



Opus International Consultants (UK) Ltd
 Modulus House
 Salterns Lane
 Fareham
 Hampshire
 PO16 0QS

Telephone: 01329 822021
 Facsimile: 01329 825274

Website: www.opusinternational.co.uk
 Email: fareham@opusinternational.co.uk

Project No.: 6902 Date: 13.02.08 TSA 1
 Project Title: Homestead 30% Rev 0

Reject/Rubble Filled Soakaway Assessment to BRE Digest 365

Site Location: Westergate, W Sussex

$r = 0.37$ (range 0.12 to 0.45)

Drained Area = 344 m²

Pit Length L_x = 1.5 m

Pit Length L_y = 12 m

Soakaway Invert = 9.5 m

Entry Pipe Invert = 10.3 m

% Void in fill = 95 %

TOTAL STORAGE AVAILABLE 13.68 m³

Effective soakage area a₅₀ 10.8 m²

Soil Filtration Rate = 8.00E-06 m/s

M5-60 Rainfall = 20 mm

Storm Duration	5 min	10 min	15 min	30 min	1 hr	2 hr	4 hr	6 hr	10 hr	24 hr
(secs)	300	600	900	1800	3600	7200	14400	21600	36000	86400
Value Z1	0.363	0.513	0.623	0.793	1	1.216	1.473	1.653	1.873	2.373
Rainfall M5 (mm)	7.26	10.26	12.46	15.86	20	24.32	29.46	33.06	37.46	47.46
Value Z2	1.203	1.221	1.229	1.24	1.24	1.24	1.222	1.21	1.197	1.175
Rainfall M10 (mm)	8.73	12.52	15.31	19.66	24.8	30.15	36	40	44.83	55.76
RUNOFF (m ³)	3.003	4.306	5.266	6.763	8.531	10.371	12.384	13.76	15.421	19.181
SOAKAGE (m ³)	0.03	0.05	0.08	0.16	0.31	0.62	1.24	1.87	3.11	7.46
Req'd STORAGE (m ³)	2.978	4.25416	5.18824	6.60748	8.21996	9.74892	11.1398	11.8938	12.3106	11.716
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Reject/Rubble Filled Soakaway Assessment to BRE Digest 365

Site Location: Westergate, W Sussex

$r = 0.37$ (range 0.12 to 0.45)

Drained Area = 723 m^2

Pit Length $L_x = 1.5$ m

Pit Length $L_y = 16$ m

Soakaway Invert = 9.3 m

Entry Pipe Invert = 10.5 m

% Void in fill = 95 %

TOTAL STORAGE AVAILABLE 27.36 m^3

Effective soakage area $a_{50} = 21$ m^2

Soil Filtration Rate = 8.00E-06 m/s

M5-60 Rainfall = 20 mm

Storm Duration	5 min	10 min	15 min	30 min	1 hr	2 hr	4 hr	6 hr	10 hr	24 hr
(secs)	300	600	900	1800	3600	7200	14400	21600	36000	86400
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Rainfall M10 (mm)	8.73	12.52	15.31	19.66	24.8	30.15	36	40	44.83	55.76
RUNOFF (m^3)	6.311	9.051	11.069	14.214	17.93	21.798	26.028	28.92	32.412	40.314
SOAKAGE (m^3)	0.05	0.10	0.15	0.30	0.60	1.21	2.42	3.63	6.05	14.52
Req'd STORAGE (m^3)	6.261	8.9502	10.9178	13.9116	17.3252	20.5884	23.6088	25.2912	26.364	25.7988
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Reject/Rubble Filled Soakaway Assessment to BRE Digest 365

Site Location: Westergate, W Sussex

$r = 0.37$ (range 0.12 to 0.45)

Drained Area = 723 m²

Pit Length L_x = 1.5 m

Pit Length L_y = 16 m

Soakaway Invert = 9.3 m

Entry Pipe Invert = 10.5 m

% Void in fill = 95 %

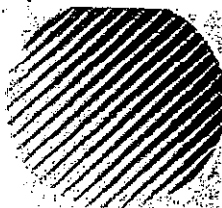
TOTAL STORAGE AVAILABLE 27.36 m³

Effective soakage area a₅₀ 21 m²

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Reject/Rubble Filled Soakaway Assessment to BRE Digest 365

Site Location: Westergate, W Sussex

$r = 0.37$ (range 0.12 to 0.45)

Drained Area = 479 m^2

Pit Length $L_x = 1.5$ m

Pit Length $L_y = 11$ m

Soakaway Invert = 8.8 m

Entry Pipe Invert = 10 m

% Void in fill = 95 %

TOTAL STORAGE AVAILABLE 18.81 m^3

Effective soakage area a_{50} 15 m^2

Soil Filtration Rate = 8.00E-06 m/s

M5-60 Rainfall = 20 mm

Storm Duration	5 min	10 min	15 min	30 min	1 hr	2 hr	4 hr	6 hr	10 hr	24 hr
(secs)	300	600	900	1800	3600	7200	14400	21600	36000	86400
Value Z1	0.363	0.513	0.623	0.793	1	1.216	1.473	1.653	1.873	2.373
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Value Z2	1.203	1.221	1.229	1.24	1.24	1.24	1.222	1.21	1.197	1.175
Rainfall M10 (mm)	8.73	12.52	15.31	19.66	24.8	30.15	36	40	44.83	55.76
RUNOFF (m^3)	4.181	5.997	7.333	9.417	11.879	14.441	17.244	19.16	21.473	26.709
SOAKAGE (m^3)	0.04	0.07	0.11	0.22	0.43	0.86	1.73	2.59	4.32	10.37
Req'd STORAGE (m^3)	4.145	5.925	7.225	9.201	11.447	13.577	15.516	16.568	17.153	16.341
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