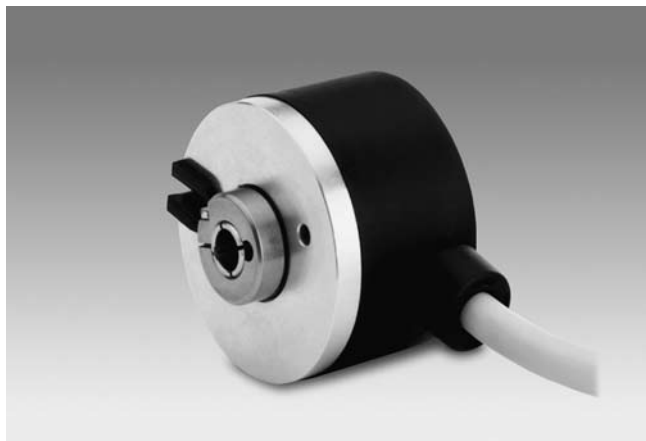


Incremental encoders

Mini series, with hollow shaft

Resolution 5...2048 pulses

GI338



GI338 with hollow shaft

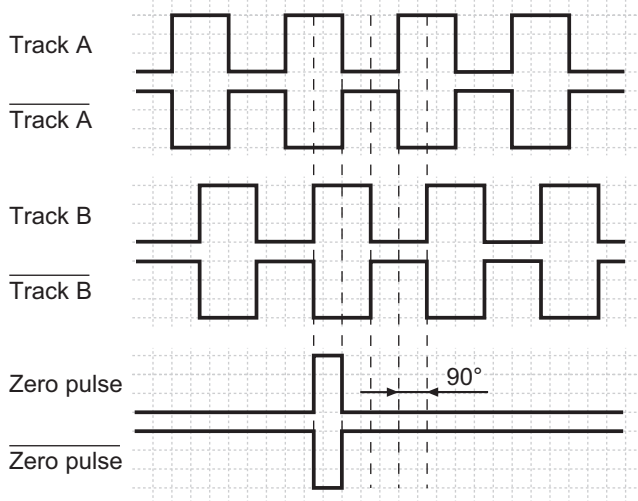
Technical data - electrical ratings

Voltage supply	5 VDC $\pm 10\%$ 10...30 VDC
Reverse polarity protection	Yes (10...30 VDC)
Consumption w/o load	≤ 60 mA
Resolution (steps/turn)	5...2048
Reference signal	Zero pulse, width 90°
Sensing method	Optical
Output frequency	≤ 100 kHz
Output signals	A 90° B, N + inverted
Output circuit	Linedriver RS422 Push-pull short-circuit proof
Interference immunity	DIN EN 61000-6-2
Emitted interference	DIN EN 61000-6-4

Output signals

Clockwise rotating direction when looking at flange.

Output signals 5 VDC, linedriver



Features

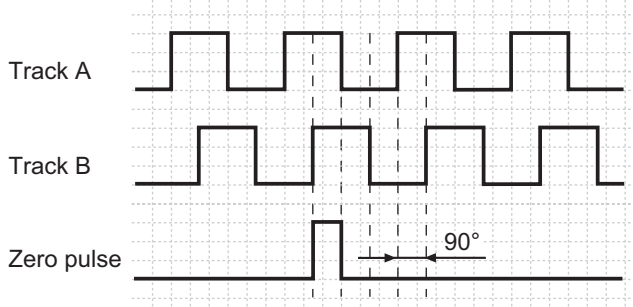
- Mini encoder with end or hollow shaft
- Resolution max. 2048 ppr
- Housing $\varnothing 40$ mm
- High rotation speed max. 12000 rpm
- Operating temperature range $-20...+85^\circ\text{C}$
- End shaft up to $\varnothing 12$ mm, hollow shaft up to $\varnothing 6$ mm
- Cost-efficient mounting

Technical data - mechanical design

Housing	$\varnothing 40$ mm
Shaft	$\varnothing 6$ mm hollow shaft $\varnothing 8$ mm end shaft $\varnothing 12$ mm end shaft
Protection DIN EN 60529	IP 42 IP 65
Operating speed	≤ 6000 rpm IP 65 ≤ 12000 rpm IP 42
Materials	Housing: polyamide black Flange: aluminium Shaft: stainless
Operating temperature	$-20...+85^\circ\text{C}$
Relative humidity	95 % non-condensing
Resistance	DIN EN 60068-2-6 Vibration 10 g, 16-200 Hz DIN EN 60068-2-27 Shock 50 g, 11 ms
Weight approx.	85 g
E-connection	Cable 1 m

Clockwise rotating direction when looking at flange.

Output signals 10...30 VDC, push-pull



Incremental encoders

Mini series, with hollow shaft

Resolution 5...2048 pulses

GI338

Part number

GI338.			41	
				See part number (pulses)
				E-connection
			41	Cable 1 m, radial
				Voltage supply / signals
			22	5 VDC / linedriver RS422
			60	10...30 VDC / push-pull
				Hollow shaft
			0	Hollow shaft ø6 mm torque support / IP 65
			1	Hollow shaft ø6 mm spring washer / IP 65
			3	End shaft ø8 mm spring coupling / IP 65
			4	Hollow shaft ø6 mm torque support / IP 42
			7	End shaft ø12 mm spring coupling / IP 65

Part number (pulses)

49 (5)	06 (200)	15 (500)	29 (2048)
39 (50)	09 (250)	22 (1000)	
40 (60)	13 (360)	23 (1024)	
41 (100)	14 (400)	28 (2000)	

Other pulse numbers upon request.
Example: ordering key 23 = 1024 pulses

Terminal assignment

Linedriver

Core colour	Assignment
brown	UB
green	Track A
red	Track A inv.
yellow	Track B
blue	Track B inv.
pink	Track N (zero pulse)
grey	Track N inv. (zero pulse inv.)
white	GND

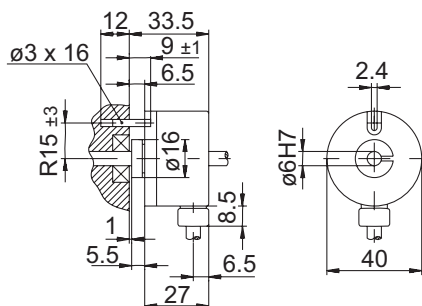
Push-pull

Core colour	Assignment
brown	UB
green	Track A
yellow	Track B
pink	Track N (zero pulse)
white	GND

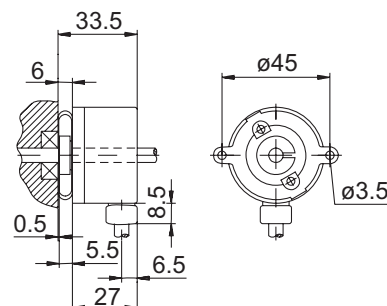
Please use cores twisted in pairs (for example track A / track A inv.) for extension cables of more than 10 m length.

Dimensions

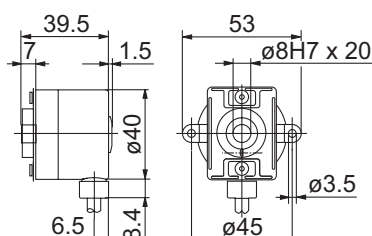
GI338 hollow shaft ø6 mm / torque support



GI338 hollow shaft ø6 mm / spring washer



GI338 end shaft ø8 mm



GI338 end shaft ø12 mm

