2014 Regional Snapshot

What is the ecological condition of rivers, streams and drains?

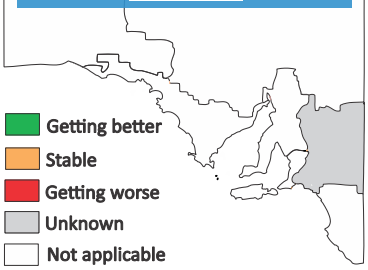
Our rivers, streams and drains provide water for agriculture and domestic use, habitats for native plants and animals, places for recreation and are culturally important for Aboriginal people.

Aquatic plants and animals function together as ecological communities and improve water quality in rivers, streams and drains. These ecosystems are impacted by nutrients, sediments and pollutants in agricultural runoff and wastewater discharges. Feral and domestic animals, which graze and trample vegetation, and reductions in flow, due to dams, weirs, droughts, consumptive use and weeds, also impact rivers, stream and drains.

In 2008 and 2010, the Environment Protection Authority assessed the condition of creeks, streams and drains in the South Australian Murray-Darling Basin NRM region based on water quality and the condition of invertebrate and plant communities. Assessments have been made at 55 sites, across the Lower Murray River catchment. This report card summarises the information by catchment basins.

This report does not include the condition of the River Murray, which is summarised in two separate report cards, one on water quality and another on ecological condition.

Trends in the ecological condition of rivers, streams and drains



State target

Improve the condition of terrestrial aquatic ecosystems

Trend (2008–10)	Unknown	Stream and drain condition was assessed in 2008 and 2010. A trend will be available in future versions of this report card.

Because most sites have only been assessed once, recent trends in river, stream and drain condition are not known (see map above). Future monitoring will determine trends in condition of our creeks, streams and drains.

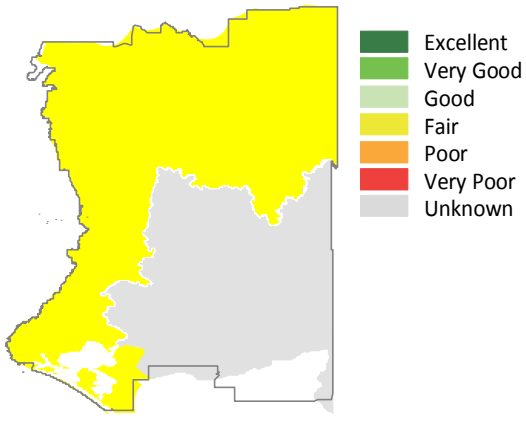
The Government of South Australia and the regional NRM board are investing in on ground works to improve the condition of rivers, streams and drains to improve water security and the condition of invertebrate and plant communities. Management efforts focus on controlling feral animals and weeds, working with land holders to reduce nutrient and sediment runoff and, where possible, restoring more natural flows.

Where we are at (2010)	Fair	Substantial investments are required over many years to improve water quality, and the condition of aquatic invertebrate and plant communities

Across the SA Murray-Darling Basin NRM region, the rivers, streams and drains associated with the Lower Murray River catchment are in fair condition (map on right). The creeks that have been assessed are in the eastern half of the catchment.

Rivers, streams and drains that are in poor condition typically have elevated levels of nutrients, salts and fine sediment as well as sparse vegetation and abundant weeds along their banks. Those that are in fair condition are distinguished by the presence of several rare, sensitive, and flow-dependent macroinvertebrates.

Our use of aquatic environments for economic and recreation purposes has affected their condition to an extent that threatens the features that make them so attractive and valuable. Water diversions and other impacts are at critical levels, and are intensified by periods of drought. It is crucial that we take steps to improve the condition of our rivers, streams and drains.



Reliability of information	★★★★☆	Very Good

Further information: Technical information for this report and EPA Aquatic Ecosystems Water Quality reports

This report is a work in progress. As resource monitoring improves, so too will our ability to describe trends in condition.

Government of South Australia