



Apple Watch Series 4 Battery Replacement

Use this guide to replace a worn-out or dead...

Written By: Dominik Schnabelrauch



INTRODUCTION

Use this guide to replace a worn-out or dead battery in your Apple Watch Series 4.

This guide shows the procedure on the standard, GPS-only version of the watch, but the cellular/LTE version is similar.

For your safety, discharge your battery below 25% before disassembling your Apple Watch. This reduces the risk of a dangerous thermal event if the battery is accidentally damaged during the repair.

Note: If your battery is swollen, [take appropriate precautions](#).

During the display opening procedure of the Apple Watch it is likely to damage the force touch gasket. If you separate the gasket layers or cut the cable, you'll also need to replace the Force Touch gasket itself.

You'll need **replacement adhesive** to reattach components when reassembling the device.

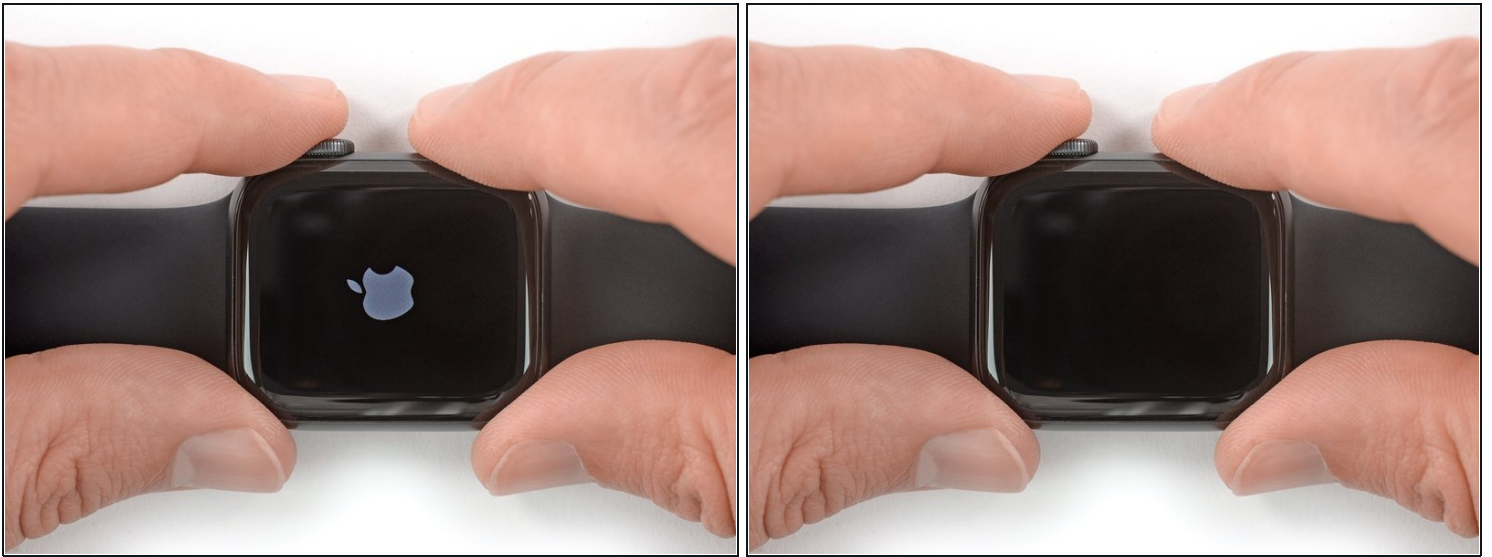
TOOLS:

- [Safety Glasses](#) (1)
- [ESD Gloves](#) (1)
- [iOpener](#) (1)
- [iFixit Opening Picks \(Set of 6\)](#) (1)
- [iFixit Opening Tool](#) (1)
- [Tweezers](#) (1)
- [Curved Razor Blade](#) (1)
- [Tri-point Y000 Screwdriver](#) (1)
- [Spudger](#) (1)
- [Isopropyl Alcohol 70%](#) (1)

PARTS:

- [Apple Watch \(40 mm Series 4\) Battery](#) (1)
- [Apple Watch \(44 mm Series 4\) Battery](#) (1)
- [Apple Watch \(40 mm Series 4/5\) Screen Adhesive](#) (1)
- [Apple Watch \(44 mm Series 4/5\) Screen Adhesive](#) (1)

Step 1 — Display Opening



- Before starting repairs, take your watch off the charger and power it down.
- If your touchscreen is broken and prevents powering off the watch, [use this alternate method to power it down](#).

Step 2 — Safety Requirements



- Because the gap between the screen and watch body is so thin, a sharp blade is needed to separate the two. **Read the following warnings carefully before proceeding.**
 - ⚠ **Protect your fingers** by keeping them completely clear of the knife. If in doubt, protect your free hand with a heavy glove, such as a leather shop glove or gardening glove.
 - ⚠ Be careful **not to apply too much pressure**, as this might cause the knife to slip and cut you, or damage the watch.
 - ⚠ **Wear eye protection.** The knife or glass may break, sending pieces flying.
- ⓘ Feel free to attach or remove the watch band as needed to provide more control as you make repairs.

Step 3



- [Prepare an iOpener](#) (or use a hair dryer or heat gun) and heat the face of the watch to loosen the display adhesive.
 - Leave the iOpener on the watch for at least two minutes to fully heat the screen and soften the adhesive holding it to the case.
- ⓘ You may need to reheat the iOpener and repeat this procedure several times until the display adhesive gets loose enough.

Step 4



- Place the edge of a curved blade into the thin gap between the display and the outer case. Start at the short side of the display, closest to the digital crown.
- Press firmly *straight down* into the gap.
- Once inserted, tilt the blade to pry the display open slightly.

⚠ Do not insert the knife more than 1/16th of an inch (~2 mm) to avoid damaging the Force Touch sensor.

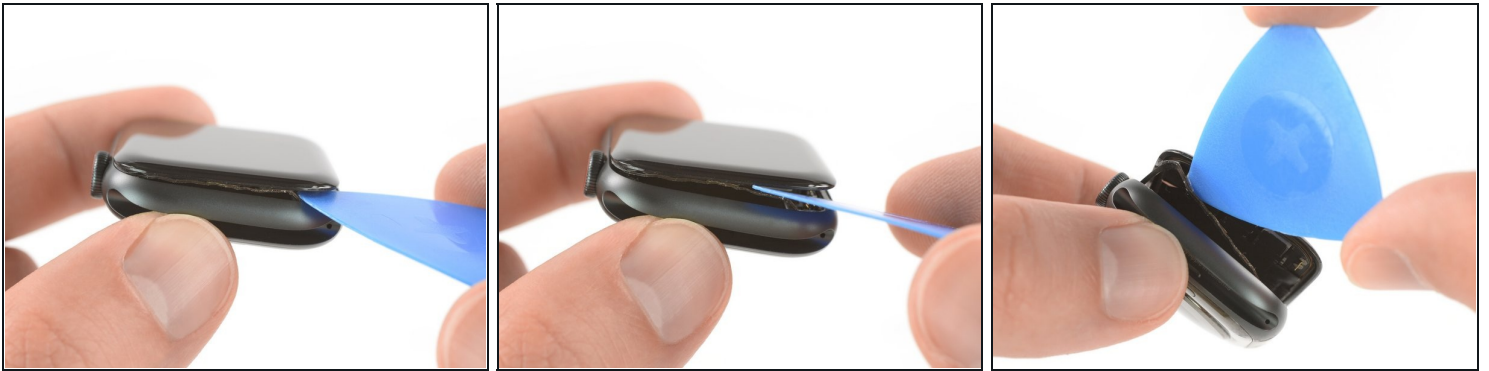
Step 5



- Once you've opened a small gap with the curved blade, remove the blade and insert the thinner edge of an opening tool into the gap.
- Push the opening tool into the gap, using your thumb as a pivot to lift the display open a bit farther.

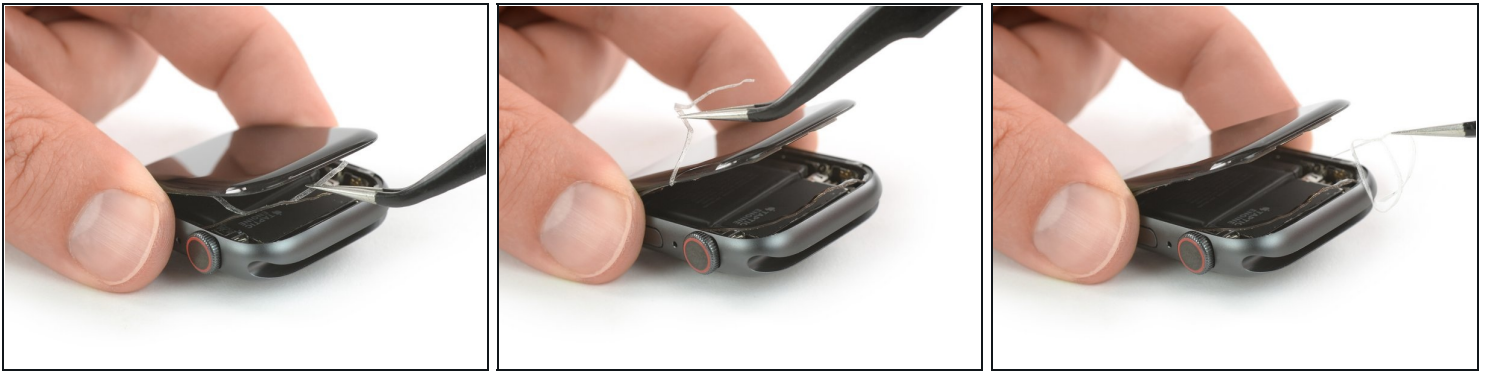
⚠ Don't try to fully open or detach the display yet.

Step 6



- It's likely that the Force Touch sensor will stick to the display frame instead of the watch's body. In this case, insert an opening pick under the display and carefully separate the Force Touch gasket from the display.
 - ⚠ To preserve the Force Touch gasket, pry carefully under the edge of the display. If the Force Touch gasket splits when lifting the display, or if you separate the gasket layers, you'll also need to replace the Force Touch gasket itself.
- Slide the pick around the display to separate the adhesive between the Force Touch gasket and the display.
 - ⚠ Don't insert the opening pick deeper than 1/16th of an inch (~2 mm) to avoid damaging other components.

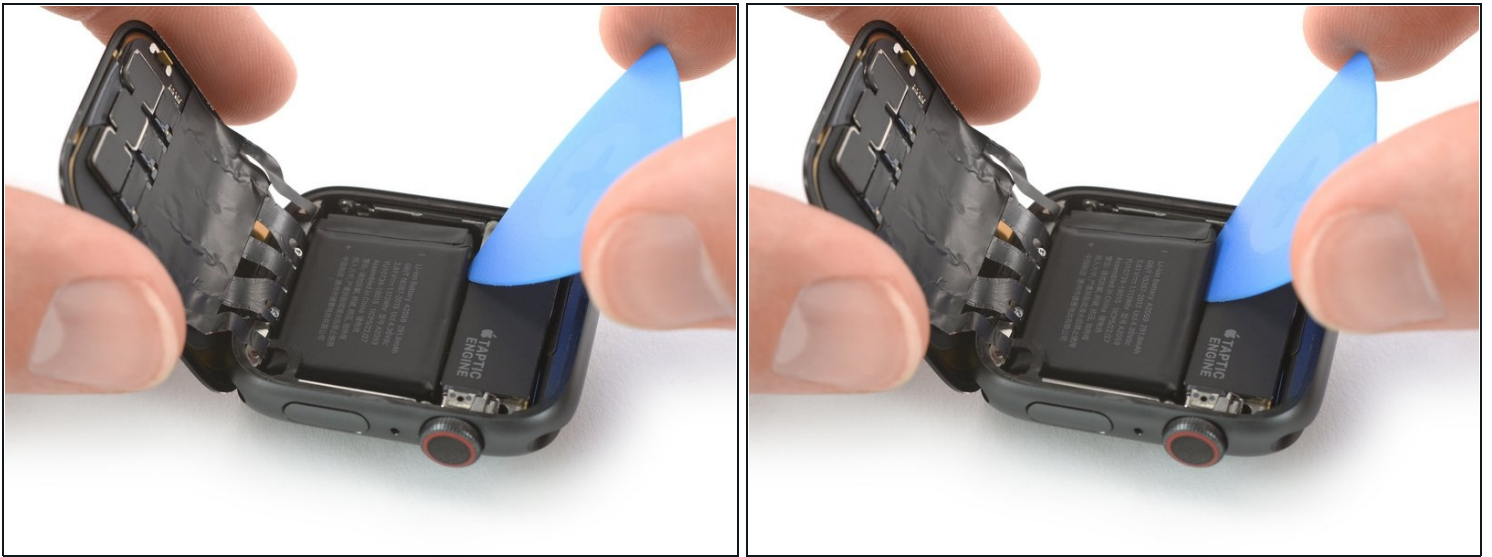
Step 7



⚠ To avoid straining the display cables, don't open the display all the way yet.

- Open the display at max. to an 45° angle, and use [tweezers](#) to peel off the adhesive between the display and the Force Touch gasket.
 - Thread the adhesive around and behind the display cables to get it off completely. Since the adhesive needs to be replaced anyway, you can cut it if that makes removal easier for you.
- ★ Make sure to return to this point during the reassembly of your watch and then continue with the [Resealing Procedure](#).

Step 8 — Battery



- Carefully fold the screen to the back until you get enough space to pry out the battery.
⚠️ Avoid tensioning the display cables when folding the screen to the back.
- Insert an opening pick between the battery and the Taptic Engine.
 - ① A regular opening pick works fine with the 44mm version of the Apple Watch Series 4. However if you own the 40mm version and don't have enough space you can [customize your opening pick with scissors](#).

Step 9



- Slide the opening pick along the edge of the battery to loosen the adhesive.
 - ① The adhesive which holds the battery in place is soft. However, if you're struggling to pry out the battery you can place a [heated iOpener](#) on the rear side of the watch to loosen the adhesive. Apply the iOpener for at least two minutes.
 - Use constant, steady pressure to slowly pry the battery up, separating it from the adhesive securing it to the system board.
- ⚠ Mind the display cables and especially the Force Touch cable which covers the battery in one corner so you don't damage them when levering the battery out.
- ⚠ Make sure you don't puncture or deform the battery, as it can catch fire and/or explode if damaged.
- ⚠ Don't try to remove the battery all the way yet. It is still connected to the watch assembly.

Step 10



- Carefully lift the battery and bring it in a 75° angle.
- Use a pair of [tweezers](#) to peel the black sticker off the metal plate which covers the battery connector.

Step 11



- Remove the Y000 screw (1.2 mm length).

Step 12



- Use a pair of tweezers to remove the metal plate which covers the battery connector.

Step 13



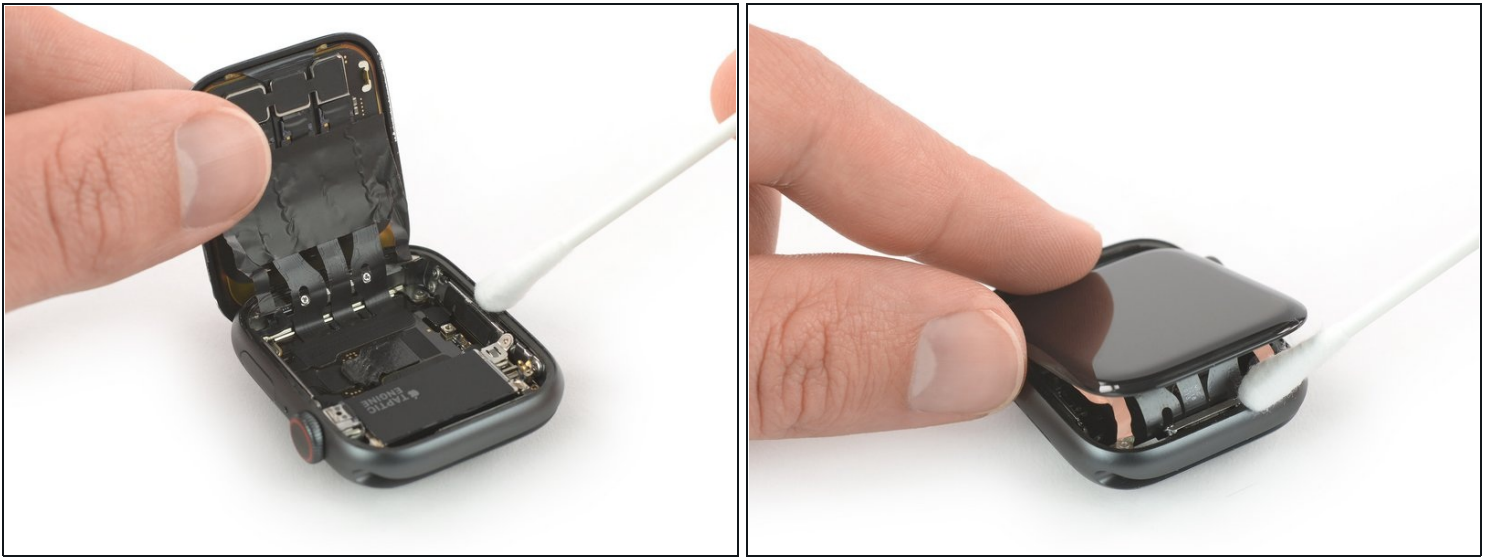
- Use the pointed end of a spudger to pry up and disconnect the battery flex cable.

Step 14



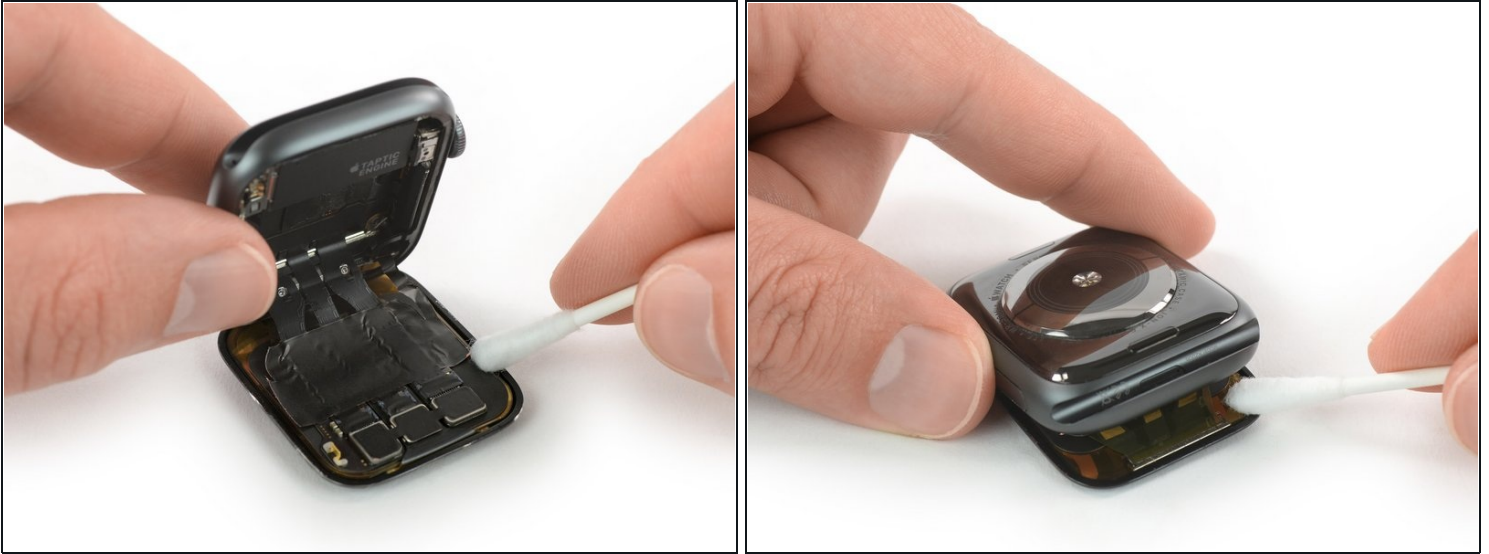
- Remove the battery.
 - ☑ Be sure to remove the protective liner to expose the adhesive on your new battery before you set it in place.
- ⚠ **Do not reinstall a damaged or deformed battery, as doing so is a potential safety hazard.**
 - ① If you are reusing your old battery during reassembly, you can reuse the existing adhesive to secure the battery during reassembly. Alternatively, remove the old adhesive with high isopropyl alcohol and a lint free cloth and use a small piece of double-sided tape such as [Tesa 61395](#), or a dab of liquid adhesive such as [E6000](#).

Step 15 — Display Adhesive



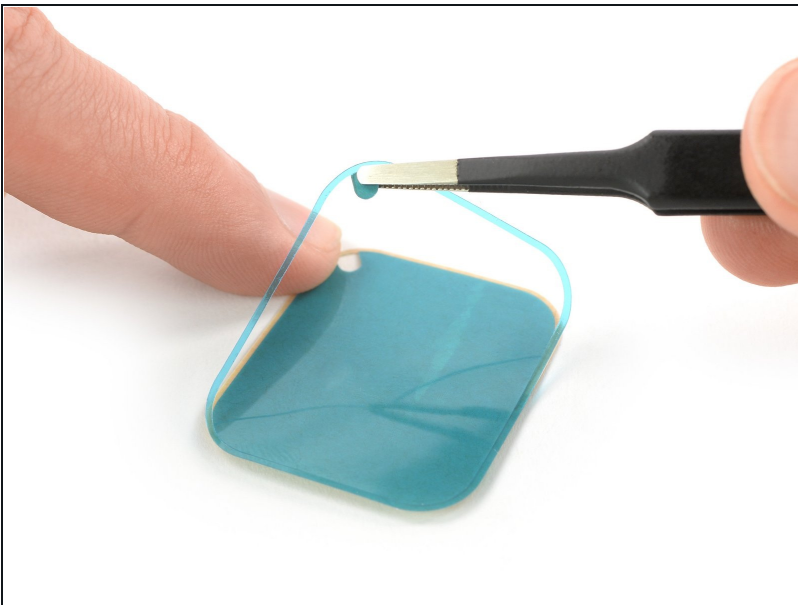
- The following steps describe how to apply replacement adhesive in preparation for the resealing procedure.
- Apply a little bit of high isopropyl alcohol (>99%) to a Q-tip or use a [cleaning pad](#) to gently remove the leftover adhesive on top of the Force Touch gasket.
- ① To remove the adhesive on the edge where the display cables are running, fold down the display and carefully pull it away from the frame so there's enough space for cleaning.

Step 16



- Flip the Apple Watch upside down so the display lays flat while lifting up the case.
- Remove the leftover adhesive from the back of the display.

Step 17



- Use a pair of [tweezers](#) to carefully remove the replacement adhesive with the blue protective film from the backing paper.

Step 18



- Hold the replacement adhesive diagonally to thread it over the display.
- Slightly tilt the display forward so you can align the adhesive with the frame.
- Position the replacement adhesive on top of the Force Touch gasket.

Step 19



- Use the pointed end of a spudger to make final position adjustments and press the adhesive into place.
- ⓘ Follow [the resealing guide](#) to reseal your watch after reassembly.

To reassemble your Apple Watch Series 4 follow these instructions in reverse order to reattach the battery.

For optimal performance, **calibrate your newly installed battery**: Charge it to 100% and keep charging it for at least 2 more hours. Then use your device until it shuts off due to low battery. Finally, charge it uninterrupted to 100%.

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.