TABLE 2: BLAYNEY WASTE DISPOSAL DEPOT - RESULTS OF LABORATORY ANALYSIS
APRIL 2023 **GROUNDWATER**

					Sample ID	BH1	BH2	BH4	BH6	BH6B	BH9	BH10	BH12
					Sample Date / Time	18/04/2023	18/04/2023	18/04/2023	18/04/2023	18/04/2023	18/04/2023	18/04/2023	18/04/2023
Group	**Analyte**	**LOR**	**Units**	**Criteria**		PS	PS	PS	PS	PS	PS	PS	PS
Physical Parameters	pH (Lab)	0	No unit	6.0 - 8.5		**6.9**	**6.8**	**6.6**	**6.4**	**6.4**	**6.6**	**5.8**	**6.7**
	Electrical Conductivity (Lab)	2	µS/cm	4478		**670**	**2700**	**4500**	**8800**	**9400**	**720**	**5400**	**2400**
	Biochemical Oxygen Demand (BOD5)	5	mg/L	-		< 5	< 5	< 5	< 5	< 5	< 5	< 5	< 5
Alkalinity	Total Alkalinity as CaCO3	5	mg/L	350		**290**	**470**	**450**	**480**	**520**	**130**	**140**	**340**
Anions	Chloride	1	mg/L	350		**57**	**790**	**1200**	**3200**	**3500**	**170**	**2100**	**410**
	Fluoride	0.1	mg/L	1		< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1
	Sulfate (SO4)	1	mg/L	1000		**18**	**68**	**270**	**210**	**190**	**34**	**43**	**350**
Cations	Calcium (Ca)	0.2	mg/L	1000		**63**	**220**	**340**	**910**	**950**	**57**	**430**	**210**
	Magnesium (Mg)	0.1	mg/L	-		**40**	**180**	**300**	**570**	**620**	**48**	**370**	**170**
	Potassium (K)	0.1	mg/L	-		**1.2**	**2.1**	**2.4**	**1.6**	**1.1**	**2.1**	**1.7**	**1.7**
	Sodium (Na)	0.5	mg/L	230		**43**	**84**	**160**	**150**	**180**	**18**	**70**	**84**
Forms of Carbon	Total Organic Carbon	0.2	mg/L	-		**1.1**	**3.3**	**6.5**	**4**	**5.8**	**2.7**	**2.3**	**16**
Nutrients	Ammonia (NH3) as N	0.01	mg/L	-		< 0.01	< 0.01	< 0.01	**0.03**	**0.06**	**0.05**	**0.02**	< 0.01
	Nitrate (NO3) as N	0.005	mg/L	-		**2.5**	**1.4**	**10**	-	< 0.005	< 0.005	< 0.005	**37**
	Nitrate (NO3) as N	0.05	mg/L	-		-	-	-	< 0.05	-	-	-	-
Trace Metals	Copper (Cu)	0.001	mg/L	0.2		**0.001**	**0.003**	**0.014**	**0.002**	**0.002**	**0.017**	**0.006**	**0.005**
	Iron (Fe)	0.005	mg/L	0.2		**0.006**	< 0.005	< 0.005	**0.006**	< 0.005	**0.057**	**0.094**	< 0.005
	Manganese (Mn)	0.001	mg/L	0.2		**0.002**	**0.011**	**0.2**	**0.69**	**1.8**	**0.62**	**2.6**	**0.025**
	Mercury (Hg)	0.0001	mg/L	0.002		< 0.0001	**0.0023**	**0.0001**	< 0.0001	**0.0002**	< 0.0001	< 0.0001	**0.0001**
Phenolics	Total Phenols	0.05	mg/L	-		< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05

mg/L	milligrams per litre
µS/cm	microsiemens per centimetre
LOR	limit of reporting
PS	primary sample
Criteria	Criteria adopted from *Australian and New Zealand Environment and Conservation Council (ANZECC) Agriculture and Resource Management Council of Australia and New Zealand (ARMCANZ) Australian and New Zealand Guidelines for Fresh and Marine Water Quality* - 'Primary Industries: Water quality for irrigation and general water use'
	within criteria
	criteria exceeded

TABLE 3: BLAYNEY WASTE DISPOSAL DEPOT - RESULTS OF LABORATORY ANALYSIS
DECEMBER 2022 - MAY 2023 **SURFACE WATER**

				Sample ID	SW1	SW1	SW1	SW1
				Sample Date / Time	19/12/2022	31/03/2023	19/04/2023	02/05/2023
Group	**Analyte**	**LOR**	**Units**	**Criteria**	PS	PS	PS	PS
Physical Parameters	pH (Lab)	0	No unit	6.5 - 8.5	**8.1**	**7.7**	**8**	**7.7**
	Electrical Conductivity (Lab)	2	µS/cm	4478	**2100**	**2200**	**2500**	**2000**
	Biochemical Oxygen Demand (BOD5)	5	mg/L	-	< 5	< 5	< 5	< 5
	Total Suspended Solids	5	mg/L	30	**8**	**15**	**83**	**10**
Alkalinity	Total Alkalinity as CaCO3	5	mg/L	350	**280**	**280**	**260**	**210**
Anions	Chloride	0.05	mg/L	350	**480**	-	-	-
	Chloride	1	mg/L	350	-	**570**	**690**	**500**
	Fluoride	0.1	mg/L	1	**0.13**	< 0.1	< 0.1	< 0.1
	Sulfate (SO4)	1	mg/L	1000	**44**	**43**	**63**	**56**
Cations	Calcium (Ca)	0.1	mg/L	1000	-	-	-	**96**
	Calcium (Ca)	0.2	mg/L	1000	**99**	**110**	**110**	-
	Magnesium (Mg)	0.1	mg/L	-	**110**	**110**	**140**	**110**
	Potassium (K)	0.1	mg/L	-	**4.8**	**12**	**11**	-
	Potassium (K)	0.2	mg/L	-	-	-	-	**7.4**
	Sodium (Na)	0.1	mg/L	230	-	-	-	**160**
	Sodium (Na)	0.5	mg/L	230	**160**	**160**	**190**	-
Forms of Carbon	Total Organic Carbon	0.2	mg/L	-	**19**	**21**	**19**	**19**
	Dissolved Organic Carbon as NPOC	0.2	mg/L		-	**20**	-	-
Nutrients	Ammonia (NH3) as N	0.01	mg/L	-	**0.08**	**0.61**	**0.04**	**0.17**
	Nitrate (NO3) as N	0.005	mg/L	-	**0.01**	**0.29**	-	**0.5**
	Nitrate (NO3) as N	0.025	mg/L	-	-	-	< 0.025	-
Trace Metals	Iron (Fe)	0.005	mg/L	0.2	**0.01**	**0.096**	**0.015**	**0.076**
	Manganese (Mn)	0.001	mg/L	0.2	**0.004**	**1.3**	**0.075**	**0.38**
Phenolics	Total Phenols	0.05	mg/L	-	< 0.05	< 0.05	< 0.05	< 0.05

mg/L	milligrams per litre
µS/cm	microsiemens per centimetre
LOR	limit of reporting
PS	primary sample
Criteria	Criteria adopted from *Australian and New Zealand Environment and Conservation Council (ANZECC) Agriculture and Resource Management Council of Australia and New Zealand (ARMCANZ) Australian and New Zealand Guidelines for Fresh and Marine Water Quality* - 'Primary Industries: Water quality for irrigation and general water use' *and/or* *NSW EPA Environment Protection Licence 6180* 'Limit Conditions - L2.4 Water and/or Land Concentration Limits', 2013
	within criteria
	criteria exceeded