



Installing iMac Intel 27" EMC 2309 and 2374 Dual Drive

Trade your optical drive for a second hard drive or SSD.

Written By: Brittany McCrigler



INTRODUCTION

There are many benefits to adding a second hard drive or SSD to your iMac such as improved speeds, greater storage space, and less heartache when installing new software. Use this guide to install one using our optical bay hard drive enclosure.



TOOLS:

- [Heavy-Duty Suction Cups \(Pair\)](#) (1)
- [Paper Clip](#) (1)
- [Phillips #00 Screwdriver](#) (1)
- [Spudger](#) (1)
- [T10 Torx Screwdriver](#) (1)
- [Tweezers](#) (1)



PARTS:

- [12.7 mm SATA Optical Bay SATA Hard Drive Enclosure](#) (1)

Step 1 — Glass Panel



- Stick a heavy-duty suction cup near each of the two top corners of the glass panel.
- i To attach the [suction cups](#), first position the suction cup with the movable handle parallel to the face of the glass panel (as highlighted in the second picture).
- While lightly holding the suction cup against the glass, raise the movable handle until it is parallel with the other handle (as highlighted by the third picture).
- i If your suction cups refuse to stick, try cleaning both the glass panel and the suction cup with a damp soft, lint-free cloth. (Dampen with distilled water, and if needed, an equal ratio of distilled water and white vinegar for best results.)
- ! Do not use the suction cups to carry the display glass because if one of them fails to stick, you could drop the screen and break it.
- i The original iMac box makes a good place to store the glass panel. Otherwise, a padded horizontal surface, like a towel on a desk will do nicely.

Step 2



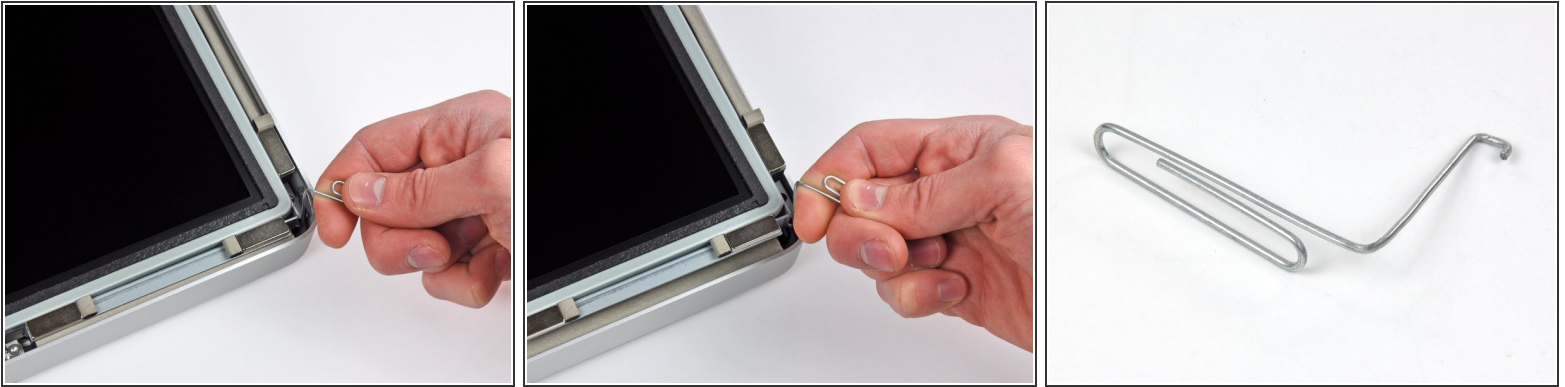
- Gently lift the glass panel perpendicular to the face of the LCD enough to clear the steel mounting pins attached along the underside of the top edge of the glass panel.
- Pull the glass panel away from the lower edge of the iMac and carefully set it aside.
 - ⚠ Don't use the suction cups to carry the glass panel—if either one loses its grip, the panel could fall and break.
 - ⚠ After setting the glass panel down safely, be sure to release the suction cups, as the suction force over time can crack the glass.
- 🔧 During reinstallation, be sure to meticulously clean the inside of the glass panel and the face of the LCD as any dust or fingerprints trapped inside will be annoyingly visible when the machine is turned on.

Step 3 — Display



- Remove the eight T10 Torx screws securing the LCD to the outer case.

Step 4



- Carefully lay the iMac stand-side down on a flat surface.
- i Due to tight tolerances, you will have to use a thin hooked tool to lift the display out of the outer case. As seen in the third picture, we made one out of a bent paperclip.
- Use a thin hooked tool to lift one side of the top edge of the display by its steel outer frame.
- i After lifting the top edge of the display on one side, hold it out of the outer case while you use a hooked tool to lift the other side. A pencil or pen can be placed under the top edge of the display, parallel to the top edge and extending past the edge of the computer, to keep the first side propped up while lifting the second.
- ! Do not lift the top edge of the display out of the outer case too far, as several short ribbon cables still connect the two components.

Step 5



- Use a pair of tweezers to pull the vertical sync ribbon cable out of its socket on the LED driver board near the top left corner of your iMac.
- ⓘ On some iMacs this may not be a ribbon cable but four separate, very fine and very fragile wires. Be very careful, if the tweezers slip off the plug, you will very likely pull a wire out of the assembly.

Step 6



- Rotate the display out of the outer case enough to disconnect the LED backlight power cable from the LED driver board.

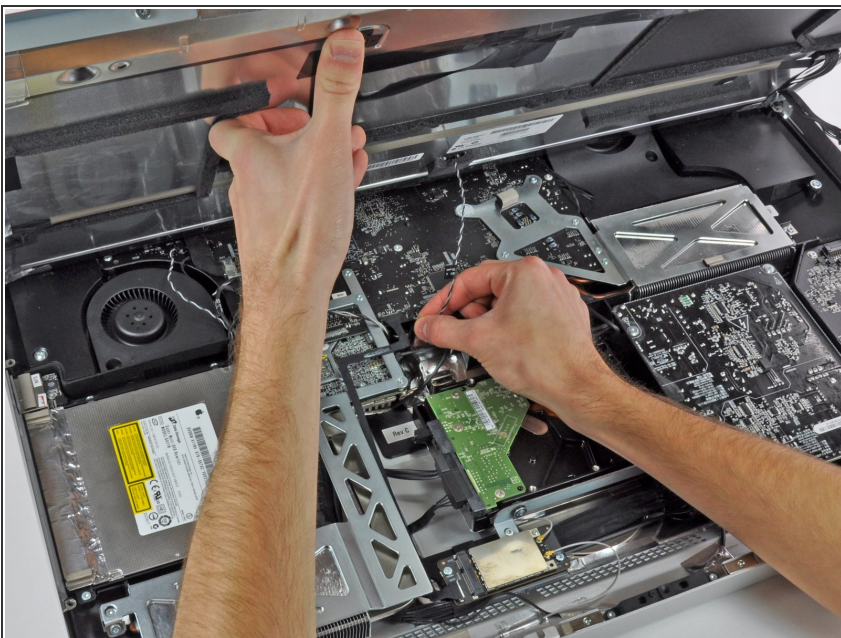
Step 7



- Squeeze the two display data cable connector arms together to unlock it from its socket on the logic board.
- Pull the display data cable connector away from its socket on the logic board.

⚠ Be very careful when disconnecting this cable as both the cable connector and logic board socket are extremely fragile. When reconnecting the cable later, use as little force as possible.

Step 8



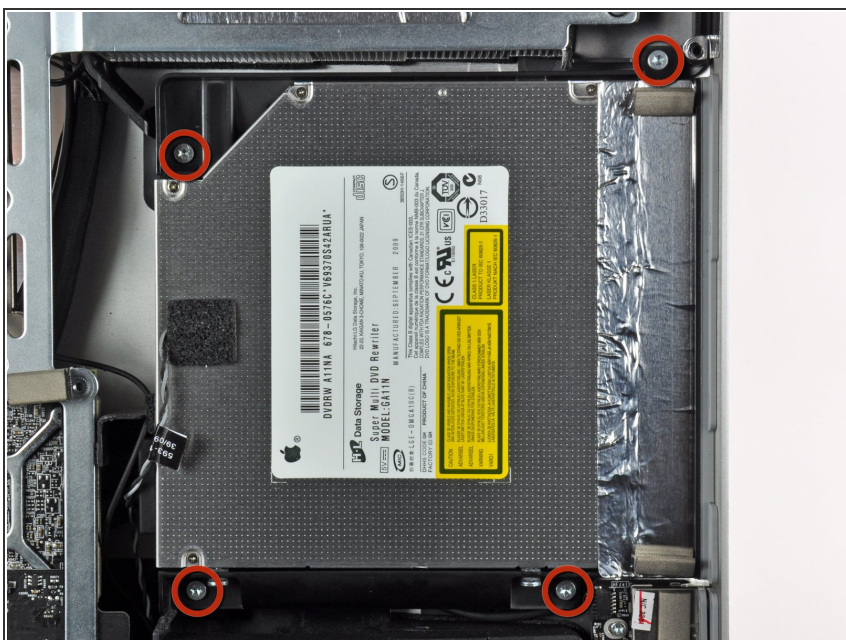
- Lift the display for enough clearance to disconnect the LCD thermal sensor cable connector from its socket on the logic board.
- ⓘ If your fan is spinning full speed after completion, check this connection or the hard drive's thermal sensor cable. The thermal sensor connector socket is very fragile, so be very careful when you connect back the sensor cable.

Step 9



- Carefully pull the display toward the top edge of your iMac and lift it out of the outer case.

Step 10 — Optical Drive



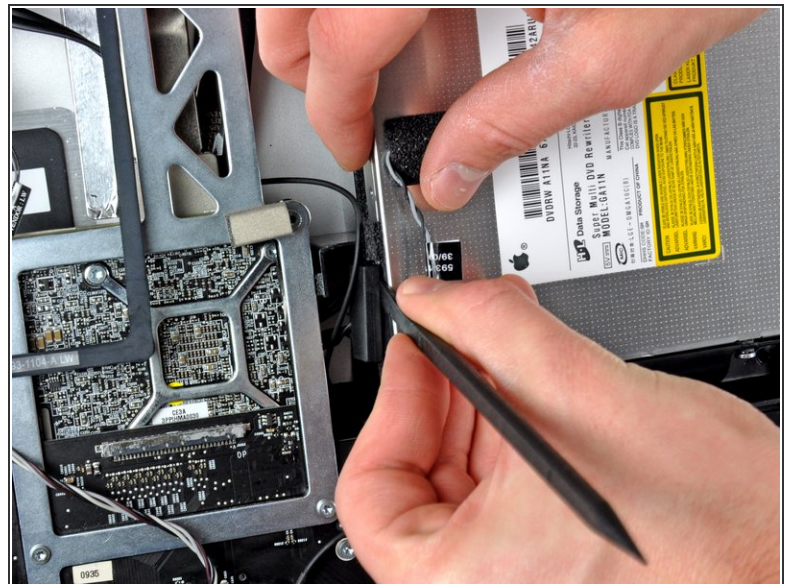
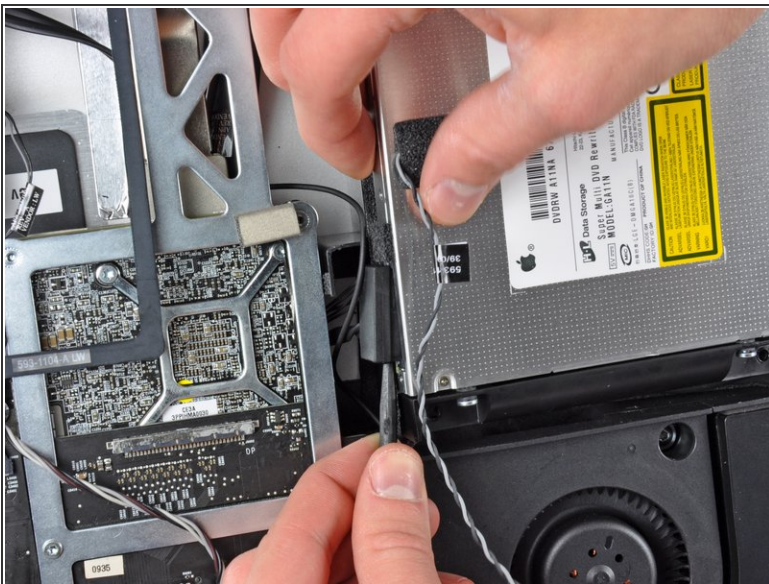
- Remove the four T10 Torx screws securing the optical drive to the outer case.

Step 11



- Pull the optical drive thermal sensor connector straight away from its socket on the logic board.

Step 12



- Insert a spudger between the optical drive connector and the optical drive.
- Twist the spudger to slightly separate the optical drive connector from the optical drive, then use your fingers to pull the connector away from the drive.

Step 13



- Lift the left edge of the optical drive slightly and pull it away from the right side of the outer case.
- During reassembly, note that there are two holes in the optical drive face plate into which two stubby plastic posts must engage for proper positioning.

Step 14 — Optical Drive



- Peel back the portion of aluminum tape highlighted in red, leaving the rest attached to the black plastic optical drive bracket.
- ⓘ It is not necessary to peel all of the EMI tape off the optical drive bracket.

Step 15



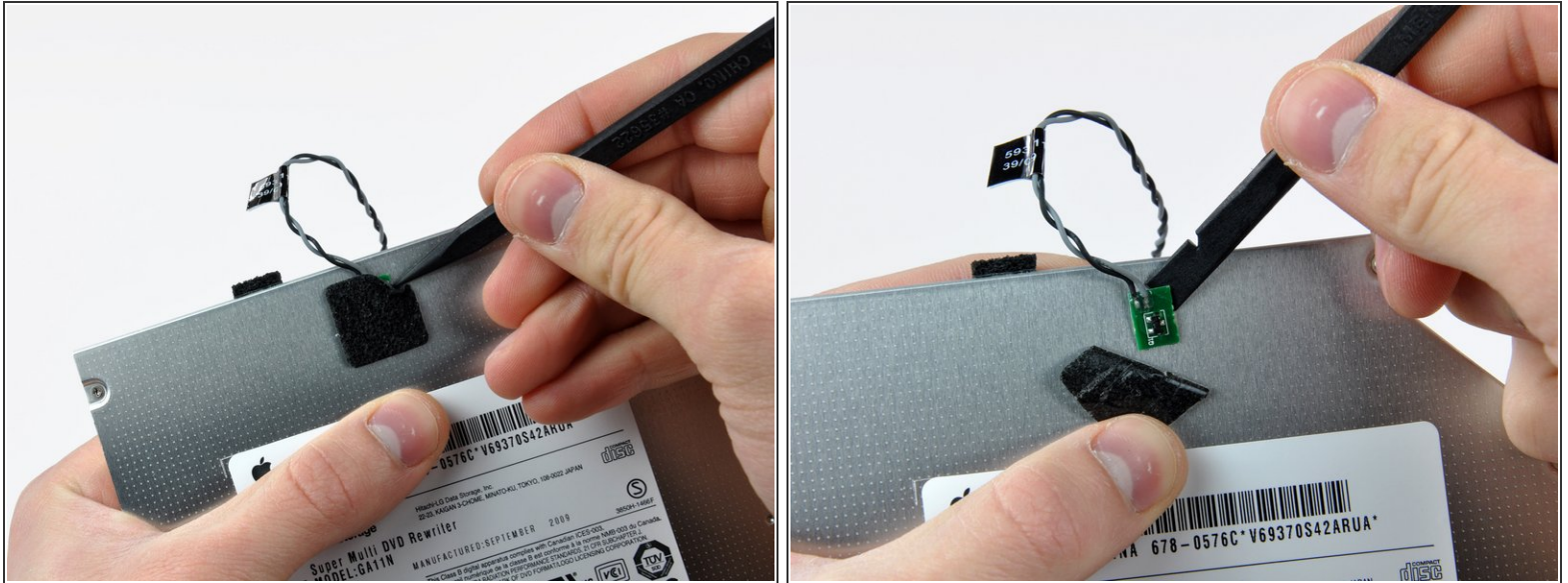
- Remove the two T10 Torx screws from each side of the optical drive (four screws total).

Step 16



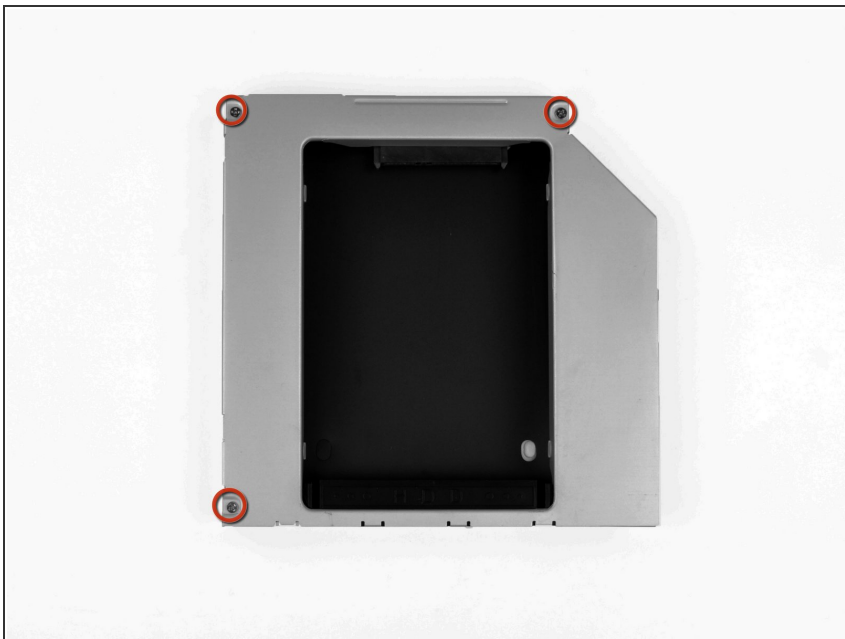
- Use the tip of a spudger to press each of the optical drive bracket tabs out of their slots on the bottom of the optical drive.
- Rotate the optical drive bracket slightly away from the optical drive.
- Pull the optical drive bracket away from the open end of the optical drive, minding any tabs that may get caught.

Step 17



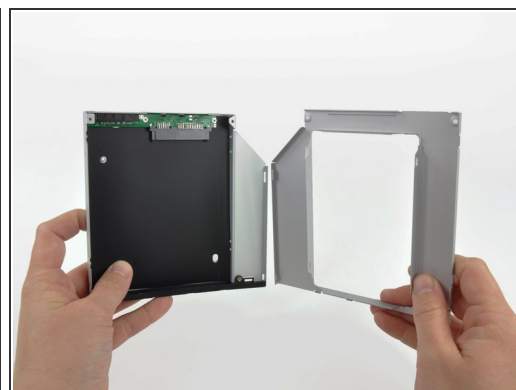
- Use the tip of a spudger to peel back the piece of foam tape covering the optical drive thermal sensor.
- Use the flat end of a spudger to carefully pry the thermal sensor up off the adhesive securing it to the optical drive.
- If you have a disc or anything else stuck inside your optical drive, we have a [guide](#) to fix it.

Step 18 — Optical Drive Enclosure Faceplate



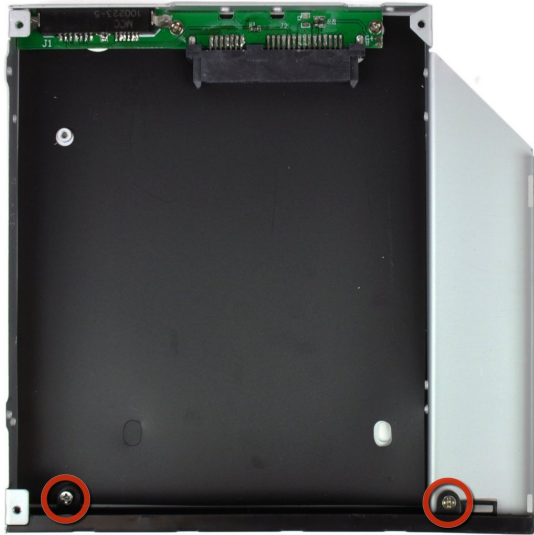
- Remove the three 3.0 mm Phillips #0 screws from the optical bay enclosure.

Step 19



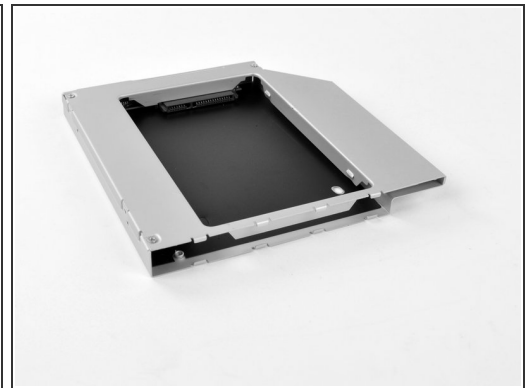
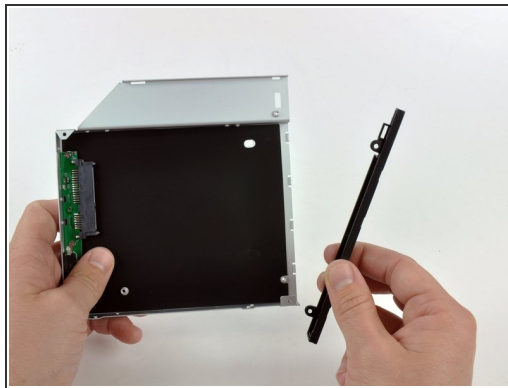
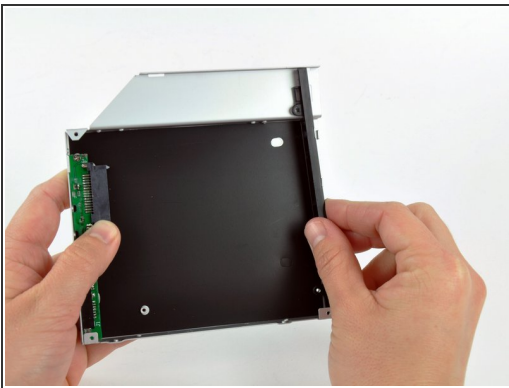
- Starting from the left edge, gently pull open the optical bay enclosure.
- Continue to pull open the two halves of the enclosure until they separate.

Step 20



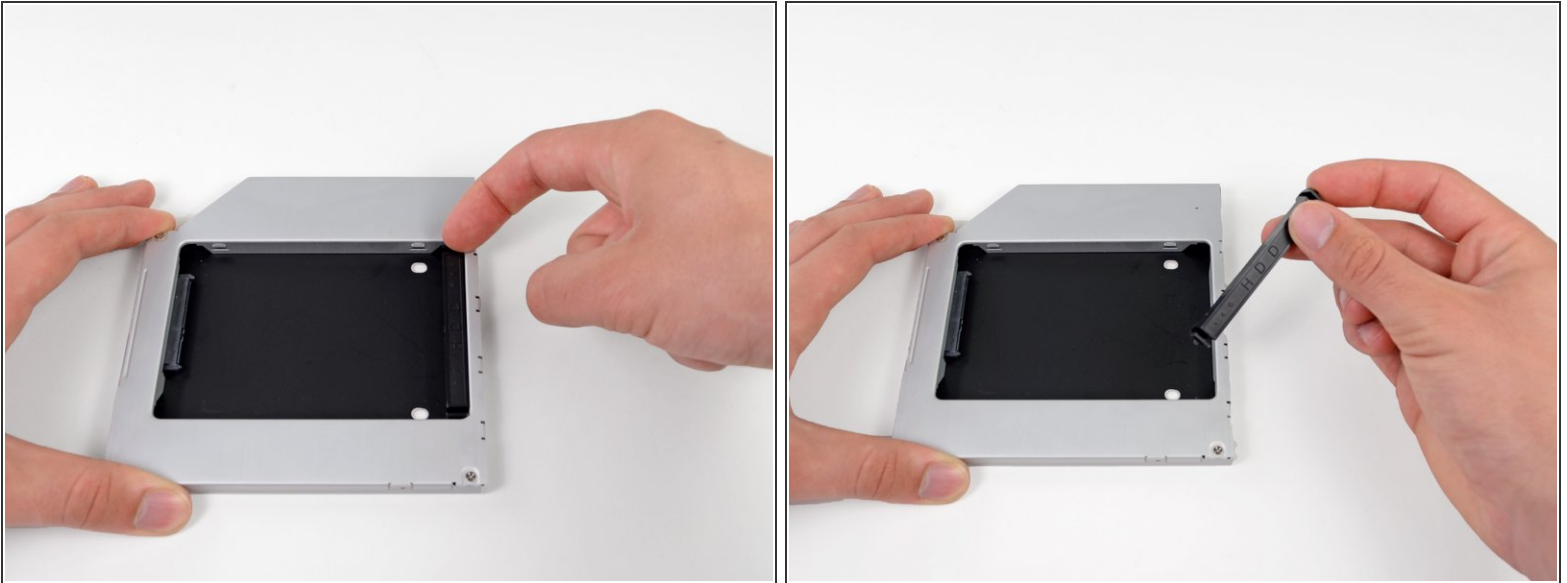
- Remove the two 3.0 mm Phillips #0 screws securing the faceplate to the optical bay enclosure.

Step 21



- Lift the black plastic faceplate out of the optical bay enclosure.
 - ⓘ You will no longer need the faceplate or the two Phillips screws that held it in place. Set those parts aside if you ever wish to put the faceplate back into the enclosure.
- Reassemble the optical bay enclosure without the faceplate, reusing the original three 3.0 mm Phillips screws to keep it intact.

Step 22 — Dual Hard Drive



- Remove the plastic positioner from the optical bay hard drive enclosure by pressing in on one of the clips on either side and lifting it up and out of the enclosure.

Step 23



- Make sure that the hard drive connectors are facing down before placing it into the enclosure.
- Gently place the hard drive into the enclosure's hard drive slot.
- While firmly holding the enclosure in place with one hand, use your other hand to press the hard drive into the enclosure connectors.

Step 24



- Once the hard drive is snug, reinsert the plastic positioner while holding the hard drive against the bottom of the enclosure.
- Reconnect any cables you have removed from the original optical drive onto the optical bay enclosure.

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