i. Within 30 days of proposed Bylaws adoption, payment of \$ 18,692 as a contribution to the Town's Affordable Housing Reserve Fund;
 - ii. Within 30 days of proposed Bylaws adoption, payment of \$ 25,000 as a contribution for providing one or more of the following public amenities: public electrical vehicle charging stations within Downtown area; capital improvements at Anderton Park, such as playground enhancement and site furnishings, including shade structure;
 - iii. A 0.856 metre road dedication along Balmoral Avenue frontage of the Land;
 - iv. Provision of the following works and services along the Balmoral Avenue frontage of the subject property, in accordance with Town of Comox Subdivision and Development Servicing Bylaw, 1261:
 - a. Vertical face barrier curb and gutter;
 - b. 1.5 m wide brushed concrete sidewalk aligned with the existing sidewalk to the east, with section around protected Red Oak root zone narrowed down to 1.2 m in width;
 - c. A driveway drop with a minimum width of 9.0 m, as measured at the gutter line, with the concrete sidewalk in this location to have a minimum thickness of 150mm. Grading of this down slope driveway must ensure a minimum of 150mm of free-board from the paved level of Balmoral Avenue;
 - d. Concrete boulevard from sidewalk to the property line, outside of the protected Red Oak root zone;
 - e. 2 boulevard trees within 1.2 x 1.2 metre tree wells, equipped with irrigation and electrical service connections to each tree well for the purpose of decorative tree lighting, to the satisfaction of the Parks Superintendent.
 - v. Construction of at least 5 multi-family dwelling units in accordance with Comox Zoning Bylaw 1850, Section 5.20 Special Needs Housing Standards – Adaptable Housing;
 - vi. Construction of the multi-family building on the Land to a minimum BUILT GREEN Silver standard, BC Energy Code Step 2, or equivalent standard for multi-family construction, acceptable to the Town;
 - vii. Provision of 5 vehicle parking spaces with 220 Volt electrical connections within underground parking area;

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE****MAY 16, 2018**

- viii. construction of dwelling units within 35.0 metres of Balmoral Avenue have sound attenuation that meets Canada Mortgage and Housing Corporation Standards, in accordance with Town of Comox, Acoustical Standards for Residential Developments, a report prepared by Wakefield Acoustics, dated October 30, 2014 and having alternative means to window opening for ventilation;
- 2. Tree protection covenant with rent charge for the retention and protection of the trees identified for retention in Tree Inventory Assessment – 1700 Balmoral Ave Development report dated March 28, 2018 and 14 replacement trees, per approved Landscaping Plan.

MAY 16, 2018

DEVELOPMENT PERMIT CONDITIONS

The Development Permit is for the construction of a Multi-Family Residential development, in compliance with the revised drawings and landscape plans, per Schedule 1, Outstanding Items, and the following conditions:

- 1) At time of Building Permit Issuance, provision of a landscape security in the amount of \$81,400;
- 2) All landscaping shall be serviced with automatic watering system, including boulevard trees;
- 3) Issuance of any sign permits shall be in conformance with Town of Comox Sign Bylaw No. 1197;
- 4) All new services shall be placed underground, in accordance with approved Servicing Plan;
- 5) Screening of all above ground utility boxes and utility transformers must be provided in conformance with Comox Zoning Bylaw Section 8.9;
- 6) No fences shall be permitted within front yard;
- 7) All fencing or other wooden landscape components shall be treated with paint, stain, or other preservative;
- 8) Fencing must be robust and minimum commercial grade. Wood fencing must have minimum 15 x 15 cm posts and 5 x 10 cm horizontal supports at the top and bottom of fence panels.
- 9) Parking must be in compliance with Comox Zoning Bylaw 1850 and Visitor, Small Car and Accessible parking spaces shall be clearly marked in accordance with Section 6.12(10);
- 10) If a gate to underground parkade is proposed, visitor parking must remain accessible to the public;
- 11) All exterior building, exterior corridor, and site lighting fixtures (including those in parking areas but excluding dwelling unit entrance, balcony and patio lighting) shall:
 - a. produce illumination levels in accordance with common engineering practices and standards;
 - b. be of a metal halide type or provide a similar light spectrum;
 - c. minimize illumination of adjacent property;
 - d. consist of full cut off/flat lens pole lighting or fully shielded wall lighting;

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

- e. be arranged so rays of light are directed upon the parking, walking, or loading areas and not upon adjacent land or streets; and
 - f. excluding light fixtures that are incorporated into canopies, lighting of off-street parking and loading areas shall:
 - i. be so arranged that no part of any fixture is more than 4.5 m above finished ground level, and
 - ii. not overhang maneuvering aisles or loading spaces.
- 12) Where residential units have ground level patios, an exterior faucet shall be provided for each unit to facilitate optional container gardening.

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

**SCHEDULE 2
ENGINEERING REVIEW**

TO: Regina Bozerocka, Planner I	FILE: RZ17-9, DP17-7
FROM: Shelley Ashfield, Municipal Engineer	DATE: Dec.27, 2017
SUBJECT: 1700 Balmoral Avenue Lot A, Section 56, Comox District, Plan VIP81758	

In response to your referral, dated December 1, 2017 reference file # RZ 17-9, SP 17-7, public works has reviewed the conceptual layout as contained on the Wensley Architecture Ltd drawing set titled, "1700 Balmoral Avenue".

General

- The applicant will require the services of a Professional Engineer registered within the Province of British Columbia to submit designs for review and approval by the Town of Comox and supervise all aspects of construction. The Engineer must provide cost estimates and submit certified as-built drawings and lot service cards upon project completion including the establishment of minimum habitable floor elevations for the proposed buildings; and
- Design and construction shall be in accordance with the Town's Subdivision & Development Servicing Bylaw, and Subdivision & Development Specifications, unless otherwise noted. A performance bond for work within the Municipal right-of-way must be posted prior to commencing work within an existing road or statutory right-of-way. The amount of this bond shall be the equivalent of 125% of the cost as determined by the engineer's estimate. Works within the municipal right-of-way, or those to be transferred to the Town of Comox, shall be covered by a one-year maintenance period that shall include a maintenance bond equivalent to 10% of the total construction cost.

Water System

- Koers and Associates must be retained to provide an assessment of this proposal on the Town of Comox water system. All cost associated with this assessment, shall be borne by the applicant. Any required upgrades to the Town of Comox water system shall form a condition of this development;
- The proposed development will require a water meter in accordance with the Town of Comox Subdivision and Servicing Specifications. This meter shall be installed into a vault which itself shall be located within the road right-of-way or a statutory right-of-way established for this purpose; and
- The applicants engineer shall consult with the Building Department to determine sizing and location of the required water connection. Extension of this connection to the property line and removal of the existing 19mm connection shall be completed by the Public Works Department at a cost to the applicant based on municipal bylaw rates.

MAY 16, 2018

Sanitary Sewage System

- The existing 100mm diameter sanitary connection is unsuitable for the proposal at hand and shall be capped at the point of connection to the sanitary main. The applicants Engineer shall determine the size and location for the revised sanitary connection. All costs associated with this revised connection shall be borne by the applicant.

Storm Drainage System

- This property currently directs site drainage to the 200mm concrete storm main, which begins at the southeast corner of this property and extends east along Balmoral Avenue. Runoff from the proposal shall continue to be directed to this system and connection to the adjacent Golf Creek system is not acceptable;
- The applicant's engineer shall establish minimum habitable floor elevations and determine the depth and size of the necessary storm connection. The existing 100mm diameter storm connection is not suitable for this proposal. Given the relatively shallow depth of cover on the existing storm system, we recommend the applicant's engineer complete all necessary surveys early in the development process. All costs associated with the provision of this connection, and any upgrades to the downstream system, shall be borne by the applicant;
- All runoff from parking areas shall be directed to an oil/grit separator. A standard maintenance covenant should be applied to this property; and

Roads

- The length of Balmoral Avenue in question is designated a "Minor Collector" within the Comox Transportation Study. This requires a total right-of-way width of 20.0m, barrier curb, sidewalk and parking on one side. Additional road dedication of 0.856 metres is required. Pavement width is intended to be 11.0m for minor collectors.
- All retaining walls and structures must be wholly contained within private property;
- A single access/egress point for this site will be permitted. A driveway drop with a minimum width of 9.0m, as measured at the gutter line, is required, with the concrete sidewalk in this location to have a minimum thickness of 150mm. Grading of this down slope driveway must ensure a minimum of 150mm of free-board from the paved level of Balmoral Avenue itself; and
- The project engineer shall examine all landscaping, site and frontage improvements to ensure that no visual conflict exists within the "site triangle" on either side of this entrance.

BC Hydro/Telus/Cable/Gas

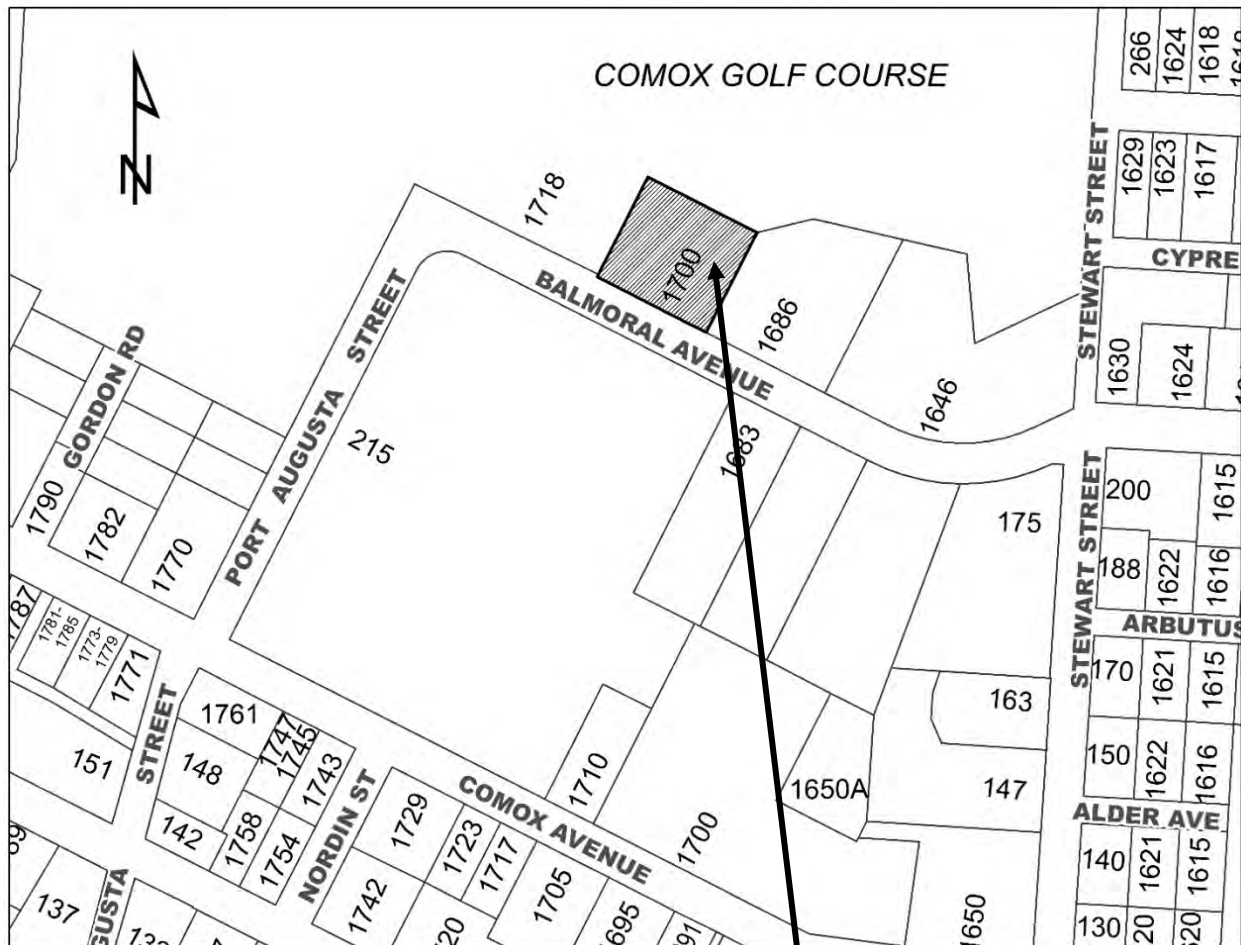
- Advise utilities for their servicing comments; and
- As-built drawings must include the location of non-municipal utilities.

RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

ATTACHMENT 1

APPLICATION SUMMARY



Subject Property:
1700 Balmoral Avenue
PID: 026-810-361
LOT A SECTION 56 COMOX DISTRICT PLAN VIP81758

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

Proposal:	The proposal is for a rezoning to a new comprehensive development zone and issuance of a Development Permit to facilitate a five-storey, 45-unit apartment building with 50 vehicle parking spaces, Class I & Class II bicycle and electrical scooter parking underground. The existing single-family house on the subject property is vacant and is proposed to be demolished. Two restrictive covenants FB122070 and FB122076 relating to a previous proposed apartment building, which did not proceed, are proposed to be discharged.	
Owner: Applicant:	Lindary Holdings Ltd. Inc. No. BC0916510 Richard Gunderson, Wensley Architecture Ltd.	
Legal Description:	Lot A Section 56 Comox District Plan VIP81758	
Civic Address:	1700 Balmoral Avenue	
Official Community Plan		
Land Use Designation:	Residential: Low Rise Apartments, Townhouses & Ground Oriented Infill	
Development Permit Areas:	DPA # 3: General Multi-Family	
Zoning:	EXISTING	PROPOSED
	Comprehensive Development CD7	Comprehensive Development CD7.1
Permitted uses:	Apartment dwellings; Accessory structures and uses; Home occupations;	Apartment dwellings; Accessory structures and uses, excluding buildings and outside storage; Home occupations
Conditions of use:	(1) Excluding accessory buildings: (a) The gross floor area of the first storey shall not exceed 1094 square metres; (b) The gross floor area of the second storey shall not exceed 1088 square metres; (c) The gross floor area of the third storey shall not exceed 1003 square metres; (d) The gross floor area of the fourth storey shall not exceed 784 square metres; and (e) The gross floor area of the fourth storey shall not exceed 80% percent of the third storey gross floor area. (2) All parking spaces shall be located underground and below grade.	(1) The gross floor area of the first storey shall not exceed 1400 square metres; (2) The gross floor area of the fifth storey shall not exceed 900 square metres; (3) All parking spaces and areas used for the temporary storage of garbage or recycling produced on the parcel shall be located underground and below grade.

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

Density:	113 UPHa	170 UPHa
Parcel area:	2,700 m ²	2,650 m ²
Parcel coverage:	55%	65 %
Height and stories:	18.00 m Four storeys	Maximum 19.00 m and 5 storeys
Required setbacks:		
	Front: 6.0 m	7.0 m for a maximum 16.0 metres of continuous building frontage as measured from west lot line; 17.0 m for the remainder of the building frontage.
	Rear: 6.0 m	6.0 m
	Side (interior): 3.5 m	3.5 m
Accessory Buildings and outside storage:	8.5 m in height; 135 m ² in gross floor area; 0.5 % parcel coverage (existing historical building, per covenant FB122070)	Accessory buildings and outside storage not permitted
Off-street parking	Located within Downtown Vitalization Program Area: 1 vehicle parking per dwelling unit, (0.1 per dwelling for visitors); 0.25 Class I bicycle or electric scooter stalls per dwelling unit; 0.5 Class II bicycle stalls per unit;	Located within Downtown Vitalization Program Area: 1 vehicle parking per dwelling unit, (0.1 per dwelling for visitors); 0.25 Class I bicycle stalls per dwelling unit; 0.5 Class II bicycle stalls per unit;
Surrounding Land Uses:	Multi-Family Residential developments to the east and south-east; Commercial development to the south; Comox Golf Course to the west and north.	

A1

A2

A3

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

ATTACHMENT 2

APPLICANT'S SUBMISSION

May 8, 2018
1700 Balmoral Avenue, Comox

Development & Rezoning Application Rationale

1700 Balmoral Avenue, Comox, B.C.

Regina Bozerocka
Planning Department
Town of Comox
1809 Beaufort Avenue, Comox, BC V9M 1R9

Design Rationale

The proposal for 1700 Balmoral is to rezone the existing Comprehensive Development (CD 7) Zone (#1523 Feb 21/2007), to a new Comprehensive Development (CD 7.1) zone more suited for the increasing density and evolving building framework for the Town of Comox in 2017. The proposed zoning will meet the goals and objectives for new multi-family residential buildings in Downtown Comox.

1700 Balmoral Ave. was originally submitted in 2005 for rezoning and accepted under CD 7 Zoning #1523 Feb 21/2007 and included a 4 storey, 31 unit, multifamily residential building, with an average building height of 17.95m..

The new proposal for 1700 Balmoral is proposed as a 5 storey, 45 unit, multifamily residential building, with an max building height of 19.00m and a *Parcel Coverage of a maximum 60%*.

The Town of Comox will experience moderate population growth over the next 20 years. In addition, a moderate but steady population increase from other provinces and other parts of B.C. will increase the demand for housing, especially an increased demand for more compact and more affordable housing and more multi-family housing in various forms.

The proposal will respond to the Town of Comox's Vision(s) outlined in the Consolidated Town of Comox Official Community Plan Bylaw 1685 – Printed 21-May-14 (OCP) by:

- Reinforcing the small town character of Comox to promote opportunities for revitalization and diversification.
- Residential character that will enhance the character of Comox as a high quality residential community.
- Accommodating changing housing needs resulting from an aging population and modest population growth and ensure the Town remains attractive to all age groups.
- Accommodating future housing needs primarily through redevelopment of large sites within walking distance of services, amenities and public transit.
- Ensuring growth is planned for and well managed to maintain and enhance the quality of life in Comox Ensure Downtown Comox while remaining attractive and enhancing its economic viability
- Developing in Downtown Comox to accommodate a broad range of multi-family housing, institutional and open space uses in a pedestrian friendly form.
- Encourage vertical expansion of Downtown Comox in order to create a more diverse, compact and sustainable community.

The Official Community Plans outlines the General Multi-family Land-Use to allow low-rise apartments and townhouses, mainly along arterial or collector roads, predominately through redevelopment.



301 - 1444 Alberni Street, Vancouver, BC V6G 2Z4
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▼ WENSLEY ARCHITECTURE LTD

May 8, 2018
1700 Balmoral Avenue, Comox

Building character will convey:

- Permanence, provide visual interest at the pedestrian level, and avoid monotonous or overbearing character.
- Large, robust, unique architectural details to provide key visual focal points offsets otherwise uniform exterior treatments.
- Rich detail as exemplified in the use of wood-like vinyl planks, cement board planks, and heavy timber combined with robust metallic trim features.

Additional amenities will be secured by means of a Comox Phased Development Agreement for 1700 Balmoral Avenue to establish a Phased Development Agreement between the developer and the Town of Comox for the provision of amenities for the development at 1700 Balmoral Avenue.

Crime Prevention Through Environmental Design (CPTED)

Design will encourage crime prevention by using passive security design elements including:

- Providing adequate pedestrian level lighting for sidewalks, pathways, and parking areas to promote safe evening use;
- Buildings should be designed and sited to facilitate a high degree of visual surveillance of adjacent streets and onsite, outdoor common areas from unit windows;
- Exterior unit entrances/exits should be designed and sited to facilitate a high degree of visual surveillance from unit windows, adjacent streets and internal roads; and
- The location of habitable rooms with windows that face streets, sidewalks, and associated open space to promote informal surveillance through a high level of visual oversight.
- Provide visual privacy between units and also between private amenity spaces such as balconies and patios.

Sustainability

Per the Comox OCP, long term sustainability will provide for high quality compact housing forms with good access to transit and non-vehicular transportation forms and to encourage reduced energy consumption and green house gas emissions (GHG's).

To accommodate the need to advance the reduction in GHG's and the OCP Vision for sustainability the project will provide rough-ins for 5 charging stations at pre-determined locations. In addition the proposal will commit to meeting BUILT GREEN Silver equivalent or better.

Affordable and Adaptable Housing

To meet the Affordable Housing Contribution to be provided to the Town, will be by cash-in-lieu per the attached Affordable Housing Calculator which will serve as a resource to support the application process.

The proposal will provide 5 Adaptable Housing Units or 10% of total residential units, to allow the Town of Comox to better meet the needs of current and future Comox residents.

Sound Attenuation

The Town has sought sound mitigation measures to offset the impact of traffic noise on residential properties within 75 m of the Town's busiest streets and anywhere within the Comox Downtown Revitalization Area. Therefore, where outdoor noise levels do not exceed *Leq(24) 55 dBA*, no special noise control measures are required. The Acoustical Standards Report provided for by the Town of Comox indicates that 1700 Balmoral Ave has a *Leq(24)* and Adjustments (dBA) total of **66**. The Client has obtained BKL Sound Consultants for future analysis.

May 8, 2018
1700 Balmoral Avenue, Comox

Mitigation measures for residential facades when Traffic Leq(24) >65 ≤ 70 dBA

- Bedrooms Windows ≥ STC 35.
- Living, dining and recreation rooms Windows STC ≥33.
- Kitchen, bathrooms, hallways, utility rooms Windows ≥ STC 30.

Pre-Application Community Consultation

For the Pre-Application Consultation – Stage 1 & Stage 2 was conducted and complied by McElhanney Consultants. Public input was conducted by Stage 1 mail-out consultation, received by email and by Stage 2 public open house consultation, received in person at the open house.

Pre-application Consultation	Stage 1	Stage 2
Date of invitation mailing or hand delivery	April 20, 2017	May 10 & 11, 2017
Date of newspaper advertisement	April 20, 2017	May 11, 2017
Cut-off date for comment submission	May 11, 2017	June 12, 2017
Open house date and time span		May 29, 2017 4pm to 7pm
Number of invitations mailed or hand delivered	115	115
Number of written submissions received	28	8
Number of members of the public attending the Open House		14

A total of 36 written responses were received during the public consultation process, of which three were in favour of the project as designed, and had no concerns. We have reviewed the balance of the responses, and most of the comments fall into two main categories:

- Building height and density. Twenty-one responses were opposed to the 5-storey height.
- Traffic and pedestrian safety. Twenty responses had concerns about this.

Other comments provided were:

- Amenity space: Five responses were concerned there was no dedicated amenity space;
- Building design: Three responses were not in favour of the proposed design;
- Retention of existing house: Three responses raised concerns regarding the proposed demolition of the existing house;
- Tree retention: three responses raised concerns regarding the impact of the project on existing trees on the adjacent property (1686 Balmoral).

1. Building Height and Density

The concerns raised were generally:

- The building is too high, and will not fit in with the 'small town' atmosphere or neighborhood.
- There are more units in the current design than the building that was previously approved.

Response: In regard to building height, the project is proposing 5 storeys, 19.00m Max in height, while the previous proposal was for 4 storeys, 17.95m in height. Responses focused around exceeding 4 storeys in height and that the proposal will not respect the local context.



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May 8, 2018
1700 Balmoral Avenue, Comox

The current design focuses on a more modern design and thus the tall roof dormers were removed in-lieu of a more lowered roof profile, which added on an additional storey. Adjacent similar multi-family developments along Balmoral Ave. are located at 1686, 1668, and 1683 Balmoral Ave. and are 3, 4, and 4 storeys respectively. We also note that the 5th floor is setback from the building face to reduce the building mass from a pedestrian perspective. The addition of the 5 storey proposal at 1700 Balmoral Avenue will respect the local context, and is consistent with the vision and Land Use Designation for Downtown Comox in the OCP.

In regard to the number of units and proposed density, responses focused around the increase in the number of units from the previous proposal accepted under CD 7 Zoning #1523 Feb 21/2007 of 31 units in 2007 to 45 units under the current proposal. Responses highlighted that the increase in units will affect the liveability and quality of life of the neighbourhood.. The project proposes an increase in density to meet the accepted project height under the current CD-7 zone, which results in a 5 storey, 45-unit multi-family project. The increase unit count is appropriate in this location given that the project is in close proximity to downtown, and local shopping and amenities.

We believe that the concerns of the community, and the abutting neighbours have been taken into consideration in the project design, and approval process, and that the current proposal is consistent with the Official Community Plan vision as well as being consistent with the Multi-Family Land use designation.

2. Traffic and Pedestrian Safety

The concerns raised were generally:

- Is there sufficient parking for visitors, and for owners? Should some bike parking be changed to vehicle or scooter parking?
- Increase in traffic in the area, and loading from Balmoral, will lead to congestion of Balmoral
- Increase in traffic will create a less safe environment for pedestrians crossing the street.

Response: The concerns were focused around traffic along Balmoral Avenue with respect to volume, speed, and additional number of vehicles that the project will propose, as well as pedestrian safety. To address these concerns, McElhanney Consulting prepared a Traffic Impact Study (November 29th, 2017). The study used the terms of reference approved by City of Comox. The results of the study show that:

- Traffic growth from the new development is expected to be modest, (17 new trips at AM peak hour, and 21 new trips during the PM peak hour.)
- All study intersections are expected to operate effectively on opening day, and to future horizons on 2024 and 2039.
- A high-level assessment of Balmoral Avenue indicated that access spacing, and speeding, were not found to be issues.
- In addition, the report includes a section that comments on safety. Some traffic calming measures are noted that can be implemented in the event that speeding along Balmoral is determined to be an issue in the future.
- Overall, the report states that the lands can be safely developed as a residential project as proposed, in accordance with the recommendations of the report.

In respect to parking, we note that the resident and visitor parking, as well as bicycle parking, are in accordance with the City By-Laws.

3. Amenity Space

Five of the responses raised concerns that the project does not provide a dedicated amenity space. When considering the potential of a dedicated amenity space, we noted that in many instances these

May 8, 2018
1700 Balmoral Avenue, Comox

spaces are not well utilized for the relative cost to the project. The priority in this case is to minimize costs to the project that would potentially reduce the affordability of units. Part of the consideration was also the proximity of the new building to services and amenities within walking distance.

4. Building Design

Five of the responses had favourable comments about the building architecture, including quality of exterior finishes and good suite layout. There were three comments that were opposed to the design, citing it as being too 'box-like'. The residential character of the proposed design is contemporary which adds to the diversity of the residential options in Comox, and the quality of the design and materials will enhance the character of Comox as a high quality residential community.

5. Retention of Existing House

Three comments raised concerns about the proposed demolition of the existing house on the property. After consideration and study of the existing building, the proponent concluded that the costs to remove existing hazardous materials from the house, and to re-construct the building, were prohibitive, and would negatively impact the costs and affordability of the new units.

6. Existing Trees

Three comments raised concerns about the potential impact of the new development on existing trees along the fence-line at 1686 Balmoral. The arborist does refer to these trees in their report, and they are clearly noted as retained trees. The report includes recommendations for tree protection zones, and requirements for a certified arborist to be on site during excavation in the vicinity of the TPZ.

Public Infrastructure

Public infrastructure report to be provided by McElhanney Consulting Services Ltd.

The BC Hydro U07 approval was requested and an email conformation to the Client is being provided. Formal approval will be provided at a later date.

A transformer will be required on site by dedicated pad mount transformer fronting along Balmoral Ave. The transformer will be screened by landscape elements and by artistic wrapping of the transformer, done at the developer's cost. The PMT will be located at sidewalk level with the retaining wall around it.

We trust the explanations, responses, and attached documentation within the enclosed submission provide a complete and whole Rezoning and Development Permit submission. We look forward to hearing your responses to the proposed project and moving forward with support from the planning team.

Regards,



Barry Weih
Architect AIBC, AAA, SAA, LEED®AP, B.Arch., B.A. - Principal
WENSLEY ARCHITECTURE LTD.

COMOX VALLEY, B.C.



ISSUED FOR DEVELOPMENT PERMIT REVISION
MARCH 27, 2018

- A0.01 SURVEY PLAN
- A1.01 SITE PLAN
- A1.02 SITE DETAILS
- A2.01 PARKING PLAN
- A2.02 MAIN FLOOR PLAN
- A2.03 2,3 & 4 FLOOR PLAN
- A2.04 FIFTH FLOOR PLAN
- A2.05 ROOF PLAN
- A2.06 ADAPTABLE UNIT LAYOUT
- A3.01 SITE SECTIONS
- A4.01 NORTH AND SOUTH ELEVATIONS
- A4.01A NORTH AND SOUTH COLOURED ELEV.
- A4.02 EAST AND WEST ELEVATIONS
- A4.02A EAST AND WEST COLOURED ELEV.

2008	44.4	44.4

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DP SUBMISSION MARCH 27, 2018

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Scale

North

3 STOREY MULTIFAMILY BUILDING

2 STOREY

1 STOREY

APPROXIMATE LOCATION OF PROPOSED NEW CLUBHOUSE

EXISTING 3 STOREY BUILDING

EXISTING GARAGE

EXISTING GARAGE

EXISTING GRAVEL PAD

1700 BALMORAL AVENUE
LOTS 1, 2 & 3
PLAN 3556

REF. PLAN 50788
STRATA PLAN VIS2020

REVISIONS

PROJECT NAME

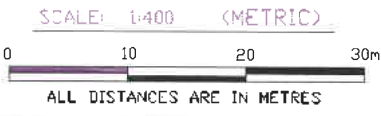
PROJECT ADDRESS

COUNCIL, BC

WA
WHEATLEY ARCHITECTURE LTD

CONTRACT NO.
DATE
SCALE
DATE

TOPOGRAPHIC PLAN OF PART OF
LOTS 1, 2 AND 3, SECTION
56, COMOX DISTRICT, PLAN 3556.



McElhanney
McElhanney Consulting Services Ltd.

455 Smit Street
Courtenay BC
Canada V9M 5H4
Tel: 250 338 5438



1 ENTRY CANOPY
3/16" = 1'-0"

2 ENTRY CANOPY SECTION

3 TIERED LANDSCAPE SECTION
1/8" = 1'-0"

4 PARKADE ENTRY RAMP
3/16" = 1'-0"

5 PRIVACY SCREEN SECTION

6 PRIVACY SCREEN

7 ENTRY RAMP CANOPY-SECTION
3/16" = 1'-0"

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A1.02



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02	CERTIFIED FOR IP-FORM CANCELLATION	26/07/18
02	ISSUED FOR COORDINATION / INTERNAL	26/07/18
01	RETURNED FROM MICROFILM / IP	26/07/18
AC	MARSHALL	SIGN

PROJECT NAME

1700 BALMORAL
AVENUE

PF= SEQADDRESS

COMOX, BC



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00-443702

PARKING PLAN

PROJECT NO.	000	DRAWING NO.	00
DATE	10/10/00	REVISION	00

PARKING FLOOR PLAN



88	ISSUED FOR IP ADDRESS	10/27/98
89	ISSUED FOR OP RAS ADDRESS	2/1/99
90	ISSUED FOR DEVELOPER IP	2/2/99
91	ISSUED FOR RAS/OP	10/28/97
92	RENEW	none

PROJECT 4148-05



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MAIN FLOOR PLAN

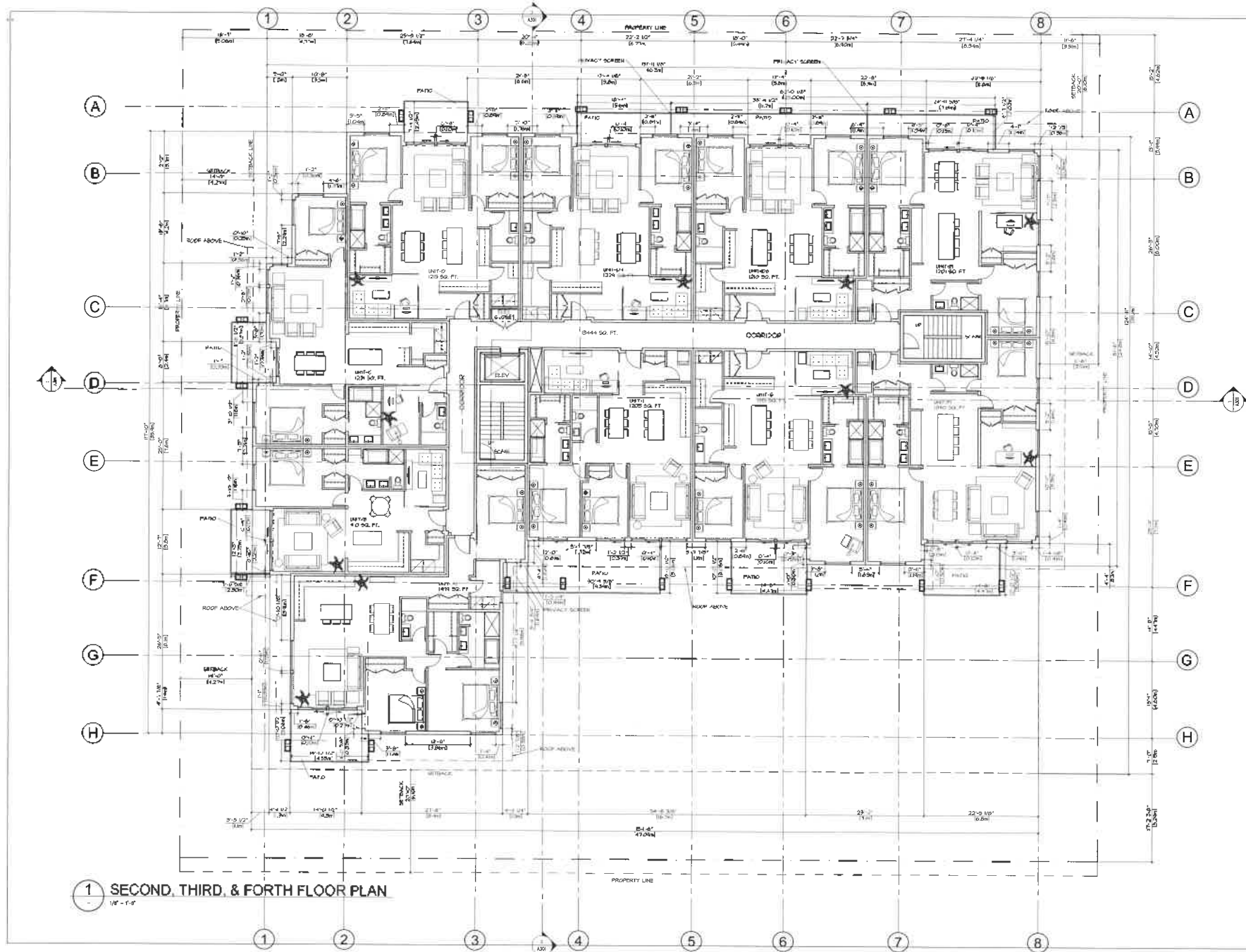
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1 MAIN FLOOR PLAN

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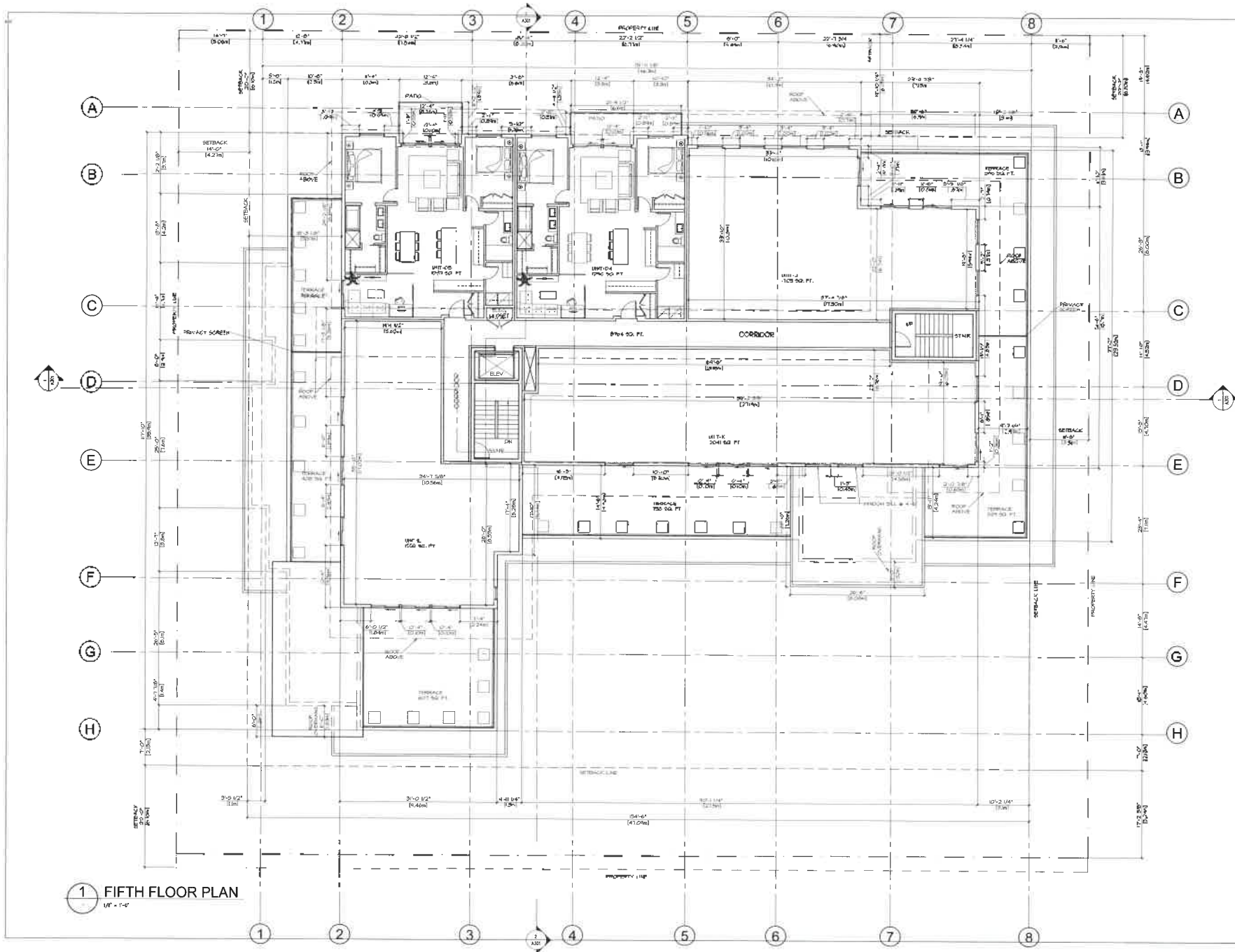
DATE: SEPT. 29, 2017 PAGE: 2 OF 2



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DP SUBMISSION MARCH 27, 2018

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OWNER/CLIENT

04	ISSUED FOR PERMIT	03/27/18
03	ISSUED FOR PERMIT	03/23/18
02	ISSUED FOR PERMIT	03/16/18
01	ISSUED FOR PERMIT	03/16/18

PROJECT NAME

1700 BALMORAL AVENUE

PROJECT ADDRESS

CCMOX, BC

WA
WENDENLEY ARCHITECTURE LTD

CONSULTANTS

1 FIFTH FLOOR PLAN

PROJECT NO.	018	DATE	03/27/18
YEAR	2018	PROJECT NO.	018
DATE	03/27/18	PROJECT NO.	018

A2.04

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OP SUBMISSION MARCH 27, 2018

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SCALE

PROJECT NAME

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1700 BALMORAL AVENUE

COMOX, BC

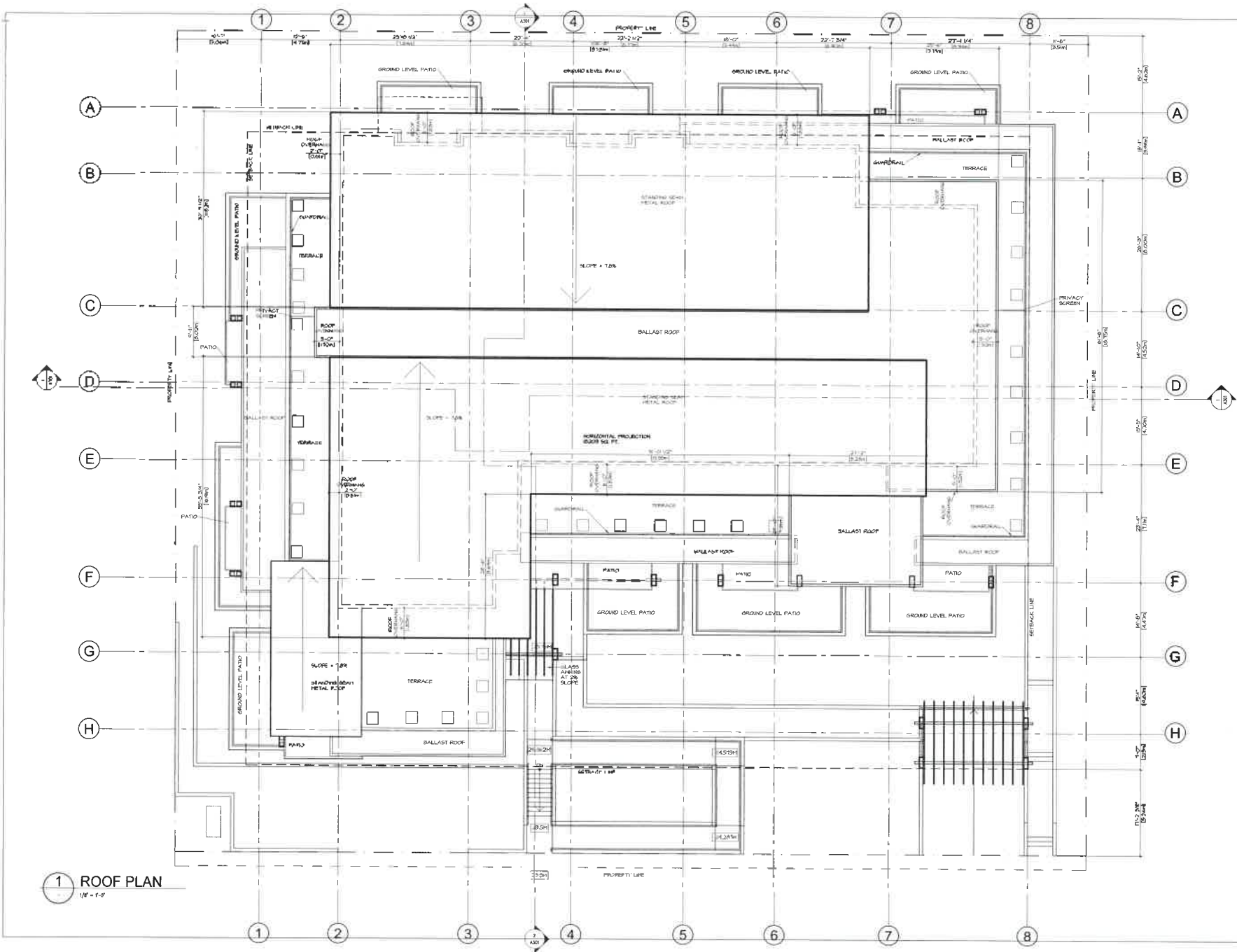
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CONSULTANTS
ARCHITECTURE
MECHANICAL
ELECTRICAL
PLUMBING
STRUCTURAL
LANDSCAPE
INTERIOR
EXTERIOR

ROOF PLAN

PROJECT NO. 1700 BALMORAL AVENUE
DATE: 03/27/18
DRAWN BY: [Name]
CHECKED BY: [Name]
APPROVED BY: [Name]

A2.05



1 ROOF PLAN
1/8" = 1'-0"



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06	ISSUED FOR SEXING NEWBORN POINT	26/02/18
07	ISSUED FOR SEXING / OP	26/08/17
08	OP FEMALE	14/04

SECRET

PROJECT NUMBER:

COMOX, BC



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ADAPTABLE UNIT
LAYOUT

PROJECT NO:	84-11	SECTION NO:	85
SCALE:	1" = 10' H & V	REVISIONS:	1-1
DATE:	10/1/84	DESIGNED BY:	A2.06

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30/1

CONSENT

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03	ISSUED FOR DEVELOPMENT PERMIT	11/05/19
04	ISSUED FOR PERMIT / WP	05/01/20
05	REVISION	05/01/20

1700 BALMORAL AVENUE

PROJECT ADDRESS:

COMEX, BC



CONSULTANTS
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 MECHANICAL ENGINEER: [blank]
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 HISTORIC PRESERVATION: [blank]
 ENVIRONMENTAL SCIENTIST: [blank]
 GEOTECHNICAL ENGINEER: [blank]
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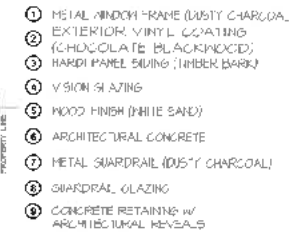
SITE SECTIONS

PROJECT NO.	1700	DATE	03/17/19
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SCALE	1/8" = 1'-0"	DATE	03/17/19

A3.01

1 EAST WEST CROSS-SECTION
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2 NORTH SOUTH CROSS-SECTION
 1/8" = 1'-0"



CONSENT

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1700 BALMORAL
AVENUE

DO NOT ADD

CONTROL BC



CONCRETE:	
2.5% CRACKING	NO CRACKING
4.0% CRACKING	NO CRACKING
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98.0% CRACKING	NO CRACKING
100.0% CRACKING	NO CRACKING

NORTH AND SOUTH ELEVATIONS

PROJECT NO	445	DATE	26
SCALE	1/4" = 1'-0"	PROJECT	50
DATE	SEP 28, 2011	PROJECT NO	A4.01

A3

SEAL



PROJECT NAME:

PROJECT NUMBER:

CCNDX.BC

THE LANCET/September 24
1980/Volume 116/Number 2977
P 101-102/103
104-105/106-107-108

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NORTH AND SOUTH
COLOURED ELEV.

PROBABILITY	DATE	DATE	TIME
NAME	OFFICE	NAME	TIME
NAME	DATE	NAME	TIME

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SCALE

CONTRACT

04	OWNER AND DESIGNER	03/27/18
05	OWNER AND DESIGNER	03/27/18
06	DESIGNER FOR ARCHITECTURAL	03/27/18
07	DESIGNER FOR INTERIOR / CP	03/27/18
08	DESIGNER	03/27/18

PROJECT NAME

1700 BALMORAL AVENUE

PROJECT ADDRESS

CONTRACT NO.

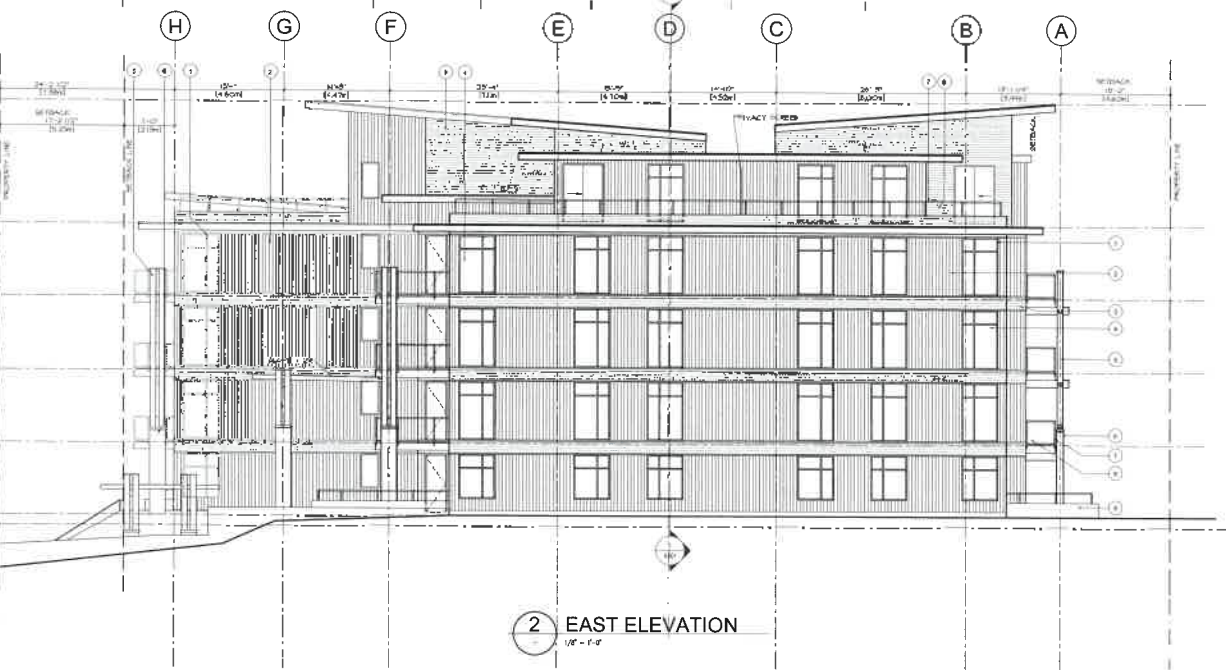
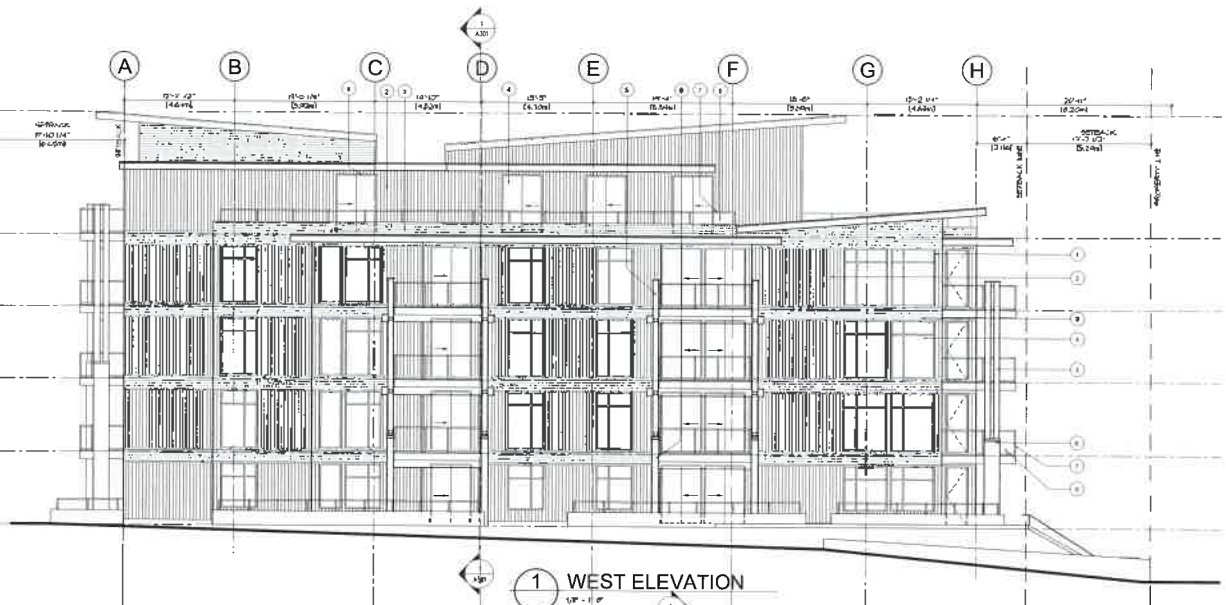
WA WINSLEY ARCHITECTURE LTD

CONTRACT NO. 1700 BALMORAL AVENUE
1700 BALMORAL AVENUE
VANCOUVER, BC
V6Z 1Y1
TEL: 604.681.1111
WWW.WA-ARCHITECTURE.COM

EAST AND WEST ELEVATIONS

PROJECT NO.	DATE	DESIGNER	SCALE
1700 BALMORAL AVENUE	03/27/18	WA	A4.02

- 1 METAL WINDOW FRAME (DUSTY CHARCOAL)
- 2 EXTERIOR VINYL COATING (CHOCOLATE BLACKWOOD)
- 3 HARDI PANEL SIDING (TIMBER BARK)
- 4 VISION GLAZING
- 5 WOOD FINISH (WHITE SAND)
- 6 ARCHITECTURAL CONCRETE
- 7 METAL GUARDRAIL (DUSTY CHARCOAL)
- 8 GUARDRAIL SLAZING
- 9 CONCRETE REPAIRING W/ ARCHITECTURAL REPAIRS





PROJECT ADDRESS:

COMDEX, BC

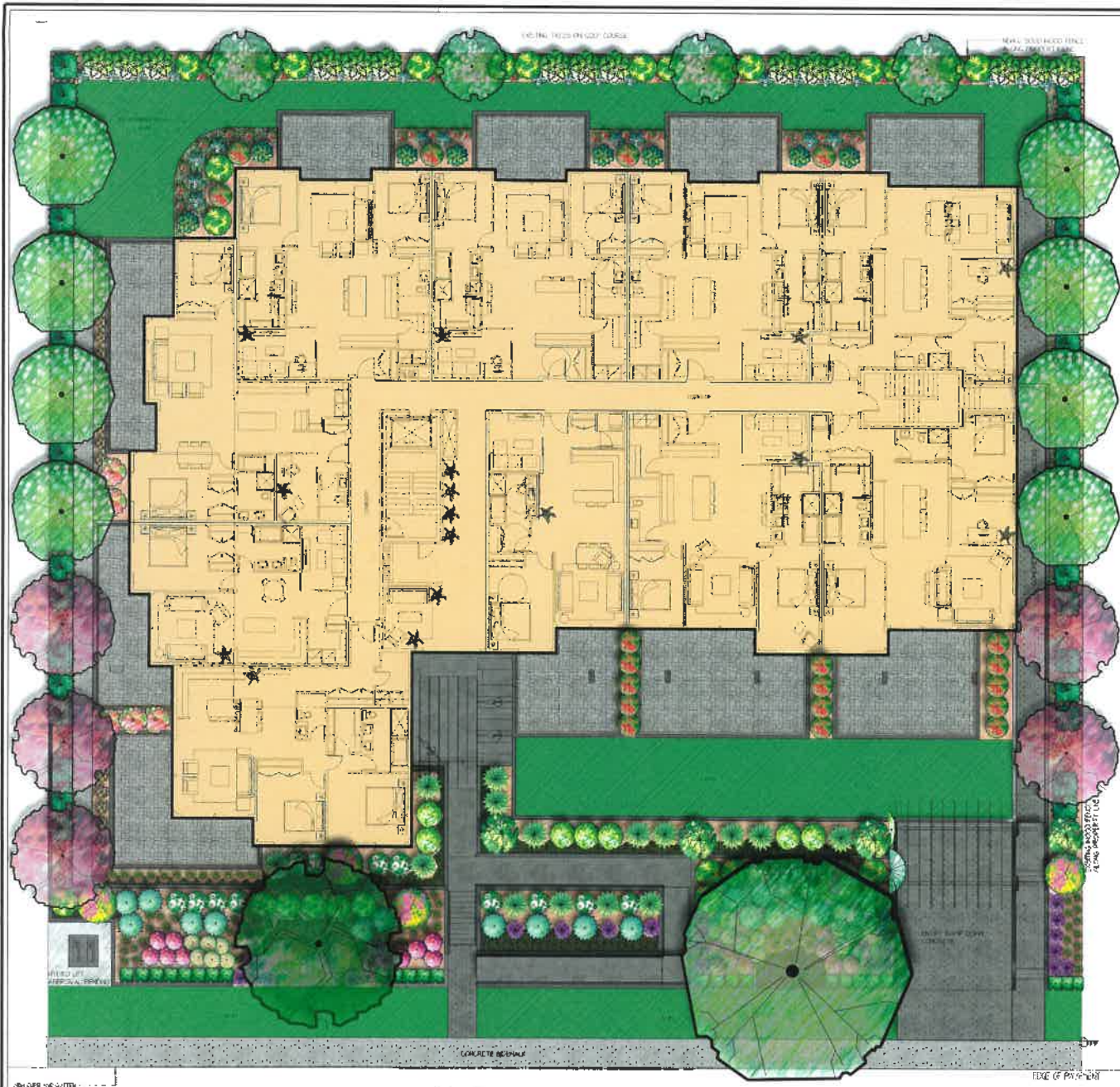


COMPARISONS	
3-Week Trial	McQuinn et al.
6-Week Trial	Burke et al. (1987)
12-Week Trial	Lundquist et al.
18-Week Trial	Mackie et al.
24-Week Trial	Mackie et al.

EAST AND WEST
COLOURED ELEV.

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PRISATID	1/s - 1/s - 1/s	PRISATID	1/s
PRISATID	1/s - 1/s - 1/s	PRISATID	1/s

A4.02A



MARCH 27th, 2018



BC LANDSCAPE STANDARDS

All construction to meet the requirements as set out in the BC Landscape Standards, 200 edition, prepared by the BC Society of Landscape Architects and the BC Society of Horticulture Association jointly. Copies of the BC Landscape Standards are available through the BCMA office at 1-800-574-7772.

Contractor to consult with designer for plant selections and quantities required due to site conditions.

Contractor is responsible for obtaining written confirmation of plant selections prior to commencing digging.

Contractor is responsible for providing one year of maintenance and one-year warranty on all materials and workmanship from acceptance of landscape.

Refer to landscape specifications supplied with this plan. If you did not receive the specifications, please contact the designer.

TOP SOIL REQUIREMENTS:
 Minimum depth for shrub beds 450mm (18")
 Minimum depth for groundcover 300mm (12")
 Minimum depth for lawn areas 300mm (12")
 1/4 inch of topsoil on these drawings.
 Minimum depth for masonry 150mm (6")

LANDSCAPE AREA
 PLANT BED AREA 6256 m² 67055 sq ft
 LAWN AREA 12112 m² 130495 sq ft
 TOTAL LANDSCAPE AREA 19372 m² 209544 sq ft

PROJECT:
 RIVERSIDE RESIDENTIAL DEVELOPMENT
 1700 BALMORAL AVENUE
 KERN, BC

CLIENT:
 CARRISON CONTRACTING LTD.
 P.O. BOX 5180
 COQUITLAM, BC
 V4M 1T8

ARCHITECT:
 HENLEY ARCHITECTURE LTD.
 100-1000 32ND
 Delta, BC V4M 1T8

LANDSCAPE DESIGNER:
 PHYSLIC WOODS
 LANDSCAPE DESIGN
 4737 Garden Rd.
 Campbell River, BC V9M 0T3
 phone: 250-286-0027
 cell phone: 250-257-0610
 design@physicwoods.ca
 Carriem Peterson (L.L.D., H.I.)
 Certified Landscape Designer
 Horticulture Technician
 DESIGN BY: CH 1 & B
 Member of the
 BCMA / QUAA

SCALE: 1" = 100'

DATED: May 17, 2017 May 17, 2017
 Issued for Client review May 17, 2017
 Issued for Development Permit September 26, 2017
 Issued for Development Permit February 5, 2018
 Issued for Development Permit April 4, 2018

DRAWING: LANDSCAPE MASTER PLAN
DRAWING #: U OF 4



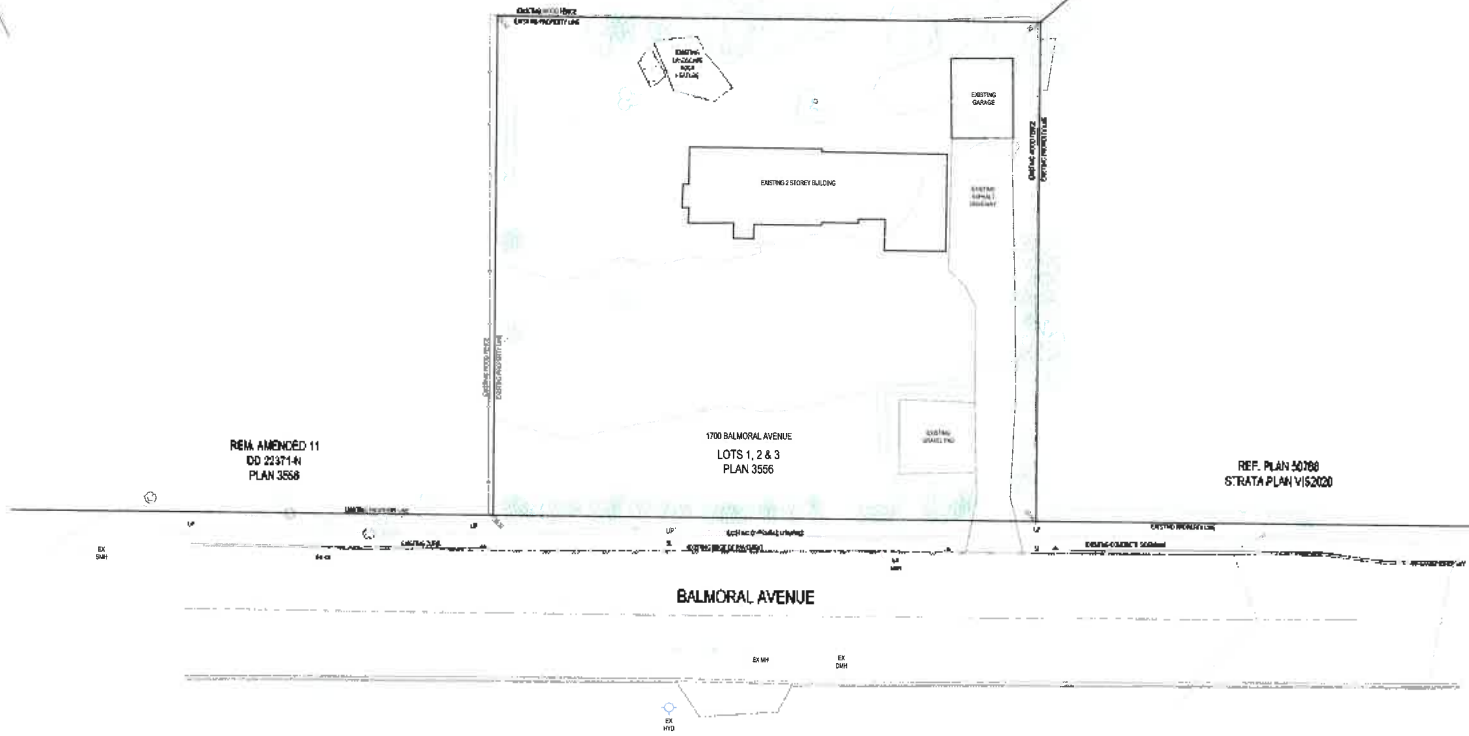
TO BE SUBMITTED WITH BUILDING PERMIT DRAWINGS

A1

A2

A3

March 27th, 2018



REMA AMENDED 11
DD 22371-41
PLAN 3558

1700 BALMORAL AVENUE
LOTS 1, 2 & 3
PLAN 3556

REF. PLAN 50788
STRATA PLAN V162020

BALMORAL AVENUE

NOT FOR CONSTRUCTION
ISSUED FOR INFORMATION

NOTES

1. THIS SITE PLAN HAS BEEN PREPARED BASED ON TOPOGRAPHIC SURVEY BY McElhenney CONSULTING SERVICES LTD. DATED 10th AUGUST 19, 2017.
2. ELEVATIONS ARE GEODETIC.
3. EXISTING GROUND CONTOURS ARE SHOWN AT 0.5m & 1.0m INTERVALS.

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McElhenney Consulting Services Ltd.

McElhenney Consulting Services Ltd.

1700 BALMORAL AVENUE
EXISTING SITE
PLAN
1700 BALMORAL AVENUE
COMBOK BC

CAMERON CONTRACTING (982942BC LTD.)

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PA



March 28, 2018

Tree Inventory Assessment – 1700 Balmoral Ave Development

Walter Ernst, RPF (#4071), ISA Certified Arborist (PN-7288A),
PMP, Certified Tree Risk Assessor

Project ID#: 18-1009-02

Table of Contents

1.0	Introduction and Background	2
2.0	Methodology	3
3.0	Results / Discussion / Recommendations	3
4.0	Invasive Species Management	13
5.0	Future Planning / Limitations	14
6.0	Signature and Professional Seal	15
	Appendix I – Tree Inventory Assessment Map	16
	Appendix II – Tree Inventory Assessment Data.....	17



1.0 Introduction and Background

A tree inventory assessment was completed on behalf of Don Cameron of Cameron Contracting Ltd. for a proposed residential site located at 1700 Balmoral Ave, Comox, BC on February 28, 2018 by Walter Ernst (R.P.F. / Cert. Arb. / Urban Tree Risk Assessor) of Strategic Natural Resource Consultants Inc. (SNRC).

The proposed development area is bound by Balmoral Ave to the south, the Comox Golf Club to the west and north, and an existing multi-family residential lot to the east. The land parcel is identified as Lots 1 to 3, Section 56, and Plan 3556 of the Comox Land District. Refer to Figure 1 for proposed 1700 Balmoral Ave development locator map.

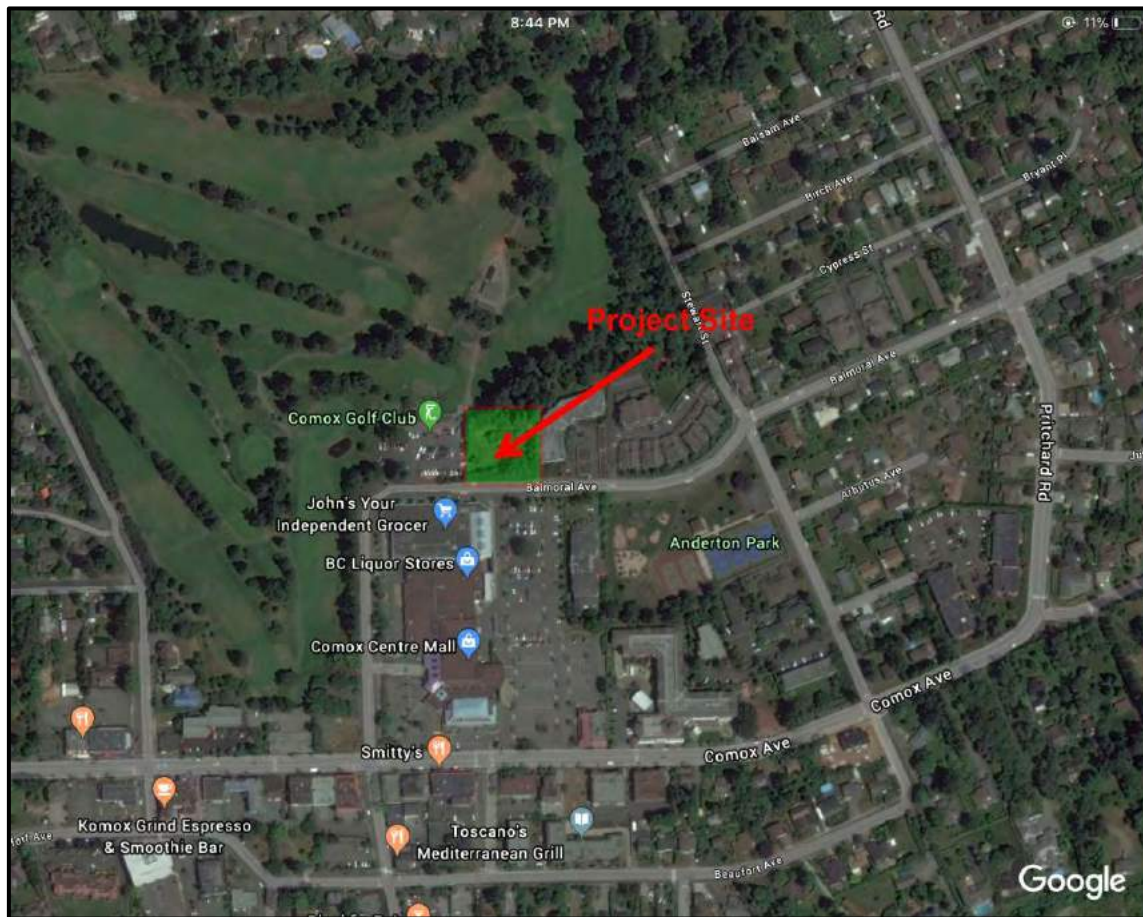


Figure 1: Proposed 1700 Balmoral Ave Development Location.

A site plan design map (Drawing #A1.01, dated September 29, 2017 and last updated January 31, 2018) showing the development area boundaries was provided by McElhanney prior to the tree inventory fieldwork (refer to Appendix I).

Initial discussions between Walter Ernst of SNRC, Don Cameron of Cameron Contracting, and Derek Jensen of McElhanney outlined general project expectations with regards to the tree inventory assessment requirements. These initial discussions provided the basis for the methodologies used in the field and within this report. Additionally, an on-site field assessment was completed on March 23, 2017 by Alex Walton of SNRC, Don Cameron of Cameron Contracting, Al Fraser of the Town of Comox, and Regina



Bozerocka of the Town of Comox to discuss options for protecting 2 trees along the Balmoral road side.

2.0 Methodology

The tree inventory was conducted by identifying every tree within the project area. McElhanney surveyors previously located each tree on the development site prior to the tree inventory assessment. Each live tree with a DBH greater than or equal to 20cm was tallied where species information was collected. For each inventory tree it was determined whether it should be retained or removed based on either tree condition (health and or defects creating a future risk to the general public and or development) obvious tree conflicts with the site plan design information (Drawing #A1.01, dated September 29, 2017 and last updated January 31, 2018) as well as through discussions with Don Cameron following the assessment. Within the development, all inventory trees recommended for removal were marked in the field with pink ribbon and all retention trees were marked with yellow / black candy striped ribbon. Tree numbers were indicated on all ribbon. Refer to Appendix I for the tree inventory map which identifies the inventory trees and Appendix II for the tree inventory data. Equipment utilized for the field assessment included a laser, iPad, mallet, and a diameter tape.

3.0 Results / Discussion / Recommendations

General Site Description:

Based on provincial biogeoclimatic (BEC) zone mapping, the development area is located within the Very Dry Maritime Coastal Western Hemlock subzone variant (CWHxm1). This subzone variant is typified by warm, dry summers and moist, mild winters with relatively little snowfall. Growing seasons are typically long with potential water deficits on zonal sites.

The site has been mostly cleared previously with the majority of the trees located along the property edges. Old buildings, building foundations, and other garbage are scattered within the development area. The site series is 01-100%. Soil moisture is fresh and soil nutrient level is medium. The ground is flat with 0-5% grades, and the site is well drained. Native vegetation is sparse consisting predominantly of various grass species. Invasive species are scattered throughout the site, dominated by Spurge laurel and English holly with secondary amounts of English ivy, bamboo, Himalayan blackberry, Scotch broom, and various thistle species.

Where timber exists, it consists pre-dominantly of immature to mature second growth coastal Douglas-fir (*Pseudotsuga menziesii*) and Western red cedar (*Thuja plicata*) with minor components of Lombardy poplar (*Populus nigra*), various fruit tree species, bitter cherry (*Prunus emarginata*), silver birch (*Betula pendula*), red oak (*Quercus rubra*), American Linden (*Tilia Americana*), weeping ash (*Fraxinus excelsior* 'Pendula'), trembling aspen (*Populus tremuloides*), black locust (*Robinia pseudoacacia*), Laurel species (*Laurus spp.*), and Pacific dogwood (*Cornus nuttallii*). Refer to Figure 2 for a general photo of the development site.





Figure 2: 1700 Balmoral Ave Development Site.

Tree Inventory:

Based on the assessment a total of 80 trees ($\geq 20\text{cm}$ DBH) were assessed within the development (34 Douglas-fir, 19 Western red cedar, 5 Lombardy poplar, 5 fruit trees, 4 bitter cherry, 3 silver birch, 2 American Linden, 2 red oak, 2 black locust, 1 weeping ash, 1 trembling aspen, 1 laurel tree, and 1 Pacific dogwood). Of these trees 21 (or 26%) are proposed for retention and 59 (or 74%) are proposed for removal. Proposed retention and removal trees were determined as per the methodology in Section 2.0. The proposed retention trees are summarized in Table 1.

Table 1: Retention Tree Summary

Tree #(s)	Species	Comments
2-6, 8	Western red cedar	Visually aesthetic mature and healthy trees located outside development along neighbouring property to east. Provides visual screen between two properties.
18	Red oak	Visually aesthetic mature and healthy tree. Provides partial visual screen from Balmoral Ave.
21	Black locust	Older mature tree of moderate health. No major defects noted. Provides partial visual screen from Balmoral Ave.
23-31	Western red cedar	Healthy hedge trees provide partial visual screen from neighbouring property.
36-38	Douglas-firs	Healthy mature trees provide partial visual screen from golf course.
40	Douglas-fir	Healthy larger mature tree located outside development along the northern boundary. Provides partial visual screen from golf course.



The Western red cedar hedge along the western boundary (include Trees 23-31 previously mentioned) would provide a partial visual screen and consists of healthy trees. These trees are younger with the root systems likely being less developed (in comparison to a mature tree). This may allow for machinery / construction work closer to the tree stems.

Trees 2 to 6 and 8 – consist of mature Western red cedar trees which are located outside and directly adjacent the development along the eastern boundary. These trees are associated with an existing multi-family residential site and are of significant value to the residents living there.

Every effort will be made to protect the proposed retention trees / hedge during the clearing / construction phases. Refer to Figures 3 to 7 for select photos of the proposed retention trees.



Figure 3: Photo of Tree 18 – Mature red oak tree.





Figure 4: Photo showing the Western red cedar hedge along the western boundary (including Trees 23-31).



Figure 5: Photo showing Trees 36 to 38 – Douglas-fir trees.



Figure 6: Photo of Tree 21 – Older mature black locust tree.



Figure 7: Photo of Tree 2 – Western red cedar in neighbouring property.

Specifically, with regards to the proposed removal trees, the following was observed:

- Trees 51 to 80 include 29 Douglas-fir and 1 Laurel tree. All the fir trees have been heavily pruned in order to maintain clearance with an overhead distribution line. These trees do provide a visual buffer from Balmoral Ave; however, they are unsightly and would require continual pruning maintenance into the future as a result of the overhead distribution lines. Therefore, if planting adjacent the distribution lines it is recommended that BC Hydro be contacted prior in order to determine suitable trees species that will require minimal future maintenance. Refer to Figures 8 and 9 for photos showing some of the roadside Douglas-fir trees.



Figure 8: Photo showing Douglas-fir trees along Balmoral Ave.



Overhead
distribution lines

Figure 9: Photo showing Douglas-fir trees along Balmoral Ave with distribution line above.

- Trees 43 to 48 consist of older mature Lombardy poplars. These trees are a weak wooded species which often has breakage and rot issues which create a moderate risk to the general public as well as the future building infrastructure. These trees are; therefore, recommended for removal. During the assessment, one recently windthrown Lombardy poplar was observed directly adjacent these trees. Refer to Figures 10 and 11 for photos of the Lombardy poplars as well as the windthrown tree.



Windthrown
Lombardy poplar
stem

Figure 10: Photo showing recent windthrown Lombardy poplar within development.



Figure 11: Photo showing Trees 43 and 44 – Older mature Lombardy poplars.

Refer to Appendix I for Tree Inventory Map (showing all proposed retention and removal trees) and Appendix II for Tree Inventory Data / Recommendations.

As a note, old wire fence-line and significant amounts of garbage exist within the property which poses a safety hazard (predominantly at the north end of the site). Crews should be aware of this when working within this area.

The recommendations are as follows:

- For the removal trees, specific directions were noted for falling: Trees were prescribed for directional hand-falling away from retention trees and/or piecing down. However, the falling method will be up to the faller to decide the safest way to remove the trees while minimizing damage to the adjacent retention trees (and their root systems) or to neighbouring properties.

- **Tree protection zones (TPZs)** are recommended to be installed around the identified retention trees at a radius equal to the length of the longest branch (drip-line) prior to any development activity. The critical root zone (CRZ) of trees lay within the dripline area. Tree protection zones should be clearly visible with adequate signage (recommended plastic mesh or snow fencing with secured with adequate posts (e.g. rebar stakes) to ensure stability throughout the construction phases). Refer to Figure 12 for a diagram showing the critical root zone and the tree protection zone fencing required. These areas should be discussed with construction crews to ensure limitations within TPZs are understood. Once the TPZs have been established there should be no construction works (surface and / or sub-surface), no movement of vehicles and equipment, and no storage of any materials of any kind within the TPZs. If the full recommended TPZ cannot be maintained, or if any construction activities must be completed within a TPZ, a certified arborist should be consulted to determine the potential impacts to the tree(s). For each retention tree, specific tree protection zones have been indicated within Appendix II – Tree Inventory Assessment Data / Recommendations.

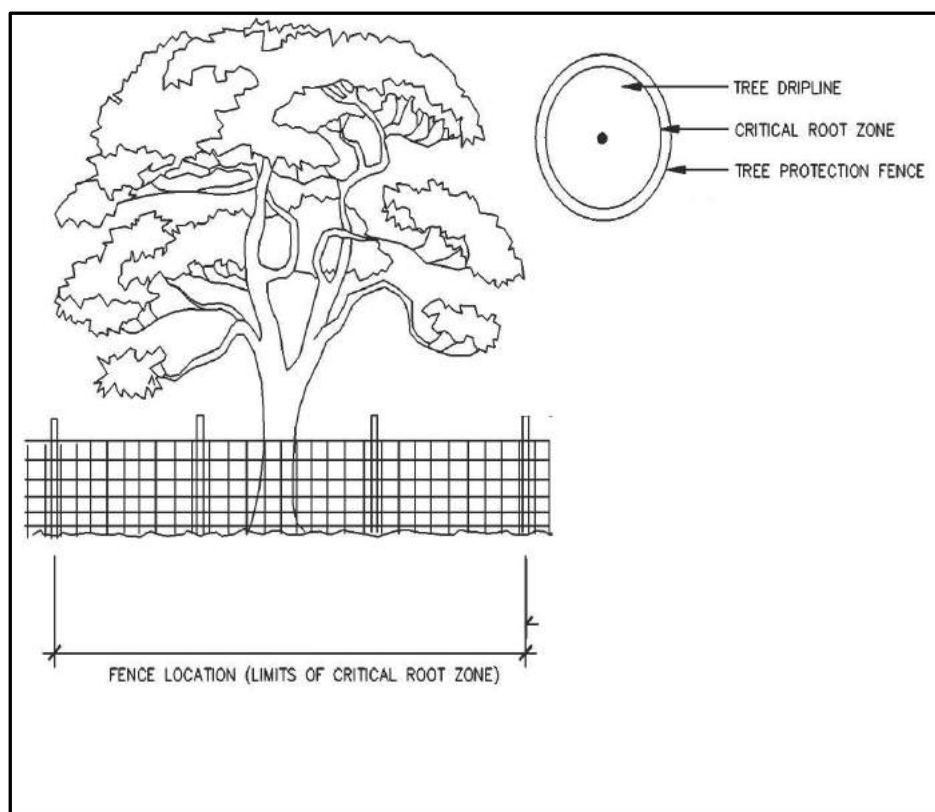


Figure 12: Diagram showing the critical root zone and tree protection zone fencing requirements.

- Specific to the Western red cedar hedge along the western boundary (including Trees 23-31), these trees will be retained where possible and should be monitored by a Certified Arborist during construction activities. The TPZ for the entire hedge is 2.0m.

- Specific to Retention Trees 2 to 6 and 8 (western red cedar located adjacent the property along the eastern side): as some of the construction activities will be required in closer proximity to the trees, TPZ fencing will be impracticable during that time. However, machine activity, trenching, grade / drainage changes, and or other construction activities within the TPZs of the trees should be minimal. Where required, low impact machinery may enter the TPZs with plywood or other material lain down on travel path (e.g. mulch layer with geo-textile material). Once work moves outside the TPZs, then TPZ fencing and signage should be established. It is recommended that a certified arborist monitor construction activities closely while working directly adjacent these trees. Given their value to adjacent residents, these trees will be protected to the fullest extent practicable.
- Specific to Retention Trees 18 and 21 (red oak and black locust): Removal Trees 51 to 62 and 70 to 74 are located within the TPZs and require removal prior to establishing the TPZ. Within the TPZs natural grade will not be altered. Sidewalk installation will be required within the TPZs. Within the TPZs, the sidewalk width will be narrowed to 1m and outside the TPZs, the sidewalk will be widened to 1.5m minimum. Additionally, the proposed ramps located to the east and west of the Tree 18 (red oak) will also occur within portions of the TPZ. Ensure to minimize damage to the roots of these trees during tree removal and sidewalk / ramp construction works. Ensure tree protection zones are established and maintained following the above development activities (secure fencing, signage). It is recommended that a certified arborist monitor construction activities closely while working directly adjacent these trees.
- Specific to Removal Trees 51 to 62 and 70 to 74: Remove these trees prior to establishing TPZs for Tree 18 (red oak) and Tree 21 (black locust). Stems should be cut flush to the ground with stumps / roots being retained (in order to minimize root / soil disturbance). Directionally handfall. It is recommended that the machine operator reach in to the TPZs and lift the debris to the roadside in order to minimize impact within the TPZs.
- Specific to Removal Trees 35, 39, and 41 to 45: Remove these trees prior to establishing TPZs for Trees 36-38 and 40 (Douglas-firs). For Trees 39, and 41 to 45, stems should be cut flush to the ground with stumps / roots being retained (in order to minimize root / soil disturbance). Directionally handfall. It is recommended that the machine lift the debris away and outside of TPZs. If possible, it is recommended that the machine operator reach in to the TPZs for debris removal. Where this is not possible, low impact machinery may enter the TPZs with plywood or other material (e.g. mulch layer with geo-textile material). lain down on travel path.
- Specific to Removal Trees 1, 7, and 9: Directionally handfall and/or piece down. Stems should be cut flush to the ground with stumps / roots being retained (in order to minimize root / soil disturbance). It is recommended that the machine lift the debris away and outside of the TPZ areas for Trees 2 to 6 and 8 (Western red cedar). If possible, it is recommended that the machine operator reach in to



the TPZs for debris removal. Where this is not possible, low impact machinery may enter the TPZs with plywood or other material (e.g. mulch layer with geotextile material) laid down on travel path.

- A certified arborist should work closely with the developer and construction crews to ensure that adequate tree protection measures are abided by throughout the various phases of development. This is required to ensure the retained trees or their root systems are not negatively impacted during construction activities.

4.0 Invasive Species Management

Spurge laurel and English holly are the pre-dominant invasive species on the site with secondary amounts of English ivy, bamboo, Himalayan blackberry, Scotch broom, and various thistle species also present. Refer to Figure 13 which shows a pocket of Spurge laurel occurrence.



Figure 13: Photo showing a localized pocket of Spurge Laurel occurrence.

The following general recommendations have been made for the eradication, control, and minimization of further spread of the above species within the site and into other neighboring sites. These recommendations were taken from the Coastal Invasive Species Committee website (www.coastalisc.com/priority-invasive-plants).

- Recommend removal of all invasive species plants prior to development through manual (cut / pull by hand or with heavy machinery), chemical or a combination thereof, with the goal of minimizing further spread during the construction phases. The method and timing of removal used should be tailored to the specific invasive species as indicated on the Invasive Species Committee website (ISC).



- During construction activities, ensure that all equipment (hand tools) and machinery are free of plant parts or soil prior to entering and leaving the worksite to minimize spread of invasive seed or plant parts. Consider utilizing a wash-down station for machinery at a designated location.
- For landscaping purposes, it is recommended to plant with suitable alternative (native) species as soon as possible within the eradicated areas. A layer of mulch may be incorporated within planted areas to minimize re-establishment of invasive species.

During invasive species removal work, ensure that the tree protection zones for the identified trees are respected in order to minimize any damage to these trees or their critical root zones. Over the long term, repeated manual and / or chemical treatments of invasive plants may be required to effectively control some species.

5.0 Future Planning / Limitations

Long term planning recommendations:

- The developer should work closely with an arborist throughout the planning / development process, to ensure that the net benefits acquired through retention trees are maximized and that associated hazards are effectively mitigated.
- Specifically, a certified arborist should be present / consulted at the following times:
 - To advise on any new works and / or changes to development plans occurring near retention trees or those that have the potential to affect retention trees.
 - To monitor construction works occurring directly adjacent to trees (e.g. grading, ditching, trenching etc.) that have the potential to affect tree roots and / or the tree stems / branches.
 - After significant weather events (high winds, storms, etc.), that may have the potential to create new hazards and / or change the suitability of retention trees.
- A post construction hazard tree assessment should be completed to ensure that retention areas are free from construction damages and / or other damaging agents.

Limitations:

Field observations and treatment recommendations during the tree inventory were based on the site plan design for the proposed development provided by engineers of McElhanney Consulting Services Ltd (Drawing #A1.01, dated September 29, 2017 and last updated January 31, 2018). If there are significant variances to this plan, it is recommended a certified arborist be consulted to review and field visit the site if required.

The tree inventory assessment was completed under the site conditions (weather, natural / unnatural disturbances etc.) present at the time of the assessment and with the tools



available (laser, iPad, D-tape, mallet). If the site conditions change significantly, it is recommended a certified arborist field review the site to determine if the risk to retention trees has changed.

6.0 Signature and Professional Seal

Fieldwork completed by: Walter Ernst, RPF (#4071), ISA Certified Arborist (PN-7288A), PMP, and Certified Tree Risk Assessor and Alex Walton, ISA Certified Arborist (PN-7140) and Certified Tree Risk Assessor.

Report completed by: Walter Ernst, RPF (#4071), ISA Certified Arborist (PN-7288A), PMP, and Certified Tree Risk Assessor.

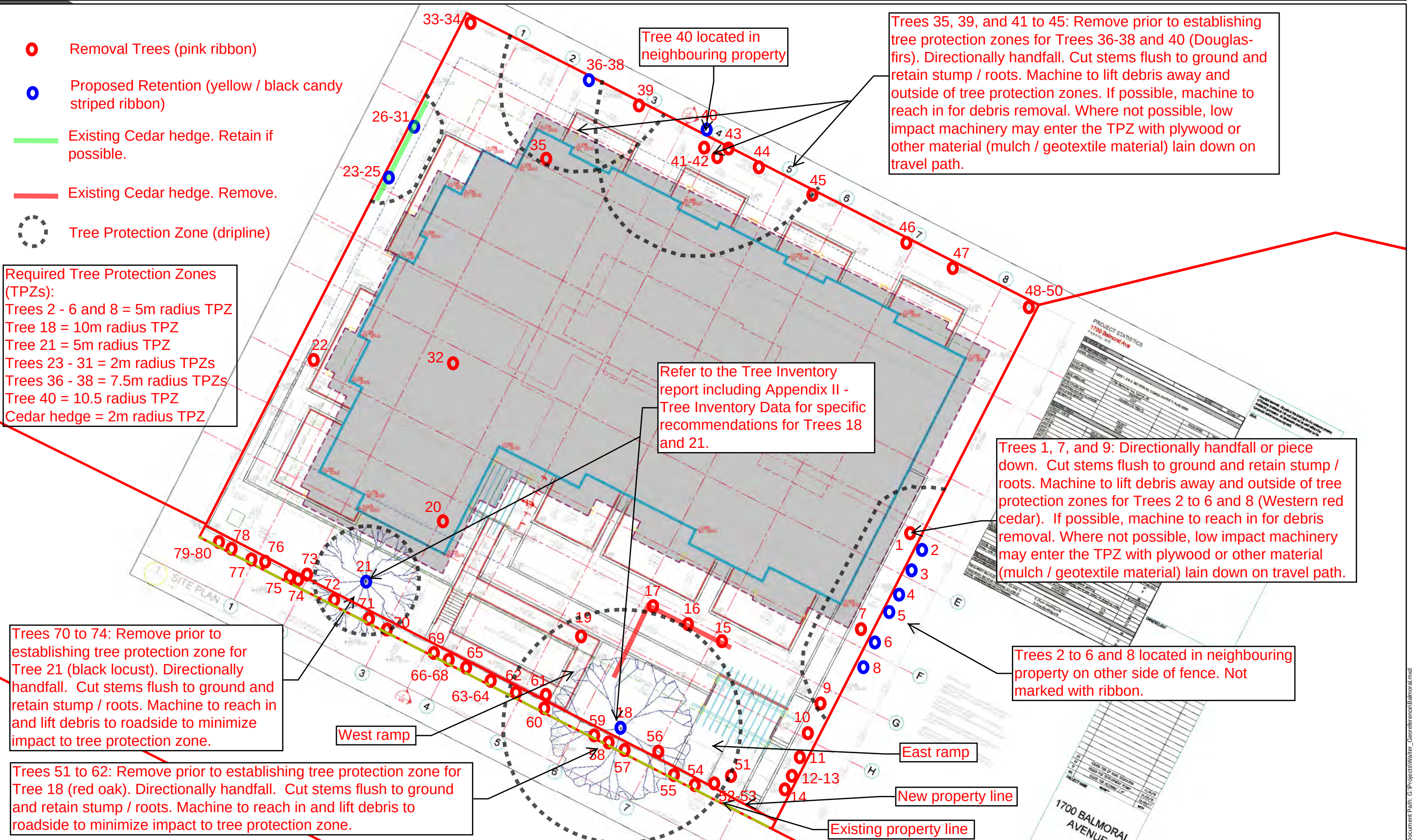
Signature and Seal	
	
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Appendix I – Tree Inventory Assessment Map



1700 Balmoral Ave Development - Tree Inventory Assessment Map



Appendix II – Tree Inventory Assessment Data



Tree Inventory Assessment Form:

Location: 1700 Balmoral Ave Development
Complete Walter Ernst, RPF, Cert Arb., PMP
Date: 28/02/2018

Tree #	Spp.	DBH (cm)	Ht (m)	TPZ (m)	Location	Risk	Condition (defects, health)	Retain or Remove	Recommendations
1	At	20.0	8.0	N/A	Inside property	M	Limb broke off at 3m height. Rot at base of stem (flaky bark).	Remove.	Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to lift debris away and outside of tree protection zones for Trees 2, 3, and 4 (Western red cedar). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.
2	Cw	43.0	22.2	5.0	Outside property	L-M	Healthy tree. Tightly joined fork at 11-12m height. Potential for included bark and as a result a weak union.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. As some of the construction activities will be required in closer proximity to the tree, tree protection zone fencing will be impracticable during that time. Machine activity, trenching, grade changes and or other construction activities within the TPZ of the tree should be minimal. Where required low impact machinery may enter the TPZ with plywood or other material lain down on travel path (eg mulch layer with geotextile material). Once work moves outside the TPZ, then TPZ fencing and signage should be established and maintained.
3	Cw	22.0	22.2	5.0	Outside property	L	Healthy tree. Minor forks but have stronger attachment.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. As some of the construction activities will be required in closer proximity to the tree, tree protection zone fencing will be impracticable during that time. Machine activity, trenching, grade changes and or other construction activities within the TPZ of the tree should be minimal. Where required low impact machinery may enter the TPZ with plywood or other material lain down on travel path (eg mulch layer with geotextile material). Once work moves outside the TPZ, then TPZ fencing and signage should be established and maintained.
4	Cw	26.0	22.2	5.0	Outside property	L	Healthy tree. Minor forks but have stronger attachment.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. As some of the construction activities will be required in closer proximity to the tree, tree protection zone fencing will be impracticable during that time. Machine activity, trenching, grade changes and or other construction activities within the TPZ of the tree should be minimal. Where required low impact machinery may enter the TPZ with plywood or other material lain down on travel path (eg mulch layer with geotextile material). Once work moves outside the TPZ, then TPZ fencing and signage should be established and maintained.
5	Cw	30.0	22.2	5.0	Outside property	L	Healthy tree. Minor forks but have stronger attachment.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. As some of the construction activities will be required in closer proximity to the tree, tree protection zone fencing will be impracticable during that time. Machine activity, trenching, grade changes and or other construction activities within the TPZ of the tree should be minimal. Where required low impact machinery may enter the TPZ with plywood or other material lain down on travel path (eg mulch layer with geotextile material). Once work moves outside the TPZ, then TPZ fencing and signage should be established and maintained.
6	Cw	45.0	22.2	5.0	Outside property	L-M	Healthy tree. Tightly joined fork at 2.5m height. Potential for included bark and as a result a weak union.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. As some of the construction activities will be required in closer proximity to the tree, tree protection zone fencing will be impracticable during that time. Machine activity, trenching, grade changes and or other construction activities within the TPZ of the tree should be minimal. Where required low impact machinery may enter the TPZ with plywood or other material lain down on travel path (eg mulch layer with geotextile material). Once work moves outside the TPZ, then TPZ fencing and signage should be established and maintained.
7	Gp	60.0	11.0	N/A	Inside property	M-H	Significant rot in branches and at stem base.	Remove.	Piece down. Cut stem flush to ground and retain stump / roots. Machine to lift debris away and outside of tree protection zones for Trees 5, 6, and 8 (Western red cedar). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.
8	Cw	60.0	20.0	5.0	Outside property	M	Multiforked tree. Main fork fused with weaker union. Minor rot.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. As some of the construction activities will be required in closer proximity to the tree, tree protection zone fencing will be impracticable during that time. Machine activity, trenching, grade changes and or other construction activities within the TPZ of the tree should be minimal. Where required low impact machinery may enter the TPZ with plywood or other material lain down on travel path (eg mulch layer with geotextile material). Once work moves outside the TPZ, then TPZ fencing and signage should be established.
9	Vb	25.0	11.0	N/A	Inside property	M	Rot at base. Not desireable long term tree.	Remove.	Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to lift debris away and outside of tree protection zone for Tree 8 (Western red cedar). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.
10	Vb	19.0	9.0	N/A	Inside property	L	Healthy. Not desireable long term tree.	Remove.	Directionally handfall.
11	RO	23.0	9.5	N/A	Inside property	M-H	Severe rot at base of stem. Ganrly looking tree.	Remove.	Directionally handfall.
12	Vb	18.0	9.0	N/A	Inside property	L	Healthy tree. Not desireable long term tree.	Remove.	Directionally handfall.
13	Vb	18.0	10.0	N/A	Inside property	L	Healthy tree. Not desireable long term tree.	Remove.	Directionally handfall.
14	SB	36.0	8.0	N/A	Inside property	L	Heavily pruned. Not a very sightly tree.	Remove.	Directionally handfall.
15	BL	37.0	5.5	N/A	Inside property	M	Pockets of rot noted in main stem and forks.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Machine to lift debris away and outside of tree protection zone for Tree 18 (red oak).
16	Cw	21.0	10.5	3.5	Inside property	L	Hedge tree in good health. Conflicts with development design.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Machine to lift debris away and outside of tree protection zone for Tree 18 (red oak).
17	Cw	21.0	10.5	3.5	Inside property	L	Hedge tree in good health. Conflicts with development design.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Machine to lift debris away and outside of tree protection zone for Tree 18 (red oak).
18	RO	75.0	33.0	10.0	Inside property	L	Mature tree looks healthy overall. Previously directionally pruned away from distribution line. Very nice tree.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. Removal Trees 51 to 62 are located within the TPZ and require removal prior to establishing the TPZ. Within the TPZ natrual grade will not be altered. Sidewalk installation will be required within the TPZ. Within the TPZ, the sidewalk width will be narrowed to 1m. Outside the TPZ, the sidewalk will be widened to 1.5m minimum. Additionally, the proposed ramps located to the east and west of the tree will also occur within portions of the TPZ. Ensure to minimize damage to the roots of this tree during tree removal and sidewalk / ramp construction works. Ensure tree protection zone established and maintained following the above development activities (secure fencing, signage).
19	AL	40.0	16.0	7.0	Inside property	L-M	Older tree previously directionally pruned away from distribution line. Potential for some rot but tree seems okay overall. Conflicts with development design.	Remove prior to establishing tree protection zone for Tree 18.	Directionally handfall. Machine to lift debris away and outside of tree protection zone for Tree 18 (red oak).

Tree #	Spp.	DBH (cm)	Ht (m)	TPZ (m)	Location	Risk	Condition (defects, health)	Retain or Remove	Recommendations
20	AL	25.0	8.0	N/A	Inside property	H	Significant rot in stem.	Remove.	Directionally handfall or machine push.
21	BL	60.0	14.6	5.0	Inside property	L-M	Older tree of moderate health. Growths on stems. Minor rot. No major defects noted. Previously directionally pruned away from distribution line.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. Ensure tree protection zone established and maintained (secure fencing, signage). Removal Trees 70 to 74 are located within the TPZ and require removal prior to establishing the TPZ. Within the TPZ natrual grade will not be altered. Sidewalk installation will be required within the TPZ. Within the TPZ, the sidewalk width will be narrowed to 1m. Outside the TPZ, the sidewalk will be widened to 1.5m minimum.Ensure to minimize damage to the roots of this tree during tree removal and sidewalk construction works. Ensure tree protection zone established and maintained following the above development activities (secure fencing, signage).
22	WA	37.0	9.0	3.0	Inside property	L	Weeping form with spiral forks. A few previously broken off forks. 4m depth excavation required up to property line which will damage / sever approximately 80% of the root mass in the dripline area. Tree health and stability would be affected.	Remove.	Directionally handfall or machine push.
23	Cw	22.0	11.5	2.0	Inside property	L	Healthy hedge tree. Younger tree which is part of a contiguous cedar hedge. Root system may not be as developed so machinery may be able to work closer to the tree.	Retain along with rest of cedar hedge if possible.	Ensure tree protection zone established and maintained (secure fencing, signage). ISA Certified Arborist to monitor construction activities closely while working adjacent the tree.
24	Cw	19.0	11.5	2.0	Inside property	L	Healthy hedge tree. Younger tree which is part of a contiguous cedar hedge. Root system may not be as developed so machinery may be able to work closer to the tree.	Retain along with rest of cedar hedge if possible.	Ensure tree protection zone established and maintained (secure fencing, signage). ISA Certified Arborist to monitor construction activities closely while working adjacent the tree.
25	Cw	19.0	11.5	2.0	Inside property	L	Healthy hedge tree. Younger tree which is part of a contiguous cedar hedge. Root system may not be as developed so machinery may be able to work closer to the tree.	Retain along with rest of cedar hedge if possible.	Ensure tree protection zone established and maintained (secure fencing, signage). ISA Certified Arborist to monitor construction activities closely while working adjacent the tree.
26	Cw	20.0	11.5	2.0	Inside property	L	Healthy hedge tree. Younger tree which is part of a contiguous cedar hedge. Root system may not be as developed so machinery may be able to work closer to the tree.	Retain along with rest of cedar hedge if possible.	Ensure tree protection zone established and maintained (secure fencing, signage). ISA Certified Arborist to monitor construction activities closely while working adjacent the tree.
27	Cw	19.0	11.5	2.0	Inside property	L	Healthy hedge tree. Younger tree which is part of a contiguous cedar hedge. Root system may not be as developed so machinery may be able to work closer to the tree.	Retain along with rest of cedar hedge if possible.	Ensure tree protection zone established and maintained (secure fencing, signage). ISA Certified Arborist to monitor construction activities closely while working adjacent the tree.
28	Cw	19.0	11.5	2.0	Inside property	L	Healthy hedge tree. Younger tree which is part of a contiguous cedar hedge. Root system may not be as developed so machinery may be able to work closer to the tree.	Retain along with rest of cedar hedge if possible.	Ensure tree protection zone established and maintained (secure fencing, signage). ISA Certified Arborist to monitor construction activities closely while working adjacent the tree.
29	Cw	20.0	11.5	2.0	Inside property	L	Healthy hedge tree. Younger tree which is part of a contiguous cedar hedge. Root system may not be as developed so machinery may be able to work closer to the tree.	Retain along with rest of cedar hedge if possible.	Ensure tree protection zone established and maintained (secure fencing, signage). ISA Certified Arborist to monitor construction activities closely while working adjacent the tree.
30	Cw	20.0	11.5	2.0	Inside property	L	Healthy hedge tree. Younger tree which is part of a contiguous cedar hedge. Root system may not be as developed so machinery may be able to work closer to the tree.	Retain along with rest of cedar hedge if possible.	Ensure tree protection zone established and maintained (secure fencing, signage). ISA Certified Arborist to monitor construction activities closely while working adjacent the tree.
31	Cw	19.0	11.5	2.0	Inside property	L	Healthy hedge tree. Younger tree which is part of a contiguous cedar hedge. Root system may not be as developed so machinery may be able to work closer to the tree.	Retain along with rest of cedar hedge if possible.	Ensure tree protection zone established and maintained (secure fencing, signage). ISA Certified Arborist to monitor construction activities closely while working adjacent the tree.
32	FT	20.0	2.5	N/A	Inside property	L	Decadant broken up fruit tree. Rot evident.	Remove.	Directionally handfall or machine push.
33	SB	65.0	6.0	N/A	Inside property	L	Decadent topped tree with significant suckering. Unsightly.	Remove.	Directionally handfall or piece down as close to fenceline.
34	SB	65.0	6.0	N/A	Inside property	L	Decadent topped tree with significant suckering. Unsightly.	Remove.	Directionally handfall or piece down as close to fenceline.
35	FT	20.0	3.0	N/A	Inside property	L	Decadent fruit tree with rot.	Remove.	Remove prior to establishing tree protection zone for Trees 36-38. Directionally handfall. Machine to lift debris away and outside of tree protection zone for Trees 36-38 (Douglas-fir). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.
36	Fdc	45.0	26.6	7.5	Inside property	L	Tree seems healthy overall. Ivy up stem.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. Removal Trees 35 and 39 are located within the TPZ and require removal prior to establishing the TPZ. Ensure to minimize damage to the roots of this tree during tree removal. Once work moves outside the TPZ, then TPZ fencing and signage should be established and maintained.
37	Fdc	36.0	24.6	7.5	Inside property	L	Tree seems healthy overall. Ivy up stem.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. Removal Trees 35 and 39 are located within the TPZ and require removal prior to establishing the TPZ. Ensure to minimize damage to the roots of this tree during tree removal. Once work moves outside the TPZ, then TPZ fencing and signage should be established and maintained.
38	Fdc	36.0	24.6	7.5	Inside property	L	Tree seems healthy overall. Ivy up stem.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. Removal Trees 35 and 39 are located within the TPZ and require removal prior to establishing the TPZ. Ensure to minimize damage to the roots of this tree during tree removal. Once work moves outside the TPZ, then TPZ fencing and signage should be established and maintained.
39	Fdc	70.0	24.6	N/A	Inside property	M	Tree with spiral twist and fork. Stress crack along stem. Potential for breakage.	Remove.	Remove prior to establishing tree protection zone for Trees 36-38 and 40. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to lift debris away and outside of tree protection zone for Trees 36-38 and 40 (Douglas-fir). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.
40	Fdc	110.0	33.0	10.5	Outside property	L	Healthy mature tree. Limbed on neighbours side.	Retain.	ISA Certified Arborist to monitor construction activities closely while working adjacent the tree. Removal Trees 39 and 41 to 45 are located within the TPZ and require removal prior to establishing the TPZ. Ensure to minimize damage to the roots of this tree during tree removal. Once work moves outside the TPZ, then TPZ fencing and signage should be established and maintained.
41	FT	33.0	7.0	N/A	Inside property	H	Severely rotted out tree.	Remove.	Remove prior to establishing tree protection zone for Tree 40. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to lift debris away and outside of tree protection zone for Tree 40 (Douglas-fir). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.

Tree #	Spp.	DBH (cm)	Ht (m)	TPZ (m)	Location	Risk	Condition (defects, health)	Retain or Remove	Recommendations
42	FT	28.0	7.0	N/A	Inside property	H	Old decadent tree with breakage.	Remove.	Remove prior to establishing tree protection zone for Tree 40. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to lift debris away and outside of tree protection zone for Tree 40 (Douglas-fir). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.
43	LP	120.0	31.0	N/A	Inside property	M	Old poplar with ivy growing up stems. Weak wooded species which often has breakage issues.Rot potential. Adjacent poplar blew over and wrecked fence.	Remove.	Remove prior to establishing tree protection zone for Tree 40. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to lift debris away and outside of tree protection zone for Tree 40 (Douglas-fir). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.
44	LP	120.0	31.0	N/A	Inside property	M	Old poplar with ivy growing up stems. Weak wooded species which often has breakage issues.Rot potential. Adjacent poplar blew over and wrecked fence.	Remove.	Remove prior to establishing tree protection zone for Tree 40. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to lift debris away and outside of tree protection zone for Tree 40 (Douglas-fir). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.
45	FT	43.0	9.0	N/A	Inside property	L-M	Old decadent tree with rot.	Remove.	Remove prior to establishing tree protection zone for Tree 40. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to lift debris away and outside of tree protection zone for Tree 40 (Douglas-fir). If possible, machine to reach in for debris removal. Where not possible, low impact machinery may enter the TPZ with plywood or other material lain down on travel path.
46	LP	100.0	30.0	N/A	Inside property	M	Old poplar with ivy growing up stems. Weak wooded species which often has breakage issues.Rot potential. Adjacent poplar blew over and wrecked fence.	Remove.	Piece down as close to fenceline.
47	LP	90.0	30.0	N/A	Inside property	M	Old poplar with ivy growing up stems. Weak wooded species which often has breakage issues.Rot potential. Adjacent poplar blew over and wrecked fence.	Remove.	Piece down as close to fenceline.
48	LP	120.0	30.0	N/A	Inside property	M	Old poplar tree. Weak wooded species which often has breakage issues.Rot potential. Adjacent poplar blew over and wrecked fence.	Remove.	Piece down as close to fenceline.
49	Cw	37.0	20.0	N/A	Inside property	M	Tree fused at base to 1.3m height with another tree. Weak union. Deformed and multi-forked tree	Remove.	Piece down as close to fenceline.
50	Cw	40.0	20.0	N/A	Inside property	M	Tree fused at base to 1.3m height with another tree. Weak union. Deformed and multi-forked tree	Remove.	Piece down as close to fenceline.
51	Fdc	21.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
52	Fdc	19.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
53	Fdc	19.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
54	Fdc	21.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
55	Fdc	21.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
56	LT	21.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
57	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
58	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
59	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
60	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
61	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
62	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 18. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 18 (red oak).
63	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
64	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
65	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
66	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
67	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.

Tree #	Spp.	DBH (cm)	Ht (m)	TPZ (m)	Location	Risk	Condition (defects, health)	Retain or Remove	Recommendations
68	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
69	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
70	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 21. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 21 (black locust).
71	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 21. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 21 (black locust).
72	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 21. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 21 (black locust).
73	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 21. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 21 (black locust).
74	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Remove prior to establishing tree protection zone for Tree 21. Directionally handfall. Cut stem flush to ground and retain stump / roots. Machine to reach in and lift debris to roadside to minimize impact to tree protection zone for Tree 21 (black locust).
75	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
76	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
77	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
78	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
79	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
80	Fdc	20.0	10.0	N/A	Inside property	L	Unightly roadside trees. Heavily pruned to maintain clearance for distribution line.	Remove.	Directionally handfall.
AVG:		34.2	13.5						

Tree Inventory Species Breakdown:

Spp.	#	%
Fdc	34	42
Cw	19	24
LP	5	6
FT	5	6
Vb	4	5
SB	3	4
AL	2	3
RO	2	3
BL	2	3
WA	1	1
At	1	1
LT	1	1
Gp	1	1
Total	80	100

Tree Species Abbreviations:

- Fdc = Douglas-fir
- Cw = Western red cedar
- LP = Lombardy poplar
- FT = Fruit tree
- Vb = Bitter cherry
- AL = American Linden
- SB = Silver birch
- RO = Red oak
- BL = Black locust
- WA = Weeping ash
- At = Trembling aspen
- LT = Laurel tree
- Gp = Pacific Dogwood

Proposed Retention = 21 trees (or 26%)

Proposed Removals = 59 trees (or 74%)

****Removal trees were hung with pink ribbon. Retention trees hung with yellow / black candy striped ribbon. Trees 2 to 6, and 8 are located adjacent the property (western red cedar) and were not marked with ribbon.**

****Only live trees ≥20cm DBH were tallied.**

**** For the cedar hedge located along the western boundary the TPZ is 2.0m**

May 10th, 2017
Our File: 2211-47436-00

Ms. Shelley Ashfield, P. Eng.
Town of Comox
1809 Beaufort Avenue,
Comox, BC
V9M 1R9

Attention: Ms. Ashfield

1700 Balmoral Ave Multifamily Development - Traffic Impact Study

The purpose of this letter report is to review traffic operations for the proposed Balmoral Avenue residential development in Comox, BC. This study evaluates the AM and PM weekday peak hours for Existing Conditions (2017), Opening Day (2019), and future horizon years 2024 and 2039. Additionally, the study reviews the vehicle travel speed and site access locations along Balmoral Avenue to assess its safety.

The following presents our assumptions, analysis results, and recommendations.

1. Introduction

The proposed project is located in Comox, British Columbia, and will consist of 45 condominium units. The site is north of Balmoral Avenue, east of Port Augusta and west of Stewart Street, as shown by the red shading in *Figure 1*. Full build-out of the proposed development is expected to occur by year 2019.

Two all-way stop controlled intersections will be analyzed as part of this study (*Figure 1*):

- Comox Avenue / Port Augusta Street
- Balmoral Avenue / Pritchard Road

Figure 1: Balmoral Avenue Site Location



1.1. Road Network

Balmoral Avenue is a two-lane collector road which runs east-west between Port Augusta Street and Torrence Road / Croteau Road (where it becomes Hawkins Road). It provides access to a few local roads, residences, and Comox Centre Mall. Within the study area the road has dedicated sidewalks on both its sides, and a posted speed which varies between 30km/hr (near Anderton Park) and 50km/hr.

Port Augusta Street is a two-lane collector road which runs north-south between Balmoral Avenue and the Marina. It provides access to the Comox Valley Marina and a nearby local businesses. Within the study area the road has a dedicated sidewalk on its east side, and a posted speed of 50km/hr.

Pritchard Road is an undivided two-lane arterial road which runs north-south between Comox Avenue and Knight Road (where it becomes Military Row). It provides access to arterial roads, collector roads, and residences. Within the study area the road has dedicated sidewalks on both its sides, and a posted speed of 50km/hr.

Comox Avenue is an undivided two-lane arterial road which runs east-west between Pritchard Road and Highway 19A in Courtenay, BC. In addition to providing highway access, it also is the main access road to the commercial district of Comox and St. Joseph's General Hospital. The road has dedicated sidewalks on both of its sides, and a posted speed of 50km/hr.



2. Traffic Volume Development

2.1. Existing 2017 Traffic Volumes

AM and PM weekday peak hour traffic volumes were collected by McElhanney Consulting Services Ltd. (MCSL) on October 4th, 2017 at the following intersections:

- Comox Avenue / Port Augusta Street
- Balmoral Avenue / Pritchard Road

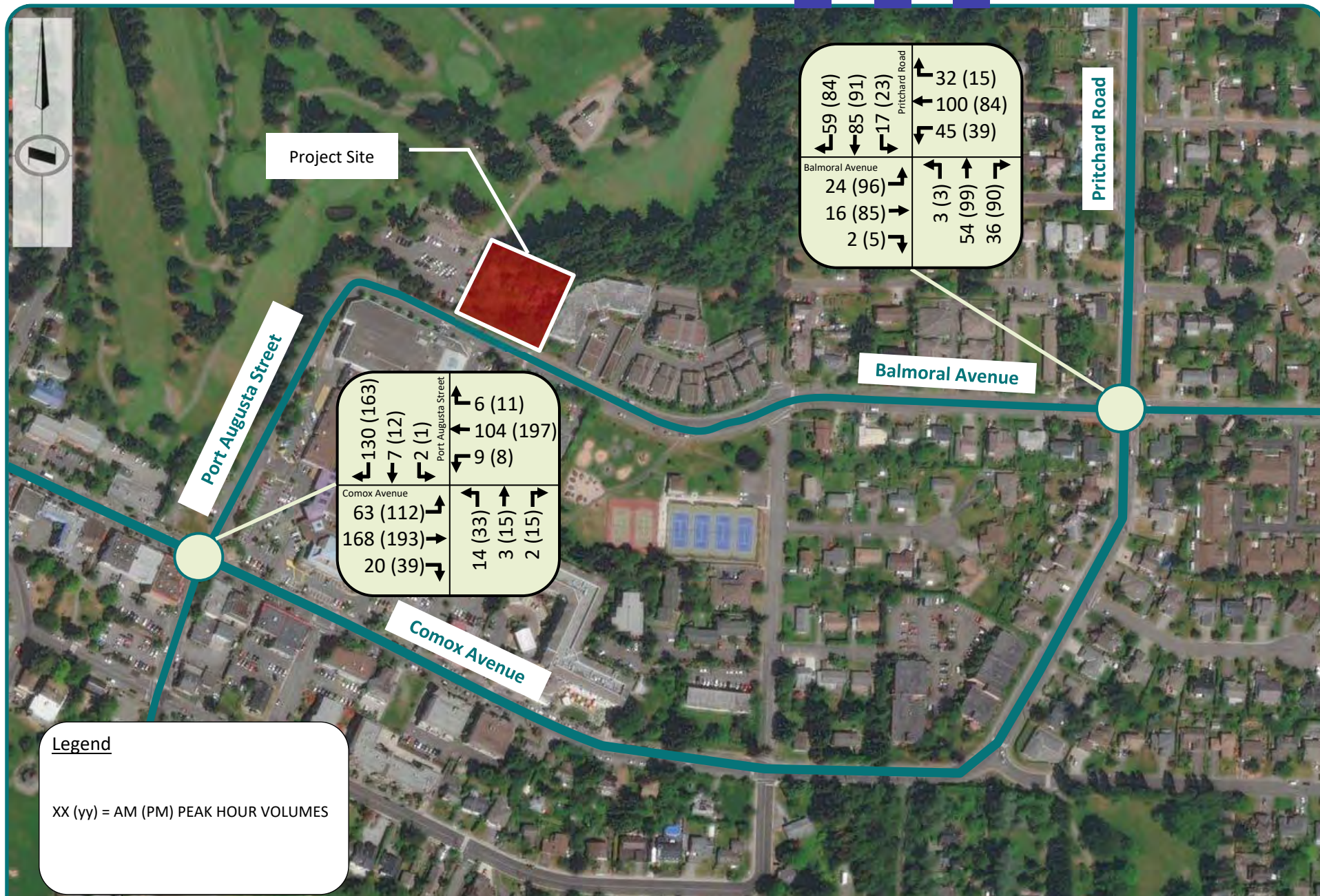
Peak hours were determined using counts which were recorded on a weekday from 7:00 to 9:00 AM and 3:00 to 6:00 PM. The peak hour was established by finding the hour with the highest overall volumes.

Existing Conditions (2017) AM and PM peak hour traffic volumes at key intersections are presented on *Figure 2*. Detailed traffic count sheets can be found in *Appendix A*.

A1

A2

A3



1700 Balmoral Multifamily Development - Traffic Impact Study

Existing (2017) AM and PM Peak Hour Volumes

FIGURE 2

2.2. Future Growth Rate

To develop future volumes, MCSL calculated a growth rate to apply to the existing peak hour traffic volumes. The annual compounded growth rate within the study area is approximately 0.5% when comparing 2010 traffic volumes from the Comox Transportation Study 2011 with counts conducted in 2017.

To be conservative a 1.0% growth rate (compounded annually) was used to develop the future background volumes.

2.3. Trip Generation

Project trip generation refers to the process for estimating the amount of vehicular traffic a development would add to the surrounding roadway system. For the specific project, the total amount of traffic entering and exiting the road system was calculated for the weekday AM and PM peak hours.

Peak hour trip generation estimates for the development were calculated using the *Trip Generation, 9th Edition, 2012*, Institute of Transportation Engineers (ITE). **Table 1** presents the ITE trip generate rates used and the estimated trips generated using these rates.

Table 1: Trip Generation Summary (Without Reductions)

Type	# of Units	Period	Trip Rate	In/Out Ratio		Trips		
				IN %	OUT %	IN	OUT	Total
Residential Condo / Townhouse (230)	45	AM	0.44	17	83	3	16	19
		PM	0.52	67	33	15	8	23

2.4. Trip Reductions

ITE trips are typically taken from suburban locations where access to transit and the tendency to walk / bike is low; therefore, generated trips are typically reduced to account for transit and walk / bike trips. The Comox Transportation Study 2011 states transit made up 1% of the mode share in 2006, with goals to increase this to 2.5% by Year 2030 and 3% by Year 2038. The development is within 500m of bus stops servicing a few routes (3, 4, and 34), which is slightly longer than typical for the catchment area for a bus stop (400m). Typically, only a 2.5% trip reduction would be applied; however, as part of the Transit Future Plan in the Comox Transportation Study, multiple transit exchanges are recommended, one of which is planned for downtown Comox. This new exchange (east side of Port Augusta Street just north of Comox Avenue) is scheduled to open in Fall 2018 and will link up with others throughout the area, becoming part of a frequent transit network. Research has shown that a residential development near a corridor with frequent transit service can be expected to see approximately a 5% transit mode share. Therefore, a 5% trip reduction was applied for the future horizons (years 2019, 2024 and 2039).

Additionally, the Comox Transportation Study 2011 states the community had a bike and walk mode share of approximately 9% in 2006. The Regional Growth Strategy seeks to increase this to 20% by 2030. As the development is within a kilometer of numerous businesses and Balmoral Avenue and other nearby streets are walk / bike friendly (the streets have sidewalks and are easily accessed by the development, etc.), a 10% trip reduction was applied.

Table 2 presents the vehicle trips generated by the proposed development after the above trip reductions were applied.

Table 2: Trip Generation Summary (With Reductions)

Type	Period	Trips with Reductions		
		IN	OUT	Total
Residential Condo / Townhouse (230)	AM	3	14	17
	PM	14	7	21

The proposed development is anticipated to generate 17 new vehicle trips (3 in / 14 out) during the AM peak hour and 21 new vehicle trips (14 in / 7 out) during the PM peak hour.

2.5. Trip Distribution

The trip distribution of traffic generated by the development was estimated based on the proximity of nearby arterial roads, businesses and residences. Most trips related to this development during peak hours will be commuting trips travelling towards major employment areas such North Island College, or the City of Courtenay.

When travelling to and from the development, most vehicles are expected to use Comox Avenue and Pritchard Road via Balmoral Avenue and Port Augusta Street. Therefore, the following trip distribution will be assumed:

- 50% to / from west along Comox Avenue
- 50% to / from north along Pritchard Road

The trip distribution assumptions are also shown in *Figure 3*.

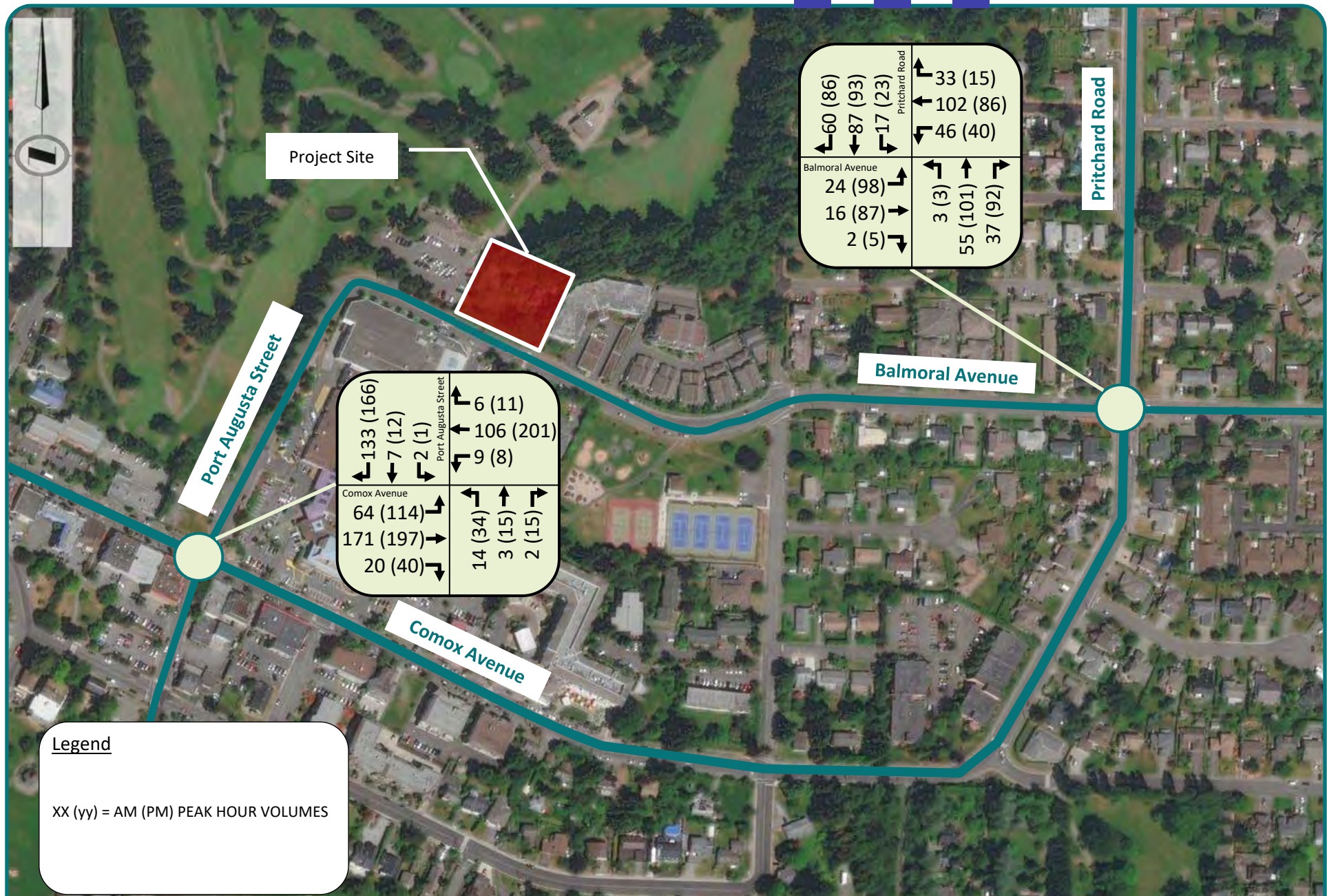
Figure 3: Trip Distribution



2.6. Future Traffic Volumes

To determine background traffic for Opening Day 2019 and Future Years 2024 and 2039, the 1.0% growth rate (compounded annually), discussed above, was applied to the existing traffic volumes at the study intersections. The future year AM and PM background peak hour traffic volumes are presented in *Figure 4*, *Figure 5*, and *Figure 6*.

The development trips estimated for the subject development (*Table 2*) were added to the background traffic for each of the study horizons. The future year AM and PM with project peak hour traffic volumes are presented in *Figure 7*, *Figure 8*, and *Figure 9*.

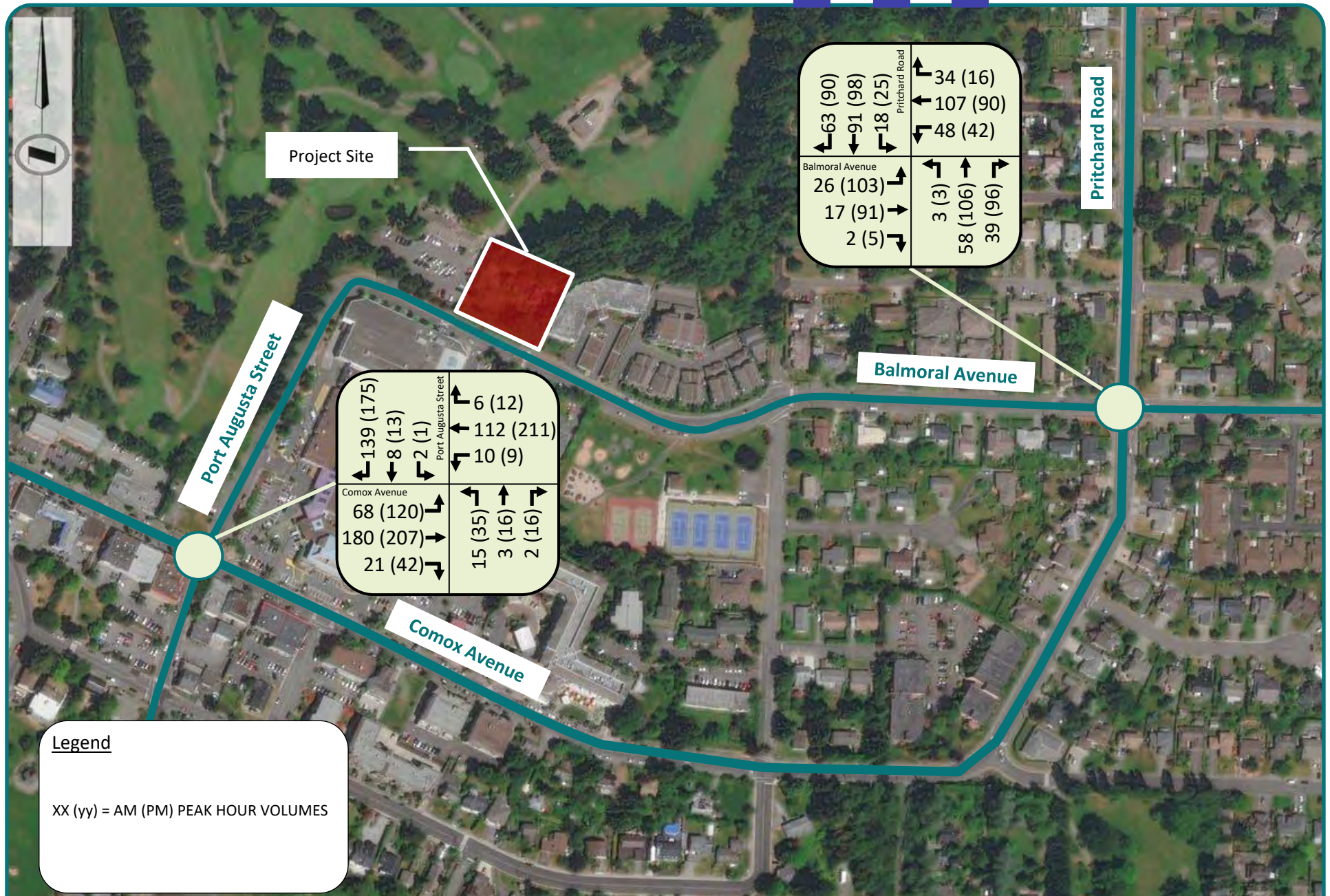


1700 Balmoral Multifamily Development - Traffic Impact Study
Opening Day (2019) Background AM and PM Peak Hour Volumes

A1

A2

A3



1700 Balmoral Multifamily Development - Traffic Impact Study

2024 Background AM and PM Peak Hour Volumes

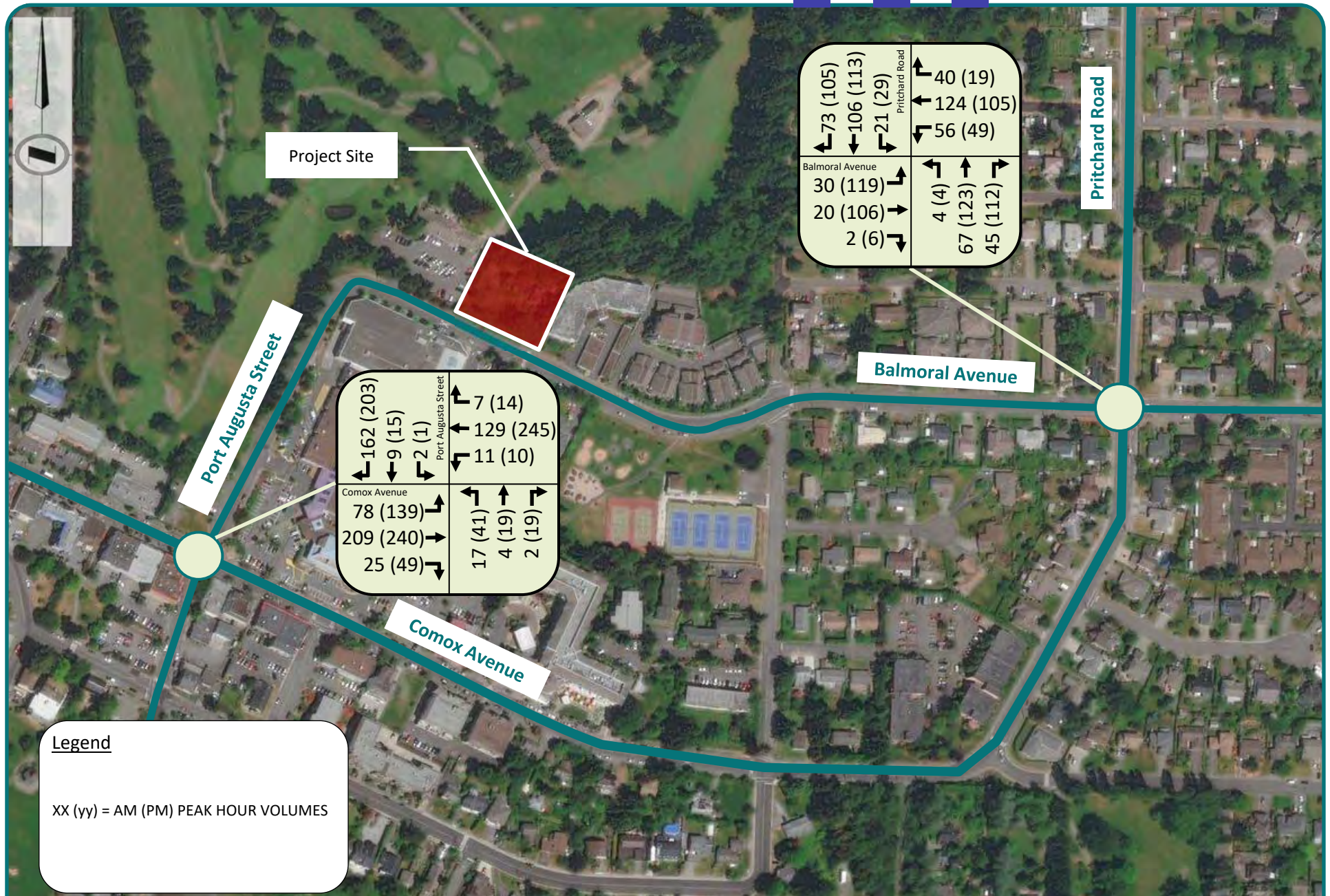
FIGURE 5

Not to Scale

A1

A2

A3



1700 Balmoral Multifamily Development - Traffic Impact Study

2039 Background AM and PM Peak Hour Volumes

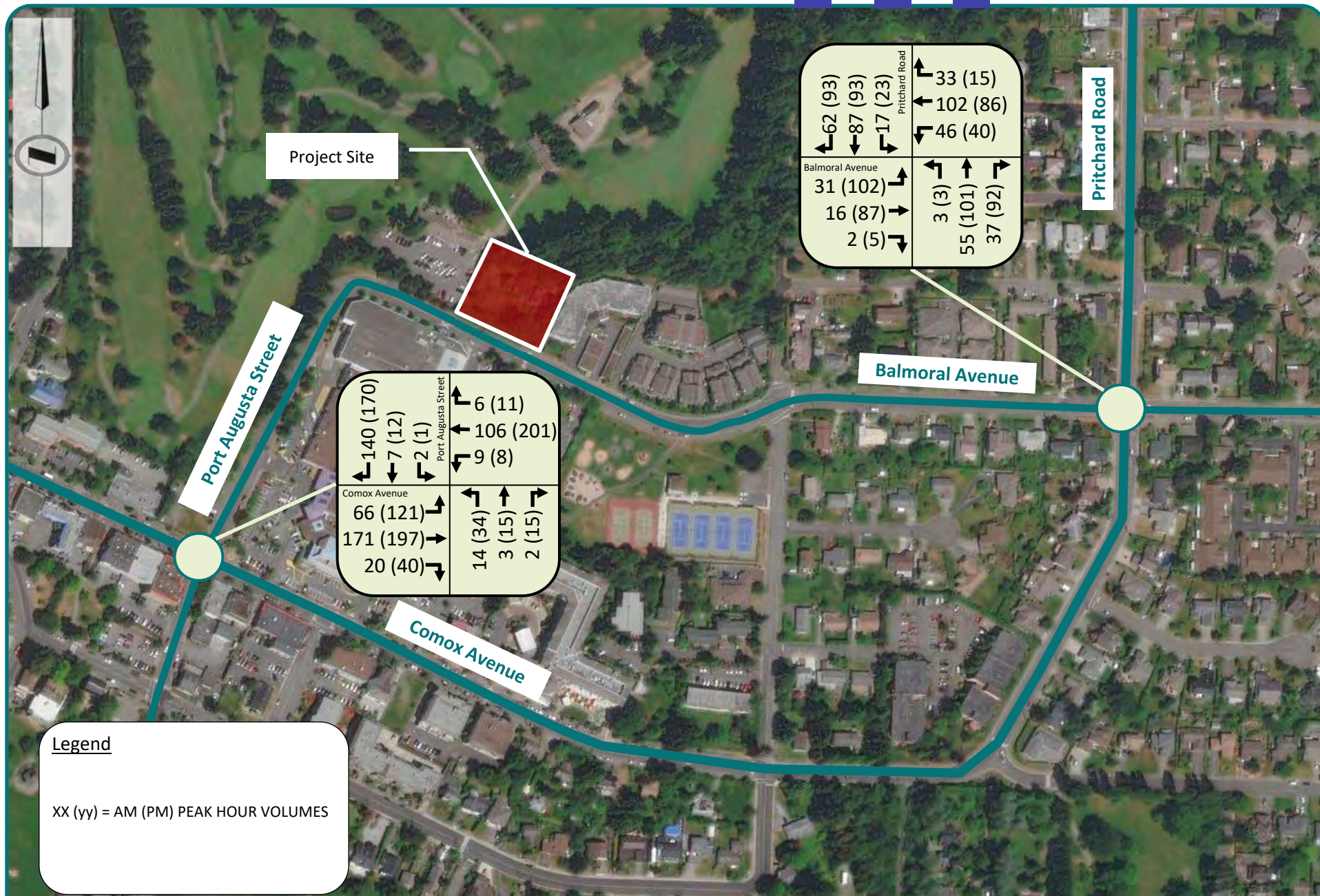
FIGURE 6

Not to Scale

A1

A2

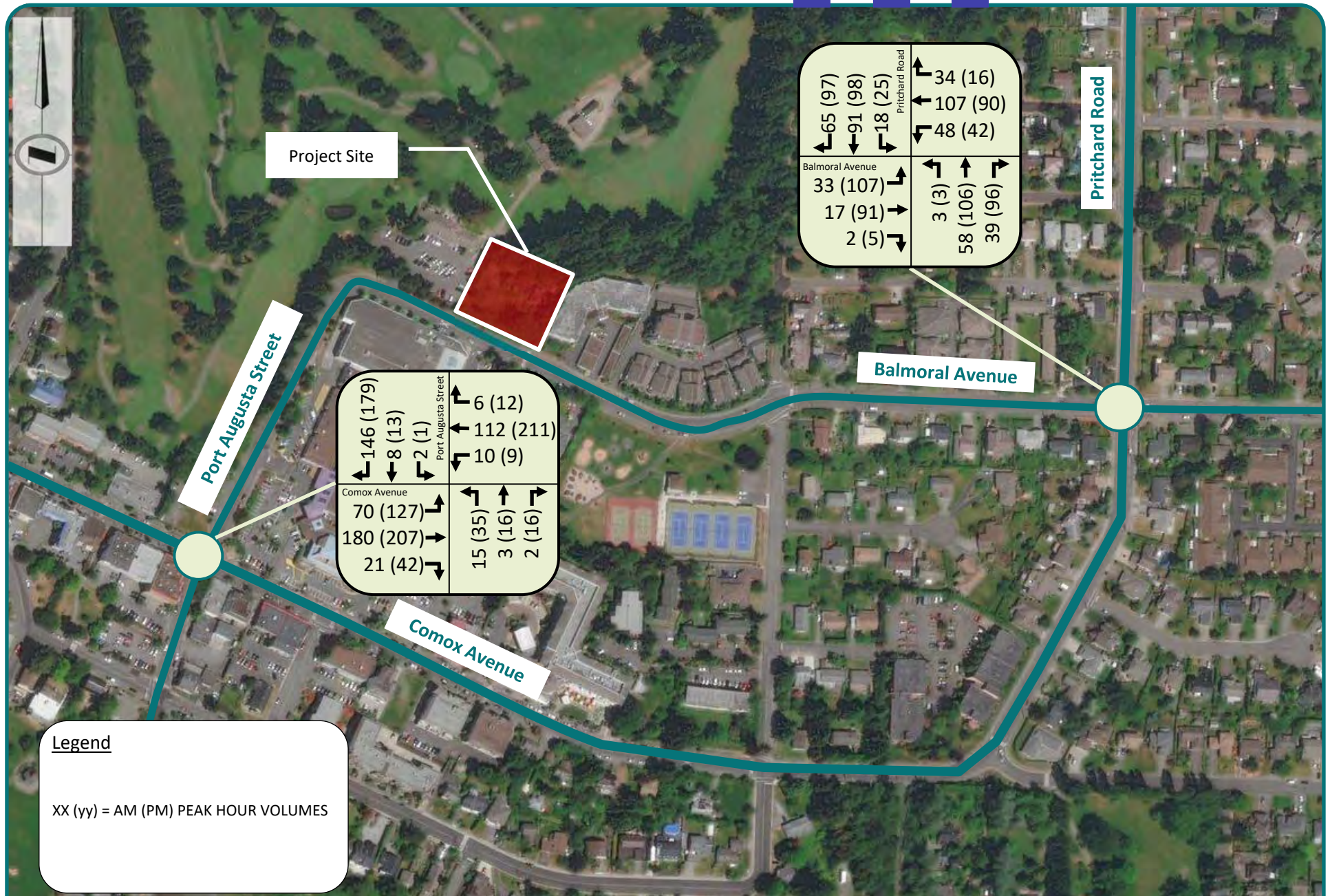
A3



1700 Balmoral Multifamily Development - Traffic Impact Study

Opening Day (2019) With Project AM and PM Peak Hour Volumes

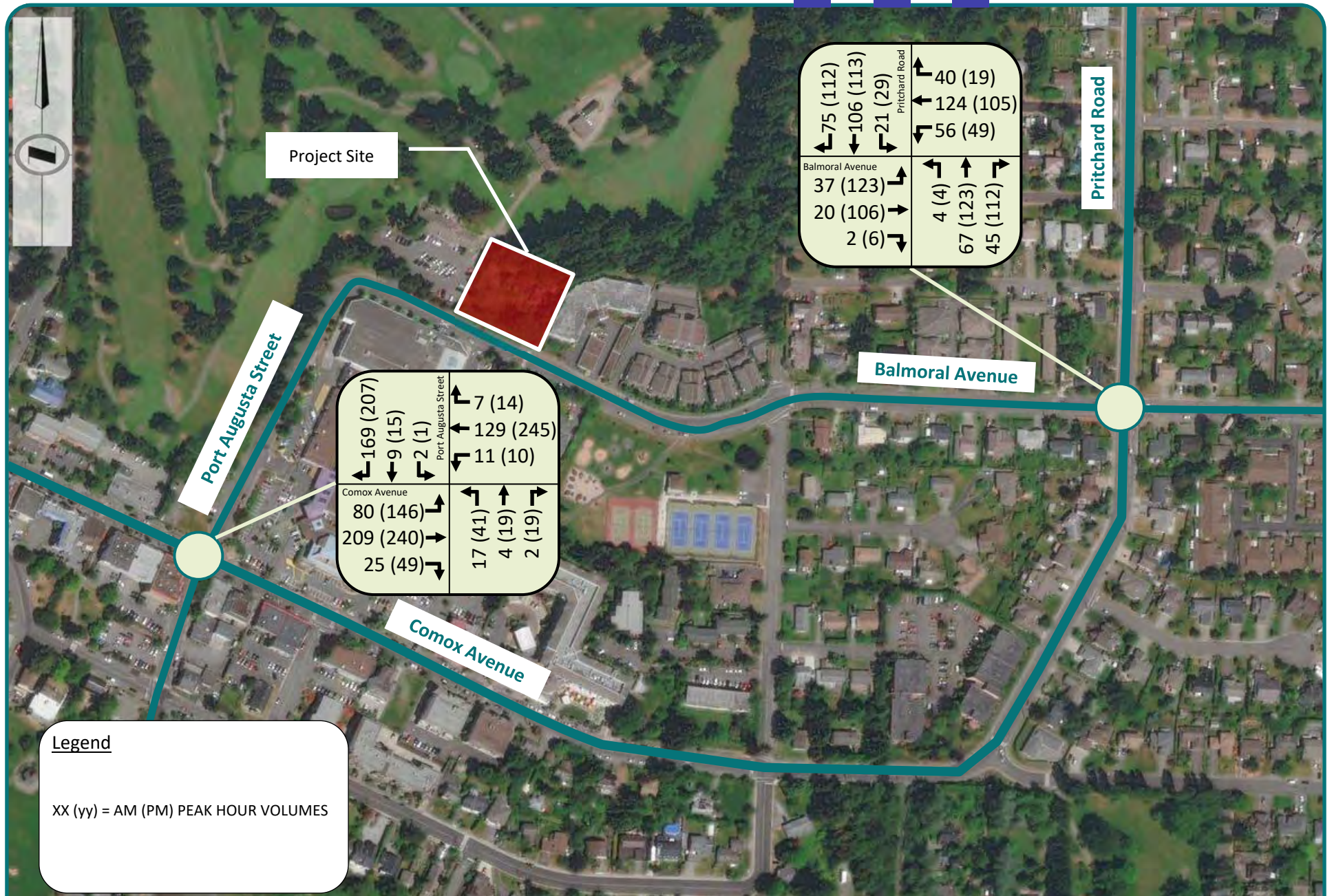
FIGURE 7



1700 Balmoral Multifamily Development - Traffic Impact Study

2024 With Project AM and PM Peak Hour Volumes

FIGURE 8



1700 Balmoral Multifamily Development - Traffic Impact Study

2039 With Project AM and PM Peak Hour Volumes

FIGURE 9



3. Traffic Operations Analysis

Traffic operations analysis was conducted for four scenarios:

- Existing Conditions (2017)
- Opening Day (2019)
- Future Horizon 2024
- Future Horizon 2039

All scenarios were analyzed for two time periods:

- AM weekday peak hour
- PM weekday peak hour

All future scenarios (2019, 2024 and 2039) were analyzed both with and without the addition of the proposed project.

3.1. Synchro Analysis Software

Synchro software, version 10.0, was used to report the level of service (LOS) and average delay at each of the study intersections. Synchro is a traffic software used to determine traffic conditions based on volumes, laning, and type of traffic control. Synchro calculates average delays and queue lengths for each movement at an intersection. Average delays are then translated into LOS. It should be noted Synchro results are calculated, and therefore are typically conservative compared to observed traffic flow, which is affected by driver behaviour. Detailed Synchro analysis reports can be found in [Appendix B](#).

3.2. Intersection Level of Service Criteria

Operations of roadway facilities are described in terms of Level of Service (LOS). LOS is a qualitative description of traffic flow based on factors such as speed, travel time, delay, and freedom to manoeuvre. Six service levels are defined, ranging from LOS A, the best operating conditions, to LOS F, the worst operating conditions. LOS E corresponds to “at or near capacity” operations. When volumes exceed capacity, it results in stop-and-go conditions, which is designated as LOS F. The delay thresholds and corresponding LOS are presented in [Table 3](#). The typical criterion for acceptable operation is LOS D. Therefore, any movement or intersection operating at LOS E or worse may require improvement.

Table 3: Intersection Level of Service Definitions

Level of Service	Delay Criteria (sec / veh)	Description
	Unsignalized Intersections ¹	
A	≤ 10	Represents free flow. Individual users are virtually unaffected by others in the traffic stream. Usually no conflicting traffic
B	> 10 to 15	Stable flow, but the presence of other users in the traffic stream begins to be noticeable. Occasionally some delay due to conflicting traffic
C	> 15 to 25	Stable flow, but the operation of individual users becomes significantly affected by interactions with others in the traffic stream. Delay is noticeable, but not inconveniencing.
D	> 25 to 35	Represents high-density, but stable flow. Delay is noticeable and irritating; increased likelihood of risk taking.
E	> 35 to 50	Represents operating conditions at or near the capacity level. Delay approaching tolerance levels; risk taking behaviour is likely.
F	> 50	Represents forced or breakdown flow. Delay exceeds tolerance level; high likelihood of risk taking.

Notes:

1. HCM 2010, Chapter 20 (all-way stop-controlled)

For unsignalized (all-way stop-controlled) intersections, the LOS calculations were conducted based on the method in the *Highway Capacity Manual 2010*. The LOS rating is based on the average delay expressed in seconds per vehicle. For controlled approaches composed of a single lane, the control delay is computed as the average of all movements in that lane.

3.3. Level of Service Results

Existing Conditions 2017

Existing condition analysis was conducted for each of the study intersections. A summary of the Existing Conditions (2017) intersection LOS results (intersection LOS, and movement LOS) can be found in [Table 4](#). The detailed results can be found in [Appendix B](#).

Table 4: Existing Conditions (2017) Intersection Level of Service Results

AM														
Intersection	Attribute	NBL	NBT	NBR	EBL	EBT	EBR	WBL	WBT	WBR	SBL	SBT	SBR	Overall
Port Augusta Street & Comox Avenue	V/C Ratio	0.03			0.12	0.31		0.02	0.19		0.21			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	9			9	10		9	9		9			9
	LOS	A			A	B		A	A		A			A
Pritchard Street & Balmoral Avenue	V/C Ratio	0.10		0.05	0.07			0.27			0.24			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	9		8	8			9			9			9
	LOS	A		A	A			A			A			A
PM														
Port Augusta Street & Comox Avenue	V/C Ratio	0.11			0.21	0.38		0.02	0.36		0.27			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	10			10	12		9	12		10			11
	LOS	A			B	B		A	B		A			B
Pritchard Street & Balmoral Avenue	V/C Ratio	0.17		0.13	0.28			0.21			0.29			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	10		8	10			10			10			10
	LOS	A		A	B			A			A			A

Note: Average Delay is given in seconds per vehicle. 95% Q = 95% queue length.

As shown in [Table 4](#), all intersections are expected to operate at LOS B or better for existing conditions (2017).

Opening Day (2019)

For Opening Day (2019) conditions, the analysis was conducted with background traffic only and with the inclusion of the proposed development. A summary of the Opening Day (2019) LOS results can be found in [Table 5](#). The detailed results can be found in [Appendix B](#).

Table 5: Opening Day (2019) Intersection Level of Service Results

Background														
AM														
Intersection	Attribute	NBL	NBT	NBR	EBL	EBT	EBR	WBL	WBT	WBR	SBL	SBT	SBR	Overall
Port Augusta Street & Comox Avenue	V/C Ratio	0.03			0.12	0.32		0.02	0.20		0.21			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	9			9	10		9	9		9			9
	LOS	A			A	B		A	A		A			A
Pritchard Street & Balmoral Avenue	V/C Ratio	0.10		0.06	0.07			0.27			0.24			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	9		8	8			9			9			9
	LOS	A		A	A			A			A			A
PM														
Port Augusta Street & Comox Avenue	V/C Ratio	0.11			0.21	0.39		0.02	0.37		0.28			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	10			10	12		9	12		10			11
	LOS	A			B	B		A	B		B			B
Pritchard Street & Balmoral Avenue	V/C Ratio	0.17		0.13	0.29			0.22			0.29			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	10		9	11			10			10			10
	LOS	A		A	B			A			B			A
Combined														
AM														
Intersection	Attribute	NBL	NBT	NBR	EBL	EBT	EBR	WBL	WBT	WBR	SBL	SBT	SBR	Overall
Port Augusta Street & Comox Avenue	V/C Ratio	0.03			0.13	0.32		0.02	0.20		0.22			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	9			9	10		9	9		9			9
	LOS	A			A	B		A	A		A			A
Pritchard Street & Balmoral Avenue	V/C Ratio	0.10		0.06	0.08			0.27			0.25			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	9		8	9			9			9			9
	LOS	A		A	A			A			A			A
PM														
Port Augusta Street & Comox Avenue	V/C Ratio	0.12			0.23	0.40		0.02	0.37		0.29			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	10			11	12		9	12		10			11
	LOS	A			B	B		A	B		B			B
Pritchard Street & Balmoral Avenue	V/C Ratio	0.17		0.14	0.30			0.22			0.31			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	10		9	11			10			10			10
	LOS	A		A	B			A			B			A

Note: Average Delay is given in seconds per vehicle. 95% Q = 95% queue length.

Table 5 shows that all intersections are expected to operate at LOS B or better, overall, for both background and with project conditions. With the addition of project traffic, overall intersection delay is expected to increase minimally (<1 sec) when compared to background traffic conditions.

Future Horizon 2024

As in Year 2019, for future 2024 conditions, the analysis was conducted without and with the inclusion of the proposed development. A summary of the Opening Day (2024) LOS results can be found in [Table 6](#). The detailed results can be found in [Appendix B](#).

Table 6: 2024 Intersection Level of Service Results

Background														
AM														
Intersection	Attribute	NBL	NBT	NBR	EBL	EBT	EBR	WBL	WBT	WBR	SBL	SBT	SBR	Overall
Port Augusta Street & Comox Avenue	V/C Ratio	0.04			0.13	0.34		0.02	0.21		0.23			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	9			9	10		9	9		9			10
	LOS	A			A	B		A	A		A			A
Pritchard Street & Balmoral Avenue	V/C Ratio	0.11		0.06	0.07			0.29			0.26			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	9		8	9			10			9			9
	LOS	A		A	A			A			A			A
PM														
Port Augusta Street & Comox Avenue	V/C Ratio	0.12			0.23	0.42		0.02	0.40		0.30			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	10			11	12		9	12		10			11
	LOS	A			B	B		A	B		B			B
Pritchard Street & Balmoral Avenue	V/C Ratio	0.18		0.14	0.31			0.23			0.32			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	10		9	11			10			11			10
	LOS	A		A	B			A			B			B
Combined														
AM														
Intersection	Attribute	NBL	NBT	NBR	EBL	EBT	EBR	WBL	WBT	WBR	SBL	SBT	SBR	Overall
Port Augusta Street & Comox Avenue	V/C Ratio	0.04			0.13	0.34		0.02	0.21		0.24			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	9			9	11		9	10		9			10
	LOS	A			A	B		A	A		A			A
Pritchard Street & Balmoral Avenue	V/C Ratio	0.11		0.06	0.09			0.29			0.26			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	9		8	9			10			9			9
	LOS	A		A	A			A			A			A
PM														
Port Augusta Street & Comox Avenue	V/C Ratio	0.12			0.24	0.42		0.02	0.40		0.31			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	10			11	12		9	12		11			12
	LOS	A			B	B		A	B		B			B
Pritchard Street & Balmoral Avenue	V/C Ratio	0.19		0.14	0.32			0.23			0.33			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	10		9	11			10			11			10
	LOS	A		A	B			B			B			B

Note: Average Delay is given in seconds per vehicle. 95% Q = 95% queue length.

Table 6 shows that all intersections are expected to operate at LOS B or better, overall, for both background and with project conditions. In 2024, with project traffic is expected to increase the overall intersection delay minimally (~1 sec) when compared to background traffic conditions.

Future Horizon 2039

For future year 2039 conditions, the analysis was conducted without and with the inclusion of the proposed development. A summary of the Opening Day (2039) LOS results can be found in *Table 7*. The detailed results can be found in *Appendix B*.

Table 7: 2039 Intersection Level of Service Results

Background														
AM														
Intersection	Attribute	NBL	NBT	NBR	EBL	EBT	EBR	WBL	WBT	WBR	SBL	SBT	SBR	Overall
Port Augusta Street & Comox Avenue	V/C Ratio	0.04			0.15	0.41		0.02	0.25		0.27			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	9			10	12		9	10		10			10
	LOS	A			A	B		A	A		A			B
Pritchard Street & Balmoral Avenue	V/C Ratio	0.13		0.07	0.09			0.35			0.31			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	9		8	9			10			10			10
	LOS	A		A	A			B			A			A
PM														
Port Augusta Street & Comox Avenue	V/C Ratio	0.16			0.27	0.51		0.02	0.49		0.37			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	11			12	15		10	15		12			13
	LOS	B			B	B		A	B		B			B
Pritchard Street & Balmoral Avenue	V/C Ratio	0.23		0.18	0.38			0.29			0.39			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	11		9	12			11			12			11
	LOS	B		A	B			B			B			B
Combined														
AM														
Intersection	Attribute	NBL	NBT	NBR	EBL	EBT	EBR	WBL	WBT	WBR	SBL	SBT	SBR	Overall
Port Augusta Street & Comox Avenue	V/C Ratio	0.04			0.16	0.41		0.02	0.25		0.28			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	9			10	12		9	10		10			10
	LOS	A			A	B		A	B		A			B
Pritchard Street & Balmoral Avenue	V/C Ratio	0.13		0.07	0.10			0.35			0.32			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	9		8	9			11			10			10
	LOS	A		A	A			B			B			A
PM														
Port Augusta Street & Comox Avenue	V/C Ratio	0.16			0.29	0.52		0.02	0.49		0.38			
	95 % Q (m)	<5			<5	<5		<5	<5		<5			
	Delay	11			12	15		10	15		12			13
	LOS	B			B	B		A	B		B			B
Pritchard Street & Balmoral Avenue	V/C Ratio	0.23		0.18	0.39			0.29			0.40			
	95 % Q (m)	<5		<5	<5			<5			<5			
	Delay	11		9	12			11			12			11
	LOS	B		A	B			B			B			B

Note: Average Delay is given in seconds per vehicle. 95% Q = 95% queue length.

Table 7 shows that all intersections are expected to operate at LOS B or better, overall, for both background and with project conditions. In 2039, the addition of project traffic is expected to increase the overall intersection delay less than 1 sec when compared to the background traffic conditions.

4. Transit

Along Comox Avenue, there are multiple bus stops within 500m of the proposed development. These stops are serviced by the following routes:

- 3 – Comox via Ryan & Lerwick
- 4 – Comox via Comox Road
- 34 – C2C Express

Routes 3 and 4 are local services which connects downtown Comox, downtown Courtenay, and North Island College. Depending on the time of day, transit headways for these services are 30 minutes to 1 hour.

Route 34 is an express service which connects downtown Comox and downtown Courtenay. This service only operates during AM and PM peak periods. When operating, transit headways are approximately 30 minutes.

BC Transit has proposed several improvements for the transit system in Comox Valley. In the short term, the 2014 Comox Valley Transit Future Plan states that bus frequency is expected to increase for routes 1, 3 and 4. Additionally, by September 2018 multiple new transit exchanges in Comox Valley (one of which is in downtown Comox) are expected to open. In the long term, it is expected there will be an increase in bus frequency and a wider range of service times for other bus routes throughout Comox Valley. With additional transit exchanges, shorter headways, and increased bus service, ridership is expected to increase.

5. Balmoral Avenue Assessment

Local residents have expressed concerns related to road safety along Balmoral Avenue. To address this, a high-level safety assessment was completed as part of this report. The following two topics were reviewed:

- Access and egress to 1700 Balmoral Avenue, 1646 Balmoral Avenue, and 1686 Balmoral Avenue
- Speed

5.1. Site Access

The proposed development at 1700 Balmoral Avenue is expected to have one site access on the southeast corner of the site (*Appendix C*).

The site access is proposed to be via an underground garage with a ramp at an 8% grade. There is sidewalk across the frontage of the site, as well as a pedestrian crosswalk just east of the site. Vehicles exiting the garage have an obstructed view of pedestrians crossing the access as well as crossing the street. Consideration maybe made for moving the crosswalk to the west (to the commercial driveway) to reduce the potential conflict with pedestrians crossing at the driveway exit.

The *Geometric Design Guide for Canadian Roads*, Transportation Association of Canada (TAC), 2017, sections 8.8 and 8.9 provide recommended intersection and driveway spacing for an urban collector road (which Balmoral Avenue would be considered). Based on Figure 8.9.2 of the TAC Manual, driveway spacing on a collector road should be a minimum of 1.0m for low volume driveways, such as the access for 1700 Balmoral Avenue. Access spacing between 1700 and 1686 Balmoral Avenue is approximately 30m, which meets TAC guidelines. The distance between the 1686 Balmoral Avenue exiting and entering driveways is 15m, and 10m between the 1686 exiting driveway and 1646 Balmoral Avenue driveway. The access spacing between these sites also meet the TAC guidelines.

5.2. Speed

Balmoral Avenue has a posted speed limit of 50 km/hr, except near Anderton Park, where the posted speed limit is 30km/hr from dusk to dawn.

Speed data was collected in June and July of 2017 at 1718 Balmoral Avenue and 1615 Balmoral Avenue. At these locations the 85th percentile operating speed is approximately 50km/hr, with the 95th percentile operating speed is 55km/hr.

TAC defines the posted speed as a speed limitation introduced for reason of safety, economy, traffic control, etc. It is meant to encourage drivers to travel at an appropriate speed for the surrounding conditions. In TAC, operating speed refers to the 85th percentile speed of vehicles at a time when traffic volumes are low, and drivers are free to choose the speed at which they travel.

If the operating speed is above the posted speed, especially by a large margin, this could lead to unsafe conditions. The roadway character may not be accommodating of the higher speeds or the speed differential between vehicles traveling at the posted and those at operating could lead to driver frustration or more severe collisions. To address the higher speeds, either the posted speed would need to be increased (if warranted) or forms of traffic calming (bulb-outs, raised crosswalks, speed humps, speed radar boards, etc.) could be considered to reduce speeds.

At both locations where speed data was collected, the 85th percentile operating speed is similar to the posted speed limit, indicating vehicle speeds are appropriate for the posted speed. If speeding is found to be an issue in the future, additional signage could be installed (larger 30km/h sign, speed board, etc.) or more aggressive measures (bulb-outs, speed humps, raised crosswalk, etc.) could be taken to reduce speeds along Balmoral Avenue.

6. Conclusions and Recommendations

6.1. Background

The purpose of this letter report is to review traffic operations for the proposed Balmoral Avenue residential development in Comox, BC. This study evaluates the AM and PM weekday peak hours for Existing Conditions (2017), Opening Day (2019), and future horizon years 2024 and 2039.

The proposed project is located in Comox, British Columbia, and will consist of 45 condominium units. The site is north of Balmoral Avenue, east of Port Augusta and west of Stewart Street.

6.2. Traffic Growth

The annual compounded growth rate within the study area is approximately 0.5% when comparing 2010 traffic volumes from the Comox Transportation Study 2011 with counts conducted in 2017. To be conservative a 1.0% growth rate (compounded annually) was used to develop the future background volumes.

The proposed development is anticipated to generate 17 new vehicle trips (3 in / 14 out) during the AM peak hour and 21 new vehicle trips (14 in / 7 out) during the PM peak hour.

6.3. Traffic Analysis

Operations analysis was conducted using Synchro software, version 10.0, to determine level of service and average delay at the study intersections.

On Opening Day (2019) and future horizon years 2024 and 2039, all study intersections are expected to operate at LOS B or better, overall for both background and with project conditions.

6.4. Balmoral Avenue Assessment

A high-level assessment related to access spacing and speeding was completed for the Balmoral Avenue. Access spacing for the proposed development and speeding were not found to be issues along Balmoral Avenue.

6.5. Recommendations

Traffic calming measures such as additional signage, speed board, speed humps, raised crosswalks, etc. should be considered if speeding along Balmoral Avenue is determined to be an issue in the future.

The land identified as 1700 Balmoral Avenue may be safely used for its intended use as a residential development, provided that it is used in accordance with the conditions and recommendations specified in this report.

The information within this report is true and accurate to the best of our knowledge. If you have any questions or concerns regarding this analysis, please contact the undersigned.

McELHANNEY CONSULTING SERVICES LTD.

Prepared by:



Cameron Perkin, EIT

Transportation Engineer

Traffic & Road Safety

email: cperkin@mcelhanney.com

Reviewed by:

Joel Rabinovitz, P. Eng., P.E.

Senior Traffic Engineer

Traffic & Road Safety

email: jrabinovitz@mcelhanney.com



APPENDIX A – TRAFFIC COUNT SHEETS

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

All Vehicles

Passenger Cars + Light Trucks + Heavy Trucks

Location:

N/S Street Pritchard Road
E/W Street Balmoral Avenue

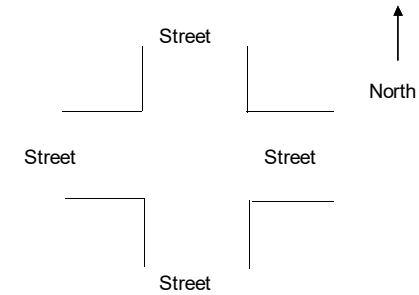
Comox, BC

Job # 2211-47436-00

Date: Wednesday
Day 4-Oct-17
Date

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min	1 hour
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right	Totals	Totals
AM														
7:00 - 7:15	0	0	3	5	8	4	3	8	2	2	1	0	36	
- 7:30	1	4	3	3	2	5	6	5	3	2	3	0	37	
- 7:45	0	4	5	4	7	7	3	17	2	4	3	0	56	
- 8:00	2	11	6	0	23	16	10	19	4	4	1	1	97	226
8:00 - 8:15	1	11	8	5	8	7	12	18	6	6	3	0	85	
- 8:30	0	14	10	2	20	16	6	30	12	2	3	1	116	
- 8:45	1	18	10	6	22	19	11	26	11	5	8	1	138	
- 9:00	1	11	8	4	35	17	16	26	3	11	2	0	134	473
9:00 - 9:15	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 9:30	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 9:45	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 10:00	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Midday														
11:00 - 11:15	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 11:30	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 11:45	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 12:00	0	0	0	0	0	0	0	0	0	0	0	0	0	0
12:00 - 12:15	0	0	0	0	0	0	0	0	0	0	0	0	0	0
- 12:30	0	0	0	0	0	0	0	0	0	0	0	0	0	0
- 12:45	0	0	0	0	0	0	0	0	0	0	0	0	0	0
- 1:00	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM														
3:00 - 3:15	0	19	23	5	11	25	11	21	7	19	14	1	156	
- 3:30	1	27	27	8	25	22	8	22	3	24	15	3	185	
- 3:45	1	22	18	3	29	21	12	23	3	28	25	1	186	
- 4:00	1	23	16	7	22	23	9	24	5	17	23	0	170	697
4:00 - 4:15	0	27	29	5	15	18	10	15	4	27	22	1	173	
- 4:30	0	21	31	5	22	21	9	16	5	27	15	2	174	
- 4:45	0	36	21	4	24	24	7	14	3	27	14	1	175	
- 5:00	0	27	19	5	18	21	13	20	11	26	20	2	182	704
5:00 - 5:15	1	25	22	10	10	17	10	13	6	23	20	0	157	
- 5:30	2	13	32	6	10	15	12	22	5	15	22	1	155	
- 5:45	0	11	23	6	16	12	2	19	5	16	14	0	124	
- 6:00	0	19	17	3	17	22	14	16	1	11	10	0	130	566
PEAK HOUR SUMMARY														
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	#DIV/0! #DIV/0! #DIV/0! #DIV/0!
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	#DIV/0! #DIV/0! #DIV/0! #DIV/0!
PM peak hour	0	111	100	19	79	84	39	65	23	107	71	6	704	98.6% 1.3% 0.1% 100%

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Passenger Cars

Location:

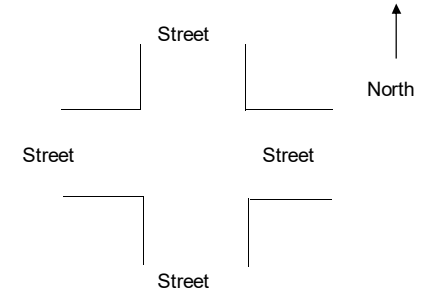
N/S Street Pritchard Road
E/W Street Balmoral Avenue
Comox, BC

Job # **2211-47436-00**

Date:
Day Wednesday
Date 4-Oct-17

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min Totals	1 hour Totals
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right		
AM														
7:00 - 7:15			2	4	8	4	2	8	1	2	1		32	
- 7:30		4	2	3	2	5	6	5	3	1	3		34	
- 7:45		4	5	3	7	7	3	17	1	4	3		54	
- 8:00	1	11	5		23	15	9	19	3	3	1	1	91	211
8:00 - 8:15		8	8	5	8	7	11	18	6	6	3		80	
- 8:30		14	7	2	19	15	6	30	12	2	3		110	
- 8:45	1	17	8	6	22	19	11	26	11	5	8		134	
- 9:00		11	8	4	35	17	16	26	2	10	2		131	455
9:00 - 9:15													0	
- 9:30													0	
- 9:45													0	
- 10:00													0	0
Midday														
11:00 - 11:15													0	
- 11:30													0	
- 11:45													0	
- 12:00													0	0
12:00 - 12:15													0	0
- 12:30													0	0
- 12:45													0	0
- 1:00													0	0
PM														
3:00 - 3:15		19	23	4	11	25	11	21	6	19	14	1	154	
- 3:30	1	26	27	8	25	22	8	21	3	24	15	2	182	
- 3:45	1	22	17	3	29	20	10	23	3	26	25	1	180	
- 4:00	1	23	16	7	22	23	8	24	5	16	23		168	684
4:00 - 4:15		26	28	5	15	18	9	14	4	27	22		168	
- 4:30		21	30	5	22	21	9	16	5	27	15	2	173	
- 4:45		36	21	4	24	24	6	14	3	27	14		173	
- 5:00		27	18	5	18	21	13	19	11	26	20	2	180	694
5:00 - 5:15	1	25	22	10	10	17	9	13	6	23	20		156	
- 5:30	2	13	31	6	10	15	12	22	5	15	22	1	154	
- 5:45		11	22	6	16	12	2	18	5	16	14		122	
- 6:00		19	17	3	17	22	14	16	1	11	10		130	562
PEAK HOUR SUMMARY ¹:														
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	Hourly Traffic	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM peak hour	0	110	97	19	79	84	37	63	23	107	71	4	694	

¹: Peak hour volume based on peak hour of All Vehicles

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Light Trucks

Location:

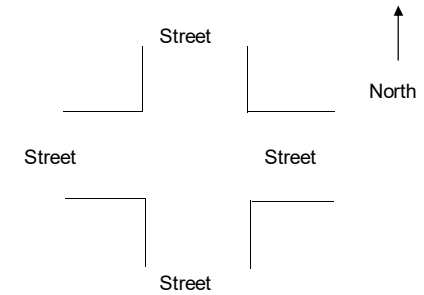
N/S Street Pritchard Road
E/W Street Balmoral Avenue
Comox, BC

Job # **2211-47436-00**

Date:
Day Wednesday
Date 4-Oct-17

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min Totals	1 hour Totals
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right		
AM														
7:00 - 7:15			1				1		1				3	
- 7:30	1		1							1			3	
- 7:45				1					1				2	
- 8:00			1			1	1		1	1			5	13
8:00 - 8:15	1	3					1						5	
- 8:30			3		1	1						1	6	
- 8:45		1	2										3	
- 9:00	1								1	1			3	17
9:00 - 9:15													0	
- 9:30													0	
- 9:45													0	
- 10:00													0	0
Midday														
11:00 - 11:15													0	
- 11:30													0	
- 11:45													0	
- 12:00													0	0
12:00 - 12:15													0	0
- 12:30													0	0
- 12:45													0	0
- 1:00													0	0
PM														
3:00 - 3:15				1					1				2	
- 3:30		1						1				1	3	
- 3:45			1							2			5	
- 4:00							2			1			1	11
4:00 - 4:15		1	1				1	1					4	
- 4:30			1										1	
- 4:45							1					1	2	
- 5:00			1					1					2	9
5:00 - 5:15							1						1	
- 5:30			1										1	
- 5:45			1					1					2	
- 6:00													0	4
PEAK HOUR SUMMARY ¹:														
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	Hourly Traffic	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0		
PM peak hour	0	1	3	0	0	0	2	2	0	0	0	1		

¹: Peak hour volume based on peak hour of All Vehicles

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Heavy Trucks

Location:

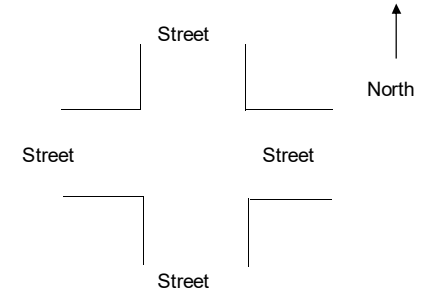
N/S Street Pritchard Road
E/W Street Balmoral Avenue
Comox, BC

Job # 2211-47436-00

Date: Wednesday
Day 4-Oct-17
Date

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min	1 hour
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right	Totals	Totals
AM														
7:00 - 7:15				1									1	
- 7:30													0	
- 7:45													0	
- 8:00	1												1	2
8:00 - 8:15													0	
- 8:30													0	
- 8:45												1	1	
- 9:00													0	1
9:00 - 9:15													0	
- 9:30													0	
- 9:45													0	
- 10:00													0	0
Midday														
11:00 - 11:15													0	
- 11:30													0	
- 11:45													0	
- 12:00													0	0
12:00 - 12:15													0	0
- 12:30													0	0
- 12:45													0	0
- 1:00													0	0
PM														
3:00 - 3:15													0	
- 3:30													0	
- 3:45						1							1	
- 4:00										1			1	2
4:00 - 4:15												1	1	
- 4:30													0	
- 4:45													0	
- 5:00													0	1
5:00 - 5:15													0	
- 5:30													0	
- 5:45													0	
- 6:00													0	0
PEAK HOUR SUMMARY ¹:													Hourly Traffic	
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM peak hour	0	0	0	0	0	0	0	0	0	0	0	1	1	

¹: Peak hour volume based on peak hour of All Vehicles

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Pedestrian

Location:

N/S Street
E/W Street
Comox, BC

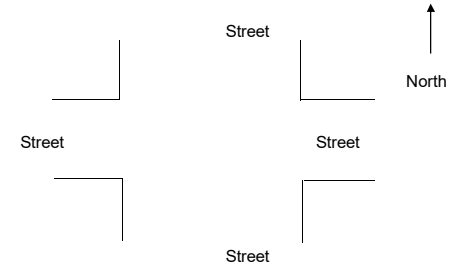
Pritchard Road
Balmoral Avenue

Job # **2211-47436-00**

Date:

Day Wednesday
Date 4-Oct-17

Weather:

AM:**Mid:****PM:**

Time	South Leg				North Leg				East Leg				West Leg				15min	1 hour
	Child	AO	Senior	Disabled	Child	AO	Senior	Disabled	Child	AO	Senior	Disabled	Child	AO	Senior	Disabled	Totals	Totals
AM																		
7:00 - 7:15																	0	
- 7:30		1				1				1				1			4	
- 7:45		1				2					1			1			5	
- 8:00						1				1							2	11
8:00 - 8:15														1			1	
- 8:30														1			1	
- 8:45						2	1				4			1			8	
- 9:00			1										1	1	2		5	15
9:00 - 9:15																	0	
- 9:30																	0	
- 9:45																	0	
- 10:00																	0	0
Midday																		
11:00 - 11:15																	0	
- 11:30																	0	
- 11:45																	0	
- 12:00																	0	0
12:00 - 12:15																	0	0
- 12:30																	0	0
- 12:45																	0	0
- 1:00																	0	0
PM																		
3:00 - 3:15										1							1	
- 3:30																	0	
- 3:45						2				1	2				1		6	
- 4:00		3								1	1				1		6	13
4:00 - 4:15		5	1								1			2			9	
- 4:30		2									2				3		7	
- 4:45										2	1						3	
- 5:00		1								1	1			2			5	24
5:00 - 5:15										2				2			4	
- 5:30	1					1									2		4	
- 5:45		1													1		2	
- 6:00		1		1			1								1		4	14
PEAK HOUR SUMMARY ¹																		
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM peak hour	0	8	1	0	0	0	0	0	0	3	5	0	0	4	3	0	24	

¹ Peak hour volume based on peak hour of All Vehicles

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Bicyclist

Location:

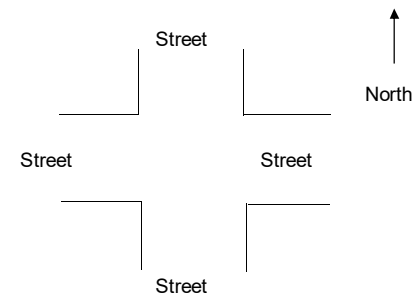
N/S Street Pritchard Road
E/W Street Balmoral Avenue
Comox, BC

Job # **2211-47436-00**

Date:
Day Wednesday
Date 4-Oct-17

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min	1 hour
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right	Totals	Totals
AM														
7:00 - 7:15													0	
- 7:30								1					1	
- 7:45				1			1						2	
- 8:00					1			1					2	5
8:00 - 8:15		1					1		1				3	
- 8:30								4					4	
- 8:45		1			2				1	1			5	
- 9:00		2							1				3	15
9:00 - 9:15													0	
- 9:30													0	
- 9:45													0	
- 10:00													0	0
Midday														
11:00 - 11:15													0	
- 11:30													0	
- 11:45													0	
- 12:00													0	0
12:00 - 12:15													0	0
- 12:30													0	0
- 12:45													0	0
- 1:00													0	0
PM														
3:00 - 3:15													0	
- 3:30			1		1								2	
- 3:45		1			3	1							5	
- 4:00						1							1	8
4:00 - 4:15						1					1		2	
- 4:30				1		1		1		1	1		5	
- 4:45					1					1	1		3	
- 5:00					3			1					4	14
5:00 - 5:15		1	1	2	3			2			1		10	
- 5:30			3		3			1			1		8	
- 5:45								2			1		3	
- 6:00			1					1			2		4	25
PEAK HOUR SUMMARY ¹:														
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM peak hour	0	0	0	1	4	2	0	2	0	2	3	0	14	

¹ Peak hour volume based on peak hour of All Vehicles

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

All Vehicles

Passenger Cars + Light Trucks + Heavy Trucks

Location:

N/S Street Port Augusta
E/W Street Comox Avenue

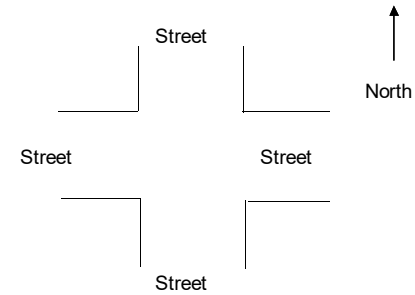
Comox, BC

Job # 2211-47436-00

Date: Wednesday
Day 4-Oct-17
Date

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min	1 hour
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right	Totals	Totals
AM														
7:00 - 7:15	0	0	0	1	1	6	1	8	0	3	16	2	38	
- 7:30	0	0	0	0	1	8	2	16	0	8	33	2	70	
- 7:45	3	0	1	0	1	20	0	11	1	8	27	0	72	
- 8:00	3	2	1	2	1	29	2	19	0	13	53	9	134	314
8:00 - 8:15	3	0	0	1	3	17	0	23	1	10	27	1	86	
- 8:30	6	0	1	1	1	35	1	27	2	18	37	3	132	
- 8:45	2	1	1	0	0	48	5	24	1	18	51	7	158	
- 9:00	3	2	0	0	3	30	3	30	2	17	53	9	152	528
9:00 - 9:15	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 9:30	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 9:45	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 10:00	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Midday														
11:00 - 11:15	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 11:30	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 11:45	0	0	0	0	0	0	0	0	0	0	0	0	0	
- 12:00	0	0	0	0	0	0	0	0	0	0	0	0	0	0
12:00 - 12:15	0	0	0	0	0	0	0	0	0	0	0	0	0	0
- 12:30	0	0	0	0	0	0	0	0	0	0	0	0	0	0
- 12:45	0	0	0	0	0	0	0	0	0	0	0	0	0	0
- 1:00	0	0	0	0	0	0	0	0	0	0	0	0	0	0
PM														
3:00 - 3:15	13	7	4	0	3	38	0	44	1	19	53	8	190	
- 3:30	10	3	3	0	2	51	1	53	4	30	49	14	220	
- 3:45	9	1	2	1	4	48	4	55	2	29	49	7	211	
- 4:00	6	6	6	0	1	34	2	34	1	23	51	6	170	791
4:00 - 4:15	8	5	4	0	5	30	1	55	4	30	44	12	198	
- 4:30	9	2	2	0	3	30	1	56	0	29	52	6	190	
- 4:45	9	2	4	1	2	50	1	53	1	26	53	2	204	
- 5:00	11	2	3	1	1	34	2	49	1	17	51	5	177	769
5:00 - 5:15	10	0	5	0	4	36	1	32	0	27	51	6	172	
- 5:30	6	2	3	1	2	32	6	27	1	22	47	8	157	
- 5:45	7	1	1	0	2	26	2	29	0	10	40	8	126	
- 6:00	6	1	4	0	7	19	7	29	0	13	53	12	151	606
PEAK HOUR SUMMARY														
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	#DIV/0! #DIV/0! #DIV/0! #DIV/0!
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	#DIV/0! #DIV/0! #DIV/0! #DIV/0!
PM peak hour	37	11	13	2	11	144	5	213	6	102	200	25	769	98.2% 1.3% 0.5% 100%

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Passenger Cars

Location:

N/S Street Port Augusta
E/W Street Comox Road

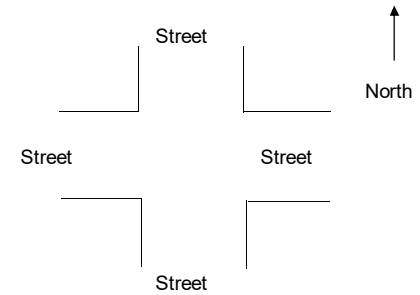
Comox, BC

Job # 2211-47436-00

Date: Wednesday
Day Date 4-Oct-17

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min Totals	1 hour Totals
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right		
AM														
7:00 - 7:15				1	1	6	1	8		3	16	1	37	
- 7:30					1	8	2	14		7	28	2	62	
- 7:45	3		1		1	19		8	1	8	25		66	
- 8:00	3	2	1	2	1	29	2	18		13	52	9	132	297
8:00 - 8:15	3			1	3	17		23	1	9	22	1	80	
- 8:30	6		1	1	1	34	1	23	1	17	34	3	122	
- 8:45	1	1	1			47	5	23	1	18	45	7	149	
- 9:00	3	2			3	30	3	30	2	15	53	9	150	501
9:00 - 9:15													0	
- 9:30													0	
- 9:45													0	
- 10:00													0	0
Midday														
11:00 - 11:15													0	
- 11:30													0	
- 11:45													0	
- 12:00													0	0
12:00 - 12:15													0	0
- 12:30													0	0
- 12:45													0	0
- 1:00													0	0
PM														
3:00 - 3:15	13	7	4		3	38		44	1	19	53	8	190	
- 3:30	10	3	3		1	51	1	52	4	29	48	14	216	
- 3:45	9	1	2	1	4	47	4	52	2	28	48	7	205	
- 4:00	6	6	6		1	34	2	34	1	23	51	6	170	781
4:00 - 4:15	8	5	4		5	30	1	52	4	30	43	12	194	
- 4:30	9	2	2		3	29	1	56		28	52	6	188	
- 4:45	9	2	4	1	2	49	1	51	1	26	50	2	198	
- 5:00	11	2	3	1	1	33	2	48	1	17	51	5	175	755
5:00 - 5:15	10		5		4	36	1	31		26	51	6	170	
- 5:30	6	2	3	1	2	32	6	26	1	22	47	8	156	
- 5:45	7	1	1		1	26	2	28		9	39	8	122	
- 6:00	5	1	4		7	19	7	29		13	53	12	150	598
PEAK HOUR SUMMARY ¹:														
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	Hourly Traffic	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM peak hour	37	11	13	2	11	141	5	207	6	101	196	25	755	

¹: Peak hour volume based on peak hour of All Vehicles

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Light Trucks

Location:

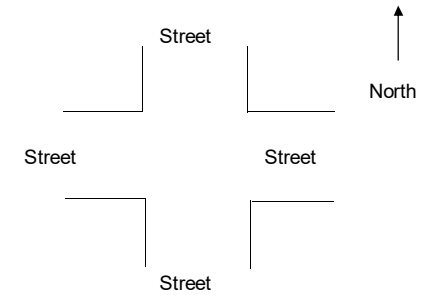
N/S Street Port Augusta
E/W Street Comox Avenue
Comox, BC

Job # 2211-47436-00

Date: Wednesday
Day 4-Oct-17
Date

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min Totals	1 hour Totals
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right		
AM														
7:00 - 7:15												1	1	
- 7:30								2			3		5	
- 7:45								2			1		3	
- 8:00													0	9
8:00 - 8:15										1	2		3	
- 8:30						1		3			3		7	
- 8:45	1										3		4	
- 9:00										2			2	16
9:00 - 9:15													0	
- 9:30													0	
- 9:45													0	
- 10:00													0	0
Midday														
11:00 - 11:15													0	
- 11:30													0	
- 11:45													0	
- 12:00													0	0
12:00 - 12:15													0	0
- 12:30													0	0
- 12:45													0	0
- 1:00													0	0
PM														
3:00 - 3:15													0	
- 3:30					1			1		1			3	
- 3:45						1		2		1	1		5	
- 4:00													0	8
4:00 - 4:15								1					1	
- 4:30						1				1			2	
- 4:45						1		2			3		6	
- 5:00								1					1	10
5:00 - 5:15								1		1			2	
- 5:30								1					1	
- 5:45					1			1		1	1		4	
- 6:00	1												1	8
PEAK HOUR SUMMARY ¹:														
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	Hourly Traffic	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0		
PM peak hour	0	0	0	0	0	2	0	4	0	1	3	0	10	

¹: Peak hour volume based on peak hour of All Vehicles

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Heavy Trucks

Location:

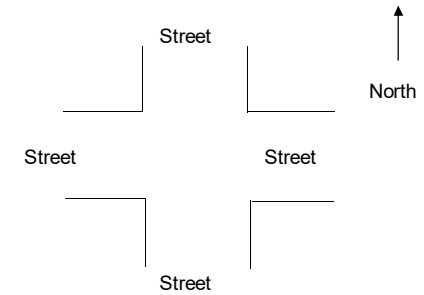
N/S Street Port Augusta
E/W Street Comox Avenue
Comox, BC

Job # 2211-47436-00

Date: Wednesday
Day 4-Oct-17
Date

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min Totals	1 hour Totals
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right		
AM														
7:00 - 7:15													0	
- 7:30										1	2		3	
- 7:45						1		1			1		3	
- 8:00								1			1		2	8
8:00 - 8:15											3		3	
- 8:30								1	1	1			3	
- 8:45						1		1			3		5	
- 9:00													0	11
9:00 - 9:15													0	
- 9:30													0	
- 9:45													0	
- 10:00													0	0
Midday														
11:00 - 11:15													0	
- 11:30													0	
- 11:45													0	
- 12:00													0	0
12:00 - 12:15													0	0
- 12:30													0	0
- 12:45													0	0
- 1:00													0	0
PM														
3:00 - 3:15													0	
- 3:30											1		1	
- 3:45								1					1	
- 4:00													0	2
4:00 - 4:15								2			1		3	
- 4:30													0	
- 4:45													0	
- 5:00						1							1	4
5:00 - 5:15													0	
- 5:30													0	
- 5:45													0	
- 6:00													0	0
PEAK HOUR SUMMARY ¹:														
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	Hourly Traffic	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM peak hour	0	0	0	0	0	1	0	2	0	0	1	0	4	

¹: Peak hour volume based on peak hour of All Vehicles

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Pedestrian

Location:

**N/S Street
E/W Street
Comox, BC**

Port Augusta
Comox Avenue

Job # **2211-47436-00**

Date:

Day Wednesday
Date 4-Oct-17

Weather:

AM:**Mid:****PM:**

Street

North

Street

Street

Street

Time	South Leg				North Leg				East Leg				West Leg				15min Totals	1 hour Totals
	Child	AO	Senior	Disabled	Child	AO	Senior	Disabled	Child	AO	Senior	Disabled	Child	AO	Senior	Disabled		
AM																		
7:00 - 7:15										2							2	
- 7:30																	0	
- 7:45										2	2						4	
- 8:00		1									1				6		8	14
8:00 - 8:15			1											1	3		5	
- 8:30			1			1				1							3	
- 8:45		3	1							1	1						6	
- 9:00			4				1				5			1	1		12	26
9:00 - 9:15																	0	
- 9:30																	0	
- 9:45																	0	
- 10:00																	0	0
Midday																		
11:00 - 11:15																	0	
- 11:30																	0	
- 11:45																	0	
- 12:00																	0	0
12:00 - 12:15																	0	0
- 12:30																	0	0
- 12:45																	0	0
- 1:00																	0	0
PM																		
3:00 - 3:15		1	4	2	1	2	8	2	1	2	6	2		5	10	4	50	
- 3:30		5	10	1		2	2	2	2	7	7	2		3	7	2	52	
- 3:45			1			1	4		3	9	11		1	5	11	1	47	
- 4:00		2	8	1	1	3	4	2	1	4	4		2	2	4		38	187
4:00 - 4:15		3	1	1		2	7	1	2	3	10	1	1	3	4	1	40	
- 4:30		2	2	1	3	5	5				5		2	4	8	1	38	
- 4:45	3	4	9			4	3			5	19	1		2	7		57	
- 5:00			1				6	2		2		1	1	3	5	1	22	157
5:00 - 5:15	1	1	2			1	1		1	3	1	1		2	3		17	
- 5:30						3	1				1	2			2		9	
- 5:45							2			1	3			2			8	
- 6:00			2			1				1	1					1	6	40
PEAK HOUR SUMMARY ¹																Hourly Traffic		
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM peak hour	3	9	13	2	3	11	21	3	2	10	34	3	4	12	24	3	157	

¹ Peak hour volume based on peak hour of All Vehicles

A1

A2

A3

TRAFFIC COUNT SHEET

McElhanney Consulting Services Ltd.
Tel 604-596-0391, Fax 604-584-5050

Bicyclist

Location:

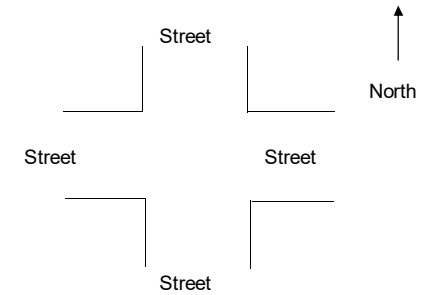
N/S Street Port Augusta
E/W Street Comox Avenue
Comox, BC

Job # 2211-47436-00

Date: Wednesday
Day 4-Oct-17
Date

Weather:

AM:
Mid:
PM:



Time	Northbound			Southbound			Westbound			Eastbound			15min Totals	1 hour Totals
	Left	Through	Right	Left	Through	Right	Left	Through	Right	Left	Through	Right		
AM														
7:00 - 7:15													0	
- 7:30						1		1					2	
- 7:45								1					1	
- 8:00						1		1		1			3	6
8:00 - 8:15					1								1	
- 8:30						1							1	
- 8:45										1			1	
- 9:00								1		2			3	6
9:00 - 9:15													0	
- 9:30													0	
- 9:45													0	
- 10:00													0	0
Midday														
11:00 - 11:15													0	
- 11:30													0	
- 11:45													0	
- 12:00													0	0
12:00 - 12:15													0	0
- 12:30													0	0
- 12:45													0	0
- 1:00													0	0
PM														
3:00 - 3:15													0	
- 3:30	1							2					3	
- 3:45													0	
- 4:00					2	1		1					4	7
4:00 - 4:15						1				1			2	
- 4:30						3				1	1		5	
- 4:45								1			1		2	
- 5:00					1	1		1			2		5	14
5:00 - 5:15	1	1				2		1			2		7	
- 5:30							2	1		1	1		5	
- 5:45		2					2	2		1	3		10	
- 6:00			1					1		1	1		4	26
PEAK HOUR SUMMARY ¹:														
AM peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	
MD peak hour	0	0	0	0	0	0	0	0	0	0	0	0	0	
PM peak hour	0	0	0	0	1	5	0	2	0	1	5	0	14	

¹: Peak hour volume based on peak hour of All Vehicles



APPENDIX B – SYNCHRO OUTPUTS

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2017 AM

Intersection

Intersection Delay, s/veh 9.3

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	63	168	20	9	104	6	14	3	2	2	7	130
Future Vol, veh/h	63	168	20	9	104	6	14	3	2	2	7	130
Peak Hour Factor	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	75	200	24	11	124	7	17	4	2	2	8	155
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	9.8	9.2	8.5	8.7
HCM LOS	A	A	A	A

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	74%	100%	0%	100%	0%	1%
Vol Thru, %	16%	0%	89%	0%	95%	5%
Vol Right, %	11%	0%	11%	0%	5%	94%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	19	63	188	9	110	139
LT Vol	14	63	0	9	0	2
Through Vol	3	0	168	0	104	7
RT Vol	2	0	20	0	6	130
Lane Flow Rate	23	75	224	11	131	165
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.033	0.117	0.313	0.017	0.19	0.205
Departure Headway (Hd)	5.299	5.606	5.028	5.766	5.224	4.468
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	673	638	714	619	685	803
Service Time	3.355	3.352	2.774	3.518	2.976	2.503
HCM Lane V/C Ratio	0.034	0.118	0.314	0.018	0.191	0.205
HCM Control Delay	8.5	9.1	10.1	8.6	9.2	8.7
HCM Lane LOS	A	A	B	A	A	A
HCM 95th-tile Q	0.1	0.4	1.3	0.1	0.7	0.8

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2017 AM

Intersection

Intersection Delay, s/veh 8.9

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	24	16	2	45	100	32	3	54	36	17	85	59
Future Vol, veh/h	24	16	2	45	100	32	3	54	36	17	85	59
Peak Hour Factor	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	28	19	2	52	116	37	3	63	42	20	99	69
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	8.4	9.3	8.3	9
HCM LOS	A	A	A	A

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	5%	0%	57%	25%	11%
Vol Thru, %	95%	0%	38%	56%	53%
Vol Right, %	0%	100%	5%	18%	37%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	57	36	42	177	161
LT Vol	3	0	24	45	17
Through Vol	54	0	16	100	85
RT Vol	0	36	2	32	59
Lane Flow Rate	66	42	49	206	187
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.098	0.053	0.067	0.264	0.237
Departure Headway (Hd)	5.326	4.594	4.95	4.612	4.563
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	671	777	721	778	784
Service Time	3.07	2.337	2.997	2.647	2.602
HCM Lane V/C Ratio	0.098	0.054	0.068	0.265	0.239
HCM Control Delay	8.7	7.6	8.4	9.3	9
HCM Lane LOS	A	A	A	A	A
HCM 95th-tile Q	0.3	0.2	0.2	1.1	0.9

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2017 PM

Intersection

Intersection Delay, s/veh 10.8

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	112	193	39	8	197	11	33	15	15	1	12	163
Future Vol, veh/h	112	193	39	8	197	11	33	15	15	1	12	163
Peak Hour Factor	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	123	212	43	9	216	12	36	16	16	1	13	179
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	11.1	11.5	9.6	10
HCM LOS	B	B	A	A

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	52%	100%	0%	100%	0%	1%
Vol Thru, %	24%	0%	83%	0%	95%	7%
Vol Right, %	24%	0%	17%	0%	5%	93%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	63	112	232	8	208	176
LT Vol	33	112	0	8	0	1
Through Vol	15	0	193	0	197	12
RT Vol	15	0	39	0	11	163
Lane Flow Rate	69	123	255	9	229	193
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.111	0.207	0.384	0.015	0.36	0.271
Departure Headway (Hd)	5.795	6.046	5.421	6.22	5.677	5.052
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	618	596	665	577	635	712
Service Time	3.832	3.767	3.142	3.946	3.402	3.082
HCM Lane V/C Ratio	0.112	0.206	0.383	0.016	0.361	0.271
HCM Control Delay	9.6	10.3	11.5	9	11.6	10
HCM Lane LOS	A	B	B	A	B	A
HCM 95th-tile Q	0.4	0.8	1.8	0	1.6	1.1

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2017 PM

Intersection

Intersection Delay, s/veh 9.7

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	96	85	5	39	84	15	3	99	90	23	91	84
Future Vol, veh/h	96	85	5	39	84	15	3	99	90	23	91	84
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	100	89	5	41	88	16	3	103	94	24	95	88
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	10.3	9.6	9	9.9
HCM LOS	B	A	A	A

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	3%	0%	52%	28%	12%
Vol Thru, %	97%	0%	46%	61%	46%
Vol Right, %	0%	100%	3%	11%	42%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	102	90	186	138	198
LT Vol	3	0	96	39	23
Through Vol	99	0	85	84	91
RT Vol	0	90	5	15	84
Lane Flow Rate	106	94	194	144	206
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.166	0.127	0.278	0.21	0.281
Departure Headway (Hd)	5.608	4.886	5.171	5.251	4.906
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	632	724	686	687	722
Service Time	3.408	2.685	3.269	3.251	3.004
HCM Lane V/C Ratio	0.168	0.13	0.283	0.21	0.285
HCM Control Delay	9.5	8.4	10.3	9.6	9.9
HCM Lane LOS	A	A	B	A	A
HCM 95th-tile Q	0.6	0.4	1.1	0.8	1.2

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2019 Background AM

Intersection

Intersection Delay, s/veh 9.4

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	64	171	20	9	106	6	14	3	2	2	7	133
Future Vol, veh/h	64	171	20	9	106	6	14	3	2	2	7	133
Peak Hour Factor	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	76	204	24	11	126	7	17	4	2	2	8	158
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	9.9	9.2	8.6	8.7
HCM LOS	A	A	A	A

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	74%	100%	0%	100%	0%	1%
Vol Thru, %	16%	0%	90%	0%	95%	5%
Vol Right, %	11%	0%	10%	0%	5%	94%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	19	64	191	9	112	142
LT Vol	14	64	0	9	0	2
Through Vol	3	0	171	0	106	7
RT Vol	2	0	20	0	6	133
Lane Flow Rate	23	76	227	11	133	169
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.033	0.119	0.319	0.017	0.194	0.211
Departure Headway (Hd)	5.322	5.619	5.043	5.782	5.24	4.483
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	669	636	712	617	681	800
Service Time	3.382	3.367	2.79	3.538	2.996	2.521
HCM Lane V/C Ratio	0.034	0.119	0.319	0.018	0.195	0.211
HCM Control Delay	8.6	9.1	10.2	8.6	9.3	8.7
HCM Lane LOS	A	A	B	A	A	A
HCM 95th-tile Q	0.1	0.4	1.4	0.1	0.7	0.8

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2019 Background AM

Intersection

Intersection Delay, s/veh	9
Intersection LOS	A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	24	16	2	46	102	33	3	55	37	17	87	60
Future Vol, veh/h	24	16	2	46	102	33	3	55	37	17	87	60
Peak Hour Factor	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	28	19	2	53	119	38	3	64	43	20	101	70
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	8.4	9.4	8.3	9.1
HCM LOS	A	A	A	A

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	5%	0%	57%	25%	10%
Vol Thru, %	95%	0%	38%	56%	53%
Vol Right, %	0%	100%	5%	18%	37%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	58	37	42	181	164
LT Vol	3	0	24	46	17
Through Vol	55	0	16	102	87
RT Vol	0	37	2	33	60
Lane Flow Rate	67	43	49	210	191
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.1	0.055	0.067	0.271	0.243
Departure Headway (Hd)	5.344	4.612	4.972	4.627	4.58
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	669	774	717	775	782
Service Time	3.089	2.357	3.023	2.664	2.62
HCM Lane V/C Ratio	0.1	0.056	0.068	0.271	0.244
HCM Control Delay	8.7	7.6	8.4	9.4	9.1
HCM Lane LOS	A	A	A	A	A
HCM 95th-tile Q	0.3	0.2	0.2	1.1	1

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2019 Combined AM

Intersection

Intersection Delay, s/veh 9.4

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	66	171	20	9	106	6	14	3	2	2	7	140
Future Vol, veh/h	66	171	20	9	106	6	14	3	2	2	7	140
Peak Hour Factor	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	79	204	24	11	126	7	17	4	2	2	8	167
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	9.9	9.3	8.6	8.8
HCM LOS	A	A	A	A

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	74%	100%	0%	100%	0%	1%
Vol Thru, %	16%	0%	90%	0%	95%	5%
Vol Right, %	11%	0%	10%	0%	5%	94%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	19	66	191	9	112	149
LT Vol	14	66	0	9	0	2
Through Vol	3	0	171	0	106	7
RT Vol	2	0	20	0	6	140
Lane Flow Rate	23	79	227	11	133	177
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.034	0.123	0.32	0.017	0.195	0.221
Departure Headway (Hd)	5.34	5.639	5.062	5.806	5.264	4.488
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	667	633	707	614	679	798
Service Time	3.403	3.392	2.814	3.566	3.024	2.528
HCM Lane V/C Ratio	0.034	0.125	0.321	0.018	0.196	0.222
HCM Control Delay	8.6	9.2	10.2	8.7	9.3	8.8
HCM Lane LOS	A	A	B	A	A	A
HCM 95th-tile Q	0.1	0.4	1.4	0.1	0.7	0.8

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2019 Combined AM

Intersection

Intersection Delay, s/veh	9
Intersection LOS	A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	31	16	2	46	102	33	3	55	37	17	87	62
Future Vol, veh/h	31	16	2	46	102	33	3	55	37	17	87	62
Peak Hour Factor	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	36	19	2	53	119	38	3	64	43	20	101	72
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	8.5	9.4	8.3	9.2
HCM LOS	A	A	A	A

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	5%	0%	63%	25%	10%
Vol Thru, %	95%	0%	33%	56%	52%
Vol Right, %	0%	100%	4%	18%	37%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	58	37	49	181	166
LT Vol	3	0	31	46	17
Through Vol	55	0	16	102	87
RT Vol	0	37	2	33	62
Lane Flow Rate	67	43	57	210	193
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.101	0.055	0.079	0.272	0.247
Departure Headway (Hd)	5.37	4.638	4.997	4.646	4.598
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	666	769	713	772	778
Service Time	3.118	2.386	3.051	2.686	2.64
HCM Lane V/C Ratio	0.101	0.056	0.08	0.272	0.248
HCM Control Delay	8.7	7.7	8.5	9.4	9.2
HCM Lane LOS	A	A	A	A	A
HCM 95th-tile Q	0.3	0.2	0.3	1.1	1

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2019 Background PM

Intersection

Intersection Delay, s/veh 11

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	114	197	40	8	201	11	34	15	15	1	12	166
Future Vol, veh/h	114	197	40	8	201	11	34	15	15	1	12	166
Peak Hour Factor	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	125	216	44	9	221	12	37	16	16	1	13	182
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	11.3	11.7	9.6	10.1
HCM LOS	B	B	A	B

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	53%	100%	0%	100%	0%	1%
Vol Thru, %	23%	0%	83%	0%	95%	7%
Vol Right, %	23%	0%	17%	0%	5%	93%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	64	114	237	8	212	179
LT Vol	34	114	0	8	0	1
Through Vol	15	0	197	0	201	12
RT Vol	15	0	40	0	11	166
Lane Flow Rate	70	125	260	9	233	197
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.114	0.211	0.394	0.015	0.369	0.278
Departure Headway (Hd)	5.842	6.07	5.445	6.25	5.707	5.085
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	613	593	662	573	631	706
Service Time	3.882	3.796	3.171	3.98	3.436	3.119
HCM Lane V/C Ratio	0.114	0.211	0.393	0.016	0.369	0.279
HCM Control Delay	9.6	10.4	11.7	9.1	11.8	10.1
HCM Lane LOS	A	B	B	A	B	B
HCM 95th-tile Q	0.4	0.8	1.9	0	1.7	1.1

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2019 Background PM

Intersection

Intersection Delay, s/veh 9.9

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	98	87	5	40	86	15	3	101	92	23	93	86
Future Vol, veh/h	98	87	5	40	86	15	3	101	92	23	93	86
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	102	91	5	42	90	16	3	105	96	24	97	90
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	10.5	9.8	9.1	10.1
HCM LOS	B	A	A	B

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	3%	0%	52%	28%	11%
Vol Thru, %	97%	0%	46%	61%	46%
Vol Right, %	0%	100%	3%	11%	43%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	104	92	190	141	202
LT Vol	3	0	98	40	23
Through Vol	101	0	87	86	93
RT Vol	0	92	5	15	86
Lane Flow Rate	108	96	198	147	210
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.173	0.134	0.292	0.216	0.294
Departure Headway (Hd)	5.743	5.02	5.303	5.289	5.038
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	626	716	679	679	715
Service Time	3.461	2.737	3.324	3.318	3.056
HCM Lane V/C Ratio	0.173	0.134	0.292	0.216	0.294
HCM Control Delay	9.7	8.5	10.5	9.8	10.1
HCM Lane LOS	A	A	B	A	B
HCM 95th-tile Q	0.6	0.5	1.2	0.8	1.2

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2019 Combined PM

Intersection

Intersection Delay, s/veh 11

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	121	197	40	8	201	11	34	15	15	1	12	170
Future Vol, veh/h	121	197	40	8	201	11	34	15	15	1	12	170
Peak Hour Factor	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	133	216	44	9	221	12	37	16	16	1	13	187
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	11.3	11.7	9.7	10.2
HCM LOS	B	B	A	B

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	53%	100%	0%	100%	0%	1%
Vol Thru, %	23%	0%	83%	0%	95%	7%
Vol Right, %	23%	0%	17%	0%	5%	93%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	64	121	237	8	212	183
LT Vol	34	121	0	8	0	1
Through Vol	15	0	197	0	201	12
RT Vol	15	0	40	0	11	170
Lane Flow Rate	70	133	260	9	233	201
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.115	0.225	0.395	0.015	0.371	0.285
Departure Headway (Hd)	5.872	6.089	5.464	6.279	5.736	5.105
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	610	590	659	571	627	704
Service Time	3.913	3.815	3.19	4.01	3.467	3.139
HCM Lane V/C Ratio	0.115	0.225	0.395	0.016	0.372	0.286
HCM Control Delay	9.7	10.6	11.7	9.1	11.8	10.2
HCM Lane LOS	A	B	B	A	B	B
HCM 95th-tile Q	0.4	0.9	1.9	0	1.7	1.2

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2019 Combined PM

Intersection

Intersection Delay, s/veh	10
Intersection LOS	A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	102	87	5	40	86	15	3	101	92	23	93	93
Future Vol, veh/h	102	87	5	40	86	15	3	101	92	23	93	93
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	106	91	5	42	90	16	3	105	96	24	97	97
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	10.6	9.8	9.1	10.3
HCM LOS	B	A	A	B

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	3%	0%	53%	28%	11%
Vol Thru, %	97%	0%	45%	61%	44%
Vol Right, %	0%	100%	3%	11%	44%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	104	92	194	141	209
LT Vol	3	0	102	40	23
Through Vol	101	0	87	86	93
RT Vol	0	92	5	15	93
Lane Flow Rate	108	96	202	147	218
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.173	0.134	0.299	0.217	0.306
Departure Headway (Hd)	5.76	5.037	5.321	5.317	5.059
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	624	712	675	676	714
Service Time	3.488	2.765	3.35	3.349	3.059
HCM Lane V/C Ratio	0.173	0.135	0.299	0.217	0.305
HCM Control Delay	9.7	8.5	10.6	9.8	10.3
HCM Lane LOS	A	A	B	A	B
HCM 95th-tile Q	0.6	0.5	1.3	0.8	1.3

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2024 Background AM

Intersection

Intersection Delay, s/veh 9.6

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	68	180	21	10	112	6	15	3	2	2	8	139
Future Vol, veh/h	68	180	21	10	112	6	15	3	2	2	8	139
Peak Hour Factor	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	81	214	25	12	133	7	18	4	2	2	10	165
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	10.1	9.3	8.7	8.9
HCM LOS	B	A	A	A

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	75%	100%	0%	100%	0%	1%
Vol Thru, %	15%	0%	90%	0%	95%	5%
Vol Right, %	10%	0%	10%	0%	5%	93%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	20	68	201	10	118	149
LT Vol	15	68	0	10	0	2
Through Vol	3	0	180	0	112	8
RT Vol	2	0	21	0	6	139
Lane Flow Rate	24	81	239	12	140	177
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.036	0.127	0.338	0.019	0.206	0.224
Departure Headway (Hd)	5.403	5.655	5.079	5.831	5.291	4.545
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	658	631	706	611	674	788
Service Time	3.471	3.411	2.834	3.594	3.054	2.589
HCM Lane V/C Ratio	0.036	0.128	0.339	0.02	0.208	0.225
HCM Control Delay	8.7	9.2	10.4	8.7	9.4	8.9
HCM Lane LOS	A	A	B	A	A	A
HCM 95th-tile Q	0.1	0.4	1.5	0.1	0.8	0.9

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2024 Background AM

Intersection

Intersection Delay, s/veh 9.2

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	26	17	2	48	107	34	3	58	39	18	91	63
Future Vol, veh/h	26	17	2	48	107	34	3	58	39	18	91	63
Peak Hour Factor	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	30	20	2	56	124	40	3	67	45	21	106	73
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	8.5	9.6	8.4	9.3
HCM LOS	A	A	A	A

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	5%	0%	58%	25%	10%
Vol Thru, %	95%	0%	38%	57%	53%
Vol Right, %	0%	100%	4%	18%	37%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	61	39	45	189	172
LT Vol	3	0	26	48	18
Through Vol	58	0	17	107	91
RT Vol	0	39	2	34	63
Lane Flow Rate	71	45	52	220	200
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.106	0.059	0.073	0.285	0.257
Departure Headway (Hd)	5.392	4.661	5.032	4.673	4.625
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	662	765	708	767	774
Service Time	3.14	2.409	3.088	2.715	2.668
HCM Lane V/C Ratio	0.107	0.059	0.073	0.287	0.258
HCM Control Delay	8.8	7.7	8.5	9.6	9.3
HCM Lane LOS	A	A	A	A	A
HCM 95th-tile Q	0.4	0.2	0.2	1.2	1

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2024 Combined AM

Intersection

Intersection Delay, s/veh 9.6

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	70	180	21	10	112	6	15	3	2	2	8	146
Future Vol, veh/h	70	180	21	10	112	6	15	3	2	2	8	146
Peak Hour Factor	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	83	214	25	12	133	7	18	4	2	2	10	174
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	10.2	9.4	8.7	9
HCM LOS	B	A	A	A

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	75%	100%	0%	100%	0%	1%
Vol Thru, %	15%	0%	90%	0%	95%	5%
Vol Right, %	10%	0%	10%	0%	5%	94%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	20	70	201	10	118	156
LT Vol	15	70	0	10	0	2
Through Vol	3	0	180	0	112	8
RT Vol	2	0	21	0	6	146
Lane Flow Rate	24	83	239	12	140	186
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.036	0.131	0.339	0.019	0.207	0.235
Departure Headway (Hd)	5.424	5.678	5.101	5.857	5.317	4.551
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	656	629	701	608	671	786
Service Time	3.493	3.436	2.858	3.623	3.083	2.595
HCM Lane V/C Ratio	0.037	0.132	0.341	0.02	0.209	0.237
HCM Control Delay	8.7	9.3	10.5	8.7	9.5	9
HCM Lane LOS	A	A	B	A	A	A
HCM 95th-tile Q	0.1	0.4	1.5	0.1	0.8	0.9

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2024 Combined AM

Intersection

Intersection Delay, s/veh 9.2

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	33	17	2	48	107	34	3	58	39	18	91	65
Future Vol, veh/h	33	17	2	48	107	34	3	58	39	18	91	65
Peak Hour Factor	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	38	20	2	56	124	40	3	67	45	21	106	76
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	8.6	9.6	8.4	9.3
HCM LOS	A	A	A	A

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	5%	0%	63%	25%	10%
Vol Thru, %	95%	0%	33%	57%	52%
Vol Right, %	0%	100%	4%	18%	37%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	61	39	52	189	174
LT Vol	3	0	33	48	18
Through Vol	58	0	17	107	91
RT Vol	0	39	2	34	65
Lane Flow Rate	71	45	60	220	202
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.107	0.059	0.085	0.286	0.261
Departure Headway (Hd)	5.416	4.685	5.055	4.692	4.642
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	660	761	705	763	771
Service Time	3.169	2.438	3.114	2.737	2.689
HCM Lane V/C Ratio	0.108	0.059	0.085	0.288	0.262
HCM Control Delay	8.8	7.7	8.6	9.6	9.3
HCM Lane LOS	A	A	A	A	A
HCM 95th-tile Q	0.4	0.2	0.3	1.2	1

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2024 Background PM

Intersection

Intersection Delay, s/veh 11.4

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	120	207	42	9	211	12	35	16	16	1	13	175
Future Vol, veh/h	120	207	42	9	211	12	35	16	16	1	13	175
Peak Hour Factor	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	132	227	46	10	232	13	38	18	18	1	14	192
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	11.7	12.2	9.8	10.4
HCM LOS	B	B	A	B

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	52%	100%	0%	100%	0%	1%
Vol Thru, %	24%	0%	83%	0%	95%	7%
Vol Right, %	24%	0%	17%	0%	5%	93%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	67	120	249	9	223	189
LT Vol	35	120	0	9	0	1
Through Vol	16	0	207	0	211	13
RT Vol	16	0	42	0	12	175
Lane Flow Rate	74	132	274	10	245	208
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.122	0.225	0.42	0.017	0.395	0.299
Departure Headway (Hd)	5.965	6.152	5.527	6.344	5.799	5.188
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	600	584	651	565	620	692
Service Time	4.013	3.883	3.257	4.078	3.532	3.227
HCM Lane V/C Ratio	0.123	0.226	0.421	0.018	0.395	0.301
HCM Control Delay	9.8	10.7	12.2	9.2	12.3	10.4
HCM Lane LOS	A	B	B	A	B	B
HCM 95th-tile Q	0.4	0.9	2.1	0.1	1.9	1.3

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2024 Background PM

Intersection

Intersection Delay, s/veh 10.2

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	103	91	5	42	90	16	3	106	96	25	98	90
Future Vol, veh/h	103	91	5	42	90	16	3	106	96	25	98	90
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	107	95	5	44	94	17	3	110	100	26	102	94
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	10.8	10	9.3	10.5
HCM LOS	B	A	A	B

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	3%	0%	52%	28%	12%
Vol Thru, %	97%	0%	46%	61%	46%
Vol Right, %	0%	100%	3%	11%	42%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	109	96	199	148	213
LT Vol	3	0	103	42	25
Through Vol	106	0	91	90	98
RT Vol	0	96	5	16	90
Lane Flow Rate	114	100	207	154	222
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.183	0.141	0.31	0.23	0.315
Departure Headway (Hd)	5.813	5.091	5.38	5.375	5.109
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	618	704	670	668	703
Service Time	3.544	2.822	3.409	3.407	3.139
HCM Lane V/C Ratio	0.184	0.142	0.309	0.231	0.316
HCM Control Delay	9.8	8.7	10.8	10	10.5
HCM Lane LOS	A	A	B	A	B
HCM 95th-tile Q	0.7	0.5	1.3	0.9	1.3

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2024 Combined PM

Intersection

Intersection Delay, s/veh 11.5

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	127	207	42	9	211	12	35	16	16	1	13	179
Future Vol, veh/h	127	207	42	9	211	12	35	16	16	1	13	179
Peak Hour Factor	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	140	227	46	10	232	13	38	18	18	1	14	197
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	11.8	12.3	9.9	10.6
HCM LOS	B	B	A	B

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	52%	100%	0%	100%	0%	1%
Vol Thru, %	24%	0%	83%	0%	95%	7%
Vol Right, %	24%	0%	17%	0%	5%	93%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	67	127	249	9	223	193
LT Vol	35	127	0	9	0	1
Through Vol	16	0	207	0	211	13
RT Vol	16	0	42	0	12	179
Lane Flow Rate	74	140	274	10	245	212
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.123	0.239	0.421	0.018	0.397	0.307
Departure Headway (Hd)	5.995	6.17	5.544	6.371	5.826	5.205
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	596	582	648	562	618	689
Service Time	4.046	3.905	3.279	4.11	3.565	3.247
HCM Lane V/C Ratio	0.124	0.241	0.423	0.018	0.396	0.308
HCM Control Delay	9.9	10.8	12.3	9.2	12.4	10.6
HCM Lane LOS	A	B	B	A	B	B
HCM 95th-tile Q	0.4	0.9	2.1	0.1	1.9	1.3

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2024 Combined PM

Intersection												
Intersection Delay, s/veh	10.3											
Intersection LOS	B											
Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations		↕			↕			↕	↗		↕	
Traffic Vol, veh/h	107	91	5	42	90	16	3	106	96	25	98	97
Future Vol, veh/h	107	91	5	42	90	16	3	106	96	25	98	97
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	111	95	5	44	94	17	3	110	100	26	102	101
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0
Approach	EB			WB			NB			SB		
Opposing Approach	WB			EB			SB			NB		
Opposing Lanes	1			1			1			2		
Conflicting Approach Left	SB			NB			EB			WB		
Conflicting Lanes Left	1			2			1			1		
Conflicting Approach Right	NB			SB			WB			EB		
Conflicting Lanes Right	2			1			1			1		
HCM Control Delay	11			10.1			9.3			10.6		
HCM LOS	B			B			A			B		
Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1							
Vol Left, %	3%	0%	53%	28%	11%							
Vol Thru, %	97%	0%	45%	61%	45%							
Vol Right, %	0%	100%	2%	11%	44%							
Sign Control	Stop	Stop	Stop	Stop	Stop							
Traffic Vol by Lane	109	96	203	148	220							
LT Vol	3	0	107	42	25							
Through Vol	106	0	91	90	98							
RT Vol	0	96	5	16	97							
Lane Flow Rate	114	100	211	154	229							
Geometry Grp	7	7	2	2	5							
Degree of Util (X)	0.184	0.142	0.318	0.232	0.326							
Departure Headway (Hd)	5.842	5.119	5.408	5.41	5.117							
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes							
Cap	614	700	666	664	704							
Service Time	3.575	2.852	3.438	3.442	3.149							
HCM Lane V/C Ratio	0.186	0.143	0.317	0.232	0.325							
HCM Control Delay	9.9	8.7	11	10.1	10.6							
HCM Lane LOS	A	A	B	B	B							
HCM 95th-tile Q	0.7	0.5	1.4	0.9	1.4							

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2039 Background AM

Intersection

Intersection Delay, s/veh 10.3

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	78	209	25	11	129	7	17	4	2	2	9	162
Future Vol, veh/h	78	209	25	11	129	7	17	4	2	2	9	162
Peak Hour Factor	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	93	249	30	13	154	8	20	5	2	2	11	193
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	11	9.9	9	9.5
HCM LOS	B	A	A	A

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	74%	100%	0%	100%	0%	1%
Vol Thru, %	17%	0%	89%	0%	95%	5%
Vol Right, %	9%	0%	11%	0%	5%	94%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	23	78	234	11	136	173
LT Vol	17	78	0	11	0	2
Through Vol	4	0	209	0	129	9
RT Vol	2	0	25	0	7	162
Lane Flow Rate	27	93	279	13	162	206
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.043	0.149	0.402	0.022	0.245	0.27
Departure Headway (Hd)	5.648	5.78	5.201	5.995	5.453	4.724
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	627	617	685	592	652	756
Service Time	3.743	3.556	2.976	3.781	3.239	2.786
HCM Lane V/C Ratio	0.043	0.151	0.407	0.022	0.248	0.272
HCM Control Delay	9	9.6	11.5	8.9	10	9.5
HCM Lane LOS	A	A	B	A	A	A
HCM 95th-tile Q	0.1	0.5	1.9	0.1	1	1.1

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2039 Background AM

Intersection

Intersection Delay, s/veh 9.8

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	30	20	2	56	124	40	4	67	45	21	106	73
Future Vol, veh/h	30	20	2	56	124	40	4	67	45	21	106	73
Peak Hour Factor	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	35	23	2	65	144	47	5	78	52	24	123	85
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	8.8	10.4	8.7	10
HCM LOS	A	B	A	A

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	6%	0%	58%	25%	10%
Vol Thru, %	94%	0%	38%	56%	53%
Vol Right, %	0%	100%	4%	18%	36%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	71	45	52	220	200
LT Vol	4	0	30	56	21
Through Vol	67	0	20	124	106
RT Vol	0	45	2	40	73
Lane Flow Rate	83	52	60	256	233
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.128	0.07	0.088	0.342	0.309
Departure Headway (Hd)	5.562	4.827	5.233	4.818	4.776
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	640	735	678	742	747
Service Time	3.338	2.602	3.318	2.883	2.843
HCM Lane V/C Ratio	0.13	0.071	0.088	0.345	0.312
HCM Control Delay	9.2	8	8.8	10.4	10
HCM Lane LOS	A	A	A	B	A
HCM 95th-tile Q	0.4	0.2	0.3	1.5	1.3

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2039 Combined AM

Intersection

Intersection Delay, s/veh 10.4

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	80	209	25	11	129	7	17	4	2	2	9	169
Future Vol, veh/h	80	209	25	11	129	7	17	4	2	2	9	169
Peak Hour Factor	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Heavy Vehicles, %	2	2	2	2	2	2	2	2	2	2	2	2
Mvmt Flow	95	249	30	13	154	8	20	5	2	2	11	201
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	11.1	10	9	9.7
HCM LOS	B	A	A	A

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	74%	100%	0%	100%	0%	1%
Vol Thru, %	17%	0%	89%	0%	95%	5%
Vol Right, %	9%	0%	11%	0%	5%	94%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	23	80	234	11	136	180
LT Vol	17	80	0	11	0	2
Through Vol	4	0	209	0	129	9
RT Vol	2	0	25	0	7	169
Lane Flow Rate	27	95	279	13	162	214
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.044	0.153	0.404	0.022	0.246	0.282
Departure Headway (Hd)	5.769	5.801	5.221	6.019	5.478	4.73
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	625	613	683	589	648	754
Service Time	3.769	3.585	3.005	3.815	3.273	2.794
HCM Lane V/C Ratio	0.043	0.155	0.408	0.022	0.25	0.284
HCM Control Delay	9	9.6	11.6	9	10.1	9.7
HCM Lane LOS	A	A	B	A	B	A
HCM 95th-tile Q	0.1	0.5	2	0.1	1	1.2

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2039 Combined AM

Intersection

Intersection Delay, s/veh 9.9

Intersection LOS A

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	37	20	2	56	124	40	4	67	45	21	106	75
Future Vol, veh/h	37	20	2	56	124	40	4	67	45	21	106	75
Peak Hour Factor	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86	0.86
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	43	23	2	65	144	47	5	78	52	24	123	87
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	8.9	10.5	8.7	10.1
HCM LOS	A	B	A	B

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	6%	0%	63%	25%	10%
Vol Thru, %	94%	0%	34%	56%	52%
Vol Right, %	0%	100%	3%	18%	37%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	71	45	59	220	202
LT Vol	4	0	37	56	21
Through Vol	67	0	20	124	106
RT Vol	0	45	2	40	75
Lane Flow Rate	83	52	69	256	235
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.128	0.071	0.1	0.344	0.313
Departure Headway (Hd)	5.591	4.856	5.257	4.84	4.797
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	637	730	675	737	742
Service Time	3.369	2.633	3.343	2.905	2.866
HCM Lane V/C Ratio	0.13	0.071	0.102	0.347	0.317
HCM Control Delay	9.2	8	8.9	10.5	10.1
HCM Lane LOS	A	A	A	B	B
HCM 95th-tile Q	0.4	0.2	0.3	1.5	1.3

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2039 Background PM

Intersection

Intersection Delay, s/veh 13.2

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	139	240	49	10	245	14	41	19	19	1	15	203
Future Vol, veh/h	139	240	49	10	245	14	41	19	19	1	15	203
Peak Hour Factor	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	153	264	54	11	269	15	45	21	21	1	16	223
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	13.6	14.3	10.6	11.8
HCM LOS	B	B	B	B

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	52%	100%	0%	100%	0%	0%
Vol Thru, %	24%	0%	83%	0%	95%	7%
Vol Right, %	24%	0%	17%	0%	5%	93%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	79	139	289	10	259	219
LT Vol	41	139	0	10	0	1
Through Vol	19	0	240	0	245	15
RT Vol	19	0	49	0	14	203
Lane Flow Rate	87	153	318	11	285	241
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.154	0.273	0.512	0.02	0.484	0.369
Departure Headway (Hd)	6.39	6.436	5.808	6.665	6.118	5.525
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	557	558	619	535	586	647
Service Time	4.472	4.19	3.561	4.425	3.877	3.591
HCM Lane V/C Ratio	0.156	0.274	0.514	0.021	0.486	0.372
HCM Control Delay	10.6	11.6	14.5	9.6	14.5	11.8
HCM Lane LOS	B	B	B	A	B	B
HCM 95th-tile Q	0.5	1.1	2.9	0.1	2.6	1.7

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2039 Background PM

Intersection

Intersection Delay, s/veh 11.3

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	119	106	6	49	105	19	4	123	112	29	113	105
Future Vol, veh/h	119	106	6	49	105	19	4	123	112	29	113	105
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	124	110	6	51	109	20	4	128	117	30	118	109
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	12.2	11	10	11.9
HCM LOS	B	B	A	B

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	3%	0%	52%	28%	12%
Vol Thru, %	97%	0%	46%	61%	46%
Vol Right, %	0%	100%	3%	11%	43%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	127	112	231	173	247
LT Vol	4	0	119	49	29
Through Vol	123	0	106	105	113
RT Vol	0	112	6	19	105
Lane Flow Rate	132	117	241	180	257
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.225	0.175	0.38	0.285	0.387
Departure Headway (Hd)	6.122	5.395	5.683	5.703	5.411
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	585	663	630	627	664
Service Time	3.874	3.146	3.735	3.761	3.461
HCM Lane V/C Ratio	0.226	0.176	0.383	0.287	0.387
HCM Control Delay	10.7	9.3	12.2	11	11.9
HCM Lane LOS	B	A	B	B	B
HCM 95th-tile Q	0.9	0.6	1.8	1.2	1.8

HCM 2010 AWSC

1: Port Augusta Street & Comox Avenue

2039 Combined PM

Intersection

Intersection Delay, s/veh 13.3

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	146	240	49	10	245	14	41	19	19	1	15	207
Future Vol, veh/h	146	240	49	10	245	14	41	19	19	1	15	207
Peak Hour Factor	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	160	264	54	11	269	15	45	21	21	1	16	227
Number of Lanes	1	1	0	1	1	0	0	1	0	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	2	2	1	1
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	1	2	2
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	1	1	2	2
HCM Control Delay	13.7	14.4	10.7	12
HCM LOS	B	B	B	B

Lane	NBLn1	EBLn1	EBLn2	WBLn1	WBLn2	SBLn1
Vol Left, %	52%	100%	0%	100%	0%	0%
Vol Thru, %	24%	0%	83%	0%	95%	7%
Vol Right, %	24%	0%	17%	0%	5%	93%
Sign Control	Stop	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	79	146	289	10	259	223
LT Vol	41	146	0	10	0	1
Through Vol	19	0	240	0	245	15
RT Vol	19	0	49	0	14	207
Lane Flow Rate	87	160	318	11	285	245
Geometry Grp	2	7	7	7	7	2
Degree of Util (X)	0.155	0.288	0.514	0.02	0.486	0.378
Departure Headway (Hd)	6.424	6.457	5.829	6.697	6.149	5.546
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes	Yes
Cap	555	555	616	533	583	644
Service Time	4.508	4.214	3.585	4.461	3.914	3.611
HCM Lane V/C Ratio	0.157	0.288	0.516	0.021	0.489	0.38
HCM Control Delay	10.7	11.8	14.6	9.6	14.6	12
HCM Lane LOS	B	B	B	A	B	B
HCM 95th-tile Q	0.5	1.2	2.9	0.1	2.6	1.8

HCM 2010 AWSC

2: Pritchard Street & Balmoral Avenue

2039 Combined PM

Intersection

Intersection Delay, s/veh 11.4

Intersection LOS B

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Traffic Vol, veh/h	123	106	6	49	105	19	4	123	112	29	113	112
Future Vol, veh/h	123	106	6	49	105	19	4	123	112	29	113	112
Peak Hour Factor	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Heavy Vehicles, %	1	1	1	1	1	1	1	1	1	1	1	1
Mvmt Flow	128	110	6	51	109	20	4	128	117	30	118	117
Number of Lanes	0	1	0	0	1	0	0	1	1	0	1	0

Approach	EB	WB	NB	SB
Opposing Approach	WB	EB	SB	NB
Opposing Lanes	1	1	1	2
Conflicting Approach Left	SB	NB	EB	WB
Conflicting Lanes Left	1	2	1	1
Conflicting Approach Right	NB	SB	WB	EB
Conflicting Lanes Right	2	1	1	1
HCM Control Delay	12.4	11.1	10	12
HCM LOS	B	B	A	B

Lane	NBLn1	NBLn2	EBLn1	WBLn1	SBLn1
Vol Left, %	3%	0%	52%	28%	11%
Vol Thru, %	97%	0%	45%	61%	44%
Vol Right, %	0%	100%	3%	11%	44%
Sign Control	Stop	Stop	Stop	Stop	Stop
Traffic Vol by Lane	127	112	235	173	254
LT Vol	4	0	123	49	29
Through Vol	123	0	106	105	113
RT Vol	0	112	6	19	112
Lane Flow Rate	132	117	245	180	265
Geometry Grp	7	7	2	2	5
Degree of Util (X)	0.226	0.176	0.388	0.287	0.398
Departure Headway (Hd)	6.152	5.425	5.71	5.739	5.421
Convergence, Y/N	Yes	Yes	Yes	Yes	Yes
Cap	582	659	629	624	661
Service Time	3.906	3.178	3.764	3.797	3.473
HCM Lane V/C Ratio	0.227	0.178	0.39	0.288	0.401
HCM Control Delay	10.7	9.3	12.4	11.1	12
HCM Lane LOS	B	A	B	B	B
HCM 95th-tile Q	0.9	0.6	1.8	1.2	1.9

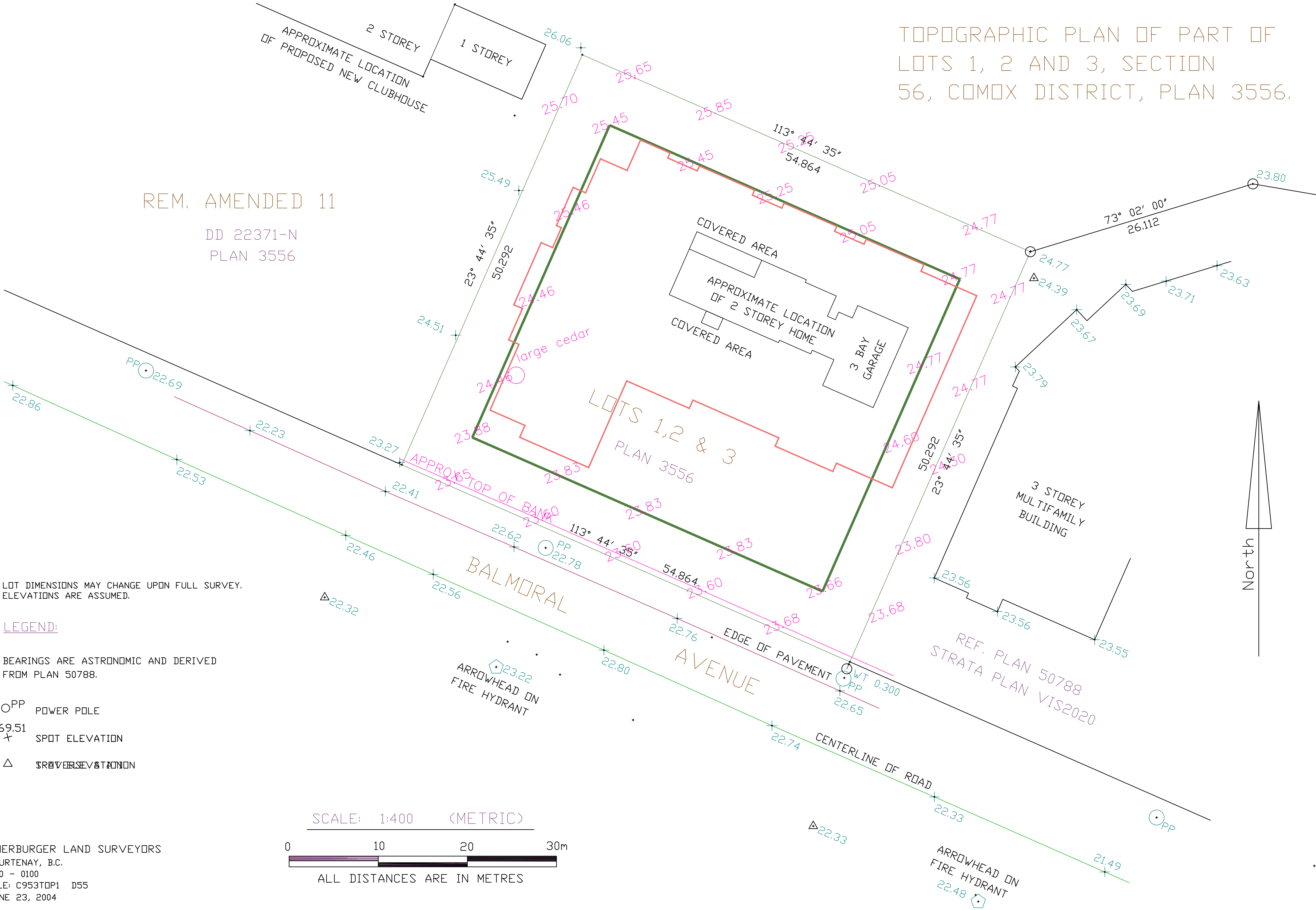


APPENDIX C – SITE LAYOUT

TOPOGRAPHIC PLAN OF PART OF
LOTS 1, 2 AND 3, SECTION
56, COMOX DISTRICT, PLAN 3556.

REM. AMENDED 11

DD 22371-N
PLAN 3556



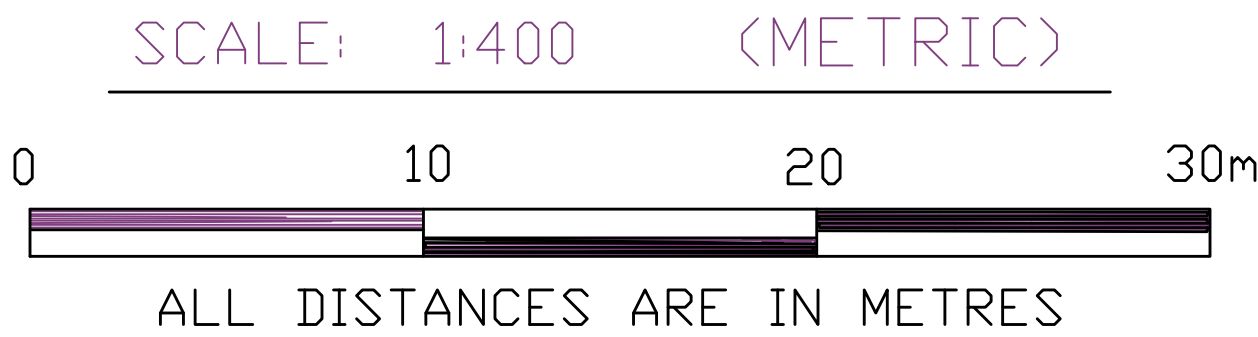
LOT DIMENSIONS MAY CHANGE UPON FULL SURVEY.
ELEVATIONS ARE ASSUMED.

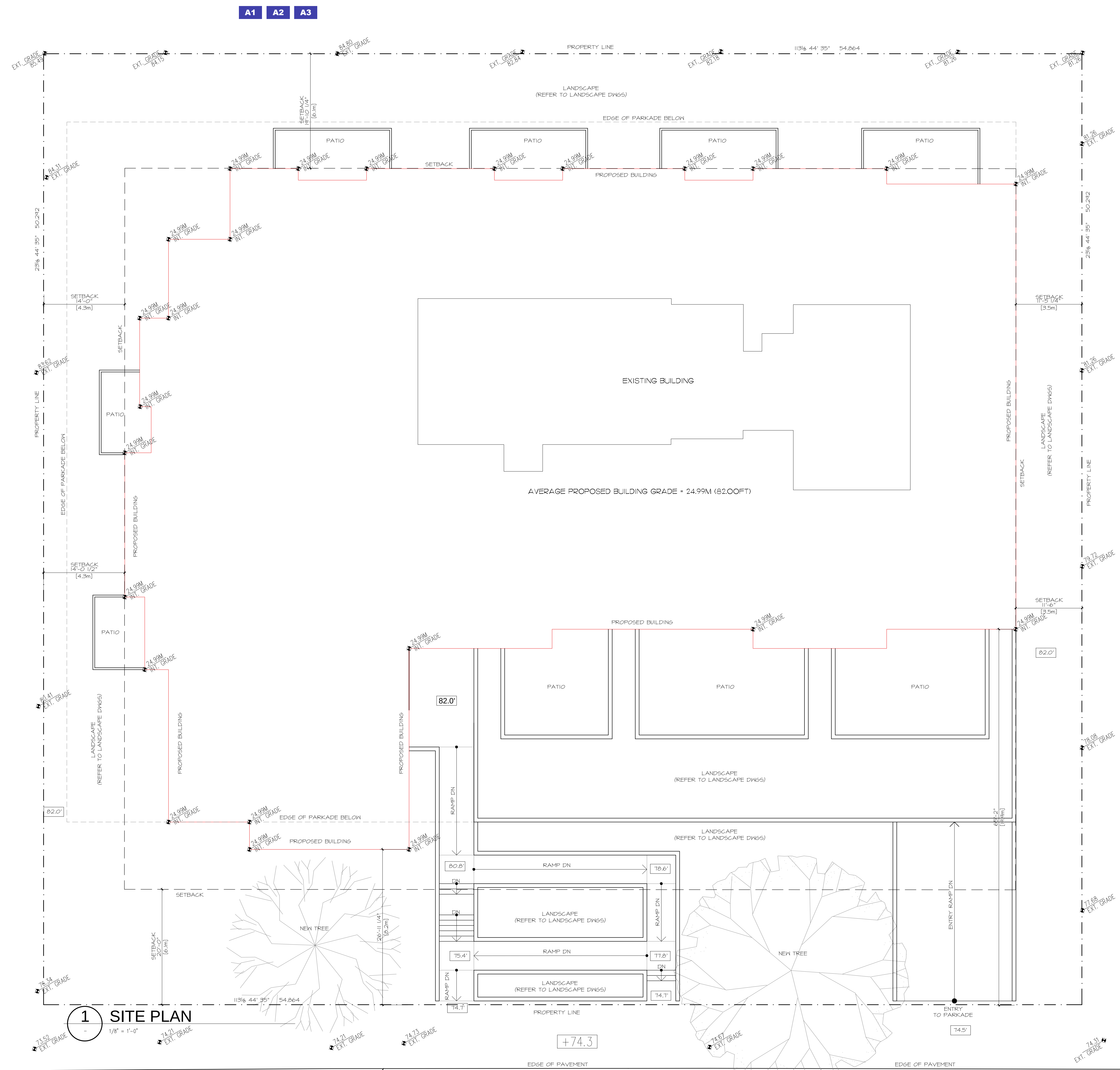
LEGEND:

BEARINGS ARE ASTRONOMIC AND DERIVED
FROM PLAN 50788.

- PP POWER POLE
+ 69.51 SPOT ELEVATION
△ REVERSE STATION

HOERBURGER LAND SURVEYORS
COURTENAY, B.C.
890 - 0100
FILE: C953TOP1 D55
JUNE 23, 2004





PROJECT STATISTICS
1700 Balmoral Ave
Project No : 0435

REVISION NO.01				DATE:	11-Jul-17
SITE INFORMATION					
LEGAL DESCRIPTION		LOTS 1, 2 & 3, SECTION 56, COMOX DISTRICT, PLAN 3556			
CIVIC ADDRESS		1700 Balmoral Ave, Comox BC			
ZONING	EXISTING		REQUIRED	PROPOSED	
	CD7			N/A	
SITE AREA (ft²)	29 699 sf (2,759m²)				
FSR			N/A	2.10	
SITE COVERAGE			N/A	45%	
PROPOSED BLDG GRADE				82.00' (24.99m)	
BUILDING HEIGHT			N/A	57' 00" (17.37m)	
SETBACKS	FRONT	20' 00" (6.10m)	27' 00" (8.23m)		
	REAR	11' 50" (3.50m)	11' 50" (3.50m)		
	SIDE	20' 00" (6.10m)	20' 00" (6.10m)		
BUILDING DATA					
CONDO UNITS					
UNITS	DESCRIPTION	NET AREA (ft²)	# OF UNITS	COMBINED (ft²)	
UNIT A	2BR + 2BATH	1310	1	1,310	
UNIT A1	3BR + 2BATH	1499	3	4,497	
UNIT B	1BR + 1BATH	912	4	3,648	
UNIT C	2BR + 2BATH	1234	4	4,936	
UNIT D	2BR + 2BATH	1234	14	17,276	
UNIT E	2BR + 2BATH	1206	4	4,824	
UNIT F	2BR + 2BATH	1332	4	5,328	
UNIT G	2BR + 2BATH	1306	4	5,224	
UNIT H	2BR + 2BATH	968	1	968	
UNIT I	2BR + 2BATH	1231	3	3,693	
UNIT J	2BR + 2BATH	1684	1	1,684	
UNIT K	2BR + 2BATH	2022	1	2,022	
UNIT L	2BR + 2BATH	1559	1	1,559	
		TOTAL	45	56,969	
SITE DATA					
GROSS FLOOR AREA				62,503	
HORIZONTAL PROJECTION				13,495	
PARKING DATA					
PROPOSED PARKING				# OF PARKING	
DWELLING UNIT PARKING				45	
VISITOR PARKING				5	
OVERSIZED VEHICLE				5	
TOTAL PROPOSED PARKING				55	
REQUIRED PARKING				# OF PARKING	
1 per dwelling unit				45	
0.1 per dwelling unit visitors parking				5	
1 oversize vehicle parking space per every 10 dwelling units				5	
TOTAL REQUIRED PARKING				55	
BICYCLE PARKING DATA					
PROPOSED BICYCLE / SCOOTER PARKING				39	
PROPOSED BICYCLE / SCOOTER PARKING				19	
REQUIRED BICYCLE PARKING (CLASS 1)				0.25 per dwelling unit	
REQUIRED BICYCLE PARKING (CLASS 2)				0.5 per dwelling unit	
TOTAL REQUIRED BICYCLE PARKING				23	

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SEAL

OWNER/CIENT

01	ISSUED FOR REZONING / DP	XX/XX/XX
NO.	REVISION	MDY

PROJECT NAME

1700 BALMORAL AVENUE

PROJECT ADDRESS:

COMOX, BC



CONSULTANTS:
STRUCTURAL: N/A
MECHANICAL: N/A
ELECTRICAL: N/A
CIVIL: N/A
LANDSCAPE: MYSTIC WOODS

DRAWING TITLE:

SITE PLAN

PROJECT NO:	0435	DRAWN BY:	KK
SCALE:	1/8"=1'-0"	REVIEW BY:	NB
DATE:	JULY 2017	DRAWING NO:	A1.01

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

ATTACHMENT 3

DRAFT ZONING AMENDMENT BYLAW 1877

TOWN OF COMOX BYLAW 1877

A BYLAW TO AMEND COMOX ZONING BYLAW 1850

WHEREAS Council has the authority under the provisions of the *Local Government Act* to amend the Zoning Bylaw;

NOW THEREFORE the Council of the Town of Comox, in open meeting assembled, enacts as follows:

1. Title

This bylaw may be cited for all purposes as the “Comox Zoning Amendment Bylaw 1877”

2. Amendments

Comox Zoning Bylaw 1850 is hereby amended as follows:

(a) Section 2.7(2) Penalties is amended by:

i. Deleting the following rows referencing CD7 zone:

Column 1	Column 2	Column 3
Offence	Bylaw Section	Fine Amount
Unlawful use – CD7 zone	807.1	\$250.00
Failure to comply with conditions – CD7 zone	807.2	\$250.00
Unlawful accessory building = CD7 zone	807.10	\$250.00

ii. Adding the following rows to replace the deleted ones:

Column 1	Column 2	Column 3
Offence	Bylaw Section	Fine Amount
Unlawful use – CD7.1 zone	807.1	\$250.00
Failure to comply with conditions – CD7.1 zone	807.2	\$250.00

(b) Section 4.1 Classification of Zones is amended by:

i. Under the heading Multi-Family Residential Zones deleting “CD7 Comprehensive Development 7: 1700 Balmoral Ave” in its entirety; and

- ii. Adding the following text under the heading Multi-Family Residential Zones and after "CD 4.1 Comprehensive Development 4.1: Congregate Care":

CD7.1 Comprehensive Development 7.1: 1700 Balmoral Avenue

- (c) Schedule "A" is amended by:

- i. Deleting Section 807, CD7 Comprehensive Development 7: 1700 Balmoral Avenue in its entirety; and
- ii. adding as Section 807, the CD 7.1 Comprehensive Development 7.1: 1700 Balmoral Avenue, as shown on SCHEDULE "1", which is attached to and forms part of this Bylaw;

- (d) Schedule "B" (the Zoning Map) is amended by rezoning

Lot A Section 56 Comox District Plan VIP81758, shown shaded on SCHEDULE "2" which is attached to and forms part of this Bylaw, from CD7 Comprehensive Development 7: 1700 Balmoral Ave to CD7.1 Comprehensive Development 7.1: 1700 Balmoral Avenue.

3. Adoption

- (1) READ A FIRST time this _____th day of,
- (2) READ A SECOND time this _____th day of
- (3) ADVERTISED A FIRST time this _____th day of
- (4) ADVERTISED A SECOND time this _____th day of
- (5) PUBLIC HEARING HELD this _____th day of
- (6) READ A THIRD time this _____th day of
- (7) ADOPTED this _____th day of

Paul Ives,
Mayor

Richard Kanigan,
Corporate Officer

BYLAW 1877

SCHEDULE "1"

807. CD 7.1 COMPREHENSIVE DEVELOPMENT 7.1: 1700 BALMORAL AVENUE

807.1 Permitted Uses:

In the CD7.1 zone, the following uses are permitted and all other uses are prohibited:

- (1) Accessory structures and uses, excluding buildings and outside storage;
- (2) Apartment dwellings
- (3) Home occupations

807.2 Conditions of Use:

- (1) The gross floor area of the first storey shall not exceed 1400 square metres;
- (2) The gross floor area of the fifth storey shall not exceed 900 square metres.
- (3) All parking spaces and areas used for the temporary storage of garbage or recycling produced on the parcel shall be located underground and below grade.

807.3 Density:

Density shall not exceed 170 units per hectare.

807.4 Parcel Area:

Parcel area shall not be less than 2650 square metres.

807.5 Parcel Frontage:

Parcel frontage shall not be less than 50.0 metres.

807.6 Parcel Depth:

Parcel Depth shall be not less than 45.0 metres.

807.7 Parcel Coverage:

Parcel Coverage including parking areas, loading areas and driveways that are open sided and roofless shall not exceed 65 percent.

807.8 Height and Storeys:

- (1) Height shall not exceed 19.0 metres.
- (2) Number of storeys shall not exceed five.

807.9 Required Setbacks:

As shown in Figure 807-1:

- (1) Front
Front setback shall not be less than:
 - (a) 7.0 metres, for a maximum 16.0 metres of continuous building frontage as measured from west property line; and
 - (b) 17.0 metres, for the remainder of building frontage.
- (2) Rear
Rear setback shall not be less than 6.0 metres.

- (3) Side - interior
Interior side setback shall not be less than 3.5 metres.

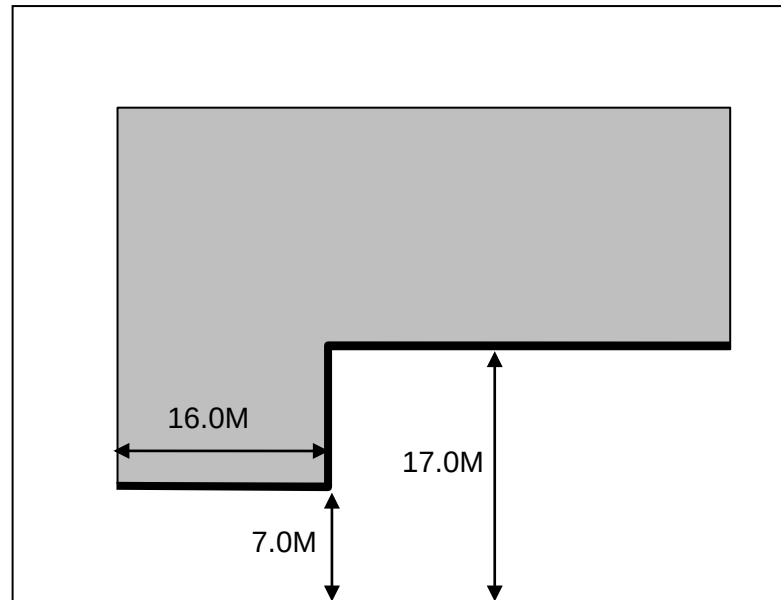


Figure 807-1. Required Setbacks.

807.10 Accessory Buildings:

n/a

807.11 Screening:

The following shall be screened in accordance with Section 8:

- (1) Above ground utility boxes and utility transformers; and
- (2) CD7.1 zoned parcels from abutting Residential parcels.

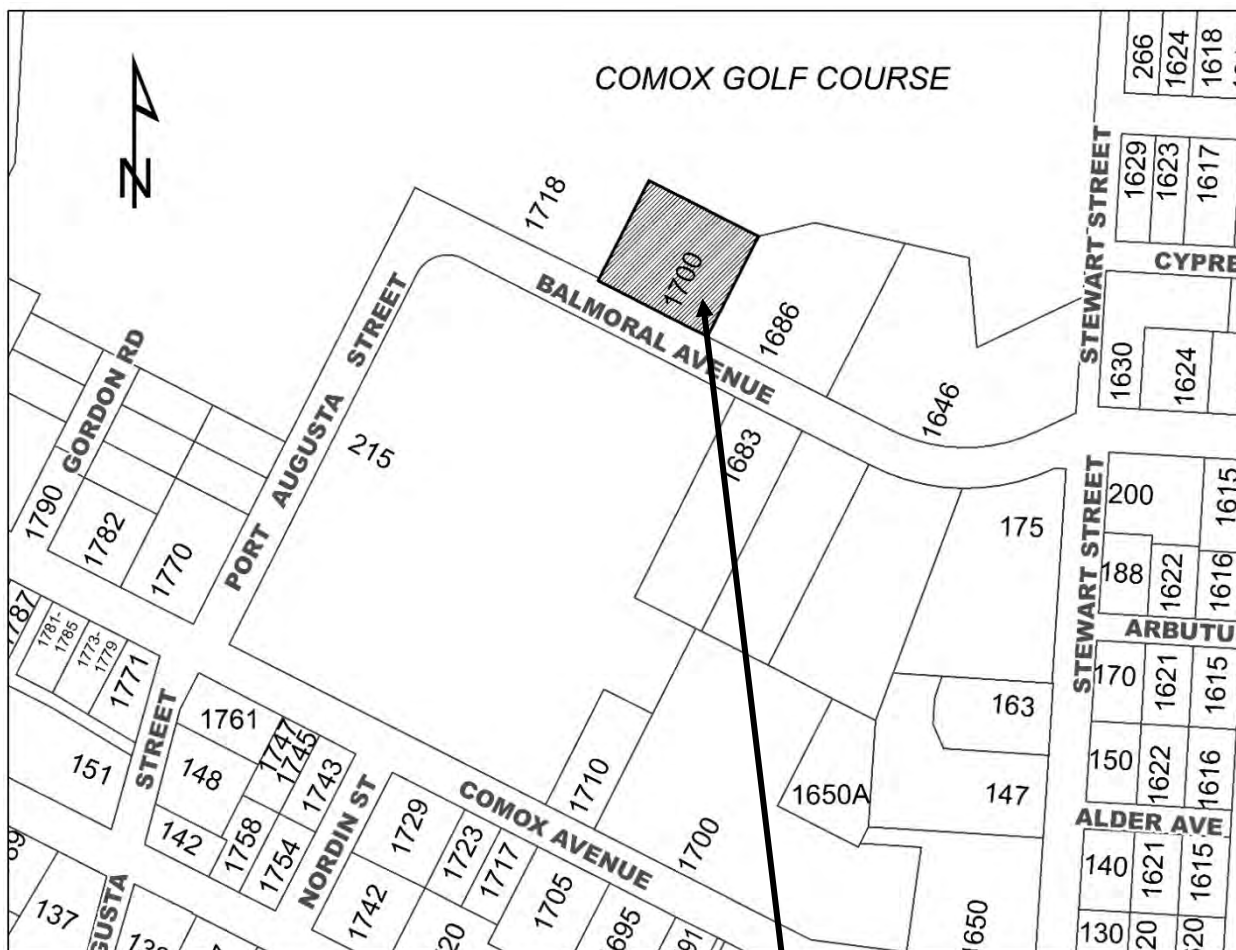
807.12 Off-Street Parking and Loading:

Off-street parking and loading shall be provided in accordance with Section 6.

807.13 Other Requirements:

- (1) Overhead wiring shall not be permitted on a parcel. All new services on a parcel shall be placed underground.
- (2) Unoccupied open spaces shall be fully and suitably landscaped with landscape material; this does not include environmentally sensitive areas, including watercourse setbacks as specified in Section 5.18.
- (3) All buildings shall conform to Section 5.18, Watercourse Regulations.
- (4) No more than one principal building shall be permitted on a parcel.

BYLAW 1877
SCHEDULE "2"
SUBJECT PROPERTY



Subject Property:
1700 Balmoral Avenue

PID: 026-810-361
LOT A SECTION 56 COMOX DISTRICT
PLAN VIP81758

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

ATTACHMENT 4

DRAFT PHASED DEVELOPMENT AGREEMENT BYLAW 1878

TOWN OF COMOX

BYLAW 1878

A BYLAW TO ENTER INTO A PHASED DEVELOPMENT AGREEMENT

WHEREAS:

The Town may by bylaw enter into a phased development agreement pursuant to s. 516.1 of the *Local Government Act*;

NOW THEREFORE the Council of the Town of Comox, in open meeting assembled, having given notice and held a public hearing, enacts as follows:

1. Title

This bylaw may be cited for all purposes as the “Comox Phased Development Agreement Authorization Bylaw 1878: 1700 Balmoral Avenue”.

2. Authorization

Council hereby authorizes the Town of Comox to enter into a phased development agreement under s.516.1 of the *Local Government Act*, in the form attached as Schedule “A” to this bylaw.

The Mayor and the Corporate Officer may execute and deliver an agreement with Lindary Holdings Ltd. Inc. No. BC0916510, in the form attached as Schedule “A” to this bylaw.

3. Adoption

(1)	READ A FIRST time this	th day of, 2018
(2)	READ A SECOND time this	th day of, 2018

Town of Comox

Comox Phased Development Agreement Authorization Bylaw 1878: 1700 Balmoral Avenue

Page 3 of 12

BYLAW 1878

SCHEDULE "A"

PHASED DEVELOPMENT AGREEMENT: 1700 BALMORAL AVENUE

PHASED DEVELOPMENT AGREEMENT:

1700 BALMORAL AVENUE

This Agreement dated for reference the ____ day of _____, 2018 is

AMONG:

TOWN OF COMOX,
a municipal corporation, having an address of
1809 Beaufort Avenue, Comox B.C. V9M 1R9

(the "Town")

AND:

Lindary Holdings Ltd. Inc. No. BC0916510
a corporation having an address of
c/o 480 Tenth Street
Courtenay, B.C. V9N 1P6

(the "Owner")

WHEREAS:

A. The Owner is the registered owner of land legally described as:

PID: 026-810-361
LOT A SECTION 56 COMOX DISTRICT PLAN VIP81758

(the "Land");

B. The Owner has applied to the Town for an amendment to Comox Zoning Bylaw 1850 (the "Bylaw 1850") by way of Comox Zoning Amendment Bylaw 1877 (the "Zoning Amendment Bylaw") to permit multi-family residential development on the Land;

C. The Owner wishes to provide the following amenities with respect to the development on Land:

- (a) A \$18,692 cash payment as a contribution to the Town's Affordable Housing Reserve Fund;
- (b) A \$25,000 cash payment as a contribution for providing one or more of the following public amenities: public electrical vehicle charging stations within Downtown area;

capital improvements at Anderton Park, such as playground enhancement and site furnishings, including shade structure;

- (c) A 0.856 metre road dedication along Balmoral Avenue frontage of the Land;
 - (d) Provision of the following works and services along the full Balmoral Avenue frontage of the Land, in accordance with Town of Comox Subdivision and Development Servicing Bylaw, 1261:
 - a. Vertical face barrier curb and gutter;
 - b. 1.5 m wide brushed concrete sidewalk aligned with the existing sidewalk to the east, with section around protected Red Oak root zone narrowed down to 1.2 m in width;
 - c. A driveway drop with a minimum width of 9.0 m, as measured at the gutter line, with the concrete sidewalk in this location to have a minimum thickness of 150mm. Grading of this down slope driveway must ensure a minimum of 150mm of free-board from the paved level of Balmoral Avenue;
 - d. Concrete boulevard from sidewalk to the property line, outside of the protected Red Oak root zone;
 - e. 2 boulevard trees within 1.2 x 1.2 metre tree wells, equipped with irrigation and electrical service connections to each tree well for the purpose of decorative tree lighting, to the satisfaction of the Parks Superintendent.
 - (e) The retention, maintenance and protection of trees identified for retention in the Tree Inventory Assessment – 1700 Balmoral Ave Development, dated March 28, 2018, prepared by Walter Ernst, Strategic Natural Resource Consultants Inc. and 14 replacement trees per approved Development Permit landscape drawings;
 - (f) The construction of a minimum 5 multi-family dwelling units in accordance with the Bylaw 1850 Section 5.20 Special Needs Housing Standards – Adaptable Housing;
 - (g) Provision of certification that the multi-family building on the Land is built to a minimum BUILT GREEN Silver standard, BC Energy Code Step 2, or equivalent standard for multi-family construction, acceptable to the Town;
 - (h) The construction of dwelling units within 35.0 metres of Balmoral Avenue to have sound attenuation that meets Canada Mortgage and Housing Corporation Standards, in accordance with Town of Comox, Acoustical Standards for Residential Developments, a report prepared by Wakefield Acoustics, dated October 30, 2014 and having alternative means to window opening for ventilation; and
 - (i) At least 5 vehicle parking spaces shall be constructed with 220 Volt electrical connections in underground parking area.
- E. The Council of the Town has given notice and held a public hearing and has, by bylaw, authorized the execution of this Agreement;

NOW THEREFORE in consideration of the mutual promises set out in this Agreement, the parties agree pursuant to section 516.1 of the *Local Government Act* as follows:

APPLICATION OF AGREEMENT

1. This Agreement applies to the Land, including any parcels of land into which the Land may be subdivided.

BYLAW AMENDMENTS NOT TO APPLY

2. For the term of this Agreement, any amendment or repeal of the following sections: 807.1, 807.2, 807.3, 807.4, 807.5, 807.6, 807.7, 807.8, 807.9, 807.10, 807.12 and 807.13 of Bylaw 1850, as amended by the Zoning Amendment Bylaw shall not apply to Land, except:
 - (a) as provided in section 516(6) of the *Local Government Act*; or
 - (b) to the extent that the owner of any parcel comprising Land agrees in writing that the amendment or repeal shall apply to that land.
3. For certainty, and without limiting section 2, the Town agrees that any development permit or building permit that would be issuable in respect of Land on the date of adoption of the Zoning Amendment Bylaw will, subject to Section 9, be issued throughout the term of this Agreement in accordance with Comox Official Community Plan Bylaw, 2011 (Bylaw No. 1685), the Bylaw 1850 apart from the sections specified in Section 2 to the extent that they may differ from the sections in force following adoption of the Zoning Amendment Bylaw and Comox Building Bylaw No. 1472 despite any amendment or repeal of the bylaw provisions specified in section 2 that would otherwise prevent the issuance of the permit.

TERM OF AGREEMENT

4. The term of this Agreement is ten years from the date of adoption of the Zoning Amendment Bylaw.
5. The parties may terminate this Agreement at any time by written agreement of all parties.
6. If the Owner does not comply with all the requirements in Section 8, on which question the opinion of the Town shall be determinative provided that the Town may not act unreasonably, the Town may at its option terminate this Agreement by providing notice in writing to the Owner, provided that the Town has at least two months prior to giving such notice advised the Owner in writing of any alleged failure (the "Default Notice") and the Owner has not corrected the deficiency to the reasonable satisfaction of the Town. The Owner acknowledges the Town's unfettered right to further amend its Bylaw No. 1685 and

Bylaw 1850, to reverse the effect of the Zoning Amendment Bylaw, in the event that the Owner fails to comply with Section 8, and waives any right it would otherwise have to claim, in respect of any such further amendment, that it has established a non-conforming use or a commitment to use Land as permitted by the Zoning Amendment Bylaw.

7. Despite the preceding section, if the default is one that cannot be corrected by the Owner, the Town may give notice of termination at the same time as the notice of default. For certainty, if the Owner should be a corporation, the following are defaults that cannot be remedied by the Owner:
 - (a) if the Owner makes a general assignment for the benefit of creditors; or
 - (b) if the Owner institutes proceedings to be adjudicated bankrupt or insolvent or consents to the institution of bankruptcy or insolvency proceedings against the Owner or files an application or petition or answer or consent seeking re-organization or re-adjustment of the indebtedness of the Owner under the *Bankruptcy and Insolvency Act* or the *Companies' Creditors Arrangement Act* or any law of Canada or any province of Canada relating to bankruptcy or insolvency, or consents to the filing of any such application or petition, or consents to the appointment of a receiver or receiver-manager; or
 - (c) if a receiver, interim receiver, receiver-manager, trustee, liquidator, or custodian of all or substantially all of the property of the Owner or of the Owner's interest in Land is appointed or applied for by the Owner or appointed pursuant to an instrument or by order of a court; or
 - (d) if a judgment, decree, or order is entered by a court of competent jurisdiction adjudging the Owner a bankrupt or insolvent or subject to the provisions of the *Bankruptcy and Insolvency Act* or determining that proceedings for re-organization, arrangement, adjustment, composition, liquidation, or any similar relief under the *Bankruptcy and Insolvency Act* or the *Companies' Creditors Arrangement Act* or any law of Canada or any province of Canada relating to bankruptcy or insolvency have been properly instituted otherwise than by the Owner, provided that such judgment, decree or order is not in good faith contested by the Owner; or
 - (e) if any application or petition or certificate or order is made or granted for the winding-up or dissolution of the Owner, voluntary or otherwise.

AMENITIES FOR DEVELOPMENT OF LAND

8. The Owner shall provide the following amenities by the deadlines herein specified:
 1. Within 30 days of the adoption by Council of the Zoning Amendment Bylaw and prior to any development of the land:

- (a) payment to the Town by certified cheque or bank draft the sum of \$ 18,692 as a contribution to the Town's Affordable Housing Fund;
 - (b) payment to the Town by certified cheque or bank draft the sum of \$ 25,000 as a contribution for providing one or more of the following public amenities: public electrical vehicle charging stations within Downtown area; capital improvements at Anderton Park, such as playground enhancement and site furnishings, including shade structure; and
 - (c) a 0.856 metre road dedication along Balmoral Avenue frontage of the Land.
2. Prior to applying for an occupancy permit in respect of any buildings or portion thereof on the Land:
- (a) Provision of the following works and services along the full Balmoral Avenue frontage of the Land, in accordance with Town of Comox Subdivision and Development Servicing Bylaw, 1261:
 - i) Vertical face barrier curb and gutter;
 - ii) 1.5 m wide brushed concrete sidewalk aligned with the existing sidewalk to the east, with section around protected Red Oak root zone narrowed down to 1.2 m in width;
 - iii) A driveway drop with a minimum width of 9.0 m, as measured at the gutter line, with the concrete sidewalk in this location to have a minimum thickness of 150mm. Grading of this down slope driveway must ensure a minimum of 150mm of free-board from the paved level of Balmoral Avenue;
 - iv) Concrete boulevard from sidewalk to the property line, outside of the protected Red Oak root zone;
 - v) 2 boulevard trees within 1.2 x 1.2 metre tree wells, equipped with irrigation and electrical service connections to each tree well for the purpose of decorative tree lighting, to the satisfaction of the Parks Superintendent.
 - (b) The construction of a minimum 5 multi-family dwelling units in accordance with the Bylaw 1850 Section 5.20 Special Needs Housing Standards – Adaptable Housing;
 - (c) Provision of certification that the dwelling units on the Land are built to a minimum BUILT GREEN Silver standard, BC Energy Code Step 2, or equivalent standard for multi-family construction, acceptable to the Town;
 - (d) provision of certification that dwelling units within 35.0 metres of Balmoral Avenue have sound attenuation that meets Canada Mortgage and Housing Corporation Standards, in accordance with Town of Comox, Acoustical Standards for Residential Developments, a report prepared by Wakefield Acoustics, dated October 30, 2014 and having alternative means to window opening for ventilation;

and

- (e) The construction of a minimum 5 vehicle parking spaces with 220 Volt electrical connections in underground parking area.

RESTRICTIONS ON DEVELOPMENT OF LAND

- 9. The Owner shall not, despite the adoption of the Zoning Amendment Bylaw, construct or occupy any building or structure on Land until or unless the Owner's obligations under Section 8 have been met by the deadlines specified in the subsections of Section 8, and the Town shall be under no obligation to issue any building permit or occupancy permit or other authorization to which the Owner would be entitled were it not for this Section.
- 10. The Owner shall grant to the Town, and register in the applicable land title office against title to Land in priority to all financial liens, charges and encumbrances, covenants under Section 219 of the *Land Title Act* with respect to the amenities to be provided under section 8.

ASSIGNMENT OF AGREEMENT

- 11. The Owner may assign this Agreement if the Town, acting reasonably, consents in writing to the assignment and the assignee has executed and delivered to the Town a notice of assumption and has entered into an assignment agreement with the Owner assigning the Agreement to the assignee.

GENERAL TERMS AND CONDITIONS

- 12. Any notice permitted or required by this Agreement to be given to either party must be given to that party at the address set out above, or to any other address of which the party has given the other party notice in writing expressly for the purposes of this Agreement.
- 13. Except as expressly set out in this Agreement, nothing in this Agreement shall prejudice or affect the rights and powers of the Town in the exercise of its functions under the *Community Charter* or the *Local Government Act* or any of its bylaws, or those of the Town's approving officer under the *Land Title Act*, *Strata Property Act* or Bare Land Strata Regulations.
- 14. Any opinion, decision, act or expression of satisfaction or acceptance provided for in this Agreement may be taken or made by the Town's Municipal Planner, unless expressly provided to be taken or made by another official of the Town, and in the process of exercising any such opinion, decision, act or expression of satisfaction or acceptance, the Town's Municipal Planner or other such person shall act reasonably.

15. No provision of this Agreement is to be considered to have been waived by the Town unless the waiver is expressed in writing by the Town. The waiver by the Town of any breach by any of the other parties of any provision is not to be construed as or constitute a waiver of any further or other breach.
16. Whenever in this Agreement the Town is required or entitled to exercise any discretion in the granting of consent or approval, or is entitled to make any determination, take any action or exercise any contractual right or remedy, the Town may do so in accordance with the contractual provisions of this Agreement and no public law duty, whether arising from the principles of procedural fairness or the rules of natural justice or otherwise, shall have any application in the interpretation or implementation of this Agreement.
17. The Owner shall indemnify and save harmless the Town, its officers, employees, Council members, agents and others (the "Town Representatives") from and against any and all actions, causes of action, liabilities, demands, losses, damages, costs, expenses (including actual fees of professional advisors), costs for the remediation of contamination, fines, penalties and other harm of any kind whatsoever, whether related to death, bodily injury, property loss, property damage, property contamination or consequential loss or damage, suffered or incurred by the Town or any of the Town Representatives, directly or indirectly, arising from, resulting from, connected with or related to:
 - (a) any default or breach of this Agreement by the Owner; and
 - (b) any wrongful act, omission or negligence of the Owner or its directors, officers, employees, agents, contractors, subcontractors, licensees, or others for whom they are responsible in law with respect to the covenants and obligations of the Owner pursuant to this Agreement.
18. This indemnity shall survive any conclusion or other termination of this Agreement, in relation to any matter arising prior to it.
19. If the Owner is delayed or prevented from the performance of any covenant or agreement required hereunder by reason of any unavoidable cause, then performance of such covenant or agreement shall be excused for the period during which such performance is delayed or prevented and the time for the performance thereof shall be extended accordingly. For the purposes of this section, "unavoidable cause" means any event or contingency beyond the reasonable control of the Owner, including without limitation a delay caused by weather conditions, power failure, fire or other casualty, governmental laws, regulations or controls, civil commotion, insurrection, sabotage, invasion, rebellion, military or usurped power, war or war-like operations and acts of God, but excluding a delay caused by lack of funds.
20. Time is of the essence of this Agreement and will remain of the essence notwithstanding the extension of any dates.

21. The Owner acknowledges and agrees that the Town, acting reasonably, may, despite any public law limitations on the withholding of building permits and occupancy permits, withhold building permits and occupancy permits for the purpose of ensuring compliance with and administering the terms of this Agreement.
22. This Agreement may be executed in multiple counterparts, each of which is to be deemed to be an original and all of which together constitute one and the same agreement.
23. This Agreement may be executed by the parties and transmitted by fax or scanned and emailed and if so executed and transmitted this agreement will be for all purposes as effective as if the parties had executed and delivered an original agreement.

As evidence of their agreement to be bound by the terms, the parties have caused this Agreement to be executed and delivered under seal by their authorized signatories as of the dates set out below:

TOWN OF COMOX
by its authorized signatories:

Name: _____ Date: _____

Name:

Owner
by its authorized signatories:

Name: _____ Date: _____

Name:

CONSENT AND PRIORITY AGREEMENT

WHEREAS [REDACTED] (the "Chargeholder") is the holder of a Mortgage and Assignment of Rents (collectively, called the "Charge") encumbering the lands (the "Lands") described in item 2 of the *Land Title Act* Form C attached hereto, which was registered in the Victoria Land Title Office under numbers [REDACTED].

THEREFORE THIS CONSENT AND PRIORITY AGREEMENT IS EVIDENCE THAT IN CONSIDERATION OF \$1.00 AND OTHER GOOD AND VALUABLE CONSIDERATION PAID BY THE TRANSFEREE TO THE CHARGEHOLDER:

1. The Chargeholder hereby consents to the granting and registration of the Section 219 Covenant and Rent Charge attached hereto (collectively, the "Covenant") and the Chargeholder hereby agrees that the Covenant shall be binding upon its interest in and to the Lands.
2. The Chargeholder hereby grants to the transferee described in item 6 of the *Land Title Act* Form C attached hereto priority for the Covenant over the Chargeholder's right, title and interest in and to the Lands, and the Chargeholder does hereby postpone the Charge and all of its right, title and interest thereunder to the Covenant as if the Covenant had been executed, delivered and registered prior to the execution, delivery and registration of the Charge.

IN WITNESS WHEREOF, the Chargeholder has executed and delivered this Consent and Priority Agreement by executing the *Land Title Act* Form D above which is attached hereto and forms part of this Agreement.

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

ATTACHMENT 5

RESTRICTIVE COVENANTS PROPOSED TO BE DISCHARGED

LAND TITLE ACT

FORM C

(Section 219.81)

Province of British Columbia

21 NOV 2007 14 50

FB122070

GENERAL INSTRUMENT - PART 1

(This area for Land Title Office use)

Page 1 of 13 pages

1. **APPLICATION:** (name, address, phone number and signature of applicant, applicant's solicitor or agent)

Dorwin Cho, Kaminsky & Company, Lawyers, 220 - 7525 King
George Highway, Surrey BC V3W 5A8 Tel: (604) 591-7877
Our File: 8210-003

DYE & DURHAM
Authorized Agent

2. **PARCEL IDENTIFIER(S) AND LEGAL DESCRIPTION(S) OF LAND:**

(PID)

(LEGAL DESCRIPTION)

026-810-361

Lot A, Section 56, Comox District, Plan VIP81758

3. **NATURE OF INTEREST:**
DESCRIPTION**DOCUMENT REFERENCE**
(page and paragraph)**PERSON ENTITLED TO INTEREST**

SEE SCHEDULE

4. **TERMS:** Part 2 of this Instrument consists of (select one only)

(a) Filed Standard Charge Terms

D.F. Number

(b) Express Charge Terms

X

Annexed as Part 2

(c) Release

There is no Part 2 to this instrument

A selection of (a) or (b) includes any additional or modified terms referred to in Item 7 or in a schedule annexed to this instrument. If (c) is selected, the charge described in Item 3 is released or discharged as a charge on the land described in Item 2.

5. **TRANSFEROR(S):***

RENAISSANCE COMOX VILLAS LTD. (Inc. No. BC0696102) and CANADIAN WESTERN BANK

6. **TRANSFEE(S):** (including postal address(es) and postal code(s)):

TOWN OF COMOX, having an address at 1809 Beaufort Avenue, Comox, British Columbia, V9M 1R9

7. **ADDITIONAL OR MODIFIED TERMS:****

None

AM 07/11/21 14:53:46 01 V1 783131
CHARGE \$131.30

8. **EXECUTIONS:**** This instrument creates, assigns, modifies, enlarges, discharges or governs the priority of the interest(s) described in Item 3 and the Transferor(s) and every other signatory agree to be bound by this instrument, and acknowledge(s) receipt of a true copy of the filed standard charge terms, if any.

Officer Signatures(s)

Execution Date

Y	M	D
07	02	09

Party(ies) Signature(s)

RENAISSANCE COMOX VILLAS LTD. by its authorized signatory:

Christopher Buss

DORWIN J. CHO

Barrister & Solicitor
Ste. 220 - 7525 King George Hwy
Surrey, B.C. V3W 5A8

OFFICER CERTIFICATION: Your signature constitutes a representation that you are a solicitor, notary public or other person authorized by the *Evidence Act*, R.S.B.C. 1996, c. 124, to take affidavits for use in British Columbia and certifies the matters set out in Part 5 of the *Land Title Act* as they pertain to the execution of this instrument.

*If space insufficient, enter "SEE SCHEDULE" and attach schedule in Form E.

**If space insufficient, continue executions on additional page(s) in Form D.

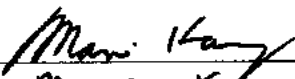
LAND TITLE ACT
FORM D

EXECUTIONS CONTINUED

Page 2 of 13 pages

Officer Signatures(s)


(as to both signatures, if applicable)
LESLIE JOHN
A COMMISSIONER FOR TAKING
AFFIDAVITS FOR BRITISH COLUMBIA
#101 - 6475 METRAL DRIVE
NANAIMO BC V9T 2L9

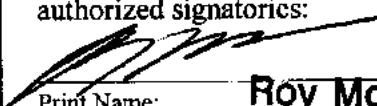

Marie K. Hany
A Commissioner for the taking
of Affidavits in and for the
Province of British Columbia
1809 Beaufort Avenue
Comox, B.C. V9M 1R9

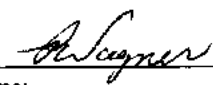
Execution Date

Y	M	D
07	02	16
07	11	15

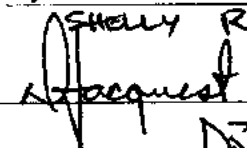
Party(ies) Signature(s)

CANADIAN WESTERN BANK by its
authorized signatories:


Print Name: **ROY McNair**


Print Name: **PATRICIA WAGNER**

TOWN OF COMOX
by its authorized signatories:


Shelly RUSSWURM

D. Jaquest

OFFICER CERTIFICATION:

Your signature constitutes a representation that you are a solicitor, notary public or other person authorized by the *Evidence Act*, R.S.B.C. 1996, c. 124, to take affidavits for use in British Columbia and certifies the matters set out in Part 5 of the *Land Title Act* as they pertain to the execution of this instrument.

LAND TITLE ACT

FORM E**SCHEDULE**

Page 3 of 13 pages

ENTER THE REQUIRED INFORMATION IN THE SAME ORDERS AS THE INFORMATION MUST APPEAR ON THE FREEHOLD TRANSFER FORM, MORTGAGE FORM OR GENERAL DOCUMENT FORM.

3. NATURE OF INTEREST:

DESCRIPTION	DOCUMENT REFERENCE (page and paragraph)	PERSON ENTITLED TO INTEREST
Section 219 Covenant	Page 5-7 Paragraphs 1-23	Transferee
Priority Agreement granting Section 219 Covenant <i>FB 122070</i> priority over Mortgage No. EW142317 and Assignment of Rents No. EW142318	Page 11	Transferee

TERMS OF INSTRUMENT - PART 2

THIS AGREEMENT made as of the 9TH day of February, 2007.

**RESTRICTIVE COVENANT: LAND TITLE ACT S.219
(Historical Building & Three Existing Trees)**

BETWEEN:

RENAISSANCE COMOX VILLAS LTD.

1142 Denny Road
Comox, BC V9M 4B5

(the "Owner")

OF THE FIRST PART

AND:

TOWN OF COMOX, a municipality pursuant to the *Local Government Act*, c 323, having its Offices at 1809 Beaufort Avenue, Comox, BC, V9M 1R9.

(the "Town")

OF THE SECOND PART

WHEREAS:

A. The Owner is the registered owner of those lands and premises situate in the Town of Comox, Province of British Columbia, more particularly known and described as:

PID: 026-810-361
Lot A, Section 56, Comox District, Plan VIP81758

(the "Lands");

B. By provisions of Section 219 of the *Land Title Act R.S.B.C.* 1996 C.250, as amended (the "Land Title Act"), a covenant, whether of a negative or positive nature in respect of the use of land, or, that land is or is not to be built on, in favour of the Town, may be registered as a charge against the title to that land and is enforceable against the Owner and his successors in title, even if the covenant is not annexed to land owned by the Town.

C. The Owner wishes to grant this covenant agreement to the Town to ensure that any future use of the Lands is in accordance with the following.

NOW THEREFORE THIS AGREEMENT WITNESSETH that pursuant to Section 219 of the *Land Title Act*, and in consideration of ONE (\$1.00) DOLLAR now paid to the Owner by the Town (the receipt of which is hereby acknowledged) the Owner covenants and agrees with the Town as follows:

Tree retention

1. The Owner must not cut down, remove, or prune any the trees identified on Schedule 1 (the "Protected Trees"), or undertake any activity on the Land, including excavation or the application of agricultural chemicals, that is likely to damage the Protected Trees. Despite the foregoing, the Owner may prune the Protected Trees in a manner that is consistent with generally accepted arboricultural practices to maintain their health and structural stability, having first obtained the written approval of the Town to such pruning.

Tree replacement

2. Should any of the Protected Trees die of any cause whatsoever, or be in a state of health that in the written opinion of an arborist or arboriculturist poses a risk to persons or property, the Owner must replace it with a specimen of the species and characteristics specified in writing by the Town through the Parks Superintendent of the Town or other official of the Town having responsibility for parks, measuring at least 20 cm in diameter at breast height, at a location as near to the location of the Protected Tree it is replacing as is consistent with sound arboricultural practices. The Owner must maintain such replacement tree so as to ensure survival of transplantation, and thereafter such replacement tree shall be deemed to be a Protected Tree.

Restoration of historical building

3. If the Owner obtains a building permit to construct a multi-family residential building on the Land, the Owner must restore the Historical Building shown on Schedule 2 (the "Historical Building"), which presently exists on the Land, by undertaking the work set out in Schedule 3 to the satisfaction of the Town, with all work to be completed prior to the occupancy of the multi-family residential building.
4. With the exception of the work described in sections 3 and 5, the Owner must not alter, modify, or renovate the Historical Building so as to alter its external appearance in any way.

Modification of historical building

5. The Owner may modify the Historical Building by demolishing and removing the Attached Garage shown on Schedule 2 (the "Attached Garage"), which presently exists on the Land, and altering the façade of the Historical Building to which the Attached Garage was attached such that the exterior design, construction materials and finishes of the façade are consistent with those of the rest of the Historical Building. For that purpose, the Owner must provide to the Town for its approval, prior to the demolition of the Attached Garage, plans and building elevations indicating the proposed work. The approval of the Town of such plans and elevations shall not relieve the Owner from any requirement for a building permit authorizing the work.

Maintenance of historical building

6. The Owner must keep the exterior of the Historical Building in good appearance and repair as would a reasonable and prudent owner. Maintenance work involving exterior painting must be done without changing the colour of the building element being painted, and maintenance work involving the replacement of building elements such as window trim and glazing must utilize like materials to those being replaced.
7. If the Historical Building is damaged, the Owner must repair it such that the form and appearance of the damaged portions of the building match the undamaged portions. If the Historical Building is destroyed, or damaged to an extent that the Owner and the Town agree makes repair impractical, the Owner must replicate the Historical Building such that the exterior façades and roof of the new building are a reasonable facsimile of the Historical Building's façades and roof, constructed with similar materials and to the original design, and thereafter the provisions of this Agreement including this section shall apply to the replacement building as if it were the Historical Building.
8. The Owner must insure the Historical Building and keep it insured to its full replacement value against all perils including damage or destruction by earthquake.

Relocation and use of historical building on redevelopment

9. In the event that the Owner obtains a development permit to construct a multi-family residential building on the Land, the Owner may relocate the Historical Building on the Land to a location specified in the development permit and approved by the Town, and thereafter must undertake the restoration work described in section 3 and maintain the Historical Building in accordance with this Agreement.
10. Upon such relocation and completion and sale of the multi-family residential building on the Land, the Historical Building may be used only as a common facility for residents of the multi-family residential building. Until such relocation, the Heritage Building may continue to be used as a single family residential dwelling.

Heritage Plaque

11. The Owner must place on the Historical Building and maintain in place a plaque complying with the specifications of the Town as to the location and nature of the plaque, identifying the Historical Building as a historical building.
12. The Town or a person authorized by the Town is authorized to enter the Land at any time in order to ascertain whether the terms of this Agreement have been and continue to be complied with.
13. The Owner covenants and agrees to indemnify and save harmless the Town, its agents and employees, from any and all liabilities, damages, losses, claims, causes of action, suits, demands, expenses, costs and legal fees, whatsoever that the Town, its agents or employees, may incur arising from any breach of this Agreement by the Transferor.

14. The Owner and the Town agree that the enforcement of this Agreement shall be entirely within the discretion of the Town and that the execution and registration of this Agreement against the title to the Land shall not be interpreted as creating any duty on the part of the Town to the Owner or to any other person to enforce any provision or the breach of any provision of this Agreement.
15. Nothing contained or implied herein shall prejudice or affect the rights and powers of the Town in the exercise of its functions under any public or private statutes, bylaws, orders and regulations, all of which may be fully and effectively exercised in relation to the Land as if this Agreement had not been executed and delivered by the Owner.
16. It is mutually understood and agreed by and between the parties hereto that this indenture shall be construed as a covenant running with the Land.
17. The parties agree that this Agreement may only be modified or discharged with the consent of the Town pursuant to the provisions of Section 219(9) of the *Land Title Act*.
18. The Owner shall, forthwith do or cause to be done all acts or things necessary to give proper effect to the intention of this Agreement including the intention that this Agreement be registered against the title to the Land in the Land Title Office in priority to all charges or interests in the Land.
19. The Owner saves harmless and indemnifies the Town, its agents and employees, from and against all manner of actions, claims, debts, demands, promises or legal costs of any kind which may arise either directly or indirectly from the granting, registration or existence of this Agreement.
20. The invalidity of any particular provision of this Agreement shall not affect any other provision hereof and this Agreement shall be constructed as if such invalid provision were omitted.
21. This Agreement shall be binding upon and enure to the benefit of the respective parties hereto, their heirs, successors, executors, administrators and assigns.
22. The parties hereto covenant and agree that they will do and execute such further acts and deeds and give such further assurances as may be reasonably necessary to implement the true intent and meaning of this Agreement.
23. Whenever the singular or masculine is used in this Agreement, the same shall be construed as meaning the plural or feminine or body politic or corporate where the context or the parties so require, and vice versa.

IN WITNESS WHEREOF the parties hereto have executed the Form C attached to this Agreement as of the day and year first above written.

SCHEDULE 1

TRECE PLAN

SUMMARY



OUTLOOK

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the
RENAISSANCE

**PROPOSED
RESIDENTIAL
PROJECT**

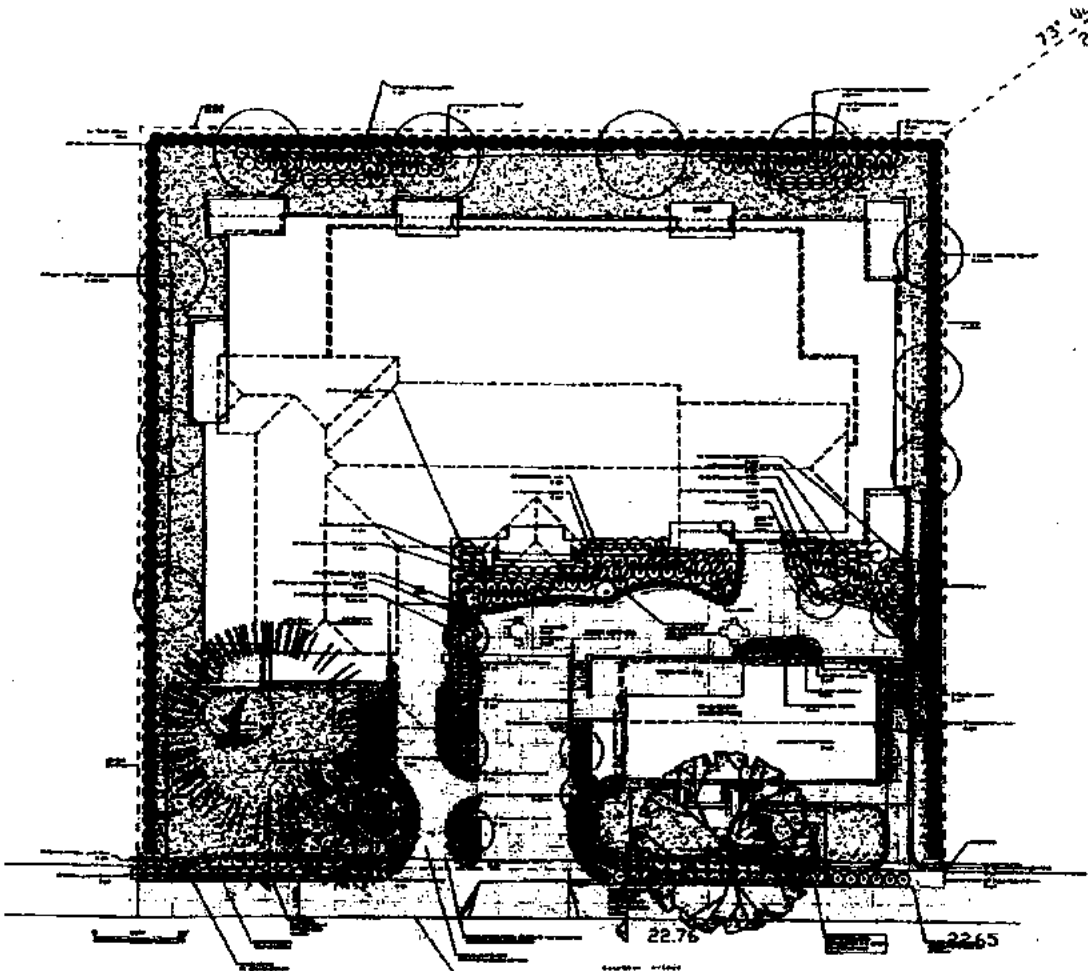
Cornish Valley B.C.



LANDSCAPE PLAN



SCHEDULE # 1 - PROTECTED TREES

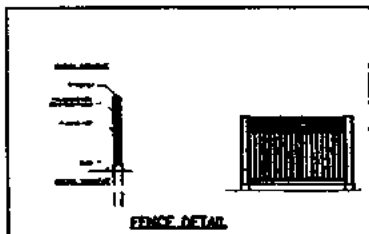
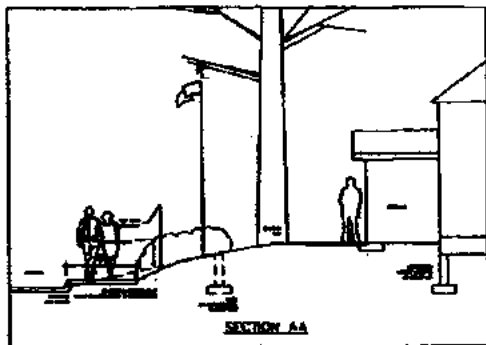
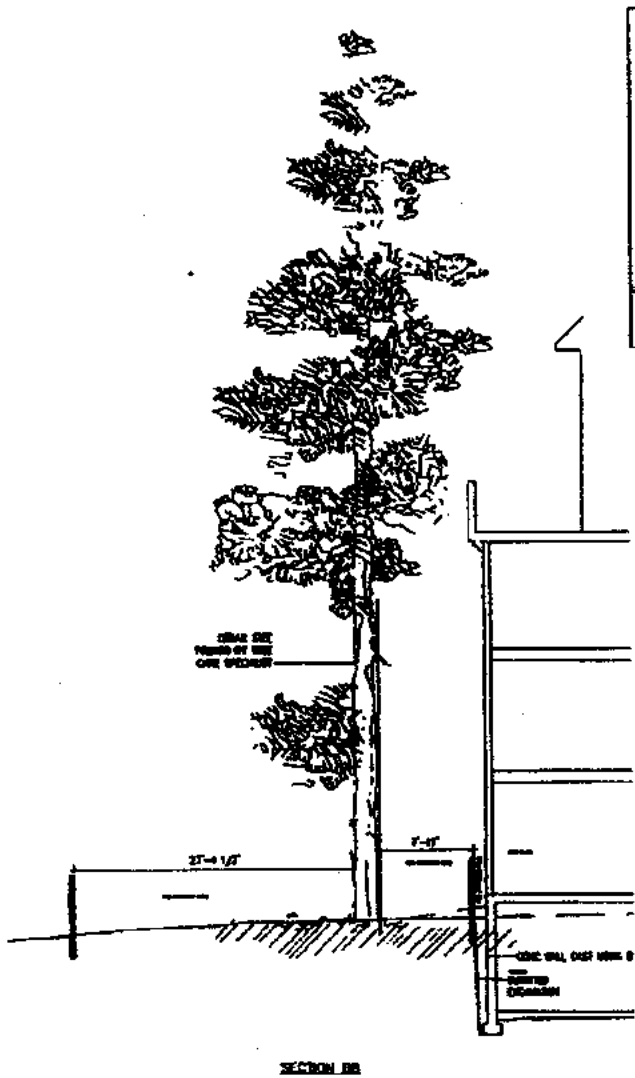


THREE PROTECTED TREES - NUMBERED AND
HIGHLIGHTED IN BOLD

A1

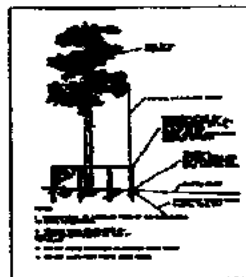
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A3



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1. The first step is to identify the problem or question that needs to be answered. This involves understanding the context and the specific requirements of the task.



TREE PROTECTION FENCE DETAIL (MIS)

SUMMARY





OUTLOOK
LAND DESIGN INC.
10000 WILSON AVENUE
SUITE 100
DALLAS, TEXAS 75243
(214) 343-1111

DRAWING SYMBOLS

Category	Item	Value
Total	1	100
	2	100
	3	100
	4	100
	5	100
	6	100
	7	100
	8	100
	9	100
	10	100

the
RENAISSANCE
PROPOSED
RESIDENTIAL
PROJECT

Carmax Valley B.C.



LANDSCAPE DETAILS

DATE	FILE NO.	BY	REMARKS
1-1-68	100-102	100-102	100-102

A1

A2

A3

SCHEDULE #2SCHEDULE 2

Page 10 of 13 pages

HISTORICAL BUILDINGS - TO BE RESTORED

47

MORRIS RES.
BALMORAL AVE

FRONT VIEW

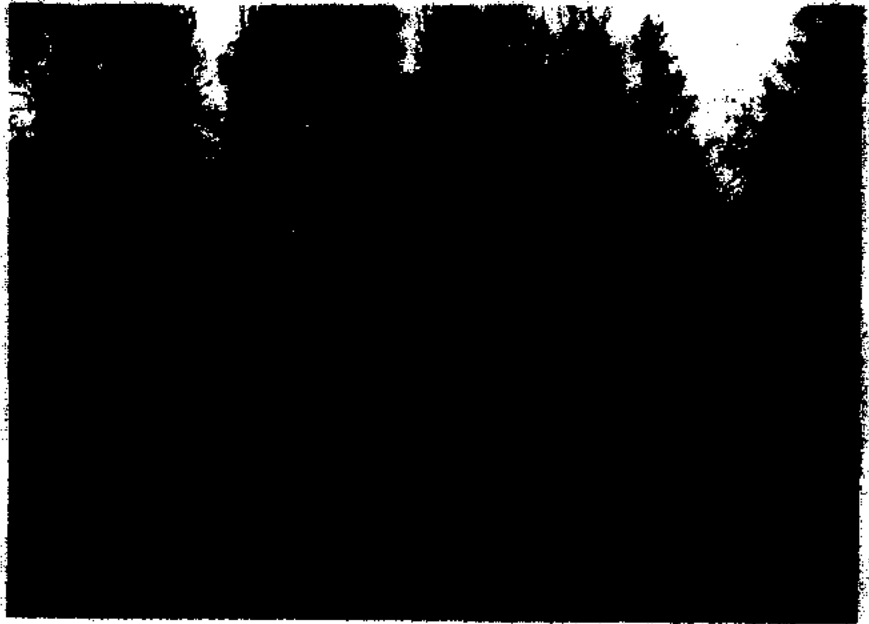


FRONT VIEW

SCHEDULE #2

SCHEDULE 2, cont'd

Page 11 of 13 pages

ATTACHED GARAGE - TO BE DEMOLISHEDFRONT ELEVATION
(SOUTH)BACK ELEVATION
(NORTH)

WEST ELEVATION.



SCHEDULE 3**RESTORATION WORK****Restoration Work to Historical Building:**

- 1) Reconstruct the Historical Building's chimney to its original state using new or old materials that are consistent with the original materials used to construct the Historical Building's chimney. After removal of the vegetation currently covering the Historical Building's chimney, but before any other alterations are made to the chimney, the Owner shall provide the Town a photograph of the Historical Building's chimney.
- 1)
- 2) Remove the attached garage to the east side of the Historical Building.
- 3) Reconstruct, using new or old materials, and adapt to suit the new use of the Historical Building, the façade of the Historical Building to which the garage was attached such that the exterior design, construction materials and finishes of the façade are consistent with those of the rest of the Historical Building.
- 4) All other exterior elements of the building including but not limited to shingles, siding, windows and trim, will be restored or replaced with new or old materials that are consistent with the original materials used to construct the Historical Building.

Page 13 of 13 pages

MEMORANDUM AS TO ENCUMBRANCES, LIENS AND INTERESTS

MORTGAGE & ASSIGNMENT OF RENTS IN FAVOUR OF
CANADIAN WESTERN BANK
REGISTERED UNDER NUMBER EW142317 & EW142318

CONSENT

CANADIAN WESTERN BANK (the "Lender"), being the holder of the encumbrance or entitled to the lien or interest referred to in the memorandum above written, in consideration of \$1.00 and other valuable consideration hereby approves of and consents to the registration of the within Section 219 Covenant and doth covenant and agree that the same shall be binding upon its interest in or charge upon the said lands and shall be an encumbrance upon the said lands prior to the above noted encumbrance, lien or interest in the same manner to and to the same effect as it is had been dated and registered prior to the said encumbrance, lien or interest.

IN WITNESS WHEREOF the Lender has executed the Form C attached to this Consent.

END OF DOCUMENT

LAND TITLE ACT

FORM C

(Section 219.81)

Province of British Columbia

FB122077

21 NOV 2007 14 51

FB122076

GENERAL INSTRUMENT - PART 1

(This area for Land Title Office use)

Page 1 of 7 pages

1. APPLICATION: (name, address, phone number and signature of applicant, applicant's solicitor or agent)

Dorwin Cho, Kaminsky & Company, Lawyers, 220 - 7525 King
George Highway, Surrey BC V3W 5A8 Tel: (604) 591-7877
Our File: 8210-003

SEE & DURHAM

Authorized Agent

2. PARCEL IDENTIFIER(S) AND LEGAL DESCRIPTION(S) OF LAND:**

(PID)

(LEGAL DESCRIPTION)

026-810-361

Lot A, Section 56, Comox District, Plan VIP81758

3. NATURE OF INTEREST:*

DESCRIPTION

DOCUMENT REFERENCE

(page and paragraph)

PERSON ENTITLED TO INTEREST

SEE SCHEDULE

4. TERMS: Part 2 of this Instrument consists of (select one only)

(a) Filed Standard Charge Terms

D.F. Number

(b) Express Charge Terms

X

Annexed as Part 2

(c) Release

There is no Part 2 to this instrument

A selection of (a) or (b) includes any additional or modified terms referred to in Item 7 or in a schedule annexed to this instrument. If (c) is selected, the charge described in Item 3 is released or discharged as a charge on the land described in Item 2.

5. TRANSFEROR(S):*

RENAISSANCE COMOX VILLAS LTD. (Inc. No. BC0696102) and CANADIAN WESTERN
BANK

6. TRANSFEREE(S): (including postal address(es) and postal code(s)):

TOWN OF COMOX, having an address at 1809 Beaufort Avenue, Comox, British Columbia, V9M 1R9

7. ADDITIONAL OR MODIFIED TERMS:*

None

AW 07/11/21 14:54:38 01 VI 783131
CHARGE \$131.30

8. EXECUTIONS:** This instrument creates, assigns, modifies, enlarges, discharges or governs the priority of the interest(s) described in Item 3 and the Transferor(s) and every other signatory agree to be bound by this instrument, and acknowledge(s) receipt of a true copy of the filed standard charge terms, if any.

Officer Signatures(s)

Execution Date

Y	M	D
07	02	09

Party(ies) Signature(s)

RENAISSANCE COMOX VILLAS
LTD. by its authorized signatory:

Christopher Buss

DORWIN J. CHO

Barrister & Solicitor
Ste. 220 - 7525 King George Hwy
Surrey, B.C. V3W 5A8

OFFICER CERTIFICATION: Your signature constitutes a representation that you are a solicitor, notary public or other person authorized by the Evidence Act, R.S.B.C. 1996, c. 124, to take affidavits for use in British Columbia and certifies the matters set out in Part 5 of the Land Title Act as they pertain to the execution of this instrument.

*If space insufficient, enter "SEE SCHEDULE" and attach schedule in Form E.

**If space insufficient, continue executions on additional page(s) in Form D.

LAND TITLE ACT

FORM D**EXECUTIONS CONTINUED**

Page 2 of 7 pages

Officer Signatures(s)



(as to both signatories)

LESLIE JOHN
 A COMMISSIONER FOR TAKING
 AFFIDAVITS FOR BRITISH COLUMBIA
 #101 - 6475 METRAL DRIVE
 NANAIMO BC V9T 2L9



Marcia Kamenz
 A Commissioner for the taking
 of Affidavits in and for the
 Province of British Columbia
 1809 Beaufort Avenue
 Comox, B.C. V9M 1R9

Execution Date

Y	M	D
07	02	16
07	11	15

Party(ies) Signature(s)

CANADIAN WESTERN BANK by its
 authorized signatories:

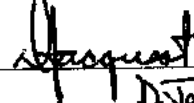
Print Name:

Roy McNair

Print Name:

PATRICIA WAGNER**TOWN OF COMOX**

by its authorized signatories:

**Shelly Russell****D. Jacquet****OFFICER CERTIFICATION:**

Your signature constitutes a representation that you are a solicitor, notary public or other person authorized by the *Evidence Act*, R.S.B.C. 1996, c. 124, to take affidavits for use in British Columbia and certifies the matters set out in Part 5 of the *Land Title Act* as they pertain to the execution of this instrument.

LAND TITLE ACT

FORM E**SCHEDULE**

Page 3 of 7 pages

ENTER THE REQUIRED INFORMATION IN THE SAME ORDERS AS THE INFORMATION MUST APPEAR ON THE FREEHOLD TRANSFER FORM, MORTGAGE FORM OR GENERAL DOCUMENT FORM.

3. NATURE OF INTEREST:

DESCRIPTION	DOCUMENT REFERENCE (page and paragraph)	PERSON ENTITLED TO INTEREST
Section 219 Covenant	Page 5-6 Paragraphs 1-15	Transferee
Priority Agreement granting Section 219 Covenant <i>FR 122070</i> priority over Mortgage No. EW142317 and Assignment of Rents No. EW142318	Page 7	Transferee

Page 4 of 7 pages

TERMS OF INSTRUMENT - PART 2THIS AGREEMENT made as of the 9th day of February, 2007.**RESTRICTIVE COVENANT: LAND TITLE ACT S.219
(Over Sized Vehicle Parking)**

BETWEEN:

RENAISSANCE COMOX VILLAS LTD.1142 Denny Road
Comox, BC V9M 4B5

(the "Grantor")

OF THE FIRST PART

AND:

TOWN OF COMOX, a municipality pursuant to the *Local
Government Act*, c 323, having its Offices at 1809 Beaufort
Avenue, Comox, BC, V9M 1R9.

(the "Town")

OF THE SECOND PART

WHEREAS:

A. The Grantor is the registered owner of those lands and premises situate in the Town of Comox, Province of British Columbia, more particularly known and described as:

PID: 026-810-361
Lot A, Section 56, Comox District, Plan VIP81758

(the "Lands");

B. By provisions of Section 219 of the *Land Title Act* R.S.B.C. 1996 C.250, as amended (the "Land Title Act"), a covenant, whether of a negative or positive nature in respect of the use of land, or, that land is or is not to be built on, in favour of the Town, may be registered as a charge against the title to that land and is enforceable against the Grantor and his successors in title, even if the covenant is not annexed to land owned by the Town.

C. The Grantor wishes to grant this covenant agreement to the Town to ensure that any future use of the Lands is in accordance with the following.

NOW THEREFORE THIS AGREEMENT WITNESSETH that pursuant to Section 219 of the *Title Act*, and in consideration of ONE (\$1,00) DOLLAR now paid to the Grantor by the Town (the receipt of which is hereby acknowledged) the Grantor covenants and agrees with the Town as follows:

1. The Grantor covenants and agrees with the Town that it will not and will not permit any person to park or store on the Lands any chattels, other than private passenger vehicles, including but not limited to commercial vehicles and machinery (except for temporary construction purposes), trailers, campers, motor homes, trucks (greater than 4.4 tonne gross weight) and boats.
2. The building inspector for the Town or a person authorized by the Town is authorized to enter the Lands at any time in order to ascertain whether the terms of this Agreement have been and continue to be complied with.
3. The Covenants contained in this Indenture shall be construed as covenants running with the Lands until discharged by an instrument in writing duly executed by the Town and filed at the Land Title Office.
4. Nothing contained or implied herein will in any way prejudice or affect the rights and powers of the Town in the exercise of its functions under any public and private statutes, by-laws, orders and regulations, all of which may be fully exercised in relation to the Lands as if this Indenture had not been executed and delivered by the Grantor.
5. The Grantor hereby releases, indemnifies and saves harmless the Town, its elected and appointed officials, employees and agents from and against any and all liability, actions, causes of actions, claims, damages, expenses, costs, debts, demands, legal costs or losses suffered or incurred by the Town arising from the granting or existence of this Agreement, from the performance by the Grantor of this Agreement or any default of the Grantor under or in respect of this Agreement.
6. The Grantor and the Town agree that the enforcement of this Agreement shall be entirely within the discretion of the Town and that the execution and registration of this Agreement against the title to the Lands shall not be interpreted as creating any duty on the part of the Town to the Grantor or to any other person to enforce any provision or the breach of any provision of this Agreement.
7. The Grantor shall, forthwith do or cause to be done all acts or things necessary to give proper effect to the intention of this Agreement including the intention that this Agreement be registered against the title to the Lands in the Land Title Office in priority to all charges or interests in the Lands.
8. The parties agree that this Agreement may only be modified or discharged with the consent of the Town pursuant to the provisions of Section 219(9) of the *Land Title Act*.

Page 6 of 7 pages

9. Nothing contained or implied herein shall prejudice or affect the rights and powers of the Town in the exercise of its functions under any public or private statutes, bylaws, orders and regulations, all of which may be fully and effectively exercised in relation to the Land as if this Agreement had not been executed and delivered by the Owner.
10. It is mutually understood and agreed by and between the parties hereto that this indenture shall be construed as a covenant running with the Land.
11. The Grantor saves harmless and indemnifies the Town, its agents and employees, from and against all manner of actions, claims, debts, demands, promises or legal costs of any kind which may arise either directly or indirectly from the granting, registration or existence of this Agreement.
12. The invalidity of any particular provision of this Agreement shall not affect any other provision hereof and this Agreement shall be constructed as if such invalid provision were omitted.
13. This Agreement shall be binding upon and enure to the benefit of the respective parties hereto, their heirs, successors, executors, administrators and assigns.
14. The parties hereto covenant and agree that they will do and execute such further acts and deeds and give such further assurances as may be reasonably necessary to implement the true intent and meaning of this Agreement.
15. Whenever the singular or masculine is used in this Agreement, the same shall be construed as meaning the plural or feminine or body politic or corporate where the context or the parties so require, and *vice versa*.

IN WITNESS WHEREOF the parties hereto have executed the Form C attached to this Agreement as of the day and year first above written.

Page 7 of 7 pages

MEMORANDUM AS TO ENCUMBRANCES, LIENS AND INTERESTS

MORTGAGE & ASSIGNMENT OF RENTS IN FAVOUR OF
CANADIAN WESTERN BANK
REGISTERED UNDER NUMBER EW142317 & EW142318

CONSENT

CANADIAN WESTERN BANK (the "Lender"), being the holder of the encumbrance or entitled to the lien or interest referred to in the memorandum above written, in consideration of \$1.00 and other valuable consideration hereby approves of and consents to the registration of the within Section 219 Covenant and doth covenant and agree that the same shall be binding upon its interest in or charge upon the said lands and shall be an encumbrance upon the said lands prior to the above noted encumbrance, lien or interest in the same manner to and to the same effect as it is had been dated and registered prior to the said encumbrance, lien or interest.

IN WITNESS WHEREOF the Lender has executed the Form C attached to this Consent.

END OF DOCUMENT

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

ATTACHMENT 6

PRE-APPLICATION CONSULTATION MATERIALS

COMMUNITY CONSULTATION

FOR PROPOSED DEVELOPMENT AT 1700 BALMORAL AVE

Provide written comments by May 11, 2017



McElhanney
495 Sixth Street,
Courtenay, V9N 6V4

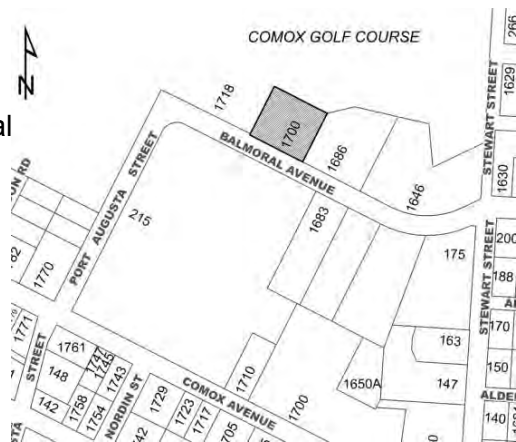


djensen@mcelhanney.com

The Town of Comox requires that, prior to the submission of an application for a development, the Applicant shall conduct a Community Consultation. The purpose of the consultation is to inform the community, to identify neighbourhood impacts and to obtain public feedback of the proposed development. An Open House will be scheduled at a later date.

Lindary Holdings Ltd. proposes a multi-family development at 1700 Balmoral Avenue, shown shaded on the map. The proposal is for 5-storey apartment with 45 residential units.

More information can be obtained by
phone: 250 338 5495, or
email: djensen@mcelhanney.com



PRE-APPLICATION CONSULTATION - STAGE 1

1700 Balmoral Avenue

To the Resident, Owner and Tennant,

Lindary Holdings Ltd., the owner of 1700 Balmoral Avenue wishes to develop this property. The Town of Comox requires the developer to consult with the neighbourhood before submitting plans for a development application to the Town.

CONSULTATION CONTACT:

Name:

Derek Jensen
McElhanney Consulting Services Ltd.

Mailing Address:

495 Sixth Street

City:

Courtenay

Phone Number:

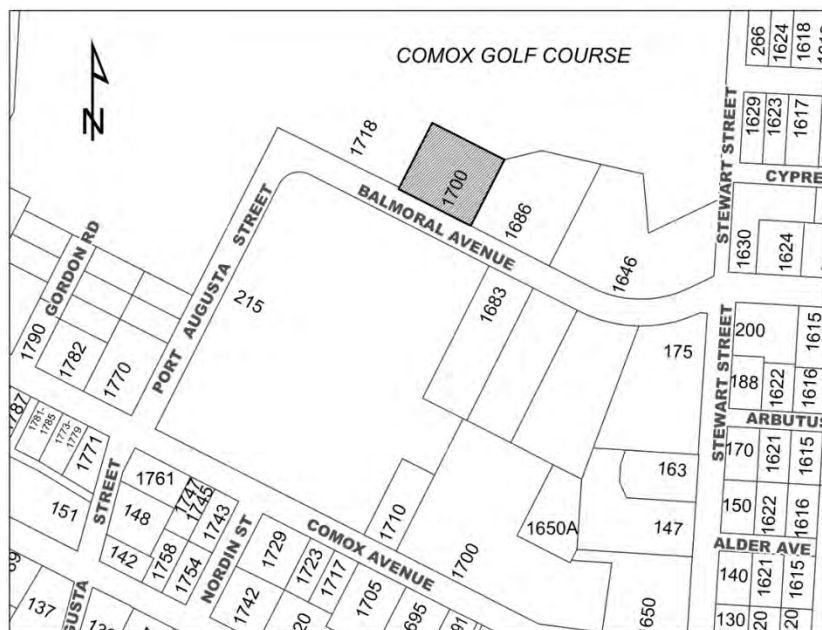
250 338 5495

Postal Code:

V9N 6V4

E-mail:

djensen@mcelhanney.com



As the owner of 1700 Balmoral Avenue shown shaded in the map above, we wish to know what impact our proposal may have in this neighbourhood. The purpose of this consultation is to receive your comments in order to consider them in the design of the project.

Currently, this parcel is zoned multi-family and a Development Permit has been issued for a 4-storey apartment building with 31 residential units and retention of existing building to serve as common space for the residents. The development proposal is for a 5-storey apartment with 45 units.

Please provide your comments by **May 11th, 2017**. This is the first stage of a two-stage pre-application consultation. The next stage will be an Open House where we will report back responding to any public comments we may receive and addressing them in the design of the proposed development. We look forward to sharing the information with you about our proposal. Our Open House will be announced at a later date.

From: [Lynn Gottmann](#)
To: [Lynn Gottmann](#)
Subject: 6 - 1676 Balmoral 1700 Balmoral Avenue
Date: May 17, 2017 4:43:59 PM

For your files.

Derek Jensen, ASCT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4
T 250 338 5495
djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Joe Pacowski [<mailto:pacowski@telus.net>]
Sent: Thursday, April 27, 2017 6:31 AM
To: Derek Jensen <djensen@mcelhanney.com>; comox, town <town@comox.ca>
Cc: jalsbury@shaw.ca; Mike Wilson <wilsonsmw@telus.net>; Sharon Parker <sharglenn@yahoo.com>; lukay@shaw.ca
Subject: 1700 Balmoral Avenue

McElhanney Consulting Services Ltd.,

Thank you for the opportunity to express my concerns regarding subject development proposal and its impact on the neighbourhood. I am firmly opposed to the development proposal for a 5-story apartment with 45 units at 1700 Balmoral Avenue for both safety and conformity reasons.

Firstly, the road traffic along Balmoral Ave., (between the Comox Mall and Stewart Ave.,) is a real problem. The safety concerns are well documented and have been forwarded to the town of Comox on numerous occasions. In particular, the speed and volume of vehicle traffic (both commercial and private) on this stretch of road poses a danger to both pedestrians crossing the road as well as children playing in Anderton park as the road bisects a high density living area and a very active children's playground and tennis courts. The pedestrian traffic and children's safety crossing the road is further compromised by vehicles parked on both sides of the road which hampers the visibility of vehicle drivers. To date, the only thing the Town of Comox has done to address this issue was to temporarily install electronic speed indicators at the corner of Stewart and Balmoral. Initially, the speed indicators had a positive effect on responsible drivers, but once they were removed the average speed went back to 60 plus in a 30 zone. The question is not whether there will be a serious accident on this stretch of road but when. Increasing the original development at subject site by 45 % (45 units from 31) will not address this issue but only exacerbate its safety concerns.

Secondly, no building currently in the neighbourhood exceeds 4 storeys in height. Building a 5-storey Manhattan like structure would stick out like a sore thumb and destroy the conformity of this neighbourhood. In my opinion, there is no compelling reason to increase the height of the new proposal to 5 storeys from its original 4-story proposal and disrupt the residential sky line.

In summary, I am adamantly opposed to subject proposal for safety and conformity reasons. Indeed, the 45% increase from the original proposal doesn't address the clear and present safety issues identified along Balmoral Ave., but only increases them significantly. The conformity issue is also a real major concern to local residents. Accordingly, I strongly recommend that town council seriously consider the resounding opposition to this proposal before making its decision.

Joe Pacowksi
6-1646 Balmoral Avenue
Comox, B. C.

--

This email was checked by Sophos for known Malware. Be on guard for new exploits. Protect your credentials.

From: [Derek Jensen](#)
To: [Lynn Gottmann](#)
Subject: FW: 1700 Balmoral Avenue
Date: April 28, 2016 1:07:06 PM

For the file.

Derek Jensen, ASCT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4
T 250 338 5495
djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Glenn & Sharon Parker [mailto:sharglenn@yahoo.com]
Sent: Thursday, April 28, 2016 11:37 AM
To: Derek Jensen <djensen@mcelhanney.com>
Cc: council@comox.ca
Subject: 1700 Balmoral Avenue

This response to your request for consultation comes from Sharon Parker. My husband and I live at #25, 1646 Balmoral Avenue in Comox.

Since we live just a few hundred meters from 1700 Balmoral we have a vested interest in what will happen to our neighborhood. We welcome the opportunity to share our concerns with you and the Town of Comox.

Communal Area for Owner-Occupants

Note is made that the new project will not include a gathering place for the owner-occupiers. Of course you may plan as you wish in this respect, however, it is beneficial when there is included an area where people may gather. This encourages the concept of neighborhood and mutual dependence. People need an area, other than the individual domestic units, to gather for meetings, for recreation such as cards or coffee or simply to chat. This helps to create a caring atmosphere among the residents many of whom will be seniors. Our strata has no area where we can gather comfortably and we certainly regret that at times. The developer or builder has a vested interest in how many units can be squeezed onto a property, and that would be reduced if provision is made for communal space. It is noted that in the original proposal provision was made for a communal space for the owner-occupiers to share. Regretfully, this space is designated as a living unit in the new plan.

Increased Density

The property at 1700 is about half the size of our strata at 1646. We have 34 units on twice the size of property. We also have a 4 story condo building. Certainly this increases the density. In fact, this development will have the highest density on Balmoral Avenue. While some people find this a desirable quality, this high density

does not necessarily contribute to the quality of life of those who will live at 1700.

Traffic Concerns

When we drive or walk out of our development at Ocean Pointe, we look right, left and right again, and then we wait and repeat the process, just to be safe. Though the posted speed limit is 20 kph in front of our strata, it is a dangerous area. Efforts have been made by the Town of Comox to keep us safe, however it is a difficult situation.

This development with 31 units will put that many more people and vehicles in the same congested area. It will be necessary for the developers to cooperate with the Town of Comox traffic engineers to anticipate and accommodate this increased foot and vehicle traffic.

Thank you for this opportunity to express our concerns . We would like to welcome you to our neighborhood. Please acknowledge receipt of this email.

Glenn and Sharon Parker

From: [Lynn Gottmann](#)
To: [Lynn Gottmann](#)
Subject: 25 - 1646 Balmoral FW: 1700 Balmoral Consultation of Neighbourhood Residents
Date: May 17, 2017 4:44:35 PM

For your files.

Derek Jensen, ASCT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4
T 250 338 5495
djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Glenn & Sharon Parker [mailto:sharglenn@yahoo.com]
Sent: Wednesday, April 26, 2017 10:54 PM
To: Comox Town Hall <town@comox.ca>; Derek Jensen <djensen@mcelhanney.com>
Cc: jalsbury@shaw.ca; Frank Lukay <lukay@shaw.ca>; Mike and Wendy Wilson <wilsonsmw@telus.net>
Subject: 1700 Balmoral Consultation of Neighbourhood Residents

Thank you for the opportunity to respond to your proposal to build 45 units on 5 stories at 1700 Balmoral Avenue in Comox.
My husband and I live in #25, 1646 Balmoral Avenue, just two lots over from your proposed development.

We oppose adding a 5th story and increasing the number of units from 31 to 45. The increased density may mean greater profits for the developer, but it means a decrease in the lifestyle for the people who presently live in the neighbourhood.

More people means more traffic. Presently the traffic in this area of Balmoral is a nightmare.

The town of Comox has been unable to calm the traffic.
As we edge out of our driveway we are often confronted with speeding vehicles, unpredictable scooter traffic, children running to the playground or seniors with compromised mobility. Increasing the density on Balmoral can only increase our traffic problems.

Five stories doesn't fit into our neighbourhood. This proposal only fits into the pockets of the developers.
We urge the Town of Comox to consider the views of the citizens who presently live in the area.

--

This email was checked by Sophos for known Malware. Be on guard for new

PRE-APPLICATION CONSULTATION - STAGE 1**1700 Balmoral Avenue**

Date:

Name:

Address:

Please submit your comments to McElhanney Consulting Services Ltd. by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, BC, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

no 5 stories. Much Too High for Comox
Should have a ground level entry
Should have a circular driveway

DOROTHY CARMICHAEL
#108 1686 BALMORAL AVE
COMOX. BC
V9M 2N1

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 1**1700 Balmoral Avenue**

Date: *APRIL 26/17* Name: *ELAINE BISHFORTH* Address: *#208 - 1686 BALMORAL Ave
COMOX, B.C. V9M 2N1*

Please submit your comments to McElhanney Consulting Services Ltd. by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, BC, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

There was concern about a 4 story bldg. Now even greater concern about a 5 Story bldg. It's just too tall a bldg for The This area.

Also would hope for The development to be as far away from our fence line as possible.

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 1**1700 Balmoral Avenue**

Date:

Name:

Address:

Please submit your comments to McElhanney Consulting Services Ltd. by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, BC, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

I don't think a five story
apartment is the right fit
for this site

Nelma Dacus

105-1689 Balmoral ave.

Cornox BC.

V9N 2N1.

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 1**1700 Balmoral Avenue**Date: *May 6/17*Name: *Arlene Matkoski* Address: *309-1686 Balmoral Ave
Comox, BC V9M 2N1*

Please submit your comments to McElhanney Consulting Services Ltd. by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, BC, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

*The apartment building should not be
higher than 4 stories, as it would be out
of place if it is.*

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 1**1700 Balmoral Avenue**

Date: *MAY 6/2017* Name: *J JENSEN* Address: *101, 1686
BALMORAL AVE
NANAIMO*

Please submit your comments to McElhanney Consulting Services Ltd. by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, BC, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

*A 5-STORY BUILDING IS NOT AN
ASSET TO THE TOWN OF COMOX
LOCATION AND AREA OF PROPERTY NOT
SUITABLE FOR PROPOSED DEVELOPMENT*

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 1

1700 Balmoral Avenue

Date: *May 6th 2017* Name: *(Mrs) E. Y. Backhouse* Address: *Apt 308, 1686 Balmoral Ave
Courtenay V9N 2J2*

Please submit your comments to McElhanney Consulting Services Ltd. by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, BC, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

With respect,

A five story building with 45 family apartments, is too great a difference to the ambience of of the area, on a lot of that size.

However Four storeys, well designed, might work, if well designed and correctly placed, to preserve the old growth cedars, and to leave and ~~to~~ preserve the present old building (now quite unique, and a remembrance of the history of this charming small town)

Keeping the old house in situ would have the important result of preserving the pleasant view and, more important, light to apartments in this senior complex. (this is particularly important, for those who are house bound)

The issues of traffic and parking etc have been well described by others in my building, and I agree with them!

Thank you for your attention

Signed: *E. Y. Backhouse*

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

307 1686 Balmoral Avenue,
Comox, B.C., V9M 2N1
May 5, 2017

Mr. Derek Jensen, A.Sc.T,
McElhanney Consulting Services Ltd.,
495 Sixth Street, Courtenay, B.C., V9N 6V4

RE: 1700 BALMORAL AVENUE

Dear Mr. Jensen;

I believe the developer and the architect have an opportunity to create a building at 1700 Balmoral Avenue that will enhance the area and provide quality housing for future owners. I trust that the design will encompass many of the following features:

- **WILL BE NO HIGHER THAN FOUR STORIES.**
- **WILL CONTAIN A COMMON AREA.**
- **Will fit with surroundings.**
- **Will provide on site access for moving vans, fire trucks, ambulances, service and maintenance vehicles, etc.**
- **Will not be a "box."**
- **Will not be jammed against existing buildings.**
- **Will not cut off sunlight from existing buildings.**
- **Will not place windows/balconies across from, and scant feet from, existing windows/balconies.**
- **Will not endanger mature cedar trees on the east property line.**
- **Will not further complicate traffic patterns on Balmoral Avenue.**

I would support the issuing of a Development Permit for such a building. I will not support a design that replicates the flaws in the previous proposal.

Yours truly,



Leo Auterson

Letter to Town of Comox

Pre-Application Consultation--Stage 1--1700 Balmoral Avenue

May 8 Linda Hunchak 301 1686 Balmoral Avenue Comox BC V9M2N1

It is with great concern that I submit this letter regarding the proposal for 1700 Balmoral Avenue.

The most pressing concern is the request by the developer to the Town Council of Comox to grant the change of existing building height regulations to include a five story

building. (Unfortunately the Berwick was granted such a request and therefore created a precedence)

Comox is in a unique geographical situation, and maintaining the quaint beauty of the town should be first and foremost in the collective minds of town council. Ahering to the maximum four story limit (ideally it should be three) must be maintained and doing so will continue to contribute to the charming atmosphere of Comox.

Another concern is in regard to the layout of the proposed building. It would be problematic if a wall were placed near the existing fence of 1686. That likely would require trees

that are along that fence be removed. These trees serve as a visual buffer between 1686 and 1700.

Depending upon the building design, where will guest, delivery, etc parking be? Will there be access for tall moving trucks or the arrival of ambulances should that need arise? If

the dependancy for parking is on the street a potentially dangerous condition exists for

Letter to Town of Comox

pedestrians who wish to cross. I personally experienced, while using the crosswalk, what

could have been a tragic situation. A semi was parked on the street at the crosswalk. Because of this, oncoming traffic could not see me until I was well into the crosswalk and the

reverse was also true. I could not see the oncoming vehicle until I was well into the crosswalk. If there is nowhere for large vehicles to go this situation will repeat itself. With a thirty-one unit building (forty -five would be worse) constant moving vans can be expected and pedestrian traffic-- including children-- will be at risk.

I refer you to Bylaw 1780--Consolidated Comox Planning Procedures--#8-4a+e in particular. (Developmental Planning Procedures)

I submit this to you with the truest of heart and the desire to maintain the beauty and welcoming integrity of Comox. I am a great supporter of developing the potential of this

lovely town, knowing that it is possible to maintain the charming qualities with low profile, well designed structures. Changing the rules to suit any developer is, simply put,

wrong.

Regards,



Linda Hunchak

301 1686 Balmoral Avenue

From: [Lynn Gottmann](#)
To: [Lynn Gottmann](#)
Subject: 13 - 1646 Balmoral FW: 1700 Balmoral proposal
Date: May 17, 2017 4:45:09 PM

Derek Jensen, AScT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4
T 250 338 5495
djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Brenda Pearson [<mailto:brenlorn@shaw.ca>]
Sent: Saturday, April 22, 2017 4:20 PM
To: Derek Jensen <djensen@mcelhanney.com>
Subject: 1700 Balmoral proposal

Dear Sirs, In reply to your request for comments on the amended proposal. I would be very pleased to see this property developed, however question the increase to five storeys since that would make the building higher than the others in the neighbourhood.

However, my main concern (which I am sure can be addressed) is the driveways. As I mentioned in a previous reply, traffic along Port Augusta, especially coming up from Comox Avenue, is quite heavy and people frequently speed around the corner. There are five driveways: to the Golf Course, the shopping centre, Stevenson Place, Fairwinds and then one for Ocean Pointe. Plus there is a crosswalk and, opposite Ocean Pointe, there is the park and tennis courts which are very busy especially in the warm weather. As well it must be remembered that the current buildings are all senior-oriented and they constitute much of the pedestrian traffic in the area.

Although there is a 30 kmp zone on this block from Port Augusta to Pritchard, very few drivers observe this, especially travelling from Pritchard where there is an almost blind bend, and that problem should most certainly be addressed, maybe by adding traffic-calming devices.

If these problems can be successfully overcome then I think the development will be an asset to the town of Comox.

Sincerely,

Brenda L. Pearson, #13-1646 Balmoral Avenue.

1700 Balmoral Avenue

Date: May 4/2017 Name: Billie Dancer Address: 201-1686 Belmont Ave

Please submit your comments to McElhanney Consulting Services Ltd. by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, BC, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

From: [Lynn Gottmann](#)
To: [Lynn Gottmann](#)
Subject: 1646 Balmoral 1700 Balmoral Avenue
Date: May 17, 2017 4:43:21 PM
Attachments: [image002.jpg](#)

For the file.

Derek Jensen, AScT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4
T 250 338 5495
djensen@mcelhanney.com

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From: Ted & Mary Kleim [<mailto:everymountain@shaw.ca>]
Sent: Thursday, April 27, 2017 12:18 PM
To: Derek Jensen <djensen@mcelhanney.com>
Cc: pives@comox.ca; rarnott@comox.ca; kgrant@comox.ca; mgrant@comox.ca;
bmackinnon@comox.ca; bprice@comox.ca; mswift@comox.ca
Subject: 1700 Balmoral Avenue

Hello,

I am writing to express my concerns about the proposed development at 1700 Balmoral Avenue in Comox. Thank you for asking for input from nearby residents.

I live at 1646 Balmoral. The increase to 45 units proposed for the 1700 site will greatly impact the surrounding residents. It will add to the traffic, both vehicular and pedestrian, already using Balmoral and entering traffic from our driveway or crossing even in the crosswalk closer to the mall is already a crap shoot. Drivers do not obey the playground speed zone and come barreling around the curve near Stewart St. Adding more density will only increase traffic and pedestrian crossings.

I think the developer should be restricted to a 4 storey structure to fit in better with its surrounding properties. We urge them and the town of Comox to resist the lure of profits and stick to a reasonable amount of density in this area.

Best regards,
Mary Kleim
#23 – 1646 Balmoral Avenue
259-339-6743

STAGE 1

PRE-APPLICATION CONSULTATION
1700 Balmoral Avenue

COMMUNITY CONSULTATION – COMMENTS

Date: Apr 14/16 Name: FRANK LURAY Address: 22-1646 BALMORAL AVE COMOX.

By 2 May 2016 please submit your comments or any questions you may have to Derek Jensen at McElhanney Consulting Services, 495 Sixth St., Courtenay, BC, V9N 6V4 or e-mail to djensen@mcelhanney.com.

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue " in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

OPPOSED TO INCREASING THE
DENSITY.

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

STAGE 1

PRE-APPLICATION CONSULTATION
1700 Balmoral Avenue

COMMUNITY CONSULTATION – COMMENTS

Date:

April 28/2016.

Name:

Norma Morton

Address:

#213, 1683 BALMORAL AVE.,
COHOX, BC. V9M 2M3

By 2 May 2016 please submit your comments or any questions you may have to Derek Jensen at McElhanney Consulting Services, 495 Sixth St., Courtenay, BC, V9N 6V4 or e-mail to djensen@mcelhanney.com.

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

- ① Increased Population: Density:
 - Ⓐ New Lorne Hotel Ⓑ New Brunswick on Cef Ave.,
 - Ⓒ New development @ 1700 Balmoral Ave.
- ② Increased Traffic flow: Comox Ave. Stewart Ave., Balmoral Ave.
- ③ Access + Exit: from: 1700 Balmoral Ave.
 - Ⓐ two-way traffic entering the Mall from Balmoral Ave
 - Ⓑ 2 exits/entrances from Comox Ave. to the Mall.
- ④ Crosswalk on Balmoral Ave.
- ⑤ Arderton Park + Dennis Courts, Balmoral Ave
- ⑥ * Parking new, along Balmoral Ave. near the crosswalk where a "no parking" yellow line once ~~existed~~ ^{existed}! Reinstate }
- ⑦ Surely "traffic lights" will be necessary at all intersections?

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

Thank you for your consideration — Respectfully,
Norma Morton

From: [Lynn Gottmann](#)
To: [Lynn Gottmann](#)
Subject: 1686 Balmoral : 1700 BAlmoral Avenue
Date: May 17, 2017 4:45:33 PM

-----Original Message-----

From: Derek Jensen
Sent: Friday, April 21, 2017 12:05 PM
To: Lynn Gottmann <lgottmann@mcelhanney.com>
Subject: FW: 1700 BAlmoral Avenue

Derek Jensen, AScT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4 T 250 338 5495 djensen@mcelhanney.com

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-----Original Message-----

From: D BRANCH [<mailto:dotbranch@shaw.ca>]
Sent: Friday, April 21, 2017 11:51 AM
To: Derek Jensen <djensen@mcelhanney.com>
Subject: 1700 BAlmoral Avenue

I live at 1686 Balmoral Avenue, and I approve

Sent from my iPad

--

This email was checked by Sophos for known Malware. Be on guard for new exploits. Protect your credentials.

STAGE 1

PRE-APPLICATION CONSULTATION
1700 Balmoral Avenue

COMMUNITY CONSULTATION – COMMENTS

Date: 1 MAY 15 Name: HAROLD THOMSON Address: 1686 BALMORAL AVE #104

By 2 May 2016 please submit your comments or any questions you may have to Derek Jensen at McElhanney Consulting Services, 495 Sixth St., Courtenay, BC, V9N 6V4 or e-mail to djensen@mcelhanney.com.

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

Being a senior (80) and walking with a cane I was crossing the street from the store to Belmont when a white car hit my cane and kept on going. turned the corner and proceeded along Belmont a lady walking her dog couldn't believe any one could do that asked if I was okay, I was nervous but okay. This took place right across the street at 1700 Belmont Ave.

Coming home from Comox Ave I turned to come up to Belmont Ave and again a car came through a stop sign and was I glad I stopped or I sure I would have been a hospital guest or dead as it was traveling fast. All I could see on the back of the car was a big green N. No more development please.

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

103 1686 Balmoral Avenue
Comox BC V9M 2N1
April 22, 2016

Mr. Derek Jensen, A.Sc.T
Consultation Contact
McElhanney Consulting Services
495 Sixth St.
Courtenay BC V9N 6V4

Re: Rezoning etc., 1700 Balmoral Avenue

Dear Mr. Jensen;

Thank you for the opportunity to comment on this rezoning and changes and the impact they might have on the residents of Fairway Place.

We sought first reactions to your letter at our regular coffee session on Wednesday, April 13, and appointed a committee to gather more information. This was presented to a special condo meeting on Friday, April 22. Our comments are as follows.

We are impressed with the site plan and the picture of the finished buildings. We particularly like the sloping roofs and set back of the fourth floor; these details soften the effect of the four stories.

Our major concern with the proposed development:

We regret the elimination of the common area as approved in the original Development permit. We believe that in the pursuit of increased town density you are removing the opportunity to create a building with a special spirit of togetherness that is so missing in today's society.

In Fairway Place we have a common area which is in use on an almost daily basis. A core group pursues an ongoing hobby and is there six days a week. Other residents drop in daily to check on progress and stay to chat and share stories. Attendance at the morning coffee sessions every second Wednesday is high and growing. Plans for going out for lunch or supper are hatched and carried out. Because trust builds and friendships form, our condo enjoys an amicable family atmosphere. Residents care, support and help each other.

If your proposal is adopted your residents will not enjoy similar opportunities.

Group reaction to the proposed elimination of the common area prompted the following resolutions:

Resolution 1. That the proposed rezoning and other amendments be rejected and that the developers be instructed to build according to the original proposal.

Resolution 2. That if, in fact, the existing single-family dwelling is in too poor condition to fulfill the terms of the original proposal, that the developers be instructed to plan a common area into the major building and that no other building be considered for the site.

Resolution 3. That if, in fact, the existing single-family dwelling is in too poor condition to fulfill the terms of the original proposal, that the developers plan a one story replica of the original single-family dwelling and construct it at the location as originally planned. This building would serve as a common area and clubhouse for the residents.

Concern was also expressed about **traffic-flow and congestion** on the street in front of the property and in the entry way for the following: Fire trucks, Ambulance, Handy Dart, Moving vans and trades or maintenance vehicles.

We ask that you give consideration to including:

- a **sprinkler system** for the building
- **pre-wiring for charging units** in the underground parking area

Regarding the impact the development would have on Fairway Place:

The effect of a four story building will be to cut off sunlight and darken the suites on the north-north-west side of our building. We will no longer be able to enjoy the sunsets as seen through the high trees on the golf course. We will similarly cut off sunlight and darken the lower suites in your building. Privacy in both buildings will suffer.

We have a major concern for the health of the mature cedar trees inside our fence on the northwest side of our property. These beautiful trees screen us and bring the forest closer to our windows. We are sure they will be similarly appreciated by the new owners in your condo who face the southeast. Our concern is that when your property is excavated for the underground parking, the combination of the excavation, the disturbance of the adjacent soil and the flow through the peripheral drainage piping will significantly lower the existing water table to the detriment of our beautiful cedars. We request that your contractors disturb the side bank as little as possible.

To lessen the impact consider the following resolution:

Resolution 4. That the major building be moved towards the golf course property line to the greatest extent allowed within the building regulations.

If this were done it would address both concerns. More light and sunlight would be available for both of our buildings. Greater separation would enhance privacy and would give greater protection to the roots of our cedars.

All four resolutions received unanimous approval at the meeting.

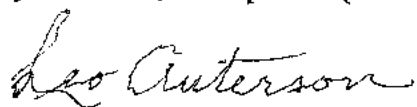
We would be happy to answer questions or clarify anything that is not clear in this submission.

Yours truly,

For the Condo Committee and the residents of Fairway Place,



Sherry Anderson, Chairperson (218 2825)



Leo Auterson, Vice Chairperson (941 1371)

copies: Gail Andestad
Cindi Reichelt

Sherry Anderson

to Sherry Anderson; council@comox.ca

Sun, 7 May 9:23 PM

1700 Balmoral Comments

Sherella Anderson 103-1686 Balmoral Avenue V9M 2N1

Derek Jensen McElhanney Consulting Services Ltd. May 8, 2017

I feel that a 5 storey structure anywhere in Comox is unnecessary. We enjoy our "small town" atmosphere and taller buildings DO NOT add any atmosphere anywhere! 1700 is not a large lot and a 5 storey BOX will not leave much green space. And, 5 storeys--with elevators, HVACS, etc. will actually be 6 or more storeys! You will require 2 elevators for over 100 people, won't you?

Parking--There should not be and "on street" parking for residents or visitors. This area is already very busy with the Mall and Golf Course.

Where are vehicles larger than cars going to park? Too many of our streets are already down to single lane traffic, due to pick-ups parked on both sides of the street. Go look at Dogwood east of Pritchard!

Trees--At Fairways Place, we have mature, 75 foot Cedars along our property line beside 1700 Balmoral. These should not be put in danger of dying, due to construction.

The previous plans for 1700 Balmoral were almost acceptable. Except for lack of parking larger vehicles--ie Service trucks, Care buses, Ambulance and Fire.

Common Area We have a large room for common use. Meetings, social gatherings etc. People from other Condo's comment on how nice this area is. Could also be used as a safe place for children to gather. Our common area is well used and considered quite a "perk"

Is the existing building now going to be eliminated completely! like Shakesides!!

Please Council---Save the Looks of OUR TOWN

sincerely,



Sent from Windows Mail

From: [Lynn Gottmann](#)
To: [Lynn Gottmann](#)
Subject: Anderson 1686 : 1700 Balmoral
Date: May 17, 2017 4:46:11 PM

Good afternoon Sherry,

The developer is considering modifying the development proposal from that which was previously approved by the Town through the development permit process. At this point, we are simply seeking public input on the type, form, character that residents would like to see constructed. Further, please bring forward any potential concerns you may have with a development proposal.

Derek Jensen, AScT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4 T 250 338 5495 djensen@mcelhanney.com

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-----Original Message-----

From: Sherry Anderson [<mailto:blueanteak@hotmail.com>]
Sent: Thursday, April 20, 2017 1:03 PM
To: Derek Jensen <djensen@mcelhanney.com>
Subject: 1700 Balmoral

Hello, I see in the paper a new proposal for the above property. I live next door at 1686 Balmoral, and would like to know if this is the same building as proposed last year?

Sincerely, Sherry Anderson 250 218-2825

--

This email was checked by Sophos for known Malware. Be on guard for new exploits. Protect your credentials.

Dear Lindary Holdings Ltd.

I am pleased that you are taking the time to consult and request input from the people of the neighbourhood which will be directly impacted with the additional development of 1700 Balmoral Avenue.

Regrettably I do not support the further development of this facility which is in our direct neighbourhood. The traffic density has already been growing at a noticeable and alarming rate in our neighbourhood. I am assuming that this is due to the area's already new developments and growth in the immediate area as well as the additional traffic flow to access the mall and its stores. It seems that Balmoral has become a main access for this mall.

With further additional development, it will definitely have an impact on the neighborhood's quality of life.

Traffic congestion is one of the most frustrating and costly symptom of poorly regulated growth and adds to our concerns when navigating the area streets and crossings both on foot as well as driving in the area.

Additional area density will add to a higher risk for both pedestrian & cyclist safety. This will contribute to a potential for a higher pedestrian accident rate or minimally an already high near miss occurrence on our area streets.

The additional noise level, health & property values will be impacted with the added population density along with additional traffic noise which can and will interfere with sleep, conversation, and other neighborhood pursuits. The air quality & health is also impacted. The aesthetics and overall appearance of the neighbourhood will also be impacted.

With the additional population and traffic, it will also impact the existing wildlife due to the added vehicle density. Pollutants washed from additional vehicle traffic can also impact the wildlife and quality of life. Additional traffic and it's associated noise will also have a significant, negative effect on our neighbourhood birds and mammals.

Thank you for taking the time to consult with your neighbours around your proposal and I hope that this information is helpful in your assessment.

Regards

Billie Dancer

Unit 201, 1686 Balmoral Ave.

From: [Derek Jensen](#)
To: [Lynn Gottmann](#)
Cc: [Kristy Cameron](#); [Don Cameron](#)
Subject: FW: 1700 Balmoral Ave
Date: May 12, 2017 8:08:18 AM

For the file.

Derek Jensen, AScT.

Project Manager

McElhanney Consulting Services Ltd.

www.mcelhanney.com

495 Sixth Street | Courtenay BC V9N 6V4

T 250 338 5495

djensen@mcelhanney.com

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From: geri4022@telus.net [mailto:geri4022@telus.net]

Sent: Friday, May 12, 2017 8:07 AM

To: Derek Jensen

Subject: 1700 Balmoral Ave

4 storey is enough! You build 5 storey then every builder thereafter will be allowed to build 5 storey. Then 6 storey and so on. It will surely affect the look and ambiance of Comox. Keep the buildings at a minimum height. Do we want to end up looking like Vancouver?

Sent from [Mail](#) for Windows 10

--

This email was checked by Sophos for known Malware. Be on guard for new exploits. Protect your credentials.

From: [Derek Jensen](#)
To: [Lynn Gottmann](#)
Subject: FW: 1700 Balmoral Avenue
Date: April 13, 2016 10:44:48 AM

Please start a public response file.

Derek Jensen, ASCT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4
T 250 338 5495
djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Brenda Pearson [mailto:brenlorn@shaw.ca]
Sent: Wednesday, April 13, 2016 10:42 AM
To: Derek Jensen <djensen@mcelhanney.com>
Subject: 1700 Balmoral Avenue

Reply from Brenda Pearson, #13-1646 Balmoral Avenue

I have no objections to the proposed 4 storey building, in fact I think it will be a very good use of the property. I assume the hedges will remain, although trimmed a great deal.
I do have some concerns, though they probably should be addressed to council.

Regarding traffic. As you probably realise there are driveways onto Balmoral from Stevenson Place, Ocean Pointe, Fairway and the shopping centre, all within a block of each other. As a resident I am aware that traffic from Port Augusta tends to sweep at speed around the corner onto Balmoral and very few people, especially coming from Pritchard, obey the speed limit of 30 kph. Your access will inevitably add to the problems especially when considering a possible 31 plus vehicles entering and leaving. I think the present crosswalk will need to be relocated and a proper sidewalk should be built along the front of your property as there are many people, some golfers with equipment, who walk along there to the club. As well the park is well-used, especially in summer, with both young and old and of course many vehicles are parked alongside. Also there are a lot of very large delivery trucks accessing the shopping centre which of course adds to the heavy traffic volume. I hope these considerations will be taken into account.

Brenda L. Pearson.

From: [Derek Jensen](#)
To: [Lynn Gottmann](#)
Subject: FW: Comments- 1700 Balmoral Avenue, Comox
Date: April 22, 2016 11:52:17 AM

For the file.

Derek Jensen, AScT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4
T 250 338 5495
djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Mike and Wendy Wilson [mailto:wilsonsmw@telus.net]
Sent: Friday, April 22, 2016 11:30 AM
To: Derek Jensen <djensen@mcelhanney.com>
Subject: Comments- 1700 Balmoral Avenue, Comox

We are residents at 1646 Balmoral Avenue, Comox, BC
These are our comments regarding the development of 1700 Balmoral Avenue:

As you are undoubtedly aware, this development will significantly increase street and pedestrian traffic on Balmoral Ave.
As it is even now, it is quite dangerous to cross Balmoral Ave on the crosswalk. Traffic is moving so fast, roaring past the playground and park.
The traffic coming from Pritchard down Balmoral to Port Augusta is way over speed limit making it quite dangerous even to walk on the sidewalk and the crosswalks.
With the increased traffic from this development and the Lorne Hotel project, we would ask that the Town of Comox at a minimum put in flashing crosswalk lights at the crosswalks and speed bumps at each end of the park area.

Thank you.

Mike and Wendy Wilson

From: [Derek Jensen](#)
To: [Lynn Gottmann](#)
Cc: [Kristy Cameron](#); [Don Cameron](#)
Subject: FW: PRE-APPLICATION CONSULTATION - STAGE 1 1700 Balmoral Avenue, Comox BC
Date: April 27, 2017 2:49:59 PM

For the file.

Derek Jensen, ASCT.

Project Manager

McElhanney Consulting Services Ltd.

www.mcelhanney.com

495 Sixth Street | Courtenay BC V9N 6V4

T 250 338 5495

djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Mike and Wendy Wilson [mailto:wilsonsmw@telus.net]

Sent: Thursday, April 27, 2017 2:30 PM

To: Derek Jensen

Cc: town@comox.ca

Subject: PRE-APPLICATION CONSULTATION - STAGE 1 1700 Balmoral Avenue, Comox BC

Please accept this email as our response to the proposal for amendment to the Development Permit that has been issued for a 4-story apartment building with 31 units and retention of the existing building to serve as a common space for the residents. This amendment proposes to eliminate the “heritage” building and construct a 5-storey apartment building with 45 units. This property has apparently been the subject of amendments in the past. Is the developer changing plans in order to wear people down so that they will consider a plan that does not meet the needs of local residents? We would expect that this is not the case and that neighbourhood concerns will be fully considered. If this amendment is approved we wonder if the owners of the former Lorne Hotel property will attempt to have its permit increased to allow 5 stories. We do not want to have our downtown core turned into a high rise building area. Or will this developer’s next amendment be for 6 stories with the hope that the 5 storey proposal passes?

We object to the increase in the number of units from 31 to 45 and the increase from 4-stories to 5-stories. There is no precedent for a building height of more than 4-stories in this neighbourhood. Have any recent studies been conducted to see what effect the construction of even 31 units and the resultant increase in vehicular traffic will have in this already very busy traffic area? It is well known that Balmoral Avenue from Stewart Avenue to Port Augusta Street already experiences high volumes of traffic speeding past the

park and tennis courts at all times of day. As a matter of fact yesterday my wife and I, while walking along Balmoral, witnessed a very near collision as an SUV made a left turn exit from the Comox Mall onto Balmoral in front of an approaching Shaw Cable van that was coming down Balmoral from past the park. Fortunately the Shaw driver reacted quickly and slammed on his brakes and honked his horn narrowly avoiding a serious crash. The SUV continued on its way without reacting. It should be noted that this incident was immediately across from the subject development property that will bring many more vehicles entering and exiting the proposed development. Today, the same thing happened at the entrance to the mall – vehicle pulling out onto Balmoral narrowly missing a van coming down Balmoral. Increasing the number of units would increase that development's vehicular traffic potentially by 50%. The renovations to the mall and the increased mall parking will most likely increase traffic from that area. The Comox Golf Club, located adjacent to the subject development, also contributes substantially to the traffic in this area. When the Lorne Hotel property is developed in the future it will bring further traffic to the busy Comox Avenue and Port Augusta extension of Balmoral Avenue. The section of Balmoral Avenue from Stewart Avenue to Port Augusta already has severe difficulties with few vehicles adhering to the 30 km speed limit past the park and not yielding for pedestrians crossing at the crosswalk that is adjacent to the proposed development.

When we moved to Comox 2 ½ years ago we were attracted by the quiet and attractive downtown area that reminded us of the downtown area of Qualicum Beach and other pastoral small towns. With the continuing developments taking place in our downtown we run the risk of losing that appeal and potential new residents to this area.

We strongly reject the amendment to the existing development permit.

Respectfully,

Mike and Wendy Wilson

6-1646 Balmoral Avenue

Comox BC

V9M2N1

--

This email was checked by Sophos for known Malware. Be on guard for new exploits. Protect your credentials.

From: [Derek Jensen](#)
To: [Lynn Gottmann](#)
Cc: [Kristy Cameron](#); [Don Cameron](#)
Subject: FW: Pre-application consultation - Stage 1 1700 Balmoral Avenue, Comox
Date: May 10, 2017 2:04:46 PM

For the file.

Derek Jensen, ASCT.

Project Manager

McElhanney Consulting Services Ltd.

www.mcelhanney.com

495 Sixth Street | Courtenay BC V9N 6V4

T 250 338 5495

djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: j.spooner5334@gmail.com [mailto:j.spooner5334@gmail.com] **On Behalf Of** julie spooner

Sent: Wednesday, May 10, 2017 1:45 PM

To: Derek Jensen

Subject: Pre-application consultation - Stage 1 1700 Balmoral Avenue, Comox

As this request for residential impact is limited in scope, I will consider my response only to the information given.

I do not support the application to change the zoning from 31 units to 45 within a five storey building. Balmoral Avenue was not designed for density. It is a curving road with limited visibility when exiting the current driveways. Within this portion of Balmoral, there is a city park with parking allowed on both sides of the street and Comox's major shopping centre. I live in Ocean Pointe condos and exit the drive onto Balmoral both by car and bike regularly. Unfortunately, there is no enforcement of the park speed limits and I have to proceed with extreme caution. Adding to the current traffic flow with the improved Comox Mall and even 31 units will put a demand on the safety of local residents. There is a marked crosswalk in this section as well that is frequently not noticed by drivers. In addition, visitors to the existing condos as well as owners who have two vehicles park on the street to add to the demand on this stretch of road. It is not noted in your pre-application how many resident or guest parking spaces will be provided on the property.

I do not consider that saving the existing building will add to the overall Comox culture as it currently is hidden from view. Many residents do not know there is an older house there.

Regarding the five stories, I would like the town to be consistent on its vision for "Comox-by-the-Sea". They have already made some design decisions that have not helped maintain such a vision. I will mention the almost vacant office building at the foot of Church Street and the new buildings in Marina Park that obliterate the view of the estuary. To further lose sky and light to a five storey building is another negative to the natural setting most Comox residents cherish.

I wish you well in proceeding with your project but I cannot support the change of zoning to a five storey building with 45 units.

Julie Spooner

12-1646 Balmoral Avenue, Comox

V9M 2N1

--

This email was checked by Sophos for known Malware. Be on guard for new exploits. Protect your credentials.

From: Derek Jensen
To: [Lynn Gottmann](#)
Subject: FW: Traffic Count Balmoral Avenue, Comox BC
Date: Thursday, June 15, 2017 9:44:08 AM

For the file.

Derek Jensen, AScT.

Project Manager

McElhanney Consulting Services Ltd.

www.mcelhanney.com

495 Sixth Street | Courtenay BC V9N 6V4

T 250 338 5495

djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Mike and Wendy Wilson [mailto:wilsonsmw@telus.net]

Sent: Thursday, June 15, 2017 9:34 AM

To: town@comox.ca; Derek Jensen

Subject: Traffic Count Balmoral Avenue, Comox BC

We were pleased to see that a traffic count is being undertaken on Balmoral Avenue in between the entrance to Comox Golf Club and the Comox mall. We expect that this is a result of comments made to the town and McElhanney Consulting Services Ltd re the Pre-Application Consultation – Stage 1 1700 Balmoral Avenue regarding traffic in this area.

However, the location of the traffic counter and the results obtained from the count will not, in our opinion, be representative of the actual traffic that occurs in the area. It will not count the traffic that comes from Pritchard and other streets in that area past the park and into Comox Mall to shop at Johns and the BC Liquor store and others that are very high volume stores in the mall. It will not count the traffic that leaves the mall from the Balmoral exit, turns right and heads towards Pritchard etc. In our opinion, the count would be more accurate if it was taken near the crosswalk on Balmoral across from Comox Mall.

We hope that you will consider this suggestion. Should you require additional clarification of our recommendation please contact the undersigned.

Mike and Wendy Wilson

6 1646 Balmoral Avenue, Comox BC

--

This email was checked by Sophos for known Malware. Be on guard for new exploits. Protect your credentials.

From: Derek Jensen
To: [Lynn Gottmann](#)
Subject: FW: 1700 Balmoral Ave
Date: Monday, June 12, 2017 4:47:05 PM

For the file.

Derek Jensen, AScT.

Project Manager

McElhanney Consulting Services Ltd.

www.mcelhanney.com

495 Sixth Street | Courtenay BC V9N 6V4

T 250 338 5495

djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: j.spooner5334@gmail.com [mailto:j.spooner5334@gmail.com] **On Behalf Of** julie spooner

Sent: Monday, June 12, 2017 4:46 PM

To: Derek Jensen

Cc: Council@comox.ca

Subject: 1700 Balmoral Ave

Thank you for the opportunity to view your project at D'Esterre.

In my reply to your Stage 1 consultation, I discussed my main concerns. One being the traffic on Balmoral Ave. which was not designed to have heavy traffic and parking loads. As Comox Ave becomes more congested near the extension to Berwick, traffic is already building on Balmoral. I also mentioned that I think the town of Comox must develop consistency in zoning to maintain the "town by the sea" ambience that they are marketing.

I will continue to press the town to limit heights of buildings as well as to maintain architectural consistency. The development which is already approved by the town meets my concerns for reasonable density, height of four stories maximum and a residential style of architecture consistent with existing buildings and the neighbourhood.

I hope that you will see that you are building into a residential neighbourhood that begins with your address. Unfortunately, I did not see any adjustments to your plans in response to the Stage 1 Consultation.

Thank you

Julie Spooner

12-1646 Balmoral Ave

Comox BC

--

This email was checked by Sophos for known Malware. Be on guard for new exploits. Protect your credentials.

OPEN HOUSE

FOR PROPOSED DEVELOPMENT AT 1700 BALMORAL AVE

The Town of Comox requires that, prior to the submission of an application for a development, the Applicant shall conduct a Community Consultation. The purpose of the consultation is to inform the community, to identify neighbourhood impacts and to obtain public feedback of the proposed development.

An Open House hosted by Lindary Holdings Ltd. to facilitate public review of the proposed development at 1700 Balmoral Ave, shown shaded on the map, is scheduled for:

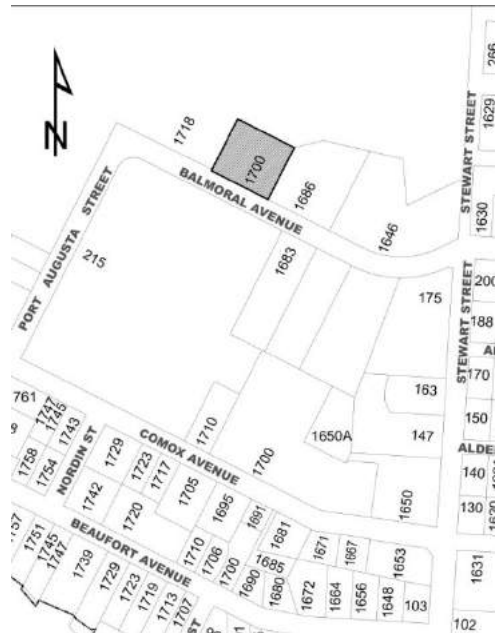
Monday, May 29th, 2017

4:00 PM – 7:00 PM

D'Esterre House

1801 Beaufort Avenue, Comox

If you are unable to attend Open House, written comments on the preliminary plans may be submitted to Derek Jensen until June 14, 2017 at:
McElhanney, 495 Sixth Street,
Courtenay, V9N 6V4.



**More information can be obtained by phone: 250 338 5495
or email: djensen@mcelhanney.com**

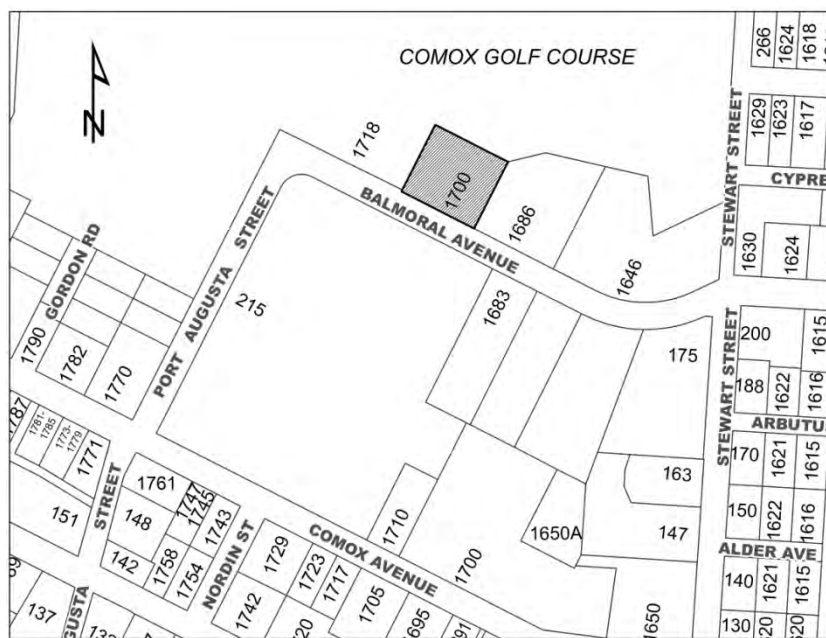
PRE-APPLICATION CONSULTATION - STAGE 2

1700 Balmoral Avenue

To the Resident, Owner and Tennant,

Lindary Holdings Ltd., the owner of 1700 Balmoral Avenue wishes to develop this property. The Town of Comox requires the developer to consult with the neighbourhood before submitting plans for a development application to the Town.

CONSULTATION CONTACT:



Name:

Derek Jensen
McElhanney

Mailing Address:

495 Sixth Street

City:

Courtenay

Phone Number:

250 338 5495

Postal Code:

V9N 6V4

E-mail:

djensen@mcelhanney.com

As the owner of 1700 Balmoral Avenue shown shaded in the map above, we wish to know what impact our proposal may have in this neighbourhood. The purpose of this consultation is to receive your comments in order to consider them in the design of the project.

Currently, this parcel is zoned multi-family and a Development Permit has been issued for a 4-storey apartment building with 31 residential units and retention of existing building to serve as common space for the residents. The development proposal is for a 5-storey apartment with 45 units.

This is the second stage of the pre-application consultation. At the Open House we will report back responding to any public comments we received during stage one and addressing them in the design of the proposed development. We look forward to sharing the information with you about our proposal.

OPEN HOUSE INVITATION

29 May 2017
D'Esterre House
1801 Beaufort Avenue
COMOX

from
4 : 00 PM

to
7 : 00 PM

**SIGN IN FOR
OPEN HOUSE
For
1700 Balmoral Avenue**

Name (Printed Please)	Address
MARG GRANT	811 DEAL ST.
GORDON GRANT	"
Roger & Isabel Thomas	180 Wilton Way
D. WIENS	1973 Conroy Ave.
John & Vivian Chislett	1615 Balmoral
Brendel Pearson	1646 Balmoral
Amy Van Puckle	1646 Balmoral
Sharon Parker	1646 Balmoral
John Ross	66 Orchard PK Conroy
JUDY TARRIS	65 ORCHARD PARK DR.
SHERY ANDERSON	103-1686 BALMORAL V9M 2N1
TRESS (EY) BACKHOUSE	308-1686 Balmoral V9M 2N1
LEO ANDERSON	307-1686 Balmoral V9M 2N1
Julie Spooner	12-1646 Balmoral Ave V9M 2N1

PRE-APPLICATION CONSULTATION - STAGE 2

1700 Balmoral Avenue

Date: *July 18 2017*

Name: *Erud 4 Backhouse*

Address: *Apt 308
1686 Balmoral Ave
Cotney V9M 2V1*

Please submit your comments at the Open House, or if you cannot attend the Open House, to McElhanney by **June 12, 2017**:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

After seeing the new plans for this project and speaking of it to the architect and owners, I congratulate the architect he did what he could! It would be nice on a large lot!

The lot is too small for a building of that size and to contain so many dwellings. Obstructed with minimal landscaping. There is no space for visitor or traders parking.

In our larger lot at 1686 Balmoral, we have six visitor parking places (needs always more) for 28 apartments. If the visitors for a new building of 40 apartments need to use this ^{to park} the way on Balmoral Avenue, at a time the road, there will be congestion and delays of traffic and possible confusion when the road is so used by a lot of somewhat disabled pedestrians!

Erud 4 Backhouse

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 2

1700 Balmoral Avenue

Date: MAY 30

Name: SHERELLA ANDERSON Address: 103 1686 BALMORAL

Please submit your comments at the Open House, or if you cannot attend the Open House,
to McElhanney by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

I DID NOT FEEL THIS PRESENTATION WAS DONE WELL.
QUESTIONS WERE NOT "REALLY" ANSWERED.
THE "DEVELOPER" IS NOT FROM HERE! NOT AWARE
OF - OR CARE FOR - LOCAL FEELINGS.

I WANT OUR SMALL TOWN ATMOSPHERE!
CONCERNED ABOUT BUILDING HEIGHT, TRAFFIC,
COMMERCIAL AREA WERE - FOO-FOO-ED!

PLEASE THINK OF THE COMMUNITY ATMOSPHERE
KEEP US UNDER 4 LEVELS, LOOK AFTER THE
TRAFFIC PROBLEMS

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 2

1700 Balmoral Avenue

Date: MAY 18
2017

Name: MARY NICOLLS

Address: 30, 1646 BALMORAL AV
COMOX

Please submit your comments at the Open House, or if you cannot attend the Open House, to McElhanney by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

REMARKS ON PROPOSED BUILDING '1700 BALMORAL AVE'

Please provide your comments here and feel free to add additional pages if necessary:

1. I AGREE WITH THE DESIGN OF
4-STORY APARTMENT

I DO NOT AGREE WITH A LARGER BUILDING - 5-
STORY BLDG IS TOO HIGH & WOULD
NOT FIT IN WITH EXISTING BUILDINGS ON
BALMORAL AVENUE.

2. WHAT ARE YOU GOING TO DO ABOUT PARKING?
IT IS DIFFICULT ENOUGH NOW TO GET OUT ON
THIS BUSY STREET

3. PEOPLE MUST BE ABLE TO SAFELY CROSS STREET.

- Mary J. Nicoll

30, 1646 BALMORAL AV
COMOX, B.C.

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 2**1700 Balmoral Avenue**

Date: *MAY 16/17* Name: *MURIEL YOUNG* Address: *UNIT 9 - BALMORAL AV.
COMOX BC*

Please submit your comments at the Open House, or if you cannot attend the Open House,
to McElhanney by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

1700 BALMORAL AVENUE

I HAVE NO OBJECTIONS
TO THIS PROJECT

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 2**1700 Balmoral Avenue**

Date: May 17/17 Name: ANN POKOL

Address: 26-1646 Balmoral Ave
Comox, B.C., V9M 2N1

Please submit your comments at the Open House, or if you cannot attend the Open House,
to McElhanney by:

email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

I strongly object to the proposal of a 5 storey /
45 unit apartment at 1700 Balmoral Ave.

This is already a very busy block with several
condo buildings; a golf course; a shopping centre
and a children's playground.

The increased traffic would make it even more
congested and unsafe for the many seniors and
children, who live and play here.

With a corner at both ends and most drivers
not adhering to the speed zone limit, it's surprising
there haven't been more accidents, and I would
not want to see those chances increase, with
even more congestion.

I pray you reconsider your proposal.

Ann Pokol

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 2

1700 Balmoral Avenue

Date:

Name:

Address:

Please submit your comments at the Open House, or if you cannot attend the Open House, to McElhanney by **June 12, 2017**:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

Wonderful to see this project! So in need of this type of product type for all those looking to buy in Comox.

Excellent architecture! have to see the density + layout to site.

We absolutely support this in downtown core!

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 2

1700 Balmoral Avenue

Date: 29 May 2017 Name: Roger Thomas & Isabel Thomas Address: 160 WILLOW WAY, COMOX

Please submit your comments at the Open House, or if you cannot attend the Open House, to McElhanney by **June 12, 2017**:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

GENERALLY FAVORABLE. THE SITE DEFINITION NEEDS DEVELOPING AND THE PROPOSED DESIGN IS WELL CONCEIVED & TIMELY i.e. NOT LIKELY TO BE "DRAFT" AS THE 2005 DESIGN WOULD BE.

MY PREFERRED UNIT WOULD BE ^AJ^A i.e. 5th FLOOR NE CORNER

BUT, WHAT WILL COST BE ???

PARKING? OPEN PARKING AREA OR ENCLOSED GARAGE(S) HOW MANY SPACES FOR UNIT J?

I SHALL BE INTERESTED TO FOLLOW DEVP'T.

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

307 1686 Balmoral Avenue

Comox, B.C., V9M 2N1

June 8, 2017

Mr. Derek Jensen, A.Sc.T,

McElhanney Consulting Services Ltd.,

495 Sixth Street, Courtenay, B.C., V9N 6V4

RE; 1700 BALMORAL AVENUE

Dear Mr. Jensen;

After attending the recent presentation and considering it I submit a few of my thoughts and observations:

The proposed building:

- I like the proposed outer surfaces, BUT has the vinyl been tested and approved for our West Coast weather?
- I like the colour scheme.
- Five stories are too high. I am afraid it will stand out like a sore thumb. Four stories are enough and will be more harmonious with the buildings along Balmoral.

Suite design:

- I am very pleased with the redesign of the suites at the eastern end of the building. The new plans will eliminate main windows and balconies facing east. The new plans for the main rooms and balconies of these suites will give the owners a much more pleasant outlook. The second bedrooms and extra rooms on the east side will probably have little use, much to the relief of the west facing residents of Fairway Place.

Vehicle parking spaces:

- Fifty-three are not enough. With only twenty-eight units here six parking spaces are not enough on weekends, particularly long weekends, and especially when tradesmen are effecting repairs. I suggest you reallocate some of the bicycle parking spaces to vehicles.

Bicycle parking spaces:

- Fifty-three are far too many. In the five years that I have live in Fairway Place I am the only occupant to go riding. There are three other bikes in our locked unit but they have never been used. A new couple will move in in July. They are bringing two bikes but even if they join me in cycling we will only represent 7% of the units. The developer's optimistic vision that all or most of the future occupants will welcome the opportunity to ride bicycles to Comox recreational facilities is not realistic. Comox roads are congested and scary. Most elder cyclists are well advised to stay off them. The young avid cyclists are out on the more rural roads building up their miles and having the odd accident. You need to do more research on the needs of Comox residents.

Scooter parking spaces:

- I could not find any spaces allocated to scooters. More and more elderly residents are opting for scooters. Up to a few weeks ago we had three and another resident is talking about getting one. Space needs to be planned and should be serviced with 110 volt outlets. I suggest you reallocate some to the bicycle parking spaces to scooters.

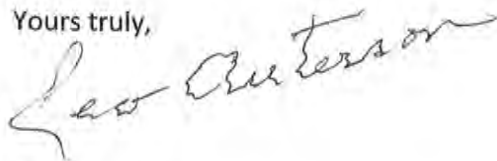
Congestion:

- I am afraid that more traffic, more pedestrians crossing to the mall and more moving vans and service vehicles parking along Balmoral will create more danger and more accidents..

Common room:

- I still believe that provision of a common room would improve the quality of your building. I suggest you do some research on Berwick, the largest provider of retirement suites on Vancouver Island, to find out why they built in four common areas in their first unit here in Comox and will provide more in the new five story addition nearing completion on Comox Avenue.

Yours truly,



Leo Auterson

COMMUNITY CONSULTATION

FOR PROPOSED DEVELOPMENT AT 1700 Balmoral Ave.

Provide written comments by May 2, 2016



495 Sixth St.



Courtenay, BC V9N 6V4

djensen@mcelhanney.com 250-338-5495

The Town of Comox requires that, prior to the submission of a development application, the Applicant shall conduct a Community Consultation. The purpose of the consultation is to inform the community, to identify neighbourhood impacts and to obtain public feedback of the proposed development. An Open House will be scheduled at a later date.

Lindary Holdings Ltd. proposes a rezoning, development permit amendment and covenant modification at 1700 Balmoral Avenue shown shaded on the map.

This parcel, currently containing a single-family dwelling, was rezoned in 2007 and a Development Permit (DP 15-13) was issued for a 4 story residential building containing 31 units with underground parking and a common area for the future strata residents in the existing single-family dwelling, which was proposed to be relocated on the parcel.

We propose to construct the 4 story residential building shown in DP15-13. Rather than retaining the existing single-family building for a common area, we now propose to:

- build a replica of the existing single-family building; and
- construct two additional dwelling units within a replica of the existing single-family dwelling.

More information can be obtained by phone:
McElhanney Consulting Service Ltd. 250-338-5495 or email: djensen@mcelhanney.com



Lynn Gottmann

From: Derek Jensen
Sent: Wednesday, April 13, 2016 10:45 AM
To: Lynn Gottmann
Subject: FW: 1700 Balmoral Avenue

Please start a public response file.

Derek Jensen, AScT.
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4
T 250 338 5495
djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Brenda Pearson [mailto:brenlorn@shaw.ca]
Sent: Wednesday, April 13, 2016 10:42 AM
To: Derek Jensen <djensen@mcelhanney.com>
Subject: 1700 Balmoral Avenue

Reply from Brenda Pearson, #13-1646 Balmoral Avenue

I have no objections to the proposed 4 storey building, in fact I think it will be a very good use of the property. I assume the hedges will remain, although trimmed a great deal.
I do have some concerns, though they probably should be addressed to council.

Regarding traffic. As you probably realise there are driveways onto Balmoral from Stevenson Place, Ocean Pointe, Fairway and the shopping centre, all within a block of each other. As a resident I am aware that traffic from Port Augusta tends to sweep at speed around the corner onto Balmoral and very few people, especially coming from Pritchard, obey the speed limit of 30 kph. Your access will inevitably add to the problems especially when considering a possible 31 plus vehicles entering and leaving. I think the present crosswalk will need to be relocated and a proper sidewalk should be built along the front of your property as there are many people, some golfers with equipment, who walk along there to the club. As well the park is well-used, especially in summer, with both young and old and of course many vehicles are parked alongside. Also there are a lot of very large delivery trucks accessing the shopping centre which of course adds to the heavy traffic volume. I hope these considerations will be taken into account.

Brenda L. Pearson.

STAGE 1

PRE-APPLICATION CONSULTATION
1700 Balmoral Avenue

COMMUNITY CONSULTATION – COMMENTS

Date: April 14/16 Name: FRANK LURAY Address: 22-1646 BALMORAL AVE
COQUITO

By 2 May 2016 please submit your comments or any questions you may have to Derek Jensen at McElhanney Consulting Services, 495 Sixth St., Courtenay, BC, V9N 6V4 or e-mail to djensen@mcelhanney.com.

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

OPPOSED TO INCREASING THE
DENSITY.

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

Lynn Gottmann

From: Derek Jensen
Sent: Friday, April 22, 2016 11:52 AM
To: Lynn Gottmann
Subject: FW: Comments- 1700 Balmoral Avenue, Comox

For the file.

Derek Jensen, AScT,
Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
495 Sixth Street | Courtenay BC V9N 6V4
T 250 338 5495
djensen@mcelhanney.com

Connect with McElhanney: [Facebook](#) | [Twitter](#) | [LinkedIn](#)

From: Mike and Wendy Wilson [mailto:wilsonsmw@telus.net]
Sent: Friday, April 22, 2016 11:30 AM
To: Derek Jensen <djensen@mcelhanney.com>
Subject: Comments- 1700 Balmoral Avenue, Comox

We are residents at 1646 Balmoral Avenue, Comox, BC
These are our comments regarding the development of 1700 Balmoral Avenue:

As you are undoubtedly aware, this development will significantly increase street and pedestrian traffic on Balmoral Ave.

As it is even now, it is quite dangerous to cross Balmoral Ave on the crosswalk. Traffic is moving so fast, roaring past the playground and park.

The traffic coming from Pritchard down Balmoral to Port Augusta is way over speed limit making it quite dangerous even to walk on the sidewalk and the crosswalks.

With the increased traffic from this development and the Lorne Hotel project, we would ask that the Town of Comox at a minimum put in flashing crosswalk lights at the crosswalks and speed bumps at each end of the park area.

Thank you.

Mike and Wendy Wilson

103 1686 Balmoral Avenue
Comox BC V9M 2N1
April 22, 2016

Mr. Derek Jensen, A.Sc.T
Consultation Contact
McElhanney Consulting Services
495 Sixth St.
Courtenay BC V9N 6V4

Re: Rezoning etc., 1700 Balmoral Avenue

Dear Mr. Jensen;

Thank you for the opportunity to comment on this rezoning and changes and the impact they might have on the residents of Fairway Place.

We sought first reactions to your letter at our regular coffee session on Wednesday, April 13, and appointed a committee to gather more information. This was presented to a special condo meeting on Friday, April 22. Our comments are as follows.

We are impressed with the site plan and the picture of the finished buildings. We particularly like the sloping roofs and set back of the fourth floor; these details soften the effect of the four stories.

Our major concern with the proposed development:

We regret the elimination of the common area as approved in the original Development permit. We believe that in the pursuit of increased town density you are removing the opportunity to create a building with a special spirit of togetherness that is so missing in today's society.

In Fairway Place we have a common area which is in use on an almost daily basis. A core group pursues an ongoing hobby and is there six days a week. Other residents drop in daily to check on progress and stay to chat and share stories. Attendance at the morning coffee sessions every second Wednesday is high and growing. Plans for going out for lunch or supper are hatched and carried out. Because trust builds and friendships form, our condo enjoys an amicable family atmosphere. Residents care, support and help each other.

If your proposal is adopted your residents will not enjoy similar opportunities.

Group reaction to the proposed elimination of the common area prompted the following resolutions:

Resolution 1. That the proposed rezoning and other amendments be rejected and that the developers be instructed to build according to the original proposal.

Resolution 2. That if, in fact, the existing single-family dwelling is in too poor condition to fulfill the terms of the original proposal, that the developers be instructed to plan a common area into the major building and that no other building be considered for the site.

Resolution 3. That if, in fact, the existing single-family dwelling is in too poor condition to fulfill the terms of the original proposal, that the developers plan a one story replica of the original single-family dwelling and construct it at the location as originally planned. This building would serve as a common area and clubhouse for the residents.

Concern was also expressed about **traffic-flow and congestion** on the street in front of the property and in the entry way for the following: Fire trucks, Ambulance, Handy Dart, Moving vans and trades or maintenance vehicles.

We ask that you give consideration to including:

- a **sprinkler system** for the building
- **pre-wiring for charging units** in the underground parking area

Regarding the impact the development would have on Fairway Place:

The effect of a four story building will be to cut off sunlight and darken the suites on the north-north-west side of our building. We will no longer be able to enjoy the sunsets as seen through the high trees on the golf course. We will similarly cut off sunlight and darken the lower suites in your building. Privacy in both buildings will suffer.

We have a major concern for the health of the mature cedar trees inside our fence on the northwest side of our property. These beautiful trees screen us and bring the forest closer to our windows. We are sure they will be similarly appreciated by the new owners in your condo who face the southeast. Our concern is that when your property is excavated for the underground parking, the combination of the excavation, the disturbance of the adjacent soil and the flow through the peripheral drainage piping will significantly lower the existing water table to the detriment of our beautiful cedars. We request that your contractors disturb the side bank as little as possible.

To lessen the impact consider the following resolution:

Resolution 4. That the major building be moved towards the golf course property line to the greatest extent allowed within the building regulations.

If this were done it would address both concerns. More light and sunlight would be available for both of our buildings. Greater separation would enhance privacy and would give greater protection to the roots of our cedars.

All four resolutions received unanimous approval at the meeting.

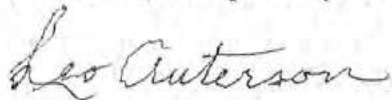
We would be happy to answer questions or clarify anything that is not clear in this submission.

Yours truly,

For the Condo Committee and the residents of Fairway Place,



Sherry Anderson, Chairperson (218 2825)



Leo Auterson, Vice Chairperson (941 1371)

copies: Gail Andestad
Cindi Reichelt

Lynn Gottmann

From: Derek Jensen
Sent: Thursday, April 28, 2016 1:07 PM
To: Lynn Gottmann
Subject: FW: 1700 Balmoral Avenue

For the file,

Derek Jensen, AScT,
 Project Manager
McElhanney Consulting Services Ltd.
www.mcelhanney.com
 495 Sixth Street | Courtenay BC V9N 6V4
 T 250 338 5495
djensen@mcelhanney.com

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From: Glenn & Sharon Parker [mailto:sharglenn@yahoo.com]
Sent: Thursday, April 28, 2016 11:37 AM
To: Derek Jensen <djensen@mcelhanney.com>
Cc: council@comox.ca
Subject: 1700 Balmoral Avenue

This response to your request for consultation comes from Sharon Parker. My husband and I live at #25, 1646 Balmoral Avenue in Comox.

Since we live just a few hundred meters from 1700 Balmoral we have a vested interest in what will happen to our neighborhood. We welcome the opportunity to share our concerns with you and the Town of Comox.

Communal Area for Owner-Occupants

Note is made that the new project will not include a gathering place for the owner-occupiers. Of course you may plan as you wish in this respect, however, it is beneficial when there is included an area where people may gather. This encourages the concept of neighborhood and mutual dependence. People need an area, other than the individual domestic units, to gather for meetings, for recreation such as cards or coffee or simply to chat. This helps to create a caring atmosphere among the residents many of whom will be seniors. Our strata has no area where we can gather comfortably and we certainly regret that at times. The developer or builder has a vested interest in how many units can be squeezed onto a property, and that would be reduced if provision is made for communal space. It is noted that in the original proposal provision was made for a communal space for the owner-occupiers to share. Regrettably, this space is designated as a living unit in the new plan.

Increased Density

The property at 1700 is about half the size of our strata at 1646. We have 34 units on twice the size of property. We also have a 4 story condo building. Certainly this increases the density. In fact, this development will have the highest density on Balmoral Avenue. While some people find this a

desirable quality, this high density does not necessarily contribute to the quality of life of those who will live at 1700.

Traffic Concerns

When we drive or walk out of our development at Ocean Pointe, we look right, left and right again, and then we wait and repeat the process, just to be safe. Though the posted speed limit is 20 kph in front of our strata, it is a dangerous area. Efforts have been made by the Town of Comox to keep us safe, however it is a difficult situation. This development with 31 units will put that many more people and vehicles in the same congested area. It will be necessary for the developers to cooperate with the Town of Comox traffic engineers to anticipate and accommodate this increased foot and vehicle traffic.

Thank you for this opportunity to express our concerns . We would like to welcome you to our neighborhood. Please acknowledge receipt of this email.

Glenn and Sharon Parker

STAGE 1

PRE-APPLICATION CONSULTATION
1700 Balmoral Avenue

COMMUNITY CONSULTATION – COMMENTS

Date: April 28/2016 Name: Norona Norton Address: #213, 1683 BALMORAL AVE, COHOX BC. V9M 2M3

By 2 May 2016 please submit your comments or any questions you may have to Derek Jensen at McElhanney Consulting Services, 495 Sixth St., Courtenay, BC, V9N 6V4 or e-mail to djensen@mcelhanney.com.

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

- ① Increased Population: Density:
 - Ⓐ New Lorne Hotel
 - Ⓑ New Brunswick on Cef. Ave.
 - Ⓒ New development @ 1700 Balmoral Ave.
- ② Increased Traffic flow: Comox Ave, Stewart Ave, Balmoral Ave.
- ③ Access + Exit: from: 1700 Balmoral Ave,
 - Ⓐ two-way traffic entering the Mall from Balmoral Ave
 - Ⓑ 2 exits/entrances from Comox Ave. to the Mall.
- ④ Crosswalk on Balmoral Ave:
- ⑤ Anderson Park + Dennis Courts, Balmoral Ave
- ⑥ * Parking now, along Balmoral Ave. near the crosswalk where a "no parking" yellow line once ~~existed~~ existed! Reinstall!
- ⑦ Surely "Traffic Lights" will be necessary at all intersections?

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

Thankyou for Respectfully,
your consideration — Norona Norton

STAGE 1

PRE-APPLICATION CONSULTATION
1700 Balmoral Avenue

COMMUNITY CONSULTATION - COMMENTS

Date: 1 MAY 15 Name: HAROLD THOMSON Address: 1686 BALMORAL AVE #104

By 2 May 2016 please submit your comments or any questions you may have to Derek Jensen at McElhanney Consulting Services, 495 Sixth St., Courtenay, BC, V9N 6V4 or e-mail to djensen@mcelhanney.com.

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

Being a senior [80] and walking with a cane I was crossing the street from the store to Balmoral when a white car hit my cane and kept on going. turned the corner and proceeded along Balmoral a lady walking her dog could not believe any one could do that asked if I was okay, I was never hit okay. This took place right across the street at 1700 Balmoral Ave.

Coming home from Comox Ave I turned to come up to Balmoral Ave and again a car came through a stop sign and was I glad I stopped or I sure I would have been a hospital guest or dead as it was travelling fast. All I could see on the back of the car was a big green N. 10

More development please.

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

PRE-APPLICATION CONSULTATION - STAGE 1

1700 Balmoral Avenue

Date: April 27, 2017 Name: MARY NICOLLS

Address: 30 - 1646 BALMORAL AVE
COMOX

Please submit your comments to McElhanney Consulting Services Ltd. by:
email djensen@mcelhanney.com or
mail to 495 Sixth Street, Courtenay, BC, V9N 6V4

All written responses, including submissions by e-mail must include name and address of the person making comment and include "1700 Balmoral Avenue" in the subject heading.

Please provide your comments here and feel free to add additional pages if necessary:

1. 5 STOREY'S IS TOO HIGH. COMOX IS A
RESIDENTIAL AREA - MAINLY OF OLDER PEOPLE.
WE DO NOT WANT A BUILDING THIS HIGH.
2. SOMETHING WILL HAVE TO BE DONE WITH TRAFFIC.
CARS ARE ALREADY GOING TOO FAST - THE
'30' KMS AN SHOULD BE STRICTLY ENFORCED.
PERHAPS THEY COULD PUT A 'BUMP' IN THE ROAD -
AS WELL AS SIGNAGE. I WILL BE 81 YEARS OLD
SOON - AND MANY RESIDENTS ARE OLDER &
CANNOT WALK ACROSS THE ROAD QUICKLY.

Mary J Nicoll

All written submissions provided to us during this consultation process will be submitted by us to the Town with our rezoning application.

OPEN HOUSE

FOR PROPOSED DEVELOPMENT AT 1700 Balmoral Avenue, Comox



495 Sixth St.
Courtenay, BC, V9N 6V4



djensen@mcelhanney.com

The Town of Comox requires that, prior to the submission of an application for a rezoning, the Applicant shall conduct a Community Consultation. The purpose of the consultation is to inform the community, to identify neighbourhood impacts and to obtain public feedback of the proposed development.

An Open House, hosted by Lindary Holdings Ltd., to facilitate public review of the proposed development at 1700 Balmoral Avenue, shown shaded on the map, is scheduled for:

Wednesday
May 25, 2016
4:00 PM – 7:00 PM
Comox Recreation Centre
1855 Noel Avenue



If unable to attend Open House, written comments on the preliminary plans may be submitted to Derek Jensen until May 31, 2016.

**More information can be obtained by phone: 250-338-5495
or email: djensen@mcelhanney.com**

May 25, 2016
4-7pm.

**SIGN IN FOR
OPEN HOUSE**
For
1700 Balmoral Avenue

Name (Printed Please)	Address
JIM WHITEHEAD	481 HOLLY PLACE CONDOX ✓
Sherry Anderson	1484 Balmoral Ave -103
Eliz Wegerink	" " " 102
Aileen Matkaski	" " " 109
TRESS (EMOM) BACKHOUS	1686 Balmoral Ave 308
* Approx 5 ADDITIONAL PEOPLE ATTENDED WITHOUT SIGNING IN.	

Stage 2 Letter #1

QUESTIONS FOR WEDNESDAY'S MEETING

- Will the main building be moved? Original plan showed about 14 feet from building to golf course fence; 11 ½ feet from building to our property line/fence.
- Is a second building still planned? Will it be the original home, one of our suggestions or two more units housed in a replica?
- Is our concern for the welfare of our cedar trees addressed?
- Is there any plan for a common area anywhere?
- Is traffic flow and congestion addressed?
- Will there be a sprinkling system?
- Will there be pre-wiring for charging units?
- Will construction take place during normal working hours?
- Will workmen have a special parking place?
- What concerns have others expressed?

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

**ATTACHMENT 7
PUBLIC SUBMISSIONS**

Twyla Graff

From: j.spooner5334@gmail.com on behalf of julie spooner <j.spooner@shaw.ca>
Sent: June 16, 2017 11:20 AM
To: Derek Jensen
Cc: council
Subject: 1700 Balmoral Ave

RECEIVED

June 16, 2017

Regarding the traffic survey required on this property:

TOWN OF COMOX

At the Open House for this property as required by the zoning application, we were told that a traffic survey would be done this month (June). I see that the mechanism is in place now.

My query regards the placement of one counter at the property edge nearest the golf course only. This will not give a clear picture of traffic patterns as the entrance to the mall is east of the marker. To give fair and complete information in your zoning application, I request that you put traffic markers lined up with both side perimeters of the property, 1700 Balmoral Avenue.

Sincerely,

Julie Spooner
 12-1646 Balmoral Ave
 Comox V9M2N1

LOG: 17-142	REFER:	AGENDA: ---
FILE: planning	ACTION: ---	

o ~ file - planning
 copies ~ Mayor & Council
 RK / MK / SA / SR

Twyla Graff

From: Town of Comox – Administration
Sent: June 15, 2017 9:45 AM
To: Twyla Graff
Cc: Shelly Russwurm: Town of Comox
Subject: FW: Traffic Count Balmoral Avenue, Comox BC

RECEIVED

June 15, 2017

TOWN OF COMOX

o ~ cfile 5460-1 & planning
copies ~ RK / MK / SA

From: Mike and Wendy Wilson [mailto:wilsonsmw@telus.net]
Sent: June-15-17 9:34 AM
To: Town of Comox – Administration <town@comox.ca>; djensen@mcelhanney.com
Subject: Traffic Count Balmoral Avenue, Comox BC

We were pleased to see that a traffic count is being undertaken on Balmoral Avenue in between the entrance to Comox Golf Club and the Comox mall. We expect that this is a result of comments made to the town and McElhanney Consulting Services Ltd re the Pre-Application Consultation – Stage 1 1700 Balmoral Avenue regarding traffic in this area.

However, the location of the traffic counter and the results obtained from the count will not, in our opinion, be representative of the actual traffic that occurs in the area. It will not count the traffic that comes from Pritchard and other streets in that area past the park and into Comox Mall to shop at Johns and the BC Liquor store and others that are very high volume stores in the mall. It will not count the traffic that leaves the mall from the Balmoral exit, turns right and heads towards Pritchard etc. In our opinion, the count would be more accurate if it was taken near the crosswalk on Balmoral across from Comox Mall.

We hope that you will consider this suggestion. Should you require additional clarification of our recommendation please contact the undersigned.

Mike and Wendy Wilson
6 1646 Balmoral Avenue, Comox BC

Twyla Graff

From: j.spooner5334@gmail.com on behalf of julie spooner <j.spooner@shaw.ca>
Sent: June 12, 2017 4:46 PM
To: Derek Jensen
Cc: council
Subject: 1700 Balmoral Ave

RECEIVED

June 12, 2017

TOWN OF COMOX

Thank you for the opportunity to view your project at D'Esterre.

In my reply to your Stage 1 consultation, I discussed my main concerns. One being the traffic on Balmoral Ave. which was not designed to have heavy traffic and parking loads. As Comox Ave becomes more congested near the extension to Berwick, traffic is already building on Balmoral. I also mentioned that I think the town of Comox must develop consistency in zoning to maintain the "town by the sea" ambience that they are marketing.

I will continue to press the town to limit heights of buildings as well as to maintain architectural consistency. The development which is already approved by the town meets my concerns for reasonable density, height of four stories maximum and a residential style of architecture consistent with existing buildings and the neighbourhood.

I hope that you will see that you are building into a residential neighbourhood that begins with your address. Unfortunately, I did not see any adjustments to your plans in response to the Stage 1 Consultation.

Thank you
 Julie Spooner
 12-1646 Balmoral Ave
 Comox BC

LOG: 17-139	REFER:	AGENDA:
FILE: planning	ACTION: file	----

o ~ planning
 copies ~ Mayor & Council
 RK / SR / MK

Twyla Graff

From: j.spooner5334@gmail.com on behalf of julie spooner <j.spooner@shaw.ca>
Sent: June 12, 2017 4:46 PM
To: Derek Jensen
Cc: council
Subject: 1700 Balmoral Ave

RECEIVED

June 12, 2017

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TOWN OF COMOX

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I hope that you will see that you are building into a residential neighbourhood that begins with your address. Unfortunately, I did not see any adjustments to your plans in response to the Stage 1 Consultation.

Thank you
 Julie Spooner
 12-1646 Balmoral Ave
 Comox BC

LOG: 17-139	REFER.	AGENDA:
FILE: planning	ACTION: file	----

o ~ planning
 copies ~ Mayor & Council
 RK / SR / MK

RECEIVED**Town of Comox – Administration**

From: Lynda Pickering <pickchick50@hotmail.com>
Sent: May-15-17 9:29 AM
To: Town of Comox – Administration
Subject: Traffic on Balmoral Avenue

May 15, 2017

TOWN OF COMOX

O - Planning

Copies - RK / SA

To: Comox Town Hall**Subject:** Traffic on Balmoral Avenue

I am concerned about the traffic on Balmoral Avenue and the possibility of it becoming even worse if the Town of Comox approves the construction of 45 units at 1700 Balmoral Avenue. Since I live in the neighbourhood, I ask that you consider my concerns.

The traffic on Balmoral Avenue, as we enter Balmoral Avenue from our strata, is difficult to navigate. People often speed in this section and it is difficult to see the traffic coming, as there is a curve in the road.

At times seniors in scooters have almost hit me.

As seniors, we are often slow as we walk.

At times we need walkers or canes to help us.

Usually the traffic slows for us, but we have all had close calls.

At one time there was a flashing sign to indicate the speed of traffic as it rounded the curve on Balmoral.

That data should tell you that every once in a while, a vehicle speeds through.

It has only been luck that a serious vehicle-pedestrian accident has not yet occurred.

You have access to experts in traffic engineering and traffic calming measures.

I appreciate your consulting them and considering changes to the present situation.

More units on Balmoral will increase the traffic and make it more dangerous.

Please have another look at the area in question.

Please reconsider the number of units proposed for 1700 Balmoral Ave.

Lynda Pickering

1646 Balmoral Avenue #18

Comox, BC

RECEIVED

MAY 11 2017

TOWN OF COMOX

To the Mayor & Council,

May 10 2017

Comox, B.C.

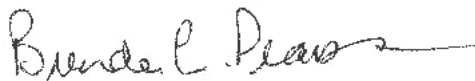
Re: proposed development 1700 Balmoral Avenue:

I have no objection to the proposed development but I do question the need for five storeys which will not be in keeping with the buildings in the surrounding area and will no doubt bring many more vehicles to the area and I urge Council to consider this aspect very carefully – the next developer will probably ask for six storeys, and on and on it goes.

There is also the question of traffic which must be addressed, I think regardless of any development on this property. As you will be aware, within less than one block of 1700 Balmoral there are currently six driveways: The Golf Course, shopping centre, Fairways (2), Ocean Pointe and Stevenson Place, all grouped within a very short distance of each other. There is a crosswalk at the edge of the property in question. As well, there is the park and tennis courts which areas are both very busy year-round with at times very heavy parking. It must be remembered that the current buildings are all senior-oriented and provide considerable pedestrian and scooter traffic.

Although there is a 30 km/h zone which begins at the shopping centre and continues to Stewart, very few drivers pay attention; those from Port Augusta frequently speed around the corner and those from Stewart likewise, indeed it is sometimes quite dangerous exiting our property (Ocean Pointe) as looking towards the left is a blind corner and cars are on you with very little warning to either driver. I think this problem could easily be overcome with traffic calming devices and speed bumps and I recommend that this be done regardless of the proposed development. It is "an accident waiting to happen".

Brenda L. Pearson 13-1646 Balmoral Avenue.



LOG: 17-118	REFER:	AGENDA:
FILE: Planning	ACTION: file	~

0 - planning
copies - Mayor + Council
RK/mk/SR

Twyla Graff

From: Town of Comox – Administration
Sent: May 9, 2017 4:10 PM
To: Twyla Graff
Cc: Shelly Russwurm
Subject: FW: Pre-application consultation-1700 Balmoral

RECEIVED

May 9, 2017

TOWN OF COMOX

o ~ planning
 copies ~ RK / MK / SR

-----Original Message-----

From: Sonja Van Sickle [mailto:vansickleonja3@gmail.com]
Sent: May-09-17 4:08 PM
To: djensen@mcelhanney.com; Town of Comox – Administration <town@comox.ca>
Subject: Pre-application consultation-1700 Balmoral

Appreciate receiving the notice re proposed changes to 1700 Balmoral Ave, Comox, BC.
 Am currently a resident of 1646 Balmoral Ave. unit 15 just 2 properties from the proposed development.

Am definitely opposed to a 5 story 45 unit bldg being built on this property. Unfortunately a 5 story bldg doesn't enhance the neighbourhood when all surrounding bldgs are 4 stories. Additional units will only increase a TRAFFIC problem that is already out of hand.

Over the yrs the Town of Comox has done numerous traffic studies along this stretch of Balmoral, (Port Augusta to Stewart) but nothing definite has ever become of the studies. Very disappointing as the situation only gets worse! The concern is for the families using the Park, the many seniors in the area who walk for exercise, plus seniors using walkers and the most dangerous of all are the seniors in motorized scooters who seem to pay no attention to anyone! At times, exiting our complex is a nightmare due to speeding and the fact that there is a curve in the road just before Stewart and sight is limited. Pedestrian crosswalks in the area need flashing lights. This piece of roadway is an accident waiting to happen!!!!!!

Approval for a 4 story, 31 unit is acceptable, but do not feel the addition of 14 more units is necessary in an already high density & traffic area.

Will look forward to your future Open House.

Sent from my iPad

Twyla Graff

From: Sherry Anderson <blueanteak@hotmail.com>
Sent: May 7, 2017 9:23 PM
To: Sherry Anderson; council
Subject: 1700 Balmoral Comments

RECEIVED

May 7, 2017

Sherella Anderson 103-1686 Balmoral Avenue V9M 2N1
 Derek Jensen McElhanney Consulting Services Ltd. May 8, 2017

TOWN OF COMOX

I feel that a 5 storey structure anywhere in Comox is unnecessary. We enjoy our "small town" atmosphere and taller buildings DO NOT add any atmosphere anywhere! 1700 is not a large lot and a 5 storey BOX will not leave much green space. And, 5 storeys--with elevators, HVACS, etc. will actually be 6 or more storeys! You will require 2 elevators for over 100 people, won't you?

Parking--There should not be and "on street" parking for residents or visitors. This area is already very busy with the Mall and Golf Course.

Where are vehicles larger than cars going to park? Too many of our streets are already down to single lane traffic, due to pick-ups parked on both sides of the street. Go look at Dogwood east of Pritchard!

Trees--At Fairways Place, we have mature, 75 foot Cedars along our property line beside 1700 Balmoral. These should not be put in danger of dying, due to construction.

The previous plans for 1700 Balmoral were almost acceptable. Except for lack of parking larger vehicles--ie Service trucks, Care buses, Ambulance and Fire.

Common Area We have a large room for common use. Meetings, social gatherings etc. People from other Condo's comment on how nice this area is. Could also be used as a safe place for children to gather. Our common area is well used and considered quite a "perk"

Is the existing building now going to be eliminated completely! like Shakesides!!

Please Council---Save the Looks of OUR TOWN

o file - planning
 copies ~ RK / MK / SR

sincerely,

Sent from Windows Mail

LOG: 17-111	REFER.	AGENDA.
FILE: Planning	ACTION: file	

Twyla Graff

From: Sherry Anderson <blueanteak@hotmail.com>
Sent: May 7, 2017 9:23 PM
To: Sherry Anderson; council
Subject: 1700 Balmoral Comments

RECEIVED

May 7, 2017

Sherella Anderson 103-1686 Balmoral Avenue V9M 2N1
 Derek Jensen McElhanney Consulting Services Ltd. May 8, 2017

TOWN OF COMOX

I feel that a 5 storey structure anywhere in Comox is unnecessary. We enjoy our "small town" atmosphere and taller buildings DO NOT add any atmosphere anywhere! 1700 is not a large lot and a 5 storey BOX will not leave much green space. And, 5 storeys--with elevators, HVACS, etc. will actually be 6 or more storeys! You will require 2 elevators for over 100 people, won't you?

Parking--There should not be and "on street" parking for residents or visitors. This area is already very busy with the Mall and Golf Course.

Where are vehicles larger than cars going to park? Too many of our streets are already down to single lane traffic, due to pick-ups parked on both sides of the street. Go look at Dogwood east of Pritchard!

Trees--At Fairways Place, we have mature, 75 foot Cedars along our property line beside 1700 Balmoral. These should not be put in danger of dying, due to construction.

The previous plans for 1700 Balmoral were almost acceptable. Except for lack of parking larger vehicles--ie Service trucks, Care buses, Ambulance and Fire.

Common Area We have a large room for common use. Meetings, social gatherings etc. People from other Condo's comment on how nice this area is. Could also be used as a safe place for children to gather. Our common area is well used and considered quite a "perk"

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Please Council---Save the Looks of OUR TOWN

o file - planning
 copies ~ RK / MK / SR

sincerely,

Sent from Windows Mail

LOG: 17-111	REFER:	AGENDA
FILE: Planning	ACTION: file	

Gail Andestad

From: Marvin Kamenz
Sent: April-28-16 1:19 PM
To: Gail Andestad
Subject: FW: 1700 Balmoral Avenue

Marvin Kamenz
 Municipal Planner
 Town of Comox
 1809 Beaufort Avenue, Comox BC, V9M 1R9
 Ph (250) 339-2202
 Fax (250) 339-7110

This message is intended only for the use of the individual or entity named above, and may contain information that is privileged, confidential or exempt from disclosure under applicable law. If you are not the intended recipient or their employee or agent responsible for receiving the message on their behalf, your receipt of this message is in error and not meant to waive privilege in this message. Please notify us immediately, and delete the message and any attachments without reading the attachments. Any dissemination, distribution or copying of this communication by anyone other than the intended recipient is strictly prohibited. Thank you.

From: Lo Lockhard
Sent: April-28-16 12:00 PM
To: Shelly Russwurm; Marvin Kamenz; b price; H Mackinnon; K Grant; m swift; Marg Grant; Paul Ives; Russ Arnott
Subject: FW: 1700 Balmoral Avenue

From: Glenn & Sharon Parker [<mailto:sharglenn@yahoo.com>]
Sent: April-28-16 11:37 AM
To: djensen@mcelhanney.com
Cc: council <council@comox.ca>
Subject: 1700 Balmoral Avenue

This response to your request for consultation comes from Sharon Parker. My husband and I live at #25, 1646 Balmoral Avenue in Comox.

Since we live just a few hundred meters from 1700 Balmoral we have a vested interest in what will happen to our neighborhood. We welcome the opportunity to share our concerns with you and the Town of Comox.

Communal Area for Owner-Occupants

Note is made that the new project will not include a gathering place for the owner-occupiers. Of course you may plan as you wish in this respect, however, it is beneficial when there is included an area where people may gather. This encourages the concept of neighborhood and mutual dependence. People need an area, other than the individual domestic units, to gather for meetings, for recreation such as cards or coffee or simply to chat. This helps to create a caring atmosphere among the residents many of whom will be seniors. Our strata has no area where we can gather comfortably and we certainly regret that at times. The developer or builder has a vested interest in how many units can be squeezed onto a property, and that would be reduced if provision is made for

communal space. It is noted that in the original proposal provision was made for a communal space for the owner-occupiers to share. Regretfully, this space is designated as a living unit in the new plan.

Increased Density

The property at 1700 is about half the size of our strata at 1646. We have 34 units on twice the size of property. We also have a 4 story condo building. Certainly this increases the density. In fact, this development will have the highest density on Balmoral Avenue. While some people find this a desirable quality, this high density does not necessarily contribute to the quality of life of those who will live at 1700.

Traffic Concerns

When we drive or walk out of our development at Ocean Pointe, we look right, left and right again, and then we wait and repeat the process, just to be safe. Though the posted speed limit is 20 kph in front of our strata, it is a dangerous area. Efforts have been made by the Town of Comox to keep us safe, however it is a difficult situation. This development with 31 units will put that many more people and vehicles in the same congested area. It will be necessary for the developers to cooperate with the Town of Comox traffic engineers to anticipate and accommodate this increased foot and vehicle traffic.

Thank you for this opportunity to express our concerns . We would like to welcome you to our neighborhood. Please acknowledge receipt of this email.

Glenn and Sharon Parker

RECEIVED

April 27, 2017

Twyla Graff

LOG: 17-091	REFER:	AGENDA:
FILE: 5460-01	ACTION: MR	----

From: Paul Ives
Sent: April 27, 2017 2:16 PM
To: Ted & Mary Kleim
Cc: Twyla Graff; Richard Kanigan; Shelly Russwurm; Bill Smith
Subject: Re: Traffic on Balmoral Avenue

TOWN OF COMOX

o ~ cfile
 copies ~ Mayor & Council
 RK / SA / MK / SR / BS

I believe that enforcement is always worth consideration - our bylaw officer has advised that RCMP have monitored this area for speeding and has been advised that RCMP have determined there to be, for the most part, substantial compliance with speed limits posted in that area - as you have indicated, speed readers installed by the Town on a temporary basis in that area have had some desired effect - staff is always amenable to re-installing those speed readers in that area on a rotating basis with other areas... Paul

Sent from my iPad

On Apr 27, 2017, at 1:21 PM, Ted & Mary Kleim <everymountain@shaw.ca> wrote:

Seriously Mr Mayor? The RCMP would have to have a member with a radar gun on the scene 24/7 and they have much bigger fish to fry than this. I consider this a town issue. With your access to professionals who deal with logistics for a living, I would think you could find someone to come up with a solution that is more practical than this.

MK

From: PaulIves@comox.ca
Sent: Thursday, April 27, 2017 12:04 PM
To: everymountain@shaw.ca
Cc: Rarnott@comox.ca ; kgrant@comox.ca ; Mgrant@comox.ca ; HMackinnon@comox.ca ; bprice@comox.ca ; mswift@comox.ca
Subject: Re: Traffic on Balmoral Avenue

Thanks for your email. Have you reported these traffic concerns to the local RCMP detachment? Paul

Sent from my iPad

On Apr 27, 2017, at 11:59 AM, Ted & Mary Kleim <everymountain@shaw.ca> wrote:

Hello Mayor and Councillors,

I am writing to express my concerns about the current traffic conditions on Balmoral Avenue, specifically between Stewart St and Port Augusta. I live at 1646 Balmoral and it is a crap shoot getting out of our driveway safely especially if one needs to turn left onto Balmoral. Cars often come barreling around the curve between our driveway and Stewart St making it hazardous to enter traffic safely or to cross the street even in the crosswalk closer to the mall entrance. On occasion, speeding drivers have honked at me for pulling out when they are the ones in error. Drivers in Comox seem blissfully unaware of

the speed regulations in a playground zone not just here but also by the Rec Centre near where I used to live.

I would ask that council consider some sort of traffic calming measures for this stretch of street. The flashing speed sign works for a short time but I realize we cannot have a sign there permanently. With the proposed new development at 1700 Balmoral, traffic, both vehicular and pedestrian, is only going to increase thus increasing the odds of a serious accident.

Looking forward to hearing what you intend to do about this problem.

Best regards,
Mary Kleim
#23 – 1646 Balmoral Ave
250-339-6743



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RECEIVED

April 27, 2017

Twyla Graff

TOWN OF COMOX

From: Town of Comox – Administration
Sent: April 27, 2017 2:40 PM
To: Twyla Graff
Subject: FW: PRE-APPLICATION CONSULTATION - STAGE 1 1700 Balmoral Avenue, Comox BC

o ~ planning
 copies ~ RK / MK / SR

From: Mike and Wendy Wilson [mailto:wilsonsmw@telus.net]
Sent: April-27-17 2:30 PM
To: djensen@mcelhanney.com
Cc: Town of Comox – Administration
Subject: PRE-APPLICATION CONSULTATION - STAGE 1 1700 Balmoral Avenue, Comox BC

Please accept this email as our response to the proposal for amendment to the Development Permit that has been issued for a 4-story apartment building with 31 units and retention of the existing building to serve as a common space for the residents. This amendment proposes to eliminate the "heritage" building and construct a 5-storey apartment building with 45 units. This property has apparently been the subject of amendments in the past. Is the developer changing plans in order to wear people down so that they will consider a plan that does not meet the needs of local residents? We would expect that this is not the case and that neighbourhood concerns will be fully considered. If this amendment is approved we wonder if the owners of the former Lorne Hotel property will attempt to have its permit increased to allow 5 stories. We do not want to have our downtown core turned into a high rise building area. Or will this developer's next amendment be for 6 stories with the hope that the 5 storey proposal passes?

We object to the increase in the number of units from 31 to 45 and the increase from 4-stories to 5-stories. There is no precedent for a building height of more than 4-stories in this neighbourhood. Have any recent studies been conducted to see what effect the construction of even 31 units and the resultant increase in vehicular traffic will have in this already very busy traffic area? It is well known that Balmoral Avenue from Stewart Avenue to Port Augusta Street already experiences high volumes of traffic speeding past the park and tennis courts at all times of day. As a matter of fact yesterday my wife and I, while walking along Balmoral, witnessed a very near collision as an SUV made a left turn exit from the Comox Mall onto Balmoral in front of an approaching Shaw Cable van that was coming down Balmoral from past the park. Fortunately the Shaw driver reacted quickly and slammed on his brakes and honked his horn narrowly avoiding a serious crash. The SUV continued on its way without reacting. It should be noted that this incident was immediately across from the subject development property that will bring many more vehicles entering and exiting the proposed development. Today, the same thing happened at the entrance to the mall – vehicle pulling out onto Balmoral narrowly missing a van coming down Balmoral. Increasing the number of units would increase that development's vehicular traffic potentially by 50%. The renovations

to the mall and the increased mall parking will most likely increase traffic from that area. The Comox Golf Club, located adjacent to the subject development, also contributes substantially to the traffic in this area. When the Lorne Hotel property is developed in the future it will bring further traffic to the busy Comox Avenue and Port Augusta extension of Balmoral Avenue. The section of Balmoral Avenue from Stewart Avenue to Port Augusta already has severe difficulties with few vehicles adhering to the 30 km speed limit past the park and not yielding for pedestrians crossing at the crosswalk that is adjacent to the proposed development.

When we moved to Comox 2 ½ years ago we were attracted by the quiet and attractive downtown area that reminded us of the downtown area of Qualicum Beach and other pastoral small towns. With the continuing developments taking place in our downtown we run the risk of losing that appeal and potential new residents to this area.

We strongly reject the amendment to the existing development permit.

Respectfully,

Mike and Wendy Wilson
6-1646 Balmoral Avenue
Comox BC
V9M2N1

Twyla Graff

From: Town of Comox – Administration
Sent: April 27, 2017 10:13 AM
To: Twyla Graff
Cc: Shelly Russwurm
Subject: FW: Traffic on Balmoral Avenue

RECEIVED

April 27, 2017

TOWN OF COMOX

o ~ planning
 copies ~ RK / MK / SR

From: Jim Archer [mailto:mijarcher@gmail.com]
Sent: April-27-17 10:06 AM
To: Glenn & Sharon Parker
Cc: Town of Comox – Administration
Subject: Re: Traffic on Balmoral Avenue

Thanks Sharon,

To the powers that be at Comox Town Hall,
 We also reside at 1646 Balmoral Ave.

I agree that the traffic speed on Balmoral Ave. is an issue and most vehicles are travelling faster than the posted 50 kph.

The fact that there are tennis courts, a busy playground for children and foot traffic (mostly older pedestrians, some with walkers) from nearby condominiums in the area, should warrant, in my opinion, a 30 kph speed limit.

There is a section of Noel Ave where the fire station and recreation centre is, where the posted speed is 30 kph and is monitored by a flashing speed indicator and most vehicles do slow down when they see this.

A speed indicator such as this should be installed on the corner of balmoral Ave and Anderton Park.

The speed should also be set at 30 kph.

This would also aid vehicles that are trying to turn left from Stewart St. onto Balmoral Ave. which is an awkward turn with vehicles whipping around that corner.

Jim and Barb Archer
 20 - 1646 Balmoral Ave.

On 26 April 2017 at 23:11, Glenn & Sharon Parker <sharglenn@yahoo.com> wrote:

I am concerned about the traffic on Balmoral Avenue and the possibility of it becoming even worse if the Town of Comox approves the construction of 45 units at 1700 Balmoral Avenue. Since I live in the neighbourhood, I ask that you consider my concerns.

The traffic on Balmoral Avenue, as we enter Balmoral Avenue from our strata, is difficult to navigate.

People often speed in this section and it is difficult to see the traffic coming, as there is a curve in the road.

At times seniors in scooters have almost hit me.

As seniors, we are often slow as we walk.

At times we need walkers or canes to help us.

Usually the traffic slows for us, but we have all had close calls.

At one time there was a flashing sign to indicate the speed of traffic as it rounded the curve on Balmoral.

That data should tell you that every once in a while, a vehicle speeds through.

It has only been luck that a serious vehicle-pedestrian accident has not yet occurred.

You have access to experts in traffic engineering and traffic calming measures.

I appreciate your consulting them and considering changes to the present situation.

More units on Balmoral will increase the traffic and make it more dangerous.

Please have another look at the area in question.
Please reconsider the number of units proposed for 1700 Balmoral.

Sharon Parker
#25
1646 Balmoral Avenue
Comox, BC

RECEIVED

April 27, 2017

Twyla Graff

From: Ted & Mary Kleim <everymountain@shaw.ca>
Sent: April 27, 2017 12:18 PM
To: djensen@mcelhanney.com
Cc: Paul Ives; Russ Arnott; K Grant; Marg Grant; bmackinnon@comox.ca; b price; m swift
Subject: 1700 Balmoral Avenue

TOWN OF COMOX
o ~ planning
copies ~ RK / MK / SR

Hello,

I am writing to express my concerns about the proposed development at 1700 Balmoral Avenue in Comox. Thank you for asking for input from nearby residents.

I live at 1646 Balmoral. The increase to 45 units proposed for the 1700 site will greatly impact the surrounding residents. It will add to the traffic, both vehicular and pedestrian, already using Balmoral and entering traffic from our driveway or crossing even in the crosswalk closer to the mall is already a crap shoot. Drivers do not obey the playground speed zone and come barreling around the curve near Stewart St. Adding more density will only increase traffic and pedestrian crossings.

I think the developer should be restricted to a 4 storey structure to fit in better with its surrounding properties. We urge them and the town of Comox to resist the lure of profits and stick to a reasonable amount of density in this area.

Best regards,
Mary Kleim
#23 – 1646 Balmoral Avenue
259-339-6743



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Twyla Graff

From: Town of Comox – Administration
Sent: April 27, 2017 8:42 AM
To: Twyla Graff
Cc: Shelly Russwurm
Subject: FW: 1700 Balmoral Consultation of Neighbourhood Residents

RECEIVED

April 26, 2017

TOWN OF COMOX

o ~ planning
 copies ~ RK / MK / SR

From: Glenn & Sharon Parker [mailto:sharglenn@yahoo.com]
Sent: April-26-17 10:54 PM
To: Town of Comox – Administration; djensen@mcelhanney.com
Cc: jalsbury@shaw.ca; Frank Lukay; Mike and Wendy Wilson
Subject: 1700 Balmoral Consultation of Neighbourhood Residents

Thank you for the opportunity to respond to your proposal to build 45 units on 5 stories at 1700 Balmoral Avenue in Comox. My husband and I live in #25, 1646 Balmoral Avenue, just two lots over from your proposed development.

We oppose adding a 5th story and increasing the number of units from 31 to 45. The increased density may mean greater profits for the developer, but it means a decrease in the lifestyle for the people who presently live in the neighbourhood.

More people means more traffic. Presently the traffic in this area of Balmoral is a nightmare. The town of Comox has been unable to calm the traffic. As we edge out of our driveway we are often confronted with speeding vehicles, unpredictable scooter traffic, children running to the playground or seniors with compromised mobility. Increasing the density on Balmoral can only increase our traffic problems.

Five stories doesn't fit into our neighbourhood. This proposal only fits into the pockets of the developers. We urge the Town of Comox to consider the views of the citizens who presently live in the area.

4/27/2017

1700 Balmoral.htm

From: Glenn & Sharon Parker [sharglenn@yahoo.com]
Sent: April-26-17 11:15 PM
To: Town of Comox – Administration; djensen@mcelhanney.com
Subject: 1700 Balmoral

Please note I need to add my name to my previous email re 1700 Balmoral.

Sharon and Glenn Parker live at
#25
1646 Balmoral Avenue
Comox

Although I included our address, I omitted our names.
Thank you for considering my concerns.

Twyla Graff

From: Town of Comox – Administration
Sent: April 27, 2017 8:42 AM
To: Twyla Graff
Cc: Shelly Russwurm
Subject: FW: Traffic on Balmoral Avenue

RECEIVED

April 26, 2017

TOWN OF COMOX

o ~ cfile
 copies ~ RK / MK / SR

From: Glenn & Sharon Parker [mailto:sharglenn@yahoo.com]
Sent: April-26-17 11:11 PM
To: Town of Comox – Administration
Subject: Traffic on Balmoral Avenue

I am concerned about the traffic on Balmoral Avenue and the possibility of it becoming even worse if the Town of Comox approves the construction of 45 units at 1700 Balmoral Avenue. Since I live in the neighbourhood, I ask that you consider my concerns.

The traffic on Balmoral Avenue, as we enter Balmoral Avenue from our strata, is difficult to navigate. People often speed in this section and it is difficult to see the traffic coming, as there is a curve in the road. At times seniors in scooters have almost hit me. As seniors, we are often slow as we walk. At times we need walkers or canes to help us. Usually the traffic slows for us, but we have all had close calls.

At one time there was a flashing sign to indicate the speed of traffic as it rounded the curve on Balmoral. That data should tell you that every once in a while, a vehicle speeds through. It has only been luck that a serious vehicle-pedestrian accident has not yet occurred. You have access to experts in traffic engineering and traffic calming measures. I appreciate your consulting them and considering changes to the present situation.

More units on Balmoral will increase the traffic and make it more dangerous. Please have another look at the area in question. Please reconsider the number of units proposed for 1700 Balmoral.

Sharon Parker
 #25
 1646 Balmoral Avenue
 Comox, BC

Twyla Graff

From: Town of Comox – Administration
Sent: April 27, 2017 8:43 AM
To: Twyla Graff
Cc: Shelly Russwurm
Subject: FW: 1700 Balmoral Avenue

RECEIVED

April 27, 2017

TOWN OF COMOX

o ~ planning
 copies ~ RK / MK / SR

From: Joe Pacowski [mailto:pacowski@telus.net]
Sent: April-27-17 6:31 AM
To: mcelhanney; Town of Comox – Administration
Cc: jalsbury@shaw.ca; Mike Wilson; Sharon Parker; lukay@shaw.ca
Subject: 1700 Balmoral Avenue

McElhanney Consulting Services Ltd.,

Thank you for the opportunity to express my concerns regarding subject development proposal and its impact on the neighbourhood. I am firmly opposed to the development proposal for a 5-story apartment with 45 units at 1700 Balmoral Avenue for both safety and conformity reasons.

Firstly, the road traffic along Balmoral Ave., (between the Comox Mall and Stewart Ave.,) is a real problem. The safety concerns are well documented and have been forwarded to the town of Comox on numerous occasions. In particular, the speed and volume of vehicle traffic (both commercial and private) on this stretch of road poses a danger to both pedestrians crossing the road as well as children playing in Anderton park as the road bisects a high density living area and a very active children's playground and tennis courts. The pedestrian traffic and children's safety crossing the road is further compromised by vehicles parked on both sides of the road which hampers the visibility of vehicle drivers. To date, the only thing the Town of Comox has done to address this issue was to temporarily install electronic speed indicators at the corner of Stewart and Balmoral. Initially, the speed indicators had a positive effect on responsible drivers, but once they were removed the average speed went back to 60 plus in a 30 zone. The question is not whether there will be a serious accident on this stretch of road but when. Increasing the original development at subject site by 45 % (45 units from 31) will not address this issue but only exacerbate its safety concerns.

Secondly, no building currently in the neighbourhood exceeds 4 storeys in height. Building a 5-storey Manhattan like structure would stick out like a sore thumb and destroy the conformity of this neighbourhood. In my opinion, there is no compelling reason to increase the height of the new proposal to 5 storeys from its original 4-story proposal and disrupt the residential sky line.

In summary, I am adamantly opposed to subject proposal for safety and conformity reasons. Indeed, the 45% increase from the original proposal doesn't address the clear and present safety issues identified along Balmoral Ave., but only increases them significantly. The conformity issue is also a real major concern to local residents. Accordingly, I strongly recommend that town council seriously consider the resounding opposition to this proposal before making its decision.

Joe Pacowski
 6-1646 Balmoral Avenue
 Comox, B. C.

Shelly Russwurm

From: Lo Lockhard
Sent: Thursday, April 28, 2016 12:00 PM
To: Shelly Russwurm; Marvin Kamenz; b price; H Mackinnon; K Grant; m swift; Marg Grant; Paul Ives; Russ Arnott
Subject: FW: 1700 Balmoral Avenue

o - planning
 copies - Council
 - RK

RECEIVED

April 28, 2016

From: Glenn & Sharon Parker [<mailto:sharglenn@yahoo.com>]
Sent: April-28-16 11:37 AM
To: djensen@mcelhanney.com
Cc: council <council@comox.ca>
Subject: 1700 Balmoral Avenue

TOWN OF COMOX

This response to your request for consultation comes from Sharon Parker. My husband and I live at #25, 1646 Balmoral Avenue in Comox.

Since we live just a few hundred meters from 1700 Balmoral we have a vested interest in what will happen to our neighborhood. We welcome the opportunity to share our concerns with you and the Town of Comox.

Communal Area for Owner-Occupants

Note is made that the new project will not include a gathering place for the owner-occupiers. Of course you may plan as you wish in this respect, however, it is beneficial when there is included an area where people may gather. This encourages the concept of neighborhood and mutual dependence. People need an area, other than the individual domestic units, to gather for meetings, for recreation such as cards or coffee or simply to chat. This helps to create a caring atmosphere among the residents many of whom will be seniors. Our strata has no area where we can gather comfortably and we certainly regret that at times. The developer or builder has a vested interest in how many units can be squeezed onto a property, and that would be reduced if provision is made for communal space. It is noted that in the original proposal provision was made for a communal space for the owner-occupiers to share. Regretfully, this space is designated as a living unit in the new plan.

Increased Density

The property at 1700 is about half the size of our strata at 1646. We have 34 units on twice the size of property. We also have a 4 story condo building. Certainly this increases the density. In fact, this development will have the highest density on Balmoral Avenue. While some people find this a desirable quality, this high density does not necessarily contribute to the quality of life of those who will live at 1700.

Traffic Concerns

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Thank you for this opportunity to express our concerns . We would like to welcome you to our neighborhood. Please acknowledge receipt of this email.

Glenn and Sharon Parker

Twyla Graff

From: Town of Comox – Administration
Sent: April 26, 2017 10:34 AM
To: Twyla Graff
Cc: Shelly Russwurm
Subject: FW: Pre-Application Consultation - 1700 Balmoral Avenue

RECEIVED

April 26, 2017

TOWN OF COMOX

o ~ Planning
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From: Bob Coltman [mailto:rdcolt@shaw.ca]
Sent: April-26-17 10:32 AM
To: djensen@mcelhanney.com
Cc: Town of Comox – Administration
Subject: Pre-Application Consultation - 1700 Balmoral Avenue

Regarding your new development proposal for this property:

1. I am in agreement that the existing buildings, that are in very poor condition, should be demolished.
2. I am not in agreement that the proposed new structure should be 5-stories.

It is my understanding that at present there are only two buildings in the Town of Comox that could possibly be considered 5 stories

The new Berwick wing will have 4-stories with a roof garden on top. A garden structure will be much less visually obstructive than the 5th floor of a condominium.

The Bank of Nova Scotia building on Comox Avenue, with The Grind down on Beaufort Avenue, may be technically 5 stories

but since it is built on such a steep hill it only has the appearance of being a 2-story building.

Your 5-story proposal would set a precedent in Comox and would undoubtedly become the standard for any new condominiums in the Town.

I don't believe the majority of citizens in Comox would like to see high-rises begin to dominate their skyline.

Bob Coltman

#5-1646 Balmoral Avenue, Comox.

rdcolt@shaw.ca

250-941-3300

103 1686 Balmoral Avenue
Comox BC V9M 2N1
April 22, 2016

Mr. Derek Jensen, A.Sc.T
Consultation Contact
McElhanney Consulting Services
495 Sixth St.
Courtenay BC V9N 6V4

Re: Rezoning etc., 1700 Balmoral Avenue

Dear Mr. Jensen;

Thank you for the opportunity to comment on this rezoning and changes and the impact they might have on the residents of Fairway Place.

We sought first reactions to your letter at our regular coffee session on Wednesday, April 13, and appointed a committee to gather more information. This was presented to a special condo meeting on Friday, April 22. Our comments are as follows.

We are impressed with the site plan and the picture of the finished buildings. We particularly like the sloping roofs and set back of the fourth floor; these details soften the effect of the four stories.

Our major concern with the proposed development:

We regret the elimination of the common area as approved in the original Development permit. We believe that in the pursuit of increased town density you are removing the opportunity to create a building with a special spirit of togetherness that is so missing in today's society.

In Fairway Place we have a common area which is in use on an almost daily basis. A core group pursues an ongoing hobby and is there six days a week. Other residents drop in daily to check on progress and stay to chat and share stories. Attendance at the morning coffee sessions every second Wednesday is high and growing. Plans for going out for lunch or supper are hatched and carried out. Because trust builds and friendships form, our condo enjoys an amicable family atmosphere. Residents care, support and help each other.

If your proposal is adopted your residents will not enjoy similar opportunities.

Group reaction to the proposed elimination of the common area prompted the following resolutions:

Resolution 1. That the proposed rezoning and other amendments be rejected and that the developers be instructed to build according to the original proposal.

Resolution 2. That if, in fact, the existing single-family dwelling is in too poor condition to fulfill the terms of the original proposal, that the developers be instructed to plan a common area into the major building and that no other building be considered for the site.

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APR 22 2016

TOWN OF COMOX

Resolution 3. That if, in fact, the existing single-family dwelling is in too poor condition to fulfill the terms of the original proposal, that the developers plan a one story replica of the original single-family dwelling and construct it at the location as originally planned. This building would serve as a common area and clubhouse for the residents.

Concern was also expressed about **traffic-flow and congestion** on the street in front of the property and in the entry way for the following: Fire trucks, Ambulance, Handy Dart, Moving vans and trades or maintenance vehicles.

We ask that you give consideration to including:

- a **sprinkler system** for the building
- **pre-wiring for charging units** in the underground parking area

Regarding the impact the development would have on Fairway Place:

The effect of a four story building will be to cut off sunlight and darken the suites on the north-north-west side of our building. We will no longer be able to enjoy the sunsets as seen through the high trees on the golf course. We will similarly cut off sunlight and darken the lower suites in your building. Privacy in both buildings will suffer.

We have a major concern for the health of the mature cedar trees inside our fence on the northwest side of our property. These beautiful trees screen us and bring the forest closer to our windows. We are sure they will be similarly appreciated by the new owners in your condo who face the southeast. Our concern is that when your property is excavated for the underground parking, the combination of the excavation, the disturbance of the adjacent soil and the flow through the peripheral drainage piping will significantly lower the existing water table to the detriment of our beautiful cedars. We request that your contractors disturb the side bank as little as possible.

To lessen the impact consider the following resolution:

Resolution 4. That the major building be moved towards the golf course property line to the greatest extent allowed within the building regulations.

If this were done it would address both concerns. More light and sunlight would be available for both of our buildings. Greater separation would enhance privacy and would give greater protection to the roots of our cedars.

All four resolutions received unanimous approval at the meeting.

We would be happy to answer questions or clarify anything that is not clear in this submission.

Yours truly,

For the Condo Committee and the residents of Fairway Place,

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APR 26 2016

TOWN OF COMOX



Sherry Anderson, Chairperson (218 2825)



Leo Auterson, Vice Chairperson (941 1371)

copies: Gail Andestad
Cindi Reichelt

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APR 21 2015

TOWN OF COMOX

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

ATTACHMENT 8

PROCESSING PROCEDURES

The following process would allow Comox Zoning Bylaw Amendment Bylaw 1877, Comox Phased Development Agreement Authorization Bylaw 1878: 1700 Balmoral Avenue; Development Permit DP 17-7 and discharge of the Restrictive Covenants to be considered concurrently.

- 1) First and Second Reading of proposed Bylaws 1877 and 1878;
- 2) Public notification of a Public Hearing for proposed Bylaws 1877 and 1878 and discharge of Restrictive Covenants FB122070 and FB12076;
- 3) Public Hearing for proposed Bylaws 1877 and 1878, and discharge of Restrictive Covenants FB122070 and FB12076;
- 4) Third Reading of proposed Bylaws 1877 and 1878;
- 5) Completion of Schedule 1 Outstanding items to be resolved prior to Adoption of proposed Bylaws; and
- 6) Adoption of proposed Bylaws 1877 and 1878; issuance of the Development Permit and discharge of Restrictive Covenants FB122070 and FB12076.

RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

ATTACHMENT 9

REFERRAL RESPONSES

The Town referral advised the agencies that if no reply was received by December 21, 2017, the Town would assume that the agency has no concerns.

Referred to Agency:	Response
BC Assessment Authority	Confirmation of receipt
BC Transit	Attached Addressed under Other Implications in the report
Comox Valley Accessibility Committee	Attached Addressed under Other Implications in the report
BC Hydro	Attached
Emterra Environmental	Attached Addressed under Development Permit Implications in the report
Canada Post	No response
Shaw Cable	No response
Fortis BC	No concerns
Telus	No response
School District 71	No response
School District 93 Francophone	No response

**RZ 17-9, DP 17-7
1700 BALMORAL AVENUE**

MAY 16, 2018

Development Referral Response

December 14, 2017

Development Permit 17-7

Development Location:

Lot A, Section 56, Comox District Plan VIP81758 (1700 Balmoral Ave)

Local Government: Town of Comox

Transit System: Comox Valley Transit System

Overall Transit Impact

The subject property is:

- Located 350-400m from the nearest bus stops served by the existing routes 3 and 4 (Figure 1), and is located directly on the Frequent Transit Network and new Comox Local route planned for implementation in September 2018 (Figure 2).

Land Use

The subject property's OCP designation is Residential: Low Rise Apartments, Townhouses & Ground Oriented Infill; it is located within Development Permit Area #3 General Multi Family. The subject property is currently zoned CD7 Comprehensive Development 7: 1700 Balmoral Avenue. Under the current zone, the building height is limited to 18.0 metres and 4 storeys. The proposed development is 45 residential units in a 5-storey building with underground parking; proposed height is approximately 17.5 metres.

Bus Stops and Stations

- There may be the opportunity to leverage amenity contribution funding to install a bus stop and bus stop amenities across the road from the proposed development (Figure 3). This new bus stop would serve the Frequent Transit Network and new Comox Local route, which is planned for implementation in September 2018.

BC Transit Level of Support

- BC Transit supports this development application as it is consistent with transit-supportive land use, transportation policies, and current transit plans.

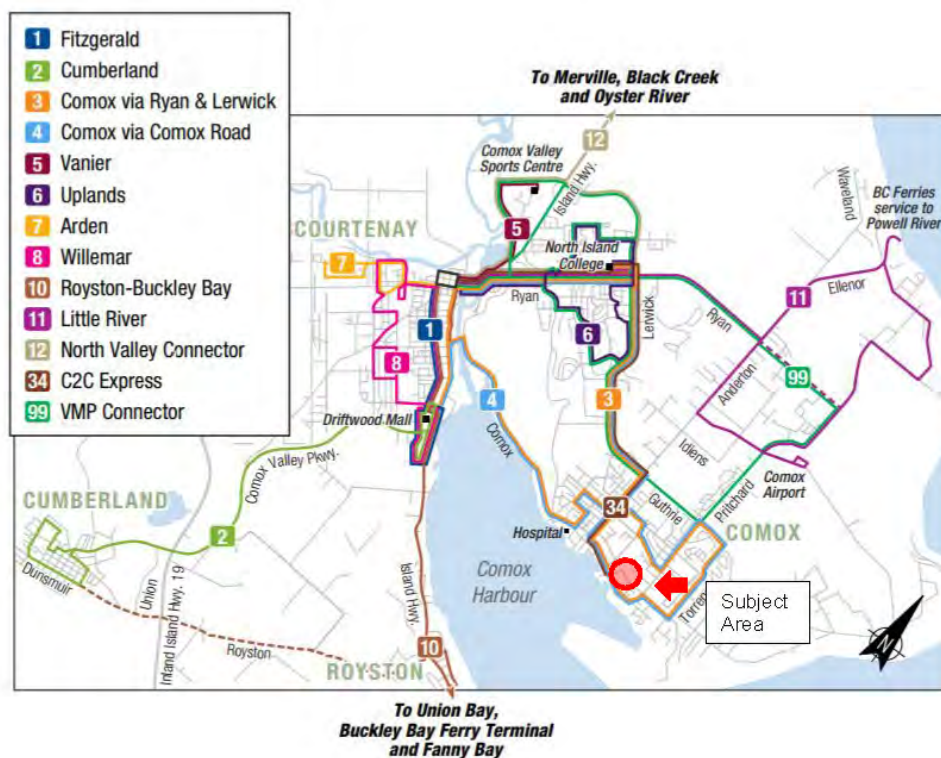
Thank you for the opportunity to review this proposed development. If you have any questions or would like further comments on this proposal, please contact:

Levi Megenbir, Senior Transit Planner
BC Transit | 520 Gorge Road East, Victoria, BC, V8W 9T5
250-995-5688 | levi_megenbir@bctransit.com

MAY 16, 2018

Figure 1: Comox Valley Transit Network

The subject properties are located near the existing routes 3 and 4.



MAY 16, 2018

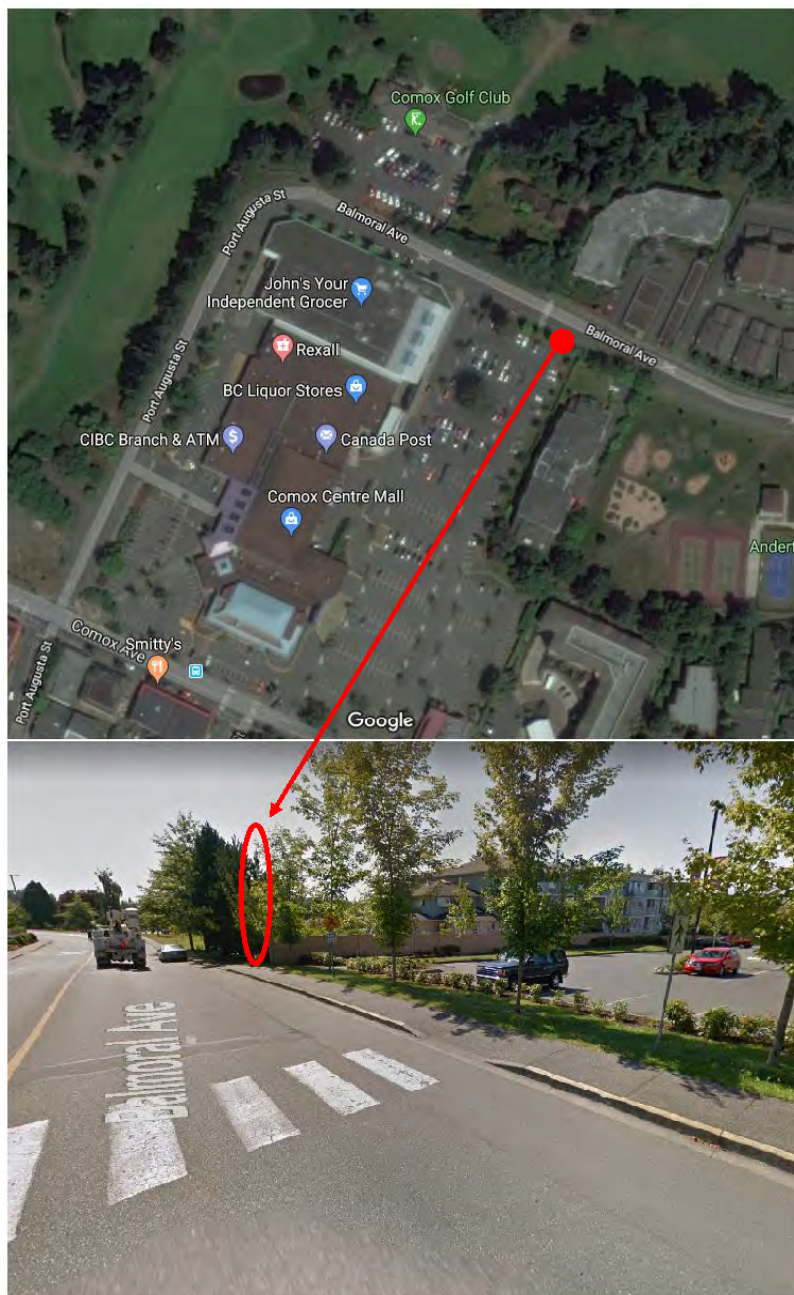
Figure 2: Proposed FTN and Local Comox Routings - September 2018 Implementation

- 1 Courtenay/Comox
- 3 Comox Local
- 4 Driftwood



MAY 16, 2018

Figure 3: Proposed bus stop location



RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

From: Megenbir, Levi <Levi_Megenbir@BCTransit.Com>
Sent: December-14-17 4:54 PM
To: Regina Bozerocka <rbozerocka@comox.ca>
Cc: Moore, Myrna <Myrna_Moore@BCTransit.Com>
Subject: RE: Comox Development Referral - RZ 17-9 DP 17-7 at 1700 Balmoral Avenue

Hi Regina, thanks for your quick reply.

We would only need a bus stop on the southern side, as that is the direction that buses would be circulating with the existing service proposal. If you are considering curb extensions for the crosswalk, you would want to ensure that they do not interfere with a bus pulling into the bus stop. Although the design and installation of bus stops is the responsibility of the local government partner, we have compiled bus stop standards within the BC Transit Infrastructure Design Guidelines to help our local partners with bus stop design questions:

<https://bctransit.com/servlet/documents/1403640670226>

The cost of installing a bus stop at that location would depend on the kind of amenities provided at the bus stop (E.g. shelter, bench etc.). Myrna (cc'd to this e-mail) should be able to help you with estimating the cost of purchasing a bus shelter if desired. Myrna should be back in the office in the early New Year.

Thanks again Regina!

Levi Megenbir BA, MPLAN
Senior Transit Planner
BC Transit
250-995-5688

From: rbozerocka@comox.ca [<mailto:rbozerocka@comox.ca>]
Sent: Thursday, December 14, 2017 4:19 PM
To: Megenbir, Levi <Levi_Megenbir@BCTransit.Com>
Subject: RE: Comox Development Referral - RZ 17-9 DP 17-7 at 1700 Balmoral Avenue

Hi Levi,
Thank you for your response.

About the potential for bus stop on Balmoral – do you envision it only on the southern side of the street for this section of the street? Could you give a cost estimate of the required upgrades? Do you think it would also make sense to upgrade the pedestrian crossing at the same time, for example provide curb extensions? Or maybe the opposite, there should be no curb extensions...

This could give us an idea of what can be negotiated and with how many developers.

RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

Sincerely,
Regina

Regina Bozerocka
Planner I
Town of Comox
1809 Beaufort Avenue Comox BC, V9M 1R9
250 339 1118

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From: Megenbir, Levi [mailto:Levi_Megenbir@BCTransit.Com]
Sent: December-14-17 3:53 PM
To: Regina Bozerocka <rbozerocka@comox.ca>
Cc: McMullen, Adriana <Adriana_McMullen@BCTransit.Com>
Subject: RE: Comox Development Referral - RZ 17-9 DP 17-7 at 1700 Balmoral Avenue

Hi Regina, I've attached BC Transit's development referral response to this e-mail. You'll note that I have identified the potential to leverage amenity contribution funding to develop a new bus stop near the proposed development. This new bus stop would accommodate some routing changes in the process of being finalized for implementation in September 2018. Feel free to let me know if you have any questions or would like further comments on this proposal.

Thanks Regina!

Levi Megenbir BA, MPLAN

Senior Transit Planner

BC Transit

520 Gorge Road East, PO Box 9861 Victoria, BC V8W 9T5
250-995-5688 | c: 250-508-0842 | levi_megenbir@bctransit.com | bctransit.com

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RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

December 15, 2017

RE: TOWN OF COMOX REFERRAL - 1700 BALMORAL AVENUE

AMENDMENT & REZONING RZ 17-9
DEVELOPMENT PERMIT DP 17-7

I have been asked to respond to this referral on behalf of the Comox Valley Accessibility Committee.

To review a few facts:

- British Columbia has one of the highest proportions of people with disabilities in Canada and the Comox Valley is one of the oldest communities in BC.
- **18.4 % of all adults** in British Columbia have a disability.*
- That means that **almost 1 in 5 adults** has activities of daily living limited because of a health related condition or problem.
- **12.2% of all adults or almost 1 in 8 adults has difficulty with mobility**, that is, climbing a flight of stairs or walking from room to room.*
- In 2001 the Comox Valley rate of disability was 16.8% for adults 15 years and older. In 2011 this rate had jumped to 22.2%.**

** StatsCanada Participation & Activity Limitations Survey (PALS) 2006*

*** StatsCanada PALS 2006 rates of disability by age applied to the Comox Valley by age 2011 Census*

We urge the Town of Comox to require the developer to have at the very least **10% of units to be visitable**, that is to say, entry level, with at least one accessible bathroom, accessible light switches etc.

A fully **universal design** throughout is preferable, which would allow for aging in place and access for everyone.

If full universal design is not opted for, we would like to also remind the Town of Comox to please review the following items with the developer:

1. **Medical scooters:** are not considered in the building code yet more and more individuals use medical scooters. Please ensure all areas also include access for scooters.
2. **Emergency exits:** please ensure that **ALL** exits including emergency exits to and from the development are wheelchair and scooter accessible, with surfaces that comply with the ADA (Americans With Disability Act).
3. **Visual and Audible Fire Alarms and Messaging systems:** please ensure clear signage for the vision impaired and also include visual messaging systems where possible for those who are hearing impaired.
4. **Outdoor and indoor public and garden spaces:** also to be reviewed for accessibility, see surfaces in item 3 above.

page 1/2

RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

5. **Parking:**

a. to include extra-large handicapped parking for side entry wheelchair vehicles as well as rear entry accessible vehicles.

b. Access for a HandiDart bus, and a public transit bus stop.

6. **Affordability:** please ensure a range of sizes in units to include as much as possible a variety of affordability, to meet the needs of different incomes, single individuals as well as couples, etc. As we know from the 2016 census, for the first time in the country's history, the number of one-person households has surpassed all other types of living situations.

To summarize:

Accessibility features are only a small part of the overall cost of a building and enhance the longevity, value and resale value of a facility.

Above all, accessibility is a human right in Canada. It is much more cost effective to build in accessibility features before the fact rather than after the fact.

Let us build for the future, let us work to meet the needs of all our citizens.

Heather Crites

for

Comox Valley Accessibility Committee

December 15, 2017

RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

From: "Brian Muir" <brian.muir@shaw.ca>
Subject: FW: 1700 Balmoral
Date: March 15, 2018 at 8:59:48 AM PDT
To: "Don Cameron" <donrcameron@shaw.ca>
Reply-To: <brian@muireng.ca>

Don, I think all you need to do here is print out the message below and give it to the town, or forward to Regina by email.

From: Mitchell, Timothy [<mailto:Timothy.Mitchell@bchydro.com>]
Sent: March 15, 2018 8:11 AM
To: brian@muireng.ca
Cc: Gansner, Mike <Michael.Gansner@bchydro.com>; Don Cameron <donrcameron@shaw.ca>
Subject: RE: 1700 Balmoral

Hi Brian

We should be able to provide service to the project with no new overhead infrastructure unless there are unforeseen circumstances that prevent us from doing so.

We may have to change out an existing pole on the road to bring it up to standard but that would only be replacing existing infrastructure.

Thanks

Timothy Mitchell

Design Technician, DS & D

BC Hydro

330 Lerwick Rd
Courtenay, B.C. V9N 9E5

Office: 250.897.7441
Mobile: 250.218.3244
Fax: 250.897.7411
Email: timothy.mitchell@bchydro.com

bchydro.com

RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

From: Neil Banich [mailto:nbanich@wensleyarch.com]
Sent: May 9, 2018 11:18 AM
To: Dave Ross <dave.ross@emterra.ca>; Richard Gunderson <rgunderson@wensleyarch.com>; Regina Bozerocka <rbozerocka@comox.ca>
Cc: Don <donrcameron@shaw.ca>; Jay Adams <jay.adams@emterra.ca>
Subject: RE: Garbage room pickup

Hi Regina

Here is an updated sketch and pickup protocol, as endorsed by Dave Ross's comment below

Cheers N

NEIL BANICH
Principal

301 - 1444 Alberni Street, Vancouver, BC V6G 2Z4
T: 604-685-3529 Ext.102 C: 604-512-0549
E: nbanich@wensleyarch.com
wensleyarch.com



Please note that any attached CAD drawings are the intellectual property of Wensley Architecture Ltd. Any use, in part or in its entirety, outside the limits of the intended scope is strictly prohibited. Wensley Architecture Ltd. cannot be held responsible for third party CAD drawings. Confirmation of the "as-built" condition is the responsibility of the user.

From: Dave Ross [mailto:dave.ross@emterra.ca]
Sent: Tuesday, May 08, 2018 3:53 PM
To: Neil Banich <nbanich@wensleyarch.com>
Cc: Don <donrcameron@shaw.ca>; Jay Adams <jay.adams@emterra.ca>
Subject: RE: Garbage room pickup

Hello Neil,

This is a workable solution to getting the bins out to the street for collection. I have no objections to this plan and I am willing to continue to work with you to find alternate solutions that work as well.

Thank you.

Dave Ross
North Island Operations Manager

"Make it a Safe Day"

<http://www.emterra.ca>

Halton Recycling Ltd. dba Emterra Group and Emterra Environmental
(Formerly dba International Paper Industries)
PO Box 160, 2982 Ulverston Av
Cumberland, BC
V0R 1S0

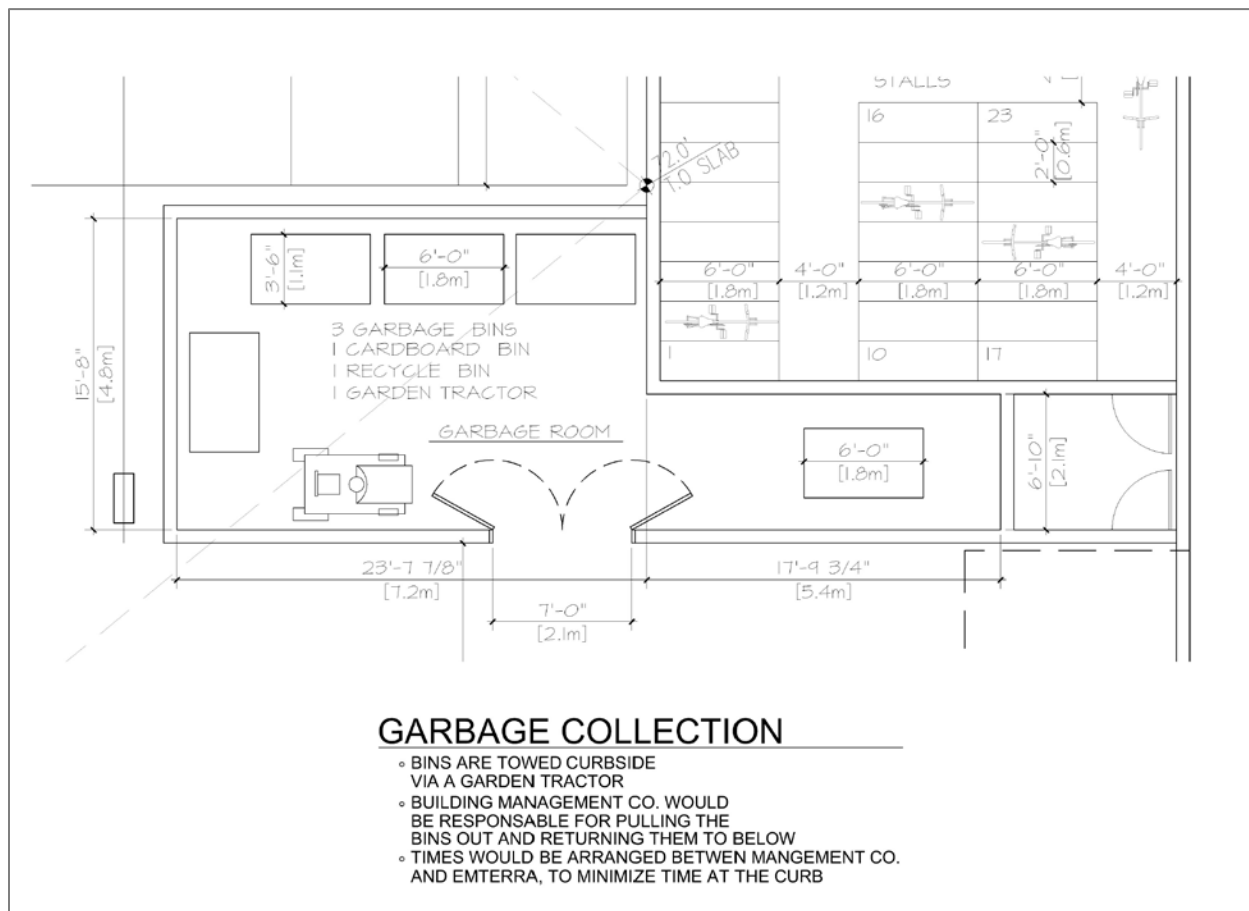
RZ 17-9, DP 17-7
1700 BALMORAL AVENUE

MAY 16, 2018

P: 250-336-8066
F: 250-336-8077
C: 250-331-1617
E: dave.ross@emterra.ca



Please consider the environment before printing this email



SCOTT PARK
 Highland Senior Secondary
 Grad Cruise Coordinator
 1920 RYAN ROAD EAST
 COMOX, B.C.
 V9M 4C9
 TEL: (250) 339 - 9525
 E-mail: shadetrecuph@shaw.ca

RECEIVED

MAY 03 2018

TOWN OF COMOX

May 2, 2018

Town of Comox
 1809 Beaufort Avenue
 Comox, BC
 V9M 1R9

DO	18 098	REFER	AGENDA
FILE	8100-01	ACTION	Renl May 16 '18

c-c file
 copies to Mayors Council
 to TWP/SP/AF

To whom it may concern,

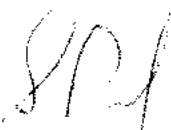
RE: Highland Grad Cruise - 2018

The Eighth Annual Highland Grad Cruise will be taking place on Saturday June 2, 2018.

This year, as in past years, there will be around 40 vintage and classic cars chauffeuring the Grads. The cars will depart Highland Secondary School's parking lot (750 Prichard Ave) around 4:00. The cars will proceed along a pre-planned route (see attached map) and arrive at the Filberg Heritage Lodge (weather permitting) or back to Highland Secondary School around 5:00 PM. In past years we have received support and permission from the Town of Comox to proceed with our Cruise and are requesting same this year.

I appreciate your attention to this matter,

Yours truly,



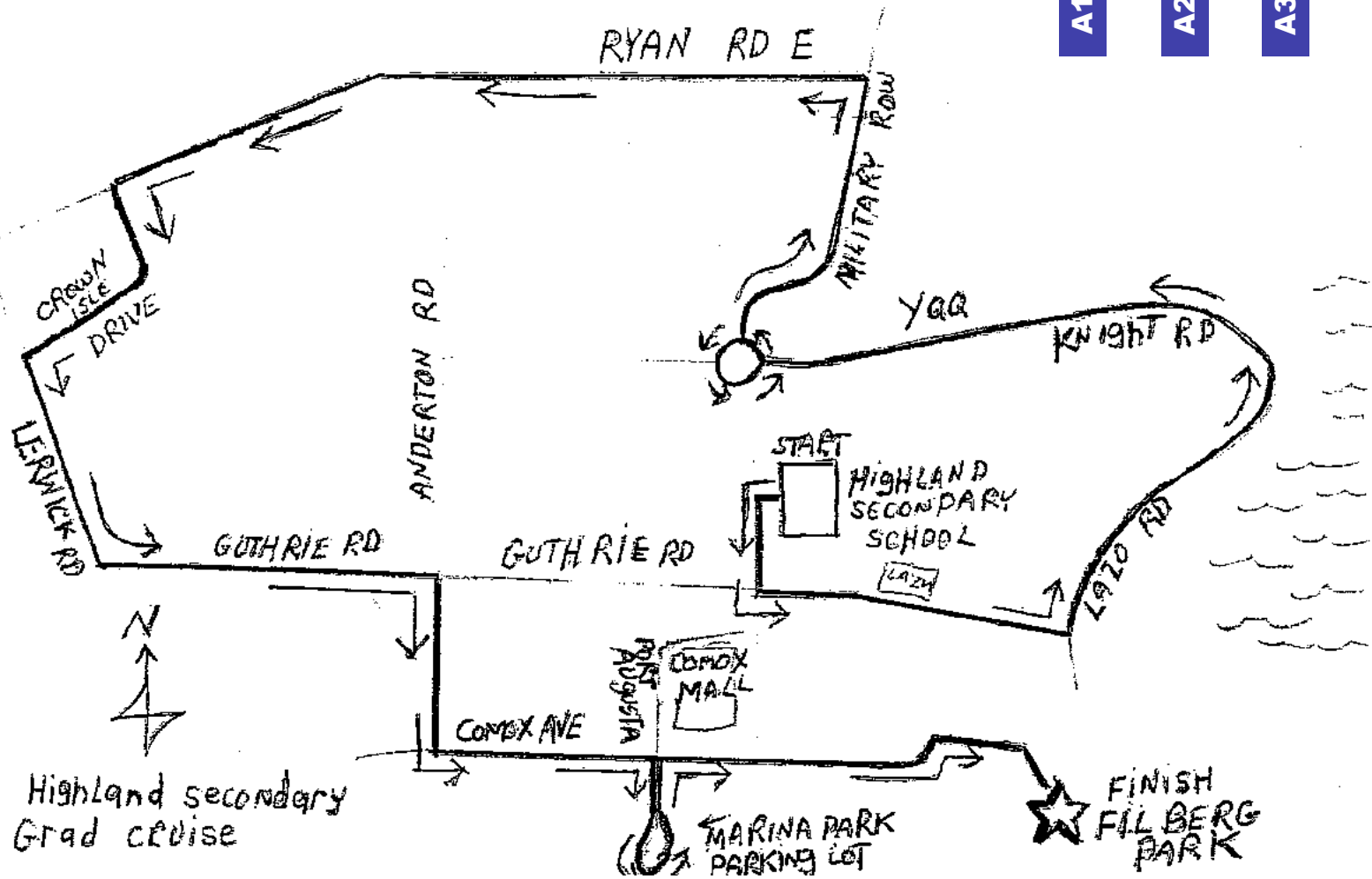
Scott Park

Attached: Map of Route

A1

A2

A3



Highland secondary
Grad cruise



A1

A2

A3

May 3, 2018

Town of Comox
1809 Beaufort Ave
Comox, BC V9M 1R9

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May 3, 2018

TOWN OF COMOX

LOG: 18-100	REFER:	AGENDA: RCM - May 16
FILE: 8100-01	ACTION: MR	

o ~ cfile

copies ~ Mayor & Council

RK / SR / SA / AF / GS

Dear Mayor Ives and Council:

On behalf of the Friends of Boomer's Legacy BC, I am writing to advise that the BC Bike Ride from 19 Wing Comox to Victoria has evolved to a Comox Valley family-friendly event: Camp Boomer!

On Saturday, June 16, Friends of Boomer's Legacy BC will be holding Camp Boomer at the Glacier Gardens Arena at 19 Wing Comox. The single day event will raise funds and awareness for Boomer's Legacy, now a program of **Support Our Troops** – Canadian Forces Morale and Welfare Services.

A key element of Camp Boomer is a bike relay that would pass through the Town of Comox, as detailed in the enclosed route map. Centered upon a military theme, participants will walk, run or cycle a designated route for six hours. Cyclists will follow a separate route from pedestrians, as detailed in the enclosed map.

The event will take place between 10:00 a.m. and 4:00 p.m. The number of road cyclists is currently unknown; liability insurance for Camp Boomer is forthcoming.

The committee is the same - the fund raising goals are the same - but the outreach is different. The new format aims to welcome all residents of the Comox Valley to celebrate the efforts of Canadian Armed Forces (CAF) personnel, interact with veteran's groups, cadets and military personnel, and raise charitable funds that CAF personnel can access to help people in communities where they serve.

The success of an endeavour of this magnitude relies upon the generosity and giving spirit of organizations and personnel alike. Cooperation and coordination with individual municipalities and their councils, in particular, is absolutely critical to our success. The coordination between the committee and the Town of Comox allows upwards of 100 cyclists to raise funds for Boomer's Legacy.

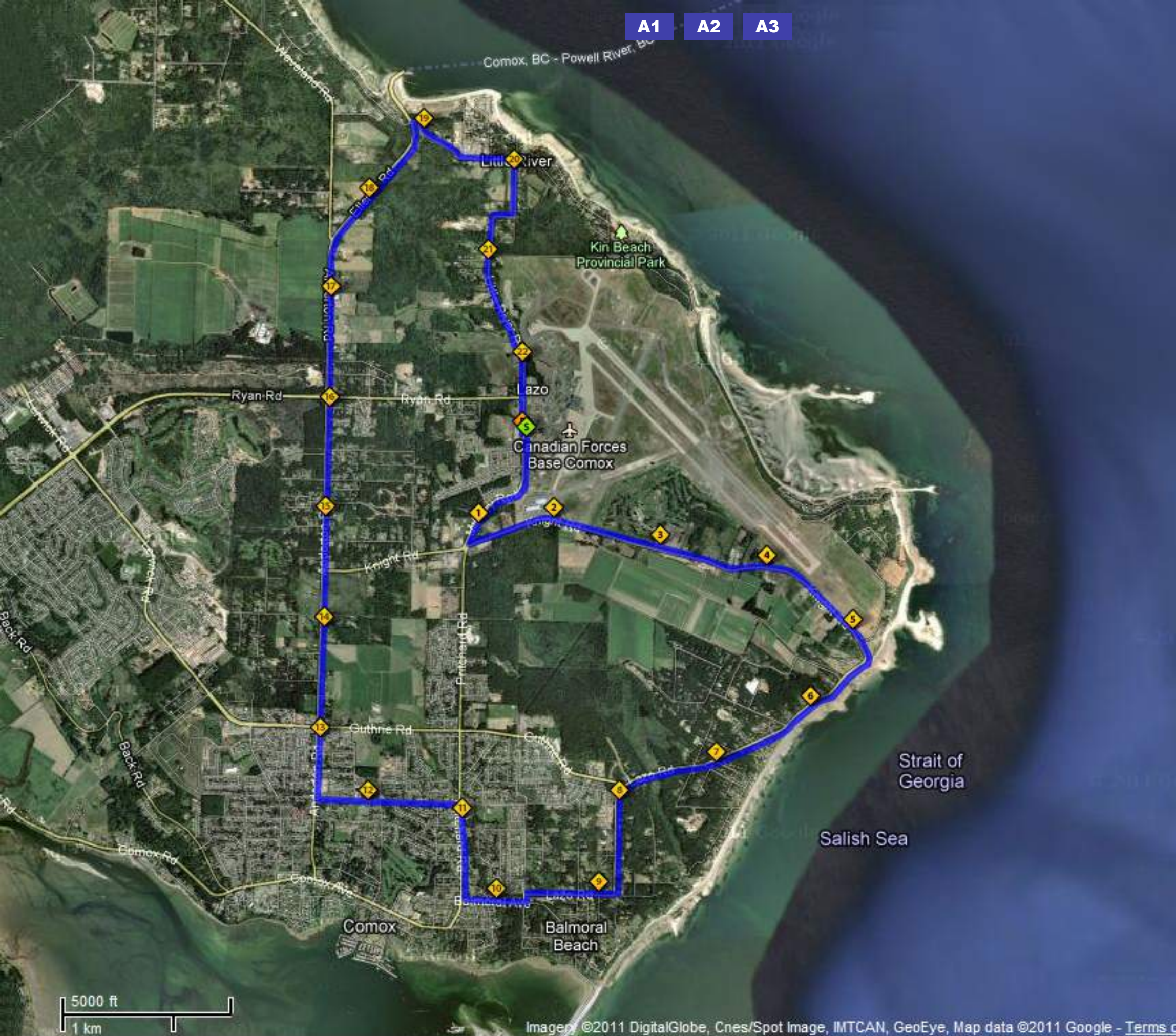
I would be happy to address any questions regarding our fundraising efforts, and I thank you for taking time to learn about our event. Please consider joining us on Saturday, June 16!

Yours truly,

Bobbi Howard-Muir

Chair, Friends of Boomer's Legacy BC committee (Vancouver Island)

Enclosed: cycling route map



DISTANCE	SPEED	PACE	TIME	CALORIES
22.63 km	4.8 km/h	12:25 mins/km	4:41:17	2024.7

Twyla Slonski

From: Alfred Albrecht <agalbrecht@gmail.com>
Sent: May 7, 2018 8:04 AM
To: council
Subject: Development Variance DVP 17-5

RECEIVED

May 7, 2018

TOWN OF COMOX

LOG: 18-103	REFER:	AGENDA:
FILE: DVP 17-5	ACTION: File	RCM - May 16

NAMES; Al & Lucille Albrecht

ADDRESS: 14-1220 Guthrie Rd., Comox

TO WHOM IT MAY CONCERN;

We agree with the development of above property.

Will Lazo Road be widened to accommodate all the extra traffic? Lazo Road is in desperate need of widening . This is a good time to rectify that. We all know that Lazo Rd. is the preferred road for Cyclists and foot traffic. Visitors who drive to the beach for the beautiful walkway and to simply enjoy the sea view.

PLEASE IT IS TIME TO RE-DO LAZO ROAD!!!!

o ~ planning

copy ~ Mayor & Council

RK / SR / MK / agenda

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Twyla Slonski

From: rbskihog <rbskihog@telus.net>
Sent: May 4, 2018 2:34 PM
To: council
Subject: DVP 18-2

RECEIVED

May 4, 2018

TOWN OF COMOX

To Mayor and Council, we live at 1560 Skeena Drive Comox, BC. V9M 3J7 on the corner beside the house requesting the variance. Both my wife and myself have no objection to the variance being granted to our good neighbours. Ross and Norma Brown

LOG: 18-102	REFER:	AGENDA: RCM - May 16
FILE: DVP 18-2	ACTION: Planning	

o ~ planning

copies ~ Mayor & Council

RK / SR / MK