

**STATE OF IOWA
BEFORE THE IOWA UTILITIES BOARD**

**INTERSTATE POWER AND LIGHT
COMPANY**

DOCKET NO. RPU-2019-0001

**COMBINED HEAT AND POWER ALLIANCE
COMMENTS PERTAINING TO IPL'S STANDBY TARIFF**

The Combined Heat and Power Alliance (the Alliance) appreciates the opportunity to provide comments in this proceeding. The Alliance is a coalition of business, labor, contractor, non-profit organizations and educational institutions who share the vision that Combined Heat and Power (CHP) and Waste Heat to Power (WHP) can make America's manufacturers and other businesses more competitive, reduce energy costs, enhance grid reliability and reduce emissions.

While there is potential for greater CHP and WHP deployment in Iowa, there are barriers to achieving this potential fully. Smart policy choices are required to overcome these barriers. By requiring best practices for the standby tariff in this Interstate Power and Light Company (IPL) rate case, the Iowa Utility Board can take an important step to overcome these policy barriers. We urge the Board to require changes to standby tariffs that will make such standby tariffs simple, transparent, and consistent and to implement a set of best practices for standby tariffs in Iowa.

Benefits and Challenges of CHP and WHP in Iowa

The benefits of CHP and WHP systems are numerous, but a critical advantage is that the overall reliability and efficiency of such systems help businesses to control their power costs, increasing their competitiveness in the marketplace. Since these systems use heat that would otherwise be wasted, deployment of CHP and WHP systems can also make these businesses more competitive by reducing energy costs while cutting emissions.

Analysis conducted by the Alliance for Industrial Efficiency¹ found that if an economically viable portion of the state's CHP and WHP were deployed, Iowa's industrial sector customers would save over 900 thousand megawatt hours annually and, factoring in other industrial energy efficiency measures, would save Iowa businesses over \$3 billion on electricity costs from 2016 to 2030 and reduce CO₂ emissions by 3.6 million short tons annually.²

Many critical infrastructure customers such as hospitals, universities, municipalities, and data centers have successfully deployed CHP and WHP systems, increasing their resiliency against natural disasters, emergency events, or other events that may impact the electric grid. In Iowa, universities, hospitals and nursing facilities, government facilities, and wastewater treatment facilities have installed CHP or WHP systems, allowing such facilities to continue to provide

¹ The Alliance for Industrial Efficiency is now known as the Combined Heat and Power Alliance.

² The Alliance for Industrial Efficiency. "State Ranking of Potential Carbon Dioxide Emission Reductions through Industrial Energy Efficiency" September 2016. https://chpalliance.org/wp-content/uploads/2016/09/FINAL-AIE-State-Industrial-Efficiency-Ranking-Report_9_15_16.pdf

electric and thermal energy to maintain security and public health and safety, even in the event of a grid outage.³

While existing CHP and WHP capacity in Iowa is nearly 750 MW⁴, the potential for increased CHP and WHP capacity in Iowa is substantial. The United States Department of Energy has identified as much as an additional 1,993 MW of CHP potential in Iowa, 1,323 MW of which is in industrials and another 670 MW in the commercial and institutional sector.⁵ Though the benefits to the state of Iowa of utilizing CHP and WHP systems are clear, existing utility rates in Iowa discourage additional development of such systems. Standby rates that deviate from cost of service principles by ignoring the high reliability of CHP and WHP systems discourage companies from developing CHP and WHP projects in Iowa. Burdensome standby rates negate the advantages of installing such systems and prevent companies from realizing the value of the capital investment in the system. Poorly designed and unreasonable standby rates also ignore the benefits CHP and WHP systems can provide to other customers through reduced investment by utilities in expensive generation resources.

In addition, there are specific problems with IPL's Standby Tariff as detailed by the Midwest Cogeneration Association (MCA) in their comments submitted in this proceeding. The MCA describes how elements of IPL's standby tariff impose inequitable charges on CHP and WHP standby customers and asks for the Board to require changes to IPL's misallocation of costs to the Standby Customer Class and mischarging for energy during unscheduled outages. Correcting these problems would go a long way toward leveling the playing field for to additional CHP and WHP system deployment in the state.

The Importance of Standby Tariffs for CHP and WHP Projects

Equitable standby tariffs will unlock the potential of CHP and WHP in Iowa. The National Association of Regulatory Utility Commissioners (NARUC) recently recognized the significance of standby rates to the viability of CHP projects in a resolution passed by the Board of Directors at NARUC's 2019 Winter Policy Summit. In the resolution, NARUC "encourages regulators to consider whether the cost of standby rates discourages further deployment of CHP and WHP, and could harm CHP and WHP facility competitiveness; and encourages Commissioners to assure that standby rates for partial requirements customers acknowledge that: (a) effectively coordinating CHP and WHP with grid system operations reduces demand and costs; and (b) CHP and WHP have the potential to improve system reliability and resiliency."⁶

NARUC's resolution was supported by manufacturing associations, such as the Electricity Consumers Resource Council (ELCON), American Chemistry Council, and American Forest & Paper Association; non-profit organizations such as the American Council for an Energy-Efficient Economy (ACEEE) and the Ohio Environmental Council; and clean energy businesses

³ U.S. Department of Energy Combined Heat and Power Installation Database, Combined Heat and Power Installations in Iowa.

<https://doe.icfwebsiteservices.com/chpdb/state/IA>

⁴ U.S. Department of Energy Combined Heat and Power Installation Database, Combined Heat and Power Installations in Iowa.

<https://doe.icfwebsiteservices.com/chpdb/state/IA>

⁵ U.S. Department of Energy's CHP Technical Assistance Partnership, "The State of CHP: Iowa".

<https://www.energy.gov/sites/prod/files/2017/11/f39/StateOfCHP-Iowa.pdf>

⁶ NARUC Board of Directors, "Resolution on Standby Rates for Partial Requirements Customers," February 13, 2019.

<https://pubs.naruc.org/pub/758747DC-F64E-BFD7-D411-817D44D3E571>

such as the Midwest Cogeneration Association, Heat is Power, AMS Energy, Arctic Energy, Blue Sky Power, Capstone Turbines, HCS Group, and Integrated CHP Systems Corporation. This broad support demonstrates the concern of diverse stakeholders and reinforces the importance of acting on standby rates.

Given the importance of standby tariffs to the deployment of CHP and WHP systems, standby tariffs should be simple, transparent, and consistent. Other states have already engaged in this process, for example the Minnesota Department of Commerce and the Minnesota Public Utilities Commission facilitated a multi-year stakeholder engagement process around standby rates for the state's rate-regulated utilities, culminating with the approval of revised standby tariffs reflecting best practices in April 2018. In 2014, the Minnesota Department of Commerce Division of Energy Resources wrote a report that included an analysis and recommendations for modifications to the state's standby rates.⁷ Subsequently, the Minnesota Public Utilities Commission ordered that all rate-regulated utilities file updated standby service tariffs. In a response filed in the proceeding, the Midwest Cogeneration Association offered a model framework, the "Model Standby Service Tariff Template," for designing and assessing utility standby tariffs.⁸ In its final revisions of its standby service tariffs, Xcel Energy included many of the principles from the Model Standby Service Tariff Template,⁹ and those revisions were later approved by the Commission.¹⁰

Following the example of other states in adopting best practices for CHP and WHP systems could encourage increased deployment of such systems in Iowa, resulting in reduced energy costs, reduced emissions, and increased resiliency of critical infrastructure in the state. We have attached a proposed outline for best practices for standby rates and ask the Board to consult this document and to ensure that IPL's Standby Tariff – and any future standby tariff – is consistent with these best practices.

Conclusion

Simple, transparent, and consistent standby tariffs can reduce barriers CHP and WHP deployment in Iowa. We urge the Board to require changes to standby tariffs that will achieve this goal and implement a set of best practices for standby rates as described in the Model Standby Service Tariff Template:

- Rates should be appropriately correlated to cost of service.
- Utilities should eliminate "demand ratchets" – tariffs based on a customer's maximum metered demand peak rather than the current month's power use.

⁷ Minnesota Department of Commerce and the Minnesota Public Utilities Commission, "Analysis of Standby Rates and Net metering Policy Effects on Combined Heat and Power (CHP) Opportunities in Minnesota," April 2014, p. 11-12. <http://mn.gov/commerce-stat/pdfs/card-report-anal-standby-rates-net-metering.pdf>.

⁸ Reply Comments from Midwest Cogeneration Association and Fresh Energy In the Matter of a Commission Inquiry into Standby Service Tariffs Docket No. E-999/CI-15-115, November 9, 2016, Table 10. <https://www.edockets.state.mn.us/EFiling/edockets/searchDocuments.do?method=showPoup&documentId={1FC7286C-9402-4BC4-8CF8-C86C200F26FF}&documentTitle=201611-126407-01>

⁹ Update Standby Service Tariffs, Docket No. E999/CI-15-115, March 20, 2018. <https://www.edockets.state.mn.us/EFiling/edockets/searchDocuments.do?method=showPoup&documentId={A04F4562-0000-C41E-BC79-EED85CC84353}&documentTitle=20183-141223-01>

¹⁰ Order Approving Solar PV Demand Credit Rider With Modifications and Standby Service Rider, Docket No. E-999/CI-15-115, April 20, 2018. <https://www.edockets.state.mn.us/EFiling/edockets/searchDocuments.do?method=showPoup&documentId={E008E462-0000-C919-97C8-93AA49C41404}&documentTitle=20184-142155-01>

- Charges should be based on actual cost to the utility and monthly demand charges should be replaced with daily demand charges.
- Tariffs should incorporate “time of use” charges or a mix of “time of use” charges and fixed charges as a reasonable proxy for “time of use” charges.
- Where fixed charges are employed, they should be based on the CHP system’s actual forced outage rate (FOR) or a good approximation of that rate.
- The tariff should incorporate cost-based price differentials for peak/off-peak demand to encourage system hosts to schedule outages for off-peak periods.
- Tariffs should include additional reasonable price differentials to encourage scheduled maintenance which reduces unscheduled outages.
- The Board should require each utility to offer an online bill standby rate calculator and provide a clear and concise summary of the standby tariff.

The Alliance appreciates the opportunity to present these comments.

Respectfully submitted,

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