

Cosmeston_Lake___Water_Quality_Report

Parameter	Your Result	Public Health Threshold	Interpretation
Ammonia (NH₃-N)	0.04 mg/L	<0.2 mg/L (good); <1.0 mg/L (tolerable)	✔ Well below thresholds — safe for swimmers
Un-ionised Ammonia	<0.001 mg/L	<0.02 mg/L (chronic); <0.05 mg/L (acute)	✔ Extremely low — non-toxic level
Nitrite (NO₂⁻)	<0.01 mg/L	<0.05 mg/L (low); >0.1 mg/L (caution)	✔ Very low — no public health concern
Nitrate (NO₃⁻)	3.1 mg/L	<10 mg/L (ideal); 50 mg/L (WHO drinking water limit)	✔ Low — safe for bathing
Phosphate (PO₄³⁻)	0.06 mg/L	<0.1 mg/L (low nutrient); <0.3 mg/L (eutrophic)	✔ Low — unlikely to trigger algal blooms
Chromium	<1.0 µg/L	<50 µg/L (WHO drinking water)	✔ Very low — safe for swimmers
Nickel	1.8 µg/L	<20 µg/L (EQS); 70 µg/L (WHO DW)	✔ Very low — no health concern
Arsenic	<1.0 µg/L	<10 µg/L (WHO DW)	✔ Well below safety limit
Cadmium	<0.12 µg/L	<5 µg/L (WHO DW); 0.08–0.25 µg/L (EQS)	✔ Acceptably low — within safe range
Mercury	<0.04 µg/L	<1 µg/L (WHO DW); 0.05 µg/L (EQS)	✔ Low and safe — no risk to bathers
Lead	<0.09 µg/L	<10 µg/L (WHO DW)	✔ Extremely low — safe for public exposure