

Analytical Report 210734



Laboratory Services

Issue Date: 2/10/2019
Issued By : Sydney Water Laboratory Services

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Where a result is required to meet a compliance limit or specification the associated uncertainty must be considered. Uncertainty estimates are available for all accredited test results.

Corporate Accreditation No 63

Accredited for compliance with ISO/IEC 17025 - Testing

SAMPLE SUMMARY

<u>Client Sample ID</u>	<u>Sample Number</u>	<u>Sampling Procedure</u>	<u>Date Sampled</u>	<u>Date Received</u>	<u>Date Authorised</u>	<u>Description</u>
POINT 1	L19075878	1	23/09/2019	24/09/2019	01/10/2019	POLISHER
POINT 2	L19075879	1	23/09/2019	24/09/2019	01/10/2019	TURKEYS
Inlet	L19076108	1	23/09/2019	25/09/2019	01/10/2019	
Splitter box 1	L19076109	1	23/09/2019	25/09/2019	01/10/2019	
Splitter box 2	L19076110	1	23/09/2019	25/09/2019	01/10/2019	

Sampling procedures

- 1 Samples analysed as received.
- 2 Samples collected as per FS procedures SAWI 070, Excluding Oil & Grease which is collected as per clients instructions.
- 3 Samples collected as per FS procedures SAWI 070.
- 4 Results reported as received from WNSW.

ANALYTICAL RESULTS

Client Sample ID		POINT 1	POINT 2	Inlet	Splitter box 1	Splitter box 2			
Sampled Date		23/09/2019 08:00:00 AM	23/09/2019 08:00:00 AM	23/09/2019 08:40:00 AM	23/09/2019 08:40:00 AM	23/09/2019 08:40:00 AM			
Sample Number		L19075878	L19075879	L19076108	L19076109	L19076110			
CHEMISTRY									
WC12MET : Conductivity									
Conductivity (mS/m)	mS/m	122.3	114.8	-	-	-			
Date of Performance	DD/MM/YY	24/09/19	24/09/19						
WC17NS : Biological oxygen demand									
BOD5	mg/L	3	3	170	180	41			
Date of Performance	DD/MM/YY	26/09/19	26/09/19	26/09/19	26/09/19	26/09/19			
WC26NS500 : Grease									
Oil & Grease	mg/L	<5	<5	-	-	-			
Date of Performance	DD/MM/YY	29/09/19	29/09/19						
WC44NS : Determination of Total, Fixed & Volatile Suspended Solids									
Total Suspended Solids	mg/L	2	2	-	-	-			
Date of Performance	DD/MM/YY	27/09/19	27/09/19						
MICRO									

"-" = Not required or refer to Laboratory comment

Client Sample ID		POINT 1	POINT 2	Inlet	Splitter box 1	Splitter box 2			
Sampled Date		23/09/2019 08:00:00 AM	23/09/2019 08:00:00 AM	23/09/2019 08:40:00 AM	23/09/2019 08:40:00 AM	23/09/2019 08:40:00 AM			
Sample Number		L19075878	L19075879	L19076108	L19076109	L19076110			
MICRO									
MI01MUG : Faecal Coliform and/or E. coli									
E.coli	CFU/100mL	-	13	-	-	-			
Faecal Coliform	CFU/100mL	-	22	-	-	-			
Date of Performance	D/M/Y H:M		24/09/19 17:13						
NUTRIENTS									
NU102 : Nitrogen & Phosphorus									
Total Nitrogen	mg/L	13.8	6.32	-	-	-			
Total Phosphorus	mg/L	0.835	0.795	-	-	-			
Date of Performance	DD/MM/YY	25/09/19	25/09/19						

COMMENTS

Sample ID	Comment Level	Method	Test	Comment
L19075879	Method	MI01MUG	-	Result confirmed. Sample analysed outside recommended holding time of 24Hrs.
L19075878	Method	WC17NS	-	sample provided wasn't sufficient
L19075879	Method	WC17NS	-	sample provided wasn't sufficient

Analysis**Analysis Requirements**

"-" = Not required or refer to Laboratory comment

MI01MUG Faecal Coliforms and/or E.Coli: all results are presumptive unless indicated otherwise.

LABORATORY QC RESULTS

N/A - Not Applicable

PQL - Practical Quantitation Limit

LOQ - Limit of Quantification

RPD - Relative Percent Difference

SPIKE/Positive Control - Addition of a known amount and concentration

Duplicate Precision = Accepted - Result 2 within 95% confidence limits of result 1

Duplicate Precision = Outlier - Result 2 outside 95% confidence limits of result 1

Duplicate Precision = Not calculated - Result is outside test range

LOQ	Blank	Positive Control <i>Acceptance Criteria</i>	Negative Control <i>Acceptance Criteria</i>	Duplicate1	Duplicate2	Precision <i>Acceptance Criteria</i>
MI01MUG [Membrane Filtration]E.coli						
<1 CFU/100mL	<1	Accepted	Accepted	13	10	Accepted
MI01MUG [Membrane Filtration]Faecal Coliform						
<1 CFU/100mL	<1	Accepted	Accepted	22	17	Accepted

LOQ	Blank	Control <i>Acceptance Criteria</i>	Spike <i>Acceptance Criteria</i>	Duplicate1	Duplicate2	RPD <i>Acceptance Criteria</i>
NU102 Total Nitrogen						
<0.05 mg/L	<0.05	0.94 <i>0.88 - 1.12 mg/L</i>	95 % Recovery <i>80 - 120 % Recovery</i>	0.47	0.45	B <i>0 - 0 %</i>
NU102 Total Phosphorus						
<0.002 mg/L	<0.002	0.050 <i>0.045 - 0.055 mg/L</i>	98 % Recovery <i>80 - 120 % Recovery</i>	0.024	0.023	4.26 % <i>0 - 50 %</i>
WC12MET Conductivity (mS/m)						
<0.1 mS/m	F	140.8 <i>139.3 - 143.3 mS/m</i>	E	59.1	59.6	0.84 % <i>0 - 20 %</i>
WC17NS BOD5						
<2 mg/L	<2	190 <i>139 - 257 mg/L</i>	E	41	44	7.06 % <i>0 - 20 %</i>

LOQ	Blank	Control <i>Acceptance Criteria</i>	Spike <i>Acceptance Criteria</i>	Duplicate1	Duplicate2	RPD <i>Acceptance Criteria</i>
WC26NS500 Oil & Grease						
<5 mg/L	<5	93 85.1 - 101.5 mg/L	E	38	40	B 0 - 0 %
WC44NS Total Suspended Solids						
<2 mg/L	<2	57 42.5 - 57.5 mg/L	E	280	300	6.90 % 0 - 20 %

Extra Note:

F: Blank is not applicable for this analyte

B: Duplicate RPD reject criteria is not applicable, results are <10 times LOQ

E: Spike is not applicable for this analyte

DUPLICATE Oil & Grease B: Duplicate RPD reject criteria is not applicable, results are <10 times LOQ