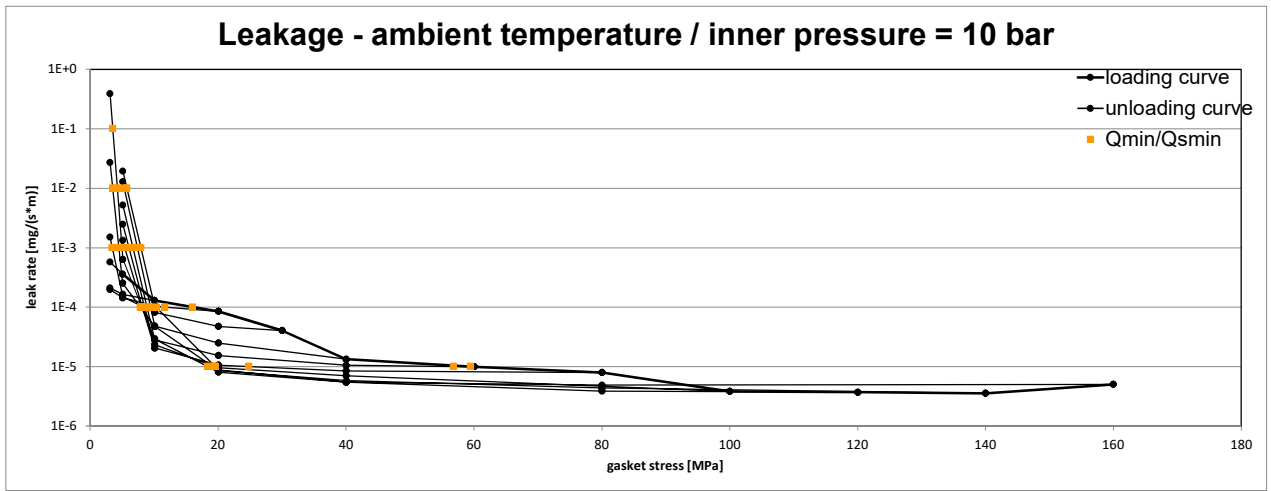
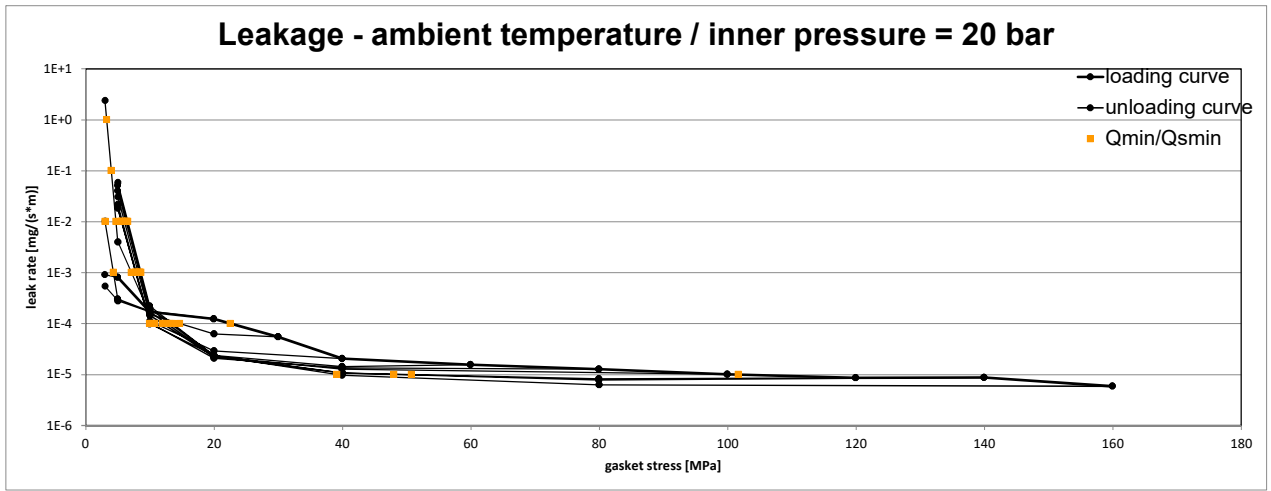


Company Address	Garlock GmbH, Falkenweg 1, 41468 Neuss, Germany	According to <b>EN 13555</b> <b>2021-04</b>
Gasket Type	GYLON EPIX® Style 3504 EPX	
Sealing element dimensions [mm]	92 x 49 x 2.4	

L [mg/(s*m)]	Q <sub>min/L</sub> [MPa]	Minimum stress to seal Q <sub>min/L</sub> (at assembly), Q <sub>Smin/L</sub> (after off-loading) for p = 10 bar									
		Q <sub>Smin/L</sub> [MPa]									
		Q <sub>A</sub> = 10 MPa	Q <sub>A</sub> = 20 MPa	Q <sub>A</sub> = 30 MPa	Q <sub>A</sub> = 40 MPa	Q <sub>A</sub> = 60 MPa	Q <sub>A</sub> = 80 MPa	Q <sub>A</sub> = 100 MPa	Q <sub>A</sub> = 120 MPa	Q <sub>A</sub> = 140 MPa	Q <sub>A</sub> = 160 MPa
10 <sup>-9</sup>	5	3	3	3	3	3	5	5	5	5	5
10 <sup>-1</sup>	5	3	3	3	3	4	5	5	5	5	5
10 <sup>-2</sup>	5	3	3	3	4	4	5	5	5	5	6
10 <sup>-3</sup>	5	3	3	3	5	5	5	6	7	7	8
10 <sup>-4</sup>	16		12	8	8	8	8	9	9	9	10
10 <sup>-5</sup>	59					57	25	19	18	19	20
10 <sup>-6</sup>											
10 <sup>-7</sup>											
10 <sup>-8</sup>											



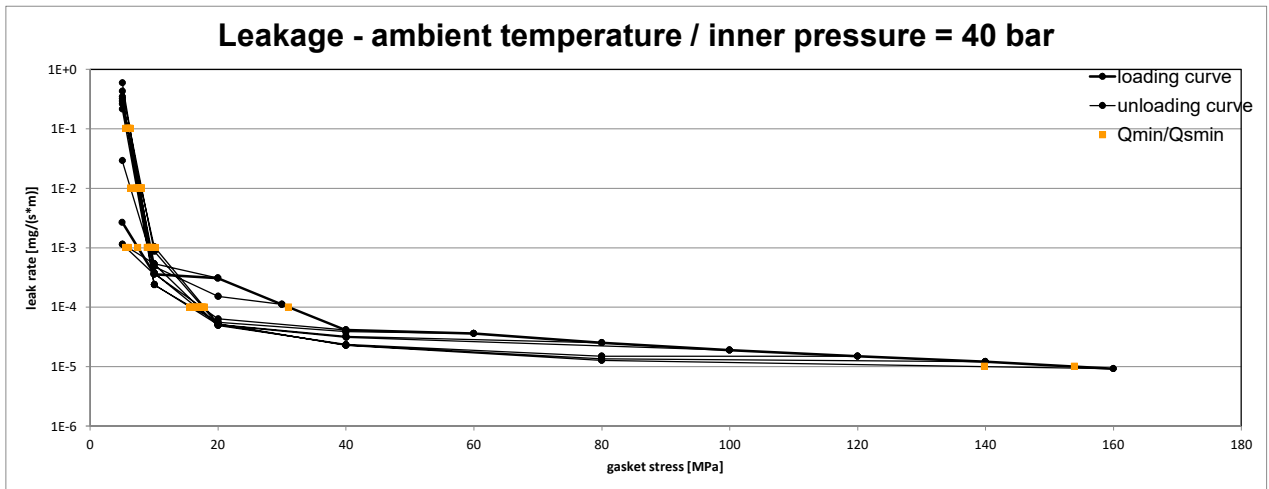
L [mg/(s*m)]	Q <sub>min/L</sub> [MPa]	Minimum stress to seal Q <sub>min/L</sub> (at assembly), Q <sub>Smin/L</sub> (after off-loading) for p = 20 bar									
		Q <sub>Smin/L</sub> [MPa]									
		Q <sub>A</sub> = 10 MPa	Q <sub>A</sub> = 20 MPa	Q <sub>A</sub> = 30 MPa	Q <sub>A</sub> = 40 MPa	Q <sub>A</sub> = 60 MPa	Q <sub>A</sub> = 80 MPa	Q <sub>A</sub> = 100 MPa	Q <sub>A</sub> = 120 MPa	Q <sub>A</sub> = 140 MPa	Q <sub>A</sub> = 160 MPa
10 <sup>-9</sup>	5	3	3	3	5	5	5	5	5	5	5
10 <sup>-1</sup>	5	3	3	4	5	5	5	5	5	5	5
10 <sup>-2</sup>	5	3	3	5	6	6	6	6	6	6	7
10 <sup>-3</sup>	5	3	4	7	8	8	8	8	8	8	9
10 <sup>-4</sup>	23			15	11	10	10	12	13	13	13
10 <sup>-5</sup>	102								51	48	39
10 <sup>-6</sup>											
10 <sup>-7</sup>											
10 <sup>-8</sup>											



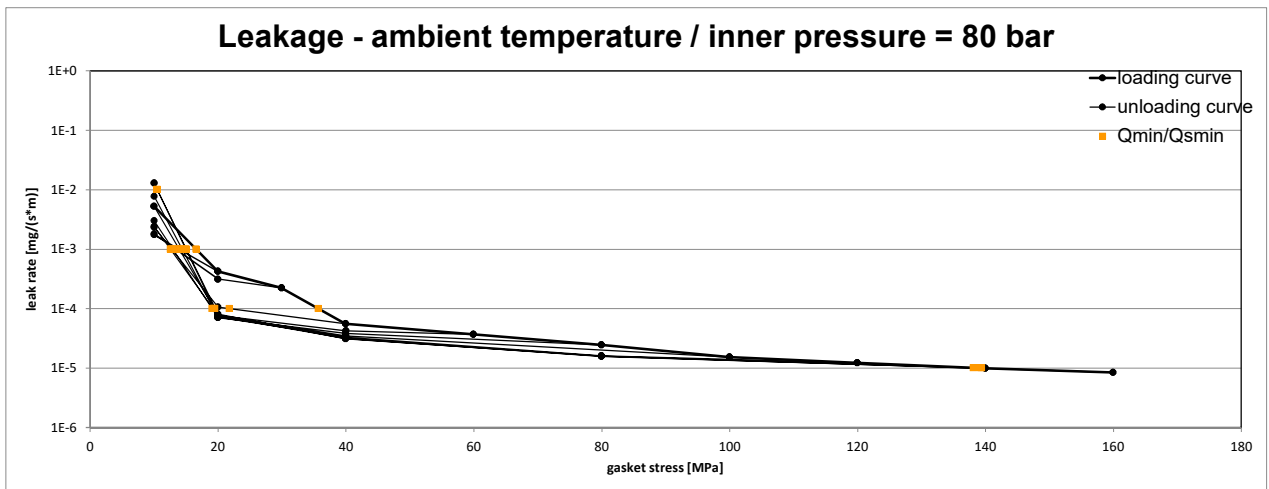
Note: the content of darkened cells was not determined respectively is unnecessary      Rev - No: 3      Creation date of this sheet: 2021-03-24

Company Address	Garlock GmbH, Falkenweg 1, 41468 Neuss, Germany	According to <b>EN 13555</b> <b>2021-04</b>
Gasket Type	GYLON EPIX® Style 3504 EPX	
Sealing element dimensions [mm]	92 x 49 x 2.4	

L [mg/(s*m)]	Q <sub>min/L</sub> [MPa]	Minimum stress to seal Q <sub>min/L</sub> (at assembly), Q <sub>Smin/L</sub> (after off-loading) for p = 40 bar									
		Q <sub>Smin/L</sub> [MPa]									
		Q <sub>A</sub> = 10 MPa	Q <sub>A</sub> = 20 MPa	Q <sub>A</sub> = 30 MPa	Q <sub>A</sub> = 40 MPa	Q <sub>A</sub> = 60 MPa	Q <sub>A</sub> = 80 MPa	Q <sub>A</sub> = 100 MPa	Q <sub>A</sub> = 120 MPa	Q <sub>A</sub> = 140 MPa	Q <sub>A</sub> = 160 MPa
10 <sup>-9</sup>	5	5	5	5	5	5	5	5	5	5	5
10 <sup>-1</sup>	5	5	5	5	6	6	6	6	6	6	6
10 <sup>-2</sup>	5	5	5	6	8	7	7	8	8	8	8
10 <sup>-3</sup>	7	6	6	9	9	9	9	9	10	10	10
10 <sup>-4</sup>	31				17	16	16	17	17	18	18
10 <sup>-5</sup>	154										140
10 <sup>-6</sup>											
10 <sup>-7</sup>											
10 <sup>-8</sup>											



L [mg/(s*m)]	Q <sub>min/L</sub> [MPa]	Minimum stress to seal Q <sub>min/L</sub> (at assembly), Q <sub>Smin/L</sub> (after off-loading) for p = 80 bar									
		Q <sub>Smin/L</sub> [MPa]									
		Q <sub>A</sub> = 20 MPa	Q <sub>A</sub> = 30 MPa	Q <sub>A</sub> = 40 MPa	Q <sub>A</sub> = 60 MPa	Q <sub>A</sub> = 80 MPa	Q <sub>A</sub> = 100 MPa	Q <sub>A</sub> = 120 MPa	Q <sub>A</sub> = 140 MPa	Q <sub>A</sub> = 160 MPa	
10 <sup>-9</sup>	10	10	10	10	10	10	10	10	10	10	
10 <sup>-1</sup>	10	10	10	10	10	10	10	10	10	10	
10 <sup>-2</sup>	10	10	10	10	10	10	10	10	10	11	
10 <sup>-3</sup>	17	14	13	13	13	13	14	14	15	15	
10 <sup>-4</sup>	36			22	19	19	19	19	19	20	
10 <sup>-5</sup>	139								139	138	
10 <sup>-6</sup>											
10 <sup>-7</sup>											
10 <sup>-8</sup>											



Note: the content of darkened cells was not determined respectively is unnecessary      Rev - No: 3      Creation date of this sheet: 2021-03-24

<b>Company Address</b>	Garlock GmbH, Falkenweg 1, 41468 Neuss, Germany	<b>According to EN 13555 2021-04</b>
<b>Gasket Type</b>	GYLON EPIX® Style 3504 EPX	
<b>Sealing element dimensions [mm]</b>	92 x 49 x 2.4	

Relaxation ratio $P_{QR}$ for stiffness $C = 500$ kN/mm										
Gasket stress	ambient temperature		temperature 1 [100 °C]		temperature 2 [150 °C]		temperature 3 [200 °C]		temperature 4 [250 °C]	
	$P_{QR}$	$\Delta e_{GC}$ [mm]	$P_{QR}$	$\Delta e_{GC}$ [mm]	$P_{QR}$	$\Delta e_{GC}$ [mm]	$P_{QR}$	$\Delta e_{GC}$ [mm]	$P_{QR}$	$\Delta e_{GC}$ [mm]
Stress level 1 [10 MPa]	0,90	0,008	0,66	0,029	0,54	0,039	0,47	0,045	0,36	0,054
Stress level 2 [20 MPa]	0,90	0,017	0,54	0,077	0,42	0,097	0,35	0,109	0,24	0,128
Stress level 3 [30 MPa]			0,49	0,128	0,38	0,156				
Stress level 4 [40 MPa]	0,85	0,050								
P <sub>QR</sub> and $\Delta e_{GC}$ at maximal applicable gasket stress $Q_{Smax}$										
$P_{QR}$ at $Q_{Smax}$	0,96	0,076	0,78	0,227	0,69	0,260	0,52	0,322	0,33	0,340
$Q_{Smax}$	200 MPa		120 MPa		100 MPa		80 MPa		60 MPa	

Sekant unloading modulus of the gasket $E_G$ [MPa] and gasket thickness $e_G$ [mm]										
Gasket stress [MPa]	ambient temperature		temperature 1 [100 °C]		temperature 2 [150 °C]		temperature 3 [200 °C]		temperature 4 [250 °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		2,193		2,235		2,197		2,220		2,186
1		2,110		2,157		2,113		2,136		2,112
5	131	1,561	286	1,513	348	1,508	272	1,475	236	1,385
10	762	1,472	1191	1,474	816	1,419	348	1,196	288	0,988
15	2655	1,450	2068	1,395	1780	1,221	477	0,935	409	0,772
20	3761	1,428	12576	1,259	2719	1,044	625	0,786	509	0,659
25	3430	1,403	37377	1,139	5929	0,920	757	0,695	620	0,589
30	3056	1,371	8263	1,030	29772	0,830	906	0,634	710	0,540
40	3561	1,287	13646	0,870	27898	0,716	1226	0,558	1028	0,478
50	4214	1,193	8830	0,766	13680	0,646	1714	0,510	1420	0,433
60	4504	1,114	6549	0,695	9470	0,600	2285	0,474	1993	0,389
80	7039	0,994	7894	0,605	4996	0,538	4668	0,415		
100	8648	0,891	4899	0,550	4061	0,494				
120	7607	0,811	4339	0,512						
140	6867	0,750								
160	5770	0,701								
180	5131	0,661								
200	4600	0,629								

