

# XoomFloppy 1.1 (1.2)

**\*Warning\*** Always make sure you've plugged in all connections before turning on the 1541 floppy drive.

**NOTE:** If your case says Xoom 1.2 (Or you have a black pcb) you have version 1.2. It is basically the same except that on this model there are pads under the board that you can connect to ground pads right beside them in order to not have to use the chip itself to reset to dfu mode if you wish to update the firmware.

The XoomFloppy is a nifty little device that you can use to communicate with a Commodore 1541 floppy drive on your modern computer. Although they are tested several times before being shipped, you never know what might happen on the way to you. That being the case, if your unit doesn't work we will replace it. Depending on where you bought the item you can contact us through that website or via email at [adim@kosciuskomedia.com](mailto:adim@kosciuskomedia.com). Now, let's go through how to use it.

## Firmware:

The XoomFloppy is already pre-loaded with xum1541 so there is no need to update the firmware. If sometime in the future you wish to do so, you will have to reset the Atmega32U2 chip to dfu mode by touching pins 13 and 24 to ground on the Atmega32U2 (the big square chip) while it is plugged into the usb and then remove pin 24 from ground first followed by pin 13. Now your XoomFloppy will be in dfu mode. You will need a dfu programmer such as dfu-programmer which you can find here <https://dfu-programmer.github.io>

You will be able to tell that your XoomFloppy is in dfu by looking at your hardware and checking usb devices (also, the LED should remain lit while it's in dfu mode). Your XoomFloppy that used to say "xum1541" will now show as "atmega dfu". You need to download the latest firmware which you can find at [https://sourceforge.net/p/opencbm/\\_list/git](https://sourceforge.net/p/opencbm/_list/git) as part of the OpenCBM package. It will be called xum1541\_x\_x with the x's being numbers. In order to install the new firmware you need to first erase the chip with dfu-programmer by going to your terminal and typing **dfu-programmer atmega32u2 erase --force** this will erase the chip. Next you need to flash the chip with your new firmware by typing **dfu-programmer atmega32u2 flash filepath/filename.hex** where filepath and filename are the path and name on your own computer. Once that is done remove your XoomFloppy and then plug it back in. The LED should now turn off when you insert it into your USB port and it should be ready to use with your 1541 floppy drive.

```
Last login: Mon Mar 21 20:55:04 on ttys000
kelvinwadkins@Kelvins-Macbook-Air ~ % dfu-programmer atmega32u2 erase --force
```

```
Last login: Mon Mar 21 20:55:04 on ttys000
kelvinwadkins@Kelvins-Macbook-Air ~ % dfu-programmer atmega32u2 flash /Users/kelvinwadkins/Desktop/xum1541-ZOOMFLOPPY-v08.hex
```

## Using XoomFloppy:

In order to use XoomFloppy you need to download a program called OpenCBM by using the walk through for whichever system you are using from this website <https://opencbm.trikaliotis.net/opencbm-9.html> Once you have installed OpenCBM all you need to do is plug the 6-pin male din cable from your 1541 floppy drive into the female dongle of the XoomFloppy. Then turn on your 1541 floppy drive. That's all there is to it. You can now control use your 1541 floppy drive with your modern computer by using commands from OpenCBM. Refer to the previous website to learn all of the commands you can use with OpenCBM. Below is an example of formatting a disk with OpenCBM. **Cbmformat** is the command, the **9** is the drive number (it is usually 8 but I happen to be using a drive that is number 9), **tmp** is the name of the disk and **01** is the disk ID.

```
Last login: Mon Mar 21 23:22:25 on ttys000
kelvinwadkins@Kelvins-Macbook-Air ~ % cbmformat 9 tmp,01
```

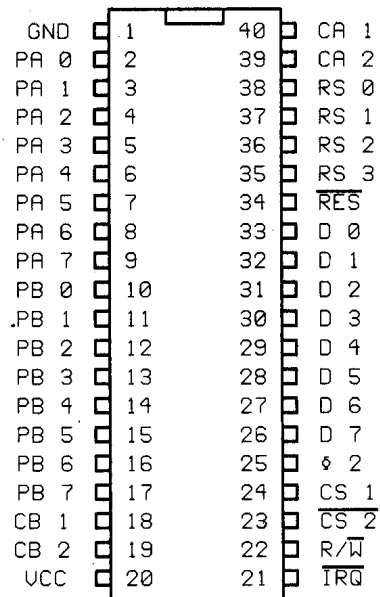
## Using XoomFloppy with Parallel Port:

If you would like to connect to the 1541 via parallel port you need to first remove it from the case and solder wires into the parallel pinholes. They are numbered on the board in order. Then you must either connect the wires to a 40 pin dip socket or the 6522 chip on the drive itself. There are two 6522 chips on the 1541 drive, the one you need to use is the one closest to the 6502 cpu. Once you have the wires soldered onto the board you connect them to the 6522 (or 40 pin dip, which would really be recommended) based on the chart below below. You can also connect male and female parallel port plugs to the wires if you wish.

Wire#	40-pin Socket or 6522
1	PA0
2	PA1
3	PA2
4	PA3
5	PA4

6	PA5
7	PA6
8	PA7
9	CB1
10	CA2

## 6522



Thank you very much and we hope you enjoy it! If there are any problems please don't hesitate to email at [admin@kosciuskomedia.com](mailto:admin@kosciuskomedia.com)