

**EXHIBIT 6**  
5-UR-107  
09/24/2014 (aff)

PSC REF#:218660

Ex.-RENEW-Gilliam-6

Public Service Commission of Wisconsin  
RECEIVED: 09/22/14, 12:00:31 PM

# PV Value Analysis at We Energies

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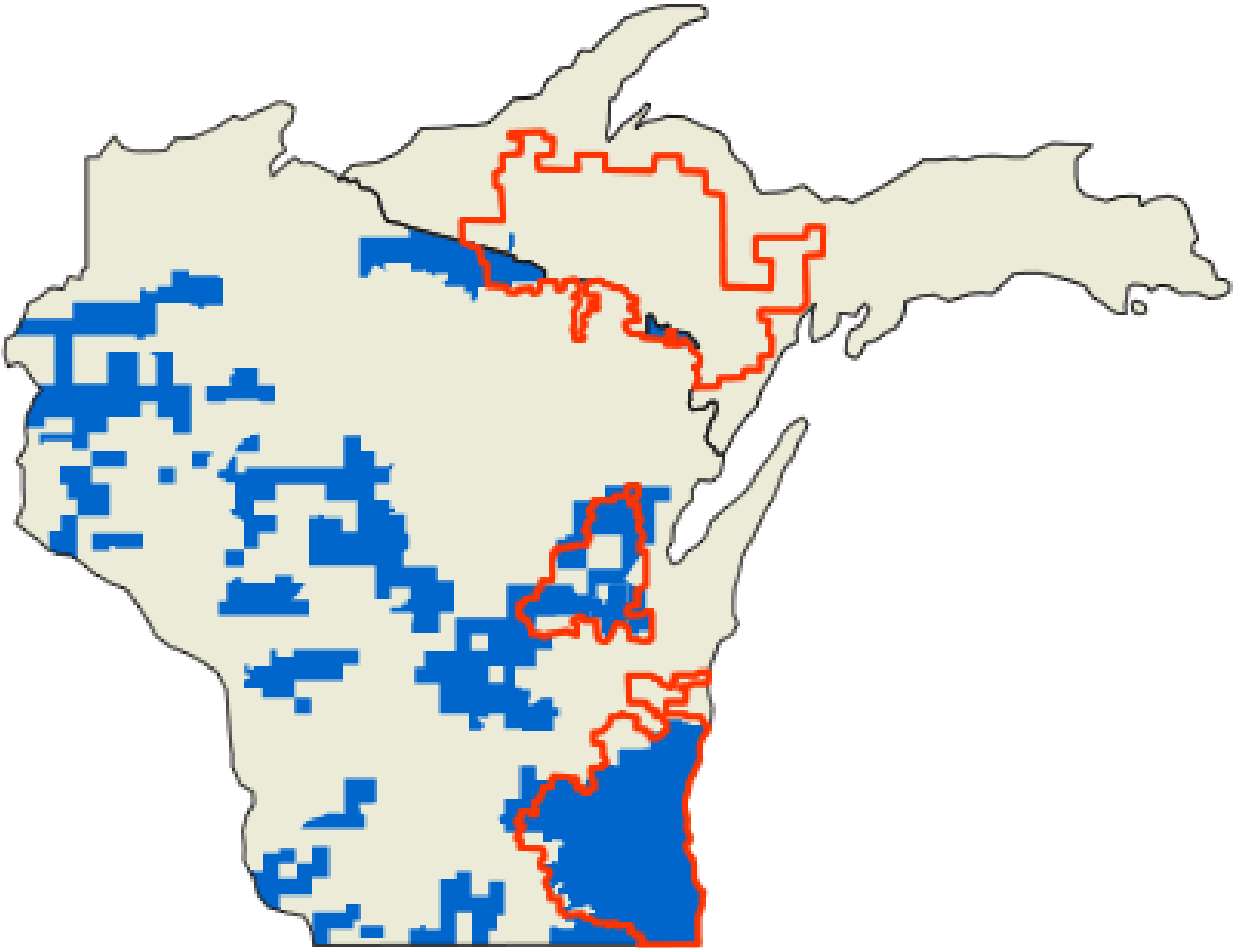
Regulatory Affairs & Policy

We Energies

Milwaukee, Wisconsin



# We Energies Service Territory



- We Energies: Gas Service Area
- We Energies: Electric Service Area



# The Questions

- n Why do solar?
- n What is the economic value of PV to a utility company?
- n More specifically, what is the economic value of PV to We Energies?



# PV Systems Used in the Study

Studied seven different PV configurations at three different locations for a total of 21 PV systems.

## PV Configurations

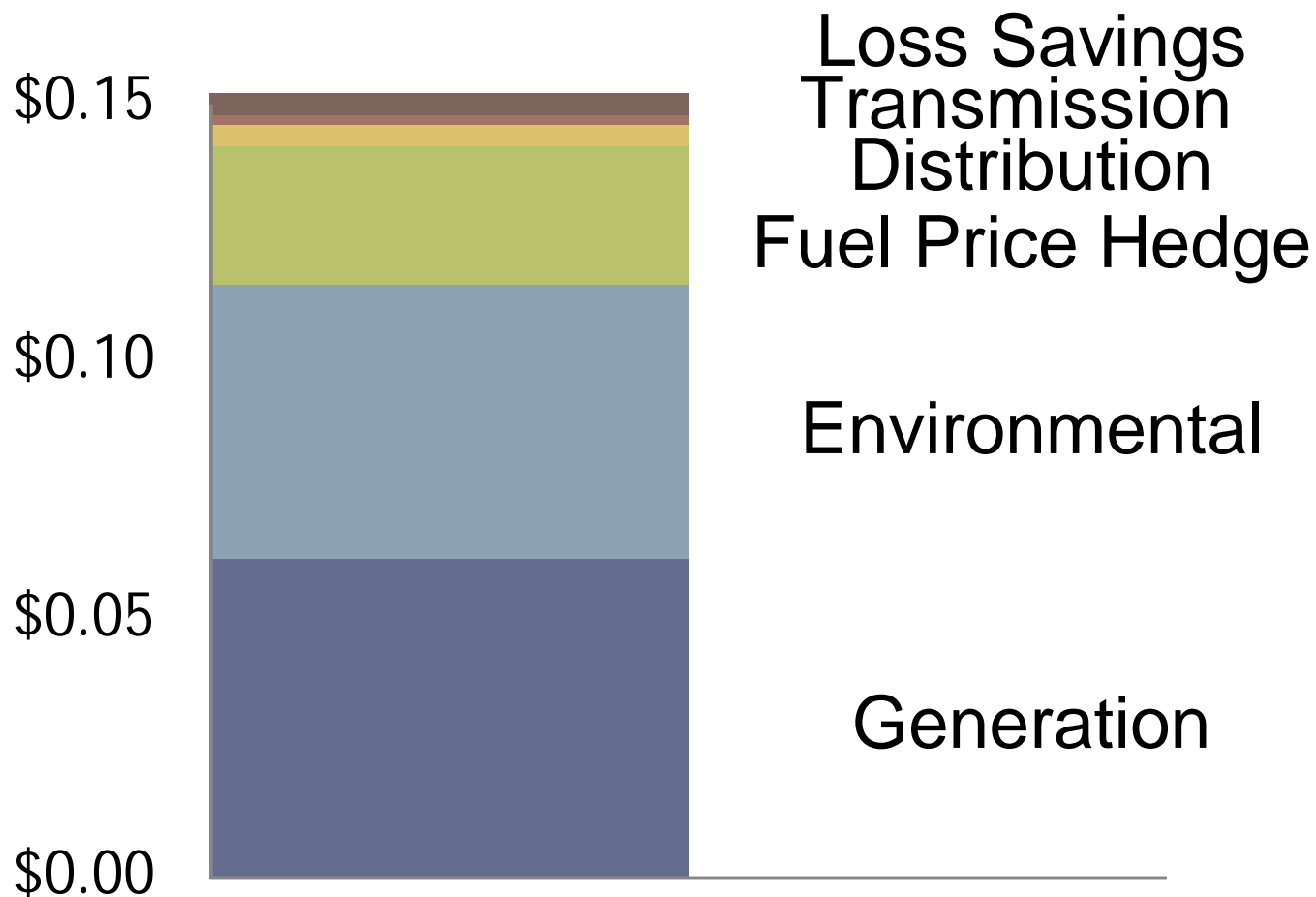
1. Horizontal
2. South-facing with 30° tilt.
3. Southwest-facing with 30° tilt.
4. West-facing with 30° tilt.
5. West-facing with 45° tilt.
6. North-south 1-axis tracking with no tilt.
7. North-south 1-axis tracking with 30° tilt.

## PV Locations

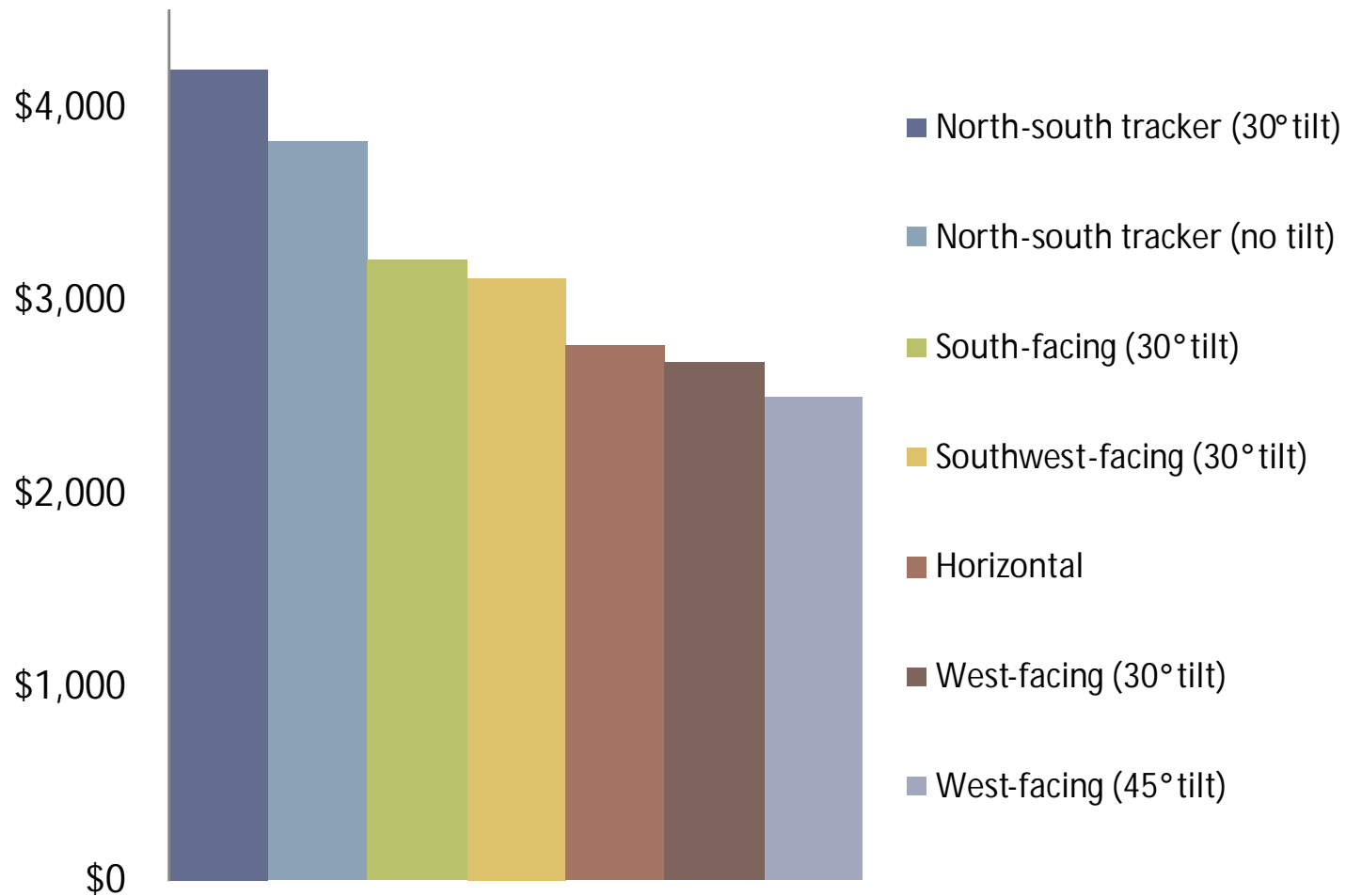
1. Merton
2. Albers
3. Union Grove



# Economic Value of PV (\$ per kWh)



# System Configuration Impacts the Value of PV (\$ per kW<sub>AC</sub>)



# Some Observations

- n Valuations were greatly impacted by the market conditions that prevailed at the time of the study. Historically, these market conditions have been highly volatile.
- n Value per unit of energy was calculated to be about \$0.15 per kWh over the assumed PV system's 30-year lifetime.
- n PV system configuration had a significant impact on the economic value of a unit of installed capacity.





# Some Observations

- n This study did not include the capacity value of the PV systems.
- n This analysis assumed that Renewable Energy Credits can be traded across state lines. Currently, Wisconsin Renewable Resource Credits are not tradable outside of our state.
- n Generation, Environmental, and Fuel Price Hedge Values were the highest while Distribution, Transmission, and Loss Savings Values were relatively low.



# Thanks!

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