

GTB Flexible Graphite Sheet

Technical Data Sheet 436

Single Layer Material

- GTA - Non-inhibited, Nuclear 99.8% graphite
- GTJ - Inhibited, Nuclear 99.8% graphite
- GTB - Inhibited, 98% graphite

Product Overview

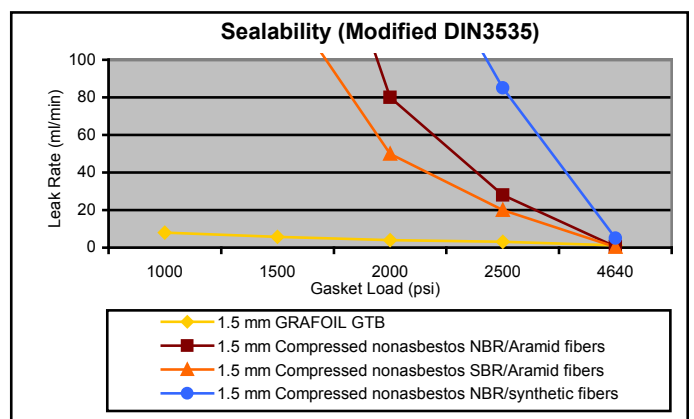
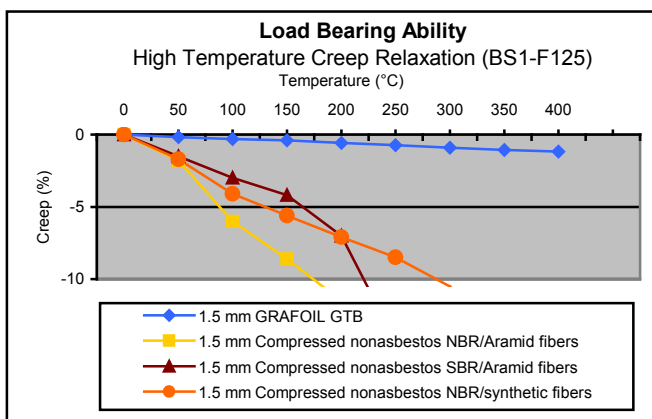
GRAFOIL GTB flexible graphite sheet is a gasketing material containing no binders or fillers. Standard industrial grade GTB flexible graphite has an oxidation / corrosion inhibitor and is typically 98% graphite. Grade GTB is the facing material for grades GHR, GHE, GHP and GHW laminates.



Applications

Most standard industrial fluid sealing applications, including:

- Chemical
- Petrochemical



While maintaining an effective seal, GRAFOIL material exhibits virtually no creep relaxation. As a result, the need for periodic bolt tightening is greatly reduced.

Typical Properties*

Characteristic	Value
Thickness	0.005" (0.13 mm) Standard 0.010" (0.25 mm) Standard 0.015" (0.38 mm) Standard 0.020" (0.51 mm) Standard 0.025" (0.64 mm) Standard 0.030" (0.76 mm) Standard 0.040" (1.02 mm) Standard 0.060" (1.52 mm) Standard Non-standard thicknesses may be available upon request.
Width	24" (610 mm) Standard for 0.005", 0.010", 0.015", 0.020", 0.025", 0.030", 0.060" thick 39.4" (1000 mm) Standard for 0.010", 0.015", 0.020", 0.025", 0.030", 0.040", 0.060" thick Non-standard widths may be available upon request.
Length	100' (30.5 m) Standard Non-standard thicknesses may be available upon request.
Bulk Density	70 lb/ft ³ (1.12 g/cc) Standard for 0.005", 0.010", 0.015", 0.020", 0.025", 0.030", 0.060" thick 62.4 lb/ft ³ (1.00 g/cc) Standard for 0.020", 0.040", 0.060" thick Non-standard densities may be available upon request.
Ash Content	1.8% Typical
Carbon Content	98.2% Typical
Leachable Chloride	10 ppm Typical
Sulfur Content	550 ppm Typical
Oxidation Weight Loss	3% Typical
Compressibility at 5000 psi (35 MPa) load	43% Typical for 70 lb/ft ³
Recovery after 5000 psi (35 MPa) load	15% Typical for 70 lb/ft ³
Tensile Strength	650 psi Typical for 70 lb/ft ³
Temperature Use Range	-400°F to 975°F (-240°C to 525°C)
Creep Relaxation Method: BSI-F125 at 6391 psi (44.1 MPa) load up to 400°C	<3% Typical for 70 lb/ft ³
Sealability Method: Mod DIN 3535 at 580 psi N ² at 32 MPa load	<1.5 ml/min Typical for 70 lb/ft ³
Certification	Certify to Grade

Notes:

* Properties listed are typical and cannot be used as accept/reject specifications.

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