BLÜ™

PRODUCTS

Service Manual for JENNY TV

CAUTIONS

1. Please read this service manual carefully and make sure all elements of anti-static are in place before the repair work is carried out.
2. Servicing and alignment **MUST** be undertaken by qualified personnel only.
3. Please use specified tools and equipments for servicing, in which the parameters need to be calibrated with specified criteria.

ATTENTION

Boards, which contain Electrostatic Sensitive Device(ESD), art indicated. Following information is ESD handling:

- Service personnel should ground themselves by using a wrist strap when exchange system boards.
- When repairs are made to a system board, they should spread the floor with anti-static mat which is also grounded.
- Use a suitable, grounded soldering iron.
- Keep sensitive parts in these protective packages until these are used.
- When returning system boards or parts like EEPROM to the factory, use the protective packages as described

Content

Chapter 1 Specification

Features & Functions

-Dual SIM Dual Standby Single Connection
-Fashion bar phone
-FM
-Multi-Media application
-0.3Mega with SW upgrade 0.3M
-T-Flash (Support 8G T Card)
-2.4 QVGA240*320
-MP3, MP4, AVI, 3GP
-USB1.1, Mini USB

Specifications:

Network: 850/900/1800/1900MHz
Display: 2.4 QVGA 240*320
Camera: 0.3Mega
Talk time: 600 min
Stand-by: 240 hour
Lithium Battery: Standard (900mAh)
USB Data cable: USB 1.1

Chapter 3 Tools

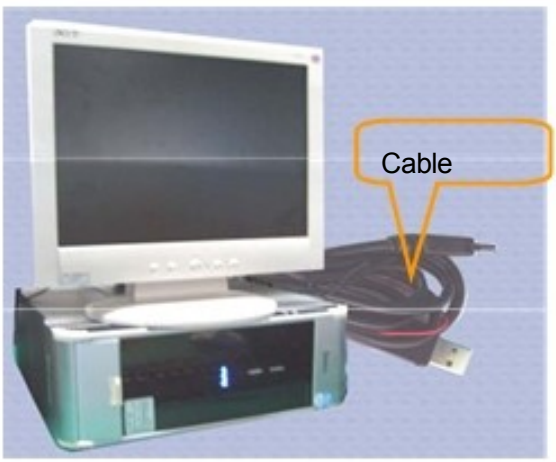
Solder iron

Hot Air Gun

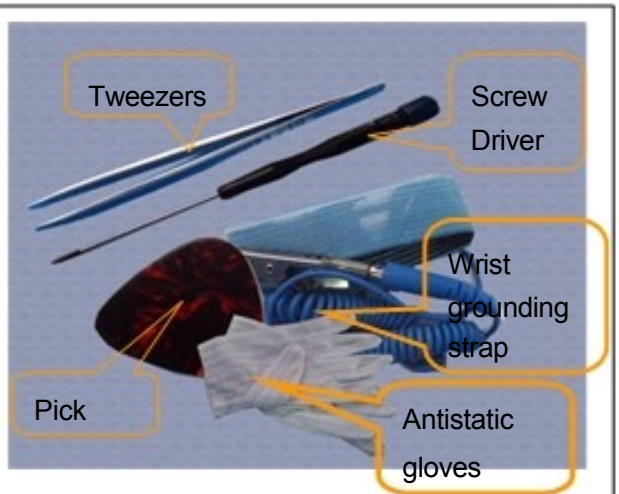
Power Supply

Multimeter

Solder wire, Flux



PC, Download cable



Others

Chapter 4 Disassembly & Assembly

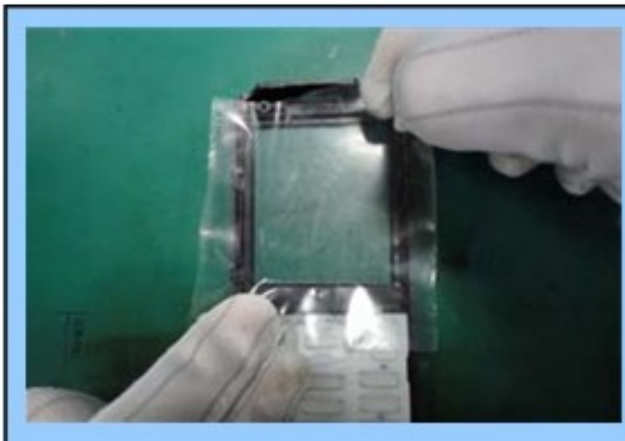
1. Disassembly Process

1. Remove the battery cover

2. Unfasten the 4 screws by screw driver

3. Prize up the back cover by pick

4. Stick protection film for LCM.

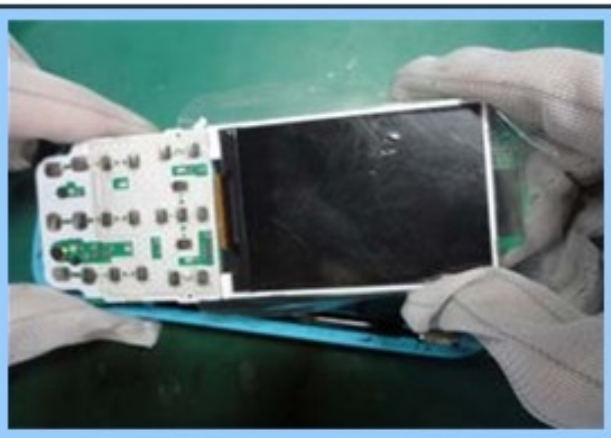


5. Stick protection film for front cover.

6. Take out the PCBA by pick.

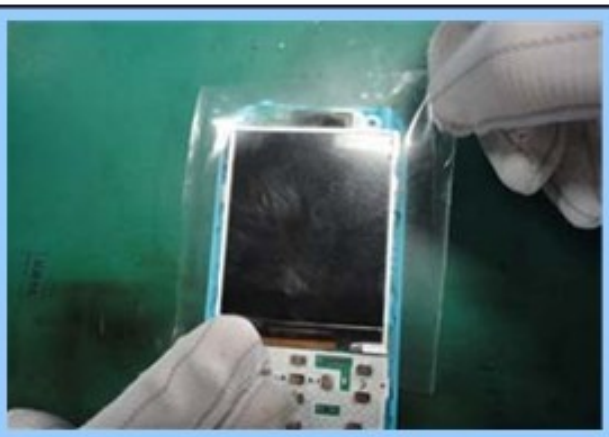
Finished.

2. Assembly Process



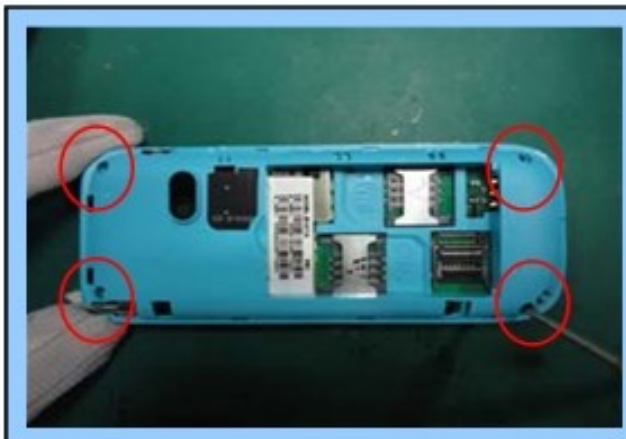
1. Install the PCBA

2. Tear down the LCD protection film.



3. Tear down the protection film.

4. Install the rear cover module.



5. Fasten the 4 screws.

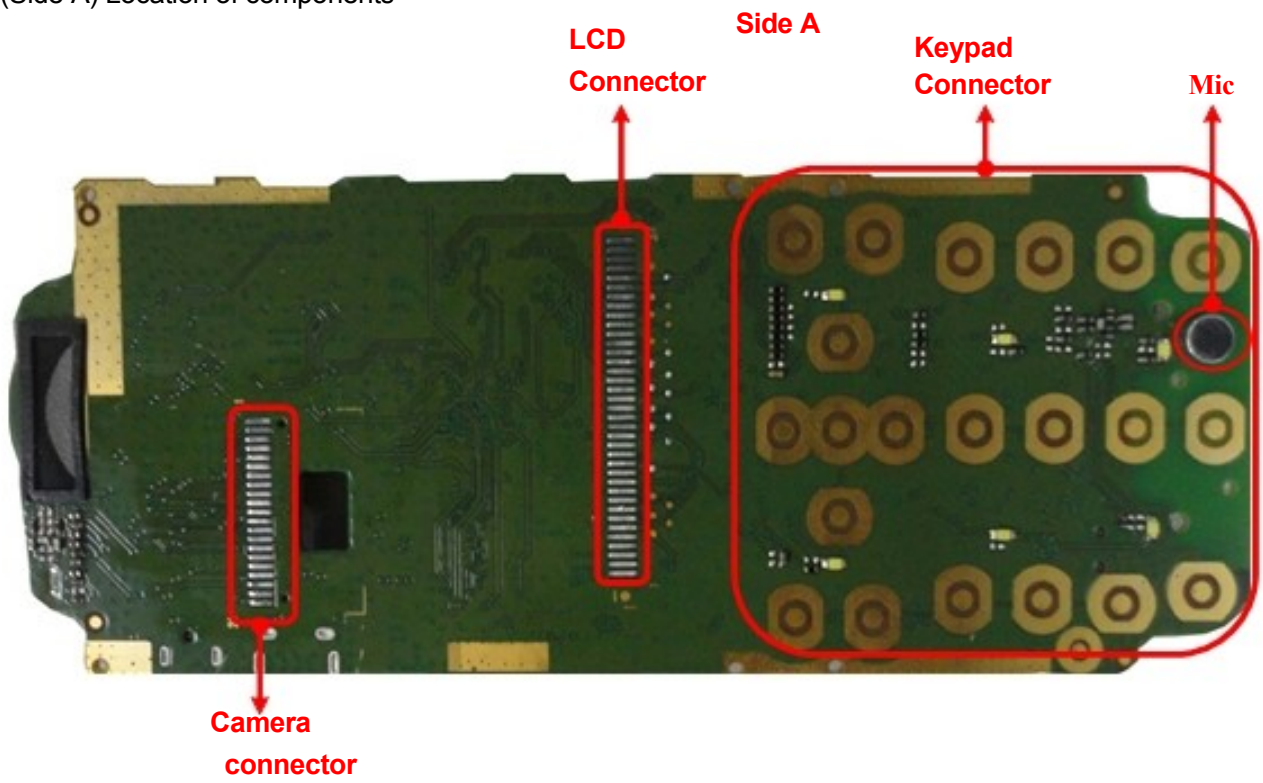
6. Install the back cover.

Finished.

Chapter 5 Picture of PCBA

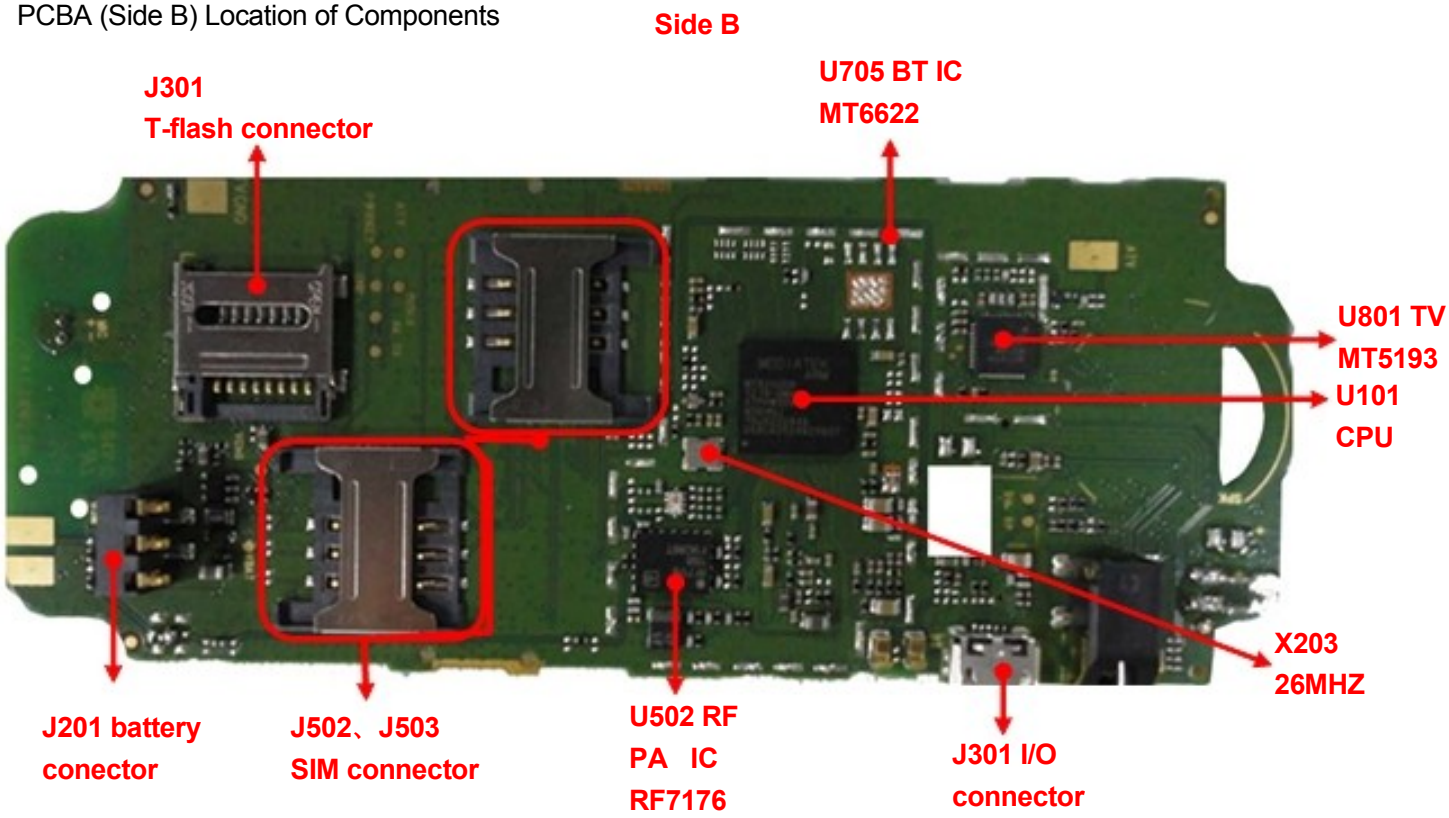
5.1 Side A

PCBA (Side A) Location of components

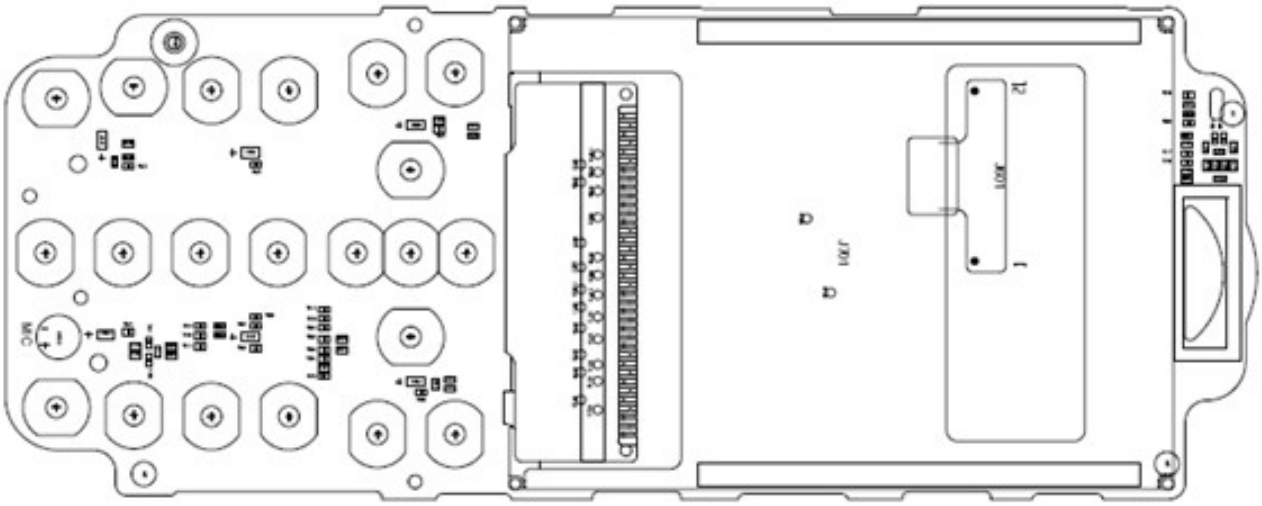


5.2 Side B

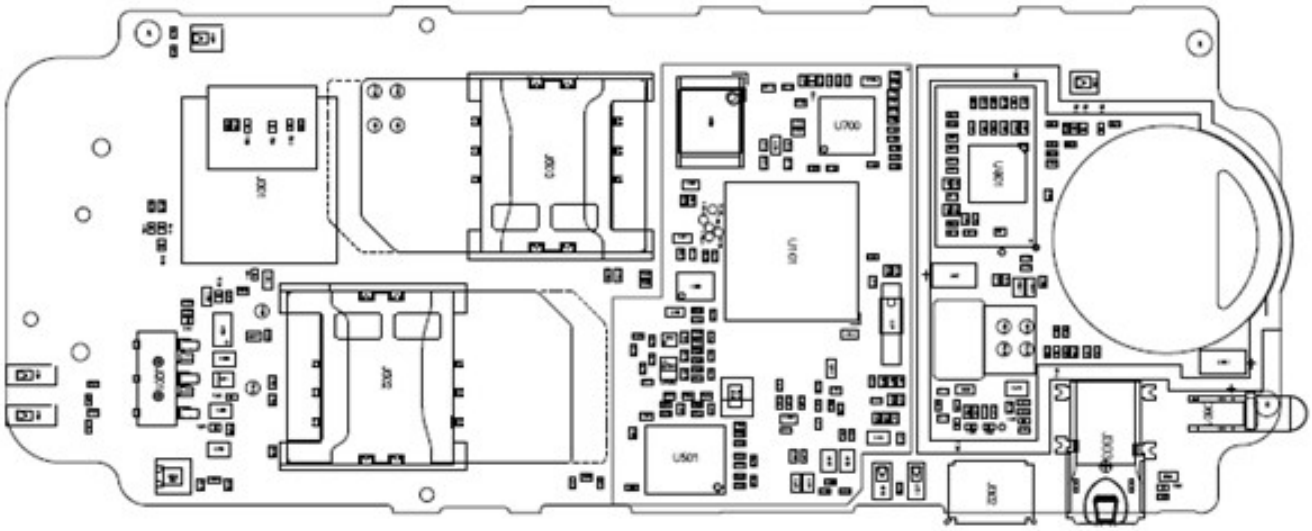
PCBA (Side B) Location of Components



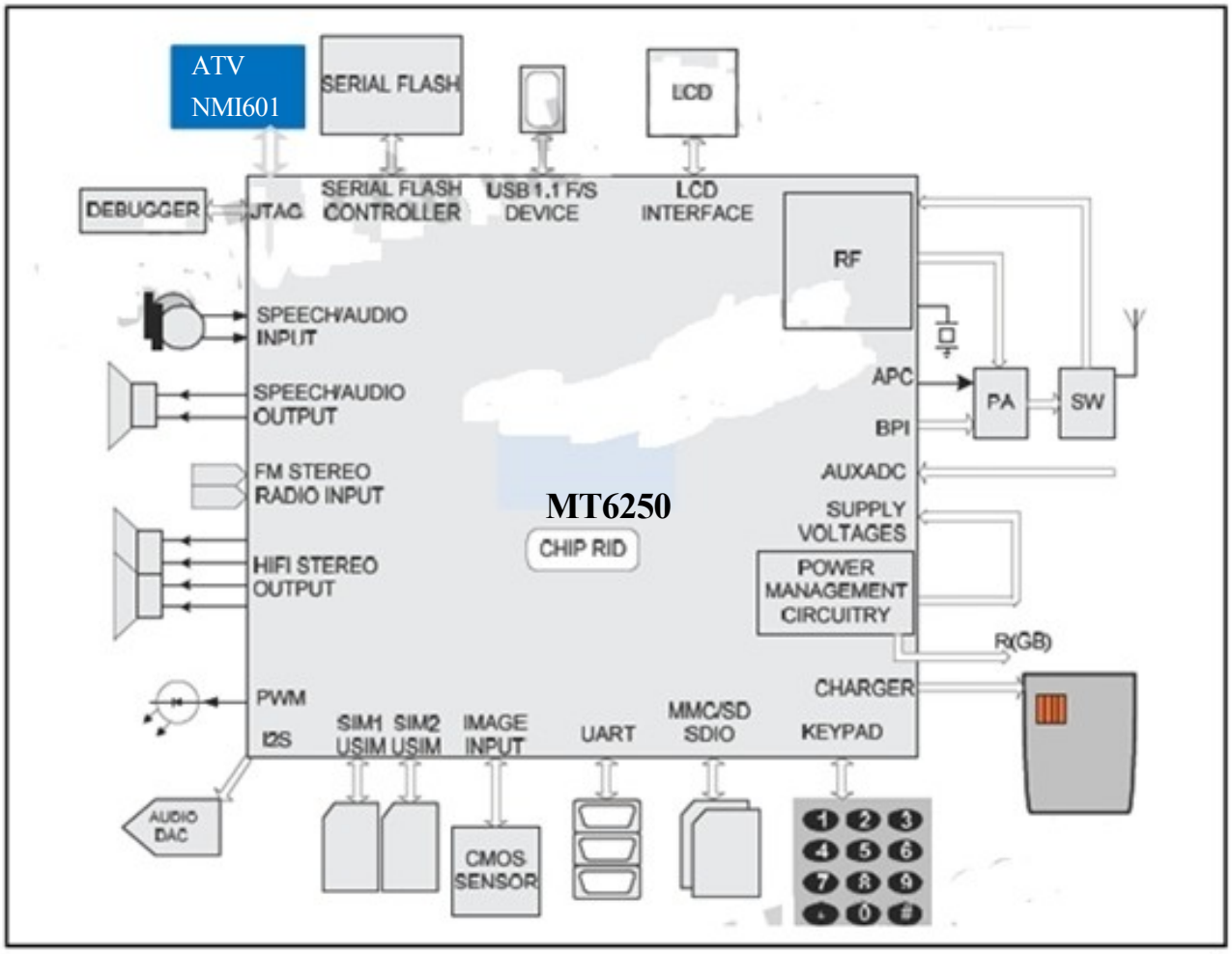
5.3 PCBA Layout side A



5.4 PCB Layout Side B



Chapter 6 System Block Chart



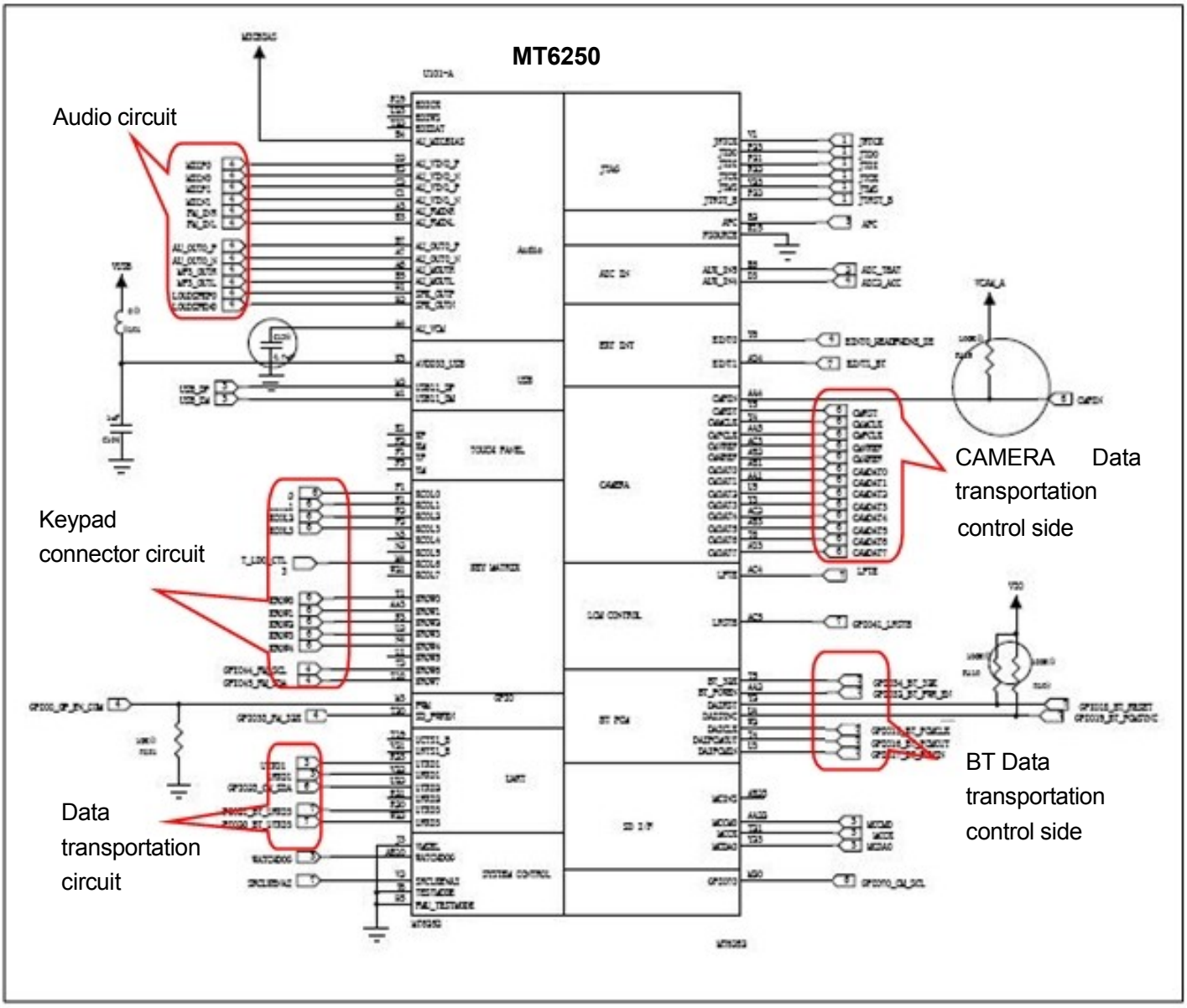
Chapter 7 Unit Circuit

7.1.1 System Overview

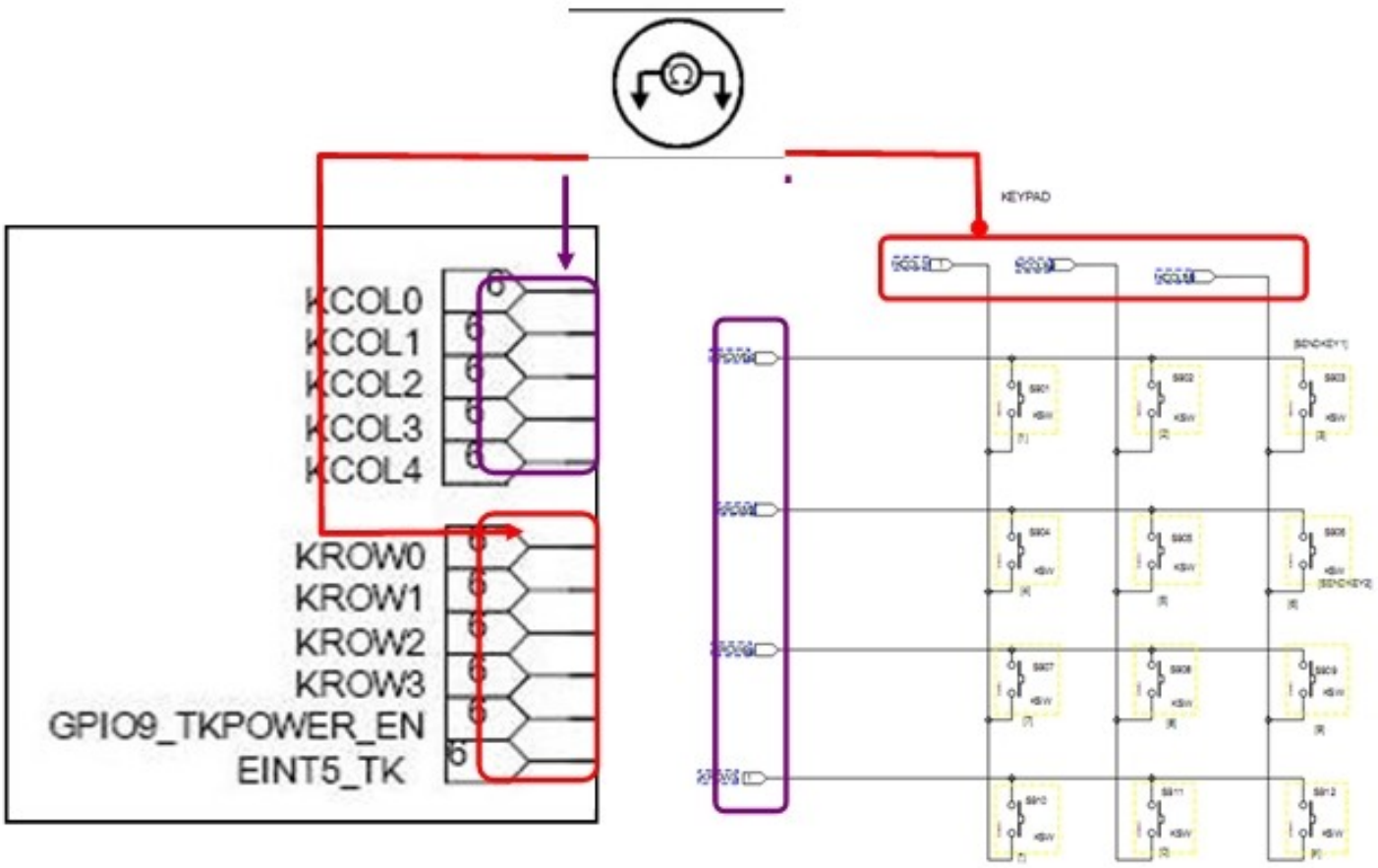
MT6250 is a GSM/GPRS handset chip solution which integrates RF, analog baseband, digital baseband as well as Power Management Unit(PMU) and can greatly reduce the component count and make a smaller PCB size MT6250 including Bluetooth and FM. Besides,MT6250 is capable of Single Antenna Interference Cancellation (SAIC) and AMR speech™Based on a 32-bit ARM7EJ-S RISC
Processor,MT6250 provides an unprecedented platform with high quality modem performance.

Chapter 7 Unit Circuit

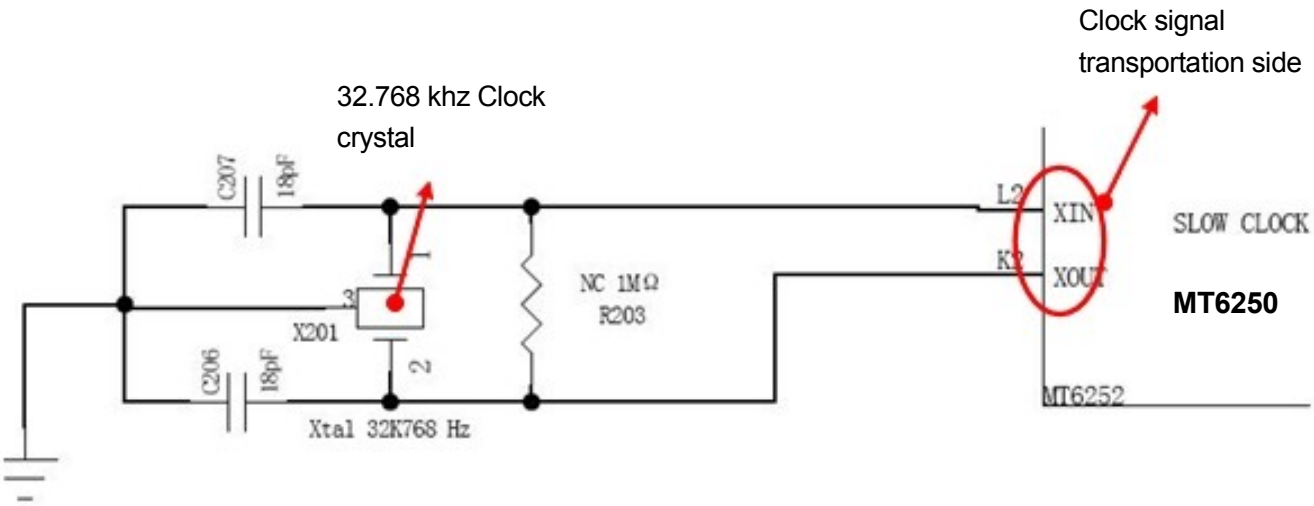
7.1.2 Baseband & CPU



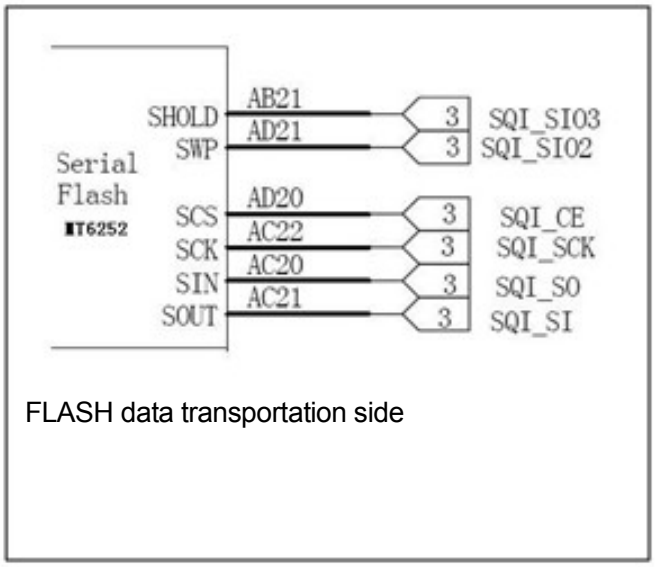
7.1.2 Baseband - Keypad



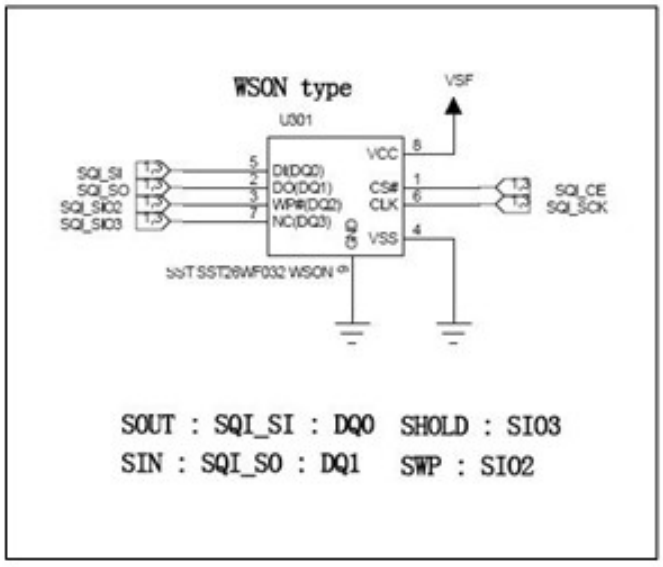
7.1.3 Clock 32.768KHZ Circuit



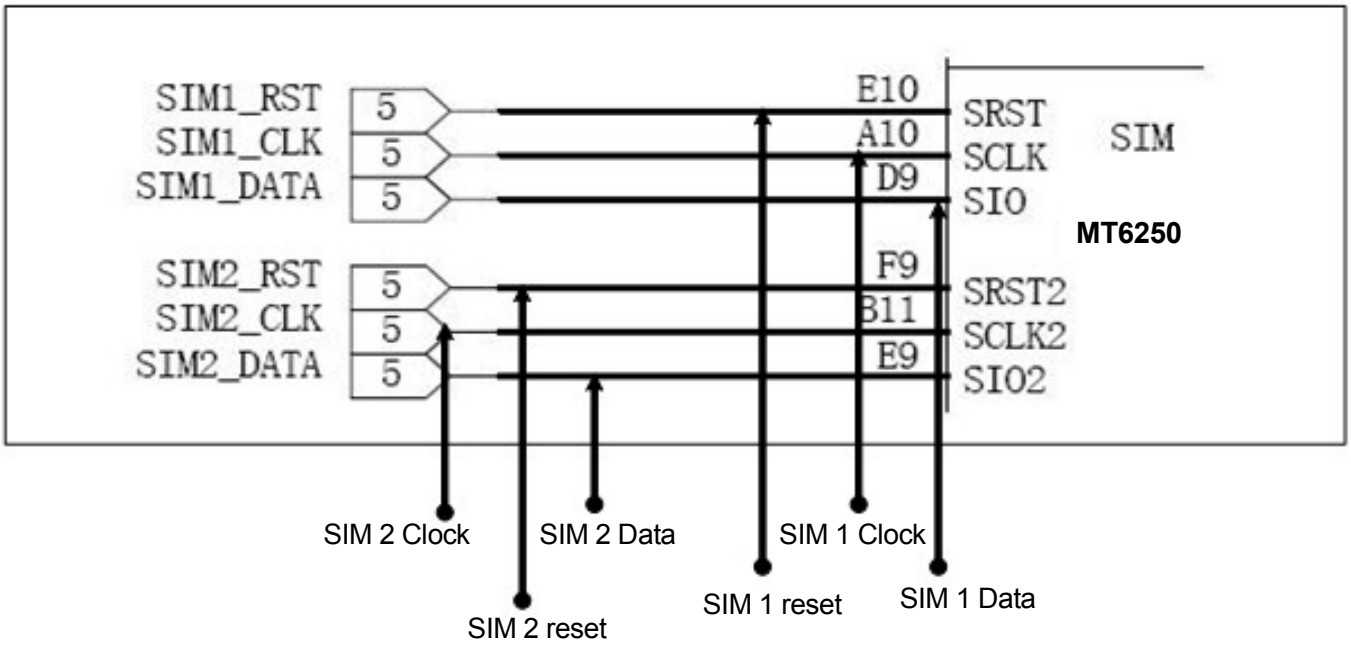
7.1.4 CPU to Flash



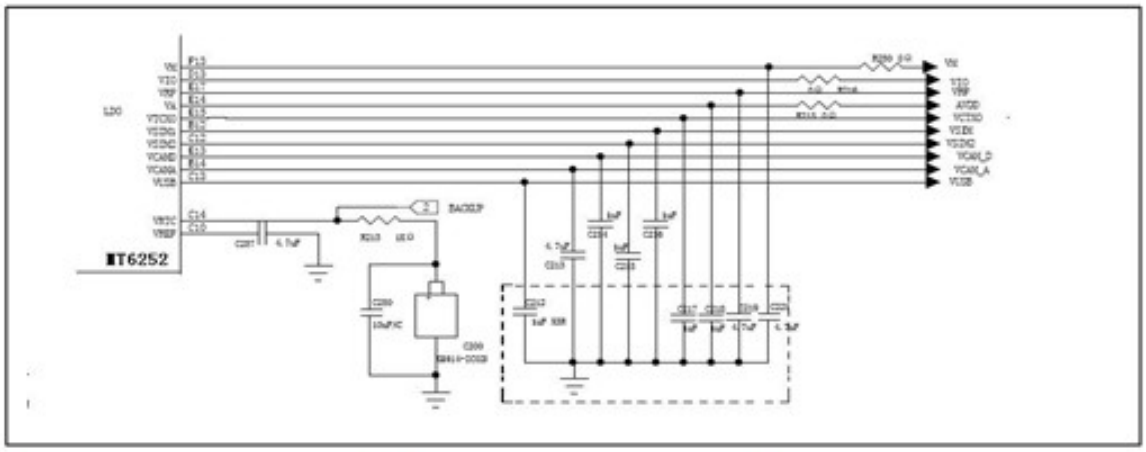
FLASH data transportation side



7.1.5 SIM data output

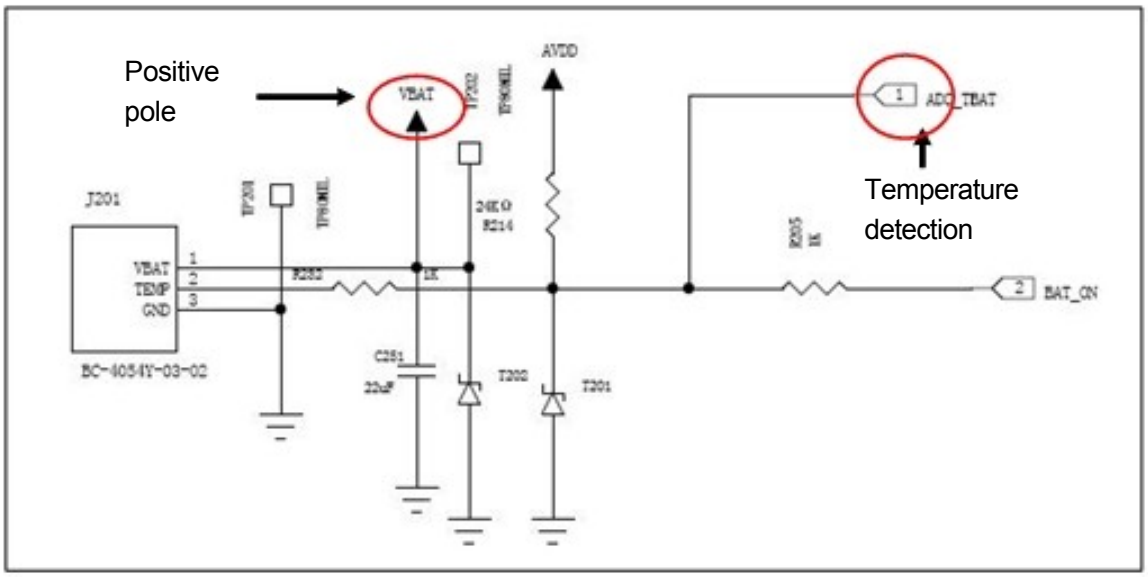


7.2 MT6250 CPU Power output

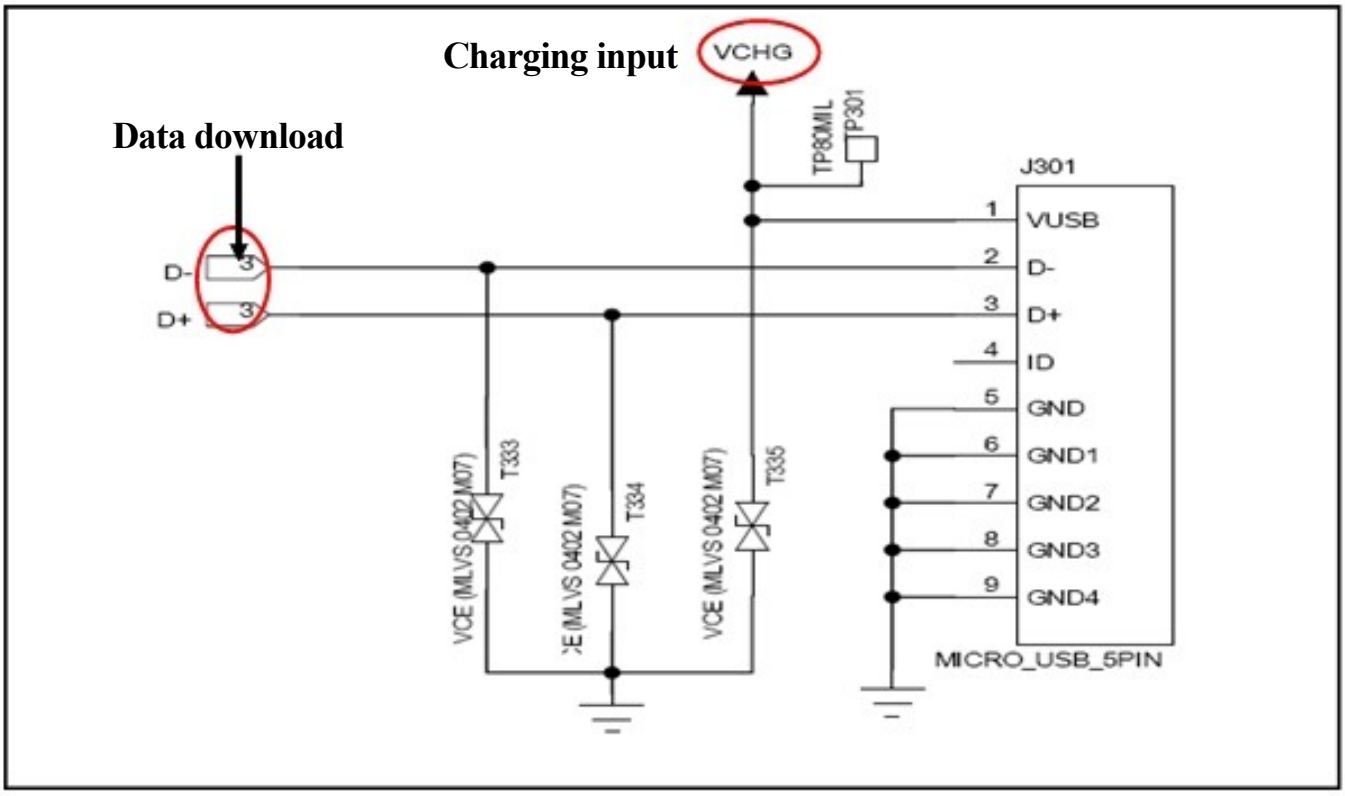


item	voitage	current
Vcore	1.2v	200ma
Vio	2.8v	100ma
Vadd	2.8v	150ma
Vtcxo	2.8v	20ma
Vrtc	1.2v	200ma
Vmem	2.8v	150ma
Vsim	2.8v	20ma
Vcs	2.8v	200ma
vcs	1.8v	150ma

7.3 Battery connector

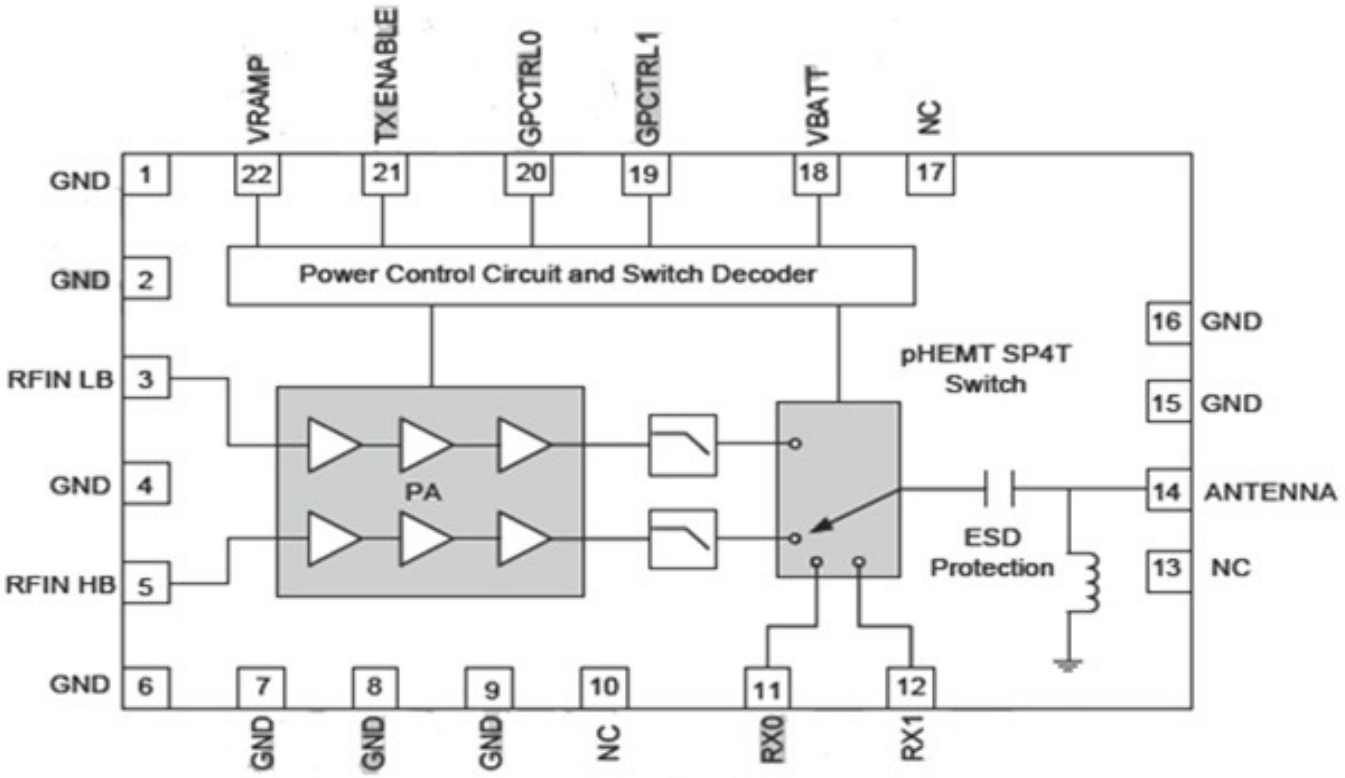


7.4 I/O connector circuit(PIN)

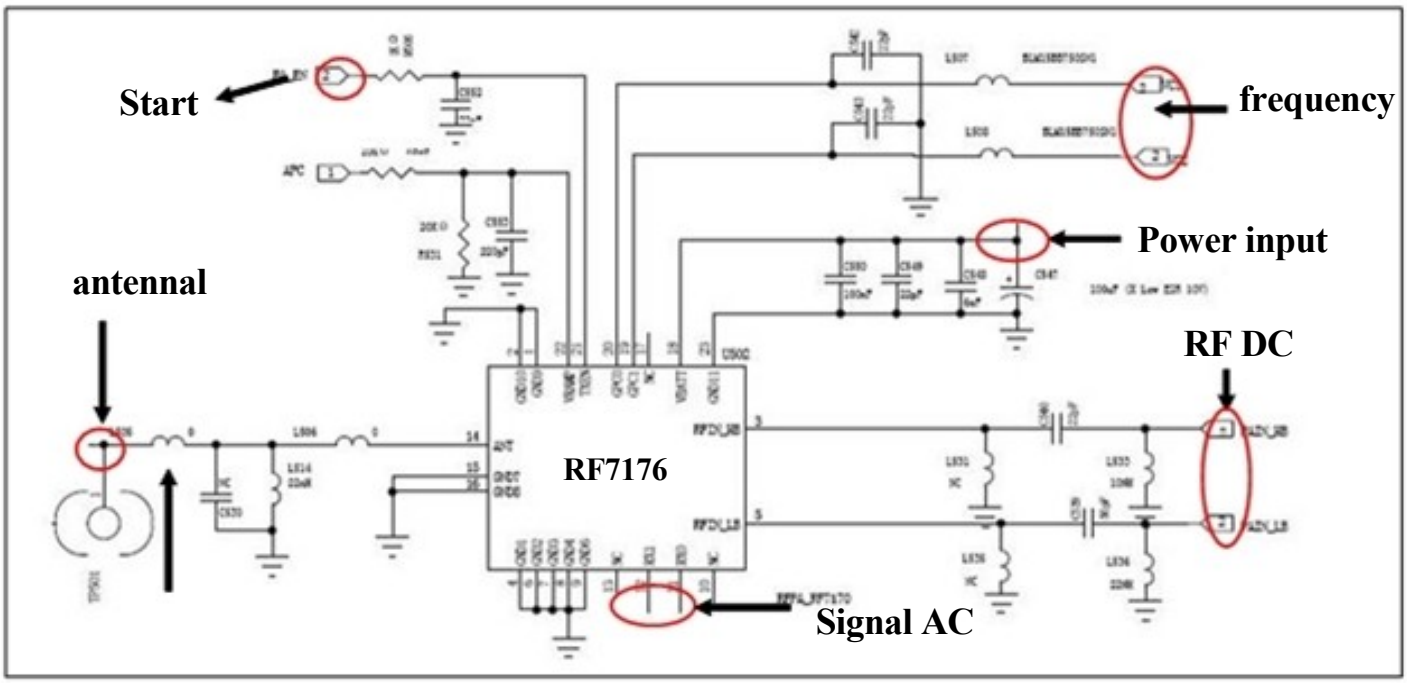


7.5 System Overview

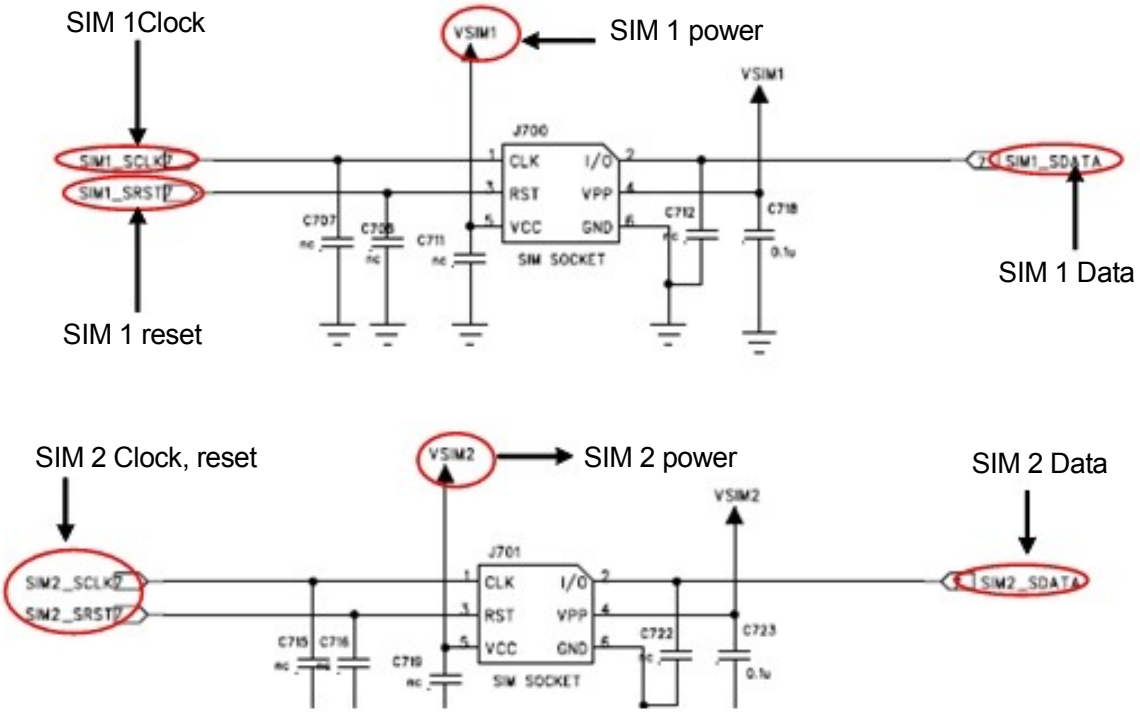
The RF7176 simplifies the phone design by eliminating the need for the complicated control loop, harmonic filters, and TX/RX switch along with their associated matching components. The power control loop can be driven directly from the DAC output in the baseband circuit. The module has two RX ports for GSM850/EGSM900 and DCS1800/PCS1900. To control the mode of operation, there are three logic control signals. TX Enable, Gpctrl1. The RF7176 offers high efficiency at the rated pout as backed-off efficiency is improved in this TXM.



7.4 power amplifier

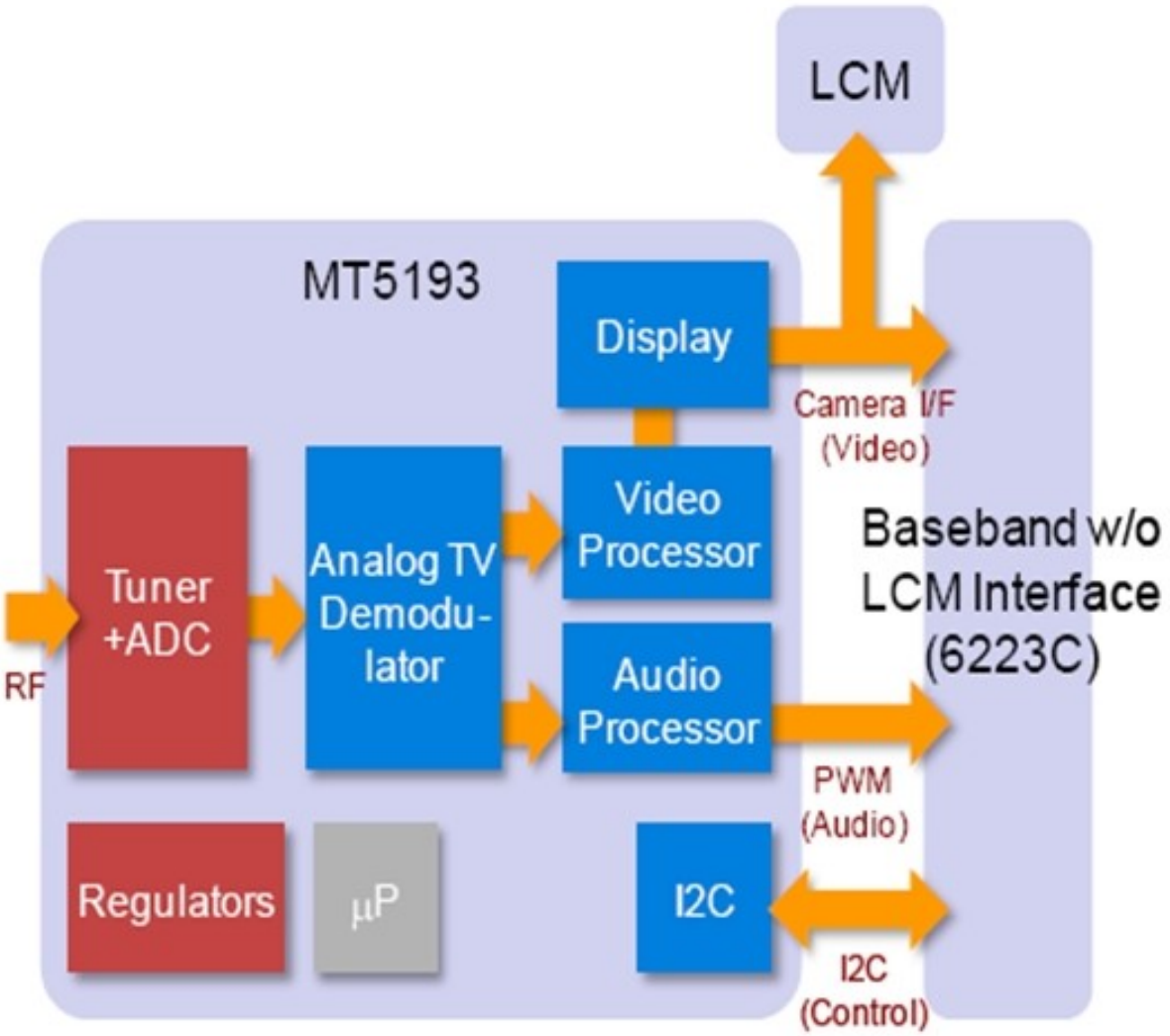


7.6 SIM circuit

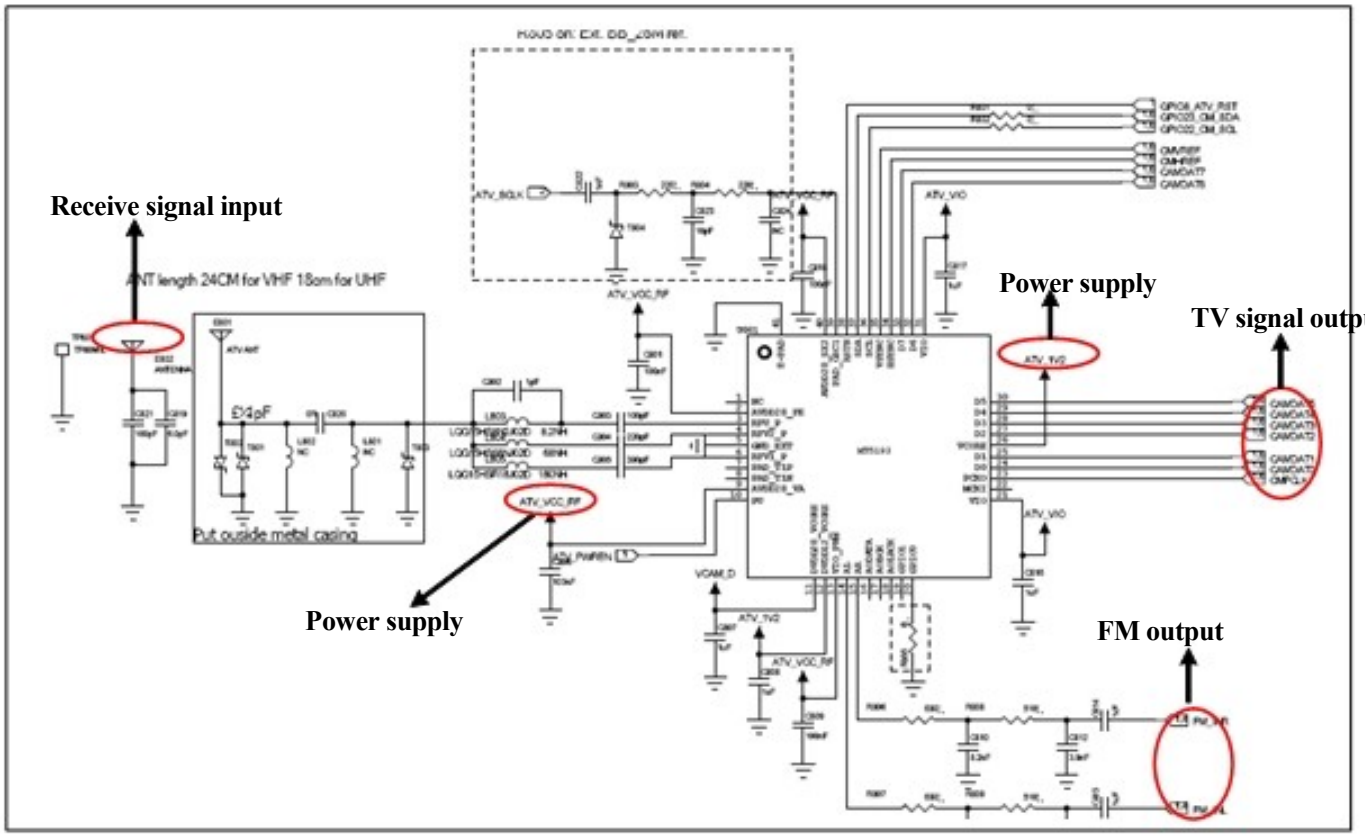


System Overview

The Media Tek MT5193 is a single chip universal analog television/FM receiver that integrates VHF/UHF full-band RF tuner, alignment-free multistandard TV/FM demodulator, audio processor, video processor, scalar/rotation functions, and power regulators. It is low power and high sensitivity device optimized for mobile applications such as handset, PDA, notebook, PMP, and other portable devices.

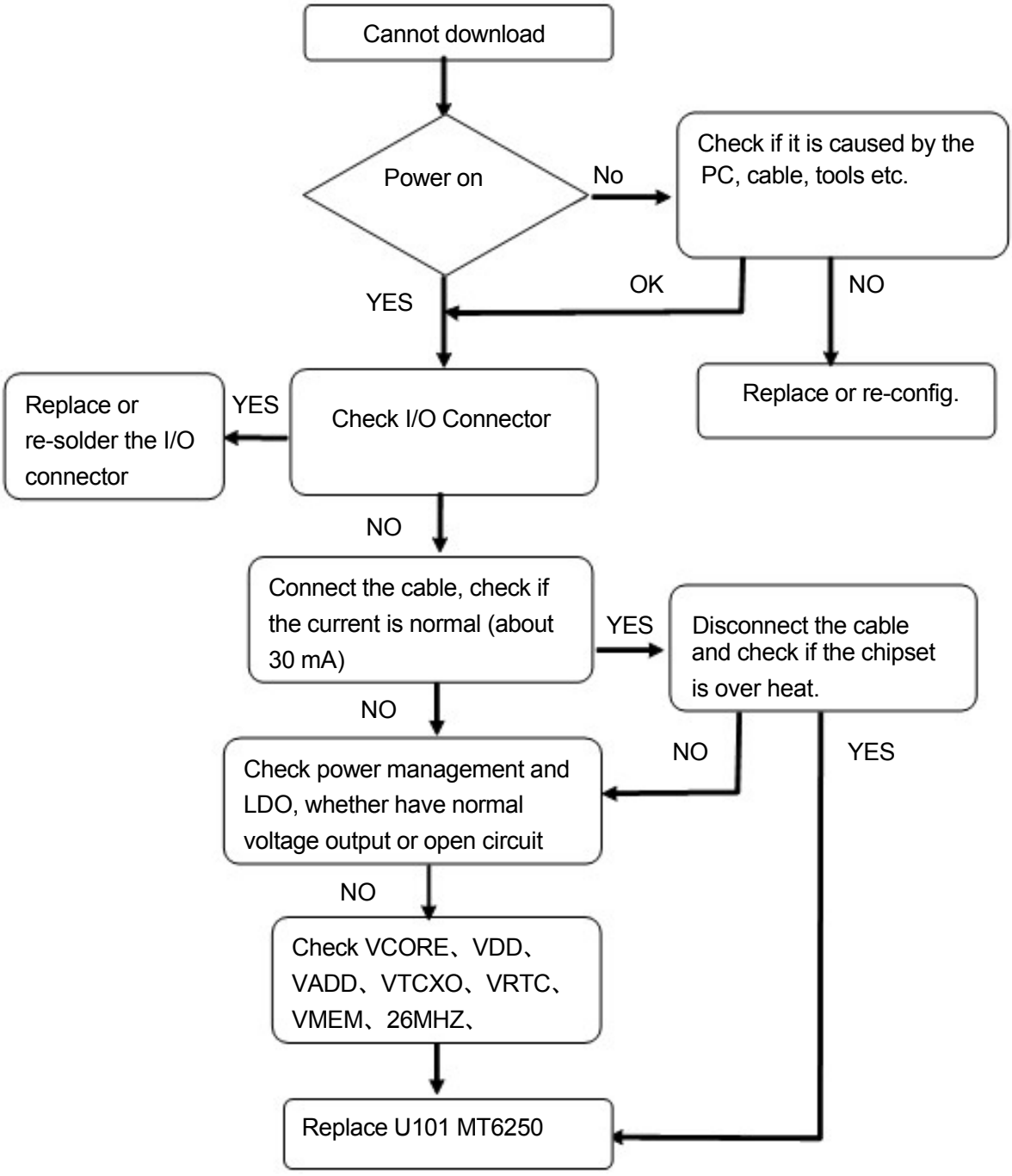


7.7 ATV

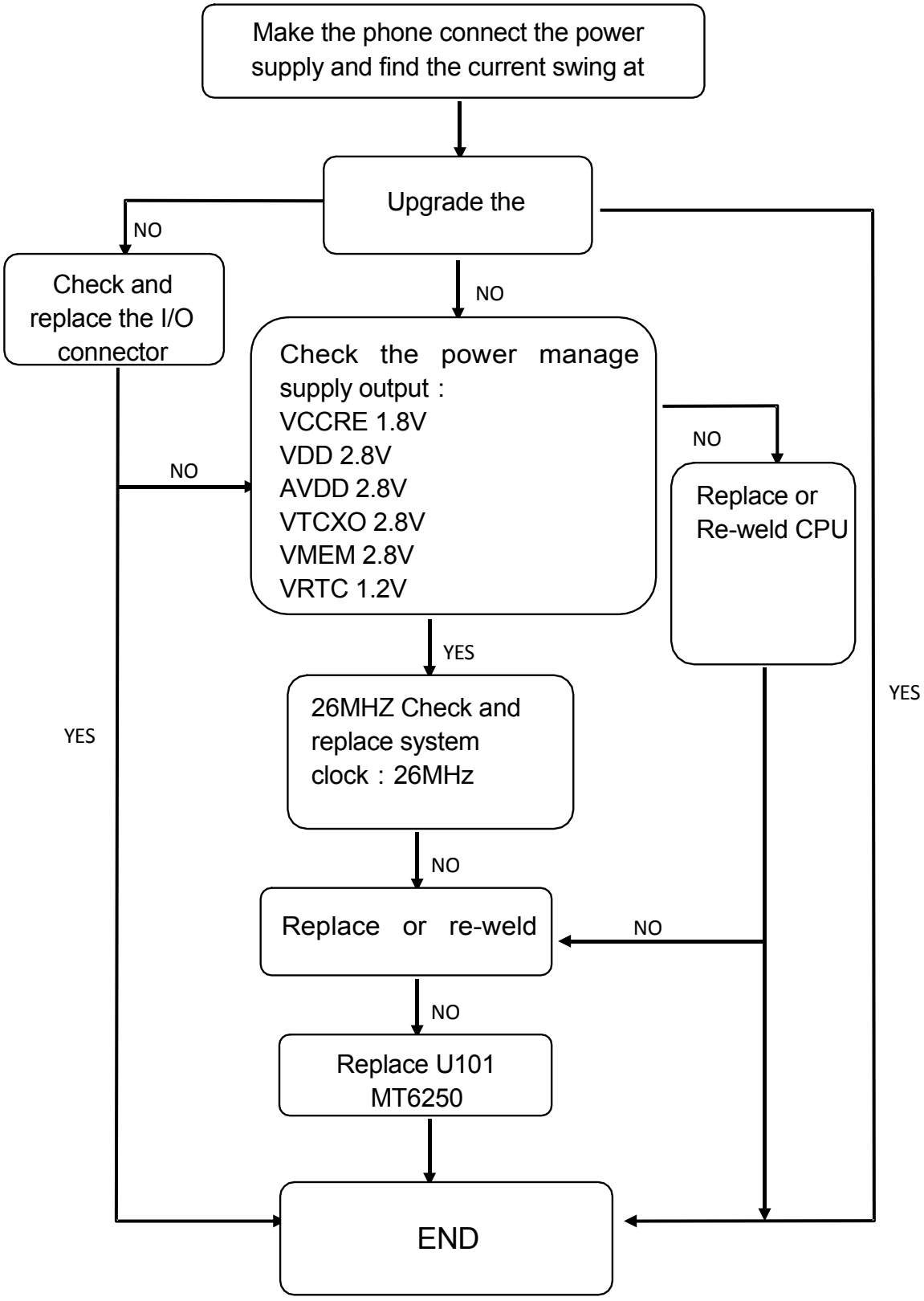

Receive signal input
ANT length 24CM for VHF 18cm for UHF
Put outside metal casing
Power supply
Power supply
TV signal output
FM output

Chapter 8 Trouble shooting guide

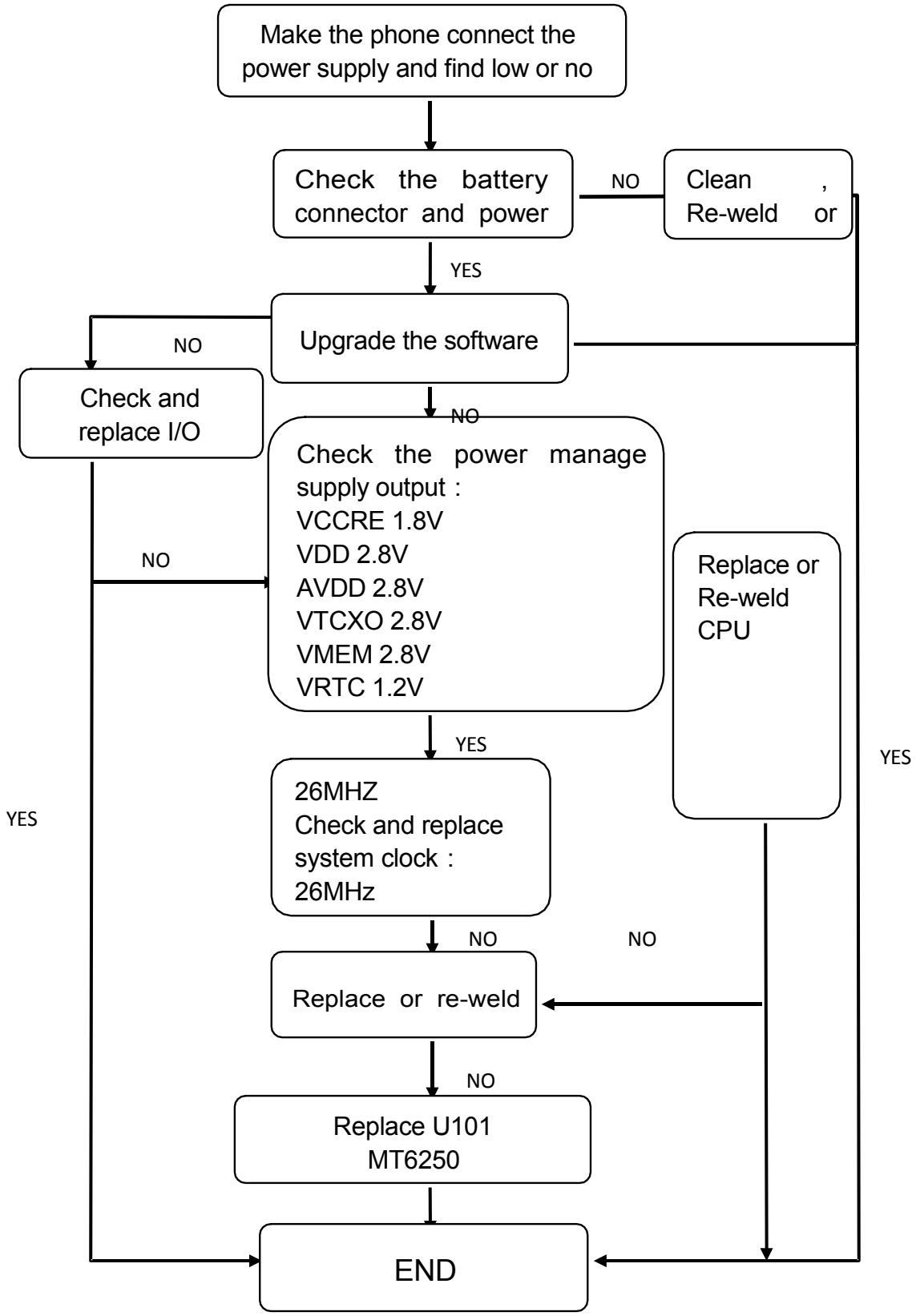
Can't Download



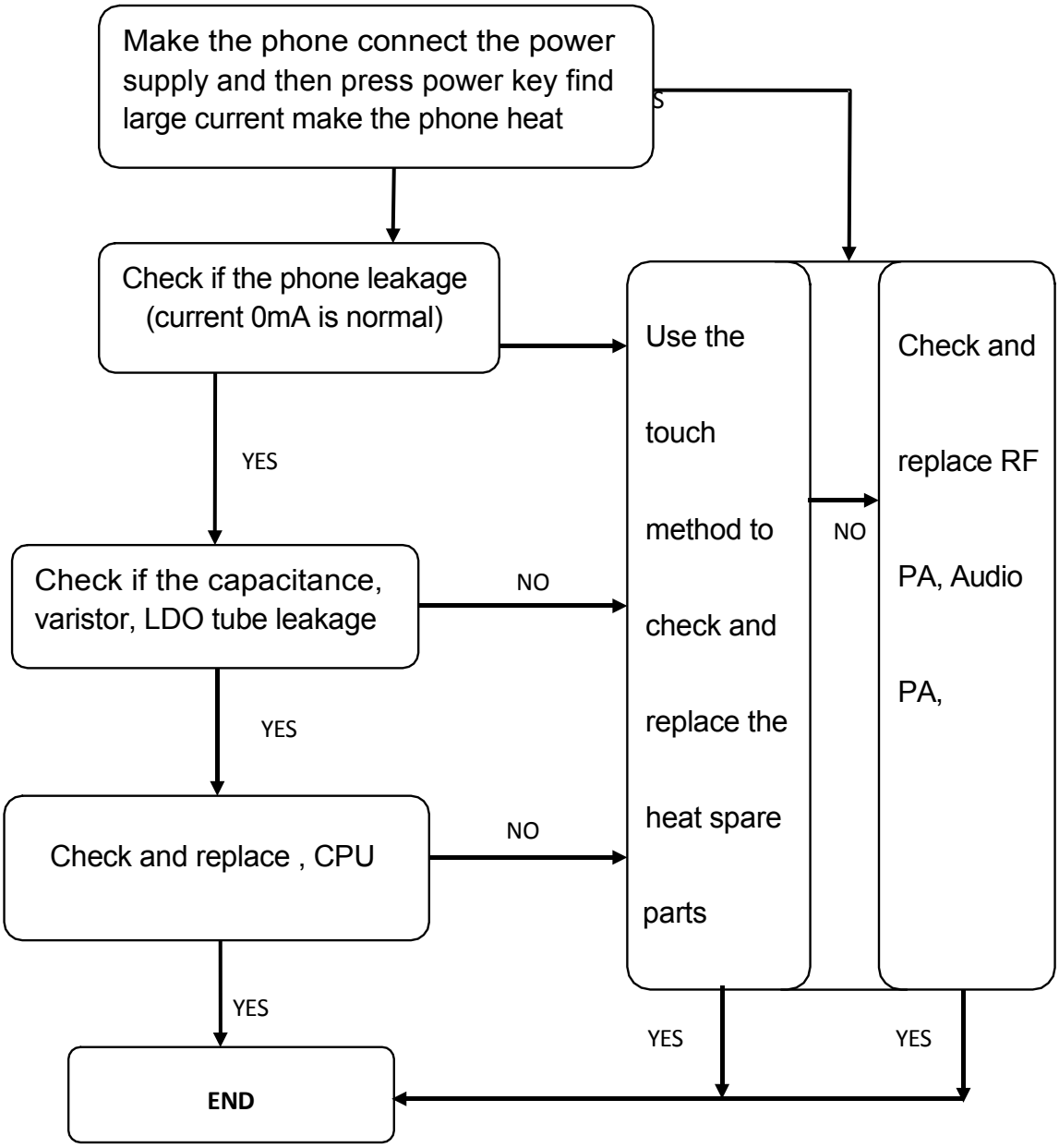
Cannot power on-current swing instability



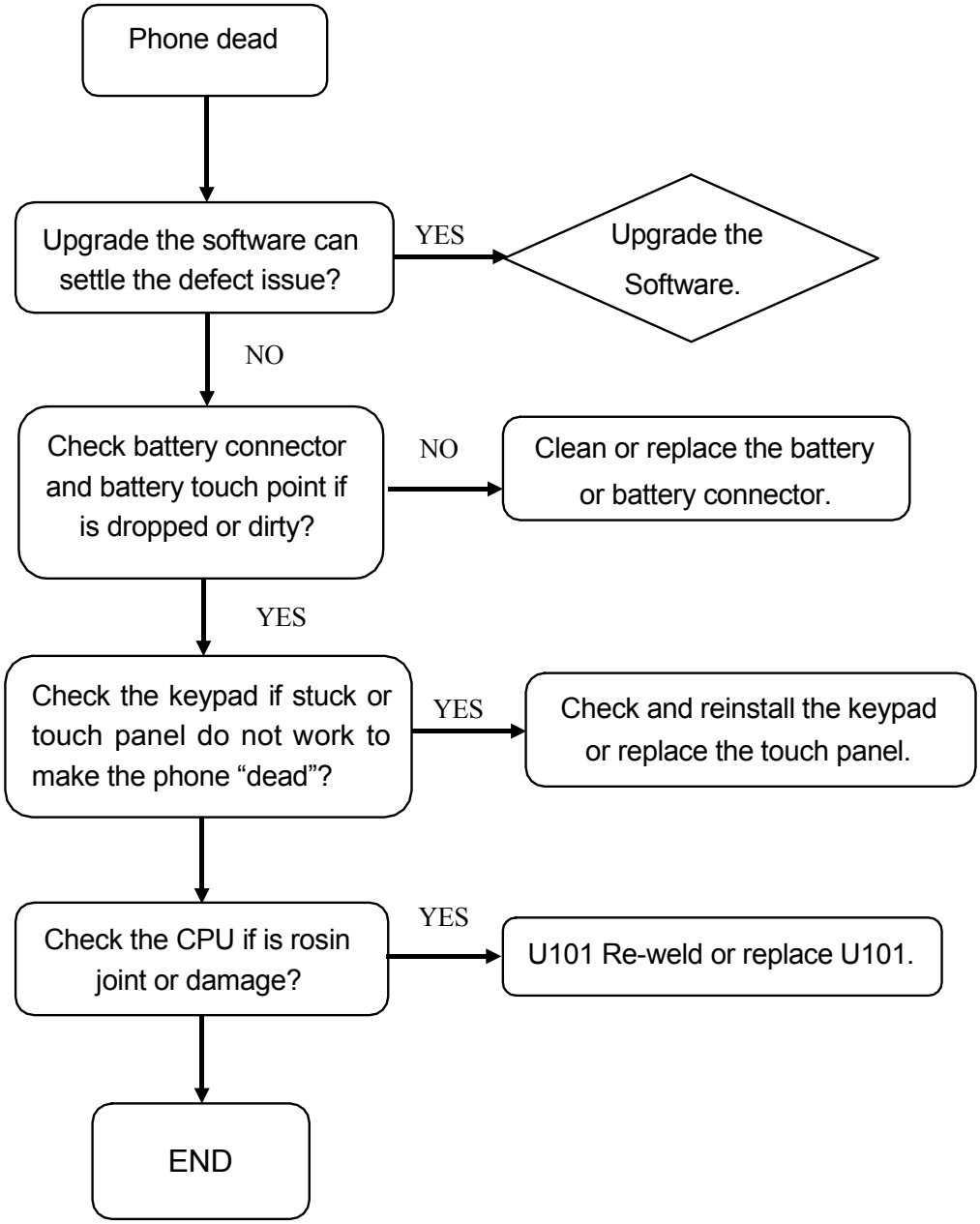
Cannot power on-low or no current



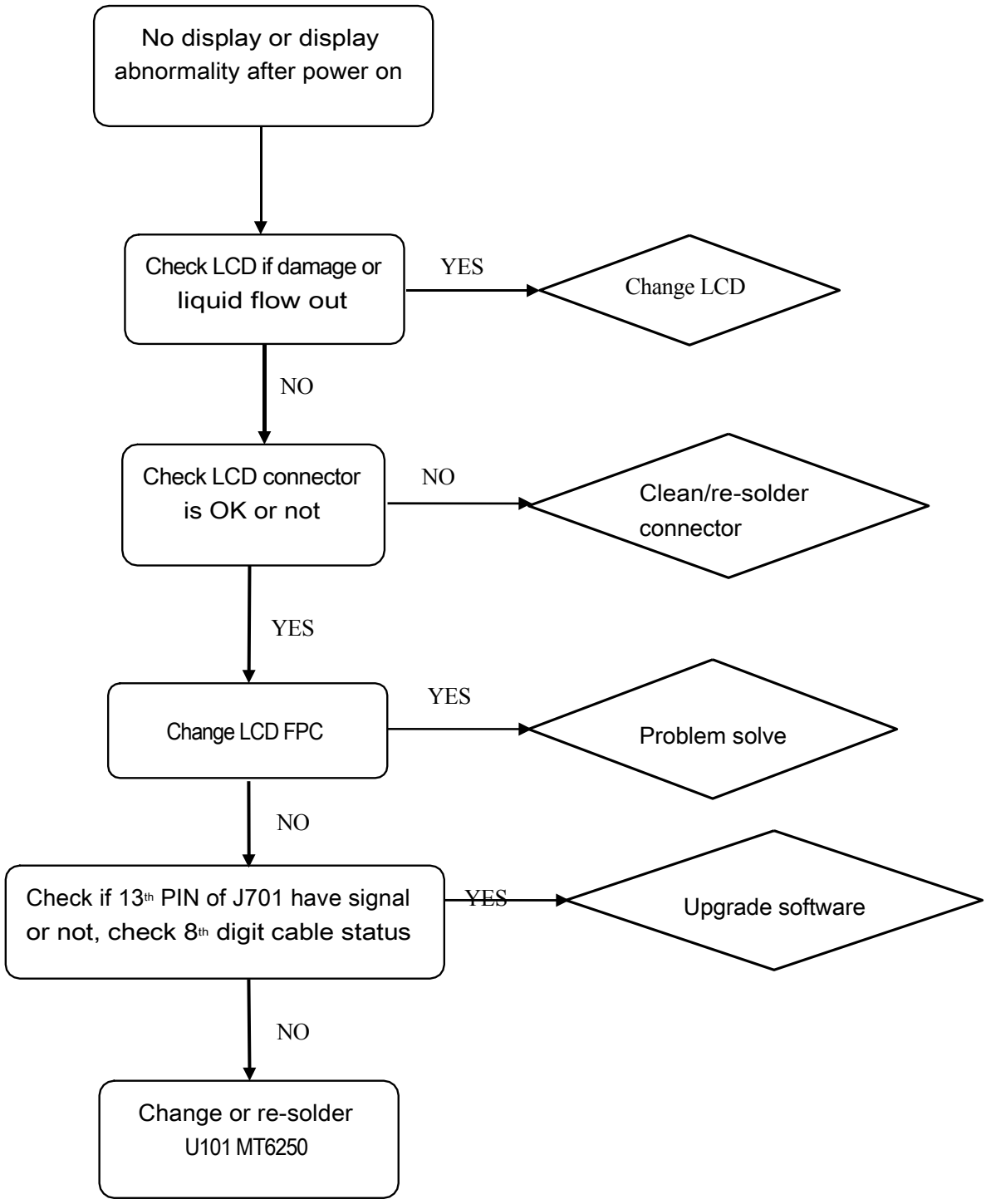
Cannot Power on-large current



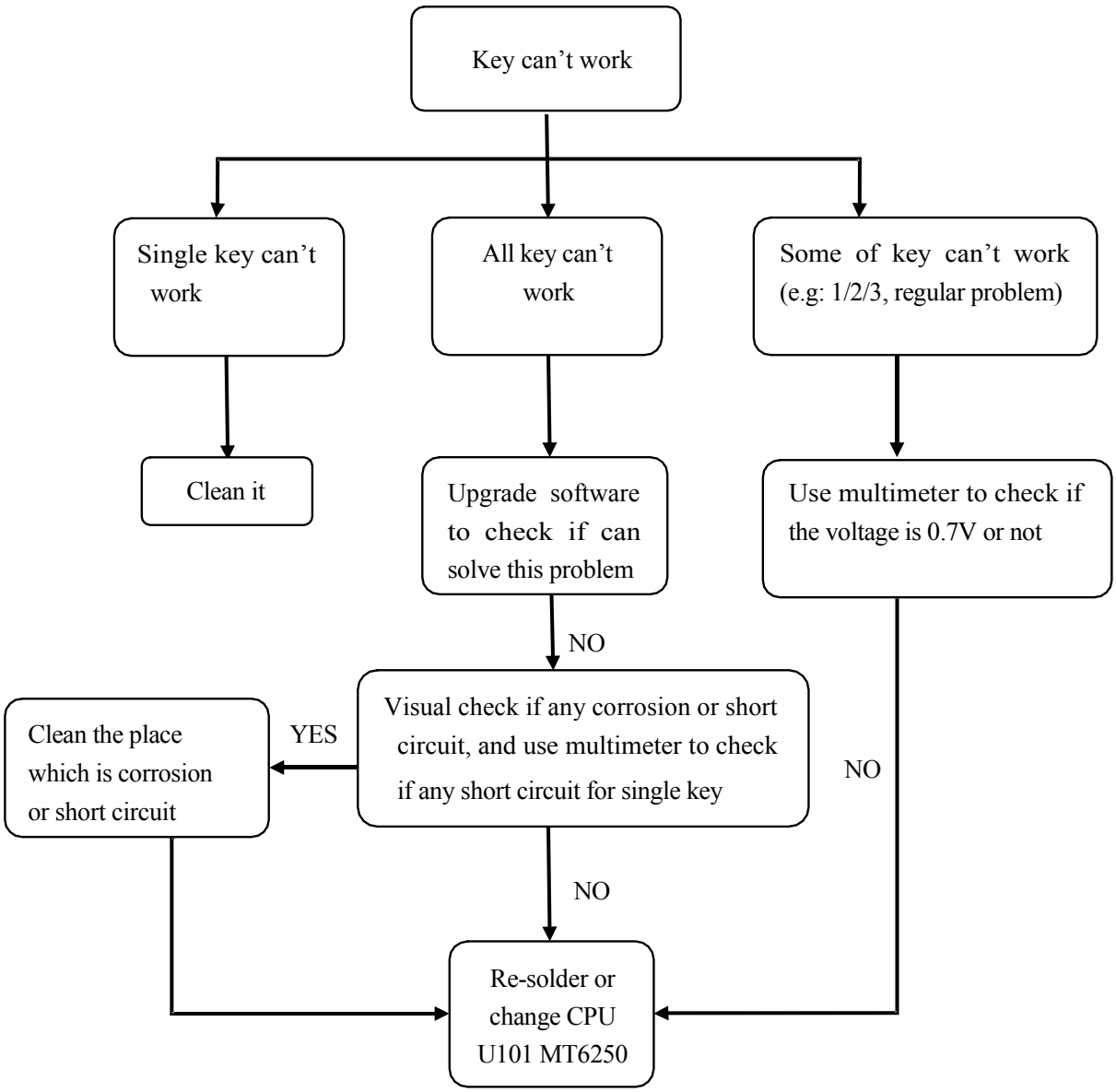
Repair flow for phone dead



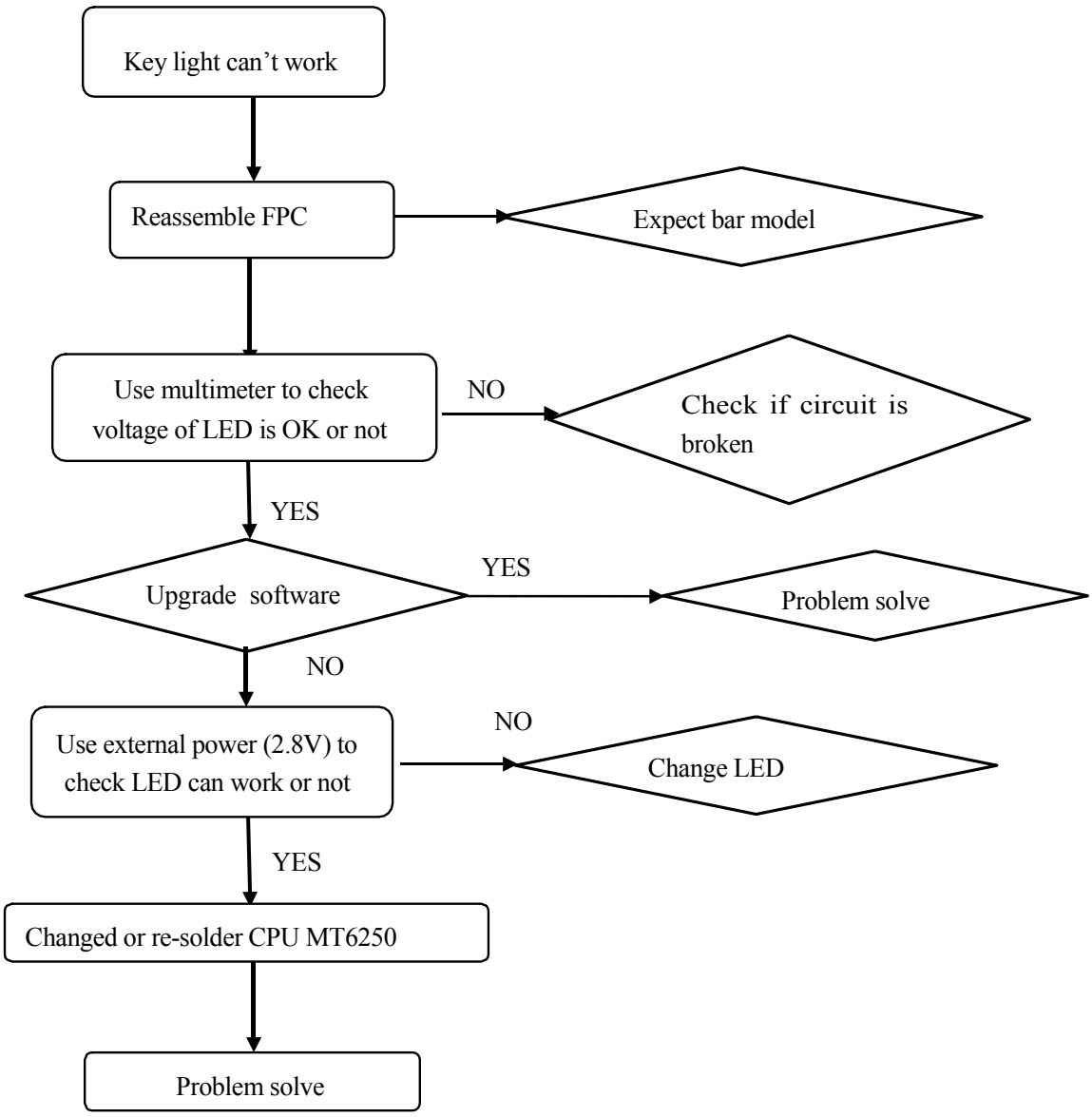
No display or display abnormality



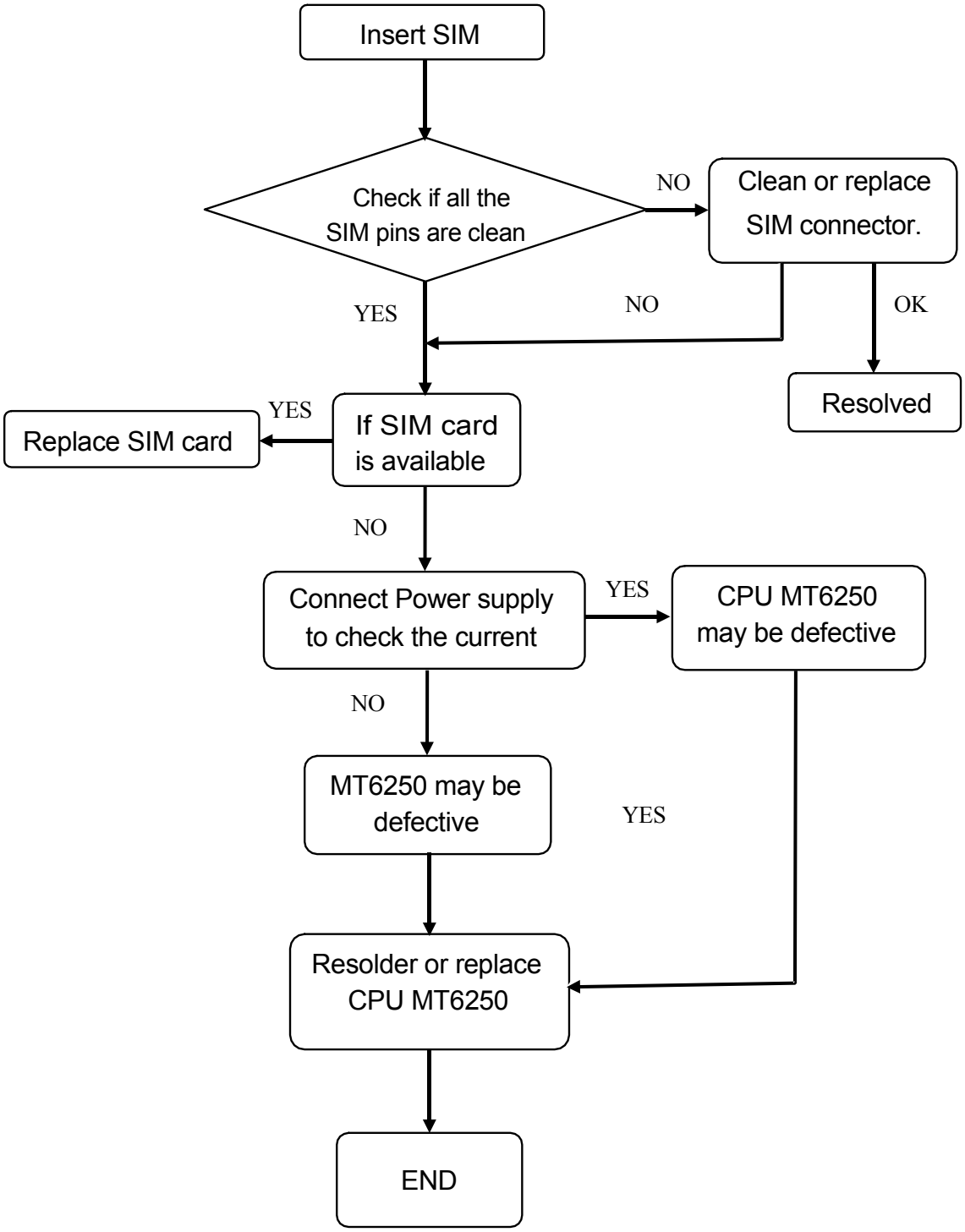
Test process for Key can't work



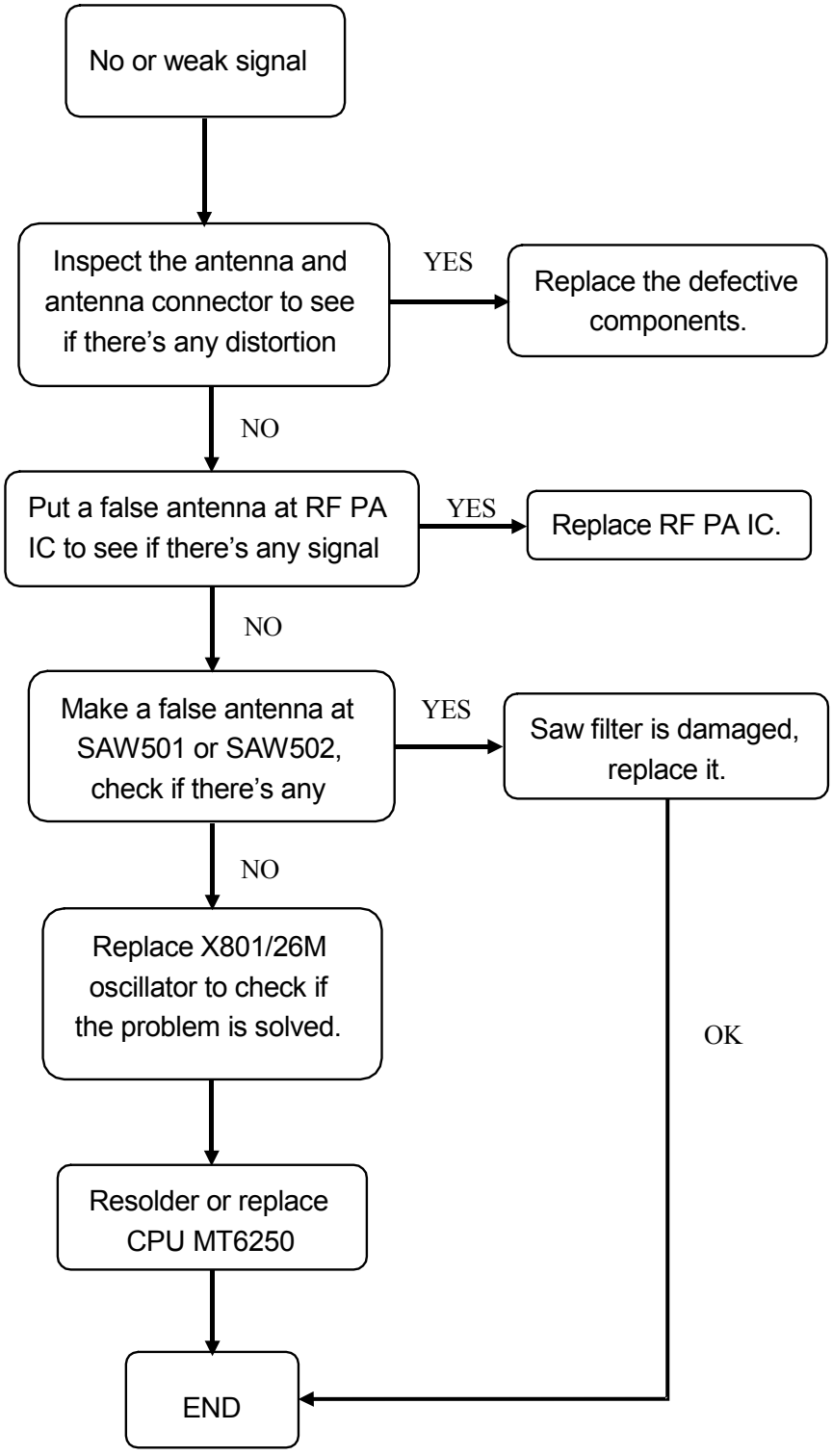
Key light can't work



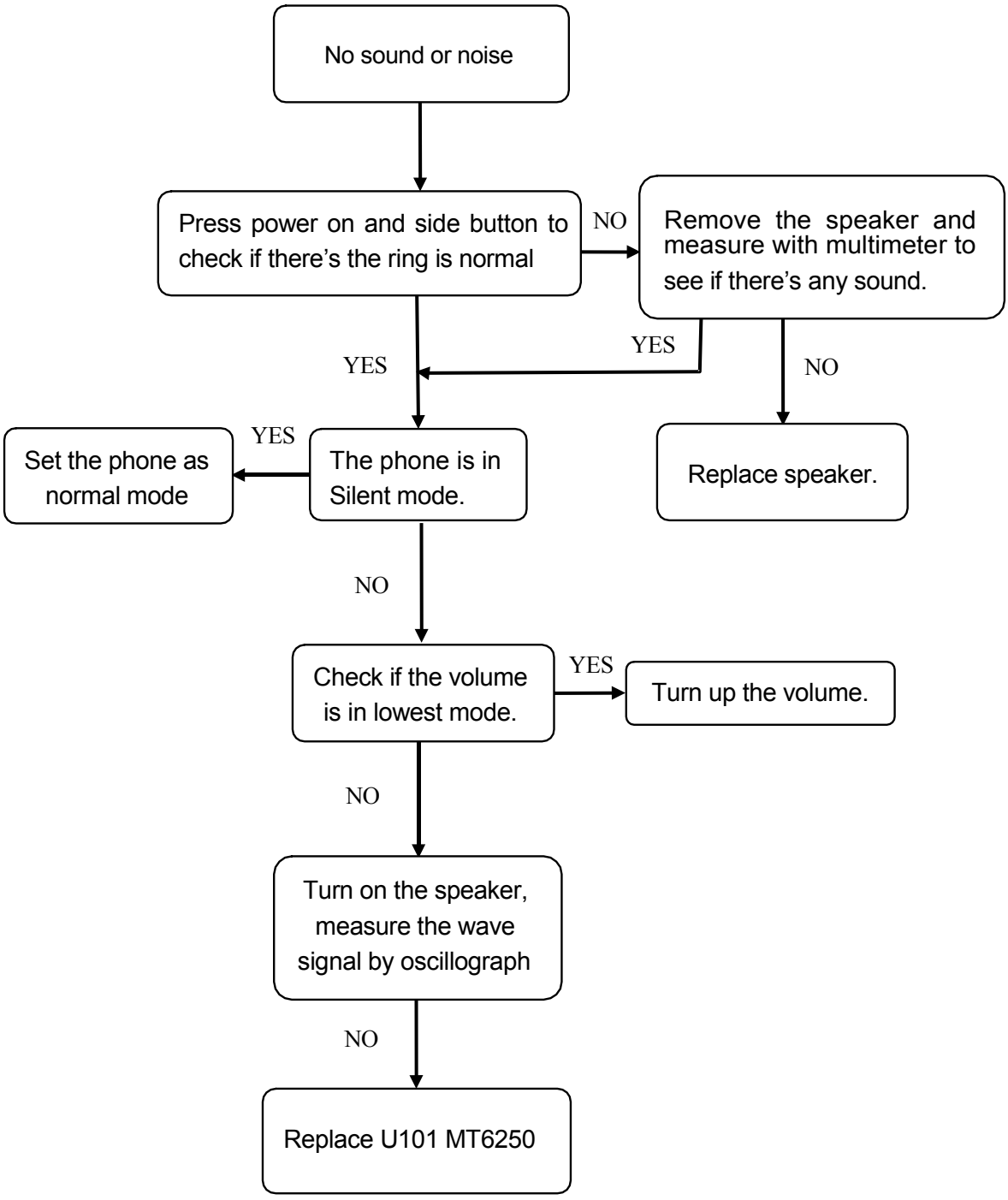
Insert SIM Repair Process



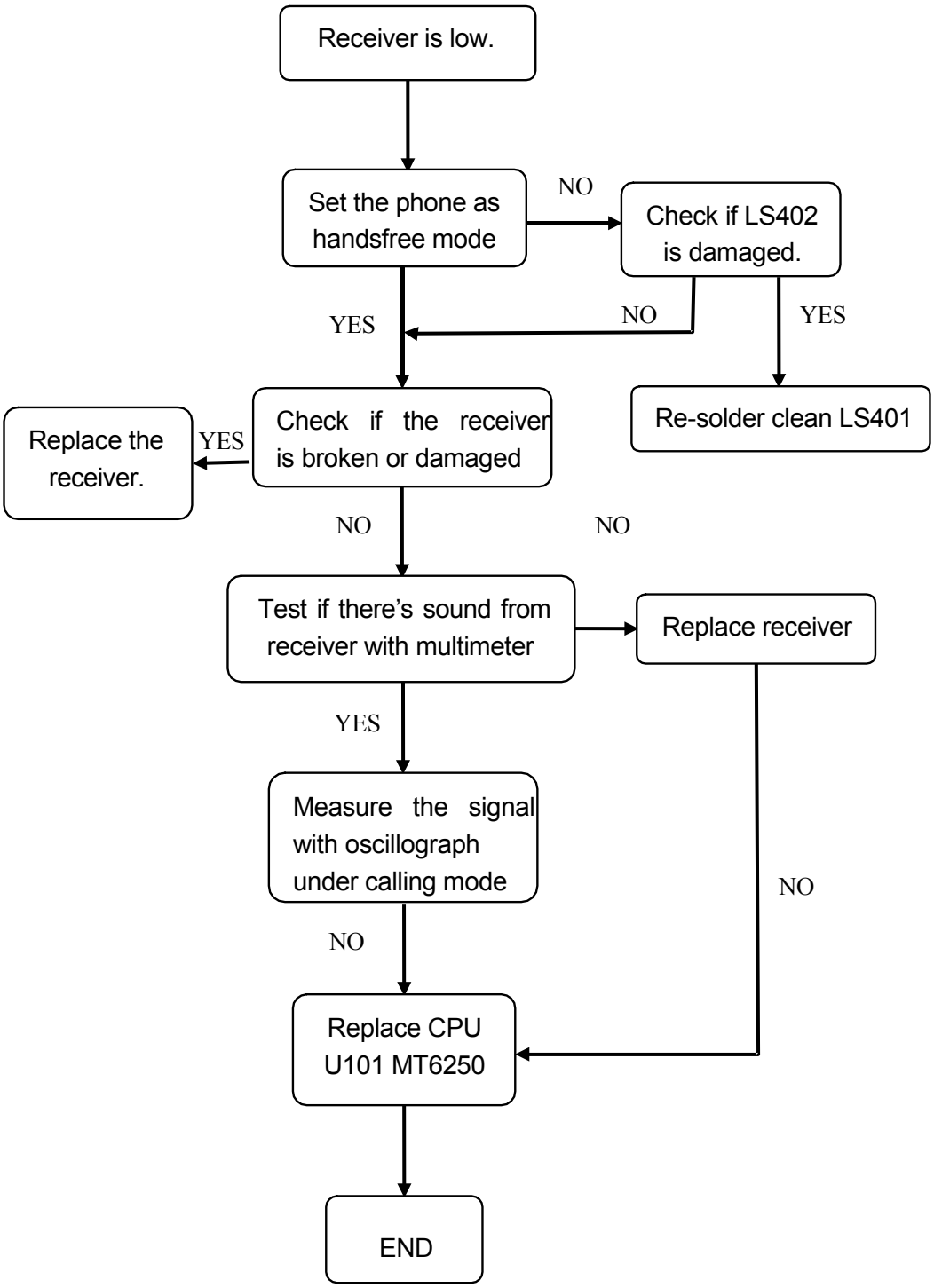
N0/weak signal trouble shooing



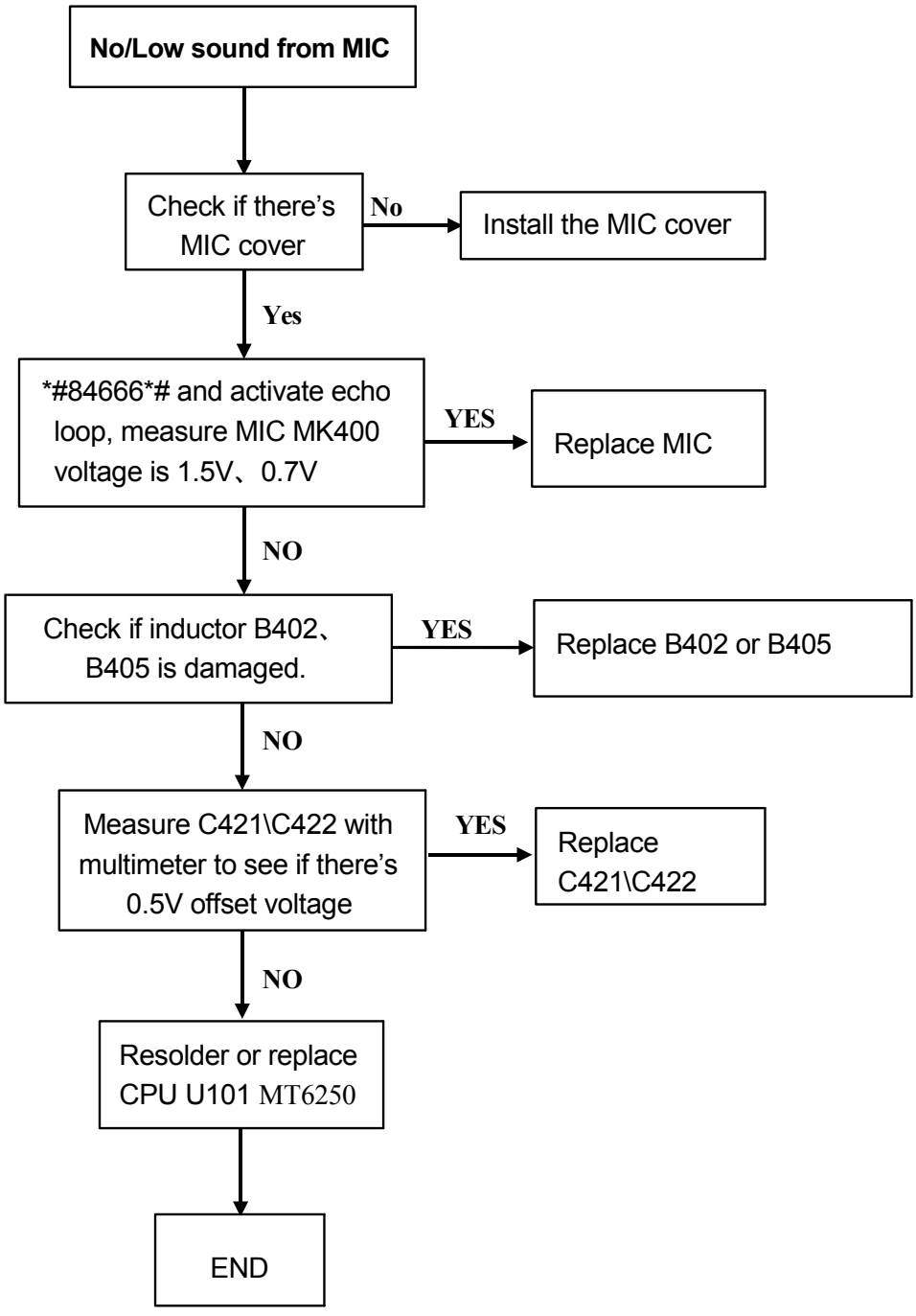
No/Low sound from Speaker



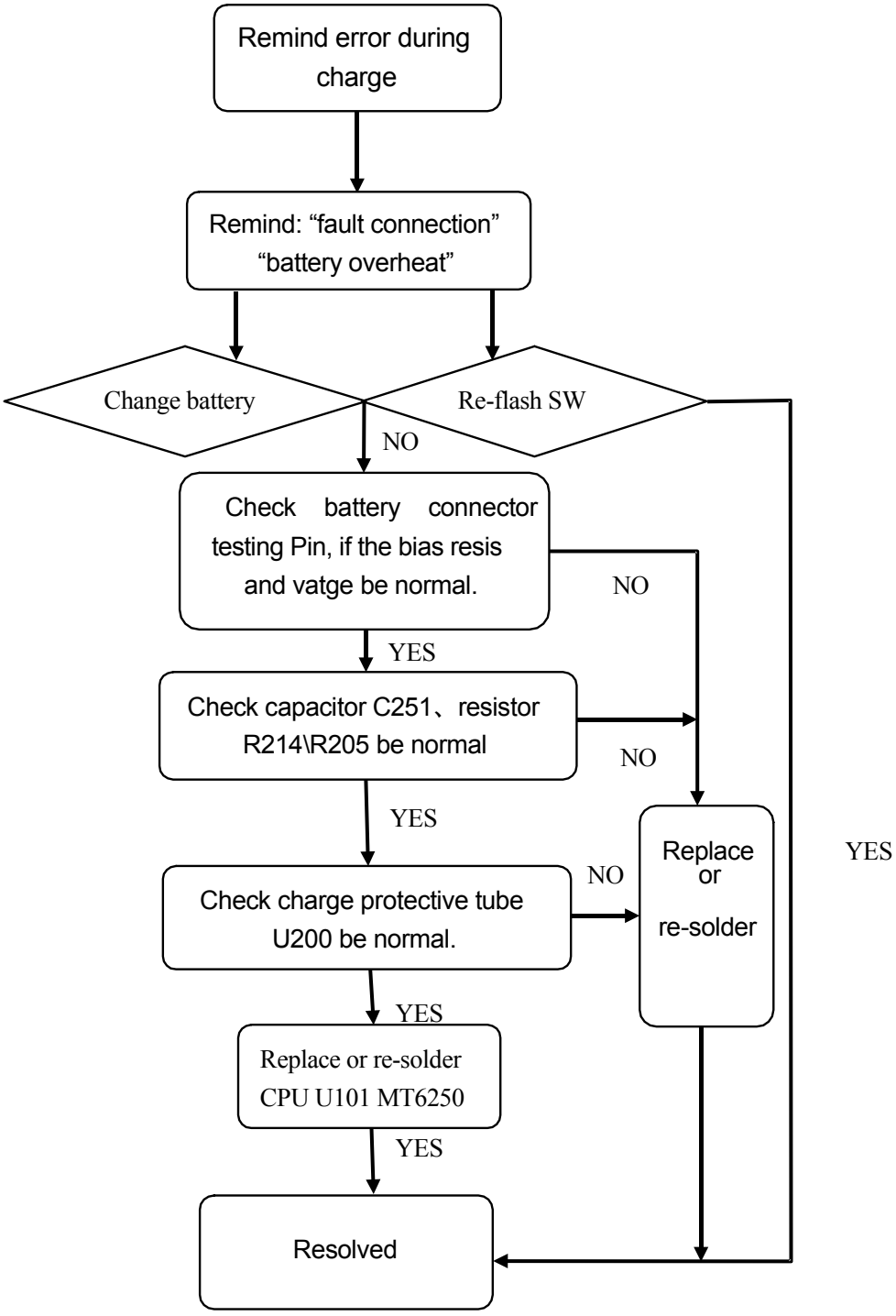
Receiver low voice or no voice



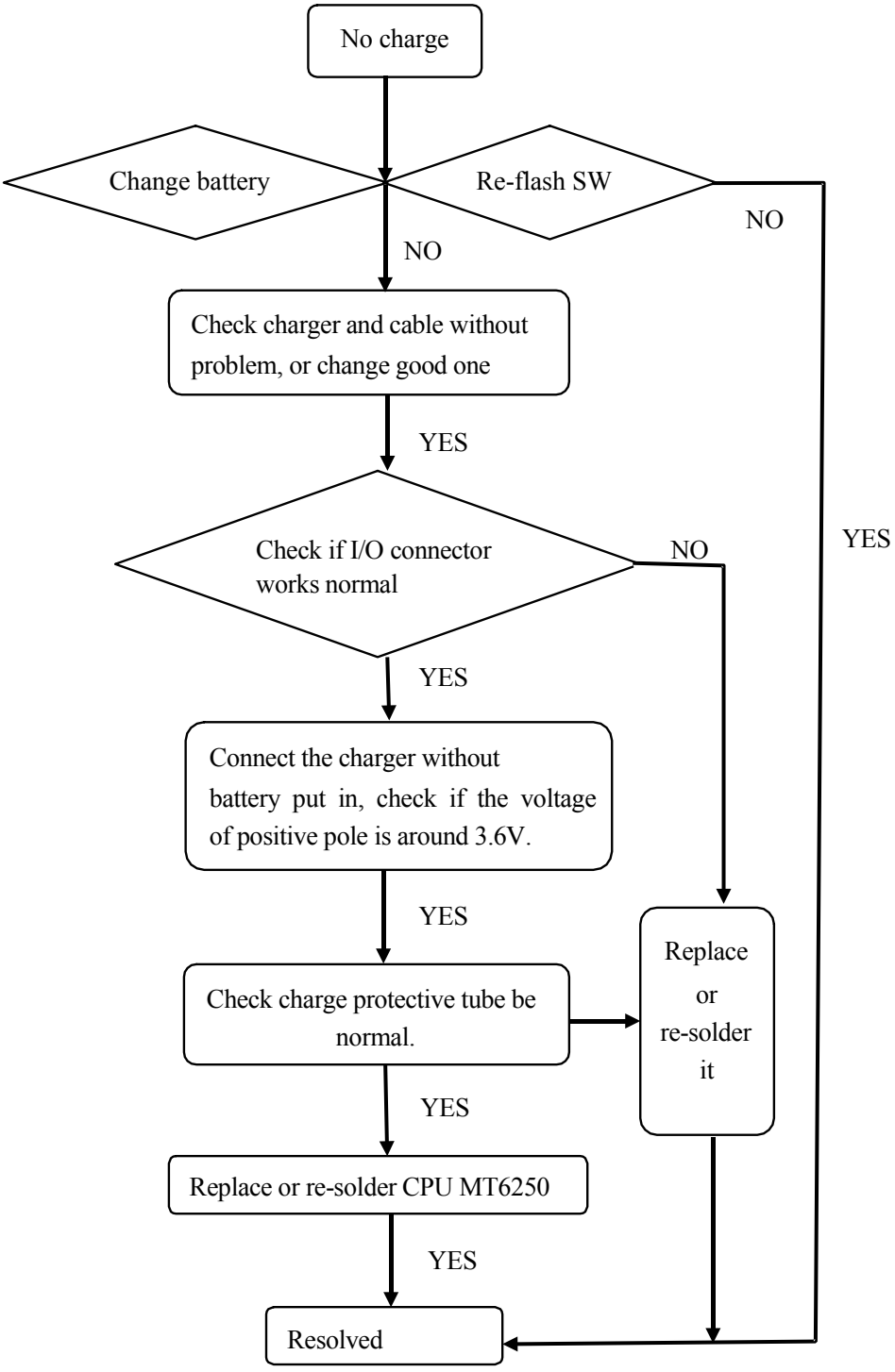
No/Low sound from MIC



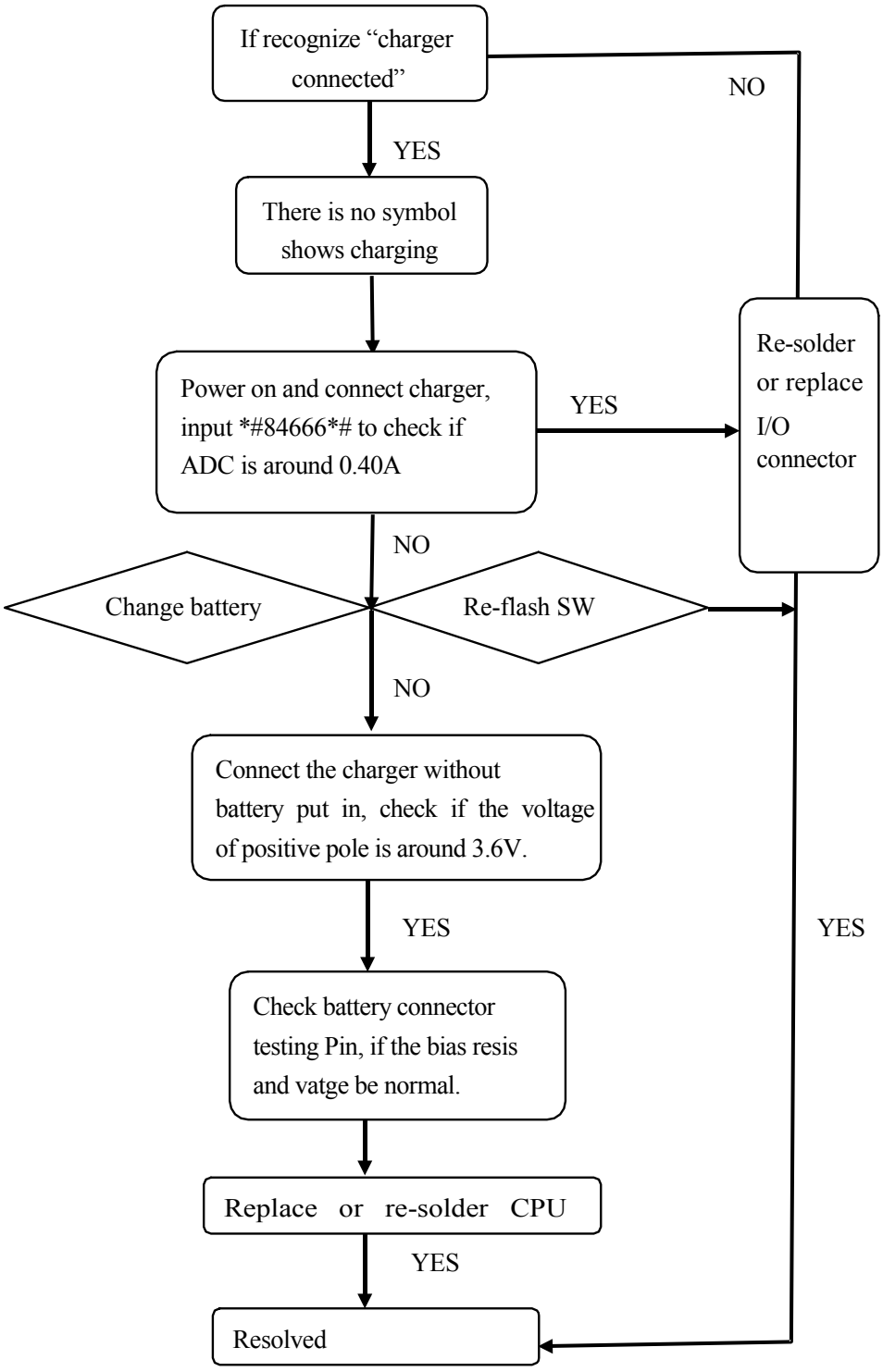
Does not charge - remind error charge



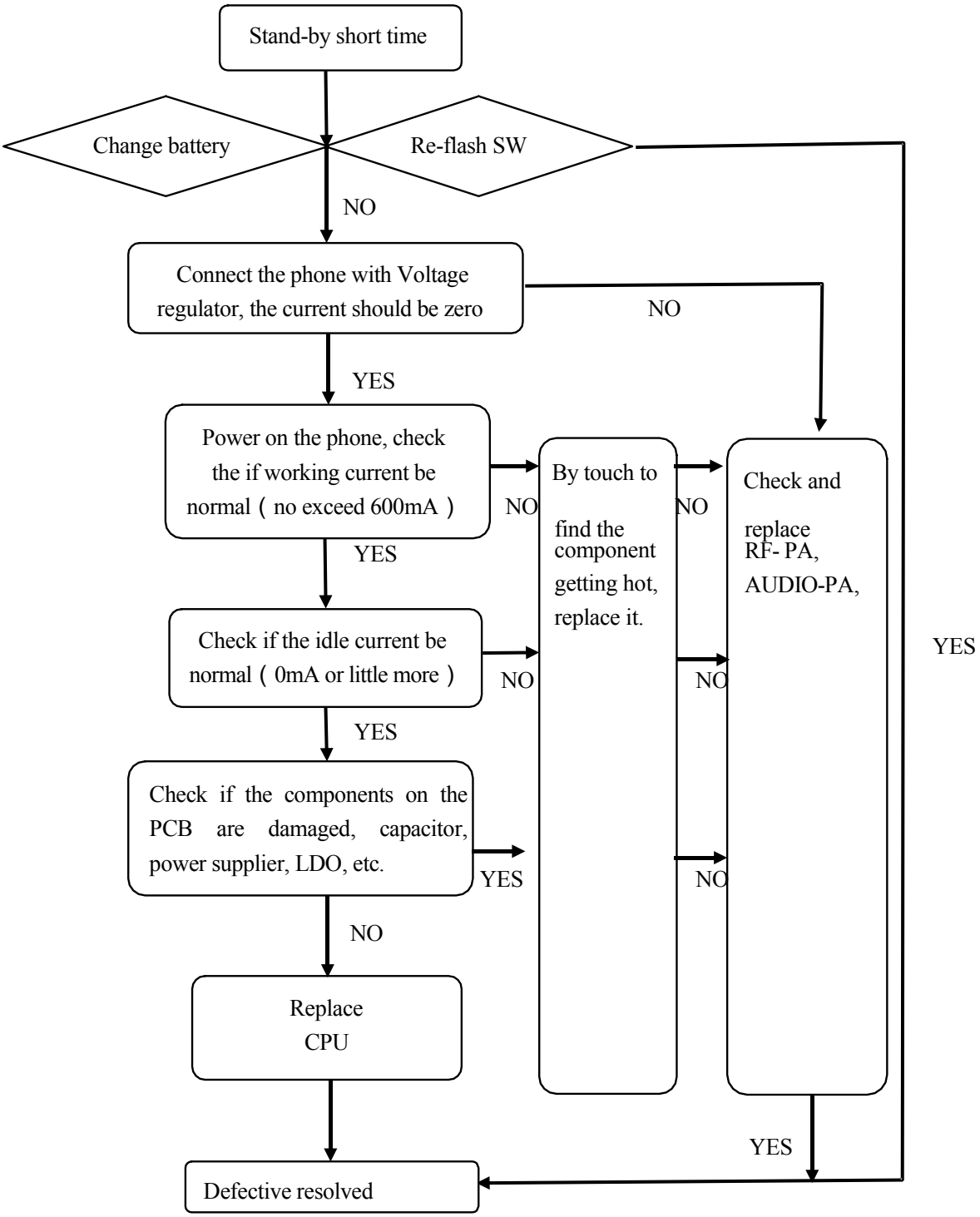
Does not charge - no charge



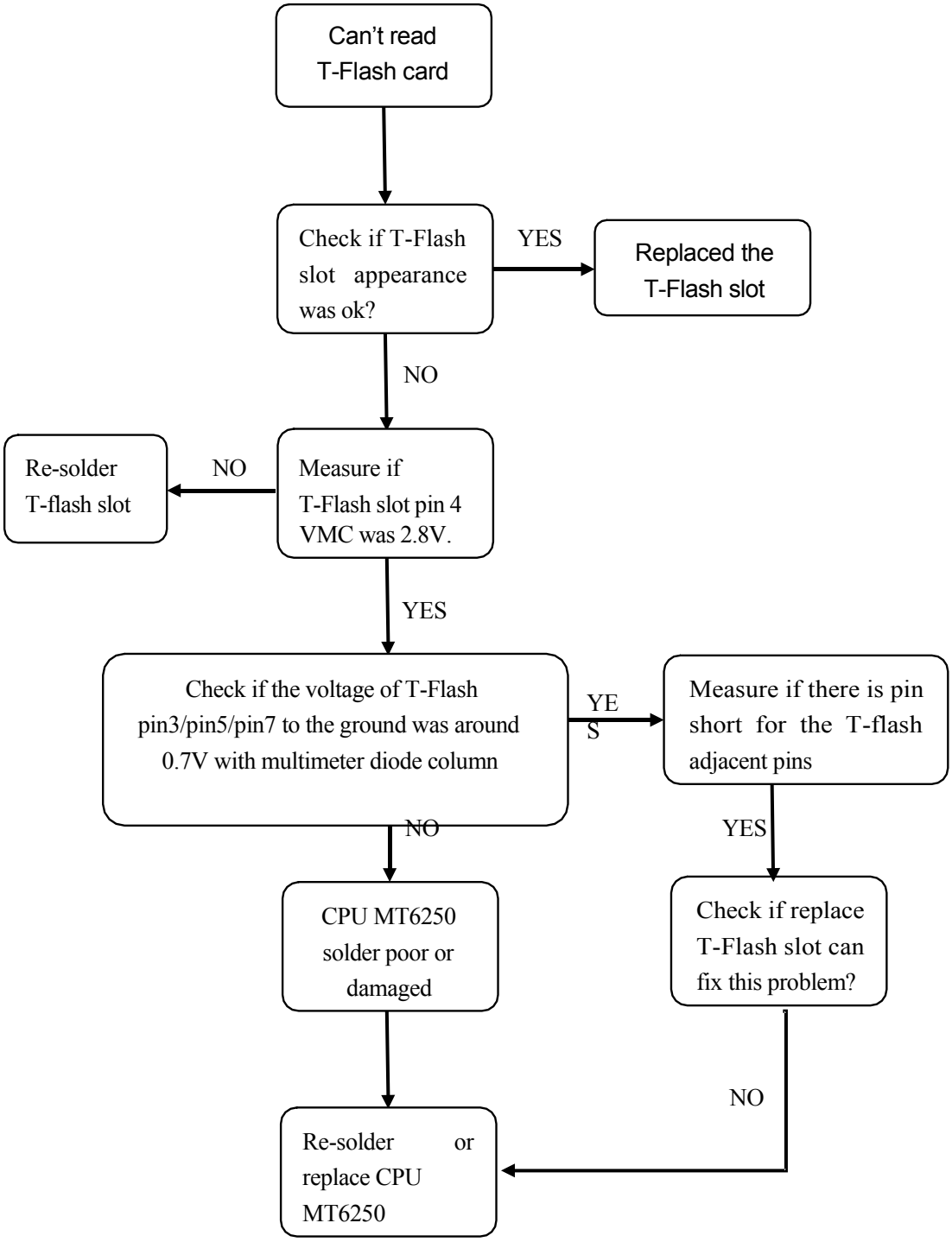
Does not charge - does not recognize charging



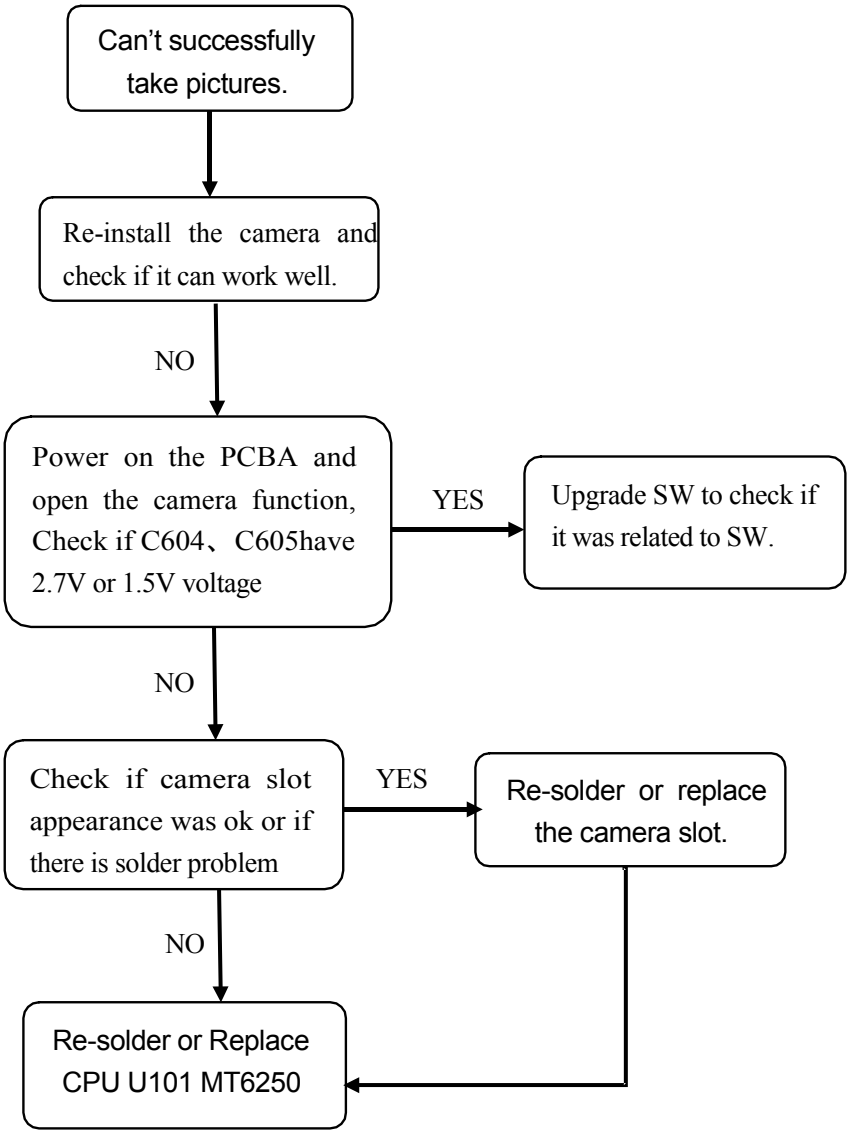
Stand-by short time



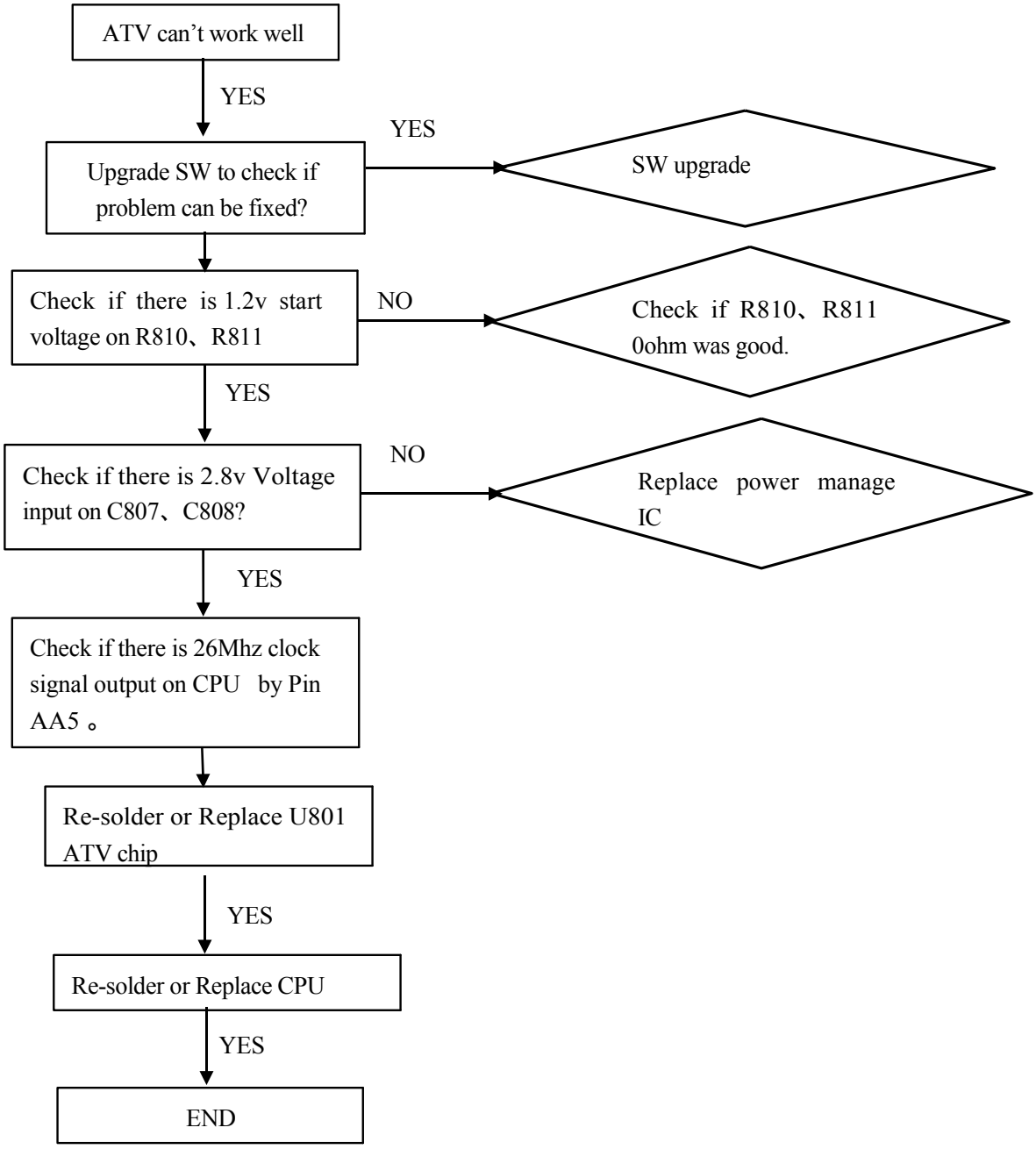
Can't read T-Flash card



Can’t successfully take picture



ATV can't work well



Chapter 10 CIT Testing

Input “*#84666*#” in the standby mode.

1. Version: Confirm the firmware version.

2. Echo Loop: Receiver shall produce sound when blowing over the mic.

3. Keypad: Press every button on the handset until the screen is clear.

4. Vibrator：Press “start” then the vibration shall start.

5. Lond SPK: Press “start” the speaker shall work.

6. Ringtone: Press “start” the ringtone shall be played.

7. LED：Press “OK” to test the LED.

8. LCD: Select “Auto Display” LCD shall perform the self-testing.

9. Receiver：Press ”start” the receiver shall produce sound.

10. Camera: Menu- Camera, test the capture and shooting, no need to save.