

# Service Repair Documentation Level 3 (basic) – SL75



Release	Date	Department	Notes to change
R 1.0	04.10.2005	BenQMobile CC S CES	New document
R 1.1	05.01.2006	BenQMobile CC S CES	Part modification

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# 1 Introduction

## 1.1 Purpose

This Service Repair Documentation is intended to support Service partners to carry out repairs on BenQ repair level 3. The described failures shall only be repaired in BenQ authorized local workshops.

The level 3 (former Level 2.5light) partners are obliged to repair level 3 classified boards, up to their repair level, under consideration of this repair instruction.

All repairs have to be carried out in an ESD protected environment and with ESD protected equipment/tools. For all activities the international ESD regulations have to be considered.

Assembling/disassembling has to be done according to the latest SL75 Level 1-2 repair documentation. It has to be ensured that every repaired mobile Phone is checked according to the latest released General Test Instruction document (both documents are available in the Technical Support section of the C-market).

Check at least weekly C-market for updates and consider all SL75 related Customer Care Information

SL75 Partnumber on IMEI label: S30880-S2820-#xxx

, while # may be any letter (A-Z) and xxx may be any number from 100, 101, 102....

**Scrap Handling: All Scrap information given in this manual are related to the SCRAP-Rules and instructions.**

**Attention: Consider the new "LEAD-FREE" soldering rules (available in the communication market), avoid excessive heat.**

## 1.2 Scope

This document is the reference document for all BenQ mobile authorised Service Partners which are released to repair BenQ mobile phones up to level 2.5 light.

## 1.3 Terms and Abbreviations

## 2 List of available level 3 (basic) parts

(according to Component Matrix Vxx - check C-market for updates)

Product	ID	Order Number	Description CM
SL75	V2802	L50640-L2109-D670	LED WHITE FLAT
SL75	V2803	L50640-L2109-D670	LED WHITE FLAT
SL75	V2804	L50640-L2109-D670	LED WHITE FLAT
SL75	V2805	L50640-L2109-D670	LED WHITE FLAT
SL75	V4902	L50640-L2108-D670	FLASH-LED HIGH BRIGHTN. WHITE
SL75	X1400	L36334-Z97-C213	CONNECTOR BATTERY 3-POL
SL75	X1504	L36334-Z93-C303	IO-JACK SLIM 12-POL
SL75	X1604	L36334-Z97-C335	CONNECTOR SIM CARD READER R65
SL75	X2750	L50697-F5004-F505	CONNECTOR BOARD TO BOARD 40-POL
SL75	X3500	L50634-Z97-C379	CONNECTOR CAMERA-SOCKET
SL75	Z1601	L50620-U6029-D670	FILTER EMI (Fi-Type7) PB Free

## 3 Hardware requirements

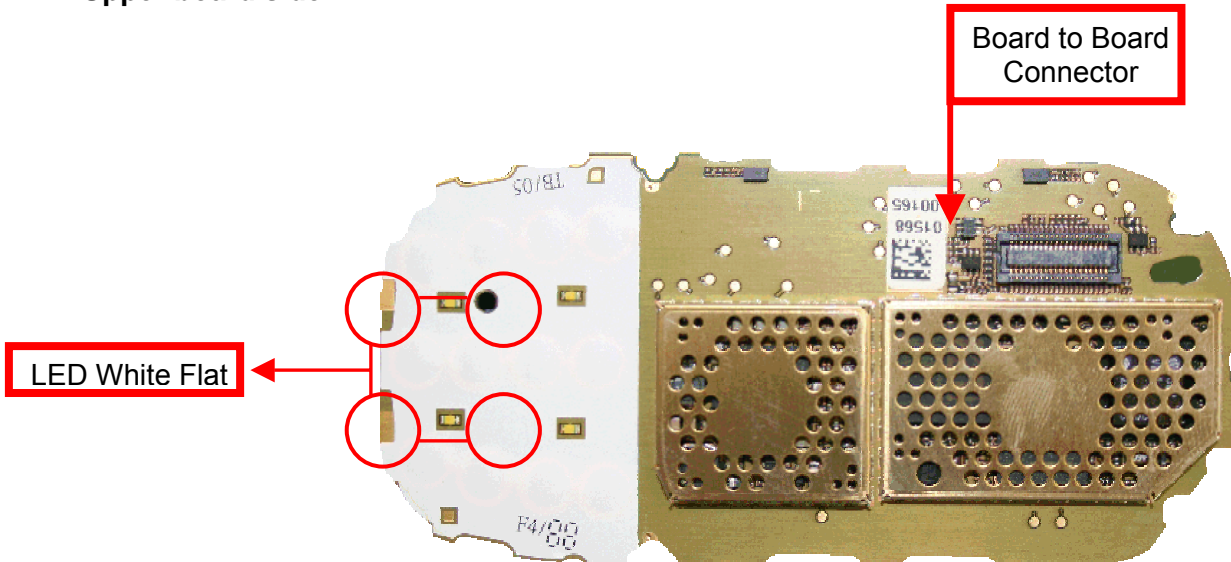
(according to General soldering information V1.3 - check C-market for updates)

Jigs, Tools and working materials for all described repairs:

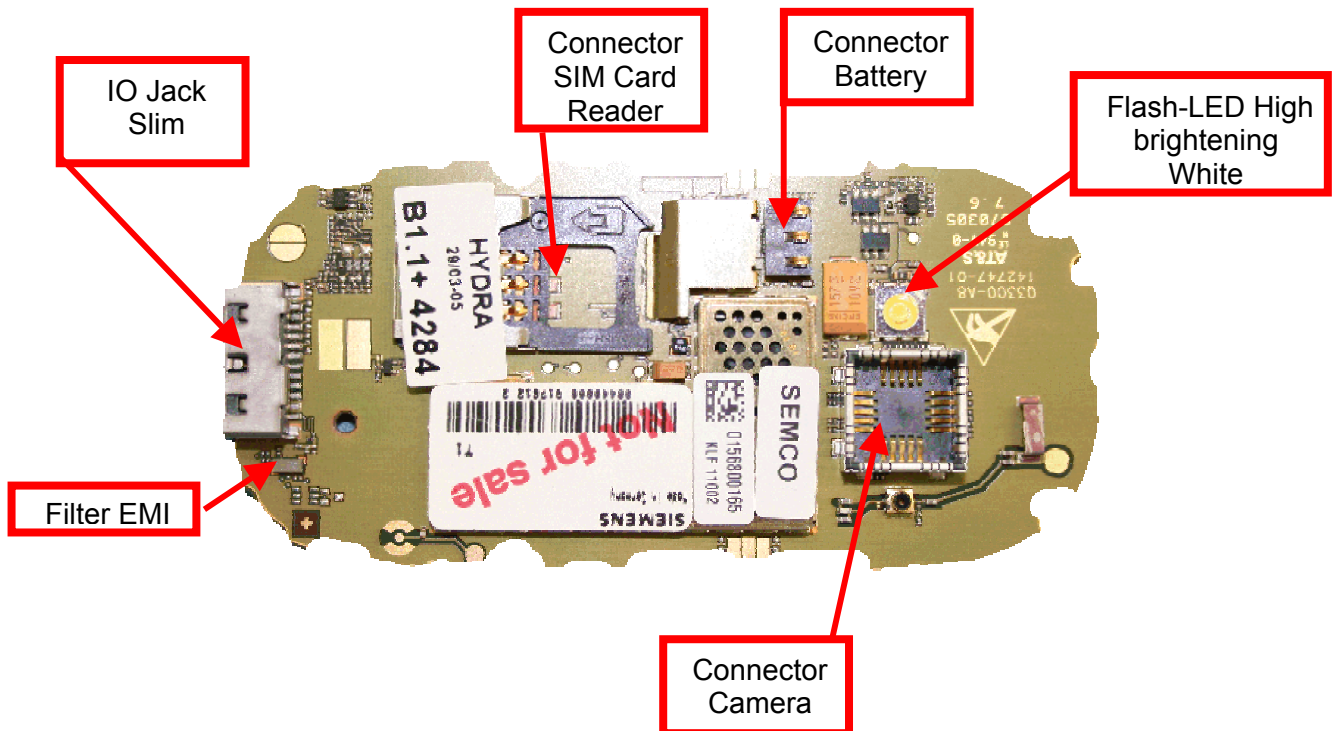
- hot air blower
- soldering gun
- tweezers
- flux
- solder
- SL75 dome sheet jig

## 4 SL75 Board layout

Upper board side

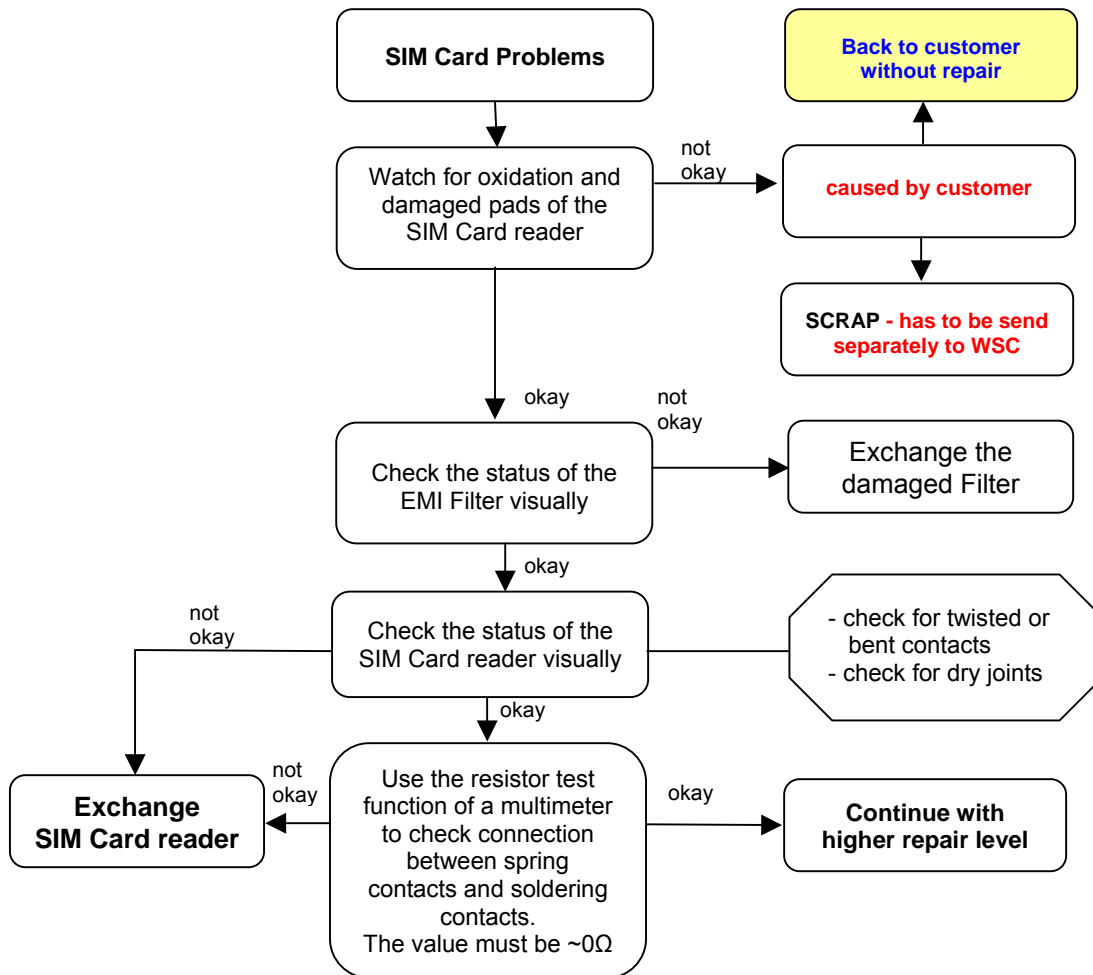


Lower board side



## 5 SIM Card Problems

Fault Symptoms	
Customer: Handset does not accept SIM card	GRT: SIM Card Problems



### Connector SIM Card Reader

Use soldering iron to remove defective component. Avoid excessive heat! Watch surrounding components!

Resolder new component afterwards.

E-commerce order number: L50634-Z97-C406

E-commerce order name: CONNECTOR SIM CARD READER R65 (B)

Soldering temperature: ~ 360°C TIP Temp.

### EMI Filter

Use hot air blower to remove defective component. Avoid excessive heat! Watch surrounding components!

Resolder new component afterwards.

E-commerce order number: L50620-U6029-D670

E-commerce order name: FILTER EMI (Fi-Type7) PB Free

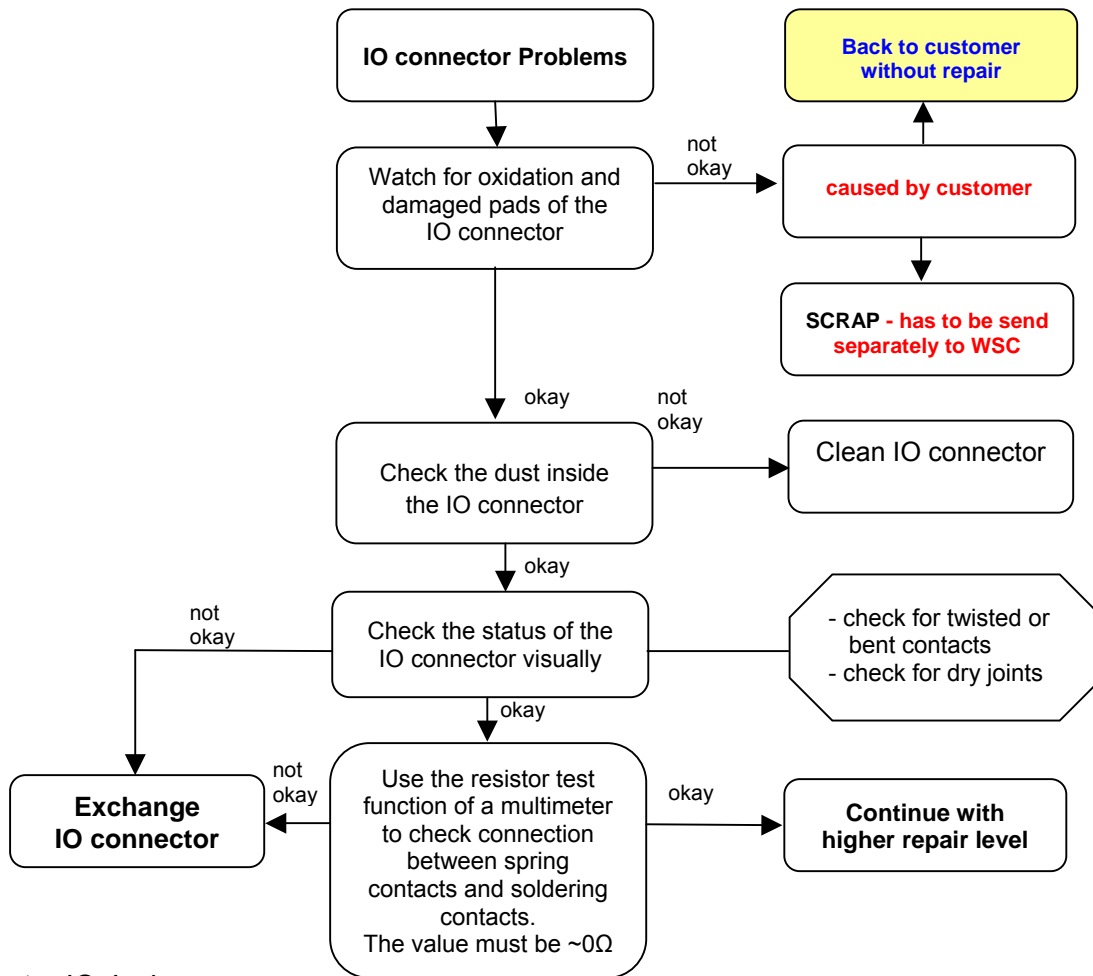
Soldering temperature: ~ 360°C TIP Temp

IRIS Diagnose Code: 43300 Interface/SIM Card reader/Mechanical Damage

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## 6 IO Connector Problems

Fault Symptoms	
Customer: Charging Problems Problems with external loudspeaker or microphone when using a car kit Problems with accessories connected at the IO connector	GRT: No connection to GRT



### Connector IO Jack

Use soldering iron to remove defective component. Avoid excessive heat! Watch surrounding components! Resolder new component afterwards.

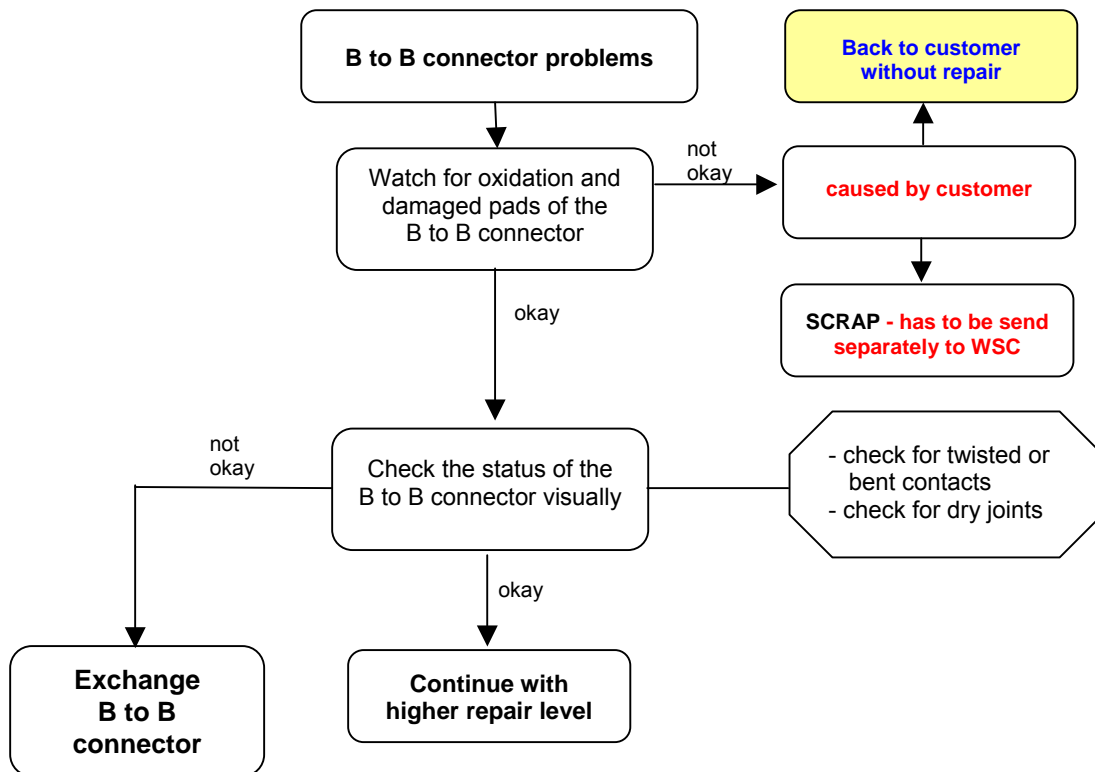
E-commerce order number: L36334-Z93-C303  
 E-commerce order name: IO-JACK SLIM 12-POL  
 Soldering temperature: ~ 360°C TIP Temp.

IRIS Diagnose Code: 46100 Interface/Charging Connector/Mechanical Damage  
 47300 Interface/Data Interface/Mechanical Damage  
 4B100 Interface/Headset Connector/Mechanical Damage

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## 7 B to B connector (upper slider part) Problems

Fault Symptoms	
Customer: Upper slider keyboard malfunction Upper slider keypad illumination does not work Display problems	GRT: Keyboard malfunction Current measured failed



### Connector Board to Board

Use hot air blower to remove defective component. Avoid excessive heat! Watch surrounding components! Resolder new component afterwards.

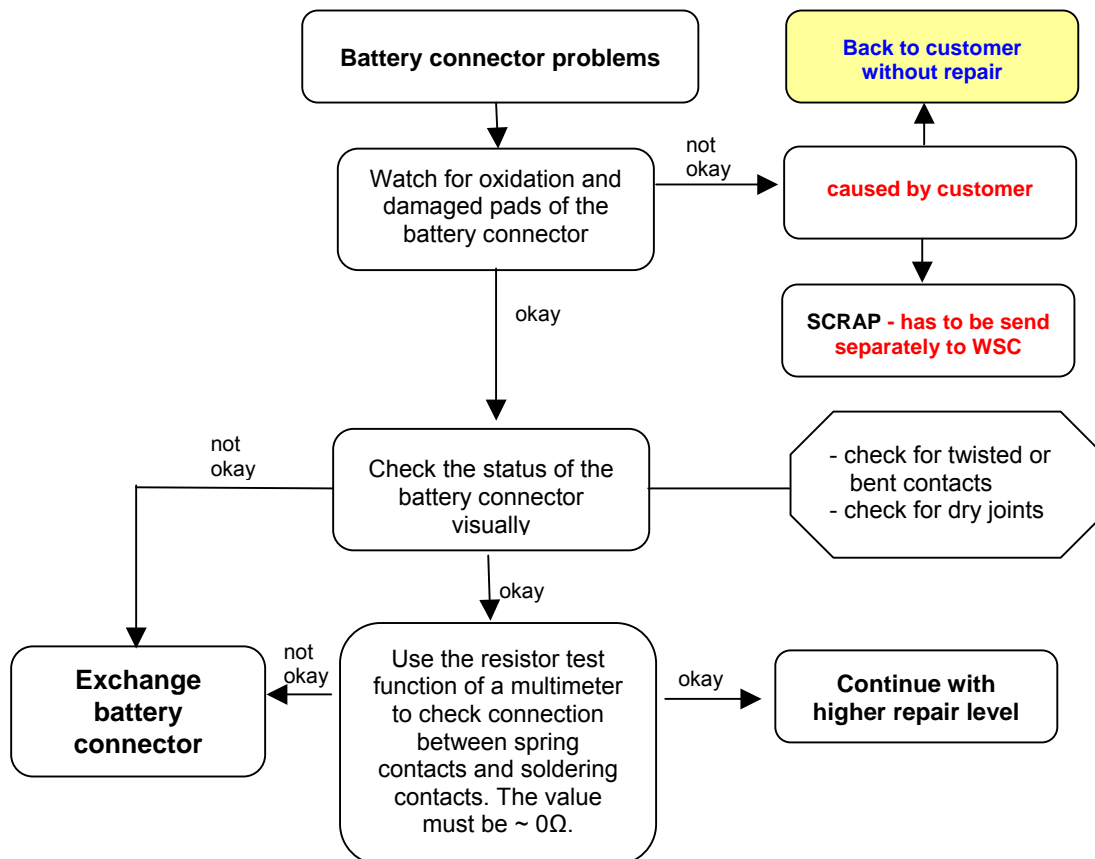
E-commerce order number: L50634-Z97-C340  
 E-commerce order name: BOARD TO BOARD 30-POL  
 Soldering temperature: ~ 360°C TIP Temp.

IRIS Diagnose Code: 32100 Keys / Main / No Function  
 32200 Keys / Main / Reduced Functionality  
 36000 Keys / Illumination



## 8 Battery connector Problems

Fault Symptoms	
Customer: Mobile does not switch on	GRT: No connection to GRT



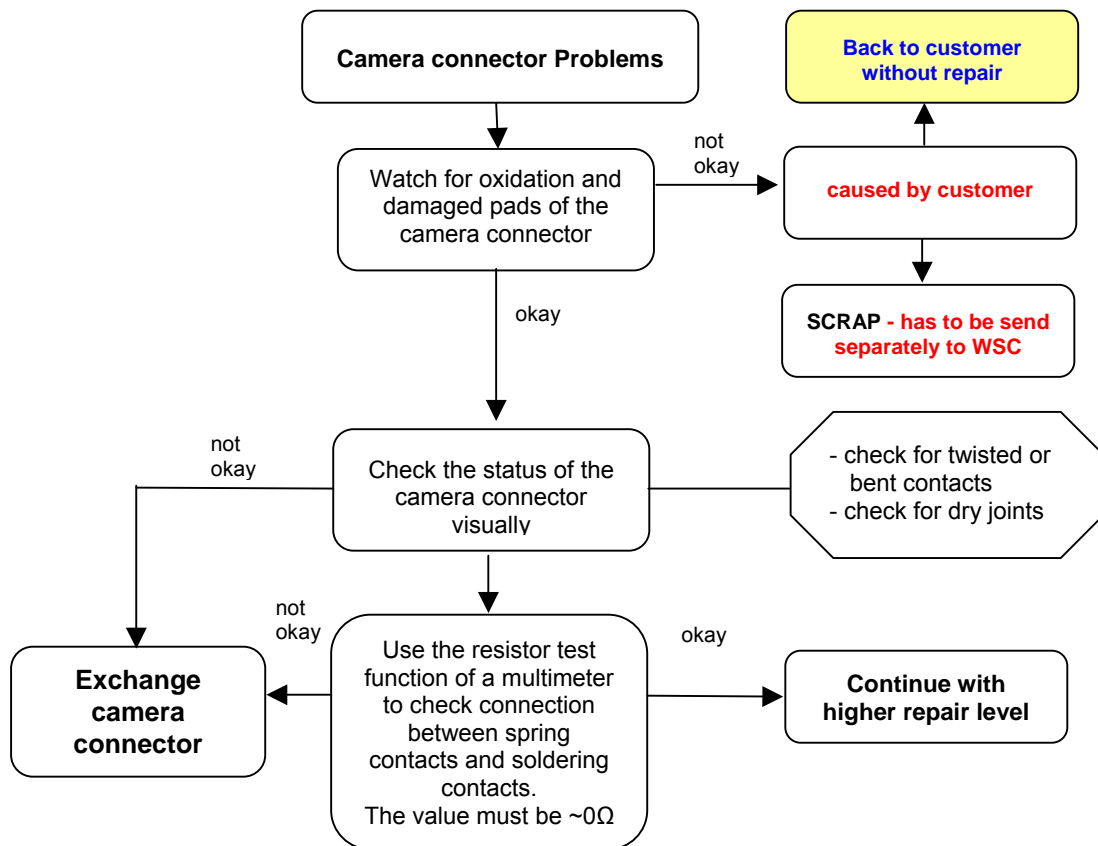
### Connector BATTERY

Use hot air blower to remove defective component. Avoid excessive heat! Watch surrounding components! Resolder new component afterwards.

E-commerce order number: L36334-Z97-C213  
 E-commerce order name: CONNECTOR BATTERY 3-POL  
 Soldering temperature: ~ 360°C TIP Temp.  
 IRIS Diagnose Code: 13000 Battery/Mechanical Damage

## 9 Camera Connector Problems

Fault Symptoms	
Customer: Camera malfunction	GRT: Tbd.



### Connector CAMERA

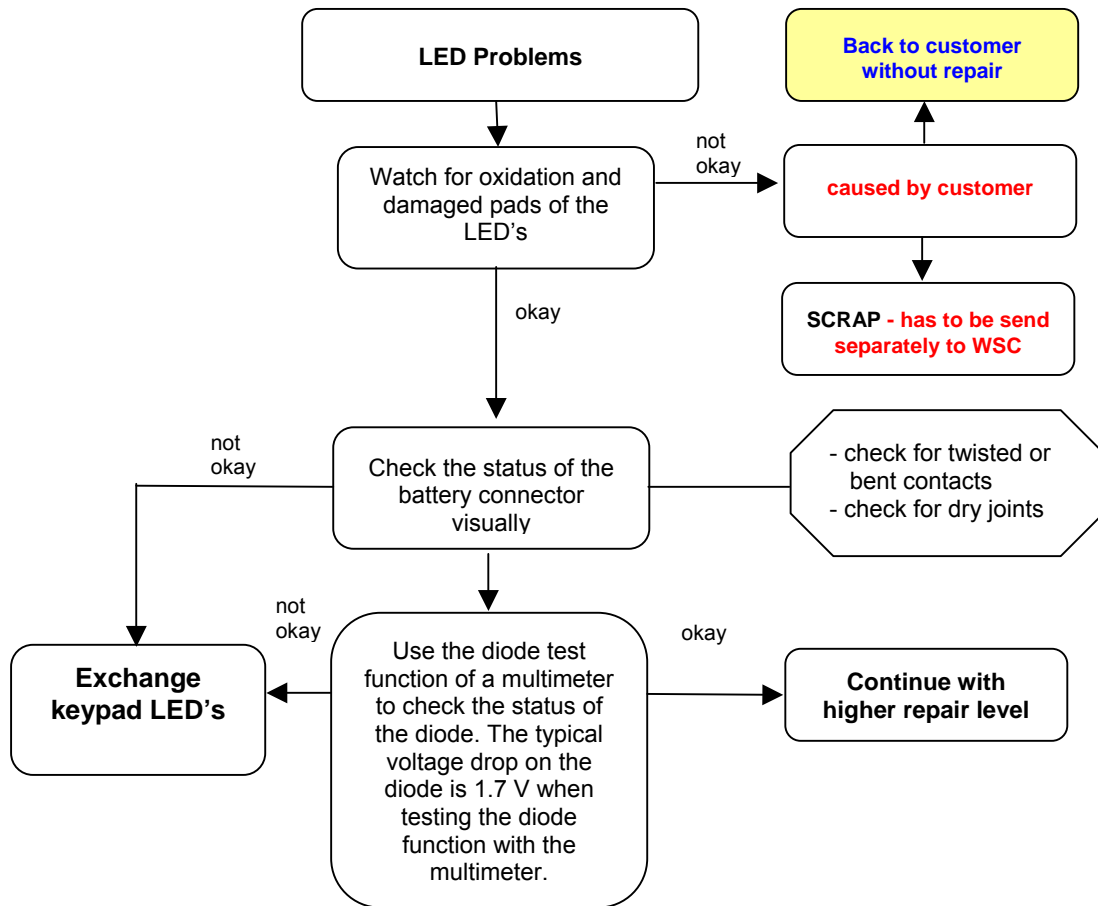
Use hot air blower to remove defective component. Avoid excessive heat! Watch surrounding components! Resolder new component afterwards.

E-commerce order number: L50634-Z97-C379  
 E-commerce order name: CONNECTOR CAMERA-SOCKET  
 Soldering temperature: ~ 360°C TIP Temp.  
 IRIS Diagnose Code: BA000 Accessories / Camera

## 10 Main keypad illumination Problems

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Fault Symptoms	
Customer: Main keypad illumination does not work	GRT: Current measured failed



LED WHITE TOP

Use soldering iron to remove defective component. Avoid excessive heat! Watch surrounding components! Resolder new component afterwards.

**Attention: Remove Metal Dome Sheet before!!!**

E-commerce order number: L36840-L2099-D670

E-commerce order name: LED WHITE TOP

Soldering temperature: ~ 360°C TIP Temp.

IRIS Diagnose Code: 36000 Keys/Illumination