

Angle Sensor non-contacting

Series RSC3200



Special features

- non-contacting, magnetic measuring principle (Hall effect)
- redundant system
- measuring range up to 360°
- temperature range -40° up to +125° C
- easy mounting
- protection classs IP6K7 / IP6K9K
- long life
- good price/performance ratio

The non-contacting, magnetic sensor utilizes the orientation of a magnetic field for the determination of the measurement angle. The magnetic field orientation is captured with an integrated circuit. An analog output signal represents the calculated angle.

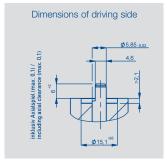
The housing is made of a special high grade temperatureresistant plastic material. Two fixings with brass bushings allow a simple and secure mounting of the sensor. The mechanical customerside interface is made for a standard 6 mm D-shaft, which also carries out the bearing function of the magnet carrier in the sensor. Due to the insert shaft a fast and easy mounting is permitted.

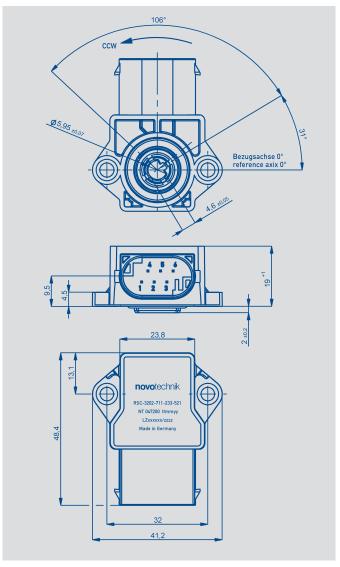
Because of its compact and wear-free design the sensor is very robust against environmental influences like vibrations, temperature variations, dirt and humidity.

The sensor is suitable for use in all kinds of rough environment for example close to engines in automotive applications.

The 6-pin AMP-Tyco-MQS-connector offers a popular and reliable plug connection.

Further types with different electrical angles and contact variations are available upon request.





Description

Housing	high-grade, temperature-resistant plastic	
Integrated shaft coupling	high-grade plastic	
Electrical connections	integrated 6-pin AMP/Tyco MQS-connector, coding A, tinned contacts, AMP drawing: 114-18063-126 rev.A1 (mating connector: AMP P/N 1-967616-1)	
Sealing	O-ring	

Novotechnik Messwertaufnehmer OHG

Postfach 4220 73745 Ostfildern (Ruit) Horbstraße 12 73760 Ostfildern (Ruit)

Tel. +49 71144 89-0 Fax +49 711 44 89-118 info@novotechnik.de www.novotechnik.de

© 11/2012 Subject to changes Printed in Germany

Mechanical Data		
Dimensions	see dimension drawing	
Mounting	with 2 cylinder screws M4	
Mechanical angle	360 continuous	۰
Mounting torque of clamps		
at housing flange	2 3	Nm
Weight	ca. 25	g
Electrical Data		
Supply voltage Ub	5 ±0.5	VDC
No-load supply current	typ. 16	mA
Reverse voltage	yes, only supply lines	
Short circuit protection	Signal to GND and Ub	
Update rate	2500 typ.	measures/s
Resolution	12	bit
Measuring range	angle versions up to 360	۰
Repeatability	±0,5	۰
Linearity	±2	%
Output signal	ratiometric to Ub	
	0.25 4.75	V
	0.54.5	V
	load \geq 10 k Ω	
TC	typ. 70 (0360°)	ppm/K
Environmental Data		
Temperature range	-40+125	°C
Vibration (DIN EN 60068-2-6)	sinus 5 2000 Hz, 0.75 mm, 20 g	
Shock (DIN EN 60068-2-27)	50 g, 11 ms	
Protection class (ISO 20653)	IP6K7 / IP6K9K (mounted with O-ring)	
EMC-conformity:	ISO 11452-2	
	ISO 11452-5	
	ISO 10605 (Kap. 5.2)	
	ISO 10605 (Kap. 5.3)	
	CSIPR 25	
Ordering specifications		

047200

Electr. angle

106°

Necessary accessories

Connector (female) with AMP P/N 1-967616-1.

RSC-3202-711-233-521
Other versions on request.

Туре