

POLICY POSITION

Product stewardship for solar photovoltaic (PV) systems



SUMMARY

There is an escalating solar PV panel waste crisis looming. Australia faces a reuse export market collapse, increased panel decommissionings, environmental and social impacts and a recycling industry on the brink of survival.

However, Australia's renewable energy sector has an appetite to close the loop on solar circularity and uplift social license. Through recovery of solar PV panels, Australia has an opportunity to reclaim mineral sovereignty, promote job and industry creation and domestic manufacturing uplift all while aligning to 'Future Made', net zero, circular economy and environmental policy.

FACTS

2016	Solar PV systems are placed on the Minister's Product Stewardship Priority List.
2020	The Federal government announced a partnership to develop and implement an industry-led product stewardship scheme to manage end-of-life PV systems by 2023. This was not actioned.
2022	Minister for the Environment and Water, announced Government's intent to develop a regulated product stewardship scheme for e-products including PV systems.
2023	DCCEEW released a discussion paper with a proposal for a regulated product stewardship scheme for PV systems.
2024	DCCEEW released Australia's Circular Economy Framework with a goal to double Australia's circularity rate by 2035 and a target (3) of recovering 80% of Australia's resources.
2024	Smart Energy Council (SEC) with support from the QLD Government, launched the largest solar panel collection pilot in the southern hemisphere, creating a recycling ecosystem in Queensland.
2025	The Productivity Commission released an interim report with reform direction 9.4 stating the Productivity Commission supports the Australian Government's intention to establish a co-regulatory product stewardship scheme for solar PVs.
Aug 2025	No scheme has been introduced, and no further announcements have been forthcoming.

VISION

A national mandatory product stewardship scheme for solar PV panels in Australia

RESOURCES

- Partnership Call: Product Stewardship Scheme for Photovoltaic Systems. (2020) DCCEEW. Available at <https://www.dcceew.gov.au/environment/protection/waste/product-stewardship/national-product-stewardship-investment-fund/partnership-call-product-stewardship-photovoltaic-systems>
- Wired for change: Regulation for small electrical products and solar photovoltaic system waste. (2023) DCCEEW. Available at <https://consult.dcceew.gov.au/regulation-small-electrical-products-solar-pv>
- Australia's Circular Economy Framework. (2024) DCCEEW. Available at <https://www.dcceew.gov.au/sites/default/files/documents/australias-circular-economy-framework.pdf>
- Australia's circular economy: Unlocking the opportunities. (March 2025) Productivity Commission, Australian Government. Accessed Aug 2025. Available at <https://www.pc.gov.au/inquiries/current/circular-economy/interim/circular-economy-interim.pdf>
- Future Made in Australia Supporting Paper. (2024) Treasury, Australian Government. Available at <https://treasury.gov.au/sites/default/files/2024-05/p2024-526942-fmia-nif.pdf>

MESSAGING

Reuse Market Collapse Until October 2024, Australia exported up to 80% of its decommissioned solar panels for reuse due to rapid price deflation of new panels. Australia must now manage this growing domestic waste stream with insufficient capacity.

Growing Environmental and Social Costs Without a coordinated national solution, the consequences are escalating:

- Installers and households are stockpiling panels due to a lack of affordable and accessible disposal options.
- Reports of illegal dumping in regional and rural areas are increasing.
- Crude de-framing for small amounts of aluminium is occurring, leading to pollution and the loss of more valuable materials.

The Recycling Industry is on the Brink Australia's recycling industry has invested in world-class technology capable of **95%+ material recovery**, but it is on the verge of collapse.

- **A Logistics Trap:** The cost of transporting panels to a recycling facility is far greater than the cost of sending them to a local landfill, making the environmentally superior option uneconomic.
- **No Feedstock, No Future:** Without a steady, reliable supply of panels—which this pilot would provide—recyclers cannot achieve economies of scale. They are shutting down, risking the permanent loss of jobs, sovereign capability, and investor confidence.

Alignment with Federal Government Priorities a national stewardship scheme for solar pv panels is directly aligned to the Federal Government's core objectives.

- **“Future Made in Australia”:** It protects and grows domestic capability in critical minerals recovery, supports local manufacturing with recovered materials, and alone, a pilot would leverage an **\$830M resource recovery opportunity**.
- **Net Zero & Circular Economy:** It ensures full lifecycle accountability for solar technologies and prevents pollution from improper disposal.
- **Environmental Protection:** It provides an immediate, practical solution to illegal dumping and stockpiling, protecting urban, regional, and rural landscapes.
- **Social License for Renewables:** It restores public trust in rooftop solar by guaranteeing a responsible end-of-life solution for their investment.

POLICY RECOMMENDATIONS

The Smart Energy Council proposes the Australian government should announce a formal commitment to introduce a mandatory product stewardship scheme for solar PVs with a start date of 1 July 2027 (or possibly 1 January 2028).

The Australian government should consult further on the design of the scheme and prepare the necessary legislation for introduction to the Parliament.

In the period between announcement and introduction, SEC proposes the Australian government fund a National Solar Panel Recycling Pilot. The pilot would be modelled on that successfully run by the Queensland government. The pilot would address data gaps, test delivery of collection and recycling to inform scheme design and help manage long-term viability risks of a mandatory scheme.

MORE INFORMATION

More information is available from the Smart Energy Council via:

David McElrea
Chief Advocacy Officer
david@smartenergy.org.au
0432 885 158

Darren Johannesen
Executive General Manager - Sustainability
darren@smartenergy.org.au
0467 928 035

THE INDEPENDENT BODY FOR THE SMART ENERGY INDUSTRY IN AUSTRALIA

PO BOX 231, MAWSON ACT 2607
INFO@SMARTENERGY.ORG.AU
SMARTENERGY.ORG.AU
ABN 32 006 824 148

**PUTTING ENERGY
INTO ACTION**