

Woking Football Club

JOMAS ASSOCIATES LTD

6-9 The Square
Stockley Park
Uxbridge
UB11 1FW

Tel: 0843-289-2187

Fax: 0872-115-4505

www.jomasassociates.com

info@jomasassociates.com

P1381J1459/AJH/v1.1

27/06/2019

EGLEY ROAD, WOKING, GU22 0AF: SOIL INFILTRATION TESTING

Jomas attended the above-mentioned site under instruction by Woking Football Club on 24th, 25th and 26th June 2019 to carry out soil infiltration testing in general accordance with BRE 365.

A full list of previous reports undertaken for the site by Jomas are detailed in Table 1 below:

Table 1: Previous Reports - Jomas

Title	Author	Reference	Date
Desk Study / Preliminary Risk Assessment Report For Land Adjacent To Egley Road Woking GU22 0NJ	Jomas Associates Ltd	P1381J1459/TE Final V1.0	August 2018
Geo-environmental & Geotechnical Assessment Ground Investigation Report for Egley Road, Woking, GU22 0AF	Jomas Associates Ltd	P1381J1549/AMM Final V1.0	11 April 2019
Supplementary Geo-environmental Assessment Ground Investigation Report for Egley Road, Woking, GU22 0AF	Jomas Associates Ltd	P1381J1549/AMM Final V1.0	25 June 2019

During the previous work the predominant soil type encountered at site was reported as sand considered to represent the Bagshot Formation. However these were locally noted to be clays and is considered likely to either represent clay bands/pockets within the Bagshot Formation, or were recovered as such due to the percussive nature of the drilling equipment further disturbing the samples.

7No. pits (STP1 – STP7) were excavated using a mechanical excavator (positions shown on the exploratory hole location plan in Appendix 1). STP1, STP2, STP3, STP4, STP5, STP6 and STP7 were excavated to depths of 1.0mbgl, 1.0mbgl, 1.0mbgl, 2.4mbgl, 2.4mbgl, 2.4mbgl and 2.4mbgl respectively.

An additional pit was excavated (TP8) to aid in determining ground conditions and specifically to observe groundwater levels. (position shown on the exploratory hole location plan in Appendix 1).

Slight dampness was noted at 3.70mbgl. The pit was left open for 35 minutes, no water ingress was noted before backfilling.

The pits were then filled with water and allowed to drain over time, with the water level measured at intervals. As prescribed by BRE 365 the water in the pit should be allowed to drain until the water falls to at least 25%. However due to time constraints this was not always possible, where significant drainage had occurred the time required to drain to 25% was extrapolated, however in a number of cases the drainage was noted to be insignificant even after being left to drain over night.

Some general instability was noted in STP5 due to ascribed dimensions within the granular substrate. Subsequent hole collapse occurred during the test.

All locations and pit dimensions were specified to the clients requirements.

Ground Conditions

Full logs of the ground conditions observed in each of the pits are included in Appendix 2, however, a summary of the ground conditions is provided below:

Table 2: Ground Conditions Encountered

Stratum and Description	Encountered from (m bgl)	Base of strata (m bgl)	Thickness range (m)
Grass over mid-brown sandy slightly gravelly CLAY with rootlets/cobble content. Sand is fine. Gravel consists of medium to coarse, rounded to well-rounded flint. Cobble consist of rounded flint/angular brick. (MADE GROUND / TOPSOIL).	0.0	0.35-0.50	0.35-0.50
Grey heavily mottled orange brown very silty / slightly gravelly/ SAND with occasional roots and rootlets down to 1.25mbgl. Sand is medium to coarse. Gravel consists of fine to coarse, rounded to well rounded flint. (BAGSHOT FORMATION).	0.35-0.50	>1.00 – >3.40	>0.65-3.40

Infiltration Testing Results

1No. test was conducted for STP1, STP3, STP5 and STP7 , however each of these were deemed to be failed tests as “insufficient drainage” was noted in each of these locations, even though in an number of locations the tests ran over night.

1No. test carried out in each of STP4 and STP6 which reported infiltration rates of between 6.15×10^{-7} m/s and 6.28×10^{-7} m/s respectively, which is indicative of “poor drainage” with “low permeability”.

3No. tests were able to be completed in STP2 within the identified silty Sand stratum encountered from 0.35mbgl. The infiltration rates calculated from these tests in ranged between 5.66×10^{-6} m/s to 1.16×10^{-5} m/s

it is considered that the silty Sand in this area of the site has with “medium” to “poor” permeability with “good” to “poor” drainage conditions.

Although the material that the tests were undertaken in were described by the BGS and by the various phases of investigation by Jomas as a Sand, it is worth noting that the BGS classifies the Bagshot Formation as a "Solid deposit". It is therefore possible that the lower than would normally be expected infiltration results recorded could potentially be due to the sand grains being cemented together and as such reducing both the porosity and permeability of these materials.

The reduction in infiltration rate is likely due to the soil pore spaces reaching saturation point after the first test. Subsequent tests would indicate that water is unable to effectively permeate away from the soakage pit as soils become water logged.

We trust that this is satisfactory for your current needs, however please do not hesitate to contact the undersigned if we can be of further assistance on either this or any other project.

Yours sincerely,

approved by



Adam Hines MSc (Hons)

Geo-Environmental Engineer



**Peter Swettenham BSc (Hons) MSc PgCert CEnv
MIEnvSc**

Principal Geotechnical Engineer

Enc.

Appendix 1 – Figures

Appendix 2 – Exploratory Hole Logs

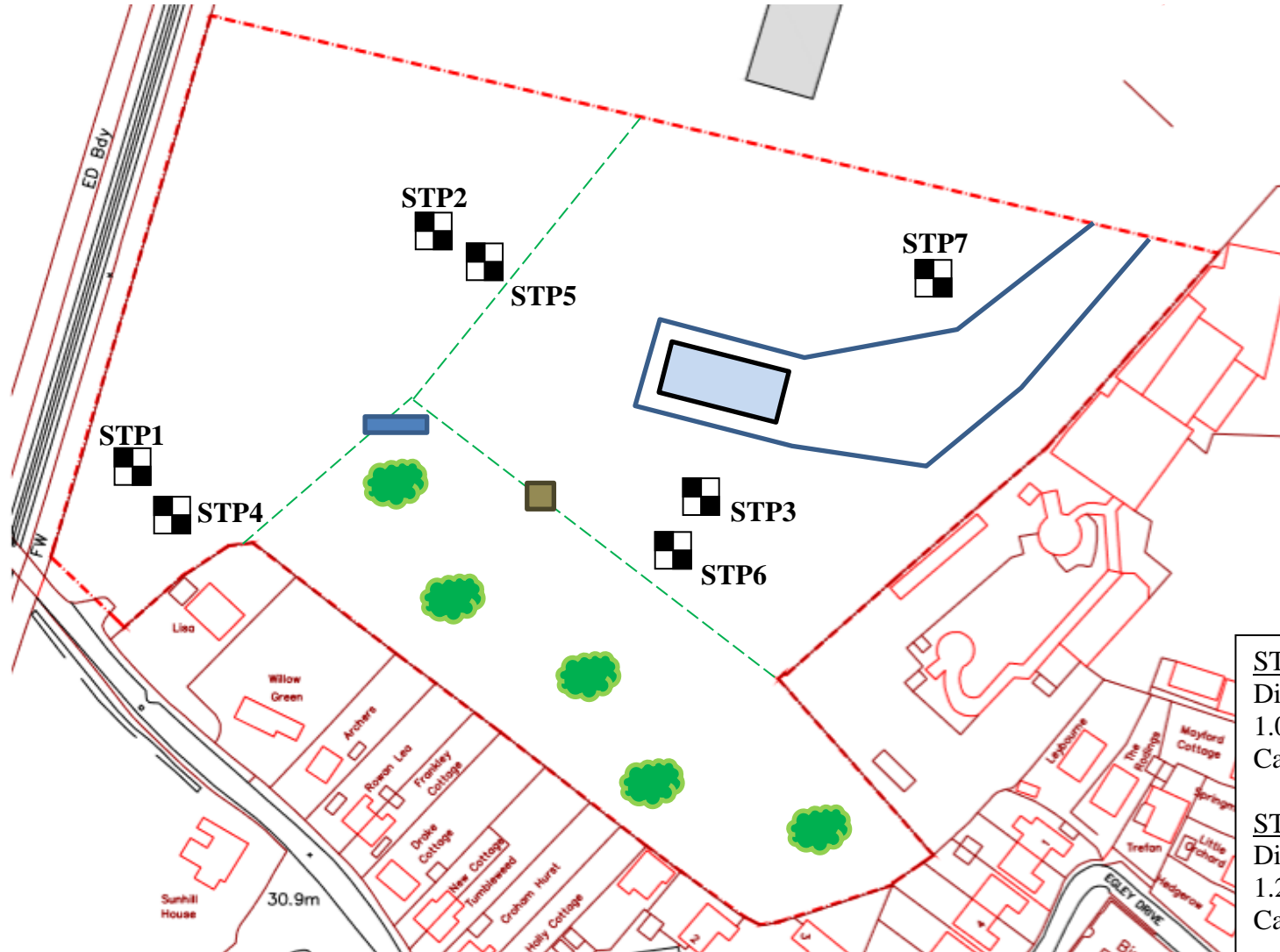
Appendix 3 – Infiltration Rates – Results and Calculations

APPENDIX 1 – FIGURES

Project Name	Egley Road, Woking	Client	Woking Football Club
Project No.	P1381J1459	Date	15/08/2018
Title	Site Location Plan	Figure No	1



Project Name	Egley Road, Woking	Client	Woking Football Club
Project No.	P1381J1459	Date	June 2019
Title	Provisional Infiltration Testing Plan	Prepared By	AM



STP1 – STP3:
 Dimensions:
 1.0m L x 1.0m W x 1.0m D
 Carry out tests from 0.4m bgl

STP4 – STP7:
 Dimensions:
 1.2m L x 0.30m W x 2.4m D
 Carry out tests from 1.0m bgl

APPENDIX 2 – EXPLORATORY HOLE LOGS



TRIAL PIT RECORD

Exploratory Hole No:

STP1

Site Address: Egley Road, Woking, GU22 0AF

Project No: P1381J1459

Client: Goldev Woking Ltd

Ground Level:

Logged By: JLW

Date Commenced: 24/06/2019

Checked By: PSw

Date Completed: 24/06/2019

Type and diameter of equipment: JCB 3CX Eco

Sheet No: 1 Of 1

Pit Dimension: Length: 1.80 Width: 0.95 Depth: 1.00

Remarks

- 1: No water reported.
- 2: Infiltration test carried out in general accordance with BRE 365.
- 3:
- 4:

Sample or Tests			Strata			Strata Description
Type	Depth (mbgl)	Result	Legend	Depth (mbgl)	Water Strikes (mbgl)	
				0.00		Grass over mid-brown very sandy gravelly CLAY with low cobble content. Sand is fine. Gravel consists of fine to coarse, rounded to well rounded flint. Cobble consist of rounded flint. (TOPSOIL).
				0.35		
				0.50		Grey heavily mottled orange brown very silty slightly gravelly SAND. Sand is medium to coarse. Gravel consists of fine to coarse, rounded to well rounded flint. (BAGSHOT FORMATION).
				1.00		
				1.50		
				2.00		
				2.50		
				3.00		
				3.50		
				4.00		
				4.50		
				5.00		



TRIAL PIT RECORD

Exploratory Hole No:

STP2

Site Address: Egley Road, Woking, GU22 0AF

Project No: P1381J1459

Client: Goldev Woking Ltd

Ground Level:

Logged By: JLW

Date Commenced: 24/06/2019

Checked By: PSw

Date Completed: 24/06/2019


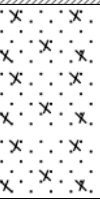
Type and diameter of equipment: JCB 3CX Eco

Sheet No: 1 Of 1

Pit Dimension: Length: 1.70 Width: 1.00 Depth: 1.10

Remarks

- 1: No water reported.
- 2: Infiltration tests carried out in general accordance with BRE 365.
- 3:
- 4:

Sample or Tests			Strata			Strata Description
Type	Depth (mbgl)	Result	Legend	Depth (mbgl)	Water Strikes (mbgl)	
				0.35		Grass over mid-brown very sandy slightly gravelly CLAY with frequent rootlets. Sand is fine. Gravel consists of fine to coarse, rounded to well rounded flint. (TOPSOIL).
				1.10		Grey mottled orange brown very silty SAND with occasional pockets of sand. Sand is medium to coarse. (BAGSHOT FORMATION).
				1.50		
				2.00		
				2.50		
				3.00		
				3.50		
				4.00		
				4.50		
				5.00		



TRIAL PIT RECORD

Exploratory Hole No:

STP3

Site Address: Egley Road, Woking, GU22 0AF

Project No: P1381J1459

Client: Goldev Woking Ltd

Ground Level:

Logged By: JLW

Date Commenced: 25/06/2019

Checked By: PSw

Date Completed: 25/06/2019

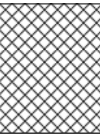

Type and diameter of equipment: JCB 3CX Eco

Sheet No: 1 Of 1

Pit Dimension: Length: 1.80 Width: 0.95 Depth: 1.00

Remarks

- 1: No water reported.
- 2: Infiltration test carried out in general accordance with BRE 365.
- 3:
- 4:

Sample or Tests			Strata			Strata Description
Type	Depth (mbgl)	Result	Legend	Depth (mbgl)	Water Strikes (mbgl)	
				0.50		Grass over mid-brown sandy gravelly clay with low cobble content and occasional rootlets. Sand is fine. Gravel consists of fine to coarse, angular to rounded flint and brick. Cobbles consist of angular brick. (MADE GROUND - Topsoil).
				1.00		Light brown to grey mottled orange brown silty SAND with occasional rootlets, wood fragments and slight organic odour. Sand is medium to coarse. (BAGSHOT FORMATION).
				1.50		
				2.00		
				2.50		
				3.00		
				3.50		
				4.00		
				4.50		
				5.00		



TRIAL PIT RECORD

Exploratory Hole No:

STP4

Site Address:	Egley Road, Woking, GU22 0AF	Project No:	P1381J1459
Client:	Goldev Woking Ltd	Ground Level:	
Logged By:	JLW	Date Commenced:	24/06/2019
Checked By:	PSw	Date Completed:	24/06/2019
Type and diameter of equipment:	JCB 3CX Eco	Sheet No:	1 Of 1
Pit Dimension:	Length: 1.60	Width: 0.35	Depth: 2.40



Remarks

1: No water reported.

2: Infiltration test carried out in general accordance with BRE 365.

3:

4:

Type	Depth (mbgl)	Sample or Tests	Result	Strata			Strata Description
				Legend	Depth (mbgl)	Water Strikes (mbgl)	
	0.00				0.35		Grass over mid-brown sandy slightly gravelly CLAY with frequent rootlets. Sand is fine. Gravel consists of rounded flint. (TOPSOIL).
	0.50				2.40		Grey mottled orange brown very silty SAND. Sand is medium to coarse. (BAGSHOT FORMATION).
	1.00						
	1.50						
	2.00						
	2.50						
	3.00						
	3.50						
	4.00						
	4.50						
	5.00						



TRIAL PIT RECORD

Exploratory Hole No:

STP5

Site Address: Egley Road, Woking, GU22 0AF

Project No: P1381J1459

Client: Goldev Woking Ltd

Ground Level:

Logged By: JLW

Date Commenced: 24/06/2019

Checked By: PSw

Date Completed: 24/06/2019

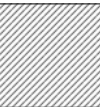


Type and diameter of equipment: JCB 3CX Eco

Sheet No: 1 Of 1

Pit Dimension: Length: 1.70 Width: 0.32 Depth: 2.40

Remarks

- 1: No water reported.
- 2: Infiltration test carried out in general accordance with BRE 365.
- 3:
- 4:

Sample or Tests			Strata			Strata Description
Type	Depth (mbgl)	Result	Legend	Depth (mbgl)	Water Strikes (mbgl)	
				0.40		Grass over mid-brown sandy slightly gravelly CLAY with frequent rootlets. Sand is fine. Gravel consists of medium to coarse, rounded to well rounded flint. (TOPSOIL).
				2.40		Grey mottled becoming slightly mottled orange brown very silty becoming slightly silty SAND. Sand is medium to coarse. (BAGSHOT FORMATION).
						



TRIAL PIT RECORD

Exploratory Hole No:

STP6

Site Address:	Egley Road, Woking, GU22 0AF	Project No:	P1381J1459
Client:	Goldev Woking Ltd	Ground Level:	
Logged By:	JLW	Date Commenced:	25/06/2019
Checked By:	PSw	Date Completed:	25/06/2019
Type and diameter of equipment:	JCB 3CX Eco	Sheet No:	1 Of 1
Pit Dimension:	Length: 1.80	Width: 0.35	Depth: 2.43

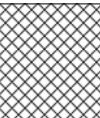

Remarks

1: No water reported.

2: Infiltration test carried out in general accordance with BRE 365.

3:

4:

Sample or Tests			Strata			Strata Description
Type	Depth (mbgl)	Result	Legend	Depth (mbgl)	Water Strikes (mbgl)	
				0.00 - 0.45		Grass over mid-brown very sandy slightly gravelly clay with frequent rootlets and occasional roots. Sand is fine. Gravel consists of fine to coarse, rounded flint with occasional angular brick. (MADE GROUND - Topsoil).
				0.45 - 2.45		Light brown to grey mottled orange brown very silty becoming slightly silty SAND with occasional roots and rootlets down to 1.25mbgl. Sand is medium to coarse. (BAGSHOT FORMATION).
				2.45 - 5.00		



TRIAL PIT RECORD

Exploratory Hole No:

STP7

Site Address: Egley Road, Woking, GU22 0AF

Project No: P1381J1459

Client: Goldev Woking Ltd

Ground Level:

Logged By: JLW

Date Commenced: 25/06/2019

Checked By:

Date Completed: 25/06/2019

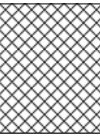

Type and diameter of equipment: JCB 3CX Eco

Sheet No: 1 Of 1

Pit Dimension: Length: 1.60 Width: 0.35 Depth: 2.40

Remarks

- 1: No water reported.
- 2: Infiltration test carried out in general accordance with BRE 365.
- 3:
- 4:

Type	Depth (mbgl)	Sample or Tests	Result	Strata			Strata Description
				Legend	Depth (mbgl)	Water Strikes (mbgl)	
	0.00				0.50		Grass over mid-brown very sandy gravelly clay with rootlets. Sand is fine. Gravel consists of fine to coarse, angular to rounded flint and brick. (MADE GROUND - Topsoil).
	0.50				2.40		Light brown mottled becoming slightly mottled orange brown very silty becoming slightly silty SAND. Sand is medium to coarse. (BAGSHOT FORMATION).
	2.50						
	3.00						
	3.50						
	4.00						
	4.50						
	5.00						



TRIAL PIT RECORD

Exploratory Hole No: TP8 - OBS

Site Address:	Egley Road, Woking, GU22 0AF	Project No:	P1381J1459
Client:	Goldev Woking Ltd	Ground Level:	
Logged By:	JLW	Date Commenced:	24/06/2019
Checked By:		Date Completed:	24/06/2019
Type and diameter of equipment:	JCB 3CX Eco	Sheet No:	1 Of 1
Pit Dimension:	Length: 2.00	Width: 1.00	Depth: 3.90

Remarks

1: Material reported to be slightly damp from ~3.70mbgl.

2: Pit left open for 35mins and no water seepage was noted. Monitoring well nearby recorded water at ~4.20mbgl.

3:

4:

Type	Depth (mbgl)	Sample or Tests	Result	Strata			Strata Description
				Legend	Depth (mbgl)	Water Strikes (mbgl)	
	0.00						Grass over mid-brown very sandy slightly gravelly CLAY with frequent rootlets. Sand is fine. Gravel consists of fine to coarse, rounded flint. (TOPSOIL).
	0.50				0.50		Light brown to grey mottled orange brown very silty SAND. Sand is medium to coarse. (BAGSHOT FORMATION).
	1.00						
	1.50						
	2.00						
	2.50						
	3.00				3.00		Light brown to grey slightly mottled orange brown SAND. Sand is medium to coarse. (BAGSHOT FORMATION).
	3.50						
	4.00				3.90		
	4.50						
	5.00						

APPENDIX 3 – INFILTRATION RATES – RESULTS AND CALCULATIONS

BRE 365 INFILTRATION TESTS

JOMAS JOB NAME: Egley Road

CALCULATING ENGINEER: AJH
APPROVED BY: PS

DATE: 26 June 2019
DATE: 27 June 2019

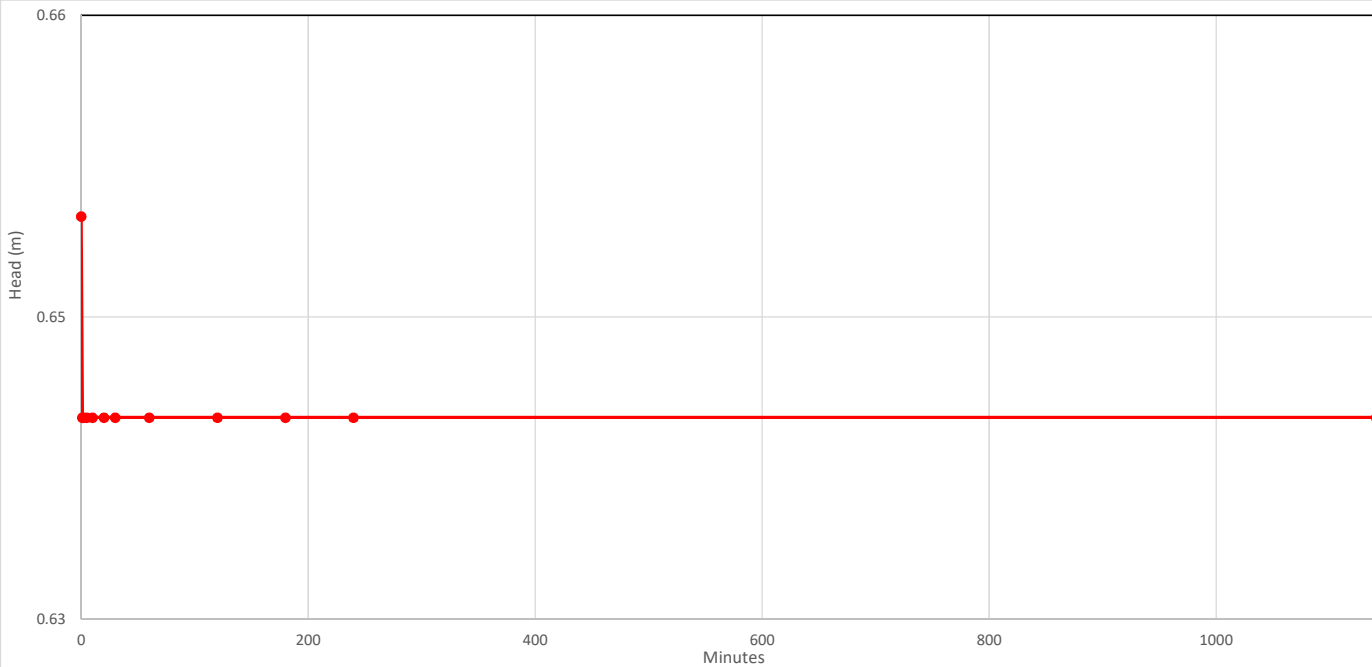
Notes:

Dw = depth to water
Dg = head of water in the pit

JOMAS JOB NO.: P1381J1459
TEST LOCATION: STP1
DATE OF TEST: 24 June 2019

Pit Details
Length 1.2 m
Breadth 0.95 m
Depth 1.0 m
Groundwater? N
Filled With Gravel? N

	STP1 - Test 1	STP1 - Test 2	STP1 - Test 3
Dg 75% (m)	0.49		
Tp 75%			
Dg 25%	0.16		
Tp 25%			
Vp75% - Vp25% (m ³)	0.37		
ap50% (m ²)	2.54		
Tp75-Tp25 (min)			
Soil infiltration rate (m/sec)	Insuff. Drain		
Permeability Description			
Drainage Conditions			



STP1 - Test 1			STP1 - Test 2			STP1 - Test 3		
Min	Dw	Dg	Min	Dw	Dg	Min	Dw	Dg
0	0.36	0.65						
1	0.37	0.64						
2	0.37	0.64						
5	0.37	0.64						
10	0.37	0.64						
20	0.37	0.64						
30	0.37	0.64						
60	0.37	0.64						
120	0.37	0.64						
180	0.37	0.64						
240	0.37	0.64						
1141	0.37	0.64						
	Min	Dg		Min	Dg		Min	Dg
	Insuff. Drain							
75%	0.488		75%			75%		
	Insuff. Drain							
25%	0.163		25%			25%		

BRE 365 INFILTRATION TESTS

JOMAS JOB NAME: Egley Road

CALCULATING ENGINEER: AJH
APPROVED BY: PS

DATE: 26 June 2019
DATE: 27 June 2019

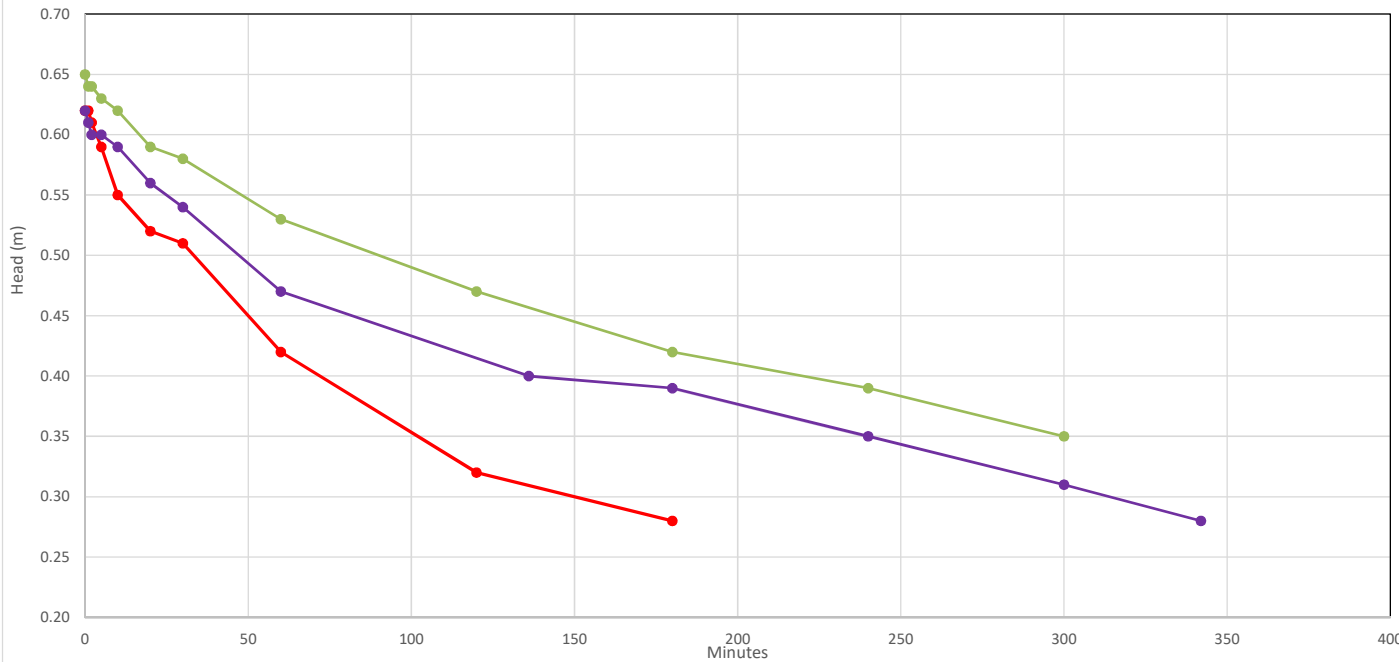
Notes:

Dw = depth to water
Dg = head of water in the pit

JOMAS JOB NO.: P1381J1459
TEST LOCATION: STP2
DATE OF TEST: 25 June 2019

Pit Details
Length 1.7 m
Breadth 1 m
Depth 1.0 m
Groundwater? N
Filled With Gravel? N

	STP2 - Test 1	STP2 - Test 2	STP2 - Test 3
Dg 75% (m)	0.47	0.47	0.49
Tp 75%	45.00	65.43	102.50
Dg 25%	0.16	0.16	0.16
Tp 25%	269.42	525.08	621.69
Vp75% - Vp25% (m ³)	0.53	0.53	0.22
ap50% (m ²)	3.37	3.37	3.46
Tp75-Tp25 (min)	224.42	459.65	519.19
Soil infiltration rate (m/sec)	1.16E-05	5.66E-06	2.05E-06
Permeability Description	Medium	Low	Poor
Drainage Conditions	Good	Poor	Poor



STP2 - Test 1			STP2 - Test 2			STP2 - Test 3		
Min	Dw	Dg	Min	Dw	Dg	Min	Dw	Dg
0	0.39	0.62	0	0.39	0.62	0	0.36	0.65
1	0.39	0.62	1	0.40	0.61	1	0.37	0.64
2	0.40	0.61	2	0.41	0.60	2	0.37	0.64
5	0.42	0.59	5	0.41	0.60	5	0.38	0.63
10	0.46	0.55	10	0.42	0.59	10	0.39	0.62
20	0.49	0.52	20	0.45	0.56	20	0.42	0.59
30	0.50	0.51	30	0.47	0.54	30	0.43	0.58
60	0.59	0.42	60	0.54	0.47	60	0.48	0.53
120	0.69	0.32	136	0.61	0.40	120	0.54	0.47
180	0.73	0.28	180	0.62	0.39	180	0.59	0.42
			240	0.66	0.35	240	0.62	0.39
			300	0.70	0.31	300	0.66	0.35
			342	0.73	0.28			
	Min	Dg		Min	Dg		Min	Dg
	Interpolated			Interpolated			Interpolated	
75%	45	0.465	75%	65.43	0.465	75%	102.5	0.488
	Extrapolated			Extrapolated			Extrapolated	
25%	269.4	0.155	25%	525	0.155	25%	621.7	0.163

BRE 365 INFILTRATION TESTS

JOMAS JOB NAME: Egley Road

CALCULATING ENGINEER: AJH
APPROVED BY: PS

DATE: 26 June 2019
DATE: 27 June 2019

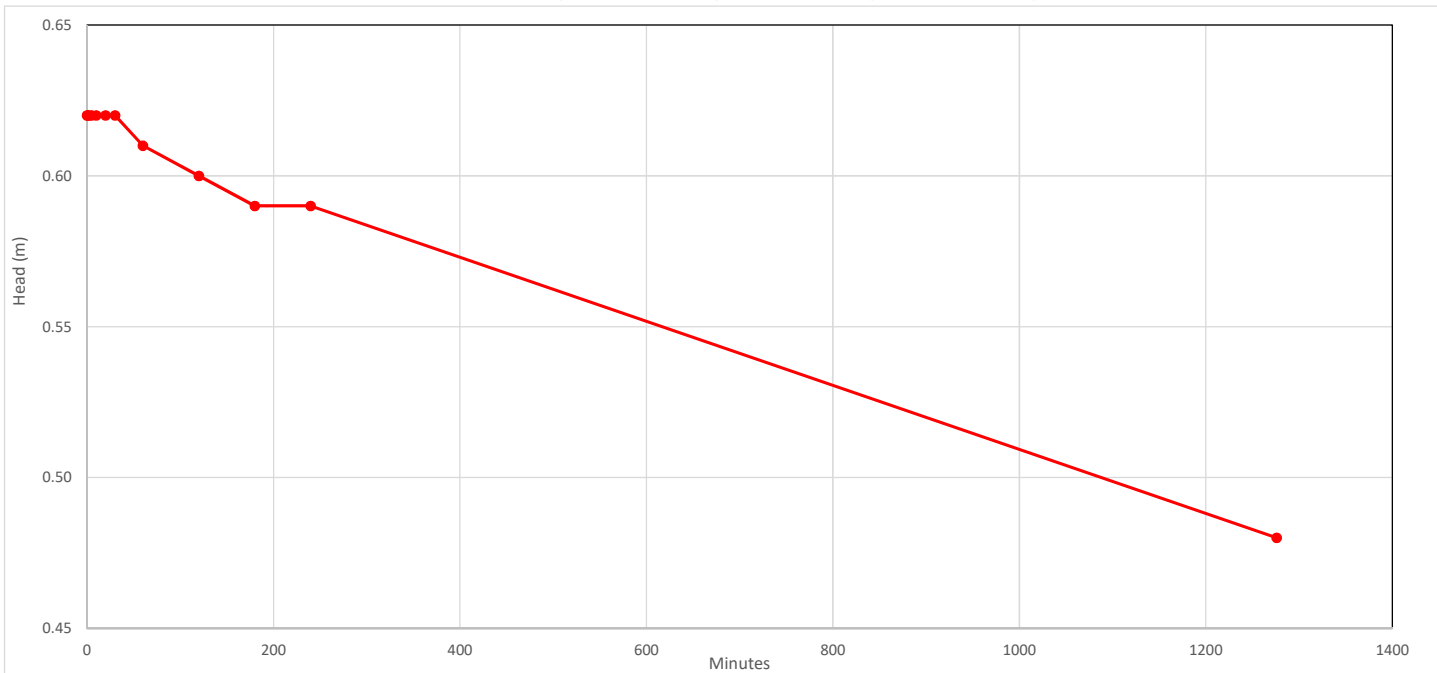
Notes:

Dw = depth to water
Dg = head of water in the pit

JOMAS JOB NO.: P2052J1651
TEST LOCATION: STP3
DATE OF TEST: 25 June 2019
Pit Details
Length 1.8 m
Breadth 0.95 m
Depth 1.0 m
Groundwater? N
Filled With Gravel? N

	STP3 - Test 1	STP3 - Test 2	STP3 - Test 3
Dg 75% (m)	0.47		
Tp 75%			
Dg 25%	0.16		
Tp 25%			
Vp75% - Vp25% (m ³)	0.53		
ap50% (m ²)	3.42		
Tp75-Tp25 (min)			
Soil infiltration rate (m/sec)	Insuff. Drain		
Permeability Description			
Drainage Conditions			

STP3 - Test 1			STP3 - Test 2			STP3 - Test 3		
Min	Dw	Dg	Min	Dw	Dg	Min	Dw	Dg
0	0.39	0.62						
1	0.39	0.62						
2	0.39	0.62						
5	0.39	0.62						
10	0.39	0.62						
20	0.39	0.62						
30	0.39	0.62						
60	0.40	0.61						
120	0.41	0.60						
180	0.42	0.59						
240	0.42	0.59						
1276	0.53	0.48						
	Min	Dg		Min	Dg		Min	Dg
	Insuff. Drain							
75%	0.465		75%			75%		
	Insuff. Drain							
25%	0.155		25%			25%		



BRE 365 INFILTRATION TESTS

JOMAS JOB NAME: Egley Road

CALCULATING ENGINEER: AJH

DATE: 26 June 2019

Notes:

APPROVED BY: PS

DATE: 27 June 2019

Dw = depth to water

Dg = head of water in the pit

JOMAS JOB NO.: P2052J1651

TEST LOCATION: STP4

DATE OF TEST: 24 June 2019

Pit Details

Length 1.6 m

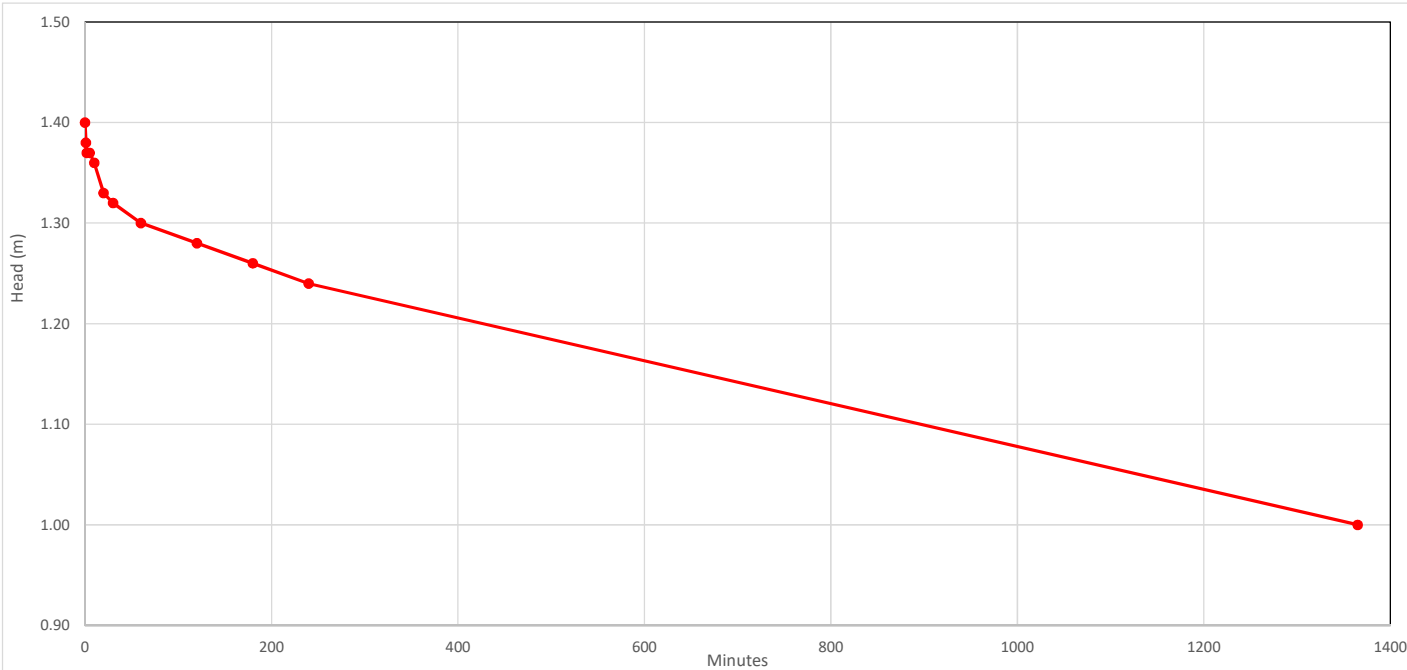
Breadth 0.35 m

Depth 2.4 m

Groundwater? N

Filled With Gravel? N

	STP4 - Test 1	STP4 - Test 2	STP4 - Test 3
Dg 75% (m)	1.05		
Tp 75%	1130.63		
Dg 25%	0.35		
Tp 25%	4361.68		
Vp75% - Vp25% (m ³)	0.39		
ap50% (m ²)	3.29		
Tp75-Tp25 (min)	3231.05		
Soil infiltration rate (m/sec)	6.15E-07		
Permeability Description	Low		
Drainage Conditions	Poor		



STP4 - Test 1			STP4 - Test 2			STP4 - Test 3		
Min	Dw	Dg	Min	Dw	Dg	Min	Dw	Dg
0	1.00	1.40						
1	1.02	1.38						
2	1.03	1.37						
5	1.03	1.37						
10	1.04	1.36						
20	1.07	1.33						
30	1.08	1.32						
60	1.10	1.30						
120	1.12	1.28						
180	1.14	1.26						
240	1.16	1.24						
1365	1.40	1.00						
	Min	Dg		Min	Dg		Min	Dg
	Interpolated							
75%	1131	1.05	75%			75%		
	Extrapolated							
25%	4362	0.35	25%			25%		

BRE 365 INFILTRATION TESTS

JOMAS JOB NAME: Egley Road

CALCULATING ENGINEER: AJH
APPROVED BY: PS

DATE: 26 June 2019
DATE: 27 June 2019

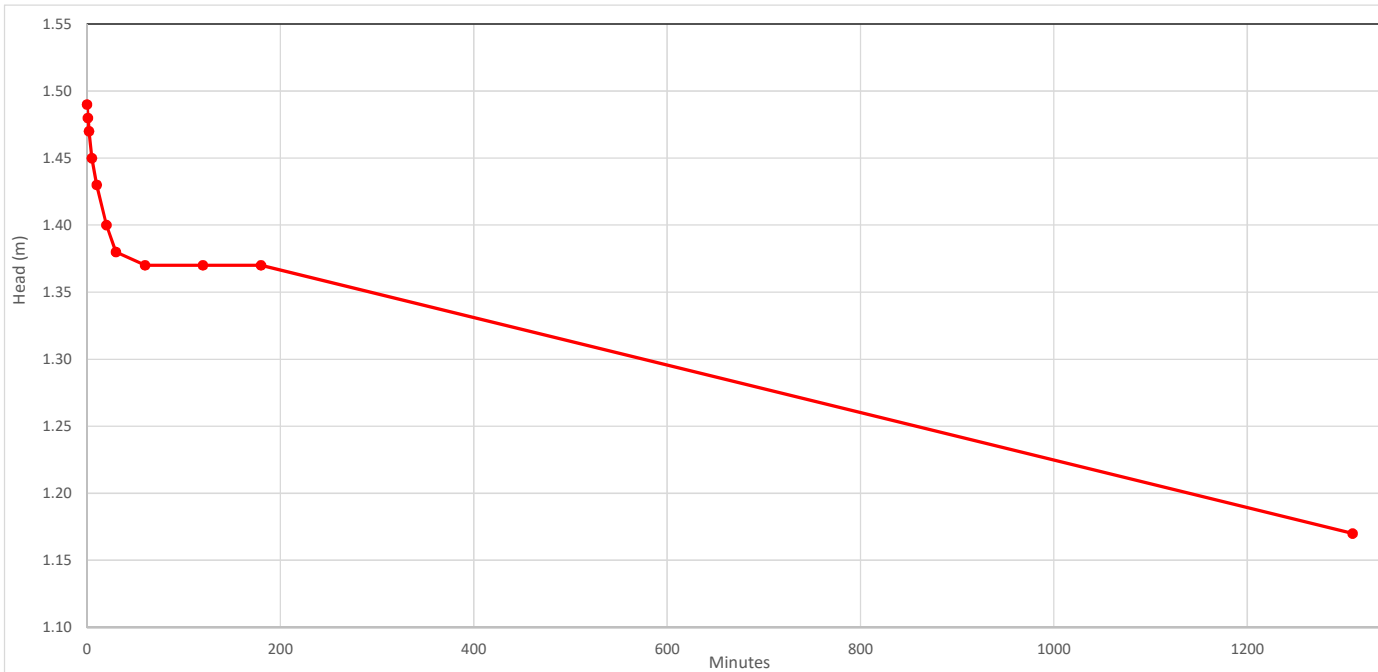
Notes:

Dw = depth to water
Dg = head of water in the pit

JOMAS JOB NO.: P2052J1651
TEST LOCATION: STP5
DATE OF TEST: 24 June 2019

Pit Details
Length 1.7 m
Breadth 0.32 m
Depth 2.4 m
Groundwater? N
Filled With Gravel? N

	STP5 - Test 1	STP5 - Test 2	STP5 - Test 3
Dg 75% (m)	1.12		
Tp 75%			
Dg 25%	0.37		
Tp 25%			
Vp75% - Vp25% (m ³)	0.41		
ap50% (m ²)	3.55		
Tp75-Tp25 (min)			
Soil infiltration rate (m/sec)	Insuff. Drain		
Permeability Description			
Drainage Conditions			



STP5 - Test 1			STP5 - Test 2			STP5 - Test 3		
Min	Dw	Dg	Min	Dw	Dg	Min	Dw	Dg
0	0.91	1.49						
1	0.92	1.48						
2	0.93	1.47						
5	0.95	1.45						
10	0.97	1.43						
20	1.00	1.40						
30	1.02	1.38						
60	1.03	1.37						
120	1.03	1.37						
180	1.03	1.37						
1309	1.23	1.17						
	Min	Dg		Min	Dg		Min	Dg
	Insuff. Drain							
75%	1.118		75%			75%		
	Insuff. Drain							
25%	0.373		25%			25%		

BRE 365 INFILTRATION TESTS

JOMAS JOB NAME: Egley Road

CALCULATING ENGINEER: AJH

DATE: 26 June 2019

Notes:

APPROVED BY: PS

DATE: 27 June 2019

Dw = depth to water

Dg = head of water in the pit

JOMAS JOB NO.: P2052J1651

TEST LOCATION: STP6

DATE OF TEST: 25 June 2019

Pit Details

Length 1.8 m

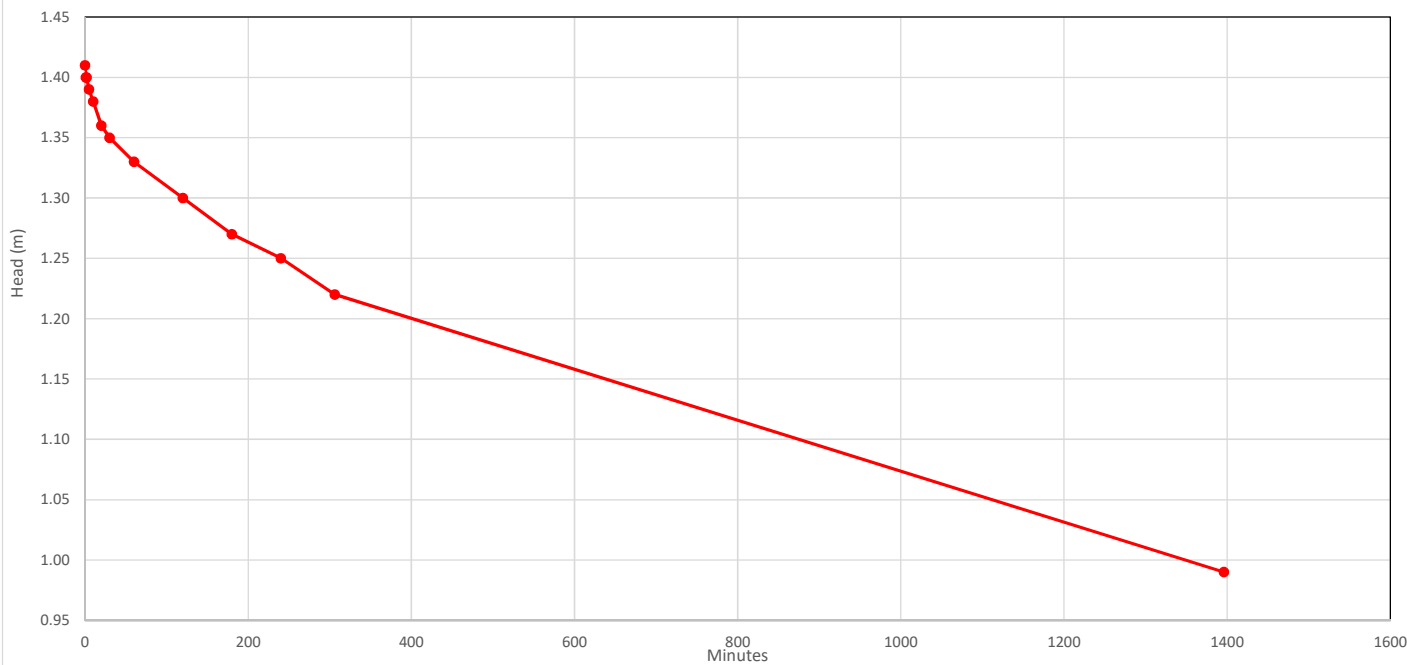
Breadth 0.35 m

Depth 2.4 m

Groundwater? N

Filled With Gravel? N

	STP6 - Test 1	STP6 - Test 2	STP6 - Test 3
Dg 75% (m)	1.06		
Tp 75%	1076.11		
Dg 25%	0.35		
Tp 25%	4296.86		
Vp75% - Vp25% (m ³)	0.44		
ap50% (m ²)	3.66		
Tp75-Tp25 (min)	3220.76		
Soil infiltration rate (m/sec)	6.28E-07		
Permeability Description	Low		
Drainage Conditions	Poor		



STP6 - Test 1			STP6 - Test 2			STP6 - Test 3		
Min	Dw	Dg	Min	Dw	Dg	Min	Dw	Dg
0	1.02	1.41						
1	1.03	1.40						
2	1.03	1.40						
5	1.04	1.39						
10	1.05	1.38						
20	1.07	1.36						
30	1.08	1.35						
60	1.10	1.33						
120	1.13	1.30						
180	1.16	1.27						
240	1.18	1.25						
306	1.21	1.22						
1396	1.44	0.99						
	Min	Dg		Min	Dg		Min	Dg
	Interpolated							
75%	1076	1.058	75%			75%		
	Extrapolated							
25%	4297	0.353	25%			25%		

BRE 365 INFILTRATION TESTS

JOMAS JOB NAME: Hundreds Farm

CALCULATING ENGINEER: AJH
 APPROVED BY: PS

DATE: 26 June 2019
 DATE: 27 June 2019

Notes:

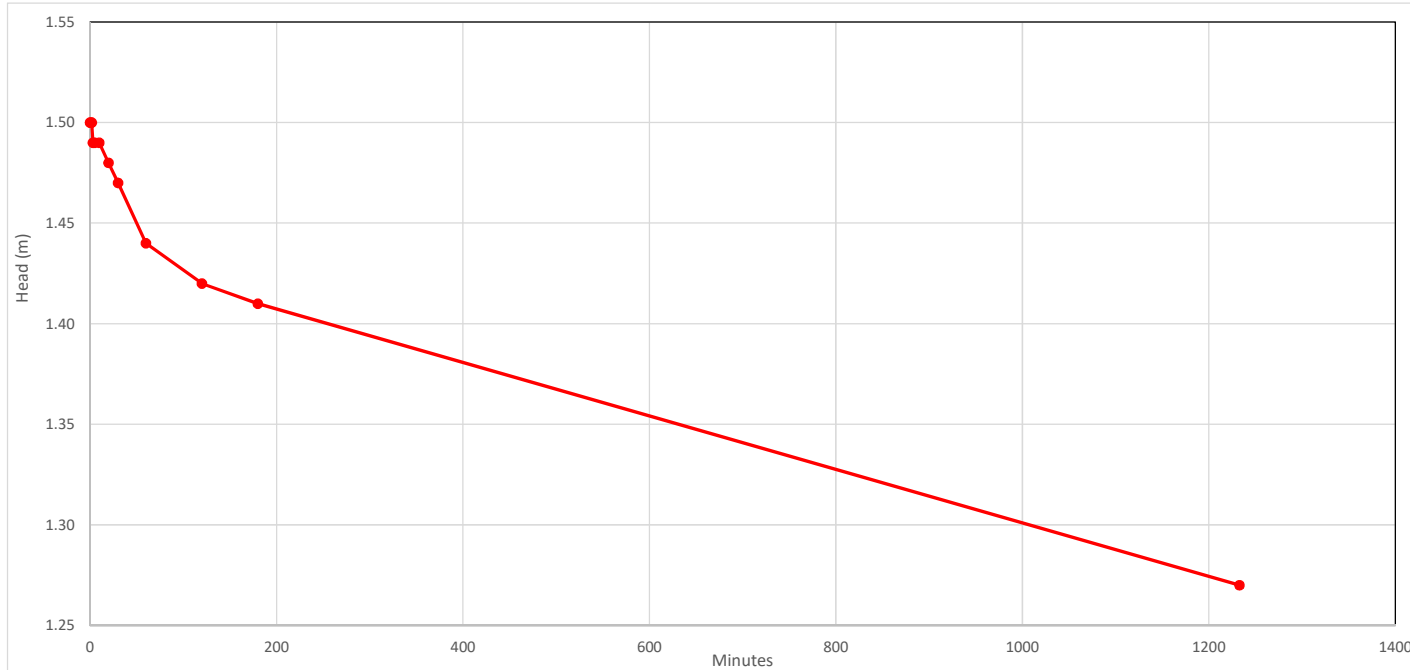
Dw = depth to water
 Dg = head of water in the pit

JOMAS JOB NO.: P2052J1651
 TEST LOCATION: STP7
 DATE OF TEST: 25 June 2019

Pit Details

Length 1.6 m
 Breadth 0.35 m
 Depth 2.4 m
 Groundwater? N
 Filled With Gravel? N

	STP7 - Test 1	STP7 - Test 2	STP7 - Test 3
Dg 75% (m)	1.13		
Tp 75%			
Dg 25%	0.38		
Tp 25%			
Vp75% - Vp25% (m ³)	0.42		
ap50% (m ²)	3.49		
Tp75-Tp25 (min)			
Soil infiltration rate (m/sec)	Insuff. Drain		
Permeability Description			
Drainage Conditions			



STP7 - Test 1			STP7 - Test 2			STP7 - Test 3		
Min	Dw	Dg	Min	Dw	Dg	Min	Dw	Dg
0	0.90	1.50						
1	0.90	1.50						
2	0.90	1.50						
3	0.91	1.49						
5	0.91	1.49						
10	0.91	1.49						
20	0.92	1.48						
30	0.93	1.47						
60	0.96	1.44						
120	0.98	1.42						
180	0.99	1.41						
1233	1.13	1.27						
	Min	Dg		Min	Dg		Min	Dg
		Insuff. Drain						
75%		1.125	75%			75%		
		Insuff. Drain						
25%		0.375	25%			25%		