MeiG-SLM900

Multi-Mode Multi-Band Smart LTE Module

Support for Wi-Fi & BT functionality

The SLM900 series smart module adopts SDM660 of Qualcomm Snapdragon 600 series, equipped with 14nm FinFET process of CPU, built-in 64bit ARM, and 8-core Kryo (4*2.2GHz & 4*1.8GHz). It supports decode/encode up to 4K@30fps, H. 265 with Android 9.0 operating system, board memory of 32GB+3GB (64GB+4GB, 128GB+8GB), carrier aggregation of LTE Cat6 and 2*20MHz with a maximum downlink rate up to 300Mbps. It is also supportive of multiple network standards such as TD-LTE, FDD-LTE, WCDMA, EVDO, TD-SCDMA and CDMA, integrated into broadband intelligent wireless communication module with GNSS and 2.4 & 5G WIFI.

SLM900 integrates abundant functional interfaces, including LCM, touch screen, camera, microphone, speaker, UART interface, USB interface, I2C interface, SPI interface, etc. It can provide functions of voice, short message, address book, 2.4/5G WiFi, BT and GPS. It supports 3D camera of double 1600W or depth of field photography, which can be widely used in Police Law Enforcement Instrument, Smart POS Cashier, Logistics Terminal, VR Camera, Intelligent Robot, Video Monitoring, Security Monitoring, Vehicle Equipment, Intelligent Information Acquisition Equipment, Intelligent Handheld Terminal, UAV and other products.

Major advantages

1.LTE Cat 6 and 2x20MHz carrier aggregation with maximum downlink rate up to 300 Mbps

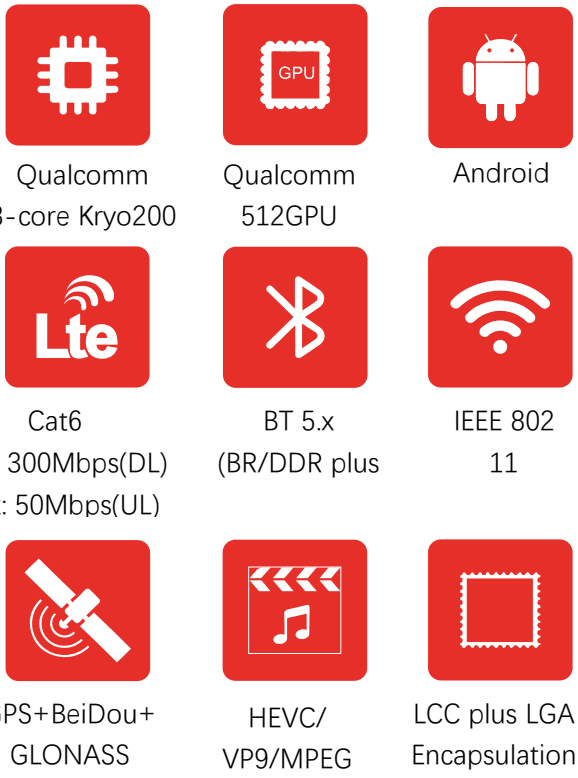
2. Overall coverage of various network systems

3.Dual screen, different display and dual touch control with main screen support up to 2560*1600

4.@ 60fps, with a maximum support for auxiliary screen of 2560*1600@60fps

5.dual camera, up to 4 cameras

6.Integrating Multi-constellation GNSS receivers to meet the requirements of high speed and high speed and precise positioning under different contexts



The equipment under test (EUT) is the smart module of Model SLM900(Model name).It supports Triple-bandGSM/GPRSsolution(GSM850 ,PCS1900),GPRS/EDGE Class 12Triple-band UMTS (B2,B4,B5)HSDPA （Category 24） ,HSUPA （Category 6） alsosupportsIEEE802.11a/b/g/n/ac , Bluetooth version2.1+EDR,BT3.0+EDR,BT5.0,GPS operating frequency is 1.57542GHz.

The Qualcomm device incorporates the UMTS/LTE technology — the technology for RF transceivers(SDR660) that converts received signals directly from RF-to-baseband and transmits signals directly from baseband-to-RF (known as direct conversion or zero intermediate frequency (ZIF) processing). This technique eliminates the need for large IF surface acoustic wave (SAW) filters and supporting IF and LO circuits, thereby reducing the handset parts count and facilitating multiband, multimode handsets that can be produced in smaller form factors.

RF transmitter The RF transmitters are capable to perform as well as UMTS and HSPAmodulation signals with excellent noise performance, thus no interstate filter in between transceiver and PA is required:

Triple-band UMTS, with one low band and two high bands selected from:

Low band

Band 5 (826 to 836 MHz)

High band

Band 2 (1852 -1907 MHz)

Band 4 (1712 -1752 MHz)

Triple-band GSM

Low band

– GSM 850 (824 to 849 MHz)

High band

– PCS 1900 (1930 to 1989 MHz)

WCDMA B2 1850 – 1910MHz

WCDMA B4 1710-1755MHz

WCDMA B5 824-849MHz

LTE B2 1850 – 1910MHz;

LTE B4 1710-1755MHz;

LTE B5 8824-849MHz;

LTE B7 2500-2570MHz

LTE B12 699-716MHz;

LTE B13 746-756MHz;

LTE B17 704-716MHz

LTE B25 1850-1915MHz

LTE B26 807-824MHz

WIFI:2412~ 2472MHz

WIFI 5G:

UNII 1: 5150MHz-5250MHz
UNII 2A: 5250MHz-5350MHz
UNII 2C: 5470MHz-5725MHz
UNII 3: 5725MHz-5850MHz

BT: 2402~2480MHz

Frequency Band	Antenna Gain(dBi)
GSM 850	3.52
GSM 1900	3.57
WCDMA Band 2	3.57
WCDMA Band 4	3.99
WCDMA Band 5	3.52
LTE Band 2	3.57
LTE Band 4	3.99
LTE Band 5	3.52
LTE Band 7	5.19
LTE Band 12	3.18
LTE Band 13	3.42
LTE Band 17	3.18
LTE Band 25	3.57
LTE Band 26	3.52
Bluetooth	5.84
WIFI	5.84
UNII 1	6.49
UNII 2A	6.49
UNII 2C	6.49
UNII 3	6.49

FCC Caution.

§ 15.19 Labelling requirements.

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.

§ 15.21 Information to user.

Any Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

§ 15.105 Information to the user.

Note: 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.
RF Exposure statement
This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment.
This equipment should be installed and operated withmini mum distance 20cm between the radiator & your body
C.Appendix A
A1.Requirement of FCC KDB 996369 D03 for module certification:
1.1List of applicable FCC rules:
The module complies with FCC Part 2,22,24,27,90, 15B,15C,15E.
1.2Summarize the specific operational use conditions:
SLM900 use the independent GPS chip，includes a fully integrated global navigation satellite system solution that supports GPS, GLONASS, BeiDou. It supports standard NMEA-0183 protocol.
1.3Limited module procedures:
The module is a Single Modular .
Resolve: Supply example as follows:
Installation Notes:
1) SLM900 Module Power supply range is DC 3.5V~4.2V, when you use SLM900 Module design product, the power supply cannot exceed this range.
2) When connect SLM900 Module to the host device, the host device must be power off.
3) Make sure the module pins correctly installed.
4) Make sure that the module does not allow users to replace or demolition.
5)All types of antennas that can be used with a transmitter：External antenna with maximum gain not Exceeding6.49dBi.
1.4Trace antenna designs: Not applicable.

1.5RF exposure considerations:
This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated withmini mum distance 20cm between the radiator & your body.
1.6Antennas:
The module does not have a standard antenna.
1.7Label and compliance information
This device complies with part 15 of the FCC Rules. Operation is subject to the condition that this device does not cause harmful interference.Any Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.
Note: 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.
Body-worn Operation
This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated withmini mum distance 20cm between the radiator & your body The host product Labeling Requirements:
NOTICE: The host product must make sure that FCC labeling requirements are met. This includes clearly visible exterior label on the outside of the final product housing that displays the contents shown in below:
Contains FCC ID:2APJ4-SLM900
1.8Information on test modes and additional testing requirements:
When setting up the configuration, if the pairing and call box options for testing do not work, the tester needs to coordinate with the module manufacturer to access the test mode software.
1.9Additional testing, Part 15 Subpart B disclaimer:
The modular transmitter is only FCC authorized for the specific rule parts (FCC Part 2, 22,24,27,90,15B,15C,15E.) list
on the grant, and that the host product manufacturer is responsible for compliance to any other FCC rules that apply to the host not covered by the modular transmitter grant of certification.
1.10Information on test modes and additional testing requirements:
When testing, testers need to refer to the user manual, and the sample power supply needs to use a special adapter power supply.

MeiG Technology Technology Co., Ltd.
Add:5th Floor, building G,No.2337 Gudai Road(Weijing center), Minhang District, Shanghai,China.
Zip: 201100
Tel: +862154278676
Fax: +862154278679
Http://www.meigchina.com