

F325 High Accuracy Web Tension Loadcell

Standard Ranges 50, 100, 200 and 500N (5 to 50kgf)

- ✓ Very high precision
- ✓ Precision alignment tool facility
- ✓ Standard bearing mounting
- ✓ Mounting foot provision
- ✓ Optional mounting flange
- ✓ Traceable calibration with certificate included in the standard price



Specification

| Parameter | Value | Unit |
|--|------------|--------------------|
| Non-linearity - Terminal | ±0.03 | % RL |
| Hysteresis | ±0.03 | % RL |
| Creep - 20 minutes | ±0.05 | % AL |
| Repeatability | ±0.01 | % RL |
| Rated output - Nominal | 1.2 | mV/V |
| Rated output - Rationalised | 1.0 | mV/V |
| Rationalisation tolerance | ±0.1 | % RL |
| Zero load output | ±4 | % RL |
| Temperature effect on rated output per $\hat{A}^{\circ}\text{C}$ | ±0.005 | % AL |
| Temperature effect on zero load output per $\hat{A}^{\circ}\text{C}$ | ±0.01 | % RL |
| Temperature range - Compensated | -10 to +50 | $^{\circ}\text{C}$ |
| Temperature range - Safe | -10 to +80 | $^{\circ}\text{C}$ |
| Excitation voltage - Recommended | 10 | V |
| Excitation voltage - Maximum | 10 | V |

| | | |
|--|-----|------|
| Bridge resistance | 350 | Î© |
| Insulation resistance - Minimum at 50Vdc | 500 | MÎ© |
| Overload - Safe | 50 | % RL |
| Overload - Ultimate | 200 | % RL |
| Weight - Nominal (excluding cable) | 380 | g |
| The standard range is manufactured in aluminium. | | |

This high precision web tension loadcell is designed and built to meet the needs of machine designers, installation fitters and end users by the incorporation of alignment features with maximum flexibility.

The high performance of this loadcell is not compromised by the relatively large errors that can be produced by imprecise installation. We are happy to design variants of this loadcell to meet your specific requirements.

Order Codes

| Code | Description |
|------------|-----------------------------|
| F325CF00H0 | Compression, unrationalised |

Structural Stiffness - Nominal

| Range (kN) | Stiffness (N/m) |
|------------|-----------------------|
| 50 | 8.3 x 10 ⁵ |
| 100 | 1.1 x 10 ⁶ |
| 200 | 1.5 x 10 ⁶ |
| 500 | 2.0 x 10 ⁶ |

Notes

- AL = Applied load.
- RL = Rated load.
- Temperature coefficients apply over the compensated range.

Connections

The loadcell is fitted with 2 metres of PVC insulated 4 core screened cable type 7-2-4C.

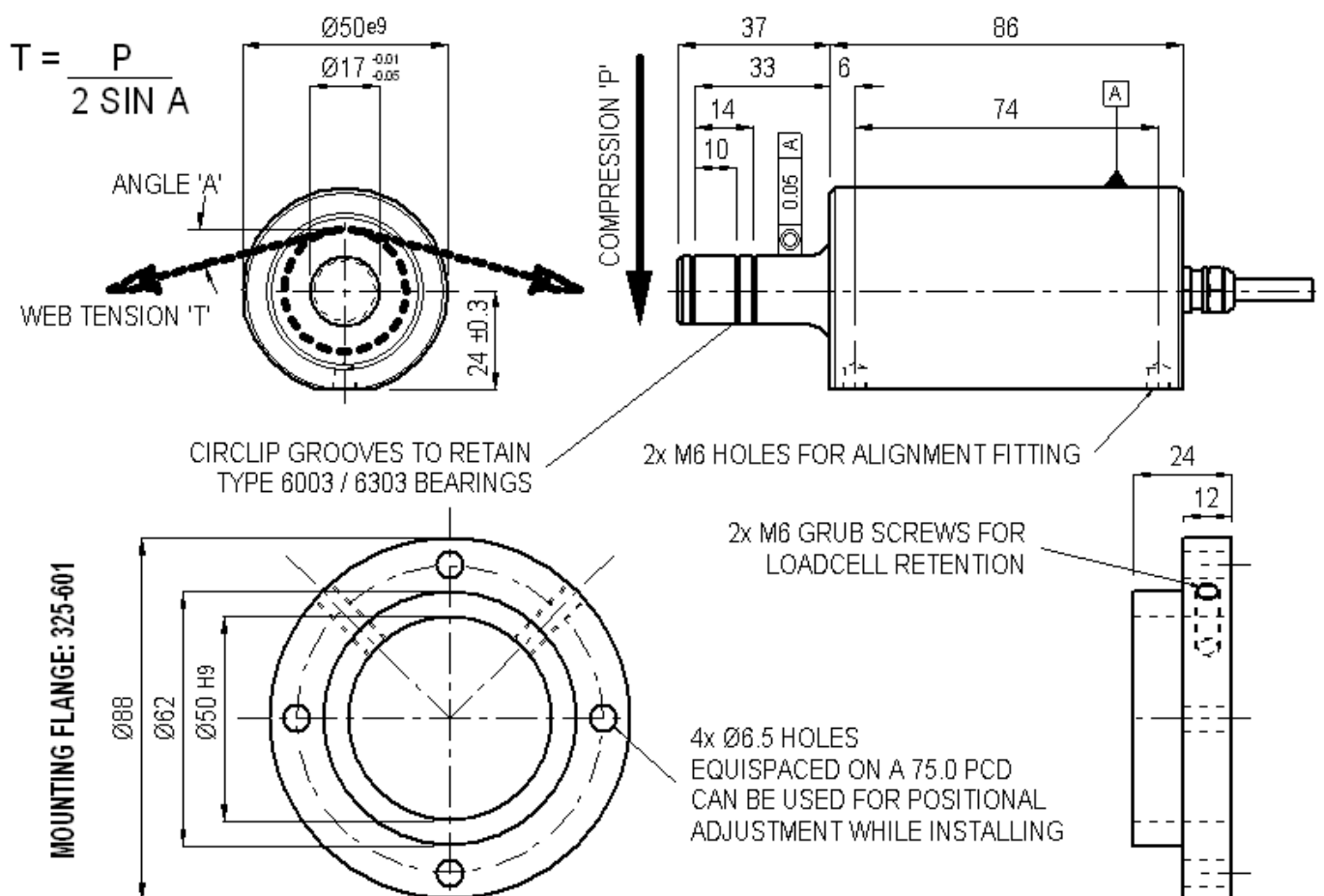
Excitation + = Red, Excitation - = Blue, Signal + = Yellow, Signal - = Green, Screen = Orange.

The screen is not connected to the loadcell body.

Files

| Type | Title | Download |
|-----------|--------------------------------|--------------------------|
| STEP File | F325CFR0H0 All standard ranges | Download |
| STEP File | F325 Mounting flange | Download |

Outline



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