

# AOD-210

## OUTDOOR WIRELESS DUAL-TECH MOTION DETECTOR

The **AOD-210** detector is designed for operation as part of the **ABAX 2/ABAX** two-way wireless system, both outside as well as inside protected premises, where special environmental conditions prevail (e.g. halls). The detector complies with the EN 50131 Grade 2 requirements (for indoor use).

The use of two detection paths (PIR + MW), combined with advanced digital signal processing and dynamic temperature compensation, ensures effective motion detection. The device can also be used for protection of the creep zone, as well as for implementation of the Pet function i.e. immunity to movement of pets (up to 20 kg). **AOD-210** supervises the motion detection system and indicates possible irregularities in its operation. The detector is characterized by high false alarm immunity.

**AOD-210** has built-in temperature and dusk sensors (with adjustable sensitivity), which allow it to be used in alarm systems that include home automation, without having to install additional solutions. LED indicators show violations in the test mode, thus facilitating the detector testing process.

Configuration of the device and updating of its firmware are carried out remotely. Radio communication within the **ABAX 2** system is encrypted using AES encrypted.

The detector has a polycarbonate enclosure (protection rating IP54), on which a protective cover can be mounted: **HOOD C** (white) or **HOOD C GY** (gray). Design of the AOD-210 detector allows it to be mounted directly on a flat surface. If the device is to be tilted vertically or horizontally, special angle-type or ball-type mounts must be used, included in the **BRACKET C** (white) or **BRACKET C GY** (gray) set and also in the **BRACKET E** set.

To increase the detector's distance from the wall, even by a dozen centimeters, it is worth using the modular **BRACKET E** mount. This will prevent limitation of the device detection area by cornice, external blind, cable gutters, lamp, gutter or wall unevenness. The detector is provided with tamper protection against opening of enclosure and removal from the mount.

**AOD-210** is available in two color versions: white (**AOD-210**) and gray (**AOD-210 GY**).

- compliance with the EN 50131 Grade 2 requirements (for indoor use)
- two detection paths: PIR (double pyroelement) and microwave
- detection area 16 m x 16 m, angle 90°
- high immunity to false alarms
- advanced digital signal processing
- dynamic compensation of temperature changes
- creep zone control
- built-in dusk sensor
- remote configuration and updating of the firmware
- compatible with:
  - **ABAX 2** system controllers (**ACU-220** and **ACU-280**) and **ARU-200** radio signal repeater
  - **ABAX** system controllers (**ACU-120**, **ACU-270**, **ACU-250** and **ACU-100** (min. version 4.04), **INTEGRA 128-WRL** control panel and **ARU-100** radio signal repeater – the required version of the device firmware should be checked in its description on the website)
- range of radio communication in the open area:
  - in **ABAX 2**: up to 2000 m (with **ACU-220**) / up to 1600 m (with **ACU-280**)
  - in **ABAX**: up to 500 m



- built-in temperature sensor (temperature measurement from  $-40^{\circ}\text{C}$  to  $+55^{\circ}\text{C}$ )
- independently adjustable sensitivity of PIR and MW paths and dusk sensor
- three LED indicators of violations in the test mode
- immunity to the movement of pets (up to 20 kg)
- splash-proof, weather-resistant polycarbonate enclosure with IP54 protection rating
- low energy consumption and battery status check
- "ECO" option for extending battery life (**ABAX 2** only)
- power supply: CR123A 3 V battery
- can be mounted directly on flat surface or, optionally, using the:
  - **BRACKET C** set:
    - angle-type bracket: fixed angle  $45^{\circ}$
    - ball-type bracket: adjustable up to  $60^{\circ}$  vertically and up to  $90^{\circ}$  horizontally
  - **BRACKET E** set:
    - **BRACKET E-1** (GY) – body for attaching the BRACKET E-2B inserts
    - **BRACKET E-2B** (GY) – insert for the mounting AOD-210 outdoor motion detectors
    - **BRACKET E-3** (GY) – 30 mm distance piece enabling the detector to be distanced from the wall or ceiling
    - **BRACKET E-4** (GY) – 20 mm mounting base
    - **BRACKET E-5** (GY) – ball-joint bracket: adjustable vertically through  $60^{\circ}$  and horizontally through  $90^{\circ}$  – for the OPAL series of outdoor motion detectors
    - **BRACKET E-6** – tamper sensor with NO/NC switch and 500 mm long cables
- tamper protection against opening of the enclosure / removal from the mount
- **HOOD C** protective cover can be optionally mounted on the enclosure

## TECHNICAL DATA

Battery working time (in years)	up to 2
Detected target velocity	0,3...3 m/s
Operating temperature range	-40°C...+55°C
Recommended mounting height	2,4 m
Max. current consumption	30 mA
Weight	182 g
Maximum humidity	93±3%
Operating frequency band	868,0 ÷ 868,6 MHz
Battery	CR123A 3V
Standby current consumption	75 µA
Dimensions	65 x 138 x 58 mm
Environmental class according to EN50130-5	IIla
Complied with standards	EN50131-1, EN50130-4, EN50130-5
Temperature measurement accuracy	±1 °C
Microwave frequency	24,125 GHz
Security grade according to EN50131-2-4	Grade 2
Warm-up period	40 s
IP code	IP54
Radio communication range (in open area) for ACU-120	up to 500 m
Radio communication range (in open area) for ACU-270	up to 500 m
Radio communication range (in open area) for ACU-220	up to 2000 m
Radio communication range (in open area) for ACU-280	up to 1600 m
Temperature measurement range	-40°C...+55°C
Detection area	16 m x 16 m, 90°