

## **COMMUNITY LED RESOURCE RECOVERY AND CONSTRUCTION INDUSTRY WASTE REDUCTION UPDATE**

Department: Waste and Environmental Solutions

### **EXECUTIVE SUMMARY**

- 1 The establishment of three community-led resource recycling centres and enabling construction waste to be reduced, reused and recycled are action areas in the Zero Carbon Plan 2030.
- 2 This report updates Council on engagement undertaken with Ōtepoti Dunedin community organisations and groups, and additional research, on the establishment of community-led resource recovery hubs.
- 3 This report also updates Council on engagement with the construction and demolition industry and research undertaken to understand the scale of construction and demolition waste in Dunedin and waste minimisation opportunities in the sector.
- 4 Community engagement has been undertaken over the past 12 months, leading to the establishment of a network of local community organisations working in community-based waste minimisation, known as the Ōtepoti Waste Minimisation Network.
- 5 Engagement with the Construction and Demolition (C&D) industry has been undertaken over the past 12 months which has led to local case studies, networking opportunities and educational collateral being developed.

### **RECOMMENDATIONS**

That the Council:

- a) **Notes** the Community Led Resource Recovery and Construction Industry Waste Reduction Update

### **BACKGROUND**

- 6 The DCC has a responsibility under the Waste Minimisation Act 2008 (WMA) to 'promote effective and efficient waste management and minimisation' and must have a waste management and minimisation plan (WMMP).
- 7 The current (2020) Waste Minimisation and Management Plan has been revised and updated. The revised draft WMMP was presented to Council at its meeting of 30 October 2024 seeking approval for public consultation –

*Moved (Cr Jim O'Malley/Cr Kevin Gilbert):*

*That the Council:*

- a) **Approves** the proposed draft Waste Management and Minimisation Plan 2025 for public consultation, following a Special Consultation Procedure.
- b) **Approves:** The proposed draft Waste Management and Minimisation Plan 2025 to be publicly consulted on alongside the 9 Year Plan.
- c) **Authorises** the Chief Executive to make any minor editorial changes to the draft Waste Management and Minimisation Plan 2025 and associated consultation documents.
- d) **Decides:**
  - i) To publicly consult on the proposed draft Waste Management and Minimisation Plan 2025.
  - ii) To appoint members to a hearings panel for the public consultation.
  - iii) If any further amendments should be made before the draft WMMP 2025 is presented for public consultation.
- e) **Notes** the Summary of Information, Summary of Engagement, Statement of Proposal, Consultation Method, the submission feedback form, and drop-in schedule which are attached to this report, and will be used as part of the public consultation. The Otago Regional Waste Assessment 2023 will be notified with the Statement of Proposal.

#### **Division**

*The Council voted by division*

**For:** Crs Bill Acklin, Sophie Barker, David Benson-Pope, Christine Garey, Kevin Gilbert, Carmen Houlahan, Marie Laufiso, Cherry Lucas, Mandy Mayhem, Jim O'Malley, Steve Walker, Brent Weatherall, Andrew Whiley and Mayor Jules Radich (14).

**Against:** Cr Lee Vandervis (1).

**Abstained:** Nil

*The division was declared CARRIED by 14 votes to 1*

#### **Motion carried (CNL/2024/193)**

- 8 The draft WMMP has specific focus areas, including one on community-based resource recovery and one on the reduction of construction and demolition waste. The draft WMMP incorporates feedback from the initial direct stakeholder engagement, plus waste minimisation actions that are identified in DCC's Zero Carbon Plan.
- 9 The DCC's Zero Carbon Plan 2030 was adopted by Council in 2023. A key Shift in the Zero Carbon Plan is to "*Divert more waste from landfill*". It identifies actions relating to resource recovery, resource circularity and collaborative action with community.
- 10 The Zero Carbon Plan states that the "DCC will partner with communities to initially establish three community led resource/recycling centres and to investigate the feasibility of establishing

a wider network". It also states that the "DCC will develop a central city location for recyclable materials and sale of diverted items (rummage store)".

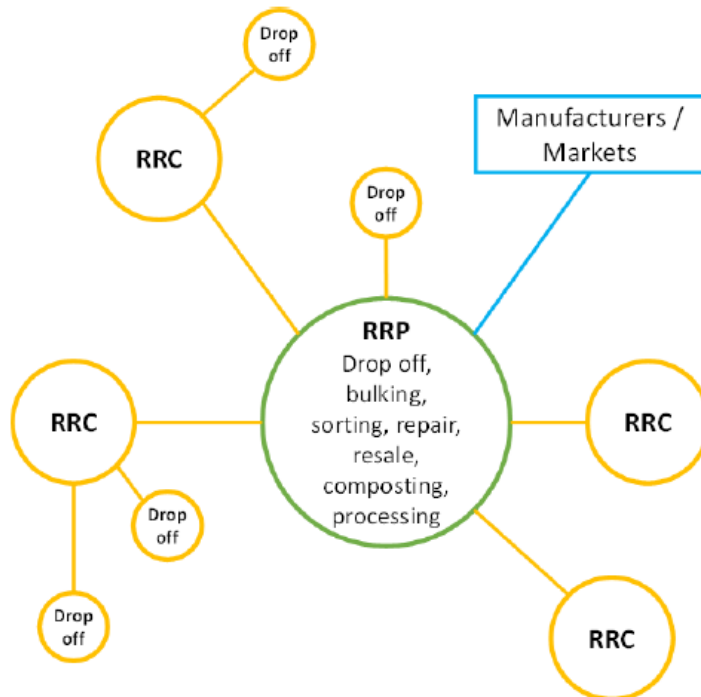
- 11 Further, the Zero Carbon Plan states that the *"DCC will support design, demolition, and construction industries to reduce waste. The DCC will also work to increase the city's ability to store, process, and reuse construction and demolition waste"*.
- 12 To progress these actions, in 2023 two fixed term positions were created. One is to engage the community to gain an understanding of the community's aspirations regarding community-led waste minimisation and resource recovery, explore current local approaches and research existing models locally and nationally for best practice examples. The other role is focussed on connecting and engaging with construction industry stakeholders, to highlight and disseminate good practice, and to identify and support actions and solutions. through development of a detailed business case.
- 13 This information will be used to prepare a costed Business Cases for a) the establishment of up to three community based and community led Resource Recovery Centres, and b) initiatives to support C&D waste reduction and diversion and identification of facilities and infrastructure required to enable the C&D sector to meaningfully reduce waste.

## **DISCUSSION**

### **Community led resource recovery**

- 14 A solid waste audit was undertaken in 2022 to help inform an Otago Regional Waste assessment. The assessment found there are opportunities to improve waste minimisation in the city through partnership with community-based resource recovery.
- 15 The Waste assessment 2022 proposes a "hub and spoke" network of Resource Recovery Centres (RRC) linked to Resource Recovery Parks (RRP) as the ideal model, as shown in Fig 1. below.

**Figure 11: Network of Resource Recovery Centres Linked to Resource Recovery Parks**



- 16 As part of the Waste Futures project, construction and commissioning of a Resource Recovery Park (RRP) at Green Island has commenced. In this model, the RRP is at the centre of the network. RRCs form the primary nodes where most of the material is dropped off and consolidated locally.
- 17 Nationally, many RRCs start off as local transfer station sites that are upgraded and re-purposed to have a predominant focus on resource recovery. RRCs are often run by the community and serve to engage, educate, and empower the local communities to not only recover materials but extract and apply the value of those materials for community benefit. A successful local example is the One Coast RRC based at the Waikouaiti transfer station.
- 18 Community-led resource recovery can have other benefits such as job creation and strengthened community networks and social cohesion.

#### Progress to date

- 19 Since November 2023, the following activity has been undertaken:
  - In person meetings with a wide variety of local Ōtepoti Dunedin based community groups and waste minimisation related organisations to understand how they work, what challenges, opportunities, and requirements they have. Additionally, meeting with local funding representatives to socialise community-led responses to waste minimisation.
  - Participation workshop with 25 groups and organisations represented.
  - Individual meetings with a variety of organisations to understand how RRCs operate and understand example models nationally, plus desktop research conducted on existing operational models elsewhere in New Zealand.

- A network building hui in May, with over 45 attendees. This hui provided an opportunity for presentations, followed by visioning exercises that led to the creation of the Ōtepoti Waste Minimisation Network (OWMN).
  - Regular OWMN newsletters created and distributed to the network sharing news, events, opportunities for collaboration and sharable content to disseminate to the wider community.
  - Ongoing liaison with groups providing advice for collaborative projects, guidance on waste minimisation practices, networking, and collaboration opportunities.
  - Establishment of a network working group of representatives from the OWMN.
  - Planning and implementation of a fortnightly podcast – ‘REthinking Waste – from recycling to resources in Ōtepoti Dunedin’. There have been 5 episodes broadcast, 10 pre-recorded with a total of 26 episodes over 12 months.
- 20 The themes that have emerged from the community engagement and research into what makes community based and community led RRCs successful include:
- affordable, accessible location
  - long-term funding and support partnership
  - developing capability and capacity of community-based staff
  - flexibility in operating model to respond to changing community need and new revenue stream opportunities
  - capacity to expand offering across all the Rs, i.e., recovery, recycling, reuse, repair, refill, plus education aimed at refuse and rethink
  - ability to capture and share waste diversion data to support DCC’s waste minimisation efforts
  - establishing a network of operators to share data, innovation and ideas and support.
- 21 The next phase of work is to collate all the data and community feedback gathered and use that to inform a costed-up Business Case for the establishment of up to three community based and led Resource Recovery Centres.
- 22 The Business Case will be presented to the Infrastructure Services Committee by the end of June 2025. This will also allow time for the feedback on the draft WMMP to be considered and incorporated into the Business Case.

### **Construction and Demolition industry waste reduction**

- 23 It has been estimated that 4.5 tonnes of material are wasted for every new residential build in New Zealand, which equates to a cost of over \$31,000 per home (2015 figures). Around 15% of materials arriving on site are likely to be wasted, whether through off-cuts arising from design decisions, or through over-ordering of components. Nationally, it is estimated that over 40% of all waste to landfill comprises construction and demolition (C&D) material.
- 24 To improve the reliability of data and evidence around C&D waste generation, disposal, and diversion, a national C&D waste baseline measurement and tracking methodology has been commissioned. The final report is due to be released by the Ministry of the Environment in early 2025 and will provide the evidence base for future national policy and regulatory work.

- 25 A solid waste audit was undertaken in November 2022 to inform the Otago Regional Waste Assessment. This indicated that a total of 57 tonnes currently classified as C&D waste is disposed of at Green Island landfill every week, of which around 72% is timber waste and 10% is rubble (including plasterboard).
- 26 Green Island only accounts for an estimated 15% of the total C&D waste to Dunedin landfills. The remainder goes elsewhere, including a privately owned C&D landfill at Burnside. Commercial data is not publicly available for privately owned and managed landfills.
- 27 The design for Resource Recovery Park at Green Island provides for a C&D sorting pad, with construction expected around 2026-27.

### **Progress to date**

- 28 Since November 2023, the following activity has taken place:
- On-going engagement with the local construction sector.
  - Engagement with national industry organisations and the tertiary sector.
  - Networking list of construction companies, architects, waste operators, retailers, and industry associations created.
  - Establishment of a dedicated C&D webpage.
  - A C&D breakfast event, with guest speakers from Naylor Love and Cook Brothers, which was attended by 30 people.
  - Terms of reference developed for a C&D cross-sector working group, which currently has 17 members. There have been two meetings of the working group, and a third is planned.
  - Ongoing liaison with council staff working on related projects.
  - Establishment of an internal staff advisory group to ensure a joined-up approach to C&D waste actions (building services, property projects, procurement), and synergies with the zero carbon investment plan and the building incentives project.
- 29 The next phase of work is to collate all the data and construction sector feedback gathered and use that to inform a costed-up Business Case to inform strategic investment in infrastructure required to support the reduction of C&D waste, and on-going support for the sector.
- 30 To assist in the creation of the business case, further trials and case studies are planned in collaboration with construction industry partners.
- 31 The Business Case will be presented to the Infrastructure Services Committee by the end of June 2025. This will also allow time for the feedback on the draft WMMP to be considered and incorporated into the Business Case.

### **OPTIONS**

- 32 As this is a noting report, there are no options.

### *Zero carbon*

- Diversion of waste is a Key- Shift in the Zero Carbon Plan.
- The establishment of up to three community-led Resource Recovery Centres is an Action Area in the Zero Carbon Plan.
- Support for design, demolition, and construction industries to reduce waste and for the DCC to increase the city's ability to store, process, and reuse construction and demolition waste is an Action Area in the Zero Carbon Plan.

## **NEXT STEPS**

- 33 Staff will prepare Business Cases for a) the establishment of up to three community-led Resource Recovery Centres in Dunedin and, b) Strategic investment into the reduction of construction and demolition waste in Dunedin.
- 34 The Business Cases will be presented to the Infrastructure Services Committee before the end of June 2025.

## **Signatories**

Author:	Chris Henderson - Group Manager Waste and Environmental Solutions
Authoriser:	Scott MacLean - General Manager, Climate and City Growth

## **Attachments**

There are no attachments for this report.

## SUMMARY OF CONSIDERATIONS

### ***Fit with purpose of Local Government***

This decision enables democratic local decision making and action by, and on behalf of communities. This decision promotes the social, economic and environmental well-being of communities in the present and for the future.

### ***Fit with strategic framework***

	Contributes	Detracts	Not applicable
Social Wellbeing Strategy	✓	<input type="checkbox"/>	<input type="checkbox"/>
Economic Development Strategy	✓	<input type="checkbox"/>	<input type="checkbox"/>
Environment Strategy	✓	<input type="checkbox"/>	<input type="checkbox"/>
Arts and Culture Strategy	<input type="checkbox"/>	<input type="checkbox"/>	✓
3 Waters Strategy	<input type="checkbox"/>	<input type="checkbox"/>	✓
Future Development Strategy	✓	<input type="checkbox"/>	<input type="checkbox"/>
Integrated Transport Strategy	<input type="checkbox"/>	<input type="checkbox"/>	✓
Parks and Recreation Strategy	<input type="checkbox"/>	<input type="checkbox"/>	✓
Other strategic projects/policies/plans	✓	<input type="checkbox"/>	<input type="checkbox"/>

This work contributes to the Zero Carbon Policy and Zero Carbon Plan, the Emissions Management and Reduction Plan and Waste Management and Minimisation Plan 2020.

### ***Māori Impact Statement***

Local rūnaka representatives have participated in workshops. A mana whenua representative is on the working party of the WMMP review. The concepts of community-led practice, collaboration, social inclusion and wellbeing, and environmental protection and care align with Te Ao Māori principals.

### ***Sustainability***

Reducing waste to landfill will support decreasing emissions. Collaborative and shared resourcing to manage resource recovery makes the process more efficient and reduces the use of fossil fuels for the transportation of materials. Local resource recovery increases community resilience.

### ***Zero carbon***

The establishment of up to three community-led Resource Recovery Centres is an Action Area in the Zero Carbon Plan. Support for design, demolition, and construction industries to reduce waste and for the DCC to increase the city's ability to store, process, and reuse construction and demolition waste is an Action Area in the Zero Carbon Plan

### ***LTP/Annual Plan / Financial Strategy /Infrastructure Strategy***

There are no financial implications from this noting report.

### ***Financial considerations***

As this is a noting report, there are no financial considerations.

### ***Significance***

This decision is considered low in terms of the Council's Significance and Engagement Policy.



## **SUMMARY OF CONSIDERATIONS**

### ***Engagement – external***

Engagement has been undertaken with a wide array of community groups and organisations and construction sector representatives.

### ***Engagement - internal***

Internal engagement has been undertaken with the Zero Carbon, Waste and Environmental Services, Building Services, Property Services and Procurement teams.

### ***Risks: Legal / Health and Safety etc.***

There are no risks associated with this noting paper.

### ***Conflict of Interest***

No conflicts of interests identified.

### ***Community Boards***

Waste reduction, resource recovery and reuse initiatives are of interest to all Community Boards.