## **SV 104IS**

## **Intrinsically Safe Noise Dosimeter**

The SV 104IS is the intrinsically safe version of the revolutionary personal noise dosimeter, the SV 104. Both instruments offer a new approach to occupational health and safety noise monitoring presenting features such as 1/1 octave band real-time analysis and audio events recording functions which are a new quality in an instrument of this size. All results are clearly displayed on the amazing OLED screen which offers excellent visibility even in full daylight or darkness.

This personal dosimeter has a robust 1/2" MEMS microphone enabling easy calibration using most commonly available acoustic calibrators. The new microphone has a large dynamic range of the 90 dB which allows to measure noise from 60 dBA to 140 dBA. The long list of microphone advantages includes also the autocalibration feature and TEDS memory that stores the calibration info in the microphone itself. The auto-calibration means performing

the acoustic calibration automatically once the microphone is inserted into the calibrator.

The SV 104IS is a cable-free dosimeter and is typically attached to the user's shoulder, close to the ear using the mounting clips supplied. The instrument works with Svantek's health and safety software package, "Supervisor", that provides various tools for data analysis and reporting. The docking station supports data transfer to the PC through the infrared interface as well as handles the battery charging. Rechargeable batteries of SV 104IS are able to power the instrument for 50 hours.

#### **Features**

- Intrinsic safety in accordance to ATEX and IECEx
- Personal Noise Dosimeter conforming to IEC 61252 and ANSI S1.25
- Class 2 in accordance to IEC 61672
- Measurement range 60 dBA RMS ÷ 140 dBA Peak
- Automatic calibration start (auto-calibration)
- Vibration shock detection and recording
- Three parallel measurement profiles
- L<sub>(C-A)</sub> calculation
- 1/1 octave real-time analysis (option)
- Voice comments recording before and after measurement
- Audio events recording during measurement (option)
- OLED color display with super brightness and contrast
- Easy in use predefined setups
- Operational time > 50 hours







# SV 104IS Technical Specification

### **Noise Dosimeter**

Ctandards	IFC (13F2) add 1 (2002); ANGLED 2 F 1001 (B2007); Class 2 IFC (1672) 1 add 0 (2012)
Standards	IEC 61252 ed1.1 (2002); ANSI S1.25-1991 (R2007); Class 2 IEC 61672-1 ed2.0 (2013)
	ATEX: EN 50303:2000, EN 60079-0:2012, EN 60079-11:2012, EN 60079-26:2007;
	certificate number: FTZU 14 ATEX 0055X
	IEC 60079-0 ed6.0 (2011), IEC 60079-11 ed6.0 (2011), IEC 60079-26 ed2 (2006);
	certificate number IECEx FTZU 15.0001X
Weighting filters	A, C and Z
Time constants	Slow, Fast, Impulse
Exchange rates	2, 3, 4, 5, 6
Measurement results	Run Time (TIME), L <sub>peak</sub> , L <sub>max</sub> , L <sub>min,</sub> L, DOSE (%), Projected Dose D_8h, Projected Dose PrDOSE, Leq, LAV, LE, SEL8, E,
	E_8h, LEPd, PSEL, Ltm3, Ltm5, Ln statistics, Peak Threshold Counter (PTC), PTP, Upper Limit Time (ULT), TWA,
	Projected TWA (PrTWA), Lc-a, OVL
Measurement Profiles	3
Microphone	Class 2 microphone, 1/2" housing
Measurement Range	60 dBA RMS ÷ 140.1 dBA Peak
Frequency Range	20 Hz ÷ 10 kHz
Dynamic Range	90 dB
Data Logging <sup>1</sup>	Summary results for the measurement time and
	Time-history logging of Leq/Max/Min/Peak with adjustable logger step
Audio Recording	Audio events recording on trigger (option)
Voice Comments	Audio records on demand, created before or after measurement, added to measurement file
1/1 Octave <sup>1</sup>	Single channel 1/1 octave real-time analysis and spectra logging,
	9 filters with centre frequencies from 31.5 Hz to 8 kHz (option)

### **Basic Data**

Display OLED 128 x 64 pixels Ingress protection IP 65

Ingress protection\_\_\_\_\_IP 65 Memory\_\_\_\_\_64 MB

Interface\_\_\_\_\_Infrared(docking station necessary)

Keyboard\_\_\_\_\_3 push buttons

Power Supply

Rechargeable cell\_\_\_\_\_operation time > 50 hours<sup>2</sup>

**Environmental Conditions** 

Temperature\_\_\_\_\_from -10 °C to 50 °C

Humidity\_\_\_\_up to 90 % RH, non-condensed

Dimensions \_\_\_\_\_\_88 x 49.5 x 19.2 mm

Weight \_\_\_\_\_\_117 grams with battery

<sup>1</sup>function parallel to the acoustic dosimeter mode

<sup>2</sup>depends on configuration and environmental conditions



Continuous product development and innovation are the policy of our company. Therefore, we reserve the right to change the specifications without prior notice.



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