

## TENAX MS 330

TENAX MS™ 330 is composed of three layers of high strength extruded biaxial oriented polypropylene geogrids. The layers are rolled and stitched together without superimposing the grids creating a geogrid with random sized apertures designed to accommodate a variety of fill materials. The random aperture geometry, many tensile elements, and multiple layers of the geogrid enhance soil/geogrid interaction. TENAX MS™ 330 geogrid greatly improves the geogrid interlocking capacity, distributes applied loads, and prevents localized shear failure.

### TYPICAL APPLICATIONS

Soft soil stabilization · Base reinforcement · Embankments over soft soils · Working platforms · Haul roads

MATERIAL CHARACTERISTICS	TEST METHOD	DATA
polymer type		polypropylene
carbon black content	ASTM D 4218	0.50%

DIMENSIONAL CHARACTERISTICS	TEST METHOD	UNIT		NOTES
thickness: rib - MD/TD	ASTM D 1777	in (mm) / in (mm)	0.05 (1.27) / 0.05 (1.27)	b,d,e
aperture size		in (mm) / in (mm)	1.65 (42) x 1.96 (50)	b,d,e
open area	CW 02215	%	70	b
roll dimensions		ft x ft (m x m)	13.1 x 164 (4.0 x 50)	b
roll area		yd <sup>2</sup> (m <sup>2</sup> )	239.2 (200)	b
gross roll weight		lb (kg)	163 (74)	b

TECHNICAL CHARACTERISTICS	TEST METHOD	UNIT			NOTES
Strengths & Load Capacity:			MD	TD	
peak tensile strength	ASTM D6637	lb/ft (kN/m)	1,370 (20.0)	2,100 (30.7)	a,c,e
tensile strength @2% strain	ASTM D6637	lb/ft (kN/m)	418 (6.1)	620 (9.0)	a,c,e
tensile strength @5% strain	ASTM D6637	lb/ft (kN/m)	925 (13.5)	1,343 (19.6)	a,c,e
initial modulus	ASTM D6637	lb/ft (kN/m)	27,420 (400)	44,550 (650)	a,c,e
tensile modulus @ 2% strain	ASTM D6637	lb/ft (kN/m)	20,900 (305)	30,800 (450)	a,c,e
tensile modulus @ 5% strain	ASTM D6637	lb/ft (kN/m)	18,500 (270)	26,852 (392)	a,c,e
Structural Integrity:					
junction: strength	GRI-GG2	lb/ft (kN/m)	1,274 (18.6)	1,970 (28.8)	a,e
efficiency		%	93		a,e
flexural rigidity	ASTM D 1388	mg-cm	750,000	750,000	b
Durability:					
resistance to installation damage	ASTM D 5818	%SC/%SW/%GP	> 90/> 90/90		

NOTES: a: Minimum average roll values determined in accordance with ASTM D4759; b: Typical values; c: Tests performed using extensometers; d: Single layer value; e: MD: machine direction (longitudinal to the roll), TD: transverse direction (across roll width)