

# Kake - Petersburg Intertie Update

September 18, 2013

Sitka – Southeast Conference Annual Meeting

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# There is a Need for the Intertie

- “ Kake has an isolated electric system
- “ Local generation is diesel fueled
  - “ 2.6 MW installed capacity currently (3 units)
- “ Electricity is crucial to economic development
  - “ High cost of retail electric service  
(as high as 64 cents/kWh with market fluctuations)
  - “ Average residential consumption very low, 366 kWh/mo
  - “ PCE reduces cost to residential, but not commercial users



# Project Funding

- “ Approximately \$5M is Available to Develop the Project so that it is Construction Ready
- “ Additional Funds are Required for Construction



# Project Progress

- “ MOU signed by SEAPA, AEA and IPEC
  - SEAPA agreed to assume the Intertie ownership role provided the project is already 100% funded
- “ MOU between Metlakatla and Kake for hydro
- “ A project management office has been established
  - Commonwealth Associates, Inc.
- “ Environmental Impact Statement underway, Tetra Tech
- “ D. Hittle January 2010 report being updated



# Project Details



- “ Single wood pole overhead construction
- “ 69 kV or 138 kV
- “ Follow existing USFS roads where possible
- “ Fiber Optic Cable
- “ 2-3 year construction period

# EIS Progress

- “ Public scoping meetings April/May 2010
- “ Completed environmental fieldwork  
Fall 2010 and Summer 2011
- “ Draft Resource Reports to USFS May/June 2012



# Draft Resource Reports

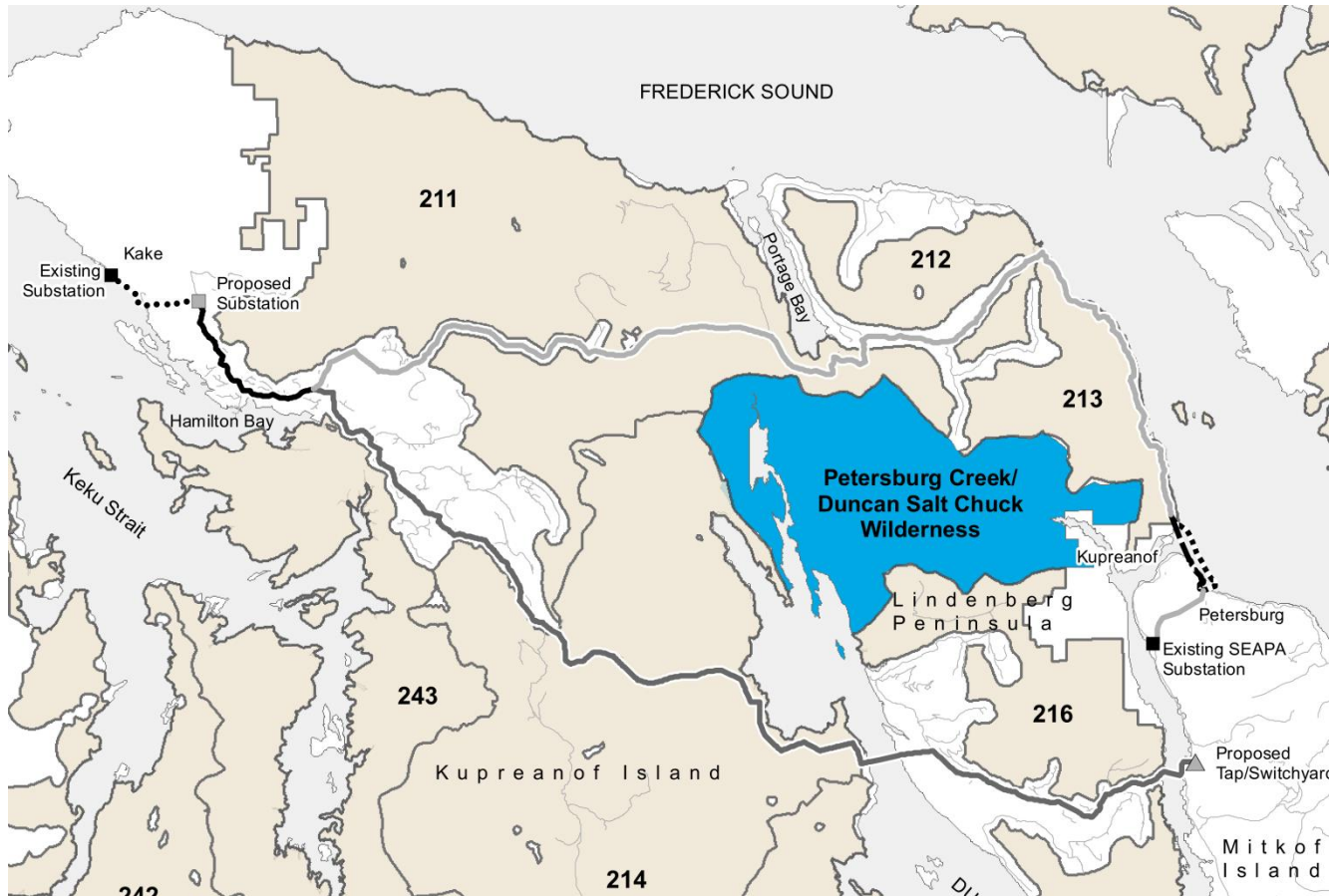
- “ Wildlife
- “ Aquatics
- “ Botany
- “ Wetlands
- “ Scenery
- “ Soils and Geology
- “ Biological Assessment/Biological Evaluation for Wildlife
- “ Biological Evaluation for Botany
- “ Invasive Plant Risk Assessment
  
- “ Received Comments Back



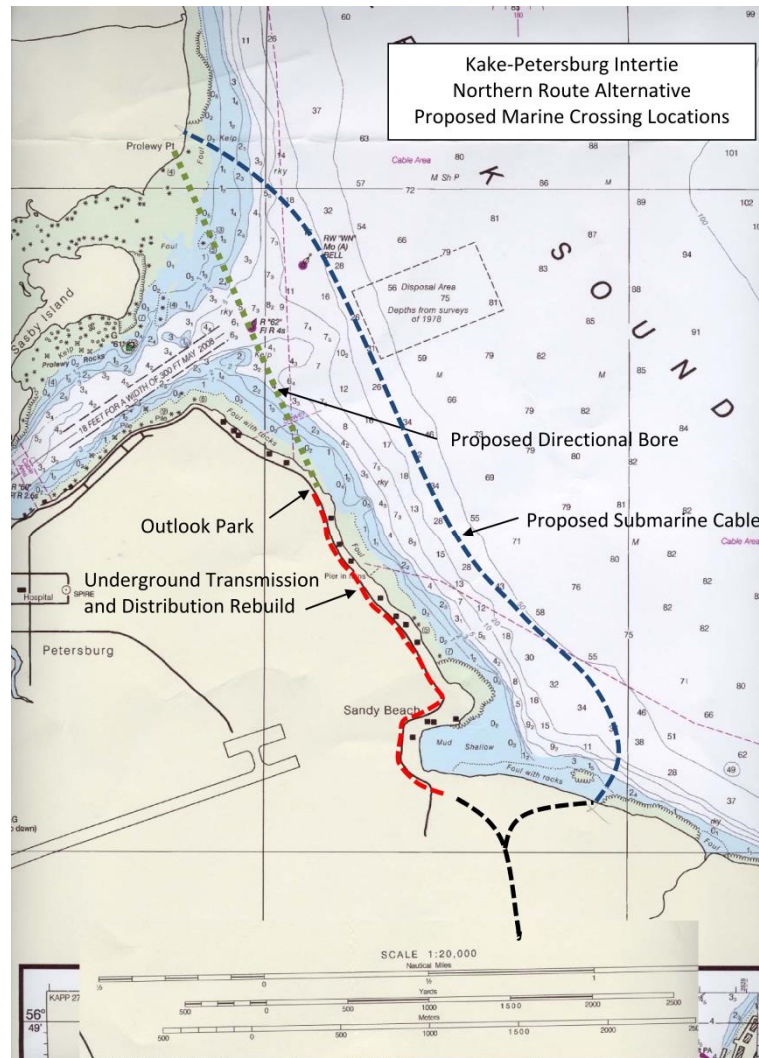
# Draft EIS to USFS

- ” Chapter 1 – Purpose and Need
- ” Chapter 2 – Alternatives
- ” Comments Received
  - . Petersburg Creek – Look for Other Alternatives
  - . Roadless Areas - Shovel Trails Only
  - . Fewer Options
  - . Define Proposed Action
- ” Resubmitted to USFS

# Route Alternatives



# A New Alternative



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**SEAPA**

Southeast Alaska Power Agency

**Commonwealth**  
associates, inc.

# EIS Analysis Alternatives

Alternative 1

No Action

Alternative 2

Northern  
Route w/  
Directional  
Bore

Alternative 3

Northern  
Route w/  
Submarine  
Cable

Alternative 4

Center South  
Route

## Proposed Action

Alternative 2 – Northern Route w/ Directional Bore

# Three Options

(miles)

	Alternative 2 Northern Route Directional Bore	Alternative 3 Northern Route Submarine Cable	Alternative 4 Center South Route
Total Length	59.9	60.3	51.9
Marine Crossings	1.2	3.0	1.5
Underground Length	1.4	--	--
Total Unroaded Length	22.1	22.1	13.1
Length of Shovel Trails	7.6	7.6	1.3
Length of Heli Placement	14.5	14.5	11.8



# Estimated Construction Costs

- “ Last estimated in 2010
- “ Updated cost estimates realistic
  - Acknowledge 2015-2016 Construction
- “ Vendors contacted indicated inflation/escalation 4-5%/year
- “ Submarine cable shipping costs raised significantly (fuel)
  
- “ Helicopter construction due to roadless constraints (not needed if future road constructed)
- “ Kake substation moved five miles - close to town

# Estimated Construction Costs

2015/16 Construction (\$000)

	69-kV Route Alternatives, Limited Roads		
	Northern Route		
	Prolewy Pt. Dir. Bore (Opt. 1)	Petersburg Sub. Cable (Opt. 2)	Center South (Opt. 3)
Overhead Line	\$ 36,000	\$ 36,000	\$ 30,384
Clearing, Trails, Helo Pads	6,575	6,575	3,639
Underground Construction	3,143	-	-
Submarine Cables	-	13,795	13,511
Directional Bore Crossings	5,823	-	-
Switchyards and Substations	<u>1,984</u>	<u>1,984</u>	<u>2,434</u>
Subtotal - Direct Costs	\$ 53,526	\$ 58,354	\$ 49,967
Indirect Costs	\$ 5,836	\$ 6,363	\$ 3,997
Contingency (15%)	<u>8,904</u>	<u>9,708</u>	<u>8,095</u>
Total Costs	\$ 68,266	\$ 74,425	\$ 62,060

# Next Steps

Revised Purpose and Need/Alternatives to USFS for Review	July 2013 (Complete)
Update January 2010 D. Hittle Intertie Study	September 2013
Draft EIS Available for Public Review and Comment	October 2013
Public Meetings on Draft EIS (Kake and Petersburg)	November 2013
Preliminary Final EIS based on Public Review and Comment to USFS for Review	February 2014
Revise and Publish Final EIS and ROD	May 2014
End of 45 Day Appeal Period – EIS Complete	June 2014
Hire Design Engineers	
Hire Construction Contractors	

Schedule subject to USFS approval



# Questions Please,,,,,



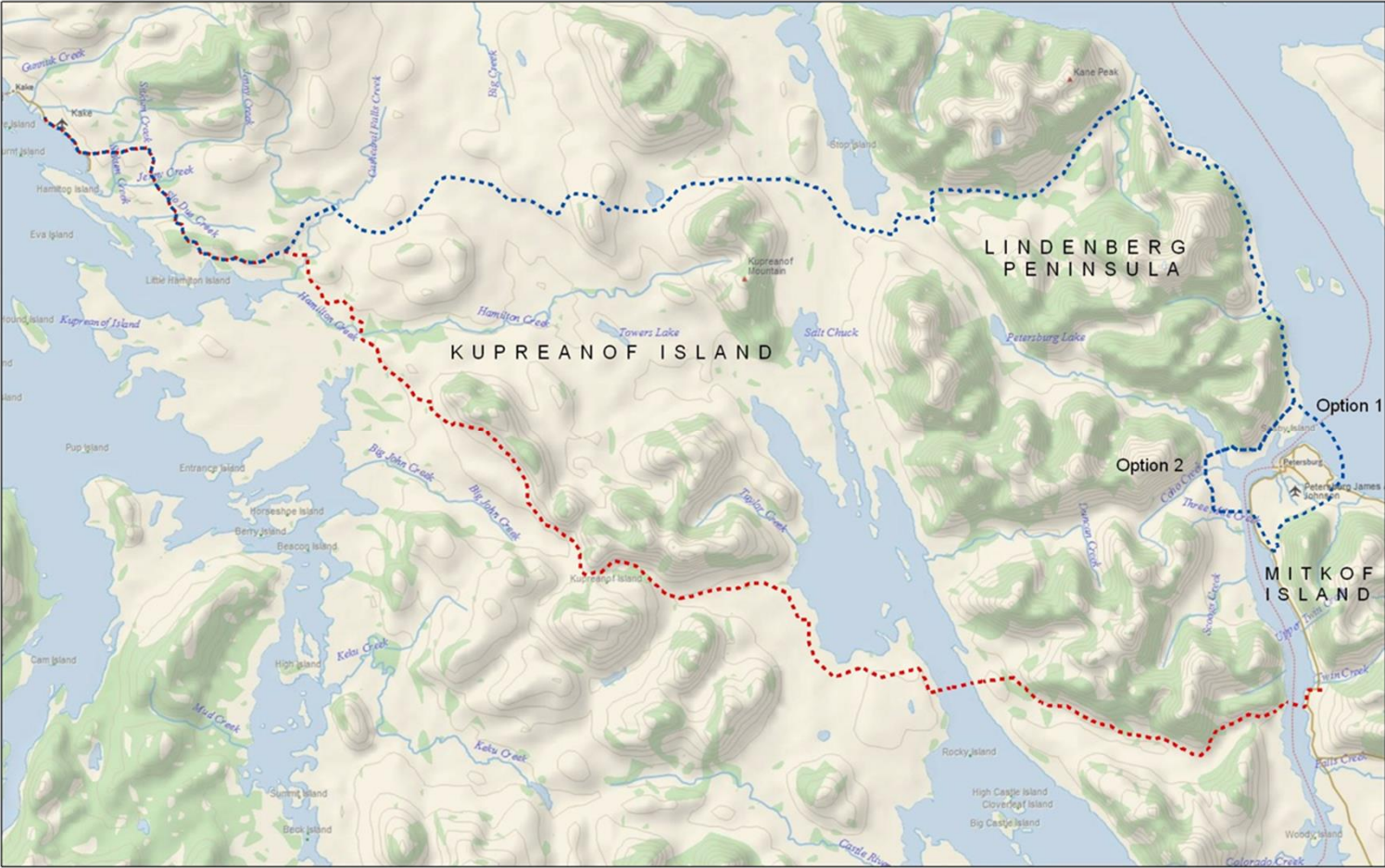
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# The Intertie is a Separate Project

- ” Both projects:
- . Can proceed independently of one another
  - . Have a specific purpose and need
  - . Are considering different alternatives, some of which may not in the end allow construction of a transmission line (e.g., determining that an increased ferry service may be sufficient).
  - . Have different time schedules ( $\pm 1\frac{1}{2}$  years)

# Northern and Center-South Routes



**SEAPA**



Southeast Alaska Power Agency

# Alternative Northern Routes

