

# Green Rules of Origin (G-ROO) under the IA-CEPA

**A submission to DFAT regarding the IA-CEPA General Review prepared by  
TradeWorthy and the Centre for International Policy Studies (CIPS)**

## 1. Executive Summary

Since entering into force in 2020, IA-CEPA has supported a significant expansion in Indonesia-Australia bilateral trade, with goods trade increasing from around A\$10 billion to over A\$17–18 billion by 2023.

At the same time, our analysis shows that **carbon embodied in bilateral trade has increased alongside this growth**, reflecting the concentration of trade in energy- and materials-intensive sectors such as metals, chemicals and industrial inputs. As global markets increasingly assess the emissions intensity of traded goods, this creates a clear need to align future trade growth with lower-emissions production.

**Green Rules of Origin (G-ROO)** offer a practical way to do this. By introducing an additional pathway for preferential treatment based on **substantial transformation with measurable reductions in emissions intensity**, G-ROO would link existing trade preferences under IA-CEPA with incentives for cleaner production. This would encourage firms to invest in lower-carbon technologies, retool manufacturing processes, and strengthen lower-emissions supply chains between Australia and Indonesia. G-ROO would also align with new and emerging policies on industrial decarbonisation in both Australia and Indonesia.

Importantly, G-ROO could be introduced as a **targeted extension of existing rules of origin**, without disrupting the current IA-CEPA ROO framework, and could be implemented incrementally — for example through sectoral pilots in intermediate goods such as metals.

**There is a clear opportunity to progress this concept through the IA-CEPA review process by placing G-ROO on the bilateral agenda for further exploration**, supported by targeted scoping work, technical engagement between officials, and early pilot applications in priority sectors. TradeWorthy and the Centre for International Policy Studies are already undertaking detailed work in this area and would welcome the opportunity to support further engagement with both governments.

## 2. Trade Growth and Embodied Carbon in Bilateral Trade

IA-CEPA has contributed to a significant expansion of bilateral goods trade. As shown in Figure 1, trade has increased sharply since the agreement entered into force in 2020, rising from approximately A\$10 billion to over A\$18 billion by 2023. While this reflects, in part, a rebound from pandemic-related disruptions, trade levels now sit well above pre-IA-CEPA levels, indicating a structurally stronger and more integrated bilateral trading relationship.

Intermediate goods (inputs used in manufacturing and industrial processing) have grown at a **more moderate pace than total goods trade**, suggesting that the depth of **supply chain integration between**

Australia and Indonesia is not expanding at the same rate as total goods. This informs part of this submission’s proposed approach, discussed later.

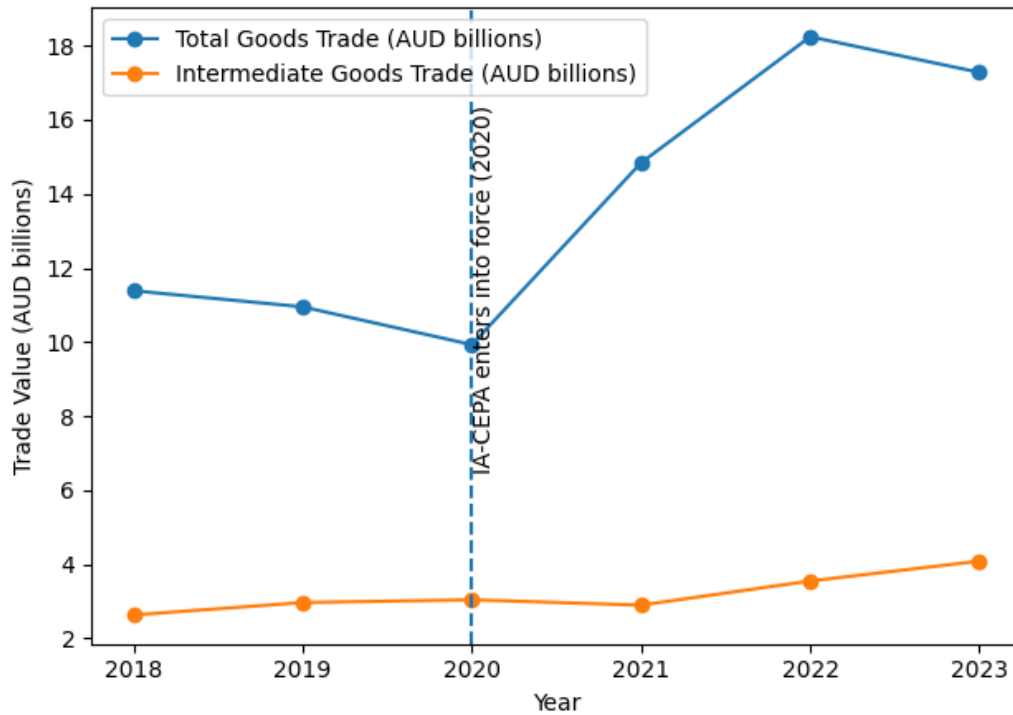


Figure 1. Australia-Indonesia Goods Trade vs Intermediate Goods Trade. Source: TradeWorthy/CIPS analysis of bilateral trade data.

At the same time, our modelling indicates that **carbon embodied in bilateral trade has increased in parallel with this growth in goods trade** (Figure 2). As trade volumes have expanded, particularly in energy-and materials-intensive sectors, the emissions embedded in traded goods have also risen.

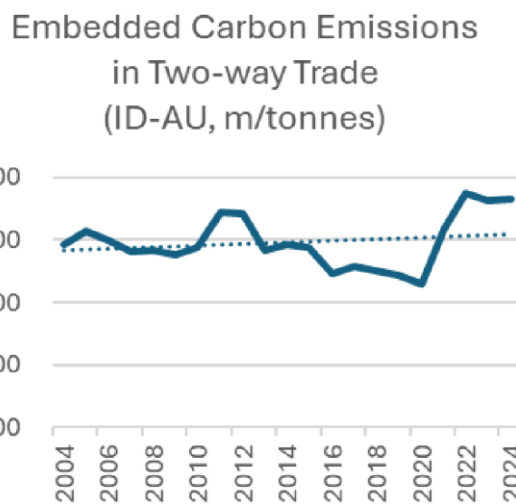


Figure 2. Carbon Embodied in Indonesia-Australia Two-Way Trade. Source: TradeWorthy/CIPS modelling by Pragmatic Policy Group

This dual trend is important. While IA-CEPA has undoubtedly expanded trade, it has also **scaled the carbon footprint of Australia-Indonesia supply chains**. This reinforces the importance of addressing emissions intensity within FTA-related trade flows, including IA-CEPA. In other words, the agreement is already shaping *where* production takes place, but could be doing more to support *how* that production occurs from an emissions perspective.

Embedding a mechanism within IA-CEPA that supports **lower-carbon production across bilateral supply chains** would help ensure that future trade growth is directly aligned with lower-emissions industrial development.

### 3. Green Rules of Origin (G-ROO) in the context of IA-CEPA

Under IA-CEPA, preferential origin is determined through product-specific rules based primarily on **Change in Tariff Classification (CTC), Regional Value Content (RVC), or specified processing requirements**. These rules ensure that goods benefiting from preferential tariffs have undergone sufficient production within Australia, Indonesia, or both. In practice, they play a central role in shaping how firms organise production, source inputs, and structure supply chains across the bilateral relationship.

However, current rules of origin focus on **where production occurs**, when they could easily be **augmented** to consider **how production takes place**. They could better distinguish between production processes that are more or less emissions-intensive, even where the final product is identical.

Green Rules of Origin (G-ROO) would build on this existing framework by introducing a **complementary, optional pathway** for conferring origin. Rather than replacing existing rules, G-ROO would operate as a **supplementary “green pathway”**, allowing producers to qualify for preferential treatment where they can demonstrate that production has achieved a defined reduction in emissions intensity relative to a benchmark for that product.

In practical terms, this would involve:

- retaining existing CTC, RVC and process-based rules unchanged
- introducing a **product-specific emissions intensity benchmark** (based on existing international standards)
- allowing origin to be conferred where a producer demonstrates substantial transformation that achieves a **verified reduction in emissions intensity** relative to that benchmark.

This approach maintains the integrity of the IA-CEPA framework while introducing a targeted incentive for lower-carbon production.

A simplified example illustrates how this could operate. Consider the production of **aluminium cables** (HS Code 7614.90) in Indonesia using imported aluminium wire (7605.11 or 7605.90). Under existing IA-CEPA rules, the processing undertaken in Indonesia would not be sufficient to meet the relevant CTC thresholds, which excludes the use of imported aluminium wire, meaning the final product would not qualify for preferential tariff treatment when exported to Australia.

Under a G-ROO approach, the same product could qualify for preferential treatment if the Indonesian manufacturer demonstrates that the production process – for example, through the use of renewable

electricity, improved energy efficiency, or lower-carbon inputs – achieves a specified reduction in emissions intensity relative to a defined benchmark for aluminium products. In this way, the rule recognises a “**sustainable substantial transformation**” in Indonesia, even where the traditional origin threshold is not met.

This mechanism would directly link trade preferences with **production choices**, creating a commercial incentive for firms to invest in cleaner technologies and lower-carbon processes. It would support:

- **domestic investment** in lower-emissions manufacturing in both Australia and Indonesia
- **bilateral investment and technology partnerships**, including FDI into lower-carbon industrial processes
- stronger positioning of firms in **global markets increasingly sensitive to embodied carbon**.

Importantly, G-ROO could be implemented through **relatively modest textual additions** to IA-CEPA — for example, through supplementary provisions within product-specific rules or a dedicated annex — without requiring structural changes to the agreement. TradeWorthy and CIPS have developed **illustrative drafting language** demonstrating how such an approach could be incorporated in a clear and administratively workable manner.

#### 4. Alignment with Existing ROO Principles and Architecture

G-ROO would be consistent with the way ROO have evolved in modern trade agreements, **particularly those to which Australia is a party**. Australia has supported approaches that allow origin rules to be adapted to broader policy objectives, where this can be done without undermining their integrity.

A clear example is the treatment of **remanufactured and recovered goods** in agreements such as those with the **United States**, the **United Kingdom**, **Singapore**, and the Comprehensive and Progressive Agreement for Trans-Pacific Partnership (**CPTPP**). These agreements recognise that goods incorporating recovered materials, or goods that have been remanufactured to meet equivalent performance standards to new products, can qualify as originating, even where they do not meet traditional origin tests based solely on the location of initial production.

These provisions demonstrate that origin rules can be **expanded in a targeted and practical way** to support policy objectives (in this case, circular economy outcomes) while remaining administratively workable and consistent with existing trade disciplines.

G-ROO would apply the same principle in the context of emissions, introducing a **complementary pathway** that recognises lower-carbon production while preserving the existing ROO framework.

#### 5. Alignment with Australian and Indonesian Policy Priorities

For Indonesia, long-term development planning emphasises the transition toward a green economy, industrial downstreaming and stronger export competitiveness. Policies under the RPJPN 2025–2045 and RPJMN 2025–2029 highlight the importance of higher-value manufacturing, circular economy principles and lower-carbon industrial energy systems. In addition, Indonesia will shortly release its **New National Strategy for Industrialisation (SBIN)** that includes a focus on green industry. One of SBIN’s main focuses is creating “green incentives” to encourage industrial transformation toward sustainable production.

For Australia, initiatives such as the Future Made in Australia agenda seek to strengthen domestic industrial capability while supporting clean manufacturing and resilient supply chains.

A bilateral mechanism that rewards lower-carbon production could support both policy agendas by encouraging investment in cleaner technologies and enabling deeper collaboration between Australian and Indonesian firms.

Over time, the proliferation of G-ROO across regional trade agreements will reinforce lower emission sourcing across multi-country supply chains. For example, green steel made in Australia used in Indonesian specialty vehicle production for eventual export to the EU.

## 6. Sectoral Pilot Opportunities

One practical pathway for exploring Green Rules of Origin would be through sectoral pilot applications. TradeWorthy and CIPS are currently examining pilot sectors in **intermediate goods** – particularly metals and related industrial inputs – where emissions intensity improvements are measurable and supply-chain linkages between Australia and Indonesia are already well established.

A phased sectoral approach would allow both governments to evaluate the concept gradually, test verification methods and assess industry uptake before considering broader implementation.

## 7. Way Forward

As global markets increasingly assess the carbon intensity of traded goods, there is an opportunity for IA-CEPA to support lower-emissions industrial supply chains.

We propose that the concept could be progressed through **practical, low-risk steps**, including:

- placing G-ROO on the **IA-CEPA General Review agenda for further exploration**
- undertaking a **targeted bilateral scoping study**
- convening a **technical dialogue between officials**
- exploring **sectoral pilot applications**, particularly in intermediate goods such as metals

This phased approach would allow both governments to assess feasibility in a practical, evidence-based way, without requiring immediate legal change.

**TradeWorthy and the Centre for International Policy Studies would welcome the opportunity to support this process and share the findings of our ongoing work.**

### About Us

**TradeWorthy** is an international trade and investment advisory firm specialising in trade policy, the digital economy and sustainable economic development.

The **Center for Indonesian Policy Studies (CIPS)** is an independent, non-profit and non-partisan think tank that advocates for practical policy reforms informed by evidence-based policy research and analysis.