

GUIDE

Who is this guide for

This guide is intended for the user who has physical access to the Kaleido series and as basic knowledge of this type of equipment.

What is this guide for

This document will guide you with a step by step procedure to update the firmware of your KaleidoX series (Kx) with extra precautions to take because your system has experienced some sort of issue.

What will I need to perform the UPDATE

- Physical access to the Kaleido Frame
- Access to a Microsoft Windows Computer
- 1 USB Stick (1 gig minimum)
- The latest firmware from Grassvalley support.
- Custom KaleidoX software to prepare the USB stick
- SSH program like PuTTY

What is this Custom KaleidoX software doing?

The program will upgrade the copy and setup file on a USB memory stick that you will then use in the Kaleido-X series USB connector in order to upgrade to the latest firmware.

The procedure implies the use of 2 files.

Firmware file “.os” type in a zip file (You will need to uncompress it)

Program to prepare a USB key to push the firmware into the KaleidoX firmware will automatically propagate it to the other cards.

What else is needed before I proceed with the upgrade?

The Kx board inside the frame will need a minimum of 2 gigs of RAM to be able to be updated with the newest firmware.

To get this information you can connect through “ssh” using software like “PuTTY” into each output card using their IP addresses.

Then use the command line “cat /proc/meminfo” to get the RAM memory info.

Backup your database.

How much down time should I expect?

Be prepared for a 5 minutes shutdown window when you decide to use the reboot button that will show on the kaleido screen at the end of the firmware update. The reboot button will show up after the firmware is completely integrated in the memory.

20-35 minutes is needed between every card Updating

All important information is also displayed in the main screen of the Kaleido in a kind of dashboard on the lower left corner.

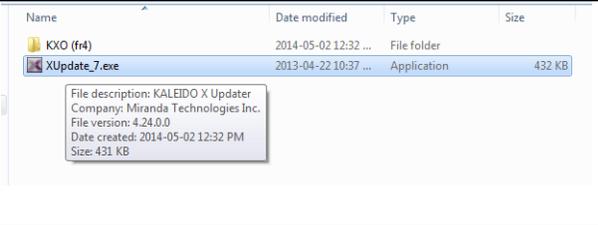
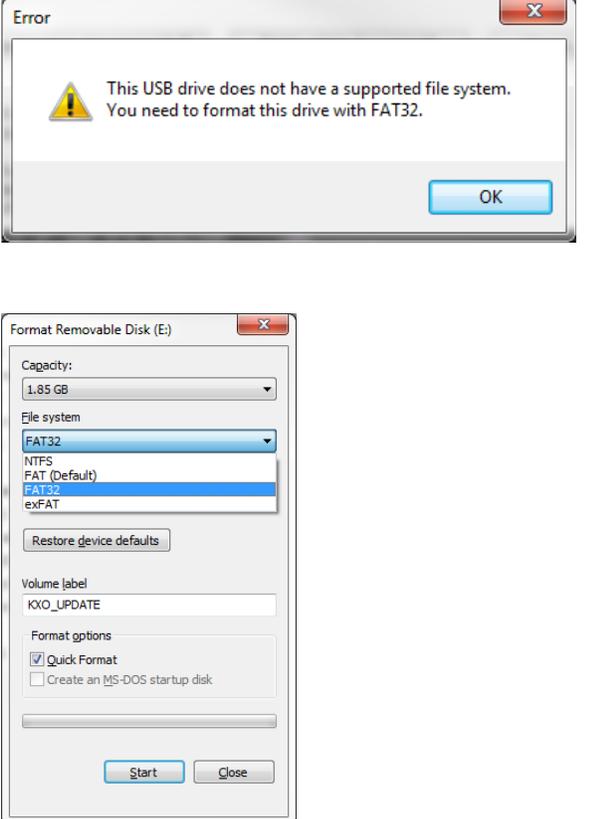
Why do I need to upgrade?

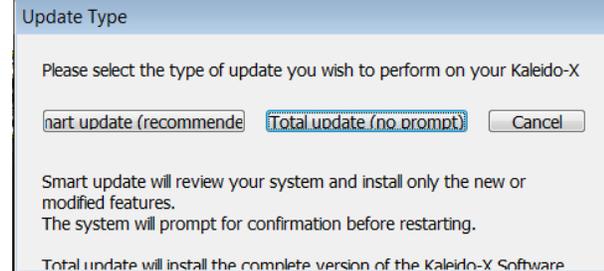
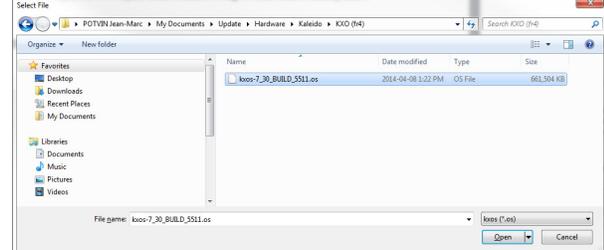
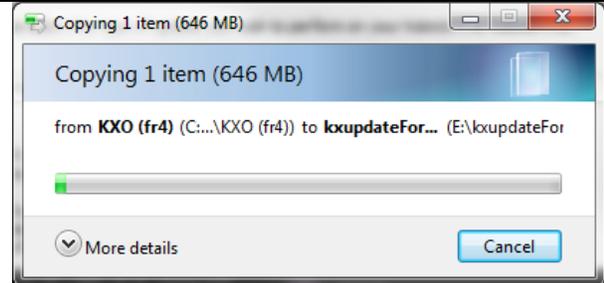
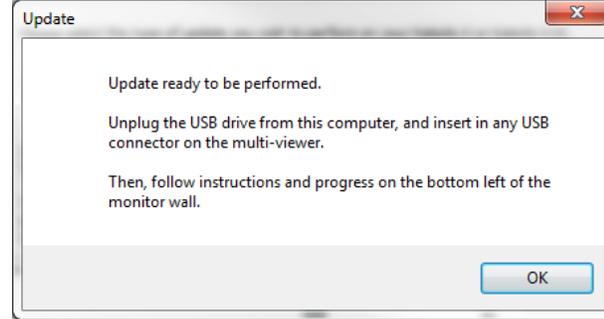
If you have to replace a broken board with a newer one.

If you want to follow up with newest technologies brake through.

If you want to overpass certain limitation or bug firmware version related problem.

Step by step procedure?

Step by step procedure to create the firmware usb key for KaleidoX series	
<p>1. Copy the files needed for the update from the GrassValley FTP link to a Windows machine. (We will be using a windows software later on) (Call GrassValley support to get the ftp link).</p>	
<p>2. Insert a USB flash drive in to one of the PC's USB ports. <i>If you have to format the drive use Fat32</i></p>	

<p>3. Locate and double-click on the Kaleido-X Upgrade Manager application (It has a filename of the form "XUpdate7.exe"):</p> <p>4. When the Welcome screen appears, click on the type of kaleido that you would like to upgrade (Kaleido-X in your case)</p>	
<p>5. When prompted to select a type of update, click "Total Update / no Prompt".</p> <p>Note: If you click Forced Update (no prompt), then the update procedure, once initiated, cannot be aborted.</p>	
<p>6. When prompted to select an update file, Browse to the Miranda folder that you have created on the desktop in step1 locate and double-click on the Kaleido-X operating system file. ("kxos-7_30_BUILD_5511.os"): <i>You may need to uncompress the file first</i></p>	
<p>7. The .os file will be copied to the USB drive. This may take a few minutes.</p>	
<p>8. When the copying process is finished, a confirmation message appears. Click OK:</p>	
<p>9. Click Exit on the Welcome screen.</p> <p>END OF Step by step procedure to create the firmware usb key for KaleidoX series</p>	

You are ready to perform the update on your Kaleido.

What should I do before updating the Kaleido system

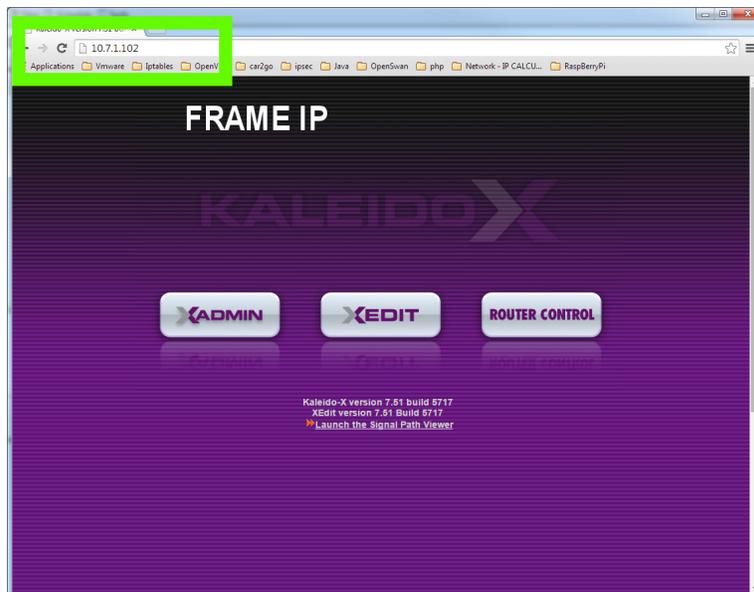
- Find out which output card is the **MASTER CARD**
- In a frame 7 if the **MASTER CARD** is not the “D” then make sure it is by resetting the card one by one in the XADMIN until the D becomes the Master
 - o Each time you will reset a master card the MASTER will be transfer to another one... Do reset to card until MASTER goes to “D” slot.



What is Xadmin

XADMIN is a complete set of webpages that allows you to configure and query information from your Kaleido Frame. The Xadmin is actually part of the Master Output card found inside the Flashcard that is running the firmware.

Newer version of XADMIN use “<https://>”.



PRECAUTION update procedure step by step

Please note that a power failure during this procedure or stopping the procedure in the middle of an upgrade may cause permanent issue on the whole system like data loss or unable to bring the system back up.

Do not power down the Frame from now on, unless the system does it by itself.

Go physically the frame.

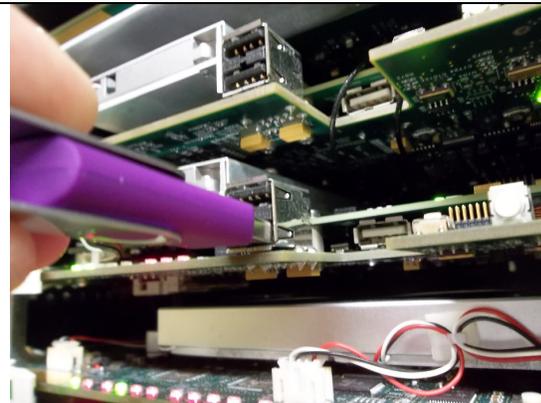
Before connecting the USB key to the Kaleido Master OUTPUT CARD

- Look for your MASTER CARD make sure led from status and cpu are solid green
- Slide out to disconnect all card (including GPI)
- If you have a FR14 do not unseat the “KXE” expansion card.

You now only have **one OUTPUT card connected** to the frame (and Expansion if you have an FR14).

Connect the USB key to one of the available USB Connector in the only KXO card seated (connected) in your Frame.

Go back to the monitor wall or the Kaleido screen.

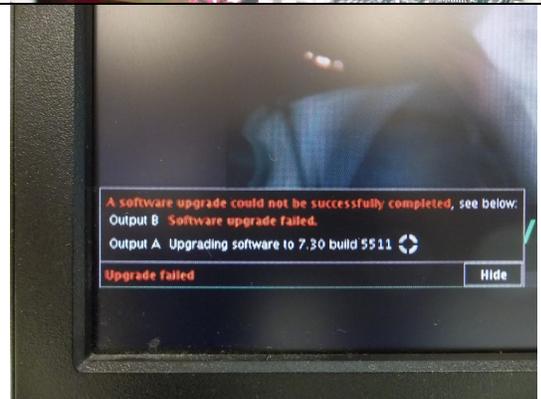


Follow the instructions and the Progress at the bottom left corner of your monitor wall.

Once you have success for the MASTER output card. You can take back your USB stick.

Now push into slot until connected all the Output cards one by one **WAITING** the **success** message from the monitor wall **before pushing the next one.**

After all the output card are successfully updated, do the same thing for the **INPUT cards** one by one waiting for the success message before pushing the next one in the frame.



END OF step by step PRECAUTION update procedure.

Worst case scenario?

Very rarely but these things happens...

YOU DON'T HAVE A DATABASE BACKUP!

THE FIRWARE UPDATE STOP IN THE MIDDLE BECAUSE OF POWER FAILURE OR BECAUSE OFF MANIPULATION ERROR (USB DEFECT, OR UNPLUGING BEFORE END OF PROCESS

Worst case scenario can have your system offline for long hours... 24-48 maybe more if very complicated layouts have been lost.

What to do in a worst case scenario?

Call Grass Valey Support Line, they will send you an image file to reimage the memory Card on the board. We can also produce a new image file directly on a memory card and have it send to you.

This image is a image type file using "img" format from GNU Project compatible with : [RaWrite](#) & [RaWrite2](#), [RawWrite for Windows](#), and [WinRawrite](#). The img format is used in many type of virtualization and reimaging software like :

- [Microsoft Virtual Machine](#)
- [Microsoft Virtual Server](#)
- [QEMU](#)
- [VirtualBox](#)
- [WinImage](#)
- [Nero Burning ROM.](#)
- Usb Toolls

And others

PS :

Nothing can be done for database loss
You will be left having to use the default one.
DATABASE contains layout and all the hard work information put in by the Kaleido user to personalise your input to output environment.

If you want information about the latest release you should consult the document that Grassvalley support will have attached with the upgrade or image file that they will provide.

Enjoy your new kaleido features!