

AC-4: HIGH PRECISION QUARTZ ACCELEROMETER

■ PRODUCT DESCRIPTION

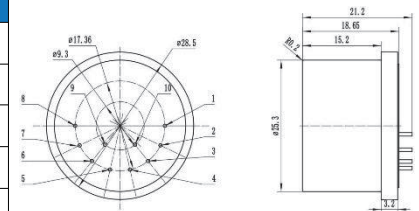


AC-4 quartz flexible accelerometer series is a high temperature and anti-vibration accelerometer, the product has excellent repeatability, starting performance, high temperature and high reliability characteristics, it can be used for static testing and dynamic testing, it is also a standard vibration sensor. Products adopt unique high temperature design, packaging process and special circuit, product output current is proportional to the measured acceleration, the user can calculate the appropriate sampling resistance, achieve high precision output, and according to the user demand built-in temperature sensor, used for the partial value and scale factor compensation, reduce the influence of environmental temperature. QA 650, T185, T160, JAE series products can be replaced in situ, but we adopt double torque structure, it is different from other company products.

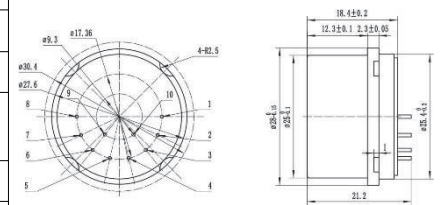
■ PRODUCT MAIN SPECIFICATION

Parameters	AC-4A	AC-4B	AC-4C	Unit
Range	±30			g
Bias k0/k1	<10	<15	<15	mg
One month composite repeatability	<50	<200	<200	μg
Temperature sensitivity	<50	<100	<100	μg / °C
Scale factor	1.1 ~ 1.3	1.1 ~ 1.3	1.1 ~ 1.3	mA/g
One month composite repeatability	<80	<150	<150	ppm
Temperature sensitivity	<100	<200	<200	ppm
Axis misalignment	<1500	<1500	<1500	μrad
Vibration rectification (@50~500Hz)	<30	<100	<100	μg / g2rms
Intrinsic noise (@0~10000Hz)	<3000	<3000	<3000	μg / g2rms
Temperature range (Operating)	-55 ~ 96	-55 ~ 155	-55 ~ 180	°C
Shock	500g	1000g	1000g	0.5ms
Vibration peak sin (@30~500Hz)	25	25	25	g
Threshold /Resolution	<10	<10	<10	μg
Bandwidth	>300	>300	>300	Hz
Quiescent current per supply	<20	<20	<20	mA
Quiescent power (@±15VDC)	<480	<480	<480	mW
Input Voltage	±13 ~ ±18	±13 ~ ±18	±13 ~ ±18	V
Weight	<55	<55	<55	g
Diameter below mounting surface	Φ25	Φ25	Φ25	mm
Height-bottom to mounting surface	<21.5	<21.5	<21.5	mm
Case material	300 series stainless steel			

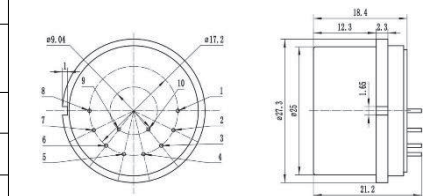
■ PRODUCT DIMENSION



Outline for AC-4A



Outline for AC-4B/AC-4C (Option I)



Outline for AC-4B/AC-4C (Option II)

■ PRODUCT APPLICATION

- inclination test of bridge, dam, oil well, coal mine, etc., high-speed railway control, ship stability control, etc