



Department of Energy, Mines,  
Industry Regulation and Safety  
Energy Policy WA

# Wholesale Electricity Market Investment Certainty Review (Initiatives 1 and 2)

Information Paper  
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# Abbreviations

Term	Definition
<b>AEMO</b>	Australian Energy Market Operator
<b>BRCP</b>	Benchmark Reserve Capacity Price
<b>CONE</b>	Cost of New Entry
<b>Coordinator</b>	Coordinator of Energy
<b>CRC</b>	Certified Reserve Capacity
<b>DSR</b>	Demand Side Response
<b>DSP</b>	Demand Side Programmes
<b>ESOO</b>	Electricity Statement of Opportunities
<b>EPWA</b>	Energy Policy WA
<b>ERA</b>	Economic Regulation Authority
<b>ESOO</b>	Electricity Statement of Opportunities
<b>ESR</b>	Electric Storage Resource
<b>MAC</b>	Market Advisory Committee
<b>NGERS</b>	National Greenhouse and Energy Reporting Scheme
<b>NAQ</b>	Network Access Quantity
<b>NCESS</b>	Non-Co-optimised Essential System Service
<b>PPA</b>	Power Purchase Agreement
<b>PV</b>	Photovoltaic
<b>RCM</b>	Reserve Capacity Mechanism
<b>RCP</b>	Reserve Capacity Price
<b>RCT</b>	Reserve Capacity Target
<b>SWIS</b>	South West Interconnected System
<b>SRC</b>	Supplementary Reserve Capacity
<b>WEM</b>	Wholesale Electricity Market
<b>WIC Review</b>	WEM Investment Certainty Review

# Executive summary

## The Wholesale Electricity Market Investment Certainty Review

The Coordinator of Energy (Coordinator), in consultation with the Market Advisory Committee (MAC), is conducting the Wholesale Electricity Market (WEM) Investment Certainty (WIC) Review under clause 2.2D.1 of the WEM Rules. The review includes a package of specific WEM reform initiatives that aims to improve investment certainty for renewable generation and new firming capacity.

The MAC constituted the WEM Investment Certainty Review Working Group (WICRWG) to support the WIC Review. More information on the WIC Review is available on the EPWA website<sup>1</sup>, including the Scope of Work for the review, the Consultation Paper (Initiatives 1 and 2), and the submissions by stakeholders in response to the Consultation Paper.

### Review Outcomes and Rationale

Electricity markets all over the world are going through major transition to deliver a net zero emissions energy sector. The South West Interconnected System (SWIS) requires significant network, renewable generation, and Energy Storage Resource (ESR) investments to continue to deliver reliable, affordable, and environmentally responsible electricity in the energy transition.

A Consultation Paper was published in July 2024 to seek feedback on proposals for Initiatives 1 and 2 of the WIC Review. Initiatives 1 and 2 are two of the five specific reforms the Minister for Energy announced on 9 May 2023:

1. Reviewing the Reserve Capacity Price (RCP) curve to determine if it needs to be adjusted to send sharper signals for investment when demand for new capacity is stronger; and
2. A ten-year RCP guarantee for new technologies, such as long-duration storage;

EPWA has considered submissions on the July 2024 Consultation Paper, and the final Review Outcomes are as shown in Table 1.

**Table 1 WIC Initiatives 1 and 2 Review Outcomes**

Review Outcome	Rationale
<p><b>Review Outcome 1</b></p> <p>The Peak Reserve Capacity Price (RCP) will be set using a five-part curve based on the ratio of Peak Capacity Credits issued to the Peak Reserve Capacity Target. When the sum of Peak Capacity Credits issued is:</p> <ul style="list-style-type: none"><li>• 0% to 85% of the Reserve Capacity Target (RCT), the Peak RCP will be 150% of the Benchmark Reserve Capacity Price (BRCP);</li></ul>	<p>The amendments to the RCP curve provide:</p> <ul style="list-style-type: none"><li>• Increased signal for investment in times of capacity shortfall, while retaining a limit on consumer cost exposure to capacity oversupply that is in line with international capacity mechanisms;</li><li>• Reduced price volatility when capacity available is close to the RCT;</li><li>• Increased certainty for investors in times of capacity surplus, while still signalling that new entry should be deferred by reducing the price consumers pay for capacity.</li></ul>

<sup>1</sup> [Wholesale Electricity Market Investment Certainty Review](#)

Review Outcome	Rationale
<ul style="list-style-type: none"> <li>85% to 95% of the RCT, the Peak RCP will be determined by a line between 150% and 100% of the BRCP;</li> <li>95% and 105% of the RCT, the Peak RCP will be 100% of the BRCP;</li> <li>105% and 115% of the RCT, the Peak RCP will be determined by a line between 100% and 50% of the BRCP;</li> <li>Above 115% of the RCT, the Peak RCP will be 50% of the BRCP.</li> </ul>	
<p><b>Review Outcome 2</b></p> <p>The Flexible RCP will be set using a three-part curve based on the ratio of Flexible Capacity Credits issued to the Flexible RCT. When the sum of Flexible Capacity Credits issued is:</p> <ul style="list-style-type: none"> <li>0% to 85% of the RCT, the Flexible RCP will be 160% of the BRCP;</li> <li>85% to 115% of the RCT, the Flexible RCP will be determined by a line between 160% and 40% of the BRCP;</li> <li>Above 115% of the RCT, the Flexible RCP will be 40% of the BRCP.</li> </ul>	<p>Because Flexible Capacity is an extension to the Peak Capacity product, rather than being a completely separate type of capacity, it does not need the complexity of a deadband.</p>
<p><b>Review Outcome 3</b></p> <p>The Coordinator will review the RCP curves every six years, with timing aligned to a review of the BRCP reference technology.</p> <p>The existing Transitional Pricing arrangements will be amended to include a look-back adjustment that corrects for differences between forecast inflation and actual inflation.</p> <p>There will be no new transitional arrangements for existing Facilities not already subject to transitional pricing arrangements.</p>	<p>The RCP curves and the BRCP reference technology are related, so coordinating the reviews means changes in one can be reflected in the other. The proposed duration balances the ability to adjust pricing arrangements with the need to maintain certainty for long term investment.</p> <p>Including a true-up provision in the existing transitional pricing regime allows for more accurate Consumer Price Index adjustment.</p> <p>Facilities commissioned since 2019 have operated under a regime with a zero-price floor. The proposed new RCP curve decreases the downside risk and increases the upside risk compared to the RCP curve at the time these Facilities invested. However, these Facilities could receive higher or lower prices due to the new RCP curve, so there is no need for transitional arrangements for these Facilities.</p>
<p><b>Review Outcome 4</b></p> <p>1. New providers of Flexible Capacity in Capability Class 1 will be allowed to request a ten-year fixed RCP, but this must be requested in the first year the capacity receives any Capacity Credits.</p>	<p>Requiring a facility to be of a technology type not already present in the SWIS would be inconsistent with the goal of facilitating increased renewable energy in the SWIS.</p>

Review Outcome	Rationale
<p>Existing capacity that already holds Peak Capacity Credits (whether fixed price or not) before applying for Flexible Capacity Credits will not be eligible for a fixed RCP for Flexible Capacity.</p> <p>2. Any new facility in Capability Class 1 or Capability Class 2 using a renewable energy source may request a fixed RCP for ten years. A Facility capable of using non-renewable sources and seeking the ten-year fixed RCP must provide evidence of 100% renewable fuel source in each Reserve Capacity Cycle.</p> <p>3. An Electric Storage Resource (ESR) Facility requesting a ten-year fixed RCP must provide evidence that it can provide firm output at its Peak Certified Reserve Capacity for the longest forecast ESR Duration Requirement over the ten-year horizon in the Electricity Statement of Opportunities (ESOO) published in the Reserve Capacity Cycle in which it requested the fixed RCP.</p> <p>Facilities may only request a fixed RCP in the first year that they are awarded Capacity Credits, and the fixed price will apply to all facility components receiving Capacity Credits for the first time.</p> <p>If it is eligible for the ten-year price guarantee under one or more of the above requirements:</p> <ul style="list-style-type: none"> <li>• A Facility providing both Peak Capacity and Flexible Capacity would receive a fixed RCP for both products; and</li> <li>• A Facility providing Peak Capacity only would receive a fixed RCP for Peak Capacity only. If it seeks Flexible Capacity Credits in a later capacity cycle, it will receive the floating Flexible RCP.</li> </ul> <p>Facilities requesting a ten-year fixed RCP will be grouped with Facilities requesting a five-year fixed RCP.</p>	<p>While shortfalls in Peak Capacity are currently projected for the SWIS, shortfalls in Flexible Capacity are not likely in the short to medium term. Concerns have been raised that, as more renewable generation and storage enter the SWIS and coal plant retires, the need for additional Flexible Capacity in Capability Class 1 will emerge. A ten-year fixed RCP for Flexible Capacity in Capability Class 1 increases revenue certainty for investors. It will provide a signal for investment if there is a shortfall of Peak Capacity even if there is no shortfall in Flexible Capacity.</p> <p>An ESR Facility that can provide firm capacity over longer duration than the currently projected ESR Duration Requirement will support the replacement of fossil-fuelled generation by renewables. Tying the requirement to expected ESR Duration increases over the ten-year period incentivises new capacity to align with future needs.</p> <p>Retaining existing Network Access Quantity (NAQ) groupings means that Facilities prepared to accept a changing RCP are preferred to those which are not, thus maintaining costs to consumers at efficient levels.</p>

# 1. Introduction

Clause 2.2D.1(h) of the Wholesale Electricity Market (WEM) Rules confers the function of the Coordinator of Energy (Coordinator) to consider, and in consultation with the Market Advisory Committee (MAC), progress the evolution and development of the WEM and the WEM Rules.

## 1.1 Background

Electricity markets all over the world are undergoing major transition to net zero emissions energy sectors. The South West Interconnected System (SWIS) has been experiencing continuous increase in the penetration of distributed photovoltaic (PV), large scale wind generation, and firming technologies such as Electric Storage Resources (ESR).

With the planned exit of baseload coal generators and the expected progressive exit of the remaining fossil-fuelled fleet, significant network, renewable energy and ESR investments will be required in the SWIS over the next decade and beyond to maintain reliable, affordable, and environmentally responsible electricity supply.

The Coordinator has carried out a number of electricity market reviews since 2022 to address the opportunities and challenges associated with the energy transition, including:

- The Reserve Capacity Mechanism (RCM) Review<sup>2</sup>;
- The Cost Allocation Review<sup>3</sup>;
- The Market Power Mitigation Strategy Review<sup>4</sup>;
- The Supplementary Reserve Capacity (SRC) Review<sup>5</sup>;
- The Demand Side Response (DSR) Review<sup>6</sup>; and
- The Review of the Benchmark Reserve Capacity Price (BRCP) Reference Technologies<sup>7</sup>.

These reviews have highlighted the need for further WEM reforms to enhance the incentives for investment in new low emissions facilities, while maintaining system security and reliability and without unduly increasing costs to consumers.

The WEM Investment Certainty (WIC) Review aims to incentivise investment for renewable generation and firming capacity to meet the net zero emissions, while maintaining system security and reliability.

The MAC constituted the WIC Review Working Group (WICRWG) to support the WIC Review work. More information on the WIC Review is available on the EPWA website<sup>8</sup>.

In July 2024, EPWA released a Consultation Paper on two of the WIC Review initiatives (Initiatives 1 and 2) announced by the Minister of Energy on 9 May 2023:

1. Reviewing the Reserve Capacity Price (RCP) curve to determine if it needs to be adjusted to send sharper signals for investment when demand for new capacity is stronger; and
2. A ten-year RCP guarantee for new technologies, such as long-duration storage;

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<sup>2</sup> Information on the RCM review is available at [Reserve Capacity Mechanism Review webpage](#).

<sup>3</sup> Information on the Cost Allocation Review is available at [Cost Allocation Review webpage](#).

<sup>4</sup> Information on the Market Power Mitigation Strategy Review is available at [Market Power Mitigation Strategy webpage](#).

<sup>5</sup> Information on the SRC review is available at [2023 Supplementary Reserve Capacity Review webpage](#).

<sup>6</sup> Information on the DSR review is available at [Demand Side Response Review webpage](#).

<sup>7</sup> See section 5.5 of the [Reserve Capacity Mechanism Review Information Paper \(Stage 1\) and Consultation Paper \(Stage 2\)](#).

<sup>8</sup> [Wholesale Electricity Market Investment Certainty Review](#)

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Submissions were received from AEMO, Alinta Energy, Australian Energy Council, Bluewaters, Chamber of Minerals and Energy, Enel Green Power, Enel X, the Expert Consumer Panel, Merredin Energy, Perth Energy, Shell, Summit Southern Cross, Synergy and Tesla, with one party making a confidential submission.

## 1.2 Purpose and Structure of this Paper

This Information Paper sets out the Review Outcomes for Initiatives 1 and 2 of the WIC Review, which were subject to public consultation in July 2024. This paper is for information only, presenting the Review Outcomes for the two initiatives.

Finalising these Review Outcomes is urgent to enable the Australian Energy Market Operator (AEMO) to finalise the implementation of the WEM Amending Rules introducing the new Flexible Capacity product in the Reserve Capacity Mechanism (RCM). These WEM Amending Rules were made by the Minister for Energy in early December 2023 as part of the package of WEM Amending Rules implementing the outcomes of the RCM Review, which was completed by the Coordinator in 2023.

Appendix A provides a summary of stakeholder feedback in response to the Wholesale Electricity Market Investment Certainty Review (Initiatives 1 and 2) Consultation Paper and EPWA's responses to the feedback.

## 2. Initiatives 1 and 2 Review Outcomes

### 2.1 Reserve Capacity Price Curve

The RCP curve, together with the BRCP, and the Reserve Capacity Target (RCT), determines the RCP paid to Market Participants for each megawatt (MW) of capacity they provide, that is each Capacity Credit they receive.

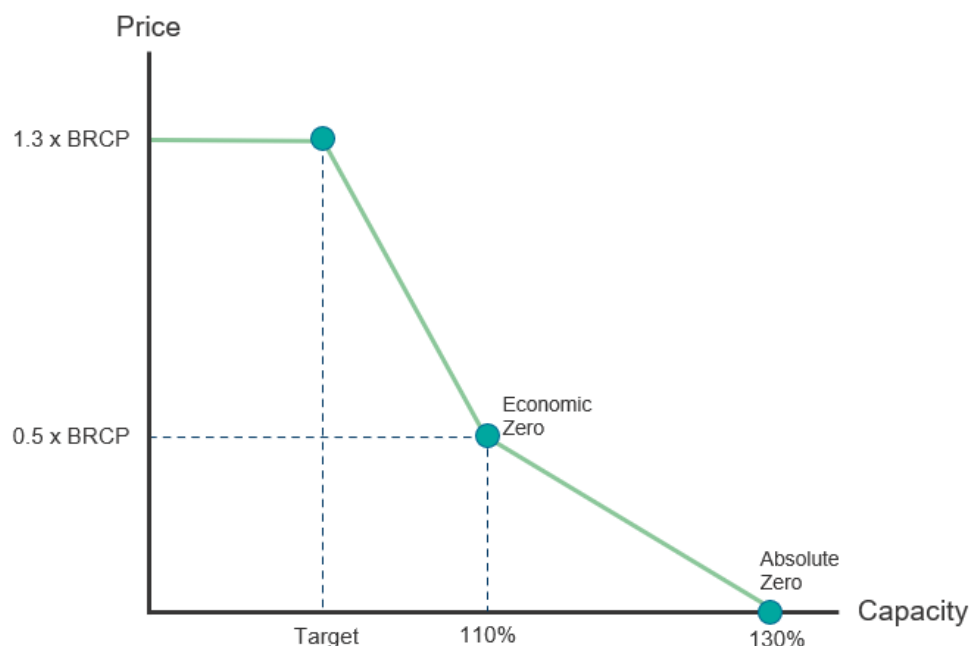
#### 2.1.1 Peak Reserve Capacity Price curve

The WEM Rules were amended on 22 February 2020 to implement the current approach in setting the RCP curve for the RCM from the 2019 Reserve Capacity Cycle. Prior to that, the RCP curve was based on a fixed amount of capacity payment with a price cap of 1.1 times the BRCP. This was considered to be ineffective in signalling the need for market investment when there is capacity shortfall or for retirement when there is excess capacity. This prompted a 2018 review that resulted in the current RCP curve.

Currently, the RCP curve has a reference price of Cost of New Entry (CONE), and is based on lines joining three price points:

- **Price Cap:** 1.3 times the BRCP at the RCT
- **Absolute Zero:** zero at 30% excess capacity
- **Economic Zero:** 50% of the BRCP at 10% excess capacity

Figure 1: WEM RCM RCP Curve



The RCM RCP Curve formula is given as:

$$\text{Max}(\text{Segment 1}, \text{Segment 2}, 0) \times \text{BRCP}$$

Where:

$$\text{Segment 1} = \left( \frac{\text{EZ RCP Factor} - \text{BRCP Cap Factor}}{\text{EZ}} \times \text{Excess Capacity} + \text{BRCP Cap Factor} \right)$$

$$\text{Segment 2} = \left( \frac{\text{EZ BRCP Factor}}{\text{EZ} - \text{AZ}} \right) \times (\text{Excess Capacity} - \text{AZ})$$

## Proposal 1

*Set the Peak RCP to 100% of the Peak BRCP if the number of Peak Capacity Credits issued equals the Peak RCT*

Submissions generally supported the proposal.

Two submissions did not support the proposal. One submission suggested that the proposed RCP curve should provide value in a range of circumstances, including excess capacity. One submission recommended that if the proposal progresses, the reference technology for the BRCP should be reconsidered.

EPWA considers that in times of excess capacity the proposed RCP curve balances certainty for investors with costs to consumers, and that the Coordinator's review process of the reference technology providers provides for a change if a lower cost technology, that meets the rest of the requirements, is identified.

## Proposal 2

*Set the Peak RCP to 100% of the Peak BRCP when the number of Peak Capacity Credits provided is between 95% and 105% of the Peak RCP*

Submissions generally supported the proposal. Some submissions suggested alternative approaches to the deadband, including:

- Shifting the deadband region, and specifically beginning the deadband at 100% of the RCT (i.e., so any shortfall in capacity below the RCT increases the RCP towards the RCP cap sooner).

EPWA considers that the deadband provides certainty for investors below the RCT, and it is reasonable for consumers to make the deadband symmetric around the RCT.

- A deadband that is relative to the size of the largest generator.

EPWA considers that a percentage based deadband range is more appropriate than using single generator, as the goal is to reduce volatility in the RCP, and multiple small capacity projects can add up to more than the largest generator on the power system.

- Having a higher Peak RCP when Peak Capacity Credits allocated are close to the RCT.

EPWA considers that the need for a reserve margin is already considered in setting the RCT and setting a price higher than the BRCP when the RCT is met would incentivise excess capacity.

One submission did not support the proposal, and suggested that the proposal should be supported by economic analysis considering the >2000MW of proposed or committed ESR (and associated costs) in conjunction with the proposed wind generation across the SWIS. EPWA considers that the Coordinator's BRCP Benchmark Capacity Providers review has undertaken analysis to consider the profitability of ESR, wind, and other technologies, and that this proposal remains appropriate independent of what reference technology is used to set the BRCP.

## Proposal 3

*Set a maximum Peak RCP at 150% of the Peak BRCP, when the number of Peak Capacity Credits issued is 85% of the Peak RCT*

Submissions generally supported the proposal and its intent.

Two submissions did not support the proposal. One submission expressed concern that the incentive for new capacity during shortfall may be too slow to avoid Non-Co-optimised Essential System Service (NCESS) reliance, due to a mismatch between incentives during undersupply and disincentives in oversupply.

EPWA will continue to examine potential mechanisms to provide a more timely price signal resulting from potential shortfalls. In the meantime, EPWA considers that it is reasonable to have an RCP cap in line with other markets internationally.

## Proposal 4

*Set a minimum Peak RCP at 50% of the Peak BRCP, when the number of Peak Capacity Credits provided is greater than or equal to 115% of the Peak RCT*

Submissions on this proposal were mixed.

Three submissions that supported the proposal agreed that a non-zero price floor will provide more investment certainty than a zero-price floor. One submission suggested that the price floor does not have to be symmetrical with the price cap (i.e. a price cap at 150% of BRCP does not require a price floor at 50% of BRCP), and suggested basing the price floor on debt-servicing costs (e.g., payment of interest and principal), WACC, and CAPEX/OPEX. EPWA considers that a simple symmetrical approach is reasonable and would provide more certainty, and that the level of the floor could be reconsidered in the next review of the price curve if it is found to drive significant excess capacity.

Two submissions raised concerns that this proposal could increase costs for end consumers by incentivising excess capacity. Another submission considered that there is no need to disincentivise excess capacity as it helps increase grid reliability. EPWA considers that a price floor set significantly below the BRCP, while reducing potential volatility for existing capacity, will disincentivise new entry.

Two submissions suggested less frequent recalculation of the price floor to avoid investment uncertainty. One of these submissions recommended reviewing the price floor and the method of calculating it every 3-5 years. EPWA acknowledges the concerns about uncertainty associated with the RCP, and has further considered this in section 0.

Two submissions suggested that investment certainty would be better served by a fixed-term RCP negotiated based on project type (e.g., baseload/firmed, or intermittent), based on when a new entrant first becomes eligible for Reserve Capacity payments, or from when transitional Facilities are no longer covered by the transitional RCP arrangements. EPWA notes that there are already provisions for project proponents to request fixed RCP for five years, and that the proposals in section 2.2 will extend that to ten years for eligible projects.

Two submissions proposed that AEMO should exclude Demand Side Programmes (DSP) from capacity payments in times of significant excess capacity. EPWA's view is that demand response is an important part of ensuring supply adequacy, and that the changes to demand response requirements for DSPs made in the RCM Review and the DSR Review will mitigate the potential for payments to parties that do not contribute to system reliability.

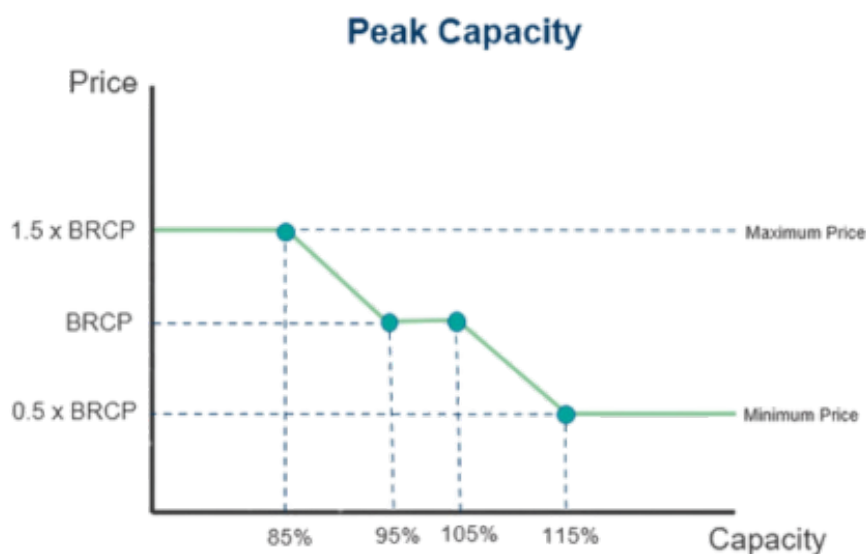
## Review Outcome 1

The Peak RCP will be set using a five-part curve based on the ratio of Peak Capacity Credits issued to the RCT. When the sum of Peak Capacity Credits issued is:

- 0% to 85% of the RCT, the Peak RCP will be 150% of the BRCP;
- 85% to 95% of the RCT, the Peak RCP will be determined by a line between 150% and 100% of the BRCP;
- 95% and 105% of the RCT, the Peak RCP will be 100% of the BRCP;
- 105% and 115% of the RCT, the Peak RCP will be determined by a line between 100% and 50% of the BRCP;
- Above 115% of the RCT, the Peak RCP will be 50% of the BRCP.

The resulting curve is shown in Figure 2.

**Figure 2: Peak RCP Curve**



### 2.1.2 Flexible Capacity Reserve Capacity Price Curve

In 2023, the Coordinator determined the same Benchmark Capacity Provider for both Peak Capacity and Flexible Capacity. While this remains the case, both products are expected to have the same BRCP.

Flexible Capacity providers will be paid a supplemental amount reflecting the value of Flexible Capacity over and above the value of Peak Capacity.

The two Peak and Flexible RCP curves need to be differentiated to allow for a potential shortage of Flexible Capacity to result in an investment signal, even when there is a shortage of Peak Capacity.

#### Proposal 5

*Allow any new facility that provides Flexible Capacity to receive (on request) a fixed RCP for ten years*

*Set a maximum Flexible RCP at 160% of the Flexible BRCP, when the number of Flexible Capacity Credits issued is 85% of the Flexible RCT*

*Set the Flexible RCP to 100% of the Flexible BRCP where the number of Flexible Capacity Credits issued is 100% of the Flexible RCT*

*Set the minimum Flexible RCP on the same basis as the Peak RCP*

Not all submissions addressed the proposal, but those that did generally supported it.

One supporting submission recommended setting the Flexible RCP higher than 100% at the RCT to send a signal that investment is required. EPWA considers that the RCT is defined as the point at which further investment is not required, and thus setting a price higher than BRCP at the RCT would incentivise excess capacity.

One submission suggested a zero-price floor for new capacity and a non-zero floor for existing capacity. EPWA does not consider that differential price treatment for incumbents and new entrants is required in the absence of transitional arrangements, which apply a lower price cap than for new entrants, for existing Facilities commissioned post 2019.

One submission noted the importance of the eligibility requirements for Flexible Capacity being defined and consulted on. EPWA considers that this will be achieved when the outcomes of the RCM Review are fully implemented.

One submission did not support Flexible Capacity having a higher RCP cap than Peak Capacity. The submission recommended a fixed Flexible RCP cap set for ten years to stimulate required investment. The submission also considered that a deadband and a non-zero RCP floor for Flexible Capacity add unnecessary complexity to a model for the SWIS as a relatively small market. EPWA agrees with respect to the deadband, but considers that a price floor for Flexible Capacity helps to protect investors against downside risks, just as the price cap protects consumers against unreasonably high prices in case of shortfall.

One submission raised concern regarding the proposed penalties for high emission technologies, considering such a regime is premature until the supply of lower carbon fuels in Australia increases. EPWA notes that the treatment of high emission technologies was outside the scope of this consultation, which is only focused on Initiatives 1 and 2.

Stakeholder questions regarding how the proposal to allow a new facility that provides Flexible Capacity to receive a fixed RCP for ten years interacts with Proposal 8 are addressed together under Proposal 8 below.

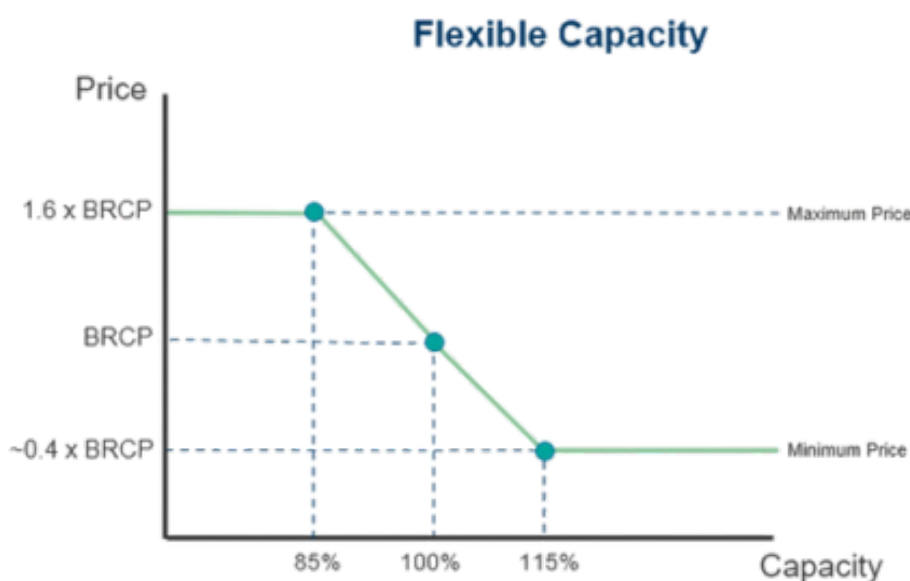
## Review Outcome 2

The Flexible RCP will be set using a three-part curve based on the ratio of Flexible Capacity Credits issued to the Flexible RCT. When the sum of Flexible Capacity Credits issued is:

- 0% to 85% of the RCT, the Flexible RCP will be 160% of the BRCP;
- 85% to 115% of the RCT, the Flexible RCP will be determined by a line between 160% and 40% of the BRCP;
- Above 115% of the RCT, the Flexible RCP will be 40% of the BRCP.

The resulting curve is shown in Figure 3.

**Figure 3: Flexible RCP Curve**



## 2.1.3 Reviews and adjustments

In the current WEM Rules:

- Clause 2.26.3 requires Economic Regulation Authority (ERA) to review the BRCP method every five years;
- Clause 2.26.3A extends this to the RCP curve parameters (including the cap, the Economic Zero Point, and the Absolute Zero Point);
- Clause 4.16.9 requires the ERA to review its BRCP WEM Procedure at least every five years.

Amendments to the WEM Rules, following the outcomes of the RCM Review, have consolidated the BRCP WEM Procedure Review activities into section 4.16, including requiring the ERA to review the BRCP methodology if the benchmark reference technology changes.

Transitional pricing arrangements were implemented for existing Facilities in the 2019 RCP review, with cap and floor applied to the Facilities' RCP. The transitional cap and floor are adjusted to inflation every year, based on the forecasts of the Reserve Bank of Australia.

### Proposal 6

*Include a review of the RCP curves in the Coordinator's regular review of the BRCP reference technology*

Submissions generally opposed the proposal.

Although submissions recognised the relevance of linking RCP review to the BRCP reference technology review, some were concerned that constantly changing the RCP curves would create more uncertainty and variability in the future and increase the risk premiums, thus disincentivising investment.

One submission proposed offering a ten-year fixed Certified Reserve Capacity (CRC) price to Semi-Scheduled Generators to offset the risk of uncertainty brought by the RCP changing.

In response to the concerns, EPWA now considers that the RCP curves should not be reviewed every time the Coordinator reviews the BRCP reference technology, but that a review of the RCP curves should still be aligned with that review.

### Proposal 7

*Adjust existing transitional pricing arrangements to include a look-back adjustment for actual inflation*

*There will be no new transitional arrangements for existing facilities not already subject to transitional pricing arrangements*

Almost all submissions expressed support for both parts of this proposal.

One submission noted that, based on the timeframe for AEMO's determination of the Transitional Ceiling Price, the look-back will likely need to refer to the two previous Reserve Capacity cycles. EPWA agrees.

One submission supported the look-back adjustment but considered that there should be additional transitional pricing arrangements for existing Facilities, expressing concern that their exclusion would dampen investment signals. EPWA considers that other changes to the capacity pricing regime provide sufficient mitigation for this concern, especially as the proposals introduce a higher price floor.

### Review Outcome 3

The Coordinator will review the RCP curves every six years, with timing aligned to a review of the BRCP reference technology.

Existing transitional pricing arrangements will be amended to include a look-back adjustment that corrects for differences between forecast inflation and actual inflation.

There will be no new transitional arrangements for existing Facilities not already subject to transitional pricing arrangements.

## 2.2 Ten-year Reserve Capacity Price guarantee for new technologies

Initiative 2 of the WIC Review aims to develop a policy that provides a ten-year period of fixed RCP for proponents of new flexible technologies, such as long-duration storage. A fixed long-term pricing scheme is expected to incentivise investment in these technologies and allow more renewable energy to connect.

The WIC Review considered:

- Which “new” technologies should be eligible for a ten-year RCP guarantee; and
- What does “long duration” storage mean in the application of this initiative and should the definition of this change over time.

EPWA has also considered the interaction between Proposal 5.1 and Proposal 8, as these were presented in the Consultation Paper

### Proposal 5.1

*Allow any new facility that provides Flexible Capacity to receive (on request) a fixed RCP for ten years*

Submissions were generally supportive of the proposal, but some questions have emerged regarding how this proposal interacts with Proposal 8.

To address these questions, EPWA has reviewed the interaction between these proposals and the rationale for each proposal. EPWA agrees that if Proposal 5.1 is implemented, as stated in the Consultation Paper, it would diminish the incentive for long duration storage (as allowed for in Proposal 8), as any Facility meeting the Flexible Capacity requirements would be eligible for a ten-year price guarantee. This is because Facilities eligible for the ten-year price guarantee under Proposal 8, as outlined in the Consultation Paper, should be able to meet the Flexible Capacity requirements. This was not the intent.

EPWA has, therefore, re-examined the rationale for Proposal 5.1. The proposal is retained, but its application narrowed to address the concern it was aimed at addressing. While shortfalls in Peak Capacity are currently projected for the SWIS, shortfalls in Flexible Capacity are not likely in the short to medium term. Concerns have been raised that, as more renewable generation and storage enter the SWIS and coal plant retires, the need for additional Flexible Capacity in Capability Class 1 will emerge. A ten-year fixed RCP for Flexible Capacity in Capability Class 1 increases revenue certainty for investors, in this type of capacity. It will provide a signal for investment if there is a shortfall of Peak Capacity even if there is no shortfall in Flexible Capacity.

### Proposal 8

*Allow any new facility that provides Flexible Capacity using a renewable energy source to receive (on request) a fixed RCP for ten years*

*Require facilities capable of running on fossil fuels and seeking the ten-year fixed price to provide in each Reserve Capacity Cycle evidence of 100% renewable fuel supply*

Submissions were generally supportive of the proposal, with some suggestions, and several requests for clarification.

One submission recommended setting the ten-year price guarantee as a price floor rather than a cap. EPWA considers that it would not be fair to consumers to protect 100% of downside RCP risk for capacity providers while allowing them to receive the benefits of increases in the RCP.

One submission proposed that the ten-year fixed price be made available for all renewable energy sources and not just for Flexible Capacity suppliers. Another submission proposed that it should be available for all Flexible Capacity providers, not just those with renewable sources.

To address stakeholder comments and to differentiate this proposal from the outcome regarding Proposal 5.1, as outlined above, EPWA considers that this opportunity should be extended to all Facilities using renewable sources in Capability Class 1 and Capability Class 2. There will be no requirement for these Facilities to also provide Flexible Capacity, unless they choose to do so.

One submission recommended that an agreed quantity of renewable fuel be used as basis for the fixed RCP, with an allowance for some fossil fuel where generation is above agreed threshold. EPWA considers that this would defeat the purpose of the policy, which is to encourage renewable generation technologies.

One submission considered that it is counterintuitive for a new flexible firming service to be required to be renewable, as flexible firming is needed to maintain grid reliability. The submitter suggested a neutral approach in charging flexible / firming capacity, with a similar design to the Capacity Investment Scheme for dispatchable generation, and not require an agreement with a renewable facility. EPWA notes that non-renewable source facilities are still entitled to request a five-year fixed price period, and that this policy is explicitly about encouraging new renewables. EPWA also notes that the outcome regarding Proposal 5.1, as outlined above, would address the considerations in this submission.

One submission asked about the interaction of Proposal 5.1 and Proposal 8, seeking clarification on whether ESRs need to show that they have energy purchase agreements in place with a renewable energy producer in order to qualify for a ten-year fixed price. EPWA confirms that ESR proponents will be required to demonstrate that they have a renewable energy source in order to qualify for a ten-year fixed price under this proposal. This can be achieved by co-locating the ESR with a renewable energy source, or by having an energy purchase agreement with a renewable energy producer, sufficient to meet the ESR Reserve Capacity obligations.

EPWA notes that a new Facility with multiple components receiving Capacity Credits for the first time in the same Capacity Cycle must have the same pricing treatment for all components. Either:

- All components will receive a fixed RCP for ten years;
- All components will receive a fixed RCP for five years;
- All components will receive the floating RCP.

This means that if, for example, a facility meets the requirement to have a renewable energy source by co-locating the ESR with a sufficiently sized renewable generator, the price for the renewable generation component will also be fixed for ten years, not just the ESR component.

Submissions also asked for clarification on:

- Implications if a proponent is unable to provide evidence of 100% renewable fuel supply.  
The proponent would be ineligible for ten-year fixed RCP, but could still apply for a five-year fixed RCP. If a Facility had renewable supply in a previous year but was unable to source it in a subsequent year, its fixed price period would revert to five years. If that five-year period was already over, it would receive the floating RCP.
- Information on how the fixed RCP will be determined over the ten-year period for a Facility.

The price will be set at the prevailing floating RCP in the first year of the period, and be fixed for the remaining nine years with annual adjustments accounting for changes in the Consumer Price Index.

- The definition of ‘renewable fuel’, with one suggestion to link the definition to the National Greenhouse and Energy Reporting Scheme (NGERS) or the *Renewable Energy (Electricity) Act 2000*<sup>9</sup> to avoid disputes.

EPWA agrees, and will ensure that the WEM Rules reference the definition in the *Renewable Energy (Electricity) Act 2000*.

## Proposal 9

*Require a Facility requesting the ten-year fixed RCP to provide evidence that it can provide firm output for at least 120% of the prevailing ESR Duration Requirement*

Submissions generally supported this proposal, but several questioned the rationale for a threshold of 120%.

One submission considered that the 120% threshold may not represent long-term value to consumers where the duration requirement changes by more than 120% over the ten-year period. The submission recommended an ESR Duration forecast that may yield an alternative percentage threshold, to reflect system needs more clearly. Another submission questioned the need for a buffer if capacity is being certified on the basis of 100% of the requirement.

EPWA agrees that the threshold should depend on the forecast needs of the power system, and will now relate the requirement to the largest ESR Duration Requirement forecast in the Electricity Statement of Opportunities (ESOO) for that year. That is, the ES00 will project the expected ESR Duration Requirement over the next ten years, and any eligible ESR project requesting the ten-year fixed RCP will need to demonstrate that it can provide firm output for at least that duration.

Some submissions questioned whether the policy would see much uptake. One submission considered that the approach would apply to very few projects due to the current economics of long-term storage. Another noted that the proposal did not address a wider issue that the Capacity Credits assigned to an ESR will decrease when the duration requirement increases. EPWA considers that the purpose of this policy is to encourage new technologies, and that other policies in this package provide additional support for existing technology.

EPWA confirms that ESR proponents will *not* be required to demonstrate that they have renewable energy source in order to qualify for a ten-year fixed price under this proposal.

## Proposal 10

*Group longer duration ESR facilities requesting a ten-year fixed RCP together with proposed floating RCP facilities for NAQ purposes*

Submissions were generally supportive of the proposal but asked for a variety of clarifications, such as:

- Whether the proposal applies only to ESR or to all facilities requesting a ten-year guarantee;
- Whether committed facilities requesting a ten-year fixed price could be prioritised with floating price committed facilities;
- How the ten-year price guarantee would interact in the NAQ with arrangements for five-year fixed RCP facilities;

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<sup>9</sup> [Federal Register of Legislation - Renewable Energy \(Electricity\) Act 2000](#)

- Whether new facilities could request a combination of fixed and floating prices for Peak and Flexible Capacity, and how that would impact the NAQ prioritisation;

One submission that opposed the proposal considered that it would create an incentive for generators to withhold capacity from entry leading to a shortfall, and suggested that new facilities could be allowed to apply for a ten-year fixed price within three years of commissioning.

On working through these clarifications, and considering the rule and implementation implications, EPWA has revised its view on the approach to NAQ prioritisation. It has concluded that the ten-year fixed RCP facilities will be grouped with five-year fixed RCP facilities, not with floating RCP facilities. This will retain the Facility priorities in the current NAQ, in which facilities prepared to accept a changing price are preferred to those which are not, thus mitigating costs increases to consumers.

#### **Review Outcome 4**

1. New providers of Flexible Capacity in Capability Class 1 will be allowed to request a ten-year fixed RCP, but this must be requested in the first year the facility receives *any* Capacity Credits. An existing facility that already holds Peak Capacity Credits (whether fixed price or not) before applying for Flexible Capacity Credits will not be eligible for a fixed RCP for Flexible Capacity.
2. Any new facility in Capability Class 1 or Capability Class 2 using a renewable energy source may request a fixed RCP for ten years. A Facility capable of using non-renewable sources and seeking the ten-year fixed RCP must provide evidence of 100% renewable fuel source in each Reserve Capacity Cycle.
3. An ESR Facility requesting a ten-year fixed RCP must provide evidence that it can provide firm output at its Peak Certified Reserve Capacity for the longest forecast ESR Duration Requirement over the ten-year horizon in the ESOO published in the Reserve Capacity Cycle in which it requested the fixed RCP.

Facilities may only request a fixed RCP in the first year that they are awarded Capacity Credits, and the fixed RCP will apply to all facility components receiving Capacity Credits for the first time.

If it is eligible for the ten-year price guarantee under one or more of the above requirements:

- A Facility providing both Peak Capacity and Flexible Capacity would receive a fixed RCP for both products; and
- A Facility providing Peak Capacity only would receive a fixed RCP for Peak Capacity only. If it seeks Flexible Capacity Credits in a later Reserve Capacity Cycle, it will receive the floating Flexible RCP.

Facilities requesting a ten-year fixed RCP will be grouped with Facilities requesting a five-year fixed RCP.

# Appendices

## Appendix A. Responses to the Consultation Paper

Stakeholder	Stakeholder Feedback	EPWA's Response
<b>Proposal 1:</b>		
Set the Peak RCP to 100% of the Peak BRCP if the number of Peak Capacity Credits issued equals the Peak RCT		
The following stakeholders indicated that they 'support' or generally support the proposal:		
	<ul style="list-style-type: none"> <li>Australian Energy Market Operator (AEMO)</li> <li>Australian Energy Council (AEC) Chamber of Minerals and Energy (CME)</li> <li>Expert Consumer Panel (ECP)</li> <li>Perth Energy</li> <li>Shell</li> </ul>	<ul style="list-style-type: none"> <li>Synergy</li> <li>Tesla</li> </ul>
Bluewaters	Bluewaters does not support the proposal in principle. However, if it progresses, Bluewaters suggests to consider reviewing the ESR-based BRCP periodically to assess the use of a new technology at a lower BRCP	The regular Coordinator's review of the Benchmark Capacity Providers process provides for a change if a cheaper technology is identified
Enel X	Enel X does not support the proposed curve and considers that it only creates values in times of shortfall. Enel X suggests that the proposed curve be able to provide value in a range of circumstances.	In the presence of excess capacity the proposed curve balances certainty for investors with costs to consumers.
ECP	The ECP strongly supports the proposal.	Noted.
CME	The CME broadly supports the alignment of the new RCP curve to align the WEM with other jurisdictions and set RCP to equal BRCP when the RCT is met	Noted.
Summit Southern Cross	Summit Southern Cross has not provided specific feedback. It noted that changes in benchmark technology will impact new investment in the WEM by an order of magnitude more than any tweaking of the RCP curve.	Noted.

**Proposal 2:****Set the Peak RCP to 100% of the Peak BRCP when the number of Peak Capacity Credits provided is between 95% and 105% of the Peak RCP**

The following stakeholders indicated that they 'support' or generally support the proposal:

- AEMO
- Alinta Energy
- AEC
- CME
- Merredin Energy
- Perth Energy
- Shell
- Synergy
- Tesla

Bluewaters	Bluewaters does not support the proposal in principle. However, if it progresses, Bluewaters suggests considering a more thorough economic analysis to be undertaken based on the >2000MW of proposed or committed ESR (and associated costs) in conjunction with the gigawatts of proposed wind generation across the SWIS.	The Coordinator's review of the Benchmark Capacity Providers analysed the profitability of ESR, wind, and other technologies. The proposed RCP curve was considered in light of that review.
Enel X	Enel X does not support the proposed curve and considers that it only creates values in times of shortfall. Enel X recommends setting a deadband where RCP is at 130% of BRCP of the range, or reducing the maximum Peak RCP and returning a higher Peak RCP when Peak Capacity Credits allocated are close to the RCT.	As the need for a reserve margin is already considered in setting the RCT, setting a price higher than the BRCP would incentivise excess capacity and would result in unnecessary cost to consumers.
ECP	The ECP supports having a deadband but suggests that it begins at 100% of the RCT so that any shortfall in capacity below the RCT increase the RCP towards the RCP cap sooner. The ECP also recommends a deadband that is relative to the size of the largest generator.	The deadband provides certainty for investors below the RCT, so a symmetric deadband around the RCT is protects the interests of consumers. A percentage based deadband range is more appropriate than using a single generator, as the goal is to reduce volatility in the RCP and multiple small capacity projects can add up to more than the largest generator on the power system.
Shell	Shell supports the proposal with the suggestion to consider the need to shift the deadband region, matching the changes at Proposal 1, to allow for flexibility. Shell also notes that the deadband region should be set around the BRCP.	

**Proposal 3:****Set a maximum Peak RCP at 150% of the Peak BRCP, when the number of Peak Capacity Credits issued is 85% of the Peak RCT.**

The following stakeholders indicated that they 'support' or generally support the proposal:

- AEMO
- AEC
- Perth Energy
- Shell
- Synergy
- Tesla

AEMO	AEMO supports the intent of the proposal and notes that location is a critical factor to be considered, as well as the interaction with location.	Capacity location is currently incentivised through the NAQ regime. In the absence of locational energy pricing, EPWA is not considering locational capacity products.
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Bluewaters	Bluewaters does not support the proposal in principle. However if this progresses, Bluewaters suggests considering a more thorough economic analysis be undertaken based on the >2000MW of proposed or committed ESR in conjunction with the GW's of proposed wind generation across the SWIS.	See response to the comments regarding Proposal 2 above.
ECP	The ECP supports the proposal in principle but notes the following: <ul style="list-style-type: none"> <li>The 150% multiplier may not be set at appropriate needs-based level which, depending on a combination of factors, is likely to result in very high RCPs in the near term if there continues to be a forecast shortage of capacity;</li> <li>Incentive for new capacity during shortfall may be too slow to avoid reliance on NCESS; and</li> <li>It may not be necessary for rate of incentivisation during undersupply to symmetrically match the rate of disincentivisation in oversupply.</li> </ul>	EPWA considers that it is reasonable to have an RCP cap in line with other markets internationally. EPWA will continue to examine potential mechanisms to provide a more timely price signal regarding potential shortfalls.

**Proposal 4:**

Set a minimum Peak RCP at 50% of the Peak BRCP, when the number of Peak Capacity Credits provided is greater than or equal to 115% of the Peak RCT.

The following stakeholders indicated that they 'support' or generally support the proposal:

- |  |   |   |
|--|---|---|
| <ul style="list-style-type: none"> <li>Alinta Energy</li> <li>AEC</li> <li>Enel X</li> </ul> | <ul style="list-style-type: none"> <li>Merredin Energy</li> <li>Shell</li> <li>Synergy</li> </ul> | <ul style="list-style-type: none"> <li>Tesla</li> </ul> |
|--|---|---|

AEMO	AEMO considers that stakeholders are best placed to advise on the frequency of recalculating, as well as the method in determining the RCP floor price. AEMO, however, suggests a non-zero price floor, less frequent price floor recalculation, and a symmetrical floor price and price cap arrangement are likely to provide greater investment certainty.	Noted.
AEC	The AEC supports the proposal and notes that customers may be incurring unnecessary cost at the price floor. In addition, during periods of significant excess capacity when there is an oversupply and the RCP has hit the price floor, AEMO should be stop investment in DSM.	<p>A price floor set significantly below the BRCP will disincentivise new entry, while reducing potential volatility for existing capacity.</p> <p>Demand response is an important part of ensuring supply adequacy. Changes to demand response requirements for DSPs made in the RCM Review and the DSR Review will mitigate the potential for payments to parties that do not contribute to system reliability.</p>

Bluewaters	<p>Bluewaters does not support the proposal and considers the following:</p> <ul style="list-style-type: none"> <li>• An RCP price floor of zero will dampen investment signals;</li> <li>• A fixed-term RCP based on project type (e.g., firmed/baseload or intermittent) would significantly improve investment certainty, especially if the project is funded by project-structured finance;</li> <li>• The BRCP will likely change significantly over time and dampen investment signals;</li> <li>• A non-zero floor should allow for principal repayments, interest payments, or be symmetrical with the RCP cap. If the proposal progresses, Bluewater suggests to set the RCP floor based on debt-servicing costs.</li> </ul>	<p>EPWA agrees that an RCP price floor of zero will dampen investment signals and therefore has proposed to set an RCP price floor at 50% of the Peak BRCP. The level of the floor can be reconsidered in the next review if it is found to drive significant excess capacity.</p>
CME	<p>The CME states that this could over-incentivise additional capacity when it is not required, and thus increasing costs to end consumers.</p>	<p>A price floor set significantly below the BRCP will disincentivise new entry, and lead to potential price volatility for existing capacity providers.</p>
Enel X	<p>Enel X supports the proposal and considers the floor would provide certainty to potential investors as it would address the worst-case scenario of no Capacity Credits. Enel X considers this will have a more powerful effect on incentivising investment than the possibility of a high return in rare circumstances.</p>	
ECP	<p>The ECP does not support a non-zero RCP floor for new capacity, as it is not in the interest of consumers to fund capacity during significant excess. There must be a limit set on the amount of excess capacity that consumers will pay for. As an alternative, the ECP suggests implementing a price floor of 50% of BRCP for existing capacity that has excesses from 115% to 130% in order to cover the principal and interest payments.</p>	<p>A price floor set significantly below the BRCP will disincentivise new entry, and lead to price volatility for existing capacity providers.</p>
Merredin Energy	<p>Merredin Energy supports the proposal and considers that it should also apply to transitional facilities to protect them against short-term variability in the floor price caused by the decrease in the reference technology cost . It also suggests the following:</p> <ul style="list-style-type: none"> <li>• An absolute floor price, escalated by CPI, that is in effect for no less than five years from either when a new entrant first becomes eligible for reserve capacity payments, or from when a traditional facility is no longer covered by transitional arrangements; and</li> <li>• The price floor should not necessarily be symmetrical with the cap. Instead, it should consider changes in WACC, debt cost, and CAPEX/OPEX costs.</li> </ul>	<p>New proponents seeking additional price certainty can already request fixed price for five years. Other proposals in this paper will extend that to ten years for eligible projects.</p> <p>The level of the price floor can be reconsidered in the next review if it is found to drive significant excess capacity.</p>

Perth Energy	Perth Energy does not support the steep drop in the RCP in the case of excess capacity because there is no need to disincentivise it as excesses capacity provides higher levels of reliability. There are also economic consequences of low RCP especially for investors that can't respond or hedge against capacity prices. Moreover, there is a risk of overcapacity through government actions. The price floor should be linked to the RCP, and no other recalculation method should be considered due to the uncertainty it produces.	The RCT is set based on the level of reliability specified in the WEM Rules. By design, SWIS consumers do not require higher levels of reliability.  Proponents seeking additional price certainty can already request a fixed RCP for five years. Other proposals in this paper will extend that to ten years for eligible projects.
Shell	Shell supports the proposal in principle, noting that it is appropriate to have a higher RCP floor than other interconnected markets due to the isolated nature of the SWIS.	Noted.
Synergy	Synergy supports the proposal at a high level. Synergy notes the importance of balancing customer cost and consumer value. Furthermore, DSPs should be excluded from capacity payments if there is a significant surplus of capacity and the minimum RCP binds.	Demand response is an important part of ensuring supply adequacy. Changes to demand response requirements for DSPs made in the RCM Review and the DSR Review will mitigate the potential for payments to parties that do not contribute to system reliability.
Tesla	Tesla supports the proposals but suggests that the 50% Price Floor be reviewed in 3-5 years as the projected BRCP may likely reduce by then.	The level of the price floor can be reconsidered in the next review.
<b>Proposal 5.1:</b>		
Allow any new facility that provides Flexible Capacity to receive (on request) a fixed RCP for ten years.		
The following stakeholders indicated that they 'support' or generally support the proposal:		
<ul style="list-style-type: none"> <li>• AEMO</li> <li>• Enel X</li> <li>• ECP</li> <li>• Perth Energy</li> <li>• Shell</li> <li>• Synergy</li> <li>• Tesla</li> </ul>		
Synergy	Synergy supports the proposal, but seeks clarification on the interactions of Proposal 5.1 and Initiative 2, specifically whether ESR needs to be backed by renewables via a Power Purchase Agreement (PPA)	See comments on Proposal 8.1 below and in section 2.2. of this paper.

**Proposal 5.2:**

**Set a maximum Flexible RCP at 160% of the Flexible BRCP, when the number of Flexible Capacity Credits issued is 85% of the Flexible RCT.**

The following stakeholders indicated that they 'support' or generally support the proposal:

- AEMO
- Perth Energy
- Shell
- Synergy
- Tesla

Bluewaters	<p>Bluewaters does not support the proposal as there would be a higher RCP cap for Flexible Capacity than Peak Capacity. However, if the proposal progresses, Bluewaters recommends that the Flexible Capacity should receive a higher RCP cap, set for ten years via negotiation, than the RCP for Peak Capacity in order to stimulate required investment to close the current and future shortfalls in supply.</p> <p>Bluewaters does not support a deadband or a price floor for the Flexible RCP as it adds unnecessary complexity to an already overly complex model given the relatively small size of the WEM.</p>	<p>Flexible capacity proponents for facilities meeting the requirements of Capability Class 1 seeking additional price certainty can request a fixed RCP for ten years.</p> <p>EPWA agrees with respect to the need for a deadband for the Flexible Capacity RCP, but considers that a price floor for Flexible Capacity helps to protect investors against downside risks, just as the price cap protects consumers against unnecessarily high costs if there is a capacity shortfall.</p>
Merredin Energy	<p>Merredin Energy does not have specific concerns regarding the parameters of the Flexible RCP curve. However, it considers that all requirements for Flexible Capacity should be defined in full and provided for consultation.</p> <p>Merredin Energy raises a concern that the proposed WIC Review amendments would likely result in their diesel-powered generators being no longer eligible for RCP from 2030. Merredin Energy states that it might be premature to implement the regime as there is still insufficient supply of lower carbon fuels in Australia.</p>	<p>The RCM review provided for Flexible Capacity eligibility requirements to be consulted on.</p> <p>The treatment of high emission technologies is outside the scope of this consultation.</p>
Perth Energy	<p>Perth Energy supports a higher RCP for Flexible Capacity in recognition that this is a more demanding role which may require additional capital investment. Perth Energy recommends a deadband.</p>	

<b>Proposal 5.3:</b> <b>Set the Flexible RCP to 100% of the Flexible BRCP when the number of Flexible Capacity Credits issued is 100% of the Flexible RCT</b>		
The following stakeholders indicated that they 'support' or generally support the proposal: <ul style="list-style-type: none"> <li>• AEMO</li> <li>• Synergy</li> <li>• Tesla</li> </ul>		
Shell	Shell suggests considering having the Flexible RCP set higher than 100% of the relevant BRCP to send a signal that investment is still required.	The RCT is defined to be the point at which investment is <i>not</i> required, and thus setting a price higher than the BRCP at the RCT would incentivise excess capacity.
<b>Proposal 5.4:</b> <b>Set the minimum Flexible RCP on the same basis as the Peak RCP</b>		
The following stakeholders indicated that they 'support' or generally support the proposal: <ul style="list-style-type: none"> <li>• AEMO</li> <li>• Shell</li> <li>• Synergy</li> <li>• Tesla</li> </ul>		
ECP	ECP recommends that new capacity should have a zero floor, while a non-zero floor may be reasonable for existing capacity. See comments on Proposal 4.	Differential floor pricing treatment for incumbents vs new entrants is not appropriate in the absence of transitional arrangements for existing facilities, commissioned post 2019, which provide for a lower price cap than for new entrants.
Perth Energy	Perth Energy considers that Flexible Capacity should receive a higher RCP curve than Peak Capacity, noting that WEM will experience a shortage of both Peak and Flexible Capacity. The proposed curve could encourage new Peak Capacity while encouraging withdrawal of Flexible Capacity.	In case of equal shortage of both products, the Flexible RCP will be higher than the Peak RCP. If there is a shortage of Peak Capacity but no shortage of Flexible Capacity, the Flexible RCP could drop to the floor. In this case new Peak Capacity build without Flexible Capacity would be appropriate.
<b>Proposal 6:</b> <b>Include a review of the RCP curves in the Coordinator's regular review of the BRCP reference technology</b>		
The following stakeholders indicated that they 'support' or generally support the proposal: <ul style="list-style-type: none"> <li>• AEMO</li> <li>• ECP</li> <li>• Shell</li> <li>• Synergy</li> </ul>		
Alinta Energy	Alinta Energy opposes the proposal as it creates a perceived risk of arbitrary changes. Alinta Energy notes that ad-hoc reviews may be implemented at any time if the proposed RCP curves causes unintended consequences.	In response to the concerns, EPWA agrees that the RCP curves should not be reviewed every time the Coordinator reviews the BRCP reference

Bluewaters	Bluewaters does not support the proposal in principle. However, if it were to progress, Bluewaters suggests that the RCP curves should be considered in conjunction with a review of the BRCP reference technology to ensure accurate pricing and technological relevance.	technology. A review of the RCP curves should still be aligned with that review.
Merredin Energy	Merredin Energy considers that introducing more variability into the RCP calculations could result in materially lower pricing in the future. Moreover, it could stifle investment in Reserve Capacity.	
Perth Energy	Perth Energy does not favour the proposed review as applying this to existing Facilities creates more uncertainty and raised risk premium. However, if a review must be undertaken, Perth Energy considers it is appropriate to link it to the BRCP reference technology review.	
Tesla	Tesla does not support this proposal because introducing regular adjustments to a curve meant to incentivise long-term certainty will fail to deliver its purpose. Significant variability is already expected in the BRCP and, thus, this proposal would only add on another layer of complexity and volatility.	
Summit Southern Cross	Summit Southern Cross raises that the proposal will only incentivise BESS, unless other new technologies can be delivered for the same cost as a 4-hour BESS. The high adoption of the guarantee could crash the RCP and make it harder for new capacity entry in subsequent years. Summit Southern Cross suggests that the ten-year price guarantee should only apply to new facilities. Otherwise, existing fossil fuel facilities that migrate to use renewable fuels will receive windfall gains. Summit Southern Cross also recommends offering a ten-year Capacity Credit price guarantee based on a competitive tender as an alternative way to bring new technologies.	Battery Storage is currently the lowest cost new entrant capacity provider. The reference technology will be reviewed in three years' time. EPWA confirms that the ten-year guarantee will only apply to new Facilities. Flexible Capacity proponents with facilities which meet the requirements of Capability Class 1 seeking additional price certainty can request a fixed RCP for ten years.
<b>Proposal 7.1:</b>		
Adjust existing transitional pricing arrangements to include a look-back adjustment for actual inflation		
The following stakeholders indicated that they 'support' or generally support the proposal:		
<ul style="list-style-type: none"> <li>• AEMO</li> <li>• AEC</li> <li>• Bluewaters</li> <li>• ECP</li> <li>• Merredin Energy</li> <li>• Perth Energy</li> <li>• Shell</li> <li>• Synergy</li> <li>• Tesla</li> </ul>		
AEMO	AEMO is supportive of the formulation of the look-back adjustment under the assumption that EPWA will specify the data source to be used for the actuals.	Noted and agreed.

	AEMO considers a 2-year look-back will likely be required based on timings for AEMO's determination of the Transitional Price Ceiling.	
Bluewaters	Bluewaters supports the proposal, noting that symmetrical 'true up' mechanisms are a standard feature of economic regulation.	Noted.
<b>Proposal 7.2:</b>		
There will be no new transitional arrangements for existing facilities not already subject to transitional pricing arrangements		
The following stakeholders indicated that they 'support' or generally support the proposal:		
	<ul style="list-style-type: none"> <li>• AEMO</li> <li>• AEC</li> <li>• ECP</li> </ul>	<ul style="list-style-type: none"> <li>• Merredin Energy</li> <li>• Perth Energy</li> <li>• Shell</li> </ul>
	<ul style="list-style-type: none"> <li>• Synergy</li> <li>• Tesla</li> </ul>	
Bluewaters	Bluewaters does not support the proposal, noting that absence of effective 'true up' mechanisms will dampen investment signals.	Other changes to capacity pricing provide sufficient mitigation for this concern, especially as the proposals introduce a higher price floor.
Merredin Energy	Merredin Energy supports the proposal but emphasises the critical role of an appropriate floor price in ensuring adequate investment.	Noted.
Perth Energy	Perth Energy supports the proposal as it considers that new transitional arrangements are not necessary at present. Perth Energy considers that they may be required in the future if significant further RCP changes are made.	Noted.
<b>Proposal 8.1:</b>		
Allow any new facility that provides Flexible Capacity using a renewable energy source to receive (on request) a fixed RCP for ten years		
The following stakeholders indicated that they 'support' or generally support the proposal:		
	<ul style="list-style-type: none"> <li>• ECP</li> <li>• Perth Energy</li> </ul>	<ul style="list-style-type: none"> <li>• Shell</li> <li>• Synergy</li> </ul>
		<ul style="list-style-type: none"> <li>• Tesla</li> </ul>
AEMO	AEMO suggests allowing the ten-year fixed price as a minimum price guarantee, rather than a cap. This would allow the recipient to still benefit in the event that the RCP increases above the fixed level over time.	It would not be fair to consumers to protect 100% of downside capacity price risk for capacity providers while allowing them to receive the benefits of increases in the RCP.
AEC	The AEC considers that it is counterintuitive to require new flexible firming services to be supported by a renewable facility. The AEC suggests taking a neutral approach to how flexible firming services are charged, as is the case in the design of the Capacity Investment Scheme for dispatchable generation, and not require an agreement with a renewable facility.	ESRs will need to have renewable energy supply agreements in place to be eligible for the ten-year fixed price under this proposal. EPWA notes, however, that flexible firming services not supported by a renewable facility can still receive a ten-year fixed price if they are in Capability Class 1

		(proposal 5.1), or are a long duration ESR (proposal 8.3).
CME	The CME requests more information on how the fixed RCP will be determined over the ten-year period for a facility. The CME also raises a concern that the proposal might increase customer costs since storage facilities are allowed to lock in higher prices in expectation of RCP declining over the next decade.	The price will be set at the prevailing floating RCP in the first year of the period, and be fixed for the remaining 9 years, with adjustments for changes in the Consumer Price Index.  The proposal is seeking to balance certainty for investors with costs to customers.
Enel Green Power	Enel Green Power notes that there is no certainty on the price and quantity of Capacity Credit until they are assigned, and the proposed RCP guarantee would reduce the uncertainty to a limited extent.	Noted.
ECP	The ECP supports the proposal if the RCP set is reasonable and opposes it when the RCP is unreasonably high and well above what is necessary to ensure viability of the facilities in question.	The combination of policies is intended to result in a reasonable RCP. The BRCP is set based on the projected cost of the cheapest new entrant capacity provider for this reason.
Merredin Energy	Merredin Energy recommends an agreed quantity of renewable fuel be used as a basis of the ten-year fixed RCP with an allowance for use of fossil fuel to supplement it where the level of generation is above an agreed threshold.	This would defeat the purpose of the policy, which is to encourage new renewable technologies.
Perth Energy	Perth Energy supports the proposal and suggests that the ten-year guarantee be available for all Flexible Capacity.	All new Facilities in Capability Class 1 with Flexible Capacity Credits will be able to request a ten-year fixed price (see section 2.2. of this paper for details).
Synergy	Synergy is generally supportive of the proposal with a few considerations. Synergy seeks to clarify whether the Proposal 8.1 supersedes Proposal 5.1, specifically regarding the requirement to use a renewable energy source. Synergy also recommends that the ten-year guarantee should apply to all clean dispatchable capacity, instead of just Flexible Capacity suppliers.	EPWA agrees that this opportunity should be extended to all renewable facilities in Capability Classes 1 and 2.
Tesla	Tesla supports the proposal and suggests linking the definition of “renewable” to NGERs or the <i>Renewable Energy (Electricity) Act 2000</i> to ensure clarity.	The WEM Rules will reference the definition in the <i>Renewable Energy (Electricity) Act 2000</i> .

**Proposal 8.2:**

**Require facilities capable of running on fossil fuels and seeking the ten-year fixed price to provide in each Reserve Capacity Cycle evidence of 100% renewable fuel supply**

The following stakeholders indicated that they ‘support’ or generally support the proposal:

- ECP
- Synergy
- Tesla

AEMO	AEMO notes that the eligibility criteria may not be applicable for all renewable energy facilities, renewable-fuelled facilities, or hybrid facilities. Furthermore, AEMO seeks clarification on the implication to the recipient of the ten-year guarantee if it cannot provide evidence of 100% renewable fuel supply.	The proponent would be ineligible for ten-year fixed RCP, but could still apply for a five-year fixed RCP. If a Facility had a renewable source in a previous year but was unable to source it in a subsequent year, its fixed RCP period would revert to five years, and if that period had already expired, it would receive the floating RCP.
ECP	ECP supports the proposal but notes that the definition of “renewable fuel” should be clear to avoid disputes.	The WEM Rules will reference the definition in the <i>Renewable Energy (Electricity) Act 2000</i> .
Summit Southern Cross	Summit Southern Cross states that the proposal is unlikely to be workable and suggests that it is better to allow ESR to charge at appropriate times to support the grid. If a facility runs on fossil fuels, it should demonstrate it only uses renewable fuels and pay refunds when it runs on non-renewable fuels.	ESRs will need to have renewable energy supply arrangements in place to be eligible for the ten-year fixed RCP under this proposal.  Facilities capable of burning either fossil- or renewable fuels (e.g. biogas) that cannot provide evidence of renewable supply can still request a five-year fixed RCP.
Synergy	Synergy is generally supportive of the proposal but seeks clarification on whether ESRs need to be backed by a renewable energy source via PPA.	ESRs will need to have renewable energy supply arrangements in place to be eligible for the ten-year fixed RCP under this proposal. (see section 2.2 for more details).

**Proposal 9:**

**Require a facility requesting the ten-year fixed RCP to provide evidence that it can provide firm output for at least 120% of the prevailing ESR Duration Requirement**

The following stakeholders indicated that they ‘support’ or generally support the proposal:

- ECP
- Synergy
- Tesla

AEMO	AEMO notes that the 120% threshold may not represent long-term value to consumers if the duration requirement were to change by more than 120% over the ten-year period. AEMO also notes that a forecast ESR	EPWA agrees that the threshold should depend on the forecast needs of the power system, and will base the requirement on the largest ESR Duration
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	Duration may offer an alternative to a set percentage threshold, to reflect system needs more clearly. AEMO assumes that the pricing arrangements will have no associated guarantees on the certification of the fixed RCP facilities.	Requirement forecast over the ten year horizon in the ESOO for that year, rather than a fixed percentage threshold.
AEC	The AEC assumes that the proposal means a very few new firming services would meet the criteria given the economics of long-duration storage remains challenging.	The purpose of this policy is to encourage new technologies. Other policies in this package provide additional support for existing technology.
Perth Energy	Perth Energy questions if the proposal is a workable approach since the Capacity Credits assigned to an ESR will decrease when the duration requirement increases. An ESR needs a guarantee of Capacity Credit quantity and price.	The RCM Review amending rules provided for the ESR duration to be fixed for five years following commissioning.
Shell	Shell requests further reasoning to support the proposed additional 20% buffer as currently ESR certification is based only on its ability to deliver firm output for a 4-hour period. Shell recommends considering extending the four-hour duration obligation to five-hour if a buffer is being implemented. Shell also notes that basing the BRCP on a 4-hour ESR places risk on investment signals for other types of capacity.	EPWA agrees that the threshold should depend on the forecast needs of the power system, and will base the requirement on the largest ESR Duration Requirement forecast in the ESOO for that year, rather than a fixed percentage threshold.

**Proposal 10:**  
Longer duration ESR facilities requesting a ten-year fixed RCP together with proposed floating RCP facilities for NAQ purposes

The following stakeholders indicated that they 'support' or generally support the proposal:

- AEMO
- ECP
- Perth Energy
- Tesla

AEMO	AEMO supports the proposal but notes that there are insufficient existing and committed facilities to meet the RCT. AEMO also notes that implementing the ten-year guarantee for new technologies will be more complicated than affecting the changes to the RCP curve, as they will require changes to the automated processes supporting the NAQ Mode. AEMO anticipates that the draft rules will clarify whether a recipient can request a combination of floating RCP and fixed RCP in respect of each of the Flexible Capacity and Peak Capacity products, and how this will work with the transitional pricing arrangements. AEMO recommends further consideration on how the ten-year guarantee will interact with the current five-year fixed Facility RCP (which do not require facilities to be flexible, renewable, or of long-duration).	On working through these clarifications, and considering the rules and implementation implications, EPWA has revised its view on the approach to NAQ prioritisation. The ten-year fixed RCP facilities will be grouped with five-year fixed RCP facilities, not with the floating RCP facilities. This will retain the Facility priorities in the current NAQ, which means that facilities prepared to accept a changing price are preferred to those which are not, with potential savings for consumers. If successful:
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AEC	<p>AEC considers that the proposal may create a genuine risk for new flexible firming services that may not receive Capacity Credit payments in years in which there is no shortfall of supply. The proposal may also create an incentive to withhold entry until there is a shortfall in order to lock-in a high RCP for ten-years.</p> <p>AEC encourages reconsideration of this issue and suggests giving new flexible firming service a window of time in which it can apply for a ten-year RCP guarantee (e.g., two or three capacity cycles)</p>
Shell	<p>Shell requests further reasoning to support the proposal. It recommends considering amendments to the 4-hour duration obligation if there is a requirement for this technology.</p>
Tesla	<p>Tesla supports the proposal and seeks clarification if Committed Facilities that request access to the ten-year fixed RCP would be considered equally with other Committed Floating Priced Facilities. Tesla also asks if the facilities which request the ten-year fix are considered along with the other Committed or Proposed facilities, whether or not they are ESR (as long as they are renewable based). Considers this implementation would then facilitate both Proposal 8 and Proposal 5</p>

- A Facility providing both Peak Capacity and Flexible Capacity would receive a fixed RCP for both products
- A Facility providing Peak Capacity only would receive a RCP for Peak Capacity only. If it seeks Flexible Capacity Credits in a later capacity cycle, it will receive the floating RCP that applies to Flexible Capacity.

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