

#### Application:

- Stopping and/or holding brake for rotor of wind turbines

#### Description:

- The ABS 120 FC brake is an [Active Brake, Hydraulically Applied](#); braking force produced by variation of hydraulic pressure.
- The ABS 120 FC brake is designed as a floating caliper with one hydraulic cylinder.
- ABS brakes are suitable for horizontal and vertical brake discs under any angular displacement.

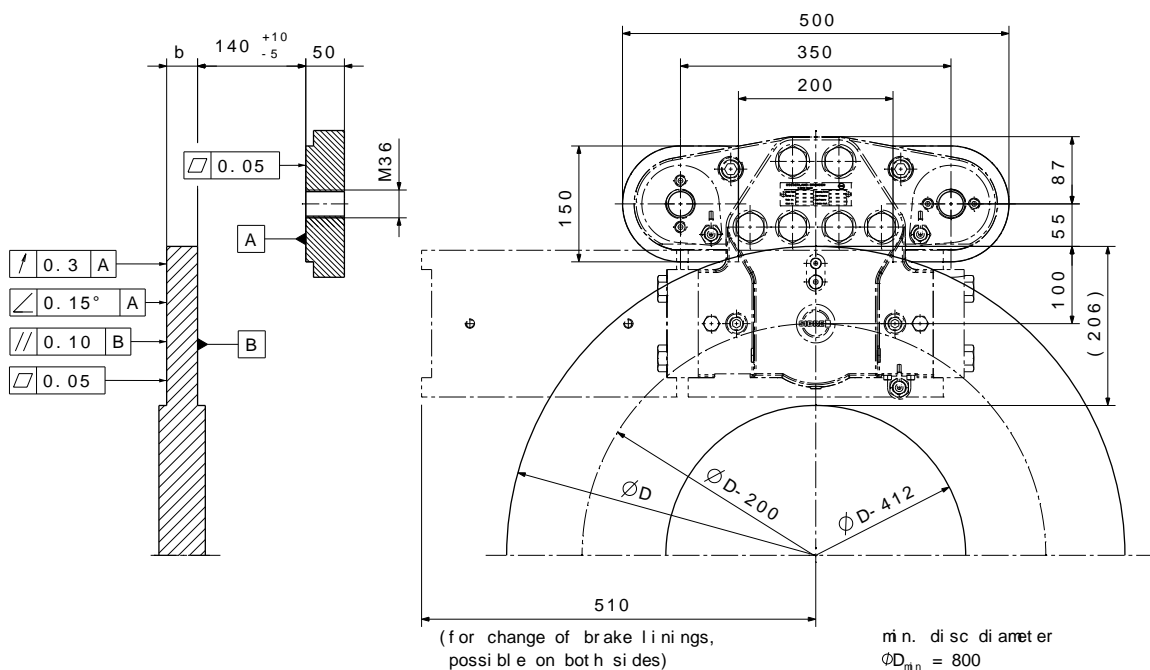
#### Design Advantage:

- Compact and robust construction
- Fast response time, fast braking for maximum safety
- Stainless steel piston
- Sinter linings for high speed/high energy application
- Lining retraction springs ensure air gap between lining and disc, when brake is open
- Removable retainers allow easy change of linings
- Suitable for low temperature application
- Long service life
- Easy maintenance

Alterations reserved

Sibre Siegerland-Bremsen GmbH – Auf der Stücker 1-5 – D-35708 Haiger, Germany  
Tel.: +49 2773 94000 – Fax: +49 2773 9400-10 – e-mail: [info@sibre.de](mailto:info@sibre.de) – [www.sibre.de](http://www.sibre.de)

		ABS 120 FC
Piston diameter	$\varnothing d_P$	120 mm
Piston area each side	$A_P$	11310 mm <sup>2</sup>
Operating pressure	$p$	115 bar
Max. plant pressure	$p_{max}$	130 bar
Oil volume per 1 mm stroke	$V_{Oil}$	11,3 cm <sup>3</sup>
Lining type		sinter
Lining surface	$A_L$	363 cm <sup>2</sup>
Max. lining wear	$s_L$	7 mm
Nominal friction static	$\mu$	0.4
Max. braking force	$F_{Br max}$	104 000 N
Disc thickness	$b$	40 mm
Min. disc diameter	$\varnothing D_{min}$	800 mm
Floating range on guidance pins	$r$	-5mm / +10 mm
Temperature range (for lower temperatures please contact us)	$T$	-20°C to 70°C
Weight	$m$	180 kg



### Calculation of Braking Torque

$$M_{Br} = F_{Br} \cdot \frac{D-200}{2} = 2 \cdot A_P \cdot p \cdot \mu \cdot \frac{D-200}{2} = A_P \cdot p \cdot \mu \cdot (D-200)$$

