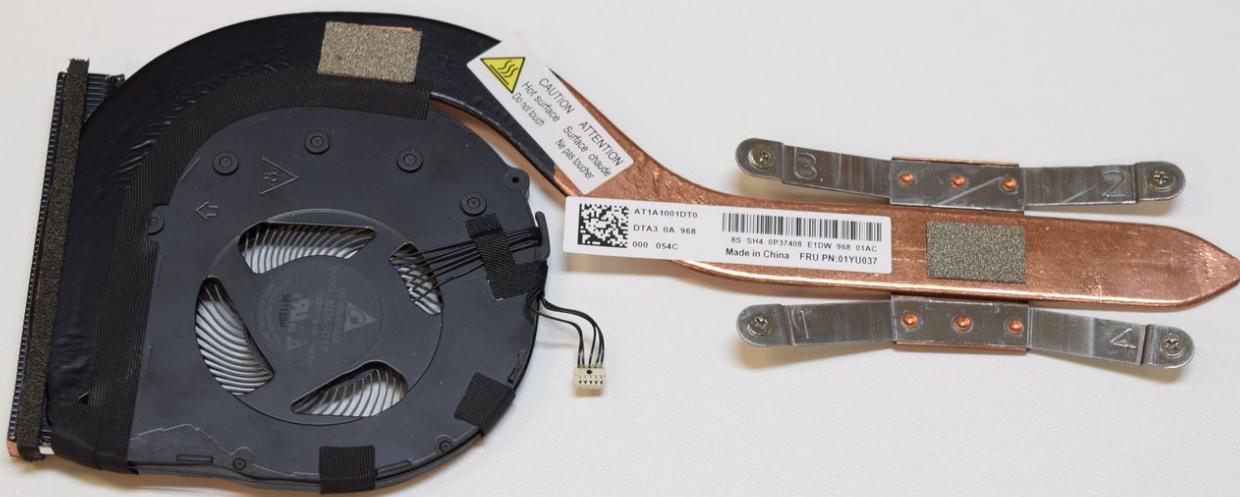




Lenovo ThinkPad X1 Carbon 7th Gen Thermal Fan Assembly Replacement

How to replace the thermal fan assembly in a Lenovo Thinkpad X1 Carbon 7th Gen.

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INTRODUCTION

In the guide you will learn how to remove and replace the thermal fan assembly in the Lenovo ThinkPad X1 Carbon 7th Gen.

Damage to the computer can cause the fan to stop working, causing the computer to over heat, risking damage to the other components.

Before attempting any guide, ensure you shutdown and unplug your device.

TOOLS:

- [Phillips #0 Screwdriver](#) (1)
- [iFixit Opening Tools](#) (1)

Step 1 — Back Panel



⚠ You MUST go to BIOS settings (F1 on startup) and disable the built-in battery. Disconnect laptop from power source to avoid electric shocks.

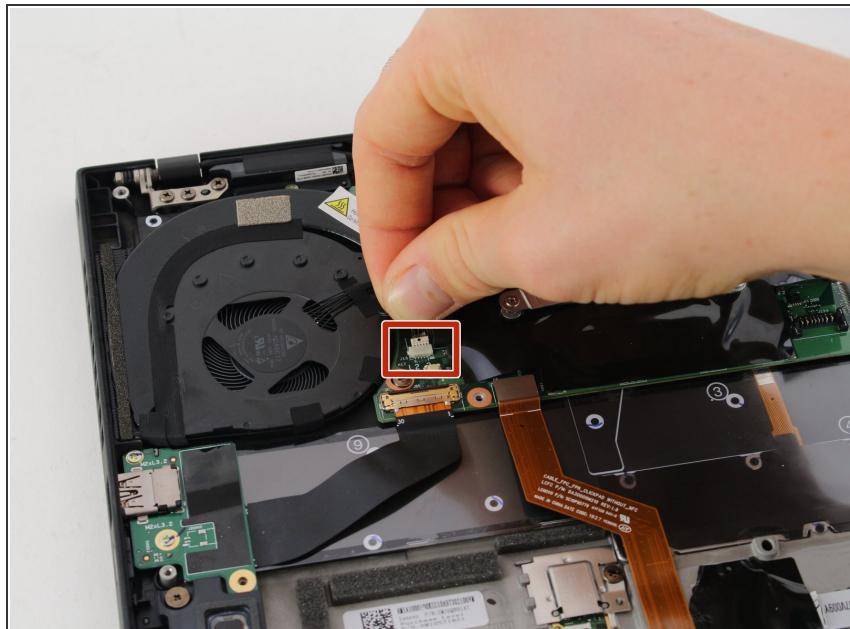
- Flip the laptop over on a flat surface with the back panel facing up.
- Remove five 5mm Phillips #0 screws from the edge of the back panel.
- Insert an opening tool between the back panel and edge. Maneuver the tool around the panel, disconnecting the clips holding the panel in place.

Step 2



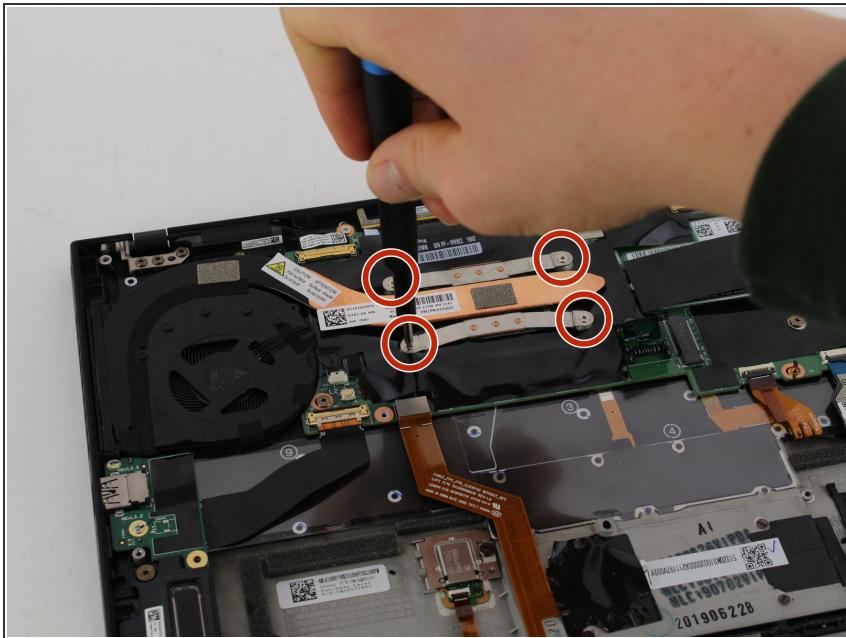
- Lift the back panel away from the device, exposing the internals.
- ☒ When reassembling, prioritize the tabs on the side that does not have any screws. This ensures that the tabs do not break.

Step 3 — Thermal Fan Assembly



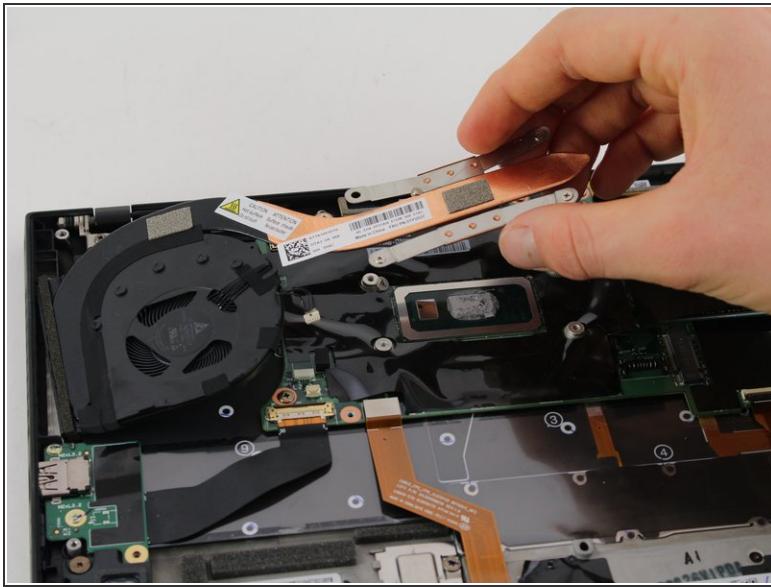
- Grab the thermal fan assembly connector with your fingers and gently pull upwards to disconnect it from the motherboard.

Step 4



- Remove four 3mm Phillips #0 heat sink screws following the numerical order engraved into the heat sink.

Step 5



- Grab the heat sink mounting brackets and lift up to remove the thermal fan assembly.

⚠ Heat sink may still be hot if laptop was recently powered off.

💡 When removing the heatsink, it's always good to [apply](#) a new layer of thermal paste, as it helps the heat sink pull heat away from the CPU.

To reassemble your device, follow these instructions in reverse order.