

## KH SERIES KH41 & 42 SHAFTLESS ROTARY POSITION SENSOR



The KH41/42 Series of Non Contact 2-Channel Rotary Position Sensors are designed to withstand the harsh environments of motorsport and automotive testing applications.

By using a proven 'Hall Effect' technology, the KH41/42 offers high performance and reliability at temperatures up to +150°C. Alternatively, it is capable of operational excellence in cold environments down to -40°C.

The sensor has no moving parts; a magnet is inserted into the moving component. The sensor detects movement and provides a linear output signal proportional to the rotational angle.

With a small and lightweight 23mm diameter body and standard size Flange Mounting, the KH41/42 Sensor is designed for use on throttle bodies, other installations include: gearbox and pedal position.

The sensor is available in either Single (3 wire) or Dual (6 wire) outputs.

## TECHNICAL SPECIFICATIONS

<b>Electrical Angles (Degrees)</b>	60° to 360° in 1° Increments. Standard Angles: 60°, 100°, 240°, 360°
<b>Supply</b>	5V or 6-30V (Max 32mA) Reverse Polarity Protected
<b>Output</b>	Please See Part Number Configurator For Options
<b>Resolution</b>	12 Bit
<b>Accuracy, Linearity</b>	±0.1%
<b>Accuracy, Hysteresis</b>	<0.1°
<b>Update Rate</b>	5KHz
<b>Mechanical Life</b>	> 25 Million Cycles at Max 150RPM
<b>Operating Temperature Range</b>	-40°C to +150°C
<b>Housing Material</b>	Aluminium
<b>Air Gap / Concentricity</b>	1-3mm Air Gap / 1-2mm Concentricity
<b>Track Technology</b>	Hall Effect, Non Contact
<b>Electrical Connection</b>	50cm 26AWG, 3/6 Wire, 55spec, FDR 25 Sleeve
<b>Protection Class</b>	IP67
<b>Weight</b>	20g
<b>Options</b>	Cable Length, Magnet Type and Labelling

Ka Sensors adopts a continuous development program which sometimes necessitates specification changes without notice.

## Sensors For Motorsport

### Features

- Shaftless Design
- Excellent Linearity
- High Temperature
- Lightweight
- IP67 Sealing
- Rugged Construction

### Applications

- Throttle Position
- Steering Angle
- Pedal Position
- Gear Position
- Aero Surfaces
- Actuators

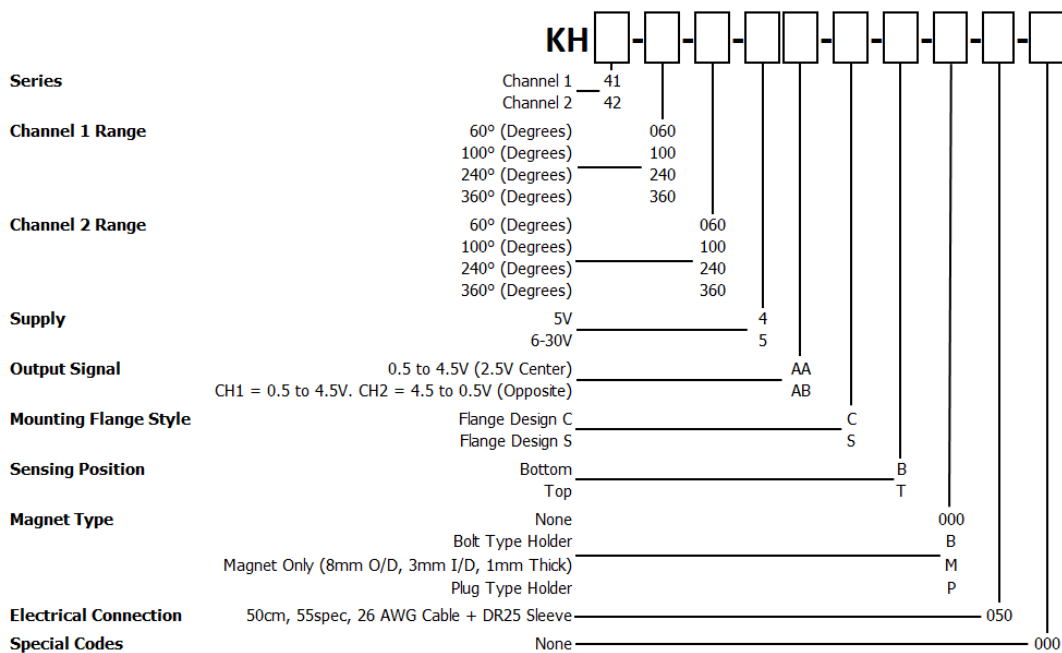
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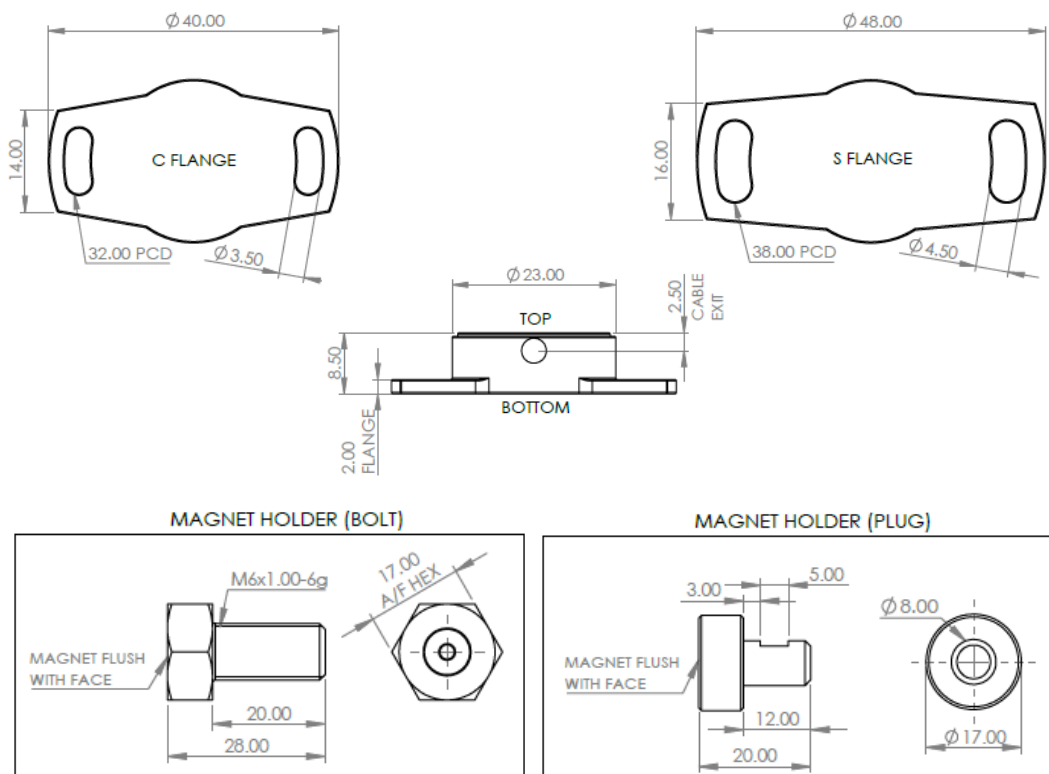
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# PART NUMBER CONFIGURATOR



The KA configuration tool is used to specify a standard KA Sensor, other options are available.

## MECHANICAL DETAILS



## CONNECTION DETAILS

	+Ve Supply	0V Supply	Signal
Single Output	Red	Black	Yellow
Dual Output	Brown	Blue	White

*Sense  
Analyse  
Control*

Services for:

- Data Logging
- Telemetry
- Controls
- Wiring

Contact us

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