

How to build your own CallGenie Appliance



How to build your own CallGenie appliance using parts readily available on e-commerce sites such as Amazon.

Even though we need you to purchase the hardware yourself and set up the mini PC, callGenieUSA will support you through every step in the process to get your CallGenie Appliance running for the end user. We do, however, ask that you are reasonably computer literate, and you know what a USB port and an HDMI cable are.

Shopping List

Building your own CallGenie appliance isn't that hard if you have some basic understanding of PCs and are happy to shop online for the hardware required. The following is a list of components we recommend for customers, and it will show everyone else what's required so you can source the hardware in your own country.

It includes the following items:

- Mini PC with Auto Power On capability
- Webcam (connects via USB)
- HDMI-CEC adapter(connects via USB)
- Infrared receiver/transmitter (connects via USB)
- [CallGenie Software](#)

CallGenie Shopping List

The following is the current recommended list of parts to buy if you want to build your own callGenie appliance. All the parts can be bought from the manufacturers' websites. Please note that you should search online to find the best deal, some vendors include a warranty and some charge for extended warranty.

Hardware

- Beelink Mini S N5095 Mini PC, 8GB RAM/128GB Storage – [buy here](#)
- Webcam (choose one from):
 - – Logitech C270 HD Webcam – [buy here](#)
 - – Logitech C310 HD Webcam – [buy here](#)
 - – Logitech C505 HD Webcam – [buy here](#)
 - – Logitech C922 Full HD Webcam – [buy here](#)
 - – Logitech C930 Full HD Webcam – [buy here](#)
 - – Logitech Brio 300 Full HD Webcam – [buy here](#)
 - – Logitech Brio 500 Auto-Framing Full HD Webcam – [buy here](#)
 - – Logitech Brio 4K Webcam – [buy here](#)
- Pulse-Eight USB-CEC Adapter – [buy here](#)
- Flirc USB IR V2 – [buy here](#)
- StarTech weighted USB Extender – [buy here](#) or unweighted USB Extender [buy here](#)

Please note that:

1. We are not compensated in any way providing you the above links
2. These links may not be the best price or shipping time for you.
3. These links may change or be outdated (please let us know so we can fix that!)

Software

- CallGenie Software – [buy here](#)

Support

CallGenie Software includes installation support for single end-user install of CallGenie as well as 12 months support via email, phone, text or remote access. callGenieUSA will remotely support you with setting up the mini PC, installing the software and configuring the appliance to work with the end user's television.

callGenieUSA will provide you with a Hardware Installation Guide to help you attach all the peripherals. Any driver software required will be installed by callGenieUSA at the same time as the CallGenie Software is installed.

Setting Up the Mini PC

Once you have all the hardware in place we just need you to connect the mini PC to a monitor or television (using the HDMI cable) and attach a USB keyboard and mouse. If you don't have a keyboard and mouse handy you might consider buying a [Logitech K400+ Touchpad Keyboard](#).

In the BIOS setup of the PC, enable the "Auto Power On" feature.

Do not connect to the internet, yet. Ignore the instructions during the setup to connect to your WiFi or plug in an ethernet cable.

Power up the mini PC and it will start to run you through Windows setup. After you have selected your keyboard layout, ignore the invitation to connect the mini PC to the internet, and you will be prompted to set up a local user account. Call this user “callGenie” and leave the password blank (this will allow CallGenie to be automatically logged in at power up from now on).

If you are asked to create a Microsoft account, do not! ignore this and any other software asking you to log in, create an account, save your history etc.

To complete setup answer “No”, “Skip” or “Not Now” to every option presented to you when/if it appears.

Once Windows has finished its setup, and the pc has been logged in as “callGenie” the local user, you then connect the mini PC to the internet. For best performance, you should use an ethernet cable from the broadband/cable router to the mini PC. If that’s not possible you can connect using WiFi – click on the Network icon in the System Tray (bottom righthand corner of the screen by default), choose your WiFi station and then enter the WiFi password.

Open the “Edge” browser (click to configure then cancel the configure window which gets you out of creating an account), and enter “AnyDesk.com” in the search or address bar. Navigate to this website and click on the download button (it is rather large). Open the downloaded file (you will have to answer yes to Allow this software from an unknown publisher to run”). Once it has finished, find the link that reads “Install this software on this PC” and click to run, again you will have to answer yes to the user account control “allow this software from an unknown publisher to run”) and let it finish. Once it is finished, click on new session on the top menu bar and record the numbers following “Your Address”. callGenieUSA will need these numbers to remotely connect and assist configuring your callGenie software.

Now you are ready for callGenieUSA to help you with the rest of the installation. We will install all additional software and updates for you remotely.

Installation Service

The remainder of the installation and configuration can be performed by callgenieUSA via the remote access software.

If you prefer to do the installation yourself, please use the following instructions.

Self-Installation Instructions

Pre-requisite Software

The following software needs to be installed on the mini PC for CallGenie to work:

- [Windows](#) 11 Pro Version 22H2 or higher
- [Pulse Eight LibCEC 6.0.2](#)
- [Flirc USB 3.26.0 w/ firmware 4.9.3](#)

Requesting a Software License

Once you have placed an order for CallGenie Software, you may request your software license which will be sent to you in an email. We will need the MAC address of your mini PC's ethernet (not Wi-Fi) adapter before we can generate the license key.

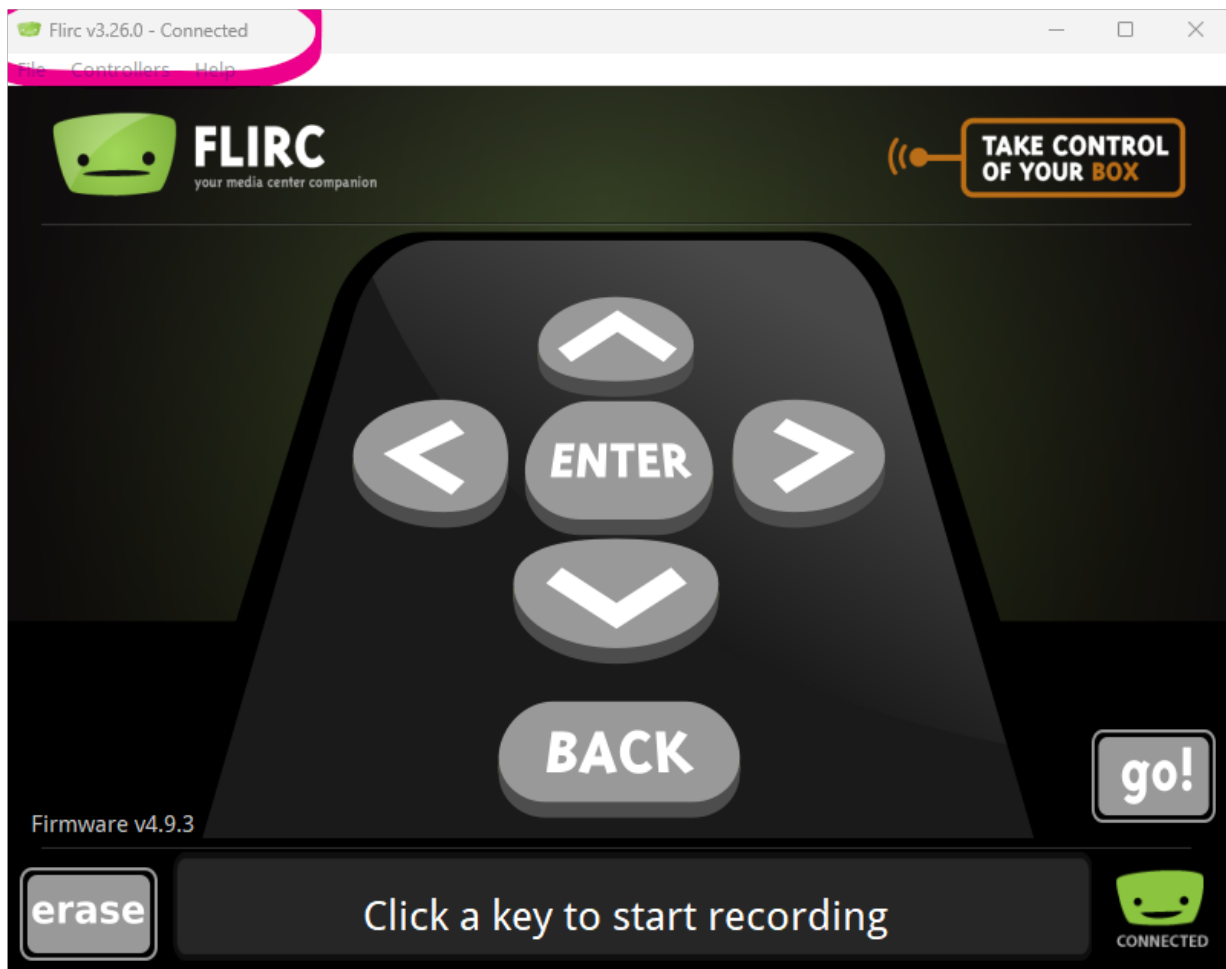
Configuring CallGenie with the End User's Television

As with the CallGenie appliances supplied in the USA/Canada, callGenieUSA will support you remotely to install and configure the appliance to work with the end-user's television.

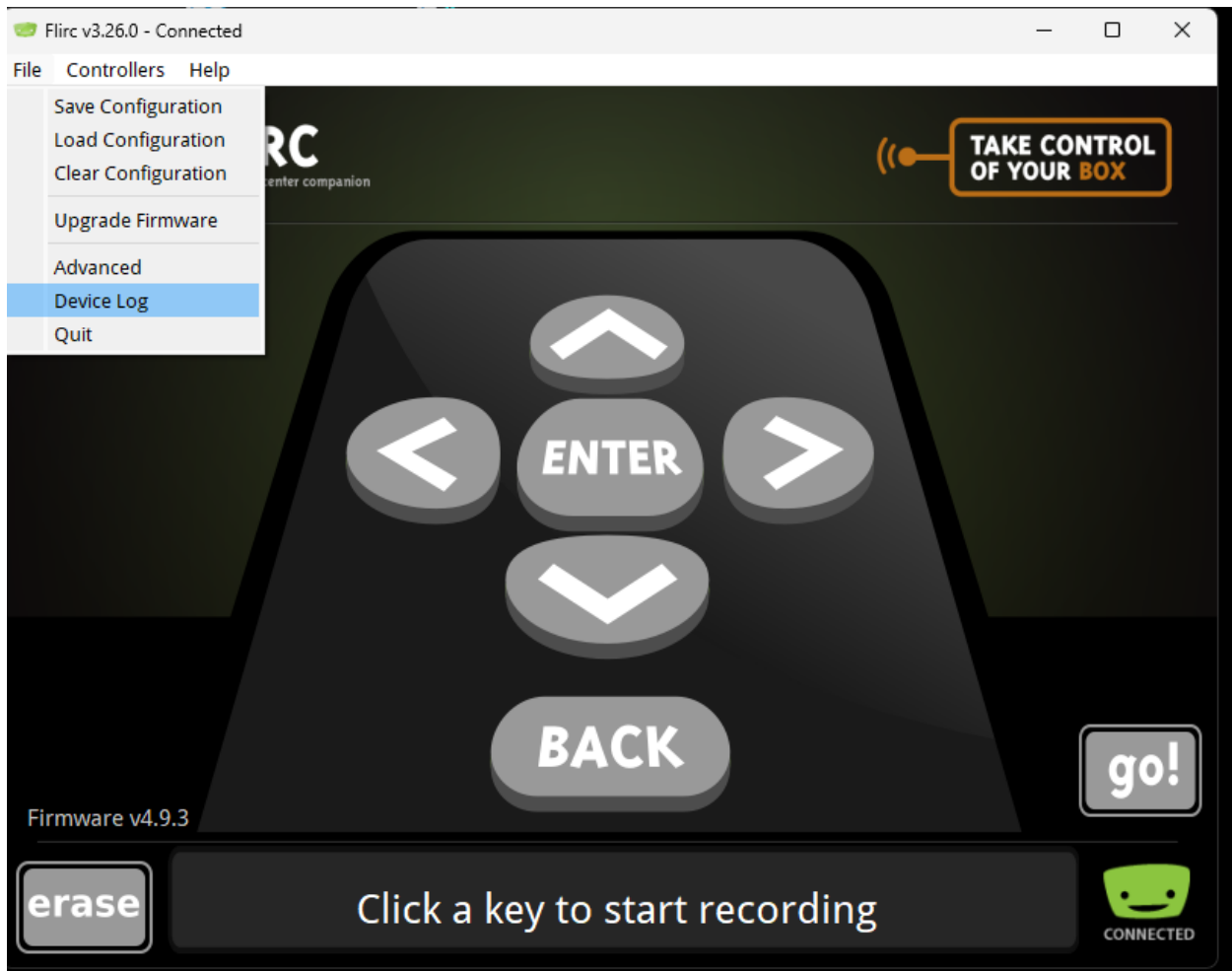
Appendix A. FLIRC GUI Software

Please ensure that you install the recommended version of FLIRC software. If you do not it is likely that you will need to recapture TV IR codes for your use as outlined in the procedure later in this appendice.

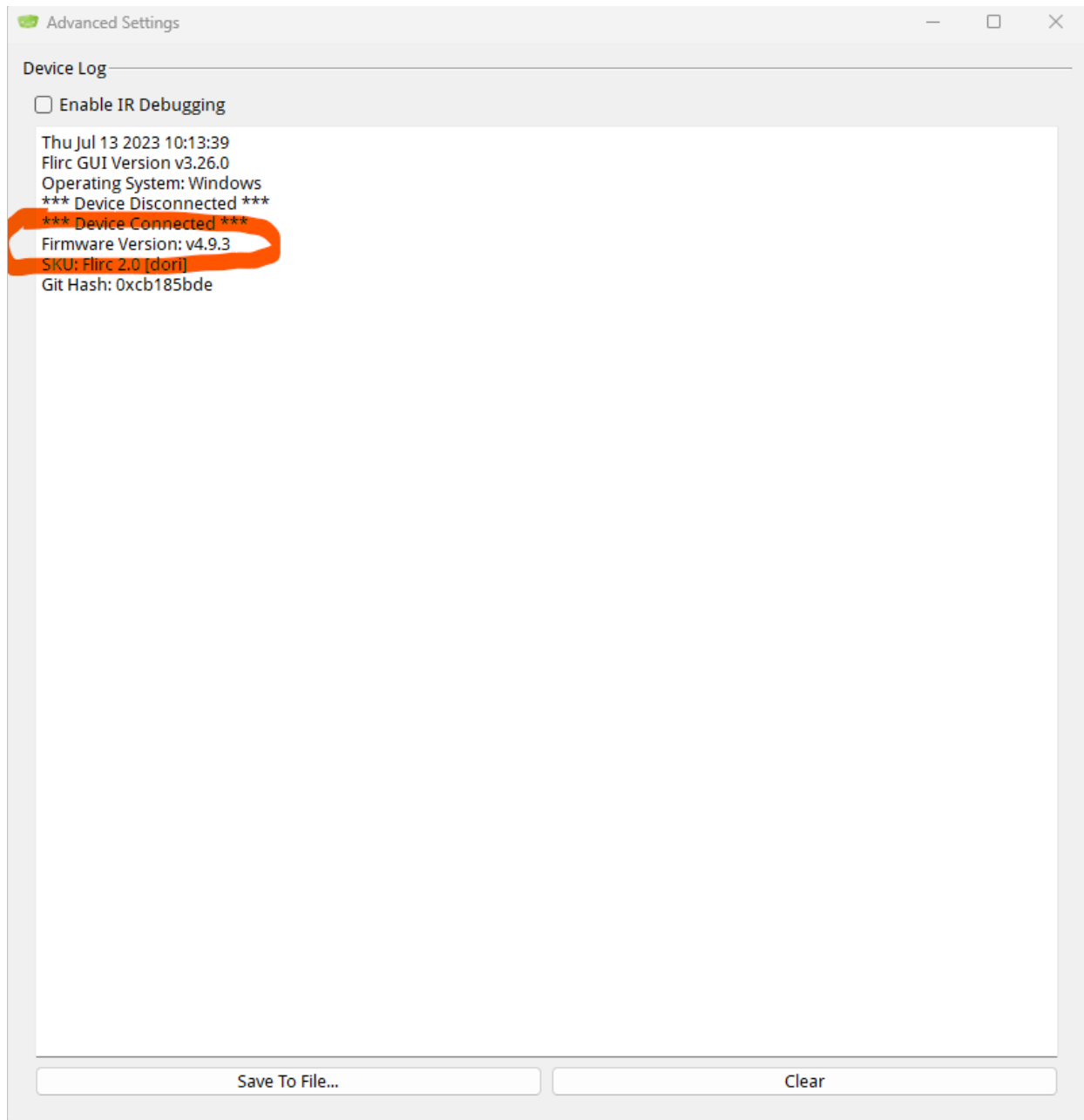
Once you have installed the software, run the FLIRC GUI software with the USB FLIRC adapter plugged into the mini-PC. Please verify in the title bar top left that the recommended version number is displayed, if the version does not match the recommended version please uninstall the software and install the recommended version.



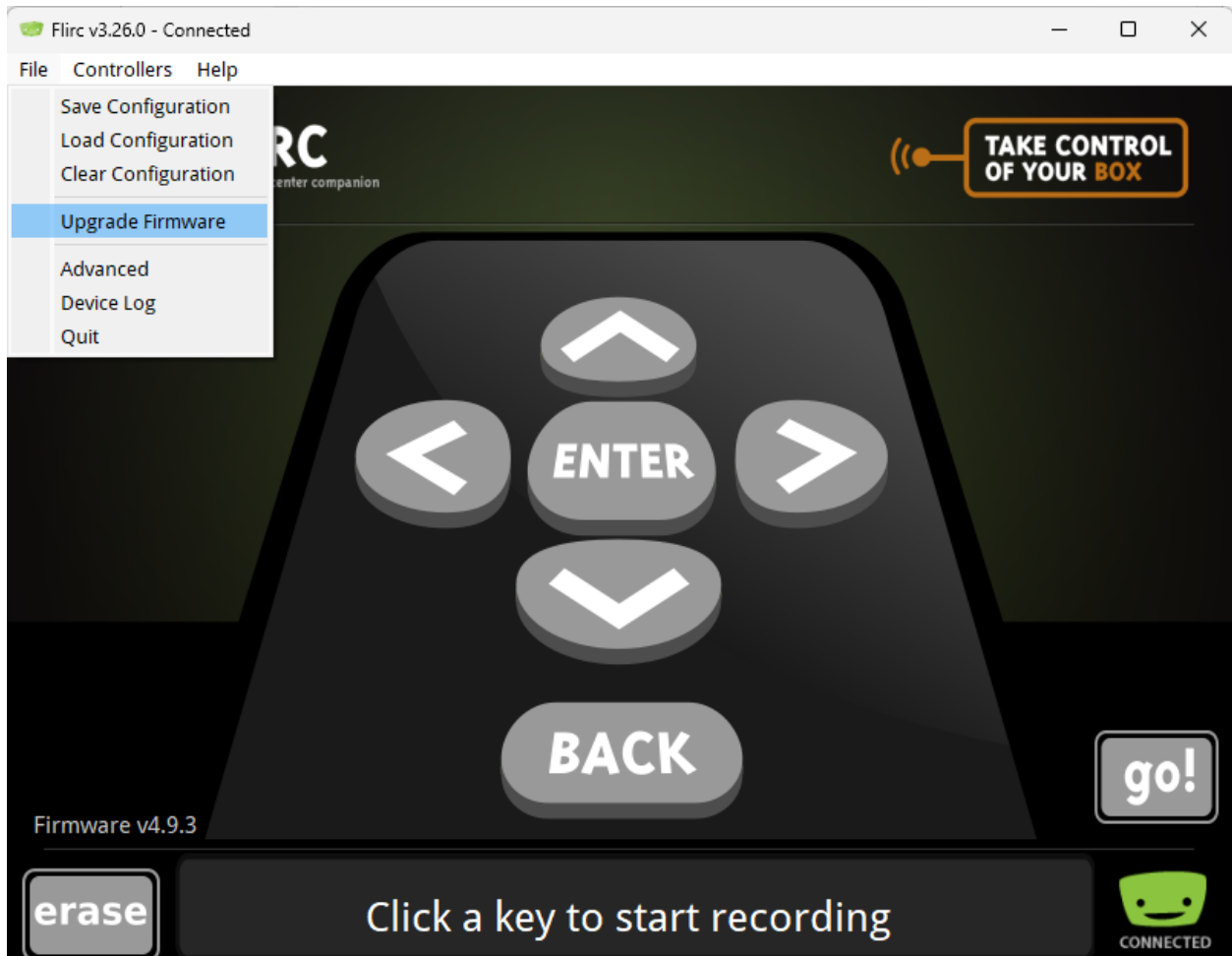
Then determine if the recommended firmware version is installed. To do this Select File then Device Log as shown



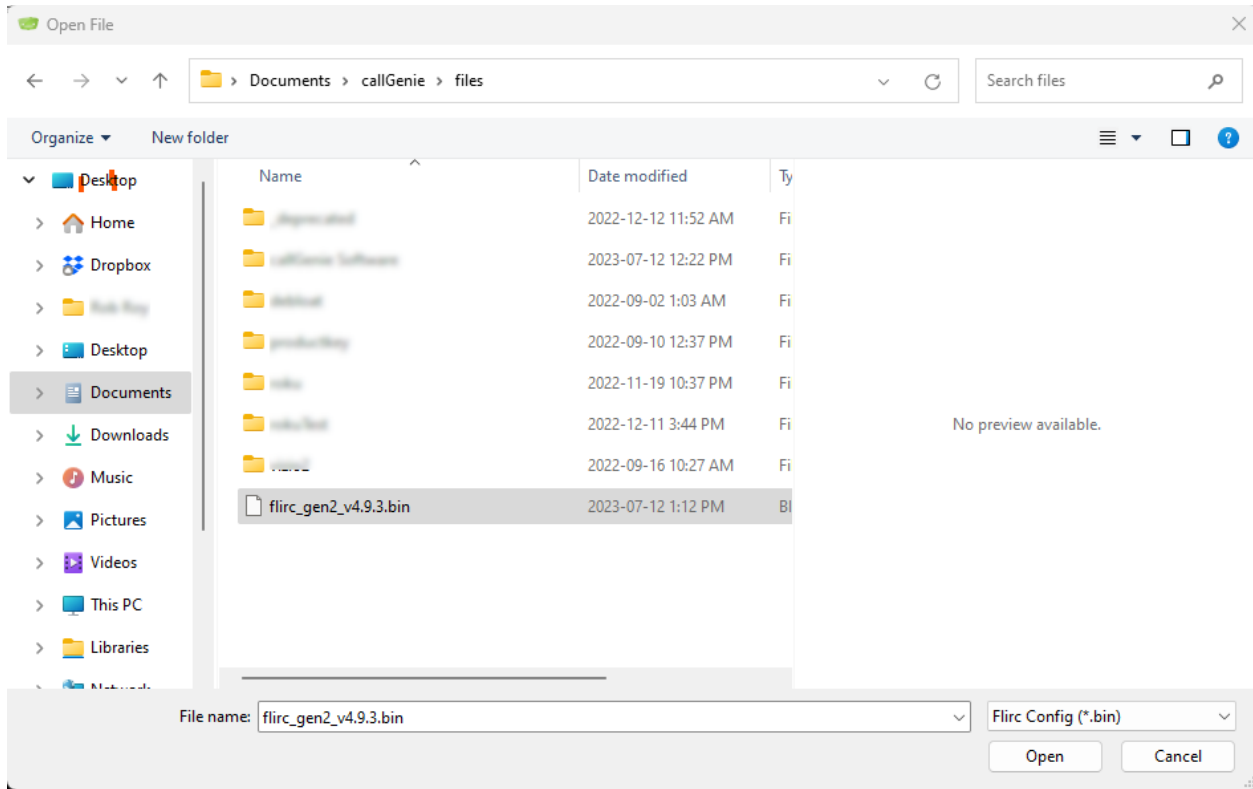
Note the firmware version, if it is the recommended version you are finished with the FLIRC software installation.



If the recommended version is not installed please close this dialog box and select File then Upgrade Firmware.



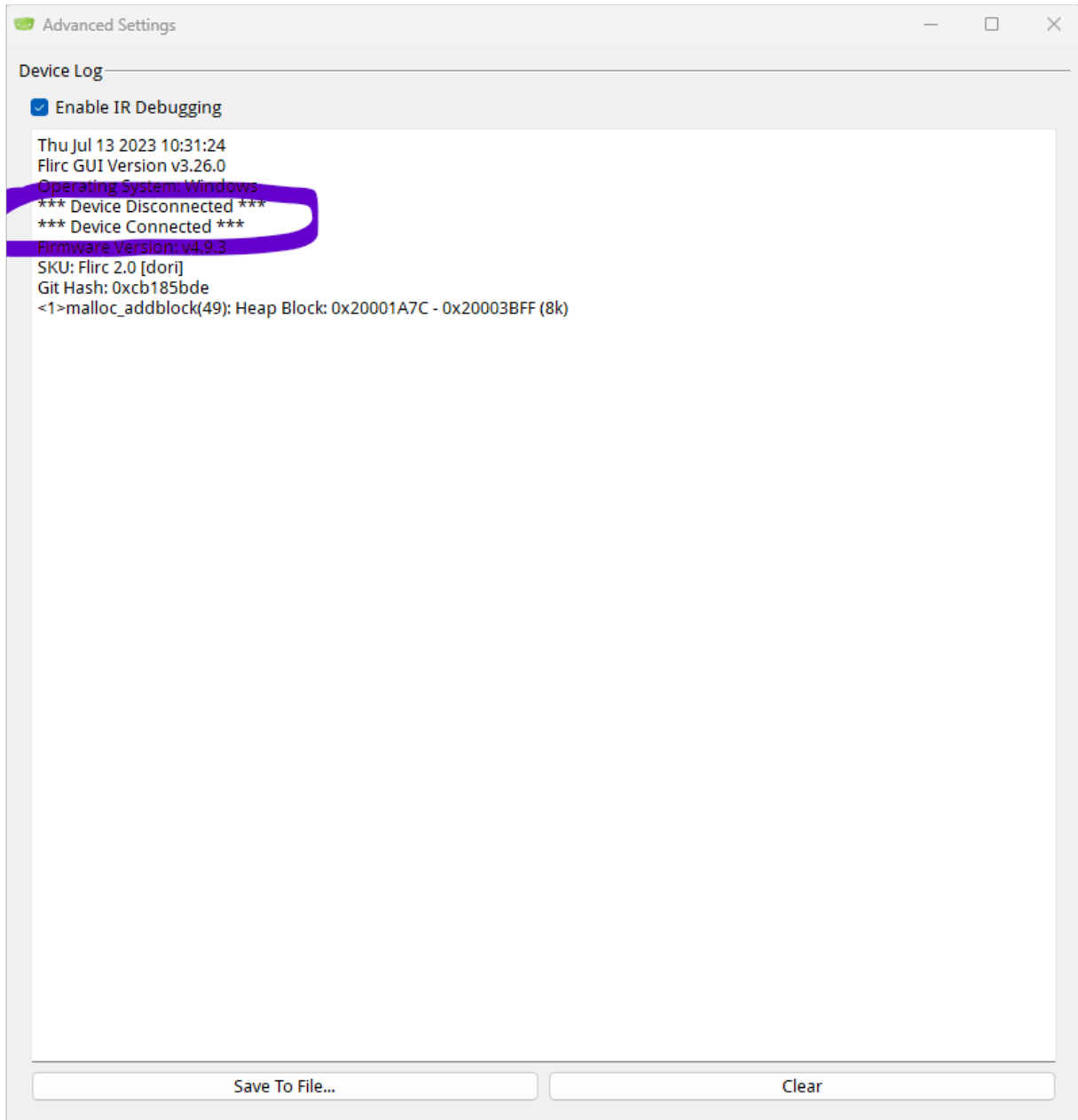
Select the firmware file delivered to you with the callGenie downloadable content and click on Open



Recheck using the above procedure that you are in compliance with the recommended versions.

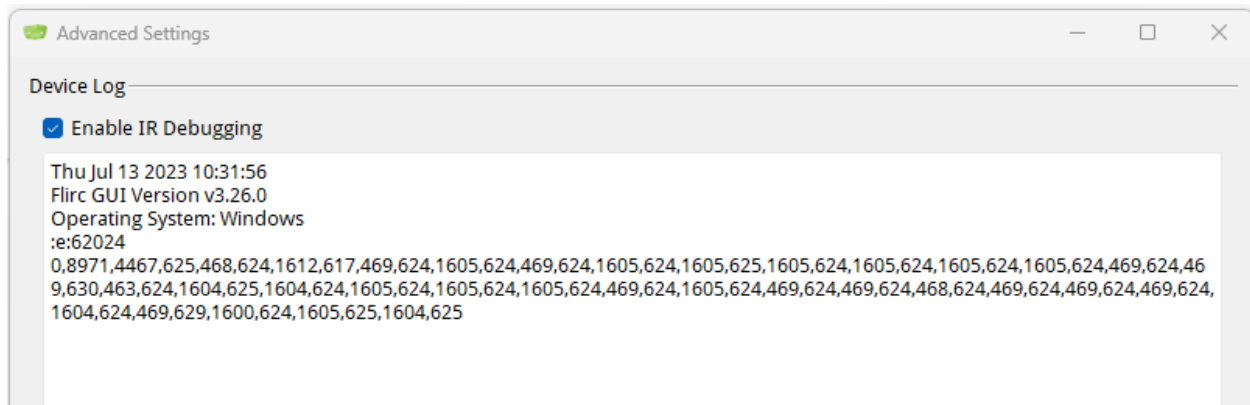
Capturing IR Codes for callGenie

Open the FLIRC GUI software, select File then Device Log and tick the Enable IR Debugging tickbox

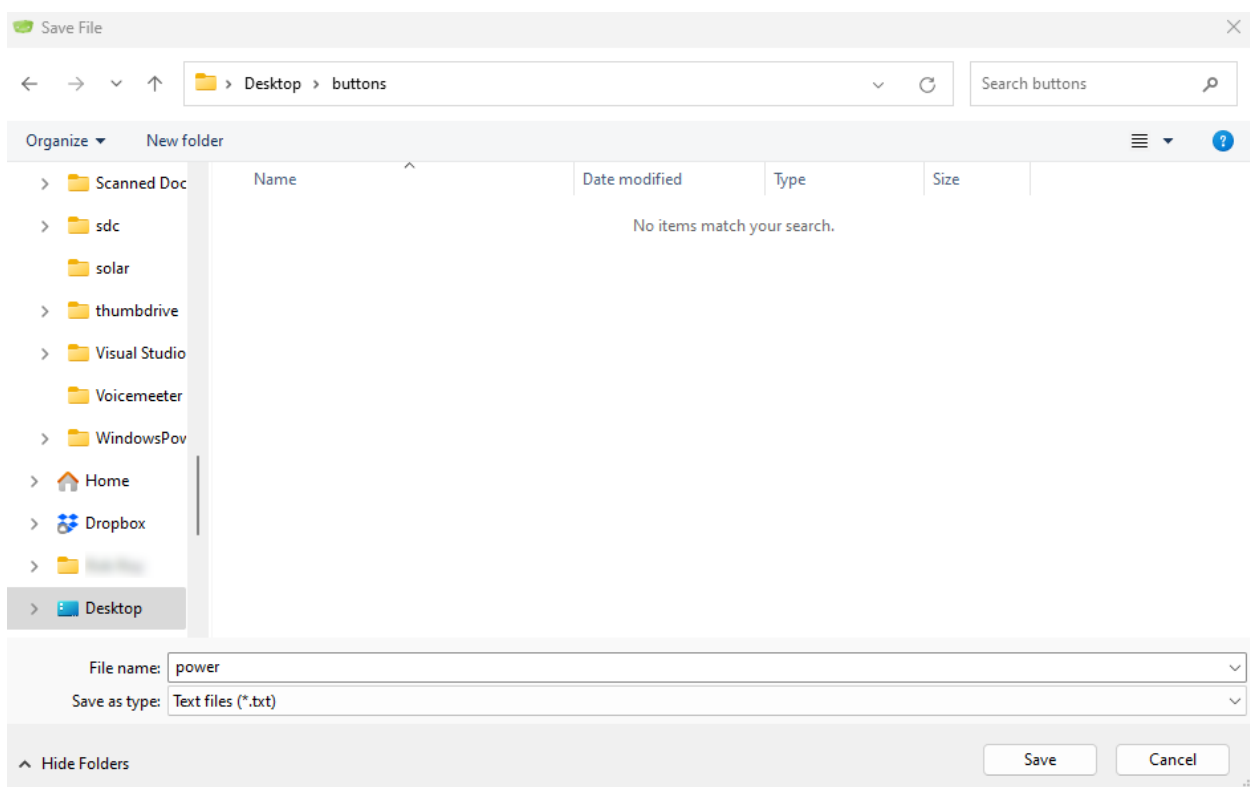


Note that the USB FLIRC adapter is shown as connected

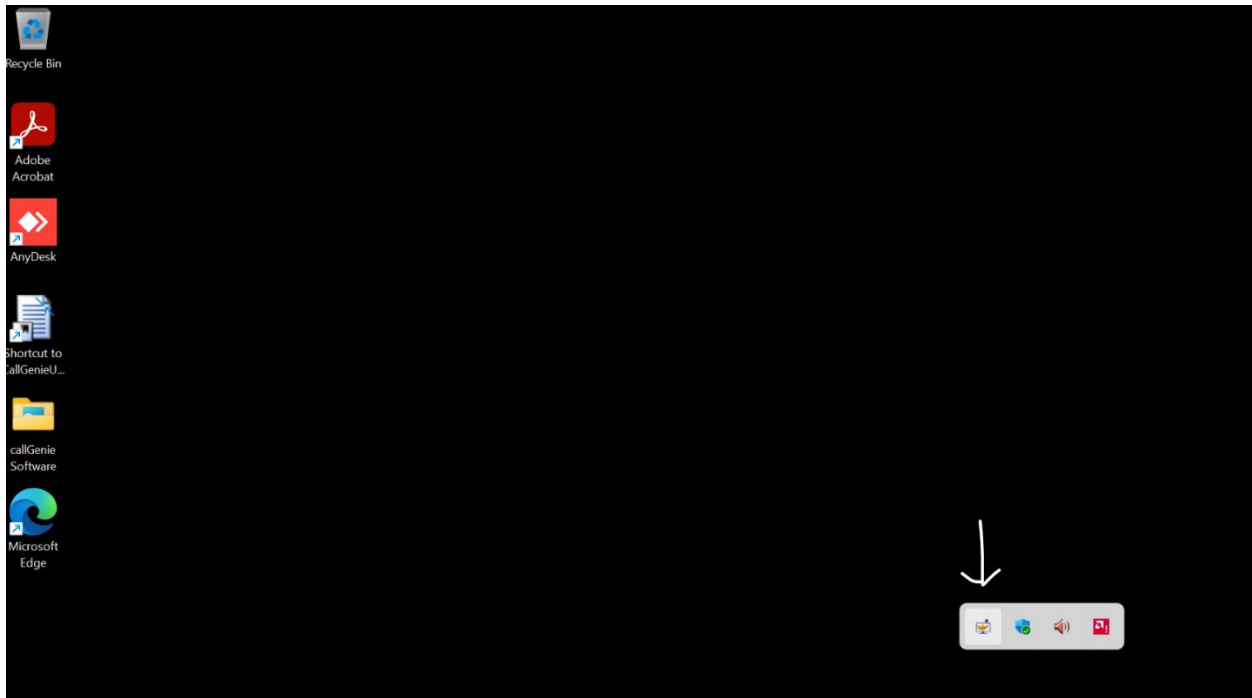
One by one do a short press the TV remote control button needed for callGenie operation. A number of lines of text should appear in the Device Log



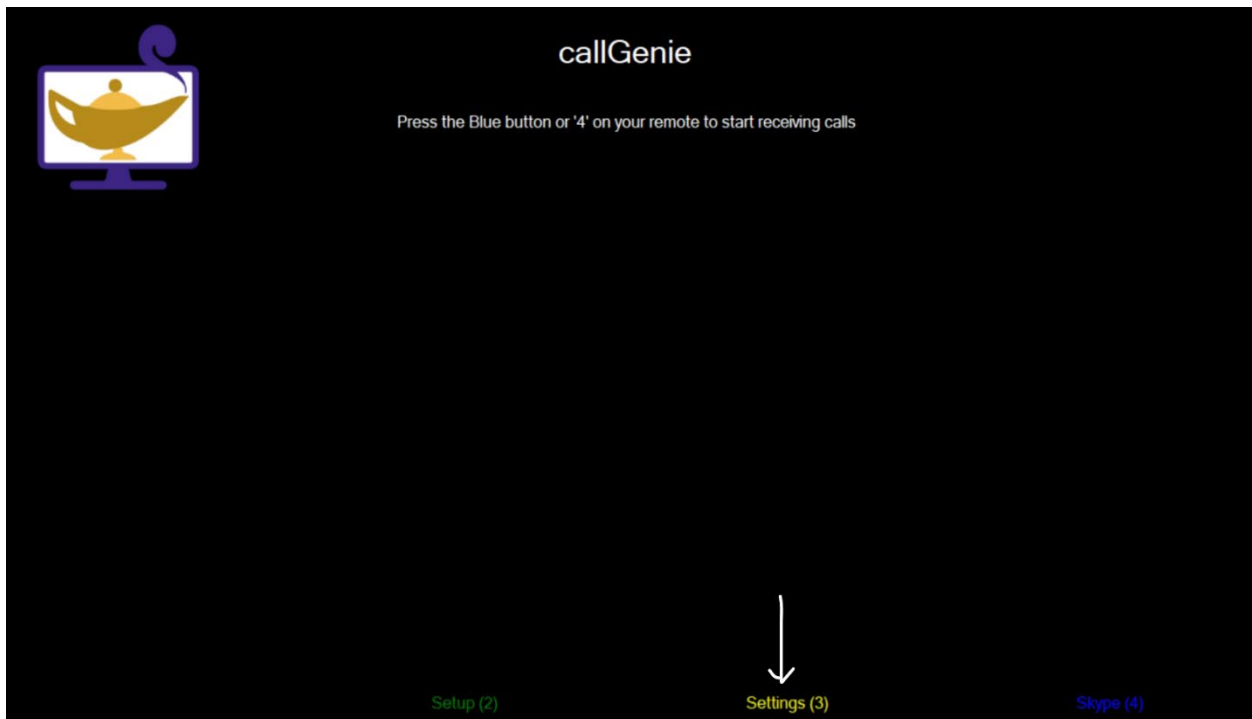
Click Save To File button and name the txt file with the name of the button and click on Save.



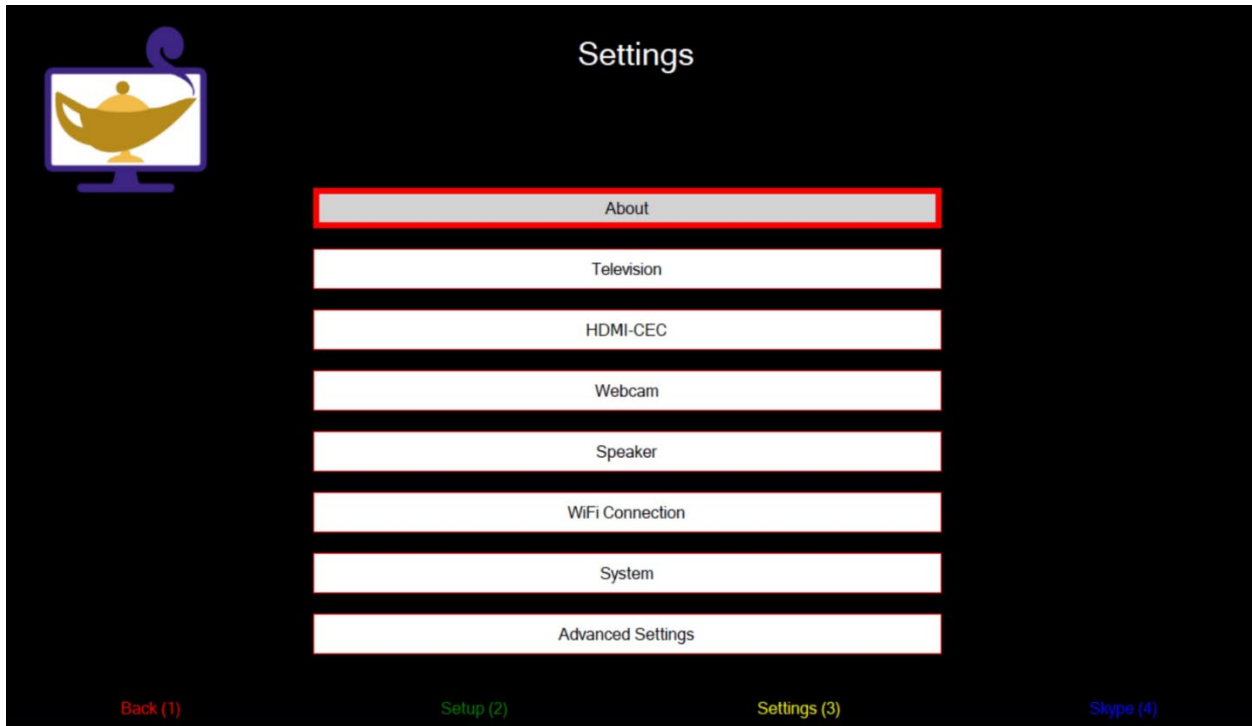
Open the callGenie software from the Windows 11 system tray but clicking once or twice on the icon



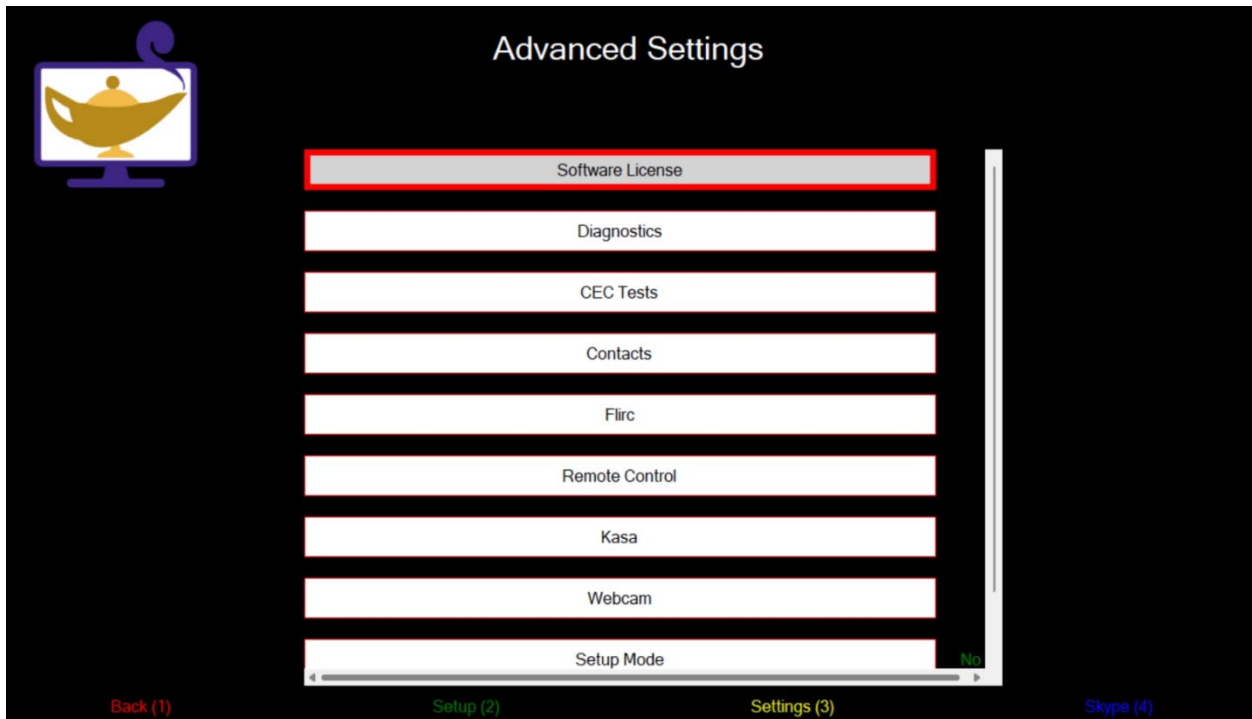
Then click on Settings



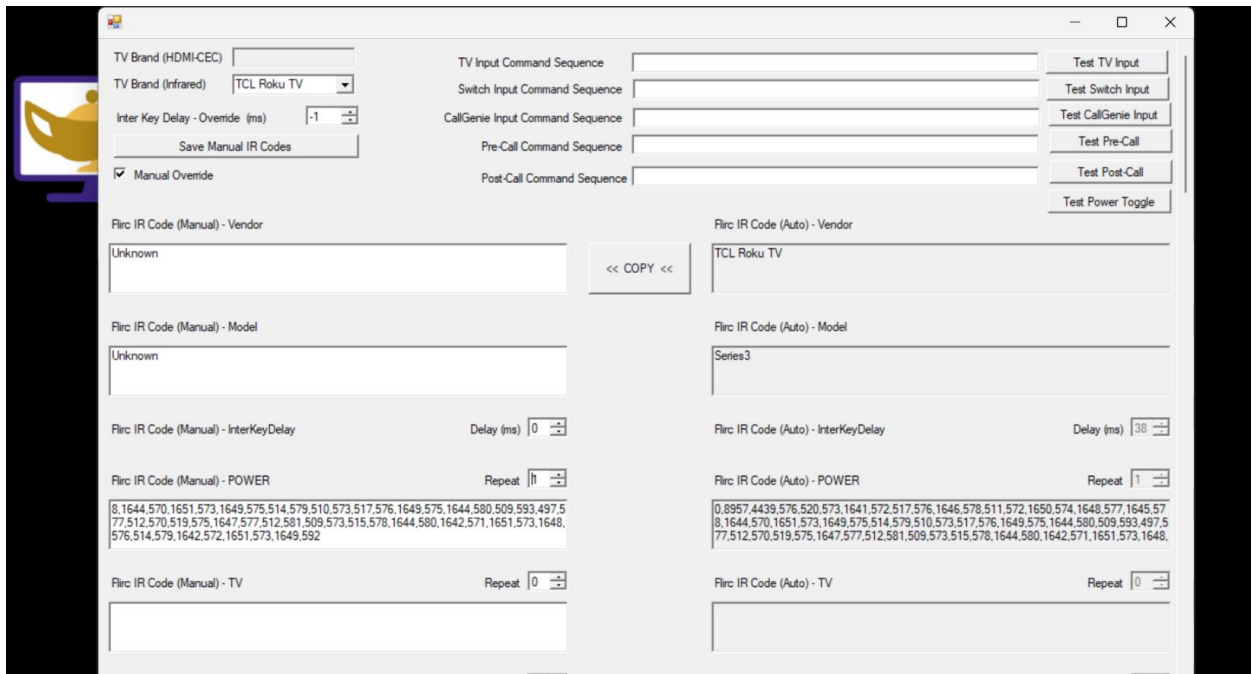
Then click on Advanced Settings



Then click on FLIRC



Next tick the Manual Override box (The positions of the settings may change)



And scroll down to the Flirc IT Code (Auto) – POWER and paste in the line of code (starting with “0,”) from the POWER button text file.

Repeat the procedure for all required buttons to complete the FLIRC sequence.

```
power.txt
File Edit View
Thu Jul 13 2023 10:31:56
Flirc GUI Version v3.26.0
Operating System: Windows
:e:62024
0,8971,4467,625,468,624,1612,617,469,624,1605,624,469,624,1605,624,1605,625,1605,6
24,1605,624,1605,624,1605,624,469,624,469,630,463,624,1604,625,1604,624,1605,624,1
605,624,1605,624,469,624,1605,624,469,624,469,624,468,624,469,624,469,624,
1604,624,469,629,1600,624,1605,625,1604,625
Ln 6, Col 1 | 100% | Unix (LF) | UTF-8
```