

Wind direction J-Van

The active element is a sealed Hall effect sensor. Wind direction is provided by a magnet attached to the vane, and which hovers over the sensor. The J-Vane requires an input of 5 VDC and provides an analog output of 0.25 - 4.75VDC.



It represents a number of advantages over potentiometer vanes, including:

- Zero dead band. Many potentiometer wind vanes have a dead spot of several degrees. This device has no dead band at all.
- Near-zero friction. Since the magnet is not in contact with the Hall sensor, there is no friction from the sensor.
- Virtually infinite life. Unlike potentiometers that wear out, the magnetic Hall sensor is non-contacting and should theoretically last forever.

The J-Vane requires 5 volts DC for power. It has three wires: ground, power, and signal.

CAUTION: some power supplies - even regulated - can generate spikes that will destroy the Hall sensor. Make sure your power supply (if you provide your own) does not produce spikes - especially when plugging/unplugging them.

The Inspeed e-Vane includes a **new locking feature** which we should have patented but didn't so we could get it to market sooner. It is a way to lock the sensor so you can twist the vane and set "North" (or zero output) to where-ever you wish. That means that the offset bracket can be pointed in any direction you want, unlike other manufacturers that force you to point the bracket to North so it will read correctly. With the e-Vane, just mount the vane, lock the sensor when the software (or your device) says North, twist the vane until it points North, then release the sensor so it is free to rotate. Simple!

SENSOR TYPE	<p>Balanced wind vane connected to an active, non-contact, zero friction Hall Effect sensor</p> <p>Sealed magnetic Hall Effect sensor.</p> <p>Magnet hovers over the sensor to provide ~0-5VDC output</p>
SENSOR RANGE	Full 360 degrees , zero deadband
ACCURACY/LINEARITY	+/-0.3 to 0.5% of signal range
RESOLUTION	12 bit or 0.025 degrees
ELECTRICAL	<p>3 wire flying leads.</p> <p>Supply voltage 4.5 to 5.5 VDC</p> <p>Current 15 mA typical</p> <p>Output 5% to 95% of input voltage (0.25 to 4.75VDC)</p> <p>Length of wire: optional (standard lengths provided - click to order to view options)</p>
MOUNTING	<p>The E-Vane is provided with an offset aluminum bracket with 2 mounting holes.</p> <p>The mounting is compatible with Inspeed Vortex Wind Sensors (the 2 holes match).</p>
DIMENSIONS	Directional Vane approximately 8 inches
COMPATIBILITY	<p>The Inspeed e-Vane is compatible with Inspeed WindWorks</p> <p>It is not compatible with Inspeed Windware software (which provides wind speed only</p>