# **RADIATION SCANNER / METER**

The radiation detector DT-9501 was developed to detect  $\alpha$ -,  $\beta$ -,  $\gamma$ - and x- radiation. The radiation meter DT-9501 provides many features including a large, high-resolution Backlit LCD backlit display with annunciators. The radiation detector DT-9501 has an internal data storage for up to 2000 data sets, which are saved either manually or automatically. Furthermore the radiation detector DT-9501 is equipped with a Bluetooth interface to transfer the measured data in real-time to a computer. With the software, that is included with the product, the data can then be further processed and reviewed. The radiation detector DT-9501 stands out with its high accuracy and practical design. The radiation detector can be applied in the pharmaceutical industry, laboratories, power plants, quarries, the emergency services, metal industries, petroleum reservoirs, environmental protection etc.

### Features

 $\alpha\text{--},\,\beta\text{--},\,\gamma\text{--}$  and x- radiation

High measuring accuracy

Internal data storage for 2000 values

Large LCD display

Bluetooth interface

Software for data processing

Low Power Consumption

Data Evaluation on PC









**SPECIFICATIONS** (Check the CEM web for detailed specifications)

### Types of radiation

 $\alpha$ -,  $\beta$ -,  $\gamma$ - and x- radiation

### Measurement ranges

Radiation dose rate: 0.1 .... 1000 µSv/h

Impulse dose rate: 0 ... 30,000 cpm, 0 ... 5000 cps Radiation dose accumulation: 0.001 µSv.. 9.999 Sv

Impulse dose accumulation: 0 ... 9,999

#### Sensitivity

108 pulses or 1000 cpm/mR/hr in Cobalt-60 in radiant environment with electricity of 1  $\mu$ Sv/h

Alpha radiation: above 4 MeV

Beta radiation: above 0.2 MeV

X-radiation: above 0.02 MeV

#### Accuracy

< 10 % (less than 500 µSv/h)

< 20 % (less than 600 μSv/h)

#### Selective Radiation

Combination of  $\alpha$ -,  $\beta$ -,  $\gamma$ - and x- radiation

#### Sensor

Halogen balancing sensor

### **Output Port**

Bluetooth

### Average Process Time

Manual or automatic, adjustable, between 2 ... 12 seconds

### Display

Digital LCD display, with bargraph display

### Alarm Function

Acoustic alarm for manually selected value

Average radiation value for normal environment

Less than 0 ... 0.2  $\mu$ Sv/h

## Internal data storage

Automatic, 2000 values

### Software

Data transfer with real-time speed, 2000 measurement values and recording

Operation temperature

0 ... +50°C

### Power Supply

3.6 V High Level energy Li-batteries

### Dimensions

200 x 70 x 45 mm

### Weight

206 g

### **Included Accessories**

• Instruction Manual • Software • Carrying Case • Test Report

DT-9501