

Wireless MAP-820

(802.11a/b/g/n/ac/ax)



Product Overview:

mbx Access Point (MAP-820) is an enterprise grade AP supporting next generation wireless technology Wi-Fi 6. The cost-effective MAP-820 empowers enterprises to invest in future-ready technology without extra costs while guaranteeing exceptional performance and user experience.

The MAP-820 supports selectable dual-band dual-radio (2.4G + 5G or 5G+5G) mode to ensure the best compatibility and highest performance. It delivers a maximum of 2.4Gbps wireless throughput when dual 5G radio high-performance mode is adopted, and up to 1.775Gbps throughput at normal 2.4G+5G mode. It fully complies with Wi-Fi 6 OFDMA Modulation, MU-MIMO, and BSS Color Spatial Reuse. MAP-820 produces minimal signal interference, supports a maximum of 1024 client connections, and provides up to 65% higher total throughput in legacy Wi-Fi 5 environments.

MAP-820 has a stylist square design with only 26mm in height. It features an integrated antenna design and hidden LAN port along with hidden cabling to hide the messy wires, which gives a professional and simplistic deployment style that is less noticeable. Additionally, it is IoT ready enabled by the built-in BLE module, without the need of an external module and extra investment.

The MAP-820 takes full care of security, RF control, mobile access, QoS, seamless roaming, load balancing and other Wi-Fi optimisation. Managed by MACC wireless controller, MAP can be massively deployed, provisioned, managed and monitored at ease.

It is an ideal indoor Wi-Fi solution for education, agencies, hospitality, healthcare, retail and F&B industries.

Key Features:

- Next generation Wi-Fi 6 wireless technology. Fully backward compatible to legacy devices.
- Max 2.4Gbps by selectable Dual-Band Design (2.4G + 5G or 5G+5G)
- Max 1024 Client connections
- OFDMA, MU-MIMO and BSS Technology for minimal wireless signal interference
- Full enterprise wireless feature such as RF control, roaming, load balancing and security
- IoT Ready: Integrated with BLE module

Specification

Model	MAP-820
Radio	Dual-radio dual-band Radio 1: 2.4G 11ax/5G 11ax: 2x2 MIMO Radio 2: 5G 11ax: 2x2 MIMO
Protocol	standard 802.11ax dual-radio dual-band concurrent 802.11ax and 802.11a/b/g/n/ac
Antenna Gain	2.4G: 3dBi 5G: 3dBi
Spatial Streams	Up to 4: 2x~2:2 in 2.4GHz , 2x~2:2 in 5GHz
Max Throughput	5G+5G mode: 2.4Gbps Radio1: 5G low band 1.2Gbps Radio2: 5G high band 1.2Gbps 2.4G+5G mode: 1.775Gbps Radio1: 2.4G 0.574Gbps Radio2: 5G 1.2Gbps
Transmit Power	≤100mw (20dBm) (vary depending on different countries)
Adjustable Power	1dBm
Service Port	1 10/100/1000BASE-T Ethernet uplink port (supports PoE)
Management Port	1 console port
LED indicator	1 LED indicator (Supports red, green, blue, orange and flashing mode, which indicates device access. The indicator can be switched off to silent mode.)
IP Rating	IP41
Safety Standard	GB4943, EN/IEC 60950-1
EMC Standard	GB9254, EN301 489
Health Standard	EN 62311
Radio Standard	SRRC, EN300 328, EN301 893
WLAN	
Maximum stations per AP	Up to 1024
Virtual AP	Up to 32
5G Priority (Band Steering)	Support
SSID hiding	Support
Configuration the authentication mode, encryption mechanism, and VLAN attributes for each SSID	Support
Remote Intelligent Perception Technology (RIPT)	Support
Intelligent identification of smart device	Support
Intelligent load balancing based on the number of users or traffic	Support
STA Control	SSID / radio-based
Bandwidth control	STA/SSID/AP-based speed control

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Security	
PSK, Web, and 802.1x authentication	Support
Data encryption	WPA (TKIP) , WPA-PSK, WPA2 (AES) , WPA3, WEP (64 or128 bits)
WeChat authentication	Support
QR code authentication	Support
SMS authentication	Support
PEAP authentication	Support
Data frame filtering	Whitelist, static/dynamic blacklist
User isolation	Support
Rogue AP detection and counter measure	Support
Dynamic ACL assignment	Support
RADIUS	Support
CPU Protection Policy (CPP)	Support
Network Foundation Protection Policy (NFPP)	Support
Remote Probe	Support
Routing	
IPv4 Address	Static IP address or DHCP reservation
IPv6 CAPWAP	Support
ICMPv6	Support
IPv6 address	Manual or automatic configuration
IPv6 tunnel	Manual or automatic configuration
Multicast	Multicast to unicast conversion
Location-based Service	
Wireless Position Tracking	Support
Management and Maintenance	
Network Management	SNMP v1/v2C/v3, Telnet, SSH, TFTP, FTP and Web management
Fault detection and alarm	Support
Statistics and logs	Support
Physical	
Dimensions (WxDxH)	153mm x 193mm x 26mm (Height of AP only, excluding case and mount kit)
Weight	< 0.5kg (include mount kit)
Installation mode	Ceiling/wall-mountable
Power Supply	Local power supply (DC 48V/1A) operation PoE (802.3af) – full spectrum operation
Power Consumption	<12.95W
Operating Temperature Range:	-10°C to 55°C
Storage Temperature Range:	-40°C to 70°C
Humidity (non-condensing)	Operating: 5% to 95% Storage: 5 to 95%
Certifications	Wi-Fi CERTIFIED™ a, b, g, n, ac, ax