



Model: M6500

BE6500

2.5G Mesh Wi-Fi 7 System





Highlights

- 2 GHz Quad-Core CPU
- 6-Stream Wi-Fi 7
- 1× 2.5G Port, 3× Gigabit Ports
- 200+ Connected Devices
- VPN Client and Server

Package Content

- Main Product
- Power Adapter
- Ethernet Cable
- Installation Guide

Hardware Specs

CPU	Chipset	Broadcom BCM6766
	CPU Details	2 GHz Quad-Core CPU
Memory/Stroage	Flash/ROM	128 MB (1 Gbit) NAND
	DDR/RAM	512 MB (4 Gbit) DDR4

Wireless	5 GHz Wi-Fi Speed	5765 Mbps
	2.4 GHz Wi-Fi Speed	688 Mbps
	5 GHz Wi-Fi Streams	4T4R (4x4 MIMO)
	2.4 GHz Wi-Fi Streams	2T2R (2x2 MIMO)
	Wi-Fi Antennas	6x Fixed
	5 GHz Anntenna Gain Max	5dBi
	2.4 GHz Antenna Gain Max	5dBi
	FEM or PA/LNA	5 GHz: 4x High-Power 2.4 GHz: 2x High-Power
	Range Performance	Max: 240 m (787 ft) Indoor WiFi range varies depending on the layout and wall materials. See Wall Performance spec for placement suggestions.
	Wall Performance	Two wooden walls with thickness < 10 cm (4") One concrete wall with thickness < 20 cm (7") or two concrete walls with thickness < 10 cm (4")
Indoor Coverage Reference		2 Pack: 230 m² (2500 sq ft)
		3 Pack: 320 m² (3400 sq ft)
Applied to wireless backhaul situation. Place in the center of each floor, with a maximum of three obstacles to each room.		



Hardware Specs

Interfaces	WAN Port	1× 2.5G Ethernet Port
	LAN Port	3× Gigabit Ethernet Ports
	LED	System
		LAN
		Wi-Fi
		Mesh
	Physical Buttons	Power On/Off Button
		WPS Button
		Reset Button
	Power Input	DC Jack
Power	Power Methods	DC
	DC	12V 1.5A
	Power Adapter	Input: 100~240 V, 50/60 Hz AC
		Output: 12V 1.5A DC
Reliability	Environment	Operating Temperature: 0°C ~ 40°C (32 °F ~104 °F)
		Storage Temperature: -40°C ~ 70°C (-40 °F ~ 158 °F)
		Humidity: 10% ~ 90% non-condensing
		Storage Humidity: 5% ~ 95% non-condensing
Mechanical	Installation	Desktop
	Dimension	Φ116×202 mm
		Φ4.57×7.95 inches

Software Specs

Wireless	Wi-Fi Standards	Wi-Fi 7
	Max Wi-Fi Modulation	4K-QAM
	Wi-Fi Efficiency	MLO
		MRU
		Puncturing
		OFDMA
		MU-MIMO
		BSS Color
	Max Capacity	512
	Recommended Client Upper Limit	200
General	Max Wi-Fi Channel Width	160 MHz
	Wi-Fi Security	WPA-PSK(WPA/WPA2/WPA3)
	Guest Network	2.4 GHz, 5 GHz
	WPS	true
	Operation Modes	Wi-Fi Router
		Access Point
		Range Extender
		WISP
		Client
	Mesh	Cudy Mesh
	Mesh Backhaul	Wireless Backhaul
		Wired Backhaul
	WAN Mode	DHCP
		Static IP
		PPPOE



Software Specs

Network	QoS	Per-User Rate Limiting
	DHCP	Address Reservation
		DHCP Client List
		Server
	IP Versions	IPv4/IPv6
	IPv6 Protocols	Relay
		Dynamic(SLAAC/DHCPv6)
		Staic(Fixed IP)
		Passthrough
		464XLAT
		MAP-E
		DS-Lite
	IPTV/VLAN	Bridge
		Tag VLAN
	TTL Customization	Extend
		Spoof
		Custom
	IGMP	IGMP Proxy
		IGMP Snooping
	Forwarding	Port Forwarding
		Port Triggering
		UPnP
		DMZ

Network	Firewall	SPI Firewall	
		DoS Protection	
		Block PING	
	Application Layer Gateway	• IPsec Passthrough	• L2TP Passthrough
		• PPTP Passthrough	• FTP Passthrough
		• TFTP Passthrough	• H323 Passthrough
		• SIP Passthrough	• RTSP Passthrough
Utilities	VPN Server	• WireGuard	• OpenVPN
	VPN Client	• IPsec	• Zerotier
		• PPTP	• L2TP
	DNS Options	• DNS over TLS	• Manual DNS
		• Rebind Protection	• Override Clients' DNS
	DNS over TLS Providers	• Cloudflare	• Google
		• Quad9	• Custom
	Wake on LAN	true	
	Online Detection	true	
Management	All Devices Management	Wi-Fi Time Schedule	
		MAC Filter	
		IP/MAC Binding	
	Per-Devices Management	Intenent On/Off	
		VPN On/Off	
		Online Time Schedule	
		Device Rename	
	Content Management	Domain Filter	
		IP Filter	



Software Specs

System	LED Control	true
	Local Control Method	Config Web Page
Remote Control Method		App Control
		Config Page via HTTPS
		App Control
		TR069/TR098/TR111/TR181
Firmware Upgrade		Local Update
		App (Over the Air)
		Online Update
Reliability		Timed Reboot
		Backup and Restore
Diagnostic Tools		Diagnosis
		Ping
		Traceroute
		NSLookup
		System Log
Languages		• English • Bengali • Catalan • Czech
		• German • Greek • Spanish • French
		• Hebrew • Italian • Croatian • Hungarian
		• Khmer • Korean • Dutch • Japanese
		• Russian • Slovak • Swedish • Romanian
		• Turkish • Vietnamese • Thai • Ukrainian
		• Polish • Norwegian • Portuguese
		• Simplified Chinese • Traditional Chinese

Dashboard	Panel	Internet Status
		Mesh Status
		Devices Management
		WAN Status
		LAN Status
		WISP Status
		Wi-Fi Status
		VPN Status
		DHCP Server Status
		System Version
	Charts	Mesh Topology, Internet Speed, WISP Speed, Wi-Fi Speed
General	Multi-Band Backhaul	true