

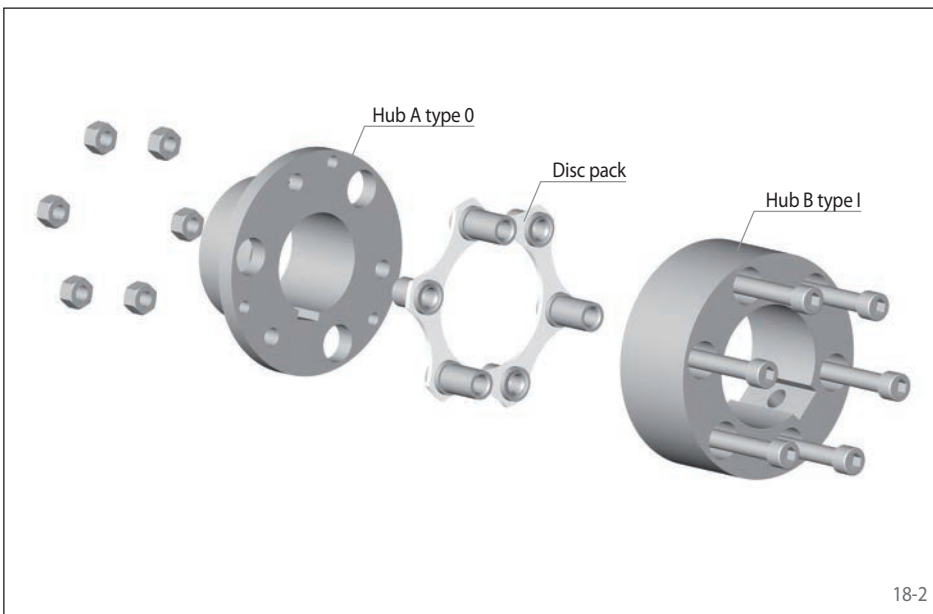
torsionally rigid
single disc pack



18-1

Features

- Nominal torques up to 18700 Nm
- Combines high torque capacity with low weight
- Backlash free
- Compensation of axial and angular misalignments
- High torsional rigidity with low axial rigidity
- Temperature range -20 °C to +280 °C
- Maintenance free and long life with proper alignment
- Typical application: Pumps, fans, packaging machines, paper machines, printing machines, conveyor systems, dynamometers, gantry systems



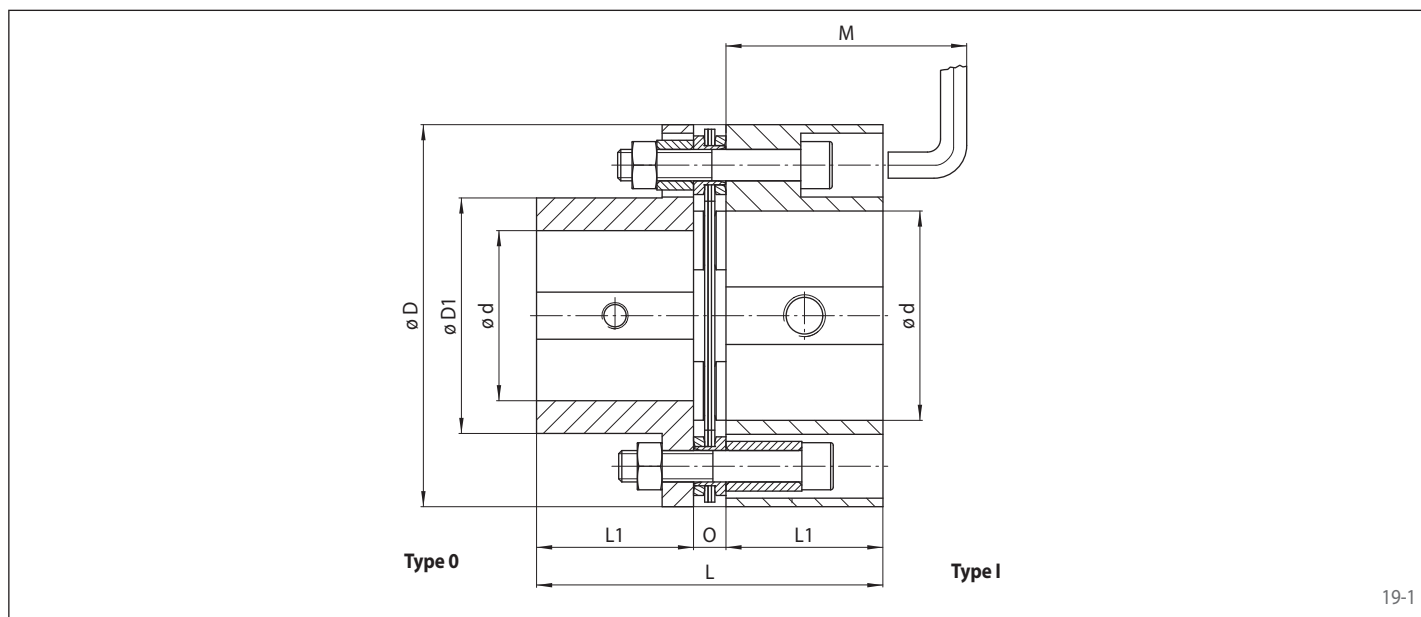
18-2

Order example

Order example	Code
Coupling design	RDL
Coupling size	0038
Type	DSO
Material of the hub: • Steel	STA
Hub A, type: • 0, standard • I, increased max. bore	0 1
Hub A, design: • finish bored with keyway • roughbored	FB VA
Bore diameter hub A	025
Hub B, type: • 0, standard • I, increased max. bore	0 1
Hub B, design: • finish bored with keyway • roughbored	FB VA
Bore diameter hub B	030

RDL 0038 DSO-STA-0FB025-1FB030

torsionally rigid
single disc pack



19-1

Coupling size	Nominal torque T_{KN} Nm	Nominal power at 100 min^{-1} P_{K100} kW	Max. speed n_{\max} min^{-1}	Torsional stiffness C_T MNm/rad	Moment of inertia J_K kgm^2	Permissible misalignments		
						Axial mm	Radial mm	Angular $^\circ$
0024	96	1,0	7500	0,041	0,00047	±1	Due to design, no radial misalignments are permissible.	0,75
0038	232	2,4	7000	0,093	0,00170			
0048	620	6,5	6000	0,248	0,00820			
0065	1200	12,6	5200	0,529	0,01430			
0075	1910	20,0	4800	0,895	0,02630			
0100	3460	36,3	4400	1,665	0,06400			
0110	5600	58,5	4200	2,393	0,13200			
0125	7100	74,2	4000	3,490	0,32110			
0140	10400	108,7	3800	on demand	0,39450			
0150	14500	152,2	3700		0,63500			
0160	18700	196,0	3600		1,00500	±2		

Torsional stiffness and moment of inertia refer to a combination of hub type 0 and hub type I with max. possible bore diameter respectively.

Coupling size	Pilot bore d^* mm	Min. bore d^* mm	Max. bore d^*		D mm	D1 mm	L mm	L1 mm	M** mm	Gap O mm	Weight kg
			Hub type 0 mm	Hub type I mm							
0024	8	10	22	25	63	35	66,5	30	75	6,5	0,9
0038	10	12	30	38	82	45	86,5	40	85	6,5	1,8
0048	15	17	40	50	102	57	98,0	45	95	8,0	3,2
0065	15	17	52	70	128	77	119,5	55	110	9,5	5,8
0075	20	22	65	80	146	94	132,0	60	120	12,0	8,5
0100	25	27	80	100	176	115	153,0	70	140	13,0	14,0
0110	30	32	90	115	197	132	194,5	90	175	14,4	22,2
0125	40	42	105	130	225	147	206,1	95	185	16,2	30,5
0140	45	47	115	140	250	162	229,4	105	195	19,5	42,7
0150	50	52	120	155	275	178	251,5	115	215	21,5	57,3
0160	60	62	135	165	300	190	283,6	130	235	23,5	76,1

For finish bores, please specify bore diameter hub A and hub B. Tolerance of finish bores H7. Keyways in accordance with DIN 6885, sheet 1. Keyway tolerance J59, different bore and keyway tolerances on request.

The weight refers to a combination of hub type 0 and hub type I with max. possible bore diameter respectively.

In deviation from figure 19-1, the combination of the hub type 0 / 0 and type I / I is possible.

Upon request, also available with taper bushes.

Upon request, couplings larger than frame size 0160 also available.

For vertical installation, please contact RINGSPANN.

* Bores also available in inch size, see page 68.

** Distance M is required to tighten and loosen the screws for hub type I.