

# UPGRADE GUIDE

## VERSION 27.5 FIRMWARE

This guide has been written to assist installing the VeriFire Tools Software, opening an AFP-3030 Config, updating the AFP-3030 firmware (Bootloader & Service Pack V27.5) and downloading the Config to the AFP-3030.

**It is a strong recommendation of the manufacturer that technicians undertake the VeriFire Training Course.**  
Please contact the FireSense office to arrange Training for the AFP-3030.

**NOTE:** Information relating to versions of Software / Firmware in this document are current at the time of writing.  
Please contact FireSense to confirm.

**CAUTION:** Before performing any of the following procedures to any fire systems, ensure the output to the Fire Brigade and all the gas releasing heads on the system have been isolated.

**CAUTION:** Before performing any downloads to the fire system, it is strongly recommended that a backup of the current panel configuration is uploaded to the PC using VeriFire Tools.

**NOTE:** Download operations that change the basic program of the control panel must be performed by responsible and authorised service personnel in attendance at the panel or onsite. After downloading a program, the panel(s) must be tested in accordance with local standards.

## OVERVIEW

- Download VeriFire Tools V10.57 from the FireSense website  
<https://www.firesense.com.au/download.html/?cat=101>
- Install VeriFire Tools V10.57 on PC
- Open VeriFire tools V10.57 and connect PC to AFP-3030 via USB Cable
- Import Existing Config / Upload existing database from panel
- Check firmware version
- **If required**, update firmware by following the V23/24/26.5 to V27.5 Upgrade Procedure:
  - Save a backup copy of panel database and then upgrade each node to V27
  - Download V27.5 bootloader application to panel (CPU2\_BOOT\_027\_000\_002.hex)
  - Download V27.5 service pack to panel (SPAK\_027\_050\_004.hex)
- Download panel database

**NOTE:** Software versions in the images within this document may vary and are not likely to indicate the current version (unless expressly stated)

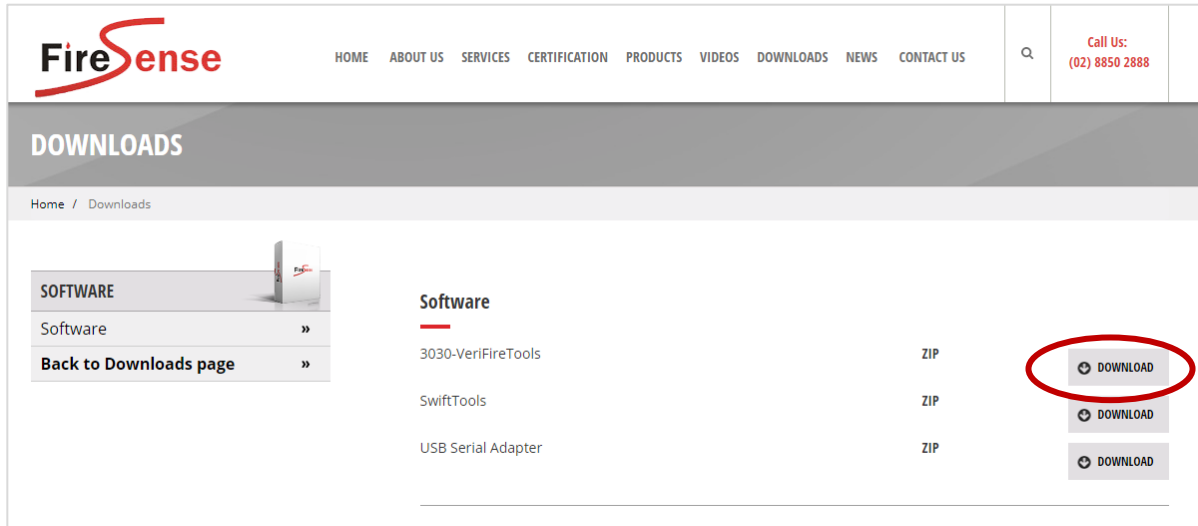
		NSW Head Office	Victoria Branch	Queensland Branch
FireSense Pty Ltd	Postal Address:	18-20 Brookhollow Ave	4/297 Ingles St	2/225 Queensport Rd Nth
ATF FireSense Trust		Baulkham Hills	Port Melbourne	Murarie
	PO Box 7026	NSW 2153	VIC 3207	QLD 4172
ABN: 11 720 788 915	Baulkham Hills BC			
	NSW 2153	Ph: (02) 8850 2888	Ph: (03) 9646 4557	Ph: (07) 3890 8842
www.firesense.com.au	Australia	Fax: (02) 8850 2999	Fax: (03) 9646 4558	Fax: (07) 3890 8894

## WALKTHROUGH

### INSTALLING VERIFIRE TOOLS / OPENING THE CONFIG DATABASE

**Step 1** A copy of VeriFire Tools & Firmware is supplied on a USB Drive with each FireSense AFP-3030 panel.

An alternative is to download from the Downloads section of [www.firesense.com.au](http://www.firesense.com.au).

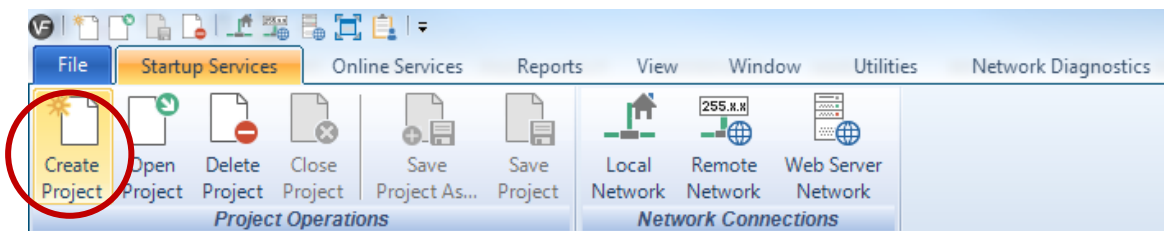


**Step 2** Install the current version of Verifire Tools (V10.57) as shown in the [‘VeriFire Tools Software Install Guide’](#) Document (also on Website / USB)

Click **‘NO’** at ‘Software Installation Step 2’ to ensure previous projects are not lost.

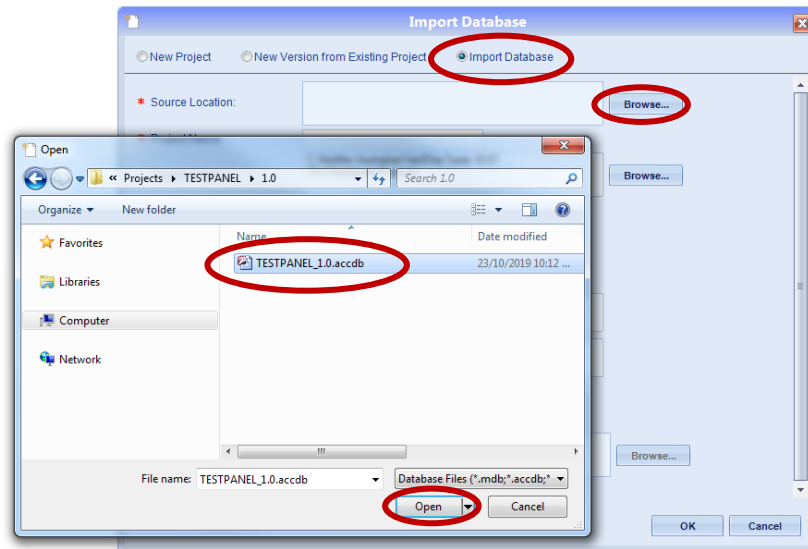
### CREATING A PROJECT

**Step 3** Open up Verifire Tools V10.57 and click ‘Create Project’.

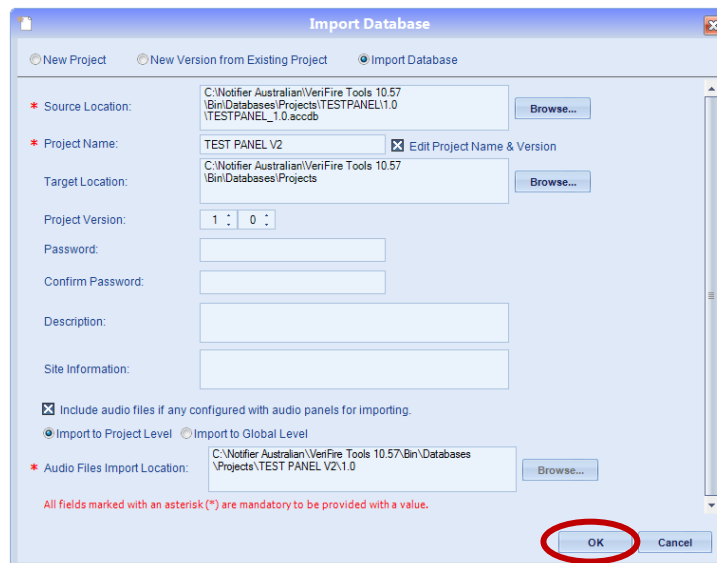


NSW Head Office		Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address: PO Box 7026 Baulkham Hills BC NSW 2153 Australia	18-20 Brookhollow Ave Baulkham Hills NSW 2153  Ph: (02) 8850 2888 Fax: (02) 8850 2999	4/297 Ingles St Port Melbourne VIC 3207  Ph: (03) 9646 4557 Fax: (03) 9646 4558
ABN: 11 720 788 915 <a href="http://www.firesense.com.au">www.firesense.com.au</a>			2/225 Queensport Rd Nth Murarrie QLD 4172  Ph: (07) 3890 8842 Fax: (07) 3890 8894

**Step 4** Click 'Import Database' and click Browse. Select the Config Database (.accdb) and click 'Open' (generally, a 'base' file will be supplied on a USB drive with the 3030 Fire Panel)



**Step 5** Once the Config Database has been selected, ensure the Project name is correct, and click 'OK'



		NSW Head Office	Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address:	18-20 Brookhollow Ave Baulkham Hills NSW 2153	4/297 Ingles St Port Melbourne VIC 3207	2/225 Queensport Rd Nth Murarrie QLD 4172
ABN: 11 720 788 915	PO Box 7026 Baulkham Hills BC NSW 2153 Australia	Ph: (02) 8850 2888 Fax: (02) 8850 2999	Ph: (03) 9646 4557 Fax: (03) 9646 4558	Ph: (07) 3890 8842 Fax: (07) 3890 8894
www.firesense.com.au				

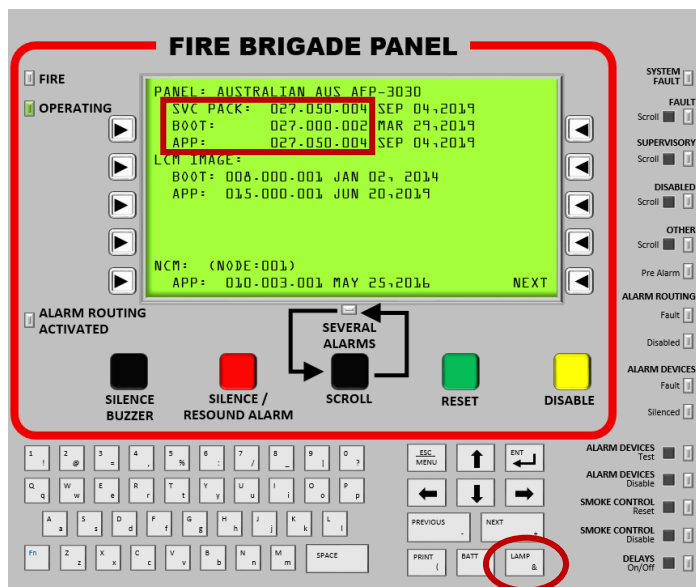
**Step 6** Modify the configuration of the panel as required.

Device ADDR	INSTL	Type Code Label	Flash Scan Type	Device Label	Alarm Ver. Part	Local Mode Part	PreAlarm Mode	Silenceable SMD Base	CBE 1	CBE 2	CBE 3
1	<input checked="" type="checkbox"/>	Smoke(Photo)	PHOTO	Detector L01D001	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	Alert	No	Z1		
2	<input checked="" type="checkbox"/>	Smoke(Photo)	PHOTO	Detector L01D002	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	Alert	No	Z2		

## CHECK PANEL FIRMWARE

**Step 7** On the 3030/NCA2 panel, press the 'Lamp' Test button (below 'Next' button) - Note that older versions require the button to be held.

After a few seconds, the panel will display what firmware it is currently running.



**Step 8** The current firmware in the panel should be 27.50.

- If the firmware is 27.50, skip the next steps and go to **Step 18** ([Download Panel Database](#)).
- If the firmware is 26.50 proceed onto the next steps to download the firmware supplied by FireSense but skip **Step 15** as there is no need to re-download the Bootloader (panel application code).
- If the firmware is less than 26.50, go to the next step to download the firmware supplied by FireSense.

**NOTE -** All new 3030 panels supplied after 01/11/2019 should be running Version 27.50 unless otherwise specified.

NSW Head Office		Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address: PO Box 7026 Baulkham Hills BC NSW 2153 Australia	18-20 Brookhollow Ave Baulkham Hills NSW 2153	4/297 Ingles St Port Melbourne VIC 3207
ABN: 11 720 788 915		Ph: (02) 8850 2888 Fax: (02) 8850 2999	2/225 Queensport Rd Nth Murarrie QLD 4172
www.firesense.com.au		Ph: (03) 9646 4557 Fax: (03) 9646 4558	Ph: (07) 3890 8842 Fax: (07) 3890 8894

## FIRMWARE UPDATE – TO VERSION 27.5

- A Service Pack download can be done to a single 3030 / multiple 3030s simultaneously **OR** a single NCA / multiple NCAs simultaneously (*Distributed Download cannot be done between a 3030 and an NCA*).
- The software will also load the relevant software into the LCMs / LEMs so these will need to be connected and programmed when the update is being performed.

If upgrading from an existing 2800, versions of the LCM/LEMs need to be checked. If this is the case, please contact FireSense Technical Support. (NOTE: LCM V7.00 cards are not upgradeable)

**NOTE:** Network sites require further consideration as there may be compatibility issues when upgrading all panels on site to Version 27.5. Certain panels may have incompatible hardware which cannot be upgraded. Please discuss with FireSense Technical Support to determine the best course of action.

**NOTE:** Version 27.5 software requires VeriFire Tools 10.57 or above.  
It is compatible with CPU2-3030PCD Rev D hardware and above.

**NOTE:** The bootloader and service pack download can take over 30 mins (depending on how many nodes / loops etc). Please be aware that the system will remain offline for this period.

**NOTE:** Upgrading to a different Version (eg. V26.5 to V27.5) requires some preparation of the configuration prior to upgrading the firmware within the panel. Please ensure that the password is known and that the existing software is on hand prior to downloading the new firmware!

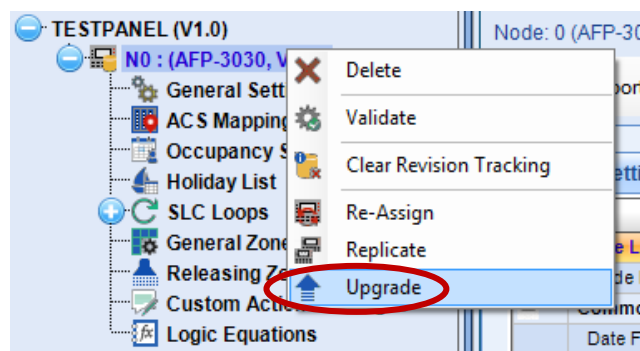
Failure to do so will leave the panel without a valid configuration as the existing configuration becomes invalid.

**IMPORTANT:** Do not disconnect the cable to the Fire Panel, OR allow the computer to turn off / go to standby OR for the Fire Panel to lose power during the firmware transfer

**Step 9** Make sure the panel password is known.

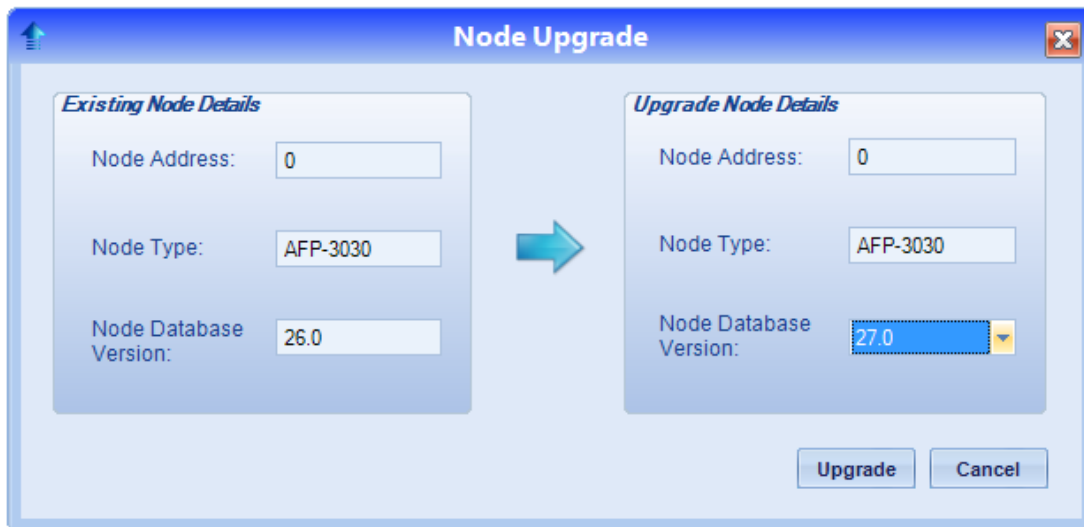
**Step 10** Save a copy of the panel database (*this ensures there's a previous version available should the original software be required.*) Upgrade each node's configuration by right-clicking on the Node and clicking 'Upgrade'.

(NOTE: Version 24.11 and earlier zone logic labels aren't stored in the panel and therefore won't be downloaded into the revised config).

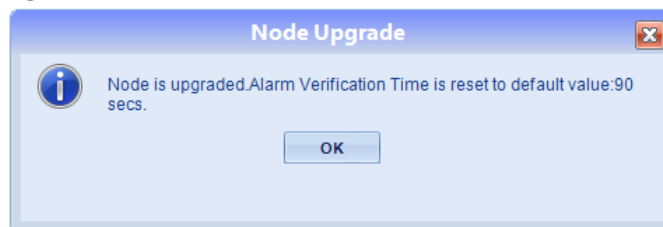


		NSW Head Office	Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address:	18-20 Brookhollow Ave Baulkham Hills NSW 2153	4/297 Ingles St Port Melbourne VIC 3207	2/225 Queensport Rd Nth Murarrie QLD 4172
ABN: 11 720 788 915	PO Box 7026 Baulkham Hills BC NSW 2153	Ph: (02) 8850 2888 Fax: (02) 8850 2999	Ph: (03) 9646 4557 Fax: (03) 9646 4558	Ph: (07) 3890 8842 Fax: (07) 3890 8894
www.firesense.com.au		Australia		

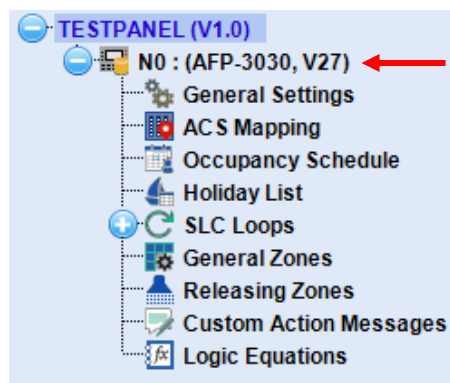
**Step 11** Click the drop down box to change the Database version to version 27.0.



**Please note:** When upgrading, any previous Alarm Verification Timers will be reset to the default value of 90s



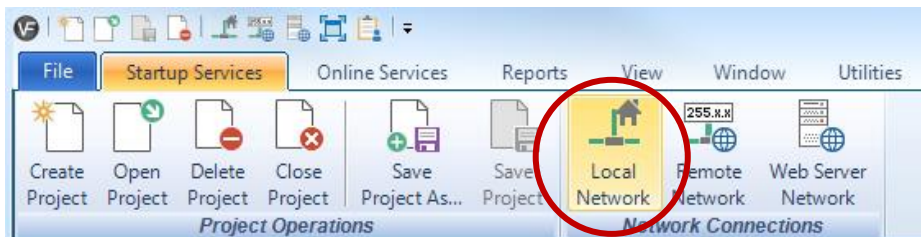
**Step 12** Perform this process for each node that is being upgraded. Each node's database version should indicate that it is now V27.X



*Now that the configuration(s) have been upgraded and a backup has been saved, the firmware can be downloaded into each node [either individually (via 3030/NCA2) or simultaneously by doing a Distributed Download (via the network card)]*

		NSW Head Office	Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address:	18-20 Brookhollow Ave Baulkham Hills NSW 2153	4/297 Ingles St Port Melbourne VIC 3207	2/225 Queensport Rd Nth Murarrie QLD 4172
ABN: 11 720 788 915	PO Box 7026 Baulkham Hills BC NSW 2153	Ph: (02) 8850 2888 Fax: (02) 8850 2999	Ph: (03) 9646 4557 Fax: (03) 9646 4558	Ph: (07) 3890 8842 Fax: (07) 3890 8894
<a href="http://www.firesense.com.au">www.firesense.com.au</a>	Australia			

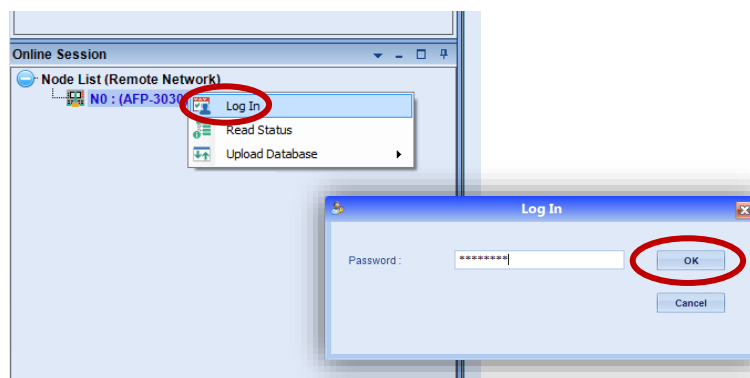
**Step 13** Connect to the panel by clicking 'Local Network'



**Step 14** Click on the Node in the 'Online Session' window. Right click on the node and select 'Login'.

Enter the Panel Password (The default Password is eight zeros – i.e. '00000000').

Click 'OK'.



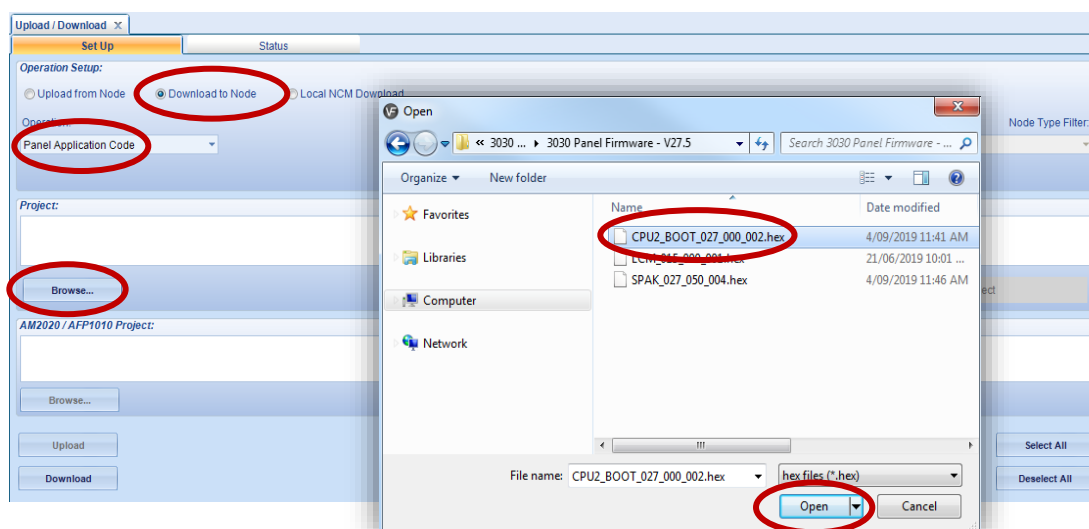
## DOWNLOAD CPU2 BOOTLOADER APPLICATION TO PANEL

**Step 15** Select 'Download to Node'.

Select 'Panel Application Code' from the dropdown list.

On 'Project', click, 'Browse'. Select the Boot File supplied (.hex) and click 'Open'.

The Boot File can be found on USB supplied, or via the Downloads section of [www.firesense.com.au](http://www.firesense.com.au)

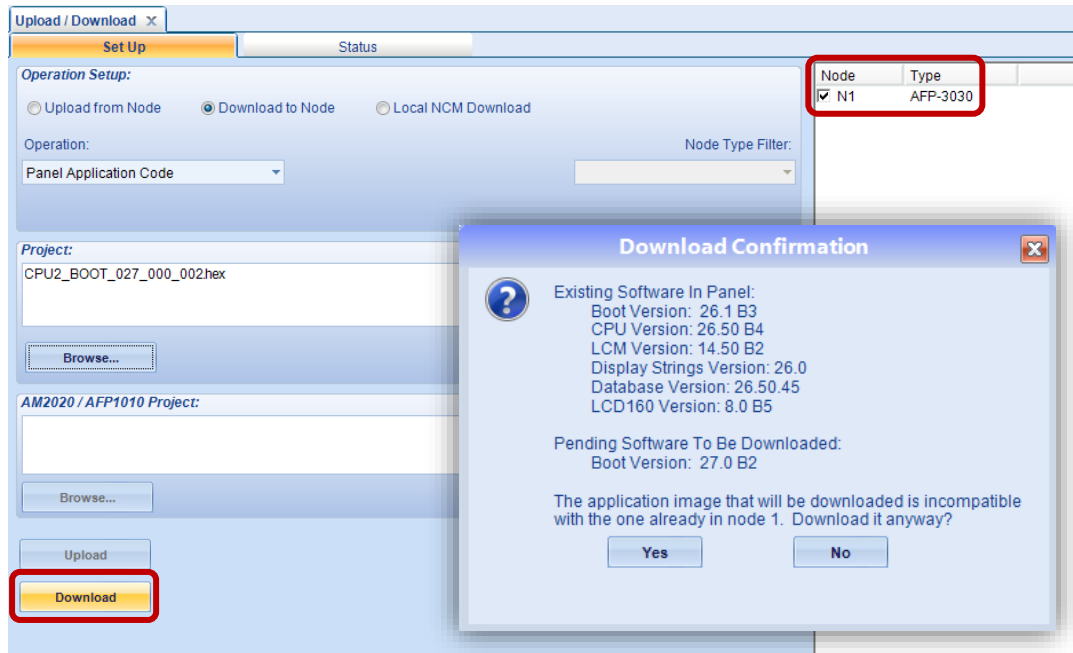


NSW Head Office		Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address: PO Box 7026 Baulkham Hills BC NSW 2153 Australia	18-20 Brookhollow Ave Baulkham Hills NSW 2153	4/297 Ingles St Port Melbourne VIC 3207
ABN: 11 720 788 915		Ph: (02) 8850 2888 Fax: (02) 8850 2999	2/225 Queensport Rd Nth Murarrie QLD 4172
<a href="http://www.firesense.com.au">www.firesense.com.au</a>		Ph: (03) 9646 4557 Fax: (03) 9646 4558	Ph: (07) 3890 8842 Fax: (07) 3890 8894



**Step 16** Once the file has been selected, select the panels which require updating, then click 'Download.'

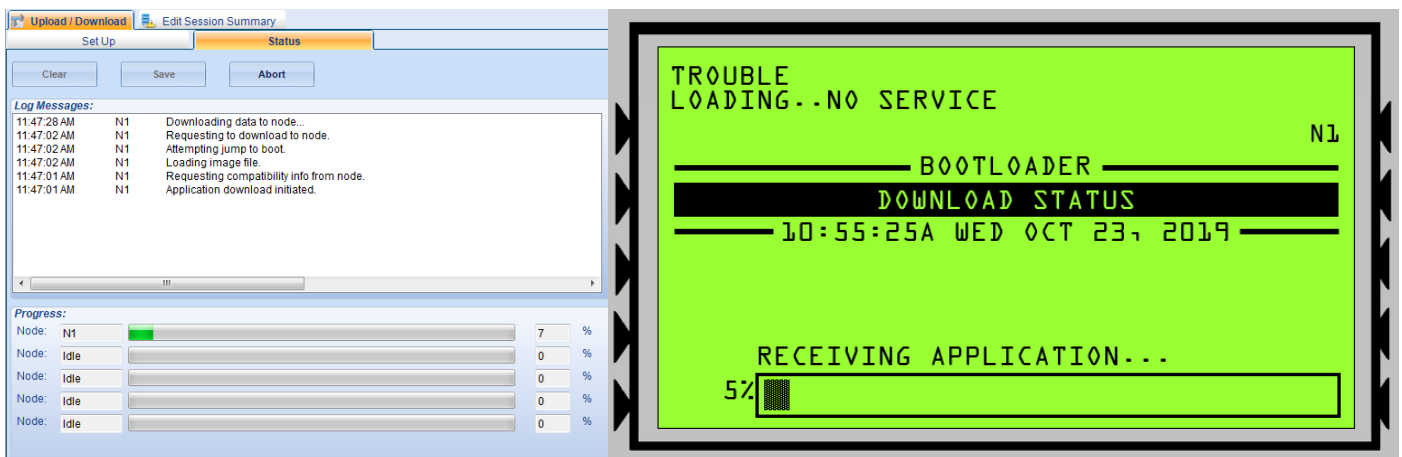
A confirmation screen will indicate that the software is not compatible, and



The file transfer will commence.

**NOTE:** The bootloader application download takes approx. 10-15mins

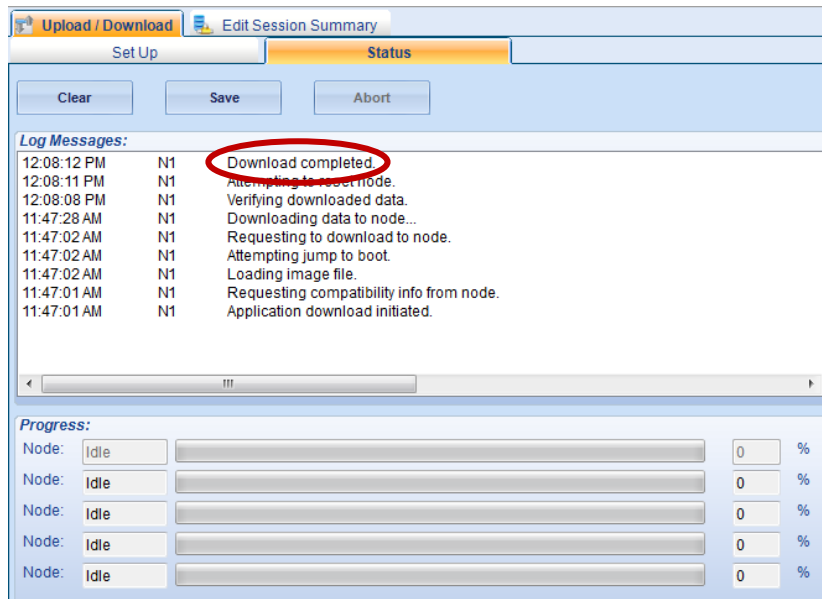
**IMPORTANT:** Do not disconnect the cable to the Fire Panel, or allow the computer to turn off / go to standby OR for the Fire Panel to lose power during the firmware transfer.



		NSW Head Office	Victoria Branch	Queensland Branch
FireSense Pty Ltd	Postal Address:	18-20 Brookhollow Ave	4/297 Ingles St	2/225 Queensport Rd Nth
ATF FireSense Trust		Baulkham Hills	Port Melbourne	Murarie
	PO Box 7026	NSW 2153	VIC 3207	QLD 4172
ABN: 11 720 788 915	Baulkham Hills BC			
	NSW 2153	Ph: (02) 8850 2888	Ph: (03) 9646 4557	Ph: (07) 3890 8842
www.firesense.com.au	Australia	Fax: (02) 8850 2999	Fax: (03) 9646 4558	Fax: (07) 3890 8894

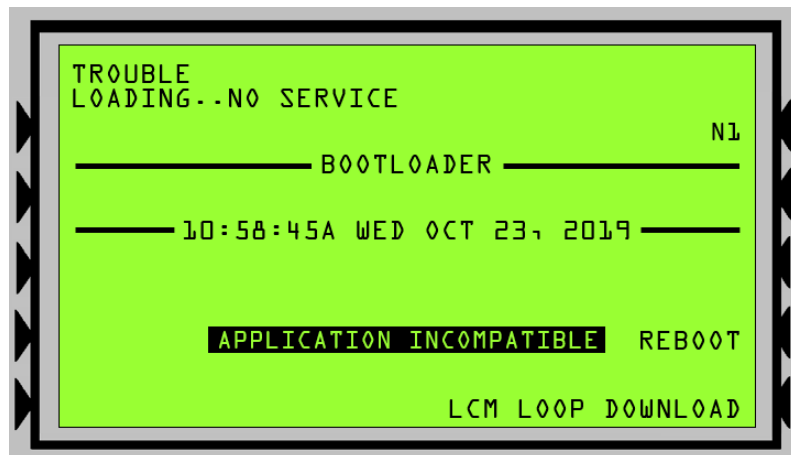


When the file transfer has finished, the Log will show that the Download has completed.



The panel will then continue to update the various components on its own.

Once complete, the panel screen will show 'Application Incompatible'. At this point, proceed to the next step.



**NOTE: For 3030 CPU's without a display, the fault 'N# Loading – No Service...' will be present on the NCA.**

**Wait until the node appears in the online session in Verifire Tools before proceeding.**

		NSW Head Office	Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address:	18-20 Brookhollow Ave Baulkham Hills NSW 2153	4/297 Ingles St Port Melbourne VIC 3207	2/225 Queensport Rd Nth Murarrie QLD 4172
ABN: 11 720 788 915	PO Box 7026 Baulkham Hills BC NSW 2153	Ph: (02) 8850 2888 Fax: (02) 8850 2999	Ph: (03) 9646 4557 Fax: (03) 9646 4558	Ph: (07) 3890 8842 Fax: (07) 3890 8894
<a href="http://www.firesense.com.au">www.firesense.com.au</a>	Australia			

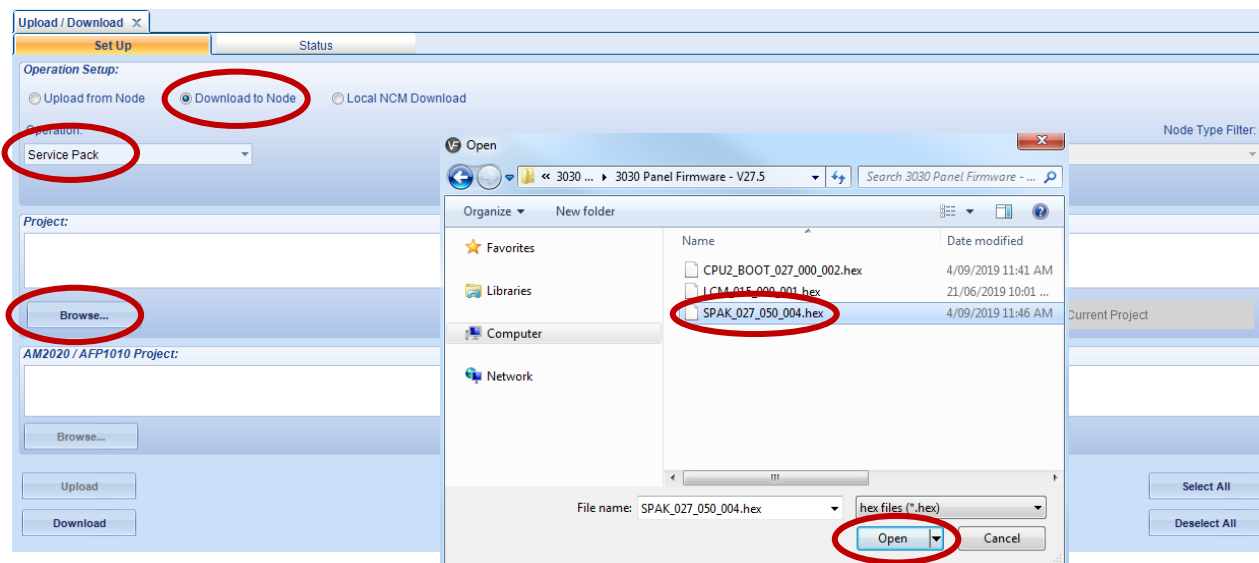
## DOWNLOAD SERVICE PACK 27.5 TO PANEL

**IMPORTANT:** When upgrading the panel's service pack, the Loop cards must be connected prior to doing the download.

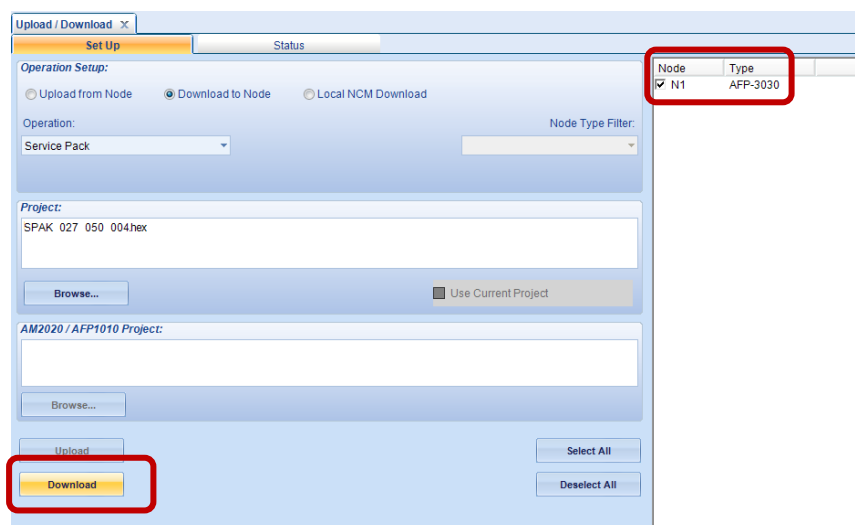
If the loops are added in after, a 'Hardware Mismatch' will be displayed as the firmware versions will not be up to date. This is especially important for CPU's which do not have a display, as the 'Hardware Mismatch' cannot be seen and the user will not understand why the panel hasn't rebooted.

**Step 17** Select 'Download to Node', then from the drop-down list, select 'Service Pack'.  
Click 'Browse' to select the Firmware File (.hex).  
Select the Service Pack that has been provided and click 'Open'

The Service Pack 27.5 can be found on USB supplied, or via the Downloads section of [www.firesense.com.au](http://www.firesense.com.au)



Once the file has been selected, select the panels which require updating, then click Download.

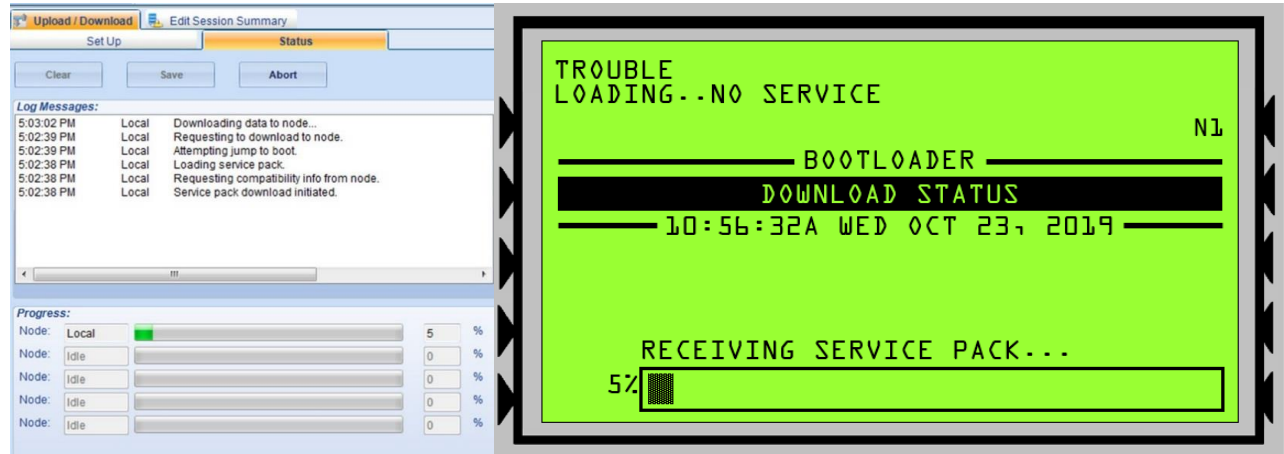


NSW Head Office		Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address: PO Box 7026 Baulkham Hills BC NSW 2153 Australia	18-20 Brookhollow Ave Baulkham Hills NSW 2153  Ph: (02) 8850 2888 Fax: (02) 8850 2999	4/297 Ingles St Port Melbourne VIC 3207  Ph: (03) 9646 4557 Fax: (03) 9646 4558
ABN: 11 720 788 915 <a href="http://www.firesense.com.au">www.firesense.com.au</a>			2/225 Queensport Rd Nth Murarrie QLD 4172  Ph: (07) 3890 8842 Fax: (07) 3890 8894

The file transfer will commence.

**NOTE:** The service pack download takes approx. 10-15 mins (depending on how many loops etc).

**IMPORTANT:** Do not disconnect the cable to the Fire Panel, OR allow the computer to turn off / go to standby OR for the Fire Panel to lose power during the firmware transfer

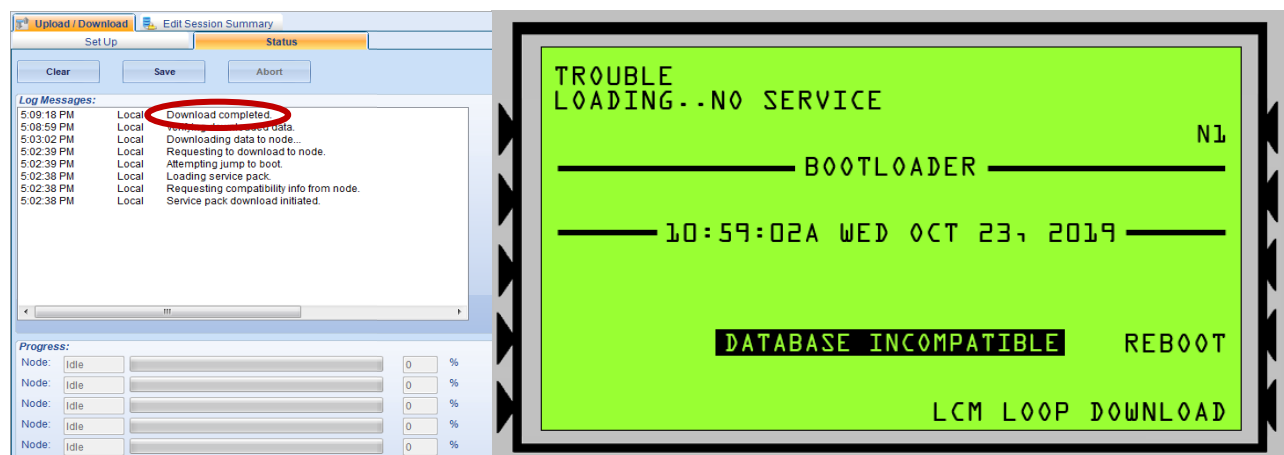


When the file transfer has finished, the Log will show that the Download has completed.

Once the Download has completed, the laptop can be disconnected.

The panel will then continue to update the various components on its own.

Once each panel's firmware has been updated, the panel will reboot and display 'Database Incompatible'. The configuration then needs to be re-downloaded into the respective panel(s) – proceed to the next step.

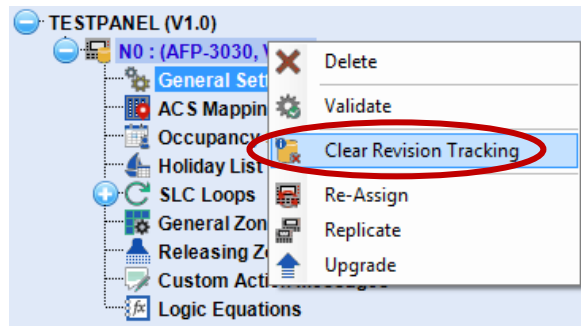


**NOTE:** For CPU's without a display, the fault 'N# Loading – No Service...' will be present on the NCA. Wait until the node appears in the online session in VeriFire Tools before proceeding.

		NSW Head Office	Victoria Branch	Queensland Branch
FireSense Pty Ltd	Postal Address:	18-20 Brookhollow Ave	4/297 Ingles St	2/225 Queensport Rd Nth
ATF FireSense Trust		Baulkham Hills	Port Melbourne	Murarie
	PO Box 7026	NSW 2153	VIC 3207	QLD 4172
ABN: 11 720 788 915	Baulkham Hills BC			
	NSW 2153	Ph: (02) 8850 2888	Ph: (03) 9646 4557	Ph: (07) 3890 8842
www.firesense.com.au	Australia	Fax: (02) 8850 2999	Fax: (03) 9646 4558	Fax: (07) 3890 8894

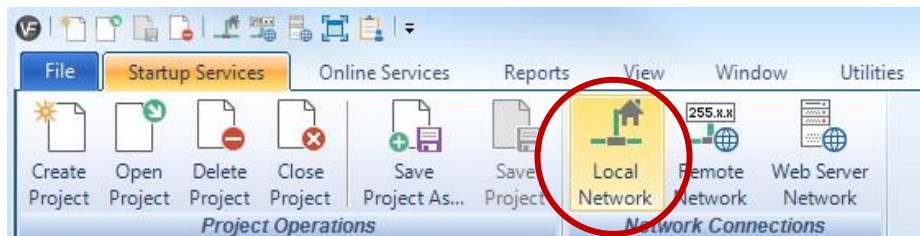
## DOWNLOAD PANEL DATABASE

**Step 18** The 'Revision Tracking' will need to be cleared to allow the file to be transferred – To do this, right click on the Node ('NO') in the 'Edit Session' window and 'Clear Revision Tracking'.



(This feature prevents downloading an older / different config inadvertently.  
Please refer to the 'Revision Tracking' Document (also on USB) for additional information.)

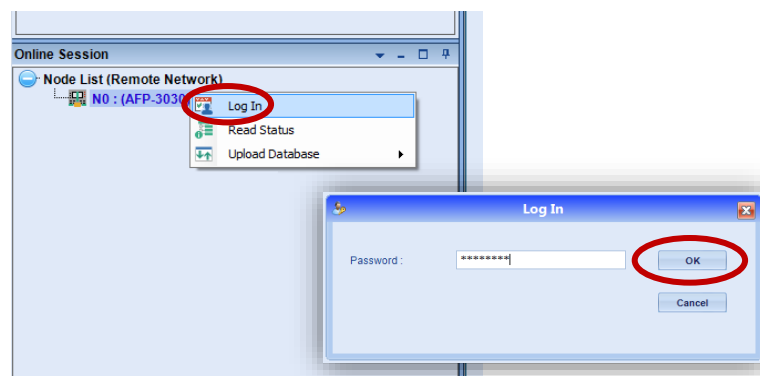
**Step 19** Connect to the panel by clicking 'Local Network'.



Click on the Node in the 'Online Session' window. Right click on the node and select 'Login'.

Enter the Panel Password (The default Password is eight zeros – i.e. '00000000').

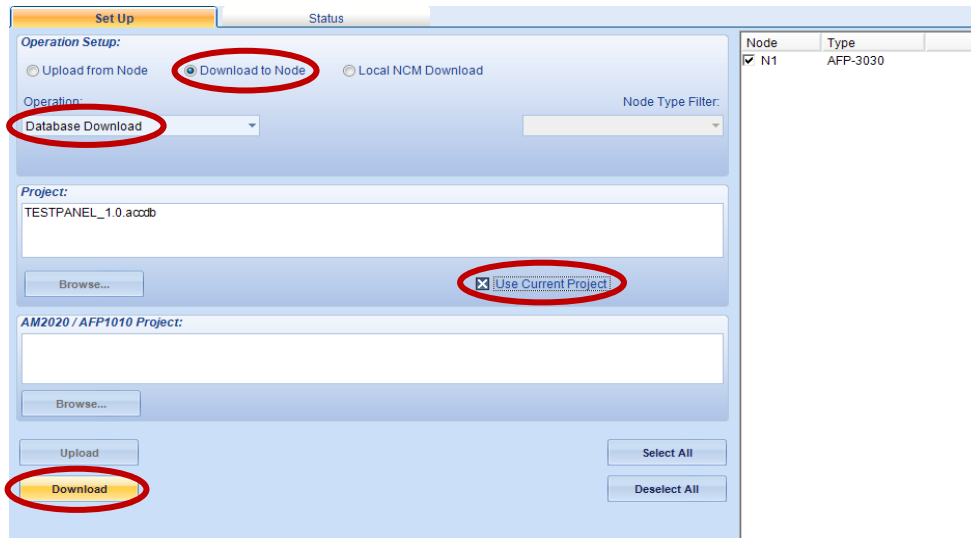
Click 'OK'.



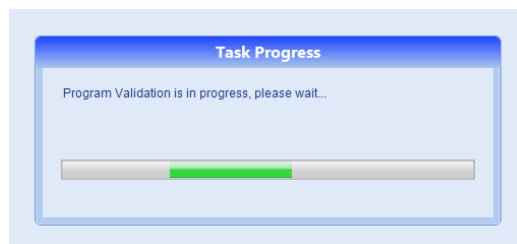
		NSW Head Office	Victoria Branch	Queensland Branch
FireSense Pty Ltd	Postal Address:	18-20 Brookhollow Ave	4/297 Ingles St	2/225 Queensport Rd Nth
ATF FireSense Trust		Baulkham Hills	Port Melbourne	Murarie
		NSW 2153	VIC 3207	QLD 4172
ABN: 11 720 788 915	PO Box 7026	Ph: (02) 8850 2888	Ph: (03) 9646 4557	Ph: (07) 3890 8842
	Baulkham Hills BC	Fax: (02) 8850 2999	Fax: (03) 9646 4558	Fax: (07) 3890 8894
www.firesense.com.au	NSW 2153			
	Australia			

**Step 20** Select 'Download to Node' then select 'Database Download' from the drop-down menu.

Click 'Browse' to select a particular database file, or select 'Use Current Project' (if the config is already open). Click 'Download'.



The Validation Tool will then confirm the file is OK prior to downloading to the panel



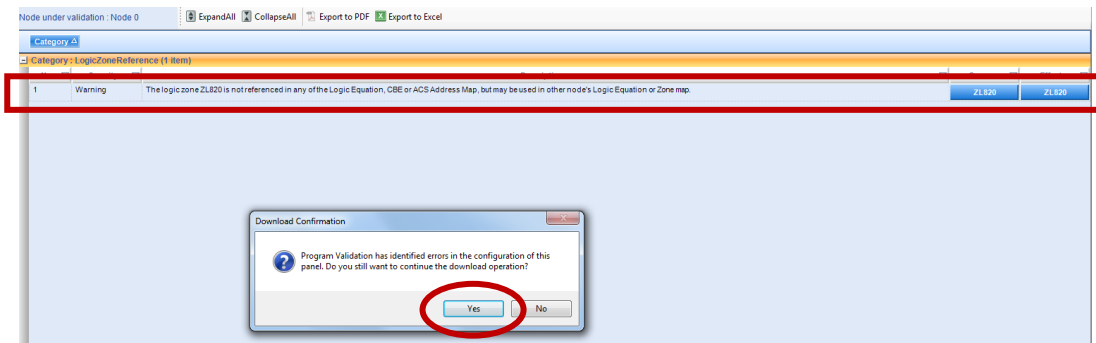
**Please note:** The Validation Tool may pick up some errors and come up with a notification: "Program Validation has identified errors in the configuration of this panel".

It may bring up some Warnings / Errors such as "The detector L1D1 does not turn on an output through general zone Z1" OR "The logic zone is not referenced..." etc.

Some of these 'issues' aren't a problem – the validation tool is just highlighting that additional functionality may have not been added. Review the list to confirm that the identified warnings / errors are acceptable. If so, click 'Yes' to continue downloading.

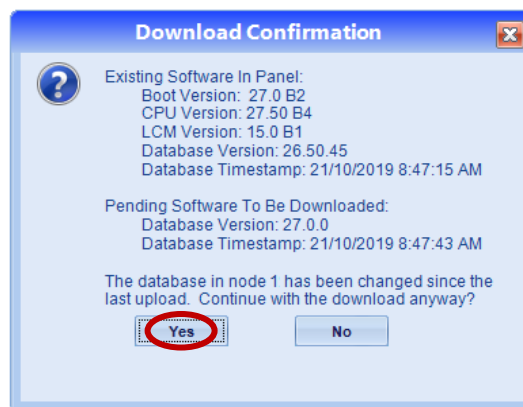
		NSW Head Office	Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address:	18-20 Brookhollow Ave Baulkham Hills NSW 2153	4/297 Ingles St Port Melbourne VIC 3207	2/225 Queensport Rd Nth Murarrie QLD 4172
ABN: 11 720 788 915	PO Box 7026 Baulkham Hills BC NSW 2153	Ph: (02) 8850 2888 Fax: (02) 8850 2999	Ph: (03) 9646 4557 Fax: (03) 9646 4558	Ph: (07) 3890 8842 Fax: (07) 3890 8894
www.firesense.com.au	Australia			

**\*\*If the Validation Tool finds a critical 'error' the database may not be able to download to the panel. Please check the config is correct and after fixing the issues, try downloading again.\*\***

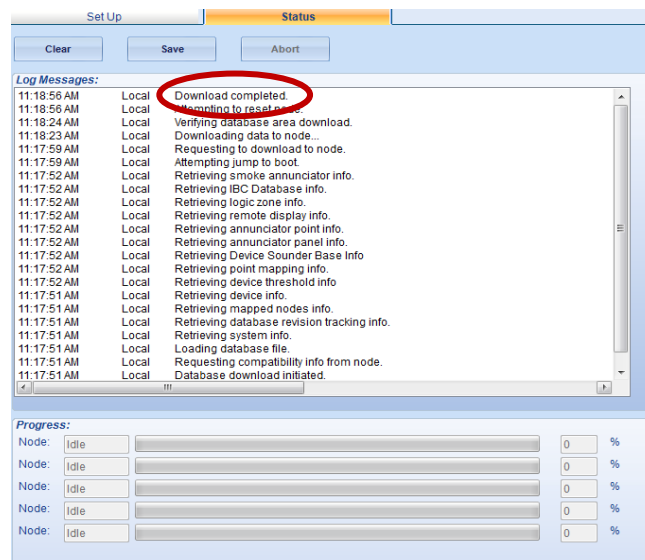


If this is the first time a program is being downloaded to the panel, the Downloader may see a discrepancy between the existing config and the new config. This is OK. Click 'Yes' to Continue.

If this is an existing panel, ensure that the latest version of the config is being used to avoid overwriting changes made by another technician.



The file transfer will begin.



The system will then automatically reboot.

**The firmware in the panel has now been upgraded to V27.5.**

NSW Head Office		Victoria Branch	Queensland Branch
FireSense Pty Ltd ATF FireSense Trust	Postal Address:	18-20 Brookhollow Ave Baulkham Hills NSW 2153	4/297 Ingles St Port Melbourne VIC 3207
ABN: 11 720 788 915	PO Box 7026 Baulkham Hills BC NSW 2153	Ph: (02) 8850 2888 Fax: (02) 8850 2999	2/225 Queensport Rd Nth Murarrie QLD 4172
www.firesense.com.au	Australia	Ph: (03) 9646 4557 Fax: (03) 9646 4558	Ph: (07) 3890 8842 Fax: (07) 3890 8894