Pixel 8 Pro

Repair manual

Version 2.0

Google recommends that you seek professional assistance for all device repairs.

Self service repair is not recommended unless you are an adult with the technical expertise to safely repair electronic devices. If you choose to perform self repair, you agree to assume the risk associated with such repair.

Use caution if engaging in repair.

Opening and/or repairing your device can present electric shock, device damage, fire and personal injury risks, and other hazards. Before servicing the product, read the full set of precautions in this document.

Welcome!

We are here to help.

At Google, we innovate, design and build in order to create helpful and sustainable products. Product longevity is really important to us and repairability is part of that. Repair enables our products to stay in-use and out of landfills.

If you have any questions or need support, please reach out.

support.google.com

This manual is organized into sections for easy and intuitive navigation.

Precautions

Safety is a top priority for Google. Users should work in a safe environment and have the skills and training necessary to safely complete repairs.

Repair flows

Here, we have a flow chart of the most efficient repair methods.

Disassembly

Each section contains a list (in the order of device disassembly) of prerequisite steps, tools, fixtures and parts needed to complete the repair.

Assembly

For each disassembly, we provide a guide to reassembly. This may include rework steps for certain components.

Troubleshooting & Software

Use the diagnostic steps and testing recommended in this section to identify the source of device problems and issues.

Glossary

All the terms and acronyms you need to communicate with the same language.

Table of contents

Revision history

Version	Date	Change description
v1.0	August, 2023	First release
v2.0	November, 2023	New format release

Pixel 8 Pro Repair Manual

Precautions

Important: Before you begin

Be careful if engaging in repair

Opening and/or repairing a device can present electric shock, device damage, fire and personal injury risks, and other hazards.

Always perform repairs in a clean work space with good ventilation and no combustible materials.

Ensure no additional screws or small parts are left in the device after assembly.

Always ensure that screws are securely fastened.

Before servicing the product, read the full set of precautions in this document.

Caution: Batteries should be carefully handled, and can be dangerous when damaged

- Fully discharge device battery before attempting repair.
- Never bend, dent, puncture, or use tools to pry the battery.
- Store batteries in the replacement part packaging as soon as possible after removal to prevent damage.
- If a battery begins to vent, immediately cover in sand or use gloves and tongs to place battery in a fire safe.
- Take care to prevent shorting of battery terminals or damaging the battery, as fire or overheating could result.
- Dispose of the battery in a manner in accordance with local regulations.

Caution: Pixel 8 contains a Class 1 laser module

The design of the device incorporates optics and protective housing such that there is no access to a level of laser radiation above Class 1 during normal use or approved servicing.

Laser modules in this product comply with 21 CFR 1040.10 and 1040.11; except for conformance with IEC 60825-1 Ed. 3., as described in Laser Notice No. 56, dated May 8, 2019.

Use of controls or adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure.

Laser Module:
Made in Austria. ams AG, Tobelbader Str. 30, 8141 Oberpremstätten, Austria

Important: Before you begin

Caution:
Part handling – Glass

- Wear protective gloves and safety glasses when handling damaged parts.
- Use protective film when removing damaged parts.
- Once removed, immediately store the damaged part in the replacement part packaging to prevent injury.

Tools and fixtures

The use of Google-authorized tools and fixtures is **strongly recommended** in order to repair a device in a safe and effective manner.

Caution:

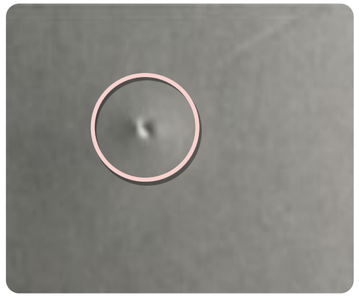
- We don't recommend performing repairs without the specified tools and fixtures.
- Improper use of tools and fixtures may result in injury to yourself, the user of the device or other third parties, as well as damage to the product, tools, fixtures, replacement parts and/or other spare parts.

Important: Before Disassembling the Device

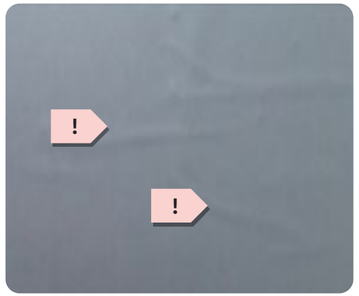
- Disconnect the device from all power sources before any disassembly.
- Make sure the battery is fully discharged before any disassembly.
- If the phone battery shows signs of swelling or damage, or if the phone feels hot or emits strong odor, don't attempt disassembly. Please reach out to Google customer support.
- Take care not to expose the phone or its components to liquids once disassembled.

Caution ⚠

Examples of unacceptable battery conditions - Not suitable for repair*

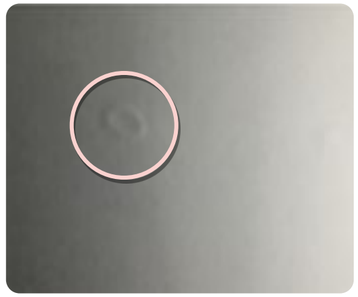


Pouch damage

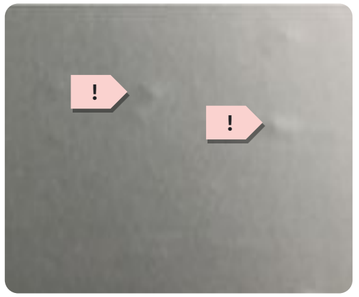


Line protrusion

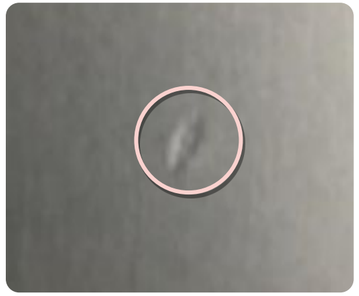
Scratch



Contamination marking

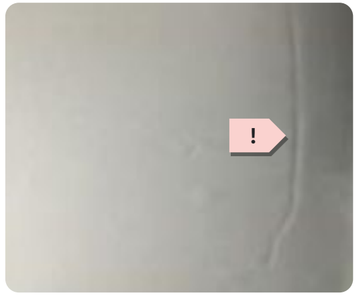


Dot protrusion

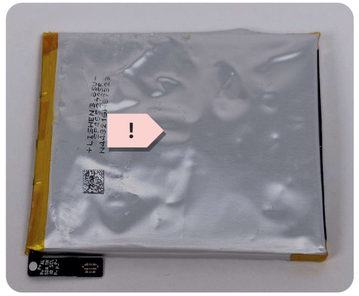


Dent

Bubbling



Imprinted line



Swelling or electrolyte leakage

*These are examples of potentially dangerous battery conditions but don't reflect all possible dangerous conditions. Please follow general safety guidance outlined in this document.

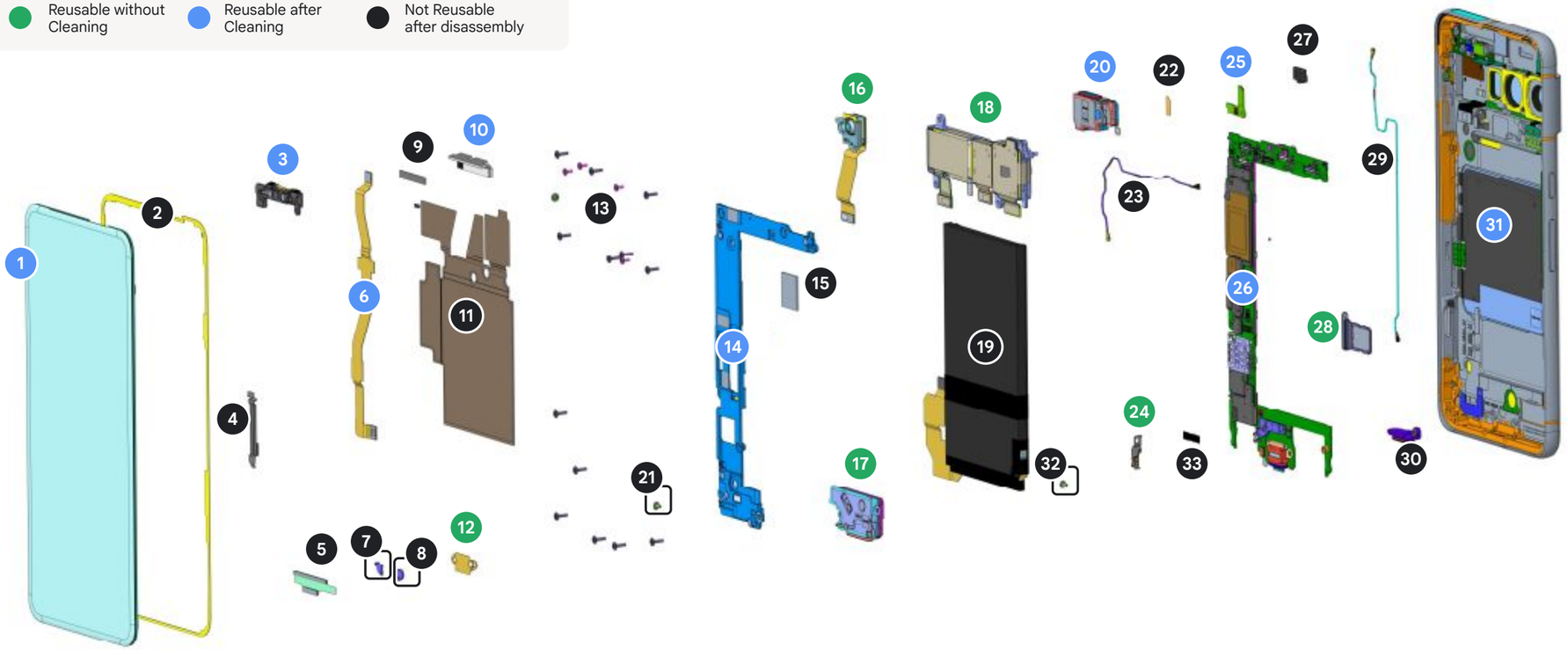
Pixel 8 Pro Repair Manual

Introduction

Pixel 8 Pro: Expanded view

Reuse indications

- Reusable without Cleaning
- Reusable after Cleaning
- Not Reusable after disassembly



Pixel 8 Pro Part ID

1	Display Module	8	DDIC Right	15	SOC Thermal Pad	22	Kapton	29	Coaxial Cable #1
2	Trim PSA	9	mmWave Thermal Pad	16	Front Camera	23	Coaxial Cable #4	30	Mic 1 Bracket
3	mmWave Heatsink	10	mmWave Module	17	Bottom Speaker	24	ANT 7 Grounding	31	Enclosure
4	Display cowling	11	Graphite Sheet	18	Rear Camera	25	ANT 4 Board	32	Screw
5	SHIM	12	USB-C cowling	19	Battery	26	Logic Board	33	UDFPS Flex Pad
6	mmWave Flex	13	Screws	20	Top Speaker	27	P-sensor Grommet		
7	DDIC Left	14	Mid-frame	21	Screws	28	SIM Tray		

Screw map

These are the screws used in the Pixel 8 Pro:

Screw G250-06946-10	Screw G250-06670-00	Screw G250-05802-00
		

For ANT 7 grounding fastening.
Not on the screw cover

Screws are a single use item

Screws are a single use item and if removed from the device - should be replaced with a new screw.

After removal, replace with a new screw

Each screw is critical to the safe continued operation of the phone. Since thread locking adhesive can not be reactivated - replace each used screw with a new screw after removal.

Touch screen calibration process

Important!

Complete the following before booting up the device:

- Nothing can be touching the display (this includes *protective films*, cases, fingers, tape, labels, scratch cover, adhesives, debris, etc.)
- Device should be on a flat surface, and can not be held in your hands.

Once the above conditions are met, the device can be powered on by pressing the power button. Don't touch the device until it is fully booted into the user operating system.

Display touch calibration

After any repair that requires opening the phone, complete the display touch calibration during first boot.

Touch function

The touch function of the screen may not work as intended, if this process is not followed.

ESD protection

ESD (Electro Static Discharge) can damage components so it is important to work in an ESD safe environment during repair.

Follow these 4 steps to keep ESD-safe:

Stay grounded

Repairs should be carried out on an ESD mat, while the person repairing the device wears a grounded ESD strap.

Avoid static buildup

Users should avoid wearing synthetic fibers such as fleeces that can generate static.

Protective bags

All ESD-sensitive parts should be packed in metalized protective bags during shipping.

Avoid touching pins

Users should avoid touching pins by using ESD-safe tools to handle components.

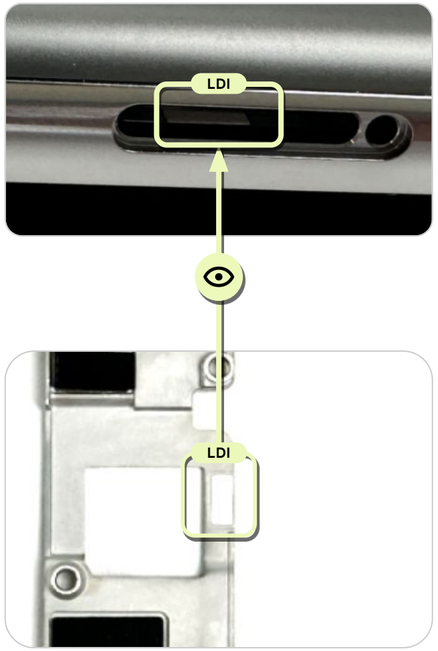
Did you know?

ESD is the sudden flow of electricity through two electrically charged objects. For example, walking across a carpet, then touching a metal door handle and feeling a shock is ESD.

Liquid damage indicators

Liquid damage indicators are strips that change colors when a phone has been exposed to water or other liquids.

- Exposure to liquids may lead to the device malfunctioning, such as overheating or short circuits.
- There are two Liquid Damage Indicators (LDI) on this device.
- The device is considered to have been exposed to liquid, if either indicator has turned red.



In the SIM Tray slot (on the Mid-frame) visible without disassembling the device.

On the Mid-frame, near charge port.

Turning Pixel on / off

Turn the power on or off

- To turn on a device when it's powered off, press and hold the Power button for a few seconds. See where the Power button is located.
- To power off phone when it's turned on:
  - *To power off phone, press and hold the Power and volume up buttons for a few seconds. Then, tap Power off on screen.*
  - *For further information, see this Google Help page (link).*

Tip: Before you turn on phone, charge it. Learn how to charge.

Turn screen off and back on

- To turn screen on and off while phone is turned on, press the Power button once.

Tip: On some Pixel phones, you can see the time and some other information even when screen is off. Learn which Pixel phones and how to turn "Always show time & info" off or on.

Restart (reboot)

1. On most phones, press phone's power button for about 30 seconds, or until phone restarts.
2. On the screen, you might need to tap Restart.

Tools and fixtures

The use of Google-authorized tools and fixtures is strongly recommended in order to repair a device in a safe and effective manner.

Caution:

- We don't recommend performing repairs without specified tools and fixtures.
- Improper use of tools and fixtures may result in injury to yourself, the user of the device or other third parties, as well as damage to the product, tools, fixtures, replacement parts and/or other spare parts.

Tools and fixtures

Google approved fixtures: Pixel 8 Pro

Google approved fixtures are Google tested and are strongly encouraged to ensure high quality and safe repairs.

Pixel 8 Pro-Holder

NEW G940-00743-00
WAS G980-16638-00

Pixel 8 Pro-CG Press Rubber

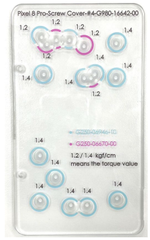
NEW G940-00744-00
WAS G980-16645-00

Pixel 8 Pro-Battery Press Rubber

NEW G940-00745-00
WAS G980-16646-00

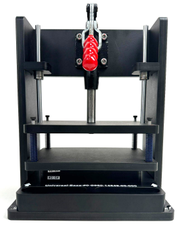
Pixel 8 Pro-Screw Cover

NEW G940-00791-00
WAS G980-16642-00



Universal Press

NEW G940-00733-00
WAS 940-00426-01



Universal Disassembly Fixture

NEW G940-00734-00
WAS G980-14551-00

Universal Base

WAS G940-00735-00
NEW G980-14549-00

Universal Press Plate 12mm

NEW G940-00736-00
WAS G980-17318-00

Note

If there is a different GPN on the picture in the following pages, the GPN shown here is the correct one.

Tools and fixtures

Google approved fixtures: Pixel 8 Pro

Google approved fixtures are Google tested and are strongly encouraged to ensure high quality and safe repairs.

Universal Fish line tool

NEW G940-00779-00
WAS 540-00537-00

Universal adsorption bulb

NEW G940-00780-00
WAS 246-00172-00

Universal Disassembly ESD stick

G940-00782-00

Universal Disassembly ESD pick

G940-00783-00

Universal Scraper

WAS G940-00784-00
NEW 540-00568-00

Screwdriver Hex Shank Torx Plus Bit no.3

G940-00785-00

Universal Coaxial Cable Tool

NEW G940-00781-00
WAS 540-00505-00

Universal Protective Film

G940-00786-00

Note

Additional protective films and caps may be pictured in this manual, but are not needed to achieve a successful repair.

Tools and fixtures

Standard tools

Standard tools are suggested to ensure high quality and safe repairs. These items don't need to be purchased from a Google recommended supplier.

ESD wristband

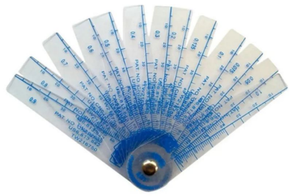
Heat Plate

USB-C to USB-C cable

18W USB-C power adapter

Adjustable torque screwdriver

Feeler gauge



Ionizing air fan

Table C-Clamp

Deglue Machine

ESD Tweezers

ESD spudger

Tools and fixtures

Standard Consumables

Standard consumables are suggested to ensure high quality and safe repairs.
These items don't need to be purchased from a Google recommended supplier.

IPA

Dust-Free Cotton Swabs

ESD Gloves

Fishing Line (Thickness 0.4mm, 9kg/30lb)

Sankol lubricant CFD 409Z_v2

ESD Finger Cots

3M AP111 Primer

Dust Free Cloth

Masking Tape

Tools and fixtures

Safety items

Safety items are suggested to ensure high quality and safe repairs. These items don't need to be purchased from a Google recommended supplier.

Safety Glasses

Heat Resistant Protective Gloves

Cut Resistant Protective Gloves

Nitrile or Lint-Free Gloves

Tools and fixtures

Repair Fixture Recommendations

Google approved fixtures are Google tested and are strongly encouraged to ensure high quality and safe repairs.

Type of Repair	Fixtures Recommended
All Repairs	Pixel 8 Pro Tool Bundle, Universal Press, Universal Disassembly Fixture, Universal Base, Universal Press Plate 12mm, Universal Fish line Tool, Universal Adsorption Bulb, Universal Disassembly ESD stick, Universal Disassembly ESD pick, Universal Scraper, Screwdriver Hex Shank Torx Plus Bit no.3, Universal Protective Film, Universal Coaxial cable tool

Replacement parts

Important notice about replacement parts

- The use of Google authorized replacement parts is strongly recommended.
- Performance within product specifications cannot be assured if Google authorized replacement parts are not used.

Caution:

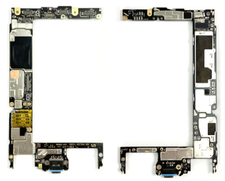
Use of replacement parts other than Google authorized replacement parts, such as aftermarket batteries, may impact device safety, reliability and performance.

Replacement parts

Reuse indications

- Reusable without Cleaning
- Reusable after Cleaning
- Not Reusable after disassembly

Logic Board
Multiple Part Numbers



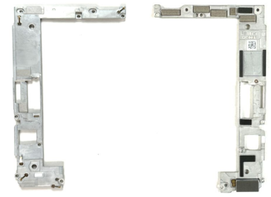
Display Module
G949-00688-01

Enclosure
Multiple Part Numbers

Front Camera
G949-00701-01

Rear Camera
G949-00702-01

Mid-frame
G949-00703-01



Battery
G949-00704-01

ANT 4 Board
G949-00705-01

Trim PSA
G806-09115-12

Did you know?

Trim PSA is pre-attached onto the Display Module (G949-00688-01) by CM.

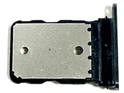
Replacement parts

Reuse indications — Reusable without Cleaning | Reusable after Cleaning | Not Reusable after disassembly

Display cowling_mmWave
G730-07730-07

Display cowling_Sub6
G730-07730-08

SIM Tray
Multiple Part Numbers



USB-C cowling
G853-01362-01

Graphite Sheet
G864-00635-01

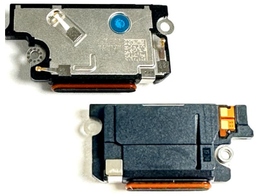
P-sensor Grommet
G806-07778-01

Screw
G250-06946-10

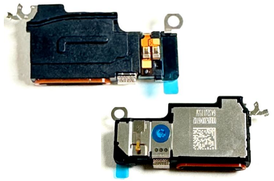
Screw
G250-05802-00

Screw
G250-06670-00

Bottom Speaker
G863-00462-01



Top Speaker
G863-00461-03

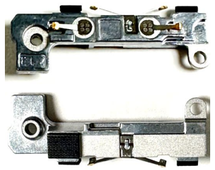


Mic 1 Bracket
G730-07405-02

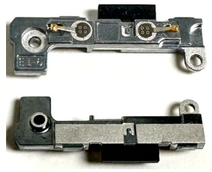
Replacement parts

Reuse indications — Reusable without Cleaning | Reusable after Cleaning | Not Reusable after disassembly

mmWave Bracket
G730-06637-03



Sub6 Bracket
G730-06636-03



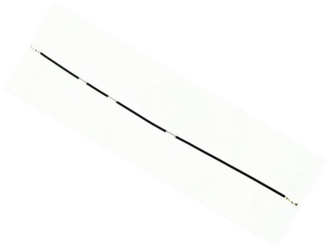
mmWave Thermal Pad
G864-00562-01

ANT 7 Grounding
G853-01317-01

SOC Thermal Pad
G864-00576-01

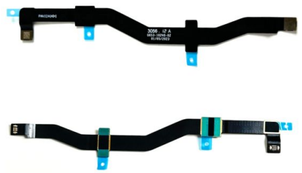
Coaxial Cable #1
G821-00883-01

Coaxial Cable #4
G821-00881-01



mmWave Module
G345-01353-06

mmWave Flex
G652-10240-02



Kapton
G806-07911-01

DDIC_Right
G852-03670-02

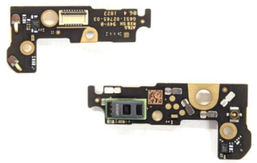
DDIC_Left
G852-03670-01

Replacement parts

Reuse indications — Reusable without Cleaning | Reusable after Cleaning | Not Reusable after disassembly

SHIM
G806-09493-06

ANT 1 Board
G949-00706-01



mmWave_flex_CPSA_1
G806-11705-00

mmWave_flex_CPSA_2
G806-11706-00

mmWave_flex_CPSA_3
G806-11707-00

Top Spk Adhesive
G806-11708-00

ANT 1 Kapton
G806-07724-01

UDFPS Flex Pad
G806-11745-01

Glossary

Glossary

Acronym / Term	Definition
ESD	**Electro Static Discharge** The sudden flow of electricity through two electrically charged objects.
IPA	**Isopropyl Alcohol** Used for cleaning components and enclosures. Comes as pads or a solution.
FPC	**Flexible Printed Circuit** A type of low profile and flexible printed circuit.
OLED	**Organic Light-Emitting Diode (OLED)** A type of flat panel display which OLED to show images.
mmWave	**Millimeter Wave** The radio waves used to build a 5G network, providing fast, reliable mobile data.
Sub6	**Sub-6GHz** Refers to mid and low-frequency bands under 6GHz
NG	**Not good - usually referring to a condition that is not acceptable**
SBOM	**Service Bill of Materials**

Glossary

Acronym / Term	Definition
Display Module	The OLED, glass cover, and sometimes other components such as the fingerprint sensor Also known as: cover glass (CG), screen, display
Logic Board	The main electronic component in the device with the processor, memory, storage, and often Wi-Fi and Bluetooth components all soldered on Also known as: MLB, main logic board, main board, PCBA
Microphone	The component used for capturing audio to make a call, video or dictate some notes Also known as: mic, mic 1 bracket
Enclosure	The housing that contains the buttons and provides protection for the logic board and other components Also known as: Housing (HSG), rear cover, back cover, bottom case, back glass (BG)
LDI	Liquid Damage Indicator An indicator that turns from white into another color, typically red, after contact with water. Also known as: Liquid damage indicator, LDI

Glossary

Acronym / Term	Definition
Camera	Camera modules, include front camera and rear camera(s) Also known as: CAM, FCAM, RCAM
Pressure Sensitive Adhesive	The adhesive that are used to bond enclosure and display module, battery and enclosure, or other parts Also known as: PSA
UDFPS	Under Display FingerPrint Sensor Also known as: Fingerprint sensor
TS	Temperature Sensor
Release Liner	This is a tool for transporting sensitive parts, including adhesives. It needs to be removed during installation for the device to function as intended.

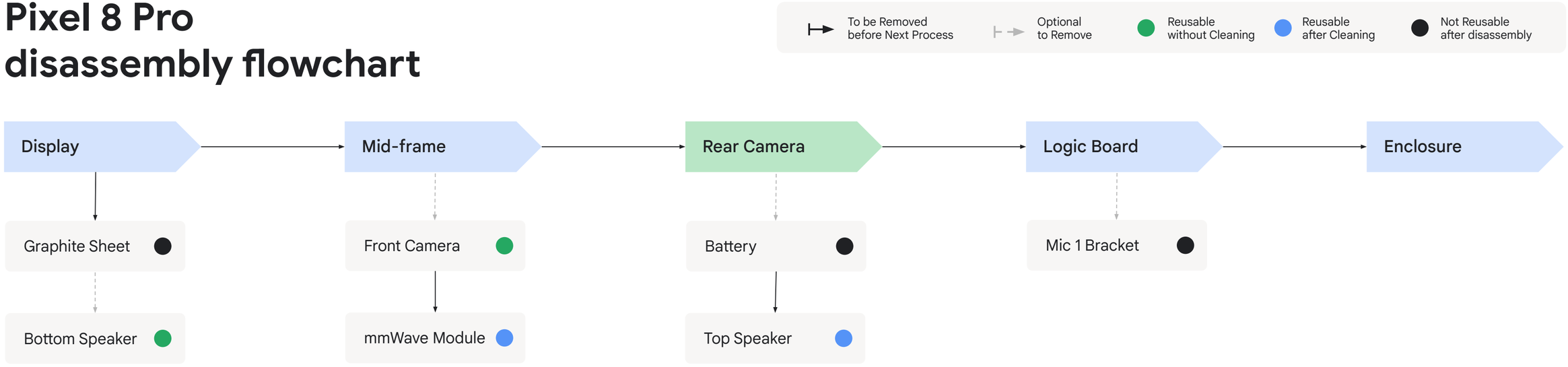
Pixel 8 Pro Repair Manual

Repair flows

Disassembly order

Assembly order

Pixel 8 Pro disassembly flowchart



How to read this chart

To replace the Battery:
Remove the Display, Graphite Sheet, Mid-frame, then the Battery.

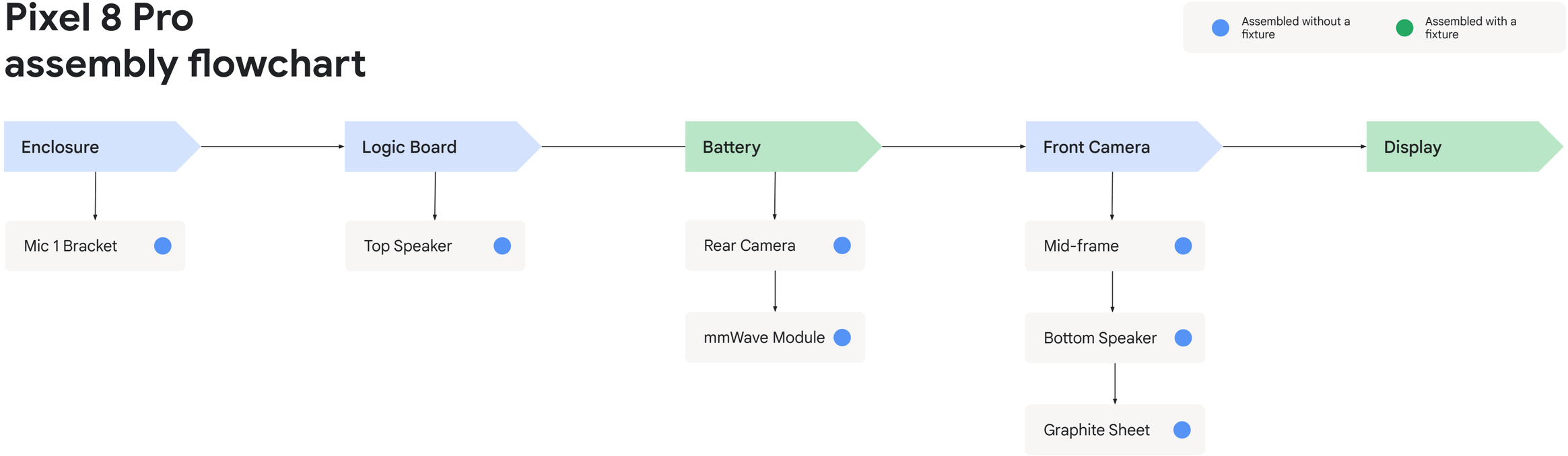
To remove the Logic Board:
Remove the Display, Graphite Sheet, Bottom Speaker, Mid-frame, Front Camera, mmWave Module, Rear Camera, Battery, Top Speaker, then the Logic Board.

NOTE

The Rear Camera and Battery are on the same layer.

They can be removed independently.

Pixel 8 Pro assembly flowchart



How to read this chart

To reinstall the Battery:
Battery, Mid-frame,
Graphite Sheet, then Display.

To reinstall the Logic Board:
Logic Board, Top Speaker, Battery,
Rear Camera, mmWave Module, Front Camera, Mid-frame,
Bottom Speaker, Graphite Sheet, then Display.

Pixel 8 Pro Repair Manual

Disassembly

Display

Graphite Sheet

Bottom Speaker

Mid-frame

Front Camera

mmWave Module

Rear Camera

Battery

Top Speaker

Logic Board

Mic 1 Bracket

Enclosure

Disassembly instructions

Display

The Display Module is connected to the Logic Board, so be careful with the flex when opening the device up.

Use caution!

Use safety gloves when handling damaged displays as splinters during removal could cause injury.

Apply protective film to broken glass before removal.

Review all **safety precautions** before beginning work.

Prerequisites

Before beginning a repair, be sure to **power off** the device and disconnect any charging cables.

Tools

- Heat Plate
- Universal Disassembly Fixture
- Ionizing Air Fan
- Pixel 8 Pro-Holder
- Pixel 8 Pro-CG Press Rubber
- Universal Base
- Universal Press
- Adjustable torque screwdriver
- Screwdriver Hex Shank Torx Plus Bit no.3
- Universal Fish line tool
- ESD Tweezers
- Universal Disassembly ESD Stick
- ESD Pick
- 3M AP111 Primer
- Deglue Machine
- Universal adsorption bulb

Parts

Display

The parts listed are for the Display disassembly.

Reuse indications

- Reusable without Cleaning
- Reusable after Cleaning
- Not Reusable after disassembly

Display Module
G949-00688-01

Trim PSA
G806-09115-12

Display cowling_mmWave
G730-07730-07

Display cowling_Sub6
G730-07730-08

Soften adhesive

Set the heat plate to 122°F/50 °C, and place the phone face down on the heat plate for 10 mins to soften the adhesive.

Use Caution

Heat plate is a hot surface. Use caution as it could cause burns.

Use Caution

Use safety gloves to handle damaged displays as they could splinter during removal and cause injury. Apply protective liner to broken glass before removal.

Review all **safety precautions** before beginning work.

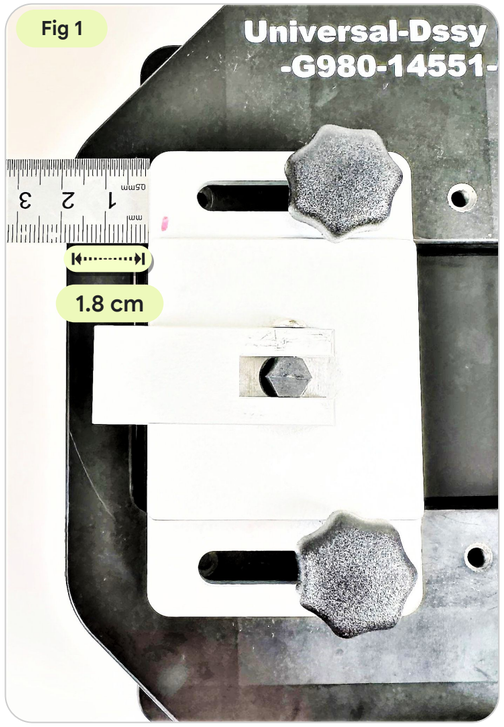
Locate snaps

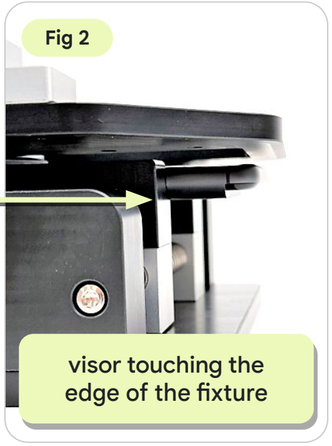
- Before removing the **Display Module**, take note that there are 6 snaps underneath (refer to the relative positions).
- Avoid damaging the snaps during the disassembly process.

Use fixture

- Adjust suction cup distance to 1.8 cm (Fig 1) from the edge of the hinged top.
- Place the device in the holder of the **Universal Disassembly Fixture**. To avoid damage, don't put the visor area of the phone inside the clamps (Fig 2).

> **Note**
>
> Remove the Display front protective film to allow the suction cup to attach to the Display.
>
> There is a groove which can help avoid pressing the power button accidentally.



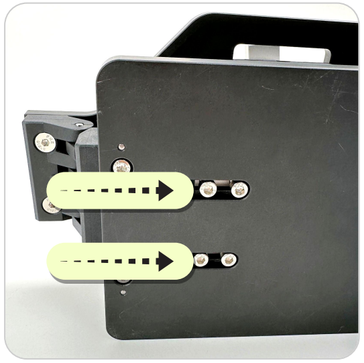


Adjust fixture

Ensure the **Two Universal Clips** are fastened using the screws on the top and bottom, before using the **Universal Disassembly Fixture**.

Note

Make sure to use the Universal Disassembly Fixture for Pixel 8 Pro.

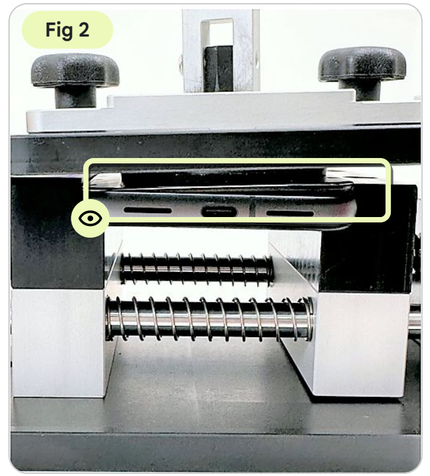


Prepare for disassembly

Before closing the hinged top, dampen the gap between the **Display** and the **Enclosure** on the USB side with a proper amount of IPA with an **Universal Disassembly ESD stick**.

Close fixture

- Close the hinged top and align the suction cup so that it makes contact with the **Display**.
- Lift up the suction cup lever to create a suction (Fig 1).
- Observe from the USB side to see when a gap has formed (Fig 2).



Use Caution

Use safety gloves to handle damaged displays as it might splinter during removal and could cause injury.

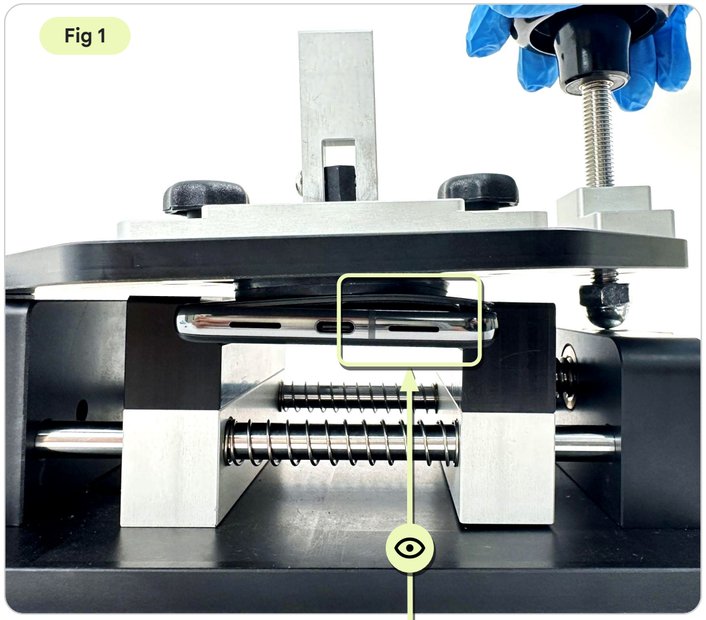
Apply **Universal Protective Film** to broken glass before removal.

Review all **safety precautions** before beginning work.

Separate Display

- Slowly rotate the knob to separate the **Display Module** from the **Enclosure** (Fig 1).
- Once there's a gap (≦ 5mm), slide through the opening using an **Universal Disassembly ESD stick** with a proper amount of IPA (Fig 2).

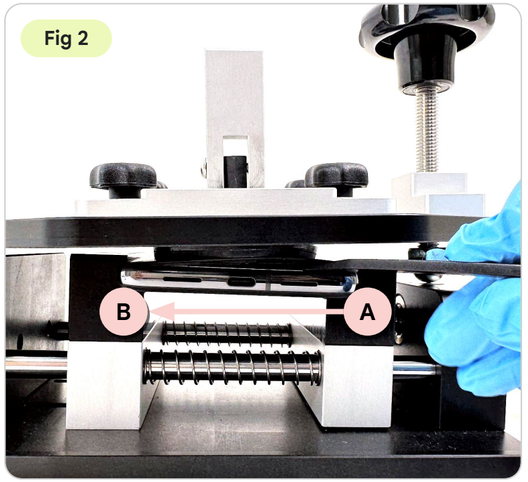
Fig 1



Once there's a gap, insert the Universal Disassembly ESD stick and slide over.

(If it cannot pass through easily, you can slowly rotate the fixture, but the gap should be less than 5mm wide.)

Fig 2



Pry thoroughly from A to B

Separate Display-continued

- As they separate on the USB side, insert a release liner to prevent the adhesive from sticking back (Fig 1).
- Don't push **Universal Disassembly ESD stick** into the device to avoid insertion between **Glass**, **Display** and **Trim**. Refer to the NG and OK pictures (Fig 2).

Use Caution

Be careful not to push the Universal Disassembly ESD stick beyond the adhesive surface to avoid damaging the Display, Battery, or any other internal components.

Fig 1

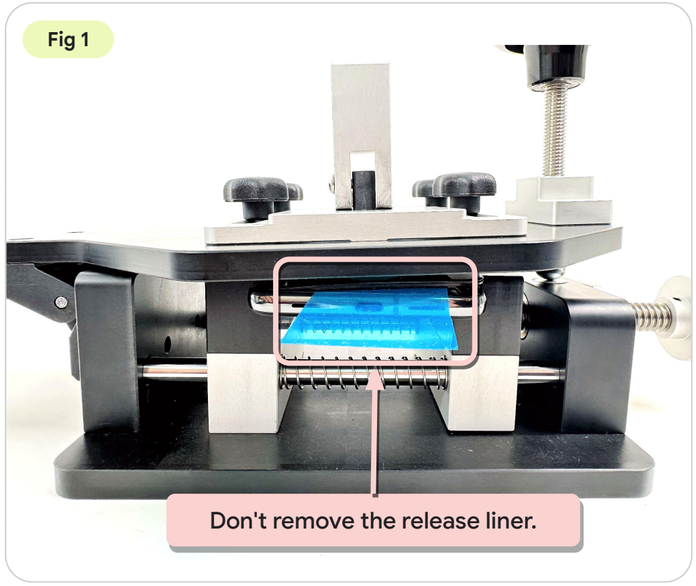
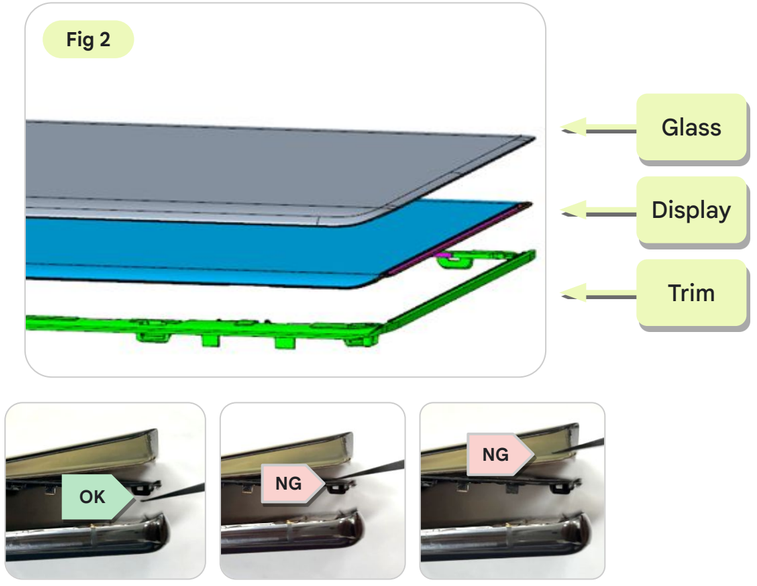


Fig 2



Open hinged top

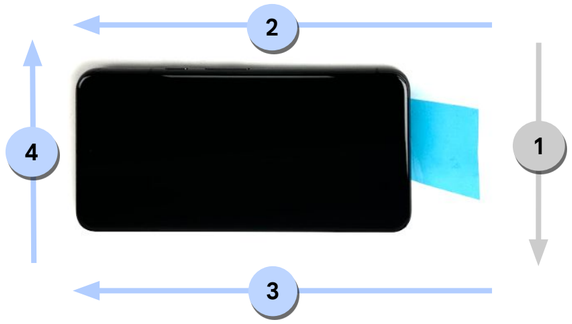
Release the suction cup, and open the hinged top.

Note

Reattach the Display front protective film after taking out the device from the fixture.

Slide to open

- Dip the 3.5-mm corner of the **Universal Disassembly ESD pick** in a proper amount of IPA.
- With the flat side down, slit following the sequence 2 ⟶ 3 ⟶ 4.
- Pry at an angle to avoid insertion between **Display** and **Trim** (Fig 1).



Disassemble Sequence:
1 (in fixture) ➜ **2** ➜ **3** ➜ **4** (out of fixture)

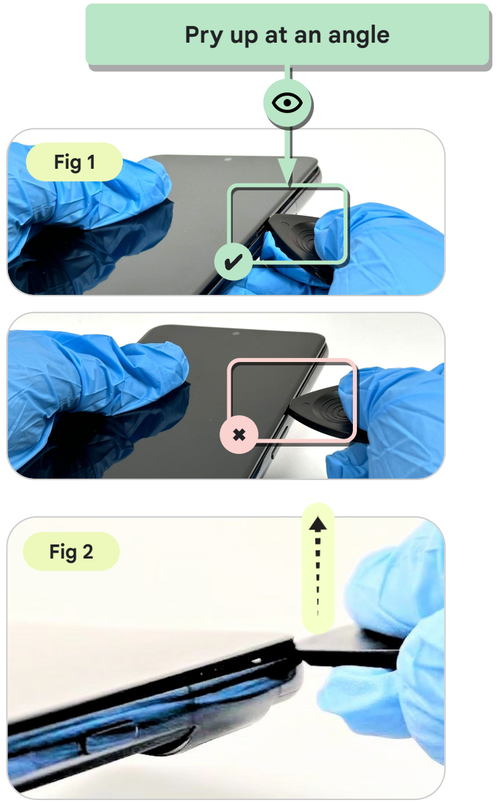
Use Caution

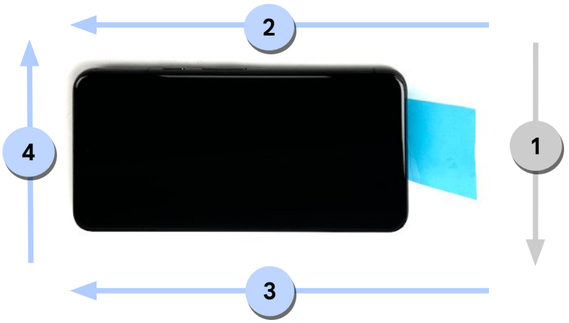
Control the depth of insertion to avoid damaging the Snaps and Springs.

Don't use alcohol.

Slide to open-continued

- Slide along sides 2 and 3 at an angle with the **Universal Disassembly ESD pick** (Fig 1).
- Around the corners, slide to the stopper, and pry up (Fig 2).





Disassemble Sequence:
1 (in fixture) ➜ **2** ➜ **3** ➜ **4** (out of fixture)

Use Caution

Don't slide horizontally.

Control the depth of insertion to avoid damaging the Snaps and Springs.

Don't use alcohol.

Hold Display

- Use the **Universal adsorption bulb** to hold the **Display**.
- Avoid touching the **Copper Foil**.

Note

Be careful not to stretch the Display Flex to prevent damage.

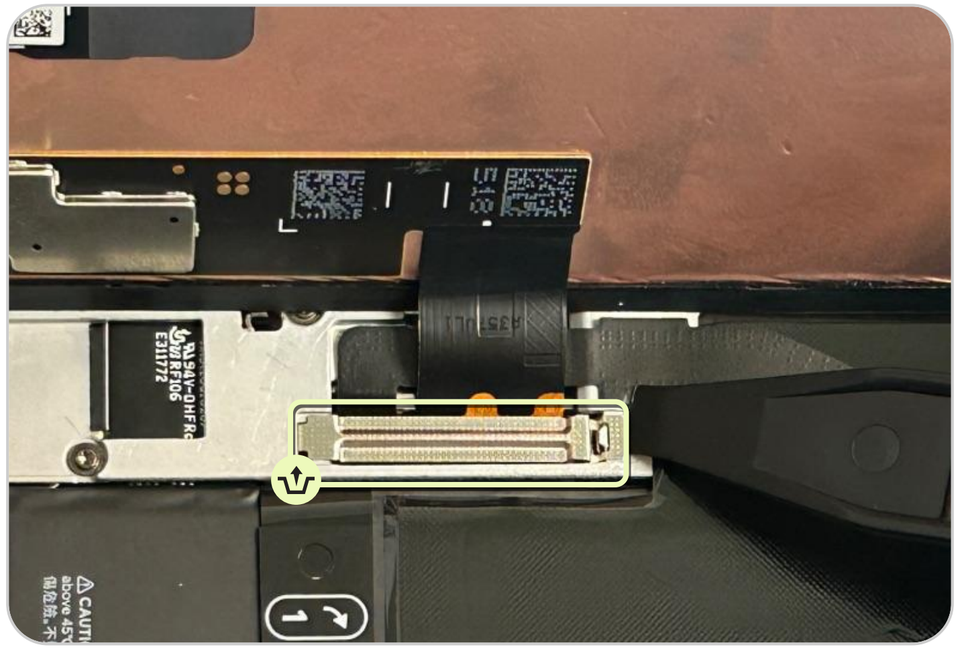
Also be careful not to touch the spring during the process.

Remove cowling

Detach the **Display cowling** with a **Universal Disassembly ESD stick**.

Part: G730-07730-07 (Display cowling_mmWave)

Part: G730-07730-08 (Display cowling_sub6)



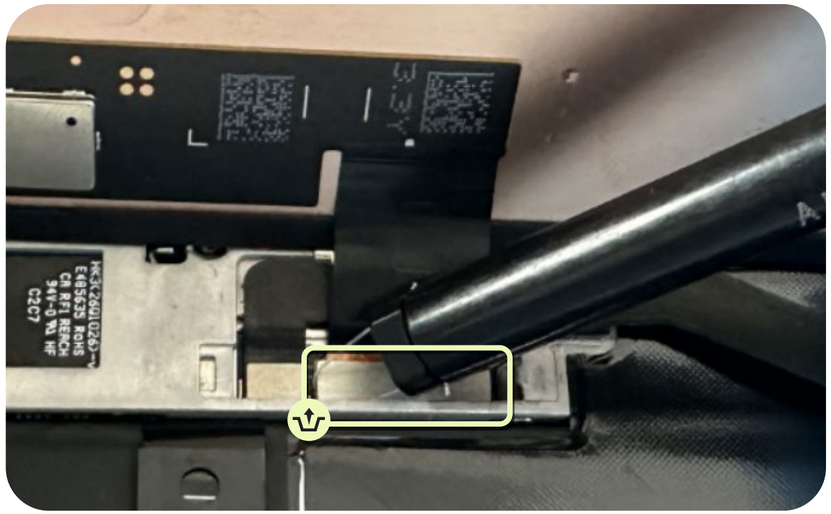
Note

Don't reuse the part.

Disconnect Display

- Loosen the **Display Connector** with the **Universal Fish line tool**.
- Remove the **Display Module**.

> **Note**
>
> Use the **Universal Fish line tool** to avoid damaging the components.



Finished! Need assembly instructions? ➜

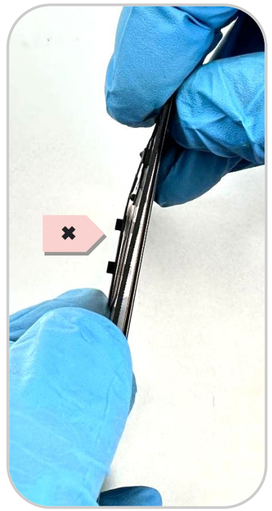
Check trim

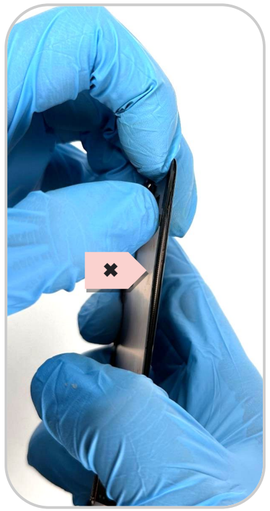
- Check the Trim status to ensure it is not peeling away from the display.

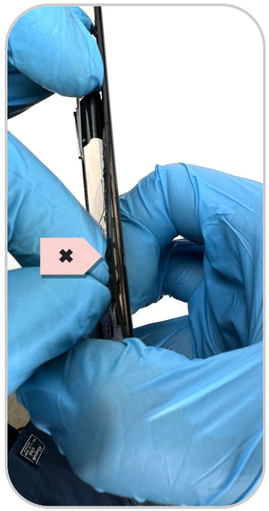
Note

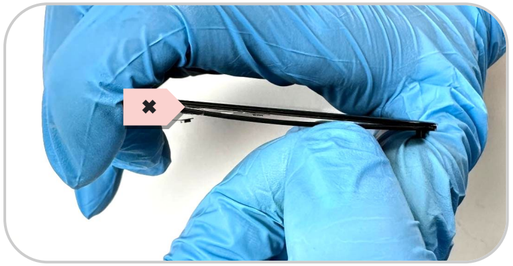
If the trim is separated from the display, the part may may need to be replaced to function as intended.

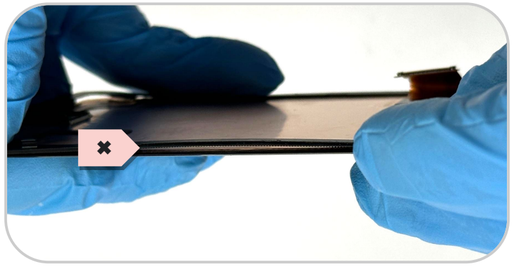
General Rules











Disassembly instructions

Graphite Sheet

Graphite Sheets are used to conduct heat and provide electromagnetic shielding.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**

Tools

Pixel 8 Pro-Holder

Universal fish line tool

ESD Tweezers

Universal Scraper

Parts

Graphite Sheet

The parts listed here are for the Graphite Sheet disassembly.

Reuse indications

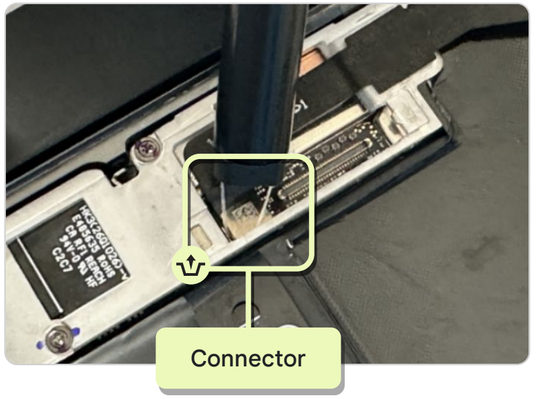
- Reusable without Cleaning
- Reusable after Cleaning
- Not Reusable after disassembly

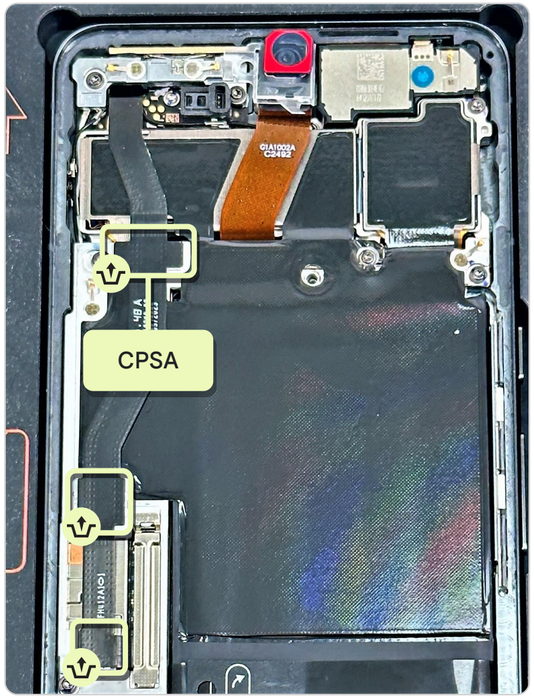
Graphite sheet

G864-00635-01

Disconnect 5G Module

- Loosen the **mmWave Connector** and disconnect it from the **Logic Board** with the **Universal fish line tool**.
- Part of the flex is adhered to the **Mid-frame**, so slowly peel it away.





Note

Use the **Universal fish line tool** to avoid damaging the components.

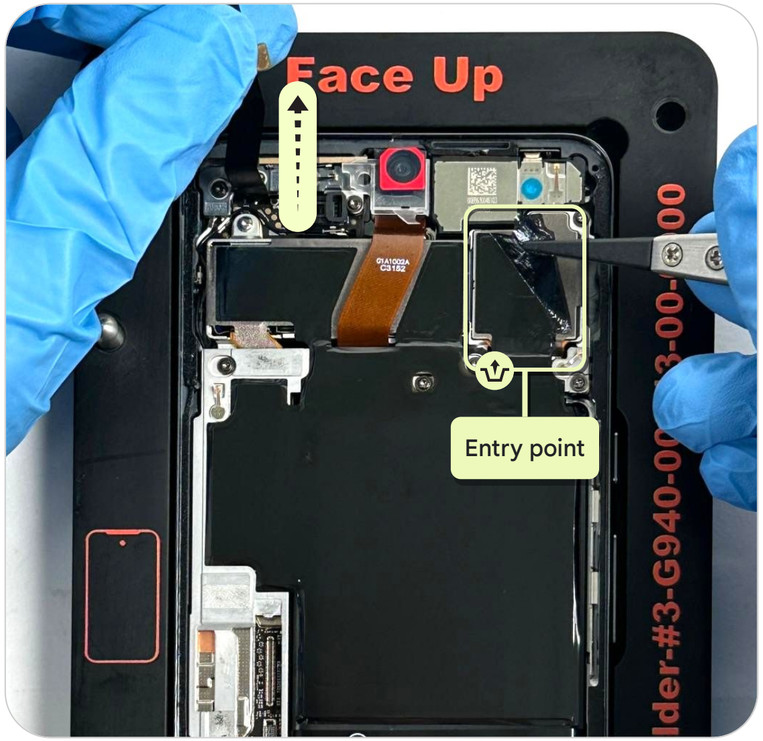
The mmWave Flex is only needed for the mmWave Sku.

Finished! Need assembly instructions? ➜

Remove Graphite Sheet

- **mmWave fpc** needs to be lifted **by hand**. Pick up the **Graphite Sheet** with **ESD Tweezers**.
- Remove the **Graphite Sheet** with **ESD Tweezers**.

Part: G864-00635-01 (Graphite Sheet)



⚠ Use Caution

Be careful not to puncture the battery.

Don't reuse the part.

Disassembly instructions

Bottom Speaker

The **Bottom Speaker** is adhered to the **Enclosure**.
Be careful not to damage the speaker membrane.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**

Tools

Pixel 8 Pro-Holder

ESD Tweezers

Pixel 8 Pro-Screw Cover

Adjustable torque screwdriver

Screwdriver Hex Shank Torx Plus Bit no.3

Parts

Bottom Speaker

The parts listed here are for the Bottom Speaker disassembly.

Reuse indications — Reusable without Cleaning | Reusable after Cleaning | Not Reusable after disassembly

SHIM
G806-09493-06

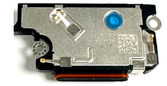
DDIC Right
G852-03670-02

DDIC Left
G852-03670-01

Screw
G250-06946-10

USB-C cowling
G853-01362-01

Bottom Speaker
G863-00462-01



UDFPS Flex Pad
G806-11745-01

Remove SHIM and DDIC

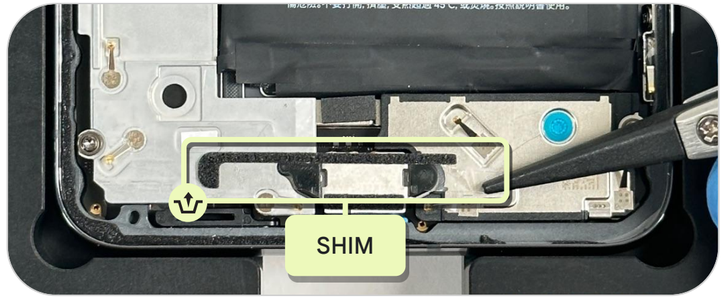
Remove the **SHIM**, **DDIC Right**, **DDIC Left**, and **UDFPS Flex Pad** with **ESD Tweezers**.

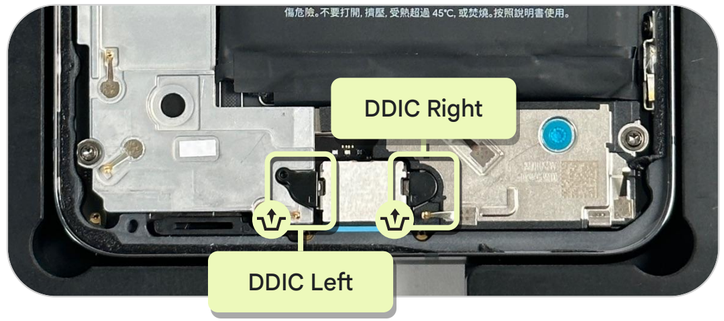
Part: G806-09493-06 (SHIM)

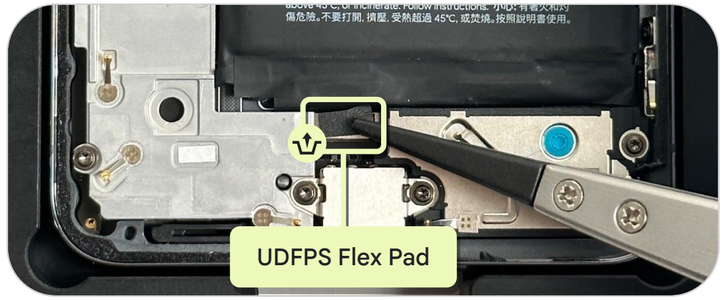
Part: G852-03670-02 (DDIC Right)

Part: G852-03670-01 (DDIC Left)

Part: G806-11745-01 (UDFPS Flex Pad)







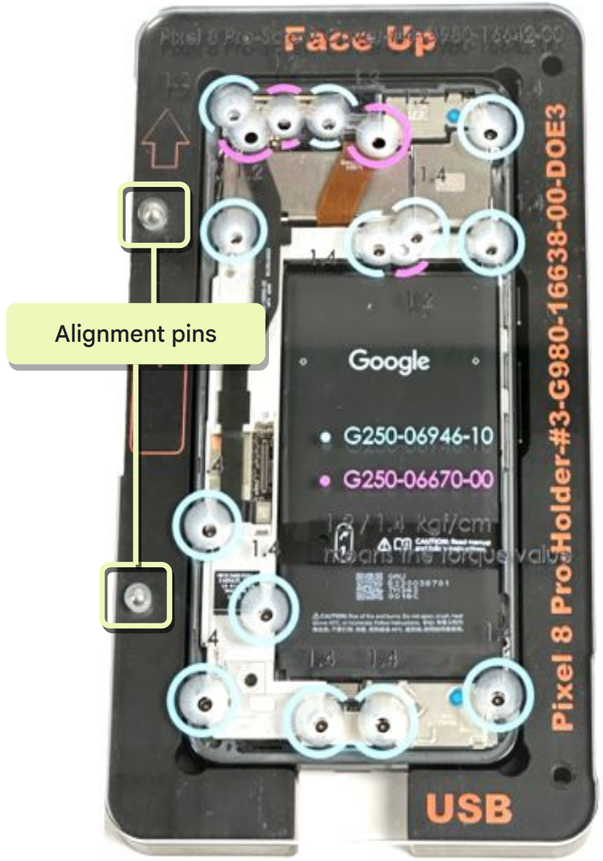
Note

Don't reuse the parts.

UDFPS Flex Pad should be removed only in case of damage or deformation.

Place screw cover

Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder**.
The 2 alignment pins are to align the screw cover, to avoid removing the wrong screws.



Remove screws

Remove **3 Screws** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**, and remove the **Pixel 8 Pro-Screw Cover**.

Part: G250-06946-10 *3 (Screw)

Use Caution

Be careful when using the screwdriver. Don't damage the adjacent battery.

Incorrect use of the screwdriver could cause injury to you or third persons or damage to the battery and/or the product.

Remove USB-C cowling

Remove the **USB-C cowling** with **ESD Tweezers**.

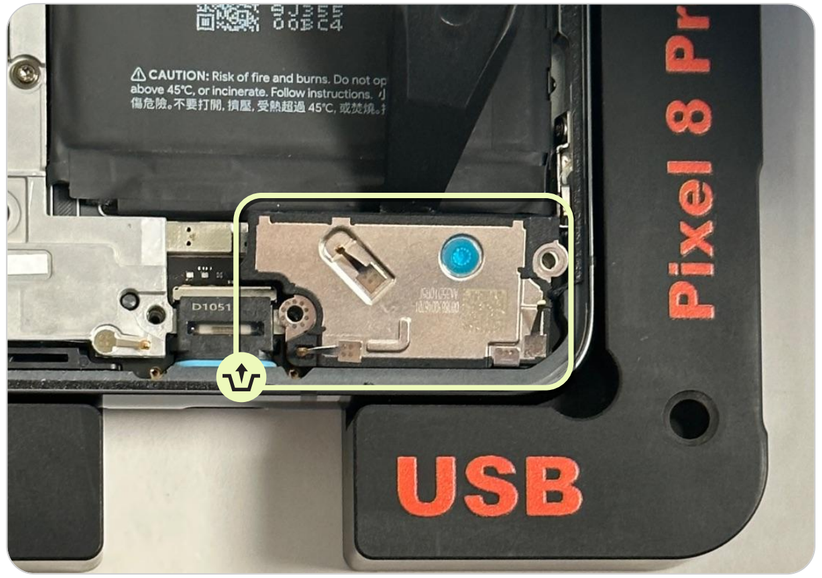
Part: G853-01362-01 (USB-C cowling)

Finished! Need assembly instructions? ➜

Remove Bottom Speaker

Remove the **Bottom Speaker** with a **Universal Disassembly ESD stick**.

Part: G863-00462-01 (Bottom Speaker)



Disassembly instructions

Mid-frame

The Mid-frame ensures connectors remain engaged with the Logic Board and acts as a heatsink.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**
- **Graphite Sheet**
- **Bottom Speaker**

Tools

Pixel 8 Pro-Screw Cover

Adjustable torque screwdriver

Screwdriver Hex Shank Torx Plus Bit no.3

Universal Fish line tool

ESD Tweezers

Universal Disassembly ESD Stick

Parts

Mid-frame

The parts listed here are for the Mid-frame disassembly.

Reuse indications

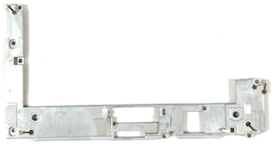
- Reusable without Cleaning
- Reusable after Cleaning
- Not Reusable after disassembly

Screw

G250-06946-10

Mid-frame

G949-00703-01



SOC Thermal Pad

G864-00576-01

Remove screws

- Place the **Pixel 8 Pro-Screw Cover**.
- Remove **7 Mid-frame Screws** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**, and remove the **Pixel 8 Pro-Screw Cover**.

Part: G250-06946-10 *7 (Screw)

Use Caution

Be careful when using the screwdriver. Don't damage the adjacent battery.

Incorrect use of the screw driver could cause injury to you or third persons or damage to the battery and/or the product.

Note

Don't reuse the parts.

Remove Mid-frame

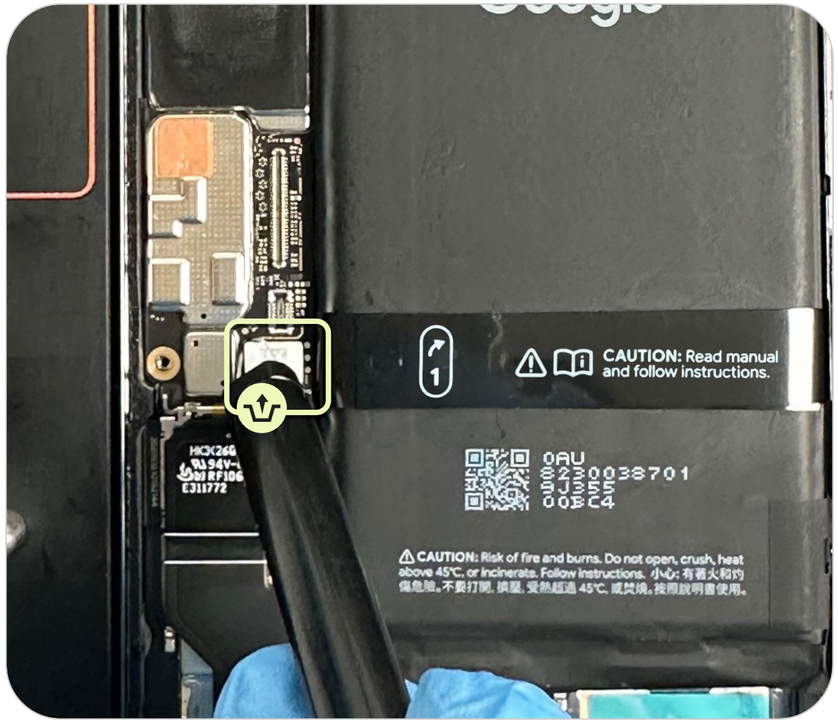
- **mmWave fpc** needs to be lifted by hand.
- Remove **Mid-frame** with **ESD Tweezers** by gripping it at the center.

Part: G949-00703-01 (Mid-frame)

Finished! Need assembly instructions? ➜

Disconnect Battery

Loosen the **Battery** connector, and disconnect the **Battery** from the **Logic Board** with the **Universal fish line tool**.



Note

Use the **Universal fish line tool** to avoid damaging the components.

Disassembly instructions

Front Camera

The **Front Camera** is not fastened to the **Enclosure**.
It is simply connected to the **Logic Board**.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**
- **Graphite Sheet**
- **Mid-frame**

Tools

Pixel 8 Pro-Holder

Universal Fish line tool

Parts

Front Camera

The parts listed here are for Front Camera disassembly.

Reuse indications

- Reusable without Cleaning
- Reusable after Cleaning
- Not Reusable after disassembly

Front Camera

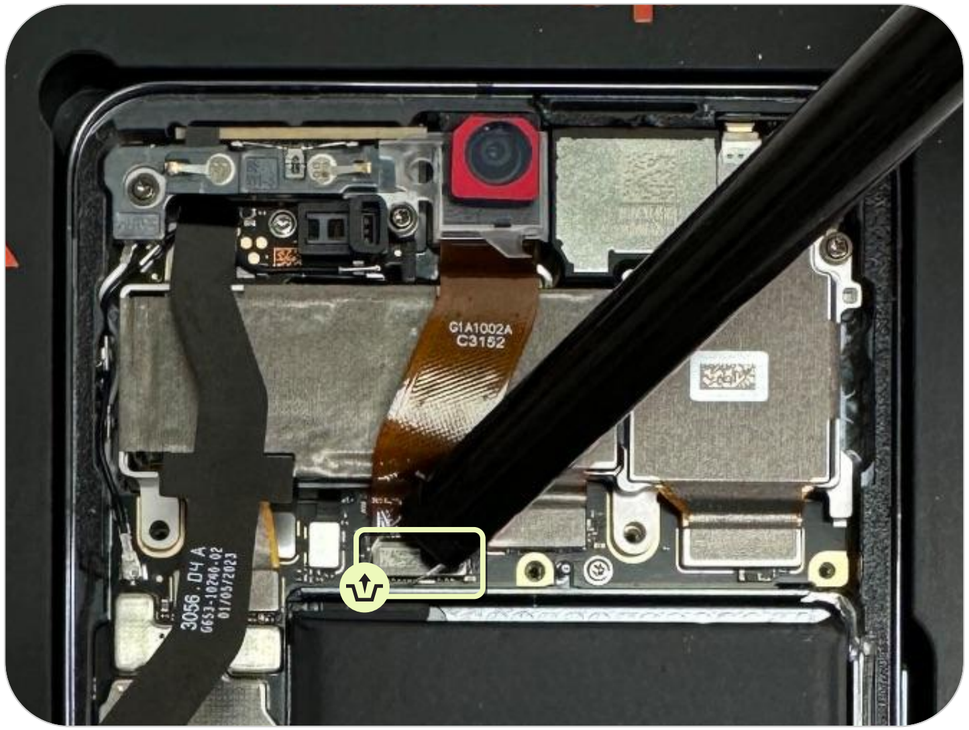
G949-00701-01

Finished! Need assembly instructions? ➜

Remove Front Camera

Remove the **Front Camera Connector** from the **Logic Board** with the **Universal fish line tool**.

Part: G949-00701-01 (Front Camera)



Note

Using the Universal fish line tool avoids damaging the components.

Disassembly instructions

mmWave Module

Millimeter waves (mmWave) are the radio waves used to build a 5G network, providing fast, reliable mobile data with low latency for the latest devices.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**
- **Graphite Sheet**
- **Mid-frame**
- **Front Camera**

Tools

Pixel 8 Pro-Holder

Pixel 8 Pro-BG Screw Cover

Adjustable torque screwdriver

Screwdriver Hex Shank Torx Plus Bit no.3

Universal Disassembly ESD stick

ESD Tweezers

Parts

mmWave Module

The parts listed here are for the mmWave Module disassembly.

Reuse indications — Reusable without Cleaning | Reusable after Cleaning | Not Reusable after disassembly

mmWave Flex
G652-10240-02

mmWave Bracket
G730-06637-03

Sub6 Bracket
G730-06636-03

Screw
G250-06946-10

P-sensor Grommet
G806-07778-01

mmWave Thermal Pad
G864-00562-01

mmWave_flex_ CPSA_1
G806-11705-00

mmWave_flex_ CPSA_2
G806-11706-00

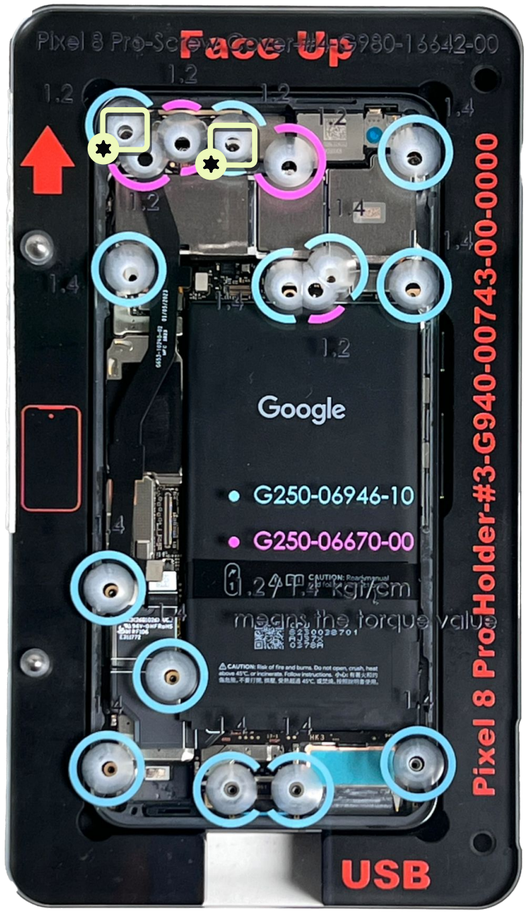
mmWave_flex_ CPSA_3
G806-11707-00

mmWave Module
G345-01353-06

Remove screws

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder.**
- Remove **2 Screws** with the **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3,** and then remove the **Pixel 8 Pro-Screw Cover.**

Part: G250-06946-10 *2 (Screw)



Note

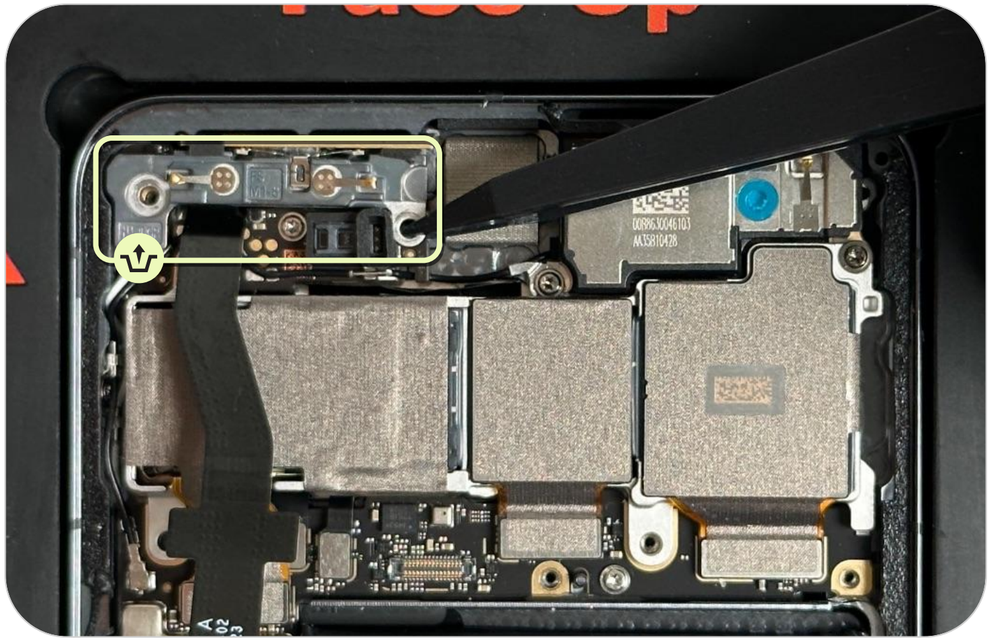
Don't reuse the parts.

Remove Bracket

Lift the **mmWave Bracket** with **ESD Tweezers** from the right screw hole.

Part: G730-06637-03 (mmWave Bracket)

Part: G730-06636-03 (Sub6 Bracket)



Note

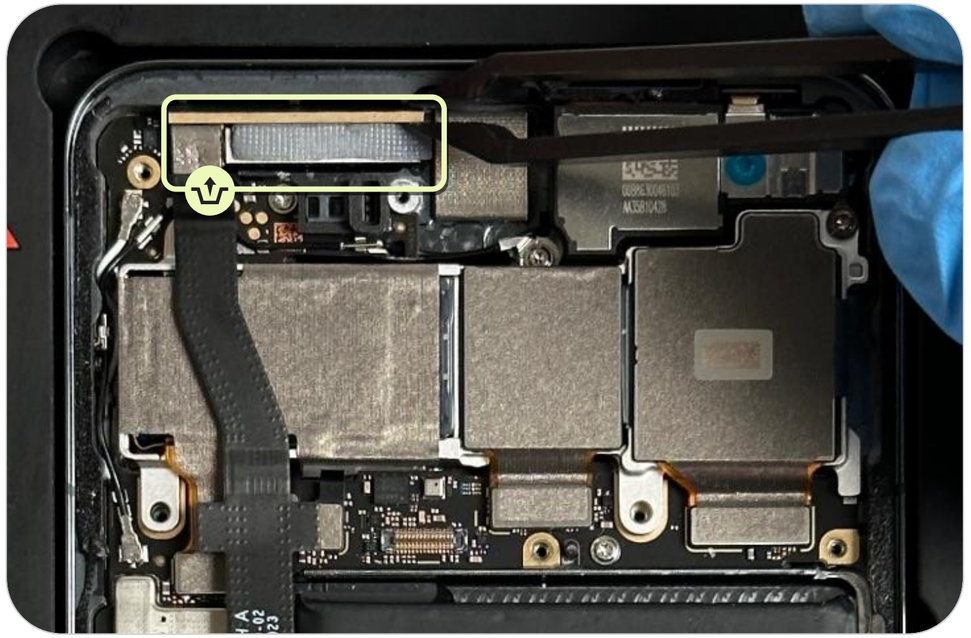
Don't lift from the left hand side; damage to the ANT 1 Board components could result, which is directly under the mmWave Bracket.

Remove mmWave Module

Remove the **mmWave Module** and **mmWave Flex** together from the **Enclosure**.

Part: G652-10240-02 (mmWave Flex)

Part: G345-01353-06 (mmWave Module)



Note

This step is only needed for the mmWave Sku.

Disconnect mmWave Flex

Disconnect the **mmWave Flex** from the **mmWave Module** with the **Universal Fish line tool**.

Part: G652-10240-02 (mmWave Flex)

Part: G345-01353-06 (mmWave Module)

Note

This step is only needed for the mmWave Sku.

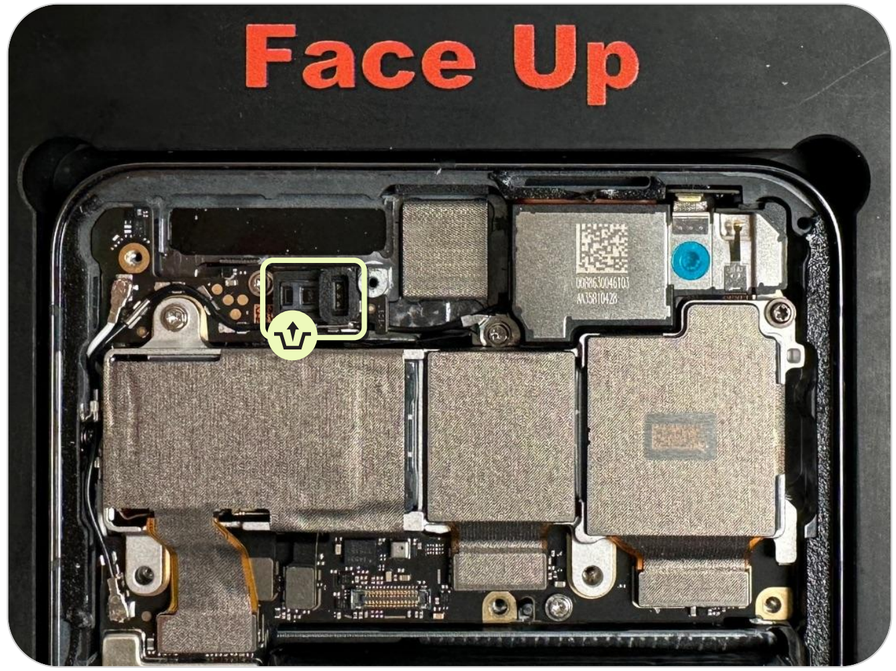
Use the Universal Fish line tool to avoid damaging the components.

Finished! Need assembly instructions? ➜

Remove P-sensor Grommet, if deformed

Remove the **P-sensor Grommet** from the **ANT 1 Board.**

Part: G806-07778-01 (P-sensor Grommet)



Note

Don't reuse the part.

Note that this step is only for replacing the P-sensor Grommet if it's deformed.

Disassembly instructions

Rear Camera

The Rear Camera module carries all the rear cameras.
It is not possible to replace a single camera and lens.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**
- **Graphite Sheet**
- **Mid-frame**
- **Front Camera**
- **mmWave Module**

Tools

Pixel 8 Pro-Holder

Pixel 8 Pro-Screw Cover

Adjustable torque screwdriver

Screwdriver Hex Shank Torx Plus Bit no.3

ESD Tweezers

Universal Fish line tool

Ionizing air fan

Parts

Rear Camera

The parts listed here are for the Rear Camera disassembly.

Reuse indications — Reusable without Cleaning | Reusable after Cleaning | Not Reusable after disassembly

Rear Camera
G949-00702-01

Screw
G250-06670-00

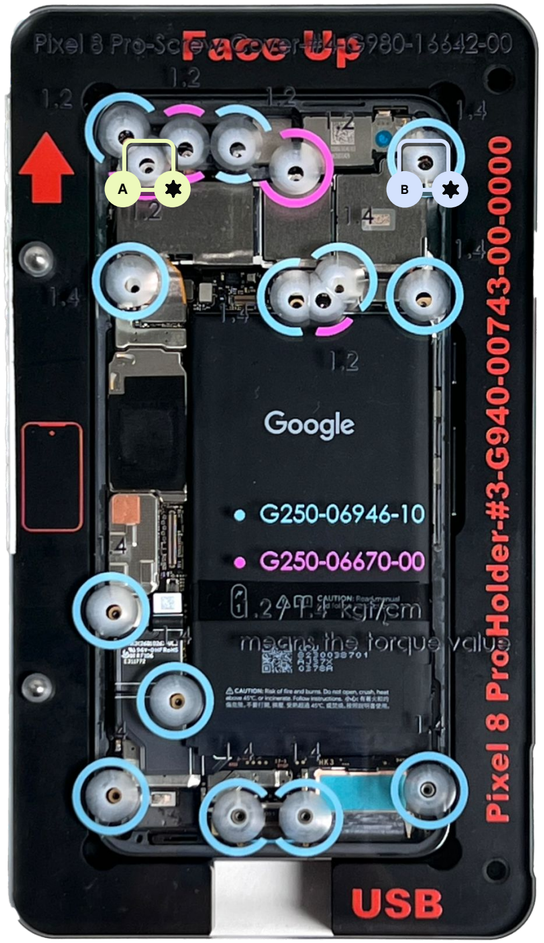
Screw
G250-06946-10

Remove screws

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder.**
- Remove **2 Rear Camera Screws** with the **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3,** and then remove the **Pixel 8 Pro-Screw Cover.**

Part: G250-06946-10 (Screw)

Part: G250-06670-00 (Screw)



A: G250-06670-00

B: G250-06946-10

Note

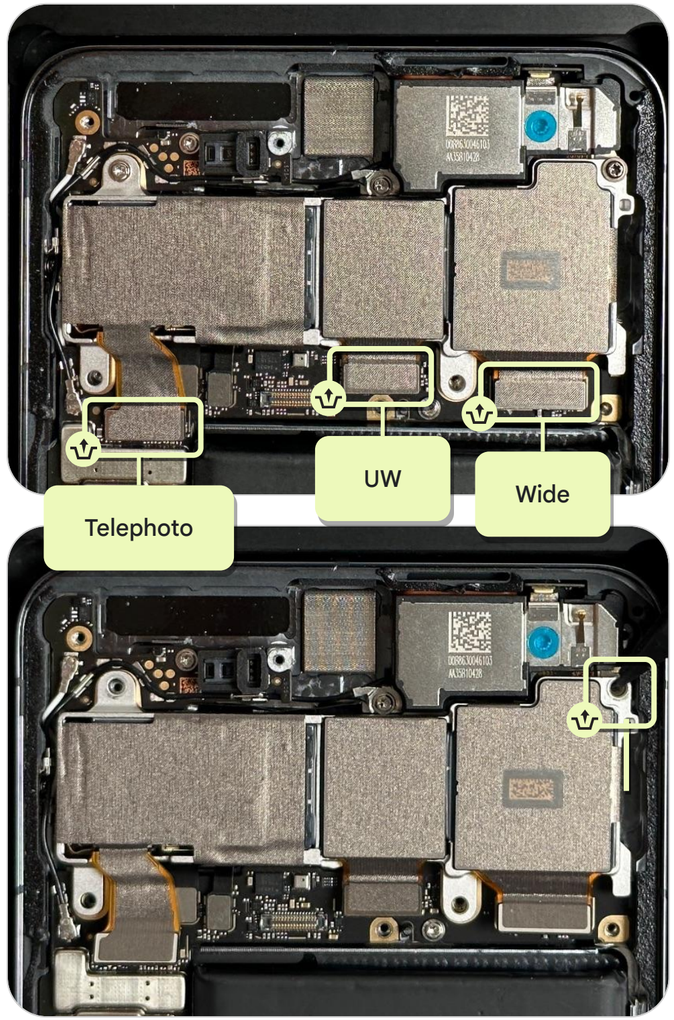
Don't reuse the parts.

Finished! Need assembly instructions? ➜

Disconnect Rear Camera

- Loosen **3 Rear Camera Connectors** and disconnect from the **Logic Board** with a **Universal fish line tool**.
- Remove the **Rear Camera** with **ESD Tweezers**.

Part: G949-00702-01 (Rear Camera)



Use Caution

Ensure the environment is clean for this process.

Make sure the camera socket is clear of dust and debris.

Note

Use the Universal fish line tool to avoid damaging the components.

Battery

Use caution!

Use caution if engaging in repair.

Opening and/or repairing a device can present electric shock, device damage, fire and personal injury risks, and other hazards.

Before servicing the product, read the full set of **precautions** in this document.

Battery Handling

- Never bend, dent, puncture, or use tools to pry the battery.
- Store batteries in the replacement part packaging as soon as possible after removal to prevent damage.
- If a battery begins to vent, immediately cover in sand or use gloves and tongs to place battery in a fire safe.
- Take care to prevent shorting of battery terminals or damaging the battery, as fire or overheating could result.
- Dispose of the battery in a manner in accordance with local regulations.

Confirm Before Proceeding

- Battery is fully discharged and the device is disconnected from all power sources.
- Inspect the battery if the phone battery shows signs of swelling or damage, or if the phone feels hot or emits strong odor, don't attempt disassembly. Please reach out to Google customer support.
- Take care not to expose the phone or its components to liquids once disassembled.

Battery

It's recommended to use the Universal Disassembly Fixture to hold the device during the Battery removal process.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**
- **Graphite Sheet**
- **Mid-frame**

Tools

- Heat plate
- Universal Disassembly Fixture
- Pixel 8 Pro-Holder
- Pixel 8 Pro-Battery Press
- Universal Press
- ESD Tweezers
- Feeler gauge
- Universal adsorption bulb
- 3M AP111 Primer
- Table C-Clamp
- Ionizing air fan
- Pixel 8 Pro-Battery Press Rubber
- Universal Press Plate 12mm
- Universal Base

Parts

Battery

The parts listed here are for the Battery disassembly.

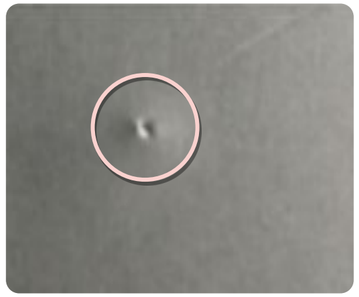
Reuse indications — Reusable without Cleaning | Reusable after Cleaning | Not Reusable after disassembly

Battery

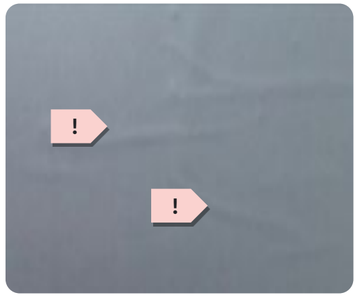
G949-00704-01

Caution ⚠

Examples of unacceptable battery conditions - Not suitable for repair*

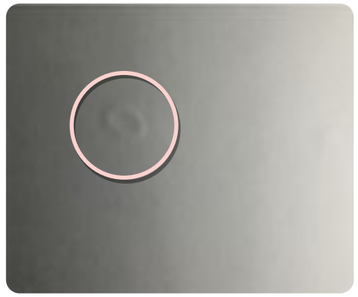


Pouch damage

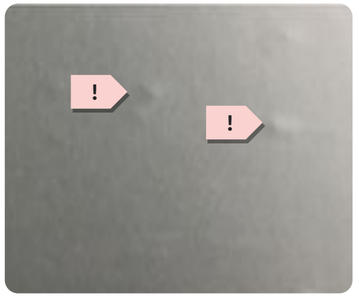


Line protrusion

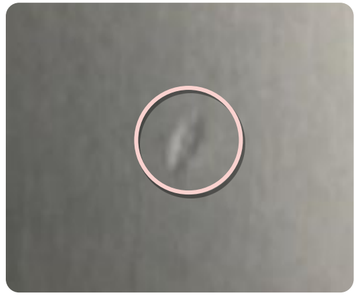
Scratch



Contamination marking

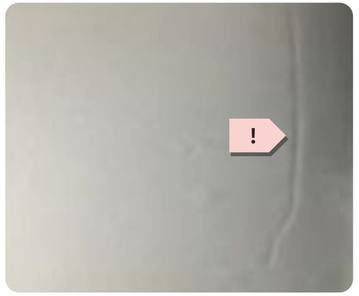


Dot protrusion

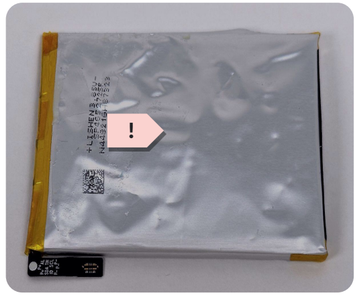


Dent

Bubbling



Imprinted line



Swelling or electrolyte leakage

*These are examples of potentially dangerous battery conditions but don't reflect all possible dangerous conditions. Please follow general safety guidance outlined in this document.

Peel back pull jacket

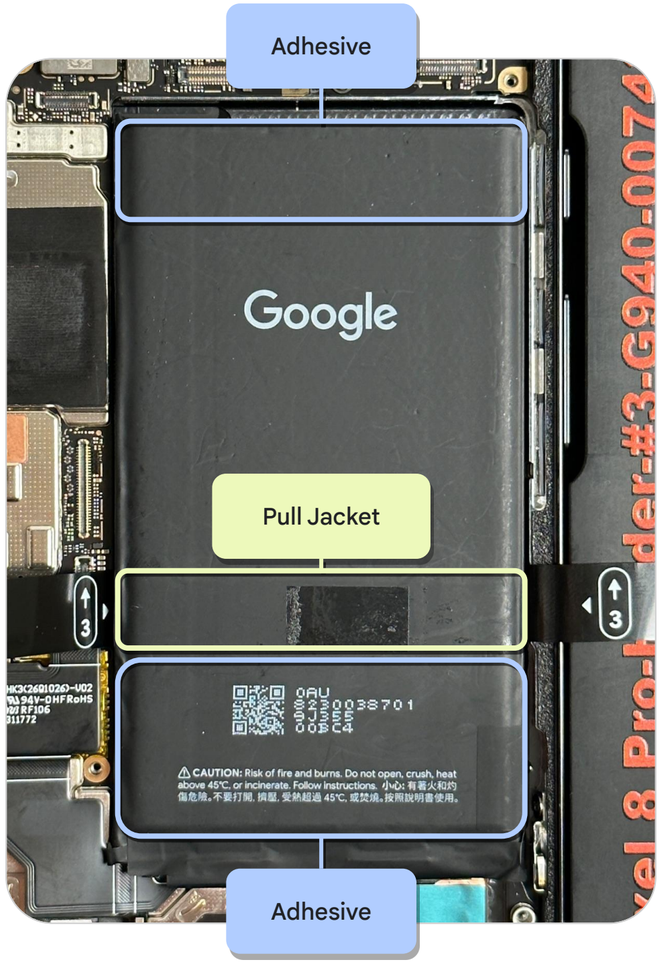
Peel back the pull jacket on the battery following the instructions with **ESD Tweezers**.

Part: G949-00704-01 (Battery)

Locate adhesive

The adhesive sits both on the upper and lower parts of the **Battery**.

Part: G949-00704-01 (Battery)



Use Caution

The intent of the pull jacket is to provide leverage to pull on the Battery, NOT to cut through the adhesive.

Don't move the pull jacket vertically.

Soften adhesive

Place the device back down on the **Heat Plate** set to **158°F/70 °C for 10 mins** to soften the **Battery** adhesive evenly. To ensure even heating, don't rest the camera visor on the heating surface.

Use Caution

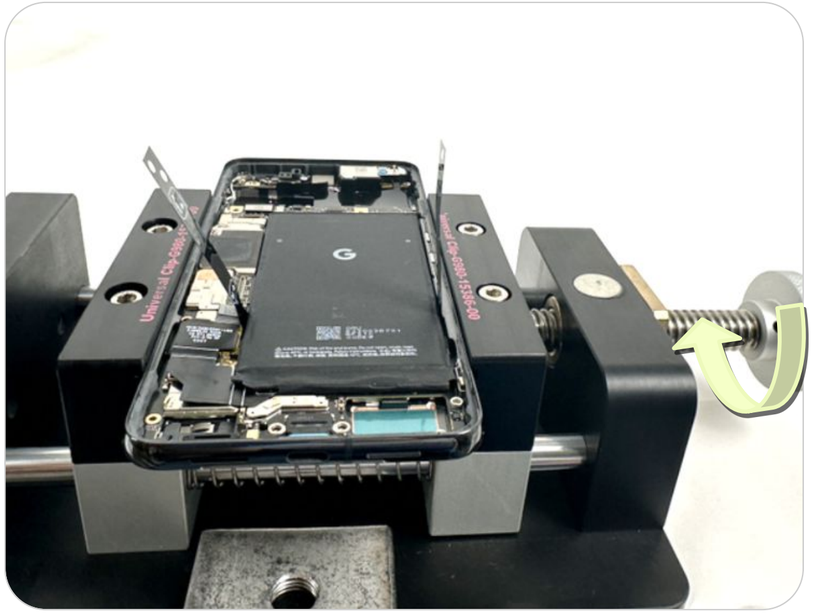
Heat plate is a Hot Surface. Use caution as it could cause burns.

Clamp fixture

- Place the **Universal Disassembly Fixture** on a flat surface and fasten down with a clamp.
- Align the **Table C-Clamp** with the fixture, and make sure the clamp is fastened tightly.

Secure device

- Use the **Universal Disassembly Fixture** to remove the **Battery**.
- Place the device on the **Fixture** and adjust so the device is centered.
- Turn the handle clockwise to lock the device in position.

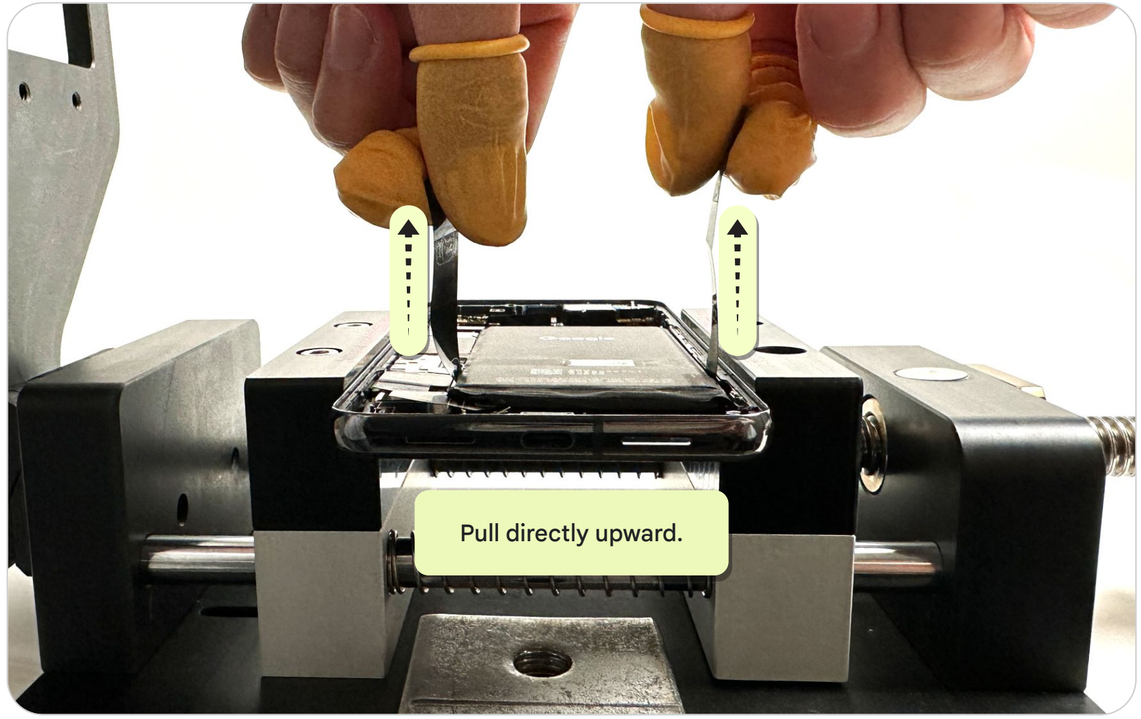


Lift Battery

- Wearing **ESD Finger cots** can help to increase friction and make the pull jacket easier to grip.
- Pull both sides of the jacket upward, perpendicular to the device, to remove the **Battery**.

Use Caution

The battery may be easier to remove if you lift the battery as soon as the device leaves the heat plate.



Finished! Need assembly instructions? ➜

Remove Battery

- Gently remove the **Battery**.
- Store the battery safely and dispose of the battery in a manner in accordance with local regulations.

Part: G949-00704-01 (Battery)

⚠ Use Caution

Keep small screws and sharp objects away from the Battery.

For your safety, we don't recommend reinstalling the battery after removal. After removal, install a new battery.

Disassembly instructions

Top Speaker

The Top Speaker is used as a speaker for a third speaker for music and video.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**
- **Graphite Sheet**
- **Bottom Speaker**
- **Mid-frame**
- **Front Camera**
- **mmWave Module**
- **Rear Camera**

Tools

Pixel 8 Pro-Holder

Pixel 8 Pro-Screw Cover

Universal Coaxial Cable Tool

Adjustable torque screwdriver

Screwdriver Hex Shank Torx Plus Bit no.3

ESD Tweezers

Universal Disassembly ESD stick

3M 111 Primer

Dust-free cotton swab

Ionizing air fan

IPA

Parts

Top Speaker

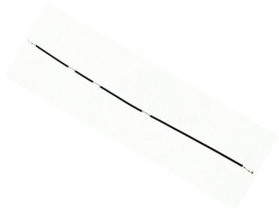
The parts listed here are for the Top Speaker disassembly.

Reuse indications — Reusable without Cleaning | Reusable after Cleaning | Not Reusable after disassembly

Top Speaker
G863-00461-03

Screws
G250-06670-00

Coaxial Cable #4
G821-00881-01



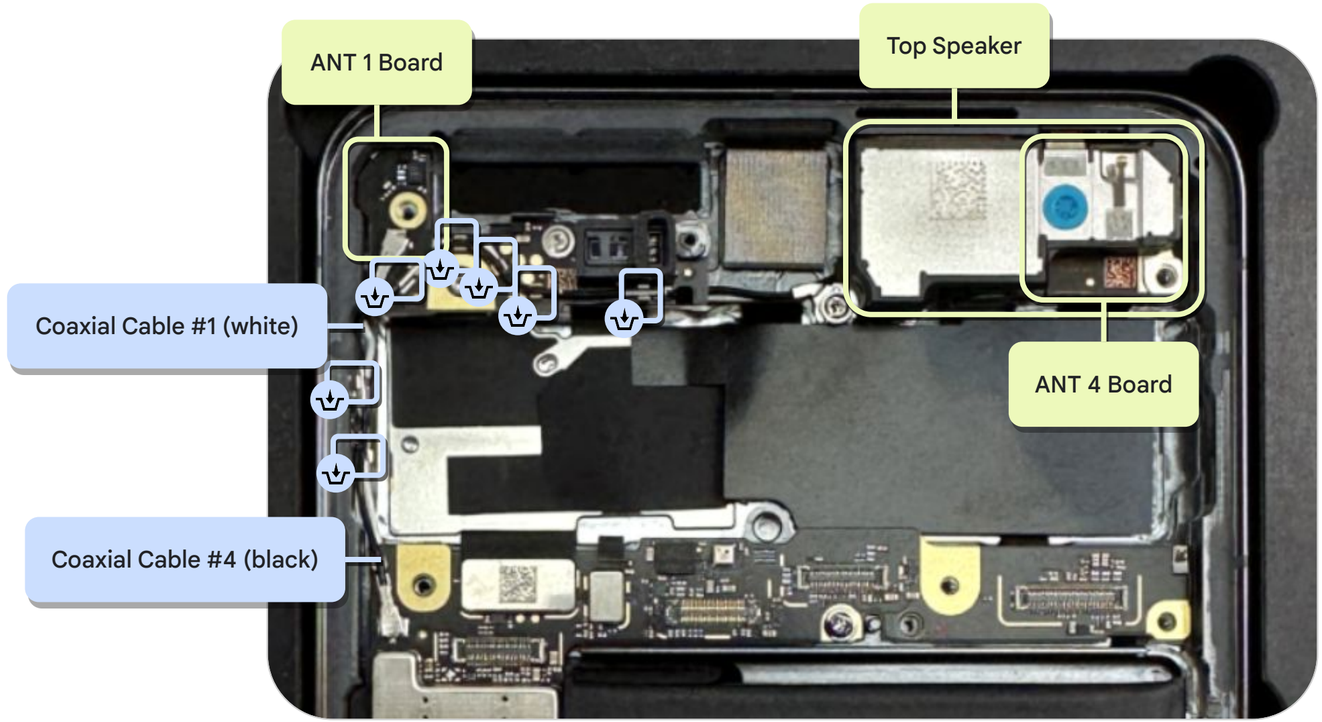
Kapton
G806-07911-01

ANT 4 Board
G949-00705-01

Top SPK Adhesive
G806-11708-00

Locate Cables

There are **Two Coaxial Cables** routed around **ANT 1 Board, Top Speaker** & **Logic Board**.



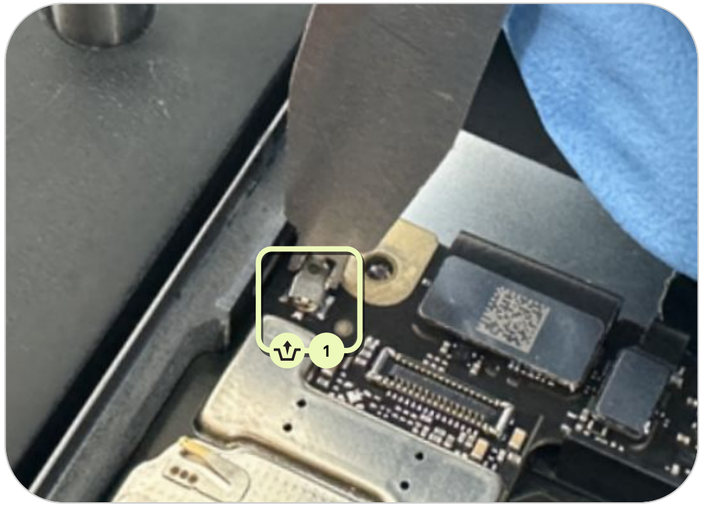
Disconnect Cable

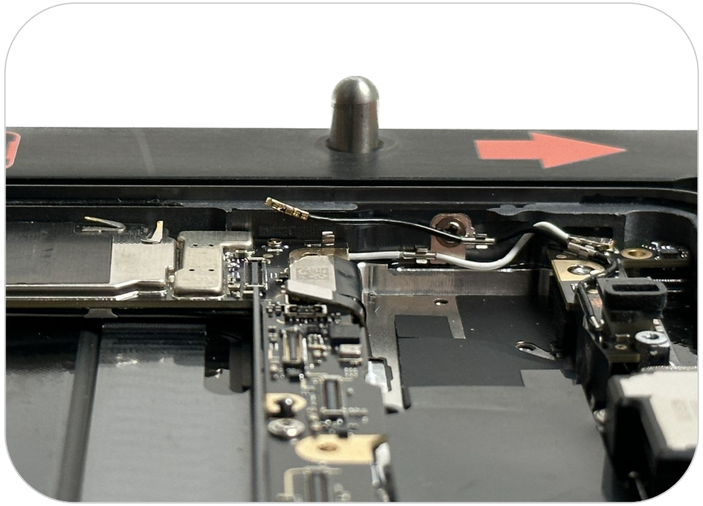
Twist to disconnect the **Coaxial Cable #4 Connector** from the **MLB** with the **Universal Coaxial Cable Tool**.

Part: G821-00881-01 (Coaxial Cable #4)

Note

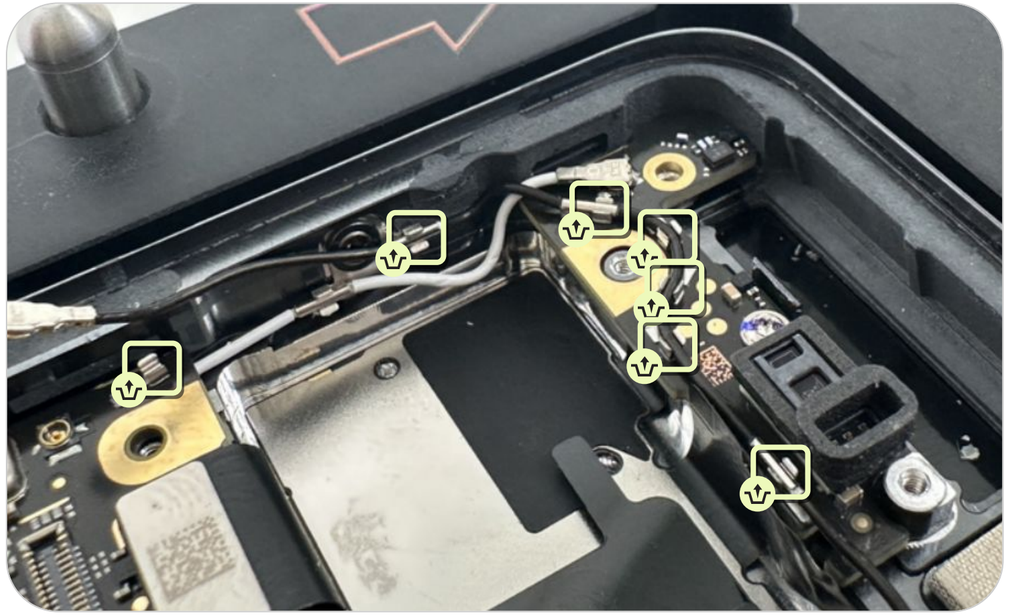
Use this tip to disconnect the connector.





Release Cable

Release the **Coaxial Cable #4** from the tunnel.



Remove screw

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder.**
- Remove the **Top Speaker Screw** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3,** and then remove the **Pixel 8 Pro-Screw Cover.**

Part: G250-06670-00 (Screw)

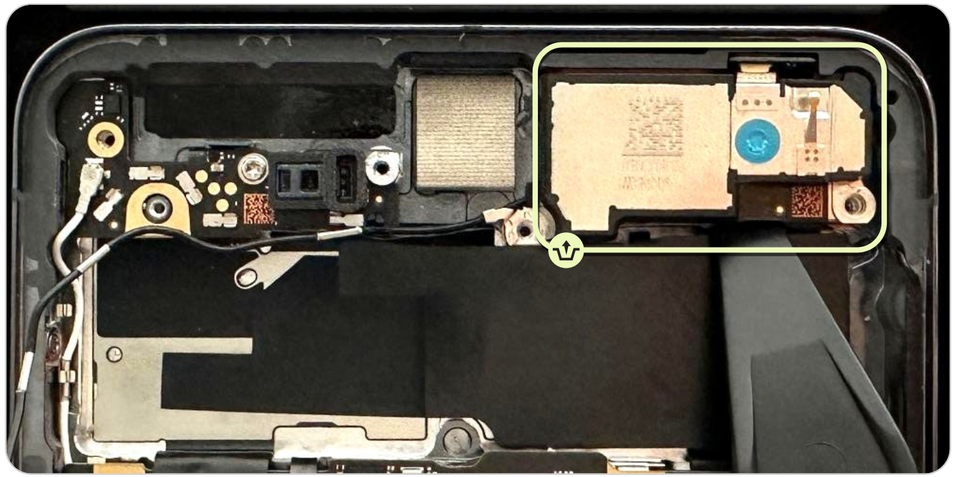
Note

Don't reuse the parts.

Remove Top Speaker

Remove the **Top Speaker** with the **Universal Disassembly ESD stick**, by prying upwards

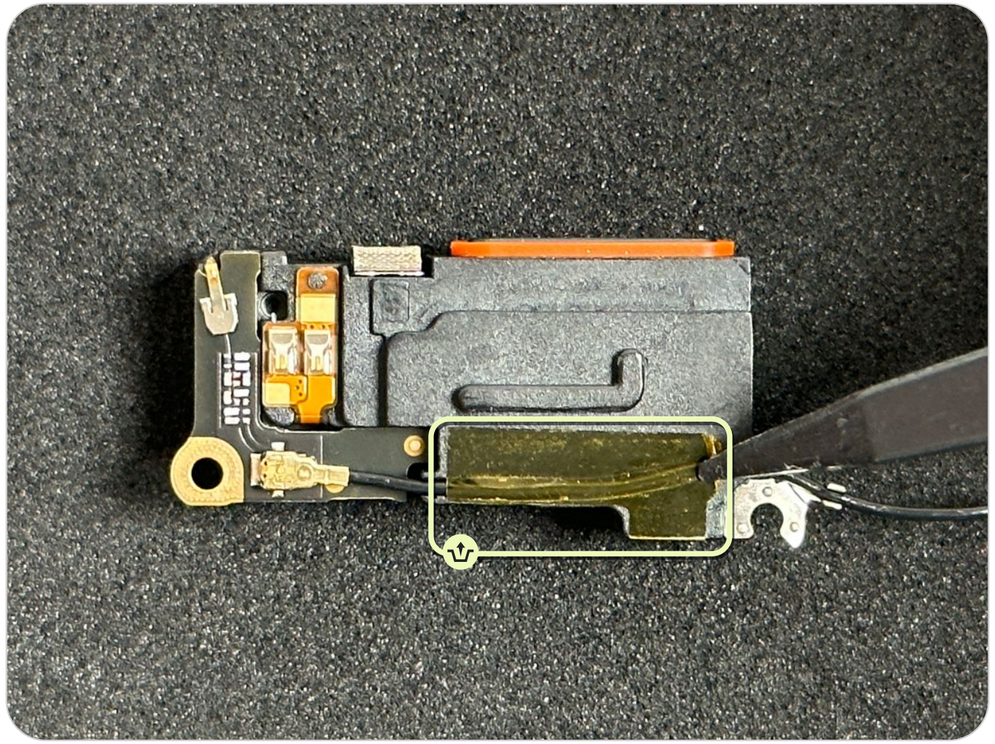
Part: G863-00461-03 (Top Speaker)



Remove Kapton

Remove the **Katpon** with **ESD Tweezers**.

Part: G806-07911-01 (Kapton)



Note

Don't reuse the part.

This step should be carried out on EVA sponge.

Disconnect Cable

Twist to disconnect the **Coaxial Cable #4 Connector** from the **ANT 4 Board** with the **Universal Coaxial Cable Tool**.

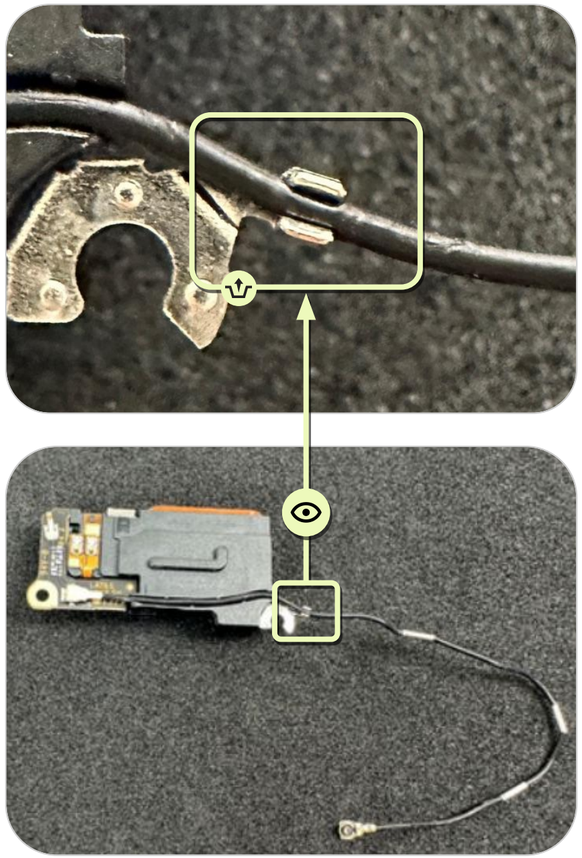
Note

Use this tip to disconnect the connector.

This step should be carried out on EVA sponge.

Release Cable

Release the **Coaxial Cable #4** from the tunnel.



Note

Don't reuse the part.

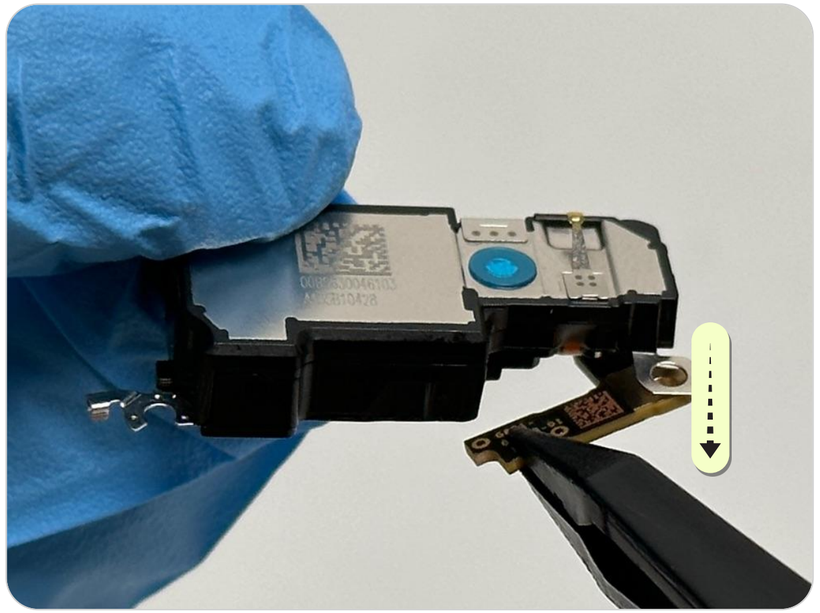
This step should be carried out on EVA sponge.

Finished! Need assembly instructions? ➜

Remove ANT 4

Remove the **ANT 4 Board** from the **Top Speaker** with **ESD Tweezers**.

Part: G949-00705-01 (ANT 4 Board)



Use Caution

This step only applies to when there is either Top Speaker or ANT 4 damage.

Disassembly instructions

Logic Board

The Logic Board consists of memory, storage, the processor, and communication components such as Wi-Fi and 5G.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**
- **Graphite sheet**
- **Bottom Speaker**
- **Mid-frame Module**
- **Front Camera**
- **mmWave**
- **Rear Camera**
- **Battery**
- **Top Speaker**

Tools

Pixel 8 Pro-Holder

Pixel 8 Pro-Screw Cover

Adjustable torque screwdriver

Screwdriver Hex Shank Torx Plus Bit no.3

ESD Tweezers

Universal Fish line tool

ESD spudger

IPA and cloth

Sankol lubricant CFD 409Z_V2

Dust-free cotton swab

Universal Coaxial Cable Tool

Parts

Logic Board

The parts listed here are for the Logic Board disassembly.

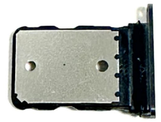
Reuse indications — Reusable without Cleaning | Reusable after Cleaning | Not Reusable after disassembly

Logic Board
Multiple Part Numbers

Screw
G250-06670-00

ANT 7 Grounding
G853-01317-01

SIM Tray
Multiple Part Numbers



Screw
G250-05802-00

Coaxial Cable #1
G821-00883-01

Remove Screw

Remove the **ANT 7 Screw** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**.

Part: G250-05802-00 (Screw)

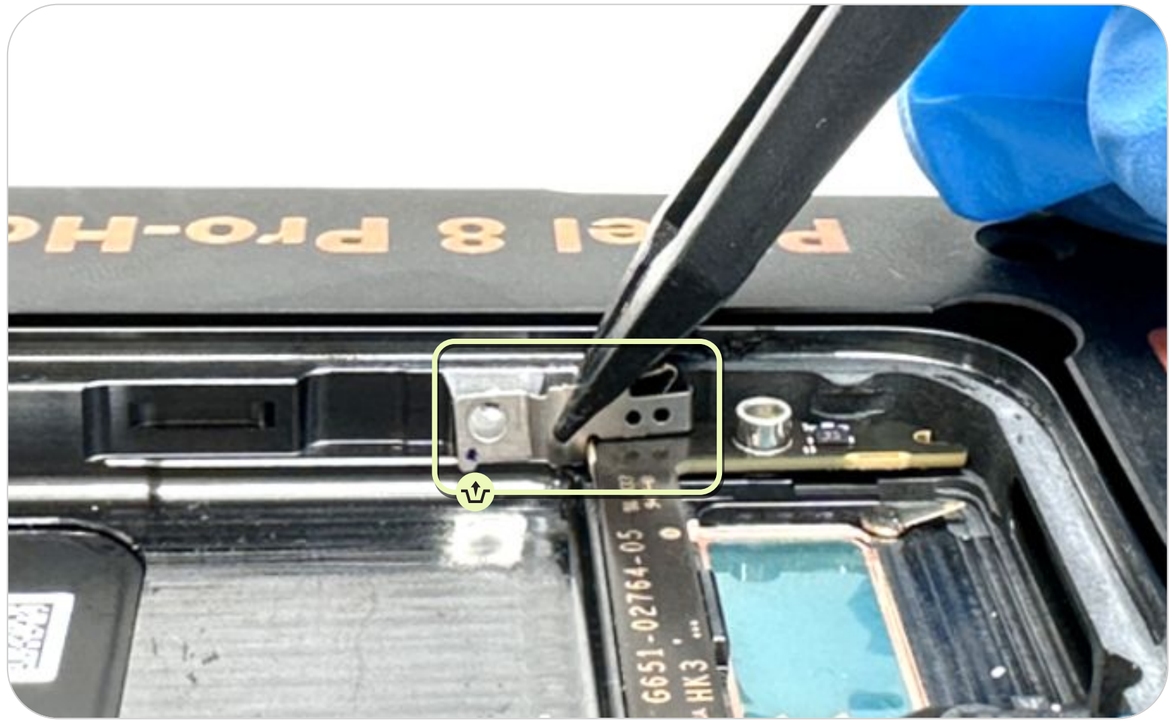
Note

Don't reuse the part.

Remove ANT 7

Remove the **ANT 7 Grounding** with **ESD Tweezers**.

Part: G853-01317-01 (ANT 7 Grounding)



Remove SIM Tray

Remove the **SIM Tray** with the **Universal Fish line tool**.

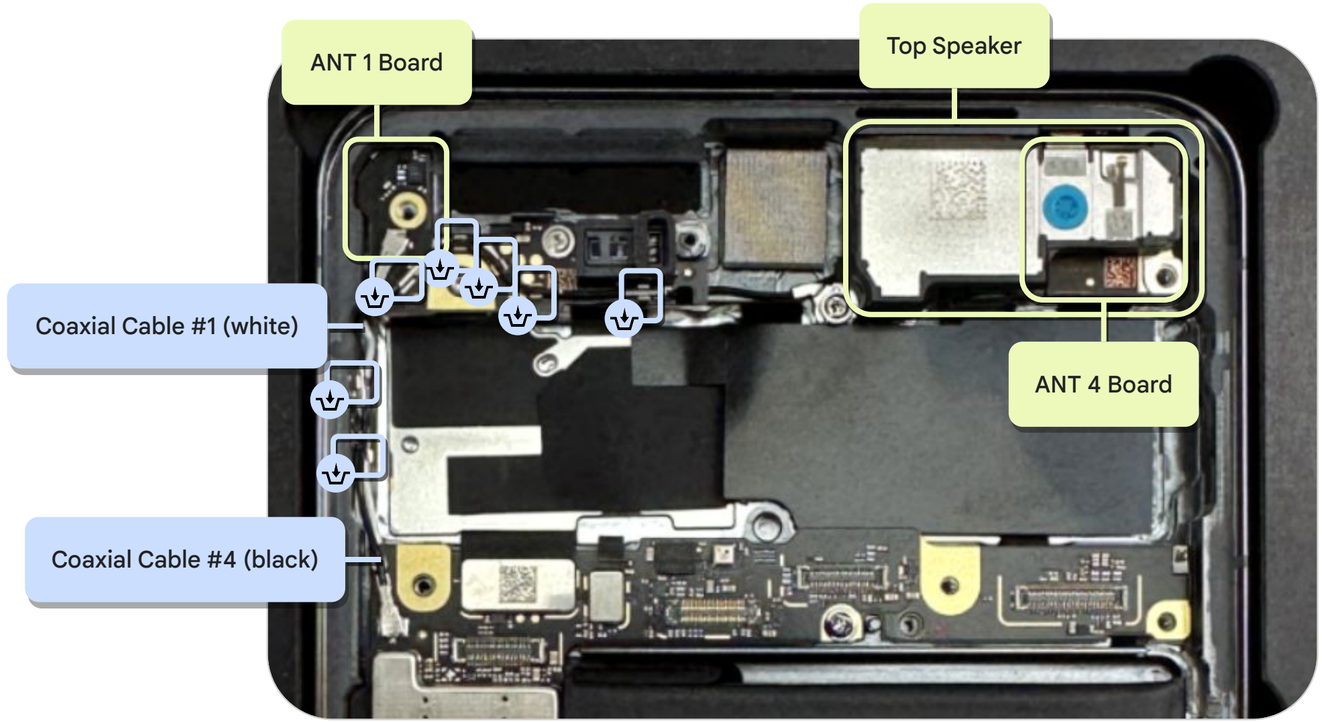
Part: Multiple Part Numbers (SIM Tray)

Use Caution

Be careful to avoid scratching the Enclosure.

Locate Cables

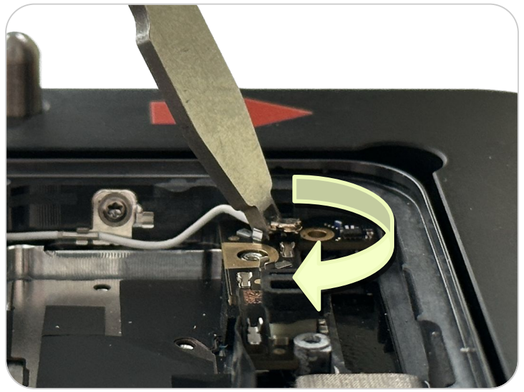
There are **Two Coaxial Cables** routed around **ANT 1 Board, Top Speaker** & **Logic Board**.

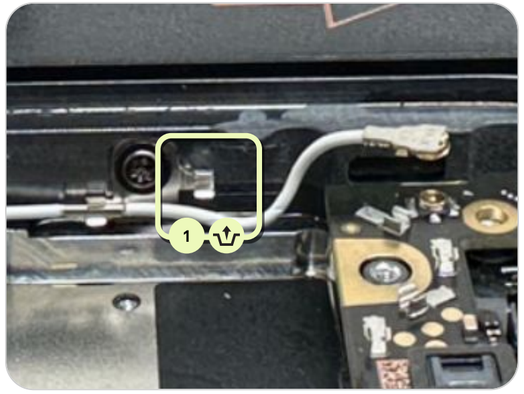


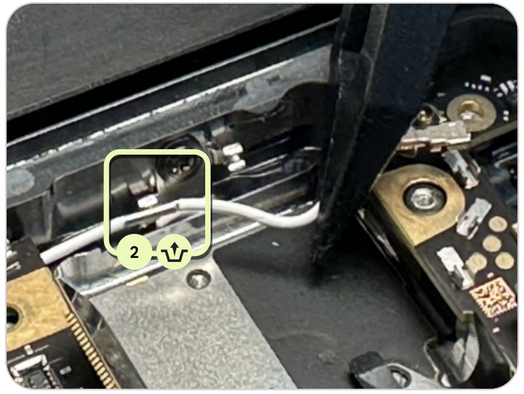
Release Cable

- Twist to disconnect the **Coaxial Cable #1 Connector** from the **ANT 1 Board** with the **Universal Coaxial Cable Tool**.
- Release it from the tunnel with **ESD Tweezers**.

Part: G821-00883-01 (Coaxial Cable #1)





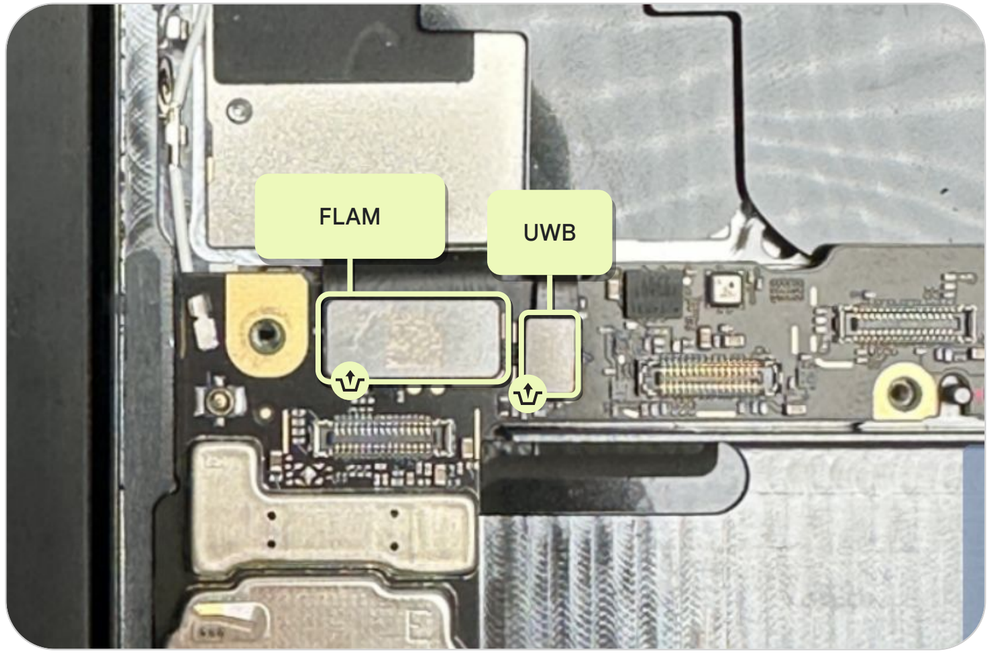


Note

Use this tip to disconnect the connector.

Disconnect Logic Board

Loosen and remove the **FLAM** and **UWB Connectors** with the **Universal Fish line tool**.



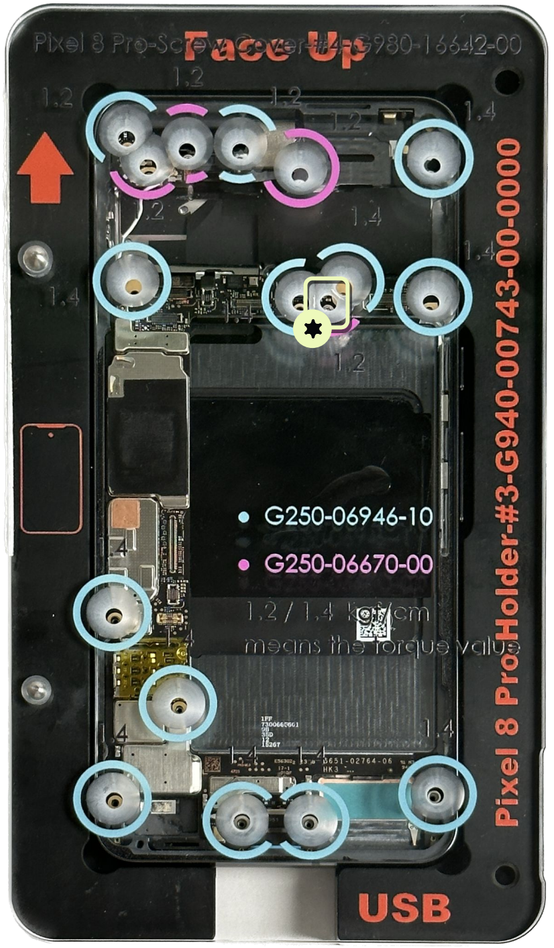
Note

Use the Universal Fish line tool to avoid damaging the components.

Remove Screw

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder**.
- Remove the **Logic Board Screw** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**, and remove the **Pixel 8 Pro-Screw Cover**.

Part: G250-06670-00 (Screw)



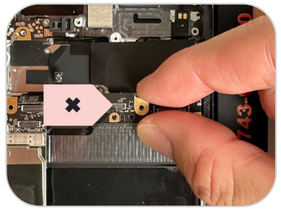
Note

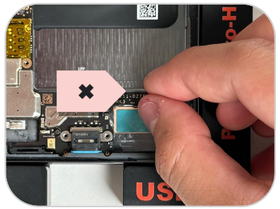
Don't reuse the part.

Remove Logic Board

- Pry the **Logic Board** upward with an **Universal Disassembly ESD stick**.
- Holding the indicated part, lift the top side first to remove the **Logic Board**.

Part: Multiple Part Numbers (Logic Board)





Use Caution

Be careful to avoid damaging components on the Logic Board.

Note

Don't wear gloves when handling the Logic Board.

Finished! Need assembly instructions? ➜

Disconnect Cable

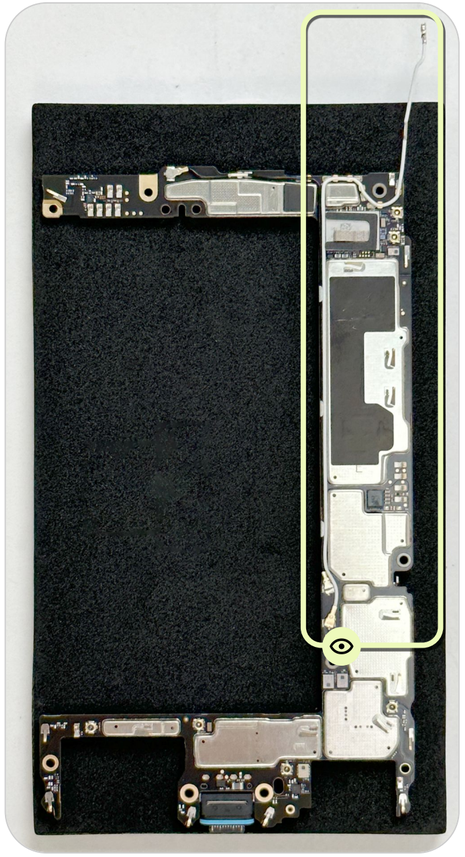
- Locate the **Coaxial Cable #1**.
- Twist to disconnect the **Coaxial Cable #1 Connector** from the **Logic Board** with the **Universal Coaxial Cable Tool**.
- Release **Coaxial Cable #1** from the tunnel on the **Logic Board**.

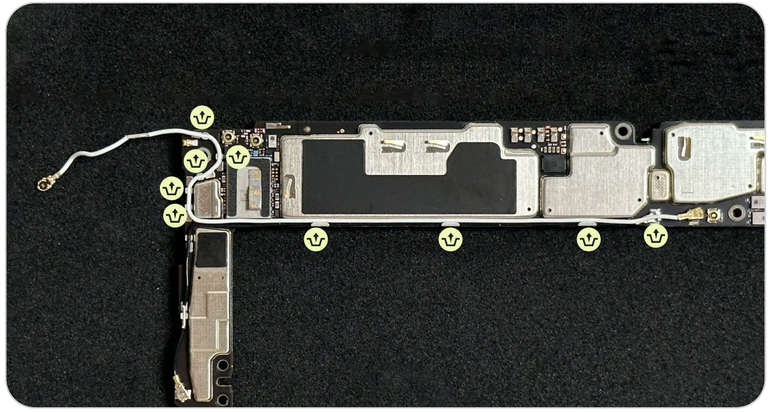
Note

Don't reuse the part.

Use this tip to disconnect the connector.

This step should be carried out on EVA sponge.





Disassembly instructions

Mic 1 Bracket

The Mic 1 Bracket is adhered to the Enclosure. This component is not re-used, if it is removed, replace with a new part.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**
- **Graphite sheet**
- **Bottom Speaker**
- **Mid-frame**
- **Front Camera**
- **mmWave Module**
- **Rear Camera**
- **Battery**
- **Top Speaker**
- **Logic Board**

Tools

Pixel 8 Pro-Holder

Universal Disassembly ESD Stick

ESD Spudger

ESD Tweezers

Dust-free cotton swab

Sankol lubricant CFD 409Z_V2

Parts

Mic 1 Bracket

The parts listed here are for the Mic 1 Bracket disassembly.

Reuse indications

- Reusable without Cleaning
- Reusable after Cleaning
- Not Reusable after disassembly

Mic 1 Bracket

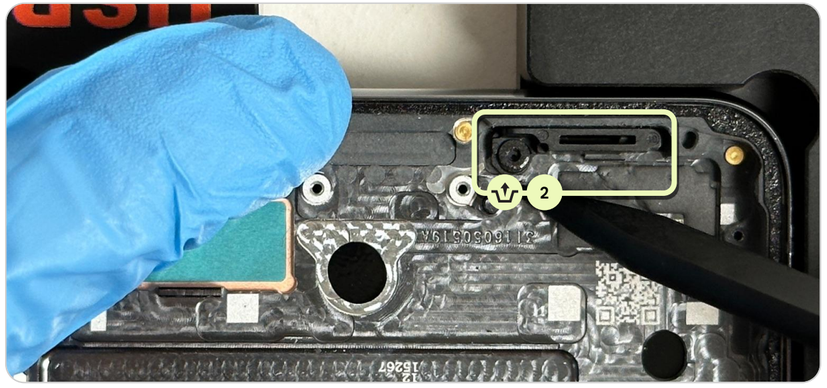
G730-07405-02

Finished! Need assembly instructions? ➜

Remove Mic 1 Bracket

- Use the tip of **ESD Spudger** to gently lift the **Mic 1 Bracket**.
- Insert the tip of **Universal Disassembly ESD Stick** under the left end and gently lift **Mic 1 Bracket**.

Part: G730-07405-02 (Mic 1 Bracket)



Note

Don't reuse the part.

Enclosure

If re-using the Enclosure, ensure that any thermal paste or adhesive residue is completely removed.

Use caution!

Review all **safety precautions** before beginning work.

Prerequisites

Remove the following components first:

- **Display**
- **Graphite sheet**
- **Bottom Speaker**
- **Mid-frame**
- **Front Camera**
- **mmWave Module**
- **Rear Camera**
- **Battery**
- **Top Speaker**
- **Logic Board**
- **Mic 1 Bracket**

Tools

Pixel 8 Pro-Holder

Pixel 8 Pro-Screw Cover

Adjustable torque screwdriver

Screwdriver Hex Shank Torx Plus Bit no.3

IPA and cloth

ESD Spudger

Deglue Machine

ESD Tweezers

Parts

Enclosure

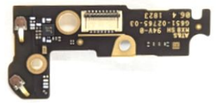
The parts listed here are for the Enclosure disassembly.

Reuse indications

- Reusable without Cleaning
- Reusable after Cleaning
- Not Reusable after disassembly

Enclosure
Multiple Part Numbers

ANT 1 Board
G949-00706-01



ANT 1 Kapton
G806-07724-01

Screw
G250-06670-00

Remove Screw (ANT 1)

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder**.
- Remove the **Screw** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**, and remove the **Pixel 8 Pro-Screw Cover**.

Part: G250-06670-00 (Screw)

Note

Don't reuse the part.

Note that the ANT 1 Board is on the Enclosure. Only perform these steps if it is damaged.

Finished! Need assembly instructions? ➜

Remove ANT 1

- Turn the **ANT 1 Board** over, and use **ESD Tweezers** to tear off the **Kapton** (Fig 1).
- Use the **ESD Tweezers** to gently disconnect the ZIF locking flap (Fig 2).
- Extract the **ANT 1 Board** with **ESD Tweezers** (Fig 3).

Part: G806-07724-01 (ANT 1 Kapton)

Fig 1

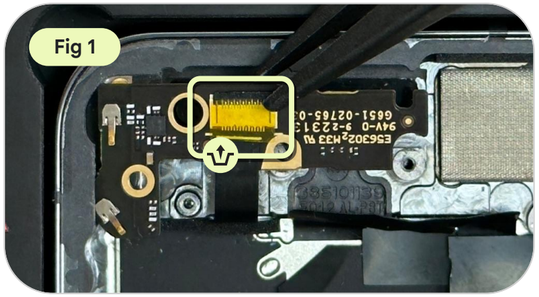


Fig 2

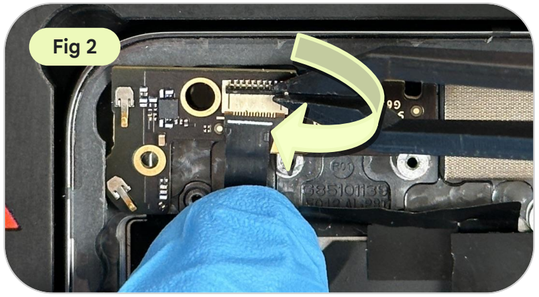
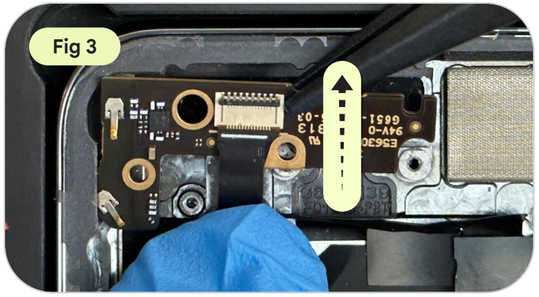


Fig 3



Pixel 8 Pro Repair Manual

Assembly

Enclosure

Battery

Mid-frame

Mic 1 Bracket

Rear Camera

Bottom Speaker

Logic Board

mmWave Module

Graphite Sheet

Top Speaker

Front Camera

Display

Assembly instructions

Enclosure

Re-using Enclosure

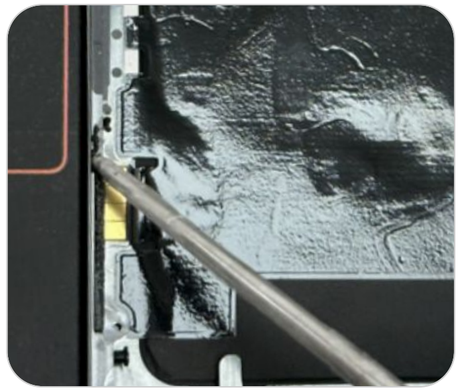
- Inspect the **Enclosure** for adhesive residue.
- It is recommended to carefully and slowly peel off the adhesive in one piece by hand. Use an **ESD Spudger** or **Deglue Machine** to clean the residual adhesive off the **Enclosure**.
- Use a **Dust Free Cloth** with **IPA** to clean the surface where needed.

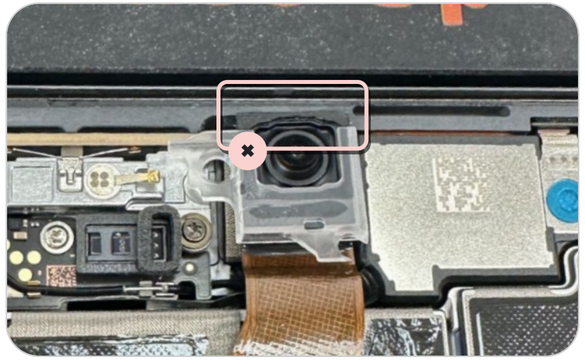
Note

Place the device on a heat plate at 122°F/50 °C for 2 mins for easier removal.

Use Caution

Don't remove the FCAM sponge as helps keep out dust.





Re-using Enclosure-continued

- Remove any residue in the **Battery** area with an **ESD Spudger** or **Deglue Machine**.
- Apply **IPA** with a **Dust Free Cloth** afterward.

Note

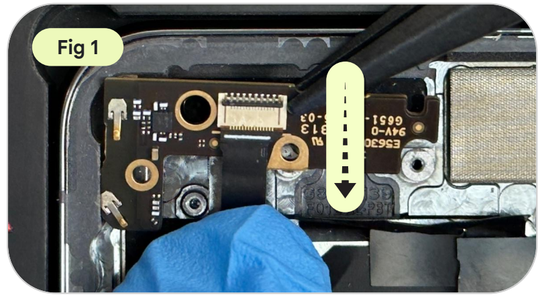
Place the device on a heat plate at 122°F/50 °C for 2 mins for easier removal.

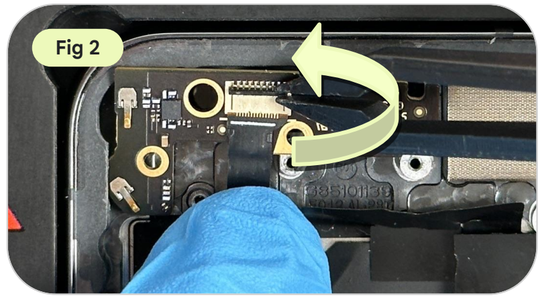
Attach ANT 1

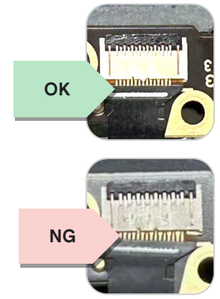
- Connect the **ANT 1 Board** with **ESD Tweezers** (Fig 1).
- Use the **ESD Tweezers** to gently close the ZIF locking flap (Fig 2).
- Use **ESD Tweezers** to paste the **Kapton** tape over the connector (Fig 3).

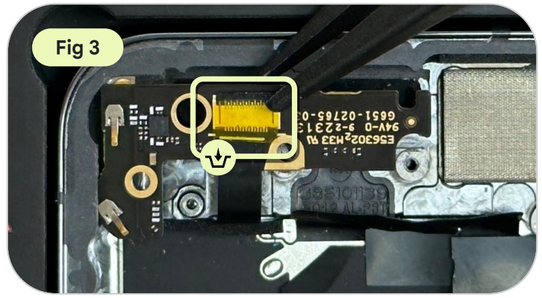
Part: G949-00706-01 (ANT 1 Board)

Part: G806-07724-01 (ANT 1 Kapton)









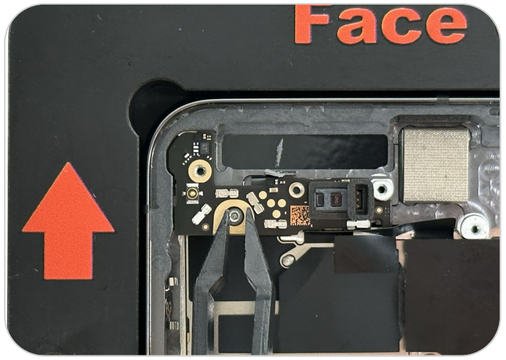
Use Caution

Don't press the ANT board. Be gentle when lifting it up.

Secure ANT 1

- Press the **ANT 1 Board** down near the screw hole area with **ESD Tweezers** toward the **Enclosure**.
- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder**.
- Tighten the **Screw** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**, then remove the **Pixel 8 Pro-Screw Cover**.

Part: G250-06670-00 (Screw)



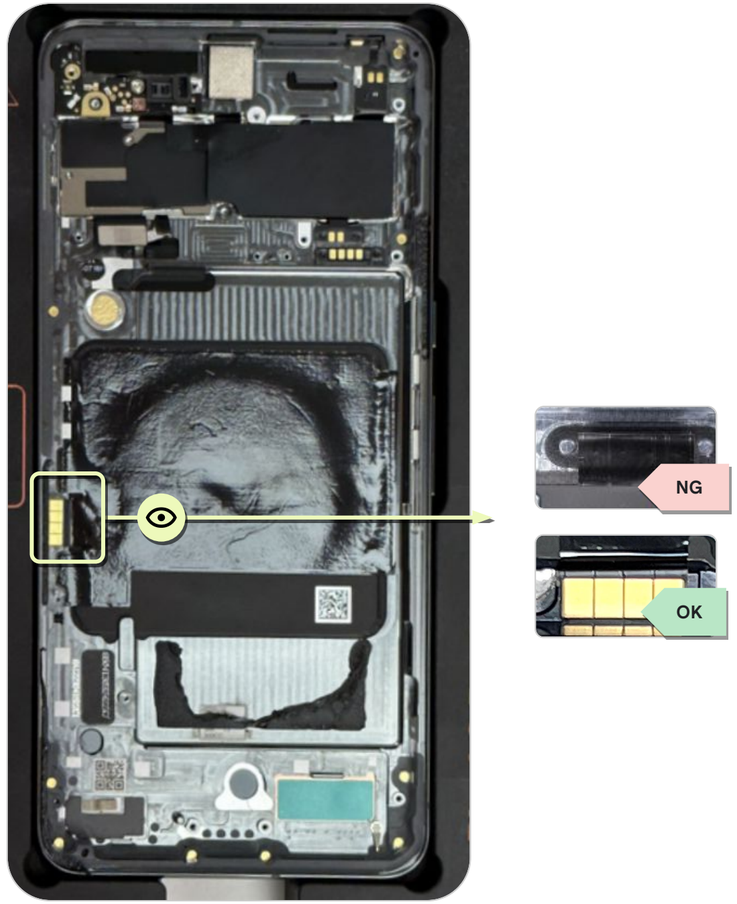
Note

Torque force: 1.2 ± 0.03 kgf-cm

Make sure the ANT 1 Board sits below the Enclosure rim.

Check Pad

- Inspect the **Wireless Charger & NFC Pad**. Make sure it is not covered or obstructed by the **Graphite Sheet** or other components,
- Inspect the flex tail. Make sure it aligns with the **Enclosure** edge.



Assembly instructions

Mic 1 Bracket

Lubricate area

Apply **Sankol lubricant CFD 409Z_V2** with a **Dust-free cotton swab** around the mic grill and **Bottom Speaker**.

Note

Angle or bend the Dust-free cotton swab to go inside the holes for thorough application.

Remove release liner

Remove the designated **Mic 1 Bracket** release liner with **ESD Tweezers**.

Part: G730-07405-02 (Mic 1 Bracket)

Insert new Mic 1 Bracket

- Insert the new **Mic 1 Bracket**. Ensure it is snapped past the **Enclosure** rim.
- Press for **3 seconds** with an **Universal Disassembly ESD stick**.
- Use **ESD Tweezers** to remove the second release liner from the **Mic 1 Bracket**.

Use Caution

Avoid touching the Mic 1 membrane during assembly.

Assembly instructions

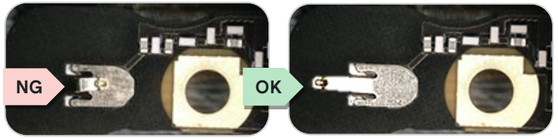
Logic Board

Check Logic Board

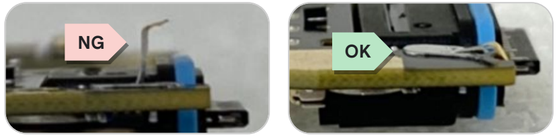
General Rules

Top view

Top view



Side view

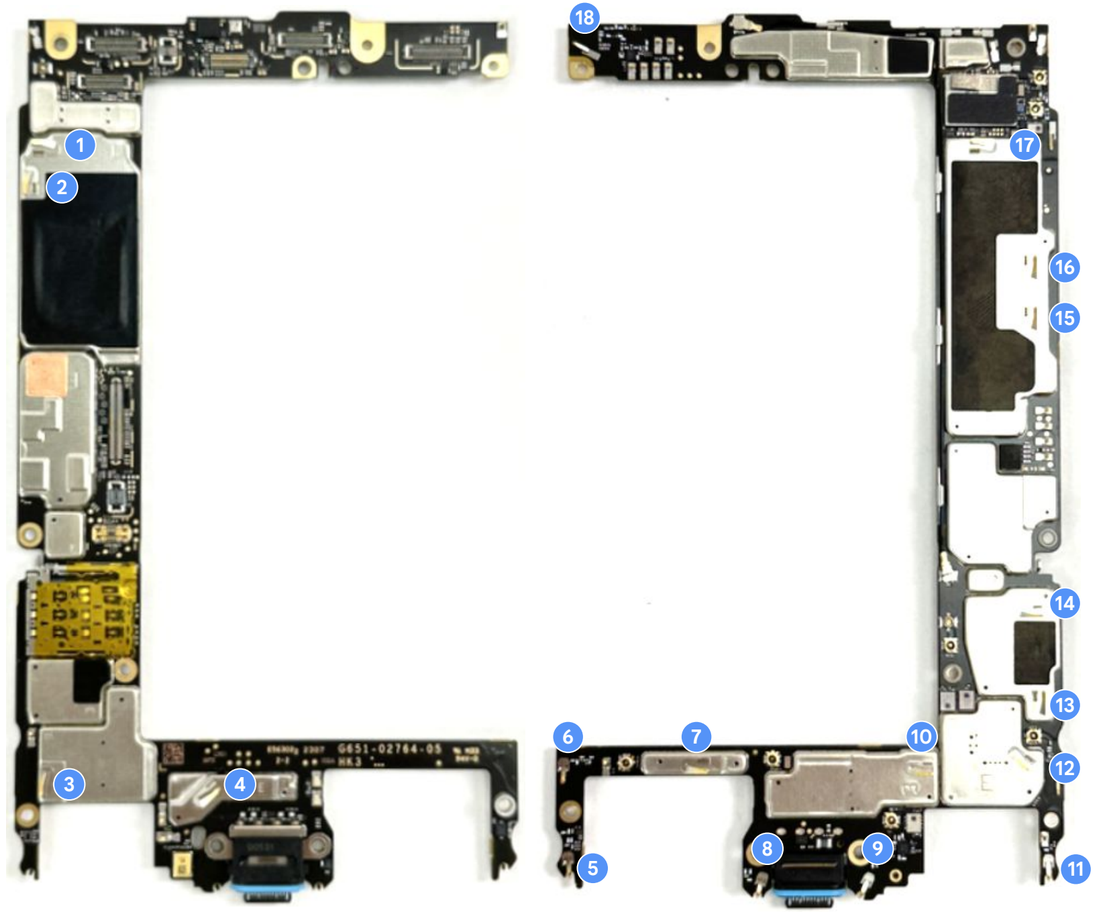


Use Caution

Before assembling the MLB, check for spring deformation.

Pay **EXTRA ATTENTION** to the springs during assembly to avoid damaging them.

Damaged springs may cause incomplete grounding. The part may need to be replaced to work as intended.



Re-using Logic Board

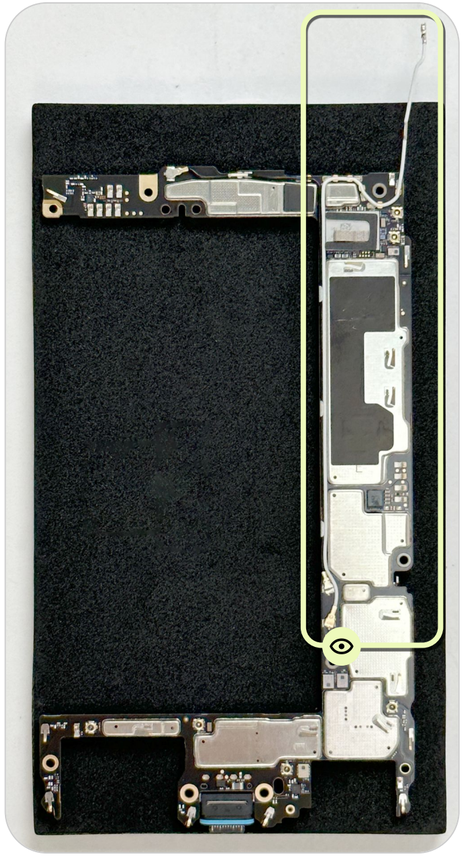
- Clean any thermal pad residue from the **Logic Board** with an **ESD Spudger**.
- If there is any residue, use a **Dust-free cloth** with **IPA** to gently clean the surface.

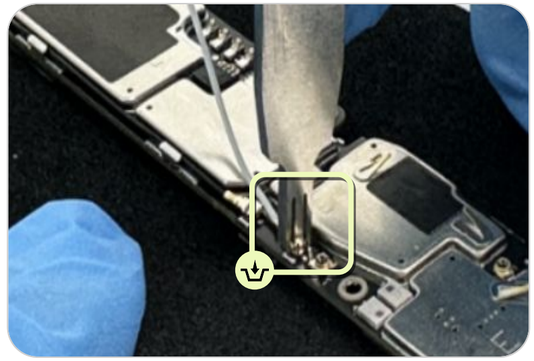
Part: Multiple Part Numbers (Logic board)

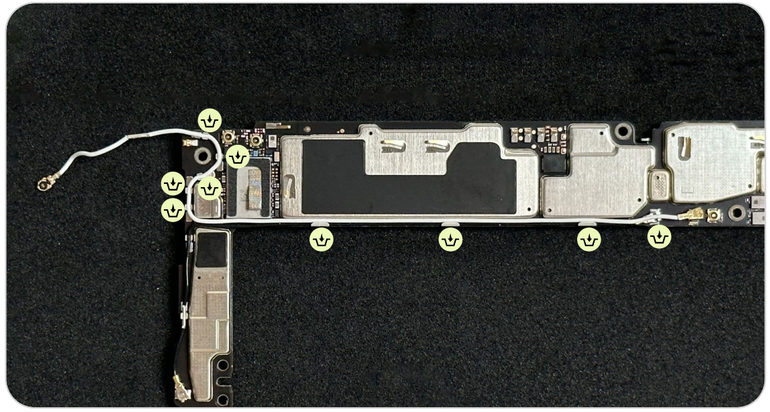
Attach Cable

- Attach the **Coaxial Cable #1 Connector** to **Logic Board** with the **Universal Coaxial Cable Tool**.
- Press the **Coaxial Cable #1** into the channel of Logic Board with **ESD Tweezers**.

Part: G821-00883-01 (Coaxial Cable #1)







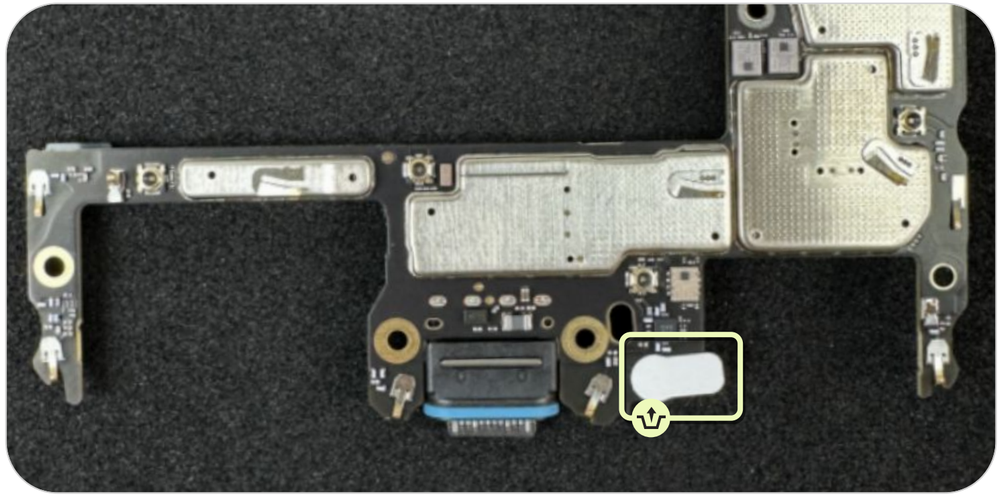
Note

Use this tip to connect the connector.

This step should be carried out on an EVA sponge.

Remove Protective Liner

If there is a Mic protective liner attached to the **Logic Board**, remove it using **ESD Tweezers**.

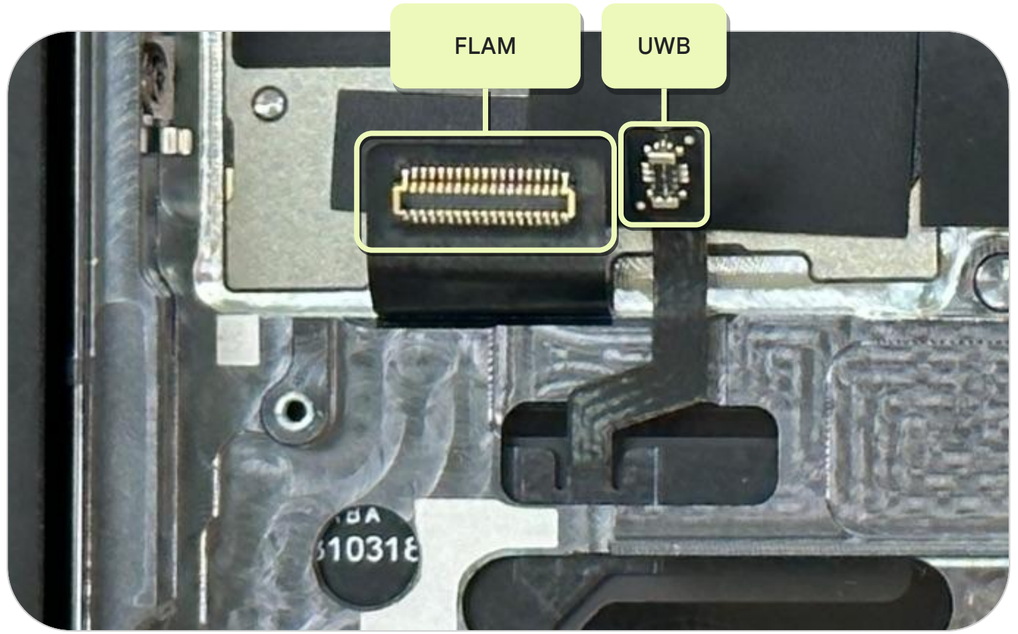


Note

Don't reuse the part.

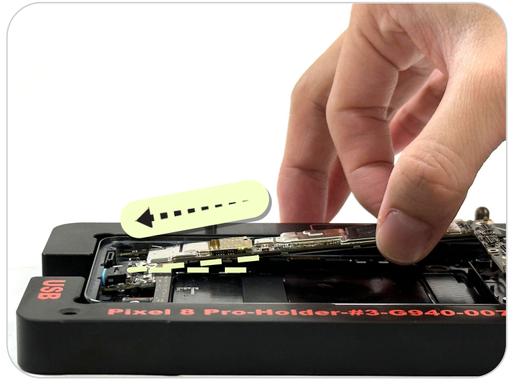
Lift Connectors

Lift the **UWB** and **FLAM Connectors** on the **Enclosure** with an **ESD Spudger** to avoid trapping them under the **Logic Board**.



Assemble Logic Board

- First, push the **Logic Board** downward toward the USB port of the **Enclosure**.
- Then, push the **Logic Board** straight down flush against the retaining wall.



Use Caution

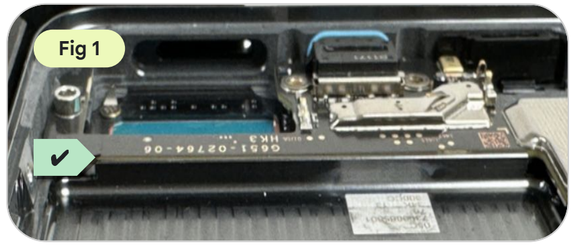
Be careful to avoid damaging components on the Logic Board.

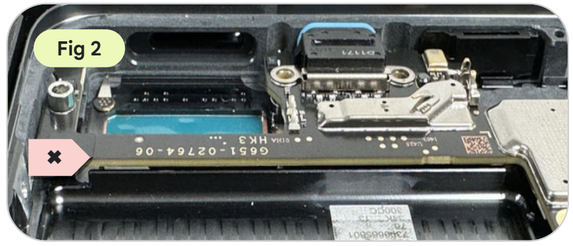
Note

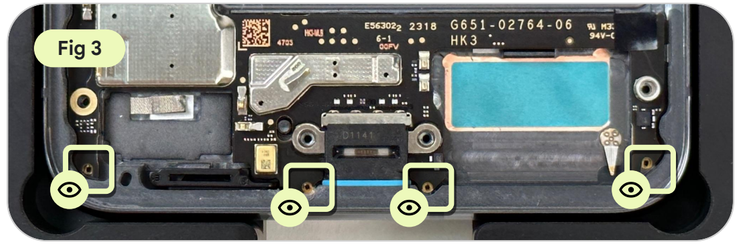
Don't wear gloves when handling the Logic Board.

Check seating

- After pressing the **Logic Board** down, it should sit against the retaining wall (Fig 1 & Fig 2).
- Ensure the **4 ANT Contacts** are visible through slots on the **Logic Board** (Fig 3).



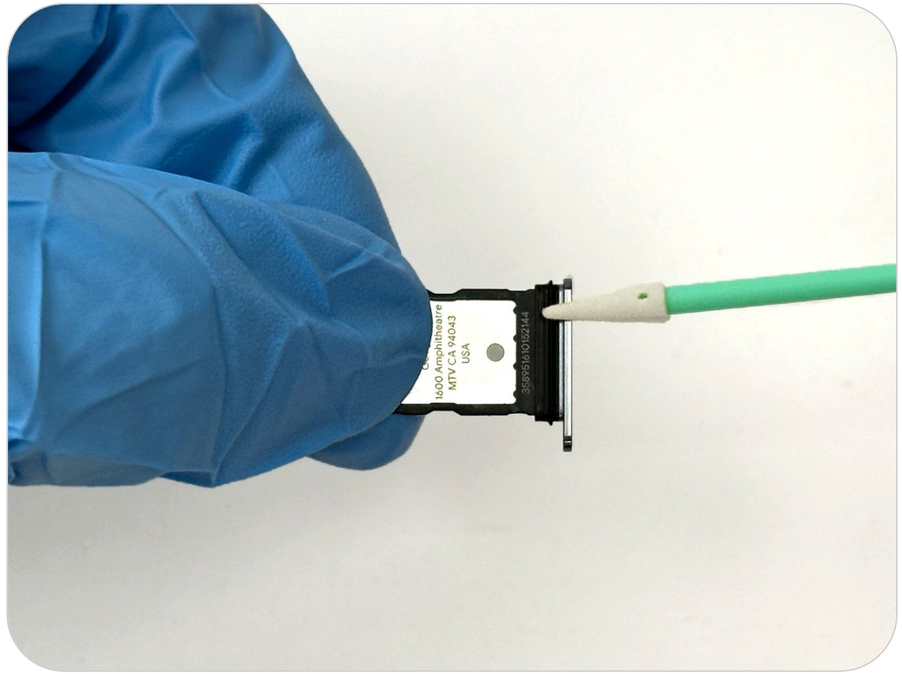




Prepare SIM Tray

Apply **Sankol lubricant CFD 409Z_V2** to the rubber on the **SIM Tray** with a dust-free cotton swab.

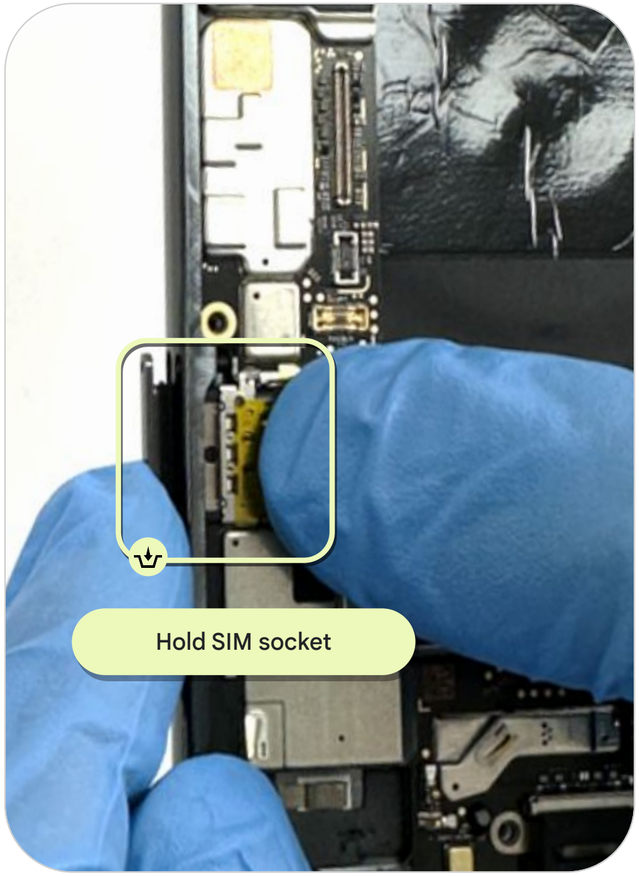
Part: Multiple Part Numbers (SIM Tray)



Insert SIM Tray

Lightly hold the **Logic Board** and insert the SIM Tray with your hand.

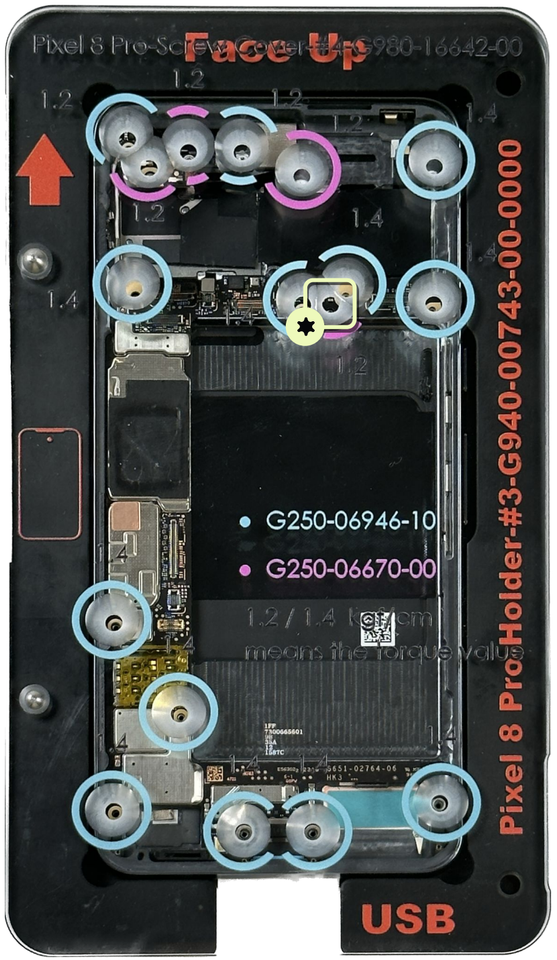
Part: Multiple Part Numbers (SIM Tray)



Tighten Screw

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder**.
- Tighten the **Screw** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**, then remove the **Pixel 8 Pro-Screw Cover**.

Part: G250-06670-00 (Screw)

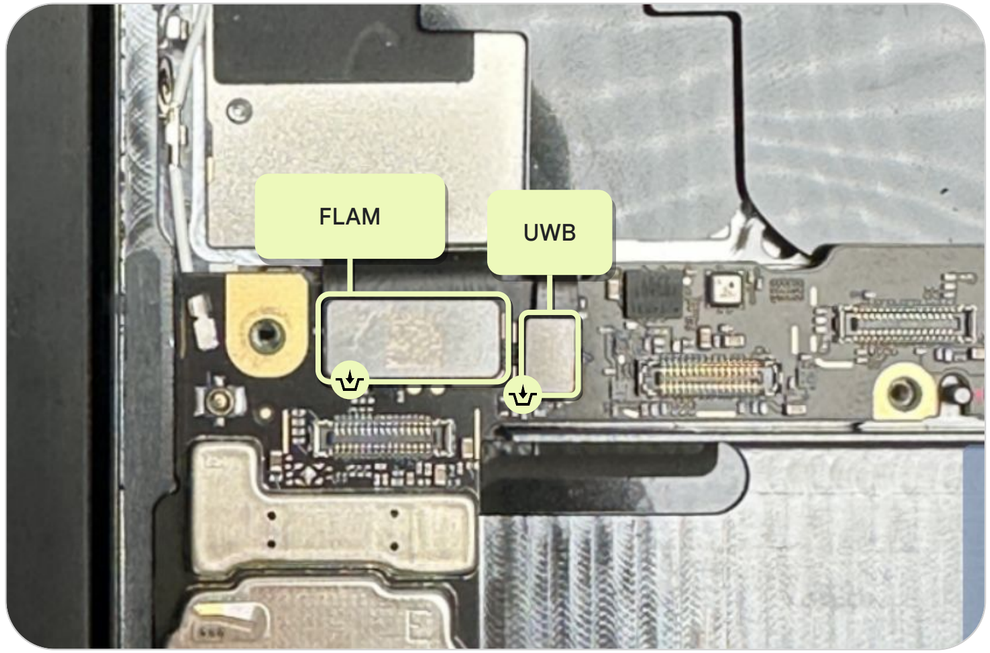


Note

Torque force: 1.2 ± 0.03 kgf-cm

Connect Logic Board

Attach the **FLAM** and **UWB Connectors** on the **Enclosure** to the **Logic Board**.

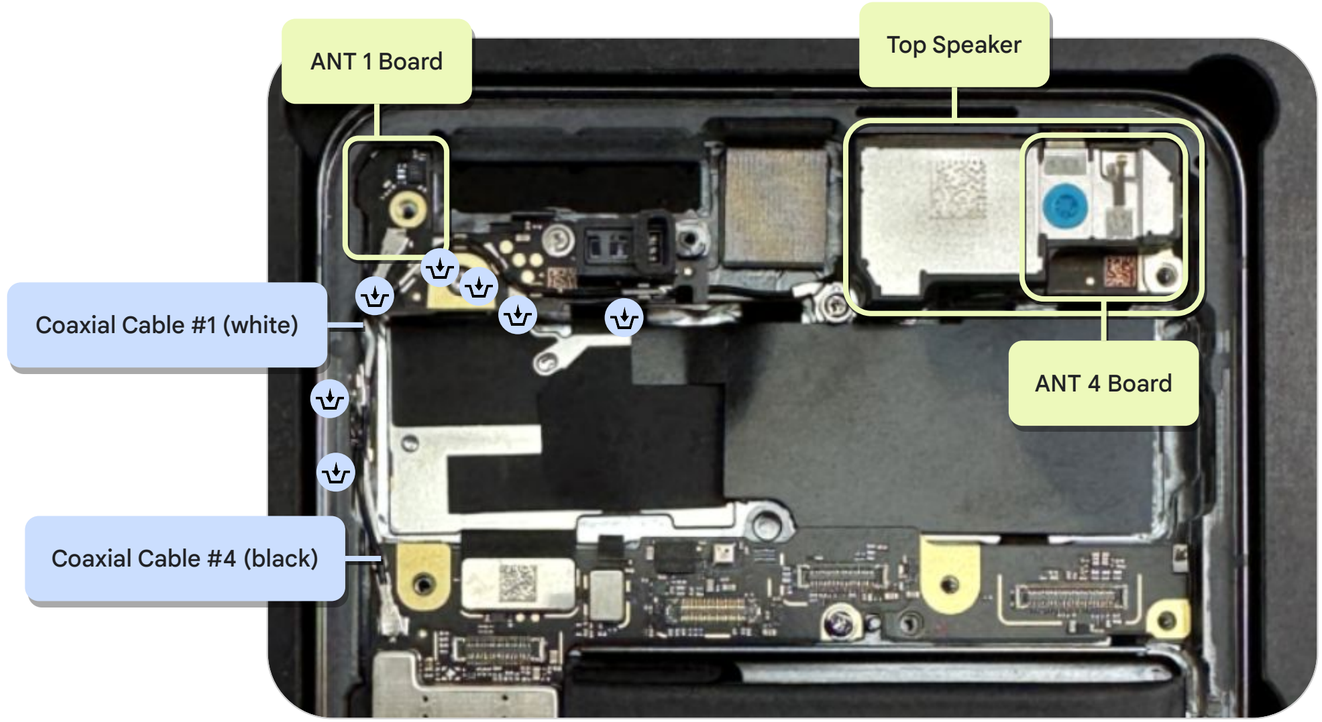


Note

Check every connector is fully attached to the Logic Board.

Locate Cables

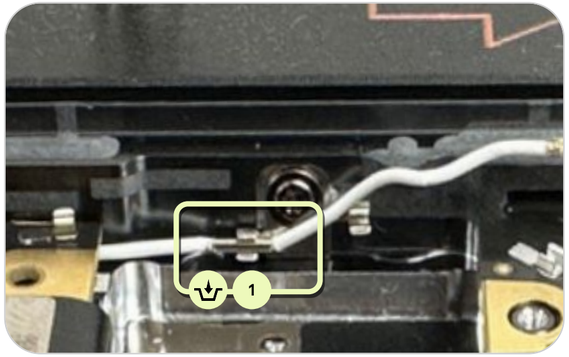
There are **Two Coaxial Cables** routed around **ANT 1 Board, Top Speaker** & **Logic Board**.

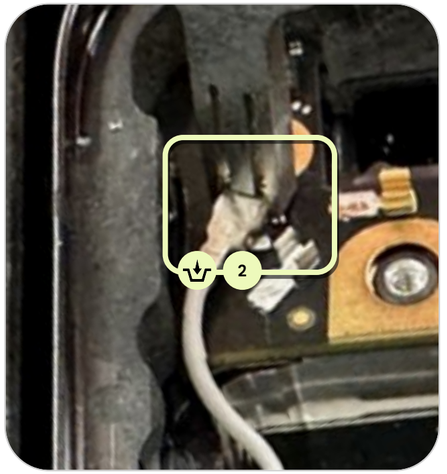


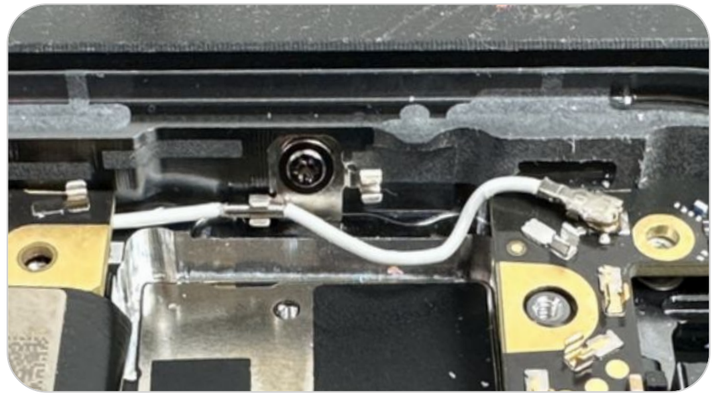
Attach Cable

- Attach the **Coaxial Cable #1 Connector** to **Logic Board** with the **Universal Coaxial Cable Tool**.
- Press the **Coaxial Cable #1** into the channel on **ANT 1 Board** with **ESD Tweezers**.

Part: G821-00883-01 (Coaxial Cable #1)







Note

Use this tip to connect the connector.

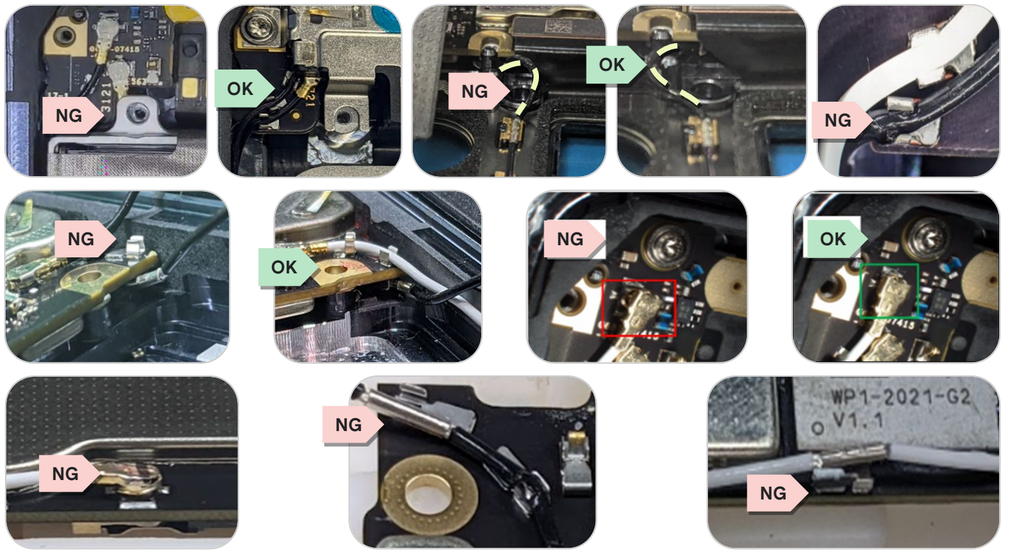
Check Coaxial Cables

Use Caution

Check all coaxial cables to ensure they are not damaged or routed incorrectly. Both conditions could lead to the product not working properly.

General Rules

Cosmetic Check

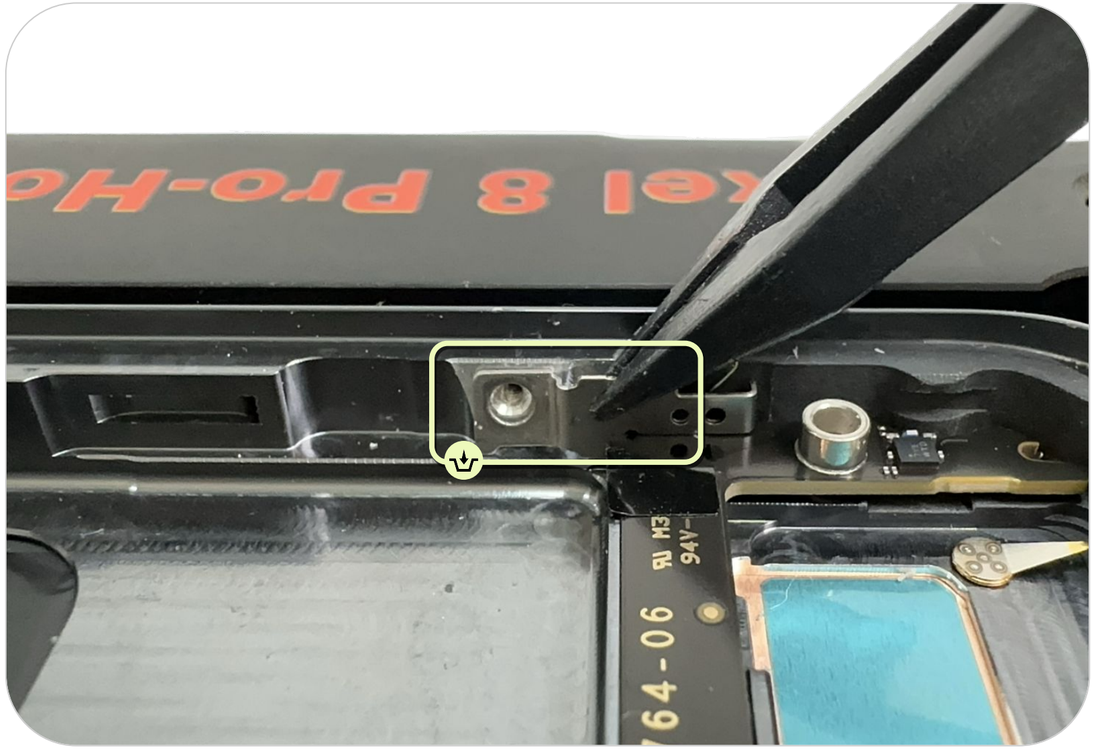


Connector Check

Attach ANT 7

- Attach the **ANT 7 Grounding** to the **Enclosure**.
- Inspect the spring status (ANT 7 Spring Location).

Part: G853-01317-01 (ANT 7 Grounding)



Secure ANT 7 Screw

Tighten the **Screw** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**.

Part: G250-05802-00 (Screw)

Note

Torque force: 1.2 ± 0.03 kgf-cm

Assembly instructions

Top Speaker

Apply AP111

- Use an **ESD Spudger** to clean residual adhesive off the **Top Speaker** and **ANT 4 Board**. Use a **Dust-free Cloth** with **IPA** to clean the surface as needed.
- Apply **3M 111 Primer** on the 2 indicated areas with a **Dust-free cotton swab**. Use an **Ionizing air fan** to blow over.

Part: G949-00705-01 (ANT 4 Board)

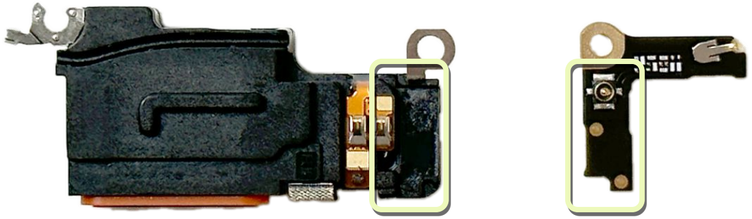
Part: G863-00461-03 (Top Speaker)

Note

This step is needed only when there is either Top Speaker or ANT 4 damage.

Use Caution

Avoid damaging the spring during this process.



Attach ANT 4 to Top Speaker

- Attach the **Top Spk Adhesive** to the **Top Speaker** along the outline (Fig 1), and remove the release liner.
- Attach the **ANT 4 Board** to the **Top Speaker** following the outline (Fig 2).
- Confirm the finished assembly (Fig 3).

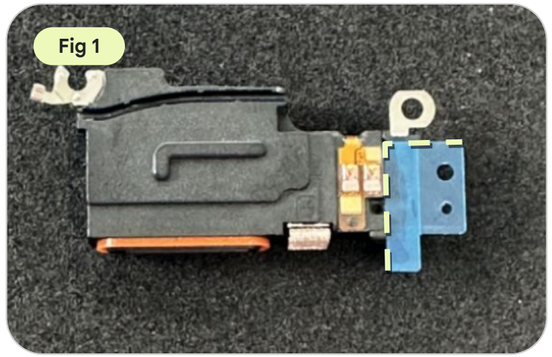
Part: G806-11708-00 (Top Spk Adhesive)

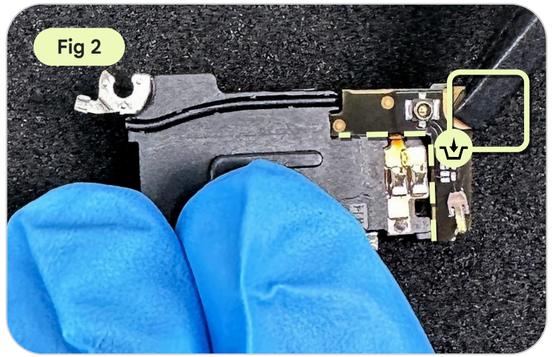
Part: G949-00705-01 (ANT 4 Board)

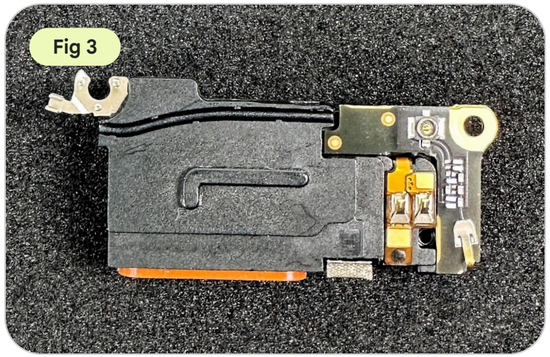
Part: G863-00461-03 (Top Speaker)

Note

This step should be carried out on EVA sponge.



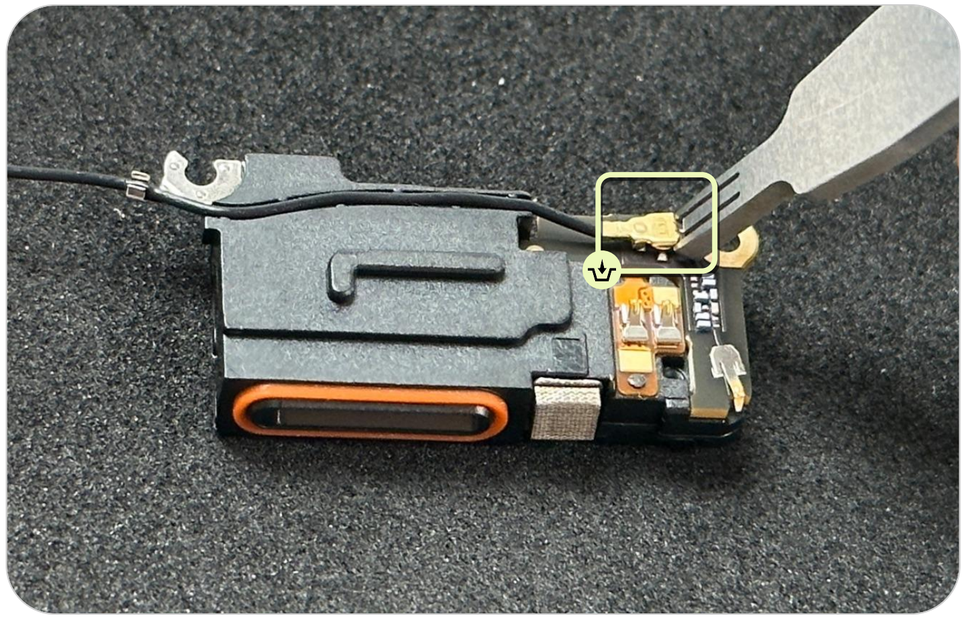




Attach Cable

Attach the **Coaxial Cable #4 Connector** to the **ANT 4 Board** with the **Universal Coaxial Cable Tool**.

Part: G821-00881-01 (Coaxial Cable #4)



Note

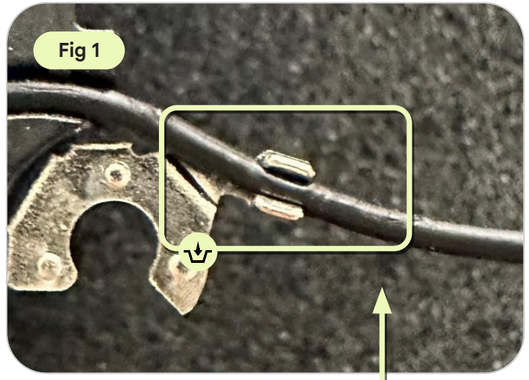
Use this tip to connect the connector.

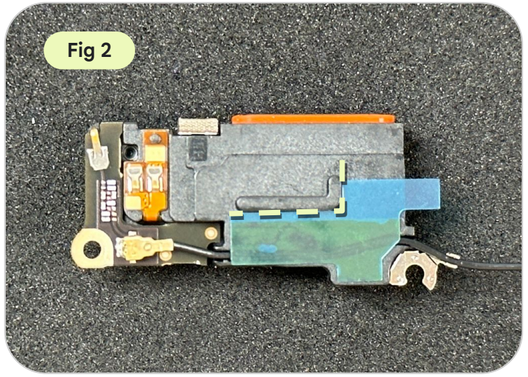
This step should be carried out on EVA sponge.

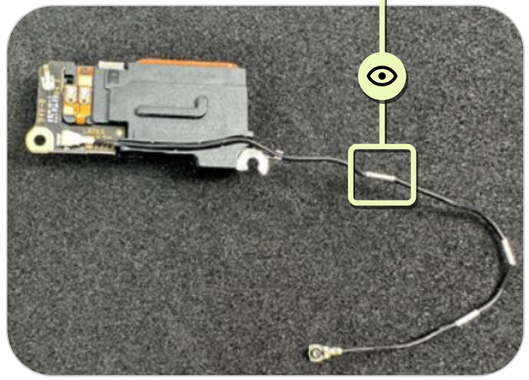
Align Kapton

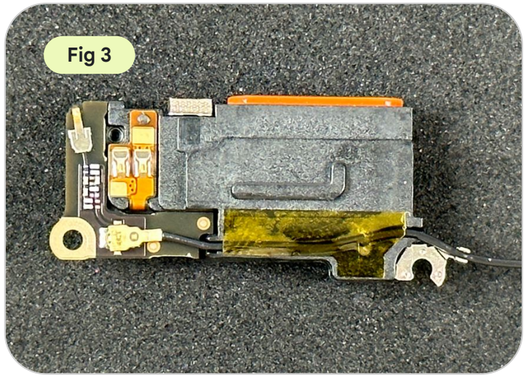
- Press **Coaxial Cable #4** into the channel on **ANT 4 Board** (Fig 1).
- Align the **Kapton** with the outline (Fig 2).
- Remove the release liner (Fig 3).

Part: G806-07911-01 (Kapton)









Note

Don't touch the Top Speaker spring during the process.

This step should be carried out on EVA sponge.

Insert Top Speaker

- Insert the **Top Speaker** into the slot on the **Enclosure** at an angle of approximately 15°, making sure it fits properly (Fig 1).
- Hand press it into place (Fig 2).

Part: G863-00461-03 (Top Speaker)

Fig 1

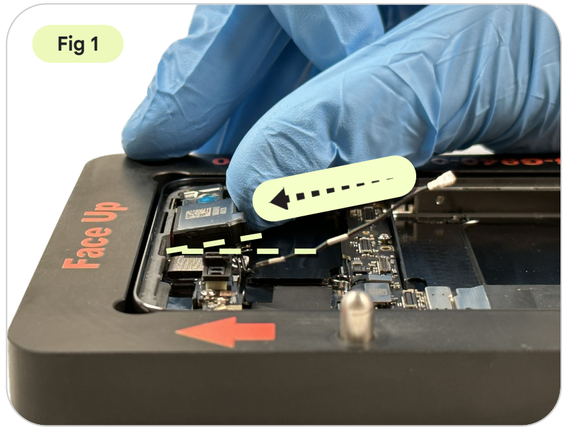
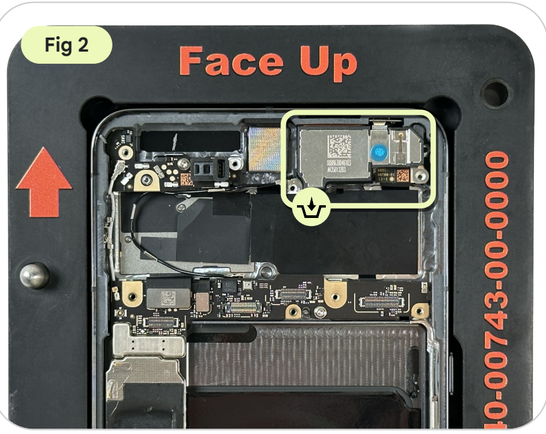


Fig 2

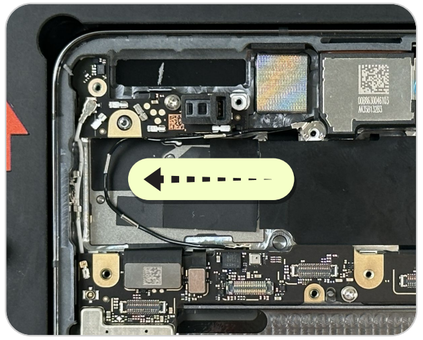


Note

Make sure the speaker sits under the enclosure rim.

Tighten screw

- Before placing the **Pixel 8 Pro-Screw Cover**, place the **Coaxial Cable #4** inside the empty area of the **Enclosure** (to avoid damage from the **Screw Cover** pressing on it).
- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder.**
- Tighten the **Top Speaker Screw** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3,** then remove the **Pixel 8 Pro-Screw Cover.**



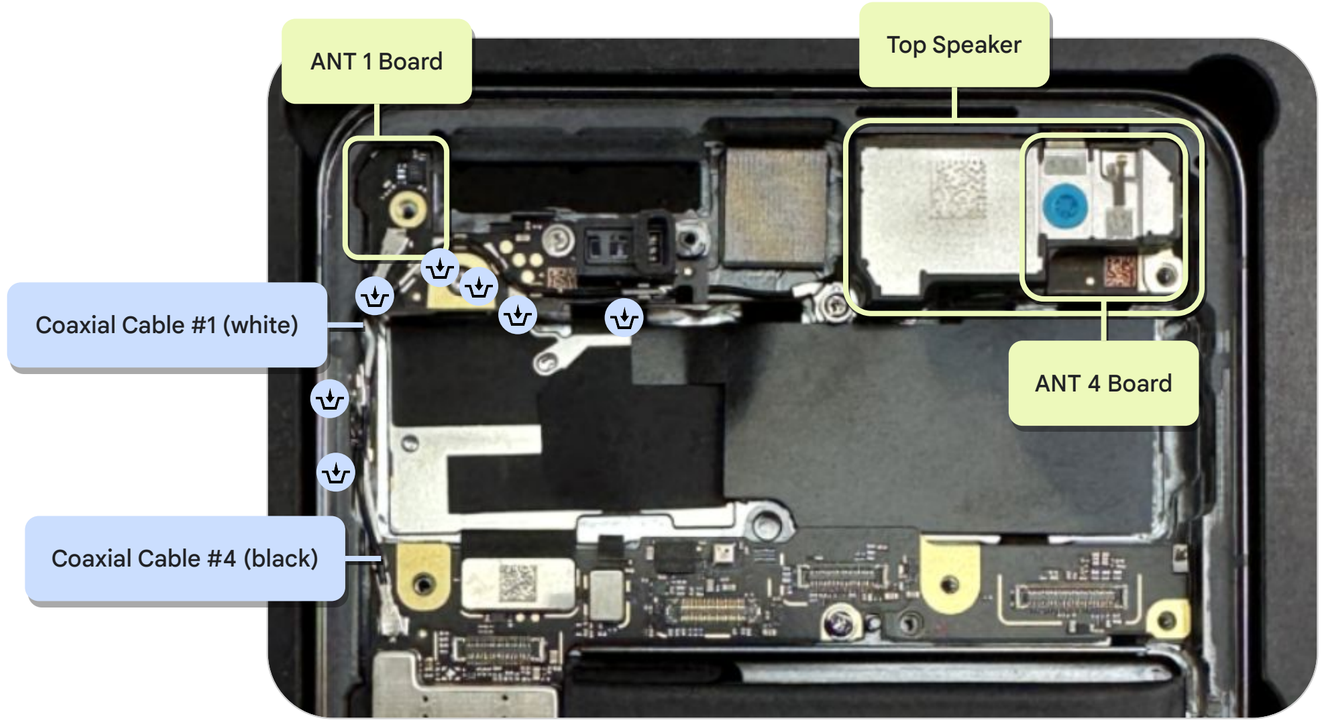
Part: G250-06670-00 (Screw)

Note

Torque force: 1.2 ± 0.03 kgf-cm

Locate Cables

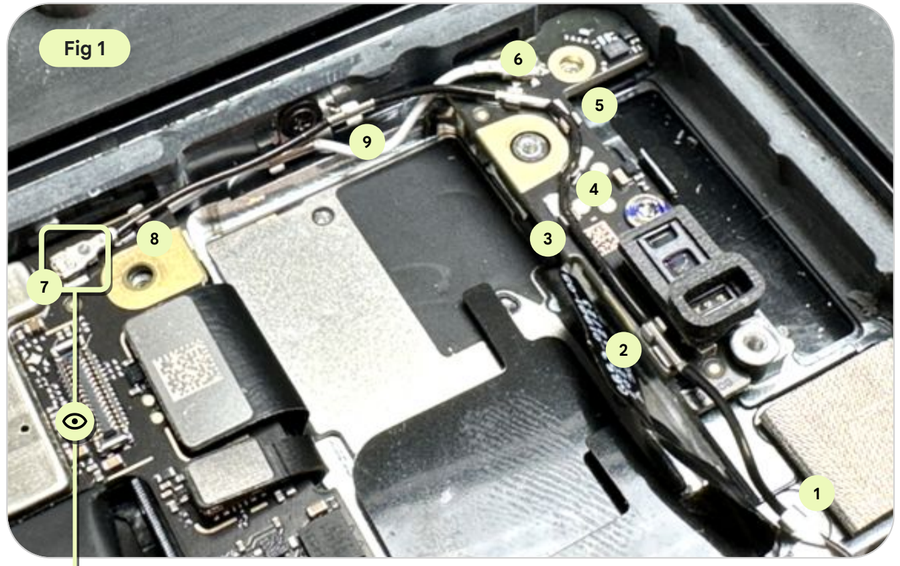
There are **Two Coaxial Cables** routed around **ANT 1 Board, Top Speaker** & **Logic Board**.

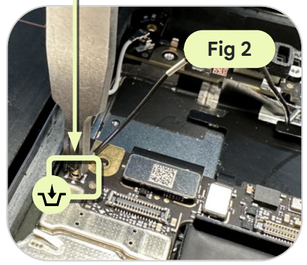


Affix Cable

- Press the **Coaxial Cable #4** inside the channel on **ANT 1 Board** and **Enclosure** in sequence 1-9 (Fig 1).
- At step 7, connect the **Coaxial Cable #4 Connector** to **MLB** with the **Universal Coaxial Cable Tool** (Fig 2).
- Make sure the **Connector** is pointing in the correct direction (Fig 3).

Part: G821-00881-01 (Coaxial Cable #4)



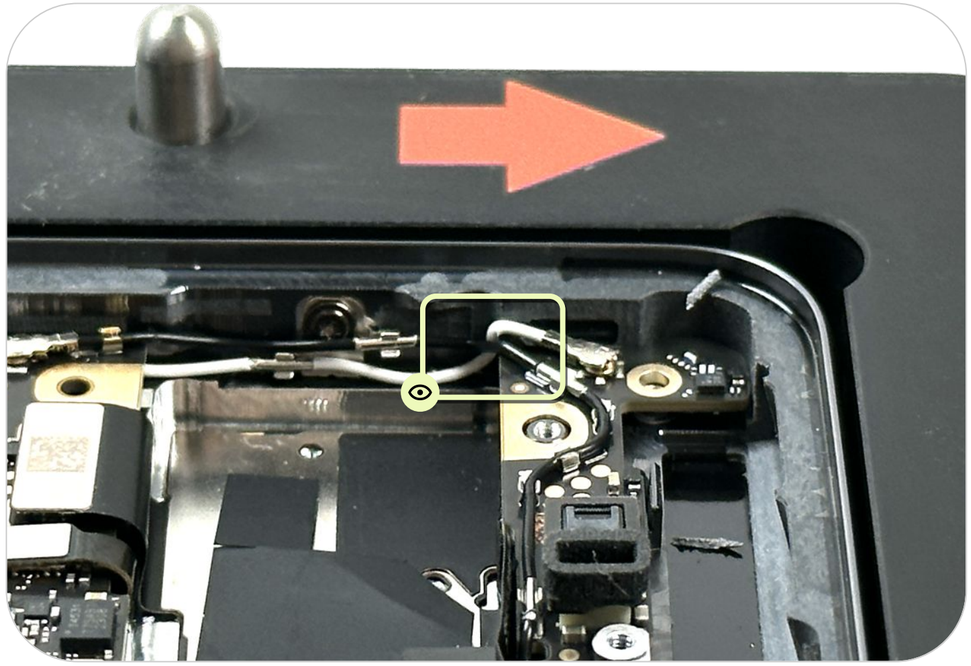


Note

Use this tip to attach the connector.

Affix Cable-continued

Make sure **Coaxial Cable #4** goes over **Coaxial Cable #1**.



Assembly instructions

Battery

Clean Enclosure

- Before installation, remove any debris/loose screws from the **Enclosure**.
- Apply **IPA** on the **Enclosure** with a **Dust-free cotton swab**. Use an **Ionizing air fan** to blow over.
- Apply **3M 111 Primer** (per product instructions) on the **Enclosure** with a **Dust-free cotton swab**. Use an **Ionizing air fan** to blow over.

> ⚠ **Use Caution**
>
> Once Primer has been applied, complete assembly in 25 mins.

Align Battery

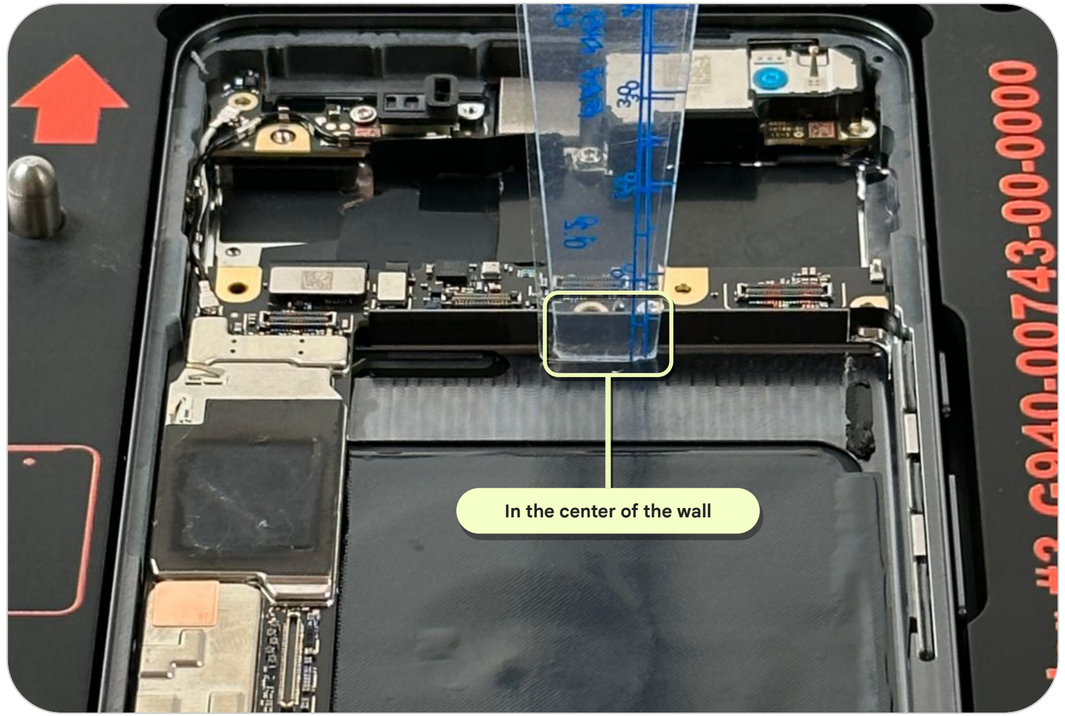
Place **1.2mm Feeler gauge** in the center, against the wall.

Use Caution

Don't skip this step.

Battery spacing is critical for product performance.

Use extra care to align correctly.



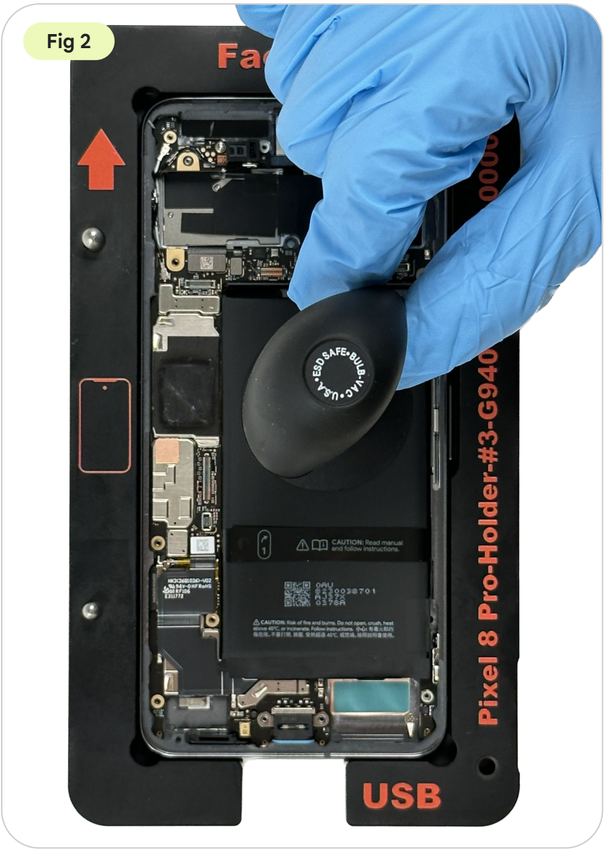
Align Battery-continued

- Use the **Universal adsorption bulb** to pick up the **Battery** and remove the release liner.
- Align the **Battery** with the dashed lines (Fig 1).
- Gently press the **Battery** down with the **Universal adsorption bulb** (Fig 2).
- Remove the **Universal adsorption bulb**.

Part: G949-00704-01 (Battery)

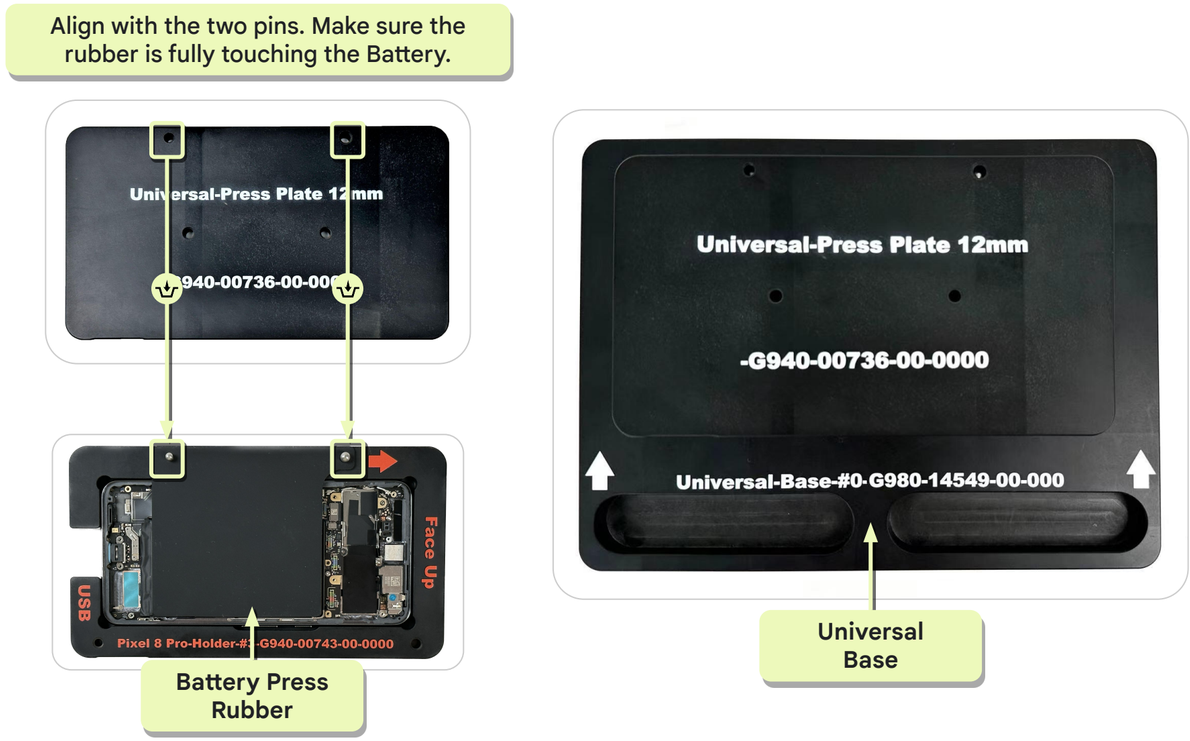
Fig 1

Fig 2



Prepare to press

- Using the alignment pins, place the **Pixel 8 Pro-Battery Press Rubber** on top of the device, followed by the **Universal Press Plate 12mm** to create a stack.
- Place the stack on the **Universal Base**.



Place in fixture

- Place the **Universal Base and stack** into the **Universal Press**.
- Press the handle down for **10 seconds**.
- Restore the handle to the original position and remove the device.

Use Caution

Pinch point.

Keep hands clear during operation.

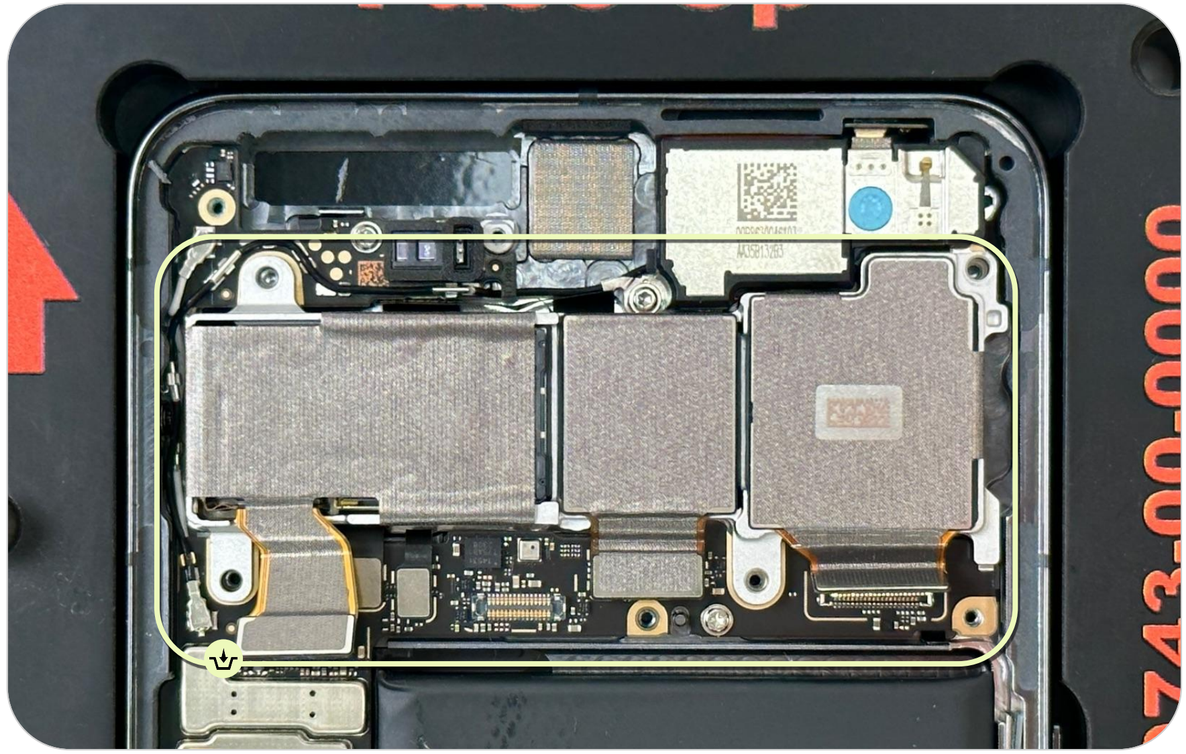
Assembly instructions

Rear Camera

Assemble Rear Camera

Place the **Rear Camera** in position, keeping it aligned with the lenses in the **Enclosure**.

Part: G949-00702-01 (Rear Camera)



Use Caution

Ensure the environment is clean for this process.

Tighten screws

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder.**
- Tighten the **2 Rear Camera Screws** with the **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3,** and then remove the **Pixel 8 Pro-Screw Cover.**

Part: G250-06946-10 (Screw)

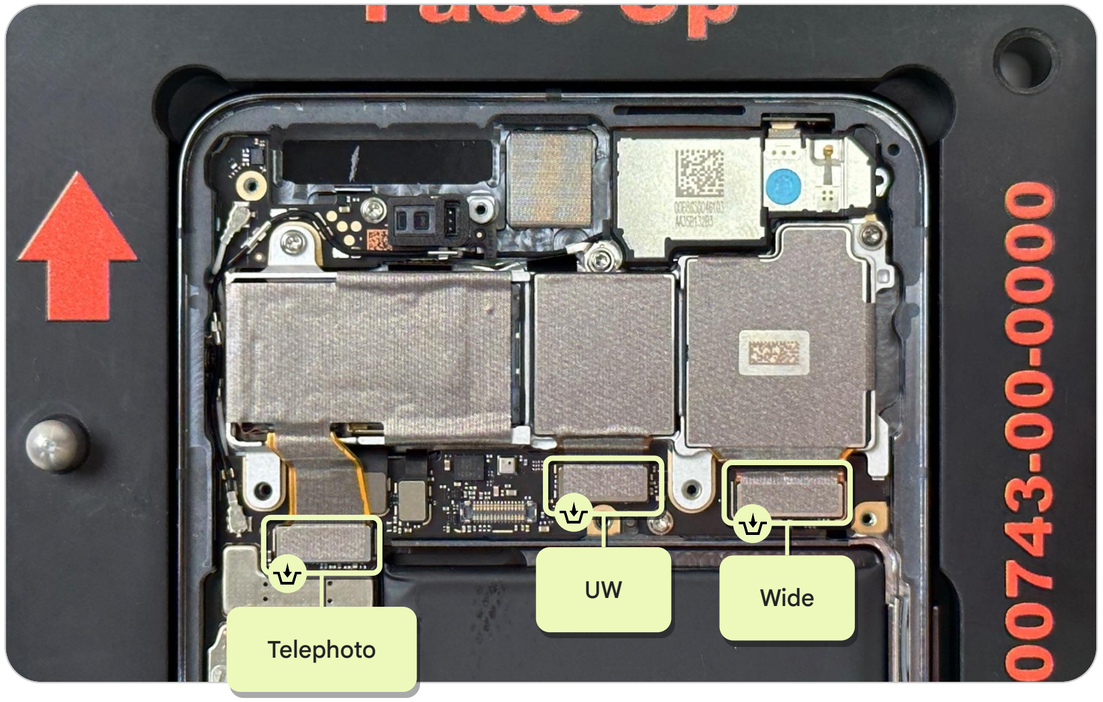
Part: G250-06670-00 (Screw)

A: G250-06670-00
Torque force: 1.2 ± 0.03 kgf-cm

B: G250-06946-10
Torque force: 1.4 ± 0.03 kgf-cm

Connect Rear Camera

Apply even pressure to attach the **3 RCAM Connectors** to the **Logic Board**.



Note

Check every connector is fully attached to the Logic Board.

Assembly instructions

mmWave Module

Re-using mmWave Bracket

- Clean residue from the **mmWave Module** and **mmWave Heatsink** with the **ESD Spudger** (Fig 1 & Fig 2)
- Align the **Thermal Pad** with the **mmWave Bracket** outline (Fig 3).

Part: G864-00562-01 (mmWave Thermal Pad)

Part: G345-01353-06 (mmWave Module)

Part: G730-06637-03 (mmWave Bracket)

> **Note**
>
> This step is only needed for the mmWave Sku.

Fig 1

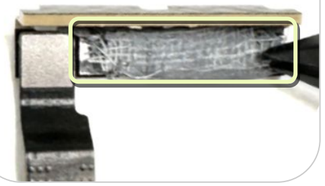


Fig 2

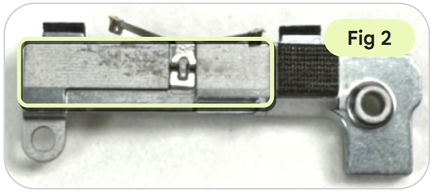
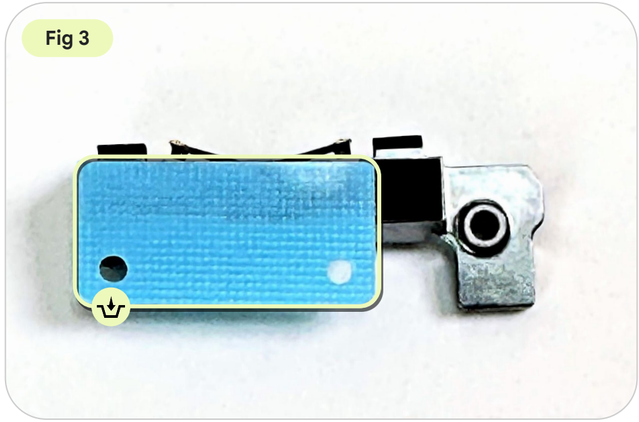


Fig 3



Re-using mmWave Flex

Remove all residue from the **3** locations on the **mmWave Flex**.

Part: G652-10240-02 (mmWave Flex)

Note

This step is only needed for the mmWave Sku.

Use Caution

Be careful not to damage or puncture the cable. It is fragile and may not work as intended, if damaged.

Re-using mmWave Flex

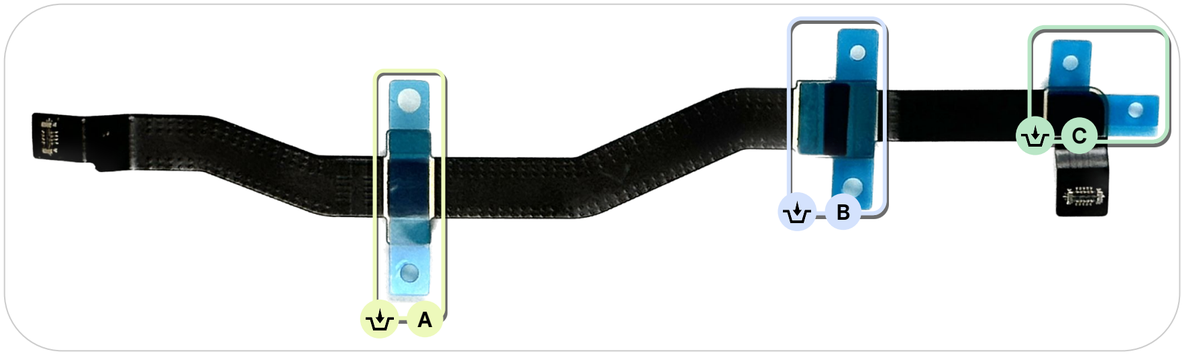
Attach the 3 **CPSA** to the designated locations.

Part: G652-10240-02 (mmWave Flex)

Part: G806-11705-00 (mmWave_flex_CPSA_1)

Part: G806-11706-00 (mmWave_flex_CPSA_2)

Part: G806-11707-00 (mmWave_flex_CPSA_3)



A: G806-11707-00

B: G806-11706-00

C: G806-11705-00

Note

This step is only needed for the mmWave Sku.

Assemble mmWave Flex

Attach the **mmWave Flex** to the **mmWave Module**.

Part: G652-10240-02 (mmWave Flex)

Part: G345-01353-06 (mmWave Module)

Note

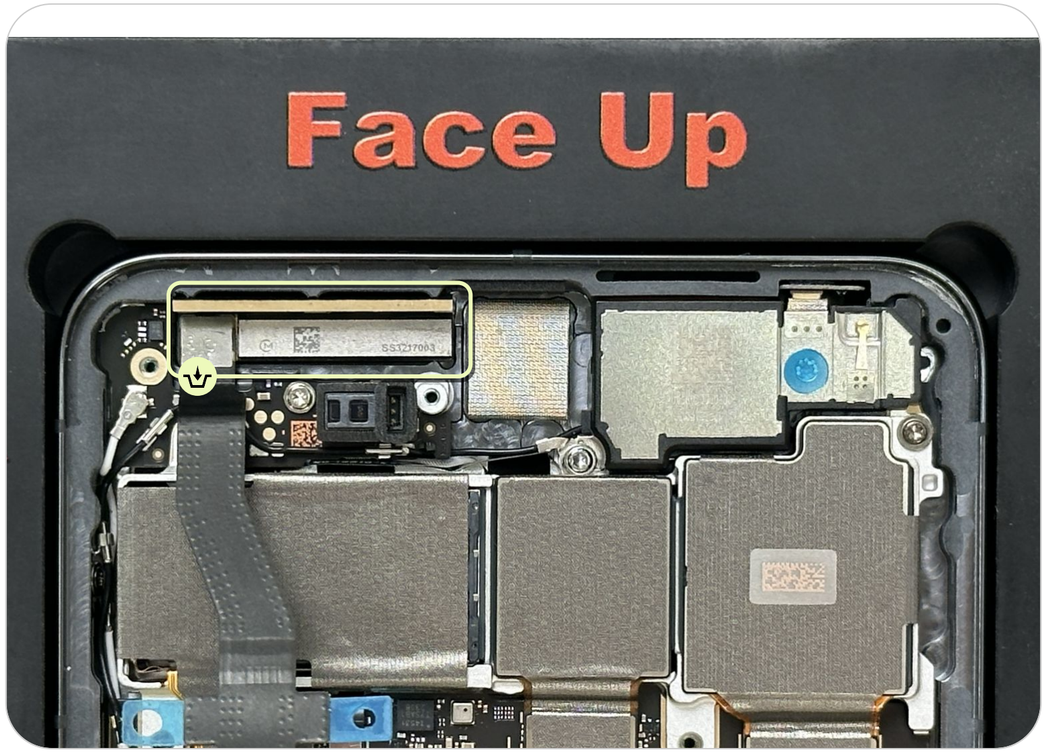
This step is only needed for the mmWave Sku.

Insert mmWave Module

Insert the **mmWave Module** and **mmWave Flex** into the **Enclosure**.

Part: G652-10240-02 (mmWave Flex)

Part: G345-01353-06 (mmWave Module)



Note

This step is only needed for the mmWave Sku.

Insert Bracket

- Tear off the blue release liner before affixing the **Bracket** (Fig 1).
- Insert the **Bracket** at an angle (Fig 2).

Part: G730-06637-03 (mmWave Bracket)

Part: G730-06636-03 (Sub6 Bracket)

Fig 1

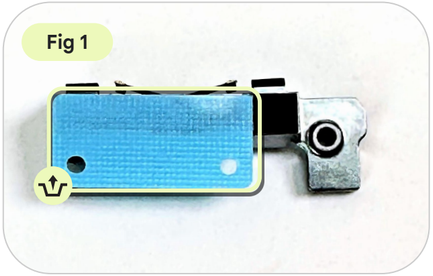
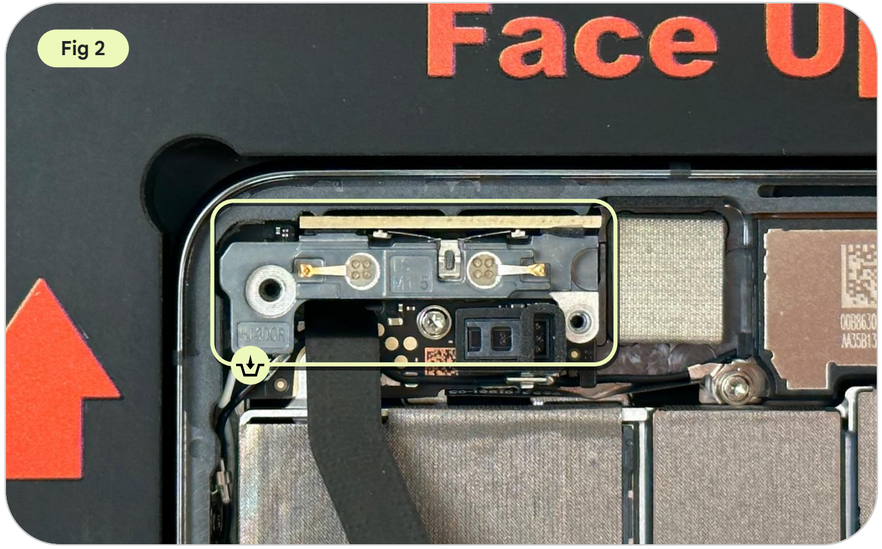


Fig 2



Note

The blue release liner needs to be torn off only for the mmWave Sku.

Secure Heatsink

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder**.
- Tighten the **2 mmWave Heatsink Screws** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**, then remove the **Pixel 8 Pro-Screw Cover**.

Part: G250-06946-10 *2 (Screw)

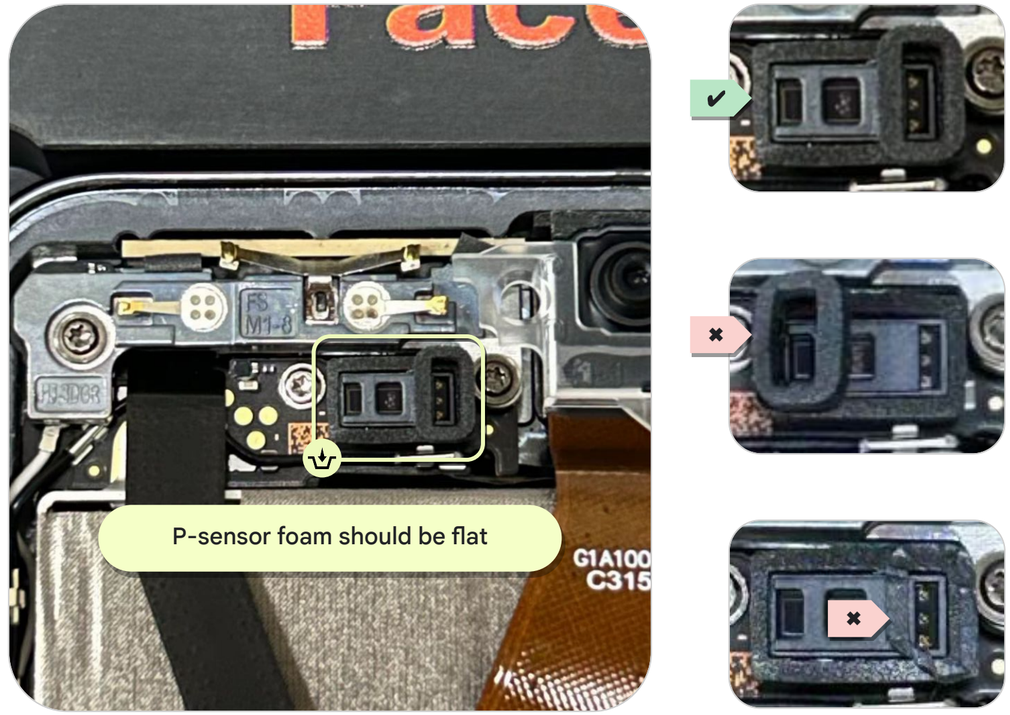
Note

Torque force: 1.2 ± 0.03 kgf-cm

Attach P-sensor Grommet

Attach the **P-sensor Grommet** to **ANT 1 Board** with **ESD Tweezer**s.

Part: G806-07778-01 (P-sensor Grommet)



Note

Check P-sensor Grommet to ensure it is flat.

Skip this step, if the P-sensor Grommet was not removed from the ANT 1 Board during disassembly.

Use Caution

Use a new groment when replacing the ANT 1 Board. **Don't reuse the old P-sensor grommet.**

Assembly instructions

Front Camera

Attach Front Camera

Connect the **FCAM connector** to the **Logic Board**.

Part: G949-00701-01 (Front Camera)

Note

Some material PSA peeling is normal.

Check the FCAM connector is fully attached to the Logic Board.

Use Caution

Make sure the Bracket does not touch the Spring, else the product may not function as intended (Fig 1 & Fig 2).

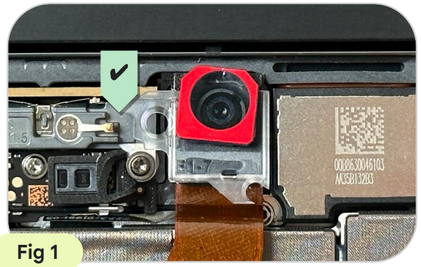


Fig 1

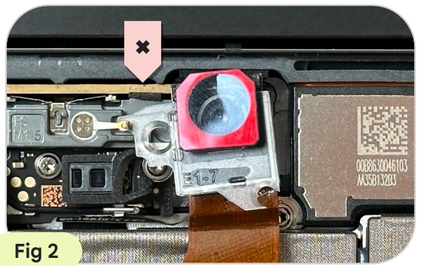


Fig 2

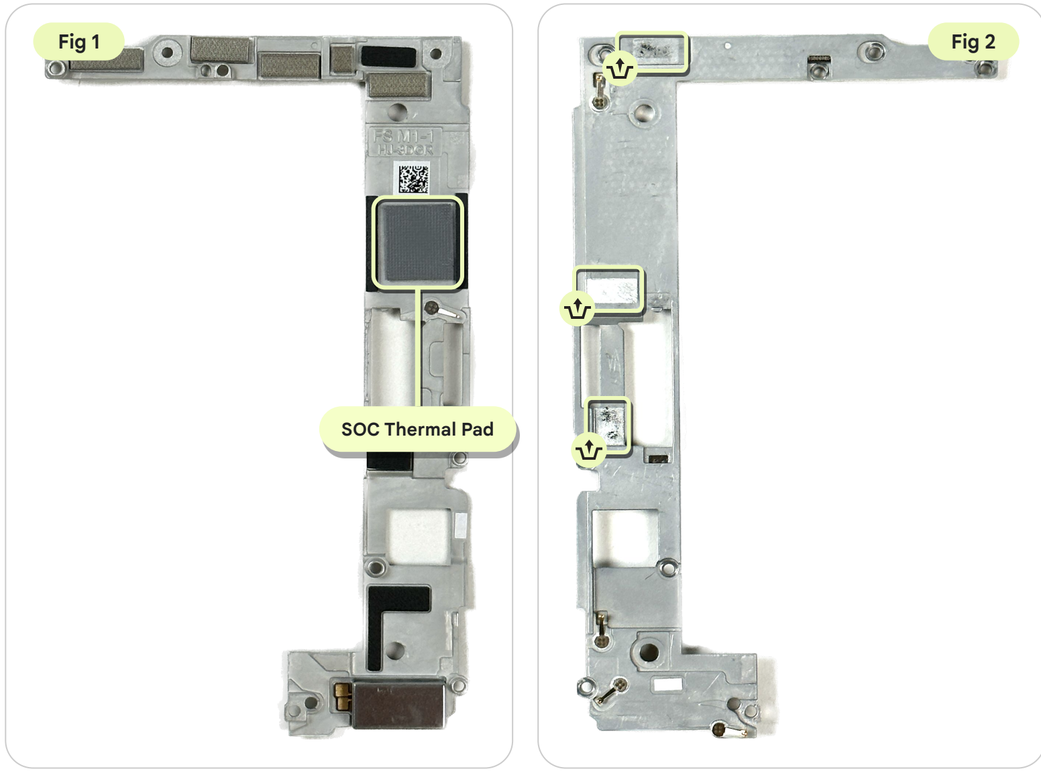
Assembly instructions

Mid-frame

Re-using Mid-frame

- Inspect to ensure the **Thermal Pad** is on the bottom side of the **Mid-frame** (Fig 1) and is undamaged.
- If it is missing or damaged, use an **ESD Spudger** with **IPA** to clean all residue from the **Mid-frame** (Fig 1 & Fig 2).

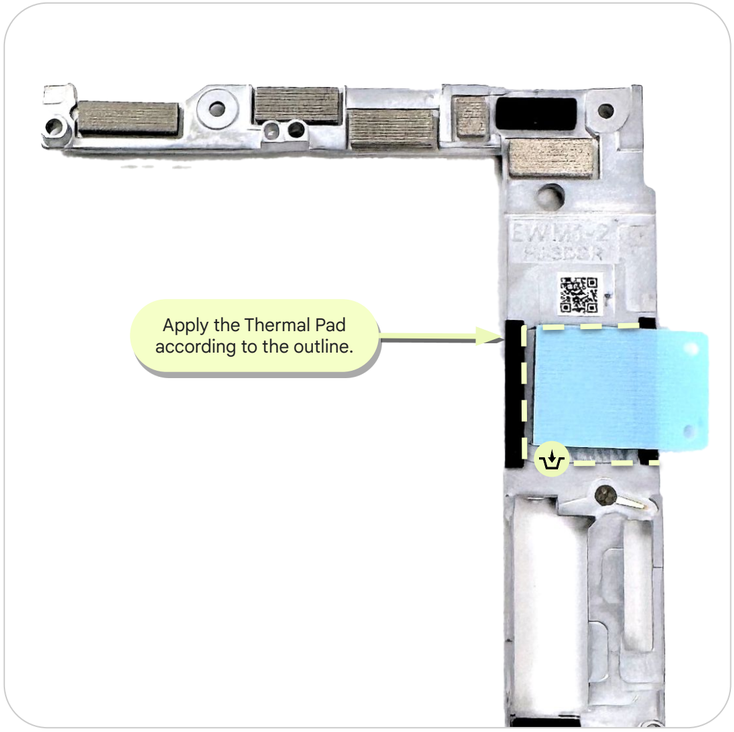
> **Note**
>
> An undamaged Thermal Pad can be reused.
>
> Otherwise, it will need to be replaced.



Apply New Thermal Pad

Align the new **Thermal Pad** with the outline on the **Mid-frame**. Remove the release liner after application.

Part: G864-00576-01 (SOC Thermal Pad)



Note

This step is only needed for a new or cleaned Mid-frame for re-use.

Use Caution

Don't forget to remove the release liner after installation.

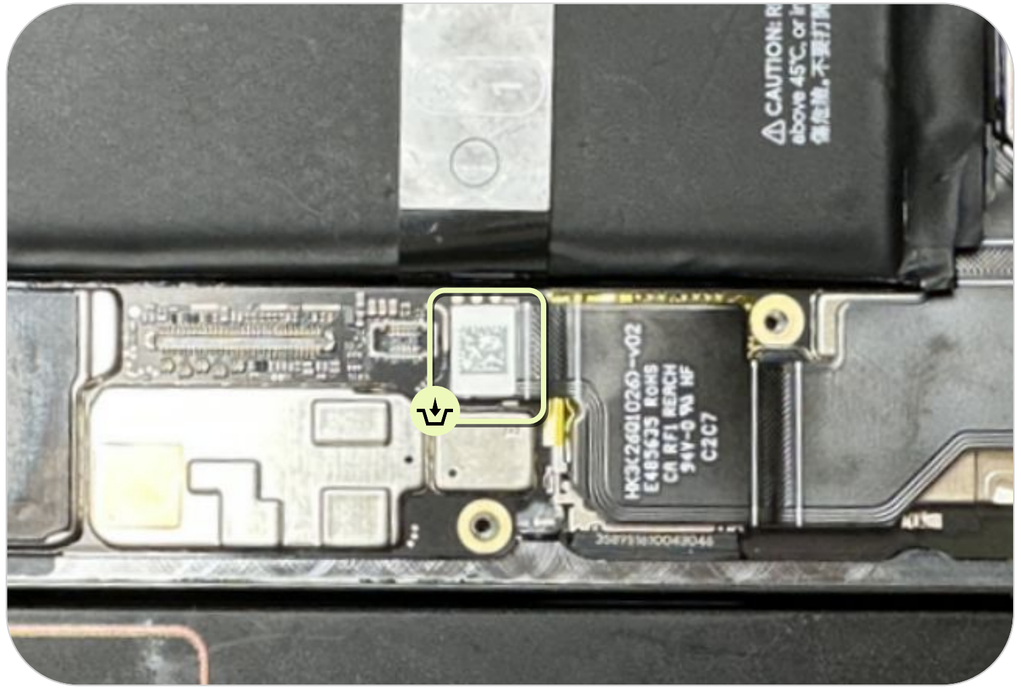
Connect Battery

Connect the **Battery Flex** to the **Logic Board**.

Note

Check every connector is fully attached to the Logic Board.

The mmWave Flex is only needed for the mmWave Sku.



Fit Mid-frame

- Gently lift the **mmWave Flex**.
- Assemble the **Mid-frame** according to the positioning posts on the **Logic Board**.

Part: G949-00703-01 (Mid-frame)

Fasten Mid-frame

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder**.
- Tighten the **7 Screws** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**, and remove the **Pixel 8 Pro-Screw Cover**.

Part: G250-06946-10 *7 (Screw)

Use Caution

Be careful when using the screwdriver. Don't accidentally damage the adjacent battery.

Incorrect use of the screw driver could cause injury to you or third persons or damage to the battery and/or the product.

Note

Torque force: 1.4 ± 0.03 kgf-cm

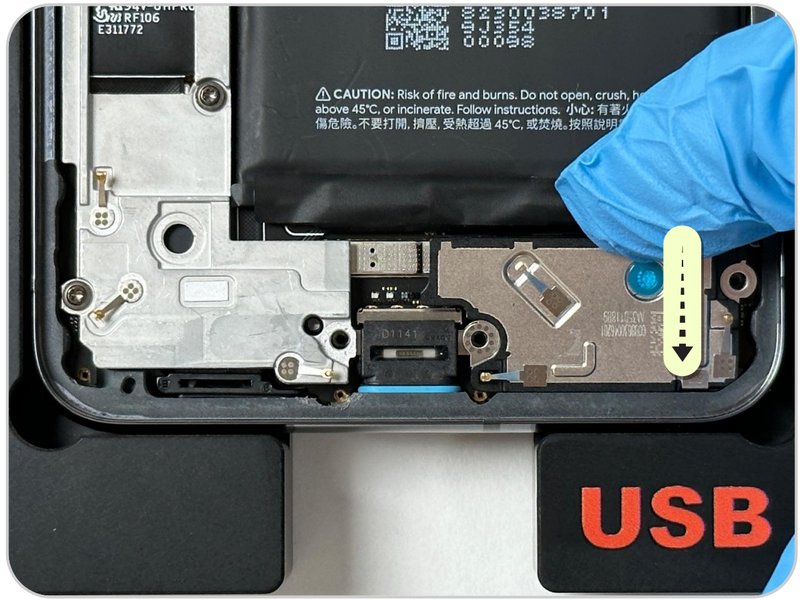
Assembly instructions

Bottom Speaker

Attach Bottom Speaker

- Inspect the spring status (Bottom Speaker spring location).
- Slot the **Bottom Speaker** into the **Enclosure**.

Part: G863-00462-01 (Bottom Speaker)



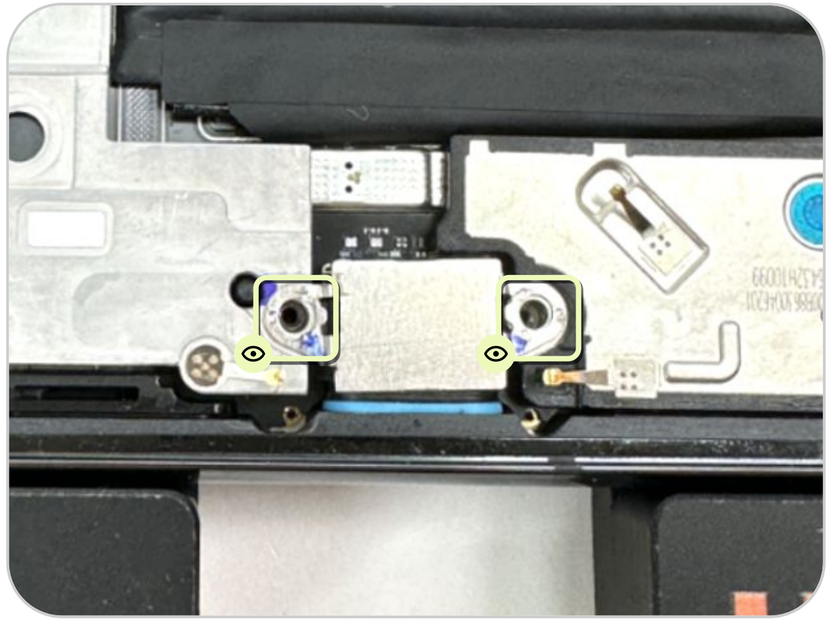
Note

Make sure the speaker goes under the enclosure rim.

Attach USB-C cowling

Position the **USB-C cowling** per the two positioning posts on the **Mid-frame** and **Bottom Speaker**.

Part: G853-01362-01 (USB-C cowling)



Tighten Screws

- Place the **Pixel 8 Pro-Screw Cover** on the **Pixel 8 Pro-Holder**.
- Tighten the **3 Screws** with a **Adjustable torque screwdriver** with **Screwdriver Hex Shank Torx Plus Bit no.3**, and remove the **Pixel 8 Pro-Screw Cover**.

Part: G250-06946-10 *3 (Screw)

Use Caution

Be careful when using the screwdriver. Don't damage the adjacent battery.

Incorrect use of the screwdriver could cause injury to you or third persons or damage to the battery and/or the product.

Note

Torque force: 1.4 ± 0.03 kgf-cm

Fit DDICs

Attach the **UDFPS Flex Pad**, **DDIC Right,** and **DDIC Left** with **ESD Tweezers**.

Part: G806-11745-01 (UDFPS Flex Pad)

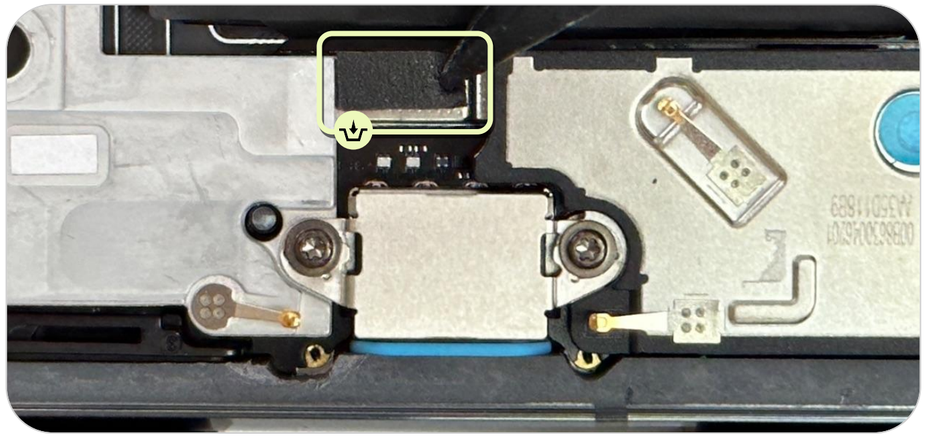
Part: G852-03670-02 (DDIC Right)

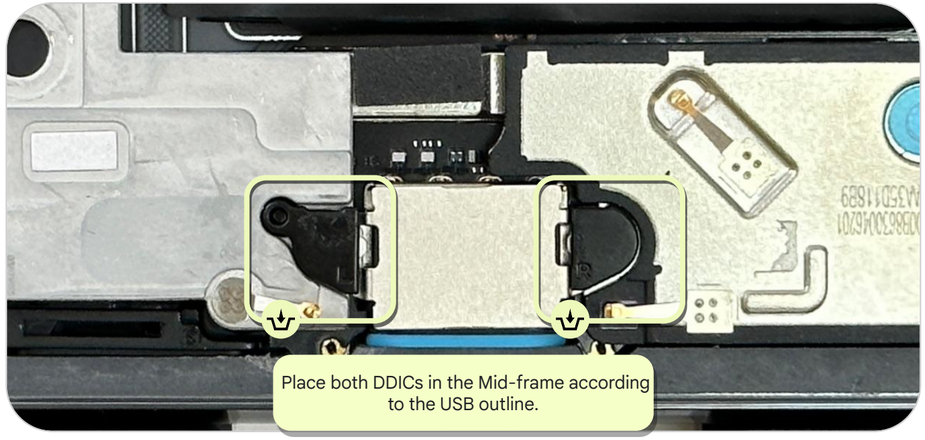
Part: G852-03670-01 (DDIC Left)

Note

The DDICs are marked L and R – which stands for Left and Right.

Attach UDFPS Flex Pad to the Logic Board if there is none.

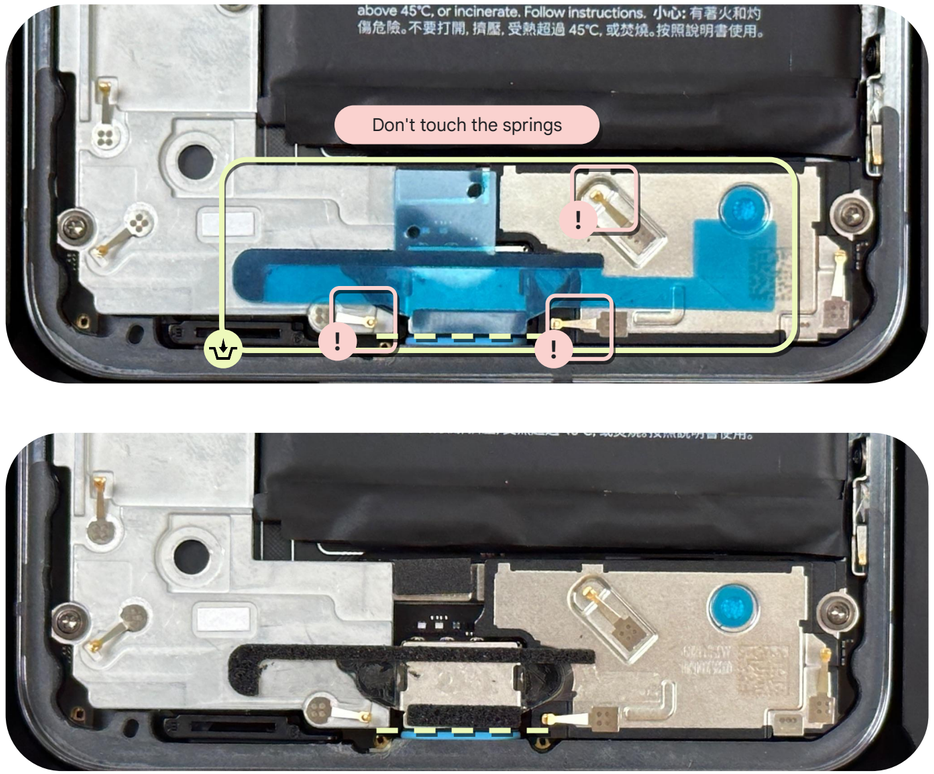




Adhere SHIM

- Align the **SHIM** with the outline on the **Mid-frame** and **Bottom Speaker**.
- Use **ESD Tweezers** to slowly peel off the release liner.

Part: G806-09493-06 (SHIM)



Assembly instructions

Graphite Sheet

Inspect Springs

- Inspect the **Springs** at the numbered locations.

Locations

1	Heatsink A	**4**	Mid-frame B	**7**	Bottom Speaker C	**10**	ANT7 bracket
2	Heatsink B	**5**	Mid-frame C	**8**	Bottom Speaker B	**11**	Mid-frame E
3	Mid-frame A	**6**	Mid-frame D	**9**	Bottom Speaker A	**12**	Top Speaker

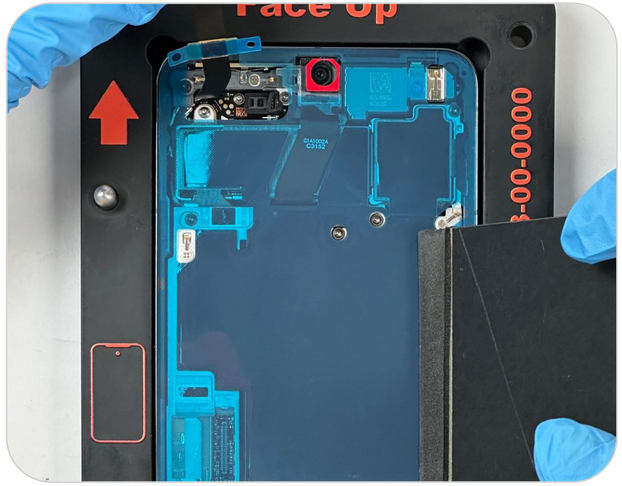
Apply Graphite Sheet

- With the device in the **Pixel 8 Pro-Holder**, place the **Graphite Sheet**, aligning it with the outline of the **Enclosure**.

Part: G864-00635-01 (Graphite Sheet)

Adhere Graphite Sheet

- Run the **Universal Scraper** over the **Graphite Sheet** to smooth out any air pockets. Use the smaller end where needed.
- Take extra care when applying pressure to the battery area.



Use Caution

Select the appropriate end of the Universal Scraper to smooth the sheet.

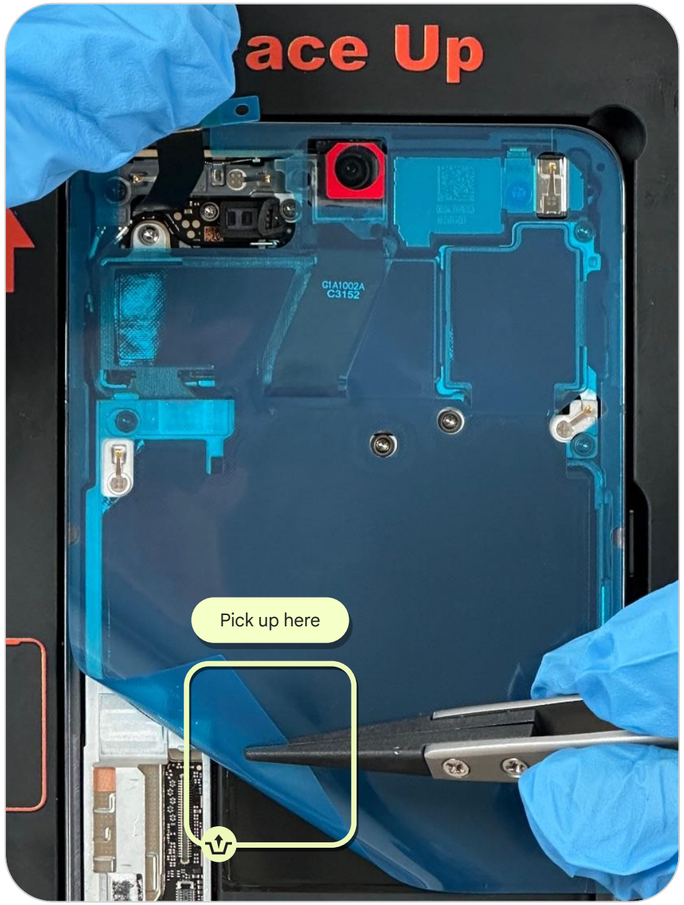
Avoid pressing on top of gaskets and springs, as it may deform them.

Remove Release Liner

- Peel off the release liner with **ESD Tweezers**.

Use Caution

Avoid pressing on top of gaskets and springs, as it may deform them.



Attach mmWave Flex

- Tear off the 3 **CPSA** release liners. (Fig 1).
- Align flex with the outline, and press down with an **ESD Spudger** to activate the PSA (Fig 2).

> **Note**
>
> This step is only needed for the mmWave Sku.

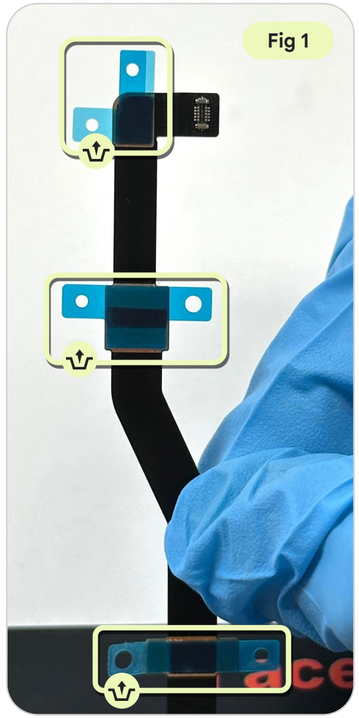


Fig 2

Connect mmWave Module

Connect **mmWave Flex** to the **Logic Board**.

Note

Check every connector is fully attached to the Logic Board.

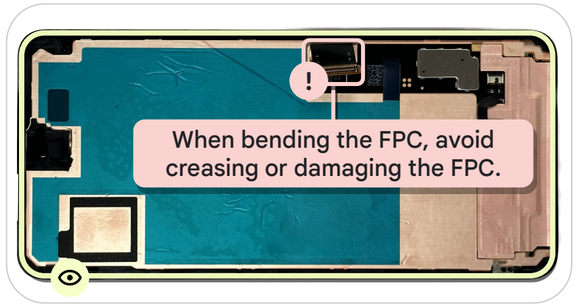
This step is only needed for the mmWave Sku.

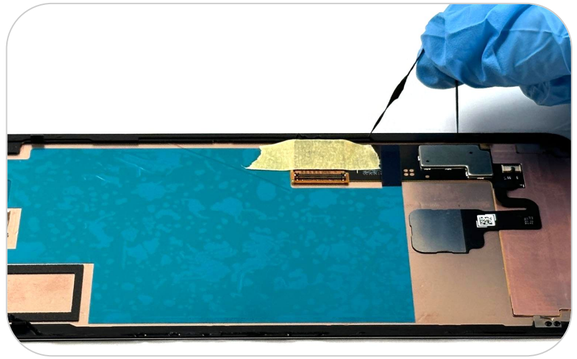
Assembly instructions

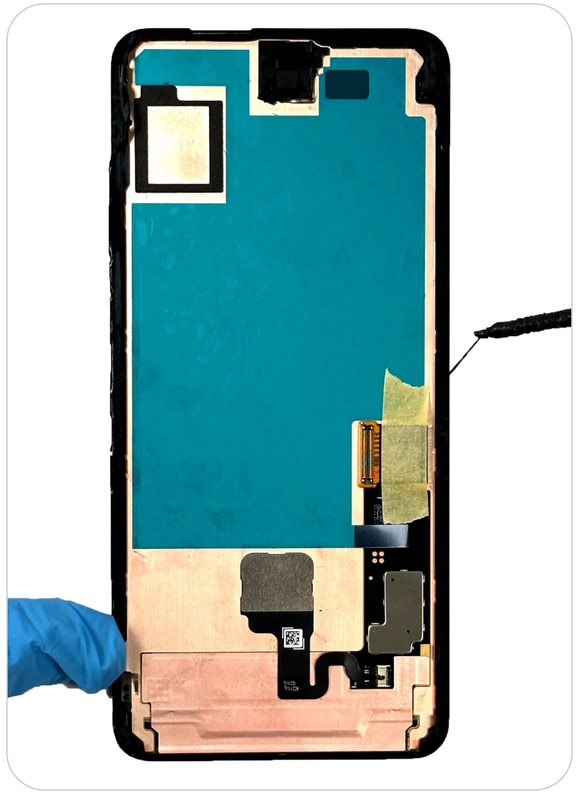
Display

Re-using Display

- Inspect the **Display** for adhesive residue.
- Apply **Masking Tape** to the **Flex**.
- It is recommended to carefully and slowly peel off the adhesive by hand in one piece. Use an **ESD Spudger** or **Deglue Machine** to clean it.
- Use a **Dust-Free Cloth** to clean the surface with **IPA** where needed.







Apply Primer on Display

- Apply **IPA** around the edges of the **Display Module** using a **Dust-free cotton swab**. Use an **Ionizing air fan** to blow over.
- Apply **3M 111 Primer** around the edges of the **Display Module** using a **Dust-free cotton swab**. Use an **Ionizing air fan** to blow over.
- Remove **Masking Tape** from the **Flex**.

Part: G949-00688-01 (Display Module)

Use Caution

When applying IPA & AP111 primer to the Display Module, avoid touching the copper and sponge areas.

Once Primer has been applied, complete assembly in 25 mins.

Remove Release Liner

Slowly remove the release **Liner** from the **Adhesive** by hand.

Part: G806-09115-12 (CG-Trim PSA)

Use Caution

Don't touch the adhesive.

If it gets dirty, change for another one.

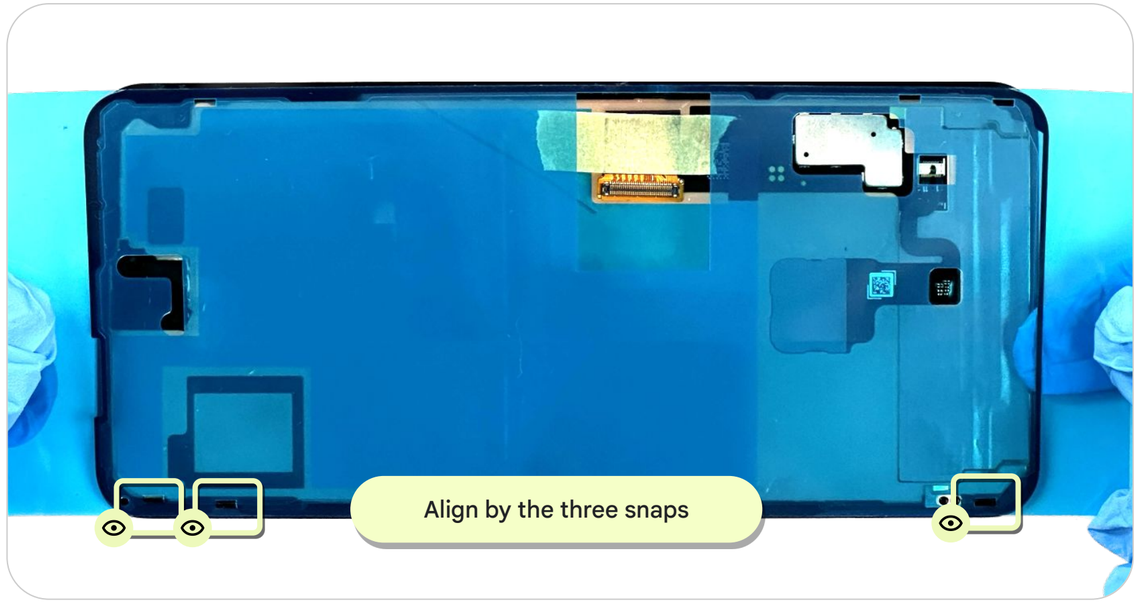
Align Adhesive

Place the **Adhesive** with the 3 Snaps on CG Trim by hand.

Use Caution

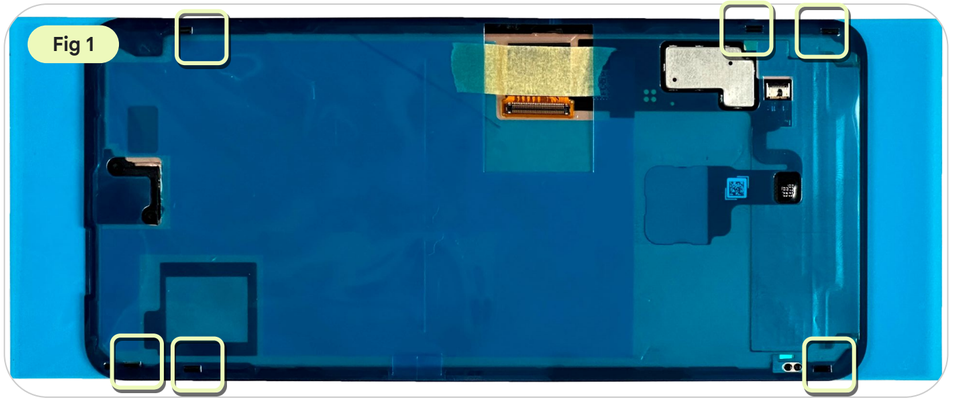
Don't touch the adhesive.

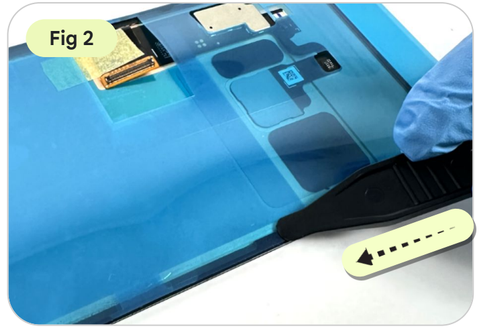
If it gets dirty, change for another one.



Adhesive to Display

- Make sure the **Adhesive** is completely seated into the **6 Snaps** (Fig 1).
- Use the **Universal Disassembly stick** to activate the **Adhesive** (Fig 2).





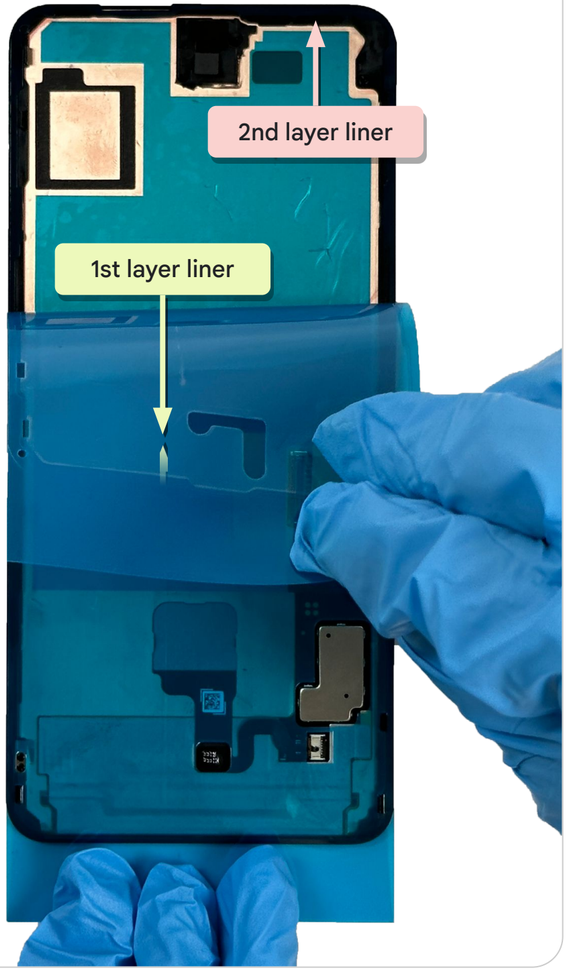
Note

Inspect for any misalignment.

Remove Release Liner (1st layer)

- Slowly pull the release liner to avoid lifting the adhesive.
- Remove **Masking Tape** from the **Flex**.

> ⚠ **Use Caution**
>
> Don't remove the 2nd layer of the release liner yet.



Apply primer on Enclosure

- Apply **IPA** around the edges of the **Enclosure** using a **Dust-free cotton swab**. Use an **Ionizing air fan** to blow over.
- Apply **3M 111 Primer** around the edges of the **Enclosure** using a **Dust-free cotton swab**. Use an **Ionizing air fan** to blow over.

> ⚠ **Use Caution**
>
> Once Primer has been applied, complete assembly in 25 mins.

Align Display

- Before attaching the **Display Module**, inspect the **Springs**.
- Use the **Universal adsorption bulb** to prop up the **Display Module**.

Use Caution

When attaching the display, **Don't damage or deform the springs.**

Connect Display

Connect the **Display Flex** to the **Logic Board**, applying even pressure across the connector to ensure it is fully engaged.

Note

Be careful to avoid damaging the springs (being especially diligent near where the Display contacts the Enclosure).

Use Caution

Avoid scratching the outside of the display flex against the Mid-frame.

Pressure should only be applied straight downward on the connector, not against any part of the flexible cable.

Check Display

- Remove the **Universal adsorption bulb** and **Display protective film**.
- Power on to check if the device is working properly. Don't touch the device until it is fully booted up.
- Power off device after checking.

Use Caution

Don't touch any part of the device until it boots fully, since during the bootup process the touch panel self calibration may be in progress.

Install UDFPS Calibration

- Reboot device into the **Fastboot Mode**.
- Connect the device with a USB-C cable to a computer, and visit pixelrepair.withgoogle.com to download the UDFPS calibration software.

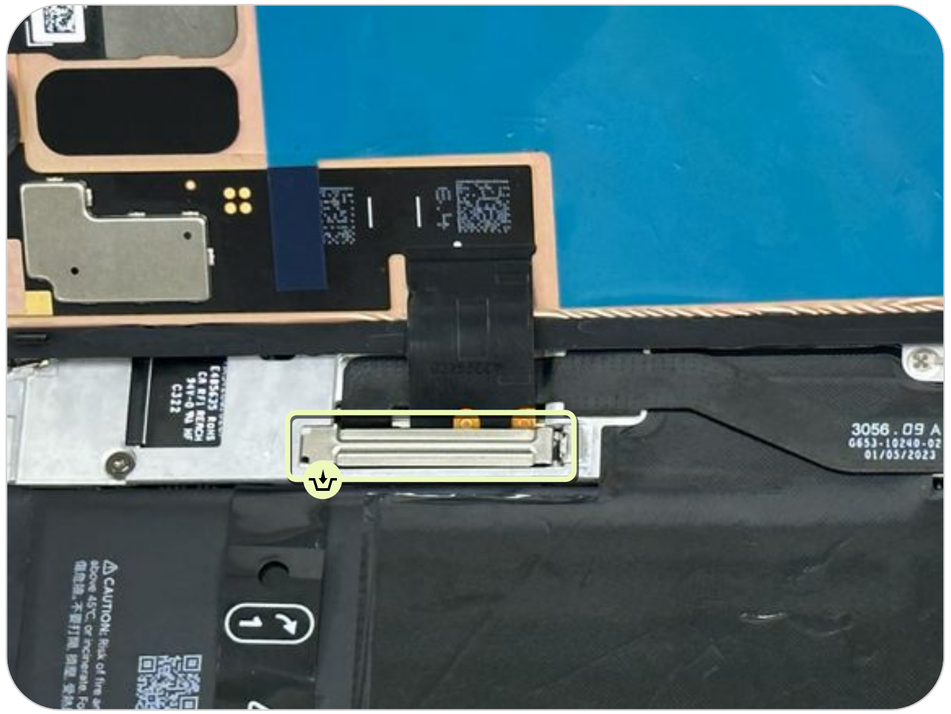
> **Use Caution**
>
> This step is only needed if the display or the mainboard has been replaced.

Attach Display cowling

Attach a new **Display cowling** over the connector.

Part: G730-07730-07 (Display cowling_mmWave)

Part: G730-07730-08 (Display cowling_sub6)



Use Caution

Avoid scratching the outer surface of the flex against the midframe.

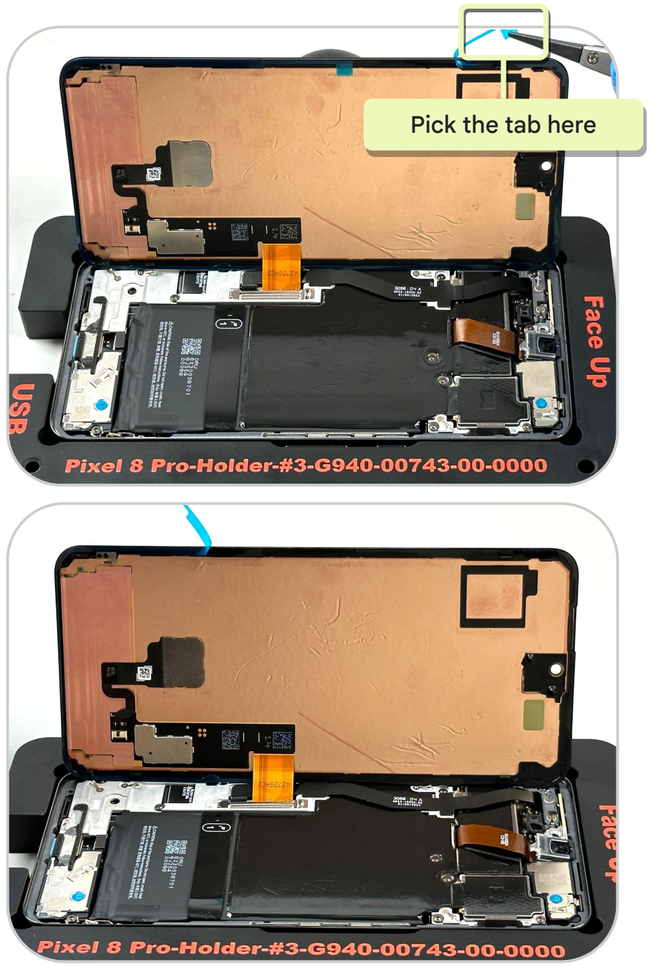
Make sure the trim snaps don't contact the adhesive.

Remove protective film

If there is protective film applied to the **Display Module**, use the **Universal adsorption bulb** to lift up the **Display Module** and remove the protective film using **ESD Tweezers**.

Remove Release Liner

Use **ESD Tweezers** to grab the **PSA Release Liner** and carefully peel it off.



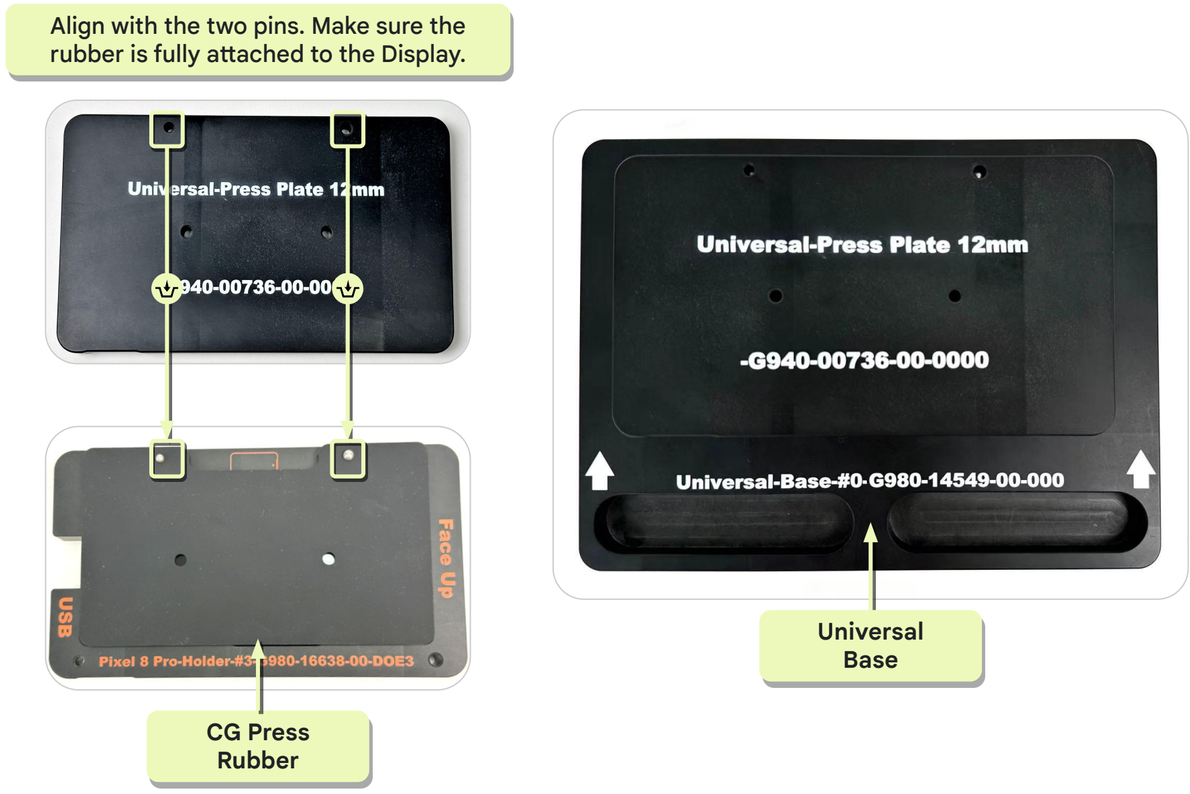
Attach Display

- Attach the **Display Module** onto the **Enclosure** vertically.
- Remove from the **Pixel 8 Pro-Holder** and press around the display bezel with both hands.

> **Note**
>
> Press the center of the top side first, followed by 2 longer sides and the bottom side.

Prepare to press

- Set the device back in the **Pixel 8 Pro-Holder**.
- Put the **Pixel 8 Pro-CG Press Rubber** on top, followed by the **Universal Press Plate 12mm**.
- Place the stack on the **Universal Base**.



Press in fixture

- Place the stack in the **Universal Press** and press the handle down for **30 seconds**.
- Restore the handle to the original position and remove the device.

Use Caution

Pinch point.

Keep hands clear during operation.

Pixel 8 Pro Repair Manual

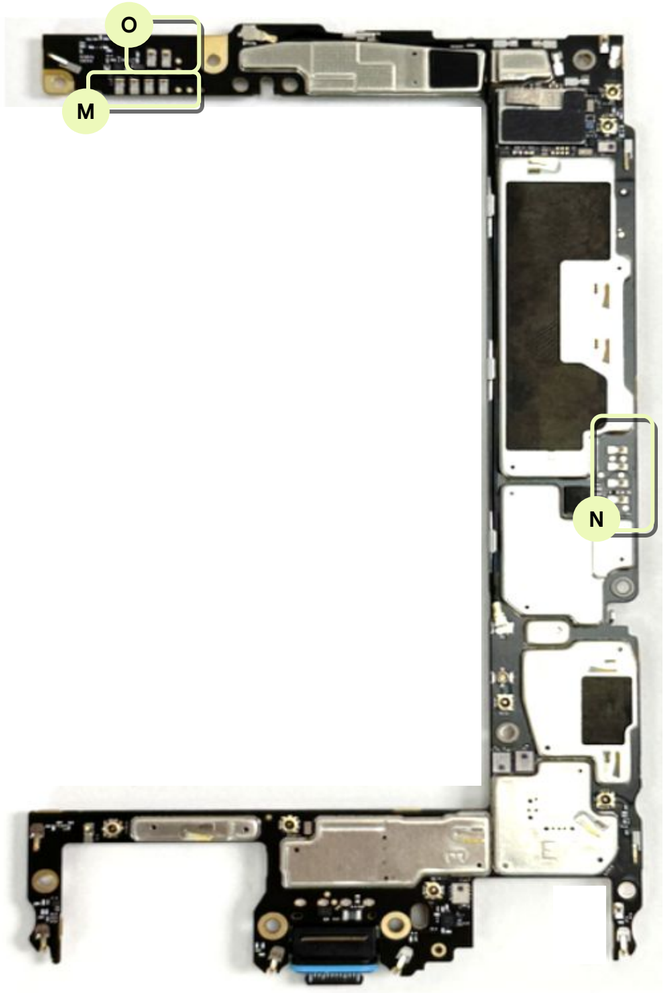
Troubleshooting

Connectors location

Location & Description	
A	Telephoto Camera Connector
B	Ultra Wide Band Connector
C	Flam Board Connector
D	Ultra Wide Camera Connector
E	Main Camera Connector
F	Front Camera Connector
G	Display Connector
H	Battery Connector
I	USB Port
J	mmWave Connector
K	Vibrator Pad
L	Bottom Speaker Pad

Connectors location

Location & Description	
M	Sidekey Pad
N	Wireless Charger & NFC Pad
O	Flam Board & Top speaker Pad

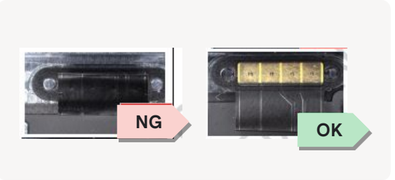


Power

Symptom	Potential Root Cause	Procedure	
T001: Does not power on **T002:** Powers off suddenly **T004:** Wired charging failure **T053:** Battery damage **T054:** Battery draining fast **T083:** USB-C port corrosion **T084:** USB-C port damage **T085:** USB-C failure	Damage	• Inspect the USB-C connector for debris preventing charging. • Inspect the device for damage. • Check if the liquid damage indicators are activated.	
	Display	• Remove the **Display Module** and install a new one. • Charge for 10 minutes to see if the device can power on.	**Disassembly** • Display
	Connectivity issue	• Before removing the **Mid-frame**, visually check the connection status of the battery BTB. • Remove the **Mid-frame**, check if connectivity between **Battery connector** and **Logic board** are normal. If they are not fully connected, re-assemble and then retest.	Connectors Location 
	Component issue	• Use a good **Battery** and **Logic Board** to cross check with the original ones. • Replace the defective component.	**Disassembly** • Logic board • Battery

Wireless charge

Symptom	Potential Root Cause	Procedure
T003: Wireless charging failure	Connectivity issue	• Check the contact condition between Wireless Charger and Pin contact pads. If there is no mark on the pin contact pads, it shows poor connectivity. • If marks are observed, clean the contact pad and test again. • Check if connectivity between **Wireless Charger, NFC Pad,** and **Logic Board** are normal. • If they are not fully connected, re-assemble and then retest.
	Component issue	• Use a good **Enclosure** and **Logic Board** to cross check with the original ones. • Replace the defective component.



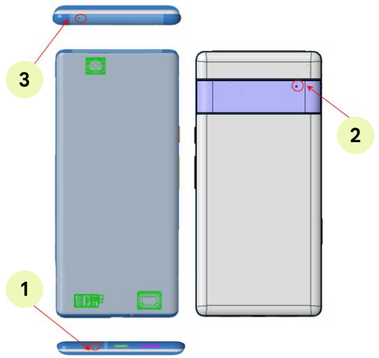
Connectors Location

Disassembly

- Logic board
- Enclosure

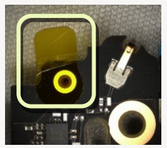
Mic 1

Symptom	Potential Root Cause	Procedure
T010: Mic 1 - no sound **T011:** Mic 1 - low sound **T012:** Mic 1 - distorted sound	Mesh not clean	• Use a microscope and check the mesh for damage or blockage **(Fig 1)** • Clean the mesh and then test the audio again.
	Assembly Problem	• Disassemble the device, check the Mic 1 bracket is fully seated. • Check if the MLB Mic 1 protective liner is removed **(Fig 2)** If not, remove the protective liner and go to the next step. • Test audio again.
	Component issue	• Check the **Mic 1 Bracket** for delamination at the PET corner at the bottom **(Fig 3)** • Use a good **Mic 1 Bracket** and **Logic Board** to cross check with the original ones. • Replace the defective component.



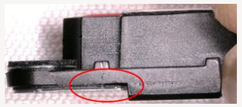
1. Mic 1
2. Mic 2
3. Mic 3

(Fig 1).



(Fig 2).

Don't forget to remove



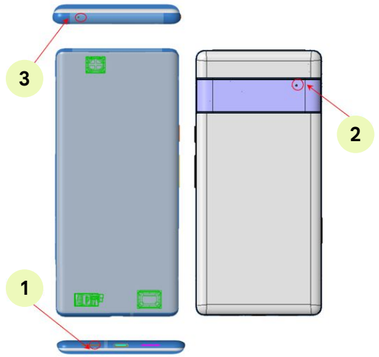
(Fig 3).

Disassembly

- Logic board
- Mic 1 bracket

Mic 2

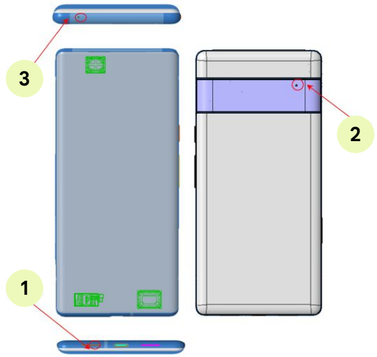
Symptom	Potential Root Cause	Procedure	
T013: Mic 2 - no sound **T014:** Mic 2 - low sound **T015:** Mic 2 - distorted sound	Connectivity issue	• Check if the connectivity between the **Flam Board Connector** and **Logic Board** are normal. • If they are not fully connected, re-assemble and then retest.	Connectors Location
	Component issue	• Use a good **Enclosure** and **Logic Board** to cross check with the original ones. • Replace the defective component.	**Disassembly** • Logic board • Enclosure



1. Mic 1
2. Mic 2
3. Mic 3

Mic 3

Symptom	Potential Root Cause	Procedure	
T016: Mic 3 - no sound **T017:** Mic 3 - low sound **T018:** Mic 3 - distorted sound	Connectivity issue	• Check if the connectivity between the **Flam board connector** and **Logic board** are normal. • If they are not fully connected, re-assemble and then retest.	Connectors Location
	Component issue	• Inspect whether the Mic 3 component is damaged. • Use a good **Enclosure** and **Logic board** to cross check with the original ones. • Replace the defective component.	**Disassembly** • Logic board • Enclosure



1. Mic 1
2. Mic 2
3. Mic 3

Top Speaker

Symptom	Potential Root Cause	Procedure	
 **T019:** Top Speaker no sound **T020:** Top Speaker low sound **T021:** Top Speaker distorted sound	Mesh not clean	• Inspect the **Top Speaker Mesh** and use a soft **ESD Brush** to remove any debris. • Test the audio again.	
	Internal debris	• If sound quality is still poor, inspect the mesh and speaker with a **Microscope**. • Disassemble the device and inspect the speaker. Use an ionizing air fan to remove any debris and then test the audio again.	
	Connectivity issue	• Check if connectivity between the **Top SPK Pad** and **FLAM Board** are normal. • If they are not fully connected, re-assemble and then retest.	Connectors Location
	Component issue	• If sound quality is still poor, use a good **Top Speaker** and **Logic Board** to cross check with original ones • Replace the defective component.	**Disassembly** • Logic board • Top Speaker

Bottom Speaker

Symptom	Potential Root Cause	Procedure	
T023: Bottom Speaker no sound **T024:** Bottom Speaker low sound **T025:** Bottom Speaker distorted sound	Mesh Problem	• Visually inspect the exterior of the phone. Check for pollutants on the mesh of the **Bottom Speaker** port. Use a soft **ESD Brush** to remove any debris. • Test audio again.	
	Internal debris	• If the sound quality is still poor, inspect the mesh and speaker with a **Microscope**. • Disassemble the device and inspect the speaker. Use an ionizing air fan to remove any debris and test audio.	
	Connectivity issue	• Check if connectivity between the **Bottom SPK Pad** and **Logic Board** are normal. • If they are not fully connected, re-assemble and then retest.	Connectors Location
	Component issue	• If sound quality is still poor, use a good **Bottom Speaker** and **Logic Board** to cross check with original ones • Replace the defective component.	**Disassembly** • Logic board • Bottom Speaker

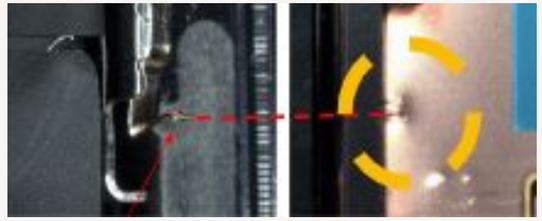
Vibrator

Symptom	Potential Root Cause	Procedure	
 **T026:** Vibrator failure	Connectivity issue	• Check the Vibrator Pad between the Logic Board and Mid-frame. • Test the vibrator again.	Connectors Location
	Component issue	• Use a good Mid-frame and Logic Board to cross check with the original ones. • Replace the defective component.	**Disassembly** • Logic board • Mid-frame

Display

Symptom	Potential Root Cause	Procedure	
 **T027:** Display blank **T028:** Display dead pixel, dark spots or foreign material **T029:** Display bright pixel, bright or colored spots **T030:** Display vertical or horizontal lines **T031:** Display black, white or colored screen **T032:** Display flickering/abnormal **T033:** Display image quality **T034:** Display color mura **T035:** Display light leakage **T036:** Display backlight issue **T037:** Display shadow **T038:** Display permanent burnin **T039:** Display temporary burnin	Damage	Inspect display for damage and replace if necessary.	
	Connectivity issue	• Check if connectivity between the **Display Connector** and **Logic Board** are normal. • If they are not fully connected, re-assemble and then retest.	Connectors Location
	Dead pixels Distorted Graphics Flickering Color issues	• Remove the **Display** module, test a replacement part (for testing purposes only: it is suggested to do this without removing the release liner). • If issue is resolved, apply the adhesive and install the new **Display**.	**Disassembly** • Display

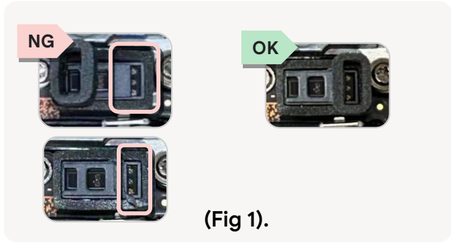
Display (continued)

Symptom	Potential Root Cause	Procedure	
 **T040:** Display single crack **T041:** Display multiple cracks **T043:** Display cosmetic defects **T044:** Multi-touch poor response **T045:** Multi-touch no response **T046:** Multi-touch erratic response	Dimple	Remove Display module, to check the display copper. See image below as an example. 	**Disassembly** • Display
	Touch screen Fingerprint sensor	• Remove the **Display** module, test a replacement part (for testing purposes only: it is suggested to do this without removing the release liner). • If issue is resolved, apply the adhesive and install the new **Display**.	**Disassembly** • Display
	Component problem	• Use a good **Display** and **Logic Board** to cross check with the original ones. • Replace the defective component.	**Disassembly** • Logic board • Display

NFC

Symptom	Potential Root Cause	Procedure	
 **T051:** NFC connectivity Issues	Connectivity issue	• Check the contact condition between the WC and Pin contact pads. If there is no mark on the pin contact pads, it shows poor connectivity. • If marks are observed, clean the contact pad and test again. • Check if the connectivity between the **WC, NFC Pad,** and **Logic Board** are normal. • If they are not fully connected, re-assemble and then retest.	Connectors Location
	Component issue	• Use a good **Enclosure** and **Logic board** to cross check with the original ones. • Replace the defective component.	**Disassembly** • Logic board • Enclosure

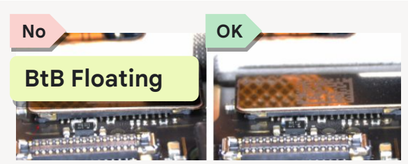
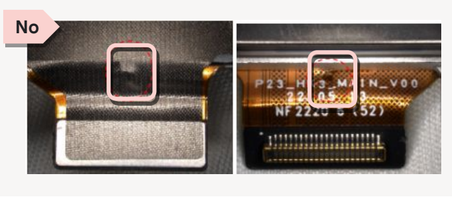
Proximity Sensor

Symptom	Potential Root Cause	Procedure
T059: Proximity sensor failure	Assembly issue	Check the P-sensor Grommet is installed correctly. **Assembly** • P-sensor grommet status  **(Fig 1).**
	Component issue	• Disassemble and check the appearance of the Proximity sensor to ensure there is no abnormality. • Use a good **P-sensor Grommet** and **Logic Board** to check. • Replace the defective component. **Disassembly** • mmWave

UDFPS

Symptom	Potential Root Cause	Procedure	
 **T064:** Fingerprint sensor failure	Interference Issue	Remove any screen protector prior to display function testing.	
	Damage	Inspect display for damage and replace if necessary.	
	Connectivity issue	• Check if the connectivity between the Display connector and Logic board are normal. • Check if the connectivity between the **Display Flex Connector** and **UDFPS** are normal. • If they are not fully connected, re-assemble and then retest.	Connectors Location
	Component issue	• Use a good **Display** and **Logic board** to cross check with original ones. • Replace the defective component.	**Disassembly** • Logic board • Display

Rear Camera

Symptom	Potential Root Cause	Procedure
T072: Camera AR failure **T073:** Camera Rear Photo quality **T074:** Camera Rear Video quality **T077:** Camera flash not working **T078:** Cannot switch between cameras **T079:** Camera damage **T111:** Main RCAM crashes **T112:** UW RCAM crashes **T114:** Main RCAM no preview **T115:**UW RCAM no preview **T116:** Ultrawide Rear Camera Photo quality **T117:** Ultrawide Rear Camera video quality	Damage	Inspect the **Display** and camera(s) for damage.
	Connectivity issue	• Check if connectivity between the **Rear Camera Connector** and **Logic Board** are normal. • If they are not fully connected, re-assemble and then retest. Connectors Location 
	Image quality	• Remove the **Display Module**, connect a new **Rear Camera** to test. • If issue is resolved, proceed with the **Rear Camera** replacement and assemble device. Some NG module cosmetic pictures are provided for reference. **Disassembly** • Rear camera 
	No image	If camera issue remains, replace the **Logic Board**. **Disassembly** • Logic board

Front Camera

Symptom	Potential Root Cause	Procedure	
 **T075:** Camera Front Photo quality **T076:** Camera Front Video quality **T078:** Cannot switch between cameras **T079:** Camera damage **T110:** FCAM crashes **T113:** FCAM no preview	Damage	Inspect the **Display** and camera(s) for damage.	
	Connectivity issue	• Check if the connectivity between the **Front Camera Connector** and **Logic Board** are normal. • If they are not fully connected, re-assemble and then retest.	Connectors Location
	Image quality	• Connect a new **Front camera** to test. • If issue is resolved, proceed with the **Front camera** replacement and assemble the device.	**Disassembly** • Front Camera
	No image	If camera issue remains, replace the **Logic Board**.	**Disassembly** • Logic board

mmWave Module

Symptom	Potential Root Cause	Procedure	
 **T105:** 5G_low_med_band_failure **T106:** 5G_high_band_failure	Connectivity issue	• Inspect **Mid-frame** and check that the **mmWave flex** is properly seated. • Check if the connectivity between the **mmWave Connector** and **Logic Board** are normal. • If they are not fully connected, re-assemble and then retest.	Connectors Location
	Component issue	• Connect a new **mmWave** to test. • If issue is resolved, proceed with the **mmWave** replacement and assemble the device. • If mmWave issue remains, replace the **Logic Board**.	**Disassembly** • mmWave Module • Logic board

Pixel 8 Pro Repair Manual

Software

Software tools

Description	Documentation
Update or reinstall the software on Pixel devices *(see link for additional details)*	LINK