

SUBMISSION: TE PANONI I TE HANGARUA: TRANSFORMING RECYCLING

Engineering New Zealand Te Ao Rangahau (formerly IPENZ) is New Zealand's professional home for engineers. We are New Zealand's strongest and most influential voice on engineering issues, with more than 22,000 members who want to help shape the public policy agenda and engineer better lives for New Zealanders.

This submission responds to the Ministry for the Environment's (MfE) March 2022 Te Panoni I te hangarua Transforming Recycling (consultation document).

Engineering New Zealand Te Ao Rangahau is the membership body and professional home for engineers in Aotearoa. Engineers help shape society; they design and drive the technology and systems we use every day, including across the waste sector.

When the consultation document was released, we requested feedback from members. This submission summarises the feedback we received. Our submission is short, signalling our general support for the proposals and raising further thoughts regarding construction waste.

WE SUPPORT THE PROPOSALS

We are supportive of the policies outlined and commend MfE for the work done to date in developing this detailed and well-considered document. Improving Aotearoa's recycling system and increasing resource efficiency is a core component of our transition to a low-emission and circular economy.

Part 2 – Improving Household Kerbside Recycling

We support proposals to standardise, improve and increase trust in the kerbside recycling system across Aotearoa. The current performance of the system has demonstrated that national consistency will not be achieved without regulation. We support the separation and collection of food waste to help reduce methane emissions in the waste sector. Councils already play a role in kerbside collection, and it is our view that food scraps collection should be included in this work to divert it from landfills. Likewise, Councils could and should also play a role in diverting household garden waste from landfills.

Part 3 – Separation of Business Food Waste

We support the proposal to require businesses to divert food waste from landfills as part of their role in reducing emissions and shifting Aotearoa to a circular economy.

Across all proposals, we support phasing implementation, based on access to suitable processing facilities and with the expectation that business and councils already having access to facilities should comply sooner. Based on our understanding of the timeframes required to develop new infrastructure, including resource consent and construction, we believe the allocated timeframes could be tightened. Especially given that the standardisation and strengthening of recycled materials included in Part 1 and 2 will ensure adequate supply of materials to make the facilities economically viable.

CONSTRUCTION WASTE

In addition to the existing proposals, we think there is a clear opportunity to extend these system improvements to the construction sector. Construction and demolition are key sources of waste making up 40-50% of Aotearoa's total waste.¹ 80% of this goes to cleanfills and 20% to landfills, much of which is unnecessary and, through sorting, could easily be reused and recovered, contributing to a more efficient and circular economy.²

Waste from new builds

When a new building is built it is done in stages. The skips are normally filled with a common material at different points of the build, for example:

- Timber offcuts when framing and roofing framing occurs
- Weatherboard offcuts or bricks during cladding stage
- Timber and plasterboard (commonly gib) offcuts when internally building.

These are succinct stages during a building project and they are commonly key materials we could target for a recycling solution in the commercial building sector.

Heat pump and air con disposal

We recommend all domestic/residential DX split (heat pump/air con) suppliers should have an approved disposal program. The major components to disposal are:

- the refrigerant to be vacuumed from the units,
- the condenser coils (copper & aluminium),
- the casings, and
- the compressors.

All components use recyclable material that can and should be managed. Some of the key brands in Aotearoa are already capable of this, others are more focused on importing as much as they can and selling it without considering the consequences – this mindset needs to change.

¹ Level. (28 February 2022). *Material Use – Minimising waste*. <https://www.level.org.nz/material-use/minimising-waste/>

² BRANZ. (n.d.) *Reducing building material waste*. <https://www.branz.co.nz/sustainable-building/reducing-building-waste/>

ENERGY AND EMISSIONS OF WASTE SECTOR

It is important that the infrastructure and systems supporting the implementation of these proposals (and our recommended construction recycling system) are climate resilient and low carbon. Our transition to a circular economy will only be successful if it aligns with our transition to a net zero economy and avoids maladaptation. New and existing infrastructure should be electric wherever possible to make use of our renewable energy capabilities. Location and transportation will likewise be important factors to consider when designing the updated recycling system.

CONCLUSION

Thank you for the opportunity to provide feedback on *Te panoni i te hangarua Transforming recycling*. Te Ao Rangahau is supportive of the proposals outlined and encourages MfE to expand its scope and ambition for transitioning Aotearoa to a low-emissions and circular economy.

If there are technical queries we can assist with as the updates are finalised, please do not hesitate to contact us.