

# **TL10IE2**

## **Motherboard Guide**

## **FEDERAL COMMUNICATIONS COMMISSION** **INTERFERENCE STATEMENT**

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/ TV technician for help.
- Operations in the 5.15-5.25GHz band are restricted to indoor usage only.

### **CAUTION:**

Any changes or modifications not expressly approved by the grantee of this device could void the user's authority to operate the equipment.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause

undesired operation.

## **RF Exposure Information**

This device meets the government's requirements for exposure to radio waves. This device is designed and manufactured not to exceed the emission limits for exposure to radio frequency (RF) energy set by the Federal Communications Commission of the U.S. Government.

## **End Product Labeling**

This transmitter module is authorized only for use in device where the antenna may be installed such that 20cm may be maintained between the antenna and users. The final end product must be labeled in a visible area with the following: "Contains FCC ID: WL6-TLBC1IE1"

## **Information for the OEMs and Integrators**

The following statement must be included with all versions of this document supplied to an OEM or integrator, but should not be distributed to the end user.

- 1) This device is intended for OEM integrators only.
- 2) Please see the full Grant of Equipment document for other restrictions.

This radio transmitter FCC ID: WL6-TLBC1IE1 has been approved by FCC to operate with the antenna types listed below with the maximum permissible gain and required antenna impedance for each antenna type indicated. Antenna types not included in this list, having a gain greater than the maximum gain indicated for that type, are strictly prohibited for use with this device.

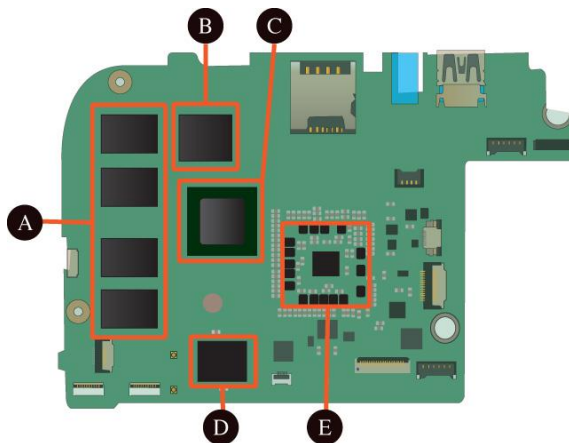
## **Antenna List**

No.	Manufacturer	Part No.	Antenna Type	Peak Gain
1	JEM_WLAN MAIN	13B130-JU 9072	PIFA Antenna	2.72 dBi for 2.4GHz
				2.14 dBi for 5 GHz
2.	JEM_WLAN AUX	13B130-JU 9073	PIFA Antenna	2.94 dBi for 2.4GHz
				2.94 dBi for 5 GHz
3	WGT_WLAN MAIN	13B130-JU 9050	PIFA Antenna	1.78 dBi for 2.4GHz
				1.19 dBi for 5 GHz
4	WGT_WLAN AUX	13B130-JU 9051	PIFA Antenna	2.66 dBi for 2.4GHz
				2.93dBi for 5 GHz
5	JEM_WLAN MAIN for 3G SKU	13B130-JU 9074	PIFA Antenna	0.47 dBi for 2.4GHz
				1.20 dBi for 5 GHz
6	WGT_WLAN MAIN for 3G SKU	13B130-JU 9052	PIFA Antenna	2.03 dBi for 2.4GHz
				3.16 dBi for 5 GHz

Note: The antenna connector is I-PEX type.

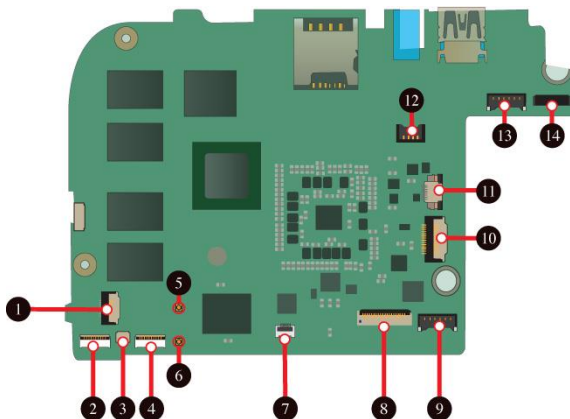
## Motherboard layout

### Main components



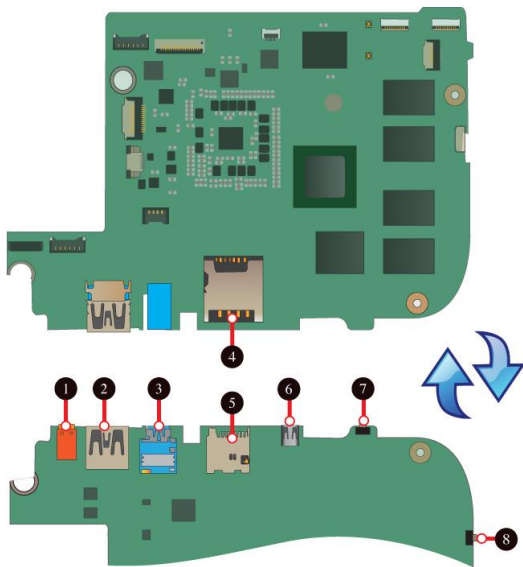
No.	Name	No.	Name
A	DDR	D	RF chip
B	EMMC	E	PMIC
C	CPU		

## System connectors



No.	Name	No.	Name
1	Pen charger CONN	8	LCD Connector
2	5MP camera	9	Battery CONN
3	Lens led	10	NFC CONN
4	1.26MP camera	11	Touch controller board CONN
5	WiFi Aux Antenna Connector	12	Speaker CONN
6	WiFi Main Antenna Connector	13	Dock power Connector
7	Sar sensor	14	Dock signal

## I/O Ports and Buttons



No.	Name	No.	Name
1	Power port	5	3G SIM card slot
2	USB port	6	Mini HDMI port
3	Headphone plug	7	Screen rotation lock button
4	Micro SD card slot	8	Power button



## Features

<b>Processor</b>	<ul style="list-style-type: none"><li>● Intel Bay Trail- T</li><li>● 2.4 GHz Quad-core</li></ul>
<b>Memory</b>	<ul style="list-style-type: none"><li>● DDR3L-RS, 1333MT/s</li><li>● 2GB only</li></ul>
<b>Storage</b>	<ul style="list-style-type: none"><li>● Single eMMC v4.51</li></ul>
<b>Wireless</b>	<ul style="list-style-type: none"><li>● Wi-Fi 802.11 a/b/g/n</li><li>● Bluetooth 4.0</li><li>● NFC support</li></ul>
<b>Display</b>	<ul style="list-style-type: none"><li>● Resolution: 1366(H) x 3 (RGB) x 768(V) pixels</li><li>● Support 10-points multi-touch</li></ul>
<b>Cameras</b>	<ul style="list-style-type: none"><li>● Front camera: 1.26 M<ul style="list-style-type: none"><li>➢ MIPI-CSI</li></ul></li><li>● Rear camera: 5.0 M<ul style="list-style-type: none"><li>➢ MIPI-CSI</li><li>➢ Normal non-mirror mode</li></ul></li></ul>
<b>Input/Output</b>	<ul style="list-style-type: none"><li>● 1 x USB 3.0 (Type A)</li><li>● 1 x Mic/head phone jack combo</li><li>● 1 x micro-HDMI port</li><li>● 1 x micro-SD card slot</li><li>● 1 x DC-in jack</li><li>● 3G SIM card support</li></ul>
<b>Speaker</b>	<ul style="list-style-type: none"><li>● Build-in Speaker x 2</li></ul>