Local Government Waste Plan
City of Greater Geraldton

:

Part 1 - services and performance
1.0 Introduction

Part 1 of the City of Greater Geraldton waste plan establishes the city's waste profile and baseline information in relation to the objectives and targets set out in the Waste Avoidance and Resource Recovery Strategy 2030 (Waste Strategy):

Avoid - Western Australians generate less waste.

Recover - Western Australians recover more value and resources from waste.

Protect - Western Australians protect the environment by managing waste responsibly.

Where data was available, the Department of Water and Environmental Regulation (DWER) has pre-filled sections of Part 1.
If any of the pre-filled information is incorrect, please amend accordingly and advise of the changes.

Please take the time to ensure that you complete each section, where relevant. In some tabs, you may need to scroll down to ensure that you have not missed any sections.

Part 1 - Services and performance
2.0 Integrated planning and reporting

All local governments plan for the future[1] through the development of strategic community plans and corporate business plans. Waste plans form part of local government integrated planning and reporting as an issue-specific informing strategy.

Table 1: Links between plan for the future and waste management *(Please complete the table, even if the answer is "waste isn't mentioned in our SCP or CBP")*

Strategic Community Plan	
Title:	City of Greater Geraldton Community Strategic Plan 2017 - 2027
Came into force:	2017
Date of next review:	2020
Waste-related priorities:	2. Objective: Environment. 2.2 Sustainability: 2.2.1. Promoting, researching and implementing practices such as improved and innovative waste management, water reuse and renewable energy production 2.2.2. Researching, promoting and providing sustainable infrastructure, services and utilities 3. Objective: Economy 3.1 Growth 3.1.3 Developing and maintaining infrastructure that increases the potential for business and investment
Corporate Business Plan	
Title:	City of Greater Geraldton Corporate Business Plan 2017 - 2027
Came into force:	2017
Date of next review:	2020
Waste-related priorities:	2.2.1.6 Provide regional waste management services (2017 - 2021) 2.2.1.7 Implement Waste Strategy Review & development of the Strategic Waste Management Framework Report (2017/2018) 2.2.2.5 Finalise design for Cell 5 Meru and Liquid Waste Pond Optimisation delivery (2017 - 2020)

[1] 'Plan for the future' means a plan made under section 5.56 of the *Local Government Act 1995* and Division 1 and 3 of Part 5 of the Local Government (Administration) Regulations 1996.

Part 1 - Services and performance

3.0 Avoid

Avoidance of waste generation is the preferred waste management option in the waste hierarchy. This section looks at waste generation rates and the reduction required to contribute to the state's waste generation reduction targets - **2025**: Reduction in MSW generation per capita by 5%, **2030:** Reduction in MSW generation per capita by 10%.

Reviewing this data is a critical element of waste planning as it can show how waste generation has changed, identify potential reasons for changes and indicate areas to target in *Part 2 – Implementation plan* (Table 21).

Table 2: City of Greater Geraldton population, households and waste generation compared with state averages and targets for 2025 and 2030

(Local government to review prefilled data)

	Actual				Targets	
	2014-15 (baseline)	2015-16	2016-17	2017-18	2024-25	2029-30
Population [1]	40,812	39,600	39,568	39,536	39,816	40,534
Households [1]	16,325	15,840	15,827	15,814	15,926	16,214
Total domestic waste generated [2]	37,662	35,857	36,160	48,400		
Waste generation per capita/year (kg) [2]	923	905	914	1,224	877	831

(1) Source (except 2014-15): Western Australia Tomorrow Population Report No. 11 https://www.dplh.wa.gov.au/information-and-services/land-supply-and-demography/western-australia-tomorrow-population-forecasts. Population for 2014-15 from Western Australia Tomorrow Population Report No. 10. Population for intercensal years extrapolated. Households estimated using 'Average people per households' from 2016 ABS Census Quickstats.

(2) Source: Local Government Census data - domestic waste

Additional comments *(local government to insert any additional comments that may be applicable)*
Note total domestic waste generation reviewed and updated.

Part 1 - Services and performance

4.0 Recover

Where waste generation is unavoidable, efforts should be made to maintain the circulation of materials within the economy. Table 3 gives the overall recovery rate for your local government compared to Waste Strategy targets and the state average. This is broken down into the proportion of the recovery which was materials recovery (reuse, reprocessing or recycling) or energy recovery. The Waste Strategy includes a target that from **2020,** energy should only be recovered from residual waste (see *Guidance Document – Table 1* , for more information).

Table 3: City of Greater Geraldton population, households and recovery rate compared with state averages and targets for 2020, 2025 and 2030

(LG to review the pre-filled data and amend/update if necessary. Add additional comments if necessary.)

	2014-15	2015-16	2016-17	2017-18	2020 target	2025 target	2030 target
Population[1]	40,812	39,600	39,568	39,536			
Households[1]	16,325	15,840	15,827	15,814			
Overall recovery (%)[2]	23%	19%	23%	35%	*50%*	*55%*	*60%*
Materials recovery	23%	19%	23%	35%	*>80%*	*>80%*	*>80%*
Energy recovery	0%	0%	0%	0%	*<20%*	*<20%*	*<20%*
Perth metro average[3]	36%	38%	40%	41%			

(1) Source (except 2014-15): Western Australia Tomorrow Population Report No. 11 https://www.dplh.wa.gov.au/information-and-services/land-supply-and-demography/western-australia-tomorrow-population-forecasts. Population for 2014-15 from Western Australia Tomorrow Population Report No. 10. Population for intercensal years extrapolated. Households estimated using 'Average people per households' from 2016 ABS Census Quickstats.

(2) Source: Local Government Census data - domestic

(3) Source: Waste Authority data fact sheets http://www.wasteauthority.wa.gov.au/programs/data/data-fact-sheets/

Additional comments *(local government to insert any additional comments that may be applicable)*

Note overall MSW recovery rate updated to reflect performance (see table 6.1).

Part 1 - Services and performance

5.0 Protect

Objective 3 of the Waste Strategy is to protect the environment by managing waste responsibly, with targets for achieving better practice, reducing litter and illegal dumping. **By 2030 all waste is managed by and/or disposed to better practice facilities, by 2030 move towards zero illegal dumping and zero littering**.

5.1 Better practice

Adoption of better practice approaches to waste management is an important way in which local government can better protect the environment from the impacts of waste, and contribute to achievement of the targets under objective 3 of the Waste Strategy. See *Guidance Document - 5.0 Better practice, Table 4* for a summary of the Waste Authority's current and planned better practice guidelines.

Table 4: Better practice approaches and programs adopted by the City of Greater Geraldton   *(LG to complete the table)*

Waste management activity/service	Waste Authority better practice guideline or program	Date of adoption/ implementation	Comment
Policy- Waste Local Law	WALGA waste local law template and guidance	26-Jun-19	Council endorsed on 26/6/2019 for the development and implementation of Model Waste Local Laws.
Waste Services - Reuse shop	WALGA better practice reuse shop guidelines	Ongoing	The CGG reuse and recycling shop operations is guided by the WALGA better practice guidelines
Waste Services - drop off services	WARR funded household hazardous waste program	Ongoing	Project funded through WALGA until 30 June 2023.
Waste Services - FOGO kerbside service	FOGO Waste Authority position statement	Ongoing	A FOGO trial of 500 households is currently underway. If successful FOGO to be implemented City wide by 2022.
Waste services - drop off services	Construction and Demolition Waste Authority position statement	Ongoing	Concrete, bricks and rubble materials are separated for reuse within facility operations

5.2 Litter

The data in Table 5 was reported by the your local government in the 2017-18 local government census. Additional information to be provided by the local government in Table 6 if available.

Table 5: 2017-18 litter data *(LG to review prefilled and complete the table)*

	Response and comments	
Litter hotspot used on a regular basis for littering in 17-18	Geraldton Mt Magnet Road, Verita Road, Edward Road, Chapman River, Rum Jungle, Wandina Public	
What are the main items littered at these hotspots?	General rubbish	
Current measures aimed at contributing towards the zero littering target	Contractors undertake patrols and clean up of regular hot spots, rangers undertake patrols, targetted signage.	
Estimated cost of cleanup (due to collection, disposal, education, infrastructure and enforcement)	$23,164	Direct costs to contractor for clean-up - this does not include disposal costs. Costs are unable to be differentiated between litter and illegal dumping

Source: Local government Census data 2017-18

Table 6: Additional litter information *(LG to complete the table where information is available)*

Is littering increasing or decreasing in your local government authority?	Remaining generally stable
How were the costs associated with cleaning up litter calculated? Employee time? Dollar value? Both?	The City currently has sanitation contractors whom are responsible for cleaning episodes of illegal dumping/excess litter. Costs associated with clean up is calaculated based on what the contractor charges (based on time on site).
Does the city have a litter strategy? If not, what is the ETA for completing one?	No.
Have any of the city's compliance and waste education officers undergone training on litter prevention? If so, what training?	No.
What current policies and guidelines does your council enact to prevent litter? E.g. Event planning guidelines on the use of balloons in council facilities and the release of helium balloons; no cigarettes on the beach; no single use plastics at events.	Litter Act enforcement. Currently working on a single use plastic ban for Shire events
How does your local government measure the effectiveness and impact of programs designed to reduce littering and illegal dumping?	No programs are currently provided. Adhoc/reactive education is provided in response to episodes of illegal dumping/littering. Effectiveness is not measured.
Which division/unit/section of your organisation is responsible for litter management/prevention? Waste services? Compliance (e.g. Rangers)? Infrastructure?	Rangers responsible for litter management and enforcement. Wste responsible for clean up and disposal of liiter/illegal dumping.
How important is litter management to your organisation? (1 - Not at all important; 5 - Highly important).	3

5.3 Illegal dumping

The data in Table 7 was reported by your local government in the 2017-18 local government census. Additional information to be provided by the local government in Table 8 if available.

Tabl e 7: 2017-18 Illegal dumping data *(LG to review prefilled data and complete the table)*

	Response and Comments	
Cost of cleaning up illegally dumped waste during 2017-18	As above	Unable to differentiate costs between litter and illegal dumping
Sites used on a regular basis for illegal dumping in 2017-18. Where possible, please provide site address/es	As above	Geraldton Mt Magnet Road, Verita Road, Edward Road, Chapman River, Rum Jungle, Boyd Street
What are the main items dumped at these sites?	Bulky goods, mattresses, tyres, white goods, pig caracasses	
Current measures aimed at contributing towards the zero illegal dumping target	Signage	

Source: Local government Census data 2017-18

Table 8: Additional illegal dumping information *(LG to complete the table where data is available)*

Is illegal dumping increasing or decreasing in your local government authority?	Remaining generally stable
How does your local government measure the effectiveness and impact of programs designed to reduce illegal dumping?	Please refer to response in Table 6.
Which division/unit/section of your organization is responsible for illegal dumping management/prevention? Waste services? Compliance (e.g. Rangers)? Infrastructure?	Please refer to response in Table 6.

Table 9 indicates the type of detailed data local governments may collect to enable better targeted monitoring and enforcement of illegal dumping. Please provide this information here, if available.

Table 9: Detailed illegal dumping data collection by the City of Greater Geraldton *(LG to complete the table if data available)*

Date of data collection:

Waste Type	# of incidents	Total approximate Weight (tonnes)	Change from previous year	Regulatory notices issued
C&I	The City does not currently collect data to this detail	The City does not currently collect data to this detail		
C&D				
E-waste				
Household waste				
Mulch & green waste				
Scrap metal				
Soil & excavated material				
Hazardous/problem waste				
Other				
TOTAL				
Cleaned up by	**% of total incidents**		**Cleanup costs ($)**	
Local government				
Land owner				
Offender				
TOTAL				

Part 1 - Services and performance
6.0 Waste management tools

6.1 Waste services

Local government data relating to the waste collected, recovered and landfilled is presented in Table 10. It is important to review this data when developing *Part 2 – Implementation Plan* , as it can:
• provide an understanding of how different systems are performing (e.g. recovery levels)
• highlight the need for any new collection systems or infrastructure
• identify the timing and capacity of any new collection systems or facilities required to meet the changing needs of local governments.
In working towards alignment with the Waste Strategy, the local government should focus on the materials resources with the greatest potential to support the objectives and targets of the Waste Strategy.

NB: DWER is currently developing a range of better practice guidelines. Better practice rates will need to be updated as the guidelines are released.

Table 11 provides space for the local government to include bin audit information for kerbside waste services, if available. Bin audits can help local governments understand the material composition in kerbside bins, highlight where additional efforts are required to increase performance and assist in planning for future service options such as FOGO collection. **See Appendix for full breakdown of composition categories**

Table 10: Significant sources and generators of waste in 2017-18 *(LG to review pre-filled data and amend/update if necessary. Add additional comments if necessary)*

Service/Sources		Tonnes collected	Tonnes recovered	Recovery rate	Better Practice rate	Target rate 2025	Target rate 2030
Kerbside	mixed waste	15,271	-	0%	%		
	comingled recyclables	-	-				
	green waste	-	-				
	FOGO	-	-				
Vergeside	green waste	7	7	1%	%		
	hard waste	858	-				
Drop-off	mixed waste	12,943	-	48%	%	55% major regional centres	60% major regional centres
	dry recyclables	334	334				
	green waste	7,645	7,645				
	hard waste	3,813	3,813				
	e-waste	274	274				
	hazardous waste	15	15				
Public place	mixed waste		-	N/A	%	67% Perth and Peel	70% Perth and Peel
	comingled recyclables	-	-				
Special event	mixed waste		-	N/A	%		
	comingled recyclables	-	-				
Commercial	mixed waste		-	N/A	n/a		
	comingled recyclables	0	0				
	paper/cardboard	0	0				
Local government waste	Illegal dumping clean up	253.86		69%	%		
	street sweepings	1616.3					
	roadworks	67.76					
	other C&D activities	4972	4972				
	roadside pruning						
	other	298.62					
TOTAL		48,369	17,060	35%			

Source: Local Government Census Data 2017/18

Additional comments *(local government to insert any additional comments that may be applicable)*
The gatehouse records for 17-18 have been reviewed as part of development of the City's Strategic Waste Management and Recycling Plan 2020 - 2030. The table above provides updated figures based on this review.

Table 11: Compositional audit data for kerbside waste services *(Complete if data is available. Add additional comments if necessary).*

General waste bin	
Yield per household (kg/hhl/week)	17.5
Per capita (kg/per capita/week)	
Audit year	**2015, 2016,2019**
Composition	**Total %**
Recyclables (paper, cardboard, plastics, steel, aluminium, glass)	20%
Organics (organics, wood/timber, textiles, earth)	18%
Hazardous (medical, sanitary/ hygiene, nappies, chemicals, paint, batteries, fluorescent tubes, light bulbs, oil, building material)	Not assessed
Other (electronic waste, miscellaneous)	62%

Recycling bin	
Yield per household (kg/hhl/week)	
Per capita (kg/per capita/week)	
Audit year	
Composition	**Total %**
Recyclables (paper, cardboard, plastics, steel, aluminium, glass)	
Organics (organics, wood/timber, textiles, earth)	
Hazardous (medical, sanitary/ hygiene, nappies, chemicals, paint, batteries, fluorescent tubes, light bulbs, oil, building material)	
Other (electronic waste, miscellaneous)	

Garden organics or FOGO bin	
Yield per household (kg/hhl/week)	
Per capita (kg/per capita/week)	
Audit year	
Composition	**Total %**
Recyclables (paper, cardboard, plastics, steel, aluminium, glass)	
Organics (organics, wood/timber, textiles, earth)	
Hazardous (medical, sanitary/ hygiene, nappies, chemicals, paint, batteries,fluorescent tubes, light bulbs, oil, building material)	
Other (electronic waste, miscellaneous)	

Part 1 - Services and performance
6.0 Waste management tools

6.2 Waste infrastructure

The number, type, capacity and location of key existing local government owned and/or operated waste and resource recovery infrastructure is required to understand the future need for different facility types. **This section is not relevant to local governments that do not own/operate waste facilities.**
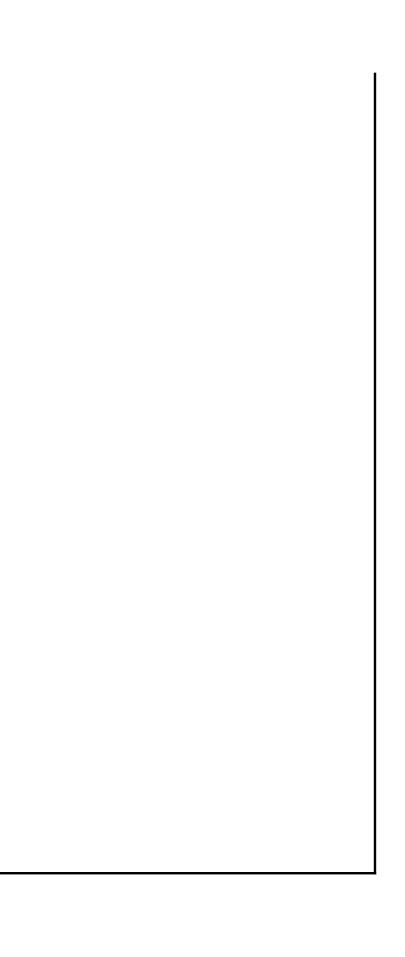
Table 12: Current waste and resource recovery infrastructure operated by the local government *(LG to complete the table)*

Facility name (and licence number if applicable)	Facility Type	Location	Managed by	Licence category and approved production or design capacity	Material type	Service/activity	Remaining Capacity (if applicable)	Anticipated Closure (year)
L9127/2018/1	Meru Waste Disposal Facility	Landfill Road, Lot 204 on Plan 403161 and Lot 2268 on Plan 250829, NARNGULU WA 6532	Cleanaway	13 - Crushing building material 20,000 tonnes/yr 57 - Used tyre storage (general) 1,000 tyres 61 - Liquid waste facility 4,000 tonnes/yr 61A - Solid waste facility 100,000 tonnes/yr 64 - Class II or III putrescible landfill site 100,000 tonnes/yr 67A - Compost manufacturing and soil blending, 20,000 tonnes/yr	Clean fill	Drop off	Approximately eight years landfill capacity in developed cells. New cells scheduled for development in 2028-29. Due to large site size an appraisal of remaining capacity as not been undertaken but is thought to be with excess of 20 years.	Unknown
					Liquid wastes	Storage and treatment		
					Inert waste type 1	Drop off and storage prior to crushing and or disposal		
					Inert waste type 2	drop off, storage prior to recycling		
					Special waste type 1	Drop off and landfill		
					Special waste 2	Drop off and landfill		
					Putrescible wastes	Drop off and landfill		
					HHW	Drop off and storage prior to recycling		
					Greenwaste	Drop off, downsizing, mulching and storage		
					Recyclables (PET, cardboard, paper	Drop off, storage, baling prior to recycling		
					E-waste	Drop off and storage priod to recycling		
					items for reuse	sold at the tip shop		
L6913/1997/10	Mullewa Waste Management Facility	Crown Reserve 12107, Carnarvon-Mullewa Road MULLEWA WA 6630	Th City manages the facility	62 - Solid waste depot 5,000 tonnes/yr 64 - Class II or III putrescible landfill site 1000 tonnes/yr	Putrescible wastes	Drop off and transferred to Meru facility	*n/a*	*unknown at this point*
					Inert waste type 1	Drop off and transferred to Meru facility		
					Inert waste type 2	Drop off and transferred to Meru facility		
					Special waste type 1	Drop off and transferred to Meru facility		
Other								

Table 13 provides space for local governments to provide information about planned waste and resource recovery infrastructure, if relevant.

Table 13: Planned waste and resource recovery infrastructure (LG to complete the table)

Location	Managed by	Licence category and approved production or design capacity (if known)	Waste type	Service/activity	Estimated operation start date
FOGO processing facility	Contractor	67A - Compost manufacturing and soil blending, 20,000 tonnes/yr	FOGO	Resource recovery	2020/2021
HHW facility upgrade at Meru Waste Disposal Facility	Construction - CGG ongoing management - contractor	n/a	HHW	Resource recovery	2020/2021 dependent on budget
Weighbridge refurbishment at Meru Waste Disposal Facility	Construction - CGG ongoing management - contractor	n/a	n/a	Waste infrastructure	2020/2021 dependent on budget
Transfer station/community drop off upgrade at Meru Waste Disposal facility	Construction - CGG ongoing management - contractor	approvals not sought as yet	Waste types: - A dropoff facility for Recyclables (Scrap metal, Cardboard, Plastic...) - A better practice waste drop off facility (transfer station) - HHW dropoff facility - Hardstand area to collect mulch and compost - Dropoff facility for General waste, inert waste and greenwaste - Manned facility to encourage separation	Waste Infrastructure Resource Recovery Education and engagement	Awaiting outcome of application for external funding

Additional comments *(local government to insert any additional comments that may be applicable)*

Part 1 - Services and performance

6.0 Waste management tools

6.3 Policy and procurement

6.3.1 Contracts

Information on your local government's existing waste contracts should be detailed in Table 14. When reviewing services, it is a good opportunity to evaluate how they are performing, opportunities for regional collaboration and to identify any opportunities for improvement, review or renegotiation.

Table 14: Existing waste management contracts *(LG to complete the table)*

Contractor	Services	Notes/comments
Cleanaway	Kerbside & Vergeside skip bin collection	Commenced in 2015 and will expire in August 2022
Cleanaway	Meru waste disposal facility and processing shed	Commenced in Oct 2020 and will expire in Oct 2030
GHD Consultants	AER & AACR Meru and Mullewa Waste Management Facility	Commenced in Jan 2020 and will expire in Jan 2022
Veolia	Roadside litter collection, illegal dumping and animal carcass collections	These services commenced in March 2018 and ceases in 2021.
Cleanaway	Installation and maintenance of street litter bins, event bins service and residential bin delivery	These services commenced in March 2018 and ceases in 2022
MEEDAC	Reuse and Recycle Shop	Expires Feb 2021

6.3.2 Waste local laws and policies

Information on your local government's existing local laws, strategies or policies that may complement/support this waste plan and contribute to the Waste Strategy objectives should be detailed in Table 15.

Table 15: Existing waste-related local laws, strategies and policies *(LG to complete the table)*

Type of local law, strategy or policy	Name of local law, strategy or policy	Came into force	Comments
Local Laws	Waste local law	Nov-20	Council endorsed the implementation of Model Waste Local Laws on 26/6/2019.

6.3.3 Land use planning instruments

Information on your local government's existing local planning instruments which contribute to the management of waste should be detailed in Table 16.

Table 16: Existing waste-related land use planning instruments related to waste management (LG to complete the table)

Local Planning Strategy	TITLE:	City of Greater Geraldton Local Planning Strategy	
	ENDORSED BY WAPC:	Oct-15	
	NEXT REVIEW DUE:		
			YES

	Is waste considered and reflected in the Local Planning Strategy?	Please provide details below: 4.9 Buffers Strategies: Ensure that appropriate buffers are identified to avoid conflict between industry and/or essential infrastructure and sensitive land uses. Actions: 1. Include Special Control Areas in the Scheme to reflect the buffers required for the following: a. Modelled wastewater treatment plant buffers; b. Meru Waste Disposal Facility; and c. Geraldton Airport.
	Does the Local Planning Strategy identify current and future waste facility sites?	Yes and No
		Please provide details below: Current waste facility site identified. No future sites identified as yet due to the signficant capacity of the current site (to 2050)
	Does the Local Planning Strategy identify buffers around existing and/or future sites to avoid land use conflict?	YES
		Please provide details below: The Narngulu waste disposal site buffer is reflected as a special control area in Local Planning Scheme No 5. The schemes' provisions prohibit residential land uses and other sensitive land uses in the waste disposal site buffer. This special control area also prohibits the development of more than one dwelling per lot for land zoned general farming.
Local Planning Scheme	TITLE:	City of Greater Geraldton Local Planning Scheme No1
	GAZETTED:	18th June 2019
	NEXT REVIEW DUE:	
	Are resource recovery facilities, waste disposal facility and waste storage facility defined as land uses (as per *Planning and Development (Local Planning Schemes) Regulations 2015*) and included in the council Local Planning Scheme zoning table, with either a P/I/D/A/X permissibility?	NO
		If NO please provide comments below: As part of the next local planning scheme review process the land use definitions will be updated to be consistent with the Regulations.
	If these land uses are not defined and not in the zoning table, how does the Scheme deal with such land uses (i.e. is an alternative definition used to that in the *Regulations 2015*? Or are these land uses zoned as "Use not listed")?	**Please provide details below:** Use not listed
	Does the Local Planning Scheme identify statutory buffers as Special Control Areas for strategic waste infrastructure facilities to avoid encroachment by incompatible land uses?	YES **If NO please provide comments below:**
Local planning policies	TITLE:	
	ADOPTED BY COUNCIL:	
	RELATIONSHIP TO WASTE STRATEGY OBJECTIVES:	
	Does the local government have any local policies which relate to the objectives of the Waste Strategy (reduce generation, increase recovery, protect the environment)?	NO **If YES please provide comments:**

Other	TITLE:	
	ADOPTED BY COUNCIL:	
	RELATIONSHIP TO WASTE STRATEGY OBJECTIVES:	

6.3.4 Sustainable procurement

Local governments can be significant consumers whose purchasing decisions and procurement policies can have positive impacts. This section reviews activities relating to procurement of infrastructure, goods and services that avoid waste, promote resource recovery or encourage greater use of recyclable and recycled products. Information on existing sustainable procurement policies or practices that may contribute to the Waste Strategy objectives should be detailed in Table 17.

Table 17: Existing sustainable procurement policies and practices *(LG to complete the table)*
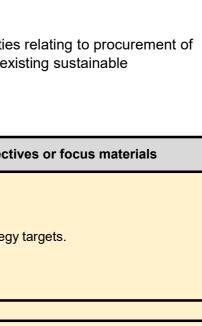
Sustainable procurement policy or practice	Date adopted by council	Actions implemented	Alignment with Waste Strategy targets, objectives or focus materials
The City's 'Policy 4.9-Procurement of Goods and Services' is to ensure that sustainable benefits, such as environmental, social and local economic factors are considered as part of the procurement of good and services undertaken by the City.	23-Oct-18	Ongoing	Review required to align more closely with Waste Strategy targets.

Additional comments *(local government to insert any additional comments that may be applicable)*
Sustainable Procurement Comments: Currently, the City's policy for procurement of Goods & Services only provides for an option for environmental, Social & local economic factors. The City will need to review the policy to incorporate more sustainable behaviours to use recyclable material once this material is readily available at the Landfill. Under the new Landfill management contract with Cleanaway, the City has allowed for regular crushing of C&D material, composting of FOGO waste and mulching of Greenwaste. These waste types can potentially be used locally and encouraged to be used through out Procurement Policy. Auditing of the City's expenditure and identification of how to incorporate sustainable procurement practices that encourage greater use of recycled products will support local market development, increase the recovery of waste, and offset the costs associated with that recovery for the community and the City.The subsequent development of a tailored and suitable sustainable procurement policy for the City will ensure these initiatives are maintained in the longer term.

Part 1 - Services and performance
6.0 Waste management tools

6.4 Behaviour change programs and initiatives

Communication and engagement with waste generators and managers underpins many local government waste management activities, and are vital in driving behaviour change needed to achieve the objectives and targets of the Waste Strategy.

Behaviour change programs and initiatives refers to activities that increase awareness, skills and knowledge; provide consistent messaging; help people to use waste infrastructure; and encourage the adoption of specific, positive waste behaviours and attitudes.

Most local governments have existing behaviour change programs and initiatives and it is important to evaluate their effectiveness. This section includes an opportunity for a high level qualitative assessment process to understand what has worked and what has not. The results can be used to inform actions for *Part 2 – Implementation plan (Table 21).*

Information on the local government's existing waste behaviour change programs or initiatives should be detailed in Table 18. This may include participation in Waste Authority funded programs, or programs/initiatives run by the local government.

Table 18: Behaviour change programs and initiatives, including Waste Authority programs and other local government initiatives (LG to complete the table)

Local government program/initiative	Description	Outcomes achieved as a result of the program (Qualitative/quantitative)	Evaluation method	What's worked/not worked	Suggested improvements
Nil					

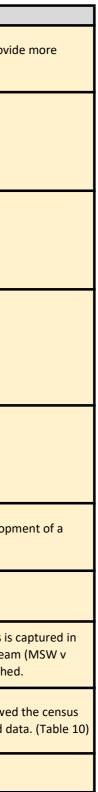| **Additional comments** *(local government to insert any additional comments that may be applicable)* |
|---|
| *The City currently does not have a Behaviour Change Program. However, for the implementation of the full FOGO roll out, an education officer will employed and used to implement educational and behaviour change program. This is not due to occur until mid 2021.* |

6.5 Data

Table 19 provides an opportunity to assess existing waste data practices, identify strengths and gaps and consider the kinds of data activities which could be included in the *Part 2 – Implementation Plan* to improve the local government's waste data. It should be completed based on the data/information covered in *Part 1* of this document, as well as the individual experience of the officer/s responsible for collecting and using waste data.

Where 'no', please comment on:
- the kinds of data that is missing, where data gaps exist
- barriers to collecting or accessing adequate data
- the kinds of data collection, analysis or reporting practices that are not currently in place which would assist local government waste management functions.

Table 19: Assessment of waste data (LG to complete the table)

	Please ✓		Comment
	YES	**NO**	
Does the local government have access to adequate waste data to complete Part 1 of the waste plan?	√		In general yes, however current methods of reporting data into Mandalay gatehouse system require further refining to provide more accurate material and material stream breakdown.
Does the local government use waste data when undertaking planning activities for waste projects/programs?	√		
Does the local government have access to adequate waste data for this purpose?	√		
Does the local government use waste data when monitoring or assessing waste projects/programs?	√		
Does the local government have access to adequate waste data for this purpose?	√		
Does the local government use adequate waste data to measure progress toward the targets and objectives of the Waste Strategy?		√	The City has not previously had to report on its progress toward the targets and objectives of the Waste Strategy
Does the local government have access to adequate waste data for this purpose?	√		
Does the local government have access to adequate waste data to fulfil annual data reporting obligations under the WARR Regulations? (previously undertaken through the Waste and Recycling Census)	√		Comments as q1 above
Are there any types of waste data that the local government does not currently collect or have access to that would be helpful/useful?			Litter and illegal dumping data could be improved. The City will revise methods to improve data collection as part of development of a comprehensive litter strategy.
Are there any ways which local government waste data collection, storage or use could be improved?			Yes - as in Q1 above. Also consistency of input by gatehouse staff difficult to manage.
Is the data collected by the local government accurate? Are any new strategies needed to improve accuracy?			Yes - we believe it to be 80% accurate. Better differentiation between MSW and C&I streams and the manner in which this is captured in the Mandalay system could be improved. Currently using assumptions for some waste types in terms of types of waste stream (MSW v C&I). Residential C&D /metals/greenwaste are entered using nominal amounts and not weighed. Mattresses also not weighed.
Does the pre-filled data provided in this template align with the data the local government has? i.e. is this pre-filled data accurate?			Yes the prefilled data is accurate and aligns with that was provided in the previous census data. The City however as reviewed the census data and found inconsistences in the method it used to generate the results. The data in this template reflects the updated data. (Table 10)
Any additional comments?			

Part 1 - Services and performance

7.0 Summary

The purpose of *Part 1* of the waste plan is to consolidate information about current waste management practices, to enable you to assess and identify:
• current waste management performance
• alignment between current waste management practices and the Waste Strategy
• strengths and successes, as well as gaps and opportunities for improvement.

Table 20 provides space to analyse the data and information presented in *Part 1*, and should be used to determine waste management priorities for the short, medium and long term, and translate these priorities into actions in *Part 2 – Implementation plan (Table 21)*.

Table 20: Assessment of current waste management performance and prioritisation of future actions (Completing this table is optional)

Waste management achievements (for example, performance/achievement against Waste Strategy targets or objectives or where particular waste management objectives have already been met)	
Opportunities for improvement (for examples, where performance against Waste Strategy targets or objectives could be improved or where waste management objectives have not been met)	
Priority areas for action in Part 2 – Implementation plan	**Ongoing (activities currently under way and/or continuously undertaken)** See implementation plan attached
	Short term (within the next 1-2 years) See implementation plan attached
	Medium term (within the next 3-5 years) See implementation plan attached
	Long term (more than five years) See implementation plan attached

Part 2 - Implementation plan

This implementation plan outlines the actions which your local government will take over the next 5+ years to contribute to the achievement of relevant Waste Strategy targets and objectives. It is where the priorities described in the summary (*Part 1 – 7.0 Summary, Table 20*) are translated into actions. Please refer to the *Guidance Document* under sections: **4.0 How to complete Part 2 – implementation plan, 5.0 Better practice and 6.0 Waste management tools,** when developing this implementation plan.

CGG anticipated delivery timeframes
December 2021 - December 2022
January 2023 - December 2024
January 2024 - December 2025

Table 21: Implementation plan

Waste Management Tool	Action (OR link to existing local government plan/document that details this activity)	Is the action new or existing?	Detailed actions/sub-actions (OR link to existing local government plan/document that details this activity)	Milestones (SMART - Specific, Measurable, Achievable, Relevant, Timed)	Target (SMART)	Timeframe for delivery (completion date)	Cost of implementation incorporated into annual budget and Corporate Business Plan? Y/N - (if not, why?)	Avoid	Recover	Protect	Responsibility for implementation (branch, team or officer title, not the names of individual officers)	Identified Risks (Impact/consequences and mitigation strategies)
Waste services	Introduce a FOGO kerbside collection service	new	1. Review the State Government better practice guidance 'Better Bins Plus - Go FOGO' 2. Develop a project plan covering service options and specifications, performance measures and implementation plan 3. Undertake a 12 month trial to identify resource requirements for a full roll-out, stage processing requirements for FOGO material, provide projected cost estimates and provide information on trial program challenges & successes 4. Review outcomes of trial program. 5. Procure kerbside collection services for the 2 bin system (FOGO and Waste) to support full scale FOGO roll out 6. Undertake full phase roll out the service including a supporting behaviour change program 7. Pursue regional FOGO processing services for surrounding local governments.	Council has endorsed the following timeline for implementation: 2019/2020: Undertake 12-month trial including phase 1 construction of composting facility. 2020/2021: Increase trial to 2500 residents 2021/2022: Full phase rollout to 17,000 residents including processing infrastructure upgrades and approvals 2022+: Pursue regionalisation – processing hub for surrounding local government FOGO services The City will need to review the outcomes of the FOGO trial and incorporate the findings into the full rollout scheduled for 2021/2022.	Introduce a kerbside FOGO service to residents within the City boundaries	by 2022	Yes		√	√	Waste Department	*Risks:* Potential roll-out may not occur if trial results shows unsuccessful, Delivery timeframe may be pushout due to financial/human resources availability, Community push back, high contamination rates, transitioning to smaller bins/less frequent collection, cost overruns. *Mitigation:* Staged rolled to minimise annual cost of roll out, Apply for Waste Authority grants to reduce cost (Better bins, CIE grants, Waste sorted grants...) Engagement and education of community
	MGB collection authorisation project	new	1. Develop a project plan including project deliverables, resourcing requirements, timeframes, performance measures and implementation plan. The project will include the delivery of a kerbside MGB audit to ensure City records match MGBS presented for collection and the provision of authorisation stickers for kerbside MGBs to ensure that only bins authorised for collection are collected by contractors. 2. Secure project budget 3. Implement project plan.	1.Project plan developed by February 2021 2. Request for project funds included as part of the 2021-22 Council budget development process 3. The development of supporting resources including bin stickers and engagement and communication plan is completed by June 2021 4. Project implemented June - December 2021	Bins within the City are audited and authorised for collection stickers in place.	by Dec 2021	No. New project budget will need to be discussed for FY2021-22				Waste Department collaborating with Rates Services	*Risks:* Ability to reach rental properties to implement the program, CGG reputation *Mitigations:* Communication & Engagement prior to the introduction, Allow for a transition period
	Investigate options for MGB standardisation	new	1. Review issues with current approach to MGB ownership and investigate potential options for MGB standardisation. 2. Determine preferred approach. 3. Attain budget funds for preferred approach if required. 4. Implement preferred approach.	1. Review of current approach and identify potential standardisation options by Oct 2022 2. Determine preferred approach and develop project plan by Dec 2022 3. Request for project funds included as part of the 2023-24 Council budget development process 4. Implement project plan for MGB standardisation Jan - Dec 2023	MGBs within the City are uniform and meet Australian standard requirements	by Dec 2023	No. Review of action is required and preferred approached chosen before incorporation in annual budget	√			Waste Team	Unknown at this point
	Review kerbside MGB configuration and servicing to support FOGO rollout	new	1. Engage with FOGO trial recipients to determine issues and challenges with current bin configuration and servicing frequency. 2. Review options available to meet customer and City requirements. 3. Determine the appropriate configuration and servicing frequency for the greater city roll out of the two bin system. 4. Incorporate outcomes into the new kerbside collection contract/s.	1. Engagement with FOGO trial recipients undertaken by March 2021. 2. Determination of the optimal MGB bin configuration and servicing frequency to support full scale roll out completed by June 2021. 3. Contract variations to kerbside collection contracts completed by Oct 2021.	Outcomes of the FOGO trial are reviewed and considered to inform the City wide roll out of the two bin system and kerbside collection contract requirements.	by 2022	Partially. The City is dedicated in implement FOGO and is ready to increase servicing and change MGB bin configuration if required.		√		Waste Team	*Risks:* Trial residents support an alternate bin configuration and servicing frequency than originally planned by the City as part of the FOGO rollout, Increase administration resources to vary contracts for collection in change in servicing and configuration required, Increase in costs to the City. *Mitigations:* Engagement with trial recipients to determine what is best outcome to ensure successful take up of FOGO within the City.
	Vergeside skip bin services review	new	1. Review the bulk waste kerbside service options and community preferences. 2. Determine a service preference for presentation to Council based on outcomes of review and community preferences. 3. Present to Council for adoption. 4. Implement Council recommendations.	1. Review completed and preferred service preference defined and costed by March 2021. 2. Council report prepared and presented by June 2021. 3. Implement preferred approach subsequent to Council adoption.	The preferred option for a bulk waste service is determined by June 2021.	by June 2021	Yes. Current vergeside practices is budgeted.		√		Waste Team	*Risks:* Community pushback if the program ceases, community dissatisfaction issues with current service format *Mitigations:* Ensure good communication and engagement with community
	Develop the Meru Waste Disposal Facility masterplan	new	1. Develop scope and RFQ to appoint a consultant to prepare the Meru Waste Disposal Facility masterplan including prerequisite research and investigation into future site infrastructure needs to 2030 and beyond. 2. Advertise and award project. 3. Implement project	1. Develop, advertise and award quote to consultants (Quarter 1 - 2021) 2. Project research and investigation (Quarter 2 - 2021) 3. Draft report submitted and finalised (Quarter 3 -2021)	The MWDF masterplan is completed by December 2021	by Dec 2021	Yes		√	√	Waste Team	*Risks:* Major changes required at the Meru Disposal Facility to comply with new DWER requirements Expensive process if drilling or underground surveys are required *Mitigations:* Ensure future planning meets current best practice documents and guidelines

Category	Action	Status	Tasks	Milestones	Outcome	Timeframe	Budget allocated				Responsible	Risks/Mitigation
Waste infrastructure	Construction of the FOGO processing facility	new	1. Review the FOGO trial outcomes. 2. Determine the appropriate size and scale of facility to be constructed to cater for full phase roll out. 3. Complete construction design requirements. 4. Obtain relevant DWER approvals to enable construction of facility. 5. Secure services for construction through RFT 6. Construct facility and submit DWER construction compliance reports as required 7. Operate facility	1. FOGO trial outcomes reviewed and facility designed to meet City requirements by December 2021. 2. DWER approvals submitted by March 2022. 3. Construction services secured by August 2022. 4. Construction of facility completed by December 2022.	Expansion of the FOGO processing infrastructure to accommodate the full FOGO program rollout.	by 2022/2023	No. This will be discussed as part of the 2022-2023 budget and is dependent on the success of the trial		✓		Waste Team	*Risks:* Potential roll-out may not occur if trial results shows unsuccessful, Delivery timeframe may be pushout due to financial/human resources availability *Mitigations:* Staged rolled to minimise annual cost of roll out , Apply for Waste Authority grants to reduce cost (Better bins, CIE grants, Waste sorted grants...)
	Construction of a best practice Regional Resource Recovery Facility (RRRF) at the Meru site	new	1. Design the RRRF to match the current and future throughput of materials, safety issues, environmental protection, better practice flexibility/adaptability for future expansion needs, and user friendliness. 2. Obtain funding for construction 3. Obtain relevant approvals. 4. Develop supporting documentation for construction including design drawings, technical specifications, bill of quantities and tender for services, contract for services 5. Procure services for construction 5. Construct the facility. 6. Develop operational management plans, undertake training of staff and implement marketing and engagement of community. 7. Operate facility	1. Preferred design of RRRF defined and adopted by Council by Dec 2020. 2. Budget allocated by Dec 2020. 3. DWER construction and operational approval requests submitted by January 2021. 4. Develop construction documentation and release RFT by February 2021. 5. Review and adopt preferred construction contractor by March 2021. 6. Construction of facility to be completed by July 2021. 7. Develop supporting operational and management plans for the facility by July 2021. 8. Train staff on operational requirements of new facility by August 2021. 9. Develop community education and engagement material for promotion and use of new facility by August 2021.	The RRRF is constructed and operational by August 2021	by August 2021	Yes		✓	✓	Waste and Project Delivery team	*Risks* : Low visitation rates, high contamination rates, higher than anticipated operational and capital costs, lack of resources to implement project *Mitigation:* education and engagement of community, Project incorporated in annual operational plans, whole of life costing undertake for operation and management of facility and reflected in the City's long term financial plans
	Capping of Cell 1-4	existing	1. Review the CGG landfill closure management plan for capping of cell 1-4 2. Develop and release RFT for closure and capping services 3. Award RFT for closure and capping services 4. Undertake capping and closure requirements.	1. Review CGG landfill closure management plan for capping of cell 1-4 by Dec 2022 2. Develop and release RFT for closure and capping services by June 2023 3. Award RFT for closure and capping services by October 2023 4. Undertake capping and closure requirements Jan- Dec 2024	Cells 1,2,3&4 are capped in 2024.	by 2025	Yes			✓	Waste and Project Delivery team	*Risks:* insufficient resources capacity/conflicting resource priorities to undertake procurement requirements and manage project *Mitigation:* Ensure project incorporated into annual operational plan and appropriate resources allocated
Policies and procurement	Implement Waste local laws	existing	The local law making process follows the steps outlined in the Local Government Act 1995, section 3.12 and further defined in the Local Government Operational Guidelines Number 16 –'Local Laws' (Department of Local Governments and Communities)	1. The draft waste local laws are endorsed by Council June 2019. 2. The waste local laws are published in the Government Gazette by June 2020. 3. Public notice as to adoption of the waste local law is provided to the community by November 2020.	The City has appropriate local laws to govern waste management practices within the City.	by November 2020	Yes			✓	Governance and Risk team	*Risks: Community* unaware of changes to local laws *Mitigation:* Ensure appropriate consultation and communication with community
	Develop an Emergency Waste Management Plan (EWM Plan) for the City	new	1. Engage with the Local Emergency Management Committee in regards to the need for specific emergency waste management arrangements for the City. 2. Develop a project scope for development of the City's EWM Plan and release a RFQ for services to develop the plan. 3. Work with consultants to develop a relevant and specific plan for the City. 4. Review and finalise EMW plan. 5. Submit plan to Council for adoption. 6. Implementation plan as required.	1. Engagement with the Local Emergency Management Committee by December 2021. 2. Project scope defined and RFQ for development of the City's EWM Plan released by March 2022. 3. EWM plan developed, reviewed and finalised by October 2022. 4.Plan submitted to Council for adoption by December 2020.	Increased level of City and community preparedness through development of a Emergency waste management plan for the City	by December 2022	No. Project will be included as part of the 2022/23 budgetary processes	✓	✓	✓	Waste and Emergency management team	*Risks:* insufficient resources capacity/conflicting resource priorities to undertake project *Mitigation:* Ensure project incorporated into annual operational plan and appropriate resources allocated
	The City's Strategic Community Plans and operational business plans and budgets align with the actions and outcomes of the CGG SWMRAP 2020-2030	new	1.The City's SWMRAP is presented to Council for adoption and includes recommended actions and allocates appropriate resources/funding to assist officers in implementing the plan. 2. The SWMRAP is endorsed as a guiding document for development of the City's annual financial and operating plans.	The City's SWMRAP 2020 - 2030 is endorsed by Council by December 2020	The City's SWMRAP 2020 - 2030 is endorsed by Council by December 2020	2020 - 2030	Some actions are already endorsed as part of the annual budget and long term financial planning processes. Other actions for implementation will be assessed as part of the annual budget process that occurs each year.	✓	✓	✓	Waste Team	*Risks:* Projects/actions not endorsed for inclusion within annual budgets, conflicting resource priorities and/or insufficient resources capacity to implement requirements of SWMRAP. *Mitigation:* Obtain external funding for projects where possible, review internal resource allocation to ensure City appropriately resourced to implement the actions endorsed as part of the SWRAP 2020 -2030.
	Review of delivery option for contracted services	existing	1. A project plan is developed identifying all city waste contracts and expiry timeframes, review process and implementation plan. 2. At least 6 months prior to expiry, a review of the contract is undertaken to assess the best value option for delivery of the service including costs, benefits, challenges and opportunities for internal provision of services as compared to delivery through external contracts. The review should also include opportunities to refine and improve service delivery outcomes and alignment with waste strategy objectives where possible. 3. Implement outcomes of review as required.	1. Project Plan for waste contracts review process developed by June 2021. 2. Project plan implemented on an ongoing basis. All City contracts are reviewed prior to expiration of the contract period.	All City contracts are reviewed prior to expiration of the contract period or as required.	ongoing	Yes.	✓	✓	✓	Waste Team	*Risks:* Lack of resources to undertake project *Mitigation:* Project written into annual operational plans
	Assessment and review of domestic drop off services and costing options	new	1. Develop project scope and release RFQ to assess and review domestic drop off services and costing options (quantity, sources, cost, equity). 2. Determine an appropriate fee structure for domestic and commercial drop off including the recommended format of future domestic subsidy if required e.g. free pass system with rates notice, and format/system for charity & non for profit disposal fee waivers. 3. Seek Council endorsement of recommended option .	1. Project scope defined and RFQ released by January 2021. 2. RFQ awarded by February 2021. 3. Project completed by March 2021. 2.Appropriate fee structure for domestic and commercial drop off and format of domestic subsidy if required determined by April 2021. 3.New fees and charges incorporated as part of the 2022/2023 annual budget process.	An appropriate fee structure for domestic and commercial drop off and format of future subsidy finalised by June 2021.	By June 2021	Yes			✓	Waste Team	*Risks:* - Community pushback as to changed format of disposal subsidy and fee changes *Mitigation:* - Good communication with the community, potential reduction of waste rates charges as result of review

Category	Action	Status	Tasks	Milestones	Outcome	Timeframe	Budget				Responsibility	Risks / Mitigation
Data	Review of current waste data capture methods	new	1. Undertake review to improve accuracy of reporting by waste stream to track progress towards the targets and objectives of the waste strategy and to comply with the better practice (mandatory reporting requirements). 2. Update data capture and recording methods where required. 3. Train staff on changes.	1. Review undertaken by March 2021. 2. Outcomes of review implemented by May 2021 Procedures for data capture and recording methods where required. 3. Staff trained on changes by June 2021.	Gatehouse data capture and recording methods reviewed and updated	By June 2021	Yes		√		Waste Team	*Risks:* Lack of resources to undertake project, Unable to align with DWER categories *Mitigation:* Project written into annual operational plans, work with Mandalay to update gatehouse software to meet City data requirements if required
	Undertake regular kerbside MGB compositional audits	new	1. Undertake a representative kerbside bin audit in 2021. 2. Schedule regular audits for future years in operational planning and budget preparations. 3. Procure services for audits as required.	1. Services for kerbside bin audit procured by March 2021. 2. Bin audit finalised and report on outcomes provided to the City by June 2021. 3. Kerbside bin audit programmed into annual operational and budget plans every two years.	A kerbside bin audit is undertaken in 2021 and every second year.	2021 and ongoing	Yes		√		Waste Team	*Risks:* Lack of resources to undertake project *Mitigation:* Project written into annual operational plans
Behaviour change programs and initiatives	Appoint a Waste Education Officer	new	1. Prepare a report to support appointment of new waste education officer for executive review. 2. Obtain approval for new position. 3. Complete recruitment process.	1. New waste education officer position endorsed by CEO by Mar 2021 2. Complete recruitment process by June 2021	A new waste education officer is appointed by June 2021	By July 2021	No, Approval of staff structure change is required prior to budget changes	√	√	√	Waste Team and Human Resources Team	*Risks:* Lack of support for a new position *Mitigation:* Communication with exec and Council as to the City's responsibilities in regards to meeting the Waste Strategy targets
	Develop and implement a community education and engagement program	new	1. Develop a five year community education and engagement strategy. 2. Implement the strategy providing relevant resourcing where required. 3. Provide for reporting of outcomes within the City's annual reporting to the community.	1. Draft strategy produced by November 2021. 2. Final strategy presented for Council endorsement by Dec 2021. 3. Strategy implemented as of Jan 2022 - Dec 2026. 4. Annual reporting of outcomes provided within the City's annual reporting to the community.	Develop and implement waste education and engagement programs within the community	by Dec 2021 and ongoing	No, item will be included as part of 2021/22 budget processes	√	√	√	Waste Team	Risks: lack of stakeholder commitment, lack of Council support Mitigation: develop robust stakeholder communications plan, ensure clear communication of project objectives
	Develop a litter and illegal dumping strategy for the City	new	1. Obtain/identify suitable resourcing to develop the strategy. 2. Develop the strategy. 3. Implement the strategy providing relevant resourcing where required. 4. Provide for annual reporting of outcomes within the City's annual reporting to the community. 5. Undertake a review of the strategy.	1. Resources to develop strategy identified by January 2022. 2. Strategy developed and endorsed for implementation by June 2022. 3. Strategy implementation to begin at the commencement of the 2022/2023 financial year. 4. Review of strategy undertaken within 3 months of completion.	A litter and illegal dumping strategy is developed and resources attained for its implementation.	by Dec 2022 and ongoing	No, action will be included in the 2021-22 budget processes			√	Waste & Ranger Team	Risks: lack of stakeholder commitment, lack of Council support Mitigation: develop robust stakeholder communications plan, ensure clear communication of project objectives
Other	Establish a Midwest officers advisory group	new	1. Seek interest and approval from CGG Executive/Council for the City to lead the establishment and ongoing operation of a Midwest waste officers advisory group. 2. Seek interest from BROC member Councils to participate in group. 3. Formulate group charter, objectives and annual meeting schedule. 4.Commence regular meetings.	1. Approval from CGG Executive/Council for the City to lead the establishment and ongoing operation of a Midwest waste officers advisory group obtained by February. 2. Patriation by surrounding local governments confirmed by April 2021. 3. Group charter, objectives and meeting schedule developed by May 2021. 4. Meetings to commence as of commencement of 2021/2022 financial year.	To establish the officers group and maintain regular meetings.	by Dec 2021	Yes	√	√	√	Waste Team	*Risks:* lack of BROC member council support and commitment, lack of Council support *Mitigation:* ensure clear communication of benefits and outcomes to be attained through increased collaboration within the region

Bin Audit Composition Category Details

Recyclable Components				
1	2	3	4 Descriptors	
Recyclables	Paper	Recyclable Paper	Newspaper	Newspapers, Newspaper like pamphlets,
			Glossy Paper	magazines (glossy) pamphlets, present wrapping paper,
			Office Paper	A4 document paper, writing pads, letters, stationery papers, Print / Writing Paper, envelopes
			Coloured Paper	Coloured Paper
		Non-Recyclable Paper	Composite Paper	Composite paper items where the weight of the paper is estimated to be greater the weight of the other materials, envelopes with transparent windows
			Contaminated Paper	Paper towel, Paper Napkins, Contaminated Paper - soiled not recyclable
			Other Paper	Non-Recyclable Paper, greaseproof paper, paper with wax coating, high wet strength papers, telephone books
	Cardboard	Recyclable Cardboard	Corrugated Cardboard	Corrugated cardboard boxes,
			Packaged Flat Cardboard	packing boxes etc, cereal boxes, business cards, folding cartons
			Liquid Paper Board Foil Lined and Other	UHT / Long life milk, Soy Milk Cartons, some fruit juice cartons, Carbon barriers, Milk Cartons, Cardboard with wax coating, paper/disposable cups including biodegradable cups
		Non-Recyclable Cardboard	Composite cardboard	Composite cardboard items where the weight of the cardboard is estimated to be greater the weight of the other materials, e.g. pringle boxes etc,
			Contaminated Cardboard	Contaminated Cardboard e.g. pizza boxes
			Other Cardboard	Non-Recyclable Cardboard
	Plastics	Recyclable Plastics	PET #1	Soft drink bottles, juice bottles, some food & mouthwash containers (e.g. jam & sauce bottles, peanut butter jars) including coloured PET
			HDPE#2	Milk and cream bottles, shampoo and cleaner bottles, HDPE bottles, including coloured HDPE
			PVC#3	Cordial and juice bottles, blister packs, plumbing pipes and fittings, PVC labels
			LDPE#4	Ice cream container lids, cream bottle lids, squeeze bottles, lids, builder's black plastic, black mulch film, plant nursery bags
			Polypropylene#5	Ice cream containers, drinking straws, pot plant pots, some bottle caps, plastic garden settings, potato crisp bags, compost bins
			Polystyrene #6	Yoghurt / sour cream containers, hot drink cups, take away containers, plastic cutlery, video/CD boxes, packaging foam, any foam
			Plastic#7 Other	Tupperware, Mixed unidentifiable plastics, all other resins and multi-blend plastic materials
		Non-Recyclable Plastics	Plastic Bags	Plastics Shopping Bags, Plastic Produce/Food Bags, Resealable Plastic Bags, Bin liners, Garbage bin liners, Compostable Plastics Bags
			Plastic Film	Cling film
			Composite (Mostly Plastic)	Composite plastic items where the weight of the plastic is estimated to be greater than the other material items
	Glass	Recyclable Glass (CDS Glass)	Glass Bottles	Beer/Cider Mixed Drinks, Soft drink bottles, not broken glass
		Recyclable Glass	Glass Other	wine bottles, food and sauce jars,
		Non-Recyclable Glass	Miscellaneous/Other Glass	Plate glass (window and windscreen), broken light globes glass, glass particles, Black or ceramic lined glass, Including broken glass that is recyclable more than 50mm in size
	Ferrous (Steel)	Steel	Steel Cans	Food cans, pet food cans, tins, empty paint tins,
			Steel Aerosols	Aerosol cans
			Composite Ferrous (Mostly Ferrous)	Composite ferrous items where the weight of the metal is estimated to be greater than the other material items

			Ferrous Other	Beer bottle tops, 100% ferrous items that are not cans / tins / packaging materials
	Non Ferrous (Aluminium)	Aluminium	Aluminium Cans	Beer and soft drink cans,
			Aluminium Aerosols	Aluminium aerosol cans
			Aluminium Foil	clean foil
			Composite Non-Ferrous (Mostly Non-Ferrous)	Composite non-ferrous metal items where the weight of the metal is estimated to be greater than the other material items
			Non-Ferrous Other	Copper / brass / bronze items, other metals (not ferrous / aluminium), Aluminium tamper proof seals

Contaminants/Non-Recyclable Components

Organic	Organic	Organic	Food Waste	Vegetable scraps, meat scraps, animal food, leftover food, Food particles, Bones
			Green Waste	Grass clippings, tree trimmings / pruning's, flowers, tree wood
			Packaged Food Waste	(Liquid containers - quarter full or more) and (Food Waste in containers or bags)
			Other Putrescible	Animal excrement, mixed compostable items
	Other Organics	Other Organics	Wood/Timber	Milled wood / timber, wooden skewers
	Textiles	Textiles	Textiles	(Natural/Synthetic - Apparel/Bedding etc.), (Leather and Rubber)
			Other Textiles	Shoes, handbags, millinery etc
	Earth	Earth	Soil/Dust 'n' Dirt and Inert and Broken Glass, Ash/Coal	Vacuum bag contents, soil, rocks, dirt, grit, mud, Broken Glass less than 50mm in size
			Ceramics, Rocks/Stones, Bricks, Concrete	Bricks and stones, Cups, bowls, pottery items, concrete
Hazardous	Medical	Medical Waste	Pharmaceuticals	Unused prescription medicine, vitamins and Minerals
			Medical Waste	Band aids, Bandages, Used surgical gloves, Surgical Instruments, Medical aids/kits, Medical devices and radioactive materials, any solid waste generated from a diagnosis, treatment of humans or animals, /Medical Other
			Hypodermic Syringes	Hypodermic Syringes, Epi Pens
	Pathogenic Infectious	Pathogenic Infectious	Sanitary / Hygiene	used tissues (items with any bodily fluids), tampons/pads, cotton buds)
			Nappies	Adult and Child disposable nappies
	Hazardous	Hazardous	Chemicals	Bleach, Shampoo, Cleaning Products, (where the weight of the product is estimated to be greater than the weight of the container)
			Paint	Wet/Dry Paint
			Batteries Household	Batteries (Single Use and Rechargeable), Mobile phone battery
			Batteries Other	Vehicle Batteries e.g. Car/Boat, Industrial batteries e.g. Power Supply (UPS)
			Fluorescent Tubes/Light Bulbs	
			Oil Household, Motor & Other	
			Building Material	
			Hazardous Other	Uncategorized hazardous waste
Other	Electronic Waste	Electronic Waste	Toner Cartridges	Toner Cartridges
			Computer Equipment	Computer Components, Peripheral Devices/Computer Printer or Photocopier/Printer
			Mobile Phones	Mobile phones
			Electrical Items	Electrical Products
	Miscellaneous	Miscellaneous	Miscellaneous (Specify)	Any items not applicable to other categories

GLOSSARY

Avoidance	Avoidance refers to the prevention or reduction of waste generation and is the most preferred option in the waste hierarchy.
Better practice	Better practice refers to practices and approaches that are considered by the Waste Authority to be outcomes-focussed, effective and high performing, which have been identified based on evidence and benchmarking against comparable jurisdictions
Commercial and industrial waste (C&I)	Solid waste generated by the business sector, State and Federal Government entities, schools and tertiary institutions.
Commercial waste services	• Refers to drop-off, kerbside, vergeside or other waste services provided by the local government to commercial premises. • Discretionary service, not offered by all local governments
Construction and demolition waste (C&D)	Solid waste produced by demolition and building activities, including road and rail construction and maintenance, and excavation of land associated with construction activities.
Disposal	• Disposal refers to the discharge of waste into the environment, either into landfill or another disposal route. • Disposal is the least preferred option in the waste hierarchy.
Drop-off facilities and services	• Drop-off collections are where reportable waste is delivered to the waste depot (drop-off facility) by the residents of the local government i.e. self-hauled waste. • Services are provided to collect waste or recyclable materials. • May be temporary or permanent standalone drop-off points for one or more materials, or may form part of other waste facilities (such as landfills or transfer stations). • **Note**: this does not include HHW drop-off points
Energy recovery	The process of extracting energy from a waste stream through re-use, reprocessing, recycling or recovering energy from waste
Household hazardous waste (HHW) facility	• Refers to facilities for the drop-off and storage of HHW • Includes consideration of the drop-off and storage procedures and infrastructure, staffing and resourcing, layout, operation and management HHW facilities, etc.
Illegal Dumping	Illegal dumping is the unauthorised discharging or abandonment of waste and is an offence under Section 49A of the *Environmental Protection Act 1986*. Illegally dumped waste is generally considered to have the following attributes: <table><tr><td>Volume</td><td>> 1 cubic metre</td></tr><tr><td>Environmental impact</td><td>Contains items/substances that are potentially noxious or hazardous; potential for environmental harm if material leaks, spreads or degrades</td></tr><tr><td>Type of waste</td><td>Commercial or industrial waste; larger-scale household waste</td></tr></table>

	Reason for offence	Premeditated decision; commercial benefit or avoidance of fee
	Mode of deposition	Deposited using a vehicle
Kerbside waste services	• A regular, containerised collection service (often a wheelie bin) where the waste or recycling is collected from outside a resident's dwelling. • Can apply to either recycling or general waste (and in a few instances green waste).	
Landfill	• Refers to inert or putrescible waste, registered or licensed landfills • Activities related to the layout, operation, management and post closure of a landfill. • Includes consideration of the technology and infrastructure on site, staffing and resourcing, and any other waste facilities or services at the landfill site (e.g. greenwaste or recycling drop off, mulching, tip shop, etc.)	
Litter	Litter is defined in the *Litter Act 1979* as including: • all kinds of rubbish, refuse, junk, garbage or scrap; and • any articles or material abandoned or unwanted by the owner or the person in possession thereof, but does not include dust, smoke or other like products emitted or produced during the normal operations of any mining, extractive, primary or manufacturing industry. Litter is generally considered to have the following attributes:	
	Volume	< 1 cubic metre
	Environmental impact	Nil or minor actual or potential environmental impact
	Type of waste	Personal litter
	Reason for offence	Unpremeditated, convenient disposal
	Mode of deposition	Deposited by hand (includes dropping by hand from a vehicle)
Local government waste management	• Refers to waste generated by a local government in performing its functions • Includes materials such as construction and demolition waste from road and footpath building and maintenance; greenwaste from parks maintenance; waste generated at local government offices, depots, and facilities	
Municipal solid waste (MSW)	Solid waste generated from domestic (residential) premises and local government activities	

Peel region	The Peel region is the area defined by the Peel Region Scheme.
Perth metropolitan region	The Perth metropolitan region or the Perth region is the area defined by the Metropolitan Region Scheme.
Public place services	Public place waste services refers to permanent bins provided by local government in public places to collect waste and/or recycling.
Recovery	The process of extracting materials or energy from a waste stream through re-use, reprocessing, recycling or recovering energy from waste.
Reuse	Reuse refers to using a material or item again.
Reprocessing	Reprocessing refers to using an item or material that might otherwise become waste during the manufacturing or remanufacturing process.
Recycling	The process by which waste is collected, sorted, processed (including through composting), and converted into raw materials to be used in the production of new products.
Residual Waste	• Waste that remains after the application of a better practice source separation process and recycling system, consistent with the waste hierarchy as described in section 5 of the WARR Act. • Where better practice guidance is not available, an entity's material recovery performance will need to meet or exceed the relevant stream target (depending on its source - MSW, C&I or C&D) for the remaining non-recovered materials to be considered residual waste under this waste strategy.
Special event waste services	Special event waste management refers to temporary bins and/or waste collection services provided by local government to manage waste generated at events such as fireworks displays, music festivals, sports events, markets etc.
Sustainable procurement	Sustainable procurement involves meeting a need for goods and services in a way that achieves value for money and generates benefits not only to the organisation, but also to society and the economy, while minimising damage to the environment.
Transfer station	• Refers to facilities which undertake large scale consolidation of waste or recyclable materials for transfer to another facility for processing or disposal • Activities related to the layout, operation and management of a transfer station • Includes consideration of the technology and infrastructure on site, staffing and resourcing, and any other waste facilities or services available at the site (e.g. greenwaste or recycling drop off, mulching, tip shop, etc.)
Vergeside waste services	• Vergeside collection services are bulk, infrequent (~every 4-6 month or on demand) services. • Material is collected from residential 'vergesides' either non-containerised or in a skip provided by the local government. Vergeside services may relate to green waste or hard waste • Includes waste and/or recyclable materials that may be mixed or separated and the source and can include green waste or hard waste.
Waste services	Waste services are defined by the W*aste Avoidance and Resource Recovery Act 2007* as the: • the collection, transport, storage, treatment, processing, sorting, recycling or disposal of waste; or

	- the provision of receptacles for the temporary deposit of waste; or - the provision and management of waste facilities, machinery for the disposal of waste and processes for dealing with waste.