

EV A / B ELECTRONIC HAND WHEEL SERIES

Electronic hand-wheel

Series of electronic hand wheels studied for the positioning on the numerical control machines with manual drive.

- Resolutions up to 10000 imp/turn with zero
- Different electronic configurations available with power supply up to 28 Vdc
- Max output frequency up to 100 KHz
- Output : cable and connector
- Various flanges available



Ordering Codes

EV A 100 Z 5 L 10 M R . XXX

In case of particular Customer variant separate with a full stop

EV = electronic hand wheels

A = mod. EV A
B = mod. EV B

Type of flange

from **1** to **10000** imp./turn

Resolutions

N.B.: For impulse availability contact directly our offices

S = without zero impulse
Z = with zero impulse

Zero impulse

5
8 ÷ 28

Encoder power supply (Vdc)

N.B.: LINE DRIVER available with 5 Vdc or 8 ÷ 24 Vdc power supply

XXX = Particular Customer variants indicated by a progressive number from 001 to 999

A = axial
R = radial

P = standard cable length 1.5 m

M = connector MS3106E 16S-1S or 18-1S

J = connector JMSP 1607 F or 1610 F

10 = ø 10 mm

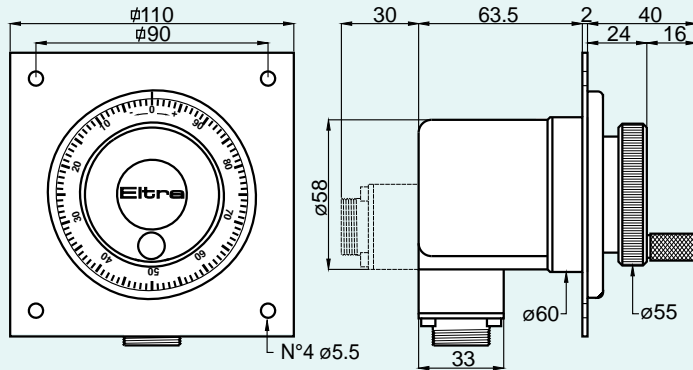
Shaft diameter

N = NPN
C = NPN OPEN COLLECTOR
P = PUSH PULL
L = LINE DRIVER

Electronic output configurations

N.B.: For the optionals on output configurations see the output incremental connections card

EVA

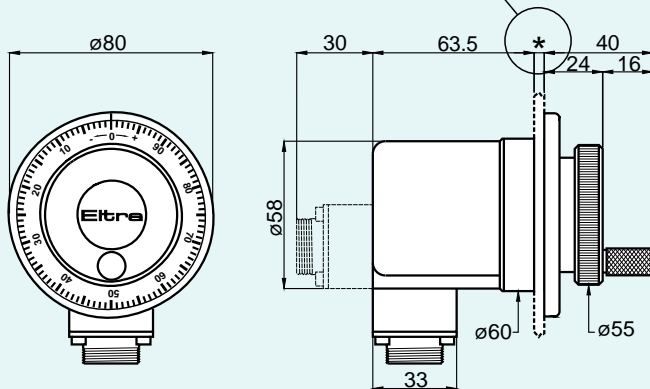
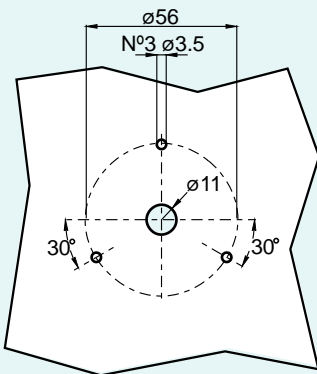


Electronic Characteristics

Resolution	From 1 to 10000 impulses / turn
Power supply	5 Vdc / 8 ÷ 28 Vdc N.B.: LINE DRIVER only with 5 / 8 ÷ 24 Vdc power supply
Current consumption without load	50 mA bidirectional 100 mA bidirectional with zero
Max output current	50 mA per channel 20 mA per channel with LINE DRIVER
Electronic output configuration	NPN / NPN OPEN COLLECTOR / PUSH PULL / LINE DRIVER
Max output frequency	Max 100 KHz
Frequency calculation	$F = \frac{\text{RPM} \times \text{resolution}}{60}$

EVB

HOLES ON THE MOUNTING PLATE



Mechanical Characteristic

Shaft diameter (mm)	ø10 g6
Protection	IP64 - Standard
Mechanical lines per turn	100
Shock	50 G per 11 msec
Vibrations	10G 10 ÷ 2000 Hz
Bearings Life	10 ⁹ revolutions
Bearings	n°2 ball bearings
Shaft Material	Stainless steel AISI303
Body Material	Aluminium D11S - UNI 9002/5
Cover material	Special plastic reinforced with glass fibre
Operating Temperature	0° ÷ +60°C
Storage temperature	-25° ÷ +70°C
Weight	450 g

