

No. 68 Huatuo Road, Building-8, Zhangjiang Hi-Tech Park, Pudong, Shanghai 201203, China For more information:sales@asiatelco.com www.asiatelco.com



# **WB550**

## 5G CPE

ATEL'S CPE WB550 Series is designed to provide high-speed cellular data connectivity via 5G/4G cellular Network to the Internet for multiple device connected over WLAN and LAN.







High Data Speed

WebGUI Easier Configuration MIMO 4x4

мімо



Wi-Fi 6

802.11 b/g/n/ac/ax





HD Voice

2XGE

# SPECIFICATIONS

STANDARDS COMPLIANCE		BASIC SOFTWARE FEATURES	
3GPP	3GPP Release 15	Configuration	Web GUI
LTE UE Category	Cat 19 (DL) / Cat 18 (UL)	FOTA	Yes
Wi-Fi	802.11b/g/n/ac/ax	VPN Pass Through	Yes
BASIC FEATURES		MAC Address Filtering	Yes
		NAT Support	Yes
Data Speed	5G NSA: 4.67Gbps(DL)/1.25Gbps(UL)	Multi-APN	Yes
Data Speed	LTE: 1.6Gbps(DL)/211Mbps(UL)	Auto/Manual APN	Yes
-		TR069	Yes
Band Width	1.4/3/5/10/15/20/100MHz	IPV4/IPV6 Dual Stack	Yes
USIM	4FF	SIMLock	Voc
5G MIMO	4x4	SIMILOCK	
4G MIMO	4x4	Security	WPA2-PSK/WPA3
Wi-Fi Clients	Up to 32	Language	English (Other language can be
Wi-Fi MIMO	2x2	5 5	customized)
Voice	VoLTE/VoNR	ENVIRONMENTAL SPECI	FICATIONS
	2 x GE RJ45	Operation Temp	-10 ~ 55°C
	1 x RJ11 LEDs DC Power Input Nano USIM Socket Poset Button	Storage Temp	-40 ~ 80°C
Interface		<b>Operation Humidity</b>	5% ~ 95% (Non-Condensing)
		MECHANICAL INFORMATION	
	Reset Button	MECHANICAL INFORMAT	ΓΙΟΝ
	Reset Button	MECHANICAL INFORMAT	<b>FION</b> 165(L)*123(W)*205(H) mm
BASIC HARDWARE FE		MECHANICAL INFORMAT Dimension Color	<b>FION</b> 165(L)*123(W)*205(H) mm White (can be customized)
BASIC HARDWARE FE	ATURES n41/n77/n78/B41 are HPUE 26 dBm ±2 dB	MECHANICAL INFORMAT Dimension Color Weight	TION 165(L)*123(W)*205(H) mm White (can be customized) ~500g
BASIC HARDWARE FE RF Transmit Power	ATURES n41/n77/n78/B41 are HPUE 26 dBm ±2 dB other bands are 23dBm+/-2dBm ×	MECHANICAL INFORMAT Dimension Color Weight	FION 165(L)*123(W)*205(H) mm White (can be customized) ~500g
BASIC HARDWARE FE RF Transmit Power Receiver Sensitivity	ATURES n41/n77/n78/B41 are HPUE 26 dBm ±2 dB other bands are 23dBm+/-2dBm × <-100dBm(20MHz,QPSK)	MECHANICAL INFORMAT Dimension Color Weight Signal	TION 165(L)*123(W)*205(H) mm White (can be customized) ~500g Cellular signal Indicator
BASIC HARDWARE FE RF Transmit Power Receiver Sensitivity	ATURES n41/n77/n78/B41 are HPUE 26 dBm ±2 dB other bands are 23dBm+/-2dBm × <-100dBm(20MHz,QPSK) Omni Internal Antenna	MECHANICAL INFORMAT Dimension Color Weight Signal	TION 165(L)*123(W)*205(H) mm White (can be customized) ~500g Cellular signal Indicator 5G network Indicator
BASIC HARDWARE FE RF Transmit Power Receiver Sensitivity	ATURES n41/n77/n78/B41 are HPUE 26 dBm ±2 dB other bands are 23dBm+/-2dBm × <-100dBm(20MHz,QPSK) Omni Internal Antenna 4dBi Internal Antenna	MECHANICAL INFORMAT Dimension Color Weight Signal	TION 165(L)*123(W)*205(H) mm White (can be customized) ~500g Cellular signal Indicator 5G network Indicator 4G network Indicator
BASIC HARDWARE FE RF Transmit Power Receiver Sensitivity	ATURES n41/n77/n78/B41 are HPUE 26 dBm ±2 dB other bands are 23dBm+/-2dBm × <-100dBm(20MHz,QPSK) Omni Internal Antenna 4dBi Internal Antenna Power < 24W	MECHANICAL INFORMAT Dimension Color Weight Signal	ION   165(L)*123(W)*205(H) mm   White (can be customized)   ~500g   Cellular signal Indicator   5G network Indicator   4G network Indicator   LAN Status Indicator
BASIC HARDWARE FE RF Transmit Power Receiver Sensitivity	Reset Button ATURES n41/n77/n78/B41 are HPUE 26 dBm ±2 dB other bands are 23dBm+/-2dBm × <-100dBm(20MHz,QPSK) Omni Internal Antenna 4dBi Internal Antenna Power < 24W AC: 100V-240V 50Hz/60Hz DC: 12V / 2A	MECHANICAL INFORMAT Dimension Color Weight Signal	ION   165(L)*123(W)*205(H) mm   White (can be customized)   ~500g   Cellular signal Indicator   5G network Indicator   4G network Indicator   LAN Status Indicator   Wi-Fi Status Indicator

#### : n30/LTE B30/LTE B48 21 dBm ±2 dB

PACKAGE CONTENTS	
WB550 Device	x 1
Power adaptor	× 1
Quick-Start Guide	× 1

For more information: sales@asiatelco.com Visit our website: <u>www.asiatelco.com</u>

Specifications are subject to change. Please see your ATEL contact for more details. © 2023 Asiatelco Technologies Co. All rights reserved. The ATEL name and logo are trademarks of Asiatelco.



# **Model Definition**

Model No.	Region	Description
WB550-NA-00	North America	5G Sub-6: n2/n5/n7/n12/n14/n25/n30/n41/n48/n66/n71/n77/n78 LTE FDD: B2/B4/B5/B7/B12/B13/B14/B17/B25/B26/B29/B30/B66/B71 LTE TDD: B41/48 LAA: B46 WCDMA: B2/4/5 Module: Verizon & AT&T Certified

# **Application Scenario**



We remind users here that changes or modifications not explicitly approved by the responsible party may cause users to lose the authority to operate the equipment.



Quick Start Guide ►

#### **Introduction**

The WB550 is a premium indoor 5G NR CPE, designed for 802.11a/b/ g/n/ac/ax dual band Wi-Fi access. The product provides optimized high throughput data and a wide area coverage network for residential, commercial and enterprise users, supporting multiple services.

Customers enjoy reliable dual-band Wi-Fi AP functions, broadband access and hotspot Wi-Fi connections with the WB550.





I/O Panel of Router



#### **Packing List**

Make sure you have everything you need to properly configure the device.



For support information: sales@asiatelco.com Visit our website: www.asiatelco.com

Specifications are subject to change. Please see your ATEL contact for more details. © 2023 Asiatelco Technologies Co. All rights reserved. The ATEL name and logo are trademarks of Asiatelco.

#### **Configure Hardware**

#### **Insert SIM Card**

▲ If you want to remove the SIM card, please lightly press the SIM card, the SIM card will pop out. Make sure the CPE is turned off before you insert or remove your SIM card. Otherwise, the CPE and SIM card may be damaged.

Please insert your SIM card (3FF) as following:



#### How does it Work

The figure is just for reference only, please connect according to your requirements.



Step 1 Connect the supplied power adapter to the CPE. Step 2 Connect

other devices.

- You can connect your computer or classic Switch via Ethernet cable to LAN port.
- You can connect your laptop via Wi-Fi.
- You can connect your telephone via TEL port.



#### **LED Indicators**

When set up the CP860, you will see the following LED indicators:

Indicator	Status	Description
ڻ ا	Steady on	Power On
POWER	Off	No Power Supply
	Steady on	Internet Available
	Off	Internet Unavailable
	Blinking (500ms interval)	Searching network of NR
	Steady on	WiFi Available
WiFi	Off	WiFi unavailable
C	Steady on	VOICE Available
VOICE	Off	VOICE Unavailable
	Steady on	Display the current LTE network signal, the stronger signal, the more bars on
	Off	No Signal
SIGNAL	Blinking one by one	Firmware upgrade

## **Configure The CPE**

## Login to the Website

Use a browser to access the management web page to configure and manage the CPE.

The following procedure describes how to use a computer running Windows 7 or above version and Internet Explorer to connect to the CPE webpage.

**Step 1** Connect the CPE correctly.

Step 2 Start Internet Explorer, go to http://192.168.1.1 in the

address bar, and press Enter.

**Step 3** Enter the user name (admin) and password (admin), and

click Log In.

You can connect to the management web page after the password is verified.



# **Configuration of NR**

**Step 1** Connect the CPE correctly.

Step 2 Enter the management website.

Step 3 Choose Settings  $\rightarrow$  Network  $\rightarrow$  NRSettings. Step 4 Set the

connection mode and scan mode.

Settings		
Settings		
Status	Connected	
Connect Method	Auto 🔻	
		Submit Cancel
Status		
DL MCS	0	
UL MCS	0	
DL Frequency	2679.0 MHz	
UL Frequency	2559.0 MHz	
Bandwidth	20 MHz	
RSSI	-53 dBm	
RSRP0	-79 dBm	
RSRP1	-77 dBm	
RSRQ	-5 dB	
SINR	32 dB	
TX Power	-55 dBm	

The default setting is automatically connection and full band scanning, if you want to connect the LTE network according to your needs, you can set the connection mode as manual, and simply scan a specified band.

#### Configuration of Wi-Fi

Step 1	Connect the CPE correctly.
Step 2	Enter the management website. Choose Settings $\rightarrow$ Wi-Fi $\rightarrow$ WLAN Settings. In the General Settings, set Wi Ei Enable or enable Wi Ei with the
Step 3	
Step 4	
Wi-Fi button.	
Step 5	In the Setting, change the SSID, such as "NR-Router"
	To ensure data security, it is recommended that you change
Step 6	
the Wi-Fi password	by default.

Step 7 Click Submit to save the settings.

#### WLAN Settings

<b>General Settings</b>		
Band	2.4GHz	]
WLAN	Enable	
Mode	802.11b/g/n(Auto)	
Channel	Auto 🔻	
Tx Power	100%	
SSID Profile		
SSID	MT7603E-8022	*
Maximum number of devices	16 🔻	
Hide SSID broadcast	Enable	
AP isolation	Enable	
Security	WPA-PSK&WPA2-PSK V	
WPA encryption	AES(recommended)	
Show password	Enable	

For support information: sales@asiatelco.com Visit our website: <u>www.asiatelco.com</u>

Specifications are subject to change. Please see your ATEL contact for more details. © 2023 Asiatelco Technologies Co. All rights reserved. The ATEL name and logo are trademarks of Asiatelco.

### The POWER indicator does not turn on.

- Make sure that the power cable is connected properly and the CPE is powered on.
- Make sure that the power adapter is compatible with the CPE.

### Fails to login the web management page.

- Make sure that the CPE is started.
- Verify that the CPE is correctly connected to the computer through Wi-Fi or a network cable.

## The CPE fails to search for the wireless network.

- Check that the power adapter is connected properly.
- Check that the CPE is placed in an open area that is far away from obstructions, such as concrete or wooden walls.
- Check that the CPE is placed far away from household electrical appliances that generate strong electromagnetic field, such as micro-wave ovens, refrigerators, and satellite dishes.

#### The power adapter of the CPE is overheated.

- The CPE will be overheated after being used for a long time. There-fore, power off the CPE when you are not using it.
- Check that the CPE is properly ventilated and shielded from direct sunlight.

## The parameters are restored to default values.

- If the CPE is powered off unexpectedly while being configured, the parameters may be restored to the default settings.
- After configuring the parameters, download the configuration file to quickly restore the CPE to the desired settings.



If the problem persists, please contact authorized local service suppliers.

Product Marketing Name (PMN): ATEL 5G CPE FCC ID: XYO-WB550 IC ID: 20255-WB550 FCC Regulations

ATEL 5G CPE 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.

This equipment has been tested and found to comply with the limits for a Class B digital device, under 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 by 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.

FCC RF Radiation Exposure Statement

This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment. To comply with FCC RF exposure compliance requirements, this grant applies to only Mobile Configurations. The antennas used for the transmitter must be installed to provide a separation distance of at least 20cm from all persons and must not be co-located or operating in conjunction with any other antenna or transmitter.

#### RSS-GEN

"This device complies with Industry Canada's licence-exempt RSSs. Operation is subject to the following two conditions: (1) This device may not cause interference; and (2) This device must accept any interference, including interference that may cause undesired operation of the device." or "Le présent appareil est conforme aux CNR d'Industrie Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes : (1) l'appareil ne doit pas produire de brouillage; 2) l'utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement." Déclaration sur l'exposition aux rayonnements RF L'autre utilisé pour l'émetteur doit être installé pour fournir une distance de séparation d'au moins 20 cm de toutes les personnes et ne doit pasêtre colocalisé ou fonctionner conjointement avec une autre antenne ou un autre émetteur.

A . The device shall automatically discontinue transmission in cases of absence of information to transmit, or operational failure.

B . devices contain security features to protect against modification of software by unauthorized parties the device for operation in the band 5150–5250 MHz is only for indoor use to reduce the potential for harmful interference to co-channel mobile satellite systems; for devices with detachable antenna(s), the maximum antenna gain permitted for devices in the band 5725-5850 MHz shall be such that the equipment still complies with the e.i.r.p. limits as appropriate; and where applicable, antenna type(s), antenna models(s), and worst-case tilt angle(s) necessary to remain compliant with the e.i.r.p. elevation mask requirement set forth in section 6.2.2.3 shall be clearly indicated.

#### ISED RF Radiation Exposure Statement

This equipment complies with ISED radiation exposure limits set forth for an uncontrolled environment. To comply with ISED RF exposure compliance requirements, this grant applies to only Mobile Configurations. The antennas used for the transmitter must be installed to provide a separation distance of at least 20cm from all persons and must not be co-located or operating in conjunction with any other antenna or transmitter.