



Water for a Healthy River

Have you ever enjoyed a cooling dip in the river on a hot summer's day? Ever "cast a line" or caught a few Christmas yabbies? In our modern lives it's easy to forget the importance of a healthy river for sustaining our lifestyles, businesses, and natural areas. That's why it's important for us to work together to restore and protect the river's health.



This factsheet forms part of the [My Healthy River Toolkit](#) which provides information to interested wetland owners, community people, and organisations about what environmental watering is and how you can help to improve the health of our river. The Toolkit is an initiative of [Nature Foundation SA's Water For Nature program](#).

Water For Nature brings people together to deliver environmental water

to protect and restore South Australian wetlands and floodplains for the benefit of nature, community wellbeing and local economies.

In 2012 Nature Foundation SA was the first non-government organisation to enter into an agreement with the Commonwealth Environmental Water Holder to deliver environmental water in South Australia. In addition, the program enjoys a collaborative relationship with the South Australian

government which has provided a number of small grants.

Between 2013-14 and 2016-17 the Water For Nature program has worked with 200 volunteers to deliver 6.22 gigalitres of environmental water to more than 80 wetland and floodplain sites (see the map below).

We hope this series of factsheets can help other local people to get involved in environmental watering projects.



A snapshot of some of the Water For Nature Riverland sites. Sites in orange text are now managed by Renmark Irrigation Trust. The numbers in brackets identify how many different sub-sites have been identified for environmental watering at each location.



What is environmental water?

Commonwealth environmental water is recovered by the Australian Government under the Basin Plan. The Murray-Darling Basin Authority's [publication](#), *Managing Water in the Murray-Darling Basin: Who Does What?* is available as a hard copy or downloadable booklet, and provides details about the recovery and management of environmental water.

Environmental water refers to:
“water used to improve the health of our rivers, floodplains and wetlands”

The River Murray – a short “water” history

Much of the River Murray catchment experiences dry summers and wet winters and springs. This means that the natural flows of the River would have varied dramatically across seasons and between years. As a result, the different plants and animals of the River Murray system have evolved to survive and prosper under these intermittent droughts and floods.

Regulation of the River over the past century and more has involved constructing weirs and dams and extracting water from the river for irrigation. Together with an altered climate, this has led to less variable flows, fewer and less expansive natural floods, and longer drought periods. Additional impacts such as from introduced animals like carp, and the impact of rising salinity and habitat removal, have all contributed to the decline of the River's health.

The allocation of environmental water along the River helps to mimic natural flows and so restore the balance of the natural system to create a healthy working river.



Photo: Matt Turner

Benefits of environmental watering

Some important benefits of environmental watering include:

- improving the health of native trees and other plants that need specific flooding and drying cycles to survive and thrive;
- providing important breeding, feeding and shelter habitats for native wildlife including native fish, and birds;
- encouraging nutrient cycling and soil and bank stabilisation through improved vegetation communities;
- ensuring opportunities for recreation and tourism, such as fishing, canoeing, swimming, and eco-tours;
- improving water quality for human consumption and agricultural use; and
- creating a healthy, living legacy for future generations.



Photo: Italo Vardaro, courtesy Murray River Walk



Photo: Sylvia Clarke



Photo: Matt Turner



Photo: Matt Turner



Photo: Natalie Stalenberg

Delivering environmental water

The physical delivery of environmental water to sites, and how often it is delivered, depends on:

- the site – what needs water (e.g. native trees, fish, frogs or water birds)?
- the recommended watering methodology – how much water is needed and when? and
- the site's watering history – did the wetland or floodplain get water in previous years (i.e. by natural flood or via environmental watering)?

For example...

Water For Nature may use irrigation sprinklers on the floodplain during spring and early summer to mimic the intensity and frequency of natural rainfall events, particularly where young seedlings and saplings occur.

Or...

Irrigation pumps may pump water from the river to inundate wetland sites where the natural flow from the river into the wetland has been cut-off.

We can loan equipment for delivering water and provide assistance and advice on how much and how often to water to get results.

Environmental watering works!

Watering sites run through the [Water For Nature](#) program have seen a range of successes, including:

- improved health of native trees where trees have shown improved canopy (more leaves) and increased numbers of flowers and buds;
- appearance and vigorous growth of native tree saplings; dead lignum on the floodplain turning green;
- increased diversity and abundance of native waterbirds, including some species of high conservation significance at State, national and international levels;
- appearance of other native animals, such as frogs and fishes; and
- indications of "freshwater lenses" under floodplains, which benefit native trees through decreasing salinity of ground-water.



Photo: Matt Turner

How do I get involved in Water For Nature?

The first step is to contact [Nature Foundation SA](#) (see our details below) and let us know you're interested! We can discuss with you the range of ways you can get involved, and help you choose an option that suits your lifestyle. Ways that you could help include:

- Monitoring tree health, frogs, birds, water quality, or water delivery through Water For Nature monitoring programs or Citizen Science programs;
- Moving equipment to pump water to a wetland/floodplain site; re-fuelling pumps and helping to maintain equipment;
- Letting us know about sites that need watering – is there one on your own property? On another private property? On Crown land?

Making a donation to Nature Foundation SA.

The [My Healthy River Toolkit](#):

The My Healthy River Toolkit comprises 6 factsheets and a short YouTube tutorial for each factsheet

Factsheet 1: Water for a Healthy River

Factsheet 2: Water for What, Where and How

Factsheet 3: Water for Healthy Trees

Factsheet 4: Water for Native Animals - Part 1

Factsheet 5: Water for Native Animals - Part 2

Factsheet 6: Water For Nature - Get Involved

To access these factsheets and tutorials, and keep up-to-date with Water For Nature's latest "watering" news and upcoming events, visit and follow the My Healthy River Toolkit Facebook page.

Other helpful contacts

Nature Foundation SA

(see the Water For Nature details below)

Commonwealth Environmental Water Office Local Engagement Officer

Michelle Campbell

(Based Berri, SA)

P: 08 8595 2120

E: Michelle.Campbell@environment.gov.au

South Australian Murray-Darling Basin (SAMDB) Natural Resources Management Board

Sylvia Clarke

(Project Officer Community)

P: 08 8391 7500

E: sylvia.clarke@sa.gov.au



Photo: Jenni Garden



Photo: Natalie Stalenberg



Photo: Anne Jensen

Further information

Anyone can help to deliver environmental water and improve nature along the River Murray...every drop counts! Are you concerned about the health of the River? Or do you want to register your interest in lending a "watering" hand?

CONTACT: Nature Foundation SA on 8340 2880, or email Natalie at natalie.stalenberg@nfsa.org.au

VISIT: the [My Healthy River Toolkit](#) Facebook page for all factsheets and tutorials.



Founded 1981 Nature Foundation SA
is a non-government organisation

Acknowledgements

This project is supported by the Department for Environment and Water through funding from the joint Australian and South Australian Government's [Riverine Recovery Project](#).



Australian Government



Government
of South Australia

Additional support provided by:



Australian Government

Commonwealth Environmental Water Office



The Ian Potter
Foundation