

# NOKIA 6260

RM-25

**Transceiver characteristics:**

- Integrated digital VGA camera
- Mobile email and VPN client
- Quickword and Quickpoint for viewing documents
- HTML Internet browser
- Bluetooth wireless technology
- Infrared
- FM radio and MP3 player
- Push-to-talk with dedicated side key
- Tri-band operation for networks on five continents
- A number of Try and Buy applications preloaded on the MMC memory card



Transceiver with BL-4C 760mAh Li-Ion battery pack

Talk time	Standby	Note
2 hours-4 hours	4 days-6 days	Depends on network parameters

**Environmental characteristics:**

- Lead-free soldered
- RoHS compliant (Restriction on Hazardous Substances, 2002/95/EC)

## SERVICE MANUAL

### Service Level 1&2

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**CHANGE HISTORY**

Status	Version No.	Date	Comments
Draft	0.1	09.08.2004	Initial draft
Approved	1.0	03.09.2004	Environmental characteristics added

## 1. INTRODUCTION

The purpose of this document is to help Nokia service levels 1 and 2 workshop technicians to carry out service to Nokia products. This Service Manual is to be used **only** by authorized Nokia service suppliers, and the content of it is **confidential**. Please note that Nokia provides also other guidance documents (e.g. Service Bulletins) for service suppliers, follow these regularly and comply with the given instructions.

While every endeavor has been made to ensure the accuracy of this document, some errors may exist.

***If you find any errors or if you have further suggestions, please notify Nokia using the address below:***

<mailto:cc-ts-rc.documentation@nokia.com>

Please keep in mind also that this documentation is continuously being updated and modified, so watch always out for the newest version.

### Warnings and Cautions

Please refer to the phone's user guide for instructions relating to operation, care and maintenance including important safety information. Note also the following:

#### Warnings:

1. CARE MUST BE TAKEN ON INSTALLATION IN VEHICLES FITTED WITH ELECTRONIC ENGINE MANAGEMENT SYSTEMS AND ANTI-SKID BRAKING SYSTEMS. UNDER CERTAIN FAULT CONDITIONS, EMITTED RF ENERGY CAN AFFECT THEIR OPERATION. IF NECESSARY, CONSULT THE VEHICLE DEALER/MANUFACTURER TO DETERMINE THE IMMUNITY OF VEHICLE ELECTRONIC SYSTEMS TO RF ENERGY.
2. THE HANDPORTABLE TELEPHONE MUST NOT BE OPERATED IN AREAS LIKELY TO CONTAIN POTENTIALLY EXPLOSIVE ATMOSPHERES EG PETROL STATIONS (SERVICE STATIONS), BLASTING AREAS ETC.
3. OPERATION OF ANY RADIO TRANSMITTING EQUIPMENT, INCLUDING CELLULAR TELEPHONES, MAY INTERFERE WITH THE FUNCTIONALITY OF INADEQUATELY PROTECTED MEDICAL DEVICES. CONSULT A PHYSICIAN OR THE MANUFACTURER OF THE MEDICAL DEVICE IF YOU HAVE ANY QUESTIONS. OTHER ELECTRONIC EQUIPMENT MAY ALSO BE SUBJECT TO INTERFERENCE.

#### Cautions:

1. Servicing and alignment must be undertaken by qualified personnel only.
2. Ensure all work is carried out at an anti-static workstation and that an anti-static wrist strap is worn.
3. Use only approved components as specified in the parts list.
4. Ensure all components, modules screws and insulators are correctly re-fitted after servicing and alignment.  
Ensure all cables and wires are repositioned correctly.



Electrostatic discharge can easily damage the sensitive components of electronic products. Therefore every Service Supplier has to take care of all precautions, which are mentioned in the service level related "Service Partner Requirements", available on Nokia Partner Web Site. Also see ESD Protection Requirements in this Service Manual.

## 2. GENERAL REPAIR INFORMATION

In this section the technician will get some general hints how to carry out repairs:

- To familiarize oneself with Nokia product read the tutorials or user guide on [www.nokia.com](http://www.nokia.com) -->Support--> Phones, by selecting the Phone Model.
- Before starting the repair you must take care of ESD precautions like being in your ESD Protected Area and connecting your wristband.
- Use gloves to avoid corrosion and fingerprints.
- Protect windows and displays with a film to avoid dust and scratches.
- When cleaning the pads you have to use a soft cloth/ESD brush and Isopropanol. It is not allowed to use a glass fiber pencil because it scratches the surface and will lead later on to corrosion.
- Mechanical parts (except shielding lids and bent parts), which didn't repair the failure, can be reused, if they are not soldered.
- When removing the shielding lids make sure to replace them with new ones, otherwise the high-frequency leakage can have an influence on the device.  
Always use original Nokia spare parts.  
Check the soldering joints of the parts, which are concerned regarding the indicated error (e.g. soldered connectors or switches) and resolder them if necessary (Level 2 only).  
Remove redundant soldering flux after repair.
- Meet the torque requirements when assembling the unit (see also the document "torques for transceiver assembly" on Nokia Partner Web Site).
- Always use your own equipment for testing where you are sure that it works. E.g. if the customer complains about charger function, please test the phone with your own charger to be sure if phone or charger causes the malfunction.
- When doing the fault log entries, always note the Item code, which caused the malfunction. Also, fill in the appropriate part code from the assembly, if needed.
- Please be aware that some malfunctions could be software related and solved by an update.
  
- There are several documents available on PWS/CarePoint, which have to be followed:
- First, take care for the latest content pages of Service Bulletins, which are always available for each folder on Nokia Partner Web Site. This is also important to recognize, if existing documents have become invalid.
- The service level indicator at the bottom of each document tells the appropriate destination.

### Downloads > Support Library >

1. Instructions
  2. General Service Bulletins
  3. Product related documents
  4. Spare Part Service Bulletins
  5. Service Tools Service Bulletins
  6. Common Softwares Service Bulletins
- etc,...


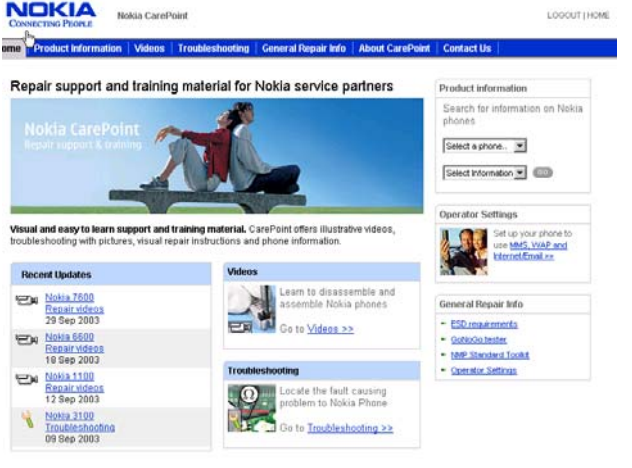
**Use General SB-217 as a reference or overview.**

**Please also check Nokia Partner Web Site (PWS) for latest news and files on a regular basis.**

### 3. PATHFINDER FOR WORKSHOP STAFF

In addition to the information in this Service Manual, there are several instructions and information, which have to be followed.

Main documentation database is Nokia [Partner Website](#), which refers also to [Nokia Care Point](#) with the purpose of serving different multimedia content, like video clips or interactive tutorials.

Nokia Partner Web Site	Nokia Care Point (access through Partner Web Site)
Nokia Partner Web Site for EMEA region is the most important document database for all service suppliers (level 1-4). All service relevant information like e.g. Service Manuals, Service Bulletins or general instructions are available. Content is restricted according your access level. To be kept up-to-date also concerning newest software updates, a daily check of "latest updates in support library" is needed.	Nokia Care Point is repair support and training channel for Nokia service suppliers (mainly for service levels 1 and 2). By providing visual and easy to learn support and training material, such as illustrative repair videos, troubleshooting with pictures, product information and general repair information, Nokia Care Point offers user-friendly channel for service suppliers to learn technical issues.
	

It is mandatory to watch for newest technical and organizational information on a daily basis to be updated as required (see "Latest **Updates in support Library**"). Every new information has to be processed and implemented as soon as possible.

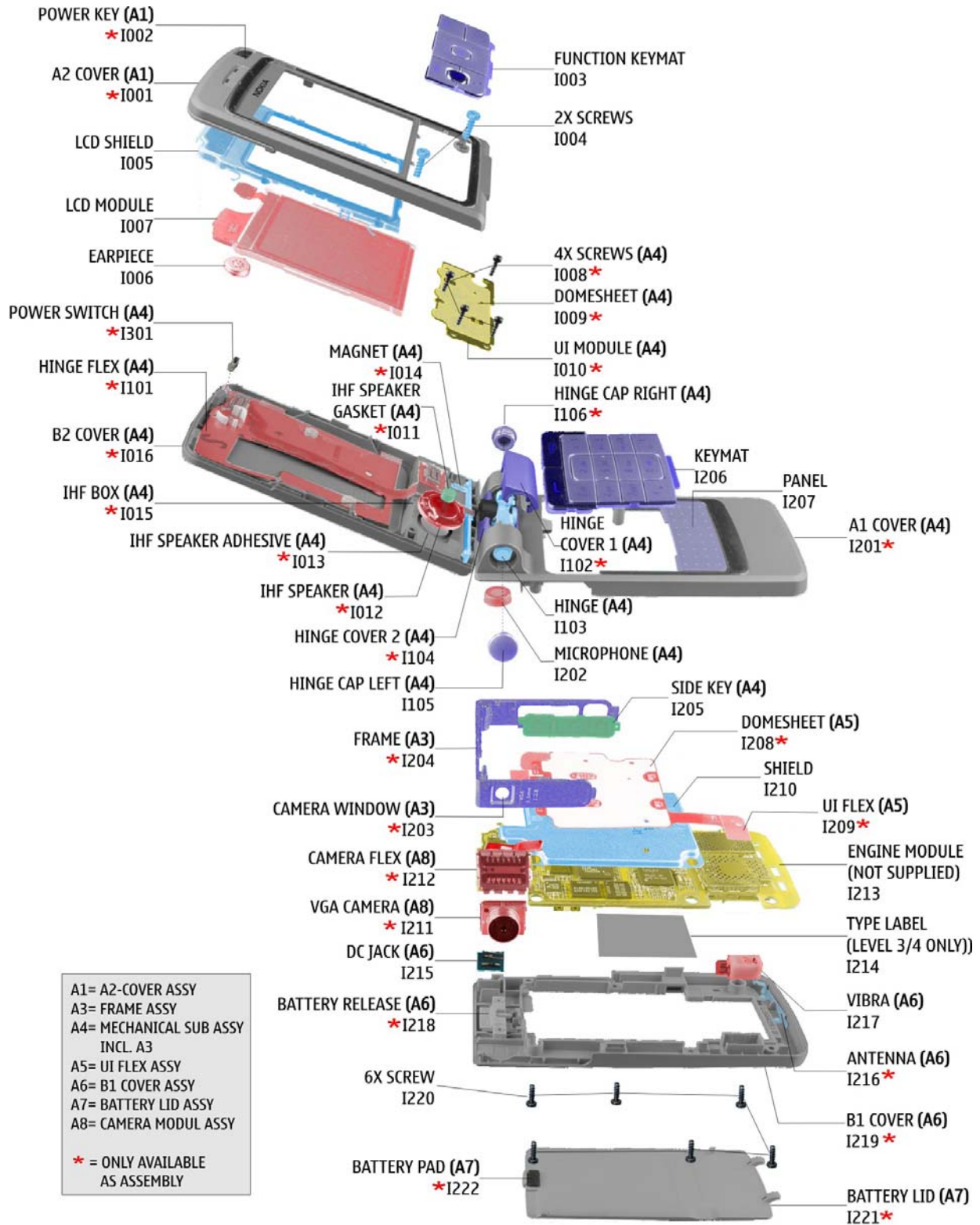
When logged into PWS you can also find needed information in different folder like:

- Downloads
- Support Library
  - Accessories
  - Battery Tester
  - Common Software
  - Flashing Tools
  - General --> Instructions
  - GoNoGo Tester
  - Service Tools
  - Tester Support
  - Wintesia
  - Products (Service Manuals, Service Bulletins)

To reduce the server traffic it is recommended to download newest version of huge files like videos, Phoenix packages or Service Manuals only once and distribute it internally for further use.

## 4. EXPLODED VIEW AND COMPONENT DISPOSAL

Recommendation for the ecologically friendly disposal of components. Colorized components show the different categories. See corresponding ITEM/CIRCUIT REF in the Spare Parts Service Bulletins on PWS.



A1= A2-COVER ASSY  
 A3= FRAME ASSY  
 A4= MECHANICAL SUB ASSY  
 INCL. A3  
 A5= UI FLEX ASSY  
 A6= B1 COVER ASSY  
 A7= BATTERY LID ASSY  
 A8= CAMERA MODUL ASSY

\* = ONLY AVAILABLE AS ASSEMBLY












## 5. SPARE PARTS LIST

**Please exchange this page (placeholder) with latest corresponding Service Bulletins (spare parts, SWAP units and service tools) from PWS!**

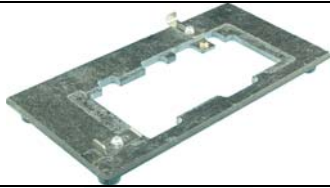
**This will ensure, that you are using up-to-date order codes only.**

**Therefore Service Bulletins have to be checked from PWS on daily basis.**

## 6. SERVICE TOOLS

	<p><b>FLS-4S incl. ACF-8, Driver and User Guide</b> Dongle and flash device incorporated into one package, developed specifically for POS use.</p>
	<p><b>ACF-8</b> Universal Power Supply is used to power FLS-4S.</p>
	<p><b>Internal Battery BL-4C</b> Inserted under the back cover, this Li-Ion 760mAh battery provides power in a lightweight package.</p>
	<p><b>Travel Charger ACP-8E (EURO)</b> <b>Travel Charger ACP-8X (UK)</b> Small and lightweight charger for fast charging of your phone battery.</p>
	<p><b>Headset HS-5</b> An easy and convenient handsfree solution with remote control.</p>
	<p><b>XCS-1</b> Service Cable is used to connect FLS-4S to SF-27.</p>
	<p><b>SF-27</b> POS Flash Adapter is used in POS (Point of Sales) environment for software updating. It provides controlled supply voltage and necessary connections between the phone and the Flash Device. It substitutes for the phone's standard battery during the software update.</p>
	<p><b>SF-27 Test Pins</b> For Flash Adapter SF-27</p>
	<p><b>SS-34</b> Flex Opening Tool</p>





**RJ-33**  
 Soldering Jig



**Lead-free Solder Wire**  
 Mandatory for lead-free products.



**0772040 NMP Standard Toolkit**

- Nokia opening tool SRT-6 Nokia No. 0770431
- Tonichi torque driver Nokia No. 6901525
- [Hoya](#) micro fibre cloth MX304
- [Dastex](#) gloves S, M, XL
- [Artlux](#) goggles AH166
- [Wera](#) bit T5 867/4TX 5x50
- Wera bit T6 867/4TX 6x50
- Wera bit T6 PLUS® 867/4TX 6IP
- [Facom](#) side cutter 416E
- Facom T5 driver SP.14032
- Facom T6 driver SP.14033
- Facom slot screwdriver AEF. 2x35.E
- [Wetec](#) tweezers 7abb SA-ESD
- Wetec tweezers 22 SA-ESD
- Wetec tweezers 13 SA-SMD ESD
- Wetec tweezers PSF SA-ESD
- Wetec ESD brush E1211
- Kaiser [Fototechnik](#) airbrush 6315
- Wetec dental tool DEM83266/0
- [RS Components](#) Scissors 323-5732

## 7. SW-UPDATE

To use FLS-4S Flash Dongle you have to follow the user guide inside the sales package. Please check always for the latest version of flash software, which is available on Nokia [Partner Web Site](#).

### Flash Concept – (Point of Sales)



**It is very important to follow this insertion and removal procedure, otherwise the contact pins of Flash Adapter could be damaged.**



1.) Move the slide in arrow direction as shown in the picture.



2.) Insert the Flash Adapter SF-27 like a battery, start at the Battery Connector side.



3.) Now, push down the phone, do not use too much force.



4.) Press down the phone on to the Flash Adapter SF-27 and move the slide towards the device to connect it with the DC Jack.  
Use the reverse order to remove the phone from Flash

## 8. DISASSEMBLY INSTRUCTIONS LOWER BLOCK (ALSO SEE THE VIDEO CLIPS ON CARE POINT)



1.) Protect the WINDOW with a film to avoid dust and scratches.



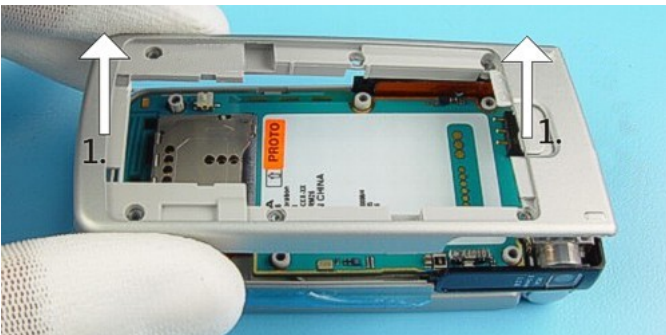
2.) Remove the BATTERY COVER.



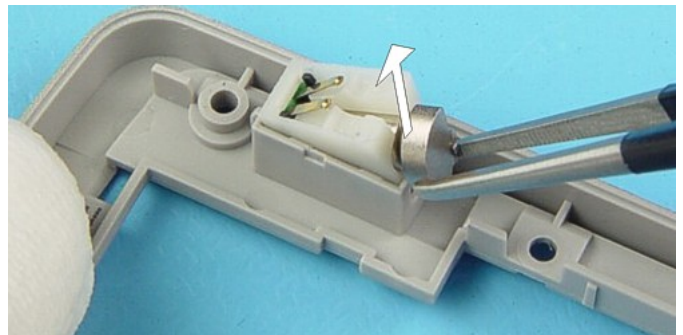
3.) Always remove the BATTERY before continuing disassembly.



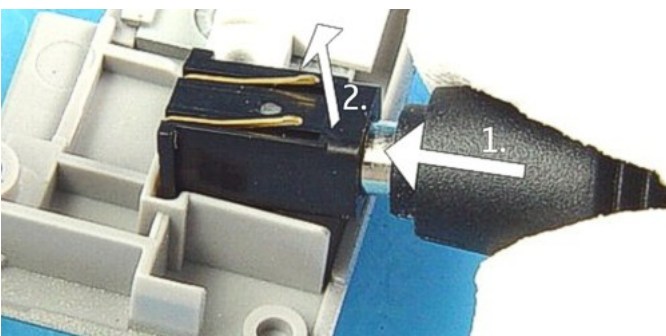
4.) Unscrew the six Torx Plus® size 6 screws. **For assembly, the reverse order and a Torx Plus® driver with a torque of 20Ncm has to be used.**



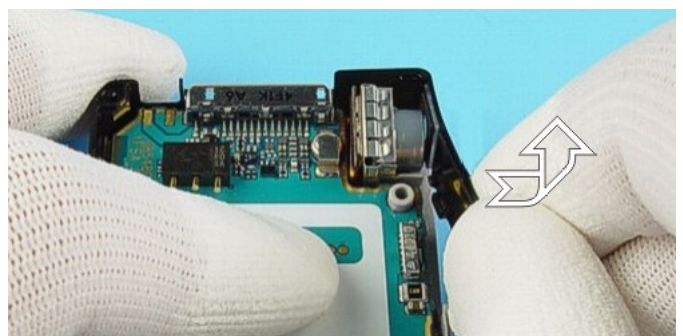
5.) Remove the B1 COVER and place it upside down on the table.



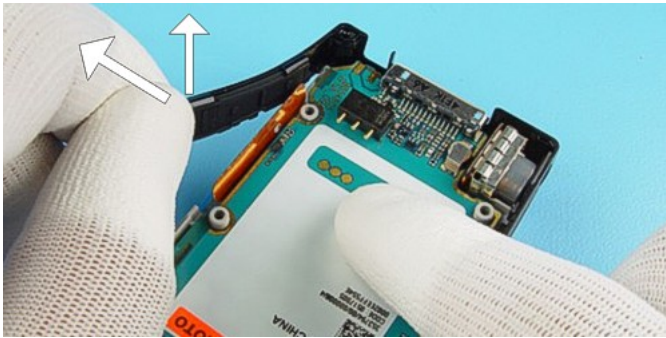
6.) Remove the VIBRA MOTOR with tweezers.



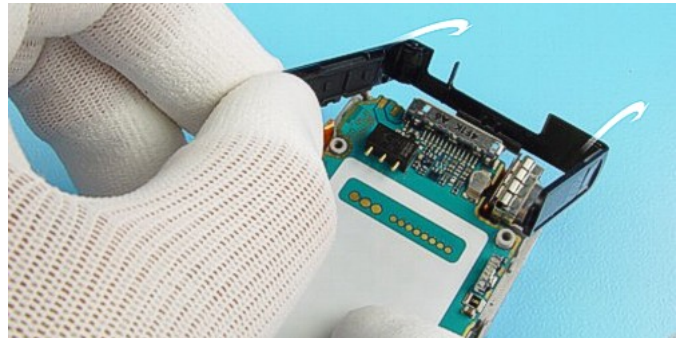
7.) Remove the DC-JACK with a charger plug.



8.) Pull up the FRAME at the right side and then move it to the right.



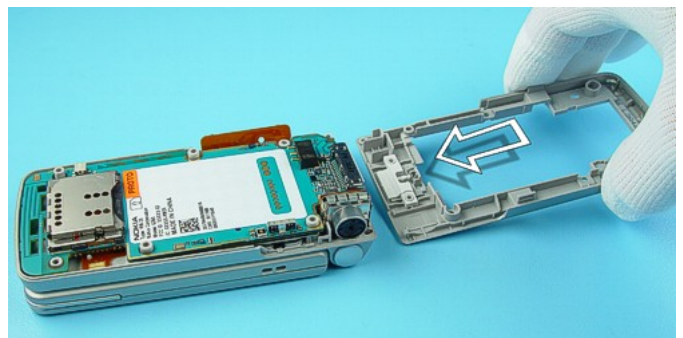
9.) The same procedure on the left side of the FRAME.



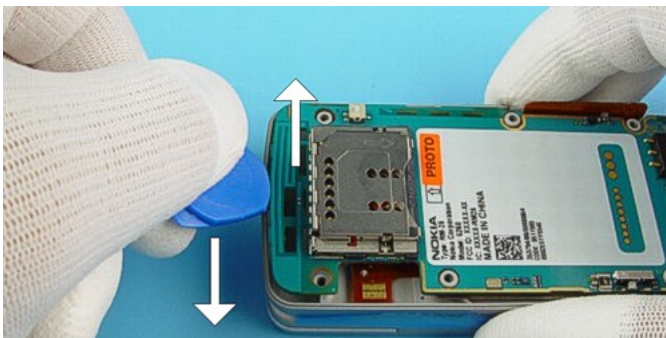
10.) Now, remove the FRAME.



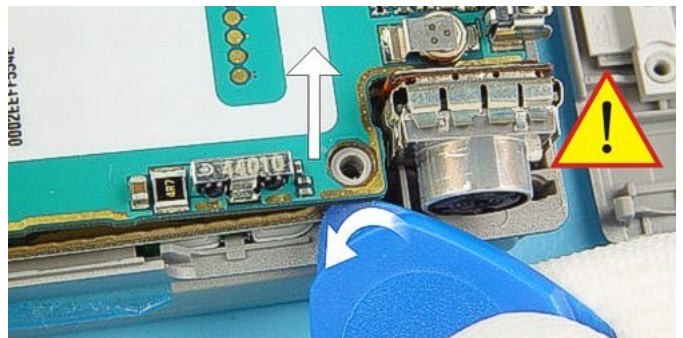
11.) Take away the SIDE KEY with SRT-6.



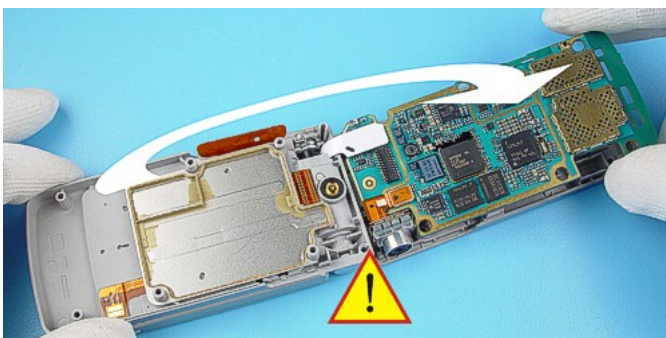
12.) Use the B1 COVER as a support for ENGINE MODULE to avoid damaging of the HINGE FLEX.



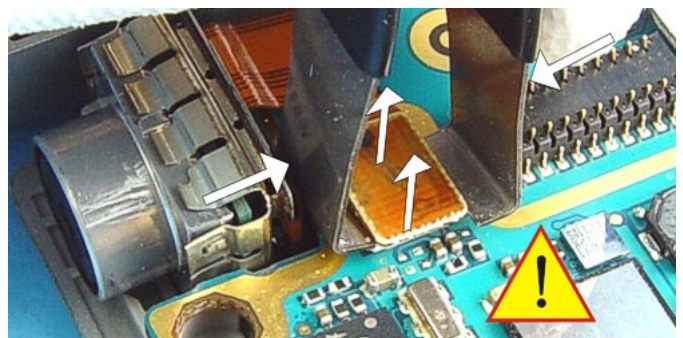
13.) Now remove the ENGINE MODULE. First lift up the left side (near SIM, MMC connector) with SRT-6 and then...



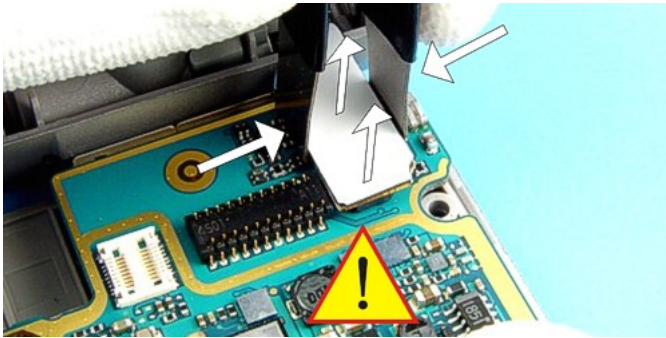
14.) ...the right side near by the CAMERA MODULE. Be careful not to touch the CAMERA MODULE.



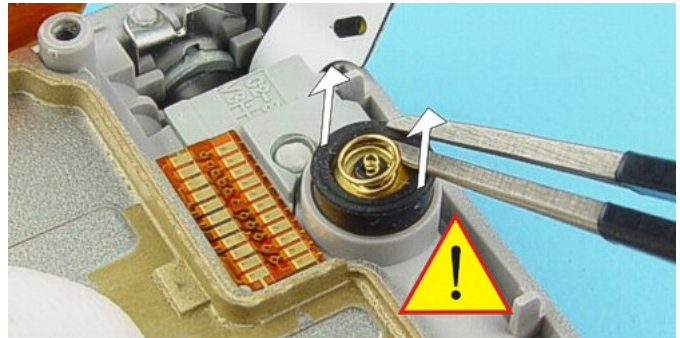
15.) The ENGINE MODULE is connected to the LOWER BLOCK via the HINGE FLEX CONNECTOR. Be careful when placing the ENGINE MODULE on the B1 COVER.



16.) Open the CAMERA CONNECTOR by using the SS-34 and remove the CAMERA MODULE.



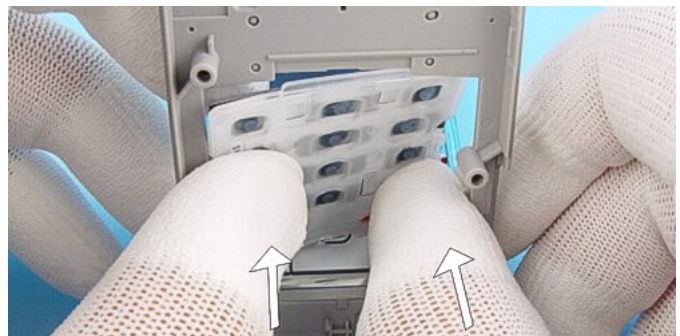
17.) Open the HINGE FLEX CONNECTOR by using the SS-34 and take away the B1 COVER with ENGINE MODULE.



18.) Remove the MICROPHONE with tweezers, be careful not to damage the spring contacts.



19.) Remove the UI FLEX ASSY by using tweezers as shown in the picture.



20.) Finally, remove the KEYMAT by pressing it slightly from the inside to the outside.

## 9. DISASSEMBLY INSTRUCTIONS UPPER BLOCK (ALSO SEE THE VIDEO CLIPS ON CARE POINT)



1.) Remove the **BATTERY** before disassembling the **UPPER BLOCK**.



2.) Open the phone and turn around the **UPPER BLOCK** 180 degrees.



3.) Protect the **WINDOW** with a film to avoid dust and scratches.



4.) Remove the **FUNCTION KEYMAT**.



5.) Unscrew the two Torx Plus® size 6 screws. For assembly, a Torx Plus® driver with a torque of 15Ncm has to be used.



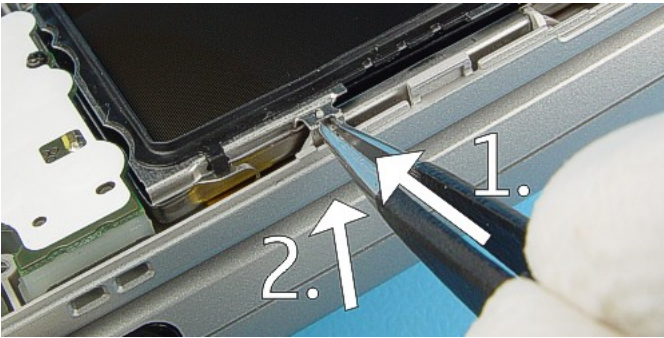
6.) First open the **A2 COVER** at one side and then...



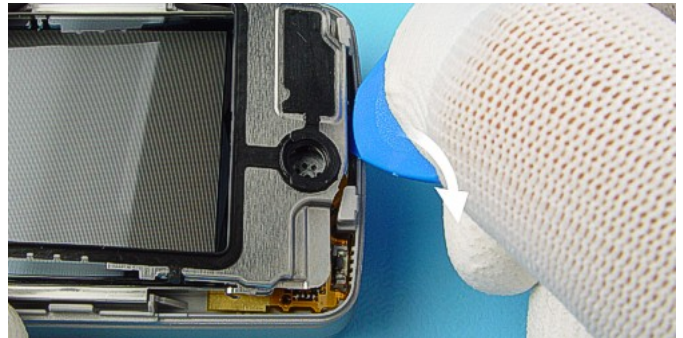
7.) ...at the other side by using the **SRT-6**. Remove the **A2 COVER**.



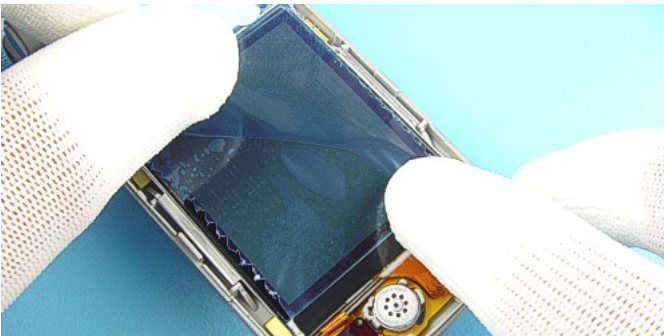
8.) Use tweezers to remove the **LCD SHIELD**. Start at one side and then...



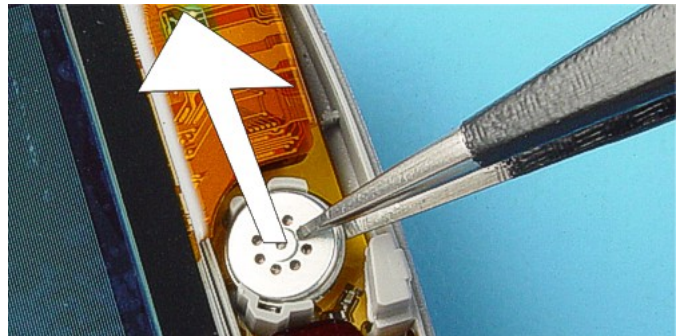
9.) ...on the other side.



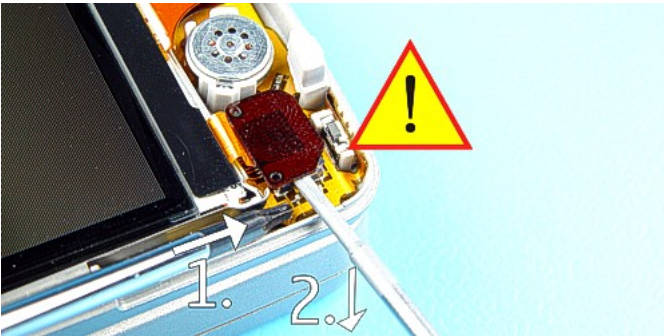
10.) Now remove the LCD SHIELD with the SRT-6.



11.) Protect the LCD with a film to avoid dust and scratches.



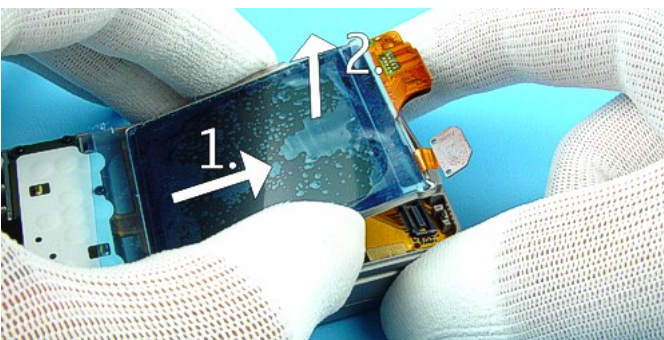
12.) Remove the EARPIECE with tweezers. Mind the guide pin when assembling.



13.) To open the LCD CONNECTOR hold the FLEX FOIL down with the Torx driver and lever up the LCD CONNECTOR with a slotted screwdriver carefully. Note not to damage the FLEX FOIL, LCD CONNECTOR or surrounding components.



14.) Lever up the right corner of the LCD with SRT-6.

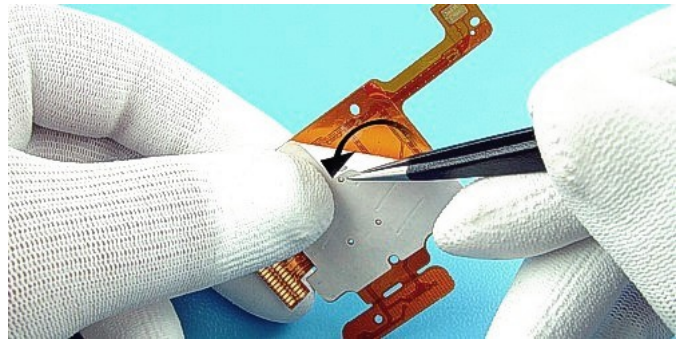


15.) Remove the LCD as shown in the picture.

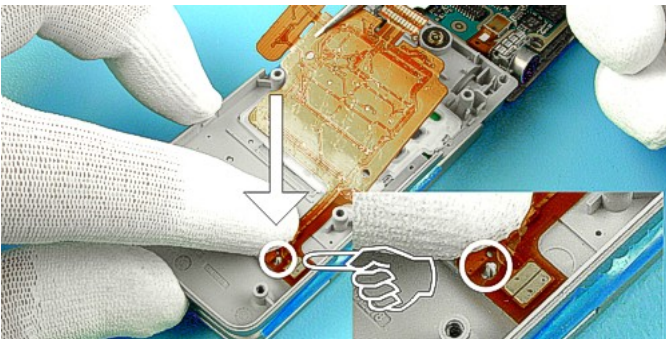
## 10. UI FLEX ASSY EXCHANGE INSTRUCTIONS



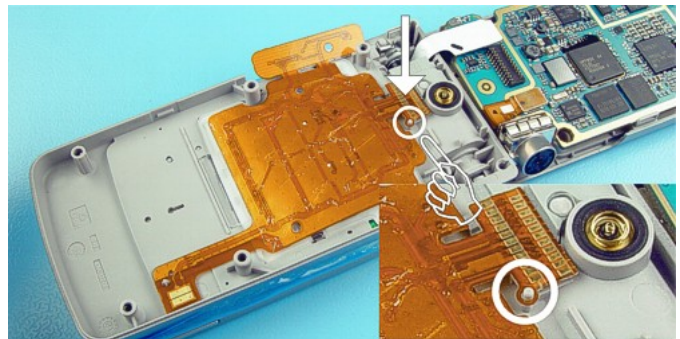
1.) For UI FLEX ASSY exchange the KEYMAT has to be assembled.



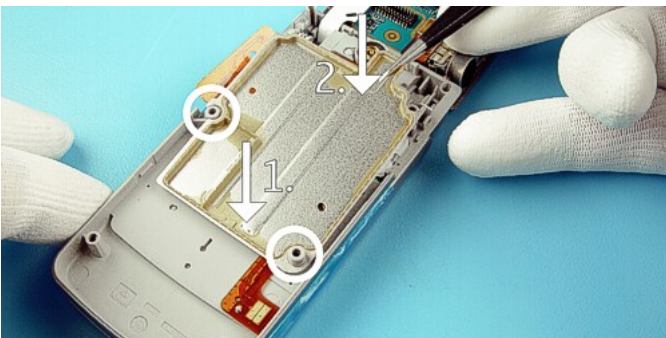
2.) Remove the protection film from the UI FLEX ASSY.



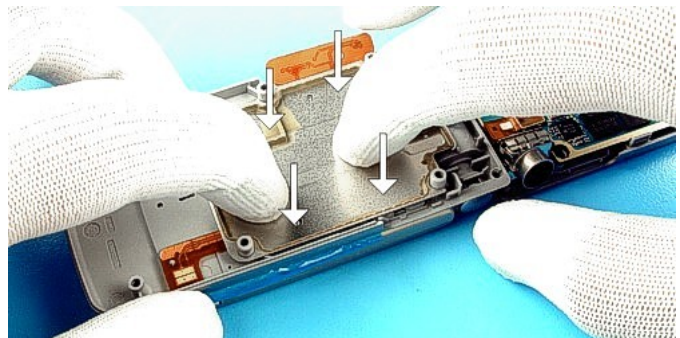
3.) Place one side of the UI FLEX ASSY to the guide pin.



4.) Then place the other side like shown in the picture.



5.) Place the SHIELD on the UI FLEX ASSY with tweezers.

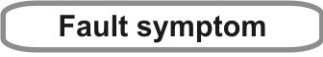







6.) Now, press the SHIELD to the UI FLEX properly.

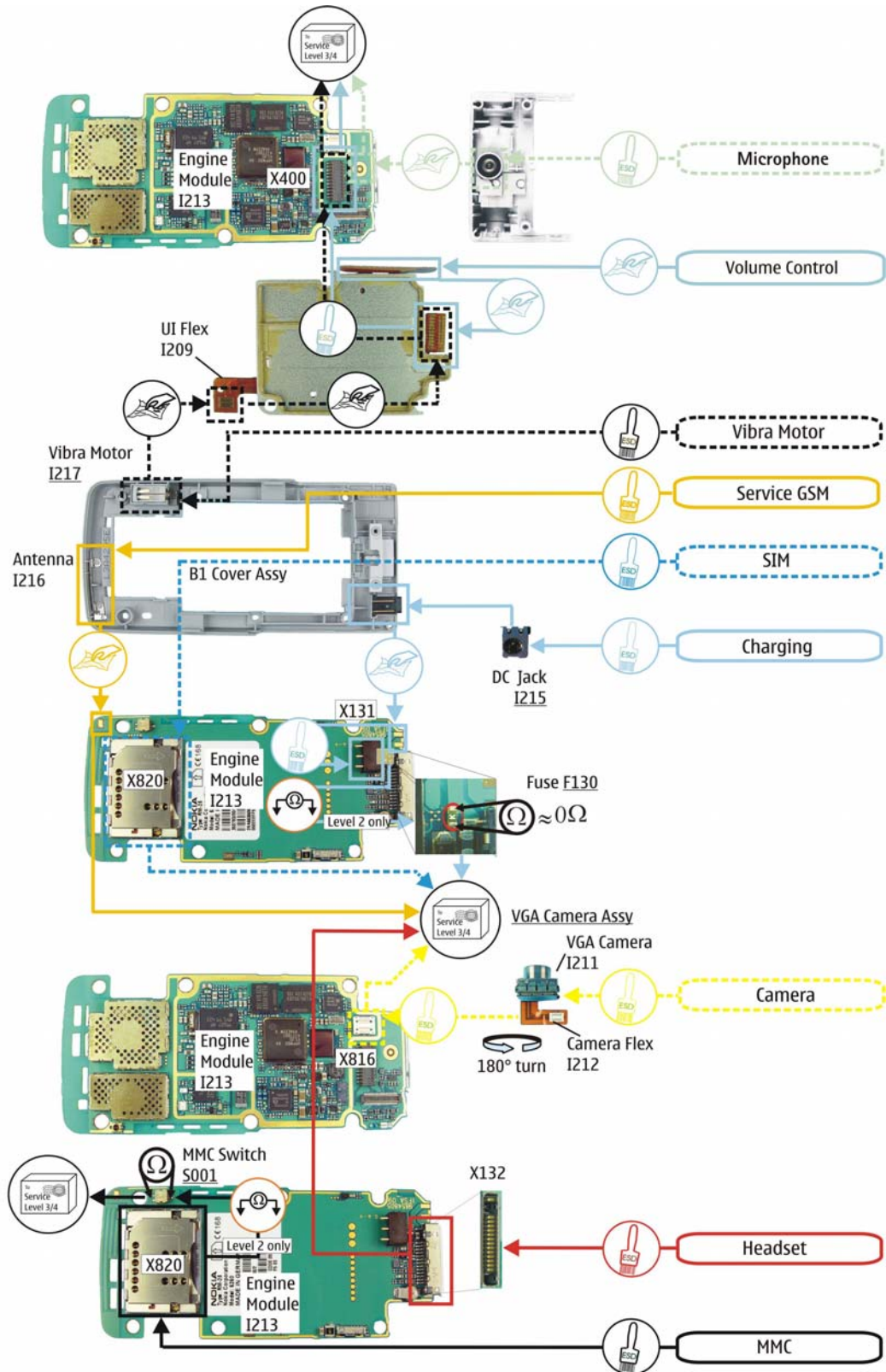


## 11. LEGEND FOR QUICK TROUBLE SHOOTER

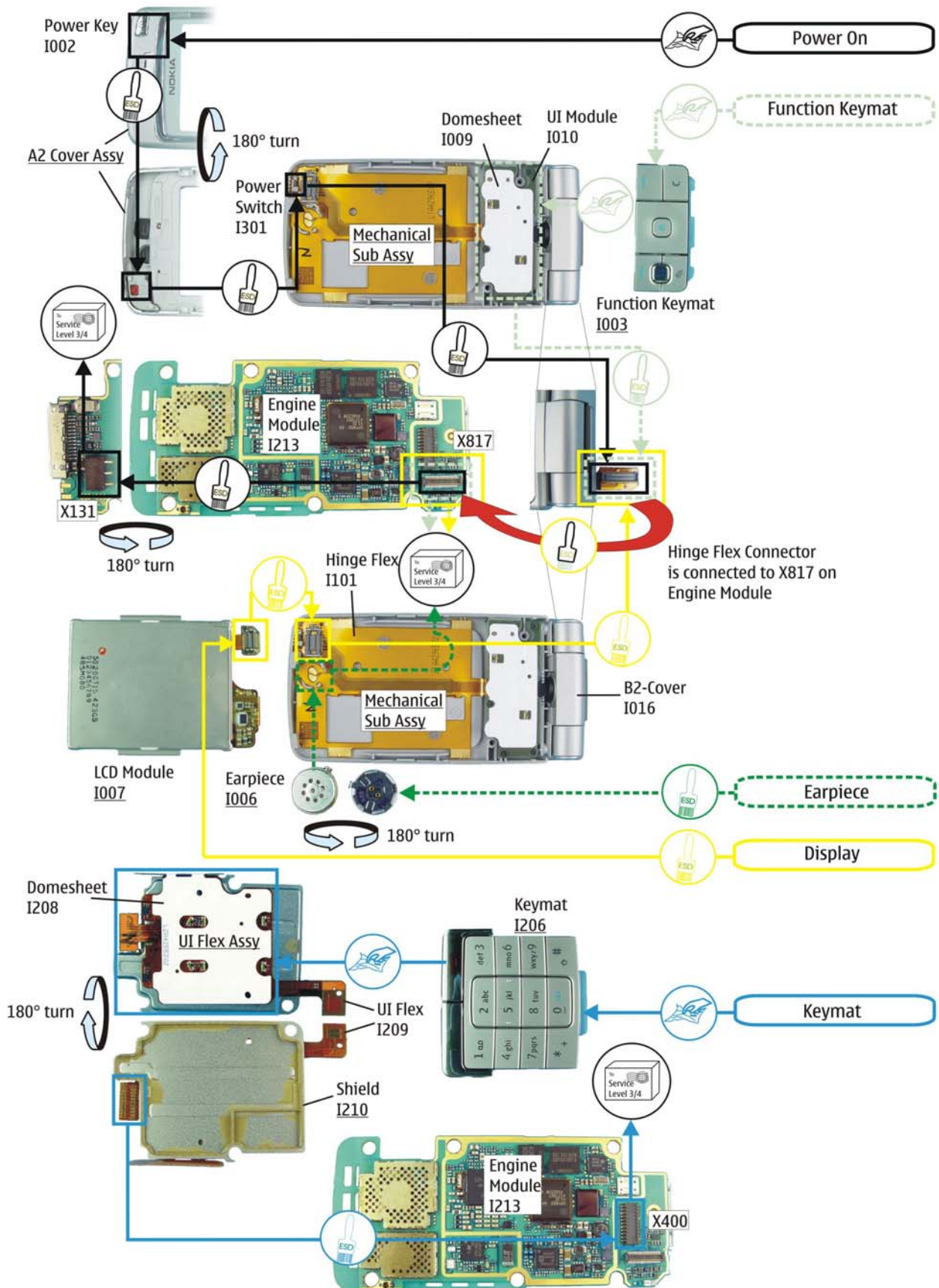
This legend is valid for all parts of the **Quick Trouble Shooter**

<p>Follow the steps until the problem is solved. If this doesn't help, you are not authorized to go forward. Only underlined components ( e.g. <u>I002</u>) can be changed.</p>	
	<p>The start point of repair activities regarding the appeared fault symptoms.</p>
	<p>Follow the arrows step by step</p>
	<p>Pads or contacts: Check optical and mechanical condition particularly regarding to corrosion. Clean if necessary.</p>
	<p>Measure component for electrical functionality and change, if needed.                  (Level 2 only)</p>
	<p>Pads or contacts: Check optical and mechanical condition particularly regarding to corrosion. Clean with ESD brush only, if necessary.</p>
	<p>No more actions possible send product to the appropriate service supplier with higher service level.</p>

## 12. QUICK TROUBLE SHOOTER PART 1



### 13. QUICK TROUBLE SHOOTER PART 2



## 14. CAMERA GONOGO TEST


Before starting the GoNoGo test, check that camera window is clean. If not, clean the window with cloth.



Figure 1



Figure 2

- Turn the Upper Block as shown in the figure 1
- To take a picture press the Capture key 
- Test was successful, if the Image appears on your Display. The camera is ok.
- Turn back the Upper Block as shown in the figure 2. Menu appears again.
- Select **Options**
- Select **Delete**
- Select **Yes**
- Select **Exit** for Home Menu
- If the test is failed see Quick Trouble Shooter.

## 15. BLUETOOTH & INFRARED TEST

### Bluetooth test

You need another Bluetooth device (e.g. 6310i) to do a GoNoGo test.

Make sure that Bluetooth is activated in the reference unit. The distance of the devices should be not more than 5m from each other.

### Infrared test

You need another infrared device (e.g. 6310i) to do a GoNoGo test. The infrared windows of the devices must be directed to each other and should have a distance of approximate 15 cm. Make sure that infrared is activated in receiver device.


**Warning:** Do not point the IR (infrared) beam at anyone's eye or allow it to interfere with other IR devices. This device is a Class 1 Laser product.



Reference unit, Bluetooth /infrared activated

Test unit

Settings on the test unit:

- From Home Menu, push the Menu key 
- Select **Contacts**
- This displays Phonebook entries. If phone and SIM memory is empty, create one new contact.
- Choose one phonebook entry and select **Option**.
- Select **Options**
- Select **Send**

A) - For infrared test: Select **Via infrared**

If sending of business card fails, make sure again that infrared windows are directed to each other and infrared is activated in reference device. Then try again sending.

Test was successful, if you get this message on receiver device.

You will **not** get a confirmation on sender device.

B) - For Bluetooth test: Select **Via Bluetooth**

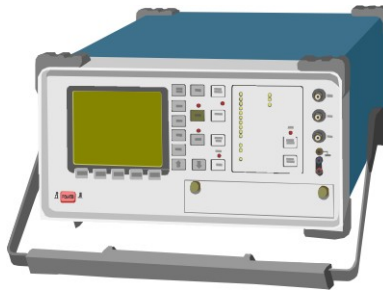
Search window appears, if all Bluetooth devices in range will be displayed, the test is successful!

- Press red receiver button for Home Menu.
- Note: **Bluetooth is activated!**

## 16. GONOGO TEST

After the optical check a GoNoGo test has to be carried out if the unit has been unscrewed to guarantee the functionality of the phone.

**Please refer to the actual information on Partner Web Site and Nokia Care Point. When using delivered tester support files, take care of the right setup according to the tester type and product type. Please refer to “Recommended Service Equipment” on Nokia Partner Web Site.**



Mobile Phone Tester

## 17. BATTERY TEST

A battery tester lets you test the capacity of Nokia batteries.

Please refer to the actual information on Partner Web Site.



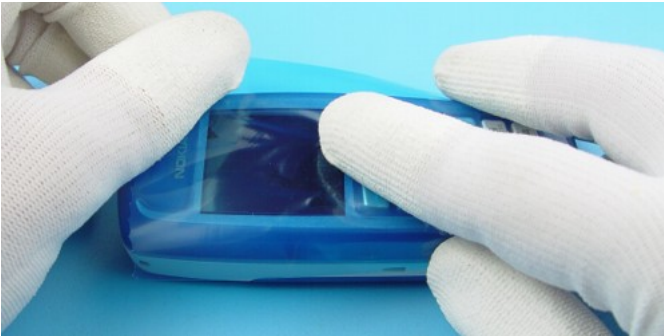
<http://www.astratec.co.uk/>



<http://www.cadex.com/>

## 18. FOR FORWARDING OF REPAIRS

When it is necessary to forward of repairs to appropriate service supplier with higher service level we recommend using the offered swap phone cartons as described in Spare Parts SB-004.



Always Protect the window with a protection film.



Put the unit under the stretch film.



Add repair documentation e.g. filled-in service note into the swap carton.



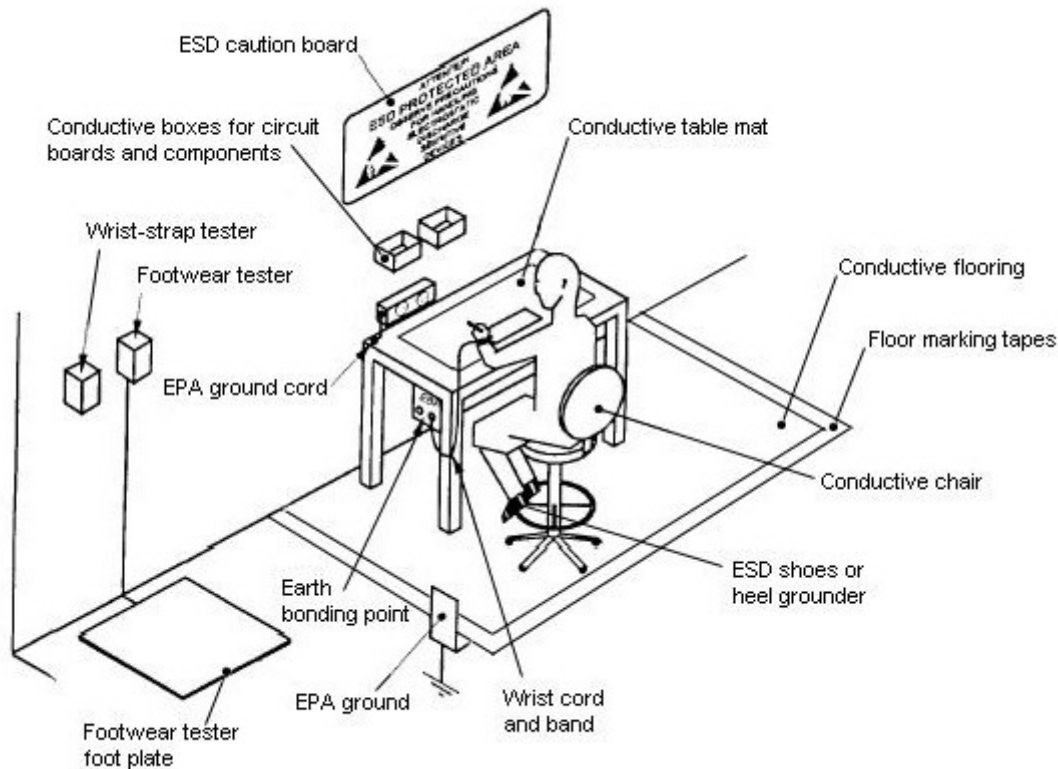
Fold the swap carton as shown in Spare Parts SB-004.



There are two different sizes of swap cartons for common mobile phones.

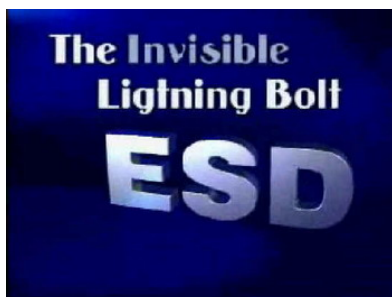
## 19. ESD PROTECTION REQUIREMENTS

Please refer to the Partner Web Site document  
[Service Supplier Requirements](#) in folder General instructions.



- USE** Conductive bags and boxes
- USE** ESD compatible service tools
- USE** Conductive wastebaskets
- USE** ESD gloves when handling PWBs/PCBs
- USE** Cleaning material without changing el. Characteristics
- USE** Grounded service equipment, i.e. soldering station
- USE** ESD clothes such as coat or frock

- NO** Smoking
- NO** Drinking
- NO** Eating
- NO** Dust
- NO** Useless Items
- NO** Normal pressured air for cleaning modules/displays



The video covers general issues concerning Electro-Static Discharge (ESD)  
source: Nokia Care Point