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# XT50 CAN extensometer



## product description

The XT50 CAN is a fully welded, stainless steel bolt-on extensometer, designed for load and stress monitoring in structural parts, overload sensing, and stability control on mobile and stationary construction and agricultural equipment.

Ideal for stiff structures, the XT50 CAN features low activation force and high-resolution output proportional to elastic deformation. Its bolt-on design ensures straightforward installation without adhesives.

An embedded CAN board transforms the XT50 into a fully digital extensometer, enabling direct CAN communication without requiring external signal converters. This ensures seamless integration into modern monitoring and control systems.

Setup is straightforward and can be performed with a terminal emulation program or the Flintec FDC application, available from [flintec.com](http://flintec.com).

## applications

Load and stress monitoring in structural parts, overload sensing and stability control on mobile and stationary construction and agricultural equipment.

## accessories + options

Compatible on-board load moment indication electronics

Default: Free leads; Optional: M12, 5-pin male code-A connector

## key features

Fully welded, stainless steel construction

Hermetically sealed to IP68 for extreme durability

High resolution with low activation force

Bolt-on installation—no adhesives required

Shielded cable for improved signal integrity

Embedded CAN output (user-selectable CANopen or J1939)

Software-configurable parameters for flexible integration

Works with Flintec FDC application for analysis & configuration



RoHS  
compliant



## specifications

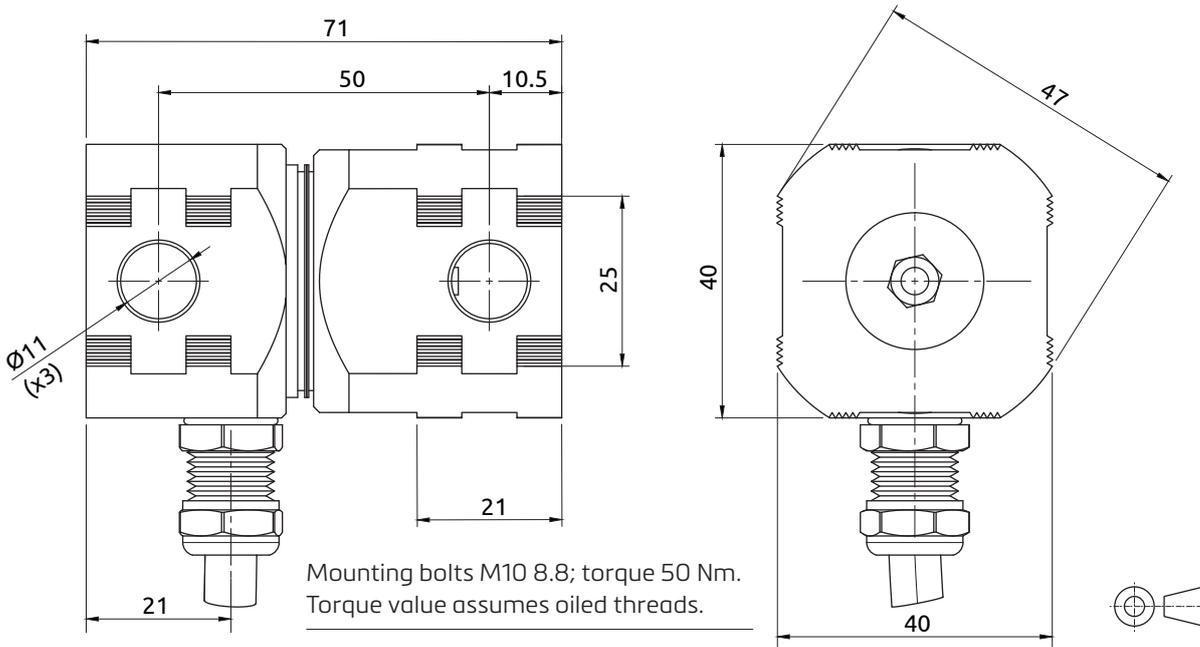
|                                |     |                                  |
|--------------------------------|-----|----------------------------------|
| Model                          | -   | XT50-CAN                         |
| Zero reset pulse length        | ms  | -                                |
| Zero Balance                   | %RO | ≤ ± 5                            |
| Compensated temperature range  | °C  | -10...+40                        |
| Sensor material                | -   | stainless steel 17-4 PH (1.4548) |
| Sealing                        | -   | complete hermetic sealing        |
| Protection according EN 60 529 | -   | IP68 (up to 2 m water depth)     |
| Weight                         | g   | 610 (3m cable)                   |

## embedded CAN board specifications

|   |        |   |
|---|--------|---|
| Board model                               | -      | CED-20  |
| Supply voltage                            | VDC    | 9–32  |
| Supply reversal protection                | -      | Yes   |
| Overvoltage protection                    | -      | Yes   |
| Software enabled CAN termination resistor | -      | Yes   |
| Operating temperature range               | °C     | -20 to +70  |
| Storage temperature range                 | °C     | -40 to +80  |
| ADC type                                  | -      | 24-bit Sigma-Delta                                    |
| Digital filters                           | -      | Rolling average, IIR                                  |
| CAN output cable                          | -      | Free leads or an M12, 5-pin male Code A connector     |
| Protocols supported                       | -      | CANopen (default), J1939 (selectable)                 |
| Baud rates (CANopen)                      | bits/s | 10k, 20k, 50k, 125k, 250k, <b>500k</b> , 800k, 1,000k |
| Baud rates (J1939)                        | bits/s | 250k  |
| Update rates (CANopen)                    | Hz     | 5 to 2,500  |
| Update rates (J1939)                      | Hz     | 5 to 1,600  |
| Designed to meet                          | -      | Regulation 10, ISO 13766:2018, ISO 14982:1998         |

The embedded CAN board includes components designed to meet standards such as Regulation 10, ISO 13766:2018, and ISO 14982:1998. However, it is not currently certified for these standards. Customers requiring compliance must confirm suitability with their regulatory requirements.

## product dimensions (mm)



## wiring

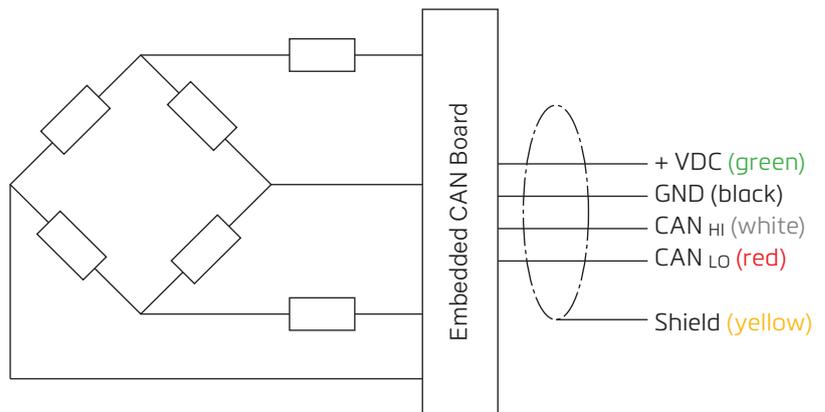
The load cell is provided with a shielded, 4 conductor cable (AWG 24).

Cable jacket: polyurethane

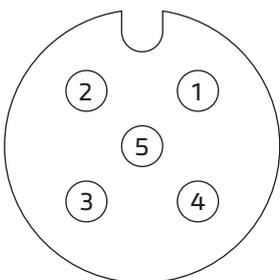
Cable length: 3m

Cable diameter: 5.5mm

The shield is floating (On request the shield can be connected to the load cell body)



## M12 5-PIN Male Code A



| Pin | Function          | Colour |
|-----|-------------------|--------|
| 1*  | Shield**          | Yellow |
| 2   | + VDC             | Green  |
| 3   | GND               | Black  |
| 4   | CAN <sub>HI</sub> | White  |
| 5   | CAN <sub>LO</sub> | Red    |

\* Pin 1 shield connection is optional.

\*\* Shield connected at sensor is optional.

Specifications and dimensions are subject to change without notice.