



**Environmental Monitoring and Reporting  
Swan River Estuary ~ Weekly profile**

by  
**Water Science Branch, Department of Water**

Date: Monday 14<sup>th</sup> March 2016

Weather & tide conditions: Conditions were fine with up to 20% cloud cover and a predominantly east to north easterly breeze of up to 12.8 knots. The predicted tides at Guildford were 0.63 m (low tide) at 05:10 and 1.00 m (high tide) at 15:28. Perth recorded 0 mm of rainfall during the week prior to sampling (Bureau of Meteorology).

Oxygenation: The Guildford and Caversham oxygenation plants were operational the week prior to sampling.

Lower Swan/Canning Estuary (BLA to NAR): The Lower Swan Estuary was hyper saline throughout. Water was well oxygenated from BLA to HEA and oxygenated at NAR. Water temperature ranged from 24.1 to 25.2 °C.

Middle Swan Estuary (NIL to RON): The Middle Swan Estuary was hyper saline at NIL and saline at STJ to RON. Surface water was well oxygenated over oxygenated bottom water at all sites. Water temperature ranged from 25.5 to 26.4 °C.

Upper Swan Estuary (BWR10 to POL): The Upper Swan Estuary was saline from BWR10 to VIT, brackish from MEA to POL while at SUC surface water was brackish over saline bottom water. Water was well oxygenated to oxygenated at all sites with the exception low oxygen water at JBC, low oxygen bottom water at SUC, WMP, REG and low oxygen surface water over hypoxic water bottom at MSB and POL. Water temperature ranged from 25.7 to 27.2 °C.

**Definitions:**

Salinity – fresh <5ppt, brackish 5-25ppt, saline 25-35ppt, hypersaline >35ppt

Dissolved oxygen – well oxygenated >6 mg/L  
oxygenated >4 to 6 mg/L, low oxygen >2 to 4 mg/L,  
hypoxic >0.5 to 2.0 mg/L, near anoxic <0.5 mg/L

# Swan River Estuary - Physical-chemical Profile - 14th March 2016

