Operations Reactive Studies Voltage Support Service 2004 Update



NYISO Market Structures WG Status Report – August 2004

Operations Reactive Studies

- 2004 Updated TB #91 and #103 VSS test report forms to improve ease of reporting cross-compound or combined cycle generators
- Completed Phase 1 load power factor assessment (draft report to SOAS)
- Developed issues and discussion for Voltage Support Ancillary Service consideration





VSS Testing Review

- Operations Engineering was assigned the lead role in the review of the annual testing
 - Work with Market Services to follow up deficiencies in testing
 - Provide Confirmation to Grid Accounting
- Reviews of Operating issues
 - Response to NYISO requests
 - Real-time voltage support issues



VSS Testing Review

	Suppliers	Gross MVAr Capability
2001	242	12418
2002	254	13902
2003	275	14975



VSS Issues for Discussion

- Clarification of Testing Requirements
- Six-year Test Requirement
- Reactive Capability
- Gross vs. Net Capability
- Compensation Rate
- Compensation for non-generator resources
- Interconnection Requirements
- Compensation for FACTS-type devices
- Two-tier voltage support service

Address immediately

Clarification of Testing Requirements

- Monitor VSS test reports, comments from MPs
- Update test report form and TBs
- Six-year test requirement
 - Continue Waiver of 6-year test requirement
 - Monitor NERC Standards process and Blackout Recommendations
 - Propose new comprehensive testing requirement when NERC develops new standard and compliance template



Near-term Issues

Reactive capability range of control

- Consider lagging and leading capability
- Gross vs. Net Reactive capability
 - Net capability is a better indication of the contribution to the system and consistent with ICAP and metering

Compensation rate

 Annual review of rate should consider any changes in the accounting method or service considerations





Longer Term Issues

Compensation for non-generator resources

- Synchronous Condensers work with owners and other interested stakeholders to develop a proposal for compensation
- Interconnection requirements
- FACTS devices
- Two-tier voltage support



Staff Proposal to address Near-term

- I. Reactive power metered as <u>net</u> MVAr (consistent with MW metering for ICAP DMNC and energy)
- 2. Capability basis for compensation be the full demonstrated range – lagging and leading MVAr capability as determined by actual test
- 3. All generators participating will be required to test lagging MVAr capability during Summer Capability Period
- 4. Compensation rate be adjusted to reflect the new basis for compensation and range of control
- 5. Application of the adjusted compensation rate for the 2005 payment cycle

