

## 4. What is the vision for the future?

### Vision for the Future

Council is committed to implementing a WRRP which improves current waste management performance and sets measurable targets for waste reduction and recycling. The vision for the WRRP for waste services is:

**“To reduce our waste in an innovative, cost effective and sustainable way while improving the level of service to the community”**

This outcome is based on a view that most waste is a valuable resource that can be used in innovative ways rather than being disposed of at landfill sites. Reducing the generation of waste in the first instance is Council’s primary focus. In addition, reducing our carbon footprint and the amount of waste going into landfill will contribute to the future sustainability of the region. Council will seek to manage local waste in an innovative, cost effective and sustainable way.

**Table 11: State Government Waste Avoidance and Resource Productivity Strategy (2014 - 2024) Targets**

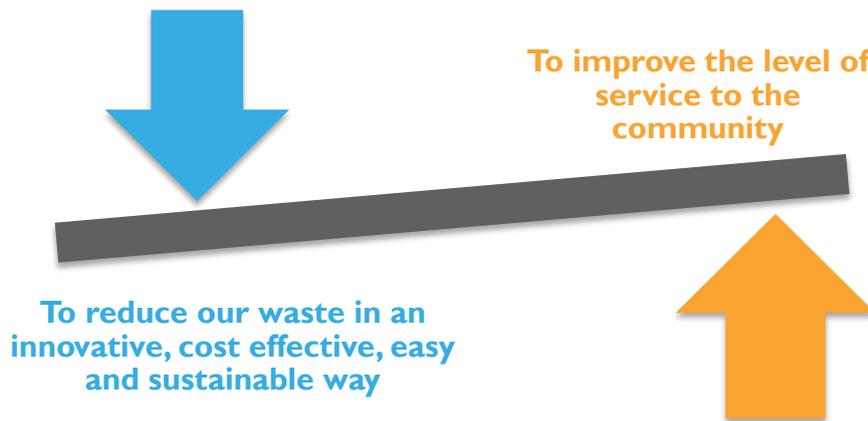
| Target                                               | Qld Position<br>2012-13    |       | Qld Target Year<br>2024    |
|------------------------------------------------------|----------------------------|-------|----------------------------|
| Reduction in per capita generation of general waste  | 1.9 tonnes / person / year | By 5% | 1.8 tonnes / person / year |
| <b>Improve Recycling</b>                             |                            |       |                            |
| - <b>Municipal Solid Waste (MSW)</b>                 | 37%                        |       | 55%                        |
| - <b>Construction and Demolition (C&amp;D) Waste</b> | 61%                        |       | 80%                        |
| - <b>Commercial and Industrial (C&amp;I) Waste</b>   | 42%                        |       | 55%                        |

**Table 12: Aligning Council’s WRRP (2016 - 2026) Targets with the Queensland Waste Avoidance & Resource Productivity Strategy**

| Target                                                          | MBRC<br>Position 2015  |       | MBRC Target Year<br>2026 |
|-----------------------------------------------------------------|------------------------|-------|--------------------------|
| Reduction in per capita generation of general waste             | 762 kg / person / year | By 5% | 724 kg / person / year   |
| <b>Reach recycling rates in line with the Qld WARP Strategy</b> |                        |       |                          |
| - <b>Municipal Solid Waste (MSW)</b>                            | 42%                    |       | 55%                      |
| - <b>Construction and Demolition (C&amp;D) Waste</b>            | 88%                    |       | 90%                      |
| - <b>Commercial and Industrial (C&amp;I) Waste</b>              | 49%                    |       | 55%                      |

## Targets and Collaborative Action

Council is committed to a proactive approach to ensure it meets its objectives and targets as outlined in this WRRP. This will be achieved through a series of deliverable actions over the short, medium and long term. This will include engagement with key stakeholders and working in partnership with other entities, where feasible to do so.

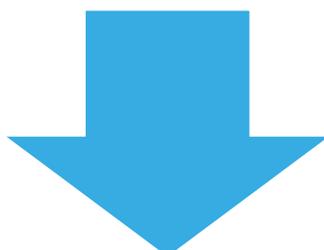


Of primary importance to this WRRP is the need to continue to promote waste prevention activities and reuse programs to the community through a variety of education and engagement methods. This will require a focus on promoting preferred behaviours and, where necessary, encouraging a change in behaviour and attitudes towards waste generation and handling.

Council's short and medium term focus is on the improvement and enhancement of existing waste infrastructure and a focus on improving current waste management practices. This will allow Council to deliver core operations in an efficient, cost effective and sustainable way. This will be followed by long term investment in waste infrastructure to deliver the targets identified within this plan.



**Increase**  
 Recovery and recycling of resources  
 Educational awareness programs  
 Behaviour change  
 Service delivery



**Reduce**  
 Waste to landfill  
 Landfill gas emissions  
 Generation of waste  
 Impacts on the environment

## Short Term Targets

---

### Data Management and Reporting

Accurate waste data is important to draw an accurate waste data baseline, upon which meaningful targets can be set and performance can be measured over time and continuous improvement demonstrated.

### Communication

Residents are already taking positive action to recycle and reuse waste. As part of delivering this WRRP, there will be an ongoing need to engage with residents and empower them to change consumption behaviours thereby creating less waste, as well as encouraging them to avoid, reduce, reuse, recover and recycle more. This will take place through targeted education, community engagement and promotional activities which give instructions and provide motivation in simple and practical ways to improve levels of knowledge and understanding of the key issues and, in turn, encourage responsibility for action.

Council will develop communication plans that support the WRRP and associated activities.

### Consultation

It is important to consult with residents, community organisations and educational facilities to gauge the understanding of key waste and resources management issues.

User surveys are carried out at Resource Recovery and Transfer Station Facilities to provide better customer service. Results obtained from participants at the Facilities and education programs are reviewed to improve sustainable waste practices used at home, work and school.

### Improve the Performance of Existing Kerbside Recycling Systems

Council diverts approximately 24% of the municipal waste generated in the region from landfill through kerbside recycling. However there is still more material which could be diverted as a large proportion of recyclable materials are being thrown into the general waste bin.

Further guidance, awareness raising and education to improve the understanding of how to use the recycling systems correctly, along with an explanation of the environmental benefits of doing so, are required.

### Improve the Performance at Resource Recovery & Transfer Station Facilities

Resource Recovery and Transfer Station Facilities are an important part of the waste collection services offered by Council. Council diverts approximately 60% of self-haul waste and these sites provide additional opportunities to segregate waste for recycling and re-use. As an example, Treasure Markets are provided to allow residents to donate or purchase second hand household items.

In order to make it as easier for residents to use and identify resource recovery and reuse options at each of the facilities, the site layout will be continually reviewed, focusing on aspects such as signage and user friendliness.

## Internal Council Waste Systems

As well as providing services for residents and businesses, Council generates waste as a result of its own activities.

Council has been reviewing the amount of Council waste generated and implementing additional recycling schemes within the various sections to improve recycling and diversion from landfill.

## Council Procurement Systems

Council's Procurement Policy includes an environmentally sound contracting principle for officers to consider when selecting a supplier and/or product: "Council will purchase environmentally preferred products whenever their performance, quality and total acquisition cost is equal to, or better than, those products which can be demonstrated as having a more adverse effect on the environment."

Council will continue to review internal procurement policies and procedures to promote resource recovery through the Council supply chain.

## Medium Term Targets

---

### Review Provision of Resource Recovery & Transfer Station Facilities

Building on the short term work completed to improve the waste management performance at individual facilities, it will also be important to review the provision of Resource Recovery & Transfer Facilities to ensure:

- there is a sufficient number of sites provided;
- existing sites allow sufficient opportunities to recycle/recover waste materials;
- site operational practices support and encourage user behaviour that leads to higher levels of resource recovery and recycling yields.

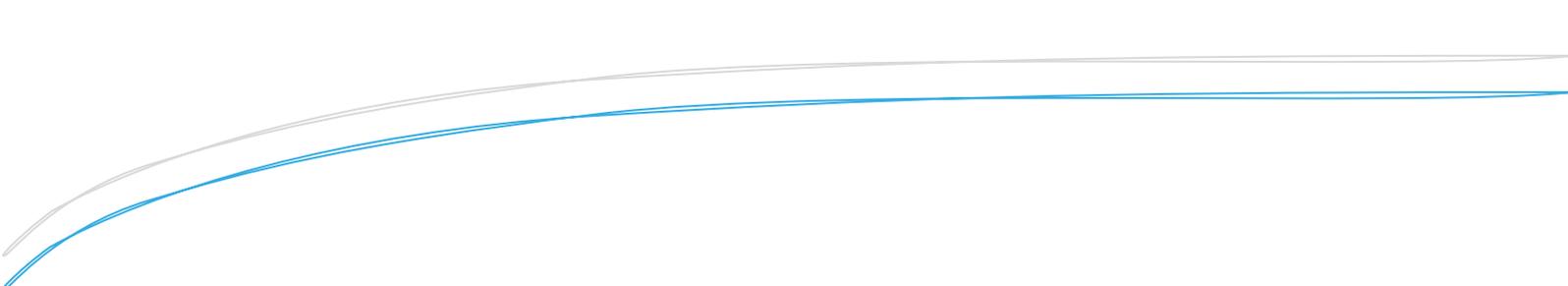
### Review Opportunities for Partnerships

Council currently works with a number of local groups to deliver and develop waste management projects. Council recognises the importance of developing partnerships with community organisations, neighbouring councils and business partners. This will support waste management projects which help deliver the key objectives of this plan and ultimately divert more waste from landfill.

### Waste Prevention and Reuse Programs

Waste prevention is central to this WRRP and is the best way to reduce the impact of waste management activities on the environment. Not generating waste means that natural resources are conserved, there is a reduction in carbon emissions and the cost of dealing with the issue of waste disposal is avoided.

Council will continue to educate and engage the community on the importance of waste prevention to save resources and reduce waste going to landfill.



## Longer Term Targets

---

### **Alternative Waste Treatment Technology Facilities**

Alternative Waste Treatment Facilities may be considered in the future that would reduce the waste to landfill even further.

The cost of such systems is high when compared to the current landfill cost. Council will therefore firstly review the viability of introducing Alternative Waste Treatment technology in the region.

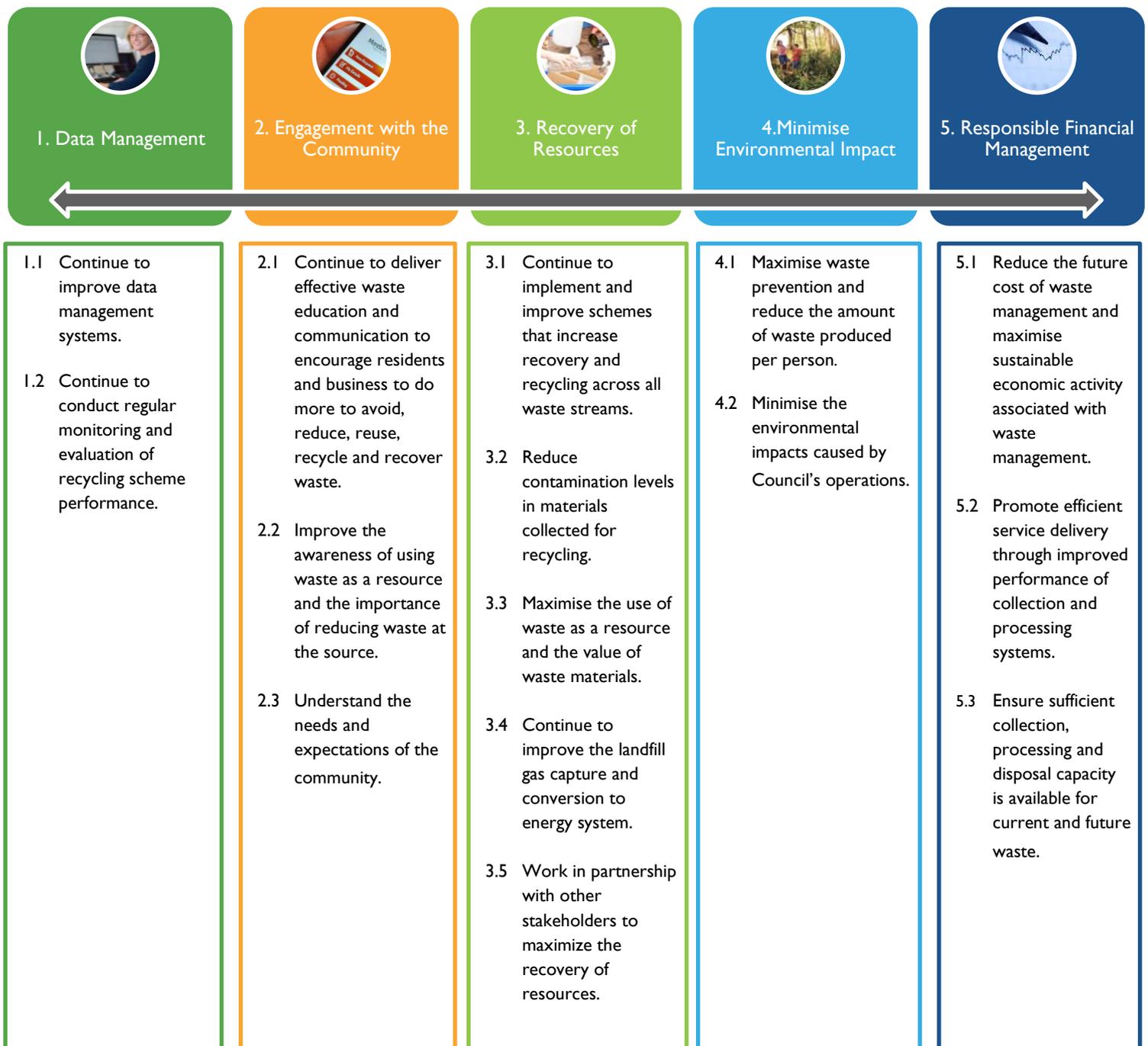
### **Changes to Kerbside Collection Schemes**

Council will consider the viability of introducing separate green waste collections for residents as part of the next kerbside waste collection contract.

## Priority Themes for Action

In order to address the targets and achieve the WRRP vision for waste management in Moreton Bay, Council has identified five priority themes for action (Figure 8). A series of objectives have been developed to address these five priority themes for action. These objectives detailed in tables 11-15 will guide the direction of Council activities over the next ten years.

**Figure 8: Waste Reduction & Recycling Plan Priority Themes**



## Action Plan and Timeframes

**Table 11: Objective 1 Data Management**

| Strategic Objective | Actions                                                                                                                                                                          | Timeline | Cost |
|---------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|------|
| 1.1                 | Continue to improve data management and reporting practices.                                                                                                                     | Short    | Low  |
| 1.2                 | Maintain an ongoing relationship and exchange of information with other Councils in South East Queensland to ensure that the delivery of waste services is continually improved. | Short    | Low  |
| 1.2                 | Conduct regular waste and recycling audits of the material collected in the kerbside collection program.                                                                         | Short    | Med  |

**Table 12: Objective 2 Engagement with the Community**

| Strategic Objective | Actions                                                                                                                                                                                 | Timeline | Cost |
|---------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|------|
| 2.1                 | Consult regularly with teachers to determine that Council's school based waste education program has been developed in line with the requirements of the school's education curriculum. | Short    | Low  |
| 2.1                 | Develop communication plans to support the WRRP.                                                                                                                                        | Short    | Med  |
| 2.1                 | Develop a litter and illegal dumping management plan in cooperation with the state government, other Council departments and interested stakeholders.                                   | Med      | Med  |
| 2.2                 | Conduct a yearly review of Council's website to ensure that the community has ready access to the most up to date waste education information and waste management programs.            | Short    | Low  |
| 2.2                 | Continue to partnership with the community in promoting waste management programs.                                                                                                      | Short    | Low  |
| 2.2                 | Liaise with businesses to provide services that encourage recycling.                                                                                                                    | Med      | Med  |
| 2.3                 | Conduct regular surveys at waste management facilities to determine customer satisfaction.                                                                                              | Short    | Low  |
| 2.3                 | Seek feedback from the community at Council events and public displays to determine their knowledge and the effectiveness of Council's waste management programs.                       | Short    | Low  |
| 2.3                 | Continue to survey residents outside the Defined Waste Collection Area to determine the need to provide a kerbside collection service in their area.                                    | Short    | Low  |

**Table 13: Objective 3 Recovery of Resources**

| Strategic Objective      | Actions                                                                                                                                                                                                                                                            | Timeline | Cost |
|--------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|------|
| 3.1                      | Continue to review and implement recycling at events.                                                                                                                                                                                                              | Short    | Med  |
| 3.2                      | Develop a monitoring program with contractors to identify the level of contamination in kerbside recycling bins and provide feedback to the resident.                                                                                                              | Short    | Low  |
| 3.3                      | Investigate waste reuse programmes targeted at <ul style="list-style-type: none"> <li>• Organic waste</li> <li>• Reducing packaging</li> <li>• Smart Shopping</li> </ul>                                                                                           | Med      | Med  |
| 3.4                      | Continue to review and upgrade the recycling areas at all waste facilities to maximise the recovery of resources.                                                                                                                                                  | Med      | Med  |
| 3.5                      | Continue to review internal Council procurement policies and procedures.                                                                                                                                                                                           | Short    | Low  |
| 3.5                      | Collaborate with business and industries to develop markets to improve the recovery of resources.                                                                                                                                                                  | Long     | Med  |
| 3.5                      | Continue to investigate opportunities to work with businesses for reusing recycled products.                                                                                                                                                                       | Long     | Med  |
| 3.1<br>3.2<br>3.4<br>3.5 | Review the performance of existing kerbside collection systems to: <ul style="list-style-type: none"> <li>• increase the amount of materials recycled</li> <li>• increase the number of properties that use the service</li> <li>• reduce contamination</li> </ul> | Short    | Med  |

**Table 14: Objective 4 Minimise Environmental Impact**

| Strategic Objective | Actions                                                                                                                                                            | Timeline | Cost |
|---------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|------|
| 4.1                 | Continually review the information provided to the public to assist them in minimising the amount of waste they generate.                                          | Short    | Low  |
| 4.2                 | Continue to review Council's Planning Scheme to ensure new developments have suitable waste management services that do not impact on the surrounding environment. | Short    | Low  |
| 4.2                 | Continually monitor and reduce the environmental impacts from all waste management facilities.                                                                     | Short    | Med  |
| 4.2                 | Continue to review the site based management plans for all landfill sites to improve the management of these facilities.                                           | Short    | Med  |
| 4.2                 | Continue to improve the landfill gas capture systems across all sites to reduce carbon emissions.                                                                  | Short    | Med  |

**Table 15: Objective 5 Responsible Financial Management**

| <b>Strategic Objective</b> | <b>Actions</b>                                                                                                                                                                                                               | <b>Timeline</b> | <b>Cost</b> |
|----------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------|-------------|
| 5.1                        | Continually manage Council's waste management contracts to ensure Council is receiving maximum value for dollar.                                                                                                             | Short           | Low         |
| 5.2                        | Ensure efficient and effective landfill operations to maximise the life of all landfills.                                                                                                                                    | Short           | Med         |
| 5.2                        | Continue to review overall provision of waste facilities and operational practices with a view to standardisation.                                                                                                           | Med             | Med         |
| 5.3                        | Continually review Council's 10 year capital works program so as to plan and deliver necessary infrastructure capable of meeting future waste management demands.                                                            | Short           | Low         |
| 5.3                        | Plan, design, construct, operate and maintain facilities to provide suitable infrastructure on time and of sufficient capacity to accommodate a growing community in an economically and environmentally responsible manner. | Short           | Med         |
| 5.3                        | Consider options for the establishment of a Regional Waste Management and Resource Recovery Facility that may involve the collaboration between other stakeholders.                                                          | Short           | High        |
| 5.3                        | Consider feasibility of introducing alternate waste treatment technologies to treat general waste and reduce waste to landfill.                                                                                              | Long            | High        |

## Performance Measures

| Strategic Objective                     | Target                                                                                                                                                                                                                                                             | Target Measure                                                  |
|-----------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------|
| <b>Data Management</b>                  | Conduct regular waste stream audits of the following areas to determine the effectiveness of WRRP: <ul style="list-style-type: none"> <li>• Kerbside waste and recycling collection services.</li> <li>• Self-haul waste deposited at waste facilities.</li> </ul> | Biennial                                                        |
| <b>Engagement with the Community</b>    | Develop Communication Plans to support the WRRP.<br><br>Conduct regular satisfaction surveys of customers that use the waste facilities.<br><br>Provide feedback surveys to schools to determine the effectiveness of the Resource Education program.              | 2018<br><br>Biennial<br><br>20% of presentations to be surveyed |
| <b>Recovery of Resources</b>            | Improve Recycling Rates by 2026 for: <ul style="list-style-type: none"> <li>• Municipal Solid Waste</li> <li>• Construction and Demolition Waste</li> <li>• Commercial and Industrial Waste</li> </ul>                                                             | 55%<br>90%<br>55%                                               |
| <b>Minimise Environmental Impact</b>    | Reduce the per capita of waste generation by 2026 by 5%.<br><br>Ensure all landfills in the region have a landfill gas capture and power generation system in operation.                                                                                           | 724 kg/per/yr<br><br>July 2018                                  |
| <b>Responsible Financial Management</b> | Ensure that the waste management operations costs do not increase by more than the yearly growth rate & CPI.                                                                                                                                                       | CPI & Growth Rate                                               |

## Glossary

---

|                                                     |                                                                                                                                                                                                                                                                                                                                                       |
|-----------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Alternative Waste Technology (AWT)</b>           | Waste processing infrastructure using mechanical, biological and/or thermal processes as an alternative to, or pre-treatment for landfill.                                                                                                                                                                                                            |
| <b>Avoidance</b>                                    | Avoid unnecessary consumption of products created using natural resources, water, energy, and financial cost resulting in unsustainable waste disposal.                                                                                                                                                                                               |
| <b>Commercial and Industrial Waste (C&amp;I)</b>    | Waste which has been generated from a business activity and or waste that has been generated as a result of the ordinary use or occupation of commercial/industrial premises and community groups including churches, schools, sporting clubs, and other non-profit organisations.                                                                    |
| <b>Construction and Demolition Waste (C&amp;D)</b>  | Waste generated from construction and demolition work. Includes concrete, bricks, timber, steel, clean fill, tiles, lino, carpet, gyprock/plasterboard, insulation, electrical and plumbing wastes.                                                                                                                                                   |
| <b>Contamination in the recyclable waste stream</b> | Materials that are not accepted in Council's comingled recycling bin service. These items may be recycled through an industry or community program, donated for reuse and recovery, recovered, composted as organic matter for reuse, or disposed in general waste.                                                                                   |
| <b>Defined Waste Collection Area</b>                | The area of the Moreton Bay Region which has been identified by Council from time to time where the contractor must conduct kerbside waste collection services.                                                                                                                                                                                       |
| <b>Dispose</b>                                      | Dispose of waste only if there is no viable alternative.                                                                                                                                                                                                                                                                                              |
| <b>Key Performance Indicators</b>                   | Specific measures of performance that are clearly defined and are able to measure progress towards achieving an effective Waste Reduction and Recycling Plan. Examples include the amount of waste generated per person per year (kg/person/year), Each indicator needs specific data to be recorded and collated in order to track change over time. |
| <b>Landfill</b>                                     | The disposal of waste materials through burial. Modern landfill sites are engineered, lined and fitted with gas capture systems to minimise environmental impact.                                                                                                                                                                                     |
| <b>Landfill diversion</b>                           | Actively diverting waste away from landfill so that it is instead re-used, recycled or treated.                                                                                                                                                                                                                                                       |
| <b>Materials Recovery Facility (MRF)</b>            | Materials collected for recycling at the kerbside in the Moreton Bay Region are sent to a materials recovery facility. The MRF is equipped to sort items into material categories for resale and reprocessing.                                                                                                                                        |

|                                                    |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
|----------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Municipal Solid Waste (MSW)</b>                 | Municipal solid waste is waste produced primarily by households and Council activities, including biodegradable material, recyclable materials such as bottles, paper, cardboard and aluminium cans, and a wide range of non-degradable material including paint, appliances, old furniture and household lighting.                                                                                                                                                                                                                                                                                                                                                                        |
| <b>Recover</b>                                     | Recover waste resources, including the recovery of energy.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| <b>Recycle</b>                                     | Recycle waste resources to make the same or different products.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| <b>Recycling</b>                                   | Recycling involves the collection, sorting and processing of materials to be used in the creation of new recyclable products.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
| <b>Reduce</b>                                      | Reduce waste generation and disposal.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| <b>ResourcEd Schools</b>                           | An award winning waste management education program provided to schools and early learning centres in the Moreton Bay region assisting to increase the recovery of resources and reduce waste disposal to landfill.                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| <b>Resource Recovery Centre / Transfer Station</b> | A Council facility which receives waste for temporary storage. The waste can be sorted or consolidated and then removed and transported for further processing including recycling or disposal at a landfill facility.                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Reuse</b>                                       | Items that do not require processing, and are in a suitable condition and quality to be reused in its original form e.g. furniture, household items.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| <b>Treasure Market</b>                             | A designated market area for the reuse of salvageable items to the public.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| <b>Treat</b>                                       | Treat waste before disposal, including reducing the hazardousness nature of the waste.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Waste</b>                                       | <p>The Environmental Protection Act 1994 defines waste as:</p> <p>a) left over, or an unwanted by-product, from an industrial, commercial, domestic or other activity:</p> <p>b) surplus to the industrial, commercial, domestic or other activity generating the waste.</p> <ul style="list-style-type: none"> <li>▪ Waste can be a gas, liquid, solid or energy, or a combination of any of them.</li> <li>▪ A thing can be waste whether or not it is of value.</li> <li>▪ The administering authority may approve a resource, or a stated type of resource, for subsection (1) if it considers the resource, or type of resource, has a beneficial use other than disposal.</li> </ul> |

---

**Waste Avoidance and Resource Productivity Strategy (WARP)**

Outlines opportunities and challenges for Queensland residents to improve performance in waste avoidance and recovery.

**Waste Reduction/ Prevention**

Reducing and/or preventing waste from occurring in the first instance. This includes behaviour change so that residents make informed decisions to avoid waste for example smart shopping to reduce packaging, plastic bags.

**Waste Reduction and Recycling Plan (WRRP)**

This Waste Reduction and Recycling Plan. A framework of guiding principles and objectives to underpin action plans for managing waste in the region.