

# Table of Contents

## How to replace the Chamber fan (CORE One)

.....	3
Step 1 - Introduction .....	4
Step 2 - Tools necessary for this chapter .....	5
Step 3 - Printer preparation .....	5
Step 4 - Removing the printer top cover .....	6
Step 5 - Protecting the heatbed .....	7
Step 6 - Removing the side cover .....	8
Step 7 - Removing the side panel .....	8
Step 8 - Removing back cover .....	9
Step 9 - Removing xBuddy cover .....	9
Step 10 - Disconnecting the cables .....	10
Step 11 - Removing the chamber fans .....	11
Step 12 - Preparing parts .....	12
Step 13 - Placing the chamber fans .....	13
Step 14 - Placing the fan grid assembly .....	14
Step 15 - Securing the fans .....	15
Step 16 - Connecting the cables .....	16
Step 17 - Covering the buddy box .....	17
Step 18 - Installing the back cover .....	17
Step 19 - Installing the side cover .....	18
Step 20 - Turning the printer on .....	18
Step 21 - Final check .....	19



# How to replace the Chamber fan (CORE One)

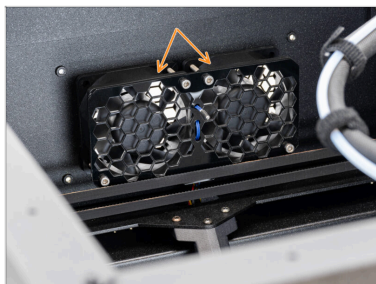


[help.prusa3d.com/g944814](https://help.prusa3d.com/g944814)

Scan the QR code to  
display the latest  
version of this  
chapter.



## STEP 1 Introduction



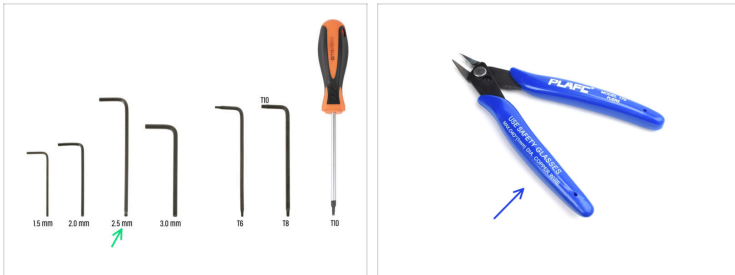
🟡 This guide will take you through the **chamber fan** replacement on your **Prusa CORE One**.

⬛ All necessary parts are available in our eshop [prusa3d.com](https://prusa3d.com).

ⓘ Note that you have to be logged in to have access to the spare parts section.

📌 Keep the fasteners and parts that you remove from the printer during the process at hand; they will be reused.

## STEP 2 Tools necessary for this chapter



- ◆ Please prepare tools for this guide:
  - ◆ 2.5mm Allen key
  - ◆ Flush cutters are recommended as an optional tool.

## STEP 3 Printer preparation



- ◆ Open the menu **Control -> Auto Home**.
- ◆ Wait until autohoming is complete.
- ◆ Open the menu **Control -> Move Axis -> Move Z** and set it to **100 mm** or more.
- ◆ Wait until the heatbed moves down.
- ◆ Turn the printer off using the switch on the back.
- ◆ Disconnect the printer from power.

## STEP 4 Removing the printer top cover



- Open the printer. From the inside, reach for the nylon rivets on the front right of the top cover. Push it out to unlock it.
- Then, remove the rivet from the outside.
- Remove the remaining nylon rivets on the top cover using the same technique.
- Remove the top cover.

---

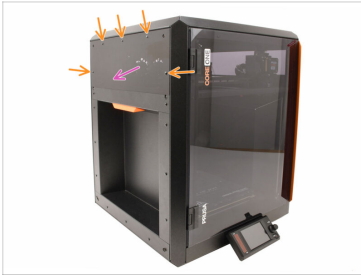
## STEP 5 Protecting the heatbed



**⚠ Before proceeding any further, it is recommended to protect the heatbed first!**

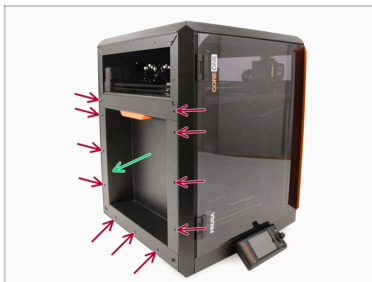
- Use a piece of fabric, cardboard, bubble wrap, or any soft material to cover the heatbed. This will prevent damaging the heatbed/print sheet during the process.

## STEP 6 Removing the side cover



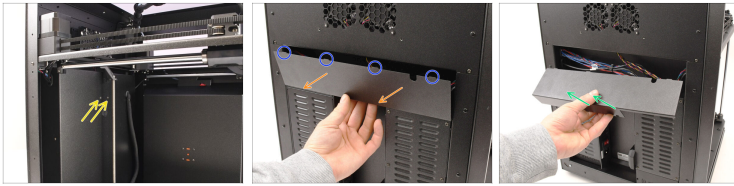
- Remove the five nylon rivets holding the plastic side cover.
- We recommend using flush cutters to lift the top part of the rivet, unlocking it. Then, remove the bottom part of the rivet.
- Remove the plastic side cover.

## STEP 7 Removing the side panel



- Remove the eleven marked nylon rivets holding the side sheet metal panel.
- Remove the panel.

## STEP 8 Removing back cover



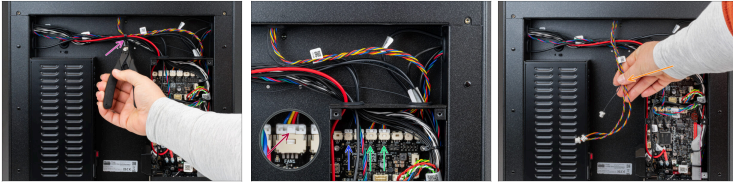
- On the inside of the printer, remove two M3x4rT screws holding the back cover.
- On the back of the printer, slide the center of the back cover down to disengage the four top tabs.
- Ensure the four tabs on top of the cover are disengaged from the metal chassis.
- Move the cover slightly towards the back.
- Pull the bottom part of the cover outward while tilting the top toward the printer. This will unhook it from the cable bundle behind.

## STEP 9 Removing xBuddy cover



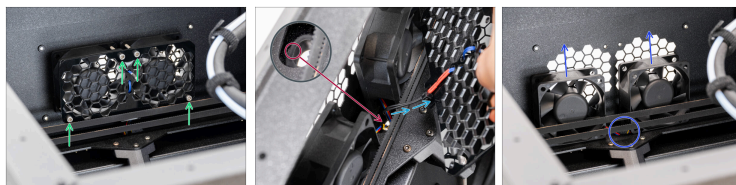
- Remove the six M3x4rT screws holding the xBuddy box cover.
- Remove the cover by sliding it out.

## STEP 10 Disconnecting the cables



- ✿ Cut the zip tie. Be careful not to cut any cables.
- ⬛ Disconnecting the connectors.
  - ⚠ Each connector has a **safety latch**. It is necessary to press the latch before pulling the cables out. Otherwise, the **connector may get damaged**.
  - ⬢ Press the safety latch and disconnect the fan thermistor.
  - ⬢ Press the safety latch and disconnect both chamber fan cables.
- ⬢ Remove the cables from the xBuddy box.
  - 📌 There are grommets in the holes in the xBuddy box. The grommets must stay in place.

## STEP 11 Removing the chamber fans



- ◆ Now turn the printer around. The following steps will take place inside the printer.
- ◆ Remove the four M3x30 screws.
- ◆ Remove fan grid assembly with thermistor and both fans.

**⚠ There is a grommet in the hole on the back panel. The grommet must stay in place.**

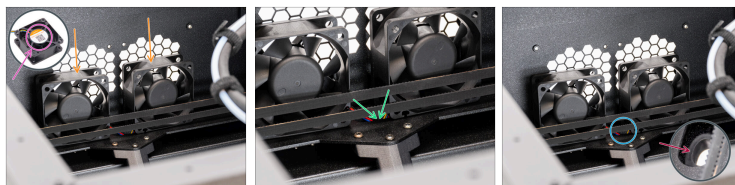
- ◆ Pull out the fan grid assembly with the thermistor. Carefully pull the thermistor cable out through the holes in the back panel and in the coreXY.
- ◆ Remove both fans. Carefully pull the cables out through the holes on the back panel and the coreXY.
- ⓘ Move the turbines you are replacing away from your workspace to prevent mixing them up with the new parts.

## STEP 12 Preparing parts



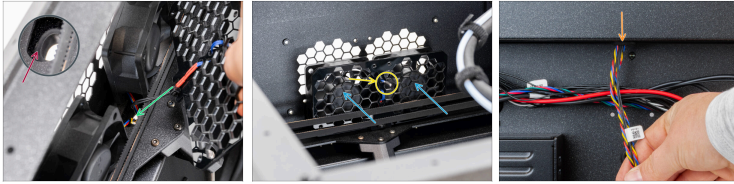
- ◆ For the following steps, prepare:
- ◆ Chamber fan (1x or 2x depending on your needs)  
*new one or from the previous steps*
- ⓘ Can be purchased on Prusa E-shop
- ◆ Zip tie (1x)

## STEP 13 Placing the chamber fans



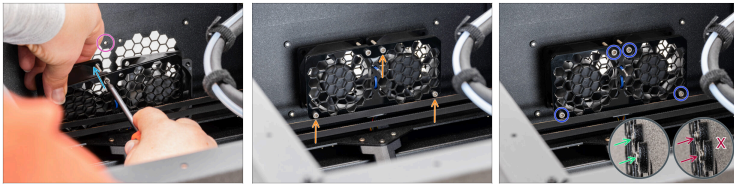
- ✦ Place both chamber fans on top of the coreXY assembly.
- ✦ The side of the fans without the sticker must be facing forward.
- ✦ Orient the fans so that the cables run from the corners in the centre.
- ✦ The grommet in the back panel must stay in place.
- ✦ Push the fan cables through the oval hole in the coreXY assembly.

## STEP 14 Placing the fan grid assembly



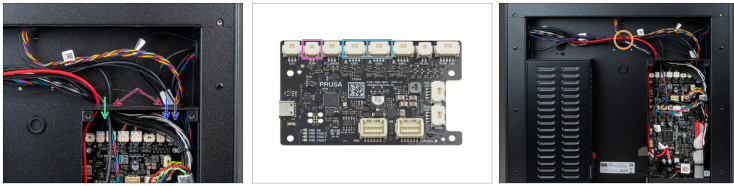
- ◆ The grommet in the back panel must stay in place.
- ◆ Guide the thermistor cable through the hole in the coreXY assembly, towards the back panel.
- ◆ Place the fan grid assembly in front of the chamber fans.
  - ◆ Install the fan grid with the thermistor facing forward. **The metal part of the sensor should not touch the grid.**
- ◆ From the back of the printer, ensure that all cables are fully routed through the holes. Verify that the grommet remains in place; if not, replace it.

## STEP 15 Securing the fans



- ◆ Insert one M3x30 screw through the fan cover and the chamber fan.
  - ◆ Attach the one screw to the back of the printer. Do not fully tighten yet.
  - ◆ Use your other hand to help guide the chamber fans into the correct position. Attach the three M3x30 screws through the fan cover and the chamber fans to the back of the printer. Do not tighten them yet.
  - ◆ Carefully tighten all four screws. **Keep the following in mind:**
    - ◆ The screws should be tightened just slightly. Check from the other side of the printer to ensure proper alignment.
- ⚠ Overtightening may damage the print fan grid.**

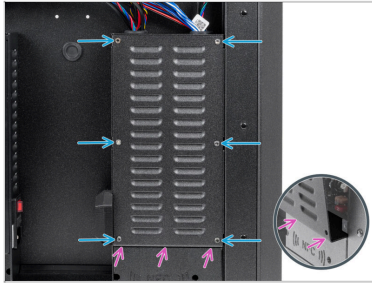
## STEP 16 Connecting the cables



- ◆ Now turn the printer around. The following steps will take place at the back of the printer.
- ◆ The grommets in the xBuddy box must stay in place.
- ◆ Route the print fan cables through the right hole on top of the xBuddy box.
  - ◆ Connect the cables to the FAN1 and FAN2 connector. It does not matter which cable is connected to which connector.
- ◆ Route the thermistor cable through the left hole at the top of the buddy box.
  - ◆ Connect the cable to the TEMP connector.
- ◆ Secure all cables with a zip tie.

---

## STEP 17 Covering the buddy box



- ✿ Carefully cover the xBuddy box by first sliding the bent part of the cover into the box.
- ⬢ Secure the xBuddy box cover using the six M3x4rT screws.

---

## STEP 18 Installing the back cover



- ⬢ Align the rear sheet metal cover so that the cables run over the "tray" part.
- ✿ Place the rear sheet metal cover into the recess. Push it toward the printer, then move it upward to engage it.
  - ✿ There are four tabs that should engage into the printer's chassis.
- ⬢ Secure the rear cover in place using two M3x4rT screws from inside the printer.

## STEP 19 Installing the side cover



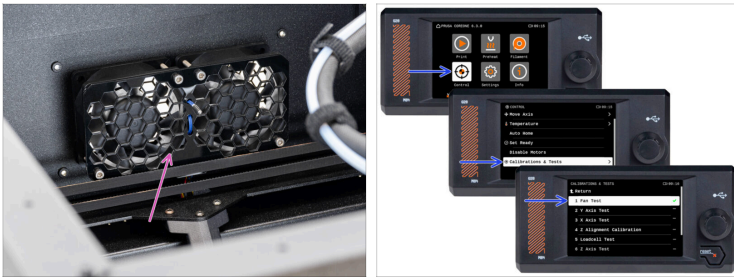
- Add the side sheet metal panel to the printer and align it with the opening.
- Secure the panel in place with 11 Nylon rivets in the marked spots.
- Add the plastic cover onto the top part and align it with the opening.
- Fix it in place using 5 Nylon rivets.

## STEP 20 Turning the printer on



- Connect the printer to power.
- Turn the printer on using the switch on the back.

### STEP 21 Final check



- ◆ The chamber fan replacement is finished. Compare your assembly with the reference image to ensure everything is positioned correctly.
- ◆ To test out the chamber fan functionality, visit the menu **Control -> Calibrations & Tests -> Fan Test**
- ⓘ Great job! You can now resume using your printer.



---

---

---

---

---

---

---

---

---

---



---

---

---

---

---

---

---

---

---

---

