



DEVELOPING CRITERIA TO ASSESS AND COMPARE WASTE TECHNOLOGIES FOR PERTH AND PEEL

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Waste and Recycling Infrastructure Plan for the Perth metropolitan and Peel regions


Aim of the Plan:

- Assist in achieving the targets of the Waste Strategy.
- Plan for the waste management infrastructure required to meet the needs of the Perth and Peel '3.5 million city'.
- Set out the planning, governance and funding instruments needed to establish this infrastructure.



Strategic Waste Infrastructure Planning Working Group (SWIPWG)

- A committee set up (under Section 18 of the WARR Act 2007) to assist with the development of the *Waste and Recycling Plan for the Perth Metropolitan and Peel regions*.
- SWIPWG membership: Waste Authority, DEC, WMAA, WALGA, FORC, Dept. of Planning, Water Corporation, CCI.
- SWIPWG established in late 2012, met in February, March and May 2013.



Four main elements of the *Waste and Recycling Plan for the Perth metropolitan and Peel regions*:

1. Planning and Approvals
2. Facilities and Sites
3. Technology
4. Governance and Funding




Waste Management Facilities and Technology:

- Provide information and recommendations on suitable waste management facilities and technologies for the Perth metropolitan and Peel regions.
- Assess their potential contribution to achieving the targets of the Waste Strategy.




Types of Waste Facilities/Technologies considered:

- Drop-off facilities
- Transfer stations
- Landfills (putrescible and inert)
- Materials Recovery Facilities (MRFs) – ‘clean’ and ‘dirty’
- Alternative Waste Treatment (AWT) – mechanical biological treatment and waste to energy
- Construction and demolition materials recycling
- Composting facilities
- Other recycling facilities




Criteria for assessing and comparing waste facilities/technologies:


1. Ability to contribute to the achievement of the Waste Strategy landfill diversion targets
2. Readiness
3. Reliability
4. Capacity
5. Flexibility
6. Environmental performance
7. Siting requirements and suitability within the region
8. Cost



Criteria for assessing and comparing waste facilities/technologies:

- A. Ability to contribute to the achievement of the Waste Strategy landfill diversion targets: capacity to divert waste from landfill.
- B. Readiness: lead time required (approvals, construction, commissioning); commercially operational within 10 years.
- C. Reliability: technology has operated successfully in pilot (demonstration) and/or commercial facilities; likely downtime.

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- D. **Capacity:** annual throughput (tonnes), outputs and residues; consideration of economies of scale and ability to service the ‘3.5 million city’.
 - E. **Flexibility:** ability to accommodate a range of types and capacities of feedstock.
 - F. **Environmental performance:** meets (or exceeds) WA regulatory requirements; position in waste hierarchy; broader environmental implications e.g. carbon footprint, water and energy use.

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- G. Siting requirements and suitability within the region:** e.g. footprint, buffers, amenity issues (e.g. odour), transport requirements; potential use of site post-closure.

 - H. Cost:** capital, operational and maintenance costs; potential to generate income (e.g. through sale of outputs).



Seeking input today:

- Comments/feedback on the scope of the criteria.
- Are there any additional criteria that need to be considered?

Can email comments/feedback to:

SWIPWG@dec.wa.gov.au