



**CITY OF BOULDER
CITY COUNCIL AGENDA ITEM**

MEETING DATE: Nov. 15, 2012

AGENDA TITLE: Consideration of a motion to approve the Municipalization Charter Requirement Metrics.

PRESENTERS

Jane S. Brautigam, City Manager

Paul J. Fetherston, Deputy City Manager

Heather Bailey, Executive Director of Energy Strategy and Electric Utility Development

Jonathan Koehn, Regional Sustainability Coordinator

EXECUTIVE SUMMARY

In November 2011, Boulder voters authorized City Council to establish a light and power utility *only* if it can demonstrate (and have verified by a third-party independent expert) that the utility would be able to meet four requirements prior to its creation.

While the Charter language provides the requirements to be tested, it does not include the specific metrics or quantitative measures that will be used. To develop draft metrics, the city assembled an ad-hoc community group with a diverse set of perspectives. A list of participants is included as **Attachment A**. The group met twice to refine the draft metrics. The draft metrics were discussed at the Aug. 28 Study Session, Oct. 9 Energy Roundtable and Oct. 16 City Council meeting. In addition to input from this community group, staff has received individual public comments on the metrics, which are also included later in this memo. Staff is asking council to approve the metrics as presented.

BACKGROUND

Phase I of the municipalization exploration project work plan focuses on the specific tasks necessary to determine whether the Charter requirements to create a local electric utility have been met. In general, Boulder wants to *ensure that residents, businesses and institutions have access to a reliable energy supply that is increasingly clean and competitively priced.*

In early 2011, Boulder's Energy Future goals were further defined through the development of a strategic framework that allows for evaluating energy options based on the community's values. These goals enumerate the distinct, tangible outcomes important to Boulder. These have helped inform the evaluation of various proposals and options, including municipalization. The six goal areas include:

- Ensure a stable, safe and reliable energy supply
- Ensure competitive rates, balancing short-term and long-term interests
- Significantly reduce carbon emissions and pollutants
- Provide energy customers with a greater say about their energy supply
- Promote local economic vitality
- Promote social and environmental justice

These goals guide city staff's work to develop a coordinated and viable strategy; however, when voters supported the continued exploration of municipalization they (and City Council) emphasized the need to set specific parameters that must be met to move forward towards creating a local electric utility.

The Charter provisions related to a possible Light and Power Utility are summarized below, and the full Charter language in Article XIII, Section 178 is included as **Attachment B**.

The Charter provisions set the floor such that if they cannot be fulfilled, municipalization would not occur. This memo summarizes progress toward setting metrics related to the Charter provisions. These metrics are the threshold requirements that must be fulfilled for municipalization to occur. Because they reflect the Charter provisions, they do not incorporate every measure or variable that will be evaluated on the path to determine the feasibility of municipalization. Notably, they also do not include aspirational targets. They should be thought of as a means of eliminating municipalization strategies that would not meet the Charter provisions so that focus can be directed toward the most viable option or options. Importantly, while the Charter articulates the conditions under which municipalization is possible, the Energy Future goals describe the conditions under which it is also desirable. Therefore, future research will attempt to quantify how municipalization could lead to risks or opportunities related to the Energy Future goals.

The metrics were brought to council for approval on Oct. 16. Due to questions raised by council and the public, staff pulled the item and rescheduled it for a public hearing on Thursday, Nov. 15.

STAFF RECOMMENDATION

The following metrics have incorporated additional language for reliability and defined specific terminology to further clarify metric calculations (**Attachment C**), in response to feedback from both council and the public. The team is recommending that council adopt the following Charter metrics to provide a minimum test or baseline that must be met in order to be considered by council. Staff recognizes that just meeting a baseline metric does not necessarily mean the city

should municipalize; therefore, strategies presented in the first quarter of 2013 also will need to show the additional value and tradeoffs over and above the baseline Charter metrics. The following chart captures the proposed baseline metrics, as they relate to the Charter requirements.

Charter Requirement	Proposed Metric	Comments
Rates do not exceed rates charged by Xcel at time of acquisition	Average cost per kilowatt hour (kWh) of electricity by class as provided by Xcel (residential, commercial and industrial) compared to Xcel's average cost per kWh at time of acquisition	<p>The average cost is calculated using the utility's annual revenue requirement divided by the most recent annual kWh projections provided by Xcel. The revenue requirement includes all elements that are currently included in rate-payer costs, such as operations & maintenance, incentives, fuel costs, purchased power, and capital costs (debt service).</p> <p>Due to the inability of city staff to obtain key rate calculation inputs, such as kWh (energy) and kW (demand) by rate class and tariff, rate comparisons by rate schedule cannot be calculated. These inputs, along with the methodology Xcel uses to allocate costs and calculate rates currently are unavailable. The breakdown of total revenues and kWh between residential, commercial and industrial are currently the only level of detail available at this time.</p> <p><i>Note:</i> If cost allocation by rate class data is available from Xcel, the city would try to model at that level.</p>
Rates produce revenues sufficient to pay for the new utility's operating expenses and debt payments plus an amount equal to 25% of debt payments	Debt service coverage ratio (DSCR) will be measured by dividing net annual operating income by the total annual debt service, using a standard rating agency methodology.	DSCR is measurement of a utility's ability to generate enough revenue to cover the cost of its debt payments. It is calculated by dividing the net operating income by the total debt service. The Charter requires that the new utility have a DSCR of 1.25, meaning that it generates 25% more revenue than required to cover its debt payment. This is a standard metric used by all rating agencies who evaluate municipal utility bonds. Staff will work with the city's financial advisor to develop a calculation of DSCR that will meet the rating agency requirements.

<p>Reliability comparable to Xcel</p>	<ol style="list-style-type: none"> 1. Maintain comparable electric equipment, facilities and services as those of Xcel at time of acquisition, which will be designed to achieve the same System Average Interruption Duration Index (SAIDI) of 85 and a System Average Interruption Frequency Index (SAIFI) of .85, which is slightly better than the Xcel four year average for the Boulder region. 2. Maintain an adequate reserve margin of 15%; and 3. Meet applicable North American Electric Reliability Corporation (NERC) compliance requirements 	<ol style="list-style-type: none"> 1. “Comparable electric equipment” means the purchased or installed electric utility equipment and configuration provides the same level of reliability (redundancy and system protection) as the equipment currently owned and operated by Xcel for the area identified for municipalization. 2. “Comparable services and facilities” includes providing experienced and professional management of the local utility grid, including ongoing investment in maintenance and system improvement, and a strong customer-service ethic and partnerships to respond to emergencies, daily maintenance and long-term grid investment. 3. The SAIDI and SAIFI metrics are based on Xcel’s four year average for the Boulder region. This includes more than the city of Boulder and discrete metrics for the city are not available. Without understanding the condition of the system and its performance, the selection of an average seemed to be a reasonable measure. 4. A reserve margin or “reserve capacity” is an amount of electricity capacity above the anticipated load. 15% is the accepted industry practice. 5. NERC is the electric reliability organization (ERO) certified by the Federal Energy Regulatory Commission to establish and enforce reliability standards for electric utilities.
<p>A plan to reduce greenhouse gas (GHG) emissions and increase renewable energy</p>	<p>A short-term plan (5 years) demonstrating that emissions will be reduced, as calculated based on metric tons equivalent, and that renewables will be increased</p>	<p>The specific metrics for showing measurable reductions will minimally include metric tons of carbon dioxide equivalent (mtCO₂e), which is used to convert all GHGs, such as CO₂ and CH₄, into a single measure. The plan will address emissions of other pollutants</p>

	<p>proportionally beyond the levels that would have been otherwise achieved by staying with Xcel at the time of acquisition.</p> <p>A long-term plan (20 years) will demonstrate that the city's carbon intensity¹ from electricity in its portfolio will be less than Xcel's, and renewables (as a proportion of the resource mix) will be greater than Xcel's.</p>	<p>associated with generating electricity. The reductions will include, for both the city and Xcel the impacts of energy efficiency and demand response programs.</p> <p>Given that reductions are to be made over time, the comparison to Xcel must use the same load growth assumptions Xcel is using to define its future resource requirements and portfolio before energy efficiency or demand response adjustments.</p>
--	---	---

Suggested Motion Language:

Staff requests council consideration of this matter and action in the form of the following motion:

Motion to approve the Municipalization Charter Requirement Metrics.

DISCUSSION

Many of the issues raised, and much of the discussion of the metrics, centered on whether these metrics are sufficiently inclusive and specific enough to inform council as to whether the city should municipalize. To briefly summarize, the metrics are based on the Charter provisions only and will be used to establish a floor or baseline that must be met before the city can move forward with municipalization. The strategies that staff will present to council in the first quarter of 2013 will be based on a 20-year outlook and incorporate much more than what is measured by the Charter metrics (see the municipalization exploration work plan at www.boulderenergyfuture.com for more detail about the analyses that are being conducted to reach this level of specificity).

Specific comments included the following:

Request for more time to gather input from Boulder Chamber members.

*Response: This was granted by moving the decision out a month. Staff also met with a representative from the Chamber to discuss the draft metrics. Additional input was provided on Oct. 31 and included as **Attachment D**, along with staff responses.*

¹ Carbon intensity is the ratio of emissions per unit of output, which in this case is the carbon dioxide equivalent released per MWh of energy produced. Emission intensities are used to derive estimates of air pollutant or greenhouse gas emissions based on the amount of fuel combusted.

Why are only minimum legal Charter requirements being considered? Shouldn't a broader set of measures of the interests of Boulder citizens, residents, and business be considered?

Response: The objective of this work task is to identify "what" will be measured to ensure that the city Charter requirements have been met, and to set the baseline from which specific targets will be set. Additional staff work is expected to produce information that goes beyond this minimum test. Additional broader targets related to rates, reliability, revenue and emissions will be included in Phase II of the exploration of municipalization, which will focus on the value added from each strategy.

City staff and council should not be establishing metrics at all; instead, these should be established by the third-party independent evaluator.

Response: While the city agrees that the third-party independent evaluator should use the Charter requirements to assess the adequacy of the evaluation process, we believe the evaluator will be expecting to utilize parameters established by council, among other criteria, in performing its analysis. The metrics approved by the council are based on the Charter language approved by Boulder voters and will set the floor or baseline that must be achieved in order to move forward with the municipalization exploration project.

The metrics committee did not include any accounting or ratemaking experts.

Response: Heather Bailey, the executive director who is spearheading this effort, is a CPA and is well-versed in regulatory accounting and ratemaking practices. She is incorporating those principles into the calculation of the average cost per kWh by rate class, as well as evaluating the information made available in Colorado Public Utilities Commission rate filings by Xcel to help ensure the analysis is an apples-to-apples comparison.

The draft metrics do not reflect standard financial ratios commonly used to evaluate the financial condition of a utility.

Response: As stated above, the Charter metrics are specifically designed to provide a quantifiable measure of the voter-approved prerequisites. For purposes of this item, staff, in conjunction with the metrics committee, is asking for approval of the proposed metrics to validate what we believe to be a reasonable interpretation of what will be measured to meet the requirements of the Charter. However, as part of the process for developing strategies to bring to council in early 2013, the city is hiring a financial advisor with specific expertise in municipal utility financing. Staff will work with the financial advisor to develop financial models and complete a meaningful analysis. The expectation is that this work will support not only the strategy development and path forward but will also be robust enough to potentially support future financings and rating agency scrutiny. The types of ratios referenced will be part of the modeling work being done between now and the first quarter of 2013 which will be incorporated in any implementation plan.

It seems shortsighted and a disservice to Boulder residents and businesses to focus only on the minimum Charter requirement of rate parity at the time of the acquisition. A longer perspective should be taken. For example, rates should be compared over a 10 year forecastable period.

Response: As discussed, the Charter is the legal test we must meet to municipalize. The municipalization work plan will include a 20-year projection of costs and associated rates that

exceed the baseline or Charter metrics. This is to address the concern that rates would be kept artificially low in the first year to allow municipalization but escalate quickly after that, to the detriment of residents and businesses.

It will be important to ensure that the basis of the rate comparison is equitable and comprehensive. Rates should be considered overall but also by detailed customer rate class, considering in detail customer use and demand, and not just by broad categories.

Response: The rate comparison will use standard cost of service principles in determining the city's revenue requirement compared to Xcel's. Within the three rate classes (residential, commercial and industrial) there are 27 applicable rate schedules. Staff agrees the level of detail by customer class is important and would like to reflect that same detail in our calculation, but specific details of these rate schedules is not publicly available. Should those details become available, a more discrete comparison will be performed.

What about future capital budget requirements for replacement of aging infrastructure, which constitute the majority of assets acquired, or deployment of new technologies?

Response: The ongoing investment in distribution system infrastructure required to adequately maintain the system, along with and the inclusion of any potential new technologies, will be part of the cost of operating a municipal utility and will be included in the 20-year financial model.

Given what will be Boulder's very limited financial and human resources, will conventional reserve margins be adequate? How will we allow for and prepare for infrequent high-impact events?

Response: As part of the work plan, previously discussed with council, staff is utilizing experts and examining best practices to assess reserve margin requirements. In addition, as part of the reliability evaluation, staffing and resource requirements will be factored into the cost and reliability task to ensure that reliability metrics will be achieved.

As to reliability, the memo addresses infrastructure and operating goals for the systems to be purchased from Xcel. What has not been addressed are the connections we will have to the grid outside of Boulder. We hear stories about "separating" the Boulder system from the balance of the Xcel system. It will be critical after separation to have many connections to get power into Boulder should one connection fail.

Response: The proposed reliability metrics and comments section refer to maintaining comparable electric equipment, facilities and services as those of Xcel. This is intended to address the concerns that redundancy (maintaining multiple paths for power) be provided, as well as other design characteristics intended to achieve the same or better SAIDI and SAIFI as Xcel.

Where are the numbers for reliability? Why not list Xcel's current key metric service levels and establish targets for what the city will meet based off of that? Will there be penalties charged for service outages similar to what Xcel incurs, and if so, what are they and where are they budgeted?

Response: Staff has incorporated SAIDI and SAIFI reliability metric numbers in the proposed Charter metrics. These are based on Xcel's historical performance between 2008 and 2011. Future performance goals will be part of Phase II when the implementation plan targets will be

developed. Any utility, municipally owned or investor owned, is subject to the same reliability requirements and penalties by the National Energy Reliability Corporation (NERC) and the Western Area Coordinating Council (WECC). The budget for these requirements will be included in the analysis over the next four months.

GHG reductions should be expressed in terms of absolute total values, not reductions per kWh. This would result in appropriate consideration of programs such as energy efficiency and demand-side management (DSM), which have the greatest impact, are the most cost-effective, and should be considered first.

Response: DSM, which includes both energy efficiency and demand response, are key resources being included in the staff resource portfolio analysis and will factor into the emissions and renewable calculations. While the proposed metrics are calculated on a per ton of emissions basis, it is not appropriate to perform a comparison to Xcel on an absolute total value for emissions or renewable unless presented as a proportion or percentage.

The comparison to Xcel Energy should be based on what the resource mix would have looked like had the city accepted Xcel's wind energy deal.

It should be clear that the city never was in a position to "accept" a wind energy deal. The proposal was originally offered with the condition that the city place a 20-year franchise on the Nov. 2011 ballot. City staff made clear to Xcel that the City Council would not agree to place such a franchise on the ballot. Negotiations proceeded with this condition placed aside. When negotiations reached the late stages, city staff asked Xcel whether the franchise condition was still a prerequisite for any wind deal. Xcel insisted that it was. Negotiations went no further. There was never any final proposal against which a proposed municipalization could be measured.

It is also important to note that the wind deal proposed was essentially a hedge against a rise in natural gas prices. That is, city residents would have paid less for electricity if natural gas prices rose and more if those prices dropped. In the last year, natural gas prices have dropped dramatically. Thus, rates under the wind proposal would likely be higher than Xcel's current rates.

There are no specific metrics for emissions. Isn't this supposed to be the benefit area driving this whole initiative? If so, why won't the city state specific plans, costs and benefits? Why not treat that last best offer from Xcel as the baseline and tell us specifically how the city will do better and at what cost?

Response: There will be metrics presented showing measurable reductions in GHG emissions compared to the same metrics employed by Xcel. In addition, a plan will be presented that shows measurable improvement over 20 years and the cost/impact of the plan. The offer from Xcel to purchase RECs from a new wind farm is actually part of any future comparison to Xcel, given the company proceeded with the purchase of that wind supply, and will be included in determining its GHGs.

The city is not being transparent with the economics associated with this initiative. If this were a private business, a business plan with all key assumptions and risks would be published, updated and understood by all stakeholders.

Response: The municipalization work plan has been posted on the www.boulderenergyfuture.com website as well shared during a variety of public presentations and in communications with council. In addition, the team has solicited participation from stakeholders with expertise in many different areas in order to incorporate the diverse perspectives and knowledge within the community. The work has not progressed to the point of having a complete financial model, which is why nothing more specific has been posted. However, the city supports transparency. The city will be vetting assumptions with work teams and posting these assumptions on the website. The only caveat relates to data associated with potential litigation which will be kept confidential, to maintain the city's strategic and negotiating positions.

The city should provide a monthly budget versus actual report on all expenses during each phase of this initiative.

Response: As discussed at the Aug. 28 study session with council, staff will present quarterly budget reports for the municipalization exploration project.

Issues sent via email

Response: The issues raised in many of the correspondence to council and staff are pertinent and staff does not disagree these need to be considered; however, most of these are premature and will be done as part of the work plan. The Charter metrics are a solid starting point for the additional analysis, performed according to the work plan over the next five months, providing the depth and detail referenced in the memos.

NEXT STEPS

If council accepts the proposed metrics, staff will incorporate them into the modeling process to test the various municipalization strategies to be presented to council during the first quarter of 2013.

ATTACHMENTS

Attachment A:	Ad-hoc metrics community working group
Attachment B:	City Charter language in Article XIII, Section 178
Attachment C:	Key definitions
Attachment D:	Chamber of Commerce letter and staff responses to comments on charter metrics

ATTACHMENT A

Municipalization Charter Requirement Team

Peter Baston, IDEAS, LLC

Dan Powers, Western Disposal

John Tayer, Public Affairs Center

Jenny Hampton, Navigant Consulting

Steve Pomerance

Susie Strife, Boulder County

Alison Burchell

Angelique Espinoza, Boulder Chamber of Commerce

Brad Queen, Center for Resource Conservation

Nick Rancis, CU

ATTACHMENT B

ARTICLE XIII. LIGHT AND POWER UTILITY

Sec. 178. Creation, purpose and intent.

(a) The city council, at such time as it deems appropriate, subject to the conditions herein, is authorized to establish, by ordinance, a public utility under the authority in the state constitution and the city charter to create light plants, power plants, and any other public utilities or works or ways local in use and extent for the provision of electric power. The city council shall establish a light and power utility only if it can demonstrate, with verification by a third-party independent expert, that the utility can acquire the electrical distribution system in Boulder and charge rates that do not exceed those rates charged by Xcel Energy at the time of acquisition and that such rates will produce revenues sufficient to pay for operating expenses and debt payments, plus an amount equal to twenty-five percent (25%) of the debt payments, and with reliability comparable to Xcel Energy and a plan for reduced greenhouse gas emissions and other pollutants and increased renewable energy; and

(b) The governing body of the electric utility enterprise shall be the city council. The council may, by ordinance, delegate responsibility to the electric utilities board or the city manager as appropriate.

(c) The people of Boulder seek electric power supplied in a reliable, fiscally sound, and environmentally responsible manner. Therefore, the utility will be operated according to the following guiding principles.

(1) **Reliable Energy:** Community safety, convenience, and prosperity all depend on the reliable delivery of electric power. The utility will deliver reliable electric power. The utility's foremost responsibilities will be to provide electric power that is high quality and dependable, support economic vitality, prevent service outages, and respond promptly to any service outage.

(2) **Fiscal Responsibility:** The cost of electric power is a significant portion of business and household budgets. The utility will operate in a fiscally responsible manner, always being mindful that every expenditure will be reflected in customers' rates and will affect household budgets and business profitability. The utility will, while always honoring its obligations to bondholders, strive to maintain rate parity with any investor-owned utility whose service area would include the City of Boulder.

(3) **Clean Energy:** Climate change and diminishing fossil fuel supplies, combined with the high cost of those fuels, are significant factors leading to the creation of the utility. The utility will strive to reduce reliance on fossil fuels, focus on sustainable alternatives, and seek new opportunities for producing clean energy.

ATTACHMENT B

(4) Ratepayer Equity: The utility will direct its efforts to promote ratepayer equity in all aspects of its operations. Rates charged by the utility will be designed to create a fair and equitable distribution among all users of the costs, replacement, maintenance, expansion, operations of facilities, energy, and energy conservation programs for the safe and efficient delivery of electric power to city residents and other customers. The utility will consider the effects of its programs, policies, and rates in the development of programs for low-income customers.

(5) Environmental Stewardship: Preserving and protecting our natural environment goes well beyond producing clean energy. The utility will be a good environmental steward by working to reduce the environmental impact of its operations, including working to reduce the demand for electricity. Energy and power that is produced in an environmentally responsible manner requires that the city balance environmental factors as an integral component of planning, design, construction, and operational decisions.

(6) Enterprise: The city will deliver electric power services by means of an enterprise, as that term is defined by Colorado law. The city further declares its intent that the city's electric utility enterprise be operated and maintained so as to exclude its activities from the application of Article X, Section 20 of the Colorado Constitution. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

Section 179. Definitions.

Unless the context specifically indicates otherwise, the following words and phrases shall have the following meanings as used in this article:

(a) "Electric Utility Activity" includes, but is not limited to, the provision of electric power to customers within its service area.

(b) "Electric Utility Enterprise" means the electric utility business now or hereafter owned by the city, which business receives under ten percent (10%) of its annual revenues in grants from all Colorado state and local governments combined and which is authorized to issue its own revenue bonds pursuant to this article or other applicable law.

(c) "Electric Utility Facilities" means all real and personal property utilized by the city in connection with the generation, transmission, provision distribution and conservation of energy, electricity, light and power for the city, now or hereafter owned or operated by the city.

(d) "Grant" means any direct cash subsidy or other direct contribution of money from the state or any local government in Colorado which is not required to be repaid. "Grant" does not include:

(1) any indirect benefit conferred upon the electric utility enterprise from the state or any local government in Colorado;

ATTACHMENT B

(2) any revenues resulting from rates, fees, assessments, or other charges imposed by the electric utility enterprise for the provision of goods or services by such enterprise; or

(3) any federal funds, regardless of whether such federal funds pass through the state or any local government in Colorado prior to receipt by the electric utility enterprise. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

Section 180. Powers of the electric utility enterprise.

In addition to any of the powers it may have by virtue of any of the applicable provisions of state law, this Charter, and the Code, the electric utility enterprise shall have the power under this article:

(a) to acquire by gift, purchase, lease, or exercise of the right of eminent domain, to construct, to reconstruct, to improve, to better and to extend electric utility facilities, wholly within or wholly without or partially within and partially without the territorial boundaries of the city, and to acquire in the name of the city by gift, purchase, or the exercise of the right of eminent domain lands, easements, and rights in land in connection therewith;

(b) to operate and maintain electric utility facilities for its or the city's own use and for the use of public and private consumers and users within and without the territorial boundaries of the city;

(c) to accept federal funds under any federal law in force to aid in financing the cost of engineering, architectural, environmental, or economic investigations or studies, surveys, designs, plans, working drawings, specifications, procedures, or other action preliminary to the construction, operation or remediation of electric utility facilities;

(d) to accept federal funds under any federal law in force for the construction, operation or remediation of electric utility facilities;

(e) to prescribe, revise, and collect in advance or otherwise, from any consumer served by a electric utility activity, rates, fees, and charges or any combination thereof for the services furnished by, or the direct or indirect connection with, the electric utility facilities; and in anticipation of the collection of revenues of such electric utility facilities, to issue revenue bonds to finance in whole or in part the cost of acquisition, construction, reconstruction, improvement, betterment, or extension of the electric utility facilities; and to issue temporary bonds until permanent bonds and any coupons appertaining thereto have been printed and exchanged for the temporary bonds;

(f) to pledge to the punctual payment of said bonds and interest thereon all or any part of the revenues of the electric utility facilities;

ATTACHMENT B

(g) to make all contracts, execute all instruments, and do all things necessary or convenient in the exercise of the powers granted in this section or elsewhere in state law, the Charter, or the Code, or in the performance of its covenants or duties, or in order to secure the payment of its bonds if no encumbrance, mortgage, or other pledge of property, excluding any pledged revenues, of the electric utility enterprise or city is recreated thereby, and if no property, other than money, of the electric utility enterprise or city is liable to be forfeited or taken in payment of said bonds, and if no debt on the credit of the electric utility enterprise or city is thereby incurred in any manner for any purpose;

(h) to issue refunding bonds pursuant to this article or other applicable law to refund, pay, or discharge all or any part of its outstanding revenue bonds issued under this article or under any other law, including any interest thereon in arrears or about to become due, or for the purpose of reducing interest costs, effecting a change in any particular year or years in the principal and interest payable thereon or effecting other economies, or modifying or eliminating restrictive contractual limitations appertaining to the issuance of additional bonds or to any electric utility facilities; and

(i) to begin operations of the municipal utility at such time as the city council may by ordinance provide. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

Section 181. Revenue bonds.

(a) In accordance with and through the provisions of this section, the electric utility enterprise, through its governing body, is authorized to issue bonds or other obligations payable solely from the revenues derived or to be derived from the functions, services, benefits or facilities of such enterprise or from any other available funds of such enterprise. Such bonds or other obligations shall be authorized by ordinance, adopted by the governing body of the electric utility enterprise in the same manner as other ordinances of the city. Such bonds or other obligations may be issued without voter approval, notwithstanding the provisions of Section 2(d) of the charter, provided that, during the fiscal year of the city preceding the year in which the bonds or other obligations are authorized, the electric utility enterprise received under ten percent (10%) of its annual revenue in grants or, during the current fiscal year of the city, it is reasonably anticipated that such enterprise will receive under ten percent (10%) of its revenue in grants.

(b) The terms, conditions, and details of said bonds, or other obligations, and the procedures related thereto shall be set forth in the ordinance authorizing said bonds or other obligations and said bonds, or other obligations may be sold in accordance with the provisions of the charter. Each bond, note, or other obligation issued under this section shall recite in substance that said bond, note, or other obligation, including the interest thereon, is payable from the revenues and other available funds of the electric utility enterprise pledged for the payment thereof. Notwithstanding any other provision of law to the contrary, such bonds, or other obligations may be issued to mature at such times as are authorized by the charter, shall bear interest at such rates, and shall be sold at or above the principal amount thereof, all as shall be determined by the

ATTACHMENT B

governing body of the electric utility enterprise. Notwithstanding anything in this section to the contrary, in the case of short-term notes or other obligations maturing not later than one year after the date of issuance thereof, the governing body of the electric utility enterprise may authorize enterprise officials to fix principal amounts, maturity dates, interest rates, and purchase prices of any particular issue of such short-term notes or obligations, subject to such limitations as to maximum term, maximum principal amount outstanding, and maximum net effective interest rates as the governing body of the electric utility enterprise shall prescribe. Refunding bonds of the electric utility enterprise shall be issued as provided in Part 1 of Article 56 of Title 11, C.R.S. The powers provided in this section to issue bonds, or other obligations are in addition and supplemental to, and not in substitution for, the powers conferred by any other law, and the powers provided in this section shall not modify, limit, or affect the powers conferred by any other law either directly or indirectly. Bonds, notes, or other obligations may be issued pursuant to this section without regard to the provisions of any other law. Insofar as the provisions of this section are inconsistent with the provisions of any other law, the provisions of this section shall control with regard to any bonds lawfully issued pursuant to this section.

(c) Any pledge of revenue or other funds of the electric utility enterprise shall be subject to any limitation on future pledges thereof contained in any ordinance of the governing body of the electric utility enterprise or of the city authorizing the issuance of any outstanding bonds or other obligations of the electric utility enterprise or the city payable from the same source or sources. Bonds or other obligations, separately issued by the city and the electric utility enterprise, but secured by the same revenues or other funds shall be treated as having the same obligor and as being payable in whole or in part from the same source or sources. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

Sec. 182. Utility service standards.

(a) Customer Benefit: The utility shall conduct its business and affairs for the benefit of its customers and the city.

(b) Cost Effective Service: The utility will provide the electric power requirements of the customers within the service areas in a reliable, cost-effective, and environmentally responsible manner.

(c) Energy, Energy Efficiency and Renewable Energy: The utility will engage in business activities related to the provision of electric power services, which may include but are not limited to investment in conventional electric generation, generation using renewable resources, energy efficiency measures, demand side management, and associated communication systems.

(d) Rates: The council will by ordinance fix, establish, maintain, and provide for the collection of such rates, classes of rates, fees, or charges for electric service and other utility services furnished by the city. The council will consider the following factors when setting utility rates:

ATTACHMENT B

(1) The utility will produce revenues at least sufficient to pay the cost of operation and maintenance of said utilities in good repair and working order; to pay the principal of and interest on all bonds of the city payable from the revenues of the utility;

(2) The utility will provide and maintain an adequate fund for replacement of depreciated or obsolescent property, and for the extension, improvement, enlargement, and betterment of the utility; to pay the interest on, and the principal of, any bonds issued by the city to extend or improve the utilities;

(3) The utility will consider electricity rates of surrounding and similarly situated communities and use best efforts to set competitive utility rates; and

(4) The council will fix rates for which electric service will be furnished for all purposes, and rates shall be as low as good service will permit, consistent with the guiding principles set forth in section 178 (c)(1) – (6).

(e) Budget and Appropriations: The council, by ordinance, will approve the budget and appropriations as required by Charter Art. VI.

(f) Accounting Standards: All revenues and expenditures of the city's electric system will be considered revenues and expenditures of the utility and shall be audited and accounted for in a manner that is consistent with charter § 127.

(g) No Free Service: No free energy or power shall be given to any person, firm, corporation, or institution whatsoever.

(h) Payments in Lieu of Taxes and for Services Rendered – City: The utility may only transfer funds for another governmental purpose within the city if:

(1) a service is provided to the utility by another department within the city; or

(2) in lieu of tax or franchise fee payments that a similarly situated private utility would have been required to pay taxes to the city. The maximum payment in lieu of taxes shall be limited by an estimated amount of property, sales or use tax, and a payment in lieu of a franchise fee not to exceed four percent of annual revenues.

(i) Payments in Lieu of Taxes and for Services Rendered – Other Governmental Entities: The utility shall annually transfer funds to the Boulder Valley School District in an amount the city council determines will approximate property taxes that a private utility would have paid to the School District on property owned by the electric utility enterprise. The utility may transfer funds to other governmental entities in lieu of property taxes that would have been paid if a similarly situated private utility would have been required to pay property taxes to the other governmental entity or for up to the value of a service rendered.

ATTACHMENT B

(j) Preferences Prohibited: The utility shall not make or grant any preference or advantage to any corporation or person or subject any corporation or person to any prejudice or disadvantage as to rates, charges, service, or facilities, or in any other respect.

(k) Advantages Prohibited: The utility shall not establish or maintain any unreasonable differences or undue preferences as to rates, charges, service, facilities, or any respect as between any class of services. The utility may create a fund to provide assistance to low-income customers for energy efficiency or generation improvements or utility bill payments. When considering whether to approve such a fund, and give a preference or advantage to low-income utility customers, the utility shall take into account the potential impact of and cost-shifting to, utility customers other than the low-income utility customers. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

Sec. 183. Creation of an electric utilities department and general powers.

(a) Electric Utilities Department: There shall be an electric utilities department, which shall be responsible for all planning, generation, transmission, and distribution of energy, electricity and power for the city, and such other responsibilities as the city council or city manager may assign.

(b) General Powers:

The electric utilities department shall have the authority to:

(1) Generate and deliver energy and exercise all the powers of the city including those granted by the Constitution and by the law of the state of Colorado and by the charter in regard to purchasing, condemning and purchasing, acquiring, constructing, leasing, extending and adding to, maintaining, conducting, and operating an electric utilities system for all uses and purposes, and everything necessary, pertaining or incidental thereto, including authority to dispose of real or personal property not useful for or required in the electric utilities operation.

(2) Purchase, generate, transmit, distribute, and sell electric energy.

(3) Make and execute contracts, take and give instruments of conveyance, and do all other things necessary or incidental to the powers granted in this charter.

(4) Carry out the operations, supervision, and regulation of the utility related to the lawful operation of the utility as directed by the city council.

(5) Make recommendations to the electric utilities board or the city council on matters required by the city charter.

(6) Enter into contracts and agreements with any public or private corporation or any individual, both inside and outside the boundaries of the city and state:

ATTACHMENT B

(A) for the joint use of property belonging either to the city or to the other contracting party or jointly to both parties; and

(B) for the joint acquisition of real and personal property, rights and franchises, and the joint financing, construction, and operation of plants, buildings, transmission lines, and other facilities. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

Sec. 184. Functions of the electric utilities director.

Under the direction, supervision, and control of the city manager, there shall be a director of the electric utilities department who shall be qualified by special training and experience in the field of electric utilities and municipal engineering. The director shall be the regular technical and policy advisor of the electric utilities board and shall have administrative direction of the electric utilities department. The director may be designated as the secretary of the electric utilities board and authorized to perform other necessary functions. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

Sec. 185. Creation of the electric utilities board.

(a) Board Created: There shall be an electric utilities board consisting of nine members not all of the same gender. The members of the board shall not hold any other office in the city, and shall serve without pay.

(b) Board Qualifications: Board members shall be selected from the registered electors of the city or from the owners or employees of a business or governmental entity that is a customer of the electric utility, provided, however, that a majority of the board shall be registered electors of the city. Board members shall be well known for their ability, probity, public spirit, and particular fitness to serve on the electric utilities board. At least three board members shall be owners or employees of a business or governmental entity that is a customer of the electric utility.

(c) Board Appointments: The city council shall appoint members of the board.

(d) Terms of Office: The term of each member shall be five years; provided, however, that in appointing the original members of the board, the city council and city manager shall continue the terms of the current members or shall stagger the initial terms so that at least one board member's term expires in each year.

(e) Removal: The city council may remove any board member for cause.

(f) Vacancies: In the event that a board member's term ends by resignation, vacation of seat or removal from service on the board, the board member shall be replaced by the city council.

ATTACHMENT B

(g) Creation of Electric Utilities Board: The electric utilities board shall be created at the time of the creation of the electric utility enterprise. Until such time as the board is created, the city council shall be responsible for fulfilling the responsibilities of the electric utilities board. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

Sec. 186. Organization and procedure of the board.

(a) Chair and Secretary: The board shall choose a chair and a secretary from among its members. The director of electric utilities may be designated as secretary by the board.

(b) Regular and Special Meetings: The board shall have regular meetings once a month. Special meetings may be called at any time by the city manager, the chair, or four members of the board upon the giving of at least 24 hours notice of said special meeting to the board members.

(c) Quorum: Five members of the board shall constitute a quorum. An affirmative vote of a majority of the members present shall be necessary to authorize any action by the board, except as otherwise expressly provided herein.

(d) Record of Meetings: The board shall keep minutes and records of its meetings, recommendations, and decisions.

(e) Rules of Order: Except as otherwise expressly provided herein, the board shall have power to make rules for the conduct of its business. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

Sec. 187. Functions of the board.

The electric utilities board shall not perform any administrative functions unless expressly provided in this charter. The duties and functions of the electric utilities board shall be:

(a) Advice. To advise the city council on policy matters pertaining to the municipal electric and utility systems, including without limitation such policies as the board determines are necessary or prudent to carry out its fiduciary duties and the requirement of the charter.

(b) Sounding Board. To act as a sounding board to the city council, city manager, and the electric utility director for the purpose of identifying the ratepayers' service delivery expectations.

(c) Rulemaking. To adopt rules and regulations with respect to any matter within its jurisdiction as it may be permitted by the council.

(d) Meeting Rules. To adopt bylaws governing its meeting and agenda procedures and other pertinent matters.

ATTACHMENT B

(e) Budget and Appropriations. To review and make recommendations to the city council on the city manager's proposed budget and appropriation as it relates to the utility.

(f) Revenue Bonds. To review and make recommendations to the city council concerning the issuance of revenue bonds or other obligations payable from revenues of the electric utilities enterprise.

(g) Other Recommendations. To review and make recommendations on any other matter relating to the electric utilities program, and may request and obtain from the electric utilities department and the city manager information relating thereto.

(h) Other Duties. To perform such other duties and functions and have such other powers as may be provided by ordinance. (Added by Ord. No. 7804 (2011), § 2, adopted by electorate on November 1, 2011.)

ATTACHMENT C

Key Definitions

Kilowatt hour (kWh) or energy: A unit of energy equal to 1000 watt hours. The electricity consumed by an electrical device is measured in terms of power, which is usually stated in units of watts (W). However, electric utility companies measure power consumption by kilowatt hours (kWh). This quantity represents the power consumption of all the devices in a household in kilowatts (or one thousand watts) multiplied by the number of hours the devices are in operation.

Kilowatt (kW) or demand: Sometimes called a power charge, a demand charge is measured in kilowatts (kW). This is a measurement of capacity or the rate at which you use energy. To measure demand, electric meters record the average demand usage over each 15-minute period and record the highest (peak) period for the month.

Utility rate class: General rate classes include categories, such as residential, commercial and industrial. Residential rate classes are typically limited to single-family dwellings and multifamily dwellings metered separately from one another. Master-metered multifamily dwellings can be treated either as a separate rate class or as part of a commercial rate class. Boulder only has a handful of customers in the Industrial category, while the majority of businesses are categorized as commercial.

Utility rate schedule: A rate schedule or Electric Tariff Index includes the various rates offered by a utility in its service territory. Xcel Energy currently has six residential rate schedules, sixteen for commercial and industrial customers and seven related to street lighting.

Revenue requirement: The reasonable level of revenue required for a utility to properly operate and maintain its system and meet its financial obligations. A revenue requirement provides a basis for determining the amount of revenue to be collected from rates. The revenue requirement may include operations and maintenance costs to support the system operations, taxes, administrative costs, incentives, capital improvements (imbedded in debt or profit if not part of operations), debt service, debt service coverage, and rate of return (profit).

Debt service and debt service coverage ratio (DSCR): Debt service includes the principal as well as the interest on all outstanding debt. In addition, debt service costs can include other items like debt service reserve funding, and debt service coverage requirements. Debt service reserve funding refers to the need for the utility to fund a reserve account in order to comply with the terms of the bonds, known as the bond covenants. In some cases, bondholders will require a utility to keep a reserve fund as a means to mitigate repayment risks. If so, then the money that has to be put into that fund on an annual basis as an additional revenue requirement. Debt service coverage is another bond covenant requirement; it is a provision that requires the utility to maintain its revenues at a high enough level to ensure that there is more than enough money available to make the annual debt service payments. A typical requirement is to maintain revenues net of O&M expenses at 125% of the annual debt service payment.

ATTACHMENT C

Xcel Energy (Xcel): Xcel is the parent company of Public Service Company of Colorado, the regulated utility that serves Boulder. The metrics will rely on the information that is most relevant to the Boulder area, which will generally relate to Public Service Company of Colorado.



October 31, 2012

Heather Bailey
Executive Director of Energy Strategy
City of Boulder
1777 Broadway
Boulder, CO 80302

RE: Boulder Chamber Input on Metrics Memo for November 15th Council Meeting

RATES

From the Staff Memo

Charter requirement

Demonstrate that the utility can acquire the electrical distribution system in Boulder and charge rates that do not exceed those rates charged by Xcel at the time of acquisition.

Recommended metric

The comparison between a municipal utility's rates and Xcel's rates at time of acquisition will be calculated by sector (residential, commercial and industrial) using the average rate charged per kilowatt hour (kWh) of electricity compared to Xcel's average rate charged per kWh.

Feedback

Issues

At issue is the question of whether it is possible for the City to demonstrate that its rates do not exceed those rates charged by Xcel at the time of acquisition. Staff's recommendation is to calculate the comparison for each of three sectors, residential, commercial and industrial, using an average cost per kilowatt hour as calculated by the City from the information available. There are two primary difficulties with defining comparability in these terms.

For the large energy users who purchase a significant majority of the power consumed in Boulder, it matters that this metric, the floor beneath which voters have said we cannot go, is clearly and meaningfully defined. These primary power utility customers need to know how much higher or lower their rates might be in the scenario allowed by any City Council approved charter metric. These organizations have highly specific energy use patterns and customized rate schedules that may include multiple tariffs for fixed customer costs, costs which exist to serve peak demand, costs for total use of the commodity in kWhrs and even bulk energy. As a result, an average rate per kWh across the sector may bear little relation to their actual energy costs and cannot serve as a metric for comparison.

We understand that this puts the City in a bind in terms of establishing a meaningful metric for rates for large energy users and would like to help work toward a solution. As it stands, many stakeholders do not have a clear understanding of the challenges involved in establishing a more granular, specific set of rate comparisons, because the relationship between revenue requirements (and what that includes), specific user load characteristics and rates is fairly opaque to the lay person. In order to understand how the lack of certain information from Xcel limits

ATTACHMENT D

the City's ability to compare specific rate scenarios, the staff memo needs to further clarify how rate calculations work. In other words, is important for the public, the majority ratepayers, and the Council to understand why one cannot simply compare the City's proposed rates to Xcel's published rates if they are to decide for themselves if the average rate across sectors provides a basis for meaningful comparison.

Once people have a clearer understanding of what is needed to get a more meaningful comparison of rates, they will have a better base from which to collaborate on how to achieve something which meets both the letter and the spirit of the City's charter requirement to "demonstrate that its rates do not exceed those rates charged by Xcel at the time of acquisition."

RELIABILITY

From the Staff Memo

Charter requirement

Reliability comparable to Xcel.

Recommended metric

A new utility's reliability will be measured by:

1. Maintaining comparable electric equipment, facilities and services as those of Xcel at time of acquisition. This includes providing experienced and professional management of the local utility grid, including ongoing investment in maintenance and system improvement, and a strong customer-service ethic in responding to emergencies, daily maintenance and long-term grid investment.
2. Include an adequate reserve margin (tentative target 15%)
3. Meet or exceed all applicable compliance requirements established by the North American Electric Reliability Corporation (NERC)

Feedback

Issues

On the issue of reliability, many of the same concerns exist. Large energy users have widely varying circumstances which may include specific infrastructure redundancy, special priority in case of outages for life and safety or for high impacts on R&D projects or from facility downtime. Many have assigned account reps from Xcel who understand their operations and respond to specific reliability concerns.

The recommended metric in the staff memo suggests that these special circumstances could be addressed, but does not provide adequate clarification of how the particular reliability needs of large energy users would be comparably met. Does "comparable services" and "customer-service ethic" mean, for example, that a large energy customer can expect an account rep with the same understanding of outage restoration priority? If so, the metric description should reference these important services more specifically in order to communicate meaningful comparability.

An actual measurable target should be established for the metric to provide guidance for the engineering model. The SAIDI (System Average Interruption Duration Index) and SAIFI (System Average Interruption Frequency Index) numbers for Boulder County are 88.8 and 0.8 respectively. The floor for these targets must be higher for the City of Boulder to be considered comparable to Xcel's reliability for the City, as the County's reliability is necessarily lower due to the inclusion of more rural and mountainous service areas. Additionally, the actual reliability currently provided to specific large users should be taken into account for the same reasons that actual rate costs should be taken into account in order to arrive at a meaningful metric for comparison.

ATTACHMENT D

GENERAL QUESTIONS

Some of these questions are addressed, at least in part in the memo, but you may find it useful to have a sense of areas where further clarification would be helpful.

1. Why can the city not use tariff rates in public docs at PUC for a more refined level of rate parity comparison?
2. Why can't the large users just provide the city with our rates.
3. What is the cost allocation that staff refers to in table 1 in their proposal?
4. Please provide more clarification about the rate past the time of acquisition, particularly in light of the amount of unknowns and disagreements around stranded costs, capital costs and debt services.
5. Can you address the need for ongoing predictable rates and could there be a comparison of rates to Xcel past the time of acquisition?
6. Because the ballot language is so loose on rates charged, it seems to leave the door open to a number of ways of "gaming" the metrics, both subtle and overt. How will stakeholders get assurance that the spirit of the metric will be observed?
7. Can we have more details on the off ramps and the process for evaluation at those points? If Boulder spends years in the courts battling with Xcel, and then comes to find the costs are much higher than anticipated, what is to stop the City from setting a reasonable rate "at the time of acquisition" and then having much higher costs shortly thereafter?
8. How will large users be involved in the decision about whether or not to proceed at that point?
9. Currently Xcel has account reps for many large energy users. Can a new municipal utility provide the same?
10. Xcel has a priority system for restoring power first to users for life and safety needs (i.e. vulnerable populations), as well as for special circumstances such as when loss of power creates significant economic impacts (i.e. long term research projects, facility downtime, etc.). Will the City replicate these agreements?
11. NERC standards - can you provide a list?
12. How will locations with redundant feeds be addressed to ensure a comparable level of reliability in the case that the points of failure are reduced?
13. The proposed metric says there will be a plan for reduction in emissions and increase in renewables "beyond the levels that would have been otherwise achieved by staying with Xcel". For both short and long term plan, will this be compared to Xcel's existing portfolio, Xcel's existing plans for the future, or Xcel's proposed plans to the City during negotiations?

In general, we agree the points made by Council Member Wilson in his Metrics for Municipalization document and would hope to see responses to those concerns in the revised staff memo to Council. Thank you for your consideration.

Regards,

Angelique Espinoza,

Public Affairs Manager
Boulder Chamber

ATTACHMENT D

Chamber of Commerce

Comments on Charter Metrics

City staff responses are in bold italics

RATES

From the Staff Memo

Charter requirement

Demonstrate that the utility can acquire the electrical distribution system in Boulder and charge rates that do not exceed those rates charged by Xcel at the time of acquisition.

Recommended metric

The comparison between a municipal utility's rates and Xcel's rates at time of acquisition will be calculated by sector (residential, commercial and industrial) using the average rate charged per kilowatt hour (kWh) of electricity compared to Xcel's average rate charged per kWh.

Feedback from the Chamber

Issues

At issue is the question of whether it is possible for the City to demonstrate that its rates do not exceed those rates charged by Xcel at the time of acquisition. Staff's recommendation is to calculate the comparison for each of three sectors, residential, commercial and industrial, using an average cost per kilowatt hour as calculated by the City from the information available. There are two primary difficulties with defining comparability in these terms.

For the large energy users who purchase a significant majority of the power consumed in Boulder, it matters that this metric, the floor beneath which voters have said we cannot go, is clearly and meaningfully defined. These primary power utility customers need to know how much higher or lower their rates might be in the scenario allowed by any City Council approved charter metric. These organizations have highly specific energy use patterns and customized rate schedules that may include multiple tariffs for fixed customer costs, costs which exist to serve peak demand, costs for total use of the commodity in kWhrs and even bulk energy. As a result, an average rate per kWh across the sector may bear little relation to their actual energy costs and cannot serve as a metric for comparison.

We understand that this puts the City in a bind in terms of establishing a meaningful metric for rates for large energy users and would like to help work toward a solution. As it stands, many stakeholders do not have a clear understanding of the challenges involved in establishing a more granular, specific set of rate comparisons, because the relationship between revenue requirements (and what that includes), specific user load characteristics and rates is fairly opaque to the lay person. In order to understand how the lack of certain information from Xcel limits the City's ability to compare specific rate scenarios, the staff memo needs to further clarify how rate calculations work. In other words, is important for the public, the majority ratepayers, and the Council to understand why one cannot simply compare the City's proposed rates to Xcel's published rates if they are to decide for themselves if the average rate across sectors provides a basis for meaningful comparison.

ATTACHMENT D

Once people have a clearer understanding of what is needed to get a more meaningful comparison of rates, they will have a better base from which to collaborate on how to achieve something which meets both the letter and the spirit of the City's charter requirement to "demonstrate that its rates do not exceed those rates charged by Xcel at the time of acquisition."

Response: Additional explanation has been added to the memo.

RELIABILITY

From Staff Memo

Charter Requirement

Reliability comparable to Xcel.

Recommended Metric

A new utility's reliability will be measured by:

1. Maintaining comparable electric equipment, facilities and services as those of Xcel at time of acquisition. This includes providing experienced and professional management of the local utility grid, including ongoing investment in maintenance and system improvement, and a strong customer-service ethic in responding to emergencies, daily maintenance and long-term grid investment.
2. Include an adequate reserve margin (tentative target 15%)
3. Meet or exceed all applicable compliance requirements established by the North American Electric Reliability Corporation (NERC).

Feedback from Chamber

Issues

On the issue of reliability, many of the same concerns exist. Large energy users have widely varying circumstances which may include specific infrastructure redundancy, special priority in case of outages for life and safety or for high impacts on R&D projects or from facility downtime. Many have assigned account reps from Xcel who understand their operations and respond to specific reliability concerns.

The recommended metric in the staff memo suggests that these special circumstances could be addressed, but does not provide adequate clarification of how the particular reliability needs of large energy users would be comparably met. Does "comparable services" and "customer-service ethic" mean, for example, that a large energy customer can expect an account rep with the same understanding of outage restoration priority? If so, the metric description should reference these important services more specifically in order to communicate meaningful comparability.

Response: The reliability metric does mean large accounts can expect those services. How those services will be delivered to specific customer classes will be addressed in Phase II, if council decides to move forward with municipalization.

An actual measurable target should be established for the metric to provide guidance for the engineering model. The SAIDI (System Average Interruption Duration Index) and SAIFI (System Average Interruption Frequency Index) numbers for Boulder County are 88.8 and 0.8 respectively. The floor for these targets must be higher for the City of Boulder to be considered comparable to Xcel's reliability for

ATTACHMENT D

the City, as the County's reliability is necessarily lower due to the inclusion of more rural and mountainous service areas. Additionally, the actual reliability currently provided to specific large users should be taken into account for the same reasons that actual rate costs should be taken into account in order to arrive at a meaningful metric for comparison.

Response: Staff has looked at the previous four years SAIDI and SAIFI metrics for the Boulder area and has calculated an average for that period to use as the baseline charter metric. At this time, Xcel does not provide these metrics for the city or by large customer. Given we do not yet know the condition or configuration of the system, the four year average seemed reasonable. If and when we are able to obtain that data, we will make any necessary adjustments to the metrics.

GENERAL QUESTIONS

1. Why can the city not use tariff rates in public docs at PUC for a more refined level of rate parity comparison?

Response: City staff can use Xcel's tariff rates for Xcel's side of the comparison, but because city staff does not have access to the specific calculations from which those rates were derived the municipal side of the comparison cannot be done. Information needed to construct municipal rates comparable to Xcel's include: cost allocation factors or drivers by rate class (residential, commercial, and industrial) and rate schedule/tariff (these are the 27 rates Xcel uses to bill customers). In other words, staff would need to have the actual formulas used by Xcel and the kWh and KW consumption data by rate schedule to compare to the tariff rates. Unfortunately, this information is currently unavailable to the city. The staff will be glad to work with individual customers to attempt to recreate a proxy, if possible. As mentioned in the draft metrics, if the city or its consultant team is able to access the data to recreate the rate calculations we will provide a more granular comparison.

2. Why can't the large users just provide the city with our rates.

Response: The large users can provide the city with their rates, and as mentioned, the staff can work to create an apples to apples comparison. Even within the commercial and industrial rate classes, different customers may have multiple rate schedules and demand charges depending on their operations. Therefore, careful attention would need to be paid to ensure that the data is sufficiently representative.

3. What is the cost allocation that staff refers to in table 1 in their proposal?

Response: The allocation of utility costs refers to the distribution of utility costs between the rate classes and then down to the rate schedule or tariff level of detail.

4. Please provide more clarification about the rate past the time of acquisition, particularly in light of the amount of unknowns and disagreements around stranded costs, capital costs and debt services.

Response: The analysis will provide a 20 year outlook with respect to costs. Stranded costs, capital costs, and debt service are included in those projections.

ATTACHMENT D

5. Can you address the need for ongoing predictable rates and could there be a comparison of rates to Xcel past the time of acquisition?

Response: The city staff can only compare to Xcel rates past acquisition if that information is available. However, the cost impacts will be presented for 20 years, as discussed above. It is also important to keep in mind that it is not appropriate to tie the rates of one utility to another. Utilities regularly modify their rates based on a number of factors such as capitol expenses, fuel costs, etc. The real issue for each customer is the impact on their total electric bill. Rates can be designed differently between utilities and result in the same cost impact. Since city staff cannot predict how Xcel's or the city's rates will change, the analysis has focused on the cost impact over the long term as a means of judging the impact of municipalization.

6. Because the ballot language is so loose on rates charged, it seems to leave the door open to a number of ways of "gaming" the metrics, both subtle and overt. How will stakeholders get assurance that the spirit of the metric will be observed?

Response: To address this concern and provide transparency, the city is creating a 20 year plan showing how the municipalization will impact those metrics over time.

7. Can we have more details on the off ramps and the process for evaluation at those points? If Boulder spends years in the courts battling with Xcel, and then comes to find the costs are much higher than anticipated, what is to stop the City from setting a reasonable rate "at the time of acquisition" and then having much higher costs shortly thereafter?

Response: The first off-ramp is when the council decides to move forward with municipalization based on the strategies staff will present during the first quarter of 2013. The subsequent off-ramps in Phase II relate to litigation outcomes and if those result in increased costs beyond what the metrics can support. Lastly, council has an off ramp at the conclusion of Phase II, when all costs and litigation have been finalized and a final update to the financial model reveals the impact of any changes.

As mentioned above, a 20 year forecast is being developed so that the long term financial plan can inform council as to what happens to costs over time.

8. How will large users be involved in the decision about whether or not to proceed at that point?

Response: There will be input sessions in the first quarter of 2013 prior to the presentation of the strategies to council which allow large users to provide input. In addition, city staff is always available to discuss the concerns and impacts with any large users.

9. Currently Xcel has account reps for many large energy users. Can a new municipal utility provide the same?

Response: The reliability metric has a commitment to provide services comparable or better than Xcel's, which we can assume would include key account reps.

10. Xcel has a priority system for restoring power first to users for life and safety needs (i.e. vulnerable populations), as well as for special circumstances such as when loss of power creates significant economic impacts (i.e. long term research projects, facility downtime, etc.). Will the City replicate these agreements?

ATTACHMENT D

Response: As stated in the reliability metric, the city is committed to providing the same level of service or better and since reliability is a priority for both the city and Xcel, these same types of protocols will be part of the city's reliability plan.

11. NERC standards - can you provide a list?

Response: Yes, we will know the specific standards that apply once we determine which assets the city may need to acquire. The type of equipment, in most cases, will determine which standards to follow. That said, all bulk power system owners, operators, and users must comply with approved NERC reliability standards. These entities are required to register with NERC through the appropriate regional entity.

The focus of NERC's compliance program is to improve the reliability of the bulk power system in North America by fairly and consistently enforcing compliance with NERC standards. Specifically, the program is designed to ensure that the right practices are in place so that the likelihood and severity of future system disturbances are substantially reduced, while recognizing that no standards or enforcement process can fully prevent all such disturbances from occurring.

NERC's compliance efforts comprise three key activities:

- 1. Compliance monitoring is the process used to assess, investigate, evaluate, and audit in order to measure compliance with NERC standards.*
- 2. Compliance enforcement is the process by which NERC issues sanctions and ensures mitigation of confirmed violations of mandatory NERC reliability standards. As part of these efforts, NERC can also issue remedial action directives to immediately address and deter new or further violation(s), irrespective of the presence or status (i.e. confirmed or alleged) of a violation. Sanctioning of confirmed violations is determined pursuant to the NERC Sanction Guidelines and is based heavily upon the Violation Risk Factors and Violation Severity Levels of the standards requirements violated and the violations' duration. Entities found in violation of any standard must submit a mitigation plan for approval by NERC and, once approved, must execute this plan as submitted.*
- 3. Due Process provides registered entities the opportunity to contest any finding of a violation of a NERC reliability standard. The process allows for hearings at the regional entity and appeals before NERC. Further appeals may be possible at the appropriate governmental authority.*

NERC relies on the regional entities to enforce the NERC standards with bulk power system owners, operators, and users through approved delegation agreements. Boulder is part of the Western Electricity Coordinating Council or WECC territory. WECC is the Regional Entity responsible for coordinating and promoting Bulk Electric System reliability in the Western Interconnection and is responsible for monitoring compliance of the registered entities within their regional boundaries, assuring mitigation of all violations of approved reliability standards and assessing penalties and sanctions for failure to comply.

ATTACHMENT D

12. How will locations with redundant feeds be addressed to ensure a comparable level of reliability in the case that the points of failure are reduced?

Response: As discussed in the reliability metrics, the city is committed to providing the same level of service or better and since reliability is a priority for both the city and Xcel, these same types of protocols and equipment will be part of the city's reliability plan.

13. The proposed metric says there will be a plan for reduction in emissions and increase in renewables "beyond the levels that would have been otherwise achieved by staying with Xcel". For both short and long term plan, will this be compared to Xcel's existing portfolio, Xcel's existing plans for the future, or Xcel's proposed plans to the City during negotiations?

Response: The comparison will be compared to the current portfolio at the time of acquisition and over the long term to Xcel's projected portfolio as illustrated in the most current approved Electric Resource Plan filed with the Public Utilities Commission.