







VPPSA Members





Vermont's Municipal Utilities

Transparent

• Our utilities' books are open.

Non-Profit

• No motive for imposing higher costs than necessary on ratepayers

Community-Owned

• Financial benefits flow directly to community members.

Democratically-Controlled

• The public has a voice in utility decision making.

When a Municipal Utility develops a solar project, it is a community energy project.





VPPSA Renewable Energy Projects

Bone Hill Solar:

- Northfield
- 1.25 MW
- June 2021

Lawrence Brook Solar:

- Morrisville
- 2.2 MW
- December 2020

Billings Road Solar:

- Hardwick
- 1.62 MW
- June 2021

Pecos Wind Partnership:

- Community Energy
- 85 kW generators
- Price competitive with solar





Existing Policy Framework

Renewable Energy Standard

Dictates the amount of renewable energy to be sold to Vermont consumers.

Least-Cost Integrated Resource Planning

A 20-year plan that is filed with Public Utility Commission every three years. 30 V.S.A § 218c.

VPPSA's Approach

- Low-Cost,
- Renewable,
- Local, and
- Reliable





How would your organization define Vermont's renewable energy generation challenge(s)?

Overly prescriptive mandates that dictate how Vermont's goals must be met.

Excessive focus on electric sector to the detriment of tackling emissions and costs from other sectors.

- strategies.



• This approach has been demonstrated to result in unnecessary costs to ratepayers.

Electric sector accounts for 10% of emissions and 23% of household energy costs.

Funds spent promoting solar cannot be spent on more effective climate mitigation

Is it to address how Vermont can make more progress on fulfilling its Tier 2 obligations in the most cost-effective manner?

Utilities are meeting Tier 2 cost-effectively

- Partnering with developers and negotiating the best value for ratepayers • 2019 Tier 2 Compliance cost ~ \$39/MWH
- Alternative Compliance cost ~ \$62/MWH • The biggest obstacle to meeting Tier 2 cost-effectively is the price of net metering.

Vermont's collective experience with administratively set rates has resulted in excessive costs to customers.

- Standard Offer auction mechanism dropped prices 50% in one year.
 - 2012 price 27.1 cents/kWh
 - 2013 price cap was 25.7 cents/kWh
 - 2013 contracts were awarded for 13.4 -16.9 cents/kWh
- Developers will respond to policy changes and market forces ullet





Cost Comparison

Long-Term Cost of Solar Energy by Program (Levelized \$/kWh)







Is it to address energy burden and social inequity by developing RE for low-income Vermonters?

VPPSA members concerned that the financial benefits of solar have largely gone to higher-income communities

Participation by low-income customers should be subsidized to ensure access.

Attempting to address income inequality through the regulated electric sector has drawbacks.

- Any adders beyond the value to the utility creates a cost shift.

Energy burden must be looked at across energy sectors.

Transportation sector accounts for highest emissions and household expenditures



Financial benefits that flow to some customers are *costs* to other customers.

Is it to sustain the state's workers in our clean energy economy?

- environmental or consumer benefit
 - electric ratepayers
- push costs onto other customers.
 - Electric rate pressure undermines economic development.

Solar is not the only element of the "clean energy" economy.



Rationale for more solar development focused on jobs rather than

• Not sustainable to assign the cost of maintaining profits for a specific workforce to

VT will end up losing other sectors of the economy if we continue to

VT must focus on clean energy in the heating and transportation sectors.

And who should own these new assets?

- Utilities evaluate all ownership structures.
 - Utility-owned, merchant projects, PPAs, etc.
- to lead on RE generation?
 - Not in ratepayers' best interest for for-profit developers to lead.
 - Developers are not obligated to engage in least cost planning.
 - Developers can participate in RE development through Net Metering, Standard Offer, 4.100 (PURPA), and utility contracts/PPAs.
- And at what scale do we want to build such facilities?
 - Diversity of scale is desirable. 5 MW is too big for many munis.
 - Achieve economies of scale while locating generation close to load



Outside of net metering, what opportunities are there for developers

Where are we now?

On the way to a 100% carbon free electric supply

- Utilities are partnering with solar developers to build projects. \bullet

Vermont's lucrative solar programs have resulted in solar development costs in excess of what is beneficial to ratepayers.

- The time for solar subsidies has passed
 - Solar can compete economically on its own.

Cost pressure in the electric sector is undermining state climate goals.



RES requires 75% renewable electricity by 2032. VT is on track to achieve that.

Increasing electric costs make it more difficult to electrify heating and transportation. Solar beyond current requirements will necessitate expensive grid upgrades.

Where do we want to be?

Cleaning up the other two energy sectors.

- from heating and transportation.
 - burden and significantly reduce carbon.
- generation.
 - Metering and Standard Offer.
 - Minimize transmission costs to ratepayers

 Investing in strategies to cost-effectively manage load and renewable generation.





• Significant progress is needed in reducing emissions and household costs

• For example, subsidizing EVs and Heat Pumps would alleviate energy

Implementing policies that result in sensible siting of renewable

• The grid adjustor concept proposed in S. 119 could be applied to Net



- and cost shifting.
 - Utilities could be forced to sell excess generation at a loss. •
- - Renewable energy in excess of Tier 2 will be sold out of state.
- major upgrades to the transmission system.
 - We can meet existing Tier 2 requirements if located sensibly.
 - ability to site power for our own use in VT.



Any adjuster beyond value to ratepayers creates rate pressure

S. 119 doesn't require renewable power to stay in Vermont

Solar deployment in Vermont is on the verge of necessitating

• Forcing utilities to overpay for more solar than needed compromises our

Recommendations

Require Distribution Utilities to offer Community Energy Programs.

- Utilities will select the model that meets this mandate at least-cost
- Use state funds to subsidize participation by low-income Vermonters.
 - Avoid rate pressure and cost shifting

• For example, \$9 Million could pay for 3 - 6 MW of solar capacity

- Serve ~1000 2000 households' total electric need <u>OR</u>
- ullet



Provide ~25% discount to 4000 - 8000 households on their monthly bills



Melissa Bailey

Manager of Government and Member Relations

Phone: (802) 882-8509

P.O. Box 126 5195 Waterbury-Stowe Road Waterbury Center, VT 05677





Putting the Public in Power.

www.vppsa.com