



## Running a Commercial Program on a Shoe String

**Presented by:**

Jim Maunder

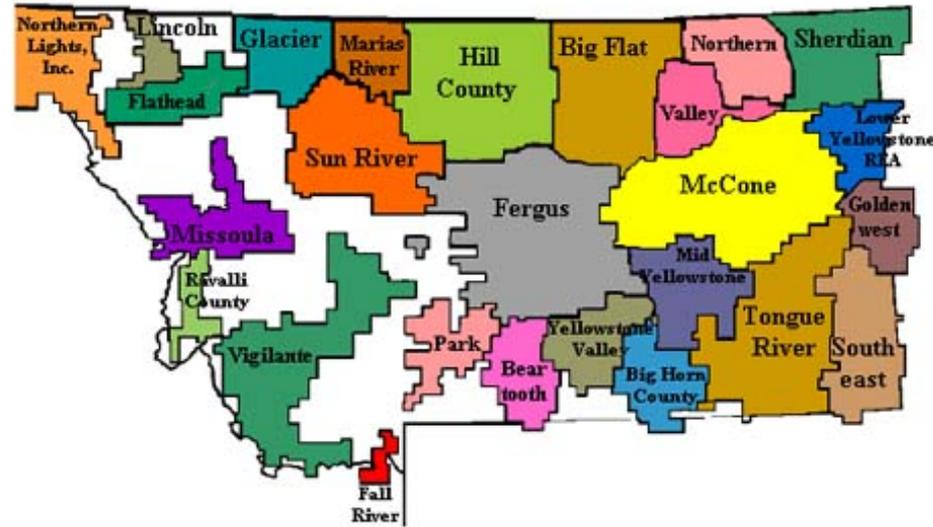
Manager of Member Services

Ravalli Electric Co-op

BPA Energy Efficiency



# Ravalli Electric Co-op



- 7,853 Members
  - 10,322 meters
  - 1,211 miles of line
  - 6.48 members per mile of line
  - 8.52 meters per mile of line

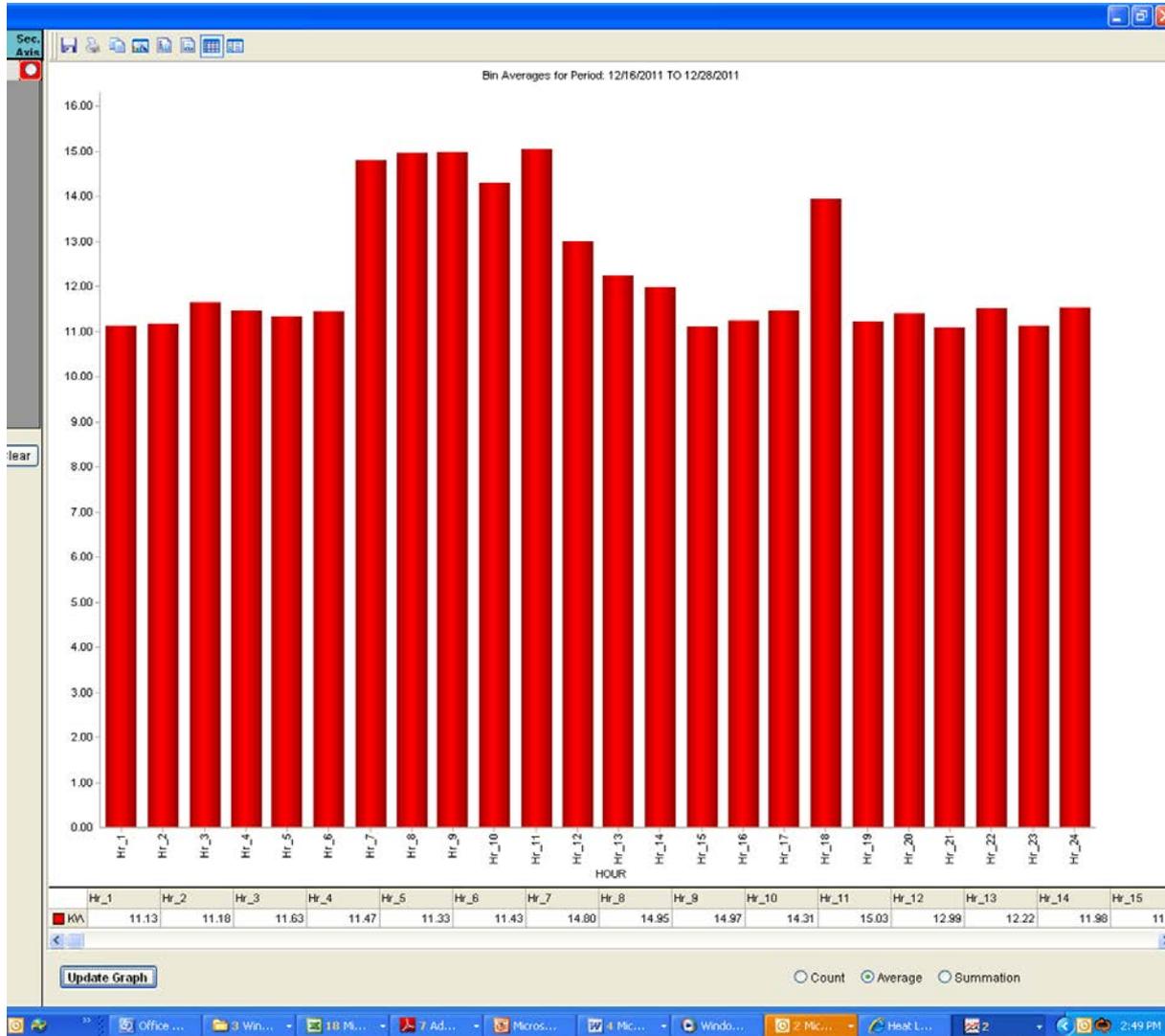


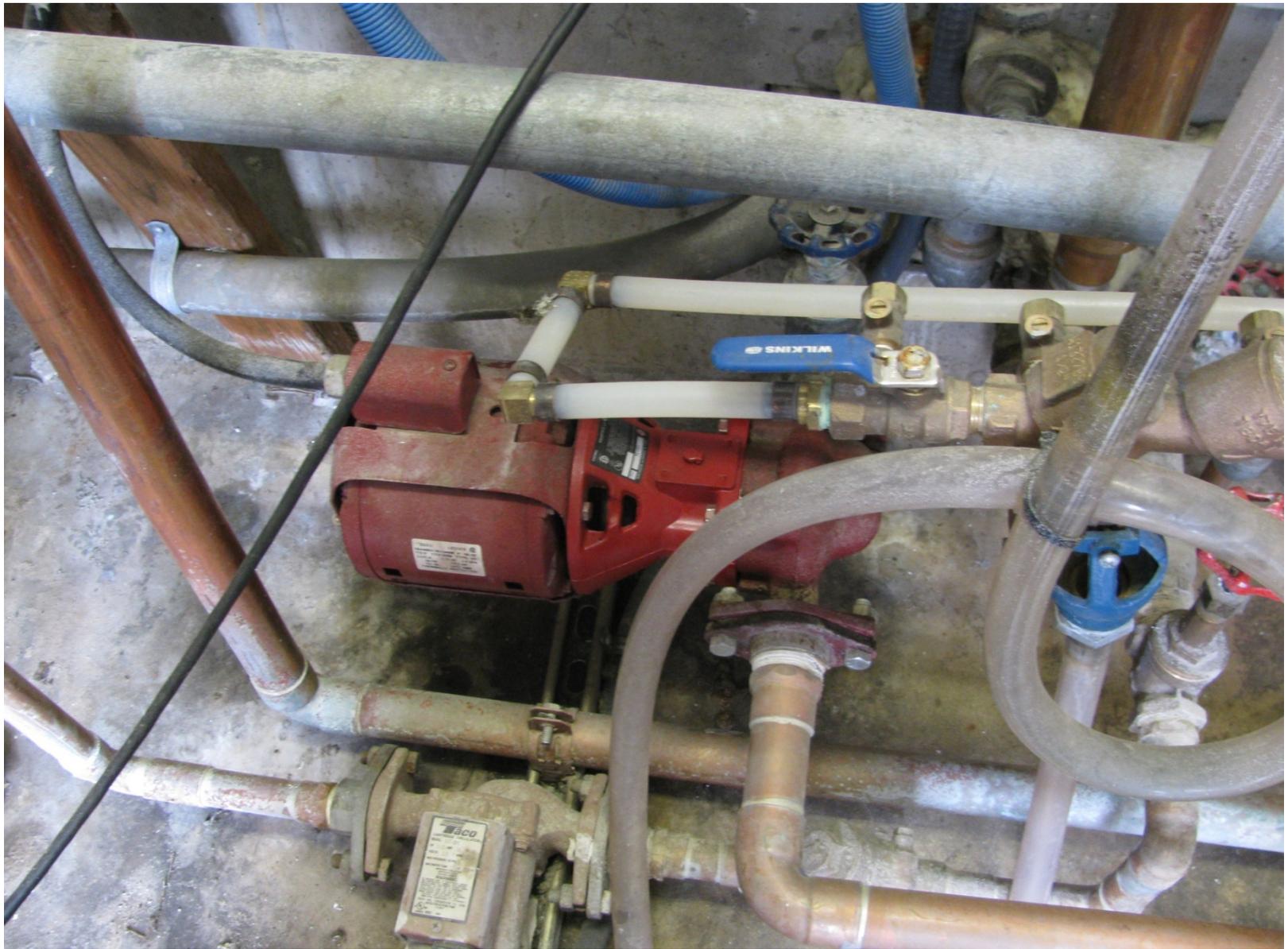
# Data Logger on Main Panel



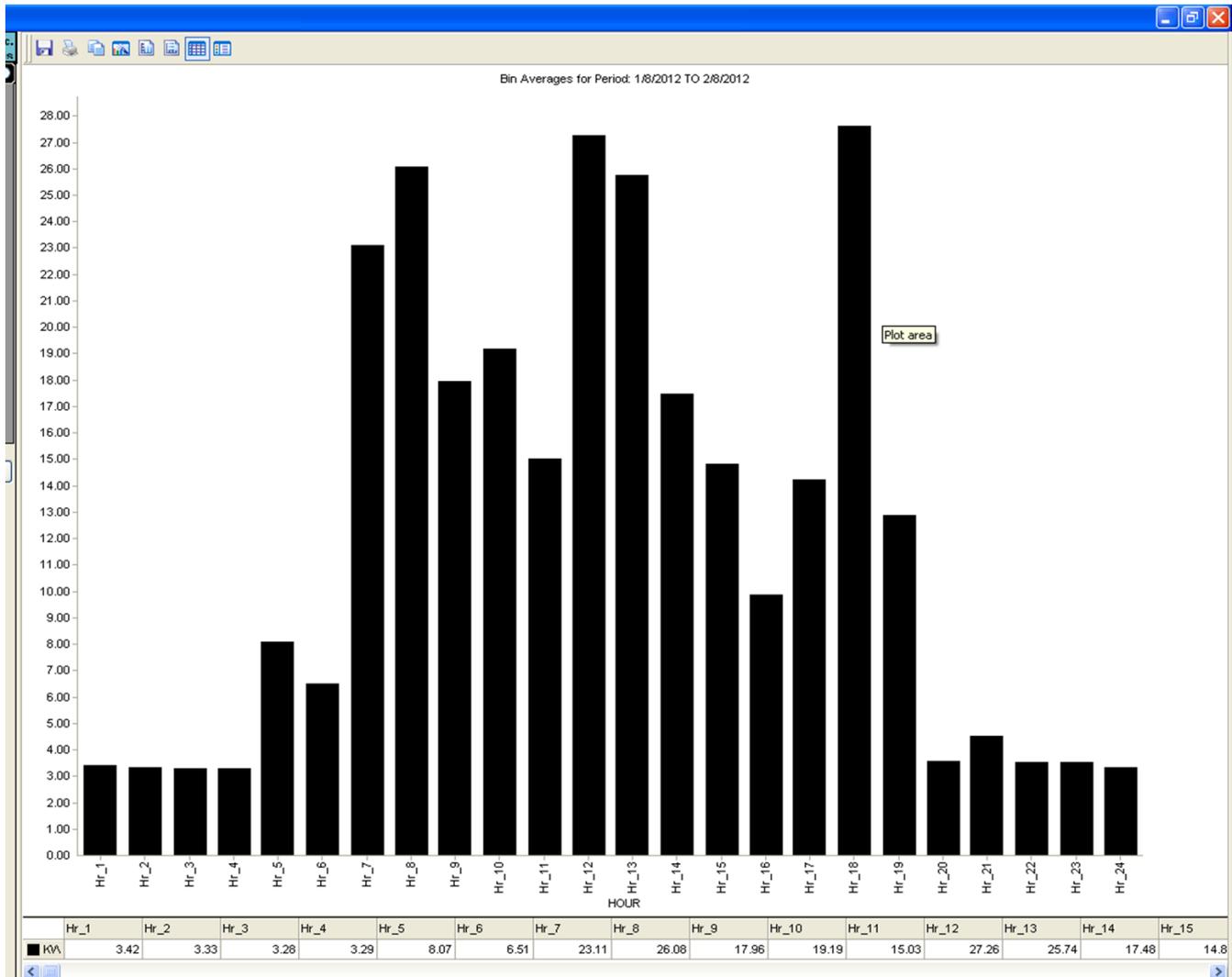


# Food Service Hot Water Use



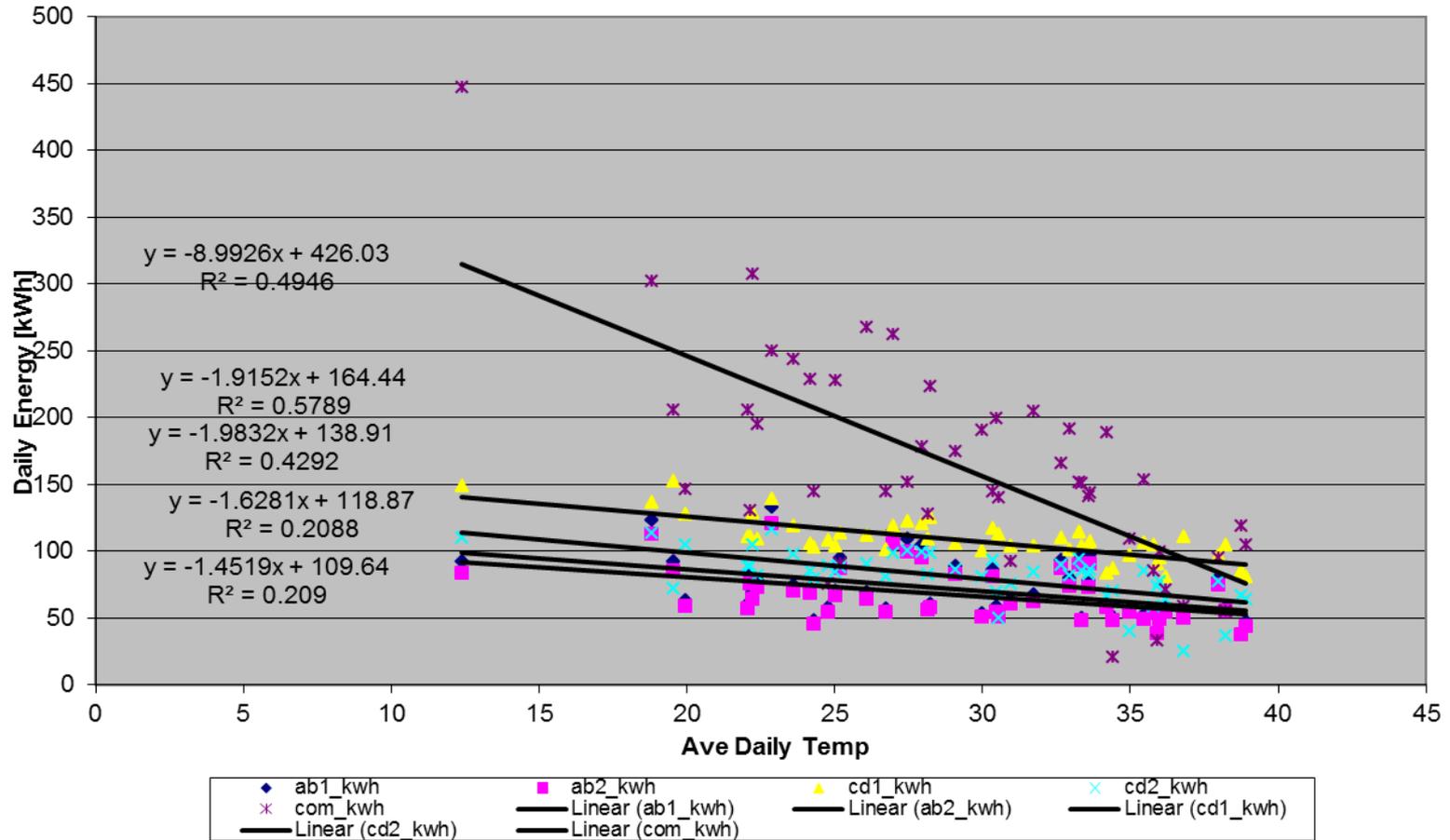


# Post Water Heater Use

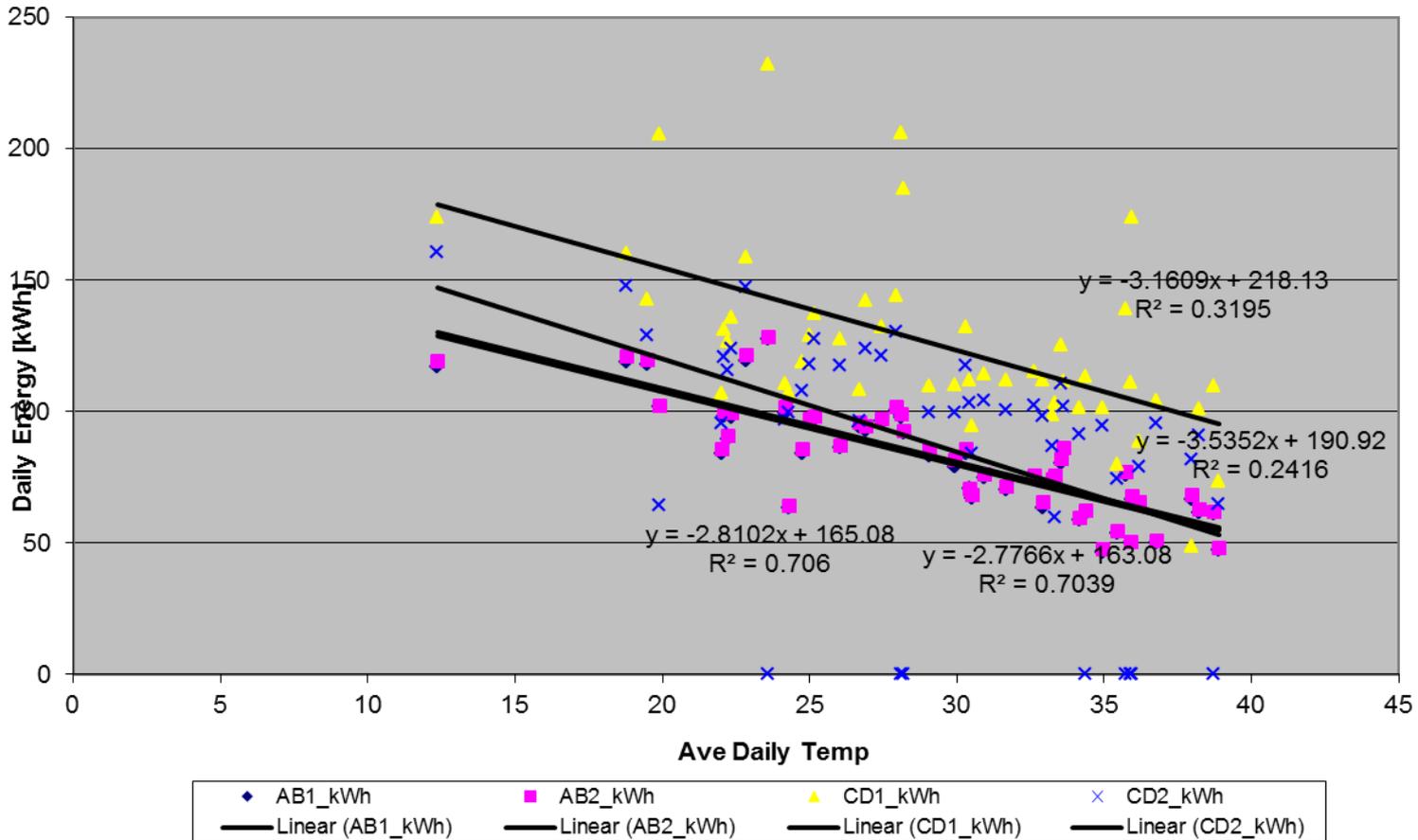




# Dorm #3 Energy Use



# Dorm #4 Energy Use

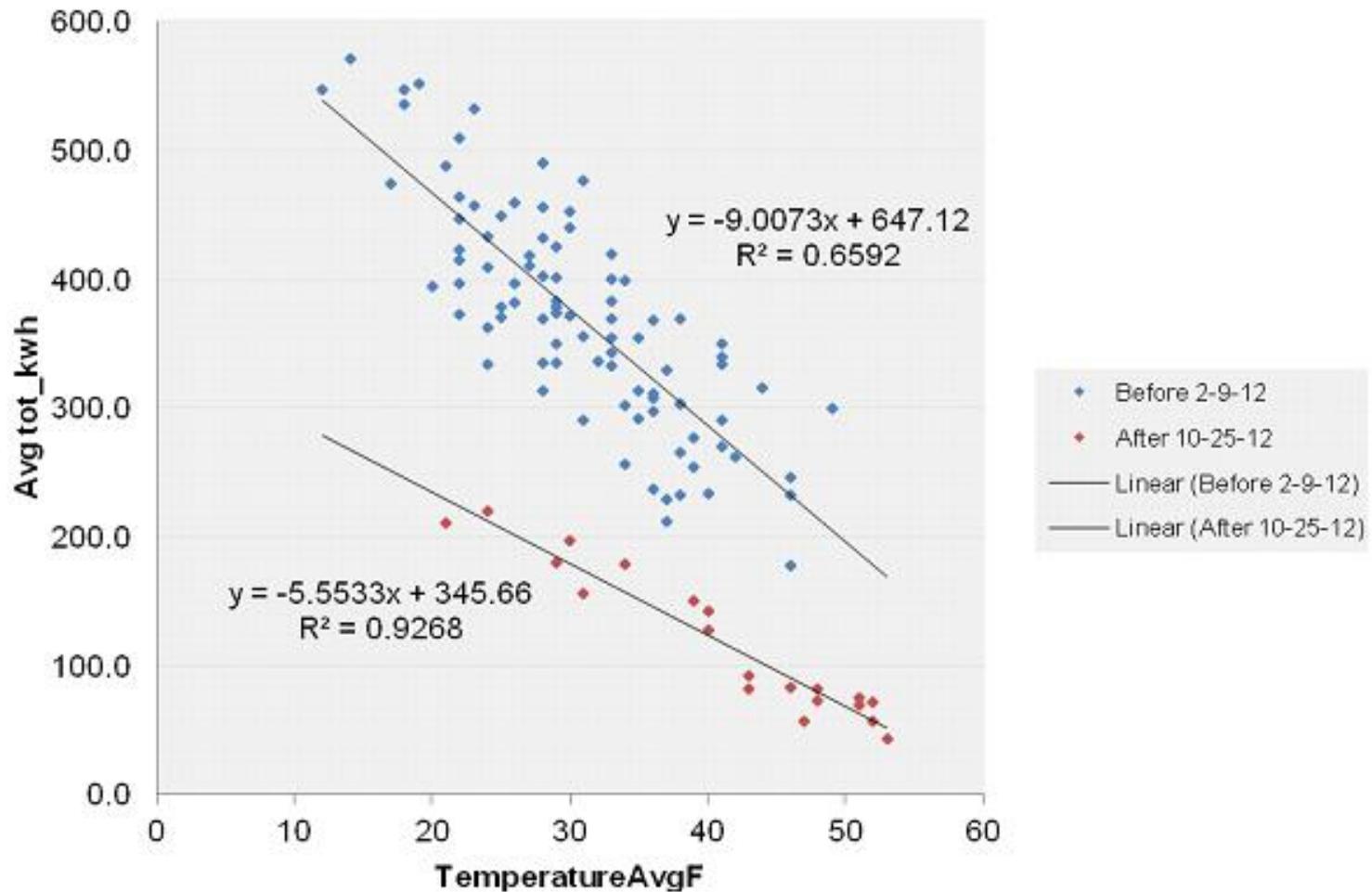








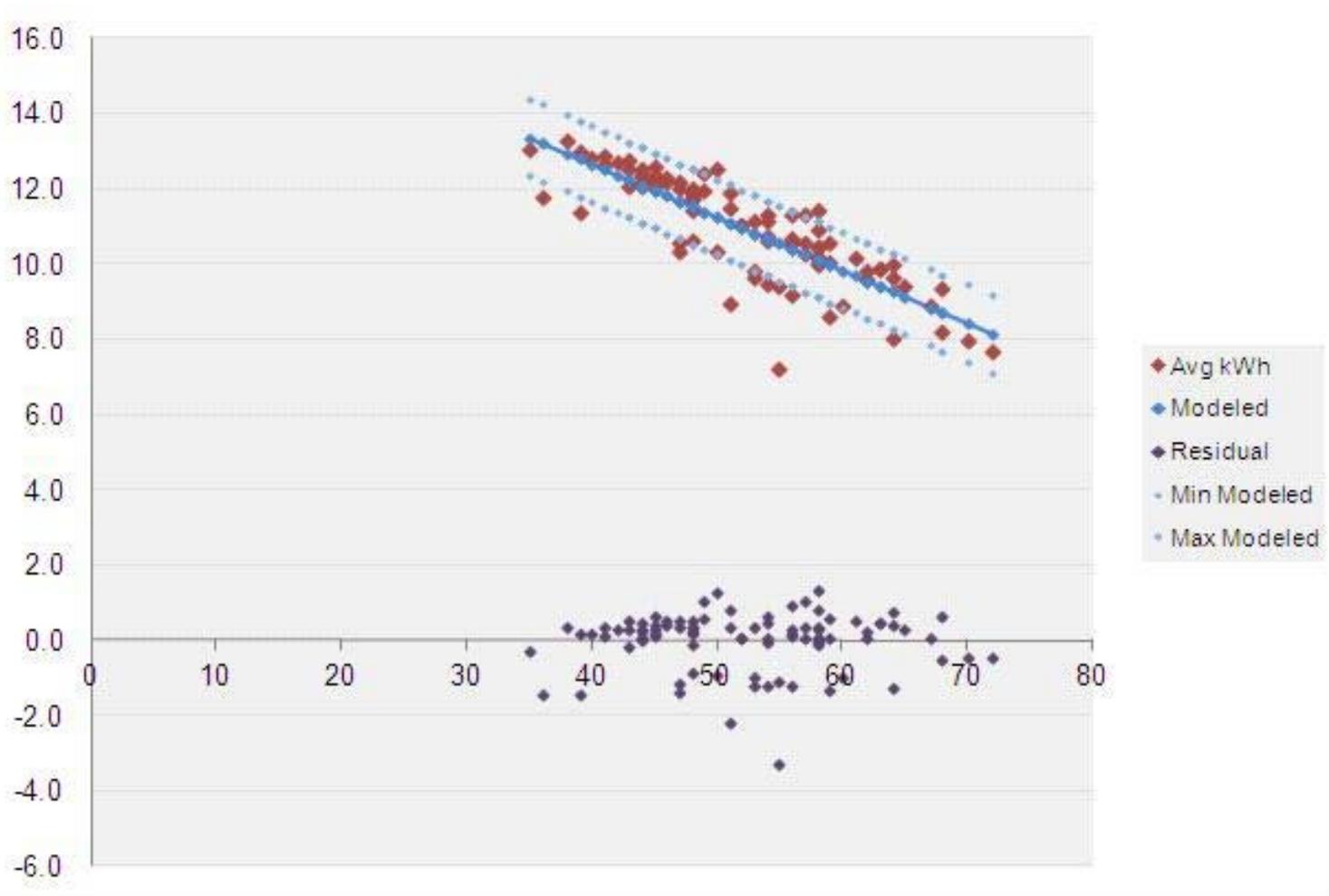
# Post Dorm Energy Use

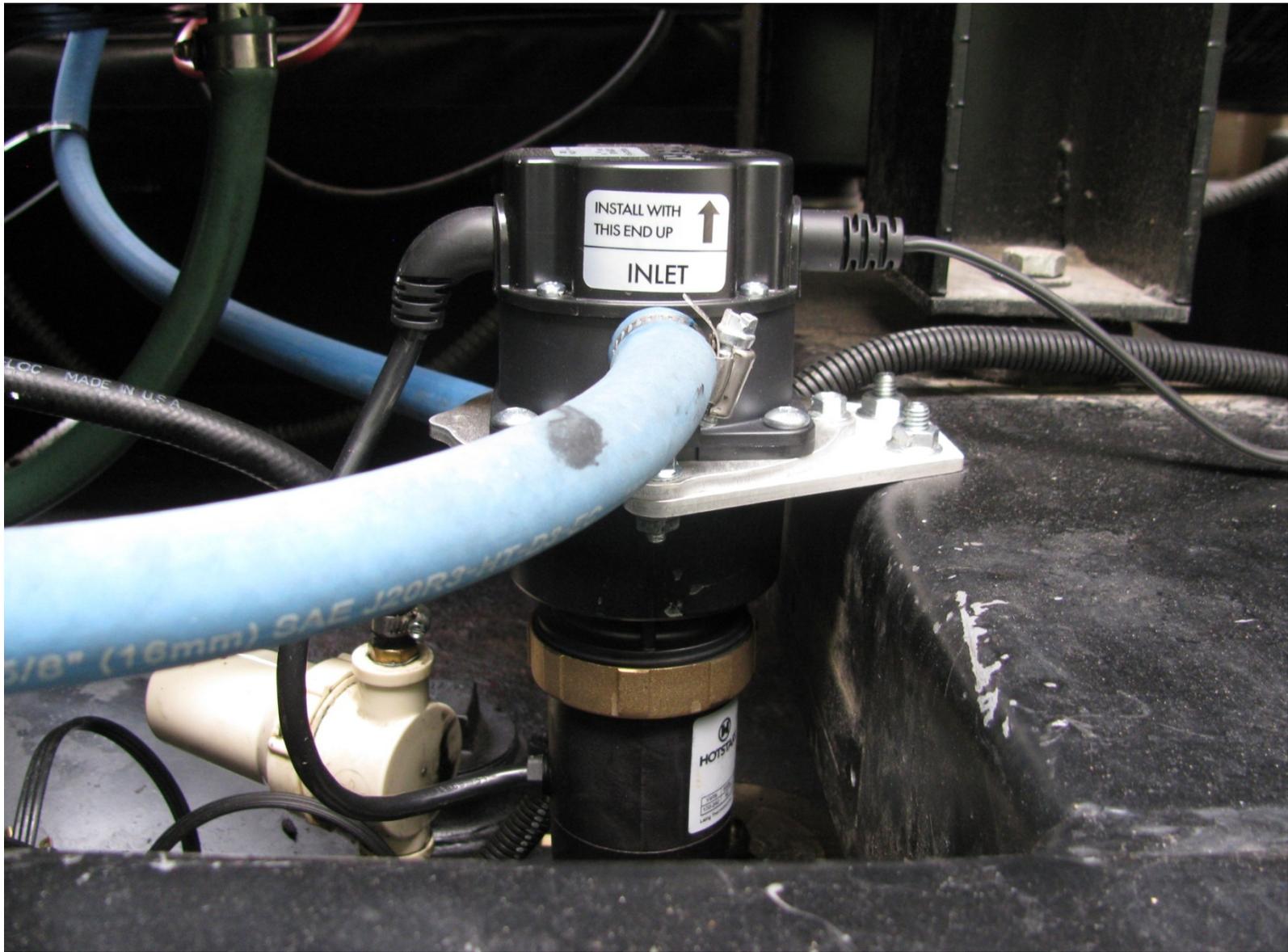




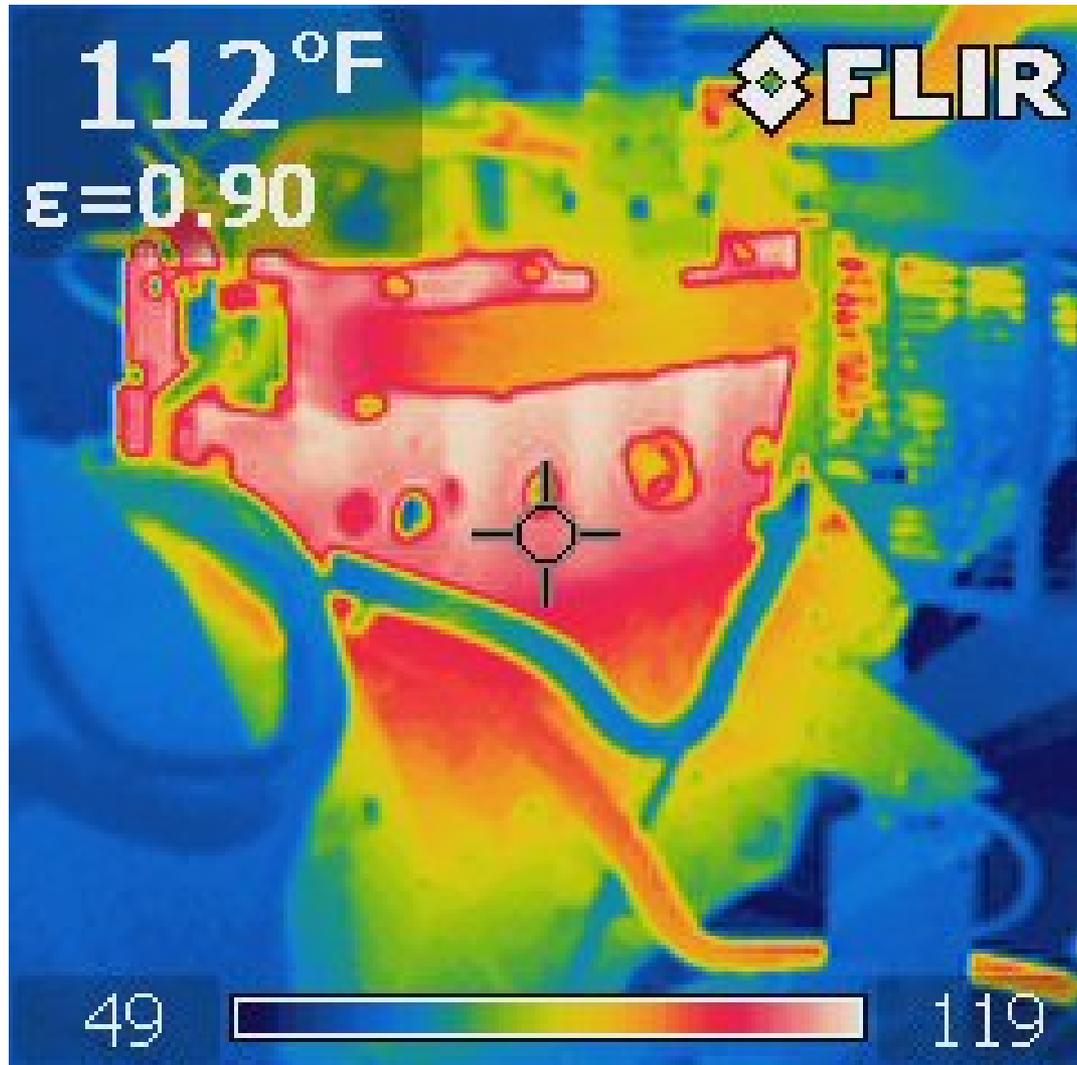


# Generator Block Heater Use

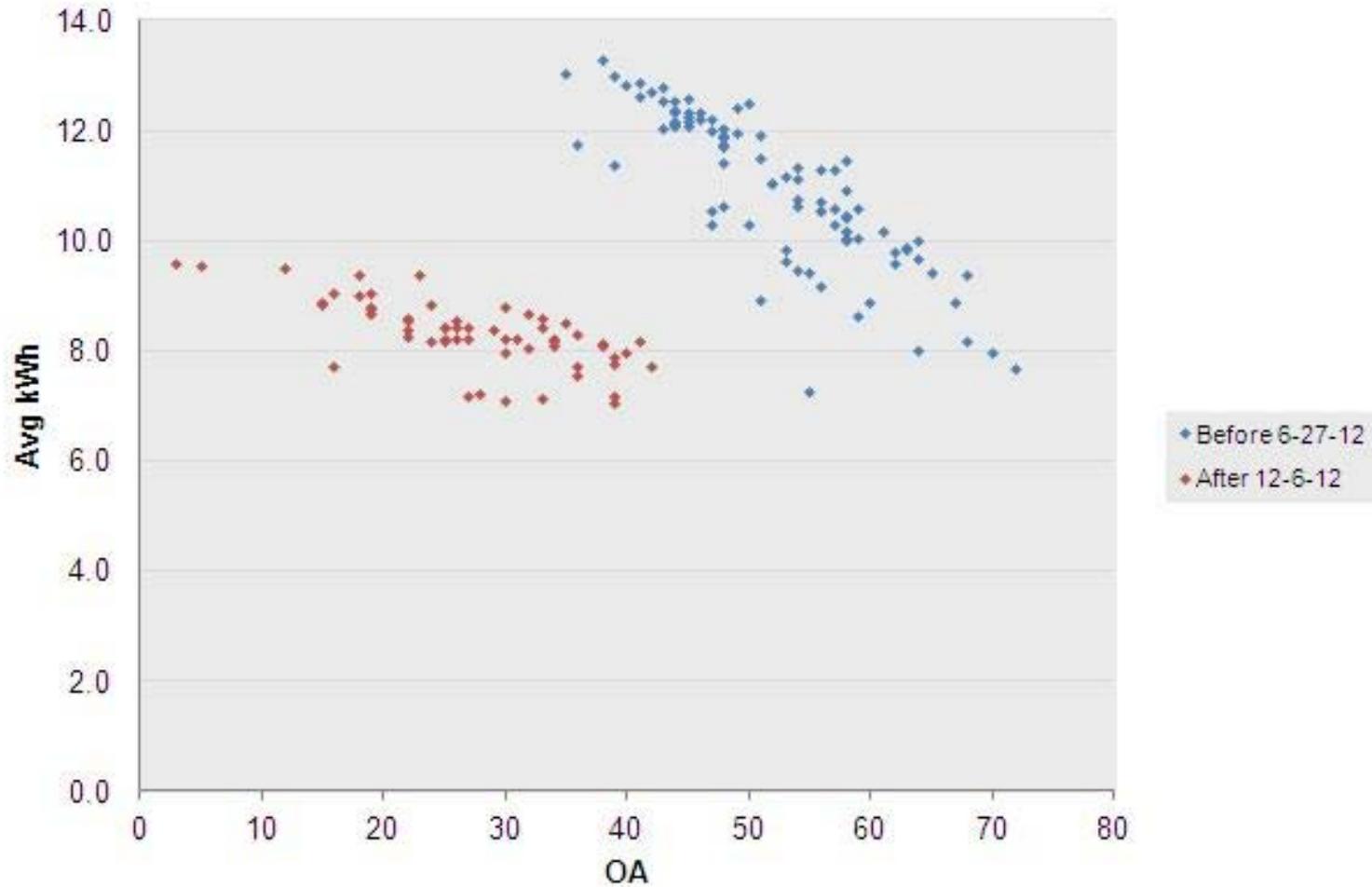




# IR Scan of Generator



# Post Engine Heater Use



# Contact

For more information, contact:

Jim Maunder

Manager of Member Services, Ravalli Electric Co-op

[jmaunder@ravallielectric.com](mailto:jmaunder@ravallielectric.com)

406-961-3001



# Running a Commercial Program on a Shoe String

**Presented by:**

Anne Bertino

Orcas Power and Light Cooperative

# Welcome to the Islands!!!

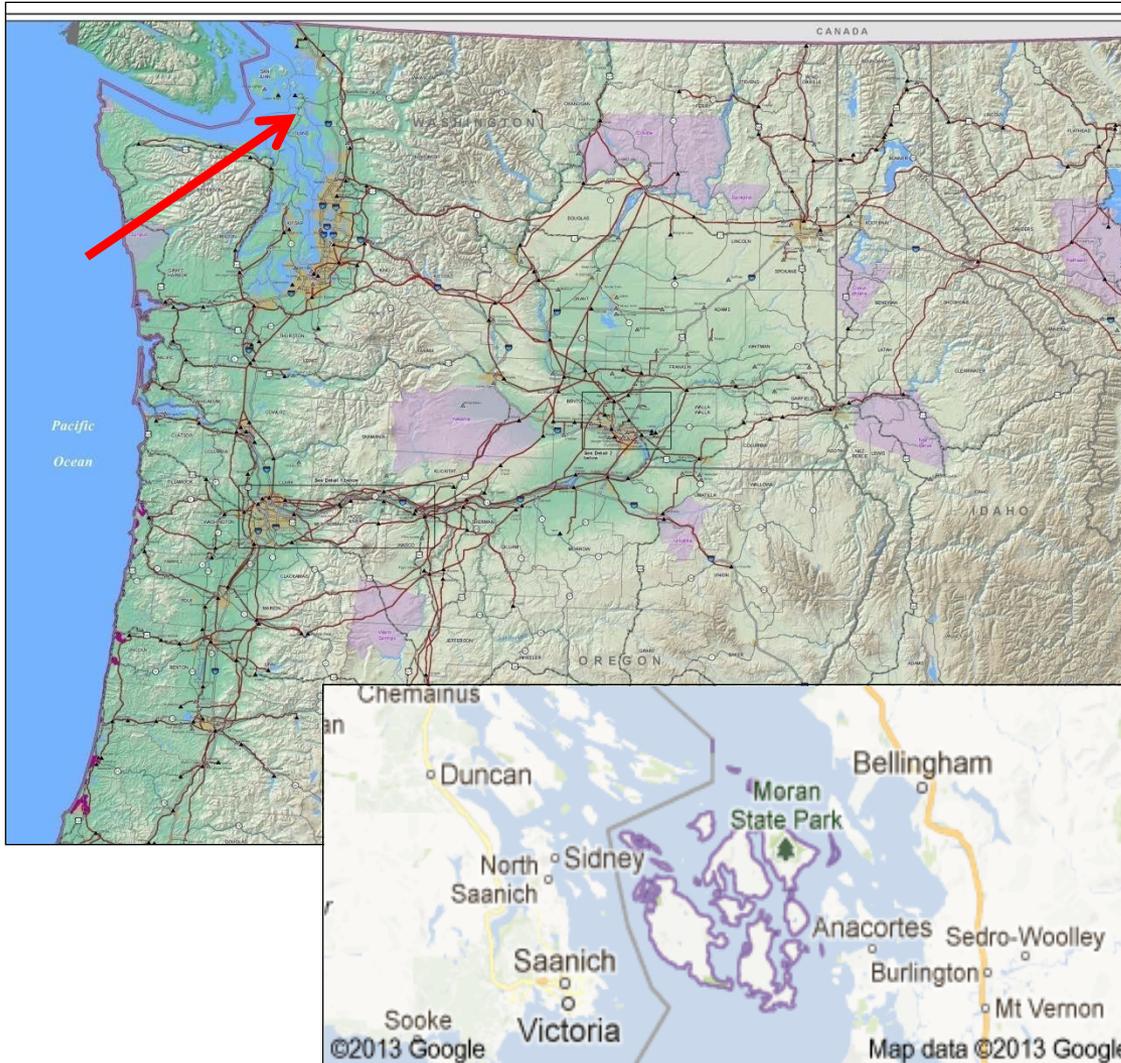
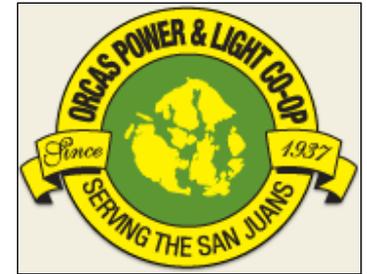


# Oops...Not those Islands

## These Islands -



# Orcas Power and Light Cooperative



## Facts:

- Established in 1937
- Small, rural, residential
- Population = 15,000
  
- Power to 20 islands
- Submarine cables
- 10 substations
- Peak load = 60MW
  
- AMR Meters = 13,672
- Residential = 11,952
- Commercial = 1,720

# Commercial Loads



2012 = 55,139,046 kWh

schools, banks, stores, marinas, restaurants, lodging (hotels, bed and breakfasts) establishments, medical facilities, county and state, some small scale manufacturing

Main industry is tourism (in the summer)

County government is largest employer

Avg. usage 33,000 kWh per year



# Energy Services Staff

Elisa



Anne



Who are these guys??

# EEI Budget



FY 2012 = \$244,203.55

FY 2013 = \$218,663.32

\$462,866.87

To ESG = \$55,000

Commercial Programs FY2012:

Incentives = \$71,694

Savings = 355,837 kWh



# Marketing Plan

Street corners, newspapers, online sites, bulletin boards, bill inserts, club meetings, county fair, blog



Collaboration with -  
San Juan County  
Chamber of Commerce  
NWTAN  
ESG  
(even ESI)

ORCAS POWER & LIGHT COOPERATIVE

Energy Services Rebates Assessments Renewables Projects Commercial Resources

Working Together through Energy Efficiency, Conservation and Renewable Energy

**Rebates = Money in Your Pocket**

OPALCO offers these **residential rebates** through Bonneville Power Administration's Energy Efficiency Programs. Please pay attention to the requirements as some of the rebates are for homes heated with electricity only. To get a rebate, follow the directions below. Some rebates require more paperwork than others! In general, if your rebate is less than \$100 it will show up as a credit on your bill. Rebates of \$100 or more will be issued as a check and sent in the mail. Please allow two weeks for rebate processing. Always feel free to [contact us](#) with any questions.

**REBATE FORMS**

If you're ready to go and just need the forms, you can find them right here. Otherwise, read on and learn more about OPALCO's available rebates.

[Appliance Rebate Form](#)  
[Insulation Rebate Form](#)  
[Window Rebate Form](#)  
[ETCS Air Sealing Rebate Form](#)  
[ETCS Duct Sealing Rebate Form](#)  
[ETCS Heat Pump Rebate Form](#)  
[Ductless Heat Pump Installation Rebate Form](#)

**APPLIANCE REBATES**

OPALCO is an [Energy Star Partner](#) to provide our members with the least energy efficient product information available. Before you make a purchase visit [www.energystar.gov](#) to look for energy star appliances. Currently, and good through 9/30/12, we offer the following appliance rebates: Energy Star **Refrigerators/Freezers**: \$15; **Energy Star Clothes Washers**: \$30, \$50 or \$70 if you have an electric water heater, \$20 if you have a gas water heater; **Electric Storage Water Heaters**: \$25.

[Get all the details on appliance rebates.](#)

Energy Services Rebates  
Appliance Rebates  
Heat Pump Rebates  
Weatherization Rebates  
Energy Assessments  
Renewable Generation  
Projects  
Commercial  
Resources  
Energy Services Blog

Questions about your ENERGY USAGE?  
[Contact Us](#)

# Challenges

1. Surrounded by water
2. Surrounded by water



# Commercial Lighting



## Airport Taxi Way

Non - Standard Deemed Measure

### **Upgrade:**

191 - 45W incandescent to  
15 W LED  
36 - 50W HID to  
15 W LED

**Busbar Savings:** 33,389 kWh  
**Incentive:** \$4,720.00

# Commercial Lighting



## Drug Store

Established in 1929  
Island historical building

### Upgrade:

100 – 4ft 2 lamp T12 to  
32W T8

56 – 8ft 4 lamp T12 to  
32W T8 de-lamping

**Busbar Savings:** 51,898 kWh  
**Incentive:** \$9,260.00

# Commercial Lighting



## Mechanical Shop

### Upgrade:

26 - 110W 8' HO T12's to  
4 lamp 32W T8  
7- 400W Metal Halide to  
6 lamp 32W T8

**Busbar Savings: 11,598 kWh**  
**Incentive: \$2,960.00**

# Commercial Lighting

We couldn't do it without you!



Jeff Anderson LC |Lighting Specialist  
NWTAN

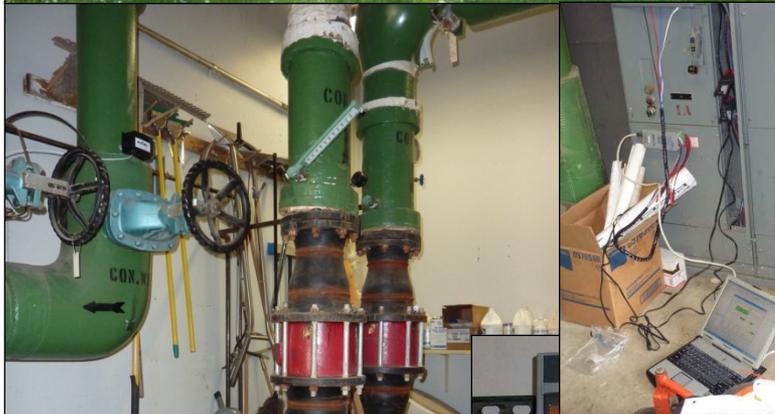


Eben Hedman  
NWTAN

# Custom Projects

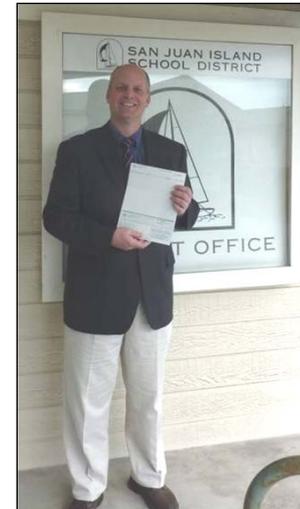


**Project:** Friday Harbor Elementary School  
VFD Pumps for HP Hydronic Loop  
**B/C Ratio:** 4.76



**Busbar Savings:** 118,674.74 kWh  
**Incentive:** \$15,743.97

**Project Costs:** \$22,491.39



# Custom Projects



**Project:** Orcas Emmanuel Episcopal Parish  
Shell Upgrades  
**B/C Ratio:** 3.39

**Busbar Savings:** 18,401.02 kWh  
**Incentive:** \$6,440.36

**Project Costs:** \$10,928.24



# Custom Projects

We couldn't do it without you!



BPA Seattle office Engineers hard at work!  
Tony Koch, Robert Weber, Eva Urbatsch

# Energy Smart Grocer



**Projects:** Canopy Lighting and Refrigeration

3 locations/2 islands

**Busbar Savings:** 159,431 kWh

**Incentives:** \$23,618

# Energy Smart Grocer

We couldn't do it without you!



Paul Given  
Account Manager  
PECI



May Au  
Project Coordinator  
PECI

# How do we do it?

1.

## OPEN TO ALL OPPORTUNITIES

“I’ve never heard of that but let me find out”

“We are not experts but we know where some are.”

“That’s interesting...maybe.”

“I doubt it but...”

“hmmm...”

2. WITH A LOT OF HELP FROM OUR FRIENDS



# Contact

For more information, contact:

Anne Bertino

Orcas Power and Light Cooperative  
Assistant Manager Energy Services

[abertino@opalco.com](mailto:abertino@opalco.com)

360-376-3571



# Running a Commercial Program on a Shoe String Budget

**Presented by:**  
Doug Purcell,  
Idaho Falls Power  
Commercial Energy Specialist



# *Idaho Falls Power*

## **Energy Service Programs**



Idaho Falls Power diversion dam on the Snake River  
Idaho Falls, Idaho

# Background

- Operated Energy Efficiency Programs continuously since 1982
- Began with BPA Rebate Programs
- Zero Interest Loan Program
- Average 2 million kWh savings for Commercial customers each year

# Popular Programs

- Commercial Lighting Retrofits
  - Retrofit T12 lighting with HP T8 Lamps & Ballasts
  - Retrofit HID lighting with CFL or LED
  - Controls
- Commercial Shell Upgrades
  - Increase Insulation Levels
  - Update Windows
- Unitary Air-Conditioning Equipment
  - Replace outdated rooftop units with new energy efficient models

# Custom Projects

- Primarily HVAC and motors
  - HVAC Pneumatic to Digital Controls
  - VFD's
- Any electric energy saving measure
  - If you think it will save power, we will take a look at it
- No job too large
  - We will provide any needed expertise
- An estimated kWh savings of 3.7 Million in current Custom Projects

# Success Stories

- *Non-Lighting Projects include:*
  - Key Bank
    - VAV replacement and controls – 294,451 kWh savings
  - School District 91
    - Heat pump and automation controls – 74,472 kWh savings
  - Wastewater Treatment Plant
    - VFD pump motor replacement – 70,474 kWh savings
    - Centrifuge replacement – 290,935 kWh savings
  - Idaho Falls Power
    - HVAC system - 114,000 kWh savings/year

# Success Stories

- In FY12, 63 business participated in the Lighting Program to save 2,124,450 kWh
  - Mostly small projects
    - The average lighting project saves between 5,000-10,000 kWh annually
- Idaho Falls has a lot of small businesses in older buildings
  - Programs offer help and support in making there buildings more energy efficient
  - Most of all helping them stay in business by lowering overhead costs
    - I believe a dollar saved is a dollar that can be spent somewhere else

# What's our secret?

- Trade Ally involvement!
  - 90% or more comes from outside sources
  - Good relationship with suppliers and contractors
  - Use your recourses.
- Go Green to get Green
  - Explain it in a language they can understand \$\$\$
  - As painless as possible
- Loan Program
  - 5 year interest free loan
    - Up to \$50,000 (for qualifying customers)

# Contact

For more information, contact:

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