

Public Utility District No. 1 of Snohomish County

**MOD-032 Model Data Requirements &
Reporting Procedures**

(Supplement to WECC Data Preparation Manual)

(MOD-032)

Version 4

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NERC standard MOD-032 states that each Planning Coordinator (PC) and each of its Transmission Planners (TP) shall jointly develop steady-state, dynamics, and short-circuit modeling data requirements and reporting procedures (**R1**). Snohomish PUD is a TP within the Bonneville Power Administration (BPA) PC. This document contains information to meet NERC requirement MOD-032 R1.

In accordance with requirement **R1**, BPA, as a registered PC, and Snohomish County PUD (SNPD), as a registered TP, have jointly established a set of common procedures for submitting data for the WECC interconnection planning and operation models. This collaborative effort was intended to establish consistent modeling data requirements and reporting procedures for development of planning and operation cases. BPA's *MOD-032 Model Data Requirements and Reporting Procedure* and the *WECC Data Preparation Manual* (DPM) specify data requirements for building the Interconnection-wide case(s), including the following:

- Specific data format (**R1.2.1**);
- Level of detail to which equipment shall be modeled (**R1.2.2**);
- Case types or scenarios to be modeled (**R1.2.3**); and
- A schedule for submission of data at least once every 13 calendar months (**R1.2.4**)

When sending data, SNPD shall submit the requested data to the following BPA Customer Service Reliability Program (CSRP) mailbox: CSReliabilityProgram@BPA.gov, or in the case of short-circuit modeling data directly to BPA's System Protection and Control (SPC) Technical Services Group (TEZP).

BPA has delegated the data submission activities to SNPD as a Transmission Owner and Transmission Planner; and BPA, as the Planning Coordinator, has agreed that SNPD will continue to submit the required data to the Area Coordinator (Western Power Pool) for the Northwest Area, known as WECC Area 40. In this arrangement, the Area Coordinator will continue to compile data for the data owners within the Area and submit data to WECC to comply with WECC's base case compilation schedule (**R1.2.3**).

The SNPD MOD-032 Model Data Requirements and Reporting Procedures is available at <https://www.snopud.com/account/services/connecting-generation/>. Additionally, SNPD will provide a copy of this document to all agencies upon request (**R1.3**).

In accordance with requirement **R2** in MOD-032, data owners are responsible for providing the data necessary to model their assets per criteria outlined in the data preparation documents. BPA, as SNPD's PC, requires the following submittals from data owners:

- Generator Owners (GO) are responsible for submitting modeling data for their existing and approved future generating facilities.
- Load Serving Entities (LSE) are responsible for providing their load forecasts corresponding to the scenarios developed.

- Transmission Owners (TO) are responsible for submitting data for modeling their existing and approved future transmission facilities.

Note: SNPD is not registered as Planning Coordinator, Transmission Provider, Balancing Authority, or Resource Planner. SNPD does not submit interchange schedules other than submitting expected peak load and generation output to the Data Representative and to BPA for inclusion in the WECC base case.

Section 2.1.2 of the document “BPA MOD-032 Model Data Requirements & Reporting Procedures” specifies inclusion criteria for the planning and operation base cases:

Table 2-1: Project Inclusion Criteria		
Type & Status	Conceptual/Proposed	Planned/Funded/In Service/Corrections
Steady-State	NOT MODELED	MODELED
Dynamics		
Short Circuit		
GIC		
FAC-oo8		

SNPD also follows the latest guidelines from the WECC DPM. This document covers the submittal of steady-state, dynamic, and short-circuit modeling data that address NERC and WECC requirements for planning and operating base cases.

SNPD’s data submittal and documentation process is described below:

1. SNPD receives data requests from WECC and/or Area Coordinator with adequate lead time to meet the Area Coordinator submittal schedules
2. Download Seed Case(s) based on WECC’s data request letter from the WECC website and/or secured Western Power Pool (WPP) FTP.
3. Verify the required system conditions per WECC’s data request letter, including but not limited to:
 - a. Year/season being modeled.
 - b. Load
 - c. Generation
 - d. System configuration
 - e. Line data characteristics and transformer data
4. Review and revise topology as needed from the WECC base case.
5. Review and revise loads, generation, branch model characteristics, and Facility ratings

It should be noted that planning studies will be performed using the normal branch ratings generally and emergency ratings on a case-by-case basis. For operations studies, the normal and 30-minute ratings

are utilized.

6. When required by WECC, obtain approval signatures for planning and operating cases
7. When required by WECC and BPA, submit dynamic data and other files to WECC and BPA
8. Submit data as requested to the Area Coordinator who will then submit the solved power flow cases along with new and updated dynamic data to WECC in accordance with the required schedule.
9. Save emails/other documents related to requests and submittals in the following folder:
 - W:\PLANNING DEVELOPMENT\NERC Compliance\WECC\Base Cases ← This folder is separated by year
10. Summarize submittals in the WECC Base Case Records Excel spreadsheet.
11. Protection Engineers annually send SNPD short circuit updates (Aspen model) to BPA SPC Technical Services Group and SNPD transmission planners.

Version History

Version	Date	Action	Name of Editor
1	June 2015	Initial Document	John Liang and Long Duong
2	December 2020	Revised document for new area coordinator	John Martinsen
3	July, 2023	Revised document to add posting requirements, and language changes	Tuan Dang
4	December, 2023	Revised document to update ratings for WECC planning base case, and short circuit submittal to PC and TP.	Tuan Dang and David Quashie