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Grayshaws
London Road
Crowborough TN6 1TD

File: P21126-HZL-CA-D-2502
Network: Storm 1
Rev. S4-P2
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Proposed Development
Hatchgate Cottage, Hatchgate
Cuckfield

Design Settings

Rainfall Methodology	FEH-22	Minimum Velocity (m/s)	1.00
Return Period (years)	2	Connection Type	Level Inverts
Additional Flow (%)	0	Minimum Backdrop Height (m)	1.000
CV	1.000	Preferred Cover Depth (m)	0.750
Time of Entry (mins)	4.00	Include Intermediate Ground	✓
Maximum Time of Concentration (mins)	30.00	Enforce best practice design rules	x
Maximum Rainfall (mm/hr)	50.0		

Manhole Schedule

Node	Easting (m)	Northing (m)	CL (m)	Depth (m)	Dia (mm)	Link	IL (m)	Dia (mm)
S5-1	531352.339	124588.581	94.400	0.795	450			
						1.000	93.605	100
S5-2	531340.311	124601.927	94.400	0.806	450			
						2.000	93.594	100
S5-3	531352.414	124601.427	94.400	1.011	450	2.000	93.389	100
						1.000	93.389	100
						1.001	93.389	100
S07	531358.073	124601.865	94.350	1.057	600	1.001	93.293	100
						1.002	93.293	150
S06	531356.530	124619.074	94.250	1.350	900	3.000	92.900	150
						1.002	92.900	150
						1.003	92.900	150
S4-1	531354.096	124615.310	94.400	0.975	450			
						4.000	93.425	100
S4-2	531348.785	124603.549	94.400	1.103	450	4.000	93.297	100
						4.001	93.297	100
S4-3	531340.204	124603.637	94.400	1.189	450	4.001	93.211	100
						4.002	93.211	150
S4-5	531336.189	124616.776	94.400	0.905	450			
						5.000	93.495	100



Manhole Schedule

Node	Easting (m)	Northing (m)	CL (m)	Depth (m)	Dia (mm)	Link	IL (m)	Dia (mm)
S4-4	531327.393	124615.106	94.400	1.360	450	5.000	93.040	100
						4.002	93.040	150
						4.003	93.040	150
S05	531325.679	124619.443	94.300	2.150	900	4.003	92.150	150
						1.003	92.150	150
						1.004	92.150	225
S3-1	531345.925	124631.232	94.100	0.779	450			
						6.000	93.321	100
						6.000	93.183	100
S3-2	531359.600	124631.668	94.000	0.817	450			
						6.001	93.183	100
						6.001	92.914	100
S3-3	531359.546	124645.474	93.975	1.061	450			
						6.002	92.914	150
						6.002	92.766	150
S3-4	531344.621	124645.591	94.000	1.234	450			
						6.003	92.766	150
S12	531358.812	124625.539	94.175	1.013	600			
						3.000	93.162	150
S10	531365.386	124646.849	93.750	1.138	600			
						7.000	92.612	150
						7.000	92.472	150
S09	531344.511	124646.942	93.959	1.487	600	6.003	92.472	150
						6.004	92.472	225
S2-1	531338.380	124631.891	94.075	0.648	450			
						8.000	93.427	150
						8.000	93.278	150
S2-2	531324.547	124631.375	94.000	0.722	450			
						8.001	93.278	150
S2-3	531334.903	124645.292	94.000	1.066	450			
						9.000	92.934	100



Manhole Schedule

Node	Easting (m)	Northing (m)	CL (m)	Depth (m)	Dia (mm)	Link	IL (m)	Dia (mm)
S2-4	531323.001	124645.409	93.750	1.125	450	9.000	92.625	100
						8.001	92.625	150
						8.002	92.625	150
S08 Junction	531322.900	124646.669	93.600	1.343	150	8.002	92.257	150
						6.004	92.257	225
						6.005	92.257	225
S04	531317.870	124646.605	93.600	1.782	1200	6.005	91.818	225
						1.004	91.818	225
						1.005	91.818	225
S1-1	531311.218	124624.127	94.150	0.713	450			
						10.000	93.437	100
						10.000	93.255	100
S1-2	531320.891	124629.934	94.150	0.895	450			
						10.001	93.255	100
S1-3	531300.695	124638.412	94.100	1.084	450			
						11.000	93.016	100
						11.000	92.600	100
S1-4	531314.410	124644.550	93.975	1.375	450	10.001	92.600	100
						10.002	92.600	150
S03 Junction	531314.333	124646.647	93.600	1.817	150	10.002	91.783	150
						1.005	91.783	225
						1.006	91.783	225
S02	531310.944	124646.632	93.600	1.850	1200	1.006	91.750	225
						1.007	91.750	100
C01	531306.939	124644.597	93.500	1.800	600	1.007	91.700	100

Simulation Settings

Rainfall Methodology	FEH-22	Analysis Speed	Normal	Starting Level (m)	
Rainfall Events	Singular	Skip Steady State	x	Check Discharge Rate(s)	x
Summer CV	1.000	Drain Down Time (mins)	240	Check Discharge Volume	x
Winter CV	1.000	Additional Storage (m³/ha)	20.0		

Storm Durations

15 | 30 | 60 | 120 | 180 | 240 | 360 | 480 | 600 | 720 | 960 | 1440

Return Period (years)	Climate Change (CC %)	Additional Area (A %)	Additional Flow (Q %)
2	0	0	10
30	40	0	10
100	45	0	10
1000	0	0	10

Node S02 Online Hydro -Brake® Control

Flap Valve	x
Replaces Downstream Link	x
Invert Level (m)	91.750
Design Depth (m)	1.400
Design Flow (l/s)	0.9
Objective	(HE) Minimise upstream storage
Sump Available	x
Product Number	CTL-CHE-0040-9000-1400-9000
Min Outlet Diameter (m)	0.075
Min Node Diameter (mm)	0

Node S05 Depth/Area Storage Structure

Base Inf Coefficient (m/hr)	0.00000	Safety Factor	2.0	Invert Level (m)	92.150
Side Inf Coefficient (m/hr)	0.00000	Porosity	0.95	Time to half empty (mins)	

Depth (m)	Area (m²)	Inf Area (m²)	Depth (m)	Area (m²)	Inf Area (m²)	Depth (m)	Area (m²)	Inf Area (m²)
0.000	140.0	0.0	1.200	140.0	0.0	1.201	0.0	0.0

Node S12 Carpark Storage Structure

Base Inf Coefficient (m/hr)	0.00000	Invert Level (m)	93.330	Slope (1:X)	500.0
Side Inf Coefficient (m/hr)	0.00000	Time to half empty (mins)	0	Depth (m)	0.300
Safety Factor	2.0	Width (m)	4.500	Inf Depth (m)	
Porosity	0.30	Length (m)	71.000		

Node S10 Carpark Storage Structure

Base Inf Coefficient (m/hr)	0.00000	Invert Level (m)	92.775	Slope (1:X)	40.0
Side Inf Coefficient (m/hr)	0.00000	Time to half empty (mins)		Depth (m)	0.300
Safety Factor	2.0	Width (m)	4.500	Inf Depth (m)	
Porosity	0.30	Length (m)	29.000		

Results for 2 year +10% Q Critical Storm Duration. Lowest mass balance: 96.12%

Node Event	US Node	Peak (mins)	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
15 minute summer	S5-1	10	93.635	0.030	1.5	0.0096	0.0000	OK
15 minute summer	S5-2	10	93.617	0.023	0.9	0.0058	0.0000	OK
15 minute summer	S5-3	10	93.437	0.048	3.2	0.0109	0.0000	OK
15 minute summer	S07	10	93.328	0.035	3.2	0.0099	0.0000	OK
15 minute summer	S06	10	92.999	0.099	14.7	0.0629	0.0000	OK
15 minute summer	S4-1	10	93.451	0.026	0.9	0.0063	0.0000	OK
15 minute summer	S4-2	10	93.336	0.039	1.8	0.0091	0.0000	OK
15 minute summer	S4-3	10	93.251	0.040	2.3	0.0078	0.0000	OK
15 minute summer	S4-5	10	93.514	0.019	1.1	0.0051	0.0000	OK
15 minute summer	S4-4	9	93.062	0.022	3.4	0.0036	0.0000	OK
720 minute winter	S05	540	92.377	0.227	2.9	30.2943	0.0000	SURCHARGED
15 minute summer	S3-1	10	93.362	0.041	2.0	0.0156	0.0000	OK
15 minute summer	S3-2	10	93.223	0.040	2.8	0.0096	0.0000	OK
15 minute summer	S3-3	10	92.965	0.051	3.6	0.0114	0.0000	OK
15 minute summer	S3-4	10	92.790	0.024	4.8	0.0060	0.0000	OK
15 minute summer	S12	10	93.223	0.061	11.5	0.0786	0.0000	OK
15 minute summer	S10	10	92.659	0.047	3.1	0.0246	0.0000	OK
15 minute summer	S09	10	92.535	0.063	7.9	0.0178	0.0000	OK
15 minute summer	S2-1	10	93.464	0.037	2.3	0.0175	0.0000	OK
15 minute summer	S2-2	10	93.311	0.033	3.5	0.0101	0.0000	OK
15 minute summer	S2-3	10	92.953	0.019	0.8	0.0044	0.0000	OK
15 minute summer	S2-4	10	92.649	0.024	5.1	0.0054	0.0000	OK

Link Event (Upstream Depth)	US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap
15 minute summer	S5-1	1.000	S5-3	1.5	0.537	0.191
15 minute summer	S5-2	2.000	S5-3	0.9	0.361	0.114
15 minute summer	S5-3	1.001	S07	3.2	1.036	0.405
15 minute summer	S07	1.002	S06	3.2	0.448	0.118
15 minute summer	S06	1.003	S05	15.0	2.228	0.541
15 minute summer	S4-1	4.000	S4-2	0.9	0.410	0.150
15 minute summer	S4-2	4.001	S4-3	1.8	0.634	0.297
15 minute summer	S4-3	4.002	S4-4	2.3	0.877	0.129
15 minute summer	S4-5	5.000	S4-4	1.1	0.950	0.080
15 minute summer	S4-4	4.003	S05	3.4	2.453	0.044
720 minute winter	S05	1.004	S04	-1.1	0.239	-0.019
15 minute summer	S3-1	6.000	S3-2	2.0	0.683	0.330
15 minute summer	S3-2	6.001	S3-3	2.8	0.815	0.331
15 minute summer	S3-3	6.002	S3-4	3.6	1.043	0.203
15 minute summer	S3-4	6.003	S09	4.8	1.128	0.057
15 minute summer	S12	3.000	S06	11.5	1.206	0.329
15 minute summer	S10	7.000	S09	3.1	0.542	0.214
15 minute summer	S09	6.004	S08 Junction	7.8	1.089	0.151
15 minute summer	S2-1	8.000	S2-2	2.3	0.741	0.125
15 minute summer	S2-2	8.001	S2-4	3.5	1.514	0.091
15 minute summer	S2-3	9.000	S2-4	0.8	0.640	0.082
15 minute summer	S2-4	8.002	S08 Junction	5.1	1.736	0.053

Results for 2 year +10% Q Critical Storm Duration. Lowest mass balance: 96.12%

Node Event	US Node	Peak (mins)	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
720 minute winter	S08 Junction	540	92.377	0.120	1.3	0.0022	0.0000	OK
720 minute winter	S04	540	92.377	0.559	1.3	0.6319	0.0000	SURCHARGED
15 minute summer	S1-1	10	93.459	0.022	0.8	0.0057	0.0000	OK
15 minute summer	S1-2	10	93.282	0.027	1.7	0.0068	0.0000	OK
15 minute summer	S1-3	10	93.036	0.020	0.8	0.0044	0.0000	OK
15 minute summer	S1-4	10	92.617	0.017	3.3	0.0036	0.0000	OK
720 minute winter	S03 Junction	540	92.377	0.594	1.4	0.0107	0.0000	SURCHARGED
720 minute winter	S02	540	92.377	0.627	1.6	0.7087	0.0000	SURCHARGED
720 minute winter	C01	540	91.721	0.021	0.6	0.0000	0.0000	OK

Link Event (Upstream Depth)	US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap
720 minute winter	S08 Junction	6.005	S04	1.3	0.377	0.008
720 minute winter	S04	1.005	S03 Junction	1.4	0.311	0.027
15 minute summer	S1-1	10.000	S1-2	0.8	0.537	0.104
15 minute summer	S1-2	10.001	S1-4	1.7	1.301	0.138
15 minute summer	S1-3	11.000	S1-4	0.8	0.802	0.079
15 minute summer	S1-4	10.002	S03 Junction	3.3	0.915	0.029
720 minute winter	S03 Junction	1.006	S02	1.6	0.166	0.030
720 minute winter	S02	1.007	C01	0.6	0.500	0.094

Results for 30 year +40% CC +10% Q Critical Storm Duration. Lowest mass balance: 96.84%

Node Event	US Node	Peak (mins)	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
15 minute summer	S5-1	10	93.688	0.083	5.3	0.0269	0.0000	OK
15 minute summer	S5-2	10	93.638	0.044	3.1	0.0113	0.0000	OK
15 minute summer	S5-3	10	93.610	0.221	10.7	0.0499	0.0000	SURCHARGED
15 minute summer	S07	11	93.364	0.071	10.4	0.0201	0.0000	OK
15 minute summer	S06	12	93.308	0.408	30.7	0.2596	0.0000	SURCHARGED
15 minute summer	S4-1	10	93.477	0.052	3.2	0.0125	0.0000	OK
15 minute summer	S4-2	10	93.408	0.111	6.6	0.0262	0.0000	SURCHARGED
15 minute summer	S4-3	10	93.291	0.080	8.4	0.0158	0.0000	OK
15 minute summer	S4-5	10	93.532	0.037	3.8	0.0098	0.0000	OK
15 minute summer	S4-4	10	93.080	0.040	12.1	0.0063	0.0000	OK
480 minute winter	S05	472	92.979	0.829	10.8	110.7530	0.0000	SURCHARGED
15 minute summer	S3-1	11	93.489	0.168	7.0	0.0647	0.0000	SURCHARGED
15 minute summer	S3-2	11	93.318	0.135	8.9	0.0326	0.0000	SURCHARGED
15 minute summer	S3-3	9	93.009	0.095	11.3	0.0214	0.0000	OK
480 minute winter	S3-4	472	92.980	0.214	1.7	0.0531	0.0000	SURCHARGED
15 minute summer	S12	12	93.434	0.272	40.8	4.0419	0.0000	SURCHARGED
480 minute winter	S10	472	92.979	0.367	1.1	0.6752	0.0000	SURCHARGED
480 minute winter	S09	472	92.980	0.508	3.7	0.1438	0.0000	SURCHARGED
15 minute summer	S2-1	10	93.501	0.074	8.2	0.0352	0.0000	OK
15 minute summer	S2-2	10	93.337	0.059	12.5	0.0181	0.0000	OK
480 minute winter	S2-3	464	92.981	0.047	0.3	0.0106	0.0000	OK
480 minute winter	S2-4	472	92.980	0.355	2.5	0.0796	0.0000	SURCHARGED

Link Event (Upstream Depth)	US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap
15 minute summer	S5-1	1.000	S5-3	5.0	0.695	0.642
15 minute summer	S5-2	2.000	S5-3	3.0	0.471	0.384
15 minute summer	S5-3	1.001	S07	10.4	1.419	1.322
15 minute summer	S07	1.002	S06	10.3	0.693	0.383
15 minute summer	S06	1.003	S05	30.3	2.203	1.090
15 minute summer	S4-1	4.000	S4-2	3.2	0.513	0.532
15 minute summer	S4-2	4.001	S4-3	6.5	0.861	1.071
15 minute summer	S4-3	4.002	S4-4	8.3	1.270	0.470
15 minute summer	S4-5	5.000	S4-4	3.8	1.389	0.277
15 minute summer	S4-4	4.003	S05	12.1	2.647	0.155
480 minute winter	S05	1.004	S04	-4.6	-0.116	-0.082
15 minute summer	S3-1	6.000	S3-2	6.2	0.837	1.024
15 minute summer	S3-2	6.001	S3-3	8.6	1.148	1.015
15 minute summer	S3-3	6.002	S3-4	11.2	1.310	0.634
480 minute winter	S3-4	6.003	S09	3.0	0.890	0.035
15 minute summer	S12	3.000	S06	24.0	1.394	0.687
480 minute winter	S10	7.000	S09	1.1	0.405	0.079
480 minute winter	S09	6.004	S08 Junction	2.7	0.625	0.051
15 minute summer	S2-1	8.000	S2-2	8.2	1.084	0.445
15 minute summer	S2-2	8.001	S2-4	12.5	1.905	0.325
480 minute winter	S2-3	9.000	S2-4	0.3	0.498	0.031
480 minute winter	S2-4	8.002	S08 Junction	1.8	0.983	0.019

Results for 30 year +40% CC +10% Q Critical Storm Duration. Lowest mass balance: 96.84%

Node Event	US Node	Peak (mins)	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
480 minute winter	S08 Junction	472	92.980	0.723	4.4	0.0130	0.0000	SURCHARGED
480 minute winter	S04	464	92.980	1.162	4.7	1.3139	0.0000	SURCHARGED
15 minute summer	S1-1	10	93.480	0.043	2.9	0.0112	0.0000	OK
15 minute summer	S1-2	9	93.309	0.054	6.2	0.0134	0.0000	OK
15 minute summer	S1-3	9	93.053	0.037	2.9	0.0083	0.0000	OK
480 minute winter	S1-4	464	92.978	0.378	1.2	0.0790	0.0000	SURCHARGED
480 minute winter	S03 Junction	472	92.978	1.195	2.6	0.0215	0.0000	SURCHARGED
480 minute winter	S02	472	92.978	1.228	2.2	1.3887	0.0000	SURCHARGED
480 minute winter	C01	464	91.725	0.025	0.8	0.0000	0.0000	OK

Link Event (Upstream Depth)	US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap
480 minute winter	S08 Junction	6.005	S04	4.3	0.719	0.028
480 minute winter	S04	1.005	S03 Junction	2.3	0.343	0.044
15 minute summer	S1-1	10.000	S1-2	2.9	0.791	0.377
15 minute summer	S1-2	10.001	S1-4	6.2	1.698	0.506
15 minute summer	S1-3	11.000	S1-4	2.9	1.086	0.287
480 minute winter	S1-4	10.002	S03 Junction	1.6	0.112	0.014
480 minute winter	S03 Junction	1.006	S02	2.2	0.124	0.042
480 minute winter	S02	1.007	C01	0.8	0.548	0.132

Results for 100 year +45% CC +10% Q Critical Storm Duration. Lowest mass balance: 97.06%

Node Event	US Node	Peak (mins)	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
15 minute summer	S5-1	11	93.847	0.242	6.9	0.0787	0.0000	SURCHARGED
15 minute summer	S5-2	11	93.747	0.153	4.1	0.0391	0.0000	SURCHARGED
15 minute summer	S5-3	11	93.704	0.315	12.7	0.0713	0.0000	SURCHARGED
15 minute summer	S07	12	93.436	0.143	11.9	0.0404	0.0000	OK
30 minute summer	S06	21	93.368	0.468	31.8	0.2979	0.0000	SURCHARGED
15 minute summer	S4-1	11	93.528	0.103	4.2	0.0249	0.0000	SURCHARGED
15 minute summer	S4-2	10	93.470	0.173	8.1	0.0407	0.0000	SURCHARGED
15 minute summer	S4-3	10	93.301	0.090	10.2	0.0178	0.0000	OK
15 minute summer	S4-5	10	93.538	0.043	5.0	0.0115	0.0000	OK
600 minute winter	S4-4	585	93.276	0.236	1.3	0.0375	0.0000	SURCHARGED
600 minute winter	S05	585	93.276	1.126	11.8	150.4827	0.0000	SURCHARGED
15 minute summer	S3-1	11	93.729	0.408	9.2	0.1572	0.0000	SURCHARGED
15 minute summer	S3-2	11	93.474	0.291	10.9	0.0704	0.0000	SURCHARGED
600 minute winter	S3-3	585	93.276	0.362	1.4	0.0815	0.0000	SURCHARGED
600 minute winter	S3-4	585	93.275	0.509	1.9	0.1262	0.0000	SURCHARGED
15 minute summer	S12	13	93.475	0.313	53.3	7.5324	0.0000	SURCHARGED
600 minute winter	S10	585	93.276	0.664	1.2	3.1874	0.0000	SURCHARGED
600 minute winter	S09	585	93.275	0.803	3.3	0.2273	0.0000	SURCHARGED
15 minute summer	S2-1	10	93.514	0.087	10.6	0.0412	0.0000	OK
15 minute summer	S2-2	10	93.346	0.068	16.2	0.0209	0.0000	OK
600 minute winter	S2-3	585	93.275	0.341	0.3	0.0771	0.0000	SURCHARGED
600 minute winter	S2-4	585	93.278	0.653	2.0	0.1464	0.0000	SURCHARGED

Link Event (Upstream Depth)	US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap
15 minute summer	S5-1	1.000	S5-3	5.9	0.756	0.753
15 minute summer	S5-2	2.000	S5-3	3.3	0.494	0.415
15 minute summer	S5-3	1.001	S07	11.9	1.523	1.512
15 minute summer	S07	1.002	S06	11.5	0.716	0.429
30 minute summer	S06	1.003	S05	29.1	2.044	1.046
15 minute summer	S4-1	4.000	S4-2	3.9	0.535	0.646
15 minute summer	S4-2	4.001	S4-3	7.8	1.001	1.294
15 minute summer	S4-3	4.002	S4-4	10.2	1.333	0.575
15 minute summer	S4-5	5.000	S4-4	5.0	1.515	0.364
600 minute winter	S4-4	4.003	S05	1.3	0.960	0.017
600 minute winter	S05	1.004	S04	-4.9	-0.123	-0.086
15 minute summer	S3-1	6.000	S3-2	7.6	0.967	1.248
15 minute summer	S3-2	6.001	S3-3	10.3	1.315	1.215
600 minute winter	S3-3	6.002	S3-4	1.4	0.793	0.081
600 minute winter	S3-4	6.003	S09	1.9	0.829	0.023
15 minute summer	S12	3.000	S06	24.5	1.429	0.703
600 minute winter	S10	7.000	S09	1.4	0.383	0.095
600 minute winter	S09	6.004	S08 Junction	2.9	0.556	0.055
15 minute summer	S2-1	8.000	S2-2	10.6	1.154	0.575
15 minute summer	S2-2	8.001	S2-4	16.2	1.820	0.421
600 minute winter	S2-3	9.000	S2-4	0.3	0.498	0.031
600 minute winter	S2-4	8.002	S08 Junction	5.2	0.903	0.054

Results for 100 year +45% CC +10% Q Critical Storm Duration. Lowest mass balance: 97.06%

Node Event	US Node	Peak (mins)	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
600 minute winter	S08 Junction	585	93.278	1.021	7.6	0.0184	0.0000	SURCHARGED
600 minute winter	S04	585	93.276	1.458	6.8	1.6487	0.0000	SURCHARGED
15 minute summer	S1-1	10	93.488	0.051	3.8	0.0133	0.0000	OK
15 minute summer	S1-2	10	93.314	0.059	8.1	0.0148	0.0000	OK
600 minute winter	S1-3	600	93.275	0.259	0.3	0.0585	0.0000	SURCHARGED
600 minute winter	S1-4	585	93.275	0.675	1.3	0.1411	0.0000	SURCHARGED
600 minute winter	S03 Junction	600	93.275	1.492	1.9	0.0269	0.0000	SURCHARGED
600 minute winter	S02	585	93.275	1.525	1.4	1.7250	0.0000	SURCHARGED
600 minute winter	C01	585	91.726	0.026	0.9	0.0000	0.0000	OK

Link Event (Upstream Depth)	US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap
600 minute winter	S08 Junction	6.005	S04	4.8	0.555	0.031
600 minute winter	S04	1.005	S03 Junction	-2.0	0.332	-0.039
15 minute summer	S1-1	10.000	S1-2	3.8	0.861	0.494
15 minute summer	S1-2	10.001	S1-4	8.1	1.732	0.657
600 minute winter	S1-3	11.000	S1-4	0.3	0.600	0.030
600 minute winter	S1-4	10.002	S03 Junction	1.6	0.111	0.014
600 minute winter	S03 Junction	1.006	S02	1.4	0.069	0.027
600 minute winter	S02	1.007	C01	0.9	0.565	0.146

Results for 1000 year +10% Q Critical Storm Duration. Lowest mass balance: 97.07%

Node Event	US Node	Peak (mins)	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
15 minute summer	S5-1	11	93.847	0.242	6.9	0.0787	0.0000	SURCHARGED
15 minute summer	S5-2	11	93.747	0.153	4.1	0.0390	0.0000	SURCHARGED
15 minute summer	S5-3	11	93.704	0.315	12.7	0.0712	0.0000	SURCHARGED
15 minute summer	S07	12	93.435	0.142	11.9	0.0401	0.0000	OK
720 minute winter	S06	705	93.430	0.530	5.3	0.3369	0.0000	SURCHARGED
15 minute summer	S4-1	11	93.525	0.100	4.2	0.0242	0.0000	SURCHARGED
15 minute summer	S4-2	10	93.470	0.173	8.1	0.0406	0.0000	SURCHARGED
720 minute winter	S4-3	705	93.429	0.218	0.8	0.0432	0.0000	SURCHARGED
15 minute summer	S4-5	10	93.538	0.043	5.0	0.0115	0.0000	OK
720 minute winter	S4-4	705	93.429	0.389	1.2	0.0619	0.0000	SURCHARGED
720 minute winter	S05	705	93.429	1.279	10.9	160.4800	0.0000	SURCHARGED
15 minute summer	S3-1	11	93.729	0.408	9.2	0.1570	0.0000	SURCHARGED
15 minute summer	S3-2	11	93.473	0.290	10.9	0.0702	0.0000	SURCHARGED
720 minute winter	S3-3	690	93.429	0.515	1.3	0.1159	0.0000	SURCHARGED
720 minute winter	S3-4	705	93.429	0.663	1.7	0.1645	0.0000	SURCHARGED
30 minute summer	S12	21	93.477	0.315	48.6	7.7195	0.0000	SURCHARGED
720 minute winter	S10	705	93.429	0.817	1.1	5.2479	0.0000	SURCHARGED
720 minute winter	S09	705	93.429	0.957	4.4	0.2710	0.0000	SURCHARGED
15 minute summer	S2-1	10	93.514	0.087	10.6	0.0412	0.0000	OK
720 minute winter	S2-2	705	93.430	0.152	1.2	0.0467	0.0000	SURCHARGED
720 minute winter	S2-3	705	93.430	0.496	0.3	0.1120	0.0000	SURCHARGED
720 minute winter	S2-4	690	93.429	0.804	3.1	0.1800	0.0000	SURCHARGED

Link Event (Upstream Depth)	US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap
15 minute summer	S5-1	1.000	S5-3	5.9	0.756	0.753
15 minute summer	S5-2	2.000	S5-3	3.3	0.494	0.415
15 minute summer	S5-3	1.001	S07	11.9	1.523	1.512
15 minute summer	S07	1.002	S06	11.5	0.716	0.428
720 minute winter	S06	1.003	S05	5.3	1.029	0.191
15 minute summer	S4-1	4.000	S4-2	3.8	0.529	0.640
15 minute summer	S4-2	4.001	S4-3	7.8	0.999	1.291
720 minute winter	S4-3	4.002	S4-4	0.8	0.662	0.045
15 minute summer	S4-5	5.000	S4-4	5.0	1.516	0.364
720 minute winter	S4-4	4.003	S05	1.2	0.682	0.015
720 minute winter	S05	1.004	S04	-4.5	-0.114	-0.080
15 minute summer	S3-1	6.000	S3-2	7.6	0.967	1.248
15 minute summer	S3-2	6.001	S3-3	10.3	1.315	1.215
720 minute winter	S3-3	6.002	S3-4	1.3	0.782	0.074
720 minute winter	S3-4	6.003	S09	3.3	0.783	0.039
30 minute summer	S12	3.000	S06	25.8	1.540	0.738
720 minute winter	S10	7.000	S09	1.3	0.373	0.087
720 minute winter	S09	6.004	S08 Junction	2.6	0.550	0.051
15 minute summer	S2-1	8.000	S2-2	10.6	1.154	0.575
720 minute winter	S2-2	8.001	S2-4	1.2	1.096	0.032
720 minute winter	S2-3	9.000	S2-4	0.3	0.471	0.031
720 minute winter	S2-4	8.002	S08 Junction	1.9	0.903	0.019

Results for 1000 year +10% Q Critical Storm Duration. Lowest mass balance: 97.07%

Node Event	US Node	Peak (mins)	Level (m)	Depth (m)	Inflow (l/s)	Node Vol (m³)	Flood (m³)	Status
720 minute winter	S08 Junction	705	93.428	1.171	4.4	0.0211	0.0000	FLOOD RISK
720 minute winter	S04	705	93.430	1.612	4.7	1.8226	0.0000	FLOOD RISK
15 minute summer	S1-1	10	93.488	0.051	3.8	0.0133	0.0000	OK
720 minute winter	S1-2	705	93.428	0.173	0.6	0.0433	0.0000	SURCHARGED
720 minute winter	S1-3	705	93.430	0.414	0.3	0.0935	0.0000	SURCHARGED
720 minute winter	S1-4	705	93.430	0.830	1.2	0.1735	0.0000	SURCHARGED
720 minute winter	S03 Junction	705	93.430	1.647	2.9	0.0296	0.0000	FLOOD RISK
720 minute winter	S02	705	93.430	1.680	2.1	1.9001	0.0000	FLOOD RISK
720 minute winter	C01	705	91.727	0.026	1.0	0.0000	0.0000	OK

Link Event (Upstream Depth)	US Node	Link	DS Node	Outflow (l/s)	Velocity (m/s)	Flow/Cap
720 minute winter	S08 Junction	6.005	S04	4.7	0.589	0.030
720 minute winter	S04	1.005	S03 Junction	2.1	0.321	0.041
15 minute summer	S1-1	10.000	S1-2	3.8	0.865	0.494
720 minute winter	S1-2	10.001	S1-4	0.6	0.920	0.049
720 minute winter	S1-3	11.000	S1-4	0.3	0.548	0.030
720 minute winter	S1-4	10.002	S03 Junction	1.1	0.087	0.010
720 minute winter	S03 Junction	1.006	S02	2.1	0.215	0.042
720 minute winter	S02	1.007	C01	1.0	0.572	0.154