

# Proposed Energy Efficiency Forecast in the ISO-New England Planning Process

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# New England's Electric Power Grid at a Glance

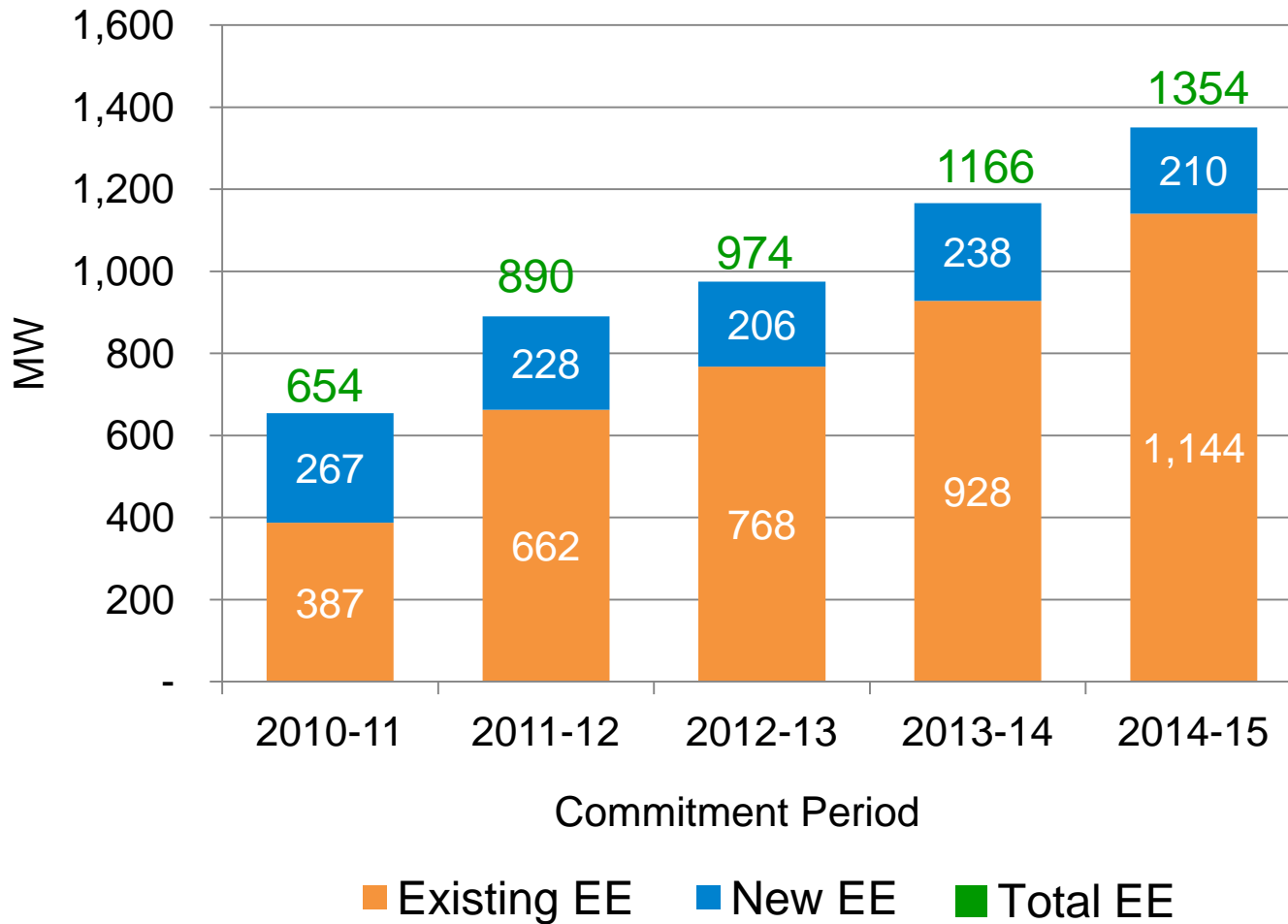
- 6.5 million households and businesses; population 14 million
- More than 300 generators
- Over 8,000 miles of high-voltage transmission lines
- 13 interconnections to electricity systems in New York and Canada
- Approx. 32,000 megawatts of total supply and 2,750 megawatts of demand resources
- All-time peak demand of 28,130 megawatts, set on August 2, 2006
- More than 450 participants in the marketplace
- \$5-11 billion annual energy market value



# Energy Efficiency in the Forward Capacity Market

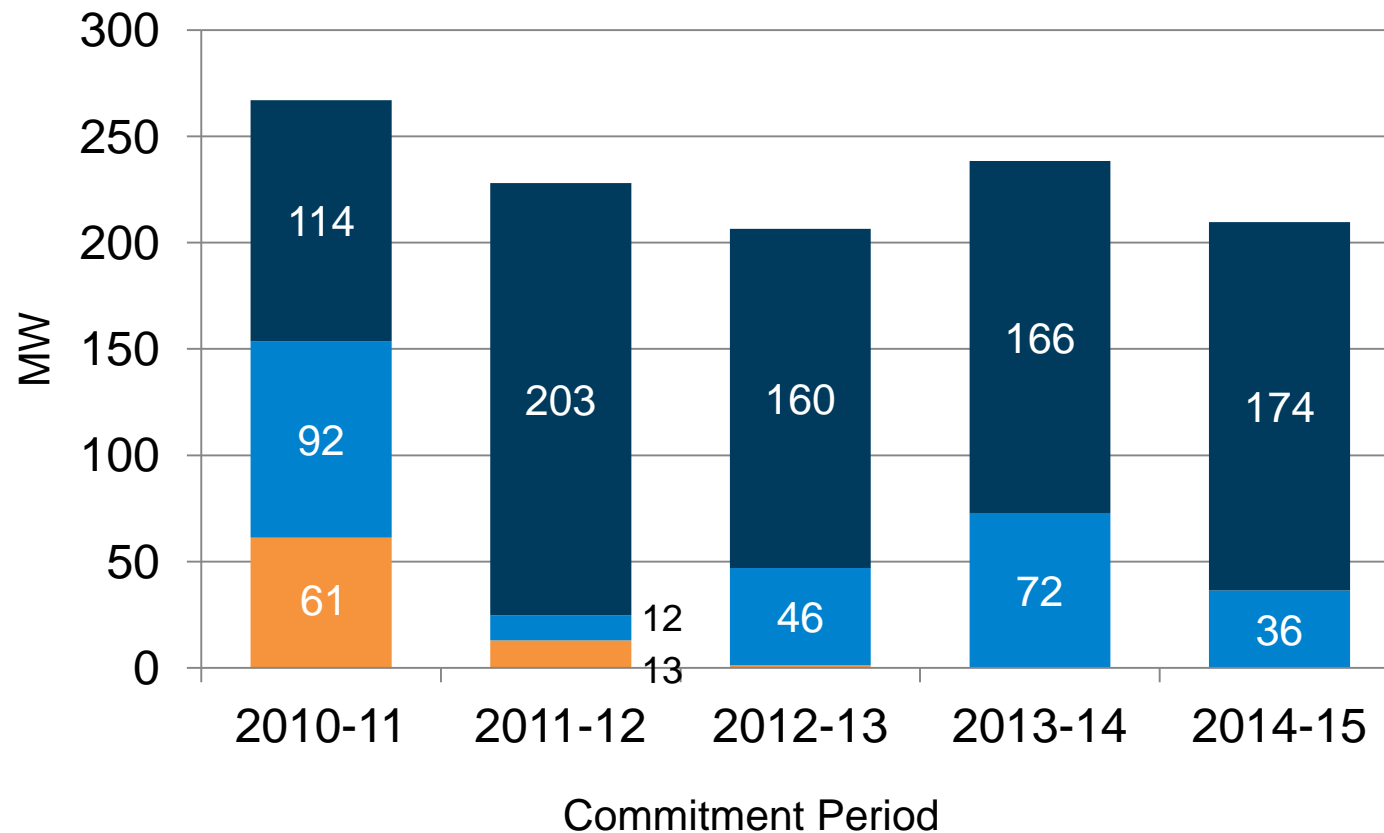
- Supply Resource used to support installed capacity requirement 3 years forward
- Same payment rate as all other supply resources
- Paid a Gross Up for avoided transmission & distribution
- Subject to penalties and termination
- Audited for each summer and winter season
- Required to submit M&V documentation quarterly/monthly
- Capacity payment only allowed for measures within useful measure life

# Total Energy Efficiency Cleared Capacity\*



- Cleared Capacity include 8% T&D Gross-Up,
- 2010-11 and 2011-12 also includes Reserve Margin ,14% and 16%, respectively.

# New Energy Efficiency Cleared Capacity by Lead Participant Type\*



■ Merchant 
 ■ Quasi Gov 
 ■ Utility

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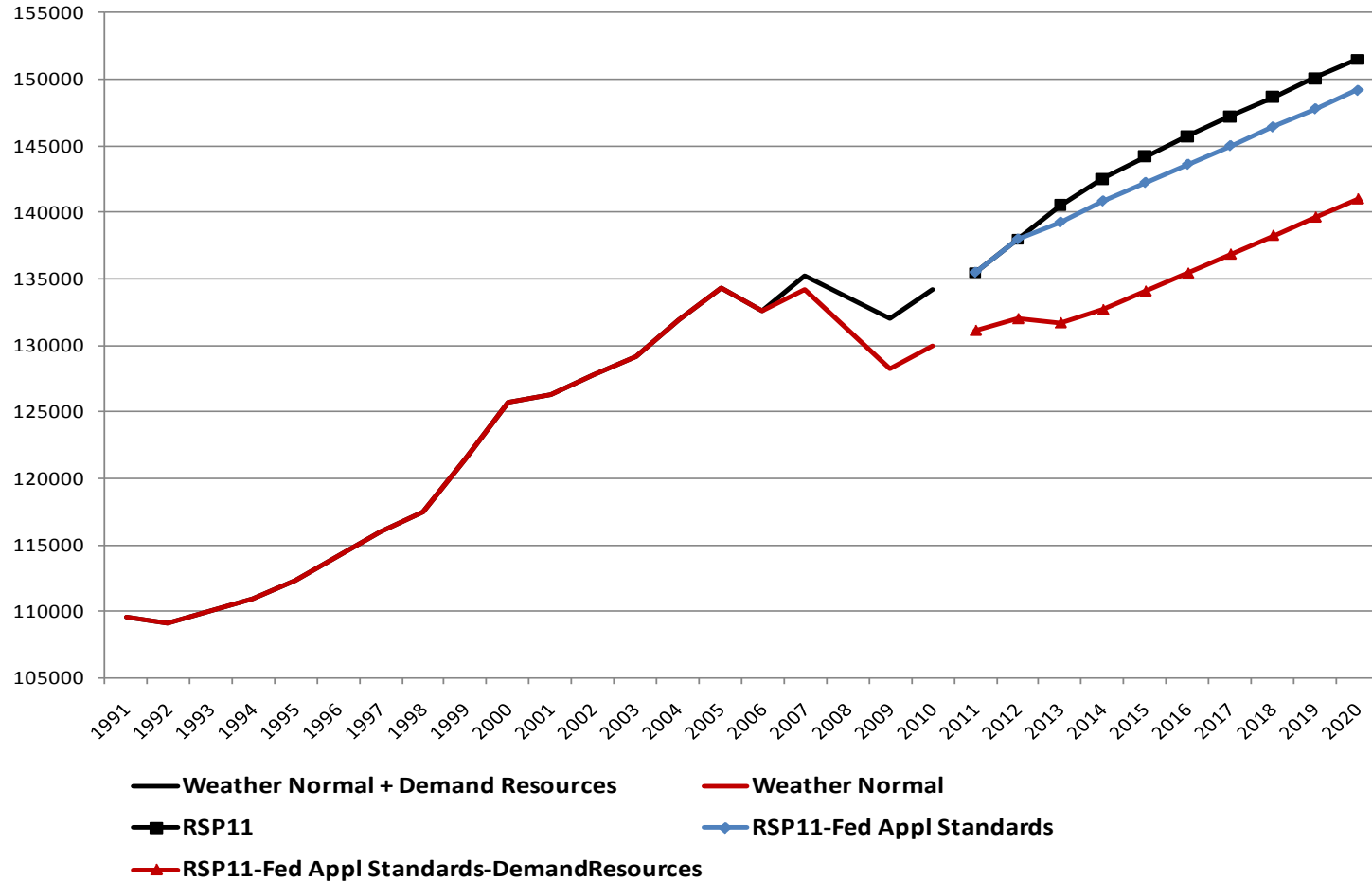
# Energy Efficiency in Planning Process

## ISO's Current Practice

- Installed Capacity Requirement (ICR)
  - EE resources in the Forward Capacity Market (FCM) are treated as resources that contribute toward meeting New England's ICR and are reconstituted into the load forecast
- Load forecast
  - Reflects historical EE not in FCM, econometric data and future Federal appliance efficiency standards
  - Subtracts FCM cleared EE
  - Assumes FCM cleared EE remains constant through the 10 year planning horizon

# Energy Efficiency in Planning Process

ISO-NE Annual Energy (GWh)  
Weather Normal 1991-2010 RSP11 Forecast 2011-2020



# Outline of ISO-NE Energy Efficiency Forecast Model

- To forecast incremental EE beyond last year of FCM cleared resources
- Methodology – forecasting the budgeted dollars for EE and adapting historically based MWh saved per dollar spent by state sponsored EE programs
- Budget forecast may be derived from multiple revenue sources
  - System Benefit Charge
  - Regional Greenhouse Gas Initiative
  - FCM
  - Policy based