

### **3.1. Food Scraps Trial in MUDs**

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**ATTACHMENTS:** Nil

Nil.

#### **EXECUTIVE SUMMARY:**

This report provides an overview of the upcoming food scraps collection and processing trial. The purpose of the trial is to test the demand and gather data (cost and operational) of implementing a food scraps recycling collection service for residents in Multi Unit Dwellings (MUDs). The results of the trial will inform long-term strategic decisions on resource recovery options.

#### **FINANCIAL IMPLICATIONS:**

This project will be funded from the Domestic Waste Management Budget and the NSW EPA Grant.

#### **RECOMMENDATION:**

- 1. THAT** the Residential Food Scraps Collection and Processing Trial report be received.

## LINK TO COMMUNITY STRATEGIC PLAN

The relationship with the Community Strategic Plan is as follows:

### 1. Our Living Environment

#### 1.4 Public open space and recreation facilities and services meet community needs

## BACKGROUND

Food waste collected with household waste makes up to 35% of the red lid rubbish bin content in the North Sydney local government area.

In order to capture this material and divert it from landfill, Council entered into a contract in 2006 to have all waste processed at SUEZ's resource recovery facility at Eastern Creek. From there, food waste was separated to produce compost for mine remediation and a variety of other applications. This facility was designed to maximize the recovery of resources and divert waste from landfill. Council, under contract with SUEZ, utilized this technology from 2006 to 2018, achieving a 60% recovery rate from the contents of the red bin with food waste and recyclables (plastics, paper and glass) being recovered. This process coupled with the kerbside collection of recyclables from the yellow lid bin contributed to a total waste diversion from landfill rate of 69%, surpassing the targets set by the NSW EPA at that time.

In 2018, the NSW EPA banned the application of mixed waste organics outputs to land due to risks associated with chemical and physical contaminants. This occurred when Council was seeking tenders for alternative waste processing and disposal services including the recovery of resources in the general waste stream.

As a result, Council entered into a contract with SUEZ on 1 July 2019 to dispose of Council's general waste to landfill with no opportunity to extract the organic fraction, which in landfill breaks down and creates methane, a greenhouse gas. This situation is under review however it appears unlikely the EPA will reverse or modify their previous decision.

The reduced diversion of food waste from landfill triggered a mayoral minute at the Council meeting on 24 February 2020 calling on Council staff to prepare a report on a food scraps trial.

A report was submitted to the 30 November 2020 Council meeting detailing the methodology and an estimation of the costs in running a separate collection and recycling of food scraps in MUDs in the local government area of North Sydney.

The Council resolved as follows:

- 1. *THAT the Residential Food Scraps Collection and Processing Trial report be received.***
- 2. *THAT the Food Waste Collection Trial is progressed in accordance with the budget and methodologies and timeframes proposed in the details outlined in this report.***
- 3. *THAT Council seeks three quotations from waste consultancies listed in the Local Government Approved Panel to assist Council in the planning, management and implementation of the trial.***
- 4 *THAT a final report is provided to Council on the results of the Food Waste Collection Trial.***

## CONSULTATION REQUIREMENTS

Community engagement will be undertaken in accordance with Council's Community Engagement Protocol.

### DETAIL

Given that small, medium and high-density apartments represent almost 90% of the housing stock in the local government area, the multi-unit dwelling (MUD) community will be targeted in the trial. Single detached dwellings which represent 7 % of the housing stock, will be excluded from the trial because the results from food waste trials at other councils indicates this group consistently performs significantly better than MUDs in their participation and contamination rates. Individual waste disposal facilities are a contributing factor why houses outperform MUDs in food waste trials.

The objective is to generate a diverse sample of MUDs large enough to generate robust data that is a good representation of the local government area. The target of 400 individual unit dwellings has been set. It should be noted that MUDs are inherently more difficult to manage due their high transient population. The 2016 ABS census data revealed that of the entire housing stock in the North Sydney local government area, 46% are owner occupiers and 51% are tenanted. Other variables that will be considered include building age, size (number of units), presence/absence of a building manager/caretaker and site conditions i.e. location of garbage bin room, presence/absence of waste chutes, internal/external access and bin bay capacity for additional food scrap wheelie bins.

Consideration will be given to potential bias in the data and results obtained from the trial, if the resident sample are only those that are motivated by behavioural change and are willing participants as this sample group is unlikely to reflect a longer term commitment from the wider local government area if the service was to become permanent. To reduce the risk of the results being biased or distorted a direct random sampling method of recruitment will be used.

To gauge the community's interest in the participation of the trial, a number of community engagement methods will be deployed prior to using the direct random sampling method.

Key learning from other Councils having conducted similar trials include consideration of how it is to be determined if residents are participating fully or poorly, as efforts can sometimes only be measured in aggregate for an entire building (given the shared bin and services model that exists in MUDs). In this instance, learnings have shown that it is imperative for the Owners Corporation or Strata Managers to support such an initiative and to ensure data collection is accurate, a commitment from the building to actively take part is required. Other Councils have attempted with varying degrees of success to appoint Point of Contacts (PoC) that include building managers, cleaners and nominated building champions.

APrince consulting will assist Council with the planning, design, recruitment of participants, audits, data collection, surveys and reporting functions.

## Overview of Methodology

Residents will be asked to separate their food waste via kitchen caddies in each individual dwelling and place this food waste in a separate food-only Mobile Garbage Bin (MGB) on a shared basis in an allocated waste disposal area on site for collection. This method is consistent with standard practice adopted at other councils that have undertaken similar food waste trials. The trial will be supported by an education campaign. It is proposed that our current waste collection contractor, URM, would undertake the MGB collection service with all collected food waste delivered to an anaerobic digestion processing facility at Camelia (EarthPower Technologies) for conversion to compost / fertiliser with the added benefit of green electricity being generated. This facility is currently closed for refurbishment and is expected to reopen July 2021.

To make separating food scraps for processing simple, registered participating households will be provided with:

- a small seven (7) litre kitchen caddy;
- one off supply of compostable caddy liner bags;
- food scraps recycling wheelie bins, 120 L size with a burgundy lid as per industry standards;
- wall poster for lobby noticeboard, fridge sticker, bin sticker, bin bay signage, FAQs information booklets; and
- ongoing support from Council in managing the likely contamination of the food scrap bins.

URM will carry out delivery of kitchen caddies as well as the delivery, repair and replacement of the food scraps wheelie bins. This will be arranged per building. Collection services will be undertaken by URM on a once per week basis on Wednesdays in a separate truck. The existing waste services will continue to be provided as per normal.

To gain a realistic understanding of how the residents and the wider community will respond to such an initiative, the trial will run for a period of six (6) months.

The trial will be funded from the Domestic Waste Management Budget and the recently acquired grant from the NSW EPA. Funding of \$180,000 has been secured under the Local Council Transition Fund program administered by the NSW EPA. The funding program allowed eligible councils to apply for a grant of up to \$180,000 to undertake projects that will increase the recovery of organics in the red-lid garbage bin.

The results of this trial could possibly shape whether future food scraps recycling services would be viable across the North Sydney local government area.