

SA River Murray Flow Report



Report #51/2023

Issued 12:00 pm 22 December 2023

This supersedes the previous Flow Report issued by the Department for Environment and Water (DEW) on 15 December 2023. The next Flow Report will be provided on Friday 29 December 2023.

Flow outlook



The flow at the South Australian border is approximately 7.5 GL/day and will remain around 7.5 GL/day over the coming week **depending on river operations**.

The current flow at the border comprises the full December Entitlement Flow (7 GL/day) plus water for the environment and interstate trade adjustments.

The flow over Lock 1 is approximately 9 GL/day and will decrease to around 7.5 GL/day over the coming week.

It is important to note that flow forecasts in this advice are based on the information available at the time of preparation. Advice may change as new gauging information becomes available or due to rainfall events or changed operations upstream.

Water levels

Current water levels are updated daily and can be found at the following link: <https://www.waterconnect.sa.gov.au/River-Murray/SitePages/Daily.aspx>

Upstream flows

The Department for Environment and Water is monitoring river levels in Victoria and New South Wales following rain over recent weeks, however, with the dry conditions before the rain fell, it seems likely that the runoff created will be used within the system for consumptive demands or captured in storage and will not result in any significant increases to the flow at the South Australian border.

The Murray-Darling Basin Authority is also providing the department with updated on dam operations and river flows interstate.

More information on upstream conditions and forecasts can be found in the Murray-Darling Basin Authority's *Weekly Flow Report* here: <https://www.mdba.gov.au/water-management/regular-reports-murray-data-storages/weekly-reports>

Murray Mouth

Dredging operations at the Murray Mouth continue after resuming on 27 November 2023 after a break of just over a year due to high flows scouring sand out of the mouth. Dredging is undertaken to maintain connectivity (exchange of water) between the Coorong and the Southern Ocean.

Barrage releases, combined with dredging, help to maintain flow connectivity of the River Murray Channel to the Murray Mouth and assists in exporting salt from the river system.

Exclusion Zones established around the dredging operations are in place to ensure public safety. Refer to [Notice to Mariners No 61 of 2023](#).

Barrage operations and water levels in the Lower Lakes

The water level in Lake Alexandrina is approximately 0.77 m AHD and Lake Albert is approximately 0.62 m AHD. The difference is due to wind effects.

The Lower Lakes were being managed to target a daily average lake level between 0.7 m AHD to 0.8 m AHD during December 2023, however, as higher volumes of flow from the River Murray (due to water for the environment) have lasted longer than originally expected, the Lower Lakes can now be surcharged to approximately 0.85 m AHD through until late December 2023. This will put the Lakes in a better position to continue releasing fresh water to the Coorong through summer and protect water level in the Lower Lakes in autumn 2024.

During adverse weather conditions, SA Water will operate the barrages to minimise the risk of seawater entering Lake Alexandrina, therefore minimising any negative salinity impacts from reverse flow events.

Gate openings at the barrages can now be viewed on Water Data SA here:

<https://water.data.sa.gov.au/Data/Dashboard/75>

Total daily flow releases from the barrages can also be found on Water Data SA here:

<https://water.data.sa.gov.au/Data/Dashboard/1>

River Murray River Vessel Waste Disposal Stations

The Lock 3 River Vessel Waste Disposal Station has been out of commission since January 2020 due to a significant infrastructure failure. The nearest alternative waste facility is located at Waikerie. Normal boat waste (domestic or galley waste) can still be deposited at the Lock 3 facility at the present time.

Please be advised that a log/snag has fallen in front of the Morgan River Vessel Waste Disposal Station (RVWDS) following the recent flood. RVWDS operators are urged to exercise caution when approaching the station. Our department is actively assessing the situation, and measures will be taken to remove the log as soon as possible. Your cooperation and patience during this process are greatly appreciated for the safety and efficiency of waste disposal operations.

You can report any River Vessel Waste Disposal Station issues on 1800 799 065.

If you have any questions or need further assistance, please contact the DEW Engagement Team on

DEW.WIOCommunications@sa.gov.au

Lower Murray Reclaimed Irrigation Area Levee embankments

Field inspections of the levees continue with reinforcement of levee stabilisation works, where required, being prioritised. Dewatering is entering its final stages of completion.

All government-owned levee banks along the Lower Murray from Mannum to Wellington remain closed to public access until further notice. Recreational activities along the levee banks, such as walking, cycling and fishing are not allowed while flood recovery works are being undertaken and until full condition assessments completed.

The government-owned levee banks are Cowirra, Neeta, Wall Flat, Pompoota, Mypolonga, Mobilong, Burdett, Long Flat, Monteith and Jervis.

Privately-owned levees along the Lower Murray are managed and maintained by private landowners and access to their levee banks is at their discretion. However, access to private levee banks where the department is undertaking flood recovery work is not permitted.

If you have queries about levee stabilisation works or would like to discuss your particular circumstances, please contact DEW through the following channels:

Birgitte Sorensen, Manager, Levee Recovery on 8463 6942 or [Birgitte.sorensen@sa.gov.au](mailto:birgitte.sorensen@sa.gov.au)

Lisa van der Linde, Communications and Engagement Officer on 0437 313 087 or Lisa.vanderlinde@sa.gov.au

Questions related to dewatering and recovery of agricultural areas can be directed to the PIRSA Recovery Hotline on 1800 931 314.

More information on the LMRIA levee stabilisation works can be found on the DEW website at

<https://www.environment.sa.gov.au/topics/river-murray-floods/lower-murray-levee-banks>.

Weir pool lowering in 2023-24

Small scale weir pool manipulations at Locks 1 to 6 have concluded with all weir pools now being maintained at normal pool levels.

These actions supported the partial drying of the margins of the river channel and connected wetlands promoting cycling of carbon and nutrients, improved productivity, and improving flowing conditions in the River Murray Channel that provide benefits for River Murray native fish and invertebrates.

Planning for weir pool raising and lowering events in 2024 will commence in Autumn next year and updates will be provided in the weekly Flow Report as planning progresses.

If you have any questions about the Weir Pool Manipulation program, please email DEW.WIOcommunications@sa.gov.au

Environmental news – 20th Anniversary of The Living Murray

In 2003, in response to the declining ecological state of the River Murray, The Living Murray (TLM) program was born. Recently, water managers, scientists and Traditional Owners from across the Murray-Darling Basin gathered to celebrate the 20-year anniversary of The Living Murray with the theme 'much achieved, much to do'.

The program is a collaboration between the Australian government, the Basin states and First Nations, coordinated by the Murray-Darling Basin Authority (MDBA) with the aim to restore and sustain the 6 icon sites of our river system:

- Barmah-Millewa Forest
- Gunbower-Koondrook-Perricoota Forests
- Hattah Lakes
- Chowilla Floodplains and Lindsay-Wallpolla-Mulcra Islands
- Lower Lakes, Coorong and Murray Mouth
- The River Murray Channel

Over the past 20 years, the health of the River Murray icon sites has improved through the operation of infrastructure, the recovery and delivery of almost 500 GL of water for the environment, and improved river management. The program is supported by Traditional Owner, community and scientific engagement. The robust ecological monitoring program demonstrates the success of the program and informs water planning and delivery. The Living Murray was an important precursor to the Basin Plan and has laid a strong foundation for the restoration of the Basin's wetlands, floodplains and rivers.

To learn more about TLM visit: <https://www.mdba.gov.au/climate-and-river-health/water-environment/living-murray>



Photo 1: Lower Lakes, Coorong and Murray Mouth (South Australia).



Photo 2: Barmah-Millewa Forest.



Photo 3: River Murray Channel (running from near Albury to the sea).



Photo 4: Gunbower-Koondrook-Perricoota Forest.



Photo 5: Hattah Lakes (between Robinvale and Mildura).

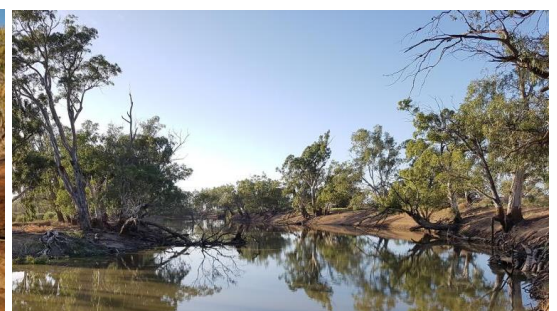


Photo 6: Chowilla Floodplain (South Australia) and Lindsay-Wallpolla Islands.

Water quality

Algal blooms

A number of current alerts for blue-green algae have been issued by upstream authorities. They include:

- Murray River at Buronga (**Amber alert**)
- Murray River at Curlwaa (**Amber alert**)
- Murray River at Fort Courage (**Amber alert**)
- Murray River at Lock 8 (**Amber alert**)
- Darling River at Pomona Boat Ramp (**Amber alert**)
- Darling River at Ellerslie (**Amber alert**)
- Darling River at Burtundy (**Amber alert**)
- Darling River at Tolarno (**Amber alert**)
- Darling River at Menindee Weir 32 (**Amber alert**)
- Great Darling Anabranh at Silver City Highway (**Red alert**)

While no algal blooms are currently present within South Australia, people are advised to avoid contact with any obviously green water or scums if they are encountered as they may cause skin irritations in some people.

South Australian authorities closely monitor the situation upstream and SA Water increases sampling whenever a water quality event is detected to allow for timely action. SA Water, SA Health and DEW monitor the occurrence of blue-green algal blooms in South Australia. SA Water uses the water quality data to continually adjust operations to minimise impacts to water treatment plants and other users located along the River Murray.

Water quality alerts in South Australia can be found on the SA Health website:

<https://www.sahealth.sa.gov.au/wps/wcm/connect/public+content/sa+health+internet/public+health/water+quality/water+quality+alerts>

More information on current alerts upstream can be found on the WaterNSW website here:

<https://www.watersw.com.au/water-services/water-quality/algae-alerts>

Salinity

Salinity levels throughout the River Murray in South Australia have returned to their typical range following elevated levels experienced during the flood recession.

Nonetheless, it is possible that some irrigators may record higher salinity readings at isolated locations. These higher readings are more likely to be observed at the bottom of the water column.

Irrigators are encouraged to monitor the [daily salinity levels](#) provided by SA Water as part of their business operations.

PIRSA has provided salinity management advice for irrigators on its website:

https://www.pir.sa.gov.au/emergencies_and_recovery/storms_and_floods/river_murray_flood_2022

Further information

River Murray high flows	https://www.environment.sa.gov.au/topics/river-murray-flows
2022-23 River Murray Flood event	https://www.environment.sa.gov.au/topics/river-murray-floods
2022-23 River Murray Flood recovery	https://www.recovery.sa.gov.au/active-recoveries/river-murray-flood https://pir.sa.gov.au/emergencies-and-recovery/storms-and-floods/river-murray-flood-2022
Water quality alerts in SA	https://www.sahealth.sa.gov.au/wps/wcm/connect/public+content/sa+health+internet/public+health/water+quality/water+quality+alerts
NSW fish deaths	https://www.dpi.nsw.gov.au/fishing/habitat/threats/fish-kills
NSW algal alerts	https://www.waternsw.com.au/water-services/water-quality/algae-alerts
Real-time water data at sites in SA	https://water.data.sa.gov.au/
Current daily water levels	https://www.waterconnect.sa.gov.au/River-Murray/SitePages/Daily.aspx
Daily flow and level information at key SA Water sites on the River Murray	https://www.sawater.com.au/water-and-the-environment/south-australias-water-sources/river-sources/river-reports-daily-flow
Daily salinity information in SA	https://www.sawater.com.au/water-and-the-environment/south-australias-water-sources/river-sources/river-reports-daily-salinity
Real time information throughout the River Murray system	https://riverdata.mdba.gov.au/system-view
Whole River Murray System updates	https://www.mdba.gov.au/water-management/regular-reports-murray-data-storages/weekly-reports
Flows in the River Murray System including water for the environment	https://www.mdba.gov.au/news-and-events/newsroom?news%5B0%5D=media-type%3ARiver%20Murray%20flows
Marine safety in SA	https://marinesafety.sa.gov.au/
Victorian rainfall and river conditions	http://www.bom.gov.au/vic/flood/index.shtml
NSW rainfall and river conditions	http://www.bom.gov.au/nsw/flood/
SA rainfall and river conditions	http://www.bom.gov.au/sa/flood/index.shtml?ref=hdr
Climate outlooks	http://www.bom.gov.au/climate/ahead/outlooks/
Climate drivers	http://www.bom.gov.au/climate/enso/

ID	RM-Flow-Report_2023 12 22
Classification	Public I2 A2
Issued	22 December 2023
Authority	DEW
Master Document Location	R:\Water Group\RMO\WRO\04 Communications\Flow Advices\2023-24
Managed and Maintained by	Water Infrastructure and Operations Branch
Author	Water Infrastructure and Operations Branch
Reviewer	A/Director, Water Infrastructure and Operations