Resource Operations Licence Water Act 2000



Name of licence

Dawson Valley Water Supply Scheme Resource Operations Licence

Holder

Sunwater Limited

Water plan

The licence relates to the Water Plan (Fitzroy Basin) 2011.

Water infrastructure

The water infrastructure to which the licence relates is detailed in Attachment 1.

Authority to interfere with the flow of water

The licence holder is authorised to interfere with the flow of water to the extent necessary to operate the water infrastructure to which the licence relates.

Authority to use watercourses to distribute water

The licence holder is authorised to use the watercourses listed in Table 1 for the distribution of supplemented water, including sections of tributaries where supplemented water is accessible.

Table 1 – Use of watercourses for distribution

Watercourse	Description
Dawson River	For the distribution of supplemented water, the licence holder may use the Dawson River from the upstream limit of Glebe Weir (AMTD 356.5 km) to the downstream limit of the Boolburra waterhole (AMTD 18.37 km), including sections of Castle Creek and other tributaries where supplemented water is accessible.
Dawson River	For the distribution of treated coal seam gas (CSG) water, the licence holder may use the Dawson River from Glebe Weir (AMTD 326.2 km), to the downstream extent of the Dawson Valley Water Supply Scheme (AMTD 18.37km), including sections of tributaries where treated CSG water is accessible.

Conditions

1. Requirement for operations manual

- **1.1.** The licence holder must operate in accordance with an approved operations manual.
- 1.2. The approved operations manual must include—
 - 1.2.1. operating rules for water infrastructure;
 - 1.2.2. water sharing rules; and
 - 1.2.3. seasonal water assignment rules.

2. Environmental management rules

2.1. The licence holder must comply with the requirements as detailed in Attachment 2.

3. Metering

3.1. The licence holder must meter the taking of water under all water allocations and seasonal water assignments to which the licence holder distributes water.

4. Notification requirements

4.1. The licence holder must comply with the requirements as detailed in Attachment 3.

5. Monitoring and reporting requirements

- **5.1.** The licence holder must carry out and report on the monitoring and reporting requirements as set out in Attachment 4.
- **5.2.** The licence holder must provide any monitoring data required under condition 5.1 to the chief executive within a stated time upon request.
- **5.3.** The licence holder must ensure that the monitoring, including the measurement, collection, analysis and storage of data, is consistent with the Water Monitoring Data Collection Standards¹.
- **5.4.** The licence holder must ensure that the transfer of data and reporting are consistent with the Water Monitoring Data Reporting Standards¹.

6. Other conditions

- **6.1.** The operating and supply arrangements, and the monitoring required under this licence, do not apply in situations where implementing the rules or meeting the requirements would be unsafe to a person or persons. In these circumstances, the licence holder must comply with the requirements for operational or emergency reporting prescribed in Attachment 4.
- **6.2.** The licence holder may at any time submit an interim program or an amendment to an existing program to the chief executive for approval in accordance with Attachment 5, if the holder proposes to operate in a way that does not meet the requirements of this licence.
- **6.3.** Where there is conflict between the requirements of this licence and an approved program, the program prevails for the time it is in place.
- **6.4.** The licence holder is required to collect and make publicly available through an industry accepted digital channel, updated at least monthly, details of each seasonal water assignment managed under this licence, including the sale price, the volume of water assigned and the location of where the water was assigned to and from.
- **6.5.** The licence holder must provide the chief executive information about seasonal water assignments as directed by the chief executive within the stated time upon request¹.

This Resource Operations Licence is subject to the conditions attached.

Commencement of licence

The licence took effect on 18 May 2006.

Granted on 18 May 2006.

Amended under section 186 of the Water Act 2000 on 10 January 2022.

Jarrod Cowley-Grimmond Executive Director, Divisional Support

¹ The Water Monitoring Data Collection Standards and the Water Monitoring Data Reporting Standards can be accessed online at: www.business.qld.gov.au

Attachment 1

Infrastructure details for Dawson Valley Water Supply Scheme

Description of water infrastructure			
Main embankment	Mass concrete and steel sheet piling weir.		
Full supply level	EL 170.54 m AHD.		
Fixed crest level	EL 170.54 m AHD.		
Saddle dam(s)	Nil.		
Fabridams	Nil.		
Gates	Nil.		
Storage volume and surfa	ce area		
Full supply volume	17 700 ML.		
Dead storage volume	430 ML.		
Surface area/elevation and storage volume/elevation relationship	Irrigation and Water Supply Commission Drawing No. A3-55197 (15/03/79).		
Spillway arrangement			
Description of works	An inlet tower equipped with dropboards discharging through a 1200 mm pipe bifurcating to two 675 mm diameter release valves.		
Multi-level inlet	Dropboards.		
Cease to flow level	Invert EL 160.44 m AHD.		
Discharging characteristics	Estimated maximum outlet discharge at FSL is 625 ML/day. Irrigation and Water Supply Commission Drawing No. A3-55197 (15/03/79).		
River inlet/outlet works			
Description of works	An inlet tower equipped with dropboards discharging through a 1200 mm pipe bifuricating to two 675 mm diameter release valves.		
Multi-level inlet	Dropboards.		
Cease to flow level	Invert EL 160.44 m AHD.		
Discharge characteristics	Estimated maximum outlet discharge at FSL is 625 ML/day.		
Fish transfer system			
Description of works	Nil.		
Local supply level/area			
=================================	El 163.6 m AHD.		
Local Supply Area	Glebe Weir pond and downstream to, but excluding, Gyranda Weir pond.		

Table 2 – Gyranda Weir–Dawson River AMTD 284.5 km

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Description of water infra	structure	
Main embankment	Steel sheet piling weir.	
Full supply level	EL 157.25 m AHD.	
Fixed crest level	EL 157.25 m AHD.	
Saddle dam(s)	Anabranch Weir.	
Fabridams	Nil.	
Gates	Nil.	
Storage volume and surfa	ce area	
Full supply volume	16 500 ML.	
Dead storage volume	2120 ML.	
Surface area/elevation and storage volume/elevation relationship	Queensland Water Resources Commission Drawing No. A3-64635.	
Spillway arrangement		
Description of works	Water flows over full width of weir.	
Spillway level	EL 157.25 m AHD.	
Spillway width	148.3 m.	
Discharge	Queensland Water Resources Commission Drawing No. A4-64655.	
characteristics		
River inlet/outlet works		
Description of works	Main embankment: Multi-level inlet discharging through 1600mm by 1600mm box culvert to a 'vee' notch weir approximately 50metres downstream of embankment. Anabranch structure: 750mm diameter pipe.	
Multi-level inlet	Multi-level inlet equipped with: 900 mm by 900 mm sluice gate opening at EL 156.32 m AHD; 1060 mm by 1060 mm sluice gate opening at EL 153.14 m AHD; 1500 mm by 1500 mm sluice gate opening at EL 150.08 m AHD.	
Cease to flow level	Invert vee notch EL 149.75 m AHD. Invert anabranch pipe approximately EL 153.64 m AHD.	
Discharge characteristics	Estimated maximum outlet discharge at FSL is 1000 ML/day.	
Fish transfer system		
Description of works.	Nil.	
Local supply area/levels		
Local Supply Level	EL 151.80 m AHD.	
Local Supply Area	Gyranda Weir pond and downstream to, but excluding, Theodore Weir pond.	

Table 3 – Orange Creek Weir–Dawson River AMTD 270.7 km

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Description of water infra	structure		
Main embankment	Timber piled weir, with concrete work following maintenance/flood repairs.		
Full supply level	EL 150.29 m AHD.		
Fixed crest level	EL 150.29 m AHD.		
Saddle dam(s)	Anabranch weir.		
Fabridams	Nil.		
Gates	Nil.		
Storage volume and surfa	ce area		
Full supply volume	6140 ML.		
Dead storage volume	2320 ML.		
Surface area/elevation and storage volume/elevation relationship	Water Resources Commission (DPI) Drawing No. A3-101017 and 101018 (14/10/92).		
Spillway arrangement			
Description of works	No separate spillway. Flows overtop full weir.		
Spillway level	EL 150.29 m AHD.		
Spillway width	48.82 metres.		
Discharge characteristics	Queensland Water Resources Commission Drawing No. A3-55199, submitted to the department on 12/7/01.		
River inlet/outlet works			
Description of works	Main embankment: Outlet works consists of a high and low level outlet. Low level outlet is a 600 mm nominal diameter pipe controlled on the upstream end by a gate valve. The high level outlet is a 900 mm nominal diameter, two-barrel dropboard structure for crest releases. Anabranch structure: Outlet works consist of a 300 mm nominal diameter pipe controlled on the upstream end by a gate valve.		
Multi-level inlet	High and low level outlets.		
Cease to flow level	Low level outlet invert EL 145.82 m AHD. High level outlet invert EL 148.25 m AHD. Anabranch outlet invert EL 147.42 m AHD.		
Discharge characteristics	Estimated maximum outlet discharge at FSL is 360 ML/day.		
Fish transfer system			
Description of works	Nil.		
Local supply area/levels			
Local Supply Level	Not applicable.		
Local Supply Area	Not applicable.		

Table 4 – Theodore Weir–Dawson River AMTD 228.5 km

Description of water infras		
Main embankment	The main weir was originally of timber pile construction, with concrete	
Full summer la la cal	abutment and apron slabs additions.	
Full supply level	EL 133.63 m AHD.	
Fixed crest level	EL 133.63 m AHD.	
Saddle dam(s)	Timber piled anabranch weir.	
Fabridams	Nil.	
Gates	Nil, but note river inlet/outlet.	
Storage volume and surfa	ce area	
Full supply volume	4760 ML.	
Dead storage volume	750 ML.	
Surface area/elevation and storage volume/elevation relationship	Queensland Water Resources Commission Drawing No. A3–36527B (10/1/84).	
Spillway arrangement		
Description of works	Flows overtop full width of weir.	
Spillway level	EL 133.63 m AHD.	
Spillway width	60.63 metres.	
Discharge characteristics	Queensland Water Resources.	
River inlet/outlet works		
Description of works	Two 1000 mm by 750 mm gates.	
Multi-level inlet	Single-level outlet with no inlet structure.	
Cease to flow level	Invert EL 131.75 m AHD.	
Discharge characteristics	Estimated maximum outlet discharge at FSL is 275 ML/day.	
Fish transfer system		
Description of works	Nil.	
Local supply area/levels		
Local Supply Level	EL 131.75 m AHD.	
Local Supply Area	Theodore Weir pond and downstream to, but excluding, Moura Weir pond.	

Table 5 – Moura Offstream Storage–Dawson River Diversion AMTD 156.9 km

Description of water infras	structure	
Main embankment	Compacted earth.	
Full supply level	EL 125.29 m AHD.	
Fixed crest level	EL 125.29 m AHD.	
Saddle dam(s)	Not applicable.	
Fabridams	Nil.	
Gates	Nil.	
Storage volume and surfa	ce area	
Full supply volume	2820 ML.	
Dead storage volume	140 ML.	
Surface area/elevation and storage volume/elevation relationship	Natural Resources (State Water Projects) Drawing No. A3–213163 (10/3/00).	
Diversion works		
Description of works	Extracts from the Dawson River at AMTD 156.9 km. Reinforced concrete pump station with two by one m ³ /s submersible pumps. Rising main comprising two by 660 mm OD steel pipes joining to a 960 mm OD steel pipe.	
River inlet/outlet works		
Description of works	Floating intake arrangement installed in the offstream storage. Concrete base slab EL 118.30 m AHD. Steel pipe through embankment invert level EL 118.50 m AHD. River releases are made via: rising main direct into the river; rising main, then into the 200 mm diameter return line; or combination of both the above.	
Multi-level inlet	Floating inlet arrangement.	
Cease to flow level	EL 118.6 m AHD.	
Discharge characteristics	Maximum 18 ML/day at FSL through return line.	
Local supply area/levels		
Local Supply Level	Not applicable.	
Local Supply Area	Not applicable.	

Table 6 – Moura Weir–Dawson River AMTD 150.2 km

Description of water infras	structure	
Main embankment	Timber piled weir, which has been renovated to include steel and concrete.	
Full supply level	EL 104.75 m AHD.	
Fixed crest level	EL 104.75 m AHD.	
Saddle dam(s)	Nil.	
Fabridams	Nil.	
Gates	Nil.	
Storage volume and surfa	ce area	
Full supply volume	7700 ML.	
Dead storage volume	600 ML.	
Surface area/elevation and storage volume/elevation relationship	Natural Resources (State Water Projects) Drawing No. A3–214477 (5/9/00).	
Spillway arrangement		
Description of works	Flow overtops full width of weir.	
Spillway level	High level crest EL 105.05 m AHD. Low level crest EL 104.75 m AHD.	
Spillway width	High level crest 135.67 metres.	
Discharge	Low level crest 55.70 metres. Not available.	
characteristics		
River inlet/outlet works		
Description of works	River: 1440 mm diameter outlet pipe with a 1200 mm diameter butterfly valve. Back Creek: 900 mm diameter pipe.	
Multi-level inlet	Single-level outlet only.	
Cease to flow level	River: invert EL 99.47 m AHD. Back Creek: EL 101.25 m AHD.	
Discharge characteristics	Estimated outlet discharge at FSL is 850 ML/day.	
Fish transfer system		
Description of works	Vertical slot fishway.	
Local supply area/levels		
Local Supply Level	Not applicable.	
Local Supply Area	Moura Weir pond and downstream to, but excluding, Neville Weir pond.	

Table 7 – Neville Hewitt Weir–Dawson River AMTD 82.7 km

Description of water infrastructure			
Main embankment	Mass concrete weir.		
Full supply level	EL 80.30 m AHD.		
Fixed crest level	EL 80.30 m AHD.		
Saddle dam(s)	Anabranch weir.		
Fabridams	Nil.		
Gates	Nil.		
Storage volume and surfa	ce area		
Full supply volume	10 646 ML.		
Dead storage volume	72.53 m AHD.		
Surface area/elevation and storage volume/elevation relationship	Sunwater Ltd Drawing No. S 43910 (Ver. B, March 2012).		
Spillway arrangement			
Description of works	Central ogee crest with cribbed sheet piling on both sides.		
Spillway level	EL 80.30 m AHD.		
Spillway width	EL 76.20 m AHD.		
Discharge characteristics	Tabulated discharge relationship submitted to the department on 30/3/01.		
River inlet/outlet works			
Description of works	Main embankment: inlet structure with dropboards discharging through 750 mm nominal diameter pipe with 750 mm nominal diameter butterfly valve and a 300 mm nominal diameter gate valve. Anabranch structure: inlet structure with dropboards discharging through 600 mm nominal diameter outlet pipe with 375 mm gate valve.		
Multi-level inlet	Dropboards.		
Cease to flow level	Main embankment: outlet pipe invert EL 72.53 m AHD. Anabranch structure: outlet sill invert EL 74.80 m AHD. Main embankment: inlet pipe invert EL 72.45 m AHD. Anabranch structure: inlet sill invert EL 74.74 m AHD.		
Discharge characteristics	Outlet rating curve submitted to the department on 30/3/01. Estimated maximum outlet discharge at FSL is 300 ML/day.		
Fish transfer system			
Description of works	Fish lock.		
Local supply area/levels			
Local Supply Level	EL 77.0 m AHD.		
Local Supply Area	Neville Hewitt Weir pond, and downstream to downstream limit of this water supply scheme.		

Attachment 2 Environmental management rules

1 Definitions for Attachment 2

In this attachment—

estimated daily inflow, for a storage, means the inflow into a storage measured at the closest upstream gauging station or local headwater gauging station.

Upper Dawson sub-scheme, the extent of the Dawson River from the upstream limit of Glebe Weir (AMTD 356.5 km) to the effective upstream limit of Neville Hewitt Weir (AMTD 107 km).

Lower Dawson sub-scheme, the extent of the Dawson River from the effective upstream limit of Neville Hewitt Weir (AMTD 107 km) to the downstream limit of Boolburra waterhole (AMTD 18.37 km).

2 Quality of water released

Where a storage is fitted with multi-level inlet works, the licence holder must draw water from the inlet level that optimises the quality of water released.

3 Change in rate of release from infrastructure

The licence holder must minimise the occurrence of adverse environmental impacts by ensuring that any change in the rate of release of water from a storage into a watercourse occurs incrementally.

4 Seasonal base flow management strategy

- (1) Each day, the licence holder must release from the storage stated in Attachment 2, Table 1, column 1, an amount of water that is the lesser of—
 - (a) the estimated daily inflow to the storage; and
 - (b) the volume stated in Attachment 2, Table 1, column 2.
- (2) Subsection (1) does not apply for a storage—
 - (a) when the estimated daily inflow to the storage is less than the minimum inflow stated in Attachment 2, Table 1, column 3; or
 - (b) when the water level in the storage is below the minimum level stated in Attachment 2, Table 1, column 4; or
 - (c) when the first post-winter flow management strategy stated in Attachment 2, Table 1, column 5 is in effect.
- (3) Despite subsections (1) and (2), the licence holder may, for the purpose of implementing this strategy—
 - (a) release plus or minus 20 per cent of the volume required under the strategy over a 48-hour period;
 - (b) delay the commencement and cessation of a release by up to 48 hours; and
 - (c) in determining the estimated daily inflows to the storage, not include any water which was released from an upstream storage to maintain the nominal operating level of the storage or to supply water users.

Table 1 – Seasonal base flow requirements and parameters

Column 1	Column 2	Column 3	Column 4	Column 5
Storage	Volume	Minimum estimated daily inflow to the storage	Storage level	First post-winter flow management strategy
Theodore Weir	100 ML/d	60 ML/d	EL 133.0 m AHD	Upper Dawson sub-scheme first post-winter management strategy
Moura Weir	110 ML/d	70 ML/d	EL 102.8 m AHD	Upper Dawson sub-scheme first post-winter management strategy
Neville Hewitt Weir	110 ML/d	70 ML/d	EL 77.0 m AHD	Lower Dawson sub-scheme first post-winter management strategy

5 Release volumes

Release volumes from storages required under Attachment 2, section 4 are to be— (a) in addition to releases required for—

- (ii) supplying water to a water allocation holder; or
- (iii) maintaining nominal operating levels in downstream storages; and
- (b) made with consideration of the maximum outlet capacity of the storage works.

6 Upper Dawson sub-scheme first post-winter flow management strategy

- (1) This section applies if the licence holder has been notified by the chief executive of a first post-winter flow event occurring in the Dawson River between Glebe Weir and the effective upstream limit of Gyranda Weir.
- (2) The licence holder must implement the Upper Dawson sub-scheme first postwinter flow management strategy within one day after notification.
- (3) For 21 days from when implementation of the strategy begins, the licence holder must release from—
 - (a) Moura Weir each day—
 - (i) if the estimated daily inflow to Moura Weir is greater than or equal to 35 ML/day—the lesser of—
 - (A) the estimated daily inflow to Moura Weir; and
 - (B) the maximum discharge capacity of Moura Weir outlet works; or
 - (ii) otherwise— zero.
 - (b) Gyranda Weir each day—
 - (i) if the estimated daily inflow to Gyranda Weir is greater than or equal to 30 ML/day—the lesser of—
 - (A) the estimated daily inflow to Gyranda Weir; and
 - (B) the maximum discharge capacity of Gyranda Weir outlet works; or
 - (ii) otherwise— zero.
- (4) Subsection (3)(a) does not apply when—
 - (a) Moura Weir is below EL 103.15 m AHD; or
 - (b) Moura Weir spills.
- (5) Subsection (3)(b) does not apply when—

- (a) Gyranda Weir is below EL 154.9 m AHD; or
- (b) Gyranda Weir spills.

7 Lower Dawson sub-scheme first post-winter flow management strategy

- (1) This section applies if the licence holder has been notified by the chief executive of a first post-winter flow event occurring in the Dawson River downstream of Neville Hewitt Weir.
- (2) The licence holder must implement the Lower Dawson sub-scheme first postwinter flow management strategy within one day after notification.
- (3) For 21 days from when implementation of the strategy begins, the licence holder must release from Neville Hewitt Weir each day—
 - (a) if the estimated daily inflow to Neville Hewitt Weir is greater than or equal to 35 ML/day—the lesser of—
 - (i) the estimated daily inflow to Neville Hewitt Weir; and
 - (ii) the maximum discharge capacity of Neville Hewitt Weir outlet works; or
 - (b) otherwise-zero.
- (4) Subsection (3)(a) does not apply when—
 - (a) Neville Hewitt Weir is below EL 77.0 m AHD; or
 - (b) Neville Hewitt Weir spills.

Attachment 3 Notification requirements

1 Notification to distribution operations licence holder

- (1) The licence holder must notify the distribution operations licence holder for the Theodore Channel Scheme within 2 business days after—
 - (a) the occurrence of the first post-winter flow event;
 - (b) setting an initial announced allocation or resetting an announced allocation during the water year;
 - (c) the commencement and cessation of the fourth quarter restriction period;
 - (d) the commencement of the Orange Creek Weir release period;
 - the licence holder receives an application for a seasonal water assignment that requires the consent of the licence holder and distribution operations licence holder;
- The licence holder must notify the distribution operations licence holder within 1 business day after becoming aware of any operational incident or emergency that may impact the distribution operations licence holder.

Attachment 4 Licence holder monitoring and reporting

Part 1 Monitoring requirements

Division 1 Water quantity

1 Stream flow and storage water level data

- (1) The licence holder must record water level and volume data, and stream flow data in accordance with Attachment 4, Table 1.
- (2) Infrastructure inflows may be determined based upon an infrastructure inflow derivation technique supplied by the licence holder and approved by the chief executive.

Water level and volume data	Daily flow data
_	Glebe Weir inflow*
Glebe Weir headwater (AMTD 326.2 km)	—
_	Glebe Weir tailwater
_	Gyranda Weir inflow
Gyranda Weir headwater (AMTD 284.5 km)	—
_	Gyranda Weir tailwater
_	Theodore Weir inflow
Theodore Weir headwater (AMTD 228.5 km)	_
_	Theodore Weir tailwater*
_	Moura Weir inflow*
Moura Weir headwater (AMTD 150.2 km)	_
_	Moura Weir tailwater*
Moura Offstream Storage	_
	Neville Hewitt Weir inflow*
Neville Hewitt Weir headwater (AMTD 82.7 km)	_
_	Neville Hewitt Weir tailwater

Table 1 – Locations where continuous water data recording required

* Methodology approved by the chief executive.

2 Releases from storages

- (1) The licence holder must measure and record for each release of water from storages listed in Attachment 1—
 - (a) the daily volume released;
 - (b) the release rate, and for any change in release rate-
 - (i) the date and time of the change; and
 - (ii) the new release rate; and
 - (c) the reason for each release.
- (2) In addition to the requirements under subsection (1), for storage outlets with selective withdrawal capabilities, the licence holder must record—
 - (a) the inlet level used for each release of water; and
 - (b) the reason for deciding to release from that particular inlet level.

3 Use of waterholes

The licence holder must measure and record the level of the water in the waterhole for each day that supplemented or treated coal seam gas water is taken from—

- the waterhole known locally as Boolburra waterhole (nominally AMTD 18.37 km on the Dawson River);
- (b) if the water level in Neville Hewitt Weir is-
- (c) above EL 77.0 m AHD—when the waterhole is drawn more than 0.5 metres below its cease to flow level; or
- (d) below EL 77.0 m AHD—when the waterhole is drawn more than 1.2 metres below its cease to flow level; and
- (e) another waterhole other than that named in subsection (a) is-
- (f) within the extent of this water supply scheme; and
- (g) below 0.5 metres from its cease to flow level.

4 Water diversions

- (1) The licence holder must measure and record the daily total volumes of water delivered to—
 - (a) Gibber Gunyah channel system;
 - (b) Theodore channel system;
 - (c) Moura Offstream Storage; and
 - (d) Moura Weir from Moura Offstream Storage.

5 Water discharged

The licence holder must measure and record the daily total volumes of water discharged by the Woleebee Creek to Glebe Weir pipeline.

6 Announced allocations

The licence holder must record details—

- (a) of announced allocation determinations for-
 - (i) medium priority allocation;
 - (ii) medium A priority allocation;
 - (iii) high priority allocation;
- (b) the date announced allocations are determined; and
- (c) the value of each parameter applied for calculating the announced allocation.

7 Restrictions

- (1) The licence holder must record details of any restriction on volumes for each priority group that may be supplied, including—
 - (a) the start and end date; and
 - (b) the volume of water to be supplied.
- (2) Subsection (1) does not apply if the restriction is a result of announced allocation.

8 Carryover

The licence holder must record details of the total volume of water carried over to the water year from the previous water year.

9 Water taken by water users

The licence holder must, on an annual basis, record the total volume of water taken by each water user for each zone.

10 Seasonal water assignment of a water allocation

The licence holder, upon consent to a seasonal water assignment, must record details of seasonal water assignment arrangements, including—
(a) the name of the assignee and the assignor;

- (b) the volume of the assignment;
- (c) the location-
 - (i) from which it was assigned;
 - (ii) to which it was assigned;
- (d) the effective date of the seasonal water assignment; and
- (e) the sale price.

Division 2 Impact of infrastructure operation on natural ecosystems

11 Water quality

The licence holder must monitor and record water quality data in relation to relevant infrastructure listed in Attachment 1.

12 Bank condition

- (1) The licence holder must inspect banks for evidence of collapse and/or erosion identified within ponded areas of each storage listed in Attachment 1 and downstream reaches, following instances of—
 - (a) rapid water level changes; or
 - (b) large flows through storage, or
 - (c) other occasions when collapse and/or erosion of banks may be likely.
- (2) For subsection (1), downstream of the relevant infrastructure means the distance of influence of infrastructure operations.

13 Fish stranding

The licence holder must record and assess reported instances of fish stranding in watercourses and ponded areas associated with the operation of the infrastructure listed in Attachment 1 to determine if any instance is associated with the operation of that infrastructure.

Division 3 Data transfer

14 Transfer of data

The licence holder must, when requested by the distribution operations licence holder, transfer all data measured, collected and recorded to the distribution operations licence holder—

 (a) that is reasonably required for the distribution operations licence holder to comply with the rules and requirements of Attachment 4, part 2 of the distribution operations licence; and (b) within 15 business days of a request being made, or another timeframe if agreed to by the licence holder and distribution operations licence holder.

Part 2 Reporting requirements

15 Reporting requirements

The licence holder must provide-

- (a) annual reports for the previous water year; and
 - (b) operational or emergency reports.

Division 4 Annual reporting

16 Annual report

- (1) The licence holder must submit an annual report to the chief executive after the end of the water year.
- (2) The annual report must include—
 - (a) water quantity monitoring results required under Attachment 4, section 17;
 - (b) details of the impact of storage operation on natural ecosystems, as required under Attachment 4, section 18;
 - (c) a discussion on any issues that arose as a result of the implementation and application of the rules and requirements of this licence; and
 - (d) a summary of sale price disclosure information and other seasonal water assignment information as per Attachment 4, Part 1, Division 1(10).

17 Water quantity monitoring

The licence holder must include in the annual report-

- (a) a summary of announced allocation determinations, including-
 - (i) an evaluation of the announced allocation procedures and outcomes; and
 - (ii) the date and value for each announced allocation;
- (b) instances where any restrictions, other than an announced allocation, have been implemented including—
 - (i) an evaluation of the effectiveness of the limitation or restriction procedures and outcomes; and
 - (ii) the date and value for each restriction;
- (c) details of seasonal water assignments, including-
 - (i) the total number of seasonal water assignments; and
 - (ii) the total volume of water seasonally assigned;
- (d) a summary of carryover determinations, including-
 - (i) the total carryover to the water year from the previous water year; and
 - (ii) the total carryover from the water year to the next water year;

- (e) the total annual volume of water taken by all water users, specified by zone, including—
 - (i) the total volume of supplemented water taken;
 - (ii) the total volume of supplemented water entitled to be taken; and
 - (iii) the basis for determining the total volume entitled to be taken;
- (f) details of waterhole monitoring, which has been undertaken under Attachment 4, section 3;
- (g) details of environmental releases, specified by storage, including-
 - (i) an overview of first post-winter and seasonal base flow management strategy implementation; and
 - the date, storage level, storage inflow and storage outflow for each day during implementation of the first post-winter or seasonal base flow strategy;
- (h) all details of changes to the storage and delivery infrastructure or the operation of the storage and infrastructure that may impact on compliance with this licence;
- details of any new monitoring devices used, such as equipment to measure stream flow;
- (j) the details and status of any interim programs implemented under condition 5.2; and
- (k) the total volume of treated coal seam gas water discharged from the Woleebee Creek pipeline into Glebe Weir.

18 Impact of infrastructure operation on natural ecosystems

The licence holder must include in their annual report—

- (a) a summary of the environmental considerations made by the licence holder in making operational and release decisions;
- (b) a summary of the environmental outcomes of the decision, including any adverse environmental impacts;
- (c) a summary of bank condition and fish stranding monitoring and assessment, including—
 - results of investigations of bank slumping and/or erosion identified in the ponded areas and/or downstream of the storages;
 - (ii) results of any investigations of fish stranding downstream of the storages; and
 - (iii) changes to the operation of the storage to reduce instances of bank slumping and/or erosion or fish stranding; and
- (d) a discussion and assessment of the following water quality issues-
 - (i) thermal and chemical stratification in the storage;
 - (ii) contribution of the storage and its management to the quality of water released;
 - (iii) cyano-bacterial population changes in response to stratification in the storage; and
 - (iv) any proposed changes to the monitoring program as a result of evaluation of the data.

Division 5 Operational or emergency reporting

19 Operational or emergency reporting²

- (1) The licence holder must notify the chief executive—
 - (a) within one business day of becoming aware of any of the following operational incidents—
 - (i) non-compliance by the licence holder with the conditions of this licence;
 - (ii) instances of fish stranding, cyanobacterial growth or bank slumping within the ponded areas or downstream of the water infrastructure to which this licence relates; and
 - (iii) a decision being made to introduce a reduced full supply level under section 399B of the *Water Supply (Safety and Reliability) Act 2008*;
 - (b) of an emergency where, as a result of the emergency, the licence holder cannot comply with the conditions of the licence.
- (2) The licence holder must provide to the chief executive upon request, and within the timeframe requested, a report which includes details of—
 - (a) the incident or emergency;
 - (b) the conditions under which the incident or emergency occurred;
 - (c) any responses or activities carried out as a result of the incident or emergency; and
 - (d) in relation to an emergency only, any requirements under this licence that the licence holder is either permanently or temporarily unable to comply with due to the emergency.
- (3) The licence holder must—
 - (a) notify the chief executive within one business day-
 - (i) upon setting an initial announced allocation or resetting an announced allocation during the water year; and
 - (ii) with details of any arrangements for addressing circumstances where they are unable to supply water allocations;
 - (b) provide the chief executive with relevant supporting information used in making any decision under subsection (a)(i) and (ii).

² This does not preclude requirements for dam safety under the Water Supply (Safety and Reliability) Act 2008, Water Act 2000 and any other applicable legislation.

Attachment 5 Interim programs

1 Submission of interim program

The licence holder may, at any time, submit an interim program or an amendment to an existing program to the chief executive for approval, including a timetable for returning to full compliance with the licence and interim arrangements.

2 Implementing and publishing interim program

Following approval of the program by the chief executive, the licence holder must-

- (a) implement and operate in accordance with the approved interim program;
- (b) make public details of the approved interim program on its internet site; and
- (c) notify the distribution operations licence holder of the approved interim program.

Glossary

Term	Definition		
AHD	The Australian Height Datum, which references a level or height to a standard base level.		
AMTD	Adopted middle thread distance is the distance in kilometres, measured along the middle of the watercourse, that a specific point in the watercourse is from the watercourse's mouth; or—if the watercourse is not a main watercourse—the watercourse's confluence with its main watercourse.		
Announced allocation	For a water allocation managed under a resource operations licence, announced allocation means a number, expressed as a percentage, which is used to determine the maximum volume of water that may be taken in a water year under the authority of a water allocation.		
Assignee	The person or entity to whom an interest or right to water is being transferred – for example, seasonally assigned.		
Assignor	The person or entity who transfers an interest or right in water to an assignee – for example, a seasonal assignment.		
Carryover	The volume of water permitted to be carried over from the unused portion of the entitlement at the end of the previous water year.		
Cease to flow level	For a waterhole, the level at which water stops flowing from a waterhole over its downstream control.		
Channel system	A system of channels, canals, pumps and pipelines and other works used for the distribution of water to water users in a water supply scheme.		
	For a dam or weir, the specified minimum volume of water within the ponded area of the storage that cannot be released or used from the storage under normal operating conditions.		
Distribution operations licence holder	Distribution operations licence holder for the Theodore Channel Scheme.		
EL	Elevation level.		
Fish stranding	When fish are stranded or left out of the water on the bed or banks of a watercourse, on infrastructure such as spillways and causeways or left isolated in small and/or shallow pools, from which they cannot return to deeper water. This also applies to other aquatic species such as platypus and turtles.		
Full supply level	The specified maximum volume of water within the ponded area of a dam, weir or barrage, which corresponds to the full supply level.		
Inlet	Infrastructure comprised of an entrance channel, intake structure and gate or valve, which allows for water to be taken from the ponded area of a dam, weir or barrage and discharged via an outlet into the watercourse downstream of the storage.		
Licence holder	The holder of the resource operations licence for the Dawson Valley Water Supple Scheme		
	 For a water allocation, means— a) the zone from which water under the water allocation can be taken; or b) an AMTD within a zone, from which water under the water allocation can be taken. For a water licence—means the section of the watercourse, lake, spring or aquifer abutting or contained by the land described on the water licence at which water may be taken. For a water licence to take overland flow water —means land described on the water licence at which water licence at which water may be taken. 		
- 3 ()	One million litres.		
Outlet	An arrangement on a dam or weir that allows stored water to be released downstream.		
	Area of inundation at full supply level of a storage.		
	A grouping of water allocations for taking supplemented water from a water supply scheme with the same Water Allocation Security Objective (WASO).		
	Water from a dam or weir that passes downstream from the dam or weir through the dam or weir outlet works.		
Tailwater	The flow of water immediately downstream of a dam, weir or barrage. Tailwater includes all water passing the infrastructure – for example, controlled releases and uncontrolled overflows.		
(treated CSG water)	Means water produced during the extraction of gas from coal seams, which is treated and delivered by the Woleebee Creek to Glebe Weir pipeline to this water supply scheme.		
Water user	The holder of a valid water entitlement.		