

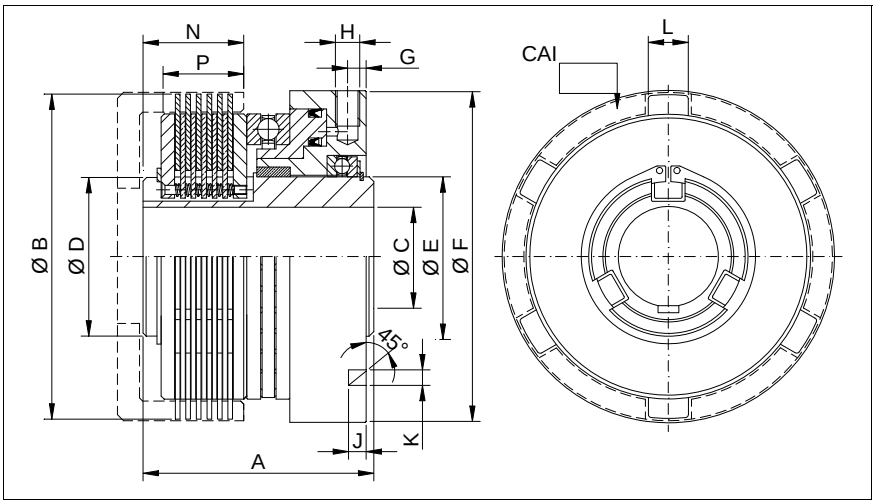
HYDRAULIC BRAKES AND CLUTCHES

Characteristics
These units are recommended for applications requiring very high torque to be transmitted with small dimensions. They can be remote-controlled both electrically and hydraulically.
The transmitted torque can be easily adjusted given the direct link between moment and pressure. Among their most remarkable features, we find effective performances, rapid hest exhaustion and no maintenance as the piston stroke offsets, automatically the discs' wear.
A piston, pushed by oil, forces the set of steel plates. Clutches are fitted with a static cylinder, offering in this way the advantage of avoiding the coil centrifugation during clutch rotation and following quicker and safer engagements and disengagements.

Assembling
These units can be assembled both horizontally and vertically : in the second case, however, keep the set of discs downwards.
The clutch body has to be equipped with an anti-revolving lock through a stirrup by using millings on the clutch body itself. Even though the clutch cylinder is static, it may be moved by the ball bearing on which it is assembled.

Feeding
Use flexible hoses oil supply, avoid narrowings and if you want rapid engagements you should place feeding valves next to the unit. The recommended oil pressure amounts to 10 bar and during normal working phases do not exceed 20 bar.

Lubrication
These units should work in good- quality oil, with viscosity not higher than 3,5° C/50° max. temperature: 110°C



MULTI PLATE HYDRAULIC CLUTCHES
Model CHI

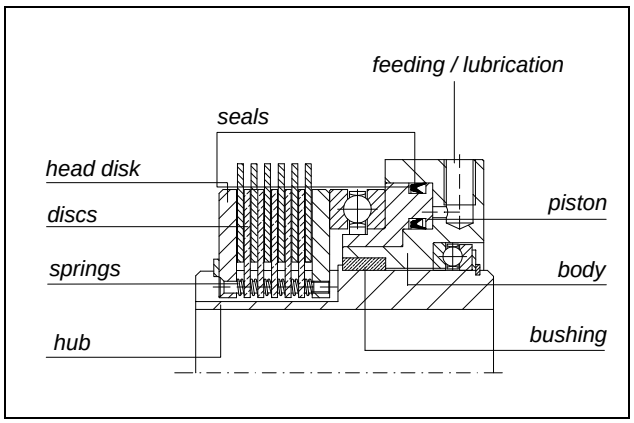
PERFORMANCES (8 bar)

size	*Torque* (Nm) M_{din}	M_{stat}	*R.P.M.* max	*Voil* cm^3	*plates ext/int*	*housing*	*weight* Kg
CHI 086	45	80	2800	8	5/4	CAI 086	2.5
CHI 098	65	110	1800	10	5/4	CAI 098	3,2
CHI 106	100	180	1600	11	6/5	CAI 106	3,8
CHI 108	125	220	1600	12	6/5	CAI 108	4,2
CHI 130	160	280	1800	19	6/5	CAI 130	7
CHI 131	200	350	1600	25	7/6	CAI 130	7,5
CHI 165	400	700	1200	46	5/4	CAI 165	16
CHI 198	600	1050	1400	86	6/5	CAI 198	25

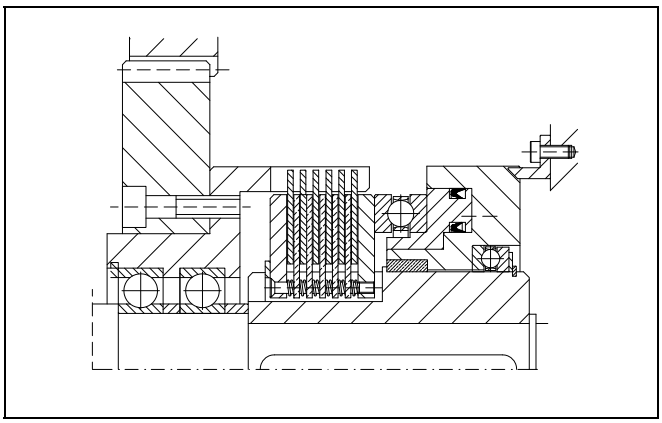
DIMENSIONS (mm)

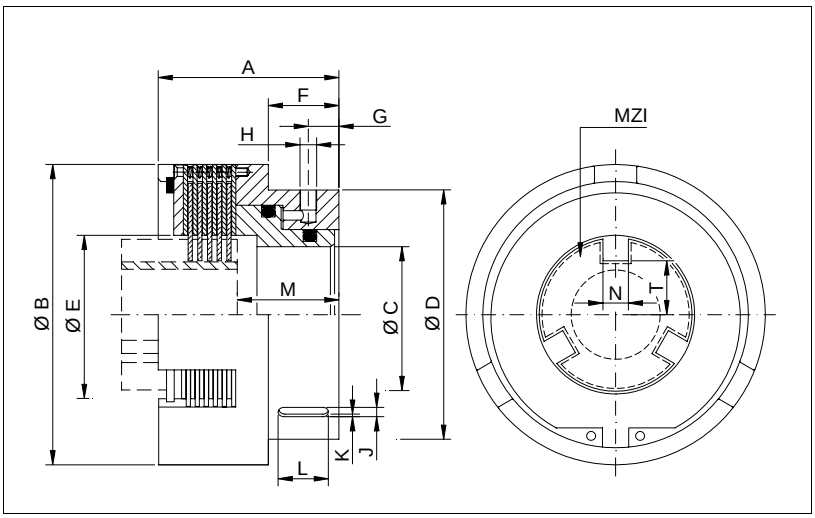
size	A h8	B	C max	D	E	F h11	G	H	K	J	n° x L	N	P
CHI 086	69	97	30	59	40	98	6	1/8”	8	4	6x12	24	22
CHI 098	69	108,5	36	72	45	108	7	1/8”	8	4	8x12,5	25	22
CHI 106	75	116,5	40	72	50	112	6	1/8”	8	5	6 x 15	29	25
CHI 108	75	120	40	72	50	119	6	1/8”	8	5	8x16	29	25
CHI 130	90	145	46	92	60	130	7	1/8”	10	6	8x16	33	30
CHI 131	98	145	48	92	60	138	7	1/8”	10	6	8x16	36	32
CHI 165	115	179	58	70	75	180	25	1/4”	10	8	9x20	35	26
CHI 198	165	218	58	70	75	235	24	1/4”	12	10	10x20	43	34

PARTS NAME



MOUNTING EXAMPLE





MULTI PLATE HYDRAULIC BRAKES WITH INTERNAL DRIVING
Model FCI

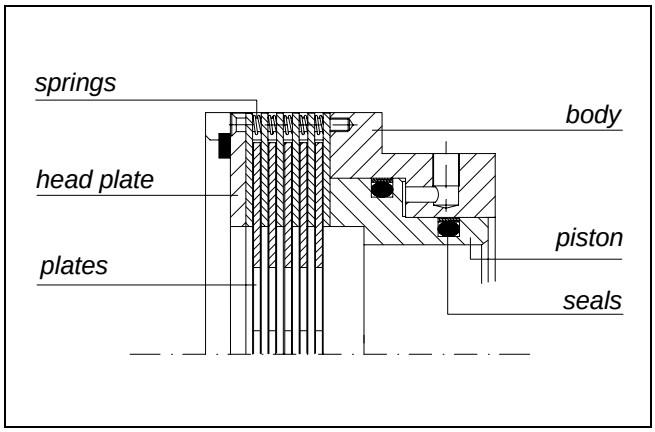
PERFORMANCES (8 bar)

size	*torque* (Nm) M dyn	M stat	*rpm* max	*air Vol* (cm^3)	*plates* *int/ext*	*hub*	*weight* (Kg)
FCI 106	50	90	3500	7	5/4	MZI 106	2.3
FCI 120	90	160	3200	9	5/4	MZI 120	3.3
FCI 145	160	300	2800	15	5/4	MZI 145	6

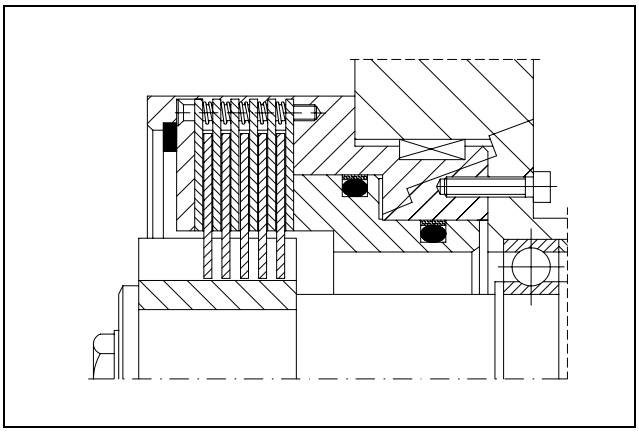
DIMENSIONS (mm)

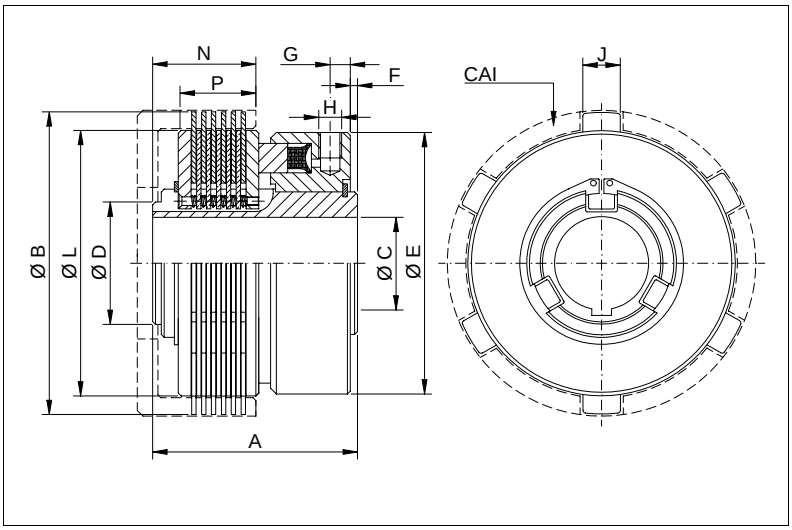
size	A	B h11	C	D h6	E	F	G	H	J	K	L	M	N	T	*lugs* nr
FCI 106	64	106	48	88	55	25	13	1/8”	6	3.5	20	36	9	19	3
FCI 120	69	118	56	110	66	28	16	1/8”	8	4	25	38	12	24,5	3
FCI 145	86	146	70	136	86	38	25	1/8”	10	5	35	52	14	30,5	3

PARTS NAME



MOUNTING EXAMPLE





MULTI PLATE HYDRAULIC BRAKES WITH EXTERNAL DRIVING
Model FCE

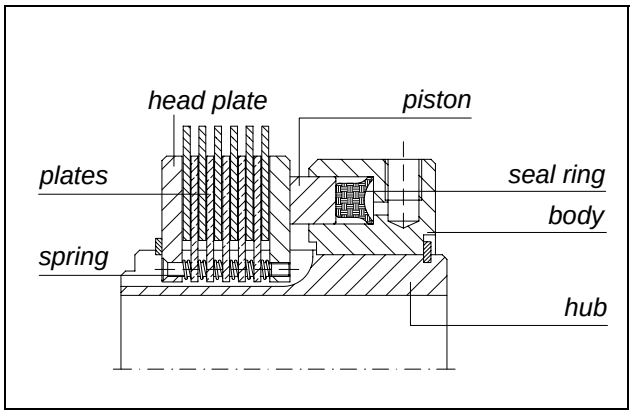
PERFORMANCES (8 bar)

size	M_{din}	M_{stat}	*R.P.M.* max	*Voil* cm^3	*plates ext/int*	*housing*	*weight* Kg
FCE 078	40	70	3600	7	5/4	CAI 078	2.2
FCE 108	90	160	3200	13	6/5	CAI 108	4.5
FCE 129	180	340	2800	16	8/7	CAI 109	8.5
FCE 199	450	750	2200	42	6/5	CAI 199	18

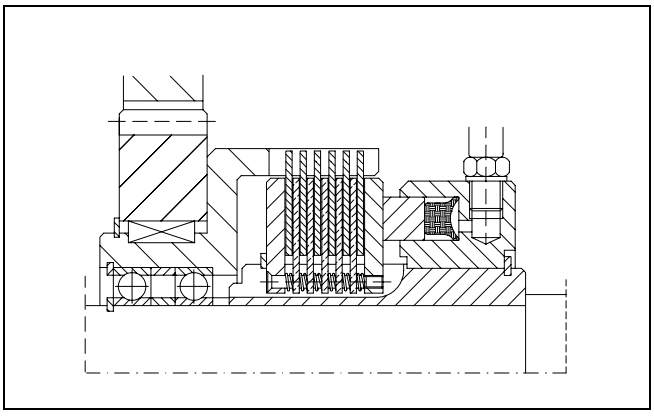
DIMENSIONS (mm)

size	A	B h11	C max	D	E h11	F	G	H	n° x J	L	N	P
FCE 078	71	89	26	33	88	0.5	7	1/8”	3x12	78,5	27.5	21.5
FCE 108	85	120	40	46	112	1	6	1/8”	8x16	109	31	25
FCE 129	99	145	48	58	130	1	9	1/4”	8x16	130	46	37
FCE 199	115	218	58	70	180	2	10	1/4”	10x20	199	63	50

PARTS NAME



MOUNTING EXAMPLE



Symbology


mechanically actuated


electromagnetically actuated


hydraulically actuated


pneumatically actuated


springs loaded


permanent magnet


with rotating magnet


with stationary magnet


with steel plates


with steel plates E


with sintered discs M


with linings


toothed


accessories


powder