

# **PJM Plan for Load Forecast Model Enhancements for 2012 Forecast**

Markets and Reliability Committee  
September 15, 2011

- In 2010, Itron was retained to perform an assessment of the PJM load forecast model and to make recommendations for potential changes/enhancements
- Itron made recommendations regarding:
  - Selection of economic driver
  - Selection of economic vendor
  - Use of electricity price term
  - Determination of monthly load profile across season
  - Allocation of PJM coincident peak (CP) across zones

- Itron recommendations were reviewed through PJM stakeholder process. Stakeholders decided to not implement any changes for the 2011 forecast but to investigate further for possible future implementation.
- Itron performed follow-up work and issued their phase 2 report in July 2011. PJM received feedback from stakeholders at August and September LAS and PC meetings.

- **Implement the Itron-recommended Index2 variable**
  - Index2 uses six components instead of one. Anticipated to lead to more stable and accurate forecasts over time
  - Index2 is more zone-specific than Index1 (uses zones' customer class sales data to weight the six components)

- **PJM will continue to use only the Moody's Analytics economic forecasts to develop the economic driver for the 2012 load forecast.**
  - Concerns with Global Insight long-term growth rates
  - PJM will revisit pooled economic forecasts for 2013 load forecast

- **PJM will not add an electricity price variable to the peak or energy models**
  - Test of price variable in four zonal models indicated:
    - Results were inconsistent and in some cases spurious (positive coefficients, unrealistic magnitude/elasticity)
    - Results were equally weak for summer peak load and net energy for load
  - Additional challenges of collecting historical data and forecasting prices

- **PJM will adopt the Itron proposal for allocation of CP forecast for use in planning studies (This change will have little to no impact on planning study results)**
- **PJM will continue to use the existing CP allocation procedure for use in RPM**

- Draft Manual changes reviewed with PC and MRC in September
- Request PC and MRC endorsement of Manual changes in October
- Will implement changes for use in load forecast to be released in January, 2012