Synchrophasors Update

TOA-AC: December 5, 2014

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PJM Interconnection, LLC
PJM is providing PMU Owners with Weekly Data Quality Reports

- **Highlighting Improvements & Issues**
- **Latency Distribution, Trending & Spike statistics**
- **Data Error Issues based off Time, Synch, Transmission, Data Invalidity & Drop Error.**
- **Details on an individual PMU basis**
Potential PMU Data Quality in TO Metrics

- Phasor Data Quality Task Force (PDQTF) indicated a need for additional PMU Data Quality visibility within the company to emphasize correcting Data Quality issues.
- Discussing incorporating PMU Data Quality statistics in the TO Metrics.
- Some SIS/PDQTF members concerned over including this data before it’s deemed “Production” ready internally to the TO.
- TOA-AC Recommendation?
Further the stability of the network by advancing the integration of PMU data into PJM’s systems and applying the high speed data being collected to dispatch operations.

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<th>Importance to PJM</th>
<th>Goal Measurement</th>
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<td>• Provides expanded data sharing capabilities and comprehensive view of the system</td>
<td>• Implement a new Eastern Interconnection Data Sharing Network</td>
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<td>• Enables rapid detection of system disturbances and proactive resolution of stress conditions</td>
<td>• Develop a wide-area visualization display to include PMU data covering the entire Eastern Interconnection</td>
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<td>• Delivers real-time high resolution data to inform dispatch decisions</td>
<td>• Deploy oscillation detection tool enhancements</td>
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<td>• Improves modeling through higher quality system data, more accurate state estimation, dynamic model validation and detection of bad telemetry data</td>
<td>• Create procedures to address oscillation detection mitigation measures</td>
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<td>• Implement an enhanced real-time phasor data quality conditioning application</td>
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Working with PMU Owners on an Individual Basis

- *Develop a Company by Company 2015 Data Quality goal*
- *Work from the Company by Company 2015 Data Quality goal to determine an overall PJM 2015 Data Quality goal.*
- *Differentiate between planned PMU outages and unplanned data issues.*
  
  **PJMSynchroPhasorSupport@pjm.com** ➔ **Report Planned Outages**