

Model Number 1102-01A		STRAIN GAGE LOAD CELL			Revision: G ECN #: 43815											
Performance		ENGLISH	SI		OPTIONAL VERSIONS											
Measurement Range	50 lb	222 N	[5]	Optional versions have identical specifications and accessories as listed for the standard model except where noted below. More than one option may be used.												
Sensitivity(± 10 %)	2 mV/V	2 mV/V	[6]													
Non-Linearity	≤ 0.05 % FS	≤ 0.05 % FS														
Hysteresis	≤ 0.05 % FS	≤ 0.05 % FS														
Non-Repeatability	≤ 0.02 % FS	≤ 0.02 % FS														
Eccentric Load Sensitivity	≤ 0.25 %/in	≤ 0.25 %/25.4mm														
Resonant Frequency	2.8 kHz	2.8 kHz														
Creep(in 20 minutes)	≤ .025 %	≤ .025 %		NOTES: [1]Nominal. [2]Calibrated at 10 VDC, usable 5 to 20 VDC or VAC RMS. [3]Singularly applied, i.e. no other extraneous loads. [4]Over compensated operating temperature range. [5]FS - Full Scale. [6]RO - Rated Output. [7]See Outline Drawing 51277 for Complete Dimensions												
Static Error Band	≤ .05 % FS	≤ .05 % FS														
Environmental																
Overload Limit	75 lb	334 N														
Load Limit(Side Force, F _X or F _Y)	50 lb	222 N	[3]													
Load Limit(Bending Moment, M _X or M _Y)	50 in-lb	5.6 Nm	[3]													
Load Limit(Axial Torque, M _Z)	35 in-lb	4 Nm	[3]													
Temperature Range(Operating)	-65 to +200 °F	-54 to +93 °C		OPTIONAL ACCESSORIES: Model 181-012A PT06A-10-6S(SR) Model 8311-01-10A CABLE												
Temperature Range(Compensated)	+70 to +170 °F	+21 to +77 °C														
Temperature Effect on Output(Maximum)	± 0.0015 %Reading/°F	± 0.0027 %Reading/°C	[4]													
Temperature Effect on Zero Balance(Maximum)	± 0.0008 %FS/°F	± 0.0015 %FS/°C	[4]													
Electrical																
Bridge Resistance	700 Ohm	700 Ohm	[1]													
Excitation Voltage(Recommended)	10 VDC	10 VDC	[2]													
Insulation Resistance	>5x10 ⁹ Ohm	>5x10 ⁹ Ohm		<table><tr><td>Entered: AP</td><td>Engineer: PE</td><td>Sales: JC</td><td>Approved: JSD</td><td>Spec Number:</td></tr><tr><td>Date: 2/17/2015</td><td>Date: 2/17/2015</td><td>Date: 2/17/2015</td><td>Date: 2/17/2015</td><td>18327</td></tr></table>			Entered: AP	Engineer: PE	Sales: JC	Approved: JSD	Spec Number:	Date: 2/17/2015	Date: 2/17/2015	Date: 2/17/2015	Date: 2/17/2015	18327
Entered: AP	Engineer: PE	Sales: JC	Approved: JSD				Spec Number:									
Date: 2/17/2015	Date: 2/17/2015	Date: 2/17/2015	Date: 2/17/2015				18327									
Zero Balance	≤ 1 % FS	≤ 1 % FS														
Output Polarity	+Tension	+Tension														
Physical																
Size (Diameter x Height)	2.75 in x 1.5 in	69.9 mm x 38.1 mm	[7]													
Weight	0.67 lb	304 g														
Mounting Thread	1/4-28 Female	No Metric Equivalent		 PCB Load & Torque, Inc. 24350 Indoplex Circle Farmington Hills, MI 48335 UNITED STATES Phone: 866-684-7107 Fax: 716-684-0987 E-Mail: ltinfo@pcbloadtorque.com Web site: http://www.pcbloadtorque.com												
Housing Material	Painted Aluminum	Painted Aluminum														
Sensing Element	Strain Gage	Strain Gage														
Deflection at Full Scale Capacity	0.003 in	0.08 mm														
Electrical Connector	PT02E-10-6P	PT02E-10-6P														
All specifications are at room temperature unless otherwise specified. In the interest of constant product improvement, we reserve the right to change specifications without notice.																