



## Industrial Wireless Access Point

- Designed for 802.11a/b/g/n networks
- Operating temperature: -10°C ~ 60°C
- Web server/Utility configuration
- Upgrade via Device View or Web server
- 5 GHz frequency support to reduce interference on 2.4 GHz with other wireless devices
- Client isolation
- Different operating modes and topology options (WDS Bridge and AP Client)
- FCC (United States), ETSI (Europe), and NCC (Taiwan) certified wireless equipment

## PRODUCT DESCRIPTION

Suitable in a wide array of applications, the new AW5500 is able to withstand harsh conditions typically found in the industry. AW5500 is also design thinking on your security, state of the art encryption as well as having the ability to create a virtual network among wireless clients; this level of communication between clients can be easily and intuitively controlled using this option, imposing restrictions on data and excluding malware at the same time. AW5500 embodies a strong wireless network manager that will surely deliver optimum performance in your network.

## Industrial Wireless Access Point

Technical Specifications	
Model Name	AW5500
Power Characteristics	
Input Voltage	9VDC-48VDC
Input Current(9VDC)	0.65A
Power Consumption	Approx. 5.85W (max)
Reverse Polarity Protection	Yes
Connection	3-pin Lockable Terminal Block
Mechanicals	
Dimensions	47x110x90 mm
Installation	DIN-Rail, wall mount (optional kit)
Reset Button	Yes
Environmental Limits	
Operating Temperature	-10°C ~ 60°C (14°F ~ 140°F)
Storage Temperature	-40°C ~ 85°C (-40°F ~ 185°F)
Ambient Relative Humidity	5 ~ 95% RH, (non-condensing)
Hardware Characteristics	
Watchdog	Hardware built-in
Ethernet Switch & PHY	IEEE802.3ab 1000 Base-T
Software Features	
Operation Modes	AP, WDS Hybrid, AP Client
Wireless Security	WEP, WPA, WPA2, TKIP, AES, 802.1x
Network Security	Client Isolation, Firewall / Filtering, Turn off Radio
Alerts Events	E-mail / SNMP Trap
Supported Protocol	ICMP, TCP, UDP, DHCP Server/Client, DNS, SNMP, NTP, SMTP, HTTP, IPv4, 802.1x, RADIUS, STP/RSTP
Warranty	
	5 years
Regulatory Requirements	
EMS	EN55032, EN55024
EMC	EN55032, EN55024, EN 301489-1 V2.2.0; EN301489-17 V3.2.0; FCC 15B (Class A), CNS 13438
R radio	FCC 15C 15.247, FCC 15E 15.407, EN 301893 V2.1.1, EN 300328 V2.1.1, NCC LP0002
EMF	EN 62311: 2008, EN 50385: 2002

Test	Description		Test Levels	Levels
EN61000-4-2	ESD	Contact Discharge Air Discharge	±8KV ±15KV	4 4
EN61000-4-3	RS	Radiated (Enclosure)	10(V/m)	3
EN61000-4-4	EFT	AC Power Port LAN Port	±2.0 KV ±2.0 KV	3 4
EN61000-4-5	Surge	AC Power Port AC Power Port LAN Port	Line-to-Line±1.0 KV Line-to-Earth±2.0 KV Line-to-Earth±2.0 KV	3 3 3
EN61000-4-6	CS	Conducted (Enclosure)	10 V rms	3
EN61000-4-8	PFMF	(Enclosure)	10(A/m)	3
Safety	UL60950-1 , CB IEC/EN60950-1, IEC/EN 62368-1, CNS 14336-1			
Shock	IEC 60068-2-27			
Freefall	IEC 60068-2-32			
Vibration	IEC 60068-2-6			
MTBF	22 years (MIL-HDBK-217F)			
RoHS	Yes			
<b>Wireless Characteristics</b>				
Wireless PCI-e Module	Atheros AR9382			
Tx / Rx	2T2R MIMO (2x2 with MCS 0-15)			
Standard Conformance	802.11a, 802.11b, 802.11g, and 802.11n			
<b>Operating Frequency</b>				
	2.4Ghz		5Ghz	
United States (FCC)	2412-2462(20Mhz)/2422-2452(40Mhz)		5180-5240, 5745-5825(20Mhz)/5190-5230, 5755-5795(40Mhz)	
Europe (ETSI)	2412-2472(20Mhz)/2422-2462(40Mhz)		5180-5240(20Mhz)/5190-5230(40Mhz)	
Taiwan (NCC)	2412-2462(20Mhz)/2422-2452(40Mhz)		5280-5320, 5745-5825(20Mhz)/5310, 5755-5795(40Mhz)	
<b>Data Rate</b>				
802.11a	6, 9, 12, 18, 24, 36, 48,54Mbps			
802.11b	1, 2, 5.5 and 11Mbps			
802.11g	6, 9, 12, 18, 24, 36, 48, 54Mbps			
802.11n	20MHz bandwidth: 1Nss: 65Mbps @ 800GI, 72.2Mbps @ 400GI (Max.) / 2Nss: 130Mbps @ 800GI, 144.4Mbps @ 400GI (Max.) 40MHz bandwidth: 1Nss: 135Mbps @ 800GI, 150Mbps @ 400GI (Max.) / 2Nss: 270Mbps @ 800GI, 300Mbps @ 400GI (Max.)			
<b>Antenna (5GHz)</b>				
Gain	5 dBi			
Connector	Dual SMA(R) Female			
<b>Output Power (5GHz)</b>				
802.11a	+15dBm @ 6, 9, 12, 18, 24Mbps / +15dBm @ 36Mbps / +14dBm @ 48Mbps / +12dBm @ 54Mbps			
802.11n 5GHz/HT20	+15dBm @ MCS 0/8 +15dBm @ MCS 4/12 +15dBm @ MCS 1/9 +11 - 14dBm @ MCS 5/13 +15dBm @ MCS 2/10 +9 - 12dBm @ MCS 6/14 +15dBm @ MCS 3/11 +7 - 10dBm @ MCS 7/15			
802.11n 5GHz/HT40	+14dBm @ MCS 0/8 +14dBm @ MCS 1/9 +14dBm @ MCS 2/10 +14dBm @ MCS 3/11 +14dBm @ MCS 4/12 +10 - 13dBm @ MCS 5/13 +8 - 11dBm @ MCS 6/14 +6 - 9dBm @ MCS 7/15			

Antenna (2.4GHz)	
Gain	3 dBi
Connector	Dual SMA(R) Female
Output Power (2.4GHz)	
802.11b	+14dBm
802.11g	+17dBm @ 6, 9, 12,18,24Mbps / +17dBm @ 36Mbps / +16dBm @ 48Mbps / +16dBm @ 54Mbps
802.11n 2.4GHz/HT20	+16dBm @ MCS 0/8 +16dBm @ MCS 4/12 +16dBm @ MCS 1/9 +16dBm @ MCS 5/13 +16dBm @ MCS 2/10 +16dBm @ MCS 6/14 +16dBm @ MCS 3/11 +15dBm @ MCS 7/15
802.11n 2.4GHz/HT40	+15dBm @ MCS 0/8 +15dBm @ MCS 4/12 +15dBm @ MCS 1/9 +15dBm @ MCS 5/13 +15dBm @ MCS 2/10 +15dBm @ MCS 6/14 +15dBm @ MCS 3/11 +14dBm @ MCS 7/15

Receiver Sensitivity							
	Data Rate	IEEE Spec (1 Rx dBm)	Typical/Maximum (2Rx dBm)		Data Rate	IEEE Spec (1 Rx dBm)	Typical/Maximum (2Rx dBm)
802.11a	6M	-82	-95/-85	802.11a/n HT40	MCS0	-79	-92/-82
	9M	-81	-94/-84		MCS1	-76	-90/-79
	12M	-79	-93/+82		MCS2	-74	-87/-77
	18M	-77	-90/-80		MCS3	-71	-84/-74
	24M	-74	-88/-77		MCS4	-67	-80/-70
	36M	-70	-84/-73		MCS5	-63	-76/-66
	48M	-66	-82/-69		MCS6	-62	-74/-65
	54M	-65	-81/-68		MCS7	-61	-72/-64
802.11b	1M	not specified	-98/-85	802.11b/g/n HT20	MCS0	-82	-95/-85
	5.5M	not specified	-98/-85		MCS1	-79	-94/-82
	11M	not specified	-94/-85		MCS2	-77	-92/-80
802.11g	6M	-82	-96/-85		MCS3	-74	-89/-77
	9M	-81	-96/-84		MCS4	-70	-86/-73
	12M	-79	-95/-82		MCS5	-66	-82/-69
	18M	-77	-93/-80		MCS6	-65	-80/-68
	24M	-74	-90/-77		MCS7	-64	-78/-67
	36M	-70	-87/-73		MCS0	-79	-92/-82
	48M	-66	-83/-69		MCS1	-76	-92/-79
	54M	-65	-82/-68	MCS2	-74	-89/-77	
802.11a/n HT20/802.11a/n HT20	MCS0	-82	-94/-85	802.11b/g/n HT40	MCS3	-71	-86/-74
	MCS1	-79	-92/-82		MCS4	-67	-83/-70
	MCS2	-77	-90/-80		MCS5	-63	-77/-66
	MCS3	-74	-87/-77		MCS6	-62	-76/-65
	MCS4	-70	-84/-73		MCS7	-61	-75/-64
	MCS5	-66	-79/-69				
	MCS6	-65	-78/-68				
	MCS7	-64	-76/-67				

### Ordering Information

AW5500	P/N:1P1AW55000001G Industrial Wireless Access Point
<b>Optional Accessories</b>	
UN315-1212 (US-Y) Power Adapter	P/N: 50500151120003G Y-Type power adaptor,100-240VAC input, 1.25A @ 12VDC output, US plug LV6
UNE315-1212 (EU-Y) Power Adapter	P/N: 50500151120013G Y-Type power adaptor, 100~240VAC input, 1.25A @ 12VDC output, EU plug, LV6
UN315-2465 (US)	P/N: 50500161240002G Y-Type power adaptor, 100~240VAC input, 0.65A @ 24VDC output, US plug, LV6
UNE315-2465 (EU)	P/N: 50500161240012G Y-Type power adaptor, 100~240VAC input, 0.65A @ 24VDC output, EU plug, LV6

## DIMENSIONS & LAYOUT

