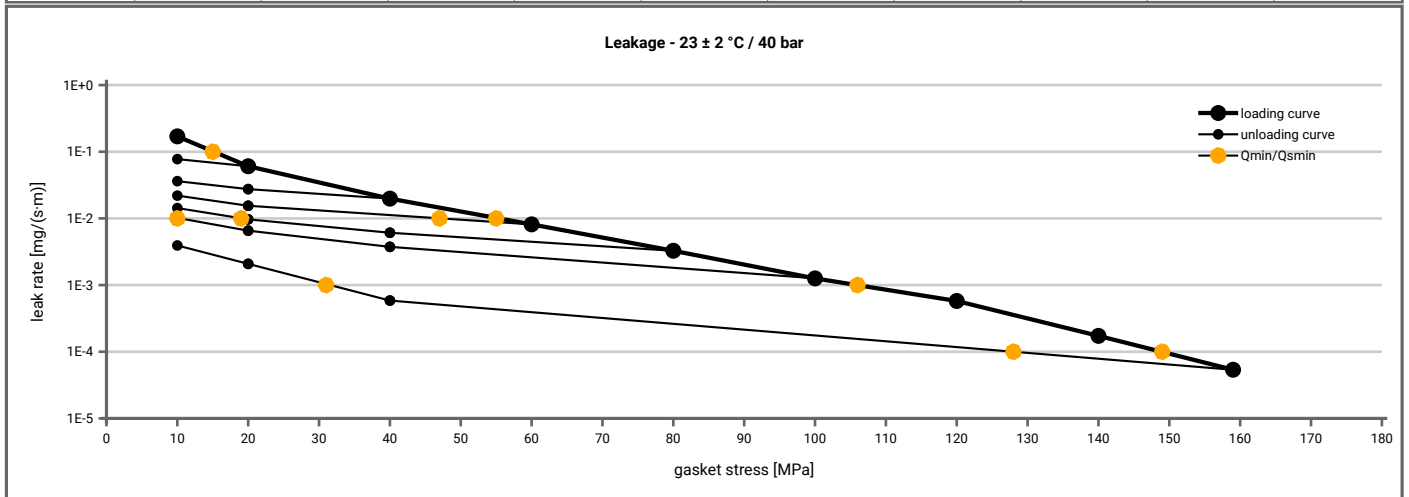


Manufacturer address	KLINGER Kempchen GmbH, Im Waldteich 21, 46147 Oberhausen, DE	According to DIN EN 13555 2005-2
Product name	A1 RS2K110-A	
Product dimensions	92 x 49 x 2 mm (DIN EN 1514-1 1997-8)	

Minimum stress to seal $Q_{min(L)}$ (at assembly), $Q_{smin(L)}$ (after off-loading) for $p = 40 \text{ bar}$ ($T = 23 \pm 2 \text{ }^\circ\text{C}$)										
L [mg/(s·m)]	$Q_{min(L)}$ [MPa]	$Q_{smin(L)}$ [MPa]								
		$Q_A = 10$ [MPa]	$Q_A = 20$ [MPa]	$Q_A = 40$ [MPa]	$Q_A = 60$ [MPa]	$Q_A = 80$ [MPa]	$Q_A = 100$ [MPa]	$Q_A = 120$ [MPa]	$Q_A = 140$ [MPa]	$Q_A = 160$ [MPa]
1E-0	10		10	10	10	10	10			10
1E-1	15		10	10	10	10	10			10
1E-2	56				47	19	11			10
1E-3	106									32
1E-4	149									129
1E-5										
1E-6										
1E-7										



Manufacturer address	KLINGER Kempchen GmbH, Im Waldteich 21, 46147 Oberhausen, DE	According to DIN EN 13555 2005-2
Product name	A1 RS2K110-A	
Product dimensions	92 x 49 x 2 mm (DIN EN 1514-1 1997-8)	

Relaxation ratio P_{QR} for stiffness $C = 500$ [kN/mm]										
Gasket stress	23 ± 2 °C		Temperature 1 [200 °C]		Temperature 2 [300 °C]		P_{QR}	Δe_{Gc} [µm]	P_{QR}	Δe_{Gc} [µm]
	P_{QR}	Δe_{Gc} [µm]	P_{QR}	Δe_{Gc} [µm]	P_{QR}	Δe_{Gc} [µm]				
Stress level 1 [30 MPa]	0.98	6	0.98	6	0.96	11				
Stress level 2 [50 MPa]	1.00	0	0.98	10	0.98	10				
P_{QR} and Δe_{Gc} at maximum gasket stress to be applied (Q_{smax})										
P_{QR} at Q_{smax}	0.99	18	0.99	18	0.99	25				
Q_{smax}	220 MPa		220 MPa		200 MPa					

Sekant unloading modulus of the gasket E_G [MPa] and gasket thickness e_G [mm]										
Gasket stress [MPa]	23 ± 2 °C		Temperature 1 [200 °C]		Temperature 2 [300 °C]		E_G [MPa]	e_G [mm]	E_G [MPa]	e_G [mm]
	E_G [MPa]	e_G [mm]	E_G [MPa]	e_G [mm]	E_G [MPa]	e_G [mm]				
0	0	2.061	0	2.077	0	2.081				
1	0	2.061	0	2.077	0	2.081				
20	414	1.363	457	1.333	495	1.342				
30	692	1.276	715	1.262	712	1.269				
40	888	1.217	980	1.208	1004	1.219				
50	1718	1.191	1286	1.175	1229	1.184				
60	1544	1.161	1493	1.146	1363	1.153				
80	2044	1.111	1953	1.103	2190	1.111				
100	2575	1.081	2303	1.071	3055	1.084				
120	3183	1.057	2728	1.047	2367	1.051				
140	3457	1.037	3090	1.026	3447	1.032				
160	3758	1.020	3666	1.010	3659	1.011				
180	3944	1.004	3739	0.991	3769	0.988				
200	3695	0.986	4122	0.976	3900	0.754				
220	3780	0.971	3244	0.753						

