

13 April 2018

Lachlan Valley

Water availability and allocation update

Allocations

The Lachlan regulated river general security allocation **remains unchanged at 2 per cent of entitlement** for the 2017-18 water-year.

Wyangala Dam received just 2,800 megalitres (ML) of inflow in March 2018, the majority of which arrived early in the month. The storage level has decreased by 4 per cent since the last assessment.

A combined dam and tributary inflow volume of over 39,000 ML will be required in April before a further allocation can be made in May. Very dry conditions have produced inflows of less than 200 ML so far in April 2018.

General security water users are advised that the **Annual Use Limit** that will apply in the 2018/19 water year will be a volume equivalent to **100 per cent of entitlement**, plus any adjustments up or down for trade.

	High Security	General Security	Average Carryover
Lachlan valley	100%	2%	108%

Dam levels (as at 12 April 2018)

- Wyangala Dam is 67 per cent full – falling – holding 819,000 ML.
- Lake Cargelligo is 54 per cent full – falling – holding 22,700 ML.
- Lake Brewster is now effectively empty.

Seasonal climate outlook

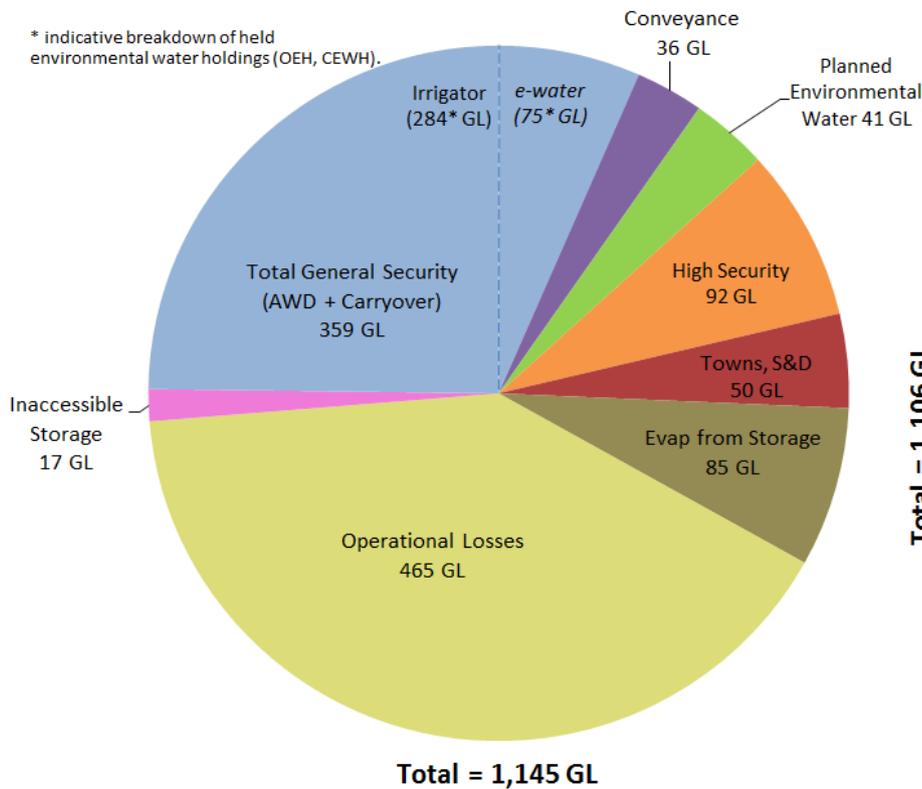
The Bureau of Meteorology is expecting an even chance of exceeding median rainfall over the catchment from May to July. The daytime temperature is likely to be average, while overnight temperatures are expected to be warmer than average. The El Nino-Southern Oscillation is neutral and is expected to remain so for the coming season. There is no indication towards broad scale wetter or drier conditions.

Lachlan Resource Assessment Data Sheet

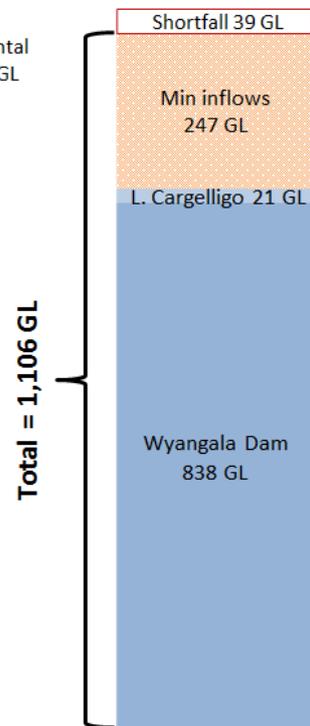
Resource Distribution (April 2018 to May 2020)	
	Volume (GL)
Available Resource ⁽¹⁾	1,106
less	
General Security 2017/2018 AWD ^{(7),(8)}	12 (2%)
Carryover remaining in accounts ^{(2),(8)}	347
Conveyance	36
Planned Environmental Water ⁽³⁾	41
High Security ⁽⁴⁾	92 (100%)
Towns, Stock, Domestic ⁽⁴⁾	50 (100%)
Evaporation from storage ⁽⁵⁾	85
Operational Losses (transmission, operations) ⁽⁶⁾	465
Inaccessible storage	17

See notes below.

**Resource Distribution: April 2018 to May 2020
Lachlan Valley**



Supply Source⁽⁹⁾



Notes:

- (1) Total available resource: End of March storage volume in Wyangala Dam, Lake Cargelligo and Lake Brewster, plus minimum forecast inflows from now to May 2020.
- (2) Carryover remaining in general security accounts, including held environmental water.
- (3) Planned environmental water: water allocated to the Water Quality Allowance and/or the Environmental Contingency Allowances under the water sharing plan. Excludes 'licence-based' environmental water.
- (4) Towns, Stock, Domestic and High Security: reserves are set aside to meet 100% of these high priority entitlements to 31 May 2020. Balances in high security accounts include water traded in from general security licences.
- (5) It is assessed that the lakes are likely to be drawn down slowly in the current water year, increasing storage evaporation.
- (6) Operational Losses: best estimate of the volume required to run the river under dry conditions through May 2020 to meet all demands. This mostly comprises natural transmission losses as water soaks into the river bed sands. This volume includes S&D replenishment deliveries in autumn 2018, 2019 and 2020. It is assumed that current tributary inflows will return to dry conditions from now onward. This loss allowance is updated across the year.
- (7) Volume represents the total cumulative AWD made to GS licences in the current water year.
- (8) Held environmental water (HEW): we are reporting held environmental water administered by environmental water holders. This reporting of held environmental water is indicative only, prior to reconciliation of usage and net trade, and is estimated to be 75 GL of GS account. No water is held in HS account. These entitlements are held and/or managed either singly or jointly by various environmental holder groups, including the NSW Office of Environment and Heritage (OEH) and the Commonwealth Environmental Water Holder (CEWH). Interested parties should refer to individual Agency websites for more detailed information on held environmental holdings.
- (9) We are providing supply source of total available water explained in Note (1) earlier. Note that Lake Brewster is empty now. It also indicates any current shortfall in meeting allocation commitments through to May 2020.

Chances of improvement

The estimates of general security allocation, based on repetition of historical inflow scenarios, are as follows:

Historical Inflow Scenario	Cumulative General Security AWD	
	For 2018/19 by 31 Oct 2018	For 2018/19 by 31 Jan 2019
Dry (exceeded 4 times in 5 years)	0% ⁺	0% ⁺
Average (exceeded once every 2 years)	27% ⁺	31% ⁺
Wet (exceeded once in 5 years)	120% [^]	120% [^]

⁺ Add remaining balances on 30 June 2018 carried forward to these forecasted AWD values.

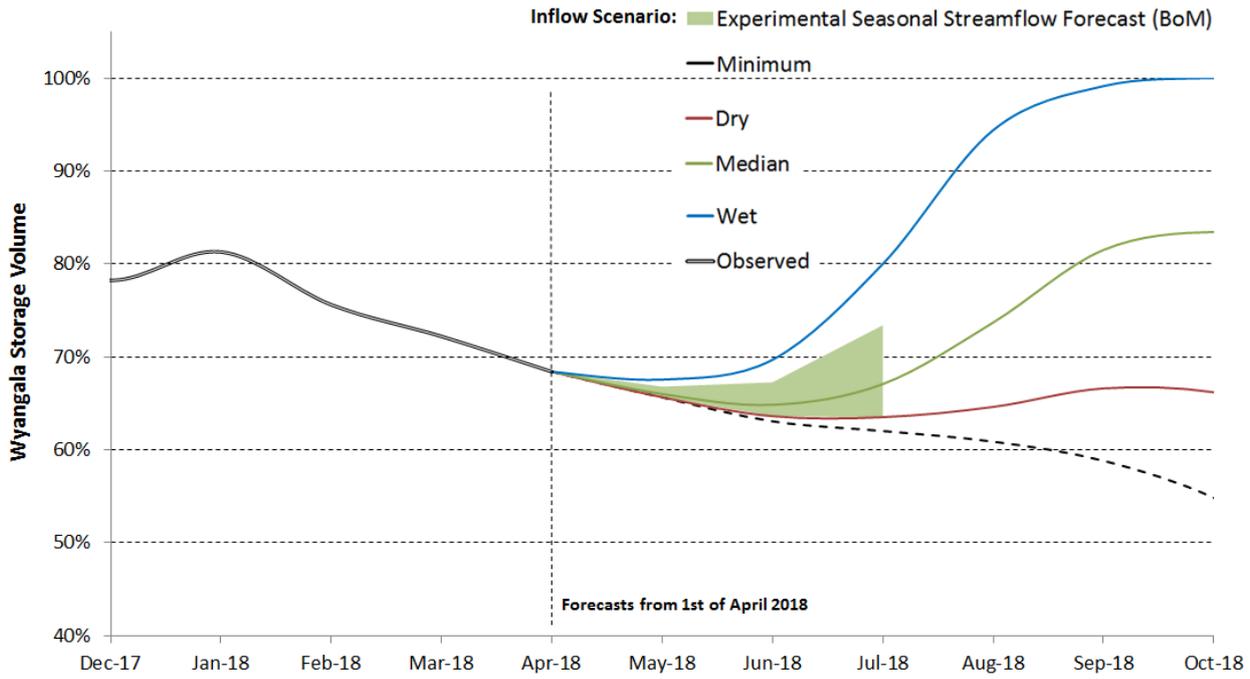
[^] Estimate should Wyangala Dam spill occur by September 2018.

Further information

The next allocation announcement will be issued on **14 May 2018** unless a significant improvement in resource availability occurs beforehand.

Information on Available Water Determinations (AWD) and water sharing plans are available on the Department of Industry – Water website - www.water.nsw.gov.au

Forecast Storage Volume



Forecast storage volumes, shown in the solid lines above, use historical daily inflow data over the full period of record (1898 to present). They represent the chances of specific storage levels being exceeded assuming that past climatic and hydrological sequences are indicative of likely future conditions.

- Minimum Minimum forecast inflows represent the **lowest on record to 2004**
- Dry Dry inflows represent an **80 percent chance** of being exceeded
- Median Median inflows represent a **50 percent chance** of being exceeded
- Wet Wet inflows represent a **20 percent chance** of being exceeded
- Experimental Seasonal Streamflow Forecast (BoM)

The Bureau of Meteorology (BoM) seasonal forecast inflows use relationships between climate indicators (particularly global ocean and climate conditions), past catchment conditions and historical rainfall and streamflow to **forecast the total inflow volume for the next three month period**. The shaded area represents the range of likely storage levels (using the 20th and 80th percentile bounds) resulting from the BoM forecast inflow volume. For more detail, refer to the BoM website: <http://www.bom.gov.au/water/ssf>

The Bureau’s seasonal streamflow forecasts are not used directly in the resource assessment process.

Please note that the Bureau’s seasonal streamflow forecast inflows to Wyangala Dam are still experimental at this stage and are not published on the Bureau’s website. The information provided here by the Department of Industry - Water is only intended to provide additional information about likely storage levels over the next three months.

Further information

www.water.nsw.gov.au