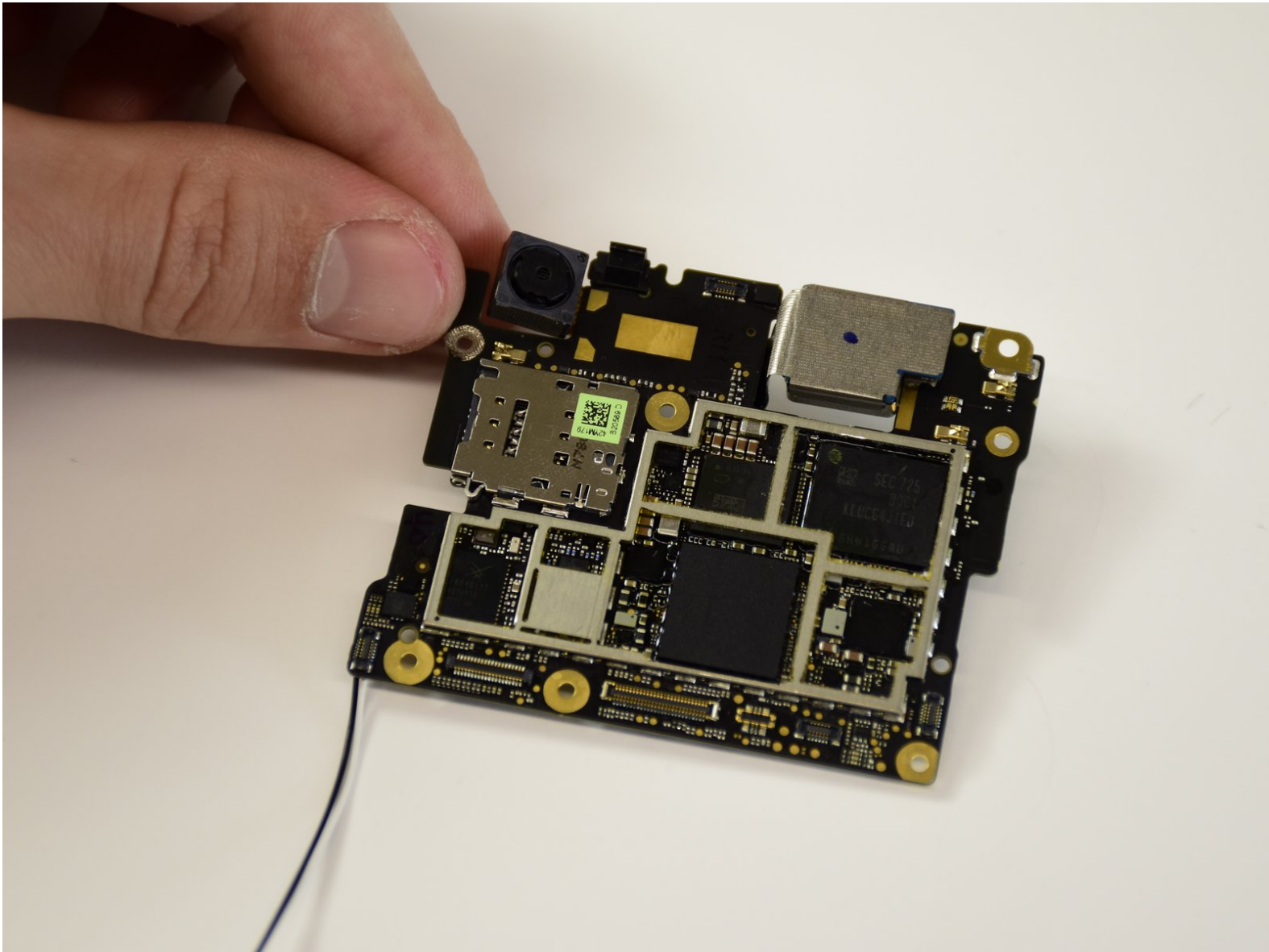




Google Pixel 2 Motherboard Replacement

Remove or replace the motherboard in the Google Pixel 2.

Written By: Nick Lyon



INTRODUCTION

This repair guide was authored by a member of the iFixit community and hasn't been endorsed by Google. Learn more about our repair guides [here](#).

Use this guide to remove or replace the motherboard in a Google Pixel 2.

Some guide images will show the phone with the battery removed. You do not need to remove the battery for this procedure.



TOOLS:

- [Phillips #00 Screwdriver](#) (1)
- [iFixit Opening Tool](#) (1)
- [iFixit Opening Picks \(Set of 6\)](#) (1)
- [Spudger](#) (1)
- [T5 Torx Screwdriver](#) (1)
- [iOpener](#) (1)
- [Suction Handle](#) (1)
- [Tweezers](#) (1)
- [SIM Card Eject Tool](#) (1)



PARTS:

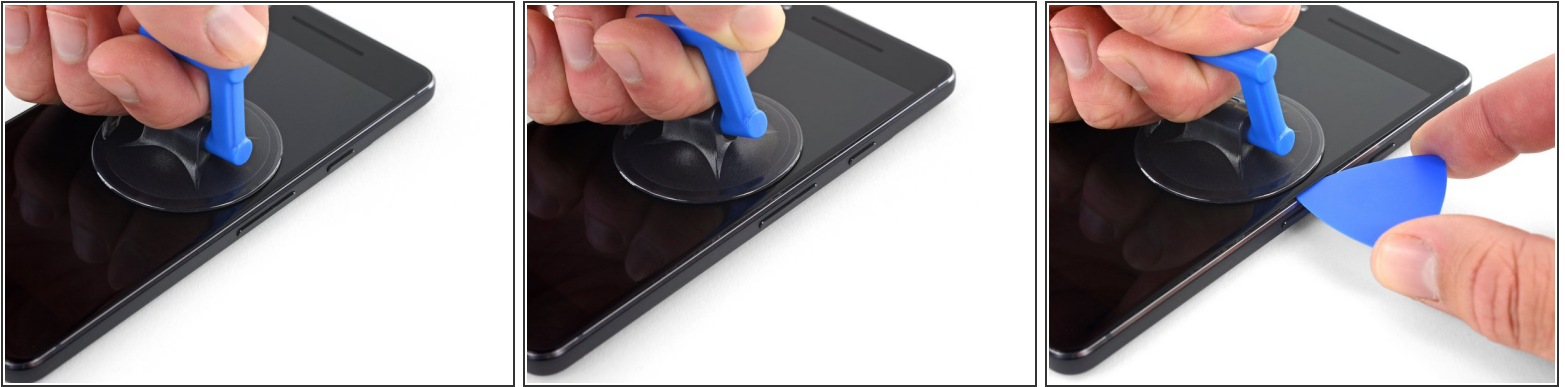
- [Google Pixel 2 Display Adhesive - Genuine](#) (1)
- [Tesa 61395 Tape](#) (1)

Step 1 — Opening Procedure



- If your display glass is cracked, keep further breakage contained and prevent bodily harm during your repair by taping the glass. This also makes a smooth surface allowing the suction cup to bond.
- Apply a suction cup as close to the volume button edge of the phone as you can while avoiding the curved edge.
- ⓘ The suction cup will not make a good seal on the curved portion of the glass.

Step 2



- Pull up on the suction cup with firm, constant pressure and insert an opening pick between the front panel and rear case.

⚠ Do not insert the pick deeper than 1.5 mm, or you risk damaging the OLED panel.

- ⓘ This requires a significant amount of force and patience. If you have trouble, rock the suction cup and screen to weaken the adhesive, or apply heat with an iOpener, heat gun, or hair dryer.

⚠ The display panel is fragile. If you plan to re-use your display, take care to insert your tool only as far as necessary to separate the adhesive. Inserting the tool any further can damage the OLED panel under the glass.

Step 3



⚠ In the following steps, extra caution is required in certain areas to avoid damage to the phone:

- Do not insert the pick more than 9 mm into the bottom edge of the phone. If the pick contacts the folded portion of the OLED panel it can damage the display.
- Only make very shallow cuts in the upper left corner, prying deeply can damage the front-facing camera.

⚠ Inserting an opening tool deeper than 1.5 mm into the sides of the device, or 9 mm into the top and bottom can permanently damage the display.

Step 4



i In the following steps, use the flat of the opening pick, rather than a corner, to cut here. This will help prevent inserting the pick too deeply.

- Slide the opening pick up the right side of the phone to separate the display adhesive.

! Take extra care with the side bezels, which are only 1.5 mm deep.

Step 5



- Slide the opening pick around the upper-right corner and along the top edge of the phone.

! There's a mesh covering the earpiece speaker on the top edge of the screen. If you don't have a replacement mesh, take care not to damage or lose this component.

Step 6



- Slide the pick around the upper-left corner of the phone and down the left edge of the phone.

Step 7



- Slide the pick around the bottom-left corner and along the bottom of the phone. Keep pick at a slight angle away from the screen to avoid damage to the OLED corners.

⚠ Take extra care not to insert the opening pick more than 9 mm to avoid damaging the OLED panel.

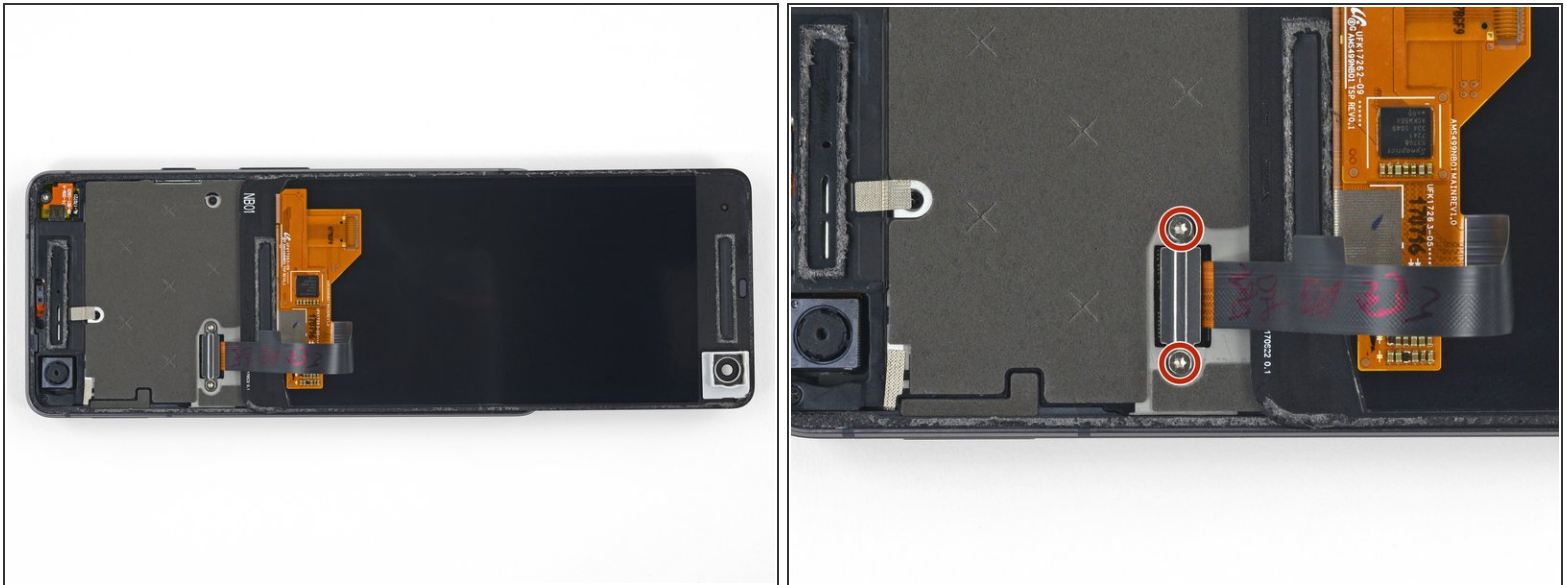
Step 8



- Reinsert the pick at the top edge of the phone and gently pry up the display.
 - ⓘ If the display doesn't readily lift, do some extra prying to separate the last of the adhesive. The adhesive near the upper speaker is thicker than other places.

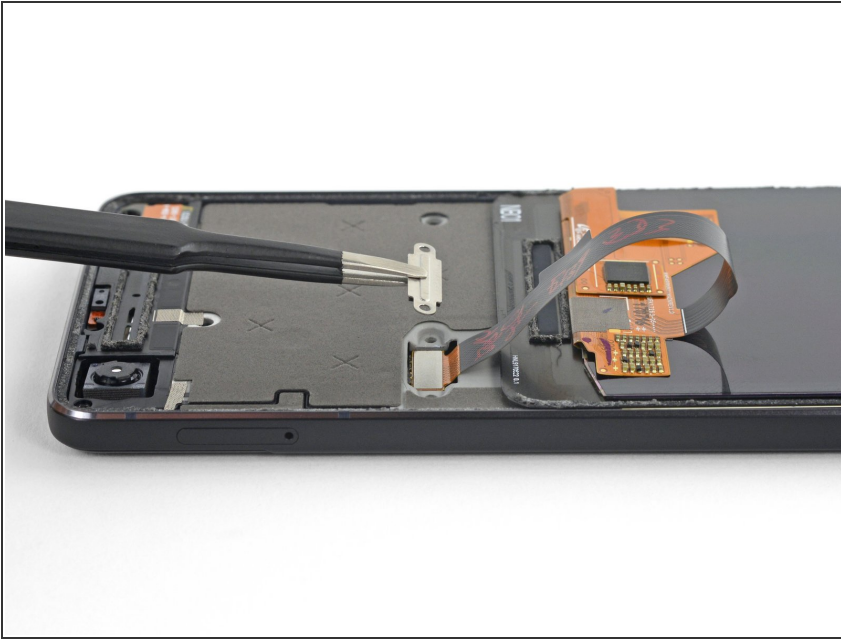
⚠ Don't try to fully separate the display yet, as a fragile ribbon cable still connects it to the phone's motherboard.

Step 9



- Carefully lay the display down on top of the rear case as shown, making sure not to crease or tear the display ribbon cable.
 - Remove the two 4.0 mm T5 Torx screws securing the display cable bracket.
- ✦ Throughout this repair, [keep track of each screw](#) and make sure it goes back exactly where it came from.

Step 10



- Remove the display cable bracket.

Step 11



- Use the point of a spudger to lift the display cable connector up and out of its socket on the motherboard.

⚠ Avoid touching the motherboard with the tip of your spudger. The components surrounding the socket are fragile.

- ☑ To re-attach [press connectors](#) like this one, carefully align and press down on one side until it clicks into place, then repeat on the other side. Do not press down on the middle. If the connector is misaligned, the pins can bend, causing permanent damage.
- ☑ If any part of your screen doesn't respond to touch after your repair re-seat this connector, making sure it clicks fully into place and that there's no dust or other obstruction in the socket.
- ☑ During reassembly, pause here and [replace the adhesive around the edges of the display](#).

Step 12 — Midframe



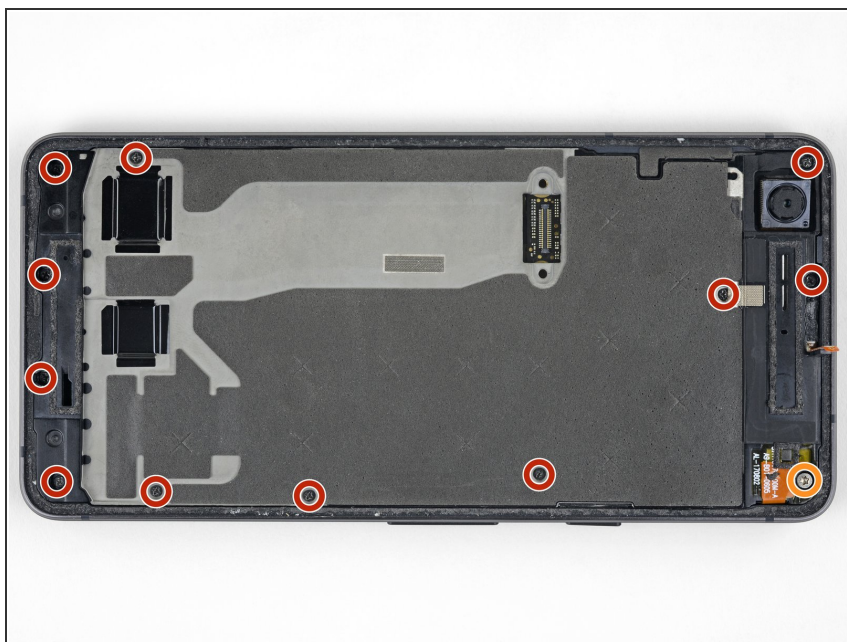
- Apply a [heated iOpener](#) to the proximity sensor on the top edge of the midframe for two minutes to soften its adhesive.

Step 13



- Slide the point of a spudger under the proximity sensor cable, starting from the side closest to the front-facing camera.
- Gently lift the edge of the sensor cable until the sensor is perpendicular to the midframe.

Step 14



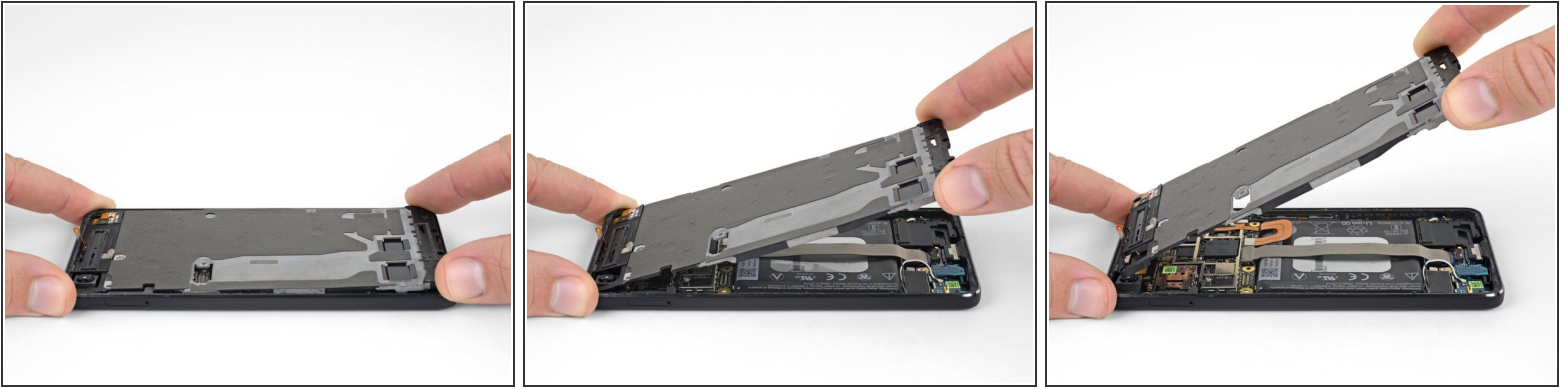
- Peel back the small piece of [tape](#) covering the screw below the earpiece speaker. Peel back any tape covering other screws as well.
 - Remove the following screws securing the midframe:
 - Eleven 3.7 mm Phillips screws
 - One 4 mm T5 Torx screw
- ☑ Throughout this repair, [keep track of each screw](#) and make sure it goes back exactly where it came from.

Step 15



- Insert an opening tool into the notch in the midframe near the hold button.
- Pry the midframe up enough to create a gap between it and the phone case. The midframe cannot yet be completely removed.

Step 16



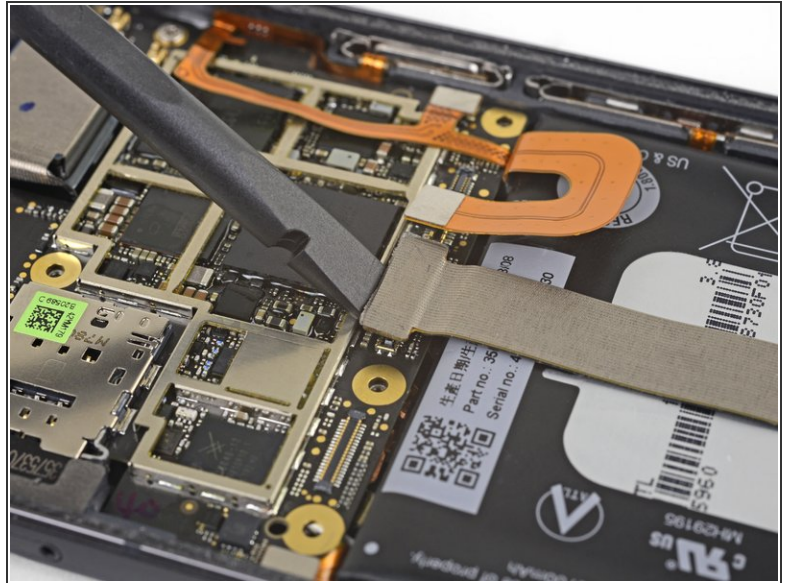
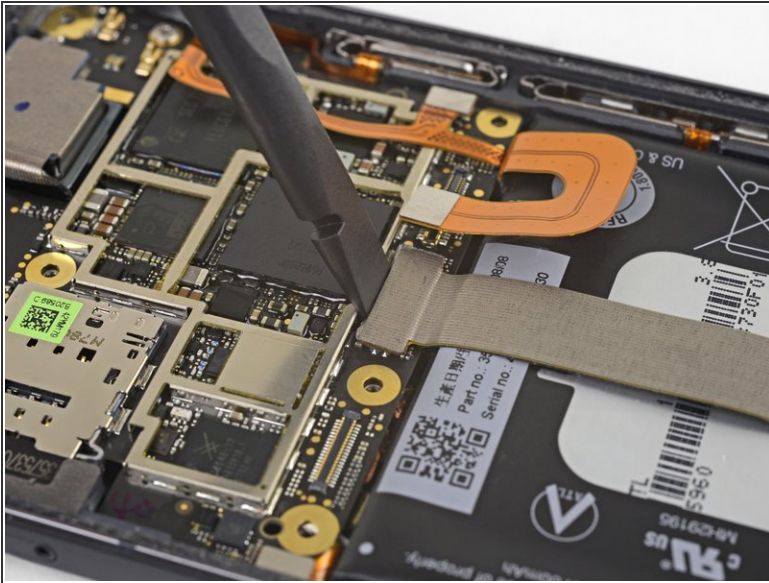
- Lift the midframe up starting from the bottom edge.
- When the midframe starts to make about a 45° with the rest of the phone, lift the midframe straight up and away from the phone.
- As you lift the midframe, carefully guide the proximity sensor through the small [slot](#) in the midframe.

Step 17 — Battery Connector



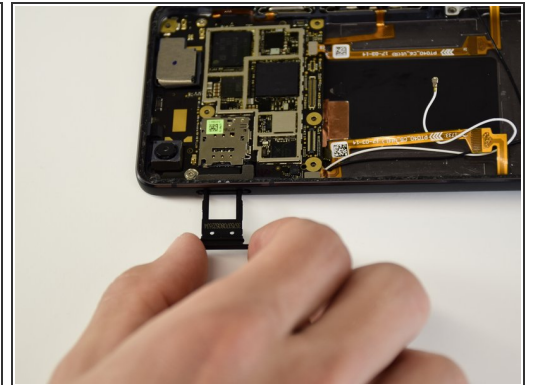
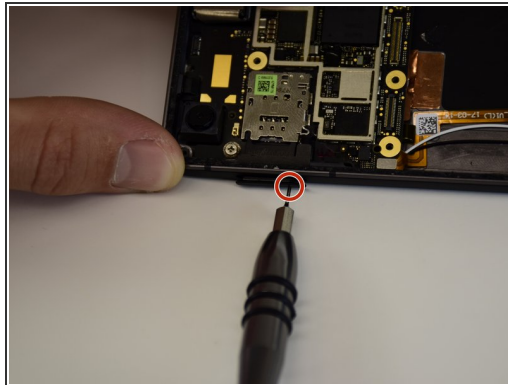
- Use the flat end of a spudger to disconnect the battery connector.

Step 18 — Motherboard



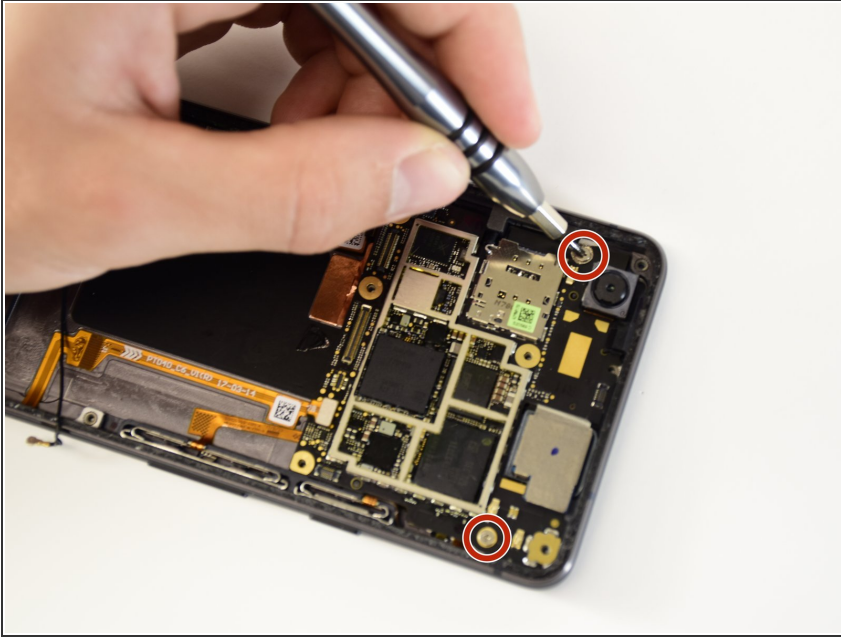
- use the flat end of a spudger to disconnect the charging assembly connector from the motherboard.

Step 19



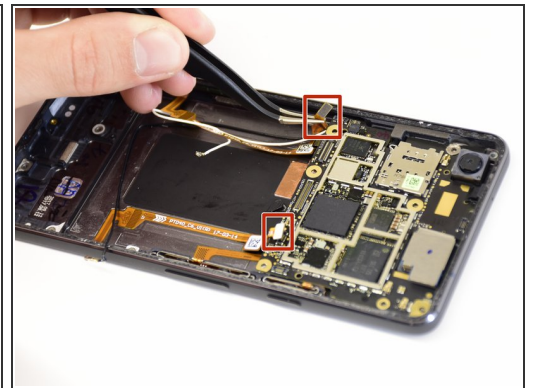
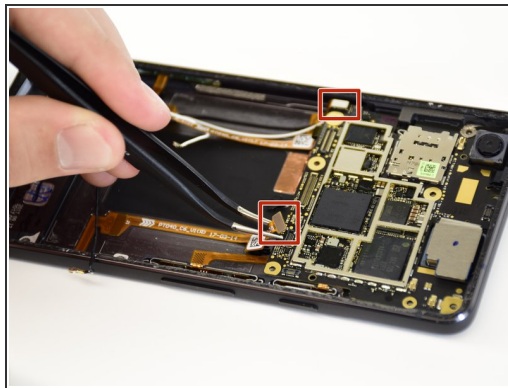
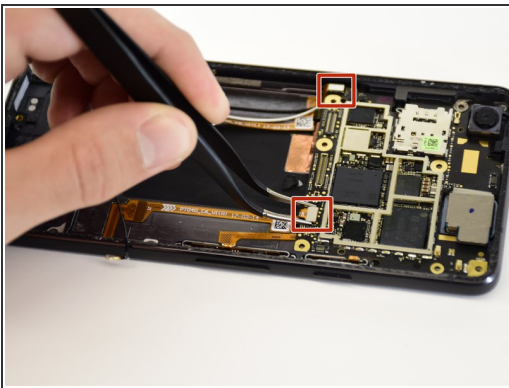
- Insert a paperclip or SIM eject tool into the small hole on the left side of the phone and push until the SIM card tray pops out.
- Remove the SIM card tray.

Step 20



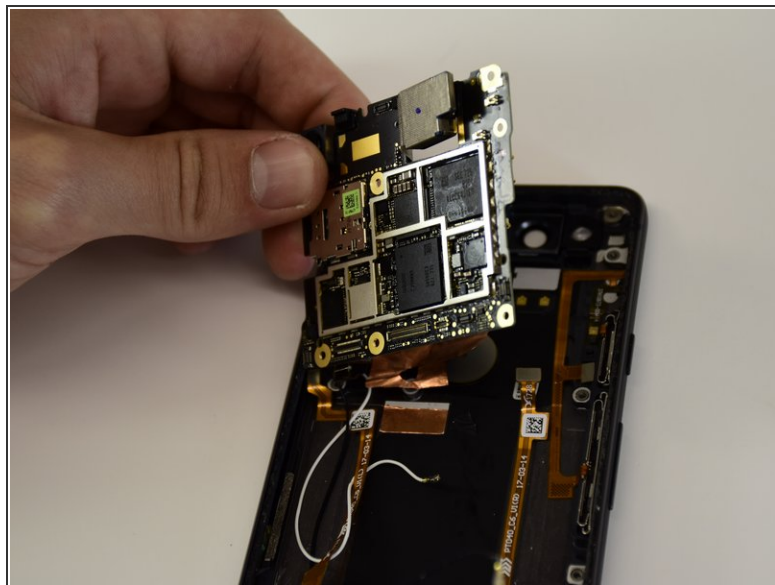
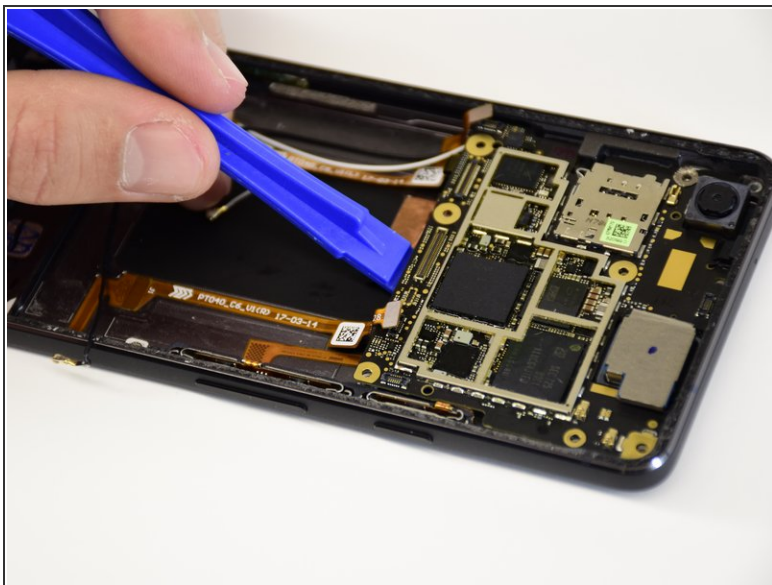
- Remove the two 2.5 mm PH00 screws.

Step 21



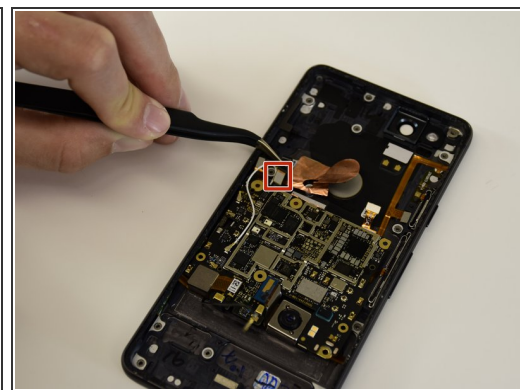
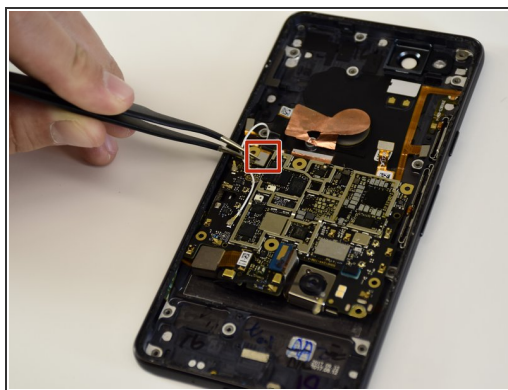
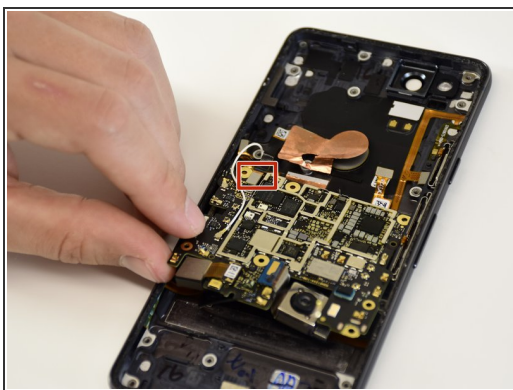
- Disconnect two connectors at the bottom edge of the motherboard.

Step 22



- Pry up the motherboard using a plastic opening tool.
- Remove the motherboard.

Step 23



- Flip the motherboard over.
- Disconnect the fingerprint sensor cable.
- ⓘ The motherboard is now completely detached from the phone.

Compare your new replacement part to the original part—you may need to transfer remaining components or remove adhesive backings from the new part before installing.

To reassemble your device, follow the above steps in reverse order.

Take your e-waste to an [R2 or e-Stewards certified recycler](#).

Repair didn't go as planned? Check out our [Answers community](#) for troubleshooting help.