Scientech Scientech 2307
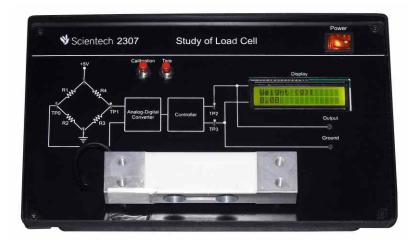

Scientech 2307 is a platform for the study of load cells and their application for weight measurement. Different weights are provided for linearity and sensitivity measurements. A 16x2 LCD display shows the weight in grams. PC interface is available.

Features

- Self-contained and easy to operate
- Sensitive, linear, stable, and accurate
- Test-points to observe input output of each block
- 16x2 LCD displays load status
- High repeatability and reliability
- Built in DC Power Supply
- PC Interface

Scope of Learning

- Study of linearity in the load cell
- Study and observe the variation in voltage across the Wheatstone bridge and after signal processing while varying the loads
- Study of calibration on load cell
- To understand "tare" in load cell
- Sensitivity determination

Technical Specifications

Maximum bearable weight	:	5kg.
Maximum allowed weight	:	500gram.
Load cell type	:	Strain guage/shear beam
Bridge voltage	:	+5VDC
Bridge configuration	:	Full Wheatstone bridge
Display	:	16x2 LCD
Tact switch	:	2 nos. (Tare and Calibration)
Test points	:	4 nos.
Controller	:	ATMEGA328P
ADC	:	24 bit
Product tutorial	:	Online
Power Supply	:	230V AC, 50 Hz
Dimensions (mm)	:	W 340 × D 240 × H 105
Weight	:	1.5 Kg (approximately)
Operating conditions	:	0-40°C, 85% RH
Included accessories	:	
Mains cord	:	1 no.
Standard weights	:	10 gram - 1 no.
		20 gram - 1 no.
		50 gram - 2 nos.
		100 gram - 4 nos.
		200 gram - 4 nos.

Subject to Change