

Model Number 223B	ICP® FORCE SENSOR	Revision: L ECN #: 46037
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	<u>ENGLISH</u>	<u>SI</u>
Performance		
Sensitivity(± 15 %)	0.42 mV/lb	94.42 mV/kN
Measurement Range(Compression)	12,000 lb	53.38 kN
Measurement Range(Tension)	4000 lb	17.79 kN
Maximum Static Force(Compression)	12,500 lb	55.60 kN
Maximum Static Force(Tension)	4500 lb	20.02 kN
Broadband Resolution(1 to 10,000 Hz)	0.40 lb-rms	1.78 N-rms
Low Frequency Response(-5 %)	0.0003 Hz	0.0003 Hz
Upper Frequency Limit	10,000 Hz	10,000 Hz
Non-Linearity	≤ 1.5 % FS	≤ 1.5 % FS
Environmental		
Temperature Range	-65 to +250 °F	-54 to +121 °C
Temperature Coefficient of Sensitivity	≤ 0.03 %/°F	≤ 0.054 %/°C
Electrical		
Discharge Time Constant(at room temp)	≥ 2000 sec	≥ 2000 sec
Excitation Voltage	20 to 30 VDC	20 to 30 VDC
Constant Current Excitation	2 to 20 mA	2 to 20 mA
Output Impedance	≤ 100 Ohm	≤ 100 Ohm
Output Bias Voltage	8 to 14 VDC	8 to 14 VDC
Output Polarity(Compression)	Positive	Positive
Physical		
Stiffness	4 lb/μin	0.70 kN/μm
Size (Diameter x Height)	1.10 in x 2.00 in	27.94 mm x 50.8 mm
Weight	4.2 oz	120 gm
Housing Material	Stainless Steel	Stainless Steel
Sealing	Hermetic	Hermetic
Electrical Connector	10-32 Coaxial Jack	10-32 Coaxial Jack
Electrical Connection Position	Side	Side
Mounting Thread	1/2 - 20 Female	1/2 - 20 Female

OPTIONAL VERSIONS		
Optional versions have identical specifications and accessories as listed for the standard model except where noted below. More than one option may be used.		
J - Ground Isolated		
M - Metric Mount		
Mounting Thread		M12 x 1.25 Female
N - Negative Output Polarity		
Output Polarity(Compression)	Negative	Negative
W - Water Resistant Cable		
Electrical Connector	Sealed Cable	Sealed Cable
Electrical Connection Position	Side	Side

NOTES:
 [1] Typical.
 [2] Calculated from discharge time constant.
 [3] Estimated using rigid body dynamics calculations.
 [4] Zero-based, least-squares, straight line method.
 [5] See PCB Declaration of Conformance PS023 for details.

Entered: LK Engineer: BAM Sales: KWW Approved: BAM Spec Number:
 Date: 10/7/2016 Date: 10/7/2016 Date: 10/7/2016 Date: 10/7/2016 **1290**



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.
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