

York House Edison Park  
Dorcan Way  
Swindon SN3 3RB



Date 18 February 2011 12:57  
File WATERCOURSE 2.SIM

Designed By sstarr  
Checked By  
Simulation W.11.4

Elstree Computing Ltd

Global Variables

Region	FSR - England & Wales
Return Period (yrs)	100
M5-60 (mm)	18.000
Ratio R	0.356
Volumetric Runoff Coef	0.750
Profile Type	Summer
PIMP (%)	100
Areal Reduction Factor	1.000
Storm Duration (mins)	30
Hot Start (mins)	0
Hot Start Level (mm)	0
Manhole Headloss Coefficient	0.500
MADD Factor * 10m <sup>3</sup> /ha Storage	2.000
Foul Sewage/Hectare (l/s)	0.00
Additional Flow - % of Total Flow	0
Inlet Coefficient	0.800
Number of Input Hydrographs	0
Number of Time/Area Diagrams	0
Number of Bifurcations	0
Number of Overflows	0
Number of Off-Line Controls	0
Number of On-Line Controls	0

**Starting Storm file name**

W:\2900S\2972 - LEEK\MICRODRAINAGE\WATERCOURSE 2.SWS

Freely Discharging Outfalls

Outfall Pipe Number	Outfall MH/No	C.Level (m)	I.Level (m)	D,L (mm)	B (mm)
1.002		184.340	182.390	0	0



Network Details

\* - Indicates pipe has been modified outside of WinDes's Storm/Foul & Schedules

PN	Length (m)	Fall (m)	Slope (1:x)	Area (ha)	T.E. (mins)	Rain Pro	n	Hyd Sect	Dia (mm)
1.000	55.00	4.140	13.3	0.000	5.00	1	0.035	∕	-1
1.001	60.00	2.090	28.7	0.000	0.00	1	0.035	∕	-1
1.002	20.00	1.710	11.7	0.000	0.00	1	0.035	∕	-1

PN	USMH No.	US/CL (m)	US/IL (m)	US C.Depth (m)	DS/CL (m)	DS/IL (m)	DS C.Depth (m)	Ctrl No.	US/MH (mm)
1.000	1	191.180	190.330	-0.800	188.190	186.190	0.350		
1.001	2	188.190	186.190	0.350	184.750	184.100	-1.000		
1.002	3	184.750	184.100	-1.000	184.340	182.390	0.300		



The following hydraulic sections have been used in this network

NOTE: Diameters less than 66 refer to section numbers of hydraulic conduits. These conduits are marked by the symbols:- [] box culvert, \ / open channel, oo dual pipe, ooo triple pipe, O egg.

Section numbers < 0 are taken from the file Watercourse 2 CH 115.SEC

Section Number	Conduit Type	Major Dimn. (mm)	Minor Dimn. (mm)	Side Slope (Deg)	Corner Splay (mm)	4*Hyd Radius (m)	XSect Area (m <sup>2</sup> )
-1	\ /	2500	1650	45		3.822	6.848



Summary of Results

Return Period (years)	100	Analysis Time Step	Fine
Storm Duration (mins)	30	DTS Status	ON
Profile Type	Summer	DVD Status	OFF
Margin for Flood Risk warning (mm)	50	Inertia Status	OFF

PN	Water Lev. (m)	Surcharged Depth (m)	Flooded Vol (m <sup>3</sup> )	Flow/ Capacity	Overflow (l/s)	Pipe Flow (l/s)	Status
1.000	190.439	-1.541	0.000	0.01	0.0	636.0	O K
1.001	186.396	-1.444	0.000	0.03	0.0	989.0	O K
1.002	184.259	-1.491	0.000	0.03	0.0	989.2	O K