Office of Energy and Climate Change

Application process for green hydrogen electricity concessions

NSW Hydrogen Strategy



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Introduction

The <u>NSW Hydrogen Strategy</u> was released in October 2021 to support the development of a commercial green hydrogen industry in NSW. The Strategy committed to providing concessions to green hydrogen producers for costs they would otherwise incur as electricity customers. The purpose of these concessions is to reduce the cost of producing green hydrogen and incentivise investment in large-scale hydrogen supply chains.

This paper provides industry with information regarding how the concessions can be accessed, including:

- available concessions
- eligibility criteria
- application and approval process
- the evidence hydrogen producers must provide to be granted and maintain the concessions
- receiving the financial benefit of the concession.

This paper is supplementary to the various legislative provisions under which the concessions are granted by the Minister for Energy, however, it provides general guidance only on how we will administer the legislative framework. Please ensure you make your own enquiries and obtain advice as necessary for your individual project. If you have any questions regarding the application and approval process, please contact greenhydrogen.concessions@dpie.nsw.gov.au.

Available concessions

The following table sets out what concessions are available, the value of the concession, the timeframe for which the concession applies and the relevant legislation under which the concession is granted. There are 2 groups of concessions:

1. exemptions for schemes levied on electricity consumers

2. limitations on charges for electricity network services (referred to in this paper as network charge discounts).

Exemption	Discount	Timeframe	Legislation
<u>Electricity Infrastructure</u> <u>Roadmap</u>	30-90% ¹	10 years from the date the network connection is energised	Clause 37 of the Electricity Infrastructure Investment Regulation 2021
<u>Climate Change Fund</u>	100%	Until 31 December 2042	Section 34N of the <i>Energy</i> <i>Utilities and</i> <i>Administration Act 1987</i>
Energy Savings Scheme	90%	Until 31 December 2042	Clause 93 of Schedule 4A to the <i>Electricity Supply</i> <i>Act 1995</i>
Peak Demand Reduction Scheme	90%	Until 31 December 2042	Clause 22 of Schedule 4A to the <i>Electricity Supply</i> <i>Act 1995</i>
Network charges:			
 transmission customer – charges for transmission use of system services and common transmission services distribution customer – charges for standard control services and designated pricing proposal services. 	90%	12 years from the date the network connection (or approved metering arrangement) is energised. You must start producing green hydrogen before 1 January 2031.	Section 192 of the <i>Electricity Supply Act 1995</i> and Part 7B of the <i>Electricity Supply (General)</i> <i>Regulation 2014.</i>

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¹ The value of the Roadmap exemption varies depending on when the hydrogen production facility commences operations. If it starts before 1 January 2029, the exemption rate is 90%. If it starts in 2029, the exemption rate is 60%. If it starts in 2030, the exemption rate is 30%.

Eligibility requirements

The eligibility criteria vary depending on the concession. However, the criteria for the exemptions for the schemes levied on electricity consumers are broadly similar. The eligibility criteria for the network charge discounts are more detailed and prescriptive. In both cases, to be eligible you will need to produce 'green hydrogen'.

Our definition of green hydrogen

To be eligible for the concessions, you will need to produce 'green hydrogen'. Green hydrogen is defined in the various relevant legislation as hydrogen that is produced using renewable energy.

Green hydrogen definition

• For the purposes of the concessions, this means that you must verify under the <u>GreenPower</u> program, at least once every financial year, that you have surrendered an amount of renewable energy certificates equivalent to your total electricity consumption (in megawatt hours) used for hydrogen production. For the avoidance of doubt, this does not require real time load profile matching or any other timebound matching of certificates.

Proposed interaction with guarantee of origin schemes

Our intention is to adopt the Commonwealth Government's Hydrogen and Renewable Energy Guarantee of Origin schemes as the means through which the surrender of renewable energy certificates is verified. This would require you to register your hydrogen production facility and generate hydrogen certificates under that scheme. However, as the schemes have not been finalised and legislated, we are unable at this time to approve it for the purposes of the concessions.

We are working with the <u>Clean Energy Regulator</u> to determine the suitability of adopting the guarantee of origin schemes and whether it will apply the approach in the 'green hydrogen definition' described above. We will update this paper and notify prospective and existing approved hydrogen producers:

- once the Guarantee of origin scheme is established; and, or
- if changes are made to renewable electricity certification as the Renewable Energy Target winds down in 2030.

Eligibility requirements for the scheme exemptions

Exemption

Eligibility

Electricity Infrastructure Roadmap	 roadmap charges are collected by Distribution Network Service Providers (DNSPs). To be eligible, you must therefore be a distribution network customer you must be producing 'green hydrogen' you must commence operations by 31 December 2030.
Climate Change Fund	 Climate Change Fund charges are collected by DNSPs. To be eligible, you must therefore be a distribution network customer you must be producing 'green hydrogen'.
Energy Savings Scheme	 you must be supplied electricity from the National Electricity Market (NEM), as either a direct market participant or through an electricity retailer you must be producing 'green hydrogen'.
Peak Demand Reduction Scheme	 you must be supplied electricity from the NEM, as either a direct market participant or through an electricity retailer you must be producing 'green hydrogen'.

Eligibility requirements for the network charge discounts

You don't need to have reached a final investment decision and the facility doesn't need to be operational to be granted the discount. To be eligible for the network charge discounts, you must satisfy the following criteria:

- 1. you must produce 'green hydrogen' at your proposed facility
- 2. your proposed hydrogen production load will have an electrical demand of at least 1 megawatt (MW) at any time during a 12-month period
- 3. your proposed hydrogen production load has either:²
 - a. a dedicated connection point to the electricity network that is used exclusively for hydrogen production; or
 - b. a dedicated metering arrangement that is used exclusively for hydrogen production and has been approved by your network service provider
- 4. you must demonstrate you are using existing spare capacity by confirming that either:
 - a. the connection of your load will not require augmentations or alterations to affected networks (this excludes any connection assets)
 - b. you will pay for any network augmentations or alterations required to connect your hydrogen production load (this excludes any connection assets); or

² This may include water processing, systems monitoring and the safe storage of the hydrogen that is produced. Loads used for any other purposes cannot be located behind the dedicated connection point or approved metering arrangement. Loads not within scope include the conversion of hydrogen into carriers such as ammonia or methanol.

- c. you will agree to power transfer limitations or load control arrangements with your network service provider that will enable them to manage network constraints and that such arrangements will be in place for at least 12 years from the date you start producing hydrogen
- 5. you will produce green hydrogen by 31 December 2030.

Once the Minister has approved discounts for 750 MW of capacity that connects to the network, the Minister will not approve any further orders. The Minister cannot approve your application if it will result in a breach of this cap. We will consider applications in the order they are received.

Please note, all green hydrogen producers that are granted network charge discounts will be placed as the first loads in the load shedding schedule administered by the NSW Government and Australian Energy Market Operator (AEMO) in case there is a system event.

The application and approval process

To streamline the application process, we have combined the administration of all green hydrogen exemptions into a single process. You can access the application form <u>here</u>. The process is structured to enable hydrogen project developers to bank the value of the concessions for final investment decision (FID). Accordingly, you have flexibility to apply from the early stages of project development before FID through to when your facility commences operations.

We will require different information and evidence from you throughout the project development, commissioning, and operational phases to ensure you meet the eligibility criteria. The tables below set out the application and approval steps for the concessions.

The network charge discounts can be granted before you reach FID through a Ministerial Order published in the <u>NSW Gazette</u>. If you apply for the scheme exemptions before FID, you will receive written confirmation from us of whether you meet the eligibility criteria. Your Ministerial Order granting the scheme exemptions will be published in the NSW Gazette once you commence operations and provide the 'Commencement' evidence set out below.

Project development phase	Steps
Pre-FID	 submit application for exemptions with 'Pre-FID' evidence to us we issue written confirmation regarding whether you meet the eligibility criteria
Commencement	 notify us that connection has been energised provide 'commencement' evidence to us we publish Ministerial Order for the exemption in the NSW Gazette
Ongoing operation	 provide 'ongoing operation' evidence requirements to us at least once every 12 months exemption order lapses or is withdrawn you revert to standard pricing and/or scheme liability.

Scheme exemptions

Network charge discounts

Project development phase	Steps
Pre-FID	 commission network connection studies* submit connection application to network service provider (NSP)* NSP provides written confirmation that the load meets the spare capacity eligibility criterion submit application for discount with 'Pre-FID' evidence to us Ministerial Order is issued granting discount
Post-FID	 achieve FID provide 'Post-FID' evidence to us
Construction	 8. site works and construction 9. if connected to a distribution network, provide notice to DNSP by 30 September if you propose to commence operations in the next financial year. This is to ensure you receive the correct tariff 10. connection energised
Commencement	 notify us that connection has been energised provide 'Commencement' evidence to us
Ongoing operation	 provide 'On-going operation' evidence requirements to us at least once every 12 months order for discounts lapses or is withdrawn you revert to standard pricing and liability.

* If you plan to use an existing electricity network connection for hydrogen production, you can discuss with your network service provider what formal steps are needed for them to provide written confirmation you meet the eligibility criteria. This includes confirmation of spare capacity in the network and approval of a dedicated metering arrangement for the hydrogen production load.

Evidence needed to access concessions

Throughout the application process and at various stages of project development, you will need to provide different information and evidence to us to confirm that you meet the concession eligibility criteria. We will provide written notice to you if further evidence is required. We may verify information provided by you with third parties as part of the application process.

Set out in the below table are the evidence requirements for the concessions at different points of project development. We may accept evidence that is different to what is listed below, but only if it demonstrates that you meet the eligibility criteria and application requirements set out in the relevant legislation. Insufficient or incomplete information may result in delays or rejection of your application. Please note, if you first apply after your facility has commenced operations, you do not need to provide the Pre-FID evidence listed below.

Scheme exemptions

Project phase	Evidence Timeframe		
Pre-FID	 renewable energy supply strategy that details your proposed approach to meet the green hydrogen requirements set out in this paper site designs confirming only loads for hydrogen production will be connected to the connection point or dedicated metering arrangement proposed facility location, including address, suburb, postcode and GIS co-ordinates. 	At the time the exemption application is lodged.	
Commencement	 evidence that the facility connection has been energised evidence that any agreements required under your renewable energy supply strategy have been executed³ final site maps, photographs and engineering designs verifying only loads necessary to produce green hydrogen are connected to the connection point or dedicated metering arrangement 	Must be provided within 3 months of the network connection being energised.	

³ Please note this may change to evidence of accreditation under the Commonwealth Government's Hydrogen Guarantee of Origin scheme.

Ongoing operation

- your relevant National Metering Identifier (NMI).
- provide confirmation that renewable energy certificates equivalent to your total load have been surrendered.⁴

By 1 August each year from when the facility commences operation.

Network charge discounts

Project stage	Evidence	Timeframe
Pre-FID	 provide one of the following to demonstrate you are only using spare capacity: written confirmation from your network service provider that connection of your proposed load will not require any augmentation or alteration to affected networks (other than connection assets); or a proposal from your network service provider setting out details of any network augmentations or alterations (excluding connection assets) that they propose you pay for and a statement confirming that you will pay for them; or a proposal from your network service provider setting out power transfer limitations and/or load control arrangements that will allow them to manage network constraints and a statement that you will agree to these arrangements. if you are using a dedicated metering arrangement, written confirmation that your network service provider has approved the arrangement engineering designs or product specifications confirming proposed electrical demand for green hydrogen production will be 1 MW or greater site designs confirming only loads for hydrogen production will be connected to the connection point or dedicated metering arrangement renewable energy supply strategy that details your proposed approach to meet the green hydrogen requirements set out in this paper proposed facility location, including address, suburb, postcode and GIS co-ordinates 	At the time the application is lodged.

⁴ Please note this may change to evidence of certificates issued under the Commonwealth Government's Hydrogen Guarantee of Origin scheme.

	• acknowledgement that your load will be placed among other hydrogen producers as the first loads to be shed in case of a system event.	
Post-FID	 if you entered into a connection agreement after being approved, a copy of the executed connection agreement or a connection contract signed by you and your network service provider if applicable, an executed agreement providing that you have agreed to power transfer limitations or your network service provider can control your load to manage network constraints if applicable, an executed agreement providing that you will pay for any augmentations proposed by the network service provider. 	Within 24 months of the date the exemption order is published in the NSW Gazette.
Commencement	 evidence that the facility connection has been energised final site maps, photographs and engineering designs verifying only loads necessary to produce green hydrogen are connected to the connection point or dedicated metering arrangement your relevant National Metering Identifier (NMI). evidence that any agreements required under your renewable energy supply strategy have been executed.⁵ 	Must be provided within 3 months of the network connection being energised.
On-going operation	• provide confirmation that renewable energy certificates equivalent to your total load have been surrendered. ⁶	By 1 August each year from when the facility commences operation.

⁵ Please note this may change to evidence of accreditation under the Commonwealth Government's hydrogen guarantee of origin scheme.

⁶ Please note this may change to evidence of certificates issued under the Commonwealth Government's hydrogen guarantee of origin scheme.

Withdrawal of the concessions

Hydrogen producers that have been granted concessions must remain compliant with the requirements set out in the applicable legislation and this paper. This includes complying with information requests made by the Minister to determine whether you remain eligible.

The Minister must revoke the order granting the concessions for a failure to comply with any of these requirements, including in circumstances where:

- you cease to produce green hydrogen (e.g. you fail to surrender renewable energy certificates in accordance with the GreenPower program or your facility is decommissioned)
- your hydrogen production load is not isolated to a connection point or dedicated metering arrangement approved by a network service provider
- your electrical demand for hydrogen production does not reach the 1 MW minimum threshold
- you are not party to a connection agreement within 24 months of being approved
- you do not provide a copy of your connection agreement to us or fail to comply with an information request we issue to you
- where you proposed to pay for network augmentations or to agree to power transfer limitations/load control arrangements and you do not comply with that proposal.

Receiving the concessions

The concessions are granted by a Ministerial Order published in the <u>NSW Gazette</u>. Once the Ministerial Order has been published, this triggers the various legislative provisions that enable you to receive the benefit of the concessions. If you are purchasing your electricity through a retailer, you should discuss arrangements with them to ensure the benefit of the concessions is passed through to you. The means by which you receive the benefit of the concessions are set out in the table below.

Concession	How the discount is provided
Network charges	For distribution connected customers, the NSP will either calculate a site-specific tariff for the facility or place you on a discounted tariff. This tariff will be 10% of what would otherwise be charged as a distribution customer. For transmission-connected customers, the transmission network service provider (TNSP) will only charge 10% of the price applicable to your connection point.
Electricity Infrastructure Roadmap	The cost of the Roadmap charged to you by the DNSP will be 10% (or 40% or 70% depending on the year your connection is energised) of what otherwise would have been charged to you. This amount will be billed directly to you (if you contract directly with your DNSP) or your retailer.
Climate Change Fund	The DNSP will not charge you a tariff for recovery of the Climate Change Fund.
Energy Savings Scheme	If you purchase electricity through a retailer, the retailer has discretion as to how to pass through the scheme costs to you. Generally, they will only pass through the costs of the Energy Savings Scheme for 10% of your electricity use. However as noted above, you should discuss these arrangements with them.
	If you are a market participant in the NEM, your liability for the Energy Savings Scheme will only be 10% of your electricity acquisitions.
Peak Demand Reduction Scheme	If you purchase electricity through a retailer, the retailer has discretion as to how to pass through the scheme costs to you. Generally, they will only pass through the costs of the Peak Demand Reduction Scheme for 10% of your electricity use. However as noted above, you should discuss these arrangements with them.
	If you are a market participant in the NEM, your liability for the Peak Demand Reduction Scheme will only be 10% of your liability under the scheme.

Notification of application outcomes and the status of concessions

If your application is approved or if any updates are made to your Ministerial Order, we will notify you in writing. You will also receive an electronic copy of the order published in the NSW Gazette within 5 business days of its publication. A list of all active concession orders will be published on our website. If your application is incomplete or is not approved, you will receive written notice from us and the reasons why. We will endeavour to process applications and notify you of the outcome within 20 business days of receiving the application.

If you have any questions regarding the application and approval process, please contact <u>greenhydrogen.concessions@dpie.nsw.gov.au</u>.



For more information

If you have any questions, please contact us via the email below and we will reply to your enquiry as soon as possible. For more information on the NSW Hydrogen Strategy, please visit our website.

www.energy.nsw.gov.au | greenhydrogen.concessions@dpie.nsw.gov.au