**PEN mini 6.1**

**HF-RFID read/write module in pen style**
- very useful for small transponders
- also suitable for transponder sizes up to chip cards (not recommended for mic3 transponders)
- based on ISO 15693 and 14443

With the PEN mini type continues microsensys the successful pen style product family of smart, flexible and low power 13.56MHz RFID read write units.

The device is very useable for mobile and stationary data acquisition in administration, industry and logistics. microsensys offers an attractive component platform for closed coupling RFID solutions.

### RFID Technology:
- closed coupling RFID system iID®2000 / 3000
  - based on ISO 15693, ISO 14443
  - I-CODE®, Tag-it®, my-D®, iID®G, iID®K, TELID®200/300
  - further chip solutions are supported partly: Mifare®, inside, Sony Felica sensor and high memory systems on inquiry

### Basics:
- short range read/write communication
- command sets of iID® driver engine
- downloadable reader operation system for upgrades

### RFID Air Interfaces:
- 13.56 MHz RFID, high speed and fast mode
- Operating Distance: 0 ... 30 mm depending on transponder antenna and chip type
- Reader Antenna: integrated antenna K3
- Field Direction: axial

### HOST Interface:
- USB 1.1 or RS232TTL
- Data Rate: up to 115.2 kbps
- Connector: standard USB or SubD 9male
- Power Supply: 5V, stab., low noise
- Power Consumption:
  - IDLE mode: typ. 20mA
  - SLEEP mode: not implemented
  - ACTIVE mode: typ. 150mA

### Software Interface:
- iID® driver engine (Windows)
- see actual API documentation of microsensys

### Device Size:
- L130 mm, D12 mm

### Casing Material:
- aluminium tube, plastic pin with integrated antenna

### Cable Length:
- SubD-9: 1.0 m, USB: 1.5 m

### Operation Temperature:
- 0°C ... +45°C

### Atmospheric Humidity:
- 30% ... 75%, not condensed

### Storage Temperature:
- -25°C ... +75°C

### Emissions:
- examine for EN 300330

### Protection Class:
- IP 64 (not for connector)

### Accessories:
- PC Adapter for PENmin 232

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*) in development or delivery only for special projects