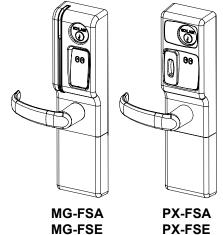
# VIP993 OPEN ARCHITECTURE TRIM HARD-WIRED INSTALLATION MANUAL

The VIP993 series lock is a microprocessor controlled, electromechanical locking system which bolts on to new or existing Von Duprin 98 & 99 rim and vertical rod exit devices. It is an open architecture product designed to interface with 3rd party access control panels encompassing all the features of the lock, reader, door status and egress (rex/request to exit) indication in one piece of hardware. It is powered by 12 or 24 volts DC with only four wires required to the door - two for power and two for communications. For door status indication a door switch (included) must be installed. For request to exit (REX) the Von Duprin exit device must be equipped with the exit indication switch (order a RX-LC98/99 exit device or Von Duprin P/N S1-LC for an aftermarket application) and a pair of wires (included) must be run from the switch to the VIP993. The lock communicates with a PIB (panel interface board) which communicates with the panel as if it



Operationally, the outside lever is normally locked the exit device allows free egress. Electronic access control is achieved by entering an "Access Credential" (magnetic stripe card or Prox fob or card). The panel controls the lock through the PIB.

were separate components of an access control system.

PIB

Compatible Von Duprin exit device models include: 98/99 9827/9927 9847/8847 9848/9948

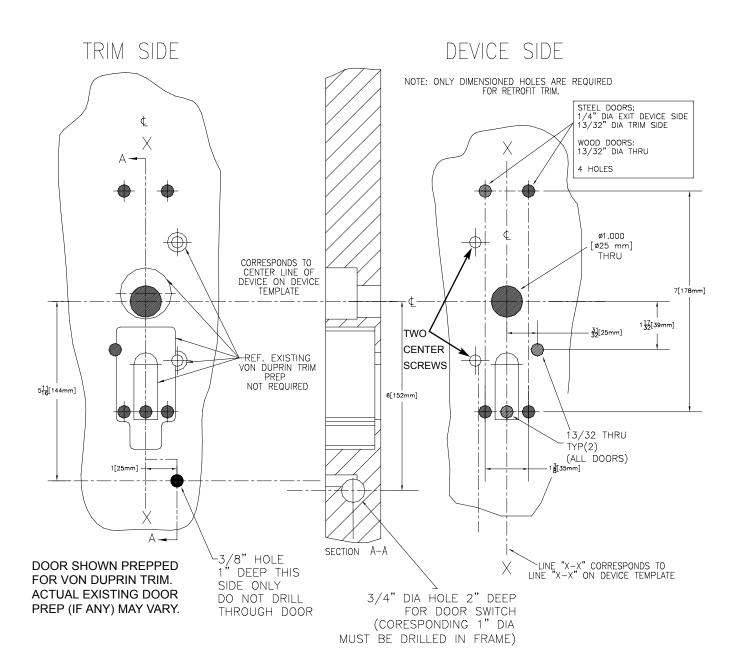
9857/9957

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 any interference that may cause undesired operation. Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.



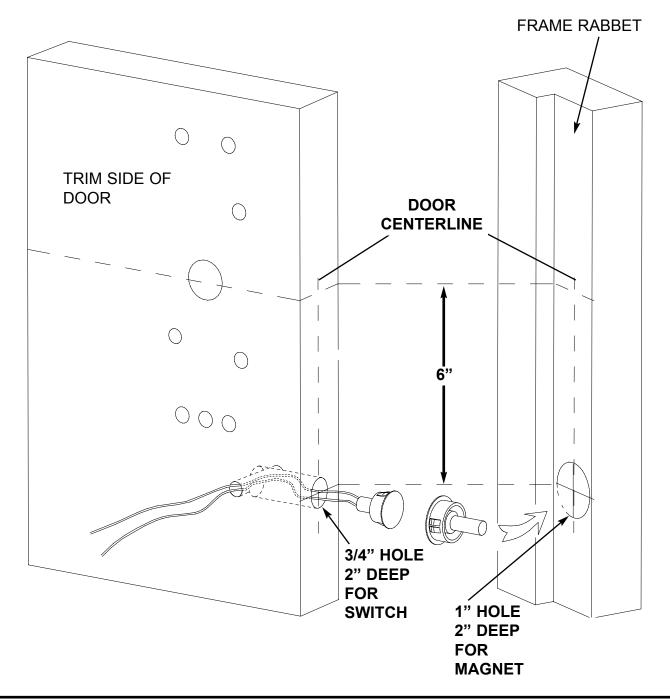


**1. PREP DOOR:** Remove exit bar and modify door prep with additional holes required for trim per template below (or use paper template provided).



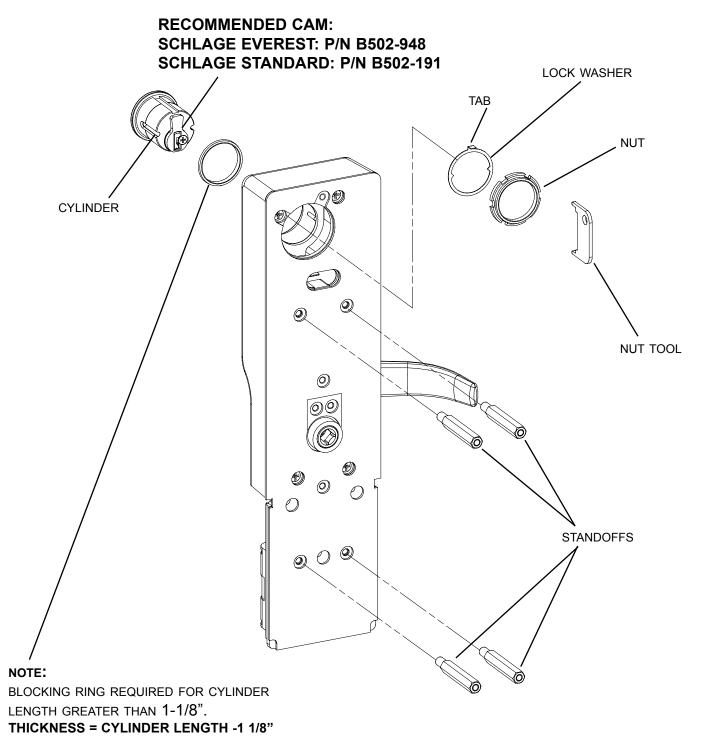
**2. PREPARE FOR AND INSTALL DOOR STATUS SWITCH & MAGNET:** Measure down 6" from the horizontal centerline of the exit device on both the door and the frame. Centered on the door edge drill a 3/4" hole 2" deep to intersect the 3/8" hole on the trim side. On the frame drill a 1" hole 2" deep directly opposite the 3/4" hole on the door. Install the magnet in to the frame. Install the switch into the door, passing the wires through the hole in the face of the trim side as shown.

NOTE: This door switch location has been determined to be the best for most door and frame conditions. It is possible that certain existing door and frame conditions may require the switch to be located in a different position. Door switch wires must still exit the door face through the hole as shown.



#### 3. INSTALL CYLINDER, GASKET AND STANDOFFS:

- A. Install cam onto cylinder (if not already done.)
- B. Insert standard, 1-1/8" mortise cylinder into outside escutcheon from front (keypad/reader) side with keyway down.
- C. Slide lock washer onto cylinder (tab on top facing out, as shown below.)
- D. Using nut tool (provided) tighten nut onto cylinder.
- E. Line up nearest notch on nut with tab on lock washer and bend tab using nut tool so nut is secure.
- F. Install four standoffs.



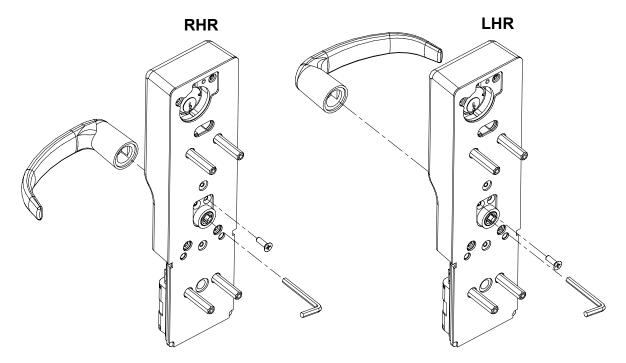
**4. RE-INSTALL EXIT DEVICE:** (Re)-Install exit bar, but only install 2 center screws (see template info on page 2) in the centercase at this time, leave center case cover off.

#### 5. SET HAND OF TRIM (IF REQUIRED):

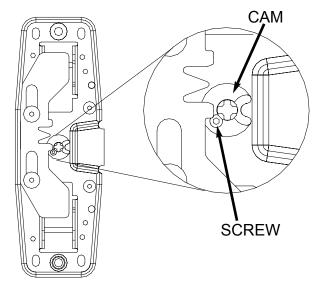
- **A.** Install lever using hex head screw and 5/32" allen wrench as shown.
- **B.** TEST: Use key override to engage lever to test for cam rotation. Output cam should be observed to rotate when lever is depressed.

#### 6. INSTALL STOP SCREW:

- **A.** Push down on lever, observe output cam rotate, then install stop screw as shown below (while keeping the lever depressed).
- **B.** TEST: Lever should rotate down, when pushed; lever should not lift up.

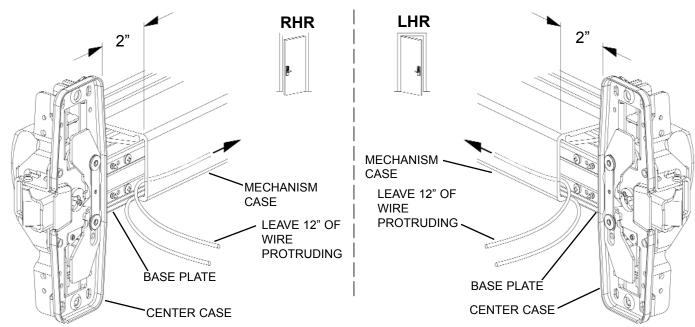


7. PREP EXIT DEVICE: Set exit device to NL ("Night Latch") function by inserting the allen set screw (supplied in screw pack) as shown in illustration to right. If the set screw is present go to next step.



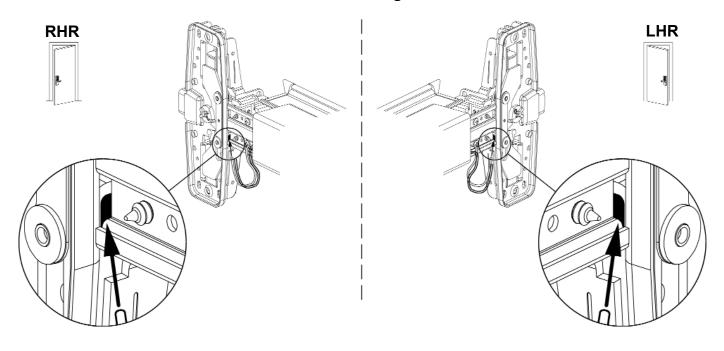
#### 8. ROUTE VIP993 HW WIRES THROUGH EXIT DEVICE.

- a. Slide mechanism case 2" away from center case
- b. Push VIP993HW cables down length of the device between mechanism case and base plate. Leave 12" of cable protruding from center case end of device.



- c. Push VIP993 HW cable through opening in bottom of center case.
- d. Slide mechanism case back against center case.

# Important! Be careful not to pinch cables when sliding mechanism case back against center case.

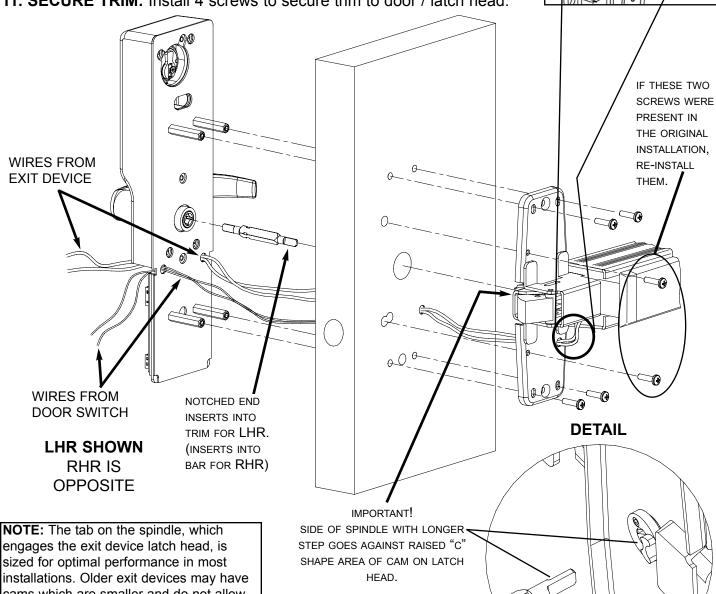


9. RE-INSTALL EXIT DEVICE: Carefully fish wiring from exit device through latch head wire hole and through door. Fish wiring from door switch through hole in trim as shown. Install exit device onto

door. Place spindle into exit device. The end of spindle with the identification notches inserts into the cam in the centercase for RHR. For LHR the end of the spindle with the notches inserts into the trim as shown below. (See DETAIL)

**10. ENGAGE SPINDLE AND TEST:** Fish wiring through VIP993 wire hole. Align spindle with lever and place trim onto door. The unlocked lever should retract the latch fully. If there is only a partial retraction of the latch the spindle is in backwards. If the lever can not be pushed down the lever stop screw is not in the correct hole. (See step 6 to correct this.)



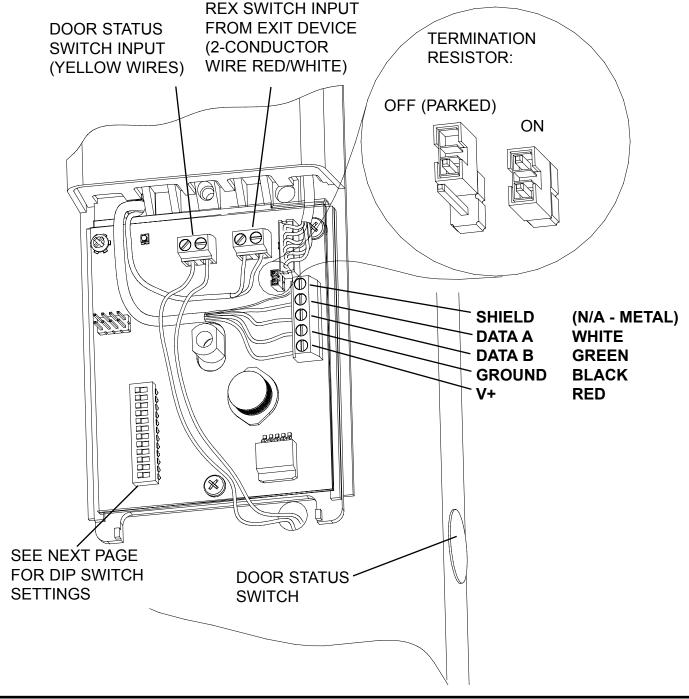


engages the exit device latch head, is sized for optimal performance in most installations. Older exit devices may have cams which are smaller and do not allow the spindle to fit. In these cases, the tab may be filed to fit the cam. Do not over-file or full bolt retraction will be lost.

#### 12. MAKE WIRING HARNESS CONNECTIONS:

- A. Connect 4-conductor shielded wire (from exit device) to 5 position terminal block.
- B. Connect 2-conductor wire (from REX switch in exit device) to terminal block.
- C. Connect in DOOR STATUS SWITCH as shown.
- D. Set lock address. See dipswitch settings on next page.
- E. Verify correct lock type setting (FSE/FSA) see dip switch setting. Note: as ordered from the factory.
- F. If lock is the one farthest away from PIB set termination resistor to "on". All others should be in the "off/parked" position.

IMPORTANT! See PIB manual for additional connecting instructions.



#### 13. REX switch connection:

On the inside of the exit device:

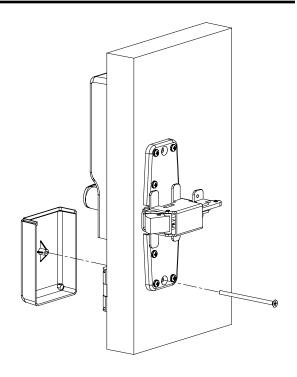
Connect the 2-conductor black and white wire to the S-1 switch installed on the exit device to the yellow and blue wires (it doesn't matter which is connected to which). Be sure to connect them securely so they don't disconnect during operation.

Note: if the REX switch (S-1) is not used, see the information supplied with the panel to set up the door zone without a rex/legal egress input to avoid a fault condition.

#### **DIP SWITCH SETTINGS:**

| DIP<br>SWITCH |  |   |                 |                 |                 |                 |
|---------------|--|---|-----------------|-----------------|-----------------|-----------------|
| NUMBER:       |  |   | LOCK<br>ADDRESS | LOCK<br>ADDRESS | LOCK<br>ADDRESS | LOCK<br>ADDRESS |
| 1:<br>2:      | LOCK ADDRESS (SEE CHART)  LOCK ADDRESS (SEE CHART) |   | 1               | 2               | 3               | 4               |
| 3:            | ALWAYS SET TO OFF                                  | DIP SWITCH<br>1   | OFF             | ON              | OFF             | ON              |
| 4:            | ALWAYS SET TO OFF                                  | DIP SWITCH  | OFF             | OFF             | ON              | ON              |
| 5:            | OFF = FAIL SECURE (FSE) ON = FAIL SAFE (FSA)       | Note: Lock addresses must be used in sequence and cannot be the same for any two locks connected to a PIB. For example, if the system has three locks, use addresses 1, 2, and 3 (but not 4). Lock address will correspond to panel address on the PIB. |                 |                 |                 |                 |
| 6:            | OFF = ALL MG LOCKS<br>ON = ALL PX LOCKS            |   |                 |                 |                 |                 |
| 7:<br>8:      | ALWAYS SET TO OFF<br>ALWAYS SET TO OFF             |   |                 |                 |                 |                 |
| 9:<br>10:     | ALWAYS SET TO OFF<br>ALWAYS SET TO OFF             |   |                 |                 |                 |                 |

#### 14. INSTALL PC BOARD COVER:



See PIB manual and panel documentation for more wiring and set up information.