



2019 RTP Update

November 2019
RPG Meeting

Agenda

- ❑ 2019 RTP status update
- ❑ Preliminary noteworthy 2019 RTP reliability projects
- ❑ Sensitivity analysis update

2019 RTP status update

- ❑ 2019 RTP N-1 analysis results and cases were posted on MIS Secure Area on June 10, 2019.
- ❑ 2019 RTP preliminary final reliability cases were posted on MIS Secure Area on October 1, 2019.
- ❑ Both postings can be accessed through the following link:
<https://mis.ercot.com/pps/tibco/mis/Pages/Grid+Information/RegionalPlanning>

2019 RTP status update cont'd

□ Currently in progress

- Long lead time equipment analysis
- Sensitivity analysis
- Short circuit analysis
- Multiple elements outage, extreme events and cascading analysis
- Economic analysis

Noteworthy 2019 RTP projects (preliminary findings)

- ❑ Hicks Switch-Alliance-Roanoke 345 kV line upgrade in Tarrant and Denton County (Project Index: 2019-NC11).
- ❑ Lake Creek SES to Tradinghouse SES 345 kV line upgrade in McLennan County (Project Index: 2019-NC12).
- ❑ Venus Switch to Navarro 345 kV line upgrade in Ellis and Navarro County (Project Index: 2019-NC15).
- ❑ Seagoville Switch to Forney Switch 345 kV line upgrade in Dallas and Kaufman County (Project Index: 2019-NC31).
- ❑ Forney to Royse 345 kV line upgrade in Rockwall and Kaufman County (Project Index: 2019-NC36).

Noteworthy 2019 RTP projects cont'd (preliminary findings)

- ❑ New Resnik 345 kV station with two 345/138 kV autotransformers, and new 345 kV double-circuit line from Grissom to Angstrom, Angstrom to Resnik, and Resnik to Whitepoint in San Patricio and Bee County (Project Index: 2019-S4). The project is placeholder project for the AEPSC Corpus North Shore project that is currently under RPG review.
- ❑ Hutto 345/138 kV transformer addition in Williamson County (Project Index: 2019-SC1).
- ❑ Quarry Field substation 345 kV addition in Winkler County (Project Index: 2019-FW1). This project was also identified in the Delaware Basin load integration study.

2019 RTP sensitivity analysis update

❑ High Wind Low Load (off-peak case for 2022)

- Wind penetration level: 69.7%
- Preliminary findings: with the penetration level maintained at 69.7%, potential steady state criteria violations associated with wind export were identified for both the North/West/Far West to East export, and the export from the Lower Rio Grande Valley (LRGV).

❑ No Wind No Hydro (summer peak case for 2021 and 2024)

- Preliminary findings: South/South Central region saw unsolved power flows under various P3 contingencies, which indicates a potential LRGV import issue.

Question

