# 3ISYS-WAP-2C4A+

INDUSTRIAL DUAL RF IN IEEE 802.11 A/B/G/N WIRELESS ACCESS POINT WITH 2X10/100/1000BASE-T(X)

## **FEATURES**

- High Speed Air Connectivity: Dual RF in IEEE 802.11 a/b/g/nWLAN interface support up to 300Mbps link speed
- Dual RF for redundant wireless communication
- Highly Security Capability: WEP/WPA/WPA-PSK(TKIP,AES)/ WPA2/WPA2-PSK(TKIP,AES)/802.1X Authentication supported
- Support Long Distance Air Connectivity
- Support X-Roaming <60 ms
- Support wireless load balance
- Support external SMA antenna installation SupportDual AP/Dual Client/Bridge/AP-Client Mode
- Support MAC/IP/Port Filter
- Provide Digital Inputs and Digital Outputs
- Support Multiple-SSID to 4 SSID
- Wireless connecting status monitoring
- Secured Management by HTTPS
- 1KV isolation for PoE P.D. port
- Event Warning by Syslog, Email, SNMP Trap, and Relayoutput
- Rigid IP-30 housing design
- Pole-mount enabled





















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#### **PRODUCT OVERVIEW**

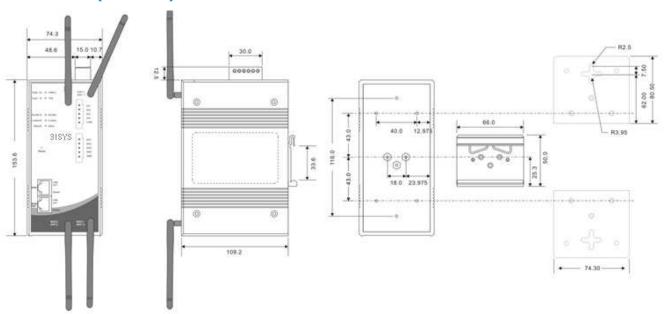
3IYS-WAP-2C4A+is a reliable wireless Access Point with dualIEEE 802.11 a/b/g/n wireless modules and 2 Ethernet Gigabit portswith one PoE P.D. port. It can be configured to operate in Dual AP/Dual Client /Bridge /AP-Client Mode and supports MAC filters for security control.3IYS-WAP-2C4A+ provides afour reverse SMAconnectors that can install any Wi-Fi antennas to extend communication distance. It is specifically designed for the toughest industrial environments. You are able to configure 3IYS-WAP-2C4A+by WEB interface via LAN port or WLAN interface. In addition, 3IYS-WAP-2C4A+also provides P.D. feature at ETH2 port which is fully compliant with IEEE802.3af PoE P.D. specification to save the layout cost of power line. 3IYS-WAP-2C4A+can be easily adopted in almost all kinds of applications and provides the most rugged solutions for manage your network. Therefore, 3IYS-WAP-2C4A+is one of the best communication solutions for wireless applications.

### **Practical Operation**

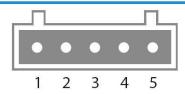
In practical operation of wireless access point, Windows utility (Open-Version) is supported. This utility is very helpful for you to search and configure IP of access point on the industrial network In addition, the wireless access point support various kinds of operation modes includeDual AP/Dual Client /Bridge /AP-Client Mode.

#### **Dimension**

#### **Dimension (Unit=mm)**



## **DI/DO Definition**



#### **Digital Input Pin Definition**

PIN	1	2	3	4	5
Function	DI1	DI2	DI3	DI4	СОМ

#### **Digital Output Pin Definition**

PIN	1	2	3	4	5
Function	DO1	DO2	DO3	D04	GND

## **Specifications**

3ISYS	
WLAN Access Point Model	3IYS-WAP-2C4A+
Physical Ports	
10/100/1000Base-T(X) Ports	2
PoE P.D. port	Present at ETH2  Fully compliant with IEEE 802.3af Power Device specification  Over load & short circuit protection  Isolation Voltage: 1000 VDC min.  Isolation Resistance: 10 <sup>8</sup> ohms min
5-Pin Terminal Block	2(DI x 4 and DO x 4)
WLAN interface	
Operating Mode	Dual AP/Dual Client /Bridge /AP-Client Mode
Antenna Connector	4 x External reverse SMA antenna connector
Radio Frequency Type	DSSS, OFDM
Radio Frequency Type	IEEE802.11a : OFDM with BPSK, QPSK, QAM, 64QAM
Modulation	IEEE802.11b: CCK, DQPSK, DBPSK IEEE802.11g: OFDM with BPSK, QPSK, 16QAM, 64QAM
	IEEE802.11n: BPSK, QPSK, 16-QAM, 64-QAM
Frequency Band	America / FCC: 2.412~2.462 GHz (11 channels) 5.180~5.240 GHz & 5.745~5.825 GHz ( 9 channels ) Europe CE / ETSI: 2.412~2.472 Ghz (13 channels)
	5.180~5.240 GHz (4 channels)
Transmission Rate	IEEE802.11b: 1 / 2 / 5.5 / 11 Mbps IEEE802.11a/g: 6 / 9 / 12 / 18 / 24 / 36 / 48 / 54 Mbps IEEE801.11n: up to 300Mbps
Transmit Power	802.11a: 12dBm ± 1.5dBm 802.11b: 17dBm ± 1.5dBm 802.11g: 16dBm ± 1.5dBm 802.11gn HT20: 15dBm ± 1.5dBm@150Mbps 802.11gn HT40: 14dBm ± 1.5dBm@300Mbps 802.11an HT20: 12dBm ± 1.5dBm@150Mbps 802.11an HT40: 11dBm ± 1.5dBm@300Mbps
802.11a: -76dBm ±2dBm@54Mbps 802.11b: -85dBm ±2dBm@11Mbps 802.11g: -76dBm ±2dBm@54Mbps 802.11gn HT20: -75dBm ±2dBm@150Mbps 802.11gn HT40: -72dBm ±2dBm@300Mbps 802.11an HT20: -74dBm ±2dBm@150Mbps 802.11an HT40: -71dBm ±2dBm@300Mbps	
Encryption Security	WEP: (64-bit ,128-bit key supported) WPA/WPA2:802.11i(WEP and AES encryption) WPAPSK (256-bit key pre-shared key supported) 802.1X Authentication supported TKIP encryption

Wireless Security	SSID broadcast disable and enable
Protocol Support	
Protocol	ARP,BOOTP, DHCP, DNS, HTTP, IP, ICMP, SNTP, TCP, UDP, RADIUS, SNMP,STP, RSTP,
LED indicators	
	3 x LEDs, PWR1(2)(PoE) / Ready:
Power indicator	Red On: Power is on and booting up
	Green On: Power is on and functioning Normal
	2 x LEDs,
10/100/1000Base-T(X)	LNK/ACT:Green for port Act.
indicator	Speed: Green for port Link at 1000Mbps
	Amber for port Link at 100Mbps.
	Off for port Link at 10Mbps
W AN LED	2 x Green Solid On: RF on, Blink: data transmitting
WLAN LED	2 x Green for WLAN work on 2.4GHz
Dames	2 x Green for WLAN work on 5GHz
Power	Dual DC invute 12 40V/DC on C via towarinal block
Input power	Dual DC inputs. 12~48VDC on 6-pin terminal block
Power consumption (Typ.)	11 Watt
Physical Characteristic	ID 20
Enclosure	IP-30
Dimension (W x D x H)	74.3(W) x 109.2(D) x 153.6(H) mm (2.93 x 4.3 x 6.05 inch.)
Weight (g)	1250g
Environmental	40 by 05°00 ( 40 by 405°05)
Storage Temperature	-40 to 85°C (-40 to 185°F)
Operating Temperature	-25 to 70°C (-13 to 158°F)
Operating Humidity	5 to 95% Non-condensing
Regulatory approvals	FCC Dark 1F CTCDD (FNIFF022) along A FNIF01FF (FNIF0121 2.2. FNIFF011
EMI	FCC Part 15, CISPR (EN55022) class A, EN50155 (EN50121-3-2, EN55011,
	EN50121-4)
EMS	EN61000-4-2 (ESD), EN61000-4-3 (RS), EN61000-4-4 (EFT), EN61000-4-5
(Surge), EN61000-4-6 (CS), EN61000-4-8, EN61000-4-11	
Shock Free Fall	IEC60068-2-27, EN61373
Vibration	IEC60068-2-32 IEC60068-2-6
Safety	
,	EN60950-1
Warranty	1 year

## **Ordering Information**

3	ISYS-AAA-C	A	
Module	Wireless	Number of	Number of Ext.
Identifier	protocols	10/100	Antenna
		/1000Base-T(X) Ports	
WAP	<b>- 1:</b> 802.11 b/g		
WLAN Access point	<b>- 2:</b> 802.11 a	2	4
	<b>- 3:</b> 802.11 a/b/g		
	<b>- 4:</b> 802.11 b/g/n		
	<b>- 5:</b> 802.11 a/n		
	- <b>6:</b> 802.11 a/b/g/n		

## **Accessories Included**

 E
 3ISYS-WAP-2C4A++ x 1
 E
 CD x 1

 E
 Pole Mount Kit x 1
 E
 Antenna x 4

**Quick Installation** 

Guide x 1



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All specifications are subject to change without further notice. All features with \* mark will be available by firmware upgrade.