

Maintenance Guide

SOURCE:

<https://support.zortrax.com/m300-maintenance-guide/>

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Main



ACTIVITY

Cleaning the machine, its interior and surroundings, especially the bottom plate under the platform

Cleaning the motherboard and the power supply unit from dust using compressed air

FREQUENCY

Before each printing

Every 300 working hours

Hotend



ACTIVITY

Checking if the hotend and the nozzle are not clogged
Cleaning the nozzle

Checking if the screws that secure the heater and thermocouple are tightened

FREQUENCY

Before each printing process
After finishing one spool of material
Every 300 working hours

Platform



ACTIVITY

Cleaning the perforated plate

Checking the perforated plate for deformation

Calibration

Cleaning the heatbed and the underside of the perforated plate

FREQUENCY

Before each printing process

Before each printing process

Every 200 working hours

Every 300 working hours

X/Y Axes; Extruder Guide Rails



ACTIVITY	FREQUENCY
Checking if the axes and the extruder guide rails are clean from material remains and dust	Before each printing process
Checking the tension of the drive belts on the X/Y axes	Every 300 working hours
Checking the tension of the drive belts between the motors and the X/Y axes	Every 300 working hours
Checking if the screws on the X/Y axes and the motor pulleys are tightened	Every 300 working hours
Checking if the extruder moves freely when the printer is off	Every 300 working hours
Lubricating the X/Y axes and the extruder guide rails	Every 200 working hours

Extruder



ACTIVITY

Checking if the extruder top cover and the material guide are properly installed

Checking if the material guide is properly secured to the extruder cable with the material guide clamps

If you use the HEPA Cover, check if it does not press the extruder cable

Checking if the extruder cable is properly plugged into the extruder PCB

Checking if the extruder PCB is properly secured to the extruder block

Checking if the pins on the extruder cable connector are clean

Checking if the screws that secure the hotend are not loose, and, if necessary, tightening them

Removing the material remains and lumps from the extruder

Checking if the fans are working

FREQUENCY

Before each start-up of the printer

Before each start-up of the printer

Before each start-up of the printer

Every 300 working hours

Every 300 working hours

Every 300 working hours

Every 300 working hours

Every 300 working hours

Every 300 working hours

Z axis



ACTIVITY

Checking if the Z-axis screw and rails are clean from material remains
Lubricating the Z-axis screw and rails

FREQUENCY

Before each printing
Every 400 working hours

Suggested Part Replacement Time

The table shows approximate replacement time of components that are exposed to natural wear and tear. In order to maintain the printer in good condition and to provide the highest printing quality, it's advisable to replace particular components after an appropriate period of time indicated in the table.

NOTE! The lifespan of particular components highly depends on the type of filaments you use most often.

Nozzle	Hotend	Perforated Plate v2	Extruder Cable	Heater and Thermocouple	Extruder Fans 40x40
Every 250 working hours	Every 350 working hours	Every 700 working hours	Every 500 working hours (when using Extruder Printed Cover v2)	Every 400 working hours	Every 500 working hours