readID™ One SE 1220 MNP

USB Reader for MIFARE Classic® CSN/Sector, MIFARE Ultralight® CSN, MIFARE® DESFire® CSN/App, EM 4102, FSK Prox & HiTag2 CSN



Functional description

Design for easy registration of RFID cards in access control software. The card reader interface connects to a pc via USB (2.0) and the required driver is automatically loaded (Windows, MAC OS & Linux).

When presenting a card or tag to the readID™ One card reader the card data is transferred to pc as keyboard data. The card reader contains both a 13,56 MHz and 125 kHz radio.

This allows for integration with existing software where card data usually is being typed into the system.

The readID™ One card reader supports the following encryption types: Crypto1 for MIFARE Classic and 128 Bit AES for MIFARE DESFire EV1/2/3.

CARD TECHNOLOGY	DATA TYPES	DATA	FREQUENCY
NXP MIFARE Classic®	Sector data or UID/CSN	32, 56 & 128 Bit	13,56 MHz
NXP MIFARE® DESFire®	App data (AES) or UID/CSN	56 & 8-256 Bit	13,56 MHz
NXP MIFARE Ultralight®	UID/CSN	32 & 56 Bit	13,56 MHz
ISO 14443A	UID/CSN	32 & 56 Bit	13,56 MHz
ISO 15693	UID/CSN	64 Bit	13,56 MHz
EM 4102 / TK 4100	UID/CSN	40 Bit	125 kHz
FSK Prox	Card Data	26-37 Bit	125 kHz
HiTag™ 2 CSN	UID/CSN	32 Bit	125 kHz

The custom format allows for verification of valid data received on bit length and selecting part of the card number by use of offset and data length. Output data can be formatted as decimal or hexadecimal and can be truncated – Please see the user manual for the SBR 0814 / 0904 / 0952 / 0962 / 0993 / 1001 / 1030 / 1220 product family.



How to order

When ordering a card reader please specify: product number & configuration in the following manor:

Version	SE 1220 MNP	readID™ One
Configuration	SE 1220 SFN	Format ID: xx , CR = On / Off, Leading Zero Removal, Reverse Byte Order

Selecting data format

The firmware in the readID™ One card reader allows for multiple output formats in order to match the card data presentation in the receiving system.

The chip serial number of a MIFARE or Prox card or tag is stored in binary format but is often displayed in decimal format. To allow easy integration the most commonly used formats have been implemented in the standard firmware.

Each format has multiple selectable options, one for enabling 'Enter/CR' as end of transmission character and one for enabling format specific options like padding (#xxx...xxx#), Full Length UID, Leading Zero Removal, Reverse Byte Order can also be selected.

On site configuration requires seucu.exe utility, which is freely downloadable from www.securityengineering.dk

The current format list is available on the website.

Audio & visual indication

The readID™ One card reader is equipped with a buzzer for acoustic indication and a set of multicolor LEDs for visual indication.

At connection of the unit to the USB port the LED sequence red -> yellow -> green indicates correct initialization.

Transmission of data is indicated with a green flash and activation of the buzzer.

Errors in the card data is indicated with a double red flash and activation of the buzzer.

Firmware

The USB reader can be firmware updated in field using the seucu.exe utility, which is freely downloadable from www.securityengineering.dk.

Standard firmware supports USB HID - Human Interface Device class with keyboard emulation.

Alternative firmware is available with USB CDC - Communication Device Class for COM-port emulation.

Data

Dimensions	89 x 57 x 12 mm (L x W x H)	
Color	Black	
Connection	USB A Connector on fixed cable – USB 2.0 interface	
Cable	Fixed mount / 1,8 m / Black – Option for 0,5 m cable	
Commodity code	8471.60.70.90	
Country of Origin	DK	
ECCN code (US)	N	
Export list number (EU)	N	
Certification	CE & UKCA	

