

Clean Energy Options

BOMA Minneapolis' Energy and Environment Committee

Meeting

November 28, 2022

Helping Minnesotans build clean energy



MISSION

We connect individuals and their communities to the resources they need to identify and implement community-based clean energy projects



What is CERTs all about?



CONNECT TO RESOURCES

Ideas, inspiration, stories, people, information, tools, funding, and more!

COMMUNITY-BASED

Empowering communitydetermined conservation, efficiency, and renewables



How does CERTs help?





Hands-on assistance

For cities, counties, utilities, farmers, businesses, and other organizations looking to make a change



Practical steps to clean energy

Resources for getting started, moving forward, and completing projects



Learning opportunities

We host events, create resources, and highlight clean energy stories and jobs

CERTs Partners







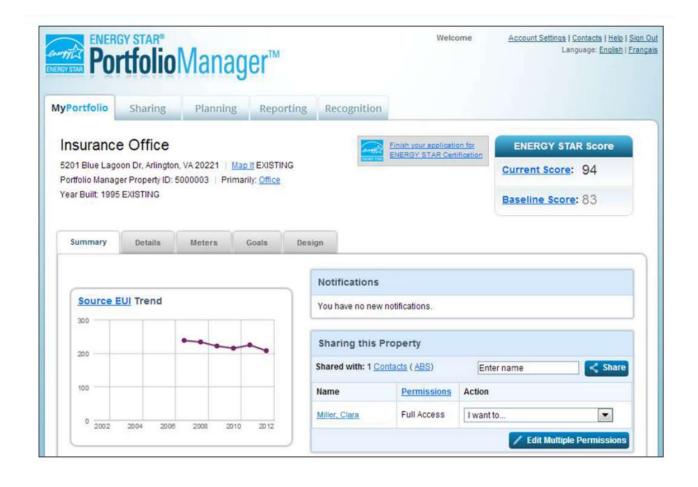




Renewables, yes! But don't forget energy efficiency

Measure Energy Usage





Energy Efficiency Rebates/Initiatives











Clean Energy Options

A Range of Pathways

- Xcel Renewable Connect (green tariff; wind & solar)
- Green Pricing/RECs (both)
- Virtual Power Purchase Agreements (VPPA)
- Community Solar Gardens
- Onsite Solar, with thirdparty financing
- Onsite Solar with direct purchase
- Investing in projects (both)



Xcel's Renewable*Connect & Windsource

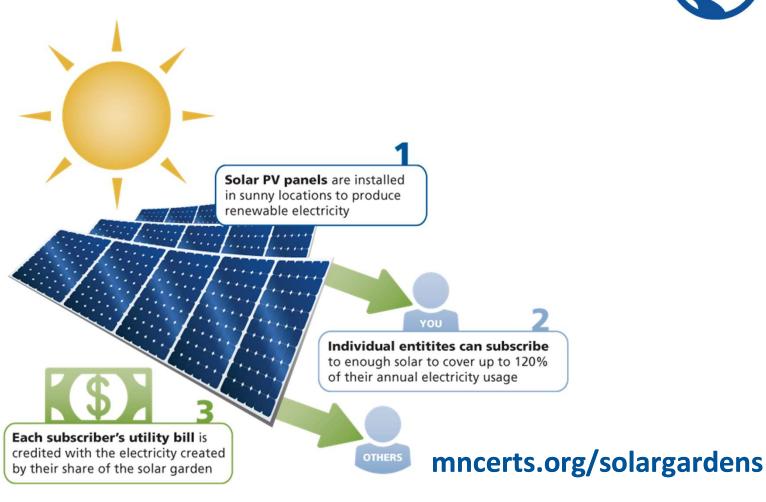
Is it available?	Windsource: Yes. Renewable*Connect: Not right now; more in development.
Do you pay more?	Yes. Both programs charge a premium to participate. Windsource: \$3.53 per 100 kWh block. After fuel credit, ~\$0.56-\$0.65/block Renewable*Connect: Between \$3.35 (longer term) and \$3.65 (monthly) per 100 kWh block. Net cost after fuel cost credit between \$0.43 and \$0.72.
Where is the power generated?	Windsource: Minnesota wind projects Renewable*Connect: Odell Wind Farm (80%) and the North Star, Marshall and Aurora solar projects (20%), all in Minnesota
Is it flexible?	Yes. Customers can purchase month-to-month, 5 year or 10 year terms.
Who gets the RECs?	The customer.

Community Solar Gardens?



Definition:

Centrally-located solar photovoltaic (PV) systems that provide electricity to participating subscribers







PPA & Direct Purchase



PPA Advantages

- No Upfront Costs/Take
 Advantage of Tax Credits
- No Maintenance Costs
- Predictable Cost of Electricity
- PPA (No Power Created? No \$)

PPA Challenges

- Long Term Contract w/Complex Terms
- Utility Rate Uncertainty

Direct Purchase Advantages

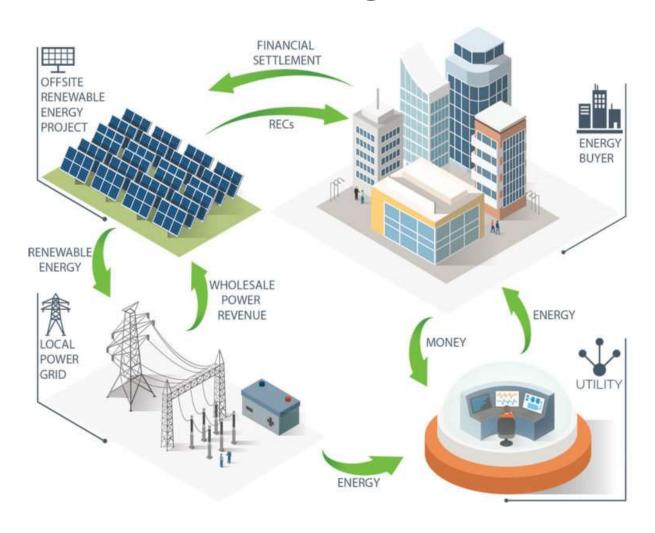
- Tax Credits & Grants
- Full Control Over Project

Direct Purchase Challenges

- Finding the \$\$\$\$
- Project Management & Ongoing Maintenance
- Historically no tax credits; no Accelerated Depreciation for tax exempt orgs.

Virtual Power Purchase Agreements



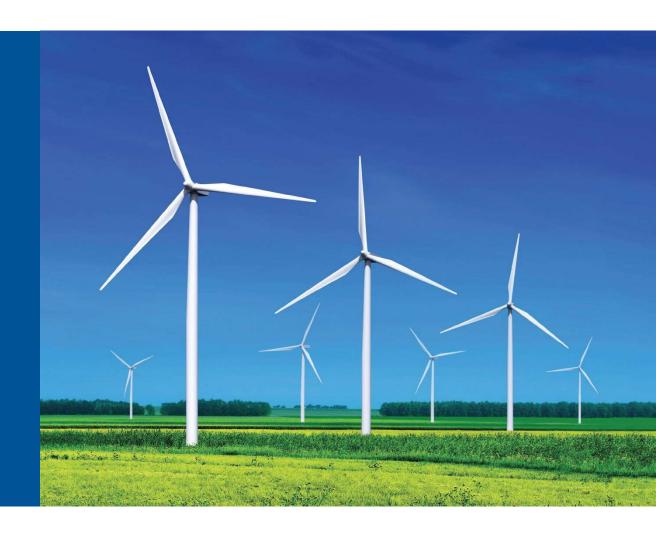




The Inflation Reduction Act: a brief overview

IRA & Wind

 Transferability of tax credits



Commercial Solar Incentives



Currently: tax credit is increased from 26% to 30% for any project in 2022

Starting in 2023 (60 days after Treasury issues guidance):

Project < 1MW: 30% tax credit

>1 MW: get 30% if meet prevailing wage and apprenticeship requirements

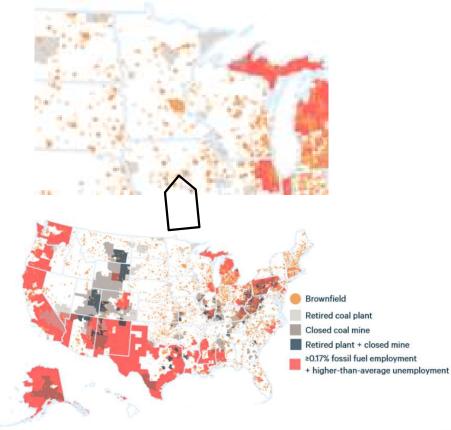
Starting Jan 1, 2025: become the "Clean Electricity Investment Credit," a technology neutral incentive

Note: this applies through 2032 or when power sector emissions are reduced by 75% below 2022 levels (whichever is later)

Source: https://www.seia.org/inflation-reduction-act-printer-friendly

Potential Adders

- **Up to 10**% for projects in "energy communities" (see image)
- Up to 10% for solar projects <5MW located in low-income communities (IRS application required)
- Up to 20% for solar projects < 5MW and built as part of an affordable housing project or to benefit low-income households (IRS application required)
- **Up to 10%** for using US-manufactured solar products and construction material.





Source: https://www.resources.org/common-resources/what-is-an-energy-community/

And Storage!



The most important change for the energy storage industry is that standalone energy storage assets are now eligible for the investment tax credit (ITC).



Image source: Institute on the Env Community Scale Energy Storage Guide

What is eligible?



Commercial Electric Vehicles:

- Up to 30% of the cost of an eligible vehicle
- Limit of \$7,500 for vehicles with a gross weight of < 14,000 lbs
- \$40,000 cap for vehicles at or above 14,000 lbs

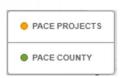
Renewable Energy Projects:

- Up to 30% of the cost of the project
- E.g. solar, wind, biomass, storage
- **Adders can also be captured via direct pay**

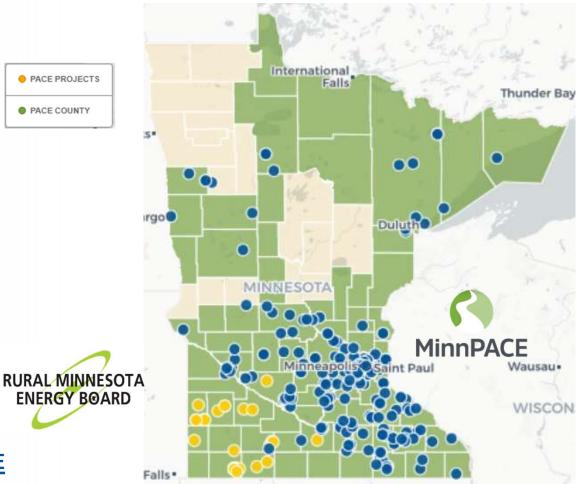
Property Assessed Clean Energy (PACE)



93% of the state has access to PACE financing (67 of 87 counties)



400 projects at businesses, multi-family apartment buildings, nonprofits, places of worship, and others



CleanEnergyResourceTeams.org/PACE

Center for Energy and Environment Loans



- Residential Solar:
 - Up to \$75,000;
 - 5-15 year terms
 - 3-5.5.% interest rate
- Non-Profit Loans
 - 0% interest loan
- Commercial Loans
 - 100K max





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https://www.cleanenergyresourceteams.org/inflation-reduction-actwhat-you-need-know