

ALGAL REPORT

CLIENT :	Australian Laboratory Services Pty Ltd SA
LABORATORY NO./BATCH NO. :	7241921 21-55807
LOCALITY :	EM2123012-022
SITE :	Villa de Yumpa
SAMPLE :	Surface
DATE SAMPLED :	16/11/2021
DATE ANALYSED :	22/11/2021
SAMPLED BY :	Sample analysed as received

COMMENTS: + A diverse range of algal taxa was observed. Current excessive levels of low biovolume BGA Synechococcales will impact water quality.

Sedgewick-Rafter Vol.(ml)	1.036	Toxicogenic (T) or Potentially toxic (P)	- 200x	- 100x	Total Cell Count (cells/mL)	Individual Algal Unit Volume (um ³)	Total Biovolume (mm ³ /L)
Concentration	1 : 1	*	20	500			
Magnification							
Fields							

BACILLARIOPHYCEAE

Centrales	2	0	97	200	0.01931
Chaetoceros	3	0	145	200	0.02896
Pennales	4	0	193	300	0.05792

CHLOROPHYCEAE

Ankistrodesmoideae	468	0	22587	132	2.98147
Chlorococcoids (<10um)	1290	0	62259	60	3.73552

CYANOPHYCEAE

Synechococcales small (iauv <20)	30080	0	1451737	5.25	7.62162
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DINOPHYCEAE

Gymnodiniales	2	0	97	2000	0.19305
Gymnodiniales (small)	1	0	48	500	0.02413

OTHER PHYTOPLANKTON

Other small flagellates	11	0	531	80	0.04247
Raphidophytes	0	12	23	7000	0.16216

TOTAL BGA	1451737	7.62162
TOTAL TOXIGENIC BGA	0	0.00000
TOTAL POTENTIALLY TOXIC BGA	0	0.00000
TOTAL ALGAE	1537717	14.86660

+ 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: *Adam Deliyiannis (signatory)* REVIEWED: *Kirsten Mudie (signatory)*
Biologist Biologist

DATE: **23/11/2021**

METHOD NO.: MB010/MW024VCA

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