

F1

Contactless Smart Card LCD Keypad Reader is a user friendly and multi-technology physical Access Control reader, it is a water proof design that suitable for different indoor and outdoor installation environment, it made by high-quality material and with touch sensor keypad technology to ensure enhanced reliability and long-term duration.

LCD can display custom graphics or company name, date, time, card number, cardholder name, access grant, and access denied message.

Reader wiegand output can directly connect to any wiegand door access controller, the reader ACX scramble RS485 output ensures the data cannot be snooped by external device.



FEATURES

- Waterproof IP65 Contactless Technology LCD Keypad Reader
- 125KHz, 13.56MHz & Bluetooth 2.4GHz enable, dual technologies in the reader
- 128 x 64 dots Characters LCD graphic display, green backlight support
- LCD graphics display custom graphics or company name, date, time and access message or card number, multi-language supported
- Water proof capacitance touch sensor technology, 3 x 4 Key, 0 to 9, *, #
- Internal Real time clock
- RED / Green / Blue or mixed color LED bar, user defined LED ON / OFF time interval, LCD contrast adjustable
- Internal buzzer, user defined buzzer ON / OFF time interval
- User define wiegand pulse interval to serve different door access panel
- User defined "I am alive" feature
- Touch sensor keypad, overcome the membrane keypad problem



CARD TECHNOLOGY

Card Technology	Card Number Output	Item No. (RF / RF+BLE)
HID iCLASS	1 ~ 64 bits CSN ; HID card number	91HF01 / F111
HID 125 KHz	HID card number	91LF01 / F112
EM	1 ~ 40 bits CSN	91LF01 / F113
Mifare Classic 1K / 4K	1 ~ 56 bits CSN ; Custom data models	91HF01 / F114
SONY Felica CSN	1 ~ 64 bits CSN	91HF01 / F115
Mifare Plus S / X	1 ~ 56 bits ; Custom data models	91HF01 / F116
Mifare DESFire EV1 / EV2	1 ~ 56 bits ; Custom data models	91HF01 / F117
LEGIC Prime / Advant	1 ~ 64 bits ; Custom data models	91HF01 / F118

SPECIFICATION

F1 Contactless Smart Card LCD Keypad Multi-Tech Reader	
Bluetooth	2.4 GHz Bluetooth 4.0
Reader Output	Wiegand, Clock and Data, OSDP in RS485, ACX Scramble in RS485
QR Code Min. Resolution	5 mil, 1 mil = 0.0254mm
Typical Read Range	Bluetooth Technology : 0.5m to 10m, 13.56 MHz ISO card : 4cm+, 125 KHz ISO card : 6cm+ Typical read range achieved in air; different types of metal will cause some degradation Use spacers to space product off metal and improve read range if required.
I Am Alive	User define 1 bytes "I am alive" data in a certain interval, apply for wiegand interface
Reader Cable	Power, Ground, Wiegand D0 / Magnetic Card Format Data, Wiegand D1 / Magnetic Card Format Clock, Magnetic Card Format Card present, RS485(A), RS485(B), Green LED / Permission approval, buzzer, hold, signal mask line
Mounting	Wall Switch Size; designed to mount and cover single gang switch boxes primarily used in the Americas and includes a slotted mounting plate for European and Asian back box spacing
Visual Indicator	LED line in RED / Green / Blue / Amber / Purple / White / Light Purple color, user defined LED ON / OFF time interval
Audio Indicator	Internal buzzer, user defined beep sound ON / OFF time interval (ms)
Color	Black or White
Dimension	85mm x 130mm x 20mm
Product Weight	220g
Operating Voltage	9-16 VDC, Linear supply recommended
Operating Current	110mA AVG, 130mA PEAK
Operating Temperature	32° to 122° F (0° to 50° C)
Storage Temperature	23° to 140° F (-5° to 60° C)
Operating Humidity	5% to 95% relative humidity non-condensing
Certification	IP65, CE 0700, NCC, RoHS
Panel Connection	Pigtail
Housing Material	Polycarbonate
Cable Distance	Wiegand interface: 500 feet (150 m), RS485 interface: 4000 feet (1200 m) Recommended cable is ALPHA 1295 (22 AWG) 5 conductor minimum stranded with overall shield or equivalent
Reader Installation Height	It is recommended that the center of the card reader be 1.35 meters above the ground