ALS Water
22 Dalmore Drive Scoresby 3179
Tel. 03 8756 8183 Fax. 03 9763 1862

ALGAL REPORT

CLIENT :	Australian Laboratory Services Pty Ltd SA
LABORATORY NO./BATCH NO. :	7281158 21-59669
LOCALITY :	EM2125413-017
SITE :	DS Tauwitchere
SAMPLE :	Surface
DATE SAMPLED :	13/12/2021
DATE ANALYSED :	20/12/2021
SAMPLED BY :	Sample analysed as received

COMMENTS: + Excessive levels of small BGA will impair water quality and may pose a health risk.

Sedgewick-Rafter Vol.(ml) 1.0011 **Concentration** 1 : 1 **Magnification** **Fields**	**Toxigenic (T) or Potentially toxic (P)** *	- 200x 20	- 100x 500	**Total Cell Count (cells/mL)**	**Individual Algal Unit Volume (um3)**	**Total Biovolume (mm3/L)**
BACILLARIOPHYCEAE						
Centrales		4	0	200	200	0.03996
Naviculales		1	0	50	1400	0.06992
Nitzschia		1	0	50	400	0.01998
Pennales		4	0	200	300	0.05993
CHLOROPHYCEAE						
Ankistrodesmus		8	0	400	132	0.05274
Botryococcus		0	420	839	98	0.08223
Chlorococcoids (<10um)		52	0	2597	60	0.15583
Colonial green (cells)		62	0	3097	100	0.30966
Crucigenia		320	0	15982	30	0.47947
Dictyosphaerium		24	0	1199	20	0.02397
Didymocystis		16	0	799	41	0.03276
Dimorphococcus		10	0	499	20	0.00999
Elakatothrix		1	0	50	45	0.00225
Eremosphaera		0	2	4	700	0.00280
Filamentous Green		31	0	1548	386	0.59764
Lagerheimia		12	0	599	500	0.29967
Monoraphidium (small)		40	0	1998	16	0.03196
Monoraphidium (large)		1	0	50	400	0.01998
Nephrocytium		2	0	100	200	0.01998
Oocystis		156	0	7791	300	2.33743
Pediastrum		4	0	200	60	0.01199
Planctonema		300	0	14984	800	11.98681
Scenedesmus		76	0	3796	250	0.94896
Selenastrum		2	0	100	250	0.02497

ANALYST: ***Kirsten Mudie (signatory)*** REVIEWED: ***Adam Deliyiannis (signatory)*** DATE: **22/12/2021**
Biologist **Biologist**

METHOD NO.: MB010/MW024VCA

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Tetraedron		1	0	50	150	0.00749
Tetrastrum		48	0	2397	40	0.09589
CRYPTOPHYCEAE						
Cryptomonads		1	0	50	320	0.01598
CYANOPHYCEAE						
Chrysosporum bergii	T	0	12	24	85	0.00204
Cuspidothrix issatschenkoi		0	209	418	57	0.02380
Limnolyngbya (Planktolyngbya circumcreta)		2072	0	103486	4.9	0.50708
Planktolyngbya		2412	0	120467	3.8	0.45778
Synechococcales small (iauv <20)		2770	0	138348	5.25	0.72633
			TOTAL BGA	**362743**		**1.71702**
			TOTAL TOXIGENIC BGA	**24**		**0.00204**
			TOTAL POTENTIALLY TOXIC BGA	**0**		**0.00000**
			TOTAL ALGAE	**422372**		**19.45728**

+ 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)*** REVIEWED: ***Adam Deliyiannis (signatory)*** DATE: **22/12/2021**
Biologist **Biologist**

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