

# Locking Assemblies

## RINGFEDER® RfN 7015.0

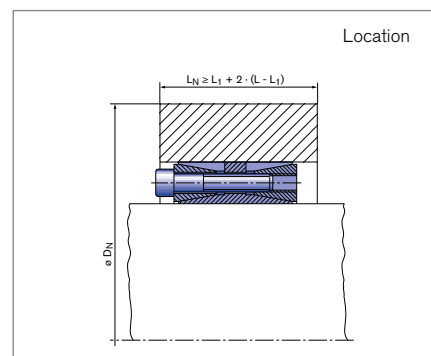
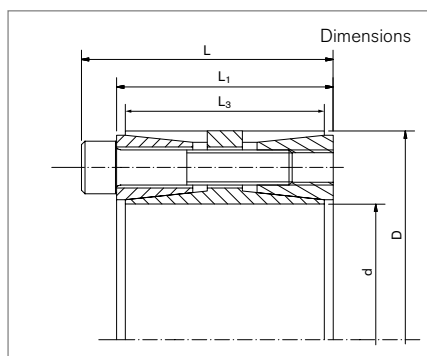
Transfer of greatest bending moments possible,  
greatest torque and/or axial forces,  
excellent concentricity possible



self-centering

without axial displacement

with low surface pressure



Locking Assembly dimensions						Transmissible torques or axial forces		Surface pressure		Locking screws				D <sub>N</sub> min at Rp <sub>0,2</sub>			
d	x	D	L	L <sub>1</sub>	L <sub>3</sub>	T	F <sub>ax</sub>	Shaft	Hub					200	300	400	
								PW	PN	n <sub>Sc</sub>	D <sub>G</sub>	T <sub>A</sub>	G <sub>w</sub>	[N/mm <sup>2</sup> ]			T <sub>max</sub>
mm			mm			Nm	kN	N/mm <sup>2</sup>				Nm	kg	mm			Nm
100	x	145	77	65	60	14244	285	198	136	10	M12 x 55	145	4,1	287	218	198	16757
110	x	155	77	65	60	15668	285	180	127	10	M12 x 55	145	4,4	283	225	206	18433
120	x	165	77	65	60	20511	342	198	144	12	M12 x 55	145	4,8	354	256	230	24130
130	x	180	86	74	68	27775	427	197	142	15	M12 x 60	145	6,5	390	280	251	32676
140	x	190	86	74	68	35894	513	220	162	18	M12 x 60	145	7	---	327	283	42228
150	x	200	86	74	68	38458	513	205	154	18	M12 x 60	145	7,4	---	329	289	45244
160	x	210	86	74	68	47858	598	224	171	21	M12 x 60	145	7,8	---	380	322	56304
170	x	225	95	81	75	59620	701	222	168	18	M14 x 65	230	10	---	399	341	70141
180	x	235	95	81	75	63127	701	210	161	18	M14 x 65	230	10,6	---	400	347	74267
190	x	250	108	94	88	74038	779	186	141	20	M14 x 75	230	14,3	562	394	352	87104
200	x	260	108	94	88	93522	935	211	163	24	M14 x 75	230	15	---	461	394	110026
220	x	285	120	104	98	105616	960	189	146	18	M16 x 90	355	19,8	693	462	408	124254
240	x	305	120	104	98	153624	1280	231	182	24	M16 x 90	355	21,4	---	621	499	180734
260	x	325	120	104	98	173360	1334	222	178	25	M16 x 90	355	23	---	641	523	203953
280	x	355	144	126	120	216499	1546	200	158	24	M18 x 110	485	35,2	---	626	536	254705
300	x	375	144	126	120	241629	1611	195	156	25	M18 x 110	485	37,4	---	652	561	284269
320	x	405	162	142	135	333337	2083	199	157	25	M20 x 120	690	51,3	---	711	609	392161
340	x	425	162	142	135	354170	2083	187	150	25	M20 x 120	690	54,1	---	714	623	416671
360	x	455	187	165	158	463312	2574	186	147	25	M22 x 130	930	75,4	---	761	665	545073
380	x	475	187	165	158	489052	2574	176	141	25	M22 x 130	930	79	1149	768	679	575355
400	x	495	187	165	158	514791	2574	167	135	25	M22 x 130	930	82,8	1100	777	694	605637
420	x	515	187	165	158	648637	3089	191	156	30	M22 x 130	930	86,5	---	907	777	763102
440	x	545	204	180	172	799628	3635	192	155	30	M24 x 150	1200	110	---	954	819	940738
460	x	565	204	180	172	835974	3635	184	150	30	M24 x 150	1200	114	---	957	832	983499

To continue see next page

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Locking Assembly dimensions						Transmissible torques or axial forces		Surface pressure		Locking screws			Gw	D <sub>N min</sub> at Rp <sub>0,2</sub>			T <sub>max</sub>
d	x	D	L	L <sub>1</sub>	L <sub>3</sub>	T	F <sub>ax</sub>	Shaft	Hub	n <sub>Sc</sub>	D <sub>G</sub>	T <sub>A</sub>		200	300	400	
								P <sub>W</sub>	P <sub>N</sub>					[N/mm <sup>2</sup> ]			
mm			mm			Nm	kN	N/mm <sup>2</sup>				Nm	kg	mm			Nm
480	x	585	204	180	172	930476	3877	188	154	32	M24 x 150	1200	119	---	1018	876	1094677
500	x	605	204	180	172	969246	3877	181	149	32	M24 x 150	1200	123	---	1022	889	1140289
520	x	630	227	200	190	1127063	4335	173	143	30	M27 x 160	1600	148	1547	1023	903	1325956
540	x	650	227	200	190	1170411	4335	167	139	30	M27 x 160	1600	154	1490	1031	918	1376955
560	x	670	227	200	190	1213760	4335	161	135	30	M27 x 160	1600	160	1451	1041	933	1427951
580	x	690	227	200	190	1257109	4335	155	131	30	M27 x 160	1600	165	1424	1053	949	1478951
600	x	710	227	200	190	1387154	4624	160	135	32	M27 x 160	1600	170	1555	1108	992	1631946
620	x	730	227	200	190	1433393	4624	155	132	32	M27 x 160	1600	177	1526	1119	1008	1686345
640	x	750	227	200	190	1618347	5057	164	140	35	M27 x 160	1600	182	1759	1199	1064	1903937
660	x	770	227	200	190	1668920	5057	159	137	35	M27 x 160	1600	187	1713	1209	1080	1963435
680	x	790	227	200	190	1768622	5202	159	137	36	M27 x 160	1600	193	1766	1242	1109	2080732
700	x	810	227	200	190	1820640	5202	155	134	36	M27 x 160	1600	198	1732	1253	1125	2141930
720	x	830	227	200	190	2080732	5780	167	145	40	M27 x 160	1600	204	---	1359	1196	2447919
740	x	850	227	200	190	2138530	5780	162	141	40	M27 x 160	1600	209	2030	1367	1211	2515917
760	x	870	227	200	190	2196328	5780	158	138	40	M27 x 160	1600	215	1979	1376	1226	2583915
780	x	890	227	200	190	2254126	5780	154	135	40	M27 x 160	1600	220	1940	1386	1242	2651913
800	x	910	227	200	190	2427520	6069	158	139	42	M27 x 160	1600	225	2086	1443	1285	2855906

More sizes on request

## Explanation

d = Inner diameter	F <sub>ax</sub> = Transmissible axial force	T <sub>A</sub> = Tightening torque of the clamping screws
D = Outer diameter	p <sub>W</sub> = Surface pressure on shaft at given T <sub>A</sub>	G <sub>w</sub> = Weight
L = Overall length	p <sub>N</sub> = Surface pressure on hub at given T <sub>A</sub>	D <sub>N min</sub> = Min. hub outer diam. depending of the given hub yield point Rp0,2
L <sub>1</sub> = Overall length (without screws)	n <sub>Sc</sub> = Quantity of screws	T <sub>max</sub> = Max. transmissible torque
L <sub>3</sub> = Width of ring	D <sub>G</sub> = Thread	
T = Transmissible torque at given T <sub>A</sub>		

## Ordering example

Locking assembly	d	D
RfN 7015.0	150	200

### Technical Information

- The values for T, F<sub>ax</sub>, p<sub>W</sub> and p<sub>N</sub> apply to Locking Assemblies installed in oiled condition.
- Surface finishes: Shaft and hub bores R<sub>a</sub> ≤ 3,2 μm
- Tolerances: Shaft: h8 · Hub: H8
- Max. two Locking Assemblies can be used in series, the transmissible torques and axial forces are added.
- A reduction of the contact pressures and the transmission values by reducing the tightening torque of the screws is possible. Please contact our specialists for assistance.