

Alberta Capacity Market

Comprehensive Market Design (CMD 1) Design Proposal Document

Section 5: Rebalancing Auctions

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5 Rebalancing Auctions

After the three-year forward base auction, the AESO will conduct **two** rebalancing auctions. The rebalancing auctions will allow the AESO to purchase additional capacity or release previously committed capacity in response to changes to the load forecast. They will also allow market participants the opportunity to either increase or reduce their capacity commitments closer to the delivery year. Many of the details and procedures for the rebalancing auctions are the same as for the forward auction, and are described in Section 4. This section focuses on key differences between the forward and rebalancing auctions.

The rebalancing auctions will be settled on a net basis, (i.e. settled only based on changes from the previous auction). Under this net settlement process¹, resources that do not submit offers or bids into a rebalancing auction will not have any settlements in that rebalancing auction. However, forward cleared resources that have a lower UCAP rating in the rebalancing auction, or are new resources and have not met development milestones, may be required to submit bids to buy in the rebalancing auction in order to cover their positions. Resources that clear in a rebalancing auction will be settled at the relevant rebalancing price on the difference in cleared quantity between that rebalancing auction and the previous auction (i.e. quantity cleared in that auction minus quantity cleared in the previous auction). While the rebalancing auctions will be settled on a net basis, they will be cleared on a gross basis with the full AESO demand curve constituting the demand side, and all market participant offers and bids represented on the supply side. Gross clearing is discussed further in Sections 5.3 and 5.4 below.

5.1 Auction Timeline and Procedures

5.1.1 Auction Timeline:

The AESO will hold **two** rebalancing auctions, **18 and 3** months prior to the start of the delivery year. Table 1 shows an example schedule for the 2023 /24 delivery year, including both the forward auction, and both rebalancing auctions.² In the transition period that starts with the November 2019 auction, fewer rebalancing auctions will be held, with the timing selected such that the forward and rebalancing auctions will be conducted at times staggered during each calendar year. See Section 4.1 for the compressed base auction timeline.

Table 1
Timeline of Rebalancing Auctions
Example for Delivery Year 2023/24

| Auction Date | Forward Period | Auction Type |
|--------------|----------------|----------------------------|
| Nov. 2020 | 36 Months | Base Auction |
| May 2022 | 18 Months | First Rebalancing Auction |
| Aug. 2023 | 3 Months | Second Rebalancing Auction |
| Nov. 2023 | n/a | Start of Delivery Period |

5.1.2 Procedures

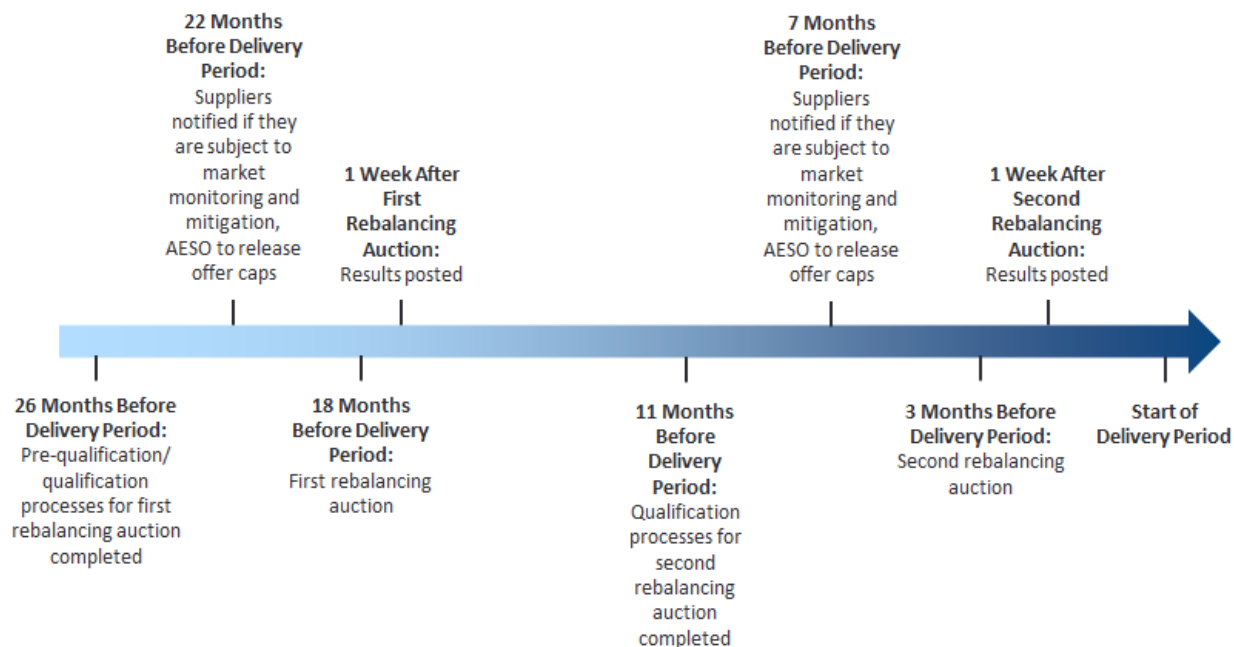
Process steps for the rebalancing auctions will be similar to those for the forward auction described in Section 4. Figure 1 shows the timeline of rebalancing auction procedures. Each rebalancing auction will include a resource qualification step for all resources, conducted **eight months** ahead of the auction (although for resources already qualified at the time of the forward auction, the qualification processes will be limited). At the end of this qualification step, the AESO will notify participants of their UCAP ratings.

¹ Net settlements here refers to the fact that the rebalancing auctions are settled based on changes from the previous auction. This is not referring to the net settlements Instructions mechanism in the energy market.

² See recommendation for two rebalancing auctions from working group here: <https://www.aeso.ca/assets/Uploads/Recommendation-Rebalancing-Auctions-2017-11-14.pdf>

The auction itself will consist of a one-week bidding window during which providers can submit offers to sell, and bids to buy back some or all of their obligation. The AESO will notify participants of the auction results **one** week after the end of the bidding window.

Figure 1
Timeline for Rebalancing Auctions



5.2 Market Participant Buy Bids and Sell Offers

Market participants will have the opportunity to participate in the rebalancing auctions to adjust their positions ahead of the delivery year. The only entities that can reduce their obligation in the rebalancing auction (i.e. “buy-out”) are forward cleared supply and the AESO. Qualified incremental supply can submit offers to sell into the rebalancing auctions in order to obtain a capacity payment. This incremental supply can be provided by resources that did not clear the forward auction, or from uprates and UCAP increases of resources that did clear the forward auction. Suppliers that wish to reduce their forward commitments can submit repricing bids to buy out of their positions. Forward-cleared resources that are physically unable to meet their commitments due to UCAP downrates or because they have not achieved development milestones will be required to offer **above the price cap**, and will be guaranteed to clear. All forward-cleared supply that does not submit a repricing or UCAP reduction bid will be treated as a price taker in the rebalancing auctions and will not be subject to settlements. These options are described in more detail below:

- **Incremental Sell Offers:** Capacity sellers with uncommitted capacity (including UCAP uprates) that have been qualified by the AESO can submit offers to sell incremental capacity into the rebalancing auction, at a price specified by the market participant in their offer. If the rebalancing price clears above the incremental sell offer price, the resource will be committed in the rebalancing auction, and will be paid the rebalancing price for its cleared quantity in settlements.
- **Repricing (Buy-Out) Bids (treated as supply offers under gross clearing):** Capacity sellers that have already taken on a capacity obligation, and wish to reduce their commitment through the rebalancing auction can submit repricing bids. If the rebalancing auction price clears below the offer price of that resource, the resource will be de-committed, and will need to pay the rebalancing auction

clearing price in settlements in order to buy out of their capacity obligation. If the rebalancing auction clears at a price above the offer price, the resource will retain its capacity obligation, and will not have any financial settlement as a result of the auction.

- **UCAP Reduction Bids (Treated as supply offers above the price cap under gross clearing):** A seller that is physically unable to deliver on a prior capacity commitment can submit a non-price UCAP adjustment offer. For auction-clearing purposes, the capacity supply will be treated as not available even at the auction price cap. This type of offer will be used for: (a) sellers wishing to guarantee a reduction of their capacity commitment regardless of capacity clearing price, (b) new resources that have not achieved development milestones and that are required to buy out of their capacity obligations, and (c) existing or new resources whose qualified UCAP at the time of the final rebalancing auction is below the previously committed UCAP quantity.
- **Non-Participating Supply:** As a default, capacity sellers that have already taken on a capacity obligation will be assumed to be “non participants” that do not wish to adjust their UCAP of capacity commitments, and whose UCAP ratings have not been adjusted according to AESO processes. For auction-clearing purposes, all such previously committed supply will be accounted for in auction clearing but will not incur any financial settlements out of the auction, nor have their capacity commitments adjusted.

5.3 Administrative Demand Curve

The rebalancing demand curve will have the same shape as the forward auction demand curve, as described in Section 4.3. It will use the same net-CONE, and reliability requirement as the forward auction, but several other parameters will be updated in the rebalancing auction:

- **Load Forecast:** The sloped demand curve will reflect the most up-to-date load forecast available at the time of the rebalancing auction. If the load forecast has increased since the forward auction, the rebalancing auction demand curve will be right-shifted relative to the forward auction demand curve. If the load forecast has decreased, the rebalancing demand curve will be left-shifted. However, the reliability requirement remains the same as in the forward auction with target capacity volumes adjusted as appropriate. **Note that the AESO may elect not to update its load forecast in the first rebalancing auction demand curve,** but will use the most up-to-date forecast in the final rebalancing auction.
- **Capacity Import Limits:** Individual and simultaneous import limits from adjacent areas will be updated to reflect the most up-to-date information as of the rebalancing auction. If import limits have increased since the forward auction, additional external supply will be able to sell into the auction. If incremental external supply offers in the rebalancing auction exceed incremental import capability, incremental import capability will be rationed among incremental external supply in same manner as described in Section 4.7. If import limits have decreased since the forward auction, imports will be rationed among forward cleared market participants as described in Section 4.7. **External suppliers that have cleared in a forward auction will not be subject to reduced capacity payments if import limits decrease in the rebalancing auction, but may have their cleared volumes reduced.**
- **Intra-provincial Transmission Constraints:** Intra-provincial transmission constraints will be updated to reflect the most up-to-date information as of the rebalancing auction. If intra-provincial transmission constraints prevent delivery of all incremental supply offers, incremental supply offers behind the constraint will be rationed in the manner described in Section 4.8. If intra-provincial transmission constraints prevent delivery of forward cleared supply, forward cleared supply will be rationed in the manner describe in Section 4.8. **Capacity resources that have sold in the forward auction, but are no longer feasible after a change in intra-provincial transmission constraints, will not be subject to reduced capacity payments, but may have their cleared volumes reduced.**

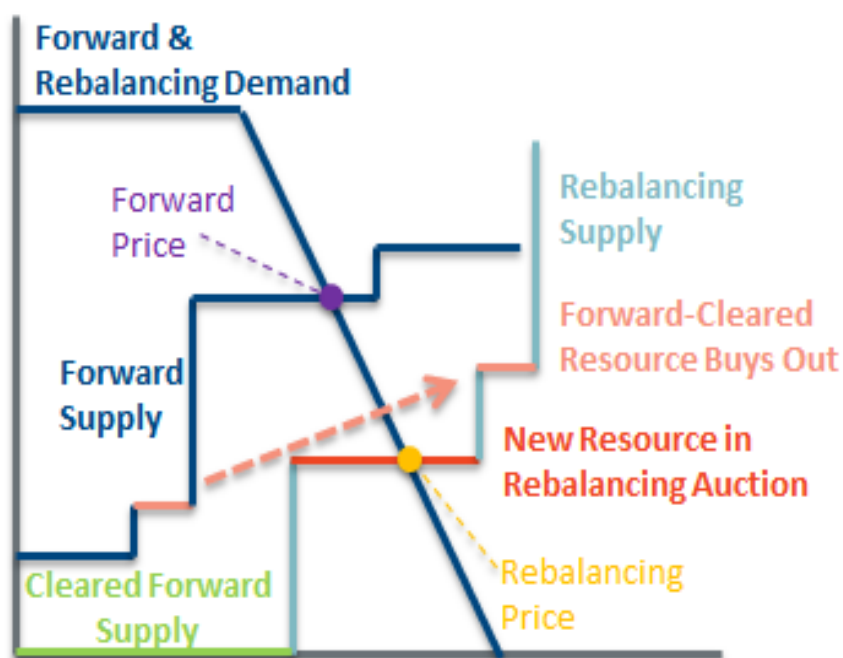
5.4 Auction Clearing and Price Setting

The rebalancing auctions will be cleared on a gross basis. The AESO's demand curve (updated as described in Section 5.3) will constitute the demand side. All pricing and reduction bids to buy out obligations, and incremental sell offers to sell incremental supply will be represented on the supply side. Cleared resources from the forward auction that do not submit bids to buy will be treated as price takers in the rebalancing auctions. The auctions will clear using the same mechanics as the forward auction, as described in Section 4.5. The resulting auction clearing price will be used to settle *differences* between cleared quantities in the rebalancing auction and the forward auction. The four examples below illustrate how the rebalancing auctions will function.

Example 1: Load Forecast Increases, and Incremental Supply Sells to the AESO. The AESO's load forecast increases in the rebalancing auction relative to the forward auction, shifting the demand curve to the right. One incremental supply offer is received, and clears the market at a higher price than the forward auction. The incremental supply offer receives the rebalancing price multiplied by its rebalancing cleared quantity in settlements. The AESO pays the rebalancing price multiplied by its incremental rebalancing cleared quantity. Settlements for all previously cleared forward supply are unaffected by the rebalancing auction.



Example 2: Incremental Supply Sells to Resource Buying Out, and to the AESO. The AESO's load forecast is unchanged from the forward auction, and the rebalancing demand curve is the same as the forward demand curve. One incremental supplier offers, and partially clears, setting the rebalancing price below the forward price. One forward-cleared resource fully buys out of its capacity obligation. Since the rebalancing price is lower than the forward price, the AESO buys incremental supply from the incremental resource. In settlements, the incremental supplier receives the rebalancing price multiplied by its rebalancing cleared quantity. The forward-cleared resource that is buying out pays the rebalancing price multiplied by its rebalancing cleared quantity (and also receives the forward price multiplied by its forward cleared quantity, resulting in net revenue for the resource). The AESO pays the rebalancing price multiplied by the incremental rebalancing cleared quantity. Settlements for all forward supply that did not buy out in the rebalancing auction are unaffected.



Example 3: Load Forecast Decreases, and the AESO Sells to Resource Buying Out. The AESO's load forecast decreases from the forward auction, shifting the rebalancing demand curve to the left. One forward-cleared resource submits a UCAP reduction bid above the price cap, and fully buys out. The rebalancing auction clears below the forward price. In settlements, the resource buying out pays the rebalancing price multiplied by its rebalancing cleared quantity (and also receives the forward price times its forward cleared quantity, resulting in net revenue for the resource) and the AESO receives the rebalancing price multiplied by the difference between its forward and rebalancing-cleared quantities. Settlements for all forward supply that did not buy out in the rebalancing auction are unaffected.



Example 4: Load Forecast Decreases, and Incremental Supply and the AESO Sell to Resource Buying Out. The AESO's load forecast decreases from the forward auction, shifting the rebalancing demand curve to the left. One forward-cleared resource buys out of its capacity obligation. One incremental supplier offers, and partially clears, setting the rebalancing price below the forward price. At the rebalancing price, the AESO sells some of its supply in the incremental auction. In settlements, the resource buying out pays the rebalancing price multiplied by its rebalancing cleared quantity (and also receives the forward price times its forward cleared quantity, resulting in net revenue for the resource). The incremental supplier receives the rebalancing price multiplied by its rebalancing cleared quantity. The AESO receives the rebalancing price multiplied by the difference between its forward, and rebalancing cleared quantities. Settlements for all forward supply that did not buy out in the rebalancing auction are unaffected.

