

MB1721

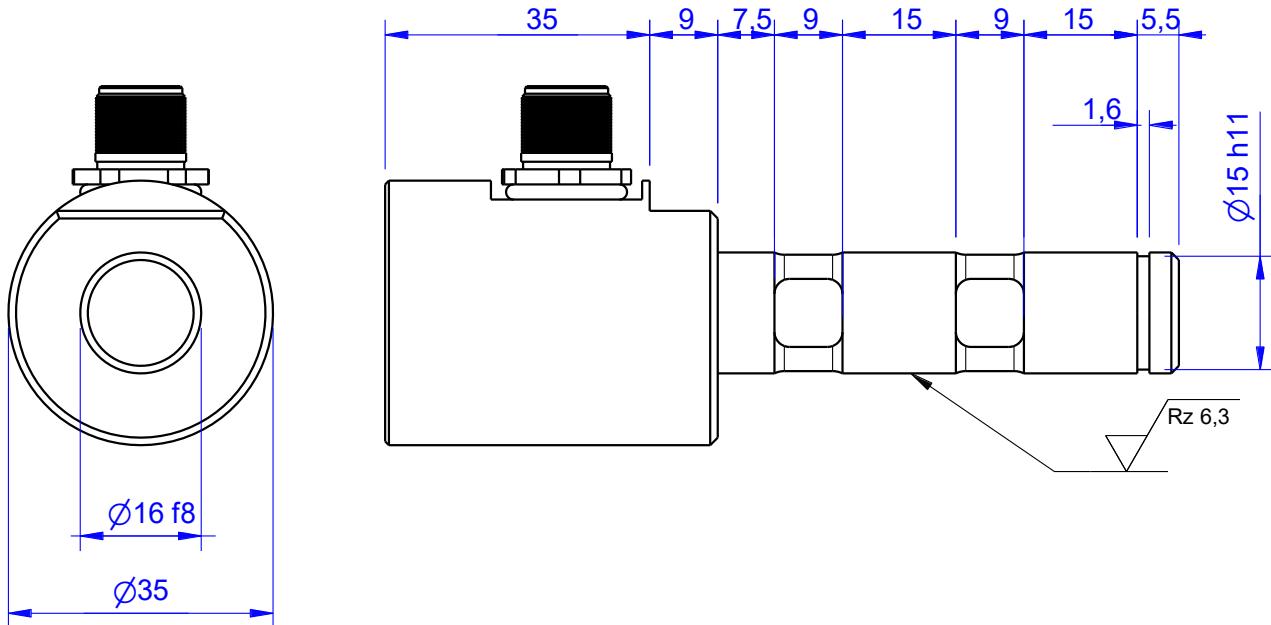
Load Pin

Content of Loadpin Datasheet

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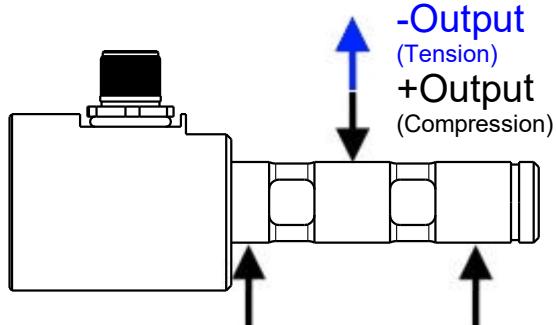
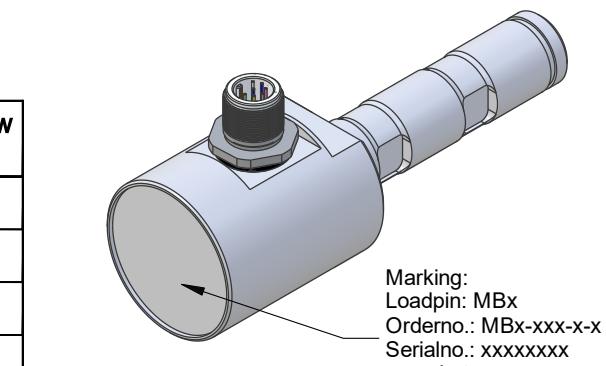


Ordernumber	Capacity [kN] (F.S.)	Uncertainty [kN] (k=2)	Review
MB1721-1-x-A	1	± 0,005	A
MB1721-2-x-A	2	± 0,010	A
MB1721-4-x-A	4	± 0,020	A
MB1721-8-x-A*	8	± 0,040	A
MB1721-10-x-A	10	± 0,050	A

* above showed version
fixed dimensions don't change at other capacity

Specifications:

Dimension / Material		
Material		
Protection class		
Hardness (load area)	HRC	Stainless Steel IP 66 40..45
Mechanical Data		
Safe Load Limit	% of F.S.	150
Breaking Load	% of F.S.	400
Precision		
Nonlinearity	% of F.S.	±0,5
Nonrepeatability	% of F.S.	±0,25
Hysteresis	% of F.S.	±0,2
Temp. Shift Zero	% of F.S./K.	±0,05
Temp. Shift Span	% of F.S./K.	±0,05
Temperature		
Compensated Temp.	°C	-10...+60
Operating Temp.	°C	-20...+70



Mounting Situation

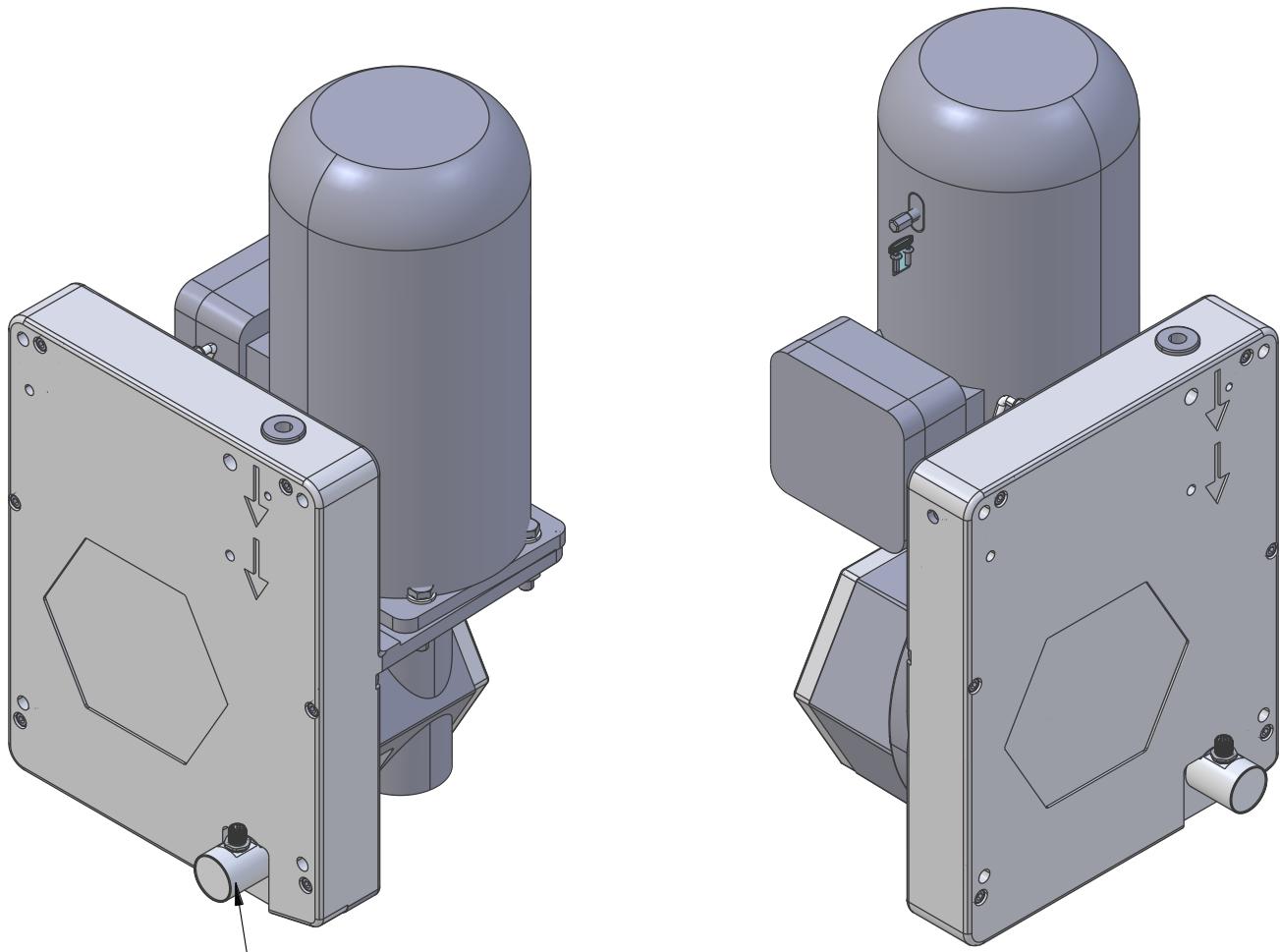
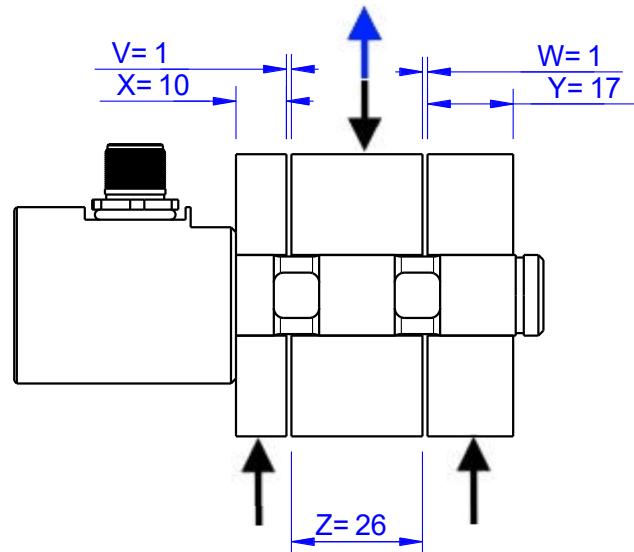
MB1721 Review: A

Bore fit of mounting situation: H7

Configuration

possible mounting situation / customer mounting could vary

(Please describe mounting situation with Vs, Ws, Xs, Ys and Zs for best possible calibration)



Loadpin mounted in the winch,
anti-twist protection by adapting to the shape of the housing.

Output Signal & Wiring

MB1721 Review: A

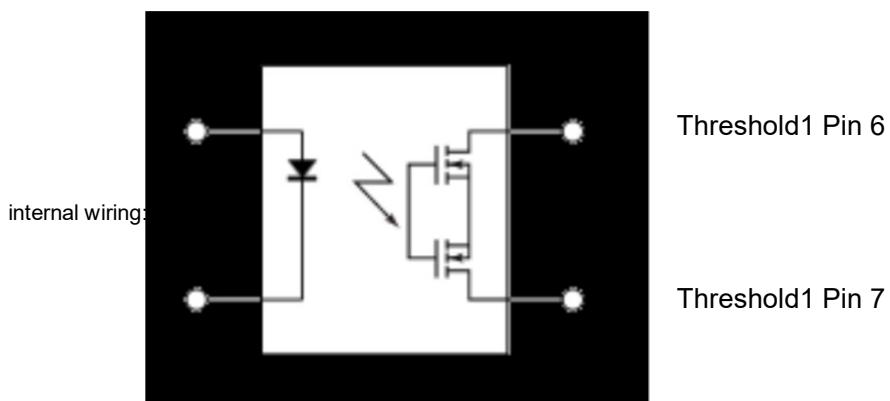
Analog & Switch Output 4..20mA (I20)*

Electrical Data I20		
Output @ 0kN	mA	4
Output @ F.S.	mA	20
Supply Voltage	V	9..28
Current Consumption	mA	35 (@ 24V)
Bandwidth	Hz	2000
Switching Output		Open Collector
max. Switching current	mA	100

Wiringcode: WC517			
Integrated Amplifier: GSV-6			
Cabling: M12 Male Socket / Flanschstecker (male)			
Supply(+)	Pin 1	Scale	Pin 5
Ground (-)	Pin 3	Threshold 1	Pin 6
Output	Pin 4	Threshold 2	Pin 7
Tare	Pin 2		

Ordernumber Add-On:
MBxxx-x-I20-x

Description for potential-free contact:



For the potential free contact the Photomos AQY212S is used.

Output	Load voltage (peak AC)	V_L	60 V
	Continuous load current	I_L	0.5 A
	Peak load current	I_{peak}	1.5 A
	Power dissipation	P_{out}	300 mW
Total power dissipation	P_T		350 mW
I/O isolation voltage	V_{iso}		1,500 V AC

Attention: Nipple orientation of connector is not fixed. In case of 90° connector - it is necessary to set by customer.

*Attention: With this output configuration is no negative signal (Tension) possible. Please ask our engineering for 4..12..20mA; 1..5..9V or ±10V versions.

Performance Level

MB1721 Review: A

1. Identification:

ISO 13849-1: 2015

Category B PL b (for systems using potential-free contact)

2. Classification:

Used standard: DIN EN ISO 13849-1: 2015

Performance Level: Plb

Category: B

MTTFd-value: 128 years (High)

3. Limits for the operation:

All technical information from datasheet have to be considered.

Deviations lead to loss of safety functions: Attention

Only use the loadpin within the temperature limits of -25° C to +55 ° C

Use the right range of supply voltage

Protect the loadpin of mechanical overload

4. Lifetime

The calculations are based on a lifetime of 20 years in continuous operation with a maximum duty cycles of from 260,000 cycles per year.

5. Error display:

Threshold output (potential-free contact):

No error display

Diagnostic coverage: No

6. SIL Correlation from ISO 13849-1: 2015 (Table 3)

SIL1 - PL b (for systems using threshold switch)

Batarow Made in Germany	Batarow Sensorik GmbH Gewerbegebiet 4 18276 Lüssow OT Karow	Mail: info@batarow.com Phone: +49 (0) 3843-855555 Fax : +49 (0) 3843-855556	Internet: www.batarow.com
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