

## S-Type Stainless Steel Load Cell

### FEATURES

- Capacity range: 500–5000 kg
- Stainless steel construction
- Sealed by welding to IP68
- S-type design for use in tension and compression
- OIML approved to 3000d (500–5000 kg)
- NTEP approved to 5000d (500–5000 kg)
- Choice of mounting threads metric or unified systems
- 6-Wire cable (sense circuit)
- **Optional**
  - Ex ia IIC T6-ATEX hazardous area approval
  - Class I, II, III Division 1 – FM hazardous area approval
  - IECEx approval available



### APPLICATIONS

- Hopper (tank Weighing)
- Hybrid scales
- Belt weighing
- Lever arm conversions
- Material testing machines
- Vibrations filling equipment
- Dynamometers

### DESCRIPTION

The Model 620 is a stainless steel S-type load cell. Its welded sealing combined with high accuracy, make this load cell ideally suited for a wide range of applications of process weighing and force measurements.



Approvals include OIML C3 (3000d); NTEP 3000d single and NTEP 5000d multiple.

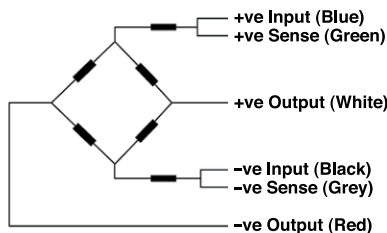
Also available are versions approved for hazardous areas—ATEX II 1 GD Ex ia T6 for Europe and FM I, II, III Division 1 for the USA.

The six-wire cable includes two sense wires that compensate for changes in lead resistance due to temperature changes and cable extension.

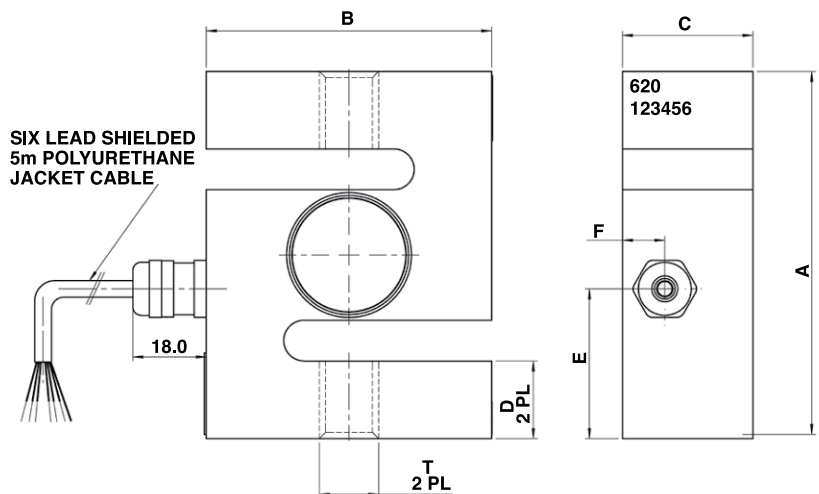
The Model 620 offers a choice of bolt threads in metric or unified systems; see table below.

### OUTLINE DIMENSIONS in millimeters

Wiring Schematic Diagram



Thread Type "T" by Capacity		
Capacity	Metric	Unified
500 kg	M12 x 1.75	1/2-20 UNF
1000 kg	M16 x 2.0	1/2-20 UNF
2000 kg	M16 x 2.0	3/4-16 UNF
5000 kg	M24 x 2.0	1 - 12 UNF



Optional rod end bearings for use with all VPG Transducers S-type load cells are available—consult the sales office.

Capacity	A	B	C	D	E	F
500, 1000, 2000 kg	90	70	32	19	36.6	10.4
5000 kg	120	100	45	26	60	13.8

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<b>SPECIFICATIONS</b>					
<b>PARAMETER</b>	<b>VALUE</b>				<b>UNIT</b>
<b>Rated capacity – R.C. (E<sub>max</sub>)</b>	500, 1000, 2000, 5000				kg
<b>NTEP/OIML</b>	NTEP	Non-Approved	C2/50	C3/50	
<b>Maximum no. of intervals (n)</b>	Class III	1000	2000*	OIML 3000	
<b>Y = E<sub>max</sub>/V<sub>min</sub></b>	5000	2000	4000	6000	
<b>Rated output – R.O.</b>	2.0				mV/V
<b>Rated output tolerance</b>	0.002				±mV/V
<b>Zero balance</b>	0.04	0.06	0.04	0.04	±mV/V
<b>Total error (per OIML R60)</b>	0.0200	0.0500	0.0300	0.0200	±% of R.O.
<b>Zero return, 30 min.</b>	0.010	0.0500	0.0250	0.0170	±% of applied load
<b>Temperature effect on zero</b>	0.00112 (0.00062)	0.0070	0.0035	0.0023	±% of R.O./°C (°F)
<b>Temperature effect on output</b>	0.0018 (0.0010)	0.0400	0.0014	0.0012	±% of applied load/°C (°F)
<b>Temperature range, compensated</b>	-10 to +40				°C
<b>Temperature range, safe</b>	-30 to +90				°C
<b>Maximum safe static overload</b>	150				% of R.C.
<b>Excitation, recommended</b>	10				VDC or VAC RMS
<b>Excitation, maximum</b>	15				VDC or VAC RMS
<b>Input impedance</b>	400±20				Ω
<b>Output impedance</b>	350±3				Ω
<b>Insulation resistance</b>	>1000	>2000	>2000	>2000	MΩ
<b>Construction</b>	Stainless steel				
<b>Environmental protection</b>	IP68				

All specifications subject to change without notice.



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