

# **MACER INDUSTRIES**

# TECHNICAL DATA SHEET

## **MACER 111 AF**

#### Material profile

The main components are organic fibres with NBR Binder.

Standard Thickness: 0.40 mm to 5.00 mm

Dimensions of the standard sheets: ± 10% 1500 x 1500, 1500 x 2000,1500 x 4000 mm

#### **Application**

General purpose grade suitable for low pressure steam, water, oils, fuels and inert gases for low stress conditions.

Thickness Tolerance:

 $\leq 1.00~\text{mm} \pm 0.10~\text{mm}$  ,  $> 1.00~\text{mm} \pm 10~\%~\text{mm}$  combustion engines.

Surface finish: Green Colour (other Colour on Customer requirement)

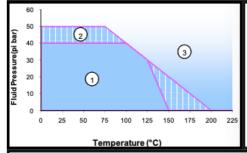
Specification Compliance: ASTM F 104 Line Call Out: F712232 E43 A9 B6 M4

Max. peak temperature: 200°C

Max. Operating pressure: 50 bar

# Areas of application

- 1. Suitable for the application, subject to chemical compatibility.
- 2. Only for short term temp. excursions
- 3. Do not install the gasket without technical assistance



### Physical Properties (Properties applicable for 2.0mm thickness)

Properties	Test Method	Unit	Specified Value
1. Density	ASTM F 1315	g/cm3	1.6 - 1.9
2. Compressibility	ASTM F 36 J	%	7 - 17
3. Recovery	ASTM F 36 J	%	≥ 40
4. Tensile Strength	ASTM F 152	N/mm2	≥ 7
5. Creep Relaxation	ASTM F 38 B	%	≤ 40
675t@ss Relaxation (16h,	DIN 52913		≥ 15
7. Gas Sealability	ASTM F 37B	ml/hour	< 1.0
8. ASTM Oil no. 3 (5h, 150°C)	ASTM F 146		
Thickness increase		%	≤ 15
Weight increase		%	≤ 20
ASTM Fuel B (5h, 23°C)	ASTM F 146		
Thickness increase		%	≤ 20
Weight increase		%	≤ 20
Water (5h, 100°C)	ASTM F 146		
Thickness increase		%	≤ 10
Weight increase		%	≤ 15

All information & recommendations given in this brochure are correct to the best of our knowledge. However, in view of the wide variety of possible installation & operating conditions one cannot draw the final conclusion in all application cases regarding the behaviour in a gasket joint. Therefore, information can only serve as a guideline.