125K-RW-USB-D1
Communication Protocol

Communication Setting

The communication protocol is byte oriented. Both sending and receiving bytes are in hexadecimal format. The communication parameters are as follows

Baud rate : 9,600 ~ 115,200 bps / Data : 8 bits / Stop: 1 bit / Parity: None / Flow control : None

Command / Status format

	STX	ID	CMD/STATUS	LEN	DATA	BCC	ETX
Value	0X02						0X03
Length	1 Byte	1 Byte	1 Byte	1 Byte	Byte = Data length	1 Byte	1 Byte
Desc.	Start String	Reader ID 0x00-0xFF, 0-255 , default : 0x01	If send = command If return = status	DATA Length	Data	XOR From STX to DATA	End String

Command set

Function	Send command			Reader Return		
	Command byte	Data Length	DATA	Status	Data Length	Data
Connect	0X00	0X00		Correct = 0X00 Incorrect = other value	0x00	
Reset	0X01	0X00		Correct = 0X00 Incorrect = other value	0x00	
Control LED	0X03	0X04	ABCD A=0x00 LED Off = 0x01 LED On = 0x02 LED Flash (BCD*10ms) BCD : If A = 2 then data = time B=0x01 C=0x02 D=0x03 e.g. (123x10)ms = 1.23 sec. LED on	Correct = 0X00 Incorrect = other value	0x00	

Read Data	0XB1	0X01	BUPPPP B: Block number = 0-15 (Block 2 = password can't be read) U := 0 – No password = 1 – use password PPPP = 4 Byte password	Correct = 0X00 Incorrect = other value	0x00	DDDD 4 Byte data
write Data	0XA2	0X0A	BUPPPPDDDD B: Block number = 0 U := 0 – No password = 1 – use password PPPP = 4 Byte password DDDD = 4 byte data	Correct = 0X00 Incorrect = other value	0x00	
Read EM4100	0XA4	0X01	Read format : 0 : 8H 1 : 10H	Correct = 0X00 Incorrect = other value	0x00	DDDDD 5Byte data
write EM4100	0XA5	0X11	UPPPPCHHHHH U := 0 – No password = 1 – use password PPPP = 4 Byte C : Tag Type C = 1 EM4100 R/W card HHHHH : 5byte Hex data	Correct = 0X00 Incorrect = other value	0x00	