The Chief Executive Officer,
Water Resources Management Authority,
P.O. Box 45250 – 00100
NAIROBI

Form: WRA
Catchment:
WRMA ID: WRA
File: WRA/

OWater Resources Management Authority

BOREHOLE COMPLETION RECORD

(To be submitted in triplicate) *(Rule 33)*

Borehole No:

BOREHOLE NAME: COTTOLENGO
Coordinates**:**

ELEVATION: M

PARTICULARS OF APPLICANT		**DETAILS**	
1. Full name of applicant(s) (In Block Letters)		**COTTOLENGO BOADING SCHOOL**	
2. Category of Applicant - Individual, Group [Association, Society], Company, Institution,		INSTITUTION	
3. ID Number of Applicant (Individual) or Certificate of Incorporation or Registration for Groups or Companies			
Physical Address where water is to be used (see sketch)		**Contact Address of Applicant**	
4. L/R Number(s)		5. Box Number	62
6. Village(s)/Ward(s)	LAARE	7. Town	LAARE
8. Sub-location(s)	TUNENE	9. Post Code	
10. Location(s)	**LAARE**	11. Telephone Contact (Landline)	0725237366
12. Division(s)	**IGEMBE NORTH**	13. Telephone Contact (Mobile)	0725237366
14. District(s)	**MERU**	15. Email Contacts	
PARTICULARS OF CONTRACTOR		**UNKNOWN**	
16. Box Number	102421	22. License Number	
17. Town	NAIROBI	23. Gazetted On	
18. Post Code	00100	24. Drilling Supervisor	
19. Telephone Contact (Landline)	0704746927	25. Type and Make of Drill Rig	
20. Telephone Contact (Mobile)	0700127437		
21. Email:	GREENFUSIO.2050@GMAIL.COM		
INTENDED USE OF WATER			
Public W.S.; Irrigation.; Industries.; Domestic.; Stock, other		**DOMESTIC**	
PARTICULARS OF BOREHOLE			
Type of Borehole: - Drilled; Driven; Bored; Jetted; Other		**DRILLED**	
Borehole Construction (also *see* sketch page 3)			

Drilling started (date)		Drilling completed (date)		All work completed (date)	
Total Depth: Reported (m)	**124**	Measured (m)	**124**	Final (back-filled) Depth (m)	**NIL**
Hole Diameter (mm)	**203mm**	From (m)	**0**	To (m)	**124**

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Permanent Casing									
Plain			*PVC CASING Pipes 152mm*						
Type	PVC	Diam (mm)	152mm	Length (m)	**82**	From (m)	**GL**	To (m)	**82**
Type	*PVC*	Diam (mm)	152mm	Length (m)	**6**	From (m)	**114**	To (m)	**120**
Type	*PVC*	Diam (mm)	152mm	Length (m)	**2**	From (m)	**122**	To (m)	**124**
Slotted or Perforated:									
Size and Description of Openings			*PVC CASING Pipes 152mm*						
Type	*PVC*	Diam (mm)	152mm	Length (m)	**32**	From (m)	**82**	To (m)	**114**
Type	*PVC*	Diam (mm)	152mm	Length (m)	**2**	From (m)	**120**	To (m)	**122**

Gravel Pack					
Size of grains (mm)	**2-4**	Roundness (good, fair, poor)		Volume inserted in annular Space (m3)	**N/A**
		From (m)		To (m)	

Aquifer					
1st Water Struck at (m)	**N/A**		Water Rest Level (m)		
2nd Water Struck at (m)			Water Rest Level (m)		
3rd water struck at (m)			Water Rest Level (m)		
4th water struck at (m)			Water Rest Level (m)		
Main Aquifer Struck at (m)			Water Rest Level (m)		
Water bearing material		From (m)		To (m)	
Other Aquifers, Remarks, etc (also *see* log on page3)					

***Yield*: SWL (m)**	**108**	PWL (m below surface)	**117**	Discharge (litres per minute)	**100**
After pumping (hours)		**24**	Recovered to SWL in (minutes)		**20**
Expected production discharge (liters per hour)		**6000**	With pump set at (m below surface)		**122**

Pumping Test Record in Summary (Detailed test records on attached sheets): (all depth measurements to be in meters below ground surface)

	Test No. 1	**Test No. 2**
Date of Test (day, month, year)	**28feb-1march 2026**	
Depth of Borehole at time of test (m)	**124**	

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Water Entry (perforations or screen setting at time of test)	From (m) See Borehole design	From (m)
Static Water (SWL) before test (m)	**108**	
Type of Pump (Grund force) used	**SP 17-13**	
Depth of Pump intake (m)	**110**	
Discharge (in liters per minute)	**100**	
Pumping Water Level (PWL m)	**117**	
After pumping continuously for (hours)	**24**	
Time of Recovery to Original SWL (minutes)	**30**	
Rate of Recovery-WL after 5 minutes (m)	**85.34**	
Rate of Recovery-WL after 20 minutes (m)	**42.93**	
Rate of Recovery-WL after 60 minutes (m)	**14.19**	
Rate of Recovery-WL after 720 minutes (m)	**N/A**	

(Additional pumping tests to be mentioned in REMARKS and included with file).
Government representative witnessing the test……..…….

Quality of Water					
Sample (Yes/No)	**YES**	Collected at (hour)	**24TH HOUR OF TEST PUMPING**	On (date)	**3rd mar 2026**
Sediment		Taste		Oduor	
Color	**CLEAR**	Temperature (0c)		Spec. Cond	

Remarks: (drilling difficulties, gravel-pack details, all pertinent information about the drilling and completion of the hole)	N/A

Drilling Supervisor		*Drilling Contractor*	
Signature		Signature	
Name		Name	**GREENFUSION TECHNOLOGY LTD**
Date	**28th /02/2026**	Date	**1st /03/2026**

The Chief Executive Officer,
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Catchment:
WRMA ID: WRA
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Borehole No: C-

1. *Driller's Log.*

From (m.)	To (m.)	Drilling Rate (minutes)	Description of Formation Penetrated
			N/A

(Geologist's log on attached sheets).

Remarks or additional information on Driller's log, or on sketch of Borehole:

……..

… .....SEE ATTACHED SKETCH

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Catchment:
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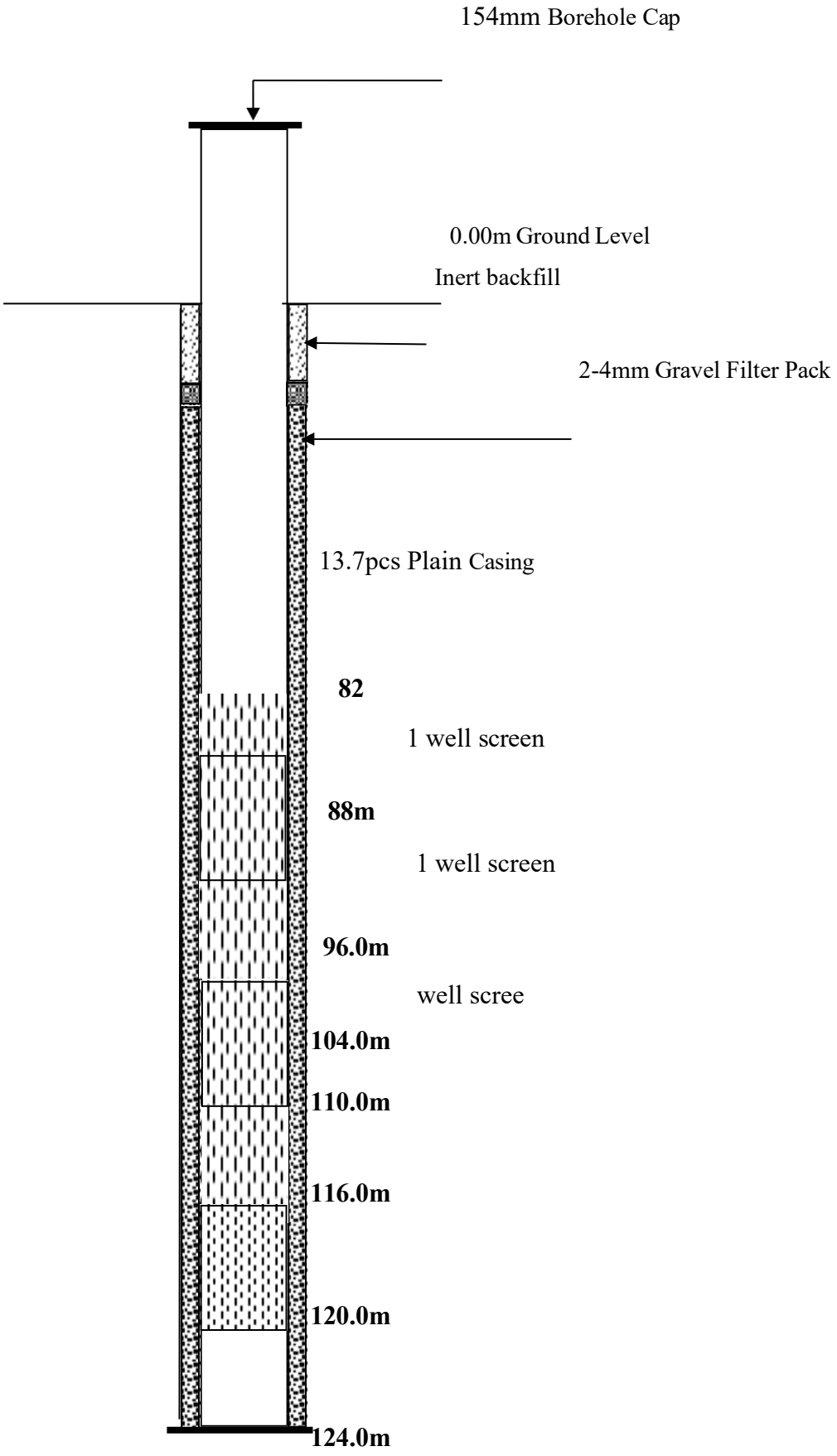
12. *Sketch of Borehole Construction*



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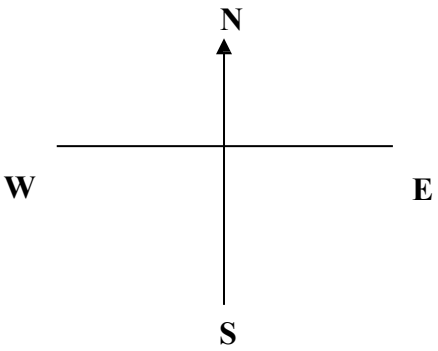
13. *Location Sketch*: (To be sketched by the driller on the site, showing roads, tracks and prominent land marks, with road distances to the nearest town or trading canter and to water source).



For Official Use Only

Entered on Schedule…….(Yes/No) Water Sample Received .....(Yes/No)
Drilling Samples Received…….(Yes/No) Chemical Analysis Received…..... (Yes/No)
Drilling Samples Filed…….(Yes/No) Geologist's Log Available ..... (Yes/No)
Location Plotted on Maps…..... (Yes/No)

Hydro geological Report No……of……
(*Date*)
Geophysical Curve No…….of…..
(*Date*)

Borehole Data entered and checked by (Name Signature……

Permit details

Permit Number ……..... Authorized abstraction ..... m^3/d
Authorized water use(s) ……...
Pump intake depth …… m bgl Maximum authorized abstraction rate ..... m^3/hr

All Borehole Completion Records duly completed should be sent to the appropriate WRMA Regional Office.

GREENFUSION TECHNOLOGIES LIMITED
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PUMPING TEST DATA ANALYSIS FOR COTTOLENGO PRY BH

Tabulated below is a summary of datum data obtained for this particular facility.

Pump type	**Dayliff DS 17-13**
Type of pumping test	Controlled Rate Test (CRT)
Reference datum for water level measurement	Ground level
Duration of pumping test	24.0 hrs
Duration of recovery	30Mins
Borehole depth	124.0m
Pump setting depth	122.0m
Static water level (SWL), (m)	108.47m
Draw down	9.06m
Borehole yield	5.0 m^3/hr

EXECUTIVE SUMMARY

Test pumping exercise is an essential practical method of analyzing the borehole performance in terms of borehole yield and borehole's zone of influence. In addition, the aquifer characteristics such as aquifer extent and its ability to transmit and store water can also be evaluated reliably from the test pumping exercise program.

Test pumping was conducted on 28th February 2026. A constant discharge test was performed for 24 hours at intervals indicated on the appended test pumping data sheet. A sonic water level indicator was utilized to take the water depth measurements. The static water level (SWL) in the borehole was 108.47 m below the reference datum at the start of the constant discharge test. Recovery test was monitored on 1st March 2026 for duration of 30 minutes. The tests intervals for the recovery are also indicated on the recovery chart also appended.

From the obtained data, the drawdown verses time function and recovery series verses time function has been plotted. Using the Cooper-Jacob method, the drawdown and recovery data were analyzed giving Transmissivity (T) of 13.734 m^2/day and 15.696 m^2/day for draw-down and residual tests respectively.

Test pumping programs are essential and practical methods of analyzing the borehole performance in terms of borehole yields.

1.0 THE BASELINE PRINCIPAL FOR THE TEST PUMPING DATA

Pumping test gives the best information on the drawdown level, flow rates and unforeseen factors generated upon pumping. The principle of a pumping test involves applying a stress to an aquifer by extracting ground water from a pumping well and measuring the aquifer response to that stress by monitoring drawdown as a function of time. The measurements are then incorporated into an appropriate well-flow equation to calculate the hydraulic parameters of the aquifer.

After the pump has been shut down, the water level in the well start to rise again. These rises are measured in what is known as recovery test. **If pumping rate was not constant throughout the pumping test, the recovery- test data are more reliable than draw down data because the water table recovers at a constant rate.**

1.1 OBJECTIVES

The prime objective for which the test pumping exercise is conducted involves the aim to regulate and optimize the extraction of water from the borehole without adversely impacting the aquifer systems.

The specific objectives for the test pumping are:

- ✓ To determine how much ground water can be extracted from a well based on the long-term yield and the well efficiency.
- ✓ To determine the hydraulic properties of the aquifer namely; Transmissivity, Specific capacity and Yield.
- ✓ To evaluate the spatial effects of pumping on the aquifer
- ✓ To determine and ascertain the suitable depth of pumping
- ✓ To assess the information on water quality and its variability with time.

1.2 STATEMENT OF SCOPE

Pumping tests was typically done to determine well performance in line to ensuring selection of the correct pumping equipment. The data from the pumping tests is used to calculate the specific capacity (Q/s where Q = yield and s = drawdown) of the well. In addition, the aquifer transmissivity is also determined, as well as the flow projections based on the computed values of specific capacity and

transmissivity T. Further, the borehole pumping requirements are determined for the purposes of pumping specifications design optimization.

3.0 TEST PUMPING METHODOLOGY AND ANALYSIS

The test-pumping exercise was carried on the 28th February 2026 for a duration of 24 hours and an additional 30 minutes for the recovery measurement. The borehole calibration test was done at a controlled Rate of discharge which was 5.0m^3/hr. This is an averaged value for the entire test period. It is vital to make note of the fact that the discharge output consequently resulted to a draw -down value of 9.06 m to the penultimate depth of 117.53 m below ground level.

A general technical contention that can henceforth be drawn from the test data is that, with the threshold aquifer estimate of 5.0 m^3/hr, it is unlikely for the aquifer to be stressed to a critical level and it is hence sustainable. This would imply that there would be no limitation to both abstraction and sustainability from the aquifer.

The ultimate design for this aquifer at the limit of 5.0 m^3 /hr on the basis of performance efficiency schedules cannot be considered a gross over-estimation of the aquifer potential.

From a Static Water Level – 108.47m below ground level, and a startup output of 7.2m^3/hr., the water level slowly draws down the level to the maximum recorded draw-down level of 117.53m.

Recommended Discharge

Important to note: The decisive recommended discharge of 5.0m³/hr., is ideal. The facility will thus support design discharge within this range safely ensuring the reduction of the developing stress to the aquifer system hence guaranteeing the facility's sustainability.

4.0 DATA, RESULTS AND ANALYSIS

The analysis of test results data was done by use of the Cooper-Jacob- time- drawdown method. This method is an approximation to Theis method in which a graphical plot of the test data was plotted using a semi-log plot of the field drawdown data, on a linear scale, versus time, normal log scale. A straight line was then drawn through the field-data points. The value of the drawdown per log cycle of time, ΔS, was obtained from the slope of the graph. The value of transmissivity was then calculated from the following equation:

$$T = \frac{2.3Q}{2\pi\Delta S}$$

Where Q is the pumping rate

ΔS represent the linear plot gradients.

4.1 AQUIFER PARAMETERS

4.1.1 TRANSMISSIVITY OF THE AQUIFER

Owing to the moderate draw-down observed for the aquifer, the transmissivity of the ground water is moderate to high. This type of yield is associated with the fractured zone and sediments making up

the aquifer at this area. The moderate draw-downs suggest a high deployable yield potential than that recorded by the Test –Pumping exercise program.

There is a support inference that can be inferred from the test data. The type data is associated with a regional fracture system to support such flow. In such a scenario, the value of T associated with the system will occur defined along the fracture lineament to permit very high discharge outputs and the possibility of pumping the levels to deeper sections of the aquifer.

However, these values can be slightly skewed in particular reference to this aquifer as it cannot be accurately computed within the context of the 9.06 m drawdown and the subsequent recovery trend.

The type of Transmissivity that can be ascribed to this aquifer can only be accurately determined in the event of higher discharge from the facility to adequately stress the aquifer. The fact that it is ascribed to the 9.06 m drawdown induced in the facility is indicative of its inherent inaccuracy.

From the rule of thumb estimate, a sustained pumping capacity to the flow of 5.0m^3/hr would not have a strain to the aquifer efficiency.

AQUIFER TRANSMISSIVITY

Obtained Transmissivity values were as follows.

Draw-down test	**13.734 m2/day**	
Residuals	**15.696 m2/day**	***These values favor the scenario for medium flow out-puts***

		at the reduced pumping heads.
Average T	**14.715 m2/day**	

The T values for both Draw-down and residual recovery are moderately high. For this particular facility, the T value from the recovery test can be taken to be more accurate owing to the fact that the water level in aquifer resumes at a constant rate. However, an average of the two values of T has been determined and can be used for purposes of further calculation of parameters since it's deviation from the two computed values is slightly marginal.

The computed T value can be considered to be grossly equitable to the threshold estimate from the aquifer of 16.0m^3/hr. The hydraulic efficiency of the system can also be inferred to be quite high to support the suggested discharge recommended.

The high operational efficiency of this system would conform to a scenario where the borehole can be pumped to its maximum rated capacity – though constrained to 5.0m^3/hr to avoid the event of over- abstraction from the aquifer series**.**

4.1.2 SPECIFIC CAPACITY

The borehole's specific capacity was also determined

$$Q/\Delta S = \frac{5000}{3600(\text{sec/Hr.}) * 9.06} = 0.153 \text{ m}^2/\text{day}$$

<u>Commentary</u>:

The specific capacity is adequate for a moderate flow- water supply borehole. This value of the specific capacity is an indicator of the moderate yield potential associated with this aquifer. Nevertheless, the

specific capacity obtained for this particular aquifer is not necessarily accurate, and is more of a casing storage component.

4.1.3 Flow Design Mode

Assuming the cumulative draw-down in the borehole is enhanced by 4m, it achieves a pumped water level maximum of 121.53m below ground level. This is a viable assumption, in the sense there is still a reserve column for the pump submergence and design purposes - in the form of potential draw-down in the pumping facility.

The rule of thumb and the specific capacity would ultimately indicate a variable discharge output, illustrated by the Darcy's relation;

$$Enhanced\ Discharge = {}^{Q}/_{\Delta S(ddn)}$$

Knowing that specific capacity is 0.153m2/day, it follows therefore that with an additional draw-down of 4.0m, discharge (Q) becomes;

0.153x3600x13.06/1000

Q = 7.2m^3/hr.

The safe yield for abstraction should be 70% of total yield. Thus becomes 5.0 m^3/hr.

Q = 5.0 m^3/hr at a pumping water 121.53 m below ground level.

Nonetheless, this discharge is liable to induce increased levels of stress to the aquifer. Over-pumping of the facility is likely to cause the following adverse system effects: -

- **Exposure of the first screened areas to air damp.**
- **Loss of pore space within the upper sediment aquifers.**
- **Deterioration of discharge over short pumping regimes due to encrustation development in screen areas.**
- **Lowered overall - performance efficiency of the system.**

Taking into consideration other head losses, the total operating head of the pumping equipment will

be estimated by the following:

- **Frictional head loss - 5m**
- **Fittings losses - 5m**
- **Elevation head - 10m**

Total Head H, = 121.53+5+5+10

H = 141.53m

Therefore, Optimized Duty Point

Q =5.0 m³/hr at a pumping water head of 141.53m below ground level.

4.1.4 OPTIMIZED PUMP SET.

Pump make	Pump model	Rated HSP	Installation Depth.
DAYLIFF	DS 5 - 33	3.0Kw[4.0Hp]	122m. The optimum down-hole pipe-work for this borehole is 1.5" GI. The frictional head loss for the system within a 1.5" down-hole pipe-work will be Negligible.

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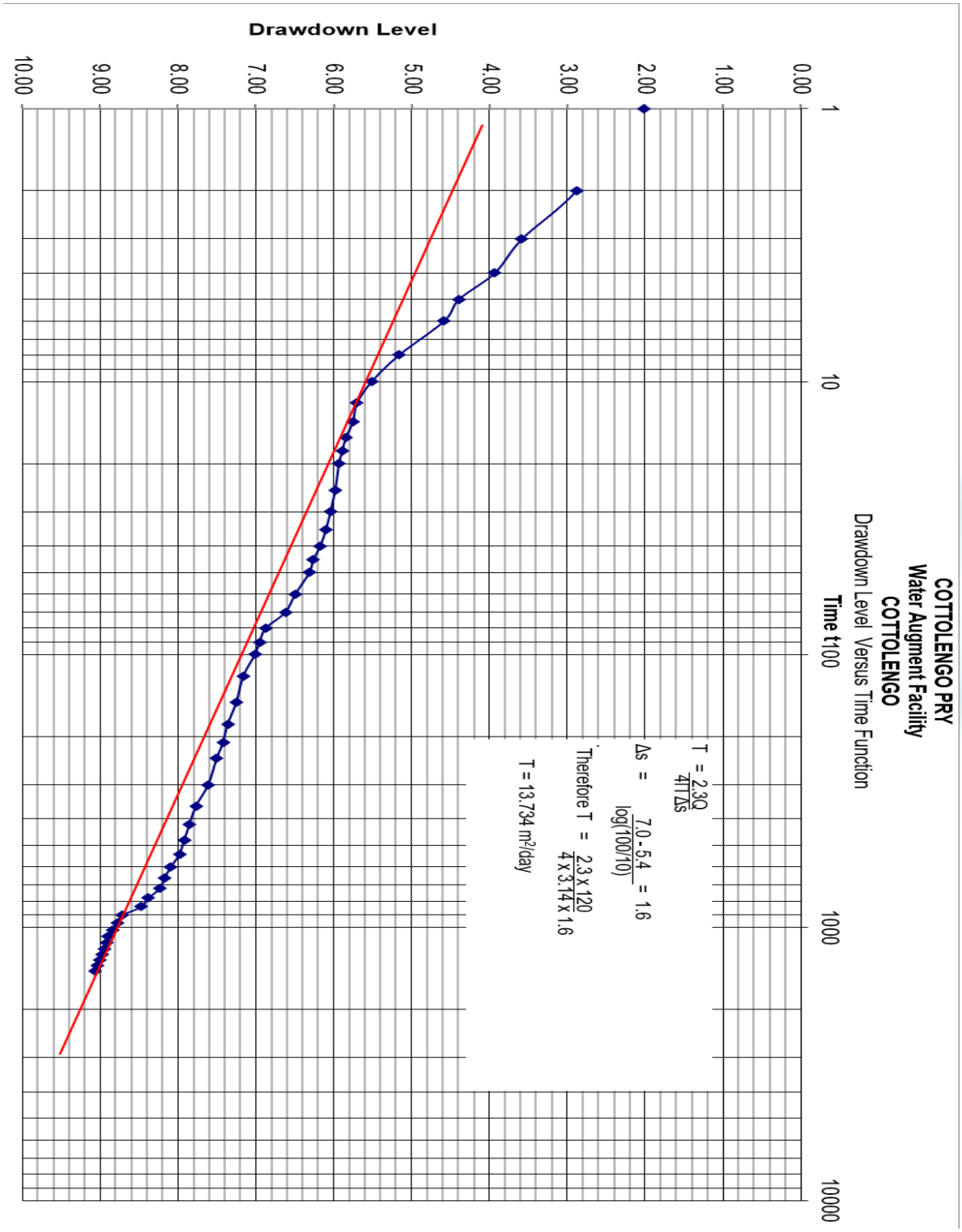

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TEST PUMPING - DRAWDOWN MEASUREMENTS

Client Name: COTTOLENGO PRY
Borehole Name: COTTOLENGO PRY
Borehole Depth : 124 m
SWL: 108.47 m
Discharge During Test: 5.0m³/hr
Water Sample taken: Yes
Pump Intake Depth: 122m
Pumping Water Level: 117.53m
Pump Type: Dayliff DS 17-13
Date of Test: 28/02/2026

CLOCK TIME	METER READING	ELAP TIME Min:	WATER LEVEL M, bgi (x)		DRAWDOWN	DISCHARGE	REMARKS
		0	108.47	0	0.00	7.2m³/hr	G.V fully open
		1	110.49	1	2.02		
		2	111.35	2	2.88		
		3	112.05	3	3.58		
		4	112.40	4	3.93		
		5	112.86	5	4.39		
		6	113.05	6	4.58		clear water
		8	113.63	8	5.16		
		10	113.98	10	5.51	6.54m³/hr	
		12	114.17	12	5.70		
		14	114.22	14	5.75		
		16	114.31	16	5.84	5.53m³/hr	
		18	114.36	18	5.89		
		20	114.40	20	5.93		G.V half open
		25	114.45	25	5.98		
		30	114.51	30	6.04		clear water
		35	114.57	35	6.10	5.48m³/hr	
		40	114.64	40	6.17		
		45	114.73	45	6.26		
		50	114.78	50	6.31		
		60	114.96	60	6.49	5.28m³/hr	
		70	115.09	70	6.62		
		80	115.34	80	6.87		
		90	115.42	90	6.95		
		100	115.48	100	7.01		
		120	115.63	120	7.16		
		150	115.72	150	7.25		
		180	115.83	180	7.36	5.14m³/hr	
		210	115.89	210	7.42		
		240	115.97	240	7.50		
		300	116.08	300	7.61		
		360	116.24	360	7.77		
		420	116.32	420	7.85	5.10m³/hr	Clear water
		480	116.39	480	7.92		
		540	116.45	540	7.98		
		600	116.56	600	8.09		
		660	116.64	660	8.17		
		720	116.70	720	8.23		
		780	116.85	780	8.38		
		840	116.94	840	8.47	16.0m³/hr	
		900	117.18	900	8.71		
		960	117.24	960	8.77		
		1020	117.31	1020	8.84	5.05m³/hr	
		1080	117.36	1080	8.89		
		1140	117.39	1140	8.92		
		1200	117.42	1200	8.95		
		1260	117.44	1260	8.97		
		1320	117.47	1320	9.00		
		1380	117.50	1380	9.03		
		1440	117.53	1440	9.06	5.05m³/hr	Sampled

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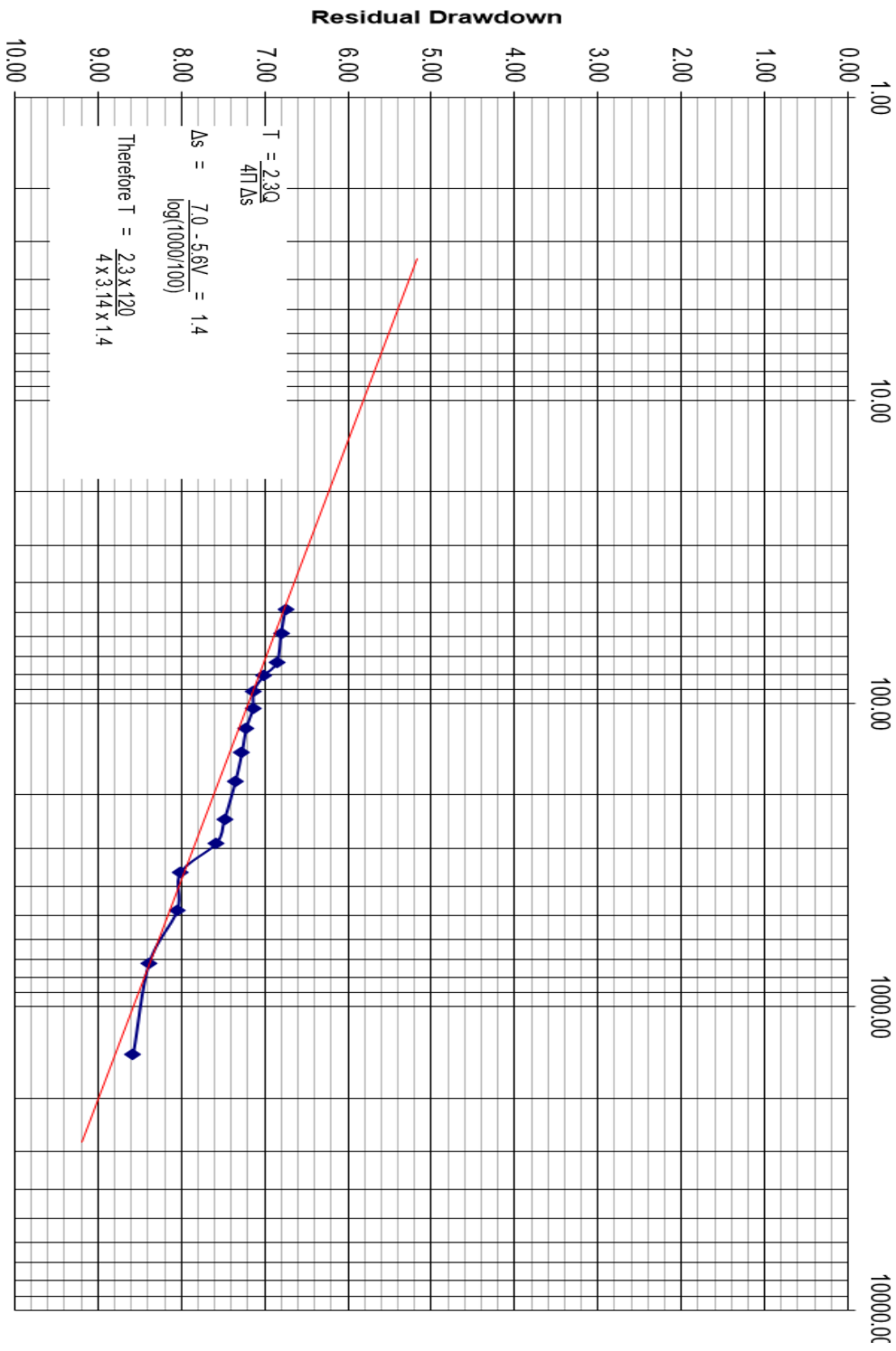

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TEST PUMPING - RECOVERY MEASUREMENTS

Client Name: COTTOLENGO PRY **Borehole Name: COTTOLENGO**

Date: 01/03/2026

Day	Hour	TIME SINCE PUMP STOPPED Min t	Pumping ended t' (Min)	RATIO t'/t	Residual DDn in m.	Water level in(metres)
		0	1440		9.06	117.53
		1	1441	1441.00	8.58	117.05
		2	1442	721.00	8.39	116.86
		3	1443	481.00	8.05	116.52
		4	1444	361.00	8.01	116.48
		5	1445	289.00	7.58	116.05
		6	1446	241.00	7.48	115.95
		8	1448	181.00	7.35	115.82
		10	1450	145.00	7.27	115.74
		12	1452	121.00	7.22	115.69
		14	1454	103.86	7.14	115.61
		16	1456	91.00	7.13	115.60
		18	1458	81.00	7.01	115.48
		20	1460	73.00	6.85	115.32
		25	1465	58.60	6.80	115.27
		30	1470	49.00	6.75	115.22

BLUE SPACE TECHNOLOGIES
WATER AND ENERGY SOLUTIONS
Tel :+254714011470
Email : infobluespacetech@gmail.com

CLIENT: GREENFUSION TECHNOLOGIES,

LOCATION: MAUA

DATE: 17/03/2026

INTRODUCTION

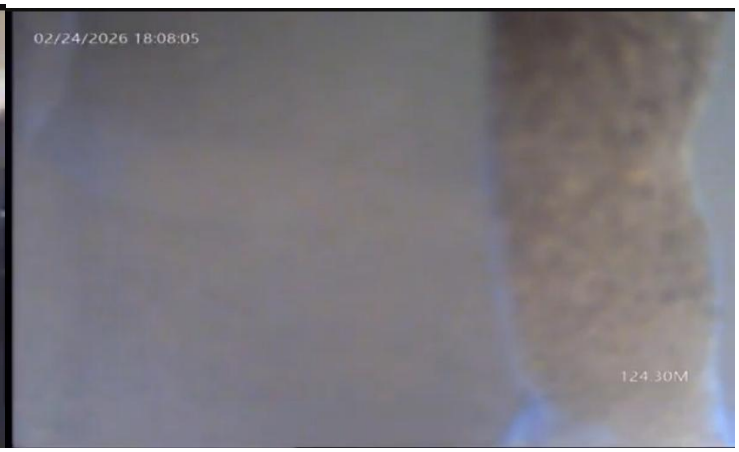
This report presents the findings from a borehole inspection conducted for Greenfusion technologies, Maua. The purpose was to assess the current condition of the borehole and identify issues affecting its performance.

OBSERVATION:

The following observations were recorded during the inspection:

- Total borehole depth - 125m
- Static Water Level – 109m
- Dropped airline
- Water observed was very turbid

Borehole Video footage was captured during the inspection and can be accessed via the link below:
https://drive.google.com/file/d/1m7MN0uda6MxdXxdj8IlUzn48SyHoq5k_/view?usp=drivesdk



RECOMMENDATION

- Borehole should be thoroughly flushed to remove sediments and improve water quality.

Water Analysis Report

KS Drinking Water Microbiology,KS Drinking Water Standard Analysis

Report Ref#: CN-397545

Customer:	Greenfusion Technologies LTD	Water Use:	KSEAS 12 2018 Treated Potable	Date Received:	6-Mar-26
Address:	greenfusion.2050@gmail.com			Analysis Start:	6-Mar-26
Farm Name:	Kottolengo Boarding Pri. School	Condition:	Filled	Report Date:	12-Mar-26
Contact Person:	Kennedy Odhiambo	Comments:		Sample ID:	CG508WA0001

Water Source: Borehole

To maintain the correct history ensure that the next sample sent from this Water Source is labelled: Borehole

History (Last 3 analysis)

Parameter	Unit	Result	Guide Low	Guide High	Low	Optimum	High	Symbol	Current				Method
pH		7.72	6.50	8.50				pH	7.72				ISO 10523
Electrical Conductivity	mS cm -1	0.50		< 1.50				EC	0.50				ISO 7888
Aluminium	mg/l	< 0.07		< 0.20				Al	< 0.07				ISO 11885
Ammonium	mg/l	< 0.01		< 0.50				NH4	< 0.01				EPA 353.4
Calcium	mg/l	27.5		< 150				Ca	27.5				ISO 11885
Magnesium	mg/l	12.0		< 100				Mg	12.0				ISO 11885
Potassium	mg/l	21.4		< 50.0				K	21.4				ISO 11885
Sodium	mg/l	50.7		< 200				Na	50.7				ISO 11885
Nitrates	mg/l	46.5		< 45.0				NO3	46.5				EPA 353.2
Sulphate	mg/l	15.1		< 400				SO4	15.1				ISO 11885
Chloride	mg/l	20.2		< 250				Cl	20.2				EPA 325.1
Phosphate	mg/l	3.13		< 2.20				PO4	3.13				ISO 11885
Fluoride	mg/l	0.44		< 1.50				Fl	0.44				EPA 340.4
*Nitrite	mg/l	< 0.033		< 0.90				NO2	< 0.033				EPA 354.1
*Bicarbonate	mg/l	204						HCO3	204				EPA 310.2
Boron	mg/l	0.017		< 2.40				B	0.017				ISO 11885
Copper	mg/l	< 0.01		< 1.00				Cu	< 0.01				ISO 11885
Iron	mg/l	< 0.01		< 0.30				Fe	< 0.01				ISO 11885
Manganese	mg/l	< 0.01		< 0.10				Mn	< 0.01				ISO 11885
Zinc	mg/l	0.018		< 5.00				Zn	0.018				ISO 11885
*Hardness	mg/l	118		< 300				CaCO3	118				EPA 130.1
*Turbidity	NTU	0.11		< 5.00				TUB	0.11				EPA 180.1
*Total Suspended Solids	mg/l	ND		ND				TSS	ND				EPA 160.2
*Total Dissolved Solids	mg/l	316		< 1000				TDS	316				EPA 160.1
Arsenic	mg/l	< 0.007		< 0.01				As	< 0.007				ISO 11885
*Barium	mg/l	< 0.01		< 0.70				Ba	< 0.01				ISO 11885
Cadmium	mg/l	< 0.002		< 0.003				Cd	< 0.002				ISO 11885
Chromium	mg/l	< 0.004		< 0.05				Cr	< 0.004				ISO 11885
Lead	mg/l	< 0.009		< 0.01				Pb	< 0.009				ISO 11885
*Mercury	mg/l	< 0.001		< 0.001				Hg	< 0.001				ISO 11885
Nickel	mg/l	< 0.003		< 0.02				Ni	< 0.003				ISO 11885
Molybdenum	mg/l	< 0.01		< 0.07				Mo	< 0.01				ISO 11885
Selenium	mg/l	< 0.01		< 0.01				Se	< 0.01				ISO 11885
*Residual Free Chlorine	mg/l	ND	0.20	0.50				Cl(residua	ND				ISO 7393
Total Coliforms	cfu/100 ml	> 100		ND				TC	> 100				ISO 9308
E. coli	cfu/100 ml	ND		ND				Ecoli	ND				ISO 9308
Pseudomonas aeruginos	cfu/100 ml	3		ND				Ps	3				ISO 16266
*Shigella	in 100ml	ND		ND				SH	ND				ISO 21567
Enterococcus faecalis	cfu/100 ml	10		ND				E.faecalis	10				ISO 7899
Sulphite reducing anaer	cfu/100 ml	> 100		ND				SRA	> 100				ISO 6461
TVC @37	cfu/ml	2100		< 50				TVC@37	2100				ISO 6222
TVC @22	cfu/ml	1800		< 100				TVC@22	1800				ISO 6222

Jo Gakobo *Lab Manager - Chemistry* *Approval Date:* 17/03/2026	*Dr. Asha Mohamed* *Lab Manager - Life Science* *Approval Date:* 17/03/2026	*Cordingley Jeremy* *Managing Director* *Approval Date:* 17/03/2026

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Water Analysis Report

KS Drinking Water Microbiology,KS Drinking Water Standard Analysis

Report Ref#: CN-397545

Customer:	Greenfusion Technologies LTD	Water Use:	KSEAS 12 2018 Treated Potable	Date Received:	6-Mar-26
Address:	greenfusion.2050@gmail.com			Analysis Start:	6-Mar-26
Farm Name:	Kottolengo Boarding Pri. School	Condition:	Filled	Report Date:	12-Mar-26
Contact Person:	Kennedy Odhiambo	Comments:		Sample ID:	CG508WA0001

Water Source: Borehole

To maintain the correct history ensure that the next sample sent from this Water Source is labelled: Borehole

History (Last 3 analysis)

Parameter	Unit	Result	Guide Low	Guide High	Low	Optimum	High	Symbol	Current				Method
Staphylococcus aureus	cfu/100 ml	ND		ND				Staphy	ND				ISO 6888
Salmonella spp	in 100ml	ND		ND				Salmonel	ND				ISO 19250

ND = Not Detectable

COMMENTS#

Very high phosphates can increase the likelihood of algae growth in resevoirs. > Nitrates can be harmful to babies, causing blue baby syndrome. > Presence of Pseudomonas may cause infection in humans and causes odor and color change in water. > Presence of Enterococcus indicates recent faecal contamination - please check your water source, tanks and taps. > High sulphite reducing anaerobes indicate possible contamination with faecal waste. They can cause stomach problems > Presence of a high TVC at 37 degrees may indicate presence of bacteria that could potentially cause harm to human health. > High TVC at 22 degrees indicates contamination from environment.TVC is used for monitoring water treatment efficacy - if you have a high TVC check the source water, disinfection, piping and storage systems > Presence of coliforms indicates contamination from environmental sources e.g soil or any other contaminated surface.

Jo Gakobo		Dr. Asha Mohamed		Cordingley Jeremy	
Lab Manager - Chemistry		Lab Manager - Life Science		Managing Director	
Approval Date:	17/03/2026	Approval Date:	17/03/2026	Approval Date:	17/03/2026

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LIFTING OF THE SUBMERGED PUMING SYSTEM FOR CHE-UP AND SERVICING

BH CAMERA INSPECTION

INJECTION OF AIR COMPRESSOR FOR BH CLEANING

24HRS TEST PUMPING

REINSTALLING BACK THE SERVICED PUMP

TESTED OK AND COMMISIONED