



**NORTH COAST REGIONAL DISTRICT  
REGULAR BOARD MEETING **AMENDED AGENDA**  
Held at 344 2<sup>nd</sup> Avenue West in Prince Rupert, B.C.  
Friday, March 22, 2019 at 7:00 p.m.**

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**1. CALL TO ORDER**

**2. CONSIDERATION OF AGENDA (additions/deletions)**

**3. BOARD MINUTES & BUSINESS ARISING FROM MINUTES**

3.1	Minutes of the Regular meeting of the North Coast Regional District Board held February 22, 2019	Pg 1-8
3.2	Minutes of the Regular (Round 2 Budget) meeting of the North Coast Regional District Board held February 23, 2019	Pg 9-14
3.3	Minutes of the Parcel Tax Roll Review Panel meeting held February 22, 2019	Pg 15-16

**4. STANDING COMMITTEE/COMMISSION MINUTES – BUSINESS ARISING**

4.1	Minutes of the Regular meeting of the Moresby Island Management Standing Committee held February 5, 2019	Pg 17-18
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**5. DELEGATION**

None.	---
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**6. FINANCE**

6.1	S. Landrath, Treasurer – Cheques Payable over \$5,000 for February, 2019	Pg 19
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**7. CORRESPONDENCE**

7.1	TransCanada Yellowhead Highway Association – February 2019 Member Update	Pg 20-21
7.2	Forest Enhancement Society of British Columbia – Forest Enhancement Society of B.C. Jan 2019 Accomplishments Report	Pg 22
7.3	Firewise Consulting – New Fire Safety Act	Pg 23-26
7.4	Bulkley Valley Research Centre – Northern Conference for Wildfire Resilience	Pg 27
7.5	<b>United Fishermen &amp; Allied Workers' Union</b> – Factory Ships Processing at Sea	Pg 28-29

<u>Add:</u> <u>7.6</u>	Village of Queen Charlotte – Request for Letter of Support: Imagine Grant for Basketball Floor Mops	Pg 29a
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## 8. REPORTS / RESOLUTIONS

8.1	D. Fish, Corporate Officer – 2019 Draft Resolution Submission to the NCLGA – Access to Level 3 Trauma Centres	Pg 30-32
8.2	D. Fish, Corporate Officer – April 2019 Strategic Planning Travel	Pg 33-35
8.3	D. Fish, Corporate Officer – Results of the Alternative Approval Process for the Regional Recycling Facility Capital Upgrades Loan Authorization Bylaw No. 626, 2018	Pg 36-37
8.4	D. Fish, Corporate Officer – Haida Gwaii Tsunami Pole Project Update	Pg 38-94
8.5	S. Landrath, Treasurer – 2018 Actual Expenditures versus 2019 Budget Figures	Pg 95-131
<u>Add:</u> <u>8.6</u>	D. Fish, Corporate Officer – Islands Solid Waste Landfill Gas Flare Project – CleanBC Communities Fund Application	Pg 131a-p

## 9. BYLAWS

9.1	Bylaw No. 626, 2018 – Being a bylaw to authorize the borrowing of half a million dollars (\$500,000) for the purpose of borrowing funds to complete capital upgrades to the Regional Recycling Facility <b><i>Prior to adoption.</i></b>	Pg 132-133
9.2	Bylaw No. 631, 2019 – Being a Bylaw to Adopt the Five Year Financial Plan for the Years 2019-2023 <b><i>Prior to being given first, second, third readings and adoption.</i></b>	Pg 134-164

## 10. LAND REFERRALS / PLANNING *(Voting restricted to Electoral Area Directors)*

10.1	M. Williams, Planning Consultant – Land Referral: Haida Tourism	Pg 165-195
10.2	M. Williams, Planning Consultant – Land Referral: Citywest	Pg 196-217

**11. NEW BUSINESS**

11.1	<b>Director's Reports</b>	Verbal
11.2	Director Putterill, Electoral Area E – Civic Addressing in Sandspit	Pg 218-219
11.3	Director Putterill, Electoral Area E – Sandspit Clinic	Verbal
<u>Add:</u> 11.4	Director Young, Electoral Area D – Area D (Tlell) Evacuation Route	Pg 220-221
<u>Add:</u> 11.5	Director Young, Electoral Area D – Habitat Acquisition Grant	Pg 222-228
<u>Add:</u> 11.6	<b>Edge of the World Music Festival Society's Application to Northern Development Initiative Trust's Fabulous Festivals and Events Program – 2019 Edge of the World Music Festival</b>	Pg 229-237

**12. OLD BUSINESS**

12.1	D. Fish, Corporate Officer – April 10, 2019 Special Meeting Scheduling	Verbal
<u>Add:</u> 12.2	D. Fish, Corporate Officer – Charge North – CleanBC Communities Fund Application	Pg 238-280

**13. PUBLIC INPUT****14. IN-CAMERA**

That the public be excluded from the meeting according to section 90(1)(c) of the <i>Community Charter</i> "labour relations or other employee relations."	---
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**15. ADJOURNMENT**



## NORTH COAST REGIONAL DISTRICT

**MINUTES** of the Regular Meeting of the Board of Directors of the North Coast Regional District (NCRD) held at 344 2<sup>nd</sup> Avenue West in Prince Rupert, B.C. on Friday, February 22, 2019 at 7:00 p.m.

### PRESENT

### PRIOR TO ADOPTION

Chair	B. Pages, Village of Masset
Directors	B. Cunningham, City of Prince Rupert L. Brain, City of Prince Rupert K. Bjorndal, Alternate, District of Port Edward K. Olsen, Village of Queen Charlotte D. Daugert, Village of Port Clements D. Nobels, Electoral Area A K. Bergman, Electoral Area C J. Young, Electoral Area D E. Putterill, Electoral Area E
Regrets	D. Franzen, District of Port Edward
Staff	D. Chapman, Chief Administrative Officer D. Fish, Corporate Officer S. Landrath, Treasurer
Public	0
Media	0

### 1. CALL TO ORDER 7:00 p.m.

### 2. AGENDA

MOVED by Director Cunningham, SECONDED by Director Olsen, that the February 22, 2019 North Coast Regional District Regular agenda be amended and adopted as follows:

Delete: Item 5.1 – Port Edward Historical Society – North Pacific Cannery Update  
 Add: Item 12.1 – Tsunami Evacuation Routes

**079-2019**

**CARRIED**

### 3. MINUTES & BUSINESS ARISING FROM MINUTES

3.1 Minutes of the Regular Meeting of the North Coast Regional District Board held January 25, 2019

MOVED by Director Nobels, SECONDED by Director Brain, that the minutes of Regular meeting of the North Coast Regional District Board held January 25, 2019 be adopted as presented.

**080-2019**

**CARRIED**

- 3.2 Minutes of the Regular (Round 1 Budget) Meeting of the North Coast Regional District Board held January 26, 2019

MOVED by Director Cunningham, SECONDED by Director Brain, that the minutes of Regular meeting of the North Coast Regional District Board held January 26, 2019 be adopted as presented.

**081-2019**

**CARRIED**

- 3.3 Rise and Report – January 25, 2019 (no motion required)

MOVED by Director Nobels, SECONDED by Director Putterill, that the staff report entitled “North Coast Regional District Signing Authorities” be received;

AND THAT the Board of the North Coast Regional District authorize Mrs. Sharon Landrath and Mr. Barry Cunningham as signing authorities on the North Coast Regional District Northern Savings Credit Union account;

AND THAT the Board of the North Coast Regional District authorize Mrs. Sharon Landrath as an authorized user on the North Coast Regional District Credit Union Automated Funds Transfer (CAFT) System;

AND THAT the Board of the North Coast Regional District authorize Mrs. Sharon Landrath as signing authority on the North Coast Regional District Municipal Finance Authority of B.C. account;

AND FURTHER THAT the Board of the North Coast Regional District remove Mr. Nelson Kinney and Mr. Sukhraj Gill as signing authorities on the North Coast Regional District Northern Savings Credit Union account.

IC005-2019

CARRIED

#### **4. STANDING COMMITTEE/COMMISSION MINUTES – BUSINESS ARISING**

- 4.1 Minutes of the Regular meeting of the Moresby Island Management Standing Committee held January 8, 2019

MOVED by Director Putterill, SECONDED by Director Daugert, that the minutes of the Regular meeting of the Moresby Island Management Standing Committee held January 8, 2019 be received.

**082-2019**

**CARRIED**

- 4.2 Minutes of the Regular meeting of the Regional Recycling Advisory Committee held October 24, 2018

MOVED by Director Nobels, SECONDED by Director Olsen, that the minutes of the Regular meeting of the Regional Recycling Advisory Committee held October 24, 2018 be received.

**083-2019**

**CARRIED**

- 4.3 Recommendation from the Regular meeting of the Regional Recycling Advisory Committee held January 30, 2019

MOVED by Director Nobels, SECONDED by Director Cunningham, that the recommendations of the Regular meeting of the Regional Recycling Advisory Committee held January 30, 2019 be received;

AND THAT the Board of the North Coast Regional District direct staff to prepare a report with respect to closure costs of the recycling facility transfer station and potential impacts to staffing levels.

**084-2019**

**CARRIED**

## **5. DELEGATIONS**

None.

## **6. FINANCE**

- 6.1 S. Landrath, Treasurer – Cheques Payable over \$5,000 for January, 2019

MOVED by Director Nobels, SECONDED by Director Brain, that the staff report on Cheques Payable over \$5,000 issued by the North Coast Regional District for January, 2019 be received and filed.

**085-2019**

**CARRIED**

## **7. CORRESPONDENCE**

- 7.1 Province of B.C. – 2019 Order of British Columbia

MOVED by Director Young, SECONDED by Director Brain, that the correspondence from the Province of B.C. with respect to the 2019 Order of British Columbia be received.

**086-2019**

**CARRIED**

- 7.2 Environment and Climate Change Canada – Consultation on Amending Schedule 1 of the Species at Risk Act

MOVED by Director Nobels, SECONDED by Director Daugert, that the correspondence from Environment and Climate Change Canada with respect to consultation on amending the Species at Risk Act be received.

**087-2019**

**CARRIED**

- 7.3 Community Energy Association – Letter of Support for the Charge North EV Network Application

MOVED by Director Nobels, SECONDED by Alternate Director Bjorndal, that the correspondence from the Community Energy Association with respect its request for a letter of support for the Charge North EV Network grant funding application to the CleanBC Community Fund be received.

**088-2019**

**CARRIED**

MOVED by Director Olsen, SECONDED by Director Putterill, that the Board of the North Coast Regional District provide a letter of support to the Community Energy Association to accompany its grant application to CleanBC Community Fund to support the implementation of a level 2 charging station network of approximately 120 stations across the project area.

**089-2019**

**CARRIED**

- 7.4 North Central Local Government Association – 2019 Annual General Meeting Agenda

MOVED by Director Olsen, SECONDED by Director Nobels, that the correspondence from the North Central Local Government Association with respect to the 2019 Annual General Meeting and Conference agenda be received.

**090-2019**

**CARRIED**

*Directors Young, Putterill, Brain and Alternate Director Bjorndal indicated that they would be attending the North Central Local Government Association AGM.*

- 7.5 Association of Vancouver Island and Coastal Communities – 2019 AVICC Convention Registration & Brochure

MOVED by Director Nobels, SECONDED by Director Olsen, that the correspondence from the Association of Vancouver Island and Coastal Communities with respect to the 2019 Convention registration and brochure be received.

**091-2019**

**CARRIED**

*Directors Nobels, Putterill and Bergman indicated that they would be attending the Association of Vancouver Island and Coastal Communities AGM.*

- 7.6 Merville Water Guardians – Formal Request to Protect the Groundwater of Vancouver Island

MOVED by Alternate Director Bjorndal, SECONDED by Director Nobels, that the correspondence from Merville Water Guardians with respect to its request to protect the groundwater of Vancouver Island be received and filed.

**092-2019**

**CARRIED**

- 7.7 Prince Rupert Environmental Society – Large Vessel Anchor Safety Endorsement Request

MOVED by Director Nobels, SECONDED by Director Olsen, that the correspondence from the Prince Rupert Environmental Society with respect to its request to endorse large vessel anchor safety be received.

**093-2019**

**CARRIED**

MOVED by Director Nobels, SECONDED by Director Putterill, that the Board of the North Coast Regional District send correspondence to the Honourable Minister Garneau, Minister of Transport, with respect to large vessel anchor safety in the Prince Rupert Harbour.

**094-2019**

**TABLED**

MOVED by Director Brain, SECONDED by Director Cunningham, that the Board of the North Coast Regional District table motion 094-2019.

**095-2019**

**CARRIED**

MOVED by Director Putterill, SECONDED by Director Cunningham, that the Board of the North Coast Regional District invite the Prince Rupert Port Authority and the Prince Rupert Environmental Society to appear as a delegation at its next Regular meeting date.

**096-2019**

**CARRIED**

## **8. REPORTS – RESOLUTIONS**

- 8.1 D. Fish, Corporate Officer – April 2019 Strategic Planning Session Scheduling

MOVED by Director Olsen, SECONDED by Director Brain, that the report from staff entitled “April 2019 Strategic Planning Session Scheduling” be received;

AND THAT the April 26, 2019 Regular meeting of the North Coast Regional District Board be held at the Village of Masset Council Chambers (1686 Main Street) in Masset, B.C. at 4:00 p.m.;

AND FURTHER THAT a Strategic Planning Session of the North Coast Regional District Board be held at 10:00 a.m. on April 27-28, 2019 at Hiellen Long House (Tow Hill Road) in North Coast Regional District Electoral Area D.

**097-2019**

**CARRIED**

- 8.2 D. Fish, Corporate Officer – 2019 Draft Resolution Submissions to the North Central Local Government Association

MOVED by Director Brain, SECONDED by Director Olsen, that the report from staff entitled “2019 Draft Resolution Submissions to the North Central Local Government Association” be received for information.

**098-2019**

**CARRIED**

*The Board of the North Coast Regional District directed staff to circulate a resolution with respect to access to level 3 trauma centres for electronic voting prior to the NCLGA resolution submission deadline on March 7, 2019.*

- 8.3 D. Fish, Corporate Officer – Approval of the Electors for Mainland Arts and Culture Contribution Bylaw No. 621, 2018

MOVED by Director Nobels, SECONDED by Director Cunningham, that the report from staff entitled “Approval of the Electors for Mainland Arts and Culture Contribution Bylaw No. 621, 2018” be received for information.

**099-2019**

**CARRIED**

**9. BYLAWS**

- 9.1 Bylaw No. 621, 2018 – Being a bylaw to establish a service to provide a contribution to the cost of providing and operating arts and cultural centres

MOVED by Director Brain, SECONDED by Director Cunningham, that Bylaw No. 621, 2018 be deferred to a future Regular meeting of the Board of the North Coast Regional District.

**100-2019**

**CARRIED**

- 9.2 Bylaw No. 469.3, 2018 – Being a bylaw to amend the SQCRD Sandspit Water Service Establishment Bylaw No. 469, 2005

MOVED by Director Putterill, SECONDED by Director Olsen, that Bylaw No. 469.3, 2018 be adopted.

**101-2019**

**CARRIED**

**10. LAND REFERRALS / PLANNING**

None.

**11. NEW BUSINESS****11.1 Director's Reports**

MOVED by Director Nobels, SECONDED by Director Brain, that the verbal reports from the Directors, as follows, be received:

Director Daugert – Village of Port Clements

- The Village of Port Clements began strategic planning; and
- The Board of the Misty Isles Economic Development Society (MIEDS) sent correspondence to the Ministry of Forests, Lands, Natural Resource Operations and Rural Development to request an extension on its response to the community forest invitation.

Director Putterill – Electoral Area E

- Director Putterill attended the last meeting of the Vancouver Island Regional Library Board. The VIRL Board is finding that proposals for tender on the construction of new library facilities are being proposed at higher dollar values than originally anticipated.
- The GwaiiTel Society has received full funding for upgrades to the radio link between Mt. Hayes and Old Massett, which would see increases to bandwidth capacity of approximately 60%.

Director Olsen – Village of Queen Charlotte

- Director Olsen attended the last meeting of the Haida Gwaii Museum Board of Directors, which will be completing strategic planning in the near future;
- **The Queen Charlotte Heritage Housing Society's 19-unit** modular construction of social housing in the Village has been delayed due to the discovery of mold in the units; and
- The Village continues to work to reestablish an all island protocol group.

Director Young – Electoral Area D

- Director Young attended the last meeting of the Gwaii Trust Society;
- The fiber optic line has been laid in the Tow Hill area; and
- Director Young will be meeting with community group in March 2019 to discuss community priorities.

Alternate Director Bjorndal – District of Port Edward

- The District is attempting to redevelop the old school site; and
- The District continues to work with CN Rail on the whistle issue in the District.

Director Brain – City of Prince Rupert

- **The City's homeless support project will be complete in March 2019, which will provide 36 supportive housing units and facilitate the closure of the emergency homeless shelter in downtown;**
- Watson Island remediation continues to go well and is near completion; and
- The City believes it is close to securing funding for phase 3 of its water treatment upgrade project.

Director Cunningham – City of Prince Rupert

- Construction on the Metlakatla housing project is moving along at a good pace.

Chair Pages – Village of Masset

- The Village held its strategic planning session;
- TELUS completed upgrades to the cellular network through upgrades to infrastructure located on Telephone Hill; and
- The fish plant in Masset has been purchased and is proposed to reopen in the near future, providing approximately 80 local jobs in the community.

**102-2019****CARRIED****12. OLD BUSINESS**

## 12.1 Tsunami Evacuation Routes

*Director Putterill indicated that he had spoken with residents in Tlell with respect to the placement of the tsunami evacuation signage. Residents have indicated that the signage leads to locked property.*

MOVED by Director Putterill, SECONDED by Director Young, that staff be directed to follow-up with Tlell residents with respect to the placement of tsunami evacuation route signage and address any community concerns therein.

**103-2019****CARRIED****13. PUBLIC INPUT**

There were 0 questions from the public.

**14. IN CAMERA**

MOVED by Director Nobels, SECONDED by Alternate Director Bjorndal, that the public be excluded from the meeting according to section 90(1)(k) of the **Community Charter** "negotiations and related discussions respecting the proposed provision of a municipal service that are at their preliminary stages and that, in the view of the council, could reasonably be expected to harm the interests of the municipality if they were held in public."

**104-2019****CARRIED**

**15. ADJOURNMENT**

MOVED by Director Brain, SECONDED by Director Nobels, that the North Coast Regional District Regular Board meeting be adjourned at 9:41 p.m.

**105-2019****CARRIED**

*Approved and adopted:*

*Certified correct:*

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***Chair***

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***Corporate Officer***



## NORTH COAST REGIONAL DISTRICT

**MINUTES** of the Regular (Round 2 Budget) Meeting of the Board of Directors of the North Coast Regional District (NCRD) held at 344 2<sup>nd</sup> Avenue West in Prince Rupert, B.C. on Saturday, February 23, 2019 at 10:00 AM.

### PRESENT

### PRIOR TO ADOPTION

Chair	B. Pages, Village of Masset
Directors	B. Cunningham, City of Prince Rupert L. Brain, City of Prince Rupert K. Bjorndal, Alternate, District of Port Edward K. Olsen, Village of Queen Charlotte D. Daugert, Village of Port Clements D. Nobels, Electoral Area A K. Bergman, Electoral Area C J. Young, Electoral Area D E. Putterill, Electoral Area E
Regrets	D. Franzen, District of Port Edward
Staff	D. Chapman, Chief Administrative Officer D. Fish, Corporate Officer S. Landrath, Treasurer
Public	0
Media	0

**1. CALL TO ORDER 10:04 a.m.**

**2. AGENDA**

MOVED by Director Brain, SECONDED by Director Nobels, that the February 23, 2019 Regular (R2 Budget) agenda be adopted as presented.

**106-2019**

**CARRIED**

**3. MINUTES & BUSINESS ARISING FROM MINUTES**

None.

**4. STANDING COMMITTEE/COMMISSION MINUTES – BUSINESS ARISING**

None.

**5. DELEGATIONS**

None.

**6. FINANCE**

Round 2 of the draft 2019 – 2023 North Coast Regional District (NCRD) Financial Plan was distributed to the Board and is available on the NCRD website.

**7. CORRESPONDENCE**

- 7.1 Sandspit Volunteer Fire Department Society – Budget Request and Interim Financial Reporting

MOVED by Director Olsen, SECONDED by Director Nobels, that the correspondence from the Sandspit Volunteer Fire Department Society with respect to its budget request and interim financial reporting be received for information.

**107-2019**

**CARRIED**

- 7.2 Community Energy Association – Charge North – EV Charging Station Funding for Local Governments

MOVED by Director Olsen, SECONDED by Director Nobels, that the correspondence from the Community Energy Association with respect to electric vehicle charging station funding for local governments be received.

**108-2019**

**CARRIED**

MOVED by Director Olsen, SECONDED by Director Brain, that the Board of the North Coast Regional District assume responsibility of the lead applicant to the CleanBC Community Fund to support the Charge North Electric Vehicle Charging Network project.

**109-2019**

**CARRIED**

MOVED by Director Olsen, SECONDED by Director Putterill, that the North Coast Regional District support the installation of two level 2 charging stations in Electoral Areas D and E at a cost of \$5,000, or four level 2 charging stations in Electoral Areas D and E, subject to confirmation of CleanBC Community Fund grant funding to support project costs.

**110-2019**

**CARRIED**

**8. REPORTS – RESOLUTIONS**

- 8.1 D. Fish, Corporate Officer – Vancouver Island Regional Library Levy Increase

MOVED by Director Putterill, SECONDED by Director Nobels, that the report from staff entitled “Vancouver Island Regional Library Levy Increase” be received for information.

**111-2019**

**CARRIED**

- 8.2 D. Fish, Corporate Officer – Haida Gwaii Museum, Function 720 – 2019 Grant-in-Aid Recipient User Rates and Charges Summary

MOVED by Alternate Director Bjorndal, SECONDED by Director Olsen, that the report from staff entitled “Haida Gwaii Museum, Function 720 – 2019 Grant-in-Aid Recipient User Rates and Charges Summary” be received for information.

**112-2019**

**CARRIED**

## **9. FINANCIAL PLAN’S REVIEW**

- 9.1 Administration – Function 110

MOVED by Director Olsen, SECONDED by Director Nobels, that the Five-Year Financial Plan 2019-2023 for Administration, Function 110, be referred to the Round 3 budget discussions as presented.

**113-2019**

**CARRIED**

- 9.2 Electoral Area Administration – Function 120

MOVED by Director Daugert, SECONDED by Director Putterill, that the Five-Year Financial Plan 2019-2023 for Electoral Area Administration, Function 120, be referred to the Round 3 budget discussions as presented.

**114-2019**

**CARRIED**

- 9.3 Grant-in-Aid Area C – Function 172

MOVED by Director Bergman, SECONDED by Director Olsen, that the Five-Year Financial Plan 2019-2023 for Grant-in-Aid Area C, Function 172, be referred to the Round 3 budget discussions as presented.

**115-2019**

**CARRIED**

- 9.4 Grant-in-Aid Area D – Function 173

MOVED by Director Young, SECONDED by Director Olsen, that the Five-Year Financial Plan 2019-2023 for Grant-in-Aid Area D, Function 173, be referred to the Round 3 budget discussions as presented.

**116-2019**

**CARRIED**

- 9.5 Grant-in-Aid Area E – Function 174

MOVED by Director Putterill, SECONDED by Director Nobels, that the Five-Year Financial Plan 2019-2023 for Grant-in-Aid Area E, Function 174, be referred to the Round 3 budget discussions as presented.

**117-2019**

**CARRIED**

## 9.6 VIRL Debt – Function 191

MOVED by Director Olsen, SECONDED by Director Brain, that the Five-Year Financial Plan 2019-2023 for VIRL Debt, Function 191, be referred to the Round 3 budget discussions as presented.

**118-2019****CARRIED**

## 9.7 Emergency Programming – Areas A &amp; C – Function 220

MOVED by Director Nobels, SECONDED by Director Bergman, that the Five-Year Financial Plan 2019-2023 for Emergency Programming – Areas A & C, Function 220, be referred to the Round 3 budget discussions as presented.

**119-2019****CARRIED**

## 9.8 Emergency Programming – Area E – Function 229

MOVED by Director Putterill, SECONDED by Director Nobels, that the Five-Year Financial Plan 2019-2023 for Emergency Programming – Area E, Function 229, be referred to the Round 3 budget discussions as presented.

**120-2019****CARRIED**

## 9.9 Islands Solid Waste – Function 310-319

MOVED by Director Olsen, SECONDED by Director Cunningham, that the Five-Year Financial Plan 2019-2023 for Islands Solid Waste, Function 310-319, be referred to the Round 3 budget discussions as presented.

**121-2019****CARRIED**

## 9.10 Regional (Mainland) Recycling – Function 340

MOVED by Director Cunningham, SECONDED by Director Brain, that the Five-Year Financial Plan 2019-2023 for Regional (Mainland) Recycling, Function 340, be referred to the Round 3 budget discussions as presented.

**122-2019****CARRIED**

## 9.11 Prince Rupert Regional Archives – Function 710

MOVED by Director Brain, SECONDED by Director Cunningham, that the Five-Year Financial Plan 2019-2023 for Prince Rupert Regional Archives, Function 710, be referred to the Round 3 budget discussions as presented.

**123-2019****CARRIED**

## 9.12 Haida Gwaii Museum – Function 720

MOVED by Director Nobels, SECONDED by Director Olsen, that the Five-Year Financial Plan 2019-2023 for Haida Gwaii Museum, Function 720, be referred to the Round 3 budget discussions as presented.

**124-2019****CARRIED**

## 9.13 Vancouver Island Regional Library – Function 725

MOVED by Director Putterill, SECONDED by Director Nobels, that the Five-Year Financial Plan 2019-2023 for Vancouver Island Regional Library, Function 725, be referred to the Round 3 budget discussions as presented.

**125-2019****CARRIED**

## 9.14 Haida Gwaii Recreation – Function 730

MOVED by Director Cunningham, SECONDED by Director Olsen, that the Five-Year Financial Plan 2019-2023 for Haida Gwaii Recreation, Function 730, be referred to the Round 3 budget discussions as presented.

**126-2019****CARRIED**

## 9.15 Sandspit Community Hall – Function 735

MOVED by Director Putterill, SECONDED by Director Olsen, that the Five-Year Financial Plan 2019-2023 for Sandspit Community Hall, Function 735, be referred to the Round 3 budget discussions as amended:

- Increase the property tax requisition to its maximum; and
- **Allocate additional revenue toward “building and maintenance”.**

**127-2019****CARRIED**

## 9.16 Mainland Recreation Area A – Function 751

MOVED by Director Nobels, SECONDED by Director Brain, that the Five-Year Financial Plan 2019-2023 for Mainland Recreation Area A, Function 751, be referred to the Round 3 budget discussions presented.

**128-2019****CARRIED**

## 9.17 Mainland Recreation Area C – Function 752

MOVED by Director Cunningham, SECONDED by Director Bergman, that the Five-Year Financial Plan 2019-2023 for Mainland Recreation Area C, Function 752, be referred to the Round 3 budget discussions as presented.

**129-2019****CARRIED**

**10. OLD BUSINESS**

None.

**11. NEW BUSINESS**

None.

**12. PUBLIC INPUT**

There were 0 questions from the public.

**13. IN CAMERA**

None.

**14. ADJOURNMENT**

MOVED by Director Olsen, SECONDED by Director Daugert, that the North Coast Regional District Regular Board meeting be adjourned at 11:07 a.m.

**130-2019**

**CARRIED**

Approved and adopted:

Certified correct:

\_\_\_\_\_  
Chair

\_\_\_\_\_  
Corporate Officer



## NORTH COAST REGIONAL DISTRICT PARCEL TAX ROLL REVIEW PANEL

**MINUTES** of the Meeting of the Parcel Tax Roll Review Panel of the North Coast Regional District (NCRD) held at 344 2<sup>nd</sup> Avenue West in Prince Rupert, B.C. on Friday, February 22, 2019 at 6:45 p.m.

### PRESENT

### PRIOR TO ADOPTION

Chair	E. Putterill, Electoral Area E
Directors	K. Olsen, Village of Queen Charlotte J. Young, Electoral Area D
Staff	D. Chapman, Chief Administrative Officer S. Landrath, Treasurer (Collector) D. Fish, Corporate Officer
Public	0
Media	0

### 1. CALL TO ORDER 6:46 p.m.

### 2. AGENDA

MOVED by Director Olsen, SECONDED by Director Young, that the February 22, 2019 Parcel Tax Roll Review Panel agenda be adopted as presented.

**001-2019**

**CARRIED**

### 3. REPORTS

3.1 S. Landrath, Collector – 2019 Parcel Tax Roll Review – Sandspit Water

MOVED by Director Olsen, SECONDED by Director Young, that the staff report entitled “Parcel Tax Roll Review – Sandspit Water” be received;

AND THAT the 2019 Sandspit Water Parcel Tax Roll be authenticated.

**002-2019**

**CARRIED**

### 4. PUBLIC INPUT

None.

**5. ADJOURNMENT**

MOVED by Director Young, SECONDED by Director Olsen, that the Parcel Tax Roll Review Panel meeting be adjourned at 6:47 p.m.

**003-2019**

**CARRIED**

*Approved and adopted:*

*Certified correct:*

\_\_\_\_\_  
*Chair*

\_\_\_\_\_  
*Corporate Officer*

**NORTH COAST REGIONAL DISTRICT**

**MORESBY ISLAND MANAGEMENT STANDING COMMITTEE**

**MINUTES** of the Regular Meeting of the Moresby Island Management Standing Committee (MIMSC) held at Sandspit Community Centre, Sandspit, B.C. on February 5, 2019 at 7:00 PM.

**Adopted March 5, 2019**

**PRESENT** Gail Henry, Bill Quaas, Stan Hovde, Gord Usher

**ABSENT** Evan Putterill

Chair Gail Henry

Vice Chair

Staff Barb Parser

Public 5

**1. CALL TO ORDER 7:09 PM**

**2. CONSIDERATION OF AGENDA (additions/deletions)**

2.1 Agenda February 2019

**010-2019** MOTION to accept agenda as presented, moved by Gord Usher, seconded by Bill Quaas, Carried

**3. MINUTES & BUSINESS ARISING FROM MINUTES**

3.1 Minutes January 2019

**011-2019** MOTION to adopt and file January minutes of meeting, moved by Gord Usher, seconded by Stan Hovde, Carried

**4. DELEGATIONS**

None

**5. CORRESPONDENCE**

None

**6. REPORTS – RESOLUTIONS**

**6.1 Water Operators Report**

**012-2019** Motion to accept and file Water Operators Report moved by Gord Usher, seconded by Stan Hovde, Carried

**6.2 Directors Report - None**

**7. OLD BUSINESS**

**7.1 Ratification of Motion:**

MOTION: via Electronic Vote, Moved by Gail Henry to have MIMSC write a letter of support for the Sandspit Volunteer Fire Department to apply for funds from GT 2019 Major Contributions Grant, seconded by Gord Usher, Carried

**013-2019** MOTION to ratify electronic vote to write support letter to write letter of support to the Sandspit Volunteer Fire Department moved by Stan Hovde, seconded by Bill Quaas, Carried

**8. NEW BUSINESS**

**8.1 MIMSC 2019 Meeting Dates - Consider changing meeting day to Monday's**

Moved to table to March 2019 meeting for discussion

**9. PUBLIC INPUT**

**10. IN CAMERA**

**11. ADJOURNMENT**

**014-2019** MOTION to Adjourn by Stan Hovde, 7:19 PM, Carried

Approved and adopted:

Certified correct:

---

Chair

---

Secretary

**North Coast Regional District**  
**Cheques payable over \$5,000 - FEBRUARY, 2019**

<b>Payable To</b>	<b>Date</b>	<b>Amount</b>	<b>Purpose</b>
Big Red Enterprises Ltd.	13-Feb	\$ 17,322.78	January Garbage Collection
Pacific Blue Cross	13-Feb	\$ 6,768.59	February PBC & BC Life Premiums
Ticker's Hauling & Storage	13-Feb	\$ 8,877.75	Transport recyclables, porto toilet rental & cleaning, building & equipment rental and transport excavator
Vancouver Island Regional Library	13-Feb	\$ 15,178.00	2019 First Quarter Total Levy
Regional District of Kitimat-Stikine	25-Feb	\$ 52,119.00	2018 Northwest Regional Benefits Alliance contribution
Shorewood Forest Ltd.	25-Feb	\$ 6,144.00	Equipment & Operator-Sandspit transfer station cleanup and replace leachate infiltration pipes
Collabria Payment Processing (RD credit cards)	8-Feb	\$ 7,534.25	Staff travel (training, public hearing & Metlakatla Treaty meetings), subscription renewals, rodent deterrent for Landfill bins & Board registrations (LMLGA)
Municipal Pension Plan	20-Feb	\$ 7,440.26	Payroll Remittance (PP3-2019)
Receiver General	20-Feb	\$ 14,435.55	Payroll Remittance (PP3-2019)
Municipal Pension Plan	25-Feb	\$ 6,743.39	Payroll Remittance (PP4-2019)
Receiver General	25-Feb	\$ 16,396.86	Payroll Remittance (PP4-2019)

**CHEQUES OVER \$5,000: \$ 158,960.43**

**CHEQUES UNDER \$5,000: \$ 53,173.17**

**TOTAL CHEQUES: \$ 212,133.60**



## ITEM 7.1

TCYHA Board 2018-2019

### OFFICERS

#### President

Paul Smith, Councillor, Strathcona County, AB

#### Past President

Sandy Salt, Valemount, BC

#### Secretary/Treasurer

Don Grimbale, Life Member

### DIRECTORS:

#### British Columbia Directors

Rosemary Hrubey, Councillor, McBride  
Sandy Salt, Valemount

#### Alberta Directors

Chelsea Griffiths, Councillor, Wabamun  
Bert Journault, Councillor, Jasper  
Dennis Roth, Deputy Mayor, Kitscoty  
Paul Smith, Councillor, Strathcona County  
Daniel Warawa, Deputy Reeve, Lamont County  
Jerrold Lemko, Councillor, Vegreville

#### Saskatchewan Directors

Randy Goulden, Councillor, Yorkton

#### Manitoba Directors

Merv Starzyk, Deputy Mayor, RM Yellowhead

### Appointed Directors / Committee Chairs:

#### Planning Chair:

Alan Cayford, Life Member, Lloydminster, SK

#### Staff Relations Chair:

Jack Wright, Life Member

#### Chambers/Associations Liaison Chair:

Todd Banks, Sherwood Park & District Chamber

~

#### C.A.O.

John Wojcicki



February, 2019

Dear TransCanada Yellowhead #16 and BC Yellowhead #5 Mayors, Reeves and Council Members:

I would like to bring two items to your attention, as well as a renewal reminder to those who still have that on their "to do" list.

Working together in finding ways to foster local success benefits everyone. Bringing both business and personal travellers to our doorstep takes resources and as such I am sending you this note to share an opportunity to work together to help these travellers cross over our thresholds.

Firstly, if you are not already aware we wish to inform you that the Government of Canada is accepting proposals for projects that support trade diversity. The \$2-billion National Trade Corridors Fund (NTCF) helps fund infrastructure projects in Canada. Infrastructure projects could include work to airports, ports, rail yards, transportation facilities and access roads.

Eligible projects include:

- improve the flow of goods and people in Canada
- increase the flow of trade in and out of Canada
- help the transportation system to:
  - withstand the effects of climate change
  - better adapt to new technologies and innovation

Funding will be spread out over 11 years, ending March 31, 2028.

There are currently two calls for proposals:

- The continuous call (projects supporting trade diversity)
- The northern call (projects supporting Canada's Territorial North)

The TransCanada Yellowhead Highway Association's sole purpose is to enable your success as members. We are pleased to provide you the link below for more information about how to apply to the Fund:

<http://www.tc.gc.ca/en/programs-policies/programs/national-trade-corridors-fund.html>

The second item I wish to bring forward is the notice of our 73<sup>rd</sup> Annual General Meeting/Resolutions Session being held on April 5<sup>th</sup> 2019. The AGM will be preceded by our Annual Awards Luncheon following which we will be receiving Provincial Updates from our four Western Provincial Governments. It is being held in the facilities of our long-time corporate member, Rosslyn Inn and Suites

TRANS CANADA YELLOWHEAD HIGHWAY ASSOCIATION  
~ est'd 1947 ~

#3, 9343 50 STREET ~ EDMONTON, AB, T6B 2L5

PH: (780) 761-3800 EMAIL: admin@goyellowhead.com

www.goyellowhead.com / www.transcanadayellowhead.com

located in Edmonton AB. More information regarding the AGM as well as submission of Resolutions is available on our website:  
[www.transcanadayellowhead.com/resources](http://www.transcanadayellowhead.com/resources).

An integral part of this is the presentation of Resolutions and we encourage you to take advantage of identifying concerns that will be brought to Governments attention with the strength of a collaborative voice from municipalities in Western Canada through the TCYHA.

If you are unable to attend the AGM/Resolutions Session in person we are once again making teleconference participation available. Simply contact the TCYHA office at [admin@goyellowhead.com](mailto:admin@goyellowhead.com) to obtain the dial-in information.

As municipalities and businesses we are always faced with competing priorities and pressures. I encourage you to take a look at the NTCF and identify areas where your community can take advantage of this financial support. And I also encourage you to participate in our Annual General Meeting in whatever way works for your municipality. By continually presenting Governments, Provincial and Federal, and their agencies, ensures that this Yellowhead Corridor will continue to grow and a vital economic tool for Canadian growth.

Lastly, a Thank You to the over 70% of our membership renewals. For those who are still in the process of renewing please note that presenting a collective representational voice was what it initially took to get the highway constructed, and then to have improvements made, and now this collective effort is what it will take to bring our Yellowhead Highways TC #16 and BC#5 to the caliber where we all expect them to be.

We are committed to ensuring this vital piece of Canadian highway infrastructure continues to meet local needs, foster growth and development in your community. The TCYHA is your association that will see that come to fruition.

Regards



Paul Smith  
President TCYHA  
(Councillor, Strathcona County, AB)

TRANS CANADA YELLOWHEAD HIGHWAY ASSOCIATION

~ est'd 1947 ~

#3, 9343 50 STREET ~ EDMONTON, AB, T6B 2L5

PH: (780) 761-3800 EMAIL: [admin@goyellowhead.com](mailto:admin@goyellowhead.com)

[www.goyellowhead.com](http://www.goyellowhead.com) / [www.transcanadayellowhead.com](http://www.transcanadayellowhead.com)



February 6, 2019

Barry Pages  
North Coast (Regional District)  
14 - 342 3rd Avenue West  
Prince Rupert, BC V8J 1L5

RECEIVED FEB 19 2019

**Re: Forest Enhancement Society of B.C. Jan 2019 Accomplishments Report**

Dear Barry Pages and Regional District Directors,

British Columbians are concerned about climate change along with other environmental, safety, and economic concerns. They want to know specifically what their governments are doing to protect communities from wildfire risk, improve wildlife habitat, fight climate change, expand the bio-economy, and enhance B.C.'s forests. The enclosed Forest Enhancement Society of B.C. (FESBC) Accomplishments Report shows the huge amount of work underway in a vast number of communities across rural British Columbia. Citizens and governments alike will be pleased to see real-life local projects that are happening close to where they live.

FESBC achieves this work by granting funds provided by the Province of British Columbia and the Government of Canada to third parties who implement projects and treatments on the land base. It is likely there have been projects in and around your community being delivered by people who live in your local area. When the opportunity arises, please thank these people and our governments for assisting B.C. and Canada in achieving our shared vision of enhanced forest resilience for the lasting benefit of British Columbia's environment, wildlife, forest health, and communities. If you are one of the local governments who are directly involved in delivering projects in your area, please accept our gratitude.

There is a wide diversity in project proponents, from community forests to municipalities to government agencies, and others. The largest group funded is the 30% of the projects that have First Nations participation (49 projects valued at \$44 million). In many cases, it is a First Nation who is the lead agency that envisions, plans, and delivers these projects. When the opportunity arises, please help us to express our gratitude to these First Nations along with the other delivery organizations actively at work in your area.

If you or your fellow Directors are interested in further information, please visit our website [www.fesbc.ca](http://www.fesbc.ca), send me an email, or give me a call.

Steven F Kozuki, RPF  
Executive Director, FESBC  
Office Phone: 1.778.765.0938  
Email: [skozuki@fesbc.ca](mailto:skozuki@fesbc.ca)

(7) RD - 12



BOX 253  
 SHAWNIGAN LAKE, BC  
 V0R 2W0 250.812.9830  
[www.firewiseconsulting.com](http://www.firewiseconsulting.com)

February 19, 2019

Chair Barry Pages  
 North Coast Regional District  
 14 – 342 3<sup>rd</sup> Avenue West  
 Prince Rupert, BC V8J 1L5

**Re: New Fire Safety Act**

The new Fire Safety Act replacing the Fire Services Act is anticipated to be fully enacted and in force later this year. Under the new legislation, local governments will become responsible for fire safety compliance monitoring of public buildings and to conduct fire cause investigations. The new Act will have a significant impact on how communities will manage fire safety and prevention programs.

Local governments may use a variety of strategies to meet these new obligations including contracting specialized services firms, recruiting new employees, training staff, and implementing new bylaws and data management systems. But which is the right solution for your organization/community?

FireWise Consulting can help you:

- Explore the implications of the new Fire Safety Act for your community;
- Evaluate your current level of preparedness to meet these new accountabilities;
- Explore various strategies to comply with the new Fire Safety Act;
- Develop a cost effective, comprehensive action plan appropriate for your community;
- Implement a compliance monitoring system; and
- Provide training to individuals responsible for building fire safety inspections and fire investigations.

At first glance, these changes may seem daunting but, they provide opportunities to improve public safety and streamline the delivery of fire prevention and investigation services in your community.

FireWise is here to help. Our firm specializes in providing advisory and training services to corporate clients and local governments. We have the expertise to identify simple, cost effective solutions to ensure your local government meets their new accountabilities contained in the new legislation, and do so practically and sustainably.

We welcome the opportunity to discuss your situation and how we can help you find cost effective strategies to comply with the upcoming legislation. If you would like to discuss this further or to meet with us to receive additional information, please contact Glen Sanders at [glen@firewiseconsulting.com](mailto:glen@firewiseconsulting.com) or by mobile phone at 250-812-9830 or Amelia Sangara at [amelia@firewiseconsulting.com](mailto:amelia@firewiseconsulting.com) or mobile phone at 250-701-8178.

Your truly,

A handwritten signature in black ink, appearing to read "M. G. Sanders", followed by a small dot.

M. G. (Glen) Sanders  
President

enclosure



FIREWISE  
CONSULTING

# *Making Communities Safer*

We can help

FIRE SAFETY ACT



FIREWISE CONSULTING LTD. PROVIDES CONSULTING SERVICES TO  
LOCAL GOVERNMENTS ON FIRE SAFETY LEGISLATION  
COMPLIANCE

## FIREWISE CONSULTING CAN HELP YOU:

- Explore** the implications of the New Fire Safety Act for your community
- Evaluate** your current level of preparedness to meet these new accountabilities
- Discover** various strategies to comply with the new Fire Safety Act requirements
- Develop** a cost effective, comprehensive action plan appropriate for your community
- Implement** a compliance monitoring system
- Provide** training to individuals responsible for building inspections and/or fire investigations

How can we help you?



### TALK TO US

250.812-9830 or 250-812-9636

250.701-8178

[info@firewiseconsulting.com](mailto:info@firewiseconsulting.com)

[www.firewiseconsulting.com](http://www.firewiseconsulting.com)

# NORTHERN CONFERENCE <sup>ITEM 7.4</sup> for WILDFIRE RESILIENCE

A forum to collaborate on forest & community resilience to wildfire



This April, leaders and scientists from across B.C. will meet at the Northern Conference for Wildfire Resilience. Over the course of three days, attendees will strengthen partnerships, renew practices, discuss policies and launch new planning approaches. We hope you will consider joining us for an energizing three days this Spring, as we advance solutions for a new future.



Ministry of  
Forests, Lands, Natural  
Resource Operations  
and Rural Development

## Keynote Speakers :

- Chief Maureen Chapman
- Dr. Lori Daniels
- Tony Pesklevits
- Dr. Paul Hessburg

APRIL 24 - 26, 2019  
BURNS LAKE, BC  
*By Invitation*

REGISTER NOW

To learn more, please visit:

<https://northernwildfireresilience.wordpress.com>





869 FRASER ST.  
PRINCE RUPERT B.C. V8J 1R1  
PHONE: (250) 624 6048  
FAX: (250) 627 7951  
EMAIL: ufawupr@citywest.ca

February 27, 2019

The Honourable Jonathan Wilkinson  
Minister of Fisheries, Oceans and the Canadian Coast Guard  
200 Kent Street  
Station 15N100  
Ottawa, Ontario  
K1A 0E6

Dear Minister Wilkinson,

**Re: Factory Ships Processing at Sea**

The Union provided a letter on July 11, 2016 expressing our objection to the proposed 10 year pilot project to process hake at sea.

The Union objected strongly to this proposal as we believed it would further deny shoreworkers/plant workers the opportunity to work.

Canadian Fishing Company's November 12, 2015, decision to cease canning salmon at the Oceanside Plant in Prince Rupert has now reduced the workforce from 750 workers to approximately 120 workers. The majority of the senior workers only had approximately 400 hours of work available during the 2018 salmon season.

The Oceanside Plant workers are relying on opportunities to process Hake and Pollock to help replace the salmon employment that has been eliminated as a result of the Company's decision to cease canning salmon at the Oceanside Plant. The Home Plant workers in Vancouver have also been asking to process hake in order to lengthen their short seasons.

Shoreworkers need more work; salmon processing alone does not provide enough employment to make a decent living. As you know, there will be no Northern herring fishery this year. Therefore, many shoreworkers will have no spring income and no choice but to apply for Social Assistance.

The UFAWU-Unifor negotiated a "Hake and Pollock" processing agreement with Canadian Fishing Company in 2013. Canadian Fishing Company made a commitment to process and freeze Hake and Pollock at the Oceanside Plant in the North as well as a commitment to process Hake at the Home Plant in the South.

Unfortunately, CFC processed all of their hake at their non-union plants but at least Canadian shoreworkers were employed. In order to encourage on-shore processing of Hake and Pollock in our plants, the union negotiated a special lower wage rate, about 1/3 less than our regular rates under the "Work Creation and New Work Opportunities" MOA.

As we provided in our 2016 letter, we objected to the Processing at Sea Proposal as it will not benefit our shoreworkers and coastal communities. We feared.....that processing at Sea would be the end for on-shore Hake processing.

So here we are .....**2019**.... CFC shoreworkers have not processed Hake or Pollock.

Fishers, shoreworkers and coastal communities are all struggling for more work. It is disappointing that our Government has made these decisions with no regard to the impact they would have on fishers, shoreworkers, and coastal communities.

How can a Government allow huge volumes of our fish to be processed at sea with no benefits going to the people, who for many generations have worked in the fishing industry?

There are five factory ships processing now with a sixth ship on its way. The impact of not processing fish in our fish plants is great. Without product to unload and process, the plants will not be maintained as they should be.....and we will be left with failing infrastructure.

Fish is a common property owned by all Canadians and the Union submits that the agreement that allowed "Processing at Sea" is self-serving and did not benefit those who rely on fish stocks and fish processing to earn a living.

Yours truly,

Christina Nelson  
Northern Organizer  
UFAWU-Unifor

cc:

Honourable John Horgan, Premier of British Columbia  
Standing Committee on Fisheries and Oceans (FOPO)  
Nathan Cullen, MP Skeena Bulkley Valley  
Fin Donnelly, MP NDP Fisheries Critic  
Ken Hardie, MP Fleetwood-Port Kells  
Honourable Doug Donaldson Minister of Natural Resources  
Honourable Lana Popham Minister of Agriculture  
Jen Rice, MLA North Coast  
Eric Kristiansen, ADM Premier's Office  
Allison Witter, Director, Wild Salmon Secretariat  
Prince Rupert City Council  
District of Port Edward  
North Coast Regional District

## Corporate Officer NCRD

---

**From:** Lori Wiedeman <cao@queencharlotte.ca>  
**Sent:** Thursday, March 14, 2019 9:33 AM  
**To:** Daniel Fish - NCRD (corporateofficer@ncrdbc.com); Trevor Jarvis; Babs Stevens (cao@skidegate.ca); Ruby Decock - Village of Port Clements (cao@portclements.ca)  
**Cc:** Kris Olsen; Andrew Hudson (andrew@gohaidagwaii.ca); Sandra Brown; CFO  
**Subject:** Letter of Support - VQC Imagine grant for Basketball Floor Mops  
**Attachments:** Picture NCRD floor Mop.jpeg  
  
**Flag Status:** Flagged

Good morning,

The Village of Queen Charlotte will be applying on the NHA Imagine grant to purchase 2 floor mops to be used at basketball tournaments to increase safety. We are applying for up to \$800 for this project and we are seeking letters of support from other local governments. The deadline for the application is March 31, 2019. I have included a picture of the mops that were recently purchased by NCRD for the All Native games in Prince Rupert. Please let me know if you need any further information.

I have provided a DRAFT LOS below:

Date

Lori Wiedeman  
Chief Administrative Officer  
Village of Queen Charlotte  
via email: [cao@queencharlotte.ca](mailto:cao@queencharlotte.ca)

Dear Lori Wiedeman:

**Re: Village of Queen Charlotte Basketball Floor Mops Project  
NHA Imagine Grant Application**

On behalf of the \_\_\_\_\_ I am writing in support of the Village of Queen Charlotte's application to the Northern Health Authority's Imagine Grant for up to \$800 for the purchase of two basketball floor mops.

Basketball is one of the main sports on Haida Gwaii that draws participation from all ages. These mops will help improve the safety of the game for the players and will be a welcome addition to our tournament equipment. We hope that you are successful in this application.

**Lori Wiedeman**  
**Chief Administrative Officer**  
Village of Queen Charlotte  
PO Box 580, 903A Oceanview Drive V0T1S0  
Phone: 250 559 4765 | Cell: 250 637 1782 | Fax: 250 559 4742  
Email: [cao@queencharlotte.ca](mailto:cao@queencharlotte.ca) | Web: [www.queencharlotte.ca](http://www.queencharlotte.ca)



### Staff Report

---

**Date:** March 22<sup>nd</sup>, 2019

**To:** D. Chapman, Chief Administrative Officer

**From:** D. Fish, Corporate Officer

**Subject:** 2019 Draft Resolution Submission to the North Central Local Government Association – Access to Level 3 Trauma Centres

---

**Recommendations:**

**THAT the staff report entitled “2019 Draft Resolution Submission to the North Central Local Government Association – Access to Level 3 Trauma Centres” be received;**

**AND THAT the Board of the North Coast Regional District endorse the “Hospital Helipad Construction” resolution as presented.**

---

**PURPOSE:**

The purpose of this report is to present to the Board of the North Coast Regional District (NCRD), for ratification, a resolution to the NCLGA with respect to access to level 3 trauma centres.

The subject resolution was circulated to the Board of the NCRD, via email, on March 1<sup>st</sup>, 2019 for voting. The Board voted in the affirmative to submit the resolution, as presented, to the NCLGA.

## **BACKGROUND:**

In 2017, the UBCM endorsed Resolution #B136 in support of the recommendations put forward in the **BC Forest Safety Ombudsman's report on Helicopter Emergency Medical Services** in B.C. The resolution requested that every resident of B.C. have access to Level 3 trauma care.

The challenge of rural access to trauma services and support in Canada has been well described. According to Hameed et al. (2010) there is a clear urban/rural divide that exists with regards to care equity and outcomes from major traumatic injury in BC. The **BC Forest Safety Ombudsman's report on Helicopter Emergency Medical Services** (2017) supports this fact and further recommends a legislated one-hour timeline for every resident of the province to have access to level 3 trauma care.

Unfortunately, none of the existing level 3 trauma hospital construction plans in the north include on-site hospital helipads. This includes, the upgrade plans for the University Hospital of Northern BC in Prince George and the new Mills Memorial hospital plan for Terrace. Both of which will receive level 3 trauma designation from the Trauma Association of Canada. Ultimately, these two sights will act as the receiving trauma facilities for all of northern BC.

Without on-site hospital helipads, trauma patients experience significant delays in transport and transfer of care due to transport teams having to land at municipal airports and drive patients to the hospital. Even under the best circumstances, this delay can be up to 30 minutes. Having on-site helipads at all level 3 trauma hospitals in rural BC will greatly reduce patient transport time by allowing helicopter emergency services to land directly at the hospital where definitive care will be provided.

### ***References***

*BC Forest Safety Ombudsman. (2017). WILL IT BE THERE? A Report on Helicopter Emergency Medical Services in BC.*

*Hameed, S.M., Schuurman, N., Razek, T., Boone, D., Van Heest, R., Taulu, T., ... Simons, R.K. (2010). Access to trauma systemes in Canada. The Journal of Trauma. 69(6), 1350-1361*

**DISCUSSION:****Hospital Helipad Construction**

WHEREAS none of the new or existing level 3 trauma hospital construction plan in rural British Columbia (B.C.) include plans or designs for onsite helipads;

AND WHEREAS due to an absence of onsite hospital helipads, rural B.C. trauma patients experience delayed access to level 3 trauma hospitals;

THEREFORE BE IT RESOLVED that the North Central Local Government Association and the Union of BC Municipalities lobby the Province of B.C. to legislate that all current and future level 3 and above trauma hospitals being constructed in rural B.C. receive capital funding to construct and operate an onsite helipad.

**RECOMMENDATION:**

Staff is recommending that the Board of the NCRD receive this report and pass the draft resolution, as presented.



## **Staff Report**

---

**Date:** March 22<sup>nd</sup>, 2019

**To:** D. Chapman, Chief Administrative Officer

**From:** D. Fish, Corporate Officer

**Subject:** April 2019 Strategic Planning Travel

---

### **Recommendations:**

**THAT the staff report entitled “April 2019 Strategic Planning Travel” be received for information.**

---

### **PURPOSE:**

The purpose of this report is to provide travel details to the Board of the North Coast Regional District (NCRD) with respect to its April 26-28, 2019 travel to Masset, B.C.

### **BACKGROUND:**

At its Regular meeting held February 22, 2019, the Board of the NCRD resolved to hold its April 26, 2019 Regular meeting in the Village of Masset, with a subsequent strategic planning session to be held April 27-28, 2019 at the Hiellen Longhouses.

## **DISCUSSION:**

### **Mainland Director Travel**

Mainland Director travel to Haida Gwaii has been confirmed with Ocean Pacific Air. Travel details are as follows:

<b>To Masset (Departure)</b>		<b>To Prince Rupert (Return)</b>	
<u>Friday, April 26, 2019</u>		<u>Sunday, April 28, 2019</u>	
1:00PM	Depart from Prince Rupert	2:00PM	Depart from Masset
1:45PM	Arrive in Masset	2:45PM	Arrive in Prince Rupert

Note that travel times with Ocean Pacific Air are flexible and may be adjusted upon request. Please pack light!

### **Strategic Planning Session**

Allan Neilson, MPA, Neilson Strategies Inc. has been selected as the facilitator of the **Board's strategic planning session.**

The strategic planning session will take place all day on Saturday, April 27, 2019, and a half day on Sunday, April 28, 2019.

In anticipation of developing the 2018-2022 NCRD Strategic Plan, Staff have circulated to the Board, for its information, the 2014-2018 NCRD Strategic Plan.

### **Accommodation**

The group longhouse at Hiellen can accommodate up to 20 guests at one time. There are 10 rooms with a single bunk in each room. The group longhouse has a fully-stocked, central kitchen with a cook top. The group longhouse has 2 bathrooms – one equipped with a hot water shower, toilet and sink, and the other is equipped with a solar shower, toilet and sink.

The small longhouses at Hiellen include a queen bed and single bunk bed, which can comfortably sleep 4 guests. The small longhouses include a gas stove-top, cooking utensils, bathrooms, running water, a small propane fridge and a wood-burning fireplace.

Note that Hiellen does not provide bedding or towels – Directors will need to ensure that these are brought with them. Alternatively, bedding and towel rentals may be purchased for \$20.

Should Directors have any additional questions with respect to accommodations at the Hiellen longhouses, please contact staff at the NCRD office.

### **Meals**

Staff is seeking direction from Directors with respect to any dietary restrictions to be considered throughout the weekend. Additionally, to accommodate catering, staff is seeking final numbers on guests attending with Directors.

At the time of writing this report, staff is in contact with Charters Restaurant to provide a catered dinner on the evenings of Friday, April 26 and Saturday, April 27, 2019. Further updates on menu selection will be provided to Directors, via email, prior to travel dates.

Staff will bring food supplies to accommodate Directors and guests throughout breakfast and lunch on Saturday, April 27 and Sunday, April 28, 2019.

### **RECOMMENDATION:**

Staff is recommending that the Board of the NCRD receive this report for information.



## Staff Report

---

**Date:** March 22<sup>nd</sup>, 2019

**To:** D. Chapman, Chief Administrative Officer

**From:** D. Fish, Corporate Officer

**Subject:** Results of the Alternative Approval Process (AAP) for the Regional Recycling Facility Capital Upgrades Loan Authorization Bylaw No. 626, 2018

---

### RECOMMENDATION:

**THAT the staff report entitled “Results of the Alternative Approval Process (AAP) for the Regional Recycling Facility Capital Upgrades Loan Authorization Bylaw No. 626, 2018” be received for information.**

---

### PURPOSE:

The purpose of this report is to provide the Board of the North Coast Regional District (NCRD) with the results of the Alternative Approval Process (AAP) conducted for the Regional Recycling Facility Capital Upgrades Loan Authorization Bylaw No. 626, 2018 (Bylaw 626, 2018).

### BACKGROUND:

At its Regular meeting held August 17, 2018, the Board of the NCRD supported an application to the Investing in Canada Infrastructure Program (ICIP) for the completion of capital upgrades to the Regional Recycling Facility (Project). At that time, Staff were

directed to prepare a loan authorization bylaw in the amount of \$500,000 to cover Project costs not recoverable through the ICIP application.

In September 2018, the Board of the NCRD passed three readings to Bylaw 626, 2018, with subsequent Ministerial approval being granted in November 2018.

At its Regular meeting held December 14, 2018, the Board of the NCRD, through resolution, established an AAP for Bylaw 626, 2018, which:

- Defined the service area comprised of the City of Prince Rupert, District of Port Edward and Electoral Areas A and C;
- Established an elector response deadline of February 28, 2019 at 4:00 p.m.;
- Established a notice of the AAP and supplemental elector response forms; and
- Established a fair determination of 10% of the total number of electors of the service area (916) as the elector response threshold.

### **DISCUSSION:**

In December 2018, the NCRD initiated the AAP process for Bylaw 626, 2018. As is legislatively required, residents were notified in consecutive issues of *The Northern View* (January 3 and 10, 2019) and provided ample opportunity to provide response prior to the deadline established for 4:00 p.m. on February 28, 2019.

The results included in the table below confirm that elector approval through the AAP for Bylaw 626, 2018 has been obtained.

10% of Electors within the Service Area	916
Number of Valid Elector Response Forms Received	0

At this time, the Board of the NCRD is able to move forward with adoption of Bylaw 626, 2018.

### **RECOMMENDATION:**

Staff is recommending that the Board of the NCRD receive this report for information. At the time Bylaw 626, 2018, is considered for adoption, the Board of the NCRD is within its legislative authority to do so.



## Staff Report

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**Date:** March 22<sup>nd</sup>, 2019

**To:** D. Chapman, Chief Administrative Officer

**From:** D. Fish, Corporate Officer

**Subject:** Haida Gwaii Tsunami Pole Project Update

---

### Recommendations:

**THAT the staff report entitled “Haida Gwaii Tsunami Pole Project Update” be received for information.**

---

### PURPOSE:

The purpose of this report is to provide an update to the Board of the North Coast Regional District (NCRD) with respect to the Haida Gwaii Tsunami Pole Project (Project). This report further presents a news release to be issued as a means of communicating the importance of the Project to NCRD communities.

### BACKGROUND:

In late 2016, working with the All Islands Emergency Planning Committee (Committee), a Master’s student from the Royal Roads University’s Disaster and Emergency Management program was hired to map the poles and develop tsunami signage as visual indicators of inundation and safe zones in communities across Haida Gwaii. In 2018, following approval of the NCRD Board, painting of the poles throughout Haida Gwaii

communities was completed based on the recommendations of the research report prepared for the Committee. In April 2019, the project will have reached its completion with the installation of metal informational signage installed along highways and main arterial roads.

## **DISCUSSION:**

### **Risk**

Haida Gwaii is an archipelago of islands located off of the west coast of northern B.C., and all communities on Haida Gwaii include areas that are identified as potential tsunami inundation zones. The directional tsunami signs are regular targets for theft and are expensive to replace. Both locals and tourists need to be aware of where the **“safe” zone is in the case of a tsunami hazard.**

### **Solution**

The Project aims to reduce the risk of injury and/or fatality in the event of a tsunami by utilizing existing infrastructure to paint visual indicators of inundation zones and safe zones in communities across Haida Gwaii. These visual indicators have been painted on BC Hydro utility poles to instruct visitors and residents on where the hazard zones are and where it is safe to go in the event of a tsunami.

The Project is the first of its kind. It is a collaborative project with involvement from the Province of B.C., BC Hydro, TELUS, local First Nations and local governments on Haida Gwaii.

Indonesia has a comparable tsunami awareness project that uses poles to bring awareness to tsunami risk; yet in Indonesia, the poles are meant to be memorial poles **whereas Haida Gwaii’s poles will indicate safe and hazard zones.**

The ***Tsunami Pole Project*** report (Attachment A) provides details of the project including a tsunami hazard and impact analysis for Haida Gwaii, processes involved in the research and development phase of the project, and recommendations for implementation. GIS mapping was completed to map the hazard and safe zones in each community and outline which poles to paint, as well as budgets for communities to implement the project.

In 2017, the Committee approved a change to a much simplified version of tsunami signage to facilitate expedient and efficient implementation.

- The “Tsunami Danger Zone” is indicated using a 12” blue band with a white arrow point in the direction of the safe zone. The white arrow has glass beads embedded for reflectivity.
- The “Tsunami Safe Zone” is indicated using a 2” blue band on the bottom and a 10” white band on the top. The white band has glass beads embedded for reflectivity.
- The Ministry of Transportation and Infrastructure (MOTI) sign department developed a graphic for a highway sign which will be placed at the entrance(s) of each community, and at the ferry terminals and airports.



Tsunami Danger Zone



Tsunami Safe Zone



Highway Signage

As part of the project, visitor information signs will be placed at each Visitor Information Centre and at all campgrounds on Haida Gwaii. These signs will provide information about the project and what visitors should do if a tsunami evacuation happens while they are visiting Haida Gwaii.

### **Implementation**

As the MOTI signage will be installed shortly, a grand opening event is being planned in conjunction with Tsunami Awareness Week in the second week of April 2019. The Committee is coordinating the attendance of Jennifer Rice, Parliamentary Secretary for Emergency Management BC, BC Hydro and TELUS representatives for a promotional event. At **that time, the participating Villages are planning “high ground hike” events** in each of their communities to allow residents and visitors to practice going from tideline to high ground following the signage.

In the case of the NCRD, where capacity to plan and attend high ground hikes in each community is limited, the attached press release (Attachment B) is being proposed to distribution to each community and the general public through online advertising. Additional information will be included on the NCRD website to supplement the information included in the attached press release.

**RECOMMENDATION:**

Staff is recommending that the Board of the NCRD receive this report for information.

# Tsunami Pole Project

An Innovative Approach to  
Tsunami Preparedness in  
Haida Gwaii

Carmin Moore

February 2017

## ACKNOWLEDGEMENTS

This project was made possible through funding from the Province of British Columbia and donations from BC Hydro and TELUS. There are several individuals and organizations that have contributed to the success of this project. I would like to thank O'Brien and Fuerst, AMS Building Centre, and Northern Development Initiative Trust for their in-kind donations to the project, as well as Ken MacPhail with Silvacre Inc, Ian Walker from the University of Victoria, and Owen Jones from the Council of the Haida Nation for providing the LiDAR data needed for this project. Furthermore, I would like to acknowledge Norm Wagner and Gidgalang Kuuyas Naay Secondary School for their assistance and express sincere gratitude to Alison Bird and Martin Scherwath, Earthquake Seismologists; and Tania Lado Insua with Ocean Networks Canada for their expertise, information, and support with the project.

There are many people who have been instrumental in the development of this project. I would like to give a special thank you to Larry Duke, Fire Chief and Emergency Coordinator who came up with the original idea, and Lori Wiedeman, Chief Administrative Officer for The Village of Queen Charlotte for her vision and leadership. I would also like to acknowledge the members of the Steering Committee, which included Emergency Management BC, the Haida and municipal Chief Administrative Officers or their delegates and the representatives from BC Hydro and TELUS for their support and input on the project. This project was a collaborative effort and could not have been completed without all of the key players involved.



Carmin Moore

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## EXECUTIVE SUMMARY

Haida Gwaii, an archipelago of islands located off the north coast of British Columbia is considered to be in a significant tsunami risk area. In some locations, residents of Haida Gwaii have expressed confusion regarding whether or not their homes or places of work are in a hazard zone, or they have developed some apathy towards tsunami risk due to local geographic features. Tsunami warning signs are frequently stolen and expensive to replace. Due to Haida Gwaii's tsunami risk and lack of signage, the tsunami pole project was developed. This project aims to increase tsunami preparedness by painting visual indicators of hazard and safe zones on utility poles and using communication tools to increase risk awareness.

This report provides details on Haida Gwaii's tsunami risk and the recommended safe planning levels as well as the research and development phase of the project and recommendations for project implementation. The recommended safe planning level for the north coast is 6 meters above sea level, however the LiDAR data acquired measures the topography from mean sea level and therefore the planning level of 10 meters was chosen to account for high tides. Maps were created for each community that outline the hazard and safe zones using the 10 meter elevation line and highlight the specific poles that will be painted.

There are several technical specifications determined in this report including stencil design, paint choice, and application methods. Through consultation with BC Hydro technical specialists, it was determined that the most optimal paint choice is an elastomeric paint. White elastomeric paint will be applied as a background on the pole and blue paint will be used with the stencil. The paint will be applied with a paint sprayer and the stencil will be strapped to the pole using ratchet straps. The stencil will be made out of aluminum and have a foam backing. Glass beads will be added to ensure reflectivity at night.

The communication strategy includes an infographic to promote the project, press release templates for each community to use during implementation, and a quick facts infographic on Haida Gwaii's tsunami risk that was developed in partnership with Ocean Networks Canada. The roll out of the project is planned to coincide with the "High Ground Hike" during Tsunami Preparedness Week in April.

This project was community driven and involved a steering committee that consisted of Haida and municipal Chief Administrative Officers or their



delegates, Emergency Management BC, BC Hydro, and TELUS. The Steering Committee met twice and provided input during the research and development phase. This report provides an implementation manual and budgets for each community. It is up to each individual community to utilize the information in this report and implement the project. The tsunami pole project hopes to build a more resilient and prepared Haida Gwaii in the event of a tsunami.

## TABLE OF CONTENTS

Acknowledgements.....	ii
Executive Summary.....	iii
Table of Contents.....	v
Background .....	1
Introduction .....	2
Section 1: Setting the Stage .....	3
Tsunami Hazard Analysis.....	3
Hazard Impact Analysis.....	3
Section 2: Research and Development.....	5
Haida Gwaii Preparedness Survey .....	5
Technical Specifications .....	5
Signs .....	5
Paint and Application.....	8
Testing Methods .....	10
Final Recommended Application Methods.....	14
Section 3: Implementation .....	15
Community Mapping and Budgets .....	15
Mapping .....	15
Budgets .....	17
Communications Strategy .....	18
Pole Project Infographic.....	18
Quick Facts Infographic.....	19
Press Releases.....	21
Section 4: Recommendations .....	22
Section 5: Conclusion.....	24
Appendix A: Stencil Graphics .....	25
Appendix B: Implementation Manual.....	28
Safety Recommendations for Implementation .....	30
Appendix C: Haida Gwaii Preparedness Survey .....	31
Appendix D: Quick Facts Infographic .....	34



Appendix E: Press Release Template ..... 35

Appendix F: Community Budgets..... 38

    Village of Queen Charlotte..... 38

    Skidegate..... 39

    Village of Masset/ Tow Hill ..... 40

    Old Massett..... 41

    Tlell/Sandspit ..... 42

    Village of Port Clements..... 43

References ..... 44



*“...Creating a good visual mark for safe relocation to high ground may help to save lives in the event the area faces a tsunami.” - Naomi*

*Yamamoto, Minister of State for Emergency Preparedness*

## BACKGROUND

Haida Gwaii, formally known to some as the Queen Charlotte Islands, is an archipelago of over 150 islands located off of the north coast of British Columbia. Haida Gwaii boasts natural landscapes with lush forests, ocean beaches, and matchless scenery giving it the nick name “the Galapagos of the north.” It is known for its unique ecosystems with species found nowhere else including distinctive sub-species of the saw-whet owl, the marten, and the largest black bear in the world (Parks Canada, 2012). Haida Gwaii (translated to Islands of the People) is rich in culture, art, and history and is a place unlike any other.

In 2012, a 7.8 magnitude earthquake occurred along the Queen Charlotte fault zone that ruptured Haida Gwaii and generated a tsunami with run-ups measured up to 13 meters in some areas (Fine, Cherniawsky, Thomson, Rabinovich, & Krassovski, 2015). This was Canada’s second strongest instrumentally recorded earthquake, the first largest also being in Haida Gwaii in 1949 with a magnitude of 8.1 (Fine et al., 2015).

Researchers have predicted that Haida Gwaii will experience much more seismic activity because of its location along the Queen Charlotte fault zone and Cascadia subduction zone and future strike-slip earthquakes similar to the 1949 event have a higher than average probability to occur in this area (Fine et al., 2015). Moreover, the underthrusting that is occurring beneath Haida Gwaii creates the potential for future large thrust earthquakes and along with them, tsunamis (Hyndman, 2015). With this impending tsunami risk, it is imperative that both residents and visitors alike are prepared and know where the hazard zones and safe zones are in the event of a tsunami.

Most residents and visitors know to go to high ground, but many are unsure how high they need to go and whether or not their work, school, or residence is in a safe zone. “Preparation is key to survival in the event of an earthquake or tsunami” (Government of British Columbia, 2015, p.1); with this in mind, the tsunami pole project was developed.



*“Earthquakes can pose a serious tsunami threat here on Haida Gwaii. This project is a great example of our communities working together to provide a clear indication of where the safe zones are.” - Greg Martin, Mayor, Village of Queen Charlotte*

## INTRODUCTION

The Tsunami Pole Project aims to reduce the risk of injury and/or fatality in the event of a tsunami by utilizing existing infrastructure to paint visual indicators of inundation zones and safe zones in communities across Haida Gwaii. These visual indicators will be painted on utility poles that will instruct visitors and residents on where the hazard zones are and where it is safe to go in the event of a tsunami.

The Tsunami Pole project is the first of its kind. It is an innovative and collaborative project with involvement from the Province of British Columbia, BC Hydro, TELUS, local First Nations and municipal governments including the Village of Queen Charlotte, Skidegate Band Council, the Village of Port Clements, the Village of Masset, Old Massett Village Council, and areas E and D of the North Coast Regional District. Indonesia has a comparable tsunami awareness project that uses poles to bring awareness to tsunami risk; yet in Indonesia, the poles are meant to be memorial poles whereas Haida Gwaii’s poles will indicate safe and hazard zones. Indonesia experienced a devastating tsunami in 2004 and in order to keep the tsunami risk fresh in the minds of residents, newly erected memorial poles that have indicators of the tsunami run-up levels in the area have been set up in communities across the city of Banda Aceh (Sugimoto, Iemura, & Shaw, 2010). Haida Gwaii’s Tsunami Pole Project utilizes existing infrastructure to maximize resources and prevent sign theft, which is common in the area and will paint markers indicating potential tsunami inundation and safe zones on utility poles in each community.

This report provides an overview of the project including a tsunami hazard analysis and impact analysis for Haida Gwaii, processes involved in the research and development phase of the project, and recommendations for implementation. Furthermore, GIS mapping was completed to map the hazard and safe zones in each community and outline which poles to paint, as well as budgets for communities to implement the project. Moreover, a communications strategy and marketing tools were developed to raise awareness and an implementation manual was developed for communities to follow.



# SECTION 1: SETTING THE STAGE

## TSUNAMI HAZARD ANALYSIS

The province of British Columbia is considered a high-risk area for earthquakes and more than 1200 earthquakes are recorded each year across the province, most of which are too small to feel (Government of British Columbia, 2015). However, the province has predicted that more large earthquakes capable of mass destruction are foreseeable in British Columbia's future (Government of British Columbia, 2015). Earthquakes can be followed by tsunamis depending on the location, epicenter, and type of the earthquake.

The islands of Haida Gwaii are situated along the Queen Charlotte fault zone between the Pacific and North American Plates. The Pacific and North American plates slide along each other on the Queen Charlotte fault zone and in some areas they press against each other causing pressure to build up (Hyndman, 2015). An earthquake is caused when the pressure is released. Haida Gwaii can be impacted by more than one tsunami-generating earthquake. It is part of its own tectonictsunami-generating regime called the Explorer segment and will also be impacted by the Cascadia earthquake (T. Lado Insua & M. Scherwath, personal communication, January 26, 2017).

## HAZARD IMPACT ANALYSIS

It has been recommended by Emergency Management BC for north coast communities including Haida Gwaii to plan for the potential tsunami wave weight of 2 metres with a run-up of 4 metres and a safety zone level at 6 metres (Emergency Management BC [EMBC], n.d.). These measurements are based on current science and scientific estimates of wave heights; yet because these levels are estimates, further research is needed to build accuracy (EMBC, n.d.). In order to gain accurate data on potential tsunami inundation levels, detailed tsunami inundation modeling is required.

The safe zone mark of 6 metres recommended by EMBC includes a fifty percent buffer to allow for non-tidal sea level rise and uncertainties in scientific estimates (EMBC, n.d.). Yet it is difficult to predict the exact potential tsunami run-up levels without tsunami inundation modeling. This may be of particular concern for coastal communities located in inlets. When a tsunami wave approaches an inlet, a resonance effect can occur, which happens when the size



of the wave and the size of the basin have a certain proportion to each other and can cause the wave to bounce off the basins and increase in size (T. Lado Insua, personal communication, December 12, 2016). The wave gets funneled in the inlet and water will pile up, getting trapped before it can escape the next incoming wave. This has occurred in Port Alberni, where the tsunami wave increased in size as it funnelled through the inlet (T. Lado Insua, personal communication, December 12, 2016).

In order for tsunami modeling to be completed, detailed topography and bathymetry of the area will be needed, along with earthquake modeling for Cascadia and the Explorer Segment. Ocean Networks Canada has several possible earthquake scenarios depending on the way the fault breaks. Using the earthquake scenarios, the bathymetry, and topography, a wave model can be run (T. Lado Insua, personal communication, December 12, 2016).



## SECTION 2: RESEARCH AND DEVELOPMENT

### HAIDA GWAII PREPAREDNESS SURVEY

A survey has been developed in order to hear from residents in each community regarding their tsunami preparedness. The survey can capture Haida Gwaii's tsunami risk perception and preparedness levels in order to improve emergency preparedness programs, gain community input, and measure the before and after picture of how the tsunami pole project may have impacted preparedness levels. The idea is that this survey can be conducted before the tsunami preparedness project is implemented and again after it has been implemented for approximately a year. The survey could also be completed only once after the project is implemented rather than before and after. Each community will launch the survey respectively and will determine when it will be launched. A copy of the survey can be found in [Appendix C](#) and a link to complete the online survey can be found here: <https://www.surveymonkey.com/r/PV6XLST>. A Privacy Impact Assessment for the survey has been completed.

### TECHNICAL SPECIFICATIONS

Several technical specifications need to be considered when implementing this project including sign specifications such as graphic design and stencil dimensions, height to place the signs on the poles, amount of poles to be painted in each community, paint type, and application methods. Several different testing methods were completed and documented and final technical specifications and application methods were determined.

#### SIGNS

It is imperative that the signs do not create any safety hazards and do not obstruct the utility poles to ensure the pole can be climbed by BC Hydro and TELUS workers. According to Work Safe BC (2012), section 19.4 of the *Occupational Health and Safety (OHS) Regulation* states:

- (1) Mailboxes, signs, clotheslines, or other obstructions are prohibited on or close to poles on which workers are required to work.
- (2) Tags authorized by the owner which are placed on a pole for identification purposes must be less than 1.7 m (5.5 ft) above grade, on the side of the pole which a climbing worker will face.

### Purpose of guideline

The purpose of this guideline is to clarify the application of section 19.4 of the *Regulation* to utility poles.

### Interpretation

This section of the *Regulation* is intended to keep wooden utility poles clear of obstructions to ensure a safe climbing area for workers. It does not apply to poles which are not climbed by workers. The owner of a pole may also have restrictions and requirements and should be contacted before placing any object on or close to a pole.

Painting the poles using a stencil is the best way to get around this issue. The paint will not obstruct the poles and will leave it clear for workers to climb them if ever needed.

### GRAPHIC DESIGN

In order to paint the utility poles, stencils were created that can be strapped on to the poles using ratchet straps for painting. The graphic designs for the stencils were created by Kim Hayhurst of Northern Development Initiative Trust and were based on the province of British Columbia's standard tsunami hazard symbol as seen to the left (Government of British Columbia, 2015). The stencils are made out of 0.040 thick aluminum with a foam backing. Aluminum is used



as it is firm enough to hold the intricate design and handle being painted over. The aluminum will be curved to hug the pole and the foam backing will ensure a snug fit to the pole and collect any dripping paint. Five different stencils with specific messaging were created. See [Appendix A](#) for graphic images of the stencils.

### STENCIL DIMENSIONS

BC Hydro poles vary in size dimensions according to the class and type of the pole. All Hydro poles are largest at the base and gradually get smaller towards the top. The optimal placement of the sign as detailed later on, is approximately 6 feet above the butt of the pole.

There are two different pole types that BC Hydro uses for poles: western cedar and lodge pole pine. Each pole type has six different class types and they vary in size according to class. As depicted in Table 1 and 2 below, the total average circumference of all class types for western cedar Hydro poles at 6 feet above the butt is 42 inches. The total average circumference for the lodge pole pine at 6 feet above the butt is 39 inches. Considering class 2 and 3 of both pole types

are the largest and most commonly used, and the dimensions are based on the minimum circumference, it has been determined to base the stencil dimensions on an average circumference of 46 inches. This was calculated by determining the average of both pole types in class 2 and 3, which is 45.25 inches and then rounded up to the nearest whole value.

With the average circumference of the hydro poles being 46 inches at around the 6 foot mark, the average diameter of the poles is 14.64 inches. To optimize visibility, the signs should be approximately 13 inches in width and 30 inches in height.

*“BC Hydro supports efforts to help the residents of coastal communities be better prepared for the possibility of a seismic event. This initiative will provide guidance and clarity during tsunami events when a quick response is essential for the safety of those involved.” – Hugo Shaw, Senior Vice President, BC Hydro*

**Table 1**

<b>Western Red Cedar Poles (Fibre Stress 5600 psi)</b>						
<b>Demensions at Top and 6 ft from Butt</b>						
<b>Class</b>	1	2	3	3	5	6
<b>Min. Top Circumference (in)</b>	27	25	23	21	19	17
<b>Length (ft)</b>	<b>Min. Circumference 6 ft. from Butt (in.)</b>					
30	40	37.5	35	32.5	30	28
35	42.5	40	37.5	34.5	32	30
40	45	42.5	39.5	36.5	34	31.5
45	47.5	44.5	41.5	38.5	36	33
50	49.5	46.5	43.5	40	37.5	
55	51.5	48.5	45	42		
60	53.5	50	46.5	43.5		
65	55	51.5	48	45		
70	56.5	53	49.5	46		
75	58	54.5	51			
80	59.5	56	52			
85	61	57	53.5			
90	62.5	58.5	54.5			
<b>Average Circumference:</b>	<b>52.46154</b>	<b>49.23077</b>	<b>45.92308</b>	<b>39.83333</b>	<b>33.9</b>	<b>30.625</b>

Table 1. The information in this table was provided by BC Hydro. The table details the dimensions for the Hydro poles that are made with western red cedar by class type. The total

average circumference of all pole types is 42 inches. Class 2 and 3 are most commonly used in Haida Gwaii for an average circumference of 47.5 inches.

Table 2

Lodge Pole Pine (Fibre Stress 6600 psi)						
Dimensions at Top and 6 ft from Butt						
Class	1	2	3	3	5	6
Min. Top Circumference (in)	27	25	23	21	19	17
Length (ft)	Min. Circumference 6 ft. from Butt (in.)					
30	39	36.5	34	31.5	29	27
35	41.5	38.5	36	33.5	31	28.5
40	44	41	38	35.5	33	30.5
45	46	43	40	37	34.5	32
50	48	45	42	39	36	
55	49.5	46.5	43.5	40.5		
60	51.5	48	45	42		
65	53	49.5	46	43		
70	54.5	51	47.5	44.5		
Average Circumference	47.44444	44.33333	41.33333	38.5	32.7	29.5

Table 2. The information in this table was provided by BC Hydro. The table details the dimensions for the Hydro poles that are made with lodge pole pine by class type. The total average circumference of the poles in Table 2 is 39 inches. Class 2 and 3 are most commonly used in Haida Gwaii for an average circumference of 43 inches.

## PAINT AND APPLICATION

### PAINT TYPE

Hydro poles are treated with two types of preservatives depending on the pole. Poles that are a slight green in colour are most likely treated with CCA, which is water-based preservative that gives a hard finish. The poles that are more of a honey brown in colour are most likely treated with pentachlorophenol, which is an oil-based preservative.

It is important for the safety of workers who have to climb the hydro poles to have a surface to climb that is not slippery or hard in order for their boots to grip the pole. There is one type of paint that will adhere to the treated wood



poles and not create a slippery surface for workers. The recommended paint to use is an elastomeric paint. After researching elastomeric paint types, it was determined that there are two types of elastomeric paint that works well on wood surfaces and can be tinted in both blue and white: Deck and Dock Coating by SuperDeck® and Elasto-wall, General Paint. “The Superdeck® Deck and Dock elastomeric coatings work best on wood, concrete and composite decking that has been severely damaged. It resurfaces and waterproofs in one product. Its flexible formula is designed to withstand temperature changes so that it expands and contracts with the substrate while not compromising on protection” (Sherwin-Williams, 2017).

The paint needs to be reflective and unfortunately there is currently not a reflective elastomeric paint on the market in Canada. Therefore, in order for the signs to be reflective, glass beads can be used on top of the paint to create a reflective surface. The glass beads create a rough surface to the poles and should be easy for workers’ boots to grip.

### HEIGHT OF SIGNS

The signs need to be painted above six feet because BC Hydro tests the poles below the six feet mark. Moreover, there are pole identification tags around the six foot eleven inch mark on every hydro pole and these cannot be covered. The maximum height of the signs cannot exceed ten feet below the neutral wire or five feet below the TELUS wire, which is the lowest wire on the pole due to safety concerns for those painting. Workers painting the poles need to be clear of the wires by a minimum of five feet.

The optimal height of the signs will be similar to that of a traffic sign in order for signs to be viewable by the headlights of vehicles driving by. Signs need to be in the driver’s field of vision in order to be effective and grab attention (Ministry of Transportation and Highways, 2000). The Ministry of Transportation and Highways (2000) asserted that the bottom of a sign should be placed 1.5 meters above the edge of the road. This can be increased to a maximum of 2 meters above the road edge for special circumstances. Considering BC Hydro requires the signs to be painted above the 6 feet mark on the pole, signs should be placed at around 2 meters (6.5 feet) above road level. The Hydro poles where the butt of the pole is below road level may be painted closer to the 1.5 meter line as long as this is above 6 feet on the pole.

### AMOUNT OF PAINTED POLES

Hydro poles that are located on street corners of intersections will be painted with directional arrows pointing to the safe zones. Depending on the length of

the street, one or two poles will be painted mid-street indicating you are in a hazard zone and to continue to the safe zone.

According to the Ministry of Transportation and Highways (2000), improper or excessive use of signs can lead to desecration of signs, detract from their effectiveness, and/or lead to non-compliance of signs. Therefore, sign placement needs to be strategic and not overdone. It is also imperative that the signs do not distract from other important traffic signs and are not placed next to other road warning or regulatory signs. Signs should also not be placed in such a way that parked vehicles will block sign visibility (Ministry of Transportation and Highways, 2000).

## TESTING METHODS

BC Hydro donated some poles that could be used for testing. The poles used for testing were six feet and 8 feet in height and were old hydro poles that were taken down and replaced. TELUS also donated some poles that were still in the ground in the Village of Queen Charlotte that were ready to be removed and replaced.

### TEST #1

Materials: 2" paint brush, dry pentachlorophenol treated Hydro pole, white and blue elastomeric paint, glass beads, NAPA Ultra Pro Gravity Feed Sandblaster, stencil #2 as seen to the left in Figure 1 made with polystyrene (stencil dimensions: 16.5" by 45") .

The first test was completed to inquire whether or not the glass beads will stick to the paint and what the best application method is. A 2 inch paint brush was used to apply the paint. The brush did not get into the wood grain properly and also slipped under the stencil at some points creating a messy look. The paint also bled outside of the stencil because it needed a heavy application to get into the wood grain and the stencil did not sit flat against the pole (see Figure 2). It was determined that a paint sprayer will be needed to get an accurate consistency of paint applied into the wood grain and provide a cleaner look.

Considering the stencil did not fit flat to the pole, it was concluded that the stencil needs to be made in a firmer material that will keep its shape when bent around the pole. Moreover, it was determined that the stencil was too large and needs to be scaled down and other minor adjustments made. The symbol in the stencil overwhelmed the sign and therefore a stencil with a smaller symbol will be made so that the words are the focal point. Also, the letters were a bit too fat, particularly on the tsunami word; they tended to blob

Figure 1



Figure 1. This is stencil design #2. Graphic was created by Kim Hayhurst and used in Test #1.

**Figure 2**



together a bit on the "S" once the paint was applied. The stencil needs to have thinner letters to provide cleaner lines.

The glass beads were first applied by blowing them on, which did not allow for enough coverage. The beads were then applied using a sandblaster, which at first blew off the paint from the high pressure and the beads would bounce off the poles rather than sticking to the paint. After lowering the PSI levels in the compressor and only lightly pressing the trigger on the sandblaster gun, the beads came out softly and were distributed well. It is important to note that the paint dries quickly and so the beads need to be applied immediately after the paint so they adhere. The sandblaster also speeds up the drying time so this needs to be done as quickly as possible.

*Figure 2.* This is a picture of the result of test #1.

### TEST #2

Materials: CCA treated Hydro pole that was sprayed with water 24 hours before paint application, white and blue elastomeric paint, glass beads, NAPA Ultra Pro Gravity Feed Sandblaster, 2" paint brush.

**Figure 3**



*Figure 3.* This is a picture of the pole painted with both white and blue paint and coated in beads. The picture was taken without a flash in order to compare the difference with a flash as seen in Figure 4.

**Figure 4**



*Figure 4.* This is the same pole in Figure 3 above except the picture was taken with the flash on in order for the beads to reflect off the flash for the picture. The reflectivity of the beads is shown well in this picture. This picture also highlights that the beads can appear a bit splotchy if not evenly distributed before the paint dries. It is important to apply the beads generously and as quickly and evenly as possible.

**Figure 5**



*Figure 5.* After applying one coat of paint and one coat of glass beads, a second coat of paint along with a second layer of glass beads was applied with a 24 hour dry time in between coats. Figure 5 is a picture taken with the flash after the second coat.

### TEST #3

Materials: slightly damp pentachlorophenol treated Hydro pole that was sprayed with water 24 hours before paint application and lightly misted immediately before application, white and blue elastomeric paint, glass beads, NAPA Ultra Pro Gravity Feed Sandblaster, 2" paint brush.

This test was completed to test the paint on a damp pole and see how it stands up to harsh weather conditions. The pole was placed outside and over 2 months' time it has endured hail, rain, snow, sun, and strong winds. The paint and glass beads seem to have endured the weather quite well and are still in the same condition as they were when first applied.

**Figure 6**



*Figure 6.* This is a picture of the honey brown Hydro pole painted with the blue paint and coated in glass beads. As depicted in the picture, as the paint got thinner near the end, the glass beads did not adhere as well. The reflectivity of the beads can only be seen near the bottom before the paint thins out.

#### TEST #4

Materials: slightly damp pentachlorophenol treated Hydro pole that was cut off from the top of a pole and brought down for testing, white and blue elastomeric paint, glass beads, NAPA Ultra Pro Gravity Feed Sandblaster, paint sprayer, stencil #1 in aluminum with ¼ inch rubber foam backing, plastic drop sheet, and Velcro straps.

*Figure 7.* Figure 7 is the result of test 4. The letters in the stencil turned out a bit blurry due to the small circumference of the pole. The stencil still did not quite sit flat to the pole.

#### TEST #5: FINAL TEST

Materials: slightly damp pentachlorophenol treated Hydro pole that was still in the ground outside in the community, white and blue elastomeric paint, glass beads, NAPA Ultra Pro Gravity Feed Sandblaster, paint sprayer, stencil #1 in aluminum with ¼ inch rubber foam backing, plastic drop sheet, and ratchet straps.

**Figure 7**



**Figure 8**



*Figure 8.* This is a picture of the final test. The white background with the blue graphic seems to work best. The graphic is clear and the letters are clear and clean with a tiny bit of overspray. The pole used for this test is quite a bit smaller than the majority of the poles on Haida Gwaii. A pole that is a bit bigger will be optimal for use with the stencil. It was determined that the final stencil will be made with a ½ inch foam backing to add a little extra cushion for molding to the pole.

## FINAL RECOMMENDED APPLICATION METHODS

After several tests were conducted, optimal application methods were determined. Please see the Implementation Manual in [Appendix B](#) for more details on application.

### STENCILS

The stencil can be strapped on to the pole using a ratchet strap on the top and bottom of the stencil. Use the ratchet to pull the stencil as tight as possible around the pole. Once the stencil is in place, use a hammer and nails and hammer a nail through the nail holes on either side of the stencil so that the top of the hole rests on the nail. When you are finished painting, remove the stencil but leave the nails in place; this will help in re-anchoring the stencil in the same place for applying the second coat. It is important to note that the nails cannot be left in the poles for long due to safety concerns and must be removed immediately after painting the second coat.

### PAINT

Paint should be applied with a paint sprayer. The paint needs to be applied thick and it is recommended that 2 coats are applied for longer wear.

### GLASS BEADS

The glass beads can be applied using a sandblaster immediately after the second coat of paint is applied. The sandblaster used in the research phase was a NAPA Ultra Pro Gravity Feed Sandblaster. The PSI on the compressor needs to be reduced to approximately 70 PSI in order to get a light pressure from the gun. The trigger cannot be pressed all the way and needs to be pressed lightly for the beads to come out softly. If pressure is too high, the beads will shoot out, bounce off the poles, and even remove the paint.

## SECTION 3: IMPLEMENTATION

### COMMUNITY MAPPING AND BUDGETS

#### MAPPING

Using ArcGIS software, each community's tsunami hazard zones and safe zones were mapped out. In order to determine the zones, LiDAR data was used, which is a survey method that measures topography using laser light. LiDAR provides the most accurate digital elevation model possible. Using LiDAR data to map out which utility poles will be painted, ensures accuracy and efficiency. The LiDAR data used measures the topography from mean sea level.

Figure 9

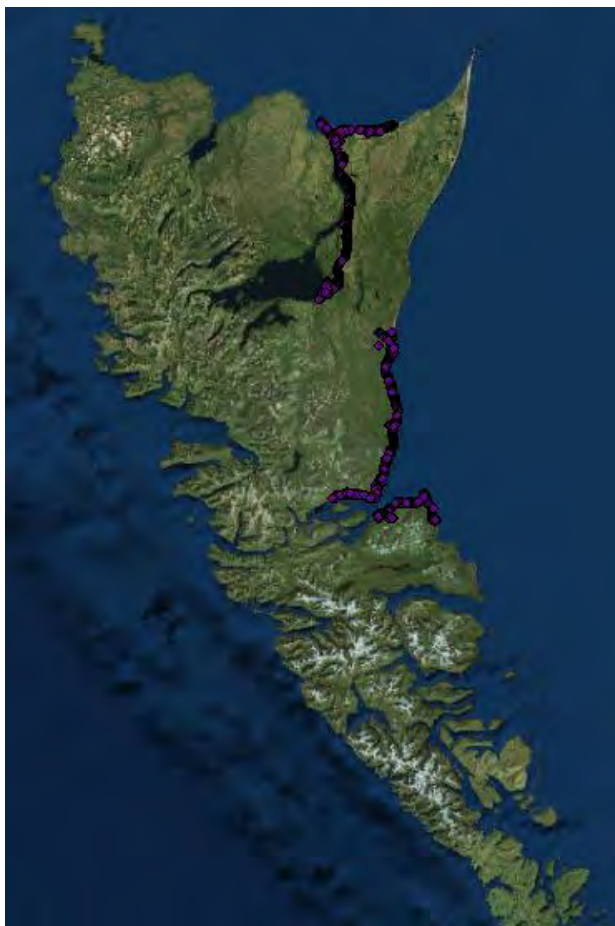


Figure 9. Map of all the BC Hydro poles on Haida Gwaii. The purple dots are utility poles.

The LiDAR data for Old Massett, Masset, and Tow Hill was provided by Owen Jones from the Council of the Haida Nation and was originally obtained by Ian Walker from the University of Victoria. The LiDAR data for Queen Charlotte, Skidegate, Tlell, and Sandspit was provided by Ken MacPhail from Silvacre Inc. LiDAR for the Port Clements forestry area was provided by Silvacre; however, there is no data available for the populated community areas. Port Clements may be flown for LiDAR later this year. The LiDAR data acquired measures the topography from mean sea level. The recommended safe planning level for the north coast is 6 meters above sea level; therefore in order to account for high tides, a planning level of 10 meters was chosen. Maps were created for each community that outlines the hazard and safe zones using the 10 meter elevation line and highlights which poles to paint the signs on. The pole maps created are to be used as a guide and community leaders can determine if they would like all the recommended poles painted or to reduce the amount of poles suggested. It is not

recommended to paint more poles than the pole map suggests because according to the Ministry of Transportation and Highways (2000) too many signs may lead to non-compliance.

While mapping the pole locations for Old Massett, a safe zone area spanning just over a block was found on Eagle Avenue. This area is over the 10 meter elevation line and some parts of this block are between 11 and 12 meters above mean sea level. The tsunami pole map created for Old Massett indicates to paint safe zone signs on the poles in this area, however it is left to the community to decide whether or not they would like their residents evacuating to this area or would prefer to keep them evacuating out of town.

The community maps that were created are not included in this report due to size of the maps and have been provided to each individual community directly along with an excel spreadsheet that details the pole identification number (BC Hydro's identification number that is on a yellow tag on the pole), location of the pole, and stencil number to cross reference with the map.

**Figure 10**



*Figure 10.* This image is an aerial view of the section of Old Massett that has a strip of land above the 10 meter elevation line. The small blue squares are the poles that could be painted with the safe zone stencil. The green, orange, and red squares are poles that can be painted with the hazard stencils.

## BUDGETS

Budgets have been created for each unique community based on the estimated costs it may take to implement the project. The budget estimates provided are based on the amount of poles recommended to paint as outlined in the pole maps. Each community has a different number of poles that can be painted. The costs of labour in the budgets are calculated by adding the approximate cost per hour to paint the amount of poles in the pole map. This includes the first coat of paint for the background around the pole, which is calculated at 2 hours per pole. The first coat will take longer than the second because the area to be painted will need to be tapped off and the pole will need measuring for accurate placement of the paint, as well as measuring the distance above the edge of road; this process will need 2 workers. The second coat including the 2 coats using the stencil will be twice as fast. Table 3 provides an example of how the hours of labour were calculated. It is also important to note that the items listed in the budgets are estimates and prices may vary when purchasing. The budgets for each community can be found in [Appendix F](#).

**Table 3: Hours of labour**

<b>First coat of paint for background around the pole</b>	
Number of Poles	44
Poles per hour	2
Hours of labour	22 or 3 days at 7 hrs/day
<b>Second coat of paint for background</b>	
Poles	44
Poles per hour	4
Hours of labour	11 or 1.5 days at 7 hrs/day
<b>First and second coat using stencils</b>	
Poles	44
Poles per hour	4 (x2 for 2 coats)
Hours of labour	22 or 3 days at 7 hrs/day
<b>Total Hours of labour</b>	55

*Table 3.* This chart was used to calculate the estimated hours it may take to have the poles painted. This chart was used to calculate the hours of labour for all communities.



## COMMUNICATIONS STRATEGY

With the support of Emergency Management BC's Government Communications and Public Engagement department, initial communications were generated by means of a press release and news reports. These reports include a press release from the Government of British Columbia, which can be found here: <https://news.gov.bc.ca/releases/2016TRAN0382-002570>; an article in the Haida Gwaii Observer, which can be found here: <http://www.haidagwaiiobserver.com/news/407095466.html?mobile=true>; and a radio interview and written article with CBC radio, which can be found here: <http://www.cbc.ca/news/canada/british-columbia/tsunami-warnings-utility-poles-1.3886280>

Further to the above media coverage, two infographics have been created to bring awareness to the project before and during implementation and to increase tsunami risk perception. Moreover, press release templates have been drafted for each community to use when they are ready to implement the project in their community. The strategy for these communication tools are outlined below.

### POLE PROJECT INFOGRAPHIC

This infographic has been created in partnership with Emergency Management BC's design unit.

#### AUDIENCE

The general public: primarily residents and visitors of Haida Gwaii.

#### OBJECTIVES

For residents and visitors of Haida Gwaii to understand the tsunami risks that are present, become knowledgeable on the tsunami pole project, and be prepared on what to do in the event of a tsunami.

#### KEY MESSAGES

1. How Haida Gwaii is getting prepared: tsunami pole project
2. What to do in the event of a tsunami: Follow utility poles to high ground
3. Promote Tsunami Preparedness Week (second week in April). Possibly promote the High Ground Hike.



## COMMUNICATION CHANNELS

1. Haida Gwaii Facebook pages and groups, municipal websites, community halls/ events (printed copies), the Observer newspaper, Haida Gwaii Trader, CBC Radio.
2. Businesses to have printed copies available: Ferry terminals, airports, hospitals, RCMP stations, BC Ambulance Services, fire departments, hotel and B&B operators.

## INFOGRAPHIC LAYOUT

- The infographic will have an image that describes what to do in an earthquake and tsunami and will highlight the tsunami pole project with a graphic showing a stick person or persons hiking to high ground, following the signs on utility poles to safety. EMBC's Graphic Design Unit will assist with the design elements of the infographic.
- It will also have a short blurb on the project that will state: "Haida Gwaii in partnership with BC Hydro and Telus is increasing tsunami preparedness with signs on utility poles to direct people to safety."
- This page could also potentially have other brief points such as: Tsunami waves may arrive within minutes, do not wait for official warnings; take only a 72 hour emergency kit, do not take time to pack. Yet we do not want too many words to detract readers attention from the main points.
- At the very bottom of the document there will be logos of all involved stakeholders as a small border.

## QUICK FACTS INFOGRAPHIC

### AUDIENCE


The general public: primarily residents and visitors of Haida Gwaii and those doing the High Ground Hike in April.

### OBJECTIVES

For residents and visitors of Haida Gwaii to understand the tsunami risks that are present, and be prepared on what to do in the event of a tsunami. This infographic will include quick facts about tsunami risk on Haida Gwaii including some stats from past earthquakes and some myths about inlets being protected from tsunamis.

### KEY MESSAGES

1. Haida Gwaii is at risk of tsunami.

- 
2. Promote tsunami preparedness.
  3. Promote Tsunami Preparedness Week (second week in April). Possibly promote the High Ground Hike.


### COMMUNICATION CHANNELS

1. Haida Gwaii Facebook pages and groups, municipal websites, community halls/ events (printed copies). Disseminate this infographic during Tsunami Preparedness Week in the second week of April.
2. Hand out to people during the High Ground Hike.

### CONTENT: QUICK FACTS

The quick facts listed below were created in partnership with Ocean Networks Canada.

- Canada's 1<sup>st</sup> and 2<sup>nd</sup> largest instrumentally recorded earthquakes occurred on Haida Gwaii (Fine, Cherniawsky, Thomson, Rabinovich, & Krassovski, 2015).
- The 2012 magnitude 7.7 earthquake was Canada's 2<sup>nd</sup> largest instrumentally recorded earthquake followed by a tsunami on the west coast of the islands with run-ups measured up to 13 meters high (Fine et al., 2015; Hyndman, 2015).
- Current scientific research involves estimating future earthquake and tsunami impacts from several various possible event scenarios (T. Lado Insua, personal communication, December 12, 2016).
- Oral First Nations stories and written records from Japan confirm that the last rupture of the Cascadia fault happened in January 1700, with an estimated earthquake magnitude of 9 followed by a large tsunami (Leonard, Rogers, & Mazzotti, 2013).
- These Cascadia earthquakes occur every 300-600 years and can happen any time (Leonard et al., 2013).
- Haida Gwaii will be impacted by the Cascadia earthquake but is also part of its own tectonic tsunami-generating regime (called Explorer segment), as we have seen in 2012.
- The tsunami hazard for potentially damaging run-up (at least 1.5 m) of the outer Pacific coastline of Canada is approximately 40–80% in 50 years (Leonard et al., 2013).
- **Myth:** Inlets are protected from tsunamis and are not at risk  
**Reality:** Tsunami waves can get bigger in inlets because the waves amplify due to the shape of the inlet. Port Alberni on Vancouver Island is an example of a location where tsunami amplification occurs.

- 
- **Other Messages:** ARE YOU PREPARED? Do you have a 72 hour emergency kit ready to grab and go?

The completed Quick Facts Infographic can be found in [Appendix D.](#)

## PRESS RELEASES

### AUDIENCE

General public including politicians and government representatives

### OBJECTIVES

1. For politicians and other governments to be knowledgeable on the tsunami pole project and possibility of implementation in other coastal communities.
2. For other coastal communities to become aware of the project and understand the benefits of implementing it in their own communities.
3. Draw awareness to the general public in Haida Gwaii regarding the project and tsunami risk.

### KEY MESSAGES

1. Haida Gwaii is at risk of tsunamis
2. Tsunami pole project aims to prepare residents and prevent harm in the event of a tsunami
3. Details on pole project: where and when it will be implemented.

### COMMUNICATION CHANEL

1. Direct email to politicians
2. The Province of British Columbia website, CBC radio, Observer, municipal websites, Facebook, other media outlets.

### LAYOUT

This will be a press release template for each community/municipality in Haida Gwaii to use to share about the project and when they are planning on implementing it in their communities.

The press release templates can be found in [Appendix E.](#)



## SECTION 4: RECOMMENDATIONS

1. **Further research: Tsunami inundation modeling for all communities on Haida Gwaii.**

Considering the safe zones and hazard zones in Haida Gwaii are based on estimates and there are no tsunami inundation models to refer to for accuracy, it is recommended that an expert is hired to create tsunami models for each community.

In order to complete tsunami inundation models, each community will need all possible earthquake scenarios, along with bathymetry and topography of the area (T. Lado Insua, personal communication, December 12, 2016).


Tania Lado Insua, an Ocean Analytics Program Manager with Ocean Networks Canada is running a model for Port Alberni that uses nested grids. A grid for the bathymetry is used that starts out very coarse and is then refined bit by bit at each step until a grid size of 12m is reached (T. Lado Insua, personal communication, December 12, 2016). Ocean Networks Canada is working on providing the Village of Queen Charlotte with a quote on the cost of getting inundation modeling completed. Possible funding streams to have the tsunami inundation modeling completed include: the National Disaster Mitigation Program through the federal government and the Municipalities for Climate Innovation Program (MCIP) through the Federation of Canadian Municipalities.

2. **Implement the project in each community before or close to Tsunami Preparedness Week in April.**

Tsunami Preparedness Week occurs in the second week of April every year. Having the project implemented before this week may help with promoting the project as it is rolled out and could encourage residents to join in on the “High Ground Hike” during Tsunami Preparedness Week.

3. **Disseminate the pole project infographic immediately after and possibly during implementation.**

The pole project infographic will describe the project and encourage residents to follow the signs on utility poles to safety. Disseminating this



infographic during and immediately after the poles are painted will assist in public awareness of the project.

4. **Disseminate the Haida Gwaii Preparedness survey before the project is implemented and again after with about a year in between.**

Disseminating the survey before the project is implemented will provide a more accurate picture of the community's preparedness levels. Moreover, the survey provides an avenue for community members to contribute and provide input on emergency programs; when people are consulted and feel as though they are a part of something, they are more likely to support it and take ownership of it.

After the project has been implemented for approximately one year, disseminate the survey again to gain an accurate picture of how the project has impacted tsunami preparedness and risk perception.

5. **Disseminate the quick facts infographic during Tsunami Preparedness Week in April and after the Haida Gwaii Preparedness Survey is completed for the first time.**

The quick facts infographic aims to increase tsunami risk perception in Haida Gwaii. It would be strategic to utilize Tsunami Preparedness Week in April to disseminate this document. It can also be handed out to people doing the High Ground Hike.

6. **Disseminate community specific press releases within a few weeks before the project is implemented in the community.**

The press releases will inform the community about the project and when it will be implemented. It is important to do this before the project is implemented so the community is well informed and ready for the change before they start seeing the signs being painted in their community.

For safety recommendations, see the implementation manual in [Appendix B](#)



## SECTION 5: CONCLUSION

The tsunami pole project is an innovative approach to tsunami preparedness in Haida Gwaii. This project aims to reduce the risk of injury and/or fatality in the event of a tsunami and increase tsunami preparedness by painting visual indicators of hazard and safe zones on utility poles.

This report details Haida Gwaii's tsunami risk and the recommended safe planning levels, the research and development of the project including technical specifications, community maps, a communications strategy, recommendations for project implementation, an implementation manual, and community specific budgets. This project was community driven and involved a steering committee that consisted of Haida and municipal Chief Administrative Officer's or their delegates, Emergency Management BC, BC Hydro, and TELUS.

This report provides an overview of the project and it is up to each individual community to utilize the information in this report and implement it. This project hopes to build a more resilient and prepared Haida Gwaii in the event of a tsunami.

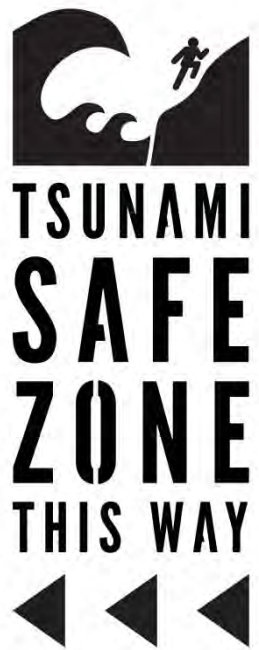
## APPENDIX A: STENCIL GRAPHICS

### Stencil 1.R



*Stencil 1.R.* Graphic by Kim Hayhurst, Northern Development Initiative Trust. This graphic will be used on poles located in intersections where the traffic would be turning right to head to the tsunami safe zones. The dimensions of the stencil for this graphic are 12" by 30".

### Stencil 1.L



*Stencil 1.L.* Graphic by Kim Hayhurst, Northern Development Initiative Trust. This graphic will be used on poles located in intersections where the traffic would be turning left to head to the tsunami safe zones. The dimensions of the stencil for this graphic are 12" by 30".

### Stencil 1.F



*Stencil 1.F.* Graphic by Kim Hayhurst, Northern Development Initiative Trust. This graphic will be used on poles located in between intersections where the traffic would be going straight to head to the tsunami safe zones. The dimensions of the stencil for this graphic are 12'' by 30''.

### Stencil 2



*Stencil 2.* Graphic by Kim Hayhurst, Northern Development Initiative Trust. This graphic will be used on poles in the safe zone to indicate you are now in a safe zone. The dimensions of the stencil for this graphic are 12'' by 30''.

### Stencil 3



*Stencil 3.* Graphic by Kim Hayhurst, Northern Development Initiative Trust. This graphic will be used on poles in locations where there is no street going up. The dimensions of the stencil for this graphic are 12" by 30".



## APPENDIX B: IMPLEMENTATION MANUAL


### SUPPLIES AND EQUIPMENT

You will need:

1. Protective eyewear
2. Painting smock or clothing that can get paint on it
3. Paint sprayer
4. Paint- white and blue elastomeric paint
5. Stencils- 5 different stencils
6. Measuring tape
7. Chalk (one piece)
8. Sandblaster
9. Glass beads
10. Sheets of drop cloth or plastic
11. Compressor
12. Generator
13. Thumb tacks
14. Nails and hammer
15. Extension cord
16. Ratchet straps (at least 2)
17. Tsunami pole map
18. Step ladder and/or ladder fly

### PAINTING THE POLES


1. Use the tsunami pole map for your community to determine which poles to paint. This map is to be used as a guide only. Some poles may not be possible to paint depending on their placement in the bank or may not be visible due to trees. If a pole has a large red circle painted on it, do not paint this pole; instead find another pole nearby that could be painted. The red circle is an indication that BC Hydro has condemned that pole and will soon be replacing it.
2. Measure the pole for sign placement. The sign should be between 1.5 and 2 meters above road level and approximately 6 feet from the butt of the pole as long as the sign will not cover any of BC Hydro and TELUS's identity tags. To measure the road level by the pole, 2 workers will be needed. One worker will need to hold the measure at 1.5 meters on the side of the road next to the pole and the other to mark it on the pole with chalk.

- 
3. Once the placement of the sign is measured and marked, the pole should be protected from overspray. To do this, sheets of plastic can be tacked to the pole with thumb tacks. One large sheet should go around the butt of the pole to catch any glass beads and overspray; a sheet of plastic about a foot wide can be wrapped around the top of where the sign will go (32 inches from the bottom piece of plastic); two strips of plastic 1 foot wide by 32 inches long can be tacked vertically along either side of where the sign will go (13 inches apart).
  4. First, put on protective eye wear. Then using the paint sprayer, paint the base for the sign with the white paint. Wait 24 hours before doing a second coat. Apply a second coat of white paint and immediately after paint is applied, quickly spray on the glass beads using the sandblaster. The compressor connected to the sandblaster needs to be at a low PSI- no more than 70 PSI. It is imperative to only lightly press the trigger on the sandblaster so the beads come out softly. Apply beads generously.
  5. Wait another 24 hours and apply the stencil. The stencil can be strapped on to the pole using a ratchet strap on the top and bottom of the stencil. Use the ratchet to pull the stencil as tight as possible around the pole. Once the stencil is in place, use a hammer and nails and hammer a nail through the nail holes on either side of the stencil so that the top of the hole rests on the nail. When you are finished painting, remove the stencil but leave the nails in place; this will help in re-anchoring the stencil in the same place for applying the second coat. It is important to note that the nails cannot be left in the poles for long (maximum of 24 hours) due to safety concerns and must be removed immediately after painting the second coat.

Once the stencil is in place, use the blue paint in the paint sprayer to paint over the stencil. Wait 24 hours before applying a second coat.

When you are ready to apply a second coat, place the stencil on the pole using the nails as markers and re-strap it securely with the ratchet straps. Once the stencil is neatly in place over the first coat of paint, apply the second coat. Immediately after applying the second coat, promptly apply the glass beads as in step 4 above.

6. Clean up. Be sure to remove all nails and tacks from the poles. Nails can be a hazard for BC Hydro and TELUS workers. Remove all plastic and leave area



clean. Stencils should be sprayed clean to avoid paint buildup. Clean all tools and equipment according to their manufacturing instructions.

## SAFETY RECOMMENDATIONS FOR IMPLEMENTATION

1. **Wear protective eyewear as detailed in section 8.14 of the *Occupational Health and Safety (OHS) Regulation*** (Work Safe BC, 2003).

The application of spray paint and glass beads using a sandblaster may be dangerous if the materials bounce off the poles using high pressure settings.

Section 8.14 of the *OHS Regulation* states:

- (1) A worker must wear properly fitting safety eyewear appropriate to the conditions of the workplace if handling or exposed to materials which are likely to injure or irritate the eyes (Work Safe BC, 2003).

2. **Test poles using a voltage detector.**

While it is rare, utility poles may hold a charge if any wires have malfunctioned or become loose due to a storm, strong winds, or other causes. For this reason, workers painting the poles should always test the poles with a voltage detector before touching them. A voltage detector may be provided by TELUS for workers doing the painting.

3. **Use caution when using a step ladder.**

The stencils need to be placed above 6 feet from the butt of the pole and between 1.5 and 2 meters above the edge of the road. A step ladder may be needed to properly paint the pole and strap on the stencils. The ground surrounding the pole may be uneven and/or on a slope, which could make using a step ladder unsafe. In these cases, consider using a ladder fly that is first strapped to the pole securely before it is mounted.



## APPENDIX C: HAIDA GWAII PREPAREDNESS SURVEY

The Haida Gwaii Tsunami Preparedness Survey is being conducted to measure individual and family tsunami preparedness in communities across Haida Gwaii. The information collected in this survey will assist with evaluating emergency preparedness programs and seeking community input on areas we can improve. The information collected will be documented in a report that will be shared with the community including councils. This survey is expected to take 2-3 minutes. Participation in this survey is voluntary. Consent to use the information collected in this survey as per the purposes above is obtained by virtue of survey completion.

This survey is anonymous and the collection of personal information provided on this survey is authorized under section 26 of the *Freedom of Information and Protection of Privacy Act* for the purpose(s) set out above. Should you have any questions about the collection of this personal information please contact Lori Wiedeman at [cao@queencharlotte.ca](mailto:cao@queencharlotte.ca)

1. Where are you located?

- ☐ Masset
- ☐ Old Massett
- ☐ Tow Hill
- ☐ Port Clements
- ☐ Tlell
- ☐ Skidegate
- ☐ Queen Charlotte
- ☐ Sandspit
- ☐ Miller Creek
- ☐ Lawn Hill
- ☐ Other (please Specify:

2. What is your age?

- ☐ Under 18
- ☐ 18-29
- ☐ 30-44
- ☐ 45-59
- ☐ 60+

☐ I prefer not to answer

3. What is your gender?

- ☐ Female
- ☐ Male
- ☐ Other
- ☐ I prefer not to answer

4. Do you feel you/your community is at risk of tsunami?

- ☐ Yes
- ☐ No

5. If a tsunami occurred, is your home located in a hazard zone?

	Yes	No	Unsure
Home	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Workplace	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

6. Do you know where the safe zones are in the event a tsunami occurs?

- ☐ Yes
- ☐ No

7. If you had to evacuate, do you know where you would go?

- ☐ Yes
- ☐ No

8. If you had to evacuate, would you have challenges in doing so?

- ☐ Yes, mobility issues
- ☐ Yes, transportation issues
- ☐ No
- ☐ Yes, other (please specify)

9. Do you have an evacuation plan for your family and does it include a plan for pets/livestock?

	Yes	No	Not Applicable
Family	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Pets/livestock	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>



10. Do you feel you/your family is prepared if an earthquake and tsunami occurred?

☐ Yes

☐ No

11. If you have children or other dependants, do you have a plan to connect if you get evacuated separately? ie. Call someone off island to check in.

☐ Yes

☐ No

☐ Not applicable

	Yes I am aware of a plan	No, I am not aware	I know there is a plan but do not know what it is
Businesses	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Schools	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

13. Do you keep a 72-hour emergency kit in your home/vehicle?

☐ Yes

☐ No

14. Would you like to sign up to receive emergency communications?

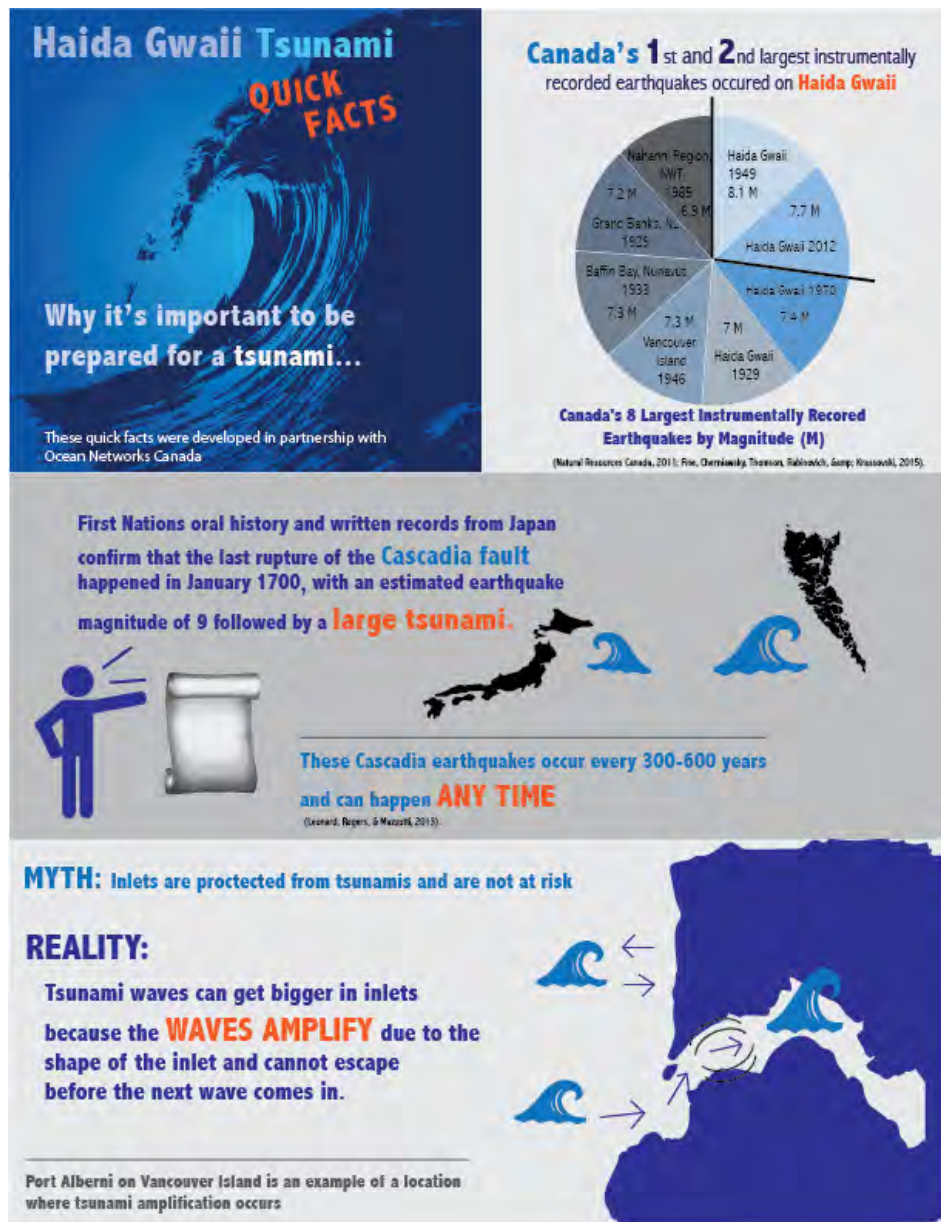
☐ Yes (click on link to sign up)

☐ No

☐ I do not have email or access to the internet

15. Do you have any ideas/suggestions on how emergency preparedness can be improved in your community?

## APPENDIX D: QUICK FACTS INFOGRAPHIC



The 2012 magnitude 7.7 earthquake was followed by a

## TSUNAMI

on the west coast of the islands with run-ups that measured up to

**13 meters high**

(Frie et al., 2015; Hyndman, 2015).



**Haida Gwaii** will be impacted by the Cascadia earthquake but is also part of its own tectonicsunami-generating regime (called Explorer segment), as seen in 2012.

The **tsunami hazard** for potentially damaging run-up (at least 1.5 m) of the outer Pacific coastline of Canada is approximately

**40–80%**

in 50 years (Leonard et al., 2013).



## ARE YOU PREPARED?

Do you know where the tsunami safe zones are in your community?

Do you have a household plan?

Do you have a 72-hour emergency kit ready to grab and go?

For more information on tsunami preparedness and building an emergency kit go to [www.gov.bc.ca/preparedbc](http://www.gov.bc.ca/preparedbc)

**References:**  
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## APPENDIX E: PRESS RELEASE TEMPLATE

This template was adapted from Prepared BC's High Ground Hike News Release Template

(DATE)

### **[Community Name] Paints Utility Poles to Direct People to Safety**

Over the next few weeks, utility poles across [community name] will be painted with signs to direct people to safety in the event of a tsunami. "Clear visual markings that can direct people to safe zones may save lives if our community experiences a tsunami" said [community leader/local official].

This is a collaborative project with involvement from BC Hydro, TELUS, Emergency Management BC, and community leaders and was spurred on by the need for more signage that indicates where it is safe to go in the event of a tsunami. A tsunami caused by a Cascadia Subduction Zone earthquake could hit the B.C. coast in as little as 15 minutes. Haida Gwaii is also part of its own tsunami-generating regime called the Explorer Segment, which is why preparing for a tsunami is so important.

"During an earthquake, the first thing we should do is "drop, cover and hold on," said [community leader/local official]. "Once the shaking stops, everyone should immediately move to high ground and follow the utility poles to safe areas."

"We know that a prepared community is a resilient community," said [community leader/local official]. "Painting visual markings on utility poles are one way we hope to prepare our community and bring awareness to the tsunami risks that are present – While preparedness truly does start at home – we all need our emergency kits and household emergency plans."

Join us on April [day/year] for the launch of the tsunami pole project during the province of British Columbia's annual Tsunami Preparedness Week, highlighting the importance of tsunami awareness and preparedness in coastal communities. We will be hiking to high ground and following the utility poles to safe zones.

#### **Quick Facts:**

- Learn about [community]'s emergency preparedness efforts, by visiting [village/community website] and Facebook page and sign up to receive emergency communications.
- [Village/community] tsunami notification process:

#### **Learn more:**

- B.C.'s tsunami notification zones: <http://ow.ly/nnSM305jkuK>
- PreparedBC: [www.gov.bc.ca/PreparedBC](http://www.gov.bc.ca/PreparedBC)
- ShakeOutBC: [www.ShakeOutBC.ca](http://www.ShakeOutBC.ca)



**For more information, contact:**

(Your organization's media spokesperson with contact information)

## APPENDIX F: COMMUNITY BUDGETS

### VILLAGE OF QUEEN CHARLOTTE

**Table 4: Budget Estimates for Implementation in Queen Charlotte**

Expense Description	Quantity	Unit	Price Per Unit	Total Price	Amount subsidized	Total Cost to Community
Cost of Supplies						
Glass beads	1	5 gallon bucket	\$60.00	\$60.00	\$60.00	\$0.00
White Paint	6	per gallon	\$53.85	\$323.10	\$323.10	\$0.00
Blue Paint	4	per gallon	\$41.95	\$167.80	\$167.80	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.R	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #2	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil Design #3	1		\$36.96	\$36.96	\$36.96	\$0.00
Cost of Equipment						
Paint Sprayer	1		\$223.19	\$223.19	\$223.20	\$0.00
Cost of labour						
Public Works employee*	55	per hour	\$25.00	\$1,375.00	\$825.00	\$550.00
Cost of Marketing/ Communication Tools						
Article in Observer	1		\$100.00	\$100.00	\$100.00	\$0.00

<b>Total Costs</b>			\$2,433.89	\$1,883.90	<b>\$550.00</b>
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*Table 4.* This is the estimated budget for implementation for the Village of Queen Charlotte. In mapping which utility poles to paint, it was determined that there are 44 poles that can be painted with the various stencils. This budget is based on the projected costs of painting 44 poles. The cost of labour is calculated by adding the approximate cost per hour to paint 44 poles. The subsidized amount accounts for \$15/hour of labour out of the research and development fund donated by BC Hydro and TELUS. The glass beads were donated by O'Brien and Fuerst.

## SKIDEGATE

**Table 5: Budget Estimates for Implementation in Skidegate**

Expense Description	Quantity	Unit	Price Per Unit	Total Price	Amount subsidized	Total Cost to Community
Cost of Supplies						
Glass beads	1	5 gallon bucket	\$60.00	\$60.00	\$60.00	\$0.00
White Paint	5	per gallon	\$53.85	\$269.25	\$269.25	\$0.00
Blue Paint	3	per gallon	\$41.95	\$125.85	\$125.85	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.R	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #2	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil Design #3	1		\$36.96	\$36.96	\$36.96	\$0.00
Ratchet Straps	2		\$15.49	\$30.98	\$0.00	\$30.98
Cost of Equipment						
Paint Sprayer	1		\$223.19	\$223.19	\$223.19	\$0.00
Compressor (260 psi 12 V)	1		\$39.99	\$39.99	\$0.00	\$39.99
Sand Blaster (MAZPRO)	1		\$139.99	\$139.99	\$0.00	\$139.99
Cost of labour						
Public Works employee	33.75	hours	\$25.00	\$843.75	\$506.25	\$337.50
<b>Total Costs</b>				<b>\$1,917.80</b>	<b>\$1,369.34</b>	<b>\$548.46</b>

Table 5. This is the estimated budget for implementation Skidegate. In mapping which utility poles to paint, it was determined that there are 27 poles that can be painted with the various stencils. This budget is based on the projected costs of painting 27 poles. The cost of labour is calculated by adding the approximate cost per hour to paint 27 poles. The subsidized amount accounts for \$15/hour of labour out of the research and development fund donated by BC Hydro and TELUS. The glass beads were donated by O'Brien and Fuerst.

## VILLAGE OF MASSET/ TOW HILL

**Table 6: Budget Estimates for Implementation in Masset/ Tow Hill**

Expense Description	Quantity	Unit	Price Per Unit	Total Price	Amount subsidized	Total Cost to Community
<b>Cost of Supplies</b>						
Glass beads	1	3 gallon bag	\$48.69	\$48.69	\$48.69	\$0.00
White Paint	5	per gallon	\$53.85	\$269.25	\$269.25	\$0.00
Blue Paint	3	per gallon	\$41.95	\$125.85	\$125.85	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.R	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #2	1		\$36.96	\$36.96	\$36.96	\$0.00
Ratchet Straps	2		\$15.49	\$30.98	\$0.00	\$30.98
Stencil Design #3	1		\$36.96	\$36.96	\$36.96	\$0.00
<b>Cost of Equipment</b>						
Compressor (260 psi 12 V)	1		\$39.99	\$39.99	\$39.99	\$0.00
Sand Blaster (MAZPRO)	1		\$139.99	\$139.99	\$139.99	\$0.00
<b>Cost of labour</b>						
Public Works employee	58.75	per hour	\$25.00	\$1,468.75	\$881.25	\$587.50
<b>Total Costs</b>				<b>\$2,308.30</b>	<b>\$1,689.82</b>	<b>\$618.48</b>

Table 6. This is the estimated budget for implementation The Village of Masset and Tow Hill. In mapping which utility poles to paint, it was determined that there are 47 poles that can be painted with the various stencils (34 in Masset and 13 in Tow Hill area). This budget is based on the projected costs of painting 47 poles. The cost of labour is calculated by adding the approximate cost per hour to paint 47 poles. The subsidized amount accounts for \$15/hour of labour out of the research and development fund donated by BC Hydro and TELUS.

## OLD MASSETT

**Table 7: Budget Estimates for Implementation in Old Massett**

Expense Description	Quantity	Unit	Price Per Unit	Total Price	Amount subsidized	Total Cost to Community
Cost of Supplies						
Glass beads	1	5 gallon bucket	\$40.00	\$40.00	\$40.00	\$0.00
White Paint	5	per gallon	\$53.85	\$269.25	\$269.25	\$0.00
Blue Paint	3	per gallon	\$41.95	\$125.85	\$125.85	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.R	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #2	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil Design #3	1		\$36.96	\$36.96	\$36.96	\$0.00
Ratchet Straps	2		\$15.49	\$30.98	\$0.00	\$30.98
Cost of Equipment						
Paint Sprayer	1		\$223.19	\$223.19	\$223.19	\$0.00
Compressor (260 psi 12 V)	1		\$39.99	\$39.99	\$0.00	\$39.99
Sand Blaster (MAZPRO)	1		\$139.99	\$139.99	\$0.00	\$139.99
Cost of labour						
Public Works employee	26.25	per hour	\$25.00	\$656.25	\$393.75	\$262.50
<b>Total Costs</b>				<b>\$1,710.30</b>	<b>\$1,236.84</b>	<b>\$473.46</b>

Table 7. This is the estimated budget for implementation Old Massett. In mapping which utility poles to paint, it was determined that there are 26 poles that can be painted with the various stencils. This budget is based on the projected costs of painting 26 poles. The cost of labour is calculated by adding the approximate cost per hour to paint 26 poles. The subsidized amount accounts for \$15/hour of labour out of the research and development fund donated by BC Hydro and TELUS.

## TLELL/SANDSPIT

**Table 8: Budget Estimates for Implementation in Tlell/ Sandspit**

Expense Description	Quantity	Unit	Price Per Unit	Total Price	Amount subsidized	Total Cost to Community
Cost of Supplies						
Glass beads	1	3 gallon bag	\$48.69	\$48.69	\$48.69	\$0.00
White Paint	9	per gallon	\$53.85	\$484.65	\$269.25	\$0.00
Blue Paint	6	per gallon	\$41.95	\$251.70	\$125.85	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.R	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #2	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil Design #3	1		\$36.96	\$36.96	\$36.96	\$0.00
Ratchet Straps	2		\$15.49	\$30.98	\$0.00	\$30.98
Cost of Equipment						
Paint Sprayer	1		\$223.19	\$223.19	\$223.19	\$0.00
Compressor (260 psi 12 V)	1		\$39.99	\$39.99	\$0.00	\$39.99
Sand Blaster (MAZPRO)	1		\$139.99	\$139.99	\$0.00	\$139.99
Cost of labour						
Public Works employee*	35	hours	\$25.00	\$875.00	\$525.00	\$350.00
<b>Total Costs</b>				<b>\$2,278.99</b>	<b>\$1,376.78</b>	<b>\$560.96</b>

*Table 8.* This is the estimated budget for implementation in Tlell and Sandspit. In mapping which utility poles to paint, it was determined that there are 15 poles in Tlell and 13 poles in Sandspit for a total of 28 poles that can be painted with the various stencils. This budget is based on the projected costs of painting 28 poles. The cost of labour is calculated by adding the approximate cost per hour to paint 28 poles. The subsidized amount accounts for \$15/hour of labour out of the research and development fund donated by BC Hydro and TELUS.

## VILLAGE OF PORT CLEMENTS

**Table 9: Budget Estimates for Implementation in Port Clements**

Expense Description	Quantity	Unit	Price Per Unit	Total Price	Amount subsidized	Total Cost to Community
Cost of Supplies						
Glass beads	1	5 gallon bucket	\$60.00	\$60.00	\$60.00	\$0.00
White Paint	5	per gallon	\$53.85	\$269.25	\$269.25	\$0.00
Blue Paint	3	per gallon	\$41.95	\$125.85	\$125.85	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.R	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #1.L	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil design #2	1		\$36.96	\$36.96	\$36.96	\$0.00
Stencil Design #3	1		\$36.96	\$36.96	\$36.96	\$0.00
Ratchet Straps	2		\$15.49	\$30.98	\$0.00	\$30.98
Cost of Equipment						
Compressor (260 psi 12 V)	1		\$39.99	\$39.99	\$39.99	\$0.00
Sand Blaster (MAZPRO)	1		\$139.99	\$139.99	\$139.99	\$0.00
Cost of labour						
Public Works employee*	21.25	per hour	\$25.00	\$531.25	\$318.75	\$212.50
<b>Total Costs</b>				<b>\$1,382.11</b>	<b>\$1,138.63</b>	<b>\$243.48</b>

*Table 9.* This is the estimated budget for implementation Port Clements. In mapping which utility poles to paint, it was determined that there are 27 poles that can be painted with the various stencils. This budget is based on the projected costs of painting 27 poles. The cost of labour is calculated by adding the approximate cost per hour to paint 27 poles. The subsidized amount accounts for \$15/hour of labour out of the research and development fund donated by BC Hydro and TELUS.

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## NEWS RELEASE

### **Haida Gwaii Communities Paint Utility Poles to Direct People To Safety**

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March 22<sup>nd</sup>, 2019

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In 2018, as part of Haida Gwaii's Tsunami Pole Project, utility poles across Haida Gwaii, including communities within the North Coast Regional District (NCRD) electoral areas D and E, were painted with signs to direct residents and visitors of Haida Gwaii to safety in the event of a tsunami.

“Clear visual markings that can direct people to safe zones may save lives if our community experiences a tsunami” said Barry Pages, Chair of the NCRD, adding “once the shaking from an earthquake stops, everyone should immediately move to high ground and follow the utility poles to safe areas.”

The Tsunami Pole Project aims to reduce the risk of injury and/or fatality in the event of a tsunami by utilizing existing BC Hydro poles to paint visual indicators of inundation zones and safe zones in communities across Haida Gwaii. The painted signage is designed to instruct visitors and residents on where the hazard zones are and where it is safe to go in the event of a tsunami.

The Tsunami Pole Project is the first of its kind. It is an innovative and collaborative project with involvement from the Province of B.C., BC Hydro, TELUS, local First Nations, and municipal governments on Haida Gwaii. By working in partnership to utilize existing infrastructure and source grant funding for the Tsunami Pole Project, governments are able to provide an added layer of tsunami preparedness at a low cost.

The tsunami poles that were painted in 2018 were identified as part of an overall [research study](#), undertaken in 2017, that included a tsunami hazard analysis and geographic information system (GIS) mapping to identify the hazard and safe zones in each community and outline which poles to paint.

“We know that a prepared community is a resilient community,” said Evan Putterill, NCRD Electoral Area E Director. “Painting visual markings on utility poles are one way we hope to prepare our community and bring awareness to the tsunami risks that are present.”

In the coming weeks, informational signage will be installed along highways and main arterial roads in communities on Haida Gwaii which will provide further context to the painted poles for visitors. Informational collateral will also be supplied at visitor information centres and other popular tourist locations across the island.



Tsunami Danger Zone



Tsunami Safe Zone



Highway Signage

Every April, Tsunami Preparedness Week is a reminder that B.C. is a seismically active province, and that the threat posed from a damaging tsunami constitutes a reality for coastal communities. We hope you will **take some time that week to familiarize yourself with your communities' tsunami pole signage** and champion your own personal emergency preparedness plan at home with your families.

#### **Learn more:**

- North Coast Regional District: <https://www.ncrdbc.com>
- Tsunami Preparedness Week: <https://news.gov.bc.ca/releases/2018PSSG0021-000593>
- Prepared BC Earthquake and Tsunami Guide: [https://www2.gov.bc.ca/assets/gov/public-safety-and-emergency-services/emergency-preparedness-response-recovery/embc/preparedbc/preparedbc-guides/earthquake\\_and\\_tsunami\\_guide\\_2018\\_web.pdf](https://www2.gov.bc.ca/assets/gov/public-safety-and-emergency-services/emergency-preparedness-response-recovery/embc/preparedbc/preparedbc-guides/earthquake_and_tsunami_guide_2018_web.pdf)

*For more information contact Daniel Fish, Corporate Officer for the North Coast Regional District at 250.624.2002, extension 2 or email [corporateofficer@ncrdbc.com](mailto:corporateofficer@ncrdbc.com).*



## **Staff Report**

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**Date:** March 22<sup>nd</sup>, 2019

**To:** D. Chapman, Chief Administrative Officer

**From:** S. Landrath, Treasurer

**Subject:** North Coast Regional District Financials – 2018 Actual Expenditures versus 2019 Round 3 Budget Figures

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### **Recommendation:**

**THAT the staff report entitled “North Coast Regional District Financials – 2018 Actual Expenditures versus 2019 Round 3 Budget Figures” be received for information.**

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### **BACKGROUND:**

At its Regular (Round 3 Budget) meeting of the North Coast Regional District (NCRD) Board held March 14, 2019, the Board requested a report outlining 2018 actual expenditures compared with 2019 Round 3 budget figures.

### **DISCUSSION:**

Attachment A to this report provides the requested financial information with respect to 2018 actual versus 2019 budget values.

### **RECOMMENDATION:**

Staff is recommendation that this report be received for information.



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 110 - Administration**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-110-5000	Property Tax Requisitions	(450,000)	(450,000)
01-1-110-5100	Grant In Lieu Of Taxes	(48,452)	(30,000)
01-1-110-5300	RD Basic Grant	(120,000)	(120,000)
01-1-110-5400	Grants - Unconditional	-	(8,000)
01-1-110-5600	C2C Grant - Administration	-	(5,000)
01-1-110-6660	Investment Income	(27,284)	(8,600)
01-1-110-6800	Other Revenue	(200)	-
01-1-110-7100	Support Service Recovery	(331,270)	(361,240)
01-1-110-8800	Transfer from Surplus - Administration		(125,965)
01-3-110-7200	Director Remuneration	91,541	107,450
01-3-110-7220	Director Travel	31,104	32,017
01-3-110-7230	Director Conferences & Professional Dev.	299	-
01-3-110-7240	Meeting Expenses	6,295	7,450
01-3-110-7241	C2C Meeting Expenses - Administration	-	5,000
01-3-110-7300	Staff Salaries & Wages	434,912	440,400
01-3-110-7310	Payroll Overhead & Benefits	101,164	107,500
01-3-110-7315	Staff Recruitment Expense	1,151	-
01-3-110-7320	Staff Travel	18,821	34,028
01-3-110-7325	Staff Travel - Treaty Negotiations - Adm		13,760
01-3-110-7330	Staff Training & Conferences	2,556	11,900
01-3-110-7335	Memberships	6,347	8,500
01-3-110-7410	Advertising & Promotions	2,253	4,000
01-3-110-7420	Bad Debts/Write-Offs	1,927	-
01-3-110-7430	Bank Charges	2,066	2,100
01-3-110-7440	Postage & Freight	3,109	2,200



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 110 - Administration**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-3-110-7450	Subscriptions	1,421	1,800
01-3-110-7470	Computer Maintenance	24,962	25,700
01-3-110-7480	Office Supplies	5,319	8,000
01-3-110-7500	Liability Insurance	6,444	7,500
01-3-110-7505	Administration Suspense	280	-
01-3-110-7610	Telephone	10,474	10,500
01-3-110-7620	Email/Website	1,465	5,300
01-3-110-7630	Photocopier	3,861	4,100
01-3-110-7720	Professional Fees	47,563	232,700
01-3-110-7730	Legal Services	245	8,300
01-3-110-8010	Building Insurance	471	500
01-3-110-8020	Building Utilities	886	1,000
01-3-110-8030	Building Maintenance	-	1,000
01-3-110-8040	Rent	20,200	22,000
01-3-110-8050	Janitorial	3,700	4,100
Net (income) loss		(146,368)	-



# NORTH COAST

REGIONAL DISTRICT

## Department 120 - Electoral Admin

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-120-5000	Property Tax Requisitions	(95,961)	(95,960)
01-1-120-5100	Grant In Lieu Of Taxes	(6,429)	(3,600)
01-1-120-5300	RD Basic Grant	(80,000)	(80,000)
01-1-120-8800	Transfer from Surplus - Electoral Area A		(43,926)
01-3-120-7100	Support Services - EA Admin	81,600	87,543
01-3-120-7200	Director Remuneration	67,995	79,188
01-3-120-7220	Director Travel	21,417	35,526
01-3-120-7230	Director Conferences & Professional Dev.	3,043	5,540
01-3-120-7240	Meeting Expenses	-	500
01-3-120-7310	Payroll Overhead & Benefits	2,783	4,762
01-3-120-7320	Staff Travel	483	2,400
01-3-120-7330	Staff Training & Conferences - Electoral	565	-
01-3-120-7335	Memberships	308	827
01-3-120-7480	Office Supplies	64	200
01-3-120-7730	Legal Services	-	7,000
Net (income) loss		(4,133)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 121 - Electoral Area E**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-121-5000	Property Tax Requisition	(12,700)	(12,700)
01-1-121-5100	Grant In Lieu of Taxes	(475)	(970)
01-1-121-8800	Transfer from Surplus - EA 'E'		(2,170)
01-3-121-7240	Meeting Expenses	650	660
01-3-121-7410	Advertising & Promotions	501	1,500
01-3-121-7480	Office Supplies	117	500
01-3-121-7610	Telephone	1,603	1,680
01-3-121-7700	Contract Services	3,905	5,500
01-3-121-8040	Rent	6,000	6,000
Net (income) loss		(399)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 130 - Elections**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-130-5000	Property Tax Requisitions	(5,000)	(5,000)
01-1-130-5100	Grant in Lieu of Taxes	(335)	(200)
01-3-130-7320	Staff Travel	5,351	-
01-3-130-7410	Advertising & Promotions	5,562	-
01-3-130-7480	Office Supplies & Other	901	-
01-3-130-8700	Contingency	2,641	5,200
Net (income) loss		9,120	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 170 - Grant in Aid - All**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-170-5000	Property Tax Requisitions	(2,120)	(2,120)
01-1-170-5100	Grant In Lieu Of Taxes - Grant-In-Aid	(228)	(230)
01-1-170-8800	Transfer from Surplus - Grant-In-Aid-All		(120)
01-3-170-8100	Grants to Other Organizations	2,470	2,470
Net (income) loss		122	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 171 - Grant in Aid Area A**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-171-5000	Property Tax Requisitions - Grant-In-Aid	(640)	(640)
01-1-171-5100	Grant in Lieu of Taxes	(61)	(20)
01-1-171-8800	Transfer from Surplus - Grant-In-Aid - A		(40)
01-3-171-8100	Grants to Other Organizations	691	700
Net (income) loss		(9)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 172 - Grant in Aid Area C**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-172-5000	Property Tax Requisitions - Grant-In-Aid	(1,400)	(1,400)
01-1-172-5100	Grant in Lieu of Taxes	(122)	(30)
01-1-172-5400	Grant in Aid (Tsunami Preparedness)		(5,095)
01-1-172-8800	Transfer from Surplus - Grant-In-Aid - A		(1,345)
01-3-172-7820	Freight/Transportation - Grant-in-Aid		1,900
01-3-172-7835	ISW - Material Purchase		820
01-3-172-8100	Grants to Other Organizations	-	5,150
Net (income) loss		(1,522)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 173 - Grant in Aid Area D**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-173-5000	Property Tax Requisitions - Grant-In Aid	(1,500)	(2,500)
01-1-173-5100	Grant in Lieu of Taxes	(87)	(20)
01-1-173-8800	Transfer from Surplus - Grant-In Aid - D		(3,500)
01-3-173-8020	Garbage Collection - Tow Hill	300	-
01-3-173-8100	Grants to Other Organizations	-	4,500
01-3-173-8700	Contingency		1,520
Net (income) loss		(1,287)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 174 - Grant in Aid Area E**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-174-5000	Property Tax Requisition	(3,900)	(4,361)
01-1-174-5100	Grant in Lieu of Taxes	(146)	(100)
01-3-174-8100	Grants to Other Organizations	114	-
01-3-174-8700	Contingency		4,461
Net (income) loss		(3,932)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 190 - Municipal Finance Authority**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-190-6810	MM Debt Recovery	(1,162,941)	(1,412,665)
01-3-190-8210	Interest on Debenture Debt	529,560	723,460
01-3-190-8220	Principal on Debenture Debt	633,381	689,205
Net (income) loss		-	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 191 - Vancouver Island Regional Library**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-191-6810	MM Debt Recovery - VIRL Debt	(23,625)	(103,074)
01-3-191-8210	Interest on Debenture Debt - VIRL Debt	23,625	47,250
01-3-191-8220	Principal on Debenture Debt - VIRL Debt		55,824
Net (income) loss		-	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 210 - Sandspit Fire**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-210-5000	Property Tax Requisitions	(27,500)	(27,500)
01-1-210-5100	Grant In Lieu Of Taxes	(1,030)	(1,100)
01-1-210-8800	Transfer from Surplus - Sandspit Fire		(25,333)
01-3-210-7100	Support Services - Sandspit Fire	2,800	2,393
01-3-210-7810	Insurance - Sandspit Fire	-	120
01-3-210-8020	Utilities	-	250
01-3-210-8100	Grants to Other Organizations	25,585	51,170
Net (income) loss		(145)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 220 - Emergency Program A & C**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-220-5000	Property Tax Recquisition	(5,000)	(5,000)
01-1-220-5100	Grant in Lieu of Taxes	(465)	(120)
01-1-220-8800	Transfer from Surplus-Emergency Program		(33,528)
01-3-220-7100	Administration Recovery - Emergency Prog		2,638
01-3-220-7480	Supplies & Program Expenses	-	1,490
01-3-220-8700	Contingency	-	34,520

Net (income) loss

(5,465)

-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 227 - Emergency Program D**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-227-5000	Tax Requisitions	(5,000)	(5,000)
01-1-227-5100	Grant In Lieu of Taxes	(290)	(100)
01-1-227-6800	Other Revenue	479	-
01-1-227-8800	Transfer from Surplus-Emergency Program		(43,738)
01-3-227-7100	Administration Recovery - Emergency Prog		2,638
01-3-227-7410	Advertising & Promotions	2	-
01-3-227-7450	Subscriptions	-	2,000
01-3-227-7480	Supplies & Program Expenses	1,951	500
01-3-227-8700	Contingency	-	43,700
Net (income) loss		(2,858)	-



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 229 - Emergency Program E**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-229-5000	Property Tax Requisition	(10,000)	(19,320)
01-1-229-5100	Grant in Lieu of Taxes	(374)	(250)
01-1-229-6800	Other Revenue - Emergency Program Area E	19	-
01-1-229-8800	Transfer from Surplus - Emergency Progra		(26,638)
01-3-229-7100	Administration Recovery - Emergency Prog		2,638
01-3-229-7240	Meeting Expense	-	150
01-3-229-7320	Staff Travel	60	300
01-3-229-7410	Advertising & Promotions	-	200
01-3-229-7480	Supplies & Program Expenses	-	500
01-3-229-7850	Permits and Licences	-	2,000
01-3-229-8400	Contribution to Reserves		6,420
01-3-229-8700	Contingency		34,000
Net (income) loss		(10,295)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 310 - Island Solid Waste**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-310-5000	Property Tax Requisitions	(140,000)	(170,000)
01-1-310-5100	Grant In Lieu Of Taxes	(8,484)	(4,600)
01-1-310-6010	User Fees - ISW	(125,335)	(130,176)
01-1-310-6011	User Fees - ISW Band Contract	(198,600)	(147,600)
01-1-310-6013	User Fees - ISW Municipalities	(341,064)	(341,280)
01-1-310-6015	Contribution in Lieu of Taxes - Band Agr	-	(51,000)
01-1-310-6090	Penalty for Late Payment	169	(3,500)
01-1-310-6095	Discounts for Early Payment	8,165	3,500
01-1-310-6099	Spring Cleanup Revenue	(2,679)	(9,500)
01-1-310-6800	Other Revenue	(1,119)	(1,000)
01-1-310-8800	Transfer from Surplus - ISW - General		(111,782)
01-1-311-6121	MMBC and GBN Program	(5,953)	(3,000)
01-1-311-6130	Commercial Pick Ups-ISW Recycling	(15,848)	(9,600)
01-1-311-6135	Commercial Drop Offs-ISW Recycling	(5,361)	(4,500)
01-1-311-6150	ISW Recycling - White Goods	(8,550)	(8,800)
01-1-311-6160	ISW Recycling Agreements	(1,945)	(2,600)
01-1-311-6210	Sale of Materials	-	(900)
01-1-311-6800	Other Revenue	(556)	-
01-1-317-5400	Grants - Conditional - ISW - Landfill		(50,000)
01-1-317-6200	Tipping Fees	(96,299)	(82,000)
01-1-317-6220	Commercial Charges	(5,468)	(5,160)
01-2-317-8410	Transfer from Reserve - ISW Landfill		(16,000)
01-3-310-7100	Support Services - ISW General	87,000	88,950
01-3-310-7300	Staff Salaries & Wages - ISW General	30,047	44,900
01-3-310-7310	Payroll OH & Benefits - ISW General	9,472	11,300



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 310 - Island Solid Waste**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-3-310-7320	Staff Travel	124	6,500
01-3-310-7330	Staff Training & Conferences	-	3,000
01-3-310-7410	Advertising & Promotions	596	2,500
01-3-310-7440	Postage	147	2,210
01-3-310-7460	Collection Handling Charge	21,349	21,980
01-3-310-7470	Computer Maintenance	-	500
01-3-310-7480	Office Supplies	1,982	1,000
01-3-310-7610	Telephone	4,305	4,200
01-3-310-7620	Email/Website	1,405	1,630
01-3-310-7730	Legal Services	-	3,000
01-3-310-8401	Contribution to Landfill Reserve	-	27,000
01-3-311-7300	Staff Salaries & Wages - ISW Recycling	121,854	120,597
01-3-311-7310	Payroll OH & Benefits - ISW Recycling	27,162	33,982
01-3-311-7410	Advertising & Promotions	1,275	1,500
01-3-311-7700	Contract Services	34,952	38,100
01-3-311-7810	Property Insurance	605	-
01-3-311-7820	Freight/Transportation	4,042	4,500
01-3-311-7821	Recycling Hauling	42,173	43,000
01-3-311-7860	Utilities	1,034	770
01-3-311-7870	Repairs & Maintenance - Site/Facility	807	1,500
01-3-311-7880	Supplies	2,256	2,200
01-3-311-7910	Vehicle Insurance	1,966	4,100
01-3-311-7920	Fuel & Lubricants	13,141	13,500
01-3-311-7930	Repairs & Maintenance-Vehicle/Equipment	21,982	6,000
01-3-311-8010	Building Insurance - ISW Recycling	828	900



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 310 - Island Solid Waste**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-3-311-8030	Building Maintenance - ISW Recycling	295	550
01-3-313-7300	Staff Salaries & Wages - ISW Hauling	42,733	47,595
01-3-313-7310	Payroll OH & Benefits - ISW Hauling	13,172	13,411
01-3-313-7820	Freight/Transportation	2,971	4,000
01-3-313-7870	Repairs & Maintenance - Site/Facility	1,170	3,000
01-3-313-7910	Vehicle Insurance	1,838	4,300
01-3-313-7920	Fuel & Lubricants	18,505	18,000
01-3-313-7930	Vehicle Repairs & Maintenance	12,399	12,600
01-3-313-8230	Lease Interest	13	-
01-3-313-8240	Lease Principal	4,014	-
01-3-315-7300	Staff Salaries & Wages-ISW Transfer Stn	39,479	46,524
01-3-315-7310	Payroll OH & Benefits - ISW Transfer Stn	7,999	12,845
01-3-315-7700	Contract Services	7,500	8,500
01-3-315-7850	Permits & Licenses	-	250
01-3-315-7870	Repairs & Maintenance - Site/Facility	7,561	8,000
01-3-315-8700	Contingency	-	1,000
01-3-317-7300	Staff Salaries & Wages - ISW Landfill	51,815	30,469
01-3-317-7310	Payroll OH & Benefits - ISW Landfill	13,748	8,586
01-3-317-7335	Memberships & Licenses	-	210
01-3-317-7410	Advertising & Promotions	1,323	1,000
01-3-317-7490	Safety Supplies - ISW Landfill	290	500
01-3-317-7700	Contract Services	22,348	33,420
01-3-317-7720	Professional Fees	11,605	15,000
01-3-317-7840	Monitoring & Lab Testing	10,291	11,700
01-3-317-7860	Utilities	1,034	900



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 310 - Island Solid Waste**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-3-317-7870	Repairs & Maintenance - Site/Facility	1,050	1,000
01-3-317-7880	Supplies	1,051	2,500
01-3-317-7899	Landfill Closure Costs	30,572	45,000
01-3-317-7920	Fuel & Lubricants	10,511	12,500
01-3-317-7930	Repairs & Maintenance-Vehicle/Equipment	3,561	5,000
01-3-317-8010	Building Insurance	1,417	1,300
01-3-317-8030	Building Maintenance	295	1,000
01-3-319-7300	Staff Salaries & Wages - ISW Collection	9,289	8,803
01-3-319-7310	Payroll OH & Benefits - ISW Collection	1,887	2,480
01-3-319-7710	Contracts - Operations	202,080	217,236
01-4-317-9100	Vehicles - ISW Landfill	19,260	16,000
01-4-317-9500	Capital Purchase - Minor Equipment	-	65,000
Net (income) loss		34,655	-



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 340 - Regional Recycling**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-340-5000	Property Tax Requisitions	(226,840)	(249,524)
01-1-340-5100	Grant In Lieu Of Taxes	(26,427)	(25,000)
01-1-340-5400	Grants - Conditional	-	(1,298,475)
01-1-340-6100	Sale of Services	(6,321)	(5,350)
01-1-340-6110	Processing	(124,409)	(126,600)
01-1-340-6120	Sale of Materials	(77,407)	(72,500)
01-1-340-6121	MMBC & GBN Program	(135,921)	(105,100)
01-1-340-6130	Commercial Charges	(31,465)	(24,600)
01-1-340-6140	Rental Revenue	(20,611)	(10,500)
01-1-340-6150	Bulk Recycling	(28,312)	(28,800)
01-1-340-6160	Recycling Agreements	(29,098)	(33,000)
01-1-340-6800	Other Revenue	(802)	(1,500)
01-1-340-8800	Transfer from Surplus - RR (Mainland)		(113,015)
01-2-340-6900	Debt Proceeds	-	(500,000)
01-3-340-7100	Support Services - RR	77,520	82,966
01-3-340-7240	Meeting Expenses - RR	145	200
01-3-340-7300	Staff Salaries & Wages	314,342	318,890
01-3-340-7310	Payroll Overhead & Benefits	70,929	87,910
01-3-340-7320	Staff Travel	1,758	6,400
01-3-340-7330	Staff Training & Conferences	1,784	7,750
01-3-340-7335	Memberships	1,175	1,180
01-3-340-7410	Advertising & Promotions	1,154	5,730
01-3-340-7425	Cash Short/Over	39	-
01-3-340-7440	Postage/Courier	12	1,100
01-3-340-7470	Computer Maintenance	110	1,000



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 340 - Regional Recycling**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-3-340-7480	Office Supplies	2,472	1,500
01-3-340-7490	Safety Supplies	1,153	2,700
01-3-340-7610	Telephone	2,957	3,900
01-3-340-7620	Email/Website	772	1,260
01-3-340-7720	Professional Fees - RR	3,088	3,000
01-3-340-7730	Legal Services - RR	-	2,000
01-3-340-7820	Freight/Transportation	32,384	41,500
01-3-340-7830	Disposal/Tipping Charges	8,896	9,325
01-3-340-7835	Material Purchases - RR	-	2,500
01-3-340-7840	Monitoring & Lab Testing - RR	-	480
01-3-340-7860	RR Utilities	19,940	20,160
01-3-340-7870	Repairs & Maintenance - Site/Facility	10,976	38,000
01-3-340-7880	Shop Supplies	16,327	16,800
01-3-340-7885	Small Tools & Minor Equipment Purchases	-	500
01-3-340-7910	Vehicle Insurance	2,274	3,000
01-3-340-7920	Fuel & Lubricants	10,397	12,000
01-3-340-7930	Repairs & Maintenance-Vehicle/Equipment	33,488	23,510
01-3-340-8010	Building Insurance	8,290	9,320
01-3-340-8030	Building Maintenance	6	-
01-3-340-8210	Interest on Debenture Debt	-	8,250
01-3-340-8230	Lease Interest	263	238
01-3-340-8240	Lease Principal	14,584	8,820
01-3-340-8400	Contribution to Reserves	-	73,600
01-4-340-9600	Capital Purchase - Heavy Equipment	44,599	-
01-4-340-9950	Building - RR	-	1,798,475.00



**NORTH COAST**  
REGIONAL DISTRICT

**Department 340 - Regional Recycling**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
	Net (income) loss	(25,780)	-



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 510 - Rural Land Use Planning**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-510-5000	Property Tax Requisitions	(61,850)	(64,940)
01-1-510-5100	Grant In Lieu Of Taxes	(4,144)	(1,900)
01-1-510-6100	Planning Fees	(5,766)	(3,500)
01-1-510-6800	Other Revenue	(1,800)	-
01-1-510-8800	Transfer from Surplus-Rural LU Planning		(19,915)
01-3-510-7100	Support Services - Rural LU Planning	18,900	22,705
01-3-510-7240	Meeting Expense	55	2,000
01-3-510-7320	Staff Travel - Planning	944	5,400
01-3-510-7330	Staff Training & Conferences	-	1,700
01-3-510-7335	Membership & Dues	-	700
01-3-510-7410	Advertising & Promotions	579	2,000
01-3-510-7450	Subscriptions		250
01-3-510-7470	Computer Maintenance	1,091	4,000
01-3-510-7480	Office Supplies & Other	-	500
01-3-510-7700	Contract Services	14,720	-
01-3-510-7720	Professional Fees **	250	49,000
01-3-510-7730	Legal services	1,535	2,000
Net (income) loss		(35,486)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 570 - Economic Development**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-570-5000	Property Tax Requisitions	(27,329)	(27,330)
01-1-570-5100	Grant In Lieu Of Taxes	(1,831)	(40)
01-1-570-5400	Grants - Conditional	-	(50,000)
01-1-570-8800	Transfer from Surplus - EDO		(7,765)
01-3-570-7100	Support Services - EDO	9,200	10,765
01-3-570-7410	Advertising	-	600
01-3-570-7720	Area A & C Project - Oct (Prof Fees)	3,250	23,000
01-3-570-8100	Grants to Other Organizations	25,000	25,000
01-3-570-8700	Contingency - EDO		15,770
01-4-570-9500	Minor Equipment - Economic Development		10,000
Net (income) loss		8,290	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 710 - Prince Rupert & Region Archives**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-710-5000	Property Tax Requisitions	(81,781)	(91,780)
01-1-710-5100	Grant In Lieu Of Taxes	(9,527)	(6,166)
01-1-710-8800	Transfer from Surplus - PR Archives		(8,840)
01-3-710-7100	Support Services - PR Archives	2,100	2,266
01-3-710-8100	Grants to Other Organizations	90,340	104,520
Net (income) loss		1,132	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 715 - North Pacific Cannery**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-715-5000	Property Tax Requisitions	(90,720)	(95,000)
01-1-715-5100	Grant In Lieu Of Taxes	(18,332)	(5,500)
01-1-715-8800	Transfer from Surplus - NP Cannery		(5,585)
01-3-715-7100	Support Services - NP Cannery	2,100	2,085
01-3-715-8100	Grants to Other Organizations	100,000	100,000
01-3-715-8405	Transfer to Approp. Surplus (Rate Stab)		4,000
Net (income) loss		(6,952)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 720 - Haida Gwaii Museum**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-720-5000	Property Tax Requisitions	(73,879)	(82,880)
01-1-720-5100	Grant In Lieu Of Taxes	(4,477)	(2,100)
01-1-720-8800	Transfer from Surplus - HG Museum		(924)
01-3-720-7100	Support Services - HG Museum	3,600	1,904
01-3-720-8100	Grants to Other Organizations	74,821	84,000
Net (income) loss		66	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 725 - Vancouver Island Regional Library**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-725-5000	Property Tax Requisitions	(60,000)	(62,343)
01-1-725-5100	Grant In Lieu Of Taxes	(3,107)	(1,200)
01-3-725-7100	Support Services - VIRL	2,600	2,831
01-3-725-8100	Grants to Other Organizations	61,692	60,712
Net (income) loss		1,185	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 730 - Haida Gwaii Recreation**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-730-5000	Property Tax Requisitions	(126,109)	(138,720)
01-1-730-5100	Grant In Lieu Of Taxes	(7,642)	(6,500)
01-1-730-8800	Transfer from Surplus - HG Recreation		(4,395)
01-3-730-7100	Support Services - HG Recreation	13,350	14,265
01-3-730-7300	Staff Salaries & wages	56,636	59,100
01-3-730-7310	Benefits	16,285	18,450
01-3-730-7500	Liability Insurance	(250)	250
01-3-730-8010	Building Insurance	29	50
01-3-730-8100	Grants to Other Organizations	58,015	57,500
Net (income) loss		10,314	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 735 - Sandspit Community Hall**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-735-5000	Property Tax Requisitions	(15,000)	(18,926)
01-1-735-5100	Grant in Lieu of Taxes	(562)	(100)
01-1-735-6140	Sandspit Hall Rental Revenue	(4,210)	-
01-1-735-6800	Other Revenue	-	(2,500)
01-1-735-8800	Transfer from Surplus - Sandspit Hall		(5,490)
01-3-735-7100	Support Services - Sandspit Hall	2,500	2,090
01-3-735-7610	Telephone	1,604	-
01-3-735-7880	Supplies	393	-
01-3-735-8010	Building Insurance	2,786	3,000
01-3-735-8020	Utilities	1,911	4,500
01-3-735-8030	Building Maintenance	1,138	6,926
01-3-735-8700	Contingency		10,500
Net (income) loss		(9,439)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 751 - Recreation Area A**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-751-5000	Property Tax Requisitions	(5,210)	(5,930)
01-1-751-5100	Grant in Lieu of Taxes	(494)	(735)
01-1-751-8800	Transfer from Surplus - Mainland Recreat		(600)
01-3-751-7100	Administration Recovery - Mainland Recre		565
01-3-751-8100	Grants to Other Organizations	5,500	6,700
Net (income) loss		(204)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 752 - Recreation Area C**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-752-5000	Property Tax Requisitions	(6,100)	(7,000)
01-1-752-5100	Grant in Lieu of Taxes	(579)	(90)
01-1-752-5400	Grants - Conditional - Mainland Recreati		(204,358)
01-1-752-8800	Transfer from Surplus - Mainland Recreat		(95)
01-3-752-7100	Administration Recovery - Mainland Recre		565
01-3-752-8010	Building Insurance	2,291	2,320
01-3-752-8100	Grants to other organizations	4,010	4,300
01-4-752-9950	Building - Mainland Recreation Area 'C'		204,358
Net (income) loss		(378)	-



**NORTH COAST**  
REGIONAL DISTRICT

**Department 901 - Feasibility Studies**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
01-1-901-5000	Property Tax Requisitions	(4,830)	(4,830)
01-1-901-5100	Grant In Lieu Of Taxes	(324)	(140)
01-1-901-8800	Transfer from Surplus-Feasibility Study		(10,000)
01-3-901-7720	Professional Fees - Feasibility Studies		10,000
01-3-901-8400	Contribution to Reserves	-	4,970
Net (income) loss		(5,154)	-



# **NORTH COAST**

REGIONAL DISTRICT

## **Department 810 - Sandspit Water**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
02-1-810-5200	Parcel Tax	(50,000)	(50,000)
02-1-810-5400	Grants - Conditional	-	(10,000)
02-1-810-6020	User Fees - Sandspit Water	(47,598)	(48,000)
02-1-810-6095	Discounts for Early Payment	2,858	3,000
02-1-810-8800	Transfer from Surplus - Sandspit Water		(22,570)
02-2-810-8410	Transfer from Reserve - Sandspit Water		(11,200)
02-3-810-7100	Administration Recovery	28,000	25,920
02-3-810-7410	Advertising & Promotions	-	250
02-3-810-7420	Bad Debts/Write-Offs	1,152	-
02-3-810-7440	Postage & Freight - Sandpit Water	-	410
02-3-810-7480	Office Supplies - Sandspit Water	-	200
02-3-810-7710	Contracts - Operations	34,820	36,000
02-3-810-7720	Professional Fees	-	15,000
02-3-810-7730	Legal Services	247	2,000
02-3-810-7840	Monitoring & Testing	-	1,000
02-3-810-7850	Permits and Licenses	700	1,350
02-3-810-7860	Utilities	10,316	10,200
02-3-810-7870	Repairs & Maintenance	910	7,000
02-3-810-7880	Water System Supplies	8,561	9,300
02-3-810-7885	Small Tools & Minor Equipment	-	1,000
02-3-810-8010	Building Insurance	926	940
02-3-810-8400	Contribution to Reserves	-	7,000
02-3-810-8700	Contingency		10,000
02-4-810-9500	Minor Equipment - Sandspit water	-	11,200



**NORTH COAST**  
REGIONAL DISTRICT

**Department 810 - Sandspit Water**

Account Code	Account Name	Actual 2018 YTD (unaudited)	Budget 2019 YTD Type - R3
	Net (income) loss	(9,108)	-



## **Staff Report**

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**Date:** March 22<sup>nd</sup>, 2019

**To:** D. Chapman, Chief Administrative Officer

**From:** D. Fish, Corporate Officer

**Subject:** Islands Solid Waste Landfill Gas Flare Project – CleanBC Communities Fund Application

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### **Recommendation:**

**THAT the staff report entitled “Charge North – CleanBC Communities Fund Application” be received;**

**AND THAT the Board of the North Coast Regional District support the Island Solid Waste Landfill Gas Flare project and associated CleanBC Communities Fund application and dedicate a total of up to \$13,350 to be funded from Islands Solid Waste function for the Regional District’s portion of the cost of the Islands Solid Waste Landfill Gas Flare project.**

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### **PURPOSE:**

The purpose of this report is to present to the North Coast Regional District (NCRD) Board a proposed CleanBC Communities Fund application in support of the Islands Solid Waste Landfill Gas Flare proeject.

This report seeks a resolution of support from the Board of the NCRD for the CleanBC Communities Fund application with a funding commitment of \$13,350 toward the total project cost of \$50,000.

## **BACKGROUND:**

In 2018, Sperling Hansen Associates (SHA) completed a report to quantify the quality and flow of the Landfill Gas (LG) at the Islands Solid Waste landfill to see whether it may be compatible for a greenhouse gas (GHG) emission reduction initiative. Based on the data collected and analysed, SHA recommended that the NCRD purchase and install a low-cost solar-flare system at the landfill, and at that same time, invest in the installation of new horizontal gas collectors in the current active face of the Phase 2 operations. Installation of the flare is anticipated to cost \$50,000, of which the CleanBC grant application seeks \$36,350 (76.66%).

## **DISCUSSION:**

The rationale for this project is to significantly reduce greenhouse gas emissions from the landfill. To do so, the project will flare, rather than to passively vent, methane gas **collected in the landfill's inactive Phase 1 area. The project will also add a new-gas collector system in the landfill's Phase 2 area which is active now. Combined, the flaring of methane gas released by the landfill's Phase 1 and Phase 2 areas is expected to reduce the landfill's annual carbon footprint by 3,500 tonnes of carbon-dioxide equivalent emissions.**

This project does align with the commitments made by the NCRD, under the ***B.C. Climate Action Charter***, to become carbon neutral and support more energy efficient communities.

Attachment A to this report includes a draft application to the CleanBC Communities Fund in support of the Islands Solid Waste Landfill Gas Flare project.

## **RECOMMENDATION:**

Staff is recommending that the Board of the NCRD provide a resolution of support for the proposed CleanBC Communities Fund application.

## Section 1: Applicant Information

Applicants will access the application through their client record in [the Local Government Information System \(LGIS\)](#). Please see the [Application Instructions \(PDF, 93 KB\)](#) for setting up access to LGIS if your organization does not already have this.

### 1. Applicant's Primary Contact Information (from the applicant organization)

- a) First Name: Daniel
- b) Last Name: Fish
- c) Title: Corporate officer
- d) Phone Number: (250) 624-2002, ext. 2
- e) Email Address: corporateofficer@ncrdbc.com

### 2. Applicant's Secondary Contact Information (optional)

## Section 2: Project Information

### 3. Project Title: Islands Landfill Gas Flare Project

### Project Description and Rationale

### 4. Project Description

#### a) Provide a general, brief description of the project.

The project will collect and flare methane gas at the Islands Solid Waste Landfill on Haida Gwaii to significantly reduce its greenhouse gas emissions.

#### b) Provide a detailed list of project works.

- Install a solar-powered flare system
- Prepare a fenced site for a new flare station
- Install piping to the flare station from a central gas-extraction point in Phase 1, the landfill's capped and closed area
- Dig trenches and install gas collector pipes in Phase 2, the landfill's active area
  - 100 metres of gravel-lined, 0.5-metre wide trench
  - 70 metres of perforated six-inch HDPE DR11 piping
  - 70 metres of solid four-inch HDPE DR17 piping
  - Fittings and appurtenances
- Engineering work for the flare design, procurement, and installation

### 5. Project Rationale: The rationale for the Islands Landfill Gas Flare Project is to significantly reduce greenhouse-gas emissions from the landfill now and in the future. First, the project will flare rather continue to passively vent methane gas collected in the landfill's inactive Phase 1 area.

The project will also add a new gas-collector system in the landfill's Phase 2 area, which is active now.

Combined, the flaring of methane gas released by the landfill's Phase 1 and 2 areas is expected to reduce the landfill's annual carbon footprint by 3,500 tonnes of carbon-dioxide equivalent emissions (CO<sub>2</sub>e).

## Federal Outcomes

6. Identify which outcome the project will support:
- Increased capacity to manage renewable energy

## Project Type

7. Project Category: Energy Efficiency

## Project Location

8. Project physical address: Islands Solid Waste Landfill, 71454 Highway 16
9. Has this project been the subject of another infrastructure grant application?
- c) No

## Project Nature

10. New: 100 per cent  
Rehabilitation:  
Expansion:  
Other:
11. Does the project involve public facing infrastructure?
- a) No
12. Does the project involve construction or rehabilitation of buildings?
- No
13. Does the project take into account your local government's Energy Efficient Step Code adoption? No

## Section 3: Eligibility Considerations

14. Do you have a Council/Board/Band Council or other appropriate governing body resolution authorizing the project to proceed and committing your share of project funding? (Yes)
15. Has the project started? Projects that have started (construction tender awarded) are ineligible. (No)
16. What is the percentage of project design that has been completed as of application submission date?
17. Estimated project start date: June. 15, 2019
18. Estimated project completion date: Aug. 30, 2019
19. Estimated construction start date: Aug. 1, 2019

20. Estimated construction completion date: Aug. 30, 2019

21. What is the population that will be directly served by this project? 4,500

22. Does the project benefit a wider geographic area? (Yes)

c) List any communities that will benefit from this project and the corresponding populations.  
Old Massett, Masset, Tow Hill, Port Clements, Tlell, Skidegate, Queen Charlotte, and Sandspit  
will all benefit.

23. Will the project support Indigenous populations? (Yes/No)

d) If Yes, please estimate the Indigenous population that the project will directly serve. 2,250

i.) If Yes, Please estimate the Indigenous population that the project will indirectly support. 0

24. Will the applicant own and operate the completed project? (Yes)

e) If No, provide additional information about the ownership of the completed project and who  
will be responsible for its operation and maintenance.

*Applications from improvement districts must be made by the sponsoring municipality or  
regional district. If the application is successful in obtaining funding, the ownership of the  
infrastructure and associated assets must be transferred to the sponsoring local government.*

f) Is there infrastructure related to the project that is owned, managed, or maintained by others  
(besides the main applicant organization)? (No)

ii.) If Yes, Please describe.

Local Governments only:

25. Has the community signed the BC Climate Action Charter? (Yes)

g) If No, Local Government applicants should be signatories of the BC Climate Action Charter in order for  
their application to be eligible under the Program. Please contact Program Staff if you have further  
questions.

## Section 4: Mandatory Documents

In all cases, relevant information should be included within the completed application form itself, as this  
will form the basis of the assessment. Please make specific reference within the application to sections  
of attached documents that you wish to be included in the review. Attachments should be clearly  
labelled, organized, and succinct.

### Local Government

26. Please attach each of these mandatory documents (15 MB limits per documents):

- ☐ Project location .KML file (see directions on website)
- ☐ Detailed Cost Estimate (see template on website)

- ☐ Site Plan
- ☐ Feasibility Study (see program guide for details)
- ☐ List and status of required licenses, permits and approvals. Indicate if they have been "obtained" or are "pending." Upload a copy of those obtained.

27. Please attach other supporting documents you wish to be considered (optional, see the Program Guide for guidance):

- ☐ Partnership agreement/ MOU between project partners if applicable
- ☐ Cost Benefit Analysis or Other Study
- ☐ Design Drawings or Details
- ☐ Business Plan
- ☐ Letters of Support

## 1. Section 5: Project Costs and Project Delivery

34. Total Gross Project Costs: \$50,000

35. Total Ineligible Project Costs: \$0.00

36. Total Eligible Project Costs [Total Project Costs less Total Ineligible Project Costs]: \$50,000

37. Other Confirmed Grant Funding Sources and amounts (Do not include internal funding sources): \$0.00

Please note: Other federal and/or provincial grants may affect the total grant requested as per stacking rules. See the Program Guide for information on stacking rules.

1. Gas Tax – Strategic Priorities Fund
2. Gas Tax – Community Works Fund
3. New Building Canada Fund – Small Communities Fund
4. Community Energy Leadership Program
5. First Nations Clean Energy Business Fund
6. Other

38. Net Eligible Costs [Total Eligible Project Costs less Total Other Funding Sources]: \$50,000

39. Maximum Grant Amount (No cap besides total intake of \$62.94 million)

40. Are you requesting less than the maximum grant amount? (Yes)

i. If Yes, Requested Grant Amount: \$36,650

41. If your detailed cost estimates do not directly correspond with these amounts, clarify the variance between the costs.

42. Please fill in the costs below. The costs to be entered will represent how much money you expect to spend on eligible costs for the project each year.

Fiscal Year	Forecasted Eligible Project Costs (April 1 to March 31)
2019-2020	\$50,000

### Funding Details

43. Is this project a phase\* or component of a larger project? (No)

ii. If Yes, please provide additional details on the phases, including funding for past and/or future phases and estimated timelines.

\*This phased approach should be reflected in the cost estimates and/or supporting documentation provided.

44. Can the project as submitted be broken into separate phases? (No)

iii. If Yes, how? Would part of this project be able to move forward if full funding was not available? See Program Guide section regarding funding allocations.

45. Do you intend to use your own workforce and/or equipment? (Yes)

46. At this stage, is there the intent to use sole source procurement for any aspect of the project? (Yes)

iv. If Yes, Identify the estimated amount of the sole source contract, who will be conducting the work, the nature of the work and explain why sole source contracting will be used. If approved, a sole-source contract will be offered to Sperling Hansen Associates, a B.C. engineering firm that has done extensive work at the Islands Landfill, including a feasibility study for this project. The total budget of about \$50,000 falls below the \$75,000 threshold that would require the North Coast Regional District to put the contract out for tender.

Projects that require sole source contracts over \$25,000 may need a Federal Treasury Board submission for project approval.

47. Is the employment of apprentices; Indigenous peoples; women; persons with disabilities; veterans; youth; recent immigrants; and small-sized, medium-sized and social enterprises to be considered during project procurement/construction? (No)

v. If Yes, describe.

## Section 6: Project Risks Project Financing

Applicants should have their share of the capital costs secured prior to application to the program.

Local Governments:

48. Will the Local Government portion of the project come from borrowing? (No)
  - i. If yes, what proportion of the Local Government share of project funding is expected to be from borrowing?
49. When and how will the borrowed funding be secured? (Example: referendum, secured line of credit etc. Attach evidence of secured funds.)
50. Is public approval required to approve borrowing? (No)
  - ii. If No, describe why approval is not required in order to borrow. The \$50,000 cost of the project is below the threshold that would require public approval.
  - iii. If Yes, please attach a scan of a signed and certified loan authorization bylaw that is at (or further than) 3<sup>rd</sup> reading.
  - iv. If Yes, please attach a completed Liability Servicing Limit Certificate that includes the anticipated borrowing costs necessary to finance the project.
  - v. If No, are all the funds readily accessible? (Yes)
    - a) If Yes, please attach evidence of secured funds.  
(Example: Bank statements, staff reports or resolutions of board/council directing the use of reserve funds.)
    - b) If No, what is the anticipated source of funds? The North Coast Regional District will fund the project using its regular operating funds.  
  
(Example: collected through specific rates or fees, development cost contributions?)
48. Is the project included in the 5-year financial plan bylaw (Yes)
  - vi. If Yes, click to upload document  
(Example: Bank statements, staff reports or resolutions of board/council directing the use of reserving funds.)
  - vii. If No, indicate when the project will be included in the 5-year financial plan bylaw and why it has not yet been included.
49. If there are cost overruns, what plans are in place, beyond including contingencies within the cost estimate, to fund the unforeseen cost increases? In the event of a cost overrun, the North Coast Regional District will seek a board resolution allocating regular NCRD operating funds to cover the difference.

Note: ICIP does not provide additional funds to cover cost overruns.

## Project Identification

65. How does this project align with the long-term plans/sustainability goals of your organization and/or community? Explain how this project supports the environmental, social and economic goals and

objectives of community and regional plans (Example: official community plan (OCP), regional growth strategy (RGS)?)

By reducing greenhouse gas emissions at Haida Gwaii's Islands Landfill, the project meets the long-term sustainability goals set out in North Coast Regional District's official community plan for Graham Island (2011). Under the Climate Change Adaptation and Mitigation section, the objectives include establishing the importance of reducing greenhouse-gas emission and reducing such emissions to at least 10 per cent below 2007 levels by 2020, and to 25 per cent below 2007 levels by 2050.

66. What alternative options for the project were considered? Rather than a solar-powered system, the Islands Landfill might have used a system with a pilot light lit by natural-gas. However, this would incur extra fuel, installation and procurement costs as well as resulting in more greenhouse-gas emissions. Another option considered would be to build a system that would use the available methane gas collected from Phases 1 and 2 of the Islands Landfill and provide heat/power to the workshop on the landfill site. However, the current rate of methane gas production is currently too low to warrant purchasing and installing such a system at this time.

67. How were they compared or analyzed? Please explain how and why the chosen option was selected.

Critical to choosing the solar-powered flare system here was the monitoring work done at the Islands Landfill by engineers with Sperling Hansen Associates as part of a feasibility study. The field work found that the current and projected methane gas production from Phases 1 and 2 of the landfill are just high enough to maintain a flare, but so far the concentration is too low to warrant a power-generating system.

68. How does the project represent the most efficient solution to achieving lower GHG emissions?

This project will largely use an existing gas collector system in the closed Phase 1 area of the Islands Landfill, re-purposed it from passive venting of methane gas to active flaring. By using a solar-powered rather than gas-powered flare, the system will not incur any added fuel costs or greenhouse-gas emissions.

(Note: Rationalize selection of the particular option\*, in that: services are integrated, operating and maintenance costs are minimized, the selected option has a longer lifespan minimizing replacement costs over time, coordination with other works, etc.)

\*The provincial technical reviewer will not be re-assessing project options. The purpose of this question is to demonstrate that the scope of the project was carefully considered.

## Section 7: Management and Planning

### Asset Management for Sustainable Service Delivery

The Asset Management BC Framework provides context and can be found on Asset Management BC's website: [www.assetmanagementbc.ca](http://www.assetmanagementbc.ca). The Asset Management BC Roadmap (found in the "Resources"

section of the website) provides a brief summary of the basic building blocks of asset management for sustainable service delivery.

## Local Governments

Questions relate to sustainable management and planning of infrastructure. Additional resources on infrastructure asset management can be found on the Asset Management BC website:  
[www.assetmanagementbc.ca](http://www.assetmanagementbc.ca)

For the infrastructure applied for in this application:

- 78. How will the assets associated with the completed project be managed and maintained over their life? The assets will be managed and maintained according to the North Coast Regional District's asset-management policy, which includes regular monitoring and funding for operations and maintenance.
- 79. How will ongoing operating and maintenance costs be funded? Ongoing operating and maintenance costs for the Islands Landfill gas flare project will be covered by regular operating funds.
- 80. How does the project design support reduced operation, maintenance and related costs\* over the lifecycle of the infrastructure? By choosing a solar-powered system to light the flare station pilot rather than a natural-gas system, the project as designed will avoid incurring unnecessary fuel costs to operate.

\*Operating and maintenance costs can be reduced over the lifecycle of the infrastructure through appropriate design. (Example: use of quality materials that require less maintenance, potential for remote monitoring, etc.)

- 81. Where the infrastructure will serve an ongoing need for the community, what activities will be carried out to ensure that the funds to replace the asset at the end of its life will be available? (Example: set aside funds annually to allow for renewal, replacement or rehab in 20 years. Funding through financial reserves, implementing a rate structure or user charges which include depreciation/replacement costs, etc.)

The NCRD has established operating and capital reserve funds to support any operating deficits within a given year and, ultimately, to set aside funds for the eventual replacement or rehabilitation of Islands Landfill gas flare project at the end of its expected lifespan.

Note: proponents are expected to manage the completed project in a financially sustainable manner, including planning for the eventual renewal of the infrastructure without grant support.

For all infrastructure that your organization manages:

- 82. How do you keep track of the infrastructure assets you manage, including their condition and performance? (Example: We have a database of all of our assets with information such as ID number, size, install date, expected life and condition. We track maintenance within this

database and performance and use this to assist with replacement decisions. We complete a condition assessment of critical assets once a year and enter the results in the database.)

The NCRD tracks its assets through the use of an asset management database to identify owned assets, size, install date, expected life and condition, as well as an associated maintenance schedule to identify asset maintenance needs. These tools assist the NCRD with replacement decisions for catalogued assets. Condition assessments are evaluated on an ongoing basis.

**83. What do you do to ensure that the service provided by infrastructure remains cost effective/cost efficient?**

The NCRD provides ongoing maintenance to its assets to ensure that any assets useful life is extended to its fullest potential, mitigating the need for habitual rehabilitation or replacement.

**84. Describe long-term planning activities that are currently used to manage infrastructure. (Example: This might include schedules or timelines that identify when items need to be replaced, maintenance plans/strategies, risk management plans, condition assessment plans that set out when inspections will occur, long-term financial plans.)**

The NCRD owns a limited number of assets. One of the largest and most costly assets owned by the NCRD is the Regional Recycling Facility in Prince Rupert. In 2016, recognizing the importance of maintaining and ameliorating the Regional Recycling Facility, the NCRD completed an asset management plan to identify performance, maintenance and replacement of the asset 10 years into the future.

**85. What are your ongoing revenue sources and what planning is carried out to ensure that costs to maintain, operate, and replace infrastructure assets can be met over the long-term? (Example: We have a plan that outlines the anticipated costs of operations, maintenance and renewals over the next 10 years, and a long-term financial plan that identifies secured and anticipated sources of funding over the next 10 years to levels that will enable these costs to be funded.)**

Ongoing revenue sources for the NCRD solid waste management service are, for the most part, raised through property taxation and user fees in the service area. As mentioned, assets are managed in accordance with the NCRD's Tangible Capital Asset policy and funding is requisitioned each year and allocated to reserves to allow for the eventual replacement or rehabilitation of assets.

## **Outcome 1: The project will increase the capacity to manage renewable energy**

Projects eligible under the CleanBC Communities Fund must invest in public infrastructure (capital assets) owned by a Local Government, Indigenous communities, a Not-For-Profit entity or For-Profit entity. The desired outcome is to increase the types and capacity of infrastructure that manage, distribute and control the use of renewable energy as defined in the Clean Energy Act (biomass, biogas, geothermal heat, hydro, solar, ocean, wind). The outcome refers to the ability tCleanBC Communitieso

transmit and make better use of renewable energy. For example, investment in infrastructure that uses and manages cleaner, renewable energy (heat recovery technologies, battery storage, devices, systems).

## Program Targets & Benefits

1. Does the project lead to an increase or reduction in greenhouse gas (GHG) emissions that can be credibly measured? (Yes). [See website for Resources on methodology to complete questions below]

i. If No, Message – “Projects must result in a measurable increase or decrease in greenhouse gas emissions, and those projects that cannot quantify emissions will not be considered for funding. Please contact Program Staff if you have further questions.”

\* Note that a full GHG assessment conducted or validated by a qualified assessor will be required following Provincial approval in principle and prior to federal approval. See the Program Guide for further details.

a) If Yes, Upload Box: upload the GHG mitigation assessment document for the project. Please use the methodology available on the program website.

b) If Yes, please fill out this chart:

GHG Mitigation Assessment					
Expected lifespan of the asset*			Indicate the year in which the expected lifespan of the asset begins		
2030 GHG Results			Lifetime GHG Results		
Baseline scenario emissions, cumulative to 2030		t / kt / Mt	Baseline scenario emissions, lifetime		t / kt / Mt
Estimated project emissions, cumulative to 2030		t / kt / Mt	Estimated project emissions, lifetime		t / kt / Mt
Net emissions	REDUCTION or INCREASE	t / kt / Mt	Net emissions	REDUCTION or INCREASE	t / kt / Mt

2. Is the community served by the project grid-connected (electricity or natural gas)? (Yes)

ii. If No, please describe what type of fuel or other energy sources are used for energy production that supplies the community.

iii. If No, will the project use an alternative source of energy production and what type of energy production does it replace? (Example: a diesel generated power plant will be replaced by a solar array and storage.)

iv. If No, does the project increase the efficiency of electricity being generated in an existing system? (Project should increase the kilowatts of electricity produced per litre of fuel used.) (Yes/No)

c) If Yes, what is the estimated amount of improvement in kilowatts/litres of fuel used? Could include solar power figures.

v. If Yes, what is the estimated improvement in energy efficiency provided by the project (%)

(Example: Percentage of total energy input to a machine or equipment that is consumed in useful work and not wasted as useless heat.)

3. Describe how the project increases capacity to manage renewable energy. The project is the first step to better managing methane produced by solid waste in the Islands Landfill. By flaring rather than continuing to passively vent gases collected from the landfill, the project will significantly reduce greenhouse-gas emissions at the landfill. As new phases of the landfill are closed and capped, the output of landfill gases will be monitored. If the gas output is sufficient, the North Coast Regional District may consider further upgrades, such as using the landfill gases to power and heat the workshop and lights at the Islands Landfill, or even to return excesses power to the northern Graham Island power grid.

4. What is the type of renewable energy system that will be improved or have its capacity increased through the project?

1. Solar

2. Wind

3. Ocean

4. Hydropower

5. Biomass

6. Geothermal Resources

7. Biofuels

8. Hydrogen derived from renewable sources

9. Heat Recovery

10. Other (Note to LGIS team - applicant to specify)

5. Estimate the annual amount of clean energy currently produced by each energy source (capacity before investment) and what annual amount of clean energy will be able to be produced following project completion (capacity after investment).

Before After Investment** Investment*		
Type and quantity of renewable energy (kW)	Solar	
	Wind	

	Ocean	
	Hydropower	
	Biomass	
	Geothermal	
	Biofuels	
	Hydrogen from renewable sources	
	Heat Recovery	
	Other (specify)	

\*Average annual energy that can be produced annually. \*\*Use forecasted annual assumption

6. Have you considered the effect of this project on future carbon and energy costs? (No)  
vi. If Yes, what will be the increase or decrease in the cost of energy (\$/kWhr) as a result of implementing the project?

### Managing Demand

7. Does the community have an energy demand side management\* plan? (No)

vii. If Yes, identify and explain how this project fits into the plan. Where applicable attach and identify relevant sections as supporting documentation. Reference any attached sections here.

viii. If Yes, have you implemented demand side management initiatives identified in the plan?

(Yes/No)

8. Do you use an energy management system\*\*to improve energy management? (No)

**9. Have you implemented initiatives in your Community Energy Emissions Plan, Community Energy Plan or Climate Action Plan\*\*\*? (No)**

d) If Yes, indicate which type of plan the community has.

e) If Yes, explain how this project fits into the plan. Where applicable attach and identify relevant sections as supporting documentation. Reference any attached sections here. f) If No, describe your intent for future implementation of your Plans.

\*Demand side management is both energy conservation (behavioural) and energy efficiency (technology) measures. For the purpose of this question, demand side management initiatives could be included and are defined as reducing citizens' demand for electricity by providing incentives, education, etc.

\*\* An energy management system is a series of processes that enables people of varied responsibilities across an organization to use data and information to maintain and improve energy performance, while improving operational efficiencies, decreasing energy intensity, and reducing environmental impacts.

\*\*\* Please see <http://www.bchydro.com/powersmart/business/programs/sustainable-communities/ceep.html> for an example of a Community Energy and Emissions Plan.

**10. How are you measuring your community's energy emissions?** The North Coast Regional District does not have global figures for the energy emissions in its area. However, the district does have measures and forecasts of the greenhouse-gas emissions from the Islands Landfill.

## **Innovation**

**11. Will the project incorporate innovative or emerging technologies/methods? (No)**

g) If Yes, describe the innovative technology/methods, equipment or products that will be used in the project.

h) If Yes, has the technology that will be used in the project been proven to work through tests to work in its final form and under expected operating conditions (considered to be at Technology Readiness Level 8)? For further information, see the Program Guide.

i) If No, please explain why you are not adopting a technology at Technology Readiness Level 8, and what other Technology Readiness Level best describes the project.

i) If Yes, describe any risk(s) specific to the use of new or innovative technologies and explain how they will be mitigated.

j) If Yes, Is the project replicable or transferrable to other jurisdictions/entities in BC?

k) If Yes, is this technology BC-based (manufactured in BC and installed by BC-based company)? (Yes/No)

ix. If Yes, identify how the technology will be created or manufactured within BC and how the project will result in an increase in local capacity in technology.

## Environmental Benefits

12. Describe how any of the following are applied during the construction, design or operation of the project:

- • A reduction in the use of natural resources
- • A reduction of impacts upon or protection, enhancement or restoration of the natural environment or wildlife habitat
- • Recovery or the reuse of resources This project will recover and flare methane gas emitted by the estimated 60,000 tones of solid waste currently buried in the closed Phase 1 area of the Islands Landfill, as well as by the projected Phase 2 phase. As the amount of solid waste in Phase 2 grows, the concentration of methane gas gathered by the new collector pipes may be high enough that the project can expanded to include power and/or heat production for the Islands Landfill workshop, thus reusing the methane gas as a power source.
- • A reduction in the greenhouse gas emissions during construction
- • The use of natural assets to deliver a service normally provided by built infrastructure.

(Examples: reduction in water needed in operation of infrastructure, use of non-potable water source for operational water needs, choice of site that reduces ecological impacts, inclusion of fish ladder at microhydro site to support fish migration, building envelope constructed of re-used shipping containers.)



### Bylaw No. 626, 2018

---

A bylaw authorize the borrowing of half a million dollars (\$500,000) for the purpose of borrowing funds to complete capital upgrades to the Regional Recycling Facility

---

**WHEREAS** the authority to borrow under this loan authorization bylaw expires 5 years from the date on which it is adopted;

**AND WHEREAS** pursuant to Section 407 of the *Local Government Act*, participating area approval is required and shall be obtained by alternative approval process under Section 345 of the *Local Government Act*;

**AND WHEREAS** the approval of the inspector of municipalities is required under Section 403 of the *Local Government Act*.

**NOW THEREFORE** the Board of the North Coast Regional District, in open meeting assembled, enacts as follows:

1. The North Coast Regional District service for which this bylaw relates to is the Mainland Recycling Service.
2. The North Coast Regional District is hereby empowered and authorized to borrow upon the credit of the North Coast Regional District a sum not exceeding a half million dollars (\$500,000) for the capital upgrades of the North Coast Regional District Regional Recycling Facility.
3. The maximum term for which debentures may be issued to secure the debt intended to be created by this bylaw is twenty (20) years.
4. This bylaw may be cited as the “Regional Recycling Facility Capital Upgrades Loan Authorization Bylaw No. 626, 2018”.

*Read a first time this*

***21<sup>st</sup> day of September, 2018***

*Read a second time this*

***21<sup>st</sup> day of September, 2018***

*Read a third time this*

***21<sup>st</sup> day of September, 2018***

*Approval of the Inspector of Municipalities*

***9<sup>th</sup> day of November, 2018***

*Approval of the electorate received this*

***28<sup>th</sup> day of February, 2019***

***Adopted this***

***\_\_\_ day of \_\_\_, 2018***

\_\_\_\_\_  
***Chair***

\_\_\_\_\_  
***Corporate Officer***

*I hereby certify that this is a true copy of the North Coast Regional District Bylaw No. 626, 2018.*



**Bylaw No. 631, 2019**

---

A bylaw to adopt the Five-Year Financial Plan for the Years 2019 to 2023

---

The Board of the North Coast Regional District, in open meeting assembled, enacts as follows:

1. **Schedule “A” attached hereto and made part of this bylaw is hereby adopted as the Five-Year Financial Plan for the North Coast Regional District for the years 2019-2023, inclusive.**
2. **This Bylaw shall be cited as the “North Coast Regional District Five-Year Financial Plan Years 2019-2023 Bylaw No. 631, 2019”.**

*Read a first time this* \_\_\_\_\_ **day of** \_\_\_\_\_, **2019**

*Read a second time this* \_\_\_\_\_ **day of** \_\_\_\_\_, **2019**

*Read a third time this* \_\_\_\_\_ **day of** \_\_\_\_\_, **2019**

***Adopted this*** \_\_\_\_\_ **day of** \_\_\_\_\_, **2019**

\_\_\_\_\_  
*Chair*

\_\_\_\_\_  
*Corporate Officer*

*I hereby certify that this is a true copy of the North Coast Regional District Bylaw No. 631, 2019.*

# Schedule A

North Coast Regional District  
Financial Plan for 2019 - 2023  
General Government Administration

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	450,000	450,000	450,000	450,000	450,000
Provincial Basic Grant	120,000	120,000	120,000	120,000	120,000
Conditional Grant	13,000	13,000	13,000	13,000	13,000
Unconditional Grant	30,000	30,000	30,000	30,000	30,000
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	8,600	8,600	8,600	8,600	8,600
Other	-	-	-	-	-
Transfer from Other Services	361,240	361,240	361,240	361,240	361,240
Use of Prior Year Surplus	125,965	158,747	194,444	230,636	266,947
Total Revenue	1,108,805	1,141,587	1,177,284	1,213,476	1,249,787
Expenditures					
Program Expenditures	1,108,805	1,141,587	1,177,284	1,213,476	1,249,787
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	1,108,805	1,141,587	1,177,284	1,213,476	1,249,787

North Coast Regional District  
Financial Plan for 2019 - 2023  
Mainland Recycling

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	249,524	249,524	249,524	249,524	249,524
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	1,298,475	-	-	-	-
Debt proceeds	500,000	-	-	-	-
Unconditional Grant	25,000	25,000	25,000	25,000	25,000
Sales of Services	62,950	62,950	62,950	62,950	62,950
Sales of Materials	333,000	333,000	333,000	333,000	333,000
Investments	-	-	-	-	-
Rental Income	10,500	10,500	10,500	10,500	10,500
Other	1,500	1,500	1,500	1,500	1,500
Transfer from Other Services	-	-	-	-	-
Use of Prior Year Surplus	113,015	160,219	181,576	204,002	227,548
<b>Total Revenue</b>	<b>2,593,964</b>	<b>842,693</b>	<b>864,050</b>	<b>886,476</b>	<b>910,022</b>
<b>Expenditures</b>					
Program Expenditures	704,581	724,927	746,284	768,710	792,256
Debt Interest	8,488	16,738	16,738	16,738	16,738
Debt Principal	8,820	27,428	27,428	27,428	27,428
Transfer to Capital	1,798,475	-	-	-	-
Transfer to Reserves	73,600	73,600	73,600	73,600	73,600
<b>Total Operating Expenditures</b>	<b>2,593,964</b>	<b>842,693</b>	<b>864,050</b>	<b>886,476</b>	<b>910,022</b>
<b>Capital</b>					
Sources of Funding					
Operations	1,798,475	-	-	-	-
Transfer from Reserves	-	-	-	-	-
<b>Total Capital Funding</b>	<b>1,798,475</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
Capital Purchases	1,798,475	-	-	-	-
Unused Capital Funding	-	-	-	-	-

North Coast Regional District  
Financial Plan for 2019 - 2023  
Island Solid Waste

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	170,000	170,000	170,000	170,000	170,000
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	4,600	4,600	4,600	4,600	4,600
Sales of Services	845,216	845,216	845,216	845,216	845,216
Sales of Materials	900	900	900	900	900
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	1,000	1,000	1,000	1,000	1,000
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	111,782	130,827	150,855	171,882	193,963
<b>Total Revenue</b>	<b>1,133,498</b>	<b>1,152,543</b>	<b>1,172,571</b>	<b>1,193,598</b>	<b>1,215,679</b>
<b>Expenditures</b>					
Program Expenditures	1,025,498	1,044,543	1,064,571	1,085,598	1,107,679
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	81,000	81,000	81,000	81,000	81,000
Transfer to Reserves	27,000	27,000	27,000	27,000	27,000
<b>Total Operating Expenditures</b>	<b>1,133,498</b>	<b>1,152,543</b>	<b>1,172,571</b>	<b>1,193,598</b>	<b>1,215,679</b>
<b>Capital</b>					
<b>Sources of Funding</b>					
Operations	81,000	81,000	81,000	81,000	81,000
Transfer from Reserves	-	-	-	-	-
<b>Total Capital Funding</b>	<b>81,000</b>	<b>81,000</b>	<b>81,000</b>	<b>81,000</b>	<b>81,000</b>
<b>Capital Purchases</b>	<b>81,000</b>	<b>81,000</b>	<b>81,000</b>	<b>81,000</b>	<b>81,000</b>
<b>Unused Capital Funding</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>

North Coast Regional District  
Financial Plan for 2019 - 2023  
Electoral Area Administration

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	95,960	95,960	95,960	95,960	95,960
Provincial Basic Grant	80,000	80,000	80,000	80,000	80,000
Conditional Grant	-	-	-	-	-
Unconditional Grant	3,600	3,600	3,600	3,600	3,600
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	43,926	48,124	52,531	57,158	62,017
Total Revenue	223,486	227,684	232,091	236,718	241,577
Expenditures					
Program Expenditures	223,486	227,684	232,091	236,718	241,577
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	223,486	227,684	232,091	236,718	241,577

North Coast Regional District  
Financial Plan for 2019 - 2023  
Electoral Area Administration - Area E

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	12,700	12,700	12,700	12,700	12,700
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	970	970	970	970	970
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	2,170	2,170	2,170	2,170	2,170
Total Revenue	15,840	15,840	15,840	15,840	15,840
Expenditures					
Program Expenditures	15,840	15,840	15,840	15,840	15,840
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	15,840	15,840	15,840	15,840	15,840

North Coast Regional District  
Financial Plan for 2019 - 2023  
Elections

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	5,000	5,000	5,000	5,000	5,000
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	200	200	200	200	200
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	-	-	-	-	-
<b>Total Revenue</b>	<b>5,200</b>	<b>5,200</b>	<b>5,200</b>	<b>5,200</b>	<b>5,200</b>
<b>Expenditures</b>					
Program Expenditures	5,200	5,200	5,200	5,200	5,200
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
<b>Total Operating Expenditures</b>	<b>5,200</b>	<b>5,200</b>	<b>5,200</b>	<b>5,200</b>	<b>5,200</b>

North Coast Regional District  
Financial Plan for 2019 - 2023  
Grants in Aid - All

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	2,120	2,120	2,120	2,120	2,120
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	230	230	230	230	230
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	120	120	120	120	120
Total Revenue	2,470	2,470	2,470	2,470	2,470
Expenditures					
Program Expenditures	2,470	2,470	2,470	2,470	2,470
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	2,470	2,470	2,470	2,470	2,470

North Coast Regional District  
Financial Plan for 2019 - 2023  
Grants in Aid Area A

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	640	640	640	640	640
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	20	20	20	20	20
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	40	40	40	40	40
Total Revenue	700	700	700	700	700
Expenditures					
Program Expenditures	700	700	700	700	700
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	700	700	700	700	700

North Coast Regional District  
Financial Plan for 2019 - 2023  
Grants in Aid Area C

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	1,400	1,400	1,400	1,400	1,400
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	5,095	5,095	5,095	5,095	5,095
Unconditional Grant	30	30	30	30	30
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	1,345	1,345	1,345	1,345	1,345
<b>Total Revenue</b>	<b>7,870</b>	<b>7,870</b>	<b>7,870</b>	<b>7,870</b>	<b>7,870</b>
<b>Expenditures</b>					
Program Expenditures	7,870	7,870	7,870	7,870	7,870
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
<b>Total Operating Expenditures</b>	<b>7,870</b>	<b>7,870</b>	<b>7,870</b>	<b>7,870</b>	<b>7,870</b>

North Coast Regional District  
Financial Plan for 2019 - 2023  
Grants in Aid Area D

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	2,500	2,500	2,500	2,500	2,500
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	20	20	20	20	20
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	3,500	3,500	3,500	3,500	3,500
<b>Total Revenue</b>	<b>6,020</b>	<b>6,020</b>	<b>6,020</b>	<b>6,020</b>	<b>6,020</b>
<b>Expenditures</b>					
Program Expenditures	6,020	6,020	6,020	6,020	6,020
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
<b>Total Operating Expenditures</b>	<b>6,020</b>	<b>6,020</b>	<b>6,020</b>	<b>6,020</b>	<b>6,020</b>

North Coast Regional District  
Financial Plan for 2019 - 2023  
Grants in Aid Area E

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	4,361	4,361	4,361	4,361	4,361
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	100	100	100	100	100
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	-	-	-	-	-
<b>Total Revenue</b>	<b>4,461</b>	<b>4,461</b>	<b>4,461</b>	<b>4,461</b>	<b>4,461</b>
<b>Expenditures</b>					
Program Expenditures	4,461	4,461	4,461	4,461	4,461
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
<b>Total Operating Expenditures</b>	<b>4,461</b>	<b>4,461</b>	<b>4,461</b>	<b>4,461</b>	<b>4,461</b>

North Coast Regional District  
Financial Plan for 2019 - 2023  
Member Municipality Debt

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	-	-	-	-	-
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	-	-	-	-	-
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	1,412,665	1,412,665	1,412,665	1,412,665	1,412,665
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	-	-	-	-	-
Total Revenue	1,412,665	1,412,665	1,412,665	1,412,665	1,412,665
Expenditures					
Program Expenditures					
Debt Interest	723,460	723,460	723,460	723,460	723,460
Debt Principal	689,205	689,205	689,205	689,205	689,205
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	1,412,665	1,412,665	1,412,665	1,412,665	1,412,665

North Coast Regional District  
Financial Plan for 2019 - 2023  
Vancouver Island Regional Library Debt

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	-	-	-	-	-
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	-	-	-	-	-
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	103,074	103,074	103,074	103,074	103,074
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	-	-	-	-	-
Total Revenue	103,074	103,074	103,074	103,074	103,074
Expenditures					
Program Expenditures					
Debt Interest	47,250	47,250	47,250	47,250	47,250
Debt Principal	55,824	55,824	55,824	55,824	55,824
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	103,074	103,074	103,074	103,074	103,074

North Coast Regional District  
Financial Plan for 2019 - 2023  
Sandspit Fire Department

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	27,500	27,500	27,500	27,500	27,500
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	1,100	1,100	1,100	1,100	1,100
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	25,333	25,333	25,333	25,333	25,333
Total Revenue	53,933	53,933	53,933	53,933	53,933
Expenditures					
Program Expenditures	53,933	53,933	53,933	53,933	53,933
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	53,933	53,933	53,933	53,933	53,933

North Coast Regional District  
Financial Plan for 2019 - 2023  
Emergency Planning Area A & C

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	5,000	5,000	5,000	5,000	5,000
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	120	120	120	120	120
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	33,528	33,528	33,528	33,528	33,528
Total Revenue	38,648	38,648	38,648	38,648	38,648
Expenditures					
Program Expenditures	38,648	38,648	38,648	38,648	38,648
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	38,648	38,648	38,648	38,648	38,648

North Coast Regional District  
Financial Plan for 2019 - 2023  
Emergency Planning Area D

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	5,000	5,000	5,000	5,000	5,000
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	100	100	100	100	100
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	43,738	43,738	43,738	43,738	43,738
Total Revenue	48,838	48,838	48,838	48,838	48,838
Expenditures					
Program Expenditures	48,838	48,838	48,838	48,838	48,838
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	48,838	48,838	48,838	48,838	48,838

North Coast Regional District  
Financial Plan for 2019 - 2023  
Emergency Planning Area E

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	19,320	19,320	19,320	19,320	19,320
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	250	250	250	250	250
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	26,638	26,638	26,638	26,638	26,638
Total Revenue	46,208	46,208	46,208	46,208	46,208
Expenditures					
Program Expenditures	46,208	46,208	46,208	46,208	46,208
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	46,208	46,208	46,208	46,208	46,208

North Coast Regional District  
Financial Plan for 2019 - 2023  
Tlell Fire Department

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	25,000	25,000	25,000	25,000	25,000
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	836	836	836	836	836
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	-	-	-	-	-
Total Revenue	25,836	25,836	25,836	25,836	25,836
Expenditures					
Program Expenditures	25,836	25,836	25,836	25,836	25,836
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	25,836	25,836	25,836	25,836	25,836

North Coast Regional District  
Financial Plan for 2019 - 2023  
Rural Land Use Planning

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	64,940	64,940	64,940	64,940	64,940
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	1,900	1,900	1,900	1,900	1,900
Sales of Services	3,500	3,500	3,500	3,500	3,500
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	19,915	19,915	19,915	19,915	19,915
<b>Total Revenue</b>	<b>90,255</b>	<b>90,255</b>	<b>90,255</b>	<b>90,255</b>	<b>90,255</b>
<b>Expenditures</b>					
Program Expenditures	90,255	90,255	90,255	90,255	90,255
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
<b>Total Operating Expenditures</b>	<b>90,255</b>	<b>90,255</b>	<b>90,255</b>	<b>90,255</b>	<b>90,255</b>

North Coast Regional District  
Financial Plan for 2019 - 2023  
Economic Development

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	27,330	27,330	27,330	27,330	27,330
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	50,000	50,000	50,000	50,000	50,000
Unconditional Grant	40	40	40	40	40
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	7,765	7,765	7,765	7,765	7,765
<b>Total Revenue</b>	<b>85,135</b>	<b>85,135</b>	<b>85,135</b>	<b>85,135</b>	<b>85,135</b>
<b>Expenditures</b>					
Program Expenditures	75,135	85,135	85,135	85,135	85,135
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	10,000	-	-	-	-
Transfer to Reserves	-	-	-	-	-
<b>Total Operating Expenditures</b>	<b>85,135</b>	<b>85,135</b>	<b>85,135</b>	<b>85,135</b>	<b>85,135</b>
<b>Capital</b>					
<b>Sources of Funding</b>					
Operations	10,000	-	-	-	-
Transfer from Reserves	-	-	-	-	-
<b>Total Capital Funding</b>	<b>10,000</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
<b>Capital Purchases</b>	<b>10,000</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
<b>Unused Capital Funding</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>

North Coast Regional District  
Financial Plan for 2019 - 2023  
Archives

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	91,780	91,780	91,780	91,780	91,780
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	6,166	6,166	6,166	6,166	6,166
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	8,840	8,840	8,840	8,840	8,840
Total Revenue	106,786	106,786	106,786	106,786	106,786
Expenditures					
Program Expenditures	106,786	106,786	106,786	106,786	106,786
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	106,786	106,786	106,786	106,786	106,786

North Coast Regional District  
Financial Plan for 2019 - 2023  
North Pacific Cannery

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	95,000	95,000	95,000	95,000	95,000
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	5,500	5,500	5,500	5,500	5,500
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	5,585	5,585	5,585	5,585	5,585
<b>Total Revenue</b>	<b>106,085</b>	<b>106,085</b>	<b>106,085</b>	<b>106,085</b>	<b>106,085</b>
<b>Expenditures</b>					
Program Expenditures	102,085	102,085	102,085	102,085	102,085
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	4,000	4,000	4,000	4,000	4,000
<b>Total Operating Expenditures</b>	<b>106,085</b>	<b>106,085</b>	<b>106,085</b>	<b>106,085</b>	<b>106,085</b>

North Coast Regional District  
Financial Plan for 2019 - 2023  
Haida Gwaii Museum

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	82,880	82,880	82,880	82,880	82,880
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	2,100	2,100	2,100	2,100	2,100
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	924	924	924	924	924
Total Revenue	85,904	85,904	85,904	85,904	85,904
Expenditures					
Program Expenditures	85,904	85,904	85,904	85,904	85,904
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	85,904	85,904	85,904	85,904	85,904

North Coast Regional District  
Financial Plan for 2019 - 2023  
Vancouver Island Regional Library

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	62,343	62,343	62,343	62,343	62,343
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	1,200	1,200	1,200	1,200	1,200
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	-	-	-	-	-
Total Revenue	63,543	63,543	63,543	63,543	63,543
Expenditures					
Program Expenditures	63,543	63,543	63,543	63,543	63,543
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	63,543	63,543	63,543	63,543	63,543

North Coast Regional District  
Financial Plan for 2019 - 2023  
Haida Gwaii Recreation

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	138,720	138,720	138,720	138,720	138,720
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	6,500	6,500	6,500	6,500	6,500
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	4,395	8,280	12,352	16,627	21,116
Total Revenue	149,615	153,500	157,572	161,847	166,336
Expenditures					
Program Expenditures	149,615	153,500	157,572	161,847	166,336
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	149,615	153,500	157,572	161,847	166,336

North Coast Regional District  
Financial Plan for 2019 - 2023  
Sandspit Community Hall

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	18,926	18,926	18,926	18,926	18,926
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	100	100	100	100	100
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	2,500	2,500	2,500	2,500	2,500
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	5,490	5,490	5,490	5,490	5,490
Total Revenue	27,016	27,016	27,016	27,016	27,016
Expenditures					
Program Expenditures	27,016	27,016	27,016	27,016	27,016
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	27,016	27,016	27,016	27,016	27,016

North Coast Regional District  
Financial Plan for 2019 - 2023  
Mainland Recreation Area A

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	5,930	5,930	5,930	5,930	5,930
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	735	735	735	735	735
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	600	600	600	600	600
Total Revenue	7,265	7,265	7,265	7,265	7,265
Expenditures					
Program Expenditures	7,265	7,265	7,265	7,265	7,265
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	7,265	7,265	7,265	7,265	7,265

North Coast Regional District  
Financial Plan for 2019 - 2023  
Mainland Recreation Area C

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Property Taxes	7,000	7,000	7,000	7,000	7,000
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	204,358	-	-	-	-
Unconditional Grant	90	90	90	90	90
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	95	95	95	95	95
<b>Total Revenue</b>	<b>211,543</b>	<b>7,185</b>	<b>7,185</b>	<b>7,185</b>	<b>7,185</b>
<b>Expenditures</b>					
Program Expenditures	7,185	7,185	7,185	7,185	7,185
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	204,358	-	-	-	-
Transfer to Reserves	-	-	-	-	-
<b>Total Operating Expenditures</b>	<b>211,543</b>	<b>7,185</b>	<b>7,185</b>	<b>7,185</b>	<b>7,185</b>
<b>Capital</b>					
<b>Sources of Funding</b>					
Operations	204,358	-	-	-	-
Transfer from Reserves	-	-	-	-	-
<b>Total Capital Funding</b>	<b>204,358</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
<b>Capital Purchases</b>	<b>204,358</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
<b>Unused Capital Funding</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>

North Coast Regional District  
Financial Plan for 2019 - 2023  
Feasibility Study Reserve

	2019	2020	2021	2022	2023
Revenue					
Property Taxes	4,830	4,830	4,830	4,830	4,830
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	140	140	140	140	140
Sales of Services	-	-	-	-	-
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	-	-	-	-	-
Use of Prior Year Surplus	10,000	10,000	10,000	10,000	10,000
Total Revenue	14,970	14,970	14,970	14,970	14,970
Expenditures					
Program Expenditures	14,970	14,970	14,970	14,970	14,970
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	-	-	-	-	-
Transfer to Reserves	-	-	-	-	-
Total Operating Expenditures	14,970	14,970	14,970	14,970	14,970

North Coast Regional District  
Financial Plan for 2019 - 2023  
Sandspit Water

	2019	2020	2021	2022	2023
<b>Revenue</b>					
Parcel Tax	50,000	50,000	50,000	50,000	50,000
Provincial Basic Grant	-	-	-	-	-
Conditional Grant	-	-	-	-	-
Unconditional Grant	10,000	10,000	10,000	10,000	10,000
Sales of Services	45,000	45,000	45,000	45,000	45,000
Sales of Materials	-	-	-	-	-
Investments	-	-	-	-	-
Rental Income	-	-	-	-	-
Other	-	-	-	-	-
Transfer from Other Services	-	-	-	-	-
Transfer from Reserves	11,200	11,200	11,200	11,200	11,200
Use of Prior Year Surplus	22,570	22,570	22,570	22,570	22,570
<b>Total Revenue</b>	<b>138,770</b>	<b>138,770</b>	<b>138,770</b>	<b>138,770</b>	<b>138,770</b>
<b>Expenditures</b>					
Program Expenditures	120,570	120,570	120,570	120,570	120,570
Debt Interest	-	-	-	-	-
Debt Principal	-	-	-	-	-
Transfer to Capital	11,200	11,200	11,200	11,200	11,200
Transfer to Reserves	7,000	7,000	7,000	7,000	7,000
<b>Total Operating Expenditures</b>	<b>138,770</b>	<b>138,770</b>	<b>138,770</b>	<b>138,770</b>	<b>138,770</b>
<b>Capital</b>					
<b>Sources of Funding</b>					
Operations	11,200	11,200	11,200	11,200	11,200
Transfer from Reserves	-	-	-	-	-
<b>Total Capital Funding</b>	<b>11,200</b>	<b>11,200</b>	<b>11,200</b>	<b>11,200</b>	<b>11,200</b>
<b>Capital Purchases</b>	<b>11,200</b>	<b>11,200</b>	<b>11,200</b>	<b>11,200</b>	<b>11,200</b>
<b>Unused Capital Funding</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>



### Staff Report

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**Date:** March 22, 2019

**To:** D. Chapman, Chief Administrative Officer

**From:** M. Williams, Planning Consultant

**Subject:** Referral – Haida Tourism

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### Recommendations:

Action: that the Board provide feedback to the Province of BC regarding this referral.

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### BACKGROUND

The North Coast Regional District received a Land Referral from the Province of BC for a license of occupation for Haida Tourism for Commercial Recreation/Adventure Tourism.

The Ministry has asked for comments regarding this referral. Standard responses:

1. Interests unaffected;
2. No objection to approval of project;
3. No objection to approval of project subject to conditions as discussed by the Board; or
4. Recommend refusal of project due to reasons outlined by the Board.

### APC COMMENT

Comments received from members of the Advisory Planning Commission are attached. Staff received comment from APC 14 March 2019 and have requested additional information from Province. Any response provided will be provided to the Board.

### ALTERNATIVES

The Board may identify alternatives through discussion.

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## **Comment received from APC**

Morganne

We have read and evaluated the Application resources that have been forwarded by you. I note that we have the management plan and accompanying documents, but is this actually the Application itself? The processing File #1414358 that would show that the Management plan and accompanying documents are actually related to, and part of, the Application which has been received by Government Services is not actually written on the documents. Thus our decision is based on this package and might not be valid if there are alterations.

We would like to know the duration of the LOO This would be on the Application document requested above?

It has come to my/our attention that Ocean House will (possibly) be combined Sport Fishing and Eco Tourism for the 2019 Season. This, I believe is to compensate for the loss of the Hippa Lodge for the season. As the Application does not clearly define what Eco/Cultural Tourism is, we would like to seek clarification.

Though we can accommodate this exception for "emergency" purposes we would reflect that the SQCRD approved the original/previous application based on the premise that it would not be a sport fishing lodge. Thus our approval and NCRD approval of this application would be based on the same premise.

Other than this concern (Stan and Gord are free to chime in); in my conversations with both Stan and Gord I get the sense that this Management Plan meets and possibly exceeds the expectations that the community expressed and is acceptable to the MIAPC. As the Management Plan is clearly in line with the community wishes we feel no need to consult further with the community and will not have a public meeting as that appears redundant. I view this application as a continuation of the process that took place in 2018 and this correspondence is to express our approval .

Unless there is information in the actual Application Document that contradicts the content of the Management Plan (as received from you) we believe that the interests of the public have been well addressed.

We thank the Applicants for their consideration and accommodation of the interests of the public we represent and wish them success.

I think that interactions between the public and the lodge in the summer of 2018 demonstrated that the existing sharing arrangement is both desirable and compatible. As long as the public maintains an appropriate decorum in the area this should be a successful relationship.

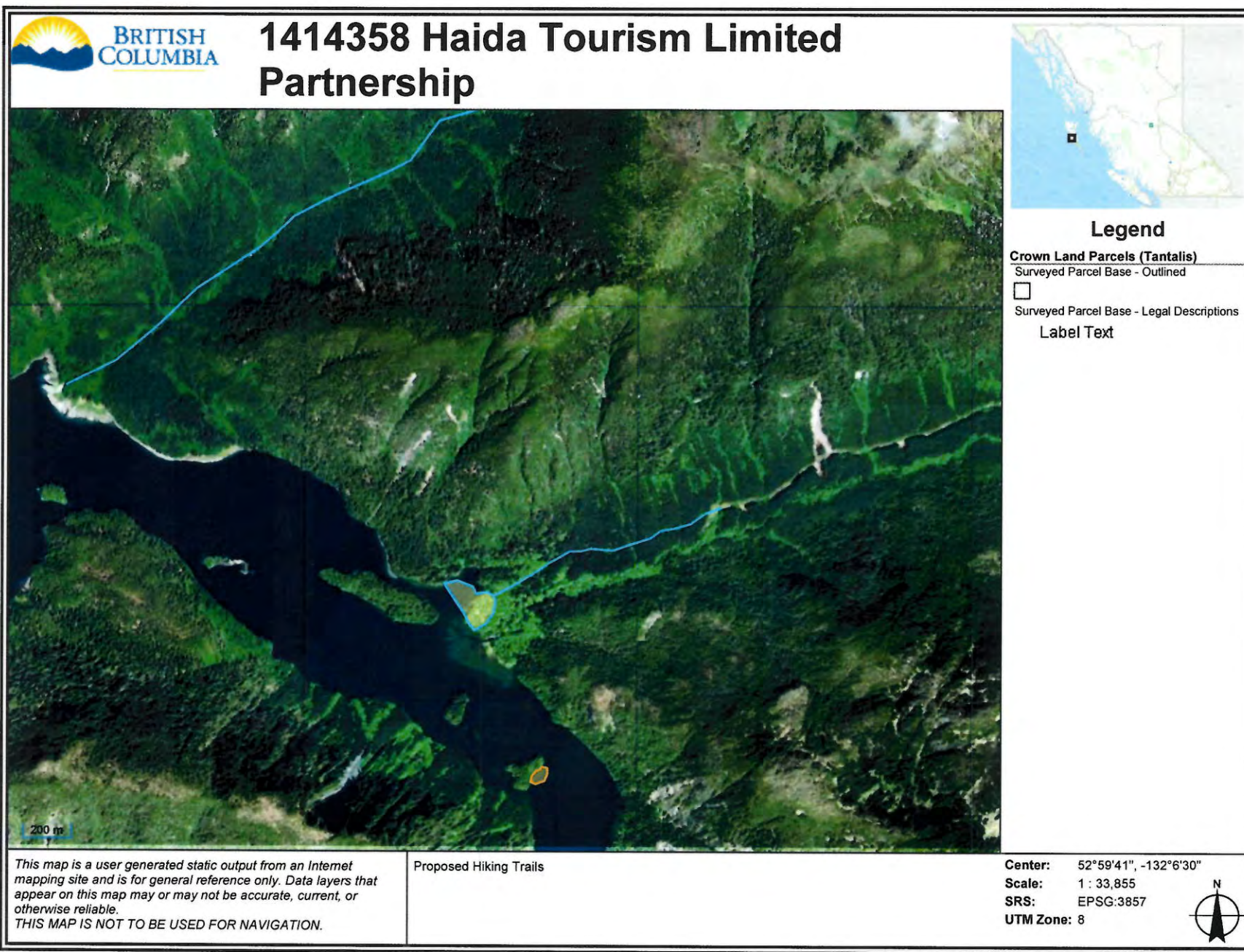
As the sitting members of the Moresby Island Advisory Planning Commission (MIAPC) we recommend that the North Coast Regional District (NCRD) support/approve this Land Use Referral Application taking into account their previous motion regarding longer term usage as a fishing lodge..

Unless the NCRD requests that we hold a public meeting and make a motion at that meeting we consider this to be the MIAPC position once you have received e-mails from Gord Usher and Stan Hovde confirming their acceptance of this position.

If there is anything in the actual application that conflicts with our understandings, this support will need to be revisited.

Sincerely, On behalf of the MIAPC, Doug Gould Chair

**Note: this was agreed upon by Gord Usher**



**Haida Tourism Limited Partnership  
DBA Ocean House at Stads K'uns Gawga  
Crown Land Tenure Management Plan  
(License of Occupation Commercial Recreation  
– Peel Inlet)**

**Prepared by:**  
**Zimmfor Management Services Ltd.**  
**(Jill West RPF, Marika Forge RPBio.)**

**December 2018**  
**Amended February 2019**

Haida Tourism Limited Partnership (HTLP) is owned by the Haida Nation and is a subsidiary of the Haida Enterprise Corporation (HaiCo). The Ocean House at Stads K'uns Gawga is the newest business operating under HTLP. Through Ocean House, HTLP provides unique opportunities for eco-adventure and cultural tourism seekers on Haida Gwaii's beautiful and rugged West Coast.

## Background

### Project Overview

In November 2016, a License of Occupation (V925687) was issued to HTLP for conducting reconnaissance and survey work to plan improvements for a proposed land-based eco-tourism/ cultural lodge.

An amendment was made to the license in February of 2018 to update the commercial recreational activities to include the installation of the floating lodge (barge) and related infrastructure including a ramp for shore access, clearing of a small area of land to facilitate a helicopter pad, removal of garbage and equipment from the old dry-land sort and to continue reconnaissance and survey work for potential future improvements.

Ocean House floating lodge operated in the 2018 season (June – September 2018 season) at Peel Inlet.

The previous license V925687 has now expired.

This Management Plan (Feb '19) is submitted in support HTLP application for a new Commercial Recreational License of Occupation (LOO), to reflect the appropriate use of the Crown Land for the floating lodge as well as to include the addition of a garbage incinerating barge (see attached map for garbage barge location).

We are not seeking approval or any additional reconnaissance and survey work related to a proposed land-based lodge as part of this new application.

In addition to this management plan, HTLP has implemented a Corporate Management System (CMS) that includes Standard Operating Procedures (SOPs) covering environmental and safety procedures, as well as various forms and checklists that cover all legal and regulatory requirements for all aspects of our eco-tourism lodge. The following key CMS SOPs apply to our activities:

- General
- Accommodation and Retail
- Cultural Tourism Operations
- Emergency Preparedness and Response Procedures
- Fishing Operations
- Housekeeping
- Kitchen, Service and Bar
- Maintenance and Hazmat

## Authorizations, Permits or Approvals

Permission was received from Transport Canada under the *Navigation Protection Act* for the lodge facility on May 25, 2018. An additional notice was submitted to Transport Canada under the Navigable Waters Program related to the floating incinerator barge early in 2019.

HTLP also possesses Park permits for the eco-cultural tours at locations outside of the LOO license area (either conducted by HTLP or through third party service providers and their permits). Eco tourism activities will also occur within the LOO area (see Eco-Tourism/ Culture Trip Proposals section for further explanation).

Additional permits in place include: drinking water system operating permit, food services establishment permit, and liquor license.

## Confirmation of Safety Plan

HTLP's occupational health and safety program is also integrated into the CMS. All requirements under WorkSafeBC can be found within the CMS Manual, SOPs, checklists and forms.

## First Nations

HTLP is a company owned by the Haida Nation. The Council of the Haida Nation (CHN) is engaged regarding HTLP activities.

## **Location**

### General Description

Ocean House season is conducted in Peel Inlet, West Coast of Moresby Island, Haida Gwaii. The incineration barge will be located south of the lodge also within Peel Inlet (see attached map).

Eco/ Cultural activities that are planned to be completed within the LOO Area at this time include recreational fishing or crab/ prawn collection using traps, kayaking, paddle boarding, hiking, beach meal service and/ or small beach fires. Any planned activities outside of the LOO area will be conducted under appropriate permits and licenses.

### Reasons/Justification for Location

Peel Inlet provides a sheltered area for the floating lodge (somewhat protected from the rugged west coast weather and ocean waves). Additionally, the location away from urban development allows visitors to experience a natural and remote experience.

The location of the garbage incineration barge has been selected a bit further down the inlet on the sheltered back-side of one of the small islands. It was determined that there was insufficient space next to the Lodge and a preference to keep the burning activities in a location to not impact the remote wilderness experience for the guests. The small island will be located behind creates a visual barrier for guests at the lodge, and the distance is far enough away to keep the smell and the smoke from drifting towards the lodge.

## Seasonal Expectations of Use

The Lodge will operate on a seasonal basis, with daily activity tentatively from May 1st to October 1<sup>st</sup>.

The garbage incinerator barge will be operated during the same time frame. Both the incinerator barge and the floating lodge will be towed to off-season locations from October through to May.

## **Infrastructure**

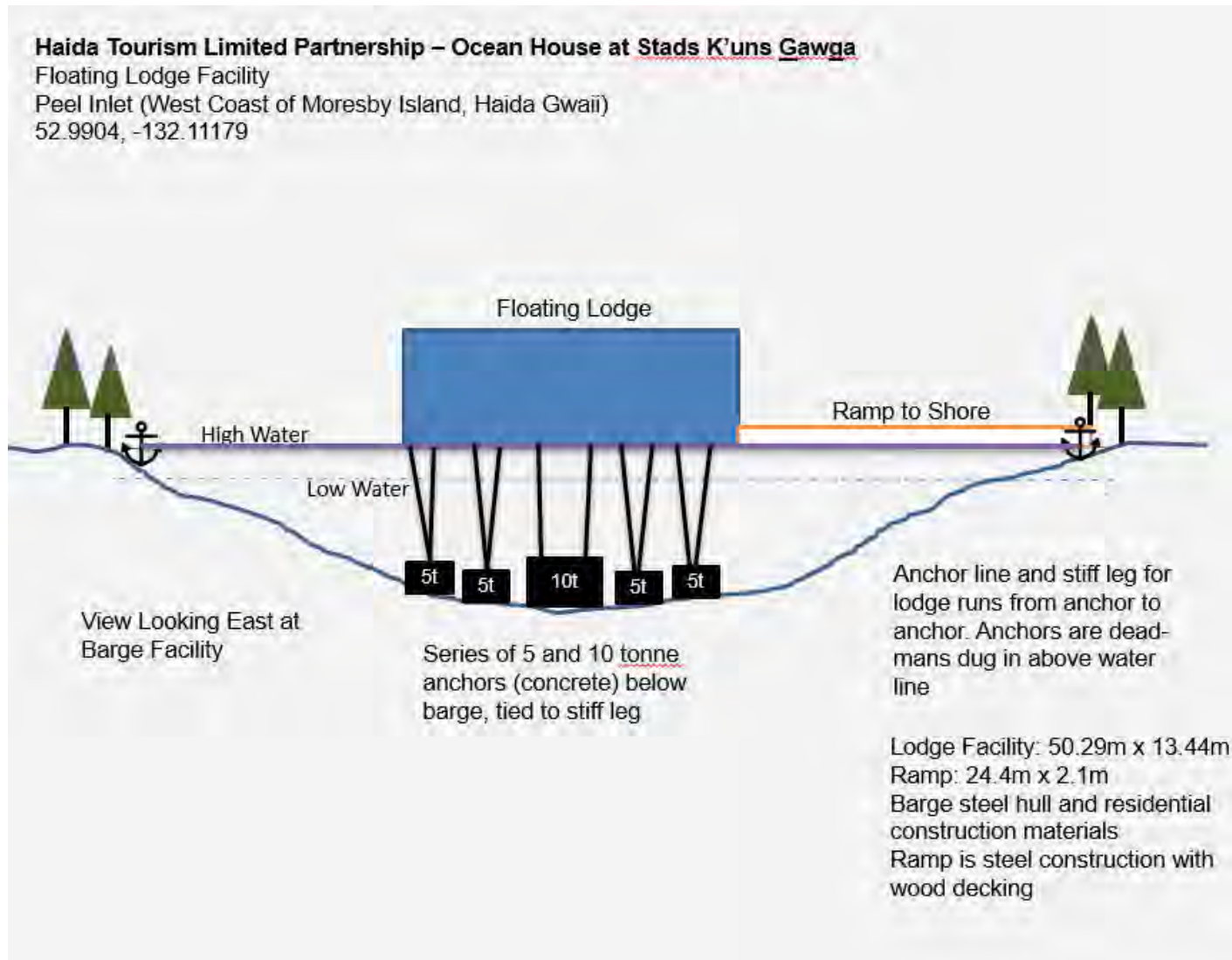
### New Facilities or Infrastructure

**Floating Lodge** - Floating lodge is 50.29 meters by 13.44 meters, requiring two dead man anchors to be dug in on the shoreline (approximate size 4ft x 12ft, weighing 5 tonnes, see Figure 1). The dead man anchors have already been installed for the lodge.

**Barge Ramp** - A ramp (approximate size 8ft wide x 70 ft length) is required for access to the lodge from shore. It is attached to shore via 3 small lock blocks which are dug into the ground on a ramp area from the old log sort (see pictures at end of this MP). The ramp floats the rest of the way from shore, to the lodge facility and does not require any additional anchor points beyond the lock blocks on shore (approx. 20ft x 20ft).

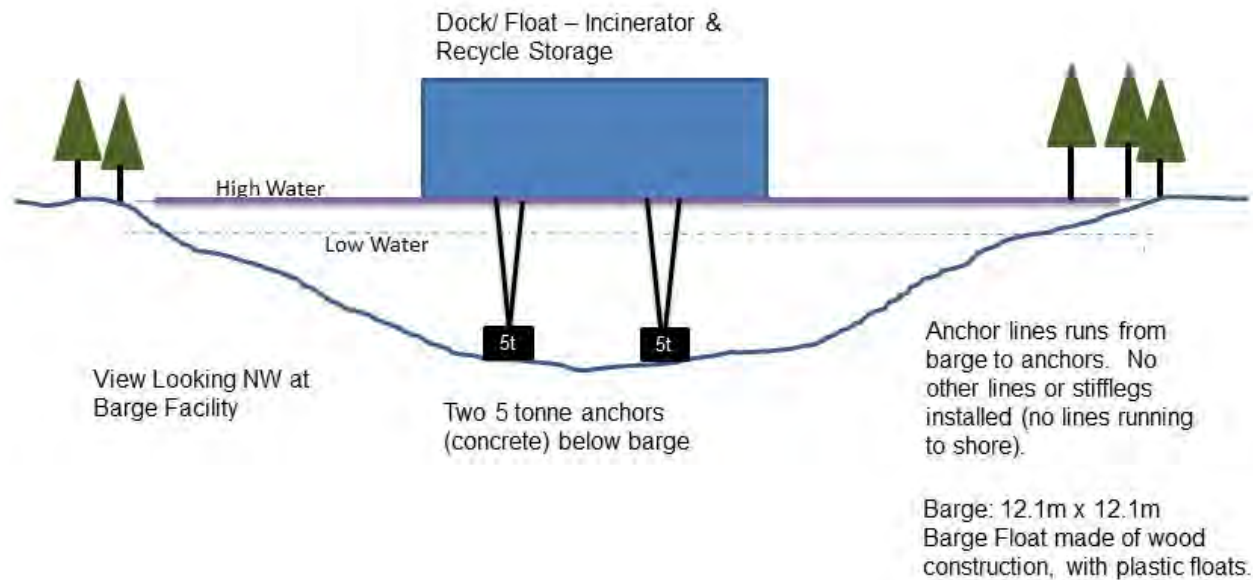
**Heli-Pad Clearing**- Approved clearing of immature alder (approximate area 1500 m<sup>2</sup>) has been conducted in order for safe landing of helicopters both for guest travel and for emergency response and evacuation (see map and pictures). Several previously constructed cabins that were placed in the area prior to HTLP coming into the area, are located on the upland portion near the heli-pad. These cabins have been left intact at the request of Haida Gwaii locals, however HTLP has not consented to maintenance of the cabins.

**Garbage Incinerator Barge** – The floating garbage incineration barge is 12.1 meters by 12.1 meters made of wood construction with plastic floats. The barge will have one to three 5 – 10 tonne concrete anchors below the barge. No other stiff legs or anchor lines are proposed from the barge to shore (see Figure 2 below). The barge will house a metal shed to store recycled materials and a garbage incinerator to support the lodge.



**Figure 1. Side view of floating lodge eco-tourism lodge (Ocean House).**

**Haida Tourism Limited Partnership – Ocean House at Stads K'uns Gawga**  
Incinerator & Recycle Storage Float/Dock (to support the Cultural Tourism Lodge)  
Peel Inlet (West Coast of Moresby Island, Haida Gwaii)  
52.58.59 N, 132.06.21 W



**Figure 2. Side view of Incinerator and Recycle Storage Barge**

## Access

The Lodge and license area is accessed by water (via boat), or by air. Guest transport will be via Helicopter through Heli-jet (S76 Helicopters). [Refer to the Environmental section below for further information regarding helicopter use.](#)

### *Overlapping Tenures*

As identified within the original License of Occupation (V925687) and with addition of the small area covered by the incineration barge, there are other tenures that overlap with the license of occupation area (one Guide Outfitter, one Mineral Tenure and one Trapline license holder). The proposed HTLP tenure is for non-exclusive use, thereby there are no planned impacts to the other tenure holders.

### *Public Access*

The infrastructure does not interfere with any person's riparian right of access over the land. Public access to the beach and adjacent land on the license sites will not be impacted by the proposed activity. The cabins that have been previously constructed will not be removed from the site, however HTLP does not consent to the maintenance of the cabins.

The upland portion of the LOO remains within a non-exclusive use area, and therefore access to public will not be restricted. A previously identified boat launch (as identified by the Marine Plan Partnership for the North Pacific Coast, see location map within Appendix 1) is no longer within the tenure boundary, and will continue to have unrestricted use and access.

Access to the surrounding marine environment will similarly be unaffected as the LOO will be issued with the intentions of non-exclusive use. Concerns raised by the Moresby Island Advisory Planning Committee regarding public vessel moorage were addressed by HTLP during a public meeting held on March/ April 2018 at the Sandspit Community Hall. At the meeting it was further stressed that public access to the areas around the lodge will not be restricted.

## Utilities Requirements and Sources

The floating lodge and the incineration barge have their own power generation infrastructure on board (including diesel generator) and electrical infrastructure. The lodge is equipped with satellite communication as well.

## Water Supply

The floating lodge is equipped with a state of the art desalination system to generate fresh water on board (holding tanks are on board as well). The system utilizes salt water from the ocean and generates fresh water. The salt that is generated is deposited back into the ocean. A Drinking Water System permit is in place.

The garbage incineration barge does not possess a water system.

## Waste Collection, Treatment and Disposal

The lodge is equipped with an on-board sewage treatment plant. The black water will be contained within the storage tanks on board and will be pumped out and transported by ship/ barge to be properly disposed of at an approved location (i.e. sewage treatment plant or approved landfill). Grey water will be discharged to the ocean.

Paper waste will be burned within an incinerator on board the incineration barge.

All metal, plastic etc. (non-burnable) will be collected, stored on board the incineration barge and/ or in the basement of the Lodge and transported be disposed of at an approved facility (i.e., recycle depot or landfill) in the off-season. Waste Management Procedures including that pertaining wildlife deterrence, can be found within the Maintenance and HazMat SOP within the HTLP CMS.

Organic kitchen waste will be disposed of in deep waters, away from the shore and lodge location.

## **Eco-Tourism/ Culture Trip Proposals**

The majority of the eco/ cultural trips are not planned for within the License of Occupation tenure area. For these trips guests will be transported from the lodge to the recreation/ cultural destinations (authorized under various other tenures/ permits).

The lodge will operate seasonally, May 1 to October 1.

- Two trips/week - 3 & 4 Day trips the first and last day of each trip overlap with each other
- Maximum capacity of the lodge is 24 guests
- Client to cultural guide ratio = 2:1.

Guided activities planned for within the LOO area include kayaking, paddle boarding, hiking, shore side meal service and beach camp fires. All land-based activities (shore side meal service and camp fires) will take place within the LOO area near the lodge. Any hiking activity would occur along the deactivated access road within and outside of the LOO (see proposed hiking trail maps and recreation pamphlet- Appendix 1). Activities such as kayaking and paddle boarding would commence from the lodge, however, could extend past the LOO boundary (refer to the recreation guide pamphlet within Appendix 1 for more information on Eco-tourism/ Culture Trip information).

Activities conducted outside of the LOO areas are proposed to occur as Incidental Use for Adventure Tourism Guiding Purposes.

We anticipate that we may need to complete minor trail clean up/ alterations (ie. brushing and trail marking) along the proposed Waterfall trail. If determined to be required, appropriate authorizations will be obtained from the CHN and MFLNRORD.

## **Additional Information**

### **Risk Management Plan**

HTLP has an established Corporate Management System (CMS) in place that addresses environmental, quality and health and safety components that address legal requirements as well as corporate commitments. The CMS includes aspects such as standard operating procedures, forms and checklists training, inspections and audits. The CMS also includes the eco/ cultural tourism activities and will include training of workers.

Incinerator maintenance and use instructions are incorporated into the Maintenance and HazMat Standard Operating Procedures and are integrated into the CMS.

## **Environmental**

### **Land Impacts**

Minimal land impacts are anticipated as a result of the proposed activity, as they are limited to minor infrastructure to secure the barges and ramp for the lodge. A small clearing of alder (on the old dryland sort site; previously cleared and used for industrial use for many years) was approved and completed in 2018 to facilitate a helicopter landing pad.

### *Vegetation Removal*

No vegetation removal **beside the potential trail brushing mentioned above** is planned under this application.

### *Soil Disturbance*

Soil disturbance is anticipated to be minimal. The heli-pad area is located on the old dryland sort (compacted soils), and minimal disturbance is needed for the barge and ramp infrastructure.

### Riparian Encroachment

The proposed activity is not located near the known stream locations (refer to the permit area map).

### Pesticides and Herbicides

There are no planned pesticide or herbicide use at this time. Should rats become a problem on board, pesticides may be used, but will be limited to use on the lodge structure.

### Visual Impacts

There are no negative visual impacts anticipated from the proposed works. Small amounts of smoke may be generated when the process of garbage incineration is occurring however this impact is expected to be very minimal and intermittent.

### Archaeological sites

Baseline Archaeological Services Ltd. was engaged to conduct a Preliminary Field Reconnaissance (PFR), the PFR report can be provided upon request.

Archaeological site FfUa-5 (shell midden) is located outside of the proposed development area. The PFR did not identify any additional archaeological remains within the proposed development area. The report also identified that no further archaeological studies are recommended.

The site is located on an old dryland sort area used for logging operations.

### Construction Methods/ Materials

Infrastructure to secure the lodge barge and ramp includes steel stifflegs, concrete anchor blocks, steel chain and rope.

Infrastructure to secure the incineration barge includes “deadman” anchors, concrete anchor blocks, steel chain and rope.

## Atmospheric Impacts

Minimal impacts to the atmosphere are expected. There are no nearby residents. There will be some emissions and sound disruption from the helicopters (intermittent) and the barge power generator. Minor smoke emissions also from the incinerator (paper products).

## Restrictions on Tenuring of Aquatic Lands

Not applicable.

### *Drainage effect*

There are no anticipated impacts to the drainage of the area as a result of the proposed use.

### *Public Access*

There are no changes to public access anticipated from the proposed use. See previous section under Infrastructure for further information relating to public access.

### *Flood Potential*

There are no anticipated increases to the potential for flooding in the area as a result of the proposed use.

## Fish and Wildlife Habitat

The Marine Plan Partnership (MaPP) for the North Pacific Coast has recorded patchy distribution of eelgrass within the small bay where the floating lodge is located<sup>1</sup>. Although eelgrass is present, it is anticipated that the seasonal presence of the lodge will not have a significant impact. The barge is stationed at adequate depth to prevent from “grounding” using stiff legs and anchors. The bay where the lodge is located was also historically used for heavy industrial activities.

Dive surveys<sup>2</sup> were completed prior to digging anchor points in 2018 and moving the lodge barge facility in to place in order to mitigate potential impacts to shoreline ecology and fish habitat and resulted in the discovery of several items of “waste” (beer bottles, steel cable and cars, old boat remains, etc.) within the bay, proving the site to be previously disturbed and to not possess high value fish habitat. This waste was subsequently removed by HTLP.

Small amounts of eelgrass were noted on the dive video. An additional primitive assessment of the foreshore area (assessment of photographs, see Photos 1 and 2 in Appendix 1) appeared to show

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<sup>1</sup> April 2015. Haida Gwaii Marine Plan. Marine Plan Partnership for the North Pacific Coast (see map located in Appendix 1)

<sup>2</sup> Dive survey video submitted with application.

unfavorable conditions for an abundant presence of eelgrass. The intertidal zone adjacent to the lodge appears to be predominantly cobble and gravel with what appears to be extensive rockweed (*Fucus distichus*) which would indicate typically unfavorable conditions for the growth of eelgrass. These preliminary overview assessments anticipate that the likelihood of abundant amounts of eelgrass being present in the bay is low and therefore it is not anticipated that the presence of the lodge should cause a significant impact.

There are Type 1 and 2 streams in the area, however not within the LOO (see Appendix 1) and all Haida Gwaii Land Use Order Objectives (HGLUOO) restrictions on these streams will be strictly observed. The lodge is located greater than 200m from the outlet of the Type I stream, and it is anticipated that activities at the lodge will not impact the habitat present.

## Helicopter Transportation

Helicopters are used to transport guests to and from the lodge, originating in Sandspit. The following are suggested mitigation measures for the operation of Helicopters near Marbeled Murrelet (MAMU) nesting habitat.

- Helicopters are only permitted to land within the designated helicopter pad on the upland portion of the proposed LOO (Polygon 1), south east of the lodge. Pilots should be aware that the closest noted MAMU habitat is located 1.0 km due south and 3.2km southwest of the heli pad (refer to attached map).
- In case of emergency (i.e. medical evacuation), alternate landing locations may be utilized at the discretion of the helicopter pilot. However this is anticipated to be at a limited frequency and only as required for emergency.

## Peel Inlet Wildlife and Helicopter Flight Mitigation Plan

The location of Ocean House within Peel Inlet is situated near (~1.0km north of) identified critical habitat for Marbled Murrelet. There is one known mapped occurrence in the area of a Blue Heron nest, located 11.0km northeast of the lodge as well (refer to map below in Appendix 1). Additionally, due to its location within the marine environment, the likelihood of other sea birds and wildlife being present is high.

For these reasons, the following measures have been put in place to mitigate any effects that intermittent helicopter usage may have on the wildlife (more specifically birds) in the area surrounding Ocean House, and the proposed flight paths. The following measures should be practiced at the discretion of the pilot, ensuring safety of the aircraft and passengers is considered and guaranteed first and foremost. The procedures noted below will be reviewed with the Helicopter Pilots at the start of each season.

### *General Requirements*

- Helicopter flights should be limited to transporting staff, guests and freight in and out of Peel Inlet, and for emergency purposes only (non-essential helicopter use is discouraged).
- Marbled Murrelet (MAMU) breeding season occurs from April to mid August, so flight activity during these months must be conscious of MAMU habitat in the area (refer to map below).
- To avoid unnecessary noise disturbance, power down helicopter once landed unless immediate take off is required.
- If nesting activity (MAMU, Northern Goshawk, Great Blue Heron) or birds (MAMU) are observed in the vicinity of the landing or during flight, report to Ocean House Lodge Manager. Based on the activity reported, the Lodge Manager will determine if CHN/MFLNRO needs to be notified. Alternate flight paths will need to be considered.

### *Pre-trip requirements*

- Prior to taking off, the following preflight tasks should be conducted by the pilot:
  - When approaching the aircraft, observe wildlife activity in the immediate area and be alert for signs of nesting birds (droppings, straw/sticks littered on the ground, auditory responses).

### *Flying Recommendations*

- The following flying tactics should be used to avoid adverse effects to wildlife:
  - Fly at higher altitudes where possible and weather permits (>500 ft above ground level (AGL)) to avoid potential bird strikes, or nest/tree flushing.
  - Avoid flying during sunset or sunrise when birds can be more active due to feeding.
- Follow the suggested flight paths to and from the Ocean House heli pad (see map below in Appendix 1) to avoid identified critical nesting habitat.
- If wildlife is encountered during a flight, the helicopter should remain a safe distance and not approach for “viewing purposes”. Staying a fixed distance of 400 m (AGL) from any observed wildlife or nests should be practiced.
- Do not circle over wildlife or nests.
- Avoid flights and landings within 500m of identified nesting areas.

Additionally, the Ministry of Environment’s Wildlife Guidelines for Backcountry Tourism/Commercial Recreation in BC was consulted when producing the SOPs and guidelines within the HTLP CMS. There are no other anticipated impacts to fish and wildlife habitat associated with the proposed use.



**OCEAN HOUSE**  
AT STADS K'UN'S GAWGA

## Socio-Community

A Cultural Features Inventory (CFI) Survey of the area has been conducted by Council of the Haida Nation (CHN) certified CFI Crews and all Cultural Features identified are on the attached map of the permit area. All buffers required under the HGLUOO for cultural features will be strictly followed. A CFI survey was not completed for the location of the incinerator barge due to its location within the marine environment and not on land.

### *Adjacent Users or Communities*

Public access and other tenure holders are discussed above.

### *Existing Services (e.g., fire, emergency services)*

There are no existing services in the area (and thus no impacts from the proposed activity).

Signed:

A handwritten signature in black ink, appearing to read "Morey Maslak", with a long, sweeping horizontal line extending to the right.

Morey Maslak  
General Manager, HTLP



### Staff Report

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**Date:** March 22, 2019

**To:** D. Chapman, Chief Administrative Officer

**From:** M. Williams, Planning Consultant

**Subject:** Referral – City West

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### Recommendations:

Action: that the Board provide feedback to the Province of BC regarding this referral.

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### BACKGROUND

The North Coast Regional District received a Land Referral from the Province of BC for a license of occupation for City West Cable and Telephone Corp.

The Ministry has asked for comments regarding this referral. Standard responses:

1. Interests unaffected;
2. No objection to approval of project;
3. No objection to approval of project subject to conditions as discussed by the Board; or
4. Recommend refusal of project due to reasons outlined by the Board.

### APC COMMENT

No APC is established for the area.

### ALTERNATIVES

The Board may identify alternatives for staff to pursue, such as:

1. No response be provided; or
  2. Another option as identified through Board discussion.
-

# Management Plan

Please describe the details of your project to the extent known. Consult the guidance document for further information on regulatory requirements, rationale for why the information is required, and how to find required information.

The scope and the timing for response will be provided. If information is requested and not received, it may result in the disallowance of the application.

Information on these topics may be required as part of the application processing and if further detail is necessary that is not part of the application and management plan received, you will be contacted and requested to provide additional information. In some circumstances, the use of a qualified professional to complete the plan may be required.

## 1.0 Background

### 1.1 Project Overview

Describe project for which authorization is requested, including construction and/or phased development details:

#### Introduction

Ketchikan Public Utilities (KPU) Telecommunications Division is an incumbent local exchange carrier based in Ketchikan, Alaska, that operates a mixed Copper and Fiber network providing triple-play services (Voice, Video, and Internet) to residential and business customers in Ketchikan, Alaska. Additionally, KPU offers Hosted IP Telephone systems to business customers and has built and maintains a 4G-LTE network. KPU networks interconnect with other telecom carriers in the USA and also in Canada, using a microwave digital radio (MDR) link that connects from its facilities in Ketchikan to CityWest in Prince Rupert, BC. Due to the growing demands of the internet, KPU has identified the need to expand its "off island" capacity.

City West Cable & Telephone Corp. (CityWest) provides wireline and internet services in Prince Rupert. CityWest has a long-standing relationship with KPU, providing internet gateway, bandwidth and other telecom services, and collaborating in the joint operation of facilities for the existing MDR link. This collaboration includes the use of and access to existing BC crown land leases (license of occupation) that are held and managed by CityWest.

KPU is proposing to construct a new subsea fibre cable between Ketchikan, AK, and CityWest's landing station on Ridley Island, near Prince Rupert. The proposed route is approximately 160 km in length, of which 70 km are within Canadian waters, and follows the most easterly navigable waters between Prince Rupert and Ketchikan. The management plan included herein is part of the land use application package to facilitate construction and operation of this utility on Crown Land (70km ocean floor right of way). KPU and CityWest plan to continue expanded collaboration in building and operating this new subsea cable and network, with the expectation/intent that CityWest (through one of its wholly-owned subsidiary business corporations) would hold and manage new crown land leases or licenses of occupation as would be required by the Province.

#### Access plans - during construction

Installation of the subsea fibre optic cable will be facilitated primarily by marine vessels. The only Canadian terrestrial access required during construction will be at the landing station on Ridley Island, near Prince Rupert, which has existing access via the public Ridley Island Road and private road located on land leased by CityWest from the Prince Rupert Port Authority (PRPA). Marine vessels will operate in accordance with best industry practices and must comply with Transport Canada, Canada Shipping Act regulations, and MARPOL Annex I and II requirements to prevent the operational or accidental discharge of deleterious substances.

#### Access plans - after construction

Access requirements for operating the proposed fibre optic utility is expected to be very minimal and only for purposes of monitoring and maintenance. Terrestrial access to the landing station on Ridley Island will be via existing access and to the subsea cable via marine vessels operating according to best industry practices, Transport Canada, Canada Shipping Act regulations, and MARPOL Annex I and II requirements.

#### Construction details

While this project involves construction within both Canadian and US jurisdictions, this management plan describes only activities impacting Canadian lands and waters.

#### Land-based activities

A prefabricated, concrete cable vault will be constructed at the Ridley landing station to facilitate anchoring of the cable to the shore. This vault is expected to be 1.2 x 2.4 x 0.9 m in size. The vault will be installed above the mean high tide line and will partially backfilled such that the top of the vault will remain exposed to facilitate access. Works to prepare the ground for vault installation will involve excavation to an appropriate elevation and grade. Because the conditions at the proposed vault location are very rocky, rock hammering may be necessary. No blasting will be carried out. Excavated materials will either be reused at the site (e.g., backfill) or removed from site. Works are scheduled to take place during late April and early May.

#### Marine-based activities

The fibre optic cable will be loaded onboard a cable laying ship, which will then be positioned offshore of the Ridley landing station. A smaller boat will then be used to pull the cable towards the shore and the landing station. Balloons will be attached to the cable to prevent it from touching the bottom until it is positioned on the planned route. Onshore equipment may be used to assist in pulling the cable onto land and into the cable vault, where it will be secured. Once the cable has been secured to the terrestrial station, the cable laying ship will begin to deploy the cable along an approved route, which has been designed to avoid environmentally sensitive areas (e.g., glass sponge reefs, conservancies) and be suitable in terms of bathymetry and risks to the cable. A dynamic positioning system will be used to ensure accurate placement of cable within the approved right of way (accuracy of +/- 5 m). Real time visual confirmation of touchdown conditions via video from a remotely operated vehicle may be necessary if conditions are warranted (e.g., laying through a boulder field). Cable burial is not planned for this project; however, physical protection of the cable within the nearshore area will be necessary. Nearshore protection will be provided from the cable vault through the inter-tidal zone by encasing the cable within steel ballast shells to a depth of 5 m below LWLLT. The ballast shell-encased cable will be further protected by covering the cable with 4x8x1' rock-filled, gabion mattresses to LWLLT.

## 1.2 Investigative Work

If any preliminary investigative work has been carried out, with or without an investigative authorization, provide details on work completed, incomplete or on-going from previous term.



Activity	Brief Description of Activity	Status (e.g. Complete, incomplete, ongoing)	Comments / Milestones
Bathymetric and ROV survey of proposed subsea cable route	Proposed subsea cable route was determined in two phases. Phase one used available data to determine a preliminary route. Phase two involved a bathymetric survey of the entire route identified in phase one, as well as alternative routes. An ROV was also used to collect additional data at select areas of the alignment. These data were collectively used to develop the proposed route described herein.	Completed	Survey took place during June, 2018

Add Row

## 1.4 First Nations Consultation

Describe any contact you may have had, including the name of the First Nation(s) and representatives contacted.



Coastal First Nations (CFN) Board Chair Patrick Kelly was briefed early in the planning process. Mr. Kelly briefed Mayor John

Helin of LaxKwalaams Council and Mr. Harold Leighton, CEO of the Metlakatla Development Corporation, as well as the CFN Board of Directors.

The CFN represents First Nations throughout the North Coast and Central Coast Regions. Its members include the Lax Kw'alaams and Metlakatla First Nations, both of which warrant particular attention as the proposed cable route passes through Chatham Sound near their communities. CFN also has a leadership and coordinating role in the Pacific North Coast Integrated Management Area (PNCIMA) Initiative and Integrated Ocean Management Plan for the Pacific North Coast area.

These organizations have indicated broad support for BC's Connected Coast Project as they desire connectivity for their communities. While not directly part of the Canadian/BC Connected Coast Project, the link from Prince Rupert to Ketchikan will serve as an extension to that network, supporting and reinforcing its benefits for all coastal communities.

The Ministry of Technology, Innovation and Citizens' Services (Network BC) and Ministry of Indigenous Relations and Reconciliation have been apprised of project plans and provided advice concerning outreach and consultation.

For more information about Connected Coast, see: [www.connectedcoast.ca](http://www.connectedcoast.ca)

For more information about CFN, see: [www.coastalfirstnations.ca](http://www.coastalfirstnations.ca)

## 2.0 Location

### 2.1 Description

Provide a general description of the location of the project:



The project location encompasses a ~166 km linear utility corridor that, running south to north, begins at CityWest's Ridley Island facility on PRPA lands (~ 7 km south of the city of Prince Rupert) and immediately enters the marine environment. The route then runs through Chatham Sound, generally following the most easterly navigable route, crosses the international border into Revillagigedo Channel, and terminates at Mountain Point, Alaska (~ 9 km southeast of Ketchikan, Alaska). While the total length of this utility corridor is ~160 km, less than half (~71.5 km) is within Canadian waters (see General Location and detailed Route Alignment Maps).

### 2.2 Location Justification

Provide your reasons/justification of the need for this type of project at this location:



Because of the long distances involved, a subsea cable is the only economically feasible option for fibre optic connection between Ketchikan and Prince Rupert. In addition, the environmental impacts are also far less for a subsea cable relative to the disturbance associated with access construction and clearing required for an overland route.

The specific alignment of the proposed subsea route was determined by a process that accounted for cable laying feasibility and minimized risks to cable integrity (i.e., be as direct as possible and, where possible, avoid areas deeper than 200 m, cliffs, boulder fields, existing anchorages, dumping grounds, etc.), as well as avoiding environmentally sensitive features (e.g., glass sponge reefs, Lucy Island Conservancy, Metlakatla Pass Protection Management Zone).

### 2.3 Seasonal Expectations of Use

When will the Project require use of the land? Include information on key works during construction phases as well as operations phase. Please reference [reduced risk fish windows](#) as required by DFO:



Project Phase (Construction / Operations)	Brief Description of Activity / Works	Season
Construction	Installation of cable vaults and laying of subsea cable.	Late spring to late summer.  Unfavorable ocean conditions limit the work window for safe and accurate deployment of subsea cable to July and August.
Operations	Activities associated with operating a subsea fibre optic utility range from very limited to none and would relate to monitoring and repair works. Marine repairs would generally involve a cable laying vessel retrieving the damaged cable using an ROV and splicing in a new	As required and feasible.

Project Phase (Construction / Operations)	Brief Description of Activity / Works	Season
	section of cable. Terrestrial repairs would be carried out in a similar manner, without the added effort associated with retrieval and deployment of cable at depths.	
Add Row		

### 3.0 Infrastructure and Improvements

#### 3.1 Facilities and Infrastructure

Detail any new and existing facilities, infrastructure or processes proposed and any ancillary uses. Provide details of planned construction methods and materials, and construction scheduling.

Facility/Infrastructure/Process	Construction Methods/Materials	Construction Schedule
Cable vault	Cable vault will likely be constructed using a prefabricated, fiberglass vault; however, a concrete vault (combination of pour in place anchor slab with pre-cast tops) may also be used. The vault will be installed above the mean high tide line. Works to prepare the ground for vault installation will likely involve excavation to an appropriate elevation and grade. Because the location of the proposed vault is very rocky, rock hammering may be necessary. No blasting will be carried out. Materials will either be reused on site (e.g., used as backfill around the vault) or removed from site for proper disposal.	15 day duration Mid-April
Fore- and nearshore cable protection	Nearshore protection will be provided from the cable vault through the intertidal zone by encasing the cable within steel ballast shells to a depth of 5 m below LWLLT. The ballast shell-encased cable will be further protected by covering with 4x8x1' rock-filled gabion mattresses to LWLLT.	5 day duration Mid- to late August
Fibre optic cable deployment	Once the cable has been secured within the vault, a cable laying ship will deploy the cable along an approved route. A dynamic positioning system will be used to ensure accurate placement of cable within the approved right of way. Real time visual confirmation of touchdown conditions via video from a remotely operated vehicle may be necessary if conditions are warranted (e.g., laying through a boulder field). Cable will be laid directly on the ocean floor (no burial).	15 day duration (the last half of which will be in US waters). Anticipated to take place during July and/or August.
Add Field		

#### 3.2 Access

Identify existing and proposed roads used for access and their use by season. Include any proposed connections to public or Forest Service Roads; traffic information including volume of traffic during construction/operation and phase or season that the traffic is expected:



Roadway/Proposed Connection	Existing/Proposed	Existing Road Classification	Road Permittee Information and Road Use Agreements	Traffic Volume		Mitigation of Traffic Effects
				Construction Phase	Operations Phase	
Ridley Island Road	Existing	Public	N/A	-One time delivery and retrieval of excavator. -Three or four deliveries of construction supplies. -Daily passenger vehicle traffic for crews for a duration of 20 days.	Very limited and only for repair works.	None
Unnamed road (accessed via a security gate off of Ridley Island Road)	Existing	Private	?	-One time delivery and retrieval of excavator. -Three or four deliveries of construction supplies. -Daily passenger vehicle traffic for crews for a duration of 20 days.	Very limited and only for repair works.	None

Add Field

### 3.3 Utility Requirements and Sources

Describe utility requirements and sources, include agreements in place or underway allowing access to utilities.



No additional utilities will be required for the construction and operations of the proposed Project.

### 3.4 Water Supply

Identify water requirements for construction and operation phases (e.g. surface water and/or groundwater), including sources, location, volume and a general description of infrastructure planned to meet water supply requirements, include any agreements outside of Water Act Authorizations identified above (Section I, Authorizations, Permits or Approvals), such as Municipal water supply.

Project Phase (Construction/ Operation)	Water Requirement (e.g. Surface water or ground water, etc)	Source/location	Volume	Infrastructure Description	Agreements
N/A					
Add Field					

### 3.5 Waste Collection Treatment and Disposal

Identify any waste disposal (note septic system required), sewage, sanitation facilities and refuse disposal proposed.



Project Phase (Construction/ Operation)	Is there a water requirement (e.g. Surface water or ground water, etc)	Discharge distance to closest body of water (well, lake, etc.)	Volume of daily discharge	Infrastructure Description	Existing Agreements
N/A					
Add Field					

## 4.0 Environmental

Describe any significant impacts and proposed mitigation for the following environmental classes:

### 4.1 Land Impacts

#### 4.1.1 Vegetation Removal

Is any timber removal required?

☐ Yes ☒ No

Are any areas of vegetation to be cleared, outside of timber removal?

☐ Yes ☒ No

#### 4.1.2 Soil Disturbance

Will there be any areas of soil disturbance, including clearing, grubbing, excavation and levelling?

☒ Yes ☐ No

Disturbance Type	Impacts	Proposed Mitigations
Excavation/ground prep for cable vault installation.	Potential sedimentation of marine habitats.	Potential for sedimentation of marine habitats resulting from the excavation for cable vault construction is very low due to excavation taking place above the high tide line and coarse texture of the materials found at this site (rock, cobbles, and sand; not easily eroded or mobilized by runoff). Nonetheless, crews will be prepared to take steps to minimize sedimentation risk, such as installing silt fencing and spreading straw to protect easily erodible materials from heavy rains. Berms may need to be constructed to deflect incoming runoff away from the work site as well as maintain sediment laden water within the work site for gradual return to groundwater or pumping to a vegetated area for return to groundwater away from the work site and any other watercourse.
Add Field		

Is the area to be excavated a Brownfield site or has the potential to be contaminated?

☐ Yes ☒ No

Is there potential for disturbance of archaeological, paleontological fossils or historical artifacts?

☐ Yes ☒ No

#### 4.1.3 Riparian Encroachment

Will any works be completed within or adjacent to the riparian zone of any water body?



☐ Yes ☒ No

#### 4.1.4 Pesticides and Herbicides

Will there be any use of pesticides or herbicides during construction, operations and/or maintenance?

☐ Yes ☒ No

#### 4.1.5 Visual Impacts

Will there be any adverse effects of the projects, and any potential adverse effects on sight lines to the project area from surrounding areas likely to be used for scenic viewing by residents or other users?

☐ Yes ☒ No

#### 4.1.6 Archaeological Sites

Are there any known or high potential (Arch Procedure) archaeological sites within the project area?

☐ Yes ☒ No

Have you conducted an AIA or engaged an archaeologist to assist with your investigations?

☐ Yes ☒ No

#### 4.1.7 Construction Methods and Materials

Identify the types of construction materials, the methods used, their impacts, and any mitigations:

Construction Material/Method	Impacts	Mitigations
------------------------------	---------	-------------

Construction Material/Method	Impacts	Mitigations
<p>Ground works for cable vault installation.</p> <p>A foundation for the cable vault will be prepared above the mean high tide line by excavating the existing material to a suitable elevation and grade. This will likely involve rock hammering as the existing material is largely composed of bedrock. Material will be removed with an excavator and either reused on site (e.g., as backfill around vault) or disposed of offsite at a suitable location.</p>	<p>Potential impacts include:</p> <ul style="list-style-type: none"> <li>-Disturbance to foreshore habitats.</li> <li>-Sedimentation of marine habitats.</li> <li>-Spills into marine habitats.</li> <li>-Introduction of invasive species.</li> </ul>	<ul style="list-style-type: none"> <li>-No machinery will be permitted to work below the mean high tide line.</li> <li>-No blasting will be permitted.</li> <li>-Silt fencing will be available on site. If necessary, silt fencing will be installed between the mean high tide line and the work site to minimize the potential for sediment laden water generated from ground works from entering the marine habitats. An excavator may also be used to construct berms to manage runoff entering work site and sediment laden water generated within work site. Straw will also be available on site to spread over any exposed soils with potential to generate sediment laden water during heavy rains. Because of the coarse texture of the existing materials at the Ridley landing site (rock, cobbles, and sand), the potential for any erosion or sediment issues is expected to be very low.</li> <li>-All machinery will be inspected for worn fittings, cracked hoses, and leaks prior to arriving on site, and daily during works. Any leaks will be addressed immediately and repairs conducted off site or at least 30 m above the mean high tide line and over top of secondary containment/ drip trays.</li> <li>-All crews will be trained as to spill prevention and response.</li> <li>-All equipment will have an on-board spill kit and a large spill kit will be maintained on site and contain supplies suitable to address spills to marine environments (e.g., marine spill boom).</li> <li>-All equipment will be thoroughly washed prior to arriving on site to minimize the potential of spreading invasive species to the work site.</li> </ul>

<p>Anchoring cable to cable vault and laying cable.</p> <p>With the cable loaded onto a cable laying vessel positioned close to the Ridley landing station, a smaller boat will pull the cable towards shore with balloons attached to prevent it from touching the bottom. The cable will be pulled to the cable vault and securely anchored to it. Divers will then remove balloons and place the cable along the planned route.</p> <p>The cable laying vessel will then begin to deploy the fibre optic cable along the planned route with an accuracy of +/- 5 m. An ROV may be utilized to increase accuracy and confirm touchdown in technical areas, as necessary (e.g., boulder fields). The cable will be left on the surface of the ocean floor (i.e., no burial). The cable will not pose any risks to the environment if damaged (i.e., no internal oils present, therefore, no risk of leaks into the marine environment following any unforeseen physical damage to the cable).</p>	<p>Potential impacts include:</p> <ul style="list-style-type: none"> <li>-Spills from the marine vessels.</li> <li>-Spread of invasive species.</li> <li>-Disturbing Species At Risk (SAR) or their critical habitats.</li> <li>-Acoustic disturbance to marine mammals.</li> <li>-Collisions with wildlife.</li> <li>-Disturbing/damaging glass sponge reefs or other sensitive areas.</li> </ul>	<ul style="list-style-type: none"> <li>-Potential for spills from marine vessels will be minimized by ensuring that vessels are operated according to best industry practices, including requirements detailed in Vessel Pollution and Dangerous Chemicals Regulations, and International Convention for the Prevention of Pollution from Ships.</li> <li>-Should a deleterious substance be accidentally released, it is expected that the vessel would have a shipboard emergency response plan, as well as an arrangement with a certified response organization that would quickly respond to a spill on the polluter's behalf, as per Transport Canada requirements.</li> <li>-Spread of invasive species will be mitigated by operating vessels according to the Ballast Water Control and Management Regulations.</li> <li>-While there are potentially up to 24 aquatic SAR found within Chatham Sound, no critical habitats are currently identified within the project area.</li> <li>-Because of the very slow speed of the cable laying vessel (&lt;2 kts) and non destructive method of cable placement (i.e., no trenching), proposed construction methods will adhere to recommendations of all SAR Recovery Strategies and Action Plans for these species. Therefore, no additional mitigation is required to minimize disturbance to SAR.</li> <li>-Acoustic disturbance produced by the proposed construction methods are not within the frequency range of concern to marine mammals.</li> <li>-Because of the slow vessel speeds (&lt; 2 kts), potential for collisions with wildlife is extremely low. However, this potential will be further minimized by adhering to recently revised requirements of the Fisheries Act, Marine Mammal Regulations (i.e., maintaining a minimum distance of 100 m from most whales, dolphins, and porpoises, and 200 m from killer whales).</li> <li>-Potential impacts to sensitive glass sponge reefs were minimized by a cable route designed to avoid all known reefs mapped by DFO and confirmed during Project bathymetric surveys.</li> </ul>
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Add Field

## 4.2 Atmospheric Impacts

### 4.2.1 Sound, Odor, Gas or Fuel Emissions

Will the project construction or operation cause any of the following to disturb wildlife or nearby residents:

Sound? ☐ Yes ☒ No

Odor? ☐ Yes ☒ No

Gas? ☐ Yes ☒ No

Fuel Emissions? ☒ Yes ☐ No

Explain the current conditions, source, type and range of emission. Provide a description of atmospheric effects from proposed construction, operation, and decommissioning phases. Also include proposed mitigation measures to manage or mitigate adverse effects.

Emission Source	Current Conditions	Project Impacts	Proposed Mitigations / Management
Marine vessels, crew vehicles, excavator.	Unknown	Negligible if managed	All marine vessels, vehicles, and equipment will be maintained and operated as per manufacturers specifications such that they perform at peak efficiency.
Add Field			

## 4.3 Water or Land Covered by Water Impacts

### 4.3.1 Drainage Effects

Will the project result in changes to land drainage?

☐ Yes ☒ No

### 4.3.2 Public Access

Will the project result in changes to public access?

☒ Yes ☐ No

Describe the potential effect or impact and include plans for mitigation/management:

Effect	Potential Impacts	Proposed Mitigations / Management Plan
--------	-------------------	--

Effect	Potential Impacts	Proposed Mitigations / Management Plan
Decreased access for anchoring	A subsea cable could affect the ability for marine vessels to set anchor within or near the utility right of way.	-Existing anchor sites were avoided during route selection. -Because of the numerous logistic and environmental constraints that guided the proposed cable route selection, little could be done to mitigate potential effects to unmapped, potential anchorage sites. However, much of the proposed route is next to glass sponge reefs and within travel corridors; both areas where setting anchor would be discouraged.

Add Field

### 4.3.3 Flood Potential

Will the project result in a potential for flooding?

☐ Yes ☒ No

## 4.4 Fish and Wildlife Habitat Impacts

### 4.4.1 Disturbance to Wildlife and Wildlife Habitat

Will the project result in adverse effects to wildlife or wildlife habitat?

(BC Wildlife Act)

☒ Yes ☐ No

Provide a description of any potential adverse effects to wildlife and wildlife habitat from proposed construction and operation (including seasonal considerations, potential adverse effects from changes to access by hunters and fishers, along with proposed measures to mitigate adverse effects).

Project Phase		Potential Impacts	Proposed Mitigations / Management Plan
Construction		Presence of a slow moving cable laying vessel interfering with fisheries.	Standard operating procedures for any commercial marine works should limit any potential for negative interaction of this project with any fisheries. Email notification will be provided to the Coast Guard (Notice to Mariners; NOTMAR), which is then communicated to all commercial traffic. Non-reporting traffic would also be routinely informed of cable laying works via frequent security broadcasts on VHF radio. Finally, the slow speeds of the cable

Project Phase		Potential Impacts	Proposed Mitigations / Management Plan
			laying vessel should make any temporary conflicts avoidable and likely of minor consequence to fisheries or any other marine activities.
Operations		Presence of a fibre optic cable on the ocean floor interfering with bottom contact fisheries (e.g., shrimp trawling).	-It was not possible to mitigate potential impacts by locating the cable outside of bottom contact fisheries areas as these fisheries are extensive throughout Chatham Sound. -Cable locations will be provided to both the Coast Guard and Canadian Hydrographic Service to ensure cables are depicted on navigational charts. -A cable awareness campaign that includes outreach to the local fleet and fisheries associations to alert them of the presence of an installed cable is recommended to minimize potential for interaction between the Project and fisheries.
Add Field			

Will the project (construction or operations phase) occur in and around streams, lakes, estuarine or marine environments?

☒ Yes ☐ No

Describe the fish habitat on or near the project site, include potential impacts of the Project (e.g. stream crossings, water diversions, etc), including seasonal considerations, and plans to manage/mitigate effects.

Project Phase	Impacts	Proposed Mitigations / Management
Construction	Potential to cause serious harm to fish that are part of or support a commercial, recreational or Aboriginal (CRA) fishery.	-Beyond adhering to applicable regulations and standard BMPs for proposed works, no additional mitigation should be required to manage fish. -DFO self assessment concluded that installation of a subsea fibre optic cable, without trenching, and with no interaction with any SAR critical habitats, would not cause serious harm to CRA fisheries and would not require DFO review as long as works are in compliance with the Fisheries Act and implement measures published at <a href="http://www.dfo-mpo.gc.ca/pnw-ppe/measuresmesures/measures-mesures-eng.html">http://www.dfo-mpo.gc.ca/pnw-ppe/measuresmesures/measures-mesures-eng.html</a> .

Project Phase	Impacts	Proposed Mitigations / Management
Construction	Potential to negatively impact Species at Risk (SAR)	<p>-While there are potentially up to 24 aquatic SAR found within Chatham Sound, no critical habitats are currently identified within the project area.</p> <p>-Because of the very slow speed of the cable laying vessel (&lt;2 kts) and non destructive method of cable placement (i.e., no trenching), proposed construction methods will adhere to recommendations of all SAR Recovery Strategies and Action Plans for these species. Therefore, no additional mitigation is required to minimize disturbance to SAR.</p> <p>-Acoustic disturbance produced by the proposed construction methods are not within the frequency range of concern to marine mammals.</p> <p>-Because of the slow vessel speeds (&lt; 2 kts), potential for collisions with wildlife is extremely low. However, this potential will be further minimized by adhering to recently revised requirements of the Fisheries Act, Marine Mammal Regulations (i.e., maintaining a minimum distance of 100 m from most whales, dolphins, and porpoises, and 200 m from killer whales).</p>
Construction	Potential to damage glass sponge reefs during cable lay process.	Potential impacts to sensitive glass sponge reefs were minimized by a cable route designed to avoid all known reefs as mapped by DFO and confirmed during Project bathymetric surveys.
Construction and Operations	Potential for spills from marine vessels.	<p>-Potential for spills from marine vessels will be minimized by ensuring that vessels are operated according to best industry practices, including requirements detailed in Vessel Pollution and Dangerous Chemicals Regulations and International Convention for the Prevention of Pollution from Ships.</p> <p>-Should a deleterious substance be accidentally released, it is expected that the vessel would have a shipboard emergency response plan, as well as an arrangement with a certified response organization that would quickly respond to a spill on the polluter's behalf, as per Transport Canada requirements.</p>
Construction and Operations	Potential for spread of invasive species	Spread of invasive species will be mitigated by operating vessels according to the Ballast Water Control and Management Regulations.

Add Field

Is the project (construction or operations phase) likely to increase erosion or sedimentation?

☐ Yes ☒ No

Will the project (construction or operations phase) require water diversion?

☐ Yes ☒ No

Will the project threaten or endanger species at risk in the area?

[Species At Risk Act](#)

☐ Yes ☒ No

## 5.0 Socio-Community

### 5.1 Land Use

Describe the current community setting on or near the project area, including the location of non-aboriginal and aboriginal communities or known use areas.

As the overview map indicates, the proposed Project is predominantly located at sea. The nearest population centres to the project are Prince Rupert and Port Edward, which are located approximately 7 and 3 km from the project, respectively. Other coastal settlements in the vicinity of this project are the First Nations communities of Metlakatla and LaxKwaLaams, which are located approximately 8 and 10 km from the subsea cable route, respectively. During the brief period of construction (two to three weeks for land-based works at the Ridley Island landing site and one week of marine-based works for cable installation), potential for disturbance to any of these communities is very limited. Land-based works will take place within the industrial area of the Ridley Island Terminal and marine-based works will involve a very slow moving (< 2 kts) vessel causing negligible wake or noise disturbance during works.

There is potential for cable laying vessel to interact with commercial fishery vessels (e.g., shrimp trawlers, salmon gillnetters). The limited work window for safe and effective deployment of the fibre optic cable in these waters (July and August) restricts the ability to mitigate impacts to fisheries by avoiding periods of active fishing. However, standard operating procedures for any commercial marine works should limit any potential for negative interaction of this project with any marine traffic. Email notification will be provided to the coast guard, which is then communicated to all commercial traffic. Non-reporting traffic would also be routinely informed of cable laying works via frequent security broadcasts on VHF radio. Finally, the slow speeds of the cable laying vessel should make any temporary conflicts avoidable and likely of minor consequence to fisheries or any other marine activities.

#### 5.1.1 Land Management Plans and Regional Growth Strategies

Are there any land and resource management plans, coastal plans, provincial, regional growth strategies or local government plans with zoning, or management policies or use restrictions in place that could limit or preclude your proposed use of the land? (Please refer to the [Union of BC Municipalities \(UBCM\)](#), and check the websites of the municipality, regional district or other organization with jurisdiction including your project area.)

☒ Yes    ☐ No

Please list:

There are several management plans and strategies that are relevant to the project area; however, proposed activities are compatible with management direction provided by these plans and strategies. Below is a brief description of the issues that could limit project activities, followed by a brief rationale as to why proposed activities should be allowed.

##### PACIFIC NORTH COAST INTEGRATED MANAGEMENT AREA (PNCIMA) PLAN

This regional plan identifies several areas of potential environmental concern. The PNCIMA Plan is not prescriptive in that it does not limit activities or recommend mitigation efforts but, rather, highlights areas of concern to be accounted for within development plans. Areas that interact with the proposed Project include:

- Chatham Sound Ecologically and Biologically Significant Area,
- Humpback Whale Important Area,
- Northern Resident Killer Whale Important Area,
- Herring Important Area,
- Inshore Tanner Crab Important Area, and

*(Chatham Sound Important Area is within 50 km buffer of the landing site)*



## 5.2 Socio-Community Conditions

### 5.2.1 Adjacent Users or Communities

Is the project likely to restrict public access, or the ability, or the ability of adjacent land owners or tenure holder to access their property or tenures?

☐ Yes    ☒ No

### 5.2.2 Existing Services

Provide a description any increased demand on fire protection and other health facilities and emergency services arising from your Project, including proposed management or mitigation measures.

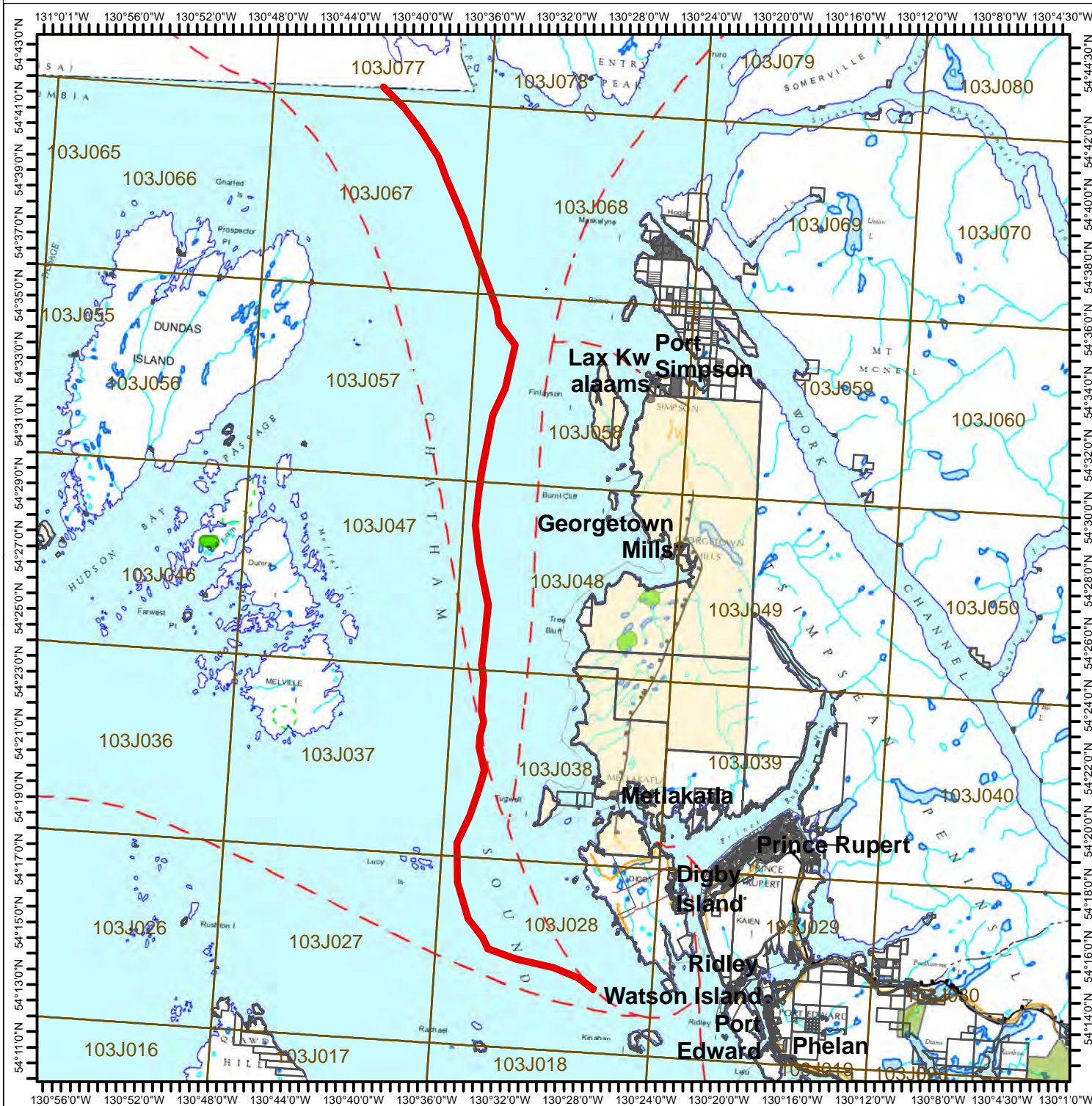


Need for Coast Guard rescue or spill response services are possible during any marine construction project. The need for these services, while unlikely, will be further minimized by ensuring that Project construction and operations comply with the requirements of any statutory International and National codes, laws, rules, and regulations applicable for the works described in this management plan, such as:




- Canada Shipping Act
- Canadian Environmental Protection Act
- Canada Fisheries Act and Marine Mammal Regulations
- Canada Occupational Health and Safety Regulations
- Navigation Protection Act
- Marine Operations,
- Risk Management in Marine and Subsea Operational
- International Convention for the Safety of Life at Sea
- Guidelines for Vessels with Dynamic Positioning Systems
- The International Convention for the Prevention of Pollution from Ships.

END OF FORM

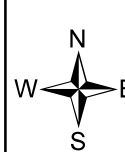




Scale: 1:330,000  
 Type: LICENCE  
 Sub Type: LICENCE OF OCCUPATION  
 Purpose: UTILITY  
 Subpurpose: TELECOMMUNICATION LINE

 Application Area  
 Indian Reserves  
 Parks and Protected Area

## Referral Map



Date: 20 Feb 2019  
 Area: 423.73 ha +/-

**Corporate Officer NCRD**

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**From:** Evan Putterill <eputterill@gmail.com>  
**Sent:** Wednesday, February 27, 2019 5:40 PM  
**To:** Schmitz, Kristina EHS:EX; Evan Putterill; Daniel Fish  
**Subject:** Re: House Numbering in Sandspit

**Flag Status:** Flagged

Hi Dan,

See the email below, I forgot to cc you.

Regards,

**Evan Putterill**

Cell: 250-637-1443

On Wed, Feb 27, 2019 at 5:39 PM Evan Putterill <eputterill@gmail.com> wrote:

Hi Kristi,

I have cc'd the NCRD Corporate Officer Daniel Fish in this email. Dan, can you please add this to the agenda for our next board meeting.

Street numbering is the responsibility of the NCRD. It is my understanding that there has not been a comprehensive update in some time.

I will bring this up to the board with the intent of:

- 1) Getting our staff to investigate, and report back with options
- 2) Options for updating the bylaw
- 3) Options for standardised reflective street number signage
- 4) Options for funding for this project

I think that there may have been some talk about this in the past, and maybe some action, but I was not a part of that process so I don't have all the information. If you have any information on this or if you have any suggestions please feel free to pass it along.

Regards,

**Evan Putterill**

Director | North Coast Regional District  
 Cell: 250-637-1443

On Wed, Feb 27, 2019 at 5:22 PM Schmitz, Kristina EHS:EX <[Kristina.Schmitz@bcehs.ca](mailto:Kristina.Schmitz@bcehs.ca)> wrote:

Hi Evan,

As you know the house numbers in Sandspit have not been updated for many years, despite properties being subdivided and street names changed.

As first responders it is very frustrating and also dangerous when we can't easily find an address or the resident doesn't know their address. I can provide an example of this if it will assist.

Please let me know if there is something I can do to assist with getting our community up to date.

Thanks,

Kristi

Kristi Schmitz

UC Stn 681 – Sandspit

250-637-1686<<tel:250-637-1686>>

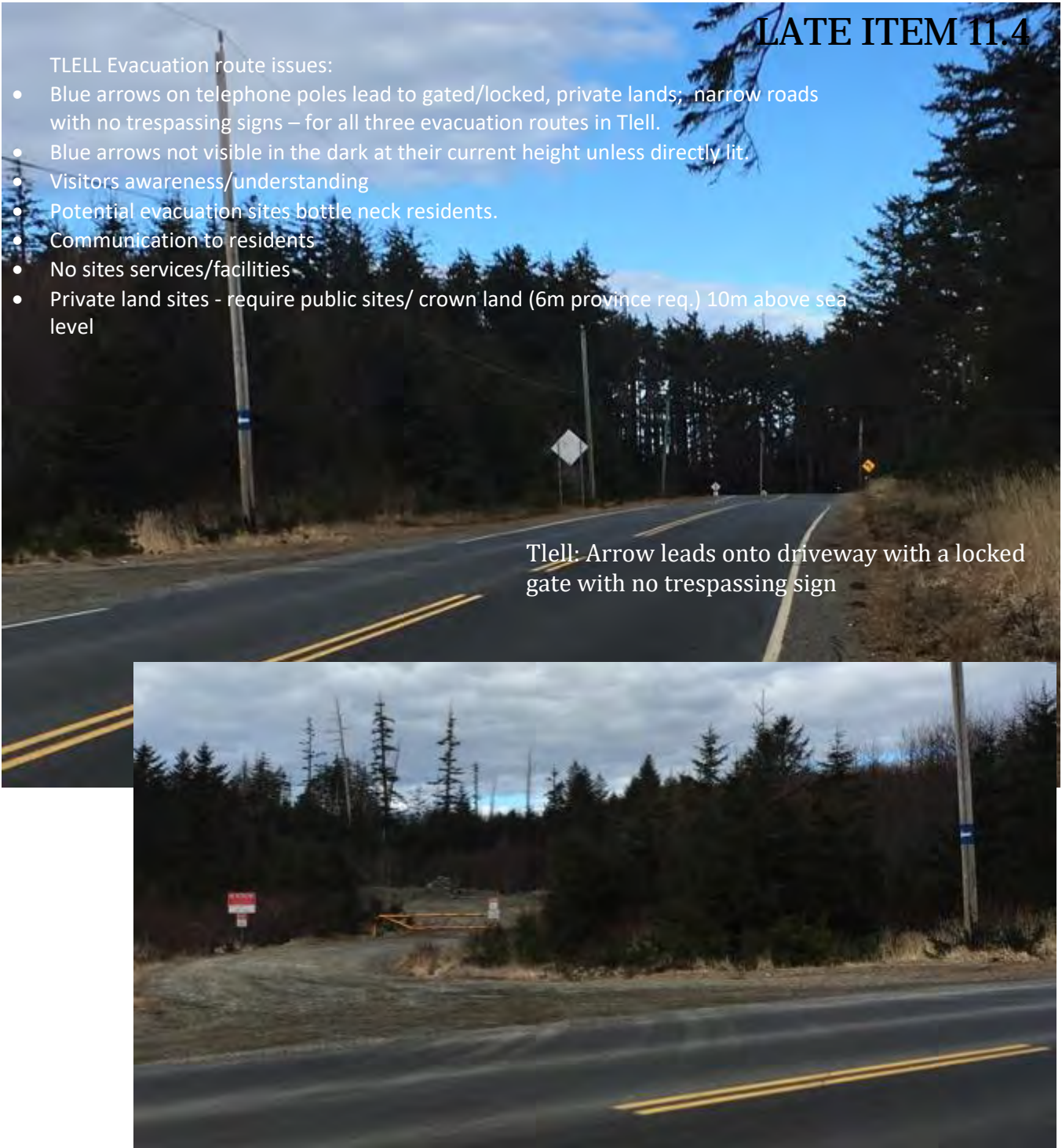
[cid:46680DB0-EC79-4758-8245-ABDE7D4B3F54]

Sent from my iPhone

## TLELL Evacuation route issues:

- Blue arrows on telephone poles lead to gated/locked, private lands; narrow roads with no trespassing signs – for all three evacuation routes in Tlell.
- Blue arrows not visible in the dark at their current height unless directly lit.
- Visitors awareness/understanding
- Potential evacuation sites bottle neck residents.
- Communication to residents
- No sites services/facilities
- Private land sites - require public sites/ crown land (6m province req.) 10m above sea level

Tlell: Arrow leads onto driveway with a locked gate with no trespassing sign



## Recommend modifications to Tlell:

- modify evacuation - utilize Elevation mapping or other topographical map to highlight all areas of (6m) 10m or higher (or acceptable inland points) accessible elevation points of public evacuation sites (ie? Tlell fields behind fire hall)
- Additional signage -designated "Tsunami safe zones" signage & NCRD site communication (map).
- Utilize existing arrows where possible to lead to sites.

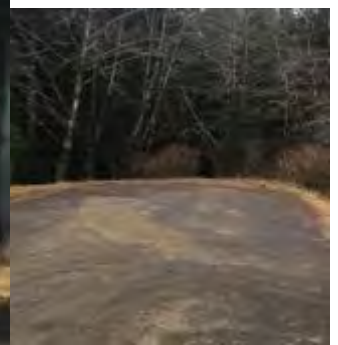
*Public awareness (utilize existing Evac. Family plans) for residents to initiate their own evac. plan. Provide evacuation card to residents which details: 1. Their chosen evacuation site. 2. Three contacts – two off island. Which they provide to their title - municipal/ regional office or BC assessment file.*



Brandt Rd Tlell: Blue arrow leads down to private driveway



Wiggins / Richardson Rd – leads to private, single lane dead end.



Final Tlell arrow points towards south leading into tidal zone - not away towards North

#### Benefits:

- Disperse the population instead of bottlenecking them all to one or two inaccessible private land locations.
- Fiber optics / cell coverage will allow for people to be connected to Epact for notification & communication.
- Recommend each person/family take initiative to familiarize to possible mapped locations – suitable to their family needs & proximity – communicate with family-friends (communicate your plan with 3 people near & off Island) of their chosen family location for evacuation – (communicate by mail out; public notice; &/or website communication).



# Habitat Acquisition Grant Proposal Guidelines 2019-20

## INTRODUCTION

For over 30 years, HCTF has invested funds into acquiring valuable habitat in BC. The hunters, anglers, trappers and guide outfitters of this province pay a surcharge on hunting, fishing and guide outfitting licences, which is provided to HCTF for conservation projects, including conservation land securement. To date, HCTF has contributed over \$20 million dollars towards the purchase of close to 140 conservation properties, helping to secure and manage approximately 23,000 hectares of valuable habitat.

Habitat Acquisition Grants provide funding for direct acquisition costs, and may also include a request for initial management costs and/or property management endowment contribution.

## ELIGIBILITY

Habitat Acquisition Grants provide funds to secure land for the long-term conservation of fish and wildlife habitat in BC. Properties that enhance public fishing and hunting opportunities are generally given priority consideration. Habitat acquisitions previously funded allow for fishing or hunting on the property, or support such opportunities elsewhere, e.g. fish spawning habitat for a downstream fishery. Properties must be located within British Columbia.

### *Organization Eligibility*

HCTF accepts Habitat Acquisition Grant proposals from many types of organizations: municipal, regional and the provincial government, and land trust and community organizations.

HCTF prefers to receive proposals directly from the organization that will hold title and manage the property, but we recognize that sometimes multiple organizations are involved at different stages of an acquisition project—for example, a local community group might coordinate the acquisition for a property but a larger land trust will ultimately hold title. If the organization submitting the proposal will not be the one holding title or managing the property, be sure to include information on both the applicant organization, and the intended title holder and/or manager. Please note that if the applicant is not going to be managing the land, the applicant may apply for the land management/endowment funding; however, HCTF may grant the management funds directly to the organization incurring costs to manage the land.

HCTF will not fund property acquisitions where the proponent organization is already the owner of the property, and is looking to finance debt recovery or pay off the mortgage.

### *Eligible Expenditures*

The Habitat Acquisition Grant can only be used to cover the following eligible costs and related activities:

- Direct Acquisition Costs (such as purchase price, appraisal fees, taxes, legal fees)
- Initial Management Costs and/or Property Endowment contribution up to a maximum of 10% of the amount provided for Direct Acquisition Costs. For instance, if you are requesting \$100K for

## HCTF Acquisition Proposal Application Guidelines 2019-20

Direct Acquisition costs, you may request up to \$10K for initial management costs and/or an endowment contribution.

- Initial management costs include activities that will be undertaken within the first two years of purchase to safeguard the features / habitats / populations being protected by this purchase, and may include conducting baseline surveys, legal surveys, developing management plans, urgent fencing and/or gate installation. Activities must comply with the eligible activities list included as Appendix 1.
- The property endowment contribution must be held in an investment and the investment income gained off the endowment must be used to complete operation and maintenance activities on the subject property.

### PROPOSAL AMENDMENTS

Habitat Acquisition Grant proposals are reviewed by the HCTF Board in June. If there are any relevant changes to the acquisition project between proposal submission and Board review, applicants are required to apprise HCTF and submit a revised proposal and/or budget where necessary. For example, if any unconfirmed funding is denied, or becomes confirmed, the budget spreadsheet should be updated and resubmitted prior to our Board meeting. This includes any updated information regarding any ecological gift component.

### PROPOSAL EVALUATION CRITERIA

Proposals are evaluated against a set of criteria as follows:

- Connectivity to other protected areas\*
- Conservation priority (identified in conservation plan for the area)\*
- Species richness
- Presence of species or ecosystems at risk
- Protection urgency/threat
- Management urgency or risk to existing values
- Fiscal prudence of organization(s)
- Community support
- Likelihood of long term security and stewardship
- Value for money
- Public recreational opportunities

\*These criteria have been identified as the most important by the HCTF Board of Directors and carry the highest weight in our proposal ranking.

In addition to the criteria above, properties with intact ecosystems are generally given priority over those requiring significant restoration.

HCTF staff may also contact local biologists regarding the significance of the conservation values on the property. Please let us know if there are any confidentiality issues around the purchase, e.g. sensitive negotiations with the land owner that may preclude us from contacting others about the proposed property acquisition.

## NOTES TO APPLICATION FORM

Note that text should be entered in the box with the grey shading, not in the same box as the question. Please do not alter the questions.

### 1. PROPONENT (APPLICANT) INFORMATION

- **Field Contact:** If the listed Project Leader is a fundraising specialist, please include an additional contact with on the ground knowledge of the property.
- **Organization Name:** Please include full legal name of the organization.
- **Address:** This is the mailing address for the organization.

### 4. ORGANIZATION DETAILS

- **Organization type:** Options include Provincial Government, Regional Government, Local Government, NGO. If NGO, include whether the organization is a Land Trust, a registered society and/or registered charity.

### 6. FISH AND WILDLIFE/BIODIVERSITY VALUES

- This section can include detailed information on the property; 3 pages maximum.

### 8. MAPS AND PHOTOS

- Maps and photos must be included with your application. Include as separate files or in one PDF with the application document. Do NOT include photos and maps directly in the Word document application form. Please list the maps and photos in the table in section 6; don't forget to include the file name(s) if submitted separately.

### 12. FINANCIAL INFORMATION

- HCTF only funds acquisition projects with a purchase price supported by a current appraisal. As a condition of funding, a copy of the current appraisal must be provided for approved projects.
- If all unconfirmed funding is received, and funding secured is more than your TOTAL PROJECT COSTS, HCTF would anticipate a revised funding request at a lower amount.

## NOTES TO BUDGET SPREADSHEET

The HCTF Acquisition Proposal Budget spreadsheet is locked except for the green-shaded cells where you may enter information.

**Date last updated:** This field is included since we require an updated budget if the overall funding scenario changes between the time of proposal submission and Board review in June (e.g., a funder is confirmed). If you submit an update, include the date here. Initially use the date the proposal is submitted.

### **PROJECT COSTS**

#### ***Direct Acquisition Costs***

## HCTF Acquisition Proposal Application Guidelines 2019-20

**Purchase Price:** The amount you expect to pay for the property, including any donation by the landowner. This amount must be supported by a property appraisal before any funding is granted. If there is an ecological gift component, this amount should be equal to the Fair Market Value. This amount should be the same as noted in the Financial Information section of the application form.

**Appraisal fees:** The amount paid to complete an appraisal of fair market value of the property.

**Closing costs:** These include legal fees and taxes. Please indicate in the notes section at the bottom of the spreadsheet if other costs other than legal and taxes are included here.

**Other (specify):** If any costs are included here, specify and provide details in the notes section at the bottom of the spreadsheet.

### ***Initial Management Costs/Endowment Contribution***

HCTF will fund up to 10% of the amount requested for direct acquisition costs for initial management costs and/or an endowment contribution benefiting the subject property. Note the spreadsheet will automatically calculate the percentage of this request and this should not be more than 10%.

**Initial Management Costs:** Please include any initial management costs for the first two years post-acquisition. There are two fields: one for total project costs and one for any of these costs you request HCTF to fund.

**Endowment contribution:** If you are fundraising to include an endowment contribution to cover land management costs for the property, please include the fundraising target under **Total Project Costs** and any request from HCTF under **Contribution requested from HCTF**.

### **PROJECT FUNDING**

**Confirmed funding:** List all confirmed funders and the amount committed, including both cash and in-kind donations, such as an ecological gift.

**Unconfirmed funding:** List all unconfirmed funders and the amount requested, including both potential cash and in-kind donations, such as an ecological gift.

- Please ensure only one major funding partner is included per row. Smaller donations (<\$1000 each) can be lumped as "other donations". Include a line for larger donations by private citizens as "individual donors". If you need more rows, please contact HCTF and we can provide an unlocked version of the form.

## **QUESTIONS**

Please contact Christina Waddle, Conservation Specialist at HCTF if you have any questions about the application process or technical issues with any of the forms: [Christina.Waddle@hctf.ca](mailto:Christina.Waddle@hctf.ca) or 250-940-3011.

## Appendix 1: Habitat Acquisition Grant Eligible and Ineligible Activities

### Eligible Activities and Expenses

#### Direct Acquisition Costs

- Purchase price
- Appraisal Fees
- Taxes, including transfer taxes
- Legal fees

#### Initial Management Expenses

These eligible activities are intended to help safeguard the features / habitats / populations being protected by the purchase and should provide direct conservation benefit.

#### *Operations*

Those land management activities that involve the management and administration of lands and waters including:

- Mapping and boundary delineation
- Management planning, specifically high-priority management plans, resource conservation plans, enhancement or restoration plans
- Undertaking resource inventory and analysis
- Managing human activities on the lands - management activities associated with community education regarding the purpose of the lands and the value of the natural assets
- Providing operational oversight of the maintenance activities taking place on the lands
- Developing maintenance programs, project plans, staff/volunteer plans for site management
- Addressing immediate site issues and needs

#### *Maintenance*

Those activities that involve maintaining, repairing, restoring and controlling of land, including:

- Restoring and maintaining site-specific natural habitats such as planting eroded slopes and riparian zones
- Repairing and maintaining built assets (e.g., fences, shelters, dams, culverts) if they provide a demonstrable conservation benefit
- Building new assets required for conservation (e.g., exclusion zones, information shelters, new fencing)
- Removing invasive species

### Property Endowment Contribution

- This contribution must be added to an investment and the investment income gained off the investment must benefit the subject property only.<sup>1</sup>

## Ineligible Activities & Expenses

The following activities are ineligible for Habitat Acquisition Grant funding, including revenue from an endowment contribution:

### Acquisition Costs

- Fundraising costs
- Labour costs for coordinating an acquisition project

### Initial Management Expenses

- Conservation covenant monitoring
- Legal fees (post acquisition)
- Insurance costs
- Strategic / higher level land use planning or ecosystem planning
- Residential tenancy agreements/ rentals
- General festivals / tours/ events that do not directly pertain to operations and maintenance of the properties
- General patrols
- General lease administration (e.g., R/Ws, lease modifications, tax exemptions)
- Organizational fundraising
- Cultural, heritage, historical or architectural operations and maintenance activities

In addition to the items above, in accordance with HCTF's general corporate guidelines, the following are also ineligible:

- Non-applied research, such as:
  - Research not related to the increased understanding of population baselines and conservation status of species, and/or
  - Research that does not identify key opportunities for restoration, enhancement, maintenance, or acquisition.
- Training costs for project personnel
- Law enforcement activities
- Fish rearing, farming, stocking, or hatchery projects
- Wildlife rescue centres

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<sup>1</sup> HCTF and successful proponents will discuss how reasonable assurance can be provided that the endowment contribution will be made to benefit the subject property only.

## HCTF Acquisition Proposal Application Guidelines 2019-20

- Captive breeding and rearing with the exception of activities that are a critical step toward population recovery
- Feeding of wildlife species with the exception of activities that are part of population recovery projects
- Control of wildlife species (note that we will consider control of invasive, non-native wildlife species)
- Salaries for regular government employees
- Salmon-only projects that do not also benefit freshwater and terrestrial species or habitats
- Marine projects outside of intertidal and estuary zones
- Mapping-only projects that are not integral to the development of a larger, eligible HCTF project
- Development or production of guidebooks or publication materials aimed at fishing and hunting, tour, or curriculum programs
- Information projects on regulations or stocking
- Conferences
- Production or sponsorship of commercial programs
- Stand-alone interpretative services that are not integral to the development of a larger, eligible HCTF project
- Creation or management of stand-alone electronic databases, websites or file systems

## FABULOUS FESTIVALS AND EVENTS

**Adobe Reader 8.0+ is required to complete this application form.**

If you are using an earlier version, you will not be able to save any information you enter into the form.  
 Adobe Reader is a free download available at: <http://www.adobe.com/products/acrobat/readstep2.html>



**+ Please ensure documents are downloaded and saved to your computer desktop prior to entering any information. If opened and completed within your internet browser, any information entered will not be saved.**

**+ NOTICE:** You must fill out and submit a [pre-qualification form](#) before you submit an application unless your festival or event has previously been approved for funding.

### 1. Project Name

Provide the name of the festival or event:	
Edge of the World Music Festival 2019	
Provide the date(s) of the festival or event:	Have you previously received any Northern Development funding for this festival or event?
August 9, 10 & 11  <i>* Applications must be submitted at least six weeks before the festival or event is scheduled to take place.</i>	<input type="radio"/> Yes <input type="radio"/> No

### 2. Applicant Profile

Applicant organization (legal name): Edge of the World Music Festival Society	Non-profit society registration no.: 41896
Mailing address: PO Box 812, Queen Charlotte, BC V0T-1S0	Telephone: 250-559-2323
Email: scottmarsden@haidagwaii.ca	Website (URL): EDGEFEST.CA

### 3. Primary Contact Information

Primary contact (for this application): Scott Marsden	Position/title: Volunteer Fund-raiser
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Complete the following if different from applicant organization contact information:

Mailing address:	Email:	Telephone:

## 4. Resolution of Support

Identify the local or First Nations government that is providing a resolution of support for this funding application\*:

Village of Port Clements

The resolution of support is:

- ☐ Not required. The festival or event has been previously approved for funding.  
 ✦ If the festival or event is located in the North Coast Regional District or Village of Cache Creek, a resolution of support is required for each application.
- ☒ Attached.
- ☐ Not yet secured. The scheduled council meeting date is:

✦ Applicants are responsible for securing a resolution outlining support for the Northern Development funding request and must provide a copy to Northern Development before an application can be considered for funding.

\* The appropriate government agency should be determined based on the location of the festival/event. For example:

- A festival/event within a First Nations community requires a band resolution of support.
- A festival/event within the municipal boundary requires a resolution of support from the municipality.
- A festival/event outside the municipal boundary requires a resolution of support from the regional district.

✦ Sample Resolution: THAT, the (insert local government name) supports the application to Northern Development Initiative Trust from the (insert applicant organization name) for a grant of up to \$(insert amount) for the (insert festival or event name) from the (insert regional development account name).

## 5. Eligibility Confirmation

Please check all that apply:

- ☐ I have filled out the [pre-qualification form](#) available online. (If not, you must fill out this form before submitting an application.)
- ☒ The event is not in its first year of operation.
- ☒ The event is held in a concentrated time period.  
 ✦ For example, the event is not a series of summer music concerts, multi-weekend regional mountain bike race, etc.
- ☒ The event is not a fundraiser.  
 ✦ For example, Terry Fox Run, Relay For Life, Festival of Trees, etc.
- ☒ The event is not political in nature.  
 ✦ For example, a partisan rally or gathering, an issue-based fundraiser, etc.
- ☒ The event is not religious in nature.  
 ✦ For example, Christmas, Halloween, Thanksgiving, or Easter event, etc.
- ☒ The event is not held annually in communities across the province or country.  
 ✦ For example, Canada Day celebrations, Remembrance Day memorials, May Day parades, etc.
- ☒ The event is not a league or club event.  
 ✦ For example, sports training camps, provincial sport tournaments, bonspiels, etc.
- ☒ The event is not solely an artisan and craft fair.
- ☒ The event is not an industry based event.  
 ✦ For example, oil and gas industry event, cattle industry event, forestry industry event, etc.
- ☒ The event is not part of a conference or workshop.  
 ✦ For example, Natural Resource Forum, Air Quality Workshop, Oil and Gas Conference, etc.

## 6. Festival/Event Overview

Provide a description of the festival or event:

Edge of the World Music Festival (EOTW) is 3-day music festival (Friday/Saturday/Sunday) August 9, 10, & 11 and features a mix of local artists and visiting artists. EOTW is the only festival of its kind on Haida Gwaii, and one of a handful on the northern British Columbia. We fulfill our mandate by providing the venue that allows local to present their craft with professional artist from across Canada and helps create a community of artistic support in this region. EOTW is a registered as a not-for-profit in July 2000 and has been entertaining audiences on Haida Gwaii at the annual 3-day music festival ever since. EOTW offers many opportunities for local musicians to share the stage with Canadian artists, learning from one another and growing in their respective artistic practice. As one of the most anticipated and celebrated community events on Haida Gwaii, it brings together the communities of Old Massett, Masset, Port Clements, Skidegate, Queen Charlotte, and Sandspit in the central, rural community of Tlell. Three days of song, dance, and celebration brings together the community of islanders, along with our visitors from across BC and Canada. EOTW reaches beyond BC, inviting performers and guests from off island to come and enjoy local, regional, and national musical talent. EOTW assists in promoting the

Please describe how the festival or event promotes or strengthens the unique character of the community:

EOTW the only festival of its kind on Haida Gwaii and reaches out to BC, especially our northern neighbors, inviting performers and guests from off- island to come and share their musical talents with the communities of Haida Gwaii. As one of the most anticipated and celebrated events on Haida Gwaii, it unites the communities of Old Massett, Masset, Port Clements, Skidegate, Queen Charlotte, and Sandspit in the central rural community of Tlell. Three days of song, dance, and celebration really unites us as one community of islanders, along with our visiting friends in celebration of artistic excellence, bringing together young and old, and mingles a variety of cultures and artistic works. EOTW offers professional concert experiences to our communities that offers a variety of artistic talent and musical styles appealing to diverse musical tastes on Haida Gwaii. EOTW offers many opportunities for local musicians to share the stage with Canadian and international artists, learning from one another and growing in their respective artistic practice. The festival offers ample opportunities for our community volunteers to work with other talented musicians from BC and across Canada. EOTW

Has your organization previously been funded under this program? If so, what year(s)?

Yes. 2018, 2017, 2016 & 2015

Do you have any paid staff for this festival or event? If so, how many?

1-Bookkeeper

Do you have any volunteers for this festival or event? If so, how many?

Our main resource of support from the community is our volunteer base and we succeed through the efforts of community volunteers and their commitment to volunteer hundreds of hours to make the festival a success. We estimate that the volunteers provide approximately \$400,000 worth of time to help plan, manage, present and evaluate the festival. EOTW measurable results included

## 7. Direct Economic Benefits

<p>Outline the economic benefits to the local or regional economy:</p> <p>EOTW is also committed to providing local businesses and not-for-profits with commercial opportunities. Local businesses that received support from recent festivals include: Tlell Fall Fair Committee, Big Red Transportation, Crystal Cabin, AMS Hardware store, Queen Charlotte Observer and Haida Gwaii Trader. In addition, BC Ferris and Pacific Coastal Airlines have been supportive of the festival by assisting the transportation of visiting artists. Almost 80% of our vendors are local and sell local food, arts and crafts, fine art works and other items. Visitor's play a significant role in EOTW and the Haida Gwaii economy. They bring substantial economic benefits to local</p>	
<p>Outline how the festival or event will attract tourism to the community:</p> <p>EOTW has gained a well-earned reputation among touring musicians for its hospitality, high quality performance venue and our unique geographic location. This makes EOTW an integral part of the music scene on Haida Gwaii and has gained a well-earned reputation among touring musicians for its hospitality, high quality performance venue and our unique geographic location. The development of EOTW as a cultural attraction is an important part of the growth of cultural tourism on Haida Gwaii. Cultural events such as EOTW have grown and have become major tourist attractions on Haida Gwaii. EOTW has grown into a cultural tourism attraction to come to Haida Gwaii in the summer. In 2019, EOTW will offer professional concert experiences for local musicians to share the stage with Canadian and international artists, learning from one another and growing in their respective artistic practice. The festival offers ample opportunities for our community volunteers to work with other talented musicians from BC and across Canada</p>	
<p>Does your festival or event feature artistic performances?</p> <p><input checked="" type="radio"/> Yes    <input type="radio"/> No</p>	<p>If yes, do you compensate artists and arts professionals by paying fees at industry standards and adhere to international intellectual property rights standards?</p> <p><input checked="" type="radio"/> Yes    <input type="radio"/> No</p>
<p>Number of people who attended or participated in the previous festival or event:</p> <p>2100</p>	<p>Number of people projected to participate or attend the festival or event this year:</p> <p>2200</p>
<p>Do you track where attendees and participants are from (e.g. their home community)?</p> <p><input type="radio"/> Yes    <input checked="" type="radio"/> No</p>	<p>What percentage or number of last year's attendees was from outside the community in which the festival or event was held?</p> <p>35%</p>

## 8. Festival/Event Financials

Actual expenses for last year's festival or event:	Actual revenue for last year's festival or event:
\$ 115,623.00	\$ 120,845.00
Budgeted expenses for this year's festival or event:	Estimated revenue for this year's festival or event:
\$ 110,900.00	\$ 110,900.00

✦ Complete the above, however if you wish to provide a more detailed project budget, please attach separately to this application.

### 9. Funding Request

The following funding is requested from Northern Development:

Funding type:	Amount (\$):	
Grant	\$ 5,000	+ Maximum allowable grant is: * \$2,500 per festival or event with a total project budget less than \$50,000. * \$5,000 per festival or event with a total project budget of \$50,000 or greater.
Describe how will the funding be used to increase the event hosting capacity: The proposed workshop will provide unique opportunity to work with performing artists and collaborate in creative ways for local members of our communities. The workshops will provide a one-on-one interaction where the audience members get to participate and learn the intricacies of being a performer and understand there is more to a performance than musical talent. EOTW is committed providing opportunities for more audience participation in festival programming as volunteers and participants. The workshops, music camp and performance will be held between August 9 -11 2019 at the festival grounds in Tlell, BC. We also have support in the form of a resolution of support from the village of Port Clements which is in the community where the festival takes place. The workshops are popular and well attended. We will present 14+ workshops over a two-day period that offer fun and creative opportunities for the general public to spend making music and visual art, being in a puppet show, learning new yoga moves, learning about both Haida dialectics, and hanging out with festival musicians and artists. The workshops are attended by kids to seniors and had people from both off-island		

+ Please refer to the [Fabulous Festivals and Events Application Guide](#) for ineligible costs.

### 10. Other Funding Sources (if applicable)

Funding source:	Amount (\$):
	\$
	\$
	\$
	\$
	\$
<b>TOTAL OTHER FUNDING: \$ 0</b>	

### 11. Attachments

List all documents attached to this application:

Document name:
<input checked="" type="checkbox"/> 1) <b>Required:</b> Financial statements from the last festival or event.
<input checked="" type="checkbox"/> 2) <b>Required:</b> A copy of the most recent festival or event brochure.
<input checked="" type="checkbox"/> 3) <b>Required:</b> Society incorporation document.
<input checked="" type="checkbox"/> 4) <b>Required (if applicable):</b> Local government or band resolution of support (as outlined in section 4. Resolution of Support)
5)
6)

## 12. Authorization

- ☒ I have read and understand the [Fabulous Festivals and Events Application Guide](#) including the ineligible costs.
- ☒ I confirm that the information in this application is accurate and complete, and that the project proposal, including plans and budgets, is fairly presented.
- ☒ I agree that once funding is approved, any change to the project proposal will require prior approval of Northern Development Initiative Trust (Northern Development).
- ☒ I also agree to submit a report using Northern Development's reporting form to verify performance measures for the event within 30 days of the festival or event's completion and where required, financial accounting for evaluation of the activity funded by Northern Development.
- ☒ I agree to provide photos of the festival or event and permission for Northern Development to use the photos for promotional purposes.
- ☒ I understand that the information provided in this application may be accessible under the Freedom of Information (FOI) Act.
- ☒ I agree to publicly acknowledge funding and assistance by Northern Development.
- ☒ I authorize Northern Development to make enquiries, collect and share information with such persons, firms, corporations, federal and provincial government agencies/departments and non-profit organizations, as Northern Development deems necessary for decision, administration, and monitoring purposes for this project.
- ☒ I agree that information provided in this application may be shared with the appropriate regional advisory committee(s), board of directors, Northern Development staff, and consultants.

Name (organization signing authority): + Please type name. Scott Marsden	Position/title: Volunteer Fund-raiser	Date: January 4 2019
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## 13. Submitting Your Application

Completed funding applications (with all required attachments) should be provided electronically to Northern Development by email. + Please do not scan this form (if possible).

Email: [info@northernddevelopment.bc.ca](mailto:info@northernddevelopment.bc.ca)

## **6. Festival/Event Overview**

### **Provide a description of the festival or event:**

Edge of the World Music Festival (EOTW) is 3-day music festival (Friday/Saturday/Sunday) August 9, 10, & 11 and features a mix of local artists and visiting artists. EOTW is the only festival of its kind on Haida Gwaii, and one of a handful on the northern British Columbia. We fulfill our mandate by providing the venue that allows local to present their craft with professional artist from across Canada and helps create a community of artistic support in this region. EOTW is a registered as a not-for-profit in July 2000 and has been entertaining audiences on Haida Gwaii at the annual 3-day music festival ever since. EOTW offers many opportunities for local musicians to share the stage with Canadian artists, learning from one another and growing in their respective artistic practice. As one of the most anticipated and celebrated community events on Haida Gwaii, it brings together the communities of Old Massett, Massett, Port Clements, Skidegate, Queen Charlotte, and Sandspit in the central, rural community of Tlell. Three days of song, dance, and celebration brings together the community of islanders, along with our visitors from across BC and Canada. EOTW reaches beyond BC, inviting performers and guests from off island to come and enjoy local, regional, and national musical talent. EOTW assists in promoting the cultural health of all of the communities on Haida Gwaii and fosters the spirit of cooperation, cultural understanding and trust by promoting the concept of the Islands as the community; we bring together people of all ages from all the islands' communities to celebrate in the common language of music. EOTW also assists in the promotion of education and artistic expression in the communities of Haida Gwaii and with the Haida culture.

### **Please describe how the festival or event promotes or strengthens the unique character of the community:**

EOTW the only festival of its kind on Haida Gwaii and reaches out to BC, especially our northern neighbors, inviting performers and guests from off- island to come and share their musical talents with the communities of Haida Gwaii. As one of the most anticipated and celebrated events on Haida Gwaii, it unites the communities of Old Massett, Massett, Port Clements, Skidegate, Queen Charlotte, and Sandspit in the central rural community of Tlell. Three days of song, dance, and celebration really unites us as one community of islanders, along with our visiting friends in celebration of artistic excellence, bringing together young and old, and mingles a variety of cultures and artistic works. EOTW offers professional concert experiences to our communities that offers a variety of artistic talent and musical styles appealing to diverse musical tastes on Haida Gwaii. EOTW offers many opportunities for local musicians to share the stage with Canadian and international artists, learning from one another and growing in their respective artistic practice. The festival offers ample opportunities for our community volunteers to work with other talented musicians from BC and across Canada. EOTW brings some of the best up-and-coming Canadian musicians to Haida Gwaii for an energetic and lively weekend of high-quality entertainment. EOTW is exploring new exciting artistic opportunities, as a means to grow our festival further in the Northern BC region, attracting more visitors from off-island, bringing a proven economic benefit to the local communities on Haida Gwaii. EOTW is the premier event of the summer

and brings numerous economic benefits to the communities here, with all accommodations in the area fully booked for that weekend. It is a commitment of the festival organizers to use the services of local businesses and individuals whenever possible. Many local businesses received significant financial and in-kind benefits from recent festivals which include accommodations, food services, transportation, and restaurants.

**Do you have any volunteers for this festival or event? If so, how many?**

Our main resource of support from the community is our volunteer base and we succeed through the efforts of community volunteers and their commitment to volunteer hundreds of hours to make the festival a success. We estimate that the volunteers provide approximately \$400,000 worth of time to help plan, manage, present and evaluate the festival. EOTW measurable results included assessing number of attendees and volunteer participation. We had 155 volunteers for a total of 4,255 hours. EOTW relies on volunteer hours to plan and operate the festival.

## **7. Direct Economic Benefits**

**Outline the economic benefits to the local or regional economy:**

EOTW is also committed to providing local businesses and not-for-profits with commercial opportunities. Local businesses that received support from recent festivals include: Tlell Fall Fair Committee, Big Red Transportation, Crystal Cabin, AMS Hardware store, Queen Charlotte Observer and Haida Gwaii Trader. In addition, BC Ferris and Pacific Coastal Airlines have been supportive of the festival by assisting the transportation of visiting artists. Almost 80% of our vendors are local and sell local food, arts and crafts, fine art works and other items. Visitor's play a significant role in EOTW and the Haida Gwaii economy. They bring substantial economic benefits to local businesses at the festival and on Haida Gwaii. EOTW receives in-kind support from local businesses including the following

BC Ferries - ticket compensation for the stage and crew.

Big Red Enterprises - garbage removal.

Costal Propane - propane.

Forbes Pharmacy - sanitation supplies.

Full Moon Photo - festival photography.

Haída Gwaii Co-op -sanitation supplies.

Hospital Days Foundation - large BBQ.

Kaichi Designs, Sewn Art, Full Moon Photo, AMS, All About U Gallery, North Coast Supply, QC Liquidation, Ranch Feeds, Sun Studio - raffle prizes.

**Outline how the festival or event will attract tourism to the community:**

EOTW has gained a well-earned reputation among touring musicians for its hospitality, high quality performance venue and our unique geographic location. This makes EOTW an integral part of the music scene on Haida Gwaii and has gained a well-earned reputation among touring musicians for its hospitality, high quality performance venue and our unique geographic location. The development of EOTW as a cultural attraction is an important part of the growth of cultural tourism on Haida Gwaii. Cultural events such as EOTW have grown and have become major tourist attractions on Haida Gwaii. EOTW has grown into a cultural tourism attraction to come to Haida Gwaii in the summer. In 2019, EOTW will offer professional concert experiences for local musicians to share the stage with Canadian and international artists, learning from one another and growing in their respective artistic practice. The festival offers ample opportunities for our community volunteers to work with other talented musicians from BC and across Canada.

**9. Funding Request**

**Describe how will the funding be used to increase the event hosting capacity:**

The proposed workshop will provide a unique opportunity to work with performing artists and collaborate in creative ways for local members of our communities. The workshops will provide a one-on-one interaction where the audience members get to participate and learn the intricacies of being a performer and understand there is more to a performance than musical talent. EOTW is committed to providing opportunities for more audience participation in festival programming as volunteers and participants. The workshops, music camp and performance will be held between August 9 -11 2019 at the festival grounds in Tlell, BC. We also have support in the form of a resolution of support from the village of Port Clements which is in the community where the festival takes place. The workshops are popular and well attended. We will present 14+ workshops over a two-day period that offer fun and creative opportunities for the general public to spend making music and visual art, being in a puppet show, learning new yoga moves, learning about both Haida dialects, and hanging out with festival musicians and artists. The workshops are attended by kids to seniors and had people from both off-island and across Haida Gwaii. The workshops are free to the public.



## **Staff Report**

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**Date:** March 22<sup>nd</sup>, 2019

**To:** D. Chapman, Chief Administrative Officer

**From:** D. Fish, Corporate Officer

**Subject:** Charge North – CleanBC Communities Fund Application

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### **Recommendation:**

**THAT the staff report entitled “Charge North – CleanBC Communities Fund Application” be received;**

**AND THAT the Board of the North Coast Regional District participate in the Charge North EV Network project and associated CleanBC Communities Fund application and dedicate a total of up to \$10,000 to be funded from Economic Development for the Regional District’s portion of the cost of two Level 2 public electric vehicle charging stations at \_\_\_\_\_ in Electoral Area E and \_\_\_\_\_ in Electoral Area D;**

**AND FURTHER THAT the Board of the North Coast Regional District support the North Coast Regional District’s application, on behalf of the Charge North participating local governments, to the CleanBC Communities Fund to support the Charge North project;**

**AND FURTHER THAT the Board of the North Coast Regional District authorize staff to sign and enter into a partnership agreement with the Community Energy Association as presented.**

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## **PURPOSE:**

The purpose of this report is to present to the North Coast Regional District (NCRD) Board the proposed CleanBC Communities Fund application in support of the Charge North project. This report also presents as a proposed Partnership Agreement between the NCRD and the Community Energy Association (CEA) to formalize the project management relationship between both parties in support of the Charge North project.

This report seeks a resolution of support from the Board of the NCRD for the CleanBC Communities Fund application, with specific information requested on the siting of proposed level 2 charging stations, as well as a resolution to authorize the entering into of the proposed Partnership Agreement.

## **BACKGROUND:**

The Charge North project is a community-led project, directed by six regional governments, with planning and implementation facilitated by the CEA. The project aims to establish 120 level 2 charging stations along the Highway 16-97 network.

At this time, the project is in its capital resourcing phase, in which the CEA and participants are seeking grant funding to support the capital installation costs of the **proposed charging network**. **Through the project's advisory committee, it was identified** that the CleanBC Communities Fund would support approximately 73% of total capital costs, with additional costs to be borne by individual communities wishing to host charging stations.

At its Regular meeting held February 23, 2019, the Board of the NCRD passed the following resolution:

***MOVED by Director Olsen, SECONDED by Director Brain, that the Board of the North Coast Regional District assume responsibility of the lead applicant to the CleanBC Community Fund to support the Charge North Electric Vehicle Charging Network project.***

**109-2019**

**CARRIED**

## **DISCUSSION:**

Attachment A to this report includes the proposed application to the CleanBC Communities Fund in support of the Charge North project.

Under the CleanBC Communities Fund application, the NCRD, on behalf of participating local governments in the Charge North project, seeks to secure \$753,200 to support a \$1,027,000 project. The project will install 57 level 2 charging stations in municipalities and electoral areas within the project study area.

Under a proposed agreement (Attachment B), the CEA will facilitate overall management of the Charge North project and reporting requirements under the proposed CleanBC Communities Fund grant application. Note that the agreement references the

As per the proposed agreement, the NCRD would assume the role of lead applicant to the CleanBC Communities Fund and would, ultimately, enter into a final funding agreement with the Province of B.C. for the undertaking of this project. Reporting would be directly through the NCRD to funders through the local government information system provided.

Under agreement, the CEA would assume responsibility for the following:

- Advising on site positioning finalization,
- RFP & selection of equipment and installation of services,
- Contracting negotiation with vendors,
- Facilitation of network contract with equipment and installation vendors,
- Coordination of installations,
- Reporting management,
- Collaboration with the NCRD on financial management,
- Operations and maintenance planning over the next 5 years,
- Marketing and promotion of the Charge North network.

In addition to the proposed application and agreement, Staff is also seeking direction from the Board of the NCRD with respect to charging station locations in Electoral Areas D and E. Proposed sites will need to be identified as part of the application process and, where needed, lease agreements or licence of occupations for the installations will need to be finalized for April 2019.

**RECOMMENDATION:**

Staff is recommending that the Board of the NCRD:

- Provide a resolution of support for the proposed CleanBC Communities Fund application;
- Provide a resolution for staff to sign and enter into the proposed partnership agreement with the CEA for the undertaking of the Charge North project; and
- Provide staff with further direction with respect to charging station locations in Electoral Areas D and E so that staff may follow up with the necessary site planning in support of the application.

## Charge North (NCRD Applicant) Draft CleanBC Communities (ICIP) Fund Application

### Section 1: Applicant Information

#### 1. Applicant's Primary Contact Information (from the applicant organization)

First Name: Daniel  
Last Name: Fish  
Title: Corporate Officer  
Phone Number: 250.624.2002 (ext.2)  
Email Address: corporateofficer@ncrdbc.com

#### 2. Applicant's Secondary Contact Information (optional)

First Name: Janice  
Last Name: Keyes  
Title: Senior Manager, Community Energy Engagement  
Phone Number: 604-561-0646  
Email Address: jkeyes@communityenergy.bc.ca

### Section 2: Project Information

#### 3. Project Title (*Provide a short, concise, plain language, title.*):

Level 2 Electric Vehicle Charging Network for Central and Northern BC

#### Project Description and Rationale

#### 4. Project Description:

##### a) Provide a general, brief description of the project: (1000 character limit)

Charge North is an electric vehicle (EV) network project that will electrify close to 2,800 km of highway based on local community priorities and interests, from the Thompson-Nicola region, through Kamloops and Prince George, to Haida Gwaii. By addressing EV infrastructure along with education, outreach, and engagement with the public, communities, and auto dealers, Charge North will connect into existing EV networks and provide residents with transportation options already available to the rest of BC. Charge North will also provide communities with tourism opportunities, and reduce greenhouse gas emissions. The Level 2 charging stations are an important component of the network and key to maximizing the benefits for individual communities and the larger region. During the first phase of infrastructure deployment, Charge North will support 30 local governments to install 57 Level 2 stations, across all six regional districts in the Charge North project area.

##### a) Provide a detailed list of project works: (2000 character limit)

This application is limited to the Level 2 station network. This part of the project will purchase and install 57 Level 2 EV charging stations, in 30 communities and include overall project management and administration, Level 2 EV charging equipment, design, permitting, and installation.

The deployment of Level 2 stations will be undertaken simultaneously with ongoing public education and engagement, car dealer outreach, and support to other agencies planning for Level 3 stations in the Charge North area.

We know BC has latent demand for electric vehicles: more than 30% of Canadian households have an interest in purchasing an EV as their next vehicle. Local government support for EV station implementation could therefore play a very strong role in transforming the passenger vehicle market from fossil-fuel-powered vehicles to low-and zero emissions electric vehicles. In terms of reducing community GHG emissions, local and regional Electric Vehicle Supply Equipment (EVSE) programs and policies could have considerable impacts.

According to research conducted at SFU, the demand side is where local governments can have a key influence, as increased charge access is critical to increase market share beyond 4-5% by 2030. This is also significant to support the Province of BC's ZEV mandate.

**5. Project Rationale: Describe why the project is needed and how this need was determined or assessed. (For Example: Consider overall demand for project in conjunction with demand management initiatives, availability of technology, forecast of demand. Current facility does not offer charging infrastructure and there is increased demand for charging infrastructure in our community; project will install district energy system to supply building heating in an area that has been found to have the highest potential for conversion from existing GHG intensive building heating system to district energy system; etc.)**

(4000 character limit)

Along with the Province's CleanBC Plan commitments to clean transportation options, all the Charge North communities are signatories to BC's Climate Action Charter and are looking for cost effective, high impact ways to reduce greenhouse gas emissions in their communities. In the Charge North study area, transportation-related emissions are significant, averaging 64% of all community emissions, across the six regional districts. Transportation also accounts for the majority of community-wide energy spending across northern and central BC, over \$1 billion annually. Adopting electric vehicles in rural areas is one of few ways that small communities can significantly reduce transportation emissions and energy costs. It can cost 80% less to operate an EV than a gasoline-fueled vehicle. The supporting document "Charge North Regional District Energy Profiles" outlines an energy and emissions profile for each of the six participating regional districts and provide a summary of total energy costs in the Charge North study area.

Transportation is a regional issue as well as a local issue. An effective transportation network requires collaboration and cooperation to ensure inter-community mobility. This is especially true in BC's rural areas, given the distances between communities. Transportation planning and climate action intersect with a full suite of activities from effective land use, to transit and active transportation improvements. Each of these have a role to play in reducing energy and emissions, many of which focus primarily on in-community transport which is typically about 50% of the total transportation. In rural areas, where growth is minimal, driving distances are greater and weather can be extreme. Addressing the fuel choice, in this case electrification, is an approach that can yield significant long-term energy and emissions reductions while promoting local economic development through EV tourism. Safe and convenient transportation along the 'Highway of Tears' has been identified as a priority for northern

communities as well as the Ministry of Transportation and Infrastructure and Translink, along with the co-benefits of emissions and energy savings.

Recognizing the opportunities for individual communities as well as across regions, the Mayors of Smithers, Burns Lake and Prince Rupert, and staff at City of Prince George, on behalf of communities along Highway 16, came together to explore a regional charging initiative similar to Accelerate Kootenays, a successful, rural, community-lead EV network. The project quickly grew to include six regional districts in central and northern BC and together these RDs made a commitment to work together as well as a financial commitment to secure funding from FCM to support the communities in planning / preparing the network. Community Energy Association was hired to facilitate the planning work as well as identify and secure capital funding for local governments to develop the Charge North Network.

The time is now for local governments to show leadership on accelerating EV adoption in their own communities and supporting the development of the Charge North network. BC Hydro and the MOTI are both moving forward on phased plans for significant EV infrastructure as part of a province-wide plan to electrify highways for EV travel, primarily with Level 3 stations. The Level 2 network brings local priorities and interests to the table to maximize community benefits while working collaboratively on clean transportation actions with significant regional benefits.

### **Federal Outcomes**

**6. Identify which outcome the project will support:** Increased access to clean energy transportation

### **Project Type**

**7. Project Category (for tracking only) (Example: Energy Efficiency, Green Energy)**

Energy Efficiency

### **Project Location**

**8. Project physical address (and/or start and end points) (No character limit)**

The Charge North project includes all communities and electoral areas across six regional districts including North Coast Regional District, Regional District Kitimat-Stikine, Regional District Bulkley-Nechako, Regional District Fraser Fort George, Cariboo Regional District and Thompson-Nicola Regional District. A total land area of approximately 306,000 km squared and home to 420,000 residents, this first wave to Level 2 stations will be deployed in 30 communities, in 57 specific locations. Each station will be installed on municipal or regional district owned property and available for public use and benefit. As confirmed by the provincial grant advisor for the CleanBC Community Fund, a .KML file is not required at this point in the application process, due to the numerous “project locations” represented by the collective application. A map indicating all station locations as well as table outlining Level 2 station location by community is provided in a mandatory document “Charge North Project Locations”.

**9. Has this project (or related components or phases) been the subject of another infrastructure grant application? (Yes/No) No**

## Project Nature

### 10. Nature of the project works. Indicate % for each relevant type:

New – 100 %

Rehabilitation – X %

Expansion – X %

Other – X %

### 11. Does the project involve public facing infrastructure? (Yes/No)

Yes, each of the 57 Level 2 stations will be installed on municipal or regional district owned property and available for public use and benefit.

**If Yes, will the public facing infrastructure meet the highest published accessibility standards (defined as the requirements\* in the Canadian Standards Association Technical Standard Accessible Design for the Built Environment CAN/CSA B651-12)? (Yes/No) Yes**

#### iv. If Yes, briefly describe how the design will meet the accessibility standards

**\*Projects must meet or exceed the requirements of the highest published accessibility standard in a jurisdiction, in addition to applicable provincial building codes and relevant local government bylaws (No character limit)**

Each of the Charge North site assessments will include an evaluation of accessible requirements and incorporate into site designs where feasible. These include, but are not limited to considerations such as the height of screen and cable, the amount of space in front of charge station and providing larger space on the sides of the parking stall.

Best practice suggests locating the EV parking stall directly beside an existing accessible parking stall and installing the station in a strategic location to allow the length of cable to reach both stalls. The charge station screen itself can be positioned to best accommodate the accessible user. Please see the mandatory document “Charge North Site Plan” for an example of a generic site design for accessible charging.

Charge North consultants have had initial discussions with the northern chapter of Spinal Cord Injury BC to better understand accessibility requirements and discuss a report that evaluates general accessibility at provincial rest areas.

### 12. Does the project involve construction or rehabilitation of buildings? (Yes/No) No

### 13. Does the project take into account your local government’s Energy Efficient Step Code adoption? (Yes/No) No

### Section 3: Eligibility Considerations

**14. Do you have a Council/Board/Band Council or other appropriate governing body resolution authorizing the project to proceed and committing your share of project funding? (Yes/No) Yes**

**If Yes, Submit copy of resolution.**

Twenty-six local governments and two First Nations have committed to Level 2 stations and a corresponding financial contribution to the project. The full set of 28 Council/Board Resolutions, along with a Board Resolution from the North Coast Regional District as lead applicant, are uploaded as one mandatory document “Charge North Resolutions”.

**b) If No, when do you expect to submit the council/board resolution?: DD-MM-YYYY (required within one month of application closing date.)**

**Note:**

**1. For Local Government applicants, a Council/Board resolution is required;**

*(Skipped past Notes 2-4 as they’re not for Local Government applicants)*

**15. Has the project started? Projects that have started (construction tender awarded) are ineligible. (Yes/No) No**

*If Yes, please contact the Ministry before proceeding.*

**16. What is the percentage of project design that has been completed as of application submission date?**

We estimate that 10% of project design has been completed. Local governments have identified specific buildings and parking lots and have preferred places on each site for the charging stations and associated parking stalls. A high-level assessment by local government staff has been conducted to confirm adequate electrical capacity at each building (240V/40A per charger, which is usually not a problem in large commercial buildings). Once equipment is selected, and an installer selected, (both through a competitive RFP process), initial site visits will be conducted and electrical/civil design will be completed (essentially confirming the preferred placement and completing a drawing for where the electrical run would be).

**17. Estimated project start date – 01-06-2019**

Project would start one month after execution of contribution agreement is signed.

**18. Estimated project completion date – 31-09-2021**

Thirty months after project start date or approximately September 2021.

**19. Estimated construction start date – 01-09-2019**

September 2019 or approximately three months after project start date, weather dependent. Construction will be seasonal and weather dependent.

**20. Estimated construction completion date – 31-09-2021**

Two years after construction start date or approximately September 2021.

**21. What is the population that will be directly served by this project? (Number only)** 420,000

**22. Does the project benefit a wider geographic area? (Yes/No)** Yes

**c) List any communities that will benefit from this project and the corresponding populations. (4000 character limit)**

Transportation is a regional issue as well as a local issue and this is especially true in rural communities where there is a high portion of inter-community mobility. The Level 2 network will provide both intra and inter-community travel options for residents. For example, residents may use Level 2 stations in their own communities to top up their EV while shopping or attending community activities. The availability of Level 2 stations in neighboring communities provides the opportunity for inter-community EV travel for work, for pleasure and to access services in a nearby community. Looking at the 30 communities that will be hosting a Level 2 station, and assuming that each of these locations provides a direct benefit to all neighbouring community within approximately 70 kms range, we can calculate that the Level 2 stations will directly benefit 420,000 people, based on the 2016 census. By regional district, the approximate populations are North Coast Regional District – 55,500, Regional District Kitimat-Stikine – 37,000, Regional District Bulkley-Nechako – 38,000, Regional District Fraser Fort George – 94,500, Cariboo Regional District – 62,000, Thompson-Nicola Regional District – 133,000.

The Charge North EV Network will connect Charge North communities to existing EV corridors with a safe and reliable network, opening up central and northern BC for EV tourism and bringing travelers from all corners of the province, and across North America. Existing EV networks in the southern part of the province, including the Kootenay region are continuing to expand with the deployment of the Peaks to Prairies EV Network in southern Alberta and planning efforts of Charge North and a mid-island network on Vancouver Island.

**23. Will the project support Indigenous populations? (Yes/No)** Yes.

Charge North is working with three First Nations communities to support their efforts to install Level 2 stations in their communities and/or consider EVs as a viable fleet or community use vehicle. With local charging stations in place, EVs represent a safe, accessible, affordable travel option for these communities, cost effective option for inter-community travel as well as possible car share programs for First Nations.

The four Nisga'a Nation communities are working under the Nisga'a Lisims Government (NLG) to host five Level 2 stations in four communities to support EV use by local residents, village fleets and to encourage EV tourism to the region. Charge North Level 2 stations in Terrace will provide public charging, replacing current stations that are not operational, and provide a key access point to the Nisga'a Memorial Lava Bed Park, the Lava Bed Circle Tour and the four communities of Gitlaxt'aamiks, Gitwinksihlkw, Laxgalts'ap, Gingolx.

Charge North is also working collaboratively with the Stellat'en First Nation to install one Level 2 station at the Nation-owned gas station/gift store located on the Stellaquo reserve, about halfway between Vanderhoof and Burns Lake on Highway 16 and near the Village of Fraser Lake. This will be supported by future plans to develop a cultural centre at this location.

The McLeod Lake Indian Band has just completed a Community Energy Plan and is considering a Level 2 station at the Ah'da Centre, adjacent to Tse'khene Food & Fuel store. McLeod Lake is immediately adjacent to Highway 97, a key Charge North corridor. Many McLeod Lake members live in Mackenzie, 46

kms away and Prince George, 140 km away, the region's primary service centre. While not applying for Level 2 stations funding at this time, Charge North will continue to work with McLeod Lake for future Level 2 or Level 3 station consideration.

**C) If Yes, please estimate the Indigenous population that the project will directly serve. (number only)**  
2,000

**i.) If Yes, Please estimate the Indigenous population that the project will indirectly support. (number only)** 11,700

**24. Will the applicant own and operate the completed project? (Yes/No)** Yes

**e) If No, Provide additional information about the ownership of the completed project and who will be responsible for its operation and maintenance.**

*Applications from improvement districts must be made by the sponsoring municipality or regional district. If the application is successful in obtaining funding, the ownership of the infrastructure and associated assets must be transferred to the sponsoring local government.*

**f) Is there infrastructure related to the project that is owned, managed, or maintained by others (besides the main applicant organization)? (Yes/No)** Yes

**ii.) If Yes, Please describe.**

Each of the 28 participating local governments/First Nations in this application will own and operate the Level 2 stations installed within their communities and will enter into an MOU agreement outlining the owner/operator responsibilities. The lead applicant, North Coast Regional District will own and operate the two stations hosted on regional district property.

**Local Governments only:**

**25. Has the community signed the BC Climate Action Charter? (Yes/No)** Yes

**g) If No, Local Government applicants should be signatories of the BC Climate Action Charter in order for their application to be eligible under the Program. Please contact Program Staff if you have further questions.**

## **Section 4: Mandatory Documents**

*In all cases, relevant information should be included within the completed application form itself, as this will form the basis of the assessment. Please make specific reference within the application to sections of attached documents that you wish to be included in the review. Attachments should be clearly labelled, organized, and succinct.*

## Local Governments

### 26. Please attach each of these mandatory documents (15 MB limits per documents):

☒ **Project location .KML file (see directions on website)** – Yes; FILE NAME; Charge North Project Locations; this is not a Not KML file but project map with legend (.KML file not necessary for initial application (first phase). Detailed map showing locations by LG is sufficient, **Non .kml file can be uploaded**. Separate .KML files showing EACH location needed if granted initial approval (second phase)

☒ **Detailed Cost Estimate (see template on website)** Yes – FILE NAME; Charge North Detailed Cost Estimate

☒ **Site Plan** Yes – FILE NAME; Charge North Site Plans; this is a combo doc with generic site assessment template, case study site plan from AK and generic accessible station plan from Powerpros

☒ **Feasibility Study (see program guide for details)** Yes; FILE NAME; Charge North Feasibility Study; this is a reorganization of the FMC Interim Report to satisfy feasibility study grant requirements

☒ **List and status of required licenses, permits and approvals. Indicate if they have been “obtained” or are “pending.” Upload a copy of those obtained** Yes – FILE NAME; Charge North Required Licenses; this is a very thin narrative explaining we do not need any permits outside of electrical for work on civic sites and these will be obtained by station installer after site design is complete for each station location. (List of required licenses, etc. not necessary for initial application, may be required for second phase – more discussion with Province on this. Will need to condense all licensees, permits, etc into one document for submission)

### 27. Please attach other supporting documents you wish to be considered (optional, see the Program Guide for guidance): (maximum of 4 supporting documents permitted, suggest amalgamating supporting documents where possible (e.g. letters of support, partnership agreements))

☒ **Partnership agreement/ MOU between project partners if applicable** – Yes 1; FILE NAME; Charge North Partnership Agreement and Draft MOU...this is a combo pdf with cover sheet, NCRD Letter re lead applicant, NCRD-CEA Partnership Agreement and Draft MOU

☒ **Cost Benefit Analysis or Other Study** - No

☒ **Design Drawings or Details** – No refer to site plan above

☒ **Business Plan** – No

☒ **Letters of Support** – YES 2; FILE NAME; Charge North Support Letter; this is a combo pdf with cover letter, NCRD Letter of Support/Lead Applicant and support letters from all 5 other RDs...CRD maybe pending.

**Other** – Yes 3; FILE NAME; Charge North Regional District Energy Profiles; this is a combo pdf with cover sheet and one page energy profile per each 6 RDs

## Section 5: Project Costs and Project Delivery

### 34. Total Gross Project Costs

\$1,027,000

**35. Total Ineligible Project Costs**

\$171,000

**36. Total Eligible Project Costs [Total Project Costs less Total Ineligible Project Costs]**

\$856,000

**37. Other Confirmed Grant Funding Sources and amounts (Do not include internal funding sources):**

\$273,800 (26.666%)

*Please note: Other federal and/or provincial grants may affect the total grant requested as per stacking rules. See the Program Guide for information on stacking rules.*

- a. Gas Tax – Strategic Priorities Fund
- b. Gas Tax – Community Works Fund
- c. New Building Canada Fund – Small Communities Fund
- d. Community Energy Leadership Program
- e. First Nations Clean Energy Business Fund
- f. Other

**38. Net Eligible Costs [Total Eligible Project Costs less Total Other Funding Sources]**

\$753,200 (\$1,027,000 - \$273,800)

**39. Maximum Grant Amount (Estimated)**

\$753,200

**40. Are you requesting less than the maximum grant amount? (Yes/No) No**

- i. If Yes, Requested Grant Amount

**41. If your detailed cost estimates do not directly correspond with these amounts, clarify the variance between the costs. (No character count limit) N/A**

**Fiscal Year Breakdown**

**Please fill in the costs below. The costs to be entered will represent how much money you expect to spend on eligible costs for the project each year.**

**42.**

Fiscal Year	Forecasted Eligible Project Costs (April 1 to March 31)
2019 – 2020	<b>\$352,000</b>
2020 – 2021	<b>\$504,000</b>
2021 - 2022	
2022 - 2023	
2023 – 2024	

*Fiscal Year Breakdown Totals must equal Net Eligible Costs*

## Funding Details

**43. Is this project a phase\* or component of a larger project? (Yes/No) Yes**

**i. If Yes, please provide additional details on the phases, including funding for past and/or future phases and estimated timelines.**

**\*This phased approach *should be reflected in the cost estimates and/or supporting documentation provided.* (1000 character limit)**

The Charge North Level 2 stations are part of a full EV network will electrify close to 2,800 km of highway across central and northern BC. The full network requires approximately 30 Level 2 stations and 100 Level 2 stations to support safe and reliable travel, provide residents with transportation options, provide communities with tourism opportunities and provide the region with reduced greenhouse gas emissions. Charge North is working with BC Hydro and MOTI to develop the Level 3 portion of the network needed to provide cross-regional travel. Both the Level 2 and 3 stations are required in the development of the Charge North network and delivering local benefits to communities.

Charge North anticipates that BC Hydro will apply for current NRCan funding to move forward on the Level 3 stations required along Highway 16 and Charge North will continue to look for additional funding to support the Level 2 network expansion. NDIT indicate a good fit for the Level 2 infrastructure and the Strategic Initiatives Fund, summer 2019 intake.

**44. Can the project as submitted be broken into separate phases? (Yes/No) Yes**

**iii. If Yes, how? Would part of this project be able to move forward if full funding was not available? See Program Guide section regarding funding allocations.**

If partial funding were the only option, Charge North could consider a staged approach to the Level 2 station implementation. A preliminary phase of approximately half the stations (25) in three rather than six regional districts (approximately 15 communities) would be feasible but would delay the development of the full network that supports inter-community travel and EV tourism. There are cost efficiencies with bulk equipment purchase, coordinated site assessments and reduced travel costs associated with implementing the full set of Level 2 stations together.

**45. Do you intend to use your own workforce and/or equipment? (Yes/No) No**

***Note: Requests for the use of own labour and equipment will be subject to both provincial and federal approval and will only be allowed in certain circumstances. Approval must be sought prior to work being carried out.***

**46. At this stage, is there the intent to use sole source procurement for any aspect of the project? (Yes/No) Yes**

**iv. If Yes, Identify the estimated amount of the sole source contract, who will be conducting the work, the nature of the work and explain why sole source contracting will be used.**

***Projects that require sole source contracts over \$25,000 may need a Federal Treasury Board submission for project approval. (1000 character limit)***

The Charge North project is dependant on a 3<sup>rd</sup> party providing the cross-regional collaboration and administration and have hired Community Energy Association (CEA) to do this. CEA has requested clarity if this essential project management role would be considered for the \$25,000 or \$100,000 threshold for sole source contracting. In this role, CEA will provide advice on site positioning finalization, oversee RFP & selection of equipment and installation services, negotiate contracts with vendors, facilitate local government contracts with equipment and install vendors, coordinate installations to minimize costs, provide reporting management, collaborate with North Coast Regional District on financial management and offer “Intro to EV charging management” to all communities.

**47. Is the employment of apprentices; Indigenous peoples; women; persons with disabilities; veterans; youth; recent immigrants; and small-sized, medium-sized and social enterprises to be considered during project procurement/construction? (Yes/No) No**

v. If Yes, describe. (4000 character limit)

## **Section 6: Project Risks**

### **Project Financing**

***Applicants should have their share of the capital costs secured prior to application to the program.***

### **Local Governments:**

**48. Will the Local Government portion of the project come from borrowing? (Yes/No) No**

i. If yes, what proportion of the Local Government share of project funding is expected to be from borrowing? (Estimated 4000 character limit)

**49. When and how will the borrowed funding be secured? (Example: referendum, secured line of credit etc. Attach evidence of secured funds.) (Attach document for evidence of secured funds) N/A**

**50. Is public approval required to approve borrowing? (Yes/No) N/A**

ii. If No, describe why approval is not required in order to borrow. N/A

iii. If Yes, please **attach a scan of a signed and certified loan authorization bylaw** that is at (or further than) 3<sup>rd</sup> reading.

iv. If Yes, please **attach a completed Liability Servicing Limit Certificate** that includes the anticipated borrowing costs necessary to finance the project.

v. If No, are all the funds readily accessible? (Yes/No) Yes

a) If Yes, please **attach evidence of secured funds.**

***(Example: Bank statements, staff reports or resolutions of board/council directing the use of reserve funds.)***

Attach one pdf with all LG resolutions/letters that included mention of secured funding

**b) If No, what is the anticipated source of funds?**

***(Example: collected through specific rates or fees, development cost contributions?)***

**51. Is the project included in the 5-year financial plan bylaw (Yes/No)** No

**vi. If Yes, [click to upload document](#)**

***(Example: Bank statements, staff reports or resolutions of board/council directing the use of reserving funds.)***

**vii. If No, indicate when the project will be included in the 5-year financial plan bylaw and why it has not yet been included.**

The capital for each local government is relatively small and will be covered through existing budgets.

**52. If there are cost overruns, what plans are in place, beyond including contingencies within the cost estimate, to fund the unforeseen cost increases? (4000 character limit)** Project management will identify and mitigate project over-run risks. The structure of the project is set up so that local governments are reimbursed for up to 73% of project costs or the maximum amount for the municipality identified in the grant application, whichever is less. This is specified in the CEA-Participant Local Government draft MOU. The multiple local governments participating in this application have relatively small capital costs as individual participants. Both CEA and local governments have taken a highly conservative approach to estimating project costs.

*Note: ICIP does not provide additional funds to cover cost overruns.*

*(Skipped past Questions 53-64 as they're not for Local Government applicants)*

## **Project Identification**

**65. How does this project align with the long-term plans/sustainability goals of your organization and/or community? Explain how this project supports the environmental, social and economic goals and objectives of community and regional plans (Example: official community plan (OCP), regional growth strategy (RGS)?) (4000 character limit)**

All of the 37 Charge North municipalities are signatories of BC's Climate Action Charter and have a greenhouse gas reduction target in their Official Community Plan. In addition, 21 communities in the six regional districts have completed, or in-progress, community energy and emissions plans (CEEPs), including Smithers, Burns Lake, Granisle, Houston, Kamloops, Logan Lake, Barrier, Clearwater, Kitimat, Mackenzie, McBride, New Hazelton, Prince George, Prince Rupert, Quesnel, Terrace, Valemount, Vanderhoof, Wells, Williams Lake and 100 Mile House. All these plans include reducing transportation emissions and increasing local economic development. Rural communities have limited options to reduce transportation emissions given the low density of communities, the relatively low population growth rates, the weather, and distances between communities. Addressing the fuel, in this case

electrification, is an approach that can yield significant long-term energy and emissions reductions while promoting local economic development through EV tourism.

Eleven of the 19 more recent CEEPs specifically include the acceleration of electric vehicle (EV) adoption and tourism to achieve these goals. Adapting electric vehicles in rural areas is one of few ways small communities can significantly reduce transportation emissions. In the Charge North project area, transportation accounts for 64% of community-wide emissions and energy spending, a collective cost of approximately \$1 billion annually. Electrifying municipal fleets, installing public EV charging stations, supporting affordable transportation and reducing emissions are the key directives noted in these plans for the Village of Queen Charlotte, Masset, Prince Rupert, Terrace, Kitimat, Smithers, Houston, New Hazelton, Prince George, Williams Lake and Logan Lake.

**66. What alternative options for the project were considered? (No character limit)**

Other options considered and discussed by the Charge North Advisory Committee include status quo/do nothing, wait for private business to provide the infrastructure or fund Level 3 stations rather than Level 2 stations.

The six Charge North regional districts co-funded the feasibility study to collaborate and drive the electrification of central and northern BC's major corridors, therefore a "do nothing" approach would not fulfill this mandate and directives given by the local governments.

A demonstration of climate action leadership and commitment to reducing transportation-related greenhouse gas emissions is at the forefront of the local governments call to action on EV infrastructure support. Policies and incentives to support private businesses and local developers to install EV infrastructure is being encouraged by Charge North communities but taking the lead on station installation sends the best message that local governments are acting on their commitments.

Charge North communities continue to encourage BC Hydro and the Ministry of Transportation and Infrastructure to deploy Level 3 stations from Kamloops to Haida Gwaii. Stations between Kamloops to Prince George, on both Highway 97 and 5, are currently in planning and design phase and there is active consideration of Highway 16 Level 3's as part of a current proposal for federal funding. With a base cost of approximately \$100,000 to install, Level 3 stations would be a very significant budget commitment for rural communities with many competing priorities. These are best left to the larger agencies to install, own and operate as part of the full network. Level 2 stations are reasonable way for small local governments to support a diverse range of uses and vehicles, promote tourism, and to help future EV owners see that there are a variety of charging options. The Level 2's also provide some redundancy to the Level 3's when they are in use or down for repair, providing another important function to the network.

**67. How were they compared or analyzed? Please explain how and why the chosen option was selected. (No character limit)**

Direction for Charge North local governments to secure funding to proceed with Level 2 EV station deployment comes from the project Advisory Committee. The provision of a base network of Level 2 EV charging stations by local governments demonstrates leadership as well as fiscal responsibility. Community Energy Association reviewed recent integrated network deployments including Accelerate Kootenays, which is the first, and so far only, collaborative local government-led EV charging network

deployment in BC. Locally elected officials and local government staff have been clear. They want their communities to have the same travel options the rest of BC has and to drive EV tourism in the region. Given this mandate, a Level 2 deployment is critical to support Plug-in Hybrid Electric Vehicles since most do not have a fast charge port for Level 3 stations. The Level 2's also provide critical redundancy to the Level 3 (when eventually deployed) while also putting communities without a Level 3 station 'on the map' and enabling town-to-neighboring-town travel for low range battery electric vehicles.

We have explored the potential for private sector deployment along the corridor; however we have not found willing private sector partners. Also, having private sector ownership and operation would increase the likelihood that the chargers would not be placed in the strategic locations that the local governments have chosen to support tourism and local economic development.

BC Hydro and Ministry of Transportation and Infrastructure are active in deploying Level 3 stations and we are continuing to encourage them to prioritize Charge North corridors. Neither have expressed interest in owning and operating a level 2 network.

Local governments are the only viable owners and operators of a regional Level 2 network. This grant is the only grant available to support Level 2 charging infrastructure.

**68. How does the project represent the most efficient solution to achieving lower GHG emissions?**  
**(No character limit)**

As mentioned previously, all Charge North CEEPs include a reduction in transportation emissions. Rural communities have limited options to reduce transportation emissions given the density of communities, the relatively low population growth rates, the weather, and distances between communities.

The typical approach to transportation emissions is: "Reduce, reduce, reduce, and electrify what's left". It starts with reducing in-community transportation needs by effective land use. This is the greatest lever communities, growing at over 1.5% annually, have. However, few communities in the Charge North area enjoy that growth rate. The layout of these communities in 2050 is likely to look very similar to today. It is difficult for rural communities to 'grow their way out' of transportation emissions. The next approach is shifting from single occupant vehicles to transit, active transportation, and car pools. These approaches are critical and will benefit all communities, however, the total emissions reduction is typically low in rural areas due to a variety of factors including cost of providing rapid, convenient transit in low density communities, coupled with the specific challenges of active transportation in the winter. The above approaches are primarily focused on in-community transportation, which is typically about 50% of total transportation trips, the remainder being transportation to/from other communities. Encouraging right-sizing vehicles is the next approach, to which there are both legitimate and perceived barriers in central and northern BC. Finally, addressing the fuel, in this case electrification is an approach that can yield significant long-term energy and emissions reductions while promoting local economic development through EV tourism.

***(Note: Rationalize selection of the particular option\*, in that: services are integrated, operating and maintenance costs are minimalized, the selected option has a longer lifespan minimizing replacement costs over time, coordination with other works, etc.)***

***\*The provincial technical reviewer will not be re-assessing project options. The purpose of this question is to demonstrate that the scope of the project was carefully considered.***

## **Project Consultation Considerations**

### **69. What affected interested groups or stakeholders have been consulted with regarding the project? What was the feedback from consultation? (No character limit)**

Since the project began in May 2018, stakeholder engagement has been underway with representatives from regional districts, municipalities, provincial ministries, MLAs, utilities, industry, tourism organizations, educational institutions, EV enthusiasts, car dealerships and First Nations. Robust stakeholder outreach is ongoing by email and phone as well as through events, presentations and personal meetings.

#### **In-person Engagement:**

To launch the project, consultants visited the majority of the study area communities over summer 2018 including:

- June 2-7, 2018 - Highway 16 from Prince Rupert to Valemount to:
  - Meet with representatives from Prince Rupert Port Authority, North West Community College and EV enthusiasts in Prince Rupert;
  - Meet with municipal staff and elected officials in Houston, Burns Lake, Fraser Lake, Vanderhoof and McBride;
  - Connect with EV enthusiasts, regional BC Hydro representative and Northern BC Tourism and Film Office in Prince George;
  - Photograph and evaluate 14 communities for potential station locations along Highway 16
  - Photograph and evaluate all MOTI Rest Areas for potential station locations along Highway 16
- July 27-30, 2018 - Highway 97 communities from Prince George to 70 Mile House to:
  - Meet with municipal staff from Quesnel, Williams Lake and 100 Mile House
  - Photograph and evaluate 7 communities for potential station locations along Highway 97 South
  - Photograph and evaluate all MOTI Rest Areas for potential station locations along Highway 97 South
- August 11-13, 2018 – Haida Gwaii communities outreach to:
  - Meet with municipal staff from Village of Masset and Port Clements
  - Connect with an EV enthusiast from Tlell
  - Photograph and evaluate 7 communities for potential station locations on Haida Gwaii
- August 15-16, 2018 – Highway 5 communities from Kamloops to Blue River to:
  - Meet with TNRD Area Directors for Blue River and 70 Mile House
  - Photograph and evaluate 5 communities for potential station locations along Highway 5
  - Photograph DCFC construction sites at 3 MOTI Rest Areas along Highway 5

#### **Remote Outreach:**

Over the last six months, direct outreach to all of the Charge North municipalities through email and/or

phone calls to Mayors, key Councillors, CAOs and other staff such as Economic Development Officers has been conducted to introduce the project and outline local government participation at the community level for future station siting. Outreach to other stakeholder organizations is also ongoing with some key contacts developed through:

- Northern Development Initiatives Trust;
- Misty Isle Economic Development Society;
- Swilawiid Sustainability Society;
- Skeena Watershed Coalition;
- Northern BC Tourism and Film Office; and
- Cariboo Chilcotin Coast Tourism Association

#### **First Nations Engagement:**

At the direction of the Advisory Committee, we continue to explore opportunities for outreach to the approximately 30 First Nations communities in the study area, leveraging support from regional agencies and organizations such as:

- Northern BC Tourism Office and their Indigenous Tourism liaison;
- BC Hydro's Indigenous Relations team; and
- Consultants' First Nations contacts in northern and central BC

#### **Workshops and Events:**

A number EV workshops have been hosted the Charge North area to share information on the project, gather feedback from local governments on priorities and benefits, and provide elected officials and staff with tools to support EV adoption in their community.

- June 6, 2018, Bioenergy Conference in Prince George – EV session at the Community Energy Workshop for elected officials, researchers, First Nations staff and utilities representatives.
- August 23, 2018, EV Readiness Workshop in Smithers – Workshop for town staff, elected officials and external stakeholders, such as Northern Health and Tourism Smithers, to benchmark the community's efforts to support EV adoption to date and provide recommendations for future initiatives.
  - September 10, 2018, Northern BC EV Workshop at UBCM – Shoulder session workshop at the annual Union of BC Municipalities conference in Whistler for elected officials and staff to gather input on the Charge North network and better understand local opportunities for public education/engagement and car dealer outreach.
- March 15, 2019, EV Readiness Workshop for the Central Northern Chapter of the Planning Institute of BC - Provided information on the Charge North project and the development of a community wide low carbon transportation strategy that includes raising awareness about EVs and policy tools to support EV growth for the individual, community and the environment.

#### **Community Events**

- August 24, 2018, Smithers Ride & Drive - Co-hosted an event with the Town of Smithers and the Smithers Mining Exploration Group. The 4-hour event featured display boards and information on the Highway 16/97 study, EV 101 basics, and local EV drivers with their cars available for test drives. Attendees were interested and pleased to see that local governments are collaborating on a cross-regional network of charging stations. Approximately 50 people attended the event.
- October 13, 2018, Prince George EV Gathering – Co-hosted a Ride and Drive event with the Prince George EV Association at the popular Farmers’ Market. Public interaction with enthusiastic local EV drivers, City staff and Charge consultant increased project exposure.

## **Presentations**

- Tourism Associations – Charge North is working closely with the two main destination marketing organizations in the area, Northern BC Tourism and Film Office and the Cariboo, Chilcotin, Coast Tourism Association, to integrate EV tourism in their destination development strategies and future marketing campaigns. Project consultant presented on the project and the value of EV tourism at their annual conferences.
  - October 11-12, 2018, Northern BC Tourism Summit in Prince George
  - November 2-4, 2018, Cariboo Chilcotin Coast Tourism Association AGM & Tourism Summit in Williams Lake

## **Feedback Summary:**

Stakeholder feedback has been overwhelmingly positive. Local governments are embracing benefits of reduced greenhouse gas emissions as well as opportunities for local economic development from EV tourism and are keen to move forward on local station installation. Partnerships with regional tourism associations are strong and the Northern BC Film and Tourism Office has added a representative to the Charge North Advisory Committee. Public support for EV infrastructure is high although there is still work to be done to encourage local uptake in the northern communities. The message of local government collaboration with other agencies such as BC Hydro and MOTI have been well received. For the most part, stakeholders would like to see infrastructure deployment as a means of supporting low carbon transportation and are interested to learn more about EV’s, charging stations and approximately half the public consulted with would consider an EV for their next vehicle purchase if public stations were available locally.

## **70. Which groups will be consulted with prior to the project proceeding and/or in conjunction with the project? Describe your engagement strategy for consulting with these groups regarding the project. (No character limit)**

As per ongoing engagement noted above, Charge North will continue with extensive stakeholder, public and car dealer engagement as the project moves from planning to station deployment. Engagement and education are key tenants of the Charge North project and will continue beyond station planning and installation with community Ride and Drive events to promote the developing network and increase local EV uptake.

## **71. Has a need to consult Indigenous groups about this project been identified? (Yes/No) Yes**

**xx. If Yes, identify the Indigenous groups who will be consulted, including if you are an Indigenous group with an identified need to consult another Indigenous group. (No character limit)**

Since inception, Charge North has welcomed opportunities for outreach to the approximately 30 First Nations communities in the study area, leveraging support from regional agencies and organizations. At this time, we are working directly with the Nisga'a Nation as part of this application and both the Stellat'en First Nation on Highway 16, near the Village of Fraser Lake and the McLeod Lake Indian Band off Highway 97 North near Mackenzie for future station funding. Outreach with Charge North First Nations will continue as the project supports BC Hydro with future Level 3 station considerations along Highway 16 and 97.

**xxi. If Yes, provide timeline/plan for when and how consultation will begin. (No character limit)**

Ongoing consultation as Level 3 station planning evolves in the next 12 months and additional Level 2 station funding opportunities arise.

**xxii. If Yes, if consultation has begun, describe any initial feedback received on the project. (No character limit)**

Initial discussions with Nisga'a Nation, Stellat'en First Nation and McLeod Lake Indian Band were positive and joint efforts to move forward on Level 2 station installation collaboratively are underway.

**xxiii. If No, provide rationale for why consultation with Indigenous groups is deemed not necessary. (No character limit)**

**72. Is any part of the project located on federal lands? (Yes/No)** No

**73. Is the project subject to a federal environmental assessment? (Yes/No)** No

#### **Long-Term Management**

**74. Does your organization have experience with owning and managing similar infrastructure with a GHG reduction element? (Yes/No)** Yes

**xxiv. If Yes, briefly describe infrastructure and experience. (No character limit)**

A number of the Charge North communities have existing Level 3 and or Level 2 stations in place. The City's of Merritt and Kamloops have existing, municipal-owned, Level 3 stations. BC Hydro is planning installations in Prince George, Hixon, Quesnel, Williams Lake, 70 Mile House, Blue River, Valemount, McBride, Cache Creek and Clinton in the fall 2019. These Level 3 stations will contribute significantly to the Charge North network but will be owned and operated by BC Hydro, rather than local governments. Level 2 stations currently owned and operated by local governments include Smithers, Burns Lake, Houston, Kitimat and Merritt. A number of the smaller communities have identified issues with staff capacity to monitor and maintain existing EV stations and in responses, the project has included a 5-year operations and maintenance service as part of the Level 2 station budget to remove these barriers for smaller communities and ensure consistent and reliable public service.

**xxv. If No, briefly describe any other infrastructure management experience (without a GHG reduction element). (No character limit)**

## Federal Risk Checklist

75. The following risk elements\* are of interest to Infrastructure Canada.

\*Select “Yes” for risks that are applicable to your project, and provide a brief description of the risk and mitigation strategies undertaken or planned. Select “No” for risks that are not relevant to your project. For each item selected, provide a brief description of the risk and mitigation strategies undertaken or planned. *(Note: Describe risk and its probability (low/medium/high), impact, and mitigation response. Will risk be avoided, mitigated, transferred, or accepted? Describe following actions and what the residual risk will be.*

### A) Project Complexity

1. Remote geographic location (Yes/No) No. Charge North communities are rural but not remote.

2. Unpredictable weather (Yes/No) Yes – Central and northern BC communities certainly experience cold winter climates and extreme weather patterns. The risk is high but Charge North project staff has the benefit of successfully developing a rural EV network, Accelerate Kootenays, in a region with very similar winter and extreme weather patterns. The charging station equipment will be rated for temperatures to -40 degrees Celsius and local governments will assume responsibility for snow removal at station locations. A service contract will be in place with both the equipment and network providers to ensure that operational standards are met.

3. Untested or unproven technologies (Yes/No) No

4. Highly technical or complex project (Yes/No) No

5. Interdependencies between phases (Yes/No) No

6. Other (please describe) (Yes/No) No

### B) Project Readiness

8. Project site hasn't been finalized (Yes/No) No

9. Land hasn't been acquired (Yes/No) No

10. Potential issues with permits or authorizations (federal, provincial, territorial and municipal) (Yes/No) No

11. Industry supply may not be able to meet demand (Yes/No) No

12. Funding sources are not secured for the entire project cost (excluding potential ICIP grant not being secured) (Yes/No) No

13. Other (please describe) (Yes/No) No

### C) Public Sensitivity

15. The project has received positive media attention (Yes/No) Yes

16. Certain stakeholders have been vocal about the project (Yes/No) No

17. Other (please describe) (Yes/No) No

## Project Risks

**76. Identify broader project risks (excluding those already identified in the federal risk checklist) such as those related to project feasibility, scope, public support, social and environmental impacts, technology, and its long-term management. Please list all that are known, and include your evaluation and proposed mitigation for each risk. (Example: *Public opposition expected, technology becoming outdated, usage not as expected, difficulties finding appropriately trained people to manage/maintain*) (No character limit)**

The key project risks are:

- Delays by Government of Canada or Province of BC in approving and executing a contribution agreement, pushing the timeline of the project into future years. This has the potential to shift budgets into future years. Local governments are aware of this and will make allocate funds in a flexible manner
- Lower than expected usage or uptake of electric vehicles: the project may result in lower than anticipated uptake or usage. This could be caused by lower market demand, lack of awareness of EV's as an option, lack of availability of EV's or lack of a Level 3 network to enable long distance travel.
- Conservative assumptions have been used in estimating impacts. Similar methods were used to model impacts of Accelerate Kootenays and for the first three years of project operation, the estimates of induced EV uptake have been very accurate. The modeling approach has been proven in real-world experience in south-eastern BC.
- The local governments will continue to encourage BC Hydro and Ministry of Transportation and Infrastructure to prioritize the corridor for DCFC deployment. Indeed both entities have deployed Level 3 stations in the region and have shown indications that completing the network along Highway 16 (Valemount to Haida Gwaii) is being actively considered in the current NRCAN call.
- Local governments have already conducted outreach on electric vehicles and Charge North will continue to identify grant (Emotive) and other funding options to continue public and new car dealer outreach.
- The leading networked public Level 2 station vendors have extended warranty programs and options to include operation/repair. Level 2 stations require no annual maintenance and are relatively simple electrical devices. The intention is to contract for 5 years of warranty and operation/repair and to train local electricians on the technology as part of the deployment so that they are familiar with the technology and can service it in the future.

Technology, engineering, and installation risk is very low. We will be using proven technology and highly experienced designers / installers. The preferred project manager has extensive experience in deploying EV charging networks in other regions. All electric vehicles manufactured today can charge at Level 2 stations. We do not expect the technology to become outdated as all target market vehicles use it and Level 2 stations fulfill a different role than the Level 3 stations.

**77. Identify project risks as related to implementation and construction. Please list all that are known, and include your evaluation and proposed mitigation for each risk. (Example: seasonal limitations to construction, potential timing risks or delays, referendum required, unconfirmed grants (other than ICIP), siting not confirmed, environmental assessment/impacts, archaeological sites, cost overruns, etc.) (No character limit)**

To minimize costs, stations will be deployed during the construction season to avoid frozen ground and the need to protect the work site from snow. If there are extensive delays with Government of Canada approving and executing a contribution agreement, the project timeline could be pushed into the 2021 construction season.

## **Section 7: Management and Planning**

### **Asset Management for Sustainable Service Delivery**

*The Asset Management BC Framework provides context and can be found on Asset Management BC's website: [www.assetmanagementbc.ca](http://www.assetmanagementbc.ca). The Asset Management BC Roadmap (found in the "Resources" section of the website) provides a brief summary of the basic building blocks of asset management for sustainable service delivery.*

### **Local Governments**

Questions relate to sustainable management and planning of infrastructure. Additional resources on infrastructure asset management can be found on the Asset Management BC website:

[www.assetmanagementbc.ca](http://www.assetmanagementbc.ca)

For the infrastructure applied for in this application:

**78. How will the assets associated with the completed project be managed and maintained over their life? (4000 character limit)**

Each participating community will own and operate their specific Level 2 stations as outlined in an MOU agreement. They are extremely basic equipment and require minimal, if any maintenance. That said, Charge North has built a 5-year operations, maintenance and extended warranty program into the capital budget to reduce any barriers to small communities and increase confidence to communities new to EV infrastructure. Equipment selection through an RFP process will ensure high quality units, designed for the wear and tear of public use, network capabilities and an operational temperature threshold/warranty to -40°C. Level 2 stations have an average life expectancy of approximately 14 years, if used twice a day, according to equipment suppliers. Communities have been advised to budget approximately \$300 per year to support maintenance after year five.

**79. How will ongoing operating and maintenance costs be funded? (4000 character limit)**

Charge North has built a 5-year operations, maintenance and extended warranty program into the capital budget to reduce any barriers to small communities and increase confidence to communities new to EV infrastructure. Level 2 electric vehicle charging stations an average life expectancy of approximately 14 years, if used twice a day, according to equipment suppliers. Communities have been advised to budget approximately \$300 per year to support maintenance after year five and these costs will come from local governments operating budgets.

**80. How does the project design support reduced operation, maintenance and related costs\* over the lifecycle of the infrastructure? (4000 character limit)**

**\*Operating and maintenance costs can be reduced over the lifecycle of the infrastructure through appropriate design. (Example: use of quality materials that require less maintenance, potential for remote monitoring, etc.)**

Equipment selection through an RFP process will ensure high quality units, designed for the wear and tear of public use, network capabilities and an operational temperature threshold/warranty to -40°C. Network and maintenance service through an RFP process will 24/7 remote monitoring, service level agreements for repair and use of local contractors to ensure response times are minimal and equipment operation is a priority.

**81. Where the infrastructure will serve an ongoing need for the community, what activities will be carried out to ensure that the funds to replace the asset at the end of its life will be available? (Example: set aside funds annually to allow for renewal, replacement or rehab in 20 years. Funding through financial reserves, implementing a rate structure or user charges which include depreciation/replacement costs, etc.) (4000 character limit)**

As per the North Coast Regional District Tangible Capital Asset Policy, the NCRD uses a tangible capital asset working paper to review renewal dates of infrastructure assets on annual basis. Annual funding allocated toward maintenance in the department is used to offset renewal dates where warranted. The NCRD updates and maintains a registry of all NCRD-owned assets to keep information current, accurate and useful. The annual financial audit provides additional accuracy.

The renewal of assets is accounted and planned for in the NCRD annual financial planning process to ensure that service outcomes are met, risks are managed and costs are optimized. The decision process for creating short and long-term renewal programs is generally guided by a risk assessment of NCRD infrastructure and operating equipment. Coordination between the Treasurer and the Manager ensures that equipment nearing the end of its useful life is either replaced, maintained to extend the assets life, or transferred to another NCRD department where the useful life can be extended. This is determined by performing a cost-benefit analysis. Asset and operating equipment renewal forecasts are also used, annually, as part of the financial planning process, to gauge useful life of assets and operations, which are adjusted accordingly to meet useful life expectancy.

Replacement cost for the stations is significantly lower than the initial cost because electrical and civil works will remain in place and all that is required is procuring a new station and connecting it to the existing infrastructure. This cost is expected to be approximately \$6,000 per station and may be substantially less as technology continues to improve. Some stations may need replacement slightly earlier or later than others depending on local conditions and use. Participating local governments have funded their portion of the initial installation (\$5,000) through their current budgets. The scale of the capital investment for replacement is appropriate to fund as-needed through current budgets in the future. Participating local governments will also be encouraged to set aside \$428 per year to help fund the replacement of the infrastructure at its expected end of useful life in 14 years.

***Note: proponents are expected to manage the completed project in a financially sustainable manner, including planning for the eventual renewal of the infrastructure without grant support.***

**For all infrastructure that your organization manages:**

**82. How do you keep track of the infrastructure assets you manage, including their condition and performance? (Example: We have a database of all of our assets with information such as ID number, size, install date, expected life and condition. We track maintenance within this database and performance and use this to assist with replacement decisions. We complete a condition assessment of critical assets once a year and enter the results in the database.) (Unsure of character limit)**

The renewal of assets is accounted and planned for in the NCRD annual financial planning process to ensure that service outcomes are met, risks are managed and costs are optimized. The decision process for creating short and long-term renewal programs is generally guided by a risk assessment of NCRD infrastructure and operating equipment. Coordination between the Treasurer and the Manager ensures that equipment nearing the end of its useful life is either replaced, maintained to extend the assets life, or transferred to another NCRD department where the useful life can be extended. This is determined by performing a cost- benefit analysis. Asset and operating equipment renewal forecasts are also used, annually, as part of the financial planning process, to gauge useful life of assets and operations, which are adjusted accordingly to meet useful life expectancy.

Other participating local governments and First Nations have asset management practices and processes appropriate to their size and operations.

**83. What do you do to ensure that the service provided by infrastructure remains cost effective/cost efficient? (Unsure of character limit)**

The NCRD tracks its assets through the use of an asset management database to identify owned assets, size, install date, expected life and condition, as well as an associated maintenance schedule to identify asset maintenance needs. These tools assist the NCRD with replacement decisions for catalogued assets. Condition assessments are evaluated on an ongoing basis. The condition of assets is monitored on an ongoing basis as is maintenance costs.

As per the North Coast Regional District Tangible Capital Asset Policy, the NCRD uses a tangible capital asset working paper to review renewal dates of infrastructure asses on annual basis. Annual funding allocated toward maintenance in the department is used to offset renewal dates where warranted. The NCRD updates and maintains a registry of all NCRD-owned assets to keep information current, accurate and useful. The annual financial audit provides additional accuracy.

Decisions about maintenance programs and asset renewal are informed by asset condition / performance and ongoing costs. Other participating local governments and First Nations have asset management processes appropriate for their size and operations.

**84. Describe long-term planning activities that are currently used to manage infrastructure. (Example: This might include schedules or timelines that identify when items need to be replaced, maintenance plans/strategies, risk management plans, condition assessment plans that set out when inspections will occur, long-term financial plans.) (Unsure of character limit)**

The majority of Charge North local governments and First Nations are guided by Board or Council approved Asset Management Policies which are appropriate to their size and operations.

**85. What are your ongoing revenue sources and what planning is carried out to ensure that costs to maintain, operate, and replace infrastructure assets can be met over the long-term? (Example: We have a plan that outlines the anticipated costs of operations, maintenance and renewals over the next 10 years, and a long-term financial plan that identifies secured and anticipated sources of funding over the next 10 years to levels that will enable these costs to be funded.) (Unsure of character limit)**

Charge North stations will be covered by a 5-year operations, maintenance and extended warranty plan. Participating communities have been advised to budget approximately \$300.00 per station, per year for operations and maintenance after five years as well as \$150.00 per year to cover network fees directly after five years. We do not expect material revenue from this infrastructure. Participating local governments will also be encouraged to set aside \$428 per year to help fund the replacement of the infrastructure at its expected end of useful life in 14 years.

## **Climate Change**

**101. How does the project design incorporate climate change considerations to adapt infrastructure to climate change occurring over its life? (Example: changing weather patterns, changing water availability, increased risk of hazard events such as wildfire and flood, etc.) (4000 character limit)**

Equipment selection through an RFP process will ensure high quality units, rated for an operational temperature threshold/warranty to -40. The network and maintenance service through an RFP process will provide 24/7 remote monitoring and responsive station repair. Station siting will involve community representatives to provide local knowledge of site-specific hazards along with contractors to provide best practice guidelines and expertise.

**102. How does the project use available forecast data to determine design of project, preparedness for future weather patterns (temperature, precipitation)? (No character limit)**

Station siting will involve community representatives to provide local knowledge of site-specific hazards along with contractors to provide best practice guidelines and expertise. The participating local governments understand current seasonal weather patterns and decadal oscillations and the impact locally. In addition, local governments in some parts of the region have experienced the effects of climate change through pine beetle and recent forest fire seasons, which may have been made more severe by climate change. Downscaled global models are available through Pacific Climate Impacts Consortium (PCIC). The equipment selected will be warranted to perform between -40 and +40 celsius which, over the 14 year lifespan of these assets is a reasonable temperature range to assume for this region, while also recognizing the significant variability in the region from the north coast to the southern interior including rainforests, plateaus, deserts and various other ecosystems and climates.

## Outcome Specific Questions

**Outcome 2: The project will increase access to clean energy transportation**  
(Skipped Outcome specific questions for Outcomes 1, 3, and 4)

### **Outcome 2: The project will increase access to clean energy transportation**

Projects eligible under the CleanBC Communities Fund must be public infrastructure (capital assets) owned by a Local Government, Indigenous Communities, a Not-For-Profit entity or For-Profit entity. The desired outcome is to increase access to clean energy transportation. For example, charging infrastructure that is owned by a public body and is for public use.

### **Program Targets & Benefits**

1. Does the project lead to an increase or reduction in greenhouse gas (GHG) emissions that can be credibly measured? (Yes/No). **Yes**

[See website for Resources on methodology to complete questions below]

i. If No, Message – “Projects must result in a measurable increase or decrease in greenhouse gas emissions, and those projects that cannot quantify emissions will not be considered for funding. Please contact Program Staff if you have further questions.”

\* Note that a full GHG assessment conducted or validated by a qualified assessor will be required following Provincial approval in principle and prior to federal approval. See the Program Guide for further details.

- a) If Yes, Upload Box: upload the GHG mitigation assessment document for the project. Please use the methodology available on the program website. (Attach GHG mitigation assessment document here.)

**b) If Yes, please fill out this chart:**

GHG Mitigation Assessment					
Expected lifespan of the asset: 14 years			Indicate the year in which the expected lifespan of the asset begins: 2021		
2030 GHG Results			Lifetime GHG Results		
Baseline scenario emissions, cumulative to 2030	9,762,503 tCO <sub>2</sub> e		Baseline scenario emissions, lifetime	13,509,001 tCO <sub>2</sub> e	
Estimated project emissions, cumulative to 2030	9,651,756 tCO <sub>2</sub> e		Estimated project emissions, lifetime	13,080,200 tCO <sub>2</sub> e	
Net emissions	REDUCTION or INCREASE	110,747 tCO <sub>2</sub> e REDUCTION	Net emissions	REDUCTION or INCREASE	428,801 tCO <sub>2</sub> e REDUCTION

\*The timescale of the assessment should match the intended lifespan of the asset. If the project involves multiple assets, please indicate the total lifespan for all assets assessed.

**2. How will the project increase access to clean energy transportation? (No character limit)**

The Charge North Network project is working toward the installation of approximately 30 Level 3 stations and 100 Level 2 stations over six regional districts in central and northern BC. Both types of stations are required to facilitate reliable and safe EV travel across the regions and support local economic development in communities along the way. In the Charge North region, there are 15 public Level 2 stations in 10 communities, coupled with nine Level 3 stations (excluding Tesla SuperChargers) and an additional 10 stations in the planning phase. Travel between communities is limited, given the many gaps in connectivity. There are many communities and 100's of kms of highway without an option for public charging.

Charge North is in discussions with BC Hydro and MOTI as they deploy the 10 new Level 3 stations along Highways 97 South and 5 and plan for future Level 3 station sites along Highways 16 and 97 North. The first wave of Charge North Level 2 stations will complement these Level 3 commitments and provide support a diverse range of uses and vehicles (BEV and PHEV, 100 km range and 400 km range), promote tourism, and to help future EV owners see that there are a variety of charging options. Level 2 stations can provide a charge top-up to locals commuting between communities, support EV tourists spending a few days in a community and provide some redundancy to Level 3 stations when they are in use or down for repair. The development of the Charge North EV network and Level 2 stations deployed by local governments will let the 420,000 area residents know that there multiple charging options so that they can feel more comfortable making the transition to electric vehicles and let EV tourists know they can plan a trip to these northern destinations.

3. What type of recharging or refueling station(s) will be constructed by the project? Indicate the number of stations that will be constructed in the table below: **(No character limit)**

Please fill in table below (see reference notes below table):

Recharging and refueling station type and quantity	Quantity
Alternative fuel*	
Electric	
L2**	57 stations

**Note:**

**\*Alternative fuel types:**

- ☐ Biodiesel/Hydration-derived Renewable Diesel (HDRD)
- ☐ Bioalcohol (methanol, ethanol, butanol), renewable natural gas (refuse-derived fuel, biomass), chemically stored electricity (batteries and fuel cells), hydrogen and vegetable oil.

**\*\*Recharging and refueling station type:**

- ☐ Level 2 (L2) is the most common level of charging and can be installed in homes and businesses (one hour of charge provides approximately 30km of range).

4. If the project supports the use of an alternative fuel, what type of fuel is supported? **(No character limit)** N/A

5. Does the project lead to an increased access to either public level 2 charging infrastructure or hydrogen fuelling infrastructure? (Yes/No) Yes

**6. How does this project support the market transformation to Zero Emissions Vehicles (ZEVs) in BC?**

Local government support for EVSE implementation can play a very strong role in transforming the passenger vehicle market from fossil-fuel-powered vehicles to low-and zero emissions electric vehicles. In terms of reducing community GHG emissions, local and regional EVSE programs and policies could have big impacts. Charge North has prioritized an integrated approach to increasing EV adoption with a focus on providing infrastructure (both Level 2 and Level 3 stations), increasing public awareness and supported car dealer outreach. Barriers to EV adoption are well- documented and lack of charging stations, combined with “range anxiety” top the list. A recent market review and analysis for BC’s Emotive program, for both urban and rural communities, confirms these barriers and emphasizes the importance of providing a network charging stations to ensure safe and reliable travel and to support the transformation to ZEVs, especially in BC’s rural communities.

**Describe how the project supports local or Indigenous government adoption of Zero Emissions Vehicles (ZEVs). (No character limit)**

A number of Charge North local governments have indicated that their leadership on public charging stations is a first step toward future EV fleet considerations as well. Smithers, Port Clements, 100 Mile House, Quesnel and the Nisga’a Lisims Government have inquired about future fleet assessments and EV incentives. There is also an opportunity for First Nations housing associations or community coops to

consider the purchase of an EV as a community car-share. If the capital cost of the car purchase can be funded, the cost of operating and maintaining an EV are significantly reduced, offering an affordable transportation option once the EV infrastructure is in place in communities.

**ii. How was the appropriate location for the placement of this infrastructure determined? (No character limit)**

Based on two previous rural EV network projects, Accelerate Kootenays and Southern Alberta EV Collaboration Network, Charge North used a robust modelling tool, BCIT's EV Planning Infrastructure Assistant tool, to map out the network of Level 2 and Level 3 charging stations required for safe and reliable travel on the major routes in the study area. This same model has recently been used by the Province of BC to conduct a gap analysis for the Highway 16/97 study area. Additional details of the modelling inputs can be found in the Charge North Feasibility Study (page 7) uploaded with this application.

The preliminary identification of Level 2 station sites has been led by each community and is based on local priorities and interests. Charge North supported site selection with guiding principles such as close to amenities, support local economic development opportunities, highlight community features, have appropriate electrical capacity, easily accessible and on local government owned land. A Level 2 Siting Webinar open to locally elected officials and staff from all Charge North communities was offered to support site selection. In-person site assessment and detailed site plans will confirm specific locations once funding has been secured.

**iii. Does this project incorporate energy storage or load management technology? (Yes/No) No**

**c) If Yes, please identify the technology and how it is incorporated in your project. (No character limit)**

**iv. Does this project support other clean energy transportation infrastructure (other than recharging and refueling stations)? (Yes/No) No**

**a) If Yes, describe how the other clean energy infrastructure supports increased access to clean energy transportation.**

**vi. What is the expected level of use that the new infrastructure will support? (Example: estimated number of vehicles expected to use the infrastructure daily, number of local government alternative fuel vehicles purchased as a result of the infrastructure, etc.) (No character limit)**

This application is limited to the Level 2 station network but the deployment of Level 2 stations will be undertaken simultaneously with ongoing public education and engagement, car dealer outreach and support to other agencies planning for Level 3 stations in the Charge North area.

We know BC has latent demand for electric vehicles: more than 30% of Canadian households have an interest in purchasing an EV as their next vehicle and local government support for EV station implementation could therefore play a very strong role in transforming the passenger vehicle market from fossil-fuel-powered vehicles to low-and zero emissions electric vehicles.

According to research conducted at SFU, the demand side is where local governments come in, as increased charge access is critical to increase market share beyond 4-5% by 2030. This is also significant to support the Province of BC's ZEV mandate.

Confidential information from a major public networked level 2 charging station vendor shows that the average kWh energy dispensed per station per year is 2,778 for their BC-based level 2 stations. Multiplying this by 57 stations over 14 years expected lifespan yields 1,944,600 kWh of clean energy displacing gasoline over the project lifespan. This is an estimate of the 'direct' emissions reductions.

The project will also result in 'induced' emissions reductions because the Level 2 stations contribute to overcoming 'range anxiety' and provide an ongoing reminder to residents that it is possible to charge an EV, leading to greater EV adoption. There are approximately 20 EV's in the project area currently with significant demand waiting for a network to be put in place and outreach to occur. In the 3 years of Accelerate Kootenays, approximately 17 new EV's were purchased in the region because of the network and outreach. We expect a similar trajectory in Charge North given the similar starting point.

Further detail is provided in the CLIMATE LENS assessment, which models adoption rates, energy use and GHG impacts.

**vii. Will the project affect the cost of powering clean energy transportation within the community?**  
**Yes/No**

**e) If Yes, Describe how costs will be increased or decreased (\$/km/vehicle occupant). (No character limit)**

The project will enable residents and tourists to charge their electric vehicles in the participating communities. Our estimates indicate that moving to an EV from a gasoline vehicle in BC can result in a 90% fuel cost saving due to the higher efficiency of electric drive and lower cost of electricity compared to gasoline. Currently there are few charging options in the region, requiring significant investments in planning and waiting for EV drivers. This network will significantly reduce the cost of time spent planning EV trips. We estimate approximately 64% savings vs. gasoline-based vehicles based on Charge North impact modelling, resulting in \$9.42/100 km savings (based on one occupant, \$1.20/L gasoline, 19,000 km VKT/yr, 2,338 L/yr gas consumption, 9,092 kWh electricity consumption/vehicle).

## **Managing Demand**

**7. Does the community have an energy demand side management\* plan? (Yes/No) Yes**

**viii. If Yes, Identify and explain how this project fits into the plan. Where applicable, copy and paste only relevant sections from existing plans into a single document and attach here. (No character limit)**

Twenty-one of the 37 Charge North communities in the six regional districts have completed, or in-progress, community energy and emissions plans (CEEPs), including Smithers, Burns Lake, Granisle, Houston, Kamloops, Logan Lake, Barrier, Clearwater, Kitimat, Mackenzie, McBride, New Hazelton, Prince George, Prince Rupert, Quesnel, Terrace, Valemount, Vanderhoof, Wells, Williams Lake and 100 Mile House. All these plans include reducing transportation emissions and increasing local economic development. Rural communities have limited options to reduce transportation emissions given the low density of communities, the relatively low population growth rates, the weather, and distances between communities. Addressing the fuel, in this case electrification is an approach that can yield significant

long-term energy and emissions reductions while promoting local economic development through EV tourism.

Eleven of the 19 more recent CEEPs specifically include the acceleration of electric vehicle (EV) adoption and tourism to achieve these goals. Adapting electric vehicles in rural areas is one of few ways small communities can significantly reduce transportation emissions. In the Charge North project area, transportation accounts for 64% of community-wide emissions and energy spending, a collective cost of over \$1 billion annually. Electrifying municipal fleets, installing public EV charging stations, supporting affordable transportation and reducing emissions are the key directives noted in these plans for the Village of Queen Charlotte, Masset, Prince Rupert, Terrace, Kitimat, Smithers, Houston, New Hazelton, Prince George, Williams Lake and Logan Lake. Excerpts from the 11 CEEPs noting EV adoption are summarized in the supporting document “Charge North CEEP Summary”.

**ix. If Yes, have you implemented demand side management initiatives identified in the plan? (Yes/No) (No character limit) Yes**

**8. Do you use an energy management system\*\*to improve energy management? (Yes/No) not applicable to this project**

**9. Have you implemented initiatives in your Community Energy Emissions Plan, Community Energy Plan or Climate Action Plan\*\*\*? (Yes/No) Yes**

**x. If Yes, indicate which type of plan the community has. (No character limit)**

Twenty-one of the 37 Charge North communities in the six regional districts have completed, or in-progress, community energy and emissions plans (CEEPs), including Smithers, Burns Lake, Granisle, Houston, Kamloops, Logan Lake, Barrier, Clearwater, Kitimat, Mackenzie, McBride, New Hazelton, Prince George, Prince Rupert, Quesnel, Terrace, Valemount, Vanderhoof, Wells, Williams Lake and 100 Mile House.

**xi. If Yes, explain how this project fits into the plan. Where applicable attach and identify relevant sections as supporting documentation. Reference any attached sections here. (No character limit)**

Eleven of the 19 more recent CEEPs specifically include the acceleration of electric vehicle (EV) adoption and tourism to achieve these goals. Adapting electric vehicles in rural areas is one of few ways small communities can significantly reduce transportation emissions. In the Charge North project area, transportation accounts for 64% of community-wide emissions and energy spending, a collective cost of over \$1 billion annually. Electrifying municipal fleets, installing public EV charging stations, supporting affordable transportation and reducing emissions are the key directives noted in these plans for the Village of Queen Charlotte, Masset, Prince Rupert, Terrace, Kitimat, Smithers, Houston, New Hazelton, Prince George, Williams Lake and Logan Lake. Excerpts from the 11 CEEPs noting EV adoption are summarized in the supporting document “Charge North CEEP Summary”.

xii. If No, describe your intent for future implementation of your Plans.

**\*Demand side management is both energy conservation (behavioural) and energy efficiency (technology) measures. For the purpose of this question, demand side management initiatives could be included and are defined as reducing citizens' demand for electricity by providing incentives, education, etc.**

**\*\* An energy management system is a series of processes that enables people of varied responsibilities across an organization to use data and information to maintain and improve energy performance, while improving operational efficiencies, decreasing energy intensity, and reducing environmental impacts.**

**\*\*\* Please see <http://www.bchydro.com/powersmart/business/programs/sustainable-communities/ceep.html> for an example of a Community Energy and Emissions Plan.**

**(No character limit)**

**10. How are you measuring your community's energy emissions? (No character limit)**

Charge North communities are small and have limited resources. They would like to measure community emissions more often but do not have the resources and are dependent on the provincial CEEI (Community Energy and Emissions Inventory). However, this inventory has not been updated regularly or completely. Participating local governments need annual transportation emissions data included in the CEEI to effectively plan and manage community energy and emissions reduction activities. Seven Charge North communities are members of the FCM-ICLEI Partners for Climate Protection Program and have completed a community and/or corporate inventories in recent years. CEA has developed a modeling tool that uses CEEI data to profile current and future energy and emissions. The supporting document "Charge North Regional District Energy Profiles" outlines an energy and emissions profile for each of the six participating regional districts and provide a summary total energy costs in the Charge North study area.

## **Innovation**

**11. Will the project incorporate innovative or emerging technologies/methods? (Yes/No) Yes**

xiii. If Yes, describe the innovative technology/methods, equipment or products that will be used in the project. **((No character limit)** Level 2 EV charging stations rated for -40°C temperatures.

xiv. If Yes, has the technology that will be used in the project been proven to work through tests to work in its final form and under expected operating conditions (considered to be at Technology Readiness Level 8)? For further information, see the Program Guide. **(No character limit)** Yes. A Level 2 EV charging station would be considered at Technology Readiness Level 9 where technology is refined and adopted as we have seen in the recent Level 2 deployment in the Accelerate Kootenays rural EV Network as well as individual communities across BC.

xv. If No, please explain why you are not adopting a technology at Technology Readiness Level 8, and what other Technology Readiness Level best describes the project. **(No character limit)**

xvi. If Yes, describe any risk(s) specific to the use of new or innovative technologies and explain how they will be mitigated. **(No character limit)**

Risks are minimal due to proven use of technology in similar environments, including specific landscape and weather factors.

xvii. Is the project replicable or transferrable to other jurisdictions/entities in BC? (Yes/No) Yes

xviii. If Yes, is this technology BC-based (manufactured in BC and installed by BC-based company)? (Yes/No) No

f) If Yes, identify how the technology will be created or manufactured within BC and how the project will result in an increase in local capacity in technology. **((No character limit))**

#### Environmental Benefits

12. Does the project increase the use of low carbon energy in BC's transportation sector? (Yes/No) Yes

13. Describe how any of the following are applied during the construction, design or operation of the project:

☒ **A reduction in the use of natural resources** – The transition from traditional mobility fuels to electric powered vehicles represents a significant step toward the use of renewable energy in BC.

☒ **A reduction of impacts upon or protection, enhancement or restoration of the natural environment or wildlife habitat** - No

☒ **Recovery or the reuse of resources** - No

☒ **A reduction in the greenhouse gas emissions during construction** - No

☒ **The use of natural assets to deliver a service normally provided by built infrastructure.** No

*(Examples: reduction in water needed in operation of infrastructure, use of non-potable water source for operational water needs, choice of site that reduces ecological impacts, inclusion of fish ladder at microhydro site to support fish migration, building envelope constructed of re-used shipping containers.)*

21 March 2019

Barry Pages, Chair  
North Coast Regional District  
[ma-director@ncrdbc.com](mailto:ma-director@ncrdbc.com)

**RE: Regional EV Charging Collaboration– Memorandum of Understanding**

Dear Chair Pages,

This Memorandum of Understanding is to clarify the roles and responsibilities between the Community Energy Association and the North Coast Regional District (Regional District). The Regional District has agreed to act as the Lead Applicant on behalf of participating communities for a CleanBC Communities Fund grant application for 'Level 2' electric vehicle charging stations.

**Regional District Role**

The Regional District will submit the grant application drafted by CEA and, if successful, will enter into a contribution agreement with the funding agency. The Regional District will submit financial and narrative reporting as drafted by CEA and flow funds received to CEA for distribution to participating local governments. The Regional District may, at its sole discretion choose to manage the reporting and flowing of funds to certain local governments agreed to in advance in writing by the Regional District and CEA.

**Scope of Services**

CEA will provide project management and administration services as outlined in the attached 'financial model' graphic and the attached CEA-Participant MOU.

CEA's fees for these services will be \$99,999.00. These fees will be retained by CEA from the funds transferred to CEA by the Regional District as part of the grant administration.

This MOU will come into effect the Regional District executes a contribution agreement with the funding agency.

We look forward to working with the partners on this exciting initiative. Please do not hesitate to contact me if you have any questions or concerns. I can be reached at 604-628-7076 or [dlittlejohn@communityenergy.bc.ca](mailto:dlittlejohn@communityenergy.bc.ca).

If this engagement letter meets your requirements, please print and sign two copies, returning one to me.

Yours sincerely,



Dale Littlejohn Executive Director,  
Community Energy Association

On Behalf of North Coast Regional District,

Name: \_\_\_\_\_

Title: \_\_\_\_\_

Signature: \_\_\_\_\_

Date: \_\_\_\_\_

**Appendix A: GENERAL BUSINESS TERMS**

1. **Services.** Community Energy Association will provide Regional District with the services described in the engagement letter, proposal and/or statement of work to which these terms are attached.
2. **Payment of Invoices.** Community Energy Association's invoices are due upon presentation. Interest shall be calculated at a simple daily rate of 0.0493% (equivalent to 18% per annum). Interest shall be charged and payable at this rate on any part of an account which remains unpaid from thirty (30) days after the invoice date to the date on which the entire account is paid. Without limiting its rights or remedies, Community Energy Association shall have the right to suspend or terminate, in whole or in part, its services if payment is not received within thirty (30) days of the invoice date.
3. **Term.** Unless terminated sooner in accordance with its terms, this agreement shall terminate on the completion of Community Energy Association's services hereunder. This agreement may be terminated by either party at any time with or without cause by giving written notice to the other party not less than thirty (30) days before the effective date of termination, provided that in the event of a termination for cause, the breaching party shall have the right to cure the breach within the notice period.
4. **Confidentiality.**
  - a. To the extent that, in connection with this engagement, each party comes into possession of any proprietary or confidential information of the other party ("Confidential Information"), each party agrees to use the Confidential Information of the other party solely for the purposes of this engagement, and will not disclose such Confidential Information to any third party without the other party's consent. The terms of this engagement shall also be considered Confidential Information. Each party shall maintain the Confidential Information of the other party in confidence using at least the same degree of care as it employs in maintaining in confidence its own proprietary and confidential information, but in no event less than a reasonable degree of care.
  - b. Confidential Information shall not include information which (i) shall have otherwise become publicly available other than as a result of disclosure by the receiving party in breach hereof, (ii) was disclosed to the receiving party on a nonconfidential basis from a source other than the disclosing party, which the receiving party believes is not prohibited from disclosing such information as a result of an obligation in favour of the disclosing party, (iii) is developed by the receiving party independently of, or was known by the receiving party prior to, any disclosure of such information made by the disclosing party, or (iv) is disclosed with the written consent of the disclosing party. A receiving party also may disclose Confidential Information to the extent required by an order of a court of competent jurisdiction, administrative agency or governmental body, or by any law, rule or regulation, or by subpoena, summons or other administrative or legal process, or by applicable regulatory or professional standards, or in connection with any judicial or other proceeding involving Community Energy Association and Regional District relating to Community Energy Association's services for Regional District or this Agreement.
  - c. Community Energy Association may provide its contracted affiliates or subcontractors hereunder with access to Confidential Information of Regional District, provided that each such contracted affiliate and subcontractor has agreed to be bound by similar confidentiality and nondisclosure obligations.
5. **Limitation on Warranties.** This is a services engagement. Community Energy Association warrants that it will perform the services hereunder in a manner that is consistent with industry practice. Community Energy Association disclaims all other warranties, either express or implied, including, without limitation, warranties of merchantability and/or fitness of the services or the Deliverables for a particular purpose. Regional District's exclusive remedy for any breach of this warranty shall be for Community Energy Association, upon receipt of written notice, to use reasonable efforts to cure such breach, or, failing any such cure in a reasonable period of time, to return the professional fees paid to Community Energy Association hereunder with respect to the services giving rise to such breach.
6. **Limitation on Damages and Actions.**
  - a. Each party agrees that the other party, its contracted affiliates, affiliates, agents and subcontractors, and each of their officers, directors, partners, principals or other personnel shall not be liable for any actions, damages, claims, liabilities, costs, expenses, or losses in any way arising out of or relating to the services performed hereunder for an aggregate amount in excess of (i) in the case of Community Energy Association, the fees paid by Regional District to Community Energy Association under this engagement, or (ii) in the case of Regional District, the fees paid and payable to Community Energy Association by Regional District under this engagement. In no event shall either party, its contracted affiliates, affiliates, agents or subcontractors or any of their officers, directors, partners, principals or other personnel be liable for consequential, special, indirect, incidental, punitive or exemplary damages,

costs, expenses, or losses (including, without limitation, lost profits and opportunity costs) nor shall they be liable for any claim or demand against the other party by any third party. The provisions of this Paragraph shall apply regardless of the form of action, damage, claim, liability, cost, expense, or loss, whether in contract, statute, tort (including, without limitation, negligence), or otherwise. Neither party shall apply for, nor otherwise request, any award of punitive or exemplary damages against the other party.

b. No action, regardless of form, arising under or relating to this engagement, may be brought by either party more than one year after the cause of action has accrued, except that an action for non-payment of any invoice may be brought by a party not later than one year following the date of the last payment due to such party on any invoice hereunder.

## 7. Other Terms.

a. Force Majeure. Except for the payment of money, neither party shall be liable for any delays or other non-performance resulting from circumstances or causes beyond its reasonable control, including, without limitation, acts or omissions or the failure to cooperate of the other party (including, without limitation, entities or individuals under its control, or their respective officers, directors, employees or other personnel and agents), acts or omissions or the failure to cooperate by any third party (other than Community Energy Association contracted affiliates and subcontractors), fire or other casualty, act of God, strike or labour dispute, war or other violence, or any law, order or requirement of any governmental agency or authority.

b. Independent Contractor. Each party is an independent contractor, and neither party is, nor shall represent itself to be, an agent, partner, fiduciary, joint venturer, co-owner or representative of the other.

c. Survival. All sections herein relating to payment, licence and ownership, confidentiality, warranties, limitations of warranties, limitations on damages and actions, non-exclusivity, non-solicitation, survival and waiver shall survive the termination of this agreement.

d. Notices. All notices hereunder shall be (i) in writing, (ii) delivered to the representatives of the parties at the addresses set forth in the engagement letter, proposal and/or statement of work to which these terms are attached (unless changed by either party upon notice to the other party), and (iii) effective upon receipt.

e. Assignment. Except as provided below, neither party may assign, transfer or delegate any of the rights or obligations hereunder (including, without limitation, interests or claims relating to this engagement) without the prior written consent of the other party. Either party may assign this agreement, without the consent of the other party, to an entity that has acquired all or substantially all of the assigning party's assets as a successor to the business. In discharging its obligations hereunder, Community Energy Association may contract with one or more of its affiliates to directly provide the services or a part thereof to Regional District exclusively for and on behalf of Community Energy Association. All services performed by such contracted affiliates shall be performed under the exclusive direction and control of Community Energy Association., which shall remain solely liable for the obligations hereunder.

f. Waiver. The failure of either party to insist upon strict performance of any of the provisions contained in this agreement or to exercise any of its rights, powers or remedies hereunder, or its delay to do so, shall not constitute a waiver of its rights as set forth in this agreement, at law or in equity, or a waiver of any other provisions or subsequent default by the other party of any of the terms or conditions in this agreement.

g. Entire Agreement. These terms, the engagement letter, proposal and/or statement of work to which these terms are attached, including any Exhibits, constitute the entire agreement between Community Energy Association and Regional District with respect to this engagement and supersede all other oral and written representations, understandings or agreements relating to this engagement, and may not be amended except by a written agreement signed by the parties.

h. Governing Law. This agreement and all matters relating to this engagement (whether in contract, statute, tort (including, without limitation, negligence) or otherwise), shall be governed by, and construed in accordance with, the laws of the Province of Alberta (without giving effect to the choice of law principles thereof).

i. Severability. If any provision of this agreement is found by a court of competent jurisdiction to be invalid or unenforceable in whole or in part, such invalidity or unenforceability shall not affect the other provisions, but such invalid or unenforceable provision shall be deemed modified to the extent necessary to render it enforceable, preserving to the fullest extent permissible the intent of the parties set forth in this agreement.

**2019**  
**Memorandum of Understanding Between CEA and Municipality of XXXX**  
**Regarding Level 2 EV Network project**

**DEFINITIONS:**

1. This document outlines the agreement between:
  - 1.1. the Community Energy Association, referred to as CEA
  - 1.2. Municipality of XXXX, herein referred to as the Participant.
2. Lead Applicant” is the local government which is submitting the grant application on behalf of all participating local governments and is the entity which will enter into a funding agreement with the granting agency. Lead Applicant for this application is North Coast Regional District.

**SUBJECT OF AGREEMENT**

3. This MOU covers:
  - 3.1. The collaborative Level 2 electric vehicle charging infrastructure project (herein referred to as the “project”).
  - 3.2. The project includes a regional public ‘Level 2’ electric Vehicle (EV) charging network owned by participating local governments, primarily at their own sites.
  - 3.3. The project will coordinate with tourism branding initiatives.

**COMMON INTERESTS**

4. CEA and the participant recognize the following common interests as expressed in letters of support from local governments across the region:
  - 4.1. Enabling EV tourism in the region and associated economic development.
  - 4.2. Enabling EV adoption locally, reducing transportation emissions in alignment with community energy and emissions plans, official community plan greenhouse gas reduction targets and climate action revenue incentive program reporting.
5. The project builds on:
  - 5.1. Signing of the Climate Action Charter (circa 2008) by all participating local governments.
  - 5.2. Adoption of greenhouse gas reduction targets in official community plans in all local governments as required by provincial legislation (2008).
  - 5.3. Community Energy and Emissions Plans / Strategic Community Energy and Emissions Plans adopted by most local governments including specific reference to transportation emissions. Transportation emissions represent over 50% of community-based emissions.
  - 5.4. Installation of a small number of ‘Level 2’ stations across the region by public and private owners as well as ‘Direct Current Fast Charge – DCFC’ equipment by BC Hydro.

**PROJECT GOVERNANCE**

6. CEA provides day to day project management and financial management of the project.
7. CEA is directed by the project Advisory Committee composed of staff representatives from participating local governments who wish to contribute to the governance of the project.
8. The Lead Applicant will submit the grant application on behalf of participating local governments and First Nations with support from CEA. The Lead Applicant will enter into a funding agreement for the full project and will receive the granted funds upon providing the required reporting, supported by CEA.
9. CEA will draft and provide all financial and narrative reporting required for the project.
10. CEA will receive funds from the Lead Applicant and distribute the funds accordingly to the participant local governments and First Nations.

## ROLE OF CEA

11. Financial
  - 11.1. CEA will manage financial reporting in collaboration with the 'Lead Applicant'.
  - 11.2. CEA accepted the request by the Lead Applicant to provide the financial management of the project including providing financial and narrative reporting to funders, collecting required proof of expenditures and reimbursing charging station owners.
  - 11.3. To reimburse a local government or First Nation for a 'Level 2' station, CEA will require that the participant invoice CEA for the costs of the station (less the local government in-kind contribution) and attach relevant invoices from the station provider and the electrical installer. Note that reimbursement timeline is dependant on all participating local governments and First Nations providing appropriate documentation, approval by the granting agency, transfer of funds from the granting agency to the lead applicant to CEA then to the participating local governments. This process may take two to six months.
12. Contracting
  - 12.1. CEA will develop a Request for Proposal (RFP) for networked 'Level 2' electric vehicle charging equipment, installation and, if required, 5 years of maintenance. The Advisory Committee will approve the RFP before release.
  - 12.2. CEA will issue the RFP, receive and evaluate responses and organize an Advisory Committee review.
  - 12.3. CEA will negotiate favourable financial and contract terms resulting in contract templates for the participant to execute with the vendor(s).
  - 12.4. CEA will guide the participant through the execution of the contracts.
13. Siting, installing, support
  - 13.1. CEA will advice on site positioning finalization.
  - 13.2. CEA will coordinate timing of installations to minimize costs.
  - 13.3. CEA will provide a short 'Intro to EV charging management' to the participant.
  - 13.4. CEA will draft operations and maintenance plan for the participant.
14. Reporting
  - 14.1. CEA will manage all project reporting and will provide the participant with clear direction on both format and content for invoices and other reporting.

## ROLE OF THE PARTICIPANT

15. Participants remain fully responsible for any contracts that they execute and are advised to seek appropriate legal advice as they see fit.
16. Participants will enter into contracts to purchase 'Level 2' EV charging equipment and installation services at favourable rates with contract templates negotiated by CEA.
17. Participants will submit invoices to CEA for reimbursement of equipment and installation costs up to 73% or the maximum level noted in the grant application, whichever is less.
18. At each site where the Participant will install a 'Level 2' station or stations, the Municipality or First Nation will:
  - 18.1. Support the installation
    - 18.1.1. Make appropriate staff available to assist with site evaluation including access to electrical rooms where required.
    - 18.1.2. Collaborate with CEA to determine a preferred placement on the site
    - 18.1.3. Coordinate with CEA on timing and sequencing of the installation
    - 18.1.4. Provide in-kind staff time to support the installation
    - 18.1.5. Participate in station commissioning
    - 18.1.6. Identify any concerns, issues, or impediments to CEA as soon as they are known
    - 18.1.7. Ensure station signage and branding package is implemented
  - 18.2. Support ongoing station availability
    - 18.2.1. Pay for any electricity used by the station
    - 18.2.2. Visually inspect station regularly to ensure it is functional
    - 18.2.3. Maintain signage, branding, pavement and pavement painting designating a parking space exclusively for EV charging
    - 18.2.4. Repair vandalism if any occurs to the station. Note that 'Level 2' stations do NOT require annual maintenance

- 18.2.5. Provide routine site maintenance and snow removal
19. Regarding public communications related to the project, the Participant will coordinate any public announcements, outreach, and media with CEA

**Stations and Finances:**

20. Participant has elected to install ## Level 2 stations at an estimated cost of \$15,000 - \$22,500 depending on number of charging ports and complexity of installation for a total cost of \$ \_\_\_, \_\_\_ of which the local government commits to providing 27% or \$#,###

**Other Commitments:**

21. Conflict resolution:
- 21.1. In the case of conflict, disagreement, or non-performance, CEA and Participant will work constructively and collaboratively to resolve the conflict internally and if this is not possible, they will jointly select a 3<sup>rd</sup> party to mediate a mutually acceptable resolution.
22. CEA and Participant will collaborate and will fulfill their roles as outlined in this MOU
23. Nothing in this Agreement shall be deemed or construed to create a joint venture, partnership, employment or agency relationship between CEA and Participant for any purposes
24. Proprietary Information:
- 24.1. All Intellectual Property that arises in the course of the project shall vest in CEA.
25. Participant acknowledges and agrees that CEA, as a result of its Funding contribution, does not bear any liability whatsoever with respect to the Project except for reimbursing the local government for station costs as noted in sections on 'roles'.
26. Participant shall indemnify and save harmless CEA and its officers, employees, consultants, representatives and agents (collectively "CEA Representatives") from and against any and all claims, damages, losses, costs and expenses arising in any way out of this Agreement or the Project.
27. Confidentiality
- 27.1. To the extent that, in connection with this engagement, each party comes into possession of any proprietary or confidential information of the other party ("Confidential Information"), each party agrees to use the Confidential Information of the other party solely for the purposes of this engagement, and will not disclose such Confidential Information to any third party without the other party's consent. The terms of this engagement shall also be considered Confidential Information. Each party shall maintain the Confidential Information of the other party in confidence using at least the same degree of care as it employs in maintaining in confidence its own proprietary and confidential information, but in no event less than a reasonable degree of care.
- 27.2. Confidential Information shall not include information which (i) shall have otherwise become publicly available other than as a result of disclosure by the receiving party in breach hereof, (ii) was disclosed to the receiving party on a nonconfidential basis from a source other than the disclosing party, which the receiving party believes is not prohibited from disclosing such information as a result of an obligation in favor of the disclosing party, (iii) is developed by the receiving party independently of, or was known by the receiving party prior to, any disclosure of such information made by the disclosing party, or (iv) is disclosed with the written consent of the disclosing party. A receiving party also may disclose Confidential Information to the extent required by an order of a court of competent jurisdiction, administrative agency or governmental body, or by any law, rule or regulation, or by subpoena, summons or other administrative or legal process, or by applicable regulatory or professional standards, or in connection with any judicial or other proceeding involving the parties relating to this Agreement.
- 27.3. Parties may provide their contracted affiliates or subcontractors hereunder with access to Confidential Information of the other party, provided that each such contracted affiliate and subcontractor has agreed to be bound by similar confidentiality and nondisclosure obligations.

## Collaborative CleanBC Communities Level 2 Network MOU

### TERM OF AGREEMENT

28. This agreement shall come into effect upon execution of a contribution agreement between the 'Lead Applicant' and the funding agency.
29. This agreement shall expire upon the completion of the project or January 1, 2022, whichever is earlier.

### 7. EXECUTION

Signed, on behalf of Community Energy Association	Signed, on behalf of XXXXXX
Signature:	Signature:
Name and Title: Dale Littlejohn, Executive Director	Name and Title: xxx
Date: xxx	Date: xxx