Air Pro ®

Simple | Secure | Trusted

Outdoor Wireless 802.11ac Point-to-Point / Point-to-Multipoint Bridge

PRODUCT OVERVIEW

The Air Bridge5ac-Ex is a high-performance outdoor wireless bridge designed for long-distance connectivity and demanding deployment environments. Powered by 802.11ac technology, it delivers high throughput, stable transmission, and excellent noise immunity. Engineered for rugged outdoor performance, it offers long-range signal coverage, strong penetration capability, and resistance to interference — making it ideal for industrial networks, CCTV backhaul, ISP wireless links, and remote site connectivity.

| Appearance	Description
	• **High-Gain Antenna Ready (SMA Interface):-** Equipped with an SMA connector (outer thread / inner pin), allowing compatibility with various high-gain antennas for long-distance deployment — supporting transmission distances up to 10 km (environment dependent). • **Enhanced Lightning and Surge Protection:-** Built-in dedicated TVS industrial-grade lightning protection enhances durability and reliability in harsh outdoor environments. • **Wide Frequency Support (4.9–6.1 GHz):-** Enables flexible configuration beyond standard channels, improving interference avoidance in congested RF environments. • **Narrowband Operation (5 MHz / 10 Mhz):-** Ideal for long-range links requiring improved stability and noise rejection. • **Smart Wireless Optimization:-** Supports ATPC (Automatic Transmit Power Control), TDMA scheduling, and IPv6, ensuring optimized performance, reduced latency, and scalable network architecture.

PRODUCT SPECIFICATIONS

Hardware Specifications

Item	Air Bridge5ac-Ex			
CPU	QCA9563+QCA9882+QCA8334			
Flash	SPI NOR 16MB			
DDR	DDR2-128MB			
5G Frequency	5.150GHz ~ 5.850GHz			
5G Protocol	802.11 a / n /ac			
Data Rate	900Mbps			
Antenna	2*SMA antenna connectors			
5G TX Power	802.11a	54M	23±2dBm	6M	26±2dBm
	802.11n HT20	MCS7	22±2dBm	MCS0	26±2dBm
	802.11n HT40	MCS7	22±2dBm	MCS0	26±2dBm
	802.11ac VHT20	MCS9	21±2dBm	MCS0	26±2dBm
5G Receiving Sensitivity	802.11ac VHT40	MCS9	21±2dBm	MCS0	26±2dBm
	802.11ac VHT80	MCS9	21±2dBm	MCS0	26±2dBm
	802.11a	54M	-75dBm	6M	-92dBm
	802.11a HT20	MCS7	-72dBm	MCS0	-90dBm
5G EVM	802.11a_54M: ≤-25 dB; 802.11n_MCS7: ≤-28 dB; 802.11AC_MCS9:≤-32dB			
ppm	±20ppm			
WAN	1*10/100/1000M WAN, support 24V~48V POE power supply			
LAN	1*10/100/1000M LAN			
Power Supply	PoE 24V~48V passive PoE, DC 12~24V			
Power Consumption	<10W			
Reset Button	Press and hold for 6 seconds to restore factory default configuration			
Indicators	SYS, WAN, LAN, signal*5			
Dimension	196mm*86mm*40mm			
Weight	0.4kg			
Temperature	Working: -30°C to 55°C; Storage: -40°C to 70°C; Humidity: 5% ~ 95% (Non-Condensing)			
IP Grade	IP65			
ESD	Air:±8K, Touch:±6K			
Electrical Surge	Common Mode: 4K, Differential Mode: 2K			

Firmware Specifications

Item	Air Bridge5ac-Ex
Wireless operating modes	Access point (auto WDS), access point (TDMA3), station (WDS, TDMA3), station (ARP NAT)
Wireless techniques	Smart station polling, smart auto-channel, adaptive auto modulation, automatic transmit power control (ATPC)
Wireless security	WPA/WPA2 personal, WPA/WPA2 enterprise, WACL, user isolation
Wireless QoS	4 queues prioritization on TDMA
Network operating modes	Bridge, router iPv4, router IPv6
Network techniques	Routing with and without NAT, VLAN
WAN protocols	Static IP, DHCP client, PPPoE client
Services	DHCP server, SNMP server, NTP client, router advertisement daemon, ping watchdog
Management	HTTP(S) GUI, SSH, SNMP read, WNMS, Telnet
Tools	Site survey, link test, antenna alignment
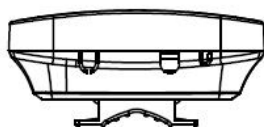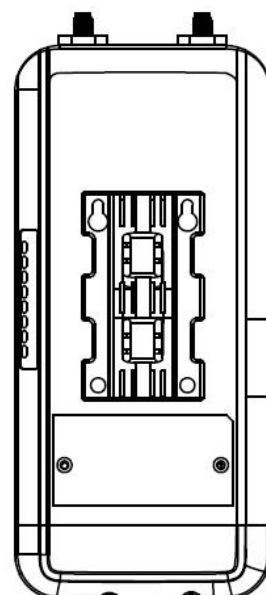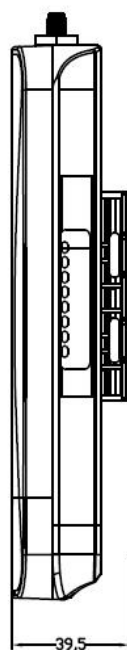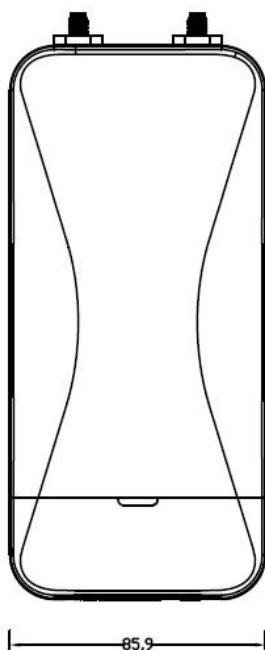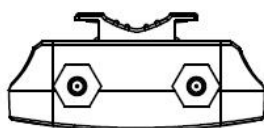
Packing List

CPE	1
PoE adapter	1
Gift Box	1