



Sony Ericsson

Working Instructions

- mechanical -



Sony Ericsson txt
CK13i



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Sony Ericsson

Working Instructions (mech)

**For general information about mechanical repair related issues, refer to
1220-1333: Generic Repair Manual - mechanical**



1 Exterior Views

1.1 CK13i



2 Tools

SPECIAL TOOLS

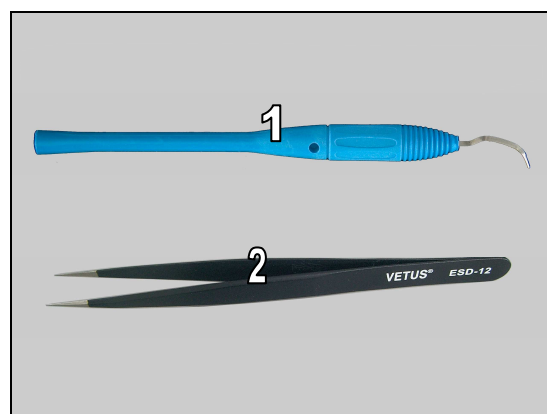
1. Torque Screwdriver
2. Bits (T5)
3. Front Opening Tool
4. Guitar Pick
5. Camera Removal Tool
6. Flex Film Assembly Tool



For part no's on the tools above, refer to the 'Tools Catalogue/Matrix'!

STANDARD TOOLS

1. Dentist hook (curve-shape)
2. Tweezers



3 Disassembly

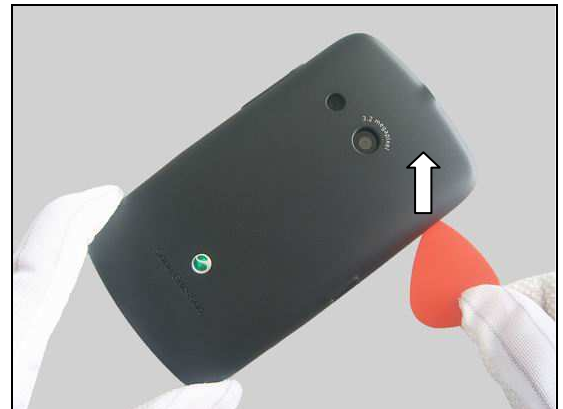
The disassembly is done in the following order:

1. Battery Cover Assy
2. Battery
3. Front Cover Assy
4. QWERTY Keypad
5. Rear Cover Assy
6. Display (a) and Main PBA (b)



3.1 Battery Cover Assy

Insert the Guitar Pick into the cavity to release the Battery Cover Assy.



Insert the Guitar Pick into the gap at this corner to release the Battery Cover Assy.



Lift up the Battery Cover Assy and remove it.





Disassembly

3.2 Battery

Release the Battery from its cavity by using the Front Opening Tool.

Remove it.



3.3 Front Cover Assy

Remove the six Screws (1.6mm*4.5mm) with the Torque Screwdriver by using T5 Bits.

Scrap the screws! The screws shall not be reused.



Turn over the phone.

Insert the Guitar Pick into the gap at the bottom left corner and slide it along this side to unsnap the hooks as shown.



Disassembly

Slide along the top side to unsnap the hook as shown.



Slide along this side to unsnap the hooks as shown.



Lift up the Front Cover Assy and remove it.



Separate them.



Disassembly

3.4 QWERTY Keypad

Push the QWERTY Keypad to release it as shown.



Remove the QWERTY Keypad.

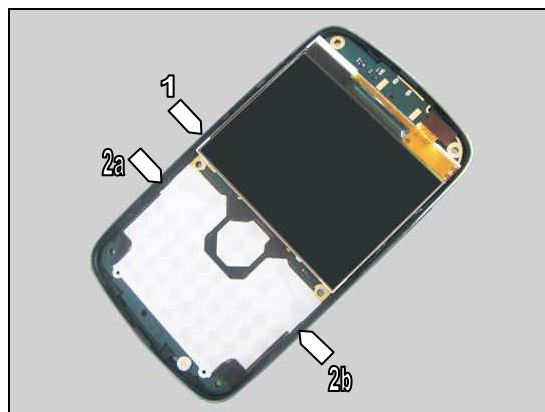


Separate them.



3.5 Rear Cover Assy

Identify the Micro USB Connector in its outlet (1) and two hooks (2a and 2b) as shown.



Disassembly

Push the edge of the Rear Cover Assy outwards to unsnap the hook of this side with fingers as shown.

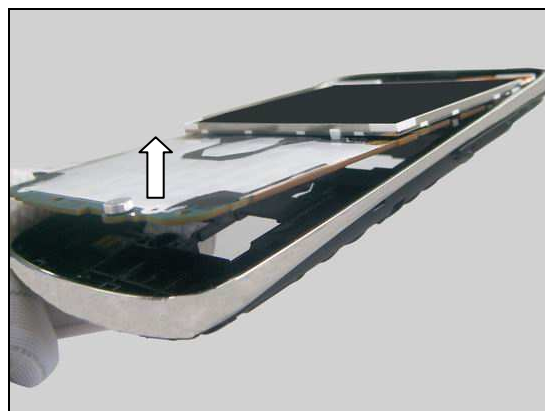


Do the same on the opposite side to release the Micro USB Connector from its outlet and unsnap another hook with fingers as shown.

Be careful not to peel off the Micro USB Connector from the Main PBA.



Push up the Main PBA from backside to release it as shown.



Remove the Main PBA.





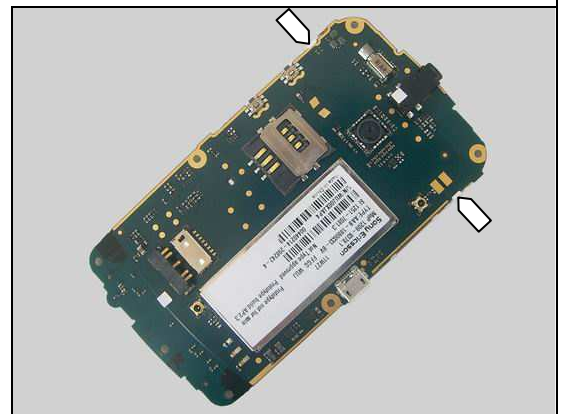
Disassembly

Separate them.



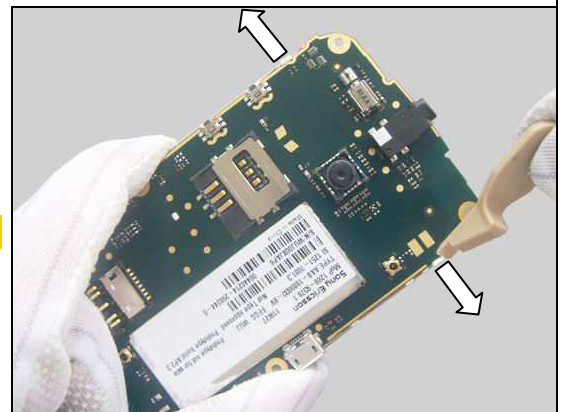
3.6 Display and Main PBA

There are two hooks securing the Display as shown.



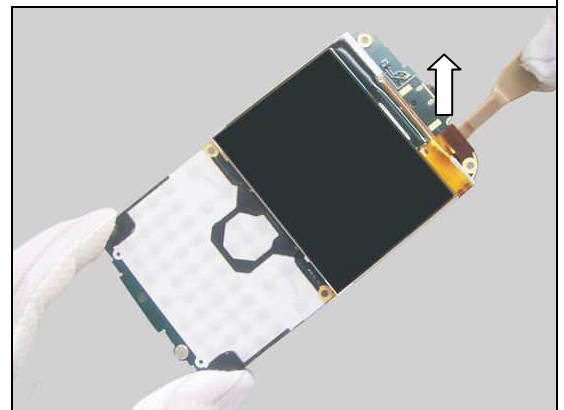
Unsnap the two hooks by using the Front Opening Tool.

Be careful not to damage the two hooks of the Display.



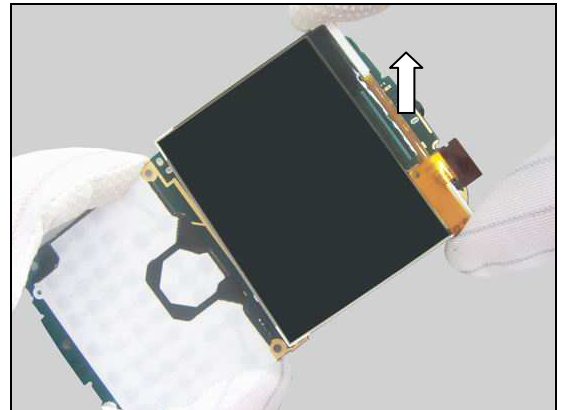
Turn over the Main PBA.

Unsnap the BtB connector by using the Front Opening Tool.



Disassembly

Remove the Display.



Separate them.





4 Replacement

4.1 Battery Cover Assy

Follow the 3.1 Disassembly instructions!

Prepare the new Battery Cover Assy.

Follow the 5.6 Reassembly instructions!



4.2 Front Cover Assy

Follow the 3.1 – 3.4 Disassembly instructions!

Follow the 4.9 Removal Instructions!

Prepare the new Front Cover Assy.

Follow the 4.9 Installation Instructions!

Follow the 5.3 – 5.6 Reassembly instructions!



4.3 QWERTY Keypad

Follow the 3.1 – 3.4 Disassembly instructions!

Prepare the new QWERTY Keypad.

Follow the 5.3 – 5.6 Reassembly instructions!



4.4 Rear Cover Assy

Follow the 3.1 – 3.5 Disassembly instructions!

Follow the 4.13 and 4.15 Removal Instructions!

Prepare the new Rear Cover Assy.

Follow the 4.13 and 4.15 Installation Instructions!

Follow the 5.2 – 5.6 Reassembly instructions!



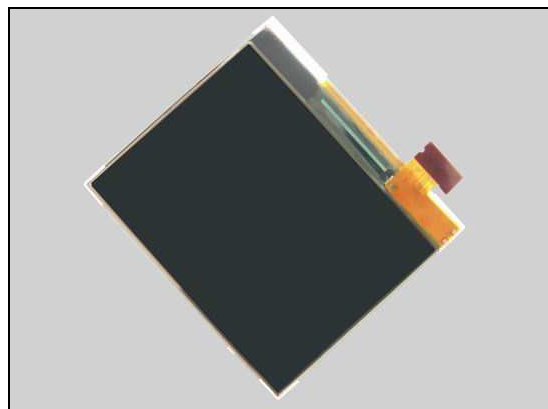
Replacement

4.5 Display

Follow the 3.1 – 3.6 Disassembly instructions!

Prepare the new Display.

Follow the 5.1 – 5.6 Reassembly instructions!





Replacement

4.6 Core Unit Label

Follow the 3.1 – 3.2 Disassembly instructions!

Prepare the new Core Unit Label.

Follow the 5.5 – 5.6 Reassembly instructions!

Core Unit Label cannot be reused!

REMOVAL

Read the old Core Unit Label and/or write the information into the 'LabelMake' program before removal.

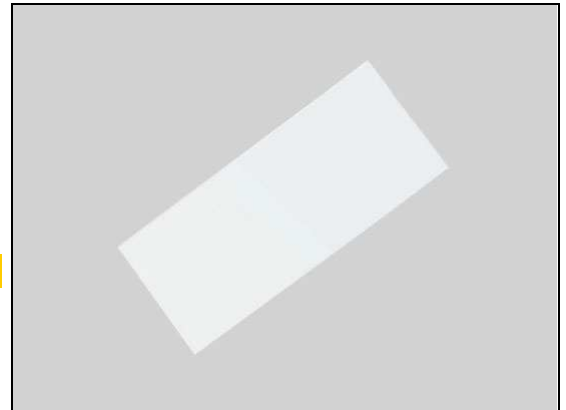
Carefully peel off the Core Unit Label by using the Tweezers.

INSTALLATION

Check that the proper label format is loaded in the Zebra printer and write a new Label by using the 'LabelMake' software.

Attach the new Core Unit Label in proper place as shown.

One label only is allowed!





Replacement

4.7 Speaker Mesh

Follow the 3.1 – 3.2 Disassembly instructions!

Prepare the new Speaker Mesh.

Follow the 5.5– 5.6 Reassembly instructions!

Speaker Mesh cannot be reused!

REMOVAL

Peel off the Speaker Mesh by using the Tweezers.

Be careful not to damage the Rear Cover Assy.

INSTALLATION

Attach a new Speaker Mesh in its cavity as shown.

Press to make it securely attached.





Replacement

4.8 Mic Sponge Mesh

Follow the 3.1 – 3.3 Disassembly instructions!

Prepare the new Mic Sponge Mesh.

Follow the 5.4 – 5.6 Reassembly instructions!

Mic Sponge Mesh cannot be reused!

REMOVAL

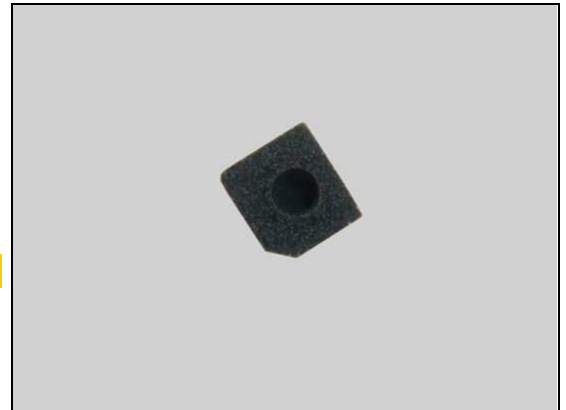
Detach the Mic Sponge Mesh from its cavity by using the Tweezers and remove it.

INSTALLATION

Clean the residues of the old adhesive before installation!

Attach the Mic Sponge Mesh in its cavity.

Press to make it securely attached by using the Front Opening Tool.



Replacement

4.9 Ear Speaker

Follow the 3.1 – 3.3 Disassembly instructions!

Prepare the new Ear Speaker.

Follow the 5.4 – 5.6 Reassembly instructions!

REMOVAL

Lift up the Ear Speaker by inserting the Dentist hook at the corner as shown.

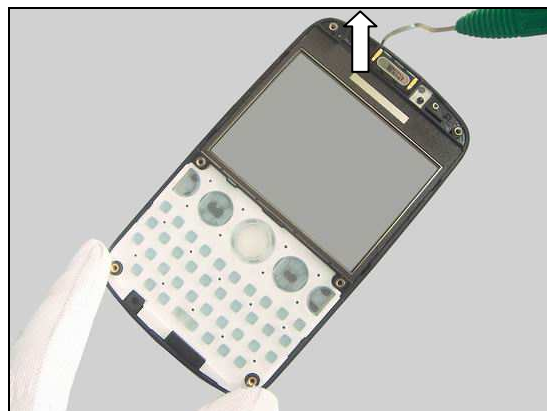
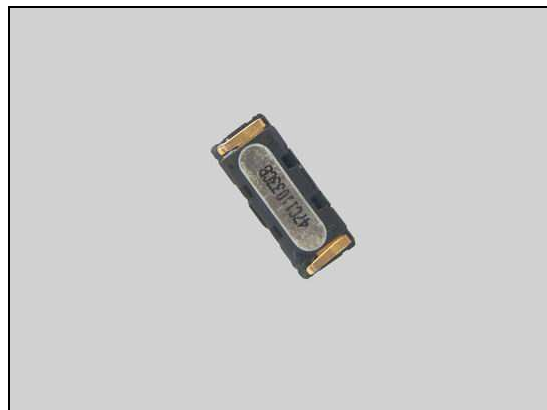
Remove the Ear Speaker by using the Flex Film Assembly Tool.

INSTALLATION

Follow the 4.10 Removal and Installation Instructions to install a new Receiver Sponge Mesh before this action.

Attach the Ear Speaker in its cavity as shown.

Notice that the Ear Speaker contact pins are towards the bottom side of the phone as shown.



Replacement: Ear Speaker

Press to make it securely attached.





Replacement

4.10 Receiver Sponge Mesh

Follow the 3.1 – 3.3 Disassembly instructions!

Follow the 4.9 Removal Installations!

Prepare the new Receiver Sponge Mesh.

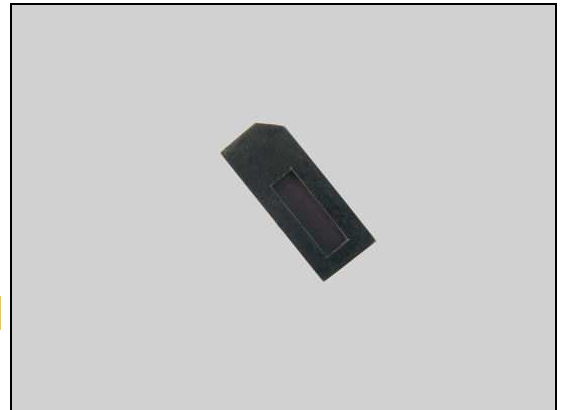
Follow the 4.9 Installation Instructions!

Follow the 5.4 – 5.6 Reassembly instructions!

The Receiver Sponge Mesh cannot be reused!

REMOVAL

Peel off the Receiver Sponge Mesh by using the Tweezers.



INSTALLATION

Clean the residues of the old Receiver Sponge Mesh before installation!



Attach a new Receiver Sponge Mesh in its cavity as shown.



Replacement

4.11 Camera Window

Follow the 3.1 – 3.5 Disassembly instructions!

Prepare the new Camera Window

Follow the 5.2 – 5.6 Reassembly instructions!

Camera Window cannot be reused!

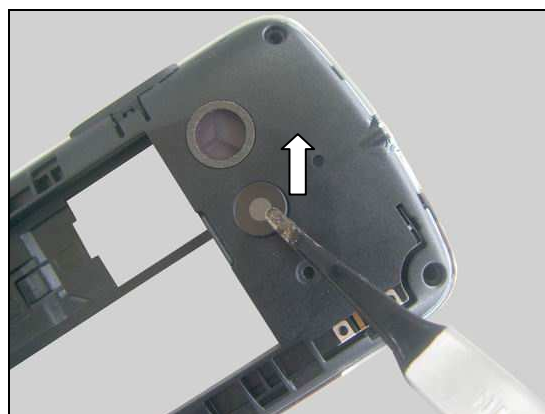
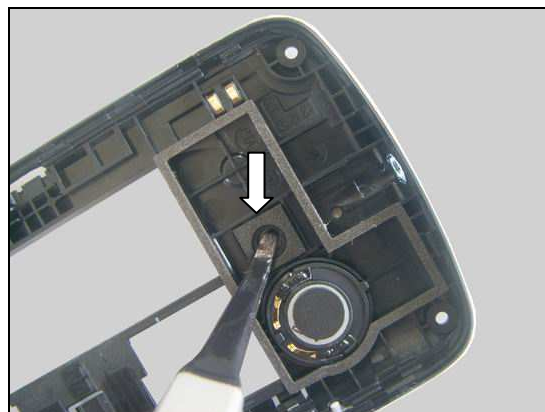
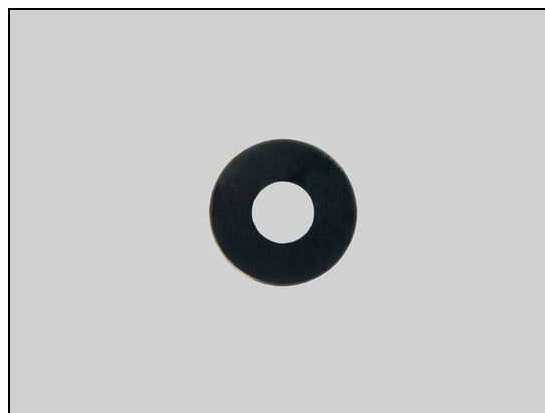
REMOVAL

Push the Camera Window from inside to detach it as shown.

Remove the Camera Window.

INSTALLATION

Mount a new Camera Window in its cavity.



Replacement: Camera Window

Press to make it securely attached.



Replacement

4.12 Main Antenna Assy

Follow the 3.1 – 3.5 Disassembly Instructions!

Prepare the new Main Antenna Assy.

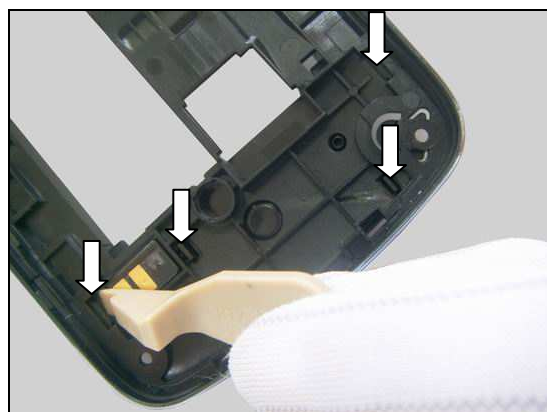
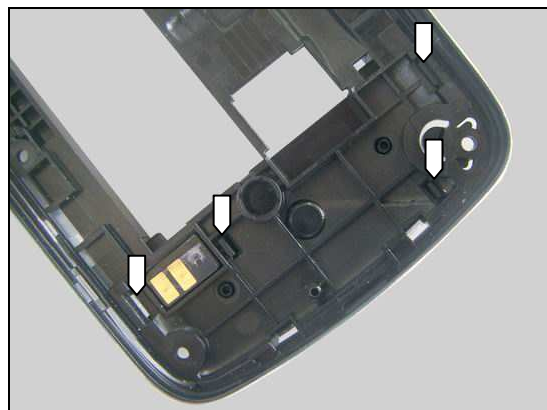
Follow the 5.2 – 5.6 Reassembly Instructions!

REMOVAL

Identify the four hooks as shown.

Push the four hooks from inside to unsnap them by using the Front Opening Tool as shown.

Remove the Main Antenna Assy from the Rear Cover Assy.



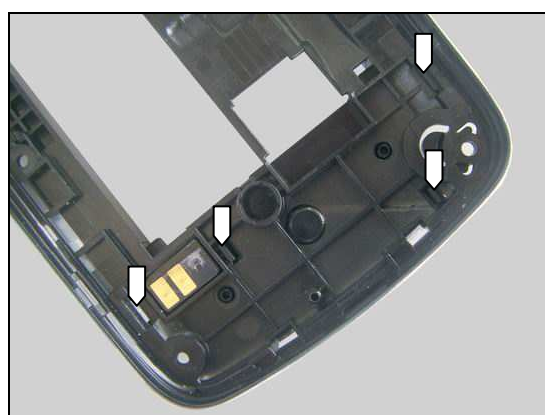
Replacement: Main Antenna Assy

INSTALLATION

Mount the Main Antenna Assy into its cavity and press on both sides of it to secure its position with fingers.



Turn over the Rear Cover Assy.
Make sure all four hooks are snapped.



Replacement

4.13 Speaker Support Sponge & Loudspeaker

Follow the 3.1 – 3.5 Disassembly Instructions!

Prepare the new Speaker Support Sponge & Loudspeaker.

Follow the 5.2 – 5.6 Reassembly Instructions!

The Speaker Support Sponge cannot be reused!

REMOVAL

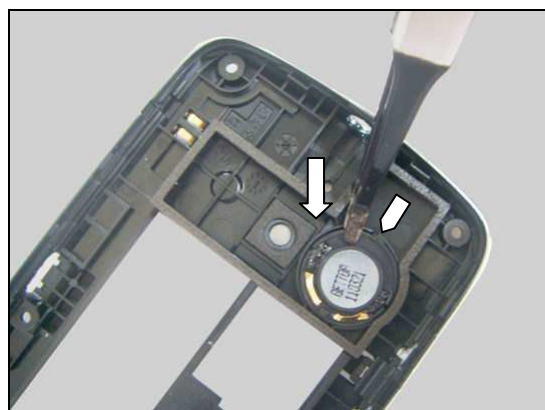
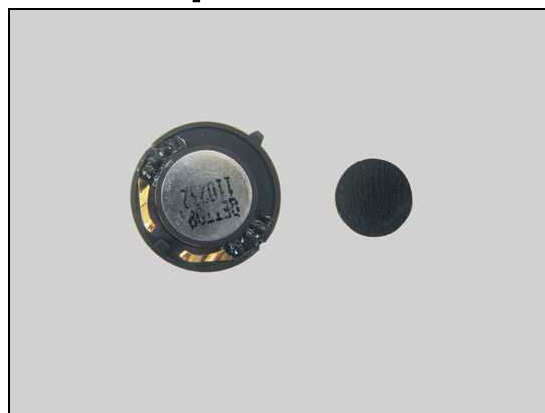
Lift up the Loudspeaker from its cavity by inserting the Dentist hook at this cavity slot as shown.

Remove the Loudspeaker.

INSTALLATION

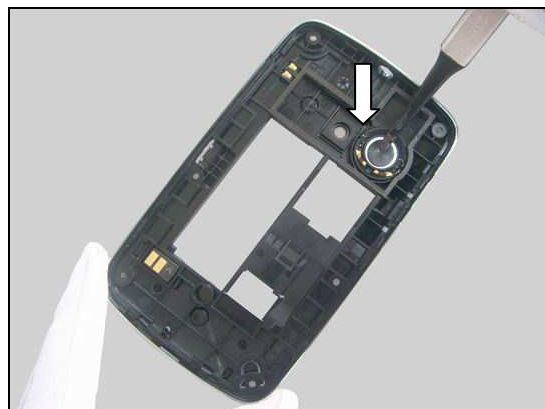
Follow the 4.14 Removal and Installation Instructions to install a new Speaker Sponge before this action.

Mount the new Loudspeaker into its cavity by aligning the guiding pin with the cavity slot as shown.

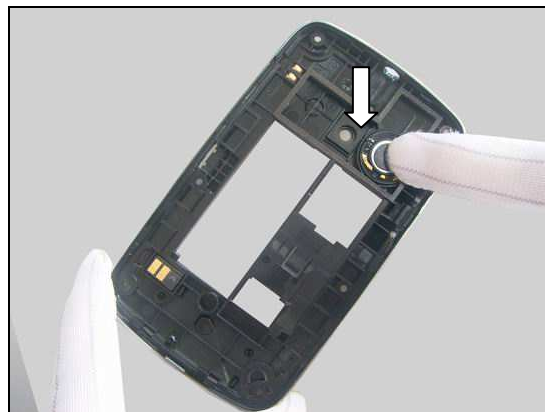


Replacement: Speaker Support Sponge & Loudspeaker

Attach a new Speaker Support Sponge onto the Loudspeaker in the proper position as shown.



Press to make them securely attached.



Replacement

4.14 Speaker Sponge

Follow the 3.1 – 3.5 Disassembly Instructions!

Follow the 4.13 Removal Installations!

Prepare the new Speaker Sponge.

Follow the 4.13 Installation Instructions!

Follow the 5.2 – 5.6 Reassembly Instructions!

The Speaker Sponge cannot be reused!

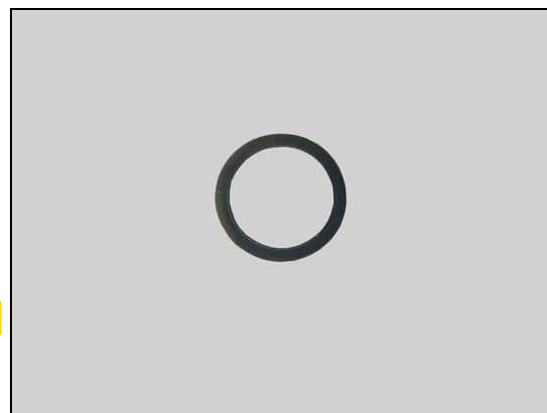
REMOVAL

Peel off the Speaker Sponge by using the Tweezers.

INSTALLATION

Clean the residues of the old Speaker Sponge before installation!

Attach a new Speaker Sponge in its cavity.



Replacement

4.15 Volume Key

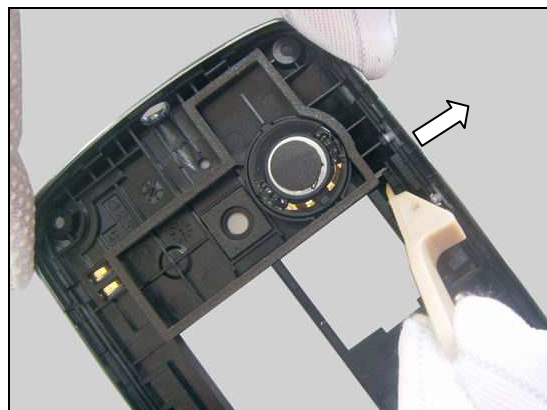
Follow the 3.1 – 3.5 Disassembly instructions!

Prepare the new Volume Key.

Follow the 5.2 – 5.6 Reassembly instructions!

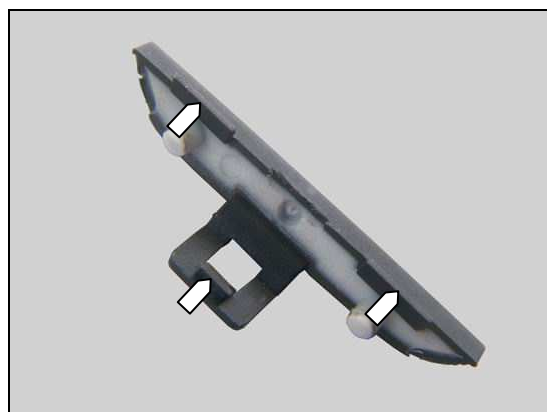
REMOVAL

Push out the Volume Key from inside by using the Front Opening Tool to release it.



INSTALLATION

Identify the three hooks of the Volume Key as shown.



Mount the Volume Key into its cavity and press to snap it with fingers.

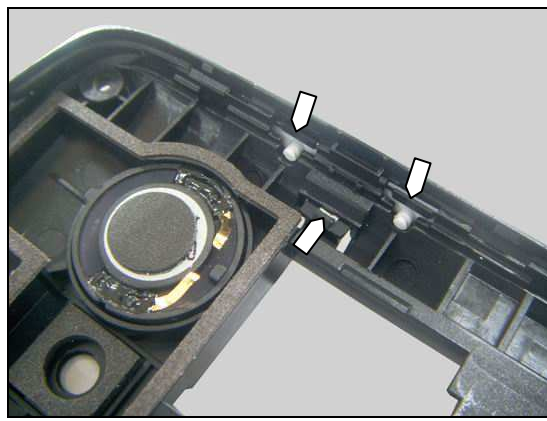
Make sure the Volume Key is properly secured as shown!





Replacement: Volume Key

Make sure the three hooks are properly snapped.



Replacement

4.16 Water Indicator

There are two Water Indicators on the phone.

INSPECTION

Follow the 3.1 – 3.2 Disassembly Instructions!

To check whether the Water Indicator (1) has been activated (reddish color).

If activated:

Follow the 3.3 – 3.6 Disassembly instructions!

Carry out the replacement as described below.

Follow the 5.1 – 5.6 Reassembly instructions!

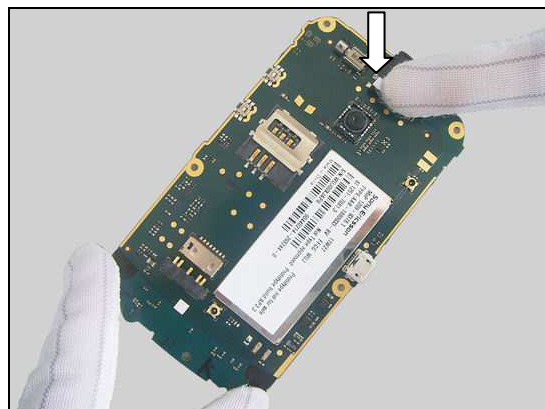
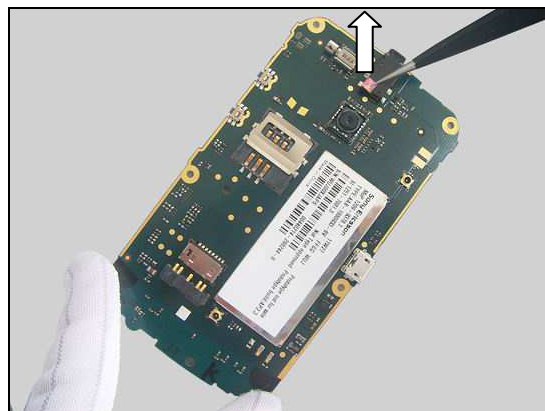
REMOVAL

Detach the activated Water Indicator off the Audio Jack by using the Tweezers.

INSTALLATION

Attach a new Water Indicator by using the Tweezers in alignment with the corner of the Audio Jack as shown.

Press to make it securely attached.



Replacement: Water Indicator

INSPECTION

Follow the 3.1-3.5 Disassembly Instructions!

To check whether the Water Indicator (2) has been activated (reddish color).

If activated:

Follow the 3.6 Disassembly instructions!

Carry out the replacement as described below.

Follow the 5.1 – 5.6 Reassembly instructions!

REMOVAL

Detach the activated Water Indicator from the Main PBA by using the Tweezers.

INSTALLATION

Attach a new Water Indicator in alignment with the printed square on the Main PBA by using the Tweezers as shown.

Press to make it securely attached.



Replacement

4.17 Camera

Follow the 3.1 – 3.6 Disassembly Instructions!

Prepare the new Camera.

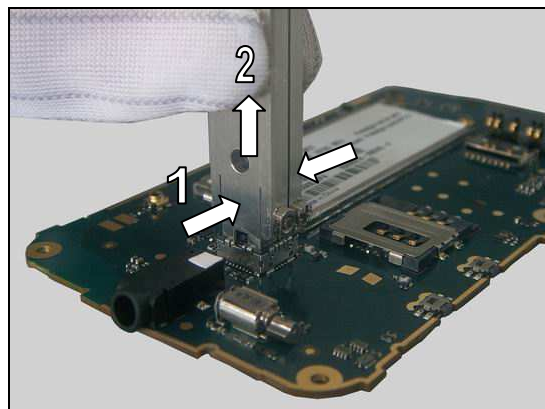
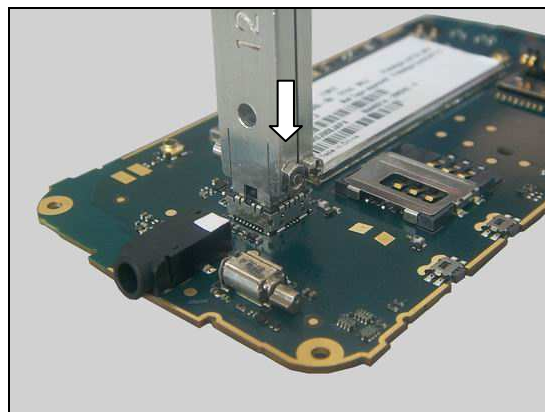
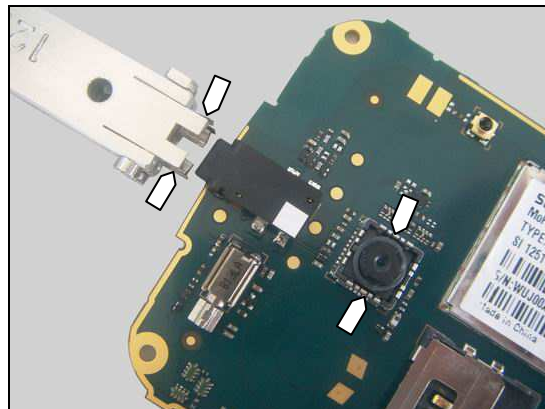
Follow the 5.1 – 5.6 Reassembly Instructions!

REMOVAL

Align the orientation of the blades on the Camera Removal Tool in relation to the position of the camera socket.

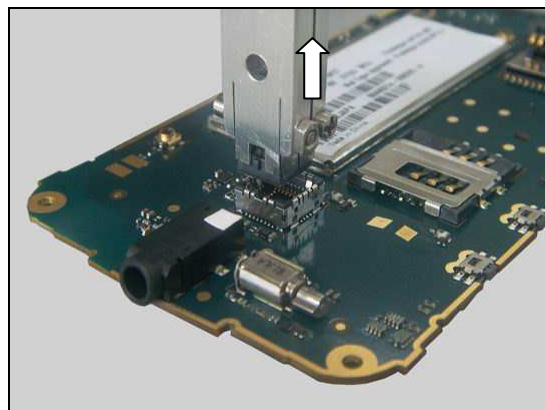
Insert the Camera Removal Tool into the camera socket as shown.

Grip (1) the Camera Removal Tool and lift (2) straight up to remove the Camera from its socket.



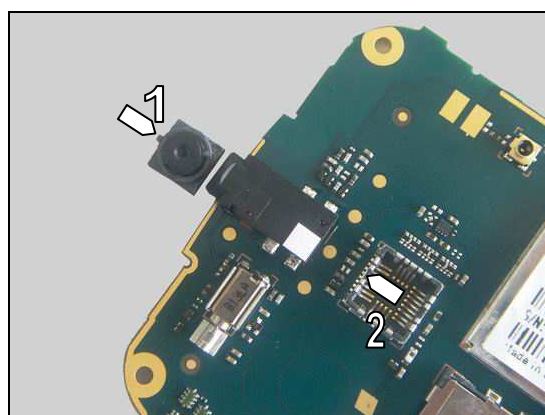
Replacement: Camera

Remove the Camera.

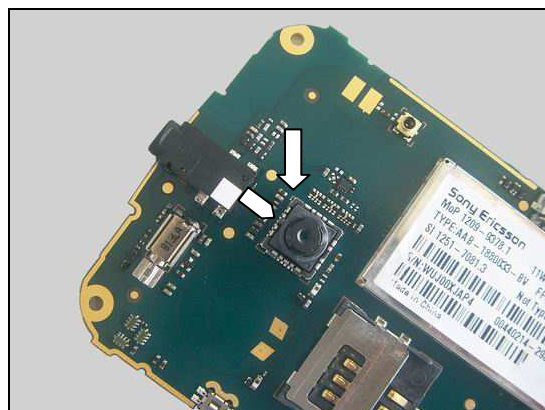


INSTALLATION

Make sure the orientation of the Camera and its socket: camera pin (1) into socket slot (2) when installing the Camera.

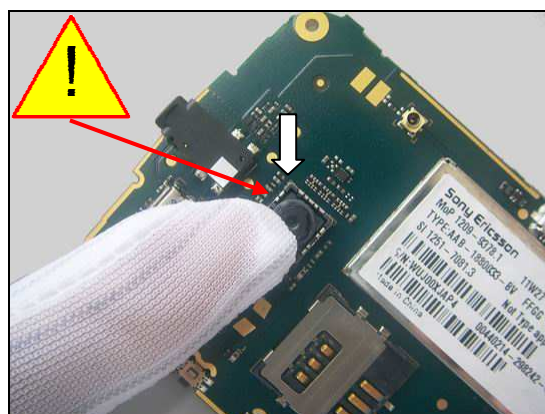


Mount the Camera into the socket.



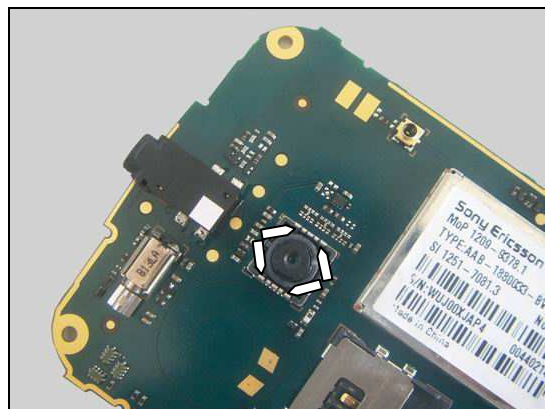
Press to secure the Camera to the bottom of the socket.

Do not touch the lens!



Replacement: Camera

Make sure the four spring pins are above the camera as pointers indicated in picture.



Replacement

4.18 Main Keypad Dome Sheet

Follow the 3.1 – 3.6 Disassembly instructions!

Prepare the new Main Keypad Dome Sheet.

Follow the 5.1 – 5.6 Reassembly instructions!

Main Keypad Dome Sheet cannot be reused!

REMOVAL

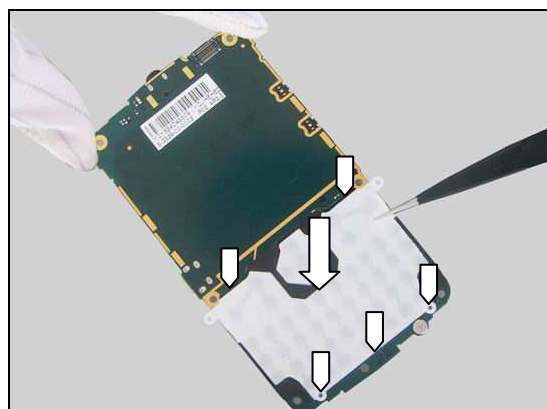
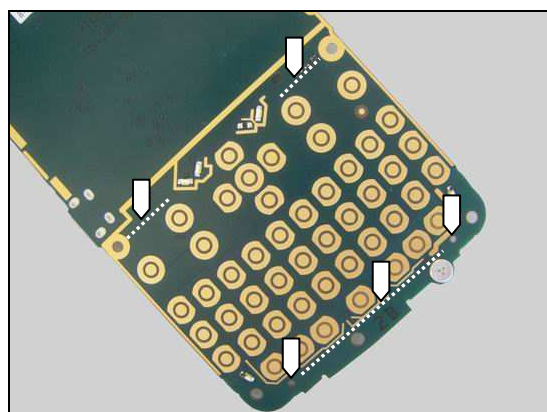
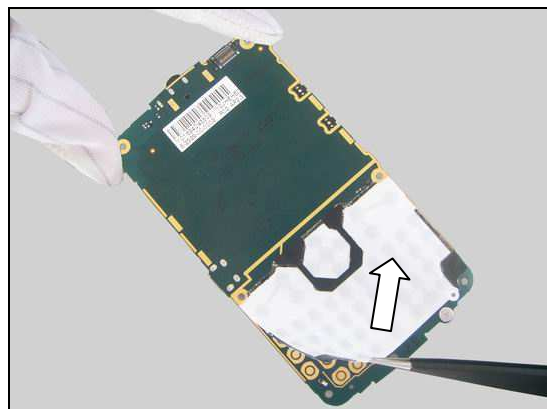
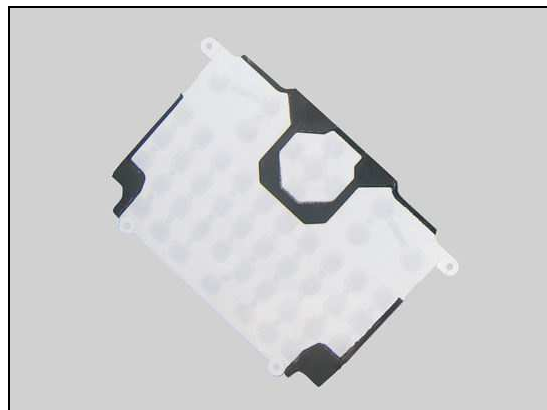
Detach the Main Keypad Dome Sheet from the Main PBA.

Be careful not to damage the parts on the Main PBA during the actions!

INSTALLATION

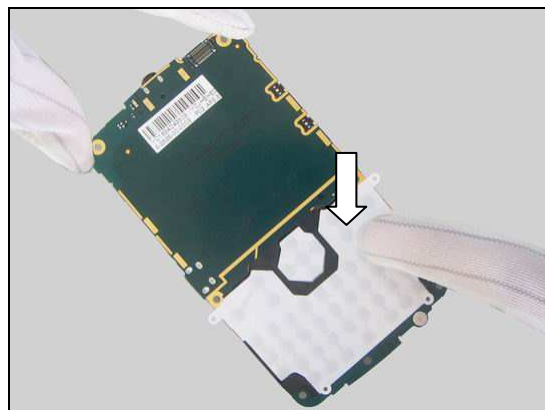
There are two guiding holes and three guiding lines on the Main PBA as shown.

Attach a new Main Keypad Dome Sheet in alignment with the guiding holes and guiding lines as shown.

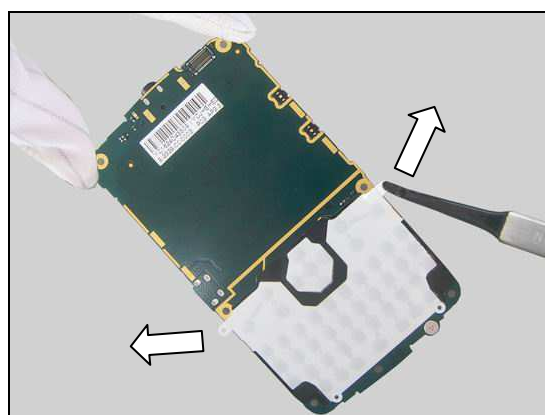


Replacement: Main Keypad Dome Sheet

Press back and forth to make it securely attached.



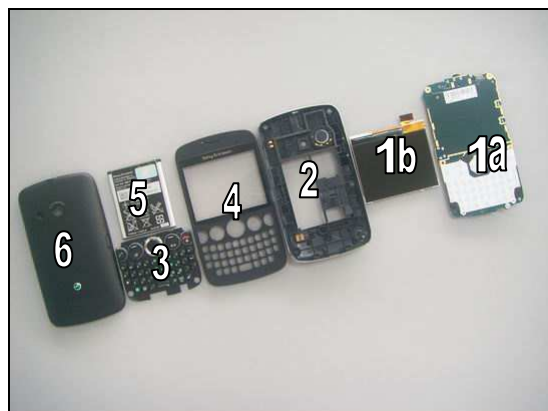
Tear off the two alignment tabs as shown.



5 Reassembly

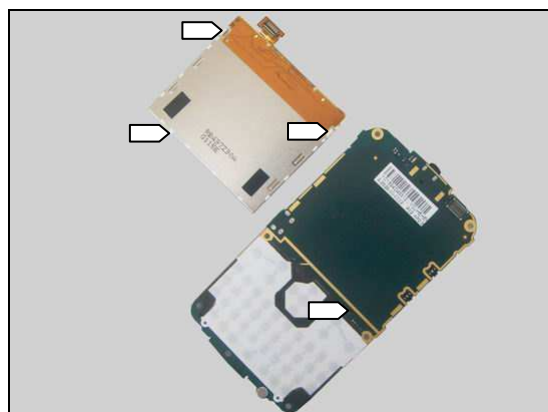
The Reassembly is done in the following order:

1. Main PBA (a) and Display (b)
2. Rear Cover Assy
3. QWERTY Keypad
4. Front Cover Assy
5. Battery
6. Battery Cover Assy

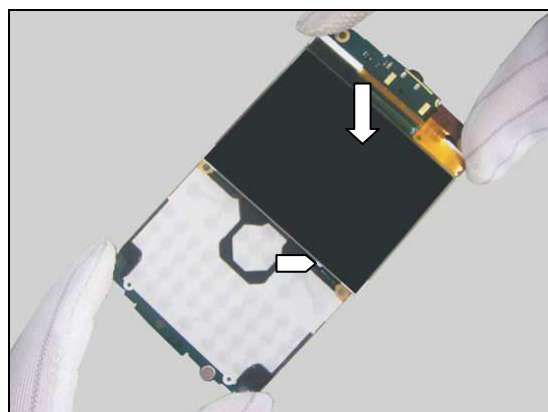


5.1 Main PBA and Display

Identify the two hooks and one guiding bolt on the Display and one guiding hole on the Main PBA as shown.

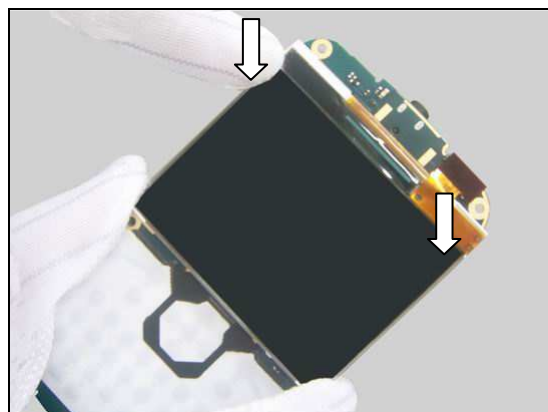


Align the guiding bolt with the guiding hole as shown.



Press to snap the two hooks of the Display.

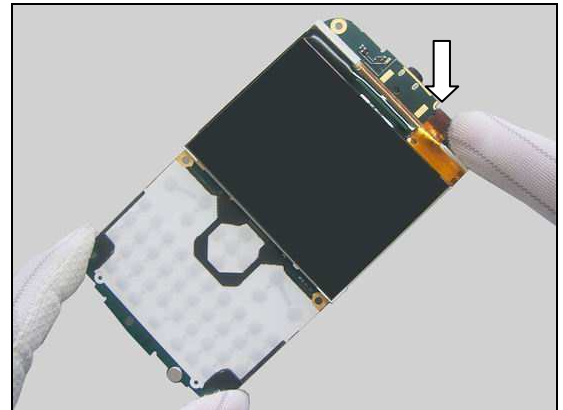
Do not touch the screen!





Reassembly

Press to snap the BtB connector by using finger.



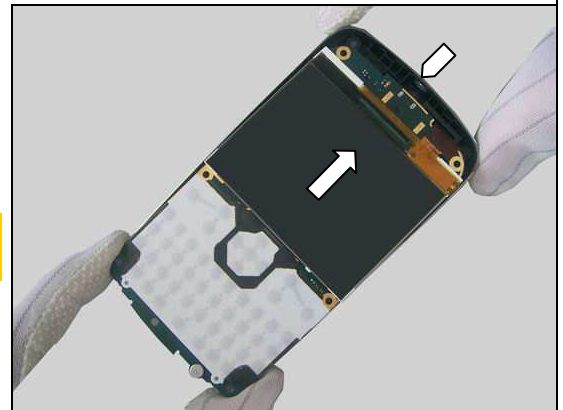
5.2 Rear Cover Assy

Prepare the Rear Cover Assy and Main PBA.

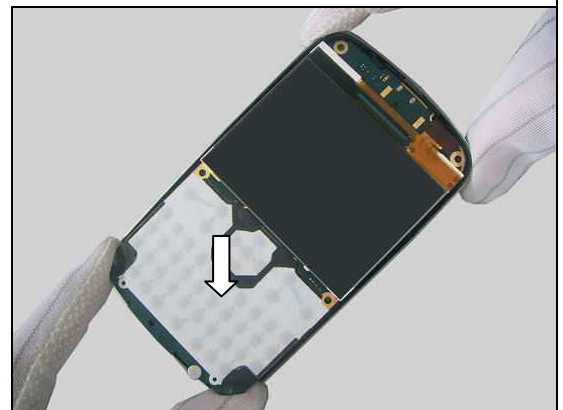


Hold the Main PBA at an angle of appropriated 30 degree and insert the top of it into the Rear Cover Assy as shown.

Make sure the Audio Jack is mounted into the outlet on the Rear Cover Assy before next action!



Place the Main PBA into the Rear Cover Assy.





Reassembly

Press on both sides of the Main PBA to snap the two hooks as shown.

Make sure the Micro USB Connector is mounted into the outlet of the Rear Cover Assy.



5.3 QWERTY Keypad

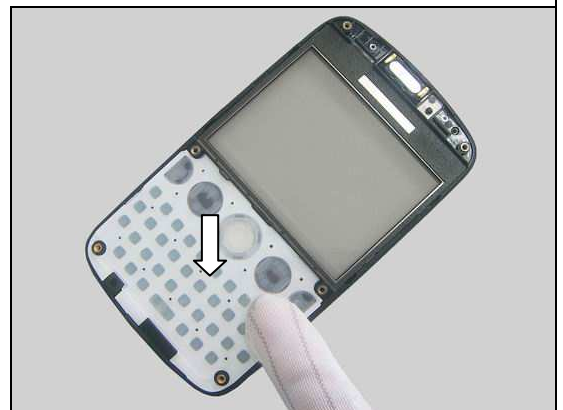
Identify the two guiding holes on the QWERTY Keypad as shown.



Mount the QWERTY Keypad by aligning the two guiding holes with the two screw nuts as shown.



Press on the QWERTY Keypad to secure its position.



Reassembly

5.4 Front Cover Assy

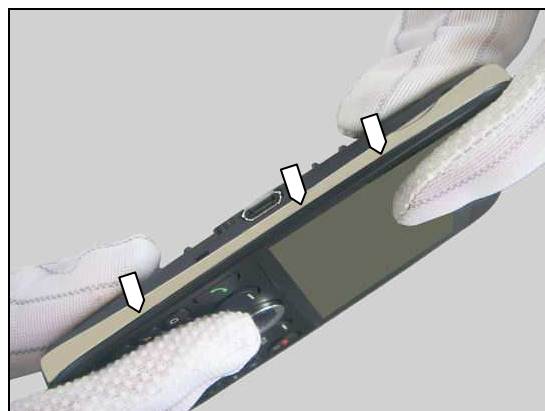
Prepare the two assemblies as shown.



Place the Front Cover Assy onto the Rear Cover Assy.



Press this side to snap the three hooks.

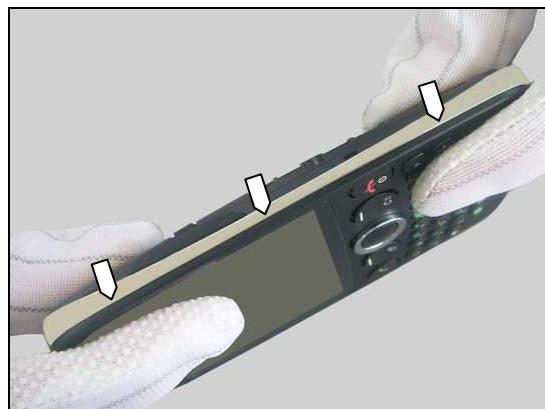


Press the top side to snap this hook.



Reassembly

Press this side to snap the three hooks.



Press the bottom side to snap this hook.



Tighten the six Screws (1.6mm*4.5mm) with the Torque Screwdriver by using T5 Bits to a torque of 10 ± 1 Ncm.



5.5 Battery

Insert the Battery into its cavity.



Reassembly

Press to secure its position.

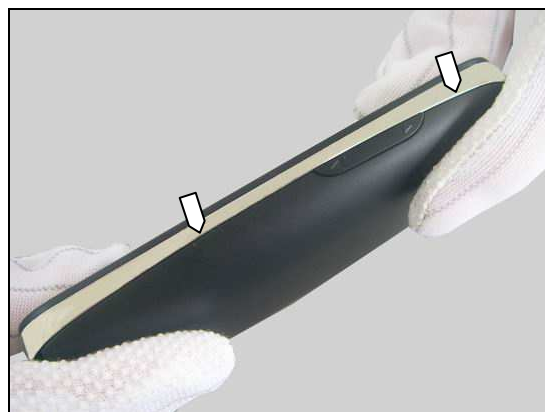


5.6 Battery Cover Assy

Place the Battery Cover Assy onto its proper position as shown



Press this side to snap the two hooks.



Press the top side to snap the two hooks.



Reassembly

Press this side to snap the two hooks.



Press the bottom side to snap the two hooks.



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6 Revision History

Rev.	Date	Changes / Comments
1	2011-Sept-09	Initial release