

## HIGHLIGHTS

### FortiAP 222C

The FortiAP 222C is a high-performance dual-band 2x2 MIMO 802.11ac AP. Designed in a ruggedized IP67-rated enclosure and capable of withstanding extended temperature ranges, this AP is suitable for deployment in the harsh conditions. The AP uses high-quality external antennas for long-distance and mission-critical bridging or mesh deployments.

 **802.11ac Wave 1 | Dual Radio 2.4 and 5 GHz | 4 External Antennas**

 **2x2 MIMO | Up to 450 + 1,300 Mbps**



## SPECIFICATIONS

FORTIAP 222C	
<b>Hardware</b>	
Hardware Type	Outdoor IP67 rated, status LEDs, gore vent for pressure equalization
Number of Radios	2
Number of Antennas	4 external N-Type
Peak Antenna Gain	3.5 dBi for 2.4 GHz, 6 dBi for 5 GHz
Frequency Bands (GHz) *	2.400–2.4835, 5.150–5.250, 5.250–5.350, 5.470–5.725, 5.725–5.850
Frequency of Radio 1	5 GHz a/n/ac
Frequency of Radio 2	2.4 GHz b/g/n
Maximum Data Rate	Radio 1: Up to 867 Mbps, Radio 2: Up to 300 Mbps
Tx/Rx Streams	2x2 MIMO with 2 spatial streams
Ethernet Ports	1x GE RJ45
USB Port	–
Serial Console Port	–
Power over Ethernet (PoE)	IEEE 802.3at or included PoE injector
WME Multimedia Extensions	Yes (4 priority queues for voice, video, data and background traffic)
Simultaneous SSIDs	16 (14 if background scanning enabled)
EAP Type(s)	EAP-TLS, EAP-TTLS/MSCHAPv2, EAPv0/EAP-MSCHAPv2, PEAPv1/EAP-GTC EAP-SIM, EAP-AKA, EAP-FAST
User/Device Authentication	WPA™ and WPA2™ with 802.1x or Preshared key, WEP and Web Captive Portal, MAC blacklist & whitelist
Maximum Tx Power	26 dBm (398 mW) *
Physical Security	Concrete and pole mount
Mean Time Between Failures	> 7 years
IEEE Specifications	802.11a, 802.11b, 802.11e, 802.11g, 802.11h, 802.11i, 802.11j, 802.11n, 802.1x, 802.3af, 802.11ac
802.11ac 80MHz Channel	Yes
802.11n Features	20 MHz and 40 MHz High-Throughput (HT) Support  Increased maximum frame transmission by incorporating A-MPDU and A-MSDU Packet Aggregation  Conserve power via Dynamic MIMO power save

FORTIAP 222C	
Advanced 802.11n to enhance rate-over-range including:	Low-density parity check (LDPC) encoding Maximum likelihood demodulation (MLD) Maximum Ratio Combining (MRC) for improved receiver
Mounting Options	Wall or pole
Included Accessories	PoE injector with AC power adapter, pole mount kit, wall mount kit, grounding cable, surge protector, 4x dipole antennas
FortiPresence Capable	Yes
<b>Wireless Monitoring Capabilities</b>	
Frequencies scanned	2.4 and 5 GHz
Background scan with client access on 2.4 and 5 GHz	Yes
Full-time scan as dedicated monitor	Yes
<b>Dimensions</b>	
Length x Width x Height	9.8 x 8.7 x 2.1 inches (249 x 220 x 53 mm)
Weight	3.68 lbs (1.67 kg)
Package (shipping) Weight	9.1 lbs (4.31 kg)
<b>Environment</b>	
Power Supply	Proprietary PoE Injector Adapter Input: 100–240V AC, 50–60 Hz
Power Consumption (Average)	16 W
Power Consumption (Maximum)	18.4 W
Humidity	5–90% non-condensing
Operating Temperature	-40–140°F (-40–60°C)
Storage Temperature	-40–158°F (-40–70°C)
Directives	Low Voltage Directive • RoHS
<b>Certifications</b>	
WiFi Alliance Certified	Yes

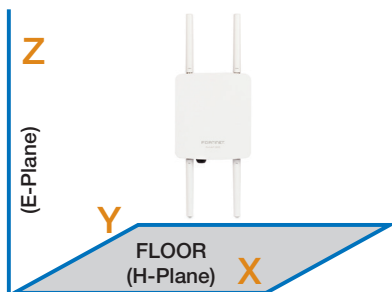
\* Frequency selection and power may be restricted to abide by regional regulatory compliance laws.

## RF RX/TX PERFORMANCE TABLE

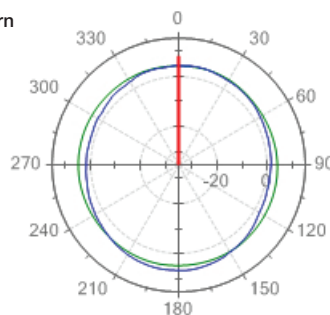
FORTIAP 222C				
	RADIO 1		RADIO 2	
	5 GHz Tx Power (dBm)	Rx Sensitivity (dBm)	2.4 GHz Tx Power (dBm)	Rx Sensitivity (dBm)
6 Mbps	24	-93	27	-92
54 Mbps	20	-77	25	-75
<b>802.11n HT20</b>				
MCS 0/8	24	-93	27	-91
MCS 1/9	24	-91	27	-89
MCS 2/10	24	-87	27	-88
MCS 3/11	23	-84	27	-85
MCS 4/12	23	-81	26	-81
MCS 5/13	21	-77	25	-78
MCS 6/14	20	-76	25	-76
MCS 7/15	20	-74	24	-73
<b>802.11n HT40</b>				
MCS 0/8	24	-89	27	-86
MCS 1/9	24	-86	27	-87
MCS 2/10	24	-84	27	-86
MCS 3/11	24	-81	27	-83
MCS 4/12	24	-78	26	-79
MCS 5/13	22	-76	24	-77
MCS 6/14	20	-75	24	-72
MCS 7/15	20	-73	24	-71
<b>802.11ac HT80</b>				
MCS 0	24	-87	—	—
MCS 1	24	-85	—	—
MCS 2	24	-83	—	—
MCS 3	24	-79	—	—
MCS 4	24	-77	—	—
MCS 5	22	-76	—	—
MCS 6	21	-75	—	—
MCS 7	20	-73	—	—
MCS 8	18	-65	—	—
MCS 9	17	-61	—	—

## ANTENNA RADIATION PATTERNS

### FAP-222C

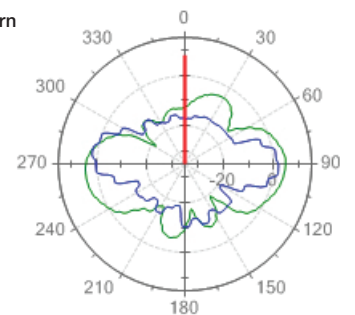


H-Plane Pattern



Radio 1 – 5.5 GHz Radio 2 – 2.4 GHz

E-Plane Pattern



Radio 1 – 5.5 GHz Radio 2 – 2.4 GHz