

CSL Mobile Care (M) Sdn. Bhd.

 Wisma CSL, No. 10, Jalan Jurunilai U1/20, Hicom Glenmarie

 Industrial Park, 40150 Shah Alam, Selangor.

 Tel: 03 - 5569 3031
 Fax: 03 - 5569 4989

 Website: http://www.cslmobilecare.com

# **BB9300 Service Manual**

- 1. Main Functions:
  - ✤ -Audio Play/Video Recording
  - ✤ -Master /SLAVE GSM 900/1800MHz
  - ✤ -MMS/WAP
  - Bluetooth 1.2
- 2. Main Selling Points
  - -BT communication
  - ✤ -FM supporting
  - -GPRS Class 12
  - -Support MP3, MP4
- 3. Other Functions
  - -Slide-Rotating
- 4. Spec
  - -SIZE 75X70X15mm
  - ✤ 2.4" TFT 26K



# TABLE OF CONTENTS

INTRODUCTION	5
Chapter 1 EXPLODED VIEW AND COMPONENT DISPOSAL4	
EXPLODED DIAGRAM4	ı
DISASSEMBLY AND ASSEMBLY	;
SERVICE TOOLS	5
DISASSEMBLE	7
ASSEMBLY	)
Chapter 2 SYSTEM BLOCK DIAGRAM	11
Chapter 3 INSTRUCTION OF THE UNIT CIRCUIT	12
Chapter 4 ACTUALL BOARD2	1
SIDE A (MASTER)2	1
SIDE B (SLAVE)2	1
Chapter 5 TROUBLESHOOTING2	2
Chapter 6 SOFTWARE INSTRUCTION OF SW UPDATE2	8
SW UPDATE OF MASTER3	2
SW UPDATE OF SLAVE3	5
Chapter 7 FUNCTION TEST3	9
Chapter 8 PARAMETER SETTING INSTRUCTION4	0
Chapter 9 CATCHER INSTRUCTION4	2

The purpose of this document is to help service workshop technicians to service products. This service

manual must be used only by authorized service suppliers. The content of it is confidential. Please note that provides other guidance documents for service suppliers. Follow these regularly and comply with the given instructions. While every effort has been made to ensure the accuracy of this document, some errors may exist. Please keep in mind also that this documentation is continuously being updated and modified, so always watch out for the newest version.

#### CAUTIONS

Please refer to the phone's user's guide for instructions relating to operation, care, and maintenance, which include important safety information.

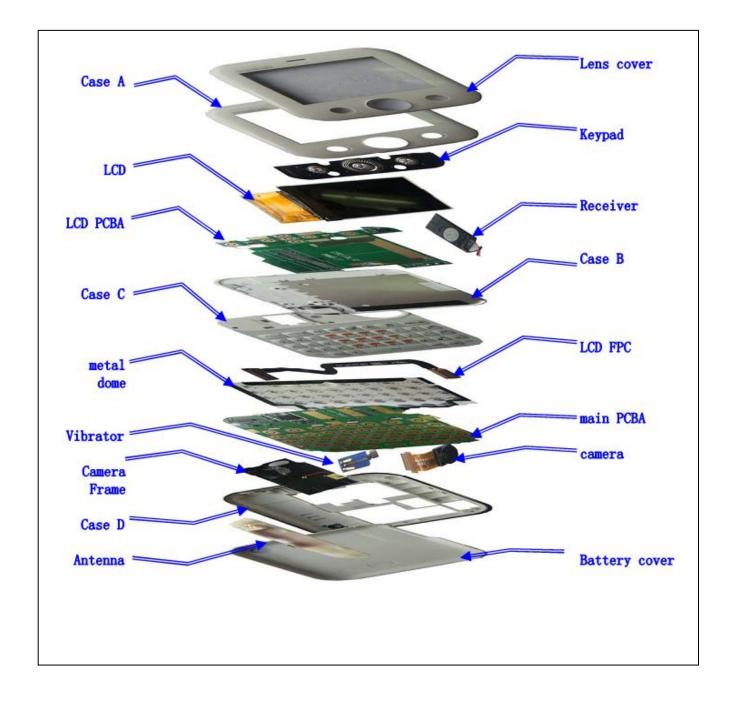
- 1. Servicing and alignment must be undertaken by qualified personnel only.
- 2. Ensure all work is carried out at an anti-static workstation and that an anti-static wrist strap is worn.
- 3. Use only approved components as specified in the parts list.
- 4. Ensure all components, modules, screws, and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

Electrostatic discharge can easily damage the sensitive components of electronic products. Therefore, every service supplier must observe the precautions which mentioned above.

#### **GENERAL REPAIR INFORMATION**

- 1. Make sure your testing equipment is functioning properly before beginning repair work.
- 2. Before starting repairs you must observe ESD precautions such as being in your ESD protected area and connecting your wristband.
- 3. Use gloves to avoid corrosion and fingerprints.
- 4. Cover windows and displays with a protective film to avoid dust and scratches.
- 5. Use a lint-free cloth to clean the LCD.
- 6. When cleaning the pads use a soft cloth\ESD brush and isopropanol. Do not use a glass fiber pencil: this scratches the surface and will corrosion.
- 7. Non-faulty mechanical parts(except shielding lids and bent parts or soldered components). May be reused if they are not soldered.
- 8. When removing the shielding lids make sure to replace them with new ones, otherwise the high-frequency leakage can affect the device.
- 9. Always use the original spare parts.
- **10.** Check the soldering joints of the parts concerned with regard to the fault symptom. And resolder them if necessary.
- 11. Remove excess soldering flux after repair.
- 12. Observe the torque requirements when assembling the unit.
- 13. please aware that some malfunctions may be software related and solved by an update

# EXPLODED VIEW AND COMPONENT DISPOSAL EXPLODED DIAGRAM



# DISASSEMBLY AND ASSEMBLY

#### SERVICE TOOLS







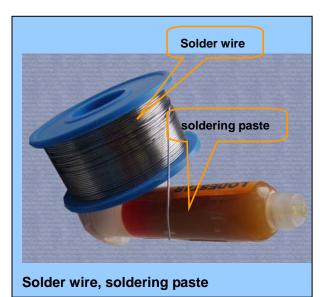


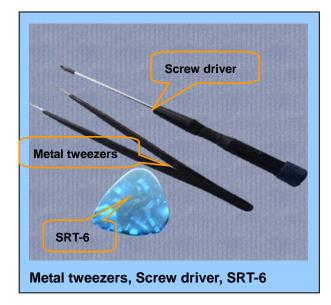




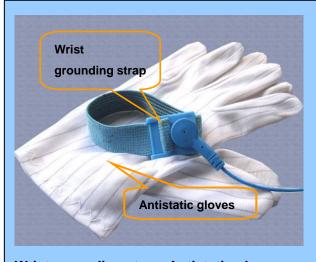
Constant temperature heater



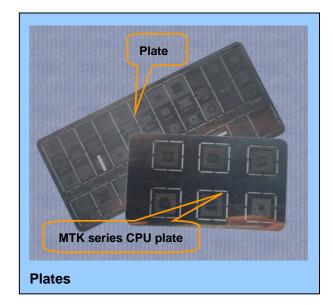








Wrist grounding strap, Antistatic gloves



#### DISASSEMBLY



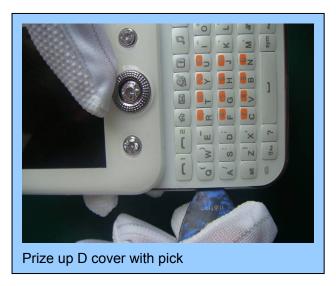


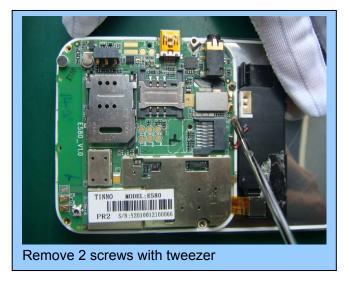
Remove 4 screws with screw driver.

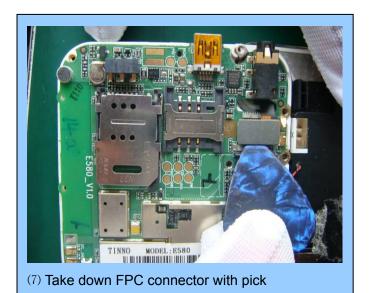


Prize up the antenna by pick











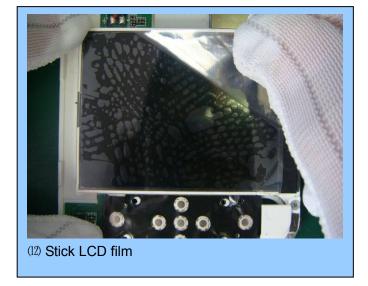
(8) Take off PCBA by tweezer



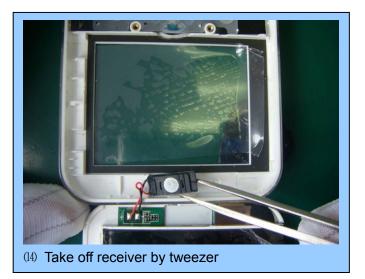




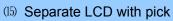
(11) Prize up B cover with tweezer

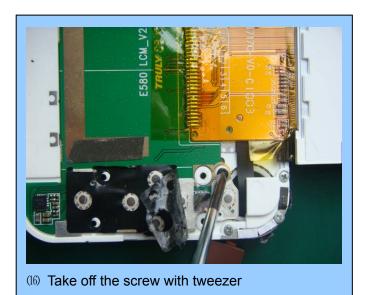




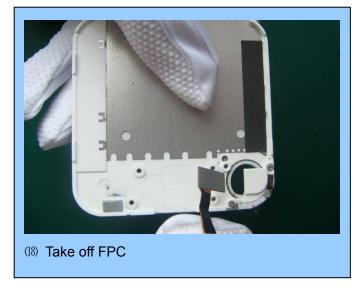








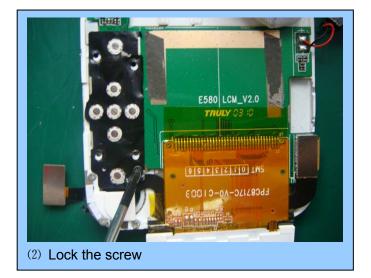


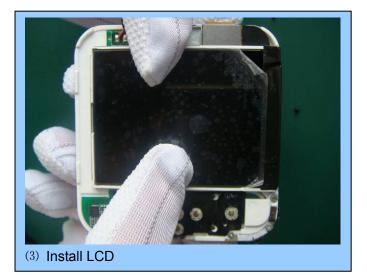


Finish

#### ASSEMBLY



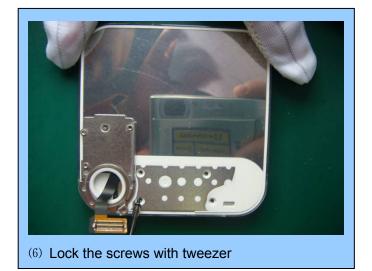


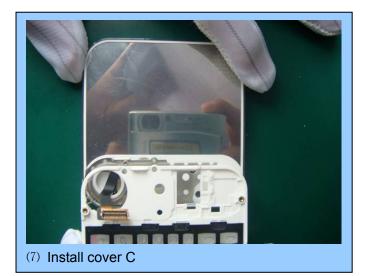




(4)Install receiver with tweezer

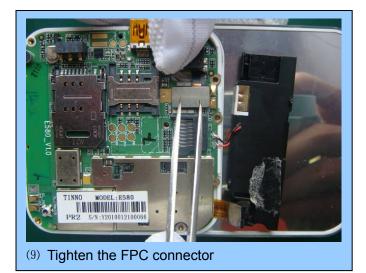




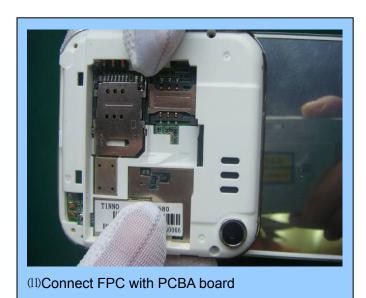




(8) Place main PCBA in C cover



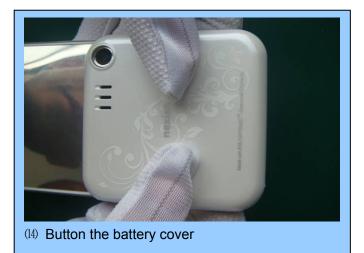






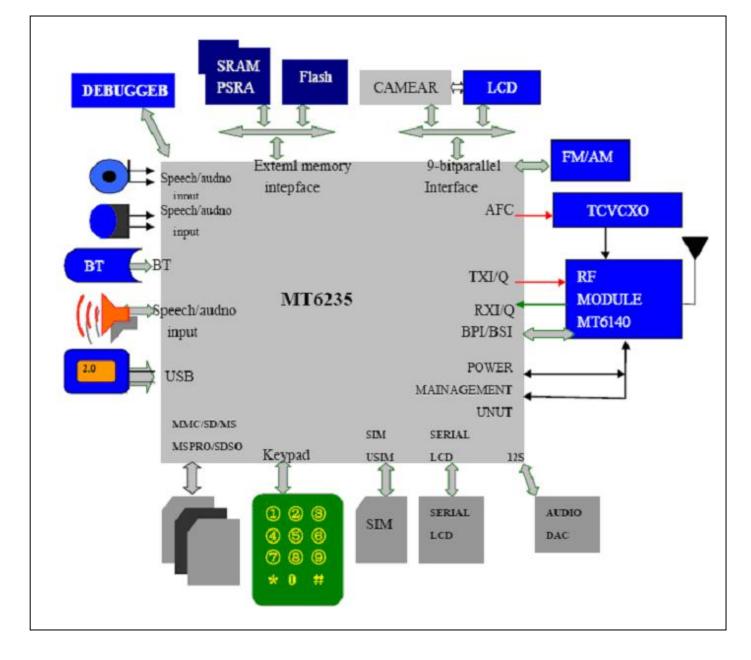


Finish



# SYSTEM BLOCK DIAGRAM

#### CPU (MT6235)



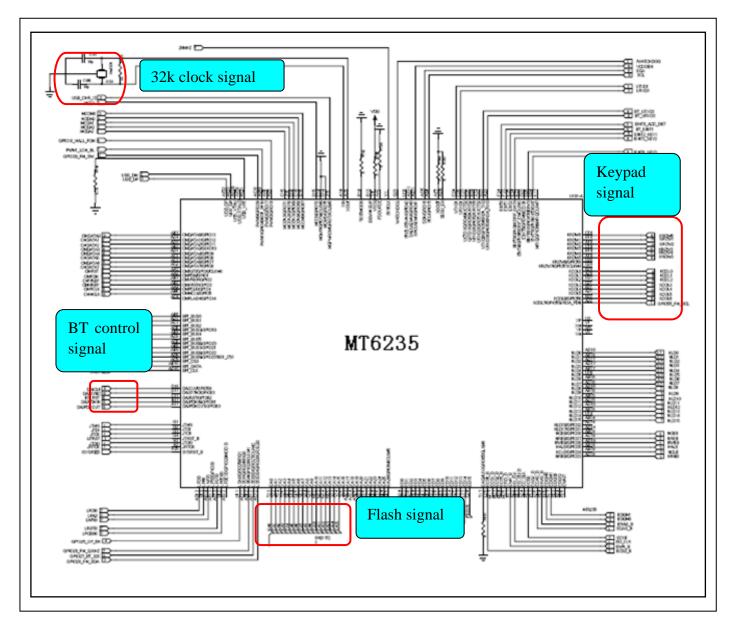
# **INSTRUCTION OF THE UNIT CIRCUIT**

#### 1. Instruction of the important ICs :

**CPU** is MT6235 which is the kernel IC of whole main circuit. It also integrates subsystems of channel coder and decoder, cross and de-cross, encryption and decryption. It takes charge of process of voice and every parts of mobile, such as charge, liberation, LED etc. And it includes WATCHDOG to improve system stability.

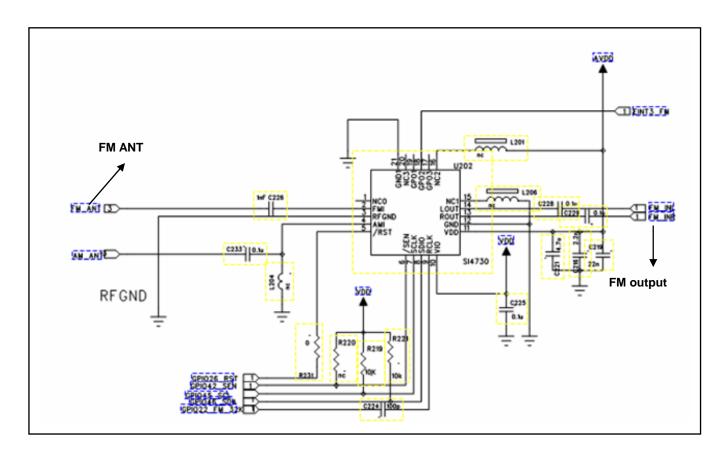
MT6235 is a new generation high-end chip made by MEDIATEK, with a QFN 11.5mm\*11.5mm, up to 261pins, 0.47pitch. MT6235 baseband chip has GSM/GPRS capability, also integrates audio and video function. MT6253 provides not only high-quality GPRS Class 12 MODEM, high-rate data transmission service, but also multi-media applications, like 0.3M pixels camera, mp3, mp4 etc

#### MT6235 CPU



#### FM circuit

U204 is FM receiving module. FM\_ANT is used to receive the radio signal from the antenna, FM\_VCC is the 2.8Vpower supply, FM32KHz is the reference clock, GPIO26 and GPIO31 is control signal from the baseband CPU.



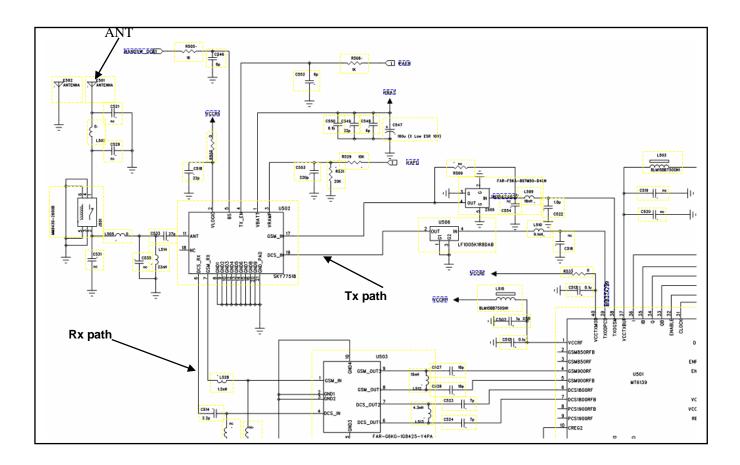
#### **RF circuit**

RF part generally means the analog RF and IF process system ,including Antenna system , TX path , RX path , Analog modem and Frequency Synthesizer .

RF Circuit deals with the RX and TX of wireless signal, with responsibility for the bidirectional transmission of speech and data between the MS and BS through the air interface. In detail RX part accomplishes the AGC amplifying, mix and demodulation of RF weak signal received from BS, The final signal output from RX part is the analog baseband I/Q signal. The final RX I/Q will be sent to Baseband Circuit for later disposal. On the other hand TX part deals with the signal modulation, up-conversion mix and power amplifying of analog I/Q signal received from baseband, generating burst which meets the GSM specification. And then the bursts are transmitted to Base station through the antenna. The signal interface between

RF Circuit and Baseband is analog baseband I/Q signal. The performance of RF Circuit can directly affects the signal transmission quality of the mobile phone.

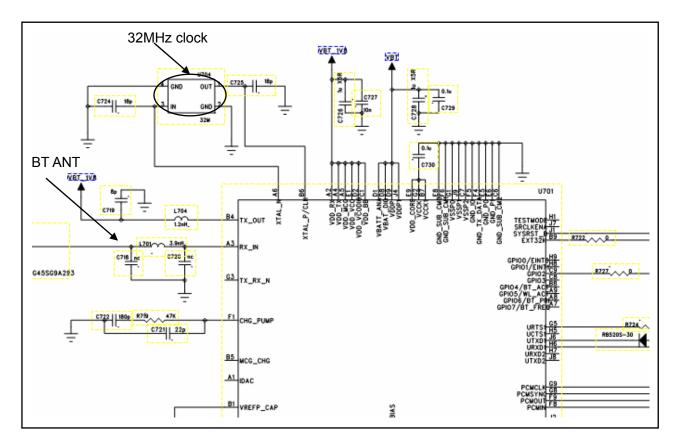
RF PA adopts RF7161 chip, RF7161 is a high-power dual-mode amplifier module with internal power control. RPF88150B is used in the stage when GSM / GPRS dual-mode mobile phones amplify transmission array, the working frequency is from 824MHz to 915MHz and 1710MHz to 1910MHz. There is a input pin to realize the selection of frequency band. 6mm \* 6mm chip package.



#### **BT circuit**

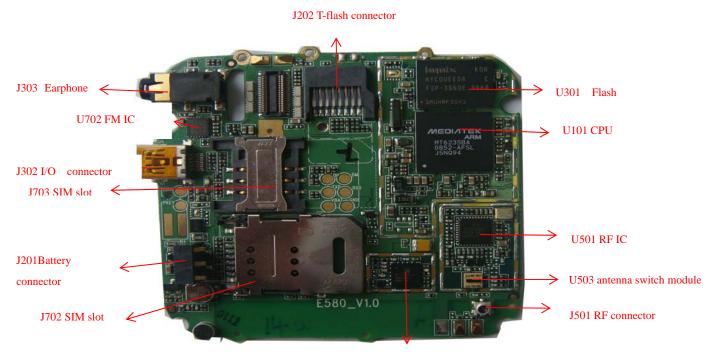
Bluetooth IC processor is MT6612BN/A..

MT6612 is 5mm x 5mm 40-lead (0.5mm pitch) QFN, a high-integrated Bluetooth IC, including rich function and strong disposal capability, and high performance transceiver.



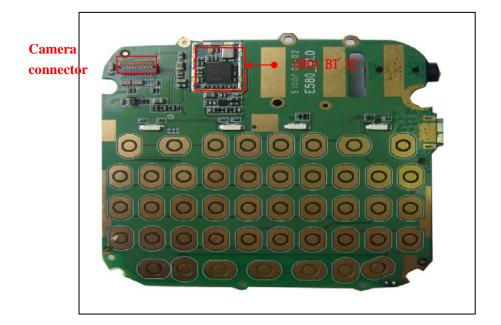
# ACTUALL BOARD

# SIDE A



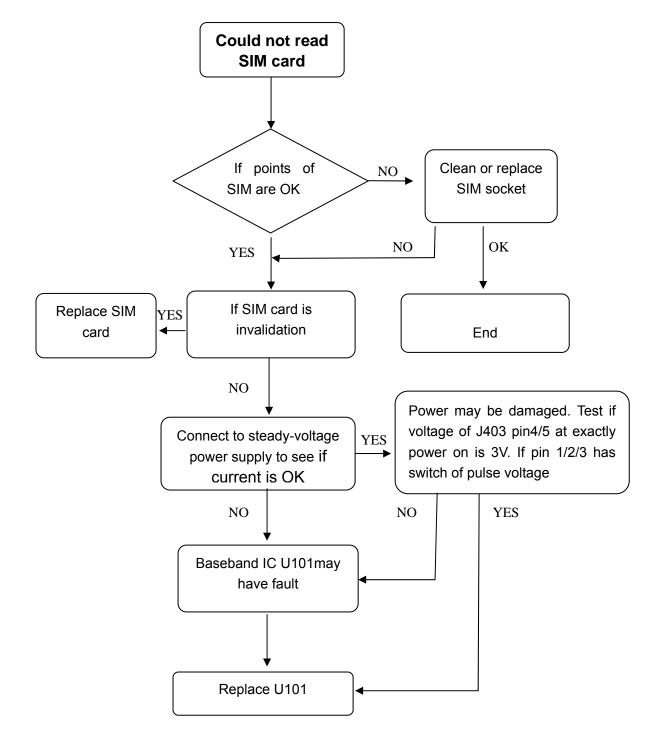
U502 RF PA IC

#### SIDE B

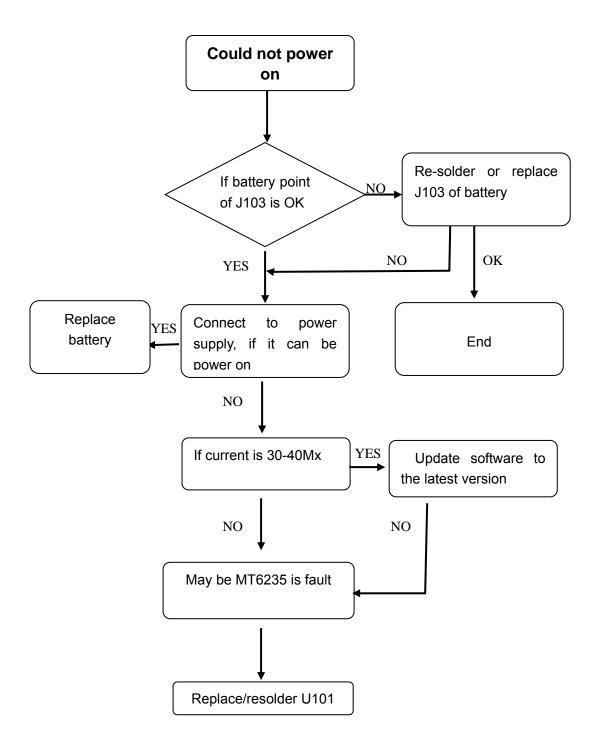


# **TROUBLE SHOOTING**

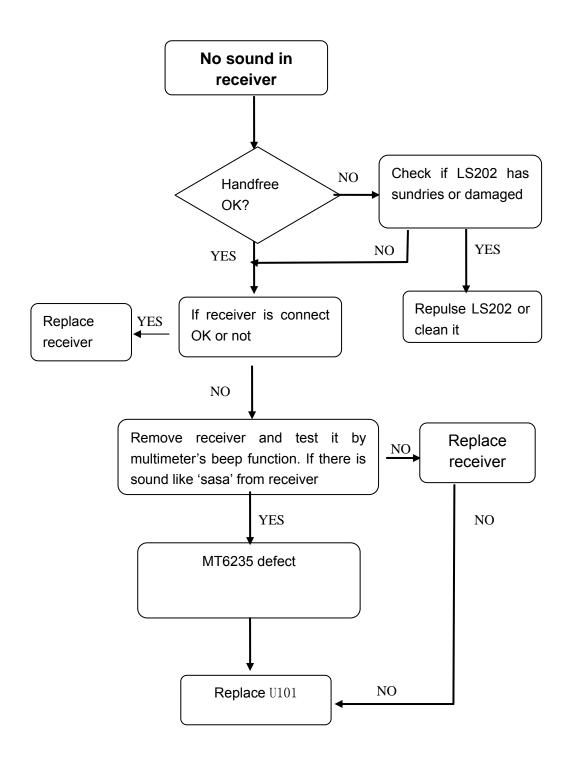
#### Test flowchart of SIM card



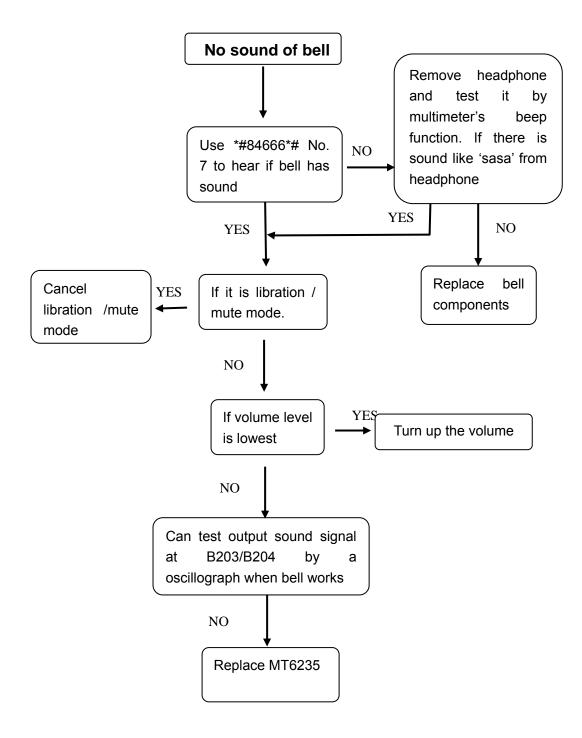
Test flowchart of can not power on (for master)



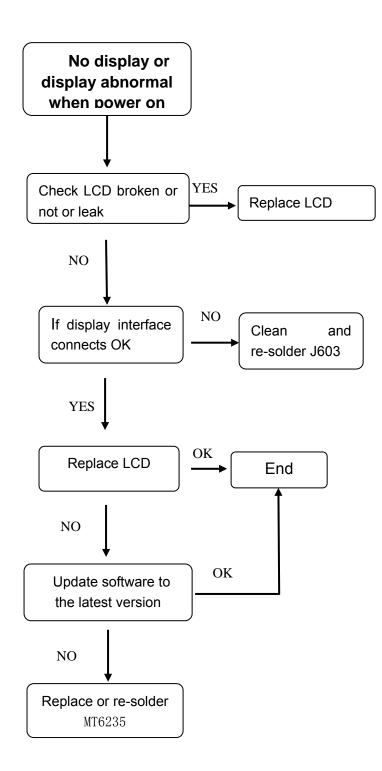
The test flowchart of receiver



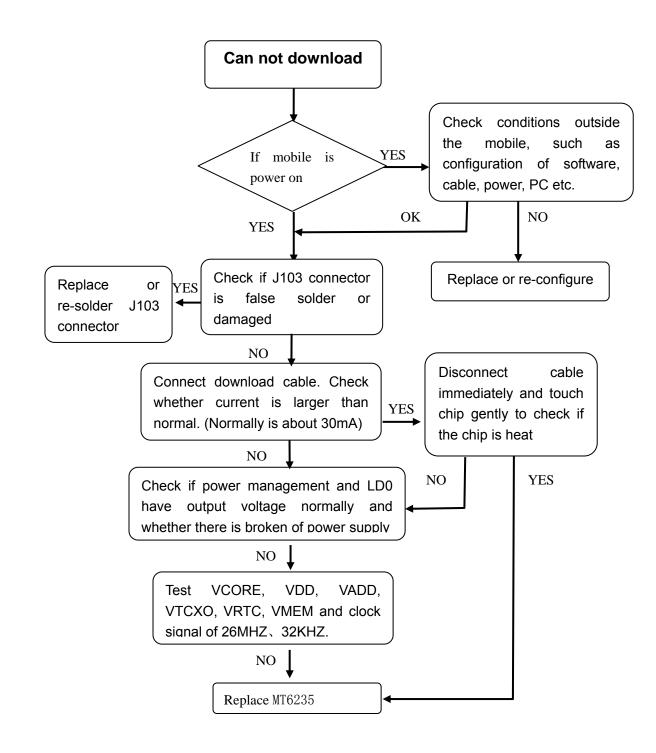
Test flowchart of incoming call with no ring.



Test flowchart of no display or display abnormally.



#### Test flowchart of download failed

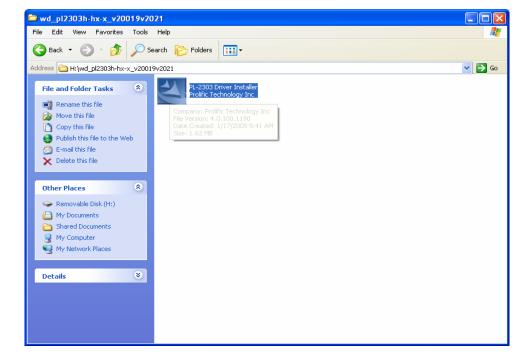


#### Instruction of SW update

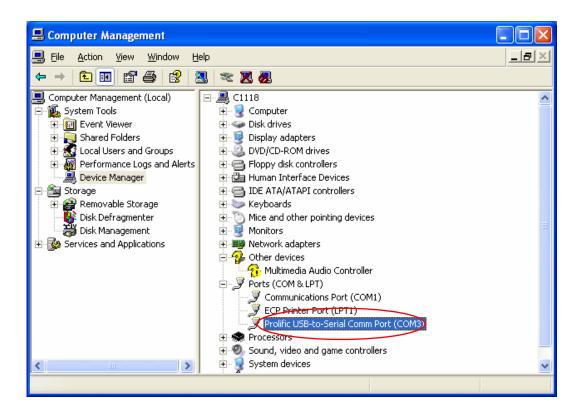


1. Install the USB driver

without the USB cable plugged into the computer.



2. After it is ok, plug the cable then check the device manager as the picture below:



#### 3. Open SW updating platform FlashTool\_v3.0848.00



Double click the icon Flash\_too... FlashTool. Choose the port which the cable be connected to the

computer.

🔂 Flash tool File Action C									
Download		F							
Second Constraints	Baud rate		COM				 		
Download Ag	COM port USB Download/Readback				ownload	Ø Stop			
 Download Age	Operation method	•	-	D\MTK_AllInOne		10.0040			
Scatter-loadin	Baseband chip option	•	aster\sc	atX90.txt				<u> </u>	
	Format FAT (DISABLED) .								
Authenticatior	Multi-Load				-		 		
name	region address	begin a	address	end address	location				
<				- MI					
<u>&lt;</u>					0%				
<	NOR	COM3	921600		0%				

#### 4. Select Format FAT (DISABLED).

🗗 Flash tool							
File Action O	ptions Window Help						
Download	Baud rate	•					
<b></b>	COM port	•	Q	a	0		
Download Ag	USB Download/Readback		Format D	ownload	Stop		
Download Age	Operation method	•	8.2.00\MTK_AllInOne	_D.A.bin			
Scatter-loadin	Baseband chip option		er\scatX90.txt				
Authentication	Format FAT (DISABLED)						-
name	Multi-Load region address	begin addr	ess end address	location			_
	0x00000000	0x0000000			Y\X90_master\X9	O DODOL NTCOOR	C00 C1E02 TI
<			IIII (				>
	principant and a			0%			
	NOR	COM3 921	.600 bps				
							1

5. Choose "Auto Format FAT", and don't select "Validation".

Format Options	
C Do Not Format FAT	
The FAT area is not formatted after the download process.	OK Cancel
C Reset to Factory Default	□ Validation
FlashTool resets NVRAM data items that have NVRAM_CATEGORY_FACTORY NOTICE! Only available from w05.52.	
© Manual Format FAT	
Specify the begin address and length of the format	
Begin Address (Hex): 0x00E00000	
Format Length (Hex) : 0x00200000	
WARNING! Calibration data is erased.	

6. Click "Download Agent" to transfer "MTK\_AllInOne\_DA.bin" file.

<mark>ß</mark> FlashTool						
<u>F</u> ile <u>A</u> ction <u>O</u> ptions <u>W</u> ir	ndow <u>H</u> elp					
Download Read back Memory	- 1 Onen Demploed Age	mt Rilo			? 🗙	
Download Agent Scatter-loading Download Agent E\软件\flash1 Scatter-loading File C\Document Authentication File		ent File FlashTool_v doc gps_DA.bin MTK_AllInOne		← È ở ≣▼		
name region s ■ BOOTLOADER 0x08000 ■ ROM 0x08010	桌面 我的文档 我的电脑 天令不居		Double click	>		TINN025_( TINN025_(
		牛名(N): 牛类型( <u>T</u> ):	MTK_AllInOne_DA.bin Bin File (*.bin)	• •	打开( <u>0</u> ) 取消	
<						>
		0.0	0%			
NOF	COM1 21600 bp 0:00	sec				
						1.

#### 7. Update with the update cable. (The actually file name please refer to your software)

(1) As showed bellow, click "Scatter-loading" to transfer "\*\*\*\*.txt" file in the folder of the new software.

🔒 Flash tool	open Scatter file	? 🗙
File         Action         Options         Window         Help           Download         Read back         Memory Test         Image: Compared back         Image: Compared back	Look in: 🔁 X90_V032_T Y 💌 🗢 🖻 📸 🖽 -	
Download Agent Scatter-loading Ar Download Agent F:\FlashTool_v3.2.00	X90_master       My Recent       Documents	
Scatter-loading File	Double click	
Authentication File	Desktop	
name region address	My Documents	
¢	My Computer	
Parameters Information		
OTP addr(0x000000	Places	Open Cancel
	0%	
NOR	COM1 921600 bps	

🔒 Flash tool	open Scatter file ?	
File       Action       Options       Window       Help         Download       Read back       Memory Test       Image: Comparison of the second sec	Look in: 🔁 X90_master 💌 🖨 🖻 📅 📰 -	
Parameters     Information     OTP     addr(0x0000000	My Computer My Network Places File name: scatX90  Gen Cance	
NOR	0% COM1 921600 bps	

(2) Here, ROM/Boot files can be selected automatically. Don't need to choose.

🖪 FlashTool								
<u>F</u> ile <u>A</u> ction	Options <u>W</u> indow	<u>H</u> elp						
Download Read	back Memory Test							
Ē	i 🖻		2	2	$\oslash$			
Download Agent	Scatter-loading A	uth File For	mat E	Download				
Download Agent	E:\软件\flash tool\Fla	sh⊤ool_∨3.0848.00\N	/TK_AllInOne	_DA.bin				
Scatter-loading Fil	C:\Documents and Se	ettings\p002\桌面\E8	80_TURK_PF	R_R0_6_20090	10_update\scatTINNO:	25_08A_GEMINI.txt	_	
Authentication File								
name	region address	begin addre e	end address	location				
BOOTLOAD			×0800515F				0_6_20090310_update\7	
ROM	0×08010000	0×08010000 0	x093FCD0B	C:\Documen	s and Settings\p002\桌i	面\E880_TURK_PR_RI	0_6_20090310_update\7	"INNO25_(
<u>                                     </u>								>
	(1			0%				
	NOF COM1	21600 bp 0:00 s	90					
								10

(3) Making sure the phone is powered off and the battery is taken out. Click "download", then link the cable for the master to the phone, insert the battery and keep pressing the power-on button for a while, soon the red progressing bar will occur. Blue progressing bar appears after the blue one. Then an icon occurs to show the finish of downloading.

File Action Option:	s Window Help						
Download Read ba	ick Memory Test						
🗃 Download Agent Sc			😨 omat D	rownload s	0 itop		
, and the second s	:\FlashTool_v3.2.00\	- 1941 (A. 1		_DA.bin			
	:\X90_V032	YW90_master\sc	atX90.txt				
Authentication File	region address	begin address	end address	location			
ROM	0x00000000	0x00000000	0x00DE1D57	F:\X90_V032_1	YW90_masterW90_F	PCB01_gprs_MT62	25_\$00.61503-TR-F
<							
<				0%			
< Bytes / 0 Bps	NOR	COM3 921600					

(4) As showed the phone is checked.

🚱 Flash tool						
	ons <u>W</u> indow <u>H</u> elp					
Download Read	back Memory Test					
Download Agent	Scatter-loading	Auth File	Tormat D		0 Stop	
Download Agent	F:\FlashTool_v3.2.0	10\FlashTool_v3.2.0	0\MTK_AllInOne	_DA.bin		
Scatter-loading File	F:\X90_V032_T	'\X90_master\sc	calX90.txt			
Authentication File	[					
name	region address	s begin address	end address	location		
<			100			<u> </u>
				78%		
60264 Bytes / 11.77	KBps NOR	COM3 921600	bps 0:05 sec	: <u> </u>		

#### (5) As showed the software is written in.

😚 Flash tool								×
Eile Action Op	concerne and the second second							
Download Read	d back Memory							
Download Agent	Scatter-loading		🗲 th File	CQ Format	D	ownload	⊘ Stop	
Download Agent	F:\FlashTool	v3.2.00\	FlashTool_v	3.2.00\MTH	(_AllInOne_	_DA.bin		
Scatter-loading File	F:\X90_V032	2	YVX90_mast	er\scatX90	.txt			
Authentication File								
name	region a	address	begin add	ress end	address	location		
ROM ROM	0x0000	0000	0x000000	00x00	IDE1D57	F:\X90_V032_	EY\%90_master\%90_PCB01_gprs_MT6225_S00.61503-TF	PR
<								>
<						7%		>
1060864 Bytes / 4	5.04 KBps	NOR	сомз 92	1600 bps	0:31 sec		+32Mb) [SPANSION] 571PL127N	>

(6) This icon shows the finish of the downloading.

🚮 Flash tool											
<u>File Action Op</u>	tions <u>W</u> indow	Help									
Download Rea	id back   Memory	y Test									
Download Agent	Scatter-loading	) Auth F			က wnload	⊘ Stop					
Download Agent	F:\FlashTool	_v3.2.00\Fla	shTool_v3.2.00\t	ITK_AllInOne_C	DA.bin						
Scatter-loading Fi	e F:\X90_V032	2?V	<90_master\scal>	(90.txt					-		
Authentication File	е 📃								-		
name	region	address b	egin address e	nd address	IK	X					
Row	0x0000	0000 t	₩0000000 C	x00DE1D57			90_master(X90_PCB	01_gprs_M16225_3	JUU.615U3+1R+PR-VU	_32.Din	
						00%					
14556504 Bytes /	45.27 KBps	NOR CO	M3 921600 bp	s 5:32 sec	NOR: (128	4b+32Mb) (	5PANSION] 571PL127	N			
MT6225_500	32Mb SRAM	Project: X90			NAND: N/A						//

# **FUNCTION TEST**

#### Press "#84666\*#" to check these items in stand by mode:

- 1. Version: to check the version of the software
- 2. Echo Loop: blow to the mic, the receiver will have a sound
- 3. Key: press relevant keys appear in the screen
- 5. Libration: The cellphone will librate
- 6. Lond SPK: there will be a sound from the speaker
- 7. Ring: press start there will be some music from the speaker
- 8. LED: press confirm button to check if LED is normal
- 9. LCD: LCD will Auto Display
- 11. Receiver: there will be a sound from the receiver

Camera ->Menu -> Camera-> to test if the camera is available or not

# PARAMETER SETTING INSTRUCTION

# China mobile as an example, other countries please inquire the local operator 1. WAP parameter setting instruction

1) Data Account Process: Menu→Services→Data Account

GSM Data:	Account Name: (default)
	Number: 17266
	User Name: WAP
	Password: WAP
	Line Type: ISDN
	Speed: 9.6 Kbps
	DNS: 010.000.000.172
GPRS:	Account Name: (default)
	APN: cnwap
	User Name: WAP
	Password: WAP
	Auth. Type: (default)

2) WAP setting process: Menu→Services→WAP→Settings→Edit Profile

Edit Profile: Rename Profile: Optional Homepage: <u>http://monternet.com</u> Data Account: GSM/GPRS Connection Type: HTTP (Proxy Address: 010.000.000.172) Username: Optional Password: Optional

After setting as above, the WAP is ready.

#### 2. MMS parameter setting instruction (Premise is WAP is valid)

Setting process: Menu→Messages→MMS→Message Settings→Server Profile→Edit profile Edit Profile: Rename Profile: Same as WAP Profile name Homepage: <u>http://mmsc.monternet.com</u> Data Account: Same as WAP Data Account Connection Type: Same as WAP Data Account Username: Optional Password: Optional

After setting as above, the MMS is ready.

#### 3. Email parameter setting instruction (Premise is WAP is valid)

- 1) GPRS setting process: Menu→Services→Data Account→GPRS
- Edit Profile: Account Name: Optional APN: cmnet
- 2) Email Profile setting process: Menu→Messages→Email→Email Profile
  - A. Outgoing server: stmp.126.com (depend on the user's Email website )

E-Mail Address: Full E-Mail Address of the user's Password: Password of the use's E-Mail

B. Incoming server: pop3.126.com (depend on the user's Email website )
 E-Mail Address: Full E-Mail Address of the user's
 Password: Password of the use's E-Mail

After setting as above, the MMS is ready.

## **CATCHER INSTRUCTION**

General: The figures in this document help to understanding, and they may not be exactly the same as showed in your computer. Contact us please when you have any queries.

1 Install the USB driver if not yet.



1.1 Run the USB driver

without the upgrade cable plugged into the computer.

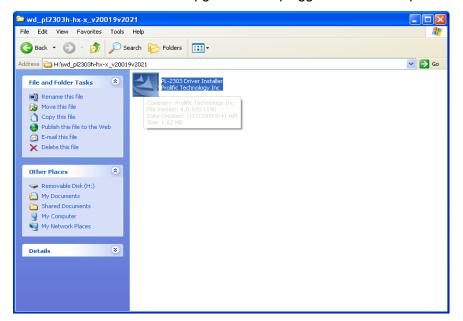


Figure 1

1.2 After the installation is completed, plug the upgrade cable into the computer's USB connector, and then check the device manager as in figure 2:

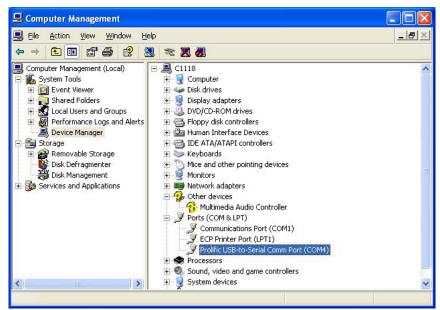


Figure 2

#### 2 set the phone to prepare for using Catcher.

Open the phone and input "\*#84666364\*#" to enter the setting screen. In sequence enter DEVICE, UART, and TST config. Choose UART1 and Clink done, and then the phone restarts. After the phone restarts, power it off.

#### 3 choose the Database of the phone's software.

3.1 run "Catcher.exe", choose Config  $\rightarrow$ .Set Database Path. The figures (figure 3, figure 4, and figure 5) occur in sequence as below.

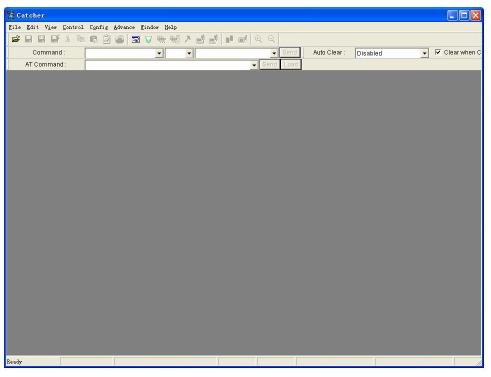


Figure 3

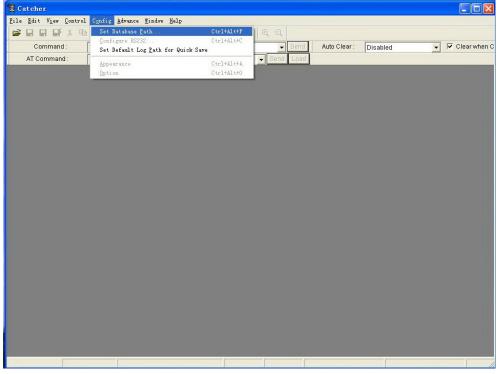


Figure 4

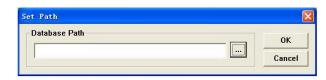


Figure 5

3.2 Clink the button "..." in figure 5 to choose the Database file of the master phone or slave phone (for example "BPLGUInfoCustomSrcP\_MT6226M\_S01\_X6+\_FLP\_06\_12\_V3\_2-TN-MP-5B-QN" file ). Refer to figure 6 showed as below:

2 Catcher				
Eile Edit View Control Confic			()	
66666	初开	2 🛛		
Command :	查扳范围(I): 🔁 naster		r: Disabled	🖌 🔽 Clear when C
AT Command :	BPLGWInfoCustonSrcf_HT6226H_S0	11 X6+ FLP 06 12 V3 2-TH-MP-5B-QH		
	scatI6 10 16_PCB02_gprs_NT6226H_S01.X6+_	NID OF 10 10 O-TH-UD-FD-OV		
	30 10_FURC_2015_0102200_301.101_	FLF_06_L2_v3_2~18~MF~58~68		
	文件名 (II): BPLGUInfoCustonSrcH	_MT6226M_S01_X6+_FLF 打开 (0)		
	文件类型 ①: All files (*.*)			
			×	
Databa	se Path			
		ОК	J .	
		Cancel		
Ready				1.

Figure 6

When you examine the master phone's problems, choose the master phone software's database file, and when the slave phone's problems, the slave phone's database file.

The database in the phone must be exactly the same as the chose database for Catcher, or the figure 14 will occur when the Catcher work.

#### 4 enter Logging mode and choose the right COM

4.1 clink the "Logging code" button in the red note in figure 7. Then figure 8 occurs.

🙎 Catcher –	E:\杨工备份\x6	6t非律宾第二版1225\master\B	PLGUInfoCustomSrcP_HT6	226 S01 X6+ FLP 06	12_V3_2-TH-	P 🔳 🖬
		Advance Mindow Help				
	f X th th 🖸	i 🛎 🔕 🗸 🐜 🖬 🗡 🛃 i				
Command :		-Logging mode	Name :	Send Load	Auto Clear:	Disabled
AT Command :			Send Load			
ogging mode	MT6226M S01	26+ FLP. 06. 12. V3. 2-TN-MP-5B-QN	GPS:Invalid 000000bps	3	CTI: No Connecti	on Idle.R

Figure 7

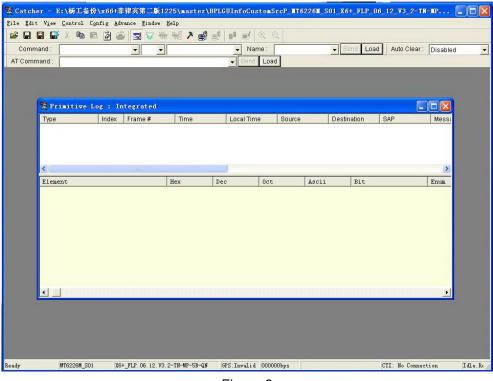


Figure 8

4.2 clink button "Configure RS232" in figure 9, then figure 10 occurs, choose the right COM in Port option, and clink OK.

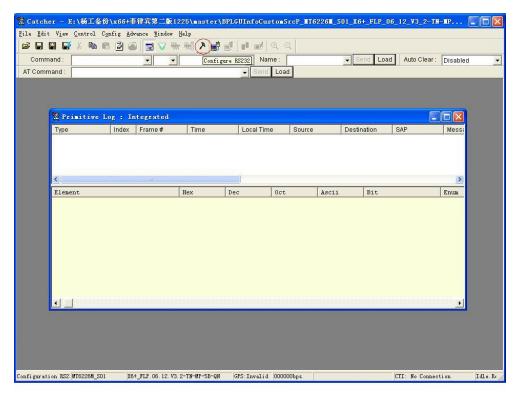


Figure 9

Port :	СОМ4		ОК
Baud Rate :	115200	•	Cancel
low Control :	Software	•	
GPS Port :	None	•	

Figure 10

#### 5 use the Catcher to record debug information

5.1 clink the button "connect" in figure 11, clink the button "Default Filter" in figure 12, select "Field Trial" button in figure 13, and then clink "set" in Figure 13.

😭 Cat ch	ner - E:\杨工备份	}\x66+菲律宾	第二版122	5\master\B	PLGUInfo	CustonS	rcP_HI6	226 <b>1</b> _S	01_X6+_FL	P_06_12_V	3_2-TN-MP	
<u>F</u> ile <u>E</u> di	t V <u>i</u> ew <u>C</u> ontrol C <u>o</u>	onfig Advance	<u>M</u> indow <u>H</u> ei	lp								
🖻 🖬	💾 📑 X 🖻 🖻	1 🖉 🕥 🖪	2 💟 🦬 🗄	Mi X 🛃			2					
Comr	mand :	*	-		-	Name :			- Send	Load Auto	Clear: Disable	ed 💌
AT Com	mand :				- 8	end Loa	i l					
	Primitive L	og i Totogi	ratad									
	Туре		me#	Time	Local	Time	Source		Destination	SAP	Messa	
	Туре	Index Frai	ne #	Time	LUCA	nine	Jource		Destination	OAF	messo	
	<				_						>	
	Element		[ m	lex	Dec	Oct		Ascii	Bit			
	Liemenc			lex	Dec	000		ASCII	DIC		Enum	
	1 1											
											<u>}</u>	
Connect	MT6226M S01	VCL BID	.06.12.V3.2-	TH-HP-CP-ON	CPS	1id 0000	Oler C			CTT - N	Connection	Idle. Re
connect	m16220m_301	NOT_ILL.	. 00. 12. 93. 2-	TH HIL JD-614	013.1RV8	uru 00000	oob?			CII. NO	Connection	Ture. Nr

Figure 11

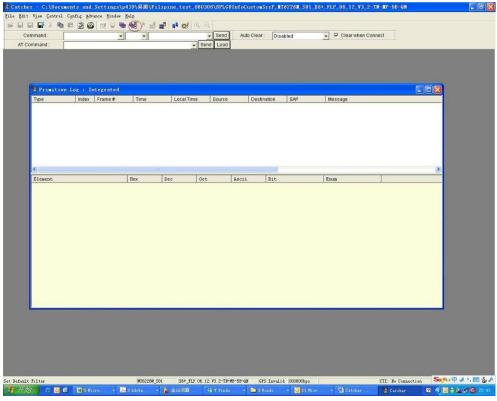


Figure 12

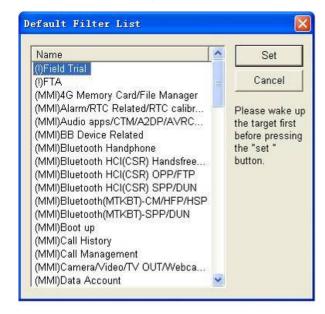


Figure 13

5.2 Clink "Filter" in figure 14, choose some items in figure 15, and then clink ok in figure 15. (Please query us if you need to choose the filter settings)

🛣 Catcher - C:\Documents and Settings\p43		t_080306\BPLGUInfoCus	tomSrcP_NT6226N_S01_1	K6+_FLP_06_12_¥3_2-TN-MP-5B-QN	- B 🛛
Eile Edit View Control Canfig Advance Mindow Me					
	NG / S S N O				
Command :		- Send Auto C	lear: Disabled	Clear when Connect	
AT Command :		✓ Send Load			
SPrimitive Log : Integrated					
Type Index Frame #	Time Local Ti	me Source D	stination SAP	Message	
¢	1	1	1		<u>&gt;</u>
Element	lex Dec	Oct Ascii	Bit	Enun	
Ready	WT6226W_S01 16+_	FLP. 06. 12. V3. 2-TH-MP-5B-QN	GPS:Invalid 000000bps	CTI: No Connec	tion So 💁 🕈 🖌 🗖 🌜 🎤

Figure 14

) E	LAST_MOD_ID	^	All On
102-01-01-0	MOD_ABM		All Off
	MOD_AS MOD_ATCI		E/W On (All)
ΦE	MOD_AUX		E/W On (Mod On
			Reset Color
	MOD_CC		Expand
	MOD CISS	1.000	Expand
		<u>~</u>	Apply Default
			Apply Default
AP	▼ ABM_SOC_SAP		All Level 0
AP SAF 4 4	▼ ABM_SOC_SAP ▼ BCHS_L4C_SAP		All Level 0 All Level 2
SAF	▼ ABM_SOC_SAP		All Level 0 All Level 2 All Level 4
SAF 4 4	<ul> <li>▲BM_SOC_SAP</li> <li>■ BCHS_L4C_SAP</li> <li>■ BCHS_MMI_SAP</li> </ul>		All Level 0 All Level 2
P SAF 4 4 4	ABM_SOC_SAP     BCHS_L4C_SAP     BCHS_MMI_SAP     BT_AZDP_SAP		All Level 0 All Level 2 All Level 4 Reset Color
8 SAF	ABM_SOC_SAP     BCHS_L4C_SAP     BCHS_MMI_SAP     BT_A20P_SAP     CMUX_SAP	1	All Level 0 All Level 2 All Level 4 Reset Color

Figure 15

5.2 connect the upgrade cable to the phone and power on the phone. If the database in the phone is not exactly the same as the chose database in Catcher, figure 16 occurs (for example, different software versions and wrong cable connectors lead to the difference between the databases). You have to clink "EXIT" and make the databases the same.



#### Figure 16

5.3 The catcher records primitive information as showed in figure 17. Clink the button "clear" in figure 18 to clear the useful primitive information. Then the phone user carries on some operations to the phone to make the failures recur. After the wanted failures occur wholly, clink the button "disconnect" in figure 19. You can save the ".clg" file now as showed in figure 20, and name it. The ".clg" file is that needed for analyzing the failures of phone.

and: v v v v v v v v v v v v v v v v v v v	Send:         Send:         Load           Type         Index.         Frame #         Time         Source         Destination         SAP         Message         Message           Type         Index.         Frame #         Time         Load         Time         Source         Destination         SAP         Message		-10-10	橋 / 글 g			loud und				
Prise index         Frame #         Time         Local Time         Source         Destination         SAP         Message           Type         Index         Frame #         Time         Local Time         Source         Destination         SAP         Message         Index         Frame #         Time         Local Time         Source         Destination         SAP         Message         Index         Frame #         Time         Local Time         Source         Destination         SAP         Message         Message         Index         Frame #         Source         Destination         SAP         Message	Bit is interacted         Non-sector         Destination         SAP         Message           Type         Index         Frame #         Time         Local Time         Source         Destination         SAP         Message           Image: Prace         2422         697292         10787         11:25:0485.1         MOD_AS         TRACE_GRO         FRXCI Cit/Message Type(Du21) in state[1]           Image: Prace         2434         697292         10787         11:25:0485         MOD_AS         TRACE_GRO         FRXCI The arks Boolings to band 11           Image: Prace         2436         697292         10787         11:25:0485         MOD_AS         TRACE_GRO         FRXCI The arks Boolings to band 11           Image: Prace         2436         697292         10787         11:25:0486         MOD_AS         TRACE_GRO         FRXCI The arks Boolings to band 11           Image: Prace         2436         697292         10787         11:25:0486         MOD_AS         TRACE_GRO         FRXCI The arks Boolings to band 11           Image: Prace         2438         697292         10787         11:25:0486         MOD_AS         TRACE_GRO         FRXCI The arks 103 belongs to band 11           Image: Prace         2438         697292		•		POLYCONO PLAN		Send Load	Auto Clear: Di	isabled 💽 🗸 Clear whi	en Connect	
Type         Index         Finde         Local Time         Source         Destination         SA         Message         A                • Trace             2422             607/32             10787             1128/49/531             MOD_AS             Trace_E_GRO             FACE_GRO             FACE_GRO             FACE_GRO             FACE_GRO             FACE_GRO             A               • Trace             2424             897292             10787             1128/49/531             MOD_AS             Trace_GRO             FACE_GRO             FACE_GRO             A                • Trace             2424             897292             10787             1128/0493             MOD_AS             Trace_GRO             FACE_GRO             FACE_GRO             A                • Trace             2436             897292             10787             1123/50.489             MOD_AS             Trace_GRO	Type         Index         Find #         Time         Destination         SA         Message         #           Image: Trace         2432         607292         10787         1128/49.531         MOD_A6         TRACE_GRO         FNIC1 Cit Message Type(hct)   instel   ins				· Send Load				_		
Type         Issue         Frame #         Time         Local Time         Destination         SA         Message         A           ●         Trace         2432         607/392         10787         11.28/49.531         MOD_A6         TRACE_GRO         FRUCT Cit Message Type(hc2) in stade(1)         Mod_A6           ●         Trace         2436         597.292         10787         11.28/49.531         MOD_A6         TRACE_GRO         FRUCT Cit Message Type(hc2) in stade(1)         Mod_A6           ●         Trace         2436         697.292         10787         11.28/49.4931         MOD_A6         TRACE_GRO         FRUCT The artin 68 beings to band 11           ●         Trace         2436         697.292         10787         11.28/40.480         MOD_A6         TRACE_GRO         FRUCT The artin 68 beings to band 11           ●         Trace         2436         697.292         10787         11.28/40.480         MOD_A6         TRACE_GRO         FRUCT The artin 61 beings to band 11           ●         Trace         2438         697.292         10787         11.28/40.480         MOD_A6         TRACE_GRO         FRUCT The artin 100 beings to band 11           ●         Trace         2438         697.292         10787	Type         Issue         Frame #         Time         Local Time         Destination         SA         Message         #           ●         Trace         2432         607/392         10787         11/2/40/831         MOD_A6         TRACE_GRO         FNIC] Cit Message TraphCit [] in state[] and the state of										
● Trace         2432         69/292         10787         11:28:49.531         MOD_A6         TRACE_GRO         FRAC[CrM Message Type(0:21) in state[1]           ● Trace         2432         69/292         10767         11:28:49.531         MOD_A6         TRACE_GRO         FRAC[CrM Message Type(0:21) in state[1]           ● Trace         2434         69/292         10767         11:28:50:453         MOD_A6         TRACE_GRO         FRAC[CrM Message Type(0:21) in state[1]           ● Trace         2434         69/292         10767         11:28:50:453         MOD_A6         TRACE_GRO         FRAC[CrM Message Type(0:21) in state[1]           ● Trace         2436         69/292         10767         11:28:50:453         MOD_A6         TRACE_GRO         FRAC[CrM Message Type(0:21) in state[1]           ● Trace         2436         69/292         10777         11:28:50:468         MOD_A6         TRACE_GRO         FRVC1 The arth 37 belongs to band 11           ● Trace         2436         69/292         10777         11:28:50:468         MOD_A6         TRACE_GRO         FRVC1 The arth 101 belongs to band 11           ● Trace         2438         69/292         10777         11:28:50:468         MOD_A6         TRACE_GRO         FRVC1 The arth 101 belongs to band 11	● Trace         2432         69/232         10777         11:2249.331         MOD_AS         TRACE_GRO         FRAC(CM Message Type)/20/(1) establi(1)           ● Trace         2438         697392         10767         11:2250.453         MOD_AS         TRACE_GRO         FRAC(CM Message Type)/20/(1) establi(1)           ● Trace         2434         697392         10767         11:2250.453         MOD_AS         TRACE_GRO         FRAC(CM Message Type)/20/(1) establi(1)           ● Trace         2436         697392         10767         11:2250.453         MOD_AS         TRACE_GRO         FRAC(CM Message Type)/20/(1) establi(1)           ● Trace         2436         697392         10767         11:2250.453         MOD_AS         TRACE_GRO         FRAC(C The artin 57 beings to band 1)           ● Trace         2436         697392         10767         11:2250.458         MOD_AS         TRACE_GRO         FRAC(The artin 10) beings to band 11           ● Trace         2436         697392         10767         11:2250.488         MOD_AS         TRACE_GRO         FRAC(The artin 10) beings to band 11           ● Trace         2438         697392         10767         11:2250.488         MOD_AS         TRACE_GRO         FRAC(T) the artin 10) beings to band 11								1		
Operating         Participation         Participatio	Operation         Participation         Participatio						Destination				
	© Trace         2434         697292         10787         11:29:04.43         MOD_AS         TTANCE_GRO         FMC1 The warks 98 beinings to band 11           © Trace         2436         697292         10787         11:29:04.48         MOD_AS         TTANCE_GRO         FMC1 The warks 98 beinings to band 11           © Trace         2436         697292         10787         11:29:04.48         MOD_AS         TTANCE_GRO         FMC1 The warks 98 beinings to band 11           © Trace         2436         697292         10787         11:29:04.48         MOD_AS         TTANCE_GRO         FMC1 The warks 98 beinings to band 11           © Trace         2436         697292         10787         11:29:04.48         MOD_AS         TTANCE_GRO         FMC1 The warks 98 beinings to band 11           © Trace         2438         697292         10787         11:29:04.48         MOD_AS         TTANCE_GRO         FMC1 The warks 100 beinings to band 11           © Trace         2438         697292         10787         11:29:04.48         MOD_AS         TTANCE_GRO         FMC1 The warks 100 beinings to band 11           © Trace         2438         697292         10787         11:29:04.48         MOD_AS         TTANCE_GRO         FMC1 The warks 100 beinings to band 11           © T						MOD 49				
Trace         2436         697392         10787         11:25:50.488         MOQ_AS         TRACE_GRO.         FMG[The arts not 2 beings to band 11           Trace         2436         697392         10787         11:25:50.488         MOQ_AS         TRACE_GRO.         FMG[The arts not 2 beings to band 11           Trace         2437         697392         10787         11:25:50.488         MOQ_AS         TRACE_GRO.         FMG[The arts not 30 beings to band 11           Trace         2438         697392         10787         11:25:50.488         MOQ_AS         TRACE_GRO         FMG[The arts not 30 beings to band 11           Trace         2438         697392         10787         11:25:50.488         MOQ_AS         TRACE_GRO         FMG[The arts ni 02 beings to band 11           Trace         2430         697392         10787         11:25:50.488         MOQ_AS         TRACE_GRO         FMG[The arts ni 02 beings to band 11           Trace         2430         697392         10787         11:25:50.488         MOQ_AS         TRACE_GRO         FMC[The arts ni 03 beings to band 11           Trace         2440         697292         10787         11:25:50.488         MOQ_AS         TRACE_GRO	Trace 2436 697292 10787 11:2550.486 MOD_A6 TTAACE_GRO FMxC] The artin 97 beings to band 11     Trace 2437 697292 10787 11:2550.486 MOD_A6 TTAACE_GRO FMxC] The artin 92 beings to band 11     Trace 2437 697292 10787 11:2550.486 MOD_A6 TTAACE_GRO FMxC] The artin 92 beings to band 11     Trace 2438 697292 10787 11:2550.486 MOD_A6 TTAACE_GRO FMxC] The artin 92 beings to band 11     Trace 2438 697292 10787 11:2550.486 MOD_A6 TTAACE_GRO FMxC] The artin 102 beings to band 11     Trace 2438 697292 10787 11:2550.486 MOD_A6 TTAACE_GRO FMxC] The artin 102 beings to band 11     Trace 2438 697292 10787 11:2550.486 MOD_A6 TTAACE_GRO FMxC] The artin 102 beings to band 11     Trace 2438 697292 10787 11:2550.486 MOD_A6     TRACE_GRO FMxC] The artin 103 beings to band 11     Trace 2440 697292 10787 11:2550.486 MOD_A6     TRACE_GRO FMxC] The artin 103 beings to band 11     Trace 2440 697292 10787 11:2550.486 MOD_A6     TRACE_GRO FMxC] The artin 105 beings to band 11						BR0702_250				
© Trace         2438         697292         10787         11:2260.488         MOQ_AS         TTRACE_GRO         FNR(1) The artin 01 beings to band 11           © Trace         2438         697292         10787         11:2260.488         MOQ_AS         TTRACE_GRO         FNR(1) The artin 01 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOQ_AS         TTRACE_GRO         FNR(1) The artin 10 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOQ_AS         TTRACE_GRO         FNR(1) The artin 102 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOQ_AS         TTRACE_GRO         FNR(1) The artin 102 beings to band 11           © Trace         2448         697292         10787         11:2250.488         MOQ_AS         TTRACE_GRO         FNR(1) The artin 105 beings to band 11           © Trace         2448         697292         10787         11:2250.488         MOQ_AS         TTRACE_GRO         FNR(1) The artin 106 beings to band 11	© Trace         2438         697292         10787         11:2260.488         MOD_AS         TTAACE_GRO         FNC1 The writin 98 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOD_AS         TTAACE_GRO         FNC1 The writin 98 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOD_AS         TTAACE_GRO         FNC1 The writin 100 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOD_AS         TTAACE_GRO         FNC1 The writin 102 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOD_AS         TTAACE_GRO         FNC1 The writin 102 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOD_AS         TTAACE_GRO         FNC1 The writin 102 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOD_AS         TTAACE_GRO         FNC1 The writin 108 beings to band 11           © Trace         2438         697292         10787         11:2250.488         MOD_AS         TTAACE_GRO         FNC1 The writin 108 beings to band 11 <td></td>										
● Trace         2437         897292         10787         112250489         MOQ_AS         TRACE_GRO         FWC] The arkn 101 beings to band 11           ● Trace         2438         897292         10787         112250489         MOQ_AS         TRACE_GRO         FWC] The arkn 101 beings to band 11           ● Trace         2438         897292         10787         112250489         MOQ_AS         TRACE_GRO         FWC] The arkn 101 beings to band 11           ● Trace         2448         897292         10787         112250488         MOQ_AS         TRACE_GRO         FWC] The arkn 101 beings to band 11	Trace         2437         697292         10787         11:2250.486         MOQ_AS         TRACE_GRO         FWC1 The arkn 101 beings to band 11           Trace         2438         697292         10787         11:2250.486         MOQ_AS         TRACE_GRO         FWC1 The arkn 101 beings to band 11           Trace         2438         697292         10787         11:2250.486         MOQ_AS         TRACE_GRO         FWC1 The arkn 101 beings to band 11           Trace         2440         697292         10787         11:2250.486         MOQ_AS         TRACE_GRO         FWC1 The arkn 102 beings to band 11										
© Trace         2438         697292         10787         11:25:04.86         MOQ_AS         TRACE_GRO         FNx() The arkn 102 belongs to band 11           © Trace         2438         697292         10787         11:22:50.488         MOQ_AS         TRACE_GRO         FNx() The arkn 102 belongs to band 11           © Trace         2440         697292         10787         11:22:50.488         MOQ_AS         TRACE_GRO         FNx() The arkn 108 belongs to band 11           © Trace         2440         697292         10787         11:22:50.488         MOQ_AS         TRACE_GRO         FNx() The arkn 106 belongs to band 11	© Trace         2438         697/32         10787         11/25/0.488         MOD_AS         TTACE_GRO         FMC] The arkm 102 belongs to band 11           © Trace         2438         697/32         10787         11/25/0.488         MOD_AS         TTACE_GRO         FMC] The arkm 102 belongs to band 11           © Trace         2440         697/32         10787         11/25/0.488         MOD_AS         TTACE_GRO         FMC] The arkm 103 belongs to band 11           © Trace         2440         697/32         10787         11/25/0.488         MOD_AS         TTACE_GRO         FMC] The arkm 103 belongs to band 11           © </td <td></td>										
Ф Trace         2440         697292         10787         11:29:50:468         MOD_AS         TRACE_ORO         FRMC] The articn 106 belongs to band 1!           K         III         IIII         IIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIII	Ф Trace         2440         697292         10787         11:29:50:488         MOD_AS         TRACE_ORO         FRMC] The arkin 106 belongs to band 1!           K         Intervention         Interventintereeeeeeeeeeeeeeeeeeeeeeeeeee			10787	11:29:50:468	MOD_AS					
<u>s</u>	5	Trace 2439								band 1!	
<		race 2440	697292	10787	11:29:50:468	MOD_AS		TRACE_ORO	[RMC] The arfcn 106 belongs to	band 1!	
Element Hex Dec Oct Ascii Bit Enum	Element Hex Dec Oct Ascii Bit Pnum										
		12		L.	Level Level	T	. Terr		1		-

Figure 17

🛣 Catcher -	E:\杨工备份	\x66+非律	宾第二版122	5\master\BF	LGUInfoCust	omSreP	LT6226	X	61_EUP_06_	12_V3_2-TH-MP	-5B-QN			- 6 🛛
File Edit Vie														
# B B I	× * * *	1			<b>p 1 1 1</b>									
Command :		1			- Nam				end Load	Auto Clear: Di	sabled 👻 🔽 🗘	lear when Connect		
AT Command					- Send				ind Load	Pildio orodi .  Di	sabled	iour mon connoct		
Arcommand	5. 				· Solid	Load						_		
6	😵 Primitive	log • I	ntegrated									(E		
	Туре	Index	Frame #	Time	Local T	imee	Source		estination	SAP	Message			
	Trace	2432	697292	10787	11:29:4		MOD_AS		resunation	TRACE_GRO	[RMC] Ctrl Message Ty	nolDv211 in ototo111		
	Primitive	2432	897292	10787	11.29.5		MOD_A8		IOD_AS	RMPC MPAL	MSG ID MPAL RR N			
	© Trace	2434	697292	10787			MOD_AS			TRACE_GRO				
	Trace	2435	697292	10787			MOD_AS			TRACE_GRO				
	Trace	2436	697292	10787			MOD_AS			TRACE_GRO				
	Trace	2437	697292	10787	11:29:5	0:468	MOD_AS			TRACE_GRO	[RMC] The arfcn 101 be	longs to band 1!		
	Trace	2438	697292	10787	11:29:5	0:468	MOD_AS			TRACE_ORO	[RMC] The arfcn 102 be	elongs to band 11		
	Trace	2439	697292	10787			MOD_AS				[RMC] The arfon 103 be			
	Trace	2440	697292	10787	11:29:5	0:468	MOD_AS			TRACE_GRO	[RMC] The arfcn 106 be	elongs to band 1!	~	
	<								-				2	
				1.09	-	T		in the second se	-		1 Protocology			
	Element			Hex	Dec	Oct	_	Ascii	Bit		Enun			
Ľ														
Ready				WT6226W S01	TOT FLP	06 12 V3	. 2-7N-MP-5	B-ON	PS:Invalid	102080kms		TI: No Connection	Solut	م بن 🖂 د د
				DOI DOI	10.11							and a state of the		

Figure 18

	-			名 / 三 (日	Disconnect ame :		- Send Load	Auto Clear: Di	sabled 🖌 🔽 Cle	ar when Connect	
imand : nmand :	-		•		- Send Load		· Sond Load	Hato clear. [D]	sabled • I* Cite	ar when connect	
arrand .	0				· Joine Loud						
6	Primitive	Log : I	ntegrated							le l	
	Туре	Index	Frame #	Time	Local Time	Source	Destination	SAP	Message	Car	~
	Trace	666	770734	84229	11:36:51:328		1.5.5	TRACE_GRO		ngs to band 1!	_
	Trace	667	770734	84229	11:36:51:328	MOD_AS		TRACE_ORO	[RMC] Serv arfcn[100]: RA		29]
	Trace	668	770734	84229	11:36:51:328	MOD_AS		TRACE_GRO	[RMC] The arfcn 100 belo	ngs to band 11	
	Primitive	070	772810	86305	11:36:52:265	MOD L1	MOD MPAL	L1 MPAL SAP	MSG ID MPHC UNITDA	TA INFO	
	Primitive	670	772810	86305	11 36 52 265	MOD_LT MOD_MPAL	MOD_MPAL MOD_AS	RMPC MPAL	MSG ID MPAL RR DAT		
	© Trace	672	772810	86305	11:36:52:265	MOD_AS		TRACE_GRO	[RMC] SI Message Type[0	lx1 a] in state[1]	
	Trace	673	772810	86305	11:36:52:281			TRACE_GRO	[RMC] serving to mask = (	0x11, target to mask =	0x0
	Trace	674	772810	86305	11:36:52:281	MOD_AS		TRACE_GRO	[RMC] SI acquired status:	SI1[0], SI2_2bis_2ti	er[0], E 🥪
4	8										2
	Element			Hex	Dec Oct	Asc	ii Bit		Enun	0	

Figure 19



Figure 20

# www.s-manuals.com