

SNAP2410 2.4 GHz Frequency Hopping Spread Spectrum Network Access Point with 10Base-T



Designed for use as a base station for WIT2410-based products, the SNAP2410 provides seamless roaming as well as Ethernet connectivity. The SNAP2410 provides an access point connecting up to 62 WIT2410 wireless remotes to a 10Base-T Ethernet network. Multiple SNAPs can be used to establish large coverage areas through which wireless remotes can roam without having to re-synchronize. Compliant with FCC and ETSI requirements, the SNAP2410 can be used license-free worldwide.

Seamless Roaming. Seamless roaming allows applications to be in constant communication with remotes. Without this capability, there would be short periods of time when the application would not be able to communicate with remotes. This would occur when remotes went from one base station area to another. During the time it takes for the remote to synchronize with the new base station, communication is not possible. While being out of contact for 5 or 10 seconds may not be a problem in some applications, in many applications it is unacceptable.

Ethernet Connectivity. The SNAP2410 has a 10Base-T connection to provide communications to the host. Capable of 10 Mbps operation, the SNAP2410 provides a cost-effective method for connecting a network of base stations.

A typical configuration would have multiple base stations connected through a multiport hub, one port of which would be connected to a PC running the application. The application would communicate to an individual remote by sending an Ethernet formatted message to the remote's IP address.

The system designer is given the freedom to choose the wireless communication parameters that provide the optimum performance for each application. Thus, the communication between the base station and the remotes is not 802.11 compatible.

Versatile. All of the radio parameters are configurable under software control. Even transmit power can be selected through a straightforward command set. Configuration of the SNAP2410 is through a standard RS-232 serial port using Digital Wireless' Netcom menu based software.

Point-to-point and point-to-multipoint modes are supported using either CSMA or TDMA modes..

The SNAP2410 is available in a variety of NEMA and IP rated aluminum enclosures allowing their deployment in harsh environments and outdoors.

Reliable. The SNAP2410 provides both reliable communication and reliable operation. With Frequency Hopping Spread Spectrum technology, the SNAP2410 provides immunity to jamming as well as immunity to multipath fading. Using Automatic Retransmit Request (ARQ) in addition to a 256K buffer, transparent error-free communication is automatic. The built-in data encryption adds a measure of security.

Reliable operation is assured through our stringent QA processes. All SNAP2410s go through a full 48-hour burn-in. And compliance with ISO9002 is on schedule to be completed by Q2 '99. Another reason Digital Wireless is the choice of hundreds of designers.

Let us be your experts. Put our 10 years experience with wireless technology to work for you.

Features:

- 2.4 GHz Frequency Hopping Spread Spectrum technology
- Seamless roaming capability
- NEMA and IP rated enclosures
- 460 Kbps channel data rate
- FCC certified for license-free operation

Benefits:

- Worldwide license-free operation
- Immunity to jamming and multipath fading
- Supports far ranging mobile applications
- Supports up to 62 remotes per access point
- Shortens time to market

To find out how to put Digital Wireless to work for you, visit our website www.digital-wireless.com or call:

770.564.5540



PRELIMINARY

GENERAL SPECIFICATIONS

RF Frequency	2400 to 2483 MHz
Radio Certification	Certified under FCC Part 15.247 and ETS 300-328 rules, license free
Operating Range	Indoor: 450' to 900' Outdoor: 3000' with dipole antenna, >20 miles with gain antenna
Network Topology	Star network
Network Protocol	CSMA/CA or TDMA with ARQ
Configuration Interface	Asynchronous (RS-232) up to 115.2 Kbps
I/O Data Rate	10 Mbps Ethernet
Channel Data Rate	460 Kbps
# of Frequency Channels	75
RF Bandwidth	750 KHz
Transmit Power Output	10 mW or 100 mW, software selectable
Receiver Sensitivity	-93 dBm
Supply voltage	12 Vdc @ 500mA unregulated wall transformer
Size	201mm x 144mm x 53mm
Weight	727g
Operating Temperature	-20°C to 70°C
Humidity	20% to 90% (non-condensing)

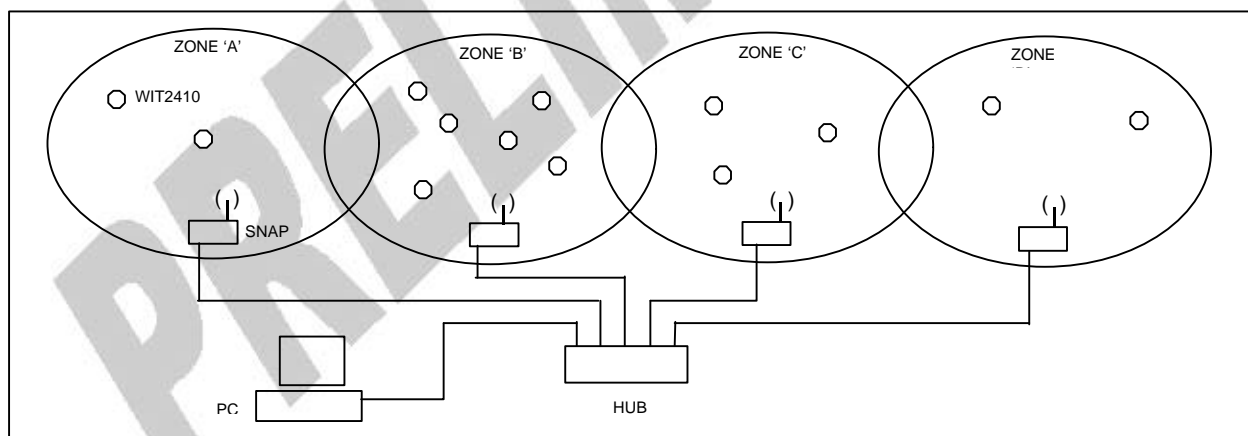
CONNECTORS

Power	2-Pin DIN
Ethernet	RJ-45
Configuration Port	DB-9
Alternate Sync IN	RJ-45
Alternate Sync OUT	RJ-45
Antenna	Reverse SMA

INDICATORS

Power
Ethernet (Bi-color) Tx – Red; Rx – Green
Radio (Bi-color) Tx – Red; Rx – Green
Sync Detect

TYPICAL NETWORK CONFIGURATION



PHYSICAL SPECIFICATIONS

