

# Ca-01

## LTE Cat.1 MODULE

Ca-01 Ai-Thinker's Super Mini Package LTE cat.1 bis Module;

Ca-01 adopt UNISOC's UIS8910 platform, support LTE 3GPP Rel.13 technology.

Ca-01 is a 4G LTE Full Netcom module, it can adapt to different operators and products to ensure maximum flexibility in product design.

Ca-01 supports VoLTE;

Ca-01 supports SPI LCD;

Ca-01 supports SPI Camera;

Ca-01 supports 6\*6 array keyboard

Ca-01 supports multiple development, such as USB Internet access, standard AT, Lua script secondary development, etc., and we provide professional and timely online technical support.

Ca-01 has built-in rich network protocols, integrates multiple industry standard interfaces, and supports multiple drivers and software functions (such as USB under Windows XP, Windows Vista, Windows 7/8 / 8.1 / 10, Linux, Android and other operating systems Driver, etc.), which greatly expands its application range in the M2M field, such as CPE, routers, data cards, card pay, tablet computers, automotive, security, and industrial-grade PDA, etc.



### Main advantages

- ✓ FOTA update (support Luat Cloud backstage, custom backstage)
- ✓ Coverage of all network standards
- ✓ The compact SMT package meets the space requirements of small terminal products
- ✓ Support multiple drivers and software functions (such as USB under Windows, Linux, Android and other operating systems Driver, etc.)
- ✓ **Support AT and Lua second development**



LTE Cat.1 bis  
Max 10Mbps (DL)  
Max 5Mbps (UL)



LCC + LGA package



Embedded multiple network protocols



USB 2.0 High-speed interface



Standard stability



Lua second development

# Ca-01

## LTE Cat.1 Module

### Frequency

LTE-TDD:B34/B38/B39/B40/B41  
 LTE-FDD:B1/B3/B5/B8

### Data

#### LTE-TDD:

Uplink-downlink ratio 2  
 Up to 8Mbps (DL)/Up to 2Mbps (UL)

#### Uplink-downlink ratio 1

Up to 6Mbps (DL)/Up to 4Mbps (UL)

#### LTE-FDD:

Up to 10Mbps (DL)/Up to 5Mbps (UL)

### Interface

1 USB 2.0 High-speed interface (Up to 480Mbps)

1.8V/3.0V (U)SIM card interface

1 NETLIGHT interface

(NET\_STATUS and NET\_MODE)

2 analog voice inputs

2 analog voice outputs

3 UART interface

1 SPI interface

1 SPI I/O interface

1 SPI Camera interface

1 MC interface

PWRKEY (Low level effective)

Support 6\*6 Array keyboard

2 ADC interface

### Electrical parameters

#### Output Power:

LTE-TDD: Class3(23dBm+1/-3dB)

LTE-FDD: Class3(23dBm+2dB)

#### Power consumption:

20uA @shut down

3mA @sleep mode,

(Typical Value)

#### Sensitivity:

FDD B1: -99dBm (10M)

FDD B3: -98dBm (10M)

FDD B5: -99dBm (10M)

FDD B8: -99dBm (10M)

TDD B34: -98dBm (10M)

TDD B38: -98dBm (10M)

TDD B39: -98dBm (10M)

TDD B40: -98dBm (10M)

TDD B41: -98dBm (10M)

#### Module size:

Ca-01:24.0mm x 24.0mm x 2.3mm

### General characteristics

3GPP E-UTRA Release 13

Band width: 1.4/3/5/10/15/20MHz

Temperature range: -40°C ~ +85°C

Weight: about 2.6g

Voltage supply: 3.3V~4.3V, typical value: 3.8V

AT Command compatible Air202

Support Lua second

development

### Software characteristics

#### USB driver:

Windows7/8.1/10

Linux/Android

#### RNDIS driver:

Windows 7/8.1/10

Linux/Android

#### ECM driver:

Linux/Android

#### Protocol stack:

TCP/UDP/PPP/FTP/HTTP/NITZ/CMUX/NDIS/NTP/

HTTPS/PING/FTPS/FILE/TLS support for TCP/UDP/HTTP/FTP

Model Name	Ca-01
LTE-FDD	B1/B3/B5/B8
LTE-TDD	B34/B38/B39/B40/B41
VOLTE	support
Camera	support
Analog voice	support
SIM card	None
Size	24*24mm
Package	Stamp hole+LGA

