WIEGAND USB Converter

Data Sheet

The WIEGAND USB Converter connects a wiegand interface to a PC via USB. It decodes the wiegand signal and outputs the data into any PC application which accepts keyboard entry.

A 10 way DIP switch on the back of the unit is used to select the required output format. A green LED is used to indicate a successful data transfer and a red LED indicates an error condition.

The reader has a mini B USB socket and when connected to the PC the device enumerates as a Human Interface Device (HID class).

Specifications

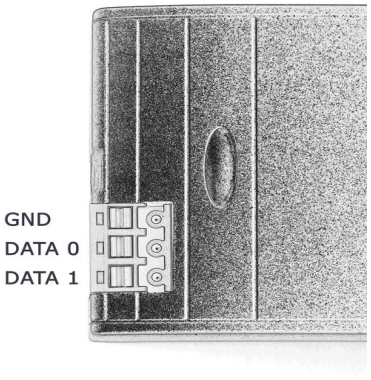
- Power requirements: USB bus powered. Current consumption 60 mA (typical)
- 3 wire wiegand interface, GND, Data 0, Data 1: 3V to 5V levels
- Wiegand input formats supported: 26 bit, 34 bit, 37 bit, 42 bit, 44 bit; with parity checking
- Output formats supported: Hexadecimal or decimal digits with or without leading zeros
- Output length formats: 40, 32, 24 or 16 bit number
- Termination options: None, ENTER
- Operating temperature range: 0 ºC to +50 ºC
- Weight: 55 grams
- Dimensions: Reader 100 x 59 x 21 mm

Connections

To install the wiegand USB converter:

Connect the wiegand interface to GND, Data 0, Data 1 of reader.

Connect the converter to the PC with a mini B USB cable.



Output Mode Selection

The 10 way switch is used to select the output format, length and termination as per the following tables:

Leading zeros (SW1)

	SW1
Leading zeros included	ON
Leading zeros suppressed	OFF

Decimal/hexadecimal (SW2)

	SW2
Decimal format	ON
Hexadecimal format	OFF

Length (SW3 and SW4)

	SW3	**SW4**
40 bit	OFF	OFF
32 bit	OFF	ON
24 bit	ON	OFF
16 bit	ON	ON

Special formats

	Note	SW5	SW6	SW7	SW8
Standard	1	OFF	OFF	OFF	OFF
RESERVED		OFF	OFF	OFF	ON
Site code/card number	2	OFF	OFF	ON	OFF
RESERVED		OFF	OFF	ON	ON
RESERVED		OFF	ON	OFF	OFF
RESERVED		OFF	ON	OFF	ON
RESERVED		OFF	ON	ON	OFF
RESERVED		OFF	ON	ON	ON
RESERVED		ON	OFF	OFF	OFF

Notes:
1. SW1-4 will determine format
2. When Site Code/card number is selected site code is always 8 bits and card number is always 16 bits. SW1, SW3, SW4 are ignored.

Termination (SW9)

	SW9
None	OFF
ENTER	ON

Keyboard layout (SW10)

	SW10
English keyboard	OFF
International keyboard	ON

If SW10 is ON the converter outputs ASCII codes instead of scancodes. This has the advantage of being keyboard independent, but the output speed is slower.