PJM Transmission Owners Agreement Administrative Committee (TOA-AC)

Open Meeting Minutes September 20, 2017

1. Administrative Items-

Judy Stubbe conducted a roll call and confirmed a quorum. The meeting minutes for the July meeting were approved.

2. PJM RTEP Update

Paul McGlynn from PJM provided an update on the RTEP. He reported that the 5 year analysis was completed. 200 flowgates were identified with issues. Of the 200, 160 of them the issues were on the lower voltage systems. PJM is working with Transmission Owners on these lower voltage issues.

The 2017 RTEP Proposal Window #1 closed on August 25. PJM received over 50 proposals (22 for upgrades and 30 for new projects). PJM is currently evaluating these proposals and will provide information to TEAC.

PJM prepared a gas contingency analysis as part of the NERC TPL requirements to look at gas contingencies and the impact to the system. Contingencies are ones involving losses of generation at or above 1000 MW. The worst case observed involves impacts to 10,000 MWs of generation.

15 year analysis will be presented to stakeholders at the October TEAC meeting. No surprises due to low load growth.

PJM will be going to the PJM Board in October for approval of transmission projects. There are about \$1 billion in upgrades being proposed.

A TO asked about the scope of the contingency analysis. PJM responded by stating that they are not looking at just loss of pipeline capacity, but also reviewing compressor failures and actions taken by LDCs to see what generation may be impacted. PJM could also review impacts to transmission system.

PJM reported that they are working on developing the base case for 2018. PJM expects to have base case available by February 1, 2018.

3. Statcom-Lessons Learned

Mike Bryson from PJM reported on lessons learned through NERC events analysis. PJM Operating Committee reviews all NERC lessons learned reports. One such report was a situation occurring in ERCOT involving a voltage disturbance on the transmission system of

redundant auxiliary cooling system power sources for static synchronous compensator (STATCOM) causing a trip. Relays on the distribution feeders in the area tripped as a result of the low voltage and 92 MW of load was shed.

4. State/PJM Interconnection Process

Aaron Burner of PJM reported on potential real time system issues resulting from generation connected to the distribution system causing impacts to the PJM system. One of the problems is PJM's lack of visibility to the distribution system. This could be a problem in the upcoming years given the expected increase in distribution level generation. PJM plans for its system based on the generation in its queue but the generation connecting at lower voltages is not in its queue. PJM plans to talk to the states about this issue as PJM wants to see how the state process can feed into the PJM planning process. On the operations side, PJM is observing that it appears generation is on the system, but it is not modeled, and the system is not being planned for this unknown generation.

PJM says that distribution level generation will increase over the next years due primarily to solar. It is less than 1% now but will be greater than 3% in 2020. There needs to be a process where distribution level generation information is communicated to PJM so PJM can model its system appropriately. PJM stated that the generation in question could be behind the meter, or interconnected to the distribution system. This generation could influence transmission planning. There was some concern raised by certain TOs over the sharing of distribution customer information with PJM. PJM responded by saying that it would like to discuss this issue with state commissions and TOs. PJM stated that it does not want to get in the middle of the state jurisdictional interconnection process but needs to understand the impacts that this generation has on its transmission system.

5. TO/TOP Matrix

Svinivas Kappagantula from PJM reported that it has revised its TO/TOP Matrix which is used by PJM to audit TOs who share in responsibility with PJM for a particular NERC standard. Most of the changes were minor. The TO/TOP Committee is a closed group.

6. LIT Update

The Transmission Owners have agreed on the language for the pro forma wires to wires agreement and determined that the agreement would apply to only competitive projects. It was determined that the pro forma wires to wires agreement should be forwarded to PJM. The PJM Transmission Owners mentioned the possibility of cancelling the pro forma Interconnection Coordination Agreement (ICA) provided it may no longer be necessary due to the wires to wires interconnection agreement. The LIT will discuss the potential for cancelling the ICA.