



TILTIX Inclinometer

ACS-080-2-SV10-HE2-PM

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FRABA



General Specifications

| | |
|-------------------|---|
| Application | 2-Axes Position Monitoring and Leveling |
| Measurement Range | $\pm 80^\circ$ |
| Absolute Accuracy | 0.10° |
| Resolution | 0.01° |

Electrical Specifications

| | |
|-----------------------------|----------------------|
| Supply Voltage | 10 - 30 VDC |
| Power Consumption (no load) | $\leq 0.7 \text{ W}$ |
| EMC: Emitted Interference | DIN EN 61000-6-4 |
| EMC: Noise Immunity | DIN EN 61000-6-2 |
| Reverse Polarity Protection | Yes |
| Short Circuit Protection | Yes |

Environmental Specifications

| | |
|-----------------------|--|
| Operating Temperature | $-40^\circ\text{C} (-40^\circ\text{F}) - +85^\circ\text{C} (+185^\circ\text{F})$ |
| Storage Temperature | $-40^\circ\text{C} (-40^\circ\text{F}) - +85^\circ\text{C} (+185^\circ\text{F})$ |
| Temperature Gradient | $0.004^\circ/\text{K}$ |
| Protection Class | IP66/IP67 |
| Shock Resistance | $\leq 100 \text{ g}$ (half sine 6 ms, EN 60068-2-27) |
| Vibration Resistance | 1.5 mm (10 Hz - 58 Hz) & $\leq 20 \text{ g}$ (58 Hz to 2000 Hz) |

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Mechanical Specifications

| | |
|------------------|---|
| Housing Material | Fibre-Reinforced PBT (Polybutylene Terephthalate) |
| Potting Material | PUR (Polyurethane) |
| Weight | 100 g (0.22 lb) |

Certificates / Lifetime

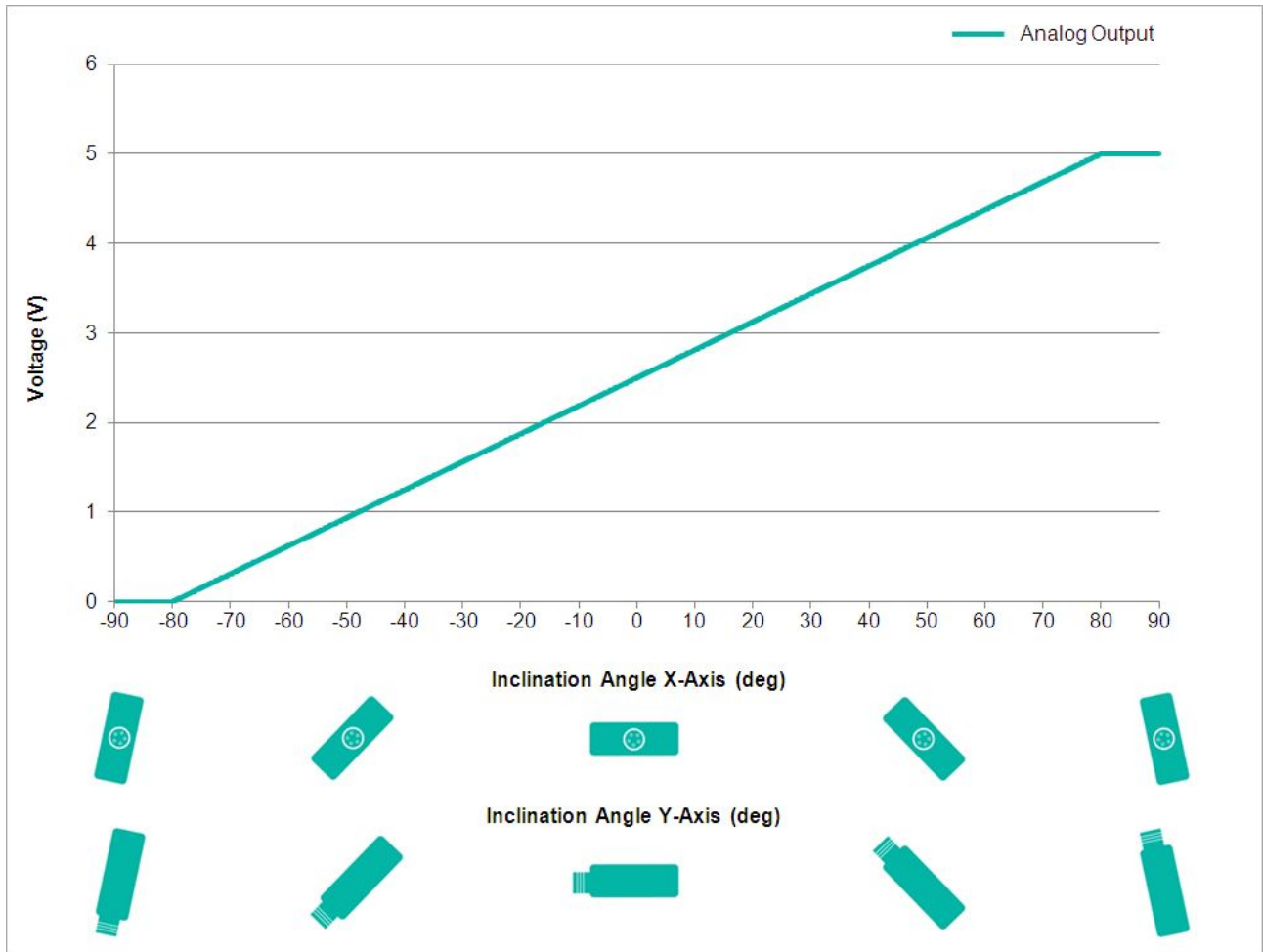
| | |
|--------------|-------------------|
| MTTF | 400 years @ 40 °C |
| Certificates | CE |

Interface

| | |
|---------------------------|--|
| Interface | Analog Voltage 0-5 V + RS232 |
| Teach In | Zero Positioning, Inverse Direction, Elevation Range Programming |
| Settling Time | 125 ms |
| Output Type | Voltage 0 - 5 V |
| Min Load Resistance | 5 kΩ |
| Transmission Rate | RS232: min. 1200 Baud; max. 115200 Baud |
| Default Transmission Rate | RS232: 9600 Baud |
| Linearity | ± 0.02% |

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Electrical Connection

| | |
|-----------------|---------------------------|
| Connection Type | Connector M12 |
| Connector | M12, Male, 8 pin, a coded |

Product Life Cycle

| | |
|--------------------|-------------|
| Product Life Cycle | Established |
|--------------------|-------------|

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Connection Plan

| SIGNAL | PIN NUMBER |
|------------------------|------------|
| Power Supply | 1 |
| GND | 4 |
| X-Axis, Voltage Output | 5 |
| Y-Axis, Voltage Output | 7 |
| Set1 | 6 |
| Set2 | 8 |
| RxD | 2 |
| TxD | 3 |

Dimensional Drawing



[2D Drawing](#)

Accessories

Cable/Connectors

- 5m PUR Cable, 8pin, A-Coded, f
- 10m PUR Cable, 8pin, A-Coded, f
- 2m PUR Cable, 8pin, A-Coded, f
- 10m PUR Cable, 8pin, A-Coded, f
- M12, 8pin A-Coded, Female
- More

Contact

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All dimension in [inch] mm. This drawing and the information contained is for general presentation purposes only. Please refer to the "Download" section for detailed technical drawings. © FRABA B.V., All rights reserved. We do not assume responsibility for technical inaccuracies or omissions. Specifications are subject to change without notice.