



Department of Biodiversity,
Conservation and Attractions



Biodiversity and
Conservation Science

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Swan Canning Estuary Water Quality Monitoring Project

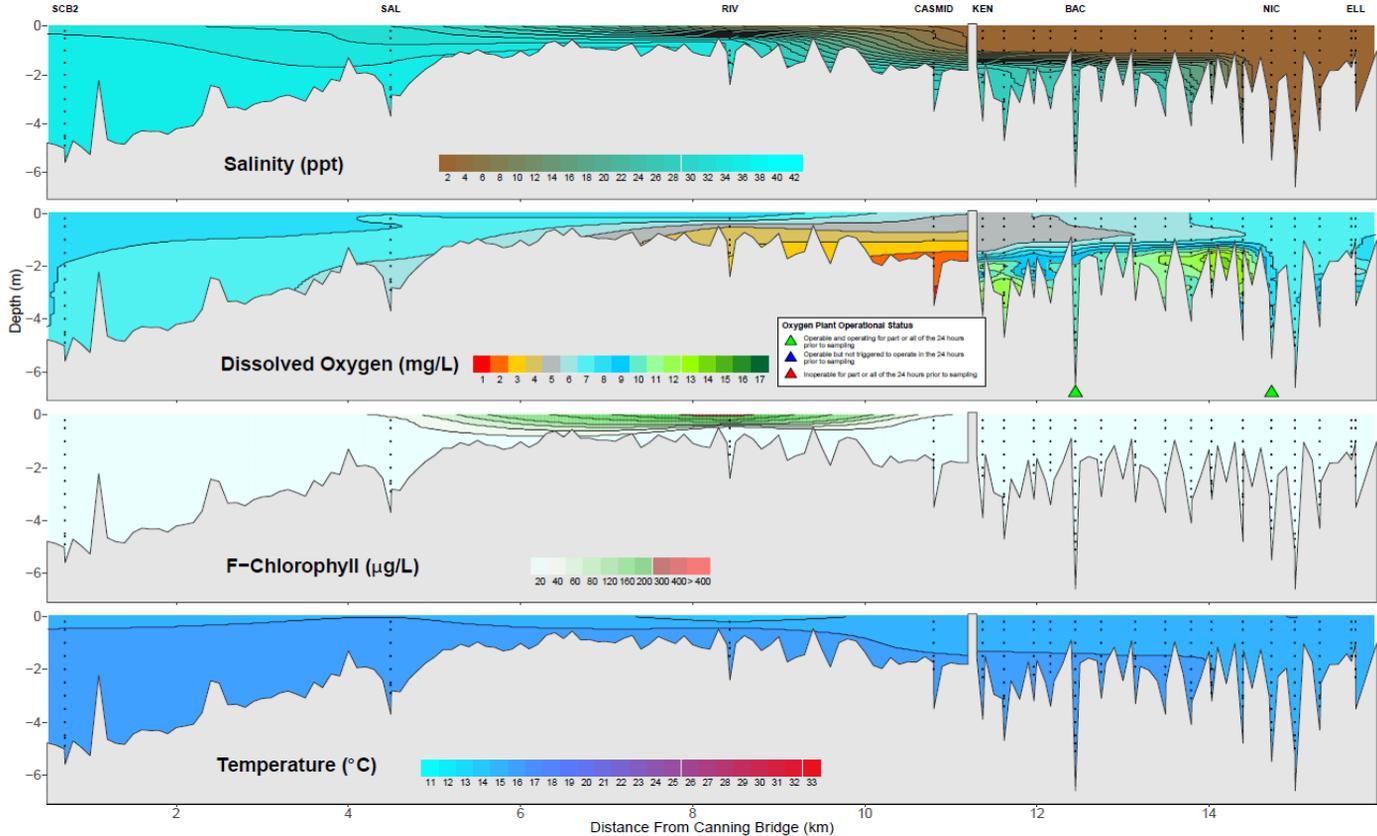
Weekly Profile Report for the Canning Estuary and Lower Canning River

27th May 2020

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Canning River Estuary - Physical-Chemical Profile - 27th May 2020



Date: 27th May 2020

NB: Sampling was delayed due to unfavourable conditions and a substantial storm surge on 25th April 2020.

Weather & tide conditions: Conditions were overcast with a predominantly variable breeze of up to 5 knots. The predicted tide at Barrack St was 1.22 m at 1:32 pm (high tide). Flow was observed at Kent St Weir. Gosnells recorded 34.8 mm of rainfall during the week prior to sampling (Bureau of Meteorology).

NB: Kent Street Weir was overtopped on 25th May 2020 due to the storm surge and multiple gates were opened on 27th April 2020 due to maintenance.

Oxygenation: The Nicholson Rd and Bacon St oxygenation plants were both triggered to provide oxygen in the 24 hours prior to sampling.

Canning Estuary (downstream of Kent St Weir): The Canning Estuary was saline from SCB2 to SAL, brackish over saline at RIV and fresh over brackish at CASMID. Surface waters were oxygenated or well oxygenated and bottom waters were low in oxygen at RIV and hypoxic at CASMID. Chlorophyll fluorescence was highest at RIV indicating higher microalgal activity in that area. Water temperature ranged from 14.0 to 15.6 °C.

Lower Canning River (upstream of Kent St Weir): The Lower Canning River was fresh over saline between KEN and BAC, fresh over brackish from BACU300 to NICD200 and fresh from NIC to ELL. Waters were oxygenated or well oxygenated and chlorophyll fluorescence was low throughout this zone. Water temperature ranged from 14.3 to 15.7 °C.

NB: Profile plots are visual interpolations of measured parameters only. Detailed data are available at wir.water.wa.gov.au.

Oxygenation Plant Operational Status:

- ▲ Operating for part or all of the 24 hours prior to sampling
- ▲ Operable but not triggered to operate in the 24 hours prior to sampling
- ▲ Inoperable for part or all of the 24 hours prior to sampling

Definitions:

Salinity – fresh <5, brackish 5-25, saline 25-35, hypersaline >35
Dissolved oxygen – well oxygenated >6mg/L, oxygenated >4-6mg/L, low oxygen >2-4mg/L, hypoxic 0.5-2mg/L, anoxic <0.5mg/L