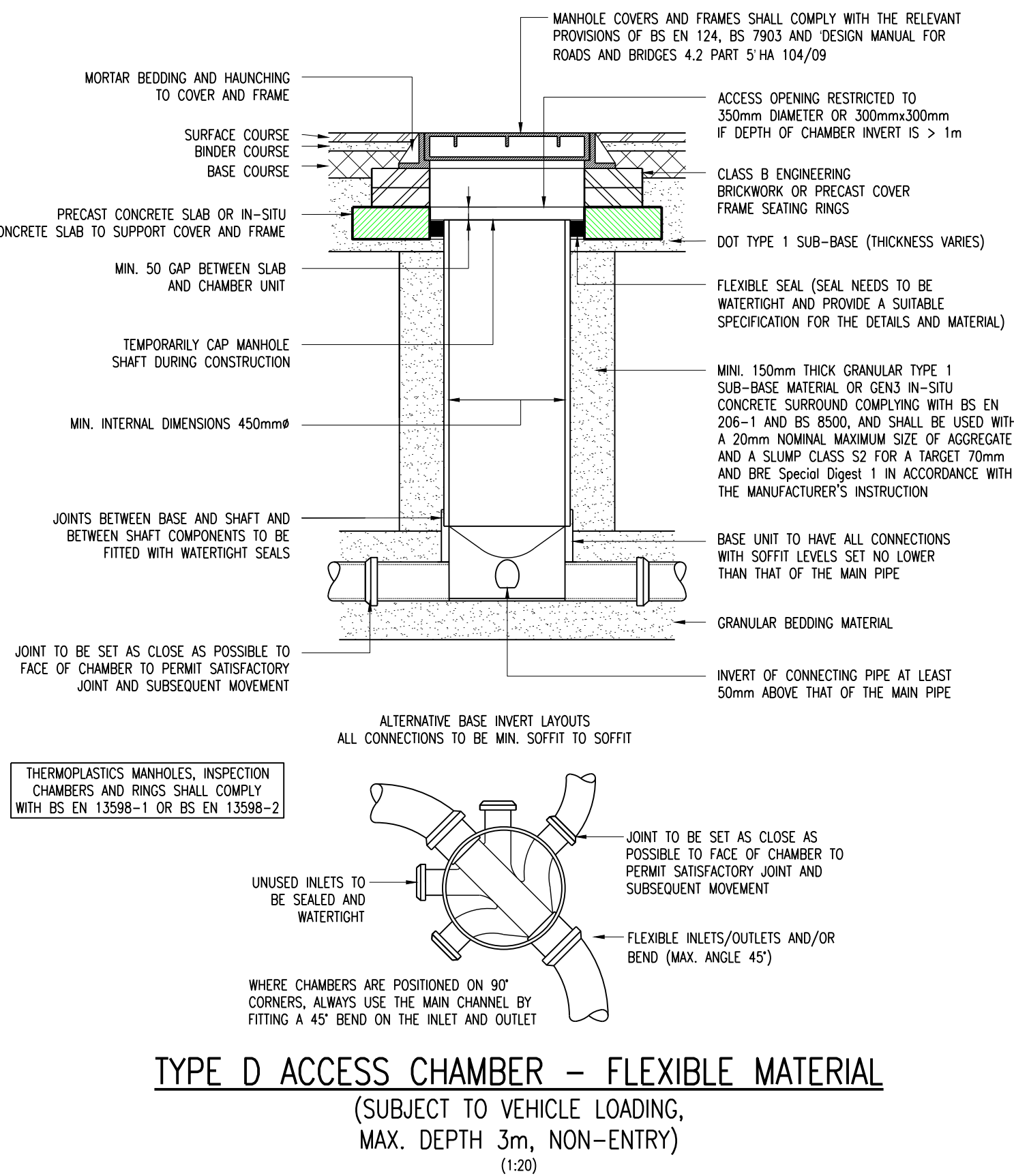
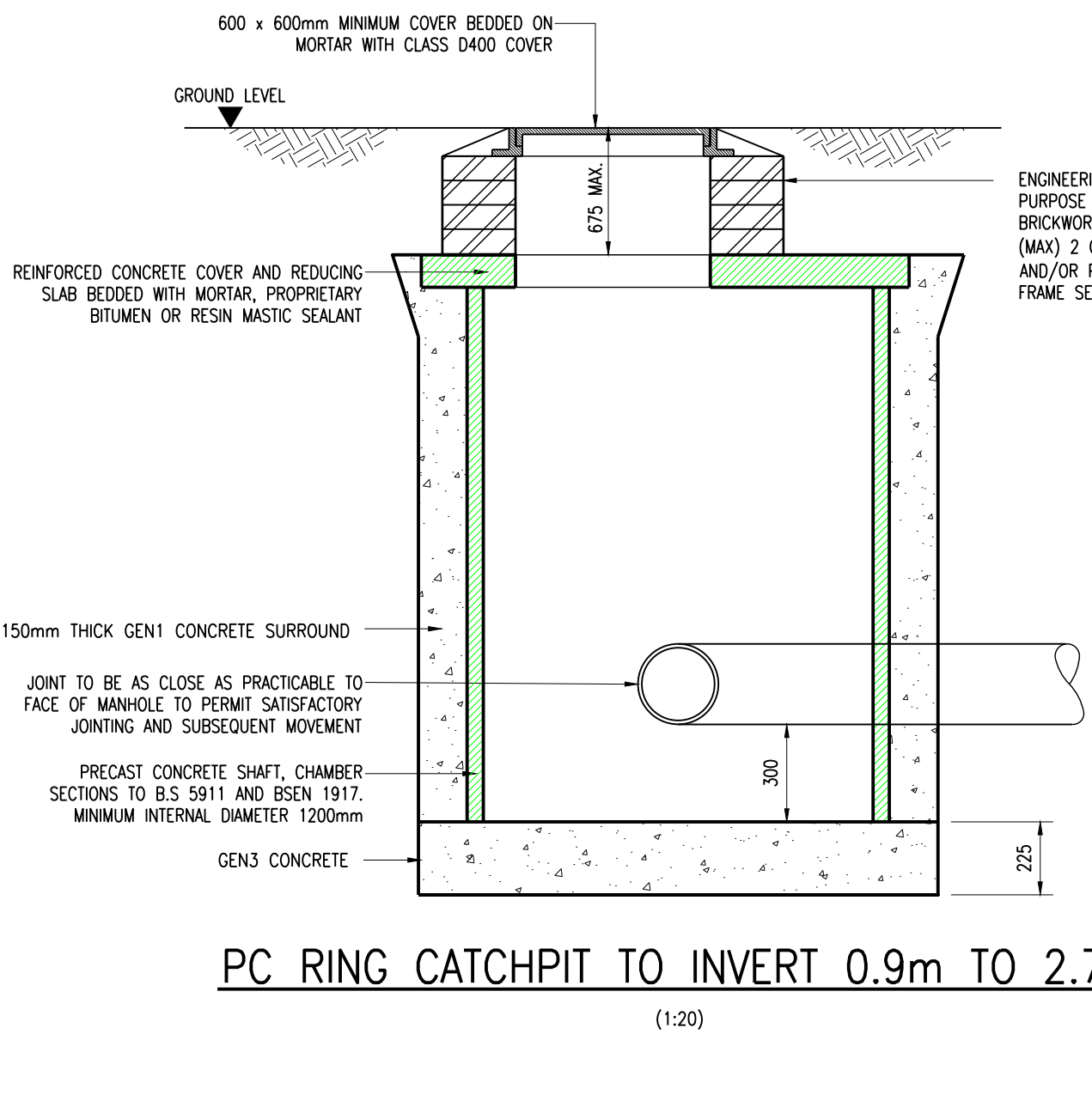
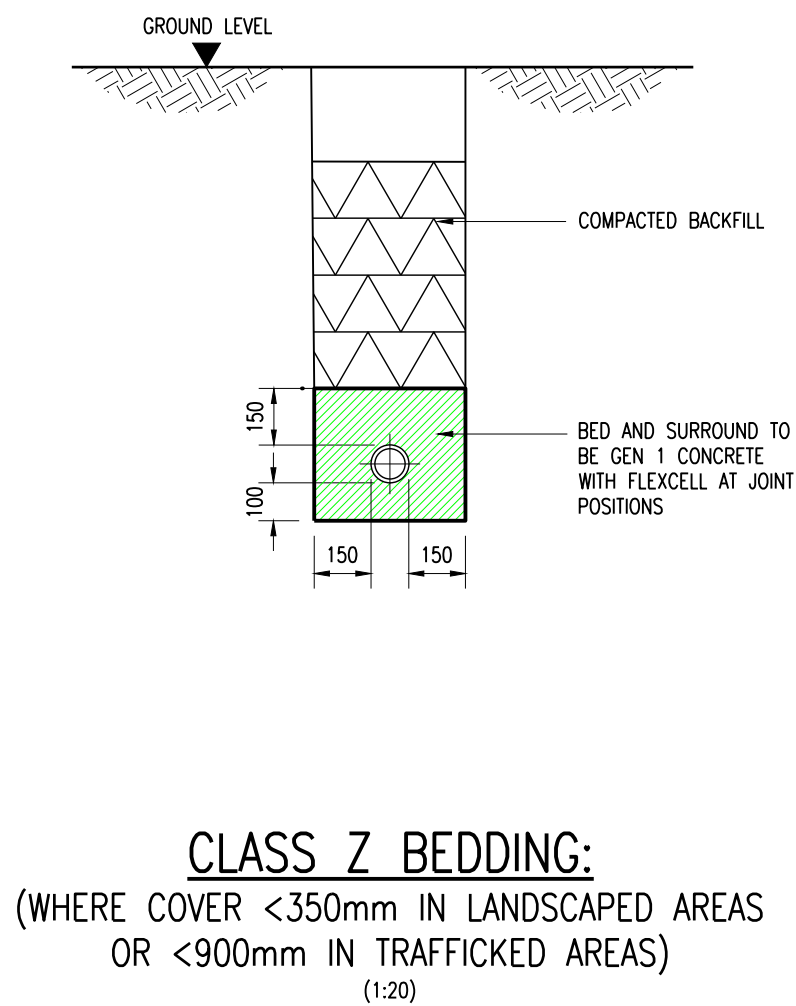
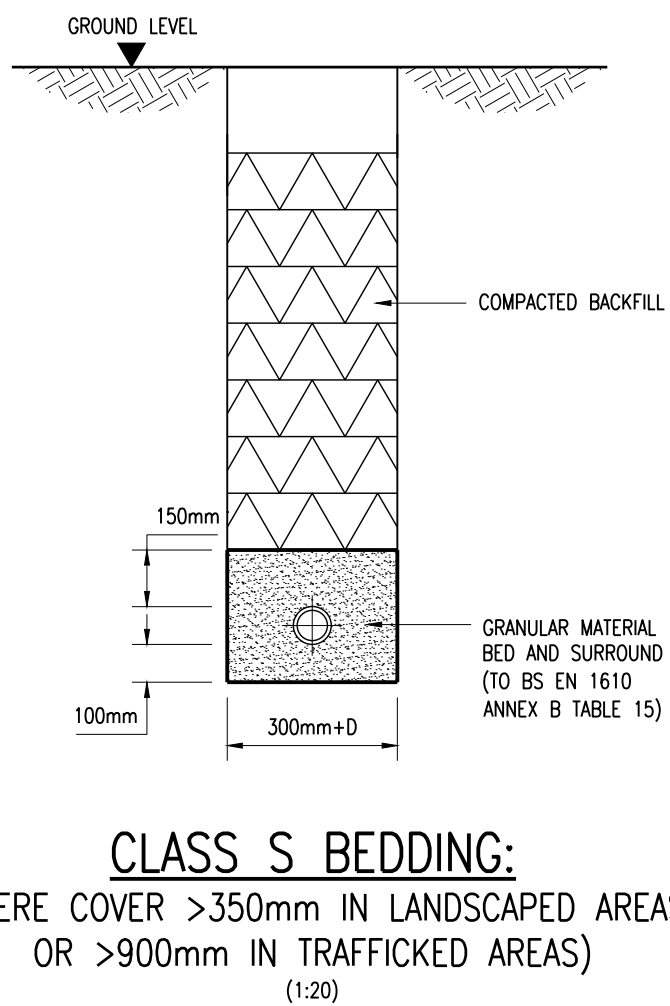
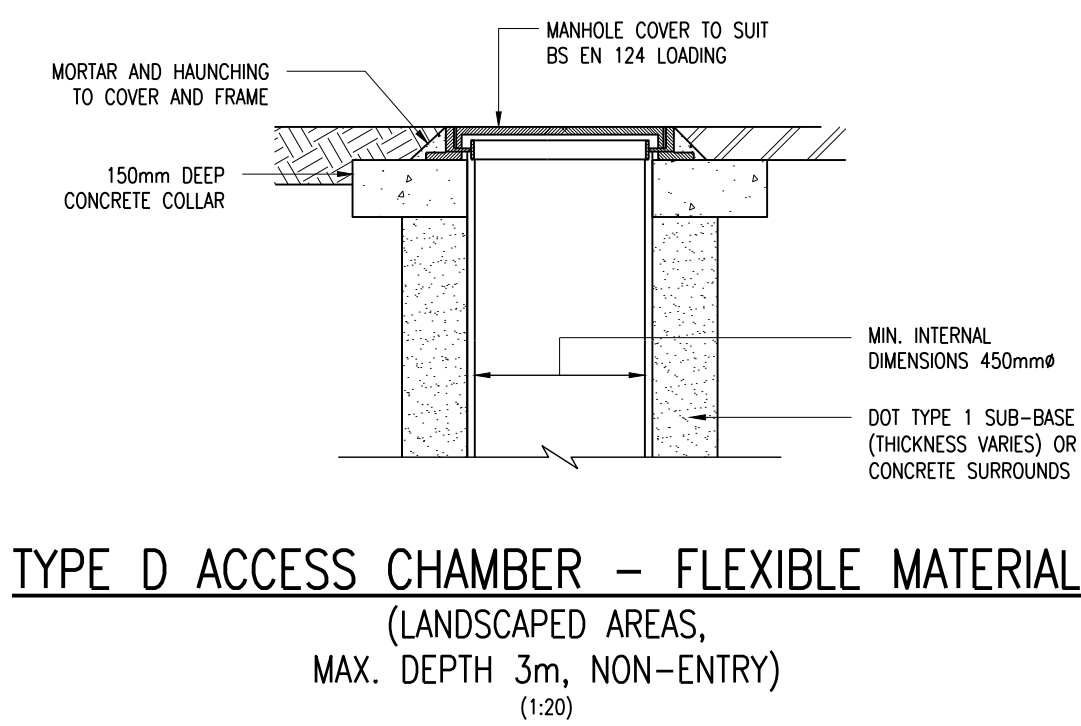
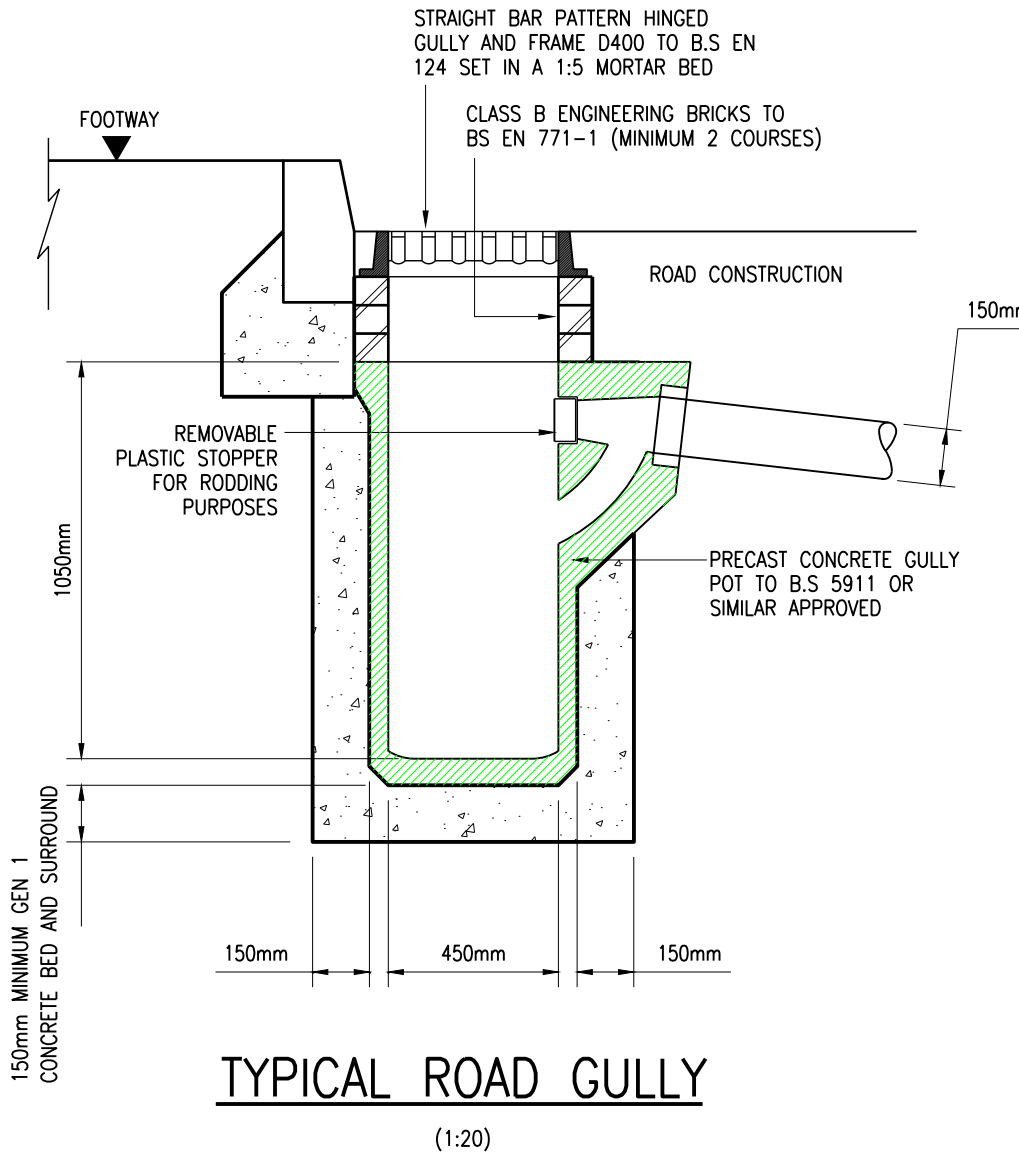
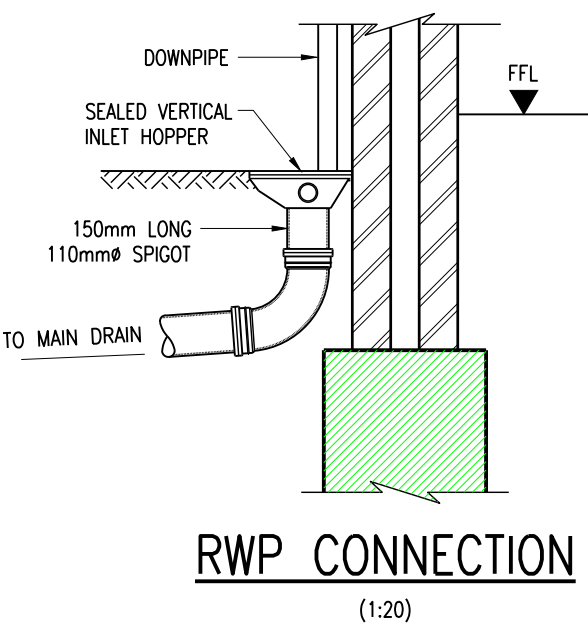
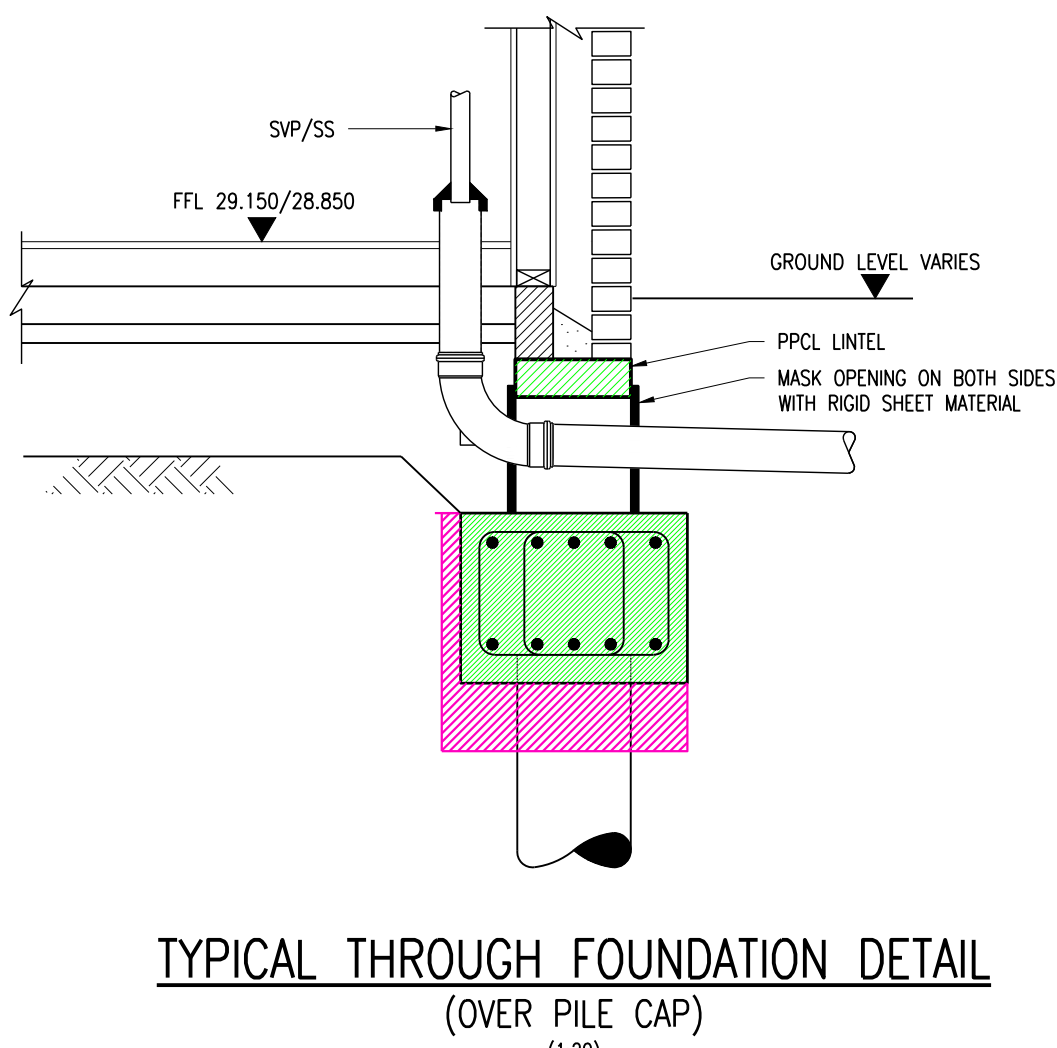
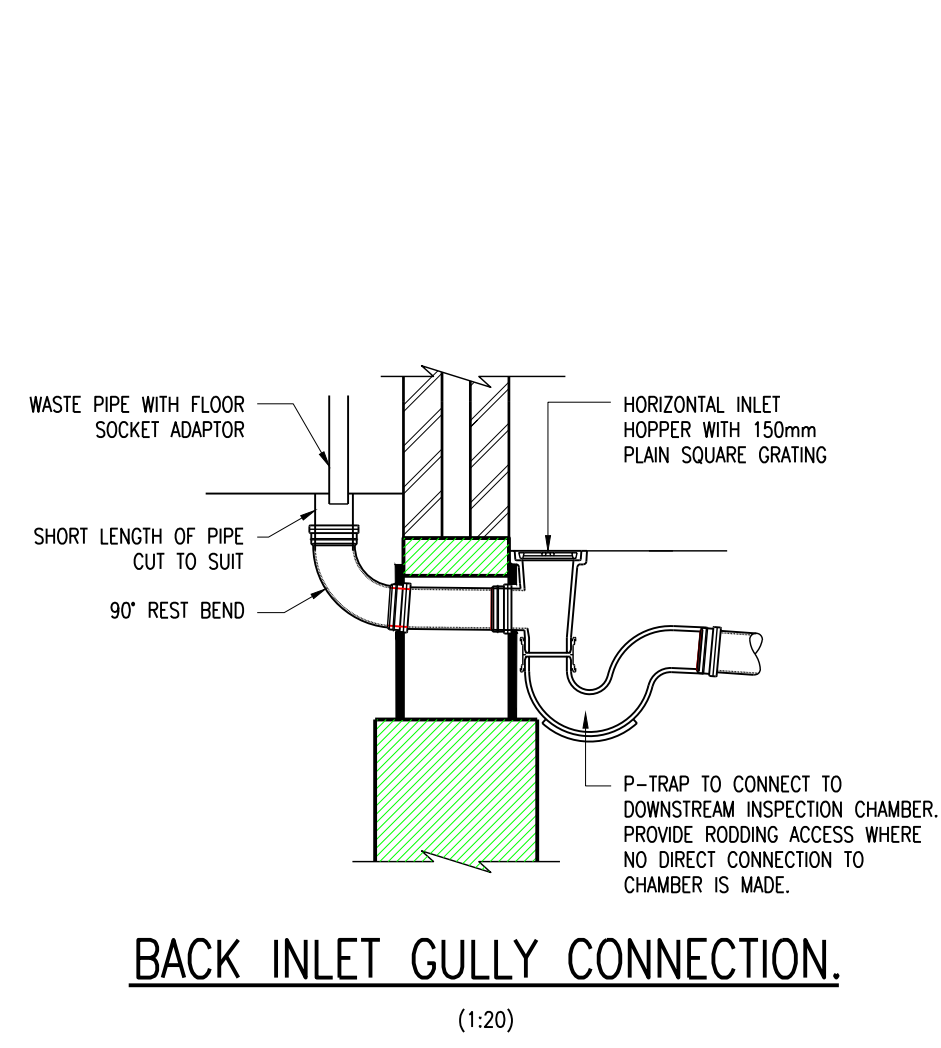
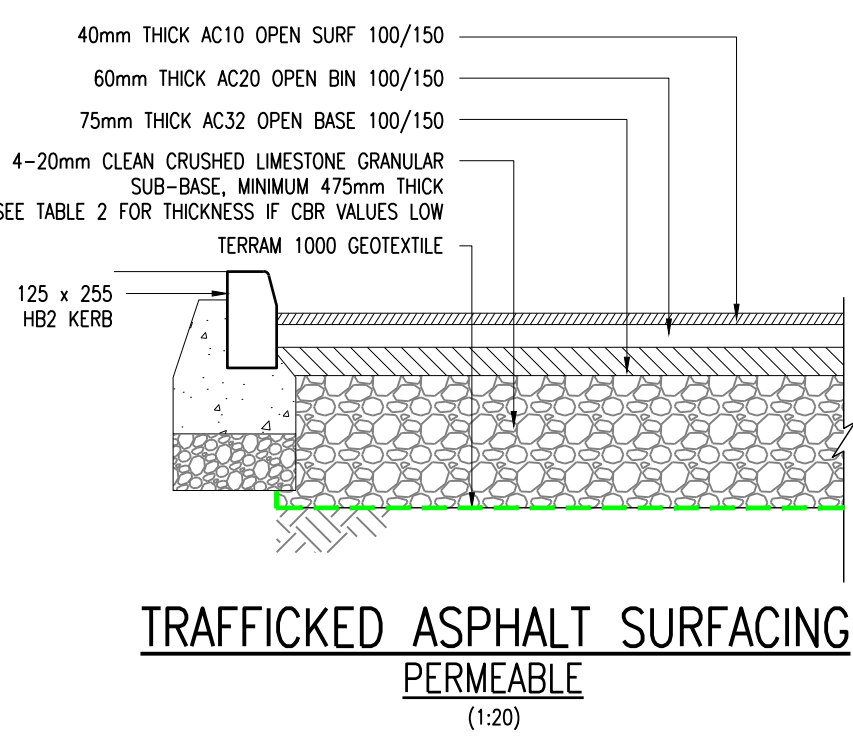
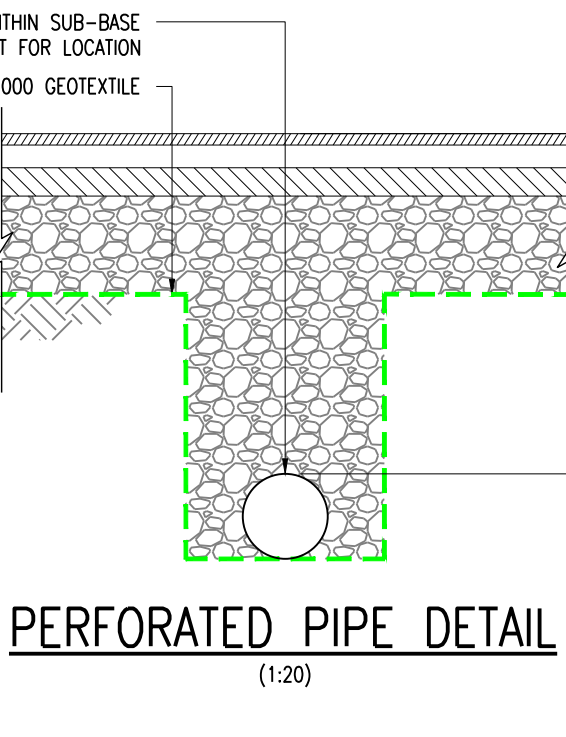
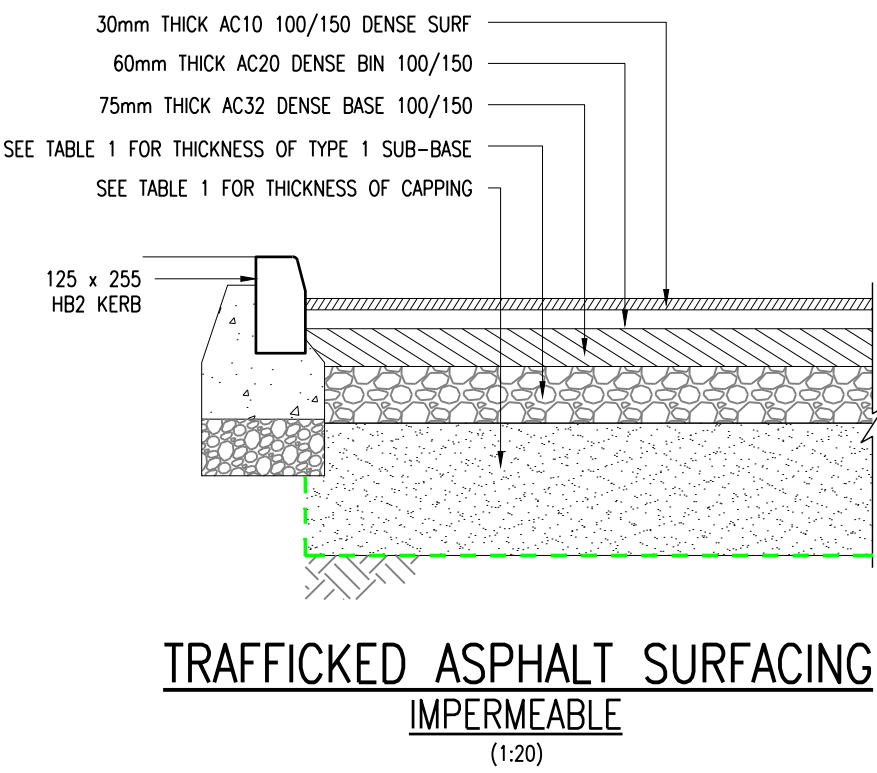
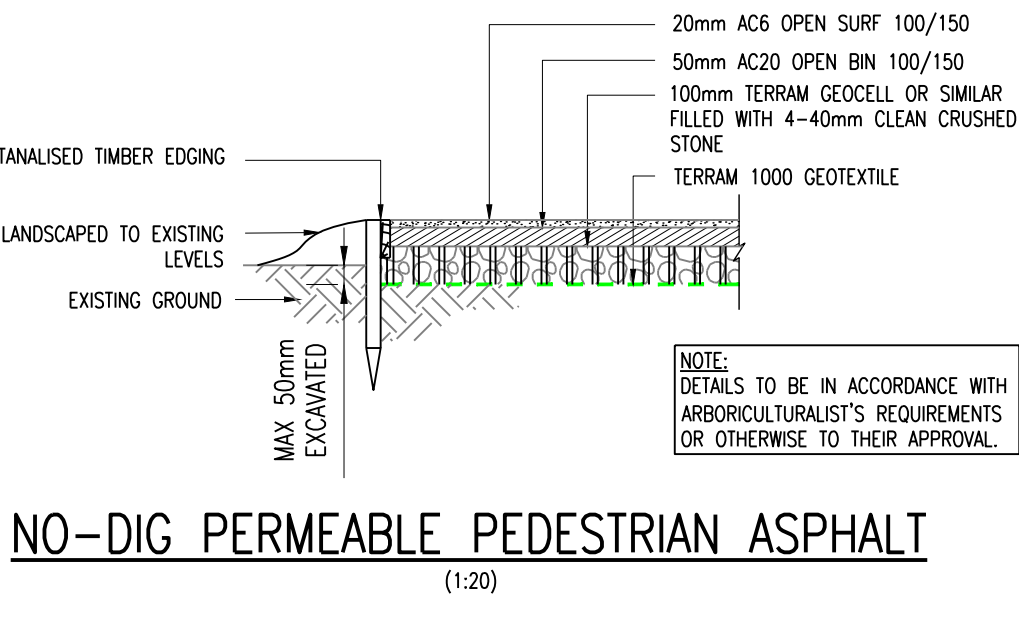
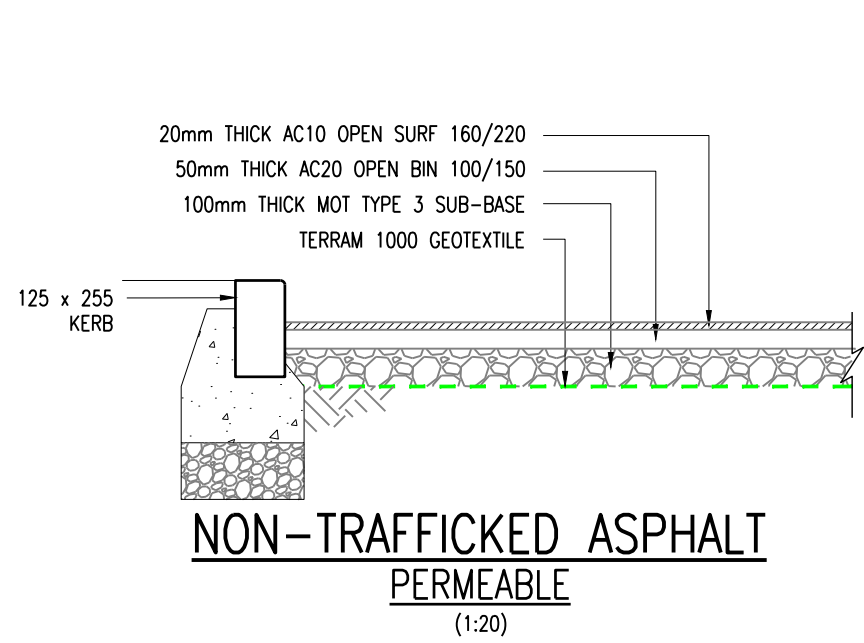


1. GENERAL
- (i) This drawing is not to be scaled, work to figured dimensions only, confirmed on site.
- (ii) This drawing is to be read in conjunction with all relevant architectural drawings, detailed specifications where applicable and all associated drawings in this series.
- (iii) Any discrepancy on this drawing is to be reported immediately to the partnership for clarification.
- (iv) The contractor is responsible for all temporary works and for the stability of the works in progress.

TABLE 1: PAVEMENT FOUNDATION	
CBR $\leq$ 1%	CONSIDER STABILISATION OF WEAK MATERIAL OR MIN 600mm CAPPING ON GEOTEXTILE + 150mm SUB-BASE
CBR $\leq$ 2%	600mm CAPPING, 150mm SUB-BASE, GEOTEXTILE BENEFICIAL
2% < CBR $\leq$ 2.5%	450mm CAPPING, 150mm SUB-BASE
2.5% < CBR $\leq$ 5%	350mm CAPPING, 150mm SUB-BASE OR 300mm SUB-BASE
5% < CBR $\leq$ 15%	225mm SUB-BASE
CBR > 15%	150mm SUB-BASE

TABLE 2: PERMEABLE SUB-BASE BASED ON IN-SITU FORMATION LEVEL CBR TESTING	
CBR $\leq$ 2%	CONSIDER STABILISATION OF WEAK MATERIAL OR GEGRID AND SUB-BASE TO GEOGRID MANUFACTURER DESIGN
2% < CBR $\leq$ 2.5%	550mm SUB-BASE
2.5% < CBR	475mm SUB-BASE



CONSTRUCTION ISSUE	MB	TRB	19.01.26	C1
ISSUED FOR BUILDING REGULATIONS	IAS	MB	23.12.25	P1

ISSUED FOR CONSTRUCTION

Drainage and Highway Details

Project
NEW STAFF ACCOMMODATION

Client
HURSTPIERPOINT COLLEGE

HOP
CONSULTING CIVIL AND
STRUCTURAL ENGINEERS
HOP House, 41 Church Road
Hove, East Sussex BN3 2BE
www.hop-uk.com
ask@hop-uk.com
+44 (0)1273 223900

Drawing No. 12337-HOP-17-XX-DR-C-8201 Status A Rev. C1



Project/Task No. 12337/17 Scale: 1:100 ORIGINAL DRAWING SIZE A1

1. GENERAL

A. This drawing is not to be scaled, work to figured dimensions only, confirmed on site.

B. This drawing is to be read in conjunction with all relevant architectural drawings, detailed specifications where applicable and all associated drawings in this series.

C. Any discrepancy on this drawing is to be reported immediately to the partnership for clarification.

D. The contractor is responsible for all temporary works and for the stability of the works in progress.

1:100

0 1m 2m 3m 4m 5m

LEGEND	
	PROPOSED SURFACE WATER DRAIN
	PROPOSED PERFORMED PIPE
	PROPOSED CONCRETE MANHOLE
	PROPOSED PLASTIC INSPECTION CHAMBER (PIC)
	EXCEEDANCE FLOW PATH
	RAIN WATER PIPE
	PROPOSED PERMEABLE PAVING
	DRAINED CATCHMENT
	SITE BOUNDARY

FIRST ISSUE	TRB MB	21.08.26	PO1
Description	By	Appl. Date	Rev.
ISSUED FOR INFORMATION			
Title CATCHMENT & EXCEEDANCE FLOW PLAN			
Project NEW STAFF ACCOMMODATION			
Client HURSTPIERPOINT COLLEGE			
HOP House, 41 Church Road Hove, East Sussex BN3 2BE www.hop-uk.com ask@hop-uk.com +44 (0)1273 223900			
Drawing No. 12337-HOP-17-XX-DR-C-8012 Status S1			
Rev. P01			

APPENDIX C – Infiltration Testing Data (Soak Services)

26th June 2025

Soak reference: 20137

Infiltration testing report at Ruckford House, Hurstpierpoint College, Malthouse Lane, Hurstpierpoint, Hassocks, West Sussex, BN6 9JX

Background

Soak Services was instructed by the client to carry out infiltration testing to BRE 365 in a parcel of land adjacent to Ruckford House (1 & 2) and Ruckford 3 off Malthouse Lane. The land is mostly grass ringed by hedge and mature trees with a short gravel drive/parking area. The land very gently slopes downwards from west to east. (Figure 1)



Figure 1 OS Map with pit locations



Figure 2 Satellite photo of test site showing pit locations.

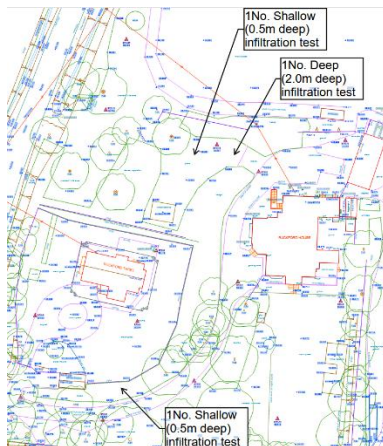


Figure 3 Topographic survey of the site.

Test and site conditions

Pits were dug on 25/6/2025 (see Figures 1, 2 and 3 above for locations) with a 3-ton excavator using a 300mm wide bucket. The preceding months had been exceptionally dry and no rain had fallen on this site in the few days before testing. On the morning of testing the ground remained firm and the soil excavated remained dry at the upper levels of all pits. Pit (Q) was surprisingly damp below 0.5m and ground water was eventually encountered at 2.2m. The weather was warm and sunny (see photo 16).

Table 1 The location of the pit, soil profile and dimensions

Pit label	Location	What3Words	Soil Profile from top	Dimensions (mm)
A	N 50°56' 42.9900" W 0° 9' 44.9856"	///renovated.roadmap.belly (see photo 1)	160mm unmade ground 2040mm clay (damp and mouldable by hand) Water	1640L x 340W x 2200D
P	N 50°56' 43.0872" W 0° 9' 45.4464"	///confident.sulky.cries (see photo 7)	170mm top-soil 355mm clay	860L x 360W x525D
Q	N 50°56' 41.4384" W 0° 9' 46.6776"	///protests.united.measuring (see photo 9)	230mm top- soil 325mm clay	970L x 320W x 555D

Excavation of the pits revealed various soil layers (specified in the table above).

Testing took place on Wednesday 25/6/2025.

Works carried out

The test pit (pit A) was excavated to 2200mm. Water was observed lining the bottom of the pit almost immediately. After one hour this had risen to a depth of 234mm. Further testing for this pit was therefore cancelled.

Test pits P & Q were excavated to 525 and 555mm respectively and filled to 100mm from the top. Water levels were then monitored for the rest of the day and changes recorded.

BRE 365 requires 3 tests to be made on each pit being tested but this proved not to be possible for either pit P or pit Q.

At the end of the day the pits were filled and the ground reinstated.

Summary of test results

Test pit A. It was not possible to measure infiltration at this pit as ground water was encountered at 2.2m. After 1 hour ground water had filled the bottom of the pit to a depth of 254mm.

Test Pit P. Only one test was possible in the day due to slow infiltration. BRE 365 requires 3 tests to be made but this would not have been possible to complete in a day.

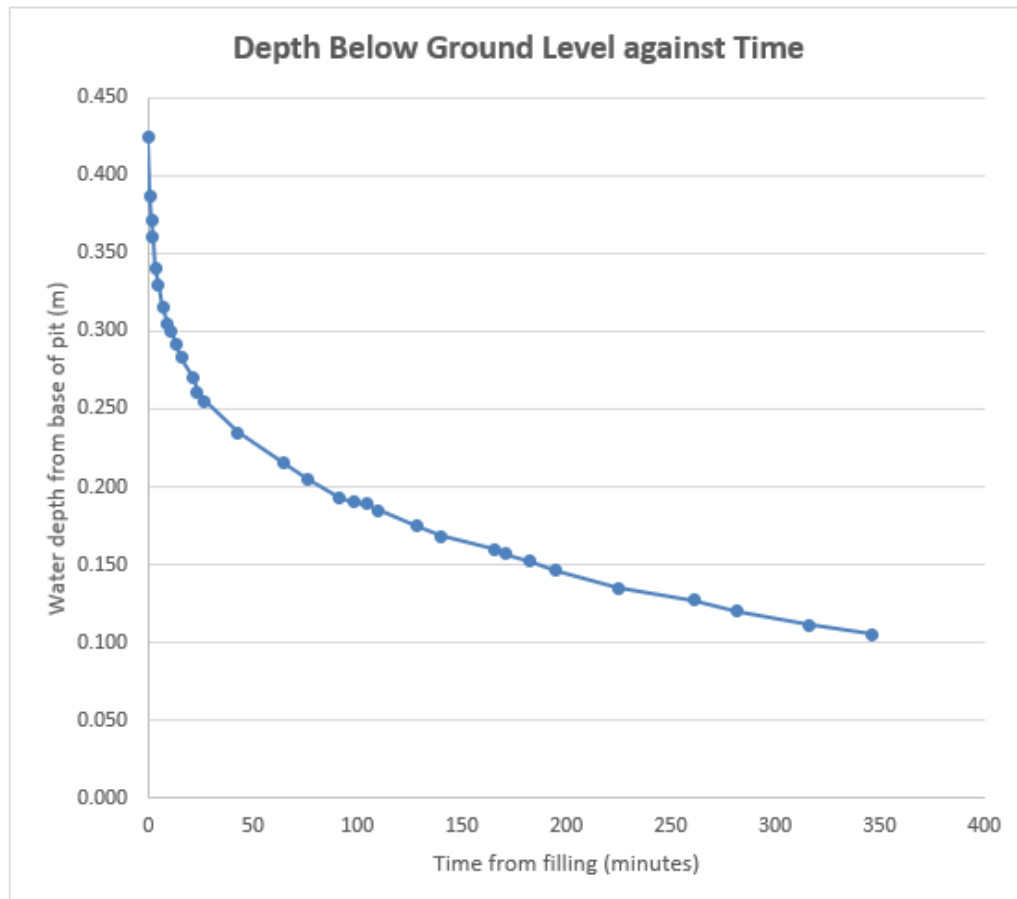
Test Pit Q. Only one test was possible due to very slow infiltration and a projected measurement was made to achieve 75% drainage.

Pit	Test	Infiltration rate m/s
A	1	Not obtainable Due to ground water ingress.
P	1	3.968×10^{-6}
Q	1	1.316×10^{-6} (estimated)

Full test data and charts are in appendix 1, below.

Appendix 1 Test Data and charts

Appendix 1: Test data, pit P test 1



Pit length 0.860 m
Pit width 0.360 m
Pit depth 0.525 m

Max water depth 0.425 m

D_{eff} 0.425 m

D_{p25} 0.106 m

D_{p75} 0.319 m

t_{p25} 340.230 s

t_{p75} 6.521 s

a_{p50} 0.828 m²

V_{p75} 0.099 m³

V_{p25} 0.033 m³

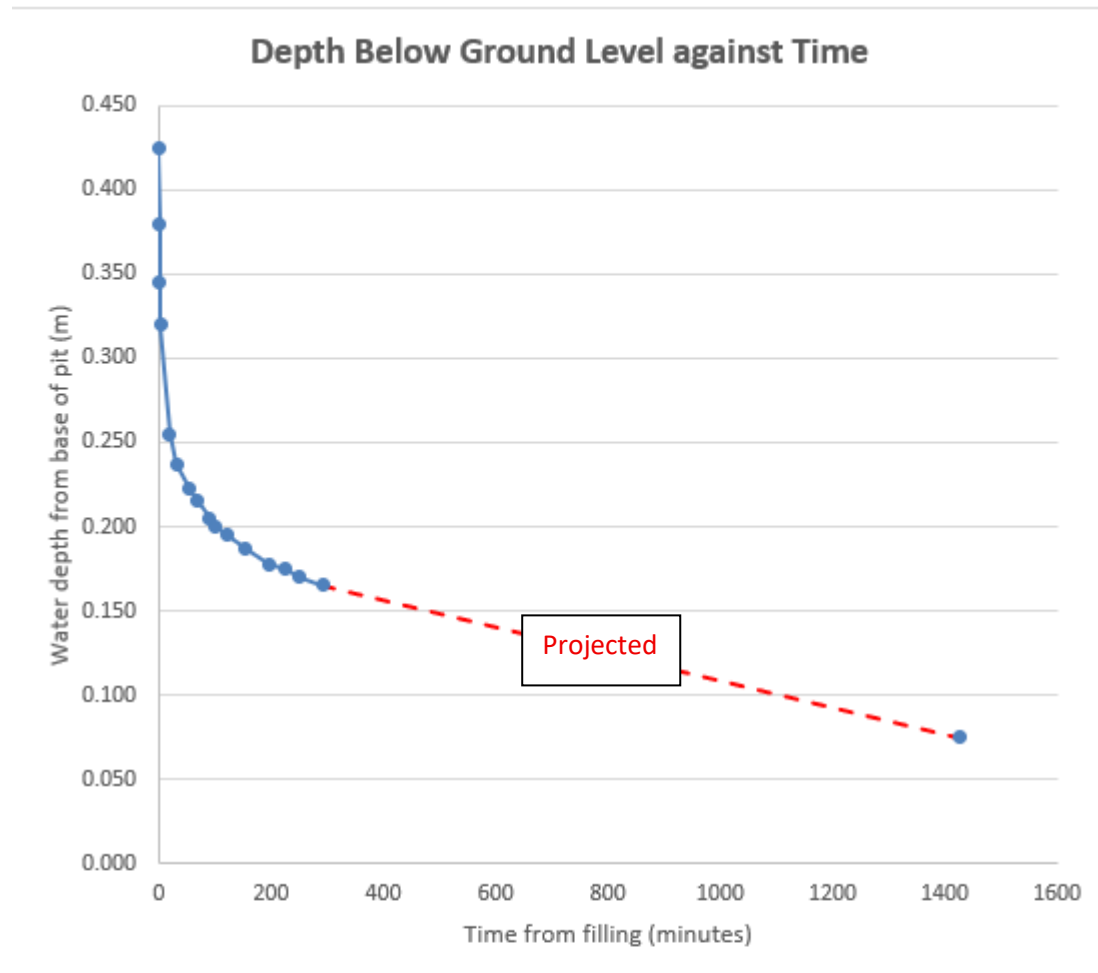
V_{p75-25} 0.066 m³

Infiltration rate 3.968E-06 m/s

Test Data

Time (of day)			Depth to water (m)
H	M	S	
10	6	:18	0.10
10	6	:59	0.14
10	7	:45	0.15
10	8	:25	0.17
10	9	:52	0.19
10	11	:11	0.20
10	13	:22	0.21
10	15	:20	0.22
10	17	:11	0.23
10	19	:14	0.23
10	22	:10	0.24
10	28	:0	0.26
10	29	:49	0.26
10	33	:2	0.27
10	49	:2	0.29
11	11	:20	0.31
11	22	:22	0.32
11	37	:16	0.33
11	44	:36	0.34
11	50	:28	0.34
11	56	:27	0.34
12	15	:5	0.35
12	26	:24	0.36
12	51	:49	0.37
12	57	:2	0.37
13	9	:5	0.37
13	21	:35	0.38
13	51	:10	0.39
14	27	:15	0.40
14	48	:4	0.41
15	22	:27	0.41
15	52	:52	0.42

Appendix 1: Test data, pit Q test 1



Pit length 0.970 m
Pit width 0.320 m
Pit depth 0.555 m

Max water depth 0.425 m

D_{eff} 0.425 m

D_{p25} 0.106 m

D_{p75} 0.319 m

t_{p25} 1031.385 s

t_{p75} 3.713 s

Infiltration rate 1.316E-06 m/s

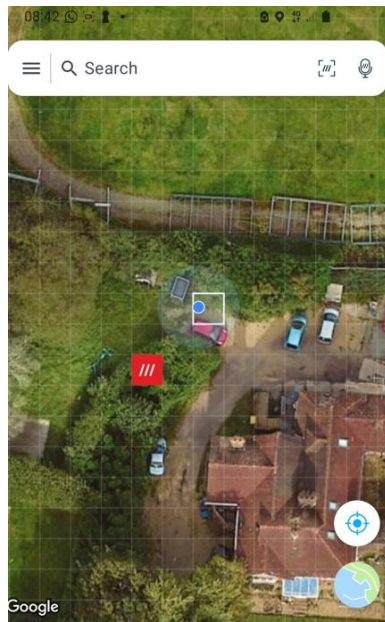
Test Data

Time (of day)

H	M	S	Depth to water (m)
11	15	:3	0.10
11	15	:55	0.15
11	17	:4	0.18
11	18	:28	0.21
11	33	:52	0.27
11	46	:26	0.29
12	9	:30	0.30
12	23	:39	0.31
12	45	:0	0.32
12	54	:35	0.33
13	17	:22	0.33
13	47	:41	0.34
14	30	:27	0.35
15	0	:26	0.35
15	25	:40	0.36
16	6	:32	0.36
35	0	:0	0.45

Appendix 2: Site photographs

Photo 1 Pit A What3Words location



///renovated.roadmap.belly
50°56'42.9900"N, 0°9'44.9856"W

Photo 3 Pit A ground water



Photo 2 Pit A after reinstatement



Photo 4 Pit A extracted clay mouldable by hand and damp.



Photo 5 Pit P left of IBC (reinstated pit A right of shed)



Photo 6 Pit P side elevation



Photo 7 Pit P What3Words location

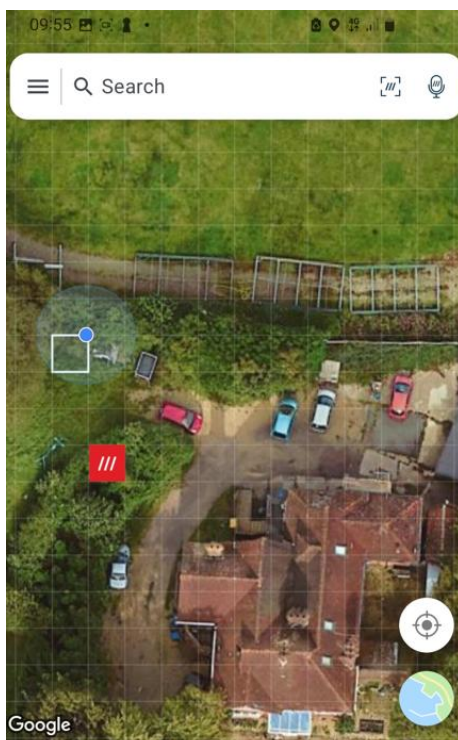


Photo 8 Pit P from above

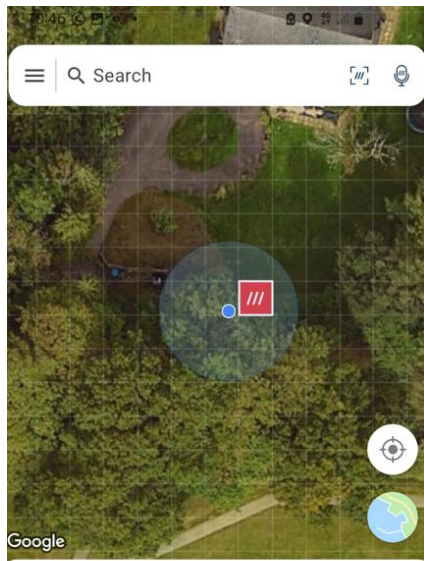


///confident.sulky.cries

50°56'43.0872"N, 0°9'45.4464"W



Photo 9 Pit Q What3Words location. Photo 10 Pit Q location.



protests.united.measuring
50°56'41.4384"N, 0°9'46.6776"W



Photo 11 Pit Q from above



Photo 12 Pit Q side elevation



Photo 13 Pit Q clay excavated



Photo 14 Looking towards Pit P and A from side of garden.

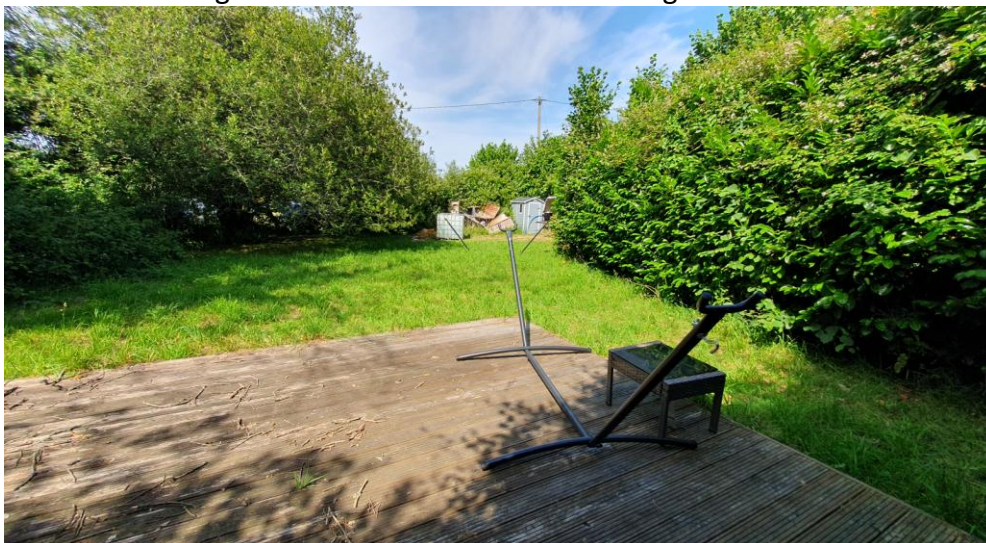
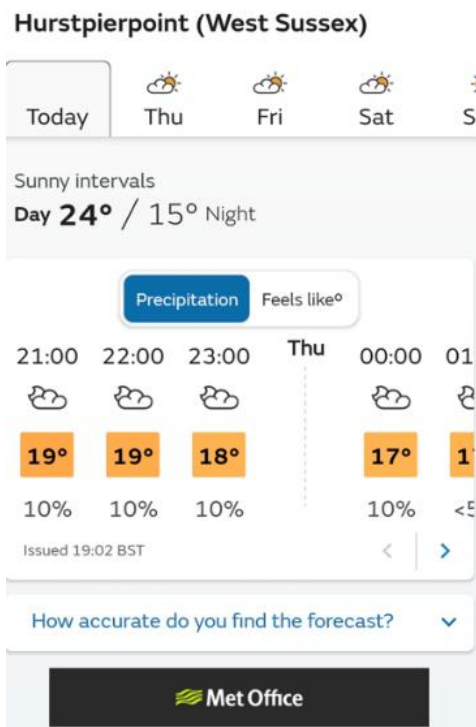


Photo 15 Carefully avoided, previously broken manhole cover outside Ruckford House



Photo 16 Met Office Forecast Wed 25th June



APPENDIX D – Causeway Flow Calculations

Nodes

Name	Area (ha)	T of E (mins)	Cover Level (m)	Diameter (mm)	Easting (m)	Northing (m)	Depth (m)	Invert Level (m)
1		5.00	29.000	450	529146.143	117804.001	0.500	28.500
2	0.011	5.00	29.000	450	529161.280	117800.129	0.630	28.370
4			29.000	450	529173.865	117797.223	0.738	28.262
5	0.006	5.00	29.000	450	529151.826	117812.484	0.500	28.500
6			29.000	450	529163.625	117809.951	0.601	28.399
7	0.005	5.00	29.000	1500	529175.462	117806.077	0.828	28.172
Carpark infiltrating	0.045	5.00	28.600		529180.181	117806.605	0.600	28.000
Depth/Area 1		5.00	28.600	450	529205.764	117807.026	0.600	28.000

Links (Results)

Name	Vel (m/s)	Cap (l/s)	Flow (l/s)	US Depth (m)	DS Depth (m)	Σ Area (ha)	Σ Add Inflow (l/s)	Pro Depth (mm)	Pro Velocity (m/s)
1.000	0.916	16.2	0.0	0.350	0.480	0.000	0.0	0	0.000
1.001	0.916	16.2	9.0	0.480	0.588	0.011	0.0	80	0.940
1.002	1.005	17.8	8.9	0.588	0.678	0.011	0.0	75	1.006
2.000	0.916	16.2	5.3	0.350	0.451	0.006	0.0	59	0.820
2.001	0.916	16.2	5.2	0.451	0.555	0.006	0.0	58	0.816
1.003	2.499	99.4	17.8	0.603	0.375	0.022	0.0	64	1.895
Permeable pipe	1.000	39.8	0.0	0.375	0.375	0.000	0.0	0	0.000

Simulation Settings

Rainfall Methodology	FEH-22	Analysis Speed	Normal	Starting Level (m)	
Rainfall Events	Singular	Skip Steady State	x	Check Discharge Rate(s)	x
Summer CV	1.000	Drain Down Time (mins)	240	Check Discharge Volume	x
Winter CV	1.000	Additional Storage (m³/ha)	0.0		

Storm Durations

15	60	180	360	600	960	2160	4320	7200	10080
30	120	240	480	720	1440	2880	5760	8640	

Return Period (years)	Climate Change (CC %)	Additional Area (A %)	Additional Flow (Q %)	Return Period (years)	Climate Change (CC %)	Additional Area (A %)	Additional Flow (Q %)
30	45	10	0	100	45	10	0

Node Carpark infiltrating Depth/Area Storage Structure

Base Inf Coefficient (m/hr)	0.01420	Safety Factor	3.0	Invert Level (m)	28.000
Side Inf Coefficient (m/hr)	0.00000	Porosity	0.30	Time to half empty (mins)	570

Depth (m)	Area (m²)	Inf Area (m²)	Depth (m)	Area (m²)	Inf Area (m²)	Depth (m)	Area (m²)	Inf Area (m²)
0.000	452.0	452.0	0.475	452.0	452.0	0.476	0.0	452.0

Rainfall

Event	Peak Intensity (mm/hr)	Average Intensity (mm/hr)	Event	Peak Intensity (mm/hr)	Average Intensity (mm/hr)
30 year +45% CC +10% A 15 minute summer	411.198	116.355	30 year +45% CC +10% A 120 minute summer	114.531	30.267
30 year +45% CC +10% A 15 minute winter	288.560	116.355	30 year +45% CC +10% A 120 minute winter	76.091	30.267
30 year +45% CC +10% A 30 minute summer	273.266	77.325	30 year +45% CC +10% A 180 minute summer	87.905	22.621
30 year +45% CC +10% A 30 minute winter	191.765	77.325	30 year +45% CC +10% A 180 minute winter	57.141	22.621
30 year +45% CC +10% A 60 minute summer	186.036	49.164	30 year +45% CC +10% A 240 minute summer	69.379	18.335
30 year +45% CC +10% A 60 minute winter	123.598	49.164	30 year +45% CC +10% A 240 minute winter	46.094	18.335

Rainfall

Event	Peak Intensity (mm/hr)	Average Intensity (mm/hr)	Event	Peak Intensity (mm/hr)	Average Intensity (mm/hr)
30 year +45% CC +10% A 360 minute summer	52.697	13.561	100 year +45% CC +10% A 120 minute summer	143.135	37.826
30 year +45% CC +10% A 360 minute winter	34.254	13.561	100 year +45% CC +10% A 120 minute winter	95.095	37.826
30 year +45% CC +10% A 480 minute summer	41.272	10.907	100 year +45% CC +10% A 180 minute summer	109.115	28.079
30 year +45% CC +10% A 480 minute winter	27.420	10.907	100 year +45% CC +10% A 180 minute winter	70.928	28.079
30 year +45% CC +10% A 600 minute summer	33.611	9.193	100 year +45% CC +10% A 240 minute summer	85.927	22.708
30 year +45% CC +10% A 600 minute winter	22.965	9.193	100 year +45% CC +10% A 240 minute winter	57.088	22.708
30 year +45% CC +10% A 720 minute summer	29.795	7.985	100 year +45% CC +10% A 360 minute summer	65.335	16.813
30 year +45% CC +10% A 720 minute winter	20.024	7.985	100 year +45% CC +10% A 360 minute winter	42.469	16.813
30 year +45% CC +10% A 960 minute summer	24.221	6.378	100 year +45% CC +10% A 480 minute summer	51.430	13.592
30 year +45% CC +10% A 960 minute winter	16.045	6.378	100 year +45% CC +10% A 480 minute winter	34.169	13.592
30 year +45% CC +10% A 1440 minute summer	17.320	4.642	100 year +45% CC +10% A 600 minute summer	42.107	11.517
30 year +45% CC +10% A 1440 minute winter	11.640	4.642	100 year +45% CC +10% A 600 minute winter	28.770	11.517
30 year +45% CC +10% A 2160 minute summer	12.290	3.396	100 year +45% CC +10% A 720 minute summer	37.511	10.053
30 year +45% CC +10% A 2160 minute winter	8.468	3.396	100 year +45% CC +10% A 720 minute winter	25.210	10.053
30 year +45% CC +10% A 2880 minute summer	10.210	2.736	100 year +45% CC +10% A 960 minute summer	30.730	8.092
30 year +45% CC +10% A 2880 minute winter	6.861	2.736	100 year +45% CC +10% A 960 minute winter	20.356	8.092
30 year +45% CC +10% A 4320 minute summer	7.802	2.040	100 year +45% CC +10% A 1440 minute summer	22.208	5.952
30 year +45% CC +10% A 4320 minute winter	5.138	2.040	100 year +45% CC +10% A 1440 minute winter	14.925	5.952
30 year +45% CC +10% A 5760 minute summer	6.534	1.673	100 year +45% CC +10% A 2160 minute summer	15.821	4.372
30 year +45% CC +10% A 5760 minute winter	4.229	1.673	100 year +45% CC +10% A 2160 minute winter	10.901	4.372
30 year +45% CC +10% A 7200 minute summer	5.667	1.446	100 year +45% CC +10% A 2880 minute summer	13.116	3.515
30 year +45% CC +10% A 7200 minute winter	3.658	1.446	100 year +45% CC +10% A 2880 minute winter	8.815	3.515
30 year +45% CC +10% A 8640 minute summer	5.059	1.291	100 year +45% CC +10% A 4320 minute summer	9.900	2.588
30 year +45% CC +10% A 8640 minute winter	3.265	1.291	100 year +45% CC +10% A 4320 minute winter	6.520	2.588
30 year +45% CC +10% A 10080 minute summer	4.617	1.178	100 year +45% CC +10% A 5760 minute summer	8.179	2.094
30 year +45% CC +10% A 10080 minute winter	2.980	1.178	100 year +45% CC +10% A 5760 minute winter	5.294	2.094
100 year +45% CC +10% A 15 minute summer	516.529	146.160	100 year +45% CC +10% A 7200 minute summer	7.003	1.787
100 year +45% CC +10% A 15 minute winter	362.477	146.160	100 year +45% CC +10% A 7200 minute winter	4.520	1.787
100 year +45% CC +10% A 30 minute summer	346.403	98.020	100 year +45% CC +10% A 8640 minute summer	6.178	1.576
100 year +45% CC +10% A 30 minute winter	243.090	98.020	100 year +45% CC +10% A 8640 minute winter	3.987	1.576
100 year +45% CC +10% A 60 minute summer	237.326	62.718	100 year +45% CC +10% A 10080 minute summer	5.575	1.422
100 year +45% CC +10% A 60 minute winter	157.674	62.718	100 year +45% CC +10% A 10080 minute winter	3.598	1.422

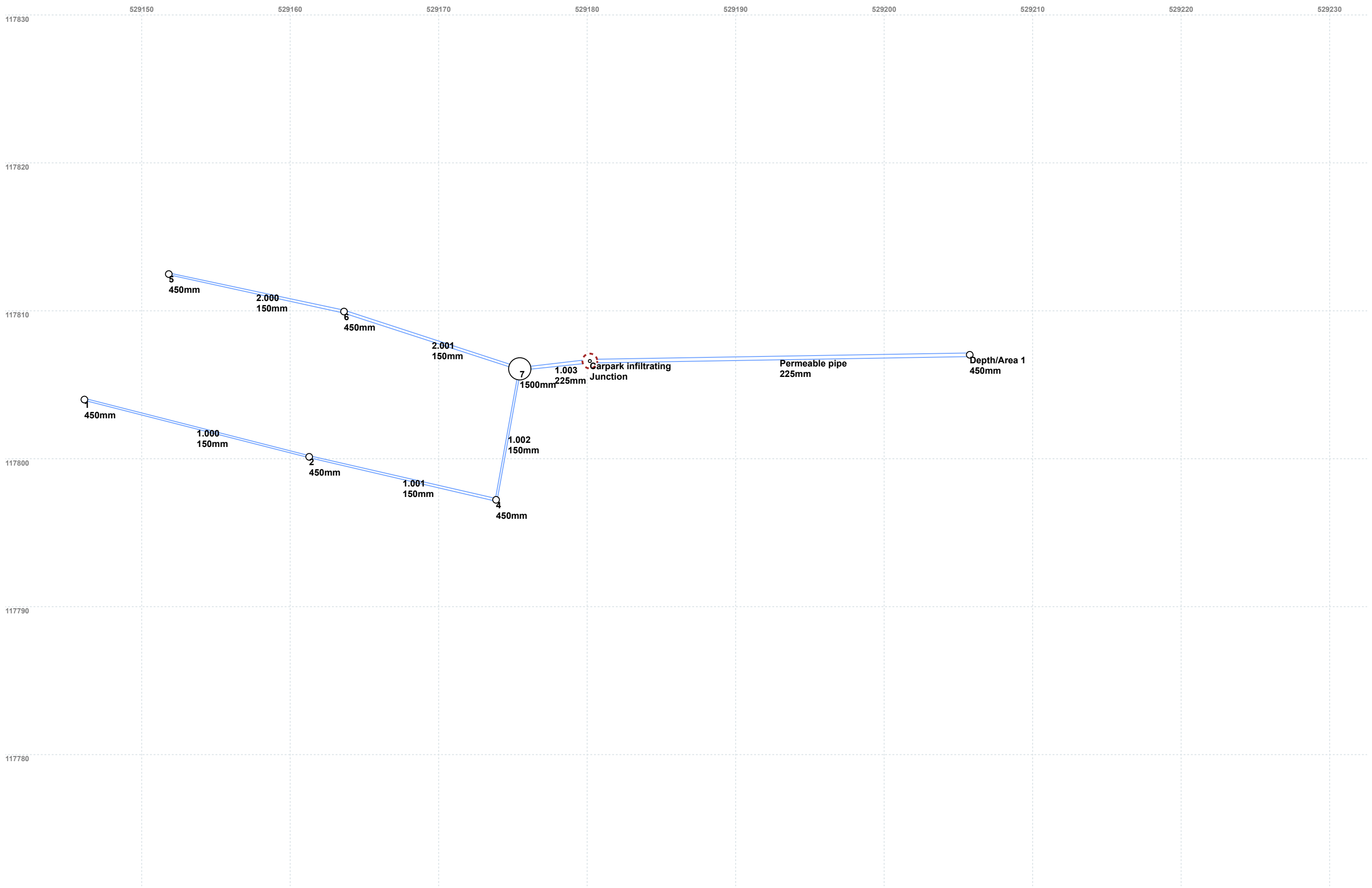
Results for 30 year +45% CC +10% A Critical Storm Duration. Lowest mass balance: 99.86%

Node Event	US Node	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
15 minute summer	1	28.500	0.000	0.0	0.0000	0.0000	OK
15 minute summer	2	28.448	0.078	8.0	0.0124	0.0000	OK
480 minute winter	4	28.359	0.097	0.9	0.0155	0.0000	OK
15 minute summer	5	28.557	0.057	4.6	0.0090	0.0000	OK
15 minute summer	6	28.455	0.056	4.6	0.0090	0.0000	OK
480 minute winter	7	28.359	0.187	2.9	0.3308	0.0000	OK
480 minute winter	Carpark infiltrating	28.359	0.359	8.6	48.7071	0.0000	OK
480 minute winter	Depth/Area 1	28.359	0.359	0.2	0.0571	0.0000	FLOOD RISK
US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap	Link Vol (m³)	
1	1.000	2	0.0	0.000	0.000	0.0723	
2	1.001	4	7.9	0.877	0.488	0.1163	
4	1.002	7	7.8	0.992	0.441	0.0715	
5	2.000	6	4.6	0.754	0.282	0.0732	
6	2.001	7	4.5	0.770	0.278	0.0730	
7	1.003	Carpark infiltrating	15.7	1.902	0.158	0.0689	
Carpark infiltrating	Infiltration		0.6				
Depth/Area 1	Permeable pipe	Carpark infiltrating	-2.0	-0.212	-0.050	0.7157	

Results for 100 year +45% CC +10% A Critical Storm Duration. Lowest mass balance: 99.76%

Node Event	US Node	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
15 minute summer	1	28.500	0.000	0.0	0.0000	0.0000	OK
720 minute winter	2	28.475	0.105	0.8	0.0166	0.0000	OK
720 minute winter	4	28.475	0.213	0.8	0.0338	0.0000	SURCHARGED
15 minute summer	5	28.565	0.065	5.8	0.0103	0.0000	OK
720 minute winter	6	28.475	0.076	0.5	0.0120	0.0000	OK
720 minute winter	7	28.475	0.303	5.7	0.5346	0.0000	SURCHARGED
720 minute winter	Carpark infiltrating	28.475	0.475	6.7	64.3472	0.0000	OK
720 minute winter	Depth/Area 1	28.475	0.475	0.2	0.0755	0.0000	FLOOD RISK

US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap	Link Vol (m³)
1	1.000	2	0.0	0.000	0.000	0.0869
2	1.001	4	10.0	0.924	0.616	0.1395
4	1.002	7	9.9	1.047	0.557	0.0850
5	2.000	6	5.8	0.797	0.357	0.0874
6	2.001	7	5.7	0.818	0.353	0.0870
7	1.003	Carpark infiltrating	19.7	1.927	0.198	0.0877
Carpark infiltrating	Infiltration		0.6			
Depth/Area 1	Permeable pipe	Carpark infiltrating	-2.5	-0.229	-0.063	0.9077



Design Settings

Rainfall Methodology	FEH-22	Minimum Velocity (m/s)	1.00
Return Period (years)	100	Connection Type	Level Soffits
Additional Flow (%)	45	Minimum Backdrop Height (m)	0.200
CV	1.000	Preferred Cover Depth (m)	0.350
Time of Entry (mins)	5.00	Include Intermediate Ground	✓
Maximum Time of Concentration (mins)	30.00	Enforce best practice design rules	x
Maximum Rainfall (mm/hr)	200.0		

Nodes

Name	Area (ha)	T of E (mins)	Cover Level (m)	Easting (m)	Northing (m)	Depth (m)
outfall	0.010	5.00	28.700	529180.181	117806.605	0.700

Simulation Settings

Rainfall Methodology	FEH-22	Skip Steady State	x	Check Discharge Rate(s)	x
Rainfall Events	Singular	Drain Down Time (mins)	240	Check Discharge Volume	x
Summer CV	1.000	Additional Storage (m³/ha)	0.0		
Analysis Speed	Normal	Starting Level (m)			

Storm Durations

15	60	180	360	600	960	2160	4320	7200	10080
30	120	240	480	720	1440	2880	5760	8640	

Return Period (years)	Climate Change (CC %)	Additional Area (A %)	Additional Flow (Q %)
1	0	0	0

Node outfall Depth/Area Storage Structure

Base Inf Coefficient (m/hr)	0.00000	Safety Factor	1.0	Invert Level (m)	28.000
Side Inf Coefficient (m/hr)	0.00000	Porosity	1.00	Time to half empty (mins)	

Depth (m)	Area (m²)	Inf Area (m²)	Depth (m)	Area (m²)	Inf Area (m²)	Depth (m)	Area (m²)	Inf Area (m²)
0.000	1.0	1.0	0.570	1.0	1.0	0.571	0.0	1.0

Rainfall

Event	Peak Intensity (mm/hr)	Average Intensity (mm/hr)	Event	Peak Intensity (mm/hr)	Average Intensity (mm/hr)
1 year 15 minute summer	75.572	21.384	1 year 960 minute summer	7.243	1.907
1 year 30 minute summer	49.095	13.892	1 year 1440 minute summer	5.339	1.431
1 year 60 minute summer	33.473	8.846	1 year 2160 minute summer	3.925	1.085
1 year 120 minute summer	25.660	6.781	1 year 2880 minute summer	3.359	0.900
1 year 180 minute summer	21.569	5.550	1 year 4320 minute summer	2.707	0.708
1 year 240 minute summer	17.938	4.740	1 year 5760 minute summer	2.368	0.606
1 year 360 minute summer	14.448	3.718	1 year 7200 minute summer	2.131	0.544
1 year 480 minute summer	11.660	3.081	1 year 8640 minute summer	1.963	0.501
1 year 600 minute summer	9.685	2.649	1 year 10080 minute summer	1.842	0.470
1 year 720 minute summer	8.711	2.335			

Results for 1 year Critical Storm Duration. Lowest mass balance: 100.00%

Node Event	US Node	Peak (mins)	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m ³)	Flood (m ³)	Status
15 minute summer	outfall	1	28.000	0.000	1.2	0.0000	0.0000	OK

APPENDIX E – SuDS Maintenance Schedule

STAFF ACCOMMODATION, HURSTPIERPOINT COLLEGE (HPPC)
PROPOSED MAINTENANCE & INSPECTION SCHEDULE FOR BELOW GROUND DRAINAGE
(FOUL WATER AND SURFACE WATER) INCLUDING SUSTAINABLE DRAINAGE SYSTEMS (SuDS)

Item	Required Maintenance/Monitoring	Suggested Frequency	Responsibility
Foul Water Drainage	Check inspection chambers and manholes for damage, condition and function.	Every six months	Facilities Management
	Undertake a CCTV drainage survey of the drainage network to establish condition.	Every ten years	Specialist
	Replace or repair malfunctioning parts or structures	As required	Specialist
Surface Water Drainage	Check inspection chambers and manholes for damage, condition and function.	Every six months	Facilities Management
	Undertake a CCTV drainage survey of the drainage network to establish condition.	Every ten years	Specialist
	Replace or repair malfunctioning parts or structures.	As required	Specialist
Surface Water Catch Pits	Check silt traps and inspection chambers and note the rate of sediment accumulation. Remove sediment if present.	Every month for the first year and then annually, or as conditions require	Facilities Management
Permeable Paving	Sweep clean of debris.	Every six months	Facilities Management
	Remove fines from paving using a suction road sweeper (Asphalt only)	Every 5 years or as required	Specialist
	Weed removal (Block paving only)	Every six months	Facilities Management
General	Remove sediment, litter, debris and vegetation from the surface of pathways areas	As necessary and after heavy rainfall	Facilities Management
Flood Flow Routes	Ensure flood flow routes are not obstructed (i.e. lower lying portions of the land that will direct surface water runoff away from vulnerable assets in the event of drainage failure).	Every year and during periods of heavy rainfall	Facilities Management

NOTES

The HPPC facilities management team will be responsible for the implementation of the maintenance schedule for below ground drainage, by appointing appropriate persons and/or sub-consultants that are qualified to undertake these operations.

Maintenance is to be carried out by the HPPC facilities management team or by a specialist contractor, as noted in Responsibility column above.

This maintenance schedule has been produced with reference to the guidelines outlined in 'The SuDS Manual' (CIRIA C753: 2015). The suggested frequency of maintenance is considered a guide, and should not replace the guidance from manufacturers of proprietary systems.

Refer to Engineering drawings for location and details of below ground drainage assets and SuDS features.