Ins-30091-US PROXIMITY LCD reader

Paxton Access

Technical Support

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Technical help is available: Monday - Friday from 12:00 AM - 5:00 PM (PST)
Saturday from 1:00 AM - 5:00 AM (PST)

Documentation on all Paxton Access products can be found on our web site - http://www.paxton-access.com/

Suitability

Security sensitive doors ✓   Wet environments ✓

Mounted on metal surface ✗   Readers mounted together   **12 inches** between readers
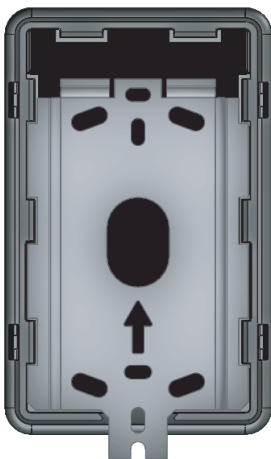
The main visible face of the reader is a full color backlit LCD screen. This can be configured to display images of the customer's choice. For example, an image using a company name/logo could be used as the default display on each reader around the site.

The LCD reader comes with four preloaded images. These can replaced using an uploader program via a Net2Air USB bridge or a Net2Air USB dongle.

The LCD reader will accept:
Switch2, Net2 and EM4100 tokens.
Net2 hands free tokens (if an interface is fitted).

Fitting

The LCD reader is surface mounted onto the wall using the backplate and fixings provided. It can be positioned to allow display of Portrait or Landscape images.

Fix the mounting plate to the wall, noting the position of the orientation arrow (see diagram).

Make a hole in the wall to take the reader cable and feed this through. Ensure there will be sufficient slack to allow the reader to slide over the mounting plate during installation.

Present the reader to the mounting plate so that the slots pass over the side tabs in the plate.

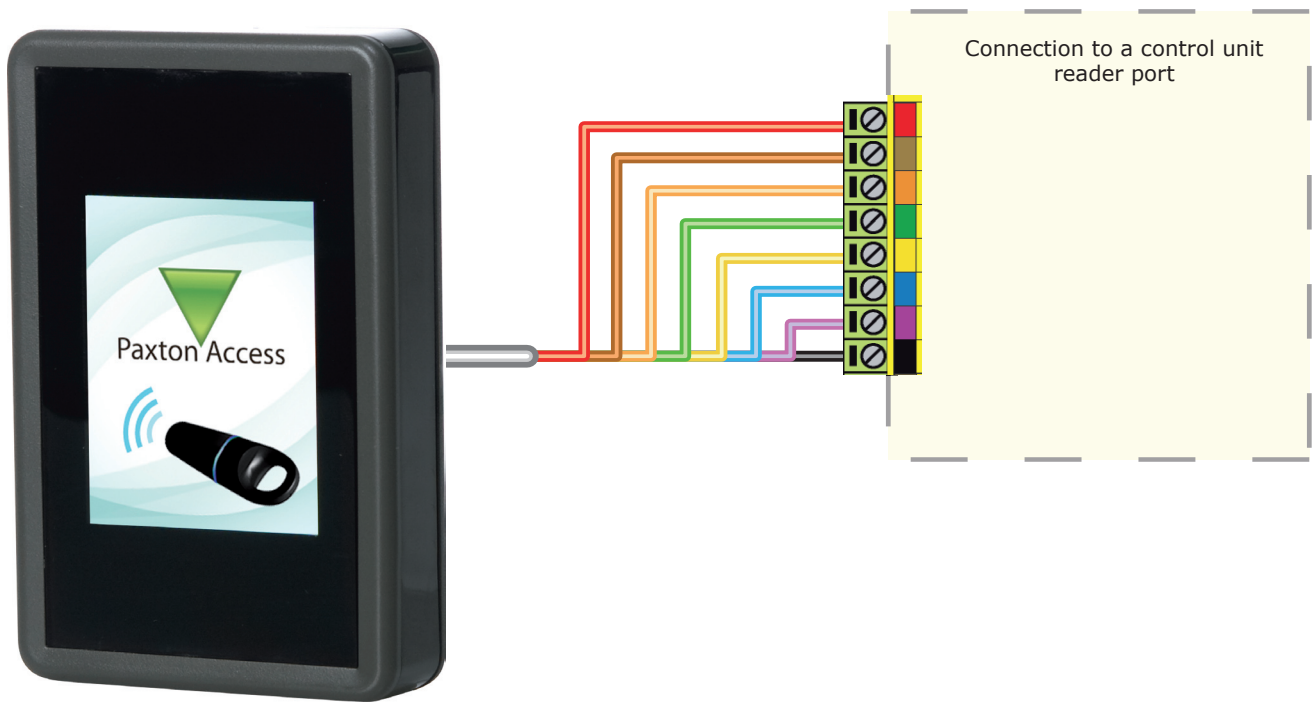Slide the reader down the plate until the retaining pin clicks into position.

A tool is provided with the reader to depress this pin should the reader ever need to be removed.

Image Download

The unit comes with four preloaded images. These relate to the 3 LED's (Green, Amber and Red) on a standard Paxton Access reader plus a default image.

Once a token has been read, the control unit establishes the access permissions of that user. Access is granted or denied as appropriate with the designated image displayed. For example, if access is denied the image assigned could show "Please return to Reception".

Wiring

Connection to a control unit reader port

Connection modules

Reader junction box (325-020-US)
This module can be used to provide a connection point for the reader RJ45 plug. The terminals on the module are then wired color for color to the controller.
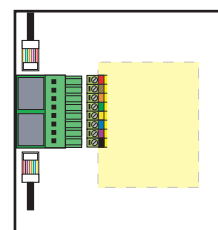
Alternatively, the reader can be wired directly into the screw terminals of the control unit by first cutting off the RJ45 plug and stripping back the wires in the cable.

Reader Port Module (325-030-US)
This module may be purchased separately to speed up the installing and replacement of readers.

The reader port module is designed to convert the standard reader ports on Switch2 and Net2 controllers to accept one or two RJ45 connections. Pull off the screw terminal block from the reader port and simply replace it with this module.

Further information on how to purchase Installer Tools is available at:
http://paxton.info/841

Cable extensions

Readers can be extended using Belden CR9540 10-core overall screened cable. The maximum length is 100 yards.

Image preparation

You can replace any of the 4 default images with your own customised versions. These images must be prepared using a 3rd party software package.
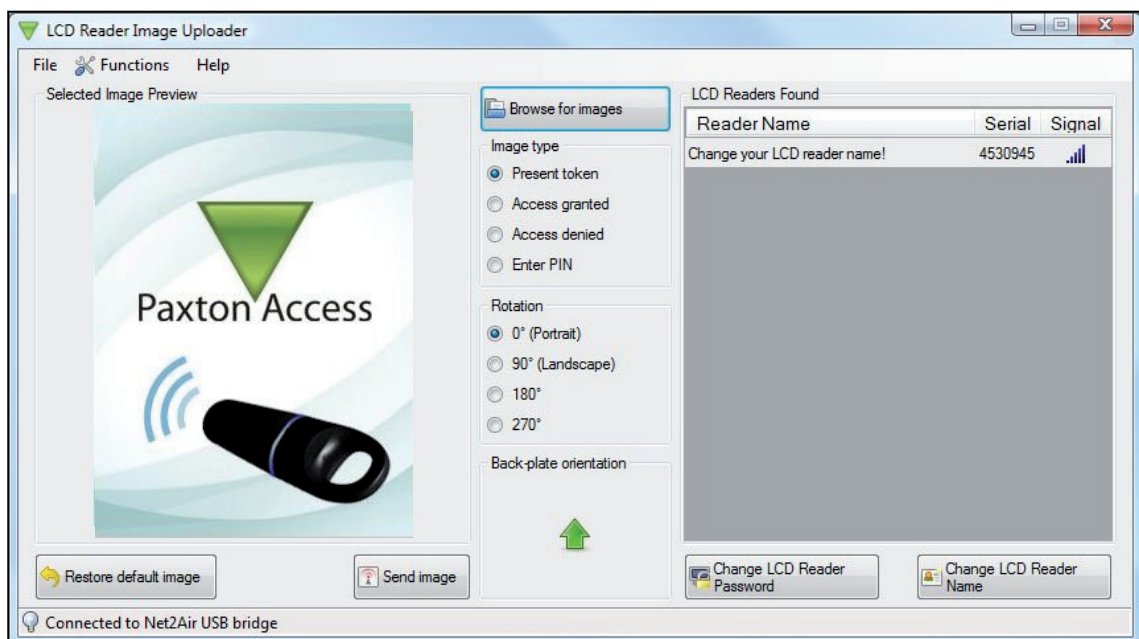
The following limitations apply:

Portrait image:	240 x 320 pixels - minimum
Landscape image:	320 x 240 pixels - minimum
Image format:	.bmp, .jpg, .gif, .png

Any image that is larger than these dimensions will align itself with the top left corner of the display. It will NOT self centre.

Image Uploader

Images cannot be retrieved from the reader but they can be refreshed or replaced using an uploader program.

The program can be found in the Net2 CD/Tools folder or by download from < http://paxton.info/1521 >

The program will detect any LCD readers that are in Net2Air range. They are listed along with their Net2Air signal strength. Highlight the required reader, select one of the four image types and browse the PC for the required image. Click on 'Send image' and this will be uploaded to the selected reader.
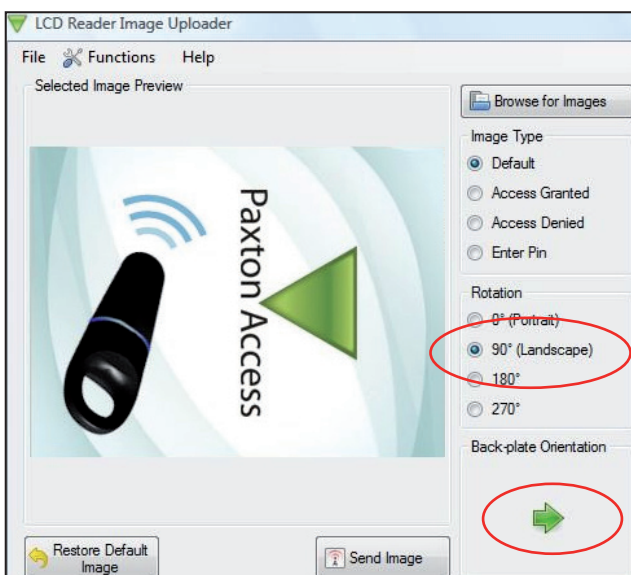

Image orientation

The metal backplate is marked with an Arrow. Click on the 'Rotation' option to turn the green arrow into the same direction as the backplate arrow.

This display is used to confirm that the image transmitted to the reader will match the orientation of the reader as installed. Rotating this display image does NOT alter the actual image.

In the example on the left, we have set the rotation to show a reader installed in a landscape orientation. This shows that the current image, if sent, would display incorrectly. (i.e. sideways)

The image should be corrected and viewed again before final transmission to the unit.

Detecting the LCD reader

Plug the USB Net2Air bridge or Net2Air USB dongle into the PC.

Run the Image uploader software and it will detect the USB Net2Air device connected to the PC.

The PC will then detect and display any LCD units that are in range of the USB device

Image selection

The LCD reader will hold 4 images. These are selected automatically by the reader's LED control wires. The default image will display unless one of the three LED's lines is individually active.   In that case the corresponding image (Access Granted, Access Denied or Enter PIN) will display. The supplied images are shown below.
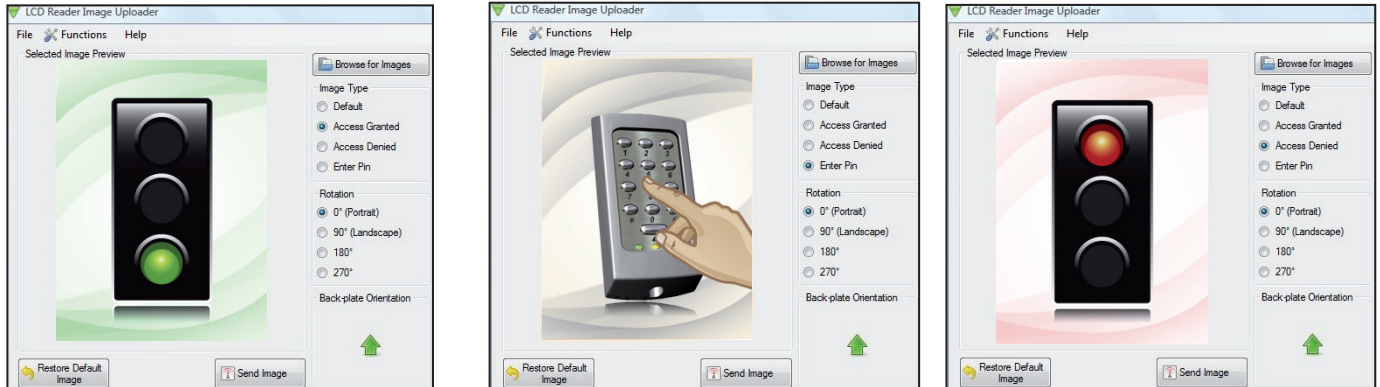
Image download

Select the LCD reader from the list of units detected and the image type that is to be updated. Make sure that the orientation arrow is correct and then browse for the file to be uploaded.

Check that the image is correct and then click on the 'Send Image' button.

This will bring up a password security screen. The reader password is left blank when supplied but one can be created if required.

The image will upload to the LCD reader in about 90 seconds and reports the progress on a Status bar.

Changing the reader name

The name is stored within the reader. Select the reader, click the 'Change LCD reader name' button and you will then need to enter the password (if set). The reader name can then be changed.

Changing the reader password

The password is stored within the reader itself. Select the unit, click the 'Change LCD reader password ' button. You will be asked to enter the old password and the new password.

Factory reset

The reader can be reset to a factory default state by carrying out the following operation:-

1.   Connect together the yellow and green wires. (reset link)
2.   Connect power to the reader.
3.   The reader will beep 3 times to confirm the reset sequence.
4.   Remove the power and remove the reset link.

This factory reset sequence results in the LCD reader images returning to the default images, the LCD reader name will be cleared and the reader password will be blanked.

Specifications

Environment	Min	Max	
Operating temperatures - all items	-20 °C (-4 °F)	+55 °C (+131 °F)	
Waterproof	IPX7		Outdoor Use
Cable length			5 yards
Silent operation feature			Yes
Electrical	Min	Max	
DC supply voltage	8V DC	14V DC	
DC supply current	165 mA	215 mA	
Carrier frequency			125 kHz
Clock and data bit period			600 μs
Dimensions	Width	Height	Depth
	2 $\frac{5}{8}$ inch	4 $\frac{1}{4}$ inch	1 inch
Read Range	Token	Keyfob	Hands Free Token
	2 $\frac{1}{2}$ inch	2 $\frac{1}{4}$ inch	16 inch

Contents in box

PROXIMITY LCD reader
Reader mounting plate
Documentation

Option		Qty	Description
Fixing Kit - LCD reader	fk1-087	4	No 6 x $\frac{3}{4}$ in pozi pan self tapping screw - zinc
		4	22 mm Wall Plugs
		5	Cable clips
		1	LCD reader removal tool

This product is not suitable for retail sale. All warranties are invalid if this product is not installed by a competent person.

FCC Compliance

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