

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	



Porous Paving (2)

Type : Porous Paving

Dimensions

Exceedance Level (m)	35.625
Depth (m)	0.760
Base Level (m)	34.865
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	46.000
Long. Slope (1:X)	200.00
Width (m)	25.000
Total Volume (m³)	178.244

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

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Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 014
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 013
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 012
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 011
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 016
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (5)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 015
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (2)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (3)

Type : Porous Paving

Dimensions

Exceedance Level (m)	35.288
Depth (m)	0.760
Base Level (m)	34.528
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	60.927
Long. Slope (1:X)	200.00
Width (m)	6.125
Total Volume (m³)	58.410

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 044
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (3)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (4)

Type : Porous Paving

Dimensions

Exceedance Level (m)	35.438
Depth (m)	0.760
Base Level (m)	34.678
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	31.250
Long. Slope (1:X)	200.00
Width (m)	10.000
Total Volume (m³)	48.668

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 045
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (4)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (5)

Type : Porous Paving

Dimensions

Exceedance Level (m)	35.438
Depth (m)	0.760
Base Level (m)	34.678
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	30.028
Long. Slope (1:X)	200.00
Width (m)	10.000
Total Volume (m³)	46.765

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 041
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 040
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (5)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (6)

Type : Porous Paving

Dimensions

Exceedance Level (m)	34.725
Depth (m)	0.760
Base Level (m)	33.965
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	27.500
Long. Slope (1:X)	200.00
Width (m)	14.100
Total Volume (m³)	60.248

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 047
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 046
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (6)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (7)

Type : Porous Paving

Dimensions

Exceedance Level (m)	35.525
Depth (m)	0.760
Base Level (m)	34.765
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	45.001
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	35.320

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 034
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 033
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (7)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (8)

Type : Porous Paving

Dimensions

Exceedance Level (m)	35.525
Depth (m)	0.760
Base Level (m)	34.765
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	32.501
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	25.509

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 030
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (8)
Outlet Type	Orifice
Diameter (m)	0.060
Coefficient of Discharge	0.600
Invert Level (m)	34.765

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (9)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.097
Depth (m)	0.760
Base Level (m)	32.337
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	24.498
Long. Slope (1:X)	200.00
Width (m)	5.018
Total Volume (m³)	19.298

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 088
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe226
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (10)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.097
Depth (m)	0.760
Base Level (m)	32.337
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	17.346
Long. Slope (1:X)	200.00
Width (m)	4.925
Total Volume (m³)	13.414

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 090
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (10)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (11)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.097
Depth (m)	0.760
Base Level (m)	32.337
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	24.497
Long. Slope (1:X)	200.00
Width (m)	5.018
Total Volume (m³)	19.297

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 092
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (11)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (12)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.192
Depth (m)	0.760
Base Level (m)	32.432
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	26.300
Long. Slope (1:X)	200.00
Width (m)	6.200
Total Volume (m³)	25.518

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 105
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (12)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (14)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.192
Depth (m)	0.760
Base Level (m)	32.432
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	27.032
Long. Slope (1:X)	200.00
Width (m)	5.036
Total Volume (m³)	21.366

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 107
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe176
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (15)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.337
Depth (m)	0.760
Base Level (m)	32.577
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	57.734
Long. Slope (1:X)	200.00
Width (m)	5.125
Total Volume (m³)	46.428

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 164
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (15)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (16)

Type : Porous Paving

Dimensions

Exceedance Level (m)	34.347
Depth (m)	0.760
Base Level (m)	33.587
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	86.230
Long. Slope (1:X)	200.00
Width (m)	5.242
Total Volume (m³)	70.870

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 131
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (16)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (17)

Type : Porous Paving

Dimensions

Exceedance Level (m)	34.497
Depth (m)	0.760
Base Level (m)	33.737
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	63.295
Long. Slope (1:X)	200.00
Width (m)	9.282
Total Volume (m³)	91.552

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 130
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (17)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (18)

Type : Porous Paving

Dimensions

Exceedance Level (m)	34.897
Depth (m)	0.760
Base Level (m)	34.137
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	52.492
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	41.199

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 129
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (18)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (19)

Type : Porous Paving

Dimensions

Exceedance Level (m)	32.309
Depth (m)	0.760
Base Level (m)	31.549
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	57.759
Long. Slope (1:X)	200.00
Width (m)	5.106
Total Volume (m³)	46.280

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 160
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (19)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (20)

Type : Porous Paving

Dimensions

Exceedance Level (m)	31.934
Depth (m)	0.760
Base Level (m)	31.174
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	60.220
Long. Slope (1:X)	200.00
Width (m)	5.124
Total Volume (m³)	48.416

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 158
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (20)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (21)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.781
Depth (m)	0.760
Base Level (m)	33.021
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	65.888
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	51.713

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 151
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (21)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB Checked by: PJB Approved By: WL	
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Porous Paving (22)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.979
Depth (m)	0.760
Base Level (m)	33.219
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	69.765
Long. Slope (1:X)	200.00
Width (m)	5.171
Total Volume (m³)	56.601

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 152
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet (1)

Outgoing Connection	Porous Paving (22)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (23)

Type : Porous Paving

Dimensions

Exceedance Level (m)	31.242
Depth (m)	0.760
Base Level (m)	30.482
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	58.498
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	45.914

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 286
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 284
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe200
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (24)

Type : Porous Paving

Dimensions

Exceedance Level (m)	31.517
Depth (m)	0.760
Base Level (m)	30.757
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	55.101
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	43.247

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 287
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 285
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet (1)

Outgoing Connection	SWPipe199
Outlet Type	Free Discharge

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (25)

Type : Porous Paving

Dimensions

Exceedance Level (m)	32.248
Depth (m)	0.760
Base Level (m)	31.488
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	51.900
Long. Slope (1:X)	200.00
Width (m)	6.200
Total Volume (m³)	50.357

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 281
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (25)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (26)

Type : Porous Paving

Dimensions

Exceedance Level (m)	31.973
Depth (m)	0.760
Base Level (m)	31.213
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	60.001
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	47.093

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 280
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (26)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (27)

Type : Porous Paving

Dimensions

Exceedance Level (m)	31.173
Depth (m)	0.760
Base Level (m)	30.413
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	77.500
Long. Slope (1:X)	200.00
Width (m)	23.230
Total Volume (m³)	279.106

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Under Drain	
Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

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Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 278
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 274
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 273
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 279
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 277
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (5)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 272
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (6)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 271
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (7)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 276
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (8)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 275
Bypass Destination	(None)
Capacity Type	No Restriction

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Outlets

Outlet	
Outgoing Connection	Porous Paving (27)
Outlet Type	Under Drain

Advanced	
Conductivity (m/hr)	5.0

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Porous Paving (28)

Type : Porous Paving

Dimensions

Exceedance Level (m)	31.339
Depth (m)	0.760
Base Level (m)	30.579
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	97.496
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	76.399

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 268
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 269
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (28)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (29)

Type : Porous Paving

Dimensions

Exceedance Level (m)	31.614
Depth (m)	0.760
Base Level (m)	30.854
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	50.001
Long. Slope (1:X)	200.00
Width (m)	17.750
Total Volume (m³)	137.739

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 266
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 267
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 265
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (29)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (30)

Type : Porous Paving

Dimensions	
Exceedance Level (m)	31.212
Depth (m)	0.760
Base Level (m)	30.452
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	56.440
Long. Slope (1:X)	200.00
Width (m)	15.620
Total Volume (m³)	136.905

Under Drain	
Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets	
Inlet	
Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 209
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets	
Outlet	
Outgoing Connection	Porous Paving (30)
Outlet Type	Under Drain

Advanced	
Conductivity (m/hr)	5.0

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Porous Paving (31)

Type : Porous Paving

Dimensions

Exceedance Level (m)	31.762
Depth (m)	0.760
Base Level (m)	31.002
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	120.000
Long. Slope (1:X)	200.00
Width (m)	12.605
Total Volume (m³)	234.787

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 206
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (31)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (32)

Type : Porous Paving

Dimensions

Exceedance Level (m)	32.156
Depth (m)	2.073
Base Level (m)	30.083
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	52.498
Long. Slope (1:X)	200.00
Width (m)	10.000
Total Volume (m³)	288.549

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 210
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe144
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (33)

Type : Porous Paving

Dimensions

Exceedance Level (m)	32.156
Depth (m)	2.135
Base Level (m)	30.021
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	30.000
Long. Slope (1:X)	200.00
Width (m)	10.000
Total Volume (m³)	170.473

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe180
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe146
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (34)

Type : Porous Paving

Dimensions	
Exceedance Level (m)	32.156
Depth (m)	2.454
Base Level (m)	29.702
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	22.501
Long. Slope (1:X)	200.00
Width (m)	5.607
Total Volume (m³)	83.885

Under Drain	
Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets	
Inlet	
Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 207
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)	
Inlet Type	Point Inflow
Incoming Item(s)	SWPipe181
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets	
Outlet	
Outgoing Connection	SWPipe148
Outlet Type	Under Drain

Advanced	
Conductivity (m/hr)	5.0

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Porous Paving (36)

Type : Porous Paving

Dimensions

Exceedance Level (m)	32.562
Depth (m)	0.760
Base Level (m)	31.802
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	60.003
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	47.095

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 211
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (36)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (37)

Type : Porous Paving

Dimensions

Exceedance Level (m)	32.162
Depth (m)	0.760
Base Level (m)	31.402
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	27.499
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	21.583

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 205
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet (1)

Outgoing Connection	Porous Paving (37)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (1)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.541
Depth (m)	0.760
Base Level (m)	32.781
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	43.688
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	34.290

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 079
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (1)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (39)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.816
Depth (m)	1.000
Base Level (m)	32.816
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	52.088
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	59.634

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 080
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 081
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (39)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Porous Paving (40)

Type : Porous Paving

Dimensions

Exceedance Level (m)	33.553
Depth (m)	0.760
Base Level (m)	32.793
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	26.826
Long. Slope (1:X)	200.00
Width (m)	5.416
Total Volume (m³)	22.781

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 078
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 077
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (40)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	



Porous Paving

Type : Porous Paving

Dimensions

Exceedance Level (m)	34.751
Depth (m)	0.760
Base Level (m)	33.991
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	30.100
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	23.625

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 074
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 071
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Lateral Inflow
Incoming Item(s)	Porous Paving (44)
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving
Outlet Type	Free Discharge

Advanced

Conductivity (m/hr)	5.0
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Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	



Porous Paving (41)

Type : Porous Paving

Dimensions

Exceedance Level (m)	34.851
Depth (m)	0.760
Base Level (m)	34.091
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	26.921
Long. Slope (1:X)	200.00
Width (m)	5.418
Total Volume (m³)	22.870

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 070
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 069
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 066
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (41)
Outlet Type	Free Discharge

Advanced

Conductivity (m/hr)	5.0
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Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
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Porous Paving (42)

Type : Porous Paving

Dimensions

Exceedance Level (m)	34.203
Depth (m)	0.760
Base Level (m)	33.443
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	25.100
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	19.700

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 072
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 073
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (42)
Outlet Type	Free Discharge

Advanced

Conductivity (m/hr)	5.0
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Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
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Porous Paving (43)

Type : Porous Paving

Dimensions

Exceedance Level (m)	34.941
Depth (m)	0.760
Base Level (m)	34.181
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	7.501
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	5.887

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 067
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (43)
Outlet Type	Free Discharge

Advanced

Conductivity (m/hr)	5.0
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Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
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Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				



Porous Paving (44)

Type : Porous Paving

Dimensions

Exceedance Level (m)	35.001
Depth (m)	0.760
Base Level (m)	34.241
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	4.999
Long. Slope (1:X)	200.00
Width (m)	5.000
Total Volume (m³)	3.924

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 068
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Porous Paving (43)
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (44)
Outlet Type	Free Discharge

Advanced

Conductivity (m/hr)	5.0
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Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB		Checked by: PJB	Approved By: WL
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				



Porous Paving (13)

Type : Porous Paving

Dimensions

Exceedance Level (m)	31.362
Depth (m)	0.760
Base Level (m)	30.602
Paving Layer Depth (mm)	245
Membrane Percolation (m/hr)	5.0
Porosity (%)	30
Length (m)	152.495
Long. Slope (1:X)	200.00
Width (m)	10.000
Total Volume (m³)	237.785

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	2
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 208
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Porous Paving (13)
Outlet Type	Under Drain

Advanced

Conductivity (m/hr)	5.0
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Report Details: Type: Stormwater Controls Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



Swale 06

Type : Swale

Swale

Exceedance Level (m)	30.585
Depth (m)	1.000
Base Level (m)	29.585
Top Width (m)	3.500
Side Slope (1:X)	1.50
Base Width (m)	0.500
Freeboard (mm)	0
Length (m)	95.029
Long. Slope (1:X)	100.00
Filtration Rate (m/hr)	5.0
Friction Scheme	Manning's n
n	0.05
Total Volume (m³)	24.457

Trench

Trench Depth (m)	1.500
Trench Porosity (%)	30

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 228
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 230
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 232
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

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Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		

Outlets

Outlet

Outgoing Connection	SWPipe228
Outlet Type	Under Drain

Advanced

Swale

Porosity (%)	1
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Trench

Trench Conductivity (m/hr)	5.0
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Swale 05

Type : Swale

Swale

Exceedance Level (m)	33.487
Depth (m)	1.000
Base Level (m)	32.487
Top Width (m)	3.500
Side Slope (1:X)	1.50
Base Width (m)	0.500
Freeboard (mm)	0
Length (m)	36.458
Long. Slope (1:X)	100.00
Filtration Rate (m/hr)	5.0
Friction Scheme	Manning's n
n	0.05
Total Volume (m³)	9.383

Trench

Trench Depth (m)	1.500
Trench Porosity (%)	30

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

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Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 167
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 166
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Swale 05
Outlet Type	Under Drain

Advanced

Swale

Porosity (%)	1
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Trench

Trench Conductivity (m/hr)	5.0
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Swale 07

Type : Swale

Swale

Exceedance Level (m)	33.694
Depth (m)	1.000
Base Level (m)	32.694
Top Width (m)	3.500
Side Slope (1:X)	1.50
Base Width (m)	0.500
Freeboard (mm)	0
Length (m)	55.564
Long. Slope (1:X)	100.00
Filtration Rate (m/hr)	5.0
Friction Scheme	Manning's n
n	0.05
Total Volume (m³)	117.650

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
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Trench

Trench Depth (m)	0.700
Trench Porosity (%)	30

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 082
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 083
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Swale 07
Outlet Type	Under Drain

Advanced

Swale

Porosity (%)	100
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Trench

Trench Conductivity (m/hr)	5.0
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Swale 08

Type : Swale

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB		Checked by: PJB	Approved By: WL
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				

Swale

Exceedance Level (m)	35.727
Depth (m)	1.000
Base Level (m)	34.727
Top Width (m)	3.508
Side Slope (1:X)	1.50
Base Width (m)	0.500
Freeboard (mm)	0
Length (m)	60.976
Long. Slope (1:X)	60.00
Filtration Rate (m/hr)	5.0
Friction Scheme	Manning's n
n	0.05
Total Volume (m³)	15.696

Trench

Trench Depth (m)	1.500
Trench Porosity (%)	30

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 051
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 053
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Swale 08
Outlet Type	Under Drain

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Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				

Advanced

Swale

Porosity (%) 1

Trench

Trench Conductivity (m/hr) 5.0



Swale 01

Type : Swale

Swale

Exceedance Level (m)	35.573
Depth (m)	1.000
Base Level (m)	34.573
Top Width (m)	3.500
Side Slope (1:X)	1.50
Base Width (m)	0.500
Freeboard (mm)	0
Length (m)	100.109
Long. Slope (1:X)	100.00
Filtration Rate (m/hr)	5.0
Friction Scheme	Manning's n
n	0.05
Total Volume (m³)	25.765

Trench

Trench Depth (m)	1.500
Trench Porosity (%)	30

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

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Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 054
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 052
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 050
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Swale 01
Outlet Type	Under Drain

Advanced

Swale

Porosity (%)	1
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Trench

Trench Conductivity (m/hr)	5.0
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Swale 02

Type : Swale

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB		Checked by: PJB	Approved By: WL
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				

Swale

Exceedance Level (m)	34.744
Depth (m)	1.000
Base Level (m)	33.744
Top Width (m)	3.500
Side Slope (1:X)	1.50
Base Width (m)	0.500
Freeboard (mm)	0
Length (m)	60.349
Long. Slope (1:X)	100.00
Filtration Rate (m/hr)	5.0
Friction Scheme	Manning's n
n	0.05
Total Volume (m³)	135.024

Trench

Trench Depth (m)	1.500
Trench Porosity (%)	30

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 048
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 059
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 084
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Swale 02
Outlet Type	Under Drain

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Advanced	
Swale	
Porosity (%)	100
Trench	
Trench Conductivity (m/hr)	5.0



Swale 03

Type : Swale

Swale	
Exceedance Level (m)	34.500
Depth (m)	1.000
Base Level (m)	33.500
Top Width (m)	3.500
Side Slope (1:X)	1.50
Base Width (m)	0.500
Freeboard (mm)	0
Length (m)	43.444
Long. Slope (1:X)	100.00
Filtration Rate (m/hr)	5.0
Friction Scheme	Manning's n
n	0.05
Total Volume (m³)	11.181

Trench	
Trench Depth (m)	1.500
Trench Porosity (%)	30

Under Drain	
Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

Inlets	
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Inlet	
Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 112
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (1)	
Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 110
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

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Outlets

Outlet

Outgoing Connection	Swale 03
Outlet Type	Under Drain

Advanced

Swale

Porosity (%)	1
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Trench

Trench Conductivity (m/hr)	5.0
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Swale 04

Type : Swale

Swale

Exceedance Level (m)	34.500
Depth (m)	1.000
Base Level (m)	33.500
Top Width (m)	3.500
Side Slope (1:X)	1.50
Base Width (m)	0.500
Freeboard (mm)	0
Length (m)	50.230
Long. Slope (1:X)	100.00
Filtration Rate (m/hr)	5.0
Friction Scheme	Manning's n
n	0.05
Total Volume (m³)	112.384

Trench

Trench Depth (m)	1.500
Trench Porosity (%)	30

Under Drain

Height Above Base (m)	0.000
Diameter (mm)	150
No. of Barrels	1
Release Height (m)	0.000
Friction Scheme	Manning's n
n	0.015

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Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 114
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Catchment-Pavement 122
Bypass Destination	(None)
Inlet Destination	Ponding Area
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Swale 04
Outlet Type	Under Drain

Advanced

Swale

Porosity (%)	100
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Trench

Trench Conductivity (m/hr)	5.0
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Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		



Car Park-Cellular Storage

Type : Cellular Storage

Dimensions

Exceedance Level (m)	37.146
Depth (m)	1.200
Base Level (m)	34.546
Number of Crates Long	30
Number of Crates Wide	20
Number of Crates High	3
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	343.400

Inlets

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe220
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe001
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe219
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Car Park-Cellular Storage
Outlet Type	Free Discharge

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	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



Unit(s) 08 to 10-Cellular Storage

Type : Cellular Storage

Dimensions

Exceedance Level (m)	35.881
Depth (m)	0.800
Base Level (m)	33.422
Number of Crates Long	32
Number of Crates Wide	24
Number of Crates High	2
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	293.499

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	SWMH013
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 03
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 04
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Unit(s) 08 to 10-Cellular Storage
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



HGV Parking-Cellular Storage

Type : Cellular Storage

Dimensions

Exceedance Level (m)	37.265
Depth (m)	1.200
Base Level (m)	35.015
Number of Crates Long	59
Number of Crates Wide	8
Number of Crates High	3
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	270.090

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe213
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe211
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 023
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe216
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	



Unit 16-Cellular Storage

Type : Cellular Storage

Dimensions

Exceedance Level (m)	33.201
Depth (m)	0.800
Base Level (m)	30.586
Number of Crates Long	35
Number of Crates Wide	20
Number of Crates High	2
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	267.815

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 23
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 24
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe209
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe045
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe207
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	



Unit 02-Cellular Storage A

Type : Cellular Storage

Dimensions

Exceedance Level (m)	32.225
Depth (m)	1.600
Base Level (m)	28.318
Number of Crates Long	230
Number of Crates Wide	16
Number of Crates High	4
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	2799.107

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe125a
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 264
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 263
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 19
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 20
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe128b
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB Checked by: PJB Approved By: WL	
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		



Unit 06-Cellular Storage A

Type : Cellular Storage

Dimensions

Exceedance Level (m)	33.671
Depth (m)	1.200
Base Level (m)	31.362
Number of Crates Long	65
Number of Crates Wide	13
Number of Crates High	3
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	482.759

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 157
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe057
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe058
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 154
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 08
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe232
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB		Checked by: PJB	Approved By: WL
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				



Unit(s) 14 to 15-Cellular Storage

Type : Cellular Storage

Dimensions

Exceedance Level (m)	33.350
Depth (m)	1.600
Base Level (m)	30.750
Number of Crates Long	40
Number of Crates Wide	20
Number of Crates High	4
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	609.000

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Porous Paving (12)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe176
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe201
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 25
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 26
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe155
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
		Designed by: FJB	Checked by: PJB		Approved By: WL
Report Details: Type: Stormwater Controls Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



Unit 01-Cellular Storage A

Type : Cellular Storage

Dimensions	
Exceedance Level (m)	30.550
Depth (m)	0.800
Base Level (m)	28.750
Number of Crates Long	275
Number of Crates Wide	11
Number of Crates High	2
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	1150.500

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe100
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe099
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 190
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe102
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 15
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (5)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 188
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (6)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 192
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (7)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 189
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (8)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 191
Bypass Destination	(None)
Capacity Type	No Restriction

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB		Checked by: PJB	Approved By: WL
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				

Outlets

Outlet

Outgoing Connection	SWPipe197
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB Checked by: PJB Approved By: WL	
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		



Unit 01-Cellular Storage B

Type : Cellular Storage

Dimensions

Exceedance Level (m)	30.975
Depth (m)	1.200
Base Level (m)	27.749
Number of Crates Long	263
Number of Crates Wide	10
Number of Crates High	3
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	1501.126

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe104
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 16
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 194
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 17
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe196
Outlet Type	Free Discharge



Unit 01-Cellular Storage C

Type : Cellular Storage

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
		Designed by: FJB	Checked by: PJB		Approved By: WL
Report Details: Type: Stormwater Controls Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Dimensions

Exceedance Level (m)	30.563
Depth (m)	1.600
Base Level (m)	26.505
Number of Crates Long	24
Number of Crates Wide	240
Number of Crates High	4
Porosity (%)	95
Crate Length (m)	0.5
Crate Width (m)	1
Crate Height (m)	0.4
Total Volume (m³)	4380.058

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 197
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 195
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 198
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 200
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe193
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (7)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 196
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (5)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 199
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (6)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe204
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (8)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe114
Bypass Destination	(None)
Capacity Type	No Restriction

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Outlets

Outlet

Outgoing Connection	SWPipe110
Outlet Type	Free Discharge



Unit 02-Cellular Storage C

Type : Cellular Storage

Dimensions

Exceedance Level (m)	31.873
Depth (m)	0.800
Base Level (m)	29.070
Number of Crates Long	140
Number of Crates Wide	28
Number of Crates High	2
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	1491.603

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB Checked by: PJB Approved By: WL	
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe235
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	SWMH136
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 288
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 22
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 270
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (5)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 290
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (6)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 253
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (7)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 260
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe092
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
		Designed by: FJB	Checked by: PJB		Approved By: WL
Report Details: Type: Stormwater Controls Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



Unit 07-Cellular Storage A

Type : Cellular Storage

Dimensions

Exceedance Level (m)	33.652
Depth (m)	1.200
Base Level (m)	31.452
Number of Crates Long	115
Number of Crates Wide	24
Number of Crates High	3
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	1574.200

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB Checked by: PJB Approved By: WL	
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 101
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 05
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	SWMH066
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	SWMH067
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (5)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 06
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 102
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (6)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 104
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (7)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 103
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Unit 07-Cellular Storage A
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023		
	Designed by: FJB	Checked by: PJB	Approved By: WL
Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		



Unit 01-Cellular Storage D

Type : Cellular Storage

Dimensions

Exceedance Level (m)	31.362
Depth (m)	1.600
Base Level (m)	28.838
Number of Crates Long	304
Number of Crates Wide	10
Number of Crates High	4
Porosity (%)	95
Crate Length (m)	0.5
Crate Width (m)	1
Crate Height (m)	0.4
Total Volume (m³)	2311.324

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Porous Paving (13)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Porous Paving (30)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Porous Paving (31)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 18
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe142
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (5)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe082
Bypass Destination	(None)
Capacity Type	No Restriction

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB Checked by: PJB Approved By: WL	
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		

Outlets

Outlet

Outgoing Connection	SWPipe231
Outlet Type	Free Discharge



Unit 06-Cellular Storage B

Type : Cellular Storage

Dimensions

Exceedance Level (m)	33.021
Depth (m)	1.600
Base Level (m)	31.075
Number of Crates Long	55
Number of Crates Wide	32
Number of Crates High	4
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	1337.946

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Porous Paving (22)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Lateral Inflow
Incoming Item(s)	Porous Paving (21)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 07
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Unit 06-Cellular Storage B
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	



DT 02-Cellular Storage

Type : Cellular Storage

Dimensions

Exceedance Level (m)	33.512
Depth (m)	0.800
Base Level (m)	31.952
Number of Crates Long	44
Number of Crates Wide	36
Number of Crates High	2
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	602.680

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Porous Paving (39)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Porous Paving (40)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Lateral Inflow
Incoming Item(s)	Porous Paving (1)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 076
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 28
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe162
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB	Checked by: PJB	Approved By: WL	
	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



Unit 04-Cellular Storage A

Type : Cellular Storage

Dimensions

Exceedance Level (m)	32.309
Depth (m)	0.800
Base Level (m)	30.749
Number of Crates Long	55
Number of Crates Wide	10
Number of Crates High	2
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	209.760

Inlets

Inlet

Inlet Type	Lateral Inflow
Incoming Item(s)	Porous Paving (19)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 11
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Unit 04-Cellular Storage A
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB	Checked by: PJB	Approved By: WL	
	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



Unit 03-Cellular Storage A

Type : Cellular Storage

Dimensions

Exceedance Level (m)	31.934
Depth (m)	0.400
Base Level (m)	30.774
Number of Crates Long	55
Number of Crates Wide	10
Number of Crates High	1
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	105.260

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Porous Paving (20)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 09
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Unit 03-Cellular Storage A
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB	Checked by: PJB	Approved By: WL	
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				



Unit(s) 11 to 13-Cellular Storage

Type : Cellular Storage

Dimensions

Exceedance Level (m)	33.462
Depth (m)	0.800
Base Level (m)	31.185
Number of Crates Long	45
Number of Crates Wide	12
Number of Crates High	2
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	206.677

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Porous Paving (10)
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe031
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe227
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 27
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe030
Outlet Type	Free Discharge

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Report Details: Type: Stormwater Controls Storm Phase: Phase	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	



Unit(s) 04 to 05-Cellular Storage

Type : Cellular Storage

Dimensions

Exceedance Level (m)	32.479
Depth (m)	1.200
Base Level (m)	29.120
Number of Crates Long	30
Number of Crates Wide	50
Number of Crates High	3
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	857.159

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 12
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 162
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (3)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 13
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (4)

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe225
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (5)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 161
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	Unit(s) 04 to 05-Cellular Storage
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



Unit 02-Cellular Storage B

Type : Cellular Storage

Dimensions

Exceedance Level (m)	32.126
Depth (m)	0.400
Base Level (m)	30.511
Number of Crates Long	125
Number of Crates Wide	18
Number of Crates High	1
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	428.715

Inlets

Inlet

Inlet Type	Point Inflow
Incoming Item(s)	SWPipe119a
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (1)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 262
Bypass Destination	(None)
Capacity Type	No Restriction

Inlet (2)

Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 21
Bypass Destination	(None)
Capacity Type	No Restriction

Outlets

Outlet

Outgoing Connection	SWPipe119b
Outlet Type	Orifice
Diameter (m)	0.105
Coefficient of Discharge	0.600
Invert Level (m)	30.511

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
Report Details: Type: Stormwater Controls Storm Phase: Phase	Designed by: FJB		Checked by: PJB	Approved By: WL
Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				



Unit 03-Cellular Storage B

Type : Cellular Storage

Dimensions	
Exceedance Level (m)	31.550
Depth (m)	0.400
Base Level (m)	30.180
Number of Crates Long	45
Number of Crates Wide	20
Number of Crates High	1
Porosity (%)	95
Crate Length (m)	1
Crate Width (m)	0.5
Crate Height (m)	0.4
Total Volume (m³)	171.970
Inlets	
Inlet	
Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Pavement 159
Bypass Destination	(None)
Capacity Type	No Restriction
Inlet (1)	
Inlet Type	Point Inflow
Incoming Item(s)	Catchment-Roof 10
Bypass Destination	(None)
Capacity Type	No Restriction
Outlets	
Outlet	
Outgoing Connection	Unit 03-Cellular Storage B
Outlet Type	Free Discharge

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Manhole Schedule Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH001	37.861 36.426	Diameter / Length: 1.200	{1} SWPipe165b	Pipe	36.426	Diam/Width:150	Manhole
E:338073.025 N:351038.153	1.435						
			{a} SWPipe222	Pipe	36.426	Diam/Width:150	Not Applicable
SWMH002	37.813 36.964	Diameter / Length: 1.200					Manhole
E:338055.536 N:351025.647	0.849						
			{a} SWPipe165b	Pipe	36.964	Diam/Width:150	Not Applicable
SWMH003	37.560 36.955	Diameter / Length: 0.300					Manhole
E:338105.587 N:351152.061	0.605						
			{a} SWPipe161	Pipe	36.955	Diam/Width:100	Not Applicable
SWMH004	37.553 36.727	Diameter / Length: 1.200	{1} SWPipe161	Pipe	36.852	Diam/Width:100	Manhole
E:338109.220 N:351150.111	0.826						
			{a} SWPipe003	Pipe	36.727	Diam/Width:225	Not Applicable

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH005	37.382 34.421	Diameter / Length: 1.200	{1} Car Park-Cellular Storage	Pipe	34.496	Diam/Width:150	Manhole
E:338095.784 N:351030.200	2.961						
			{a} SWPipe002a	Pipe	34.421	Diam/Width:225	Not Applicable
SWMH006	37.242 36.520	Diameter / Length: 1.200	{1} SWPipe003	Pipe	36.520	Diam/Width:225	Manhole
E:338121.249 N:351133.250	0.722						
			{a} SWPipe004a	Pipe	36.520	Diam/Width:225	Not Applicable
SWMH008	36.756 35.356	Diameter / Length: 1.200					Manhole
E:338098.982 N:350959.215	1.400						
			{a} SWPipe009	Pipe	35.356	Diam/Width:225	Not Applicable
SWMH009	36.499 35.188	Diameter / Length: 1.200	{1} SWPipe009	Pipe	35.188	Diam/Width:225	Manhole
E:338110.462 N:350971.483	1.311						
			{a} SWPipe010	Pipe	35.188	Diam/Width:225	Not Applicable

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH010	36.266 33.047	Diameter / Length: 1.200	{1} SWPipe002c	Pipe	33.047	Diam/Width:225	Manhole
E:338161.380 N:351076.996	3.219		{2} SWPipe004b	Pipe	33.047	Diam/Width:225	
			{a} SWPipe005a	Pipe	33.047	Diam/Width:225	Not Applicable
SWMH011	36.241 35.020	Diameter / Length: 1.200	{1} SWPipe010	Pipe	35.020	Diam/Width:225	Manhole
E:338124.063 N:350981.348	1.221		{a} SWPipe011	Pipe	35.020	Diam/Width:225	Not Applicable
SWMH012	35.983 34.852	Diameter / Length: 1.200	{1} SWPipe011	Pipe	34.852	Diam/Width:225	Manhole
E:338139.286 N:350988.459	1.131		{a} SWPipe012	Pipe	34.852	Diam/Width:225	Not Applicable
SWMH013	35.955 34.140	Diameter / Length: 1.200	{1} SWPipe052	Pipe	34.140	Diam/Width:150	Manhole
E:338159.278 N:351140.283	1.815		{a} SWMH013	Pipe	34.140	Diam/Width:150	Not Applicable

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		Approved By: WL		
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH014	35.832 33.297	Diameter / Length: 1.200	{1} Porous Paving (7)	Pipe	33.297	Diam/Width:150	Manhole
E:338181.145 N:351109.571	2.535		{2} Unit(s) 08 to 10-Cellular Storage	Pipe	33.297	Diam/Width:150	
			{a} SWPipe050	Pipe	33.297	Diam/Width:225	Not Applicable
SWMH015	35.728 34.572	Diameter / Length: 1.200	{1} SWPipe054	Pipe	34.572	Diam/Width:225	Manhole
E:338139.404 N:351176.159	1.156						
			{a} SWPipe053	Pipe	34.572	Diam/Width:225	Not Applicable
SWMH016	35.726 32.535	Diameter / Length: 1.200	{1} SWPipe012	Pipe	32.535	Diam/Width:225	Manhole
E:338155.582 N:350992.551	3.191		{2} Swale 08	Pipe	32.610	Diam/Width:150	
			{a} SWPipe013	Pipe	32.535	Diam/Width:225	Not Applicable
SWMH017	35.725 34.690	Diameter / Length: 1.200	{1} Porous Paving (8)	Pipe	34.690	Diam/Width:150	Manhole
E:338153.785 N:351186.398	1.035						
			{a} SWPipe054	Pipe	34.690	Diam/Width:225	Not Applicable

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH018	35.723 34.541	Diameter / Length: 1.200	{1} SWPipe053	Pipe	34.541	Diam/Width:225	Manhole
E:338135.642 N:351173.481	1.182						
			{a} SWPipe052	Pipe	34.541	Diam/Width:150	Not Applicable
SWMH020	35.625 34.865	Diameter / Length: 0.300	{1} Porous Paving (2)	No Delay	Not Applicable	Not Applicable	Manhole
E:338172.772 N:351013.600	0.760						
			{a} SWPipe167	Pipe	34.865	Diam/Width:150	Not Applicable
SWMH021	35.614 34.740	Diameter / Length: 1.200	{1} SWPipe167	Pipe	34.815	Diam/Width:150	Manhole
E:338173.933 N:351011.972	0.874						
			{a} SWPipe018	Pipe	34.740	Diam/Width:225	Not Applicable
SWMH022	35.549 32.480	Diameter / Length: 1.200	{1} SWPipe018	Pipe	32.480	Diam/Width:225	Manhole
E:338179.284 N:351004.471	3.069		{2} Swale 01	Pipe	32.555	Diam/Width:150	
			{a} SWPipe019	Pipe	32.480	Diam/Width:225	Not Applicable
SWMH023	35.438 34.678	Diameter / Length: 0.300	{1} Porous Paving (5)	No Delay	Not Applicable	Not Applicable	Manhole
E:338206.624 N:351067.771	0.760						
			{a} SWPipe175	Pipe	34.678	Diam/Width:100	Not Applicable

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		Approved By: WL		
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH024	35.388 31.500	Diameter / Length: 1.200	{1} SWPipe013	Pipe	31.500	Diam/Width:225	Manhole
E:338178.078	3.888		{2} SWPipe017	Pipe	31.500	Diam/Width:225	
N:350993.060			{3} SWPipe019	Pipe	31.500	Diam/Width:225	
			{a} SWPipe020	Pipe	31.500	Diam/Width:225	Not Applicable
SWMH025	35.326 34.440	Diameter / Length: 1.200	{1} SWPipe175	Pipe	34.565	Diam/Width:100	Manhole
E:338210.287	0.885		{2} Porous Paving (3)	No Delay	Not Applicable	Not Applicable	
N:351070.384			{a} SWPipe025	Pipe	34.440	Diam/Width:225	Not Applicable
SWMH026	35.295 33.296	Diameter / Length: 1.200	{1} SWPipe024	Pipe	33.296	Diam/Width:225	Manhole
E:338250.533	1.999		{2} SWPipe025	Pipe	33.296	Diam/Width:225	
N:351013.970			{3} Porous Paving (4)	No Delay	Not Applicable	Not Applicable	
			{a} SWPipe026	Pipe	33.296	Diam/Width:225	Not Applicable
SWMH027	35.270 32.735	Diameter / Length: 1.200	{1} SWPipe005c	Pipe	32.735	Diam/Width:225	Manhole
E:338197.610	2.535						
N:351026.211			{a} SWPipe006	Pipe	32.735	Diam/Width:225	Not Applicable

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH028	35.256 33.972	Diameter / Length: 1.200	{1} SWPipe022	Pipe	33.972	Diam/Width:225	Manhole
E:338245.521 N:351074.438	1.283						
			{a} SWPipe023	Pipe	33.972	Diam/Width:225	Not Applicable
SWMH029	35.228 33.451	Diameter / Length: 1.200	{1} SWPipe023	Pipe	33.451	Diam/Width:225	Manhole
E:338275.800 N:351031.995	1.777						
			{a} SWPipe024	Pipe	33.451	Diam/Width:225	Not Applicable
SWMH030	35.211 34.493	Diameter / Length: 1.200	{1} SWPipe164	Pipe	34.568	Diam/Width:150	Manhole
E:338215.242 N:351116.882	0.717						
			{a} SWPipe022	Pipe	34.493	Diam/Width:225	Not Applicable
SWMH031	35.211 34.606	Diameter / Length: 0.300					Manhole
E:338214.371 N:351118.103	0.605						
			{a} SWPipe164	Pipe	34.606	Diam/Width:150	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH032	35.141 31.380	Diameter / Length: 1.200	{1} SWPipe008	Pipe	31.380	Diam/Width:225	Manhole
E:338201.888 N:350990.543	3.761		{2} SWPipe020	Pipe	31.380	Diam/Width:225	
			{a} SWPipe021a	Pipe	31.380	Diam/Width:225	Not Applicable
SWMH033	35.119 32.677	Diameter / Length: 1.200	{1} SWPipe006	Pipe	32.677	Diam/Width:225	Manhole
E:338202.480 N:351015.823	2.442						
			{a} SWPipe007	Pipe	32.677	Diam/Width:225	Not Applicable
SWMH034	35.025 33.231	Diameter / Length: 1.200	{1} SWPipe026	Pipe	33.231	Diam/Width:225	Manhole
E:338258.083 N:351003.387	1.794		{2} Porous Paving (6)	No Delay	Not Applicable	Not Applicable	
			{a} SWPipe027	Pipe	33.231	Diam/Width:225	Not Applicable
SWMH035	35.007 32.620	Diameter / Length: 1.200	{1} SWPipe007	Pipe	32.620	Diam/Width:225	Manhole
E:338203.350 N:351004.383	2.387						
			{a} SWPipe008	Pipe	32.620	Diam/Width:225	Not Applicable

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH036	34.910 33.189	Diameter / Length: 1.200	{1} SWPipe027	Pipe	33.189	Diam/Width:225	Manhole
E:338265.788	1.720						
N:351000.285			{a} SWPipe028	Pipe	33.189	Diam/Width:225	Not Applicable
SWMH038	34.741 28.354	Diameter / Length: 1.500	{1} SWPipe042	Pipe	28.354	Diam/Width:600	Manhole
E:338412.150	6.387						
N:350982.233			{a} SWPipe043	Pipe	28.354	Diam/Width:600	Not Applicable
SWMH039	34.712 28.546	Diameter / Length: 1.500	{1} SWPipe041	Pipe	28.546	Diam/Width:600	Manhole
E:338394.158	6.166						
N:350975.558			{a} SWPipe042	Pipe	28.546	Diam/Width:600	Not Applicable
SWMH040	34.626 28.205	Diameter / Length: 1.500	{1} SWPipe043	Pipe	28.205	Diam/Width:600	Manhole
E:338424.954	6.421		{2} SWPipe048	Pipe	28.580	Diam/Width:225	
N:350990.015			{a} SWPipe049	Pipe	28.205	Diam/Width:600	Not Applicable

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH041	34.622 33.497	Diameter / Length: 1.200	{1} Porous Paving (17)	Pipe	33.572	Diam/Width:150	Manhole
E:338431.712 N:351036.530	1.125		{2} Porous Paving (18)	Pipe	33.572	Diam/Width:150	
			{a} SWPipe070	Pipe	33.497	Diam/Width:225	Not Applicable
SWMH043	34.578 28.691	Diameter / Length: 1.500	{1} SWPipe040	Pipe	28.691	Diam/Width:600	Manhole
E:338379.933 N:350973.226	5.887						
			{a} SWPipe041	Pipe	28.691	Diam/Width:600	Not Applicable
SWMH044	34.550 32.624	Diameter / Length: 1.200	{1} Porous Paving	Pipe	32.699	Diam/Width:150	Manhole
E:338167.888 N:350958.852	1.926		{2} Porous Paving (42)	Pipe	32.699	Diam/Width:150	
			{3} Porous Paving (41)	Pipe	32.699		
			{a} SWPipe014	Pipe	32.624	Diam/Width:225	Not Applicable
SWMH045	34.452 28.819	Diameter / Length: 1.500	{1} SWPipe039	Pipe	29.119	Diam/Width:300	Manhole
E:338367.064 N:350973.147	5.633		{2} SWPipe156	Pipe	29.194	Diam/Width:225	
			{3} Swale 03	Pipe	29.269	Diam/Width:150	
			{a} SWPipe040	Pipe	28.819	Diam/Width:600	Not Applicable

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		Approved By: WL		
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH046	34.387 33.449	Diameter / Length: 1.200	{1} SWPipe070	Pipe	33.449	Diam/Width:225	Manhole
E:338426.195 N:351044.263	0.938		{2} Porous Paving (16)	Pipe	33.524	Diam/Width:150	
			{a} SWPipe071	Pipe	33.449	Diam/Width:225	Not Applicable
SWMH047	34.365 30.917	Diameter / Length: 1.200	{1} SWPipe021c	Pipe	30.992	Diam/Width:225	Manhole
E:338279.066 N:350982.386	3.448		{2} SWPipe028	Pipe	30.992	Diam/Width:225	
			{3} SWPipe032	Pipe	30.992	Diam/Width:150	
			{4} Swale 07	Pipe	31.067		
			{a} SWPipe033	Pipe	30.917	Diam/Width:300	Not Applicable
SWMH048	34.360 30.256	Diameter / Length: 1.200	{1} SWPipe047	Pipe	30.256	Diam/Width:225	Manhole
E:338432.060 N:350979.528	4.104		{a} SWPipe048	Pipe	30.256	Diam/Width:225	Not Applicable

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH049	34.290 31.655	Diameter / Length: 1.200	{1} SWPipe015	Pipe	31.655	Diam/Width:225	Manhole
E:338173.581	2.635		{2} SWPipe016	Pipe	31.655	Diam/Width:225	
N:350962.256			{a} SWPipe017	Pipe	31.655	Diam/Width:225	Not Applicable
SWMH050	34.238 30.582	Diameter / Length: 1.200	{1} SWPipe038	Pipe	30.582	Diam/Width:300	Manhole
E:338345.763	3.656						
N:350975.337			{a} SWPipe039	Pipe	30.582	Diam/Width:300	Not Applicable
SWMH051	34.219 31.675	Diameter / Length: 1.200	{1} SWPipe014	Pipe	31.675	Diam/Width:225	Manhole
E:338173.162	2.544		{2} SWPipe186	Pipe	31.750	Diam/Width:150	
N:350958.294			{a} SWPipe015	Pipe	31.675	Diam/Width:225	Not Applicable
SWMH052	34.462 32.729	Diameter / Length: 1.200					Manhole - Sealed
E:338202.311	1.733						
N:351145.049			{a} SWPipe056	Pipe	32.729	Diam/Width:150	Not Applicable

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Name	Cover Level (m) Invert Level (m)		Connection Details				Type
Coordinates (m)	Depth (m)	Manhole Size (m)	Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH053	34.186 27.630	Diameter / Length: 1.500	{1} SWPipe049	Pipe	27.630	Diam/Width:600	Manhole
E:338463.016	6.556		{2} SWPipe072b	Pipe	27.630	Diam/Width:600 Diam/Width:150	
N:351015.808			{3} Swale 04	Pipe	27.630		
			{a} SWPipe073a	Pipe	27.630	Diam/Width:600	Not Applicable
SWMH054	34.185 30.328	Diameter / Length: 1.200	{1} SWPipe046	Pipe	30.403	Diam/Width:150	Manhole
E:338433.810	3.857						
N:350972.533			{a} SWPipe047	Pipe	30.328	Diam/Width:225	Not Applicable
SWMH055	34.119 30.794	Diameter / Length: 1.200	{1} SWPipe033	Pipe	30.794	Diam/Width:300	Manhole
E:338303.461	3.325						
N:350979.808			{a} SWPipe034	Pipe	30.794	Diam/Width:300	Not Applicable
SWMH056	34.106 31.700	Diameter / Length: 1.200	{1} SWPipe162	Pipe	31.700	Diam/Width:150	Manhole
E:338182.523	2.406						
N:350961.310			{a} SWPipe016	Pipe	31.700	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH058	34.032 30.710	Diameter / Length: 1.200	{1} SWPipe034	Pipe	30.710	Diam/Width:300	Manhole
E:338320.193 N:350978.039	3.322		{2} SWPipe037	Pipe	30.785	Diam/Width:225	
			{a} SWPipe038	Pipe	30.710	Diam/Width:300	Not Applicable
SWMH059	34.031 32.875	Diameter / Length: 1.200	{1} SWPipe187	Pipe	32.875	Diam/Width:150	Manhole
E:338170.206 N:350930.326	1.156						
			{a} SWPipe186	Pipe	32.875	Diam/Width:150	Not Applicable
SWMH061	33.872 33.272	Diameter / Length: 0.600					Manhole
E:338174.711 N:350923.715	0.600						
			{a} SWPipe187	Pipe	33.272	Diam/Width:150	Not Applicable
SWMH062	33.870 31.129	Diameter / Length: 1.200	{1} SWPipe218	Pipe	31.129	Diam/Width:225	Manhole
E:338271.571 N:351221.128	2.741						
			{a} SWPipe060	Pipe	31.129	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH063	33.811 28.075	Diameter / Length: 1.500	{1} SWPipe069	Pipe	28.075	Diam/Width:600	Manhole
E:338437.144 N:351052.074	5.736		{2} SWPipe071	Pipe	28.450	Diam/Width:225	
			{a} SWPipe072a	Pipe	28.075	Diam/Width:600	Not Applicable
SWMH064	33.800 29.335	Diameter / Length: 1.200	{1} SWPipe155	Pipe	29.410	Diam/Width:150	Manhole
E:338365.585 N:350959.156	4.465						
			{a} SWPipe156	Pipe	29.335	Diam/Width:225	Not Applicable
SWMH065	33.833 30.966	Diameter / Length: 1.200	{1} SWPipe233	Pipe	30.966	Diam/Width:225	Manhole
E:338322.093 N:350996.023	2.867						
			{a} SWPipe037	Pipe	30.966	Diam/Width:225	Not Applicable
SWMH066	33.764 32.665	Diameter / Length: 1.200					Manhole
E:338269.522 N:351084.886	1.099						
			{a} SWMH066	Pipe	32.665	Diam/Width:150	Not Applicable

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Name	Cover Level (m) Invert Level (m)		Connection Details				Type
Coordinates (m)	Depth (m)	Manhole Size (m)	Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH067	33.764 32.552	Diameter / Length: 1.200					Manhole
E:338290.429 N:351055.580	1.212						
			{a} SWMH067	Pipe	32.552	Diam/Width:150	Not Applicable
SWMH068	33.760 32.105	Diameter / Length: 1.200					Manhole
E:338481.240 N:350950.985	1.655						
			{a} SWPipe044	Pipe	32.105	Diam/Width:150	Not Applicable
SWMH069	33.760 31.347	Diameter / Length: 1.200	{1} SWPipe044	Pipe	31.347	Diam/Width:150	Manhole
E:338444.132 N:350954.913	2.413		{2} SWPipe159	Pipe	31.347	Diam/Width:225	
			{a} SWPipe045	Pipe	31.347	Diam/Width:150	Not Applicable
SWMH071	33.720 32.429	Diameter / Length: 1.200					Manhole
E:338230.568 N:351194.074	1.291						
			{a} SWPipe058	Pipe	32.429	Diam/Width:150	Not Applicable
SWMH072	33.720 31.229	Diameter / Length: 1.200	{1} SWPipe232	Pipe	31.304	Diam/Width:150	Manhole
E:338252.052 N:351217.017	2.491						
			{a} SWPipe218	Pipe	31.229	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH073	33.719 32.420	Diameter / Length: 1.200	{1} SWPipe056	Pipe	32.420	Diam/Width:150	Manhole
E:338191.685 N:351174.001	1.299						
			{a} SWPipe057	Pipe	32.420	Diam/Width:150	Not Applicable
SWMH074	33.643 31.060	Diameter / Length: 1.200	{1} SWPipe030	Pipe	31.135	Diam/Width:150	Manhole
E:338277.632 N:350968.813	2.583						
			{a} SWPipe032	Pipe	31.060	Diam/Width:225	Not Applicable
SWMH075	33.532 31.860	Diameter / Length: 1.200	{1} SWPipe029	Pipe	31.860	Diam/Width:150	Manhole
E:338303.458 N:350961.052	1.672						
			{a} SWPipe227	Pipe	31.860	Diam/Width:150	Not Applicable
SWMH076	33.567 30.925	Diameter / Length: 1.200	{1} Unit 06- Cellular Storage B	Pipe	30.925	Diam/Width:150	Manhole
E:338309.332 N:351215.615	2.642						
			{a} SWPipe064	Pipe	30.925	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH077	33.566 27.209	Diameter / Length: 1.500	{1} SWPipe073b	Pipe	27.209	Diam/Width:600	Manhole
E:338516.180	6.357		{2} SWPipe074	Pipe	27.584	Diam/Width:225 Diam/Width:150	
N:351051.834			{3} Swale 05	Pipe	27.209		
			{a} SWPipe075a	Pipe	27.209	Diam/Width:600	Not Applicable
SWMH078	33.560 28.493	Diameter / Length: 1.500	{1} SWPipe068	Pipe	28.868	Diam/Width:225	Manhole
E:338412.894	5.067		{2} SWPipe189c	Pipe	28.493	Diam/Width:600	
N:351086.066			{a} SWPipe069	Pipe	28.493	Diam/Width:600	Not Applicable
SWMH079	33.456 32.389	Diameter / Length: 1.200	{1} SWPipe177	Pipe	32.464	Diam/Width:150	Manhole
E:338505.905	1.066		{a} SWPipe074	Pipe	32.389	Diam/Width:225	Not Applicable
N:351066.238							
SWMH080	33.445 31.011	Diameter / Length: 1.200	{1} SWPipe060	Pipe	31.011	Diam/Width:225	Manhole
E:338293.850	2.434		{a} SWPipe061	Pipe	31.011	Diam/Width:225	Not Applicable
N:351229.096							

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH081	33.337 32.577	Diameter / Length: 0.300	{1} Porous Paving (15)	No Delay	Not Applicable	Not Applicable	Manhole
E:338503.291 N:351069.902	0.760		{a} SWPipe177	Pipe	32.577	Diam/Width:150	Not Applicable
SWMH082	33.317 31.916	Diameter / Length: 1.200	{1} SWPipe226	Pipe	31.916	Diam/Width:150	Manhole
E:338263.583 N:350951.622	1.401		{a} SWPipe031	Pipe	31.916	Diam/Width:150	Not Applicable
SWMH085	33.244 32.325	Diameter / Length: 1.200	{1} SWPipe163	Pipe	32.325	Diam/Width:150	Manhole
E:338310.547 N:350942.628	0.919		{a} SWPipe029	Pipe	32.325	Diam/Width:150	Not Applicable
SWMH086	34.048 30.485	Diameter / Length: 1.200	{1} SWPipe207	Pipe	30.485	Diam/Width:100	Manhole
E:338426.826 N:350968.310	3.563		{a} SWPipe046	Pipe	30.485	Diam/Width:150	Not Applicable
SWMH087	33.225 32.396	Diameter / Length: 1.200					Manhole
E:338363.171 N:350936.283	0.829		{a} SWPipe201	Pipe	32.396	Diam/Width:150	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH089	33.189 32.429	Diameter / Length: 0.300	{1} Porous Paving (11)	No Delay	Not Applicable	Not Applicable	Manhole
E:338320.939 N:350941.528	0.760						
			{a} SWPipe163	Pipe	32.429	Diam/Width:150	Not Applicable
SWMH090	33.080 32.475	Diameter / Length: 0.300					Manhole
E:338466.290 N:351111.871	0.605						
			{a} SWPipe225	Pipe	32.475	Diam/Width:100	Not Applicable
SWMH091	33.075 32.075	Diameter / Length: 1.200	{1} SWPipe183	Pipe	32.075	Diam/Width:150	Manhole
E:338684.798 N:350866.439	1.000						
			{a} SWPipe084	Pipe	32.075	Diam/Width:150	Not Applicable
SWMH092	33.072 29.338	Diameter / Length: 1.500	{1} SWPipe067	Pipe	29.338	Diam/Width:600	Manhole
E:338363.841 N:351154.826	3.734		{2} SWPipe190	Pipe	29.338	Diam/Width:600	
			{a} SWPipe189a	Pipe	29.338	Diam/Width:600	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH093	33.055 32.455	Diameter / Length: 0.300					Manhole
E:338690.018 N:350864.485	0.600						
			{a} SWPipe183	Pipe	32.455	Diam/Width:150	Not Applicable
SWMH094	33.026 31.935	Diameter / Length: 1.200	{1} SWPipe084	Pipe	31.935	Diam/Width:150	Manhole
E:338683.402 N:350880.320	1.090						
			{a} SWPipe085a	Pipe	31.935	Diam/Width:150	Not Applicable
SWMH095	33.010 26.920	Diameter / Length: 1.500	{1} SWPipe075b	Pipe	26.920	Diam/Width:600	Manhole
E:338564.028 N:351084.257	6.090		{2} SWPipe078 (1)	Pipe	26.920	Diam/Width:600	
			{a} SWPipe079	Pipe	26.920	Diam/Width:600	Not Applicable
SWMH096	33.006 30.954	Diameter / Length: 1.200	{1} SWPipe061	Pipe	30.954	Diam/Width:225	Manhole
E:338305.224 N:351230.237	2.052						
			{a} SWPipe062	Pipe	30.954	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH097	32.959 29.495	Diameter / Length: 1.500	{1} SWPipe065	Pipe	29.495	Diam/Width:600	Manhole
E:338354.681	3.464		{2} SWPipe066	Pipe	29.870	Diam/Width:225	
N:351167.667			{a} SWPipe067	Pipe	29.495	Diam/Width:600	Not Applicable
SWMH098	32.842 29.946	Diameter / Length: 1.200	{1} SWPipe085b	Pipe	29.946	Diam/Width:225	Manhole
E:338665.733	2.896						
N:350951.434			{a} SWPipe086	Pipe	29.946	Diam/Width:225	Not Applicable
SWMH099	32.756 28.970	Diameter / Length: 1.200	{1} Unit(s) 04 to 05-Cellular Storage	Pipe	28.970	Diam/Width:150	Manhole
E:338426.403	3.786						
N:351101.291			{a} SWPipe068	Pipe	28.970	Diam/Width:225	Not Applicable
SWMH100	32.721 26.770	Diameter / Length: 1.500	{1} SWPipe079	Pipe	26.770	Diam/Width:600	Manhole
E:338588.869	5.951						
N:351101.090			{a} SWPipe083	Pipe	26.770	Diam/Width:600	Not Applicable

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			Outgoing Connections				Cover
SWMH101	32.686 30.149	Diameter / Length: 1.500	{1} SWPipe062	Pipe	30.524	Diam/Width:225	Manhole
E:338316.717	2.537		{2} SWPipe063	Pipe	30.149	Diam/Width:600	
N:351220.883			{3} SWPipe064	Pipe	30.524	Diam/Width:225	
			{a} SWPipe065	Pipe	30.149	Diam/Width:600	Not Applicable
SWMH102	32.683 29.628	Diameter / Length: 1.200	{1} SWPipe086	Pipe	29.628	Diam/Width:225	Manhole
E:338650.380	3.055		{a} SWPipe087	Pipe	29.628	Diam/Width:225	Not Applicable
N:351013.224							
SWMH103	32.524 29.309	Diameter / Length: 1.200	{1} SWPipe087	Pipe	29.309	Diam/Width:225	Manhole
E:338635.027	3.215		{a} SWPipe088	Pipe	29.309	Diam/Width:225	Not Applicable
N:351075.015							
SWMH104	32.510 29.546	Diameter / Length: 1.200	{1} Unit 04- Cellular Storage A	Pipe	29.546	Diam/Width:150	Manhole
E:338380.789	2.964		{a} SWPipe190	Pipe	29.546	Diam/Width:600	Not Applicable
N:351166.916							

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Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH106	32.489 29.242	Diameter / Length: 1.200	{1} SWPipe088	Pipe	29.242	Diam/Width:225	Manhole
E:338630.323 N:351087.554	3.247						
			{a} SWPipe089	Pipe	29.242	Diam/Width:225	Not Applicable
SWMH107	32.449 29.162	Diameter / Length: 1.200	{1} SWPipe089	Pipe	29.162	Diam/Width:225	Manhole
E:338622.977 N:351101.865	3.287						
			{a} SWPipe090	Pipe	29.162	Diam/Width:225	Not Applicable
SWMH108	32.445 26.616	Diameter / Length: 1.500	{1} SWPipe083	Pipe	26.616	Diam/Width:600	Manhole
E:338615.631 N:351116.176	5.829		{2} SWPipe090	Pipe	26.991	Diam/Width:225	
			{a} SWPipe091	Pipe	26.616	Diam/Width:600	Not Applicable
SWMH109	32.363 30.283	Diameter / Length: 1.200	{1} SWPipe117	Pipe	30.283	Diam/Width:225	Manhole
E:338727.714 N:350866.318	2.080						
			{a} SWPipe118	Pipe	30.283	Diam/Width:225	Not Applicable

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Report Details: Type: Manhole Schedule Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH110	32.350 31.190	Diameter / Length: 1.200					Manhole
E:338874.850	1.160						
N:350902.876			{a} SWPipe119a	Pipe	31.190	Diam/Width:150	Not Applicable
SWMH114	32.223 30.386	Diameter / Length: 1.200	{1} SWPipe119b	Pipe	30.461	Diam/Width:150	Manhole
E:338747.852	1.837						
N:350871.322			{a} SWPipe117	Pipe	30.386	Diam/Width:225	Not Applicable
SWMH119	32.284 30.052	Diameter / Length: 1.200	{1} SWPipe144	Pipe	30.052	Diam/Width:150	Manhole
E:338492.999	2.232		{2} Porous Paving (36)	Pipe	30.052	Diam/Width:150	
N:351224.734			{a} SWPipe180	Pipe	30.052	Diam/Width:150	Not Applicable
SWMH120	31.456 30.183	Diameter / Length: 1.200					Manhole
E:338495.093	1.273						
N:351290.723			{a} SWPipe142	Pipe	30.183	Diam/Width:100	Not Applicable

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH121	32.280 31.675	Diameter / Length: 0.300					Manhole
E:338457.463 N:350924.944	0.605						
			{a} SWPipe159	Pipe	31.675	Diam/Width:225	Not Applicable
SWMH122	32.279 29.784	Diameter / Length: 1.200	{1} SWPipe124	Pipe	29.784	Diam/Width:150	Manhole
E:338894.123 N:350907.665	2.495						
			{a} SWPipe125a	Pipe	29.784	Diam/Width:150	Not Applicable
SWMH125	32.236 28.272	Diameter / Length: 1.200	{1} SWPipe080	Pipe	28.272	Diam/Width:225	Manhole
E:338527.984 N:351160.355	3.964		{2} SWPipe148	Pipe	28.347	Diam/Width:150	
			{3} Porous Paving (37)	Pipe	28.347	Diam/Width:150	
			{a} SWPipe081	Pipe	28.272	Diam/Width:225	Not Applicable
SWMH126	32.232 29.802	Diameter / Length: 1.200	{1} SWPipe146	Pipe	29.802	Diam/Width:150	Manhole
E:338513.106 N:351190.374	2.430						
			{a} SWPipe181	Pipe	29.802	Diam/Width:150	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH129	32.214 26.640	Diameter / Length: 1.500	{1} SWPipe094	Pipe	27.015	Diam/Width:225	Manhole
E:338709.978	5.574		{2} Porous Paving (25)	No Delay	Not Applicable	Not Applicable	
N:351113.369			{3} Porous Paving (26)	No Delay	Not Applicable		
			{a} SWPipe095	Pipe	26.640	Diam/Width:600	Not Applicable
SWMH130	32.209 27.749	Diameter / Length: 1.500	{1} SWPipe077	Pipe	27.749	Diam/Width:600	Manhole
E:338515.893	4.460		{2} SWPipe081	Pipe	28.124	Diam/Width:225	
N:351151.730			{a} SWPipe078	Pipe	27.749	Diam/Width:600	Not Applicable
SWMH131	32.094 27.830	Diameter / Length: 1.200	{1} SWPipe128b	Pipe	27.830	Diam/Width:150	Manhole
E:338834.916	4.264		{a} SWPipe129	Pipe	27.830	Diam/Width:225	Not Applicable
N:351145.957							
SWMH132	32.047 30.222	Diameter / Length: 1.500	{1} Unit 03- Cellular Storage A	Pipe	30.222	Diam/Width:150	Manhole
E:338328.675	1.825		{a} SWPipe063	Pipe	30.222	Diam/Width:600	Not Applicable
N:351229.414							

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH133	32.016 29.959	Diameter / Length: 1.200	{1} Unit 03- Cellular Storage B	Pipe	29.959	Diam/Width:100	Manhole
E:338369.183	2.057						
N:351178.013							
			{a} SWPipe066	Pipe	29.959	Diam/Width:225	Not Applicable
SWMH135	31.969 27.780	Diameter / Length: 1.200	{1} SWPipe129	Pipe	27.780	Diam/Width:225	Manhole
E:338844.563	4.188						
N:351148.354							
			{a} SWPipe130	Pipe	27.780	Diam/Width:225	Not Applicable
SWMH136	31.781 30.319	Diameter / Length: 1.200					Manhole
E:338689.104	1.462						
N:351021.712							
			{a} SWMH136	Pipe	30.319	Diam/Width:150	Not Applicable
SWMH137	31.781 28.624	Diameter / Length: 1.200	{1} SWPipe092	Pipe	28.699	Diam/Width:150	Manhole
E:338672.413	3.157						
N:351088.888							
			{a} SWPipe093	Pipe	28.624	Diam/Width:225	Not Applicable
SWMH138	31.781 29.943	Diameter / Length: 1.200	{1} SWPipe118	Pipe	29.943	Diam/Width:225	Manhole
E:338711.350	1.838						
N:350932.180							
			{a} SWPipe192	Pipe	29.943	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH139	31.773 27.688	Diameter / Length: 1.200					Manhole
E:338789.511	4.085						
N:351151.162			{a} SWPipe134	Pipe	27.688	Diam/Width:225	Not Applicable
SWMH140	31.769 27.430	Diameter / Length: 1.200	{1} SWPipe134	Pipe	27.430	Diam/Width:225	Manhole
E:338814.502	4.339		{2} Porous Paving (27)	No Delay	Not Applicable	Not Applicable	
N:351157.371			{a} SWPipe135	Pipe	27.430	Diam/Width:225	Not Applicable
SWMH141	31.754 28.355	Diameter / Length: 1.200	{1} SWPipe076	Pipe	28.805	Diam/Width:150	Manhole
E:338480.688	3.399						
N:351201.079			{a} SWPipe077	Pipe	28.355	Diam/Width:600	Not Applicable
SWMH142	31.754 26.480	Diameter / Length: 1.500	{1} SWPipe095	Pipe	26.480	Diam/Width:600	Manhole
E:338706.142	5.274						
N:351128.806			{a} SWPipe096	Pipe	26.480	Diam/Width:600	Not Applicable
SWMH143	31.723 27.713	Diameter / Length: 1.200	{1} SWPipe130	Pipe	27.713	Diam/Width:225	Manhole
E:338857.665	4.010						
N:351151.609			{a} SWPipe131	Pipe	27.713	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH144	31.691 28.495	Diameter / Length: 1.200	{1} SWPipe231	Pipe	28.570	Diam/Width:150	Manhole
E:338547.802	3.196						
N:351170.529			{a} SWPipe080	Pipe	28.495	Diam/Width:225	Not Applicable
SWMH145	31.487 30.299	Diameter / Length: 1.200					Manhole
E:338568.209	1.188						
N:351148.294			{a} SWPipe082	Pipe	30.299	Diam/Width:150	Not Applicable
SWMH148	31.544 26.179	Diameter / Length: 1.500	{1} SWPipe091	Pipe	26.179	Diam/Width:600	Manhole
E:338693.469	5.365		{2} SWPipe097	Pipe	26.179	Diam/Width:600	
N:351156.134			{a} SWPipe098a	Pipe	26.179	Diam/Width:600	Not Applicable
SWMH149	31.543 27.673	Diameter / Length: 1.200	{1} SWPipe131	Pipe	27.673	Diam/Width:225	Manhole
E:338865.429	3.870		{2} Porous Paving (29)	No Delay	Not Applicable	Not Applicable	
N:351153.538			{a} SWPipe132	Pipe	27.673	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)		Connection Details				Type
Coordinates (m)	Depth (m)	Manhole Size (m)	Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH150	31.542 28.550	Diameter / Length: 1.200	{1} SWPipe093	Pipe	28.550	Diam/Width:225	Manhole
E:338668.869	2.992		{2} SWPipe200	Pipe	28.625	Diam/Width:150	
N:351103.155			{3} SWPipe199	Pipe	28.625	Diam/Width:150	
			{a} SWPipe094	Pipe	28.550	Diam/Width:225	Not Applicable
SWMH151	31.502 27.513	Diameter / Length: 1.200	{1} SWPipe132	Pipe	27.513	Diam/Width:225	Manhole
E:338857.712	3.989		{2} Porous Paving (28)	No Delay	Not Applicable	Not Applicable	
N:351184.594			{a} SWPipe133	Pipe	27.513	Diam/Width:225	Not Applicable
SWMH152	31.466 30.560	Diameter / Length: 1.200	{1} SWPipe140	Pipe	30.685	Diam/Width:100	Manhole
E:338461.898	0.906		{a} SWPipe101	Pipe	30.560	Diam/Width:150	Not Applicable
N:351300.098							
SWMH153	31.466 26.376	Diameter / Length: 1.500	{1} SWPipe096	Pipe	26.376	Diam/Width:600	Manhole
E:338702.463	5.090		{a} SWPipe097	Pipe	26.376	Diam/Width:600	Not Applicable
N:351138.613							

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH154	31.377 27.270	Diameter / Length: 1.200	{1} SWPipe133	Pipe	27.270	Diam/Width:225	Manhole
E:338810.643 N:351172.899	4.106		{2} SWPipe135	Pipe	27.270	Diam/Width:225	
			{a} SWPipe136	Pipe	27.270	Diam/Width:225	Not Applicable
SWMH155	31.365 30.760	Diameter / Length: 0.300					Manhole
E:338460.528 N:351302.767	0.605		{a} SWPipe140	Pipe	30.760	Diam/Width:100	Not Applicable
SWMH156	31.300 30.287	Diameter / Length: 1.200					Manhole
E:338445.483 N:351250.429	1.013		{a} SWPipe076	Pipe	30.287	Diam/Width:150	Not Applicable
SWMH157	31.281 27.624	Diameter / Length: 1.200	{1} SWPipe196	Pipe	27.624	Diam/Width:150	Manhole
E:338846.811 N:351308.462	3.657		{a} SWPipe108	Pipe	27.624	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH160	31.193 27.205	Diameter / Length: 1.200	{1} SWPipe136	Pipe	27.205	Diam/Width:225	Manhole
E:338807.509 N:351185.516	3.987		{2} SWPipe137	Pipe	27.205	Diam/Width:225	
			{a} SWPipe138	Pipe	27.205	Diam/Width:225	Not Applicable
SWMH163	31.173 30.413	Diameter / Length: 0.300					Manhole
E:338812.111 N:351181.507	0.760						
			{a} SWPipe137	Pipe	30.413	Diam/Width:225	Not Applicable
SWMH164	31.053 30.194	Diameter / Length: 1.200					Manhole
E:338923.105 N:350899.651	0.859						
			{a} SWPipe123	Pipe	30.194	Diam/Width:150	Not Applicable
SWMH165	31.050 29.932	Diameter / Length: 1.200	{1} SWPipe123	Pipe	29.932	Diam/Width:150	Manhole
E:338897.684 N:350893.334	1.118						
			{a} SWPipe124	Pipe	29.932	Diam/Width:150	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH166	30.978 25.490	Diameter / Length: 1.500	{1} SWPipe116	Pipe	25.490	Diam/Width:600	Manhole
E:338805.627	5.488		{2} SWPipe138	Pipe	25.865	Diam/Width:225 Diam/Width:150	
N:351193.090			{3} SWPipe229	Pipe	25.490		
			{a} SWPipe139	Pipe	25.490	Diam/Width:300	Not Applicable
SWMH167	30.962 25.465	Diameter / Length: 1.200	{1} SWPipe139	Pipe	25.465	Diam/Width:300	Manhole
E:338810.479	5.497						
N:351194.296			{a} SWPipe230	Pipe	25.465	Diam/Width:300	Not Applicable
SWMH168	30.946 25.877	Diameter / Length: 1.500	{1} SWPipe098b	Pipe	25.877	Diam/Width:600	Manhole
E:338747.122	5.069						
N:351183.676			{a} SWPipe113a	Pipe	25.877	Diam/Width:600	Not Applicable
SWMH170	31.275 28.401	Diameter / Length: 1.200	{1} SWPipe103	Pipe	28.401	Diam/Width:225	Manhole
E:338792.149	2.874						
N:351414.945			{a} SWPipe104	Pipe	28.401	Diam/Width:150	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH171	30.805 25.648	Diameter / Length: 1.200	{1} SWPipe110	Pipe	26.098	Diam/Width:150	Manhole
E:338793.235 N:351221.945	5.157		{a} SWPipe112	Pipe	25.648	Diam/Width:600	Not Applicable
SWMH173	30.713 27.396	Diameter / Length: 1.200	{1} SWPipe108	Pipe	27.396	Diam/Width:225	Manhole
E:338851.496 N:351263.094	3.317		{a} SWPipe193	Pipe	27.396	Diam/Width:150	Not Applicable
SWMH175	30.680 29.690	Diameter / Length: 1.200	{1} SWPipe101	Pipe	29.690	Diam/Width:150	Manhole
E:338539.296 N:351339.830	0.990		{2} SWPipe179	Pipe	29.740	Diam/Width:100	
			{a} SWPipe100	Pipe	29.690	Diam/Width:150	Not Applicable
SWMH176	30.675 29.412	Diameter / Length: 1.200					Manhole
E:338587.106 N:351362.912	1.263		{a} SWPipe099	Pipe	29.412	Diam/Width:150	Not Applicable
SWMH177	30.675 29.412	Diameter / Length: 1.200					Manhole
E:338680.517 N:351410.864	1.263		{a} SWPipe102	Pipe	29.412	Diam/Width:150	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH178	30.604 25.544	Diameter / Length: 1.500	{1} SWPipe115	Pipe	25.544	Diam/Width:600	Manhole
E:338803.021 N:351203.576	5.060						
			{a} SWPipe116	Pipe	25.544	Diam/Width:600	Not Applicable
SWMH179	30.525 29.920	Diameter / Length: 0.300					Manhole
E:338536.464 N:351345.346	0.605						
			{a} SWPipe179	Pipe	29.920	Diam/Width:100	Not Applicable
SWMH180	30.675 28.638	Diameter / Length: 1.200	{1} SWPipe197	Pipe	28.713	Diam/Width:150	Manhole
E:338770.525 N:351457.069	2.037						
			{a} SWPipe103	Pipe	28.638	Diam/Width:225	Not Applicable
SWMH181	30.358 25.583	Diameter / Length: 1.500	{1} SWPipe113b	Pipe	25.583	Diam/Width:600	Manhole
E:338799.448 N:351210.537	4.775		{2} SWPipe112	Pipe	25.583	Diam/Width:600	
			{a} SWPipe115	Pipe	25.583	Diam/Width:600	Not Applicable

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Name	Cover Level (m) Invert Level (m)		Connection Details				Type
Coordinates (m)	Depth (m)	Manhole Size (m)	Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH186	30.052 29.018	Diameter / Length: 1.500					Manhole
E:338826.637	1.034						
N:351224.495			{a} SWPipe114	Pipe	29.018	Diam/Width:150	Not Applicable
SWMH189	36.479 33.122	Diameter / Length: 1.200	{1} SWPipe004a	Pipe	33.122	Diam/Width:225	Manhole
E:338152.646	3.357		{2} SWPipe050	Pipe	33.122	Diam/Width:225	
N:351089.239			{3} SWMH244	Pipe	33.122	Diam/Width:150	
			{a} SWPipe004b	Pipe	33.122	Diam/Width:225	Not Applicable
SWMH190	32.917 30.094	Diameter / Length: 1.200	{1} SWPipe085a	Pipe	30.169	Diam/Width:150	Manhole
E:338672.891	2.823						
N:350922.624			{a} SWPipe085b	Pipe	30.094	Diam/Width:225	Not Applicable
SWMH193	33.150 29.178	Diameter / Length: 1.500	{1} SWPipe189a	Pipe	29.178	Diam/Width:600	Manhole
E:338373.140	3.972						
N:351141.792			{a} SWPipe189b	Pipe	29.178	Diam/Width:600	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH194	33.452 28.674	Diameter / Length: 1.500	{1} SWPipe189b	Pipe	28.674	Diam/Width:600	Manhole
E:338402.383 N:351100.800	4.778						
			{a} SWPipe189c	Pipe	28.674	Diam/Width:600	Not Applicable
SWMH192	35.584 32.840	Diameter / Length: 1.200	{1} SWPipe005b	Pipe	32.840	Diam/Width:225	Manhole
E:338185.440 N:351043.269	2.744						
			{a} SWPipe005c	Pipe	32.840	Diam/Width:225	Not Applicable
SWMH191	35.896 32.943	Diameter / Length: 1.200	{1} SWPipe005a	Pipe	32.943	Diam/Width:225	Manhole
E:338173.376 N:351060.180	2.953						
			{a} SWPipe005b	Pipe	32.943	Diam/Width:225	Not Applicable
SWMH195	36.466 33.658	Diameter / Length: 1.200	{1} SWPipe002b	Pipe	33.658	Diam/Width:225	Manhole
E:338147.256 N:351066.920	2.808						
			{a} SWPipe002c	Pipe	33.658	Diam/Width:225	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH196	37.012 33.840	Diameter / Length: 1.200	{1} SWPipe002a	Pipe	33.840	Diam/Width:225	Manhole
E:338117.623 N:351045.779	3.172		{a} SWPipe002b	Pipe	33.840	Diam/Width:225	Not Applicable
SWMH197	34.860 31.240	Diameter / Length: 1.200	{1} SWPipe021a	Pipe	31.240	Diam/Width:225	Manhole
E:338229.773 N:350987.596	3.621		{a} SWPipe021b	Pipe	31.240	Diam/Width:225	Not Applicable
SWMH198	34.530 31.075	Diameter / Length: 1.200	{1} SWPipe021b	Pipe	31.075	Diam/Width:225	Manhole
E:338262.650 N:350984.121	3.455		{2} Swale 02	Pipe	31.150	Diam/Width:150	
			{a} SWPipe021c	Pipe	31.075	Diam/Width:225	Not Applicable
SWMH199	33.992 27.430	Diameter / Length: 1.500	{1} SWPipe073a	Pipe	27.430	Diam/Width:600	Manhole
E:338479.562 N:351027.020	6.562		{a} SWPipe073b	Pipe	27.430	Diam/Width:600	Not Applicable

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH200	33.150 26.993	Diameter / Length: 1.500	{1} SWPipe075a	Pipe	26.993	Diam/Width:600	Manhole
E:338551.991 N:351076.101	6.157						
			{a} SWPipe075b	Pipe	26.993	Diam/Width:600	Not Applicable
SWMH201	30.650 25.729	Diameter / Length: 1.500	{1} SWPipe113a	Pipe	25.729	Diam/Width:600	Manhole
E:338773.458 N:351197.195	4.921						
			{a} SWPipe113b	Pipe	25.729	Diam/Width:600	Not Applicable
SWMH202	33.969 27.830	Diameter / Length: 1.500	{1} SWPipe072a	Pipe	27.830	Diam/Width:600	Manhole
E:338451.408 N:351032.079	6.139						
			{a} SWPipe072b	Pipe	27.830	Diam/Width:600	Not Applicable
SWMH203	31.278 26.043	Diameter / Length: 1.500	{1} SWPipe098a	Pipe	26.043	Diam/Width:600	Manhole
E:338717.600 N:351168.521	5.235						
			{a} SWPipe098b	Pipe	26.043	Diam/Width:600	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH247	37.328 36.021	Diameter / Length: 1.200					Manhole
E:338104.426 N:350998.285	1.307						
			{a} SWPipe219	Pipe	36.021	Diam/Width:150	Not Applicable
SWMH250	37.587 36.021	Diameter / Length: 1.200	{1} SWPipe222	Pipe	36.021	Diam/Width:150	Manhole
E:338084.680 N:351025.964	1.566						
			{a} SWPipe001	Pipe	36.021	Diam/Width:150	Not Applicable
SWMH248	37.580 36.021	Diameter / Length: 1.200	{1} SWPipe221	Pipe	36.021	Diam/Width:100	Manhole
E:338084.388 N:351022.068	1.559						
			{a} SWPipe220	Pipe	36.021	Diam/Width:150	Not Applicable
SWMH249	37.647 37.042	Diameter / Length: 0.300					Manhole
E:338077.953 N:351017.465	0.605						
			{a} SWPipe221	Pipe	37.042	Diam/Width:100	Not Applicable
SWMH244	37.233 34.953	Diameter / Length: 1.200	{1} SWPipe216	Pipe	34.953	Diam/Width:150	Manhole
E:338133.260 N:351090.800	2.280						
			{a} SWMH244	Pipe	34.953	Diam/Width:150	Not Applicable

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Name	Cover Level (m) Invert Level (m)		Connection Details				Type
Coordinates (m)	Depth (m)	Manhole Size (m)	Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH242	37.210 36.505	Diameter / Length: 1.200					Manhole
E:338126.577	0.705						
N:351093.280			{a} SWPipe213	Pipe	36.505	Diam/Width:100	Not Applicable
SWMH239	38.066 37.057	Diameter / Length: 1.200					Manhole
E:338095.890	1.009						
N:351143.183			{a} SWPipe211	Pipe	37.057	Diam/Width:100	Not Applicable
SWMH236	33.303 32.366	Diameter / Length: 1.200					Manhole
E:338415.808	0.937						
N:350940.221			{a} SWPipe209	Pipe	32.366	Diam/Width:150	Not Applicable
SWMH230	30.657 27.960	Diameter / Length: 1.200					Manhole
E:338598.837	2.697						
N:351145.786			{a} SWPipe204	Pipe	27.960	Diam/Width:150	Not Applicable
SWMH229	31.386 27.705	Diameter / Length: 1.200					Manhole
E:338576.157	3.681						
N:351134.143			{a} SWPipe203	Pipe	27.705	Diam/Width:600	Not Applicable

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Name	Cover Level (m) Invert Level (m)	Manhole Size (m)	Connection Details				Type
Coordinates (m)	Depth (m)		Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH228	32.536 27.312	Diameter / Length: 1.500	{1} SWPipe078	Pipe	27.312	Diam/Width:600	Manhole
E:338541.230	5.224		{2} SWPipe203	Pipe	27.312	Diam/Width:600	
N:351116.214			{a} SWPipe078 (1)	Pipe	27.312	Diam/Width:600	Not Applicable
SWMH278	31.781 29.824	Diameter / Length: 1.200	{1} SWPipe192	Pipe	29.824	Diam/Width:225	Manhole
E:338705.578	1.957						
N:350955.409			{a} SWPipe236	Pipe	29.824	Diam/Width:225	Not Applicable
SWMH277	32.048 29.745	Diameter / Length: 1.200	{1} SWPipe236	Pipe	29.745	Diam/Width:225	Manhole
E:338690.390	2.303						
N:350951.636			{a} SWPipe235	Pipe	29.745	Diam/Width:150	Not Applicable
SWMH272	33.803 31.081	Diameter / Length: 1.200	{1} Unit 07- Cellular Storage A	Pipe	31.081	Diam/Width:150	Manhole
E:338316.089	2.722						
N:351005.835			{a} SWPipe233	Pipe	31.081	Diam/Width:225	Not Applicable
Pumping Station	30.941 25.450	Diameter / Length: 1.200	{1} SWPipe230	Pipe	25.450	Diam/Width:300	Manhole
E:338813.391	5.491						
N:351195.019							Not Applicable

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Name	Cover Level (m) Invert Level (m)		Connection Details				Type
Coordinates (m)	Depth (m)	Manhole Size (m)	Incoming Connections	Connection Type	Connection Invert (m)	Connection Size (mm)	Junction Type
			Outgoing Connections				Cover
SWMH265	30.672 28.035	Diameter / Length: 1.200	{1} SWPipe228	Pipe	28.035	Diam/Width:150	Manhole
E:338798.150	2.637						
N:351200.794			{a} SWPipe229	Pipe	28.035	Diam/Width:150	Not Applicable

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Inflow Label	Connected To	Flow (L/s)	Runoff Method	Area (ha)	Percentage Impervious (%)	Urban Creep (%)	Adjusted Percentage Impervious (%)	Area Analysed (ha)
Catchment-Pavement 001	SWMH002		Time of Concentration	0.064	100	0	100	0.064
Catchment-Pavement 002	SWMH247		Time of Concentration	0.096	100	0	100	0.096
Catchment-Pavement 003	SWMH247		Time of Concentration	0.075	100	0	100	0.075
Catchment-Pavement 004	SWMH249		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 005	SWMH249		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 006	SWMH250		Time of Concentration	0.034	100	0	100	0.034
Catchment-Pavement 007	SWMH250		Time of Concentration	0.094	100	0	100	0.094
Catchment-Pavement 008	SWMH247		Time of Concentration	0.027	100	0	100	0.027
Catchment-Pavement 009	SWMH196		Time of Concentration	0.009	100	0	100	0.009
Catchment-Pavement 010	SWMH196		Time of Concentration	0.007	100	0	100	0.007
Catchment-Pavement 011	Porous Paving (2)		Time of Concentration	0.011	100	0	100	0.011
Catchment-Pavement 012	Porous Paving (2)		Time of Concentration	0.022	100	0	100	0.022
Catchment-Pavement 013	Porous Paving (2)		Time of Concentration	0.064	100	0	100	0.064
Catchment-Pavement 014	Porous Paving (2)		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 015	Porous Paving (2)		Time of Concentration	0.047	100	0	100	0.047
Catchment-Pavement 016	Porous Paving (2)		Time of Concentration	0.061	100	0	100	0.061
Catchment-Pavement 017	SWMH195		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 018	SWMH195		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 019	SWMH191		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 020	SWMH195		Time of Concentration	0.029	100	0	100	0.029
Catchment-Pavement 021	SWMH195		Time of Concentration	0.009	100	0	100	0.009

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Catchment-Pavement 022	SWMH010		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 023	HGV Parking -Cellular Storage		Time of Concentration	0.237	100	0	100	0.237
Catchment-Pavement 024	SWMH239		Time of Concentration	0.049	100	0	100	0.049
Catchment-Pavement 025	SWMH003		Time of Concentration	0.027	100	0	100	0.027
Catchment-Pavement 026	SWMH004		Time of Concentration	0.047	100	0	100	0.047
Catchment-Pavement 027	SWMH006		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 028	SWMH189		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 029	SWMH010		Time of Concentration	0.011	100	0	100	0.011
Catchment-Pavement 030	Porous Paving (8)		Time of Concentration	0.041	100	0	100	0.041
Catchment-Pavement 031	SWMH018		Time of Concentration	0.114	100	0	100	0.114
Catchment-Pavement 032	SWMH013		Time of Concentration	0.100	100	0	100	0.100
Catchment-Pavement 033	Porous Paving (7)		Time of Concentration	0.072	100	0	100	0.072
Catchment-Pavement 034	Porous Paving (7)		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 035	SWMH010		Time of Concentration	0.022	100	0	100	0.022
Catchment-Pavement 036	SWMH191		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 037	SWMH192		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 038	SWMH192		Time of Concentration	0.011	100	0	100	0.011
Catchment-Pavement 039	SWMH027		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 040	Porous Paving (5)		Time of Concentration	0.082	100	0	100	0.082
Catchment-Pavement 041	Porous Paving (5)		Time of Concentration	0.033	100	0	100	0.033
Catchment-Pavement 042	SWMH031		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 043	SWMH028		Time of Concentration	0.074	100	0	100	0.074
Catchment-Pavement 044	Porous Paving (3)		Time of Concentration	0.124	100	0	100	0.124

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Catchment-Pavement 045	Porous Paving (4)		Time of Concentration	0.071	100	0	100	0.071
Catchment-Pavement 046	Porous Paving (6)		Time of Concentration	0.074	100	0	100	0.074
Catchment-Pavement 047	Porous Paving (6)		Time of Concentration	0.053	100	0	100	0.053
Catchment-Pavement 048	Swale 02		Time of Concentration	0.021	100	0	100	0.021
Catchment-Pavement 049	SWMH033		Time of Concentration	0.013	100	0	100	0.013
Catchment-Pavement 050	Swale 01		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 051	Swale 08		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 052	Swale 01		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 053	Swale 08		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 054	Swale 01		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 055	SWMH016		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 056	SWMH024		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 057	SWMH024		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 058	SWMH024		Time of Concentration	0.013	100	0	100	0.013
Catchment-Pavement 059	Swale 02		Time of Concentration	0.059	100	0	100	0.059
Catchment-Pavement 060	SWMH032		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 061	SWMH024		Time of Concentration	0.005	100	0	100	0.005
Catchment-Pavement 062	SWMH044		Time of Concentration	0.030	100	0	100	0.030
Catchment-Pavement 063	SWMH056		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 064	SWMH061		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 065	SWMH044		Time of Concentration	0.046	100	0	100	0.046
Catchment-Pavement 066	Porous Paving (41)		Time of Concentration	0.032	100	0	100	0.032
Catchment-Pavement 067	Porous Paving (43)		Time of Concentration	0.004	100	0	100	0.004

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Catchment-Pavement 068	Porous Paving (44)		Time of Concentration	0.003	100	0	100	0.003
Catchment-Pavement 069	Porous Paving (41)		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 070	Porous Paving (41)		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 071	Porous Paving		Time of Concentration	0.022	100	0	100	0.022
Catchment-Pavement 072	Porous Paving (42)		Time of Concentration	0.006	100	0	100	0.006
Catchment-Pavement 073	Porous Paving (42)		Time of Concentration	0.007	100	0	100	0.007
Catchment-Pavement 074	Porous Paving		Time of Concentration	0.013	100	0	100	0.013
Catchment-Pavement 075	SWMH056		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 076	DT 02-Cellular Storage		Time of Concentration	0.066	100	0	100	0.066
Catchment-Pavement 077	Porous Paving (40)		Time of Concentration	0.023	100	0	100	0.023
Catchment-Pavement 078	Porous Paving (40)		Time of Concentration	0.024	100	0	100	0.024
Catchment-Pavement 079	Porous Paving (1)		Time of Concentration	0.056	100	0	100	0.056
Catchment-Pavement 080	Porous Paving (39)		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 081	Porous Paving (39)		Time of Concentration	0.010	100	0	100	0.010
Catchment-Pavement 082	Swale 07		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 083	Swale 07		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 084	Swale 02		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 085	SWMH198		Time of Concentration	0.011	100	0	100	0.011
Catchment-Pavement 086	SWMH047		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 087	SWMH047		Time of Concentration	0.021	100	0	100	0.021
Catchment-Pavement 088	Porous Paving (9)		Time of Concentration	0.024	100	0	100	0.024
Catchment-Pavement 089	SWMH074		Time of Concentration	0.121	100	0	100	0.121
Catchment-Pavement 090	Porous Paving (10)		Time of Concentration	0.014	100	0	100	0.014

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Catchment-Pavement 091	SWMH085		Time of Concentration	0.089	100	0	100	0.089
Catchment-Pavement 092	Porous Paving (11)		Time of Concentration	0.024	100	0	100	0.024
Catchment-Pavement 093	SWMH055		Time of Concentration	0.021	100	0	100	0.021
Catchment-Pavement 094	SWMH055		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 095	SWMH058		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 096	SWMH058		Time of Concentration	0.026	100	0	100	0.026
Catchment-Pavement 097	SWMH050		Time of Concentration	0.021	100	0	100	0.021
Catchment-Pavement 098	SWMH058		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 099	SWMH065		Time of Concentration	0.005	100	0	100	0.005
Catchment-Pavement 100	SWMH065		Time of Concentration	0.056	100	0	100	0.056
Catchment-Pavement 101	Unit 07-Cellular Storage A		Time of Concentration	0.097	100	0	100	0.097
Catchment-Pavement 102	Unit 07-Cellular Storage A		Time of Concentration	0.131	100	0	100	0.131
Catchment-Pavement 103	Unit 07-Cellular Storage A		Time of Concentration	0.121	100	0	100	0.121
Catchment-Pavement 104	Unit 07-Cellular Storage A		Time of Concentration	0.147	100	0	100	0.147
Catchment-Pavement 105	Porous Paving (12)		Time of Concentration	0.028	100	0	100	0.028
Catchment-Pavement 106	SWMH087		Time of Concentration	0.168	100	0	100	0.168
Catchment-Pavement 107	Porous Paving (14)		Time of Concentration	0.033	100	0	100	0.033
Catchment-Pavement 108	SWMH045		Time of Concentration	0.040	100	0	100	0.040
Catchment-Pavement 109	SWMH050		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 110	Swale 03		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 111	SWMH043		Time of Concentration	0.021	100	0	100	0.021
Catchment-Pavement 112	Swale 03		Time of Concentration	0.010	100	0	100	0.010
Catchment-Pavement 113	SWMH038		Time of Concentration	0.019	100	0	100	0.019

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			FJB	PJB	WL			
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Catchment-Pavement 114	Swale 04		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 115	SWMH236		Time of Concentration	0.146	100	0	100	0.146
Catchment-Pavement 116	SWMH069		Time of Concentration	0.074	100	0	100	0.074
Catchment-Pavement 117	SWMH069		Time of Concentration	0.048	100	0	100	0.048
Catchment-Pavement 118	SWMH121		Time of Concentration	0.041	100	0	100	0.041
Catchment-Pavement 119	SWMH068		Time of Concentration	0.071	100	0	100	0.071
Catchment-Pavement 120	SWMH040		Time of Concentration	0.024	100	0	100	0.024
Catchment-Pavement 121	SWMH053		Time of Concentration	0.008	100	0	100	0.008
Catchment-Pavement 122	Swale 04		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 123	SWMH053		Time of Concentration	0.014	100	0	100	0.014
Catchment-Pavement 124	SWMH053		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 125	SWMH202		Time of Concentration	0.024	100	0	100	0.024
Catchment-Pavement 126	SWMH063		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 127	SWMH063		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 128	SWMH063		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 129	Porous Paving (18)		Time of Concentration	0.026	100	0	100	0.026
Catchment-Pavement 130	Porous Paving (17)		Time of Concentration	0.095	100	0	100	0.095
Catchment-Pavement 131	Porous Paving (16)		Time of Concentration	0.176	100	0	100	0.176
Catchment-Pavement 132	SWMH063		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 133	SWMH063		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 134	SWMH078		Time of Concentration	0.026	100	0	100	0.026
Catchment-Pavement 135	SWMH078		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 136	SWMH078		Time of Concentration	0.026	100	0	100	0.026

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Catchment-Pavement 137	SWMH194		Time of Concentration	0.023	100	0	100	0.023
Catchment-Pavement 138	SWMH194		Time of Concentration	0.010	100	0	100	0.010
Catchment-Pavement 139	SWMH194		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 140	SWMH193		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 141	SWMH193		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 142	SWMH092		Time of Concentration	0.029	100	0	100	0.029
Catchment-Pavement 143	SWMH097		Time of Concentration	0.029	100	0	100	0.029
Catchment-Pavement 144	SWMH097		Time of Concentration	0.025	100	0	100	0.025
Catchment-Pavement 145	SWMH097		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 146	SWMH097		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 147	SWMH097		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 148	SWMH101		Time of Concentration	0.042	100	0	100	0.042
Catchment-Pavement 149	SWMH096		Time of Concentration	0.008	100	0	100	0.008
Catchment-Pavement 150	SWMH080		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 151	Porous Paving (21)		Time of Concentration	0.074	100	0	100	0.074
Catchment-Pavement 152	Porous Paving (22)		Time of Concentration	0.055	100	0	100	0.055
Catchment-Pavement 153	SWMH062		Time of Concentration	0.014	100	0	100	0.014
Catchment-Pavement 154	Unit 06-Cellular Storage A		Time of Concentration	0.111	100	0	100	0.111
Catchment-Pavement 155	SWMH071		Time of Concentration	0.032	100	0	100	0.032
Catchment-Pavement 156	SWMH071		Time of Concentration	0.061	100	0	100	0.061
Catchment-Pavement 157	Unit 06-Cellular Storage A		Time of Concentration	0.137	100	0	100	0.137
Catchment-Pavement 158	Porous Paving (20)		Time of Concentration	0.088	100	0	100	0.088
Catchment-Pavement 159	Unit 03-Cellular Storage B		Time of Concentration	0.195	100	0	100	0.195

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Catchment-Pavement 160	Porous Paving (19)		Time of Concentration	0.099	100	0	100	0.099
Catchment-Pavement 161	Unit(s) 04 to 05-Cellular Storage		Time of Concentration	0.174	100	0	100	0.174
Catchment-Pavement 162	Unit(s) 04 to 05-Cellular Storage		Time of Concentration	0.133	100	0	100	0.133
Catchment-Pavement 163	SWMH090		Time of Concentration	0.025	100	0	100	0.025
Catchment-Pavement 164	Porous Paving (15)		Time of Concentration	0.099	100	0	100	0.099
Catchment-Pavement 165	SWMH199		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 166	Swale 05		Time of Concentration	0.013	100	0	100	0.013
Catchment-Pavement 167	Swale 05		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 168	SWMH077		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 169	SWMH077		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 170	SWMH077		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 171	SWMH200		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 172	SWMH200		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 173	SWMH200		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 174	SWMH095		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 175	SWMH095		Time of Concentration	0.025	100	0	100	0.025
Catchment-Pavement 176	SWMH100		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 177	SWMH100		Time of Concentration	0.023	100	0	100	0.023
Catchment-Pavement 178	SWMH095		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 179	SWMH228		Time of Concentration	0.023	100	0	100	0.023
Catchment-Pavement 180	SWMH130		Time of Concentration	0.012	100	0	100	0.012
Catchment-Pavement 181	SWMH130		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 182	SWMH130		Time of Concentration	0.019	100	0	100	0.019

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Catchment-Pavement 183	SWMH130		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 184	SWMH130		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 185	SWMH141		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 186	SWMH141		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 187	SWMH156		Time of Concentration	0.048	100	0	100	0.048
Catchment-Pavement 188	Unit 01-Cellular Storage A		Time of Concentration	0.259	100	0	100	0.259
Catchment-Pavement 189	Unit 01-Cellular Storage A		Time of Concentration	0.216	100	0	100	0.216
Catchment-Pavement 190	Unit 01-Cellular Storage A		Time of Concentration	0.235	100	0	100	0.235
Catchment-Pavement 191	Unit 01-Cellular Storage A		Time of Concentration	0.216	100	0	100	0.216
Catchment-Pavement 192	Unit 01-Cellular Storage A		Time of Concentration	0.253	100	0	100	0.253
Catchment-Pavement 193	SWMH170		Time of Concentration	0.171	100	0	100	0.171
Catchment-Pavement 194	Unit 01-Cellular Storage B		Time of Concentration	0.206	100	0	100	0.206
Catchment-Pavement 195	Unit 01-Cellular Storage C		Time of Concentration	0.339	100	0	100	0.339
Catchment-Pavement 196	Unit 01-Cellular Storage C		Time of Concentration	0.215	100	0	100	0.215
Catchment-Pavement 197	Unit 01-Cellular Storage C		Time of Concentration	0.144	100	0	100	0.144
Catchment-Pavement 198	Unit 01-Cellular Storage C		Time of Concentration	0.264	100	0	100	0.264
Catchment-Pavement 199	Unit 01-Cellular Storage C		Time of Concentration	0.215	100	0	100	0.215
Catchment-Pavement 200	Unit 01-Cellular Storage C		Time of Concentration	0.241	100	0	100	0.241
Catchment-Pavement 201	SWMH230		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 202	SWMH229		Time of Concentration	0.009	100	0	100	0.009
Catchment-Pavement 203	SWMH229		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 204	SWMH145		Time of Concentration	0.052	100	0	100	0.052
Catchment-Pavement 205	Porous Paving (37)		Time of Concentration	0.014	100	0	100	0.014

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Catchment-Pavement 206	Porous Paving (31)		Time of Concentration	0.260	100	0	100	0.260
Catchment-Pavement 207	Porous Paving (34)		Time of Concentration	0.013	100	0	100	0.013
Catchment-Pavement 208	Porous Paving (13)		Time of Concentration	0.244	100	0	100	0.244
Catchment-Pavement 209	Porous Paving (30)		Time of Concentration	0.222	100	0	100	0.222
Catchment-Pavement 210	Porous Paving (32)		Time of Concentration	0.138	100	0	100	0.138
Catchment-Pavement 211	Porous Paving (36)		Time of Concentration	0.030	100	0	100	0.030
Catchment-Pavement 212	SWMH120		Time of Concentration	0.063	100	0	100	0.063
Catchment-Pavement 213	SWMH100		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 214	SWMH100		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 215	SWMH108		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 216	SWMH107		Time of Concentration	0.026	100	0	100	0.026
Catchment-Pavement 217	SWMH107		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 218	SWMH108		Time of Concentration	0.015	100	0	100	0.015
Catchment-Pavement 219	SWMH108		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 220	SWMH148		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 221	SWMH148		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 222	SWMH148		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 223	SWMH148		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 224	SWMH148		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 225	SWMH148		Time of Concentration	0.023	100	0	100	0.023
Catchment-Pavement 226	SWMH203		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 227	SWMH203		Time of Concentration	0.014	100	0	100	0.014
Catchment-Pavement 228	Swale 06		Time of Concentration	0.014	100	0	100	0.014

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Catchment-Pavement 229	SWMH168		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 230	Swale 06		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 231	SWMH201		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 232	Swale 06		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 233	SWMH181		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 234	SWMH181		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 235	SWMH181		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 236	SWMH181		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 237	SWMH186		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 238	SWMH186		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 239	SWMH186		Time of Concentration	0.114	100	0	100	0.114
Catchment-Pavement 240	SWMH107		Time of Concentration	0.012	100	0	100	0.012
Catchment-Pavement 241	SWMH106		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 242	SWMH106		Time of Concentration	0.018	100	0	100	0.018
Catchment-Pavement 243	SWMH103		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 244	SWMH103		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 245	SWMH103		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 246	SWMH103		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 247	SWMH102		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 248	SWMH102		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 249	SWMH102		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 250	SWMH102		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 251	SWMH098		Time of Concentration	0.019	100	0	100	0.019

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Catchment-Pavement 252	SWMH098		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 253	Unit 02-Cellular Storage C		Time of Concentration	0.132	100	0	100	0.132
Catchment-Pavement 254	SWMH098		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 255	SWMH098		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 256	SWMH094		Time of Concentration	0.028	100	0	100	0.028
Catchment-Pavement 257	SWMH094		Time of Concentration	0.017	100	0	100	0.017
Catchment-Pavement 258	SWMH093		Time of Concentration	0.019	100	0	100	0.019
Catchment-Pavement 259	SWMH091		Time of Concentration	0.020	100	0	100	0.020
Catchment-Pavement 260	Unit 02-Cellular Storage C		Time of Concentration	0.128	100	0	100	0.128
Catchment-Pavement 261	SWMH109		Time of Concentration	0.225	100	0	100	0.225
Catchment-Pavement 262	Unit 02-Cellular Storage B		Time of Concentration	0.199	100	0	100	0.199
Catchment-Pavement 263	Unit 02-Cellular Storage A		Time of Concentration	0.121	100	0	100	0.121
Catchment-Pavement 264	Unit 02-Cellular Storage A		Time of Concentration	0.119	100	0	100	0.119
Catchment-Pavement 265	Porous Paving (29)		Time of Concentration	0.044	100	0	100	0.044
Catchment-Pavement 266	Porous Paving (29)		Time of Concentration	0.024	100	0	100	0.024
Catchment-Pavement 267	Porous Paving (29)		Time of Concentration	0.086	100	0	100	0.086
Catchment-Pavement 268	Porous Paving (28)		Time of Concentration	0.062	100	0	100	0.062
Catchment-Pavement 269	Porous Paving (28)		Time of Concentration	0.052	100	0	100	0.052
Catchment-Pavement 270	Unit 02-Cellular Storage C		Time of Concentration	0.127	100	0	100	0.127
Catchment-Pavement 271	Porous Paving (27)		Time of Concentration	0.060	100	0	100	0.060
Catchment-Pavement 272	Porous Paving (27)		Time of Concentration	0.099	100	0	100	0.099
Catchment-Pavement 273	Porous Paving (27)		Time of Concentration	0.022	100	0	100	0.022
Catchment-Pavement 274	Porous Paving (27)		Time of Concentration	0.074	100	0	100	0.074

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Catchment-Pavement 275	Porous Paving (27)		Time of Concentration	0.005	100	0	100	0.005
Catchment-Pavement 276	Porous Paving (27)		Time of Concentration	0.011	100	0	100	0.011
Catchment-Pavement 277	Porous Paving (27)		Time of Concentration	0.039	100	0	100	0.039
Catchment-Pavement 278	Porous Paving (27)		Time of Concentration	0.030	100	0	100	0.030
Catchment-Pavement 279	Porous Paving (27)		Time of Concentration	0.026	100	0	100	0.026
Catchment-Pavement 280	Porous Paving (26)		Time of Concentration	0.079	100	0	100	0.079
Catchment-Pavement 281	Porous Paving (25)		Time of Concentration	0.046	100	0	100	0.046
Catchment-Pavement 282	SWMH153		Time of Concentration	0.011	100	0	100	0.011
Catchment-Pavement 283	SWMH153		Time of Concentration	0.021	100	0	100	0.021
Catchment-Pavement 284	Porous Paving (23)		Time of Concentration	0.045	100	0	100	0.045
Catchment-Pavement 285	Porous Paving (24)		Time of Concentration	0.031	100	0	100	0.031
Catchment-Pavement 286	Porous Paving (23)		Time of Concentration	0.022	100	0	100	0.022
Catchment-Pavement 287	Porous Paving (24)		Time of Concentration	0.016	100	0	100	0.016
Catchment-Pavement 288	Unit 02-Cellular Storage C		Time of Concentration	0.193	100	0	100	0.193
Catchment-Pavement 289	SWMH136		Time of Concentration	0.127	100	0	100	0.127
Catchment-Pavement 290	Unit 02-Cellular Storage C		Time of Concentration	0.141	100	0	100	0.141
Catchment-Pavement 291	SWMH165		Time of Concentration	0.048	100	0	100	0.048
Catchment-Pavement 292	SWMH164		Time of Concentration	0.044	100	0	100	0.044
Catchment-Roof 01	SWMH247		Time of Concentration	0.046	100	0	100	0.046
Catchment-Roof 02	SWMH026		Time of Concentration	0.120	100	0	100	0.120
Catchment-Roof 03	Unit(s) 08 to 10-Cellular Storage		Time of Concentration	0.065	100	0	100	0.065
Catchment-Roof 04	Unit(s) 08 to 10-Cellular Storage		Time of Concentration	0.065	100	0	100	0.065
Catchment-Roof 05	Unit 07-Cellular Storage A		Time of Concentration	0.553	100	0	100	0.553

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Catchment-Roof 06	Unit 07-Cellular Storage A		Time of Concentration	0.553	100	0	100	0.553
Catchment-Roof 07	Unit 06-Cellular Storage B		Time of Concentration	0.286	100	0	100	0.286
Catchment-Roof 08	Unit 06-Cellular Storage A		Time of Concentration	0.286	100	0	100	0.286
Catchment-Roof 09	Unit 03-Cellular Storage A		Time of Concentration	0.104	100	0	100	0.104
Catchment-Roof 10	Unit 03-Cellular Storage B		Time of Concentration	0.104	100	0	100	0.104
Catchment-Roof 11	Unit 04-Cellular Storage A		Time of Concentration	0.104	100	0	100	0.104
Catchment-Roof 12	Unit(s) 04 to 05-Cellular Storage		Time of Concentration	0.104	100	0	100	0.104
Catchment-Roof 13	Unit(s) 04 to 05-Cellular Storage		Time of Concentration	0.104	100	0	100	0.104
Catchment-Roof 14	SWMH079		Time of Concentration	0.104	100	0	100	0.104
Catchment-Roof 15	Unit 01-Cellular Storage A		Time of Concentration	1.048	100	0	100	1.048
Catchment-Roof 16	Unit 01-Cellular Storage B		Time of Concentration	1.048	100	0	100	1.048
Catchment-Roof 17	Unit 01-Cellular Storage B		Time of Concentration	1.059	100	0	100	1.059
Catchment-Roof 18	Unit 01-Cellular Storage D		Time of Concentration	1.037	100	0	100	1.037
Catchment-Roof 19	Unit 02-Cellular Storage A		Time of Concentration	0.805	100	0	100	0.805
Catchment-Roof 20	Unit 02-Cellular Storage A		Time of Concentration	0.805	100	0	100	0.805
Catchment-Roof 21	Unit 02-Cellular Storage B		Time of Concentration	0.896	100	0	100	0.896
Catchment-Roof 22	Unit 02-Cellular Storage C		Time of Concentration	0.875	100	0	100	0.875
Catchment-Roof 23	Unit 16-Cellular Storage		Time of Concentration	0.190	100	0	100	0.190
Catchment-Roof 24	Unit 16-Cellular Storage		Time of Concentration	0.190	100	0	100	0.190
Catchment-Roof 25	Unit(s) 14 to 15-Cellular Storage		Time of Concentration	0.110	100	0	100	0.110
Catchment-Roof 26	Unit(s) 14 to 15-Cellular Storage		Time of Concentration	0.098	100	0	100	0.098
Catchment-Roof 27	Unit(s) 11 to 13-Cellular Storage		Time of Concentration	0.171	100	0	100	0.171
Catchment-Roof 28	DT 02-Cellular Storage		Time of Concentration	0.057	100	0	100	0.057

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
		Designed by: FJB	Checked by: PJB		Approved By: WL
Report Details: Type: Inflow Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment- Roof 29	SWMH044		Time of Concentration	0.054	100	0	100	0.054
Foul Water Drainage Flow	SWMH166	2.8						
TOTAL		2.8		25.810				25.810

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023			
Report Details: Type: Outfall Details Storm Phase: Phase	Designed by: FJB	Checked by: PJB	Approved By: WL	
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Outfalls

Outfall	Outfall Type	Fixed Surcharged Level (m)	Level Curve
Pumping Station	Free Discharge		

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01	Date: 28/06/2023 Designed by: FJB Checked by: PJB Approved By: WL	
Report Title: Rainfall Analysis Criteria	Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	

Runoff Type	Dynamic
Output Interval (mins)	5
Time Step	Default
Urban Creep	Apply Global Value
Urban Creep Global Value (%)	0
Junction Flood Risk Margin (mm)	300
Prefill Manhole Sumps	☐
Perform No Discharge Analysis	☐

Rainfall

FSR	Type: FSR
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Region	England And Wales
M5-60 (mm)	18.0
Ratio R	0.350
Summer	☒
Winter	☒

Return Period

Return Period (years)	Increase Rainfall (%)
1.0	40.000
30.0	40.000
100.0	40.000

Storm Durations

Duration (mins)	Run Time (mins)
15	30
30	60
60	120
120	240
240	480
360	720
480	960
960	1920
1440	2880

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
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FSR: 1 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Inflow

Inflow	Storm Event	Inflow Area (ha)	Max. Inflow (L/s)	Total Inflow Volume (m³)
Catchment-Roof 01	FSR: 1 years: +40 %: 15 mins: Winter	0.05	7.7	3.555
Catchment-Roof 29	FSR: 1 years: +40 %: 15 mins: Winter	0.05	9.1	4.212
Catchment-Roof 28	FSR: 1 years: +40 %: 15 mins: Winter	0.06	9.6	4.425
Catchment-Roof 27	FSR: 1 years: +40 %: 15 mins: Winter	0.17	28.9	13.333
Catchment-Roof 26	FSR: 1 years: +40 %: 15 mins: Winter	0.10	16.5	7.630
Catchment-Roof 25	FSR: 1 years: +40 %: 15 mins: Winter	0.11	18.7	8.623
Catchment-Roof 24	FSR: 1 years: +40 %: 15 mins: Winter	0.19	32.1	14.812
Catchment-Roof 23	FSR: 1 years: +40 %: 15 mins: Winter	0.19	32.1	14.812
Catchment-Roof 04	FSR: 1 years: +40 %: 15 mins: Winter	0.07	11.1	5.109
Catchment-Roof 03	FSR: 1 years: +40 %: 15 mins: Winter	0.07	11.1	5.109
Catchment-Roof 02	FSR: 1 years: +40 %: 15 mins: Winter	0.12	20.3	9.364
Catchment-Roof 06	FSR: 1 years: +40 %: 15 mins: Winter	0.55	93.6	43.240
Catchment-Roof 05	FSR: 1 years: +40 %: 15 mins: Winter	0.55	93.6	43.240
Catchment-Roof 08	FSR: 1 years: +40 %: 15 mins: Winter	0.29	48.4	22.373
Catchment-Roof 07	FSR: 1 years: +40 %: 15 mins: Winter	0.29	48.4	22.373
Catchment-Roof 09	FSR: 1 years: +40 %: 15 mins: Winter	0.10	17.7	8.164
Catchment-Roof 10	FSR: 1 years: +40 %: 15 mins: Winter	0.10	17.7	8.164
Catchment-Roof 11	FSR: 1 years: +40 %: 15 mins: Winter	0.10	17.7	8.164
Catchment-Roof 12	FSR: 1 years: +40 %: 15 mins: Winter	0.10	17.7	8.164

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Catchment-Roof 13	FSR: 1 years: +40 %: 15 mins: Winter	0.10	17.7	8.164
Catchment-Roof 14	FSR: 1 years: +40 %: 15 mins: Winter	0.10	17.7	8.164
Catchment-Roof 15	FSR: 1 years: +40 %: 15 mins: Winter	1.05	177.4	81.913
Catchment-Roof 16	FSR: 1 years: +40 %: 15 mins: Winter	1.05	177.4	81.913
Catchment-Roof 18	FSR: 1 years: +40 %: 15 mins: Winter	1.04	175.5	81.064
Catchment-Roof 17	FSR: 1 years: +40 %: 15 mins: Winter	1.06	179.2	82.756
Catchment-Roof 22	FSR: 1 years: +40 %: 15 mins: Winter	0.88	148.1	68.406
Catchment-Roof 19	FSR: 1 years: +40 %: 15 mins: Winter	0.80	136.1	62.873
Catchment-Roof 21	FSR: 1 years: +40 %: 15 mins: Winter	0.90	151.6	70.005
Catchment-Roof 20	FSR: 1 years: +40 %: 15 mins: Winter	0.80	136.1	62.873
Catchment-Pavement 023	FSR: 1 years: +40 %: 15 mins: Winter	0.24	40.1	18.500
Catchment-Pavement 005	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.8	1.287
Catchment-Pavement 004	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.8	1.287
Catchment-Pavement 003	FSR: 1 years: +40 %: 15 mins: Winter	0.08	12.7	5.862
Catchment-Pavement 002	FSR: 1 years: +40 %: 15 mins: Winter	0.10	16.3	7.522
Catchment-Pavement 008	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.5	2.088
Catchment-Pavement 011	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.9	0.876
Catchment-Pavement 012	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.8	1.752
Catchment-Pavement 013	FSR: 1 years: +40 %: 15 mins: Winter	0.06	10.8	4.974
Catchment-Pavement 014	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.0	1.401
Catchment-Pavement 015	FSR: 1 years: +40 %: 15 mins: Winter	0.05	7.9	3.651
Catchment-Pavement 016	FSR: 1 years: +40 %: 15 mins: Winter	0.06	10.4	4.800
Catchment-Pavement 001	FSR: 1 years: +40 %: 15 mins: Winter	0.06	10.8	5.007

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Catchment- Pavement 007	FSR: 1 years: +40 %: 15 mins: Winter	0.09	15.9	7.342
Catchment- Pavement 006	FSR: 1 years: +40 %: 15 mins: Winter	0.03	5.8	2.661
Catchment- Pavement 010	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.2	0.564
Catchment- Pavement 009	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.5	0.708
Catchment- Pavement 021	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.5	0.681
Catchment- Pavement 017	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.491
Catchment- Pavement 018	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.5	1.134
Catchment- Pavement 022	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.9	1.338
Catchment- Pavement 020	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.9	2.247
Catchment- Pavement 029	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.9	0.876
Catchment- Pavement 027	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.254
Catchment- Pavement 025	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.5	2.094
Catchment- Pavement 024	FSR: 1 years: +40 %: 15 mins: Winter	0.05	8.3	3.819
Catchment- Pavement 026	FSR: 1 years: +40 %: 15 mins: Winter	0.05	8.0	3.687
Catchment- Pavement 028	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.230
Catchment- Pavement 035	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.7	1.728
Catchment- Pavement 019	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.5	1.179
Catchment- Pavement 037	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.266
Catchment- Pavement 039	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.251
Catchment- Pavement 031	FSR: 1 years: +40 %: 15 mins: Winter	0.11	19.4	8.947
Catchment- Pavement 032	FSR: 1 years: +40 %: 15 mins: Winter	0.10	16.9	7.801
Catchment- Pavement 030	FSR: 1 years: +40 %: 15 mins: Winter	0.04	6.9	3.192
Catchment- Pavement 033	FSR: 1 years: +40 %: 15 mins: Winter	0.07	12.1	5.607

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Catchment- Pavement 034	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.215
Catchment- Pavement 042	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.3	1.527
Catchment- Pavement 041	FSR: 1 years: +40 %: 15 mins: Winter	0.03	5.6	2.574
Catchment- Pavement 043	FSR: 1 years: +40 %: 15 mins: Winter	0.07	12.5	5.772
Catchment- Pavement 046	FSR: 1 years: +40 %: 15 mins: Winter	0.07	12.6	5.808
Catchment- Pavement 047	FSR: 1 years: +40 %: 15 mins: Winter	0.05	9.0	4.146
Catchment- Pavement 036	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.491
Catchment- Pavement 038	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.8	0.840
Catchment- Pavement 040	FSR: 1 years: +40 %: 15 mins: Winter	0.08	13.9	6.418
Catchment- Pavement 044	FSR: 1 years: +40 %: 15 mins: Winter	0.12	20.9	9.670
Catchment- Pavement 045	FSR: 1 years: +40 %: 15 mins: Winter	0.07	12.1	5.586
Catchment- Pavement 104	FSR: 1 years: +40 %: 15 mins: Winter	0.15	24.9	11.506
Catchment- Pavement 103	FSR: 1 years: +40 %: 15 mins: Winter	0.12	20.5	9.466
Catchment- Pavement 102	FSR: 1 years: +40 %: 15 mins: Winter	0.13	22.1	10.231
Catchment- Pavement 101	FSR: 1 years: +40 %: 15 mins: Winter	0.10	16.4	7.591
Catchment- Pavement 157	FSR: 1 years: +40 %: 15 mins: Winter	0.14	23.2	10.729
Catchment- Pavement 155	FSR: 1 years: +40 %: 15 mins: Winter	0.03	5.4	2.472
Catchment- Pavement 156	FSR: 1 years: +40 %: 15 mins: Winter	0.06	10.4	4.797
Catchment- Pavement 154	FSR: 1 years: +40 %: 15 mins: Winter	0.11	18.7	8.653
Catchment- Pavement 152	FSR: 1 years: +40 %: 15 mins: Winter	0.05	9.2	4.263
Catchment- Pavement 151	FSR: 1 years: +40 %: 15 mins: Winter	0.07	12.4	5.745
Catchment- Pavement 153	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.3	1.065
Catchment- Pavement 150	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.0	1.368

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Catchment- Pavement 148	FSR: 1 years: +40 %: 15 mins: Winter	0.04	7.2	3.306
Catchment- Pavement 158	FSR: 1 years: +40 %: 15 mins: Winter	0.09	14.8	6.844
Catchment- Pavement 149	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.4	0.654
Catchment- Pavement 049	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.3	1.044
Catchment- Pavement 048	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.6	1.644
Catchment- Pavement 050	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.3	1.530
Catchment- Pavement 051	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.0	1.404
Catchment- Pavement 067	FSR: 1 years: +40 %: 15 mins: Winter	0.00	0.6	0.291
Catchment- Pavement 068	FSR: 1 years: +40 %: 15 mins: Winter	0.00	0.4	0.192
Catchment- Pavement 072	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.0	0.444
Catchment- Pavement 073	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.2	0.537
Catchment- Pavement 071	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.7	1.695
Catchment- Pavement 074	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.2	0.996
Catchment- Pavement 070	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.419
Catchment- Pavement 069	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.3	1.521
Catchment- Pavement 066	FSR: 1 years: +40 %: 15 mins: Winter	0.03	5.5	2.535
Catchment- Pavement 064	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.443
Catchment- Pavement 062	FSR: 1 years: +40 %: 15 mins: Winter	0.03	5.1	2.364
Catchment- Pavement 053	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.233
Catchment- Pavement 052	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.9	1.338
Catchment- Pavement 055	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.224
Catchment- Pavement 054	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.9	1.338
Catchment- Pavement 057	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.218

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Catchment- Pavement 056	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.4	1.575
Catchment- Pavement 058	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.2	1.011
Catchment- Pavement 088	FSR: 1 years: +40 %: 15 mins: Winter	0.02	4.1	1.872
Catchment- Pavement 092	FSR: 1 years: +40 %: 15 mins: Winter	0.02	4.1	1.872
Catchment- Pavement 091	FSR: 1 years: +40 %: 15 mins: Winter	0.09	15.0	6.928
Catchment- Pavement 089	FSR: 1 years: +40 %: 15 mins: Winter	0.12	20.5	9.466
Catchment- Pavement 090	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.4	1.095
Catchment- Pavement 080	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.269
Catchment- Pavement 081	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.7	0.768
Catchment- Pavement 079	FSR: 1 years: +40 %: 15 mins: Winter	0.06	9.4	4.356
Catchment- Pavement 077	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.9	1.800
Catchment- Pavement 076	FSR: 1 years: +40 %: 15 mins: Winter	0.07	11.2	5.193
Catchment- Pavement 075	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.5	1.152
Catchment- Pavement 065	FSR: 1 years: +40 %: 15 mins: Winter	0.05	7.9	3.630
Catchment- Pavement 063	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.5	1.152
Catchment- Pavement 078	FSR: 1 years: +40 %: 15 mins: Winter	0.02	4.1	1.899
Catchment- Pavement 061	FSR: 1 years: +40 %: 15 mins: Winter	0.00	0.8	0.360
Catchment- Pavement 060	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.476
Catchment- Pavement 059	FSR: 1 years: +40 %: 15 mins: Winter	0.06	10.0	4.608
Catchment- Pavement 082	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.4	1.572
Catchment- Pavement 083	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 084	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 085	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.9	0.876

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Catchment- Pavement 086	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 087	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.6	1.668
Catchment- Pavement 093	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.5	1.629
Catchment- Pavement 094	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 095	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.5	1.179
Catchment- Pavement 096	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.4	2.043
Catchment- Pavement 099	FSR: 1 years: +40 %: 15 mins: Winter	0.01	0.9	0.417
Catchment- Pavement 100	FSR: 1 years: +40 %: 15 mins: Winter	0.06	9.5	4.368
Catchment- Pavement 097	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.6	1.647
Catchment- Pavement 098	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.8	1.290
Catchment- Pavement 105	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.8	2.208
Catchment- Pavement 109	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.425
Catchment- Pavement 106	FSR: 1 years: +40 %: 15 mins: Winter	0.17	28.4	13.096
Catchment- Pavement 107	FSR: 1 years: +40 %: 15 mins: Winter	0.03	5.6	2.568
Catchment- Pavement 108	FSR: 1 years: +40 %: 15 mins: Winter	0.04	6.8	3.123
Catchment- Pavement 110	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.4	1.581
Catchment- Pavement 112	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.7	0.768
Catchment- Pavement 111	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.5	1.632
Catchment- Pavement 116	FSR: 1 years: +40 %: 15 mins: Winter	0.07	12.5	5.754
Catchment- Pavement 118	FSR: 1 years: +40 %: 15 mins: Winter	0.04	7.0	3.234
Catchment- Pavement 117	FSR: 1 years: +40 %: 15 mins: Winter	0.05	8.1	3.756
Catchment- Pavement 119	FSR: 1 years: +40 %: 15 mins: Winter	0.07	12.0	5.520
Catchment- Pavement 114	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.479

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Catchment- Pavement 113	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.3	1.506
Catchment- Pavement 115	FSR: 1 years: +40 %: 15 mins: Winter	0.15	24.6	11.380
Catchment- Pavement 131	FSR: 1 years: +40 %: 15 mins: Winter	0.18	29.7	13.717
Catchment- Pavement 130	FSR: 1 years: +40 %: 15 mins: Winter	0.10	16.1	7.441
Catchment- Pavement 129	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.4	2.052
Catchment- Pavement 147	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.4	1.557
Catchment- Pavement 146	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.4	1.557
Catchment- Pavement 145	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.4	1.560
Catchment- Pavement 144	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.2	1.953
Catchment- Pavement 143	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.9	2.244
Catchment- Pavement 142	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.9	2.265
Catchment- Pavement 141	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.0	1.368
Catchment- Pavement 140	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.4	1.557
Catchment- Pavement 139	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.4	1.557
Catchment- Pavement 138	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.6	0.753
Catchment- Pavement 137	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.8	1.770
Catchment- Pavement 136	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.4	2.010
Catchment- Pavement 135	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.3	1.539
Catchment- Pavement 134	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.4	2.034
Catchment- Pavement 133	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.269
Catchment- Pavement 132	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.5	1.149
Catchment- Pavement 128	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.5	1.167
Catchment- Pavement 127	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.0	1.407

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
		Designed by: FJB	Checked by: PJB		Approved By: WL
Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment- Pavement 159	FSR: 1 years: +40 %: 15 mins: Winter	0.19	33.0	15.223
Catchment- Pavement 160	FSR: 1 years: +40 %: 15 mins: Winter	0.10	16.7	7.729
Catchment- Pavement 161	FSR: 1 years: +40 %: 15 mins: Winter	0.17	29.4	13.564
Catchment- Pavement 163	FSR: 1 years: +40 %: 15 mins: Winter	0.02	4.2	1.953
Catchment- Pavement 162	FSR: 1 years: +40 %: 15 mins: Winter	0.13	22.5	10.375
Catchment- Pavement 164	FSR: 1 years: +40 %: 15 mins: Winter	0.10	16.8	7.738
Catchment- Pavement 126	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.5	1.599
Catchment- Pavement 122	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.425
Catchment- Pavement 123	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.3	1.062
Catchment- Pavement 125	FSR: 1 years: +40 %: 15 mins: Winter	0.02	4.0	1.839
Catchment- Pavement 120	FSR: 1 years: +40 %: 15 mins: Winter	0.02	4.0	1.839
Catchment- Pavement 121	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.3	0.621
Catchment- Pavement 124	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 169	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.9	1.353
Catchment- Pavement 166	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.2	1.011
Catchment- Pavement 165	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 167	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.3	1.527
Catchment- Pavement 168	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 170	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 171	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.8	1.302
Catchment- Pavement 173	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.197
Catchment- Pavement 172	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.197
Catchment- Pavement 174	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.197

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
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Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment- Pavement 175	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.3	1.968
Catchment- Pavement 178	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.203
Catchment- Pavement 179	FSR: 1 years: +40 %: 15 mins: Winter	0.02	4.0	1.836
Catchment- Pavement 203	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.9	1.350
Catchment- Pavement 202	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.6	0.738
Catchment- Pavement 201	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.236
Catchment- Pavement 204	FSR: 1 years: +40 %: 15 mins: Winter	0.05	8.8	4.047
Catchment- Pavement 205	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.3	1.077
Catchment- Pavement 207	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.1	0.990
Catchment- Pavement 208	FSR: 1 years: +40 %: 15 mins: Winter	0.24	41.3	19.067
Catchment- Pavement 209	FSR: 1 years: +40 %: 15 mins: Winter	0.22	37.6	17.362
Catchment- Pavement 181	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.425
Catchment- Pavement 180	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.1	0.960
Catchment- Pavement 184	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.425
Catchment- Pavement 183	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.425
Catchment- Pavement 185	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.425
Catchment- Pavement 186	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.425
Catchment- Pavement 187	FSR: 1 years: +40 %: 15 mins: Winter	0.05	8.1	3.741
Catchment- Pavement 211	FSR: 1 years: +40 %: 15 mins: Winter	0.03	5.1	2.346
Catchment- Pavement 210	FSR: 1 years: +40 %: 15 mins: Winter	0.14	23.3	10.780
Catchment- Pavement 212	FSR: 1 years: +40 %: 15 mins: Winter	0.06	10.7	4.959
Catchment- Pavement 206	FSR: 1 years: +40 %: 15 mins: Winter	0.26	44.0	20.315
Catchment- Pavement 182	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.485

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
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Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment- Pavement 177	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.9	1.797
Catchment- Pavement 176	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.197
Catchment- Pavement 213	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.182
Catchment- Pavement 214	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.221
Catchment- Pavement 216	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.5	2.073
Catchment- Pavement 215	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.203
Catchment- Pavement 200	FSR: 1 years: +40 %: 15 mins: Winter	0.24	40.8	18.857
Catchment- Pavement 199	FSR: 1 years: +40 %: 15 mins: Winter	0.21	36.4	16.798
Catchment- Pavement 198	FSR: 1 years: +40 %: 15 mins: Winter	0.26	44.7	20.648
Catchment- Pavement 197	FSR: 1 years: +40 %: 15 mins: Winter	0.14	24.4	11.269
Catchment- Pavement 196	FSR: 1 years: +40 %: 15 mins: Winter	0.21	36.4	16.798
Catchment- Pavement 195	FSR: 1 years: +40 %: 15 mins: Winter	0.34	57.3	26.471
Catchment- Pavement 194	FSR: 1 years: +40 %: 15 mins: Winter	0.21	34.9	16.132
Catchment- Pavement 193	FSR: 1 years: +40 %: 15 mins: Winter	0.17	29.0	13.390
Catchment- Pavement 192	FSR: 1 years: +40 %: 15 mins: Winter	0.25	42.8	19.748
Catchment- Pavement 190	FSR: 1 years: +40 %: 15 mins: Winter	0.24	39.8	18.368
Catchment- Pavement 191	FSR: 1 years: +40 %: 15 mins: Winter	0.22	36.5	16.840
Catchment- Pavement 189	FSR: 1 years: +40 %: 15 mins: Winter	0.22	36.5	16.840
Catchment- Pavement 188	FSR: 1 years: +40 %: 15 mins: Winter	0.26	43.8	20.225
Catchment- Pavement 219	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 218	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.6	1.182
Catchment- Pavement 240	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.0	0.921
Catchment- Pavement 217	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.3	1.521

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Catchment- Pavement 221	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 220	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 223	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 222	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.3	1.521
Catchment- Pavement 288	FSR: 1 years: +40 %: 15 mins: Winter	0.19	32.7	15.106
Catchment- Pavement 286	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.8	1.743
Catchment- Pavement 287	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.7	1.263
Catchment- Pavement 285	FSR: 1 years: +40 %: 15 mins: Winter	0.03	5.3	2.457
Catchment- Pavement 284	FSR: 1 years: +40 %: 15 mins: Winter	0.05	7.7	3.552
Catchment- Pavement 281	FSR: 1 years: +40 %: 15 mins: Winter	0.05	7.8	3.585
Catchment- Pavement 280	FSR: 1 years: +40 %: 15 mins: Winter	0.08	13.3	6.166
Catchment- Pavement 279	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.4	2.010
Catchment- Pavement 273	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.7	1.716
Catchment- Pavement 278	FSR: 1 years: +40 %: 15 mins: Winter	0.03	5.1	2.346
Catchment- Pavement 276	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.9	0.891
Catchment- Pavement 277	FSR: 1 years: +40 %: 15 mins: Winter	0.04	6.7	3.072
Catchment- Pavement 275	FSR: 1 years: +40 %: 15 mins: Winter	0.00	0.8	0.363
Catchment- Pavement 271	FSR: 1 years: +40 %: 15 mins: Winter	0.06	10.2	4.686
Catchment- Pavement 274	FSR: 1 years: +40 %: 15 mins: Winter	0.07	12.4	5.745
Catchment- Pavement 272	FSR: 1 years: +40 %: 15 mins: Winter	0.10	16.7	7.726
Catchment- Pavement 269	FSR: 1 years: +40 %: 15 mins: Winter	0.05	8.8	4.050
Catchment- Pavement 266	FSR: 1 years: +40 %: 15 mins: Winter	0.02	4.0	1.848
Catchment- Pavement 268	FSR: 1 years: +40 %: 15 mins: Winter	0.06	10.4	4.818

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Catchment- Pavement 267	FSR: 1 years: +40 %: 15 mins: Winter	0.09	14.5	6.685
Catchment- Pavement 265	FSR: 1 years: +40 %: 15 mins: Winter	0.04	7.5	3.474
Catchment- Pavement 264	FSR: 1 years: +40 %: 15 mins: Winter	0.12	20.1	9.280
Catchment- Pavement 263	FSR: 1 years: +40 %: 15 mins: Winter	0.12	20.5	9.487
Catchment- Pavement 262	FSR: 1 years: +40 %: 15 mins: Winter	0.20	33.8	15.586
Catchment- Pavement 291	FSR: 1 years: +40 %: 15 mins: Winter	0.05	8.1	3.753
Catchment- Pavement 292	FSR: 1 years: +40 %: 15 mins: Winter	0.04	7.4	3.411
Catchment- Pavement 290	FSR: 1 years: +40 %: 15 mins: Winter	0.14	23.9	11.023
Catchment- Pavement 289	FSR: 1 years: +40 %: 15 mins: Winter	0.13	21.6	9.958
Catchment- Pavement 270	FSR: 1 years: +40 %: 15 mins: Winter	0.13	21.5	9.943
Catchment- Pavement 260	FSR: 1 years: +40 %: 15 mins: Winter	0.13	21.7	10.027
Catchment- Pavement 261	FSR: 1 years: +40 %: 15 mins: Winter	0.23	38.1	17.608
Catchment- Pavement 253	FSR: 1 years: +40 %: 15 mins: Winter	0.13	22.4	10.339
Catchment- Pavement 239	FSR: 1 years: +40 %: 15 mins: Winter	0.11	19.2	8.893
Catchment- Pavement 283	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.5	1.641
Catchment- Pavement 282	FSR: 1 years: +40 %: 15 mins: Winter	0.01	1.9	0.894
Catchment- Pavement 237	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.443
Catchment- Pavement 238	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.443
Catchment- Pavement 236	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 235	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 233	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 234	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 232	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494

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Catchment- Pavement 231	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 229	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 230	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 228	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.3	1.062
Catchment- Pavement 225	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.9	1.797
Catchment- Pavement 227	FSR: 1 years: +40 %: 15 mins: Winter	0.01	2.3	1.083
Catchment- Pavement 224	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.479
Catchment- Pavement 226	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.1	1.440
Catchment- Pavement 242	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.0	1.389
Catchment- Pavement 241	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.0	1.389
Catchment- Pavement 243	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 244	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 245	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 246	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 247	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 248	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 249	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 250	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 251	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.488
Catchment- Pavement 252	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 254	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 255	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.494
Catchment- Pavement 256	FSR: 1 years: +40 %: 15 mins: Winter	0.03	4.8	2.196

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Catchment- Pavement 257	FSR: 1 years: +40 %: 15 mins: Winter	0.02	2.9	1.353
Catchment- Pavement 258	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.2	1.497
Catchment- Pavement 259	FSR: 1 years: +40 %: 15 mins: Winter	0.02	3.3	1.527
Foul Water Drainage Flow	FSR: 1 years: +40 %: 15 mins: Summer	-	2.8	4.986

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FSR: 30 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Inflow

Inflow	Storm Event	Inflow Area (ha)	Max. Inflow (L/s)	Total Inflow Volume (m³)
Catchment-Roof 01	FSR: 30 years: +40 %: 15 mins: Winter	0.05	18.8	8.697
Catchment-Roof 29	FSR: 30 years: +40 %: 15 mins: Winter	0.05	22.3	10.299
Catchment-Roof 28	FSR: 30 years: +40 %: 15 mins: Winter	0.06	23.5	10.833
Catchment-Roof 27	FSR: 30 years: +40 %: 15 mins: Winter	0.17	70.6	32.605
Catchment-Roof 26	FSR: 30 years: +40 %: 15 mins: Winter	0.10	40.4	18.654
Catchment-Roof 25	FSR: 30 years: +40 %: 15 mins: Winter	0.11	45.7	21.084
Catchment-Roof 24	FSR: 30 years: +40 %: 15 mins: Winter	0.19	78.4	36.223
Catchment-Roof 23	FSR: 30 years: +40 %: 15 mins: Winter	0.19	78.4	36.223
Catchment-Roof 04	FSR: 30 years: +40 %: 15 mins: Winter	0.07	27.1	12.495
Catchment-Roof 03	FSR: 30 years: +40 %: 15 mins: Winter	0.07	27.1	12.495
Catchment-Roof 02	FSR: 30 years: +40 %: 15 mins: Winter	0.12	49.6	22.902
Catchment-Roof 06	FSR: 30 years: +40 %: 15 mins: Winter	0.55	229.0	105.743
Catchment-Roof 05	FSR: 30 years: +40 %: 15 mins: Winter	0.55	229.0	105.743
Catchment-Roof 08	FSR: 30 years: +40 %: 15 mins: Winter	0.29	118.5	54.709

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Catchment- Roof 07	FSR: 30 years: +40 %: 15 mins: Winter	0.29	118.5	54.709
Catchment- Roof 09	FSR: 30 years: +40 %: 15 mins: Winter	0.10	43.2	19.959
Catchment- Roof 10	FSR: 30 years: +40 %: 15 mins: Winter	0.10	43.2	19.959
Catchment- Roof 11	FSR: 30 years: +40 %: 15 mins: Winter	0.10	43.2	19.959
Catchment- Roof 12	FSR: 30 years: +40 %: 15 mins: Winter	0.10	43.2	19.959
Catchment- Roof 13	FSR: 30 years: +40 %: 15 mins: Winter	0.10	43.2	19.959
Catchment- Roof 14	FSR: 30 years: +40 %: 15 mins: Winter	0.10	43.2	19.959
Catchment- Roof 15	FSR: 30 years: +40 %: 15 mins: Winter	1.05	433.8	200.308
Catchment- Roof 16	FSR: 30 years: +40 %: 15 mins: Winter	1.05	433.8	200.308
Catchment- Roof 18	FSR: 30 years: +40 %: 15 mins: Winter	1.04	429.3	198.247
Catchment- Roof 17	FSR: 30 years: +40 %: 15 mins: Winter	1.06	438.3	202.378
Catchment- Roof 22	FSR: 30 years: +40 %: 15 mins: Winter	0.88	362.3	167.286
Catchment- Roof 19	FSR: 30 years: +40 %: 15 mins: Winter	0.80	333.0	153.759
Catchment- Roof 21	FSR: 30 years: +40 %: 15 mins: Winter	0.90	370.7	171.198
Catchment- Roof 20	FSR: 30 years: +40 %: 15 mins: Winter	0.80	333.0	153.759
Catchment- Pavement 023	FSR: 30 years: +40 %: 15 mins: Winter	0.24	98.0	45.244
Catchment- Pavement 005	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.8	3.150

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		Approved By: WL	
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	



Catchment-Pavement 004	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.8	3.150
Catchment-Pavement 003	FSR: 30 years: +40 %: 15 mins: Winter	0.08	31.0	14.334
Catchment-Pavement 002	FSR: 30 years: +40 %: 15 mins: Winter	0.10	39.8	18.393
Catchment-Pavement 008	FSR: 30 years: +40 %: 15 mins: Winter	0.03	11.1	5.106
Catchment-Pavement 011	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.7	2.148
Catchment-Pavement 012	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.3	4.287
Catchment-Pavement 013	FSR: 30 years: +40 %: 15 mins: Winter	0.06	26.3	12.168
Catchment-Pavement 014	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.4	3.426
Catchment-Pavement 015	FSR: 30 years: +40 %: 15 mins: Winter	0.05	19.3	8.928
Catchment-Pavement 016	FSR: 30 years: +40 %: 15 mins: Winter	0.06	25.4	11.742
Catchment-Pavement 001	FSR: 30 years: +40 %: 15 mins: Winter	0.06	26.5	12.246
Catchment-Pavement 007	FSR: 30 years: +40 %: 15 mins: Winter	0.09	38.9	17.964
Catchment-Pavement 006	FSR: 30 years: +40 %: 15 mins: Winter	0.03	14.1	6.516
Catchment-Pavement 010	FSR: 30 years: +40 %: 15 mins: Winter	0.01	3.0	1.377
Catchment-Pavement 009	FSR: 30 years: +40 %: 15 mins: Winter	0.01	3.8	1.737
Catchment-Pavement 021	FSR: 30 years: +40 %: 15 mins: Winter	0.01	3.6	1.662
Catchment-Pavement 017	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.645

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Catchment-Pavement 018	FSR: 30 years: +40 %: 15 mins: Winter	0.01	6.0	2.781
Catchment-Pavement 022	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.1	3.276
Catchment-Pavement 020	FSR: 30 years: +40 %: 15 mins: Winter	0.03	11.9	5.502
Catchment-Pavement 029	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.6	2.145
Catchment-Pavement 027	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.7	3.072
Catchment-Pavement 025	FSR: 30 years: +40 %: 15 mins: Winter	0.03	11.1	5.124
Catchment-Pavement 024	FSR: 30 years: +40 %: 15 mins: Winter	0.05	20.2	9.339
Catchment-Pavement 026	FSR: 30 years: +40 %: 15 mins: Winter	0.05	19.5	9.018
Catchment-Pavement 028	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.5	3.000
Catchment-Pavement 035	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.1	4.218
Catchment-Pavement 019	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.2	2.877
Catchment-Pavement 037	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.7	3.090
Catchment-Pavement 039	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.6	3.066
Catchment-Pavement 031	FSR: 30 years: +40 %: 15 mins: Winter	0.11	47.4	21.873
Catchment-Pavement 032	FSR: 30 years: +40 %: 15 mins: Winter	0.10	41.3	19.077
Catchment-Pavement 030	FSR: 30 years: +40 %: 15 mins: Winter	0.04	16.9	7.812
Catchment-Pavement 033	FSR: 30 years: +40 %: 15 mins: Winter	0.07	29.7	13.710

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Catchment-Pavement 034	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.4	2.970
Catchment-Pavement 042	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.1	3.738
Catchment-Pavement 041	FSR: 30 years: +40 %: 15 mins: Winter	0.03	13.6	6.303
Catchment-Pavement 043	FSR: 30 years: +40 %: 15 mins: Winter	0.07	30.6	14.112
Catchment-Pavement 046	FSR: 30 years: +40 %: 15 mins: Winter	0.07	30.8	14.205
Catchment-Pavement 047	FSR: 30 years: +40 %: 15 mins: Winter	0.05	22.0	10.137
Catchment-Pavement 036	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.651
Catchment-Pavement 038	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.5	2.058
Catchment-Pavement 040	FSR: 30 years: +40 %: 15 mins: Winter	0.08	34.0	15.699
Catchment-Pavement 044	FSR: 30 years: +40 %: 15 mins: Winter	0.12	51.2	23.646
Catchment-Pavement 045	FSR: 30 years: +40 %: 15 mins: Winter	0.07	29.6	13.659
Catchment-Pavement 104	FSR: 30 years: +40 %: 15 mins: Winter	0.15	60.9	28.134
Catchment-Pavement 103	FSR: 30 years: +40 %: 15 mins: Winter	0.12	50.1	23.157
Catchment-Pavement 102	FSR: 30 years: +40 %: 15 mins: Winter	0.13	54.2	25.014
Catchment-Pavement 101	FSR: 30 years: +40 %: 15 mins: Winter	0.10	40.2	18.564
Catchment-Pavement 157	FSR: 30 years: +40 %: 15 mins: Winter	0.14	56.8	26.232
Catchment-Pavement 155	FSR: 30 years: +40 %: 15 mins: Winter	0.03	13.1	6.054

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		Approved By: WL		
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Catchment-Pavement 156	FSR: 30 years: +40 %: 15 mins: Winter	0.06	25.4	11.727
Catchment-Pavement 154	FSR: 30 years: +40 %: 15 mins: Winter	0.11	45.8	21.153
Catchment-Pavement 152	FSR: 30 years: +40 %: 15 mins: Winter	0.05	22.6	10.422
Catchment-Pavement 151	FSR: 30 years: +40 %: 15 mins: Winter	0.07	30.4	14.058
Catchment-Pavement 153	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.7	2.610
Catchment-Pavement 150	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.2	3.342
Catchment-Pavement 148	FSR: 30 years: +40 %: 15 mins: Winter	0.04	17.5	8.085
Catchment-Pavement 158	FSR: 30 years: +40 %: 15 mins: Winter	0.09	36.3	16.746
Catchment-Pavement 149	FSR: 30 years: +40 %: 15 mins: Winter	0.01	3.5	1.596
Catchment-Pavement 049	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.5	2.550
Catchment-Pavement 048	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.7	4.026
Catchment-Pavement 050	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.1	3.750
Catchment-Pavement 051	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.4	3.429
Catchment-Pavement 067	FSR: 30 years: +40 %: 15 mins: Winter	0.00	1.5	0.717
Catchment-Pavement 068	FSR: 30 years: +40 %: 15 mins: Winter	0.00	1.0	0.480
Catchment-Pavement 072	FSR: 30 years: +40 %: 15 mins: Winter	0.01	2.3	1.080
Catchment-Pavement 073	FSR: 30 years: +40 %: 15 mins: Winter	0.01	2.9	1.320

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Catchment-Pavement 071	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.0	4.143
Catchment-Pavement 074	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.3	2.439
Catchment-Pavement 070	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.5	3.468
Catchment-Pavement 069	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.1	3.720
Catchment-Pavement 066	FSR: 30 years: +40 %: 15 mins: Winter	0.03	13.4	6.192
Catchment-Pavement 064	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.6	3.531
Catchment-Pavement 062	FSR: 30 years: +40 %: 15 mins: Winter	0.03	12.5	5.781
Catchment-Pavement 053	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.5	3.015
Catchment-Pavement 052	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.1	3.273
Catchment-Pavement 055	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.5	2.997
Catchment-Pavement 054	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.1	3.270
Catchment-Pavement 057	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.4	2.979
Catchment-Pavement 056	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.3	3.843
Catchment-Pavement 058	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.4	2.472
Catchment-Pavement 088	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.9	4.581
Catchment-Pavement 092	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.9	4.581
Catchment-Pavement 091	FSR: 30 years: +40 %: 15 mins: Winter	0.09	36.7	16.941

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Catchment-Pavement 089	FSR: 30 years: +40 %: 15 mins: Winter	0.12	50.1	23.157
Catchment-Pavement 090	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.8	2.676
Catchment-Pavement 080	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.7	3.102
Catchment-Pavement 081	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.1	1.881
Catchment-Pavement 079	FSR: 30 years: +40 %: 15 mins: Winter	0.06	23.1	10.659
Catchment-Pavement 077	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.5	4.401
Catchment-Pavement 076	FSR: 30 years: +40 %: 15 mins: Winter	0.07	27.5	12.702
Catchment-Pavement 075	FSR: 30 years: +40 %: 15 mins: Winter	0.01	6.1	2.823
Catchment-Pavement 065	FSR: 30 years: +40 %: 15 mins: Winter	0.05	19.2	8.868
Catchment-Pavement 063	FSR: 30 years: +40 %: 15 mins: Winter	0.01	6.1	2.826
Catchment-Pavement 078	FSR: 30 years: +40 %: 15 mins: Winter	0.02	10.0	4.635
Catchment-Pavement 061	FSR: 30 years: +40 %: 15 mins: Winter	0.00	1.9	0.876
Catchment-Pavement 060	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.8	3.615
Catchment-Pavement 059	FSR: 30 years: +40 %: 15 mins: Winter	0.06	24.4	11.268
Catchment-Pavement 082	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.3	3.840
Catchment-Pavement 083	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 084	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654

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Catchment-Pavement 085	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.6	2.145
Catchment-Pavement 086	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 087	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.9	4.086
Catchment-Pavement 093	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.6	3.990
Catchment-Pavement 094	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 095	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.2	2.883
Catchment-Pavement 096	FSR: 30 years: +40 %: 15 mins: Winter	0.03	10.8	5.001
Catchment-Pavement 099	FSR: 30 years: +40 %: 15 mins: Winter	0.01	2.2	1.026
Catchment-Pavement 100	FSR: 30 years: +40 %: 15 mins: Winter	0.06	23.1	10.677
Catchment-Pavement 097	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.7	4.029
Catchment-Pavement 098	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.8	3.156
Catchment-Pavement 105	FSR: 30 years: +40 %: 15 mins: Winter	0.03	11.7	5.388
Catchment-Pavement 109	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.5	3.483
Catchment-Pavement 106	FSR: 30 years: +40 %: 15 mins: Winter	0.17	69.3	32.023
Catchment-Pavement 107	FSR: 30 years: +40 %: 15 mins: Winter	0.03	13.6	6.273
Catchment-Pavement 108	FSR: 30 years: +40 %: 15 mins: Winter	0.04	16.6	7.647
Catchment-Pavement 110	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.4	3.876

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Catchment-Pavement 112	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.1	1.881
Catchment-Pavement 111	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.7	3.996
Catchment-Pavement 116	FSR: 30 years: +40 %: 15 mins: Winter	0.07	30.5	14.070
Catchment-Pavement 118	FSR: 30 years: +40 %: 15 mins: Winter	0.04	17.1	7.905
Catchment-Pavement 117	FSR: 30 years: +40 %: 15 mins: Winter	0.05	19.9	9.186
Catchment-Pavement 119	FSR: 30 years: +40 %: 15 mins: Winter	0.07	29.2	13.494
Catchment-Pavement 114	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.8	3.621
Catchment-Pavement 113	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.0	3.672
Catchment-Pavement 115	FSR: 30 years: +40 %: 15 mins: Winter	0.15	60.3	27.825
Catchment-Pavement 131	FSR: 30 years: +40 %: 15 mins: Winter	0.18	72.7	33.550
Catchment-Pavement 130	FSR: 30 years: +40 %: 15 mins: Winter	0.10	39.4	18.192
Catchment-Pavement 129	FSR: 30 years: +40 %: 15 mins: Winter	0.03	10.9	5.019
Catchment-Pavement 147	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.2	3.804
Catchment-Pavement 146	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.2	3.804
Catchment-Pavement 145	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.3	3.810
Catchment-Pavement 144	FSR: 30 years: +40 %: 15 mins: Winter	0.03	10.3	4.779
Catchment-Pavement 143	FSR: 30 years: +40 %: 15 mins: Winter	0.03	11.9	5.487

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Catchment-Pavement 142	FSR: 30 years: +40 %: 15 mins: Winter	0.03	12.0	5.544
Catchment-Pavement 141	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.2	3.342
Catchment-Pavement 140	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.2	3.804
Catchment-Pavement 139	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.2	3.804
Catchment-Pavement 138	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.0	1.839
Catchment-Pavement 137	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.4	4.332
Catchment-Pavement 136	FSR: 30 years: +40 %: 15 mins: Winter	0.03	10.7	4.923
Catchment-Pavement 135	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.1	3.753
Catchment-Pavement 134	FSR: 30 years: +40 %: 15 mins: Winter	0.03	10.8	4.971
Catchment-Pavement 133	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.7	3.102
Catchment-Pavement 132	FSR: 30 years: +40 %: 15 mins: Winter	0.01	6.1	2.808
Catchment-Pavement 128	FSR: 30 years: +40 %: 15 mins: Winter	0.01	6.2	2.850
Catchment-Pavement 127	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.5	3.447
Catchment-Pavement 159	FSR: 30 years: +40 %: 15 mins: Winter	0.19	80.6	37.231
Catchment-Pavement 160	FSR: 30 years: +40 %: 15 mins: Winter	0.10	40.9	18.891
Catchment-Pavement 161	FSR: 30 years: +40 %: 15 mins: Winter	0.17	71.9	33.178
Catchment-Pavement 163	FSR: 30 years: +40 %: 15 mins: Winter	0.02	10.3	4.779

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Catchment-Pavement 162	FSR: 30 years: +40 %: 15 mins: Winter	0.13	55.0	25.374
Catchment-Pavement 164	FSR: 30 years: +40 %: 15 mins: Winter	0.10	41.0	18.924
Catchment-Pavement 126	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.5	3.912
Catchment-Pavement 122	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.6	3.492
Catchment-Pavement 123	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.6	2.592
Catchment-Pavement 125	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.8	4.506
Catchment-Pavement 120	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.8	4.506
Catchment-Pavement 121	FSR: 30 years: +40 %: 15 mins: Winter	0.01	3.3	1.527
Catchment-Pavement 124	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 169	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.2	3.306
Catchment-Pavement 166	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.3	2.469
Catchment-Pavement 165	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 167	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.1	3.735
Catchment-Pavement 168	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 170	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 171	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.9	3.189
Catchment-Pavement 173	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.3	2.928

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Catchment-Pavement 172	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.3	2.928
Catchment-Pavement 174	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.3	2.928
Catchment-Pavement 175	FSR: 30 years: +40 %: 15 mins: Winter	0.03	10.4	4.803
Catchment-Pavement 178	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.4	2.946
Catchment-Pavement 179	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.7	4.491
Catchment-Pavement 203	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.1	3.303
Catchment-Pavement 202	FSR: 30 years: +40 %: 15 mins: Winter	0.01	3.9	1.812
Catchment-Pavement 201	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.6	3.030
Catchment-Pavement 204	FSR: 30 years: +40 %: 15 mins: Winter	0.05	21.4	9.894
Catchment-Pavement 205	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.7	2.625
Catchment-Pavement 207	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.2	2.412
Catchment-Pavement 208	FSR: 30 years: +40 %: 15 mins: Winter	0.24	101.0	46.630
Catchment-Pavement 209	FSR: 30 years: +40 %: 15 mins: Winter	0.22	91.9	42.454
Catchment-Pavement 181	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.6	3.486
Catchment-Pavement 180	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.1	2.346
Catchment-Pavement 184	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.6	3.486
Catchment-Pavement 183	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.6	3.486

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
		Designed by: FJB	Checked by: PJB		Approved By: WL
Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 185	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.6	3.486
Catchment-Pavement 186	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.6	3.486
Catchment-Pavement 187	FSR: 30 years: +40 %: 15 mins: Winter	0.05	19.8	9.153
Catchment-Pavement 211	FSR: 30 years: +40 %: 15 mins: Winter	0.03	12.4	5.730
Catchment-Pavement 210	FSR: 30 years: +40 %: 15 mins: Winter	0.14	57.1	26.352
Catchment-Pavement 212	FSR: 30 years: +40 %: 15 mins: Winter	0.06	26.3	12.135
Catchment-Pavement 206	FSR: 30 years: +40 %: 15 mins: Winter	0.26	107.6	49.678
Catchment-Pavement 182	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.630
Catchment-Pavement 177	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.5	4.392
Catchment-Pavement 176	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.3	2.928
Catchment-Pavement 213	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.3	2.886
Catchment-Pavement 214	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.5	2.985
Catchment-Pavement 216	FSR: 30 years: +40 %: 15 mins: Winter	0.03	11.0	5.061
Catchment-Pavement 215	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.4	2.946
Catchment-Pavement 200	FSR: 30 years: +40 %: 15 mins: Winter	0.24	99.9	46.114
Catchment-Pavement 199	FSR: 30 years: +40 %: 15 mins: Winter	0.21	89.0	41.077
Catchment-Pavement 198	FSR: 30 years: +40 %: 15 mins: Winter	0.26	109.4	50.503

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Catchment-Pavement 197	FSR: 30 years: +40 %: 15 mins: Winter	0.14	59.7	27.564
Catchment-Pavement 196	FSR: 30 years: +40 %: 15 mins: Winter	0.21	89.0	41.077
Catchment-Pavement 195	FSR: 30 years: +40 %: 15 mins: Winter	0.34	140.2	64.735
Catchment-Pavement 194	FSR: 30 years: +40 %: 15 mins: Winter	0.21	85.4	39.454
Catchment-Pavement 193	FSR: 30 years: +40 %: 15 mins: Winter	0.17	70.9	32.749
Catchment-Pavement 192	FSR: 30 years: +40 %: 15 mins: Winter	0.25	104.6	48.292
Catchment-Pavement 190	FSR: 30 years: +40 %: 15 mins: Winter	0.24	97.3	44.923
Catchment-Pavement 191	FSR: 30 years: +40 %: 15 mins: Winter	0.22	89.2	41.191
Catchment-Pavement 189	FSR: 30 years: +40 %: 15 mins: Winter	0.22	89.2	41.191
Catchment-Pavement 188	FSR: 30 years: +40 %: 15 mins: Winter	0.26	107.1	49.456
Catchment-Pavement 219	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 218	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.3	2.886
Catchment-Pavement 240	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.9	2.247
Catchment-Pavement 217	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.0	3.717
Catchment-Pavement 221	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 220	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 223	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654

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Catchment-Pavement 222	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.0	3.717
Catchment-Pavement 288	FSR: 30 years: +40 %: 15 mins: Winter	0.19	80.0	36.949
Catchment-Pavement 286	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.2	4.257
Catchment-Pavement 287	FSR: 30 years: +40 %: 15 mins: Winter	0.02	6.7	3.087
Catchment-Pavement 285	FSR: 30 years: +40 %: 15 mins: Winter	0.03	13.0	6.012
Catchment-Pavement 284	FSR: 30 years: +40 %: 15 mins: Winter	0.05	18.8	8.691
Catchment-Pavement 281	FSR: 30 years: +40 %: 15 mins: Winter	0.05	19.0	8.775
Catchment-Pavement 280	FSR: 30 years: +40 %: 15 mins: Winter	0.08	32.6	15.072
Catchment-Pavement 279	FSR: 30 years: +40 %: 15 mins: Winter	0.03	10.7	4.923
Catchment-Pavement 273	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.1	4.203
Catchment-Pavement 278	FSR: 30 years: +40 %: 15 mins: Winter	0.03	12.4	5.730
Catchment-Pavement 276	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.7	2.178
Catchment-Pavement 277	FSR: 30 years: +40 %: 15 mins: Winter	0.04	16.3	7.524
Catchment-Pavement 275	FSR: 30 years: +40 %: 15 mins: Winter	0.00	1.9	0.891
Catchment-Pavement 271	FSR: 30 years: +40 %: 15 mins: Winter	0.06	24.8	11.466
Catchment-Pavement 274	FSR: 30 years: +40 %: 15 mins: Winter	0.07	30.4	14.058
Catchment-Pavement 272	FSR: 30 years: +40 %: 15 mins: Winter	0.10	40.9	18.891

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
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Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 269	FSR: 30 years: +40 %: 15 mins: Winter	0.05	21.5	9.909
Catchment-Pavement 266	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.8	4.509
Catchment-Pavement 268	FSR: 30 years: +40 %: 15 mins: Winter	0.06	25.5	11.778
Catchment-Pavement 267	FSR: 30 years: +40 %: 15 mins: Winter	0.09	35.4	16.338
Catchment-Pavement 265	FSR: 30 years: +40 %: 15 mins: Winter	0.04	18.4	8.490
Catchment-Pavement 264	FSR: 30 years: +40 %: 15 mins: Winter	0.12	49.2	22.698
Catchment-Pavement 263	FSR: 30 years: +40 %: 15 mins: Winter	0.12	50.2	23.199
Catchment-Pavement 262	FSR: 30 years: +40 %: 15 mins: Winter	0.20	82.5	38.122
Catchment-Pavement 291	FSR: 30 years: +40 %: 15 mins: Winter	0.05	19.9	9.174
Catchment-Pavement 292	FSR: 30 years: +40 %: 15 mins: Winter	0.04	18.1	8.343
Catchment-Pavement 290	FSR: 30 years: +40 %: 15 mins: Winter	0.14	58.4	26.955
Catchment-Pavement 289	FSR: 30 years: +40 %: 15 mins: Winter	0.13	52.7	24.345
Catchment-Pavement 270	FSR: 30 years: +40 %: 15 mins: Winter	0.13	52.7	24.312
Catchment-Pavement 260	FSR: 30 years: +40 %: 15 mins: Winter	0.13	53.1	24.516
Catchment-Pavement 261	FSR: 30 years: +40 %: 15 mins: Winter	0.23	93.3	43.066
Catchment-Pavement 253	FSR: 30 years: +40 %: 15 mins: Winter	0.13	54.8	25.284
Catchment-Pavement 239	FSR: 30 years: +40 %: 15 mins: Winter	0.11	47.1	21.741

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Inflows Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 283	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.7	4.008
Catchment-Pavement 282	FSR: 30 years: +40 %: 15 mins: Winter	0.01	4.7	2.193
Catchment-Pavement 237	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.7	3.534
Catchment-Pavement 238	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.7	3.534
Catchment-Pavement 236	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 235	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 233	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 234	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 232	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 231	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 229	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 230	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 228	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.6	2.592
Catchment-Pavement 225	FSR: 30 years: +40 %: 15 mins: Winter	0.02	9.5	4.386
Catchment-Pavement 227	FSR: 30 years: +40 %: 15 mins: Winter	0.01	5.7	2.655
Catchment-Pavement 224	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.8	3.618
Catchment-Pavement 226	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.6	3.516

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 242	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.4	3.396
Catchment-Pavement 241	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.4	3.399
Catchment-Pavement 243	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 244	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 245	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 246	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 247	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 248	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 249	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 250	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 251	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.639
Catchment-Pavement 252	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 254	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 255	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.654
Catchment-Pavement 256	FSR: 30 years: +40 %: 15 mins: Winter	0.03	11.6	5.379
Catchment-Pavement 257	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.2	3.309
Catchment-Pavement 258	FSR: 30 years: +40 %: 15 mins: Winter	0.02	7.9	3.666

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Catchment- Pavement 259	FSR: 30 years: +40 %: 15 mins: Winter	0.02	8.1	3.738
Foul Water Drainage Flow	FSR: 30 years: +40 %: 15 mins: Summer	-	2.8	4.986

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		Approved By: WL	
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ	



FSR: 100 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Inflow

Inflow	Storm Event	Inflow Area (ha)	Max. Inflow (L/s)	Total Inflow Volume (m³)
Catchment-Roof 01	FSR: 100 years: +40 %: 15 mins: Winter	0.05	24.3	11.230
Catchment-Roof 29	FSR: 100 years: +40 %: 15 mins: Winter	0.05	28.8	13.292
Catchment-Roof 28	FSR: 100 years: +40 %: 15 mins: Winter	0.06	30.3	13.976
Catchment-Roof 27	FSR: 100 years: +40 %: 15 mins: Winter	0.17	91.1	42.086
Catchment-Roof 26	FSR: 100 years: +40 %: 15 mins: Winter	0.10	52.2	24.084
Catchment-Roof 25	FSR: 100 years: +40 %: 15 mins: Winter	0.11	58.9	27.210
Catchment-Roof 24	FSR: 100 years: +40 %: 15 mins: Winter	0.19	101.3	46.755
Catchment-Roof 23	FSR: 100 years: +40 %: 15 mins: Winter	0.19	101.3	46.755
Catchment-Roof 04	FSR: 100 years: +40 %: 15 mins: Winter	0.07	34.9	16.130
Catchment-Roof 03	FSR: 100 years: +40 %: 15 mins: Winter	0.07	34.9	16.130
Catchment-Roof 02	FSR: 100 years: +40 %: 15 mins: Winter	0.12	64.0	29.560
Catchment-Roof 06	FSR: 100 years: +40 %: 15 mins: Winter	0.55	295.6	136.489
Catchment-Roof 05	FSR: 100 years: +40 %: 15 mins: Winter	0.55	295.6	136.489
Catchment-Roof 08	FSR: 100 years: +40 %: 15 mins: Winter	0.29	152.9	70.617

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Catchment- Roof 07	FSR: 100 years: +40 %: 15 mins: Winter	0.29	152.9	70.617
Catchment- Roof 09	FSR: 100 years: +40 %: 15 mins: Winter	0.10	55.8	25.767
Catchment- Roof 10	FSR: 100 years: +40 %: 15 mins: Winter	0.10	55.8	25.767
Catchment- Roof 11	FSR: 100 years: +40 %: 15 mins: Winter	0.10	55.8	25.767
Catchment- Roof 12	FSR: 100 years: +40 %: 15 mins: Winter	0.10	55.8	25.767
Catchment- Roof 13	FSR: 100 years: +40 %: 15 mins: Winter	0.10	55.8	25.767
Catchment- Roof 14	FSR: 100 years: +40 %: 15 mins: Winter	0.10	55.8	25.767
Catchment- Roof 15	FSR: 100 years: +40 %: 15 mins: Winter	1.05	560.0	258.550
Catchment- Roof 16	FSR: 100 years: +40 %: 15 mins: Winter	1.05	560.0	258.550
Catchment- Roof 18	FSR: 100 years: +40 %: 15 mins: Winter	1.04	554.2	255.880
Catchment- Roof 17	FSR: 100 years: +40 %: 15 mins: Winter	1.06	565.7	261.215
Catchment- Roof 22	FSR: 100 years: +40 %: 15 mins: Winter	0.88	467.6	215.924
Catchment- Roof 19	FSR: 100 years: +40 %: 15 mins: Winter	0.80	429.8	198.462
Catchment- Roof 21	FSR: 100 years: +40 %: 15 mins: Winter	0.90	478.6	220.971
Catchment- Roof 20	FSR: 100 years: +40 %: 15 mins: Winter	0.80	429.8	198.462
Catchment- Pavement 023	FSR: 100 years: +40 %: 15 mins: Winter	0.24	126.5	58.399
Catchment- Pavement 005	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.8	4.062

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Catchment-Pavement 004	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.8	4.062
Catchment-Pavement 003	FSR: 100 years: +40 %: 15 mins: Winter	0.08	40.1	18.503
Catchment-Pavement 002	FSR: 100 years: +40 %: 15 mins: Winter	0.10	51.4	23.742
Catchment-Pavement 008	FSR: 100 years: +40 %: 15 mins: Winter	0.03	14.3	6.586
Catchment-Pavement 011	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.0	2.775
Catchment-Pavement 012	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.0	5.536
Catchment-Pavement 013	FSR: 100 years: +40 %: 15 mins: Winter	0.06	34.0	15.701
Catchment-Pavement 014	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.6	4.423
Catchment-Pavement 015	FSR: 100 years: +40 %: 15 mins: Winter	0.05	25.0	11.521
Catchment-Pavement 016	FSR: 100 years: +40 %: 15 mins: Winter	0.06	32.8	15.155
Catchment-Pavement 001	FSR: 100 years: +40 %: 15 mins: Winter	0.06	34.2	15.809
Catchment-Pavement 007	FSR: 100 years: +40 %: 15 mins: Winter	0.09	50.2	23.184
Catchment-Pavement 006	FSR: 100 years: +40 %: 15 mins: Winter	0.03	18.2	8.416
Catchment-Pavement 010	FSR: 100 years: +40 %: 15 mins: Winter	0.01	3.9	1.782
Catchment-Pavement 009	FSR: 100 years: +40 %: 15 mins: Winter	0.01	4.9	2.244
Catchment-Pavement 021	FSR: 100 years: +40 %: 15 mins: Winter	0.01	4.6	2.145
Catchment-Pavement 017	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.702

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Catchment-Pavement 018	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.8	3.588
Catchment-Pavement 022	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.2	4.231
Catchment-Pavement 020	FSR: 100 years: +40 %: 15 mins: Winter	0.03	15.4	7.102
Catchment-Pavement 029	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.0	2.772
Catchment-Pavement 027	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.6	3.963
Catchment-Pavement 025	FSR: 100 years: +40 %: 15 mins: Winter	0.03	14.3	6.616
Catchment-Pavement 024	FSR: 100 years: +40 %: 15 mins: Winter	0.05	26.1	12.052
Catchment-Pavement 026	FSR: 100 years: +40 %: 15 mins: Winter	0.05	25.2	11.641
Catchment-Pavement 028	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.4	3.873
Catchment-Pavement 035	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.8	5.449
Catchment-Pavement 019	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.0	3.708
Catchment-Pavement 037	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.6	3.993
Catchment-Pavement 039	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.6	3.957
Catchment-Pavement 031	FSR: 100 years: +40 %: 15 mins: Winter	0.11	61.1	28.233
Catchment-Pavement 032	FSR: 100 years: +40 %: 15 mins: Winter	0.10	53.3	24.624
Catchment-Pavement 030	FSR: 100 years: +40 %: 15 mins: Winter	0.04	21.8	10.081
Catchment-Pavement 033	FSR: 100 years: +40 %: 15 mins: Winter	0.07	38.3	17.696

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Catchment-Pavement 034	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.3	3.840
Catchment-Pavement 042	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.4	4.822
Catchment-Pavement 041	FSR: 100 years: +40 %: 15 mins: Winter	0.03	17.6	8.131
Catchment-Pavement 043	FSR: 100 years: +40 %: 15 mins: Winter	0.07	39.5	18.221
Catchment-Pavement 046	FSR: 100 years: +40 %: 15 mins: Winter	0.07	39.7	18.332
Catchment-Pavement 047	FSR: 100 years: +40 %: 15 mins: Winter	0.05	28.3	13.085
Catchment-Pavement 036	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.714
Catchment-Pavement 038	FSR: 100 years: +40 %: 15 mins: Winter	0.01	5.7	2.655
Catchment-Pavement 040	FSR: 100 years: +40 %: 15 mins: Winter	0.08	43.9	20.264
Catchment-Pavement 044	FSR: 100 years: +40 %: 15 mins: Winter	0.12	66.1	30.523
Catchment-Pavement 045	FSR: 100 years: +40 %: 15 mins: Winter	0.07	38.2	17.624
Catchment-Pavement 104	FSR: 100 years: +40 %: 15 mins: Winter	0.15	78.7	36.316
Catchment-Pavement 103	FSR: 100 years: +40 %: 15 mins: Winter	0.12	64.7	29.887
Catchment-Pavement 102	FSR: 100 years: +40 %: 15 mins: Winter	0.13	69.9	32.287
Catchment-Pavement 101	FSR: 100 years: +40 %: 15 mins: Winter	0.10	51.9	23.958
Catchment-Pavement 157	FSR: 100 years: +40 %: 15 mins: Winter	0.14	73.3	33.862
Catchment-Pavement 155	FSR: 100 years: +40 %: 15 mins: Winter	0.03	16.9	7.816

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		Designed by: FJB	Checked by: PJB		Approved By: WL
Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 156	FSR: 100 years: +40 %: 15 mins: Winter	0.06	32.8	15.137
Catchment-Pavement 154	FSR: 100 years: +40 %: 15 mins: Winter	0.11	59.1	27.300
Catchment-Pavement 152	FSR: 100 years: +40 %: 15 mins: Winter	0.05	29.1	13.457
Catchment-Pavement 151	FSR: 100 years: +40 %: 15 mins: Winter	0.07	39.3	18.143
Catchment-Pavement 153	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.3	3.372
Catchment-Pavement 150	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.3	4.309
Catchment-Pavement 148	FSR: 100 years: +40 %: 15 mins: Winter	0.04	22.6	10.435
Catchment-Pavement 158	FSR: 100 years: +40 %: 15 mins: Winter	0.09	46.8	21.615
Catchment-Pavement 149	FSR: 100 years: +40 %: 15 mins: Winter	0.01	4.5	2.061
Catchment-Pavement 049	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.1	3.288
Catchment-Pavement 048	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.2	5.194
Catchment-Pavement 050	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.5	4.837
Catchment-Pavement 051	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.6	4.426
Catchment-Pavement 067	FSR: 100 years: +40 %: 15 mins: Winter	0.00	2.0	0.924
Catchment-Pavement 068	FSR: 100 years: +40 %: 15 mins: Winter	0.00	1.3	0.618
Catchment-Pavement 072	FSR: 100 years: +40 %: 15 mins: Winter	0.01	3.0	1.392
Catchment-Pavement 073	FSR: 100 years: +40 %: 15 mins: Winter	0.01	3.7	1.701

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Report Details: Type: Inflows Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 071	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.6	5.347
Catchment-Pavement 074	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.8	3.150
Catchment-Pavement 070	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.7	4.480
Catchment-Pavement 069	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.4	4.801
Catchment-Pavement 066	FSR: 100 years: +40 %: 15 mins: Winter	0.03	17.3	7.993
Catchment-Pavement 064	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.9	4.561
Catchment-Pavement 062	FSR: 100 years: +40 %: 15 mins: Winter	0.03	16.2	7.462
Catchment-Pavement 053	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.4	3.888
Catchment-Pavement 052	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.1	4.222
Catchment-Pavement 055	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.4	3.870
Catchment-Pavement 054	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.1	4.219
Catchment-Pavement 057	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.3	3.843
Catchment-Pavement 056	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.7	4.960
Catchment-Pavement 058	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.9	3.192
Catchment-Pavement 088	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.8	5.917
Catchment-Pavement 092	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.8	5.917
Catchment-Pavement 091	FSR: 100 years: +40 %: 15 mins: Winter	0.09	47.4	21.873

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Report Details: Type: Inflows Summary Storm Phase: Phase		Designed by:	Checked by:		Approved By:
		FJB	PJB		WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 089	FSR: 100 years: +40 %: 15 mins: Winter	0.12	64.7	29.887
Catchment-Pavement 090	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.5	3.450
Catchment-Pavement 080	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.7	3.999
Catchment-Pavement 081	FSR: 100 years: +40 %: 15 mins: Winter	0.01	5.2	2.421
Catchment-Pavement 079	FSR: 100 years: +40 %: 15 mins: Winter	0.06	29.8	13.754
Catchment-Pavement 077	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.3	5.677
Catchment-Pavement 076	FSR: 100 years: +40 %: 15 mins: Winter	0.07	35.5	16.394
Catchment-Pavement 075	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.9	3.639
Catchment-Pavement 065	FSR: 100 years: +40 %: 15 mins: Winter	0.05	24.8	11.452
Catchment-Pavement 063	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.9	3.648
Catchment-Pavement 078	FSR: 100 years: +40 %: 15 mins: Winter	0.02	13.0	5.986
Catchment-Pavement 061	FSR: 100 years: +40 %: 15 mins: Winter	0.00	2.5	1.134
Catchment-Pavement 060	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.1	4.666
Catchment-Pavement 059	FSR: 100 years: +40 %: 15 mins: Winter	0.06	31.5	14.546
Catchment-Pavement 082	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.7	4.957
Catchment-Pavement 083	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 084	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717

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Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 085	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.0	2.772
Catchment-Pavement 086	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 087	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.4	5.278
Catchment-Pavement 093	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.1	5.146
Catchment-Pavement 094	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 095	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.1	3.720
Catchment-Pavement 096	FSR: 100 years: +40 %: 15 mins: Winter	0.03	14.0	6.451
Catchment-Pavement 099	FSR: 100 years: +40 %: 15 mins: Winter	0.01	2.9	1.320
Catchment-Pavement 100	FSR: 100 years: +40 %: 15 mins: Winter	0.06	29.8	13.781
Catchment-Pavement 097	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.3	5.200
Catchment-Pavement 098	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.8	4.077
Catchment-Pavement 105	FSR: 100 years: +40 %: 15 mins: Winter	0.03	15.1	6.958
Catchment-Pavement 109	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.7	4.495
Catchment-Pavement 106	FSR: 100 years: +40 %: 15 mins: Winter	0.17	89.5	41.333
Catchment-Pavement 107	FSR: 100 years: +40 %: 15 mins: Winter	0.03	17.5	8.095
Catchment-Pavement 108	FSR: 100 years: +40 %: 15 mins: Winter	0.04	21.4	9.871
Catchment-Pavement 110	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.8	5.005

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Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 112	FSR: 100 years: +40 %: 15 mins: Winter	0.01	5.2	2.421
Catchment-Pavement 111	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.2	5.161
Catchment-Pavement 116	FSR: 100 years: +40 %: 15 mins: Winter	0.07	39.3	18.158
Catchment-Pavement 118	FSR: 100 years: +40 %: 15 mins: Winter	0.04	22.1	10.201
Catchment-Pavement 117	FSR: 100 years: +40 %: 15 mins: Winter	0.05	25.7	11.851
Catchment-Pavement 119	FSR: 100 years: +40 %: 15 mins: Winter	0.07	37.7	17.420
Catchment-Pavement 114	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.1	4.678
Catchment-Pavement 113	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.3	4.747
Catchment-Pavement 115	FSR: 100 years: +40 %: 15 mins: Winter	0.15	77.8	35.917
Catchment-Pavement 131	FSR: 100 years: +40 %: 15 mins: Winter	0.18	93.8	43.307
Catchment-Pavement 130	FSR: 100 years: +40 %: 15 mins: Winter	0.10	50.9	23.484
Catchment-Pavement 129	FSR: 100 years: +40 %: 15 mins: Winter	0.03	14.0	6.478
Catchment-Pavement 147	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.6	4.906
Catchment-Pavement 146	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.6	4.906
Catchment-Pavement 145	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.7	4.921
Catchment-Pavement 144	FSR: 100 years: +40 %: 15 mins: Winter	0.03	13.4	6.169
Catchment-Pavement 143	FSR: 100 years: +40 %: 15 mins: Winter	0.03	15.3	7.081

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 142	FSR: 100 years: +40 %: 15 mins: Winter	0.03	15.5	7.156
Catchment-Pavement 141	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.3	4.315
Catchment-Pavement 140	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.6	4.906
Catchment-Pavement 139	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.6	4.906
Catchment-Pavement 138	FSR: 100 years: +40 %: 15 mins: Winter	0.01	5.1	2.379
Catchment-Pavement 137	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.1	5.590
Catchment-Pavement 136	FSR: 100 years: +40 %: 15 mins: Winter	0.03	13.8	6.358
Catchment-Pavement 135	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.5	4.849
Catchment-Pavement 134	FSR: 100 years: +40 %: 15 mins: Winter	0.03	13.9	6.415
Catchment-Pavement 133	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.7	4.008
Catchment-Pavement 132	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.8	3.621
Catchment-Pavement 128	FSR: 100 years: +40 %: 15 mins: Winter	0.01	8.0	3.684
Catchment-Pavement 127	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.6	4.444
Catchment-Pavement 159	FSR: 100 years: +40 %: 15 mins: Winter	0.19	104.1	48.057
Catchment-Pavement 160	FSR: 100 years: +40 %: 15 mins: Winter	0.10	52.8	24.384
Catchment-Pavement 161	FSR: 100 years: +40 %: 15 mins: Winter	0.17	92.8	42.827
Catchment-Pavement 163	FSR: 100 years: +40 %: 15 mins: Winter	0.02	13.3	6.166

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Catchment-Pavement 162	FSR: 100 years: +40 %: 15 mins: Winter	0.13	70.9	32.752
Catchment-Pavement 164	FSR: 100 years: +40 %: 15 mins: Winter	0.10	52.9	24.429
Catchment-Pavement 126	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.9	5.053
Catchment-Pavement 122	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.8	4.507
Catchment-Pavement 123	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.2	3.345
Catchment-Pavement 125	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.6	5.815
Catchment-Pavement 120	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.6	5.815
Catchment-Pavement 121	FSR: 100 years: +40 %: 15 mins: Winter	0.01	4.3	1.971
Catchment-Pavement 124	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 169	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.2	4.267
Catchment-Pavement 166	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.9	3.186
Catchment-Pavement 165	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 167	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.4	4.822
Catchment-Pavement 168	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 170	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 171	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.9	4.113
Catchment-Pavement 173	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.2	3.774

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Catchment-Pavement 172	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.2	3.774
Catchment-Pavement 174	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.2	3.774
Catchment-Pavement 175	FSR: 100 years: +40 %: 15 mins: Winter	0.03	13.4	6.202
Catchment-Pavement 178	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.2	3.804
Catchment-Pavement 179	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.6	5.797
Catchment-Pavement 203	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.2	4.264
Catchment-Pavement 202	FSR: 100 years: +40 %: 15 mins: Winter	0.01	5.1	2.334
Catchment-Pavement 201	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.5	3.906
Catchment-Pavement 204	FSR: 100 years: +40 %: 15 mins: Winter	0.05	27.7	12.773
Catchment-Pavement 205	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.3	3.393
Catchment-Pavement 207	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.7	3.114
Catchment-Pavement 208	FSR: 100 years: +40 %: 15 mins: Winter	0.24	130.4	60.184
Catchment-Pavement 209	FSR: 100 years: +40 %: 15 mins: Winter	0.22	118.7	54.799
Catchment-Pavement 181	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.7	4.504
Catchment-Pavement 180	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.6	3.030
Catchment-Pavement 184	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.7	4.504
Catchment-Pavement 183	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.7	4.504

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 185	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.7	4.504
Catchment-Pavement 186	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.7	4.504
Catchment-Pavement 187	FSR: 100 years: +40 %: 15 mins: Winter	0.05	25.6	11.812
Catchment-Pavement 211	FSR: 100 years: +40 %: 15 mins: Winter	0.03	16.0	7.402
Catchment-Pavement 210	FSR: 100 years: +40 %: 15 mins: Winter	0.14	73.7	34.015
Catchment-Pavement 212	FSR: 100 years: +40 %: 15 mins: Winter	0.06	33.9	15.659
Catchment-Pavement 206	FSR: 100 years: +40 %: 15 mins: Winter	0.26	138.9	64.118
Catchment-Pavement 182	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.1	4.684
Catchment-Pavement 177	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.3	5.674
Catchment-Pavement 176	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.2	3.774
Catchment-Pavement 213	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.1	3.723
Catchment-Pavement 214	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.4	3.858
Catchment-Pavement 216	FSR: 100 years: +40 %: 15 mins: Winter	0.03	14.2	6.535
Catchment-Pavement 215	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.2	3.804
Catchment-Pavement 200	FSR: 100 years: +40 %: 15 mins: Winter	0.24	128.9	59.515
Catchment-Pavement 199	FSR: 100 years: +40 %: 15 mins: Winter	0.21	114.8	53.016
Catchment-Pavement 198	FSR: 100 years: +40 %: 15 mins: Winter	0.26	141.2	65.186

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Catchment-Pavement 197	FSR: 100 years: +40 %: 15 mins: Winter	0.14	77.0	35.575
Catchment-Pavement 196	FSR: 100 years: +40 %: 15 mins: Winter	0.21	114.8	53.016
Catchment-Pavement 195	FSR: 100 years: +40 %: 15 mins: Winter	0.34	181.0	83.554
Catchment-Pavement 194	FSR: 100 years: +40 %: 15 mins: Winter	0.21	110.3	50.925
Catchment-Pavement 193	FSR: 100 years: +40 %: 15 mins: Winter	0.17	91.6	42.275
Catchment-Pavement 192	FSR: 100 years: +40 %: 15 mins: Winter	0.25	135.0	62.336
Catchment-Pavement 190	FSR: 100 years: +40 %: 15 mins: Winter	0.24	125.6	57.985
Catchment-Pavement 191	FSR: 100 years: +40 %: 15 mins: Winter	0.22	115.1	53.166
Catchment-Pavement 189	FSR: 100 years: +40 %: 15 mins: Winter	0.22	115.1	53.166
Catchment-Pavement 188	FSR: 100 years: +40 %: 15 mins: Winter	0.26	138.2	63.833
Catchment-Pavement 219	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 218	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.1	3.723
Catchment-Pavement 240	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.3	2.898
Catchment-Pavement 217	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.4	4.798
Catchment-Pavement 221	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 220	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 223	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717

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Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 222	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.4	4.798
Catchment-Pavement 288	FSR: 100 years: +40 %: 15 mins: Winter	0.19	103.3	47.694
Catchment-Pavement 286	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.9	5.500
Catchment-Pavement 287	FSR: 100 years: +40 %: 15 mins: Winter	0.02	8.6	3.981
Catchment-Pavement 285	FSR: 100 years: +40 %: 15 mins: Winter	0.03	16.8	7.762
Catchment-Pavement 284	FSR: 100 years: +40 %: 15 mins: Winter	0.05	24.3	11.215
Catchment-Pavement 281	FSR: 100 years: +40 %: 15 mins: Winter	0.05	24.5	11.329
Catchment-Pavement 280	FSR: 100 years: +40 %: 15 mins: Winter	0.08	42.1	19.457
Catchment-Pavement 279	FSR: 100 years: +40 %: 15 mins: Winter	0.03	13.8	6.358
Catchment-Pavement 273	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.7	5.422
Catchment-Pavement 278	FSR: 100 years: +40 %: 15 mins: Winter	0.03	16.0	7.402
Catchment-Pavement 276	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.1	2.811
Catchment-Pavement 277	FSR: 100 years: +40 %: 15 mins: Winter	0.04	21.0	9.709
Catchment-Pavement 275	FSR: 100 years: +40 %: 15 mins: Winter	0.00	2.5	1.146
Catchment-Pavement 271	FSR: 100 years: +40 %: 15 mins: Winter	0.06	32.1	14.798
Catchment-Pavement 274	FSR: 100 years: +40 %: 15 mins: Winter	0.07	39.3	18.143
Catchment-Pavement 272	FSR: 100 years: +40 %: 15 mins: Winter	0.10	52.8	24.381

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023		
Report Details: Type: Inflows Summary Storm Phase: Phase		Designed by:	Checked by:	
		FJB	PJB	
		Approved By: WL		
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		

Catchment-Pavement 269	FSR: 100 years: +40 %: 15 mins: Winter	0.05	27.7	12.791
Catchment-Pavement 266	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.6	5.824
Catchment-Pavement 268	FSR: 100 years: +40 %: 15 mins: Winter	0.06	32.9	15.206
Catchment-Pavement 267	FSR: 100 years: +40 %: 15 mins: Winter	0.09	45.7	21.090
Catchment-Pavement 265	FSR: 100 years: +40 %: 15 mins: Winter	0.04	23.7	10.960
Catchment-Pavement 264	FSR: 100 years: +40 %: 15 mins: Winter	0.12	63.5	29.299
Catchment-Pavement 263	FSR: 100 years: +40 %: 15 mins: Winter	0.12	64.9	29.950
Catchment-Pavement 262	FSR: 100 years: +40 %: 15 mins: Winter	0.20	106.6	49.206
Catchment-Pavement 291	FSR: 100 years: +40 %: 15 mins: Winter	0.05	25.7	11.845
Catchment-Pavement 292	FSR: 100 years: +40 %: 15 mins: Winter	0.04	23.3	10.765
Catchment-Pavement 290	FSR: 100 years: +40 %: 15 mins: Winter	0.14	75.4	34.792
Catchment-Pavement 289	FSR: 100 years: +40 %: 15 mins: Winter	0.13	68.1	31.426
Catchment-Pavement 270	FSR: 100 years: +40 %: 15 mins: Winter	0.13	68.0	31.381
Catchment-Pavement 260	FSR: 100 years: +40 %: 15 mins: Winter	0.13	68.5	31.645
Catchment-Pavement 261	FSR: 100 years: +40 %: 15 mins: Winter	0.23	120.4	55.588
Catchment-Pavement 253	FSR: 100 years: +40 %: 15 mins: Winter	0.13	70.7	32.641
Catchment-Pavement 239	FSR: 100 years: +40 %: 15 mins: Winter	0.11	60.8	28.062

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
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Catchment-Pavement 283	FSR: 100 years: +40 %: 15 mins: Winter	0.02	11.2	5.173
Catchment-Pavement 282	FSR: 100 years: +40 %: 15 mins: Winter	0.01	6.1	2.829
Catchment-Pavement 237	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.9	4.561
Catchment-Pavement 238	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.9	4.561
Catchment-Pavement 236	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 235	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 233	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 234	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 232	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 231	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 229	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 230	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 228	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.2	3.345
Catchment-Pavement 225	FSR: 100 years: +40 %: 15 mins: Winter	0.02	12.3	5.659
Catchment-Pavement 227	FSR: 100 years: +40 %: 15 mins: Winter	0.01	7.4	3.426
Catchment-Pavement 224	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.1	4.669
Catchment-Pavement 226	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.8	4.543

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Report Details: Type: Inflows Summary Storm Phase: Phase		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Catchment-Pavement 242	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.5	4.384
Catchment-Pavement 241	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.5	4.390
Catchment-Pavement 243	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 244	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 245	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 246	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 247	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 248	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 249	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 250	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 251	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.699
Catchment-Pavement 252	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 254	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 255	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.717
Catchment-Pavement 256	FSR: 100 years: +40 %: 15 mins: Winter	0.03	15.0	6.940
Catchment-Pavement 257	FSR: 100 years: +40 %: 15 mins: Winter	0.02	9.3	4.273
Catchment-Pavement 258	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.2	4.732

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Catchment- Pavement 259	FSR: 100 years: +40 %: 15 mins: Winter	0.02	10.4	4.822
Foul Water Drainage Flow	FSR: 100 years: +40 %: 15 mins: Summer	-	2.8	4.986

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023		
Report Details: Type: Junctions Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB	
		Approved By: WL		
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		



FSR: 1 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Outflow

Junction	Storm Event	Cover Level (m)	Invert Level (m)	Max. Level (m)	Max. Depth (m)	Max. Inflow (L/s)	Max. Resident Volume (m³)	Max. Flooded Volume (m³)	Max. Outflow (L/s)	Total Discharge Volume (m³)	Status
SWMH001	FSR: 1 years: +40 %: 15 mins: Winter	37.86 1	36.42 6	36.493	0.067	10.6	0.076	0.000	10.2	4.999	OK
SWMH002	FSR: 1 years: +40 %: 15 mins: Winter	37.81 3	36.96 4	37.030	0.066	10.8	0.074	0.000	10.6	5.009	OK
SWMH003	FSR: 1 years: +40 %: 15 mins: Winter	37.56 0	36.95 5	37.008	0.053	4.5	0.004	0.000	4.4	2.093	OK
SWMH004	FSR: 1 years: +40 %: 15 mins: Winter	37.55 3	36.72 7	36.806	0.079	12.4	0.090	0.000	12.1	5.780	OK
SWMH005	FSR: 1 years: +40 %: 60 mins: Winter	37.38 2	34.42 1	34.500	0.079	20.5	0.090	0.000	20.5	54.778	OK
SWMH006	FSR: 1 years: +40 %: 15 mins: Winter	37.24 2	36.52 0	36.570	0.050	14.8	0.057	0.000	14.3	7.013	OK
SWMH008	FSR: 1 years: +40 %: 15 mins: Summer	36.75 6	35.35 6	35.356	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH009	FSR: 1 years: +40 %: 15 mins: Summer	36.49 9	35.18 8	35.188	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH010	FSR: 1 years: +40 %: 60 mins: Winter	36.26 6	33.04 7	33.594	0.547	42.8	0.619	0.000	42.9	170.721	Surcharged
SWMH011	FSR: 1 years: +40 %: 15 mins: Summer	36.24 1	35.02 0	35.020	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH012	FSR: 1 years: +40 %: 15 mins: Summer	35.98 3	34.85 2	34.852	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH013	FSR: 1 years: +40 %: 15 mins: Winter	35.95 5	34.14 0	34.383	0.243	31.9	0.275	0.000	31.3	18.368	Surcharged
SWMH014	FSR: 1 years: +40 %: 60 mins: Winter	35.83 2	33.29 7	33.589	0.292	22.9	0.331	0.000	23.1	66.607	Surcharged
SWMH015	FSR: 1 years: +40 %: 15 mins: Winter	35.72 8	34.57 2	34.673	0.101	2.6	0.114	0.000	2.5	2.153	OK
SWMH016	FSR: 1 years: +40 %: 15 mins: Winter	35.72 6	32.53 5	32.810	0.275	7.6	0.312	0.000	7.4	4.039	Surcharged
SWMH017	FSR: 1 years: +40 %: 60 mins: Winter	35.72 5	34.69 0	34.725	0.035	2.1	0.039	0.000	2.1	5.144	OK
SWMH018	FSR: 1 years: +40 %: 15 mins: Summer	35.72 3	34.54 1	34.661	0.120	18.4	0.136	0.000	15.1	9.761	OK
SWMH020	FSR: 1 years: +40 %: 120 mins: Winter	35.62 5	34.86 5	34.923	0.058	6.5	0.004	0.000	6.5	31.399	OK
SWMH021	FSR: 1 years: +40 %: 120 mins: Winter	35.61 4	34.74 0	34.764	0.024	6.5	0.027	0.000	6.5	31.383	OK
SWMH022	FSR: 1 years: +40 %: 15 mins: Winter	35.54 9	32.48 0	32.812	0.332	7.2	0.376	0.000	7.1	4.150	Surcharged
SWMH023	FSR: 1 years: +40 %: 30 mins: Winter	35.43 8	34.67 8	34.750	0.072	7.1	0.005	0.000	7.1	10.209	OK
SWMH024	FSR: 1 years: +40 %: 120 mins: Winter	35.38 8	31.50 0	32.643	1.143	23.5	1.292	0.000	24.4	129.083	Surcharged
SWMH025	FSR: 1 years: +40 %: 60 mins: Winter	35.32 6	34.44 0	34.510	0.069	14.2	0.078	0.000	14.2	29.778	OK
SWMH026	FSR: 1 years: +40 %: 30 mins: Winter	35.29 5	33.29 6	33.483	0.187	34.9	0.212	0.000	33.0	48.160	OK
SWMH027	FSR: 1 years: +40 %: 30 mins: Winter	35.27 0	32.73 5	33.174	0.439	48.1	0.497	0.000	47.5	109.892	Surcharged
SWMH028	FSR: 1 years: +40 %: 15 mins: Winter	35.25 6	33.97 2	34.053	0.081	15.4	0.091	0.000	14.0	7.299	OK
SWMH029	FSR: 1 years: +40 %: 15 mins: Winter	35.22 8	33.45 1	33.539	0.089	14.0	0.100	0.000	12.3	7.257	OK

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SWMH030	FSR: 1 years: +40 %: 15 mins: Winter	35.21 1	34.49 3	34.529	0.036	3.2	0.040	0.000	3.0	1.518	OK
SWMH031	FSR: 1 years: +40 %: 15 mins: Winter	35.21 1	34.60 6	34.646	0.040	3.3	0.003	0.000	3.2	1.526	OK
SWMH032	FSR: 1 years: +40 %: 15 mins: Winter	35.14 1	31.38 0	32.799	1.419	58.4	1.604	0.000	56.8	70.736	Surcharged
SWMH033	FSR: 1 years: +40 %: 60 mins: Summer	35.11 9	32.67 7	32.994	0.317	48.3	0.358	0.000	47.8	161.950	Surcharged
SWMH034	FSR: 1 years: +40 %: 60 mins: Winter	35.02 5	33.23 1	33.400	0.170	38.7	0.192	0.000	40.9	82.553	OK
SWMH035	FSR: 1 years: +40 %: 60 mins: Winter	35.00 7	32.62 0	32.914	0.294	47.5	0.332	0.000	47.4	181.685	Surcharged
SWMH036	FSR: 1 years: +40 %: 60 mins: Winter	34.91 0	33.18 9	33.263	0.074	40.9	0.083	0.000	39.8	82.522	OK
SWMH038	FSR: 1 years: +40 %: 30 mins: Winter	34.74 1	28.35 4	28.875	0.521	153.7	0.921	0.000	151.2	323.531	OK
SWMH039	FSR: 1 years: +40 %: 30 mins: Winter	34.71 2	28.54 6	28.891	0.345	153.0	0.610	0.000	151.6	323.949	OK
SWMH040	FSR: 1 years: +40 %: 15 mins: Winter	34.62 6	28.20 5	28.398	0.193	162.0	0.341	0.000	163.5	177.512	OK
SWMH041	FSR: 1 years: +40 %: 120 mins: Winter	34.62 2	33.49 7	33.551	0.054	4.5	0.062	0.000	4.5	18.786	OK
SWMH043	FSR: 1 years: +40 %: 30 mins: Winter	34.57 8	28.69 1	28.914	0.223	153.9	0.393	0.000	153.0	324.889	OK
SWMH044	FSR: 1 years: +40 %: 15 mins: Winter	34.55 0	32.62 4	32.796	0.172	27.0	0.194	0.000	26.8	17.604	OK
SWMH045	FSR: 1 years: +40 %: 30 mins: Winter	34.45 2	28.81 9	29.045	0.226	152.0	0.399	0.000	151.5	323.639	OK
SWMH046	FSR: 1 years: +40 %: 60 mins: Winter	34.38 7	33.44 9	33.480	0.031	13.7	0.035	0.000	13.7	34.415	OK
SWMH047	FSR: 1 years: +40 %: 30 mins: Winter	34.36 5	30.91 7	31.853	0.936	104.8	1.058	0.000	105.3	221.410	Surcharged
SWMH048	FSR: 1 years: +40 %: 120 mins: Winter	34.36 0	30.25 6	30.293	0.037	12.8	0.042	0.000	12.8	115.025	OK
SWMH049	FSR: 1 years: +40 %: 120 mins: Winter	34.29 0	31.65 5	32.313	0.658	17.4	0.744	0.000	17.7	99.023	Surcharged
SWMH050	FSR: 1 years: +40 %: 30 mins: Winter	34.23 8	30.58 2	30.745	0.163	143.2	0.184	0.000	142.5	312.566	OK
SWMH051	FSR: 1 years: +40 %: 30 mins: Winter	34.21 9	31.67 5	32.710	1.035	25.6	1.171	0.000	24.4	26.389	Surcharged
SWMH052	FSR: 1 years: +40 %: 15 mins: Summer	34.46 2	32.72 9	32.729	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH053	FSR: 1 years: +40 %: 15 mins: Winter	34.18 6	27.63 0	28.186	0.556	231.8	0.982	0.000	237.0	235.566	OK
SWMH054	FSR: 1 years: +40 %: 120 mins: Winter	34.18 5	30.32 8	30.408	0.080	12.8	0.091	0.000	12.8	115.077	OK
SWMH055	FSR: 1 years: +40 %: 30 mins: Winter	34.11 9	30.79 4	31.588	0.794	106.9	0.898	0.000	107.6	223.530	Surcharged
SWMH056	FSR: 1 years: +40 %: 120 mins: Winter	34.10 6	31.70 0	32.302	0.602	17.1	0.680	0.000	16.4	84.925	Surcharged
SWMH058	FSR: 1 years: +40 %: 60 mins: Winter	34.03 2	30.71 0	31.387	0.677	139.1	0.765	0.000	139.0	538.877	Surcharged
SWMH059	FSR: 1 years: +40 %: 15 mins: Winter	34.03 1	32.87 5	32.937	0.062	3.1	0.071	0.000	2.8	1.437	OK
SWMH061	FSR: 1 years: +40 %: 15 mins: Winter	33.87 2	33.27 2	33.292	0.020	3.1	0.006	0.000	3.1	1.442	OK
SWMH062	FSR: 1 years: +40 %: 15 mins: Summer	33.87 0	31.12 9	31.457	0.328	6.8	0.371	0.000	5.5	4.835	Surcharged
SWMH063	FSR: 1 years: +40 %: 30 mins: Winter	33.81 1	28.07 5	28.848	0.773	72.2	1.366	0.000	70.6	133.047	Surcharged
SWMH064	FSR: 1 years: +40 %: 480 mins: Winter	33.80 0	29.33 5	30.951	1.616	2.2	1.828	0.000	1.6	83.862	Surcharged
SWMH065	FSR: 1 years: +40 %: 240 mins: Winter	33.83 3	30.96 6	31.343	0.377	45.5	0.426	0.000	45.5	340.665	Surcharged

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SWMH066	FSR: 1 years: +40 %: 15 mins: Summer	33.76 4	32.66 5	32.665	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH067	FSR: 1 years: +40 %: 15 mins: Summer	33.76 4	32.55 2	32.552	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH068	FSR: 1 years: +40 %: 15 mins: Winter	33.76 0	32.10 5	32.176	0.071	12.0	0.080	0.000	11.5	5.520	OK
SWMH069	FSR: 1 years: +40 %: 15 mins: Winter	33.76 0	31.34 7	31.445	0.098	38.9	0.111	0.000	36.5	18.256	OK
SWMH071	FSR: 1 years: +40 %: 15 mins: Winter	33.72 0	32.42 9	32.530	0.101	15.7	0.114	0.000	15.5	7.268	OK
SWMH072	FSR: 1 years: +40 %: 15 mins: Summer	33.72 0	31.22 9	31.458	0.229	6.2	0.259	0.000	6.3	5.144	Surcharged
SWMH073	FSR: 1 years: +40 %: 15 mins: Summer	33.71 9	32.42 0	32.420	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH074	FSR: 1 years: +40 %: 480 mins: Winter	33.64 3	31.06 0	31.510	0.450	2.9	0.509	0.000	1.6	85.257	Surcharged
SWMH075	FSR: 1 years: +40 %: 15 mins: Winter	33.53 2	31.86 0	31.953	0.093	14.6	0.105	0.000	14.1	6.998	OK
SWMH076	FSR: 1 years: +40 %: 480 mins: Winter	33.56 7	30.92 5	31.153	0.228	2.4	0.258	0.000	2.4	97.574	Surcharged
SWMH077	FSR: 1 years: +40 %: 15 mins: Winter	33.56 6	27.20 9	28.157	0.948	255.9	1.675	0.000	267.3	230.606	Surcharged
SWMH078	FSR: 1 years: +40 %: 60 mins: Winter	33.56 0	28.49 3	29.217	0.724	60.4	1.279	0.000	61.3	198.473	Surcharged
SWMH079	FSR: 1 years: +40 %: 15 mins: Winter	33.45 6	32.38 9	32.430	0.041	19.1	0.046	0.000	18.9	12.787	OK
SWMH080	FSR: 1 years: +40 %: 15 mins: Summer	33.44 5	31.01 1	31.455	0.444	7.3	0.502	0.000	4.7	4.753	Surcharged
SWMH081	FSR: 1 years: +40 %: 60 mins: Winter	33.33 7	32.57 7	32.630	0.053	6.3	0.004	0.000	6.3	12.424	OK
SWMH082	FSR: 1 years: +40 %: 30 mins: Winter	33.31 7	31.91 6	31.950	0.034	1.8	0.038	0.000	1.9	2.167	OK
SWMH085	FSR: 1 years: +40 %: 15 mins: Winter	33.24 4	32.32 5	32.405	0.080	15.0	0.091	0.000	14.6	7.013	OK
SWMH086	FSR: 1 years: +40 %: 120 mins: Winter	34.04 8	30.48 5	30.588	0.103	12.8	0.117	0.000	12.8	115.137	OK
SWMH087	FSR: 1 years: +40 %: 15 mins: Winter	33.22 5	32.39 6	32.514	0.118	28.4	0.133	0.000	27.9	13.094	OK
SWMH089	FSR: 1 years: +40 %: 120 mins: Winter	33.18 9	32.42 9	32.454	0.025	1.1	0.002	0.000	1.1	2.577	OK
SWMH090	FSR: 1 years: +40 %: 15 mins: Winter	33.08 0	32.47 5	32.501	0.026	4.2	0.002	0.000	4.2	1.952	OK
SWMH091	FSR: 1 years: +40 %: 15 mins: Winter	33.07 5	32.07 5	32.140	0.065	6.5	0.073	0.000	6.3	3.021	OK
SWMH092	FSR: 1 years: +40 %: 120 mins: Winter	33.07 2	29.33 8	29.441	0.103	39.5	0.182	0.000	39.5	209.291	OK
SWMH093	FSR: 1 years: +40 %: 15 mins: Winter	33.05 5	32.45 5	32.482	0.027	3.2	0.002	0.000	3.2	1.496	OK
SWMH094	FSR: 1 years: +40 %: 15 mins: Winter	33.02 6	31.93 5	32.000	0.064	14.0	0.072	0.000	13.1	6.566	OK
SWMH095	FSR: 1 years: +40 %: 30 mins: Winter	33.01 0	26.92 0	28.745	1.825	288.2	3.225	0.000	283.8	501.317	Surcharged
SWMH096	FSR: 1 years: +40 %: 360 mins: Winter	33.00 6	30.95 4	31.606	0.652	4.1	0.737	0.000	4.1	142.321	Surcharged
SWMH097	FSR: 1 years: +40 %: 60 mins: Winter	32.95 9	29.49 5	29.584	0.089	30.0	0.158	0.000	29.9	103.598	OK
SWMH098	FSR: 1 years: +40 %: 15 mins: Winter	32.84 2	29.94 6	30.074	0.128	25.4	0.145	0.000	22.7	12.502	OK
SWMH099	FSR: 1 years: +40 %: 120 mins: Winter	32.75 6	28.97 0	29.303	0.333	21.3	0.377	0.000	21.3	99.726	Surcharged
SWMH100	FSR: 1 years: +40 %: 30 mins: Summer	32.72 1	26.77 0	28.502	1.732	268.6	3.060	0.000	263.8	429.572	Surcharged

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SWMH101	FSR: 1 years: +40 %: 60 mins: Winter	32.68 6	30.14 9	30.211	0.062	15.8	0.110	0.000	15.9	60.722	OK
SWMH102	FSR: 1 years: +40 %: 15 mins: Winter	32.68 3	29.62 8	29.784	0.156	35.6	0.176	0.000	30.1	18.388	OK
SWMH103	FSR: 1 years: +40 %: 15 mins: Winter	32.52 4	29.30 9	29.526	0.217	43.0	0.245	0.000	37.5	24.292	OK
SWMH104	FSR: 1 years: +40 %: 60 mins: Winter	32.51 0	29.54 6	29.681	0.135	9.5	0.153	0.000	9.5	23.842	OK
SWMH106	FSR: 1 years: +40 %: 15 mins: Winter	32.48 9	29.24 2	29.430	0.188	43.5	0.213	0.000	41.6	27.017	OK
SWMH107	FSR: 1 years: +40 %: 15 mins: Winter	32.44 9	29.16 2	29.245	0.083	51.4	0.094	0.000	50.4	31.378	OK
SWMH108	FSR: 1 years: +40 %: 30 mins: Summer	32.44 5	26.61 6	28.478	1.862	312.2	3.290	0.000	260.3	452.139	Surcharged
SWMH109	FSR: 1 years: +40 %: 15 mins: Winter	32.36 3	30.28 3	30.463	0.180	38.1	0.203	0.000	33.4	20.600	OK
SWMH110	FSR: 1 years: +40 %: 15 mins: Summer	32.35 0	31.19 0	31.190	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH114	FSR: 1 years: +40 %: 480 mins: Winter	32.22 3	30.38 6	30.459	0.073	7.8	0.083	0.000	7.8	235.154	OK
SWMH119	FSR: 1 years: +40 %: 120 mins: Winter	32.28 4	30.05 2	30.258	0.206	5.2	0.233	0.000	5.2	22.662	Surcharged
SWMH120	FSR: 1 years: +40 %: 15 mins: Summer	31.45 6	30.18 3	30.292	0.109	10.2	0.123	0.000	9.3	4.430	Surcharged
SWMH121	FSR: 1 years: +40 %: 15 mins: Winter	32.28 0	31.67 5	31.729	0.054	7.0	0.004	0.000	6.8	3.235	OK
SWMH122	FSR: 1 years: +40 %: 15 mins: Winter	32.27 9	29.78 4	29.847	0.063	14.4	0.071	0.000	14.1	7.153	OK
SWMH125	FSR: 1 years: +40 %: 120 mins: Winter	32.23 6	28.27 2	29.196	0.924	27.7	1.045	0.000	29.7	211.689	Surcharged
SWMH126	FSR: 1 years: +40 %: 120 mins: Winter	32.23 2	29.80 2	29.910	0.108	4.9	0.123	0.000	4.9	20.909	OK
SWMH129	FSR: 1 years: +40 %: 360 mins: Winter	32.21 4	26.64 0	28.869	2.229	37.1	3.938	0.000	37.3	660.155	Surcharged
SWMH130	FSR: 1 years: +40 %: 60 mins: Summer	32.20 9	27.74 9	28.918	1.169	49.8	2.065	0.000	38.8	136.663	Surcharged
SWMH131	FSR: 1 years: +40 %: 240 mins: Winter	32.09 4	27.83 0	28.622	0.792	32.7	0.896	0.000	32.7	444.990	Surcharged
SWMH132	FSR: 1 years: +40 %: 60 mins: Winter	32.04 7	30.22 2	30.351	0.129	8.6	0.229	0.000	8.6	21.521	OK
SWMH133	FSR: 1 years: +40 %: 120 mins: Winter	32.01 6	29.95 9	30.098	0.139	8.8	0.157	0.000	8.8	44.007	OK
SWMH135	FSR: 1 years: +40 %: 240 mins: Winter	31.96 9	27.78 0	28.638	0.858	32.7	0.970	0.000	32.8	445.042	Surcharged
SWMH136	FSR: 1 years: +40 %: 15 mins: Winter	31.78 1	30.31 9	30.396	0.077	21.6	0.087	0.000	21.3	9.956	OK
SWMH137	FSR: 1 years: +40 %: 240 mins: Winter	31.78 1	28.62 4	29.066	0.442	34.1	0.500	0.000	34.3	466.003	Surcharged
SWMH138	FSR: 1 years: +40 %: 15 mins: Winter	31.78 1	29.94 3	30.110	0.167	33.4	0.188	0.000	29.2	20.131	OK
SWMH139	FSR: 1 years: +40 %: 120 mins: Summer	31.77 3	27.68 8	28.698	1.010	1.6	1.143	0.000	2.1	1.575	Surcharged
SWMH140	FSR: 1 years: +40 %: 240 mins: Winter	31.76 9	27.43 0	28.716	1.286	8.0	1.454	0.000	8.0	73.883	Surcharged
SWMH141	FSR: 1 years: +40 %: 15 mins: Winter	31.75 4	28.35 5	28.410	0.055	13.5	0.063	0.000	12.6	6.649	OK
SWMH142	FSR: 1 years: +40 %: 360 mins: Winter	31.75 4	26.48 0	28.868	2.388	37.3	4.220	0.000	37.6	659.103	Surcharged
SWMH143	FSR: 1 years: +40 %: 240 mins: Winter	31.72 3	27.71 3	28.657	0.944	32.8	1.068	0.000	32.9	445.078	Surcharged
SWMH144	FSR: 1 years: +40 %: 240 mins: Winter	31.69 1	28.49 5	29.009	0.514	25.5	0.582	0.000	25.5	349.113	Surcharged
SWMH145	FSR: 1 years: +40 %: 15 mins: Winter	31.48 7	30.29 9	30.382	0.083	8.8	0.094	0.000	8.6	4.045	OK

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SWMH148	FSR: 1 years: +40 %: 120 mins: Winter	31.54 4	26.17 9	29.018	2.839	247.7	5.017	0.000	248.1	2030.905	Surcharged
SWMH149	FSR: 1 years: +40 %: 240 mins: Winter	31.54 3	27.67 3	28.670	0.997	33.4	1.128	0.000	33.7	460.965	Surcharged
SWMH150	FSR: 1 years: +40 %: 360 mins: Winter	31.54 2	28.55 0	28.981	0.431	35.2	0.488	0.000	36.0	630.011	Surcharged
SWMH151	FSR: 1 years: +40 %: 240 mins: Summer	31.50 2	27.51 3	28.661	1.148	33.5	1.298	0.000	35.4	402.670	Surcharged
SWMH152	FSR: 1 years: +40 %: 15 mins: Summer	31.46 6	30.56 0	30.560	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH153	FSR: 1 years: +40 %: 360 mins: Winter	31.46 6	26.37 6	28.868	2.492	37.8	4.403	0.000	38.0	664.964	Surcharged
SWMH154	FSR: 1 years: +40 %: 120 mins: Summer	31.37 7	27.27 0	28.697	1.427	37.5	1.614	0.000	38.9	249.349	Surcharged
SWMH155	FSR: 1 years: +40 %: 15 mins: Summer	31.36 5	30.76 0	30.760	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH156	FSR: 1 years: +40 %: 15 mins: Winter	31.30 0	30.28 7	30.340	0.053	8.1	0.060	0.000	7.3	3.736	OK
SWMH157	FSR: 1 years: +40 %: 480 mins: Winter	31.28 1	27.62 4	27.955	0.331	35.3	0.374	0.000	35.3	1196.762	Surcharged
SWMH160	FSR: 1 years: +40 %: 120 mins: Summer	31.19 3	27.20 5	28.699	1.493	38.9	1.689	0.000	39.8	237.027	Surcharged
SWMH163	FSR: 1 years: +40 %: 15 mins: Summer	31.17 3	30.41 3	30.413	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH164	FSR: 1 years: +40 %: 15 mins: Winter	31.05 3	30.19 4	30.260	0.066	7.4	0.074	0.000	7.1	3.410	OK
SWMH165	FSR: 1 years: +40 %: 15 mins: Winter	31.05 0	29.93 2	30.042	0.110	15.2	0.124	0.000	14.4	7.158	OK
SWMH166	FSR: 1 years: +40 %: 120 mins: Winter	30.97 8	25.49 0	28.786	3.296	151.9	5.824	0.000	141.6	1461.905	Surcharged
SWMH167	FSR: 1 years: +40 %: 120 mins: Winter	30.96 2	25.46 5	27.430	1.965	141.7	2.222	0.000	141.8	1450.473	Surcharged
SWMH168	FSR: 1 years: +40 %: 120 mins: Winter	30.94 6	25.87 7	28.910	3.033	249.6	5.360	0.000	248.7	2009.939	Surcharged
SWMH170	FSR: 1 years: +40 %: 60 mins: Winter	31.27 5	28.40 1	28.708	0.307	33.9	0.348	0.000	34.0	151.287	Surcharged
SWMH171	FSR: 1 years: +40 %: 960 mins: Winter	30.80 5	25.64 8	28.262	2.614	83.8	2.957	0.000	59.1	4658.492	Surcharged
SWMH173	FSR: 1 years: +40 %: 480 mins: Winter	30.71 3	27.39 6	27.759	0.363	35.3	0.410	0.000	35.3	1196.559	Surcharged
SWMH175	FSR: 1 years: +40 %: 15 mins: Summer	30.68 0	29.69 0	29.690	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH176	FSR: 1 years: +40 %: 15 mins: Summer	30.67 5	29.41 2	29.412	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH177	FSR: 1 years: +40 %: 15 mins: Summer	30.67 5	29.41 2	29.412	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH178	FSR: 1 years: +40 %: 120 mins: Winter	30.60 4	25.54 4	28.796	3.252	149.9	5.746	0.000	149.1	1189.744	Surcharged
SWMH179	FSR: 1 years: +40 %: 15 mins: Summer	30.52 5	29.92 0	29.920	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH180	FSR: 1 years: +40 %: 60 mins: Winter	30.67 5	28.63 8	28.814	0.176	26.2	0.198	0.000	26.8	129.439	OK
SWMH181	FSR: 1 years: +40 %: 120 mins: Winter	30.35 8	25.58 3	28.803	3.220	250.8	5.690	0.000	149.9	2004.796	Surcharged
SWMH186	FSR: 1 years: +40 %: 15 mins: Winter	30.05 2	29.01 8	29.089	0.071	25.5	0.126	0.000	25.0	11.777	OK
SWMH189	FSR: 1 years: +40 %: 60 mins: Winter	36.47 9	33.12 2	33.604	0.482	28.2	0.545	0.000	28.7	103.596	Surcharged

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SWMH190	FSR: 1 years: +40 %: 15 mins: Winter	32.91 7	30.09 4	30.184	0.090	13.1	0.102	0.000	12.5	6.556	OK
SWMH193	FSR: 1 years: +40 %: 60 mins: Winter	33.15 0	29.17 8	29.278	0.100	41.5	0.176	0.000	41.4	135.543	OK
SWMH194	FSR: 1 years: +40 %: 60 mins: Winter	33.45 2	28.67 4	29.218	0.544	44.5	0.961	0.000	44.4	142.027	OK
SWMH192	FSR: 1 years: +40 %: 30 mins: Winter	35.58 4	32.84 0	33.326	0.486	46.8	0.550	0.000	46.3	108.770	Surcharged
SWMH191	FSR: 1 years: +40 %: 60 mins: Winter	35.89 6	32.94 3	33.455	0.512	44.1	0.579	0.000	43.8	174.992	Surcharged
SWMH195	FSR: 1 years: +40 %: 60 mins: Winter	36.46 6	33.65 8	33.735	0.077	25.1	0.087	0.000	25.1	66.200	OK
SWMH196	FSR: 1 years: +40 %: 60 mins: Winter	37.01 2	33.84 0	33.968	0.128	21.1	0.145	0.000	21.1	56.782	OK
SWMH197	FSR: 1 years: +40 %: 15 mins: Winter	34.86 0	31.24 0	32.488	1.248	56.8	1.412	0.000	57.9	69.009	Surcharged
SWMH198	FSR: 1 years: +40 %: 30 mins: Winter	34.53 0	31.07 5	32.131	1.056	61.6	1.195	0.000	62.7	152.625	Surcharged
SWMH199	FSR: 1 years: +40 %: 15 mins: Winter	33.99 2	27.43 0	28.175	0.745	237.9	1.316	0.000	241.8	226.560	Surcharged
SWMH200	FSR: 1 years: +40 %: 30 mins: Winter	33.15 0	26.99 3	28.761	1.769	253.3	3.125	0.000	249.6	464.141	Surcharged
SWMH201	FSR: 1 years: +40 %: 120 mins: Winter	30.65 0	25.72 9	28.856	3.127	249.1	5.526	0.000	249.0	2001.771	Surcharged
SWMH202	FSR: 1 years: +40 %: 30 mins: Winter	33.96 9	27.83 0	28.847	1.017	73.3	1.797	0.000	72.4	127.427	Surcharged
SWMH203	FSR: 1 years: +40 %: 120 mins: Winter	31.27 8	26.04 3	28.968	2.925	248.8	5.168	0.000	249.2	2018.488	Surcharged
SWMH247	FSR: 1 years: +40 %: 15 mins: Winter	37.32 8	36.02 1	36.087	0.066	41.2	0.074	0.000	41.1	19.028	OK
SWMH250	FSR: 1 years: +40 %: 15 mins: Winter	37.58 7	36.02 1	36.076	0.055	31.8	0.063	0.000	31.7	15.004	OK
SWMH248	FSR: 1 years: +40 %: 15 mins: Winter	37.58 0	36.02 1	36.039	0.018	5.5	0.020	0.000	5.5	2.573	OK
SWMH249	FSR: 1 years: +40 %: 15 mins: Winter	37.64 7	37.04 2	37.081	0.039	5.6	0.003	0.000	5.5	2.573	OK
SWMH244	FSR: 1 years: +40 %: 60 mins: Winter	37.23 3	34.95 3	35.005	0.052	14.5	0.058	0.000	14.4	33.768	OK
SWMH242	FSR: 1 years: +40 %: 15 mins: Summer	37.21 0	36.50 5	36.505	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH239	FSR: 1 years: +40 %: 15 mins: Winter	38.06 6	37.05 7	37.083	0.026	8.3	0.030	0.000	8.2	3.819	OK
SWMH236	FSR: 1 years: +40 %: 15 mins: Winter	33.30 3	32.36 6	32.447	0.081	24.6	0.092	0.000	24.4	11.379	OK
SWMH230	FSR: 1 years: +40 %: 15 mins: Winter	30.65 7	27.96 0	27.990	0.030	2.7	0.034	0.000	2.5	1.235	OK
SWMH229	FSR: 1 years: +40 %: 120 mins: Summer	31.38 6	27.70 5	29.064	1.359	26.4	1.537	0.000	4.7	9.588	Surcharged
SWMH228	FSR: 1 years: +40 %: 60 mins: Summer	32.53 6	27.31 2	28.918	1.606	63.1	2.837	0.000	48.1	158.032	Surcharged
SWMH278	FSR: 1 years: +40 %: 15 mins: Winter	31.78 1	29.82 4	29.994	0.170	29.2	0.193	0.000	27.0	19.978	OK
SWMH277	FSR: 1 years: +40 %: 30 mins: Winter	32.04 8	29.74 5	29.911	0.166	26.8	0.187	0.000	26.6	32.543	Surcharged
SWMH272	FSR: 1 years: +40 %: 60 mins: Winter	33.80 3	31.08 1	31.488	0.407	45.5	0.460	0.000	45.5	149.736	Surcharged
Pumping Station	FSR: 1 years: +40 %: 120 mins: Winter	30.94 1	25.45 0	25.750	0.300	141.8	0.000	0.000	141.8	1449.366	OK
SWMH265	FSR: 1 years: +40 %: 15 mins: Winter	30.67 2	28.03 5	28.161	0.126	6.2	0.143	0.000	5.7	3.942	OK

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



FSR: 30 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Outflow

Junction	Storm Event	Cover Level (m)	Invert Level (m)	Max. Level (m)	Max. Depth (m)	Max. Inflow (L/s)	Max. Resident Volume (m³)	Max. Flooded Volume (m³)	Max. Outflow (L/s)	Total Discharge Volume (m³)	Status
SWMH001	FSR: 30 years: +40 %: 15 mins: Winter	37.861	36.426	36.550	0.124	25.8	0.140	0.000	24.8	12.237	OK
SWMH002	FSR: 30 years: +40 %: 15 mins: Winter	37.813	36.964	37.086	0.122	26.5	0.138	0.000	25.8	12.248	OK
SWMH003	FSR: 30 years: +40 %: 15 mins: Winter	37.560	36.955	37.101	0.146	11.1	0.010	0.000	10.0	5.123	Surcharged
SWMH004	FSR: 30 years: +40 %: 15 mins: Winter	37.553	36.727	36.856	0.129	29.6	0.146	0.000	28.6	14.141	OK
SWMH005	FSR: 30 years: +40 %: 30 mins: Winter	37.382	34.421	34.812	0.391	36.2	0.443	0.000	37.6	73.855	Surcharged
SWMH006	FSR: 30 years: +40 %: 15 mins: Winter	37.242	36.520	36.597	0.078	35.2	0.088	0.000	34.6	17.078	OK
SWMH008	FSR: 30 years: +40 %: 15 mins: Summer	36.756	35.356	35.356	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH009	FSR: 30 years: +40 %: 15 mins: Summer	36.499	35.188	35.188	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH010	FSR: 30 years: +40 %: 120 mins: Winter	36.266	33.047	34.515	1.468	50.9	1.660	0.000	51.2	527.373	Surcharged
SWMH011	FSR: 30 years: +40 %: 15 mins: Summer	36.241	35.020	35.020	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH012	FSR: 30 years: +40 %: 15 mins: Summer	35.983	34.852	34.852	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH013	FSR: 30 years: +40 %: 15 mins: Winter	35.955	34.140	34.838	0.698	61.5	0.790	0.000	58.2	40.795	Surcharged
SWMH014	FSR: 30 years: +40 %: 120 mins: Winter	35.832	33.297	34.283	0.986	56.1	1.115	0.000	37.4	388.819	Surcharged
SWMH015	FSR: 30 years: +40 %: 30 mins: Summer	35.728	34.572	35.297	0.725	11.3	0.820	0.000	9.8	11.683	Surcharged
SWMH016	FSR: 30 years: +40 %: 30 mins: Winter	35.726	32.535	34.071	1.536	12.7	1.737	0.000	9.4	12.771	Surcharged
SWMH017	FSR: 30 years: +40 %: 30 mins: Summer	35.725	34.690	35.294	0.604	8.4	0.683	0.000	7.2	9.733	Surcharged
SWMH018	FSR: 30 years: +40 %: 15 mins: Winter	35.723	34.541	35.360	0.819	47.4	0.926	0.000	25.2	27.363	Surcharged
SWMH020	FSR: 30 years: +40 %: 120 mins: Winter	35.625	34.865	34.945	0.080	11.4	0.006	0.000	11.3	80.165	OK
SWMH021	FSR: 30 years: +40 %: 120 mins: Winter	35.614	34.740	34.770	0.030	11.3	0.034	0.000	11.3	80.151	OK
SWMH022	FSR: 30 years: +40 %: 120 mins: Winter	35.549	32.480	33.875	1.395	15.0	1.578	0.000	15.5	101.874	Surcharged
SWMH023	FSR: 30 years: +40 %: 30 mins: Winter	35.438	34.678	34.861	0.183	11.2	0.013	0.000	11.2	25.587	Surcharged
SWMH024	FSR: 30 years: +40 %: 480 mins: Winter	35.388	31.500	33.022	1.522	25.7	1.722	0.000	26.6	536.187	Surcharged
SWMH025	FSR: 30 years: +40 %: 30 mins: Winter	35.326	34.440	34.540	0.100	26.2	0.113	0.000	27.1	53.584	OK
SWMH026	FSR: 30 years: +40 %: 30 mins: Winter	35.295	33.296	34.351	1.056	88.3	1.194	0.000	86.2	123.453	Surcharged
SWMH027	FSR: 30 years: +40 %: 30 mins: Summer	35.270	32.735	34.227	1.492	55.3	1.687	0.000	53.2	136.814	Surcharged

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				FJB	PJB	WL					
				Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ							

SWMH028	FSR: 30 years: +40 %: 15 mins: Summer	35.25 6	33.97 2	34.219	0.247	36.1	0.279	0.000	31.0	15.775	Surcharged
SWMH029	FSR: 30 years: +40 %: 15 mins: Summer	35.22 8	33.45 1	34.141	0.691	31.0	0.781	0.000	21.9	15.886	Surcharged
SWMH030	FSR: 30 years: +40 %: 15 mins: Winter	35.21 1	34.49 3	34.550	0.056	8.0	0.063	0.000	7.5	3.681	OK
SWMH031	FSR: 30 years: +40 %: 15 mins: Winter	35.21 1	34.60 6	34.672	0.066	8.1	0.005	0.000	8.0	3.737	OK
SWMH032	FSR: 30 years: +40 %: 120 mins: Winter	35.14 1	31.38 0	33.842	2.462	68.2	2.784	0.000	68.7	749.960	Surcharged
SWMH033	FSR: 30 years: +40 %: 30 mins: Summer	35.11 9	32.67 7	34.123	1.446	56.7	1.636	0.000	54.9	139.204	Surcharged
SWMH034	FSR: 30 years: +40 %: 30 mins: Winter	35.02 5	33.23 1	33.941	0.710	100.3	0.803	0.000	94.9	151.375	Surcharged
SWMH035	FSR: 30 years: +40 %: 30 mins: Summer	35.00 7	32.62 0	34.031	1.411	54.9	1.596	0.000	52.9	138.927	Surcharged
SWMH036	FSR: 30 years: +40 %: 15 mins: Winter	34.91 0	33.18 9	33.557	0.368	90.6	0.416	0.000	92.6	90.265	Surcharged
SWMH038	FSR: 30 years: +40 %: 15 mins: Winter	34.74 1	28.35 4	29.960	1.606	221.1	2.838	0.000	218.8	234.373	Surcharged
SWMH039	FSR: 30 years: +40 %: 15 mins: Winter	34.71 2	28.54 6	29.978	1.432	216.4	2.530	0.000	213.2	238.474	Surcharged
SWMH040	FSR: 30 years: +40 %: 15 mins: Winter	34.62 6	28.20 5	29.944	1.739	239.5	3.073	0.000	240.7	248.464	Surcharged
SWMH041	FSR: 30 years: +40 %: 60 mins: Winter	34.62 2	33.49 7	33.595	0.098	14.4	0.110	0.000	14.4	35.653	OK
SWMH043	FSR: 30 years: +40 %: 15 mins: Winter	34.57 8	28.69 1	29.994	1.303	219.3	2.302	0.000	216.4	245.624	Surcharged
SWMH044	FSR: 30 years: +40 %: 15 mins: Summer	34.55 0	32.62 4	33.597	0.973	71.2	1.101	0.000	61.1	42.261	Surcharged
SWMH045	FSR: 30 years: +40 %: 15 mins: Winter	34.45 2	28.81 9	30.010	1.191	212.3	2.104	0.000	210.7	248.586	Surcharged
SWMH046	FSR: 30 years: +40 %: 60 mins: Winter	34.38 7	33.44 9	33.493	0.044	30.5	0.050	0.000	30.5	90.310	OK
SWMH047	FSR: 30 years: +40 %: 15 mins: Winter	34.36 5	30.91 7	32.791	1.874	171.7	2.119	0.000	162.7	209.936	Surcharged
SWMH048	FSR: 30 years: +40 %: 60 mins: Winter	34.36 0	30.25 6	30.890	0.634	19.9	0.716	0.000	21.6	101.672	Surcharged
SWMH049	FSR: 30 years: +40 %: 480 mins: Winter	34.29 0	31.65 5	32.284	0.629	23.2	0.711	0.000	23.2	424.673	Surcharged
SWMH050	FSR: 30 years: +40 %: 30 mins: Winter	34.23 8	30.58 2	31.184	0.602	185.7	0.681	0.000	191.5	467.300	Surcharged
SWMH051	FSR: 30 years: +40 %: 60 mins: Winter	34.21 9	31.67 5	33.522	1.847	51.7	2.089	0.000	52.3	86.305	Surcharged
SWMH052	FSR: 30 years: +40 %: 15 mins: Summer	34.46 2	32.72 9	32.729	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH053	FSR: 30 years: +40 %: 15 mins: Winter	34.18 6	27.63 0	29.905	2.275	433.2	4.020	0.000	403.0	319.583	Surcharged
SWMH054	FSR: 30 years: +40 %: 120 mins: Winter	34.18 5	30.32 8	30.868	0.540	20.4	0.611	0.000	21.0	208.742	Surcharged
SWMH055	FSR: 30 years: +40 %: 15 mins: Winter	34.11 9	30.79 4	32.201	1.407	167.1	1.591	0.000	167.9	209.151	Surcharged
SWMH056	FSR: 30 years: +40 %: 360 mins: Winter	34.10 6	31.70 0	32.287	0.587	22.8	0.664	0.000	22.9	377.905	Surcharged
SWMH058	FSR: 30 years: +40 %: 30 mins: Winter	34.03 2	30.71 0	31.792	1.082	181.6	1.224	0.000	174.9	464.047	Surcharged
SWMH059	FSR: 30 years: +40 %: 15 mins: Summer	34.03 1	32.87 5	33.603	0.728	7.2	0.823	0.000	5.7	3.157	Surcharged
SWMH061	FSR: 30 years: +40 %: 15 mins: Winter	33.87 2	33.27 2	33.681	0.409	7.6	0.116	0.000	7.6	3.529	Flood Risk

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			Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				

SWMH062	FSR: 30 years: +40 %: 15 mins: Summer	33.87 0	31.12 9	31.619	0.490	9.7	0.554	0.000	5.3	5.767	Surcharged
SWMH063	FSR: 30 years: +40 %: 15 mins: Winter	33.81 1	28.07 5	29.905	1.830	183.0	3.233	0.000	168.8	95.826	Surcharged
SWMH064	FSR: 30 years: +40 %: 960 mins: Winter	33.80 0	29.33 5	31.316	1.981	2.0	2.240	0.000	1.8	187.854	Surcharged
SWMH065	FSR: 30 years: +40 %: 120 mins: Winter	33.83 3	30.96 6	31.854	0.888	49.1	1.005	0.000	49.1	460.922	Surcharged
SWMH066	FSR: 30 years: +40 %: 15 mins: Summer	33.76 4	32.66 5	32.665	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH067	FSR: 30 years: +40 %: 15 mins: Summer	33.76 4	32.55 2	32.552	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH068	FSR: 30 years: +40 %: 15 mins: Winter	33.76 0	32.10 5	32.463	0.358	29.2	0.405	0.000	23.7	13.483	Surcharged
SWMH069	FSR: 30 years: +40 %: 15 mins: Winter	33.76 0	31.34 7	31.768	0.421	87.2	0.476	0.000	84.9	44.645	Surcharged
SWMH071	FSR: 30 years: +40 %: 15 mins: Winter	33.72 0	32.42 9	32.722	0.293	38.5	0.331	0.000	37.4	17.780	Surcharged
SWMH072	FSR: 30 years: +40 %: 60 mins: Winter	33.72 0	31.22 9	31.849	0.620	6.1	0.701	0.000	5.8	24.693	Surcharged
SWMH073	FSR: 30 years: +40 %: 15 mins: Summer	33.71 9	32.42 0	32.420	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH074	FSR: 30 years: +40 %: 480 mins: Winter	33.64 3	31.06 0	32.655	1.595	6.2	1.804	0.000	3.1	154.477	Surcharged
SWMH075	FSR: 30 years: +40 %: 15 mins: Winter	33.53 2	31.86 0	32.079	0.219	28.6	0.248	0.000	28.1	19.322	Surcharged
SWMH076	FSR: 30 years: +40 %: 480 mins: Winter	33.56 7	30.92 5	31.287	0.362	3.0	0.409	0.000	3.0	139.965	Surcharged
SWMH077	FSR: 30 years: +40 %: 15 mins: Winter	33.56 6	27.20 9	29.829	2.620	468.7	4.629	0.000	403.4	333.894	Surcharged
SWMH078	FSR: 30 years: +40 %: 15 mins: Winter	33.56 0	28.49 3	29.905	1.412	146.0	2.495	0.000	137.5	108.159	Surcharged
SWMH079	FSR: 30 years: +40 %: 15 mins: Winter	33.45 6	32.38 9	32.454	0.064	49.9	0.073	0.000	49.6	33.602	OK
SWMH080	FSR: 30 years: +40 %: 15 mins: Summer	33.44 5	31.01 1	31.616	0.605	12.2	0.685	0.000	6.4	5.934	Surcharged
SWMH081	FSR: 30 years: +40 %: 30 mins: Winter	33.33 7	32.57 7	32.663	0.086	14.0	0.006	0.000	14.0	23.243	OK
SWMH082	FSR: 30 years: +40 %: 15 mins: Winter	33.31 7	31.91 6	31.977	0.061	5.5	0.069	0.000	5.6	3.855	OK
SWMH085	FSR: 30 years: +40 %: 15 mins: Winter	33.24 4	32.32 5	32.653	0.328	36.7	0.370	0.000	28.6	19.717	Surcharged
SWMH086	FSR: 30 years: +40 %: 120 mins: Winter	34.04 8	30.48 5	30.924	0.439	20.4	0.496	0.000	20.4	208.893	Surcharged
SWMH087	FSR: 30 years: +40 %: 15 mins: Winter	33.22 5	32.39 6	33.225	0.829	69.3	0.984	0.046	63.2	32.050	Flood
SWMH089	FSR: 30 years: +40 %: 15 mins: Winter	33.18 9	32.42 9	32.645	0.216	4.8	0.015	0.000	4.8	2.823	Surcharged
SWMH090	FSR: 30 years: +40 %: 15 mins: Winter	33.08 0	32.47 5	32.518	0.043	10.3	0.003	0.000	10.3	4.778	OK
SWMH091	FSR: 30 years: +40 %: 15 mins: Summer	33.07 5	32.07 5	32.189	0.114	15.2	0.129	0.000	14.6	6.600	OK
SWMH092	FSR: 30 years: +40 %: 30 mins: Winter	33.07 2	29.33 8	30.586	1.248	102.7	2.205	0.000	99.7	180.236	Surcharged
SWMH093	FSR: 30 years: +40 %: 15 mins: Winter	33.05 5	32.45 5	32.497	0.042	7.9	0.003	0.000	7.9	3.665	OK
SWMH094	FSR: 30 years: +40 %: 15 mins: Summer	33.02 6	31.93 5	32.062	0.126	32.5	0.143	0.000	27.1	14.077	OK
SWMH095	FSR: 30 years: +40 %: 15 mins: Winter	33.01 0	26.92 0	29.738	2.818	458.3	4.980	0.000	418.3	342.481	Surcharged
SWMH096	FSR: 30 years: +40 %: 480 mins: Winter	33.00 6	30.95 4	32.032	1.078	5.3	1.220	0.000	5.3	251.889	Surcharged

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				FJB	PJB	WL					
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SWMH097	FSR: 30 years: +40 %: 30 mins: Winter	32.95 9	29.49 5	30.587	1.092	76.0	1.930	0.000	74.6	124.169	Surcharged
SWMH098	FSR: 30 years: +40 %: 15 mins: Winter	32.84 2	29.94 6	31.457	1.511	43.8	1.709	0.000	41.8	30.593	Surcharged
SWMH099	FSR: 30 years: +40 %: 360 mins: Winter	32.75 6	28.97 0	29.973	1.003	51.5	1.134	0.000	40.3	814.328	Surcharged
SWMH100	FSR: 30 years: +40 %: 15 mins: Summer	32.72 1	26.77 0	29.466	2.696	435.2	4.764	0.000	403.0	286.309	Surcharged
SWMH101	FSR: 30 years: +40 %: 30 mins: Winter	32.68 6	30.14 9	30.592	0.443	42.5	0.782	0.000	46.7	71.403	OK
SWMH102	FSR: 30 years: +40 %: 15 mins: Summer	32.68 3	29.62 8	30.840	1.212	61.4	1.371	0.000	55.7	40.221	Surcharged
SWMH103	FSR: 30 years: +40 %: 15 mins: Winter	32.52 4	29.30 9	30.407	1.098	84.5	1.242	0.000	76.3	58.976	Surcharged
SWMH104	FSR: 30 years: +40 %: 60 mins: Winter	32.51 0	29.54 6	30.833	1.287	27.5	1.455	0.000	27.7	62.292	Surcharged
SWMH106	FSR: 30 years: +40 %: 30 mins: Summer	32.48 9	29.24 2	30.197	0.955	85.0	1.080	0.000	87.1	79.222	Surcharged
SWMH107	FSR: 30 years: +40 %: 15 mins: Winter	32.44 9	29.16 2	29.737	0.575	109.4	0.650	0.000	108.4	75.119	Surcharged
SWMH108	FSR: 30 years: +40 %: 15 mins: Summer	32.44 5	26.61 6	29.427	2.811	524.3	4.967	0.000	452.6	339.883	Surcharged
SWMH109	FSR: 30 years: +40 %: 15 mins: Winter	32.36 3	30.28 3	31.369	1.086	93.3	1.228	0.000	55.0	50.352	Surcharged
SWMH110	FSR: 30 years: +40 %: 360 mins: Winter	32.35 0	31.19 0	31.646	0.456	2.0	0.516	0.000	0.7	0.559	Surcharged
SWMH114	FSR: 30 years: +40 %: 480 mins: Winter	32.22 3	30.38 6	30.529	0.143	23.7	0.162	0.000	23.7	504.917	OK
SWMH119	FSR: 30 years: +40 %: 60 mins: Winter	32.28 4	30.05 2	30.569	0.517	11.7	0.585	0.000	11.6	34.610	Surcharged
SWMH120	FSR: 30 years: +40 %: 15 mins: Winter	31.45 6	30.18 3	30.920	0.737	26.3	0.833	0.000	22.3	12.133	Surcharged
SWMH121	FSR: 30 years: +40 %: 15 mins: Summer	32.28 0	31.67 5	31.764	0.089	16.3	0.006	0.000	14.1	7.054	OK
SWMH122	FSR: 30 years: +40 %: 15 mins: Winter	32.27 9	29.78 4	29.887	0.103	30.2	0.117	0.000	29.7	17.506	OK
SWMH125	FSR: 30 years: +40 %: 360 mins: Winter	32.23 6	28.27 2	30.010	1.738	33.6	1.965	0.000	34.3	733.909	Surcharged
SWMH126	FSR: 30 years: +40 %: 120 mins: Winter	32.23 2	29.80 2	30.642	0.840	13.5	0.950	0.000	13.6	109.543	Surcharged
SWMH129	FSR: 30 years: +40 %: 360 mins: Winter	32.21 4	26.64 0	29.747	3.107	44.7	5.489	0.000	44.9	1166.722	Surcharged
SWMH130	FSR: 30 years: +40 %: 15 mins: Winter	32.20 9	27.74 9	29.733	1.984	81.3	3.506	0.000	74.9	34.894	Surcharged
SWMH131	FSR: 30 years: +40 %: 1440 mins: Winter	32.09 4	27.83 0	29.119	1.289	32.1	1.458	0.000	32.1	2080.925	Surcharged
SWMH132	FSR: 30 years: +40 %: 60 mins: Winter	32.04 7	30.22 2	30.866	0.644	26.5	1.137	0.000	26.9	57.632	Surcharged
SWMH133	FSR: 30 years: +40 %: 120 mins: Winter	32.01 6	29.95 9	30.413	0.454	12.1	0.514	0.000	12.1	96.346	Surcharged
SWMH135	FSR: 30 years: +40 %: 1440 mins: Winter	31.96 9	27.78 0	29.127	1.346	32.1	1.523	0.000	32.2	2082.452	Surcharged
SWMH136	FSR: 30 years: +40 %: 15 mins: Winter	31.78 1	30.31 9	30.687	0.368	52.7	0.416	0.000	46.9	24.344	Surcharged
SWMH137	FSR: 30 years: +40 %: 360 mins: Winter	31.78 1	28.62 4	29.664	1.040	43.7	1.176	0.000	43.8	1134.454	Surcharged
SWMH138	FSR: 30 years: +40 %: 15 mins: Winter	31.78 1	29.94 3	30.594	0.651	55.0	0.736	0.000	50.9	42.240	Surcharged
SWMH139	FSR: 30 years: +40 %: 15 mins: Summer	31.77 3	27.68 8	29.084	1.396	0.2	1.579	0.000	2.6	0.162	Surcharged

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				FJB	PJB	WL					
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SWMH140	FSR: 30 years: +40 %: 120 mins: Winter	31.76 9	27.43 0	30.030	2.600	14.9	2.940	0.000	15.4	126.398	Surcharged
SWMH141	FSR: 30 years: +40 %: 15 mins: Winter	31.75 4	28.35 5	29.733	1.378	33.3	1.559	0.000	31.6	13.899	Surcharged
SWMH142	FSR: 30 years: +40 %: 360 mins: Winter	31.75 4	26.48 0	29.747	3.267	44.9	5.772	0.000	45.1	1129.206	Surcharged
SWMH143	FSR: 30 years: +40 %: 1440 mins: Winter	31.72 3	27.71 3	29.136	1.423	32.2	1.610	0.000	32.2	2083.964	Surcharged
SWMH144	FSR: 30 years: +40 %: 360 mins: Winter	31.69 1	28.49 5	29.465	0.970	33.1	1.097	0.000	33.1	632.943	Surcharged
SWMH145	FSR: 30 years: +40 %: 15 mins: Winter	31.48 7	30.29 9	30.491	0.192	21.4	0.218	0.000	20.8	9.892	Surcharged
SWMH148	FSR: 30 years: +40 %: 15 mins: Summer	31.54 4	26.17 9	29.317	3.138	499.3	5.545	0.000	413.2	356.597	Surcharged
SWMH149	FSR: 30 years: +40 %: 1440 mins: Winter	31.54 3	27.67 3	29.144	1.471	32.2	1.664	0.000	32.2	2131.969	Surcharged
SWMH150	FSR: 30 years: +40 %: 360 mins: Winter	31.54 2	28.55 0	29.699	1.149	43.9	1.299	0.000	44.7	1166.401	Surcharged
SWMH151	FSR: 30 years: +40 %: 1440 mins: Winter	31.50 2	27.51 3	29.162	1.650	32.2	1.866	0.000	32.3	2099.115	Surcharged
SWMH152	FSR: 30 years: +40 %: 15 mins: Summer	31.46 6	30.56 0	30.560	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH153	FSR: 30 years: +40 %: 360 mins: Winter	31.46 6	26.37 6	29.747	3.371	45.1	5.956	0.000	45.3	1132.776	Surcharged
SWMH154	FSR: 30 years: +40 %: 1440 mins: Winter	31.37 7	27.27 0	29.185	1.915	32.4	2.166	0.000	32.4	2198.622	Surcharged
SWMH155	FSR: 30 years: +40 %: 15 mins: Summer	31.36 5	30.76 0	30.760	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH156	FSR: 30 years: +40 %: 15 mins: Winter	31.30 0	30.28 7	30.378	0.091	19.8	0.103	0.000	18.2	8.773	OK
SWMH157	FSR: 30 years: +40 %: 240 mins: Winter	31.28 1	27.62 4	28.457	0.833	45.1	0.942	0.000	45.1	971.851	Surcharged
SWMH160	FSR: 30 years: +40 %: 1440 mins: Winter	31.19 3	27.20 5	29.188	1.983	32.4	2.242	0.000	32.5	2067.318	Surcharged
SWMH163	FSR: 30 years: +40 %: 15 mins: Summer	31.17 3	30.41 3	30.413	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH164	FSR: 30 years: +40 %: 15 mins: Winter	31.05 3	30.19 4	30.634	0.440	18.1	0.497	0.000	13.7	8.332	Surcharged
SWMH165	FSR: 30 years: +40 %: 15 mins: Winter	31.05 0	29.93 2	30.464	0.532	33.6	0.601	0.000	30.2	17.511	Surcharged
SWMH166	FSR: 30 years: +40 %: 60 mins: Winter	30.97 8	25.49 0	30.067	4.577	191.5	8.087	0.000	169.2	945.198	Surcharged
SWMH167	FSR: 30 years: +40 %: 60 mins: Winter	30.96 2	25.46 5	28.146	2.681	169.2	3.032	0.000	169.2	914.853	Surcharged
SWMH168	FSR: 30 years: +40 %: 60 mins: Winter	30.94 6	25.87 7	30.250	4.373	325.5	7.727	0.000	323.2	1585.959	Surcharged
SWMH170	FSR: 30 years: +40 %: 30 mins: Winter	31.27 5	28.40 1	28.988	0.587	54.4	0.663	0.000	54.0	122.297	Surcharged
SWMH171	FSR: 30 years: +40 %: 1440 mins: Winter	30.80 5	25.64 8	29.212	3.564	90.7	4.031	0.000	70.7	7605.860	Surcharged
SWMH173	FSR: 30 years: +40 %: 240 mins: Winter	30.71 3	27.39 6	28.285	0.889	45.1	1.005	0.000	45.1	969.584	Surcharged
SWMH175	FSR: 30 years: +40 %: 15 mins: Summer	30.68 0	29.69 0	29.690	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH176	FSR: 30 years: +40 %: 15 mins: Summer	30.67 5	29.41 2	29.412	0.000	0.0	0.000	0.000	0.0	0.000	OK

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SWMH177	FSR: 30 years: +40 %: 15 mins: Summer	30.67 5	29.41 2	29.412	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH178	FSR: 30 years: +40 %: 30 mins: Winter	30.60 4	25.54 4	29.790	4.246	204.1	7.504	0.000	193.1	446.805	Surcharged
SWMH179	FSR: 30 years: +40 %: 15 mins: Summer	30.52 5	29.92 0	29.920	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH180	FSR: 30 years: +40 %: 120 mins: Winter	30.67 5	28.63 8	29.087	0.449	39.3	0.508	0.000	39.4	419.406	Surcharged
SWMH181	FSR: 30 years: +40 %: 30 mins: Winter	30.35 8	25.58 3	29.802	4.219	318.4	7.455	0.000	204.1	777.879	Surcharged
SWMH186	FSR: 30 years: +40 %: 15 mins: Summer	30.05 2	29.01 8	29.156	0.138	59.3	0.245	0.000	57.1	25.723	OK
SWMH189	FSR: 30 years: +40 %: 120 mins: Winter	36.47 9	33.12 2	34.515	1.393	45.9	1.575	0.000	38.8	403.990	Surcharged
SWMH190	FSR: 30 years: +40 %: 15 mins: Winter	32.91 7	30.09 4	31.543	1.449	24.9	1.638	0.000	27.4	16.205	Surcharged
SWMH193	FSR: 30 years: +40 %: 30 mins: Summer	33.15 0	29.17 8	30.316	1.138	103.3	2.011	0.000	107.5	175.824	Surcharged
SWMH194	FSR: 30 years: +40 %: 15 mins: Winter	33.45 2	28.67 4	29.908	1.234	114.3	2.180	0.000	105.7	88.629	Surcharged
SWMH192	FSR: 30 years: +40 %: 15 mins: Summer	35.58 4	32.84 0	34.303	1.463	61.3	1.655	0.000	52.3	59.537	Surcharged
SWMH191	FSR: 30 years: +40 %: 120 mins: Winter	35.89 6	32.94 3	34.412	1.469	51.2	1.662	0.000	51.4	535.220	Surcharged
SWMH195	FSR: 30 years: +40 %: 60 mins: Summer	36.46 6	33.65 8	34.726	1.068	38.5	1.208	0.000	38.8	147.108	Surcharged
SWMH196	FSR: 30 years: +40 %: 30 mins: Winter	37.01 2	33.84 0	34.790	0.950	37.6	1.075	0.000	38.2	77.088	Surcharged
SWMH197	FSR: 30 years: +40 %: 120 mins: Winter	34.86 0	31.24 0	33.468	2.229	68.7	2.520	0.000	69.0	748.127	Surcharged
SWMH198	FSR: 30 years: +40 %: 30 mins: Winter	34.53 0	31.07 5	33.231	2.157	79.2	2.439	0.000	79.8	210.913	Surcharged
SWMH199	FSR: 30 years: +40 %: 15 mins: Winter	33.99 2	27.43 0	29.877	2.447	410.9	4.324	0.000	383.6	302.037	Surcharged
SWMH200	FSR: 30 years: +40 %: 15 mins: Winter	33.15 0	26.99 3	29.768	2.776	422.9	4.904	0.000	406.7	329.215	Surcharged
SWMH201	FSR: 30 years: +40 %: 60 mins: Winter	30.65 0	25.72 9	30.172	4.443	325.9	7.851	0.000	323.6	1577.320	Surcharged
SWMH202	FSR: 30 years: +40 %: 15 mins: Winter	33.96 9	27.83 0	29.904	2.074	178.5	3.666	0.000	161.7	82.242	Surcharged
SWMH203	FSR: 30 years: +40 %: 60 mins: Winter	31.27 8	26.04 3	30.334	4.291	325.1	7.582	0.000	322.8	1595.071	Surcharged
SWMH247	FSR: 30 years: +40 %: 15 mins: Winter	37.32 8	36.02 1	36.155	0.134	100.8	0.152	0.000	100.2	46.523	OK
SWMH250	FSR: 30 years: +40 %: 15 mins: Winter	37.58 7	36.02 1	36.123	0.102	77.8	0.115	0.000	77.3	36.714	OK
SWMH248	FSR: 30 years: +40 %: 15 mins: Winter	37.58 0	36.02 1	36.049	0.028	13.5	0.031	0.000	13.4	6.298	OK
SWMH249	FSR: 30 years: +40 %: 15 mins: Winter	37.64 7	37.04 2	37.110	0.068	13.6	0.005	0.000	13.5	6.299	OK
SWMH244	FSR: 30 years: +40 %: 30 mins: Winter	37.23 3	34.95 3	35.076	0.123	32.4	0.139	0.000	32.5	60.286	OK
SWMH242	FSR: 30 years: +40 %: 15 mins: Summer	37.21 0	36.50 5	36.505	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH239	FSR: 30 years: +40 %: 15 mins: Winter	38.06 6	37.05 7	37.101	0.044	20.2	0.049	0.000	20.1	9.337	OK
SWMH236	FSR: 30 years: +40 %: 15 mins: Winter	33.30 3	32.36 6	32.893	0.527	60.3	0.596	0.000	56.3	27.824	Surcharged
SWMH230	FSR: 30 years: +40 %: 15 mins: Winter	30.65 7	27.96 0	28.007	0.047	6.6	0.054	0.000	6.2	3.028	OK
SWMH229	FSR: 30 years: +40 %: 30 mins: Winter	31.38 6	27.70 5	30.385	2.680	7.4	3.031	0.000	19.0	7.362	Surcharged

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Report Details: Type: Junctions Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB	Approved By: WL		
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				

SWMH228	FSR: 30 years: +40 %: 30 mins: Winter	32.53 6	27.31 2	30.385	3.073	66.7	5.431	0.000	58.8	84.761	Surcharged
SWMH278	FSR: 30 years: +40 %: 15 mins: Winter	31.78 1	29.82 4	30.325	0.501	50.9	0.567	0.000	48.3	41.947	Surcharged
SWMH277	FSR: 30 years: +40 %: 15 mins: Winter	32.04 8	29.74 5	30.151	0.406	48.3	0.459	0.000	46.6	41.780	Surcharged
SWMH272	FSR: 30 years: +40 %: 120 mins: Winter	33.80 3	31.08 1	31.853	0.772	49.0	0.873	0.000	49.1	444.087	Surcharged
Pumping Station	FSR: 30 years: +40 %: 60 mins: Winter	30.94 1	25.45 0	25.750	0.300	169.2	0.000	0.000	169.2	913.666	OK
SWMH265	FSR: 30 years: +40 %: 15 mins: Winter	30.67 2	28.03 5	28.809	0.774	10.9	0.875	0.000	10.0	3.951	Surcharged

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FSR: 100 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Outflow

Junction	Storm Event	Cover Level (m)	Invert Level (m)	Max. Level (m)	Max. Depth (m)	Max. Inflow (L/s)	Max. Resident Volume (m³)	Max. Flooded Volume (m³)	Max. Outflow (L/s)	Total Discharge Volume (m³)	Status
SWMH001	FSR: 100 years: +40 %: 15 mins: Winter	37.86 1	36.42 6	36.605	0.179	29.7	0.202	0.000	27.5	15.828	Surcharged
SWMH002	FSR: 100 years: +40 %: 15 mins: Winter	37.81 3	36.96 4	37.252	0.288	34.2	0.326	0.000	29.7	15.778	Surcharged
SWMH003	FSR: 100 years: +40 %: 15 mins: Winter	37.56 0	36.95 5	37.199	0.244	14.3	0.017	0.000	12.8	6.614	Surcharged
SWMH004	FSR: 100 years: +40 %: 15 mins: Winter	37.55 3	36.72 7	36.879	0.152	38.0	0.172	0.000	37.2	18.256	OK
SWMH005	FSR: 100 years: +40 %: 30 mins: Summer	37.38 2	34.42 1	34.908	0.487	37.6	0.551	0.000	38.8	81.262	Surcharged
SWMH006	FSR: 100 years: +40 %: 15 mins: Winter	37.24 2	36.52 0	36.610	0.090	45.8	0.102	0.000	44.9	22.078	OK
SWMH008	FSR: 100 years: +40 %: 15 mins: Summer	36.75 6	35.35 6	35.356	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH009	FSR: 100 years: +40 %: 15 mins: Summer	36.49 9	35.18 8	35.188	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH010	FSR: 100 years: +40 %: 240 mins: Winter	36.26 6	33.04 7	35.001	1.954	54.4	2.210	0.000	54.5	936.746	Surcharged
SWMH011	FSR: 100 years: +40 %: 15 mins: Summer	36.24 1	35.02 0	35.020	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH012	FSR: 100 years: +40 %: 15 mins: Summer	35.98 3	34.85 2	34.852	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH013	FSR: 100 years: +40 %: 15 mins: Winter	35.95 5	34.14 0	35.140	1.000	75.8	1.131	0.000	71.7	51.098	Surcharged
SWMH014	FSR: 100 years: +40 %: 240 mins: Summer	35.83 2	33.29 7	34.951	1.654	58.4	1.870	0.000	37.6	520.872	Surcharged
SWMH015	FSR: 100 years: +40 %: 15 mins: Winter	35.72 8	34.57 2	35.724	1.152	16.8	1.303	0.000	17.5	11.884	Flood Risk
SWMH016	FSR: 100 years: +40 %: 15 mins: Winter	35.72 6	32.53 5	34.306	1.771	12.4	2.003	0.000	10.4	11.349	Surcharged
SWMH017	FSR: 100 years: +40 %: 15 mins: Winter	35.72 5	34.69 0	35.725	1.035	18.4	1.174	0.003	13.0	8.781	Flood
SWMH018	FSR: 100 years: +40 %: 15 mins: Winter	35.72 3	34.54 1	35.725	1.184	61.1	3.607	2.270	30.1	34.303	Flood
SWMH020	FSR: 100 years: +40 %: 120 mins: Winter	35.62 5	34.86 5	34.952	0.087	12.8	0.006	0.000	12.8	103.704	OK
SWMH021	FSR: 100 years: +40 %: 120 mins: Winter	35.61 4	34.74 0	34.772	0.032	12.8	0.036	0.000	12.8	103.681	OK

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				FJB	PJB	WL					
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SWMH022	FSR: 100 years: +40 %: 120 mins: Winter	35.54 9	32.48 0	34.305	1.825	17.2	2.064	0.000	17.6	132.561	Surcharged
SWMH023	FSR: 100 years: +40 %: 30 mins: Winter	35.43 8	34.67 8	34.950	0.272	12.6	0.019	0.000	12.6	30.407	Surcharged
SWMH024	FSR: 100 years: +40 %: 480 mins: Winter	35.38 8	31.50 0	33.541	2.041	27.0	2.308	0.000	27.9	694.934	Surcharged
SWMH025	FSR: 100 years: +40 %: 30 mins: Winter	35.32 6	34.44 0	34.758	0.318	32.4	0.359	0.000	34.8	65.240	Surcharged
SWMH026	FSR: 100 years: +40 %: 30 mins: Winter	35.29 5	33.29 6	34.720	1.425	96.1	1.611	0.000	94.7	156.133	Surcharged
SWMH027	FSR: 100 years: +40 %: 15 mins: Winter	35.27 0	32.73 5	34.537	1.802	69.7	2.038	0.000	60.1	63.320	Surcharged
SWMH028	FSR: 100 years: +40 %: 15 mins: Winter	35.25 6	33.97 2	34.765	0.793	39.5	0.897	0.000	29.8	23.390	Surcharged
SWMH029	FSR: 100 years: +40 %: 15 mins: Winter	35.22 8	33.45 1	34.655	1.204	29.8	1.362	0.000	27.5	22.864	Surcharged
SWMH030	FSR: 100 years: +40 %: 15 mins: Summer	35.21 1	34.49 3	34.675	0.181	9.8	0.205	0.000	11.3	4.657	OK
SWMH031	FSR: 100 years: +40 %: 15 mins: Winter	35.21 1	34.60 6	34.794	0.188	10.4	0.013	0.000	10.3	4.860	Surcharged
SWMH032	FSR: 100 years: +40 %: 240 mins: Winter	35.14 1	31.38 0	34.085	2.705	76.9	3.059	0.000	77.2	1454.970	Surcharged
SWMH033	FSR: 100 years: +40 %: 15 mins: Winter	35.11 9	32.67 7	34.459	1.782	67.2	2.015	0.000	58.3	64.887	Surcharged
SWMH034	FSR: 100 years: +40 %: 30 mins: Summer	35.02 5	33.23 1	34.157	0.926	97.1	1.047	0.000	96.2	173.574	Surcharged
SWMH035	FSR: 100 years: +40 %: 240 mins: Winter	35.00 7	32.62 0	34.225	1.605	56.9	1.815	0.000	57.1	991.519	Surcharged
SWMH036	FSR: 100 years: +40 %: 15 mins: Winter	34.91 0	33.18 9	33.771	0.582	95.7	0.658	0.000	96.6	108.734	Surcharged
SWMH038	FSR: 100 years: +40 %: 15 mins: Winter	34.74 1	28.35 4	30.594	2.240	253.8	3.958	0.000	250.5	251.467	Surcharged
SWMH039	FSR: 100 years: +40 %: 15 mins: Winter	34.71 2	28.54 6	30.613	2.067	247.2	3.652	0.000	243.6	255.559	Surcharged
SWMH040	FSR: 100 years: +40 %: 15 mins: Winter	34.62 6	28.20 5	30.577	2.372	275.4	4.191	0.000	272.8	268.402	Surcharged
SWMH041	FSR: 100 years: +40 %: 60 mins: Winter	34.62 2	33.49 7	33.610	0.113	18.6	0.128	0.000	18.5	47.805	OK
SWMH043	FSR: 100 years: +40 %: 15 mins: Winter	34.57 8	28.69 1	30.628	1.937	250.4	3.423	0.000	247.2	263.393	Surcharged
SWMH044	FSR: 100 years: +40 %: 15 mins: Summer	34.55 0	32.62 4	33.812	1.188	91.7	1.343	0.000	62.6	55.693	Surcharged
SWMH045	FSR: 100 years: +40 %: 15 mins: Winter	34.45 2	28.81 9	30.643	1.824	241.0	3.224	0.000	239.2	266.824	Surcharged
SWMH046	FSR: 100 years: +40 %: 60 mins: Winter	34.38 7	33.44 9	33.498	0.049	37.3	0.055	0.000	37.2	119.334	OK

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SWMH047	FSR: 100 years: +40 %: 15 mins: Winter	34.36 5	30.91 7	32.950	2.033	183.7	2.299	0.000	168.7	232.748	Surcharged
SWMH048	FSR: 100 years: +40 %: 240 mins: Winter	34.36 0	30.25 6	30.982	0.726	33.2	0.821	0.000	33.4	454.872	Surcharged
SWMH049	FSR: 100 years: +40 %: 480 mins: Winter	34.29 0	31.65 5	32.427	0.772	25.5	0.873	0.000	25.5	570.110	Surcharged
SWMH050	FSR: 100 years: +40 %: 15 mins: Winter	34.23 8	30.58 2	31.164	0.582	206.1	0.659	0.000	203.9	252.711	Surcharged
SWMH051	FSR: 100 years: +40 %: 60 mins: Winter	34.21 9	31.67 5	33.673	1.998	59.9	2.259	0.000	60.3	109.392	Surcharged
SWMH052	FSR: 100 years: +40 %: 15 mins: Summer	34.46 2	32.72 9	32.729	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH053	FSR: 100 years: +40 %: 30 mins: Summer	34.18 6	27.63 0	30.896	3.266	395.9	5.770	0.000	371.9	674.322	Surcharged
SWMH054	FSR: 100 years: +40 %: 240 mins: Winter	34.18 5	30.32 8	31.021	0.693	33.0	0.783	0.000	33.2	454.975	Surcharged
SWMH055	FSR: 100 years: +40 %: 15 mins: Winter	34.11 9	30.79 4	32.323	1.529	174.4	1.729	0.000	175.3	227.327	Surcharged
SWMH056	FSR: 100 years: +40 %: 480 mins: Winter	34.10 6	31.70 0	32.427	0.727	25.3	0.823	0.000	25.3	545.197	Surcharged
SWMH058	FSR: 100 years: +40 %: 30 mins: Summer	34.03 2	30.71 0	32.003	1.293	193.8	1.462	0.000	188.8	488.016	Surcharged
SWMH059	FSR: 100 years: +40 %: 30 mins: Winter	34.03 1	32.87 5	33.880	1.005	12.6	1.137	0.000	12.6	6.297	Flood Risk
SWMH061	FSR: 100 years: +40 %: 30 mins: Winter	33.87 2	33.27 2	33.873	0.601	6.9	0.852	0.682	12.6	6.294	Flood
SWMH062	FSR: 100 years: +40 %: 480 mins: Winter	33.87 0	31.12 9	32.288	1.159	5.8	1.311	0.000	5.9	264.653	Surcharged
SWMH063	FSR: 100 years: +40 %: 15 mins: Winter	33.81 1	28.07 5	30.534	2.459	246.7	4.345	0.000	218.5	106.164	Surcharged
SWMH064	FSR: 100 years: +40 %: 1440 mins: Winter	33.80 0	29.33 5	31.539	2.204	1.9	2.492	0.000	1.9	282.795	Surcharged
SWMH065	FSR: 100 years: +40 %: 240 mins: Winter	33.83 3	30.96 6	32.002	1.036	52.0	1.171	0.000	52.2	994.248	Surcharged
SWMH066	FSR: 100 years: +40 %: 15 mins: Summer	33.76 4	32.66 5	32.665	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH067	FSR: 100 years: +40 %: 15 mins: Summer	33.76 4	32.55 2	32.552	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH068	FSR: 100 years: +40 %: 15 mins: Winter	33.76 0	32.10 5	32.996	0.891	37.7	1.007	0.000	29.3	17.411	Surcharged
SWMH069	FSR: 100 years: +40 %: 15 mins: Winter	33.76 0	31.34 7	32.007	0.660	112.5	0.747	0.000	108.7	57.622	Surcharged
SWMH071	FSR: 100 years: +40 %: 15 mins: Winter	33.72 0	32.42 9	32.844	0.415	49.7	0.469	0.000	48.0	22.951	Surcharged
SWMH072	FSR: 100 years: +40 %: 60 mins: Summer	33.72 0	31.22 9	31.939	0.710	6.7	0.803	0.000	6.5	27.622	Surcharged

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SWMH073	FSR: 100 years: +40 %: 15 mins: Summer	33.71 9	32.42 0	32.420	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH074	FSR: 100 years: +40 %: 960 mins: Winter	33.64 3	31.06 0	32.872	1.812	4.8	2.050	0.000	3.4	326.914	Surcharged
SWMH075	FSR: 100 years: +40 %: 15 mins: Winter	33.53 2	31.86 0	32.131	0.271	36.1	0.307	0.000	35.1	25.391	Surcharged
SWMH076	FSR: 100 years: +40 %: 480 mins: Winter	33.56 7	30.92 5	31.363	0.438	3.3	0.495	0.000	3.3	156.189	Surcharged
SWMH077	FSR: 100 years: +40 %: 15 mins: Summer	33.56 6	27.20 9	30.168	2.959	452.3	5.229	0.000	416.3	348.674	Surcharged
SWMH078	FSR: 100 years: +40 %: 15 mins: Winter	33.56 0	28.49 3	30.533	2.040	196.2	3.605	0.000	184.8	133.691	Surcharged
SWMH079	FSR: 100 years: +40 %: 15 mins: Winter	33.45 6	32.38 9	32.462	0.073	65.7	0.082	0.000	65.5	42.203	OK
SWMH080	FSR: 100 years: +40 %: 480 mins: Winter	33.44 5	31.01 1	32.284	1.273	5.9	1.440	0.000	5.9	276.083	Surcharged
SWMH081	FSR: 100 years: +40 %: 30 mins: Winter	33.33 7	32.57 7	32.670	0.093	15.9	0.007	0.000	15.9	30.254	OK
SWMH082	FSR: 100 years: +40 %: 15 mins: Winter	33.31 7	31.91 6	31.988	0.072	7.2	0.081	0.000	7.4	5.130	OK
SWMH085	FSR: 100 years: +40 %: 15 mins: Winter	33.24 4	32.32 5	33.008	0.683	47.4	0.773	0.000	36.1	26.281	Flood Risk
SWMH086	FSR: 100 years: +40 %: 240 mins: Winter	34.04 8	30.48 5	31.312	0.827	32.8	0.935	0.000	33.0	455.092	Surcharged
SWMH087	FSR: 100 years: +40 %: 15 mins: Winter	33.22 5	32.39 6	33.227	0.831	89.5	2.438	1.500	63.3	41.363	Flood
SWMH089	FSR: 100 years: +40 %: 30 mins: Winter	33.18 9	32.42 9	32.772	0.343	8.7	0.024	0.000	8.7	6.640	Surcharged
SWMH090	FSR: 100 years: +40 %: 15 mins: Winter	33.08 0	32.47 5	32.525	0.050	13.3	0.004	0.000	13.3	6.165	OK
SWMH091	FSR: 100 years: +40 %: 15 mins: Summer	33.07 5	32.07 5	32.944	0.869	16.6	0.983	0.000	14.3	8.555	Flood Risk
SWMH092	FSR: 100 years: +40 %: 15 mins: Winter	33.07 2	29.33 8	30.551	1.213	123.1	2.144	0.000	115.9	105.908	Surcharged
SWMH093	FSR: 100 years: +40 %: 30 mins: Winter	33.05 5	32.45 5	33.055	0.600	6.9	0.471	0.429	6.8	6.399	Flood
SWMH094	FSR: 100 years: +40 %: 30 mins: Summer	33.02 6	31.93 5	32.718	0.783	28.2	0.885	0.000	27.5	24.610	Surcharged
SWMH095	FSR: 100 years: +40 %: 60 mins: Winter	33.01 0	26.92 0	31.303	4.383	282.2	7.745	0.000	283.5	1585.671	Surcharged
SWMH096	FSR: 100 years: +40 %: 480 mins: Winter	33.00 6	30.95 4	32.282	1.328	5.9	1.502	0.000	5.9	281.086	Surcharged
SWMH097	FSR: 100 years: +40 %: 15 mins: Winter	32.95 9	29.49 5	30.554	1.059	102.9	1.871	0.000	93.5	75.792	Surcharged
SWMH098	FSR: 100 years: +40 %: 15 mins: Summer	32.84 2	29.94 6	32.071	2.125	48.2	2.404	0.000	44.0	35.255	Surcharged

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				FJB	PJB	WL					
				Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ							

SWMH099	FSR: 100 years: +40 %: 240 mins: Summer	32.75 6	28.97 0	30.533	1.563	80.7	1.767	0.000	39.8	841.803	Surcharged
SWMH100	FSR: 100 years: +40 %: 15 mins: Summer	32.72 1	26.77 0	30.023	3.253	302.8	5.749	0.000	296.5	330.135	Surcharged
SWMH101	FSR: 100 years: +40 %: 30 mins: Summer	32.68 6	30.14 9	30.877	0.728	44.4	1.287	0.000	45.9	86.018	Surcharged
SWMH102	FSR: 100 years: +40 %: 15 mins: Winter	32.68 3	29.62 8	32.008	2.380	76.3	2.692	0.000	62.8	55.792	Surcharged
SWMH103	FSR: 100 years: +40 %: 15 mins: Winter	32.52 4	29.30 9	31.307	1.998	103.6	2.259	0.000	94.5	72.261	Surcharged
SWMH104	FSR: 100 years: +40 %: 60 mins: Winter	32.51 0	29.54 6	30.941	1.395	34.6	1.578	0.000	34.6	81.682	Surcharged
SWMH106	FSR: 100 years: +40 %: 15 mins: Winter	32.48 9	29.24 2	31.011	1.769	113.5	2.001	0.000	107.5	79.639	Surcharged
SWMH107	FSR: 100 years: +40 %: 15 mins: Winter	32.44 9	29.16 2	30.567	1.405	138.4	1.589	0.000	137.6	92.388	Surcharged
SWMH108	FSR: 100 years: +40 %: 15 mins: Summer	32.44 5	26.61 6	29.971	3.355	450.8	5.928	0.000	426.4	401.192	Surcharged
SWMH109	FSR: 100 years: +40 %: 15 mins: Winter	32.36 3	30.28 3	31.991	1.708	120.4	1.932	0.000	67.2	63.721	Surcharged
SWMH110	FSR: 100 years: +40 %: 480 mins: Winter	32.35 0	31.19 0	32.212	1.022	1.6	1.156	0.000	12.0	1.454	Flood Risk
SWMH114	FSR: 100 years: +40 %: 240 mins: Winter	32.22 3	30.38 6	31.608	1.222	28.1	1.382	0.000	28.4	404.107	Surcharged
SWMH119	FSR: 100 years: +40 %: 60 mins: Winter	32.28 4	30.05 2	30.979	0.927	15.7	1.048	0.000	14.7	42.759	Surcharged
SWMH120	FSR: 100 years: +40 %: 15 mins: Winter	31.45 6	30.18 3	31.296	1.113	33.9	1.259	0.000	28.0	15.657	Flood Risk
SWMH121	FSR: 100 years: +40 %: 120 mins: Winter	32.28 0	31.67 5	32.312	0.637	50.7	32.031	31.988	31.6	51.127	Flood
SWMH122	FSR: 100 years: +40 %: 15 mins: Winter	32.27 9	29.78 4	29.913	0.129	38.6	0.145	0.000	37.7	22.629	OK
SWMH125	FSR: 100 years: +40 %: 1440 mins: Winter	32.23 6	28.27 2	30.263	1.991	29.9	2.252	0.000	29.9	2043.646	Surcharged
SWMH126	FSR: 100 years: +40 %: 120 mins: Winter	32.23 2	29.80 2	31.116	1.314	19.6	1.486	0.000	15.9	139.339	Surcharged
SWMH129	FSR: 100 years: +40 %: 15 mins: Winter	32.21 4	26.64 0	30.082	3.442	51.3	6.083	0.000	63.5	30.134	Surcharged
SWMH130	FSR: 100 years: +40 %: 15 mins: Winter	32.20 9	27.74 9	30.359	2.610	106.1	4.611	0.000	103.6	47.371	Surcharged
SWMH131	FSR: 100 years: +40 %: 1440 mins: Winter	32.09 4	27.83 0	29.763	1.933	34.5	2.187	0.000	34.5	3586.402	Surcharged
SWMH132	FSR: 100 years: +40 %: 60 mins: Winter	32.04 7	30.22 2	30.988	0.766	29.0	1.353	0.000	29.0	75.342	Surcharged
SWMH133	FSR: 100 years: +40 %: 240 mins: Winter	32.01 6	29.95 9	30.531	0.572	13.2	0.647	0.000	13.3	180.886	Surcharged

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SWMH135	FSR: 100 years: +40 %: 1440 mins: Winter	31.96 9	27.78 0	29.786	2.006	34.5	2.269	0.000	34.6	3589.235	Surcharged
SWMH136	FSR: 100 years: +40 %: 15 mins: Winter	31.78 1	30.31 9	31.113	0.794	68.1	0.898	0.000	61.6	31.424	Surcharged
SWMH137	FSR: 100 years: +40 %: 480 mins: Winter	31.78 1	28.62 4	30.592	1.968	54.4	2.226	0.000	54.3	1458.534	Surcharged
SWMH138	FSR: 100 years: +40 %: 15 mins: Winter	31.78 1	29.94 3	30.897	0.954	67.2	1.079	0.000	61.5	51.192	Surcharged
SWMH139	FSR: 100 years: +40 %: 30 mins: Winter	31.77 3	27.68 8	30.339	2.652	6.1	2.999	0.000	2.3	1.239	Surcharged
SWMH140	FSR: 100 years: +40 %: 60 mins: Winter	31.76 9	27.43 0	30.385	2.954	20.9	3.341	0.000	19.0	79.002	Surcharged
SWMH141	FSR: 100 years: +40 %: 15 mins: Winter	31.75 4	28.35 5	30.363	2.008	42.9	2.271	0.000	41.0	17.887	Surcharged
SWMH142	FSR: 100 years: +40 %: 480 mins: Winter	31.75 4	26.48 0	30.020	3.540	60.2	6.255	0.000	60.0	1436.566	Surcharged
SWMH143	FSR: 100 years: +40 %: 1440 mins: Winter	31.72 3	27.71 3	29.820	2.107	34.6	2.383	0.000	34.6	3592.054	Surcharged
SWMH144	FSR: 100 years: +40 %: 1440 mins: Winter	31.69 1	28.49 5	29.834	1.339	29.6	1.515	0.000	29.7	1822.013	Surcharged
SWMH145	FSR: 100 years: +40 %: 15 mins: Winter	31.48 7	30.29 9	30.548	0.249	27.7	0.282	0.000	26.9	12.770	Surcharged
SWMH148	FSR: 100 years: +40 %: 60 mins: Winter	31.54 4	26.17 9	30.890	4.711	405.1	8.324	0.000	393.0	1796.292	Surcharged
SWMH149	FSR: 100 years: +40 %: 1440 mins: Winter	31.54 3	27.67 3	29.853	2.180	34.6	2.466	0.000	34.6	3631.953	Surcharged
SWMH150	FSR: 100 years: +40 %: 480 mins: Winter	31.54 2	28.55 0	30.419	1.869	57.2	2.114	0.000	57.0	1498.256	Surcharged
SWMH151	FSR: 100 years: +40 %: 1440 mins: Winter	31.50 2	27.51 3	29.942	2.430	34.6	2.748	0.000	34.8	3551.170	Surcharged
SWMH152	FSR: 100 years: +40 %: 960 mins: Winter	31.46 6	30.56 0	30.608	0.048	0.0	0.055	0.000	0.0	0.164	OK
SWMH153	FSR: 100 years: +40 %: 480 mins: Winter	31.46 6	26.37 6	30.019	3.643	60.7	6.438	0.000	60.6	1442.627	Surcharged
SWMH154	FSR: 100 years: +40 %: 1440 mins: Winter	31.37 7	27.27 0	30.057	2.787	34.8	3.152	0.000	34.9	3564.314	Surcharged
SWMH155	FSR: 100 years: +40 %: 15 mins: Summer	31.36 5	30.76 0	30.760	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH156	FSR: 100 years: +40 %: 15 mins: Winter	31.30 0	30.28 7	30.396	0.110	25.6	0.124	0.000	23.4	11.233	OK
SWMH157	FSR: 100 years: +40 %: 480 mins: Winter	31.28 1	27.62 4	29.846	2.222	53.2	2.513	0.000	53.3	1298.067	Surcharged
SWMH160	FSR: 100 years: +40 %: 1440 mins: Winter	31.19 3	27.20 5	30.080	2.875	34.9	3.252	0.000	34.9	3302.994	Surcharged
SWMH163	FSR: 100 years: +40 %: 15 mins: Summer	31.17 3	30.41 3	30.413	0.000	0.0	0.000	0.000	0.0	0.000	OK

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SWMH164	FSR: 100 years: +40 %: 15 mins: Winter	31.05 3	30.19 4	31.008	0.814	23.3	0.921	0.000	17.4	10.785	Flood Risk
SWMH165	FSR: 100 years: +40 %: 15 mins: Winter	31.05 0	29.93 2	30.752	0.820	43.0	0.927	0.000	38.6	22.634	Flood Risk
SWMH166	FSR: 100 years: +40 %: 60 mins: Winter	30.97 8	25.49 0	30.373	4.883	211.7	8.629	0.000	175.2	1020.778	Surcharged
SWMH167	FSR: 100 years: +40 %: 60 mins: Winter	30.96 2	25.46 5	28.316	2.851	175.2	3.225	0.000	175.2	978.576	Surcharged
SWMH168	FSR: 100 years: +40 %: 60 mins: Winter	30.94 6	25.87 7	30.634	4.757	402.6	8.405	0.000	402.4	1728.792	Surcharged
SWMH170	FSR: 100 years: +40 %: 15 mins: Winter	31.27 5	28.40 1	29.149	0.748	91.6	0.846	0.000	63.2	72.970	Surcharged
SWMH171	FSR: 100 years: +40 %: 1440 mins: Summer	30.80 5	25.64 8	29.597	3.949	101.6	4.466	0.000	71.1	6883.528	Surcharged
SWMH173	FSR: 100 years: +40 %: 480 mins: Winter	30.71 3	27.39 6	29.843	2.447	53.3	2.768	0.000	53.3	1295.707	Surcharged
SWMH175	FSR: 100 years: +40 %: 1440 mins: Winter	30.68 0	29.69 0	30.615	0.925	17.6	1.046	0.000	18.1	139.241	Flood Risk
SWMH176	FSR: 100 years: +40 %: 1440 mins: Winter	30.67 5	29.41 2	30.620	1.208	0.4	1.366	0.000	1.3	1.526	Flood Risk
SWMH177	FSR: 100 years: +40 %: 1440 mins: Winter	30.67 5	29.41 2	30.620	1.208	0.9	1.366	0.000	1.3	1.521	Flood Risk
SWMH178	FSR: 100 years: +40 %: 30 mins: Winter	30.60 4	25.54 4	30.350	4.806	229.4	8.492	0.000	219.9	485.548	Flood Risk
SWMH179	FSR: 100 years: +40 %: 1440 mins: Winter	30.52 5	29.92 0	30.593	0.673	5.7	67.624	67.581	17.6	68.316	Flood
SWMH180	FSR: 100 years: +40 %: 60 mins: Winter	30.67 5	28.63 8	29.172	0.534	41.0	0.604	0.000	41.1	205.681	Surcharged
SWMH181	FSR: 100 years: +40 %: 30 mins: Winter	30.35 8	25.58 3	30.364	4.781	369.3	13.954	5.516	229.4	856.516	Flood
SWMH186	FSR: 100 years: +40 %: 15 mins: Winter	30.05 2	29.01 8	29.796	0.778	80.5	1.374	0.000	65.6	37.183	Flood Risk
SWMH189	FSR: 100 years: +40 %: 360 mins: Winter	36.47 9	33.12 2	34.941	1.819	38.9	2.057	0.000	39.1	711.033	Surcharged
SWMH190	FSR: 100 years: +40 %: 15 mins: Summer	32.91 7	30.09 4	32.166	2.072	24.1	2.344	0.000	29.4	18.758	Surcharged
SWMH193	FSR: 100 years: +40 %: 15 mins: Winter	33.15 0	29.17 8	30.547	1.369	135.8	2.419	0.000	126.7	108.421	Surcharged
SWMH194	FSR: 100 years: +40 %: 15 mins: Winter	33.45 2	28.67 4	30.537	1.863	154.6	3.291	0.000	142.4	109.016	Surcharged
SWMH192	FSR: 100 years: +40 %: 15 mins: Winter	35.58 4	32.84 0	34.642	1.802	71.4	2.038	0.000	61.1	61.314	Surcharged
SWMH191	FSR: 100 years: +40 %: 15 mins: Winter	35.89 6	32.94 3	34.772	1.829	66.7	2.068	0.000	57.0	56.847	Surcharged
SWMH195	FSR: 100 years: +40 %: 30 mins: Summer	36.46 6	33.65 8	34.899	1.241	39.2	1.403	0.000	39.6	99.234	Surcharged

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SWMH196	FSR: 100 years: +40 %: 30 mins: Summer	37.01 2	33.84 0	34.890	1.050	38.8	1.187	0.000	39.2	83.048	Surcharged
SWMH197	FSR: 100 years: +40 %: 240 mins: Winter	34.86 0	31.24 0	33.623	2.383	77.2	2.696	0.000	77.6	1454.055	Surcharged
SWMH198	FSR: 100 years: +40 %: 15 mins: Winter	34.53 0	31.07 5	33.358	2.283	81.4	2.583	0.000	82.6	110.031	Surcharged
SWMH199	FSR: 100 years: +40 %: 30 mins: Summer	33.99 2	27.43 0	30.873	3.443	378.4	6.084	0.000	360.6	645.459	Surcharged
SWMH200	FSR: 100 years: +40 %: 15 mins: Summer	33.15 0	26.99 3	30.104	3.112	440.3	5.498	0.000	410.1	344.900	Surcharged
SWMH201	FSR: 100 years: +40 %: 60 mins: Winter	30.65 0	25.72 9	30.503	4.774	406.0	8.437	0.000	405.9	1721.436	Flood Risk
SWMH202	FSR: 100 years: +40 %: 15 mins: Summer	33.96 9	27.83 0	30.260	2.430	216.5	4.293	0.000	160.1	84.525	Surcharged
SWMH203	FSR: 100 years: +40 %: 60 mins: Winter	31.27 8	26.04 3	30.773	4.729	399.1	8.356	0.000	399.0	1736.631	Surcharged
SWMH247	FSR: 100 years: +40 %: 15 mins: Winter	37.32 8	36.02 1	36.704	0.683	130.1	0.772	0.000	120.6	60.046	Surcharged
SWMH250	FSR: 100 years: +40 %: 15 mins: Winter	37.58 7	36.02 1	36.138	0.117	96.0	0.132	0.000	97.6	47.394	OK
SWMH248	FSR: 100 years: +40 %: 15 mins: Winter	37.58 0	36.02 1	36.054	0.033	17.3	0.037	0.000	17.3	8.122	OK
SWMH249	FSR: 100 years: +40 %: 15 mins: Winter	37.64 7	37.04 2	37.126	0.084	17.6	0.006	0.000	17.3	8.124	OK
SWMH244	FSR: 100 years: +40 %: 15 mins: Summer	37.23 3	34.95 3	35.125	0.172	33.6	0.195	0.000	33.7	35.503	Surcharged
SWMH242	FSR: 100 years: +40 %: 15 mins: Summer	37.21 0	36.50 5	36.505	0.000	0.0	0.000	0.000	0.0	0.000	OK
SWMH239	FSR: 100 years: +40 %: 15 mins: Winter	38.06 6	37.05 7	37.109	0.052	26.1	0.059	0.000	26.0	12.048	OK
SWMH236	FSR: 100 years: +40 %: 15 mins: Winter	33.30 3	32.36 6	33.076	0.710	77.8	0.803	0.000	73.4	35.914	Flood Risk
SWMH230	FSR: 100 years: +40 %: 15 mins: Winter	30.65 7	27.96 0	28.015	0.055	8.5	0.062	0.000	8.0	3.905	OK
SWMH229	FSR: 100 years: +40 %: 30 mins: Winter	31.38 6	27.70 5	31.086	3.381	94.2	3.823	0.000	26.1	9.076	Surcharged
SWMH228	FSR: 100 years: +40 %: 30 mins: Winter	32.53 6	27.31 2	31.085	3.773	263.3	6.667	0.000	46.5	99.885	Surcharged
SWMH278	FSR: 100 years: +40 %: 15 mins: Winter	31.78 1	29.82 4	30.518	0.694	61.5	0.785	0.000	57.9	50.862	Surcharged
SWMH277	FSR: 100 years: +40 %: 30 mins: Winter	32.04 8	29.74 5	30.294	0.549	57.2	0.620	0.000	57.0	84.675	Surcharged
SWMH272	FSR: 100 years: +40 %: 240 mins: Winter	33.80 3	31.08 1	32.008	0.927	52.0	1.048	0.000	52.0	964.739	Surcharged
Pumping Station	FSR: 100 years: +40 %: 60 mins: Winter	30.94 1	25.45 0	25.750	0.300	175.2	0.000	0.000	175.2	977.374	OK

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				Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ									
SWMH265	FSR: 100 years: +40 %: 15 mins: Winter	30.67 2	28.03 5	29.049	1.014	12.2	1.147	0.000	11.1	3.519	Surcharged		

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Report Details: Type: Stormwater Controls Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB	Approved By: WL		
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ				



FSR: 1 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Outflow

Stormwater Control	Storm Event	Max. US Level (m)	Max. DS Level (m)	Max. US Depth (m)	Max. DS Depth (m)	Max. Inflow (L/s)	Max. Residual Volume (m³)	Max. Flooded Volume (m³)	Total Lost Volume (m³)	Max. Outflow (L/s)	Total Discharge Volume (m³)	Percentage Available (%)	Status
Porous Paving (2)	FSR: 1 years: +40 %: 120 mins: Winter	35.231	34.973	0.136	0.108	13.0	32.628	0.000	0.000	6.5	31.421	81.695	OK
Porous Paving (3)	FSR: 1 years: +40 %: 60 mins: Winter	34.877	34.630	0.045	0.102	10.7	8.460	0.000	0.000	7.2	15.353	85.517	OK
Porous Paving (4)	FSR: 1 years: +40 %: 60 mins: Winter	34.868	34.747	0.033	0.069	6.1	5.049	0.000	0.000	4.1	8.727	89.625	OK
Porous Paving (5)	FSR: 1 years: +40 %: 30 mins: Winter	34.877	34.797	0.049	0.119	12.9	7.382	0.000	0.000	7.1	10.233	84.215	OK
Porous Paving (6)	FSR: 1 years: +40 %: 60 mins: Winter	34.152	34.066	0.050	0.101	11.0	8.920	0.000	0.000	7.1	15.692	85.194	OK
Porous Paving (7)	FSR: 1 years: +40 %: 30 mins: Winter	35.034	34.866	0.044	0.101	9.8	4.708	0.000	0.000	6.7	8.142	86.669	OK
Porous Paving (8)	FSR: 1 years: +40 %: 60 mins: Winter	34.954	34.875	0.027	0.110	3.5	2.751	0.000	0.000	2.1	5.166	89.217	OK
Porous Paving (9)	FSR: 1 years: +40 %: 30 mins: Winter	32.485	32.384	0.025	0.047	2.7	1.292	0.000	0.000	1.8	2.195	93.306	OK
Porous Paving (10)	FSR: 1 years: +40 %: 30 mins: Winter	32.446	32.368	0.022	0.031	1.6	0.688	0.000	0.000	1.1	1.307	94.869	OK
Porous Paving (11)	FSR: 1 years: +40 %: 120 mins: Winter	32.479	32.454	0.019	0.117	1.4	2.297	0.000	0.000	1.1	2.580	88.097	OK
Porous Paving (12)	FSR: 1 years: +40 %: 60 mins: Winter	32.588	32.478	0.024	0.046	2.4	1.746	0.000	0.000	1.8	3.512	93.156	OK
Porous Paving (14)	FSR: 1 years: +40 %: 30 mins: Winter	32.597	32.507	0.030	0.075	3.7	1.893	0.000	0.000	2.5	2.739	91.142	OK
Porous Paving (15)	FSR: 1 years: +40 %: 60 mins: Winter	32.907	32.682	0.041	0.105	8.5	6.302	0.000	0.000	6.3	12.434	86.426	OK
Porous Paving (16)	FSR: 1 years: +40 %: 60 mins: Winter	34.072	33.724	0.054	0.137	15.1	12.715	0.000	0.000	9.7	21.627	82.059	OK
Porous Paving (17)	FSR: 1 years: +40 %: 120 mins: Winter	34.085	33.808	0.032	0.071	5.5	8.944	0.000	0.000	3.5	14.675	90.231	OK
Porous Paving (18)	FSR: 1 years: +40 %: 60 mins: Winter	34.419	34.171	0.019	0.034	2.3	2.212	0.000	0.000	1.1	2.937	94.632	OK
Porous Paving (19)	FSR: 1 years: +40 %: 60 mins: Winter	31.948	31.649	0.110	0.100	8.5	8.608	0.000	0.000	7.0	12.364	81.401	OK
Porous Paving (20)	FSR: 1 years: +40 %: 60 mins: Winter	31.513	31.257	0.038	0.083	7.5	5.799	0.000	0.000	5.3	10.892	88.023	OK
Porous Paving (21)	FSR: 1 years: +40 %: 60 mins: Winter	33.440	33.098	0.090	0.077	6.3	7.307	0.000	0.000	4.7	8.798	85.870	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Porous Paving (22)	FSR: 1 years: +40 %: 60 mins: Winter	33.642	33.275	0.075	0.056	4.7	6.098	0.000	0.000	3.0	6.096	89.226	OK
Porous Paving (23)	FSR: 1 years: +40 %: 60 mins: Winter	30.807	30.553	0.033	0.071	5.8	4.705	0.000	0.000	4.0	8.322	89.753	OK
Porous Paving (24)	FSR: 1 years: +40 %: 60 mins: Winter	31.060	30.772	0.027	0.015	4.1	2.924	0.000	0.000	2.8	5.785	93.239	OK
Porous Paving (25)	FSR: 1 years: +40 %: 60 mins: Winter	31.773	31.534	0.026	0.046	4.0	3.665	0.000	0.000	2.2	5.305	92.722	OK
Porous Paving (26)	FSR: 1 years: +40 %: 60 mins: Winter	31.549	31.290	0.036	0.077	6.8	5.281	0.000	0.000	4.7	9.771	88.786	OK
Porous Paving (27)	FSR: 1 years: +40 %: 240 mins: Winter	30.862	30.521	0.062	0.108	13.6	45.899	0.000	0.000	7.9	71.524	83.555	OK
Porous Paving (28)	FSR: 1 years: +40 %: 60 mins: Winter	31.107	30.661	0.041	0.082	9.8	9.191	0.000	0.000	5.2	13.249	87.970	OK
Porous Paving (29)	FSR: 1 years: +40 %: 120 mins: Winter	31.143	30.931	0.039	0.077	8.9	15.809	0.000	0.000	4.7	22.971	88.523	OK
Porous Paving (30)	FSR: 1 years: +40 %: 120 mins: Winter	30.783	30.559	0.049	0.107	12.9	20.963	0.000	0.000	7.8	34.529	84.688	OK
Porous Paving (31)	FSR: 1 years: +40 %: 240 mins: Winter	31.644	31.092	0.042	0.090	9.7	30.495	0.000	0.000	6.0	51.023	87.011	OK
Porous Paving (32)	FSR: 1 years: +40 %: 120 mins: Winter	30.385	30.267	0.040	0.184	8.0	14.706	0.000	0.000	4.0	18.315	94.904	OK
Porous Paving (33)	FSR: 1 years: +40 %: 120 mins: Winter	30.251	30.108	0.080	0.087	5.2	7.128	0.000	0.000	4.9	20.922	95.819	OK
Porous Paving (34)	FSR: 1 years: +40 %: 120 mins: Winter	29.893	29.785	0.078	0.083	5.0	2.999	0.000	0.000	5.0	22.211	96.424	OK
Porous Paving (36)	FSR: 1 years: +40 %: 120 mins: Winter	32.120	31.836	0.018	0.034	1.7	2.525	0.000	0.000	1.2	4.693	94.638	OK
Porous Paving (37)	FSR: 1 years: +40 %: 60 mins: Winter	31.576	31.429	0.036	0.027	1.2	1.273	0.000	0.000	0.9	1.646	94.103	OK
Swale 06	FSR: 1 years: +40 %: 15 mins: Winter	29.071	28.204	0.035	0.119	8.8	0.959	0.000	0.000	6.8	3.963	96.080	OK
Swale 05	FSR: 1 years: +40 %: 15 mins: Winter	31.380	31.071	0.029	0.084	5.5	0.285	0.000	0.000	5.1	2.523	96.967	OK
Swale 07	FSR: 1 years: +40 %: 15 mins: Winter	32.581	32.089	0.031	0.095	6.6	0.480	0.000	0.000	5.9	3.034	99.592	OK
Swale 08	FSR: 1 years: +40 %: 15 mins: Winter	34.269	33.312	0.026	0.085	5.7	0.441	0.000	0.000	5.0	2.607	97.191	OK
Swale 01	FSR: 1 years: +40 %: 15 mins: Winter	34.110	33.181	0.036	0.108	9.1	0.989	0.000	0.000	7.3	4.115	96.162	OK
Swale 02	FSR: 1 years: +40 %: 15 mins: Winter	32.898	32.417	0.051	0.173	16.8	0.918	0.000	0.000	14.7	7.707	99.320	OK
Swale 03	FSR: 1 years: +40 %: 15 mins: Winter	32.462	32.079	0.028	0.079	5.1	0.323	0.000	0.000	4.6	2.329	97.113	OK
Swale 04	FSR: 1 years: +40 %: 15 mins: Winter	32.533	32.090	0.031	0.090	6.3	0.419	0.000	0.000	5.6	2.878	99.627	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Summary Storm Phase: Phase		Designed by:	Checked by:		Approved By:
		FJB	PJB		WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Car Park-Cellular Storage Unit(s) 08 to 10-Cellular Storage HGV	FSR: 1 years: +40 %: 60 mins: Winter	34.667	34.667	0.121	0.121	40.4	34.471	0.000	0.000	20.5	54.836	89.962	OK
Parking-Cellular Storage Unit 16-Cellular Storage	FSR: 1 years: +40 %: 60 mins: Winter	33.566	33.566	0.144	0.144	42.4	52.357	0.000	0.000	21.9	50.060	82.161	OK
Porous Paving (1)	FSR: 1 years: +40 %: 120 mins: Winter	35.103	35.103	0.088	0.088	24.6	19.736	0.000	0.000	14.5	33.799	92.693	OK
Porous Paving (39)	FSR: 1 years: +40 %: 30 mins: Winter	30.828	30.828	0.242	0.242	44.0	80.547	0.000	0.000	12.8	115.228	69.925	OK
Porous Paving (40)	FSR: 1 years: +40 %: 30 mins: Winter	33.033	32.848	0.034	0.067	6.3	3.368	0.000	0.000	3.9	4.976	90.177	OK
Porous Paving	FSR: 1 years: +40 %: 60 mins: Winter	33.096	32.846	0.019	0.030	2.3	2.148	0.000	0.000	1.1	2.946	96.397	OK
Porous Paving (41)	FSR: 1 years: +40 %: 30 mins: Winter	32.963	32.868	0.036	0.075	5.3	2.349	0.000	0.000	3.8	4.478	89.687	OK
Porous Paving (42)	FSR: 1 years: +40 %: 30 mins: Winter	34.170	34.012	0.028	0.021	4.0	1.630	0.000	0.000	2.9	3.356	93.100	OK
Porous Paving (43)	FSR: 1 years: +40 %: 15 mins: Winter	34.305	34.126	0.079	0.035	11.8	2.861	0.000	0.000	7.1	4.689	87.489	OK
Porous Paving (44)	FSR: 1 years: +40 %: 60 mins: Winter	33.584	33.456	0.016	0.013	1.1	0.730	0.000	0.000	0.8	1.529	96.293	OK
Unit 02-Cellular Storage A	FSR: 1 years: +40 %: 480 mins: Winter	34.275	34.275	0.056	0.094	0.1	0.847	0.000	0.000	0.0	0.366	85.609	OK
Unit 06-Cellular Storage A	FSR: 1 years: +40 %: 15 mins: Winter	34.274	34.248	0.008	0.007	0.4	0.054	0.000	0.000	0.2	0.175	98.611	OK
Unit(s) 14 to 15-Cellular Storage	FSR: 1 years: +40 %: 240 mins: Winter	28.552	28.552	0.234	0.234	75.8	408.451	0.000	0.000	32.7	391.011	85.408	OK
Unit 01-Cellular Storage A	FSR: 1 years: +40 %: 30 mins: Summer	31.494	31.494	0.132	0.132	67.0	52.807	0.000	0.000	10.3	10.710	89.061	OK
Unit 01-Cellular Storage B	FSR: 1 years: +40 %: 15 mins: Winter	30.825	30.825	0.075	0.075	63.6	28.497	0.000	0.000	9.8	3.846	95.321	OK
Unit 01-Cellular Storage C	FSR: 1 years: +40 %: 240 mins: Winter	28.958	28.958	0.208	0.208	83.2	299.411	0.000	0.000	26.3	409.714	73.976	OK
Unit 02-Cellular Storage C	FSR: 1 years: +40 %: 480 mins: Winter	28.120	28.120	0.371	0.371	82.6	463.705	0.000	0.000	35.3	1196.991	69.110	OK
Unit 07-Cellular Storage A	FSR: 1 years: +40 %: 960 mins: Winter	27.516	27.516	1.011	1.011	137.6	2765.479	0.000	0.000	59.1	3271.824	36.862	OK
Porous Paving (13)	FSR: 1 years: +40 %: 240 mins: Winter	29.223	29.223	0.153	0.153	77.5	285.446	0.000	0.000	34.1	466.157	80.863	OK
	FSR: 1 years: +40 %: 60 mins: Winter	31.574	31.574	0.122	0.122	138.0	159.556	0.000	0.000	45.5	149.894	89.864	OK
	FSR: 1 years: +40 %: 120 mins: Winter	31.460	30.713	0.096	0.111	14.2	34.907	0.000	0.000	8.1	35.246	85.320	OK

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Unit 01- Cellular Storage D	FSR: 1 years: +40 %: 240 mins: Winter	29.024	29.024	0.186	0.186	52.9	268.16 2	0.000	0.000	25.5	349.205	88.398	OK
Unit 06- Cellular Storage B	FSR: 1 years: +40 %: 60 mins: Summer	31.121	31.121	0.046	0.046	27.4	38.244	0.000	0.000	2.6	11.573	97.142	OK
DT 02- Cellular Storage	FSR: 1 years: +40 %: 120 mins: Winter	32.043	32.043	0.091	0.091	30.3	68.582	0.000	0.000	16.1	52.096	88.620	OK
Unit 04- Cellular Storage A	FSR: 1 years: +40 %: 60 mins: Winter	30.781	30.781	0.032	0.032	11.5	8.486	0.000	0.000	9.5	23.876	95.954	OK
Unit 03- Cellular Storage A	FSR: 1 years: +40 %: 60 mins: Winter	30.814	30.814	0.040	0.040	13.1	10.477	0.000	0.000	8.6	21.578	90.047	OK
Unit(s) 11 to 13- Cellular Storage	FSR: 1 years: +40 %: 480 mins: Winter	31.510	31.510	0.325	0.325	9.2	83.447	0.000	0.000	1.6	53.132	59.624	OK
Unit(s) 04 to 05- Cellular Storage	FSR: 1 years: +40 %: 120 mins: Winter	29.229	29.229	0.109	0.109	31.4	77.970	0.000	0.000	21.3	87.785	90.904	OK
Unit 02- Cellular Storage B	FSR: 1 years: +40 %: 480 mins: Winter	30.691	30.691	0.180	0.180	25.7	192.55 6	0.000	0.000	7.8	235.305	55.085	OK
Unit 03- Cellular Storage B	FSR: 1 years: +40 %: 120 mins: Winter	30.246	30.246	0.066	0.066	17.4	28.349	0.000	0.000	8.8	44.044	83.515	OK

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		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ		



FSR: 30 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Outflow

Stormwater Control	Storm Event	Max. US Level (m)	Max. DS Level (m)	Max. US Depth (m)	Max. DS Depth (m)	Max. Inflow (L/s)	Max. Residual Volume (m³)	Max. Flooded Volume (m³)	Total Lost Volume (m³)	Max. Outflow (L/s)	Total Discharge Volume (m³)	Percentage Available (%)	Status
Porous Paving (2)	FSR: 30 years: +40 %: 120 mins: Winter	35.493	35.015	0.398	0.150	30.8	72.785	0.000	0.000	11.3	80.198	59.165	OK
Porous Paving (3)	FSR: 30 years: +40 %: 30 mins: Winter	34.927	34.704	0.095	0.176	34.1	19.016	0.000	0.000	15.0	28.203	67.443	OK
Porous Paving (4)	FSR: 30 years: +40 %: 30 mins: Winter	34.898	34.817	0.064	0.139	19.7	10.156	0.000	0.000	11.5	16.358	79.131	OK
Porous Paving (5)	FSR: 30 years: +40 %: 30 mins: Winter	34.979	34.918	0.151	0.240	31.7	18.500	0.000	0.000	11.2	25.641	60.441	OK
Porous Paving (6)	FSR: 30 years: +40 %: 30 mins: Winter	34.236	34.147	0.134	0.182	35.1	19.885	0.000	0.000	15.4	28.163	66.994	OK
Porous Paving (7)	FSR: 30 years: +40 %: 30 mins: Winter	35.080	34.931	0.090	0.166	24.1	10.337	0.000	0.000	14.2	21.155	70.732	OK
Porous Paving (8)	FSR: 30 years: +40 %: 60 mins: Winter	35.045	35.039	0.118	0.274	10.8	9.608	0.000	0.000	3.7	12.975	62.333	OK
Porous Paving (9)	FSR: 30 years: +40 %: 15 mins: Winter	32.501	32.431	0.041	0.094	9.9	2.382	0.000	0.000	5.5	3.927	87.654	OK
Porous Paving (10)	FSR: 30 years: +40 %: 30 mins: Winter	32.460	32.401	0.037	0.064	3.9	1.304	0.000	0.000	3.3	3.407	90.283	OK
Porous Paving (11)	FSR: 30 years: +40 %: 15 mins: Winter	32.507	32.493	0.048	0.156	9.9	3.738	0.000	0.000	4.8	2.472	80.628	OK
Porous Paving (12)	FSR: 30 years: +40 %: 30 mins: Winter	32.608	32.527	0.045	0.095	7.8	3.338	0.000	0.000	5.7	6.650	86.917	OK
Porous Paving (14)	FSR: 30 years: +40 %: 15 mins: Winter	32.616	32.558	0.049	0.126	13.6	3.406	0.000	0.000	7.3	5.219	84.060	OK
Porous Paving (15)	FSR: 30 years: +40 %: 30 mins: Winter	32.945	32.752	0.079	0.175	27.3	13.898	0.000	0.000	14.0	23.265	70.066	OK
Porous Paving (16)	FSR: 30 years: +40 %: 60 mins: Winter	34.142	33.800	0.123	0.213	36.7	30.091	0.000	0.000	16.4	54.729	57.540	OK

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Porous Paving (17)	FSR: 30 years: +40 %: 60 mins: Winter	34.114	33.883	0.061	0.146	19.9	18.291	0.000	0.000	10.6	27.807	80.021	OK
Porous Paving (18)	FSR: 30 years: +40 %: 60 mins: Winter	34.432	34.211	0.032	0.074	5.5	4.230	0.000	0.000	3.9	7.913	89.734	OK
Porous Paving (19)	FSR: 30 years: +40 %: 60 mins: Winter	32.193	31.686	0.355	0.137	20.7	18.666	0.000	0.000	11.3	31.211	59.669	OK
Porous Paving (20)	FSR: 30 years: +40 %: 30 mins: Winter	31.548	31.328	0.073	0.154	24.2	12.214	0.000	0.000	13.2	20.469	74.772	OK
Porous Paving (21)	FSR: 30 years: +40 %: 60 mins: Winter	33.565	33.149	0.215	0.128	15.4	15.040	0.000	0.000	10.2	22.805	70.916	OK
Porous Paving (22)	FSR: 30 years: +40 %: 60 mins: Winter	33.707	33.334	0.139	0.115	11.4	12.274	0.000	0.000	8.7	16.449	78.316	OK
Porous Paving (23)	FSR: 30 years: +40 %: 30 mins: Winter	30.837	30.626	0.062	0.144	18.7	9.308	0.000	0.000	11.6	15.656	79.726	OK
Porous Paving (24)	FSR: 30 years: +40 %: 30 mins: Winter	31.083	30.778	0.051	0.021	13.1	5.181	0.000	0.000	8.8	10.979	88.019	OK
Porous Paving (25)	FSR: 30 years: +40 %: 60 mins: Winter	31.791	31.588	0.043	0.100	9.6	7.080	0.000	0.000	7.0	14.020	85.940	OK
Porous Paving (26)	FSR: 30 years: +40 %: 30 mins: Winter	31.581	31.360	0.068	0.147	21.8	10.824	0.000	0.000	12.4	18.388	77.015	OK
Porous Paving (27)	FSR: 30 years: +40 %: 120 mins: Winter	30.953	30.584	0.152	0.171	50.4	101.211	0.000	0.000	14.5	125.728	63.738	OK
Porous Paving (28)	FSR: 30 years: +40 %: 60 mins: Winter	31.137	30.732	0.070	0.153	23.8	18.950	0.000	0.000	13.1	34.775	75.197	OK
Porous Paving (29)	FSR: 30 years: +40 %: 120 mins: Winter	31.170	31.001	0.066	0.147	21.2	31.294	0.000	0.000	12.5	58.580	77.280	OK
Porous Paving (30)	FSR: 30 years: +40 %: 60 mins: Winter	30.848	30.634	0.114	0.182	46.5	47.301	0.000	0.000	15.4	62.293	65.450	OK
Porous Paving (31)	FSR: 30 years: +40 %: 120 mins: Winter	31.685	31.160	0.083	0.158	35.8	65.911	0.000	0.000	13.6	94.376	71.928	OK
Porous Paving (32)	FSR: 30 years: +40 %: 120 mins: Winter	30.633	30.625	0.288	0.542	19.0	65.418	0.000	0.000	7.8	65.155	77.329	OK
Porous Paving (33)	FSR: 30 years: +40 %: 120 mins: Winter	30.626	30.623	0.455	0.602	20.5	47.566	0.000	0.000	13.4	102.360	72.098	OK

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Porous Paving (34)	FSR: 30 years: +40 %: 60 mins: Winter	30.614	30.691	0.799	0.989	17.3	33.741	0.000	0.000	22.5	77.531	59.777	OK
Porous Paving (36)	FSR: 30 years: +40 %: 60 mins: Winter	32.136	31.877	0.034	0.075	6.3	5.050	0.000	0.000	4.2	8.966	89.277	OK
Porous Paving (37)	FSR: 30 years: +40 %: 30 mins: Winter	31.606	31.460	0.067	0.058	3.8	2.323	0.000	0.000	3.0	3.109	89.239	OK
Swale 06	FSR: 30 years: +40 %: 15 mins: Winter	29.092	28.809	0.057	0.724	21.4	4.197	0.000	0.000	11.9	5.714	82.841	OK
Swale 05	FSR: 30 years: +40 %: 15 mins: Winter	32.894	32.533	1.543	1.546	13.4	0.488	0.000	0.000	12.6	6.183	94.795	OK
Swale 07	FSR: 30 years: +40 %: 60 mins: Winter	33.276	33.280	0.726	1.286	18.4	24.670	0.000	0.000	18.6	29.848	79.031	OK
Swale 08	FSR: 30 years: +40 %: 15 mins: Summer	34.283	33.870	0.039	0.643	13.3	2.259	0.000	0.000	12.4	5.718	85.609	OK
Swale 01	FSR: 30 years: +40 %: 30 mins: Winter	34.122	34.086	0.048	1.013	15.8	8.037	0.000	0.000	13.0	13.997	68.807	OK
Swale 02	FSR: 30 years: +40 %: 30 mins: Summer	34.363	33.884	1.516	1.640	26.0	8.430	0.000	0.000	15.2	22.516	93.756	OK
Swale 03	FSR: 30 years: +40 %: 15 mins: Winter	32.478	32.146	0.044	0.146	12.5	0.552	0.000	0.000	11.6	5.731	95.062	OK
Swale 04	FSR: 30 years: +40 %: 15 mins: Winter	32.551	32.163	0.049	0.163	15.4	0.723	0.000	0.000	14.0	7.079	99.357	OK
Car Park-Cellular Storage	FSR: 30 years: +40 %: 60 mins: Winter	34.904	34.904	0.358	0.358	98.2	101.906	0.000	0.000	36.7	136.094	70.324	OK
Unit(s) 08 to 10-Cellular Storage	FSR: 30 years: +40 %: 120 mins: Winter	34.208	34.208	0.786	0.786	104.7	286.706	0.000	0.000	37.2	239.397	2.315	OK
HGV Parking-Cellular Storage	FSR: 30 years: +40 %: 30 mins: Winter	35.222	35.222	0.207	0.207	78.8	46.409	0.000	0.000	32.4	60.367	82.817	OK
Unit 16-Cellular Storage	FSR: 30 years: +40 %: 120 mins: Winter	31.257	31.257	0.671	0.671	104.6	223.224	0.000	0.000	20.4	209.129	16.650	OK
Porous Paving (1)	FSR: 30 years: +40 %: 30 mins: Winter	33.057	32.916	0.058	0.135	15.4	6.497	0.000	0.000	11.0	13.308	81.054	OK
Porous Paving (39)	FSR: 30 years: +40 %: 60 mins: Winter	33.109	32.884	0.032	0.068	5.5	4.101	0.000	0.000	4.0	7.875	93.123	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Porous Paving (40)	FSR: 30 years: +40 %: 30 mins: Winter	32.988	32.935	0.060	0.142	13.0	4.581	0.000	0.000	10.3	11.577	79.891	OK
Porous Paving	FSR: 30 years: +40 %: 30 mins: Winter	34.188	34.026	0.046	0.035	10.0	2.869	0.000	0.000	9.1	9.005	87.858	OK
Porous Paving (41)	FSR: 30 years: +40 %: 30 mins: Winter	34.388	34.144	0.163	0.053	19.3	5.534	0.000	0.000	16.4	17.400	75.804	OK
Porous Paving (42)	FSR: 30 years: +40 %: 30 mins: Summer	33.622	33.618	0.053	0.175	20.2	3.800	0.000	0.000	11.7	4.704	80.709	OK
Porous Paving (43)	FSR: 30 years: +40 %: 120 mins: Winter	34.290	34.290	0.071	0.109	0.6	1.017	0.000	0.000	0.4	0.856	82.718	OK
Porous Paving (44)	FSR: 30 years: +40 %: 120 mins: Winter	34.290	34.253	0.024	0.012	0.6	0.134	0.000	0.000	0.6	1.833	96.591	OK
Unit 02-Cellular Storage A	FSR: 30 years: +40 %: 1440 mins: Winter	29.123	29.123	0.805	0.805	57.5	1406.331	0.000	0.000	32.1	1778.322	49.758	OK
Unit 06-Cellular Storage A	FSR: 30 years: +40 %: 30 mins: Summer	31.711	31.711	0.349	0.349	168.8	140.043	0.000	0.000	11.9	10.792	70.991	OK
Unit(s) 14 to 15-Cellular Storage	FSR: 30 years: +40 %: 30 mins: Winter	31.025	31.025	0.275	0.275	115.9	104.664	0.000	0.000	5.9	5.843	82.814	OK
Unit 01-Cellular Storage A	FSR: 30 years: +40 %: 120 mins: Winter	29.267	29.267	0.517	0.517	307.0	743.194	0.000	0.000	39.3	420.555	35.403	OK
Unit 01-Cellular Storage B	FSR: 30 years: +40 %: 240 mins: Winter	28.644	28.644	0.895	0.895	241.0	1118.361	0.000	0.000	45.1	973.746	25.499	OK
Unit 01-Cellular Storage C	FSR: 30 years: +40 %: 1440 mins: Winter	29.247	29.247	2.742	2.742	161.0	4379.613	0.000	0.000	70.7	5386.790	0.010	OK
Unit 02-Cellular Storage C	FSR: 30 years: +40 %: 360 mins: Winter	29.666	29.666	0.596	0.596	154.8	1109.798	0.000	0.000	43.7	1042.649	25.597	OK
Unit 07-Cellular Storage A	FSR: 30 years: +40 %: 120 mins: Winter	31.887	31.887	0.435	0.435	227.0	570.668	0.000	0.000	49.0	428.973	63.749	OK
Porous Paving (13)	FSR: 30 years: +40 %: 120 mins: Winter	31.621	30.803	0.257	0.201	33.7	74.516	0.000	0.000	16.7	91.585	68.663	OK
Unit 01-Cellular Storage D	FSR: 30 years: +40 %: 360 mins: Winter	29.471	29.471	0.633	0.633	106.4	914.131	0.000	0.000	33.1	633.509	60.450	OK
Unit 06-Cellular Storage B	FSR: 30 years: +40 %: 15 mins: Winter	31.148	31.148	0.073	0.073	118.5	60.857	0.000	0.000	4.5	3.162	95.451	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB	Approved By: WL	
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

DT 02- Cellular Storage	FSR: 30 years: +40 %: 360 mins: Winter	32.287	32.287	0.335	0.335	34.8	252.39 7	0.000	0.000	22.8	248.674	58.121	OK
Unit 04- Cellular Storage A	FSR: 30 years: +40 %: 60 mins: Winter	30.845	30.845	0.096	0.096	30.4	24.957	0.000	0.000	27.5	62.331	88.102	OK
Unit 03- Cellular Storage A	FSR: 30 years: +40 %: 60 mins: Winter	30.883	30.883	0.109	0.109	34.4	28.428	0.000	0.000	26.5	57.703	72.992	OK
Unit(s) 11 to 13- Cellular Storage	FSR: 30 years: +40 %: 480 mins: Winter	32.656	32.656	1.471	1.471	22.6	205.92 7	0.000	0.000	3.1	89.653	0.363	OK
Unit(s) 04 to 05- Cellular Storage	FSR: 30 years: +40 %: 360 mins: Winter	29.818	29.818	0.698	0.698	83.6	497.29 0	0.000	0.000	40.2	547.853	41.984	OK
Unit 02- Cellular Storage B	FSR: 30 years: +40 %: 480 mins: Winter	31.707	31.707	1.196	1.196	56.3	428.62 3	0.000	0.000	23.7	505.850	0.022	OK
Unit 03- Cellular Storage B	FSR: 30 years: +40 %: 120 mins: Winter	30.418	30.418	0.238	0.238	41.3	101.66 6	0.000	0.000	12.1	96.510	40.881	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



FSR: 100 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Outflow

Stormwater Control	Storm Event	Max. US Level (m)	Max. DS Level (m)	Max. US Depth (m)	Max. DS Depth (m)	Max. Inflow (L/s)	Max. Residual Volume (m³)	Max. Flooded Volume (m³)	Total Lost Volume (m³)	Max. Outflow (L/s)	Total Discharge Volume (m³)	Percentage Available (%)	Status
Porous Paving (2)	FSR: 100 years: +40 %: 120 mins: Winter	35.868	35.026	0.773	0.161	40.5	95.466	3.041	0.000	12.8	103.767	46.441	Flood
Porous Paving (3)	FSR: 100 years: +40 %: 30 mins: Winter	34.992	34.846	0.159	0.318	44.5	29.011	0.000	0.000	19.8	35.246	50.332	OK
Porous Paving (4)	FSR: 100 years: +40 %: 30 mins: Winter	34.926	34.835	0.092	0.157	25.7	13.122	0.000	0.000	13.4	21.581	73.037	OK
Porous Paving (5)	FSR: 100 years: +40 %: 30 mins: Winter	35.060	35.004	0.231	0.326	41.4	25.823	0.000	0.000	12.6	30.520	44.782	OK
Porous Paving (6)	FSR: 100 years: +40 %: 30 mins: Winter	34.321	34.287	0.219	0.322	45.8	31.442	0.000	0.000	20.7	34.577	47.812	OK
Porous Paving (7)	FSR: 100 years: +40 %: 30 mins: Winter	35.148	34.962	0.158	0.197	31.4	14.140	0.000	0.000	16.4	27.661	59.966	OK
Porous Paving (8)	FSR: 100 years: +40 %: 60 mins: Winter	35.141	35.136	0.213	0.371	16.0	14.299	0.000	0.000	4.3	16.245	43.945	OK
Porous Paving (9)	FSR: 100 years: +40 %: 30 mins: Winter	32.508	32.450	0.049	0.113	8.6	2.965	0.000	0.000	7.3	7.621	84.633	OK
Porous Paving (10)	FSR: 100 years: +40 %: 30 mins: Winter	32.466	32.416	0.042	0.079	5.0	1.551	0.000	0.000	4.5	4.479	88.441	OK
Porous Paving (11)	FSR: 100 years: +40 %: 30 mins: Winter	32.573	32.544	0.113	0.207	8.6	6.042	0.000	0.000	8.7	6.257	68.690	OK
Porous Paving (12)	FSR: 100 years: +40 %: 15 mins: Winter	32.613	32.547	0.049	0.115	15.1	3.973	0.000	0.000	7.6	5.781	84.433	OK
Porous Paving (14)	FSR: 100 years: +40 %: 30 mins: Winter	32.624	32.578	0.057	0.146	11.8	4.238	0.000	0.000	9.4	10.183	80.164	OK
Porous Paving (15)	FSR: 100 years: +40 %: 30 mins: Winter	33.004	32.785	0.139	0.208	35.6	18.684	0.000	0.000	15.9	30.304	59.757	OK
Porous Paving (16)	FSR: 100 years: +40 %: 60 mins: Winter	34.237	33.846	0.219	0.259	48.2	41.342	0.000	0.000	18.7	71.623	41.665	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			

Porous Paving (17)	FSR: 100 years: +40 %: 60 mins: Winter	34.125	33.893	0.072	0.156	26.1	23.103	0.000	0.000	13.0	37.314	74.766	OK
Porous Paving (18)	FSR: 100 years: +40 %: 30 mins: Winter	34.441	34.231	0.042	0.094	9.4	5.212	0.000	0.000	5.7	7.476	87.350	OK
Porous Paving (19)	FSR: 100 years: +40 %: 60 mins: Winter	32.607	31.699	0.769	0.150	27.2	25.542	0.522	0.000	12.8	41.066	44.809	Flood
Porous Paving (20)	FSR: 100 years: +40 %: 30 mins: Winter	31.574	31.353	0.099	0.179	31.5	16.207	0.000	0.000	15.2	26.864	66.526	OK
Porous Paving (21)	FSR: 100 years: +40 %: 60 mins: Winter	33.687	33.156	0.336	0.135	20.2	19.562	0.000	0.000	11.0	30.199	62.173	OK
Porous Paving (22)	FSR: 100 years: +40 %: 60 mins: Winter	33.769	33.346	0.201	0.127	15.0	15.485	0.000	0.000	10.0	21.954	72.642	OK
Porous Paving (23)	FSR: 100 years: +40 %: 30 mins: Winter	30.848	30.649	0.074	0.167	24.4	12.196	0.000	0.000	13.6	20.747	73.437	OK
Porous Paving (24)	FSR: 100 years: +40 %: 30 mins: Winter	31.092	30.782	0.060	0.025	17.1	6.312	0.000	0.000	12.4	14.630	85.404	OK
Porous Paving (25)	FSR: 100 years: +40 %: 30 mins: Winter	31.804	31.613	0.056	0.125	16.5	8.879	0.000	0.000	9.8	13.378	82.368	OK
Porous Paving (26)	FSR: 100 years: +40 %: 30 mins: Winter	31.594	31.383	0.081	0.170	28.4	14.269	0.000	0.000	14.5	24.248	69.699	OK
Porous Paving (27)	FSR: 100 years: +40 %: 120 mins: Winter	31.027	30.618	0.226	0.205	66.3	134.509	0.000	0.000	17.0	155.144	51.807	OK
Porous Paving (28)	FSR: 100 years: +40 %: 60 mins: Winter	31.150	30.757	0.084	0.178	31.2	25.287	0.000	0.000	15.1	46.154	66.902	OK
Porous Paving (29)	FSR: 100 years: +40 %: 60 mins: Winter	31.205	31.025	0.101	0.171	42.2	42.921	0.000	0.000	14.5	56.445	68.839	OK
Porous Paving (30)	FSR: 100 years: +40 %: 60 mins: Winter	30.914	30.673	0.179	0.221	61.0	62.861	0.000	0.000	17.9	78.570	54.084	OK
Porous Paving (31)	FSR: 100 years: +40 %: 120 mins: Winter	31.703	31.189	0.101	0.187	47.2	87.442	0.000	0.000	15.7	124.779	62.757	OK
Porous Paving (32)	FSR: 100 years: +40 %: 120 mins: Winter	31.066	31.056	0.720	0.973	28.7	133.387	0.000	0.000	9.2	70.963	53.773	OK
Porous Paving (33)	FSR: 100 years: +40 %: 120 mins: Winter	31.069	31.088	0.898	1.067	25.6	88.621	0.000	0.000	15.7	129.564	48.014	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
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Porous Paving (34)	FSR: 100 years: +40 %: 60 mins: Summer	30.970	31.018	1.156	1.316	25.4	47.210	0.000	0.000	22.2	94.439	43.721	OK
Porous Paving (36)	FSR: 100 years: +40 %: 60 mins: Winter	32.142	31.897	0.040	0.095	8.2	6.109	0.000	0.000	6.1	11.993	87.029	OK
Porous Paving (37)	FSR: 100 years: +40 %: 30 mins: Winter	31.617	31.474	0.077	0.072	4.9	2.768	0.000	0.000	4.1	4.145	87.175	OK
Swale 06	FSR: 100 years: +40 %: 15 mins: Winter	29.101	29.049	0.066	0.964	27.7	6.973	0.000	0.000	13.4	5.851	71.490	OK
Swale 05	FSR: 100 years: +40 %: 15 mins: Winter	33.318	33.107	1.967	2.120	17.3	0.740	0.000	0.000	12.8	7.968	92.110	OK
Swale 07	FSR: 100 years: +40 %: 60 mins: Summer	33.569	33.571	1.020	1.577	29.1	54.835	0.000	0.000	22.0	59.195	53.391	OK
Swale 08	FSR: 100 years: +40 %: 30 mins: Summer	34.322	34.298	0.079	1.071	11.6	5.292	0.000	0.000	10.3	10.168	66.281	OK
Swale 01	FSR: 100 years: +40 %: 15 mins: Winter	34.350	34.317	0.276	1.244	31.1	11.519	0.000	0.000	11.4	12.032	55.293	OK
Swale 02	FSR: 100 years: +40 %: 30 mins: Winter	34.378	34.100	1.530	1.856	35.7	17.919	0.000	0.000	16.9	32.787	86.729	OK
Swale 03	FSR: 100 years: +40 %: 15 mins: Winter	33.984	33.552	1.549	1.552	16.1	0.658	0.000	0.000	14.2	7.380	94.113	OK
Swale 04	FSR: 100 years: +40 %: 15 mins: Winter	34.005	33.503	1.502	1.503	19.9	0.970	0.000	0.000	16.0	9.126	99.136	OK
Car Park-Cellular Storage	FSR: 100 years: +40 %: 30 mins: Winter	35.042	35.042	0.496	0.496	182.9	141.250	0.000	0.000	38.3	78.448	58.867	OK
Unit(s) 08 to 10-Cellular Storage	FSR: 100 years: +40 %: 240 mins: Summer	34.964	34.964	1.542	1.542	110.2	292.672	0.000	0.000	37.3	357.420	0.282	OK
HGV Parking-Cellular Storage	FSR: 100 years: +40 %: 15 mins: Summer	35.233	35.233	0.218	0.218	145.0	48.773	0.000	0.000	33.6	35.652	81.942	OK
Unit 16-Cellular Storage	FSR: 100 years: +40 %: 240 mins: Winter	32.360	32.360	1.774	1.774	84.8	267.041	0.000	0.000	32.8	460.623	0.289	OK
Porous Paving (1)	FSR: 100 years: +40 %: 30 mins: Winter	33.067	32.932	0.067	0.151	20.1	8.202	0.000	0.000	13.0	17.553	76.081	OK
Porous Paving (39)	FSR: 100 years: +40 %: 30 mins: Winter	33.118	32.903	0.042	0.087	9.4	5.053	0.000	0.000	5.7	7.472	91.526	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Stormwater Controls Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
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Porous Paving (40)	FSR: 100 years: +40 %: 30 mins: Winter	33.013	32.946	0.086	0.153	17.0	5.618	0.000	0.000	13.1	15.196	75.341	OK
Porous Paving	FSR: 100 years: +40 %: 15 mins: Winter	34.197	34.034	0.055	0.043	19.2	3.306	0.000	0.000	13.4	8.214	86.008	OK
Porous Paving (41)	FSR: 100 years: +40 %: 15 mins: Winter	34.469	34.149	0.243	0.058	37.4	7.815	0.000	0.000	19.2	16.171	65.827	OK
Porous Paving (42)	FSR: 100 years: +40 %: 15 mins: Winter	33.668	33.748	0.100	0.305	37.6	7.024	0.000	0.000	21.2	6.168	64.345	OK
Porous Paving (43)	FSR: 100 years: +40 %: 60 mins: Winter	34.298	34.299	0.080	0.118	1.2	1.111	0.000	0.000	0.7	0.917	81.130	OK
Porous Paving (44)	FSR: 100 years: +40 %: 60 mins: Winter	34.297	34.257	0.031	0.016	1.2	0.178	0.000	0.000	1.2	1.956	95.474	OK
Unit 02-Cellular Storage A	FSR: 100 years: +40 %: 1440 mins: Winter	29.733	29.733	1.415	1.415	73.6	2473.770	0.000	0.000	34.5	2707.577	11.623	OK
Unit 06-Cellular Storage A	FSR: 100 years: +40 %: 60 mins: Winter	32.021	32.021	0.659	0.659	176.5	264.552	0.000	0.000	9.3	24.355	45.200	OK
Unit(s) 14 to 15-Cellular Storage	FSR: 100 years: +40 %: 30 mins: Winter	31.116	31.116	0.366	0.366	151.8	138.941	0.000	0.000	9.5	4.969	77.185	OK
Unit 01-Cellular Storage A	FSR: 100 years: +40 %: 60 mins: Winter	29.360	29.360	0.610	0.610	611.3	875.954	0.000	0.000	41.0	206.996	23.863	OK
Unit 01-Cellular Storage B	FSR: 100 years: +40 %: 480 mins: Winter	29.846	29.846	2.097	2.097	198.7	1500.135	0.000	0.000	53.2	1309.531	0.066	OK
Unit 01-Cellular Storage C	FSR: 100 years: +40 %: 1440 mins: Summer	29.619	29.619	3.114	3.114	200.8	4379.967	0.000	0.000	71.0	4759.195	0.002	OK
Unit 02-Cellular Storage C	FSR: 100 years: +40 %: 480 mins: Winter	31.359	31.359	2.289	2.289	168.6	1491.648	0.000	0.000	54.4	1305.478	-0.003	OK
Unit 07-Cellular Storage A	FSR: 100 years: +40 %: 240 mins: Winter	32.077	32.077	0.625	0.625	191.6	818.751	0.000	0.000	52.0	947.755	47.989	OK
Porous Paving (13)	FSR: 100 years: +40 %: 120 mins: Winter	31.766	30.819	0.402	0.217	44.3	97.046	0.000	0.000	17.7	121.509	59.188	OK
Unit 01-Cellular Storage D	FSR: 100 years: +40 %: 30 mins: Winter	29.157	29.157	0.319	0.319	438.9	460.663	0.000	0.000	32.1	7.267	80.069	OK
Unit 06-Cellular Storage B	FSR: 100 years: +40 %: 480 mins: Winter	31.365	31.365	0.290	0.290	27.2	242.303	0.000	0.000	3.3	156.607	81.890	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023					
Report Details: Type: Stormwater Controls Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB	Approved By: WL			
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ					

DT 02- Cellular Storage	FSR: 100 years: +40 %: 480 mins: Winter	32.429	32.429	0.477	0.477	36.5	358.56 0	0.000	0.000	25.3	359.941	40.506	OK
Unit 04- Cellular Storage A	FSR: 100 years: +40 %: 60 mins: Winter	30.955	30.955	0.206	0.206	38.4	53.755	0.000	0.000	34.6	81.925	74.373	OK
Unit 03- Cellular Storage A	FSR: 100 years: +40 %: 30 mins: Winter	30.934	30.934	0.160	0.160	52.1	41.806	0.000	0.000	29.1	47.228	60.283	OK
Unit(s) 11 to 13- Cellular Storage	FSR: 100 years: +40 %: 480 mins: Winter	32.908	32.908	1.723	1.723	29.3	206.16 7	0.000	0.000	3.4	171.056	0.247	OK
Unit(s) 04 to 05- Cellular Storage	FSR: 100 years: +40 %: 240 mins: Summer	30.001	30.001	0.881	0.881	157.4	627.70 7	0.000	0.000	39.8	491.018	26.769	OK
Unit 02- Cellular Storage B	FSR: 100 years: +40 %: 360 mins: Winter	32.216	32.216	1.705	1.705	90.4	524.93 5	95.91 5	0.000	28.1	553.084	-22.444	Flood
Unit 03- Cellular Storage B	FSR: 100 years: +40 %: 120 mins: Winter	30.522	30.522	0.342	0.342	54.3	146.40 3	0.000	0.000	13.2	92.203	14.867	OK

Project: Bryn Lane, Wrexham Wrexham Industrial Estate, Phase 2 Revision: P01		Date: 28/06/2023			
Report Details: Type: Connections Summary Storm Phase: Phase		Designed by: FJB	Checked by: PJB		Approved By: WL
		Company Address: Tier Consult Group Unit 5 Office Village, Sandpiper Court Chester Business Park, Chester, CH4 9QZ			



FSR: 1 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Flow

Connection	Storm Event	Connection Type	From	To	Upstream Cover Level (m)	Max. US Water Level (m)	Max. Flow Depth (m)	Discharge Volume (m³)	Max. Velocity (m/s)	Flow / Capacity	Max. Flow (L/s)	Status
SWPipe003	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH004	SWMH006	37.553	36.806	0.065	5.780	1.3	0.23	12.1	OK
SWPipe006	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH027	SWMH033	35.270	33.174	0.225	109.892	1.2	1.29	47.5	Surcharged
SWPipe007	FSR: 1 years: +40 %: 60 mins: Summer	Pipe	SWMH033	SWMH035	35.119	32.994	0.225	161.950	1.8	1.31	47.8	Surcharged
SWPipe008	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH035	SWMH032	35.007	32.914	0.225	181.685	1.2	0.3	47.4	Surcharged
SWPipe009	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH008	SWMH009	36.756	35.356	0.000	0.000	0.0	0	0.0	OK
SWPipe010	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH009	SWMH011	36.499	35.188	0.000	0.000	0.0	0	0.0	OK
SWPipe011	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH011	SWMH012	36.241	35.020	0.000	0.000	0.0	0	0.0	OK
SWPipe012	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH012	SWMH016	35.983	34.852	0.083	0.000	0.0	0	0.0	OK
SWPipe013	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH016	SWMH024	35.726	32.810	0.225	3.800	0.3	0.07	7.4	Surcharged
SWPipe014	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH044	SWMH051	34.550	32.796	0.225	17.604	0.8	0.12	26.8	OK
SWPipe015	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH051	SWMH049	34.219	32.710	0.225	26.389	0.6	0.66	24.4	Surcharged
SWPipe016	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH056	SWMH049	34.106	32.302	0.225	26.116	0.4	0.45	16.4	Surcharged
SWPipe017	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH049	SWMH024	34.290	32.313	0.225	70.943	0.7	0.5	18.2	Surcharged
SWPipe018	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH021	SWMH022	35.614	34.764	0.083	31.383	2.4	0.03	6.5	OK
SWPipe019	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH022	SWMH024	35.549	32.812	0.225	4.094	0.2	0.05	7.1	Surcharged
SWPipe020	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH024	SWMH032	35.388	32.643	0.225	128.606	0.7	0.67	24.4	Surcharged
SWPipe022	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH030	SWMH028	35.211	34.529	0.058	1.518	0.4	0.06	3.0	OK
SWPipe023	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH028	SWMH029	35.256	34.053	0.085	7.299	1.0	0.27	14.0	OK
SWPipe024	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH029	SWMH026	35.228	33.539	0.130	7.257	0.5	0.34	12.3	OK

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		FJB	PJB		WL
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SWPipe025	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH025	SWMH026	35.326	34.510	0.127	29.778	0.7	0.21	14.2	OK
SWPipe026	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH026	SWMH034	35.295	33.483	0.177	48.160	1.0	0.9	33.0	OK
SWPipe027	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH034	SWMH036	35.025	33.400	0.122	82.553	1.9	1.12	40.9	OK
SWPipe028	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH036	SWMH047	34.910	33.263	0.225	82.522	1.5	0.24	39.8	OK
SWPipe029	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH085	SWMH075	33.244	32.405	0.087	7.013	1.4	0.53	14.6	OK
SWPipe032	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	SWMH074	SWMH047	33.643	31.495	0.225	34.469	0.5	0.05	2.0	Surcharged
SWPipe033	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH047	SWMH055	34.365	31.853	0.300	220.593	1.5	1.34	105.3	Surcharged
SWPipe034	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH055	SWMH058	34.119	31.588	0.300	223.530	1.5	1.38	107.6	Surcharged
SWPipe037	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	SWMH065	SWMH058	33.833	31.343	0.225	340.665	1.1	0.88	45.5	Surcharged
SWPipe038	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH058	SWMH050	34.032	31.387	0.300	538.877	2.0	1.78	139.0	Surcharged
SWPipe039	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH050	SWMH045	34.238	30.745	0.155	312.566	3.9	0.49	142.5	OK
SWPipe040	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH045	SWMH043	34.452	29.045	0.224	323.639	1.6	0.22	151.5	OK
SWPipe041	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH043	SWMH039	34.578	28.914	0.280	324.889	1.6	0.22	153.0	OK
SWPipe042	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH039	SWMH038	34.712	28.891	0.433	323.949	1.7	0.22	151.6	OK
SWPipe043	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH038	SWMH040	34.741	28.875	0.592	323.531	1.8	0.22	151.2	OK
SWPipe044	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH068	SWMH069	33.760	32.176	0.085	5.520	1.1	0.45	11.5	OK
SWPipe046	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH086	SWMH054	34.048	30.588	0.098	115.137	1.0	0.72	12.8	OK
SWPipe047	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH054	SWMH048	34.185	30.408	0.059	115.077	1.5	0.25	12.8	OK
SWPipe048	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH048	SWMH040	34.360	30.293	0.225	115.025	2.6	0.07	12.8	OK
SWPipe049	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH040	SWMH053	34.626	28.398	0.347	177.512	1.5	0.21	163.5	OK
SWPipe056	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH052	SWMH073	34.462	32.729	0.000	0.000	0.0	0	0.0	OK
SWPipe060	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH062	SWMH080	33.870	31.457	0.225	4.835	0.3	0.15	5.5	Surcharged
SWPipe061	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH080	SWMH096	33.445	31.455	0.225	4.753	0.2	0.13	4.7	Surcharged

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SWPipe062	FSR: 1 years: +40 %: 360 mins: Winter	Pipe	SWMH096	SWMH101	33.006	31.606	0.033	142.256	1.1	0.05	4.1	Surcharged
SWPipe063	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH132	SWMH101	32.047	30.351	0.059	21.454	0.6	0.02	8.5	OK
SWPipe064	FSR: 1 years: +40 %: 480 mins: Winter	Pipe	SWMH076	SWMH101	33.567	31.153	0.023	97.551	1.1	0.02	2.4	Surcharged
SWPipe065	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH101	SWMH097	32.686	30.211	0.075	60.722	0.8	0.02	15.9	OK
SWPipe066	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH133	SWMH097	32.016	30.098	0.076	43.923	0.7	0.24	8.8	OK
SWPipe067	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH097	SWMH092	32.959	29.584	0.096	103.598	1.0	0.04	29.9	OK
SWPipe068	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH099	SWMH078	32.756	29.303	0.225	75.681	0.8	0.58	21.3	Surcharged
SWPipe069	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH078	SWMH063	33.560	29.217	0.600	196.541	1.3	0.09	61.3	Surcharged
SWPipe070	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH041	SWMH046	34.622	33.551	0.041	18.786	0.9	0.12	4.5	OK
SWPipe071	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH046	SWMH063	34.387	33.480	0.225	34.415	3.9	0.04	13.7	OK
SWPipe074	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH079	SWMH077	33.456	32.430	0.225	12.787	3.9	0.07	18.9	OK
SWPipe076	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH156	SWMH141	31.300	30.340	0.053	3.736	1.3	0.26	7.3	OK
SWPipe077	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH141	SWMH130	31.754	28.410	0.191	6.649	0.7	0.02	12.6	OK
SWPipe079	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH095	SWMH100	33.010	28.745	0.600	472.771	1.4	0.58	283.8	Surcharged
SWPipe080	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	SWMH144	SWMH125	31.691	29.009	0.225	348.887	1.2	0.49	25.5	Surcharged
SWPipe081	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH125	SWMH130	32.236	29.196	0.225	211.171	1.3	0.57	29.7	Surcharged
SWPipe083	FSR: 1 years: +40 %: 30 mins: Summer	Pipe	SWMH100	SWMH108	32.721	28.502	0.600	429.572	1.5	0.54	263.8	Surcharged
SWPipe084	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH091	SWMH094	33.075	32.140	0.064	3.021	0.9	0.35	6.3	OK
SWPipe086	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH098	SWMH102	32.842	30.074	0.142	12.502	0.9	0.62	22.7	OK
SWPipe087	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH102	SWMH103	32.683	29.784	0.186	18.388	0.9	0.82	30.1	OK
SWPipe088	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH103	SWMH106	32.524	29.526	0.202	24.292	1.0	1.02	37.5	OK
SWPipe089	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH106	SWMH107	32.489	29.430	0.136	27.017	1.7	1.14	41.6	OK
SWPipe090	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH107	SWMH108	32.449	29.245	0.225	31.378	3.9	0.26	50.4	OK

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SWPipe091	FSR: 1 years: +40 %: 30 mins: Summer	Pipe	SWMH108	SWMH148	32.445	28.478	0.600	452.139	1.3	0.54	260.3	Surcharged
SWPipe093	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	SWMH137	SWMH150	31.781	29.066	0.225	466.003	1.5	0.94	34.3	Surcharged
SWPipe094	FSR: 1 years: +40 %: 360 mins: Winter	Pipe	SWMH150	SWMH129	31.542	28.981	0.225	630.011	1.7	0.36	36.0	Surcharged
SWPipe095	FSR: 1 years: +40 %: 360 mins: Winter	Pipe	SWMH129	SWMH142	32.214	28.869	0.600	660.155	0.8	0.05	37.3	Surcharged
SWPipe096	FSR: 1 years: +40 %: 360 mins: Winter	Pipe	SWMH142	SWMH153	31.754	28.868	0.600	659.103	0.8	0.05	37.6	Surcharged
SWPipe097	FSR: 1 years: +40 %: 360 mins: Winter	Pipe	SWMH153	SWMH148	31.466	28.868	0.600	664.747	0.2	0.06	38.0	Surcharged
SWPipe101	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH152	SWMH175	31.466	30.560	0.000	0.000	0.0	0	0.0	OK
SWPipe103	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH180	SWMH170	30.675	28.814	0.225	129.439	0.7	0.73	26.8	OK
SWPipe108	FSR: 1 years: +40 %: 480 mins: Winter	Pipe	SWMH157	SWMH173	31.281	27.955	0.225	1196.762	1.1	0.96	35.3	Surcharged
SWPipe115	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH181	SWMH178	30.358	28.803	0.600	1195.322	0.5	0.31	149.9	Surcharged
SWPipe116	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH178	SWMH166	30.604	28.796	0.600	1189.744	0.5	0.31	149.1	Surcharged
SWPipe123	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH164	SWMH165	31.053	30.260	0.088	3.410	0.7	0.4	7.1	OK
SWPipe124	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH165	SWMH122	31.050	30.042	0.086	7.158	1.4	0.81	14.4	OK
SWPipe129	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	SWMH131	SWMH135	32.094	28.622	0.225	336.789	0.9	0.89	32.7	Surcharged
SWPipe130	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	SWMH135	SWMH143	31.969	28.638	0.225	336.589	0.9	0.9	32.8	Surcharged
SWPipe131	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	SWMH143	SWMH149	31.723	28.657	0.225	336.376	0.9	0.9	32.9	Surcharged
SWPipe132	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	SWMH149	SWMH151	31.543	28.670	0.225	367.386	1.0	0.92	33.7	Surcharged
SWPipe133	FSR: 1 years: +40 %: 240 mins: Summer	Pipe	SWMH151	SWMH154	31.502	28.661	0.225	355.232	1.0	0.97	35.4	Surcharged
SWPipe134	FSR: 1 years: +40 %: 120 mins: Summer	Pipe	SWMH139	SWMH140	31.773	28.698	0.225	0.006	0.1	0.04	2.1	Surcharged
SWPipe135	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	SWMH140	SWMH154	31.769	28.716	0.225	71.493	0.2	0.15	8.0	Surcharged
SWPipe136	FSR: 1 years: +40 %: 120 mins: Summer	Pipe	SWMH154	SWMH160	31.377	28.697	0.225	228.389	1.8	1.06	38.9	Surcharged
SWPipe137	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH163	SWMH160	31.173	30.413	0.225	0.000	0.0	0	0.0	OK
SWPipe138	FSR: 1 years: +40 %: 120 mins: Summer	Pipe	SWMH160	SWMH166	31.193	28.699	0.225	228.230	1.4	0.18	39.8	Surcharged

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SWPipe139	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH166	SWMH167	30.978	28.786	0.300	1451.836	2.0	1.81	141.7	Surcharged
SWPipe140	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH155	SWMH152	31.365	30.760	0.000	0.000	0.0	0	0.0	OK
SWPipe156	FSR: 1 years: +40 %: 480 mins: Winter	Pipe	SWMH064	SWMH045	33.800	30.951	0.027	83.819	0.6	0.03	1.6	Surcharged
SWPipe159	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH121	SWMH069	32.280	31.729	0.076	3.235	0.6	0.13	6.8	OK
SWPipe161	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH003	SWMH004	37.560	37.008	0.050	2.093	1.1	0.46	4.4	OK
SWPipe163	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH089	SWMH085	33.189	32.454	0.035	2.577	0.4	0.06	1.1	OK
SWPipe164	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH031	SWMH030	35.211	34.646	0.037	1.526	1.0	0.12	3.2	OK
SWPipe165b	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH002	SWMH001	37.813	37.030	0.066	5.009	1.4	0.38	10.6	OK
SWPipe167	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH020	SWMH021	35.625	34.923	0.053	31.399	1.2	0.23	6.5	OK
SWPipe175	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH023	SWMH025	35.438	34.750	0.068	10.209	1.3	0.74	7.1	OK
SWPipe177	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH081	SWMH079	33.337	32.630	0.050	12.424	1.2	0.22	6.3	OK
SWPipe179	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH179	SWMH175	30.525	29.920	0.000	0.000	0.0	0	0.0	OK
SWPipe183	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH093	SWMH091	33.055	32.482	0.046	1.496	0.7	0.07	3.2	OK
SWPipe186	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH059	SWMH051	34.031	32.937	0.150	1.399	0.7	0.07	2.6	OK
SWPipe187	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH061	SWMH059	33.872	33.292	0.041	1.442	0.4	0.04	3.1	OK
SWPipe190	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH104	SWMH092	32.510	29.681	0.075	23.779	0.5	0.01	9.6	OK
Porous Paving (11)	FSR: 1 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (11)	SWMH089		32.399	0.012	2.580	0.0		1.1	
SWPipe226	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (9)	SWMH082	33.219	32.372	0.030	2.187	0.7	0.06	1.8	OK
Porous Paving (2)	FSR: 1 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (2)	SWMH020		34.960	0.013	31.421	0.0		6.5	
Porous Paving (5)	FSR: 1 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (5)	SWMH023		34.760	0.026	10.233	0.0		7.1	
Porous Paving (4)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (4)	SWMH026		34.732	0.011	8.727	0.0		4.1	
Porous Paving (6)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (6)	SWMH034		34.042	0.022	15.691	0.0		7.1	
Porous Paving (15)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (15)	SWMH081		32.648	0.034	12.434	0.0		6.3	

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Porous Paving (25)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (25)	SWMH1 29		31.526	0.017	5.305	0.0		2.2	
Porous Paving (26)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (26)	SWMH1 29		31.272	0.013	9.770	0.0		4.7	
Porous Paving (27)	FSR: 1 years: +40 %: 240 mins: Winter	No Delay	Porous Paving (27)	SWMH1 40		30.498	0.028	71.524	0.0		7.9	
Porous Paving (28)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (28)	SWMH1 51		30.642	0.018	13.249	0.0		5.2	
Porous Paving (29)	FSR: 1 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (29)	SWMH1 49		30.913	0.016	22.971	0.0		4.7	
Porous Paving (3)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (3)	SWMH0 25		34.604	0.032	15.353	0.0		7.2	
SWPipe00 4a	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH0 06	SWMH1 89	37.242	36.570	0.221	7.013	1.0	0.11	14.3	OK
SWPipe00 4b	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH1 89	SWMH0 10	36.479	33.604	0.225	98.107	0.7	0.78	28.7	Surcharged
SWPipe05 0	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH0 14	SWMH1 89	35.832	33.589	0.225	50.719	0.7	0.63	23.1	Surcharged
SWPipe05 2	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH0 18	SWMH0 13	35.723	34.661	0.150	9.465	0.9	0.86	15.1	OK
SWPipe05 3	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH0 15	SWMH0 18	35.728	34.673	0.117	1.781	0.5	0.06	2.5	OK
SWPipe05 4	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH0 17	SWMH0 15	35.725	34.725	0.045	5.144	0.5	0.05	2.1	OK
SWPipe08 5a	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH0 94	SWMH1 90	33.026	32.000	0.063	6.566	1.9	0.36	13.1	OK
SWPipe08 5b	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH1 90	SWMH0 98	32.917	30.184	0.109	6.556	0.7	0.34	12.5	OK
SWPipe11 8	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH1 09	SWMH1 38	32.363	30.463	0.173	20.435	1.0	0.91	33.4	OK
SWPipe11 7	FSR: 1 years: +40 %: 480 mins: Winter	Pipe	SWMH1 14	SWMH1 09	32.223	30.459	0.077	235.154	0.7	0.21	7.8	OK
SWPipe18 9a	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH0 92	SWMH1 93	33.072	29.441	0.127	209.291	1.3	0.06	39.5	OK
SWPipe18 9b	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH1 93	SWMH1 94	33.150	29.278	0.315	135.543	1.3	0.06	41.4	OK
SWPipe18 9c	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH1 94	SWMH0 78	33.452	29.218	0.600	142.027	1.2	0.06	44.4	OK
SWPipe00 5c	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH1 92	SWMH0 27	35.584	33.326	0.225	108.770	1.2	1.26	46.3	Surcharged
SWPipe00 5a	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH0 10	SWMH1 91	36.266	33.594	0.225	170.721	1.1	1.17	42.9	Surcharged
SWPipe00 5b	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH1 91	SWMH1 92	35.896	33.455	0.225	174.992	1.1	1.2	43.8	Surcharged
SWPipe00 2c	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH1 95	SWMH0 10	36.466	33.735	0.225	66.200	0.6	0.26	25.1	OK

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SWPipe002a	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH005	SWMH196	37.382	34.500	0.104	54.778	1.1	0.27	20.5	OK
SWPipe002b	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH196	SWMH195	37.012	33.968	0.102	56.782	1.2	0.58	21.1	OK
SWPipe021a	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH032	SWMH197	35.141	32.799	0.225	70.736	1.4	1.55	56.8	Surcharged
SWPipe021b	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH197	SWMH198	34.860	32.488	0.225	69.009	1.5	1.58	57.9	Surcharged
SWPipe021c	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH198	SWMH047	34.530	32.131	0.225	152.625	1.6	1.71	62.7	Surcharged
SWPipe073a	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH053	SWMH199	34.186	28.186	0.600	235.566	1.6	0.34	237.0	OK
SWPipe073b	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH199	SWMH077	33.992	28.175	0.600	226.560	1.4	0.5	241.8	Surcharged
SWPipe075a	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH077	SWMH200	33.566	28.157	0.600	230.606	1.4	0.55	267.3	Surcharged
SWPipe075b	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH200	SWMH095	33.150	28.761	0.600	464.141	1.3	0.51	249.6	Surcharged
SWPipe113a	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH168	SWMH201	30.946	28.910	0.600	2009.939	1.0	0.51	248.7	Surcharged
SWPipe113b	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH201	SWMH181	30.650	28.856	0.600	2001.771	0.9	0.51	249.0	Surcharged
Swale 03	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Swale 03	SWMH045	34.934	32.050	0.025	2.327	2.4	0.06	4.5	OK
SWPipe072a	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH063	SWMH202	33.811	28.848	0.600	133.047	1.5	0.1	70.6	Surcharged
SWPipe072b	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH202	SWMH053	33.969	28.847	0.600	127.427	0.8	0.11	72.4	Surcharged
Swale 02	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Swale 02	SWMH198	35.347	32.345	0.150	7.694	1.6	0.29	14.6	OK
Swale 01	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Swale 01	SWMH022	36.574	33.139	0.140	4.109	2.6	0.09	7.2	OK
Swale 08	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Swale 08	SWMH016	36.743	33.275	0.110	2.603	1.9	0.09	4.9	OK
Swale 05	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Swale 05	SWMH077	33.852	31.039	0.150	2.520	0.4	0.06	5.0	OK
Swale 04	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Swale 04	SWMH053	35.002	32.056	0.150	2.872	0.3	0.07	5.6	OK
SWPipe098a	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH148	SWMH203	31.544	29.018	0.600	2023.897	1.1	0.51	248.1	Surcharged
SWPipe098b	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH203	SWMH168	31.278	28.968	0.600	2018.488	1.1	0.51	249.2	Surcharged
SWPipe222	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH001	SWMH250	37.861	36.493	0.061	4.999	1.5	0.37	10.2	OK
SWPipe221	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH249	SWMH248	37.647	37.081	0.029	2.573	3.0	0.25	5.5	OK

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SWPipe220	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH248	Car Park -Cellular Storage	37.580	36.039	0.055	2.573	2.7	0.04	5.5	OK
SWPipe001	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH250	Car Park -Cellular Storage	37.587	36.076	0.062	15.004	6.1	0.21	31.7	OK
SWPipe219	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH247	Car Park -Cellular Storage	37.328	36.087	0.063	19.028	6.9	0.27	41.1	OK
Car Park-Cellular Storage	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Car Park-Cellular Storage	SWMH005	37.146	34.667	0.108	54.836	1.5	0.73	20.5	OK
Porous Paving (8)	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (8)	SWMH017	35.688	34.821	0.032	5.159	0.8	0.08	2.1	OK
Porous Paving (7)	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (7)	SWMH014	35.750	34.835	0.150	8.134	0.6	0.08	6.8	OK
Unit(s) 08 to 10-Cellular Storage	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Unit(s) 08 to 10 -Cellular Storage	SWMH014	35.912	33.566	0.150	39.661	1.4	0.49	21.9	OK
SWMH013	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH013	Unit(s) 08 to 10-Cellular Storage	35.955	34.383	0.150	18.368	1.8	1.12	31.3	Surcharged
SWPipe213	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH242	HGV Parking-Cellular Storage	37.210	36.505	0.035	0.000	0.0	0	0.0	OK
SWPipe216	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	HGV Parking-Cellular Storage	SWMH244	37.265	35.103	0.070	33.799	1.8	0.52	14.5	OK
SWPipe211	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH239	HGV Parking-Cellular Storage	38.066	37.083	0.045	3.819	4.0	0.16	8.2	OK
SWMH244	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH244	SWMH189	37.233	35.005	0.150	33.768	0.8	0.26	14.4	OK
SWPipe207	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	Unit 16-Cellular Storage	SWMH086	33.946	30.828	0.100	115.228	1.6	1.33	12.8	Surcharged
SWPipe209	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH236	Unit 16-Cellular Storage	33.303	32.447	0.074	11.379	2.8	0.41	24.4	OK
Porous Paving	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	Porous Paving	SWMH044	34.902	34.027	0.021	3.356	1.9	0.04	2.9	OK
Porous Paving (42)	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (42)	SWMH044	34.328	33.462	0.013	1.529	1.1	0.02	0.8	OK
Porous Paving (41)	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Porous Paving (41)	SWMH044	34.986	34.156	0.066	4.689	1.8	0.12	7.1	OK
Porous Paving (44)	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Porous Paving (44)	Porous Paving	35.026	34.248	0.091	0.116	0.0	0.01	0.2	OK
Porous Paving (43)	FSR: 1 years: +40 %: 480 mins: Winter	Pipe	Porous Paving (43)	Porous Paving (44)	34.979	34.256	0.052	0.121	0.0	0.01	0.0	OK
SWPipe078	FSR: 1 years: +40 %: 60 mins: Summer	Pipe	SWMH130	SWMH228	32.209	28.918	0.600	122.139	1.1	0.06	38.8	Surcharged
SWPipe078 (1)	FSR: 1 years: +40 %: 60 mins: Summer	Pipe	SWMH228	SWMH095	32.536	28.918	0.600	115.061	0.3	0.07	48.1	Surcharged

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SWPipe203	FSR: 1 years: +40 %: 120 mins: Summer	Pipe	SWMH229	SWMH228	31.386	29.064	0.600	4.115	0.2	0.01	4.7	Surcharged
Swale 07	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Swale 07	SWMH047	34.250	32.052	0.150	3.018	0.9	0.14	5.7	OK
Porous Paving (16)	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (16)	SWMH046	34.778	33.681	0.059	21.613	1.5	0.26	9.7	OK
Porous Paving (17)	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (17)	SWMH041	34.813	33.788	0.036	14.666	1.0	0.12	3.5	OK
Porous Paving (18)	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (18)	SWMH041	35.159	34.165	0.017	2.930	1.0	0.03	1.1	OK
SWPipe144	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (32)	SWMH119	32.418	30.176	0.150	18.183	0.2	0.15	4.0	OK
SWPipe180	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH119	Porous Paving (33)	32.284	30.258	0.143	0.000	0.3	0.19	5.2	Surcharged
Porous Paving (36)	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (36)	SWMH119	32.862	31.830	0.109	4.689	0.1	0.02	1.2	OK
SWPipe146	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (33)	SWMH126	32.306	30.100	0.075	20.908	0.6	0.17	4.9	OK
SWPipe181	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH126	Porous Paving (34)	32.232	29.910	0.093	0.069	0.4	0.17	4.9	OK
SWPipe148	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (34)	SWMH125	32.269	29.781	0.150	22.132	1.0	0.06	5.0	OK
Porous Paving (37)	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (37)	SWMH125	32.299	31.433	0.150	1.644	0.6	0.01	0.9	OK
SWPipe125a	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH122	Unit 02-Cellular Storage A	32.279	29.847	0.059	7.153	2.2	0.29	14.1	OK
SWPipe155	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Unit(s) 14 to 15-Cellular Storage	SWMH064	33.600	30.825	0.150	3.804	0.9	0.13	9.8	OK
Porous Paving (12)	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (12)	Unit(s) 14 to 15-Cellular Storage	33.324	32.468	0.023	3.507	1.1	0.05	1.8	OK
SWPipe176	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (14)	Unit(s) 14 to 15-Cellular Storage	33.327	32.478	0.030	2.692	1.0	0.08	2.6	OK
SWPipe201	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH087	Unit(s) 14 to 15-Cellular Storage	33.225	32.514	0.107	13.094	2.1	0.75	27.9	OK
SWPipe200	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (23)	SWMH150	31.534	30.536	0.150	8.317	3.0	0.03	4.0	OK
SWPipe199	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (24)	SWMH150	31.793	30.792	0.150	5.785	3.4	0.02	2.8	OK
SWPipe104	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH170	Unit 01-Cellular Storage B	31.275	28.708	0.150	151.287	1.9	1.91	34.0	Surcharged

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SWPipe196	FSR: 1 years: +40 %: 480 mins: Winter	Pipe	Unit 01-Cellular Storage B	SWMH157	30.975	28.120	0.150	1196.991	2.0	0.79	35.3	Surcharged
SWPipe192	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH138	SWMH278	31.781	30.110	0.163	20.131	0.9	0.8	29.2	OK
SWPipe236	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH278	SWMH277	31.781	29.994	0.189	19.978	0.9	0.73	27.0	OK
SWPipe235	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH277	Unit 02-Cellular Storage C	32.048	29.911	0.140	32.543	1.5	0.94	26.6	Surcharged
SWMH136	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH136	Unit 02-Cellular Storage C	31.781	30.396	0.073	9.956	2.5	0.44	21.3	OK
SWPipe092	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	Unit 02-Cellular Storage C	SWMH137	31.873	29.223	0.150	466.157	2.2	0.92	34.1	Surcharged
SWPipe128b	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	Unit 02-Cellular Storage A	SWMH131	32.225	28.552	0.150	336.975	1.8	0.89	32.7	Surcharged
SWPipe100	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH175	Unit 01-Cellular Storage A	30.680	29.690	0.000	0.000	0.0	0	0.0	OK
SWPipe099	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH176	Unit 01-Cellular Storage A	30.675	29.412	0.000	0.000	0.0	0	0.0	OK
SWPipe102	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH177	Unit 01-Cellular Storage A	30.675	29.412	0.000	0.000	0.0	0	0.0	OK
SWPipe197	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	Unit 01-Cellular Storage A	SWMH180	30.550	28.958	0.150	409.714	1.5	0.95	26.3	Surcharged
SWPipe110	FSR: 1 years: +40 %: 960 mins: Winter	Pipe	Unit 01-Cellular Storage C	SWMH171	30.563	27.516	0.150	1885.969	3.3	1.04	59.1	Surcharged
SWPipe193	FSR: 1 years: +40 %: 480 mins: Winter	Pipe	SWMH173	Unit 01-Cellular Storage C	30.713	27.759	0.150	1196.559	2.0	1.16	35.3	Surcharged
SWPipe233	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	SWMH272	SWMH065	33.803	31.488	0.225	149.736	1.2	0.88	45.5	Surcharged
Unit 07-Cellular Storage A	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Unit 07-Cellular Storage A	SWMH272	33.652	31.574	0.150	149.894	2.6	0.73	45.5	OK
SWMH066	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH066	Unit 07-Cellular Storage A	33.764	32.665	0.000	0.000	0.0	0	0.0	OK
SWMH067	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH067	Unit 07-Cellular Storage A	33.764	32.552	0.000	0.000	0.0	0	0.0	OK
SWPipe218	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH072	SWMH062	33.720	31.458	0.225	5.144	0.5	0.17	6.3	Surcharged

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SWPipe057	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH073	Unit 06-Cellular Storage A	33.719	32.420	0.000	0.000	0.0	0	0.0	OK
SWPipe058	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH071	Unit 06-Cellular Storage A	33.720	32.530	0.091	7.268	1.4	0.56	15.5	OK
SWPipe232	FSR: 1 years: +40 %: 30 mins: Summer	Pipe	Unit 06-Cellular Storage A SWMH072		33.671	31.494	0.150	10.638	1.0	0.58	10.3	OK
Porous Paving (13)	FSR: 1 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (13)	Unit 01-Cellular Storage D		30.678	0.010	35.247	0.0		8.1	
Porous Paving (30)	FSR: 1 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (30)	Unit 01-Cellular Storage D		30.531	0.010	34.528	0.0		7.8	
SWPipe231	FSR: 1 years: +40 %: 240 mins: Winter	Pipe	Unit 01-Cellular Storage D SWMH144		31.362	29.024	0.150	349.177	1.9	0.48	25.5	Surcharged
Porous Paving (31)	FSR: 1 years: +40 %: 240 mins: Winter	No Delay	Porous Paving (31)	Unit 01-Cellular Storage D		31.069	0.008	51.023	0.0		6.0	
SWPipe142	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH120	Unit 01-Cellular Storage D	31.456	30.292	0.093	4.430	1.2	0.96	9.3	Surcharged
Unit 06-Cellular Storage B	FSR: 1 years: +40 %: 60 mins: Summer	Pipe	Unit 06-Cellular Storage B SWMH076		33.021	31.121	0.120	11.573	0.3	0.07	2.6	OK
Porous Paving (22)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (22)	Unit 06-Cellular Storage B		33.275	0.015	6.096	0.0		3.0	
Porous Paving (21)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (21)	Unit 06-Cellular Storage B		33.095	0.017	8.798	0.0		4.7	
SWPipe082	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH145	Unit 01-Cellular Storage D	31.487	30.382	0.078	4.045	0.9	0.48	8.6	OK
SWPipe230	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	SWMH167	Pumping Station	30.962	27.430	0.300	1449.366	2.0	1.81	141.8	Surcharged
SWPipe228	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	Swale 06 SWMH265		31.535	28.152	0.102	3.954	0.6	0.22	6.2	OK
SWPipe229	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH265 SWMH166		30.672	28.245	0.150	4.140	0.3	0.07	5.7	Surcharged
Porous Paving (39)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (39)	DT 02-Cellular Storage		32.843	0.015	2.946	0.0		1.1	
Porous Paving (40)	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (40)	DT 02-Cellular Storage	33.687	32.847	0.036	4.468	1.2	0.12	3.8	OK
Porous Paving (1)	FSR: 1 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (1)	DT 02-Cellular Storage		32.832	0.019	4.976	0.0		3.9	
SWPipe162	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	DT 02-Cellular Storage SWMH056		33.512	32.043	0.150	21.187	1.0	0.48	16.1	OK

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Porous Paving (19)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (19)	Unit 04-Cellular Storage A		31.646	0.022	12.364	0.0		7.0	
Unit 04-Cellular Storage A	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Unit 04-Cellular Storage A	SWMH1 04	32.309	30.781	0.084	23.876	0.9	0.1	9.5	OK
Porous Paving (20)	FSR: 1 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (20)	Unit 03-Cellular Storage A		31.237	0.016	10.892	0.0		5.3	
Unit 03-Cellular Storage A	FSR: 1 years: +40 %: 60 mins: Winter	Pipe	Unit 03-Cellular Storage A	SWMH1 32	31.934	30.814	0.085	21.578	0.8	0.16	8.6	OK
Porous Paving (10)	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (10)	Unit(s) 11 to 13-Cellular Storage	33.184	32.364	0.011	1.304	1.8	0.01	1.1	OK
SWPipe03 1	FSR: 1 years: +40 %: 30 mins: Winter	Pipe	SWMH0 82	Unit(s) 11 to 13-Cellular Storage	33.317	31.950	0.033	2.167	0.6	0.11	1.9	OK
SWPipe03 0	FSR: 1 years: +40 %: 480 mins: Winter	Pipe	Unit(s) 11 to 13-Cellular Storage	SWMH0 74	33.462	31.510	0.150	43.196	0.4	0.06	1.6	Surcharged
SWPipe22 7	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH0 75	Unit(s) 11 to 13-Cellular Storage	33.532	31.953	0.084	6.998	1.4	0.5	14.1	OK
SWPipe22 5	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH0 90	Unit(s) 04 to 05-Cellular Storage	33.080	32.501	0.026	1.952	2.6	0.15	4.2	OK
Unit(s) 04 to 05-Cellular Storage	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	Unit(s) 04 to 05-Cellular Storage	SWMH0 99	32.479	29.229	0.150	75.779	1.3	0.53	21.3	OK
SWPipe11 9a	FSR: 1 years: +40 %: 15 mins: Summer	Pipe	SWMH1 10	Unit 02-Cellular Storage B	32.350	31.190	0.000	0.000	0.0	0	0.0	OK
SWPipe11 9b	FSR: 1 years: +40 %: 480 mins: Winter	Pipe	Unit 02-Cellular Storage B	SWMH1 14	32.126	30.691	0.059	235.236	1.2	0.28	7.8	Surcharged
Unit 03-Cellular Storage B	FSR: 1 years: +40 %: 120 mins: Winter	Pipe	Unit 03-Cellular Storage B	SWMH1 33	31.550	30.246	0.100	44.044	1.1	0.75	8.8	OK
SWPipe20 4	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH2 30	Unit 01-Cellular Storage C	30.657	27.990	0.029	1.235	1.0	0.08	2.5	OK
SWPipe11 2	FSR: 1 years: +40 %: 960 mins: Winter	Pipe	SWMH1 71	SWMH1 81	30.805	28.262	0.600	1885.688	0.5	0.12	59.1	Surcharged
SWPipe11 4	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH1 86	Unit 01-Cellular Storage C	30.052	29.089	0.069	11.777	3.1	0.42	25.0	OK
SWPipe04 5	FSR: 1 years: +40 %: 15 mins: Winter	Pipe	SWMH0 69	Unit 16-Cellular Storage	33.760	31.445	0.094	18.256	1.0	0.69	36.5	OK

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FSR: 30 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Flow

Connection	Storm Event	Connection Type	From	To	Upstream Cover Level (m)	Max. US Water Level (m)	Max. Flow Depth (m)	Discharge Volume (m³)	Max. Velocity (m/s)	Flow / Capacity	Max. Flow (L/s)	Status
SWPipe003	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH004	SWMH006	37.553	36.856	0.103	14.141	1.6	0.55	28.6	OK
SWPipe006	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	SWMH027	SWMH033	35.270	34.227	0.225	136.814	1.3	1.44	53.2	Surcharged
SWPipe007	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	SWMH033	SWMH035	35.119	34.123	0.225	139.204	1.8	1.51	54.9	Surcharged
SWPipe008	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	SWMH035	SWMH032	35.007	34.031	0.225	138.927	1.3	0.34	52.9	Surcharged
SWPipe009	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH008	SWMH009	36.756	35.356	0.000	0.000	0.0	0	0.0	OK
SWPipe010	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH009	SWMH011	36.499	35.188	0.000	0.000	0.0	0	0.0	OK
SWPipe011	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH011	SWMH012	36.241	35.020	0.000	0.000	0.0	0	0.0	OK
SWPipe012	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH012	SWMH016	35.983	34.852	0.225	0.000	0.0	0	0.0	OK
SWPipe013	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH016	SWMH024	35.726	34.071	0.225	12.041	0.3	0.08	9.4	Surcharged
SWPipe014	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH044	SWMH051	34.550	33.597	0.225	38.279	1.5	0.28	61.1	Surcharged
SWPipe015	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH051	SWMH049	34.219	33.522	0.225	85.423	1.3	1.43	52.3	Surcharged
SWPipe016	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH056	SWMH049	34.106	32.287	0.225	139.339	0.6	0.62	22.9	Surcharged
SWPipe017	FSR: 30 years: +40 %: 480 mins: Winter	Pipe	SWMH049	SWMH024	34.290	32.284	0.225	314.379	0.9	0.64	23.4	Surcharged
SWPipe018	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH021	SWMH022	35.614	34.770	0.225	80.151	2.7	0.04	11.3	OK

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SWPipe019	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH022	SWMH024	35.549	33.875	0.225	101.850	0.4	0.1	15.5	Surcharged
SWPipe020	FSR: 30 years: +40 %: 480 mins: Winter	Pipe	SWMH024	SWMH032	35.388	33.022	0.225	535.072	0.9	0.73	26.6	Surcharged
SWPipe022	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH030	SWMH028	35.211	34.550	0.215	3.681	0.4	0.14	7.5	OK
SWPipe023	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH028	SWMH029	35.256	34.219	0.225	15.775	0.9	0.6	31.0	Surcharged
SWPipe024	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH029	SWMH026	35.228	34.141	0.225	15.886	0.5	0.6	21.9	Surcharged
SWPipe025	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH025	SWMH026	35.326	34.540	0.225	53.584	0.9	0.41	27.1	OK
SWPipe026	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH026	SWMH034	35.295	34.351	0.225	123.453	2.2	2.35	86.2	Surcharged
SWPipe027	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH034	SWMH036	35.025	33.941	0.225	151.375	2.4	2.59	94.9	Surcharged
SWPipe028	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH036	SWMH047	34.910	33.557	0.225	90.265	2.3	0.56	92.6	Surcharged
SWPipe029	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH085	SWMH075	33.244	32.653	0.150	19.342	1.6	1.05	28.6	Surcharged
SWPipe032	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH074	SWMH047	33.643	32.557	0.225	75.739	0.5	0.09	3.5	Surcharged
SWPipe033	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH047	SWMH055	34.365	32.791	0.300	204.194	2.3	2.07	162.7	Surcharged
SWPipe034	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH055	SWMH058	34.119	32.201	0.300	209.151	2.4	2.14	167.9	Surcharged
SWPipe037	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH065	SWMH058	33.833	31.854	0.225	437.087	1.2	0.94	49.1	Surcharged
SWPipe038	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH058	SWMH050	34.032	31.792	0.300	458.788	2.5	2.24	174.9	Surcharged
SWPipe039	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH050	SWMH045	34.238	31.184	0.300	467.300	4.0	0.66	191.5	Surcharged
SWPipe040	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH045	SWMH043	34.452	30.010	0.600	247.638	1.6	0.31	210.7	Surcharged

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SWPipe04 1	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 43	SWMH0 39	34.578	29.994	0.600	245.624	1.7	0.31	216.4	Surch arged
SWPipe04 2	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 39	SWMH0 38	34.712	29.978	0.600	238.474	1.7	0.31	213.2	Surch arged
SWPipe04 3	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 38	SWMH0 40	34.741	29.960	0.600	234.373	2.0	0.32	218.8	Surch arged
SWPipe04 4	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 68	SWMH0 69	33.760	32.463	0.150	13.483	1.3	0.93	23.7	Surch arged
SWPipe04 6	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH0 86	SWMH0 54	34.048	30.924	0.150	208.893	1.2	1.15	20.4	Surch arged
SWPipe04 7	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH0 54	SWMH0 48	34.185	30.868	0.225	208.742	1.8	0.4	21.0	Surch arged
SWPipe04 8	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH0 48	SWMH0 40	34.360	30.890	0.225	101.672	2.5	0.11	21.6	Surch arged
SWPipe04 9	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 40	SWMH0 53	34.626	29.944	0.600	248.464	1.5	0.31	240.7	Surch arged
SWPipe05 6	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH0 52	SWMH0 73	34.462	32.729	0.000	0.000	0.0	0	0.0	OK
SWPipe06 0	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH0 62	SWMH0 80	33.870	31.619	0.225	3.827	0.3	0.14	5.3	Surch arged
SWPipe06 1	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH0 80	SWMH0 96	33.445	31.616	0.225	5.320	0.2	0.17	6.4	Surch arged
SWPipe06 2	FSR: 30 years: +40 %: 480 mins: Winter	Pipe	SWMH0 96	SWMH1 01	33.006	32.032	0.038	251.814	1.2	0.06	5.3	Surch arged
SWPipe06 3	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH1 32	SWMH1 01	32.047	30.866	0.600	57.551	0.8	0.06	28.7	Surch arged
SWPipe06 4	FSR: 30 years: +40 %: 480 mins: Winter	Pipe	SWMH0 76	SWMH1 01	33.567	31.287	0.026	139.927	1.2	0.03	3.0	Surch arged
SWPipe06 5	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH1 01	SWMH0 97	32.686	30.592	0.600	69.633	0.9	0.07	46.7	OK
SWPipe06 6	FSR: 30 years: +40 %: 120 mins: Summer	Pipe	SWMH1 33	SWMH0 97	32.016	30.378	0.225	90.845	0.8	0.34	12.3	Surch arged
SWPipe06 7	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH0 97	SWMH0 92	32.959	30.587	0.600	115.424	1.2	0.11	74.6	Surch arged

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SWPipe068	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH099	SWMH078	32.756	29.973	0.225	282.601	1.1	1.1	40.3	Surcharged
SWPipe069	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH078	SWMH063	33.560	29.905	0.600	46.263	1.5	0.2	137.5	Surcharged
SWPipe070	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH041	SWMH046	34.622	33.595	0.071	35.653	1.3	0.39	14.4	OK
SWPipe071	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH046	SWMH063	34.387	33.493	0.225	90.310	3.4	0.1	30.5	OK
SWPipe074	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH079	SWMH077	33.456	32.454	0.225	33.602	3.4	0.18	49.6	OK
SWPipe076	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH156	SWMH141	31.300	30.378	0.150	8.773	1.7	0.65	18.2	OK
SWPipe077	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH141	SWMH130	31.754	29.733	0.600	7.767	0.9	0.05	31.6	Surcharged
SWPipe079	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH095	SWMH100	33.010	29.738	0.600	308.012	1.5	0.86	418.3	Surcharged
SWPipe080	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH144	SWMH125	31.691	29.465	0.225	632.426	1.1	0.64	33.3	Surcharged
SWPipe081	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH125	SWMH130	32.236	30.010	0.225	732.647	1.1	0.66	34.3	Surcharged
SWPipe083	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH100	SWMH108	32.721	29.466	0.600	286.309	1.5	0.83	403.0	Surcharged
SWPipe084	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH091	SWMH094	33.075	32.189	0.120	6.600	1.0	0.82	14.6	OK
SWPipe086	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH098	SWMH102	32.842	31.457	0.225	30.532	1.0	1.14	41.8	Surcharged
SWPipe087	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH102	SWMH103	32.683	30.840	0.225	40.221	1.4	1.52	55.7	Surcharged
SWPipe088	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH103	SWMH106	32.524	30.407	0.225	58.976	1.9	2.09	76.3	Surcharged
SWPipe089	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	SWMH106	SWMH107	32.489	30.197	0.225	79.222	2.2	2.38	87.1	Surcharged
SWPipe090	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH107	SWMH108	32.449	29.737	0.225	75.119	3.2	0.56	108.4	Surcharged

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SWPipe09 1	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH1 08	SWMH1 48	32.445	29.427	0.600	339.883	1.7	0.93	452.6	Surch arged
SWPipe09 3	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH1 37	SWMH1 50	31.781	29.664	0.225	950.387	1.6	1.2	43.8	Surch arged
SWPipe09 4	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH1 50	SWMH1 29	31.542	29.699	0.225	1012.195	1.6	0.45	44.7	Surch arged
SWPipe09 5	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH1 29	SWMH1 42	32.214	29.747	0.600	1073.285	0.8	0.07	44.9	Surch arged
SWPipe09 6	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH1 42	SWMH1 53	31.754	29.747	0.600	1065.766	0.7	0.07	45.1	Surch arged
SWPipe09 7	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH1 53	SWMH1 48	31.466	29.747	0.600	1075.325	0.2	0.07	45.3	Surch arged
SWPipe10 1	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH1 52	SWMH1 75	31.466	30.560	0.000	0.000	0.0	0	0.0	OK
SWPipe10 3	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH1 80	SWMH1 70	30.675	29.087	0.225	419.406	1.0	1.08	39.4	Surch arged
SWPipe10 8	FSR: 30 years: +40 %: 240 mins: Winter	Pipe	SWMH1 57	SWMH1 73	31.281	28.457	0.225	971.851	1.1	1.23	45.1	Surch arged
SWPipe11 5	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH1 81	SWMH1 78	30.358	29.802	0.600	455.805	0.7	0.42	204.1	Surch arged
SWPipe11 6	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH1 78	SWMH1 66	30.604	29.790	0.600	446.805	0.7	0.4	193.1	Surch arged
SWPipe12 3	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH1 64	SWMH1 65	31.053	30.634	0.150	8.332	0.8	0.77	13.7	Surch arged
SWPipe12 4	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH1 65	SWMH1 22	31.050	30.464	0.150	17.511	1.7	1.7	30.2	Surch arged
SWPipe12 9	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 31	SWMH1 35	32.094	29.119	0.225	1476.431	0.9	0.88	32.1	Surch arged
SWPipe13 0	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 35	SWMH1 43	31.969	29.127	0.225	1476.407	0.9	0.88	32.2	Surch arged
SWPipe13 1	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 43	SWMH1 49	31.723	29.136	0.225	1476.369	0.9	0.88	32.2	Surch arged
SWPipe13 2	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 49	SWMH1 51	31.543	29.144	0.225	1594.443	1.0	0.88	32.2	Surch arged

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SWPipe13 3	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 51	SWMH1 54	31.502	29.162	0.225	1681.872	0.9	0.88	32.3	Surch arged
SWPipe13 4	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH1 39	SWMH1 40	31.773	29.084	0.225	0.000	0.1	0.05	2.6	Surch arged
SWPipe13 5	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH1 40	SWMH1 54	31.769	30.030	0.225	121.436	0.4	0.3	15.4	Surch arged
SWPipe13 6	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 54	SWMH1 60	31.377	29.185	0.225	1962.346	1.6	0.89	32.4	Surch arged
SWPipe13 7	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH1 63	SWMH1 60	31.173	30.413	0.225	0.000	0.0	0	0.0	OK
SWPipe13 8	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 60	SWMH1 66	31.193	29.188	0.225	1962.321	1.9	0.15	32.5	Surch arged
SWPipe13 9	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH1 66	SWMH1 67	30.978	30.067	0.300	917.322	2.4	2.16	169.2	Surch arged
SWPipe14 0	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH1 55	SWMH1 52	31.365	30.760	0.000	0.000	0.0	0	0.0	OK
SWPipe15 6	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH0 64	SWMH0 45	33.800	31.103	0.225	8.245	0.6	0.1	5.0	Surch arged
SWPipe15 9	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH1 21	SWMH0 69	32.280	31.764	0.225	7.054	0.5	0.27	14.1	OK
SWPipe16 1	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 03	SWMH0 04	37.560	37.101	0.100	5.123	1.3	1.04	10.0	Surch arged
SWPipe16 3	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 89	SWMH0 85	33.189	32.645	0.150	2.448	0.8	0.27	4.8	Surch arged
SWPipe16 4	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 31	SWMH0 30	35.211	34.672	0.060	3.737	1.2	0.28	8.0	OK
SWPipe16 5b	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 02	SWMH0 01	37.813	37.086	0.123	12.248	1.7	0.91	25.8	OK
SWPipe16 7	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH0 20	SWMH0 21	35.625	34.945	0.073	80.165	1.3	0.4	11.3	OK
SWPipe17 5	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH0 23	SWMH0 25	35.438	34.861	0.100	25.587	1.4	1.17	11.2	Surch arged
SWPipe17 7	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH0 81	SWMH0 79	33.337	32.663	0.080	23.243	1.5	0.5	14.0	OK

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SWPipe179	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH179	SWMH175	30.525	29.920	0.000	0.000	0.0	0	0.0	OK
SWPipe183	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH093	SWMH091	33.055	32.497	0.090	3.665	0.8	0.17	7.9	OK
SWPipe186	FSR: 30 years: +40 %: 60 mins: Summer	Pipe	SWMH059	SWMH051	34.031	33.596	0.150	5.405	0.7	0.32	11.3	Surcharged
SWPipe187	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH061	SWMH059	33.872	33.681	0.150	3.529	0.4	0.1	7.6	Flood Risk
SWPipe190	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH104	SWMH092	32.510	30.833	0.600	62.478	0.4	0.04	28.3	Surcharged
Porous Paving (11)	FSR: 30 years: +40 %: 15 mins: Winter	No Delay	Porous Paving (11)	SWMH089		32.438	0.022	2.473	0.0		4.8	
SWPipe226	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	Porous Paving (9)	SWMH082	33.219	32.402	0.053	3.908	1.0	0.19	5.5	OK
Porous Paving (2)	FSR: 30 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (2)	SWMH020		35.076	0.019	80.200	0.0		11.4	
Porous Paving (5)	FSR: 30 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (5)	SWMH023		34.883	0.031	25.642	0.0		11.2	
Porous Paving (4)	FSR: 30 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (4)	SWMH026		34.786	0.017	16.360	0.0		11.5	
Porous Paving (6)	FSR: 30 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (6)	SWMH034		34.136	0.031	28.165	0.0		15.4	
Porous Paving (15)	FSR: 30 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (15)	SWMH081		32.734	0.047	23.268	0.0		14.0	
Porous Paving (25)	FSR: 30 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (25)	SWMH129		31.561	0.028	14.021	0.0		7.0	
Porous Paving (26)	FSR: 30 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (26)	SWMH129		31.333	0.020	18.390	0.0		12.4	
Porous Paving (27)	FSR: 30 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (27)	SWMH140		30.600	0.036	125.730	0.0		14.5	
Porous Paving (28)	FSR: 30 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (28)	SWMH151		30.709	0.028	34.777	0.0		13.1	
Porous Paving (29)	FSR: 30 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (29)	SWMH149		30.972	0.026	58.582	0.0		12.5	

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Porous Paving (3)	FSR: 30 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (3)	SWMH0 25		34.698	0.044	28.205	0.0		15.0	
SWPipe00 4a	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 06	SWMH1 89	37.242	36.597	0.225	17.078	1.2	0.26	34.6	OK
SWPipe00 4b	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH1 89	SWMH0 10	36.479	34.515	0.225	283.834	1.0	1.06	38.8	Surcharged
SWPipe05 0	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH0 14	SWMH1 89	35.832	34.283	0.225	130.673	0.9	1.02	37.4	Surcharged
SWPipe05 2	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 18	SWMH0 13	35.723	35.360	0.150	21.919	1.4	1.43	25.2	Surcharged
SWPipe05 3	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	SWMH0 15	SWMH0 18	35.728	35.297	0.225	4.705	0.6	0.23	9.8	Surcharged
SWPipe05 4	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	SWMH0 17	SWMH0 15	35.725	35.294	0.225	4.796	0.6	0.17	7.2	Surcharged
SWPipe08 5a	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH0 94	SWMH1 90	33.026	32.062	0.150	14.077	1.5	0.75	27.1	OK
SWPipe08 5b	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH1 90	SWMH0 98	32.917	31.543	0.225	16.145	0.7	0.75	27.4	Surcharged
SWPipe11 8	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH1 09	SWMH1 38	32.363	31.369	0.225	42.667	1.4	1.5	55.0	Surcharged
SWPipe11 7	FSR: 30 years: +40 %: 480 mins: Winter	Pipe	SWMH1 14	SWMH1 09	32.223	30.529	0.148	504.917	0.9	0.65	23.7	OK
SWPipe18 9a	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH0 92	SWMH1 93	33.072	30.586	0.600	162.165	1.4	0.14	99.7	Surcharged
SWPipe18 9b	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	SWMH1 93	SWMH1 94	33.150	30.316	0.600	158.300	1.3	0.16	107.5	Surcharged
SWPipe18 9c	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH1 94	SWMH0 78	33.452	29.908	0.600	78.406	1.4	0.15	105.7	Surcharged
SWPipe00 5c	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH1 92	SWMH0 27	35.584	34.303	0.225	59.537	1.3	1.43	52.3	Surcharged
SWPipe00 5a	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH0 10	SWMH1 91	36.266	34.515	0.225	522.345	1.3	1.39	51.2	Surcharged
SWPipe00 5b	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH1 91	SWMH1 92	35.896	34.412	0.225	535.220	1.3	1.41	51.4	Surcharged

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SWPipe00 2c	FSR: 30 years: +40 %: 60 mins: Summer	Pipe	SWMH1 95	SWMH0 10	36.466	34.726	0.225	147.108	1.0	0.4	38.8	Surch arged
SWPipe00 2a	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH0 05	SWMH1 96	37.382	34.812	0.225	73.855	1.3	0.49	37.6	Surch arged
SWPipe00 2b	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH1 96	SWMH1 95	37.012	34.790	0.225	77.088	1.0	1.04	38.2	Surch arged
SWPipe02 1a	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH0 32	SWMH1 97	35.141	33.842	0.225	749.960	1.7	1.88	68.7	Surch arged
SWPipe02 1b	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH1 97	SWMH1 98	34.860	33.468	0.225	748.127	1.7	1.89	69.0	Surch arged
SWPipe02 1c	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH1 98	SWMH0 47	34.530	33.231	0.225	210.913	2.0	2.17	79.8	Surch arged
SWPipe07 3a	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 53	SWMH1 99	34.186	29.905	0.600	312.221	1.7	0.59	403.0	Surch arged
SWPipe07 3b	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH1 99	SWMH0 77	33.992	29.877	0.600	302.037	1.5	0.79	383.6	Surch arged
SWPipe07 5a	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 77	SWMH2 00	33.566	29.829	0.600	333.894	1.4	0.83	403.4	Surch arged
SWPipe07 5b	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 00	SWMH0 95	33.150	29.768	0.600	329.215	1.4	0.84	406.7	Surch arged
SWPipe11 3a	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH1 68	SWMH2 01	30.946	30.250	0.600	1585.959	1.1	0.67	323.2	Surch arged
SWPipe11 3b	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH2 01	SWMH1 81	30.650	30.172	0.600	1577.320	1.1	0.67	323.6	Surch arged
Swale 03	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	Swale 03	SWMH0 45	34.934	32.085	0.150	5.718	3.1	0.15	11.5	OK
SWPipe07 2a	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 63	SWMH2 02	33.811	29.905	0.600	73.841	1.5	0.25	168.8	Surch arged
SWPipe07 2b	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 02	SWMH0 53	33.969	29.904	0.600	67.991	0.9	0.23	161.7	Surch arged
Swale 02	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	Swale 02	SWMH1 98	35.347	33.817	0.150	18.033	2.0	0.32	15.9	Surch arged
Swale 01	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	Swale 01	SWMH0 22	36.574	33.514	0.150	12.294	2.1	0.15	11.6	Surch arged

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Swale 08	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	Swale 08	SWMH0 16	36.743	33.474	0.150	5.713	1.5	0.2	11.0	Surch arged
Swale 05	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	Swale 05	SWMH0 77	33.852	32.531	0.150	6.178	0.7	0.14	12.4	Surch arged
Swale 04	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	Swale 04	SWMH0 53	35.002	32.096	0.150	7.070	0.8	0.17	13.9	OK
SWPipe09 8a	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH1 48	SWMH2 03	31.544	29.317	0.600	344.859	1.5	0.85	413.2	Surch arged
SWPipe09 8b	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH2 03	SWMH1 68	31.278	30.334	0.600	1595.071	1.2	0.66	322.8	Surch arged
SWPipe22 2	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 01	SWMH2 50	37.861	36.550	0.113	12.237	1.7	0.9	24.8	OK
SWPipe22 1	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 49	SWMH2 48	37.647	37.110	0.048	6.299	3.6	0.61	13.5	OK
SWPipe22 0	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 48	Car Park -Cellular Storage	37.580	36.049	0.142	6.298	2.5	0.09	13.4	OK
SWPipe00 1	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 50	Car Park -Cellular Storage	37.587	36.123	0.150	36.714	6.4	0.51	77.3	OK
SWPipe21 9	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 47	Car Park -Cellular Storage	37.328	36.155	0.150	46.523	7.3	0.65	100.2	OK
Car Park- Cellular Storage	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	Car Park- Cellular Storage	SWMH0 05	37.146	34.904	0.150	136.094	2.1	1.3	36.7	Surch arged
Porous Paving (8)	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	Porous Paving (8)	SWMH0 17	35.688	34.943	0.150	4.887	0.9	0.16	4.5	Surch arged
Porous Paving (7)	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (7)	SWMH0 14	35.750	34.918	0.150	21.146	0.9	0.16	14.2	Surch arged
Unit(s) 08 to 10- Cellular Storage	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	Unit(s) 08 to 10 -Cellular Storage	SWMH0 14	35.912	34.208	0.150	96.379	2.1	0.83	37.2	Surch arged
SWMH013	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 13	Unit(s) 08 to 10- Cellular Storage	35.955	34.838	0.150	40.795	3.3	2.08	58.2	Surch arged
SWPipe21 3	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH2 42	HGV Parking- Cellular Storage	37.210	36.505	0.079	0.000	0.0	0	0.0	OK
SWPipe21 6	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	HGV Parking- Cellular Storage	SWMH2 44	37.265	35.222	0.150	60.367	2.0	1.15	32.4	Surch arged

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SWPipe21 1	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 39	HGV Parking- Cellular Storage	38.066	37.101	0.099	9.337	4.2	0.39	20.1	OK
SWMH244	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH2 44	SWMH1 89	37.233	35.076	0.150	60.286	1.8	0.59	32.5	OK
SWPipe20 7	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	Unit 16- Cellular Storage	SWMH0 86	33.946	31.257	0.100	209.129	2.6	2.13	20.4	Surch arged
SWPipe20 9	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 36	Unit 16- Cellular Storage	33.303	32.893	0.150	27.824	3.2	0.94	56.3	Surch arged
Porous Paving	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	Porous Paving	SWMH0 44	34.902	34.055	0.150	9.005	1.7	0.13	9.1	OK
Porous Paving (42)	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	Porous Paving (42)	SWMH0 44	34.328	33.544	0.150	0.165	1.2	0.23	11.7	OK
Porous Paving (41)	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (41)	SWMH0 44	34.986	34.217	0.150	17.400	1.8	0.28	16.4	OK
Porous Paving (44)	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (44)	Porous Paving	35.026	34.259	0.098	1.683	0.1	0.03	0.6	OK
Porous Paving (43)	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (43)	Porous Paving (44)	34.979	34.271	0.067	0.138	0.1	0.06	0.4	OK
SWPipe07 8	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH1 30	SWMH2 28	32.209	29.733	0.600	12.891	1.3	0.11	74.9	Surch arged
SWPipe07 8 (1)	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH2 28	SWMH0 95	32.536	30.385	0.600	23.620	0.4	0.09	58.8	Surch arged
SWPipe20 3	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH2 29	SWMH2 28	31.386	30.385	0.600	2.076	0.3	0.03	19.0	Surch arged
Swale 07	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	Swale 07	SWMH0 47	34.250	33.001	0.150	21.398	1.1	0.48	19.4	Surch arged
Porous Paving (16)	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (16)	SWMH0 46	34.778	33.809	0.081	54.712	1.7	0.45	16.3	Surch arged
Porous Paving (17)	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (17)	SWMH0 41	34.813	33.841	0.067	27.788	1.4	0.37	10.6	OK
Porous Paving (18)	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (18)	SWMH0 41	35.159	34.191	0.032	7.906	1.4	0.1	3.9	OK
SWPipe14 4	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (32)	SWMH1 19	32.418	30.498	0.150	60.025	0.4	0.29	7.8	Surch arged

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SWPipe180	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH119	Porous Paving (33)	32.284	30.569	0.150	0.000	0.7	0.41	11.6	Surcharged
Porous Paving (36)	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (36)	SWMH119	32.862	31.858	0.150	8.961	0.2	0.06	4.2	OK
SWPipe146	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (33)	SWMH126	32.306	30.549	0.150	91.390	0.8	0.48	13.5	Surcharged
SWPipe181	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH126	Porous Paving (34)	32.232	30.642	0.150	9.526	0.8	0.48	13.6	Surcharged
SWPipe148	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (34)	SWMH125	32.269	30.594	0.150	59.555	1.3	0.29	23.1	Surcharged
Porous Paving (37)	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (37)	SWMH125	32.299	31.458	0.150	3.105	0.2	0.02	3.0	OK
SWPipe125a	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH122	Unit 02-Cellular Storage A	32.279	29.887	0.094	17.506	2.5	0.62	29.7	OK
SWPipe155	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	Unit(s) 14 to 15-Cellular Storage	SWMH064	33.600	31.025	0.150	5.808	1.0	0.08	5.9	Surcharged
Porous Paving (12)	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (12)	Unit(s) 14 to 15-Cellular Storage	33.324	32.500	0.041	6.640	1.5	0.15	5.7	OK
SWPipe176	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	Porous Paving (14)	Unit(s) 14 to 15-Cellular Storage	33.327	32.515	0.051	5.160	1.4	0.24	7.3	OK
SWPipe201	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH087	Unit(s) 14 to 15-Cellular Storage	33.225	33.225	0.150	32.050	3.6	1.7	63.2	Flood
SWPipe200	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (23)	SWMH150	31.534	30.588	0.150	15.647	2.8	0.1	11.6	OK
SWPipe199	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (24)	SWMH150	31.793	30.820	0.150	10.979	3.8	0.06	8.8	OK
SWPipe104	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	SWMH170	Unit 01-Cellular Storage B	31.275	28.988	0.150	122.297	3.1	3.04	54.0	Surcharged
SWPipe196	FSR: 30 years: +40 %: 240 mins: Winter	Pipe	Unit 01-Cellular Storage B	SWMH157	30.975	28.644	0.150	973.746	2.6	1.01	45.1	Surcharged
SWPipe192	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH138	SWMH278	31.781	30.594	0.225	42.240	1.3	1.39	50.9	Surcharged
SWPipe236	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH278	SWMH277	31.781	30.325	0.225	41.947	1.2	1.31	48.3	Surcharged

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SWPipe235	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH277	Unit 02-Cellular Storage C	32.048	30.151	0.150	41.780	2.6	1.65	46.6	Surcharged
SWMH136	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH136	Unit 02-Cellular Storage C	31.781	30.687	0.150	24.344	2.7	0.98	46.9	Surcharged
SWPipe092	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	Unit 02-Cellular Storage C	SWMH137	31.873	29.666	0.150	950.817	2.5	1.18	43.7	Surcharged
SWPipe128b	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	Unit 02-Cellular Storage A	SWMH131	32.225	29.123	0.150	1476.462	1.8	0.88	32.1	Surcharged
SWPipe100	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH175	Unit 01-Cellular Storage A	30.680	29.690	0.000	0.000	0.0	0	0.0	OK
SWPipe099	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH176	Unit 01-Cellular Storage A	30.675	29.412	0.000	0.000	0.0	0	0.0	OK
SWPipe102	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH177	Unit 01-Cellular Storage A	30.675	29.412	0.000	0.000	0.0	0	0.0	OK
SWPipe197	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	Unit 01-Cellular Storage A	SWMH180	30.550	29.267	0.150	420.555	2.2	1.41	39.3	Surcharged
SWPipe110	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	Unit 01-Cellular Storage C	SWMH171	30.563	29.247	0.150	2963.114	4.0	1.24	70.7	Surcharged
SWPipe193	FSR: 30 years: +40 %: 240 mins: Winter	Pipe	SWMH173	Unit 01-Cellular Storage C	30.713	28.285	0.150	969.584	2.6	1.49	45.1	Surcharged
SWPipe233	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	SWMH272	SWMH065	33.803	31.853	0.225	413.141	1.2	0.94	49.1	Surcharged
Unit 07-Cellular Storage A	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	Unit 07-Cellular Storage A	SWMH272	33.652	31.887	0.150	413.596	2.8	0.78	49.0	Surcharged
SWMH066	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH066	Unit 07-Cellular Storage A	33.764	32.665	0.000	0.000	0.0	0	0.0	OK
SWMH067	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH067	Unit 07-Cellular Storage A	33.764	32.552	0.000	0.000	0.0	0	0.0	OK
SWPipe218	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH072	SWMH062	33.720	31.849	0.225	20.663	0.5	0.16	5.8	Surcharged
SWPipe057	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH073	Unit 06-Cellular Storage A	33.719	32.420	0.000	0.000	0.0	0	0.0	OK
SWPipe058	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH071	Unit 06-Cellular Storage A	33.720	32.722	0.150	17.780	2.1	1.36	37.4	Surcharged

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SWPipe23 2	FSR: 30 years: +40 %: 30 mins: Summer	Pipe	Unit 06- Cellular Storage A	SWMH0 72	33.671	31.711	0.150	9.000	0.7	0.67	11.9	Surch arged
Porous Paving (13)	FSR: 30 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (13)	Unit 01- Cellular Storage D		30.765	0.015	91.589	0.0		16.7	
Porous Paving (30)	FSR: 30 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (30)	Unit 01- Cellular Storage D		30.631	0.014	62.296	0.0		15.4	
SWPipe23 1	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	Unit 01- Cellular Storage D	SWMH1 44	31.362	29.471	0.150	633.467	1.9	0.62	33.1	Surch arged
Porous Paving (31)	FSR: 30 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (31)	Unit 01- Cellular Storage D		31.147	0.012	94.379	0.0		13.6	
SWPipe14 2	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH1 20	Unit 01- Cellular Storage D	31.456	30.920	0.100	12.133	2.8	2.32	22.3	Surch arged
Unit 06- Cellular Storage B	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	Unit 06- Cellular Storage B	SWMH0 76	33.021	31.148	0.147	3.162	0.5	0.11	4.5	OK
Porous Paving (22)	FSR: 30 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (22)	Unit 06- Cellular Storage B		33.332	0.027	16.450	0.0		8.7	
Porous Paving (21)	FSR: 30 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (21)	Unit 06- Cellular Storage B		33.173	0.026	22.807	0.0		10.2	
SWPipe08 2	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH1 45	Unit 01- Cellular Storage D	31.487	30.491	0.150	9.892	1.2	1.18	20.8	Surch arged
SWPipe23 0	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	SWMH1 67	Pumping Station	30.962	28.146	0.300	913.666	2.4	2.16	169.2	Surch arged
SWPipe22 8	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	Swale 06	SWMH2 65	31.535	28.379	0.150	4.867	0.6	0.39	10.9	Surch arged
SWPipe22 9	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 65	SWMH1 66	30.672	28.809	0.150	2.841	0.6	0.11	9.9	Surch arged
Porous Paving (39)	FSR: 30 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (39)	DT 02- Cellular Storage		32.868	0.026	7.876	0.0		4.0	
Porous Paving (40)	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	Porous Paving (40)	DT 02- Cellular Storage	33.687	32.897	0.062	7.985	1.5	0.33	10.3	OK
Porous Paving (1)	FSR: 30 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (1)	DT 02- Cellular Storage		32.880	0.031	13.310	0.0		11.0	
SWPipe16 2	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	DT 02- Cellular Storage	SWMH0 56	33.512	32.287	0.150	123.322	1.3	0.68	22.8	Surch arged

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Porous Paving (19)	FSR: 30 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (19)	Unit 04-Cellular Storage A		31.760	0.028	31.213	0.0		11.3	
Unit 04-Cellular Storage A	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	Unit 04-Cellular Storage A	SWMH1 04	32.309	30.845	0.150	62.286	1.6	0.3	27.5	OK
Porous Paving (20)	FSR: 30 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (20)	Unit 03-Cellular Storage A		31.306	0.024	20.472	0.0		13.2	
Unit 03-Cellular Storage A	FSR: 30 years: +40 %: 60 mins: Winter	Pipe	Unit 03-Cellular Storage A	SWMH1 32	31.934	30.883	0.150	57.703	1.5	0.48	26.5	OK
Porous Paving (10)	FSR: 30 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (10)	Unit(s) 11 to 13-Cellular Storage	33.184	32.388	0.019	3.403	2.5	0.03	3.3	OK
SWPipe03 1	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 82	Unit(s) 11 to 13-Cellular Storage	33.317	31.977	0.060	3.855	0.9	0.32	5.6	OK
SWPipe03 0	FSR: 30 years: +40 %: 480 mins: Winter	Pipe	Unit(s) 11 to 13-Cellular Storage	SWMH0 74	33.462	32.656	0.150	38.597	0.2	0.11	3.1	Surcharged
SWPipe22 7	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 75	Unit(s) 11 to 13-Cellular Storage	33.532	32.079	0.150	19.322	1.6	1	28.1	Surcharged
SWPipe22 5	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 90	Unit(s) 04 to 05-Cellular Storage	33.080	32.518	0.042	4.778	3.3	0.36	10.3	OK
Unit(s) 04 to 05-Cellular Storage	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	Unit(s) 04 to 05-Cellular Storage	SWMH0 99	32.479	29.818	0.150	282.355	2.3	1.01	40.2	Surcharged
SWPipe11 9a	FSR: 30 years: +40 %: 360 mins: Winter	Pipe	SWMH1 10	Unit 02-Cellular Storage B	32.350	31.646	0.150	0.000	0.0	0.01	0.7	Surcharged
SWPipe11 9b	FSR: 30 years: +40 %: 480 mins: Winter	Pipe	Unit 02-Cellular Storage B	SWMH1 14	32.126	31.707	0.121	505.097	1.5	0.84	23.7	Surcharged
Unit 03-Cellular Storage B	FSR: 30 years: +40 %: 120 mins: Winter	Pipe	Unit 03-Cellular Storage B	SWMH1 33	31.550	30.418	0.100	96.477	1.5	1.03	12.1	Surcharged
SWPipe20 4	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH2 30	Unit 01-Cellular Storage C	30.657	28.007	0.047	3.028	1.3	0.21	6.2	OK
SWPipe11 2	FSR: 30 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 71	SWMH1 81	30.805	29.212	0.600	2960.256	0.2	0.15	70.7	Surcharged
SWPipe11 4	FSR: 30 years: +40 %: 15 mins: Summer	Pipe	SWMH1 86	Unit 01-Cellular Storage C	30.052	29.156	0.128	25.723	3.6	0.96	57.1	OK
SWPipe04 5	FSR: 30 years: +40 %: 15 mins: Winter	Pipe	SWMH0 69	Unit 16-Cellular Storage	33.760	31.768	0.150	44.645	1.6	1.59	84.9	Surcharged

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FSR: 100 years: Increase Rainfall (%): +40: Critical Storm Per Item: Rank By: Max. Flow

Connection	Storm Event	Connection Type	From	To	Upstream Cover Level (m)	Max. US Water Level (m)	Max. Flow Depth (m)	Discharge Volume (m³)	Max. Velocity (m/s)	Flow / Capacity	Max. Flow (L/s)	Status
SWPipe003	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH004	SWMH006	37.553	36.879	0.121	18.256	1.7	0.72	37.2	OK
SWPipe006	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH027	SWMH033	35.270	34.537	0.225	63.320	1.5	1.63	60.1	Surcharged
SWPipe007	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH033	SWMH035	35.119	34.459	0.225	64.887	1.6	1.6	58.3	Surcharged
SWPipe008	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH035	SWMH032	35.007	34.225	0.225	991.519	1.4	0.37	57.1	Surcharged
SWPipe009	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH008	SWMH009	36.756	35.356	0.000	0.000	0.0	0	0.0	OK
SWPipe010	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH009	SWMH011	36.499	35.188	0.000	0.000	0.0	0	0.0	OK
SWPipe011	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH011	SWMH012	36.241	35.020	0.000	0.000	0.0	0	0.0	OK
SWPipe012	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH012	SWMH016	35.983	34.852	0.225	0.000	0.0	0	0.0	OK
SWPipe013	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH016	SWMH024	35.726	34.306	0.225	9.250	0.4	0.09	10.4	Surcharged
SWPipe014	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH044	SWMH051	34.550	33.812	0.225	46.557	1.6	0.28	62.6	Surcharged
SWPipe015	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH051	SWMH049	34.219	33.673	0.225	108.399	1.5	1.64	60.3	Surcharged
SWPipe016	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH056	SWMH049	34.106	32.427	0.225	201.697	0.6	0.69	25.3	Surcharged
SWPipe017	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH049	SWMH024	34.290	32.427	0.225	407.071	0.9	0.7	25.7	Surcharged
SWPipe018	FSR: 100 years: +40 %: 120 mins: Winter	Pipe	SWMH021	SWMH022	35.614	34.772	0.225	103.681	2.6	0.05	12.8	OK

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SWPipe019	FSR: 100 years: +40 %: 120 mins: Winter	Pipe	SWMH022	SWMH024	35.549	34.305	0.225	132.226	0.4	0.11	17.6	Surcharged
SWPipe020	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH024	SWMH032	35.388	33.541	0.225	693.188	0.9	0.76	27.9	Surcharged
SWPipe022	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH030	SWMH028	35.211	34.675	0.225	4.242	0.3	0.22	11.3	OK
SWPipe023	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH028	SWMH029	35.256	34.765	0.225	22.857	1.0	0.57	29.8	Surcharged
SWPipe024	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH029	SWMH026	35.228	34.655	0.225	22.864	0.7	0.75	27.5	Surcharged
SWPipe025	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH025	SWMH026	35.326	34.758	0.225	65.240	1.0	0.52	34.8	Surcharged
SWPipe026	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH026	SWMH034	35.295	34.720	0.225	156.133	2.4	2.59	94.7	Surcharged
SWPipe027	FSR: 100 years: +40 %: 30 mins: Summer	Pipe	SWMH034	SWMH036	35.025	34.157	0.225	173.574	2.4	2.63	96.2	Surcharged
SWPipe028	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH036	SWMH047	34.910	33.771	0.225	108.734	2.4	0.59	96.6	Surcharged
SWPipe029	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH085	SWMH075	33.244	33.008	0.150	25.424	2.0	1.32	36.1	Flood Risk
SWPipe032	FSR: 100 years: +40 %: 360 mins: Winter	Pipe	SWMH074	SWMH047	33.643	32.922	0.225	100.096	0.6	0.11	4.0	Surcharged
SWPipe033	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH047	SWMH055	34.365	32.950	0.300	220.368	2.4	2.15	168.7	Surcharged
SWPipe034	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH055	SWMH058	34.119	32.323	0.300	227.327	2.5	2.24	175.3	Surcharged
SWPipe037	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH065	SWMH058	33.833	32.002	0.225	969.544	1.4	1	52.2	Surcharged
SWPipe038	FSR: 100 years: +40 %: 30 mins: Summer	Pipe	SWMH058	SWMH050	34.032	32.003	0.300	473.971	2.7	2.42	188.8	Surcharged
SWPipe039	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH050	SWMH045	34.238	31.164	0.300	252.711	4.1	0.7	203.9	Surcharged
SWPipe040	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH045	SWMH043	34.452	30.643	0.600	265.173	1.7	0.35	239.2	Surcharged

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SWPipe04 1	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 43	SWMH0 39	34.578	30.628	0.600	263.379	1.8	0.36	247.2	Surch arged
SWPipe04 2	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 39	SWMH0 38	34.712	30.613	0.600	255.522	1.8	0.35	243.6	Surch arged
SWPipe04 3	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 38	SWMH0 40	34.741	30.594	0.600	251.444	2.1	0.36	250.5	Surch arged
SWPipe04 4	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 68	SWMH0 69	33.760	32.996	0.150	17.411	1.7	1.15	29.3	Surch arged
SWPipe04 6	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH0 86	SWMH0 54	34.048	31.312	0.150	455.092	1.9	1.86	33.0	Surch arged
SWPipe04 7	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH0 54	SWMH0 48	34.185	31.021	0.225	454.975	1.8	0.64	33.2	Surch arged
SWPipe04 8	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH0 48	SWMH0 40	34.360	30.982	0.225	454.872	2.5	0.18	33.4	Surch arged
SWPipe04 9	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 40	SWMH0 53	34.626	30.577	0.600	268.402	1.1	0.35	272.8	Surch arged
SWPipe05 6	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH0 52	SWMH0 73	34.462	32.729	0.000	0.000	0.0	0	0.0	OK
SWPipe06 0	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH0 62	SWMH0 80	33.870	32.288	0.225	264.653	0.4	0.16	5.9	Surch arged
SWPipe06 1	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH0 80	SWMH0 96	33.445	32.284	0.225	276.083	0.2	0.16	5.9	Surch arged
SWPipe06 2	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH0 96	SWMH1 01	33.006	32.282	0.040	281.006	1.3	0.07	5.9	Surch arged
SWPipe06 3	FSR: 100 years: +40 %: 60 mins: Summer	Pipe	SWMH1 32	SWMH1 01	32.047	30.940	0.600	67.424	1.0	0.1	48.5	Surch arged
SWPipe06 4	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH0 76	SWMH1 01	33.567	31.363	0.027	156.150	1.2	0.03	3.3	Surch arged
SWPipe06 5	FSR: 100 years: +40 %: 30 mins: Summer	Pipe	SWMH1 01	SWMH0 97	32.686	30.877	0.600	77.999	0.7	0.07	45.9	Surch arged
SWPipe06 6	FSR: 100 years: +40 %: 120 mins: Winter	Pipe	SWMH1 33	SWMH0 97	32.016	30.522	0.225	91.462	0.8	0.38	13.7	Surch arged
SWPipe06 7	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 97	SWMH0 92	32.959	30.554	0.600	63.683	1.3	0.14	93.5	Surch arged

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SWPipe068	FSR: 100 years: +40 %: 240 mins: Summer	Pipe	SWMH099	SWMH078	32.756	30.533	0.225	139.892	1.1	1.09	39.8	Surcharged
SWPipe069	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH078	SWMH063	33.560	30.533	0.600	31.697	1.6	0.27	184.8	Surcharged
SWPipe070	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH041	SWMH046	34.622	33.610	0.081	47.805	1.4	0.51	18.5	OK
SWPipe071	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH046	SWMH063	34.387	33.498	0.225	119.334	3.9	0.12	37.2	OK
SWPipe074	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH079	SWMH077	33.456	32.462	0.225	42.203	3.7	0.24	65.5	OK
SWPipe076	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH156	SWMH141	31.300	30.396	0.150	11.233	1.7	0.84	23.4	OK
SWPipe077	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH141	SWMH130	31.754	30.363	0.600	12.317	1.0	0.06	41.0	Surcharged
SWPipe079	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH095	SWMH100	33.010	31.303	0.600	1550.643	1.4	0.58	283.5	Surcharged
SWPipe080	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH144	SWMH125	31.691	29.834	0.225	1821.981	1.2	0.57	29.7	Surcharged
SWPipe081	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH125	SWMH130	32.236	30.263	0.225	2036.147	1.2	0.58	29.9	Surcharged
SWPipe083	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH100	SWMH108	32.721	30.023	0.600	330.135	1.0	0.61	296.5	Surcharged
SWPipe084	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH091	SWMH094	33.075	32.944	0.150	8.555	0.8	0.81	14.3	Flood Risk
SWPipe086	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH098	SWMH102	32.842	32.071	0.225	35.162	1.1	1.2	44.0	Surcharged
SWPipe087	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH102	SWMH103	32.683	32.008	0.225	55.792	1.6	1.71	62.8	Surcharged
SWPipe088	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH103	SWMH106	32.524	31.307	0.225	72.261	2.4	2.58	94.5	Surcharged
SWPipe089	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH106	SWMH107	32.489	31.011	0.225	79.639	2.7	2.94	107.5	Surcharged
SWPipe090	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH107	SWMH108	32.449	30.567	0.225	92.388	3.5	0.72	137.6	Surcharged

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SWPipe09 1	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH1 08	SWMH1 48	32.445	29.971	0.600	401.192	1.5	0.88	426.4	Surch arged
SWPipe09 3	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH1 37	SWMH1 50	31.781	30.592	0.225	1150.630	1.4	1.48	54.3	Surch arged
SWPipe09 4	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH1 50	SWMH1 29	31.542	30.419	0.225	1236.177	1.6	0.57	57.0	Surch arged
SWPipe09 5	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 29	SWMH1 42	32.214	30.082	0.600	5.325	0.6	0.09	63.5	Surch arged
SWPipe09 6	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH1 42	SWMH1 53	31.754	30.020	0.600	1315.018	0.8	0.09	60.0	Surch arged
SWPipe09 7	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH1 53	SWMH1 48	31.466	30.019	0.600	1330.728	0.2	0.09	60.6	Surch arged
SWPipe10 1	FSR: 100 years: +40 %: 960 mins: Winter	Pipe	SWMH1 52	SWMH1 75	31.466	30.608	0.150	0.000	0.0	0	0.0	OK
SWPipe10 3	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH1 80	SWMH1 70	30.675	29.172	0.225	205.681	1.0	1.12	41.1	Surch arged
SWPipe10 8	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH1 57	SWMH1 73	31.281	29.846	0.225	1243.374	1.3	1.46	53.3	Surch arged
SWPipe11 5	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH1 81	SWMH1 78	30.358	30.364	0.600	495.146	0.8	0.47	229.4	Flood
SWPipe11 6	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH1 78	SWMH1 66	30.604	30.350	0.600	485.548	0.8	0.45	219.9	Flood Risk
SWPipe12 3	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 64	SWMH1 65	31.053	31.008	0.150	10.785	1.0	0.98	17.4	Flood Risk
SWPipe12 4	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 65	SWMH1 22	31.050	30.752	0.150	22.634	2.2	2.17	38.6	Flood Risk
SWPipe12 9	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 31	SWMH1 35	32.094	29.763	0.225	1829.945	0.9	0.94	34.5	Surch arged
SWPipe13 0	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 35	SWMH1 43	31.969	29.786	0.225	1829.786	0.9	0.94	34.6	Surch arged
SWPipe13 1	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 43	SWMH1 49	31.723	29.820	0.225	1829.615	0.9	0.94	34.6	Surch arged
SWPipe13 2	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 49	SWMH1 51	31.543	29.853	0.225	1979.331	1.0	0.95	34.6	Surch arged

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SWPipe13 3	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 51	SWMH1 54	31.502	29.942	0.225	2089.953	1.0	0.95	34.8	Surcharged
SWPipe13 4	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH1 39	SWMH1 40	31.773	30.339	0.225	0.000	0.1	0.04	2.3	Surcharged
SWPipe13 5	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH1 40	SWMH1 54	31.769	30.385	0.225	72.652	0.5	0.37	19.0	Surcharged
SWPipe13 6	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 54	SWMH1 60	31.377	30.057	0.225	2445.682	1.6	0.95	34.9	Surcharged
SWPipe13 7	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH1 63	SWMH1 60	31.173	30.413	0.225	0.000	0.0	0	0.0	OK
SWPipe13 8	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH1 60	SWMH1 66	31.193	30.080	0.225	2445.608	1.9	0.16	34.9	Surcharged
SWPipe13 9	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH1 66	SWMH1 67	30.978	30.373	0.300	981.252	2.5	2.24	175.2	Surcharged
SWPipe14 0	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH1 55	SWMH1 52	31.365	30.760	0.000	0.000	0.0	0	0.0	OK
SWPipe15 6	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH0 64	SWMH0 45	33.800	31.222	0.225	6.075	0.6	0.09	4.4	Surcharged
SWPipe15 9	FSR: 100 years: +40 %: 120 mins: Winter	Pipe	SWMH1 21	SWMH0 69	32.280	32.312	0.225	22.068	0.8	0.61	31.6	Flood
SWPipe16 1	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 03	SWMH0 04	37.560	37.199	0.100	6.614	1.6	1.34	12.8	Surcharged
SWPipe16 3	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH0 89	SWMH0 85	33.189	32.772	0.150	6.238	0.9	0.49	8.7	Surcharged
SWPipe16 4	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 31	SWMH0 30	35.211	34.794	0.150	4.820	1.3	0.37	10.3	Surcharged
SWPipe16 5b	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 02	SWMH0 01	37.813	37.252	0.150	15.778	1.7	1.05	29.7	Surcharged
SWPipe16 7	FSR: 100 years: +40 %: 120 mins: Winter	Pipe	SWMH0 20	SWMH0 21	35.625	34.952	0.079	103.704	1.4	0.45	12.8	OK
SWPipe17 5	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH0 23	SWMH0 25	35.438	34.950	0.100	30.407	1.6	1.32	12.6	Surcharged
SWPipe17 7	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH0 81	SWMH0 79	33.337	32.670	0.087	30.254	1.5	0.56	15.9	OK

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SWPipe179	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH179	SWMH175	30.525	30.593	0.100	0.025	2.2	1.7	17.6	Flood
SWPipe183	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH093	SWMH091	33.055	33.055	0.150	6.396	0.8	0.15	6.8	Flood
SWPipe186	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH059	SWMH051	34.031	33.880	0.150	6.168	0.7	0.37	13.0	Flood Risk
SWPipe187	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH061	SWMH059	33.872	33.873	0.150	6.162	0.4	0.16	12.6	Flood
SWPipe190	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH104	SWMH092	32.510	30.941	0.600	80.565	0.3	0.05	34.8	Surcharged
Porous Paving (11)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (11)	SWMH089		32.501	0.032	6.252	0.0		8.7	
SWPipe226	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (9)	SWMH082	33.219	32.417	0.061	7.606	1.1	0.25	7.3	OK
Porous Paving (2)	FSR: 100 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (2)	SWMH020		35.628	0.021	103.756	0.0		12.8	
Porous Paving (5)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (5)	SWMH023		34.965	0.033	30.506	0.0		12.6	
Porous Paving (4)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (4)	SWMH026		34.818	0.017	21.567	0.0		13.4	
Porous Paving (6)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (6)	SWMH034		34.235	0.037	34.564	0.0		20.7	
Porous Paving (15)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (15)	SWMH081		32.787	0.047	30.288	0.0		15.9	
Porous Paving (25)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (25)	SWMH129		31.580	0.032	13.368	0.0		9.8	
Porous Paving (26)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (26)	SWMH129		31.372	0.020	24.234	0.0		14.5	
Porous Paving (27)	FSR: 100 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (27)	SWMH140		30.662	0.038	155.127	0.0		17.0	
Porous Paving (28)	FSR: 100 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (28)	SWMH151		30.752	0.031	46.145	0.0		15.1	
Porous Paving (29)	FSR: 100 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (29)	SWMH149		31.015	0.027	56.435	0.0		14.5	

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Porous Paving (3)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (3)	SWMH0 25		34.787	0.052	35.231	0.0		19.8	
SWPipe00 4a	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 06	SWMH1 89	37.242	36.610	0.225	22.078	1.2	0.34	44.9	OK
SWPipe00 4b	FSR: 100 years: +40 %: 360 mins: Winter	Pipe	SWMH1 89	SWMH0 10	36.479	34.941	0.225	606.359	1.0	1.07	39.1	Surcharged
SWPipe05 0	FSR: 100 years: +40 %: 240 mins: Summer	Pipe	SWMH0 14	SWMH1 89	35.832	34.951	0.225	266.582	0.9	1.03	37.6	Surcharged
SWPipe05 2	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 18	SWMH0 13	35.723	35.725	0.150	26.706	1.7	1.71	30.1	Flood
SWPipe05 3	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 15	SWMH0 18	35.728	35.724	0.225	0.000	0.6	0.41	17.5	Flood Risk
SWPipe05 4	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 17	SWMH0 15	35.725	35.725	0.225	0.000	0.6	0.31	13.0	Flood
SWPipe08 5a	FSR: 100 years: +40 %: 30 mins: Summer	Pipe	SWMH0 94	SWMH1 90	33.026	32.718	0.150	24.610	1.6	0.77	27.5	Surcharged
SWPipe08 5b	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH1 90	SWMH0 98	32.917	32.166	0.225	18.666	0.7	0.8	29.4	Surcharged
SWPipe11 8	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 09	SWMH1 38	32.363	31.991	0.225	51.689	1.7	1.83	67.2	Surcharged
SWPipe11 7	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH1 14	SWMH1 09	32.223	31.608	0.225	404.107	1.0	0.78	28.4	Surcharged
SWPipe18 9a	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 92	SWMH1 93	33.072	30.551	0.600	82.704	1.5	0.17	115.9	Surcharged
SWPipe18 9b	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 93	SWMH1 94	33.150	30.547	0.600	82.141	1.5	0.18	126.7	Surcharged
SWPipe18 9c	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 94	SWMH0 78	33.452	30.537	0.600	79.972	1.5	0.21	142.4	Surcharged
SWPipe00 5c	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 92	SWMH0 27	35.584	34.642	0.225	61.314	1.5	1.67	61.1	Surcharged
SWPipe00 5a	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH0 10	SWMH1 91	36.266	35.001	0.225	933.925	1.4	1.48	54.5	Surcharged
SWPipe00 5b	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 91	SWMH1 92	35.896	34.772	0.225	56.847	1.4	1.56	57.0	Surcharged

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SWPipe00 2c	FSR: 100 years: +40 %: 30 mins: Summer	Pipe	SWMH1 95	SWMH0 10	36.466	34.899	0.225	97.500	1.0	0.4	39.6	Surch arged
SWPipe00 2a	FSR: 100 years: +40 %: 30 mins: Summer	Pipe	SWMH0 05	SWMH1 96	37.382	34.908	0.225	74.973	1.0	0.51	38.8	Surch arged
SWPipe00 2b	FSR: 100 years: +40 %: 30 mins: Summer	Pipe	SWMH1 96	SWMH1 95	37.012	34.890	0.225	78.062	1.0	1.07	39.2	Surch arged
SWPipe02 1a	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH0 32	SWMH1 97	35.141	34.085	0.225	1454.970	1.9	2.11	77.2	Surch arged
SWPipe02 1b	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH1 97	SWMH1 98	34.860	33.623	0.225	1454.055	2.0	2.12	77.6	Surch arged
SWPipe02 1c	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 98	SWMH0 47	34.530	33.358	0.225	109.333	2.1	2.25	82.6	Surch arged
SWPipe07 3a	FSR: 100 years: +40 %: 30 mins: Summer	Pipe	SWMH0 53	SWMH1 99	34.186	30.896	0.600	653.599	1.7	0.54	371.9	Surch arged
SWPipe07 3b	FSR: 100 years: +40 %: 30 mins: Summer	Pipe	SWMH1 99	SWMH0 77	33.992	30.873	0.600	645.459	1.5	0.74	360.6	Surch arged
SWPipe07 5a	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH0 77	SWMH2 00	33.566	30.168	0.600	348.674	1.5	0.86	416.3	Surch arged
SWPipe07 5b	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH2 00	SWMH0 95	33.150	30.104	0.600	344.900	1.5	0.84	410.1	Surch arged
SWPipe11 3a	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH1 68	SWMH2 01	30.946	30.634	0.600	1728.792	1.4	0.83	402.4	Surch arged
SWPipe11 3b	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH2 01	SWMH1 81	30.650	30.503	0.600	1721.436	1.4	0.84	405.9	Flood Risk
Swale 03	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Swale 03	SWMH0 45	34.934	33.551	0.150	7.350	3.2	0.19	14.2	Surch arged
SWPipe07 2a	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 63	SWMH2 02	33.811	30.534	0.600	62.627	1.2	0.32	218.5	Surch arged
SWPipe07 2b	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH2 02	SWMH0 53	33.969	30.260	0.600	60.219	0.9	0.23	160.1	Surch arged
Swale 02	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Swale 02	SWMH1 98	35.347	33.867	0.150	32.724	1.8	0.35	17.8	Surch arged
Swale 01	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Swale 01	SWMH0 22	36.574	33.840	0.150	10.696	2.3	0.15	12.3	Surch arged

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Swale 08	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Swale 08	SWMH016	36.743	33.820	0.150	7.472	1.8	0.16	9.0	Surcharged
Swale 05	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Swale 05	SWMH077	33.852	33.027	0.150	7.957	0.7	0.14	12.7	Surcharged
Swale 04	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Swale 04	SWMH053	35.002	33.502	0.150	9.110	0.9	0.2	16.0	Surcharged
SWPipe098a	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH148	SWMH203	31.544	30.890	0.600	1737.979	1.4	0.81	393.0	Surcharged
SWPipe098b	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH203	SWMH168	31.278	30.773	0.600	1736.631	1.4	0.82	399.0	Surcharged
SWPipe222	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH001	SWMH250	37.861	36.605	0.148	15.828	1.8	1	27.5	Surcharged
SWPipe221	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH249	SWMH248	37.647	37.126	0.058	8.124	3.7	0.79	17.3	OK
SWPipe220	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH248	Car Park-Cellular Storage	37.580	36.054	0.150	8.122	2.4	0.11	17.3	OK
SWPipe001	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH250	Car Park-Cellular Storage	37.587	36.138	0.150	47.394	6.4	0.65	97.6	OK
SWPipe219	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH247	Car Park-Cellular Storage	37.328	36.704	0.150	60.046	7.3	0.78	120.6	Surcharged
Car Park-Cellular Storage	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Car Park-Cellular Storage	SWMH005	37.146	35.042	0.150	73.594	2.2	1.36	38.3	Surcharged
Porous Paving (8)	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Porous Paving (8)	SWMH017	35.688	34.991	0.150	0.004	0.9	0.23	6.4	Surcharged
Porous Paving (7)	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (7)	SWMH014	35.750	34.974	0.150	27.634	0.9	0.19	16.4	Surcharged
Unit(s) 08 to 10-Cellular Storage	FSR: 100 years: +40 %: 240 mins: Summer	Pipe	Unit(s) 08 to 10-Cellular Storage	SWMH014	35.912	34.964	0.150	216.025	2.1	0.83	37.3	Surcharged
SWMH013	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH013	Unit(s) 08 to 10-Cellular Storage	35.955	35.140	0.150	51.098	4.1	2.56	71.7	Surcharged
SWPipe213	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH242	HGV Parking-Cellular Storage	37.210	36.505	0.100	0.000	0.0	0	0.0	OK
SWPipe216	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	HGV Parking-Cellular Storage	SWMH244	37.265	35.233	0.150	35.652	2.0	1.2	33.6	Surcharged

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SWPipe21 1	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH2 39	HGV Parking- Cellular Storage	38.066	37.109	0.100	12.048	4.2	0.5	26.0	OK
SWMH244	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH2 44	SWMH1 89	37.233	35.125	0.150	35.503	1.9	0.61	33.7	Surch arged
SWPipe20 7	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	Unit 16- Cellular Storage	SWMH0 86	33.946	32.360	0.100	455.260	4.2	3.42	32.8	Surch arged
SWPipe20 9	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH2 36	Unit 16- Cellular Storage	33.303	33.076	0.150	35.914	4.2	1.22	73.4	Flood Risk
Porous Paving	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Porous Paving	SWMH0 44	34.902	34.064	0.150	8.214	1.6	0.19	13.4	OK
Porous Paving (42)	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Porous Paving (42)	SWMH0 44	34.328	33.630	0.150	0.010	1.6	0.41	21.2	Surch arged
Porous Paving (41)	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Porous Paving (41)	SWMH0 44	34.986	34.270	0.150	16.171	2.0	0.32	19.2	Surch arged
Porous Paving (44)	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (44)	Porous Paving	35.026	34.265	0.100	1.808	0.1	0.06	1.2	OK
Porous Paving (43)	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (43)	Porous Paving (44)	34.979	34.280	0.074	0.119	0.1	0.12	0.7	OK
SWPipe07 8	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 30	SWMH2 28	32.209	30.359	0.600	17.628	1.0	0.15	103.6	Surch arged
SWPipe07 8 (1)	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH2 28	SWMH0 95	32.536	31.085	0.600	36.939	0.5	0.07	46.5	Surch arged
SWPipe20 3	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH2 29	SWMH2 28	31.386	31.086	0.600	2.187	0.3	0.04	26.1	Surch arged
Swale 07	FSR: 100 years: +40 %: 60 mins: Summer	Pipe	Swale 07	SWMH0 47	34.250	33.293	0.150	37.257	1.3	0.56	22.5	Surch arged
Porous Paving (16)	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (16)	SWMH0 46	34.778	33.892	0.088	71.589	1.7	0.51	18.7	Surch arged
Porous Paving (17)	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (17)	SWMH0 41	34.813	33.868	0.075	37.294	1.5	0.46	13.0	OK
Porous Paving (18)	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (18)	SWMH0 41	35.159	34.203	0.039	7.457	1.6	0.14	5.7	OK
SWPipe14 4	FSR: 100 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (32)	SWMH1 19	32.418	30.930	0.150	55.741	0.5	0.34	9.3	Surch arged

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SWPipe180	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH119	Porous Paving (33)	32.284	30.979	0.150	0.000	0.8	0.52	14.7	Surcharged
Porous Paving (36)	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	Porous Paving (36)	SWMH119	32.862	31.870	0.150	11.986	0.3	0.08	6.1	OK
SWPipe146	FSR: 100 years: +40 %: 120 mins: Winter	Pipe	Porous Paving (33)	SWMH126	32.306	31.006	0.150	103.024	0.9	0.56	15.8	Surcharged
SWPipe181	FSR: 100 years: +40 %: 120 mins: Winter	Pipe	SWMH126	Porous Paving (34)	32.232	31.116	0.150	19.184	0.9	0.56	15.9	Surcharged
SWPipe148	FSR: 100 years: +40 %: 60 mins: Summer	Pipe	Porous Paving (34)	SWMH125	32.269	30.949	0.150	67.865	1.3	0.29	22.5	Surcharged
Porous Paving (37)	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (37)	SWMH125	32.299	31.469	0.150	4.137	0.2	0.03	4.1	OK
SWPipe125a	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH122	Unit 02-Cellular Storage A	32.279	29.913	0.114	22.629	2.6	0.79	37.7	OK
SWPipe155	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Unit(s) 14 to 15-Cellular Storage	SWMH064	33.600	31.116	0.150	4.934	1.2	0.13	9.5	Surcharged
Porous Paving (12)	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Porous Paving (12)	Unit(s) 14 to 15-Cellular Storage	33.324	32.513	0.047	5.748	1.6	0.2	7.6	OK
SWPipe176	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (14)	Unit(s) 14 to 15-Cellular Storage	33.327	32.536	0.058	10.127	1.5	0.3	9.4	OK
SWPipe201	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH087	Unit(s) 14 to 15-Cellular Storage	33.225	33.227	0.150	41.363	3.6	1.7	63.3	Flood
SWPipe200	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (23)	SWMH150	31.534	30.621	0.150	20.725	3.2	0.12	13.9	OK
SWPipe199	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (24)	SWMH150	31.793	30.833	0.150	14.630	4.3	0.08	12.4	OK
SWPipe104	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH170	Unit 01-Cellular Storage B	31.275	29.149	0.150	67.468	3.6	3.56	63.2	Surcharged
SWPipe196	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	Unit 01-Cellular Storage B	SWMH157	30.975	29.846	0.150	1245.974	3.0	1.19	53.2	Surcharged
SWPipe192	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH138	SWMH278	31.781	30.897	0.225	51.192	1.5	1.68	61.5	Surcharged
SWPipe236	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH278	SWMH277	31.781	30.518	0.225	50.862	1.5	1.57	57.9	Surcharged

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SWPipe235	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	SWMH277	Unit 02-Cellular Storage C	32.048	30.294	0.150	84.675	3.2	2.02	57.0	Surcharged
SWMH136	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH136	Unit 02-Cellular Storage C	31.781	31.113	0.150	31.424	3.5	1.28	61.6	Surcharged
SWPipe092	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	Unit 02-Cellular Storage C	SWMH137	31.873	31.359	0.150	1151.529	3.1	1.48	54.4	Surcharged
SWPipe128b	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	Unit 02-Cellular Storage A	SWMH131	32.225	29.733	0.150	1830.096	2.0	0.94	34.5	Surcharged
SWPipe100	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH175	Unit 01-Cellular Storage A	30.680	30.615	0.150	0.023	1.0	0.33	18.1	Flood Risk
SWPipe099	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH176	Unit 01-Cellular Storage A	30.675	30.620	0.150	0.000	0.1	0.05	1.3	Flood Risk
SWPipe102	FSR: 100 years: +40 %: 1440 mins: Winter	Pipe	SWMH177	Unit 01-Cellular Storage A	30.675	30.620	0.150	0.000	0.1	0.05	1.3	Flood Risk
SWPipe197	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	Unit 01-Cellular Storage A	SWMH180	30.550	29.360	0.150	206.996	2.3	1.47	41.0	Surcharged
SWPipe110	FSR: 100 years: +40 %: 1440 mins: Summer	Pipe	Unit 01-Cellular Storage C	SWMH171	30.563	29.619	0.150	2502.586	4.0	1.25	71.0	Surcharged
SWPipe193	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH173	Unit 01-Cellular Storage C	30.713	29.843	0.150	1240.286	3.0	1.76	53.3	Surcharged
SWPipe233	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	SWMH272	SWMH065	33.803	32.008	0.225	930.540	1.3	1	52.0	Surcharged
Unit 07-Cellular Storage A	FSR: 100 years: +40 %: 240 mins: Winter	Pipe	Unit 07-Cellular Storage A	SWMH272	33.652	32.077	0.150	930.793	2.9	0.83	52.0	Surcharged
SWMH066	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH066	Unit 07-Cellular Storage A	33.764	32.665	0.000	0.000	0.0	0	0.0	OK
SWMH067	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH067	Unit 07-Cellular Storage A	33.764	32.552	0.000	0.000	0.0	0	0.0	OK
SWPipe218	FSR: 100 years: +40 %: 60 mins: Summer	Pipe	SWMH072	SWMH062	33.720	31.939	0.225	19.892	0.5	0.18	6.5	Surcharged
SWPipe057	FSR: 100 years: +40 %: 15 mins: Summer	Pipe	SWMH073	Unit 06-Cellular Storage A	33.719	32.420	0.000	0.000	0.0	0	0.0	OK
SWPipe058	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH071	Unit 06-Cellular Storage A	33.720	32.844	0.150	22.951	2.7	1.74	48.0	Surcharged

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SWPipe23 2	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	Unit 06- Cellular Storage A	SWMH0 72	33.671	32.021	0.150	20.171	1.0	0.52	9.3	Surch arged
Porous Paving (13)	FSR: 100 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (13)	Unit 01- Cellular Storage D		30.814	0.017	121.495	0.0		17.7	
Porous Paving (30)	FSR: 100 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (30)	Unit 01- Cellular Storage D		30.690	0.015	78.555	0.0		17.9	
SWPipe23 1	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Unit 01- Cellular Storage D	SWMH1 44	31.362	29.157	0.150	7.141	1.8	0.6	32.1	Surch arged
Porous Paving (31)	FSR: 100 years: +40 %: 120 mins: Winter	No Delay	Porous Paving (31)	Unit 01- Cellular Storage D		31.195	0.013	124.768	0.0		15.7	
SWPipe14 2	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 20	Unit 01- Cellular Storage D	31.456	31.296	0.100	15.657	3.6	2.92	28.0	Flood Risk
Unit 06- Cellular Storage B	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	Unit 06- Cellular Storage B	SWMH0 76	33.021	31.365	0.150	156.607	0.3	0.08	3.3	Surch arged
Porous Paving (22)	FSR: 100 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (22)	Unit 06- Cellular Storage B		33.362	0.030	21.949	0.0		10.0	
Porous Paving (21)	FSR: 100 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (21)	Unit 06- Cellular Storage B		33.219	0.028	30.190	0.0		11.0	
SWPipe08 2	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 45	Unit 01- Cellular Storage D	31.487	30.548	0.150	12.770	1.5	1.52	26.9	Surch arged
SWPipe23 0	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	SWMH1 67	Pumping Station	30.962	28.316	0.300	977.374	2.5	2.24	175.2	Surch arged
SWPipe22 8	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	Swale 06	SWMH2 65	31.535	28.574	0.150	4.714	0.7	0.43	12.2	Surch arged
SWPipe22 9	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH2 65	SWMH1 66	30.672	29.049	0.150	2.419	0.6	0.13	11.1	Surch arged
Porous Paving (39)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (39)	DT 02- Cellular Storage		32.881	0.030	7.466	0.0		5.7	
Porous Paving (40)	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (40)	DT 02- Cellular Storage	33.687	32.922	0.071	15.175	1.6	0.42	13.1	OK
Porous Paving (1)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (1)	DT 02- Cellular Storage		32.906	0.032	17.541	0.0		13.0	
SWPipe16 2	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	DT 02- Cellular Storage	SWMH0 56	33.512	32.429	0.150	179.378	1.4	0.75	25.3	Surch arged

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Porous Paving (19)	FSR: 100 years: +40 %: 60 mins: Winter	No Delay	Porous Paving (19)	Unit 04-Cellular Storage A		32.311	0.030	41.056	0.0		12.8	
Unit 04-Cellular Storage A	FSR: 100 years: +40 %: 60 mins: Winter	Pipe	Unit 04-Cellular Storage A	SWMH1 04	32.309	30.955	0.150	81.809	2.0	0.38	34.6	Surcharged
Porous Paving (20)	FSR: 100 years: +40 %: 30 mins: Winter	No Delay	Porous Paving (20)	Unit 03-Cellular Storage A		31.349	0.024	26.848	0.0		15.2	
Unit 03-Cellular Storage A	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Unit 03-Cellular Storage A	SWMH1 32	31.934	30.934	0.150	47.107	1.6	0.53	29.1	Surcharged
Porous Paving (10)	FSR: 100 years: +40 %: 30 mins: Winter	Pipe	Porous Paving (10)	Unit(s) 11 to 13-Cellular Storage	33.184	32.398	0.023	4.472	2.7	0.04	4.5	OK
SWPipe03 1	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 82	Unit(s) 11 to 13-Cellular Storage	33.317	31.988	0.069	5.130	0.9	0.42	7.4	OK
SWPipe03 0	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	Unit(s) 11 to 13-Cellular Storage	SWMH0 74	33.462	32.908	0.150	49.998	0.2	0.12	3.4	Surcharged
SWPipe22 7	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 75	Unit(s) 11 to 13-Cellular Storage	33.532	32.131	0.150	25.391	2.0	1.25	35.1	Surcharged
SWPipe22 5	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 90	Unit(s) 04 to 05-Cellular Storage	33.080	32.525	0.049	6.165	3.5	0.46	13.3	OK
Unit(s) 04 to 05-Cellular Storage	FSR: 100 years: +40 %: 240 mins: Summer	Pipe	Unit(s) 04 to 05-Cellular Storage	SWMH0 99	32.479	30.001	0.150	140.530	2.2	1	39.8	Surcharged
SWPipe11 9a	FSR: 100 years: +40 %: 480 mins: Winter	Pipe	SWMH1 10	Unit 02-Cellular Storage B	32.350	32.212	0.150	0.001	0.7	0.2	12.0	Flood Risk
SWPipe11 9b	FSR: 100 years: +40 %: 360 mins: Winter	Pipe	Unit 02-Cellular Storage B	SWMH1 14	32.126	32.216	0.150	551.472	1.6	1	28.2	Flood
Unit 03-Cellular Storage B	FSR: 100 years: +40 %: 120 mins: Winter	Pipe	Unit 03-Cellular Storage B	SWMH1 33	31.550	30.522	0.100	92.181	1.7	1.13	13.2	Surcharged
SWPipe20 4	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH2 30	Unit 01-Cellular Storage C	30.657	28.015	0.054	3.905	1.4	0.27	8.0	OK
SWPipe11 2	FSR: 100 years: +40 %: 1440 mins: Summer	Pipe	SWMH1 71	SWMH1 81	30.805	29.597	0.600	2499.465	0.3	0.15	71.1	Surcharged
SWPipe11 4	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH1 86	Unit 01-Cellular Storage C	30.052	29.796	0.150	37.183	3.7	1.1	65.6	Flood Risk
SWPipe04 5	FSR: 100 years: +40 %: 15 mins: Winter	Pipe	SWMH0 69	Unit 16-Cellular Storage	33.760	32.007	0.150	57.622	2.0	2.04	108.7	Surcharged