Department of Primary Industries Water

Water Allocation Statement

12 May 2016

Macquarie-Cudgegong Valley
Water allocation update

Allocations
The sum of general security allocations in the 2015/16 water year **remains unchanged at seven (7) per cent of entitlement.**

Approximately **22,000 megalitres (ML)** of inflow to Burrendong Dam is required in May to make a new allocation however just 2,000 ML has been received in May to date.

Current forecasts indicate that a **bulk water transfer from Windamere Dam** will not be required until **at least January 2017**, and this would only eventuate if the next eight months are very dry.

	High Security	General Security	Average Carryover
Macquarie	100%	7%	6%
Cudgegong	100%	7%	58%

Dam levels (as at 11 May 2016)

- Burrendong Dam is currently 11 per cent full, holding 164,000 ML.
- The storage volume has decreased from a high in late-November of 21 per cent (276,000 ML) but is currently steady following recent local rainfall.
- Only 4,000 ML of inflow has been received since March.
- Windamere Dam is currently 39 per cent full, holding 143,000 ML.
- Recent inflows to Windamere Dam have been negligible, not quite offsetting local demand and storage evaporation.

Outlook

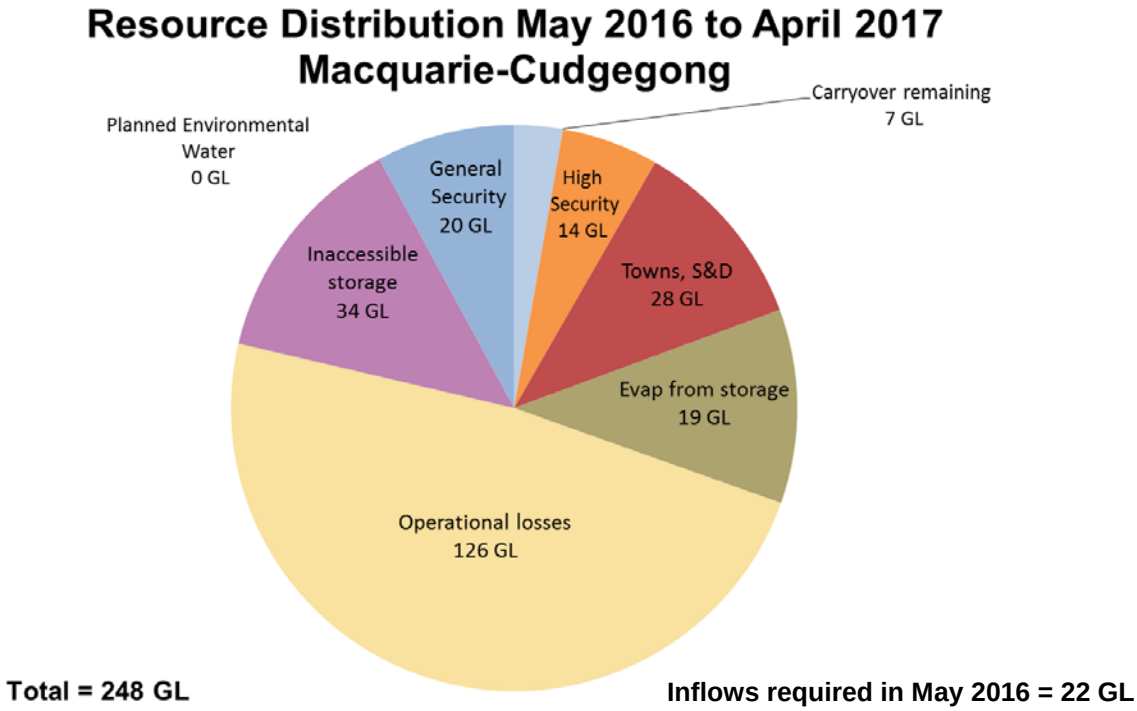
- The Bureau of Meteorology seasonal outlook for May to July in the region indicates a 70-75% chance of above average rainfall across the valley.
- Based on recent changes in the tropical Pacific Ocean and atmosphere, combined with current climate model outlooks, the Bureau's ENSO Outlook is currently at “La Niña WATCH”. This means that the likelihood of La Niña conditions forming later in 2016 is around 50%. Typically during La Niña events, winter-spring rainfall is above average over northern, central and eastern Australia.
- Very warm sea surface temperatures continue across large parts of the Indian Ocean. Likewise, ocean temperatures around Australia remain well above average. Warmth in these two regions may provide extra moisture for rain systems as they cross Australia during the coming months.
- While the above average winter rainfall forecast is welcome for areas suffering from mid- to long-term rainfall deficiencies, storage recovery is likely to require a significant period of above average rainfall.

Macquarie-Cudgegong Resource Assessment Data Sheet

Resource Distribution (May 2016 to April 2017)

	Volume (GL)
Total Available Resource [1]	226
less	
Carryover remaining in accounts [2]	7
Planned Environmental Water [3]	0
Towns, Stock, Domestic [4]	28 (100%)
Inaccessible storage	34
High Security [4]	14 (100%)
General Security	20 (7%)
Operational Losses (transmission, operations) [5]	126
Evaporation from storage	19
Inflows required in May [6]	22

See notes below.



Total = 248 GL

Inflows required in May 2016 = 22 GL

Notes:

(1) Total available resource: end of April 2016 storage volume in Burrendong Dam plus minimum forecast inflows plus bulk water transfers from Windamere Dam.

(2) Carryover remaining in accounts: volume in carryover sub-accounts at the end of April (excludes Cudgegong).

(3) Planned environmental water: water allocated to the Environmental Water Allowance under the water sharing plan to provide for the Macquarie Marshes and the riverine environment. Excludes 'licence-based' environmental water.

(4) Towns, Stock, Domestic and High Security: reserves required to meet 100 per cent of entitlement through to April 2017.This is total entitlement below Burrendong Dam.

(5) 'Operational Losses': best estimate of the volume required to run the river under dry conditions to meet all demands. This includes transmission losses, operational loss, and replenishment flows. It is assumed that inflow returns to dry conditions. This estimate is regularly refined as the year unfolds.

(6) Usable inflows required in the current month to assure delivery through the minimum forecast scenario and begin to make additional general security allocations.

Chances of improvement

The chances of improved general security allocations during the next water year, based on different inflow scenarios, are as follows:

Potential Inflow Conditions		General Security AWD (per cent) #	
		31 Oct 2016	31 Jan 2017
Extremely dry	(99% inflows: 99 chances in 100)	0	0
Dry	(80%: 4 chances in 5)	0	0
Average	(50%: 1 chance in 2)	24	39
Wet	(20%: 1 chance in 5)	100	100

Add carryover from previous water years to this value.

Further information

Information on Available Water Determinations and water sharing plans is available on the DPI Water website - www.water.nsw.gov.au