



---

# 82149 – 600 Door Sequencer

Installation Instructions

## **DOR - O - MATIC®**

7350 W. Wilson Ave.  
Harwood Heights, IL 60706

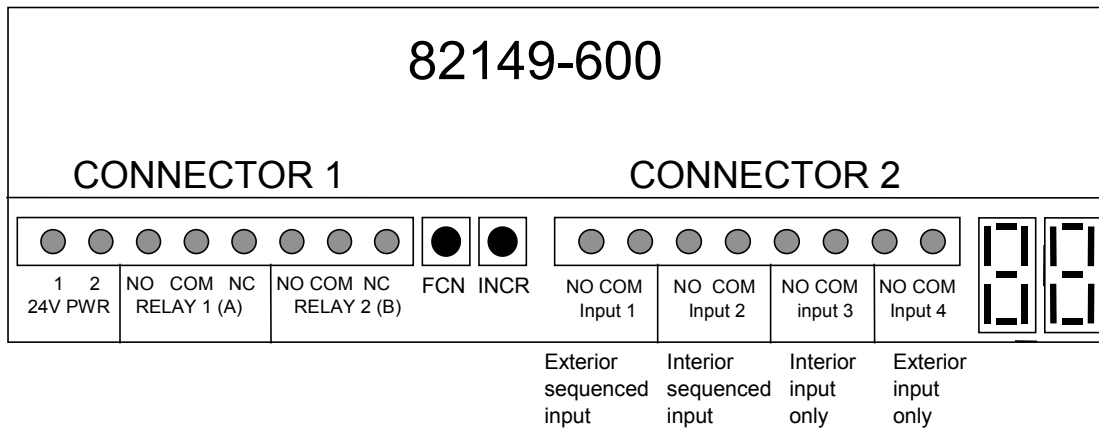
Toll Free: 1-800-543-4635  
In Illinois: 708-867-7400  
Sales FAX: 708-867-0291  
[www.doromatic.com](http://www.doromatic.com)

The 82149-600 is a microprocessed door sequencer. It is ideal to use in a small vestibule to coordinate inbound and outbound traffic through automatic doors. Since the 82149-600 is micro-processed, all values stored in permanent memory are retained if there is a power loss. Also, the 82149-600 has a double digit display to aid in programming the correct time delays needed. It is capable of accepting 4 independent inputs from push plates and it provides two relay outputs in a timed sequence depending on the direction of travel. Relay 1's output can be either a dry output or a wet output by changing the position of two jumpers. Relay 2's output is only a dry output.

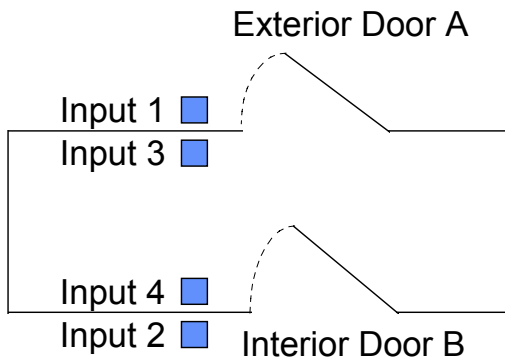
## TECHNICAL SPECIFICATIONS

Description	82149-600
Supply Voltage	12-24V AC; 15-24V DC
Relays:	SPDT Normally Open & Normally Closed contacts
Max. Current	5 A
Max. Voltage	120V AC; 60V DC
Inputs	Dry contacts required (voltage free) 4 inputs provided
Time Delay	0 - 30 seconds
Operating temperature	-40°F to 140°F
Dimensions	5.1"L x 3.1"W x 1.2"H
Housing	Aluminum

## TERMINAL CONNECTIONS



## OPERATION



- | <u>CODE</u>   | <u>DESCRIPTION</u>                                 |
|---------------|--|
| Input 1 =     | terminals 1 & 2                                    |
| Input 2 =     | terminals 3 & 4                                    |
| Input 3 =     | terminals 5 & 6                                    |
| Input 4 =     | terminals 7 & 8                                    |
| dA =          | time delay of door A                               |
| dB =          | time delay of door B                               |
| dI =          | time delay in bound (relay A followed by relay B)  |
| dO =          | time delay out bound (relay B followed by relay A) |
| Door A =      | exterior door                                      |
| Door B =      | interior door                                      |
| Relay 1 (A) = | activates door A                                   |
| Relay 2 (B) = | activates door B                                   |

## **Entrance from Exterior Door A**

When the contacts on Input #1 are closed relay 1 (A) will be initiated for the amount of time stored in dA (door A time delay) and simultaneously the time delay in dI (in bound time delay) will begin to count down. Once dI = 0, relay B will be energized for the length of time in memory location dB (door B time delay). Once dB expires the sequence is finished. If Input #1 is reactivated, it will restart the above cycle. If relay B has not expired when Input #1 has been reactivated, relay B will reset to dB and remain open for a total time delay of dI plus dB.

## **Entrance from Interior Door B**

When the contacts on Input #2 are closed relay 2 (B) will be initiated for the amount of time stored in dB (door B time delay) and simultaneously the time delay in dO (out bound time delay) will begin to count down. Once dO = 0, relay A will be energized for the length of time in memory location dA (door A time delay). Once dA expires the sequence is finished. If Input #2 is reactivated, it will restart the above cycle. If relay A has not expired when Input #2 has been reactivated, relay A will reset to dA and remain open for a total time delay of dO plus dA.

## **Exit Vestibule from Exterior Door A**

When the contacts on Input #3 are closed relay A will be initiated for the time delay set for dA.

## **Exit Vestibule from Interior Door B**

When the contacts on Input #4 are closed relay B will be initiated for the time delay set for dB.

## **SET-UP ADJUSTMENTS**

After the 82149-600 is properly wired power can be applied and the set-up can begin. When unit is first powered up the factory default values for the memory locations will be retrieved from permanent memory. The default values are the following:

<b>Memory Location</b>	<b>Factory Default Value</b>	<b>Press FCN button to get to memory location</b>
dA	2 seconds	1 time
dB	2 seconds	2 times or after dA has been set
dI	12 seconds	3 times or after dB has been set
dO	12 seconds	4 times or after dI has been set

If the factory default values are not suitable, the 82149-600 must be programmed with the desired time delays for the following memory locations dA, dB, dI, and dO. The 82149-600 has a double digit display to aid in the programming process. Pressing the FCN button will initiate the programming mode of the 82149-600 and is used to scroll through the different memory locations. To get to the desired memory location press the FCN button the number of times indicated above or scroll through all memory locations as on initial set up. To program the 82149-600 follow the steps below.

## **PROGRAMMING**

1. To initiate the programming process the FCN button must be pressed.
2. After pressing the FCN button the double digit display will flash the memory location for 0.5 seconds followed by the value stored in that memory location.
3. If it is desired to change the value press the INCR button. Each time the INCR button is pressed it will increase the time delay by 1 second until it reached 30 seconds where it will roll over and begin at zero.
4. Once the desired time delay is set, press the function button to move on the next memory location and at the same time record the current value to permanent memory.

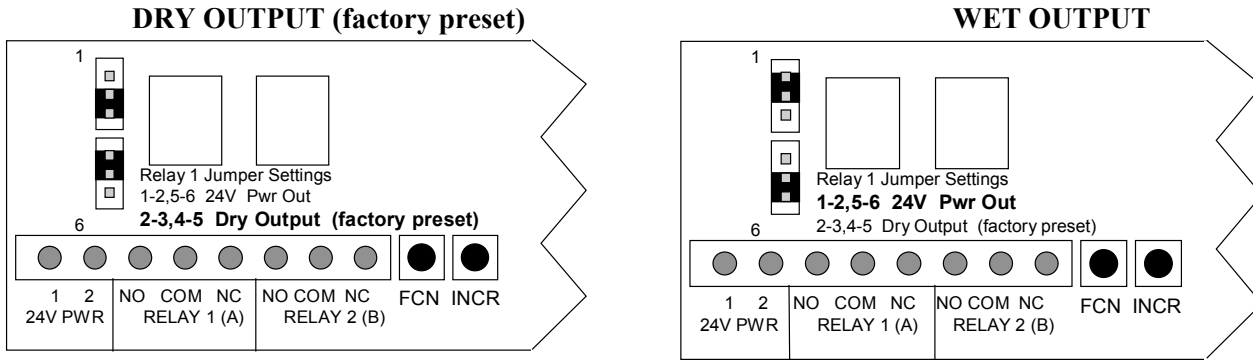
- OR -

If the FCN button is not pressed within 20 seconds after the time delay has been set, the value that was displayed will be saved and the 82149-600 will resume normal operation.

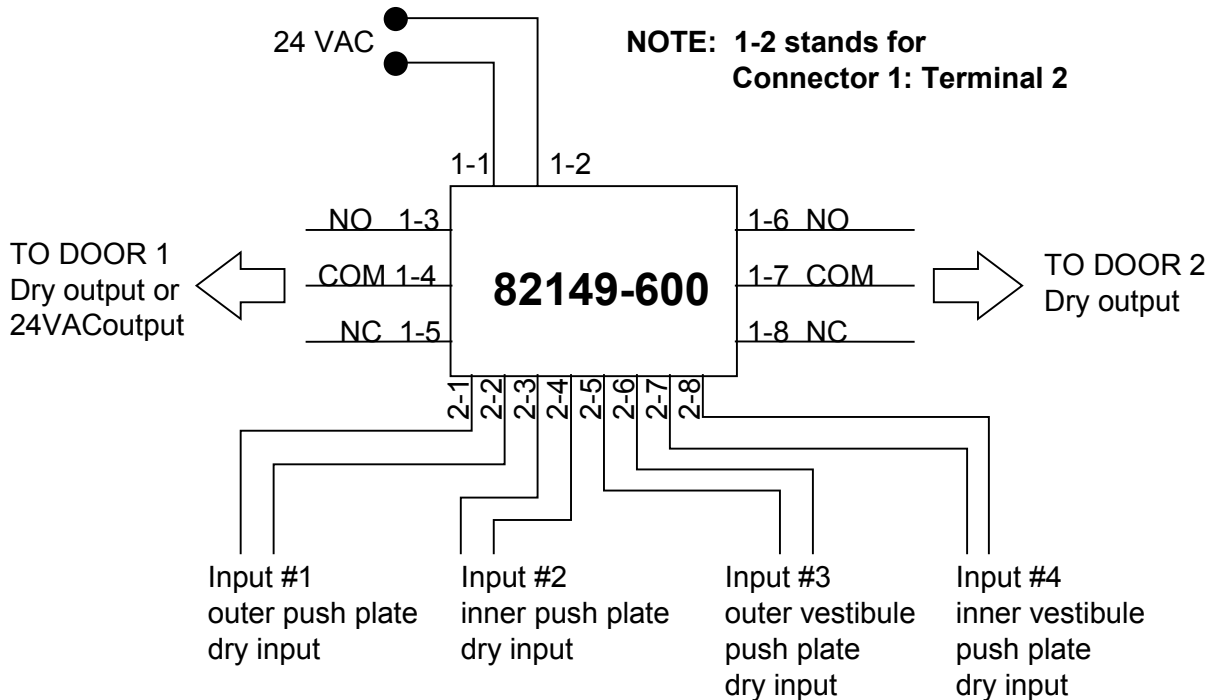
# RELAY 1 OUTPUT

Two jumpers on the 82149-600 provide the installer the flexibility of either a dry or wet output on Relay 1. If the jumpers are on the inner most pins, 2-3 and 4-5, as shown below the output of Relay 1 will be a dry output; therefore, there is not voltage or current supplied by Relay 1 of the 82149-600. If a voltage is required at the output of Relay 1 both jumpers must be moved to the outer most pins, 1-2 and 5-6. This configuration will enable the 82149-600 to supply a voltage at the output of Relay 1. The supplied voltage will equal to the input voltage.

If the jumpers are placed in the same position on both pin headers (for example: 1-2 & 4-5 or 2-3 & 5-6) the 82149-600 module will not function properly.



## WIRING SCHEMATIC



If after troubleshooting a problem, a satisfactory solution cannot be achieved, please call Dor-O-Matic Tech Services for further assistance during Central Standard Time at **(800) 543-4635** from **7am - 5pm** Monday thru Friday.

**DO NOT** leave any problem unresolved. If you must wait for the following workday to call Dor-O-Matic, leave the door inoperable until satisfactory repairs can be made. **NEVER** sacrifice the safe operation of the automatic door or gate for an incomplete solution.