

Model Number
674A91

IO-LINK® VIBRATION SENSOR

Revision: NR
ECN #: 54712

Performance

	ENGLISH	SI	
Frequency Range(+/- 3 dB)(Acceleration)	1 to 10,000 Hz	1 to 10,000 Hz	[1][2]
Frequency Range(+/- 3 dB)(Acceleration)	10 to 10,000 Hz	10 to 10,000 Hz	[3][1]
Frequency Range(+/- 3 dB)(Acceleration)	1,000 to 10,000 Hz	1,000 to 10,000 Hz	[4][1]
Frequency Range(+/- 3 dB)(Acceleration)	5,000 to 10,000 Hz	5,000 to 10,000 Hz	[5][1]
Frequency Range(+/- 3 dB)(Velocity)	2 to 10,000 Hz	2 to 10,000 Hz	[2][1]
Frequency Range(+/- 3 dB)(Velocity)	10 to 10,000 Hz	10 to 10,000 Hz	[3][1]
Acceleration Range	50 g pk	490.5 m/s ² pk	[6]
Velocity Range	3 in/sec pk	76.2 mm/s pk	
Transverse Sensitivity	7 %	7 %	
Linearity	≤ 1 %	≤ 1 %	[7]
Set/Reset Delay	0 to 50 sec	0 to 50 sec	
Start Up Delay	0 to 50 sec	0 to 50 sec	
Transmission Type	COM3: 230.4 kbaud	COM3: 230.4 kbaud	
Io-Link Revision	1.1	1.1	
SIO Mode	Yes	Yes	
Required Master Port Class	A, B	A, B	
Minimum Cycle Time	12 mS	12 mS	
Output(Out1/Out2)	Normally Open/Normally Closed	Normally Open/Normally Closed	

Environmental

Overload Limit(shock)	5,000 g pk	49,050 m/s ² pk
Temperature Range	-40 to +185 °F	-40 to +85 °C
Enclosure Rating	IP68	IP68

Electrical

Current Consumption(mA)	50 mA	50 mA	[1]
Interface	IO-Link	IO-Link	
Electrical Isolation	> 10 ⁸ Ohm	> 10 ⁸ Ohm	
External DC Power(24 VDC)	24 VDC	24 VDC	[1]

Physical

Size (Hex x Height)	1.0 x 2.6 in	25.4 mm x 66 mm	
Weight	5.2 oz	148 g	
Mounting Thread	1/4-28 Female	No Metric Equivalent	[8]
Sensing Element	Ceramic	Ceramic	
Sensing Geometry	Shear	Shear	
Housing Material	Stainless Steel	Stainless Steel	
Mounting Torque	3 to 5 ft-lb	4 to 7 Nm	
Sealing	Welded Hermetic	Welded Hermetic	
Electrical Connector	M12, 4-Pin	M12, 4-Pin	
Electrical Connection Position	Top	Top	
Electrical Connections(Pin 1)	L+	L+	
Electrical Connections(Pin 2)	Out 2	Out 2	
Electrical Connections(Pin 3)	L-	L-	
Electrical Connections(Pin 4)	Out 1	Out 1	

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.

M - Metric Mount
Optional Accessory: Model M081A61 Mounting Stud 1/4-28 to M6 X 1 (1)

NOTES:

- [1]Typical.
- [2]High Pass Analog Filter set to 1Hz
- [3]High Pass Analog Filter set to 10Hz
- [4]Digital High Pass Filter set to 1kHz
- [5]Digital High Pass Filter Set to 5kHz
- [6]Conversion Factor 1 g = 9.81 m/s²
- [7]Zero-based, least squares, straight line method
- [8]1/4-28 has no equivalent in S.I. units.
- [9]See PCB Declaration of Conformance PS _____ for details.

SUPPLIED ACCESSORIES:

Model 081A40 Mounting Stud



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.
This model, designated with an RH prefix, is RoHS compliant. For further details, and to obtain PCB's RoHS Statement of Conformance, please visit <http://www.pcb.com>

Entered: ND	Engineer: JJD	Sales: JL	Approved: NJF	Spec Number:
Date: 04/26/2024	Date: 04/26/2024	Date: 04/26/2024	Date: 04/26/2024	77181



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