



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

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

Date: Monday 13th April 2015

Weather & tide conditions: Conditions were fine with up to 50% cloud cover and a south to south easterly breeze of up to 4 knots. The predicted tides at Guildford were 0.65 m (low tide) at 04:13 and 1.03 m (high tide) at 16:57. Perth recorded 53.4 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 hypersaline throughout with the exception of saline surface water at NAR. Water was well oxygenated throughout at all sites. Water temperature ranged from 20.3 to 20.8 °C.

Middle Swan Estuary (NIL to RON): The Middle Swan Estuary was saline throughout with the exception of brackish surface water at RON. Surface water was well oxygenated at all sites, while bottom water was well oxygenated at NIL, low in oxygen at STJ and MAY, and hypoxic at RON. Water temperature ranged from 20.9 to 22.0 °C.

Upper Swan Estuary (BWR10 to POL): The Upper Swan Estuary was brackish throughout with the exception of saline bottom water at WMP, SUC and from BWR10 to KMO. Water was well oxygenated to oxygenated at all sites except for low oxygenated bottom water at BWR10, KMO, WMP and from REG to POL, and hypoxic bottom water at KIN. Water temperature ranged from 20.3 to 21.9 °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 - 13th April 2015

