

# City of Boulder, Colorado

## Independent Expert Findings Review & Verification of Modeling of New Electric Utility

# PowerServices Team

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# Objective

- ❑ Independently verify the City's modeling (Base Materials) of the creation of a new electric utility
- ❑ Determine whether Base Materials demonstrate conditions prerequisite in Section 178(a) of the Boulder Home Rule Charter

# Section 178(a) Boulder Home Rule Charter

## Conditions Prerequisite:

- ❑ Rates do not exceed those rates charged by Xcel Energy at the time of acquisition
- ❑ Rates produce revenues sufficient to pay for operating expenses and debt payments, plus an amount equal to twenty-five percent (25%) of the debt payments
- ❑ Reliability is comparable to Xcel Energy, and
- ❑ A plan for reduced greenhouse gas emissions and other pollutants and increase renewable energy

# Review Process

- ❑ Evaluated Base Case materials provided to Council on February 26<sup>th</sup> and April 16<sup>th</sup>
  - Study Session materials including municipalization model process, assumptions, and inputs
  - Key findings and conclusions of modeling results
- ❑ Accepted Boulder's assumptions for Acquisition and Stranded Costs

***Not A Simple Audit Process***

# Review Process

- Assessed Independent Components
  - Purchased Power Cost and Options
  - Carbon Tax Assumptions
  - O&M Cost
  - Separation & Reintegration Cost
  - Debt Service
  - Xcel Cost and Retail Rates

# Review Process

- Analyzed Financial Model & Inputs
  - HOMER and Generation Costs
  - Load Profiles
  - Revenues / Costs
  - Options / Risk
  
- Over 20 Separate Conferences
  - Energy Future Team
  - HOMER Representatives
  - Boulder Staff and City Manager

# Review Process

- ❑ Dozens of Reports/Filings Reviewed
- ❑ Peer Data Compilation and Comparison
- ❑ Successful Acquisition Model Data Comparison
- ❑ Reviewed for Comprehensiveness and Reasonableness
- ❑ Refinements and Enhancements Provided to Staff
- ❑ Analysis Does Not Assume or Predict Future Model Outcomes

# Key Evaluation Areas

- Achievement of Charter Metrics
  1. Debt Service Coverage Ratio (DSCR)
  2. Reliability
  3. Reduced GHG Emissions and Increased Renewables
  4. Rates at Time of Acquisition

# Debt Service Coverage Ratio (DSCR)

- Financial model designed to solve for DSCR and meets metric in all scenarios
- Achieves DSCR goal of 1.25 and prioritizes 1.65 over long term
- DSCR of 1.25 provides opportunity for:
  - ✓ Lower retail rates
  - ✓ Additional GHG reductions/increased renewables

# Reliability - Wholesale

- Expected to be comparable
- Final Transmission Impact Studies will confirm model assumptions
- Meet FERC/NERC Standards

# Reliability - Retail

- Present design comparable and more robust
- Staffing and equipment comparable to:
  - ✓ Public Power utilities of similar size (RP3)
  - ✓ On a per customer basis
- Exceeds comparable IEEE Std. 1366, Quartile 2

# GHG Reductions & Renewables

- Every scenario prioritizes and meets the metric
- Model constraints optimize renewables/energy efficiency and natural gas
- More GHG reduction results in higher retail rates

# Retail Rates – Day 1

- Rates at time of acquisition do not exceed the forecasted Xcel rates
- Bolstered by:
  - ✓ Ability to defer debt payments—common practice
  - ✓ Potential lower capital requirements
- 1.25 DSCR level provides rate parity over longer term
- Our independent modeling shows lower cost per kWh each year
- Carbon assumptions influence results

# Conclusion

- ❑ Base Case materials and City Demonstration Models confirm that Section 178(a) of Boulder Home Rule Charter metrics can be met
- ❑ Recommended model updates and refinement to improve risk evaluation
  - Carbon tax excluded
  - Litigation advice associated with separation
- ❑ PPA costs ultimately drive DSCR and competitive retail rates

# Conclusion

QUESTIONS?



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