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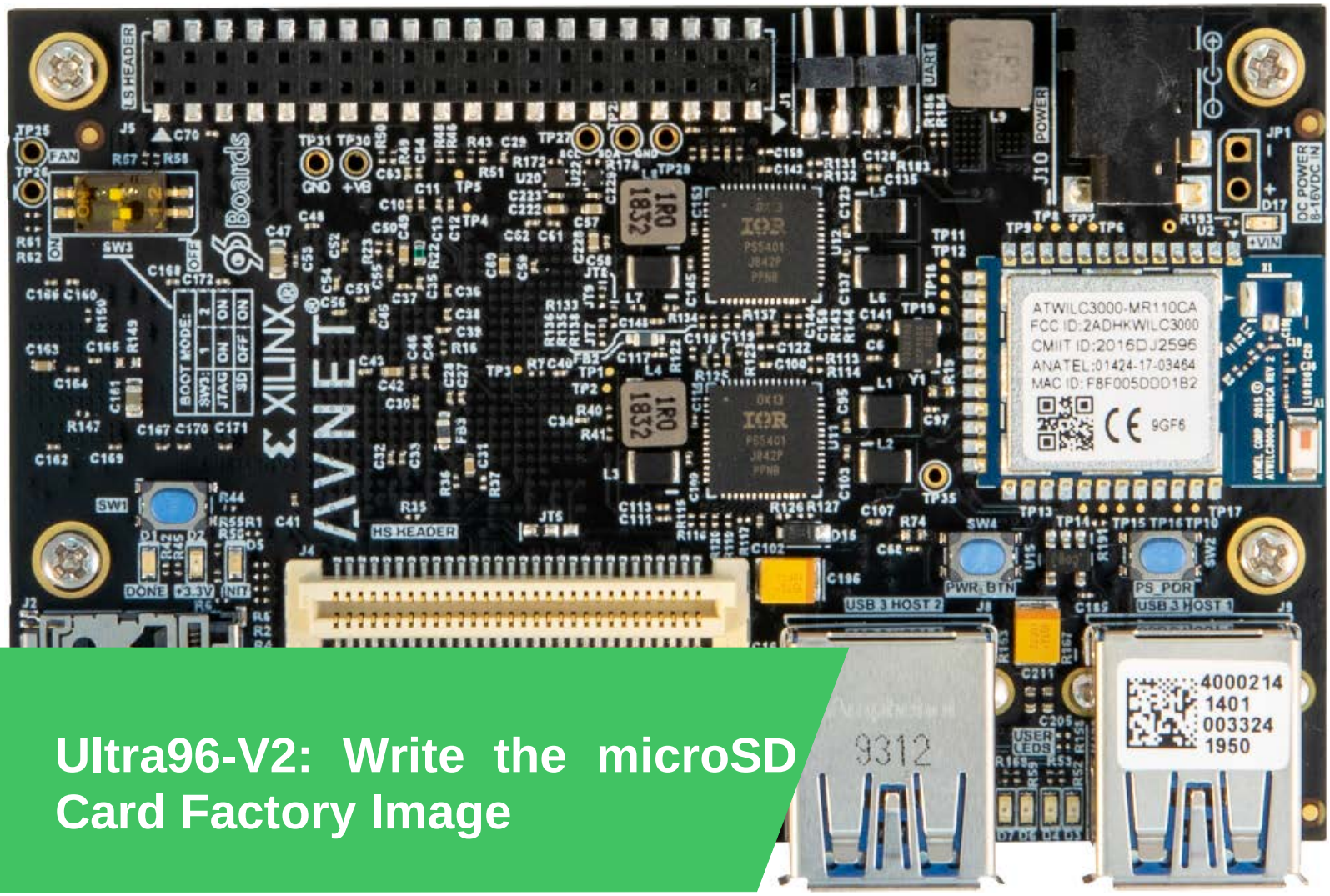

Ultra96-V2: Write the microSD Card Factory Image

/ ULTRA96

96Boards

23 November 2020

Overview

The Ultra96-V2 ships with a blank Delkin 16GB microSD Card. For initial setup or if the microSD card has been erased or reprogrammed, then use this tutorial to restore the microSD card to the latest factory image.

Experiment Setup

Software

The software required for this tutorial is:

- Etcher -- https://etcher.io/
- Decompression utility, such as 7-zip

Hardware

The hardware setup used to test this reference design includes:

- Host machine compatible with Etcher
- 16 GB microSD card
- microSD adapter (to full-size SD or USB) that is compatible with your host machine
- Ultra96-V2
- 96Boards Power Adapter, such as Avnet AES-ACC-U96-4APWR

Instructions

The following procedure will write the Ultra96-V2 16GB microSD card with the latest factory image.

WARNING – This procedure will erase everything on the microSD card, so backup anything important prior to running performing this operation.

1. Download the image archive from http://avnet.me/ultra96-v2-oob

2. Decompress the archive to extract the .img file. You should have a file named ultra96v2_oob_2020_1_*yymmdd*_8GB.img where *yymmdd* is the datecode of the image. The extracted image should be around 7,969,177,600 bytes large. Since some 16GB cards are different sizes than others, an 8GB card was used to create the image, which works for all 16GB cards. This will leave ~8GB of unused space that you can choose to use at your discretion.

3. Download Etcher for your host at https://etcher.io/ and install it.

4. Launch Etcher

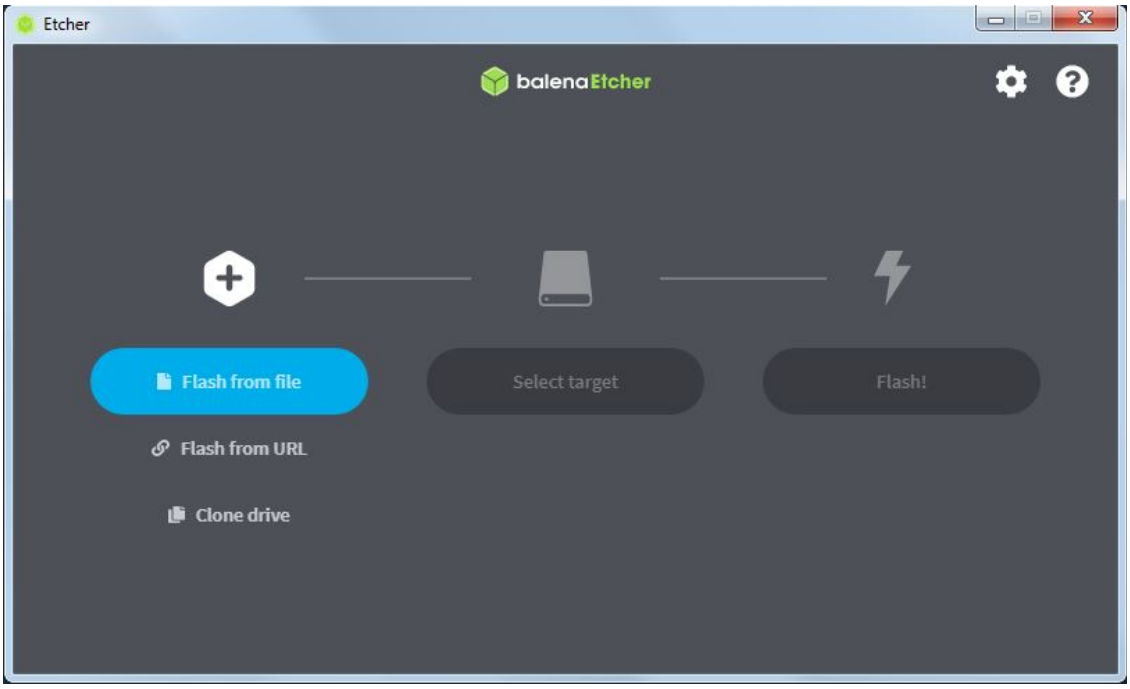

Figure 1 – Etcher Launched

5. Click **Select Image**. Browse to the ultra96v2_oob_2020_1_*yymmdd*_8GB.img previously extracted and click **Open**.

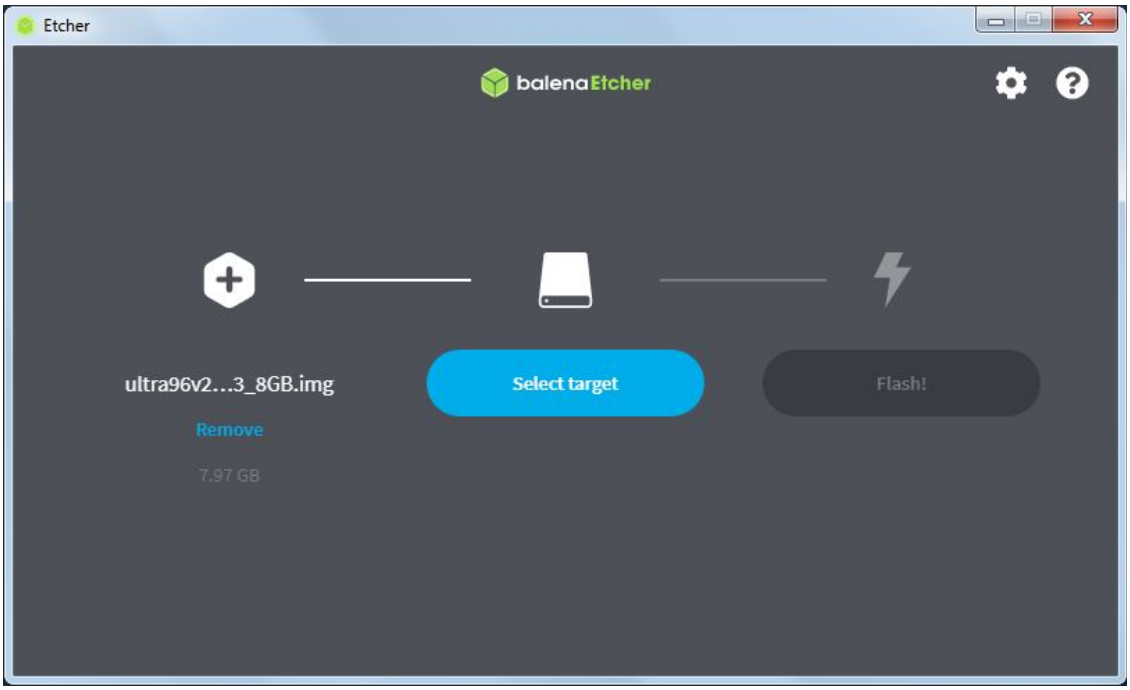

Figure 2 – Etcher with Ultra96-V2 Image Loaded

6. Plug in the microSD card + adapter into your host and note the drive letter. Etcher may find your drive automatically. If not, click **Select target** and browse to the drive letter for your microSD card.

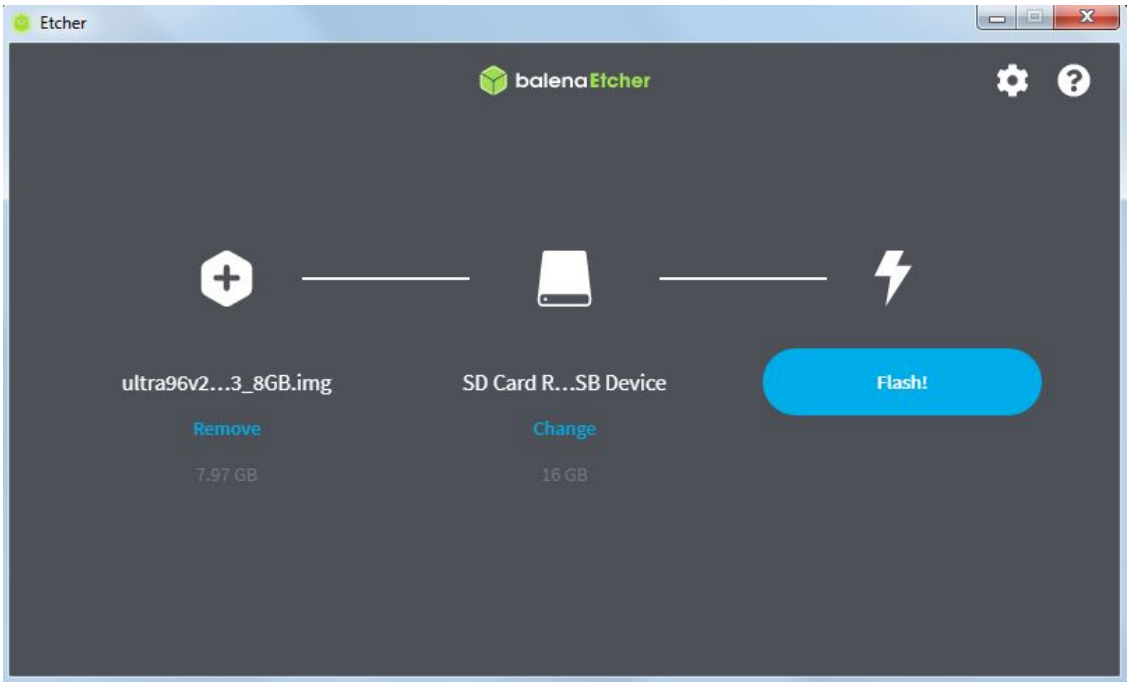

Figure 3 – Drive Selected in Etcher

WARNING – This procedure will erase everything on the microSD card, so backup anything important prior to running performing this operation.

7. Click **Flash!** to flash the microSD card.

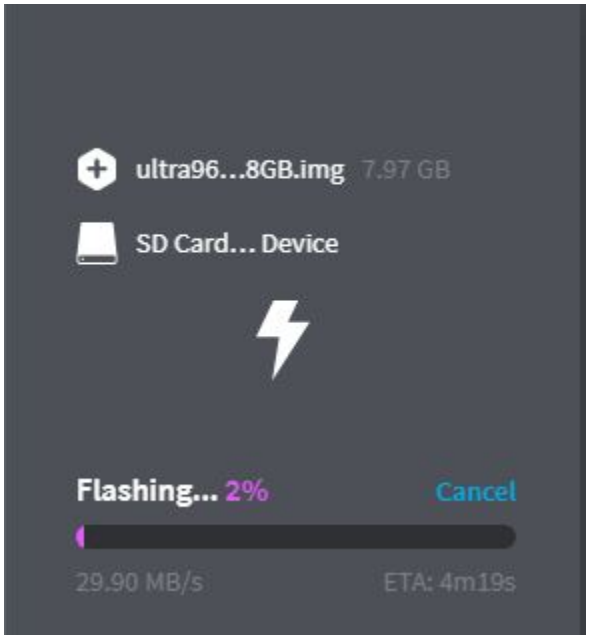

Figure 4 – Flashing in Progress

When complete, Etcher will display “Flash Complete!”

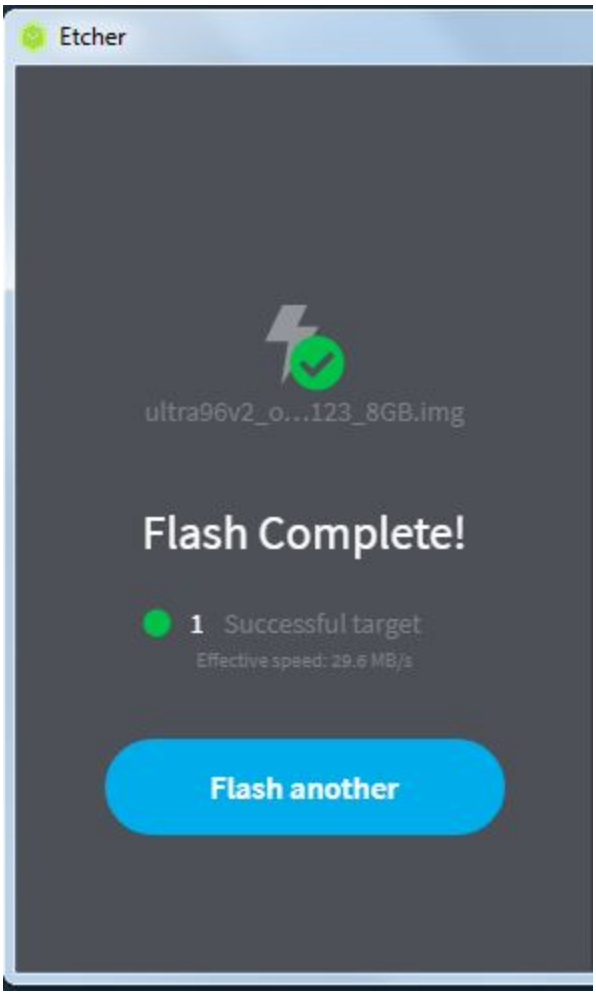

Figure 5 – Flashing Complete

Conclusion

Once the microSD card is written, refer to the ***Ultra96-V2 Getting Started Guide*** for additional exercises. See www.avnet.me/ultra96-v2 → **Technical Documents**

Revision History

Date	Version	Revision
11 Jun 2019	01	Initial version based on 2018.3
23 Nov 2020	02	Update to 2020.1