

Agreement on policy proposals for waste data regulations

Date Submitted:	14 June 2022	Tracking #: BRF-608	
Security Level	In-Confidence	MfE Priority:	Not Urgent

	Action sought:	Response by:
To: Hon David PARKER, Minister for the Environment	Approve additional record-keeping and reporting requirements for territorial authorities, landfills, and transfer stations to be introduced as amendments to existing regulations and provide any feedback to be included in the drafting of regulations.	28 June 2022 (or earlier if possible)

Actions for Minister's Office Staff	Return the signed report and any feedback from the Minister to MfE.
Number of appendices and attachments: 3	<p>Titles of appendices and attachments:</p> <p>Appendix 1: Proposed mandatory reporting requirements for territorial authorities</p> <p>Appendix 2: Proposed updated conversion factors and guidance</p> <p>Appendix 3: Proposed activity source categories</p>

Key contacts

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Agreement on policy proposals for waste data regulations

Key Messages

1. The purpose of this briefing is to seek policy approval on additional information and reporting requirements for territorial authorities, landfills and transfer stations, to be introduced as amendments to the Waste Minimisation (Information Requirements) Regulations 2021 (the information regulations) and the Waste Minimisation (Calculation and Payment of Waste Disposal Levy) Regulations 2009 (the levy regulations).
2. Cabinet agreed to policy proposals relating to these data proposals in 2021 [CAB-21-MIN-0181], and delegated decision-making to you for some additional technical details, for which we now seek your agreement so that the Parliamentary Counsel Office (PCO) can start drafting regulations.
3. Appendices 1 – 3 provide the details of proposed categories for mandatory reporting from territorial authorities, revised volume-to-weight conversion factors and categories for activity source reporting.
4. It is proposed that regulations incorporating these provisions proceed to Cabinet Legislation Committee, and subsequently Cabinet, in late 2022 or early 2023.

Recommendations

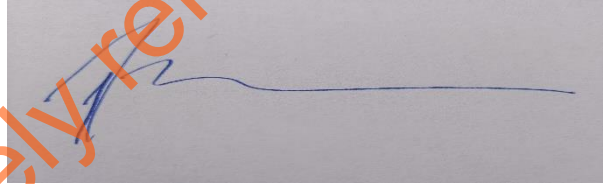
We recommend that you:

1. **Note** that you have been given delegated authority to make decisions on technical aspects of the Waste Minimisation (Information Requirements) Regulations 2021 and the Waste Minimisation (Calculation and Payment of Waste Disposal Levy) Regulations 2009 [CAB-21-MIN-0181]
2. **Approve** the record-keeping and reporting requirements for territorial authorities outlined in Appendix 1
Yes/No
3. **Approve** the proposed amendments to conversion factors (used to convert volumes to weight, to enable reporting of waste data) outlined in Appendix 2
Yes/No
4. **Approve** the proposed activity categories outlined in Appendix 3, which operators of landfills and transfer stations will be required to keep records and report on, to enable a better understanding of the activities producing waste materials
Yes/No
5. **Approve** the proposed frequency of activity source reporting from operators, in line with their existing reporting obligations
Yes/No
6. **Agree** commencement dates for these additional reporting requirements as follows:

- a. For territorial authorities: record-keeping obligations to begin 1 July 2023, with the first report to be due by 30 September 2024 (covering the period 1 July 2023 to 30 June 2024)
- b. Revised conversion factors for landfills and transfer stations: to take effect as soon as possible from when regulations are gazetted
- c. Activity source reporting by landfills and transfer stations: 1 July 2023

Yes/No

Signature

Amanda Baldwin Acting Director - Policy and Regulatory Waste and Resource Efficiency division Ministry for the Environment	
Hon David PARKER, Minister for the Environment	
[Date field]	

Purpose

1. This briefing seeks policy approval on additional information and reporting requirements for territorial authorities, landfills, and transfer stations, to be introduced as amendments to the Waste Minimisation (Information Requirements) Regulations 2021 (the information regulations) and the Waste Minimisation (Calculation and Payment of Waste Disposal Levy) Regulations 2009 (the levy regulations).
2. The proposed amendments would update the schedule of conversion factors in both regulations, and the types of records that operators must keep and how those measurements are to be made, expanding these to include activity source reporting and mandatory reporting for territorial authorities.
3. Cabinet has agreed to introduce these additional reporting measures and has delegated authority for decision making on specified technical aspects to you [CAB-21-MIN-0181].
4. Decisions are sought now to enable the additional waste data reporting requirements to be introduced alongside the expansion of reporting obligations to more facility classes in January 2023, and before the next financial year for territorial authority reporting.

Context

5. The regulations to be amended cover, respectively:
 - payment of waste disposal levy (waste levy), measurement of gross and diverted tonnages, types of facilities subject to the levy, how the levy is to be paid, records and information for disposal facilities and levy rates (the levy regulations)
 - record-keeping and tonnage reporting requirements for waste sites not subject to the levy (the information regulations)
6. The levy regulations were updated in 2021 to include phased increases in waste levy payments from class 1 landfills, and the phased implementation and/or increase of waste levy payments for class 2 and class 3/4 landfills. Key dates are outlined in Table 1 (below).
7. This policy proposal outlines the technical aspects of:
 - introducing mandatory reporting requirements for territorial authorities under Section 86(1)(c) of the Waste Minimisation Act 2008 (the Act)
 - proposed amendments to the conversion factors currently used in Schedule 2 of the information regulations and Schedule 1 of the levy regulations
 - activity source reporting under Section 86(1)(b), which will enable us to better understand the types of activity generating waste (for example, construction and demolition, or waste from kerbside collections from households).

Table 1: Timeline for implementation of waste levy expansion requirements

	Registered	Reporting obligations	Levy obligations
Class 2	1 Jan 2022	1 Jan 2022	1 July 2022
Transfer stations	1 Jan 2022	1 Jan 2022	N/A
Class 3 and 4	1 July 2022	1 Jan 2023	1 July 2023
Class 5	1 July 2022	1 Jan 2023	N/A
Industrial monofill	1 July 2022	1 Jan 2023	N/A

Analysis and Advice

8. Proposed regulations for landfills and transfer stations will improve the availability, quality and consistency of information received by the Ministry.
9. Improved waste data supports a range of projects currently underway in the Ministry, including:
 - expansion of the waste disposal levy
 - improvements to collection of recycling materials from households and businesses
 - the revised waste strategy
 - the emissions reduction plan
10. Both activity source reporting and some categories of the mandatory reporting for territorial authorities will contribute to our ability to measure our progress towards targets in the emissions reduction plan and New Zealand waste strategy, as well as support planning interventions to enable us to meet these targets.
11. *Ināia tonu nei: A low emissions future for Aotearoa* (the final advice to Government from the Climate Change Commission for the preparation of the inaugural emissions reduction plan¹) states “gathering better data across the waste sector would be a useful starting point for developing a better understanding of the circularity of the economy, and where the biggest emissions reductions can be achieved.” The document also recommends that the government prioritise and invest in data collection to support measurable indicators to enable monitoring of progress towards circularity and the impact on emissions.
12. External expertise has been procured to provide recommendations on activity source reporting and amendments to the current conversion factors.

¹ <https://www.climatecommission.govt.nz/our-work/advice-to-government-topic/inaia-tonu-nei-a-low-emissions-future-for-aotearoa/>

Mandatory reporting for territorial authorities

13. It is proposed that it is made mandatory for territorial authorities keep records on and report annually on the measures in Appendix 1 of this briefing note under Section 86(1)(c) of the Act, which covers:
 - spending of waste levy money
 - performance in achieving waste minimisation with the services, facilities, and activities provided or funded in accordance with its waste management and minimisation plan
 - performance as measured against any performance standards set by the Minister under section 49.
14. Currently, territorial authorities voluntarily report their levy spend through a spreadsheet that is administered by the Ministry for the Environment annually (at the conclusion of the financial year). It is proposed that the new mandatory territorial authority reporting requirements, including levy spend reporting, will be administered through an online reporting portal, Territorial Authority Waste Levy Expenditure System (TAWLES), which was developed in April 2022. Voluntary reporting will be delivered through TAWLES for the 2023/23 financial year, with the mandatory reporting obligation to take effect from 1 July 2023 (ie, the first financial year for which mandatory reporting will take place is 2023/24).
15. Mandatory reporting measures for territorial authorities have been aligned with, and will contribute to measuring, the kerbside standardisation project, a Labour Party election manifesto commitment. Following Cabinet agreement [CAB-22-MIN-0041 refers], consultation on kerbside standardisation took place from 13 March to 22 May 2022. Feedback from that consultation has been considered in the process of developing the proposed reporting categories.
16. Reporting by territorial authorities is key to identifying whether they have met their obligations under the Act, such as their provision of waste minimisation services and facilities (including use of levy funds). This reporting will move from voluntary to mandatory, and additional types of information will be collected, which will improve the quality of reported data and the Ministry's ability to audit outcomes.
17. While some types of information can also be obtained through other means (ie, using the Ministry's audit function), information gained through audits is subject to strict information sharing restrictions (so is less useful for other purposes such as publicly sharing information on territorial authorities' performance in achieving waste minimisation).
18. There are no performance standards proposed at this time. However, making reporting under Section 86(1)(c) mandatory will enable reporting on any performance standards agreed in future.
19. Annual reporting is proposed to be completed for each financial year. This aligns with the existing voluntary reporting of levy spend by territorial authorities to the Ministry.
20. Proposed measures have been developed based on analysis of services, facilities and activities typically outlined in waste minimisation and management plans; feedback from territorial authorities; and with reference to the National Waste Data Framework Protocols commissioned by WasteMINZ.

21. Local government and the private sector are often competitors in the kerbside collection market. Initial proposals consulted on with territorial authorities included requirements for territorial authorities to report on both private and council collections for household kerbside refuse, recycling, and organics.
22. It is proposed that we do not include the requirements for reporting on private collections by territorial authorities in the regulations at this stage. This is in response to feedback from a majority of territorial authorities involved in consultation; firstly, that this may require the introduction of individual territorial authority bylaws, and secondly, there were concerns regarding the commercial sensitivity of waste data.
23. Consultation on improving household kerbside recycling discussed whether waste companies should report annually on the performance of any private household kerbside collections they provide, reporting directly to the Ministry for the Environment. This would alleviate the administrative and financial burden of local government creating individual bylaws and protect the commercial sensitivity of the waste data from private collectors. In future, other obligations may be considered as part of a potential national licensing system, which would displace or alter the need for individual bylaws.
24. Some additional categories of information from territorial authorities were considered during development of proposals. At this stage it is proposed to include discretionary (rather than mandatory) reporting on compliance activities undertaken by territorial authorities, and on the destination of recycled materials (e.g., on- or off-shore processing). These types of measures may not be described in waste management and minimisation plans so are likely not in scope for mandatory reporting under section 86(1)(c)(ii).

Volume-to-weight conversion factors

25. Conversion factors enable reporting from sites that do not have access to a weighbridge, using volume-to-weight conversion factors based on the type of waste being accepted. The information regulations and the levy regulations currently prescribe conversion factors in schedules 2 and 1 respectively.
26. Amendments to the volume-to-weight conversion factors are proposed, including changes and clarification to the existing four load types, and the addition of four new load types (see Appendix 2 for details).
27. These amendments will provide those sites using conversion factors more clarity on the appropriate conversion factor to apply and will better reflect the types of materials being accepted at Class 2-5 sites and transfer stations, as well as Class 1 municipal landfills.
28. The amendments will facilitate appropriate data capture, and accuracy and consistency of measuring and recording at sites. In turn, this will contribute to accurate payment of the waste levy (where relevant).
29. Proposed amendments have been developed based on visits to several New Zealand landfill and transfer station sites, and through consultation with site operators. Alternative means of measuring tonnages received at and diverted from sites in the absence of access to a weighbridge were considered, such as using vehicle type as a proxy, volumetric/ topographic surveying, and unique conversion factors. These options

were deemed unsuitable due to the level of accuracy and auditability they would provide, and in some cases due to the practicality of employing the method on sites.

Activity source reporting

30. Cabinet has agreed to proposals that will require landfill and transfer station site operators to report on the activity that generated the waste received at and diverted from those sites, termed 'activity source reporting'. Currently, reporting obligations require only tonnage reporting. The introduction of activity source categories will enable understanding of the types of activities that are generating amounts of waste.
31. These regulations are not proposed to be prescriptive as to method of collecting data. The associated record-keeping obligations should be used to ensure this information is captured, and that sites keep a clear record of how they have calculated their data.
32. The activity source reporting categories provided in the New Zealand Waste Data Framework have been reviewed, and proposals are made to improve the categories used in this framework so that mandatory reporting uses clear, readily identifiable categories (Appendix 3).
33. During investigations into what and how activity source data could be collected by site operators, it was identified that it is problematic to assign an individual activity category to loads of materials diverted from landfills and transfer stations due to the process of load combining or stockpiling for diversion. Therefore, it is not now proposed that reporting of activity source categories for diverted materials is introduced.
34. Seven activity source categories are proposed, which align with international practice, with clear definitions and minimal overlap between the categories. The definitions are consistent with the WasteMINZ guidelines for disposal to land², which is a widely accepted guidance document across the waste industry in New Zealand.
35. The proposed activity source categories are described in detail in Appendix 3 and consist of:
 - construction and Demolition (C&D)
 - mixed Industrial/ Commercial/ Institutional (ICI)
 - heavy industrial
 - residential drop-off
 - residential kerbside collections
 - unusual activity
 - transfer station – mixed activities
36. Reporting is proposed to be as tonnages by each of the above activity source categories – eg, tonnage of heavy industrial materials.
37. Reporting is proposed to be completed for each financial year, at a frequency which aligns with the individual site's reporting requirement for tonnages of waste material received at and diverted from sites (monthly for most sites).

² Waste Management Institute of New Zealand, 2018, Technical Guidelines for Disposal to Land.

Consultation

38. Questions regarding improvements to waste data were asked in formal consultation on the expansion and increase of the waste disposal levy in 2019/2020. There was significant support for improvement in waste data (96 per cent of submitters).
39. In response to the formal consultation in 2019³, several councils and the WasteMINZ Territorial Authorities Officers' Forum supported wider application of the New Zealand Waste Data Framework⁴, and the development of regulations under Section 86 of the Act.
40. Limited feedback was received via the formal consultation on activity source reporting, although several businesses felt that meeting required data requirements would be difficult. Some councils considered there would be difficulty ascertaining the activity source and suggested a limited number of activity source categories to streamline this process.
41. The investigation into activity source categories, methods of activity source data collection and amendments to conversion factors included consultation with impacted stakeholders. An industry workshop was held in October 2021. Proposed activity source categories and methods of data collection were tested with relevant stakeholders during March and April 2022. Feedback included that facility operators should be provided with clear guidance on what is needed, how they can implement changes, and justification on the value of the information to ensure compliance and accuracy. This feedback will be incorporated into implementation planning.
42. Broad support was expressed for the continued use of volume-to-weight conversion factors to measure waste volumes, most commonly because of the high cost of installing and maintaining a weighbridge at some sites. However, submitters also expressed concern about the vagueness and inconsistent application of existing conversion factors in the regulations. The proposed changes outlined in this paper are a response to this feedback.
43. The Ministry also held a contestable round of weighbridge funding support in mid-2021 for sites that did not have weighbridges. Another round of such funding is being considered as the fund was heavily oversubscribed, with 24 projects able to be funded in the mid-2021 round from a total of 44 projects (46 individual weighbridges) applying.
44. Territorial authorities have been informally consulted on the proposed mandatory territorial authority reporting requirements. Fourteen individual territorial authorities provided written feedback, and the WasteMINZ Territorial Authority Officers Forum submitted a shared submission through the informal consultation.
45. A webinar was also held on 12 May 2021 with a broad range of territorial authority officers. Territorial authorities were generally supportive of additional mandatory reporting. Some concerns were raised about their ability to report on some categories, including enforcement measures and event waste (neither of which is now proposed for mandatory reporting).

³ <https://environment.govt.nz/publications/reducing-waste-a-more-effective-landfill-levy-summary-of-submissions/>

⁴ <https://www.wasteminz.org.nz/projects/national-waste-data-framework-project/>

46. Internal consultation in the Ministry has also been completed to ensure consistency between these regulations and other pieces of work, particularly the targets under the New Zealand waste strategy, reporting requirements proposed to be introduced under the kerbside standardisation programme and the waste chapter of the emissions reduction plan.

Risks and mitigations

47. The introduction of additional waste data regulations has been delayed by the impacts of COVID-19 on the ability of procured specialists to complete research into activity source reporting and conversion factors, as well as other delays in project delivery.
48. This means regulations may not come into effect directly in line with other changes to waste reporting, for example the expansion of tonnage reporting requirements to further classes of landfill.
49. Regulations would need to be gazetted on or before 4 December 2022 to enable them to take effect from 1 January 2023. Depending how long the drafting process takes, this may not be possible. Clear communications with landfills, especially those sites whose tonnage reporting obligations begin on 1 January 2023, will be needed to mitigate any confusion associated with changing conversion factors.
50. Site operators have been engaged in the process of designing these regulations to ensure that they are achievable and workable. Any remaining risk to implementation will be mitigated through the provision of clear communications and guidance on the implementation of these regulations, to avoid any potential confusion.
51. Introducing requirements for recording and reporting information in relation to activity source will result in changes being required at all disposal facilities. The scale of change that would be required will be dependent on the current systems in place and the complexity of the customer base and waste streams.
52. There is some potential for error in the collection of activity source data, predominantly as a result of accuracy of information provided by customers, interpretation of categories by facility operators and the robustness of systems in place at sites to record information. This risk of error will be mitigated by use of clear communications of requirements, including production of guidance for site operators, education tools such as videos, and further targeted communications as required.
53. As expressed across many industry submissions on these proposals, the privacy and commercial sensitivity of the data collected through these regulations may be significant. Work is underway in the Ministry to understand the commercial sensitivities of waste data and ensure it can be managed appropriately.

Financial, regulatory and legislative implications

54. It is proposed that the proposals are introduced as amendments to the Waste Minimisation (Information Requirements) Regulations 2021 and the Waste Minimisation (Calculation and Payment of Waste Disposal Levy) Regulations 2009.
55. These regulations will impact the calculation of some waste levy payments, through amendments to existing conversion factors. It is not proposed to back-date changes (ie, levy payments that have already been made will not be back-calculated).

56. The Ministry has budgeted for the anticipated costs of implementation including changes to reporting platforms and work with site operators and territorial authorities.
57. Regulatory Impact Analysis (RIA) was completed at the time of the Cabinet decision in June 2021.⁵ The RIA was considered to meet Quality Assurance Criteria.

Next Steps

58. If you agree these policy proposals, the regulation drafting process will commence.
59. It is planned to undertake an exposure draft process around October 2022. It is suggested that Ministerial consultation take place in November, with the final decisions taken to the Cabinet Legislation Committee (LEG) and Cabinet in December 2022.
60. The date that the regulations take effect will be phased to ensure alignment with existing obligations <http://intranet.mfe.govt.nz/how/communication-and-engagement/proofreading-resources> to the extent possible.

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⁵Impact statement: Additional proposals to improve the availability of waste data | Ministry for the Environment

Appendix 1: Proposed mandatory reporting requirement schedule for territorial authorities

Activity	Description of reporting
Council services	
1a. Council-operated/contracted recycling collections – materials collected	<p>Does the territorial authority collect these materials (Y/N):</p> <ul style="list-style-type: none"> • Glass • Paper and cardboard • Plastic <ul style="list-style-type: none"> - #1 - #2 - #5 - Other • Metal <ul style="list-style-type: none"> - Aluminium - Scrap metal eg, tin cans - Other <ul style="list-style-type: none"> ▪ Food scraps ▪ Garden waste ▪ Food and garden waste combined
1b. Council-contracted kerbside recycling collections	<p>Amount of material collected for recycling (in tonnes) by material type:</p> <ul style="list-style-type: none"> • Commingled • Glass • Paper and cardboard • Plastic • Metal • Food scraps • Garden waste • Food and garden waste combined • Number of households/properties of that district that have access to kerbside recycling collections • Where relevant, which materials are included in comingled category for that council • Whether collection includes business properties as well as residential • Whether collection includes recycling dropped off at drop off points <p>Notes: “council-contracted domestic kerbside” to include smaller business collections if offered by council and collected with household kerbside collections. Where service not offered (eg, greenwaste) council can report ‘zero’. Mfe to source statistics on usually-resident population (not reported by council).</p>
1c. Council-contracted domestic drop-off recycling collections	<p>Amount of material collected for recycling in tonnes by material type:</p> <ul style="list-style-type: none"> • Commingled • Glass • Paper and cardboard • Plastic • Metal • Food scraps • Garden waste • Food and garden waste combined <p>Allow response of ‘included in other reporting category’ if this would be double-counting of info above (eg, if kerbside and drop-off collections are mixed)</p>

<p>2a. Contamination rate for council-contracted domestic kerbside dry recycling</p>	<ul style="list-style-type: none"> • Tonnage of material that is collected in dry recycling and subsequently disposed of to landfill • Number of households/properties of that district that have access to kerbside and/or drop-off recycling collections • Whether contamination rate is specific to that territorial authority or pooled across organisations • Whether contamination rate includes just domestic or domestic plus business waste <p>Note contamination rate may be a combined figure for waste from more than one territorial authority.</p>
<p>2b. Contamination rate for council-contracted domestic kerbside wet recycling (organics)</p>	<ul style="list-style-type: none"> • Tonnage of material that is collected in organics recycling and subsequently disposed of to landfill • Number of households/properties of that district that have access to kerbside and/or drop-off recycling collections • Whether contamination rate is specific to that territorial authority or pooled across organisations • Whether contamination rate includes just domestic or domestic plus business waste <p>Note contamination rate may be a combined figure for waste from more than one territorial authority.</p>
<p>3a. Council contracted domestic kerbside rubbish collection</p>	<ul style="list-style-type: none"> • Tonnes of material disposed of at landfill from kerbside collections • Number of households/properties of that district that have access to kerbside waste collections <p>Notes: “council-contracted domestic kerbside” to include smaller business collections if offered by council and collected with household kerbside collections.</p>
<p>3b. Council contracted domestic non-kerbside (ie, drop-off) rubbish collection</p>	<p>Does the territorial authority offer locations not serviced by kerbside collections an option for residents to drop off their rubbish? (Y/N)</p> <ul style="list-style-type: none"> • If yes, how much waste is dropped off at those locations?
<p>Council owned facilities</p>	
<p>4. Resource recovery facilities</p> <p>Broadly: facilities at which a process is applied to recover material ie, generate a product that can be sold/used (eg, sorting/processing; composting).</p>	<p>For council-owned or joint council/private owned facilities, does your council have the following facilities:</p> <ul style="list-style-type: none"> • Material recovery facilities • Construction and demolition resource recovery facility • Community recycling centre • Composting facility • Anaerobic digestion facility • Other eg, biochar, chemical recycling <ul style="list-style-type: none"> - If yes, provide location of facilities • For council-owned or joint council/private owned MRFs: <ul style="list-style-type: none"> - Tonnage of material received at facility (gross – by material type) - Tonnage of waste diverted from landfill per annum by material type • For council-owned or joint council/private owned C&D resource recovery facility: <ul style="list-style-type: none"> - Tonnages out (processed): <ul style="list-style-type: none"> ▪ concrete/masonry ▪ timber ▪ plaster board ▪ plastics ▪ soils ▪ other (eg, glass, hazardous materials) - residual waste to landfill (tonnages) • For council-owned or joint council/private owned community recycling centres:

	<ul style="list-style-type: none"> - Tonnages by material types listed in 1a [Allow response of 'included in other reporting category' if this would be double-counting of information above] - Yes/no for which additional materials are collected (eg, batteries, whiteware etc) - Y/N for what services are offered (eg, repair) – broad categories of activity • For council-owned or joint council/private owned composting facilities: <ul style="list-style-type: none"> - For community composting facilities – Y/N - For commercial facilities, tonnages processed • For council-owned or joint council/private owned anaerobic digestion facilities, quantity produced of: <ul style="list-style-type: none"> - Gas - digestate <p>Note: facilities either owned or co-owned by council – not privately owned Composting: define mulched/non-mulched weight.</p>
Levy spend reporting	
<p>Information on how levy funds have been spent</p>	<ul style="list-style-type: none"> • Project/initiative name • WMMP reference • Type of initiative (education and communication; infrastructure; services; research and reporting; product stewardship; other initiatives) <ul style="list-style-type: none"> - For education/communication initiatives, type of topic • Total cost of initiative • Amount of levy money spent on project • Details of financial management of levy funds (such as how any interest is managed, how levy funds are recorded in financial management systems)
Performance as measured against any section 49 performance standards	
<p>S86(1)(c)(iii): performance as measured against any performance standards, when these are set by the Minister under section 49</p>	<p>No section 49 performance standards have yet been set, but as and when performance standards are agreed, relevant performance measures would also be agreed and territorial authorities would need to report against these also.</p>

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Appendix 2: Proposed amendments to volume-to-weight conversion factors

Changes to the existing load types are proposed to better reflect the types of wastes being received at disposal facilities. These conversion factors are presented in the table below along with a description to provide users with additional information on the typical materials which are covered by the load type, as well as those materials which are excluded.

Proposed Load Type name	Conversion factor	Description
Mixed general material - loose	0.13 tonnes, (130kg)/m ³	<p>Small loads (0.5 cubic metres or less) of uncompacted general waste or material, including bags of domestic and commercial refuse or waste,</p> <p><i>Or</i></p> <p>material for diversion that is similar in density to loose and uncompacted recyclable containers, such as cans and plastic bottles.</p> <p>Includes loads received from a residential customer that is mainly household waste but includes some garden material.</p>
Uncompacted garden material	0.15 tonnes (150kg)/m ³	<p>Glass, leaves, foliage, branches. Does not include soil or logs. Material is delivered loose and not from a kerbside collection service.</p>
Mixed general material – bulk uncompacted	0.20 tonnes (200kg)/m ³	<p>Larger loads (more than 0.5 m³) of uncompacted waste;</p> <p><i>Or</i></p> <p>material for diversion from residential, commercial, industrial, (excluding cleanfill).</p> <p>Includes loads of construction and demolition waste which is dominated by packaging or light-weight insulation.</p>
Compacted putrescible material	0.26 tonnes (260kg)/m ³	<p>Compacted and/or mulched grass, leaves, foliage, branches and food waste included in a food and garden waste collection. Does not include soil or logs. For example, materials collected from a kerbside in a compacter vehicle.</p>

<p>Mixed general material - compacted</p>	<p>0.32 tonnes (320kg)/m³</p>	<p>Waste or material for diversion carried in a compacted state (including in kerbside collection compactors, stationary compactors, and front-end loaders) and compacted bulk waste;</p> <p><i>or</i></p> <p>material from transfer stations;</p> <p>Or</p> <p>Waste or material for diversion that is similar in density to compacted waste such as whole glass bottles and loose light-gauge scrap metal.</p>
<p>Mixed construction and demolition material</p>	<p>1.20 tonnes, (1,200kg)/m³</p>	<p>Mixed loads of construction and demolition waste. Predominantly made up of timber, plasterboard, fibre cement products, fibreglass, insulation, bricks and small amounts of concrete.</p> <p>Not applicable to loads of construction and demolition material which are dominated by lighter materials such as insulation, packaging or plastics ('Mixed general material – bulk, uncompact' applies).</p>
<p>Soil/excavated material</p>	<p>1.50 tonnes (1,500kg)/m³</p>	<p>Material predominantly made up of soil and excavated material including sand, silt, clay and topsoil. May include stumps and/or excavated logs. Excludes rock.</p>
<p>Concrete/rubble/ rock</p>	<p>2.00 tonnes (2,000kg)/m³</p>	<p>Mixed or single material type loads predominantly made up of concrete, rubble, rock or bricks.</p>

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Appendix 3: Proposed activity source categories

Proposed activity source categories (all to be reported as tonnage by activity source category)

Activity category	Description	Additional guidance
Construction and Demolition	Waste derived from the construction or demolition of buildings, structures, and infrastructure. This includes residential, industrial and commercial structures, pipelines, roading, land development (including site clearance for building/ subdivision construction), or other debris.	<ul style="list-style-type: none"> Waste from individual or multiple building construction sites. Waste from all infrastructure projects. Waste from the demolition of buildings. Soil or fill material from construction or demolition of services or foundations for buildings.
Mixed Industrial/ Commercial/ Institutional	General waste from activities wholly or mainly for the purposes of a trade, business or industry, or for the purposes of sport, recreation, education, healthcare, or agriculture, but not including households. This includes retail, light manufacturing/ industrial activities.	<ul style="list-style-type: none"> Waste from mixed commercial sources. Includes wastes from farming and typical agricultural activities. Waste from Council operation such as street sweepings and litter collection.
Heavy industrial	General waste primarily derived from heavy industrial or manufacturing activities including primary processing and wastewater treatment. Dedicated loads generated by the primary activity of an industry. Examples (of heavy industry): tanners, canning factory, dairy factories, timber/pulp mills, fisheries, horticulture processing	<ul style="list-style-type: none"> Waste from individual large factories or large industrial businesses. Includes forestry and large-scale food production. This category should be applied to loads of substantially homogenous wastes originating from the primary activities of the industry (ancillary activities, such as administration and maintenance should be categorised as 'Mixed Industrial/ Commercial/ Institutional'.
Residential drop off	Waste generated from a household that is not entirely from construction, renovation or demolition of the house. Household waste is composed of wastes from normal household activities and originating from private homes or apartments.	<ul style="list-style-type: none"> This category should also be applied to loads of unprocessed residential waste not transported by the householder e.g., waste received in a gantry skip or by a property maintenance business. Loads of waste entirely from construction or demolition activities should be categorised as 'Construction and Demolition'.
Residential kerbside collections	Waste received from kerbside collections which are generated	<ul style="list-style-type: none"> If collections include a mix of residential and business

	by residential activity. Residential kerbside waste is composed of wastes from normal household activities and originating from private homes or multi-unit dwellings.	waste the main activity generating the waste should be applied. <ul style="list-style-type: none"> Includes waste collected in both rubbish bags and mobile garbage bins.
Unusual activity	Wastes usually from a distinct activity that occurs irregularly and significantly affects the overall composition of the waste stream and do not fit into any of the other categories. This category should be used as an exception. Examples: animal disposal, clearing out of sludge from private lagoons used as wastewater treatment (but not sludge from wastewater treatment plants, that would fall under ICI category), waste generated from naturally occurring hazards (flooding, fire, earthquake, hydrothermal activity, landslide, tsunami, storm, volcanic activity ⁶).	<ul style="list-style-type: none"> The purpose of this category is to improve the ability to accurately track waste streams over time. Wastes generated by unusual activities can vary significantly over time, and the ability to identify/exclude these waste streams allows analysis of the underlying waste flows. Waste generated via unusual activities respond to different reduction initiatives than general waste streams. Loads of waste from unusual activities are typically only disposed of at disposal facilities and not received via transfer station.
Transfer station – mixed activities	Waste received from a transfer station to a site required to report. This includes loads from a transfer station to a transfer station, and loads from a transfer station to a landfill.	<ul style="list-style-type: none"> The individual transfer station the load is received from must be recorded for each load. If waste received is from an individual activity, that activity should be applied and not this 'Transfer station – mixed activities' category.

Explanatory notes for proposed activity source categories:

1. The National Waste Data Framework includes activity source categories. Independent research was commissioned to review those categories and propose any changes required to ensure reporting would be workable and effective (for example, that each category was distinct and clearly definable). New categories and changes to the existing categories in the NWDF are outlined below.

⁶ Section 23, Natural Hazards Insurance Bill 113-1 (2022), Government Bill 5 Interpretation – New Zealand Legislation

2. Currently, seven categories exist in the National Waste Data Framework (NWDF)⁷. The number of proposed categories is seven but with some differences compared to the NWDF; these are outlined below.
3. A 'Transfer station – mixed activities' category is proposed that enables sites receiving mixed loads from transfer stations to identify in their reporting which transfer station those loads have come from. Sites accepting waste from transfer stations will likely be unable to determine the activity that produced the waste without considerable administrative burden on the site operator. Therefore it is proposed that sites identify which transfer station loads have come from so that the Ministry may cross reference the activity source categories reported from that transfer station.
4. The existing 'Industrial/ commercial/ institutional (ICI)' category is proposed to be split into two categories, to enable the differentiation between waste from heavy industrial/commercial activities and waste from mixed industrial/commercial activities to be captured.
5. The existing 'Residential' category is proposed to be slightly amended to better define the category, and to assist in the application of the category for reporting.
6. The existing 'Domestic kerbside' category is proposed to be slight amended, and renamed, to better define the category and to assist in the application of the category for reporting.
7. It is proposed that the existing category of 'Landscaping' is not included as a mandatory reporting category, as materials from landscaping activities could also be from a construction and demolition (C&D) or ICI activity which could be a significant source of confusion for site operator reporting. Landscaping materials (largely vegetation and soil/ rubble) are instead captured under the appropriate proposed new C&D or ICI category.
8. It is proposed that the existing 'Virgin Natural Extract Material (VNEM)' is not included as a mandatory reporting category, as this focusses on waste material composition rather than the activity from which the material was derived.
9. It is proposed that the existing 'Special' category is amended and renamed 'Unusual' to better define the category for activities rather than composition, and to prevent confusion with 'Special wastes' which is an existing label that sites apply to loads of material that require particular handling at disposal facilities.
10. No category for a mixed activity source load is proposed. This is not considered to be necessary and would reduce the quality of the dataset. If loads are received that are sourced from multiple activities, site operators should select the predominant activity source making up the load based on information provided by the customer of driver of the load.

⁷ National Waste Data Framework Project | WasteMINZ