

# Composition

The LG gasketing sheet made by pure expanded graphite are great for applications on low pressure flanges. The pure graphite has modest tensile strenght and therefore it's always recommended the thickness from 0.4 to 1.0 mm for the best sealing.

### **Characteristics**

Pure graphite C > 98.0 %

## Applications

Flat graphite gaskets for low pressure applications. Graphite isn't suitable for oxidizing fluids.



Planigraph™ LG				
Graphite density	gr/cm3	1.0		
Carbon Content	%	> 98.0		
Ash Content	%	< 2.0		
Compressibility	%	40 - 50		
Recovery	%	> 7		
Gas Permeability DIN 3535	cm3/min	< 0.6		
Relaxation stress DIN 52913	N/mm2	> 45		
Temperature max with steam	°C	550		
Temperature max with weak oxidants	°C	450		
Temperature min cryo	°C	-196		
Maximum assembly load RT	N/mm2	40		
Maximum operating pressure	bar	40		

Never use the product to the maximum temperature and pressure associated. Consult the manufacturer for further information With weakly oxidizing agents and hot air the temperature must be limited to 450  $^\circ$  C .

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With steam and non-oxidizing fluids the temperature must be limited to 650  $^\circ$  C Graphite and carbon cannot be used with oxidizing fluids

Size	1.000 × 1.000 1.500 × 1.500	40" × 40" 60" × 60"
Thickness	0.5 ÷ 3.0	1/64" ÷ 1/8



# Planigraph<sup>™</sup> LG

LG expanded graphite flat gaskets are perfect for low pressure flange coupling applications. The pressure of use of the gasket is strongly correlated to the sealing surface and it is always advisable to check the quotient between [De-Di] and the thickness of the gasket where De and Di refer to the diameters of the parts of the gasket actually engaged by the compression of the flanges. The ratio must be at least 4 and in this case the maximum compression allowed on the gasket is 15 MPa. The maximum load allowed on the gasket is 40 Mpa. The maximum operating pressure pointed in the grid is only for reference because the maximum assembly load requirements must always be met in correlation to the temperature and the active sealing surface (EN 1591-2; 2020). The dimensionals tolerances are +/-5.0%.



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