**MMG 1070/. TS**
Eddy current displacement sensor

- **For Measurements of:**
  - Speed
  - Shaft Displacement
  - Shaft Vibration
- Contactless measurement according to the eddy current principle.
- Measurement of static and dynamic processes possible.
- Integrated electronics for signal processing in transducer housing.
- Operation in explosion hazardous areas possible.
- Transducer MMG 1070/. TS is available in four different dimensions.
- Suitable for industrial applications.
- Design meets common international standards, e.g. API 670, DIN 45670, VDI 2059

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**Application:**

The displacement transducer **MMG 1070/. TS** is designed to measure mechanical machine parameters such as shaft vibrations, shaft displacements and speeds. The measurement is contactless according to the eddy current principle on electrically conducting material. The necessary electronics for the signal processing is integrated in the transducer housing.

A complete measuring chain consists of a displacement transducer and a measuring amplifier, e.g. a monitor of the **MMS 6000** Machine Supervisory System.

The epro eddy current displacement transducer **MMG 1070/. TS** is available in seven different versions, who differ in the overall length, the usable thread length and the cable length of the transducer.
Technical Data:

Operating temperature range: 0...+100°C
Operating frequency range: 0...15 kHz (-3dB)
Displacement measuring range: 2,15 mm
Residual gap: approx. 0,5 mm
Sensitivity: 7,87 V/mm (200 mV/mil)
Mean voltage: -10,00 V
Voltage output limits: appt. -1,5...-21,5 V at U_supply = -24 V (or -1,5...-19,5 V at U_supply = -22 V)
Power supply: -24 V nominal (-18...-32 V)

Power consumption:
max. 15 mA, at nominal power and unloaded output
typical: 8...12 mA

Housing material:
material No.1.4541 (X10CrNiTi 1810)

Standard cable:
4 - core (4 x 0,2 mm²)
one supplementary core (0,5mm²)
at the cable end for screen connection
PTFE - isolation

Terminal connections:
red...................... SIGNAL
blue.................... - 24 Volt
black.................. 0 Volt
white................... 0 V, connected to black at the sensor
green/yellow........ SCREEN

Cable protection:
PG9-connection for cable protection is provided, e.g. MPT 064
Class of protection:
IP 67
Intrinsic safety protection:
II 1G, Ex ia IIC T6, Ta<53°C
II 1G, Ex ia IIC T4, Ta<60°C
II 1G, Ex ia IIC T3, Ta<90°C
PTB 03 ATEX 2151

Weight:
et / gros
Type .../1 TS appr. 0,6 kg / 0,7 kg
Type .../2 TS appr. 0,8 kg / 0,9 kg
Type .../3 TS appr. 1,1 kg / 1,2 kg
Type .../4 TS appr. 0,7 kg / 0,8 kg

Scope of supply:
- Core end tubing to be used for cable shortening
- Nut size 36

Dimensions:

Order codes:

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<th>Type</th>
<th>Length</th>
<th>Description</th>
<th>Order Code</th>
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<td>3m</td>
<td>Eddy current displacement sensor with 3 m cable</td>
<td>9200 – 00022</td>
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<tr>
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<td>3m</td>
<td>Eddy current displacement sensor with 3 m cable</td>
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<td>9200 – 00035</td>
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<td>10m</td>
<td>Eddy current displacement sensor with 10 m cable</td>
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Printed in Germany. Due to continued research and product development epro reserves the right to change these specifications without notice.