Access 600™ | RNE1

Installation Instructions
CL33600 TCRNE1 Series
M802 125kHz Reader Option
Cylindrical Lockset

Corbin Russwin
ASSA ABLOY

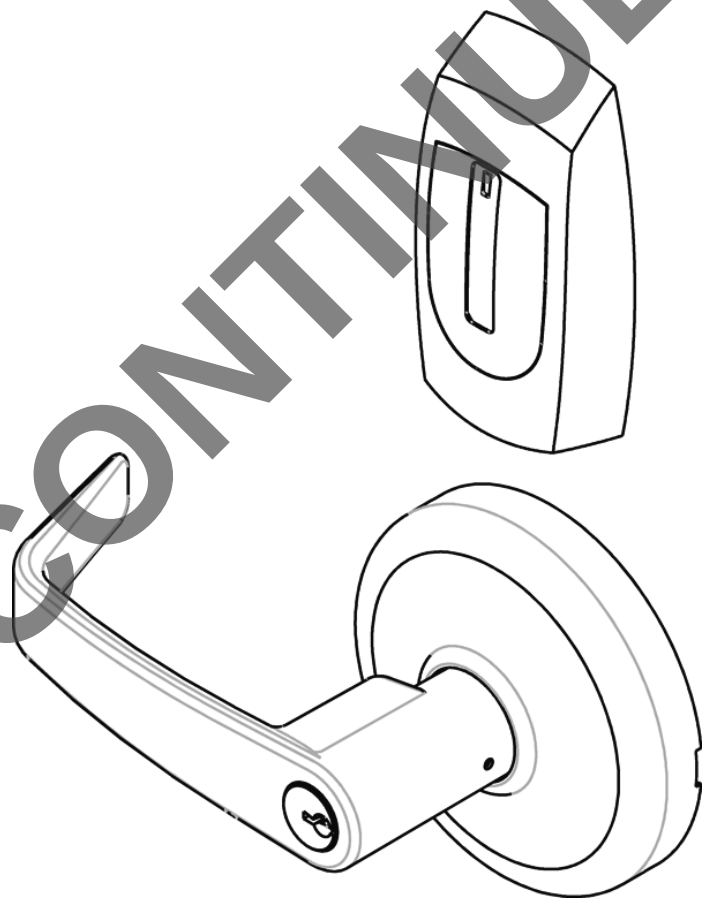
FM290 10/18

Attention Installer

Please read these instructions carefully to prevent missing important steps.

Please Note: Improper installations may result in damage to the lock and void the factory warranty.

Important: The accuracy of the door preparation is critical for proper functioning and security of this lock. Misalignment can cause premature wear and a lessening of security.



⚠ WARNING
This product can expose you to lead which is known to the state of California to cause cancer and birth defects or other reproductive harm. For more information go to www.P65warnings.ca.gov.

08/2018

For Technical Assistance call Corbin Russwin at 1-800-810-WIRE (9473)

Table of Contents

1) Warning

Warning: Changes or modifications to this unit not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

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.

Note: 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 the 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 or more 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 TV technician for help

This Class B digital apparatus complies with Canadian ICES-003.

Cet appareil numérique de la classe B est conforme avec la norme NMB-003 du Canada.

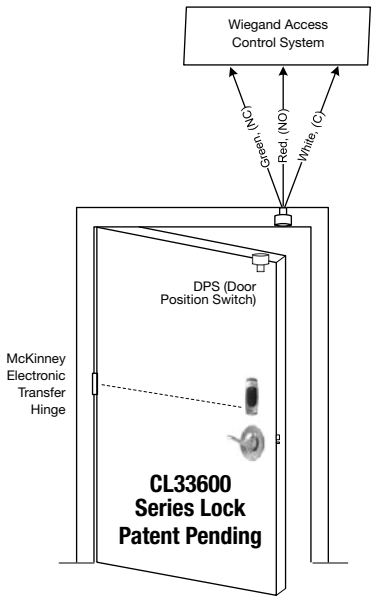
Observe precautions for handling electrostatic sensitive devices.

2) General Description

The Corbin Russwin Access 600 TCRNE1 Series cylindrical lock is designed to interface with existing Wiegand Electrical Access Control (EAC) panels. The reader requires 12VDC for power and is available with 125kHz HID proximity technology. The Access 600 technology is designed around Corbin Russwin's Grade 1 hardware. The cylindrical lock comes with complete inside REX (request to exit) monitoring and is available in 12VDC or 24VDC (Requires External DPS – Door Position Switch). Weather seal gaskets are also included for outdoor applications. The Access 600 reader provides visual (LED) and audible indication of lock state (locked/unlocked).

3) Features

- Latch: Stainless steel, ½" (13mm) throw
  Optional: 3/4" (19mm) throw deadlocking fire latch for pairs of doors
- Deadlocking latch prevents manipulation when door closed
- Door thickness: 1-3/4" (44mm) to 2" (50mm) standard
  2" (50mm) to 2-1/4" (57mm) optional
- Outside lever controlled by reader or key retracts latch
- Inside lever produces REX (request to exit) signal
- Fail safe or fail secure operation (must specify)
- UL fire listed
- Wire from EAC panel to door must be shielded with a drain. Drain terminated at EAC panel controller
- Complete monitoring of door (external DPS supplied)
- Wires directly to EAC panels
- Accepts all HID 125kHz bit formats
- QC12 Hinge with ElectroLynx plug and play



4) Regulatory Specifications

12VDC System

- Reader Draw = 125mA (maximum)
- 12VDC Solenoid Draw =250mA (normal state)
- Total System Draw = 375mA

24VDC System

- Reader Draw = 125mA (maximum)
- 24VDC Solenoid Draw = 150mA (normal state)
- Total System Draw = 275mA

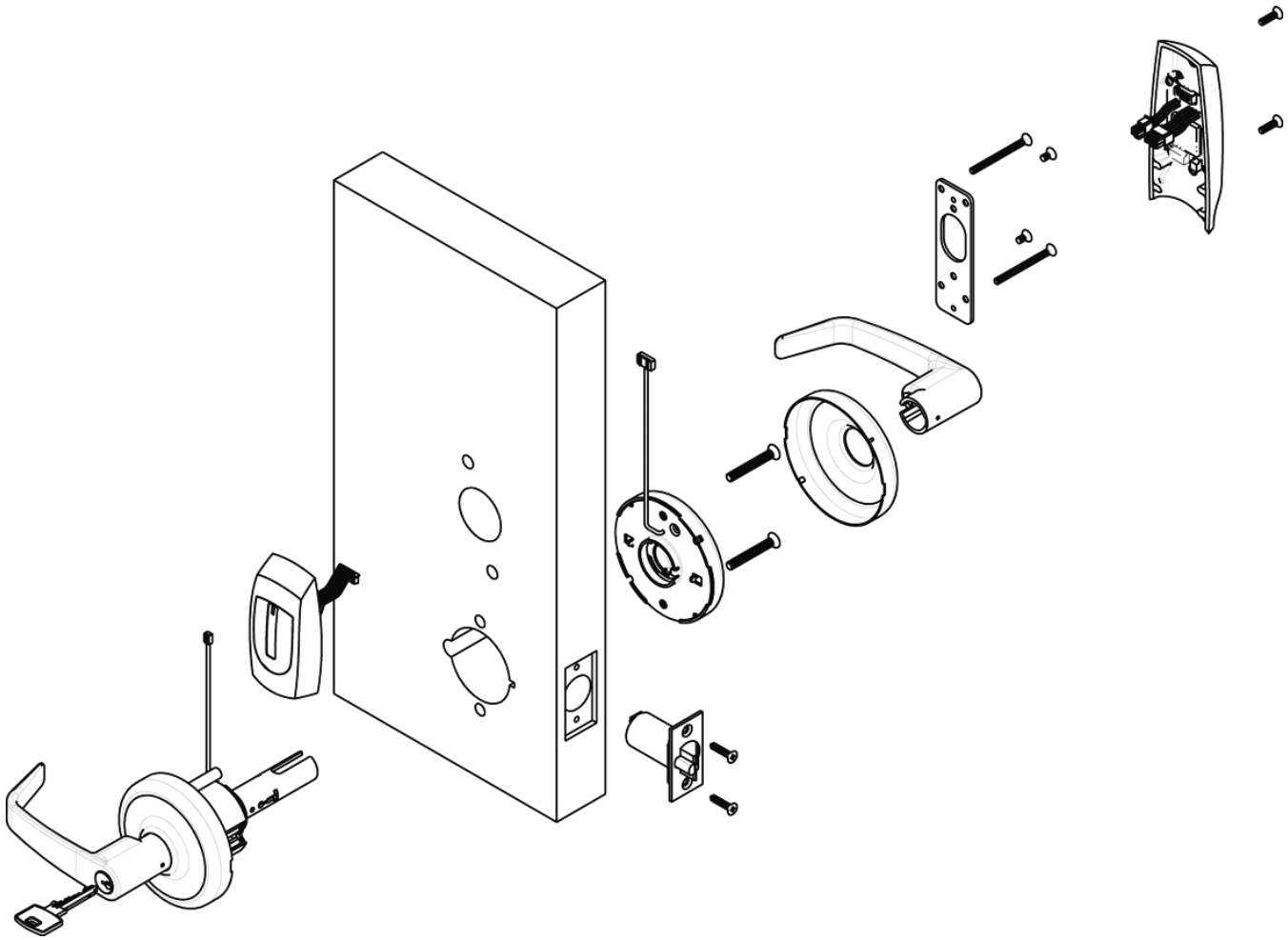
- **UL 294 Access Control Performance Ratings:**

Destructive Attack	Level I
Line Security	Level I
Endurance	Level IV
Standby Power	Level I

- ANSI/BHMA A156.25 Listed Grade 1 Compliant
- UL and CUL listed for use on Fire Doors
- This product meets the requirements of CAN/ULC-S319-05 Equipment Class I

Wiring methods shall be in accordance with the National Electrical Code (ANSI/NFPA70), CSA 22.1, Canadian Electrical Code (CEC), Part I, Safety Standard for Electrical Installations, local codes, and the authorities having jurisdiction.

4) Product Illustration



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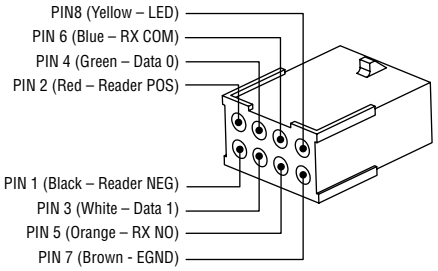
2			1

6) Wiring Diagrams

Product	8 PIN CONNECTION								4 PIN CONNECTOR			
	1-Black	2-Red	3-White	4-Green	5-Orange	6-Blue	7-Brown	8-Yellow	9-Violet	10-Gray	11-Pink	12-Tan
ACCESS CONTROL DEVICES: ML20600 x M802, ElectroLynx wire Color / Function assignments												
	12VDC Reader Power		WIE-GAND	WIE-GAND	RX (NO)	RX (COM)	EGND	LED	12 OR 24 VDC (LOCK RELAY		DPS (NC)	DPS (COM)
Corbin Russwin Access 600 ML20600 x M802	NEG	POS	DATA_1	DATA_0	RX	RX	EGND	REF. DIA-GRAMS	NEG	POS	DPS	DPS

Reader LED Configuration

The Access 600 Series reader can be configured for (3) modes of LED operation. Call 1-800-810-WIRE for details.



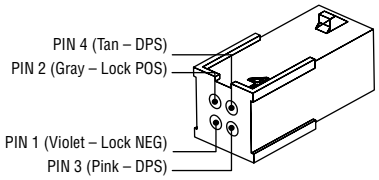
Mode 1:

- Red LED 'ON' when powered.
- Presenting a valid credential causes LED to 'FLICKER' green and return to red state.

Mode 2:

- Green LED "ON" when powered.
- No Flicker after presenting valid valid credential.

Note: LED wire must be connected to circuit GROUND of the system's power supply.



Mode 3:

- EAC Panel controls LED operation.

Note: Control of LED is a function of the EAC panel equipment (i.e. relay) to toggle between green and red.

Note: When LED wire is tied directly into EAC panel relay, no AC signals should be applied on wire or door reader performance will be impacted.

Wire from EAC panel to door must be shielded with drain terminated at EAC panel controller

Wire Gauge Charts

Total One-Way Length of Wire Run (ft)	Load Current @ 12VDC							
	1/4A	1/2A	3/4A	1A	1-1/4A	1-1/2A	2A	3A
100	20	18	16	14	14	12	12	10
150	18	16	14	12	12	12	10	—
200	16	14	12	12	10	10	—	—
250	16	14	12	10	10	10	—	—
300	16	12	12	10	10	—	—	—
400	14	12	10	—	—	—	—	—
500	14	10	10	—	—	—	—	—
750	12	10	—	—	—	—	—	—
1,000	10	—	—	—	—	—	—	—
1,500	10	—	—	—	—	—	—	—

Total One-Way Length of Wire Run (ft)	Load Current @ 24VDC							
	1/4A	1/2A	3/4A	1A	1-1/4A	1-1/2A	2A	3A
100	24	20	18	18	16	16	14	12
150	22	18	16	16	14	14	12	10
200	20	18	16	14	14	12	12	10
250	18	16	14	14	12	12	12	10
300	18	16	14	12	12	12	10	—
400	18	14	12	12	10	10	—	—
500	16	14	12	10	10	—	—	—
750	14	12	10	10	—	—	—	—
1,000	14	10	10	—	—	—	—	—
1,500	12	10	—	—	—	—	—	—

6) Wiring Diagrams

Typlcal CL33600 X M802 Series Lock Application Diagram (12/24VDC Lock)

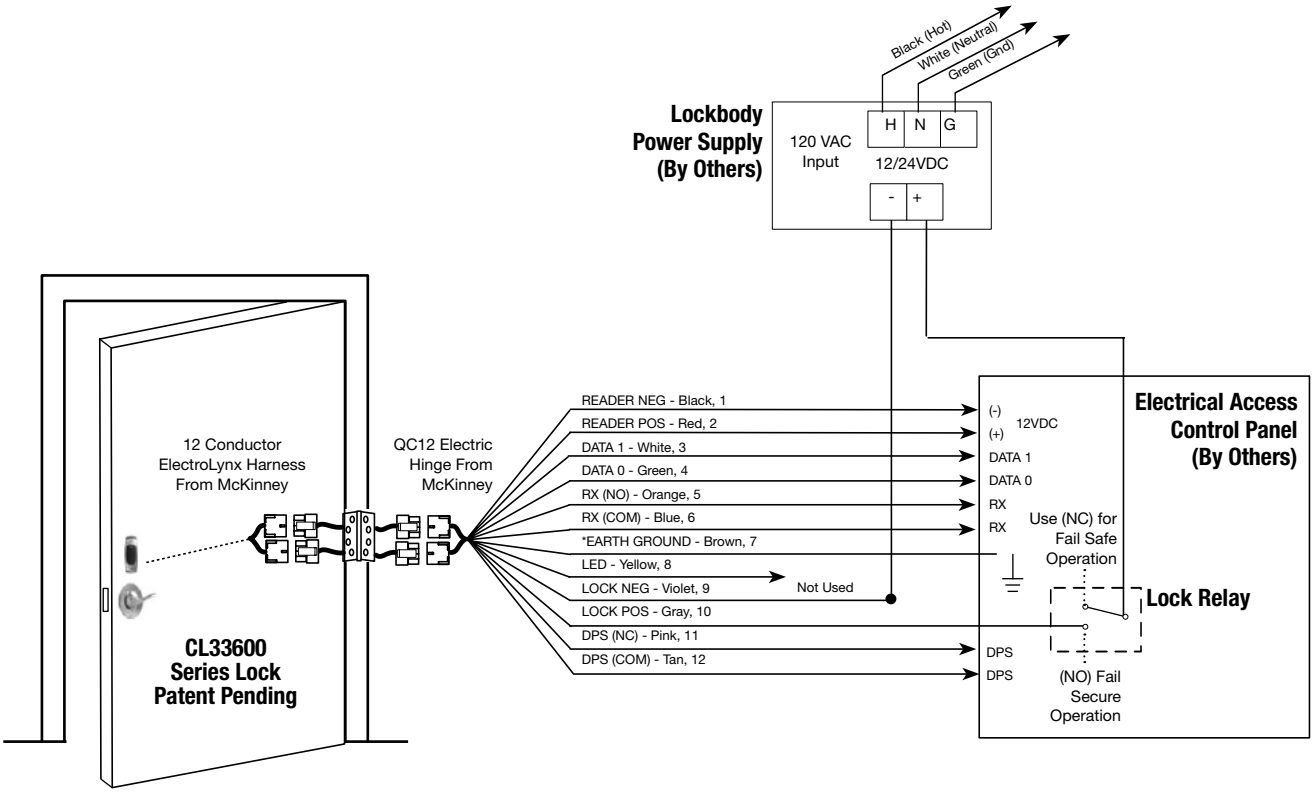
MODE 1: LED WIRE NOT USED = RED LED ON WHEN POWERED

Standard Application Shown - For Alternative Applications Contact 1-800-810-WIRE (9473)

- Reader Electronics Requires 12VDC Filtered and Regulated -

12VDC System with 12VDC Solenoid
Reader Draw = 150mA
12VDC Solenoid Draw = 250mA
Total System Draw = 400mA

12VDC System with 24VDC Solenoid
Reader Draw = 150mA
24VDC Solenoid Draw = 150mA
Total System Draw = 300mA

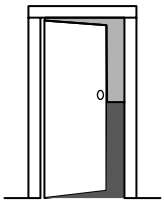


*IMPORTANT: Pin 7 must be tied to earth ground in the access control panel.

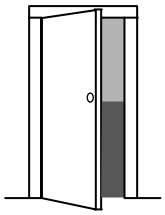
Failure to follow proper ESD safe grounding procedures could lead to equipment failure.

5) Installation Instructions

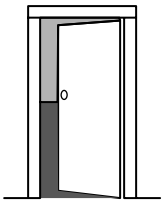
1. Verify Hand and Bevel of door. Illustrations shown are as viewed from the outside or secure side of opening.



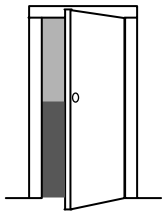
Left Hand
Hinges Left.
Open Inward.
"LH"



Left Hand
Reverse Bevel
Hinges Left.
Open Outward
"LHRB"

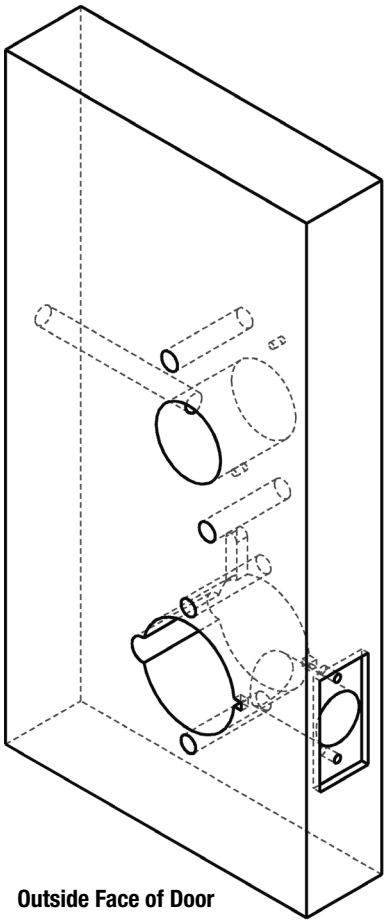


Right Hand
Hinges Right.
Open Inward.
"RH"

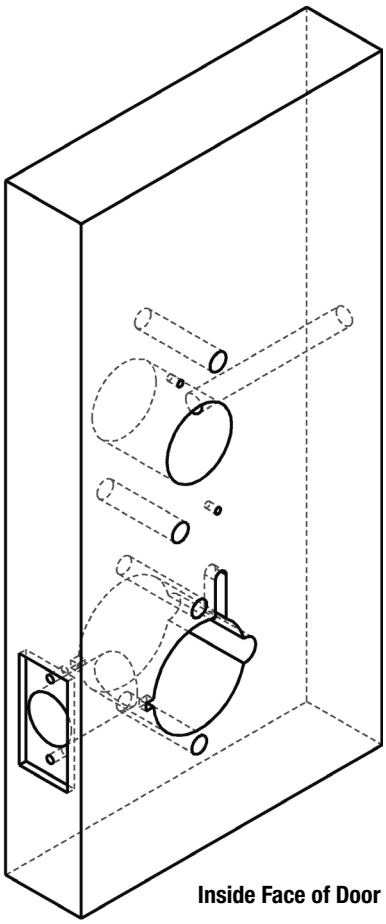


Right Hand
Reverse Bevel
Hinges Right.
Open Outward
"RHRB"

2. Prep door according to supplied door marker (FM291). For door manufacture templates visit www.corbinrusswin.com and reference template # T31071.



Outside Face of Door



Inside Face of Door

5) Installation Instructions (Continued)

3. Install Latch Bolt with beveled bolt facing the strike using two #8 x 3/4” combination screws:

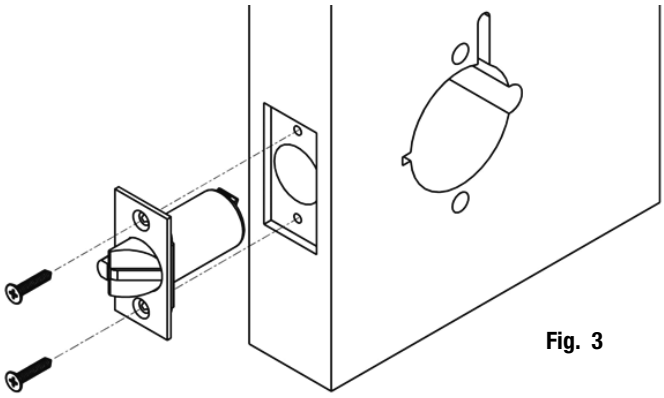


Fig. 3

4. Install Latch Bolt with beveled bolt facing the strike using two #8 x 3/4” combination screws:

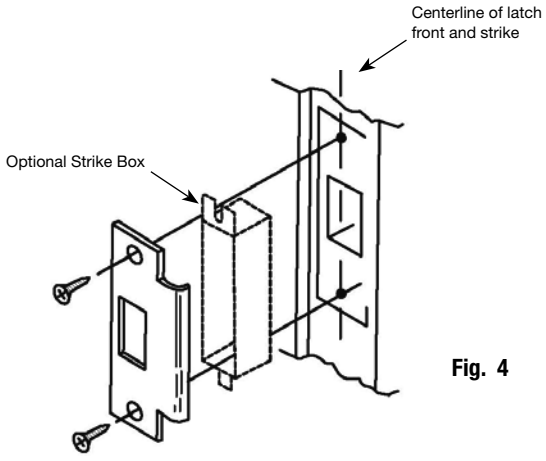


Fig. 4

5) Installation Instructions (Continued)

5. Install Lock:

Feed lock body and wire through 2-1/8” diameter hole from outside of door.
Be sure latch engages lock body as shown (Fig. 5).

IMPORTANT: Door must remain open during installation. Use door stop.

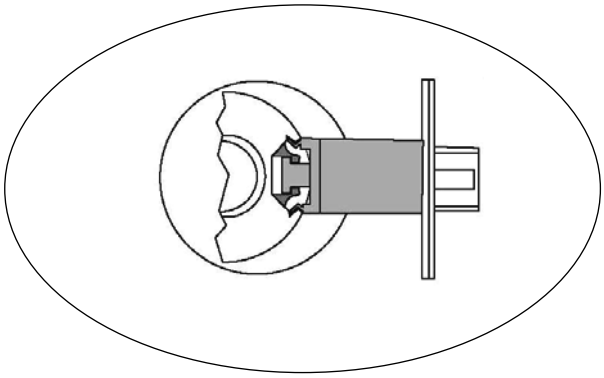


Fig. 5a Detail

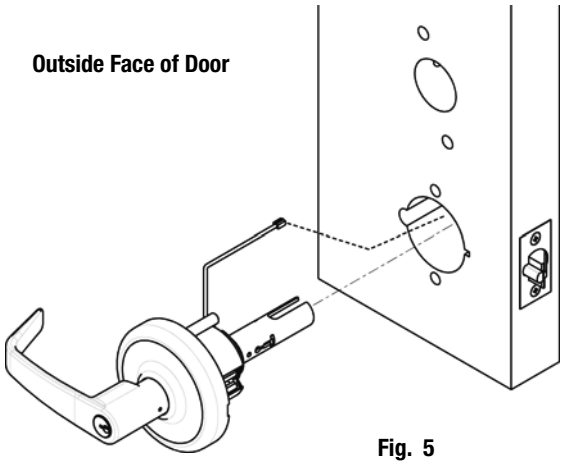


Fig. 5

6. Install Inside Spring Cassette:

a. Feed lock body wires and cassette (REX) wires in slot on face of door (Fig. 6a)

Note: Be careful to keep wires in slot cut into door.

b. Tightening using two #12-24 screws.

Note: DO NOT PINCH wires when tightening.

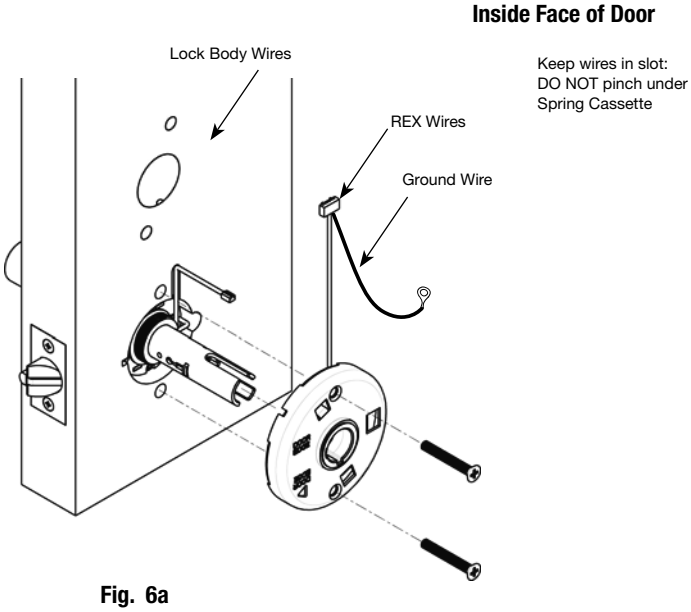


Fig. 6a

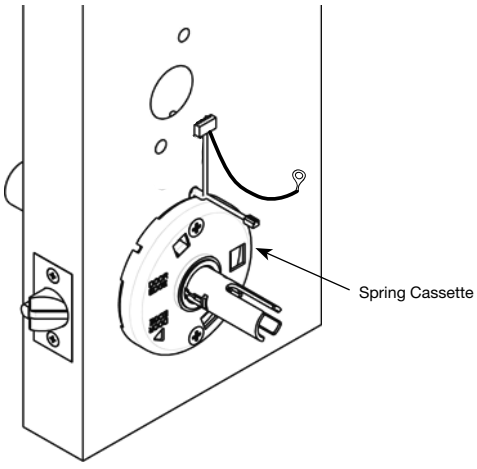


Fig. 6b

5) Installation Instructions (Continued)

7. Installation and Removal of Lever and Standard Cylinder:

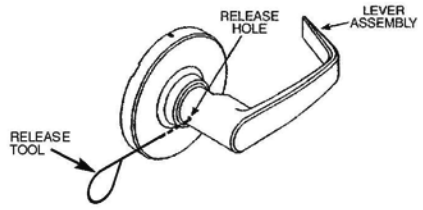
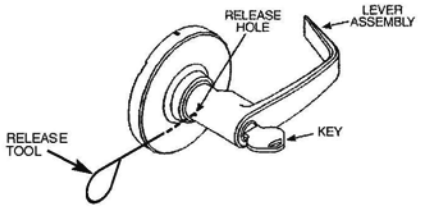
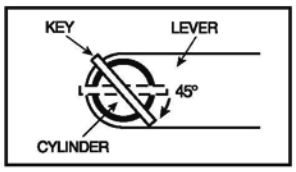
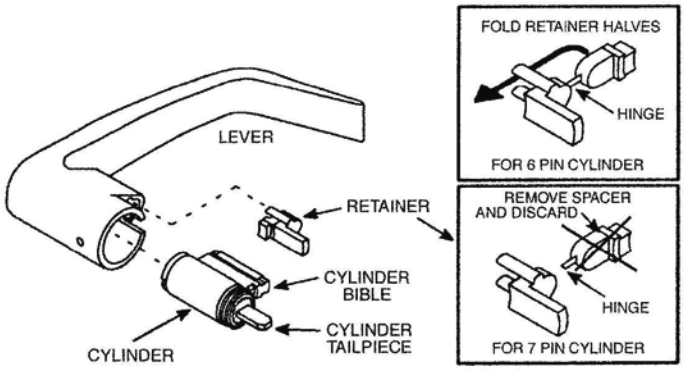
LEVER STYLE	REMOVAL	INSTALL
PLAIN LEVER 	**PUSH RELEASE TOOL** Push release tool Into release hole, Remove lever	**SLIDE LEVER OVER** Slide lever over Lever catch Pull on lever. *Make sure lever will not pull off*
CYLINDER LEVER 	**ROTATE KEY** Rotate key 45° clockwise (from shed position), Push in release tool into Release hole, remove lever 	**INSERT KEY AND ROTATE** Insert key and rotate 45° (from Shed position), slide lever on *Make sure lever will not pull off*

Fig. 7a

Install Standard Cylinder

Make sure cylinder tailpiece is aligned in same direction as cylinder bible. Slide cylinder all the way into lever.
For 6 pin cylinder: Fold retainer at hinge and press fit retainer halves together as shown.
For 7 pin cylinder: Break retainer at hinge and discard spacer section. Also remove black cylinder spacer from inside of chassis rollback for clearance.



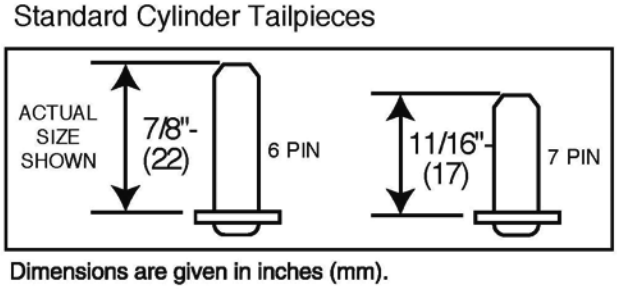


Fig. 7b

5) Installation Instructions (Continued)

8. Installing Outside (Reader) Escutcheon:
   a. Install exterior gasket if this is an exterior door (Fig. 8a).
   b. Insert reader assembly and route wires through door.
   c. Install two #8-32 x 1-3/4" flat head screws through mounting plate (Fig. 8b and 8c).
   d. Connect pin-5 green/yellow ground wire ring terminal to top right screw.

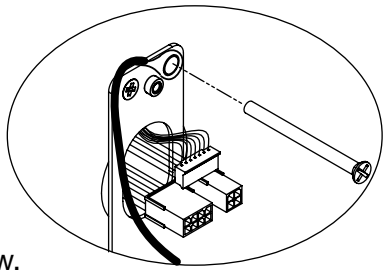


Fig. 8c Detail

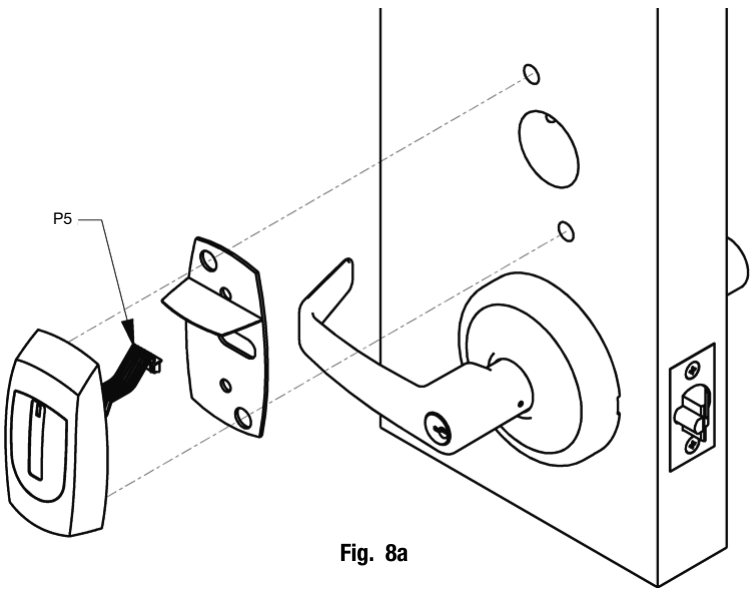


Fig. 8a

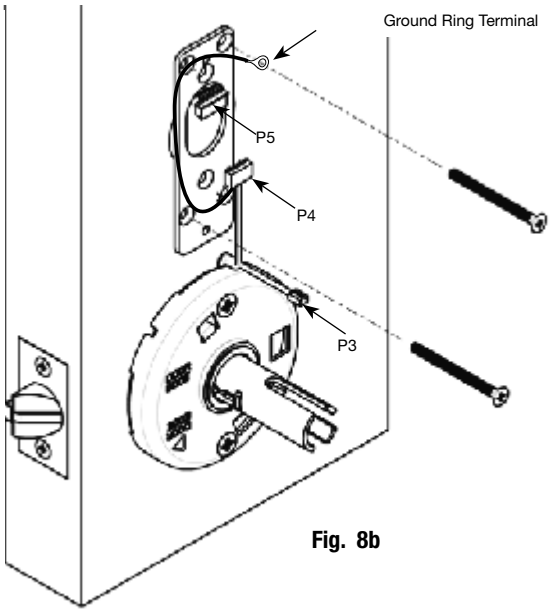
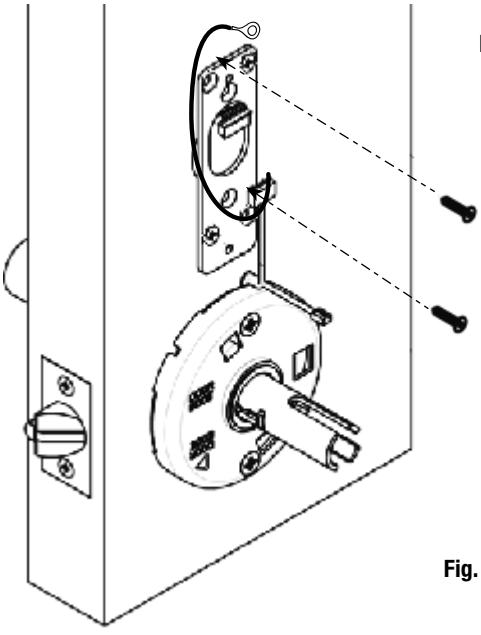


Fig. 8b

9. Secure mounting plate using two #8 x 3/4" combination surface mount screws.



Inside Face of Door

Fig. 9

5) Installation Instructions (Continued)

10. Connector Attachment (Interior PCB Assembly):

a. Connect P3 (2-pin connector) from lockbody to J3 on interior PCB assembly.

b. Connect P4 (6-pin connector) from lockbody to J4 on interior PCB assembly.

c. Connect P5 (7-pin connector) from Reader board to J5 on interior PCB assembly.

d. Connect ElectroLynx harness (4 and 8-pin) from door harness to ElectroLynx harness on interior PCB assembly.

NOTE: Connectors go on only one way.

Do not offset connector and be sure they are completely seated.

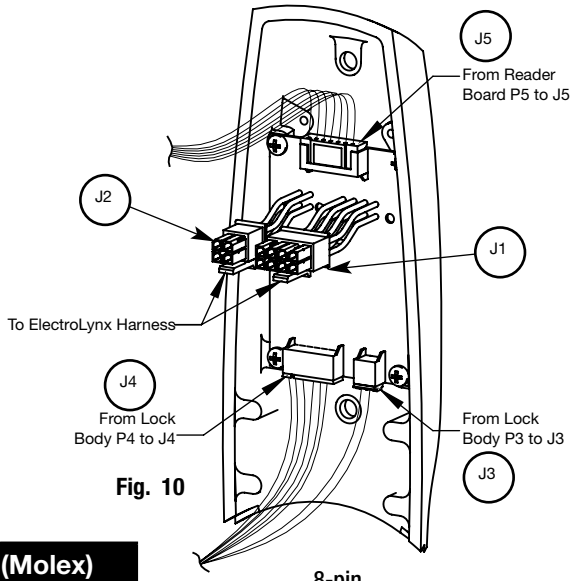
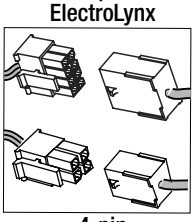


Fig. 10

PCB Layout - Wire Assignments - ElectroLynx Assembly (Molex)							
J2			J1				
1-Violet Lock Neg (Solenoid, neg)	3-Pink N/A		1- Black PWR NEG	3-White DATA 1	5-Orange RX (NO)	7-Brown EGND
2-Gray Lock Pos (Solenoid, pos)	4-Tan N/A		2-Red PWR POS	4-Green DATA 0	6-Blue RX (COM)	8-Yellow LED

8-pin ElectroLynx



4-pin ElectroLynx

Notes:

Please follow these steps prior to installing inside escutcheon assembly.

1. Insert the ElectroLynx® connectors (8 and 4 Pin) and establish their position inside of the door prep.
2. Fold the wires onto themselves and into the space left inside the door preparation.
3. Be sure to neatly fold the wires into available space inside the door after placing the ElectroLynx connectors to prevent pinching of wires when mounting escutcheon.

11. Install Inside Escutcheon, Lever, and Rose:

a. Plug in connectors according to instructions in previous instruction.

b. Feed excess wires into door prep.

c. If this is an outside opening: Remove adhesive backing and apply gasket to escutcheon.

d. Install two #8-32 x 5/8” oval head screws through escutcheon.

Note: Be careful not to pinch wires under escutcheon when tightening screws).

e. Attach inside rose to inside spring cassette.

f. Slide lever handle onto lock body and be sure it snaps into place.

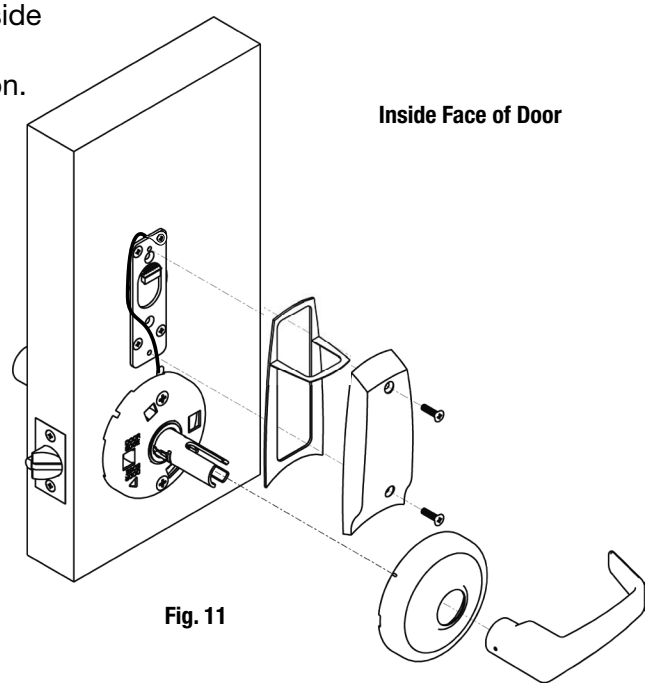
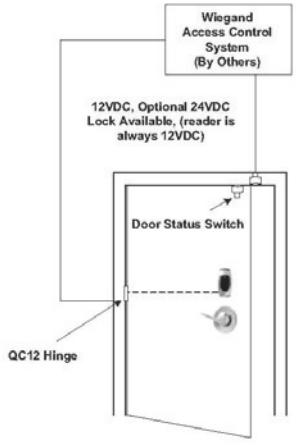


Fig. 11

7) Door Status Switch Installation

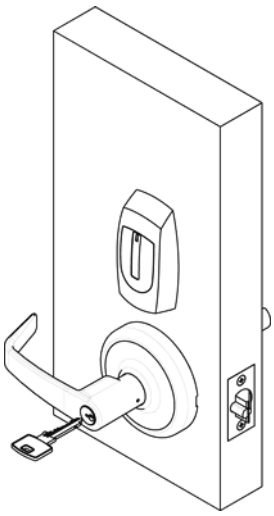
1. Install Door Status Switch supplied with product:
   a. Drill 1” hole in door for magnet.
   b. Drill 1” hole in frame for switch.
2. Wire to ElectroLynx® frame harness as shown in wiring diagrams on previous pages.



8) Mechanical Operational Check

Before closing door test for cylinder function of lock cylinder and Inside lever:

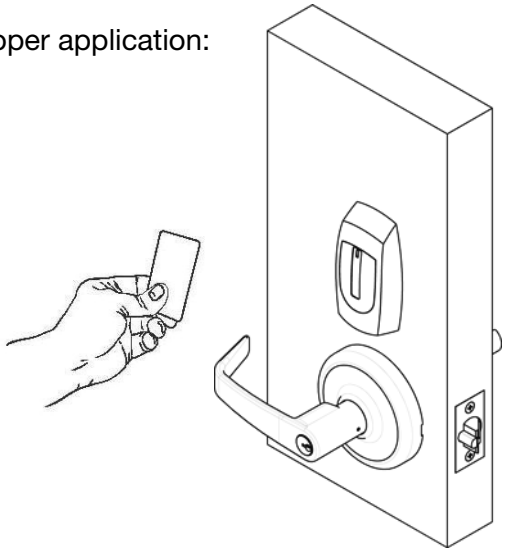
a. Insert key into cylinder and rotate.
b. The key will retract the latch. Key should rotate freely.
c. Inside lever retracts latch.
d. Close door, ensure latch fully extends into strike and does not bind.



9) Electrical Operational Check

Once electrical wiring has been successfully completed according to proper application:

a. Turn power ON.
b. Verify LED located on reader is ON (red or green depending on reader configuration (refer to reader LED configuration).
c. Present proximity credential and verify LED and sounder activity.
d. Verify valid card read at EAC panel.
e. Verify system operation; i.e., when prox credential is presented to reader that the door unlocks.



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ASSA ABLOY is the global leader in door opening solutions, dedicated to satisfying end-user needs for security, safety and convenience.