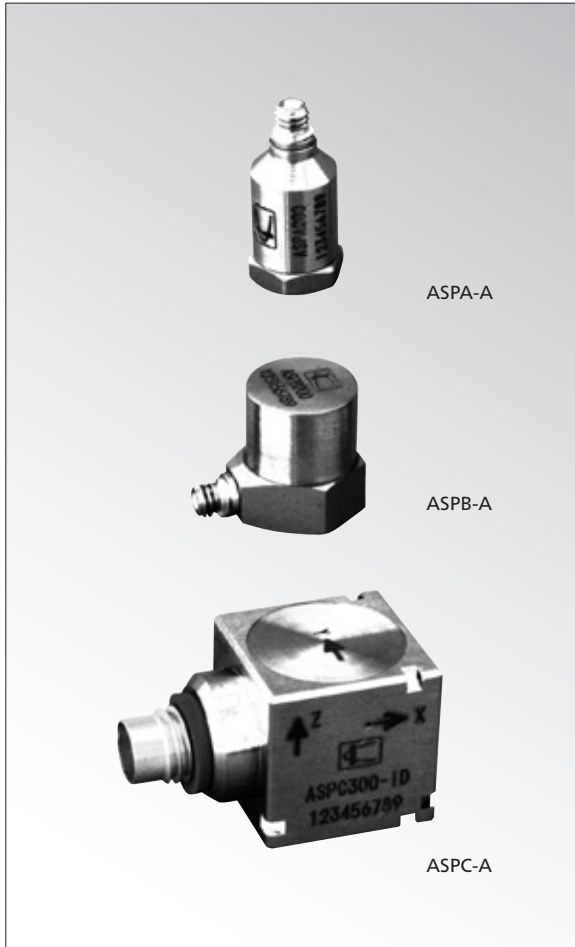


# ASPA-A/ASPB-A/ASPC-A

## Piezoelectric acceleration transducer (Built-in amplifier)



### Specifications

■ ASPA-A-200	
Rated Capacity	±2200 m/s <sup>2</sup>
Voltage Sensitivity	1.0 mV per m/s <sup>2</sup> ±10%
Resonant Frequency	Approx. 45 kHz
Frequency Response (±1 dB)	3 Hz to 12 kHz
Frequency Response (±3 dB)	1.5 Hz to 16 kHz
Impact Resistance	10000 m/s <sup>2</sup>
Operating Temperature	-30 to 100°C
Lateral Sensitivity	5% or less
Output Impedance	100 Ω or less
Weight	Approx. 2 g (Excluding cable)
Case Material	Titanium
Mounting Screws	Female screw (M3×0.5 depth 2)
Power Supply	15 to 25 VDC, 0.5 to 5.0 mA
Cable	Dedicated cable (Y01D0995) length approx. 2 m
	Tip connector
	· Transducer side - C29-104P
	· Measuring instrument side – miniature connector
	(Shield wire is connected to the case.)
Standard Accessories	Miniature BNC conversion connector

\*Acceleration (m/s<sup>2</sup>)

= Output voltage from sensor (mV) ÷ Voltage sensitivity (mV per m/s<sup>2</sup>)

■ ASPB-A-200	
Rated Capacity	±2200 m/s <sup>2</sup>
Voltage Sensitivity	1.0 mV per m/s <sup>2</sup> ±10%
Resonant Frequency	Approx. 45 kHz
Frequency Response (±1 dB)	3 Hz to 12 kHz
Frequency Response (±3 dB)	1.5 Hz to 16 kHz
Impact Resistance	10000 m/s <sup>2</sup>
Operating Temperature	-30 to 100°C
Lateral Sensitivity	5% or less
Output Impedance	100 Ω or less
Weight	Approx. 3 g (Excluding cable)
Case Material	Titanium
Mounting Screws	Female screw (M3×0.5 depth 2)
Power Supply	15 to 25 VDC, 0.5 to 5.0 mA
Cable	Dedicated cable (Y01D0995) length approx. 2 m
	Tip connector
	· Transducer side - C29-104P
	· Measuring instrument side – miniature connector
	Shield wire is connected to the case
Standard Accessories	Miniature BNC conversion connector

\*Acceleration (m/s<sup>2</sup>)

= Output voltage from sensor (mV) ÷ Voltage sensitivity (mV per m/s<sup>2</sup>)

**Wide measurement range, capable of measuring slight through to high accelerations.**

- High sensitivity, small size
- Capable of measurement of wide band, low to high frequencies
- Provides a wide measurement range, capable of measuring slight to high accelerations
- High mechanical strength
- Environmentally-resistant

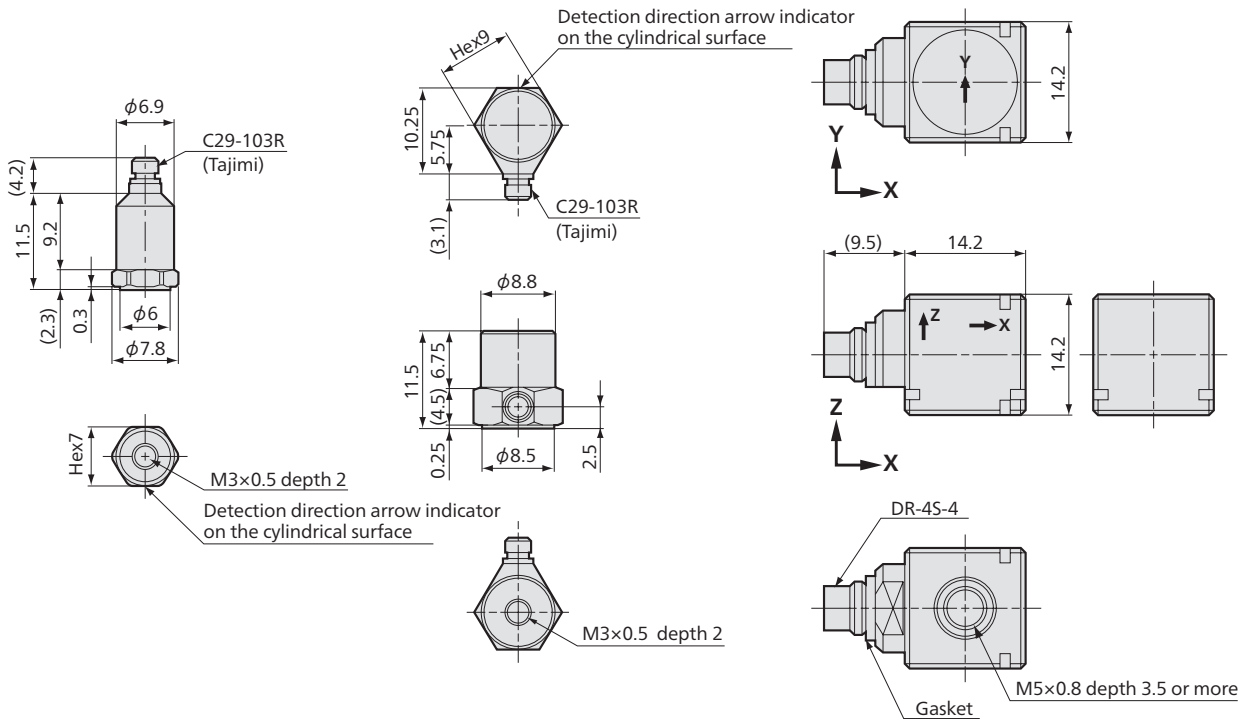


■ ASPC-A-30/ASPC-A-300/ASPC-A-30-ID/ASPC-A-300-ID	
<b>Rated Capacity</b>	ASPC-A-30: $\pm 400 \text{ m/s}^2$
	ASPC-A-300: $\pm 4000 \text{ m/s}^2$
	ASPC-A-30-ID: $\pm 360 \text{ m/s}^2$
	ASPC-A-300-ID: $\pm 3600 \text{ m/s}^2$
<b>Sensitivity</b>	ASPC-A-30: 10 mV per $\text{m/s}^2 \pm 10\%$
	ASPC-A-300: 1.0 mV per $\text{m/s}^2 \pm 10\%$
	ASPC-A-30-ID: 10 mV per $\text{m/s}^2 \pm 10\%$
	ASPC-A-300-ID: 1.0 mV per $\text{m/s}^2 \pm 10\%$
<b>Resonant Frequency</b>	Approx. 35 kHz
<b>Frequency Response (<math>\pm 1 \text{ dB}</math>)</b>	1 Hz to 5 kHz
<b>Frequency Response (<math>\pm 3 \text{ dB}</math>)</b>	1 Hz to 8 kHz
<b>Impact Resistance</b>	$30000 \text{ m/s}^2$
<b>Operating Temperature</b>	
<b>ASPC-A-30 / ASPC-A-300</b>	
-50 to 110°C (With operating power supply 0.5 mA to 5 mA)	
-50 to 70°C (With operating power supply 0.5 mA to 10 mA)	
However, the measurement side connector is -20°C to 60°C	
<b>ASPC-A-30-ID / ASPC-A-300-ID</b>	
-40 to 85°C (With operating power supply 0.5 mA to 5 mA)	
-40 to 70°C (With operating power supply 0.5 mA to 10 mA)	
However, the measurement side connector is -20°C to 60°C	

<b>Lateral Sensitivity</b>	5% or less
<b>Output Impedance</b>	1000 $\Omega$ or less
<b>Weight</b>	Approx. 11 g (Excluding cable)
<b>Case Material</b>	Titanium
<b>Mounting Screws</b>	Female screw (M5x0.8 depth 3.5)
<b>Power Supply</b>	21 to 24 VDC, 0.5 to 10 mA
<b>Cable</b>	Dedicated cable (Y01D0898) length approx. 3.3 m
	Tip connector transducer side DR-4S-1
	Measurement side BNC connector (BNC163)
	Shield wire is connected to the case.
<b>Sensor ID</b>	TEDS (IEEE1451.4)
	(ASPC-A-30 -ID / ASPC-A-300 -ID only)
<b>Other</b>	For 3 axes (X, Y, Z)

\*Acceleration ( $\text{m/s}^2$ )  
= Output voltage from sensor (mV)  $\div$  Voltage sensitivity (mV per  $\text{m/s}^2$ )

■ Dimensions



● Dynamic measurement

