

Reader

I 、 Brief Introduction

The card reader adopts advanced RF receiving circuit and insets Micro control circuit design, Combined with efficient decoding algorithm, it has the features of high receiving Sensitivity, lower working current, fast response speed, stable performance etc. It can support the output of Wiegant 26 and Wiegant 34. Card reader widely used in access control, time attendance access control, building, hotel, anti-theft etc all kinds of RFID application fields.

II 、 Installation Precautions

Card reader must install on the wall which made by wood, cement or brick, around 10 cm radiuses, no large area iron and steel products.

III、 Technical parameters

Specifications	ID Wiegand	MF wiegand
Working voltage	DC 9~15V	
Working current	50mA(MAX),Static current:35mA	
Working frequency	125k \pm 1KHz	13.56MHz \pm 5kHz
Supported standard	/	ISO14443A
Response time	120ms	20ms
Communication connector	Wigand 26/34	
Card	ID & EM Compatible card	MFI S50/ S70
Detection distance	50~150mm	35~80mm
Ways to protect the Reader	Power reverse connection; Data line voltage protection with maximum of 18V	
data transmission Distance	\leq 100m	
Ambient temperature	-25 $^{\circ}$ C to 60 $^{\circ}$ C	
Relative humidity	10%~90%RH	
Protection class	IP65 , water prevention and dirt Prevention	

IV、 Connection line definition

Connecting line color	ID Wiegand	MFWiegand
Red	VCC anode of power supply	
Black	GND cathode of power supply	
Green	DATA0 Wiegand date line	
Yellow	DATA1 Wiegand date line	
Blue	BUZZER control line, lower level effective	
White	LED control line, lower level effective	
Grey	Dangling is WG26 ways, connect GND is WG34 way	

V、 Influence factors of card read distance

Due to RFID card completely depend on RF signal to transfer power energy and data signal between reader equipment and card; therefore, it's easy to disturbed by surroundings, key influence is the distance of card read. Following are main interference factors:

1、 Metal interference

If there has metal material exists around Antenna ,metal material will shielding or interference card reader projectile electromagnetic wave to outside, will influence the card read distance ,even lags in response or can't read card. In order to avoid metal interference, when installation It better makes the card reader apart from the metal at least 30mm, or informs the manufactory to change the product parameter to adapt the needs of installation.

2. Mutual interference

If the distance between two card reader equipment is less than 0.3m, its will mutual interference, so if need to install more than two sets in same place, the distance between each other should be greater than 0.3m.

3. Power interference

If the power performance not good, will cause voltage unstable, if it fluctuation too big will affect the distance of card read.

4. EMI Electromagnetic Interference

The electromagnetic clutters from outside

5. Different card

The distance of card read have difference within different card.

VI、 Original Packing list

Card reader: 1 pc

Self-tapping screw: 2pc

Instructions: 1 paper

Expansion plunger: 2pc