

SA Power Networks Regulatory Proposal Engagement 2025-30

Focussed conversation – Export Tariffs

Workshop 5 – 12 October 2022



Empowering South Australia

Acknowledgement of Country

'I would like to begin by acknowledging the multiple Traditional Owners of the lands that host the South Australian electricity grid.'

I would also like to pay my respects to Elders past and present and acknowledge that these are living cultures by paying respect to emerging leaders.'



Housekeeping

Diverse group of stakeholders, keen to hear all voices

Hybrid session

- Questions, comments in chat function online
- Raise hand if want to speak ()
- Cameras on preferable (particularly when asking a question)
- Session will be recorded

Parking Bay

- We'll use the chat function to capture 'parked' items

Follow up

- Discussion summary will be circulated post-workshop
- Offline chats welcome (SAPN staff)
- Workshop series scheduled

Stakeholder Invitees

Members of the Tariff Working Group and others:

- SA Power Networks Community Advisory Board + Reset Sub-Committee
- Australian Energy Regulator
- AER's Consumer Challenge Panel (CCP30)
- Essential Services Commission of SA
- Central Irrigation Trust
- Energy & Water Ombudsman SA
- SA Wine Industry Association
- Uniting Care Wesley Bowden
- SA Small Business Commissioner
- Dept. Energy & Mining
- Yates Electrical
- Electric Vehicle Council
- Business SA
- Pangolin Associates
- The Energy Project
- Energyplex
- Smart Energy
- Sun Energy

SA Power Networks staff presenting and listening:

- Jessica Vonthethoff – Executive General Manager Customer & Community / Chair – Tariff Working Group
 - Helen White – Manager Revenue & Pricing
 - James Bennett – Manager Regulation
 - Bryn Williams – Network Strategy Manager
-
- Richard Sibly – Head of Regulation
 - Dan Popping – Head of Stakeholder Engagement
 - Joe Caruso – Major Customer Manager
 - Alex Lewis – Reset Engagement Manager
 - Adam Neill – Billing Compliance Lead
 - Amanda Hudson – Customer Consultation Lead

Overview – Focussed Conversation

- | | |
|-----------------|--|
| 9.30am-9.40am | Welcome and Introduction <ul style="list-style-type: none">• Welcome• Overview: Workshops 5-8 |
| 9.40am-10.30am | INFORM – AEMC Access & Pricing Rule Change <ul style="list-style-type: none">• How did the rule change come about?• What is the rule change?• When is it effective?• How does this change what SA Power Networks is doing? |
| 10.30am-11:20am | INFORM – AER Export Tariff Guidelines <ul style="list-style-type: none">• Development• Background• Structure• Stakeholder Engagement• Application of Network Pricing Objective and Network Pricing Principles• Generation categories |
| 11.20am-11:30am | Wrap Up <ul style="list-style-type: none">• Final questions, comments?• Next steps, close |

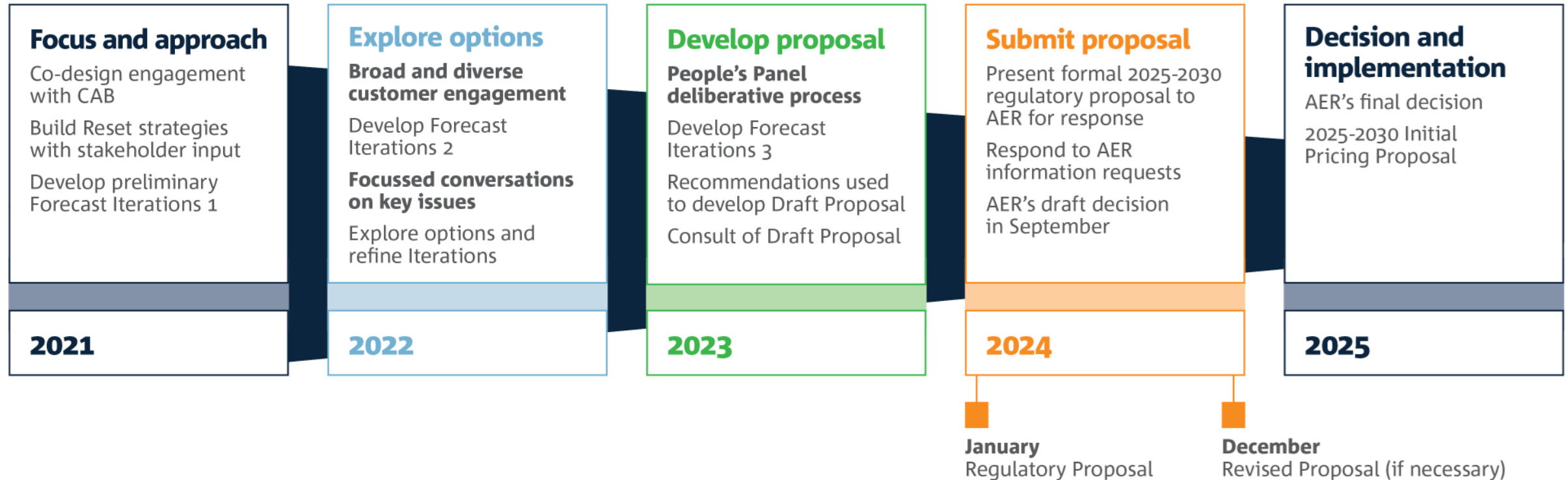
Recap - Reset



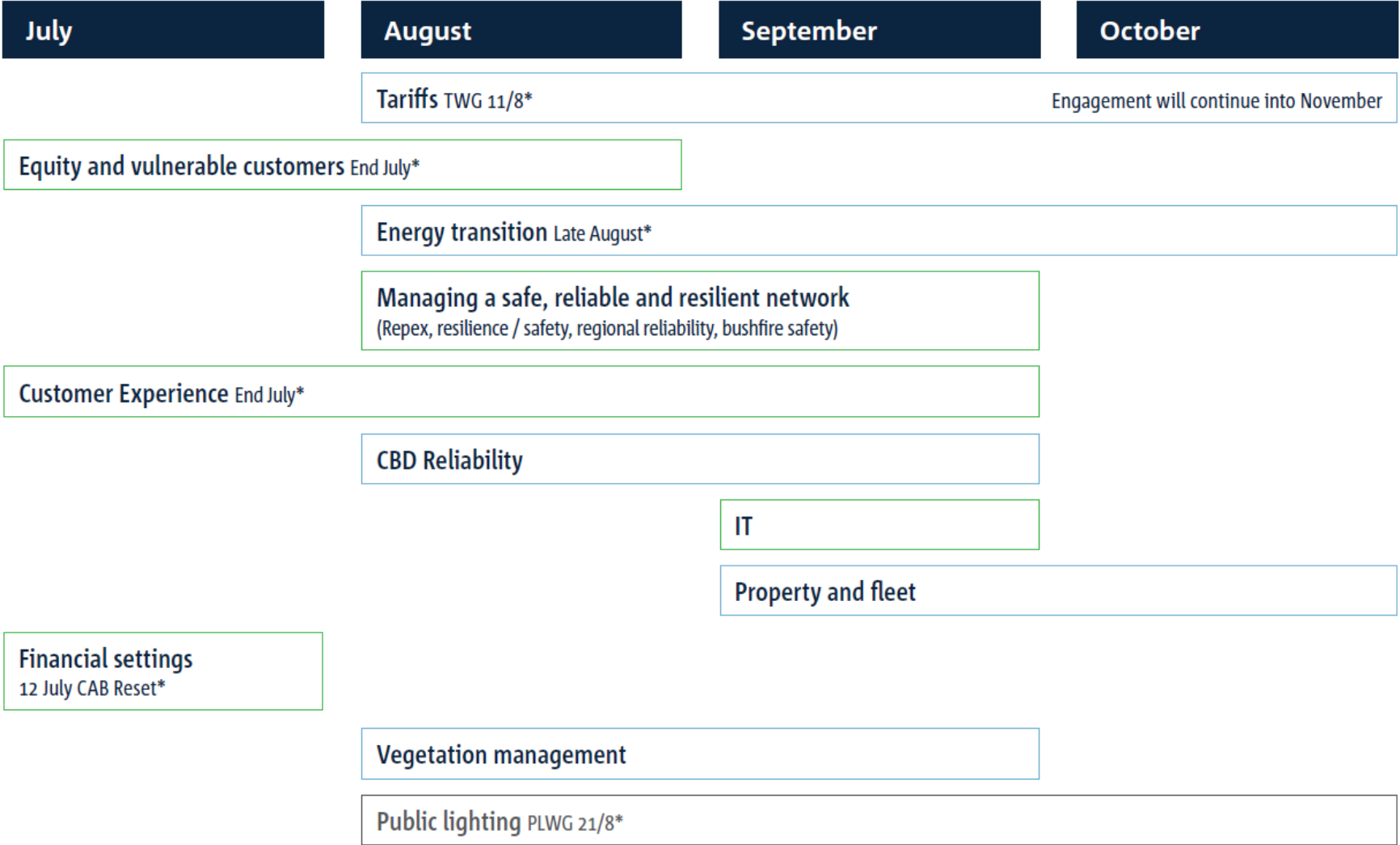
The Price Reset process

As a monopoly service provider, our prices are approved by an independent regulator

In building our **Regulatory Proposal** and **Tariff Structure Statement** we engage deeply with customers and the community



Focussed Conversations timeframe



* Engagement start date

2025-2030 Reset Engagement: Background

Five year regulatory period

Customer and Stakeholder Engagement

Revenue Determination (RD)

Approved by the Australian Energy Regulator (AER)
Adjusted annually for CPI, Incentive Schemes and Cost of Debt
Overall amount of revenue SAPN can recover from customers

Tariff Structure Statement (TSS)

Describes the tariff classes and structures, policies and procedures for assigning customers to tariffs, tariff charging parameters, and how the revenue will be recovered

Annual Pricing Proposal (APP)

Details the proposed prices for the agreed tariff structures to take effect at the commencement of each regulatory year - 1 July

Year 1

Year 2

Year 3

Year 4

Year 5

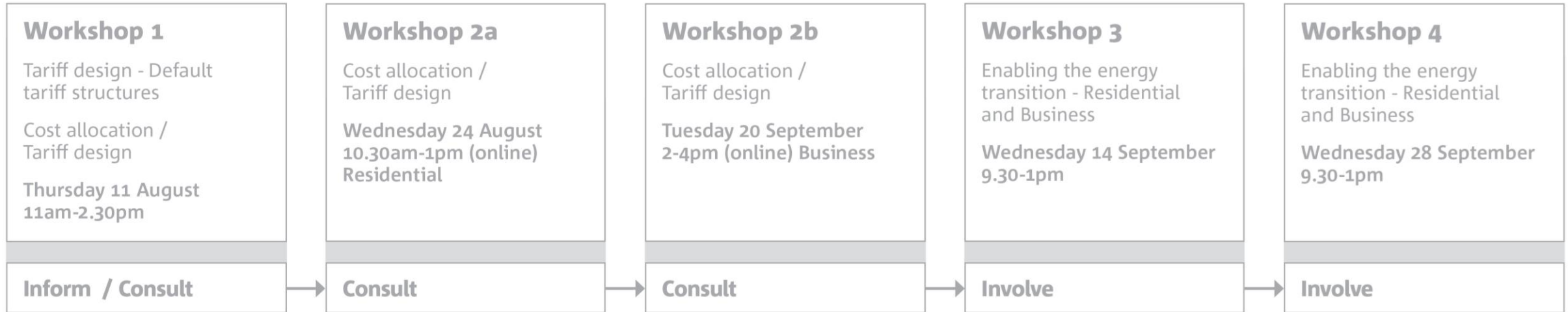
Today's Focussed Conversation



Purpose: Today's Focussed Conversation

- Today's Focussed Conversation (workshop) is the fifth in a series of Tariff related Reset discussions:

Consumption tariffs



Export tariffs



Purpose: Today's Focussed Conversation

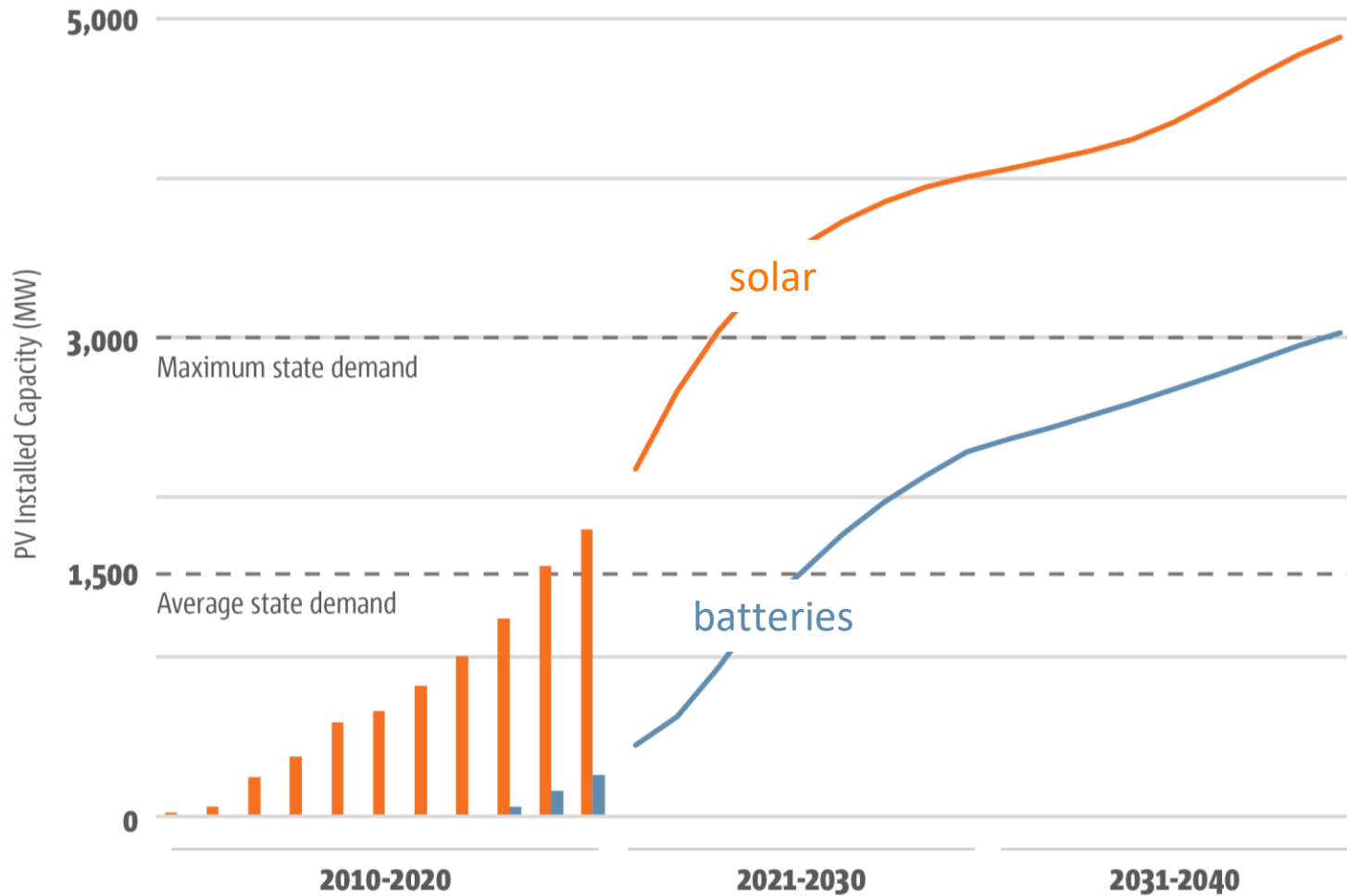
Outcomes of today's workshop 5:

- Understand the rationale of the AEMC Access & Pricing Rule Change (Rule Change)
- Understand what the Rule Change has changed
- Understand the role of the AER Export Tariff Guideline

Export Tariffs – AEMC Access & Pricing Rule Change



Australia is undergoing a transition to distributed energy – and SA is at the forefront



~300,000 Rooftop solar systems

>1 in 3 customers, world's highest

State's largest generator

Net load on the entire distribution network fell below zero in 2021

Record growth continues



~30,000 Home batteries

9 Virtual Power Plants

operating in SA

Background: why do we need network access and pricing reform?

We want to **continue to enable customers to connect solar and export energy** to the grid

But historically there have been **no regulatory obligations** on networks to provide export capacity

When solar take-up was low, this was not a material issue

- Distribution networks built to supply load also have an ‘intrinsic capacity’ to operate in reverse

However, as solar penetration increased, some networks started to reach capacity:

- **Customers:** began experiencing poorer performance of their systems
- **The renewables industry:** became concerned that networks were beginning to say ‘no’
- **Network businesses:** had no clear basis upon which to invest
- **Vulnerable customers:** became concerned about increasing cross-subsidies
- **Rulemakers:** were concerned that the regulations didn’t support efficient investment



The ARENA Access & pricing review

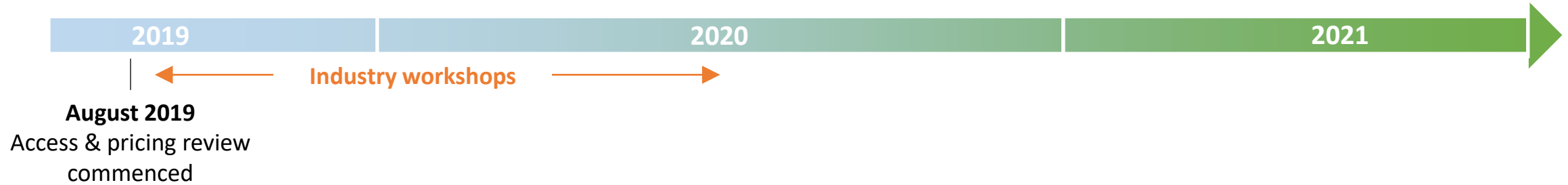


A national review led by Total Environment Centre (TEC) and ACOSS to examine:

- Should solar (and other DER*) customers have a right to export to the grid?
- Should networks be able to charge DER customers a tariff for energy exported to the grid?
- Are DER customers appropriately rewarded when their systems help support the grid?

*DER = Distributed Energy Resources: solar, batteries, etc.

The ARENA Access & pricing review



The review included more than 60 participants

- Consumer advocacy organisations
- Renewable industry bodies
- State & territory governments
- Retailers
- Distribution networks
- Research organisations
- Energy & economic consultants
- Technology vendors
- Electricity sector governing bodies



The ARENA Access & pricing review



3 rule change proposals lodged with AEMC in July 2020:

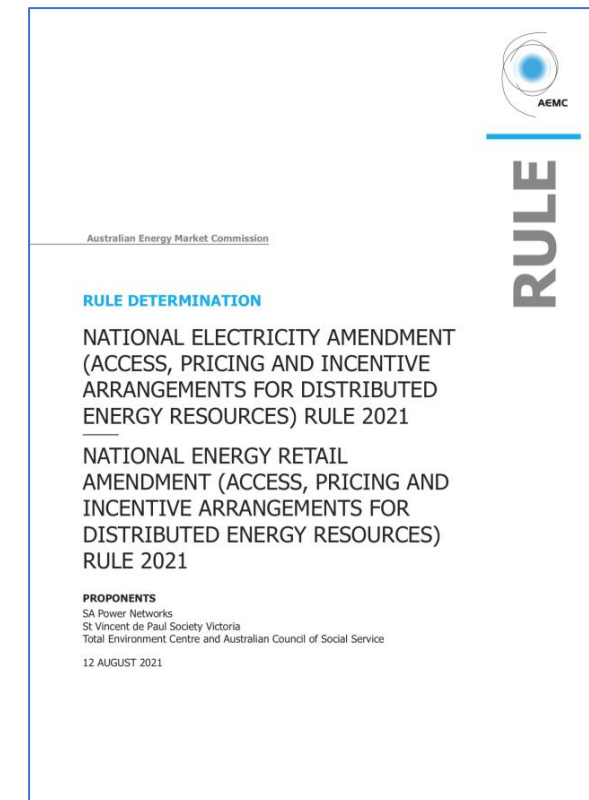


The ARENA Access & pricing review



Final rule change in August 2021 after extensive consultation

- Consultation paper published by AEMC (July 2020)
- Public forum, circa 200 attendees (August 2020)
- 52 written submissions provided to AEMC (September 2020)
- AEMC Technical Working Group convened: 7 'deep dive' workshops on key issues with stakeholders
- AEMC draft decision published (25 March 2021)
- AEMC public forum (20 May)
- Second round of submissions: 46 organisations and ~100 individual



The final rule change

Access

Explicit recognition that distribution **networks now provide an 'export service'**

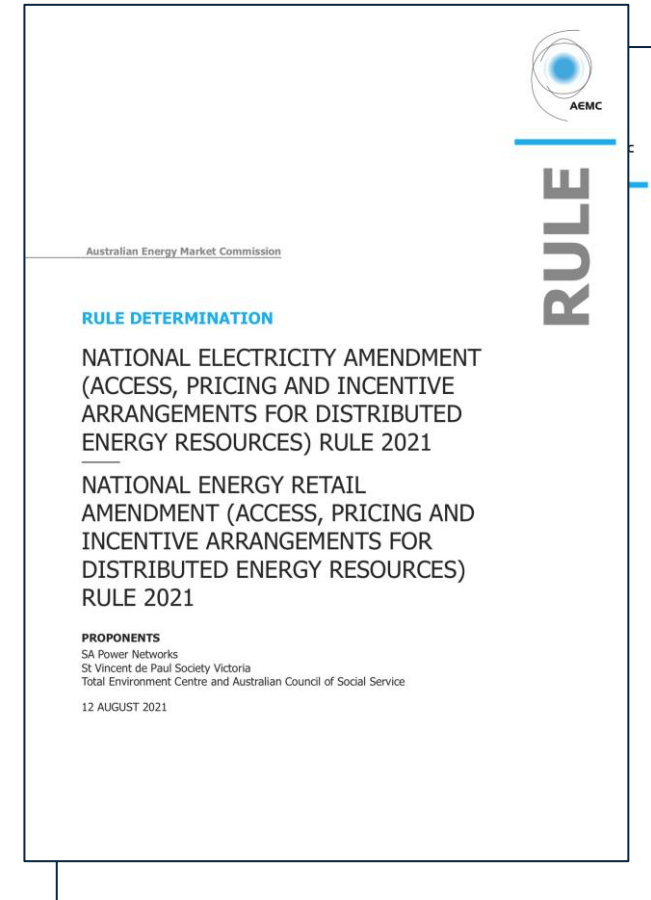
Clearer **requirement for distributors to invest** to enable energy to be exported

- DNSPs must include their **DER integration strategy** as part of their regulatory proposals
- DNSPs **cannot offer static zero export limits** to new DER customers*

Pricing

DNSPs permitted to **charge for export services** via network tariffs

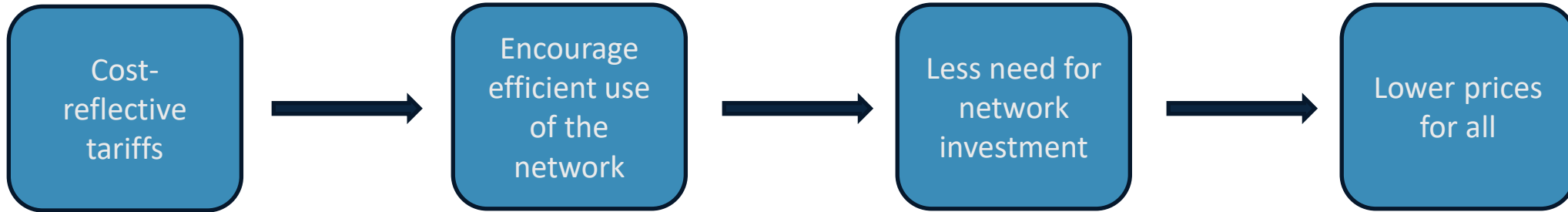
- Can include 'reward pricing' through negative tariffs for both consumption and export
- Export tariffs must include a **basic export level** at no cost (for 10 years)
- DNSPs must develop an **Export Tariff Transition Strategy**
- **No mandatory assignment to export tariffs until 2025** for existing customers



*except in certain limited circumstances

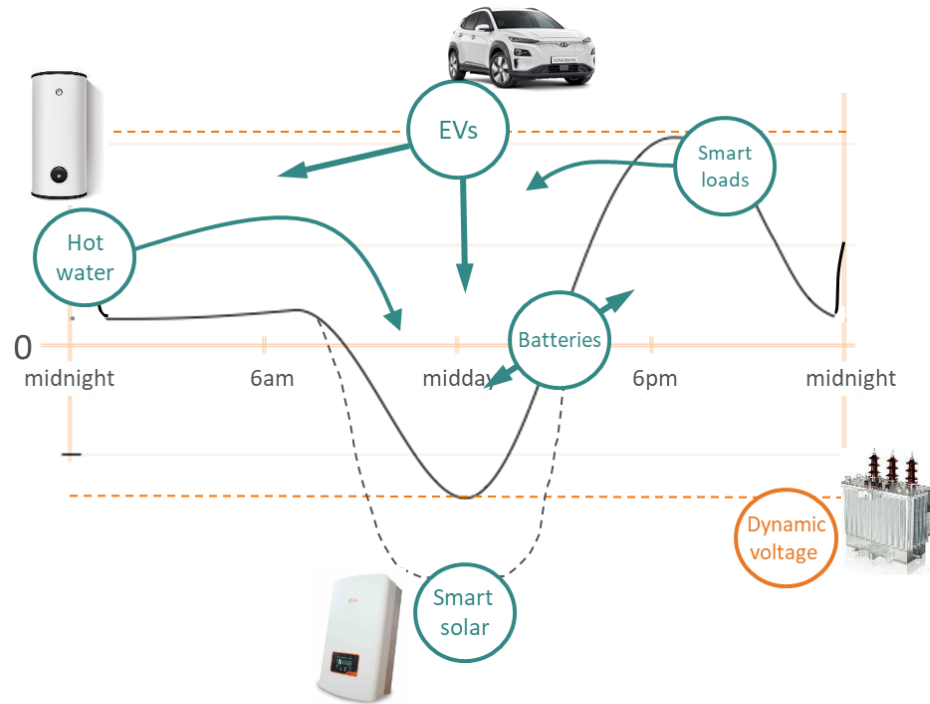
Why export tariffs?

- We are **required** by the pricing principles in the Rules to set network tariffs that are ‘**cost reflective**’



- If we have a 2-way network without 2-way tariffs:
 - DER customers have no incentives to use the network efficiently
 - We have little insight into customers' willingness to pay for additional export capacity
 - Non-DER customers must pay for capacity they cannot use

Access and pricing reform in context



Integrating more solar requires a combination of approaches

- We can encourage **flexible loads** like hot water, EVs and appliances to shift to the daytime through our regular consumption tariffs and by enabling smart controls
- We can manage local, short-lived congestion on the network using **flexible exports**
- With the Access and Pricing reforms, we can plan to invest prudently in increasing upstream capacity in the network through **smarter voltage management** and **targeted upgrades** to assets like transformers



All DNSPs are different

- Different jurisdictions are at different stages in the energy transition
- All DNSPs are starting from different points in terms of
 - Network capacity
 - Network visibility and smart capabilities
 - Tariffs and metering

Discussion | Questions | Comments | Observations

DISCUSSION

- How will the basic export level be calculated?*
- As SA Power Networks doesn't have a lot of visibility of the low voltage network, how will you be able to work out where issues are and where you will need to invest?
- We've talked about to help move hot water loads during the day, didn't we already do that in the past (e.g. change time clocks to enable it to be moved?)
- You are seeing retailers shifting the time that their hot water systems can go on, but only some?
- What obligation is on retailers to reflect SA Power Networks' export tariffs through to customers?
- Are we talking about an export tariff for *all* classes of customers e.g. similar to consumption tariffs?

SUMMARY

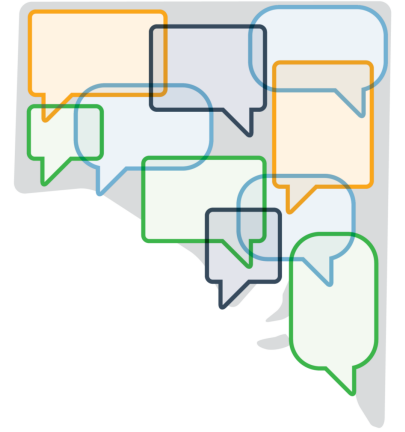
- An overview of the AEMC Access and Pricing Rule Change was discussed with participants.

RESET ACTIONS – SA Power Networks

- Nil

*Reset matter for consideration/discussion in future workshop

^BAU matter for response by SA Power Networks

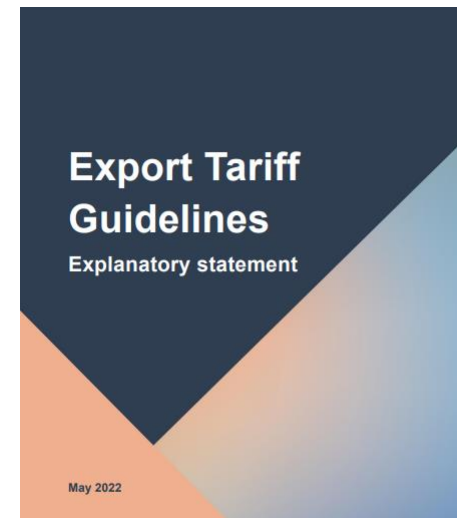
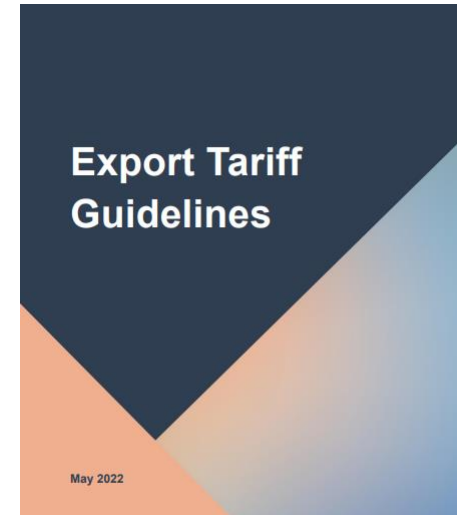


Export Tariffs – AER Export Tariff Guideline



Development

- The National Electricity Rules required the AER to develop and publish Export Tariff Guidelines by 1 July 2022.
- The AER sought stakeholder feedback:
 - 23 September 2021 – Consultation paper on issues being considered
 - 19 January 2022 – Draft Guideline
- SA Power Networks submitted feedback on both occasions and also encouraged the Tariff Working Group to make submissions independent of SA Power Networks.
- Export Tariff Guideline and Explanatory Statement was published in May 2022.
- The Guideline aims to provide information and guidance to a wide variety of stakeholders and customers about the process for development and approval of export tariffs.
- The Explanatory Statement discusses the AER's rationale for the Guidelines and how consideration has been given to submissions received through the consultation process.



Background

- Export Tariffs do not change the amount of revenue that SA Power Networks is entitled to recover.
- Export Tariffs changes who the revenue is recovered from.

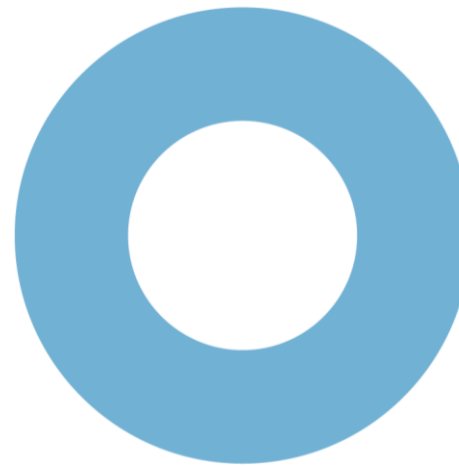
Allowed revenue



■ Load

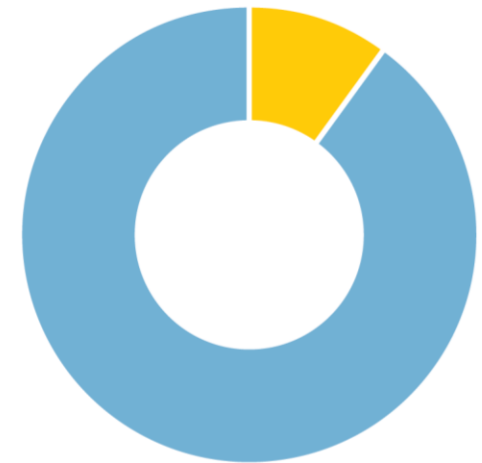
■ Generation

Current recovery of revenue in 2020-2025



■ Consumption tariff

Proposed recovery of revenue post 1 July 2025



■ Consumption tariff

■ Export tariff

Background

- The Guideline is a non-binding principles based approach rather than a prescriptive approach to allow for differences between distribution networks.
- Any Export Tariffs must be approved by the AER via the Tariff Structure Statement (TSS) process.
- All Export Tariffs must have a basic export level; that is, the amount of electricity a customer can export to the grid at no cost.
 - Must apply for two regulatory periods – 2 x 5 years
 - Export level can change within the 10 year period
- SA Power Networks must submit an Export Tariff Transition Strategy as part of the TSS.
- Export Tariffs cannot be introduced until 1 July 2025 unless a customer elects to participate earlier through a trial tariff.

Background

- SA Power Networks must demonstrate the need for Export Tariffs otherwise they will not be approved.
- We need to consider:
 - The circumstances of our distribution network and its intrinsic hosting capacity
 - How customers may be impacted if Export tariffs are not introduced
 - Evidence of current and future estimates of future DER penetration and how it impacts network costs
 - Feedback from stakeholders and customers

Tariff Structure

Consumption Tariffs

- Fixed charges: Daily supply charge - \$/day
- Variable charges: Peak/Shoulder/Off Peak/Solar Sponge – c/kWh
- Demand/Capacity charges: \$/kW or \$/kVA

Export Tariffs

- Cost for exporting customers:
 - Signal when exported energy would drive future network investment and it is better for customers to use their own rooftop generated (or stored) solar electricity
- Rebate for exporting customers
 - Signal when the network would benefit from exports and customers can be rewarded for exporting any energy they do not use (or store) themselves.
- An Export Tariff could be incorporated into an existing tariff structure or develop a new tariff that only applies to the export of energy. A stand alone tariff would mean that a customer has a tariff for consumption and a tariff for export.
- A retailer can elect whether they pass on the price signals.

Tariff Structure

- Example pricing structure for an interval meter included in the Guideline.
- Price per unit is for illustrative purposes only.

Residential two-way tariff	Time period	Charge per unit	Price per unit (cents)
Fixed charge	Daily	c/day	50.0
Peak consumption charge	4pm-9pm	c/kWh	20.0
Shoulder consumption charge	9pm-10am	c/kWh	5.0
Off-peak consumption charge (solar sponge)	10am-4pm	c/kWh	1.5
Export peak rebate	4pm-9pm	c/kWh	20.0
Export charge applies to exports > 2 kWh/day (that is, the basic export level is 2 kWh/day)	10am-4pm	c/kWh	1.5

Two Way Pricing Proposals

- The Guideline requires the following documentation to be submitted as part of SA Power Networks' TSS Proposal

TSS Proposal	Sets out SA Power Networks' proposed tariffs and tariff assignment policies, and related materials, for an upcoming regulatory control period (5 years). The TSS Proposal includes: • TSS • Export Transition Strategy • Explanatory Statement which provides complementary/supplementary information to the TSS The explanatory statement is not a requirement under the rules but is accepted practice.
Overview Paper	Distributors are required to submit an Overview Paper with their regulatory proposals. The overview paper should include information on TSS Proposals and Export Tariffs
Other Documents	Distributors may be required to include Export Tariff pricing information in other documents, such as their DER expenditure strategies.

Two Way Pricing Proposals

- The Guideline requires the following documentation to be submitted as part of SA Power Networks' TSS Proposal:
- **Tariff Structure Statement** – sets out the tariff classes and structures, policies and procedures for assigning customers to tariffs, tariff charging parameters and how the revenue will be recovered.
- **Export Tariff Transition Strategy** – the strategy should:
 - Outline the pace and form of transitional measures i.e. timeframes for moving customers to Export Tariffs, assignment policies (opt in/opt out) and the gradual increase in cost reflectivity of export tariffs
 - Explain how customer bill impact modelling has informed the transition strategy
 - Explain how trial tariffs (if undertaken) have influenced the transition strategy
 - Explain how the transition strategy has been developed in consultation with, or co designed with stakeholders, and explain how stakeholder concerns were addressed.
- If a distributor is not proposing Export Tariffs in an upcoming regulatory control period then they must still prepare a transition strategy to signal their future intentions.

Two Way Pricing Proposals

- **Tariff Structure Explanatory Statement** – To provide additional context for the AER, customers and stakeholders. The explanatory statement should include:
 - Justification of the need for two-way pricing
 - Information on the distributor's stakeholder engagement strategy
 - Explanation of how customers' understanding of two-way pricing influenced the proposed tariff structures, including how customers responded to trial tariffs or other cost-reflective tariffs
 - A description of how the different proposed two-way tariff options cater for
 - different load profiles
 - retailers and aggregators
 - incentivising customers to shift their energy consumption
- Summary of how the distributor has considered the interaction between export tariffs and consumption tariffs, and complementary measures such as demand management.
- A description of engagement with retailers.
- A description of how the distributor determined the basic export level for the proposed export tariffs.

Stakeholder Engagement

- Engagement should reflect the desired outcomes of the AER Better Resets Handbook – Towards Consumer Centric Network Proposals.
- Should provide particular attention to stakeholder groups who are less able to engage with distributors on network tariff structures.
- SA Power Networks should engage with stakeholders, customers and retailers so that they are reasonably capable of understanding and responding to Export Tariffs.
- Engagement should empower stakeholders to meaningfully contribute to if, when and how Export Tariffs should be introduced.

Stakeholder Engagement

- SA Power Networks must consult with a broad range of stakeholders when considering implementation of Export Tariffs including:
 - Residential customers with and without rooftop solar
 - Customers with other DER such as electric vehicles
 - Vulnerable customers
 - Commercial and industrial and small business customers
 - Retailers
 - SA Government
- Tailored channels of engagement must be used to reach these groups so that a wide variety of views can be captured.

Stakeholder Engagement

- SA Power Networks should engage in a transparent way allowing stakeholders time to engage in the Export Tariff process.
- Examples of issues that SA Power Networks should consult on include:
 - Export Tariff transition strategies – use of tariff trials where applicable, transitional measures and transition periods
 - Tariff design – how best to combine consumption price signals, export charges and export rebates
 - Basic export levels – potentially including ‘basic’ and ‘premium’ export services.

Stakeholder Engagement

- To the greatest extent possible Export Tariffs should incorporate customer preferences.
- SA Power Networks must demonstrate how, because of our engagement, we identified relevant feedback on Export Tariffs and addressed these comments.
- Where stakeholder and customer preferences diverge we must demonstrate how these preferences were balanced or a mutually acceptable solution was reached.
- If stakeholder and customer preferences are not incorporated then this must be explained.

Application of the Network Pricing Objective and Network Pricing Principles

- Export Tariffs must comply with the Network Pricing Objective and Network Pricing Principles.
- The Pricing Principles are designed to transition customers to more cost reflective network tariffs over time.
- **Export tariffs are to reflect the efficient long run marginal cost (LRMC)**
- LRMC is the costs associated with providing additional capacity of the export service to which the Export Tariff relates:
 - Augmentation capital expenditure linked to the export service.
 - Replacement capital expenditure as some decisions may vary depending on demand for the export service.
 - Operating expenditure dedicated to providing additional export capacity or a proportion if this expenditure is incurred to provide both the export and consumption service.
- SA Power Networks must demonstrate that Export Tariff parameters are based on the incremental cost of providing distribution network capacity for exports.

Application of the Network Pricing Objective and Network Pricing Principles

- Intrinsic hosting capacity is the baseline from which an incremental expansion of export capacity is developed
- It reflects that the network can support some reverse power flow without any additional investment.
- Export Tariffs should only be based on providing export capacity in addition to the distribution network's intrinsic hosting capacity.
- Costs incurred by SA Power Networks to provide their intrinsic hosting capacity (historical costs) should not be recovered through export charges.
- There is no specific date in the Rules at which costs are taken to have been incurred in providing the distribution network's intrinsic hosting capacity. Could consider:
 - Date of the Access and Pricing rule change taking effect
 - First day of a distribution network's upcoming regulatory control period

Application of the Network Pricing Objective and Network Pricing Principles

- SA Power Networks must use a LRMC methodology appropriate to its circumstances.
 - Must outline the costs and benefits of the selected method compared to using other methods.
- LRMC drivers might include:
 - Voltage constraints
 - Thermal constraints
 - Low voltage visibility needs
 - Forecast growth in DER customers – rooftop solar, home batteries, EV's
 - The extent to which costs vary between different locations in the distribution network
 - Implementation of and interaction with dynamic operating envelopes
 - Jurisdictional requirements
- LRMC of Consumption Tariffs and Export Tariffs should not overlap, if they do then, it must be demonstrated how double counting has been avoided.
- Residual costs should be allocated proportionally.

Application of the Network Pricing Objective and Network Pricing Principles

- **Consider the impact on customers of changes in tariffs**
- Bill impact analysis should be undertaken and shared with stakeholders to elicit feedback on tariff options.
- Analysis should show:
 - How customers who do not change their network use would be affected by Export Tariffs. Customer types include:
 - With and without rooftop solar
 - With EV's
 - Those who are considered vulnerable
 - Metropolitan, regional and remote areas
 - How different customer types would benefit by shifting their network use in response to pricing signals
- Tariff structures should be designed so customers can mitigate their price impacts by changing how they chose to use export services. Customers should be able to decide if they want a 'basic' service or a 'premium' service where they can take advantage of greater export capacity.

Application of the Network Pricing Objective and Network Pricing Principles

- **Export Tariffs must be understood or incorporated**
- Tariff structures must be reasonably capable of being understood by retail customers or being incorporated by retailers or aggregators in services/tariffs to customers.
- SA Power Networks must demonstrate how it considered customers, retailers and aggregators ability to understand or incorporate Export Tariffs.

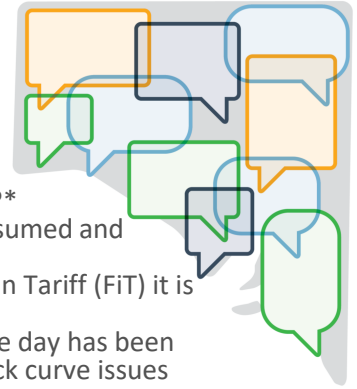
Basic Export Levels

- The basic export level is the threshold up to which a customer may export to the distribution network without charge.
- All customers who are assigned an Export Tariff must have a basic export level available to them for the next 2 regulatory control periods – 10 years.
- The basic export level must be available at all times however different levels may apply:
 - Across different geographic locations in the distribution network
 - For different times of the day
 - For different years within a regulatory control period
 - For different customer and/or connection types
- In determining the methodology for basic export levels distributors should balance efficiency, complexity, understandability, fairness and equity.

Basic Export Levels

- SA Power Networks needs to determine the basic export levels with regard to:
 - The export capacity of the distribution network to the extent it requires minimal or no further investment – the network's intrinsic hosting capacity
 - Expected demand for export services in the distribution network.
- Consideration should be given to:
 - Constraints and hosting capacity across different geographical locations of the distribution network
 - How hosting capacity of the distribution network could evolve, without additional investment, as customers respond to more cost-reflective tariffs and demand management initiatives
 - Feedback from stakeholders on basic export limits
 - Customer impact analysis
 - Customer investments in DER, including rooftop solar and associated payback periods
 - Expected DER uptake, including rooftop solar, electric vehicles, storage or demand management initiatives, across different parts of the network
 - Dynamic and static connection arrangements and expectations for changes in the number of these over time
 - Jurisdictional policies

Discussion | Questions | Comments | Observations



DISCUSSION

- If you need to have export tariffs to create additional investment, to allow for more export into the grid, shouldn't the total allowed revenue then need to increase?
- If the (AEMC) rule change didn't happen, you wouldn't be able to recover revenue through export tariffs?
- Presumably if investment specific to export is approved that would be applied postage stamp pricing to all PV owners?
- What is postage stamp pricing?
- You can only charge export tariffs if incremental costs have occurred, that are not location-specific?
- How are you going to deal with the question of reallocating costs that were attributable to exports for assets that are now being used for increased capacity for demand part-way through a pricing period (due to changes that might occur during the period like adoption of Electric Vehicles). And there is no readjustment during the five-year period due to this?
- If you're going to set up these time bands for charging, minimising or rewarding – we know that retailers have problems with meter clocks and getting them right? The metering companies need to get their clocks right and somebody should be doing spot checks now.
- Most consumers aren't going to be sophisticated enough to realise if their clocks are incorrect
- Have the network companies (or Energy Network Association) requested the AER to do an audit of time-producing meters and retailers' use of those times?
- Who actually owns the meter, the consumer or retailer/SAPN?
- So any audit of meters' timing should be done by the owner perhaps?^

- Australian Eastern Standard Time (AEST) to Central Standard Time (CST).
- Why are EVs included as Distributed Energy Resource (DER) if the EV doesn't have to the grid or home capability?
- What is an aggregator?
- "Rooftop solar" refers to any site less than 5MWh, you're casting a very wide net (when considering paybacks etc)
- Will 100% of export revenue collected be used to improve the network for export only, or will it be put in the 'bucket' and used for network improvement generally? If you are then replacing historical equipment that had intrinsic export capacity benefit to the network, are you then counting that as being able to be recovered under the export tariff, or is it still classed as being historical?
- If you're upgrading a piece of equipment to improve network export but moving something that can be developed, how is that value then being accounted for?
- Solar owners don't want an export tariff, but if they do then they want every cent spent needs to be spent on improving the network for export.
- Is there a requirement to directly align your tariffs as to the amount and time with your expenditure requirements to service exports? Could you front-end the revenue and back-end the expenditure in a period?
- Further to the current timing of capex, what would happen if capex underspent?
- What is SA Power Networks actually investing in – what is driving the investment? Is it transformers? (The AER guidelines say) that residual costs should be allocated to consumption and export charges in proportion to the volume of those services
- What about the people with solar and non-smart

- meters; how will this apply to them?*
- Does volume mean the amount consumed and exported?
- ESCOSA does not regulate the Feed in Tariff (FiT) it is undertaken by the retailer.
- Wholesale prices in the middle of the day has been negative, then you have massive duck curve issues in the morning and afternoon peak.
- It is a nightmare to calculate a correct FiT for a retailer.
- What the market-based FiT are in each of the jurisdictions?*
- Decrease of wholesale prices and introduction of FiT is going to cause a market shock.

SUMMARY

- Key topics discussed by the group :
 - Revenue recovery from export tariffs and how it will be spent (including ensuring it is spent on augmentation to support two-way energy flows) is a key concern of the group.
 - Accuracy of meter clocks and retailers' correct use of the data.
 - Potential future FiT .

RESET ACTIONS – SA Power Networks

- Include retailer FiT into customer impact analysis.

*Reset matter for consideration/discussion in future workshop
^BAU matter for response by SA Power Networks

Generation Categories

Category	Description	Thresholds*
SEG	Small Embedded Generator	0-30 kW
MEG	Medium Embedded Generator	31-500 kW**
LEG	Large Embedded Generator	500-5000 kW
Chapter 5/5A	Registered Participant	>5,000 kW

* Assumes PF 1.0 i.e. 1kW = kVA

**Previously 31-200 kVA, threshold has changed due to the volume/size of the connections.

- For solar, thresholds reference the size of the inverter NOT the size of the panels
- Generator capability, inverter capability, export capability:
 - 6.5kW panels, 5kW inverter, 5kW production
 - Export = Maximum of 5kW less inhouse usage
 - Basic export level of 1.5kW applies to export, NOT to the inverter nor panels
 - If inhouse usage 3kW then export = $5 - 3 - 1.5 = 0.5\text{kW}$ subject to Export Tariffs

NSW Networks’ Draft Proposals

	Ausgrid	Essential	Endeavour	EvoEnergy	NT Power & Water
DER integration expenditure	\$153 million ‘Delivering Net Zero’	\$68 million	<i>Details below are based on current trial tariff</i>	\$5 million CAPEX + \$9.9 million OPEX	\$40 million
Basic export level	3kW / 600kWh per quarter	1.5kW	2kW	TBD	TBD
Export tariff	10am-3pm 1.85c/kWh	10am-3pm, monthly peak 1.5-3kW: \$0.6/KW >3kW: \$0.7/kW	10am-2pm 1.78c/kWh plus 2.95c/KW/day summer or 0.90c/kW/day winter	TBD	9am-3pm c/kWh TBD Possibly large customers only
Export credit	3pm-9pm 1.85c/kWh	5pm-8pm \$13.6c/kWh	4pm-8pm business days 14.3c/kW/day summer or 4.4c/kW/day winter	TBD	3pm-9pm summer c/kWh TBD
Transition	Opt-in from July 2024 Mandatory for all residential and business with interval meters from July 2025	Opt-in from July 2024 New and replacement from July 2025 All customers from July 2028	TBD	Mandatory for new customers from July 2025, opt-in for others Mandatory for all from July 2029	Possibly from 2026

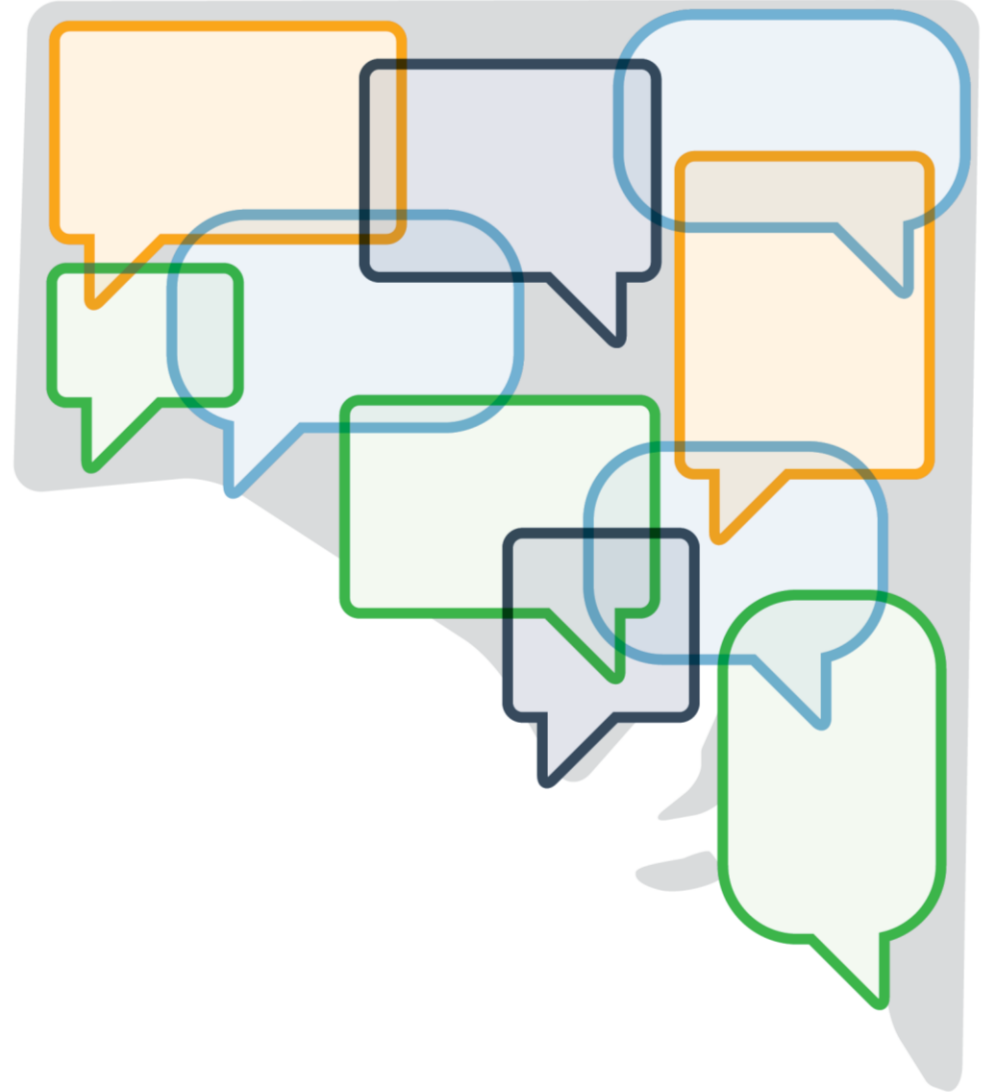
Next Steps – Engagement

Date	Description
Workshop 1 11 August 2022	• Default Tariff Structures, Cost Allocation / Tariff Design
19 August 2022	• Summary of workshop outputs and discussion to all invitees and attendees
Workshop 2 24 August 2022	• Continuation of Cost Allocation / Tariff Design - Residential
31 August 2022	• Continuation of Cost Allocation / Tariff Design - Residential
9 September 2022	• Summary of workshop outputs and discussion to all invitees and attendees – via Talking Power
20 September 2022	• Business tariff analysis to be shared with Business stakeholders and any other stakeholders who would like to participate
30 September 2022	• Summary of workshop outputs and discussion to all invitees and attendees – via Talking Power

Next Steps – Engagement

Date	Description
Workshop 4 28 September 2022 9.30am – 1pm	Continuation & finalisation of: • Enabling the Energy Transition – Residential • Enabling the Energy Transition – Business
Workshop 5 12 October 2022 9:30am – 11:30am	Export Tariffs – Setting the Scene • Building customer and stakeholder knowledge regarding the AEMC rule change and AER Export Tariff Guideline
Workshop 6 24 October 2022 1pm – 4pm	Export Tariffs – Residential & Business • Development of tariff structures
Workshop 7 16 November 2022 9:30am – 12:30pm	Export Tariffs – Residential & Business • Refinement of tariff structures
Workshop 8 1 December 2022 2pm – 5pm	Export Tariffs – Transition • What does implementation look like?
People’s Panel Deliberation	• February – March 2023

Discussion | Questions | Comments | Observations



- *Any final questions or comments?*



Empowering South Australia