

REPORT FOR THE WEEK ENDING

Wednesday, 30 July 2003

Our Ref: RMW305/01//01/BWH

1 August, 2003



Rainfall

The attached rain map shows the extent of the good falls of rain recorded last week. Most of the falls in the upper Murray were recorded on 23/24 July with minor falls recorded since then.

Improvements in Streamflows

Significant improvements in streamflows occurred following the heavy rain of last week, with flow levels generally being the best seen since the flood of October 2000. Recent flows are as follows:

| Station | Flow on 23 July (ML/day) | Peak (and date) (ML/day) | Flow on 30 July (ML/day) |
|------------------------------|-----------------------------|-----------------------------|-----------------------------|
| Inflow to Dartmouth | 1 400 | 20 000 (25 July) | 4 000 |
| Inflow to Hume | 6 600 | 18 000 (27 July) | 13 500 |
| Kiewa River at Bandiana | 1 000 | 5 000 (27 July) | 4 000 |
| Ovens River at Wangaratta | 2 100 | 44 000 (27 July) | 13 000 |
| River Murray d/s Yarrowonga | 5 000 | 26 000 (29 July) | 26 000 |
| Goulburn River at McCoys Br. | 500 | 16 000 (29 July) | 15 500 |
| River Murray at Torrumbarry | 3 300 | still rising | 15 200 |

Whilst the rises in streamflow are welcome the peaks have been relatively short lived and tributary inflows will continue to recede in the absence of further rain.

Upper Murray Storages

Storage in Dartmouth and Hume Reservoirs increased by 59 GL and 96 GL respectively over the week, and the effect of the recent rain event on inflows will continue into early August. The increased water level in Dartmouth Reservoir has permitted the restart of the Dartmouth Power Station. Release from Dartmouth Dam will increase to 1 500 ML/day (*see Media Release attached*).

Transfer from Hume to Lake Victoria, which was expected to commence in August, can now be delayed due to the increased tributary inflows.

Total River Murray System active storage increased from 24 to 26% of capacity over the last week.

Mid Murray Operation

Regulators in the Barmah-Millewa Forest were opened by 30 July to prevent overbank flow, and to allow flood water to pass through the forest.

Flow downstream of Torrumbarry is expected to peak at about 19 500 ML/day on 1 August, and the river level at Swan Hill is forecast to rise to about 2.7 m by 5 August.

Water in transit in the mid Murray is to be captured in Lake Victoria to conserve total system water resources for New South Wales, Victoria and South Australia.

DAVID DOLE
General Manager



Mitta Mitta River Flow Advice



Friday 1 August 2003



Increase in Release from Dartmouth Reservoir for Electricity Generation

Southern Hydro and River Murray Water announced today that release from Dartmouth Reservoir is being increased specifically for electricity generation purposes.

Commencing at 3:00 pm today, Southern Hydro will gradually increase flow at Colemans from 200 ML/day (0.9m gauge height) to 1 500 ML/day (1.6m gauge height) by late this evening.

The flow in the Mitta Mitta River at Tallandoon is currently about 1 200 ML/day (1.6 m gauge height) and falling slowly as local inflows from tributaries downstream of Dartmouth Dam recede. The flow at Tallandoon is expected to increase to about 2 300 ML/day (1.9 m gauge height) tomorrow morning as a result of the increase in releases from Dartmouth Dam. However, if there is significant rainfall in the Mitta Mitta Valley between Dartmouth Dam and Tallandoon, this flow will rise further.

Southern Hydro advise that the flow at Colemans is likely to remain at about 1 500 ML/day until the end of August. However, the flow at Colemans will be temporarily reduced if local inflows increase such that the flow at Tallandoon exceeds channel capacity of 10,000 ML/day (3.2 m gauge height). Further flow advice will be issued when there is a significant change to the release program.

For further information contact:

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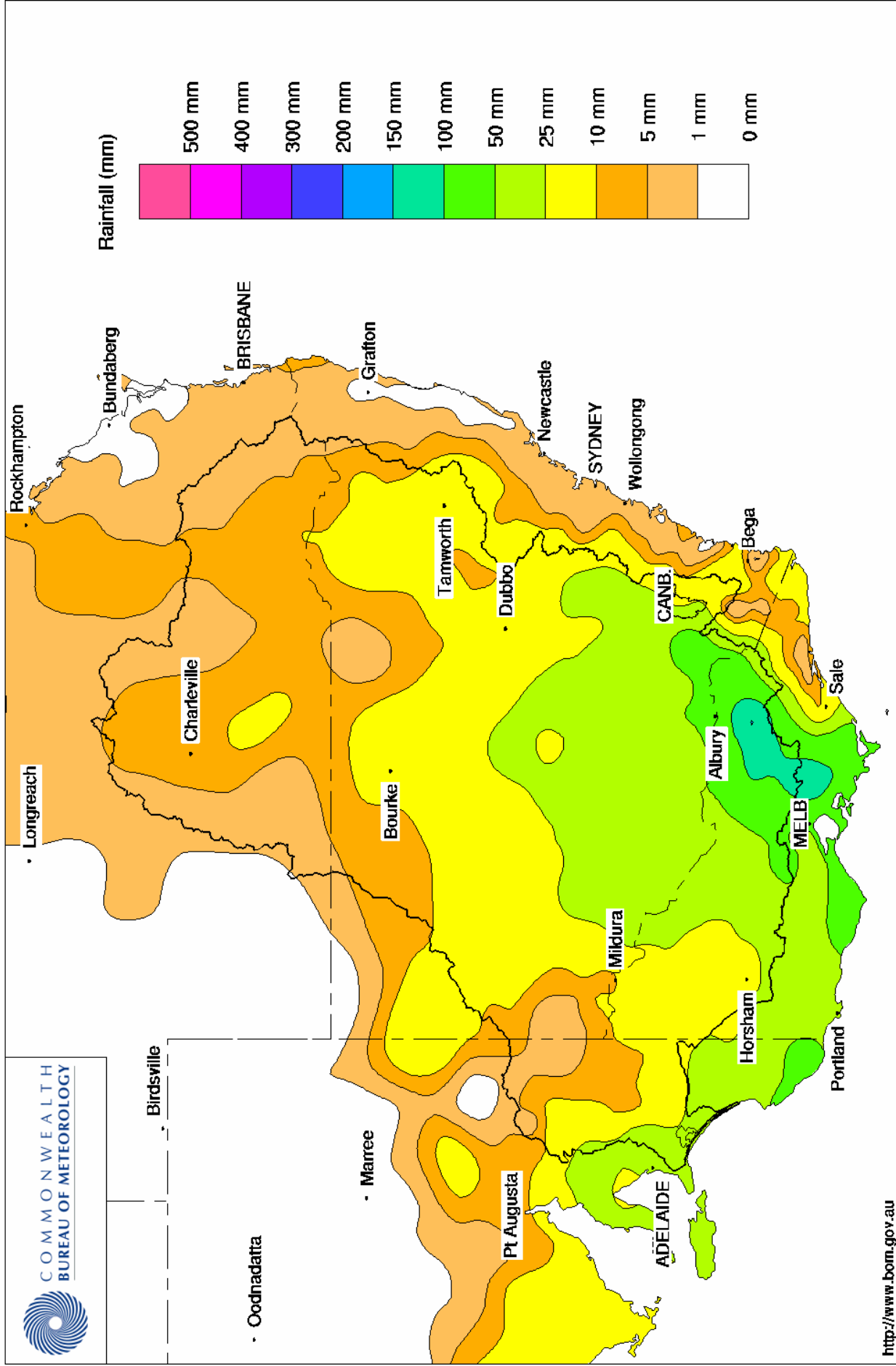
or

Peter Billsdon
Production Manager
Southern Hydro
Phone (03) 5754 3220

(Lawrie Kirk is *not* to be quoted as a spokesperson)

Murray Darling Rainfall Analysis (mm) Week Ending 30th July 2003

Product of the National Climate Centre



Week ending Wednesday 30 Jul 2003

Water in Storage

| MDBC Storages | Full Supply Level | Full Supply Volume | Current Storage Level | Current Storage | | Dead Storage | Active Storage | Change in Storage for the week |
|---------------------|-------------------|--------------------|-----------------------|-----------------|------------|--------------|----------------|--------------------------------|
| | (m AHD) | (GL) | (m AHD) | (GL) | % | (GL) | (GL) | (GL) |
| Dartmouth Reservoir | 486.00 | 3 906 | 432.14 | 1 265 | 32% | 80 | 1 185 | +59 |
| Hume Reservoir | 192.00 | 3 038 | 176.25 | 759 | 25% | 30 | 729 | +96 |
| Lake Victoria | 27.00 | 680 | 23.66 | 327 | 48% | 100 | 227 | +10 |
| Menindee Lakes | | 1 603 * | | 72 | 4% | 640 # | 0 | +0 |
| Total | | 9 227 | | 2 423 | 26% | 850 | 2 142 | +165 |

* Menindee surcharge capacity 1916 GL

% of Total Active MDBC Storage = **26%**

NSW Menindee Lakes Reserve

Major State Storages

| | | | | | | | |
|----------------------|-------|--|-----|-----|-----|-----|------|
| Burrinjuck Reservoir | 1 026 | | 107 | 10% | 3 | 104 | +16 |
| Blowering Reservoir | 1 631 | | 403 | 25% | 24 | 379 | +68 |
| Eildon Reservoir | 3 390 | | 573 | 17% | 100 | 473 | +144 |

Snowy Mountains Scheme

Snowy diversions for week ending 29-Jul-2003

| Storage | Active storage (GL) | Weekly change (GL) | Diversion (GL) | This week | From 1 May 2003 |
|------------------------|---------------------|--------------------|------------------|-----------|-----------------|
| Lake Eucumbene - Total | 1 594 | -46 | Snowy-Murray | +30 | 337 |
| Snowy-Murray Component | 681 | -24 | Tooma-Tumut | +5 | 43 |
| Target Storage | 1 170 | | Nett Diversion | 25.4 | 294 |
| | | | Murray 1 Release | +39 | 391 |

Major Diversions from Murray and Lower Darling (GL)

| New South Wales | This week | From 1 July 2003 |
|-------------------------|------------|------------------|
| Murray Irrig. Ltd (Net) | .0 | .0 |
| Wakool System loss | 0.0 | .1 |
| Western Murray Irrig. | 0.0 | .3 |
| Licensed Pumps | 0.7 | 3.6 |
| Lower Darling | 0.0 | .2 |
| TOTAL | 0.8 | 4.2 |

| Victoria | This week | From 1 July 2003 |
|---------------------------------|-------------|------------------|
| Yarrowonga Main Channel (net) | .0 | |
| Torrumbarry System + Nyah (net) | 12.8 | 25 |
| Sunraysia Pumped Districts | 0.3 | 1 |
| Licensed pumps - GMW (Nyah+u/s) | 0.0 | |
| Licensed pumps - SRW | 1.6 | 7 |
| TOTAL | 14.7 | 32 |

Flow to South Australia (GL)

| | | |
|------------------------|-------|----------------|
| Entitlement this month | 108.5 | |
| Flow this week | 19.5 | (2 800 ML/day) |
| Flow so far this month | 84 | |
| Flow last month | 72 | |

Salinity (EC)

(microsiemens/cm @ 25° C)

| | Current | Average over the last week | Average since 1 August 2002 |
|-------------------------|---------|----------------------------|-----------------------------|
| Swan Hill | 160 | 180 | 100 |
| Euston | 170 | 140 | 120 |
| Red Cliffs | 140 | 150 | 140 |
| Merbein | 160 | 150 | 160 |
| Burtundy (Darling) | 1 650 | 1 620 | 1 250 |
| Lock 9 | 240 | 220 | 180 |
| Lake Victoria | 300 | 300 | 290 |
| Berri | 390 | 390 | 330 |
| Waikerie | 570 | 550 | 420 |
| Morgan | 560 | 550 | 480 |
| Mannum | 480 | 470 | 520 |
| Murray Bridge | 510 | 500 | 600 |
| Milang (Lake Alex.) | 1 040 | 1 020 | 1 140 |
| Poltalloch (Lake Alex.) | 1 020 | 960 | 1 140 |
| Meningie (Lake Alb.) | 1 380 | 1 420 | 1 610 |
| Goolwa Barrages | 4 440 | 4 220 | 3 470 |



River Levels and Flows

| River Murray | Minor Flood stage (m) | Gauge height | | Flow (ML/day) | Trend | Average flow this week (ML/day) | Average flow last week (ML/day) |
|----------------------------------|-----------------------|--------------|---------|---------------|-------|---------------------------------|---------------------------------|
| | | local (m) | (m AHD) | | | | |
| Khancoban | - | - | - | 7 220 | S | 6 260 | 4 320 |
| Jingellic | 4.0 | 2.31 | 208.83 | 10 250 | F | 10 280 | 5 730 |
| Tallandoon (Mitta Mitta River) | 4.2 | 1.66 | 218.55 | 1 470 | F | 2 760 | 550 |
| Heywoods | 5.5 | 1.16 | 154.79 | 600 | S | 600 | 640 |
| Doctors Point | 5.5 | 2.00 | 150.47 | 3 860 | F | 4 620 | 1 440 |
| Albury | 4.3 | 1.03 | 148.47 | - | - | - | - |
| Corowa | 7.0 | 1.50 | 127.52 | 5 570 | F | 4 430 | 1 490 |
| Yarrowonga Weir (d/s) | 6.4 | 3.59 | 118.63 | 26 200 | R | 14 740 | 6 000 |
| Tocumwal | 6.4 | 3.47 | 107.31 | 19 440 | R | 9 660 | 6 120 |
| Torrumbarry Weir (d/s) | 7.3 | 4.28 | 82.83 | 15 210 | R | 6 700 | 3 730 |
| Swan Hill | 4.5 | 0.96 | 63.88 | 4 120 | R | 3 930 | 3 740 |
| Wakool Junction | 8.8 | 2.31 | 51.43 | 5 210 | F | 5 330 | 5 550 |
| Euston Weir (d/s) | 8.8 | 1.23 | 43.07 | 5 560 | S | 5 440 | 5 930 |
| Mildura Weir (d/s) | - | - | 30.86 | 5 050 | F | 5 040 | 6 220 |
| Wentworth Weir (d/s) | 7.3 | 2.89 | 27.65 | 4 850 | R | 4 910 | 5 570 |
| Rufus Junction | - | 2.79 | 19.72 | 2 540 | F | 2 520 | 2 570 |
| Blanchetown (Lock 1 d/s) | - | - | - | 2 580 | S | 2 630 | 2 510 |
| Tributaries | | | | | | | |
| Kiewa at Bandiana | 2.7 | 2.42 | 155.65 | 3 810 | S | 3 910 | 1 080 |
| Ovens at Wangaratta | 11.9 | 11.08 | 148.76 | 13 976 | F | 21 310 | 2 130 |
| Goulburn at McCoys Bridge | 9.0 | 7.02 | 98.44 | 15 485 | F | 8 190 | 470 |
| Edward at Stevens Weir (d/s) | - | - | - | 1 110 | F | 1 230 | 830 |
| Edward at Liewah | - | 1.63 | 57.01 | 1 030 | R | 1 060 | 1 100 |
| Wakool at Stoney Crossing | - | 0.34 | 54.83 | 210 | S | 220 | 210 |
| Murrumbidgee at Balranald | 5.0 | 0.51 | 56.47 | 204 | S | 210 | 190 |
| Barwon at Mungindi | - | 3.28 | - | 190 | S | 200 | 220 |
| Darling at Bourke | - | 4.04 | - | 280 | R | 240 | 200 |
| Darling at Burtundy Rocks | - | 0.65 | - | 0 | F | 10 | 0 |

| | | |
|---|--------|-------|
| Natural Inflow to Hume (ie pre Dartmouth & Snowy Mountains scheme) | 17 690 | 5 060 |
|---|--------|-------|

Weirs and Locks

Pool levels above or below design level

| Murray | FSL (m AHD) | u/s | d/s | | FSL (m AHD) | u/s | d/s |
|-------------------|-------------|-------|-------|----------------------|-------------|-------|-------|
| Yarrowonga | 124.90 | -0.49 | - | No. 7 Rufus River | 22.10 | +0.04 | +0.48 |
| No 26 Torrumbarry | 86.05 | +0.00 | - | No. 6 Murtho | 19.25 | +0.02 | +0.02 |
| No. 15 Euston | 47.60 | +0.00 | - | No. 5 Renmark | 16.30 | +0.02 | +0.08 |
| No. 11 Mildura | 34.40 | +0.02 | +0.06 | No. 4 Bookpurnong | 13.20 | +0.03 | +0.28 |
| No. 10 Wentworth | 30.80 | -0.02 | +0.25 | No.3 Overland Corner | 9.80 | +0.00 | +0.13 |
| No. 9 Kulinine | 27.40 | +0.02 | -0.02 | No. 2 Waikerie | 6.10 | +0.03 | +0.05 |
| No. 8 Wangumma | 24.60 | +0.00 | +0.07 | No 1. Blanchetown | 3.20 | +0.04 | -0.13 |

| Murrumbidgee | FSL (m AHD) | relation to FSL | d/s gauge ht. | | Flow (ML/day) |
|---------------|-------------|-----------------|---------------|---------|---------------|
| | | | local (m) | (m AHD) | |
| No. 7 Maude | 75.40 | -0.05 | 0.75 | 70.1 | 457 |
| No. 5 Redbank | 66.90 | +0.04 | 0.35 | 61.65 | 469 |

Barrages

FSL = 0.75 m AHD

| | Openings | Level | Status |
|----------------|--------------|-------|------------|
| Goolwa | 128 openings | 0.66 | All closed |
| Mundoo | 26 openings | 0.60 | All closed |
| Boundary Creek | 6 openings | - | All closed |
| Ewe Island | 111 gates | - | All closed |
| Tauwichee | 322 gates | 0.65 | All closed |

AHD = Level relative to Australian Height Datum, i.e. height above sea level



A Business Unit of MDBC