Document Information

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dbKeypadLock (S)

Ergonomic Keypad

Modularized Reader Head

Tri color (Red / Amber / Green) Reader LED

Tri color (Red / Magenta / Blue) Status LED

Optical Handle Position Sensor

Secure key-cylinder. Compatible with ultra-secure cylinders

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dbKeypadLock (S) Installation

Determining which Lock Pawl to use

As all cabinets vary, we offer a wide range of pawls to suit the particular dimensions of your cabinet.

There are 2 simple measurements that need to be taken to determine which pawl you will need.

Please obtain the measurements as show in Figure 1 and Figure 2 below and contact our support team at support@digitus-biometrics.com

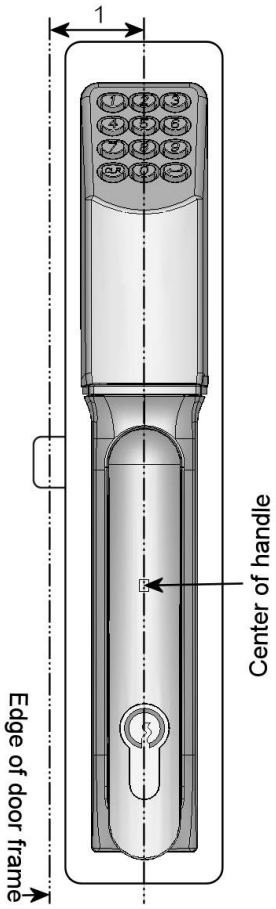

Figure 1 – Measurement 1
Edge of Door Frame to Center of Handle

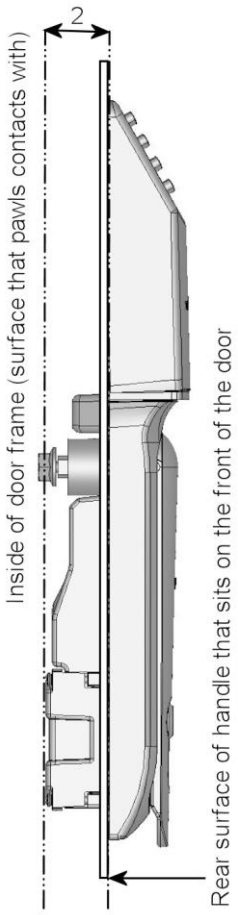

Figure 2 – Measurement 2
Rear surface of handle to Inside of Door Frame

In most situations the pawl from the existing mechanical handle can be re-used with the new lock.

Installing the Rotation Limiter

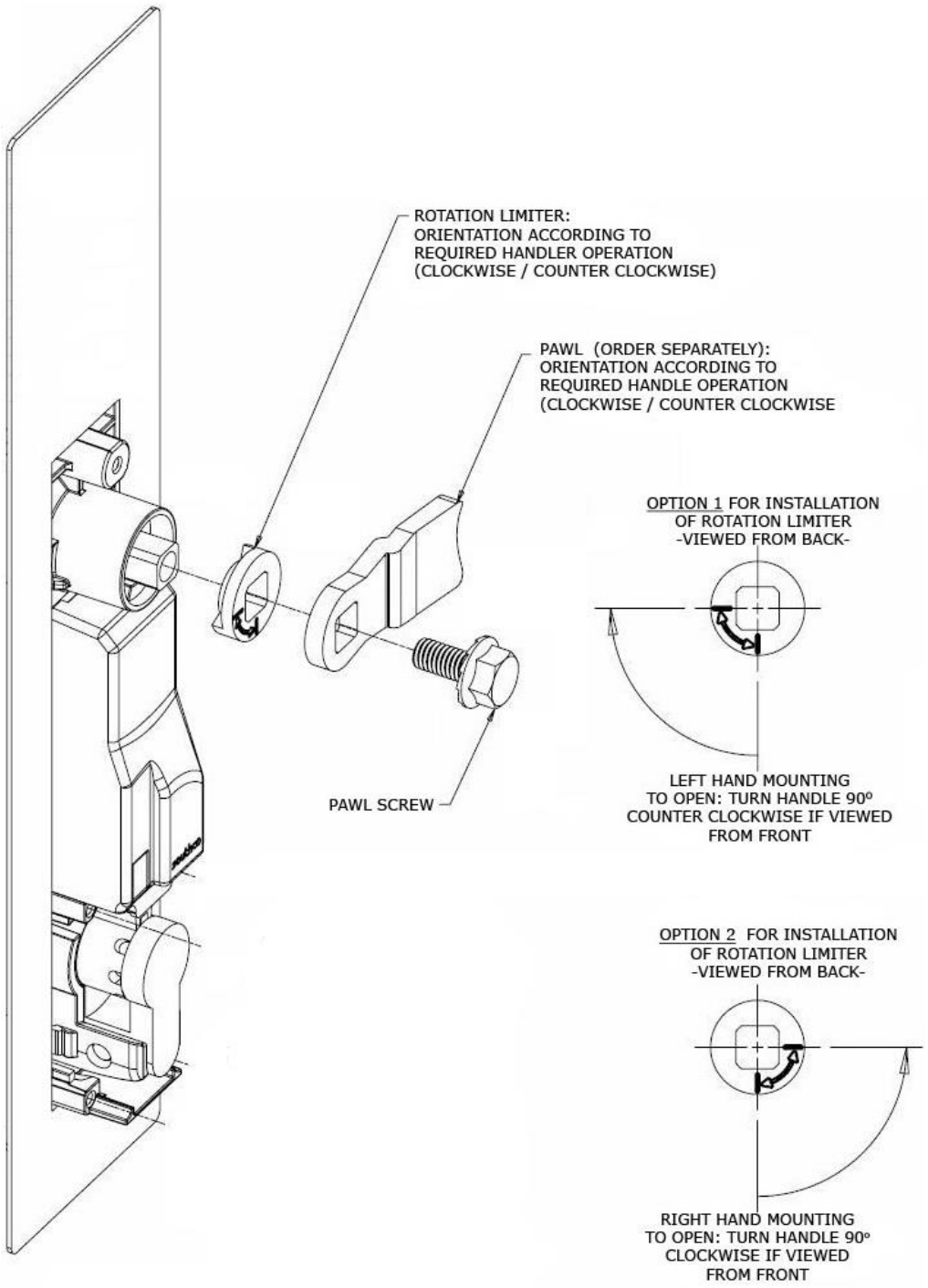

Figure 3 – Rotation Limiter

Positioning the Cable Management Tie-Down Pads

The second step is to mount the cable management tie-down pads to the cabinet and the cabinet door as illustrated below.

The tie-down pads are used to secure the supplied cable that connects the lock directly to the Remote Node / db Sentry or Access Control panel.

Ensure that the door surface is clean and free from any debris. Using rubbing alcohol to clean the surface is highly recommended. Allow sufficient time for the cleaned areas to dry before mounting the tie-down pads.

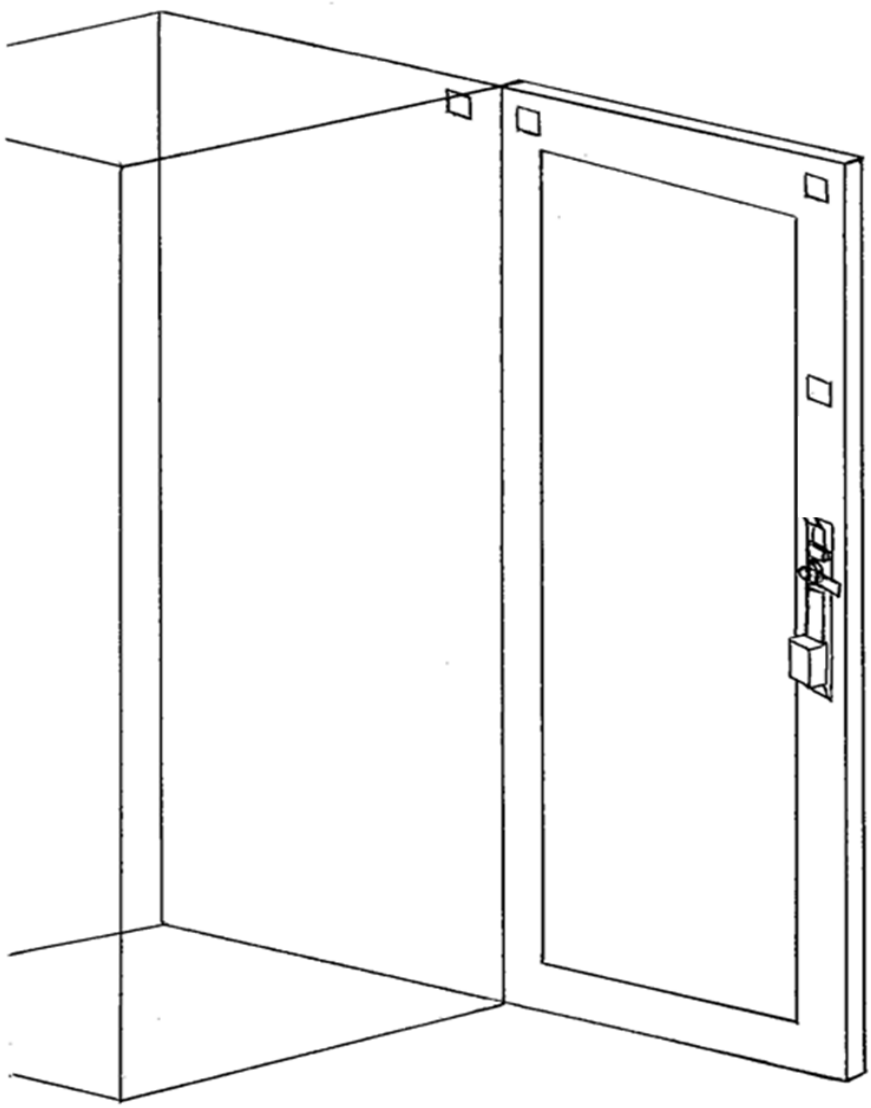

Figure 4 – Positioning the tie-down pads

Remove the protective cover from each tie-down pad and situate as shown in Figure 4.

Routing the Lock Cable

Route the cable between the lock and the db Remote Node / db Sentry Controller or ACM Panel.

Route the lock cable to the door hinge as shown in Figure 5 and secure the cable to the tie-down pads using the supplied cable-ties. Connect the supplied device cable to the RJ-45 coupler and route it to:

- the Remote Node or Sentry (if you are using a Digitus controller)
- 3rd Party Access Control Panel (if you are connecting to a third-party access control panel, connect a CAT5 cable to the RJ-45 coupler and run back to panel. Details on how to terminate the wire at the Access Control Panel are shown on page 9 of this manual.

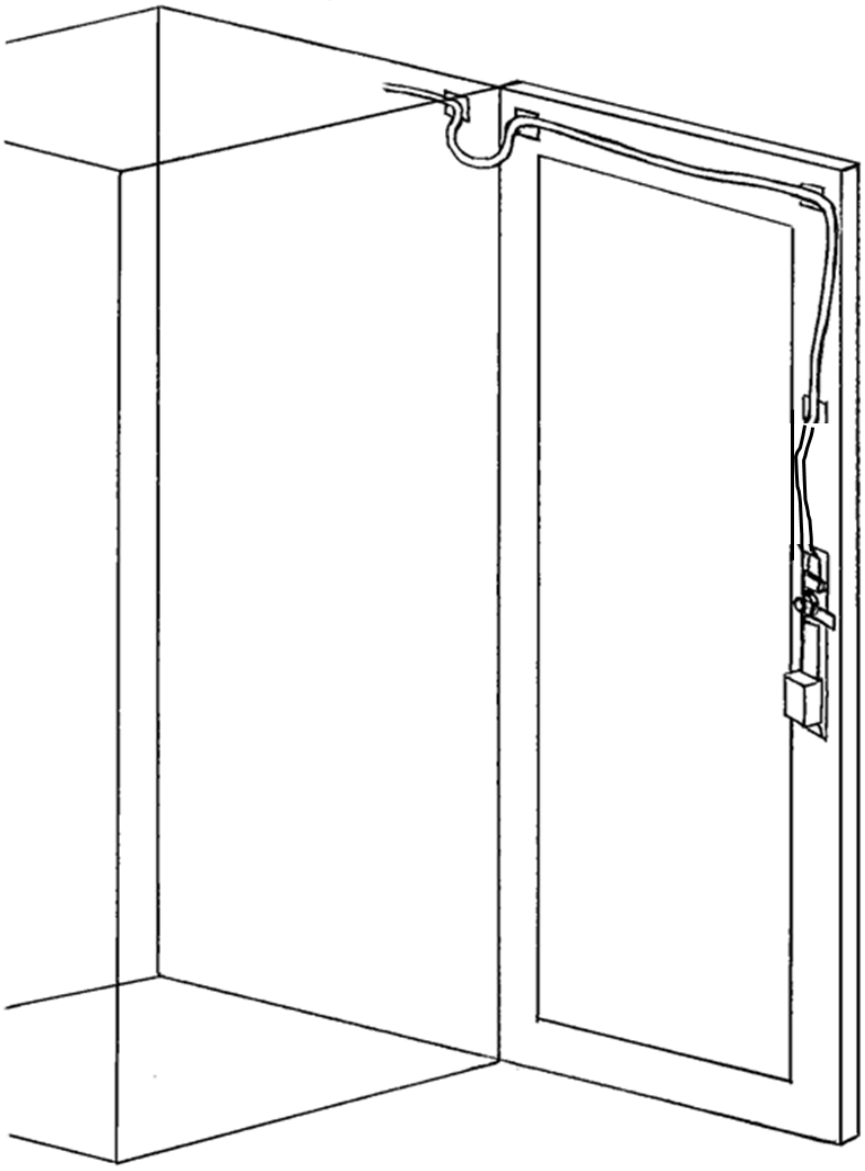

Figure 5 – Routing the cable

Connecting to dbRemote Node / dbSentry

Connect the cable to the dbRemote Node / dbSentry Controller.

Handles / locks are connected to the dbRemote Node or dbSentry socket circled in the diagram below.

Each dbRemote Node / dbSentry Controller has two device inputs, Dev 1 and Dev 2.

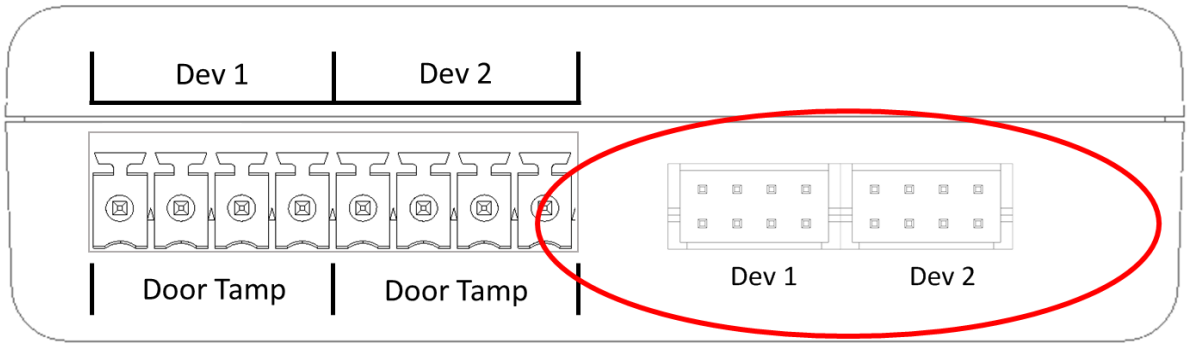

Figure 6 - Side View of dbRemote Node

Figure 7 - Side View of dbSentry

For clarity and consistency, it is recommended that for a cabinet with 2 doors, the front door is connected to Dev 1 and the back door is connected to Dev 2.

Connecting to 3rd Party Access Panels

Connect the lock to 3rd-party Access Panel

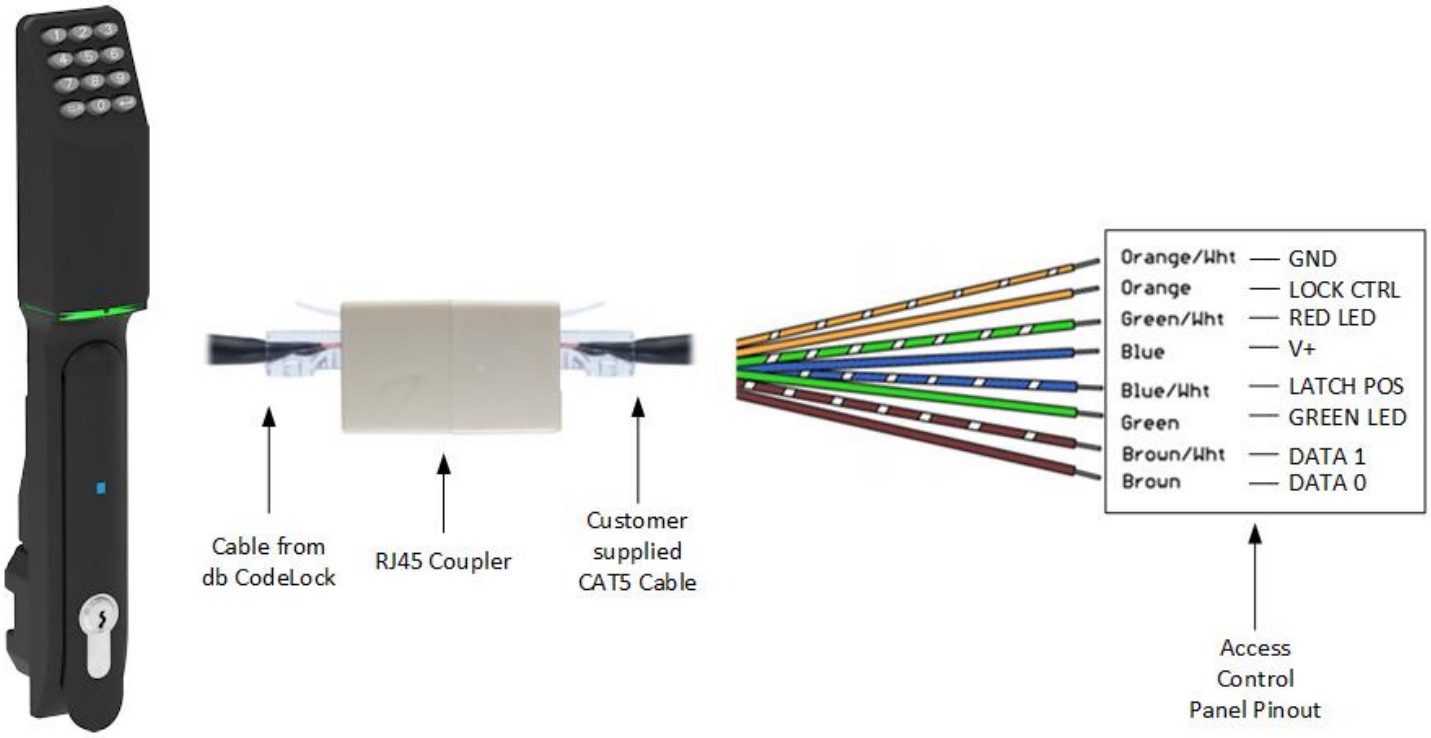

Figure 8

Color	Control	Notes
Orange / White	GND	Ground
Orange	LOCK CTRL	Requires a 12V control line to unlock the handle
Green / White	RED LED	Connect to the Red LED output on the 3rd-party panel
Blue	V+	Requires a 12VDC Supply
Blue / White	LATCH POS	Used to indicate if the lock is open or closed
Green	GREEN LED	Connect to the Green LED output on the 3rd-party panel
Brown / White	DATA1	Wiegand Data 1
Brown	DATA0	Wiegand Data 0

Connecting Latch Position to 3rd Party Panel

The dbKeypadLock (S) provides the capability to monitor whether the handle is in the open or closed position. This is a single signal from the handle, shown as "LATCH POS" in the table above.

If the 3rd-party Access Panel requires a 2-wire input to monitor the handle position, an external 12v low current relay is required. The diagram below shows how to connect the "LATCH POS" signal to a 3rd-party Access Panel with a relay.

Approved relays can be purchased by contacting your Digitus vendor or by emailing sales@digitus-biometrics.com

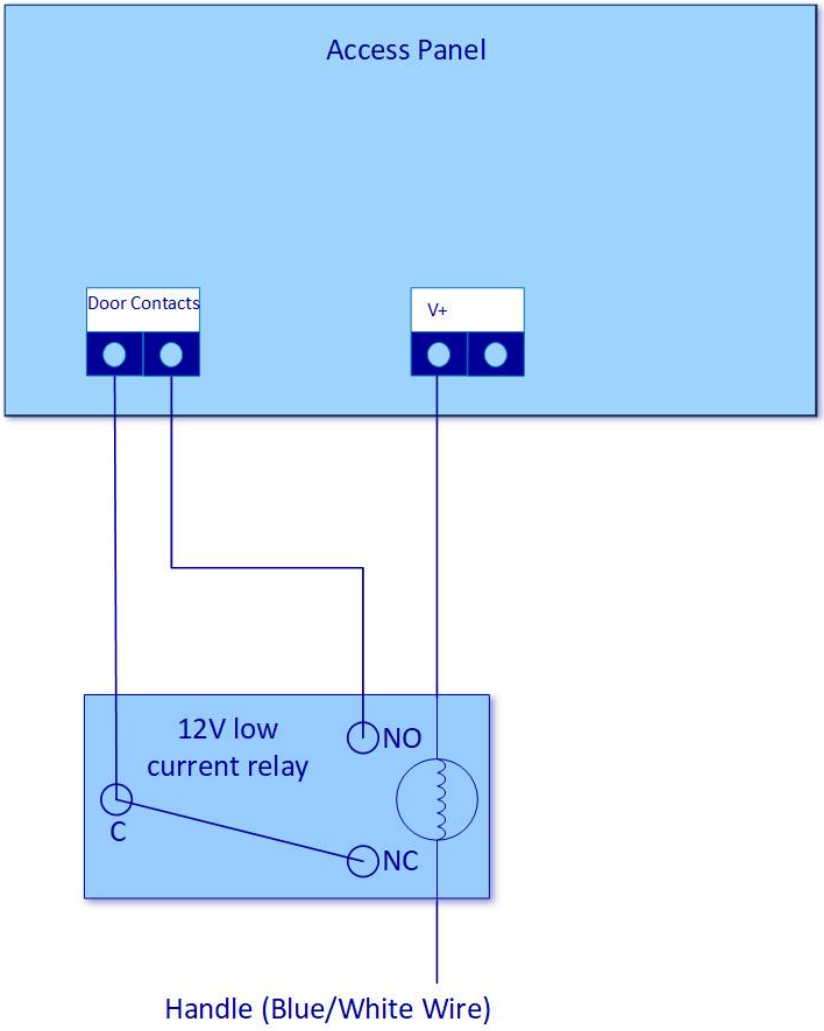

Figure 9 – Connecting Latch Position to a 3rd Party Panel

Power Up

- Upon power-up, the dbKeypadLock (S) performs a **RED** / **AMBER** / **GREEN** traffic light sequence on the Reader LED. The Reader LED will remain solid **GREEN** for up to 10 seconds while the handle tries to establish communication with a dbSentry or dbRemote Node (which typically takes less than 2 seconds). If the Reader LED remains **GREEN** for the full 10 seconds, the dbKeypadLock (S) has not been able to establish communication with a dbSentry or dbRemote Node and therefore assumes that it is connected to a 3rd party Access Panel.
- After the power-up sequence, a flashing **RED** LED on the handle signifies that communication with the keypad has been lost. The handle will remain inoperative until the issue is resolved.

Updating Firmware

Connected to a dbSentry or dbRemote Node

- Initiate the firmware upload via DAS-SQL
- The Reader LED will flash **AMBER** while the handle firmware is being received.
- The Reader LED will stop flashing and turn solid **AMBER** to indicate that programming is taking place (which typically takes around 20 seconds). If power is interrupted in this state, the lock could be irreparably damaged.
- Once the programming is complete, the Reader LED will turn **GREEN** before rebooting. Following which the dbKeypadLock (S) performs a **RED** / **AMBER** / **GREEN** traffic light sequence on the Reader LED indicating the handle is booting up.
- If the Reader LED will turn **RED** for 3 seconds or **GOES OFF COMPLETELY**, there was a problem with the firmware being received.

Connected to a 3rd-party Access Panel

- If a Digitus Support Technician advises that your handle requires a firmware update, Digitus will ship a loan programmer which, once connected directly to your handle, will update the firmware.

Configuration Cards

Handle Configuration Card

There may be instances where the operational aspects of the handle need to be changed. This is done using a configuration card.

A member of the Digitus Support Team will advise you if a configuration card is required.

- The configuration card is presented to the handle.
- The Reader LED will flash **GREEN** 3 times to indicate that the configuration data was saved to non-volatile memory.

RFID Configuration Card

There may be instances where changes need to be made to the configuration of the RFID reader. This is done using a configuration card.

A member of the Digitus Support Team will advise you is a configuration card is required.

- The dbKeypadLock (S) needs to be powered off.
- At the same time as the dbKeypadLock (S) is powered up, present the configuration card to the handle – holding to card to the handle for 10 seconds. There are no visual or audible confirmations that programming has taken place.

Reader LED

Connected to dbSentry or dbRemote Node

- After each key press the handle LED with blink **AMBER.**
- The user has up to 30 seconds to enter the 4-digit PIN on the keypad. If 4 digits haven't been pressed within 40 seconds the handle LED will turn solid **RED** for 3 seconds.
- If a 4-digit PIN was entered:
    - If the PIN entered is associated with a user who has access the handle LED will turn solid **GREEN** for 3 seconds.
    - If the PIN entered isn't associated with a user who has access the handle LED will turn solid **RED** for 3 seconds.
- If the handle is in "Lockdown" mode, the handle LED will flash **RED**/**AMBER** until "Lockdown" is cancelled.

Connected to an Access Control Panel

- The handle LED's function will be determined by the Access Panel.

Status LED

The dbKeypadLock (S) is equipped with a tri-color **RED** / **MAGENTA** / **BLUE** status LED located on the front of the handle.

The LED states are as follows:

- When the dbKeypadLock (S) is locked and secure the Status LED will turn solid **BLUE**.
- When the dbKeypadLock (S) is unlocked, but the handle is still closed the Status LED will flash **BLUE** / **MAGENTA**.
- When the dbKeypadLock (S)'s handle is in the open state the Status LED will turn solid **BLUE**.
- When the dbKeypadLock (S) is locked but the handle is still open and therefore unsecure the Status LED will flash **BLUE** / **RED.**
- When the dbKeypadLock (S) is locked, the handle is closed, but not fully engaged and therefore still unsecure the Status LED will flash **BLUE** / **RED** / **RED**.