

# KH-HZD EXPLOSION-PROOF VIBRATION SENSOR Manual

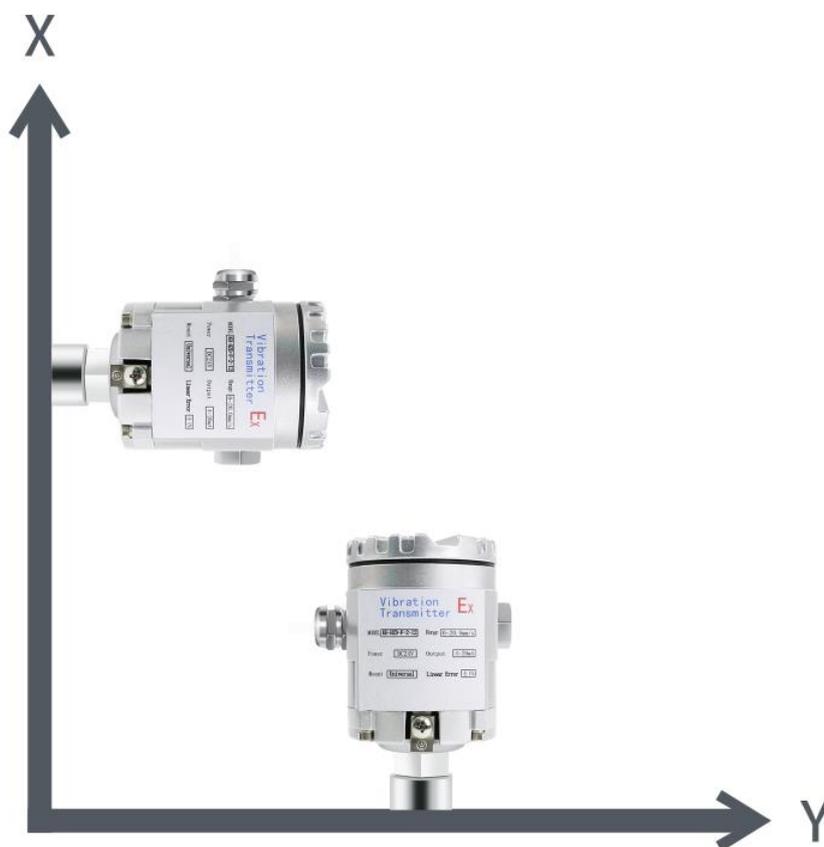


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## 1). General

KH-HZD integrative EXPLOSION-PROOF INTEGRATIVE VIBRATION SENSOR, integrating the traditional vibration sensor and the accuracy measuring circuit together, not only achieve “sensor + transmitter” mode vibration measurement system function, but also achieve economic but high accuracy vibration measure system. The transmitter can connect directly with PLC, DCS or other systems. Mounted on the bearing cover of rotating machines, the transmitter is an ideal choice for steam turbine, compressors, motors, blower, fans, water pump etc to measure vibration speed or vibration amplitude. The transmitter can be used widely in heating and power plant, cement plant, machine plant, blower plant, paper made plant, coal mine machine etc.

**Mounting method:** vertical or horizontal mounted on the measured vibrating point



Air-proof and water-proof baffle panel diagram

## 2). Specification

### 1. Sensitivity:

20mv/mm/s $\pm$ 0.3% 30mv/mm/s $\pm$ 0.3% 50mv/mm/s $\pm$ 0.3%

### 2. Frequency Response: 10-1000Hz

### 3. Measuring Range

0-10mm/s   0-20mm/s   0-30.0mm/s   0-40.0mm/s   0-50.0mm/s   other  
0-100um   0-200um   0-300um   0-500um   0-1000um   other

4. **Signal Output:** 4-20mA (default when order) or RS485

5. **Output Impedance:**  $\leq 500$

6. **Power supply:** DC24V

7. **Max acceleration:** 20g

8. **Measurement Direction:** vertical or horizontal

9. **Mounting method:** vertical or horizontal mounted on the measured vibrating point

10. **Mounting thread:** Thread (M20\*1.5mm) or Other

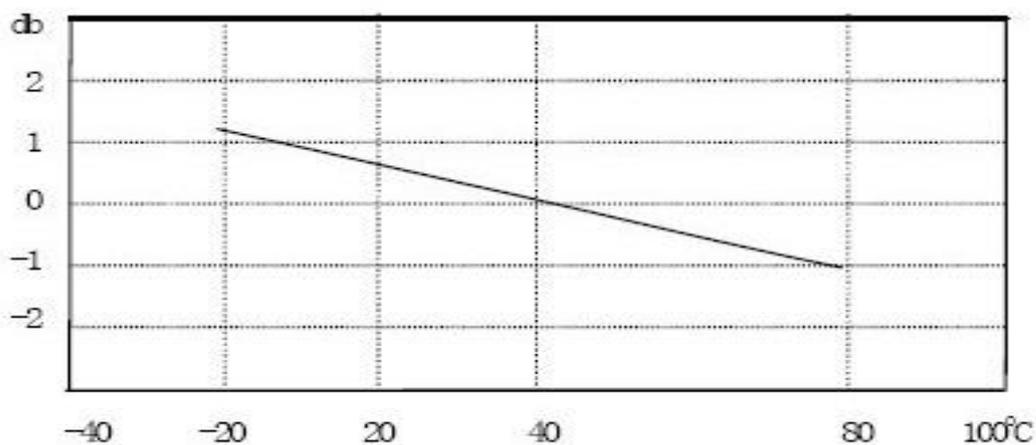
11. **Ambient Temperature:**  $-40^{\circ}\text{C}$  to  $85^{\circ}\text{C}$ ,

**Relative humidity:**  $\leq 90\%$

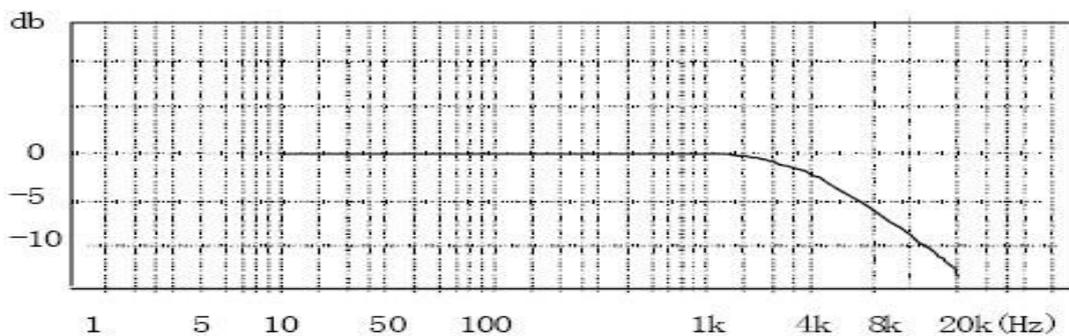
12. **Size:**  $\varnothing 70 \times 115\text{mm}$ ,

13. **Weight:** About 1000g

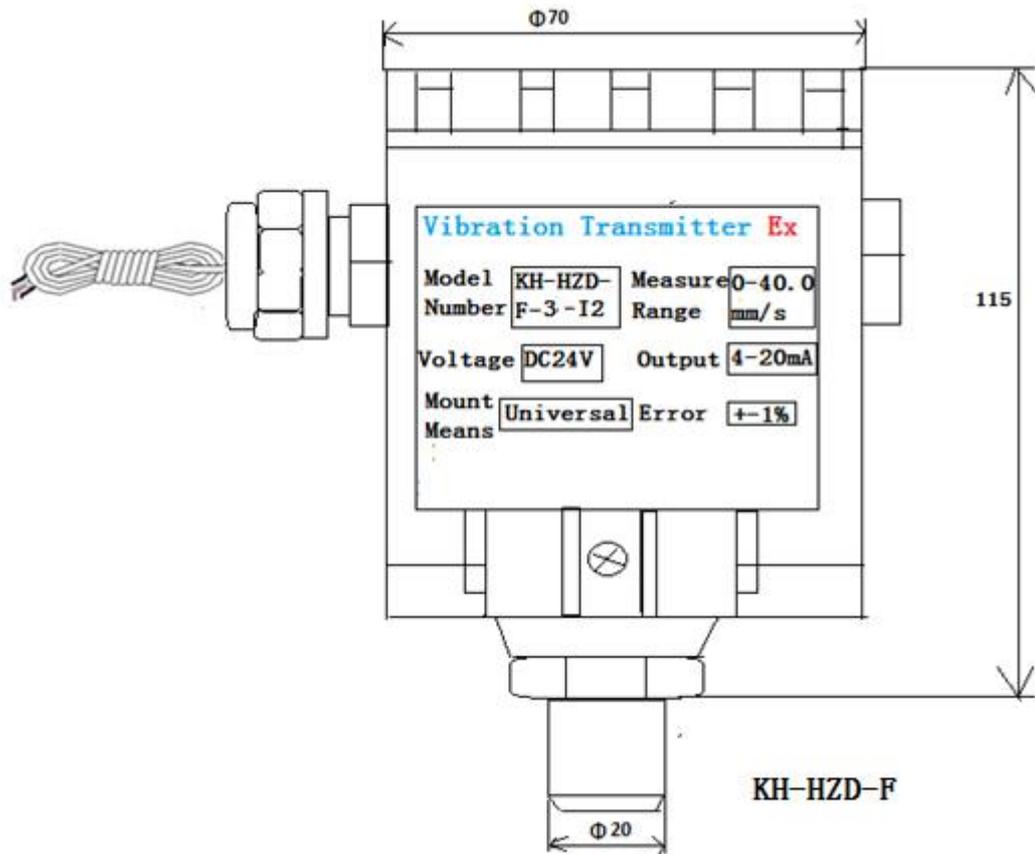
### 3) Temperature Curve Parameters



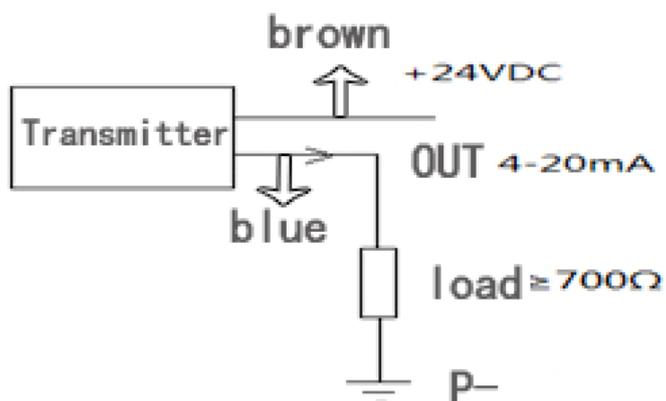
### 4) . Frequency response curve parameters



## 5) Size



## 6) Wiring diagram



Remark: This product has anti-inversion function inside, so there is no positive or negative difference between the lead wire, that is, +24V to connect one line at will, 4-20mA to connect another line.

## 7) Order code

### KH-HZD Selection of Piezoelectric Integrated Vibration Transmitter

#### KH-HZD-F-C□□-D□□-E□□-F□□

HD Type	C measuring range	D Thread	E Wire length	F Output
<b>F</b> (explosion-proof)	V: 01: 0~10mm/s 02: 0~20mm/s 03: 0~30mm/s ..... D: 11: 0~100um 12: 0~200um 13: 0~300um .....	11: M20*1.5 12: Other	01: 1m 02: 2m 03: 3m .....	4:4-20mA (default) S:RS485

**For example: KH-HZD-F -C(V02) -D(11) -E(02) -F(4) -T(1)**

Meaning: Type of measurement - - explosion-proof,

Measuring range - - 0-20mm/s

Installation mode - - M20 \*1.5mm

Cable length - - 2 meters

Output - -Vibration: 4-20mA;