SPORTident AIR+ Signal Indicator

Description

- The AIR+ Signal Indicator is a Received Signal Strength Indicator (RSSI) for SPORTident Stations in AIR+ mode. It can be used to **messsure and indicate** the signal strength and range of the field emitted by the station, to ensure that all athletes with SIACs in the area around the station are detected.
  If the stations are located close to each other, the Signal Indicator helps to ensure that there is sufficient distance between the stations and that interference is avoided.

- The AIR+ Signal Indicator is similar to the SIAC in function and **sensitivity**, both have the same housing shape.

- The **optical feedback signal**, emitted by the AIR+ Signal Indicator, indicates the strength of the field emitted by the station. A fast flashing red LED indicates high field strength, a slow flashing red LED indicates low field strength. If the red LED remains off, no field is detected.
  In the area where the Signal indicator detects a field, a SIAC will register a punch/ time from the station. Otherwise, the SAIC will not register a station either.

- There is no acoustical feedback signal.

- No data of the measurements (comparable to the punches of a SIAC) are stored on the AIR+ Signal Indicator itself.

- The AIR+ Signal Indicator must be **activated** before usage. Activate it like a SIAC by punching it into a SIAC ON, SIAC Test or CHECK station. The Signal Indicator indicates an active state with a slowly blinking green LED.

- To **measure the field** of a station, turn on the station first and bring the AIR+ Signal Indicator close to the station. If the Signal Indicator is in the field of the station, it indicates this with a flashing red LED.

- **Deactivate** the AIR+ Signal Indicator after use by punching it into a SIAC OFF station. So that the signal strength of a station in FINISH mode can also be measured, the Signal Indicator does not switch off at this station.

- A built-in short-range radio (SRR) enables the **transmission of signal strength** for more detailed evaluation. The protocol is identical to that of SIAC. Instead of the time stamp, the signal strength is coded. The Signal Indicator sends its measurement data whenever it is in a field of a station. The radio setting of the station has no influence on this.

- AIR+ Signal Indicator is available in the standard colour orange and with the ID 8 000 000. All signal indicators use the same ID. The device is labeled with "INDICATOR" instead of its ID.

Specifications

Model type	Finger stick
Number range	8 000 000 [1]
Typical applications	For all kinds of sports
RFID frequency	125 kHz
Radio frequency	2.4 GHz (Short range radio - SRR)
User feedback signal	Optical signals, configurable
AIR+ ON	by CHECK, SIAC ON or SIAC Test, slowly flashing green LED indicates ON state
AIR+ OFF	by FINISH or SIAC OFF
SPORTident system compatibility Firmware stations	- SPORTident stations BS7/8/9, firmware V6.00 and higher - SPORTident stations BS11, firmware V7.00 and higher
Operating temperature range	-20°C … +50°C
Protection class	IP 67 (DIN EN 60529) - Protection against penetration of dust - Protection against the ingress of water during short-term immersion
Battery life time	Up to 4 years
Battery exchange	yes, by SPORTident
Warranty	2 years, except for battery
Weight	11 g
Dimensions	68 mm x 21 mm x 12 mm
Colours	Orange body, white tip with logo

Battery exchange

The AIR+ Signal Indicator contains a battery. The battery has a finite lifetime. Therefore, the battery needs to be sent in for battery exchange every once in a while to continue using the AIR+ Signal Indicator. The battery exchange is carried out by SPORTident and a number of service points operated by close partners of SPORTident.

> It is recommended to replace batteries **three years** after the production date or the last battery exchange date.

The next battery exchange can be determined as follows:

- Config+ shows the battery date after a readout. This date plus three years is the

recommended battery exchange date.

> The **SIAC Battery Test** station and **Config+** evaluate the battery voltage. If the SIAC Battery Test station or Config+ indicate a warning or failure for the battery voltage then the battery should be replaced.

[1] All signal indicators use the same ID.