

Geo Cell (75mm – 250mm)

TerraShield Geocell is a 3D rhomboidal cellular confinement system, having unique, environment-friendly solutions for various civil and construction engineering challenges. Geocells are engineered for diverse applications in various sectors such as roads, highways, railways, ports, industries and others.

Applications

-  Erosion Control
-  Subgrade Stabilization
-  Slope & Hill Slope Protection
-  Ground Improvement
-  MSE Wall / RE Wall
-  Railway Track-bed Stabilization
-  Canal slope protection & lining
-  Reservoir & Landfill



Specifications

MECHANICAL PROPERTIES

PROPERTIES (STANDARD)	UNIT	VALUE
Polymer Density [ASTM D 1505]	g/cm ³	0.935-0.965
Environmental Stress Crack Resistance [ASTM D 1693]	hours	>5000
Carbon Black Content [ASTM D1603]	%	1.5-2.0
Nominal Sheet Thickness (Post Texturing) [ASTM D 5199]	mm	Min 1.2

Material: Polyethylene

Texture: PE strip consists of multiple rhomboidal indentations.

Perforations: PE strip is perforated with horizontal rows of max 10mm diameter holes.

Cell perforations area is less than 12% of the cell surface area.

CELL/SECTION PROPERTIES

PROPERTIES (STANDARD)		UNIT	IC 330	IC 356	IC 445	IC 660	IC712
Weld Spacing(+/-3%)		mm	330	356	445	660	712
Expanded cell dimensions(+/-3%)	Width	mm	244	259	320	488	508
	Length	mm	210	224	287	436	475
Expanded section (+/-3%)	Width	M	2.44	2.59	2.56	2.44	2.56
	Length	M	6.10	6.50	8.35	12.63	13.72
Expanded section area (+/-3%)		m ²	14.9	16.8	21.4	30.8	35.1

SEAM PROPERTIES

CELL DEPTH – for all Weld Spacing Grades	mm	75	100	125	150	200	250	300
Seam Peel Strength (+/-5%)	N	650	850	1050	1280	1700	2130	2550

US ACE Technical Report, GL-86-19

