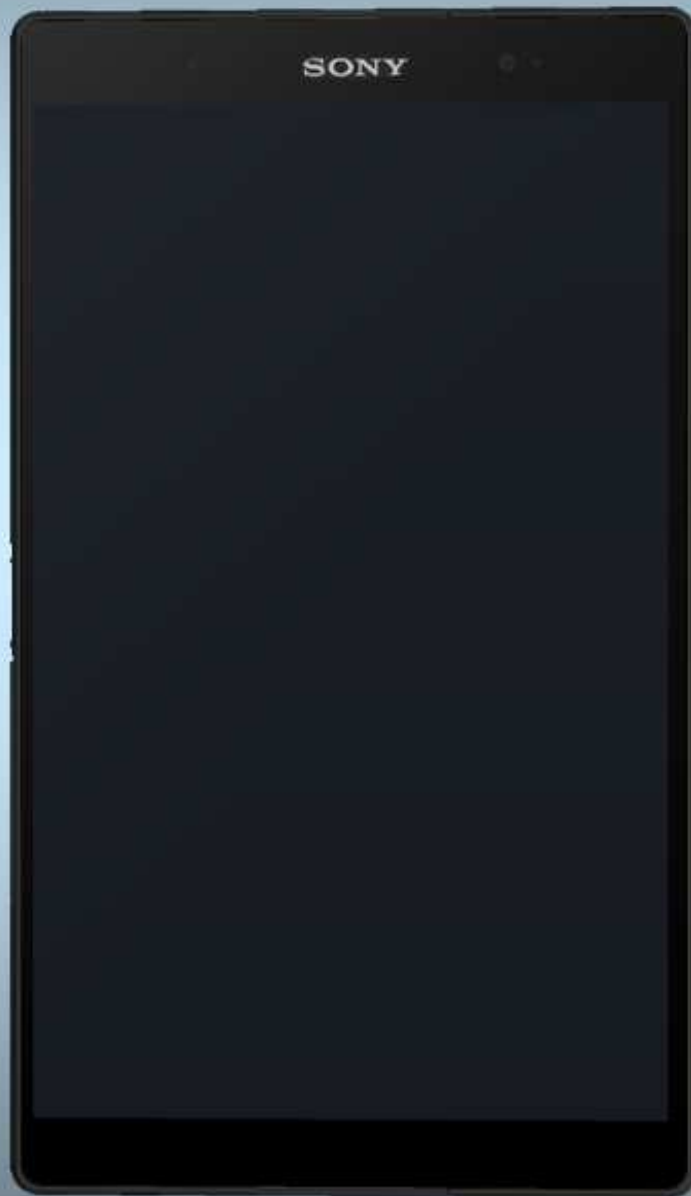


## Troubleshooting Guide

- mechanical -



*Xperia™ Z3 Tablet Compact*  
SGP611,SGP612,SGP621,SGP641

## CONTENTS

<b>1</b>	<b>Problem Areas .....</b>	<b>5</b>
1.1	Power .....	5
1.1.1	Will not power on or will switch off randomly.....	5
1.2	Keys .....	7
1.2.1	Back, Menu, Home and Multitask Keys .....	7
1.2.2	Volume Key .....	7
1.2.1	On/Off Key.....	9
1.3	Touch Screen .....	11
1.3.1	Touch Screen malfunction.....	11
1.4	Display .....	14
1.4.1	Graphics & Illumination .....	14
1.5	LED/Illumination.....	16
1.5.1	LED/Illumination .....	16
1.6	Bottom Speaker.....	18
1.6.1	Bottom Speaker .....	18
1.7	Top Speaker.....	20
1.7.1	Top Speaker .....	20
1.8	Microphone.....	22
1.8.1	Microphone .....	22
1.9	Vibrator .....	25
1.9.1	Vibrator not generating alerts .....	25
1.10	Camera.....	27
1.10.1	Main Camera .....	27
1.10.2	Video Call Camera defects.....	28
1.11	Bluetooth and WLAN .....	29
1.11.1	Bluetooth connection failure .....	29
1.11.2	WLAN connection failure .....	30
1.12	NFC .....	33
1.12.1	NFC malfunctions .....	33
1.13	GPS .....	34
1.13.1	GPS malfunctions.....	34
1.14	Compass.....	35
1.14.1	Compass fails .....	35
1.15	Accelerometer .....	36
1.15.1	Accelerometer test fails .....	36
1.16	Gyroscope .....	37
1.16.1	Gyroscope test fails .....	37
1.17	Ambient Light Sensor .....	38
1.17.1	Light Sensor malfunctions .....	38
1.18	Proximity Switch .....	40
1.18.1	Proximity switch malfunctions.....	40

<b>1.19 Pressure Sensor</b> .....	<b>41</b>
1.19.1 Pressure Sensor test fails.....	41
<b>1.20 Water Resistance</b> .....	<b>42</b>
1.20.1 Water Resistance fails.....	42
<b>1.21 Real Time Clock</b> .....	<b>48</b>
1.21.1 Real time clock test fails .....	48
<b>1.22 Total call time</b> .....	<b>49</b>
1.22.1 Total call time fails .....	49
<b>1.23 External Memory</b> .....	<b>50</b>
1.23.1 Memory Card not detected .....	50
<b>1.24 Security</b> .....	<b>51</b>
1.24.1 Security fails .....	51
<b>1.25 FM Radio</b> .....	<b>52</b>
1.25.1 No/Poor FM Radio reception .....	52
<b>1.26 Verify Certificates</b> .....	<b>53</b>
1.26.1 Verify Certificates fails.....	53
<b>1.27 TV-Out Test</b> .....	<b>54</b>
1.27.1 TV-Out test fails .....	54
<b>1.28 Network &amp; Signal(SGP621 and SGP641 specific)</b> .....	<b>55</b>
1.28.1 No/Poor signal .....	55
<b>1.29 SIM (SGP621 and SGP641 specific)</b> .....	<b>57</b>
1.29.1 SIM not detected.....	57
1.29.2 Incorrect UIM or SIM indicated .....	57
<b>1.30 Charging</b> .....	<b>58</b>
1.30.1 Battery will not charge by USB connector .....	58
1.30.2 Battery will not charge by charge pad .....	58
<b>1.31 HandsFree by Wire</b> .....	<b>61</b>
1.31.1 Connection to portable Handsfree fails.....	61
<b>1.32 Data Communication</b> .....	<b>62</b>
1.32.1 Data transfer via System Connector fails.....	62
<b>2 Revision History</b> .....	<b>63</b>

***Always firstly disconnect the Battery wire connectors to cut off power supply when the Display is disassembled.***

***Always finally connect the Battery wire connectors after the Display is connected.***

***Note: Noise Cancelling Calibration always must be performed when FPC JK Flex module replacement or Board Swap; 1289-2983 Sony Mobile Repair Application-mechanical.***

***Note: Gyroscope and Accelerometer Calibration always must be performed when Board Swap or wrong Gyroscope or Accelerometer readouts; 1289-2983 Sony Mobile Repair Application-mechanical.***

***Note: Proximity Calibration always must be performed when Board Swap or proximity malfunctions; 1289-2983 Sony Mobile Repair Application-mechanical.***

## 1 Problem Areas

### 1.1 Power

#### 1.1.1 Will not power on or will switch off randomly

**Check:**

Check whether the phone vibrates by pressing the on/off key.

**Action:**

1. If activation of the vibrator is detected, refer to section 1.4 'Display'.

2. If NO activation of the Vibrator is detected, check that the battery is charging when connected to a charger.

**Follow Test Instruction - mechanical (Charging via USB and Easy Charger), Diagnostic Battery / Charging status.**

**Check:**

Inspect the on/off key.

**Action:**

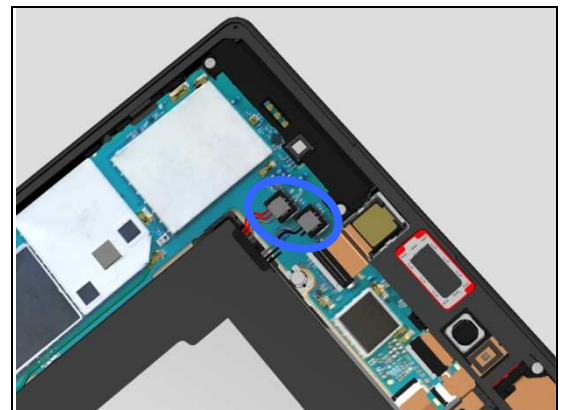
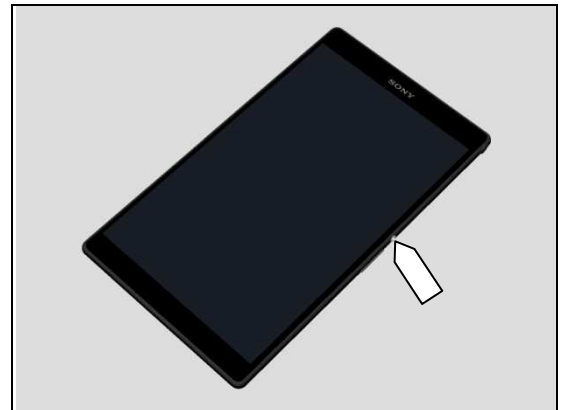
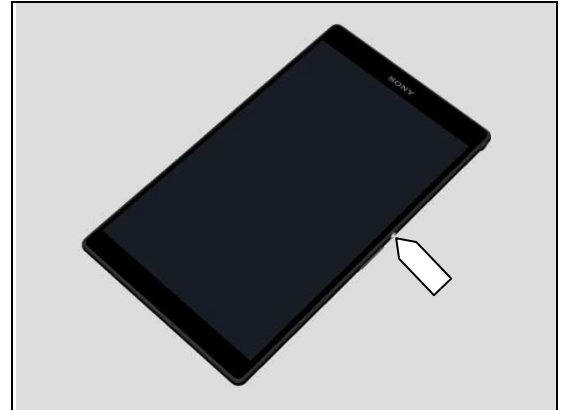
Refer to section 1.2.3 'On/Off Key'.

**Check:**

Inspect the BtB connectors of the Battery to Main PBA.

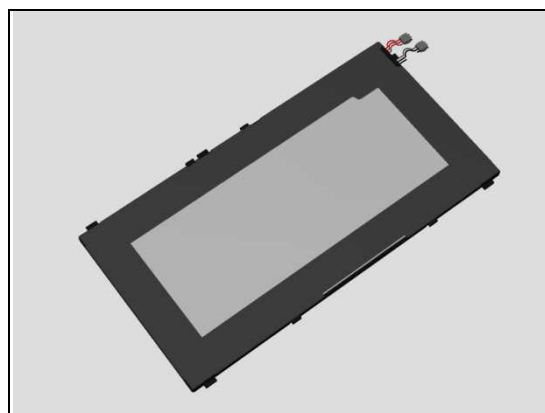
**Action:**

1. If not properly connected – disconnect and reconnect them.
2. If dirty or oxidized – clean them.



## Problem Areas: Power

3. If the BtB connectors, the Battery cables or the Battery is damaged – replace the Battery.
4. Replace Main PBA.



## Problem Areas

### 1.2 Keys

#### 1.2.1 Back, Menu, Home and Multitask Keys

**Action:**

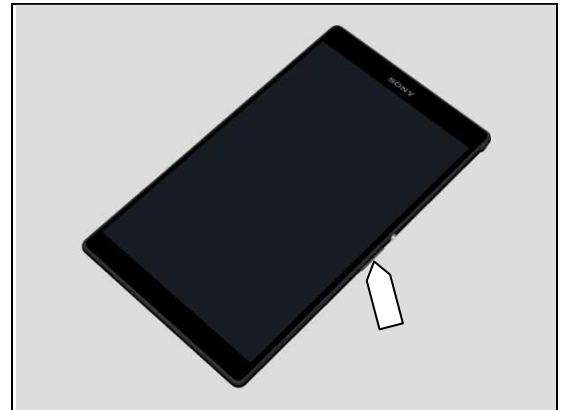
1. Refer to section 1.3 'Touch Screen'.
2. Replace Main PBA.



#### 1.2.2 Volume Key

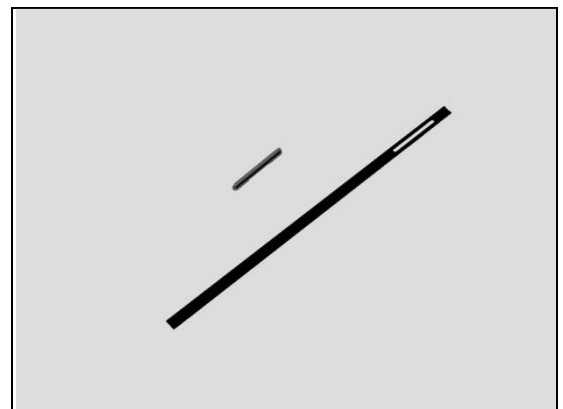
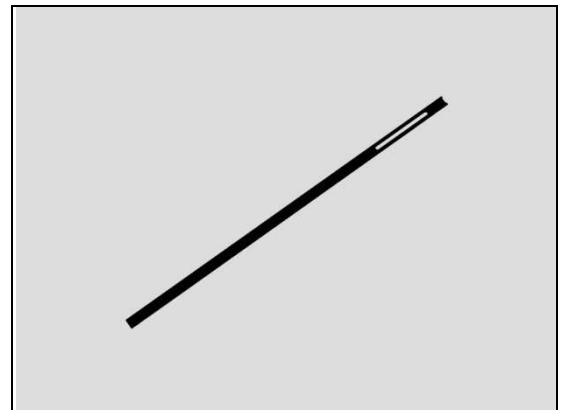
**Check:**

Inspect the Key Volume.



**Action:**

1. If not assembled well – reassemble it and replace the Panel Right Bottom.
2. If damaged– replace the Key Volume and Panel Right Bottom.



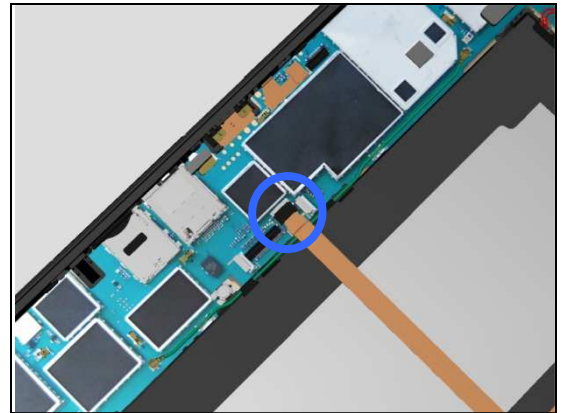
## Problem Areas: Keys

### Check:

Inspect the ZIF connector of Key Flex module to Main PBA.

### Action:

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



3. If the FPC of Key Flex module is damaged – replace the Key Flex module.
4. Replace Main PBA.

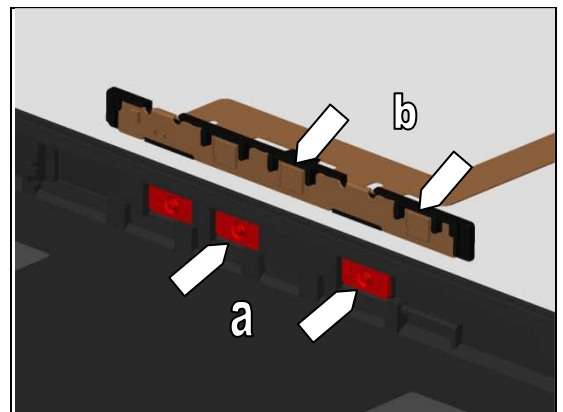


### Check:

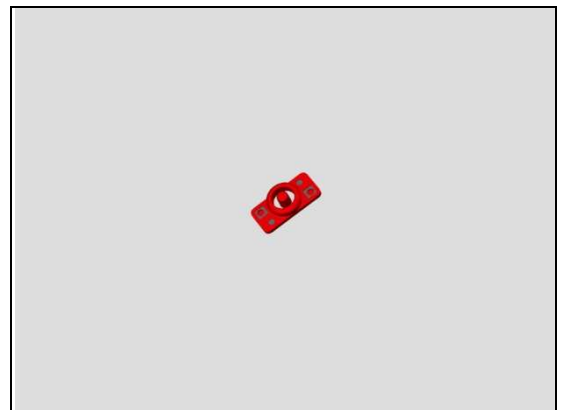
Inspect the Key Gasket of the Volume Key (a) and Volume Key switch (b).

### Action:

1. If dirty – clean them.



2. If the Key Gasket of the Volume Key is damaged or not assembled well – replace the Key Gasket.





## Problem Areas: Keys

3. If the volume key switch is damaged – replace the Key Flex module.

### 1.2.1 On/Off Key

**Check:**

Inspect the Key Power.

**Action:**

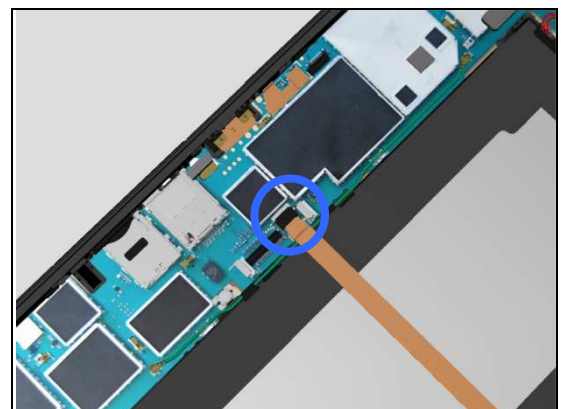
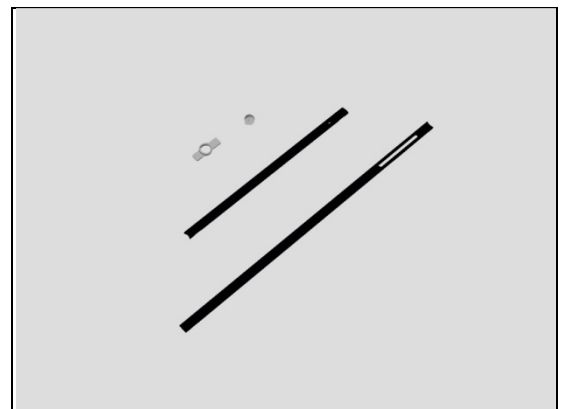
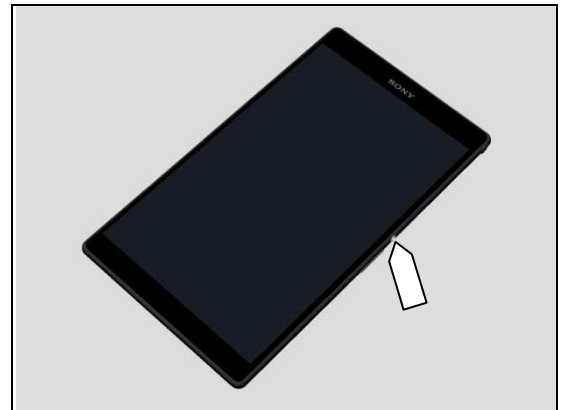
1. If not assembled well or damaged – replace the Key Power, Ring Key, Panel Right Bottom and Panel Right Top.

**Check:**

Inspect the ZIF connector of Key Flex module to Main PBA.

**Action:**

1. If not properly connected – disconnect and reconnect it.  
2. If dirty or oxidized – clean it.



## Problem Areas: Keys

3. If the FPC of Key Flex module is damaged – replace the Key Flex module.
4. Replace Main PBA.

### Check:

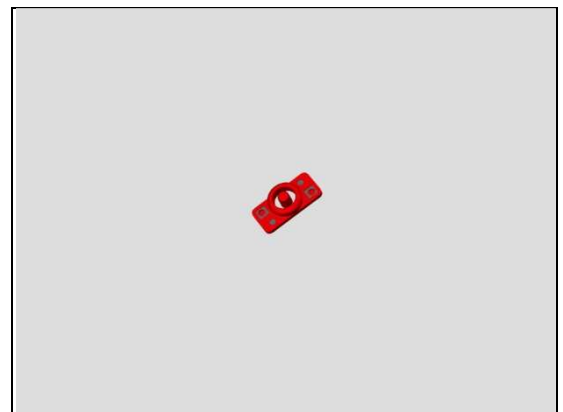
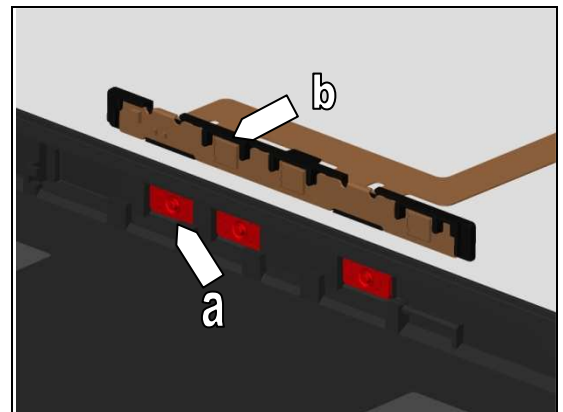
Inspect the Key Gasket of the Power Key (a) and Power Key switch (b).

### Action:

1. If dirty – clean them.

2. If the Key Gasket of the Power Key is damaged or not assembled well – replace the Key Gasket.

3. If the power key switch is damaged – replace the Key Flex module.



## Problem Areas

### 1.3 Touch Screen

#### 1.3.1 Touch Screen malfunction

**Check:**

Inspect the touch screen of the Display.

**Action:**

1. If dirty – clean it.

2. If scratched or damaged – replace the Display.

**Check:**

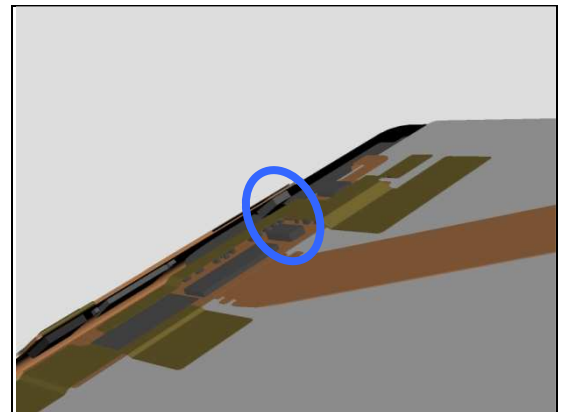
Inspect the BtB connector of touch panel FPC to LCD FPC.

**Action:**

1. If not properly connected – disconnect and reconnect it.

2. If dirty or oxidized – clean it.

3. If the BtB connector or FPC of both touch panel and LCD FPC is damaged – replace the Display.



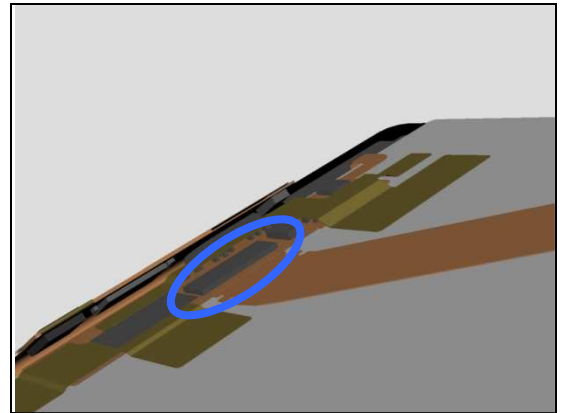
## Problem Areas: Touch Screen

### Check:

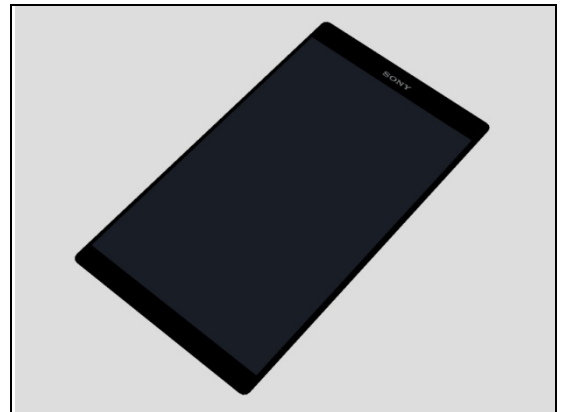
Inspect the ZIF connector of LCD FPC to FPC Relay Flex module.

### Action:

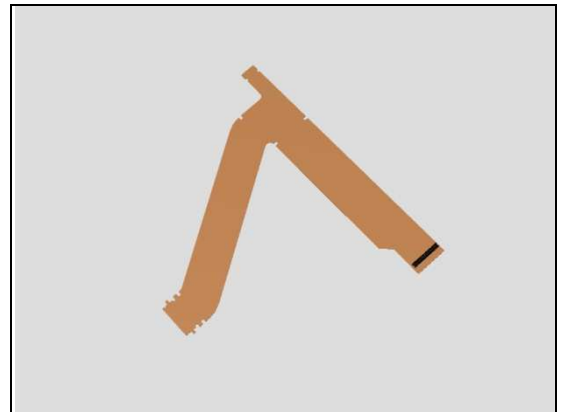
1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



3. If the ZIF connector of LCD FPC or FPC is damaged – replace the Display.



4. If the FPC Relay Flex module is damaged – replace it.

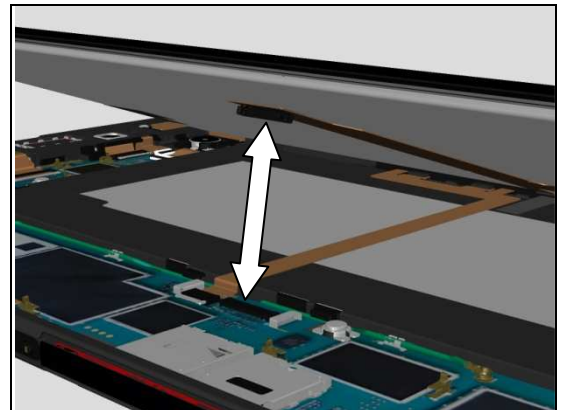


### Check:

Inspect the BtB connector of FPC Relay Flex module to Main PBA.

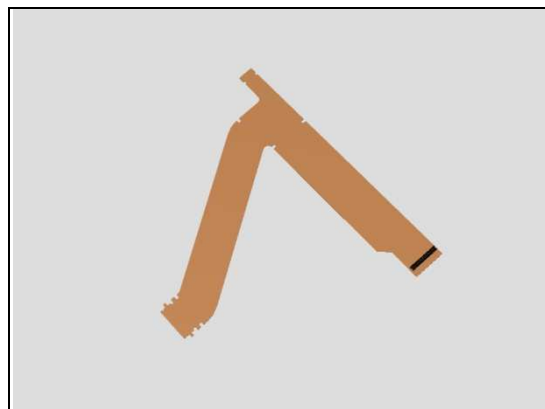
### Action:

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



## Problem Areas: Touch Screen

3. If the FPC Relay Flex module is damaged – replace it.
4. Replace Main PBA.



## Problem Areas

### 1.4 Display

#### 1.4.1 Graphics & Illumination

**Check:**

Check whether the phone vibrates after the on/off key has been pressed.

**Action:**

If the activation described above is not detected, refer to section 1.1 'Power'.

**Check:**

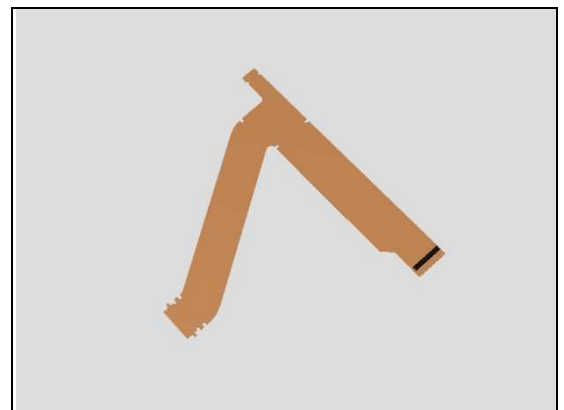
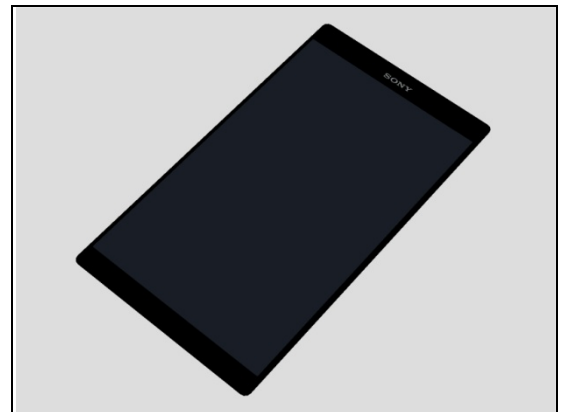
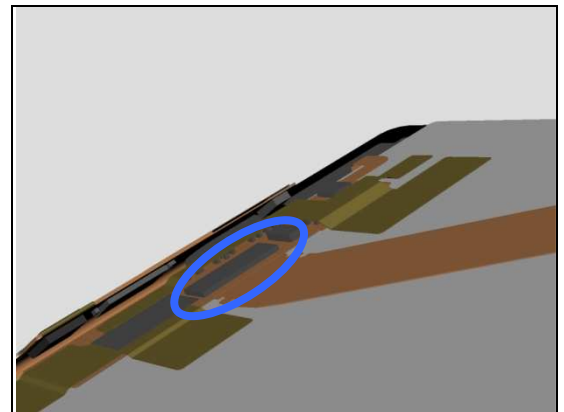
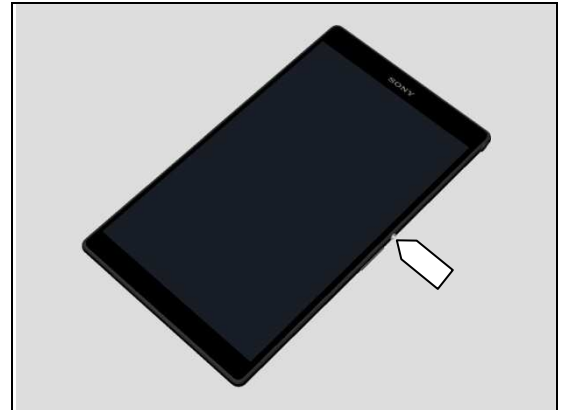
Inspect the ZIF connector of LCD FPC to FPC Relay Flex module.

**Action:**

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.

3. If the ZIF connector of LCD FPC or FPC is damaged – replace the Display.

4. If the FPC Relay Flex module is damaged – replace it.



## Problem Areas: Display

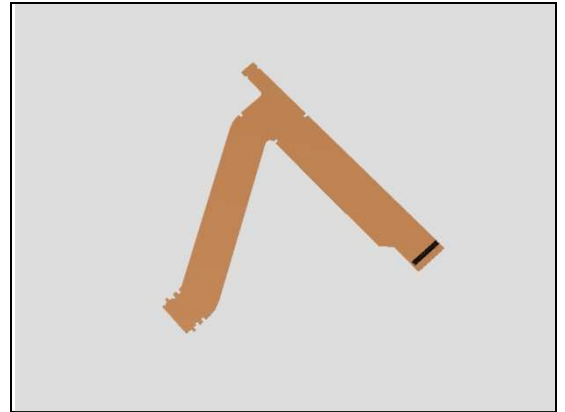
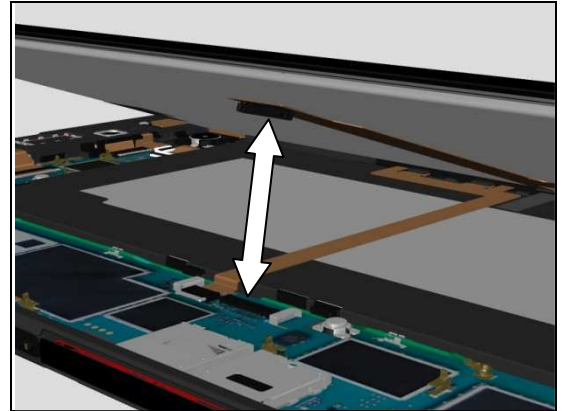
### Check:

Inspect the BtB connector of FPC Relay Flex module to Main PBA.

### Action:

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.

3. If the FPC Relay Flex module is damaged – replace it.
4. Replace Main PBA.



## Problem Areas

### 1.5 LED/Illumination

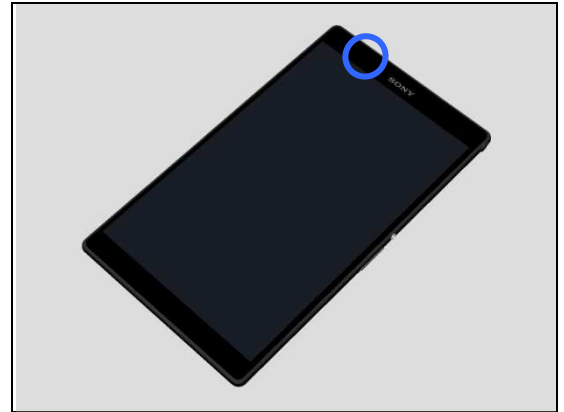
#### 1.5.1 LED/Illumination

**Check:**

Inspect external port of LED on the Display.

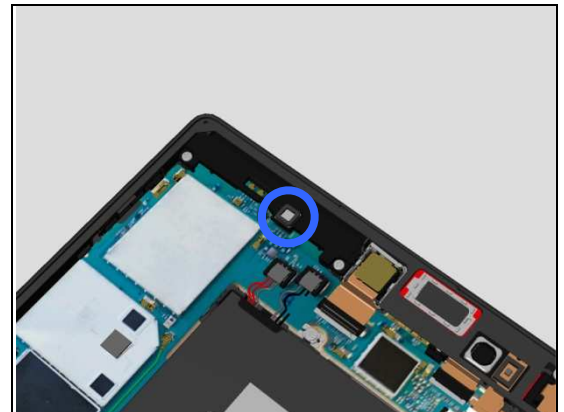
**Action:**

1. If dirty – clean it.



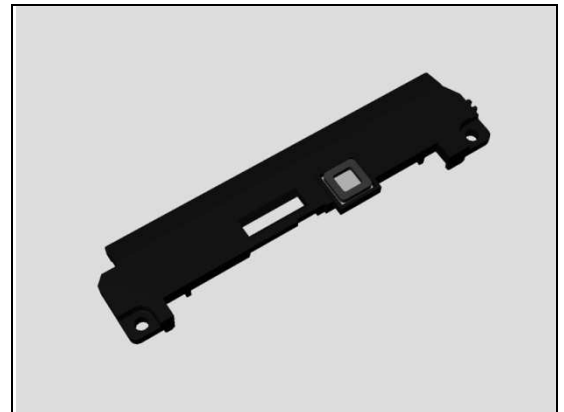
**Check:**

Inspect the LED cushion sheet on the Antenna Main.



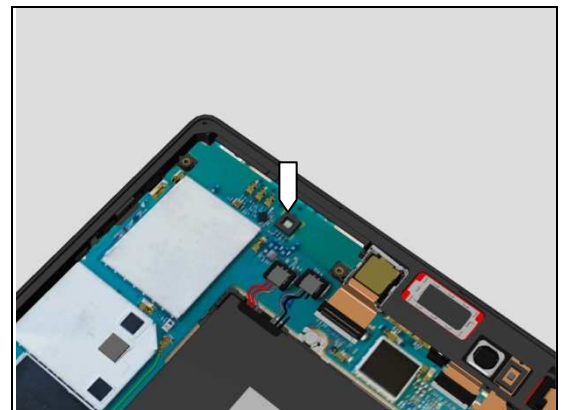
**Action:**

1. If damaged – replace the Antenna Main.



**Check:**

Inspect the Cushion LED on the Main PBA.

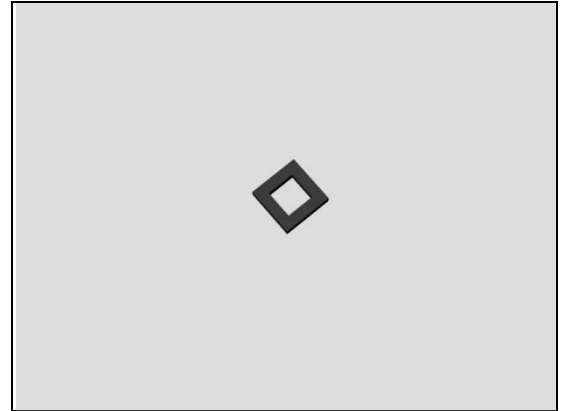




## Problem Areas: LED/Illumination

**Action:**

1. If damaged – Replace Cushion LED.

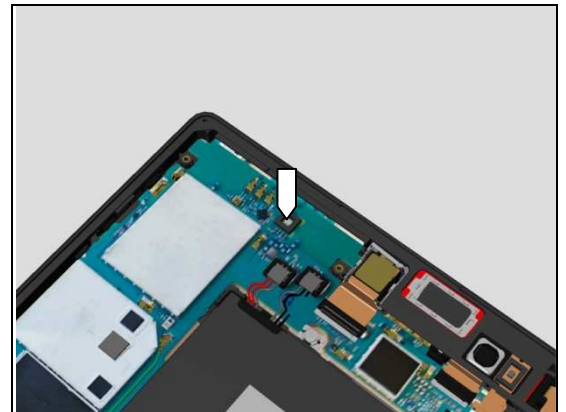


**Check:**

Inspect the LED on the Main PBA.

**Action:**

1. If dirty – clean it.
2. If damaged – replace Main PBA.



## Problem Areas

### 1.6 Bottom Speaker

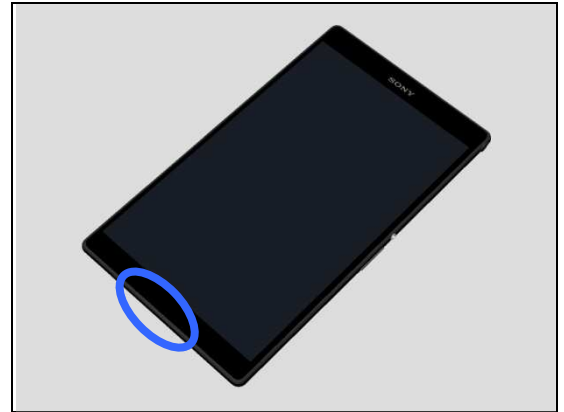
#### 1.6.1 Bottom Speaker

**Check:**

Inspect the bottom speaker's external port.

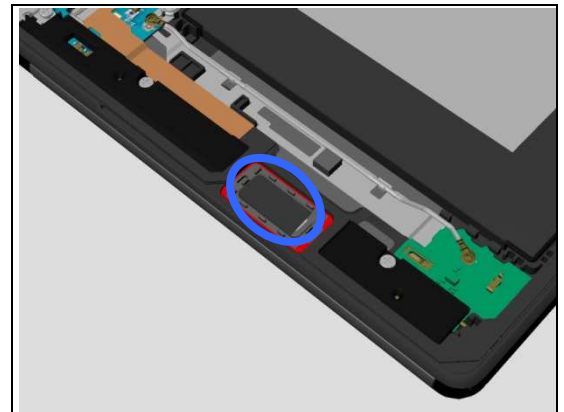
**Action:**

1. If clogged – clean it.



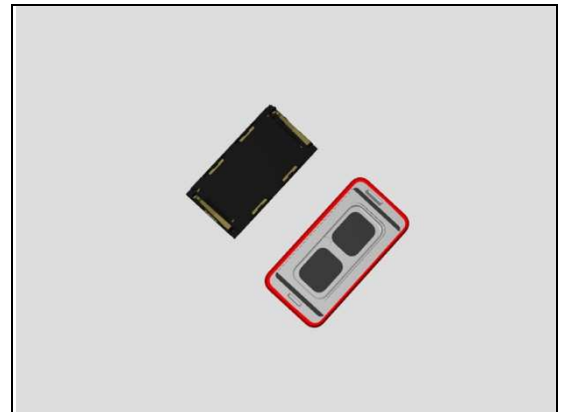
**Check:**

Inspect the net of the bottom speaker on the Gasket SP Sub Assy.



**Action:**

1. If dirty or damaged – replace the Top Speaker and Gasket SP Sub Assy.

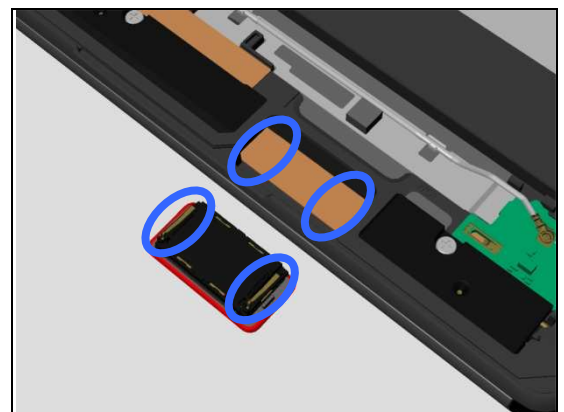


**Check:**

Inspect the contact pins on the Speaker and the contact pads on the FPC Bottom Spk Flex.

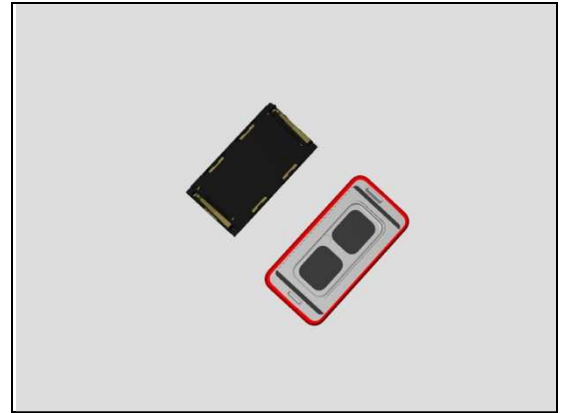
**Action:**

1. If dirty – clean them.

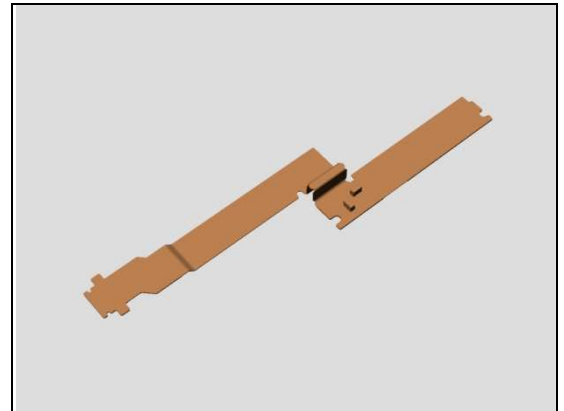


## Problem Areas: Bottom Speaker

2. If the contact pins of the Speaker or the Speaker are damaged – replace the Top Speaker and Gasket SP Sub Assy.



3. If the contact pads of the FPC Bottom Spk Flex are damaged – replace the FPC Bottom Spk Flex.



### Check:

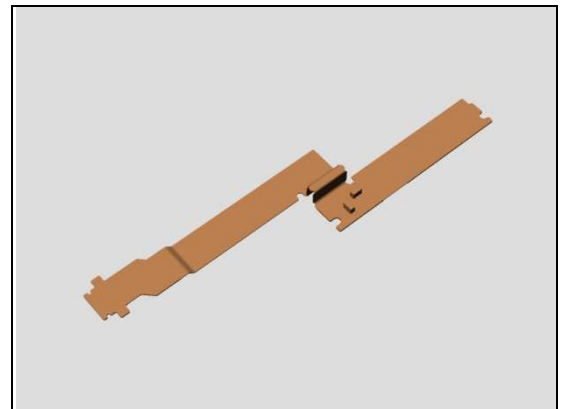
Inspect the ZIF connector of FPC Bottom Spk Flex to Main PBA.

### Action:

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



3. If the FPC of FPC Bottom Spk Flex is damaged – replace the FPC Bottom Spk Flex.
4. Replace Main PBA.



## Problem Areas

### 1.7 Top Speaker

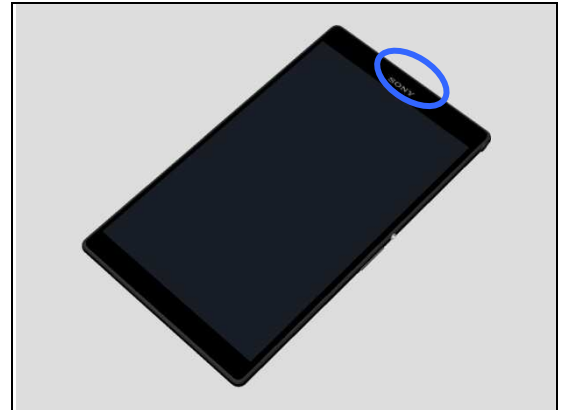
#### 1.7.1 Top Speaker

**Check:**

Inspect the external port of Top Speaker.

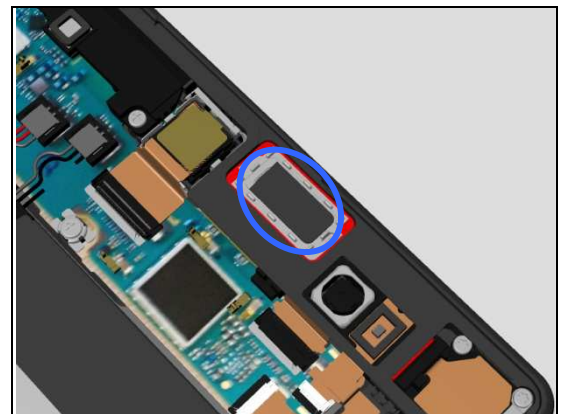
**Action:**

1. If clogged – clean it.



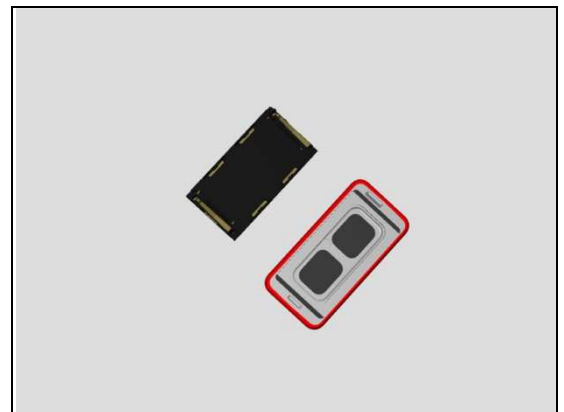
**Check:**

Inspect the net of the top speaker on the Gasket SP Sub Assy.



**Action:**

1. If dirty or damaged – replace the Top Speaker and Gasket SP Sub Assy.

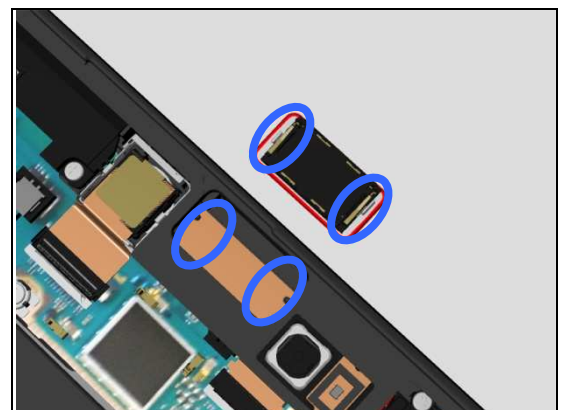


**Check:**

Inspect the contact pins on the Top Speaker and the contact pads on the FPC Top Spk Flex.

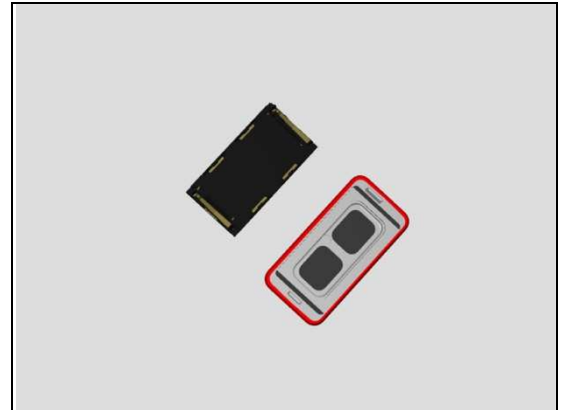
**Action:**

1. If dirty – clean them.

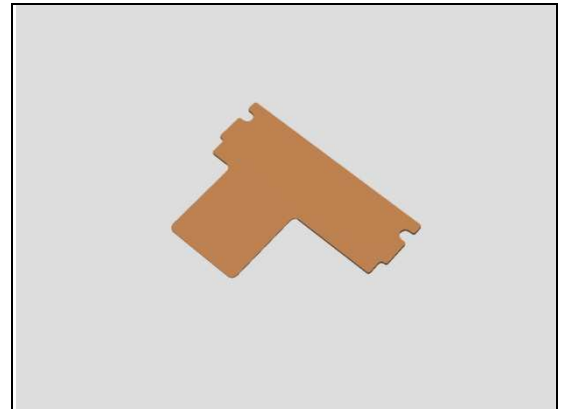


## Problem Areas: Top Speaker

2. If the contact pins of the Top Speaker or the Top Speaker are damaged – replace the Top Speaker and Gasket SP Sub assy.



3. If the contact pads of the FPC Top Spk Flex is damaged – replace the FPC Top Spk Flex.

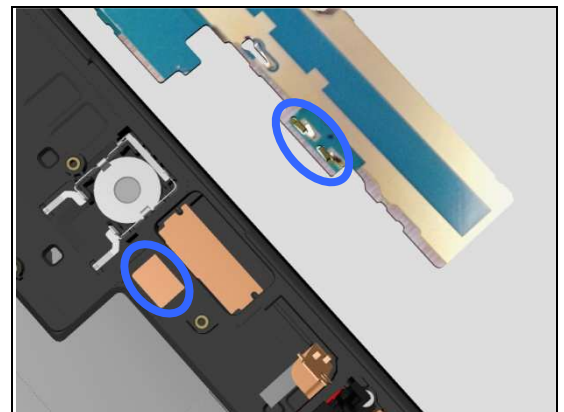


### Check:

Inspect the contact pads of FPC Top Spk Flex and the contact pins on the Main PBA.

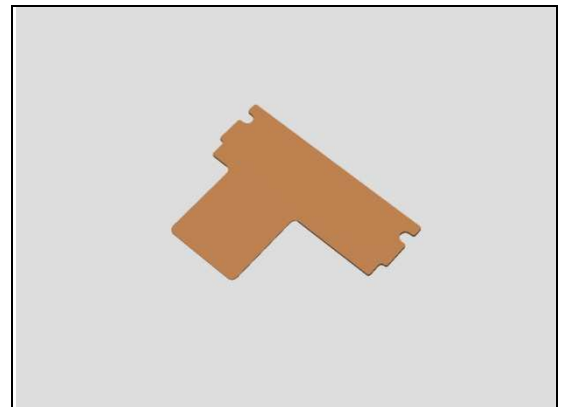
### Action:

1. If dirty – clean them.



2. If the contact pads of the FPC Top Spk Flex are damaged – replace the FPC Top Spk Flex.

3. If the contact pins on the Main PBA are damaged – replace Main PBA.



## Problem Areas

### 1.8 Microphone

#### 1.8.1 Microphone

**Check:**

Inspect the Microphone's external port.

**Action:**

1. If clogged – clean it.

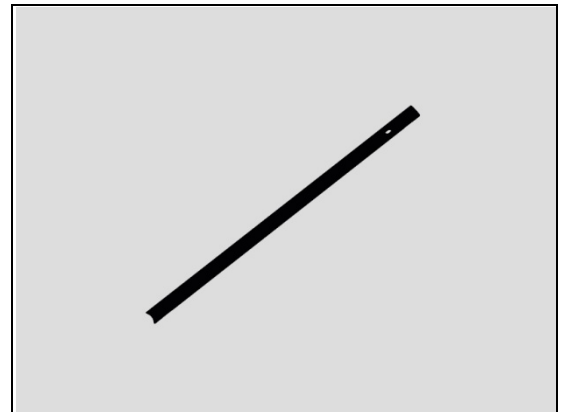
2. If Microphone's external port is damaged – replace the Panel Right Top.

**Check:**

Inspect the microphone sheet on the Main Cover.

**Action:**

1. If dirty or damaged – replace the Main Cover.



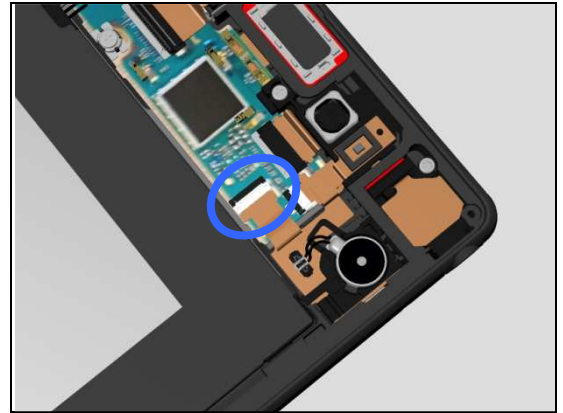
## Problem Areas: Microphone

### Check:

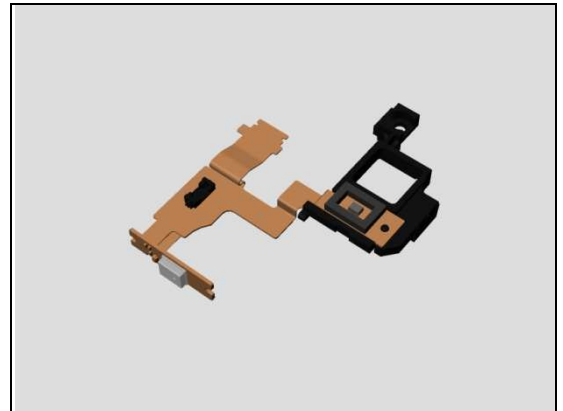
Inspect the ZIF connector of FPC Top Flex module to Main PBA.

### Action:

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.

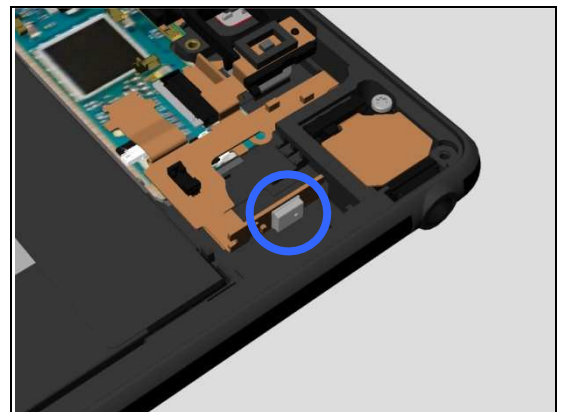


3. If the FPC of FPC Top Flex module is damaged – replace the FPC Top Flex module.
4. Replace Main PBA.



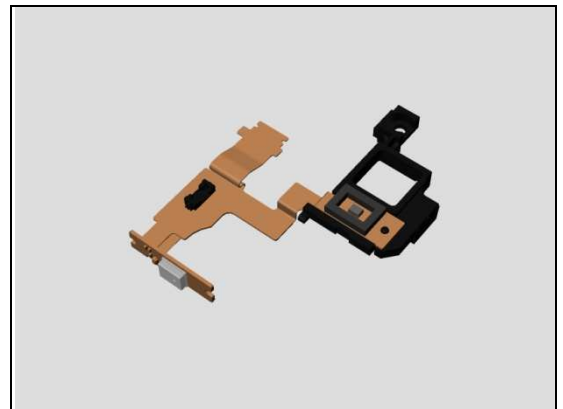
### Check:

Inspect the Microphone on the FPC Top Flex module.



### Action:

1. If damaged – replace the FPC Top Flex module.



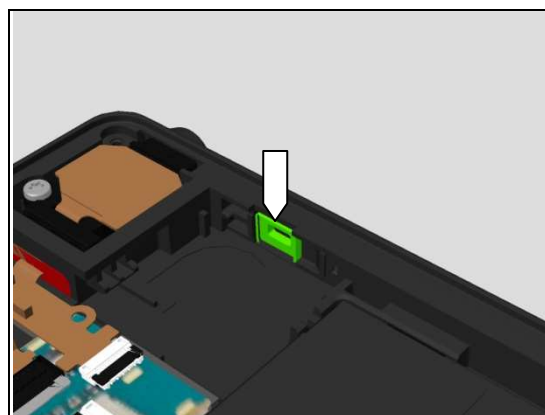
## Problem Areas: Microphone

### Check:

Inspect the microphone cushion on the Main Cover.

### Action:

1. If damaged – replace the Main Cover.





## Problem Areas

### 1.9 Vibrator

#### 1.9.1 Vibrator not generating alerts

**Check:**

Inspect the BtB connector of Vibrator to FPC Top Flex module.

**Action:**

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.

3. If the connector or cables of vibrator or vibrator itself is damaged – replace the Vibrator.

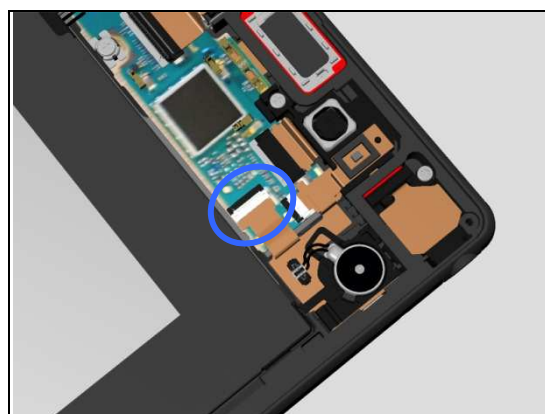
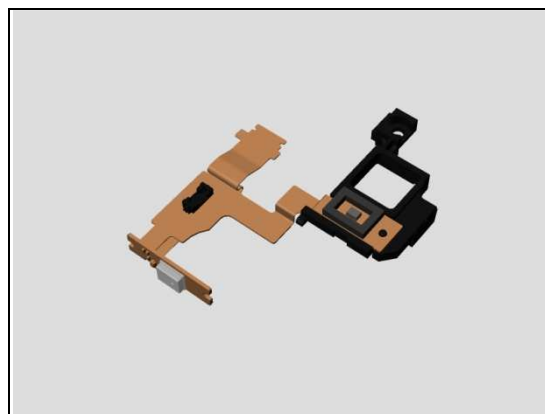
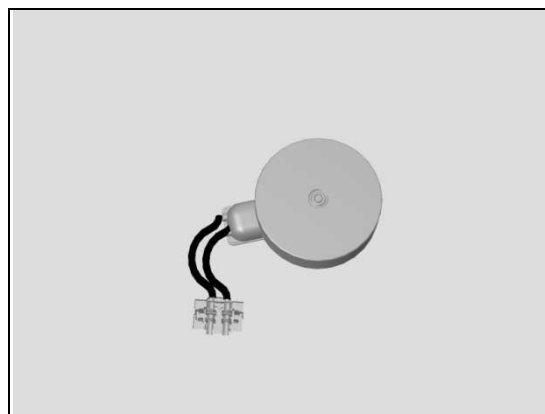
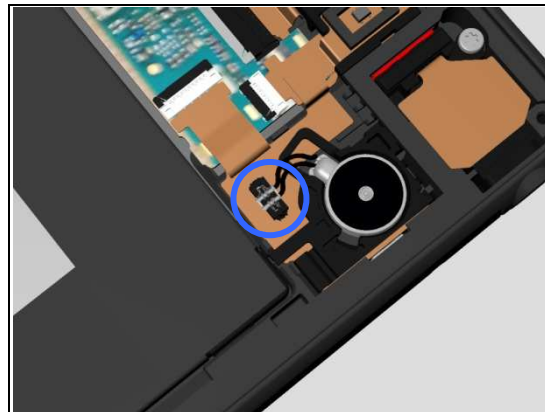
4. If the connector of vibrator on FPC Top Flex module is damaged – replace the FPC Top Flex module.

**Check:**

Inspect the ZIF connector of FPC Top Flex module to Main PBA.

**Action:**

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



## Problem Areas: Vibrator

3. If the FPC of FPC Top Flex module is damaged – replace the FPC Top Flex module.
4. Replace Main PBA.



## Problem Areas

### 1.10 Camera

#### 1.10.1 Main Camera

**Check:**

Inspect the external area of camera window.

**Action:**

1. If dirty – clean it.

2. If scratched or damaged – replace the Main Cover.

**Check:**

Inspect the ZIF connector of Main Camera to Main PBA.

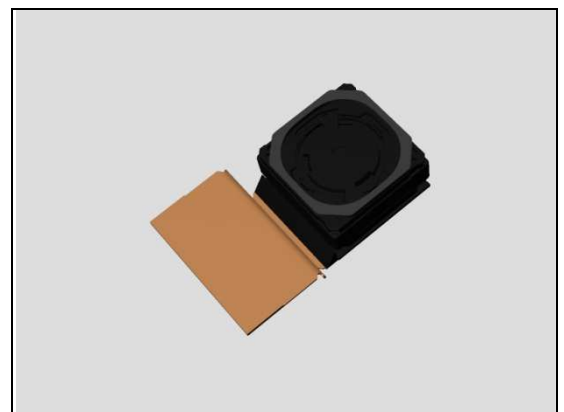
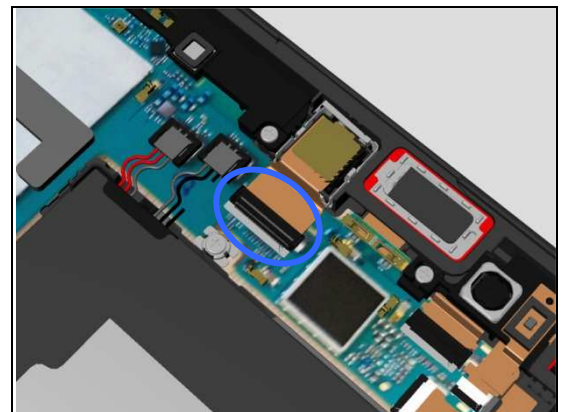
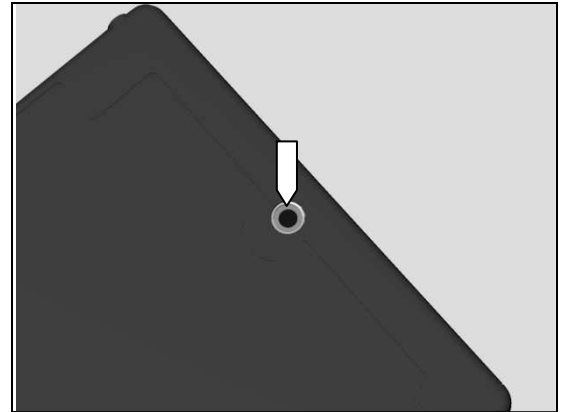
**Action:**

1. If not properly connected – disconnect and reconnect it.

2. If dirty or oxidized – clean it.

3. If the FPC of the Main Camera or Main Camera is damaged – replace the Main Camera.

4. If the ZIF connector on the Main PBA is damaged – replace Main PBA.



## Problem Areas: Camera

### 1.10.2 Video Call Camera defects

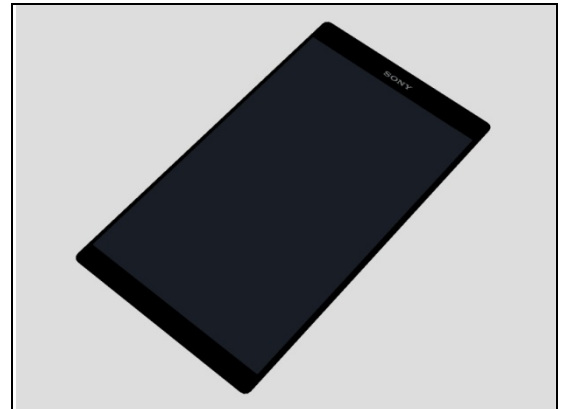
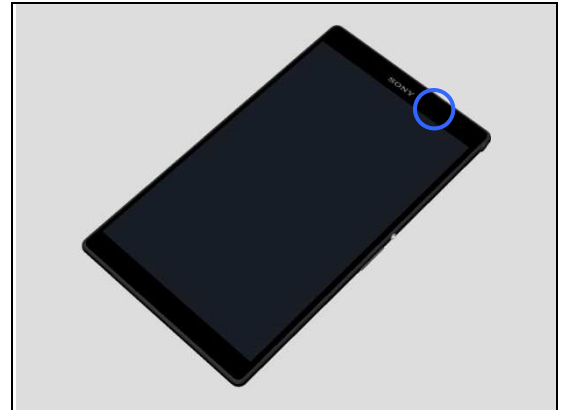
**Check:**

Inspect the external area of the video camera window.

**Action:**

1. If dirty – clean it.

2. If scratched or damaged – replace the Display.

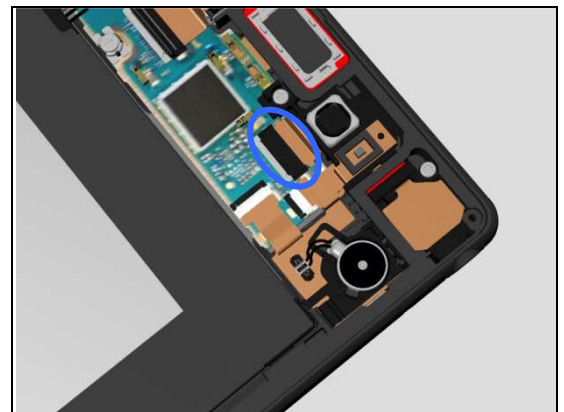


**Check:**

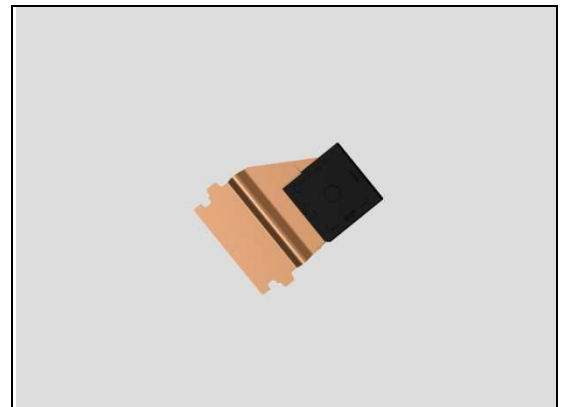
Inspect the ZIF connector of Chat Camera to the Main PBA.

**Action:**

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean the both sides of the ZIF connector.



3. If the FPC or the Chat Camera is damaged – replace the Chat Camera.
4. Replace Main PBA.



## Problem Areas

### 1.11 Bluetooth and WLAN

#### 1.11.1 Bluetooth connection failure

**Check:**

Inspect the BT contact pad on Antenna WLAN and the contact pin on Sub PBA.

**Action:**

1. If dirty or oxidized – clean the pad and pin.

2. If the BT contact pad on Antenna WLAN or Antenna WLAN is damaged – replace the Antenna WLAN.

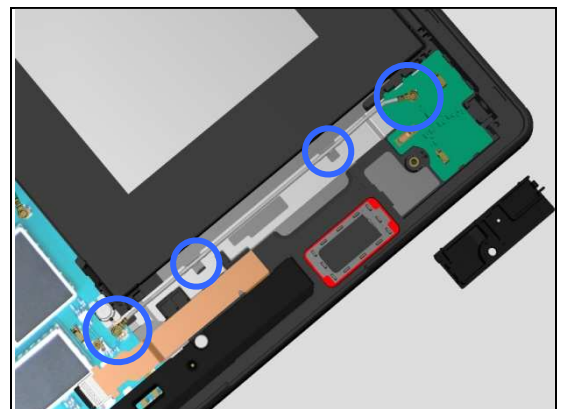
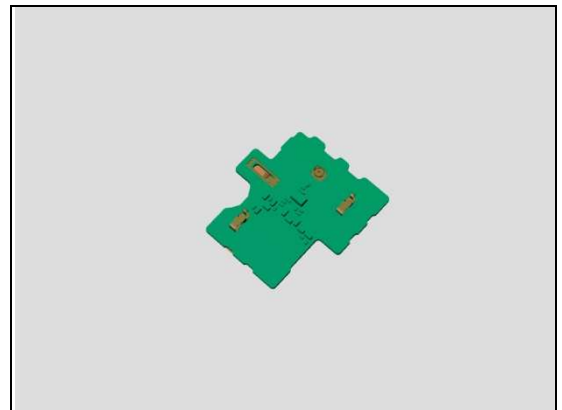
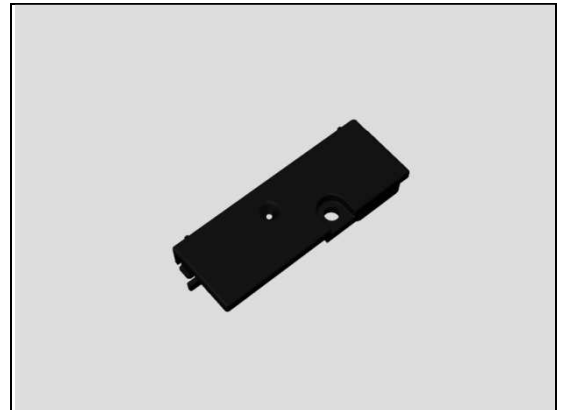
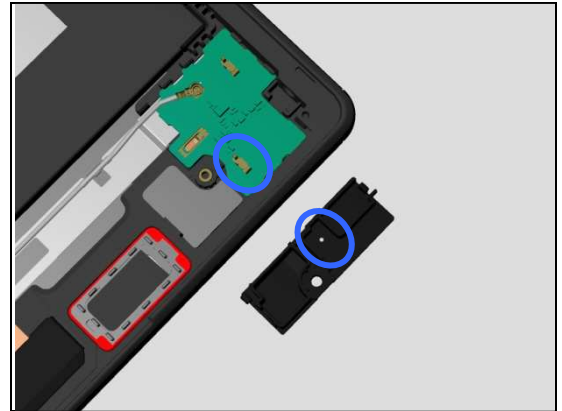
3. If the contact pin on Sub PBA is damaged – replace Sub PBA.

**Check:**

Inspect the RF Cable WLAN, both RF cable clips and the both RF connectors to Main PBA and Sub PBA.

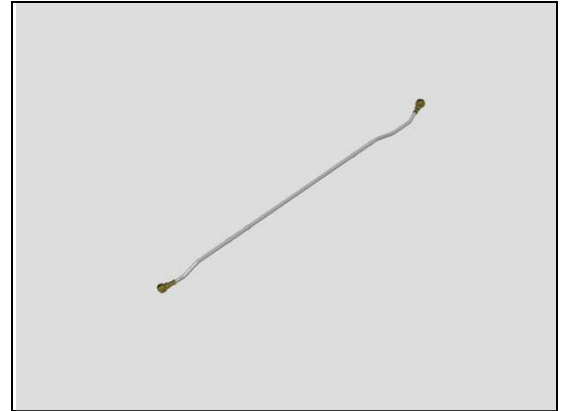
**Action:**

1. If not properly connected – disconnect and reconnect them.
2. If dirty or oxidized – clean them.



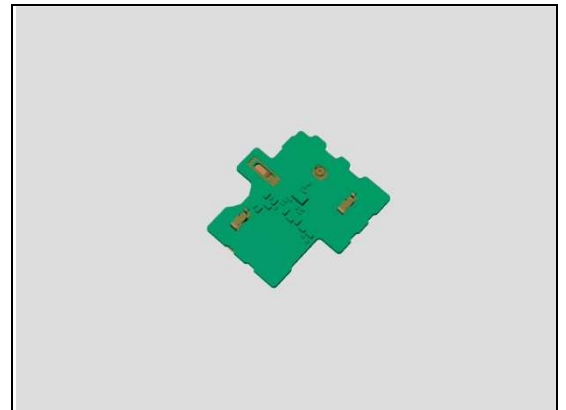
## Problem Areas: Bluetooth and WLAN

3. If RF Cable WLAN is damaged – replace it.



4. If the RF connector on the Sub PBA is damaged – replace the Sub PBA.

5. If the RF connector on the Main PBA is damaged – replace the Main PBA.



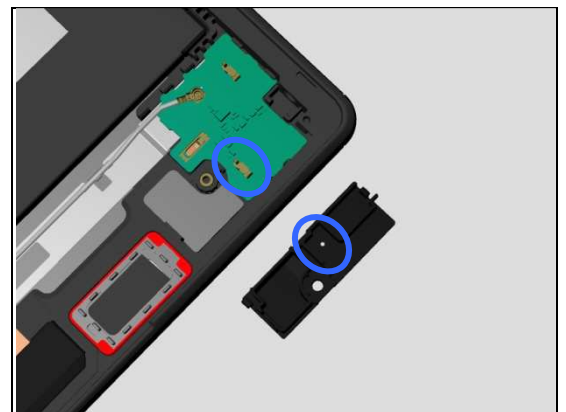
### 1.11.2 WLAN connection failure

#### Check:

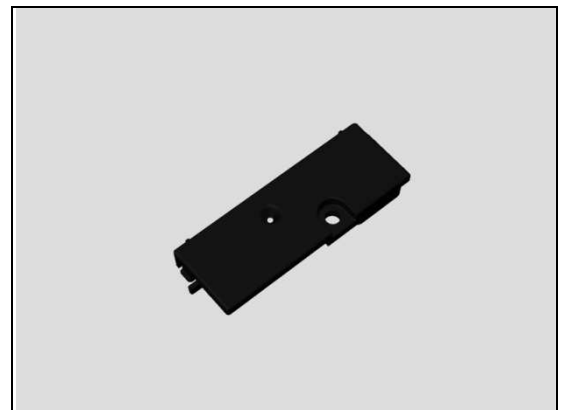
Inspect the WLAN contact pad on Antenna WLAN and the contact pin on Sub PBA.

#### Action:

1. If dirty or oxidized – clean the pad and pin.



2. If the WLAN contact pad on Antenna WLAN or Antenna WLAN is damaged – replace the Antenna WLAN.



## Problem Areas: Bluetooth and WLAN

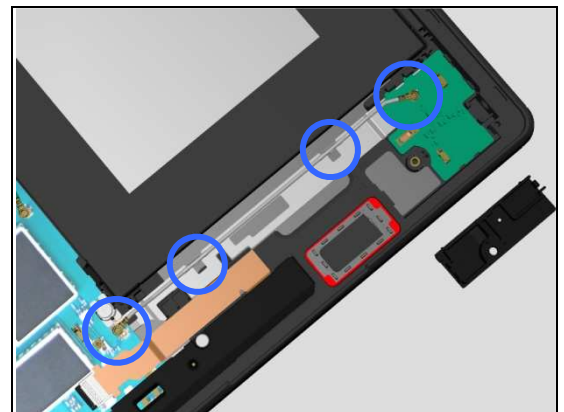
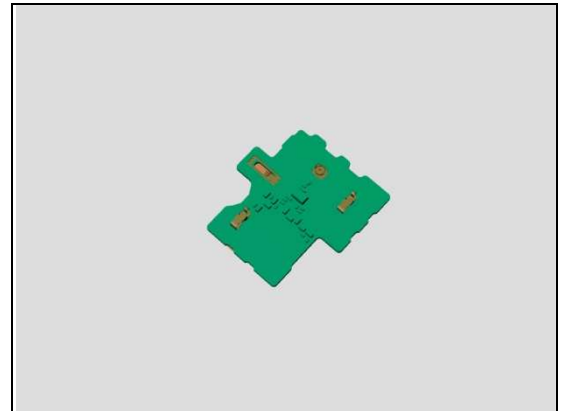
3. If the contact pin on Sub PBA is damaged – replace Sub PBA.

### Check:

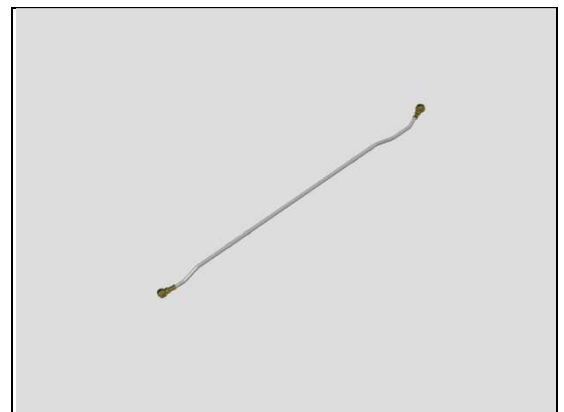
Inspect the RF Cable WLAN, both RF cable clips and the both RF connectors to Main PBA and Sub PBA.

### Action:

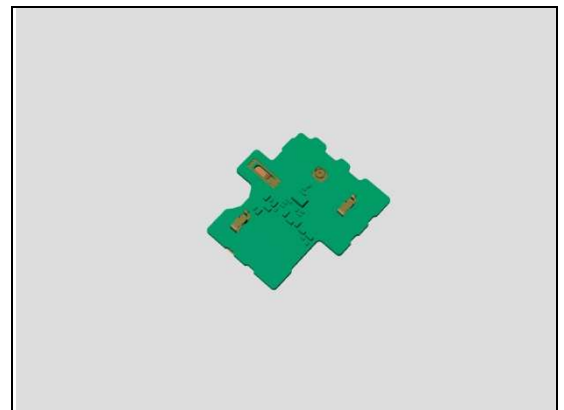
1. If not properly connected – disconnect and reconnect them.
2. If dirty or oxidized – clean them.



3. If RF Cable WLAN is damaged – replace it.



4. If the RF connector on the Sub PBA is damaged – replace the Sub PBA.
5. If the RF connector on the Main PBA is damaged – replace the Main PBA.



## Problem Areas: Bluetooth and WLAN

**Check:**

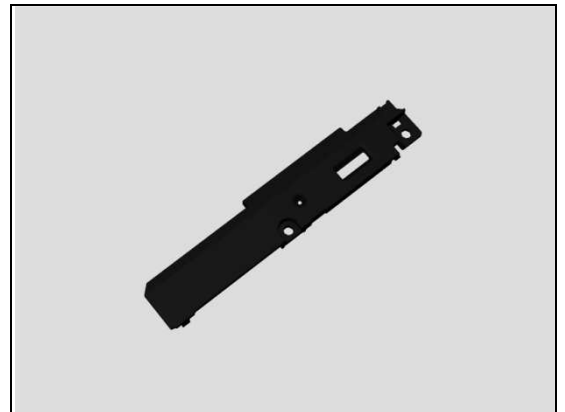
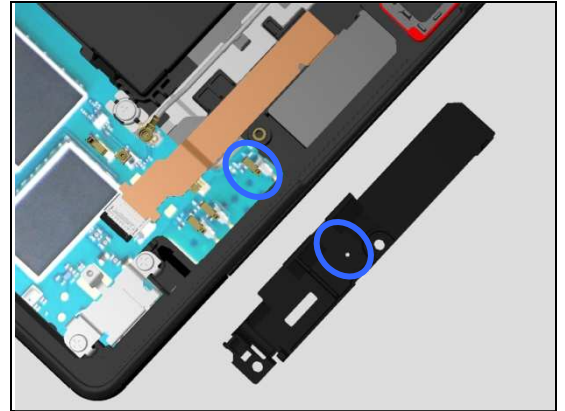
Inspect another WLAN contact pad on Antenna Diversity and the contact pin on Main PBA.

**Action:**

1. If dirty or oxidized – clean the pad and pin.

2. If the WLAN contact pad on Antenna Diversity or Antenna Diversity is damaged – replace the Antenna Diversity.

3. If the contact pin on Main PBA is damaged – replace Main PBA.





## Problem Areas

### 1.12 NFC

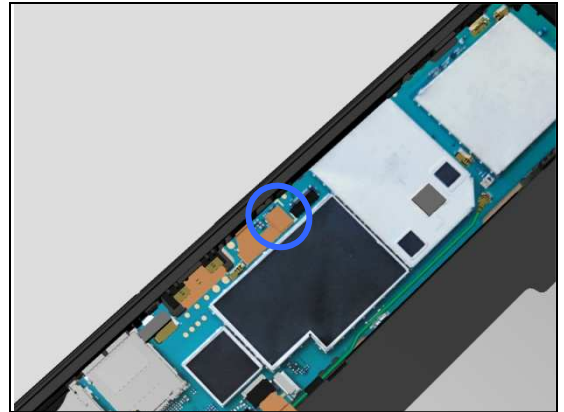
#### 1.12.1 NFC malfunctions

**Check:**

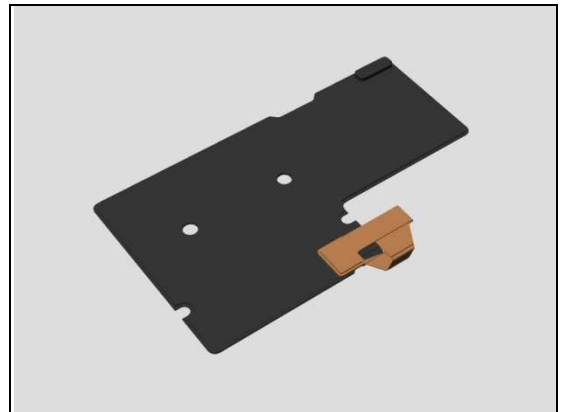
Inspect the BtB connector of Antenna NFC.

**Action:**

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



2. If the BtB connector of Antenna NFC or Antenna NFC is damaged – replace the Antenna NFC.
3. Replace Main PBA.



## Problem Areas

### 1.13 GPS

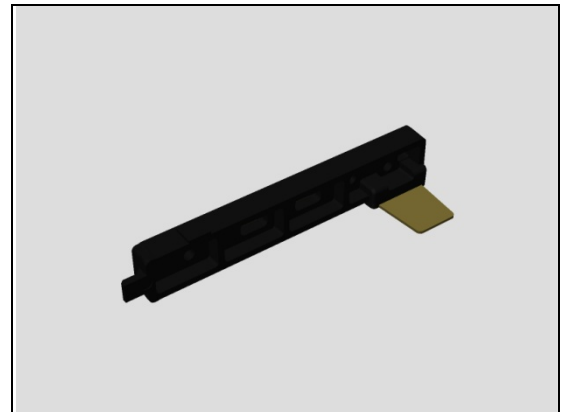
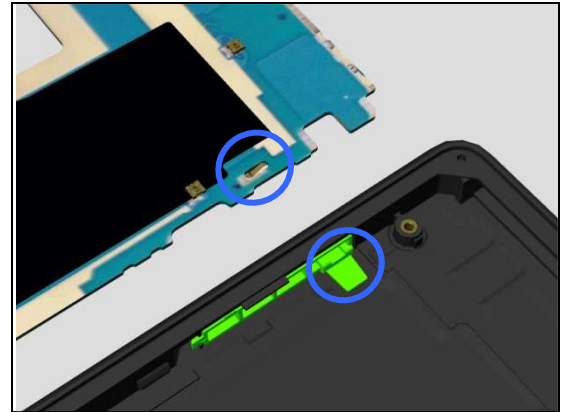
#### 1.13.1 GPS malfunctions

**Check:**

Inspect the contact pad of Antenna GPS and the contact pin on Main PBA.

**Action:**

1. If dirty or oxidized – clean the pad and pin.
2. If the Antenna GPS is damaged – replace it.
3. If the contact pin on main PBA is damaged – replace Main PBA.



## Problem Areas

### 1.14 Compass

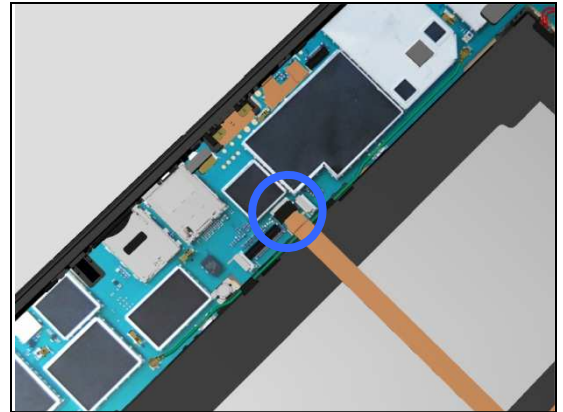
#### 1.14.1 Compass fails

**Check:**

Inspect the ZIF connector of Key Flex module to Main PBA.

**Action:**

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



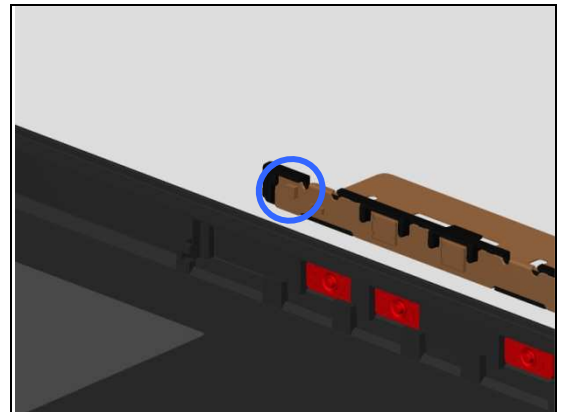
3. If the FPC of Key Flex module is damaged – replace the Key Flex module.

4. If the ZIF connector is damaged – replace Main PBA.



**Check:**

Inspect the compass chip on the Key Flex module.



**Action:**

1. If the compass chip is damaged – replace the Key Flex module.
2. Replace Main PBA.



## Problem Areas

### 1.15 Accelerometer

#### 1.15.1 Accelerometer test fails

**Action:**

1. Follow 1289-2983 Sony Mobile Repair Application-mechanical to run the Accelerometer Calibration.
2. Replace Main PBA.

## Problem Areas

### 1.16 Gyroscope

#### 1.16.1 Gyroscope test fails

**Action:**

1. Follow 1289-2983 Sony Mobile Repair Application-mechanical to run the Gyroscope Calibration.
2. Replace Main PBA.

## Problem Areas

### 1.17 Ambient Light Sensor

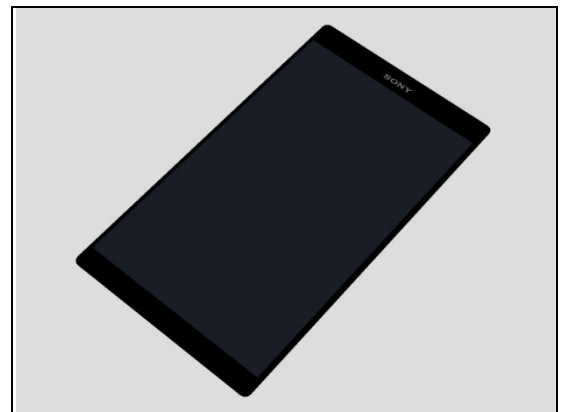
#### 1.17.1 Light Sensor malfunctions

**Check:**

Inspect the external window area of light sensor on the Display.

**Action:**

1. If dirty – clean it.



2. If scratched or damaged – replace the Display.

**Check:**

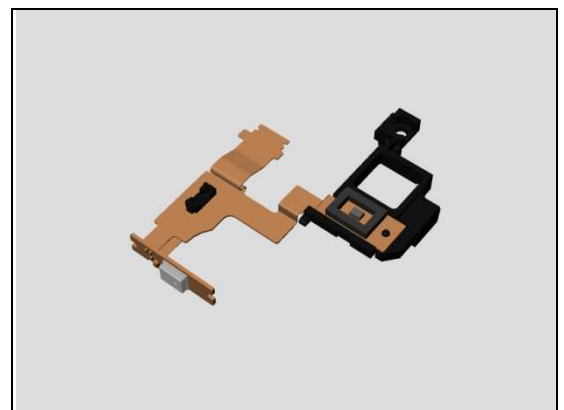
Inspect the light sensor on the FPC Top Flex module.

**Action:**

1. If dirty or clogged – clean it.



2. If damaged – replace the FPC Top Flex module.



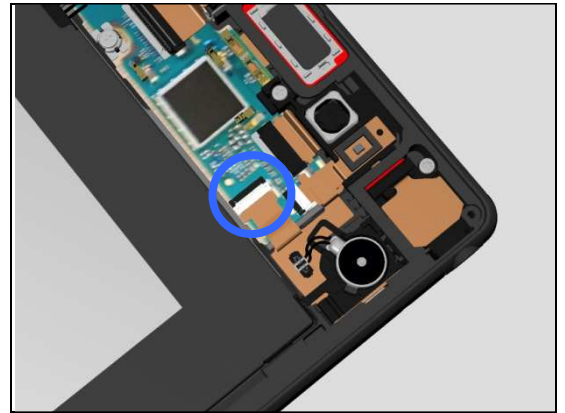
## Problem Areas: Ambient Light Sensor

### Check:

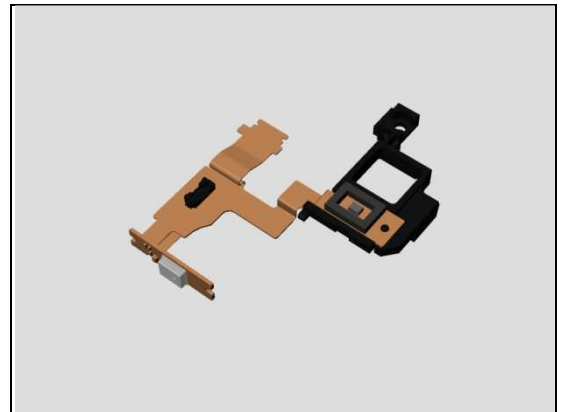
Inspect the ZIF connector of FPC Top Flex module to Main PBA.

### Action:

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



3. If the FPC of FPC Top Flex module is damaged – replace the FPC Top Flex module.
4. Replace Main PBA.



## Problem Areas

### 1.18 Proximity Switch

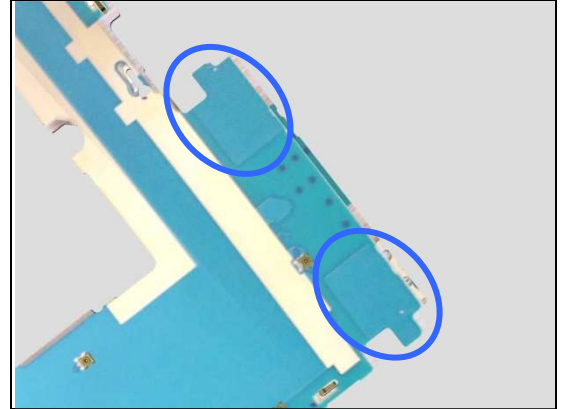
#### 1.18.1 Proximity switch malfunctions

**Check:**

Inspect the two capacitive proximity sensing area on Main PBA.

**Action:**

1. Follow 1289-2983 Sony Mobile Repair Application-mechanical to run the Proximity Calibration.
2. Replace Main PBA.





## Problem Areas

### 1.19 Pressure Sensor

#### 1.19.1 Pressure Sensor test fails

Replace Main PBA.

## Problem Areas

### 1.20 Water Resistance

#### 1.20.1 Water Resistance fails

**Refer to “Details for Water Test procedure (Generic Repair Manual-mechanical, 1220-1333)” to repair WR models. Below are possible positions of leakage.**

**Check:**

Inspect the Cap SIM.

**Action:**

1. If dirty – clean it.
2. If not properly assembled – disassemble and reassemble.

3. If the Cap SIM is damaged – replace it.

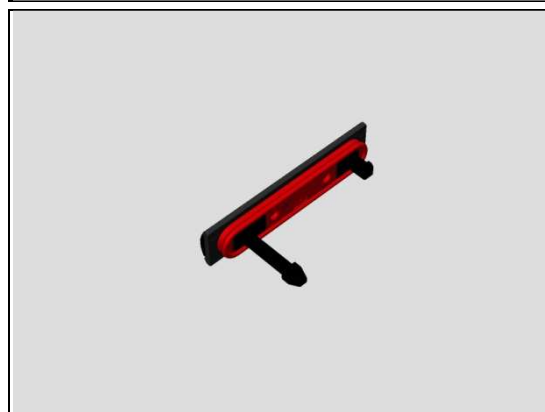
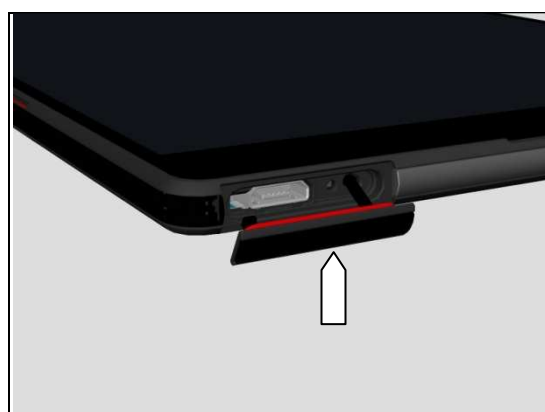
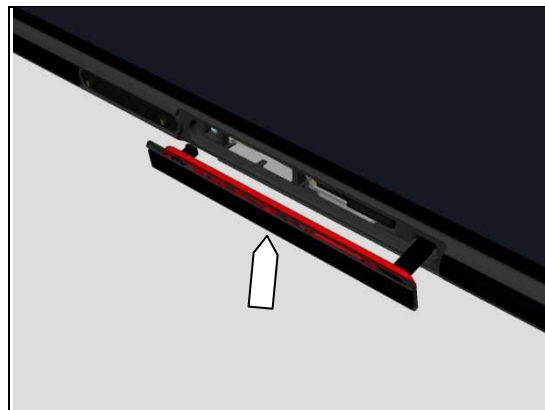
**Check:**

Inspect the Cap USB.

**Action:**

1. If dirty – clean it.
2. If not properly assembled – disassemble and reassemble.

3. If the Cap USB is damaged – replace it.



## Problem Areas: Water Resistance

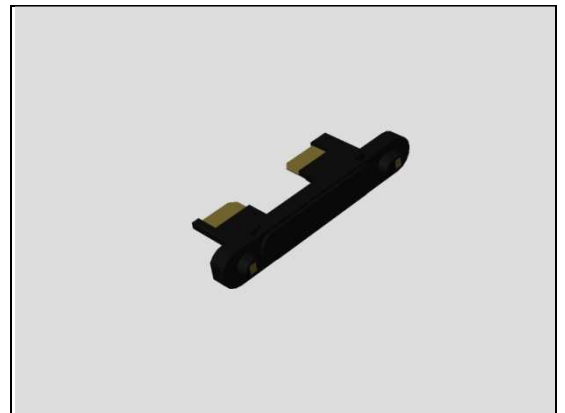
### Check:

Inspect the Magnetic charger connector.



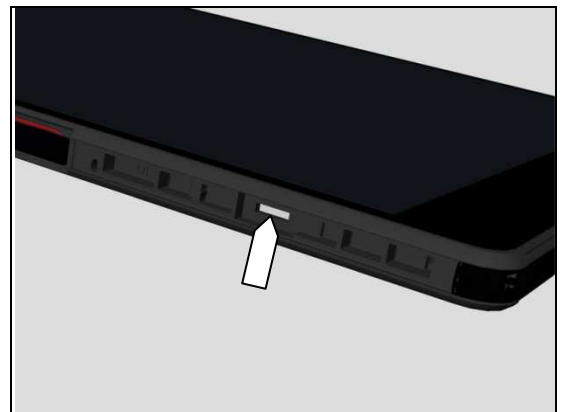
### Action:

If not properly assembled or damaged – replace it.



### Check:

Inspect the film for water resistance check.



### Action:

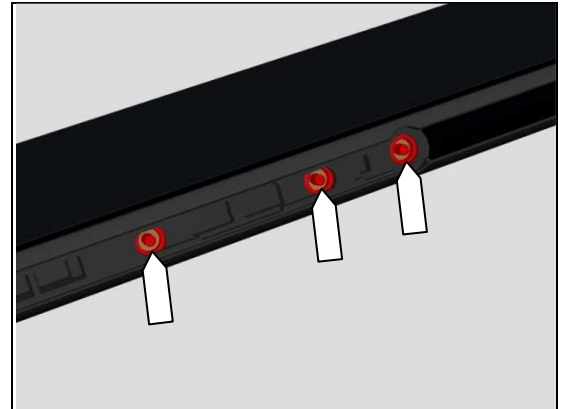
If damaged – replace the Main Cover.



## Problem Areas: Water Resistance

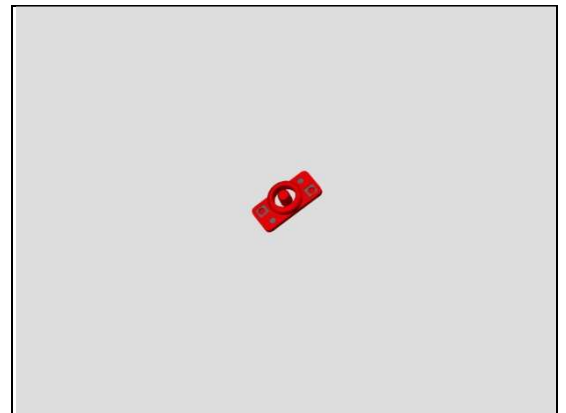
### Check:

Inspect the three Key Gaskets.



### Action:

If not properly assembled or damaged – replace them.



### Check:

Inspect the secondary microphone mesh.



### Action:

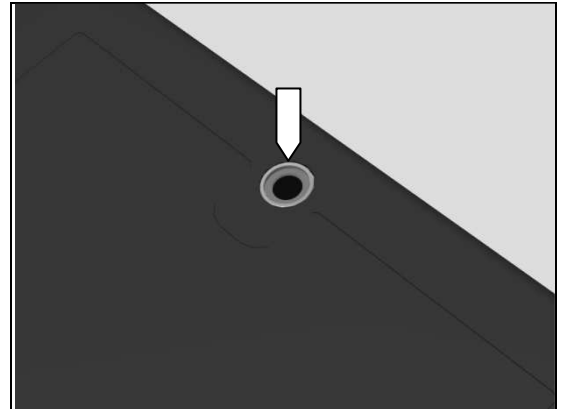
If damaged – replace the Main Cover.



## Problem Areas: Water Resistance

### Check:

Inspect the camera window and camera ring.



### Action:

If not properly assembled or damaged – replace Main Cover.



### Check:

Inspect the edge of Display for damage and gap.



### Action:

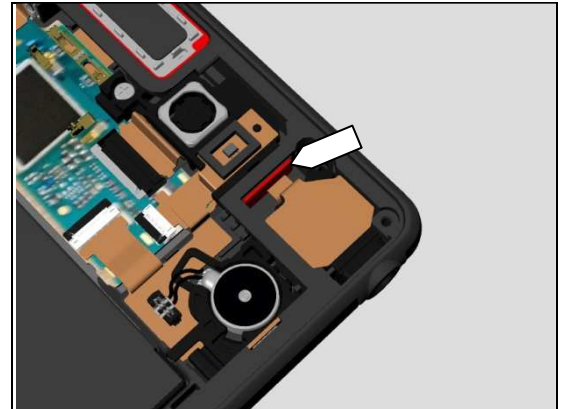
1. If the edge of Display has gap – reassemble it.
2. If the Display is damaged – replace it.



## Problem Areas: Water Resistance

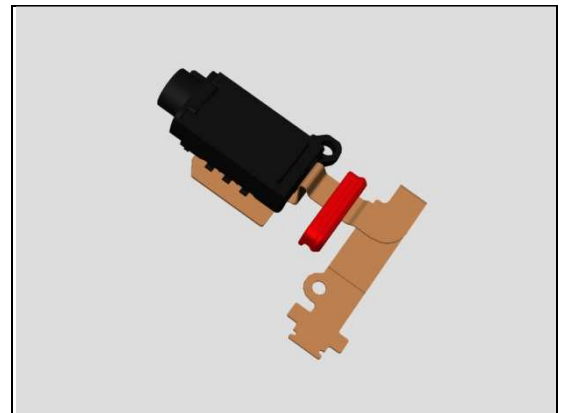
### Check:

Inspect the rubber of FPC JK Flex module.



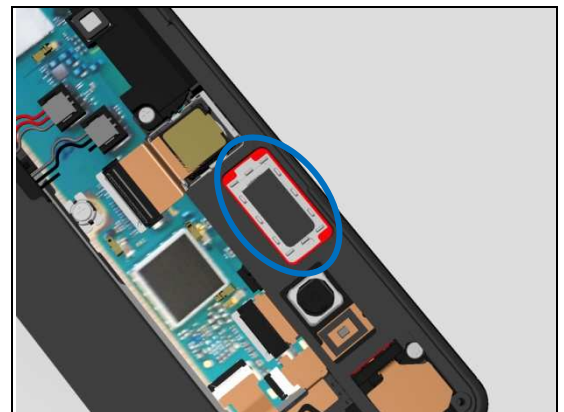
### Action:

1. If not properly assembled – reassemble it.
2. If damaged – replace the FPC JK Flex module.



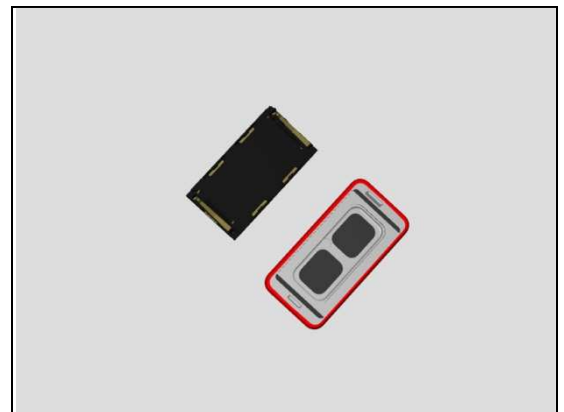
### Check:

Inspect the top speaker assy.



### Action:

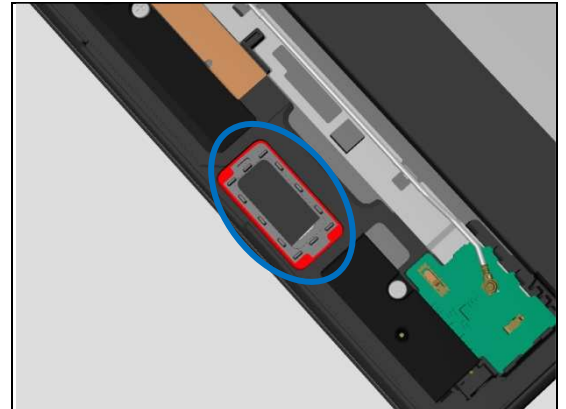
1. If not properly assembled – reassemble it.
2. If damaged – replace the Top Speaker and Gasket SP Sub assy.



## Problem Areas: Water Resistance

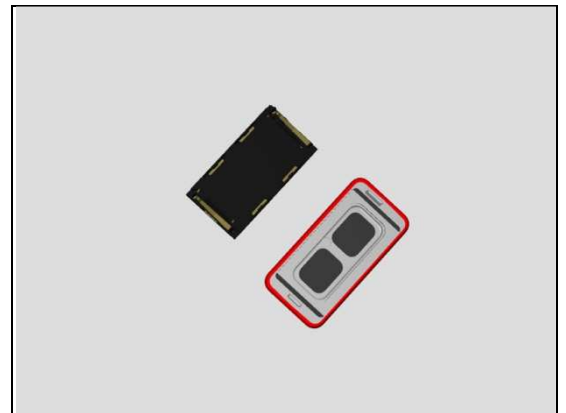
**Check:**

Inspect the bottom speaker assy.



**Action:**

1. If not properly assembled – reassemble it.
2. If damaged – replace the Top Speaker and Gasket SP Sub assy.



## Problem Areas

### 1.21 Real Time Clock

#### 1.21.1 Real time clock test fails

**Action:**

Replace Main PBA.



## Problem Areas

### 1.22 Total call time

#### 1.22.1 Total call time fails

**Action:**

Replace Main PBA.

## Problem Areas

### 1.23 External Memory

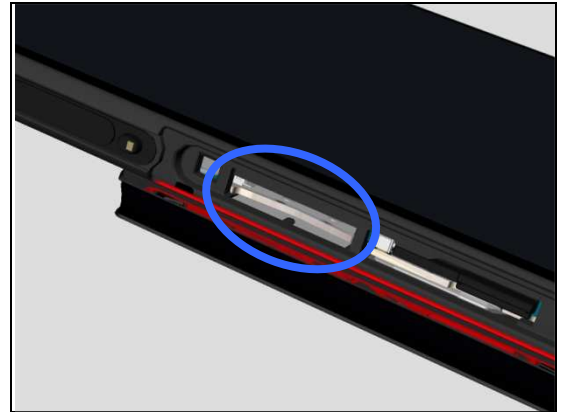
#### 1.23.1 Memory Card not detected

**Check:**

Inspect that if a memory card is properly inserted.

**Action:**

If not properly inserted – insert the memory card correctly.

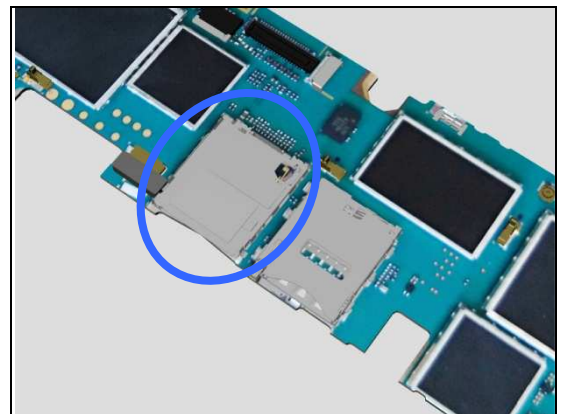


**Check:**

Inspect the memory card holder on Main PBA.

**Action:**

1. If dirty or clogged – clean the holder.
2. Replace Main PBA.



## Problem Areas

### 1.24 Security

#### 1.24.1 Security fails

**Action:**

Replace Main PBA.

## Problem Areas

### 1.25 FM Radio

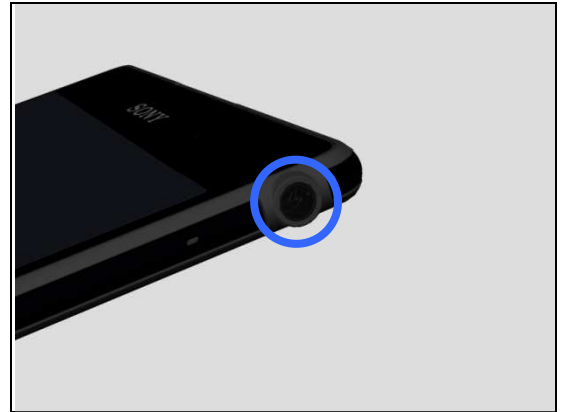
#### 1.25.1 No/Poor FM Radio reception

**Check:**

Inspect the external port of the FPC JK Flex module.

**Action:**

1. If dirty or oxidized – clean it.



**Check:**

Inspect the ZIF connector of FPC JK Flex module to Main PBA.

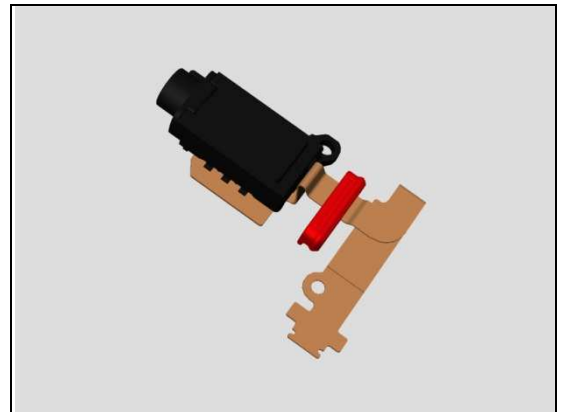
**Action:**

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



3. If the FPC of FPC JK Flex module is damaged – replace the FPC JK Flex module and then follow 1289-2983 Sony Mobile Repair Application-mechanical to run the Noise Cancelling Calibration.

4. Replace Main PBA and then follow 1289-2983 Sony Mobile Repair Application-mechanical to run the Noise Cancelling Calibration.



## Problem Areas

### 1.26 Verify Certificates

#### 1.26.1 Verify Certificates fails

**Action:**  
N/A.

## Problem Areas

### 1.27 TV-Out Test

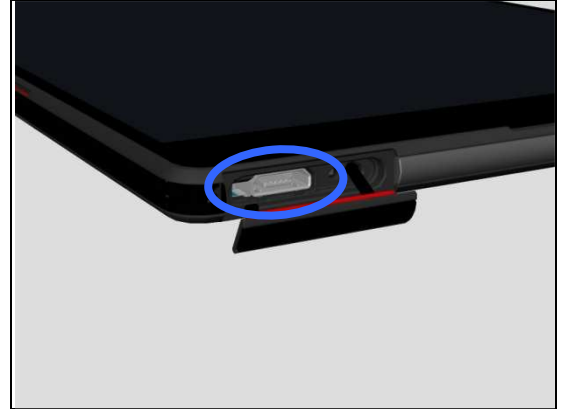
#### 1.27.1 TV-Out test fails

**Check:**

Inspect the USB connector.

**Action:**

1. If dirty or oxidized – clean the connector.
2. Replace Main PBA.



## Problem Areas

### 1.28 Network & Signal(SGP621 and SGP641 specific)

#### 1.28.1 No/Poor signal

**Check:**

Inspect the main antenna contact pads on Antenna Main RoW and the contact pins on Main PBA.

**Action:**

1. If dirty or oxidized – clean the pads and pins.

2. If the main antenna contact pads on Antenna Main RoW or Antenna Main RoW are damaged – replace the Antenna Main RoW.

3. If the contact pins on Main PBA are damaged – replace Main PBA.

**Check:**

Inspect the RF Cable Cellar, both RF cable clips and the both RF connectors to Main PBA.

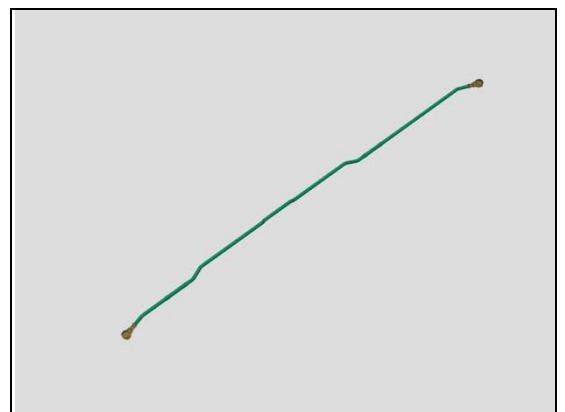
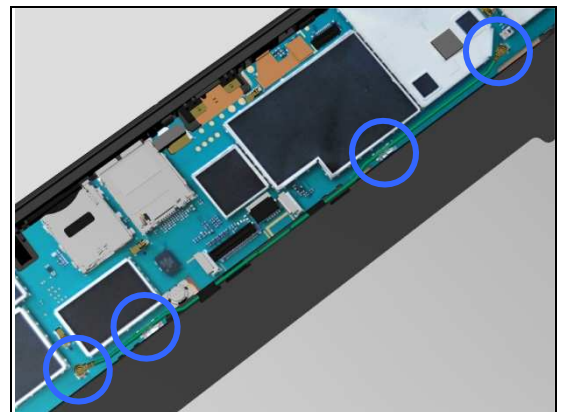
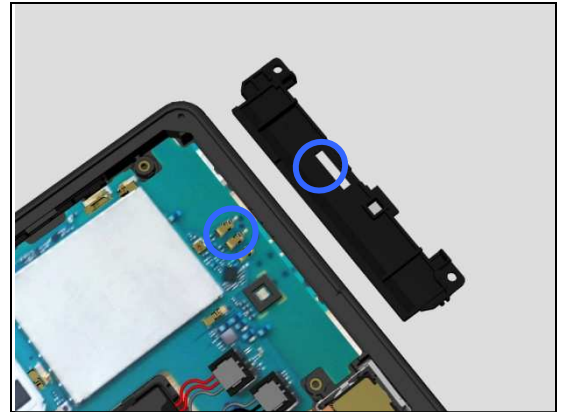
**Action:**

1. If not properly connected – disconnect and reconnect them.

2. If dirty or oxidized – clean them.

3. If RF Cable Cellar is damaged – replace it.

4. If the RF connectors on the Main PBA are damaged – replace the Main PBA.



## Problem Areas: Network & Signal

### Check:

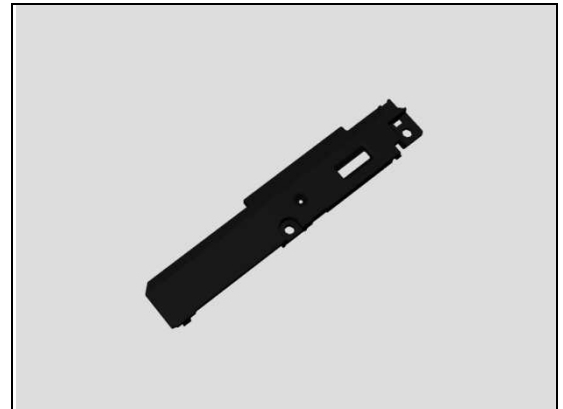
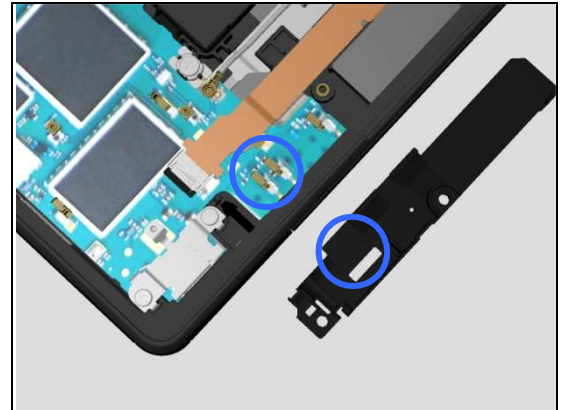
Inspect the diversity antenna contact pads on Antenna Diversity RoW and the contact pins on Main PBA.

### Action:

1. If dirty or oxidized – clean the pads and pins.

2. If the diversity antenna contact pads on Antenna Diversity RoW or Antenna Diversity RoW are damaged – replace the Antenna Diversity RoW.

3. If the contact pins on Main PBA are damaged – replace Main PBA.





## Problem Areas

### 1.29 SIM (SGP621 and SGP641 specific)

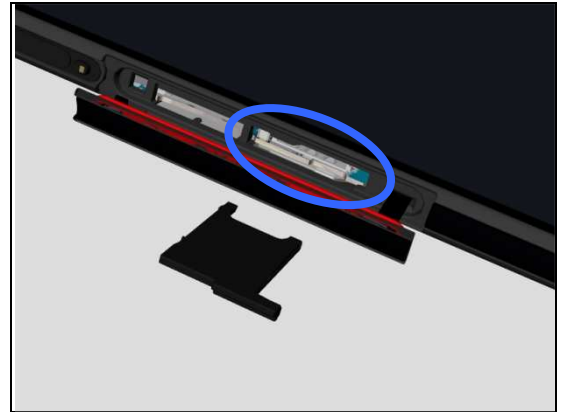
#### 1.29.1 SIM not detected

**Check:**

Inspect the external port of the SIM card holder and check if a SIM card can be properly inserted.

**Action:**

If dirty or clogged – clean the external port.

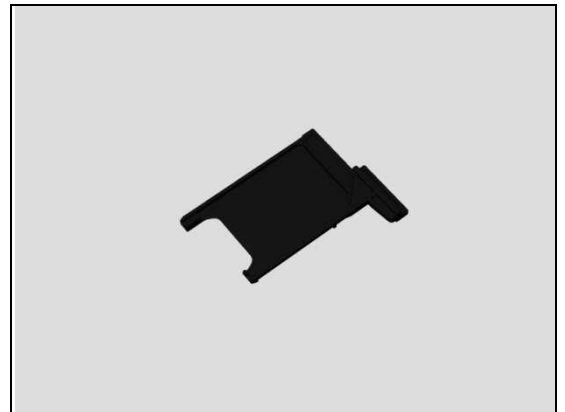


**Check:**

Inspect the SIM Tray.

**Action:**

1. If the SIM Tray is damaged – Replace it.

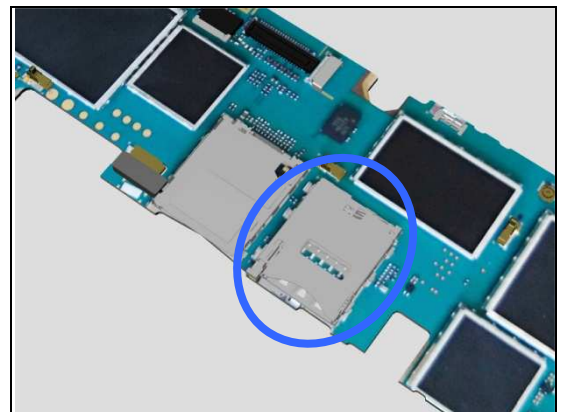


**Check:**

Inspect the SIM card holder on Main PBA.

**Action:**

1. If dirty or clogged – clean the holder.  
2. Replace Main PBA.



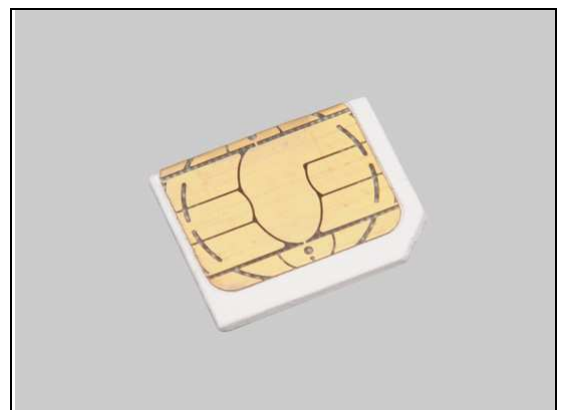
#### 1.29.2 Incorrect UIM or SIM indicated

**Check:**

Check whether the phone is locked to a particular operator and whether the correct operator UIM or SIM is being used.

**Action:**

1. Use a proper operator UIM/SIM or test UIM/SIM.  
2. Replace Main PBA.



## Problem Areas

### 1.30 Charging

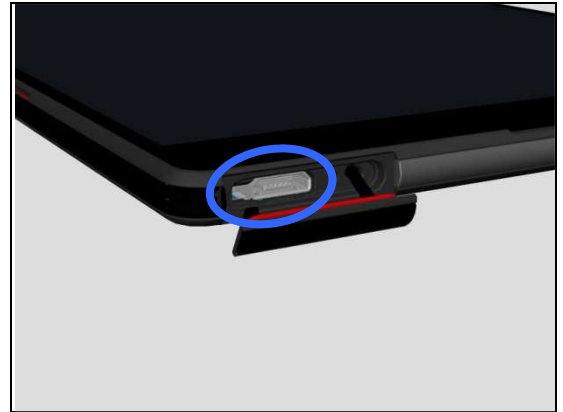
#### 1.30.1 Battery will not charge by USB connector

**Check:**

Inspect the USB connector.

**Action:**

1. If dirty or oxidized – clean the connector.
2. Replace Main PBA.

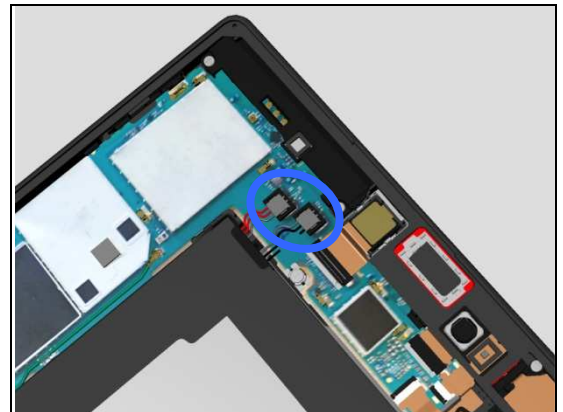


**Check:**

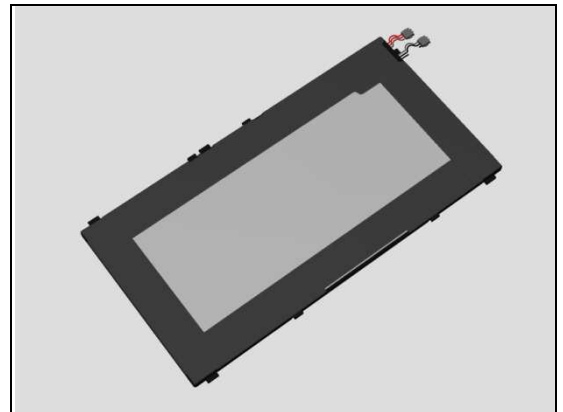
Inspect the BtB Connectors of the Battery to Main PBA.

**Action:**

1. If not properly connected – disconnect and reconnect them.
2. If dirty or oxidized – clean them.



3. If the BtB connectors, the Battery cables or Battery is damaged – replace the Battery.
4. Replace Main PBA.



#### 1.30.2 Battery will not charge by charge pad

**Check:**

Inspect the external port of the Magnetic charger connector.

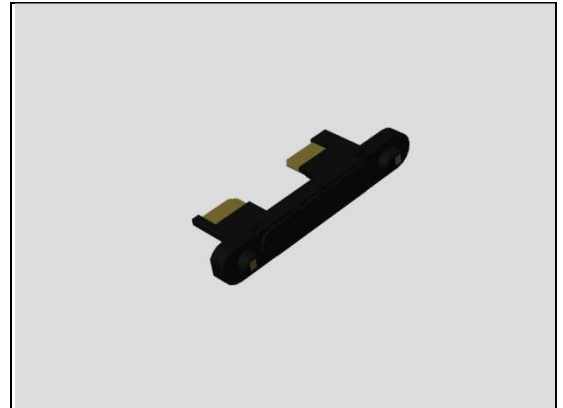
**Action:**

1. If dirty or oxidized – clean it.



## Problem Areas: Charging

2. If the Magnetic charger connector is damaged – replace it.



### Check:

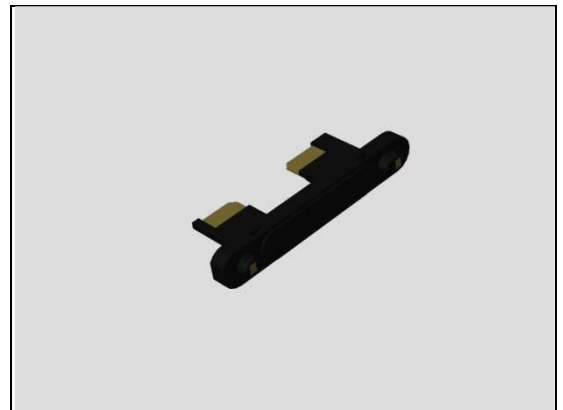
Inspect the contact pins on Charger Flex module and contact pads on Magnetic charger connector.

### Action:

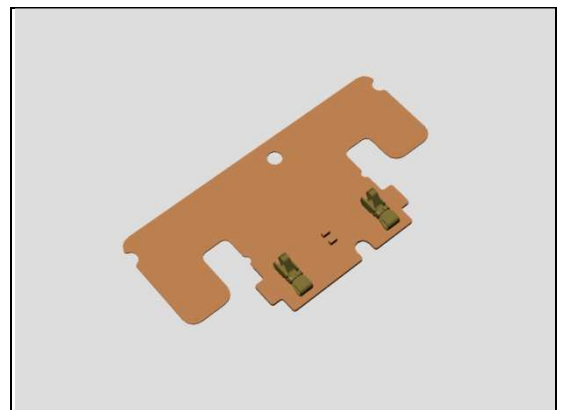
1. If dirty or oxidized – clean the pins and pads.



2. If the contact pads of Magnetic charger connector are damaged – replace the Magnetic charger connector.



3. If the contact pins of the Charger Flex module are damaged – replace the Charger Flex module.



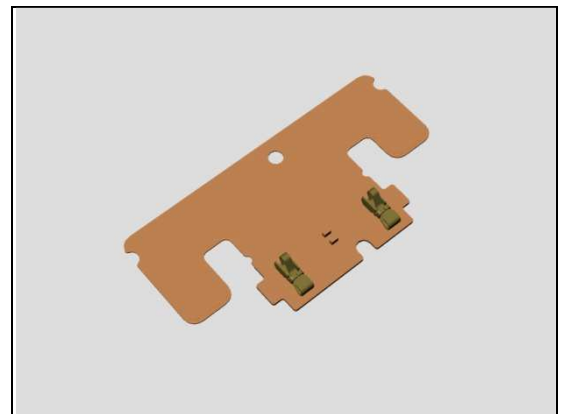
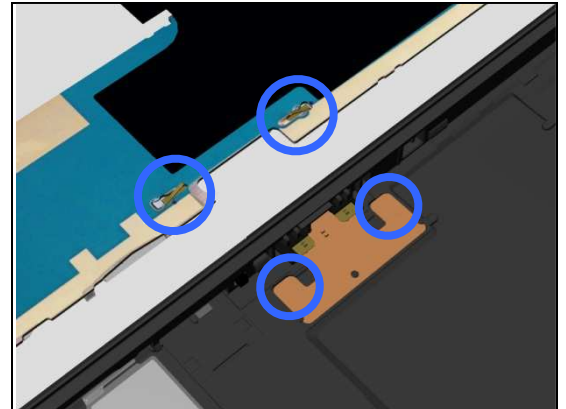
## Problem Areas: Charging

### Check:

Inspect the contact pads on Charger Flex module and contact pins on Main PBA.

### Action:

1. If dirty or oxidized – clean the pins and pads.
2. If the contact pads of Charger Flex module are damaged – replace the Charger Flex module.
3. If the contact pins on Main PBA are damaged – replace Main PBA.

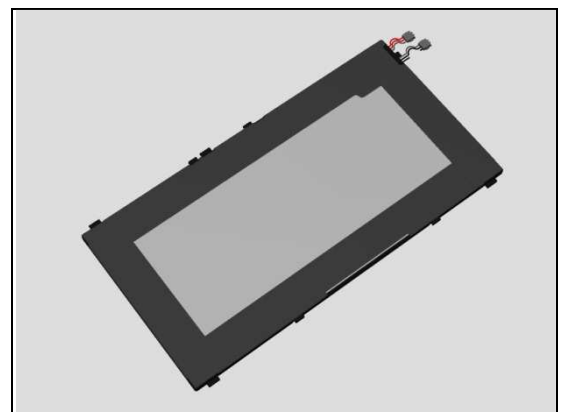
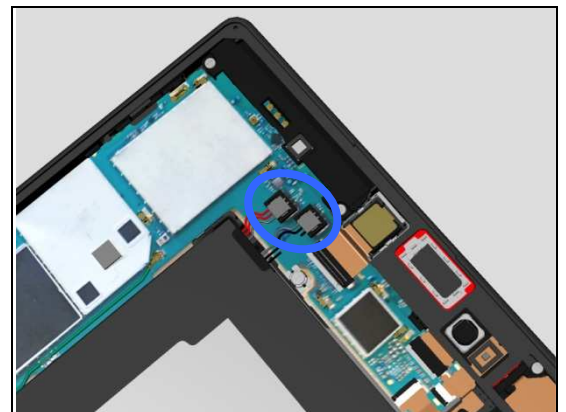


### Check:

Inspect the BtB Connectors of the Battery to Main PBA.

### Action:

1. If not properly connected – disconnect and reconnect them.
2. If dirty or oxidized – clean them.
3. If the BtB connectors, the Battery cables or Battery is damaged – replace the Battery.
4. Replace Main PBA.



## Problem Areas

### 1.31 HandsFree by Wire

#### 1.31.1 Connection to portable Handsfree fails

**Check:**

Inspect the external port of the FPC JK Flex module.

**Action:**

1. If dirty or oxidized – clean it.



**Check:**

Inspect the ZIF connector of FPC JK Flex module to Main PBA.

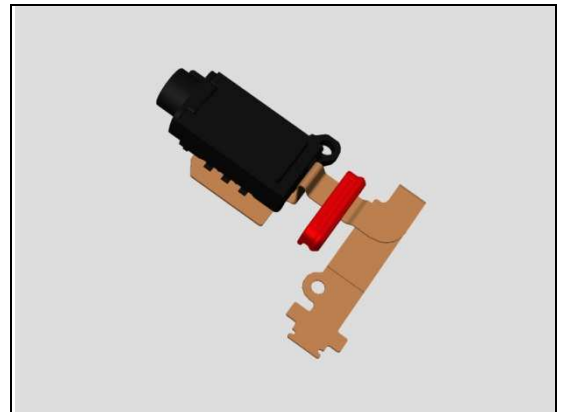
**Action:**

1. If not properly connected – disconnect and reconnect it.
2. If dirty or oxidized – clean it.



3. If the FPC of FPC JK Flex module is damaged – replace the FPC JK Flex module and then follow 1289-2983 Sony Mobile Repair Application-mechanical to run the Noise Cancelling Calibration.

4. Replace Main PBA and then follow 1289-2983 Sony Mobile Repair Application-mechanical to run the Noise Cancelling Calibration.



## Problem Areas

### 1.32 Data Communication

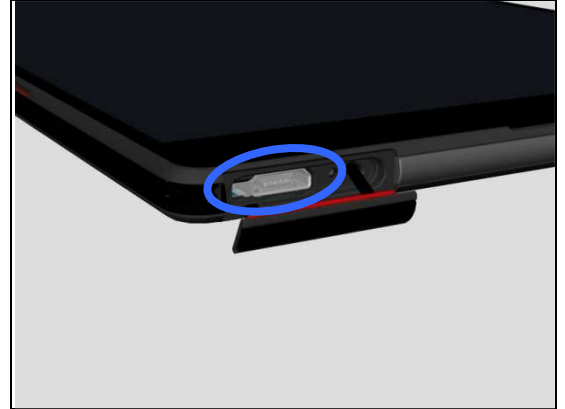
#### 1.32.1 Data transfer via System Connector fails

**Check:**

Inspect the USB connector.

**Action:**

1. If dirty or oxidized – clean the connector.
2. Replace Main PBA.



## 2 Revision History

Rev.	Date	Changes / Comments
1	2014-10-15	Initial release