

# RADIATION PROTECTION MEASURING SYSTEMS

#### SEIBERSDORF LABORATORIES



## MEASURING SYSTEMS FOR RADIATION PROTECTION

The team of Seibersdorf Laboratories is Austria's largest provider of service, know-how and technology in the field of radiation protection and application. We support by expertise in external and internal dosimetry, high quality laboratory analysis and development of measuring systems for radiation protection.

## FOOD AND MATERIAL PROBE LMS3

#### FIELD OF APPLICATION

Our food and material probe LMS3 was designed for the quantification of radioactivity and identification of nuclides in various sample types. Industrial users appreciate the user-friendliness of the device in combination with its suitability for complex measurement tasks. Typical applications are: foodstuffs, juices, pet fodds, dietary supplements, raw materials, waste water, sewage sludge, finished products, alloys, components, test specimens etc.

#### **TECHNICAL DATA**

- Marinelli-beaker measurement geometry (500 ml)
- detector: 2" x 2" Nal(TI) scintillation detector
- minimum detectable activity concentration < 4 Bq Cs-137 in a measurement time of 1 h
- multi channel analyzer with 2000 channels resolution
- · weight: ca. 33 kg
- size: (23 x 29 x 44) cm
- connection to the PC via USB 2.0



#### **EASY HANDLING**

Our extensive experience in the laboratory working with gamma spectroscopy has enabled us to optimize this instrument's user-friendliness, facilitating easy handling of routine operations. The software has been customized to efficiently manage complex measurement tasks. The LMS-3 probe is designed so that no specialist knowledge of gamma spectroscopy is required to achieve reliable results in routine operations. All parameters to control the instrument are set via USB connection and managed by the software.

## DRINKING WATER MONITOR DWM3

#### FIELD OF APPLICATION

Our drinking water monitor DWM3 is a measuring system to surveil drinking water for radioactive contamination. Additionally we offer supplementary expertise for the analysis and interpretation of the results. The DWM3 is based on a highly sensitive scintillation detector for the gamma spectroscopic monitoring. Data are transfered automatically by LAN connection.

#### **TECHNICAL DATA**

• 55 mm lead shield for ambient radiation

measuring volume: 34 l

max. operating pressure: 5 bar (test pressure 6 bar)

• connections: 1/2" and 3/4"

• dimensions: 985 x 585 x 852 mm (wxdxh)

· weight: approx. 600 kg

• 63 x 160 mm (dxh) Nal(Tl) scintillation detector

• sensitivity: 0.5 Bq Cs-137 (measurement duration 1 h)

LAN connection through Fast Ethernet interface

· automated alerts via email or SMS



#### **EXPERT SUPPORT**

We offer various on-call service models up to guaranteed 24h/7d availability. Experts at Seibersdorf Laboratories are automatically notified in event of an alarm. Via remote maintenance, they can then access the spectra and immediately analyze them. Conclusions can then be drawn about the cause and the countermeasures.

## RADIATION PROTECTION MEASURING INSTRUMENT SSM1+

#### FIELD OF APPLICATION

Our radiation protection measuring instrument SSM1+ can be used universally: It is easy to operate, has a wide measuring range and a robust design. It facilitates dose and dose rate measurements from the range of natural background radiation up to very high exposures. The SSM1+ and its additional equipment offer a comprehensive system for all the essential measurement activities in practical radiation protection.

#### **TECHNICAL DATA**

measuring range: 0.50 μSv/h bis 5 Sv/h

 $0.05~\mu Sv$  bis 50~Sv

battery life: 500 h
humidity: 0 to 100%
air preasure: 60 kPa to 120 kPa
temperature range: -30°C to +50°C
size: 270 x 230 x 70 mm

connectors and cables: according to MIL-C-26482



#### ADDITIONAL EQUIPMENT

For special measurement problems, telescopic extensions and larprobes can be supplied: alpha-beta-gamma contamination probe, external gamma-probe, environmental probe and a large-area contamination probe. The SSM1+ can be used as both a portable and a stationary instrument.

#### CONTACT

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