

Main features

∅ 120 through hollow shaft encoder series designed for motors with big shaft.

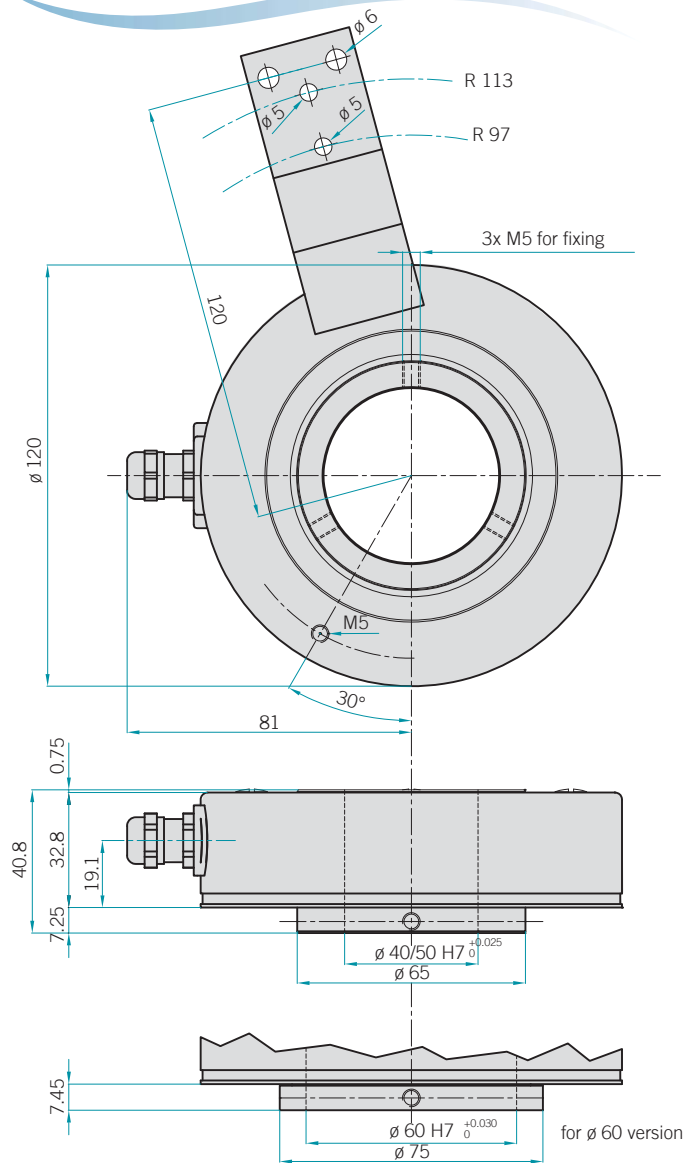
- Up to 60 mm bore diameter
- Easy and steady fixing
- Sturdy mechanics
- Up to 2048 ppr with zero signal
- Several output types available
- Up to 28 V DC power supply
- Up to 100 kHz output frequency
- Up to 3000 RPM rotation speed
- Up to IP54 sealing



Ordering code

EL 120 P 500 Z 5 N 50 X 3 P R . XXX															
incremental encoder series EL		size 120		Type of flange through hollow shaft P		Resolution ppr from 1 to 2048 <i>please directly contact our offices for pulses availability</i>		Zero pulse without zero pulse S with zero pulse Z		Power supply 5÷28 V DC 5/28 <i>line driver available only with 5 V DC or 8÷24 V DC power supply</i>		full stop to separate special versions		special version code numbered from 001 to 999	
												R radial			
												P cable output with SKINTOP® (standard length 0.5 m)			
												Max. rotation speed 3 3000 RPM			
												Enclosure rating X IP54			
												Bore diameter 40 ∅ 40 mm 50 ∅ 50 mm 60 ∅ 60 mm			
												Output type N NPN C NPN open collector P push-pull L line driver <i>please refer to page 92 for optionals about output types</i>			

EL 120 P



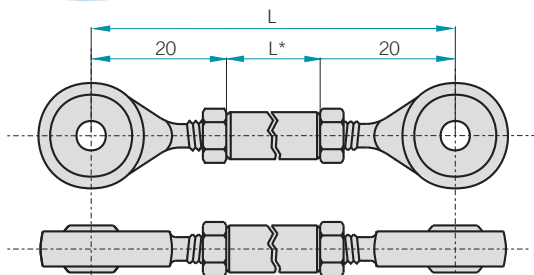
Electrical specifications

Resolution	from 1 to 2048 ppr
Power supply	5 V DC 8÷24 V DC
Current consumption without load	100 mA max.
Max. load current	50 mA for channel 20 mA for channel (line driver)
Output type	line driver push-pull
Max. output frequency	100 kHz
Operating frequency	$F = \frac{\text{RPM} \cdot \text{Resolution}}{60}$

Mechanical specifications

Bore diameter	ø 40 / 50 / 60 mm
Enclosure rating	IP54
Max. rotation speed	3000 RPM
Bearings	2 ball bearings
Shaft material	aluminium UNI 9002/5
Housing material	aluminium UNI 9002/5
Operating temperature	0÷60 °C
Storage temperature	-25÷70 °C
Weight	750 g

ACCESSORIES Articulated joints



* See below for arm length

Available articulated joints

L* = 30 mm Ordering code: SN5A30

L* = 60 mm Ordering code: SN5A60

L* = 90 mm Ordering code: SN5A90

HOW TO MOUNT IT

- 1) Couple the encoder shaft with the motor shaft.
- 2) Fix the spring to the motor flange without tightening it.
- 3) Fix the encoder shaft by the metal ring.
- 4) Block the spring.

