



# **GEOFOAM LIGHTWEIGHT FILL**

# TRANSPORTATION | COMMERCIAL CONSTRUCTION | LANDSCAPE APPLICATIONS

Atlas Geofoam is a lightweight engineered fill that is designed to deliver the highest level of stability for transportation, commercial construction, and landscaping applications. Due to its physical strength and predictable dimensional properties, you can feel confident that you have full control over your geotechnical projects.

Manufactured under an industry leading quality control program, Atlas Geofoam meets or exceeds ASTM D6817 standards, providing an HFC free, recyclable, and cost-effective solution for all your lightweight fill needs. Think beyond the block with Atlas Geofoam.

#### PHYSICAL PROPERTIES

#### ATLAS GEOFOAM

PROPERTY		12	15	19	22	29	39	46	
ASTM D6817 Type		EPS 12	EPS 15	EPS 19	EPS 22	EPS 29	EPS 39	EPS 46	
Compressive Resistance @ 1% Strain (min) <sup>1</sup>	psi	2.2	3.6	5.8	7.3	10.9	15.0	18.6	
	psf	320	520	840	1,050	1,570	2,160	2,680	
	kPa	15	25	40	50	75	103	128	
Density (min) <sup>1</sup>	lb/ft³	0.70	0.90	1.15	1.35	1.80	2.40	2.85	
	kg/m³	11.2	14.4	18.4	21.6	28.8	38.4	45.7	
Elastic Modulus (min)	psi	220	360	580	730	1,090	1,500	1,860	
	kPa	1,500	2,500	4,000	5,000	7,500	10,300	12,800	
Flexural Strength <sup>1</sup> (min)	psi	10	25	30	35	50	60	75	
	kPa	69	172	207	240	345	414	517	
Water Absorption 24 Hour Immersion (max)	vol. %	4.0	3.0	2.0	2.0	1.0	1.0	1.0	
Oxygen Index <sup>1</sup> (min)	vol. %	24	24	24	24	24	24	24	
Buoyancy Force	lb/ft³	62	62	61	61	61	60	60	
	kg/m³	990	980	980	980	970	960	950	
Surface Burning		Flame Spread <25, Smoke Developed <450							

<sup>&</sup>lt;sup>1</sup> See ASTM D6817 Standard for test methods.

### **DESIGN CONSIDERATIONS**

The typical load limit for geofoam projects is the compressive resistance at 1% strain. The compressive behavior at 1% strain is within the elastic region of EPS geofoam and provides acceptable short-term deflections in addition to limiting long-term creep deformation. See ASTM D7180 for guidance.

Samples of Atlas Geofoam are submitted regularly for accredited laboratory verification of compressive resistance. See ASTM D7557 for testing frequency.

#### **GEOGRIPPER PLATES**

Atlas GeoGripper® plates are 20 gauge, 4"x4" galvanized steel multi-barbed connectors that are used in multi-layer geofoam applications to prevent lateral shift during the backfill stage. See *Atlas GeoGripper Plates Technical Bulletin* for further information.

## WARRANTY

Atlas Geofoam is backed by a limited 10 year warranty for compressive resistance. See separate Atlas Geofoam warranty for terms and conditions.

# PRODUCT OFFERINGS

Standard block sizes are 32", 36", or 40" x 48"x 96" however, size may vary based on project specifications.

- Custom block sizes available up to 50" x 72" x 288".
- Available as blocks, sheets, tapers and custom CNC sizes, or can be easily cut to size in the field utilizing a hot wire cutter.

#### ENHANCEMENTS AVAILABLE

Depending on the needs of your project, Atlas Geofoam may be specified with integrated termite resistance for long term protection.

#### FOR ADDITIONAL RESOURCES, VISIT THE GEOFOAM SECTION OF OUR WEBSITE ATLASMOLDEDPRODUCTS.COM



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