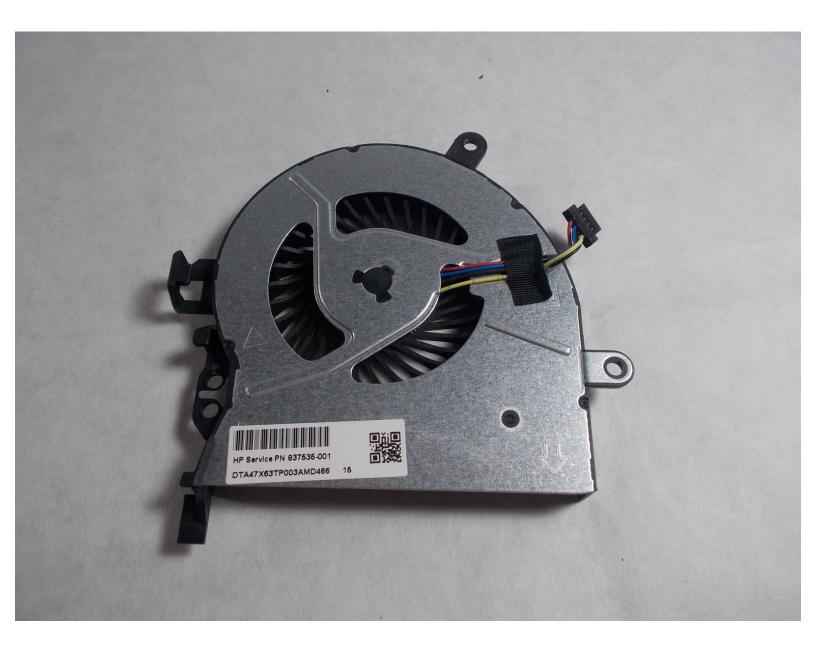


HP ProBook 450 G3 Fan Replacement

This guide will tell you how to replace the fan for an HP ProBook 450 G3.

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INTRODUCTION

A computer fan is a part that is constantly in use while the computer is on. This can cause it to eventually fail. This guide will show you how to replace your fan in order to extend the life of your laptop.

TOOLS:

- Phillips #00 Screwdriver (1)
- T8 Torx Screwdriver (1)
- Spudger (1)
- Tweezers (1)
- Metal Spudger (1)

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PARTS:
HP ProBook 450, 455, and 470 G3 Fan (1)
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Step 1 — Battery



Make sure you turn off the laptop before you start.

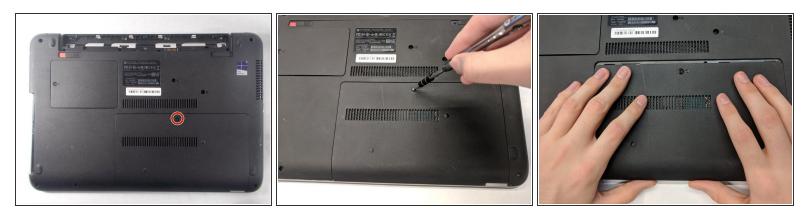
- Push the release on the right side of the computer to the center.
- Push and hold the release on the left side of the computer towards the center.

Step 2



• Once the releases are in position, pull the battery out.

Step 3 — Hard Drive



(i) The screw will not come out, after you unscrew it.

- Unscrew the 2.5 mm screw with PH00 screwdriver.
- Pull the cover off the computer using two hands.

Step 4



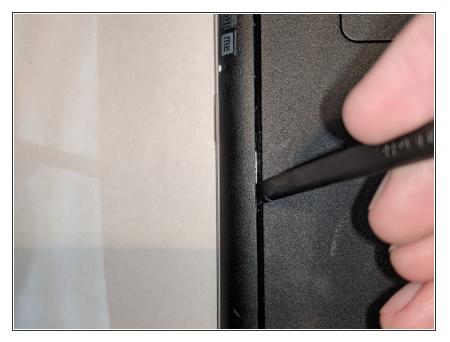
- Unscrew the all four 2.5 mm screws with the PH00 screwdriver.
- Then carefully pull to the right the hard-drive. It should release from its container.

Step 5 — Optical Drive



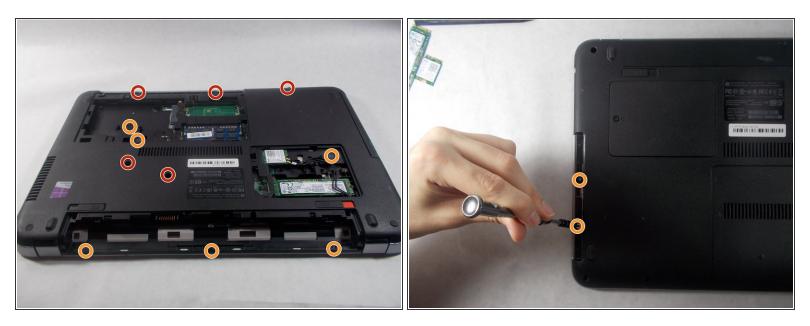
- Remove the 2.5 torx screw.
- Pivot the spudger between the harddrive and the optical drive. Push the optical drive away from the center of the computer.

Step 6



• Using the spudger carefully place the pointed end into the gap that covers the optical drive.

Step 7 — Fan



- Once the battery, hard drive, and optical drive cover are removed, begin removing all of the screws on the bottom plate of the laptop.
- These are Phillips 00 5mm screws.
- There are also several Phillips 00 2.5mm screws under the battery, optical drive cover, and hard drive.



 Once all of the Phillips 00 screws are removed, use a spudger to remove the four rubber stops in each corner. Underneath, there will be four Torx bit 8 size 5mm screws that need to be removed.

Step 9



 Once all of the screws on the bottom are removed, flip your laptop over and open it so the keyboard is visible.

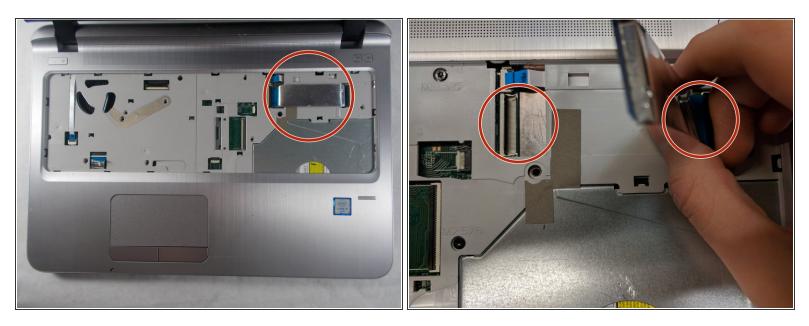


 To remove the keyboard, gently insert the spudger underneath it along an edge and work it around to unsnap

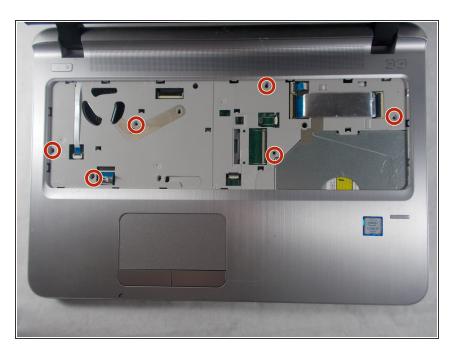
Step 11



 Once keyboard is removed, there will be two ribbon cables connecting the keyboard to the laptop. there will be two latches holding the cables in place on the laptop. to undo these latches, insert a spudger underneath the latch and lift up to free the cable.



• Do the same for the removal of the ribbon cable connecting the motherboard to the wireless card.



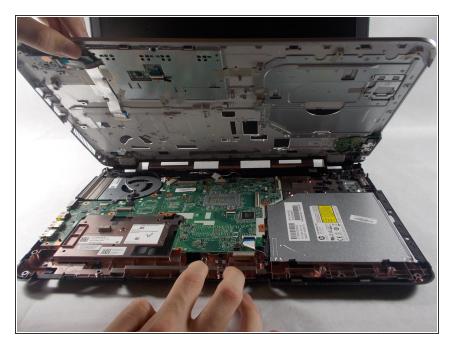
Step 13

 Underneath where the keyboard was, there will be more Phillips 00 5mm screws. Remove all of them.



 Once all of the screws are removed, you can open the laptop case itself.
 Begin by inserting a metal spudger between the top and bottom halves of the case. work your way all the way around slowly, unsnapping the snaps that hold the case together.

Step 15



 Once the case is separated, you can remove the metal part of the case from the laptop.

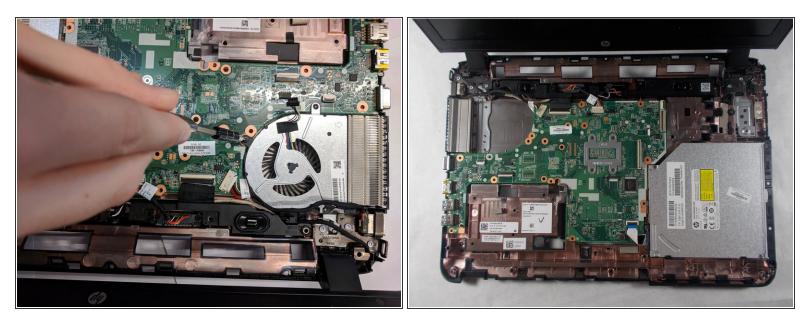


• Once the top part of the case is removed, you can access the fan, as well as other internal parts.

Step 17



• To remove the fan, begin by unlatching this cable, as you did in step 3.



Once this cable is undone, there will be a Phillips 00 2.5mm screw holding the fan in place.
 Remove it and the fan will be removable.

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