BH-1 Specifications

Responsivity:

Acceleration Output: 10.2 V/m/sec², nominal

Differential Velocity: 3500 V/m/sec, nominal

Bandwidth:

1 Hz (-6 dB Point, +90 Degree Phase Point) to

200 Hz (-90 degree Phase Point), Nominal

Full-Scale Signals:

+/- 4.0 V minimum voltage from accelerometer outputs

Corresponding to +/- 0.04 g input acceleration

+/- 8.0 V minimum differential voltage from velocity outputs

Corresponding to +/- 2.3 x 10⁻³ m/sec input velocity

Note that for frequencies above 27.1 Hz, the full-scale input velocity is less, owing to clipping of the accelerometer stage of

the sensor.

Noise Equivalent Velocity:

 $\sim 1 \times 10^{-9}$ m/sec-rtHz for $f \ge 4$ Hz $\sim 5 \times 10^{-9}$ m/sec-rtHz at f = 2 Hz $\sim 2 \times 10^{-8}$ m/sec-rtHz at f = 1 Hz

Power:

+/- 5 V, 0.9 mA, nominal

Absolute maximum input voltage is +/- 7.5V

Dimensions:

2.0" diameter x 6.25" long

See Figure 1

Mounting:

4 of 8-32 mounting holes on 1.50" diameter bolt circle

See Figure 1

Axes Orientation:

Unchanged from earlier versions. See Figure 1. The sensitive axes form a right-handed (RH) coordinate system with +Z up. A positive output voltage is obtained for acceleration/velocity along

the +axes

Required Alignment of Axes with Local Gravity:

X, Y Axes within +/- 4° of horizontal

Z Axis within +/- 8° of vertical