

# Radon Scout / Plus

Electronical radon monitor



## Applications:

- for long-term measurements of the activity concentrations of airborne **radon** ( $^{222}\text{Rn}$ ) in homes, at workplaces (also underground)
- eminently suitable for the direct **control of ventilation systems**

## Features:

- highest sensitivity in its class
- US EPA certified device
- shows the radon concentration time-resolved, even below  $100\text{ Bq/m}^3$
- Radon Scout switching threshold set to  $300\text{ Bq/m}^3$ , freely selectable with Radon Scout Plus
- battery-powered, autonomous operation for several months, additional plug-in adapter for the Radon Scout Plus
- remote access and data transmission possible
- sensors for temperature, humidity and an integrated motion detector, the Radon Scout Plus also has an air pressure sensor
- LCD display on the Radon Scout Plus
- DAkkS-accredited calibration according to DIN EN ISO/IEC17025:2018

**Radon measurement**

<b>Detector type</b>	semiconductor detector with HV-chamber
<b>Measuring range</b>	1 ... 10.000.000 Bq/m <sup>3</sup>
<b>Sensitivity</b>	1,8 imp/min @ 1000 Bq/m <sup>3</sup> (independent of humidity)
<b>Accuracy</b>	<=6%
<b>Stat. error</b>	200 Bq/m <sup>3</sup> with 20% stat. error (1 $\sigma$ ) at 1h interval 1.000 Bq/m <sup>3</sup> with stat. error (1 $\sigma$ ) < 10 % at 1h interval 100 Bq/m <sup>3</sup> with 17% stat. error (1 $\sigma$ ) at 3 h interval
<b>Response time</b>	120 minutes to 95% of final value
<b>Integrated sensors</b>	relative humidity, temperature, tilt and Radon Scout Plus: barometric pressure
<b>Integration interval</b>	1 h or 3 h selectable Radon Scout Plus: 1...255 min adjustable per minute
<b>Potential-free switch contact</b>	threshold level fixed to 300 Bq/m <sup>3</sup> (EU reference value) Radon Scout Plus: adjustable threshold max. 60 V, 400 mA, peak current 1.5A

**Instrument**

<b>Data storage</b>	non-volatile memory (circular structure) 672 data records Radon Scout Plus: 16.383 data records
<b>Power supply</b>	3,3 V, 2 x D-size cell (Ni-Cd, NiMH or Alkaline) Radon Scout Plus: additional external DC adapter
<b>ATEX category</b>	No
<b>Interfaces</b>	USB, RS232
<b>Battery life</b>	> 90 days
<b>Operation</b>	single switch, measurement/stand-by (lock-function) Radon Scout Plus: display with backlight
<b>Environmental conditions</b>	temperature 0 ... 40°C rel. humidity 0 ... 95%, non-condensing bar. pressure 800 ... 1.100 hPa
<b>Dimensions</b>	175 x 135 x 55 mm

<b>Weight</b>	800 g (incl. batteries)
<b>Radon Vision Software (incl.)</b>	set-up, data download interactive graphical display (zoom, pan, fit data-cursor, marker for tilt and start of a new measurement, error bars, smoothing) selective ASCII export (EXCEL format) selective graphical protocol print (space for individual header, user comments) calculation of average concentration and exposure automatic created file names and path structure switch over between US and SI-units (Bq/m <sup>3</sup> / pCi/L)
<b>Scope of delivery</b>	Radon Scout / Radon Scout Plus USB cable 2 batteries, type D manual & software (electronic version) DAkkS-accredited calibration certificate according to the DIN EN ISO/IEC 17025:2018 Radon Scout Plus: power adapter