EORM-MERM Scenario and Sensitivity Study Idea List

Definitions

Sensitivity Analysis – Changing a single key model input variable or parameter to determine how the change affects the model outcome (system cost, reserve margin level, or both).

Scenario Analysis – Changing multiple model variables and/or parameters to simulate and explore different futures. The purpose of the scenario analysis is to determine the impacts of multiple potential outcomes or courses of action.

In-Scope – Sensitivity or scenario analyses intended to understand the outcome uncertainty around key inputs for the model runs that represent the EORM-MERM study status quo or "base-case" version of the future.

Out-of-scope – (1) Sensitivity or scenario analyses intended to help understand policy interventions, trends, or events that reflect a significant change to the EORM-MERM study base-case version of the future. (2) Other analyses that are considered ancillary to the core EORM-MERM study. Out-of-scope study ideas would be vetted through the ERCOT stakeholder process, and if approved, would not necessarily be conducted concurrently with the biennial EORM-MERM study.

Study Idea List

Ref. No.	In-Scope Studies (Sensitivities)	Out-of-Scope Studies	
		Sensitivity	Scenario
1	Alternative gas price forecast(s)		
2	Alternative CONE		
3	Alternative VOLL		
4	Market ORDC vs. marginal costs (X axis shift)		
5	Alternative methods for probability weighting of weather years		
6	Alternative Demand Response costs		
7	Outage parameters based on different lengths of the historical performance period		
8	Impact of adding voltage reduction as an Emergency Operating Procedure		

Ref. No.	In-Scope Studies (Sensitivities)	Out-of-Scope Studies	
		Sensitivity	Scenario
9		Solar as the marginal technology	
10		Calculate risk-adjusted EORM and/or MERM values	
11		Calculate Effective Load Carrying Capabilities (ELCCs) for wind and perhaps solar	
12		Price formation reforms: (Could be either a sensitivity or scenario depending on the range of reforms evaluated)	
13			High/low load forecasts, or incremental industrial load forecast increases
14			Alternative coal/gas-steam retirement scenarios
15			High solar penetration (e.g., meet the MERM level with incremental solar additions only)
16			Extreme high gas prices with impact on marginal technology and EFOR assumptions