



Power Cost Equalization Overview

House Energy Committee

Feb. 20, 2013

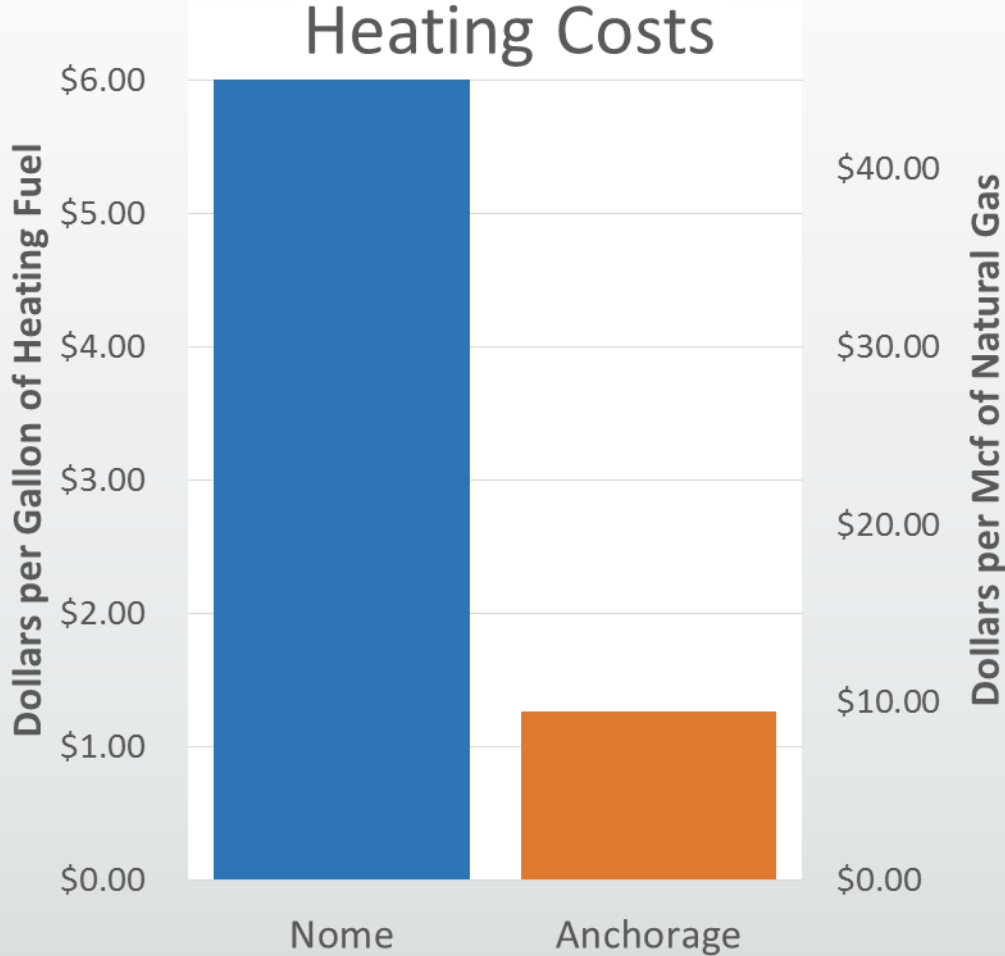
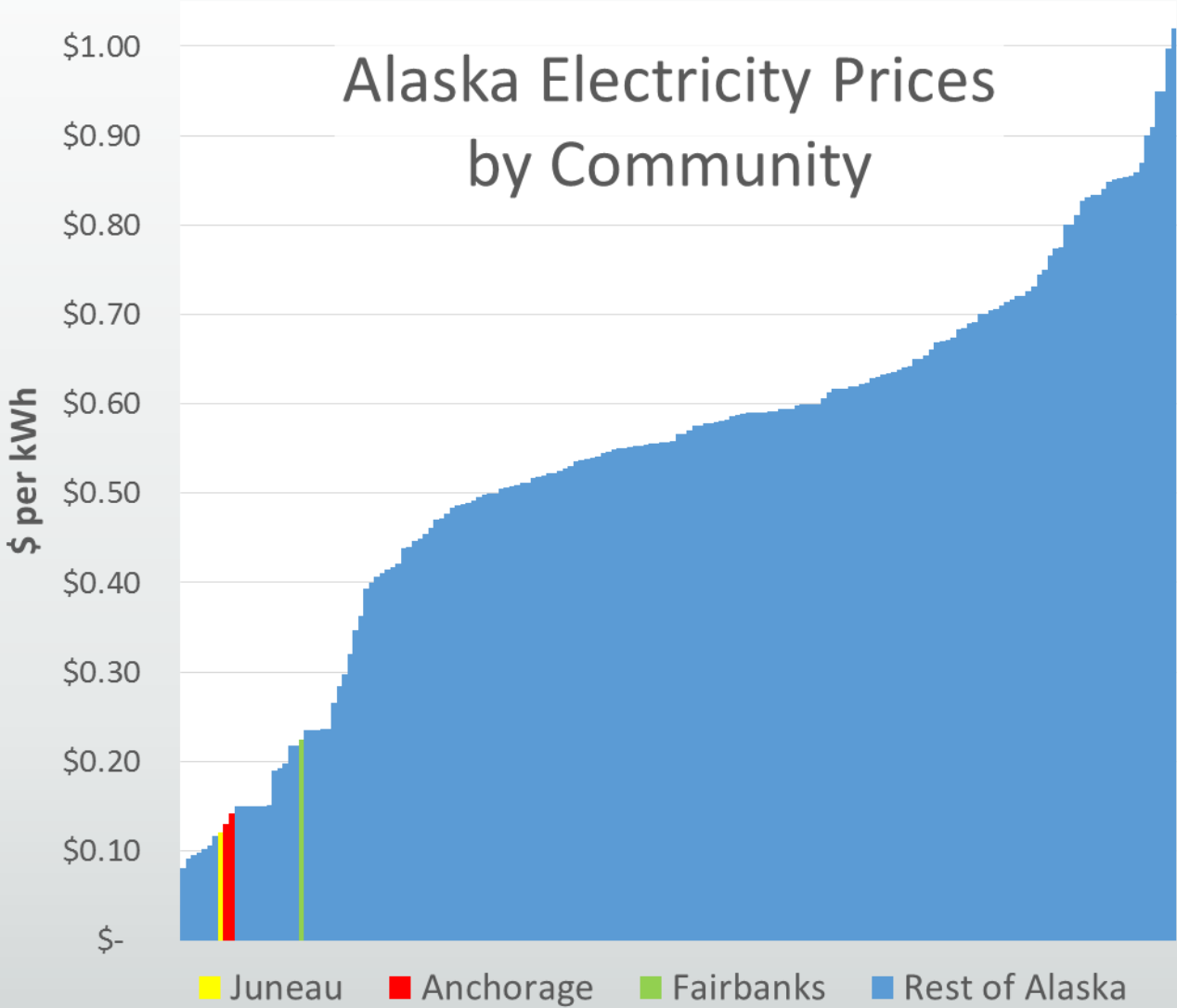


Alaska Energy Authority

Mission: Reduce the Cost of Energy in Alaska

- Accomplished by:
 - Energy Planning and Policy
 - Investing in Energy Infrastructure
 - Diversifying Alaska's Energy Portfolio
 - Technical Training and Assistance

Alaska's Energy Costs



The Need for PCE

- Rural Alaska electrical rates can be 3 to 5 times higher than in urban Alaska
- Assistance needed in rural Alaska to maintain and operate basic infrastructure and systems
- Power Cost Equalization (PCE) created at a time when State funds were used to construct major energy projects to serve urban areas
- Four Dam Pool hydroelectric facilities:
 - State-owned assets in Kodiak, Valdez, Wrangell-Petersburg and Ketchikan
 - provided low-cost and reliable power
 - Four Dam Pool facilities sold to communities they served

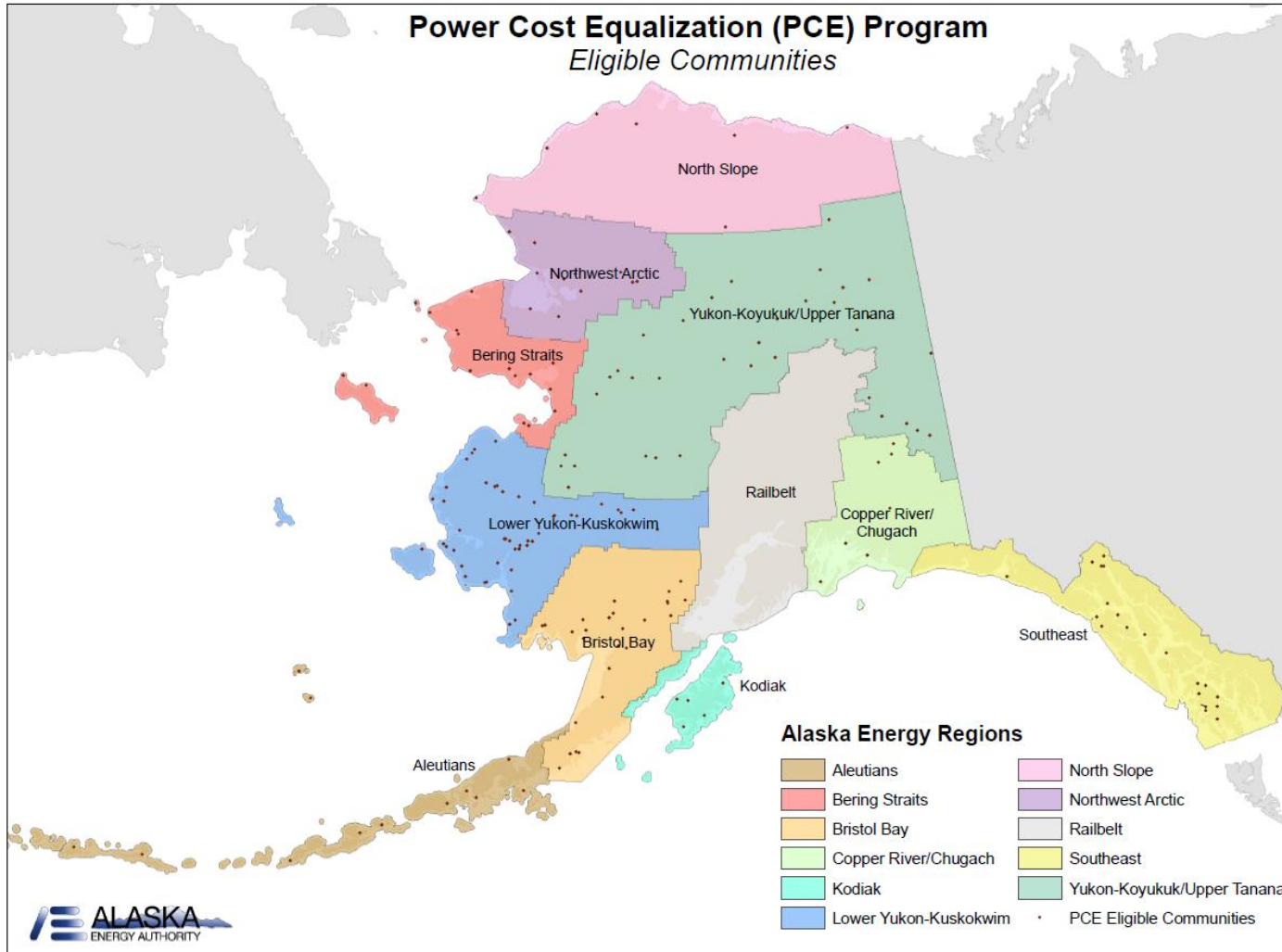
Power Assistance Programs

- State of Alaska had two prior power-assistance programs
 - Power Production Assistance Program ('80)
 - Power Cost Assistance Program ('81)
- AS 44.83.162.-165 replaced previous programs with the PCE program
 - effective October 1984
 - Present law AS 42.45.100-190
- PCE program equalizes the power cost per kilowatt hour (kWh) statewide at a cost close-or equal- to the mean of power costs in Anchorage, Fairbanks and Juneau (AS 42.45.100(a)(1))

PCE: Eligibility

- 1983- residential sales less than 7,500/MWh and 1984- used diesel greater than 75% of consumption (AS.42.45.150)
- Eligible:
 - about 30% of all kWh sold by participating utilities
 - community facilities (e.g. water and sewer, public lighting)
 - residential customers
- Not eligible:
 - State and Federal facilities (including schools)
 - commercial customers
- Railbelt electrical utilities, Juneau and Four Dam Pool communities are not eligible

PCE: Participating Communities



- Approximately 81,000 Alaskans live in the 188 participating communities

Calculating the Floor

Utility	Rates \$	% PCE floor	%Utility Sales Used
Alaska Electrical Light & Power	0.1210	14.5	100.0
Chugach Electric Association	0.1418	52.3	98.5
Golden Valley Electric Association	0.2162	6.6	20.7
Matanuska Electric Association	0.1511	11.7	24.9
Municipal Light & Power	0.1302	14.9	100.0
Floor for FY 13	0.1430		

Calculating the PCE Level: Overview

The PCE level is:

- Calculated for each participating utility – per community
- Eligible Utility Costs determined by RCA
 - two categories of costs: fuel and non-fuel
 - non-fuel costs do not include utility profit
 - cannot exceed \$0.8142kWh
- Lowered by any additional State or federal assistance
- A utility is not eligible if their average rate is below the PCE Floor

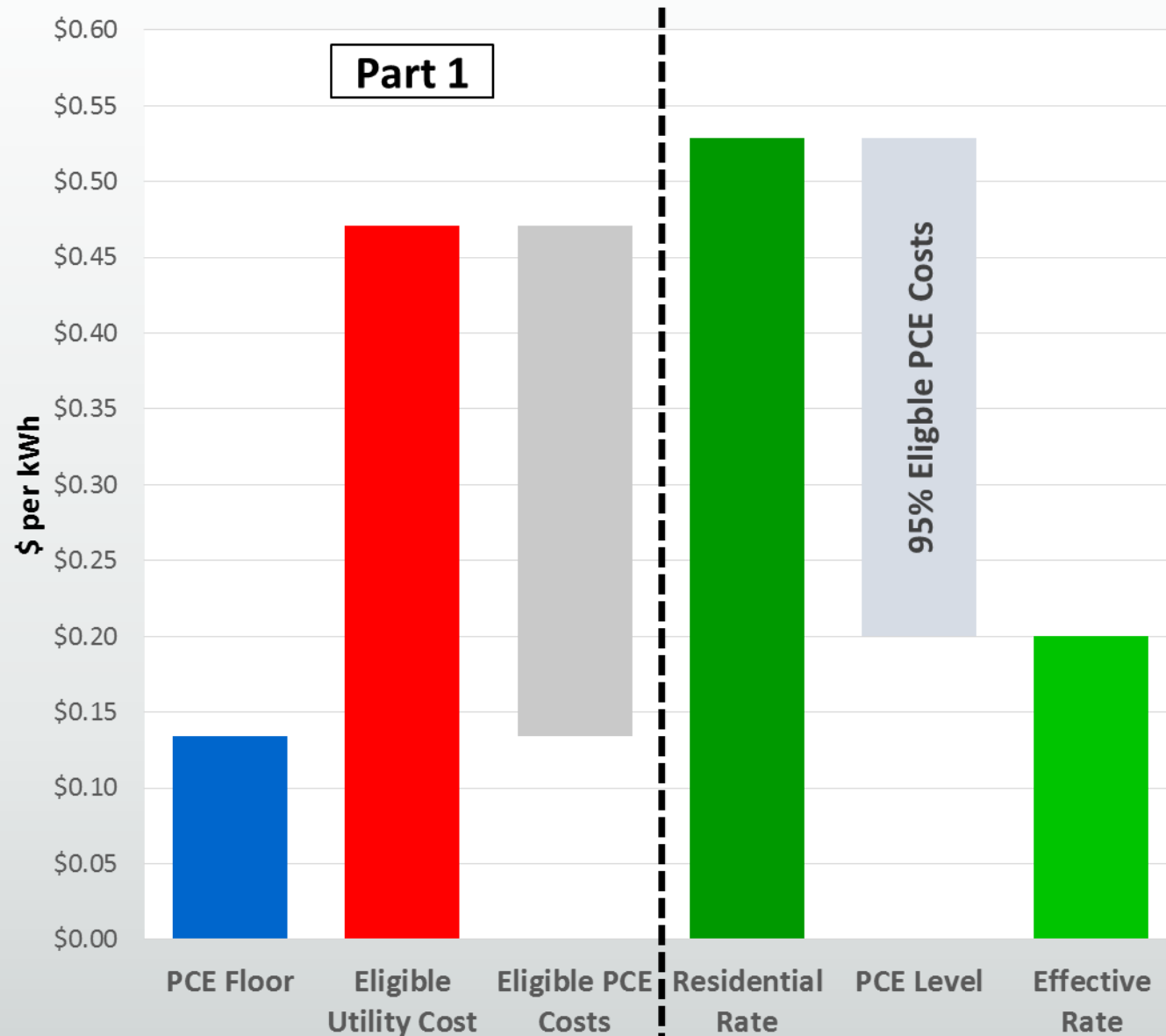
**Max PCE Level
equals
95%
of
(\$1.00 - \$0.1430)**

PCE: Reducing Power Bills

- Residential: credit on first 500 kWh consumed each month (per customer)
- Community facilities: credit on 70 kWh x the community population (for the entire community)
- Customer's bill= total cost - the PCE credit
- Utilities are required to notify the customer of the PCE credit and the total cost of service with every bill
- Utilities are reimbursed on the customer credit

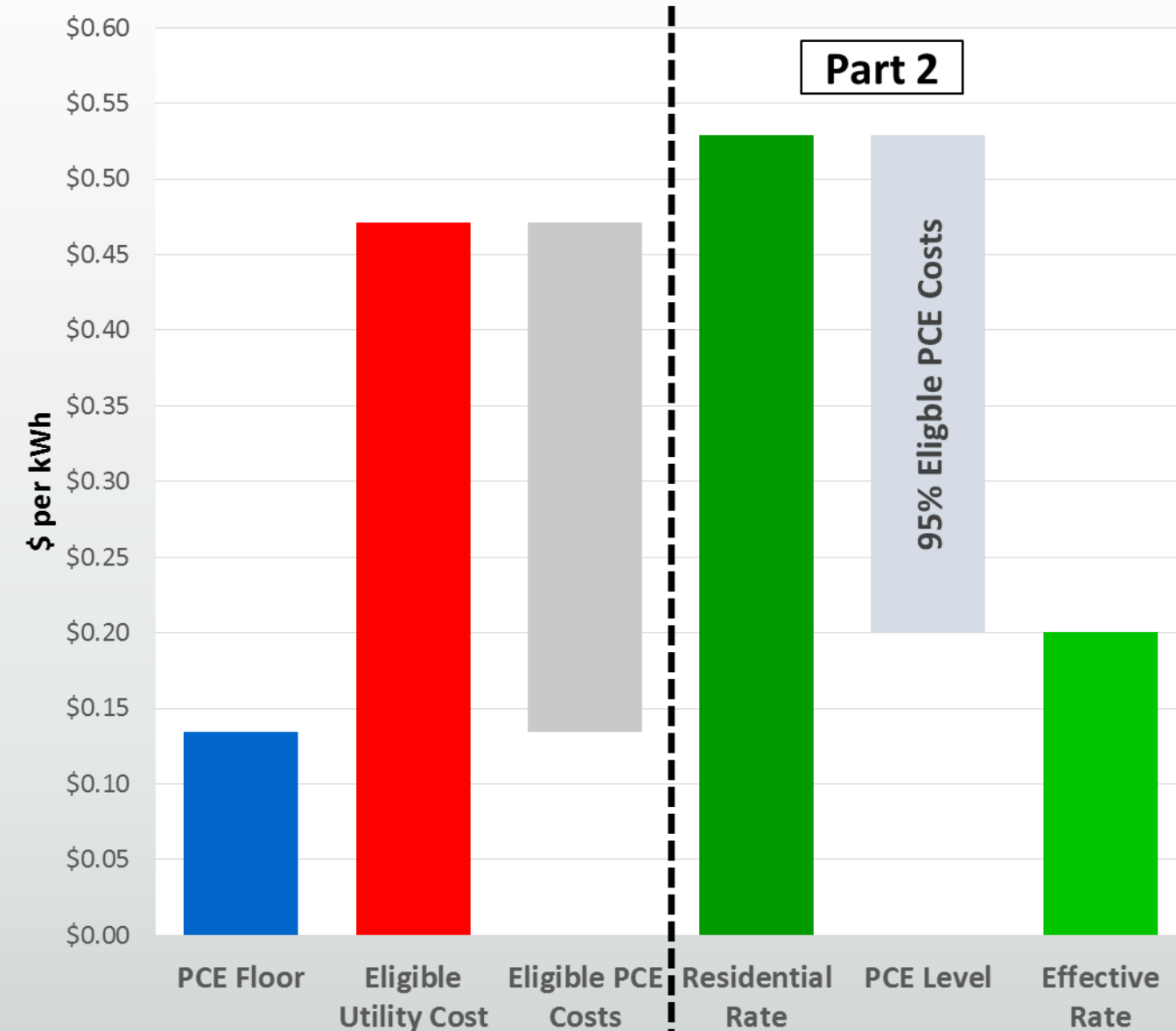
Population numbers updated by Department of Commerce, Community and Economic Development on July 1, annually

Calculating PCE Rates: Part 1



- PCE Floor
 - weighted average power cost of Anchorage, Fairbanks and Juneau
 - determined by the RCA
 - \$0.1430 per kWh (FY13)
- Eligible Utility Costs (RCA verified)
 - fuel costs and non-fuel costs only
 - \$0.47 per kWh (current average)
 - max cost of \$1.00 per kWh
- Eligible PCE Costs
 - RCA Utility Cost minus the Floor

Calculating PCE Rates: Part 2



- Residential Rate
 - calculated by the utility
 - \$0.53 per kWh (current average)
- PCE Level
 - 95% of the Eligible PCE Costs
 - calculated for each community
- Effective Rate
 - price customers pay for PCE-eligible kWhs
 - residential Rate minus PCE Level
 - \$0.22 per kWh (current average)

PCE: Reducing Power Bills

Sample Bill

Without PCE	600 kWh (kWh used)	*	\$.50/kWh (utility rate)	=	\$300
PCE Credit	500 kWh (PCE eligible)	*	\$.30/kWh (PCE rate)	=	\$150

\$300-\$150= \$150 (Customer Pays)

PCE: Administration

AEA's role:

- Authorizes payment to electric utilities
- Determines eligibility for residential and community facility customers
- Administers the PCE Fund based on
 - fiscal appropriations by the Alaska Legislature
 - monthly reports submitted by participating utilities
- Ensures compliance with Statutes and regulations

RCA's role:

- Determines eligibility of utilities
- Sets PCE rates, calculations based on use, costs and efficiencies
- Ensures compliance with Statutes and regulations

PCE: Funding

1. PCE Endowment Fund
2. General Fund
3. PCE Fund and Rural Electric Capitalization Fund

- PCE Payments totaling \$39.5 million at 100% (FY12)

PCE: Funding

PCE Endowment Fund

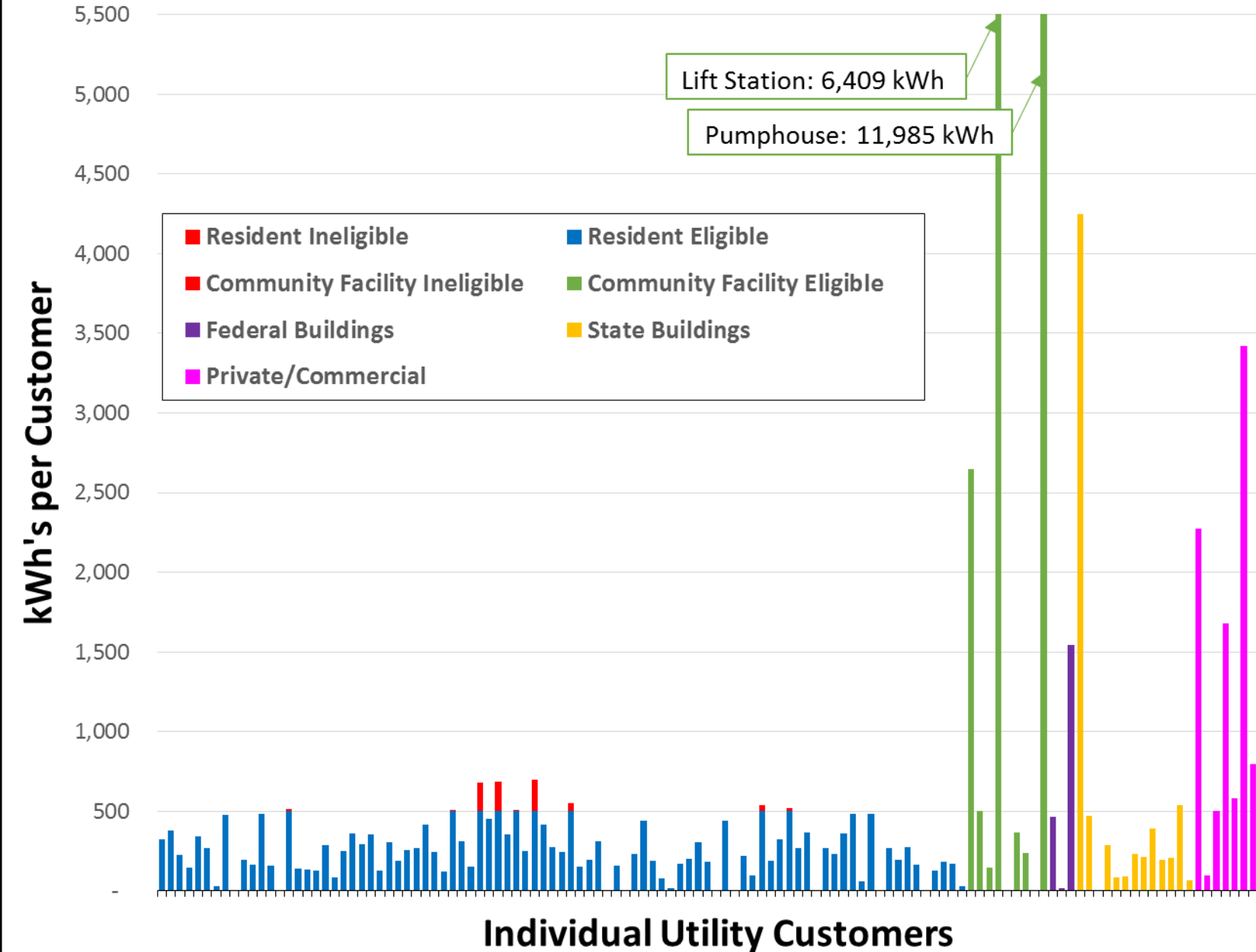
- AEA fund, managed by the Department of Revenue
- Created and capitalized in FY01 with funds from the Constitutional Budget Reserve and Four Dam Pool sale proceeds
- Further capitalized with General Funds in FY07 (\$182.7 million) and FY12 (\$400 million)
- 7% of the endowment fund's 3-year monthly average market value may be appropriated to the PCE program (AS 42.45.085)
- Invested to earn 7% over time
- \$788 million in PCE Endowment Fund (as of 12/31/12)
- Anticipated to be only funding source in FY16

Community Example: Akiak



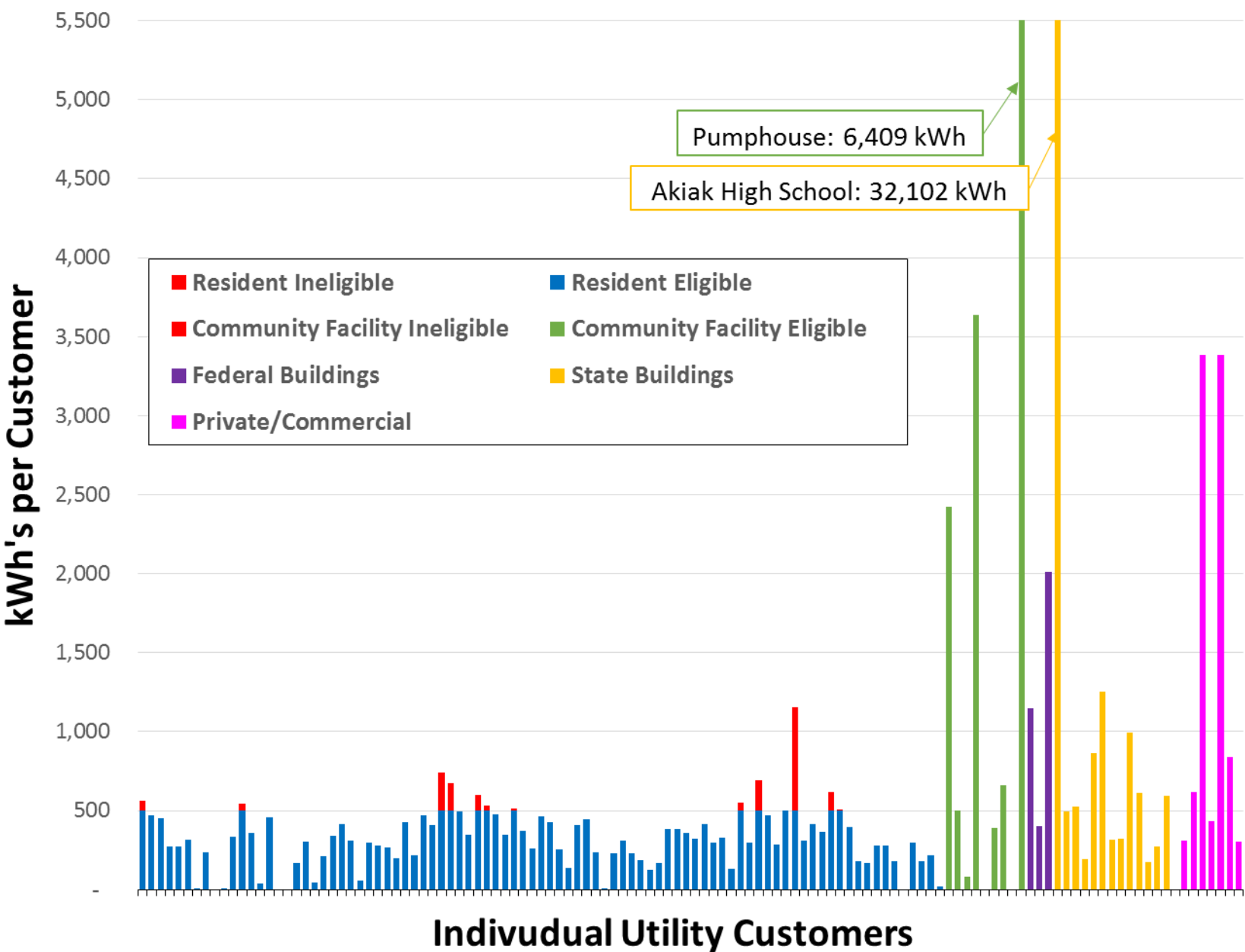
- Individual customer data for a summer month (July '12) and winter month (Dec. '12) in Akiak was used to demonstrate relative impact of PCE
- 121 electric customers in community
 - 89 residential
 - 9 community facilities
 - 3 Federal government
 - 13 State/local government
 - 8 commercial/private

July Akiak Electric Customer Use



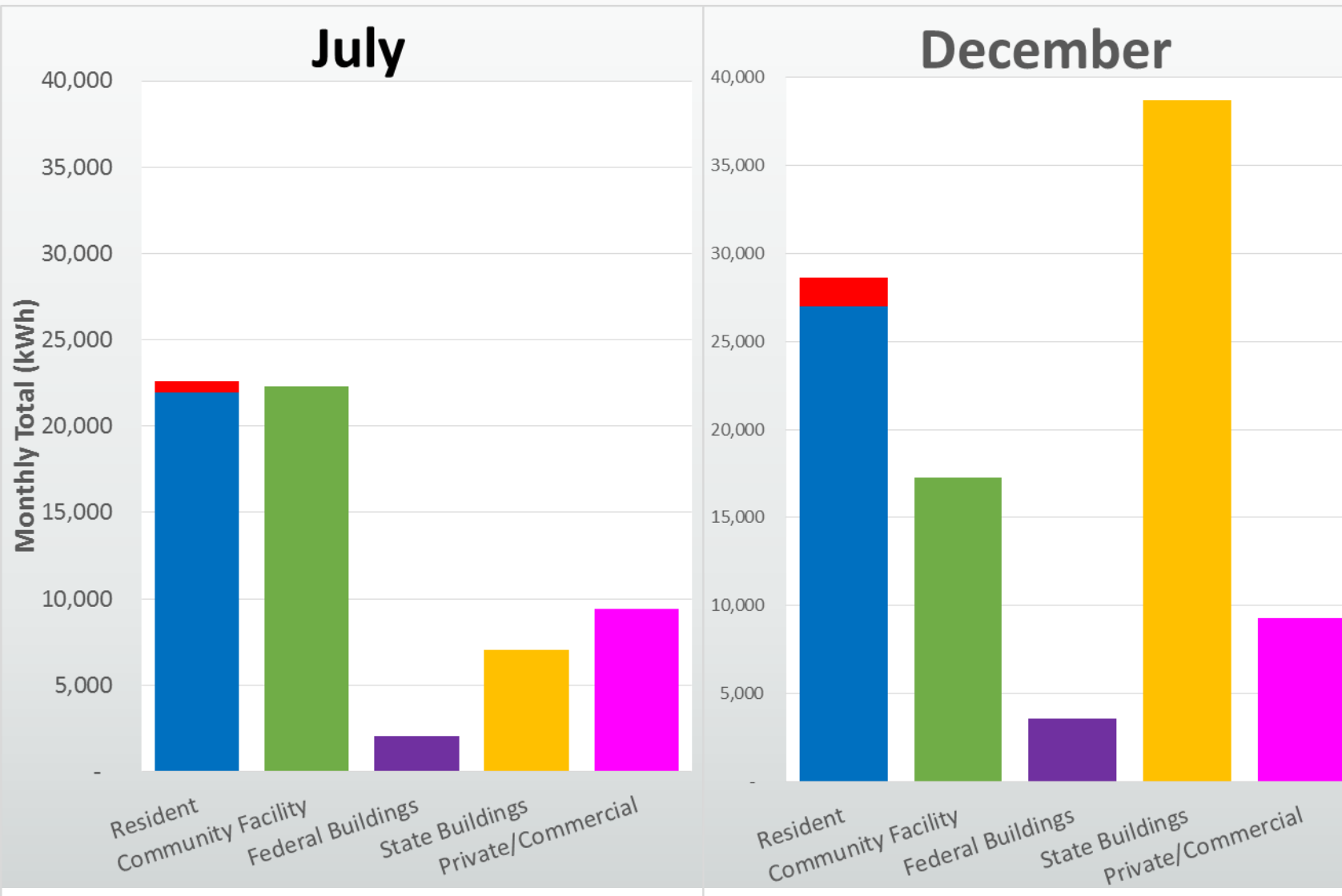
- July customer usage is relatively low
- Bulk of Community Facility use is associated with water and sewer

December Akiak Electric Customer Use



- Increase in total electric use in winter
- Akiak High School becomes the largest electric user in the community

Akiak Electric Use by Customer Type



- Increases (from July – Dec.)
 - total electric: 54%
 - total residential: 27%
 - ineligible residential: 146%
 - State buildings: 451%
- PCE eligible kWh
 - July: 70%
 - December: 45%
 - high eligible percentage, compared to state average



AKEnergyAuthority.org