

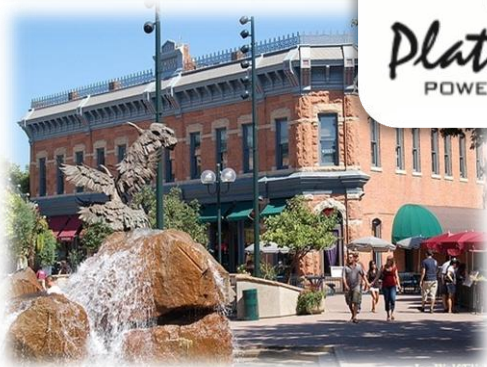
*Estes Park*



*Longmont*



*Fort Collins*



*Loveland*



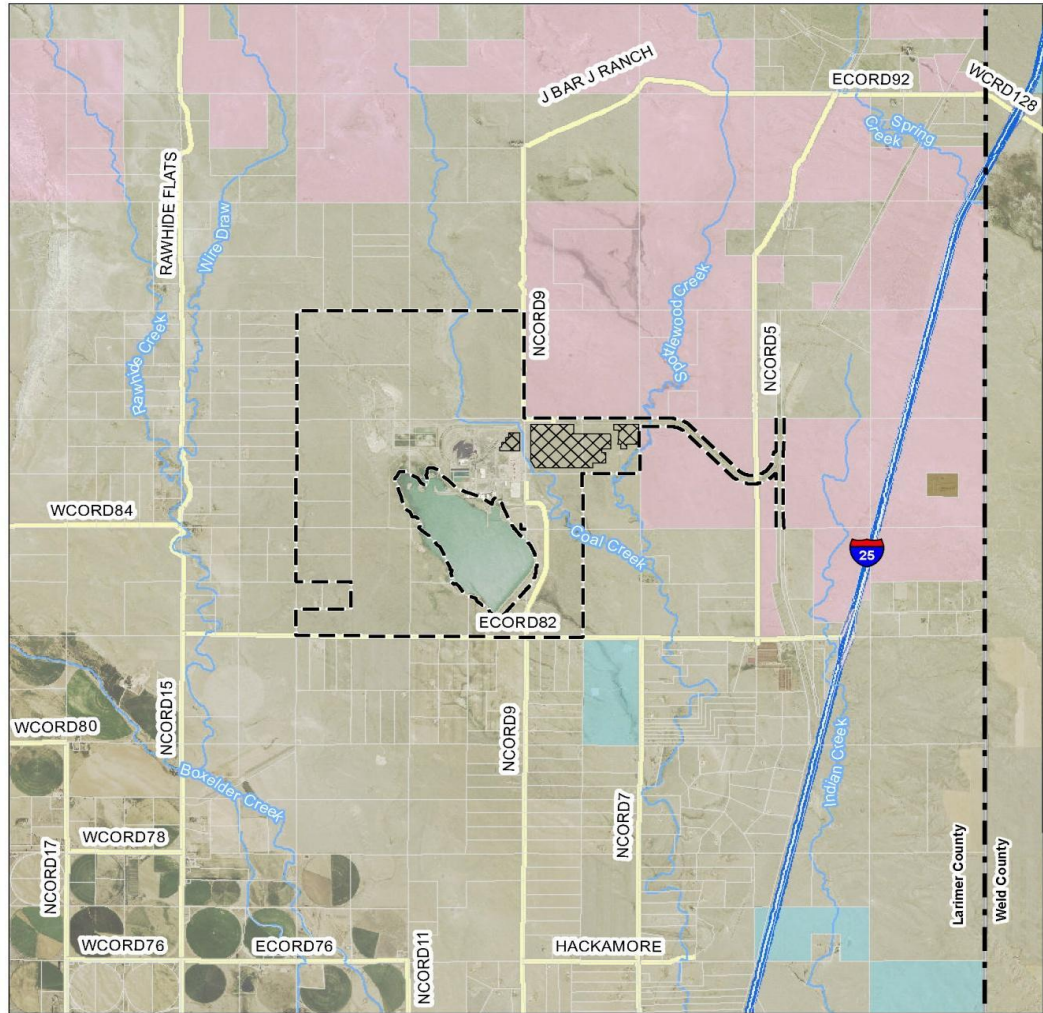
# RAWHIDE SOLAR PROJECT

Loveland Utility Commission  
December 2014

# Strategic Plan Initiative – Diversified Portfolio

- Reduced carbon footprint:
  - ✓ CO<sub>2</sub> emissions – 20% reduction by 2020 as a guideline (80% by 2050)
- Expanded use of renewable resources:
  - ✓ Colorado Standard (qualified sources) – 20% by 2020 as a guideline
- Maintain high reliability
- Remain lowest cost wholesale supplier in Colorado

# Rawhide Solar Vicinity Map



Source: Land Jurisdiction  
provided by Colorado State  
University COMaP (2011);  
NAD 1983, UTM Zone 12

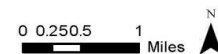
## Key

- Solar Facility Conceptual Layout
- PRPA property boundary
- Parcels

## Land Jurisdiction

- Private
- Federal (BOR, FWS, NPS)
- State
- Local

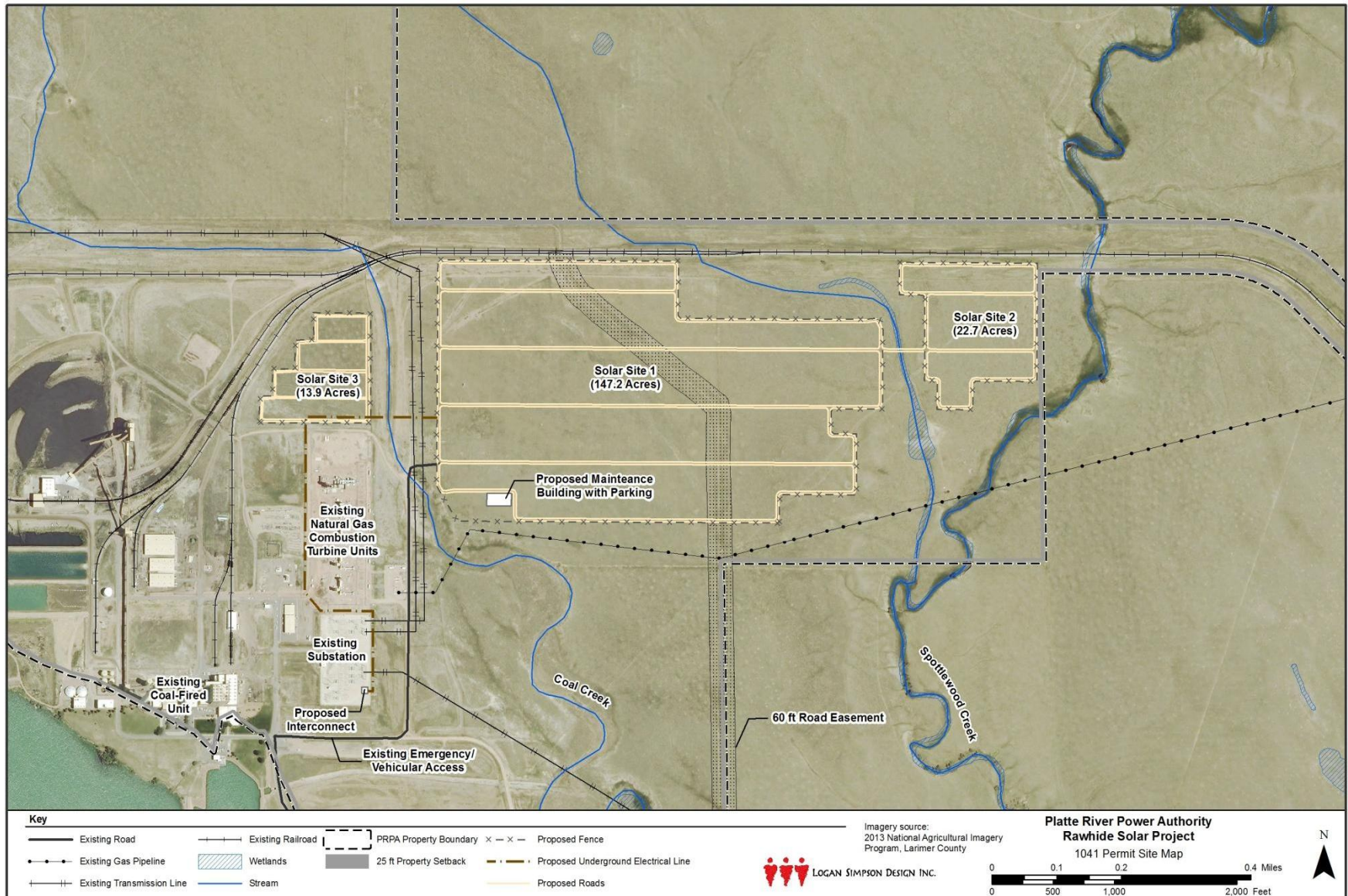
## Platte River Power Authority Rawhide Solar Project Vicinity Map



LOGAN SIMPSON DESIGN INC.



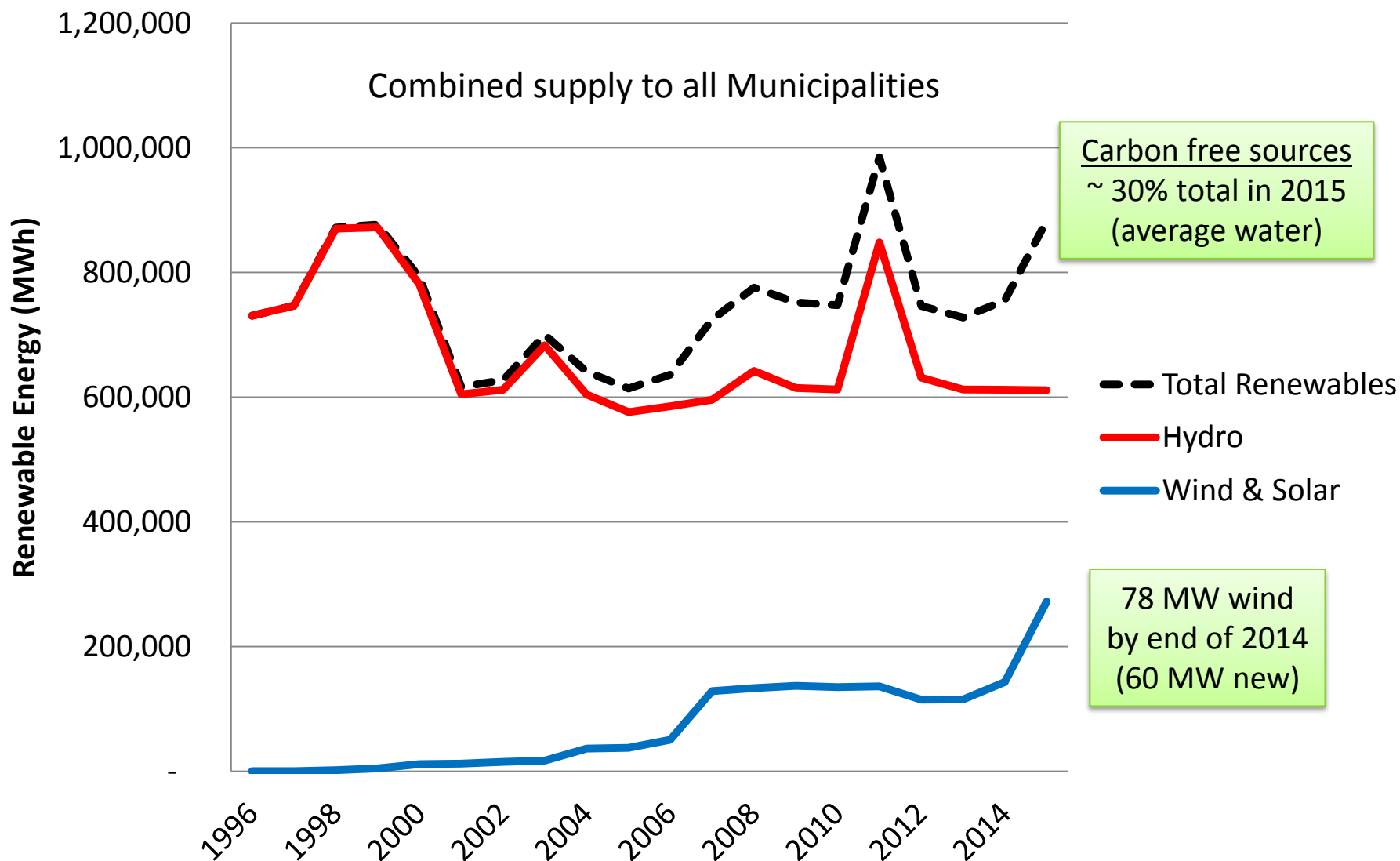
# Rawhide Solar Proposed Site Map



# Rawhide Solar Proposed Site

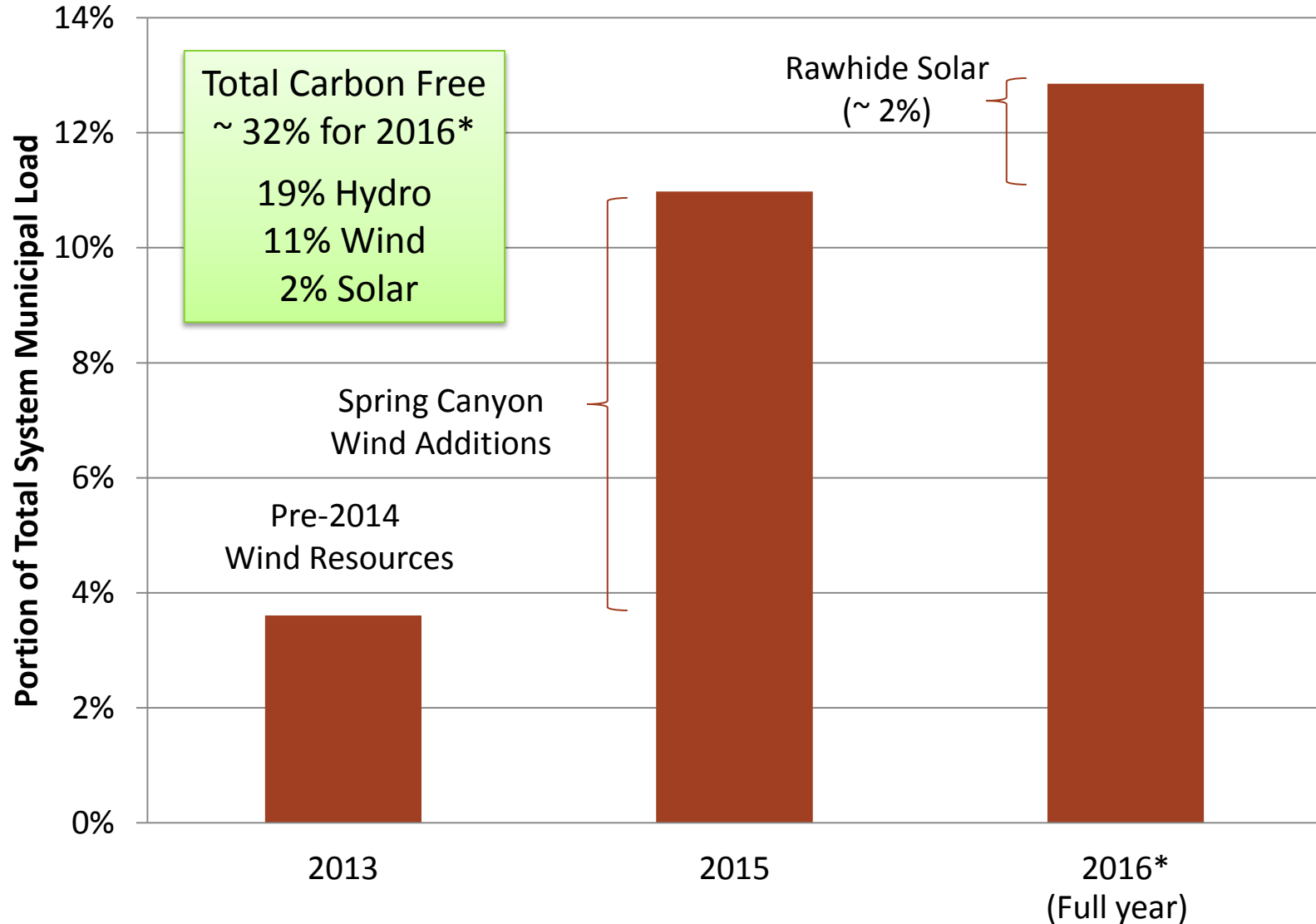


# Renewable Energy Source Trends

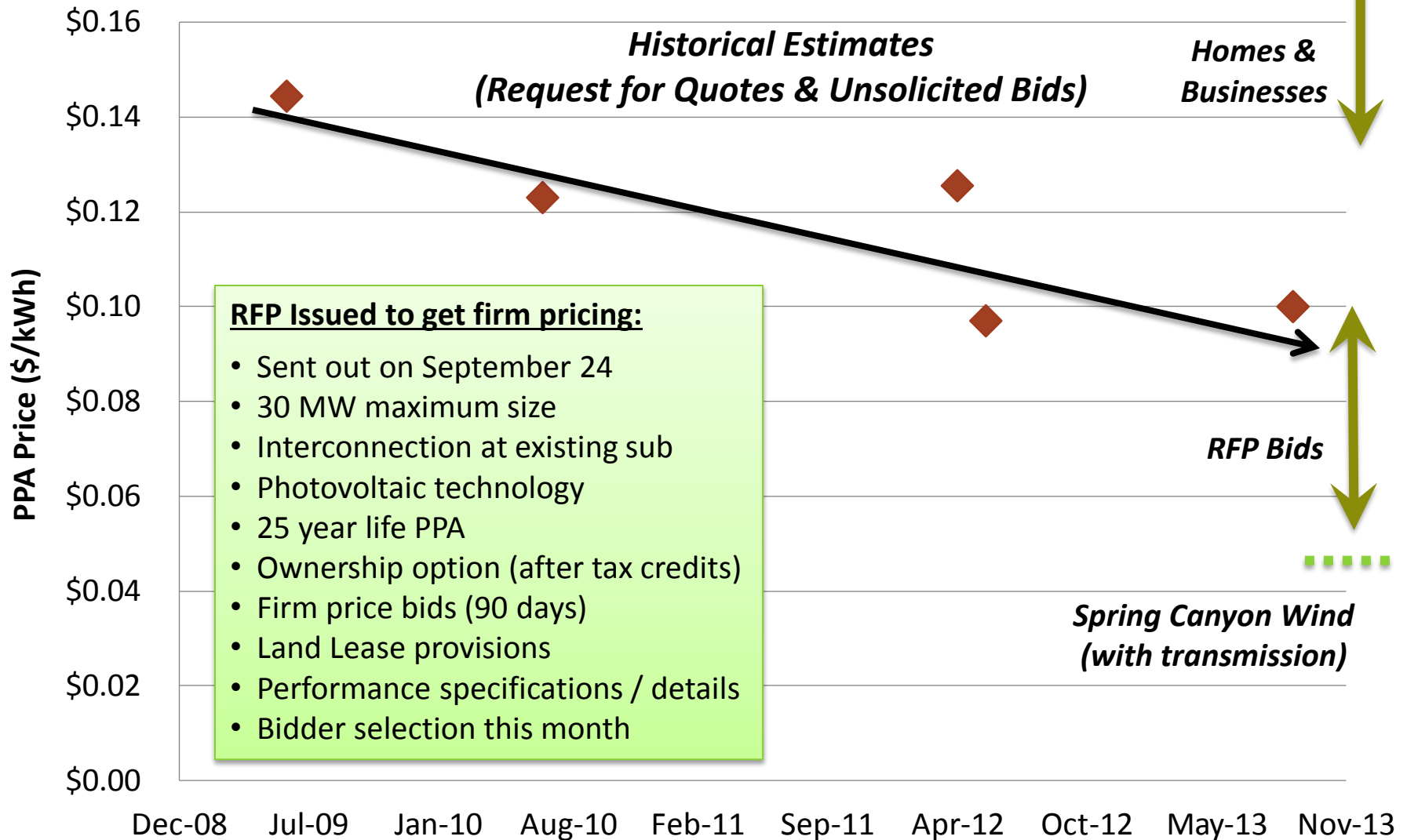




# Colorado RES Qualified Supply

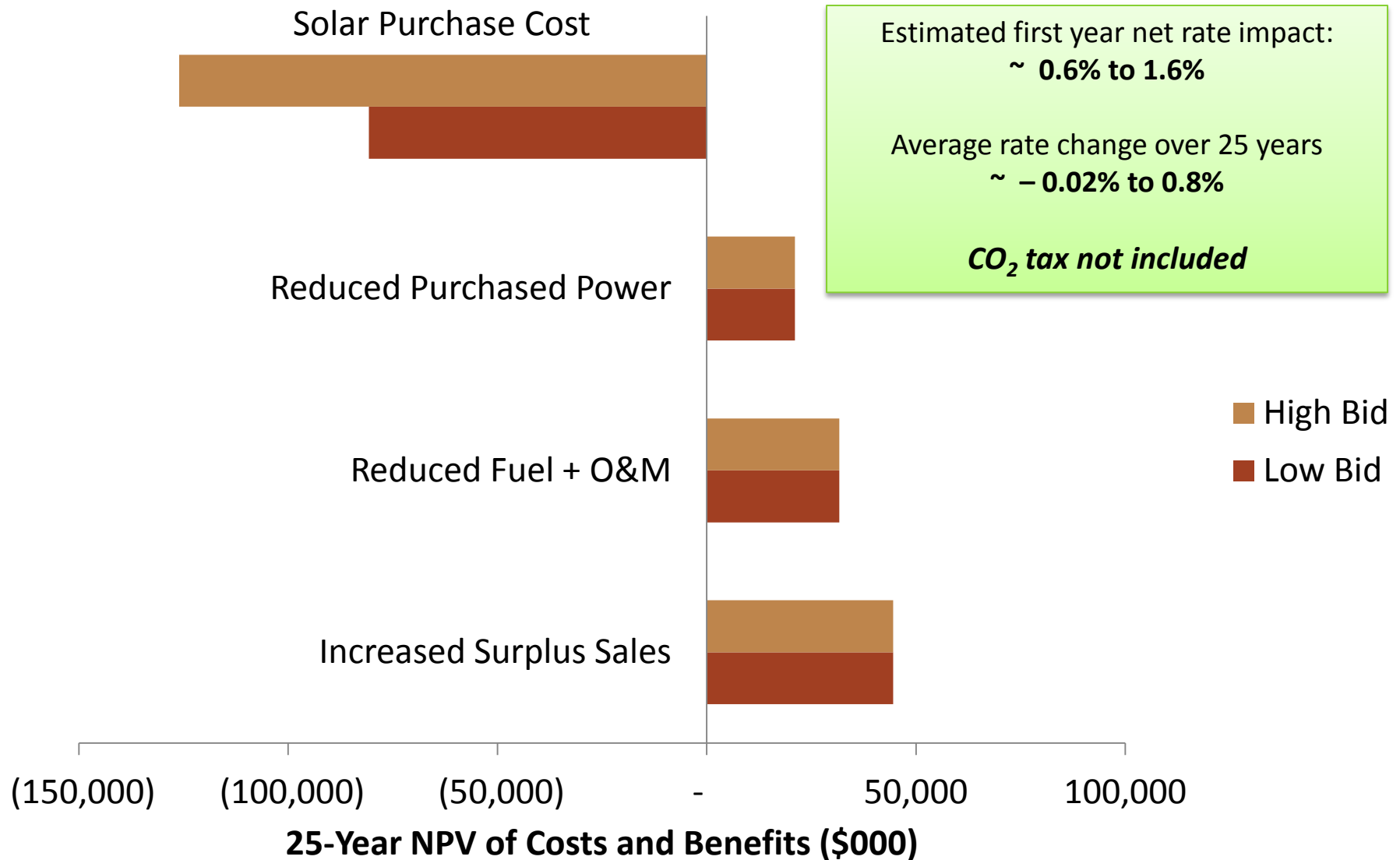


# Rawhide Site Solar Prices





# Cost/Rate Comparisons



# Other Considerations

- Cultural resources study:
  - Started December 4 (being performed by our consultant)
  - Final reports expected in January
- County road / access:
  - Reroute of County Road 9 / possible conversion to private road
  - Positive initial conversations with Larimer County staff
- Mineral interest owner requests
- Retail electric supply
- Future site expansion:
  - Transformer sizing
  - Other leverage

## **1041 Permit Initiated (Larimer County):**

- Application accepted in September
- Planning Commission review Nov 19
- Approved by County Commissioners on December 8

# Comparison – Benefits & Costs/Risks

## Rawhide Solar Project

### Benefits

- Attractive bids – good timing
- No transmission charges
- Utilizes ITC before expiration
- Fixed (known) energy pricing
- Reduced CO<sub>2</sub> emissions / risk
- Increases non-hydro renewables (~2% additional supply)
- Available for CO RES compliance
- More predictable than wind
- Increases renewables diversity

### Costs/Risks

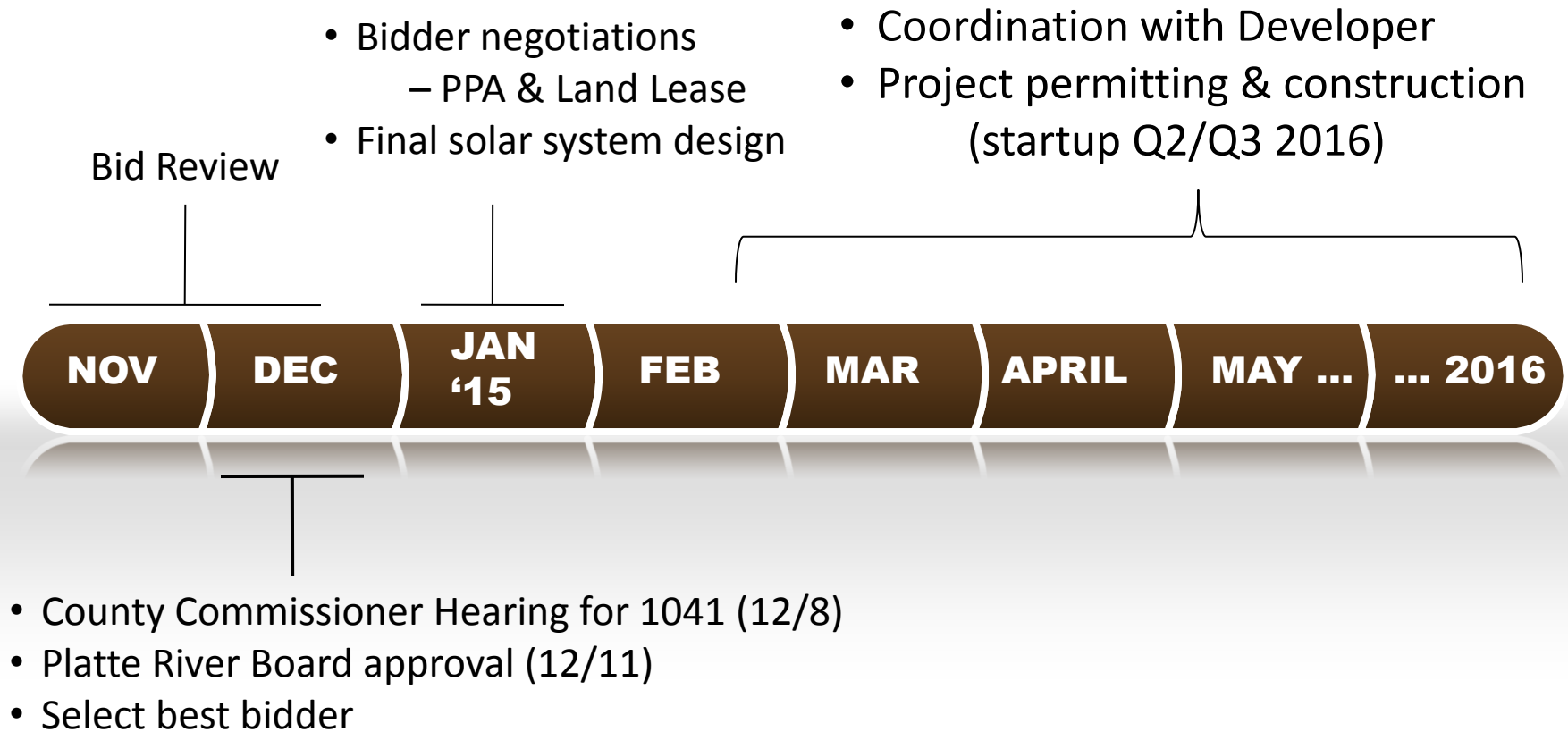
- Rate increase in 2016\*  
0.6% to 1.6% – wholesale  
0.4% to 1.1% – average retail  
(lower long term impact)
- Variable ancillary services charges over time
- Counterparty risk (developer)
- Rawhide site use risk (minor)
- Some resource variability remains (with no operational concerns)

# Future Solar Considerations

- Continued collaboration – municipalities & Platte River:
  - Renewable programs coordination “team”
  - Regional market research
    - Customer interest(s) – what do customers want / willing to pay?
  - Joint products and services?
    - Possible joint program design / implementation
    - Products / pricing / promotion / placement
- Market developments / drivers:
  - Regulatory requirements (e.g. CO RES)
  - Proper accounting of solar value and cost recovery
  - Incentives vs. value to electric system (e.g. net metering)
- Integration of new solar into future IRP



# Anticipated Schedule



# QUESTIONS/DISCUSSION