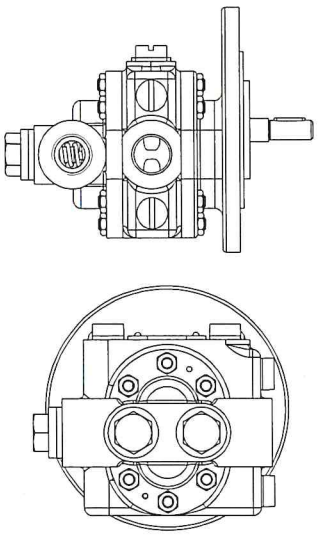
CAF - Gear Pump

Technical data sheet

As per September 2013



CAF-gear-type pump

Function

The CAF gear pumps are rotating positive displacement pumps and with their construction design are ideal for pumping oils and coolants (emulsions) that are self-lubricating and do not have any solid or abrasive ingredients. They can pump fluids that have a kinematic viscosity of between ν = 11...140 mm²/s.

A delivery range from 0.63 to 4.0 m³/h at an operating pressure of p_{max} = 10 bar and a kin. viscosity of ν = 45 mm²/s is achieved.

The pumps can be used in a temperature range of -20 °C to 80 °C.

Execution of the CAF series

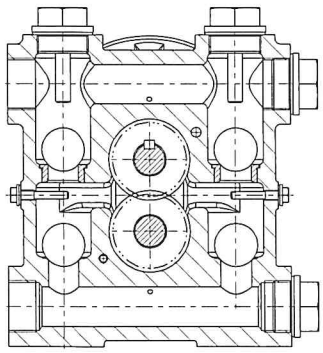
CAF pumps are gear-type pumps with two equal-sized conveyor impellers. The shafts are made from hardened, tempered steel and are ground to maximum precision. The gears in all the pumps are helical-toothed so they develop less noise than straight-toothed pumps.

The slide bearing of the pinion shafts, which are self-lubricated by circulating forced-oil lubrication, provides the advantage that the bearing does not require any maintenance at all.

The radial shaft seal rings, used to prevent the leakage of oil or penetration of dirt, do not require any kind of special maintenance.

Protect pumps that have a risk of overloading the pump driver with a pressure relief valve.

Function and connection dimension comply with the standard TGL 17-747 404.



Device design

The direction of rotation can be made clockwise or anti-clockwise and can do that with a constant delivery direction. This is implemented by a special valve technology in the pump.

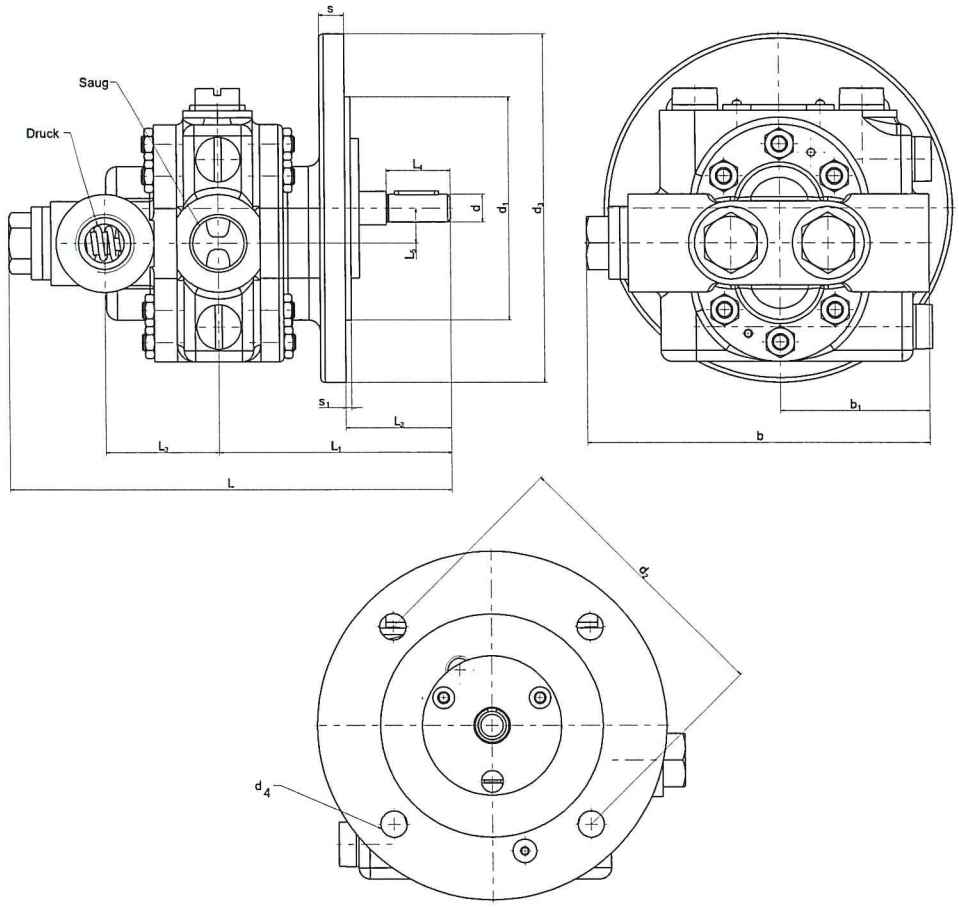
All pumps can be driven directly by pump drivers (electric motor, gasoline or diesel engine, steam turbine, etc.) or indirectly through transmissions.

General Technical Data

Identification no.	Frame size	Q m^3/h	p_{max} bar	n min^{-1}	Shaft output (kW)(1)	Engine power (kW)	Suction port	Pressure port	Mass kg
4000628	0,63	0,63	10	1450	0,38	0,5	R½	R½	4
4000757	1,0	1,0	10	960	0,57	0,75	R¾	R¾	10
4000878	1,6	1,6	10	960	0,91	1,2	R¾	R¾	13
4000966	2,5	2,5	10	960	1,36	1,8	R1	R1	16,2
4001106	4,0	4,0	10	730	2,17	2,8	R1¼	R1¼	29

(1) – Shaft output P is the power in kW absorbed by the pump at the coupling at the delivery pressure p_{max} at a kinematic viscosity of 38 centistokes

Type CAF – 0,63

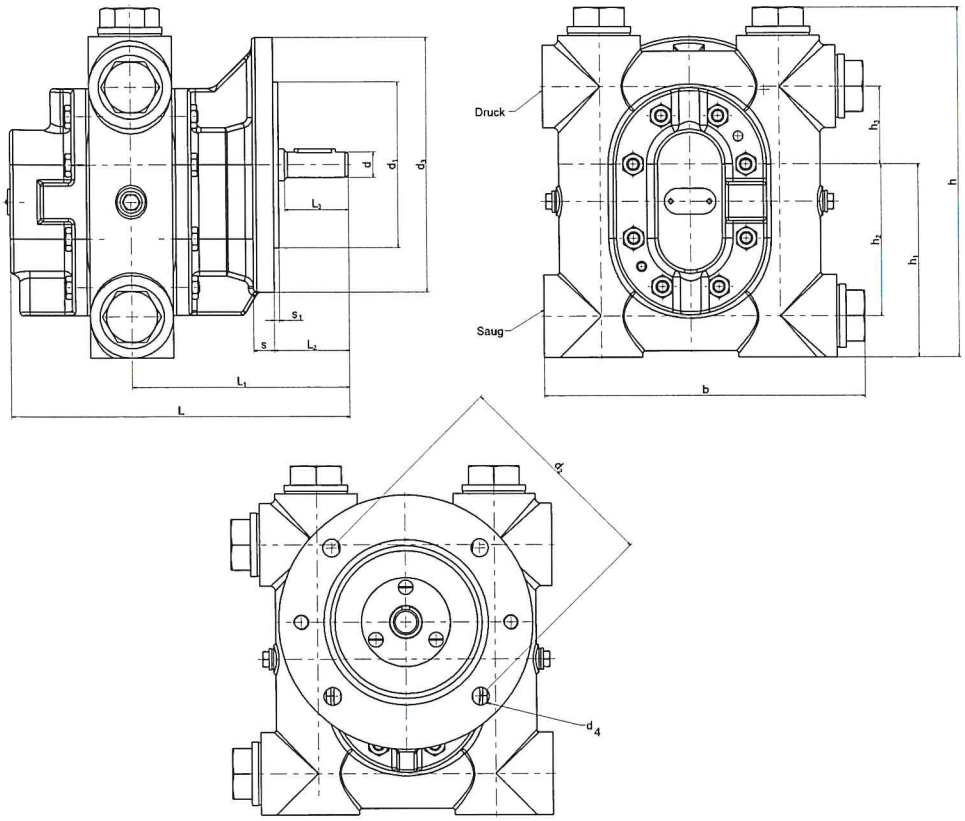


Dimensions

Identification no.	Type	L	L1	L2	L3	L4	L5	b	b1	d	d1	d2	d3	d4	s	s1	Pressure port	Suction port
4000628	CAF 0,63	155	82	37	40	23	12,5	122	54	10	80	100	125	9,5	9	2	R½	R½

Parallel keys as per DIN 6885 (Dimensions in mm)

Type CAF – 1,0 to 4,0



Dimensions

Identification no.	Type	L	L1	L2	L3	b	h	h1	h2	h3	d	d1	d2	d3	d4	s	s1	Pressure port	Suction port
4000757	CAF 1,0	190	119	38	30	167	162	87	64.5	35,5	14	100	125	160	14	16	4	R¾	R¾
4000878	CAF 1,6	185	118	38	30	207	210	109,5	88,5	51,5	14	100	125	160	14	16	4	R¾	R¾
4000966	CAF 2,5	215	132	38	30	209	215	111,5	81,5	44,5	14	100	125	160	14	16	4	R1	R1
4001106	CAF 4,0	265	170	59	50	255	217	151,5	119	61	20	130	165	200	14	16	4	R1¼	R1¼

Parallel keys as per DIN 6885 (Dimensions in mm)