

## RFID Card Reader with external antenna for integration into machines and terminals ID CPR47-A (13.56 MHz)



### FEATURES

- RFID Card Reader with flat, external antenna for direct mounting on metal
- Designed for integration into ATM, Ticket-, Parking and Vending machines as well as charging stations
- IP65 protected front, IK10 vandalism protection
- EMVCo Level 1 certification
- Interfaces: USB, RS232 & RS232LVTTL
- 6 LEDs & Buzzer

Figure shows external antenna ID CPR.ANT8690





## SHORT DESCRIPTION

### Order description:

ID CPR47-A                      RFID Card Reader  
 ID CPR.ANT8690                External antenna for ID CPR47-x

ID CPR47-A is a RFID Card Reader and is designed for connection to the external antenna ID CPR.ANT8690, which can be mounted directly on the metal surface of a machine. Equipped with high protection class (IP65) and high impact resistance level (IK10), the antenna provides maximum protection against environmental influences and vandalism.

The modular concept allows flexible installation and is ideal for retrofitting into existing machines and terminals.

Due to an automatic power management and a very low standby power consumption, the system is optimally suited for solar- and battery-powered machines and terminals.

Certification according to EMV Level 1 allows the integration of ID CPR47-A in payment applications.

Data transfer between reader and host is AES256 encrypted.

### Scope of delivery:

- Card Reader ID CPR47-A
- Mounting instruction

## TECHNICAL DATA ID CPR47-A

|                        |   |
|------------------------|---|
| Dimensions (W x H x D) | 85 mm x 105 mm x 28 mm  |
| Housing                | Plastic   |
| Weight                 | approx. 150 g   |
| Protection class       | IP 30   |
| Temperature range      | -25 °C up to 70 °C (operation)<br>-40 °C up to 80 °C (storage)                  |
| Relative humidity      | 95 % (non condensing)   |
| Supply voltage         | 8 V – 42 V DC   |
| Power consumption      |   |
| Operation              | 500 mA maximal  |
| Standby Mode           | approx. 100 µA (5 V input voltage)  |
| Operating frequency    | 13.56 MHz   |
| RFID interface         | ISO/IEC 14443-A / -B  |
| Antenna                | Connection for ID CPR.ANT8690   |
| Power Management       | Automatically, wake-up by card,<br>wake-up by host                              |
| Host interfaces        | USB On-The-Go, RS232, RS232-LVTTL   |
| MTBF                   | 150.000 hours   |
| Operation mode         | Polling Mode (OBID® ISO-Host)   |
| I/O interfaces         | 1x input (digital, only alarm clock function)<br>1x output (digital, TTL level) |
| Supported transponders | ISO 14443-A <sup>1</sup><br>ISO 14443-B <sup>2</sup><br>NFC <sup>3</sup>        |

<sup>1</sup> e.g. mifare® classic (mini, 1k, 4k), mifare® UltraLight, mifare® DESfire, Smart MX, my-d® proximity, SLE44R35S, SLE55R..., etc., Jewel™

<sup>2</sup> e.g. SLE66CL, ST19XR34, RF360 etc.

<sup>3</sup> NFC Type 1, 2 and 4 in Read/Write and NFC Card-Emulation-Mode

\* Read ranges depend on transponder sizes; here made statements relate on inlet size of 76 x 45 mm

## STANDARD CONFORMITY

|                |  |
|----------------|--|
| Radio approval |  |
| Europe         | EN 300 330                             |
| EMC            | EN 301 489                             |
| Security       |  |
| Low voltage    | EN 60950                               |
| Human Exposure | EN 50364                               |
| Environment    | WEEE – 2002/96/EC<br>RoHS – 2002/95/EC |
| Payment        | EMV Level 1 contactless                |

## OEM

SDK for Microsoft Windows® and Linux.  
(C++, Java, .NET)

FEIG ELECTRONIC reserves the right to change specification without notice at any time.  
Stand of information: November 2016.



## SHORT DESCRIPTION

### Order description:

ID CPR.ANT8690 External antenna for ID CPR47-x

The external RFID antenna ID CPR.ANT8690 is provided for operation with the RFID Card Reader ID CPR47-A.

The robust and very flat antenna is designed for direct mounting on front panels of metal. It is suitable for retrofitting of ATM, ticket-, parking- and vending machines as well as charging stations on site, optimally.

The antennas dimensions are compatible with the standard EVA cutting for vending machines.

Connected with the RFID Card Reader ID CPR47-A it is certified according to EMVCo Level 1 contactless.

The antenna offers high protection against environmental influences and vandalism and is approved for outdoor use.

### Scope of delivery:

- Antenna ID CPR.ANT8690
- Mounting instruction

## TECHNICAL DATA ID CPR.ANT8690

|                         |  |
|-------------------------|--|
| Dimensions (B x H)      | 86 mm x 90 mm  |
| Housing                 | Plastic  |
| Weight                  | approx. 150 g  |
| Protection class        | IP 65 (font)   |
| Impact resistance level | IK10   |
| Temperature range       | -25 °C up to 70 °C (operation)<br>-40 °C up to 80 °C (storage) |
| Relative humidity       | 95 % (non condensing)  |
| Operating frequency     | 13.56 MHz  |
| RFID interface          | ISO/IEC 14443-A / -B   |
| MTBF                    | 500.000 hours  |
| Optical indicators      | 4 green LEDs (EMV-Mode) or<br>green / yellow / red LED         |
| Buzzer                  | integrated   |

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