

RPG
February 27, 2015

- 1. Miscellaneous Updates**
- 2. Valley Study Update**
- 3. CPS/LCRA Transmission System Addition Project Independent Review Update**

Miscellaneous Updates—Jeff Billo

- The RTP reliability cases will be based on the March TPIT update of the SSWG cases and will incorporate the latest load information related to the Freeport LNG project and the CPS load forecast update.
- Jones Creek, approved by BOD
- PGDTF update—next meeting March 11
- PLWG update—PGRR041 (revise and add requirements for NERC TPL-001-4) moved to ROS for vote next week.
- ERCOT is looking at updating base cases with new load projects for the West Texas Oil and Gas study. We hope to have a new start case sometime in April.

Valley Update—Fred Huang

- 2016 Valley Topology Overview
 - Lobo to North Edinburg 345 kV circuit, Cross-Valley 345 kV circuit
 - Close to 1400 MW wind in Valley
- 2014 Assessments for the Valley
 - Overview of reliability issues in the Lower Rio Grande Valley
 - Review of Frontera facility
- Purpose and Study Condition
 - Evaluate the need for additional improvements and how quickly they will be needed to keep up with growth in the region
 - Load levels: 2750 MW and 2900 MW based on 2014 RTP load forecast for year 2018 and 2020
 - Notable study base case conditions
 - No Frontera Plant
 - Lobo-North Edinburg and Cross Valley 345 kV lines are in service
- Study Scope
 - Base case: 2018 DWG summer peak flat start
 - Reliability criteria: ERCOT Planning Guide and NERC TPL-001-4
 - Sensitivity analysis with future new generation in Valley
- Preliminary Findings
 - Based on existing generation resources
 - Additional import paths may be required if load exceeds ~2800 MW under:
 - G-1-G-1 (two combined cycle trains)
 - G-1-L-1 (one combined cycle train and one 345 kV circuit)
 - New dynamic reactive support required to meet TPL-001-4 G-1-G-1 requirement
 - Several transmission upgrades inside the Valley may be required
 - New generation may defer the need for some transmission upgrades
 - ERCOT will continue the assessment and evaluate transmission improvement options

- Q&A: Mitigation plans until lines are energized. If they aren't energized by 2016, are there mitigation plans in place for summer of 2016?
 - ERCOT and the Frontera facility owners have agreed on the reliability safeguards needed to ensure the plant will be available if needed in an emergency and have filed those conditions with the DOE as part of the plant's export authorization request.
- Q&A: can you go into detail as to why you made the assumption with the tie? Assume 0 mw for the N-1-1, N-1?
 - ERCOT studied the Railroad DC-Tie export conditions under N-1 and zero transfer under N-1-1.
- Q&A: What is the Valley import increase with addition of Lobo-North Edinburg line?
 - The purpose of this study is to identify the system upgrade needs, although the potential Valley import limits if exist may be found in the study.

CPS/LCRA Transmission System Addition Project Independent Review Update—Prabhu Gnanam

- ERCOT is conducting an Independent Review of the need to address reliability issues that limit the power import into the San Antonio area
 - Since last update, CPS making revisions to load forecast expectation, now ~5400 MW in 2019
- Study assumptions, similar to what was presented in October
- See presentation for list of preliminary results of the 2019 base case and map of system overloads
- Two options were evaluated, both address reliability needs, one option significantly higher cost than other and may result in higher real-time congestion costs due to outages required on existing circuits
- Anticipate completing the Independent Review and report on or before March 18
 - Present ERCOT recommendation to TAC on March 26 and ERCOT BOD on April 14
- Q&A: The estimated cost of the project based on the new forecast is the \$86M /\$130 M, right? What was the original cost?
 - Around \$270 M range.
- Q&A: Concerns, load forecast reduced, for study year 2019 the South Central forecast is still 11 percent higher than the ERCOT extreme weather forecast. Came down from 17%, but there is still a big discrepancy. Were the other zones all reduced? Which zones kept the higher of and which were reduced?
 - The loads for each weather zone are listed in start cases in the RTP. The 2014 RTP report will also give you the comparison. ERCOT did not evaluate the other loads in the South Central weather zone but did review the updated CPS Energy forecast and found it to be reasonable. The CPS Energy load is the driver for this project.
- Q&A: Will ERCOT seek for critical designation for this project?
 - ERCOT will make this determination at the end of the EIR.