Market Simulation Structured Scenarios

Energy Storage and Distribution Energy Resources (ESDER) Phase 4

Version 1.2

8/10/2021

Location of Document

Release Planning

Revision History

Date	Version	Description	Author
6/07/2021	0.1	Initial Draft	Stacia Thornton
06/30/2021	1.0	Revised Document	Anshuman Vaidya
07/06/2021	1.1	Added Charge codes for Scenario 1	Anshuman Vaidya
08/10/2021	1.2	Updated registration date to 08/24	Anshuman Vaidya

Table of Contents

1. Introduction

The objective of this document is to provide the information needed to ISO Market Participants to participate in the Energy Storage and Distributed Energy Resources (ESDER) Phase 4 simulation scenarios.

For the scope of this implementation and this initiative, please refer to the ESDER Phase 4 External Business Requirements Specification –

Release Planning

2. Structured Scenarios Approach

2.1 High Level Overview

The identified scenarios will be executed during the structured scenario portion of the ESDER Phase 4 Readiness market simulation.

2.2 Structured Scenarios Conditions and Setup

The following additional setup will be used by the ISO during the scenario execution.

Market Participant pre-Market Simulation Actions
Market participants will need to register their request with the ISO to participate in the ESDER Phase 4 project simulation via the MarketSim@caiso.com mailbox.
Market participants, please submit your request and any additional information requested in this document by August 24th, 2021.

Please submit your request and any additional information identified above by August 24, 2021.

2.3 Structured Scenario

Scenario Number	Scenario Execution Trade Date: TBD	
1	Description	Submit Combinations of Competitive RT Bids with EOH SOC Parameters and Self-Schedules by non-REM LESRs' SCs that Overlap with RUC-Generated Binding Min EOH SOC Requirements (Bid-to-Bill Scenario)
	ISO Actions	RUC under-gen infeasibility is triggered for at least 1 hour in a trade day.
	EIM Market Participant Actions	N/A
	ISO Market Participant Actions	SCs of the non-REM LESR resource submit combination of competitive RT bids that includes EOH SOC parameters and self-schedules (bid-to-bill scenario) that overlap for some hours with the RUC-generated binding Min EOH SOC requirements
	Expected Outcome	OASIS: Masked RT EOH SOC bid parameters will be published for non-REM LESRs in Public Bid report. Note**:** CAISO will provide a sample of the report to participants since the report is published T+90 days. ADS/ BAOOP/CMRI: RT market results of non-REM LESRs reflects system setting precedence to satisfying binding RUC-generated reliability Min EOH SOC requirement
	Anticipated Settlement Outcome	RTM BCR accounts for EOH SOC parameters and self-schedules for non-REM LESRs irrespective of overlap with RUC-generated reliability Min EOH SOC requirement.
	Expected Settlement Outcome	RTM BCR accounts for EOH SOC parameters and self-schedules for non-REM LESRs in Settlements, CCs: 6620, 66200, RTM_NET_AMT_PC

Scenario Number	Scenario Execution Trade Date: TBD	
2	Description	Submit Combinations of DA and RT Bids subject to Market Power Mitigation by non-REM LESRs' SCs (Bid-to-Bill Scenario)
	ISO Actions	CAISO will facilitate congestion to trigger mitigation for some of the registered LES resources if their submitted bids are high enough.
	EIM Market Participant Actions	N/A
	ISO Market Participant Actions	SC's of Non-REM LESR resource submit DA and RT bids that are subject to market power mitigation (bid-to-bill scenario).
	Expected Outcome	Verify that DA and RT MPM market results of non-REM LESRs considers bid mitigation. Verify DAM and RTM DEBs are published for non-REM LESRs.
	Anticipated Settlement Outcome	N/A
	Expected Settlement Outcome	N/A

3. ISO Market Simulation Contact

Please contact MarketSim@caiso.com if you have any questions or concerns regarding these scenarios.