Adams Rite

ASSA ABLOY

3000SE/8000SE Exit Devices

Motorized Latch Retraction

Installation Instructions

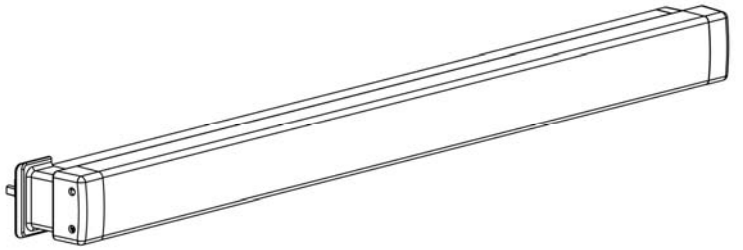


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Preparing for Installation

Function

The SE feature is available on all 3000/8000 series exit devices and provides for latch retraction of the device from a remote location. The exit device is Fail Secure—in the event of a power failure, the exit device defaults to a latched condition. The linear actuator is rated for both continuous and intermittent operation.

Specifications

Rated Voltage: 24 VDC

Rated Current: 0.4 Amperes (S) to retract; 0.2A to hold (Nominal)

0.45A to retract; 0.25A to hold (Maximum)

Rated for continuous duty

Mounting Information

The exit device is mounted in the standard manner per the specific exit device installation instructions. The exit device must function mechanically prior to operating electrically.

CAUTION: This product must be installed in accordance with all applicable building and life safety codes.

Safety Instructions

This device is limited in its applications, and should only interface with components that are equally rated. Any failure to observe and adhere to the operating limits may cause permanent damage.

CAUTION: Failure to ensure that there are no shorts across power feed lines may result in damage to power transfer and electric retraction of the exit device.

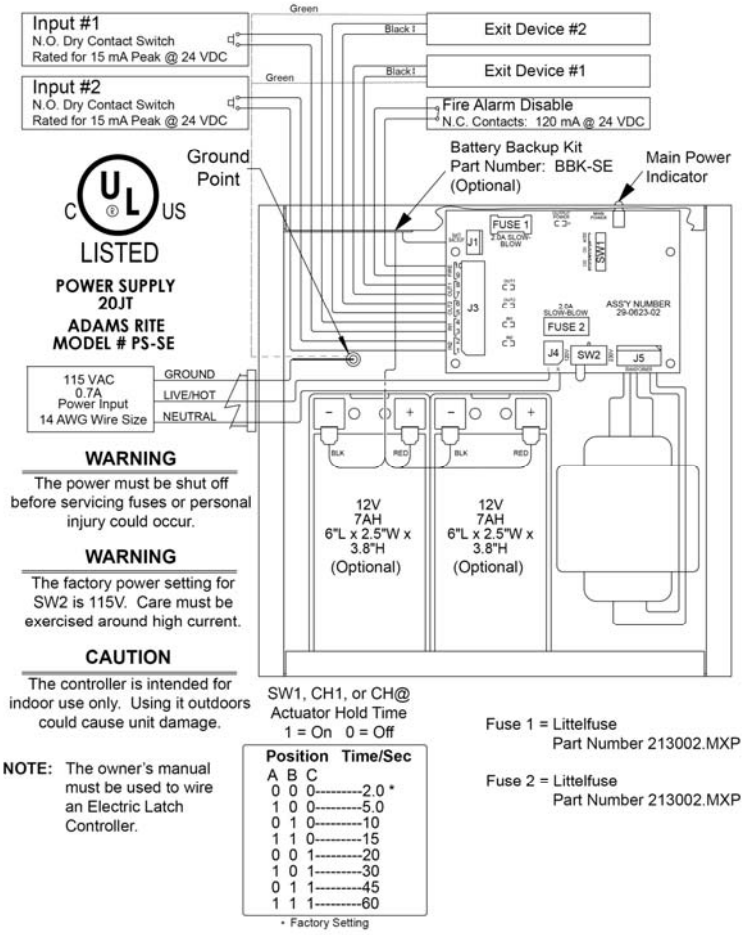


Figure 1. Adams Rite Model # PS-SE Power Supply

AWG Chart – Run Length for 24 VDC at 0.5A	
Run Length In Feet	**Wire Gauge**
0–300	18
300–600	16
600–900	14

Figure 2. Wire Sizing

Installation Requirements

The following are the installation requirements/comments for the SE feature exit device:

NOTE 1: Recommended circuit hookup for the Adams Rite power supply is provided in Figure 1, “Adams Rite Model # PS-SE Power Supply,” and the owner’s manual supplied with the power supply.

NOTE 2: Wire size recommendations are provided in Figure 2, “Wire Sizing.”

- 24 VDC device power is supplied by an Adams Rite power supply (Part Number: PS-SE).
- A remote switch or normally open dry contacts within the access control system is required to control the electrical operation.
- Switch contacts are rated for the power requirements shown in Figure 1.

NOTE: The power supply owner’s manual provides instructions on how to set the solenoid hold time.

- Operation of the switch will retract the latching mechanism for as long as the switch closure is maintained, or until the adjustable delay times out.
- A maximum of two electrified devices, activated either sequentially or independently, can be operated with one PS-SE power supply.
- There is an option to install a battery backup in the PS-SE power supply by ordering the BBK-SE battery backup system kit and two 12-volt, 7-ampere-hour batteries. Installation is per the PS-SE owner’s manual.

CAUTION: This product must be installed in accordance with all applicable building and life safety codes.

Installing

NOTE: The exit device template should be reviewed to determine applicable bar height for installation.

1. INSTALL the exit device with SE feature in accordance with the specific exit device installation instruction.
2. DRILL a 3/8" (0.375" or 9.53 mm) on the door for wiring access at the time of installation (see Figure 3, "Door Preparation").

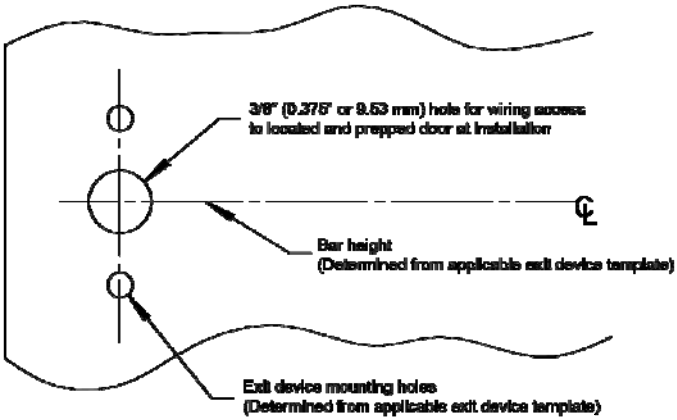


Figure 3. Door Preparation

3. PASS the wiring, using an Adams Rite 4612 wire transfer or equivalent to properly transfer the wires from the frame to the door.
4. ENSURE wires are protected from abrasion where they pass through the hole in the door by using a sufficient protection device [i.e., rubber grommet (not supplied)].

NOTE 1: Proper calibration needs to occur on all SE exit devices when installed prior to initial power up.

NOTE 2: Labels are affixed to all SE exit devices to detail calibration steps, and also provide a Quick Response (QR) code that is a link to a calibration instruction video.

Calibrating

NOTE: Verification of the PCBA type ensures that the correct one is installed when there is an issue that could be PCBA related.

1. PERFORM a visual verification to identify whether the PCBA installed is the older (four-capacitor) or newer (two-capacitor).
2. PERFORM the calibration process for the installed exit device.

    [a] ENSURE power is disconnected.

    [b] **IF** PCBA is being replaced,
    THEN INSTALL new PCBA.

    [c] DEPRESS the push bar fully.

    [d] APPLY 24 VDC power to the exit device.

    [e] CONTINUE to hold the push bar until an audible activation sound is heard from the motor, and then RELEASE the push bar to its latched position.

    NOTE: The push bar will automatically complete the calibration process.

    [f] **IF** the calibration process does not complete successfully,
    THEN REPEAT Steps [a] – [e].

Troubleshooting

No power to the exit device

1. ENSURE that the power connector is connected properly, all wiring from the power supply is continuous (without opens), and there are no shorts to ground.

Neither exit device retracts after the control switch is activated

1. VERIFY connections.
2. ENSURE exit device wires are properly terminated in the power supply.
3. VERIFY continuity through power transfer devices such as wired hinges and door cords/loops.

“Main Power” LED is not lighted

1. ENSURE line voltage is present.
2. CHECK fuse F2 (in the black fuse holder).
3. ENSURE that the primary voltage selection switch SW2 is properly set.

“Output Power” LED on power supply board is not lighted

NOTE: If fuse F1 is blown, the wires that run to the exit device are probably shorted together against the conduit, door frame, or electric hinge. A meter should be used to check for shorts.

1. CHECK fuse F1.
2. ENSURE that a fire alarm is connected between J3-9 and J3-10, or the factory installed jumper between J3-9 and J3-10 is removed.

IN1 and IN2 lights do not light in response to input switches

1. CHECK to see if there is an open connection in the field wiring existing between the Adams Rite power supply and the control switch used for activating the latch solenoids.
2. CHECK to see is there is a defective control switch existing on J3-1 and J3-2, or on J3-3 and J3-4.

OUT1 and OUT2 lights do light in response to input switches

1. CHECK to see if there is an open connection in the field wiring existing between the Adams Rite power supply and the exit device.
2. VERIFY using a resistance check.
3. **IF** previous suggestions do not solve the problem,
   AND one exit device works and one does not,
   THEN PROP the door open,
   AND CONNECT a voltmeter across the black and white leads coming from the exit device,
   AND ACTIVATE the malfunctioning exit device.
4. **IF** the voltmeter measures approximately 24 VDC at the time of activation, but the latch does not budge,
   THEN the SE PCBA is not activating the motor,
   AND REPLACE the exit device.

Exit devices retract even though the control switch has not been activated

1. CHECK to see if a maintained control switch is being used and is in the closed position.
2. **IF** the control switch is suspected to be defective,
   THEN DISCONNECT and TEST the control switch to verify,
   AND REPLACE or REWIRE, as necessary.



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