

BPM Change Management Meeting

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Agenda – BPM Change Management Meeting October 22, 2018

Topic	Presenter
Introduction / Meeting Overview	Isabella Nicosia
Discussion of active proposed changes: Generator Management BPM Definitions and Acronyms BPM Reliability Requirements BPM Reliability Coordinator Services BPM Energy Imbalance Market BPM Market Operations BPM Market Instruments BPM Generator Interconnection Procedures BPM Generator Interconnection and Deliverability Allocation Procedures BPM Settlements and Billing BPM	Debi Le Vine Grace Clark Kyle Woody Abdulrahman Mohammed-Ali Jamal Batakji Jamal Batakji, Kimberly Murphy-Van Blaricom Jamal Batakji, Kimberly Murphy-Van Blaricom Phelim Tavares Phelim Tavares Brenda Corona
Wrap-Up and Next Steps	Isabella Nicosia

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California ISO Stakeholder Initiative Process



- Business Practice Manuals
 - ➤ The purpose of BPMs is to set forth business practices that implement the ISO tariff.
 - ➤ The ISO conducts a yearly policy initiative roadmap process to consider and rank initiatives.
 - ➤ Policy changes submitted though the PRR process will be referred to the policy initiative road map process.
 - Each subject area in a BPM is based on enabling language in the ISO tariff.
 - ➤ The PRR process cannot be used to introduce changes that are not supported by existing tariff authority.



Generator Management BPM

PRR	PRR Title	Stage
1201	Banking and accounting process clarifications	Initial
1189	Incorporate tariff changes from the Reliability Must Run / Capacity Procurement Mechanism policy initiative, regarding retirement scenarios, and RMR designation	Recommendation
1188	Implementing interconnection process enhancements and funds submittal requirement change	Recommendation



PRR 1201 – Banking and accounting process clarifications

- Reason for revision
 - Provide clarifying language in Sections 6.3.2 and 8 regarding how the refund process is integrated into the CAISO's existing banking and accounting processes.
- Initial comments:
 - No comments submitted
- Initial comment period expires:
 - October 15, 2019
- Next step:
 - Post recommendation



PRR 1189 – Incorporate tariff changes from the Reliability Must Run / Capacity Procurement Mechanism policy initiative, regarding retirement scenarios, and RMR designation

- Reason for revision
 - Updating Section 12 to incorporate Tariff changes from the RMR/CPM policy initiative, regarding retirement scenarios, and RMR designation.
- Recommendation comments:
 - San Diego Gas & Electric; submitted 10/16/19
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1188 – Implementing interconnection process enhancements and funds submittal requirement change

- Reason for revision
 - Implementing Interconnection Process Enhancements (IPE)
 2018
 - Funds Submittal Requirement
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



Definitions and Acronyms BPM

PRR	PRR Title	Stage
1200	Update to reflect spring 2019 tariff update	Initial



PRR 1200 – Update to reflect spring 2019 tariff update

- Reason for revision
 - Update is to incorporate changes to definitions and acronyms that have been amended, added, or deleted, as of the spring 2019 tariff update.
- Initial comments:
 - No comments submitted
- Initial comment period expires:
 - October 15, 2019
- Next step:
 - Post recommendation



Reliability Requirements BPM

PRR	PRR Title	Stage
1198	Quarterly California Public Utilities Commission provided updates	Initial
1195	Reliability must run capacity procurement market policy initiative changes	Recommendation



PRR 1198 – Quarterly California Public Utilities Commission provided updates

- Reason for revision
 - Procedural clarification
- Initial comments:
 - No comments submitted
- Initial comment period expires:
 - October 15, 2019
- Next step:
 - Post recommendation



PRR 1195 – Reliability must run capacity procurement market policy initiative changes

- Reason for revision
 - RMR-CPM Policy Initiative Changes
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



Reliability Coordinator Services BPM

PRR	PRR Title	Stage
1196	Minor updates related to processes and diagrams	Recommendation



PRR 1196 – Minor updates related to processes and diagrams

- Reason for revision
 - Minor updates related to processes and diagrams
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



Energy Imbalance Market BPM

PRR	PRR Title	Stage
1199	Historical intertie deviation	Initial
1192	Local power market mitigation enhancements mitigation changes for energy imbalance market	Recommendation



PRR 1199 – Historical intertie deviation

- Reason for revision
 - In April 2019, the ISO implemented a software change to perform bid-range capacity test for each of the four fifteen-minute intervals for a trading hour. Accordingly, only section 11.3.2 was updated. However those changes were not added to section 11.3.2.2. This PRR change is to update section 11.3.2.2.
- Initial comments:
 - No comments submitted
- Initial comment period expires:
 - October 15, 2019
- Next step:
 - Post recommendation



PRR 1192 – Local power market mitigation enhancements mitigation changes for energy imbalance market

- Reason for revision
 - These changes are to support the Local Market Power Mitigation Enhancements 2018 Project (LMPME). These changes include mitigation process enhancements for EIM.
 - Effective date: November 2019.
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



Market Operations BPM

PRR	PRR Title	Stage/Status
1194	Changes due to reliability must run and capacity procurement mechanism enhancement project	Recommendation
1191	Local power market mitigation enhancements mitigation changes	Recommendation
1180	Participating generator definition	Recommendation
1176	Energy storage and distributed energy resources 3A bid option and expected energy calculation charges	Recommendation



PRR 1194 – Changes due to reliability must run and capacity procurement mechanism enhancement project

- Reason for revision
 - Enhancements are being made to the RMR and CPM procurement mechanisms to "modernize" the RMR agreement, combine all retirement-related backstop procurement under RMR, and to clarify when the ISO would use its RMR versus CPM backstop procurement authority. Expected date of Fall release 2019.
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1191 – Local power market mitigation enhancements mitigation changes

- Reason for revision
 - These changes are to support the Local Market Power Mitigation Enhancements 2018 Project (LMPME). These changes include mitigation process enhancements due to flow reversal and economic displacement. Effective date: November 2019.
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1180 – Participating generator definition

- Reason for revision
 - Revision to paragraph 2.1.3 due to the changes to enable storage resources with a capacity rating of 100KW to participate in the CAISO markets, this is related to FERC 841. Effective Date: Fall 2019
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1176 – Energy storage and distributed energy resources 3A bid option and expected energy calculation charges

- Reason for revision
 - Changes to the bid dispatchable option and expected energy calculation due to the new hourly and 15-minute block dispatchable PDRs from ESDER3A project
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



Market Instruments BPM

PRR	PRR Title	Stage
1193	Changes due to reliability must run and capacity procurement mechanism enhancement project	Recommendation
1190	Local power market mitigation enhancements hydro default energy bid option energy imbalance market transfer limit	Recommendation
1181	Emergency PRR: Attachment B changes to support Tariff Section 4.6.4	Recommendation



PRR 1193 – Changes due to reliability must run and capacity procurement mechanism enhancement project

- Reason for revision
 - Enhancements are being made to the RMR and CPM procurement mechanisms to "modernize" the RMR agreement, combine all retirement-related backstop procurement under RMR, and to clarify when the ISO would use its RMR versus CPM backstop procurement authority. Expected date of Fall release 2019.
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1190 – Local power market mitigation enhancements hydro default energy bid option energy imbalance market transfer limit

- Reason for revision
 - These changes are to support the Local Market Power Mitigation Enhancements 2018 Project (LMPME), it offers a new Hydro Default Energy Bid Option which is described in Attachment B and Attachment D. The Tariff amendment for LMPME is ER19-2347. Additional changes to Attachment B to support EDSER3 changes for Fall 2019. Effective date: November 13, 2019
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1181 – Attachment B changes to support Tariff Section 4.6.4

- Reason for revision
 - The CAISO is adding clarity to the process to support Tariff
 Section 4.6.4 Identification of Generating Units.
- Recommendation comments:
 - Western Power Trading Forum; submitted 10/15/19
 - Calpine Corporation; submitted 10/15/19
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



Generator Interconnection Procedures BPM

P	RR	PRR Title	Stage
11	187	2018 Interconnection process enhancements - change in deliverability status, elections made after Phase II studies	Recommendation



PRR 1187 – 2018 Interconnection process enhancements - change in deliverability status, elections made after phase II studies

- Reason for revision
 - 2018 Interconnection Process Enhancements initiative including change in deliverability status, elections made after Phase II studies
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



Generator Interconnection and Deliverability Allocation Procedures BPM

PRR	PRR Title	Stage
1186	2018 Interconnection process enhancements- change in deliverability status, study agreements, shared SANUs, Interconnection Request criteria	Recommendation



PRR 1186 – 2018 Interconnection process enhancementschange in deliverability status, study agreements, shared SANUs, interconnection request criteria and acceptance

- Reason for revision
 - 2018 Interconnection Process Enhancements initiative including change in deliverability status, study agreements, shared SANUs, Interconnection Request criteria
- Recommendation comments:
 - San Diego Gas & Electric; submitted 10/16/19
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



Settlements and Billing BPM

PRR	PRR Title	Stage
1197	Emergency PRR: Updates due to termination of Peak RC settlement and invoicing	Recommendation
1185	Update settlement charge codes for real time market neutrality settlement initiative	Recommendation
1184	Update settlement charge codes for reliability must run and capacity procurement mechanism enhancements initiative	Recommendation
1183	Updated BPM configuration guide for CC 6806 day ahead residual unit commitment (RUC) tier 1 association 5.11 and PC real time energy quantity 5.20 and PC RTM net amount 5.33 and PC spin non-spin no pay quantity 5.21 to accommodate ESDER 3A initiative	Recommendation
1182	Update the pre-calculation real time energy quantity configuration to accommodate the changes for EIM enhancements 2019	Recommendation
1179	Updated BPM configuration guide for charge code 8830 monthly resource adequacy availability incentive mechanism settlement to accommodate pass through bill calculation visibility to scheduling coordinators	Recommendation
1178	Update the pre-calculation MSS deviation penalty quantity configuration to properly calculate the MSS expected imbalance energy as per the metered subsystem agreement definition and configuration to accommodate the changes as per MIAF 2019-26 MSSA gaps	Recommendation
1177	Updated BPM configuration guide for pre-calculation high voltage access charge metered load 5.5 to accommodate FERC Order 841	Recommendation



PRR 1197 – Emergency PRR: Updates due to termination of Peak RC settlement and invoicing

- Reason for revision
 - RC West Services implementation of settlements and billing requires the termination of the Peak RC charge code to allow for the appropriate calculations and generation of invoices and statements by Settlements for the RC customers internal to the CAISO BAA.
 - BPM for Settlements and Billing has been revised to support the implementation.
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1185 – Update settlement charge codes for real time market neutrality settlement initiative

- Reason for revision
 - The Settlement configuration changes are needed to support the RTM Neutrality Settlement initiative. The objective of the initiative is to:
 - Eliminate EIM transfer adjustment from RT Imbalance Energy Offset,
 - Add GHG Financial credit for the portion of EIM transfers that do not correspond to a GHG compliance obligation, and
 - Use 5-minute ATF tag of EIM transfers in settlement
 - The ISO anticipates implementation of the BPM changes on or about October 30, 2019, with a retroactive effective date 8/1/2019.
- Recommendation comments:
 - Idaho Power; submitted 10/14/19
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1184 – Update settlement charge codes for reliability must run and capacity procurement mechanism enhancements initiative

- Reason for revision
 - These are the Settlement configuration changes needed to support the RMR and CPM Enhancements initiative. The objective of the RMR and CPM Enhancements initiative is to enhance existing ISO backstop procurement mechanisms, specifically the Capacity Procurement Mechanism (CPM) and Reliability Must-Run (RMR) agreement, as the use of backstop procurement by the ISO increases. RMR contracts shall only be used when a resource owner has notified the ISO of its intention to enter retirement (merging risk-of-retirement into this mechanism). Short of retirement notice, CPM will serve as the procurement backstop for resource adequacy.
 - The ISO anticipates implementation of the BPM changes on or about October 30, 2019, with effective date 1/1/2020.
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1183 – Updated BPM configuration guide for CC 6806 day ahead residual unit commitment (RUC) tier 1 association 5.11 and PC real time energy quantity 5.20 and PC RTM net amount 5.33 and PC spin non-spin no pay quantity 5.21 to accommodate ESDER 3A initiative

- Reason for revision
 - ISO ESDER 3 initiative triggered changes to the settlements system to remove barriers to effective market participation of storage and distributed energy resources. The changes include: PDRs 5 minute bid option to bid dispatchable options of 5, 15, and 60 minute, with 60 minute excluded from bid cost recovery and removal of LSE requirement and DLA application.
 - This impacts CC 6806 Day Ahead Residual Unit Commitment (RUC) Tier 1
 Association 5.11 and PC Real Time Energy Quantity 5.20 and PC RTM Net
 Amount 5.33 and PC SPIN Non-Spin No Pay Quantity 5.21 has an effective
 trade date of 11/13/2019 and an anticipated implementation date around
 10/30/2019.
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1182 – Update the pre-calculation real time energy quantity configuration to accommodate the changes for EIM enhancements 2019

- Reason for revision
 - CAISO will settle the EIM resource deviation amount that's within the resource regulation or available balancing capacity (ABC) range as instructed regulation energy.
 - The planned production deployment date is 10/25/2019 with an effective date of 11/13/2019.
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1179 – Updated BPM configuration guide for charge code 8830 monthly resource adequacy availability incentive mechanism settlement to accommodate pass through bill calculation visibility to scheduling coordinators

- Reason for revision
 - HPQC # 62733 required reconfiguring the PTB calculation so as to make the process more visible to SCs. This required moving the PTB input from a CAISO level charge type to a BA level charge type. CC 8830 Monthly Resource Adequacy Availability Incentive Mechanism Settlement was directly impacted. The effective trade date is 5/1/2018 and the anticipated implementation date is 10/30/2019. CC 8831 remove existing PTB Hierarchy back to effective trade date 5/1/2019.
- Recommendation comments:
 - No comments submitted
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



PRR 1178 – Update the pre-calculation MSS deviation penalty quantity configuration to properly calculate the MSS expected imbalance energy as per the metered subsystem agreement definition and configuration to accommodate the changes as per MIAF 2019-26 MSSA gaps

- Reason for revision
 - BPM MSS Deviation Penalty Quantity Precalculation 5.5.1
 - Multiple disputes have been submitted by NPCA regarding the calculation of their forced outage quantity
 - BPM MSS Deviation Penalty Quantity Precalculation 5.6
 - MIAF 2019-26 MSSA Agreement Gaps requires settlements to identify market disruption intervals and exempt these intervals from any MSS LF Deviation Penalty assessments
 - The planned production deployment date is 10/25/2019, and the effective dates are as follows:

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5.5.1 - 1/1/2018 - 10/31/2019
5.6 - 11/1/2019 - Open
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- Recommendation comments:
 - Northern California Power Agency; submitted 10/8/2019
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision

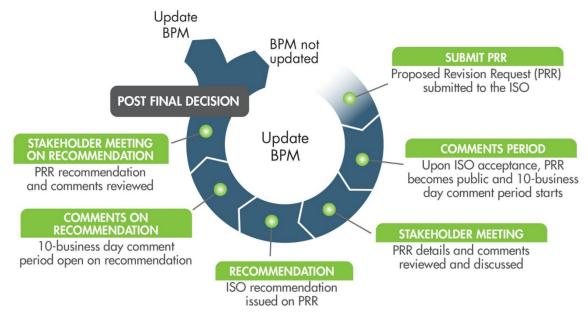


PRR 1177 – Updated BPM configuration guide for pre-calculation high voltage access charge metered load 5.5 to accommodate FERC Order 841

- Reason for revision
 - With the implementation of FERC 841, Settlements must remove TAC for Pumped-Storage Hydro Units as of December 3, 2019. In order to comply with this requirement, a filter was added to remove Pumped-Storage Hydro Units from the PC HVAC Metered Load. The effective trade date of the change is December 1, 2019, and the anticipated implementation date is October 30, 2019.
- Recommendation comments:
 - California Department of Water Resources; submitted 10/1/19
- Recommendation comment period expired:
 - October 15, 2019
- Next step:
 - Post final decision



Next BPM PRR Review Monthly Meeting: November 19, 2019 @ 11 a.m.



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