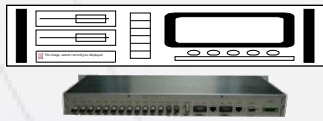


Performance Requirements, Standards & Verification Task Team

- Task Team Co-Leaders:
 - David Bertagnolli, New England ISO
 - Jim O'Brian, Duke Energy
 - Farnoosh Rahmatian, Quanta Technology
- Task Team Technical Support: Henry Huang/PNNL
- Task Team Administrative Support: Teresa Carlon/PNNL
- This task team comprises ~ 200 members (>70 Active)

Summary of PRSVTT/PSTT Activities

PMU/PDC Hardware



- PMU Testing And Calibration
- Phasor Accuracy
- Define PMU
- Commissioning & Maintenance
- PDC Functions
- PDC Testing
- Multi-function PMUs
- C37.118 for "Dynamic" Phasor
- C37.118.1 Advisory

Phasor Network

- Synchronization Techniques
- PMU Installation
- PDC Communication
- HW & SW Upgrade
- Network Connection
- Network Configuration
- *Network Testing
- *Naming Convention
- *Cyber Security Std for Phasor

- Phasor Tutorials
- PSTT - IEEE Standards Development

Phasor Data

- *Format & compression std
- Phase Angle Reference
- Phasing Survey
- Phase Mapping
- Archival System

Applications

- Req't for Visualization
- Req't for State Estimation
- Advanced Applications & Deployment
- Performance Matrix
- Phasor "ROI"
- Phasor Tools Repository

* Coordination with DNMTT

Recent PRSVTT Accomplishments

- Participate in ICAP* Synchrophasor Conformity Steering Committee for PMU certification
- Coordination with IEEE PSRC (C23) and IEEE PES Technical Council
- Guide on Using PMUs in Multi-Function Devices
- Synchrophasor System Tutorials
 - In coordination with IEEE PES PSRC

PRSVTT Active Initiatives

- Continue to Participate in ICAP* Synchrophasor Conformity Steering Committee for PMU certification
- Continue Coordination with IEEE PSRC (C23) and IEEE PES Technical Council
- Guide on Application Requirements and Benefit Metrics (Phasor “ROI”)
- Guide on Data Archival Systems
- Support of NASPI-wide “PMU Application Data Requirements Document.”

Current and New Goals and Metrics

Goal #	Goal	Metric	Deliverable	Priorities	Lead
1	Phasor Requirements and Benefit Metrics for Tools and Applications	Develop a guide	May '15	High	Dave Bertagnolli and Tony Weekes
2	Guide for Phasor Data Repository and Archiving	Develop a guide	June '15	High	Vahid Madani and Henry Huang
3	Support of NASI-wide Effort on "Categorizing Phasor Measurement Units by Application Data Requirements	Review and quantification of limits for performance metrics	Dec '14	Medium	To be reviewed
4	Performance Requirements for Data Exchange	Develop a guide	October '14	To be reviewed	To be reviewed

PRSVTT Meeting Updates

- Update on PSRC Working Groups – C23,
- NIST Update –
- Presentations
 - Virtual instrumentation-based PMU calibrator for IEEE C37.118-2011 testing
 - A novel arbitrary resampling-based algorithm for synchrophasor measurement in compliance with IEEE C37.118.1a-21014