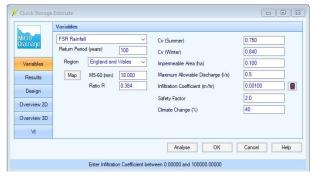|	Project		Job Ref.	
	Dunkirk Lane, Chester		**XXXX**	
	Section		Sheet no./rev.	
	Area Drainage Calculations.		**1 / -**	
	Calc. by	Date	Chck'd by	Date	Rev'd by	Date
	GDR	**04.09.23**	**SHP**	**04.09.23**		

Surface Water Drainage.

Introduction.

The following calculations have been undertaken to determine the drainage requirement for the above-mentioned site. The site consists of a level gravelled area to a maximum depth of 0.45m deep. This will affectively be utilised as attenuation storage for the rainfall with infiltration as the discharge.
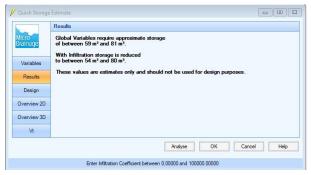
Design criteria

M5-60 (mm)	18.000
Ratio R	0.384
Area	843m².
Infiltration Rate	0.001m/hr
Qbar for area UK SuDS Site	0.49 l/s
Design Period used	100 yr plus 40% additional Climate Change

Attenuation Required

Based on source data from Microdrainage.

Criteria

Results

	Project		Job Ref.	
	Dunkirk Lane, Chester		**XXXX**	
	Section		Sheet no./rev.	
	Area Drainage Calculations.		**2 / -**	
	Calc. by	Date	Chck'd by	Date	Rev'd by	Date
	GDR	**04.09.23**	**SHP**	**04.09.23**		

Attenuation Calculations

Site Area		853m^2
Gravel Depth		0.450m

Volume =	=	853 X 0.450 = 383m^3
Void Volume @ 30%	=	383 @ 90% = 115m^3

Conclusion

Considering the volume attainable from the gravel surface and the sourced estimation for required volume it demonstrates full feasibility for the proposed Site.