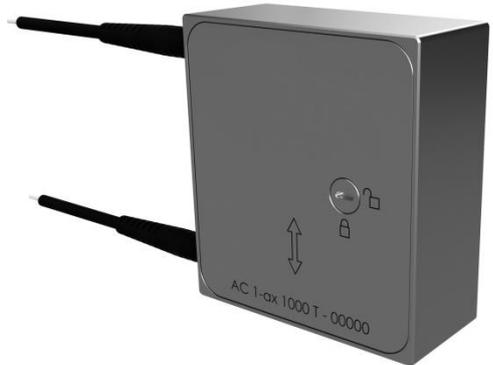


SAA-04 Single Axis Accelerometer

Basic characteristic

- ▲ Fiber Bragg Grating-based single-axis accelerometer, specifically designed to measure acceleration values up to 2g with unmatched sensitivity.
- ▲ This sensor enables the detection of ultra-low-level, low-frequency vibrations specifically for monitoring large structures, bridges, archways, overpasses, foundations, and detecting earth tremors.



Benefits

- ▲ Robust stainless steel
- ▲ Double-ended
- ▲ Unbeatable frequency range (0-160 Hz)
- ▲ Very high sensitivity
- ▲ Inbuilt locking mechanism¹⁾

Applications

- ▲ Detection of ultra-low-level vibrations
- ▲ Can be mounted on different surfaces including walls, etc.

Performance properties

Measurement range ¹⁾	±2g ²⁾
Sensitivity	1350pm/g ± 100pm/g
Frequency range	0 – 160Hz
Maximum shock	10g
Sensor resonance	> 240Hz
Operating Temperature range	-40°C to +60°C
Number of FBGs	2
Occupied bandwidth	~12nm
Ingress Protection rating	IP 67

¹⁾ The sensor needs to be unlocked before measurement, please, refer to the installation instructions.

²⁾ Installation of the sensor using the “Ceiling mount” will result in a range of -1/+3g.

SAA-04 Single Axis Accelerometer

Physical properties

Housing material	Duplex - 1.4462
Anchoring bolt	M5 / 5Nm
Dimensions (without cable) ¹⁾	50 x 55 x 22 mm
Weight (without cable)	400g
Cable type	3mm reinforced cable
Cable length ²⁾	1mtr
Cable Bend Radius (dynamic)	40mm
Cable Bend Radius (static)	30mm
Connector type ³⁾	FC/APC
Mounting method	Using a mounting block

¹⁾ For further dimensions details see the product drawing

²⁾ Cable length is extendable on request

³⁾ Other connector types available on request

Packaging

Cardboard box with dimensions: 370x290x45mm

Quality statement

The sensor is compliant with IEC 61757-1-1:2016/Ed1.0 and IEC 61757:2018

All sensors are 100% tested and calibrated at SYLEX

The sensor is manufactured according to ISO 9001:2008 and ISO 14001:2004

Optional accessories

- ▲ **WCP-01 Watertight connector protection** – used for FC/APC connector protection during the installation against dust and water – IP67 rated.
- ▲ **LCP-03 Longer cable pigtails** – used to extend the cable lengths from 1mtr up to 20mtr.
- ▲ **Optional 3-axis mounting block** - custom machined enclosure capable of housing three single-axis accelerometers and thus allowing subsequential measurement in all axes (more information available on request).

For more information contact our sales team at sales@sylex.sk

* Specifications are subject to change without notice