

## Series MOL40 / Optoelectronic Encoder Series

- Housing  $\varnothing$  40 mm
- 10 to 3600 ppr.
- 2 channels and index
- Supply voltage 5V, 12 bis 24V
- Clutch included in delivery
- Preference types from stock

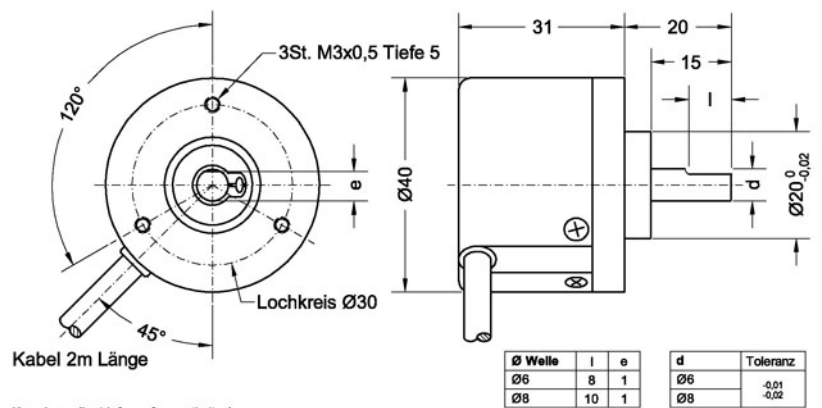
This well-priced, compact encoder covers a wide range of applications.

Rugged design features aluminium housing, metal shaft and ball bearings.

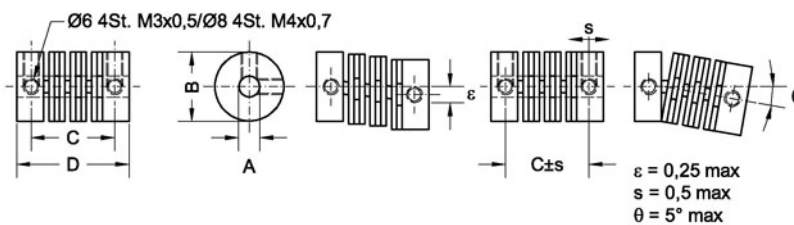
Available outputs: „Push-Pull“, „Open Collector“, „Voltage“ and „Linedriver“.



## Drawing



Kupplung (im Lieferumfang enthalten)

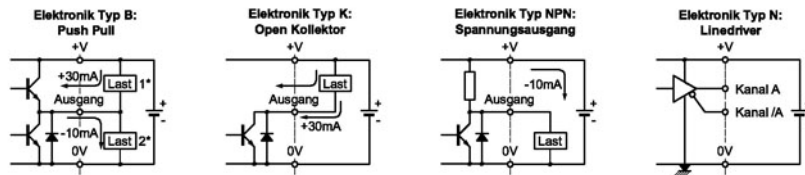


Kabelbelegung (Das Encodergehäuse ist mit dem Schirm verbunden.)

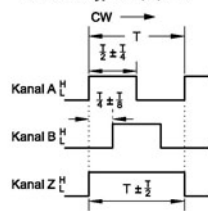
Elektronik Typ K, NPN, B		Elektronik Typ N	
Braun	UB	Braun	UB (5V)
Schwarz	Kanal A	Schwarz	Kanal A
Weiss	Kanal B	Rot	Kanal /A
Orange	Kanal Z	Weiss	Kanal B
Blau	GND	Grau	Kanal /B
Schirm		Orange	Kanal Z
		Gelb	Kanal /Z
		Blau	GND
		Schirm	

	A	B	C	D
Welle $\varnothing$ 6	$\varnothing$ 6 <sup>+0,1</sup>	$\varnothing$ 15	16,5	22
Welle $\varnothing$ 8	$\varnothing$ 8 <sup>+0,1</sup>	$\varnothing$ 19	18,2	25

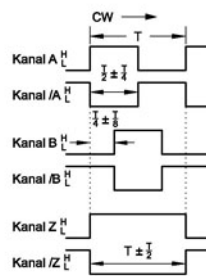
# Series MOL40 / Optoelectronic Encoder Series



Timing und Spannungspegel  
Elektronik Typen: B, K, NPN



Elektronik Typ N



Rechtsdrehende Achse (Blickrichtung auf Welle)

Elektronik	Flankenanstieg
B, K	1µs bei Isink 20mA und 2m Kabel
NPN	12-24V bei 820 Ohm
N	5V bei 4,7 kOhm
	0,5µs bei Isink 20mA und 2m Kabel

Elektronik	Signalpegel
B	Low bei 30mA max 0,4VDC High bei 10mA min Ub -1,5VDC
K	Low bei 30mA max 0,4VDC
NPN	Low bei 10mA max 0,4VDC
N	Low bei 20mA max 0,5V High bei -20mA min Ub 2,5V

Electrical Data	NPN / K / B	N
Resolution	10 bis 3600 ppr	
Channels	A, B, Z	A / A, B / BZ / Z
Frequency response	180 kHz	
Supply voltage	5V ± 5% / 11,4V - 25,2V	5V ± 5%
Current consumption (no load)	60 mA	50 mA

Mechanical Data	
Bearing	ball bearing
Maximum speed	5000 rpm
Moment of inertia	2 x 10 <sup>6</sup> kg m <sup>2</sup>
Starting torque	0,4 Ncm
Weight	120 g

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## Other Data

Protection class	IP50
Betriebstemperatur	-10 .. +70° C
Operating temperature	-25 .. +85° C
Housing material	Aluminium
Disc material	Plastic
Vibration	1,5mm amplitude 10-55Hz in X, Y, Z direction 2h
Maximum shock	50 g

## Options and Order Description

Series MOL40	MOL40			
<u>Shaft diameter</u>				
6 mm		6		
8 mm		8 (*)		
<u>Resolution [Pulses per revolution]</u>				
			10 (*)	
			50 (*)	
			100 (*)	
			256 (*)	
			<b>360</b>	
			500 (*)	
			1000 (*)	
			<b>1024</b>	
			1200 (*)	
			1500 (*)	
			1800 (*)	
			2000 (*)	
			2048 (*)	
			2500 (*)	
			3000 (*)	
			<b>3600</b>	
<u>Electronics</u>				
VSUP 12-24 V; 2 Channels with index; Push Pull output				<b>1224 BZ B</b>
VSUP 5 V; 2 Channels with index; Linedriver output				<b>5 BZ N</b>

"bold print = standard option"

short-term stock types can be found on: <http://www.megatron.de/en/stocklists/angle-sensors/lagerliste.html>

(\*) = on request available for projects

23.02.2015