



Waterways Local Update 2016-17

Melbourne Water's work to improve waterways and provide flood protection in the **City of Banyule**.



REDUCED
THE RISK OF FLOODING



29.7 km
WEED CONTROL
ALONG WATERWAYS



THREE
ENVIRONMENTAL
FLOWS TO YARRA RIVER

Melbourne Water makes a vital contribution to the famous Melbourne lifestyle by underpinning human health, enhancing community well-being, supporting economic growth and balancing the natural and man-made environment.

Together with our partners, we look after 8,400 km of rivers and creeks, 428 wetland treatment systems and more than 1,400 km of regional drainage systems in the Port Phillip and Westernport region. This work is funded by the Waterways and Drainage Charge, which is paid by property owners and collected by retail water companies on our behalf.

Melbourne Water cares for many waterways. Some in your local area include:

- Yarra River
- Plenty River
- Darebin Creek

Healthy waterways

Maintenance and new projects

Each year we create and maintain healthy waterways by removing litter, debris and excess sediment. We remove and spray weeds, cut grass and plant native trees and shrubs.

What we have done

Why

1 km Revegetation

We plant native trees and shrubs along waterways to provide habitat for birds and animals. Revegetating waterways and replacing weeds with native plants prevents erosion and improves water quality.

29.7 km Weed control

Introduced and noxious weeds can choke waterways and take over from plants that provide healthy habitats for birds and animals.

46.25 m³ Sediment, silt, litter, debris removal

Silt, sediment, litter and debris is removed for drainage and flood protection, and to prevent pollution building up in our waterways and wetlands. An excess of these can impact the habitat for platypus, fish and other animals, as well as native plants.

Partnered with the Rosanna Golf Club to identify revegetation and branch clearing opportunities

Managing vegetation and clearing branches improves the Plenty River and opens views along it.

Participated in the Plenty River Forum

Presenting at the Forum allows for discussions to continue on issues and opportunities affecting the Plenty River.

Stormwater

We work closely with Council and local communities to better manage stormwater to protect the environment, provide alternative water sources and improve the stormwater that flows into local waterways.

What we have done

Why

Living Rivers provided funding to investigate stormwater management measures for Gresswell Forest Nature Conservation Reserve

The study will develop a sustainable stormwater management plan to prevent further degradation and support the ecology of the reserve.

Through the Clearwater program, we supported Council to take a whole-of-water approach by providing a wide range of tools and resources, and opportunities to participate in a variety of activities

This work helps to improve skills, increase knowledge and foster better networks across councils to change the way we manage water for healthy, connected communities.



Through our Living Rivers program, we worked with Council and contributed \$5,000 to projects that assist waterway health and create sustainable stormwater management solutions in your area.

Find out more at melbournewater.com.au/livingrivers

Environmental water

We work with government agencies, councils, industries, landowners and the community to provide the allocated water needed in rivers to maintain healthy natural ecosystems.

What we have done

Worked with the Victorian Environmental Water Holder to deliver three environmental flows to the Yarra River

Why

Releasing water from upstream storages mimics flows that would naturally be there if the river wasn't dammed. This improves water quality and habitat for native wildlife.

Worked with Council, Parks Victoria and the Victorian Environmental Water Holder to provide water to the Banyule Billabong

Studying the billabong to understand the water it needs to be healthy allows us to monitor the ecological response and develop long-term plans for the billabong.

Monitoring and research

We regularly undertake extensive monitoring, investigations and research to help us better understand how we can improve local waterways.

What we have done

Undertook monthly monitoring of water quality at two sites within your area. These tests measure:

- water temperature
- dissolved oxygen
- salinity (conductivity)
- pH level
- nutrients (nitrate, nitrite, ammonia, Kjeldahl nitrogen, soluble reactive phosphorus and total phosphorus)
- indicators of faecal contamination (*E. coli*)
- metals (arsenic, cadmium, chromium, copper, lead, nickel and zinc)

Why

Our water quality monitoring program is designed to assess broad-scale, long-term trends in water quality (typically over 8 -10 years). We use this data to help identify pollution sources and inform the community about local water quality.

Undertook fish surveys at Diamond Creek

The surveys helped evaluate the benefits of new vertical-slot fishways installed in 2012 and complemented another monitoring program on fishway performance.

Monitored sediment at Mullum Mullum Creek

This monitoring improves our knowledge of contaminants and guides our management of the waterways.



Planning for future development

We plan for future development to ensure growing communities do not threaten local waterways. We provide advice and assist new developments to ensure they do not increase flood risk.

What we have done

Why

97 referrals for land subdivisions reviewed

To ensure proposed land subdivisions meet current standards for drainage and stormwater quality.

75 development applications reviewed

To ensure that growing communities don't contribute to an increase in flood risk.

89 flood information requests reviewed

To provide flood information to property owners and people interested in purchasing or redeveloping property.

17 applications for works near Melbourne Water assets and works such as bridges, shared pathways and jetties reviewed

To ensure waterways, and the plants and animals that live there, are protected from the potential impacts of building works.

6 stormwater connection applications reviewed

To ensure waterways and the plants and animals that live there, are protected from the potential impacts of construction works.

Flood protection

While floods are natural and we can't stop them all from occurring, we aim to minimise the damage they cause to people, places and communities.

We manage the regional drainage system and work with Council, the Victorian State Emergency Service, the Bureau of Meteorology, property owners and developers to make sure flood information is up to date. We provide flood warning services, prepare flood response plans, and identify and construct new flood protection projects in areas with the greatest need.

What we have done

Why

Completed flood mapping of Arthurs Creek at Strathewen and Kinglake West, and worked with Council to validate models of flood mapping across the Banyule area

Updating our knowledge of flooding assists us to better manage drains and assess flood risk with planning scheme overlays.

Repaired the Plenty River weir at Viewbank

This work helped restore monitoring to better manage flooding.

Partnered with Council to investigate flooding in Salt Creek

Working with Council helps identify stormwater quality and flood management opportunities to better manage flooding.

Continued collecting hydrological data

Data is used to analyse flood warning during emergency situations, as well as for such things as development referrals and projects to reduce the risk of flood.



10 volunteers in your area provide us with rainfall data by recording information from a rain gauge in their backyard. These figures and the data from our automated gauges provides us with valuable rainfall information.

Find out more at melbournewater.com.au/communityrainreaders

Working with the community

The involvement of community groups, volunteers, land managers and farmers supports our management of local waterways and regional drainage systems. If you'd like more information about funding opportunities, please call 131 722 or email river.health@melbournewater.com.au

Funding provided	Grant	For
\$10,666	Stream Frontage Management	Private land owners and managers for works that protect or enhance riverbanks, such as weed control, fencing and planting native trees.
\$1,536	Community Grants	Volunteer and community groups for works that protect or enhance riverbanks on public land, raise awareness, and provide training and education to protect local waterways.

We also worked with the local community on several events and initiatives throughout the year.

Who we worked with

Banyule Bush Crew
Friends of Wilson's Reserve

What we did

Provided support for monitoring water quality through the Water Quality Monitoring program.



Our Space Your Space is an app that helps you find land managed by Melbourne Water that you can use for community projects, such as community gardens. We encourage communities to apply to use the land.

Find out more at melbournewater.com.au/ourspaceyourplace or call 131 722.



Waterwatch is a citizen science program that encourages communities to monitor platypus, frogs, waterbugs and water quality in their local river or creeks. We empower our volunteers to collect data, protect the waterways environment and share their knowledge.

Find out more at melbournewater.com.au/waterwatch or call 131 722.

