



YOUNAGINE

# Unwired Mini Kossel

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Located at: <http://www.youmagine.com/designs/the-beautiful-2020-mini-kossel>

## Short description:

Sturdy and simplistic Mini Kossel variant with 2020 extrusions. I wanted a "travel" delta, one that I could easily grab and bring with me anywhere. It had to look nice, and wow people. This is the result.

## Description:

<p>Features:</p><p>Hidden wiring. All wires run inside extrusions and top/base corner parts.</p><p>Very rigid. Base corner part is 60mm high, and 2020 extrusions ensure no wobbliness.</p><p>285mm build height, due to raised hotend. Only the hot part is under the effector, giving almost 40mm extra build height. Also the bed is lowered into the frame, giving 10mm more.</p><p>Fold up universal spool holder on the back.<br></p><p>Easy load extruder on the back tower. Filament is routed via a guide, to prevent kinks.</p><p>All parts are my own design, but with heavy inspiration from all the other delta style printers on the internet.</p><p>Please note, that some parts are drilled with 2.5mm drill bit, and then tapped for M3 threads. I have only used M3 nuts when I felt it was necessary.</p><p>CHANGES 2015-05-19<br>Tower Plate V2 fixed.stl - it was missing a hole. Lots of downloads, and \*no comments\* about this. Amazing.<br>Spring extruder plate 2020 tight.stl - the extruder for NEMA17 and MK8 gear. I updated it with tighter tolerances, as I found the arm a bit flappy.<br></p><p>CHANGES 2015-04-26<br>Arduino Holder.stl - reinforced mounts for 40mm fans<br>Lower Corner.stl - bigger hole for internal wiring, added logo<br>Upper Corner.stl - slightly bigger hole for internal wiring<br>ADDED Tower plate V2.stl - this version does not need to be tapped for M3. Just use nuts instead. You need a 16mm bolt for the left side and a 20mm for the right side.<br>ADDED Effector with fan cooling.stl - experimental design with two fans. Both fans blow air into the effector. When the printer is powered up, one fan is constantly running to cool the hotend. Most air escapes through the other fan (which is turned off). To cool your print, the second fan is turned on, forcing air out through the 20 small air-channels in the bottom. Try it!<br>ADDED Fold Down Spool Holder Parking Clamp.stl - haven't had time to test it yet.</p>

If you can, please use the online documentation found at <http://www.youmagine.com/designs/the-beautiful-2020-mini-kossel> because those may have been updated. Also, there you can interact and provide praise and/or feedback.