

**OFFICE 107
BLOCK 6
LOMBARDY OFFICE PARK SHERE**

ATTENTION: PURIFIC PTY LTD

13 OCTOBER 2017

CONCISE WATER QUALITY EVALUATION
(TEST REPORT 45143)

WATER QUALITY RESULTS

A water sample was submitted to Aquatico Laboratories on **4 October 2017** for testing the quality for intended use as domestic water. The water quality test results are displayed on the attached Test Report. Water quality is compared to the SANS 241-1:2015 Drinking Water Standard (SABS, 2015).

The water quality of the sample called '**Purific**' can be described as neutral (pH 6.0 - 8.5), non-saline (TDS < 450 mg/l) and moderately soft (total hardness 50 - 100 CaCO₃) with no *E.coli* and no total coliforms detected.

Compliance with the 'SANS 241-1:2015 Drinking Water Standard (SABS, 2015)' guidelines is as follows:

Chronic health Risk:All compliant
Acute health Risk:All compliant
Operational (non-health):All compliant
Aesthetic (non-health):All compliant

In terms of the classification system of the 'Quality of Domestic water supplies' (WRC, 1998) the quality is classified as follows:

Drinking: Class 1 - Good
Bathing: Class 1 - Good
Washing: Class 0 - Ideal
Food Preparation: Class 1 - Good
Aesthetic: Class 1 - Good

According to the Langelier Saturation Index, corrosion is likely.

Based on the assessment of variables analysed in comparison to 'SANS 241-1:2015 Drinking Water Standard (SABS, 2015)' and 'Quality of Domestic water supplies' (WRC, 1998), the tested water sample is Fit for use as potable water and domestic use.

Treatment for intended use: non-required
Variables requiring treatment: None

Please contact us for any further enquiries
*Electronically generated report
Werner Rossouw*

Client: Purific Pty Ltd
Address: Office 107, Block 6, Lombardy Office Park Shere, Gauteng,
Report no: 45143
Project: Purific Pty Ltd

Date of certificate: 13 October 2017
Date accepted: 04 October 2017
Date completed: 12 October 2017
Revision: 0

Analyses			Unit	Method	Uncertainty of measurement %	SANS 241-1:2015	82361
N	pH @ 25°C		pH	ALM 20			
N	Electrical conductivity (EC) @ 25°C		mS/m	ALM 20	9.52	< 170	26.1
N	Total dissolved solids (TDS)		mg/l	ALM 26		< 1200	195
N	Total alkalinity		mg CaCO3/l	ALM 01	10.41		102
N	Chloride (Cl)		mg/l	ALM 02	11.39	< 300	11.5
N	Sulphate (SO ₄)		mg/l	ALM 03	9.39	< 500	45.7
N	Nitrate (NO ₃) as N		mg/l	ALM 06	9.85	< 11	0.492
N	Ammonium (NH ₄) as N		mg/l	ALM 05	8.59	< 1.5	0.423
N	Fluoride (F)		mg/l	ALM 08	10.11	< 1.5	0.319
N	Calcium (Ca)		mg/l	ALM 30	8.78		22.6
N	Magnesium (Mg)		mg/l	ALM 30	7.54		5.84
N	Sodium (Na)		mg/l	ALM 30	7.96	< 200	17.1
N	Potassium (K)		mg/l	ALM 30	12.05		26.8
N	Aluminium (Al)		mg/l	ALM 31	8.59	< 0.3	0.025
N	Iron (Fe)		mg/l	ALM 31	7.97	< 0.3	<0.004
N	Manganese (Mn)		mg/l	ALM 31	8	< 0.1	<0.001
N	Chromium (Cr)		mg/l	ALM 31	7.61	< 0.05	<0.003
N	Copper (Cu)		mg/l	ALM 31	4.55	< 2	0.078
N	Nickel (Ni)		mg/l	ALM 31	7.56	< 0.07	0.002
N	Zinc (Zn)		mg/l	ALM 31	9.31	< 5	0.018
N	Cadmium (Cd)		mg/l	ALM 31	7.89	< 0.003	<0.002
N	Lead (Pb)		mg/l	ALM 31	8.85	< 0.01	<0.004
N	E.coli		CFU/100ml	ALM 40	7.74	0	<1
N	Total coliform		CFU/100ml	ALM 40	7.76	< 10	<1
N	Total hardness		mg CaCO3/l	ALM 26			80
N	Total organic carbon (TOC)		mg/l	ALM 63	6.46	< 10	4.77
N	Langelier Saturation Index		LSI	ALM 26			-0.89

O = Outsourced S = Sub-contracted NR = Not requested RTF = Results to follow NATD = Not able to determine ATR = Alternative test report
 The results relates only to the test item tested.
 Results reported against the limit of detection.

M. Swanepoel
Technical Signatory