

# **New York's Reforming the Energy Vision (REV) Proceeding**

**Steven Mysholowsky  
September 30, 2015**

# Drivers Behind REV

- Intensive Electric Grid System Upgrades 2000-2010
- Hurricane Irene – 2011
- Hurricane Sandy – 2012
  - Ensuing Consequences
- Big Picture Reviewed by State
- Storm Hardening Initiatives Followed
  - Storm Walls ; Submersible Pumps, etc.
- REV Initiative Instituted

# REV Core Objectives

- Enhance Customer Knowledge / Options\*
  - Active Customer
  - Passive Customer
- Market Animation
- System Efficiency
  - Address Peak Reduction Utilizing a Targeted Methodology
- Fuel & Resource Diversity
- System Reliability and Resiliency
- Reduction of Carbon Emissions

# REV Proceeding Principles



## Track One: Implementation

*Distribution-level market design, technical platform, integrated system planning & operation, new utility business models, ownership of distributed resources*

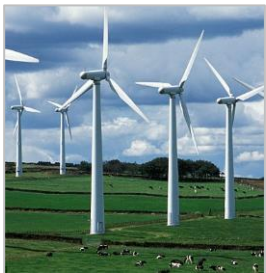
- Utilities will be the Distributed System Platform
- Utility ownership of DER limited to backstop
- 5-Year Implementation Plan due June 30, 2016; annually thereafter
- Initial Demonstration Projects filed July 1
- Energy Efficiency Transition Implementation Plan (ETIP) filed July 15



## Track Two: Regulatory & Ratemaking

*Rate design, performance-based ratemaking, extended rate case periods*

- Staff straw proposal issued July 28



## Track Three: Renewables

*Large-scale renewables, renewable portfolio standard*

- NYSERDA options paper issued June 1
- Utility ownership is being contemplated among other models

## TRACK 1

# Distributed Energy Resources (DER)

### Description



- DER primarily includes distributed generation and storage
- Demand-side management can be managed by utilities, ESCOs, and aggregators

### Status – Track 1 Order

- Regulated utility ownership of DER is limited to:
  - “Backstop” situations where the utility has identified a need that the market is unable to meet
  - Storage directly integrated into the distribution system on utility property
  - Low- and Moderate-Income offerings
  - Demonstration projects
- Affiliates can participate with some restrictions – e.g. independent evaluator for utility solicitations and market operations, code of conduct rules
- Utility retains role in managing energy efficiency and demand response programs, though DR aggregators independently participate in markets

## TRACK 1

# Distributed System Platform (DSP)

### Description



- System and market operator
- Dispatch distributed resources
- Interface with wholesale markets

### Status – Track 1 Order

- Utilities will be the DSP
  - Utilities will become separate DSPs with certain standardized elements across the State
  - Common look-and-feel, technical protocols, and market rules
- By expanding the role of the utility to include DSP functions, utilities will have the regulatory obligation to optimize and support DER
- Initial 5-year Distributed System Implementation Plan (DSIP) due June 30, 2016; annually thereafter

## TRACK 1

# Customer Relationship



- Changing relationship with customers for utilities
- Consider best ways to engage customers in product and service offerings\*
  - Customer billing is being evaluated to increase the value of information provided to customers
  - Digital marketplace will facilitate robust DER markets
  - Advanced metering will enable customer engagement and DER integration ???
  - New rate designs are contemplated to encourage behavioral change
- Utility becomes enabler of customer options and provider of reliable service

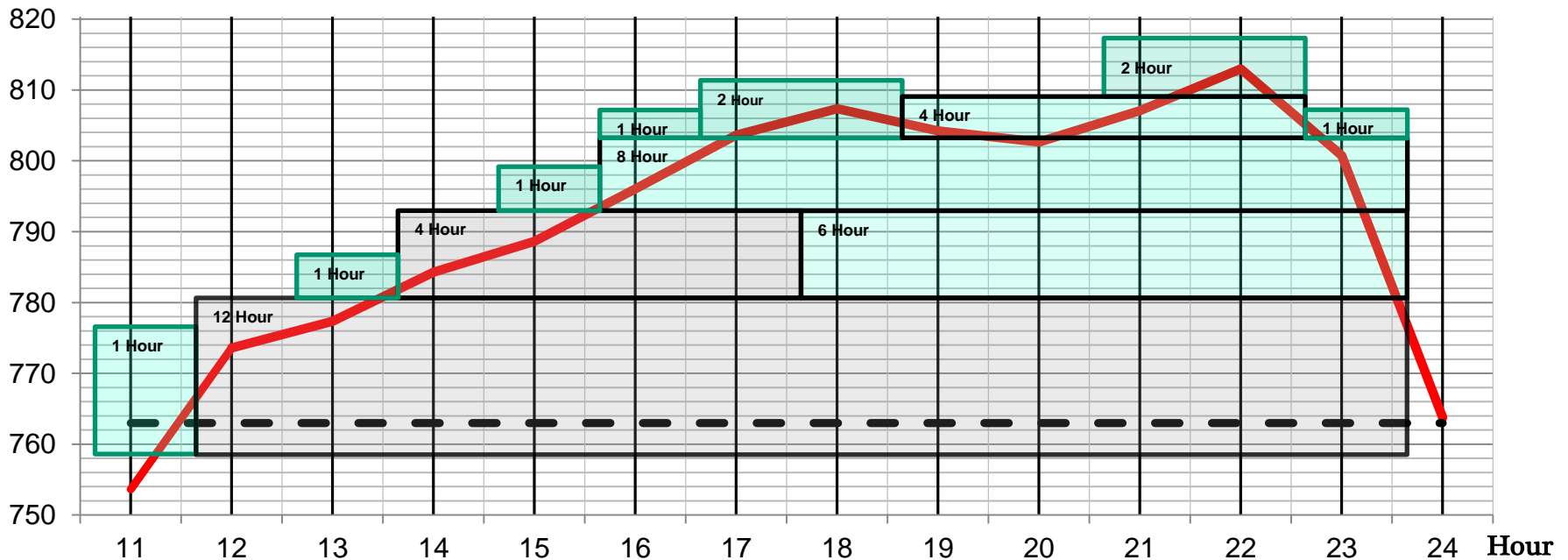
# Brooklyn-Queens Demand Management

## Description



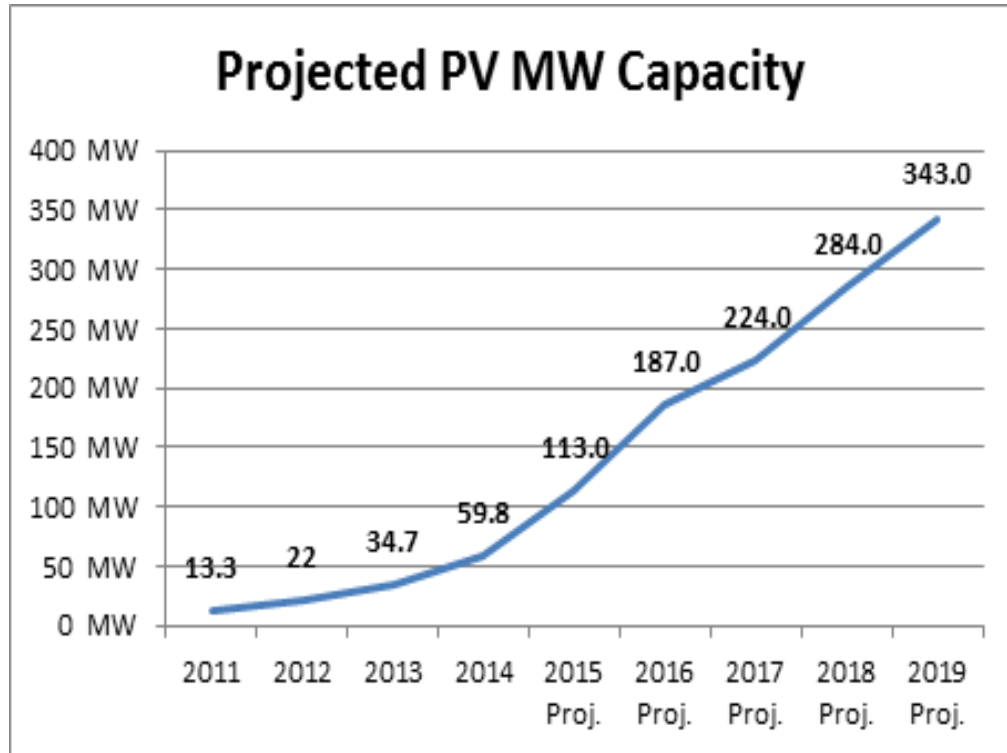
- \$1.2 billion substation deferral using portfolio of alternative investments in Brownsville load area (3 Networks)
- Earn rate-of-return plus incentive based on implementation

Sample Network Peak Day Load Curve

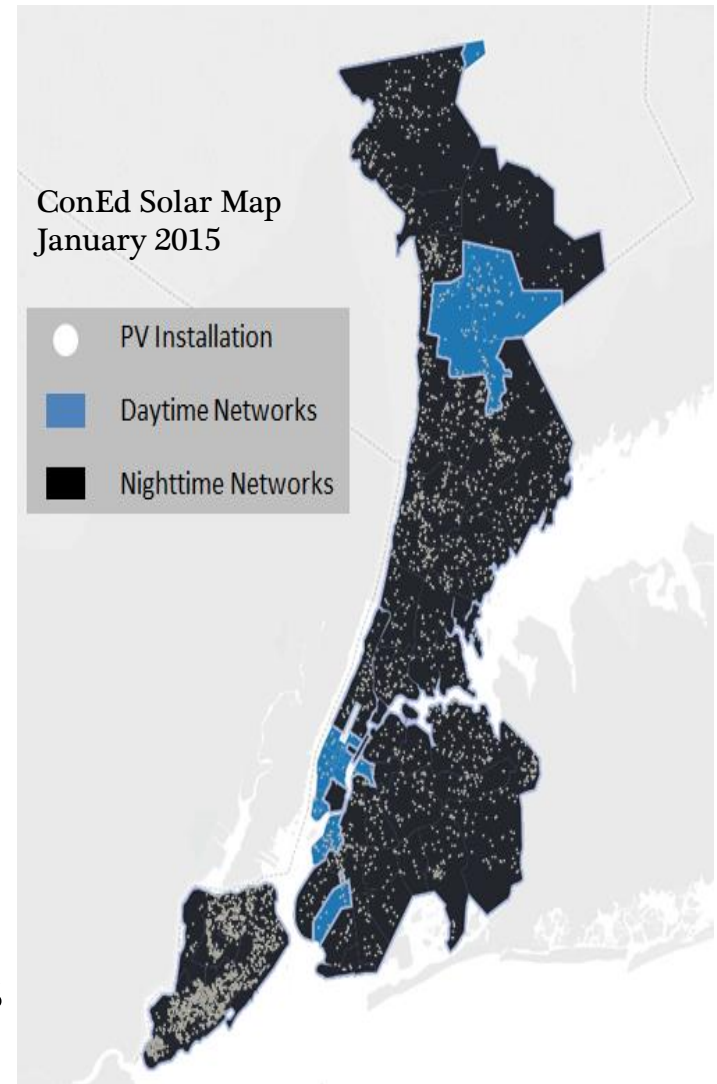




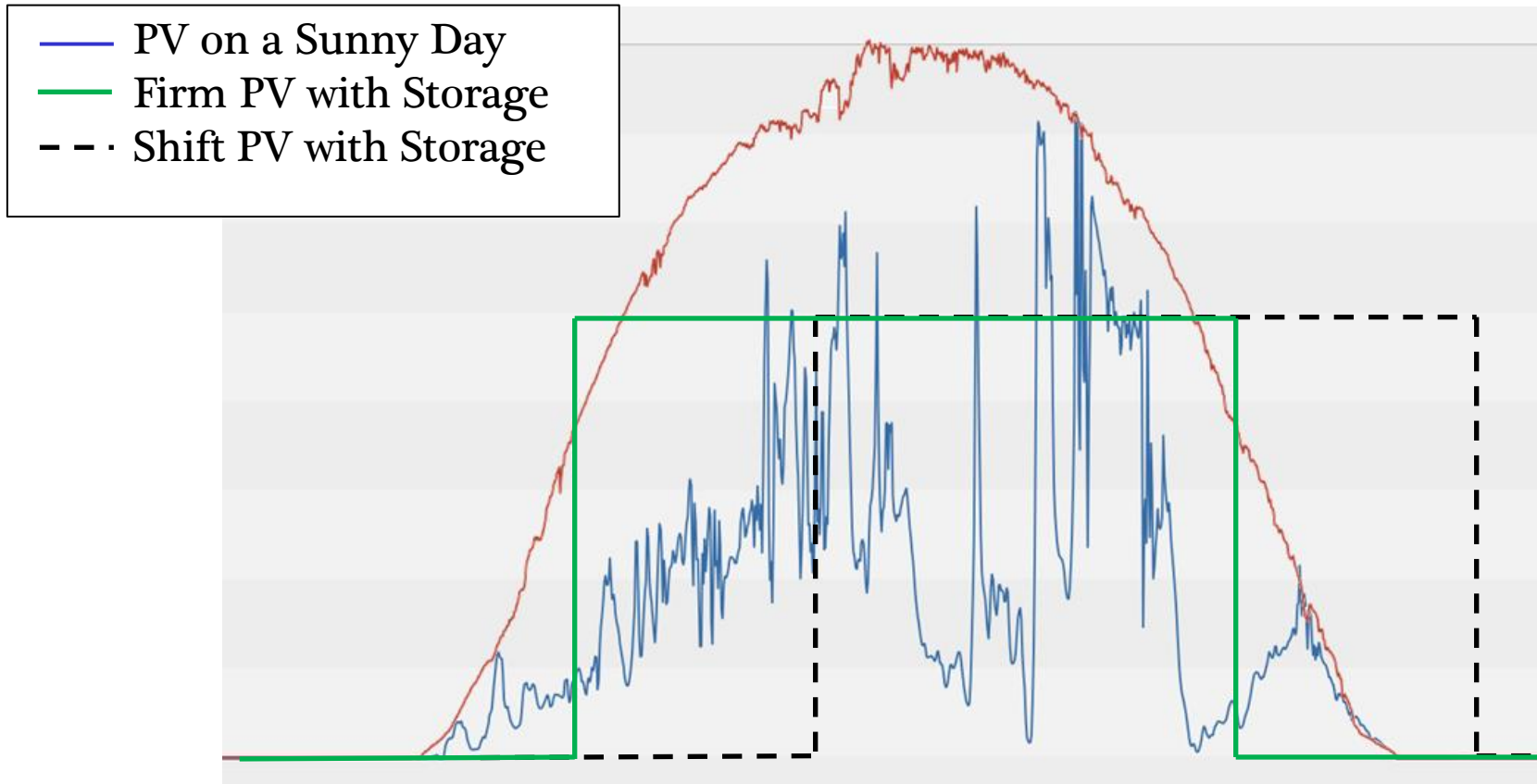
# Demonstration Project: Virtual Power Plant



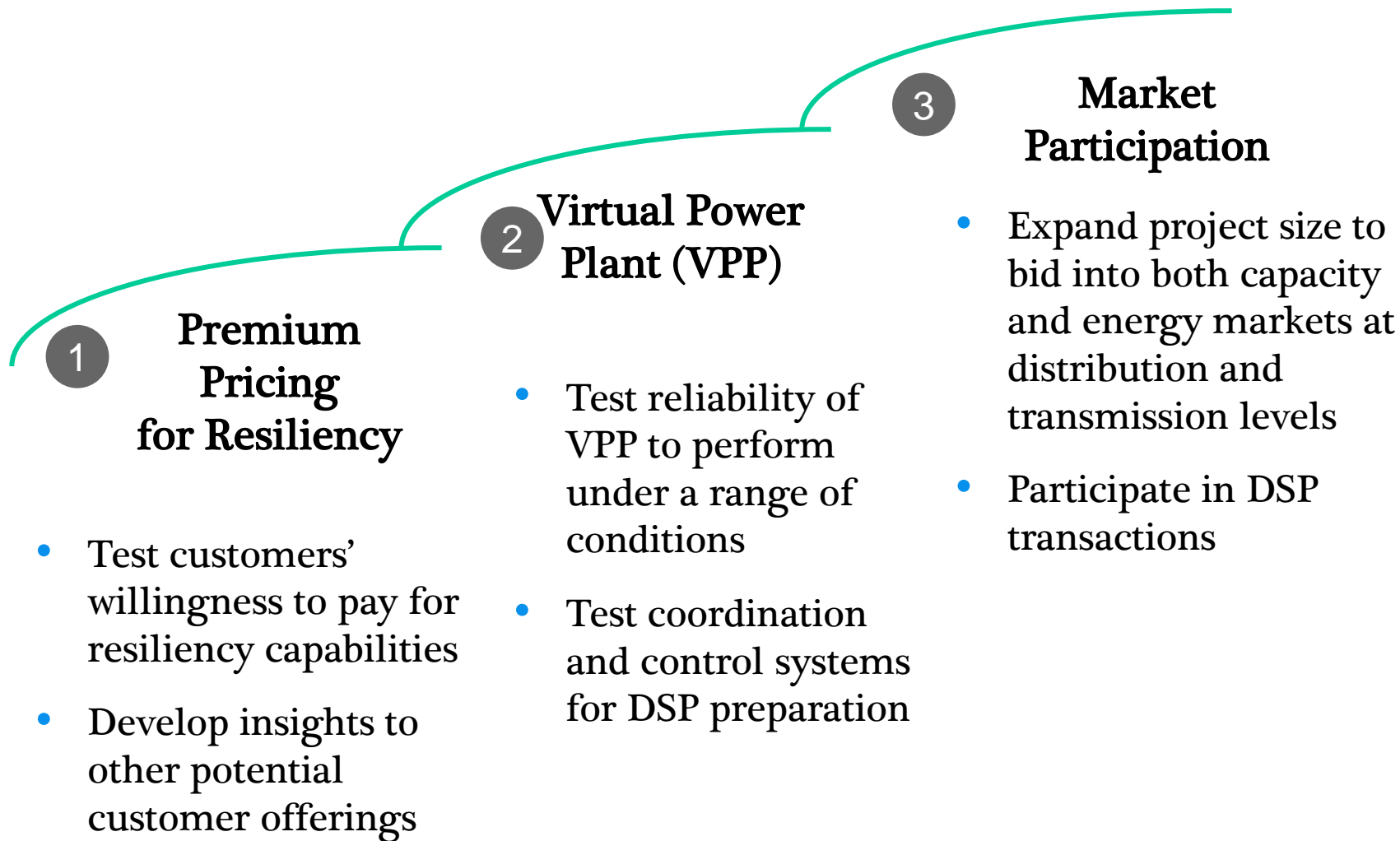
- Production is not aligned with system needs
- PV alone goes offline during grid outages



# Demonstration Project: Virtual Power Plant



# Demonstration Project: Virtual Power Plant



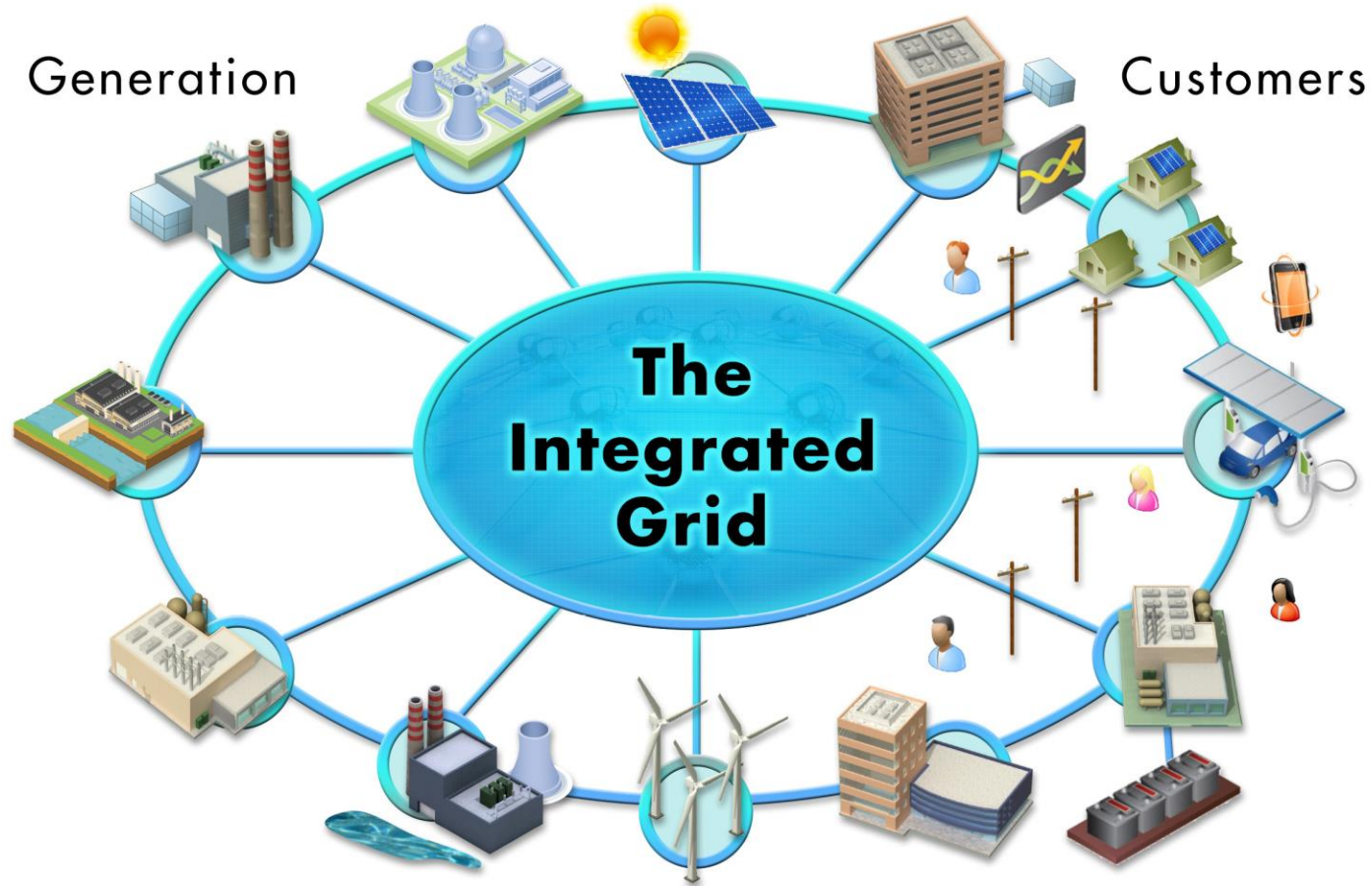
# REV's Impact on EM&V

- Conduct more technology specific evaluation research
- Conduct less program based impact evaluations
- Added emphasis on M&V
  - Project Based reviews
  - Technology Based reviews
  - TRM Based insights based upon in-situ metering
  - Better define load curves
- AMI Infusion for information & education will help ??????????
- EE/DR Program offerings continue – short term (minimum 5 years)

# Summary

- Manage the Grid Efficiently
- Engage the Customer and Offer them Choices to Manage their Costs & Energy Consumption (Timing)
  - Rate Design
- Work Collaboratively with Manufacturers / Market Partners to serve the needs of the Marketplace, and align with System Needs
- At the end of the day.....
  - It about the reductions we see at the meter that counts

# REV: The Future Electricity Business Structure



# Questions

Steven Mysholowsky

Section Manager – EM&V

Con Edison

212.460.2120

[mysholowskys@coned.com](mailto:mysholowskys@coned.com)