Inter-regional Update
• 2025 summer and winter scenario build – on schedule
  – June preliminary builds - complete
  – July-August validation and final case posting - complete
  – October transfer analysis – in progress
  – December presentation & stakeholder input

• TC & EC recommendations
  – construct validated production cost simulation model for EI transmission studies. Scoping work in progress
  – NERC MOD 32 activity – continue to monitor
• NCTPC
  – Preparation for 2016/17 operating year – develop coordinated operating plan - September 30

• PJM/MISO JOA
  – Quick Hit upgrades
    - Beaver Channel – Sub 49 SCADA upgrade complete – expected to address $7M historical congestion – continue to monitor
    - Michigan City – Laporte – historical congestion $3M, 2015 congestion $7.3M
      - RTEP Bosserman substation changes local 138 kV flow patterns ($3M PJM baseline) remedied local voltage issues and improved LaPorte Reliability
      - Michigan City – LaPorte now is Michigan City – Bosserman – line congestion lower but remains binding
      - Michigan City – Trail Creek 138 kV increased congestion. Similar limit to Bosserman line
    - Tracking RTEP and MTEP upgrades addressing $300M congestion
• PJM/MISO JOA
  – IPSAC September 28 – focus Metrics & Process
    • Commitment to eliminate $20M JOA threshold
    • MISO commitment to engage regional threshold issue
    • Outline new JOA implementation for next 2 year cycle
    • Michigan interface targeted ad hoc study update
  – NIPSCO proceeding comments are complete
  – MISO MEP Coordination - update
    • Duff – Coleman: PJM evaluating options to MISO proposed MEP
    • MISO board recommendation in December
    • Alternatives involving Rockport have been suggested – potential PJM reliability operational performance benefits
Southern IN Focus Area
Rockport – Coleman 345kV Option

• MISO focus MEP under study early 2015
  – MISO evaluated Duff – Coleman 345 kV $67.2M
    • Extensive work and analysis in MTEP 2014 and 2015
    • Newtonville-Coleman 161kV congestion in Southern Indiana
    • Duff-Coleman B/C = 15.9
    • MISO evaluated single circuit Rockport-Coleman had higher benefits but higher costs for B/C=14.4
    • Rockport – Coleman 345 kV $76.3M (1ckt, 1xf)
PJM – Rockport long standing operational complexity
- SPS long part of Rockport operation
- 4400 MW event in 2007 & subsequent NERC review
- 2009 implemented additional SPS controls to mitigate 2007 event
- Surrounding area flows and generation increase faster than transmission
- PJM only alternatives are long HV lines
- Due to electrical topology Interregional solutions are more cost effective

Initial PJM review suggests MISO solutions involving Rockport may also address the operational performance issues at Rockport in addition to addressing MISO’s regional need
Next Steps

- Complete evaluation of Rockport alternatives
  - Complete “No Harm” analysis
  - Finalize validation of SPS removal
- Cost sharing between PJM and MISO - TBD
- MISO Schedule
  - July 29 PAC – PJM option discussed with PJM support
  - August 19 PAC – PJM initial results
  - September – November MISO reviews (MISO PAC and SPC)
  - December 10 MISO BOD meet
• Rockport-Coleman option
  – Reduces Rockport SPS to voltage guide
  – No harm shown from PJM studies
• Rockport-Coleman + Duff Coleman option
  – Eliminates SPS and No PJM harm
• Rockport-Duff-Coleman options under evaluation