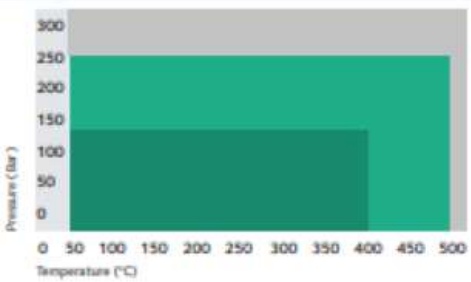
SIGRAFLEX® HOCHDRUCK

Material Information	
Manufacturer	SGL Carbon
Composition	Natural graphite foils (99,85 %), AISI 316L foil inserts
Applications	High temperature, engine industry, power plants
Approvals	TA Luft, API 607, BS 6755-2, HOBT, HORT, BAM, DVGW DIN 3535-6, EC1935/2004, LFGB, TRD 401
Colour	Black
Thickness (mm)	1,0; 1,5; 2,0; 3,0; 4,0
Sheet dimensions (mm)	1 000 x 1 000; 1 500 x 1 500
Other	ash < 0,15 %, chloride < 10 ppm, halogens < 40 ppm, sulphur < 300 ppm (lower content on request)

Technical Data (1,5 mm thickness)		
Density, DIN 28090-2 (g/cm^3)	**Compressibility,** ASTM F36A (%)	**Recovery,** ASTM F36A (%)
1,1 (graphite)	37	17
Tensile strength, DIN 52910 (MPa)	**Stress resistance,** DIN 52913 (MPa)	**Specific leak rate,** DIN 3535-6 (mg/s·m)
not defined	48 (50 MPa, 300 °C, 16 h)	0,05
Thickness increase, ASTM F146 (%)	**Compression modulus,** DIN 28090-2 (%)	**Creep relaxation,** DIN 28090-2 (%)
not defined	34 (ε_{KSW})	5 (ε_{KRW})
	< 3 ($\varepsilon_{WSW/300\,°C}$)	4 ($\varepsilon_{WRW/300\,°C}$)
Peak temperature (°C/°F)	**Continuous temperature** (°C/°F)	**Maximum pressure** (bar/psi)
550/1 022	400/842	250/3 626

pT-diagram



General suitability
Limited suitability
Not recommended

Recommended Media			
Acetaldehyde	Butylamine	Formaldehyde	Octane alcohol
Acetic anhydride	Butylbenzene	Formalin	Octyl cresol
Aceto acetic ester	Butyltoluene	Formamide	Oils (essential)
Acetoin	Butyraldehyde	Fruit juices	Oils (vegetable)
Acetone	Calcium oxide	Furfuryl alcohol	Orthoboric acid
Acetone cyanohydrin	Carbon dioxide	Gelatin	Oxygen
Acetonitrile	Carbon disulfide	Glucose	Ozone
Acetophenone	Carbon tetrachloride	Glycerol	Palmitic acid
Acetylene	Coffee	Helium	Pentane
Acetylene tetrachloride	Creosol	Heptane	Pentene
Acrolein	Creosote	Heptanone	Petroleum
Acrylamide	Cresols	Hexane	Petroleum ether
Acrylic acid ethyl ester	Cumene	Hexanetriol	Phenol
Acrylic anhydride	Cyclohexane	Hexyl alcohol	Phenyl benzene
Acrylonitrile	Cyclohexanol	Hydraulic oil (mineral)	Phenylethyl ether
Adipic acid	Cyclohexanone	Hydrazine	Phenylhydrazine
Adipic ester	Decahydronaphtalene	Hydrocarbons	Piperidine
Adiponitrile	Decane	Isobutyl alcohol	Potassium hexacyanoferrate
Air	Dextrin	Isodecane	Propane
Alcohols	Diacetone alcohol	Isooctane	Propanol
Acids	Dibenzyl ether	Isopropanol	Propylamine
Alkylamine	Dibutyl ether	Isopropyl acetate	Propylene
Alpha methylstyrene	Dibutyl phthalate	Isopropyl ether	Propylene glycol
Ammonia	Dibutylamine	Kerosene	Propylene oxide
Amyl acetate	Diesel	Ketones	Pyridine
Amyl alcohol	Diethyl ether	Lauryl alcohol	Pyrrole
Argon	Diethyl ketone	Lysol	Salicylic acid
Asphalt	Diethyl sebacate	Magnesium carbonate	Oils, fuels
Barium hydroxide	Diethyl succinate	Maleic acid	Starch
Beer	Diethylene glycol	Maleic anhydride	Steam
Benzalacetone	Diisobutyl ketone	Methacrylic acid methyl ester	Stearic acid
Benzaldehyde	Diisopropyl ketone	Methane	Styrene
Benzoic acid	Dimethyl aniline	Methanol	Succinic acid
Benzol	Dimethyl phthalate	Methyl acetate	Succinic acid ester
Benzoquinones	Dimethylamine	Methyl butyl ketone	Sugars
Benzotriazole	Dimethylformamide (DMF)	Methyl ether	Tannic acid
Benzyl alcohol	Dinitrogen monoxide	Methyl formate	Tetrahydrofuran (THF)
Benzyl benzoate	Dioctyl phthalate (DOP)	Methyl glycol acetate	Tetralin
Benzyl iodide	Dioctyl sebacate	Methyl isobutyl ketone (MIBK)	Toluene

Bio-diesel	Dioxane	Methyl isopropyl ketone	Tributyl phosphate
Bio-ethanol	Diphenylether	Methylcyclohexanol	Tricalcium phosphate
Bisphenol A	Dipropyl ketone	Methylcyclopentane	Triethylamine
Bitumen	Dodecyl alcohol	Mineral oil	Trioctyl phosphate
Butadiene	Ethane	Molasses	Trisodium phosphate
Butanedione	Ethanol	Natural gas	Turpentine
Butane	Ethanolamine	Neon	Urea
Butanethiol	Ethyl acetate	Nitro thinner	Vaseline
Butanone	Ethyl acrylate	Nitrobenzene	Vinyl chloride
Butin	Ethylbenzene	Nitrotoluene	Water
Butyl acetate	Ethylene	Nonane	Wine
Butyl acrylate	Ethylene diamine	Norbornadiene	Xenon
Butyl alcohol	Ethylene oxide	Octadiene	Xylenes
Butyl vinyl ether	Fluorobenzene	Octane	Yeast