

TSUNAMI POLE PROJECT

A collaboration of Haida Gwaii communities and partners



Lori Wiedeman (CAO)



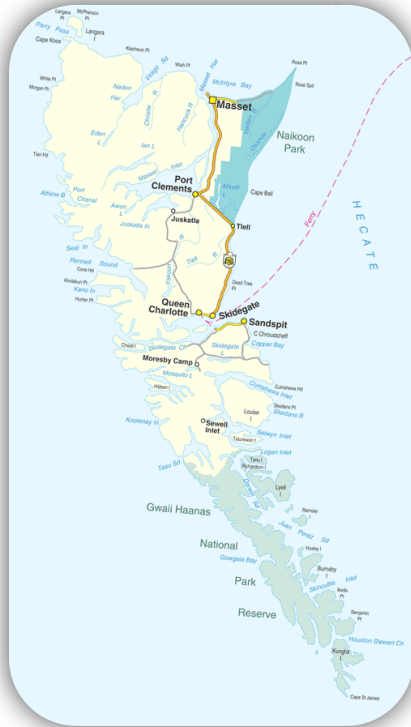
NORTH COAST
REGIONAL DISTRICT

Daniel Fish (CAO)



Ruby Decock (CAO)

Background



- Haida Gwaii is an archipelago of over 150 islands located off of the north coast of British Columbia.
 - There is an impending tsunami risk across all communities, so 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.
 - With this in mind, the communities across Haida Gwaii partnered on the tsunami pole project with EMBC, BC Hydro and Telus.
- "Preparation is key to survival in the event of an earthquake or tsunami" Government of British Columbia*

The Challenges



COMMUNICATION

We're in a tsunami hazard zone but also have limited communication possibilities in some areas.



SIMPLICITY

We need to devise a system that is both easy to maintain and easy to understand by both visitors and locals.



CONSISTENCY

We need an approach that we are able to implement uniformly across all our communities.

Our Solution

- **Communication:** Visual indicators painted on 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.
- **Simplicity:** Our Tsunami Pole Project utilises existing infrastructure, can easily be maintained, cannot be stolen and is easily understood.
- **Consistency:** We worked together to implement this across our communities to produce a universal approach..



"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, Former Mayor, Village of Queen Charlotte

What made this unique?

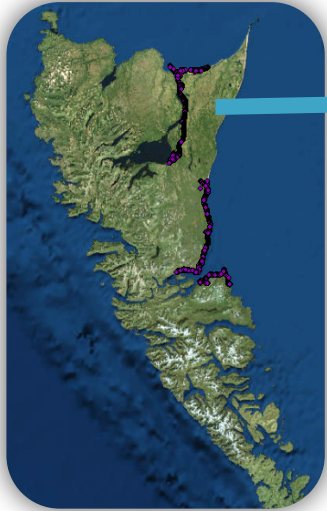


A UNIQUE COLLABORATION

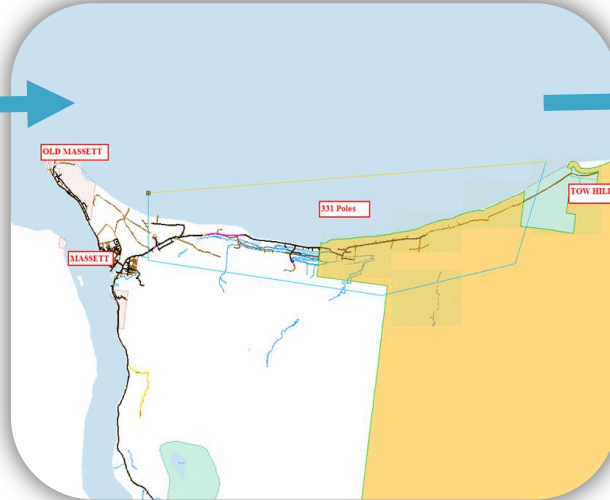


USE OF EXISTING INFRASTRUCTURE

We worked together to map hydro poles across our islands



Telephone poles across our communities were mapped using LIDAR data from CHN/ FLNRORD

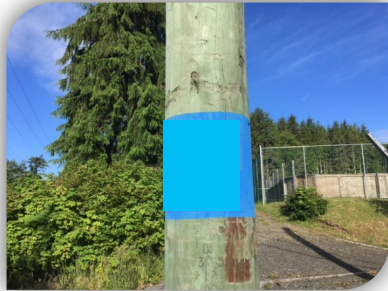


Using a planning level of 10 meters above sea level as a safe zone, each community was mapped and coded with hazard and safe zones



Maps were prepared for each community identifying which poles to mark: here they are coded where blue: safe zone and green, orange and red are hazard zones

This produced a clear marking system to be used across our communities



Hazard Zone



Evacuation Route



Safe Zone

Key Message: What to do in the event of a tsunami?

Since the implementation, we have recognized key outcomes of our project



TSUNAMI AWARENESS

Residents are now more conscious of the tsunami danger and have visual reminders of safe zones



FUTURE PLANNING

Our communities are more aware of the possibility of evacuations and we have updated our evacuation plans




ALL ISLAND PLANNING AND PREPAREDNESS

We realize the importance of working together despite being separated by distance

What next?

- How do we continue increasing public awareness and understanding?
- How can we integrate more high level emergency planning between communities?
- How can we build on the success of the tsunami preparedness project?




PREPARED HAIDA GWAI


Haida Gwaii, in partnership with BC Hydro and TELUS, is increasing tsunami preparedness with signs on utility poles to direct people to safety. If an earthquake occurs, a tsunami may be coming. **Are you prepared?**

A TSUNAMI is a series of long, surge-like waves generated when a large volume of ocean water is rapidly displaced (usually caused by an earthquake). TSUNAMI waves contain considerable energy; they can travel rapidly further inland compared to ordinary ocean waves. In fact, TSUNAMIS may not look like a wave at all, but will have very strong currents under the surface.

Tsunami Alert levels



Understanding the Pole Markings




White/Blue = Safe Zone
Blue = Hazard Zone
Arrow = Evacuation Route

EMERGENCY NOTIFICATIONS
EVACUATE TO HIGH GROUND IF:


- You feel a prolonged earthquake large enough to make standing difficult
- You hear a continuous Tsunami Siren
- You hear continuous vehicle horns or police/fire sirens and loudspeakers
- You receive an alert from:
 - AlertReady: all LTE cell phones, radio, TV
 - EC Alert
 - Haida Gwaii ePACT - register at: www.epactnetwork.com/en/sianup/haidagwai/alerts
 - VHF 16

FOLLOW THE POLES TO HIGH GROUND
Utility Poles across the island have been painted with white and blue markings to indicate hazard and safe zones in the event of a tsunami.



TSUNAMI SIRENS
Tsunami sirens are located in the communities of Daajing Giids Queen Charlotte, Hlgaagilda Skidegate, Masset and Gaw Tlasee Old Massett. The noise they make is like an air-raid siren and they will sound continuously until the warning is lifted.

The Tsunami Pole Project:
The Tsunami Pole project is the first of its kind with involvement from the Province of British Columbia, BC Hydro, TELUS, local First Nations and municipal governments.



We are currently rolling out sign posts at campsites and visitor centers across our communities.

Reflections



LORI WIEDEMAN, CAO

"This simple idea has helped our communities come together and launched other ideas for community coordination"



RUBY DECOCK, CAO

"Our communities are building on this work to bring more coordination to our emergency planning on island"



DANIEL FISH, CAO

"Another big success has been the ePACT system which has simplified emergency communications for all our local governments"



Lori Wiedeman: cao@queencharlotte.ca | **Ruby Decock:** cao@portclements.ca | **Daniel Fish:** cao@ncrdbc.com