

# POWERING PROGRESS



An update from your Electric Cooperative







### **ABOUT US**



**4700+** miles of powerlines





### **1941** MEA Co-op was started

**230** Employees (95% are also Co-op members)





- Hilcorp notified utilities of future supply shortages
- Gas contract expires in Spring 2028.





84% of power produced with Cook Inlet natural gas at the Eklutna Generation Station power plant.

### **GENERATION - ALL OPTIONS HAVE TRADEOFFS**

### GAS SUPPLY

#### COOK INLET INVESTMENT

- PROVEN RESOURCES BUT EXPENSIVE
  TO DEVELOP AND DELIVER.
- QUESTIONABLE LIFE EXPECTANCY.
- SINGLE SUPPLIER

#### NORTH SLOPE INVESTMENT

- SIGNIFICANT RESOURCES AVAILABLE
- LARGE AND SMALL DIAMETER
  PIPELINES HAVEN'T MATERIALIZED
- OPTIONS TO PRODUCE THERE AND
  BUILD TRANSMISSION DOWN TO GRID

#### **IMPORT LNG**

- AVOIDING BIG INVESTMENT
  INCREASES PER MCF COSTS
- DECREASES ENERGY SECURITY
- HIGH DEMAND GLOBAL MARKET
- LIKELY OUR ONLY SHORT TERM

### RENEWABLES

#### HYDRO

- FIRM, CHEAP POWER, LONG LIFE
- REQUIRED HIGH INITIAL INVESTMENT
- ENVIRONMENTAL OPPOSITION

#### SOLAR

- INEXPENSIVE TO DEVELOP, SCALABLE
- FLUCUATING POWER SUPPLY
- NOT AVAILABLE DURING OUR PEAKS

#### WIND

- INEXPENSIVE TO DEVELOP, SCALABLE
- FLUCUATING POWER SUPPLY
- SOME AVAILABILITY DURING PEAKS

#### GEOTHERMAL, TIDAL, ETC

- MORE EXPLORATION, PROVING AND PERMITTING REQUIRED.
- PROMISING IN THE LONG TERM

OPTION

### OTHER CLEAN ENERGY

### NUCLEAR

- 10+ YEARS OUT
- ECONOMICS ARE NOT THERE YET
- PERMITTING AND SPENT FUEL
  QUESTIONS

#### CARBON MANAGEMENT

 INCREASING OPTIONS TO CAPTURE AND/OR SEQUESTER CARBON

#### EFFICIENCY

- SUPPLY SIDE EFFICIENCY BURNS LESS FUEL NUMBER OF KILOWATTS
- DEMAND SIDE EFFICIENCY MEANS
  CONSUMERS USE LESS

OTHER FUELS (COAL, BIOFUELS, ETC)



### ENERGY DIVERSIFICATION



### MEA GOAL: 50% CLEAN ENERGY BY 2050

## **2024: 16% RENEWABLE**

- Mostly from hydro generation, and a small mix of solar and wind resources.
- 8.5 MW Solar Farm in Houston, Alaska came online last fall.

BradleyWillow Solar

Energy Produced by Source



### CURRENT CLEAN ENERGY PROJECTS



- Railbelt wind study
- Microgrids (in more rural communities)
- Battery Storage
- Power Pool Agreement
- Net Metering (now have over 10 MW's of solar capacity on MEA's system)
- Electric Vehicles (charging sites and studies)

Ribbon Cutting Ceremony at the 8.5 MW Hawk Lane Solar Project developed by Renewable IPP.





Grid resilience, resource planning, long-term cost reduction.



Chugach Electric Association Golden Valley Electric Association Homer Electric Association Matanuska Electric Association City of Seward

### **GOVERNOR'S TASK FORCE**

### TRANSMISSION UPGRADES



### **BECOME A FIRST** WORLD GRID

### **CLEAN ENERGY STANDARDS**



#### MEA: 50% CLEAN **ENERGY BY YEAR** 2050

- FUND UPGRADES TO CAPACITY AND **RESILIENCE. REMOVE CONGESTION**
- GRID UNIFICATION TO DEVELOP **ELECTRON HIGHWAY VS TOLL ROAD**

- ATTAINABLE GOALS
- FOCUSED ON INCENTIVES NOT PENALTIES
- REINFORCE COLLABORATION



### ENERGY DIVERSIFICATION



### FIRM POWER RESOURCES

- COST COMPETITIVE
- LONG TERM ENERGY SECURITY GOAL
- REDUCE THE COST OF ENERGY



## **\$206 MILLION**

Federal grant funding awarded to Alaska Energy Authority to improve Railbelt transmission grid and allow integration of clean energy infrastructure.



### **ECONOMIC CONSTRAINTS**

### **Eliminate Wheeling**

Decisions about investment in projects or economic dispatch should not be inhibited by the cost of transmission, or the need to move power across transmission lines with different ownership

Get rid of the toll road, create an open access highway that does not discriminate in terms of who generates the power, or what form of generation is used

Slide courtesy of:

10







# WHAT WE LEARNED FROM ICELAND

- Similar challenges to Alaska (demographics, harsh environment, islanded system).
- Initial government investment in backbone/generation brought energy security and drove economic growth, private investment and entrepreneurship.
- Vision and policy matter.

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![](_page_10_Picture_5.jpeg)

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### WHY DOES THIS MATTER TO **ALASKANS?**

- Significant infrastructure dollars coming to the state for energy.
  - Design, build and operation opportunities for service companies and jobs.
  - Small state transmission investment unlocks federal funding, private sector investment and entrepreneurship.
  - Builds a new, self-sustaining energy market and trained workforce. Model shifts from utility-based to open-source.
- Reasonable, secure and predictably-priced power drives economic development.
- **Downward pressure on rates.**