

F304

Brake Pedal Force Loadcell

Standard Range 2500N (250kg)

- **♦** Off centre loading compensation
- ♦ Simple cable tie or screw fixing
- ♦ Anti-slip rubber mat
- **♦** Removable loading plate
- **♦** Output rationalised to 2mV/V



The F304 is a compact, high accuracy low profile loadcell for measuring brake pedal application forces. The loadcell is robust in construction with a maximum force range of 2500N (250kg). Its multi-hole fixing allows simple attachment to any shape pedal using screws or cable ties. The low profile stainless steel design maintains the brake pedals ergonomic geometry.

Additional information can be found in the Pedal Force Engineering Application Sheet. If you require other force ranges the F322 or F323 may be suitable.

We are happy to design variants of this loadcell to meet your specific requirements. Versions can be manufactured for fully compensated operation up to +250°C. Please consult our engineering department.

Details of our other loadcell families can be found in the Loadcell Specifier Guide. If you require a copy please contact our sales department or look on our web site at www.novatechloadcells.co.uk.

Ordering C		des:	See the loadcell ordering code sheet for more details. Add range in the required units.			
	F304CFR0KN	Comp	pression, IP65, rationalised			

F304 Specification

Parameter	Value	Unit
Non-linearity - Terminal	±0.05	% RL
Hysteresis	±0.05	% RL
Creep - 20 minutes	±0.05	% AL
Repeatability	±0.02	% RL
Rated output - Rationalised	2.0	mV/V
Rationalisation tolerance	±0.1	% RL
Zero load output	±4	% RL
Temperature effect on rated output per °C	±0.002	% AL
Temperature effect on zero load output per °C	±0.005	% RL
Temperature range - Compensated	-10 to +50	$^{\circ}\mathrm{C}$
Temperature range - Safe	-10 to +80	°C
Excitation voltage - Recommended	10	V
Excitation voltage - Maximum	20	V
Bridge resistance	700	Ω
Insulation resistance - Minimum at 50Vdc	500	${ m M}\Omega$
Inclined load error - concentric at 3°	±0.25	% RL
Structural stiffness	3.9×10^7	N/m
Overload - Safe	50	% RL
Overload - Ultimate	200	% RL
Sideload - Safe	100	% RL
Sealing	IP65	
Weight - Nominal (excluding cable)	210	g
The standard range is manufactured in stainless steel.		

Notes

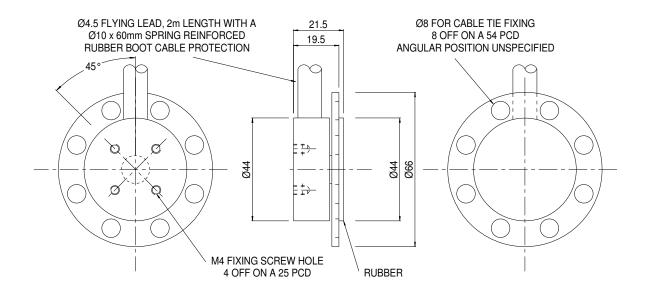
1. AL = Applied load. 3. Temperature coefficients apply over the compensated range.

2. RL = Rated load.

Connections

The loadcell is fitted with 2 metres of flexible polyurethane jacketed 4 core screened cable. Excitation + = Red Signal + = Yellow Screen = Orange

Excitation - = Blue Signal - = Green The screen is not connected to the loadcell body.



Novatech reserves the right to vary the foregoing details without prior notice

01/2008

NOVATECH MEASUREMENTS LTD