Bently Nevada Service Manual

181M6049

1. Description

181M6049 Dual

3. Product Information

181M6049 Dual
Output Sensor
Specifications
Dynamic
Sensitivity, ± 5% @25°C 100 mV/g
Acceleration range 60 g peak
Amplitude nonlinearity 1%
Frequency response
±5%: 3-5,000 Hz
±10%: 1-7,000 Hz
± 3 dB: 0.5-
12,000 Hz
Resonant frequency 30 kHz
Transverse sensitivity, max ±5% of axial
Temperature response
-50°C : -10%
+120°C : +10%
Output sensitivity of the
temperature sensor
10 mV/°C
Measurement range of the
temperature sensor
2° to 120°C
Electrical
Voltage source 18-28 Vdc
Current regulating diode 2-10 mA
Broadband electrical noise
@ 2.5 Hz to 25 kHz 700 µg
Spectral electrical noise @
10 Hz 10 µg/√Hz
Spectral electrical noise @
100 Hz 5 µg/√Hz
Spectral electrical noise @
1000 Hz 5 µg/√Hz
Output Impedance, max 100 Ω
Bias output voltage 12 Vdc
Grounding
Case isolated,
internally
shielded
Environmental
Temperature range -50°C to +120°C
Vibration limit 500 g peak
Shock limit 5,000 g peak
Electromagnetic sensitivity,
equiv g, max
70 µg/gauss
Sealing Hermetic
Base strain sensitivity, max
0.0002
g/µstrain
Physical
Sensing element design PZT ceramic /
shear
Weight 90 grams
Case material 316L Stainless
Steel
Mounting ¼-28 UNF
tapped hole

Connector

Output: 3 pin,

MIL-C-5015

style

Recommended cabling

16925-XX:

Without Armor

16710-XX: With

Armor

Connections

Connector Pin Function

Shell ground/case

A

accelerometer

power/signal

B

accelerometer

and temp

sensor common

C

temp sensor

signal

Frequency response and spectral

noise values are typical.