Video Recording & Compression

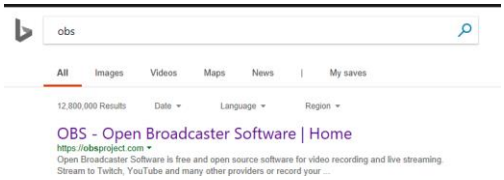
Goals:

- Examine two free pieces of software for video recording and compression;
    - OBS – Open Broadcaster Software
    - Handbrake

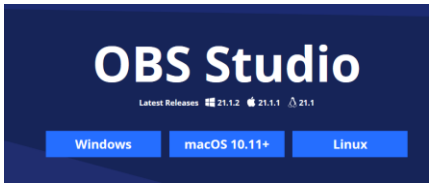
To begin with download the software.

OBS

In a browser, search for OBS



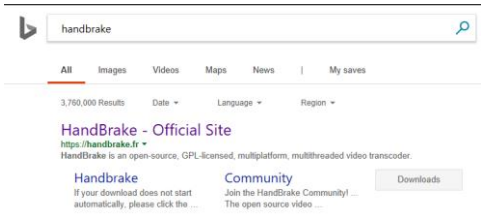
From here go the website. Select the version based on your Operating system



Save to a location you can locate (Desktop/Downloads folder).

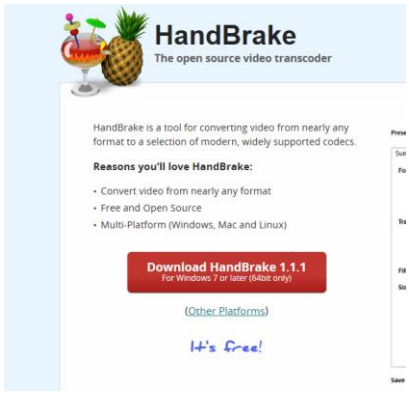
Handbrake

In a browser, search for handbrake

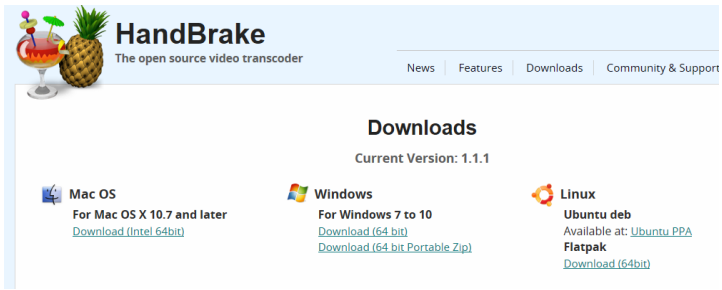


From here go the website. Select the version based on your Operating system

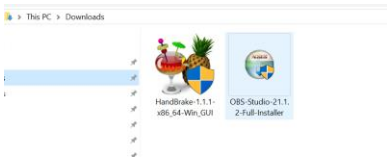
For my system, windows, it's first on offer:



Otherwise click on (Other Platforms) and select the Operating system you use.



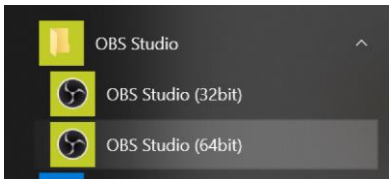
Once you have downloaded both pieces of software, install them as you would any other software.



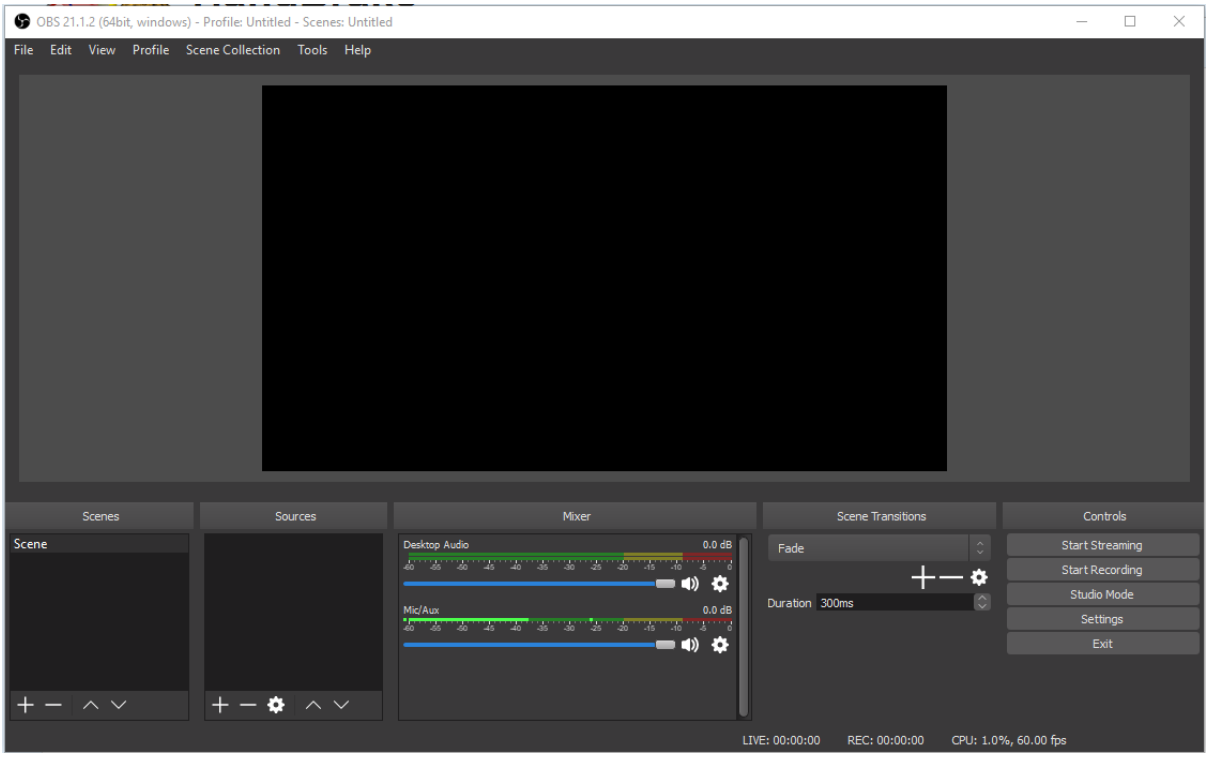
Remember, if this is done on a university machine, the software will be removed upon the next reboot, so keep a copy on a USB or online drive such as Gdrive or OneDrive.

The order of using the software is, OBS to capture the video, then once that is done, use Handbrake to compress the software.

Open up OBS



You should see the following screen

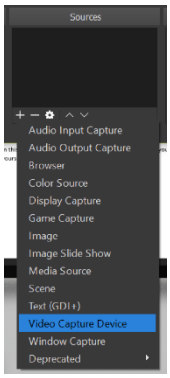


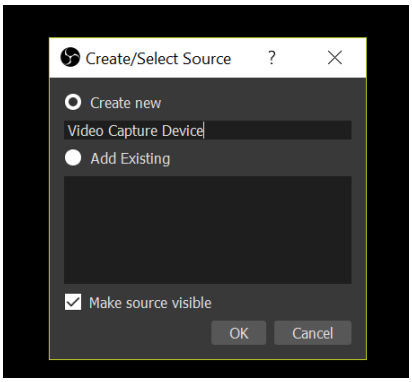
From here, what we need to add are the sources from where you are getting your video from.

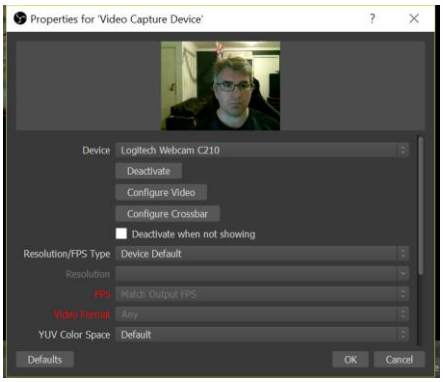
To do this, select the + in the sources box.

In this case, we are adding a video source, as for the exam you need to record yourself answering questions. As such select “Video Capture Device”.

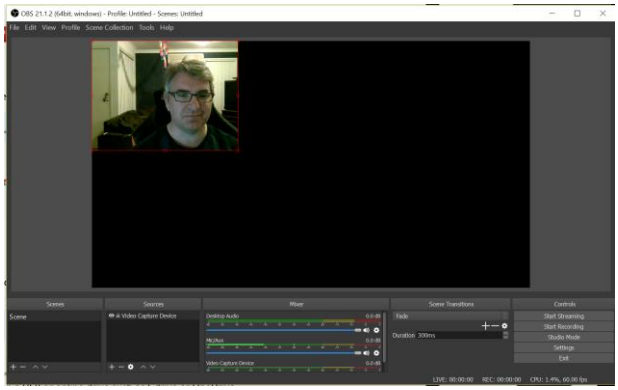
And follow the basic prompts.



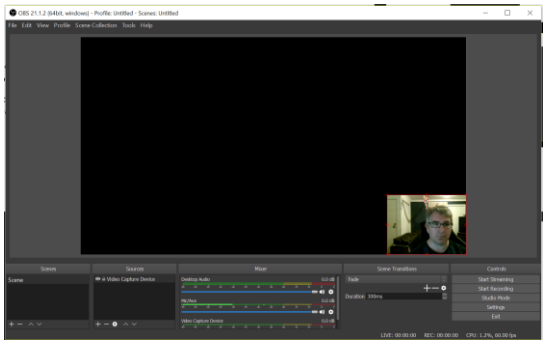




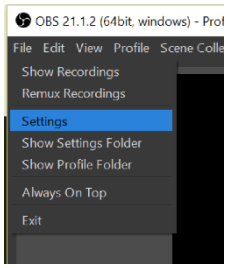
This will give you a window in your OBS screen that will record you.



The red box around the webcam input can be dragged to any position in the screen. i.e.

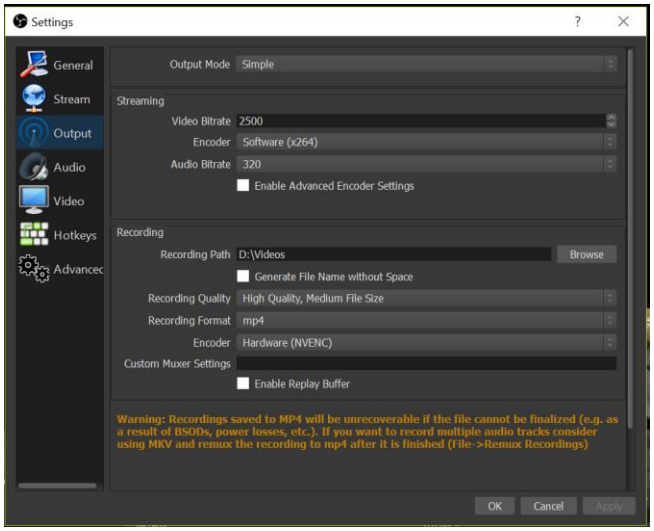


Next we want to setup the output for the video. Go File→ Settings



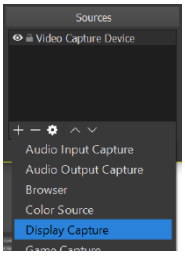
This will open the following window, down the left hand side, select the output menu option.

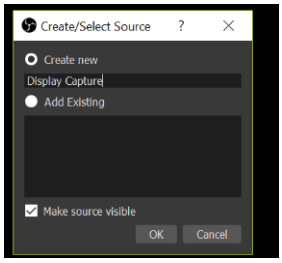
From here, select the output path, in this case it's d:\video, but I would suggest on the desktop to find it easier. And ensure the recording format is mp4.



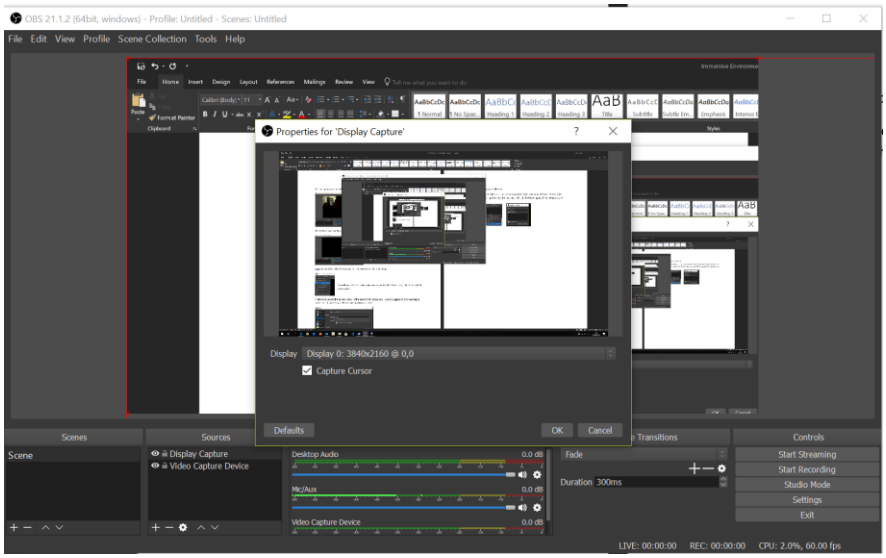
Once all this is done, you can select ok.

Now, before we start recording, just in case you want to know, you can add your screen to this output as well. To do this, go back to the sources and click the + icon again. Then select display capture.

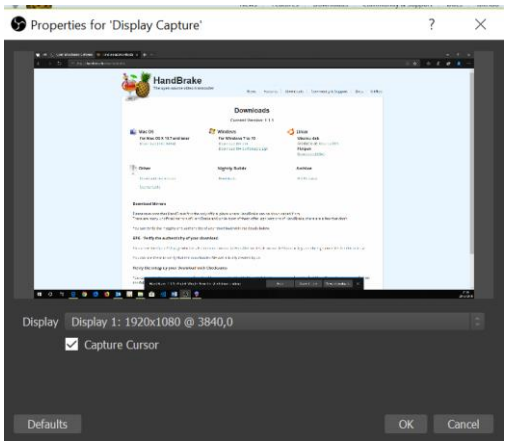




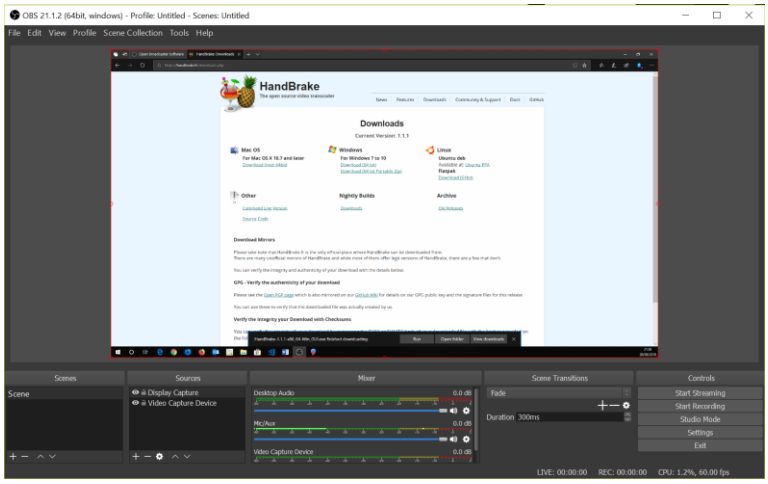
You should end up seeing something like this:



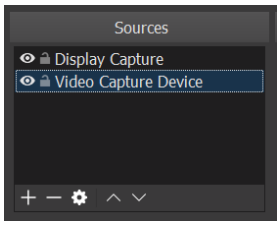
An inception of OBS, things to note on a single screen device there should be no issues, the machine I am writing this on has two monitors, one at 4k the other at 1920, OBS records better on the 1920 screen, so in the drop down, I will change from display 0 to display 1.



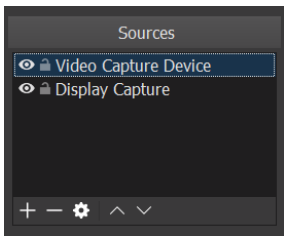
Once this is done, you should see the following



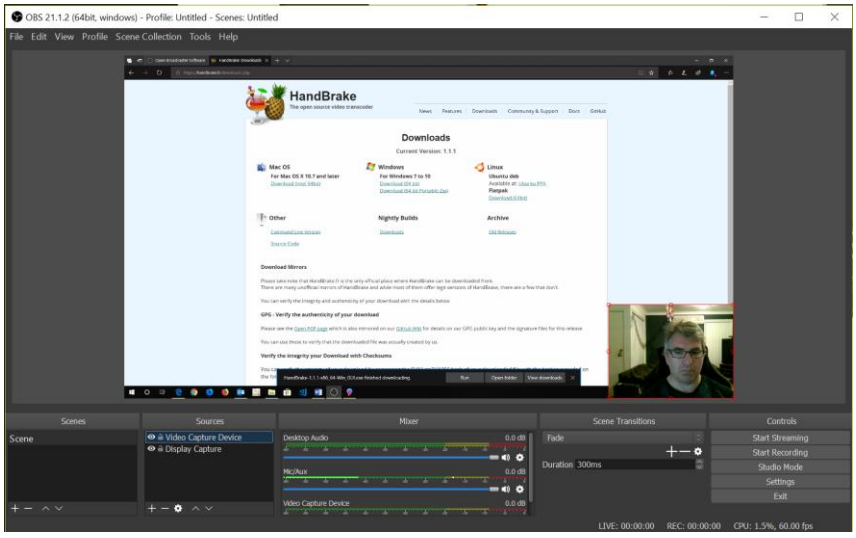
Notice how the webcam is no longer visible. To fix this, we move the position of the sources.



Change to



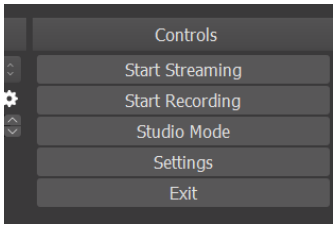
This then creates the following



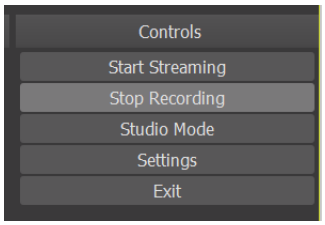
In this way, if you want to discuss your project as well as maintain the exam requirement of recording yourself, you can have both elements on the screen.

Now that the base setup is done. We can start recording.

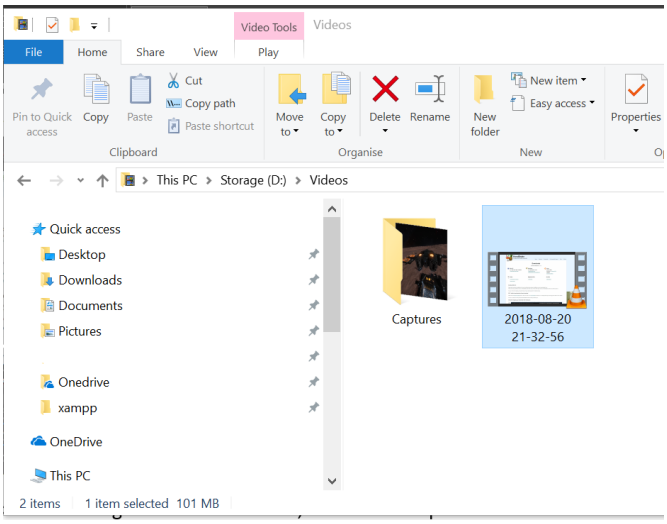
On the right hand side, click start recording.



Once you have finished recording, then just click on stop recording.

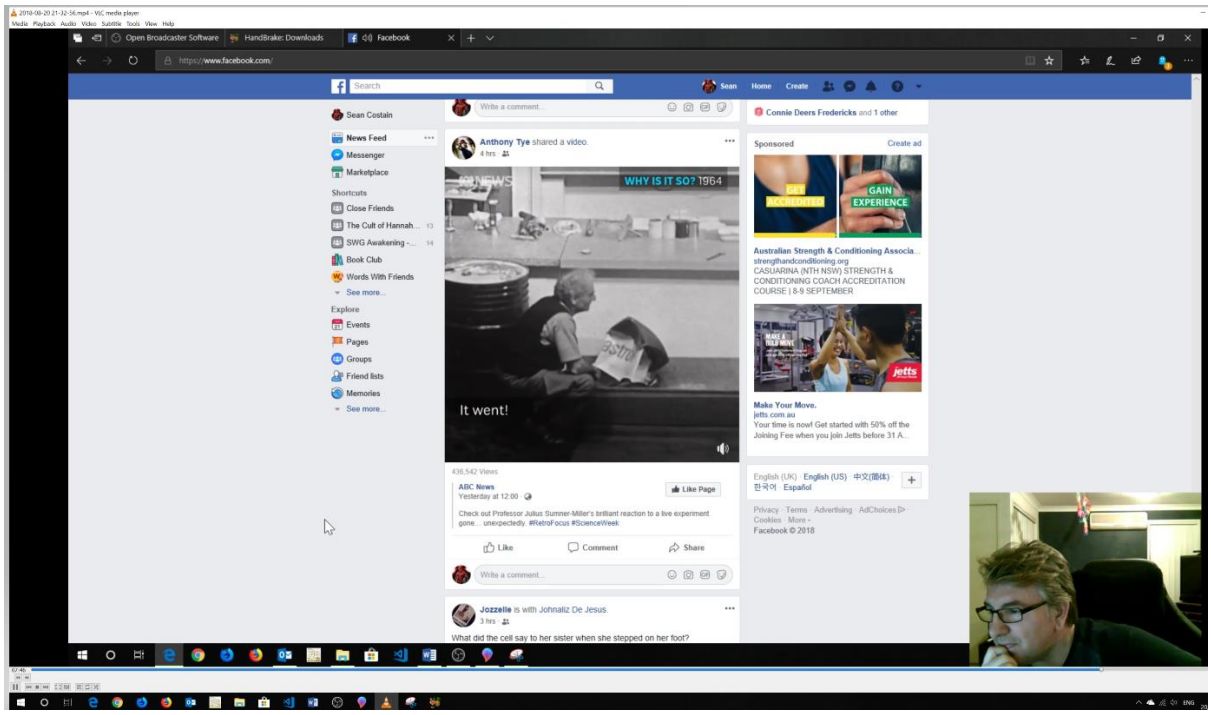


I'm going to create an 8-minute recording and then click stop, just so you can get an idea of the file size.



As you can see, the 8-minute video is 101Mb in size.

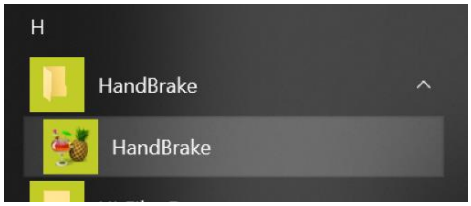
Once you have made a video, test it, make sure the audio worked and that the content you wanted to capture is there.



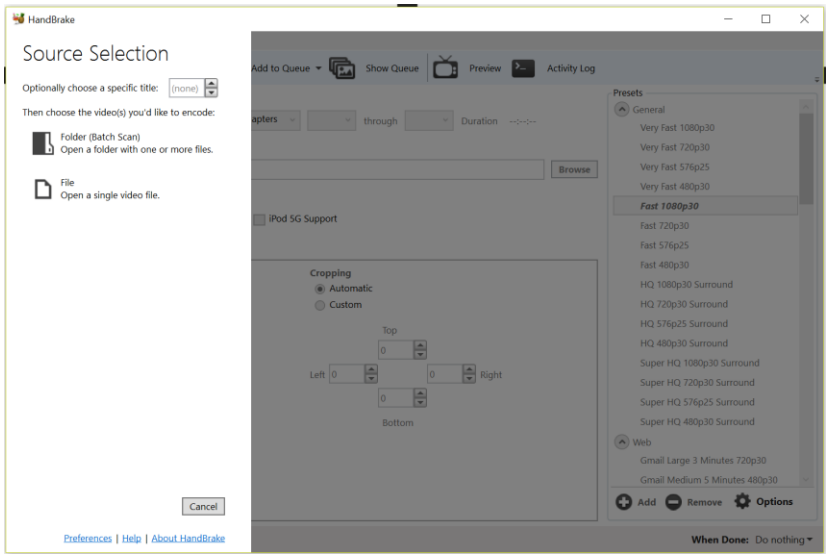
In this case, yes I spent the 8 minutes scrolling through Facebook. Remember, on my machine, my recorded screen is a second screen, hence the head turn.

From here, we are going to now swap to handbrake to shrink the file more.

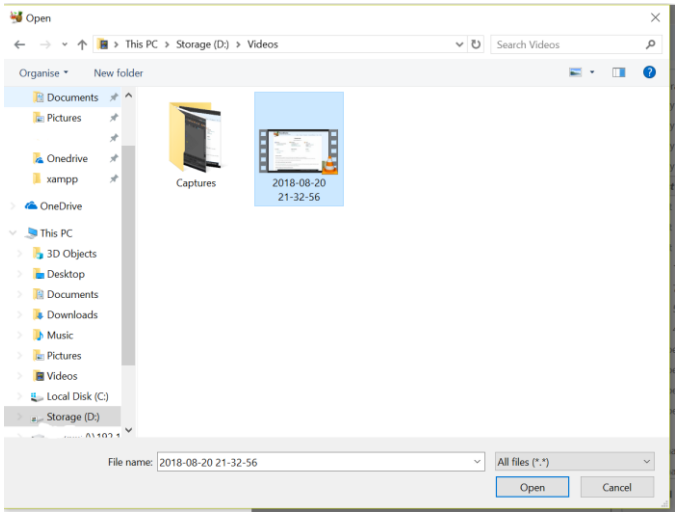
Load up Handbrake



You should be presented with the following screen



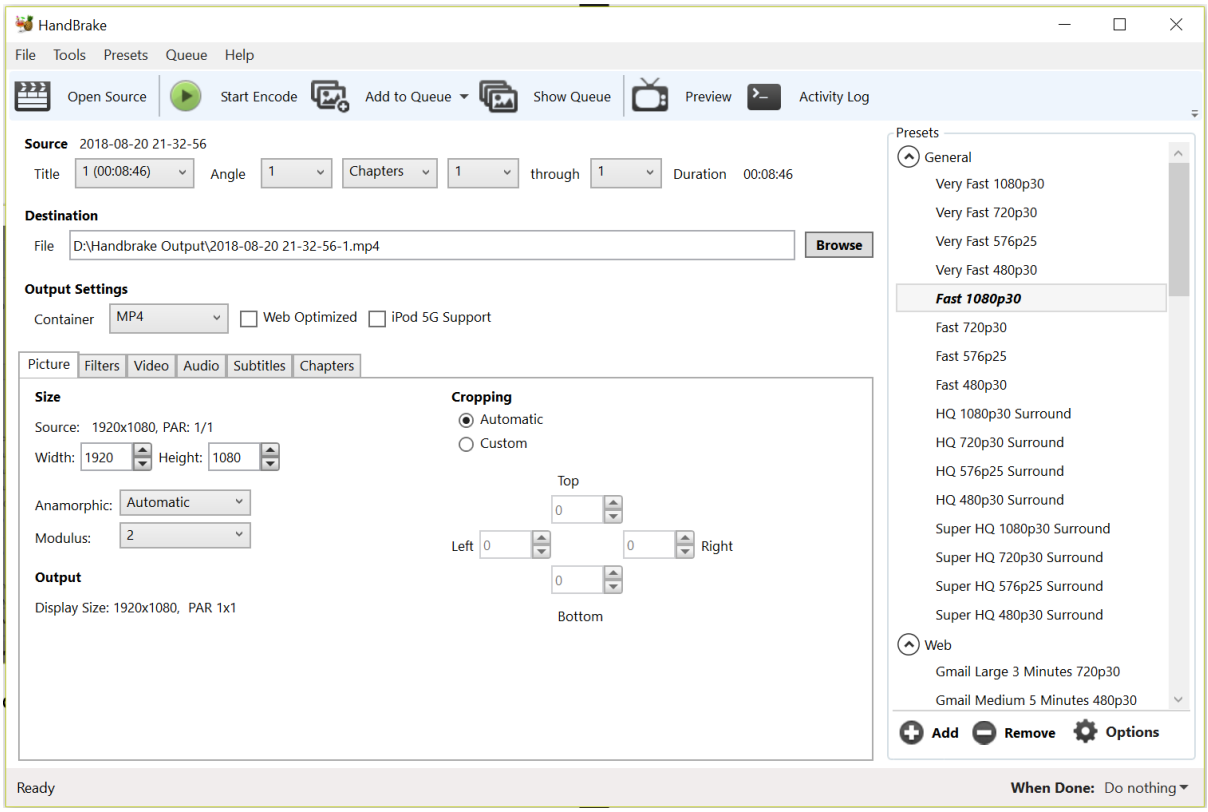
From here, select File, then locate the video you just created. And click open



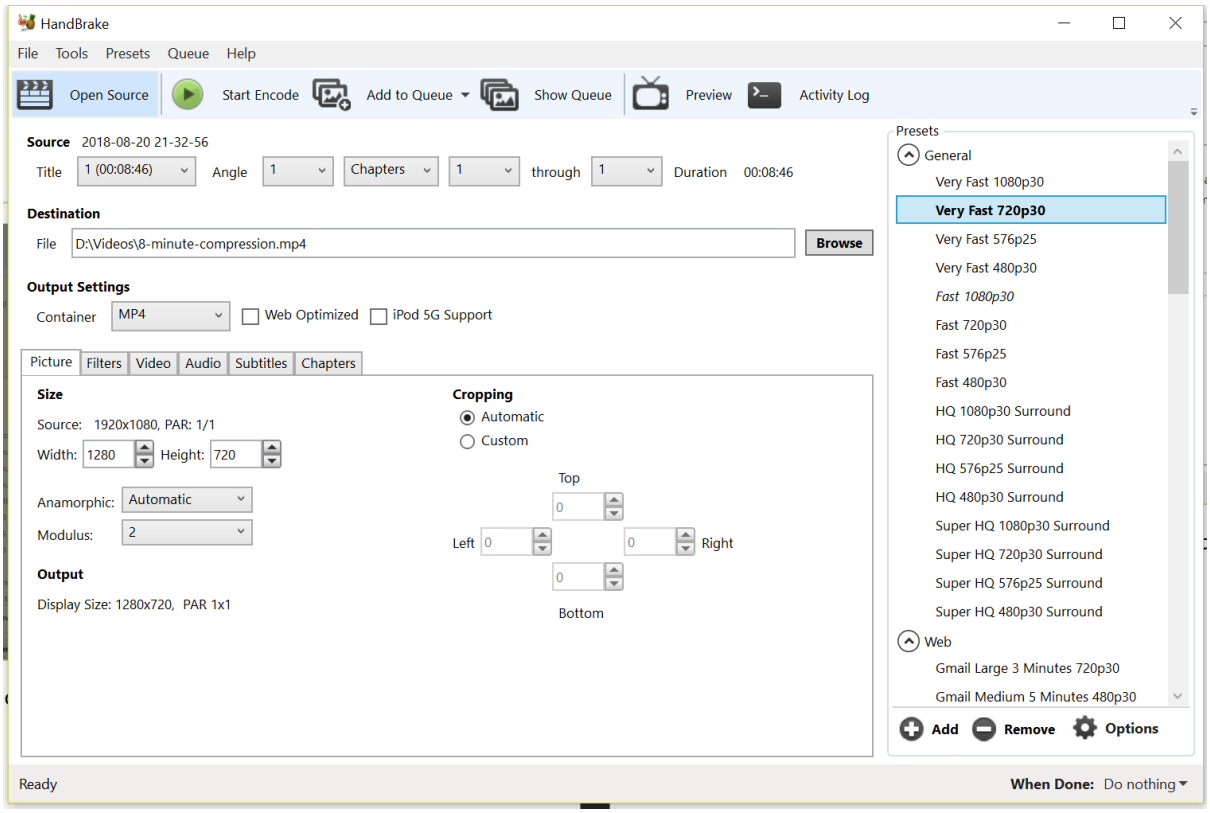
From here, the system looks a little confusing, but it's pretty easy to work with. The flow is, select the destination folder, select the file type of output, add to queue and then start queue.

The reason you can have a queue, is that you can encode folders full of video content, so you aren't restricted to only dealing with one video.

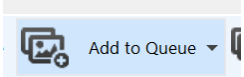
You should see the following screen.



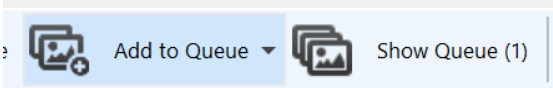
From here, I'm going to change the destination folder to be the videos folder and change the name, I'll also downgrade the presets to Very Fast 720. So, it looks like this:



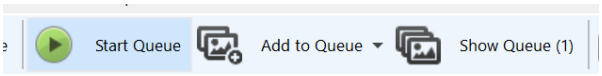
Next, click on Add to queue



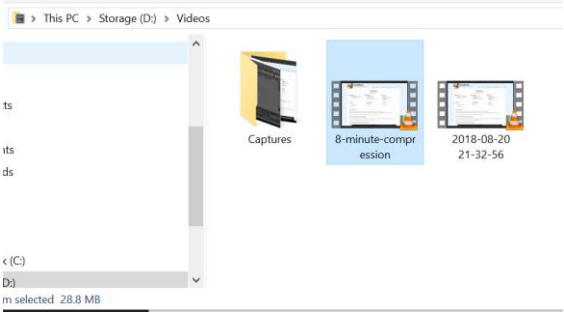
You should then see a number appear next to show queue



This tells you how many videos you have ready to encode, in this case just the one. And click on Start Encode.



Once it has finished, the file ended up at 28Mb;



Before submitting, always reload and watch the video again, ensure that the quality is what you expected.