

**Western Area Power Administration (WAPA)  
Contingent Facilities  
Business Practice**

The Federal Energy Regulatory Commission’s Order No. 845 revised Section 1 of the *pro forma* Large Generator Interconnection Procedures (LGIP) to incorporate the new term Contingent Facilities, which is defined in the WAPA Open Access Transmission Tariff (OATT) as “those unbuilt Interconnection Facilities, Network Upgrades, and/or planned upgrades not yet in service upon which the Interconnection Request’s costs, timing, and study findings are dependent, and if delayed or not built, could cause a need for Re-Studies of the Interconnection Request or a reassessment of the Interconnection Facilities and/or Network Upgrades and/or costs and timing. Contingent Facilities are identified in Appendix A of the Standard Large Generator Interconnection Agreement (LGIA).” Moreover, Order No. 845 directed each Transmission Provider to propose under Section 3.8 of its LGIP a non-*pro forma* method for identifying Contingent Facilities.

In accordance with Order No. 845, Section 3.8 of WAPA’s LGIP sets forth the methodology implemented by the Transmission Provider for identifying Contingent Facilities on the Transmission Provider’s Transmission System and on the Affected System(s). This Business Practice provides additional clarifications on the identification of Contingent Facilities, and the coordination with applicable Affected System parties related to the process and timeline for identifying Contingent Facilities located on those Affected Systems.

Identification of Contingent Facilities on Transmission Provider’s Transmission System

The following clarifications apply to LGIP Section 3.8:

- Paragraph (1)(a.) The Power Transfer Distribution Factor (PTDF) and/or Outage Transfer Distribution Factor (OTDF) shall be calculated as follows:
  - PTDF indicates the incremental change in apparent power Flow (Megavolt amperes or “MVA”) that occurs on a transmission facility due to a real power Transfer (Megawatts or “MW”) from the Interconnection Customer’s generator (source) to the offsetting sink utilized in the IC’s Interconnection System Impact Study (ISIS). The PTDF calculation is performed on a pre-contingent (no outage) basis. The formula for the PTDF is as follows:
    - $PTDF = [ \text{Post Facility Flow (MVA)} - \text{Pre Facility Flow (MVA)} ] / \text{Transfer Flow (MW) (in \%)}$
    - For a not-yet-in-service Transmission Facility Addition, Modification, or Upgrade that is part of the Transmission Provider’s transmission expansion plan, or Network Upgrade for higher queued Interconnection



Requests, the Facility Flow will be monitored on that facility. The Transfer Flow will be the Interconnection Customer's generation net injection (in MW) into the Transmission System.

- The OTDF indicates the incremental change in apparent power Flow (MVA) that occurs on a transmission facility due to a real power transfer (MW) from the Interconnection Customer's generator (source) to the offsetting sink utilized in the IC's ISIS. The OTDF calculation is performed on a post-contingent (outage) basis that models the associated limiting contingency. The formula for the OTDF is as follows:
  - $OTDF = [ \text{Post Facility Flow (MVA)} - \text{Pre Facility Flow (MVA)} ] / \text{Transfer Flow (MW)}$  (in %, with Limiting Contingency modeled)
  - For a not-yet-in-service Transmission Facility Addition, Modification, or Upgrade that is part of the Transmission Provider's transmission expansion plan, or Network Upgrade for higher queued Interconnection Requests, the Facility Flow will be monitored on that facility. The Transfer Flow will be the Interconnection Customer's generation net injection (in MW) into the Transmission System.
  - The Limiting Contingency will be the worst-case outage associated with that Addition, Modification, Upgrade, or Network Upgrade, if applicable.
- The applicable PTDF and/or OTDF calculation will be utilized for the associated Addition, Modification, Upgrade, or Network Upgrade.
- Paragraph (1)(c.) The facility rating utilized will be the planned limiting seasonal rating (in MVA) of the Addition, Modification, Upgrade, or Network Upgrade.
- The Transmission Provider will provide a list of the Contingent Facilities on the Transmission Provider's Transmission System at the conclusion of the ISIS.

#### Identification of Contingent Facilities on Affected Systems

The following clarifications apply to LGIP Section 3.8:

- Paragraph (2) The Transmission Provider will coordinate with applicable Affected System parties, including other WAPA Transmission Providers (other Regional Offices), to determine any Contingent Facilities on those Affected Systems through Affected System studies based upon their respective criteria.
- The Transmission Provider will utilize reasonable efforts to coordinate the Affected System studies with the Affected System(s) and the Interconnection Customer, and if

possible, obtain a list of Contingent Facilities on the Affected System(s) at the conclusion of the Interconnection System Impact Study. However, the Affected System parties' procedures and timing for completing (or periodically updating) such analysis will determine when such information is available to the Transmission Provider and Interconnection Customer. The Transmission Provider will provide a list of Contingent Facilities on the Affected System(s) when it receives such information from the Affected System parties and will include such available information in the LGIA.