www.asis-technologies.com

P908 Controller
User Manual

Document History

Description
June 2017 Revision 1

Federal Communication Commission Interference Statement

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

This equipment generates uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one of the following measures:

. Reorient or relocate the receiving antenna.

. Increase the separation between the equipment and receiver.

. Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.

. Consult the dealer or an experienced radio/TV technician for help.

FCC Caution: To assure continued compliance, any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment. (Example - use only shielded interface cables when connecting to computer or peripheral devices).

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

(1) This device may not cause harmful interference, and (2) This device must accept any interference received, including interference that may cause undesired operation.

Foreword

This manual is used with P900 Controller version. It contains all technical information pertaining to the installation of the access control system: wiring requirement, connection to devices and controller parameter settings.

ASIS Technologies reserve the right to change product design at any time for product improvement. Information in this manual is subjected to change without further notice.

ASIS Technologies make all efforts to ensure this Manual is up to date and corresponds to the product being shipped. However, ASIS Technologies assumes no responsibility for any errors that may occur in this manual.

This manual contains proprietary information that is protected by copyright. Neither this manual nor any part of it may be reproduced, photocopied, translated, or electronically transmitted in any way without the prior written permission of ASIS Technologies.

For enquiries and support in installing the P900 Controller, please contact ASIS Technologies or any representative in your region.

Limited Warranty

ASIS Technologies warrants its products to be defect free in material and workmanship when they have been installed in accordance with the manufacturer's instructions.

The warranty will not apply if the product is tampered with or misused, unauthorized modification and improper maintenance. Consumables items, such as batteries, have no warranty.

ASIS Technologies does not assume any responsibility for damage or injury to person or property due to improper care, storage handling, abuse, misuse, normal wear and tear, or an act of God.

The product warranty shall expire one (1) year after shipping date. Except as stated above, ASIS Technologies makes no other warranty or condition, whether written or oral, expressed or implied, as to any matter whatsoever, including their merchantability, or fitness for any particular application.

Table of Contents

Document History 1

Federal Communication Commission Interference Statement 1

Foreword 2

Limited Warranty 2

Table of Contents 3

1.1 P908 Professional Series Web Based Controller Overview 2

1.2 Key Features of P908 Professional Controller 2

1.3 P908 Termination layout 3

1.4 Installer to NOTE 4

1.5 Dimensions 5

1.6 P908 Card Access Single Line diagram 6

1.7 Termination Port P908 8 Doors Card Access 6

1.8 Power and Data Connectivity for P908 7

1.9 Termination Port Description 8

2.0 Product Specification 10

2.1 Status LED and InstaStart Button 11

3.1 P908 Wiegand Interface 13

3.2 P908 RS-485 Reader Interface 15

4.1 Anti-Passback Mode 17

4.2 Arm Mode Setting 18

4.3 High Security Door Setting 19

4.4 Other Door Settings 21

5.1 Input Configuration 23

5.2 Input Type 23

5.3 Supervised Input 23

5.4 End of Line Resistor 24

5.5 Non-Supervised Input 26

5.6 P908 Input Setting 26

5.7 Input Arm Setting 27

6.1 Output Connection 30

6.2 Output Select for Relay 31

6.3 Output Mode 33
6.3 Relay Output Jumper setting 37
7.1 WebENTRA Utility 40
8.1 NaviKey Operation 41

Introduction

1.1 P908 Professional Series Web Based Controller Overview

P908 a multi door access controller with additional input zone for intrusion monitoring and output zone for door locking, device triggering. Build in with LCD display with a card reader.

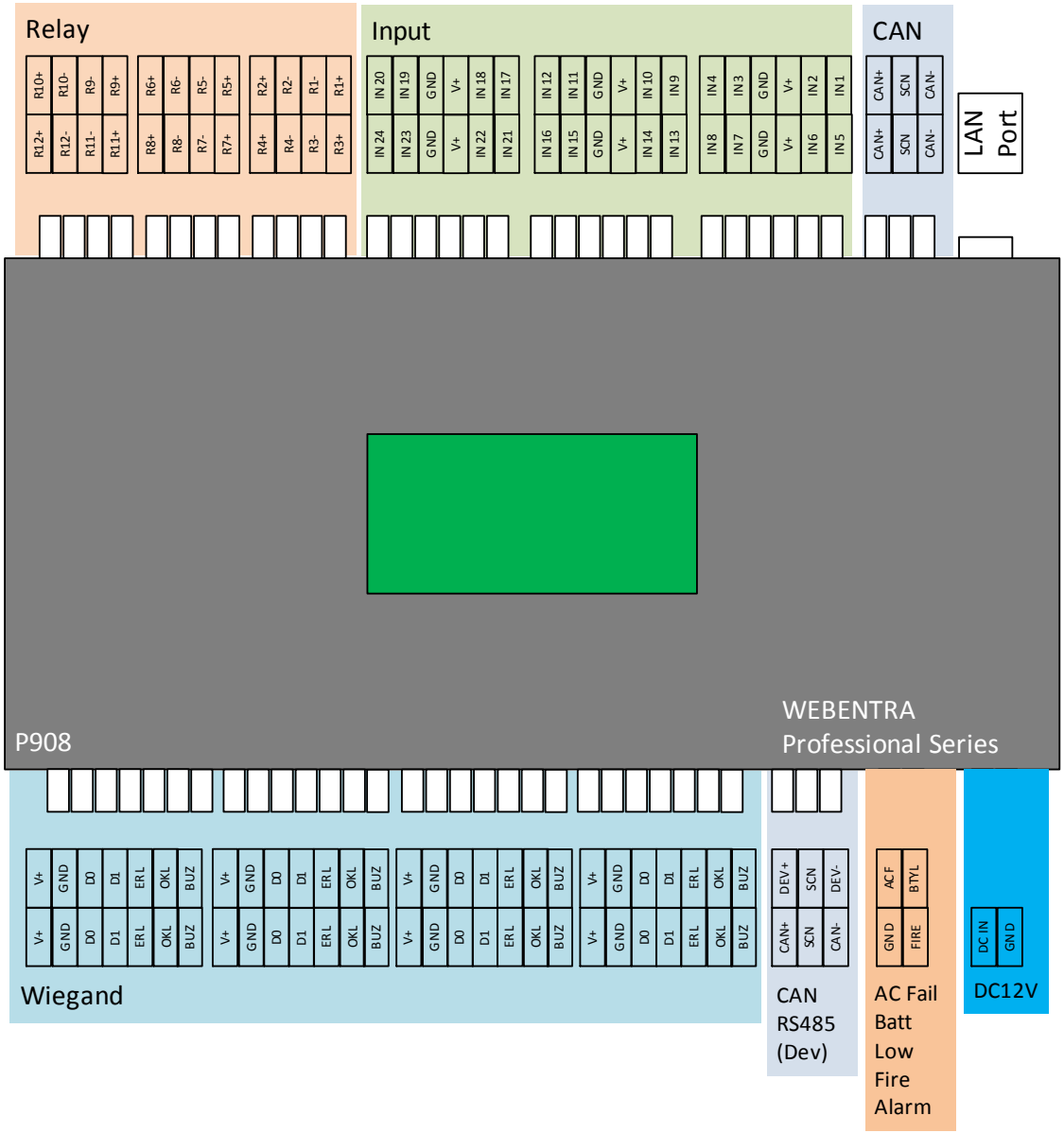
Controllers	Features	I/O onboard	Wiegand port on boards	Max Reader Support
P908	Single mode controller	24/12	8	16

1.2 Key Features of P908 Professional Controller

- 8 Doors In-Out Readers support
- Built-in LCD display with card reader for easy setup and diagnostic at controller panel and quick credential enrolment. (Navi Key)
- CAN BUS interface for future expansion module
- Reader Interface (ADNET,OSDP & Wiegand)
- Support 8x Readers via Wiegand or 16 x RS485 via RS485
- 150,000 cardholder capacity
- 2,500,00 event buffer
- “InstaSTART” button for easy and quick setup
- AES and SHA1 encryption communication to Host
- Simple Wiring Diagram
- Compatible with IBSS.web
- Flash memory design for easy upgrade of controller software

1.3 P908 Termination layout

P908 has 16 readers, 24 inputs, 12 outputs terminal points. It comes with CAN BUS, and LAN Port connection. Navikey mounted on the controller display vital functional information of the controller. It doubles up as enrollment readers when necessary.

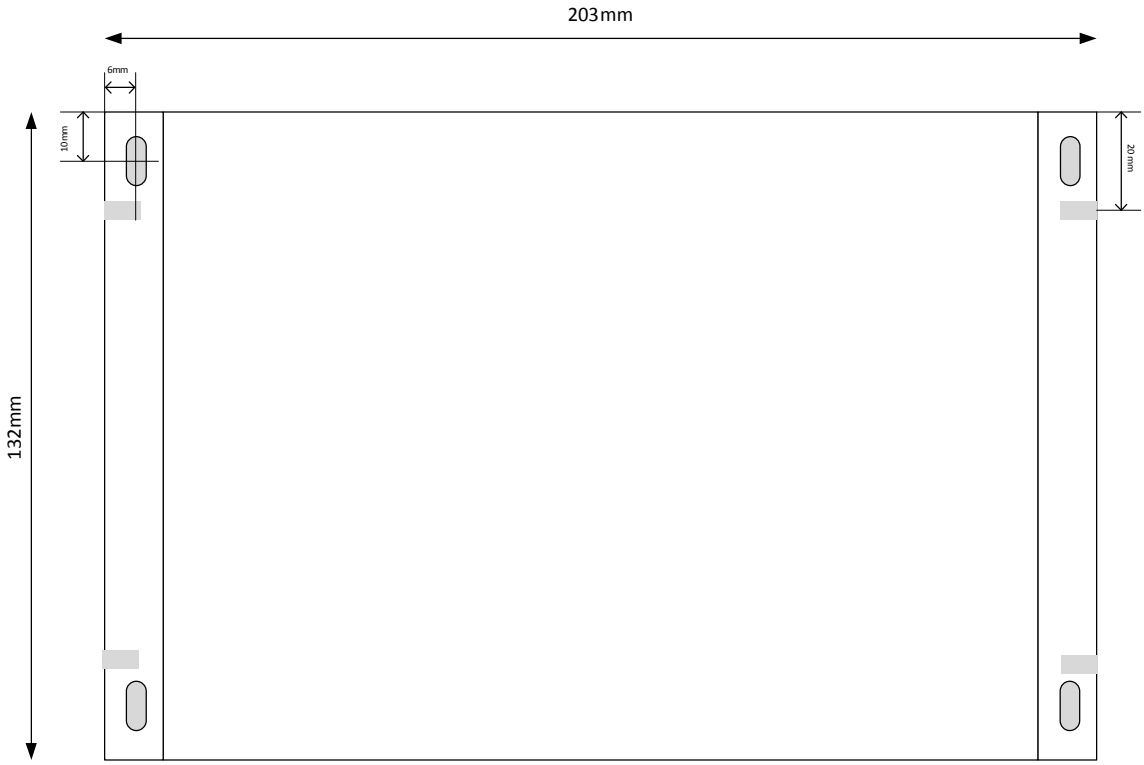


1.4 Installer to NOTE

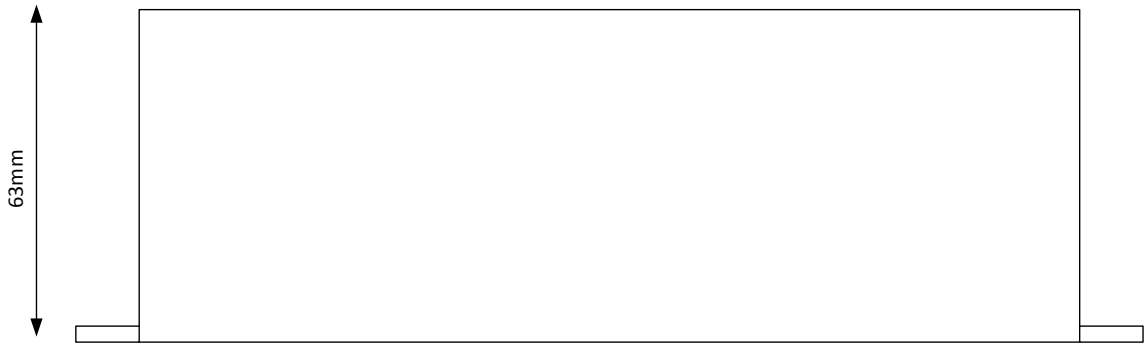
The Installation and Mounting should observe the following:

- The controller should be kept at least 6 feet from any other RF emitting device.
- The controller should be mounted away possible of water leaking location or if in exterior location sealed to prevent water from seeping into the electronic.
- The controller should be protected from extreme heat and sunlight.

1.5 Dimensions



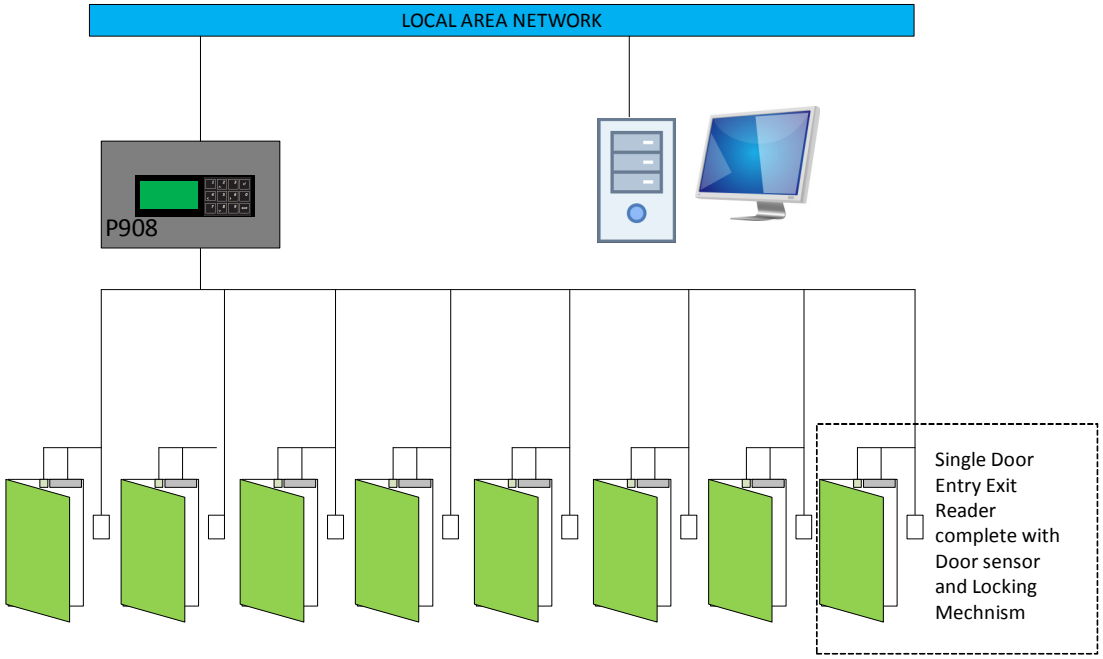
Top View



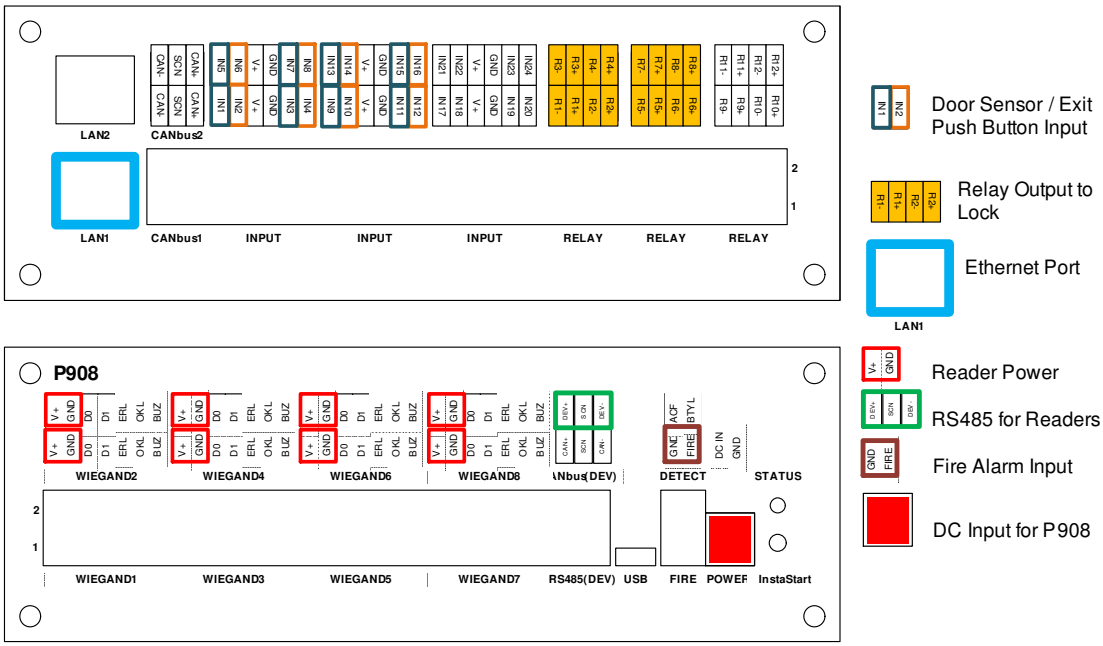
Side View

1.6 P908 Card Access Single Line diagram

Typical 8 Doors card access setup with P908 controller and network link back to host software server.

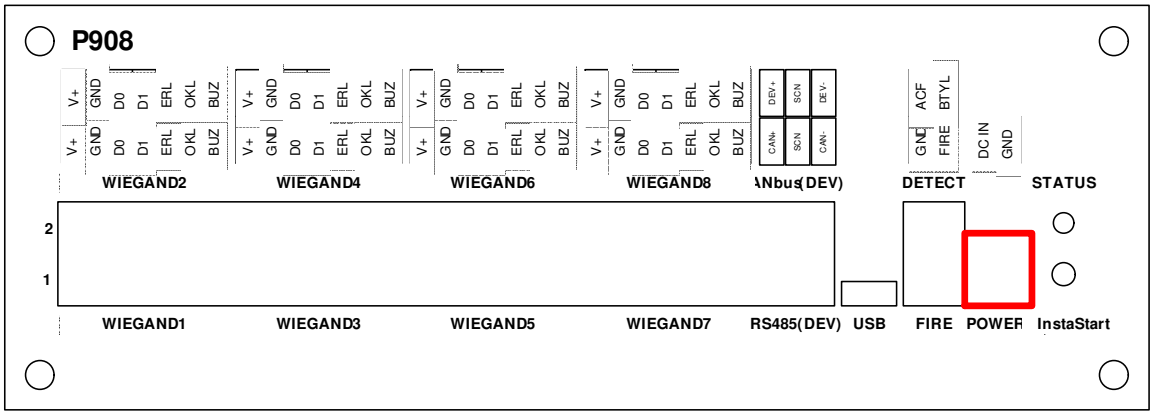


1.7 Termination Port P908 8 Doors Card Access

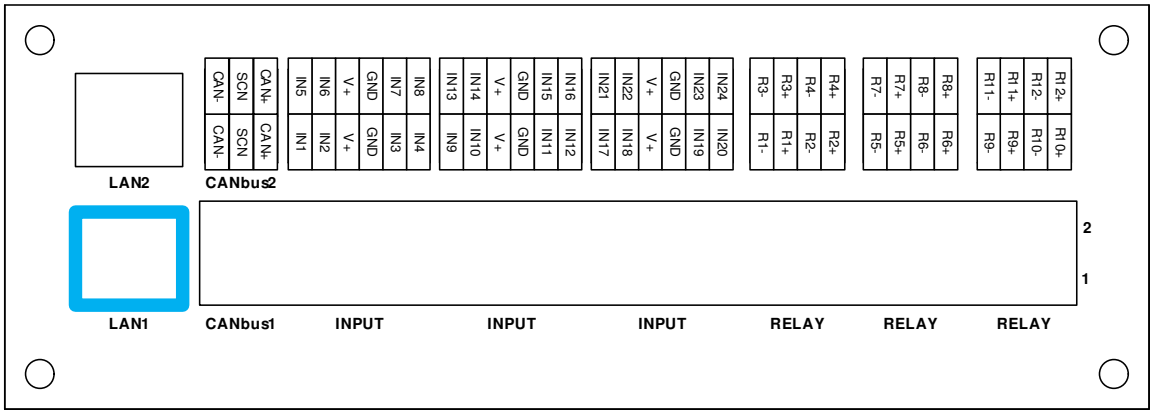


1.8 Power and Data Connectivity for P908

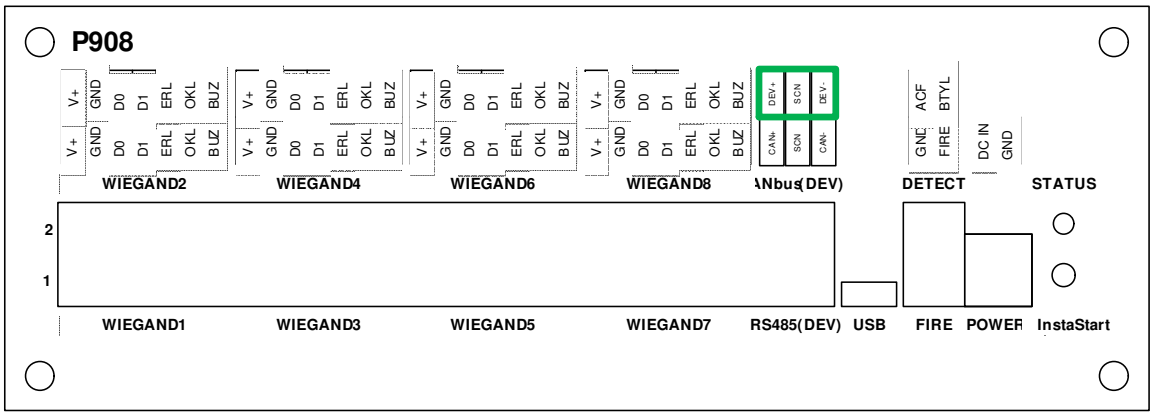
Using DC power supply 13.8VDC 10 Amp, terminate to Connector input label as Power.



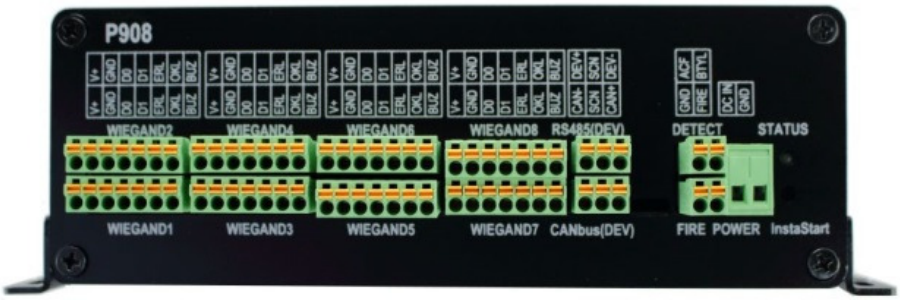
Communicate to P908 via Ethernet port on LAN1 port.



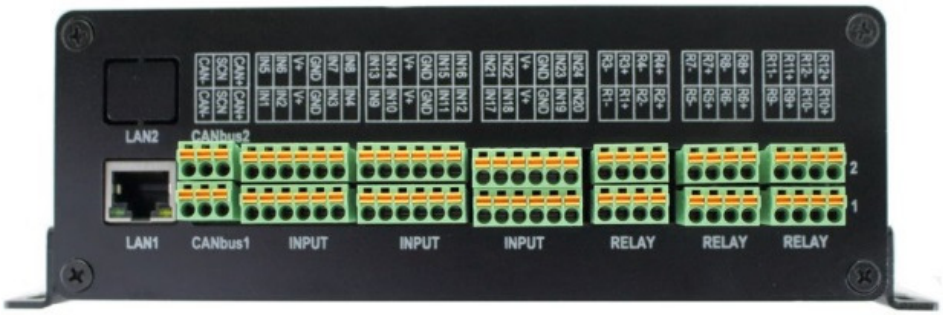
Communication RS485 device port to Readers



1.9 Termination Port Description



CAN BUS	Description	Access Control	
CAN + ,SCN, CAN -	Future	Future	
RS485(DEV)	Description	Access Control	
DEV + SCN DEV -	RS485 Device Port	Communication port to Card Reader	
WIEGAND	Description	Access Control	
+V, GND, D0,D1,ERL, OKL,BUZ	Wiegand Reader connection Port and Reader Power Point	Connect wiegand reader to this port. V+ and GND is also use for RS485 reader.	
FIRE	Description	Access Control	
FIRE,GND	Fire signal input	Dry contact from fire alarm panel	
POWER Detection	Description	Access Control	
ACF,BYTL	AC Fail, Battery Low	AC Fail, Battery Low detection	
POWER	Description	Access Control	
DC IN, GND	13.8V DC	Power supply to P908	



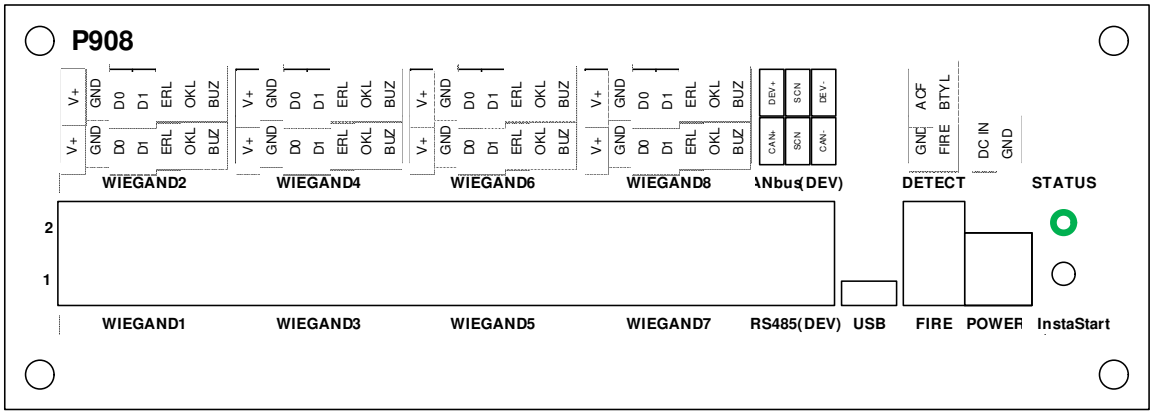
INPUT	Description	Access Control	Aux	
INP1 – INP24	Input 1 - 24	Input 1,3,5,7,9,11,13,15 Exitbutton Input for Door 1 - 8 Input 2,4,6,8,10,12,14,16 Door Sensor Input for Door 1 - 8	Input 17 - 24	
RELAY	**Description**	**Access Control**		
R1+,R1- to R8+,R8-	Relay Output 1 to Relay Output 8	Lock output for Door 1 to Door 8	R9+,R9- to R12+,R12-	
CANbus	**Description**			
CANbus1, CANbus2	Future			
LAN	**Description**			
LAN1, LAN2	Ethernet port	Connect to switch as Host port	LAN2- future	

h

2.0 Product Specification

Specification	P908
Ethernet Host Link	1000Base T x 2
CAN Bus	CAN Bus 1 and CAN Bus 2 (future)
InstaSTART Wizard	Yes
DC Power Input	13.8VDC
RS485 (Device Port)	Up to 16x Readers
Wiegand Interface	8
Alarm Input/Relay Output	24/12
Cardholders	150,000 card capacity
Event Buffers	2,500,000 event buffer
User Access Groups	1024 group
Holidays	120 holidays date
Weekly Schedules	128 schedules
Data Encryption Algorithm	128 bit AES or 3DS or SAM ISO/IEC 7810
Current Consumption (excluding lock)	
Dimensions	230mm x 132mm x 63mm
Weight	1Kg

2.1 Status LED and InstaStart Button



STATUS LED gives quick glance information about the P908. In operation the STATUS LED blinks slow in Steady Green. When P908 get a power restart it will blink fast for 30 secs, then when initialize it will blink slow.

InstarStart Button is use for factory default setting, when unit is power on, depress button will clear all event, cardholder database, uag config, schedule config.

Reader Connection

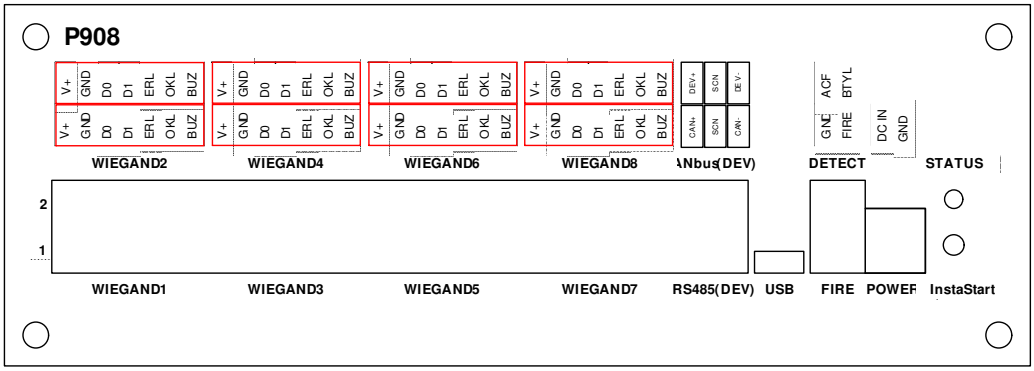
Two types of Reader Interface are provided, Wiegand interface and ASIS RS485 protocol. Note that each has a different terminal point and methods.

The P908 Controller auto detect the type of Reader in use. No software or hardware setting is required.

For Wiegand Interface, 4 standard card bit format is supported. Wiegand 26bit, 35bit, 37bit and 32bit. The 32bit supports the Asis Mifare 4 byte (32bit) Type A Card. A custom card bit format is available to define by user and must be defined in IBSS software.

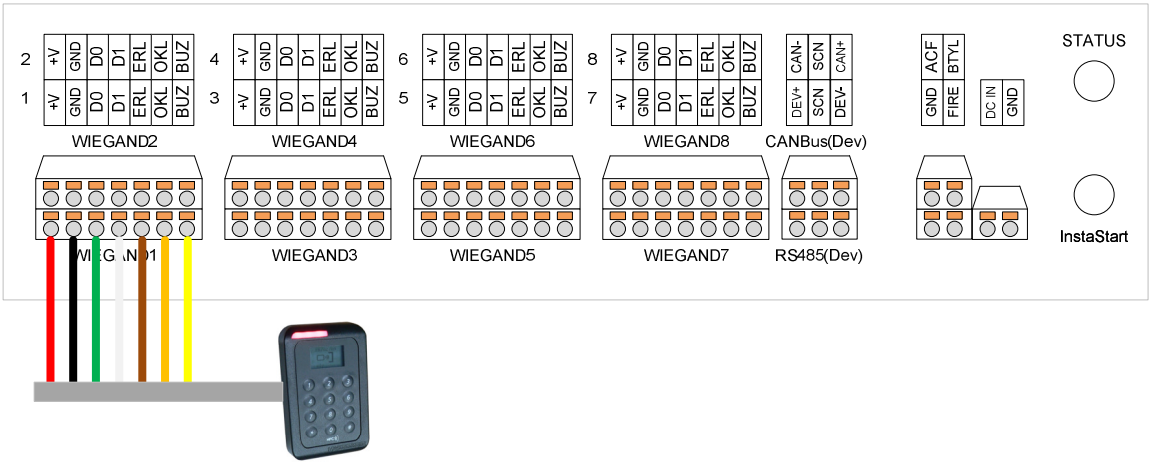
3.1 P908 Wiegand Interface

Wiegand reader termination points are on the right panel label Wiegand 1 to Wiegand 8.



Signal	Function	For
12V	Supply to reader	Wiegand Reader 1 to Wiegand Reader 8
GND		
WDO	Wiegand DO Signal In	
WD1	Wiegand D1 Signal In	
OKL	Green LED Out	
ERL	Red LED Out	
BUZ	Buzzer Out	

The figure below shows the Wiegand Reader connection for P908. The color code for various wires may differ with Reader vendors. Refer to READERS manufacturer documentation for more information.

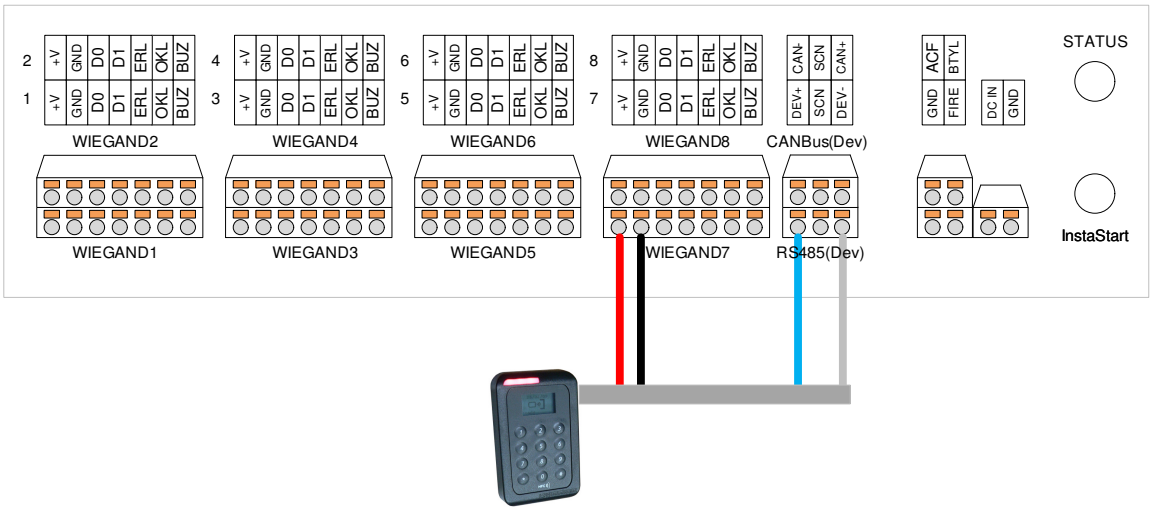


Wire Color Legend	Description
	Buzzer
	Green LED
	Red LED
	Data 1
	Data 0
	Ground
	12V

3.2 P908 RS-485 Reader Interface

With ASIS AMR17x series readers, the wiring terminates at (Port Device) on P2. It is recommended to use 1 pair twisted screen cable for the RS485 network and 1 pair 1.5mm cable for DC12V supply.

Note: The RS-485 connection is polarized; user has to ensure correct polarity during installation.



Wire Color Legend	Description
	RS485 -
	RS485 +
	Ground
	12V

It is advisable to ground the screen cable to eliminate possible noise interferences. For the same communication loop, all screen cable should tie in to make a continuous link. Do not leave the screen wire un-terminated as it may short accidentally to on-board components.

Controller Operation

4.1 Anti-Passback Mode

There are three operating modes: Soft Mode , Hard Mode and Time Reset.

Hard Mode: This mode enforces the anti-passback function. Consider the case of a Cardholder who enters the facility (card read by the entry reader). If the cardholder exits together with other staff members (without registering) the P908 will have only his entry record. When the cardholder tries to enter the facility again, P908 will find no previous exit record and therefore, entry will be denied.

Soft Mode: The anti-passback function limits to monitoring and alarm reporting. In the soft mode, users are still allowed entry with the event reported.

Time Reset: The anti-pass back time reset mode allow flexible antipass back rule to be apply based individual operation needs. When antipass violation occurs cardholder will be denied entry for a preset period of time before access is allow again. Unlike Soft Mode, time reset mode relax the rule yet remind cardholder of inconvenient encounter when violate security rules

Note: When APB Hard mode is in use, often users who do not follow the entry/exit procedure may assume the system malfunctions when entry is denied. Therefore it is important all Cardholders be aware and follows the procedure.

Mode	Function
Disable	Disable the APB Mode
Soft	Allow Entry/Exit with event reporting when there is APB violation
Hard	Disallowed Entry/Exit with event reporting when there is APB violation
Time reset	Time Disallowed Entry/Exit with event report when APB violation

4.2 Arm Mode Setting

P908 has 4 Arm Modes setting. This may be set via the Web UI.

Mode	Function
Arm	Normal operation
Lock	Permanent lock the door
Unlock	Permanent unlock the door
Disarm by schedule	Unlock the door during the time zone set in schedule

Arm Mode:

This mode is for normal operation. The door will be locked and monitored until a valid card is presented and P908 unlock the door with a time defined by Unlock Time setting in the Reader Configuration.

Lock Mode:

This will permanently lock the door. It denies entry to all valid Cardholders. It remains in this mode until changed.

Unlock Mode:

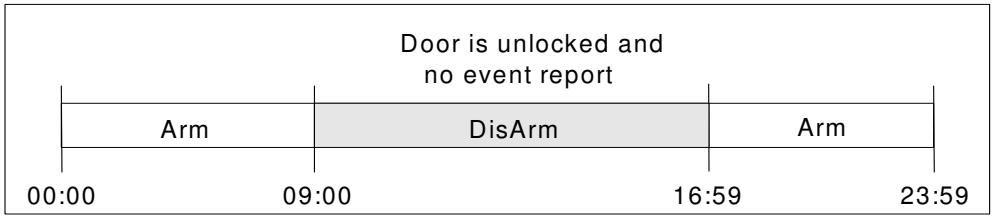
This mode will unlock the door all the time until the mode is changed.

Disarm By Schedule Mode: (Timed unlock)

This mode unlocks the door during active period of the *DisArm Schedule*. It can be set from IBSS.

The table below is an example where a time zone in the schedule is set to “09:00 to 17:00”. Prior to 9:00 AM, the door control in Arm mode, this means access via a valid card. From 9:00 AM to 5:00 PM, the door is unlocked for free access. After 5:00 PM, door is lock and under Arm Mode again.

DisArmBySchedule Mode



4.3 High Security Door Setting

Multi Card Access

For highly secured areas, it may require the presence of more than one staff to unlock the door. P908 allows multiple cards to grant access. This mode may be set from the IBSS software.

P900 allows multi-card access with up to 4-cards, and a number of authorized cards must be present before access is granted.

For example, if the number of cards is set to “4”, after the 1st card is read, the Green LED will blink at a faster rate. This indicates the reader expects the next card. Until all the 4 valid cards are read, P908 unlocks the door.

Note: Please note that the multi-card reader only check the validity of the card being read, the sequence of the cards presentation does not matter.

The following are situations possible for error conditions in multi-card operation. Users have to exercise caution to avoid these situations.

Timeout:

There is a time out period of 15 sec for each user to present card. If the next card is not presented within next 15 seconds then the P908 will void the operation. The time out period is fixed at 15 sec. and cannot be changed.

Invalid card:

If any of the cards presented is an invalid card, then the P908 will void the operation.

PIN Access

Pin Access is requiring for Main entrance to a facility. Using Pin Access at Main Entrance ensure the right person is gaining access as PIN is issue as a password to individual so only authorize personal with the right credential knows. Pin Access can be set to operate for 24/7 or in a more relax environment only during off peak hour so that as to ensure integrity and availability.

4.4 Other Door Settings

There are some parameters that affect the door control setting.

Mode	Function
Unlock Time	The door release time upon presenting a valid card
Pre-Alarm Time	Warning beeps from the reader buzzer after the time expires
DOTL	Reader buzzer sounds to indicate that the door is opened for too long
Toggle Mode	Door operate in toggle mode with card flash, suitable for auditorium
Door interlock	Man-trap operation. One room 2 doors, only 1 door allow to open.

Unlock Time:

This is the time that P908 will unlock the door upon a valid card presentation. It can be set from 0 to 255 seconds.

Pre-Alarm Time:

P908 connected reader will sound the buzzer with a warning tone when the door is held open beyond this time. It can be set from 0 to 255 seconds. This time period should always be set longer than Unlock Time. No alarm event is reported if the door closes before Pre-Alarm Time expires, the warning tone will stop once the door is closed.

DOTL:

This is known as Door Open Too Long. The P908 connected reader will sound buzzer continuously when the door is held open longer than his period. It can be set from 1 to 255 seconds. This time setting should always be longer than Unlock Time and Pre-Alarm Time. A DOTL alarm event is reported when an alarm tone is triggered. The alarm tone will stop once the door is closed.

Toggle Mode:

When set to this mode the door when toggle from open to close between valid card flash. In this mode door have to be disarm by 24hrs schedule, and Pre-alarm and DOTL will be disable.

Door interlock:

Man-trap operation. 2 door program to be monitoring each other status. If door 1 door sensor is activated, door 2 lock output will not be activated by card flash on Reader 2 or exit push button on Reader 2.

Input

5.1 Input Configuration

This section provides information on input functions and wiring connection.

The inputs 1 to 24 are software configurable to provide flexibility to suit application requirements. These inputs have factory default setting when shipped.

There is 200ms noise filtering for inputs 1 to 24. When input is activated within 200ms and then restored back to normal, the activation of this input will be ignored.

5.2 Input Type

Inputs 1 to 24 are analog input designed to detect 4-state events in the “Supervised Mode”. It may be configured to detect 2-state events in the “Non-Supervised Mode”.

DIP Switch 1- Position 6 “LSS” - ON for supervised mode and OFF for non-supervised mode.

5.3 Supervised Input

In Supervised Input Mode, the end of line resistors must be used to terminate the line (refer to Figure 6.1). Line fault conditions can be monitored in addition to the device status. All these event occurrences are reported to the IBSS management software.

Mode	Function
Normal	Normal condition; device contact - Closed
Activate	Input device triggered - Open
Open Circuit	Input line is open circuit
Short Circuit	Input line is short circuit

Normal State:

This state indicates a NC external device is in normal condition.

Activate State:

This state indicated the NC external device is triggered i.e. become open circuit.

Open Circuit:

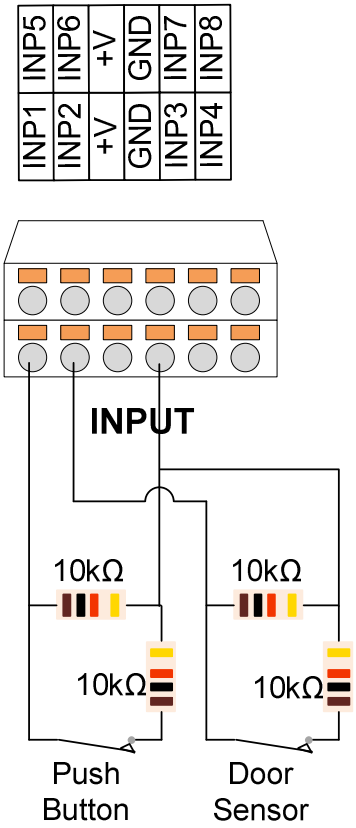
This indicates the line connection to the external device has been broken/open circuit.

Short Circuit:

This indicates that the line connection is short circuit.

5.4 End of Line Resistor

For operation in the line Supervised Mode, end of line resistors is required. This establishes different voltages at the input depending on the device status and line fault conditions. The input circuit compares the voltage differential on the line to internal thresholds to determine the line status. The end of line resistor value shall be 10Kohm. The figure below shows the typical connection for Exit Button 1 and Door Sensor 1. It also applies to inputs 5 to 8.



Note: Use Normally Closed (NC) type input devices, such as Exit Button, Door Contact, etc., because Normally Open (NO) device is not suitable. If the device is faulty on open circuit, no detection is possible.

5.5 Non-Supervised Input

If the requirement is to detect ON/ OFF signal and line fault monitoring is not required, non-supervised mode may be used. To enable this mode, set DIP SW 1 and Switch 6 (LSS) should be turned “OFF”. No end of line resistor is required.

Non-supervised input setting can detect 2 states:

State	Function
Normal (Device in NC)	Normal condition
Activate (Device activates in open circuit)	Input line is triggered

Note: Setting of this switch applies to all analog 8 inputs. If there is any input requires line supervision, then ALL inputs have to operate in the same mode. This setting has no effect on Fire Alarm input.

5.6 P908 Input Setting

When P908 is configured as access control, the following default input settings applies:

Input	Header	Default Function	For
Input 1	INPUT	Exit Button	Reader 1
Input 2		Door Sensor	Reader 1
Input 3		Exit Button	Reader 2
Input 4		Door Sensor	Reader 2
Input 5		Exit Button	Reader 3
Input 6		Door Sensor	Reader 3
Input 7		Exit Button	Reader 4
Input 8		Door Sensor	Reader 4

Input 9		Exit Button	Reader 5
Input 10		Door Sensor	Reader 5
Input 11		Exit Button	Reader 6
Input 12		Door Sensor	Reader 6
Input 13		Exit Button	Reader 7
Input 14		Door Sensor	Reader 7
Input 15		Exit Button	Reader 8
Input 16		Door Sensor	Reader 8
Input 17		Input zone	Input
Input 18		Input zone	Input
Input 19		Input zone	Input
Input 20		Input zone	Input
Input 21		Input zone	Input
Input 22		Input zone	Input
Input 23		Input zone	Input
Input 24		Input zone	Input

5.7 Input Arm Setting

Input 17 to Input 24 of P908 can be wired to monitoring device with Dry contact normally close input for triggering monitoring.

Mode	Function
Arm	Normal operation
Disarm	Disable arm operation
Disarm By Schedule	Disarm during the time period defined by the Disarm Schedule

Arm:

This is the default mode and all inputs activation will have alarm event report back to IBSS.

Disarm:

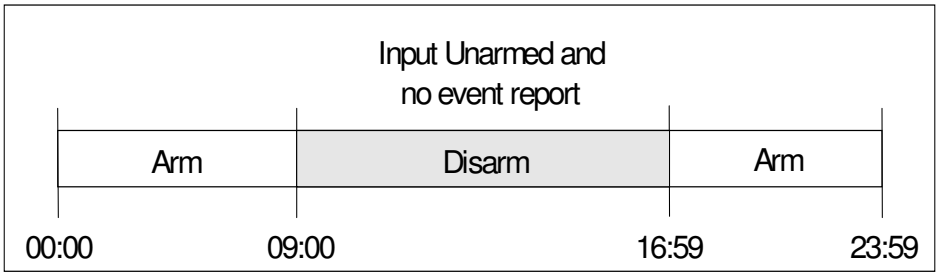
This is to disable the alarm function. Inputs activation will not have any alarm event report to the IBSS.

Disarm By Schedule:

This mode is to disable the input alarm function during the time zone defined by the Schedule.

If the time zone is set to “09:00 – 16:59”, the table below illustrates the operation.

DisarmBySchedule Mode



Prior to 09:00, the input is in “Arm” mode, this means any activation of the input will trigger an alarm event.

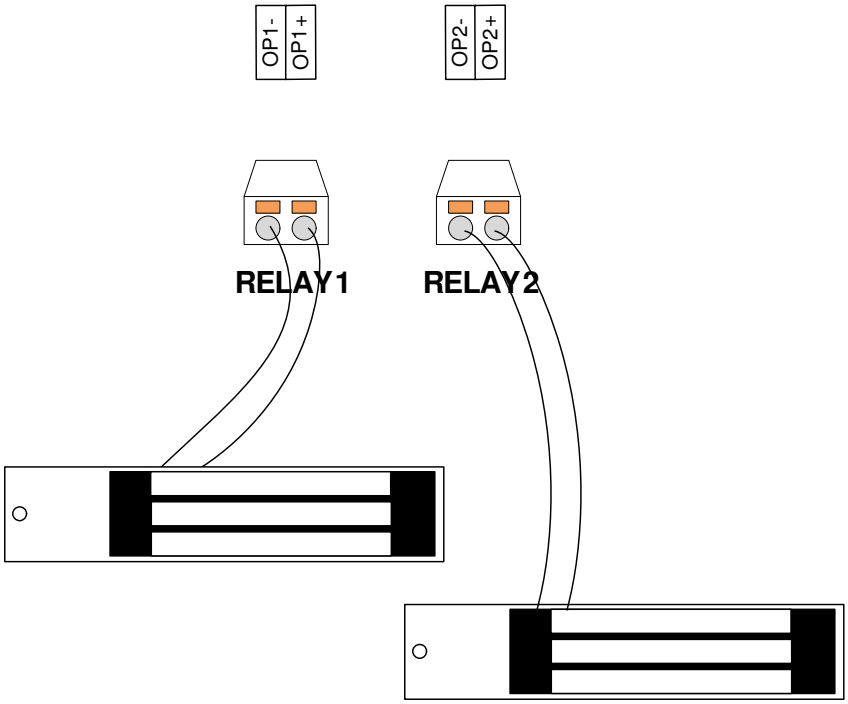
From 9:00am to 17:00pm P908 is unlocked by “Disarm” mode. No alarm event will be reported. At 17:00, P908 is revert back to arm mode.

Output

6.1 Output Connection

This section provides information on the Output connection to external devices. The Outputs has software configurable settings.

The following figure shows the P908 output connection to EM Lock.



Output	Header	Default Function	Defaults
OP1 +	RELAY1	Door Lock Output 1 (+ve)	Reader 1
OP1 -		Door Lock Output 1 (-ve)	
OP2+	RELAY2	Door Lock Output 2 (+ve)	Reader 2
OP2-		Door Lock Output 2 (-ve)	
OP3+	RELAY3	Door Lock Output 3 (+ve)	Reader 3
OP3-		Door Lock Output 3 (-ve)	
OP4+	RELAY4	Door Lock Output 4 (+ve)	Reader 4
OP4-		Door Lock Output 4 (-ve)	
OP5+	RELAY5	Door Lock Output 5 (+ve)	Reader 5
OP5-		Door Lock Output 5 (-ve)	
OP6+	RELAY6	Door Lock Output 6 (+ve)	Reader 6
OP6-		Door Lock Output 6 (-ve)	
OP7+	RELAY7	Door Lock Output 7 (+ve)	Reader 7
OP7-		Door Lock Output 7 (-ve)	
OP8+	RELAY8	Door Lock Output 8 (+ve)	Reader 8
OP8-		Door Lock Output 8 (-ve)	

RELAY1 to RELAY8 are set by default to function as door lock output for Reader 1 and Reader 8. All relay function as 12V voltage output normally open relay setting

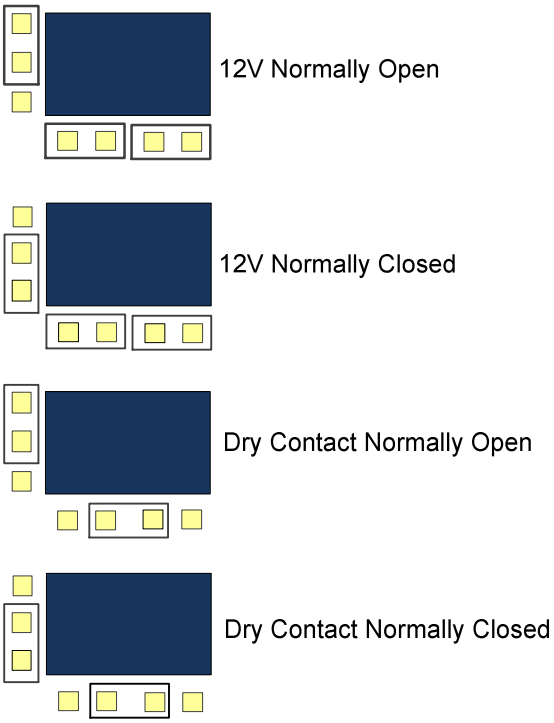
6.2 Output Select for Relay

Relay can be set to different output configurations via jumper settings:

- NO (Normally Open)
- NC (Normally Close)
- 12V output in NO configuration
- 12V output in NC configuration

The 4-pin header is for 12VDC or dry-contact (voltage free) output setting. The 3-pin header is for normally closed (NC)/ normally open (NO) output setting. The following figure depicts the output setting for Relays. There are 4-pin header and 3-pin header by the side of each relay for jumper selection.

Note: Contact rating at 30V, 1A



The supply voltage to Relay is unregulated 12VDC with maximum of 1A. This is adequate for most locking devices. The factory default is 12V Output in NO Configuration.

6.3 Output Mode

An output may be set in any of the 5 Output modes. User must set the output mode to suit the application.

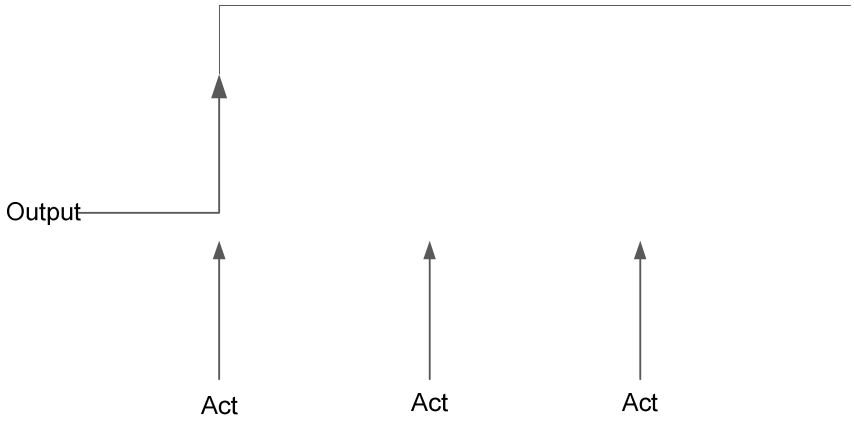
Output Mode	Function
Latch	Output in activate mode
Toggle	Output set to toggle mode
Pulse	Output is in pulse mode
Cycle	Output cycles with ON and OFF time
Act By Schedule	Output activated by a schedule

Example: Input 3 is set to trigger Output 1

Latch mode:

When Input 3 is in normal state, Output 1 will be in “OFF” state. When Input 3 activates, Output 1 will now switch to “ON” state, it remains at this state even after Input 3 is restored to normal.

Input 3	Output 1
Normal	OFF
1st Activate	ON
2nd Activate	Remain ON
3rd Activate	Remain ON
4th Activate	Remain ON



Toggle mode:

The output toggles between “On” and “OFF” states upon each input activation (or triggering). When Input 3 returns to normal state after each trigger, Output 1 remains at the state until the next activation.

Input 3	Output 1
Normal	OFF
1st Activate	ON
2nd Activate	OFF
3rd Activate	ON
4th Activate	Remain ON

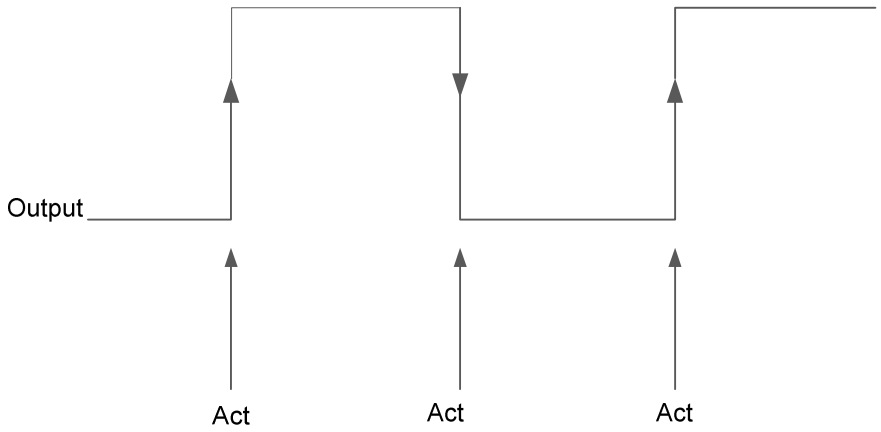


Figure 7.5 Toggle Mode Operation

Pulse mode:

Upon Input 3 activate, the Output 1 turns “ON” for a preset period (1 to 255 sec) and then “OFF” again.

Input 3	Output 1
Normal	OFF
1st Activate	Turn “ON” for 10 sec, then turn “OFF”
2nd Activate	Turn “ON” for 10 sec, then turn “OFF”
3rd Activate within 10 seconds	Pulse Output period extended by 10 sec

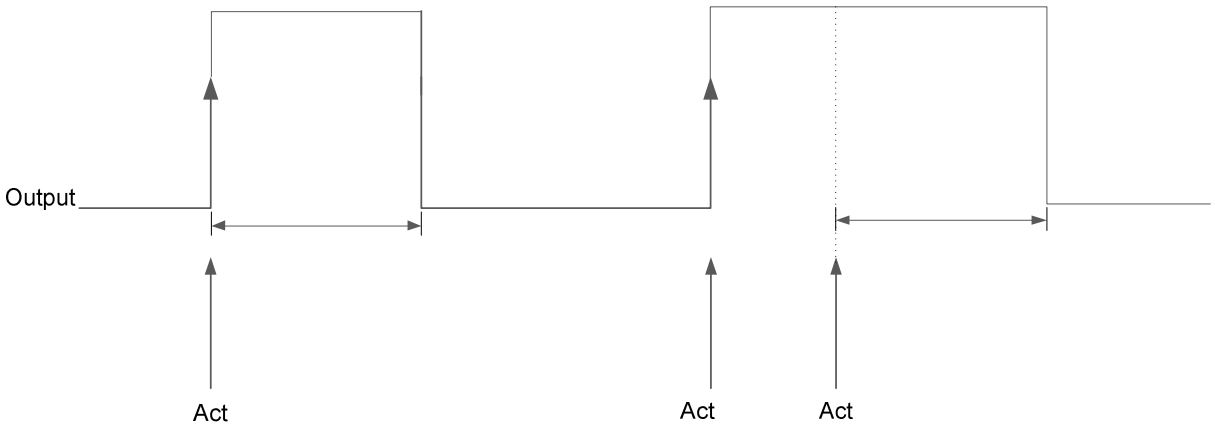
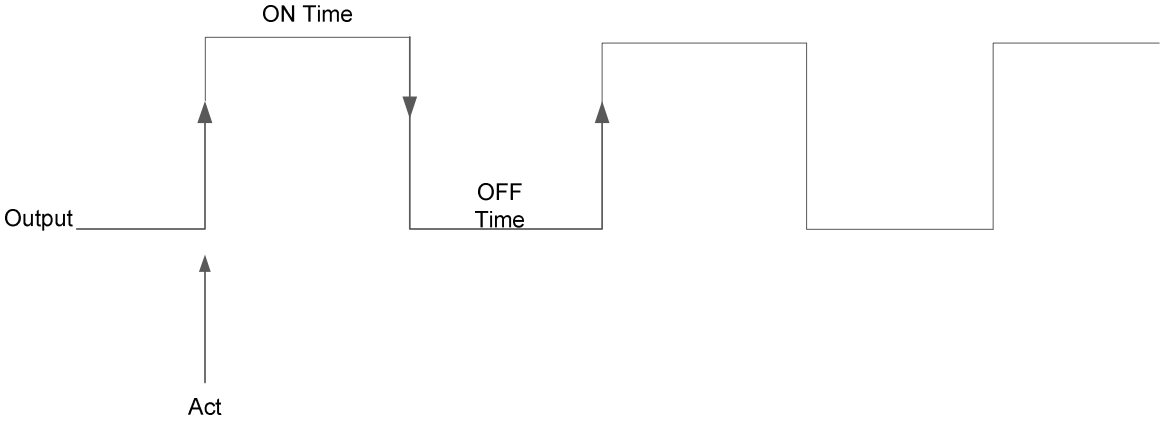


Figure 7.6 Pulse Mode Timing Operation

Note: An input activation before the pulse period expires extends the pulse period for the next 10 seconds.

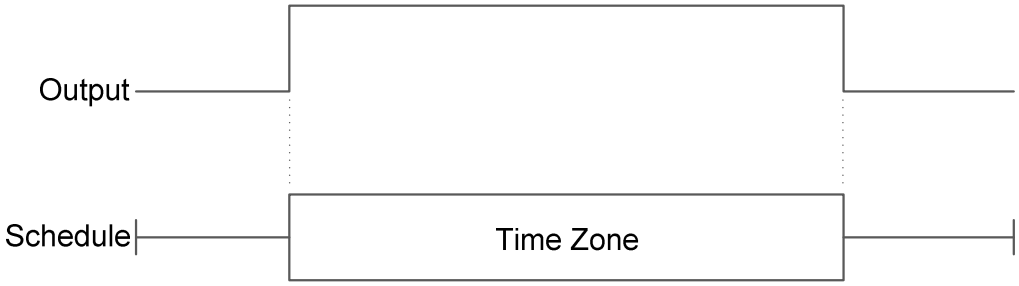
Cycle Mode:

The Output cycles continuously with an “On Time” and “Off Time” (between 1 – 255 seconds). The cycle mode stops only when output is deactivated.



Act by Schedule:

This is timer control function by a weekly Schedule. The Output is activated by the Time Zones set in the Schedule. When there is activation prior to the start time, Output turns ON and will be turned OFF at the end time of the Time Zone.



6.3 Relay Output Jumper setting

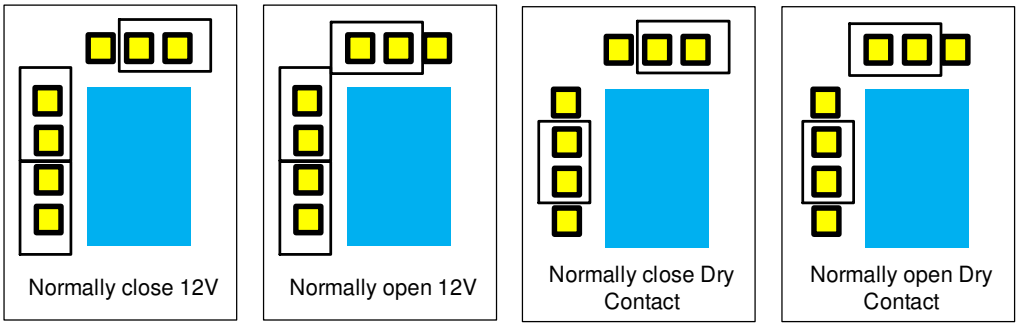
P908, relay output can operate in 4 states.

Normally open 12V

Normally Close 12V

Normally open Dry contact

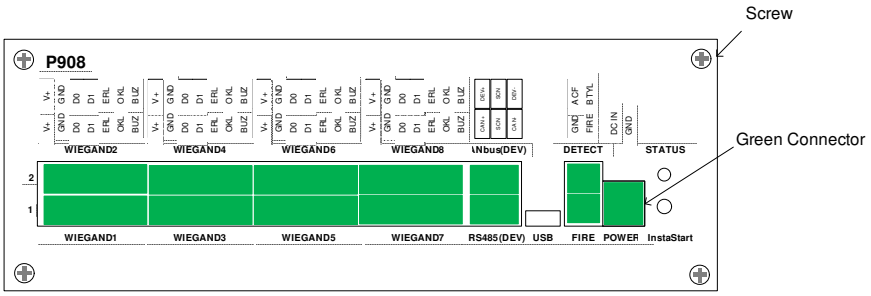
Normally Close Dry contact

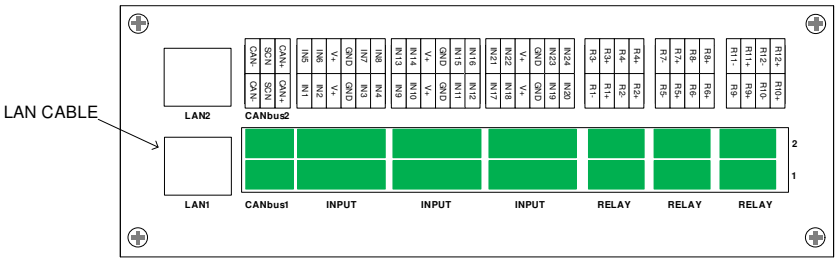


P908 relay setting can be change, but required dismantling of the case.

Steps to dismantle P908 casing

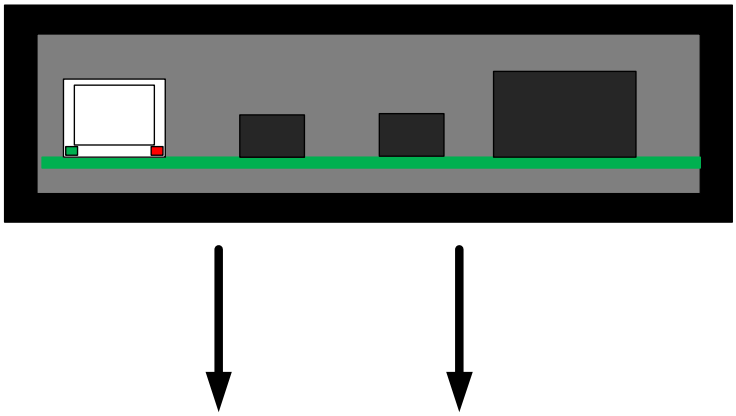
Remove all Green connectors on front and back panels, remove LAN cable.



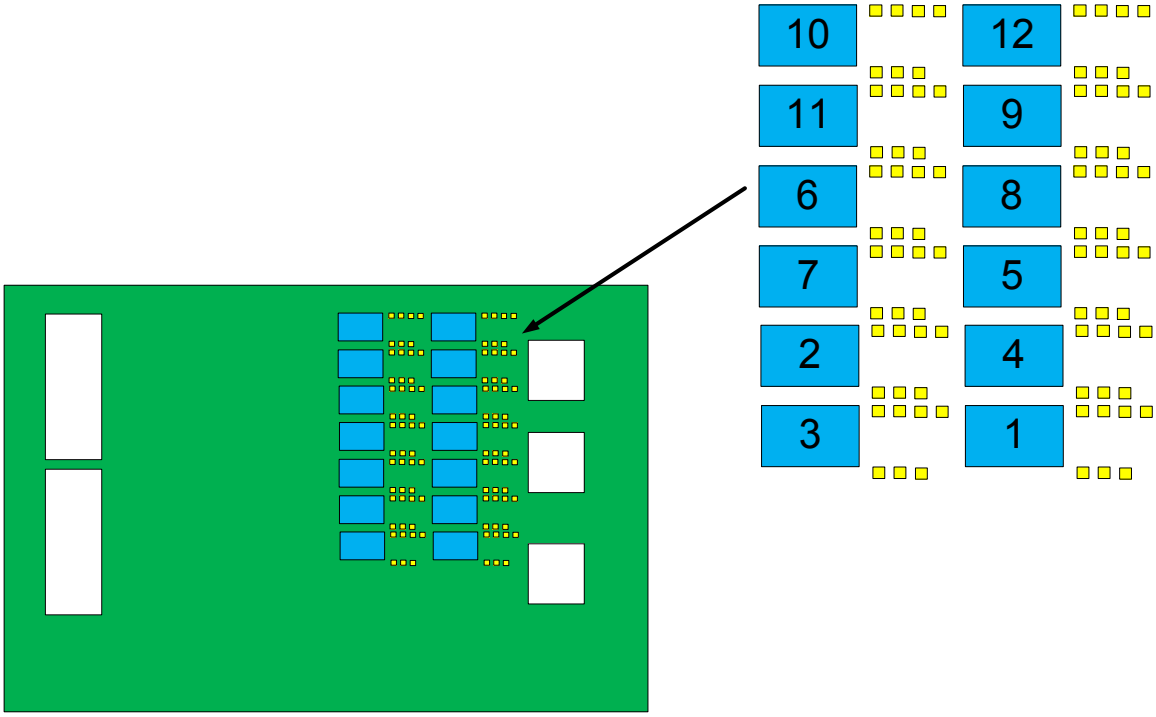


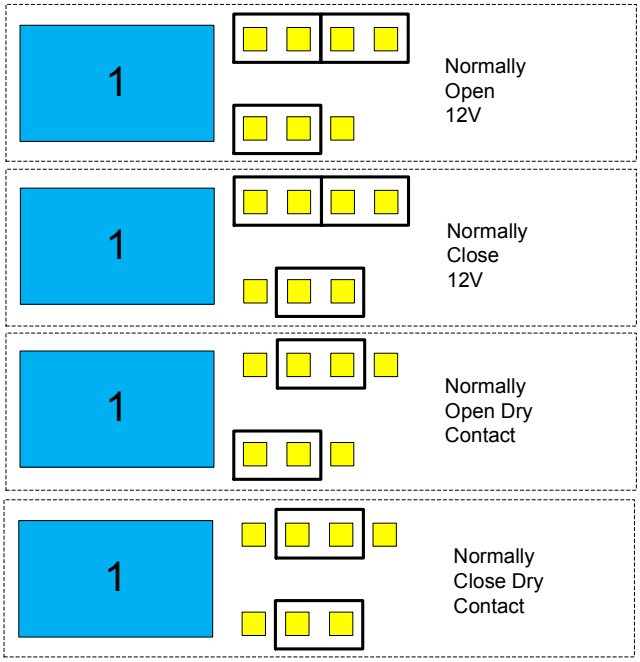
Unscrew all four screws from front panels and remove front panels

Slide out the PCBA



Set the jumper setting as requirement





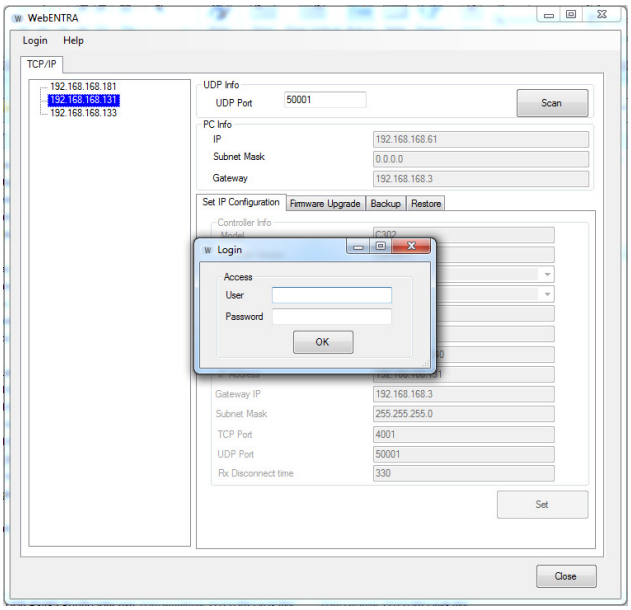
Slide back the PCBA place back front panels

Plug back all connector then screw back the 4 screw from front panel

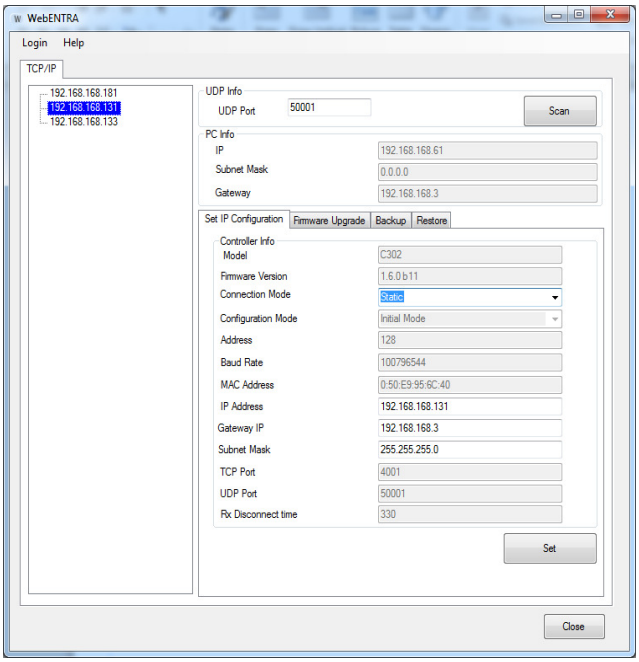
7.1 WebENTRA Utility

WebENTRA utility is use for changing of network parameter (IP address, Subnet, Gateway. Use Scan Button to search for Local network connected P908

To start Login to connected controller for configuration. UserID: admin, Password: admin



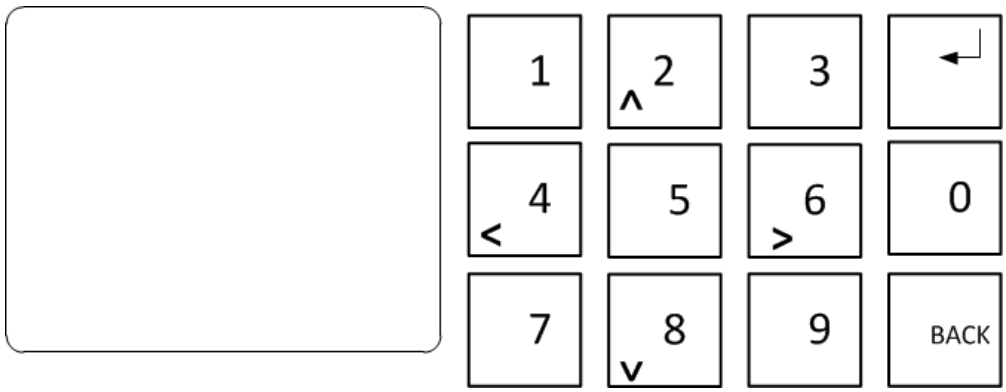
To change Network parameter, edit the IP Address field and click Set.



8.1 NaviKey Operation

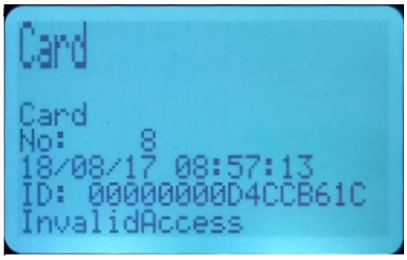
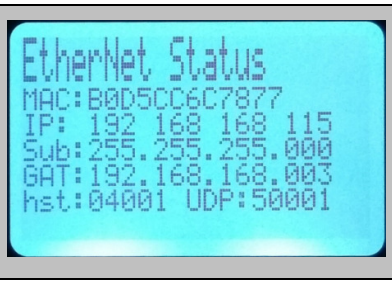
Navikey allow localize configuration of Controller without the need to external peripherals. All is needed is finger to touch the keypad to get info of controller and make configuration.

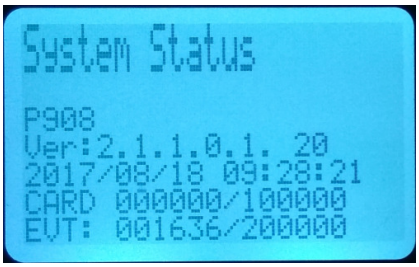
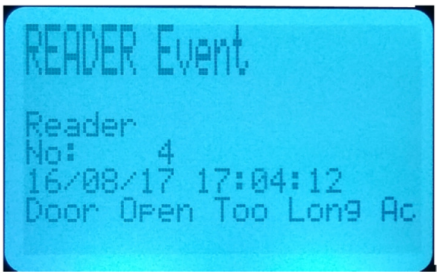
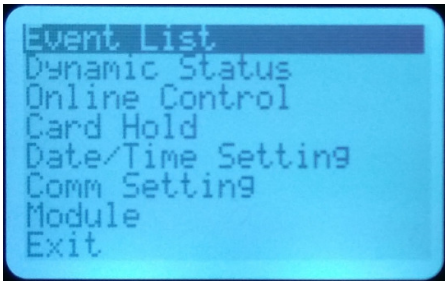
Features of Navi key includes, live event display, device control, card enroll (csn only), controller parameter setting.

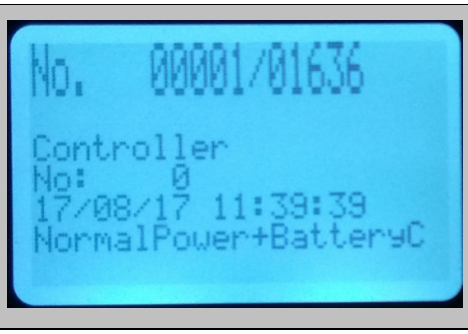
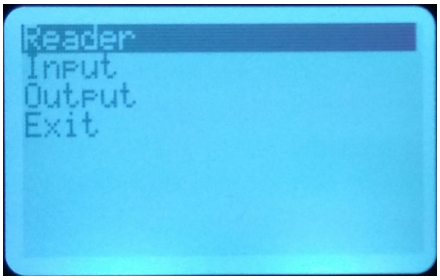
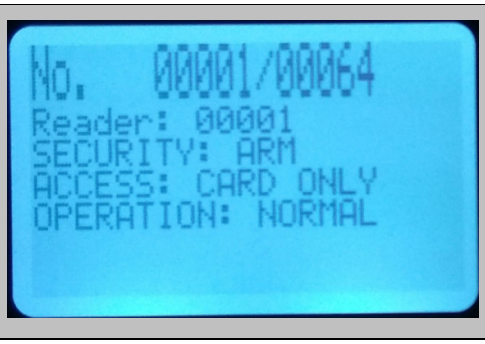
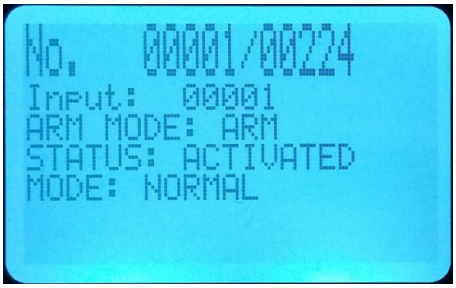


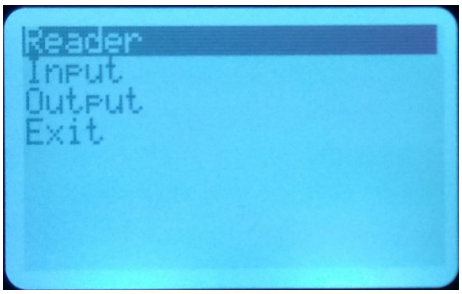
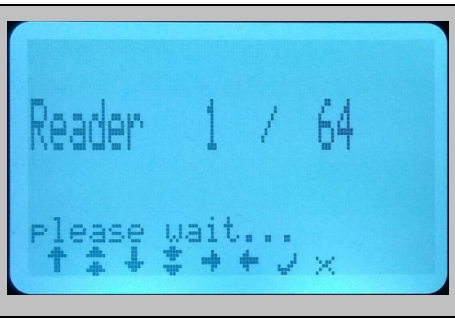
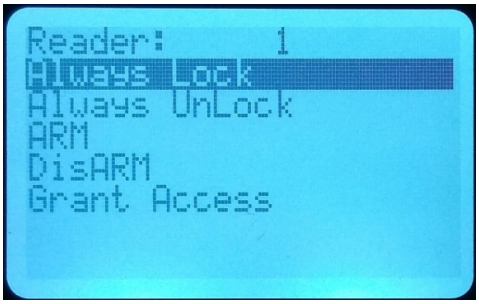
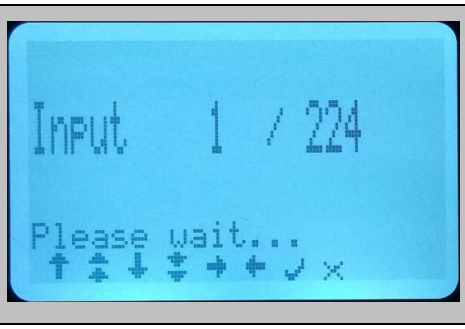
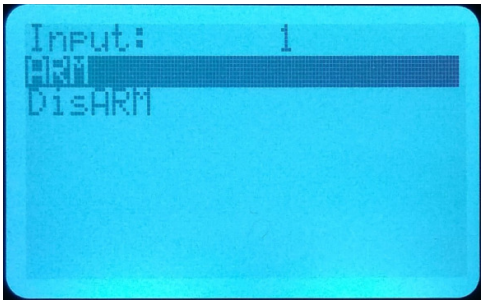
Navigate the Navikey using the keypad KEY 2 = UP, KEY 8 = DOWN, KEY 4 = LEFT, KEY 6 = RIGHT.

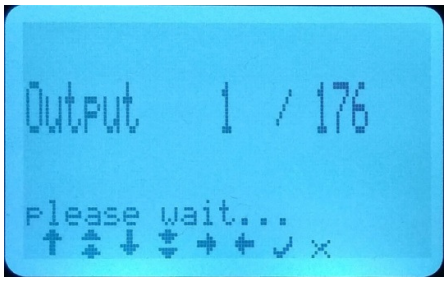
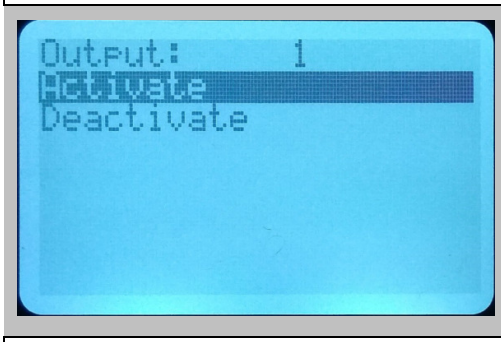
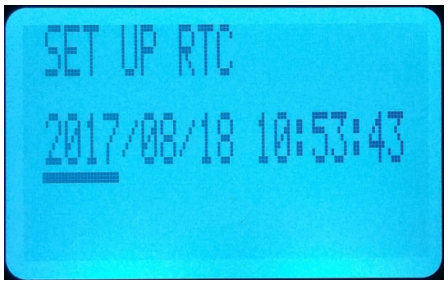
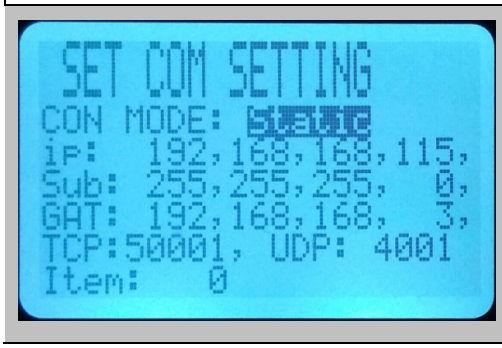
Back and Enter KEY is use to get into an function or exit from the function.

	Default Screen of Navi key always show latest controller generated event
From default screen press [KEY 4] 2 x to view it configured network parameters.	

	From default screen press [KEY 4] 3 x to view system operating parameters. Firmware version Date / Time Card Event
To view recent Card event Press [[<4 key]] left 4 times. Use key 2 to navigate up or key 8 to navigate down. To exit press BACK key	
	To view recent Reader event Continue from Card Event after the BACK key press <4 key will bring to Output, press BACK key and press <4 key, will bring to Input Event, press BACK and press <4 key will bring to READER event Use key 2 to navigate up or key 8 to navigate down. To exit press BACK key
To get into Command Mode press <4 key 1 time. Press ENTER key You will be prompt with password press 123456 and press ENTER key	
	In Command Mode Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY Press ENTER KEY to get into the selected function

In Event List Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY	
	In Event List Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY Press ENTER to view device dynamic status
In Dynamic Status: Reader Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY	
	In Dynamic Status: Input Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY
In Dynamic Status: Output Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY	

	In Online Control Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY Press enter KEY to control the device
In Online Control : Reader Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY Press ENTER KEY to select the reader to control	
	In Online Control : Reader Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY Press ENTER KEY to issue the selected command to control the reader
In Online Control : Input Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY Press ENTER KEY to select the Input to control	
	In Online Control : Input Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY Press Enter KEY to issue the selected command to control the input

In Online Control : Output Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY Press ENTER KEY to select the Output to control	
	In Online Control : Output Navigate Up using 2 KEY or Down using 8 KEY to exit press BACK KEY Press ENTER KEY to issue the selected command to control the Output
In Date/Time Setting : Navigate using <4 KEY or >6 KEY to select item to change. Use 2 KEY to select UP or 8 KEY to select DOWN Press ENTER KEY to confirm changes and exit	
	In Comm Setting : Navigate using <4 KEY or >6 KEY to select item to change. Use 2 KEY to select UP or 8 KEY to select DOWN Press ENTER KEY to confirm changes and exit