The Werribee river rises in the Central Highlands of Victoria, between Ballarat and Mt Macedon. It flows southeast through steep gorges to the town of Bacchus Marsh. From there it continues through the basalt plains west of Melbourne to enter Port Phillip Bay at Werribee South.

The upper reaches provide habitat for native fish such as River Blackfish and Mountain Galaxias. The lower reaches in and around Werribee are home to a regionally significant platypus population and the estuary and lower freshwater reaches support a healthy recreational fishery, including species such as Estuary Perch and Black Bream.

Three major reservoirs have been constructed on the Werribee River and its tributaries to supply water to the towns of Bacchus Marsh and Melton and irrigators at Bacchus Marsh and Werribee.

In 2011, the Werribee River Environmental Entitlement was granted. This is a right to release water from the reservoirs to help keep the Werribee river system healthy. This release of water is known as an environmental flow.

Melbourne Water work’s with the Victorian Environmental Water Holder to manage this environmental water. We only make small or medium sized releases, and will not create flood events.

So how do we know what water the animals and plants need to stay healthy?

For example, the lower reaches of the river often require pulses of flow in summer to improve water quality that supports the aquatic food web.

So how do we plan to use the water?

Melbourne Water plans and manages the use of environmental water working with the Victorian Environmental Water Holder, The recently developed Werribee River Environmental Water Management Plan lays out strategic direction for the use of the entitlement.

The Victorian Environmental Water Holder (or view) holds and manages a set volume of environmental water that is used to improve the health of rivers and wetlands across the State, including the Werribee River.

We use social media, community bulletins and our webpage to communicate our releases.

We generally release water from Merrimu reservoir into Pyrites Creek in Winter and Spring to support waterbugs and frogs. We hold this water in Melton reservoir until summer when we release it to improve water quality and to promote fish migration in the lower reaches.

The Werribee River has recently endured several years of below-average streamflow. Environmental water has been instrumental in helping aquatic life to cope with the dry conditions. Releases from Merrimu reservoir into Pyrites Creek have created a drought refuge for frogs, with more species and a greater number of animals than in nearby reaches that did not receive environmental flows. In the lower reaches around Werribee, summer freshes have flushed toxic blue-green algae from the river and raised dissolved oxygen levels.

A lateral rock ridge fishway has been installed between the freshwater and estuarine reaches to help fish migrate up and down stream. Monitoring shows that fish can now swim over this barrier at lower flow rates so we can extend our environmental flow releases to help the fish migrate.