

Works Approval

Works approval number W3012/2025/1

Works approval holder Water Corporation

Water Corporation

John Tonkin Water Centre Registered business address

629 Newcastle Street

Leederville, WA 6007

DWER file number App-0028996

Duration 11/09/2025 to 10/09/2030

Date of issue 11/09/2025

Bridgetown Water Resource Recovery Facility #2

Premises details HESTER BROOK WA 6255

Legal description -

Being Lot 10438 on Plan 153767

Prescribed premises category description (Schedule 1, <i>Environmental Protection Regulations 1987</i>)	Assessed production / design capacity
Category 54: Sewage facility	520 cubic metres per day
Category 61: Liquid waste facility	1000 tonnes per annual period

This works approval is granted to the works approval holder, subject to the attached conditions, on 11 September 2025, by:

Grace Heydon

an officer delegated under section 20 of the Environmental Protection Act 1986 (WA)

Works approval history

Date	Reference number	Summary of changes
11/09/2025	W3012/2025/1	Addition of full scale Rotating Dynamic Disk Filter (RDDF).

Interpretation

In this works approval:

- the words 'including', 'includes' and 'include' in conditions mean "including but not limited to", and similar, as appropriate;
- (b) where any word or phrase is given a defined meaning, any other part of speech or other grammatical form of that word or phrase has a corresponding meaning;
- (c) where tables are used in a condition, each row in a table constitutes a separate condition;
- (d) any reference to an Australian or other standard, guideline, or code of practice in this works approval:
 - (i) if dated, refers to that particular version; and
 - (ii) if not dated, refers to the latest version and therefore may be subject to change over time;
- (e) unless specified otherwise, any reference to a section of an Act refers to that section of the EP Act; and
- (f) unless specified otherwise, all definitions are in accordance with the EP Act.

NOTE: This works approval requires specific conditions to be met but does not provide any implied authorisation for other emissions, discharges, or activities not specified in this works approval.

Works approval conditions

The works approval holder must ensure that the following conditions are complied with:

Construction phase

Infrastructure and equipment

- **1.** The works approval holder must:
 - (a) construct and/or install the infrastructure and/or equipment;
 - (b) in accordance with the corresponding design and construction / installation requirements; and
 - (c) at the corresponding infrastructure location as set out in Table 1.

Table 1: Design and construction / installation requirements

	Infrastructure	Design and construction / installation requirements	Infrastructure location
1.	RDDF	(a) New RRDF able to treat up to 520 m³ of sewage per day and comprised of the following: i. 24 m² filter disc system, complete with mixing and scour aeration, installed in two concrete tanks; structure comprising 8 disks x 3 m²; ii. Feed pump station including aeration; iii. Filter backwash systems; iv. Bunded chemical storage and dosing for: Poly-aluminium chloride; and Sodium Hypochlorite. V. Service water storage tank and relocated service water pumpstation; vi. 300 kL reuse contact tank for chlorine disinfection; and vii. Associated ancillary services, interconnecting pipework, valves, electrical instrumentation and control and operational technology. (b) New RDDF facility must be able to treat sewage to the following discharge limit: (i) Total Suspended Solids (TSS) <20 mg/L. (c) Above ground infrastructure must be located on a concrete hardstand.	
		 (d) All sewage storage and treatment tanks, vessels, transfer pipelines and conveyance infrastructure must be impermeable and free of leaks or defects. (e) Must be constructed to prevent stormwater from 	
		entering the sewage treatment system and storage infrastructure.	

	Infrastructure	Design and construction / installation requirements	Infrastructure location
2.	Existing clarification zone	To be re-purposed and retained as emergency off-line storage zone.	Figures 1 and 2 of Schedule 1

Compliance reporting

- 2. The works approval holder must within 30 calendar days of an item of infrastructure or equipment required by condition 1 being constructed and/or installed:
 - (a) undertake an audit of their compliance with the requirements of condition 1 and
 - (b) prepare and submit to the CEO an Environmental Compliance Report on that compliance.
- **3.** The Environmental Compliance Report required by condition 2, must include as a minimum the following:
 - (a) certification by a civil engineer that the items of infrastructure or component(s) thereof, as specified in condition 1, have been constructed in accordance with the relevant requirements specified in condition 1;
 - (b) as constructed plans and a detailed site plan for each item of infrastructure or component of infrastructure specified in condition 1; and
 - (c) be signed by a person authorised to represent the works approval holder and contains the printed name and position of that person.

Environmental commissioning phase

Environmental commissioning requirements and emission limits

- 4. The works approval holder may only commence environmental commissioning of an item of infrastructure listed in condition 5 once the Environmental Compliance Report has been submitted for that item of infrastructure in accordance with condition 3 of this works approval.
- **5.** Any environmental commissioning activities undertaken for an item of infrastructure specified in Table 2 may only be carried out:
 - (a) in accordance with the corresponding commissioning requirements; and
 - (b) for the corresponding authorised commissioning duration.

Table 2: Environmental commissioning requirements

Infrastructure	Commissioning requirements	Authorised commissioning duration
RDDF	 a) No more than 520 m³ of TWW is discharged per day; 	For a period not exceeding 180 calendar days in
	 Sludge is transferred to the sludge drying beds; 	aggregate.
	 Bunds must be maintained and repaired to ensure uncontaminated stormwater is directed away from the bund; 	

Infrastructure	Con	nmissioning requirements	Authorised commissioning duration
	d)	In the event of a leak/spill, the source will be isolated, and any contaminated soil remediated or disposed of to an appropriately licensed facility; and	
	e)	Chemicals are stored in accordance with Australian Standard AS3780-2008 Storage and Handling of Corrosive Substances.	

Monitoring during environmental commissioning

6. During environmental commissioning, the works approval holder must ensure that the emission specified in Table 3, is discharged only from the corresponding discharge point(s) and only at the corresponding discharge point location.

Table 3: Authorised discharge points during commissioning

Emission	Discharge point	Discharge point location
TWW	S2 As shown in Figure 1 of Schedule	

7. The works approval holder must monitor emissions during environmental commissioning in accordance with Table 4.

Table 4: Emissions and discharge monitoring during environmental commissioning

Emission point reference	Monitoring point reference	Parameter	Units	Averaging Period	Frequency
S1	Magflow meter at inlet to the IDEA basin	Volumetric flow rate (cumulative)	L/s or m³/day	Monthly	Continuous
		Volumetric flow rate (cumulative)	L/s or m³/day	Monthly	Continuous
		pH ¹	pH units		
	Magflow meter to Bridgetown Golf Club	Biological Oxygen Demand Total Dissolved solids Total suspended	- mg/L	Spot sample	Monthly
S2		solids Nitrate + Nitrite nitrogen			
		Ammonium nitrogen			
		Total Nitrogen			
		Total Phosphorus			
		Escherchia coli	cfu/100 mL		

Note 1: In-field non-NATA accredited analysis permitted.

- **8.** For the monitoring activity required by condition 7, the works approval holder must:
 - (a) record the results;
 - (b) handle and preserve all water samples collected during the monitoring of the WWTP in accordance with AS 5667.1 and AS 5667.10; and

(c) have analysis conducted by a laboratory with current National Association of Testing Authorities (NATA) accreditation for the parameters specified.

Environmental Commissioning Report

- 9. The works approval holder must submit to the CEO an Environmental Commissioning Report within 30 calendar days of the completion date of environmental commissioning for each item of infrastructure specified in Table 2.
- **10.** The works approval holder must ensure the Environmental Commissioning Report required by condition 9 of this works approval includes the following:
 - (a) a summary of the commissioning activities, including date(s) for commencement of commissioning, timeframes and amount of wastewater processed;
 - (b) a summary of wastewater monitoring results recorded in accordance with condition 7:
 - (c) copies of laboratory reports for wastewater monitoring results recorded in accordance with condition 8;
 - (d) a summary of the environmental performance of each item of infrastructure or equipment as installed, which at minimum includes:
 - (i) a comparison of the wastewater monitoring results against discharge limits specified in condition 15; and
 - (ii) assessment of the RDDF performance against operational requirements in condition 5;
 - (e) a review of the works approval holder's performance and compliance against the conditions of this works approval; and
 - (f) where they have not been met, measures proposed to meet the manufacturer's design specifications and the conditions of this works approval, together with timeframes for implementing the proposed measures.

Time limited operations phase

Commencement and duration

- 11. The works approval holder may only commence time limited operations for an item of infrastructure identified in condition 13 where the Environmental Commissioning Report for that item of infrastructure as required by condition 9 has been submitted by the works approval holder.
- **12.** The works approval holder may conduct time limited operations for an item of infrastructure specified in condition 13:
 - (a) for a period not exceeding 180 calendar days from the day the works approval holder meets the requirements of condition 10 for that item of infrastructure; or
 - (b) until such time as a registration or licence for that item of infrastructure is granted in accordance with Part V of the *Environmental Protection Act 1986* and only where this occurs prior to the time period specified in sub provision (a).

Time limited operations requirements and emission limits

13. During time limited operations, the works approval holder must ensure that the premises infrastructure and equipment listed in Table 5 and located at the

corresponding infrastructure location is maintained and operated in accordance with the corresponding operational requirement set out in Table 5.

Table 5: Infrastructure and equipment requirements during time limited operations

Infrastructure	Operational requirement	Infrastructure location
	a) No more than 520 m³ of TWW is discharged per day;	
	b) Sludge is transferred to the sludge drying beds;	
RDDF	 c) Bunds must be maintained and repaired to ensure uncontaminated stormwater is directed away from the bund; 	As shown in Figure 2 of
	 d) In the event of a leak/spill, the source will be isolated, and any contaminated soil remediated or disposed of to an appropriately licensed facility; and 	Schedule 1
	e) Chemicals are stored in accordance with Australian Standard AS3780-2008 Storage and Handling of Corrosive Substances.	

14. During time limited operations, the works approval holder must ensure that the emission specified in Table 6, is discharged only from the corresponding discharge points and only at the corresponding discharge point location.

Table 6: Authorised discharge points during time limited operations

Emission	Discharge point	Discharge point location
TWW	S2 As shown in Figure 1 of Schedule 1	

Monitoring during time limited operations

15. During time limited operations, the works approval holder must ensure that the emissions from the discharge point listed in Table 7 does not exceed the corresponding limit(s) when monitored in accordance with condition 16.

Table 7: Emission and discharge limits during time limited operations

Discharge point	Parameter	Concentration limit
S2	Total suspended solids	20 mg/L

16. The works approval holder must monitor emissions during time limited operations in accordance with Table 8.

Table 8: Emissions and discharge monitoring during time limited operations

Emission point reference	Monitoring point reference	Parameter	Units	Averaging Period	Frequency
S1	Magflow meter at inlet to the IDEA basin	Volumetric flow rate (cumulative)	L/s or m³/day	Monthly	Continuous
S2		Volumetric flow rate (cumulative)	L/s or m³/day	Monthly	Continuous

		pH ¹	pH units		
		Biological Oxygen	- mg/L	Spot sample	Monthly
		Demand			
		Total Dissolved			
		solids			
		Total suspended			
	Magflow meter to	solids			
	Bridgetown Golf	Nitrate + Nitrite			
	Club	nitrogen			
		Ammonium			
		nitrogen			
		Total Nitrogen			
		Total Phosphorus			
		Escherchia coli	cfu/100 mL		

Note 1: In-field non-NATA accredited analysis permitted.

- 17. For the monitoring activity required by condition 16, the works approval holder must:
 - (a) record the results;
 - (b) handle and preserve all water samples collected during the monitoring of the WWTP in accordance with AS 5667.1 and AS 5667.10; and
 - (c) have analysis conducted by a laboratory with current National Association of Testing Accreditation (NATA) for the parameters specified.

Compliance reporting

- 18. The works approval holder must submit to the CEO a report on the time limited operations within 30 calendar days of the completion date of time limited operations or 30 calendar days before the expiration date of the works approval, whichever is the sooner.
- **19.** The works approval holder must ensure the report required by condition 18 includes the following:
 - (a) a summary of the time limited operations, including date(s) for commencement of time limited operations, timeframes and amount of wastewater processed;
 - (b) a summary of monitoring parameter results obtained during time limited operations under condition 16;
 - (c) copies of laboratory reports for blended effluent monitoring results recorded in accordance with condition 17;
 - (d) a summary of the environmental performance of each item of infrastructure or equipment as installed, which at minimum includes:
 - (i) a comparison of the wastewater monitoring results against discharge limits specified in condition 15: and
 - (ii) assessment of the RDDF performance against operational requirements in condition 13;
 - (e) a review of performance and compliance against the conditions of the works approval and the Environmental Commissioning Report; and
 - (f) where the specifications and the conditions of this works approval have not been met, what measures will the works approval holder take to meet them, and what timeframes will be required to implement those measures.

Records and reporting (general)

- **20.** The works approval holder must record the following information in relation to complaints received by the works approval holder (whether received directly from a complainant or forwarded to them by the Department or another party) about any alleged emissions from the premises:
 - (a) the name and contact details of the complainant, (if provided);
 - (b) the time and date of the complaint;
 - (c) the complete details of the complaint and any other concerns or other issues raised; and
 - (d) the complete details and dates of any action taken by the works approval holder to investigate or respond to any complaint.
- **21.** The works approval holder must maintain accurate and auditable books including the following records, information, reports, and data required by this works approval:
 - (a) the works conducted in accordance with condition 1;
 - (b) any maintenance of infrastructure that is performed in the course of complying with condition 5 and 13:
 - (c) monitoring programmes undertaken in accordance with condition(s) 7 and 16; and
 - (d) complaints received under condition 20.
- **22.** The books specified under condition 21 must:
 - (a) be legible;
 - (b) if amended, be amended in such a way that the original version(s) and any subsequent amendments remain legible and are capable of retrieval;
 - (c) be retained by the works approval holder for the duration of the works approval; and
 - (d) be available to be produced to an inspector or the CEO as required.

Definitions

In this works approval, the terms in Table 9 have the meanings defined.

Table 9: Definitions

Term	Definition		
AS3780-2008	means Australian Standard AS3780-2008 Storage and Handling of Corrosive Substances		
AS 5667.1	means Australian Standard 5667.1 Water quality - Sampling		
AS 5667.10	means Australian Standard 5667.10 Water quality - Sampling Guidance on sampling of waste waters		
books	has the same meaning given to that term under the EP Act.		
CEO	means Chief Executive Officer. CEO for the purposes of notification means: Director General Department administering the Environmental Protection Act		
	1986 Locked Bag 10 Joondalup DC WA 6919 info@dwer.wa.gov.au		
cfu	means colony forming units.		
Department	means the department established under section 35 of the <i>Public Sector Management Act 1994</i> and designated as responsible for the administration of Part V Division 3 of the EP Act.		
discharge	has the same meaning given to that term under the EP Act.		
emission	has the same meaning given to that term under the EP Act.		
environmental commissioning	means the sequence of activities to be undertaken to test equipment integrity and operation, or to determine the environmental performance, of equipment and infrastructure to establish or test a steady state operation and confirm design specifications.		
Environmental Commissioning Report	means a report on any commissioning activities that have taken place and a demonstration that they have concluded, with focus on emissions and discharges, waste containment, and other environmental factors.		
Environmental Compliance Report	means a report to satisfy the CEO that the conditioned infrastructure and/or equipment has been constructed and/or installed in accordance with the works approval.		
EP Act	Environmental Protection Act 1986 (WA).		

Term	Definition		
EP Regulations	Environmental Protection Regulations 1987 (WA).		
premises	the premises to which this works approval applies, as specified at the front of this works approval and as shown on the premises map in Schedule 1 to this works approval.		
prescribed premises	has the same meaning given to that term under the EP Act.		
RDDF	means Rotating Dynamic Disk Filter.		
NATA	means National Association of Testing Authorities.		
NATA accreditation	means in relation to the analysis of a sample that the laboratory is NATA accredited for the specified analysis at the time of the analysis.		
suitably qualified engineer	means a suitably qualified civil or structural engineer who: - holds a Bachelor of Engineering recognised by Engineers Australia; and - has a minimum of five years of experience working in a supervisory area of civil engineering.		
time limited operations	refers to the operation of the infrastructure and equipment identified under this works approval that is authorised for that purpose, subject to the relevant conditions.		
TWW	means treated wastewater.		
waste	has the same meaning given to that term under the EP Act.		
works approval	refers to this document, which evidences the grant of the works approval by the CEO under section 54 of the EP Act, subject to the conditions.		
works approval holder	refers to the occupier of the premises being the person to whom this works approval has been granted, as specified at the front of this works approval.		

END OF CONDITIONS

Schedule 1: Maps

Premises map

The boundary of the prescribed premises is shown in the map below in red.

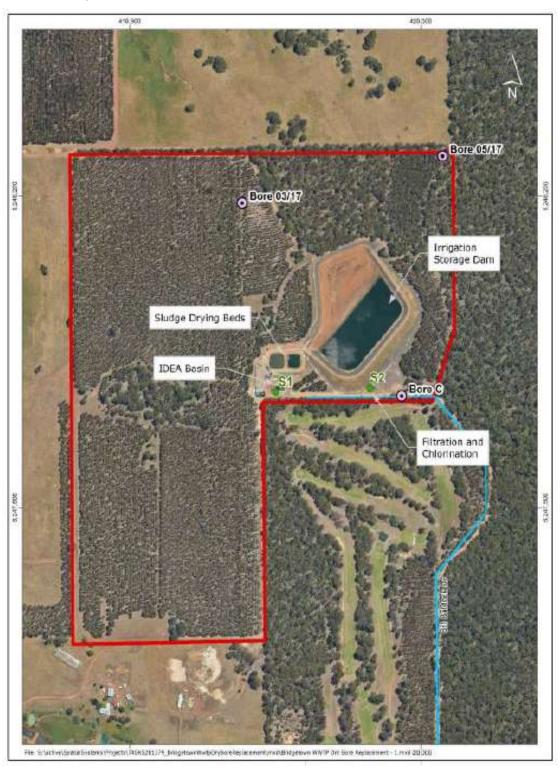


Figure 1: Premises map

Premises layout map



Figure 2: Premises layout