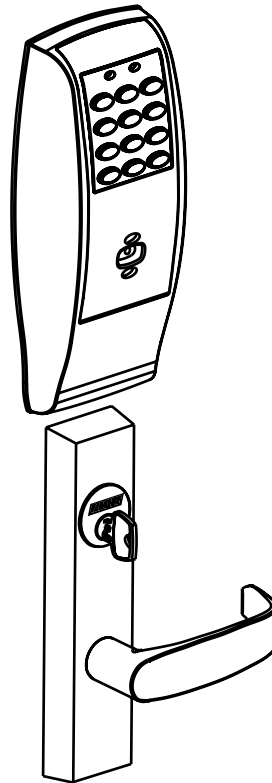


**v.s1**

**Profile**  
**PoE Exit Device**  
**Installation Instructions**



A7765B

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## **1** Warning

Changes or modifications to this unit not expressly approved by ASSA ABLOY Inc. could void the user's authority to operate the equipment.

### FCC:

This equipment has been tested and found to comply with the limits for a Class A digital device, pursuant to part 15 of the FCC rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at his own expense.

### Industry Canada:

The term "IC:" before the radio certification number only signifies that Industry Canada technical specifications were met.

This Class A digital apparatus meets all requirements of the Canadian Interference Causing Equipment Regulations. 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.

Cet appareillage numérique de la classe A répond à toutes les exigences de l'interférence canadienne causant des règlements d'équipement. L'opération est sujette aux deux conditions suivantes: (1) ce dispositif peut ne pas causer l'interférence nocive, et (2) ce dispositif doit accepter n'importe quelle interférence reçue, y compris l'interférence qui peut causer l'opération peu désirée.



Warning SARGENT Mfg. Co. v.S Series locksets utilizing a door position switch (DPS) are not rated for, nor intended for use in life safety applications.

## 2 General Description

The SARGENT Profile Series v.S1 exit device is available with either an HID® 125 kHz prox or 13.56 MHz iCLASS® technology reader. It utilizes existing infrastructure and IEEE 802.3af PoE (Power over Ethernet) technology as a proven alternative to traditional access control installations. The v.S1 is a self-contained microprocessor-controlled access control product with non-volatile memory. It uses the existing network cable to communicate with access control systems. The v.S1 lock holds a total of 2400 unique users per lock.

Using PoE technology coupled with third party software, this v.S1 online exit device offers a complete, integrated access control system.

The Profile Series v.S1 Exit Device may be used for both indoor and exterior applications. A weather-protective gasket is recommended for exterior applications.

*HID and iCLASS are registered trademarks of HID Global Corporation*

## 3 Hardware Specifications

### Profile Series Rim Exit Device

- Latch – 3/4" throw, stainless steel
- Accepts all SARGENT rim cylinders (8877 only)
- Key retracts latch (8877 only)

### Profile Series Mortise Exit Device

- Latch – 3/4" throw, anti-friction, brass
- Accepts all SARGENT mortise cylinders (8977 only)
- Key retracts latch (8977 only)

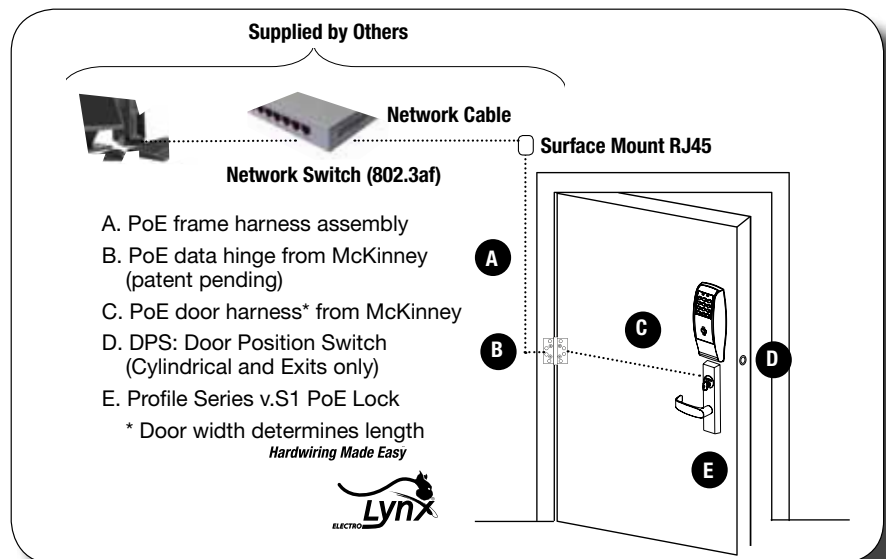
### Profile Series Rim and Mortise Exit Devices

- Push bar retracts latch from inside
- Fire stop provided on all lever handle designs
- Profile Series exit devices furnished for 1-3/4" and 1-3/8" doors
- UL Listed
- Available in ET lever handle designs only

## 4 Electronic Specifications

- 2400 users per lock; 10,000 event audit trail
- Multiple time zone and holiday access scheduling
- Centralized lock management
- Real time door status monitoring
- Supports HID® 125 kHz prox or 13.56 MHz iCLASS® credentials (26 - 39 bit); supports CSN reads for other common 13.56 MHz cards, including MiFare, DesFire, and Felica
- First-In unlock configuration, either by time or by user (selectable)
- Lock down capable
- Input Power: PoE Class 2 Device, as defined by IEEE 802.3af

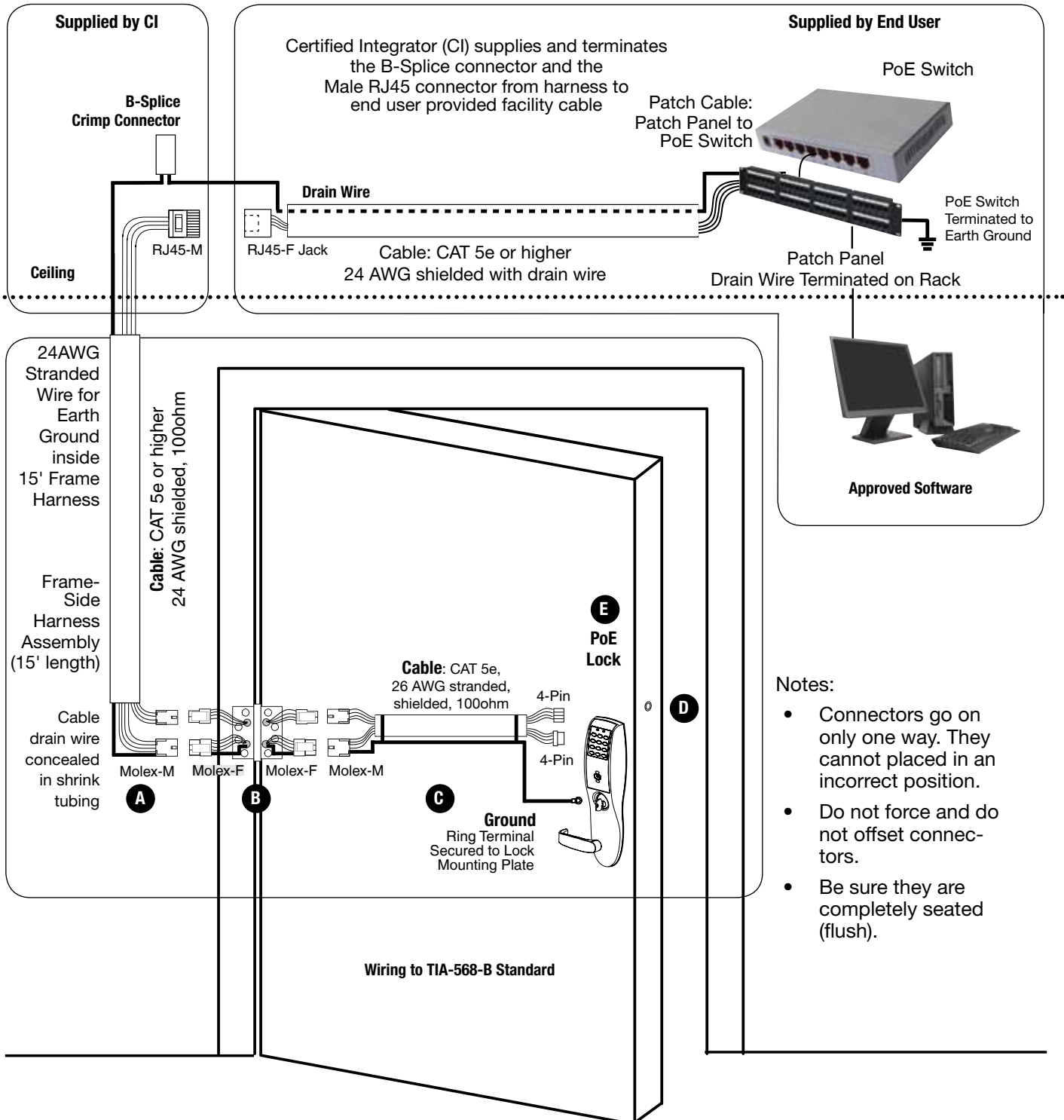
## 5 Installation Wiring Overview



### 6 Installation Wiring

- A** PoE frame harness assembly (From McKinney)
- B** PoE data hinge (Patent Pending) (From McKinney)
- C** PoE door harness\* (From McKinney)
- D** DPS: Door Position Switch (cylindrical and exits only)
- E** Profile Series v.S1 Online P1 PoE lock

\* Order of installation may vary.  
Refer to appropriate sections for instructions.

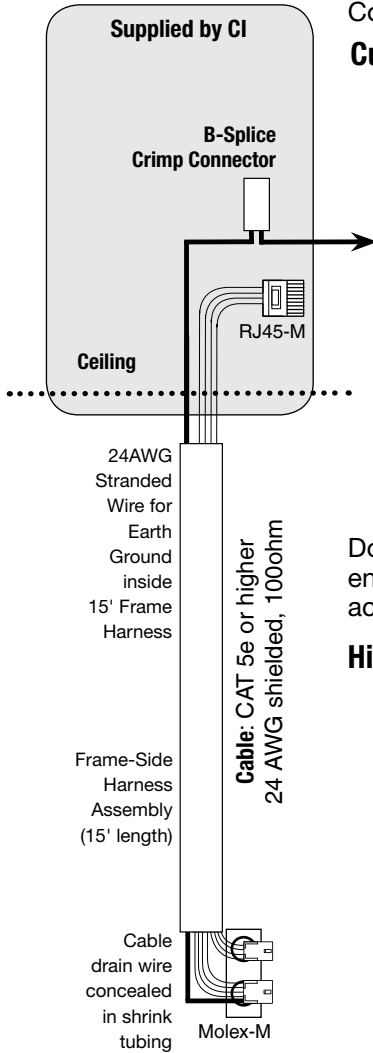


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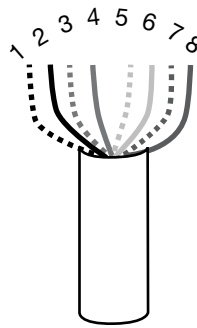
## Installation Wiring (Continued)

### A Frame Harness Installation



Components and wire harness supplied by McKinney: Suggested installation.  
**Cut end / ceiling-side PoE harness:**

#### TIA-568-B Standard Wiring



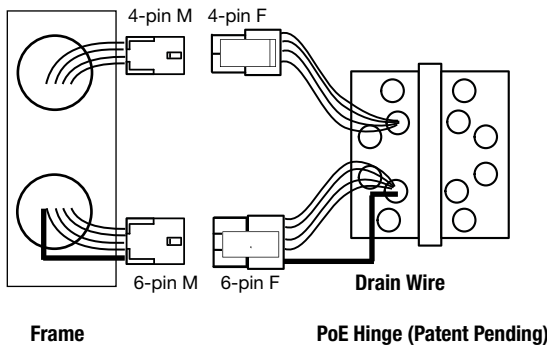
Pair Number	Wire	PIN
1	White/Blue	5
	Blue	4
2	White/Orange	1
	Orange	2
3	White/Green	3
	Green	6
4	White/Brown	7
	Brown	8

Do not confuse pair numbers with pin numbers. A pair number is used for reference only (eg: 10Base-T Ethernet uses pairs 2 & 3). The pin numbers indicate actual physical locations on the plug and jack.

#### Hinge side of PoE harness:

1. Feed cut end of harness into hole on hinge-side through single access hole.
2. Push one connector back through the hole and feed into the other access hole. Each of the hinge-side harness connectors should end up threaded through a different access hole and matched to the same size pin connector from the door harness:
  - 4-pin male molex connector.
  - 6-pin male molex connector with ground wire.

### B PoE Data Hinge



#### Hinge-side harness connectors:

- 4-pin male molex connector
- 6-pin male molex connector with ground wire

#### Lock-side harness connectors:

- Ring terminal
- (2) 4-pin connectors

## Installation Wiring (Continued)

### **C** PoE Door Harness

Order of installation may vary.

Refer to appropriate sections for instructions.

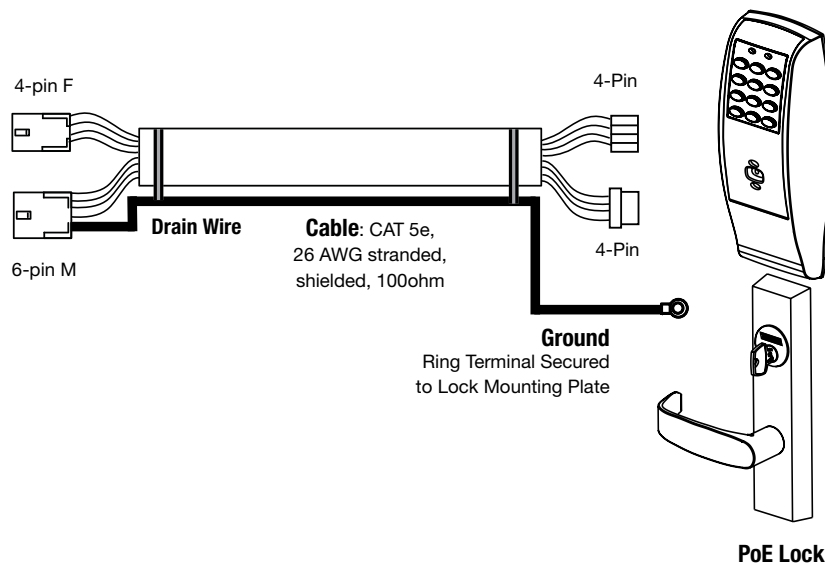
1. Prop door open.
2. Tape the two lock-side 4-pin connectors to the ring terminal.
3. Using the ring terminal, carefully fish the assembly through the door channel to the lock.
4. Remove tape from ring terminal and door harness connectors.

Hinge-side harness connectors:

- 4-pin male Molex connector
- 6-pin male Molex connector with ground wire

Lock-side harness connectors:

- Ring terminal
- (2) 4-pin connectors



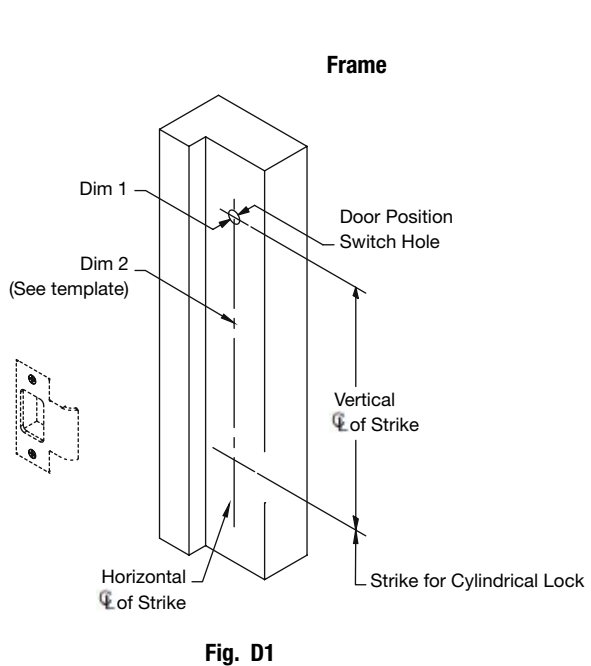
## Installation Wiring (Continued)

### D Door Position Switch

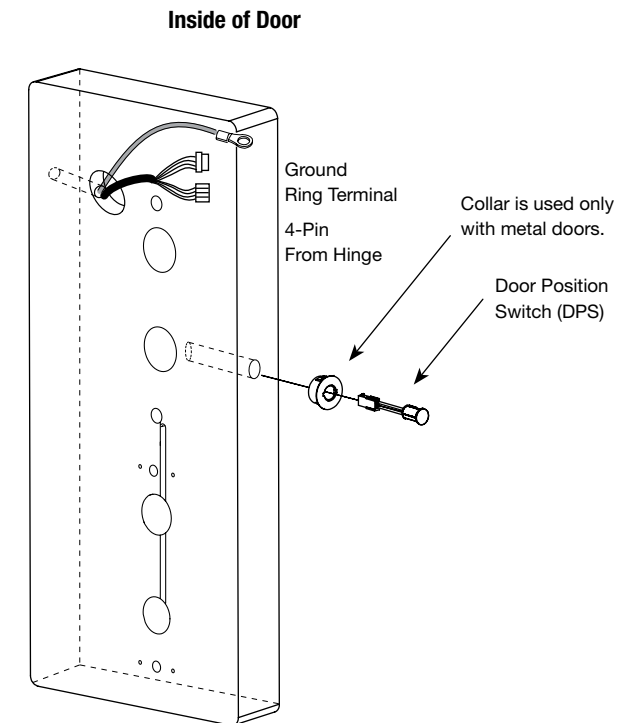
1. Prep door according to proper template (Fig. D1).
2. Insert connector end of DPS through the raceway on the latch edge of the door (Fig. D2).
3. Note: Only use collar when installing in a metal door.
4. To insert DPS, push wires through raceway toward lock prep.
5. Push DPS firmly into place by hand.

**IMPORTANT: DO NOT TAP SWITCH WITH ANY TOOL.**

6. To connect DPS to lock controller per diagram, refer to the wiring instruction sections in the Installation Instructions section.



**Fig. D1**

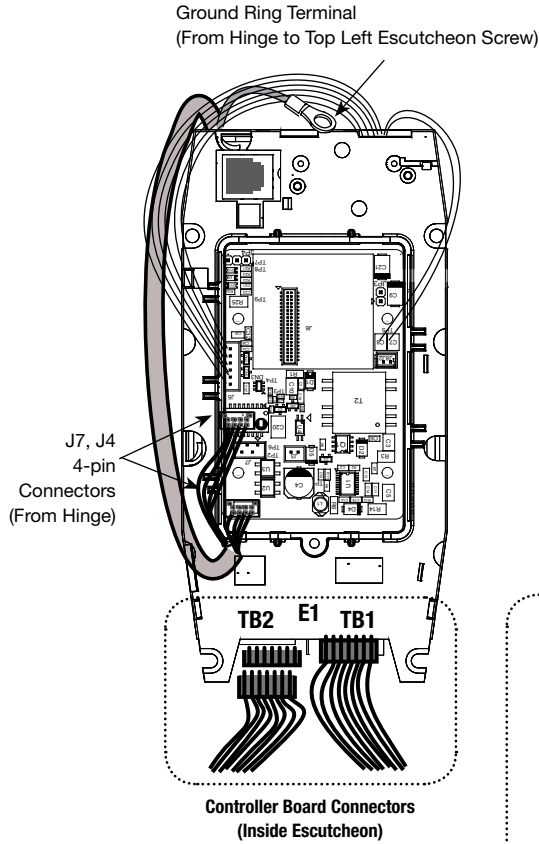


**Fig. D2**  
**Inside of Door**

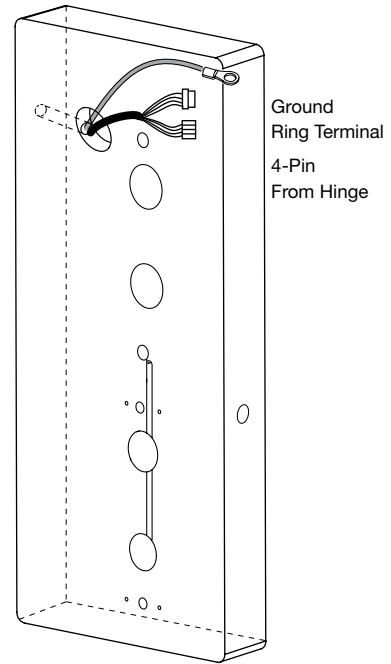
	Wood Frame	Metal Frame
Dim 1	3/8" $\phi$	3/4" $\phi$

### Installation Wiring (Continued)

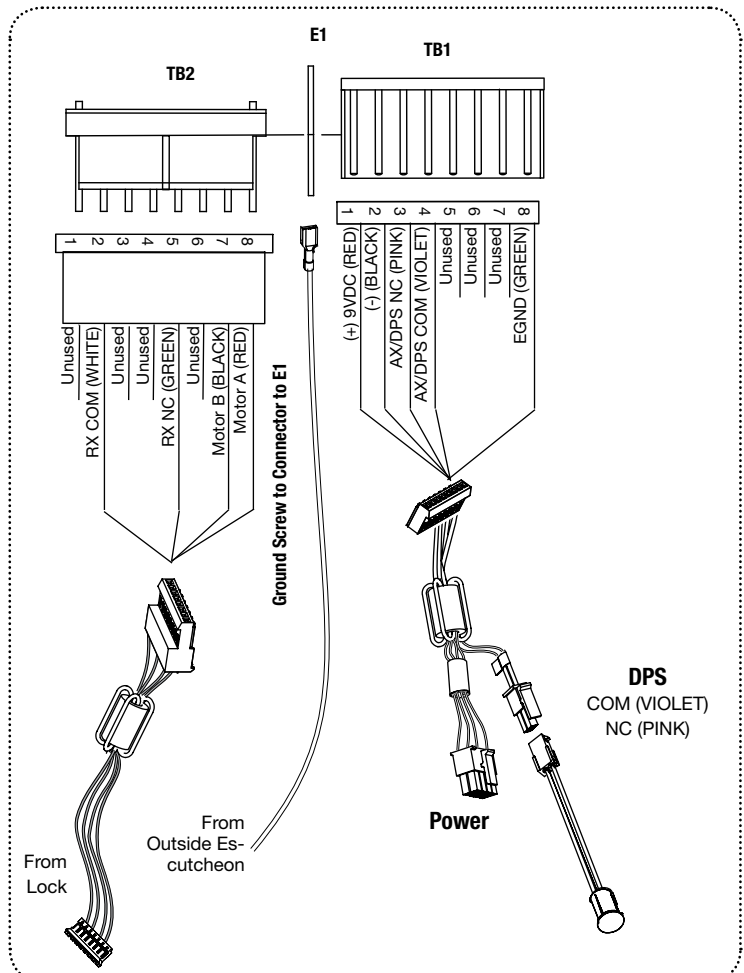
#### E PoE Lock Wiring (v.S1)



Inside of Door

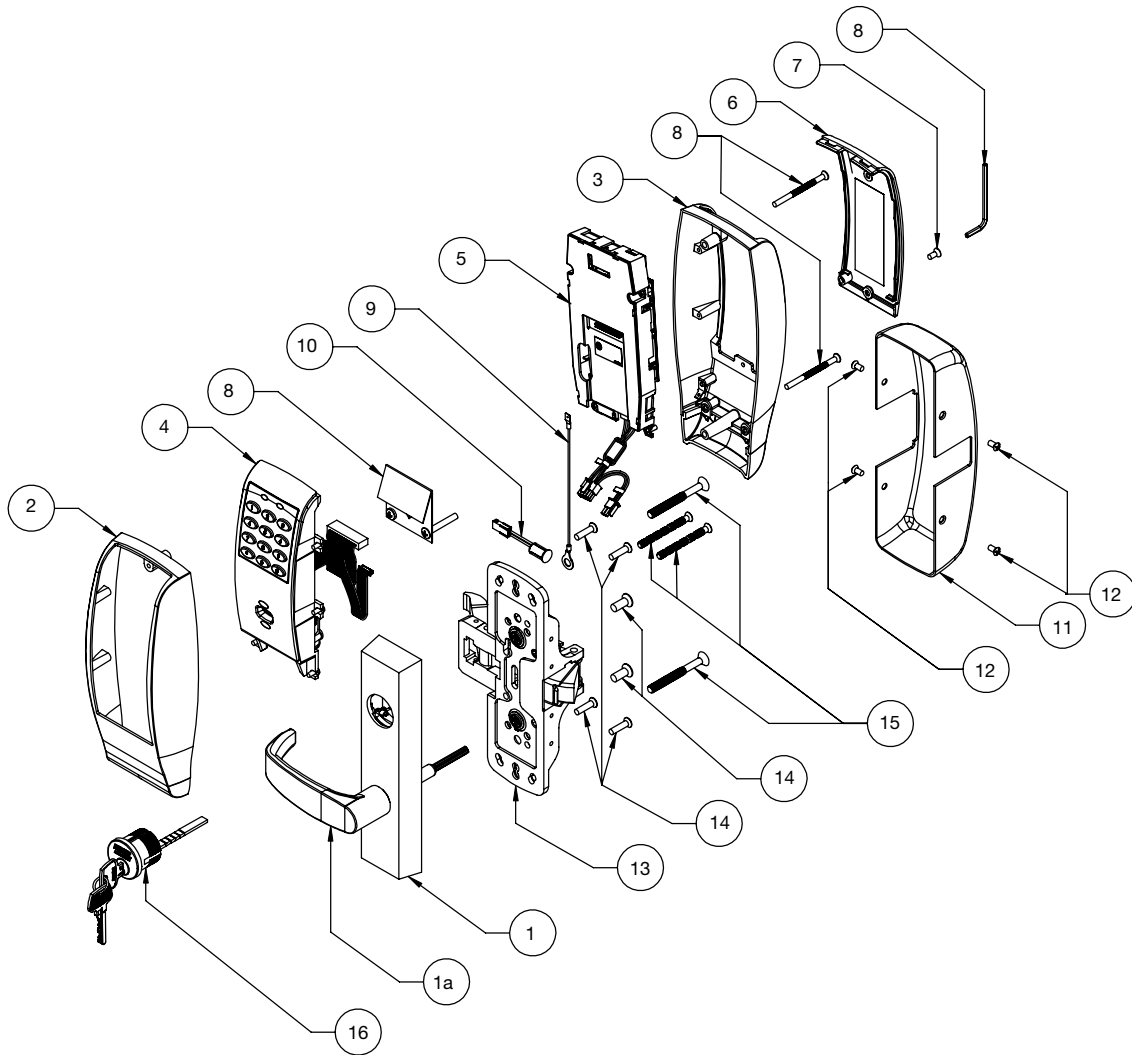


Controller Board Connectors  
(Inside Escutcheon)



## 7 Parts Breakdown

### Profile Series 125 kHz Prox or 13.56 MHz iCLASS® Rim Exit Device (8877/8878 x ET x Lever Design)



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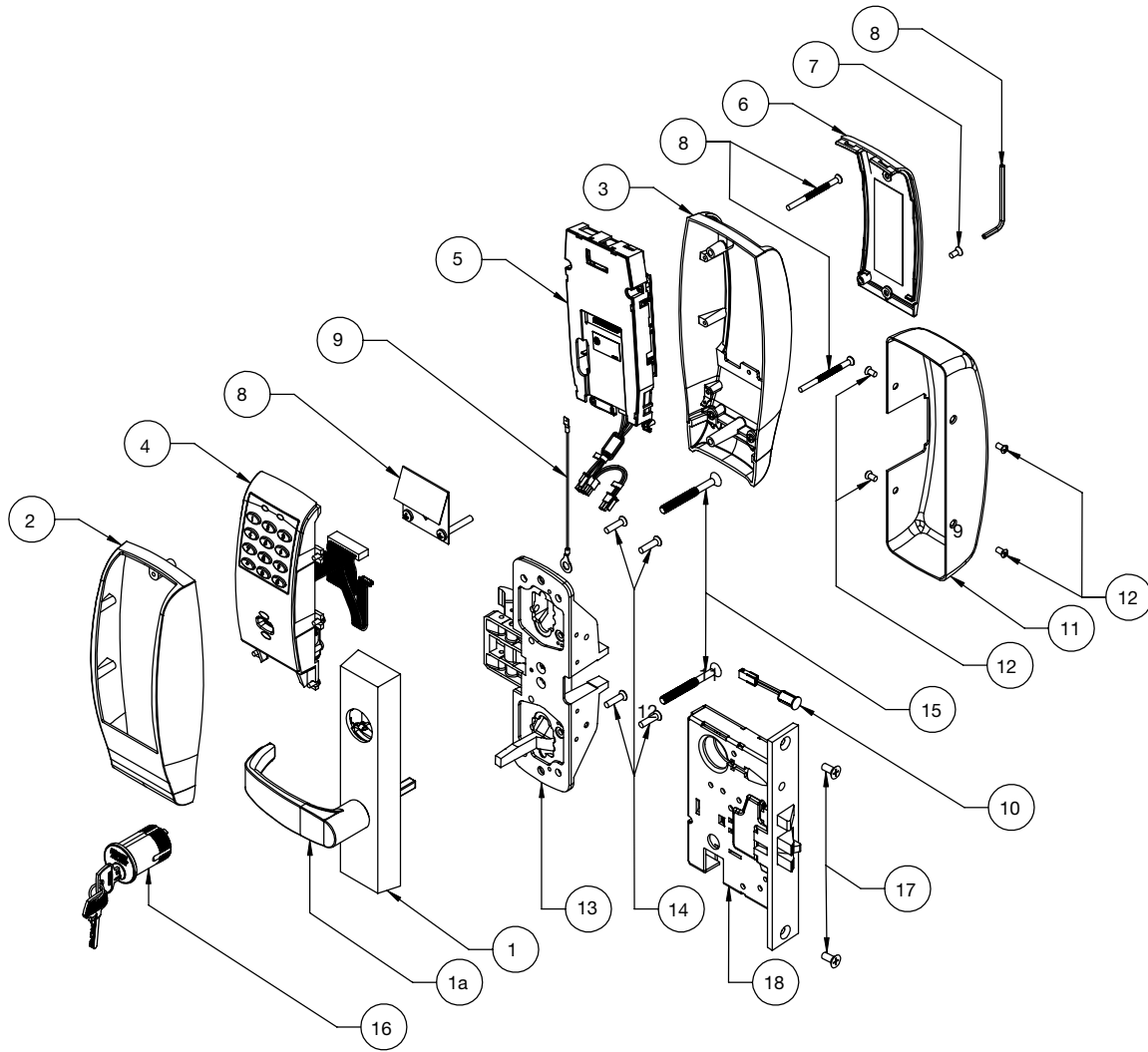
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### Profile Series 125 kHz Prox or 13.56 MHz iCLASS® Rim Exit Device, Continued (8877/8878 x ET x Lever Design)

ITEM	PART NO.	DESCRIPTION	REQ'D
------	----------	-------------	-------

1	S1-777-8-HAND-FINISH	'S' Series ET Trim - With Cylinder	1
	S1-778-8-HAND-FINISH	'S' Series ET Trim - Without cylinder	
1a	ET Lever	Reference 8800 Series Catalog for Available Levers	1
2	68-1397	Outside Escutcheon	1
3	68-1396	Inside Escutcheon	1
4	52-2431	125 kHz Prox Only Bezel Assembly (PA)	1
	52-2432	Keypad & 125 kHz Prox Bezel Assembly (PK)	
		OR	
	52-4420	13.56 MHz Prox Only Bezel Assembly (S1-IA) 13.56 mHz reader assembly ships configured for PoE/Hardpower use.	
	52-4421	Keypad & 13.56 MHz Prox Bezel Assembly (S1-IK) 13.56 mHz reader assembly ships configured for PoE/Hardpower use.	
5	52-4424	S1 Controller Assembly (Double Pulse)	1
6	52-3855	Battery Cover Assembly	1
7	01-1212	Security Screw	1
8	52-2525	Profile Screw Pack - Specify Finish (Includes: Fire Stop Plate, Trim Mounting Screws and Security Allen Wrench)	1
9	52-3968	Chassis Grounding Harness	1
10	52-3893	Door Position Switch	1
11	68-0406	Chassis Cover (Standard)	1
	68-1014	Chassis Cover (GL)	
12	68-3905	Chassis Cover Screw Pack - Specify Finish (Includes: Chassis Cover Screws)	1
13	68-7255	8800 Chassis Assembly (Standard)	1
	68-7256	8800 Chassis Assembly (12-)	
	68-5836	8800 Chassis Assembly (GL)	
	68-5837	8800 Chassis Assembly (12-GL)	
14	68-3922	Chassis Screw Pack (Includes: Wood and Metal Chassis Mounting Screws, and Bar Locking Key)	1
15	68-4387	ET Screw pack w/o Cylinder (Includes: ET Mounting Screws)	1
	68-4388	ET Screw pack w/ Cylinder (Includes: ET Mounting Screws and Cylinder Mounting Screws)	1
16	Consult Factory	Rim Cylinder	1

## Profile Series 125 kHz Prox or 13.56 MHz iCLASS® Mortise Exit Device (8977/8978 x ET x Lever Design)



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### Parts Breakdown for Profile Series 13.56 MHz iCLASS® Rim Exit Device (Continued) (8977/8978 x ET x Lever Design)

ITEM	PART NO.	DESCRIPTION	REQ'D
1	S1-777-HAND-FINISH	'S' Series ET Trim - With Cylinder	1
	S1-778-HAND-FINISH	'S' Series ET Trim - Without cylinder	
1a	ET Lever	Reference 8900 Series Catalog for Available Levers	1
2	68-1397	Outside Escutcheon	1
3	68-1396	Inside Escutcheon	1
4	52-2431	125 kHz Prox Only Bezel Assembly (PA)	1
	52-2432	Keypad & 125 kHz Prox Bezel Assembly (PK)	
		OR	
	52-4420	13.56 MHz iCLASS Only Bezel Assembly (S1-IA) 13.56 MHz reader assembly ships configured for PoE/Hardpower use.	
	52-4421	Keypad & 13.56 MHz iCLASS Bezel Assembly (S1-IK) 13.56 MHz reader assembly ships configured for PoE/Hardpower use.	
5	52-4424	S1 Controller Assembly (Double Pulse)	1
6	52-3855	Battery Cover Assembly	1
7	01-1212	Security Screw	1
8	52-2525	Profile Screw Pack - Specify Finish (Includes: Fire Stop Plate, Trim Mounting Screws and Security Allen Wrench)	1
9	52-3968	Chassis Grounding Harness	1
10	52-3893	Door Position Switch	1
11	68-0407	Chassis Cover (Standard)	1
	68-3905	Chassis Cover Screw Pack - Specify Finish (Includes: Chassis Cover Screws)	
13	68-7253	8900 Chassis Assembly LHRB	1
	68-7254	8900 Chassis Assembly RHRB	
14	68-2165	Chassis Screw Pack (Includes: Wood and Metal Chassis Mounting Screws, and Bar Locking Key)	1
15	68-4387	ET Screw pack w/o Cylinder (Includes: ET Mounting Screws)	1
16	915-Hand-Finish	8900 Lock Body Assembly	1
17	99-2628	Lock body Screw Pack - Specify Finish (Includes: Wood and Metal Lock body Screws)	1
18	Consult Factory	#46 Mortise Cylinder	1

## 8 Installation for Profile Series v.S1 With 8877/8878 Rim Exit Device

### Step #1 – Prepare Door

#### A. Verify Hand and Bevel of Door

- This device is non-handed.
- Door should be fitted and hung.
- Verify box label for size of exit device and function.

#### B. Door Preparation

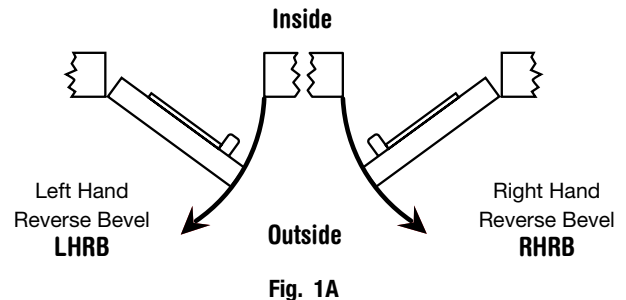
If using a mullion, install prior to installing hardware.

Doors should be pre-prepped.

Prep door using the following (see website [www.intelligentopenings.com](http://www.intelligentopenings.com)):

- Exit installation instructions A6770
- Field Template A7992 (Wood)
- Door Manufacturer's Template 4640 (Metal and Wood)

Note: Wood door has additional cutout if installation includes a cylinder.



### Step #2 - Position Exit Trim (ET)

For exterior applications, use ET gasket (52-0263) to seal between ET escutcheon and outside door surface (Fig. 2A).

- 1A. For wood doors: Route ET wire harness through the cylinder hole and out the other side (Fig. 2A).
- 1B. For metal doors: Route ET wire harness through the cylinder hole and door.
2. Place ET trim on door.
3. Connector from ET harness connects to connector from chassis (next step).

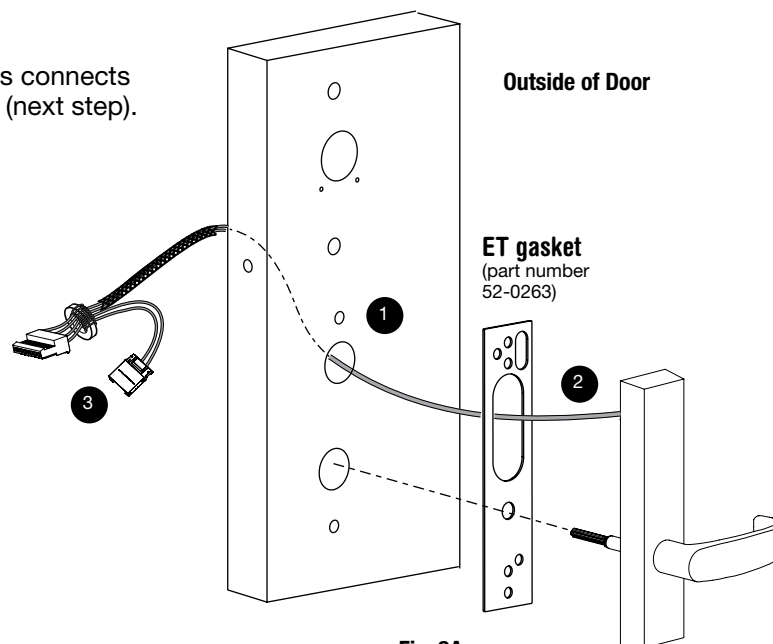


Fig. 2A

Showing Wood Door Template Without Cylinder Hole

### Step #3 - Secure Inside Trim and Chassis

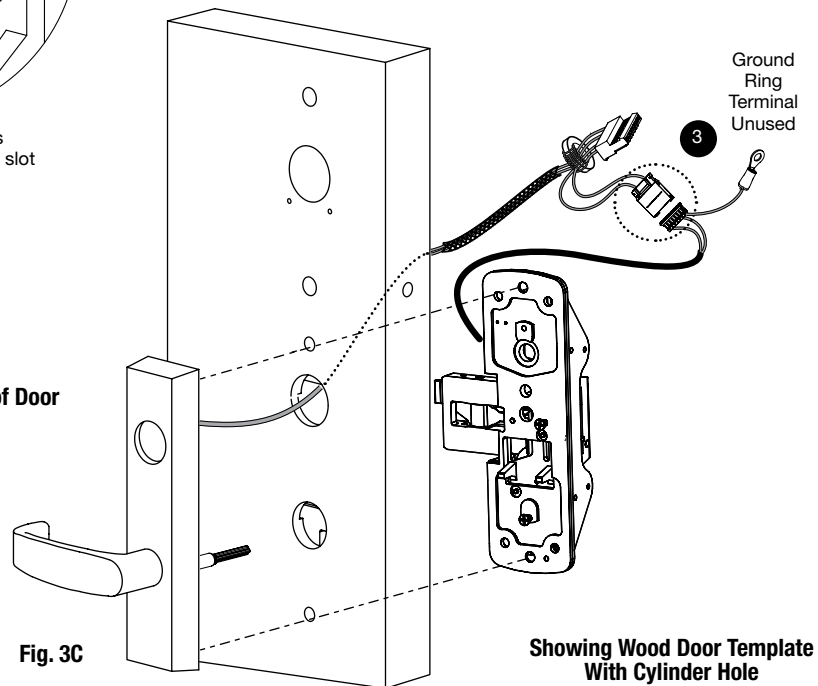
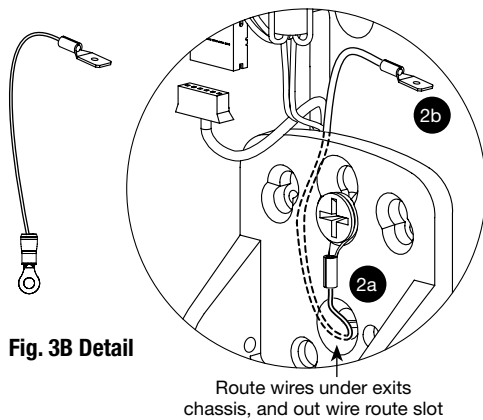
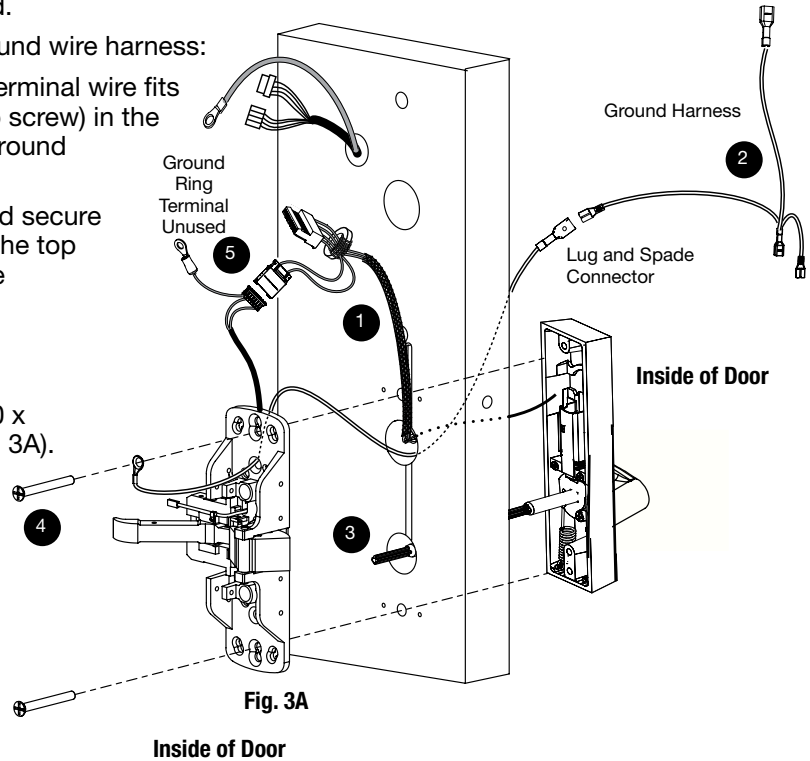
1. Route ET harness through wire run channel for wood doors (Fig. 3A) and through access hole for metal doors (not shown).

Note: Make sure no wires are pinched.

2. Before securing chassis, connect ground wire harness:
  - a. Spade connector of ground ring terminal wire fits through the hole (beneath the top screw) in the chassis and connects to lug on ground harness (Fig. 3B Detail).
  - b. Route the ground ring terminal and secure through the top center hole with the top 1/4-20 x 2-3/8" flat head machine screw (Fig. 3B Detail).

- b. Route the ground ring terminal and secure through the top center hole with the top 1/4-20 x 2-3/8" flat head machine screw (Fig. 3B Detail).

3. Engage ET spindle in the hub of exit device chassis.
4. Secure chassis and ET with (2) 1/4-20 x 2-3/8" flat head machine screws (Fig. 3A).
5. Connect ET harness and connector from chassis (Fig. 3C)



# Profile Series v.S1 PoE Exit Device



## Step #4 – Install Cylinder

For devices without cylinder, skip this step.

1. Insert cylinder into ET trim (Fig. 4A).
2. Mate cylinder tailpiece into hub of exit device chassis.
3. Make sure ET harness is clear of cylinder and cylinder tailpiece.

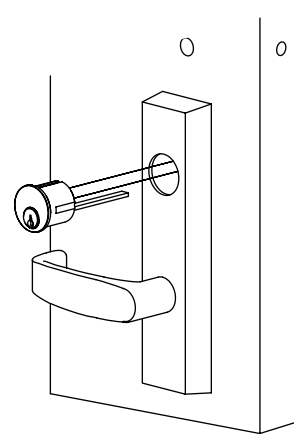


Fig. 4A

## Step #5 – Secure Chassis

1. Secure cylinder, if used, to exit chassis using (2) #12-24 x 1-7/8" connecting screws (Fig 4B).
2. Fasten exit chassis to door using:
  - (4) #10 wood screws for wood doors (or)
  - (4) #10-24 machine screws for metal doors.
3. Position cylinder, if used, so that the SARGENT logo is right-side up (Fig. 4C).

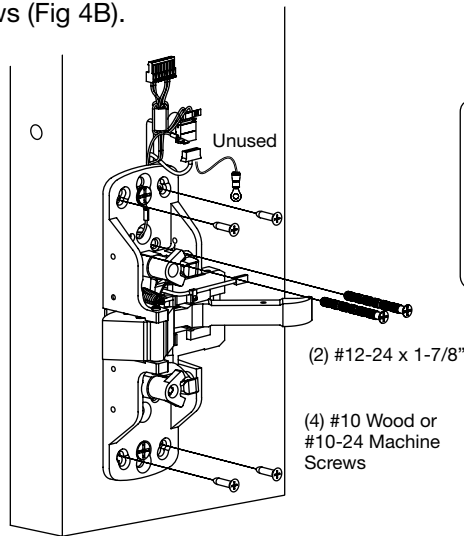


Fig. 5A

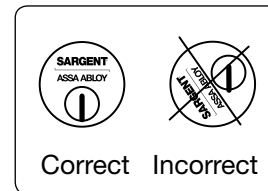


Fig. 5B

## Step #6 – Door Options

### A. Fire Stop Plate (P/N 52-0033)

Fire-rated doors require a fire stop plate on the outside of the door (Fig.6A).

1. If not present, drill (2) 1/8" x 1-1/4" deep holes in the door.

Refer to template for fire-stop prep locations.

2. Attach fire stop plate with flap up and out using (2) #8 x 1/2" self-tapping screws for wood and metal doors.

### B. Weather Conduit (52-2847)

Install weather conduit on **NON FIRE-RATED** exterior doors only (Fig. 6B).

1. Carefully insert the weather conduit into the ribbon cable hole on the inside of the door.
2. Place the O-ring around the weather conduit on the outside and up against the door (Fig. 6C)

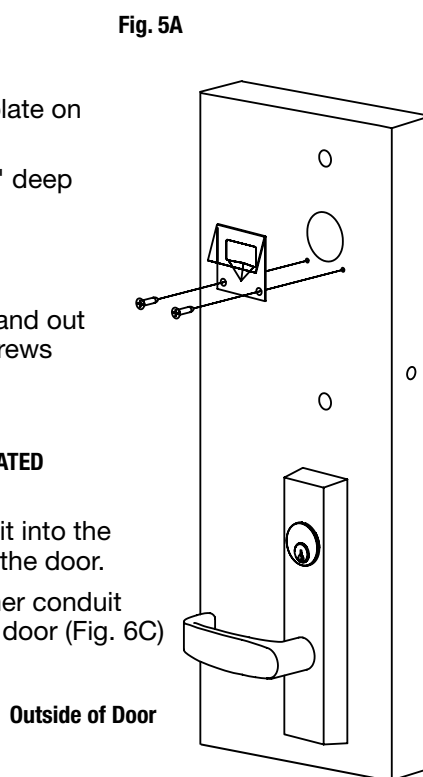


Fig. 6A

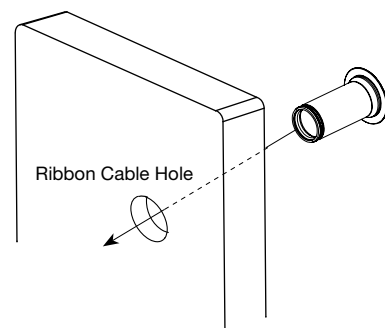


Fig.6B

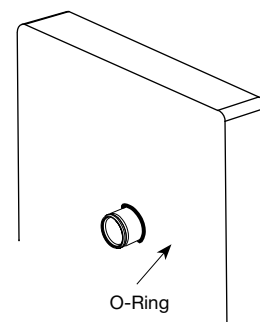


Fig.6C

Outside of Door

Outside of Door

### Step #7 – Install Door Position Switch (DPS)

If it isn't installed, install the door position switch:

1. Prep door according to proper template (A7992).
2. Insert DPS into the raceway on the latch edge of the door by pushing wires down raceway towards the lock.  
Note: Use collar ONLY when installing in a METAL door.
3. Push DPS firmly in place by hand.  
Note: DO NOT TAP SWITCH WITH ANY TOOL.
4. Connect DPS to adapter that plugs into TB2.  
Refer to diagrams in the wiring steps, beginning with Step #9.

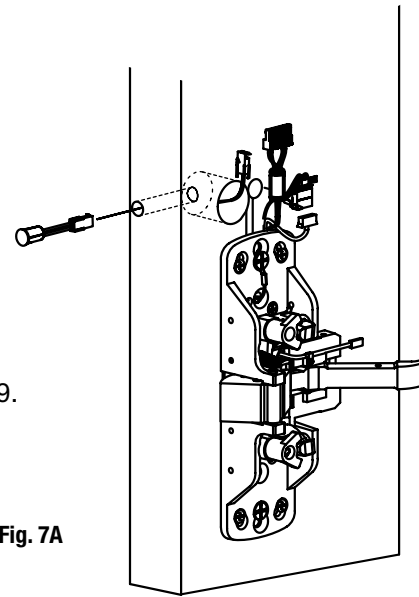


Fig. 7A

### Step #8 – Attach Gasket and Install Outside Escutcheon

For exterior applications, use a gasket (part number 82-0500) between escutcheon and outside door surface.

To apply weatherseal gasket:

1. Carefully remove the backing from the gasket (Fig. 8A).
- 2A. For 12- fire rated devices:** Feed keypad ribbon cable/connector from outside of door through gasket and fire stop plate.
- 2B. For non-12- exit devices:** Feed keypad ribbon cable/connector through the gasket and then through the conduit hole in door.

Note: Install ribbon cable with cable exiting down.

3. Apply gasket to escutcheon:
  - a. Starting in one place, press the adhesive side of the gasket firmly against the escutcheon.
  - b. Work around the escutcheon, pressing the sticky side of the gasket firmly against the escutcheon edge.
  - c. The gasket should be aligned so that all edges of the escutcheon are covered.
4. Place the outside escutcheon against, while directing mounting posts through the door.

Gasket 82-0500

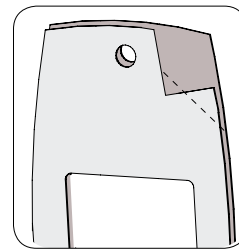


Fig. 8A

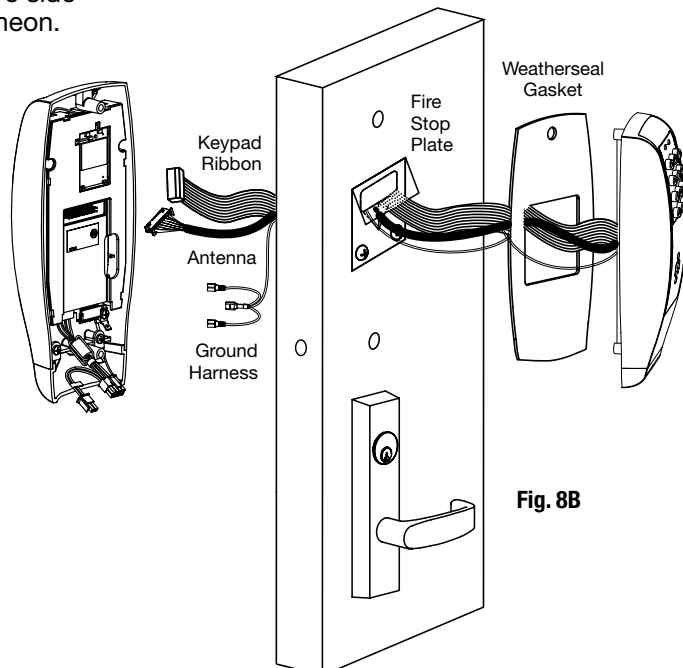


Fig. 8B

## Step #9 – Connect and Position Outside Escutcheon Wires

Images shown represent installation without gasket. If gasket is necessary, refer to Step #8.

Before the controller is attached to the door:

1. Attach the outside escutcheon reader assembly ribbon cable to the inside face of the controller assembly (side that faces towards the door when mounted (P1).
2. **iCLASS only:** Attach the antenna cable to the inside face of the controller assembly (P2).
3. Attach the ground harness to the bottom of the controller assembly (E1).

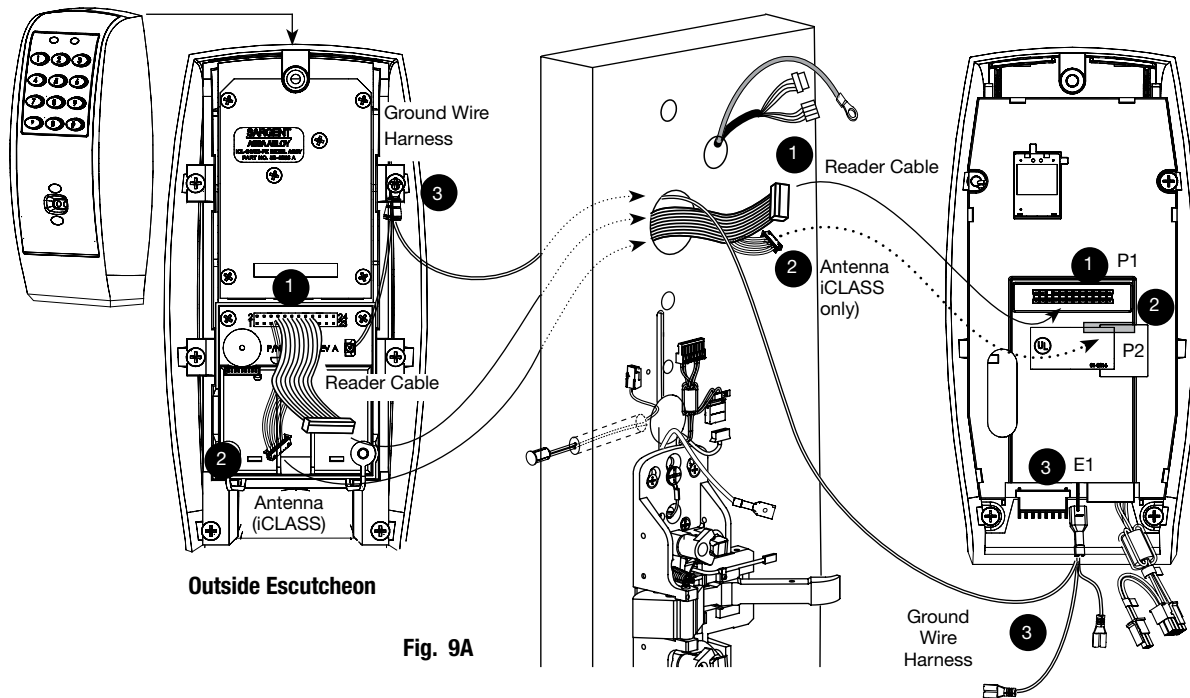


Fig. 9A

## Step #10 – Connect Ground Wire Harness

Attach the ground harness:

1. Attach one leg of the ground harness to bottom left screw of the controller assembly.
2. Attach the other leg of the ground harness to the spade connector that was routed through the top hole in the chassis in Step 3, #2 (Fig. 3B Detail).
3. There is an unused ground terminal attached to the harness from the chassis.

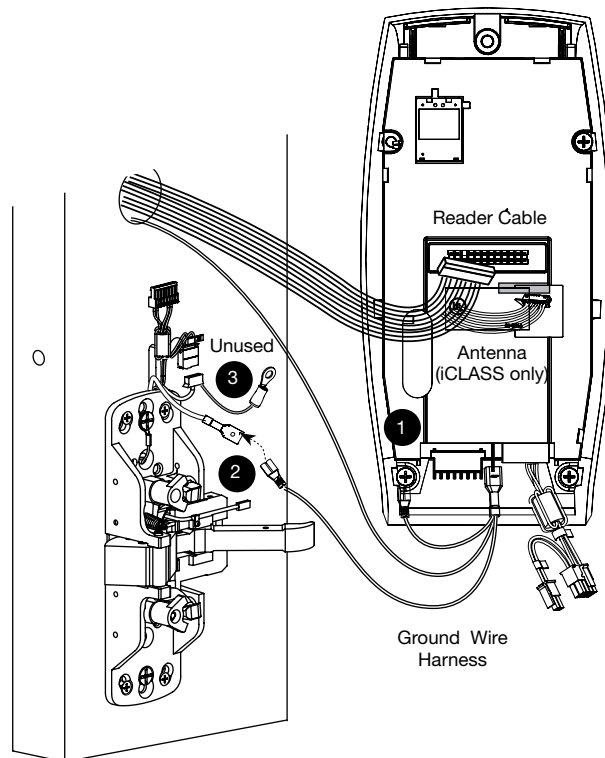


Fig. 10A

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### Step #11 – Additional Wiring Connections

Chassis, DPS and raceway wire connections:

1. Connect RX rail connector from ET to chassis harness.
2. Attach connector from ET to the controller assembly (TB1).  
Tuck ferrite bead under circuit board.
3. Connect DPS from switch to 2-pin connector of the harness connected to controller assembly (TB2).
4. Route the two connectors from the raceway over the controller assembly, through the gap between the plastic controller assembly and the escutcheon, to the front of the circuit board.

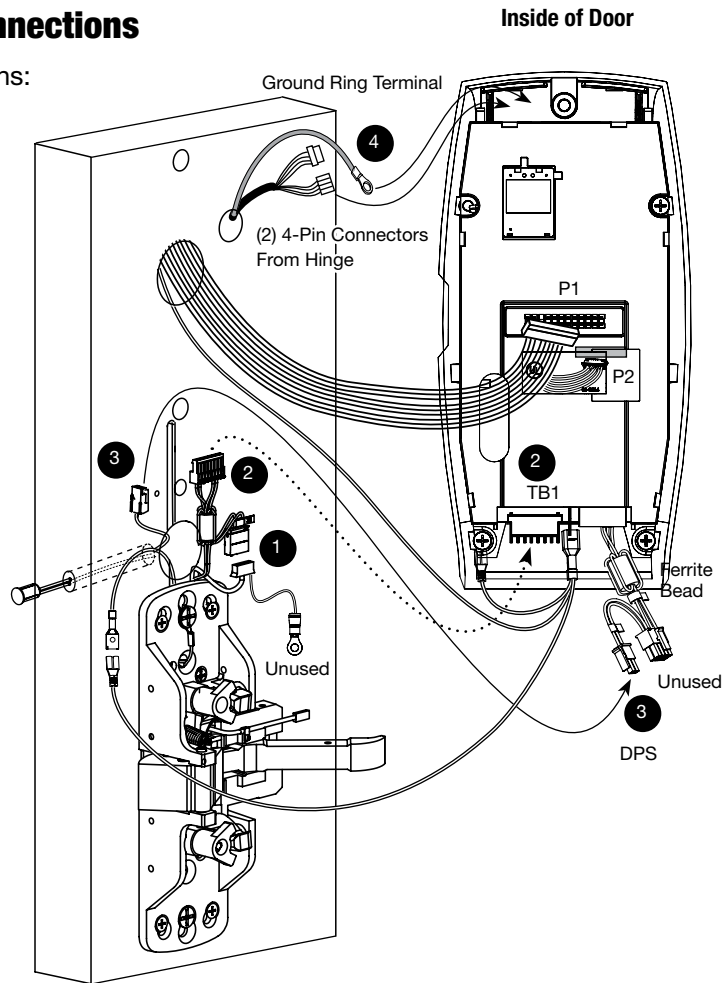


Fig. 11A

### Step #12 – Connect and Position Circuit Board Wires

Raceway cables and ground attach to front of circuit board.

Turn the escutcheon containing the controller assembly over:

1. Route the raceway connectors over the top of the controller assembly and plug into the front of the circuit board (side that faces out when mounted) (J7, J4; Fig. 12A).
2. Route the 2 ground ring terminals, one from the lock and the other from the hinge wiring, over the top of the controller assembly and connect both to the top escutcheon screw.

Note: Connectors go on only one way.

Do not offset connectors and make sure they are completely seated.

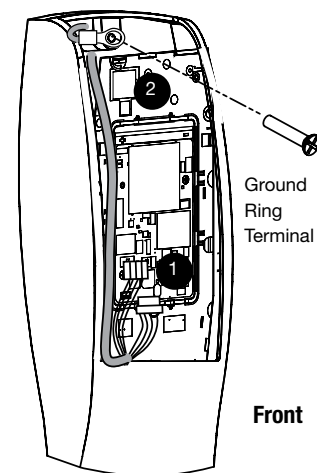


Fig. 12A

## Step #13 – Install Inside Escutcheon

1. Insert #8-32 x 1-1/4" screws through inside escutcheon and thread into outside escutcheon.  
Make sure the top of the screw routes through the ground ring terminal.
2. Tuck wires safely under space below controller assembly.
3. Straighten escutcheons and tighten securely (Fig. 13A).

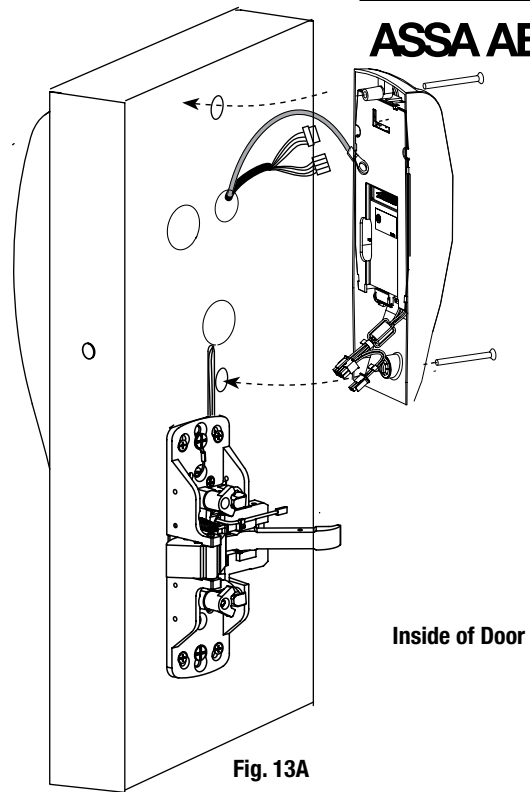


Fig. 13A

## Step #14 – Inside Escutcheon Cover

1. Attach cover to inside escutcheon, making sure to line up tabs with retaining slots in cover. Secure with the security screw and tool. (Fig. 14A and 14B).
2. Three-pin connector from chassis connects to rail.

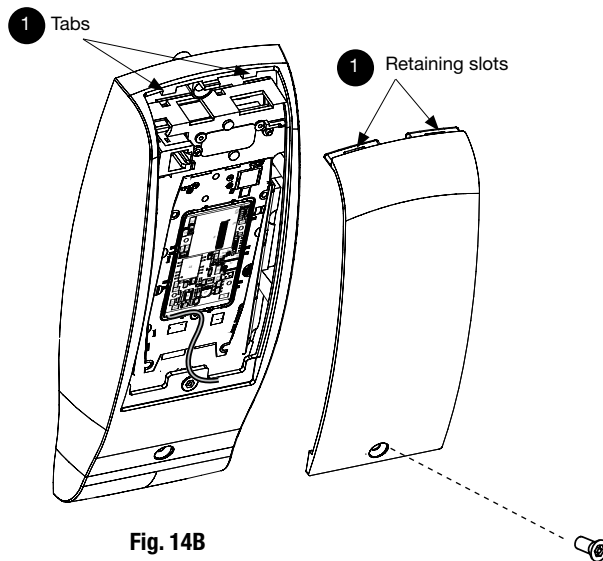


Fig. 14B

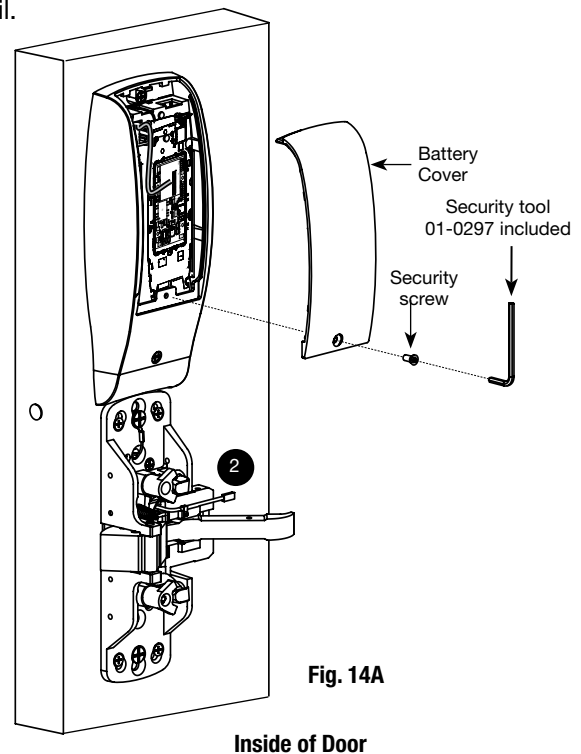


Fig. 14A

## Step #15 – Install Rail Assembly

Attach rail assembly according to Exit Installation Instructions A6770.



**For the Operational Check, Refer to Section 9**

### 9 Installation for Profile v.S1 With 8977/8978 Mortise Exit Device

#### Step #1 - Prepare Door

##### A. Verify Hand and Bevel of Door

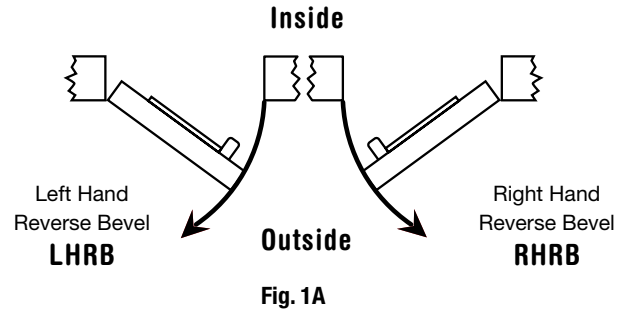
- Check handing of door - this device is not reversible
- Door should be fitted and hung
- Verify box label for size of exit device, function and handing

##### B. Door Preparation

Prep door using the following (available at [www.intelligentopenings.com](http://www.intelligentopenings.com)):

- Exit installation instructions A6705
- Field Template A7790
- Door Manufacturer's Template 4641 (Metal & Wood).

Note: Wood door has additional cutout if installation includes a cylinder.

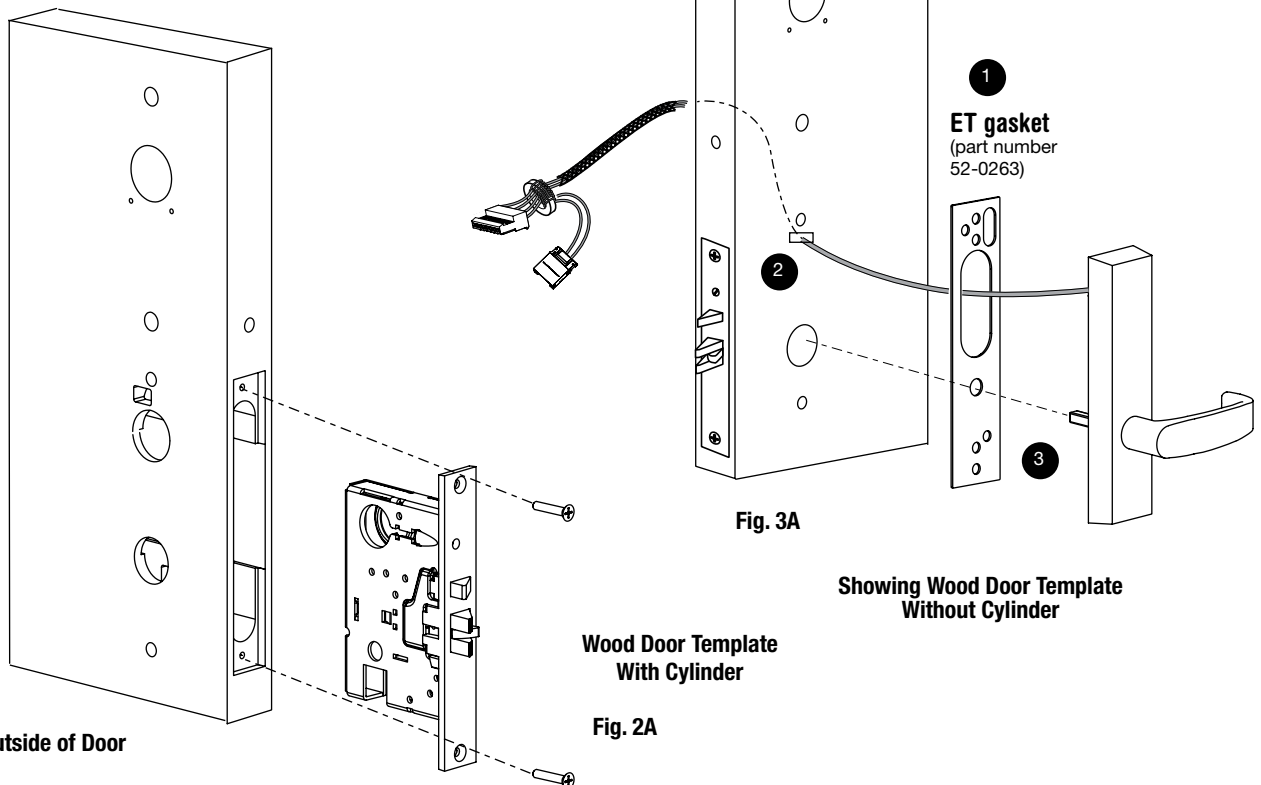


#### Step #2 - Install Mortise Lock

Slide mortise lock into door and securely fasten with (2) flat head screws (Fig. 2A).

#### Step #3 - Position Exit Trim

1. For exterior applications, use ET gasket (52-0263) to seal between ET escutcheon and outside door surface (Fig. 3A).
2. Route ET harness through square wire cutout and out other side of door.
3. Place ET control on door with spindle inserted through mortise lock (Fig. 3A).



# Profile Series v.S1 PoE Exit Device

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## Step #4 – Secure Inside Trim and Chassis

1. Route ET harness through wire route slot for wood doors (Fig. 4A) and access hole for metal doors (not shown).

Note: Make sure no wires are pinched.

2. Before securing chassis, connect ground wire harness:

- a. Spade connector of ground ring terminal wire fits through the hole (beneath the top screw) in the chassis and connects to lug on ground harness (Fig. 4B Detail).

- b. Route the ground ring terminal and secure through the top center hole with the top 1/4-20 x 2-3/8" flat head machine screw (Fig. 4B Detail).

3. Engage ET spindle in the hub of exit device chassis.
4. Secure chassis and ET with (2) 1/4-20 x 2-3/8" flat head machine screws.
5. Connect ET harness and connector from chassis (Fig. 4C).

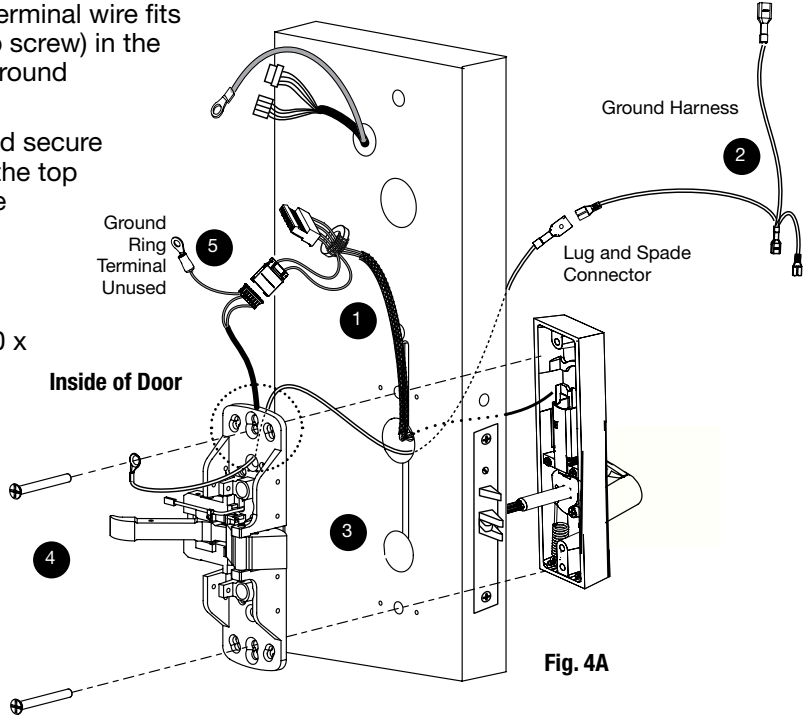


Fig. 4A

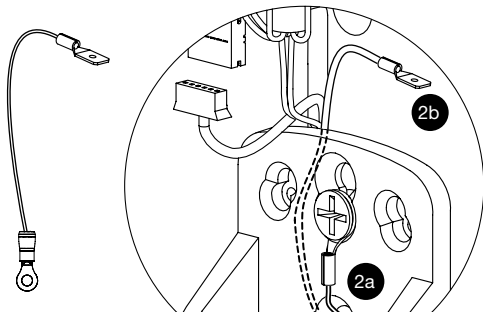


Fig. 4B Detail

Route wires under exits chassis, and out wire route slot

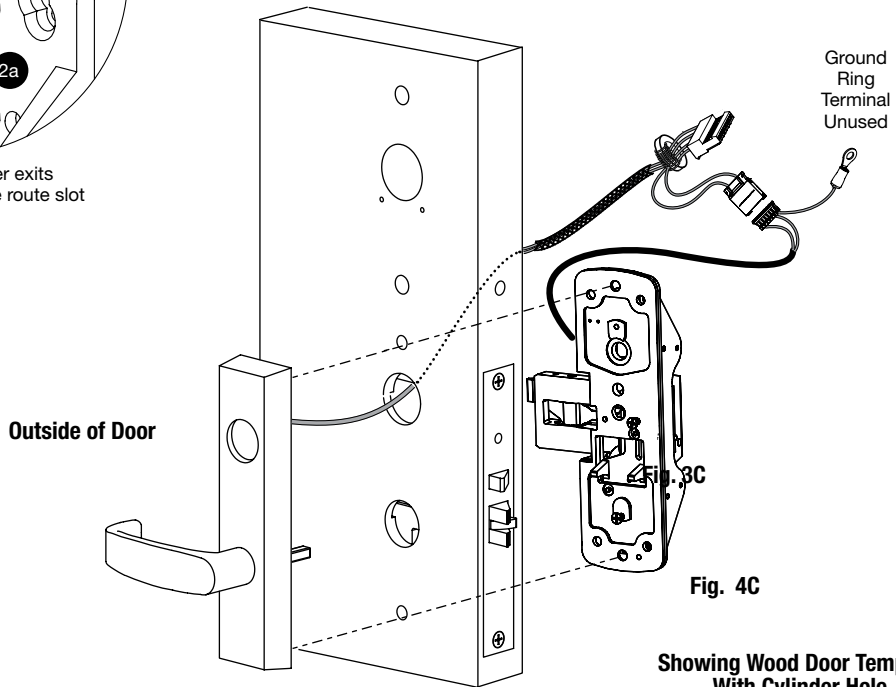


Fig. 4C

Showing Wood Door Template With Cylinder Hole

### Step #5 - Install Exit Chassis

1. Route ET harness through wire run channel for wood doors (Fig. 5A) and through access hole for metal doors (not shown).
2. Mount exit chassis carefully. Do not pinch harness wires.
3. Position exit chassis on door with lever arm under rear section of mortise lock (Fig. 5B).
4. Secure chassis and ET with (2) 1/4-20 x 2-3/8" flat head machine screws (Fig. 5C).

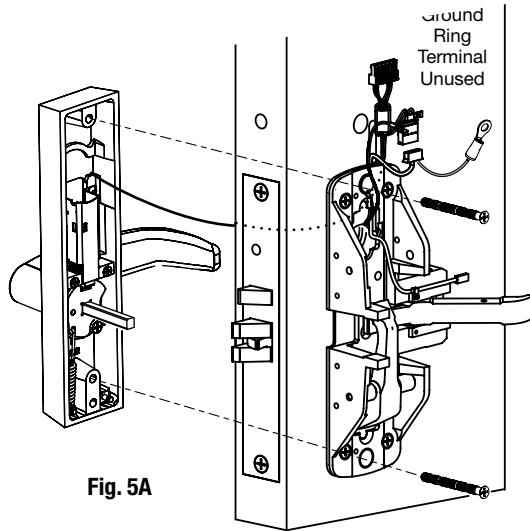


Fig. 5A

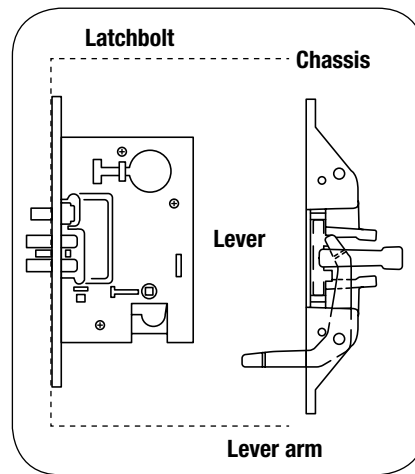


Fig. 5B

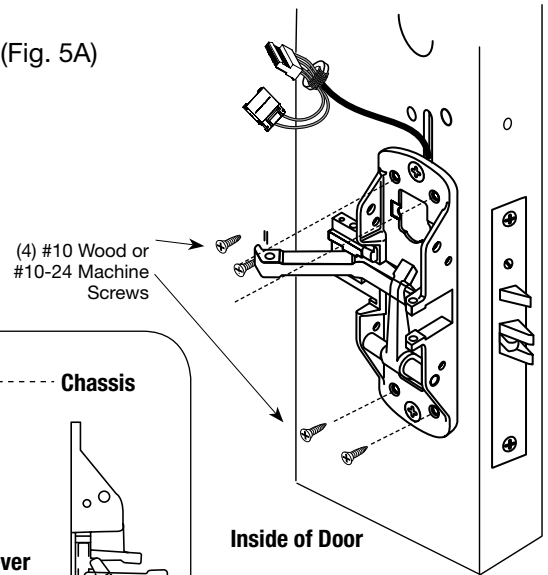


Fig. 5B

### Step #6 - Install Cylinder

For devices without cylinders, skip this section.

1. Verify orientation of cylinder (Fig. 6A).
2. Slide cylinder through ET trim and thread into the lockbody, rotating the cylinder clockwise.  
Cylinder should rest flush on ET case.
3. Tighten the cylinder clamp screw using #2 Phillips screwdriver to prevent the cylinder from unscrewing (Fig. 6B).
4. Test cylinder function:  
For 77 Function, that the key retracts latch.

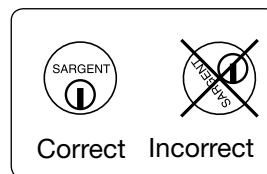


Fig. 6A

Outside of Door

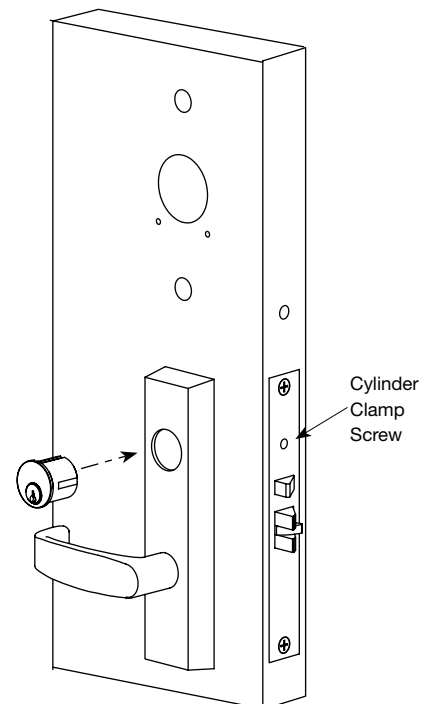


Fig. 6B

## Step #7 – Door Options

### A. Fire Stop Plate (P/N 52-0033)

Fire-rated doors require a fire stop plate on the outside of the door (Fig.7A).

1. If not present, drill (2) 1/8" x 1-1/4" deep holes in the door.

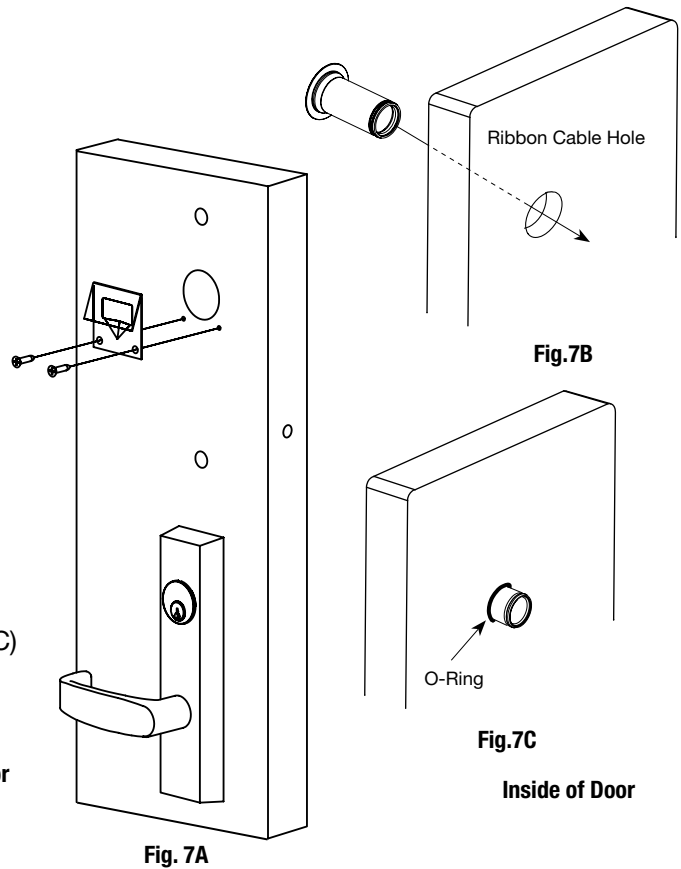
Refer to template for fire-stop prep locations.

2. Attach fire stop plate with flap up and out using (2) #8 x 1/2" self-tapping screws for wood and metal doors.

### B. Weather Conduit (52-2847)

Install weather conduit on **NON FIRE-RATED** exterior doors only (Fig. 7B).

1. Carefully insert the weather conduit into the ribbon cable hole on the inside of the door.
2. Place the O-ring around the weather conduit on the outside and up against the door (Fig. 7C)



## Step #8 – Install Door Position Switch (DPS)

If it isn't installed, install the door position switch:

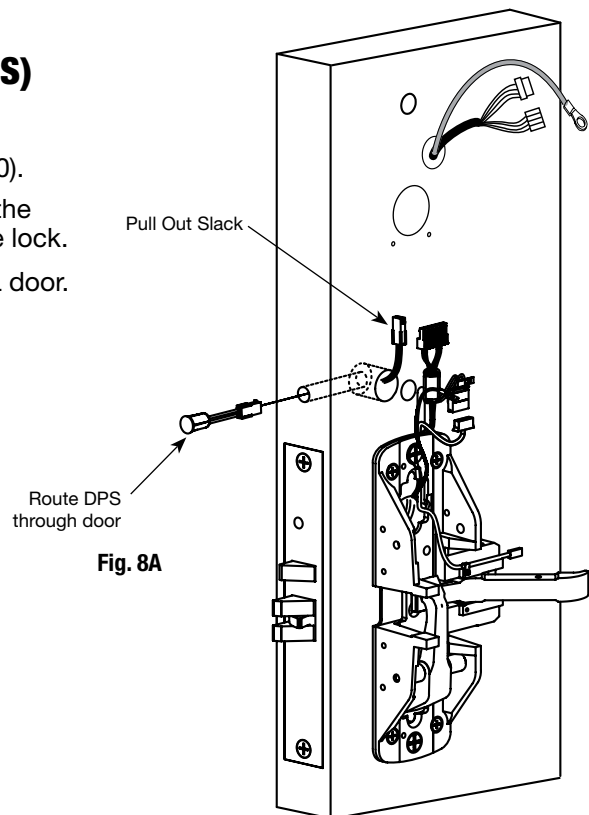
1. Prepare door according to proper template (A7990).
2. Insert DPS into the raceway on the latch edge of the door by pushing wires down raceway towards the lock.

Note: Use collar ONLY when installing in a METAL door.

3. Push DPS firmly in place by hand.
4. Connect DPS to adapter that plugs into TB2.

Note: DO NOT TAP SWITCH WITH ANY TOOL.

Refer to diagrams in the wiring steps, beginning with Step #10.



### Step #9 – Attach Gasket and Install Outside Escutcheon

For exterior applications, use a gasket (part number 82-0500) between escutcheon and outside door surface.

To apply weatherseal gasket:

1. Carefully remove the backing from the gasket (Fig. 9A).
- 2A. **For 12- fire rated devices:** Feed keypad ribbon cable/connector from outside of door through gasket and fire stop plate.
- 2B. **For non-12- exit devices:** Feed keypad ribbon cable/connector through the gasket and then through the conduit hole in door.

Note: Install ribbon cable with cable exiting down.

3. Apply gasket to escutcheon:
  - a. Starting in one place, press the adhesive side of the gasket firmly against the escutcheon.
  - b. Work around the escutcheon, pressing the sticky side of the gasket firmly against the escutcheon edge.
  - c. The gasket should be aligned so that all edges of the escutcheon are covered.
4. Place the outside escutcheon against, while directing mounting posts through the door.

Gasket 82-0500

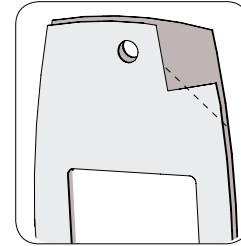


Fig. 9A

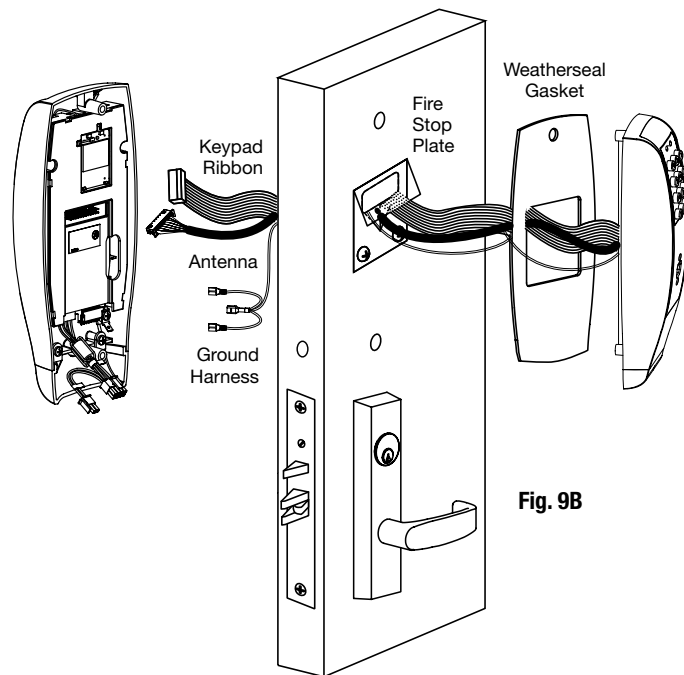


Fig. 9B

## Step #10 – Connect and Position Outside Escutcheon Wires

Images shown represent installation without gasket. If gasket is necessary, refer to Step #9.

Before the controller is attached to the door:

1. Attach the reader assembly ribbon cable to the inside face of the controller assembly (side that faces towards the door when mounted (P1).
2. Attach the antenna cable to the inside face of the controller assembly (P2).
3. Attach the ground harness to the bottom of the controller assembly (E1).

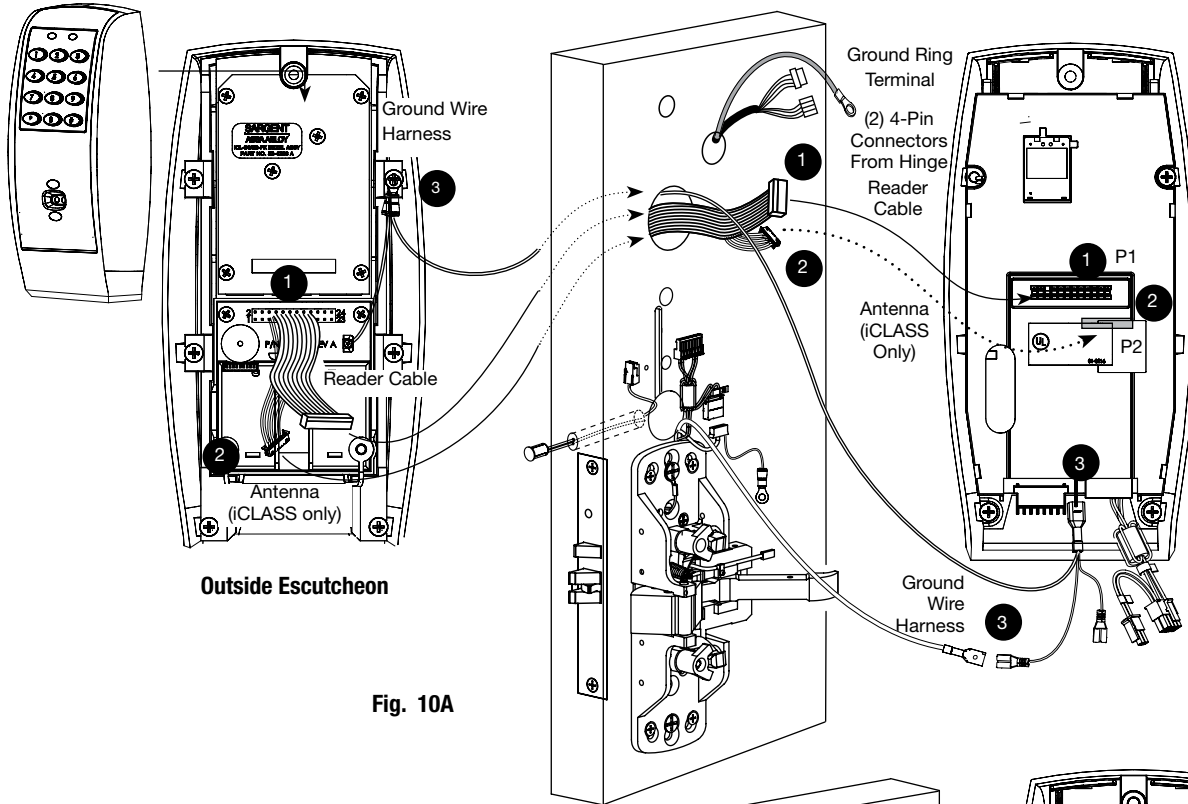


Fig. 10A

## Step #11 – Connect Ground Wire Harness

Attach the ground harness:

1. Attach one leg of the ground harness to bottom left screw of the controller assembly.
2. Attach the other leg of the ground harness to the spade connector that was routed through the top hole in the chassis in Step 4, #2 (Fig 4B Detail).
3. There is an unused ground terminal attached to the harness from the chassis.

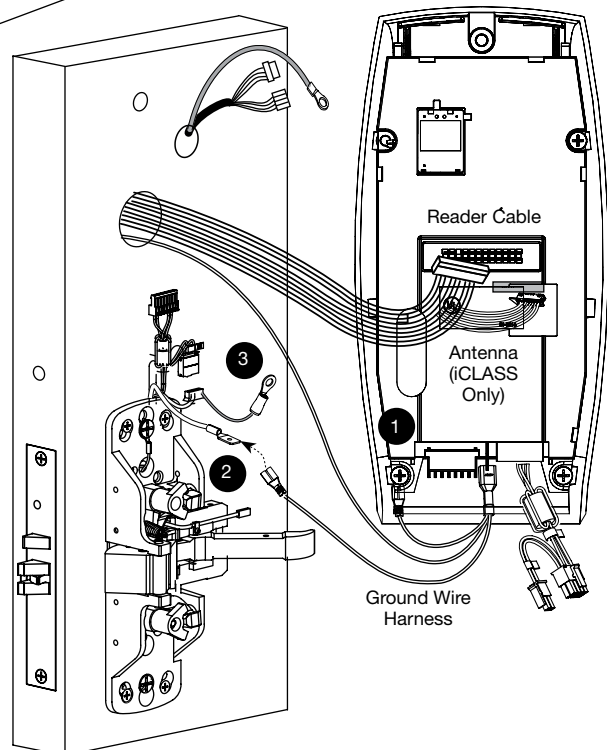


Fig. 11A

### Step #12 – Additional Chassis Wiring Connections

Chassis, DPS and raceway wire connections:

1. Connect RX rail connector from ET to chassis harness.
2. Attach connector from ET to the controller assembly (TB1).  
Tuck ferrite bead under circuit board.
3. Connect DPS from switch to 2-pin connector of the harness connected to controller assembly (TB2).
4. Push the two connectors from the raceway over the controller assembly, through the gap between the plastic controller assembly and the escutcheon, to the front of the circuit board.
5. Three-pin connector from chassis connects to rail.

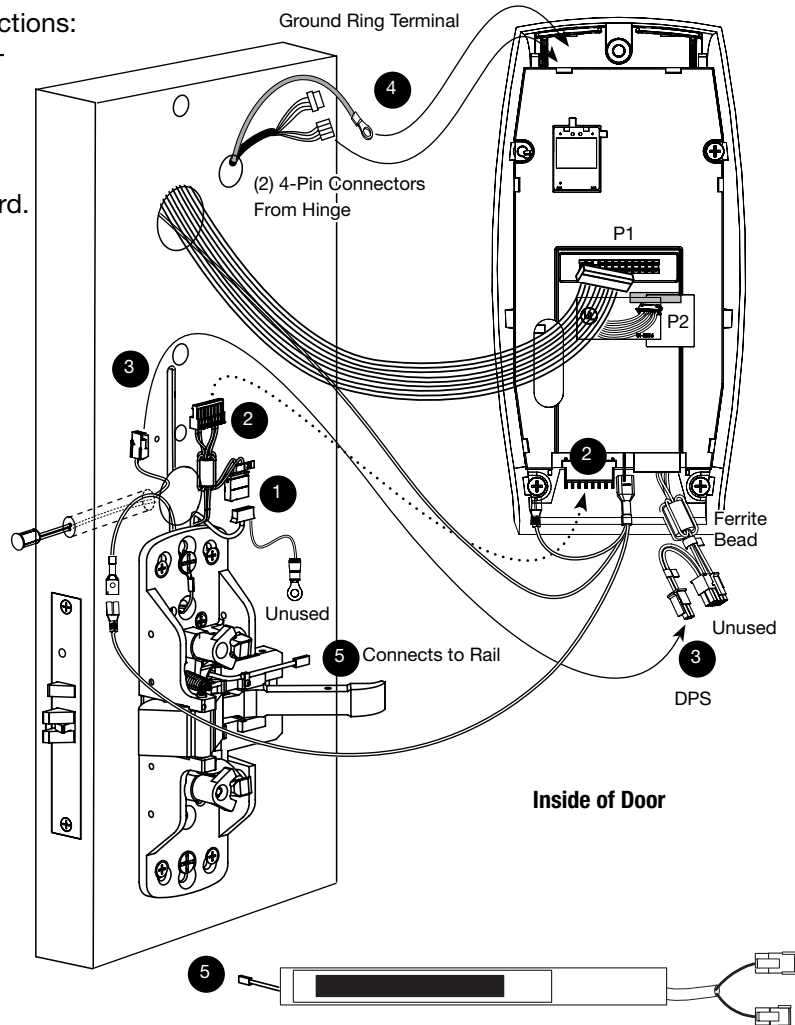


Fig. 12A

### Step #13 – Connect and Position Circuit Board Wires

Raceway cables and ground attach to front of circuit board.

Turn the controller assembly over:

1. Route the raceway connectors over the top of the controller assembly and plug into the front of the circuit board (side that faces out when mounted (J7, J4; Fig. 13A).
2. Route the 2 ground ring terminals, one from the lock and the other from the hinge wiring, over the top of the controller assembly and connect both to the top escutcheon screw.

Note: Connectors go on only one way.

Do not offset connectors and make sure they are completely seated.

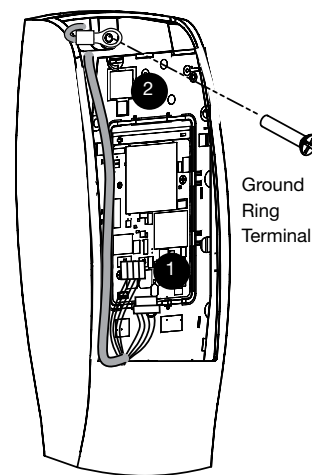


Fig. 13A

Front

## Step #14 – Install Inside Escutcheon

1. Place chassis cover over chassis.
2. Fasten with side screws from chassis screw pack.
3. Insert #8-32 x 1-1/4" screws through inside escutcheon and thread into outside escutcheon.
4. Straighten escutcheons and tighten securely (Fig. 14A).

Inside of Door

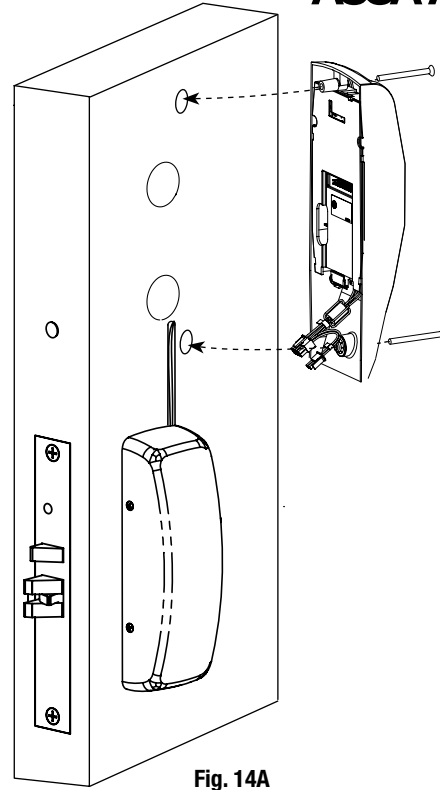


Fig. 14A

## Step #15 – Inside Escutcheon

Attach cover to inside escutcheon making sure to line up tabs with retaining slots in cover. Secure with the security screw and tool. (Fig. 15A and 15B).

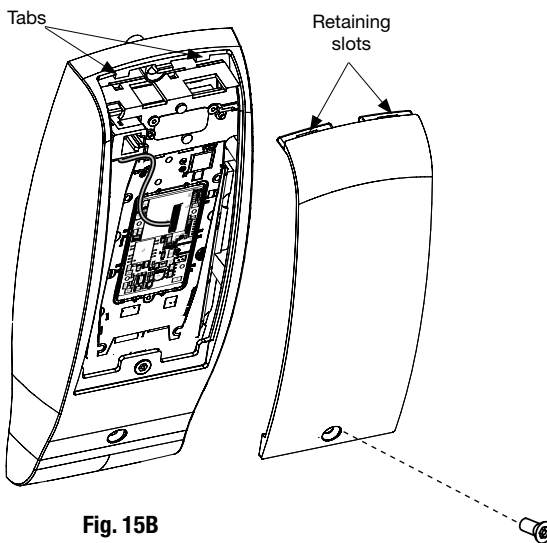


Fig. 15B

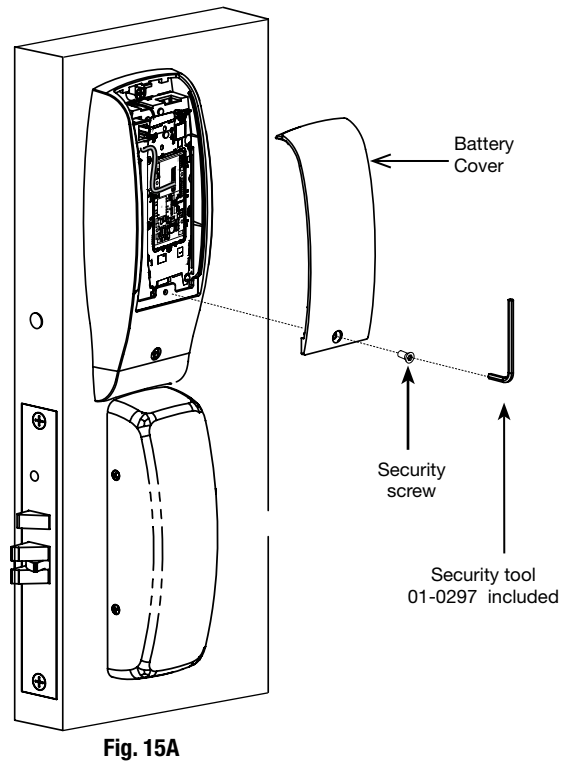


Fig. 15A

## Step #16 – Install Rail Assembly

Attach rail assembly according to exit installation instructions A6770.

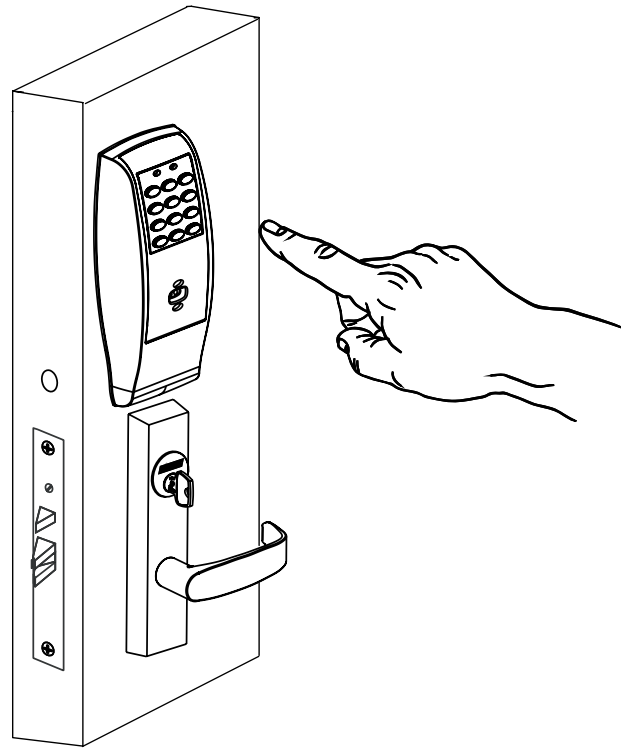
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### 10 Operational Check

1. For devices without cylinders, go to number 3.
2. For devices with cylinders, insert key into cylinder and rotate.  
The key should retract the latch and rotate freely.
3. Depress inside rail to retract latch.
4. Use a prox 125 kHz or 13.56 MHz iCLASS credential, or keypad PIN code set up with the **Network and Lock Configuration Tool** to unlock outside lever and retract latch.

Refer to **Network Lock and Configuration Tool** user manual (**WFMN1D**) for information on how to configure and program v.S1 locks.



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