

## MP23 - SERIES



### POTENTIOMETER, CONTACTLESS Ø 22 MM

*Potentiometer with programmable active angle*

- High ingress protection class IP68
- Contactless measuring principle
- No wearing parts and long useable life
- Small dimensions & flat design

Standard: 5 Vdc or 7-35 Vdc Power Supply  
Analog voltage output 0..5 Vdc or 0.5 - 4.5 Vdc

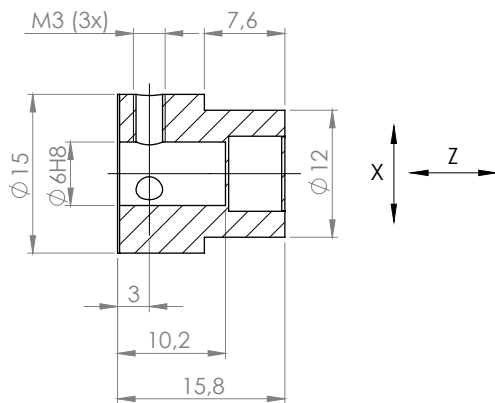
Options: Programmable active angle (20° to 360°)  
Programmable direction

The logo for emeta encoders, featuring a stylized blue wave icon to the left of the text 'emeta' in a bold, black, sans-serif font, with 'encoders' in a smaller, blue, sans-serif font below it.

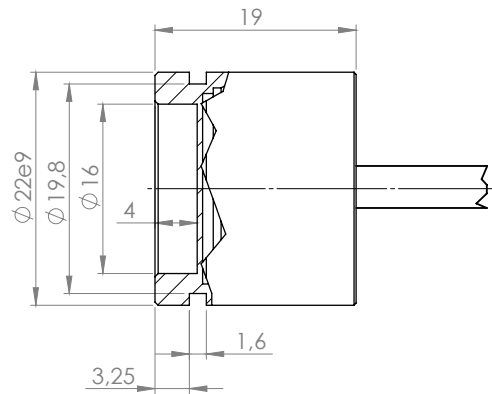
*Flexible and durable  
encoder for demanding  
applications*

## MAGNETIC CARRIER UNIT (ROTATING)

MAGNET ACCESSORY PART NO. 106001



## PICK-UP UNIT (STATIONARY)



### MOUNTING TOLERANCES

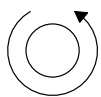
Z = 1,5 ± 1 mm  
X = 0 ± 0,25 mm

### ELECTRICAL SPECIFICATION

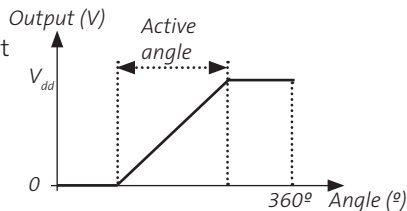
Power supply  $V_{dd} = 5 \text{ Vdc} \pm 10\%$  or 7-35Vdc  
 Current consumption Max 20 mA  
 Output circuit Analogue voltage  
 Output resistive load  $R_{min} = 100 \text{ k}\Omega$  (0 to  $V_{dd}$  output)  
 $R_{min} = 10 \text{ k}\Omega$  (10% to 90%  $V_{dd}$  output)  
 Output capacitance load  $C_{max} = 1 \text{ nF}$   
 Short circuit protected Yes

### OUTPUT SIGNAL & DIRECTION

Rotation seen from PICK-UP unit front



R = CW OR L = CCW



### OUTPUT CIRCUIT & PERFORMANCE

Resolution 12 bit  
 Direction Increasing voltage  
 Active angle 20° to 360° (set upon manufacturing)

### POWER SUPPLY & OUTPUT VOLTAGE PERFORMANCE

MP23A  $V_{dd} = 5 \text{ Vdc}, 0 \dots 5 \text{ V over active angle}$   
 MP23B  $V_{dd} = 5 \text{ Vdc}, 0.5 \dots 4.5 \text{ V over active angle}$   
 MP23C  $V_{dd} = 7-35 \text{ Vdc}, 0 \dots 5 \text{ V over active angle}$   
 MP23D  $V_{dd} = 7-35 \text{ Vdc}, 0.5 \dots 4.5 \text{ V over active angle}$

### MECHANICAL SPECIFICATION

Housing material Aluminum, electrically conductive for increased interference protection  
 Encapsulation class IP68 (IEC 60529)  
 Max. rotational speed 3000 rpm  
 Operating temperature -40° to +70°C  
 Storage temperature -40° to +70°C  
 Vibration 50g 20-2000 Hz (IEC 60068-2-6)  
 Chock 200g at 11 ms (IEC 60068-2-27)  
 Weight Approx. 30 g (without cable)

### CONNECTION TYPE

1XU Axial cable 0.25mm<sup>2</sup>, free cable length, X = No. meters  
 1XT Axial cable 0.5mm<sup>2</sup>, free cable length, X = No. meters

### FUNCTION

Model	MG23X-X-X-1XU	MG23X-X-X-1XT
Output CCW	Green	White
Output CW	Yellow	Black
+V	Brown	Red
0V	White	Blue

### ORDERING CODE

	MP23X - 0X - L360 - 1X
Model	_____
Direction (R/L)	_____
Active angle	_____
Connection	_____
X = meter cable	

### ACCESSORIES

Magnet carrier unit Part no. 106001