

Missoula's 100% Clean Electricity Options Report

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APPENDIX I – Examples and lessons from other Cities around the U.S.

What cities in the US have or are currently pursuing 100% renewable energy or electricity targets?

A Link to the 100%RE database is [HERE](#). We intend to keep the database updated ~ every month.

When we talk about “100% renewable energy” in regards to pledges made by other communities, it’s important to acknowledge that this is often used as an umbrella term to encompass many forms of energy commitments, including 100% renewable energy, clean energy, and renewable or clean electricity (for our purposes, see definitions of these commitments earlier in this report). These communities may have their own goals and foci that differ from ours, but they still implement similar strategies and work that Missoula can adopt to achieve our own renewable electricity goals.

More than 80 U.S. cities, nine counties, and the states of Hawaii and California have adopted 100% renewable energy targets in one or more energy-use sectors, representing approximately 15% of the U.S. population and 10% of energy consumption.¹ Another 200+ mayors of cities in over 35 states, representing an additional 5% of U.S. electricity consumption and 6% of the population, have made 100% clean energy endorsements and are moving their cities toward renewable energy commitments, among them Missoula.² Additionally, more than 300 U.S. mayors have urged the federal government not to abandon the Paris Climate Agreement, again including Missoula.³

A recent publication by the Sierra Club’s **Ready for 100%** program, “2018 Case Study Report,” profiles some of the communities that have made renewable energy commitments and describes their efforts and success to date.⁴ Renewable electricity mandates can be achieved in a variety of ways, ranging from cities creating or purchasing their local utility and turning it into a publicly owned nonprofit entity, to working collaboratively with their existing private utility to green the electric generation portfolio in response to consumer demand. Along with greening the grid, renewable energy targets and greenhouse gas reduction strategies include reducing electricity and energy demand through energy efficiency improvements and demand reduction by customers; reducing social impacts from renewable energy investments by addressing economic inequality in how the cost and services of energy is allocated among stakeholder groups; electrifying transportation and heating to reduce demand for petroleum products and increase demand for renewable electricity; and reforming utility regulations to encourage decoupling and reward clean energy investments, energy conservation, and distributed energy owned and operated directly by consumers.

Utilities, whether public or privately owned, are customer service companies that offer an essential product to consumers. As such these utilities are or must become responsive to consumer demand and embrace technologies that are disrupting the utility business model and offering new strategies for providing clean energy and reliable service at affordable rates. Utilities that anticipate changing markets

¹ <https://www.sierraclub.org/ready-for-100/commitments>

² <https://www.sierraclub.org/ready-for-100/mayors-for-clean-energy>

³ <https://www.nytimes.com/2017/06/26/us/mayors-trump-climate-change.html>

⁴ https://www.sierraclub.org/sites/www.sierraclub.org/files/blog/1846%20RF100-CaseStudies2018_Report_06_web.pdf

are at the forefront of their industry and are effective partners for cities and states moving toward 100% renewable energy goals. When utilities fail to take a leadership role, cities are stepping in and taking control.⁵

What 100% models/initiatives are most relevant to Missoula?

Cities with 100% renewable energy goals most similar to Missoula are those in regulated utility markets, where government utility regulators oversee privately owned monopoly utility companies serving customers in territories without retail choice or competition. Salt Lake City, Park City, and Summit County, Utah are good examples of communities that have adopted 100% renewable energy targets and operate in regulatory circumstances similar to Missoula. Each of the communities has made significant commitments to environmentally, socially, and economically responsible practices in government operations and has established community programs to address climate change and promote energy efficiency, mass transit, clean air, renewable energy, and waste reduction. In order to map out a strategy to achieve their sustainability goals the Utah communities commissioned a report to evaluate the costs and opportunities for achieving a 100% renewable energy mandate, the “Communities Renewable Energy Study: Park City.”⁶ This report offers useful insights into how Missoula might approach its own renewable energy strategy. The report modeled two strategies for achieving the communities’ renewable energy goals, both of which are relevant to Missoula; a utility-approved renewable energy tariff and legislatively authorized Community Choice Aggregation. Green tariffs and Community Choice Aggregation are discussed elsewhere in this document.

Madison, WI also provides an interesting example of how to develop 100% renewable energy goals with a large investor-owned utility. Madison’s primary utility, Madison Gas and Electric (MGE), has its own energy goals of providing 30% renewable energy by 2030. However, this timeline is not conducive with the city’s much more ambitious goal of 100% renewable energy, even though the utility supports the city’s resolution. There is widespread community support for 100% renewables in Madison as there is in Missoula, but increased customer pressure and demand for alternatives will be necessary to push MGE to work within a shorter timeline.⁷ Some of Madison’s initial plans for achieving their goal involve the purchase and sale of Renewable Energy Credits in order to finance community-scale solar projects as well as multiple initiatives to make group solar purchases accessible and affordable.^{8,9} The city of Madison has also worked with MGE to develop shared solar programs and are both in discussions about transitioning the city’s fleet to electric vehicles.¹⁰ Madison holds commonalities with Missoula in the need to cooperate and work with their local utilities as well as a focus on solar development.

⁵ <https://www.utilitydive.com/news/join-or-die-how-utilities-are-coping-with-100-renewable-energy-goals/512664/>

⁶ <https://www.summitcounty.org/DocumentCenter/View/6701>

⁷ https://www.sierraclub.org/sites/www.sierraclub.org/files/blog/RF100-Case-Studies-Report-2017.pdf?promoid=7010Z0000010xYEQA0&utm_medium=web&utm_source=sierraclub&utm_campaign=readyfor100

⁸ https://madison.com/ct/news/local/madison-wants-to-transition-to-percent-renewable-energy-using-recs/article_8a322f39-871d-5fdb-bb8e-e494fdf58b73.html

⁹ <https://www.wpr.org/sierra-club-says-madison-ready-renewable>

¹⁰ https://madison.com/wsj/business/mge-ceo-jeffrey-keebler-pledges-to-work-toward-cleaner-energy/article_69f849c5-cbee-59f3-a12f-dcd8f5fb07c.html