

SYRIS V8 command protocol (reader auto send mode)

Command list.

Get reader's Serial Number.	2
Receive card (auto send mode)	3
Trigger reader's DO.	4
Trigger reader's DO with timer.	6
Get reader's DI/DO status.	7

Get reader's Serial Number.

Tx :

05 00 04 80 00 00 01

05 :STX

00 04 :length(4)

80 00 00 01 :Get reader's serial number command:4 bytes

Rx :

06 00 0C 00 00 00 01 06 C7 19 05 01 34 00 02

06 :STX

00 0C :length(12)

00 00 00 01 :Get reader's serial number command:4 bytes

06 C7 : Reader's model type.

19 05 01 34 :Reader's serial number(19050134):4 bytes

00 02 :RS485 ID:2 bytes

Receive card (auto send mode)

The screenshot shows the V8 Tools V0871 software interface. The 'NET' tab is active, displaying network configuration options. The IP address is set to 192.168.1.241, and the port is 5001. The account and password are both set to 'admin'. The 'Response' checkbox is checked, and the 'ID' is set to 1. The 'S/N' is 20470003, and the 'PID/CID' is 00000000. The 'Direct' button is visible. The 'COMMON' tab is selected, and the 'COMM.' sub-tab is active. The 'Auto Mode' section is highlighted with a red box, showing the 'Auto Mode' button and various configuration options: Mode (EN checked, ID unchecked, S/N checked, ASC unchecked, DI unchecked, TIME unchecked), Encrypt (None), Delay (10 x100ms), Heartbeat (50 x100ms), and buttons for V7, V5, and Get. The 'Connect IP: 192.168.1.241:5001' and 'Default' buttons are at the bottom.

Rx : (No tag)

06 00 12 04 01 01 00 19 25 00 01 00 00 00 01 00 1F 00 00 CC 99

06 :STX

00 12 :length(18)

04 01 01 00 :Auto send command type:4 bytes

19 25 00 01 :Reader's serial number(19250001):4 bytes

00 00 :No tag :2 bytes

00 01 :flag :2 bytes

00 1F :DI status: 2 bytes (1F = 0001 1111 means DI1~DI5 is open)

00 00 :DO status: 2 bytes (01 = 0000 0001 means DO1 is trigger)

CC 99 :CRC ([CRC-16/KERMIT](#):12 04 01 01 00 19 25 00 01 00 00 00 01 00 1F 00 00)

Rx : (read tag)

06 00 1A 04 01 01 00 19 25 00 01 02 01 00 01 00 1F 00 00 46 43 A7 66 00 00 00 00 A2 CB

06 :STX

00 1A :length(26)

04 01 01 00 :Auto send command mode:4 bytes

19 25 00 01 :Reader's serial number(19250001):4 bytes

02 01 :Tag type:2 bytes

0101	EM tag UID	0211	Desfire tag UID
0201	Mifare tag UID	0261	QR code (DEC)
0202	Mifare block data	0262	QR code (HEX)
0203	ISO 14443B tag UID	0263	QR code (SID)
0204	ISO15693 tag UID	0264	QR code (SID date)
0241	UHF tag UID		

00 01 :flag :2 bytes

00 1F :DI status: 2 bytes (1F = 0001 1111 means DI1~DI5 is open)

00 00 :DO status: 2 bytes (01 = 0000 0001 menas DO1 is trigger)

46 43 A7 66 00 00 00 00 : Tag's UID (0000000066A74346)

A2 CB :CRC ([CRC-16/KERMIT](#):12 04 01 01 00 19 25 00 01 00 00 00 01 00 1F 00 00)

Rx : (read tag 16 bytes ID)

06 00 22 04 01 01 00 19 25 00 01 02 41 00 00 00 1E 00 00

1F 02 02 22 22 10 40 97 02 05 21 0C 00 00 00 00 59 B8

06 :STX

00 22 :length(34)

04 01 01 00 :Auto send command type:4 bytes

19 25 00 01 :Reader's serial number(19250001):4 bytes

02 41 :Tag type:2 bytes

00 00 :flag :2 bytes

00 1E :DI status: 2 bytes

(Default is 1F(00011111)-> 1E(00011110) means DI1 and GND was Short circuit)

00 00 :DO status: 2 bytes (00 01 = 0000 0001 menas DO1 is trigger)

1F 02 02 22 22 10 40 97 02 05 21 0C 00 00 00 00 : Tag's UID

(000000000C210502974010222202021F)

59 B8 :CRC ([CRC-16/KERMIT](#):22 04 01 01 00 19 25 00 01 02 41 00 00 00 1E 00 00 1F 02 02 22

22 10 40 97 02 05 21 0C 00 00 00 00)

Trigger reader's DO.

ex. set DO1 ON

Tx :

05 00 0C 80 00 80 72 00 00 01 01 00 01 00 00

05 :STX

00 0C :length(12)

80 00 80 72 :Remote DO command:4 bytes

00 00 :Remote ID(00 00 means self) : 2 byte

01 :Mode (00 is set all DO, 01 is one DO): 1 byte

01 :Remote Channel(01 means D01, 02 means D02):1 byte

00 01 :Set DO :2 bytes (00 01 is set DO ON, 00 00 is set DO OFF)

00 00 :Time:2 bytes: (00 00 means no time limit)

Rx :

06 00 0C 00 00 80 72 00 00 00 1E 00 01 00 00

06 :STX

00 0C :length(12)

00 00 80 72 :Remote DO command:4 bytes

00 00 :Remote ID(00 00 means self) : 2 byte

00 1E :DI status :2 bytes

(Default is 1F(00011111)-> 1E(00011110) means DI1 and GND was Short circuit)

00 01 :DO status:2 bytes

(00 01 means D01 was triggered, 00 02 means D02 was triggered, 00 03 means D01 and D02 both triggered)

00 00 :Reverse:2 bytes

Trigger reader's DO with timer.

ex. set DO2 ON for 5 seconds

Tx :

05 00 0C 80 00 80 72 00 00 01 02 00 01 00 32

05 :STX

00 0C :length(12)

80 00 80 72 :Remote DO command:4 bytes

00 00 :Remote ID(00 00 means self) : 2 byte

01 :Mode (00 is set all DO, 01 is one DO): 1 byte

02 :Remote Channel(01 means D01, 02 means D02):1 byte

00 01 :Set DO :2 bytes (00 01 is set DO ON, 00 00 is set DO OFF)

00 05 :Time:2 bytes: (unit is 100 ms, 00 32 means 5 sec)

Rx :

06 00 0C 00 00 80 72 00 00 00 1F 00 02 00 00

06 :STX

00 0C :length(12)

00 00 80 72 :Remote DO command:4 bytes

00 00 :Remote ID(00 00 means self) : 2 byte

00 1F :DI status :2 bytes

(Default is 1F(00011111)-> 1E(00011110) means DI1 and GND was Short circuit)

00 02 :DO status:2 bytes

(00 01 means D01 was triggered, 00 02 means D02 was triggered, 00 03 means D01 and D02 both triggered)

00 00 :Reverse:2 bytes

Get reader's DI/DO status.

Tx :

05 00 0C 80 00 80 72 00 00 02 00 00 00 00 00

05 :STX

00 0C :length(12)

80 00 80 72 :Remote D0 command:4 bytes

00 00 :Remote ID(00 00 means self) : 2 byte

02 :Mode (02 means Get DI/DO status): 1 byte

00 00 00 00 00 :Reverse:5 bytes

Rx :

06 00 0C 00 00 80 72 00 00 00 1F 00 00 00 00

06 :STX

00 0C :length(12)

00 00 80 72 :Remote D0 command:4 bytes

00 00 :Remote ID(00 00 means self) : 2 byte

00 1F :DI status :2 bytes

(Default is 1F(00011111)-> 1E(00011110) means DI1 and GND was Short circuit)

00 00 :DO status:2 bytes

(00 01 means D01 was triggered, 00 02 means D02 was triggered, 00 03 means D01 and D02 both triggered)

00 00 :Reverse:2 bytes