

# Temposonics®

Absolute, Non-Contact Position Sensors

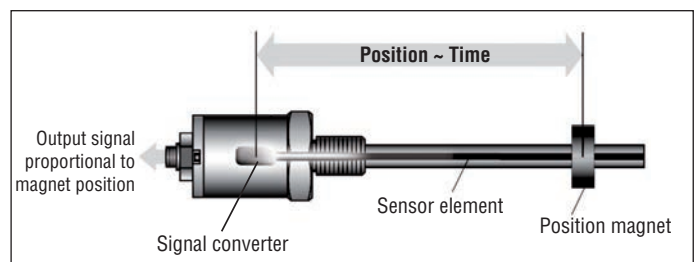
## Data Sheet R-Series Rod Model RS

**Temposonics® RS**  
Stroke length 50...7600 mm



**Position sensor with  
IP69K super shield housing**

- Rugged industrial sensor
- Linear and absolute measurement
- Contactless sensing with highest durability
- Analog / SSI / CANbus / DeviceNet / Profibus / EtherCAT
- Sealed IP68 / IP69K



The extremely robust **Temposonics® RS** sensor with super shield housing ensures long-term linear position measurement in the harshest environments. Hermetically sealed with a housing completely made of stainless steel, it meets the requirements of protection modes IP68 and IP69K and is reliably shielded against corrosion and penetration of dirt and water.

Due to non-contact measuring technology, sensor integration into a hermetically sealed housing is possible. A position magnet moves along the outside of the pressure-resistant sensor pipe and marks the position without mechanical contact. For level measurement, an optional float can be used. The modular sensor cartridge design enables the customer to choose the specific sensor output configurations to be installed within the super shield housing to best fit their application requirements. The measuring accuracy and all technical data correspond to the features of the sensor selected inside the housing. A wide choice of interfaces (Analog, Profibus, SSI, CANbus, EtherCAT) is available. Moreover, integration of ATEX-certified and intrinsically safe sensors is possible with the protective housing.

**Temposonics® RS** sensors are made to fit Temposonics® R-Series with analog and digital outputs. Fixed cable and connector versions can be used on the sensor side. When using standard sensors in this housing, you get a cost efficient solution for use in rugged applications.

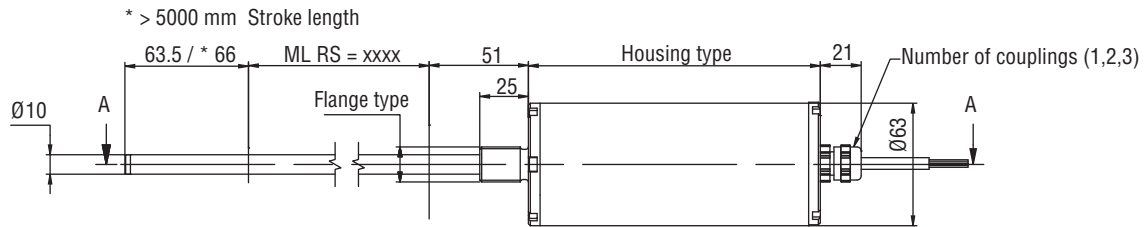
Several design combinations are available to fit your application: M18 or ¾"UNF mounting flange thread, various housing length, and single, dual or triple cable glands.

## Technical Data (depending on selected interface)

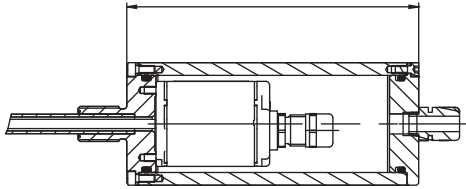
<b>Input</b>	
Stroke length	50...7600 mm
<b>Output</b>	
Interfaces	Analog, SSI, CANbus, Profibus, EtherCAT
<b>Operating conditions</b>	
Dew point, humidity	100% rel. humidity
Ingress protection	IP68 / IP69K
<b>Design, material</b>	
Sensor head	303/304 Stainless steel 316L (1.4404) on request
Sensor stroke	303/304 (1.4305) Stainless steel 316L on request
Pressure rating	350 bar, 700 bar peak
Position magnet	Ring magnet or magnet float
<b>Installation</b>	
Mounting position	Any orientation
Torque moment	< 50 Nm
Rod	Threaded flange M18 x 1.5 or ¾"-16 UNF-3A, Hex nut M18
<b>Electrical connection</b>	
Connection type	Integral cable pigtail termination

**Info:**

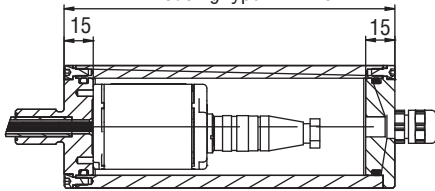
For detailed technical data and electrical connection for the outputs please see data sheets:  
R-Series Analog, SSI, CANbus, Profibus, EtherCAT.



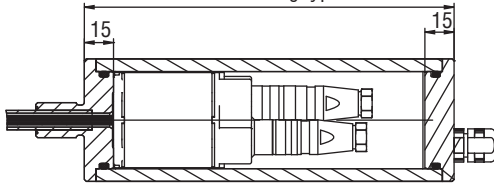
Type 1 Cable outlet  
Housing type 1 = 150



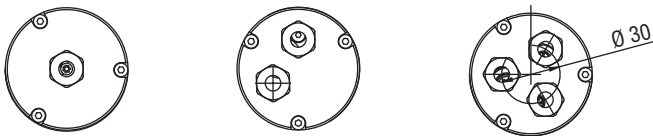
Type 2 Housing short  
Housing type 2 = 170



Type 3 Housing long  
Housing type 3 = 190



Lids according to the outputs.



Please use a standard strap wrench to mount the sensor.

Temposonics®

R

S

M

## Model

RS - Super shield sensor

## Design

M - Flange M18x1.5

S - Flange ¾" - 16 UNF - 3A

## Stroke length

0050...7600 mm

Standard: See chart

## Further parameter

See data sheets R-Series according to the required output

Analog / SSI / CANbus / Profibus / EtherCAT

### Magnets and accessories must be ordered separately.

#### Accessories

Ring magnet OD33, standard

U-magnet OD33

Ring magnet OD30.5

Position magnet 70x37.5

Block magnet

#### Part No.

201 542-2

251 416-2

402 316

252 185

403 448

Stroke Length	
Stroke Length	Ordering Steps
< 500 mm	5 mm
500...750 mm	10 mm
750...1000 mm	25 mm
1000...2500 mm	50 mm
2500...5000 mm	100 mm
> 5000 mm	250 mm

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