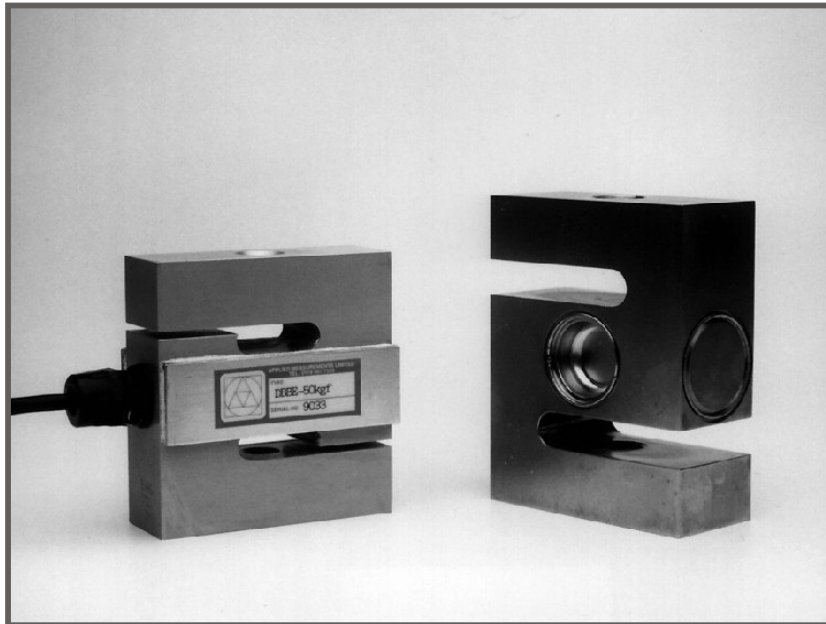


Tension and Compression Sealed 'S' Beam **LOAD CELL**

DBB Series



- Capacities 50kg to 5000kg (for sub-50kg please see DBBSM)
- Sealed to IP67 or IP68
- Robust Construction
- Simple Installation
- High Performance
- **3 YEAR WARRANTY**

Options Available

Other Ranges Available on request

Equivalents to other manufacturers' available

Spherical Rod End Bearings

Load Buttons

Different Cable Lengths

Full range of mounting options available (consult factory)

500VAC Certification

ATEX Certificate: EEx ia IIC T6 (DBBW only)

DESCRIPTION

The DBB series S-beam load cell is designed for force measurement and weighing applications alike. Its ease of mounting makes it very attractive for use as a general purpose load cell.

There are two versions available within the standard range. The DBBE, an encapsulated cell sealed to IP67 covering ranges of 50kg to 1000kg and a fully welded cell, the DBBW, sealed to IP68 covering ranges of 500kg to 5000kg.

There are many options that are available to further enhance the usefulness of this series of load cells, as well as higher accuracy versions.

Sense wires are provided on each of the load cells to compensate for changes in lead resistance due to temperature change and/or cable extension. Sensing can be achieved by feeding this voltage into the appropriate electronics (please refer to the instrumentation datasheets).

Transducer Specialists...

APPLIED MEASUREMENTS LIMITED

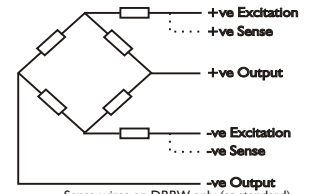
3 MERCURY HOUSE - CALLEVA PARK - ALDERMASTON - BERKSHIRE - RG7 8PN - UK

Tel: (+44) 0118 981 7339 Fax: (+44) 0118 981 9121 email: info@appmeas.co.uk Internet: www.appmeas.co.uk



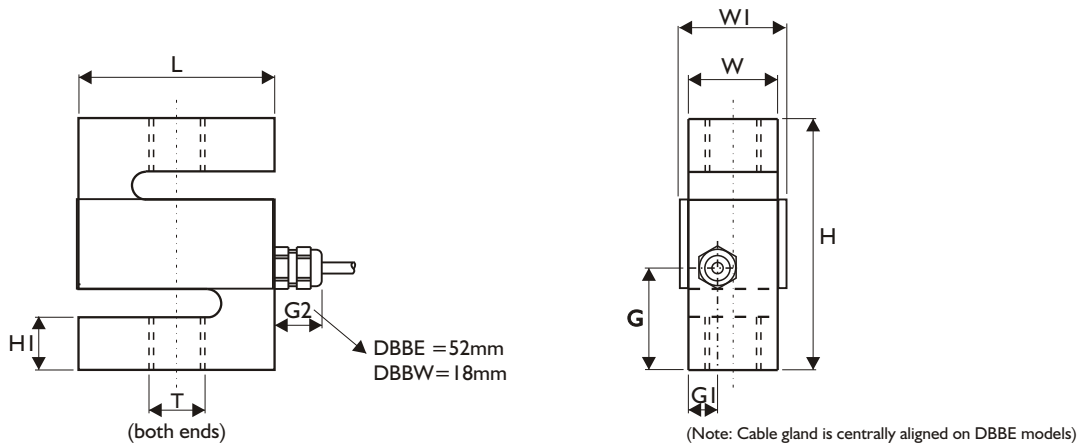
SPECIFICATION

Wiring Schematic Diagram



NOTE Sense wires on DBBW only (as standard)
This wiring gives a +ve output in compression

CHARACTERISTICS	DBBE	DBBW	UNITS
Rated Capacities:	50, 100, 150, 200, 300, 500, 1000	500, 1000, 2000, 5000	kg
Rated Output:	2.0 ± 10%	2.0 ± 0.1%	mV/V
Total Error:	<0.03	<0.030	±% of Rated Output
Zero Return after 30 mins:	<0.03	<0.025	±% of Applied Load
Zero Balance:	<5	<2	±% of Rated Output
Temperature Range: Operating	-30 to +70	-30 to +80	°C
Compensated	-10 to +45	-10 to +40	°C
Temperature Effect: On Output	<0.003	<0.0015	±% of Applied Load/ °C
On Zero	<0.01	<0.003	±% of Rated Load/ °C
Safe Overload:	150	150	% of Rated Capacity
Ultimate Overload:	300	300	% of Rated Capacity
Excitation: Recommended	10	10	Volts AC or DC
Maximum	15	15	Volts AC or DC
Input Impedance:	415 ± 20	400 ± 20	Ohms
Output Impedance:	350 ± 3	350 ± 3	Ohms
Insulation Impedance:	>2000	>1000	Megaohms
Deflection at Rated Capacity:	<0.4	<0.4	mm
Weight:	0.58	0.9 (1.9 for 5000kg)	kg
Construction:	Nickel Plated Alloy Steel	Stainless Steel	
Environmental Protection:	IP67	IP68	
Cable:	3 Metre 6 Core Screened	5 Metre 6 Core Screened	



All dimensions in mm

MODEL	CAPACITY (kgf)	H	L	W	W1	H1	G	G1	Threads T
DBBE	50 - 500	80	62.1	18	22	15	40	9	M12 x 1.75
DBBW	500	90	70	32	32	19	36.6	10.4	M12 x 1.75
DBBW	1000	90	70	32	32	19	36.6	10.4	M16 x 2.0
DBBW	2000	90	70	32	32	19	36.6	10.4	M16 x 2.0
DBBW	5000	120	100	45	45	26	60	13.8	M24 x 2.0

