

US 1700PET

Woven Polyester Reinforcement



US 1700PET is a woven geotextile made of high tenacity polyester yarns woven into a stable network such that the yarns retain their relative positions. This product is inert to biological degradation and naturally encountered chemicals, alkalies and acids. US 1700PET is used to reinforce steepened slopes, embankments over soft soils and landfill liners. US 1700PET meets the following M.A.R.V. values:

PROPERTY	TEST METHOD	ENGLISH	METRIC
Weight	ASTM D-5261	18.0 oz/sy	610 g/sm
Wide Width Tensile	ASTM D-4595	20,556 x 3,425 lb/ft	300 x 50 kN/m
Wide Width Tensile @ 5% (MD)	ASTM D-4595	9,600 lb/ft	140 kN/m
Elongation @ Break (Wide Width)	ASTM D-4595	10%	10%
Long Term Design Strength - Sand	GRI-GT7	10,548 lb/ft	154 kN/m
Permittivity	ASTM D-4491	0.35 sec-1	0.35 sec-1
Apparent Opening Size	ASTM D-4751	40 US Sieve	0.425 mm

ROLL SIZE	AREA	WEIGHT
16.41' x 656.2'	1,196 sys	1,445 lbs

FS_{ID} = factor of safety for installation damage
 FS_{CR} = factor of safety for creep deformation (114 years)
 FS_{CD} = factor of safety for chemical degradation ($4 < pH < 9$)
 FS_{BD} = factor of safety for biological degradation
 FS_{JNT} = factor of safety for joints (seams and connections)
 FS_{UNC} = factor of safety for uncertainties

*LTDS =

$$\frac{T_{ultimate}}{FS_{ID} \times FS_{CR} \times FS_{CD} \times FS_{BD} \times FS_{JNT}}$$

$$\frac{1713}{1.17 \times 1.63 \times 1.1 \times 1.0 \times 1.0}$$

LTDS = 830 lb/in - Sand

$T_{Allowable} = LTDS / FS_{UNC}$

The above information is to the best of our knowledge accurate, but it is not intended to be considered a guarantee. Any implied warranty for a particular use or purpose is excluded. If the product does not meet the above properties, and notice is given to US Fabrics, Inc., the product will be replaced or refunded (1/2012).