LE-SAFE ADHESIVE-FREE GROOVED GASKET WITH LOOSE CENTERING RING [NON-INTEGRAL] AND BOTH-SIDED GRAPHITE LAYERS

6041KD30

The grooved stainless steel core [1.4404, pitch 1,0 mm] is covered on both sides with functionalized soft material layers made from expanded pure graphite using the adhesive-free LE-SAFE technology and provided with a loose centering ring [non-integral, half-shells, spot-welded], which prevents vibration breaks in the sealing area.

Grooved gaskets require low minimum sealing surface pressure, but can also resist very high loads.

LE-SAFE Grooved gaskets impress by a very high pressure application limit, low leakage rate and are therefore suitable for extreme operation conditions [e.g. cryogenic, oxygen, hydrogen].

To ensure the safety in oxygen applications, a batch-related test report from the Bundesanstalt für Materialforschung und -prüfung [BAM] is optionally available.

BAM [Bundesanstalt für Materialforschung und -prüfung] holds a critical view and does not recommend using, zircon or zircon alloys, titanium and titanium alloys or alloys containing titanium [e.g. stainless steels 1.4541, 1.4571] or metallic materials containing more than 2.5% aluminum for applications involving oxygen. However, the stainless steel 1.4404 used in all LE-SAFE products as a standard material is suitable for this [other suitable metallic materials are available on request - e.g. 1.4828, Hastelloy etc.]

Operating data

Temperatur	450 °C
Temperatur (min)	-269 °C
Temperatur (max)	550 °C
Pressure (max)	500 bar

Gasket characteristics EN 13555

Gasket Characteristics (IDT)
https://atropim.idt-gaskets.com/upload/files/06lsx/xjzn3/8tonu/3itw6/ned8w/hq4s9/KD01-10-20-30 - 1.4404 - WS 3803 - LE-safe - 5,0 mm_en_Rev.11.pdf

Essen: +49 201 855110 · Annaberg-Buchholz: +49 3733 5050 · München: +49 89 9918830
Further sealing systems and technical information can be found **idt-gaskets.com**

Gasket characteristics DIN 2505 V

$K_0 \times K_d$ [N/mm]	15 × b_d
k1 [mm]	1,1 × b_d

Gasket characteristics DIN 28090

$б_{VO}$ [N/mm²]	500
$б_{VU}$ 0,1 [N/mm²]	15
m (DIN 28090)	1.1
$б_{BO}$ 300 °C [N/mm²]	500

Gasket characteristics ASME

m (ASME)	3
Y [PSI]	2200

Approvals and test reports

TA Luft 2002 (VDI 24A0/2200)

DIN 30691 (lightning current carrying capacity)

DIN EN13555 (TA Luft 2021)

Fire Safe Test

Blow-out resistance

BAM oxygen

BAM oxygen (liquid)

Gas (DIN 3535-6)

WRAS

EG 1935/2004

Flange shapes

Self-centering, Raised Face (form IBC)

Essen: +49 201 855110 · Annaberg-Buchholz: +49 3733 5050 · München: +49 89 9918830
Further sealing systems and technical information can be found **idt-gaskets.com**