



Model Number 204C	ICP® FORCE SENSOR		Revision: F ECN #: 26908
Performance	ENGLISH	SI	OPTIONAL VERSIONS
Sensitivity(± 15 %)	0.12 mV/lb	27 mV/kN	Optional versions have identical specifications and accessories as listed for the standard model except where noted below. More than one option may be used.
Measurement Range(Compression)	40,000 lb	177.92 kN	
Maximum Static Force(Compression)	50,000 lb	222.4 kN	
Broadband Resolution(1 to 10,000 Hz)	0.80 lb-rms	3.6 N-rms	[1] M - Metric Mount
Low Frequency Response(-5 %)	0.0003 Hz	0.0003 Hz	[2] Supplied Accessory : Model M081A14 Mounting Stud, M14 x 1,25 x 1,400, BeCu (1)
Upper Frequency Limit	55 kHz	55 kHz	[3] Supplied Accessory : Model M083B04 Pilot Bushing (1)
Non-Linearity	≤ 1.5 % FS	≤ 1.5 % FS	[4]
Environmental			N - Negative Output Polarity
Temperature Range	-65 to +250 °F	-54 to +121 °C	Output Polarity(Compression) Negative Negative
Temperature Coefficient of Sensitivity	≤ 0.08 %/°F	≤ 0.14 %/°C	
Electrical			W - Water Resistant Cable
Discharge Time Constant(at room temp)	≥ 2000 sec	≥ 2000 sec	Electrical Connector Sealed Cable Sealed Cable
Excitation Voltage	20 to 30 VDC	20 to 30 VDC	Electrical Connection Position Side Side
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	
Spectral Noise(1 Hz)	0.088 lb/√Hz	0.39 N/√Hz	[1] NOTES:
Spectral Noise(10 Hz)	0.025 lb/√Hz	0.11 N/√Hz	[1] [1] Typical.
Spectral Noise(100 Hz)	0.0060 lb/√Hz	0.0266 N/√Hz	[1] [2] Calculated from discharge time constant.
Spectral Noise(1 kHz)	0.0016 lb/√Hz	0.00719 N/√Hz	[1] [3] Estimated using rigid body dynamics calculations.
Output Polarity(Compression)	Positive	Positive	[4] Zero-based, least-squares, straight line method.
Physical			[5] See PCB Declaration of Conformance PS023 for details.
Preload	8000 lb	35,585 kN	
Stiffness	29 lb/μin	5 kN/μm	[1]
Size (Diameter x Height x Bolt Diameter x Sensing Surface)	1.34 in x 0.47 in x 0.625 in x 1.10 in	34 mm x 12 mm x 16 mm x 28 mm	
Size (ID)(Hole Diameter)	0.660 in	16.76 mm	
Size (OD)(Sensor)	1.340 in	34 mm	SUPPLIED ACCESSORIES:
Weight	2.0 oz	57 gm	Model 080A82 Assembly Lubricant (1)
Housing Material	Stainless Steel	Stainless Steel	Model 081A14 Mounting Stud, 1/2-20 x 1.400, BeCu (1)
Sealing	Hermetic	Hermetic	Model 082B04 Anti-friction washer (for Models 204C and 214B) (1)
Electrical Connector	10-32 Coaxial Jack	10-32 Coaxial Jack	Model 083B04 Pilot bushing (for Models 204C and 214B) (1)
Electrical Connection Position	Side	Side	
 [5]			Entered: <i>BLS</i> Engineer: <i>MJK</i> Sales: <i>DPC</i> Approved: <i>DMB</i> Spec Number:
<i>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.</i>			Date: <i>7-20-07</i> Date: <i>7-19-07</i> Date: <i>7-19-07</i> Date: <i>7-17-07</i> 5874
ICP® is a registered trademark of PCB Group, Inc.			 PCB PIEZOTRONICS™ FORCE / TORQUE DIVISION 3425 Walden Avenue, Depew, NY 14043
			Phone: 716-684-0001 Fax: 716-684-8877 E-Mail: force@pcb.com



Represented in India by

Structural Solutions Pvt Ltd. | Phone: 040 2322 2380 | Email: sales@stsols.com

#4th Floor, Sudheer Tapani Towers, Himayath Nagar, Hyderabad - 500 029