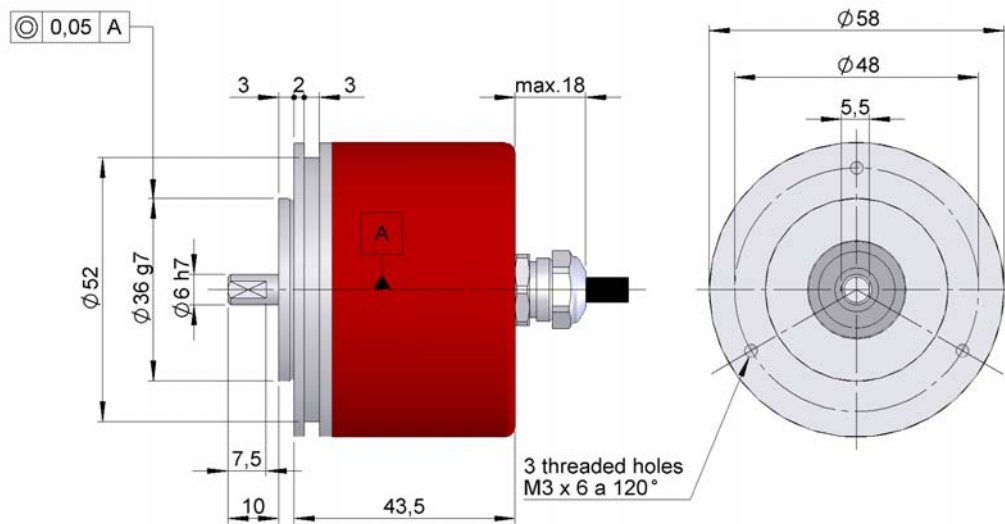
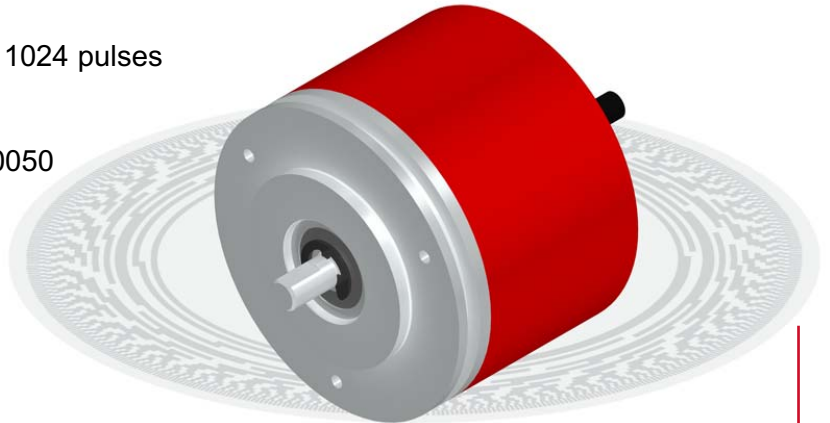


SERIE 20

SOLID SHAFT INCREMENTAL ENCODER FOR SIMPLE INDUSTRIAL APPLICATIONS

- Any number of pulses available from 1 to 1024 pulses
- External diameter 58 mm
- Shaft 6 mm
- Protection class IP54 according to DIN 40050
- Different flanges available
- Connection by cable (any cable length available or air industrial connector)



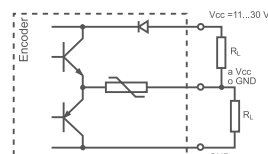
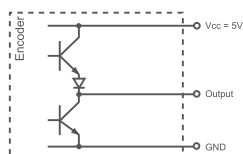
Previous mounting and installation of the encoder is recommended to read the section "TECHNICAL CONSIDERATIONS".

MECHANICAL SPECIFICATIONS

Housing	Aluminium.
Shaft	Stainless Steel.
Bearings	Ballraces.
Bearings lifetime	1x10 ¹⁰ rev.
Maximum number of revolutions permitted mechanically	6000 rpm.
Protection against dust and splashes according to DIN 40050	IP54.
Rotor inertia moment	10 gcm ² .
Starting torque at 20°C (68°F) ,	Max. / 0,5 Ncm.
Maximum load permitted on axial shaft	20 N.
Maximum load permitted on radial shaft	30 N.
Weight aprox.	0,3 Kg.
Operating temperature range	-20°C to +60°C.
Vibration	100 m/s ² (10Hz...2000Hz).
Shock	1000 m/s ² (6ms).
Maximum pulses per turn	1.024.
Axial connection	Cable 2 metres (other cable lengths available on order).

ELECTRICAL SPECIFICATIONS

OUTPUT SIGNALS



TTL

Push-Pull

Power supply	5 V	11...30V
Consumption	Typical: 120 mA Max: 150 mA	Typical: 45 mA Max: 150 mA
Max. load capability	±40 mA	±30 mA
Length of cable allowed	100 m	50 m
"Low" signal level	$V_{OL} < 0,2 V$	$V_{OL} < 2,5 V$
"High" signal level	$V_{OH} > 2,4 V$	$V_{OH} > V_{CC} - 3 V$
Frequency	100 kHz	200 kHz
Short circuit protection	Yes	Yes
Protection against polarity inversion	No	Yes
Channel B leads (90° electric) channel A		

CONNECTION



Cable 5x0.14

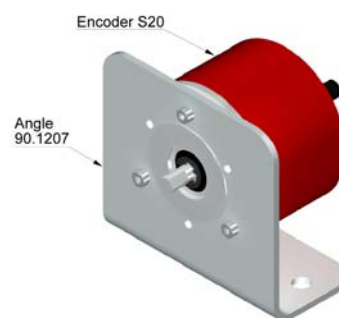
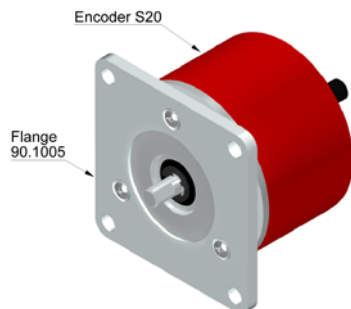
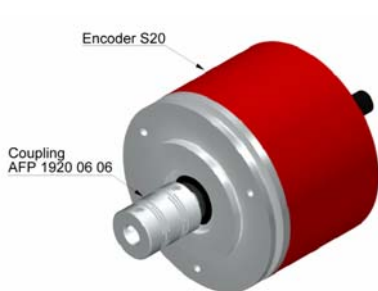
Cable 3x2x0,14+2x0,34

GND	Yellow	Black
Vcc	White	Red
A	Brown	Yellow
B	Green	Green
A inverted		Brown
B inverted		Blue
0 (reference)	Grey	Grey
0 inverted	Grey	Orange

ORDERING CODE

SERIE	SHAFT	FLANGE	OUTPUT SIGNALS	CONNECTION	ELECTRONIC OUTPUT	PULSES NUMBER	SPECIAL CUSTOMER
20	● 1- Ø6 x 10 mm	● 1-None 2- 90.1002 3- 90.1004 4- 90.1005	● 1- A 2- A + B 3- A + B + 0 5- A + B 6- A + B + 0 9- A + B + 0	● 2- Axial cable	● 1- Push-Pull 11..30V 2- Line driver. TTL 5V.	●●●●●	●●●●●

ACCESSORIES



All the accessories available in the sections "SIGNAL CONDITIONERS" and "MOUNTING ACCESSORIES".