

# Ultimaker 3 Extended/S5 Dual FDM 3D Printer

Last updated: 5/31/23 Haley

Ultimaker 3/S5

<b>Tool Type:</b> 3D printer
<b>Location:</b> Innovation Workshop
<b>Description:</b> Dual extrusion FDM 3D printer
<b>Manufacturer:</b> Ultimaker

## About

The Ultimaker 3 extended & Ultimaker S5 are filament fed fusion deposition 3D printers capable of simultaneously printing two different plastics at once. Typically the printer is set up with ABS as a build material, and PVA as a solvable support material.

## Safety Concerns

- The print heads can be very hot - do not touch them with bare hands unless positive they are cool.
- As with any automated machinery make sure that your body is clear of the moving parts to avoid injury.

## Training Documentation

[FDM Training SOP](#)

## Detailed Specifications

Ultimaker 3 Extended:

- Build Volume: 215x215x300 mm for right or left nozzle, 197x215x300 mm for dual material
- Filament diameter: 2.85 mm
- XYZ resolution: 12.5, 12.5, 2.5 microns
- Build plate temperature: 20-100 °C
- Nozzle temperature: 180-280 °C

Ultimaker S5:

- Build Volume: 330x240x300 mm
- Filament diameter: 2.85 mm
- XYZ resolution: 6.9, 6.9, 2.5 micron
- Build plate temperature: 20-140 °C
- Nozzle Temperature: 180-280 °C

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## Reference Documentation

PVA Temps:

Extruder: 220 C Bed: Whatever structural filament recommends

ABS Temps:

Extruder: 230 C Bed: 100 C

[ultimaker s5 specs](#)

[ultimaker 3 extended specs](#)

[Quick start guide](#)

[um180129\\_ultimaker\\_3\\_manual\\_rb\\_v12\\_english.pdf](#)

<https://support.ultimaker.com/hc/en-us/articles/360012007119>

[pva\\_drying\\_recipe.pdf](#)

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