

KG-03 Spot-welded Extensometer

FEATURES

- Strain gauge transducer, impedance 350Ω
- Gauge factor: 2.00 nominal
- Two strain gauges at 90°
- IP 67 protection class
- Compact dimensions
- Robust design
- Material: stainless steel W. Nr. 1.4301 (AISI 304)
- Welded mounting on machined flat surface
- Low price

DESCRIPTION

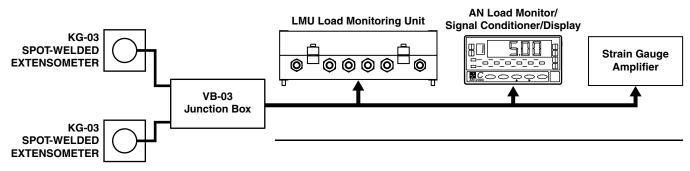
The Magtrol KG-03 Spot-welded Extensioneter with stainless steel base plate is designed to be fitted in a place where strain is maximum and proportional to the force being measured.



APPLICATIONS

KG-03 is ideally suited for welding to steel structures such as railway rails, load checking devices and similar long-term outdoor applications.

SYSTEM CONFIGURATION OPTIONS

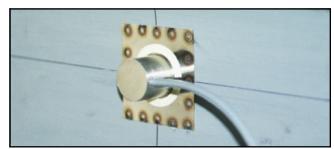


MOUNTING EXAMPLES

On request, Magtrol can provide either spot welding of the KG-03 Extensometer or end-user instruction.



Spot welding of KG-03 Extensometer on a rail

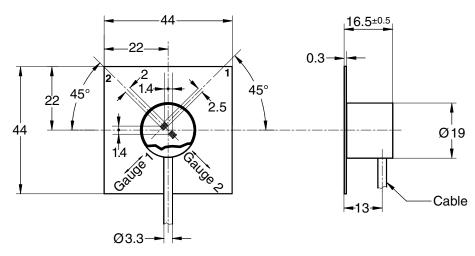


Completely welded KG-03 Extensometer on a rail

TECHNICAL RATINGS

MECHANICAL CHARACTERISTICS	
Maximal Usable Load	1.5 × nominal load
Strain Gauge Sealing • Leakage	Metallic, with laser welding and soldering $\leq 1.2 \times 10^{-7}$ cm ³ /s
ELECTRICAL CHARACTERISTICS	
Insulation Resistance	10 ¹⁰ Ω
Fatigue Resistance • Nominal Deformation	> 10^7 loading cycles of repeatable strain $\epsilon = 0$ to 350×10^{-6}
Dielectric Strength Between Gauges and Metallic Housing (according to IEC-255-4)	4 kV for pulse 1.2/50 μs 2 kV for alternating current 50 Hz, 60 sec.
ENVIRONMENTAL CHARACTERISTICS	
Compensated Temperature	-10 °C to +40 °C
Operating Temperature	-40 °C to +80 °C
Protection Class	IP 67
CONNECTION CABLE	
Shielded Cable Length	0.35 m (Other cable lengths available upon request.)
Pin Connections:	Color Code (according to DIN):
gauge 1	red
gauge 1	blue
gauge 2	white
gauge 2	black or yellow

DIMENSIONS



Due to the continual development of our products, we reserve the right to modify specifications without forewarning.



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