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| NPRR Number | XXX | NPRR Title | DRAFT- RTC+B Four Parameters Policy Issues |
| Date Posted | | TBD | |
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| Requested Resolution | | Normal | |
| Nodal Protocol Sections Requiring Revision | | Section x.x.x.x | |
| Related Documents Requiring Revision/Related Revision Requests | | None | |
| Revision Description | | This Nodal Protocol Revision Request (NPRR) … | |
| Reason for Revision | | [Strategic Plan](https://www.ercot.com/files/docs/2023/08/25/ERCOT-Strategic-Plan-2024-2028.pdf) Objective 1 – Be an industry leader for grid reliability and resilience  [Strategic Plan](https://www.ercot.com/files/docs/2023/08/25/ERCOT-Strategic-Plan-2024-2028.pdf) Objective 2 - Enhance the ERCOT region’s economic competitiveness with respect to trends in wholesale power rates and retail electricity prices to consumers  [Strategic Plan](https://www.ercot.com/files/docs/2023/08/25/ERCOT-Strategic-Plan-2024-2028.pdf) Objective 3 - Advance ERCOT, Inc. as an independent leading industry expert and an employer of choice by fostering innovation, investing in our people, and emphasizing the importance of our mission  General system and/or process improvement(s)  Regulatory requirements  ERCOT Board/PUCT Directive  *(please select ONLY ONE – if more than one apply, please select the ONE that is most relevant)* | |
| Justification of Reason for Revision and Market Impacts | | This NPRR serves to codify into Protocols a group of policy changes that were deferred from the original RTC protocols developed in 2020.  The four policy concepts below have been developed in coordination with the RTCBTF. These items are not yet resolved and there will continue continue to be discussions and comments at RTCBTF in February and March 2025 with the goal of ERCOT Board approval at the April 8, 2025 meeting in order for functionality to be in place for market trials in May 2025 and go-live in December 2025.  The four parameters being considered are:   * Parameters for Ancillary Service proxy offers floors * Scaling Factor Values for Ramping * ASDCs for use in Reliability Unit Commitment (RUC) studies * RTC State of Charge duration parameters | |

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| Proposed Protocol Language Revision |

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| ***[NPRR930, NPRR1000, NPRR1010, NPRR1014, NPRR1019, NPRR1188, and NPRR1204: Replace applicable portions of Section 6.5.7.3 above with the following upon system implementation for NPRR930, NPRR1000, NPRR1014, NPRR1019, or NPRR1188; or upon system implementation of the Real-Time Co-Optimization (RTC) project for NPRR1010 and NPRR1204:]***  **6.5.7.3 Security Constrained Economic Dispatch**  ##Parameter Issue- Proxy Offer Floor##  (1) The SCED process…  …  (5) For use as SCED inputs for determining energy dispatch and Ancillary Service awards, ERCOT shall use the available Ancillary Service MW capacity of all Resources by creating a proxy Ancillary Service Offer for qualified Resources as follows:  (a) The proxy Ancillary Service Offer shall be a linked Ancillary Service Offer across all Ancillary Service products for which a Resource is qualified to provide. For Generation Resources, the proxy Ancillary Service Offer MW shall be equal to the Resource’s telemetered HSL. For ESRs, the proxy Ancillary Service Offer MW shall be equal to the difference between the Resource’s telemetered HSL and LSL. For Load Resources, the proxy Ancillary Service Offer MW shall be equal to the Resource’s telemetered Maximum Power Consumption (MPC).  (b) For Resources that are not RUC-committed, the price in the proxy Ancillary Service Offer shall be set to:  (i) For Reg-Up and RRS, the maximum of:  (A) The proxy Ancillary Service Offer price floor for Reg-Up or RRS, respectively;  (B) The Resource’s highest submitted Ancillary Service Offer price for Reg-Up or RRS, respectively;  (C) The Resource’s highest Ancillary Service Offer price for ECRS (submitted or proxy); or  (D) The Resource’s highest Ancillary Service Offer price for Non-Spin (submitted or proxy).  (ii) For ECRS, the maximum of:  (A) The proxy Ancillary Service Offer price floor for ECRS;  (B) The Resource’s highest submitted Ancillary Service Offer price for ECRS; or  (C) The Resource’s highest Ancillary Service Offer price for Non-Spin (submitted or proxy).  (iii) For Non-Spin, the maximum of:  (A) The proxy Ancillary Service Offer price floor for Non-Spin; or  (B) The Resource’s highest submitted Ancillary Service Offer price for Non-Spin.  (iv) For Reg-Down, the maximum of:  (A) The proxy Ancillary Service Offer price floor for Reg-Down; or  (B) The Resource’s highest submitted Ancillary Service Offer price for Reg-Down.  (c) The proxy Ancillary Service Offer price floors for each SCED-interval will be derived from the effective Ancillary Service Demand Curves (ASDCs) and Ancillary Service Plan using the following logic:  (i) The proxy Ancillary Service Offer price floor for Reg-Up is equal to the minimum of:  (A) $2,000/MW per hour; and  (B) The point on the ASDC for Reg-Up that intersects with a quantity that is X% of the Ancillary Service Plan for Reg-Up.  (ii) The proxy Ancillary Service Offer price floor for RRS is equal to the minimum of:  (A) $2,000/MW per hour; and  (B) The point on the ASDC for RRS that intersects with a quantity that is X% of the Ancillary Service Plan for RRS.  (iii) The proxy Ancillary Service Offer price floor for ECRS is equal to the minimum of:  (A) $2,000/MW per hour; and  (B) The point on the ASDC for ECRS that intersects with a quantity that is X% of the Ancillary Service Plan for ECRS.  (iv) The proxy Ancillary Service Offer price floor for Non-Spin is equal to the minimum of:  (A) $2,000/MW per hour; and  (B) The point on the ASDC for Non-Spin that intersects with a quantity that is X% of the Ancillary Service Plan for Non-Spin.  (v) The proxy Ancillary Service Offer price floor for Reg-Down is equal to the minimum of:  (A) $2,000/MW per hour; and  (B) The point on the ASDC for Reg-Down that intersects with a quantity that is X% of the Ancillary Service Plan for Reg-Down.  (d) ERCOT systems shall be designed to allow for proxy Ancillary Service Offer price floors to differ when the same Ancillary Service product can be provided by either On-Line or Off-Line Resources, and/or an Ancillary Service product has sub-types.  (e) For RUC-committed Resources:  (i) If a RUC-committed Resource does not have an Ancillary Service Offer for an Ancillary Service product that the Resource is qualified to provide, ERCOT shall create an Ancillary Service Offer for that Ancillary Service product at a value of $250/MWh for the full operating range of the Resource up to its telemetered HSL.  (ii) For each Ancillary Service product for which a RUC-committed Resource has an Ancillary Service Offer, the Ancillary Service Offer used by SCED for that Ancillary Service product across the full operating range of the Resource up to its telemetered HSL shall be the maximum of:  (A) The Resource’s highest submitted Ancillary Service Offer price; or  (B) $250/MWh.  (6) For use as SCED inputs…  …  ##Parameter Issue- Scaling Factors for Ramping#  …  (13) SCED will enforce Resource-specific Ancillary Service constraints to ensure that Ancillary Service awards are aligned with a Resource’s qualifications and telemetered Ancillary Service capabilities.  (a) A scaling factor of 5/7 shall be used for Regulation Up award when ensuring that the SCED Base Point plus the product of this scaling factor and the Regulation Up award does not exceed HDL.  (b) A scaling factor of 5/7 shall be used for Regulation Down award when ensuring that the SCED Base Point minus the product of this scaling factor and the Regulation Down award does not go below LDL.  … |

##Parameter Issue- RUC ASDC##

TBD: Revisions to reflect RUC ASDCs will be made to Protocol Section 5.5.2 (2)

* Language will be derived largely from Protocol Section 4.4.12: Determination of Ancillary Service Demand Curves for the Day-Ahead Market and the Real-Time Market
* Language in this section is being updated to reflect IMM’s ASDC proposal and will be incorporate and applied in parallel to Section 5.5.2

##Parameter Issue- AS Duration and State of Charge##

TBD: Evaluate the appropriate parameters as it relates to state-of-charge duration parameters for RTC+B go-live.