



Description

90610 – T is pancake type load cell & it is strain gauge-based sensor with temperature compensation over 0 to 60 °C. It is precision measuring sensor & issued in research, testing, automation, robotics & uniaxial testing machines. This is constructed from SS 17-4 PH / High Tensile grade tool steel suitable for harsh industrial applications. It is sealed for IP65 protection class and it has long life. It is available with integral thread for axial loading. This can be supplied optionally at an extra cost with matched threaded base plate suitable for tension/compression applications.

Applications

- Can be used as reference standard
- Fatigue Testing
- Force calibration
- Static & Dynamic Force Measurement
- Industrial Automation
- Material Testing
- Research
- Robotics

Key Features

High accuracy available with class 1, 0.5, 00
As per standard ISO 376:2011.

Complete Environmental Protection – Meets
IP 65, IP 67 & or IP 68 class

Electro less nickel-plated tool steel & stainless
steel constructions

A high-temperature version can be provided
on request

Wide range of capacities from 50KGF to
450TF.

Standardized output (2.0 mV/V) and
customized output can be provided on
request

Calibration in mV/V/Ω

Can be **customized** to suit customer's need

Technical Specifications

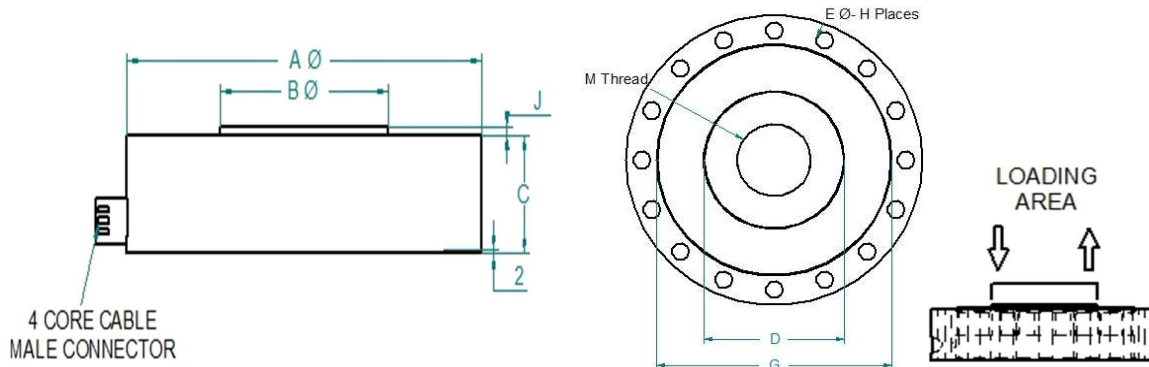
STANDARD CAPACITY		50, 100, 200, 300, 500, 750	KGF.
		1, 1.5, 2, 3, 5, 7.5, 10, 15, 20, 30, 50, 75, 100, 150, 200, 300, 400, 450	TF.
PERFORMANCE	Non - Linearity	< $\pm 0.1\%$ FSO	
	Hysteresis	< $\pm 0.15\%$ FSO	
	Non-Repeatability	< $\pm 0.1\%$ FSO	
	Creep (30 minutes)	< $\pm 0.04\%$ FSO	
	Zero Balance	$\pm 1.0\%$ FSO	
ELECTRICAL	Output	2.00 mV/V	
	Excitation Voltage	Maximum 15 VDC (Suggested 5VDC / 10 VDC)	
	Input Resistance	770 $\pm$ 20 Ω (Ohms) 2T & Above	390 $\pm$ 10 Ω (Ohms) up to 1 T
	Output Resistance	700 $\pm$ 7 Ω (Ohms) 2T & Above	350 $\pm$ 5 Ω (Ohms) up to 1 T
	Insulation Resistance	(100 VDC) > 1000 Mega Ω (Ohms)	
STRUCTURE	Safe Overload Of Rated Capacity	150%	
	Ultimate Overload of Rated Capacity	200%	
	Allowable Side Load	50%	
	Deflection	< 0.4 mm at FSO	
	Finish Product	Electro less nickel-plated tool steel / SS 17-4 PH	
	As per IS/IEC 60529:2001	IP65, IP67, IP68	
TEMP.	Operating Temperature	0°C to 60°C (Optional 90°C, 120°C, 150°C)	
	Compensated Temperature	10°C to 50°C (Optional 90°C, 120°C, 150°C)	
	Temperature Effect on Output	< 0.005 % FSO/ °C	
	Temperature Effect on Zero	< 0.005 % FSO/ °C	
OPTIONAL	ATEX	II 3D EX tc IIIC T60°C DC II 3G EX ec IIC GC	
	High Temperature Cable	Teflon Cable	
	High Temperature Range	40°C to 90°C (Temperature Effect on Output & Zero : < 0.020% FSO/ °C)	
	Accessories	DLC-6 DLC-6M DIGITAL LOAD CONTROLLER (MULTI. O/P)	

90610-T

UNIVERSAL PAN CAKE LOAD CELL



Dimension (mm)

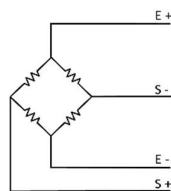


CAPACITY-TF	A	B	C	J	D	G	E DIA. X H PLCS.	M THREAD	MOC	CABLE
0.05, 0.1, 0.2, 0.3, 0.5, 0.75, 1	50	42	24	1	15	33	4.2 x 4	12 x 1.25	SS 17-4 PH	5 Meter
1.5, 2, 3, 5	90	70	28	2	23	58	6.2 x 8	16 x 1.5	SS 17-4 PH	5 Meter
7.5, 10, 15	115	90	28	2	42	75	10.4 x 8	30 x 2	SS 17-4 PH	5 Meter
20, 30	155	125	38	2	61	103	12.7 x 8	39 x 2	SS 17-4 PH	5 Meter
50	210	180	45	5	87	153	12.7 x 16	42 x 2	Tool steel	5 Meter
75, 100	280	250	65	5	132	223	16.5 x 16	72 x 2	Tool steel	5 Meter
150, 200	305	270	80	10	142	243	21 x 16	90 x 3	Tool steel	5 Meter
300	395	350	100	20	187	308	21 x 32	120 x 4	Tool steel	5 Meter
400, 450	450	390	120	30	245	330	25 x 32	150 x 4	Tool steel	5 Meter

All dimensions are in mm.

Specifications are subject to Change.

Electrical Termination



Excitation(E+)	Red
Signal(S-)	White
Excitation(E-)	Black
Signal(S+)	Green
Shield	