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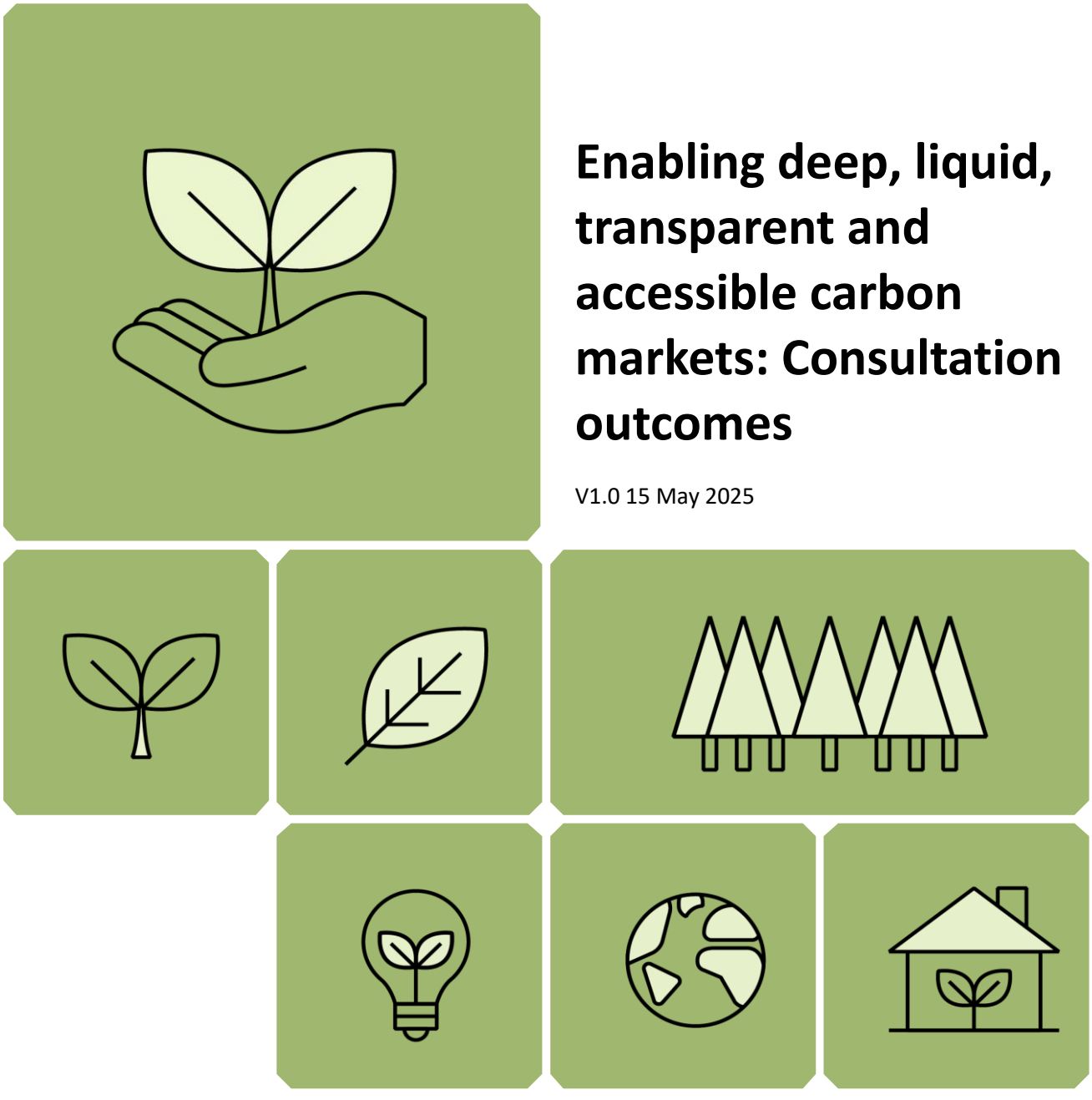

Enabling deep, liquid, transparent and accessible carbon markets: Consultation outcomes

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CLEAN ENERGY REGULATOR

Consultation on the new Unit and Certificate Registry and possible exchange trading

On 28 November 2024 the new Unit and Certificate Registry was officially launched. The registry provides a modern, secure, single place to hold and transfer multiple unit and certificate types and will connect with external digital trading platforms.

The first Safeguard Mechanism credit units (SMCs) have now been issued into eligible Australian National Register for Emissions Units (ANREU) accounts in the new registry. Account holders with SMCs in their account can now:

- view, filter and sort account holdings by attribute
- transfer SMCs between ANREU accounts
- surrender SMCs to meet the obligations of responsible emitters under the Safeguard Mechanism[1]
- download holdings data, including attributes.

To inform the prioritisation of additional functions and features for the new registry and a carbon exchange, we released the 'Enabling deep, liquid, transparent and accessible carbon markets in Australia'[2] consultation paper. We sought stakeholder feedback on:

1. Identifying key market needs and priorities for the establishment of new market infrastructure, including additional functionality for the modern registry, that allows market participants multiple pathways to access carbon markets.
2. The feasibility of a proposed model for exchange trading of Australian carbon credit units (ACCUs).

The consultation period ran from 11 October to 22 November 2024. We received in total 35 submissions, 21 of which were non-confidential. Peak industry bodies, finance and market brokers and carbon project proponents were the top three types of stakeholders that provided submissions.

Consultation engagements were conducted from 16 October until 20 November 2024 and included roundtable discussions with industry associations, project proponents, brokers and traders, market participants and government stakeholders.

A list of public submissions received, and consultation events is at Appendix A.

This paper summarises the consultation outcomes and next steps. Overall, stakeholders noted that the new registry should:

- be user friendly and easy to access
- provide enhanced visibility and management of account holdings
- have strong security verification and controls.

[1] https://cer.gov.au/schemes/safeguard-mechanism
[2] https://cer.gov.au/document_page/enabling-deep-liquid-transparent-and-accessible-carbon-markets-australia-discussion-paper

There was broad support for transparent access to co-benefit data related to units and certificates, though opinions varied on verification processes. Some stakeholders proposed using existing frameworks for verification, while others suggested verification should be optional.

Responses from broker platforms, digital marketplaces and companies noted that they support having direct access to the registry via a secure application programming interface (API) for increased efficiency and to enable real-time analysis and trading.

Stakeholders noted the importance of a carbon exchange and its ability to facilitate more efficient trading. On the proposed exchange trading model, respondents identified issues and challenges associated with the trading of beneficial interests of ACCUs via a CHESS Depositary Interest (CDI), as a result of the legislative constraints and balancing liquidity and fungibility needs by limiting the number of listing classes.

What we heard

Unit and Certificate Registry

Functions and features

We asked stakeholders their views on what are the most important features and functions for the new registry to address the current challenges and harness the opportunities of growth in carbon markets.

Stakeholders noted there should be streamlined access to the registry and the ability to segregate holdings for different purposes. Having the ability to export data in different formats to enable account holders to undertake their own unit and certificate holdings analysis and track transfers within their corporate group was also noted as a desirable feature.

Greater visibility of meta-data in account holdings and being able to filter by attributes such as: vintage, project name, location, co-benefits, developer, proponent, carbon estimation areas, total issuance to date, latest issuance and date were also raised as key features for users of the new registry.

The Kimberly Land Council raised the registry should be intuitive, easy to use and functional on mobile phones or tablets and operate in very low-bandwidth networks, particularly in remote locations.

S&P Global highlighted that registries will need to prioritise information security and transaction security to build trust and meet regulatory requirements. This includes having access and permissions controls with secure multi-factor authentication, data protection and encryption, having in place strong security systems to detect, prevent and identify potential threats and maintaining audit trails for accountability and system auditability.

Availability and verification of co-benefit information

We asked stakeholders whether information about the co-benefits associated with units and certificates, (for example First Nation community outcomes and environmental benefits) should be made available in the registry? If so, should this include third-party verified and unverified information and what existing frameworks could be relied upon to verify co-benefits?

The majority of stakeholders supported having greater access and visibility of co-benefit information associated with an ACCU via the registry, however there was a divergence of views on what, if any, verification of non-carbon benefits should be undertaken, and by whom.

The Indigenous Carbon Industry Network indicated that full membership of their organisation could be used to verify Indigenous provenance claims associated with a carbon project.

AGL noted that co-benefits should be recognised, measured and quantified in a similar way to international voluntary carbon offsets so that they are officially recognised and verifiable. Similarly, S&P Global suggested developing co-benefit labels similar to Verra, which offers labels such as the Climate, Community and Biodiversity (CCB) Standards for 'quality' land-based projects.

GreenCollar said that the linking of measured and verified non-carbon benefits presents a significant opportunity to support improved transparency and understanding about the operations and benefits of carbon projects.

Some stakeholders noted the challenges and complexity of verifying and standardising co-benefit information, particularly where there is complex evaluative material about projects and their socio-economic benefits. Others noted the provision of co-benefit information should be optional and that co-benefits should not be associated with ACCUs to avoid complicating the function and value of ACCUs.

Interoperability and connectivity with external digital platforms

We asked stakeholders what types of digital platforms and marketplaces would be useful to connect directly to the registry, the criteria that should guide their connection and the type of registry data that would be available and accessible when connecting directly.

Stakeholders said that broker platforms, digital marketplaces and companies with their own internal systems should be able to directly connect with the registry for ease of access to data and information. APIs should make transacting more seamless and efficient, including allowing for real time reconciliation and retirement and/or surrender of units, and visibility of certificate data and metadata.

A major financial institution said a direct connection from custodial platforms would be considered a key benefit and provide efficiencies when establishing holding accounts in the name of custodian clients. A direct connection to approved markets and custodians would be expected to provide efficiency and timeliness when effecting conversions to and from the underlying units or certificates.

Woodside Energy noted that ACCU project and contract registry information should be made accessible within the Registry and accounts should be able to connect with enterprise resource planning software to support inventory management and reporting requirements.

Stanwell proposed API access for participants should enable segregation of duties between teams and individuals within an organisation so that an organisation can assign either read only or both read and write access to the Registry via the API.

Most stakeholders raised the importance of the fit and proper person test and ensuring there are appropriate screening, IT security and data reliability checks and processes in place before entities gain direct access to the Registry. We will ensure that any interoperability and connectivity to the new registry is consistent with all Clean Energy Regulator legislative and IT security requirements.

Proposed Exchange-trading model

We asked stakeholders their views on the need for a central carbon exchange; the feasibility of a proposed carbon exchange model that traded a beneficial interest of an ACCU; two potential options for listing ACCU classes on the exchange; how to manage the cycling of ACCUs off and onto the exchange; and whether the proposed exchange model would complement the over the counter (OTC) market.

Market need for a central carbon exchange

The majority of submissions were supportive of a central carbon exchange and see a market need for it to support liquidity, transparency and price discovery. Stakeholders also agreed a carbon exchange would complement rather than replace the existing OTC market, with most stakeholders acknowledging the OTC market would continue to facilitate trades for buyers who have specific needs and for sellers who are seeking to sell their ACCUs at a premium. Financial institutions and entities noted a central exchange should include a clearing and settlement process.

The Business Council of Australia observed the exchange trading of carbon market units could be a valuable tool to help business address unpredictability, but only if it complemented and enhanced the existing OTC and new environmental futures markets.

A stakeholder based in the EU advised that about 90% of EU secondary market trades are executed on regulated exchanges and subsequently cleared by the connected clearing house. Only a small part of the market is traded OTC with many regulated exchanges operating and providing access to the trading of carbon offsets. Having multiple, regulated exchanges and platforms fosters innovation and competition.

A few stakeholders noted the existing OTC markets are serving the markets' needs well and an alternative option to an exchange would be the collection of price data and publishing de-identified trade level data from the Registry.

Design features – trading a beneficial interest or CHESS Depository Interest (CDI)

Stakeholders acknowledged that the existing legislative limitations and the need to balance market liquidity, fungibility and ACCU transparency considerations present challenges in developing a carbon exchange market model with a licenced clearing and settlement facility.

The carbon exchange model proposed in the consultation paper was designed to operate within the current *Carbon Credits (Carbon Farming Initiative) Act 2011* (CFI Act), *Australian National Registry of Emissions Units Act 2011* (ANREU Act) and *National Greenhouse and Energy Reporting Act 2007* (NGER Act), and provisions and the requirements for licensed markets clearing and settlement facilities, without the need for significant legislative amendments.

Due to the legislative constraints preventing ACCUs from leaving the registry and the requirement that a clearing and settlement facility controls movement of assets traded on the exchange for settlement purposes, the model proposes the exchange-trading of a beneficial interest in an ACCU. The CDI is an existing mechanism that allows the exchange trading of interests in bonds and international shares and would enable the trading of beneficial interest in an ACCU on the exchange without the need to open an Australian National Registry for Emissions Units (ANREU) account.

The Australian Financial Markets Association (AFMA) considered the proposed exchange model to be operationally sound and developed on a proven approach that has been successfully used for other financial products. AFMA also noted that the approach also benefits from being able to rely on the well-established Australian regulatory framework for listed products.

Many stakeholders noted challenges and issues with the proposed approach of transmuting ACCUs into CDIs because of the lack of visibility of the underlying ACCU and its attributes. These stakeholders are seeking specific ACCUs driven by their methodologies and project attributes to ensure they are aligned with their carbon offset strategies, risk appetite and due diligence thresholds and shareholder interests.

- For some of these respondents the challenges noted above would limit their use of an exchange trading model from both a seller and buyer perspective, where there is limited visibility on specific project methods and/or project attributes. Some project proponents are looking to differentiate their ACCUs and seek a premium and conversely some buyers are looking for specific ACCUs. In these cases, the OTC market is a preferred option.
- For other respondents with concerns about the lack of visibility of the underlying ACCUs, their concerns may be able to be addressed within the CDI model by expanding the number and nature of classes in the exchange trading model, if that were to be feasible. The number and nature of classes is discussed further below.

The Australian Industry Greenhouse Network reported a wide diversity of views from members with some indicating they would potentially purchase up to 100% of their ACCU requirements from an exchange and others who would not use an exchange at all.

A project proponent stakeholder advised they would use the proposed carbon exchange as they anticipate selling a significant volume of ACCUs within the next decade.

A financial institution suggested a possible alternative to the proposed exchange trading model would be to tokenise the ACCUs and enabling the trading and settlement via infrastructure that supports tokenisation and digital ledger technology and smart contracts.

Design features – Listing categories (generic vs carbon sequestration and emissions avoidance)

For stakeholders supporting the proposed exchange trading model, there was equal support for the options of a single (generic) listing and listing two classes (carbon sequestration and emissions avoidance). Stakeholders who were supportive of a single listing noted this would provide fungibility and liquidity. Stakeholders who supported bifurcation noted this provided some level of transparency and information to the market on the types of ACCUs that are being traded.

One stakeholder noted that the split between carbon sequestration and emissions avoidance would likely cause further confusion in the market. While the price of each class will be based on the value assigned by market participants, they also expressed concern this option could potentially send a market signal that emissions avoidance ACCUs are lesser quality than sequestration ACCUs.

The Carbon Market Institute supported multiple classes, preferring more than 2, and suggested the listings be linked to methods or use asset classes used on the OTC market (e.g. Generic, Generic No Avoided Deforestation, Human Induced Regeneration) to avoid confusion and align with commonly used market descriptions. However, the ASX has advised too many listing categories can impact liquidity.

Managing the cycling of ACCUs and interaction with the OTC market

There were mixed views about whether ‘cycling’ of ACCUs on the exchange would likely be problematic. Cycling describes the process where if a holder is not satisfied with the ACCU that has been allocated to them under a system-generated process that converts the CDI back into an ACCU. They therefore cycle through the conversion process until they obtain an ACCU with the qualities that they are seeking.

Some stakeholders suggested disincentivising cycling through imposing fees while other stakeholders noted disincentives would be counter to the free market operation of the exchange.

One stakeholder suggested that having a generic listing on the exchange would avoid the issue of cycling on the exchange.

Next steps

Given the support for interoperability expressed in the submissions, we will be focusing on:

1. interoperability and connectivity with external account holder systems and trading platforms
2. transferring ACCUs from the existing ANREU system into the new registry, as this is a critical foundation for further interoperability.

Interoperability, connectivity and ACCU migration

The robust migration of ACCUs requires careful management. An important aspect of this process is designing the most logical structure for the provision of information via API, including determining the immutable attributes associated with an ACCU at the time of issuance, as well as the provision of up-to-date ACCU project information.

We will continue target consultation to finalise this design, as well as further consideration and assessment of the functions and features suggested by stakeholders. This will inform scoping of a draft 'registry roadmap' outlining prioritised features and functions for stakeholder feedback. Prioritisation and assessment will require careful feasibility assessment of our legislative framework, market regulations and security verification needs, and our available resources. At this stage we expect to provide a draft roadmap around September 2025.

Given the diversity of views on co-benefits information inclusion and verification, this workstream is likely to require more in-depth consultation prior to inclusion in the draft roadmap. We will continue targeted consultation on potential options on the inclusion of co-benefits information and the approach to verification, and will provide a further update ahead of the draft registry roadmap.

We expect the ACCU migration to be finalised in early 2026 and we will also be working on Renewable Energy Guarantee of Origin, Product Guarantee of Origin and Nature Repair Market certificates later this year. We will progressively update likely dates during 2025.

Exchange trading

The majority of stakeholders see an important role for exchange trading, but there was a real diversity of views around the number and nature of ACCU classes, and some suggestions of alternatives to the CDI model. As such, the proposed model with the approaches to categorisation (either a single class, or the 2-class model with sequestration and emissions avoidance ACCUs) will not be further prioritised at this point. We will consider alternative platforms and other potential options for exchange trading (including expanded listing classes), over the course of 2025. We will provide further updates and consult on any alternatives once this work is further developed.

As outlined in the consultation paper, the exchange trading model is not intended to be the only solution for the trading of ACCUs. Even with an effective exchange, the OTC market would still play an important role in facilitating trades for ACCUs, particularly for those seeking to trade in ACCUs with specific attributes.

An effective carbon exchange would complement rather than substitute for the OTC market and associated online marketplaces.

Appendix A: lists of submissions and consultation engagements

Public submissions are available on our website and were received from:

- AGL Energy
- ALFA NT Limited
- Australian Financial Markets Association
- Australian Forests Products Association
- Australian Industry Greenhouse Network
- BeZero Carbon
- Business Council of Australia
- Carbon Market Institute
- GreenCollar
- Indigenous Carbon Industry Network
- Kimberley Land Council
- Midway Limited
- Minerals Council of Australia
- National Stock Exchange
- NSW DCCEEW
- Origin Energy
- S&P Global
- Stanwell
- Tim Kelly
- Westpac
- Woodside Energy

Consultation engagements

Date	Stakeholder
16 October 2024	Australian Industry Greenhouse Network
22 October 2024	Carbon Market Institute – Investor Working Group
24 October 2024	Indigenous Carbon Industry Network
6 November 2024	Clean Energy Regulator Open Virtual Roundtable Discussion (open to all registered participants)
8 November 2024	Australian Financial Markets Association
12 November 2024	Clean Energy Regulator Open Virtual Roundtable Discussion (open to all registered participants)
14 November 2024	National Carbon Farming Reference Group
18 November 2024	Australasian Investor Relations Association ESG Committee
19 November 2024	Clean Energy Regulator Open Virtual Roundtable Discussion (open to all registered participants)
20 November 2024	Climate Change Authority