

ALGAL REPORT

CLIENT :	Australian Laboratory Services Pty Ltd SA
LABORATORY NO./BATCH NO. :	6956313 21-18638
LOCALITY :	EM2106129-010
SITE :	Villa de Yumpa
SAMPLE :	Surface
DATE SAMPLED :	7/04/2021
DATE ANALYSED :	14/04/2021
SAMPLED BY :	Sample analysed as received

COMMENTS: + A diverse algal community was observed, with low-biovolume BGA being most numerous. Current BGA levels are sufficient to impact water quality.

Sedgewick-Rafter Vol.(ml)	1.0208	Toxigenic (T) or Potentially toxic (P)	- 200x	- 100x	Total Cell Count (cells/mL)	Individual Algal Unit Volume (um3)	Total Biovolume (mm3/L)
Concentration	1 : 1	*	20	500			
Magnification							
Fields							

BACILLARIOPHYCEAE

Centrales		1	0	49	200	0.00980
Nitzschia		40	0	1959	400	0.78370
Pennales		1	0	49	300	0.01469
Pennales (small <20um)		35	0	1714	251	0.43030
Pleurosigma		0	3	6	2000	0.01176

CHLOROPHYCEAE

Ankistrodesmoideae		155	0	7592	132	1.00216
Chlorococcoids		990	0	48491	500	24.24569

CRYPTOPHYCEAE

Cryptomonads		9	0	441	320	0.14107
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CYANOPHYCEAE

Planktolyngbya		8	0	392	3.8	0.00149
Synechococcales small (iauv <20)		10100	0	494710	5.25	2.59723

DINOPHYCEAE

Dinoflagellates		14	0	686	20000	13.71473
Gymnodiniales		3	0	147	2000	0.29389

OTHER PHYTOPLANKTON

Other small flagellates		15	0	735	80	0.05878
Prasinophytes		2	0	98	100	0.00980

TOTAL BGA	495102	2.59872
TOTAL TOXIGENIC BGA	0	0.00000
TOTAL POTENTIALLY TOXIC BGA	0	0.00000
TOTAL ALGAE	557069	43.31507

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+ The comments are discretionary and are for the purpose of helping to understand WQ implications. The comments are not accredited by NATA.

The biovolume values reported are those derived from documented information, including scientific literature. These are average values and not those measured on individual samples.

A Certificate of analysis will follow, linked by the above batch number. Independent algal reports are forwarded to clients expeditiously to facilitate operational decision making.

* P's and T's denote those cyanobacteria/blue-green algae (BGA) associated with toxin production in Australian waters. Overseas studies have shown other cyanobacteria to produce toxins. All contain lipopolysaccharides (LPS) in their cell wall and many have been found to produce β -N-methylamino-L-alanine (BMAA) and its analogues. Therefore all cyanobacteria could be considered to pose a level of risk.

ANALYST: **Kirsten Mudie (signatory)**
Biologist

REVIEWED: **Louise Ungemach (signatory)**
Biologist

DATE: **15/04/2021**

METHOD NO.: MB010/MW024VCA

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