

# Discover somewhere amazing

## The Western Treatment Plant

Just 40 minutes from the centre of Melbourne you will discover one of Victoria's most unlikely hidden treasures.

The Western Treatment Plant is an extraordinary place. Here, sewage treatment, agriculture and biodiversity meet resource recovery, education and ecotourism.

In the early days of Melbourne, 'Marvellous Smellbourne' had a serious public health problem. Sewage ran through open channels into the rivers and the bay, and diseases like cholera and typhoid were rife.

The 1888 Royal Commission demanded an ambitious solution. Construction commenced in 1892 and by 1897 the first homes were connected to what was then known as the Metropolitan Farm in Werribee.

Now known as the Western Treatment Plant, the sewerage system dramatically improved Melbourne's health and liveability.

The Western Treatment Plant keeps evolving. As our population and sewage flows grow, we now treat more than 182,500 million litres of sewage a year.



Melbourne Water acknowledges the Wadawurrung People as the traditional custodians of the land occupied by the Western Treatment Plant. We pay our respects to the local people and to their Elders; past, present and future.



## A world-class example of sustainability

While our primary purpose is to provide low-cost sewage treatment for Melbourne, the Western Treatment Plant generates its own electricity and produces billions of litres of recycled water every year. We harvest biogas and reuse biosolids, turning waste streams into valuable resources to support incredible biodiversity and food production.



## Internationally recognised environmental values

The site's environmental values are of local, regional, national and international significance.

With its permanent and internationally protected Ramsar wetlands from a reliable year-round source of water and nutrients – the Western Treatment Plant is an important refuge for waterfowl. This is one of Australia's premier birding sites, attracting birdwatching visitors from around Australia and the world.

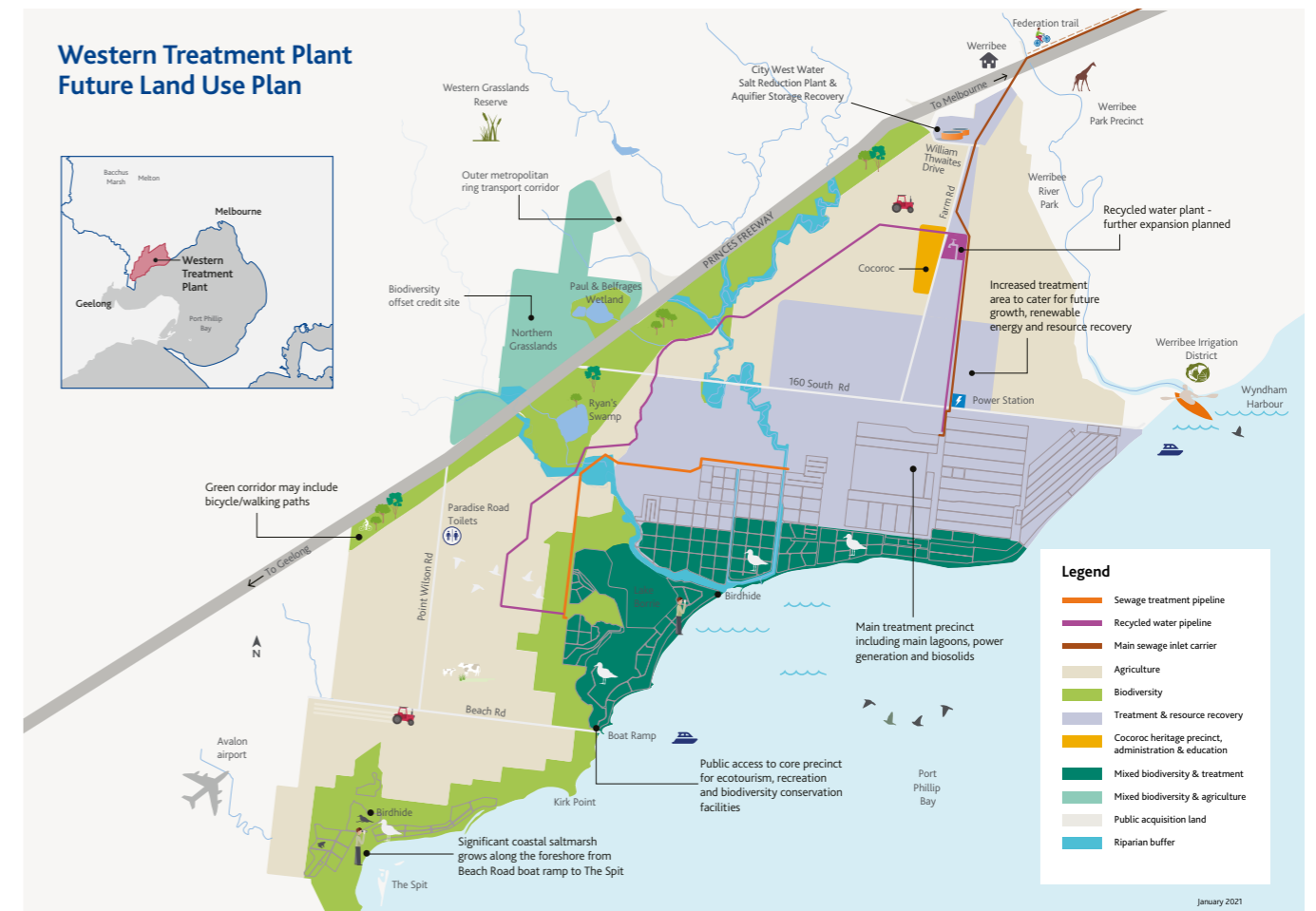
More than 300 bird species have been recorded at the plant, including migratory shorebirds some of which fly an incredible 12,000 kilometres to visit us each year from Siberia.

With its unique habitat, the Western Treatment Plant is also home to some of the most rare frog and bird species in the world – some of which are critically endangered, like the orange-bellied parrot and the growling grass frog.



## Contributing to Melbourne's world-renowned liveability

The Western Treatment Plant is an asset of state significance that provides essential services to Melbourne. It contributes to the wonderful liveability of greater Melbourne, not only by treating sewage safely for public health, and providing a refuge for wildlife, but by protecting the health of our waterways and Port Phillip Bay.



## Resource recovery – turning waste into valuable resources

Resource recovery is an important part of what we do:

### Producing recycled water

Each year the Western Treatment Plant produces 40 billion litres of recycled water.

We use some of this water for agriculture on our own site, some to maintain the wetlands, and some is used for the Werribee South Irrigation District – Melbourne's Food Bowl.

In a changing climate that is becoming hotter and drier, it is going to be increasingly important to have recycled water available for the environment.

### Reusing biosolids

We have an active program of re-using biosolids, the solid organic material created as a result of the sewage treatment process, and are investigating further ways to do this.

With a world-leading program of research and trials, our treatment processes are constantly evolving. We are always actively nurturing less energy intensive processes and more renewable energy opportunities such as solar and hydrogen.

The Western Treatment Plant is a vital part of the circular economy – turning waste into resources, helping to reuse what might otherwise be thrown away.

### Harvesting biogas

We have been harnessing biogas (methane) from the sewage treatment process for more than 25 years to power our own plant and we have also been able to export power to the Victorian grid. By converting biogas to electricity, the treatment plant is nearly energy self-sufficient.

We have successfully completed trials in digesting organic liquid waste, such as food waste, together with sewage to generate more biogas. This fantastic program reduces waste to landfill and increases our renewable energy production.

## Rich cultural heritage



For thousands of years the Wadawurrung People, the Traditional Custodians, lived on this land making it an important place of Indigenous spiritual significance. We continue to work with our Indigenous partners to include cultural land management practices, cultural heritage management, values and history in all activities at the Western Treatment Plant.

The historic township site of Cocoroc (meaning 'frog' in traditional language) housed the sewage farm workers from the 1890s to the 1970s, with a population peak of over 500. Parts of the township are still standing, including the heritage listed water tower. Cocoroc is, once more, becoming a central hub with our new operations, administration and education facilities now based there.

## A great place to visit

This is a fascinating place to visit, learn, and connect with nature, history and sustainability. As well as visitors passionate about birdwatching, thousands of people visit each year through our education programs and tours, learning about the urban water cycle.

Visitors can now also learn about and explore the Western Treatment Plant online, through self-guided and guided virtual tours. From the comfort of home or the classroom, you can explore amazing 360-degree views, videos and fun facts about the sewage treatment process and the biodiversity and heritage values of this iconic site.



Scan the QR code to take a virtual tour of the site.

## Agricultural values



Agriculture is still just as important to the Western Treatment Plant today as it was in the 1890s when sheep and cattle were first brought in to graze the pastures irrigated with sewage.

The farmland provides a 'green break' between urbanisation and sites of biodiversity significance, and has natural synergies with the treatment operations and land management responsibilities applying to the site.

## Planning for the future



Melbourne's population is growing and the amount of sewage that we need to process could almost double by 2050. There is a huge opportunity to increase our contribution to the circular economy, through innovative initiatives such as food organic waste co-digestion, which diverts food waste from landfill, and improves our resource recovery, through increased biogas production.

At Melbourne Water, we are always looking to the future and investigating the best ways to provide low-cost, energy and carbon-neutral, sustainable sewage treatment. This is part of our ambitious target to halve our carbon emissions by 2025, achieve net zero emissions by 2030 and address the challenges of climate change head on.

We are busy building on the plant's potential for recreation and education, including opportunities for the community to access open space, connect with nature and learn.

We are excited that there will be more innovations to come, and will actively pursue collaborations and partnerships to improve the wonderful liveability of greater Melbourne. Together we are conserving heritage, enriching the plant's biodiversity, and making sure we preserve this gem of the west.