Fluid Centrifuge Type CA 100

KNOLL
.It works

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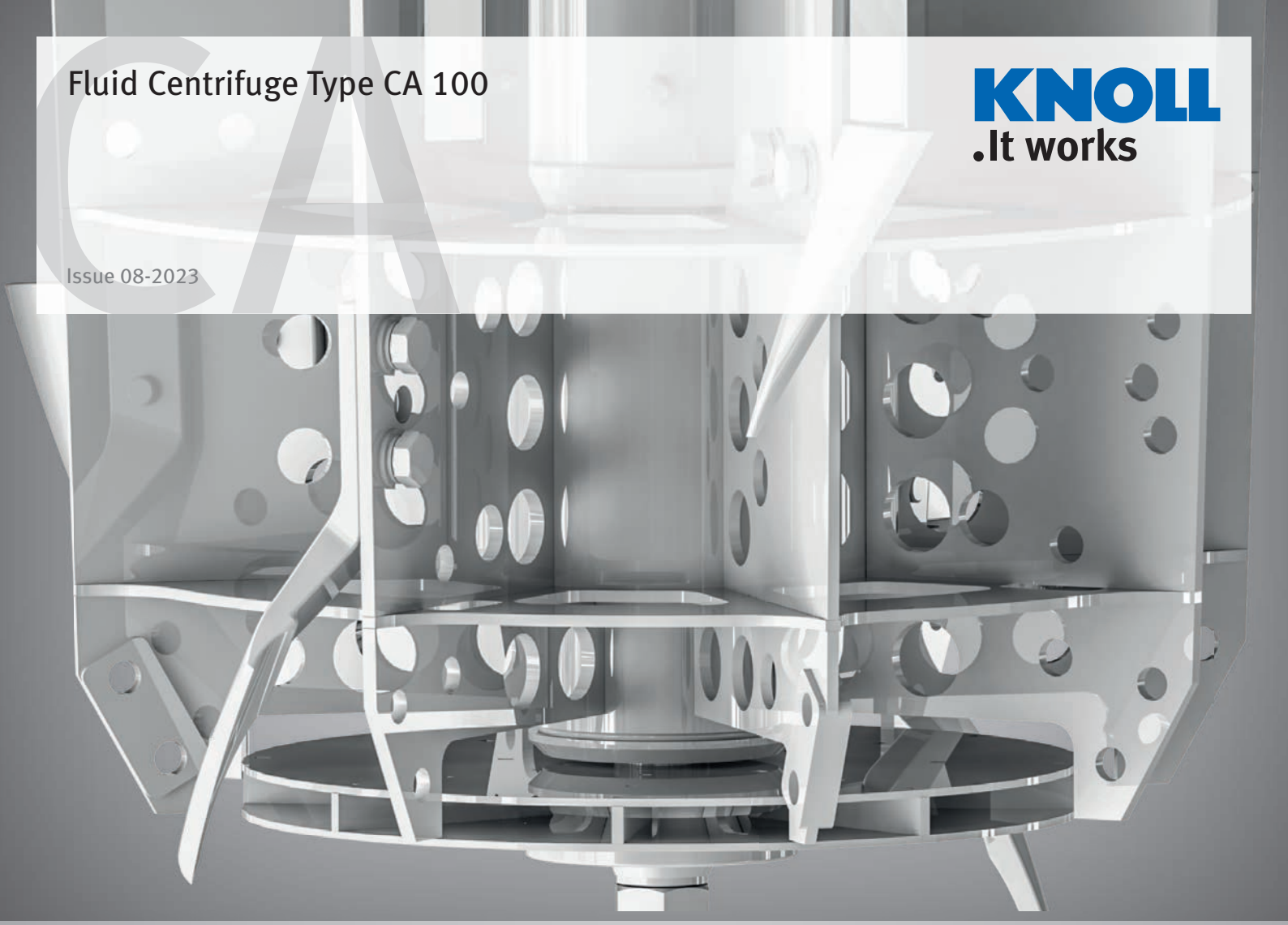


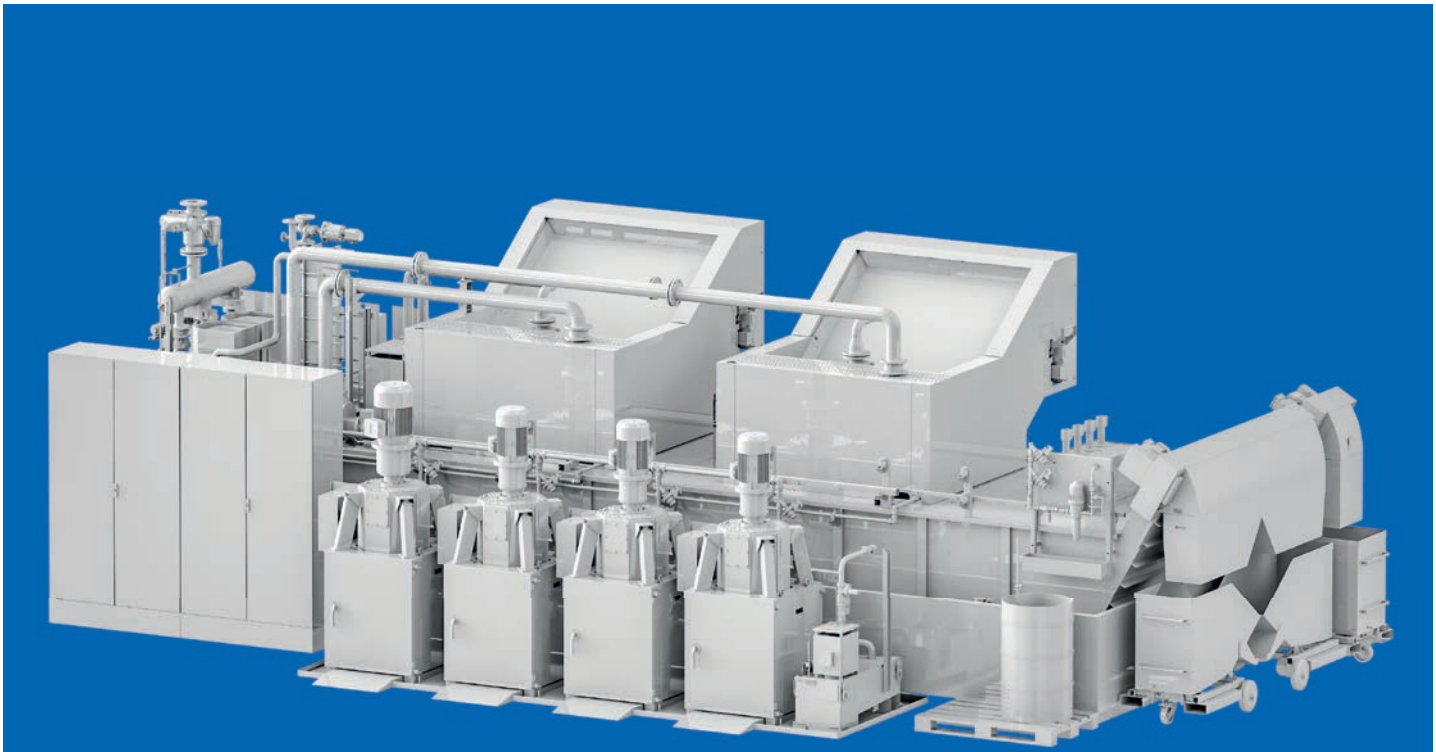
Properties	Benefits
Short regeneration cycle due to mechanical braking system	Fast and dynamic adaptation to the machining processes
Frequency-controlled, wear-free direct drive via coupling	Permanently low operating costs
Sound and oil mist isolation by means of closing flap	Low environmental impact from noise and emissions
Electronic vibration monitoring with automatic stop function	High process reliability
Separate speed monitoring of motor and drum	High process reliability
Automatic flushing of rotor and centrifugal valves	Low maintenance requirement

Application

The CA 100 automatic fluid centrifuge is a centrifugal separator for the continuous fine cleaning of cooling lubricants (CL) and other oils.

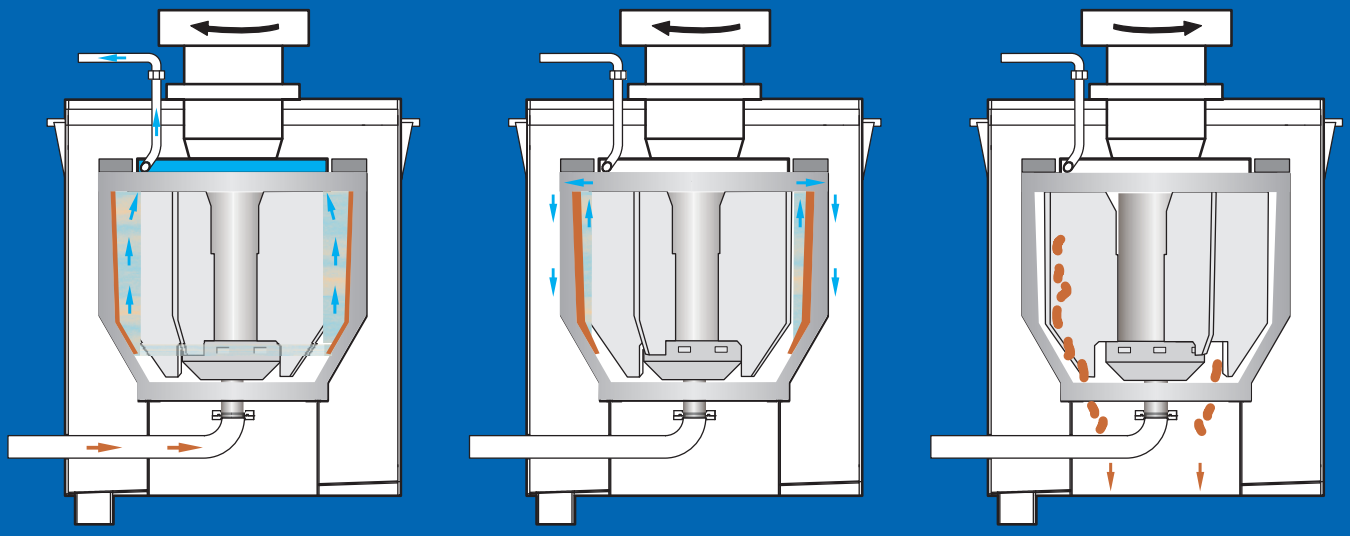
Ideal areas of application are

- Bath maintenance on centralized or decentralized filter systems (prevents the concentration of fine particles of steel, carbide, silicon, ceramic, graphite, etc.)
- Sludge concentration of reverse flow filters
- Full-flow cleaning of smaller fluid volumes from precision machining processes



Fluid centrifuges for bath maintenance at a central filter plant

Function



Function

1. Separation
- The drum accelerates to maximum speed.
- .- After the fluid to be cleaned enters, it spreads out in a ring on the drum wall due to the centrifugal forces.
- The dirt particles migrate outward due to their greater weight.
- A scraper tube picks up the cleaned fluid and conveys it out of the drum.

2. Drying
- The fluid supply stops.
- At reduced speed, the centrifugal valves open.
- The residual fluid emerges from the drum.

3. Discharge
- The brake stops and blocks the drum.
- The scraper blades rotate in the opposite direction.
- The semi-solid dirt falls down out of the centrifuge.

4. Flushing
- The drum accelerates, fluid flows into the centrifuge again.
- Then the drying and discharge phases start again.

Fluid Centrifuge Type CA 100

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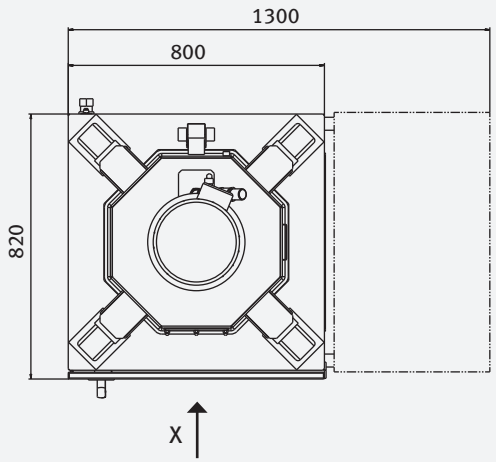
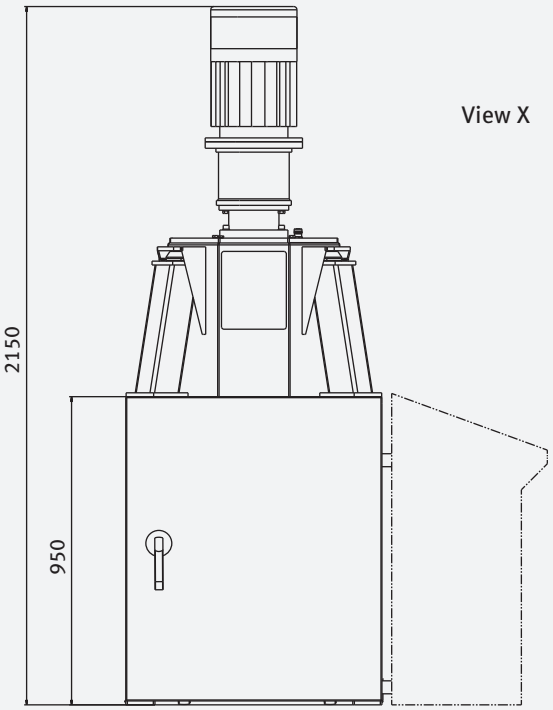
CA

Dimensions and technical data





Max. flow rate	80 l/min (emulsion), 60 l/min (oil)
Drum volume	31 l
Medium capacity	15.5 l
Sludge capacity	4.2 kg or 4 l
Max. speed	3000 rpm
Max. separation factor	1900 g
Deceleration time from 1500 rpm	approx. 3 s
Regeneration time	2 to 4 min
Power	7.5 kW
Power consumption - at 20 l/min - at 40 l/min - at 80 l/min	 1.9 kW 2.2 kW 3.4 kW
Max. return pressure at the scraper tube	1 bar
Dimensions (LxWxH)	1300 x 820 x 2150
Total weight	570 kg
Max noise emission	66 dB(A)
Separation phases	2
pH value	6 to 10
Operating temperature	10 to 50 °C
Standards	DIN EN 12547, CE compliant according to 2006/42/EG

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