

WHAT IS REQUIRED?

Support from the State Government to develop a Waste Innovation Precinct within the Neerabup Industrial Area (NIA) through:

- Recognise NIA within both the Waste Avoidance and Resource Recovery Strategy 2030 and the proposed State Waste Infrastructure Plan
- \$250,000 to undertake a feasibility study in conjunction with the State Government on the establishment of a Waste Innovation Precinct for the northern corridor of Perth

Support and funding from the Federal and State Government to assist business locate and develop waste and energy generating industries with the NIA.

BACKGROUND

The development of a waste resource recovery precinct within the Neerabup Industrial Estate provides potential opportunity for the City and its partners to manage the resources present within residents' waste materials. This would mean that waste would be managed in a more environmentally sustainable manner aligned to the State Waste Avoidance and Resource Recovery Strategy 2030 Action Plan.

The WA Strategy has three main themes of Avoid, Recover and Protect. The precinct will meet the recover and protect objectives with the City taking action through its Waste Education Plan 2018 to support the community to avoid generating waste. The City has seen a waste reduction of greater than 10% in the generation of waste per capita meeting the 2025 target for the Plan early.

Such a waste precinct is essential if the State is to reach the target set in the WA Strategy of no more than 15% of Perth Peel generated waste to go to landfill. There are currently no resource recovery facilities of the required type in the northern growth corridor of the Perth Metropolitan area (refer map above) For example, the Cities of Wanneroo, Swan and Joondalup despite extensive procurement actions have been unable to source a viable organics recycling facility.

For the three LG's to meet the State's Waste Recovery target of 70% by 2025 and 75% by 2030 they require access to facilities that use proven technologies that maximise the recovery of valuable resources within waste materials. To do this, private sector investment and engagement is crucial along with research and innovation driven development working with the LG who control the waste collection inputs.

In August 2020, the WA Auditor General released a report on Waste Management Service delivery, which stated:

“Given recent international export bans on recyclable materials, the planning and development of local recycling facilities within the state is becoming increasingly urgent to help provide certainty to stakeholders, create opportunities for local recycling industries, and protect our local environments and public health.



I encourage all LG entities to consider findings in this report. Making a concerted effort to use available practices to avoid and recover more waste is the key to continuing to improve the State's waste and recycling performance."

Source: Western Australia's Auditor General Report August 2020. Waste Management Service Delivery.

Through currently available waste management options, the City of Wanneroo is required to dispose of approximately 50% of its waste to Mindarie Regional Councils' (MRC) Tamala Park Landfill, which is located within the City's boundary. This landfill has a remaining operational lifespan of approximately 8 years.

The feasibility study must also assess whether such a waste precinct as Neerabup would be seen as a 'significant development' under the new Part 17 of the Planning and Development Act 2005. The report highlighted that the City's residents are forecast to produce 30,000tpa of comingled recyclables, 95,000tpa of general waste and over 5,000tpa of green waste by 2041.

Source: Approvals Review - Waste Infrastructure, 11 August 2020. Encycle Consulting Perth WA

KEY ISSUES

- Growing population resulting in growing volumes of waste
- Current waste management expected to reach capacity in about 8 years
- Current waste management practice of landfill is unsustainable
- Fundamental changes occurring to the way waste is collected, sorted and processed creating large commercial opportunities to use waste as a resource
- Loss of recoverable commercial opportunities including organics
- Potential to work with neighbouring Councils
- Ability to develop a waste to energy plant for all non-recoverable materials post recycling processes
- Ability to expand biomass collection from large agricultural industries based in the City and in Mid-West region

- Need to design a waste process based on circular economic principles in line with international best practice
- Potential for job creation. Infrastructure WA (IWA) has identified waste as a key development sector for the State stating that recycling creates 9.2FTE jobs per 10,000 tonnes of waste versus only 2.8 jobs for landfill
- The need for local governments to prepare for the impacts of the waste export ban introduced through the Council of Australian Governments, which will see waste plastic, paper, glass and tyres banned if they are not processed into value added materials

CURRENT PROJECT STATUS

This project is in the early stages of planning. The City commissioned a study of three sites in August 2020 and Neerabup Industrial Area was the preferred location for a waste innovation precinct. In 2020, the State Government announced Neerabup as the location for the Australian Automation and Robotics Precinct creating the potential for joint research and new applications.

EXPECTED PROJECT COSTS

The expected project costs will be determined once the feasibility study is finalised.

It is anticipated that this precinct will be a state or regional facility with both public and private investment including the potential for co-location of complementary commercial operations, involving neighbouring local governments.

FUNDING STATUS

No funding has been allocated to this project to date.

AMOUNT NEEDED

Initially \$250,000 is required to undertake a feasibility study.

FURTHER INFORMATION

For further information on this project contact:
connectwanneroo@wanneroo.wa.gov.au