WT-EDKSOM6ULX-V1 Quick Start Guide

Revision history

Version	Date	Log
V1.00	2019/05/24	Create
V1.01	2019/07/10	Add head and footer

1. WT_EDKSOM6ULX-V1 interface description

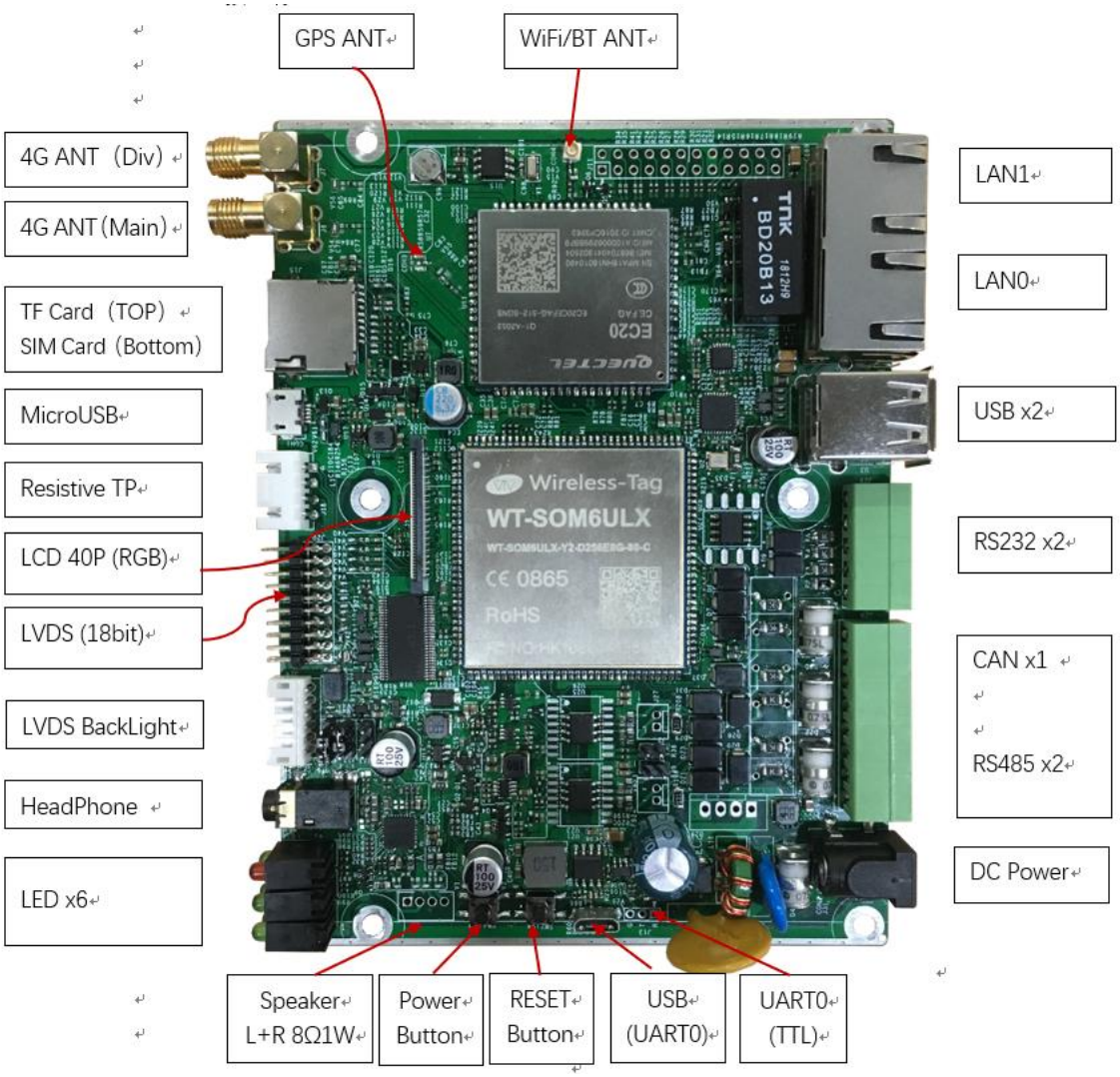

Figure 1.PCB front interface diagram

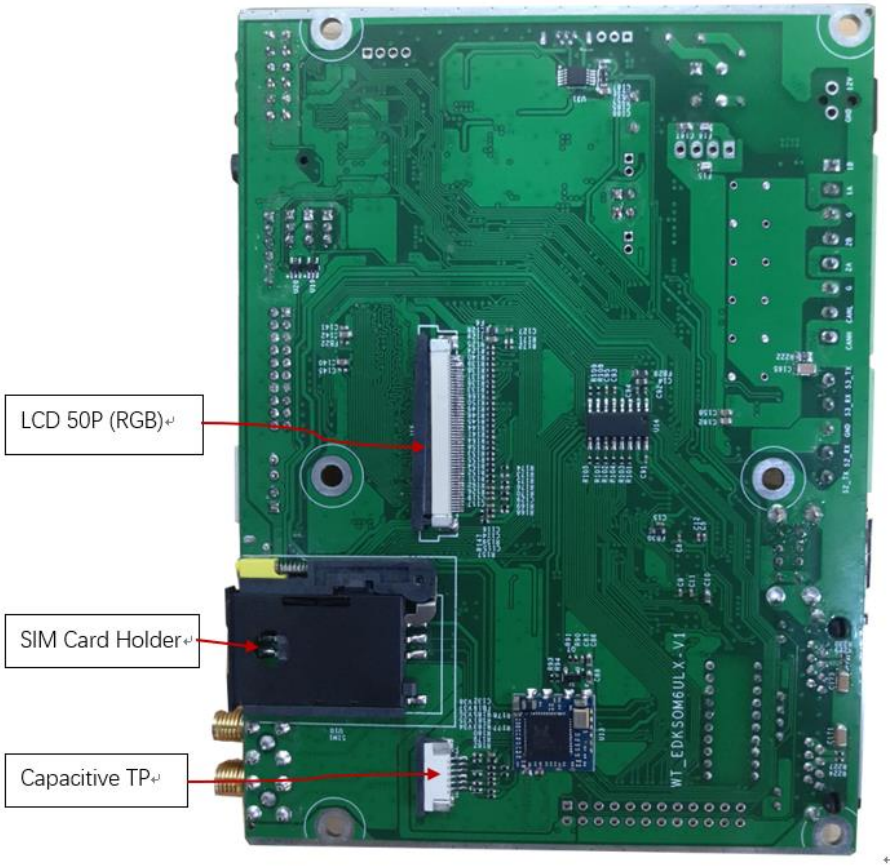

Figure 2.PCB back interface diagram

2. Quick start system

First, please prepare the development board and its accessories.;

WT-EDKSOM6ULX-V1	X1	Demo board
12V DC power	X1	power
Micro USB 数据线	X1	Debug UART

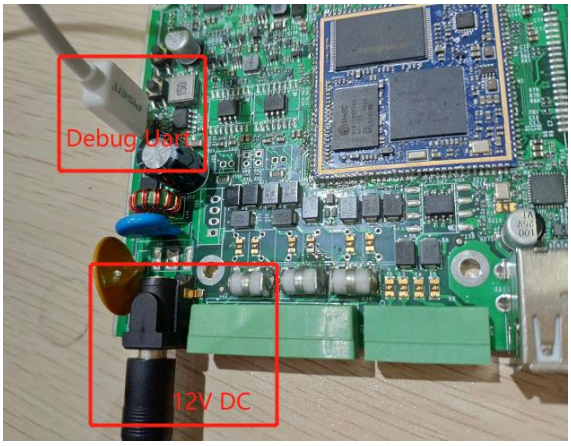

Figure 3.power and debug UART connection

Connect the development board and power supply as shown in Figure 3:

1) Insert 12V DC power into J31 of EDK board. One end of micro USB data line is connected to J30 and the other end is connected to PC.

2) After power-on, the position shown in Figure 4 shows that the red LED power lamp is always on, and the green LED lamp keeps flashing, indicating that the system is running normally.

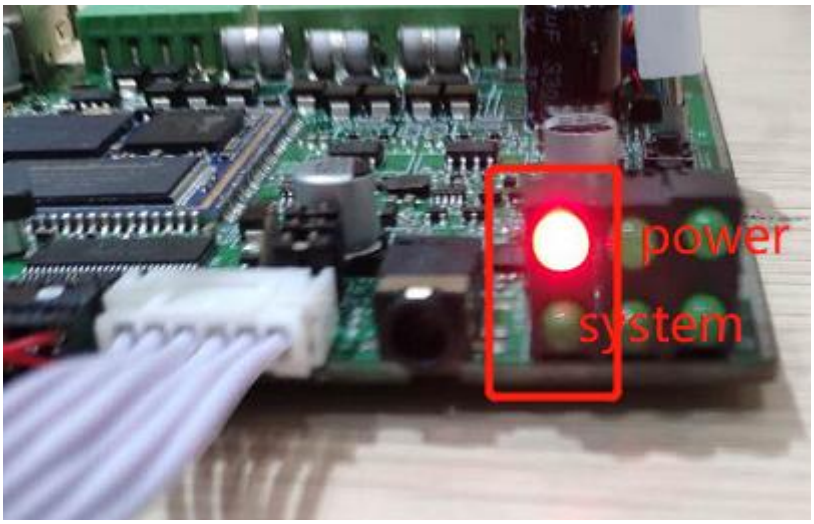

Figure 4. Power Indicator Lamp and System Operating Lamp

3) After the system starts normally, PC opens serial debugging tools (such as SecureCRT, XShell, PuTTy, etc.) and the serial port will print out the system startup information .

```
[   10.413051] fec 20b4000.ethernet eth0: Freescale FEC PHY driver [SMSC LAN8710/
Starting sshd: [   10.667733] IPv6: ADDRCONF(NETDEV_UP): eth0: link is not ready
[   10.684034] fec 2188000.ethernet eth1: Freescale FEC PHY driver [SMSC LAN8710/
OK
[   11.047824] IPv6: ADDRCONF(NETDEV_UP): eth1: link is not ready
numid=47,iface=MIXER,name='Left Output Mixer PCM Playback Switch'
  ; type=BOOLEAN,access=rw------,values=1
  : values=on
numid=44,iface=MIXER,name='Right Output Mixer PCM Playback Switch'
  ; type=BOOLEAN,access=rw------,values=1
  : values=on
numid=10,iface=MIXER,name='Playback Volume'
  ; type=INTEGER,access=rw---R--,values=2,min=0,max=255,step=0
  : values=210,210
  | dBscale-min=-127.50dB,step=0.50dB,mute=1
numid=13,iface=MIXER,name='Speaker Playback Volume'
  ; type=INTEGER,access=rw---R--,values=2,min=0,max=127,step=0
  : values=127,127
  | dBscale-min=-121.00dB,step=1.00dB,mute=1
numid=11,iface=MIXER,name='Headphone Playback Volume'
  ; type=INTEGER,access=rw---R--,values=2,min=0,max=127,step=0
  : values=127,127
  | dBscale-min=-121.00dB,step=1.00dB,mute=1
Starting app/invokeExe daemon.
Starting LTE OK
check common ping ip 114.114.114.114
Starting SMB services: OK
Starting NMB services: OK

Welcome to Industio rootfs
Industio login: Stopping LTE OK
```

Figure 5. sytem startup message

3. Log in to the system and test the hardware interface of the development board

After the system starts, enter user name: root, password: wise-kit to enter the system. The default Linux system version number is V4.1.15.

If you need to test the hardware interface of the development board, please refer to《WT-EDKSOM6ULX-V1 Linux System User Manual EN V1.0.pdf》。

If you need to develop an application program, you can refer to 《WT-EDKSOM6ULX-V1 Construction and use of development environment》。

In addition, when the system runs, SD cards are mounted to the /sdcard directory by default, USB is mounted to the /udisk directory, and the /sdcard/invokeExe or /udisk/invokeExe executable files are automatically run. If the executable files are not found in the two directories, the /usr/app/invokeExe program will be run.

The startup script/etc/init.d/S51app-wrapper configuration is as follows:

```
# cat /etc/init.d/S51app-wrapper
#! /bin/sh

case "$1" in
  start)
   source /etc/profile
   mdev -s
   if [ -e /sdcard/invokeExe ] ; then
      echo -n "Starting sdcard/invokeExe daemon"
      start-stop-daemon --start --exec /sdcard/invokeExe
   elif [ -e /udisk/invokeExe ] ; then
       echo -n "Starting udisk/invokeExe daemon"
       start-stop-daemon --start  --exec /udisk/invokeExe
   elif [ -e /usr/app/invokeExe ] ; then
       echo -n "Starting app/invokeExe daemon"
       start-stop-daemon --start  --exec /usr/app/invokeExe
   fi
   echo "."
    ;;
  stop)
    echo -n "Stopping telnet daemon"
    killall invokeExe
    echo "."
    ;;
  *)
    echo "Usage:{start|stop}"
    exit 1
esac

exit 0

#
```

Figure 6./etc/init.d/S51app-wrapper startup script

If you need to change the startup program, you can modify the above startup script.

4. Technical support

For technical support, send email to vivek@wireless-tag.com。