



COMMUNITY WASTE MANAGEMENT SURVEY

For Bathurst, Forbes and Parkes



Prepared for Bathurst Regional
Council, Forbes Shire Council, Parkes
Shire Council, Netwaste and Impact
Environmental

4th June 2015

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WRI would like to acknowledge the assistance of Bathurst Regional Council, Forbes Shire Council, Parkes Shire Council, Netwaste and Impact Environmental for their assistance with this survey.

INTRODUCTION

A number of Central West NSW Councils are assessing the feasibility of introducing a collection service for food and garden organic waste. This would reduce the amount of waste going to landfill and could potentially reduce the regularity of collection for other types of waste.

Ahead of the proposed introduction of green waste services in 2016, the NSW Environmental Protection Agency (EPA) is part funding community surveys into certain local government areas to test the current attitudes and behaviours of residents with regard to existing waste recycling and disposal services. The intention is that a similar follow-up survey be conducted in 2017 to test changes in attitudes and behaviours.

NetWaste, a waste management, education and community engagement organisation has engaged the Western Research Institute (WRI) to conduct the above research for the Parkes Shire, Forbes Shire, Bathurst Regional and Wellington Councils.

Impact Environmental is managing the project on behalf of Netwaste to assess the feasibility of introducing a collection service for food and garden organics into these council areas.

The findings of this research are included in this report.

METHODOLOGY

WRI developed a research methodology to survey the behaviours and beliefs of Council populations. Members of the community were encouraged to participate in the survey through the offer to go in a draw to win one \$150 Visa debit card per council area.

Survey Development and Administration

Survey instruments were developed through a consultative process involving participating Councils, NetWaste, Impact Environmental and WRI staff. The survey consisted of a number of screening questions to ensure the survey reaches an appropriate sample of Council populations. Information collected in the survey included respondent views on current waste practices, along with information on respondent's views on proposed changes to local waste services.

The survey instruments used across the four local government areas were identical, except for two questions that were changed to take account of local factors in the Wellington Council area.

Data Collection and Analysis

The survey was administered to residents within target council areas by means of identical online survey and telephone surveys.

- An online survey was administered by WRI through the Survey Monkey online survey tool. Respondents were made aware of the online survey by Council media releases with media outlets, social media and Council websites.
- A telephone survey was also conducted by an independent telephone research organisation, Illawarra Regional Information Service (IRIS). IRIS has a quality assured CATI service and provides telephone survey based data collection services for WRI regularly. Telephone surveys were undertaken some weeks after the commencement of the online survey and targeted specific community segments in an attempt to achieve desired quotas across age and gender characteristics.

Surveys were conducted over an approximate one month period beginning 14 April 2015. Councils undertook local promotion of their surveys via Council websites, and in some cases facebook and print media.

Survey Sampling

The pool of respondents consisted of eligible residents within the target council waste service areas. Sampling was designed to allow for analysis at the total sample level, for each council area, as well as for certain defined segments of the community (strata). For the purposes of this research, WRI employed the demographic variables of age and gender to form the sample strata.

In total, 1101 participants responded to the Survey. Screening questions were asked up front to identify if the participant qualified for the research. Participants qualified for the research if they:

- came from the defined list of localities (Parkes, Forbes, Bathurst and Wellington);
- were 18 years or older;
- did not work for the relevant Council;
- had resided in the area for more than 6 months; and
- were currently receiving a regular waste collection service.

Participants who did not meet the above criteria screened out of the survey. Of the 1101 responses, 120 participants screened out of the survey. In addition to participants screening out, a further 31 participants were classified as providing incomplete responses. Screen outs along with incomplete responses were removed from the analysis, leaving a total of 950 complete surveys for data analysis.

To obtain sufficient response rates for this research, WRI recommended a mixed sampling approach, consisting of telephone and online interviewing. The mixed mode approach was also employed due to the short timeframe in which the study was required to be completed. In order to maximise response rates, all modes of collection were publicised in the local media to ensure awareness amongst residents. The table below displays the mode of collection across the council areas:

Raw n=	Forbes	Parkes	Bathurst	Wellington	TOTAL
Online	73	86	277		436
Telephone	170	171	173		514
TOTAL	243	257	450		950

The final sample size, of 950 completes, at the 95 percent confidence level is sufficiently robust to make inferences about the population within each council area. Participation from the Bathurst council area was particularly high compared to the other council areas. The local newspaper ran an article about the proposed changes during the fieldwork period, dramatically increasing response rates to the survey.

Data Management and Limitations

After completion of the fieldwork, the initial data was cleansed, removing participants that did not complete the entire survey along with other participants that screened out of the survey. As mentioned previously, after cleaning, the final sample achieved for analysis was 950.

Whilst every attempt was made by telephone interviewers to secure sufficient responses across the age and gender strata, participation in the community waste survey was voluntary, resulting in demographic sample characteristics that were not representative of the population of each local government area. To rectify this issue, WRI weighted the data to represent the population of each local government area.

The data was weighted based on respondent's age and gender. The table below shows the comparison between the unweighted data and the population characteristics of each council area. All information presented in the results section of this report is based on the weighted data.

Table 1. Demographic characteristics of the sample compared to the population

Column %	Forbes		Parkes		Bathurst		Wellington	
Gender	Population	Sample	Population	Sample	Population	Sample	Population	Sample
Male	49	38↓	49	41↓	50	34↓		
Female	51	62	51	59	50	66		
TOTAL	100	100	100	100	100	100		

Age	Population	Sample	Pop	Sample	Population	Sample	Population	Sample
18-29 years	16	5↓	17	5↓	24	13↓		
30-44 years	22	19	24	19	25	29		
45-64 years	36	35	35	41	33	39		
65+ years	26	42↑	25	35↑	19	19		
TOTAL	100	100	100	100	100	100		

Note: Sample data is unweighted, Significance is indicated at the 95% ci by higher (↑) or lower (↓).

As you can see from the table above, the sample is not representative of the younger 18-29 year old age group. In addition, females along with persons over the age of 65 are over represented in the sample. As mentioned previously, WRI created a weight based on age and gender to bring the sample in line with the population statistics for each council area. This allows inferences to be made about the sentiment or perceptions of the target population within each local council area.

WRI conducted analysis by mode of contact to identify if there was any potential bias. On examination of the results, the main differences by telephone compared to online contact are briefly described below. Participants contacted by the telephone were:

- more likely to be older (84 percent were 45 years and over, unweighted);
- more likely to be male (42 percent unweighted);
- more likely to own their own home (88 percent unweighted); and
- more likely to have only 2 people living in their home (70 percent unweighted)

Furthermore, these participants:

- mostly have a half or less than half full bin on collection day (47 percent unweighted)
- were on average were more aware of the various products that can be recycled; and
- felt that the proposed recycling service would have a minimal impact on the way they manage their current waste (64 percent unweighted).

On further examination of the results, WRI has concluded that while there are differences between the modes of contact they can be reasonably explained by the respondent's demographic characteristics. Therefore, there is no interview mode bias, and data from both modes of contact can be analysed at the total level.

It should be noted that there is potential that survey results for the Bathurst region were skewed on at least one question. On 5 May 2015, the Western Advocate published a news article, 'Changes to bin collection: residents asked to complete survey', which arguably, made a negative comparison of recent changes in the Orange City Council waste services to proposed changes to Bathurst Regional Council waste services.

This article appears to have made a statistically significant impact on survey answers to 'Question 14 - Council is planning a green bin service, whereby you would receive a bin for garden organic and food waste, which would be collected weekly. Would you use such a service?'.

Answers to this question provided up to and including 4 May had an 87 percent positive response rate, a negative response rate of 6 percent, and a 6 percent unsure response (responses do not add to 100 percent due to rounding). Online survey responses from the Bathurst region surged significantly on the date the article was published, with the positive response rate dropping to 74 percent, a negative response rate of 18 percent and an 8 percent unsure response.

A number of other questions regarding respondent views on proposed changes to Council waste services also received a higher negative response rate after the article was published. However, the data was found not to be statistically significant.

COMBINED REGION – BATHURST, FORBES AND PARKES

Major findings

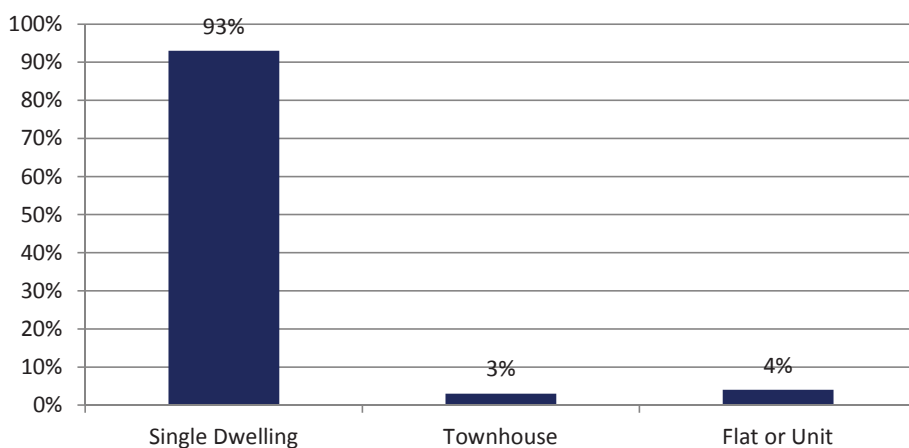
- Garbage and recycling bins are predominantly 'Usually fairly full' on collection day
- 54 percent of respondents put garden organic waste in their garbage and 48 percent compost it
- 78 percent of respondents put their food waste in their garbage and 34 percent feed it to animals
- 86 percent of respondents support Council trying to reduce the amount of waste going to landfill by collecting food and garden waste for composting on a weekly basis
- 27 percent of respondents could not manage fortnightly garbage collections, whilst the remaining 73 percent could manage, but with varying degrees of impact
- 75 percent of respondents gave in-principle support for the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term

Survey results graphed in this section reflect the weighted responses from the online and telephone surveys. Where interesting and significant differences arise, commentary and graphs include data stratified by age or gender. Data in this section is based on complete responses (950).

Household Information

Question 1 - What is your dwelling type?

Figure 1. Dwelling type

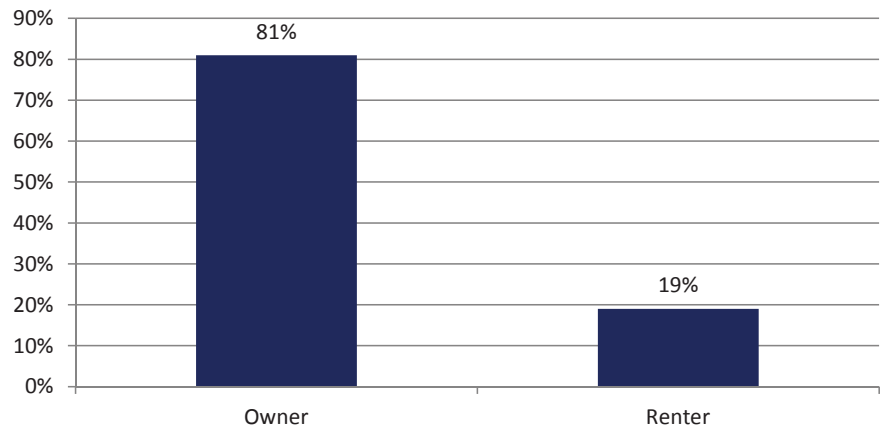


At the combined region level, 93 percent of respondents reside in a single dwelling. A further 3 percent reside in a townhouse, whilst a further 4 percent reside in a flat or unit.

Respondents were asked their residential status, with 81 percent of respondents advising they owned their dwelling, and the remaining 19 percent advising that they rent.

Question 2 - Do you own or rent the dwelling?

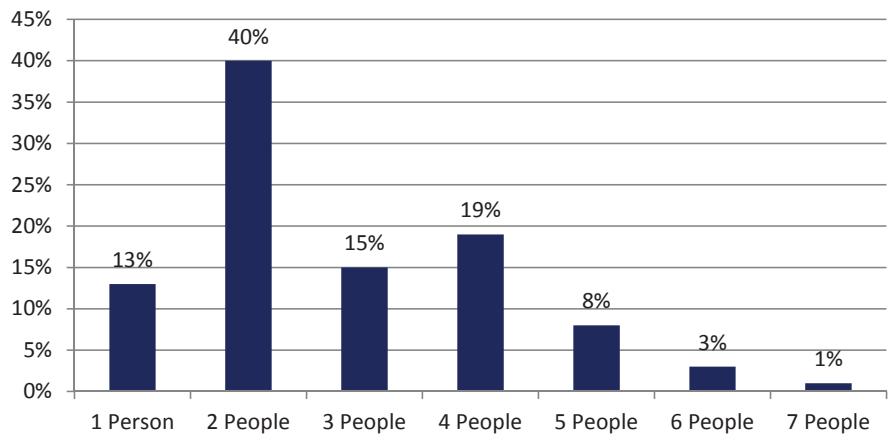
Figure 2. Residential status



The average number of people residing in each dwelling was 2.8.

Question 3 - How many people usually live in your dwelling?

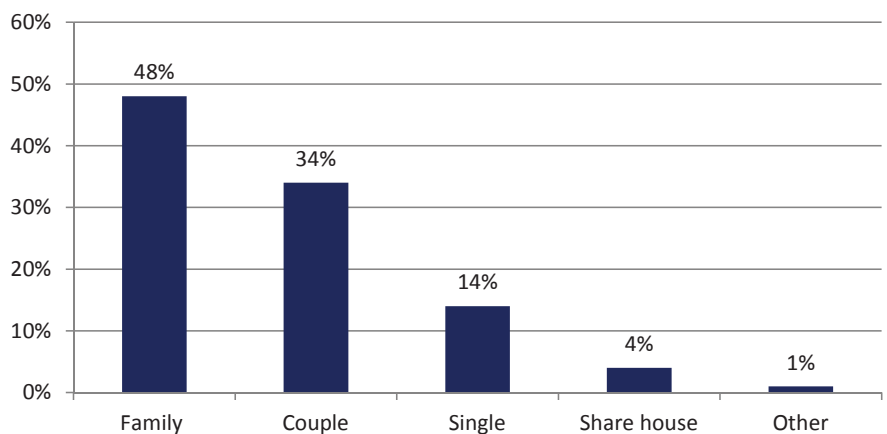
Figure 3. Percentage of dwellings by resident number



The household structure of respondents was predominantly a family household (48 percent), followed by couples (34 percent) and then singles (14 percent).

Question 4 - Household structure

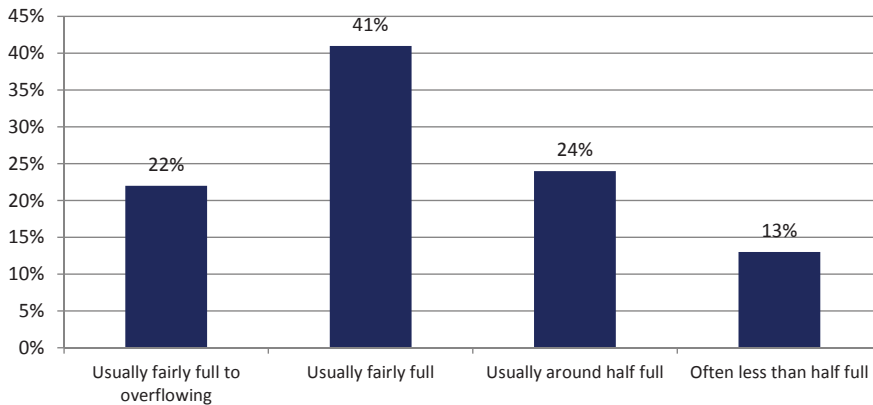
Figure 4. Household structure



Current use of Council waste services

Question 5 - Which of the following best describes your garbage bin on collection day?

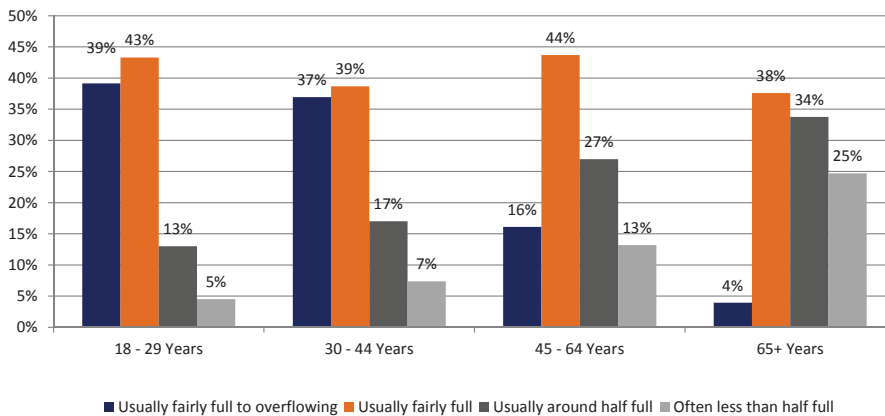
Figure 5. Garbage bin on collection day



Overall, 63 percent of respondents reported their garbage bins were at least 'Usually fairly full' on collection day.

Segment analysis has found that respondent males reported throwing out less waste in their garbage bins than females. Males were less likely to have bins 'Usually fairly full to overflowing' than females. Rather, a greater percentage of male respondents reported having a 'Usually fairly full' bin than female respondents.

Figure 6. Garbage bin on collection day by age group



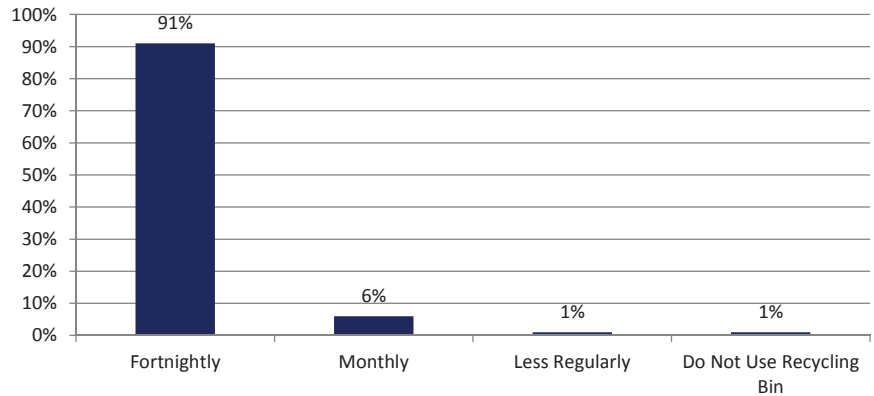
Furthermore, it was found that age played an important role in the amount of waste people were putting in their garbage.

In the age groups 18-29 and 29-40, more respondents advised that they have bins 'Usually fairly full to overflowing'. In contrast, older age groups were considerably more likely to have less waste in their garbage bin. For example, 25 percent of respondents over 65 years reported having bins 'Often less than half full', compared to 18-29 year old respondents, 5 percent of which reported having bins 'Often less than half full'.

Of all respondents who have a recycling bin service, 91 percent put their bin out for collection fortnightly.

Question 6 - If you have a yellow bin collection service, how often do you put out your recycling bin for collection?

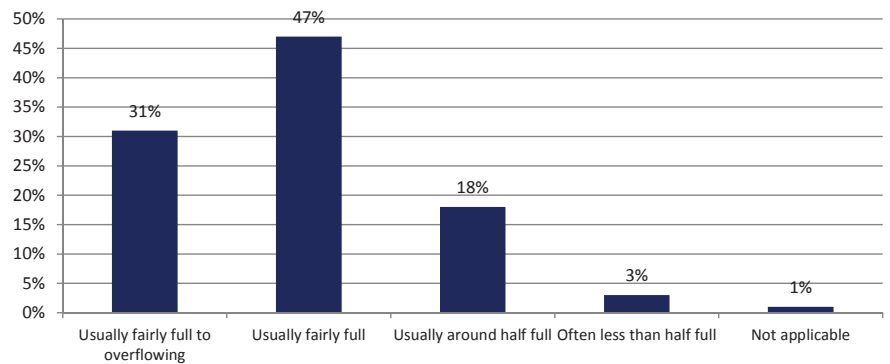
Figure 7. How often do you put out recycling bin



Overall, 78 percent of respondents reported their recycling bins were at least 'Usually fairly full' on collection day.

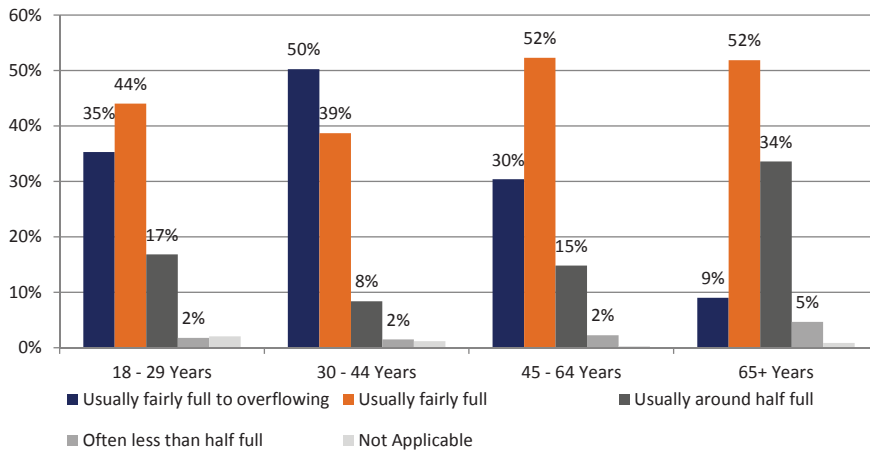
Question 7 - Which of the following best describes your yellow bin on collection day?

Figure 8. Recycling bin on collection day



Similar to the responses for the amount of waste in garbage bins on collection day, the amount of waste in recycling bins also show that gender and age are important factors. Again, female respondents reported significantly higher numbers with bins 'Usually fairly full to overflowing' (37 percent) than males (24 percent).

Figure 9. Recycling bin on collection day by age group

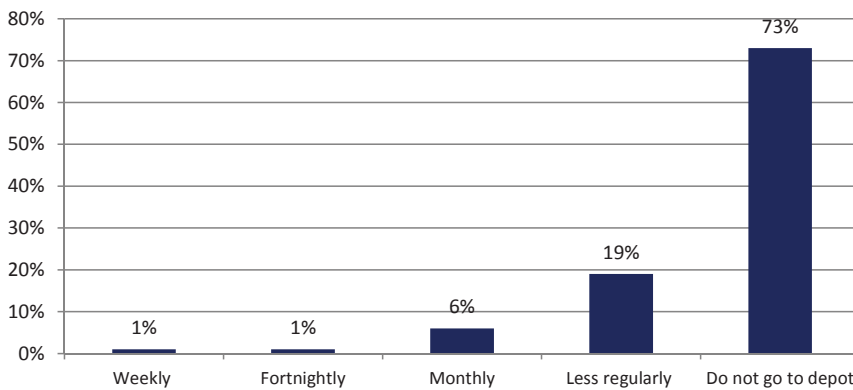


The 30-44 year old age group appear to produce much higher amounts of recycling waste.

Interestingly, the 30-44 year old age group appear to produce much higher amounts of recycling waste. 50 percent of this group reported that their recycling bins were 'Usually fairly full to overflowing'. This was materially higher than the 18-29 (35 percent), 45-64 (30 percent) and 65+ (9 percent) age groups. As with garbage waste, the 65+ age group showed much lower levels of recycling waste.

Question 8 - If you take your recycling to a Council depot, how often would you do so?

Figure 10. Take recycling to the depot



Of respondents who take their recycling to a Council depot, only 8 percent advised that they did so at least monthly, whereas 73 percent do not go to the depot.

Question 9 - Which of the following items do you understand can be recycled through your yellow lidded bin or at your recycling drop-off depot?

Table 2. Which items can be recycled

Item	Percent of Respondents
Paper and cardboard	99%
Glass bottles and jars	95%
Milk cartons	92%
Steel cans (tin cans including dog, cat and tuna cans)	86%
Hard rigid plastic containers from kitchen, bathroom and laundry	69%
Aerosol cans	41%
Waxed board take away food containers (e.g. takeaway coffee cups)	38%
Plastic film and packets	28%
Tissues and serviettes	26%
Polystyrene foam	21%
Recyclable material in plastic bags	20%
Plastic bags	18%
Ceramics (cups, saucers and plates)	15%
Clothing	7%
Fruit and vegetable scraps	1%
Syringes and syringe containers	1%
Nappies	0%

Across age and gender, results for recyclable materials were remarkably similar, although respondents in the 65+ category understood certain items to be recyclable, more than other groups. These items included:

- Aerosol cans
- Plastic bags
- Clothing
- Plastic film and packets
- Polystyrene foam
- Hard rigid plastic containers from kitchen, bathroom and laundry
- Ceramics

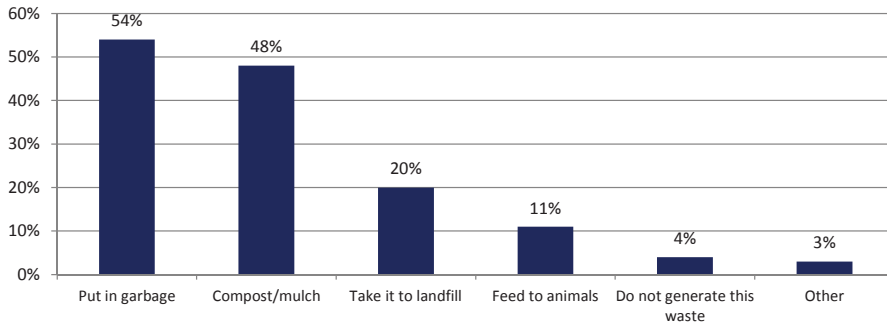
An analysis of results by gender showed that Male respondents understood certain items to be recyclable, more than female respondents. These included:

- Plastic bags
- Clothing
- Plastic film and packets
- Hard rigid plastic containers from kitchen, bathroom and laundry.

Garden and food waste

Question 10 – What do you do with your garden organic waste?

Figure 11. Garden waste

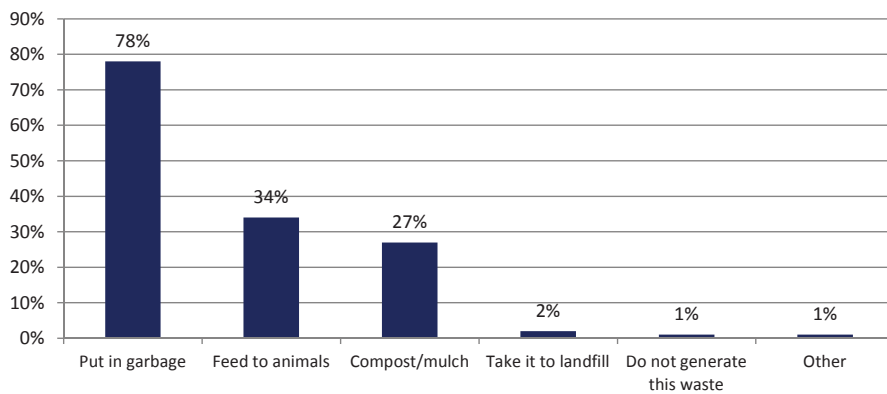


Just over half of the respondents indicated that they put their garden organic waste in the garbage.

When asked what they do with their garden waste, 53 percent of males composted this waste, compared with 44 percent of females. Conversely, 59 percent of females put their garden waste in the garbage bin, compared with 48 percent of males. Data also suggests that respondents in the 18-29 years age range were less likely to compost their garden waste, but the small sample size for this cohort precludes a firm finding.

Question 11 – What do you do with your food waste (meat, fruit and vegetable matter)?

Figure 12. Food waste



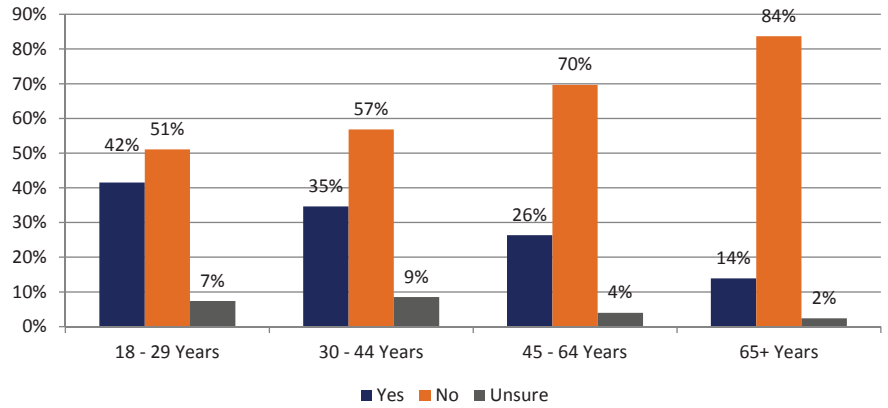
Feedback on this question showed very little difference in responses between females and males. As with composting garden waste, data also suggests that respondents in the 18-29 age range were less likely to compost their food waste, but the small sample size for this cohort precludes a firm finding.

Over three quarters (78%) of respondents reported putting their food waste in the garbage.

When asked if their households wasted too much food, only 28 percent of respondents stated yes, compared to 67 percent who said no, and 5 percent who were unsure. Of this cohort, male respondents were more likely to believe that they did not waste too much food, and the 45-64 and 65+ age groups were also less likely to believe that they did not waste too much food.

Question 12 - Do you feel that your household wastes too much food?

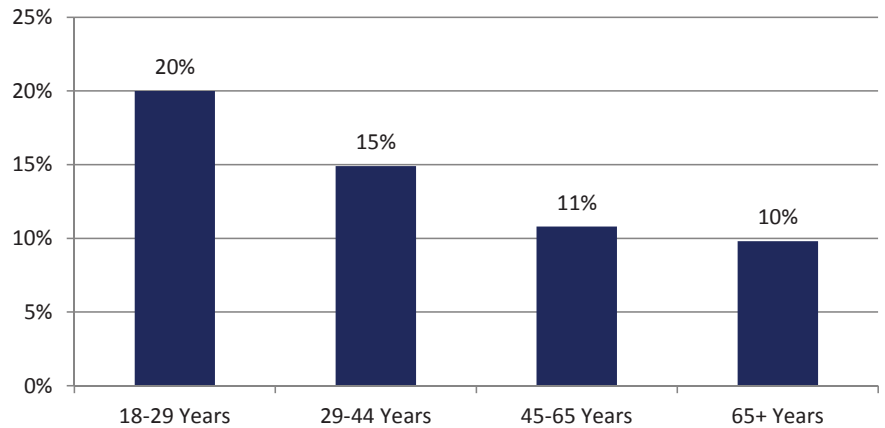
Figure 13. Does your household waste too much food by age group



Younger cohorts estimated a higher average percentage of food waste in their garbage bin.

Question 13 - Out of the all the waste that goes in your bin, what percentage of that is food waste?

Figure 14. Food waste as a percentage of garbage by age group

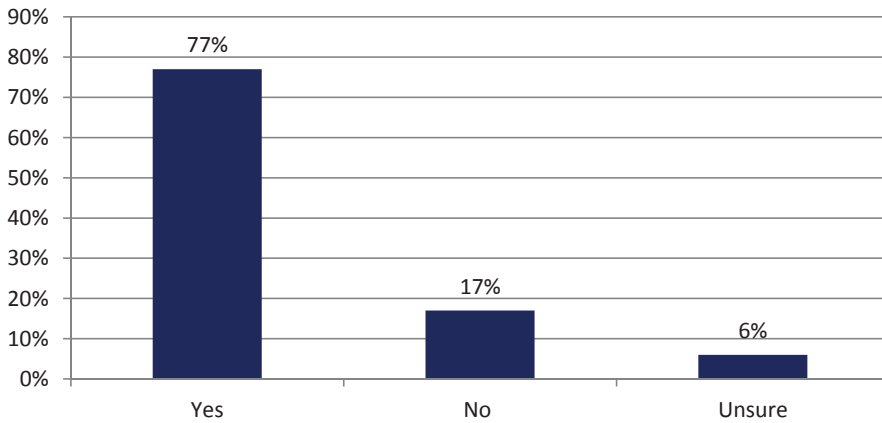


When asked to estimate the percentage of food waste that they currently dispose of in their garbage bin, the region wide average was 13.2 percent. Females estimated a higher average percentage of waste (15 percent) than men (11 percent). Younger cohorts also estimated a higher average percentage of food waste in their garbage bin, with the 18-29 and 29-44 age groups estimating a significantly higher percentage of food waste than the 45-65 and the 65+ age groups.

Support for changes to waste services

Question 14 - Council is planning a green bin service, whereby you would receive a bin for garden organic and food waste, which would be collected weekly. Would you use such a service?

Figure 15. Usage of green bin service

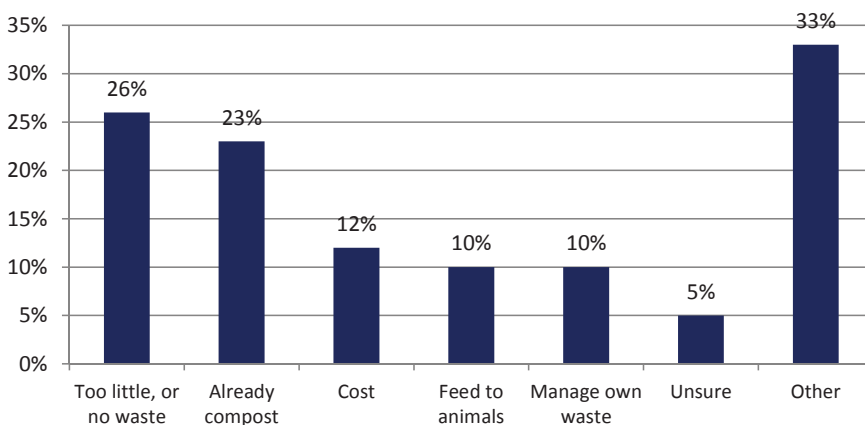


Across the total region, 77 percent of respondents answered that they would use a green bin service. Of the remaining respondents, 17 percent said that they would not use the service and 6 percent were unsure.

Respondents who advised that they would not use a green bin service, or were unsure, were asked 'why not?'. The top responses are listed below.

Question 15 - If you are unsure, or would not use a Council green bin service, why not?

Figure 16. Unsure or would not use green bin



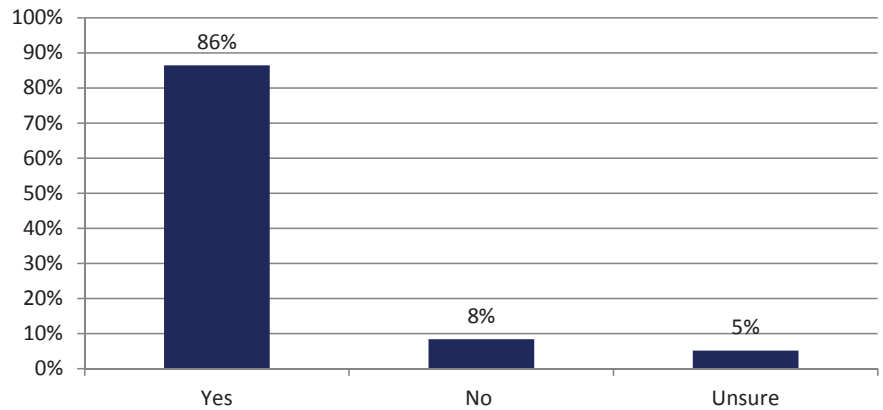
Respondents were able to provide multiple reasons why they were unsure or would not use the service. Responses in the 'Other' category were too diverse to report individually, but included such reasons as:

- Require further information before a decision can be made
- Already manage with the current service
- Hard to remember to separate everything.

Respondents advised that they supported less waste going to landfill, with 86 percent advising that they supported green waste being collected on a weekly basis and composted.

Question 16 - Would you support Council trying to reduce the amount of waste going to landfill by collecting your food and garden waste for composting on a weekly basis?

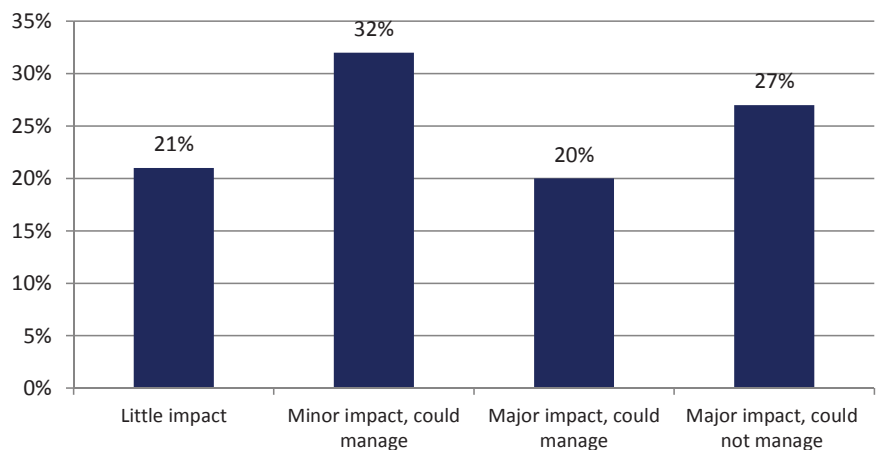
Figure 17. Support for reducing landfill



Responses to this question showed little difference between males and females, but showed the impact would be felt most strongly for people aged 30-44 years, 36 percent of which advised that these changes would have a major impact, whereby they could not manage with fortnightly garbage collection.

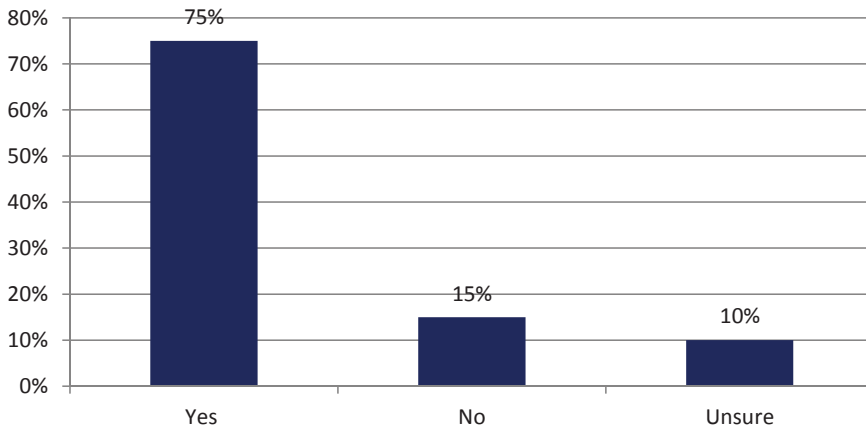
Question 17 - If council was to change the collection frequency of your garbage bin from weekly to fortnightly, which of the following statements would reflect your household's ability to cope with this change?

Figure 18. Fortnightly garbage collection



Question 18 - In principle, do you support the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term?

Figure 19. In principle support



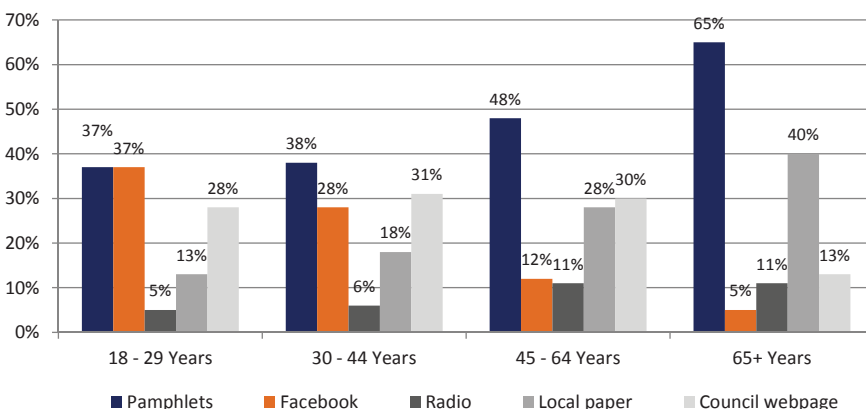
Three quarters of respondents gave in-principle support for the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term

Other views

Question 19 - How would you prefer to access information about Council waste services?

The preferred method for accessing information about Council waste services was by pamphlets (48 percent), followed by the local paper and Council webpage (both 26 percent), Facebook (19 percent) and radio (9 percent).

Figure 20. Preferred media



Responses to this question are broken down by age group in Figure 20 to show preferred means of accessing information, allowing Councils to better target waste information.

Question 20 – Are there any particular changes that you would like to see made to waste management facilities or waste services in your Council area?

Respondents were able to nominate multiple changes. This question received 428 recorded responses. The most common responses are detailed below. Of the respondents who answered this question:

- 19 percent indicated that they would like to have a green bin service
- 16 percent advised that they did not want any changes to their current waste services
- 15 percent indicated that they would like weekly recycling collection
- 8 percent requested reduced price or free waste collection and tip/depot services
- 6 percent requested more public information on waste and recycling services, with some suggesting that a fridge magnet with recycling information and a bin collection timetable would be useful
- 5 percent requested that garbage collection remain weekly
- 4 percent suggested that garbage collection could be undertaken fortnightly

Summary and Conclusion

Overall, there appears to be above 75 percent respondent support for the introduction of green bin services to reduce landfill and increase composting, even when noting a small rise in expense in the short term. There also appears to be significant scope for reducing landfill by introducing a green bin service, with a high percentage of respondents advising their garden and food waste goes into the garbage.

With regard to fortnightly garbage collection, approximately 50 percent of the population would manage with little to no impact. However, a further approximate 25 percent would struggle to manage with a longer collection cycle, whilst the remaining 25 percent would not be able to cope.

BATHURST

Major findings

- Garbage and recycling bins are predominantly 'Usually fairly full' on collection day
- 59 percent of respondents put garden organic waste in their garbage and 51 percent compost it
- 81 percent of respondents put food waste in their garbage and 31 percent feed it to animals
- 85 percent of respondents support Council trying to reduce the amount of waste going to landfill by collecting food and garden waste for composting on a weekly basis
- 32 percent of respondents could not manage fortnightly garbage collections, whilst the remaining 68 percent could manage, but with varying degrees of impact
- 74 percent of respondents gave in-principle support for the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term

Survey results graphed in this section reflect the weighted responses from the online and telephone surveys. Data in this section is based on complete responses (450) and responses were received from 14 of the 20 localities targeted in the survey.

It should be noted that there is potential that survey results for the Bathurst region were skewed on at least one question. On 5 May 2015, the Western Advocate published a news article, 'Changes to bin collection: residents asked to complete survey'¹, which arguably, made a negative comparison of recent changes in the Orange City Council waste services to proposed changes to Bathurst Regional Council waste services.

This article appears to have made a statistically significant impact on survey answers to 'Question 14 - Council is planning a green bin service, whereby you would receive a bin for garden organic and food waste, which would be collected weekly. Would you use such a service?'.

Answers to this question provided up to and including 4 May had an 87 percent positive response rate, a negative response rate of 6 percent, and a 6 percent unsure response (responses do not round to 100 percent). Online survey responses from the Bathurst region surged significantly on the date the article was published, with the positive response rate dropping to 74 percent, a negative response rate of 18 percent and an 8 percent unsure response.

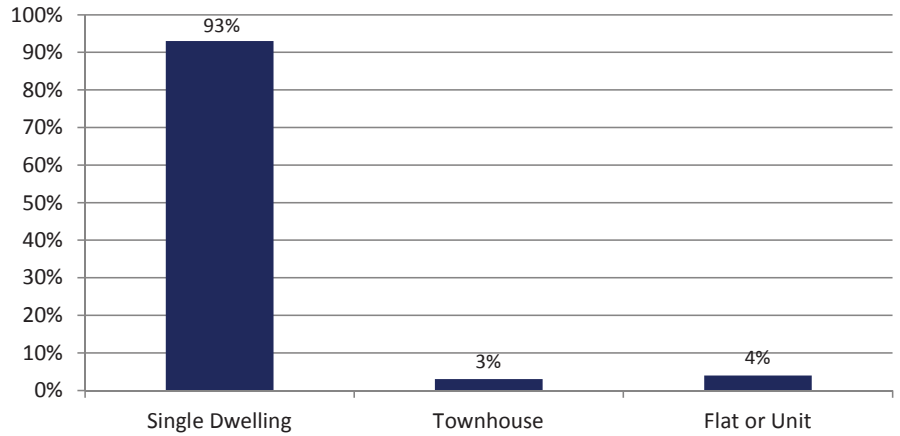
A number of other questions regarding respondent views on proposed changes to Council waste services also received a higher negative response rate after the article was published. However, the data was found not to be statistically significant.

1 <http://www.westernadvocate.com.au/story/3055506/changes-to-bin-collection/>

Household Information

Question 1 - What is your dwelling type?

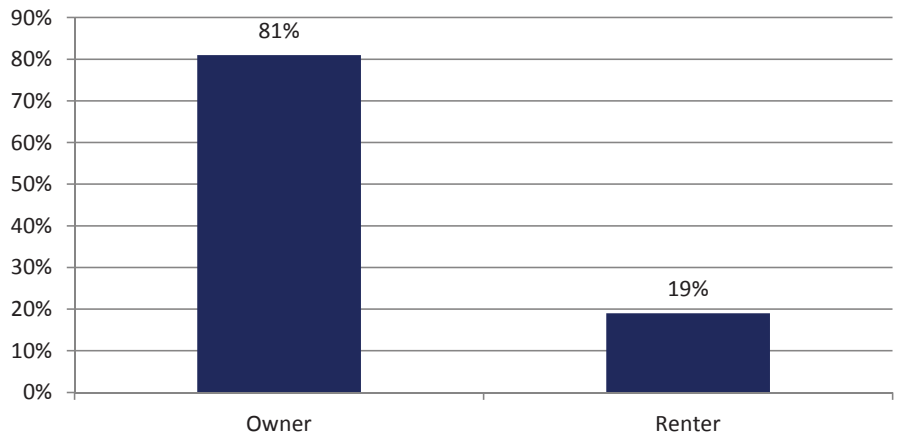
Figure 21. Dwelling type



The principle dwelling type of respondents in the Bathurst region was a Single Dwelling (93 percent).

Question 2 - Do you own or rent the dwelling?

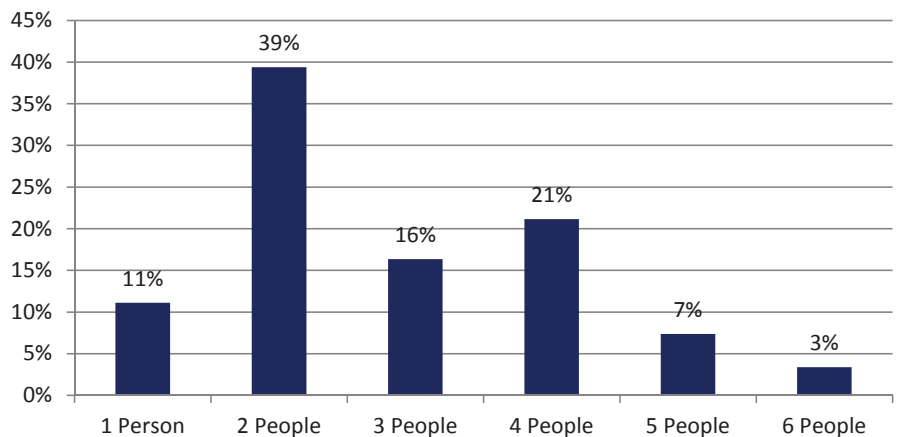
Figure 22. Residential status



Respondents were made up predominantly of household owners (81 percent).

Question 3 - How many people usually live in your dwelling?

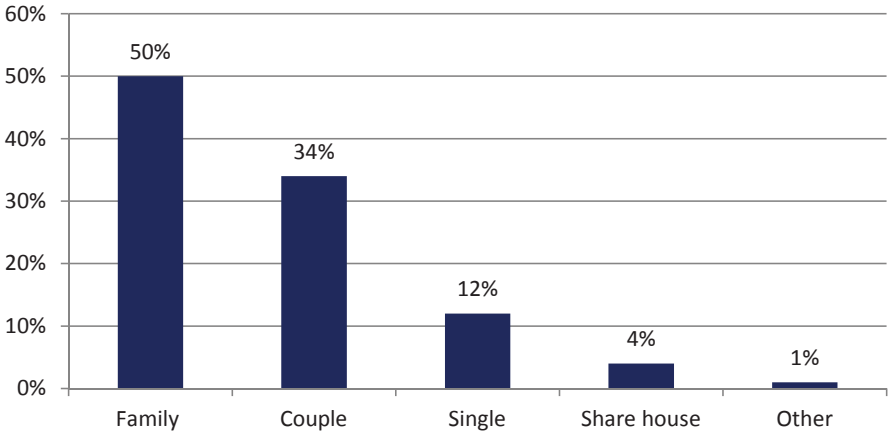
Figure 23. Percentage of dwellings by resident number



The average number of people residing in each dwelling was 2.9.

Question 4 - Household structure

Figure 24. Household structure

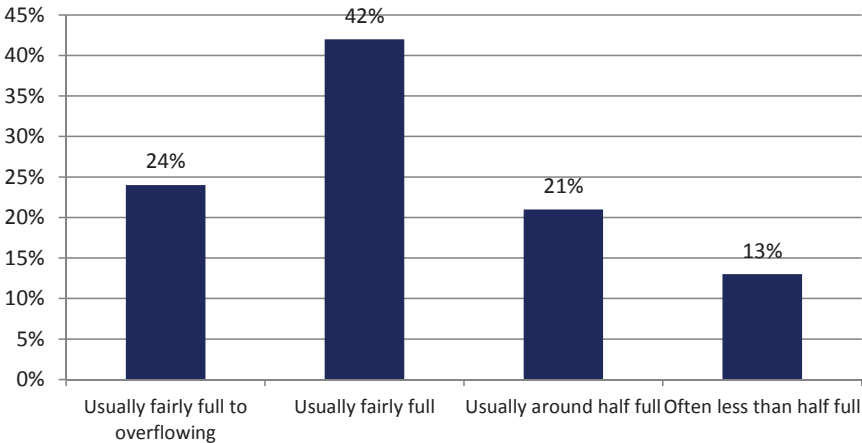


Bathurst households were 50 percent family households, followed by 34 percent couple and 12 percent single households.

Current use of Council waste services

Question 5 - Which of the following best describes your garbage bin on collection day?

Figure 25. Garbage bin on collection day

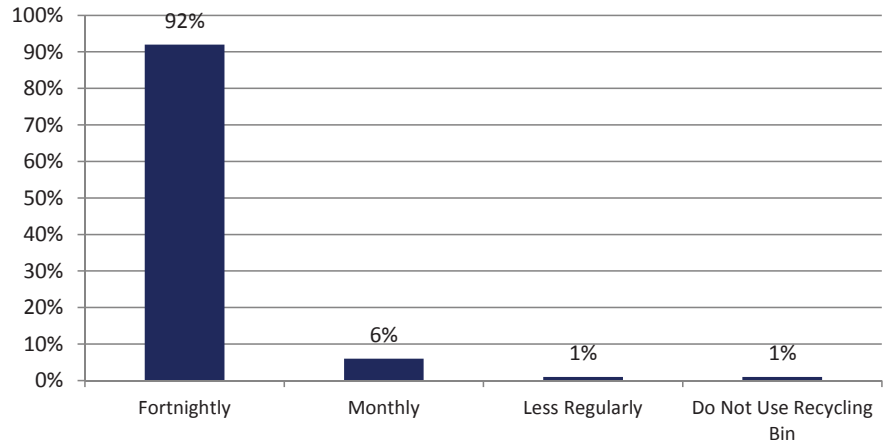


Overall, 66 percent of Bathurst respondents reported their garbage bins were at least 'Usually fairly full' on collection day.

Recycling bins were put out fortnightly by 92 percent of respondents.

Question 6 - If you have a yellow bin collection service, how often do you put out your recycling bin for collection?

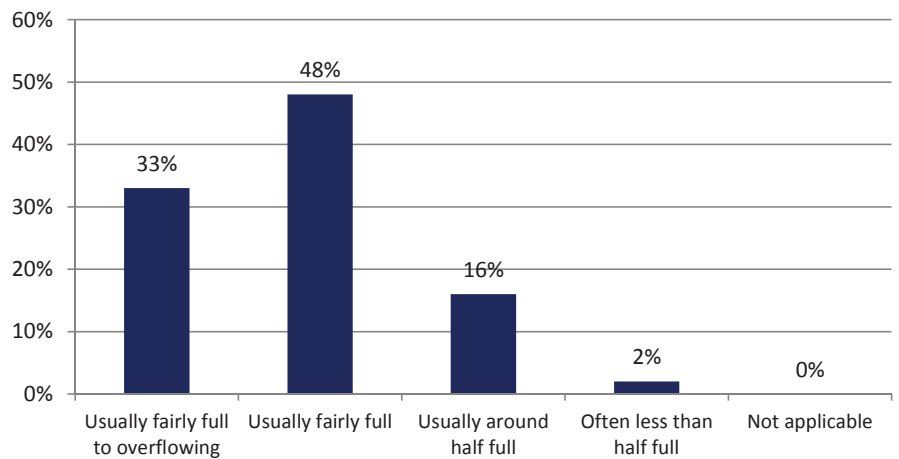
Figure 26. How often do you put out yellow bin



Overall, 81 percent of respondents reported their recycling bins were at least 'Usually fairly full' on collection day.

Question 7 - Which of the following best describes your yellow bin on collection day?

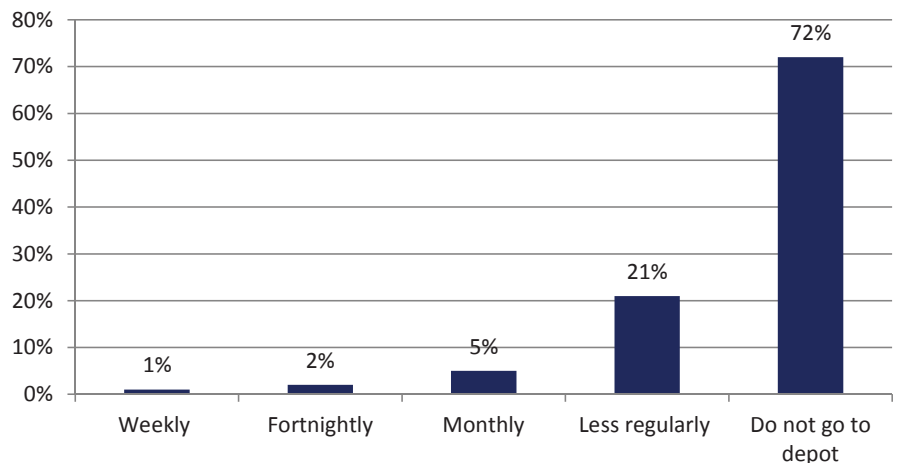
Figure 27. Recycling bin on collection day



When asked how often they took waste to the depot, only 8 percent advised that they went to the depot at least monthly, whilst 72 percent of respondents advised that they did not go to the depot.

Question 8 - If you take your recycling to a Council depot, how often would you do so?

Figure 28. Take recycling to depot



Question 9 - Which of the following items do you understand can be recycled through your yellow lidded bin or at your recycling drop-off depot?

Table 3. Which items can be recycled

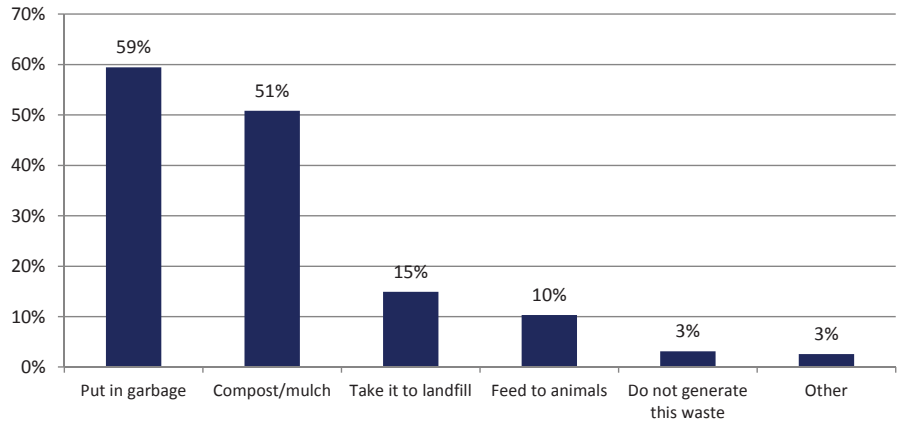
Item	Percent of Respondents
Paper and cardboard	100%
Glass bottles and jars	95%
Milk cartons	93%
Steel cans (tin cans including dog, cat and tuna cans)	87%
Hard rigid plastic containers from kitchen, bathroom and laundry	68%
Aerosol cans	39%
Waxed board take away food containers (e.g. takeaway coffee cups)	36%
Plastic film and packets	28%
Tissues and serviettes	27%
Recyclable material in plastic bags	21%
Polystyrene foam	20%
Plastic bags	18%
Ceramics (cups, saucers and plates)	13%
Clothing	4%
Fruit and vegetable scraps	1%
Nappies	0%
Syringes and syringe containers	0%

The majority of respondents understood the following items could be recycled through yellow bins:

- paper and cardboard
- glass bottles and jars
- milk carts
- steel cans; and
- hard rigid plastic containers.

Question 10 - What do you do with your garden organic waste?

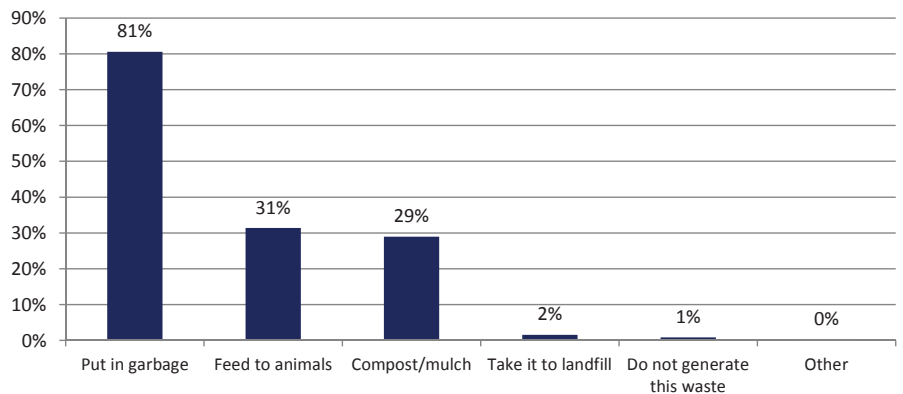
Figure 29. Garden waste



When asked what they do with their garden organic waste, 59 percent of respondents advised that they put it in the garbage and 51 percent compost or mulch.

Question 11 - What do you do with your food waste (meat, fruit and vegetable matter)?

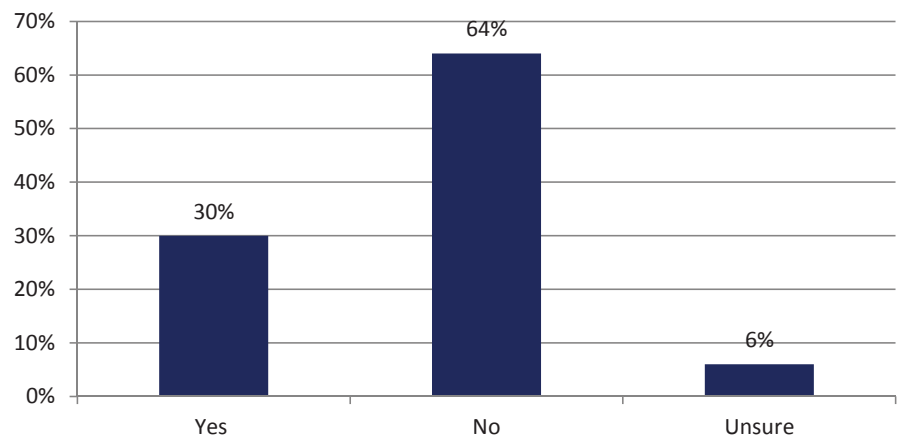
Figure 30. Food waste



When asked what they do with their food waste, 81 percent of respondents advised that they put it the garbage and 31 percent advised that they feed their food waste to animals.

Question 12 - Do you feel that your household wastes too much food?

Figure 31. Food wastage



In response to a question as to whether respondents feel they waste too much food, 64 percent of households felt that they did not, whilst 30 percent thought they did and 6 percent were unsure.

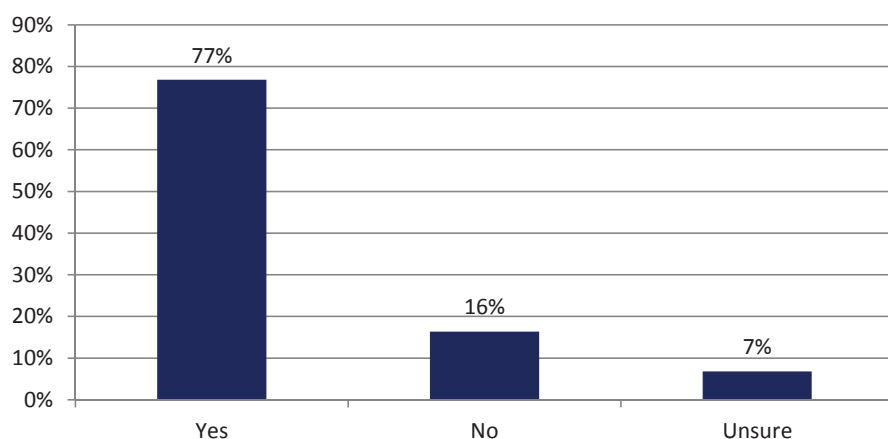
Question 13 - Out of the all the waste that goes in your bin, what percentage of that is food waste?

The average percentage of food waste in respondents' bins for the Bathurst region was 12.9 percent.

Support for changes to waste services

Question 14 - Council is planning a green bin service, whereby you would receive a bin for garden organic and food waste, which would be collected weekly. Would you use such a service?

Figure 32. Would you use a green bin service?

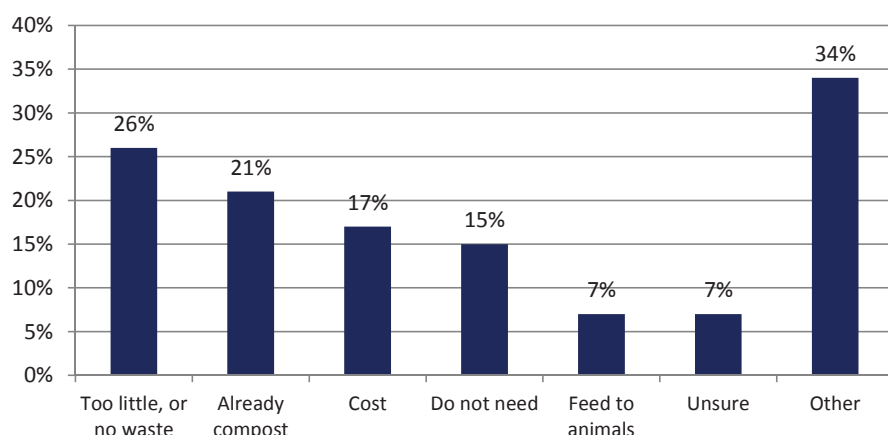


Bathurst respondents were asked if they would use the proposed green bin service. Survey results showed that 77 percent would use the service, 16 percent would not and 7 percent were unsure.

Bathurst respondents who advised that they would not use a green bin service, or were unsure, were asked 'why not?'. The top responses are listed below.

Question 15 - If you are unsure, or would not use a Council green bin service, why not?

Figure 33. Unsure or would not use green bin



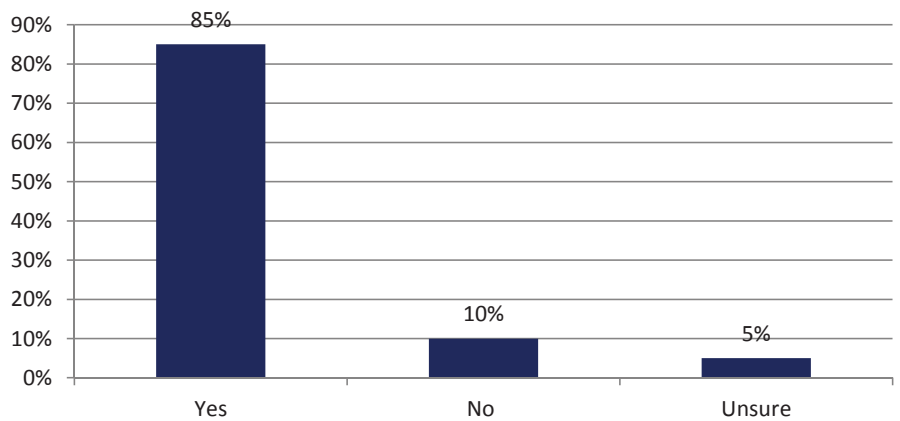
Respondents were able to provide multiple reasons why they were unsure or would not use the service. Responses in the 'Other' category were too diverse as to report individually, but included such reasons as:

- Too complicated – will not use
- Happy with things as they are
- No room for a green bin

Respondents advised that they supported less waste going to landfill, with 85 percent advising that they supported green waste being collected on a weekly basis and composted.

Question 16 - Would you support Council trying to reduce the amount of waste going to landfill by collecting your food and garden waste for composting on a weekly basis?

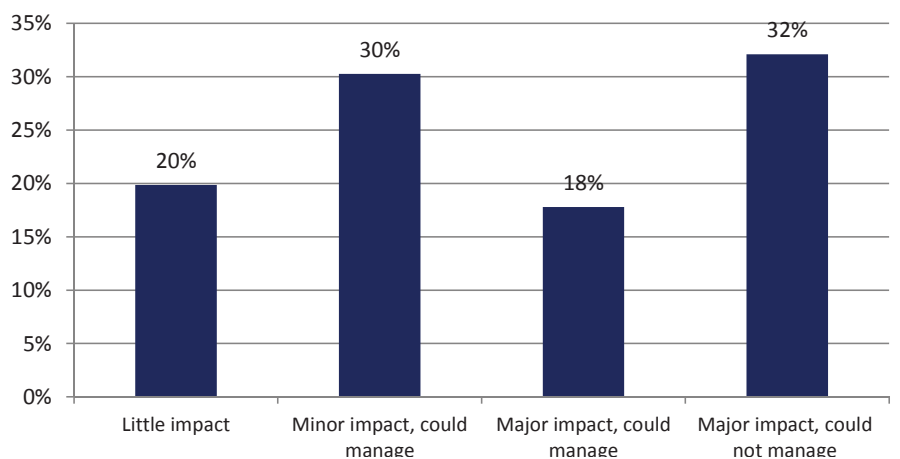
Figure 34. Support for reducing landfill



Respondents were able to gauge the level of impact the change to fortnightly garbage collection would have on their household. Of these responses, 32 percent advised that it would be a major impact that they could not manage, whereas the remaining 68 percent advised of different levels of impact, but indicated that they could manage with this change.

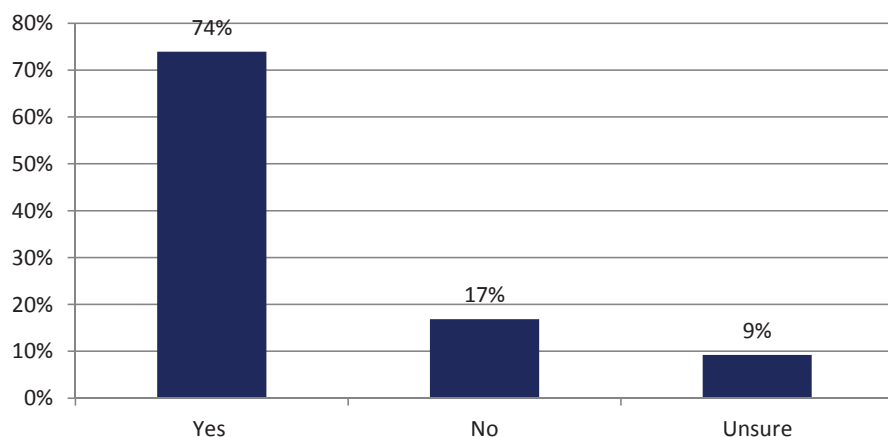
Question 17 - If council was to change the collection frequency of your garbage bin from weekly to fortnightly, which of the following statements would reflect your household's ability to cope with this change?

Figure 35. Fortnightly garbage collection



Question 18 - In principle, do you support the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term?

Figure 36. In principle support

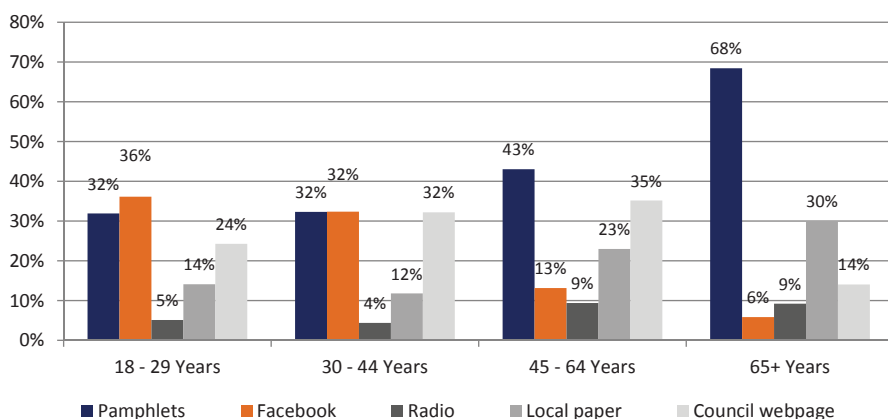


Approximately three quarters (74 percent) of respondents gave in-principle support for the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term

Other views

Question 19 - How would you prefer to access information about Council waste services?

Figure 37. Preferred media



Responses to this question were broken down by age group to show preferred means of accessing information, allowing Councils to better target waste information.

The preferred method for accessing information about Council waste services was by pamphlets (43 percent), followed by the Council webpage (both 28 percent), Facebook (21 percent), local paper (20 percent) and radio (7 percent).

Question 20 – Are there any particular changes that you would like to see made to waste management facilities or waste services in your Council area?

Respondents were able to nominate multiple changes. This question received 228 recorded responses. The most common and relevant responses are detailed below. Of the respondents who answered this question:

- 20 percent indicated that they would like to have a green bin service
- 16 percent advised that they did not want any changes to their current waste services
- 15 percent indicated that they would like weekly recycling collection
- 10 percent requested reduced price or free waste collection and tip/depot services
- 8 percent requested that garbage collection remain weekly
- 6 percent suggested that garbage collection could be undertaken fortnightly
- 5 percent requested more public information on waste and recycling services

FORBES

Major findings

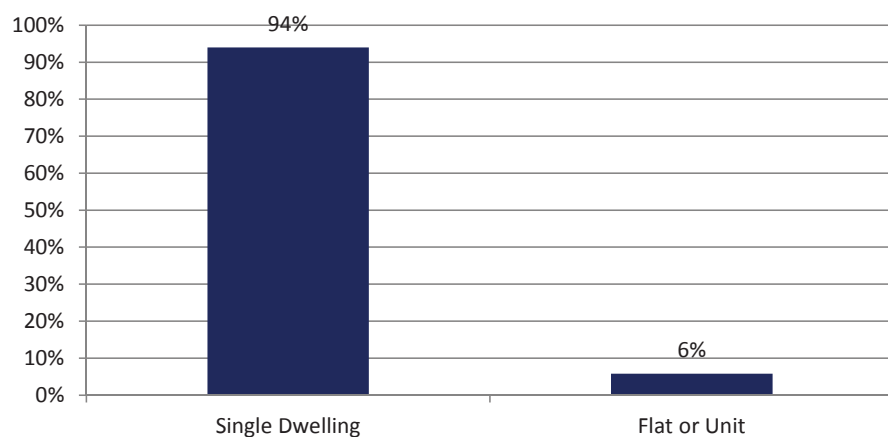
- Garbage and recycling bins are predominantly 'Usually fairly full' on collection day
- 42 percent of respondents put garden organic waste in their garbage and 46 percent compost it
- 74 percent of respondents put food waste in their garbage and 39 percent feed it to animals
- 89 percent of respondents support Council trying to reduce the amount of waste going to landfill by collecting food and garden waste for composting on a weekly basis
- 20 percent of respondents could not manage fortnightly garbage collections, whilst the remaining 80 percent could manage, but with varying degrees of impact
- 75 percent of respondents gave in-principle support for the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term

Survey results graphed in this section reflect the weighted responses from the online and telephone surveys. Data in this section is based on complete responses (243).

Household Information

Question 1 - What is your dwelling type?

Figure 38. Dwelling type

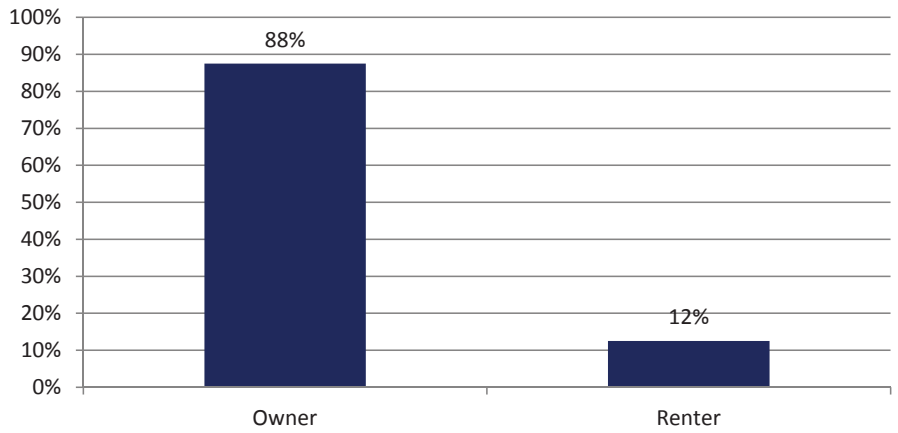


The principle dwelling type of respondents in the Forbes region was a Single Dwelling (94 percent).

Respondents were made up predominantly of household owners (88 percent).

Question 2 - Do you own or rent the dwelling?

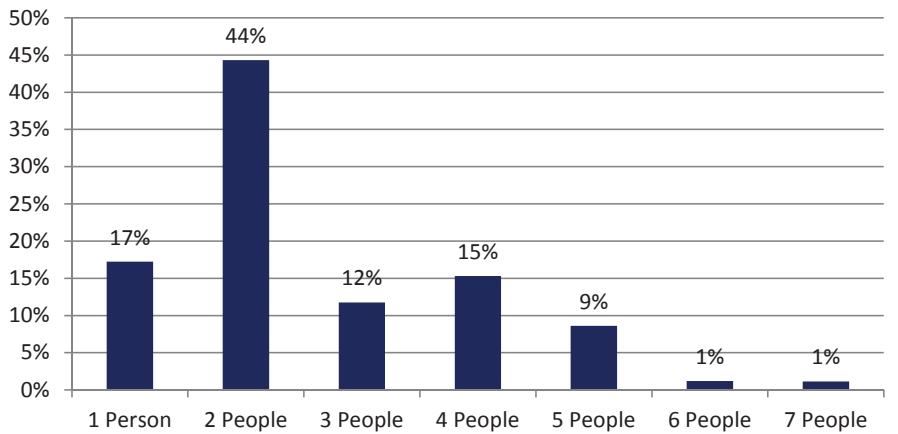
Figure 39. Residential status



The average number of people residing in each dwelling was 2.6.

Question 3 - How many people usually live in your dwelling?

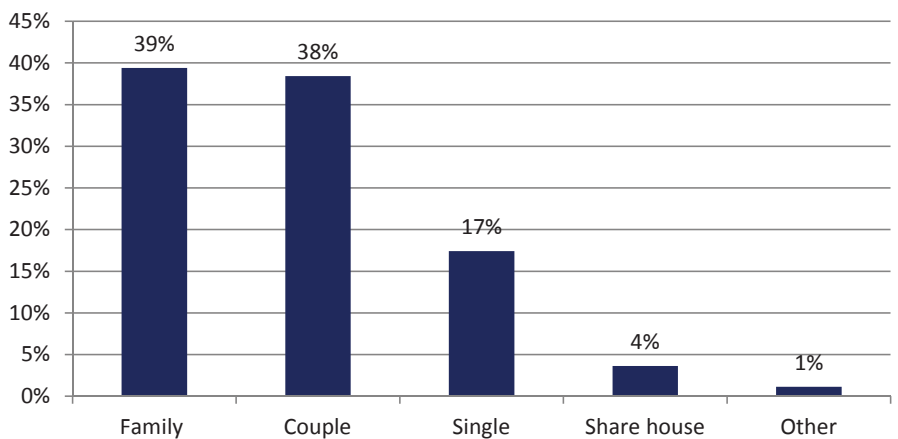
Figure 40. Percentage of dwellings by resident number



Forbes households were 39 percent family households, followed by 38 percent couple and 17 percent single households.

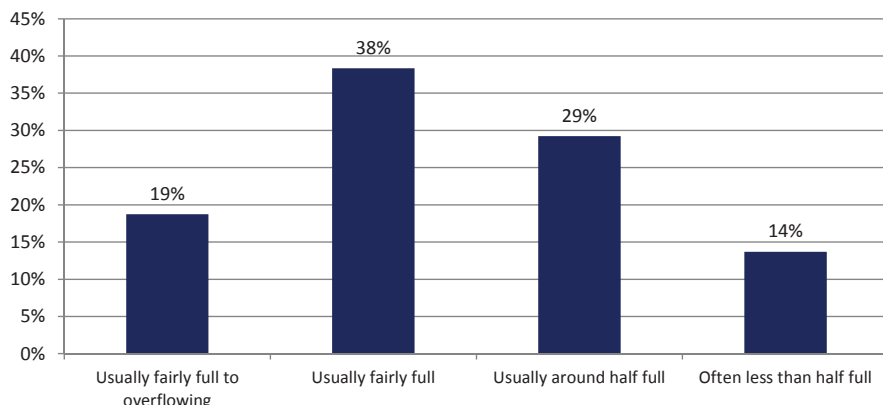
Question 4 - Household structure

Figure 41. Household structure



Question 5 - Which of the following best describes your garbage bin on collection day?

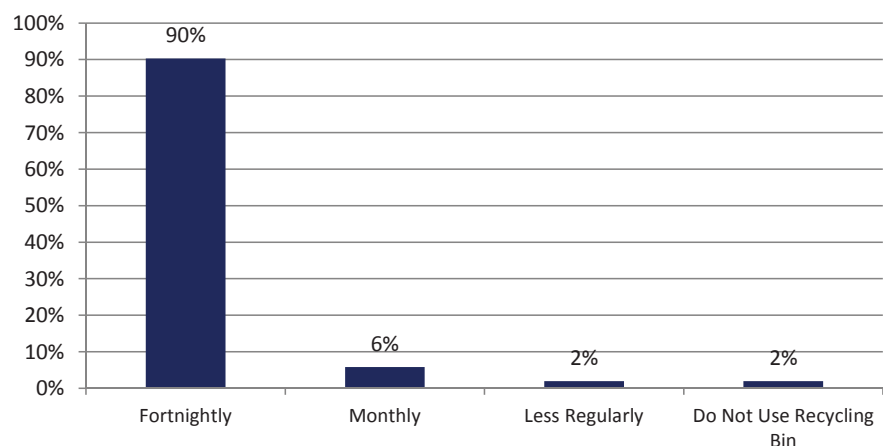
Figure 42. Garbage bin on collection day



Overall, 57 percent of respondents reported their recycling bins were at least 'Usually fairly full' on collection day.

Question 6 - If you have a yellow bin collection service, how often do you put out your recycling bin for collection?

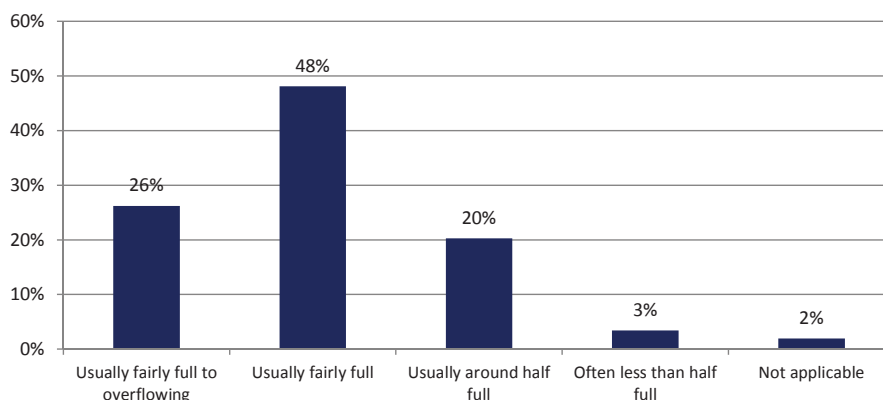
Figure 43. How often do you put out yellow bin



Recycling bins were put out fortnightly by 90 percent of respondents.

Question 7 - Which of the following best describes your yellow bin on collection day?

Figure 44. Recycling bin on collection day

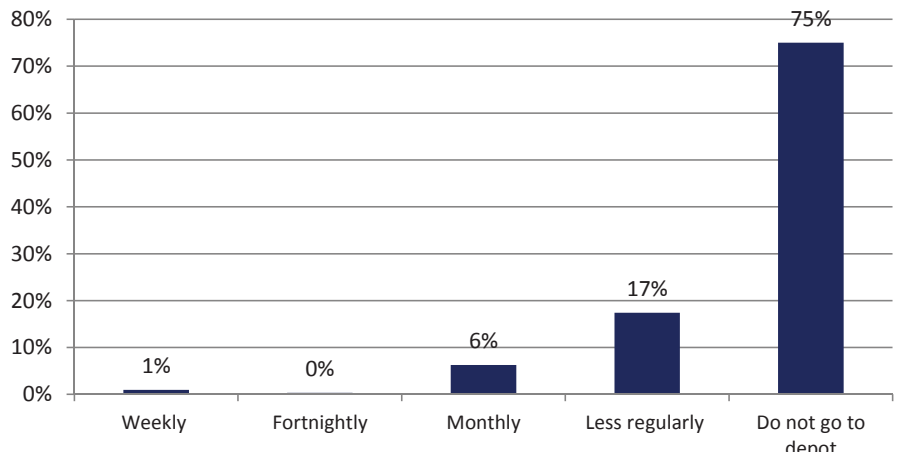


On collection day, 74 percent of Forbes respondents' recycling bins were at least 'Usually fairly full'.

When asked how often they took waste to the depot, only 7 percent advised that they went to the depot at least monthly, whilst 75 percent of respondents advised that they did not go to the depot.

Question 8 - If you take your recycling to a Council depot, how often would you do so?

Figure 45. Take recycling to depot



Question 9 - Which of the following items do you understand can be recycled through your yellow lidded bin or at your recycling drop-off depot?

Table 4. Which items can be recycled

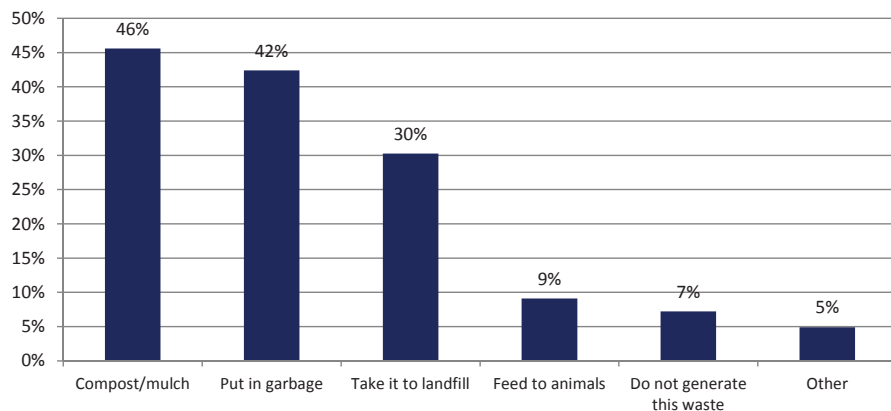
Item	Percent of Respondents
Paper and cardboard	97%
Glass bottles and jars	97%
Milk cartons	87%
Steel cans (tin cans including dog, cat and tuna cans)	85%
Hard rigid plastic containers from kitchen, bathroom and laundry	70%
Aerosol cans	49%
Waxed board take away food containers (e.g. takeaway coffee cups)	38%
Plastic film and packets	24%
Tissues and serviettes	24%
Recyclable material in plastic bags	20%
Polystyrene foam	19%
Plastic bags	19%
Ceramics (cups, saucers and plates)	15%
Clothing	7%
Fruit and vegetable scraps	3%
Syringes and syringe containers	1%
Nappies	0%

The majority of respondents understood the following items could be recycled through a yellow bin:

- paper and cardboard
- glass bottles and jars
- milk cartons
- steel cans; and
- hard rigid plastic containers.

Question 10 - What do you do with your garden organic waste?

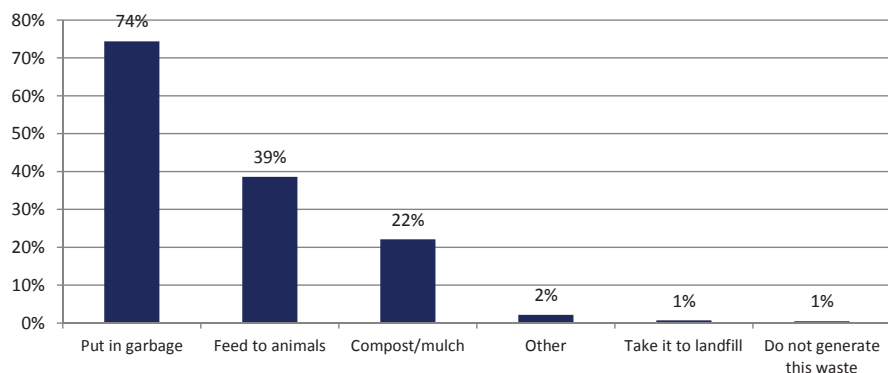
Figure 46. Garden waste



When asked what they do with their garden organic waste, 46 percent of respondents advised that they compost or mulch it, and 42 percent put it in the garbage.

Question 11 - What do you do with your food waste (meat, fruit and vegetable matter)?

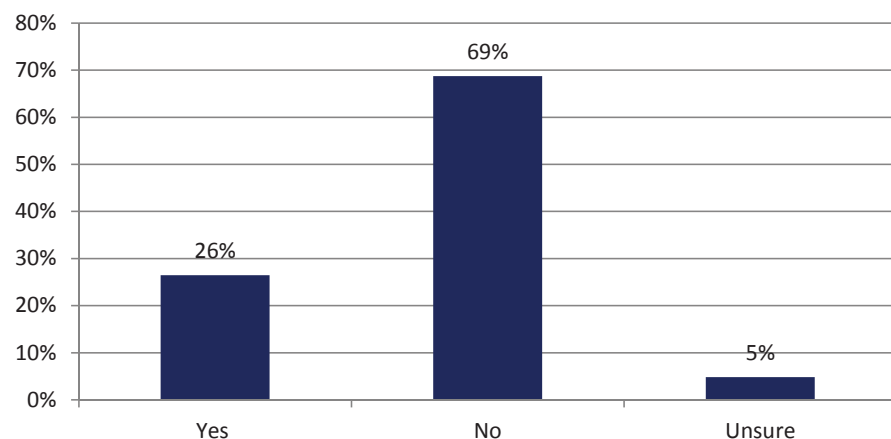
Figure 47. Food waste



When asked what they do with their food waste, 74 percent of respondents advised that they put it the garbage and 39 percent advised that they feed food waste to animals.

Question 12 - Do you feel that your household wastes too much food?

Figure 48. Food wastage



In response to a question as to whether respondents feel they waste too much food, 69 percent of households felt that they did not, whilst 26 percent thought they did and 5 percent were unsure.

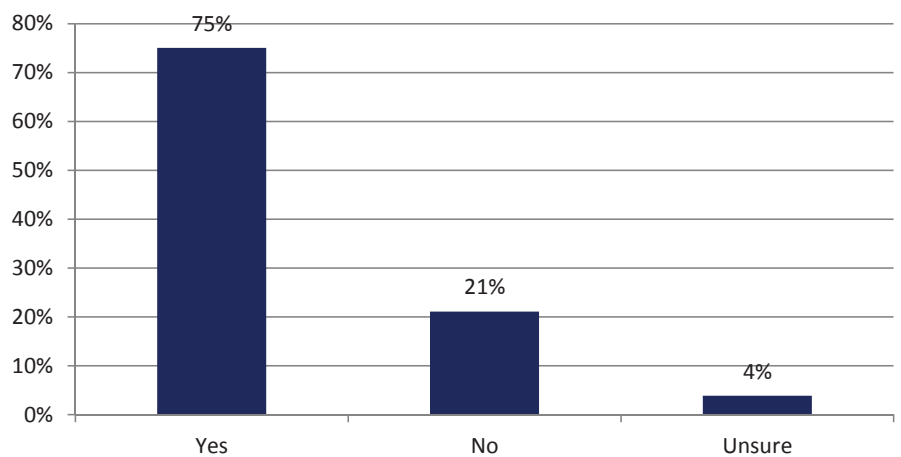
Question 13 - Out of the all the waste that goes in your bin, what percentage of that is food waste?

The average percentage of food waste in respondent's bins for the Forbes region was 13.5 percent.

Support for changes to waste services

Question 14 - Council is planning a green bin service, whereby you would receive a bin for garden organic and food waste, which would be collected weekly. Would you use such a service?

Figure 49. Would you use a green bin service?

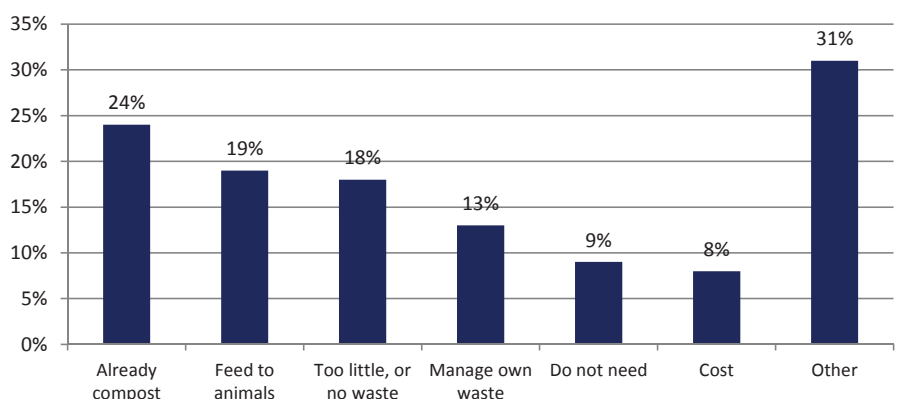


Forbes respondents were asked if they would use the proposed green bin service. Survey results showed that 75 percent would use the service, 21 percent would not and 4 percent were unsure.

Forbes respondents who advised that they would not use a green bin service, or were unsure, were asked 'why not?'. The top responses are listed below.

Question 15 - If you are unsure, or would not use a Council green bin service, why not?

Figure 50. Unsure or would not use a green bin service

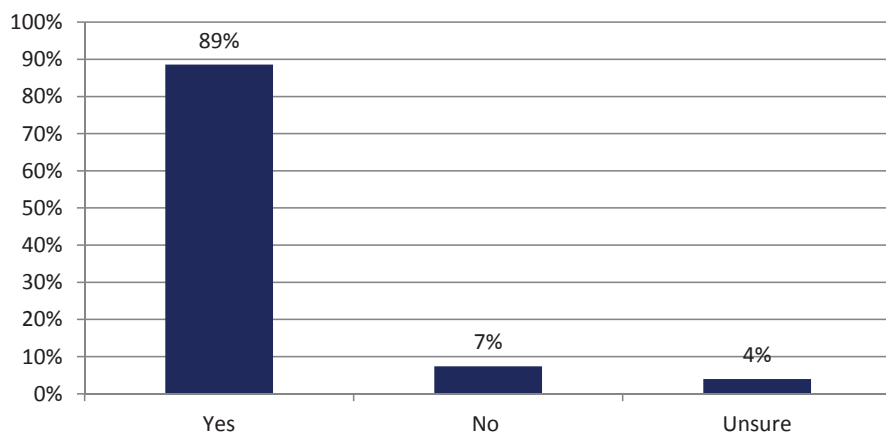


Respondents were able to provide multiple reasons why they were unsure or would not use the service. Responses in the 'Other' category were too diverse as to report individually, but included such reasons as:

- Hard to remember to separate things
- Manage with the current service
- Gardener takes away my garden waste

Question 16 - Would you support Council trying to reduce the amount of waste going to landfill by collecting your food and garden waste for composting on a weekly basis?

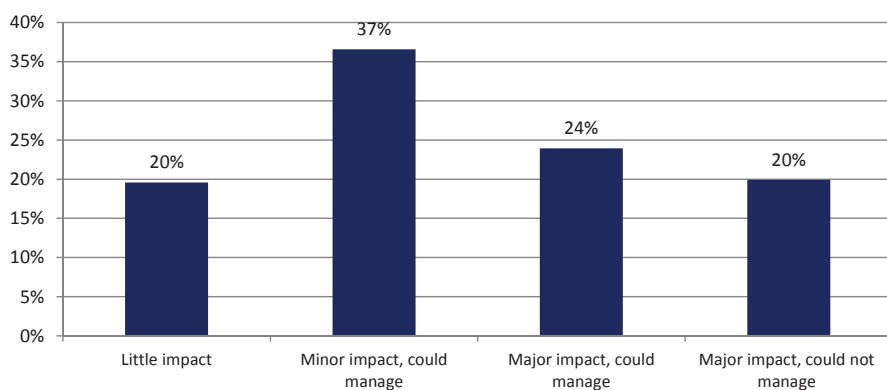
Figure 51. Support for reducing landfill



Respondents advised that they supported less waste going to landfill, with 89 percent advising that they supported green waste being collected on a weekly basis and composted.

Question 17 - If council was to change the collection frequency of your garbage bin from weekly to fortnightly, which of the following statements would reflect your household's ability to cope with this change?

Figure 52. Fortnightly garbage collection

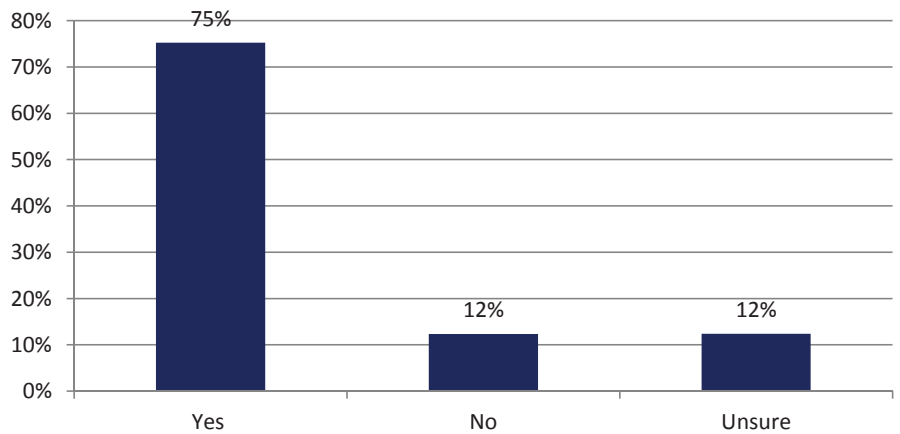


Respondents were able to gauge the level of impact the change to fortnightly garbage collection would have on their household. Of these responses, 20 percent advised that it would be a major impact that they could not manage, whereas the remaining 80 percent advised of different levels of impact, but indicated that they could manage with this change.

Three quarters of respondents gave in-principle support for the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term

Question 18 - In principle, do you support the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term?

Figure 53. In principle support

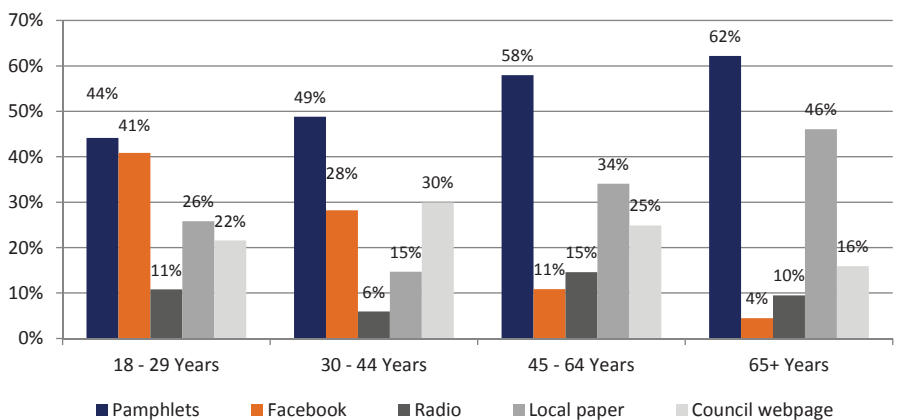


Other views

Responses to this question were broken down by age group to show preferred means of accessing information, allowing Councils to better target waste information.

Question 19 - How would you prefer to access information about Council waste services?

Figure 54. Preferred media



The preferred method for accessing information about Council waste services was by pamphlets (55 percent), followed by the local paper (32 percent), Council webpage (both 23 percent), Facebook (17 percent), and radio (11 percent).

Question 20 - Are there any particular changes that you would like to see made to waste management facilities or waste services in your Council area?

Respondents were able to nominate multiple changes. This question received 85 recorded responses. The most common and relevant responses are detailed below. Of the respondents who answered this question:

- 23 percent advised that they did not want any changes to their current waste services
- 16 percent indicated that they would like weekly recycling collection
- 16 percent indicated that they would like to have a green bin service
- 11 percent requested more public information on waste and recycling services, with some suggesting that a fridge magnet with recycling information and a bin collection timetable would be useful
- 8 percent requested changes to depot services including a recycling centre/tip shop, an e-waste service and a green waste depot

PARKES

Major findings

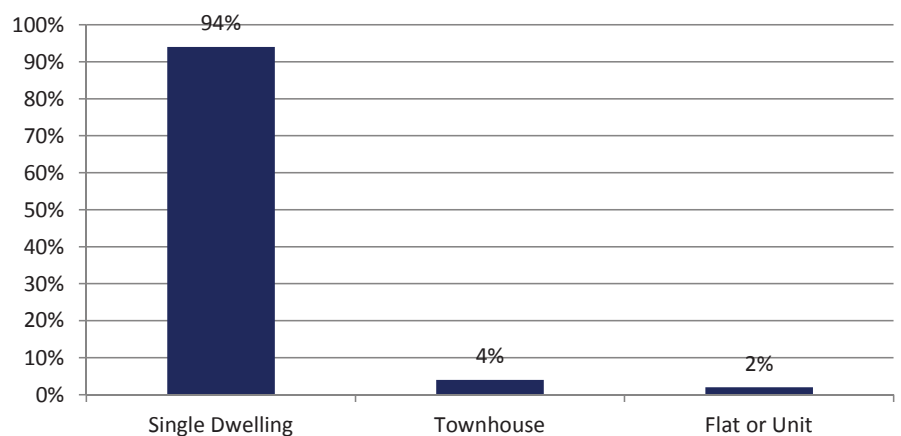
- Garbage and recycling bins are predominantly 'Usually fairly full' on collection day
- 47 percent of respondents put garden organic waste in their garbage and 44 percent compost it
- 73 percent of respondents put food waste in their garbage and 39 percent feed it to animals
- 89 percent of respondents support Council trying to reduce the amount of waste going to landfill by collecting food and garden waste for composting on a weekly basis
- 18 percent of respondents could not manage fortnightly garbage collections, whilst the remaining 82 percent could manage, but with varying degrees of impact
- 79 percent of respondents gave in-principle support for the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term

Survey results graphed in this section reflect the weighted responses from the online and telephone surveys. Data in this section is based on complete responses (257) and responses were received from 4 of the 5 localities targeted in the survey.

Household Information

Question 1 - What is your dwelling type?

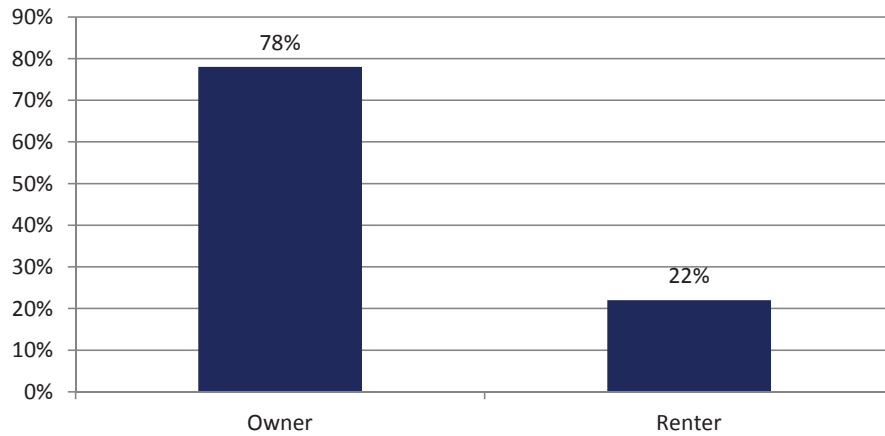
Figure 55. Dwelling type



The principle dwelling type of respondents in the Parkes region was a Single Dwelling (94 percent).

Question 2 - Do you own or rent the dwelling?

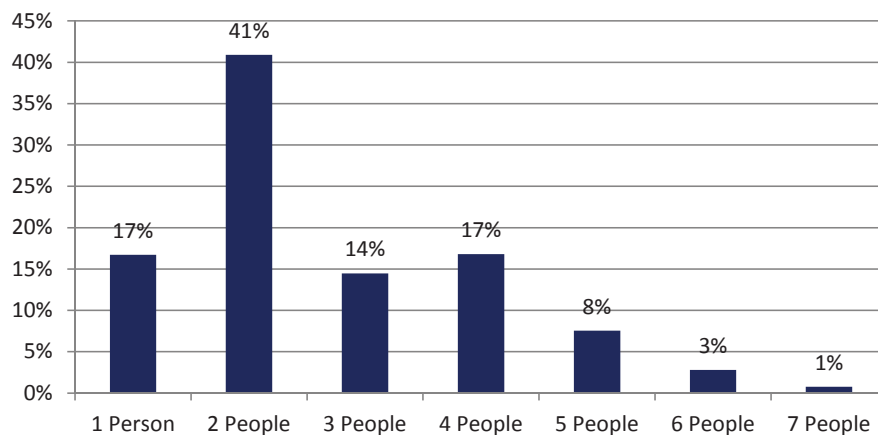
Figure 56. Residential status



Respondents were made up predominantly of household owners (78 percent).

Question 3 - How many people usually live in your dwelling?

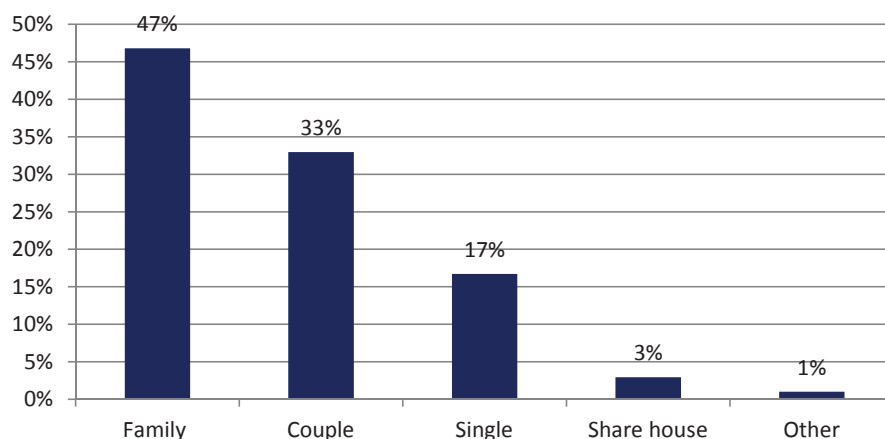
Figure 57. Percentage of dwellings by resident number



The average number of people residing in each dwelling was 2.7.

Question 4 - Household structure

Figure 58. Household structure

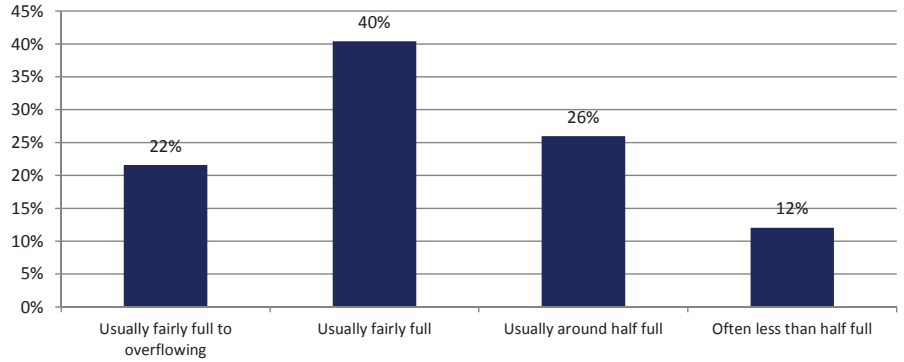


Parkes households were 47 percent family households, followed by 33 percent couple and 17 percent single households.

Overall, 62 percent of respondents reported their garbage bins were at least 'Usually fairly full' on collection day.

Question 5 - Which of the following best describes your garbage bin on collection day?

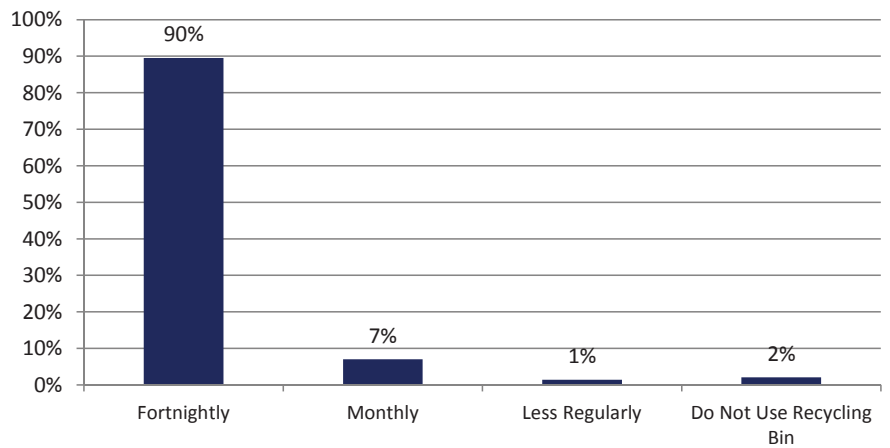
Figure 59. Garbage bin on collection day



Recycling bins were put out fortnightly by 90 percent of respondents.

Question 6 - If you have a yellow bin collection service, how often do you put out your recycling bin for collection?

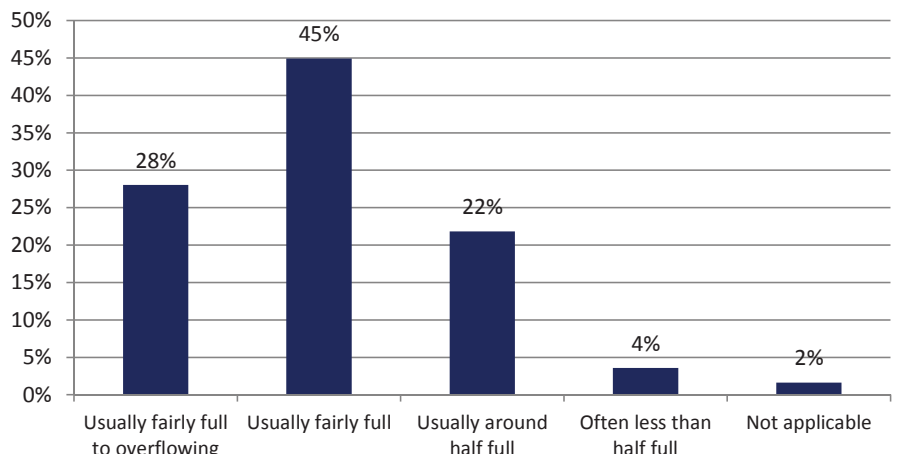
Figure 60. How often do you put out yellow bin



On collection day, 73 percent of Parkes respondents' recycling bins were at least 'Usually fairly full'.

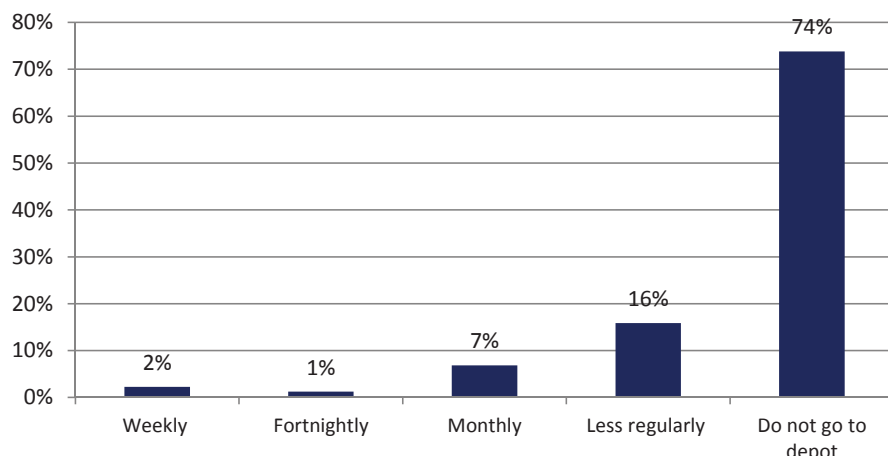
Question 7 - Which of the following best describes your yellow bin on collection day?

Figure 61. Recycling bin on collection day



Question 8 - If you take your recycling to a Council depot, how often would you do so?

Figure 62. Take recycling to depot



When asked how often they took waste to the depot, only 9 percent advised that they went to the depot at least monthly, whilst 74 percent of respondents advised that they did not go to the depot.

Question 9 - Which of the following items do you understand can be recycled through your yellow lidded bin or at your recycling drop-off depot?

Table 5. Which items can be recycled

Item	Percent of Respondents
Paper and cardboard	99%
Glass bottles and jars	95%
Milk cartons	91%
Steel cans (tin cans including dog, cat and tuna cans)	84%
Hard rigid plastic containers from kitchen, bathroom and laundry	70%
Waxed board take away food containers (e.g. takeaway coffee cups)	43%
Aerosol cans	43%
Plastic film and packets	32%
Polystyrene foam	26%
Tissues and serviettes	23%
Plastic bags	19%
Ceramics (cups, saucers and plates)	19%
Recyclable material in plastic bags	17%
Clothing	12%
Fruit and vegetable scraps	2%
Syringes and syringe containers	1%
Nappies	1%

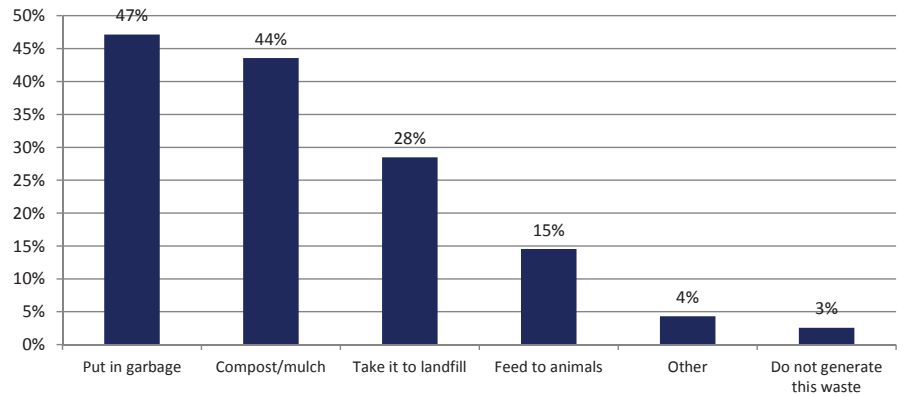
The majority of respondents in Parkes understood the following items could be recycled through a Yellow bin:

- paper and cardboard
- glass bottles and jars
- milk cartons
- steel cans; and
- hard rigid plastic containers.

Question 10 - What do you do with your garden organic waste?

When asked what they do with their garden organic waste, 47 percent of respondents advised that they put it in the garbage and 44 percent compost or mulch.

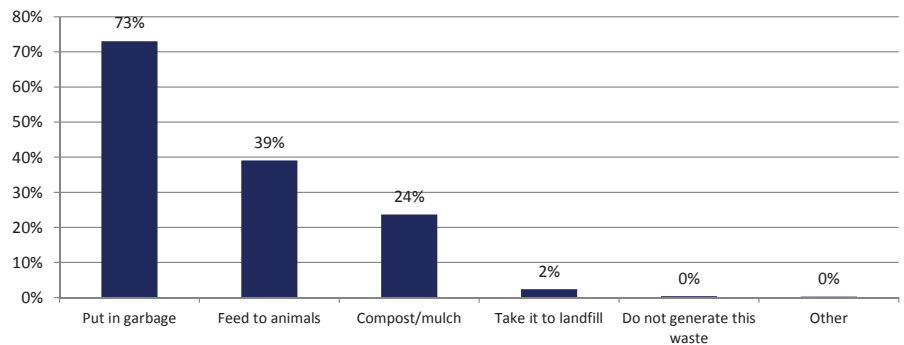
Figure 63. Garden waste



Question 11 - What do you do with your food waste (meat, fruit and vegetable matter)?

When asked what they do with their food waste, 73 percent of respondents advised that they put it the garbage and 39 percent advised that they feed it to animals.

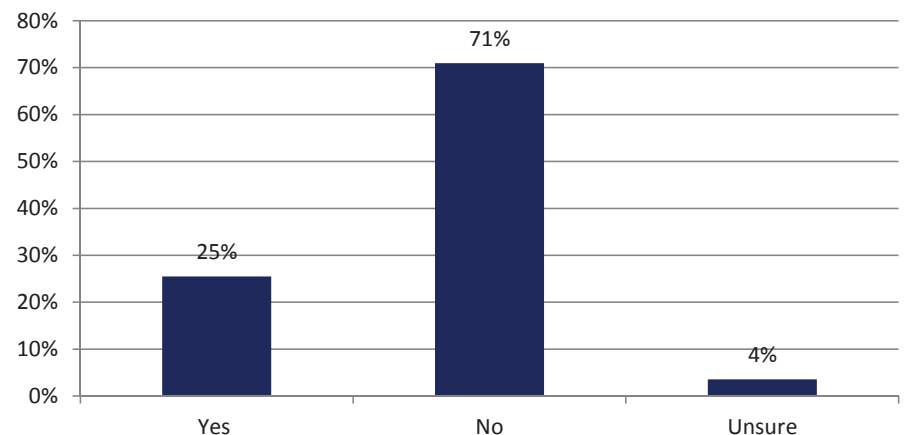
Figure 64. Food waste



Question 12 - Do you feel that your household wastes too much food?

In response to a question as to whether respondents feel they waste too much food, 71 percent of households felt that they did not, whilst 25 percent thought they did and 4 percent were unsure.

Figure 65. Food wastage



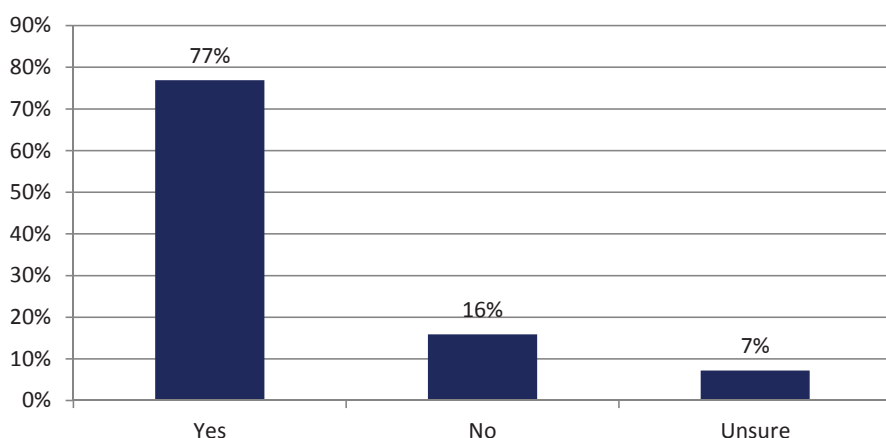
Question 13 - Out of the all the waste that goes in your bin, what percentage of that is food waste?

The average percentage of food waste in respondent's bins for the Parkes region was 13.9 percent.

Support for changes to waste services

Question 14 - Council is planning a green bin service, whereby you would receive a bin for garden organic and food waste, which would be collected weekly. Would you use such a service?

Figure 66. Would you use a green bin service?

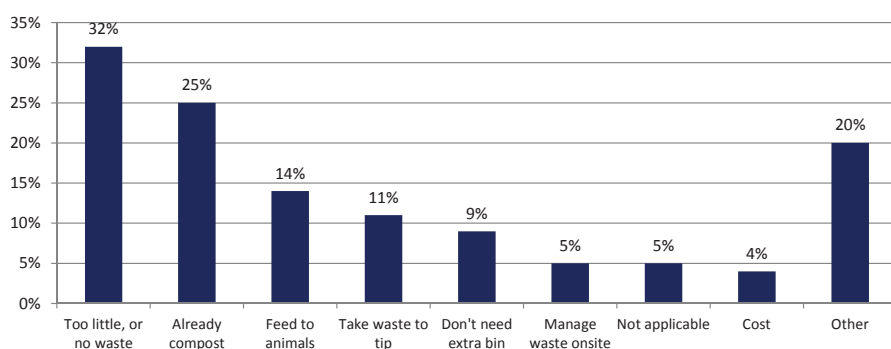


Parkes respondents were asked if they would use the proposed green bin service. Survey results showed that 77 percent would use the service, 16 percent would not and 7 percent were unsure.

Parkes respondents who advised that they would not use a green bin service, or were unsure, were asked 'why not?'. The top responses are listed below.

Question 15 - If you are unsure, or would not use a Council green bin service, why not?

Figure 67. Unsure or would not use a green bin service



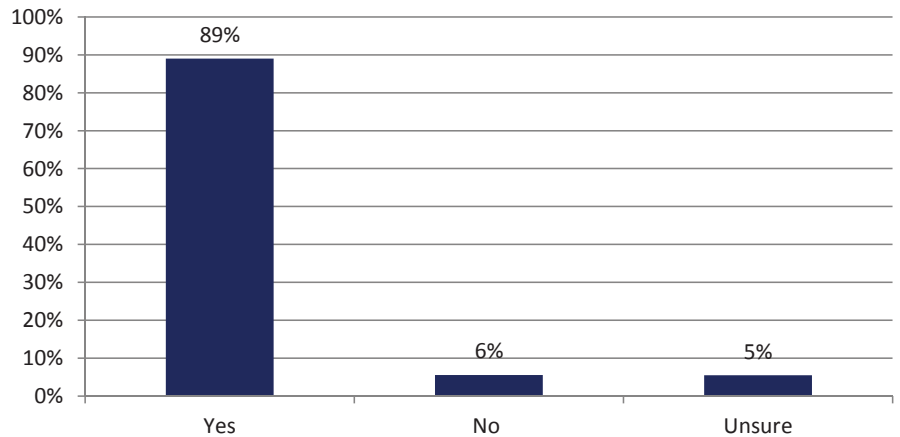
Respondents were able to provide multiple reasons why they were unsure or would not use the service. Responses in the 'Other' category were too diverse to report individually, but included such reasons as:

- Gardener takes away my garden waste
- Burn waste
- Nuisance

Respondents advised that they supported less waste going to landfill, with 89 percent advising that they supported green waste being collected on a weekly basis and composted.

Question 16 - Would you support Council trying to reduce the amount of waste going to landfill by collecting your food and garden waste for composting on a weekly basis?

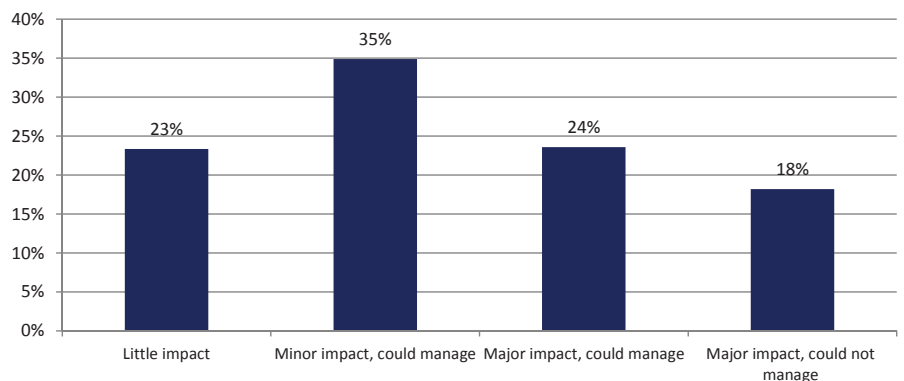
Figure 68. Support for reducing landfill



Respondents were able to gauge the level of impact the change to fortnightly garbage collection would have on their household. Of these responses, 18 percent advised that it would be a major impact that they could not manage, whereas the remaining 82 percent advised of different levels of impact, but indicated that they could manage with this change.

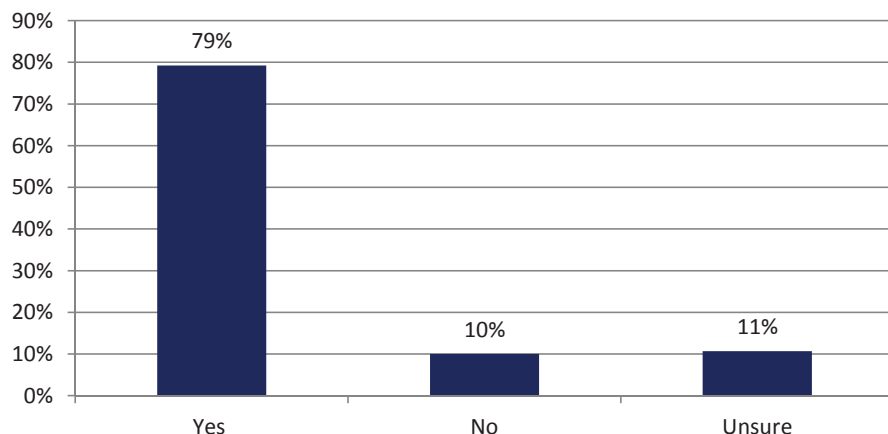
Question 17 - If council was to change the collection frequency of your garbage bin from weekly to fortnightly, which of the following statements would reflect your household's ability to cope with this change?

Figure 69. Fortnightly garbage collection



Question 18 - In principle, do you support the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term?

Figure 70. In principle support

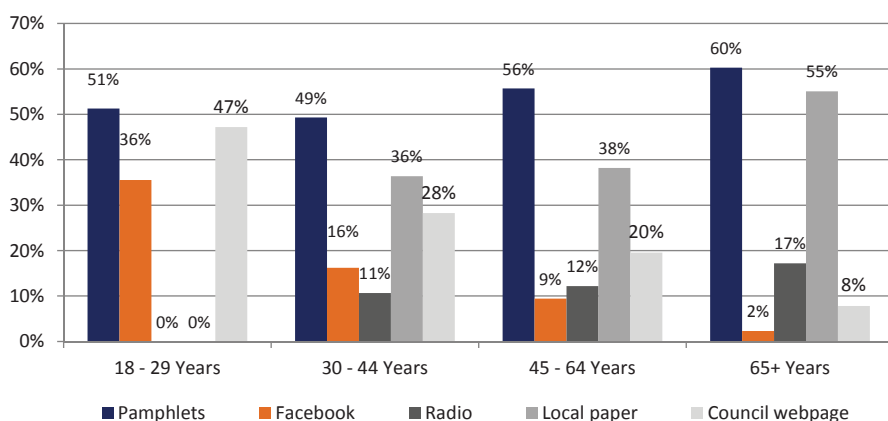


More than three quarters (79 percent) of respondents gave in-principle support for the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term

Other views

Question 19 - How would you prefer to access information about Council waste services?

Figure 71. Preferred media



Responses to this question were broken down by age group to show preferred means of accessing information, allowing Councils to better target waste information.

The preferred method for accessing information about Council waste services was by pamphlets (55 percent), followed by the local paper (37 percent), Council webpage (23 percent), Facebook (13 percent), and radio (11 percent).

Question 20 – Are there any particular changes that you would like to see made to waste management facilities or waste services in your Council area?

Respondents were able to nominate multiple changes. This question received 115 recorded responses. The most common and relevant responses are detailed below. Of the respondents who answered this question:

- 16 percent indicated that they would like to have a green bin service
- 15 percent indicated that they would like weekly recycling collection
- 15 percent indicated that they would like a tip shop or recycling centre
- 12 percent advised that they did not want any changes to their current waste services
- 7 percent requested changes to depot services including a weighbridge, an e-waste service, better signage, better road access, metal recycling and longer/more practical opening times
- 6 percent requested more public information on waste and recycling services, with some suggesting that a fridge magnet with recycling information and a bin collection timetable would be useful
- 3 percent requested no changes to waste collection frequency

APPENDIX 1: DETAILED TABLES

Use the question reference below when reading the detailed tables provided overleaf.

Question reference:

5. Which of the following best describes your garbage bin on collection day?
6. If you have a yellow bin collection service, how often do you put out your recycling bin for collection?
7. Which of the following best describes your yellow bin on collection day?
8. If you take your recycling to a Council depot, how often would you do so?
10. What do you do with your garden organic waste?
11. What do you do with your food waste (meat, fruit and vegetable matter)?
12. Do you feel that your household wastes too much food?
14. Council is planning a green bin service, whereby you would receive a bin for garden organic and food waste, which would be collected weekly. Would you use such a service?
16. Would you support Council trying to reduce the amount of waste going to landfill by collecting your food and garden waste for composting on a weekly basis?
17. If council was to change the collection frequency of your garbage bin from weekly to fortnightly, which of the following statements would reflect your household's ability to cope with this change?
18. In principle, do you support the idea that Council introduce new systems that reduce waste to landfill and increase recycling and composting, even if slightly more expensive in the short term?
19. How would you prefer to access information about Council waste services?

WASTE MANAGEMENT SURVEY

Question Reference No.	Response	Council Area				Age Group (yrs.)					Gender	
		Overall	Forbes	Parkes	Bathurst	18 to 29	30 to 44	45 to 64	65 years+	Male	Female	
5	Usually full to overflowing	22%	19%	22%	24%	39%	37%	16%	4%	16%	28%	
	Usually fairly full	41%	38%	40%	42%	43%	39%	44%	38%	46%	37%	
6	Fortnightly	91%	90%	90%	92%	94%	92%	91%	89%	92%	90%	
	Monthly	6%	6%	7%	6%	4%	4%	8%	8%	5%	7%	
7	Usually full to overflowing	31%	26%	28%	33%	35%	50%	30%	9%	24%	37%	
	Usually fairly full	47%	48%	45%	48%	44%	39%	52%	52%	51%	44%	
	Usually around half full	18%	20%	22%	16%	17%	8%	15%	34%	21%	16%	
8	Weekly	1%	1%	2%	1%	1%	2%	1%	0%	1%	1%	
	Fortnightly	1%	0%	1%	2%	3%	1%	2%	1%	1%	2%	
	Monthly	6%	6%	7%	5%	8%	6%	7%	1%	7%	4%	

Question Reference No.	Response	Council Area						Age Group (yrs.)					Gender	
		Overall	Forbes	Parkes	Bathurst	18 to 29	30 to 44	45 to 64	65 years+	Male	Female			
10	Compost/mulch	48%	46%	44%	51%	35%	43%	54%	56%	53%	44%			
	Put in garbage	54%	42%	47%	59%	65%	51%	53%	49%	48%	59%			
	Feed to animals	11%	9%	15%	10%	10%	17%	10%	8%	10%	12%			
	Take it to landfill	20%	30%	28%	15%	17%	26%	24%	13%	20%	20%			
	Do not generate this waste	4%	7%	3%	3%	6%	3%	2%	5%	4%	4%			
11	Compost/mulch	27%	22%	24%	29%	12%	24%	32%	33%	29%	25%			
	Put in garbage	78%	74%	73%	81%	81%	78%	75%	79%	77%	79%			
	Feed to animals	34%	39%	39%	31%	35%	45%	34%	24%	31%	38%			
	Take it to landfill	2%	1%	2%	2%	3%	1%	2%	1%	2%	1%			
12	Yes	28%	26%	25%	30%	42%	35%	26%	14%	24%	32%			
14	Yes	77%	75%	77%	77%	83%	81%	78%	65%	71%	82%			
16	Yes	86%	89%	89%	85%	89%	89%	88%	81%	84%	89%			
17	There would be little impact	21%	20%	23%	20%	11%	17%	22%	30%	23%	19%			
	There would be a minor impact, but we could manage	32%	37%	35%	30%	33%	22%	35%	38%	33%	32%			
	There would be a major impact, but we could manage	20%	24%	24%	18%	23%	25%	18%	16%	21%	20%			
18	There would be a major impact and we could not manage	27%	20%	18%	32%	33%	36%	25%	16%	24%	30%			
	Yes	75%	75%	79%	74%	77%	77%	77%	71%	74%	77%			
19	Pamphlets	48%	55%	55%	43%	37%	38%	48%	65%	50%	46%			
	Facebook	19%	17%	13%	21%	37%	28%	12%	5%	14%	23%			
	Radio	9%	11%	11%	7%	5%	6%	11%	11%	10%	7%			
	Local paper	26%	32%	37%	20%	13%	18%	28%	40%	26%	25%			
	Council webpage	26%	23%	23%	28%	28%	31%	30%	13%	32%	20%			

WESTERN RESEARCH INSTITUTE

WRI is a regional development research organisation located in Bathurst, New South Wales. WRI holds a wealth of knowledge on employment, business development and investment issues affecting regional Australia. It has worked with Commonwealth, State and Local Governments and industry groups on numerous investment and development programs in regional areas. WRI has strong credentials in business and commercial market consulting and applied economic modelling including input-output analysis, shift-share, agribusiness and regional socio-economic surveys and analysis.

Ms Danielle Ranshaw – Chief Executive Officer

BEC&Fin NSW

Danielle's experience in project management in the information technology sector combined with qualifications in economics and finance provides a solid background for WRI projects. With skills in systems design and development, Danielle has been able to extend WRI's capability in developing robust and increasingly complex systems to support research fieldwork. Additionally, Danielle has extensive experience in business process analysis, performance planning and review, report writing and project planning.

Ms Rebecca Hood – Research Officer

BBus (Fin/Acc) With Distinction CSU

After working in the Financial Services Industry for several years coupled with a degree in Finance and Accounting from Charles Sturt University, Rebecca brings strong skills in finance, economics, business and accounting to WRI projects. Rebecca's experience in the finance field and her high level understanding of current market knowledge gives Rebecca a solid understanding of the financial needs of regional and rural Australia. In her role as Research Officer, Rebecca has worked on a wide range of projects covering many aspects of regional economic development including; economic and social impacts of mining and mine related developments, manufacturing operations, sporting events, not for profit social housing and aged care. Rebecca plays a key role in performing high level and varied economic impact (input-output) modelling and also has strong skills in benefit-cost analysis, human capital modelling, survey questionnaire development and the preparation of socio-economic profiles.

Mr Alistair MacLennan – Senior Research Officer

BA Political Economy, First Class Honours (UNE)

Having served in a variety of parliamentary, public service and private sector roles, Alistair brings a wealth of research experience to WRI. Alistair has well developed skills in data analysis, economics and business, and has a wide understanding of government. In addition, Alistair also has

experience in policy development in the energy sector, where he engaged with industry, government agencies and NGOs to inform policy. Alistair's experience in engaging with clients, stakeholders and the public assists WRI to fully understand its client's needs and provide tailored research.

Ms Erin Wise – Senior Research Officer

BBus Marketing, BBus Honours Class 1 (CSU)

Erin is a passionate market researcher with over 10 years' experience in the industry. Erin joins WRI after gaining a wealth of experience in brand strategy and development, and understanding consumer sentiment from her previous role as a Research Director at Pollinate. She is a skilled quantitative researcher with background in brand tracking, consumer segmentation, advertising testing and evaluation. Erin is proficient in multivariate data analysis techniques, project management, presenting and is dedicated to ensuring her clients solve their research problems.

Erin is currently a member of the Australian Marketing and Social Research Society and has been certified by the society as a Qualified Practicing Market Researcher (QPMPR).

Ms Dale Curran – Executive Officer

BA ANU

Dale is responsible for all administrative processes at WRI including executive support, finance, management of the board of Directors and maintenance of policies. She has worked in a variety of roles at WRI, including Fieldwork Supervisor and Research Assistant, and has worked on several community and business surveys. Dale's skills and experience in data collection contribute to WRI's projects, bringing strong skills in data collection, particularly questionnaire development, data entry and telephone and face to face interviewing techniques. In addition to her administrative role, Dale has oversight of marketing, PR and communications activities, and brings a high level of skill to the design of WRI's reports.

