LINKIT)))
SISTEMI WIRELESS

MAWiND

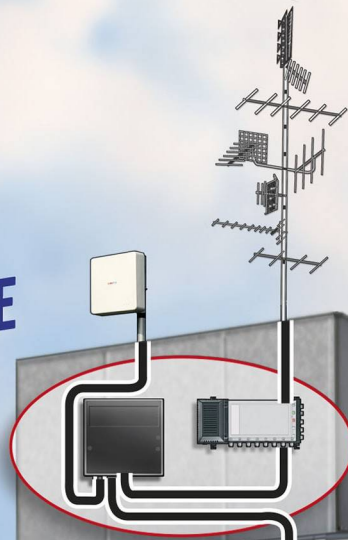## Master Antenna Wireless Network Distribution

The fastest way to distribute internet through antenna TV system

MAWiND

Only one CPE

Distribute internet through antenna TV system

TV

Plug & Play Devices

TV

How can I reach all the users in metropolitan and crowded urban areas?

This is the main WISP problem.

Even if, from roof of the buildings there are excellent conditions of optical visibility towards the distribution A.P. base station, it's extremely complex and expensive, to lay the wiring connections from wireless CPEs to end users.

This causes problems in optimizing the investments and, in some cases, brings the WISP to give up to propose internet subscriptions, thus loosing opportunities for development and business.

MAWiND is the definitive solution to overcome the problem.

Using the master antenna TV distribution system already present in buildings, MAWiND allows you to reach all customers without any new cable.

Thanks to the connection with the MAWiND Master device, the wireless broadband signal received from a single CPE installed on the roof, is distributed through TV cables safely, without introducing any interferences on TV signal, and reaching any building's TV sockets. Any new subscriber, will just have to:

- connect the MAWiND modem between the TV socket and the TV set;
- connect his network devices (personal computer, smartphone, tablet ...) to the MAWiND modem;
- enjoy the internet surfing.

No limits to reach any user.

Even those located in disadvantageous places, such as ground-floor flats, will be able to easily receive the broadband wireless connection.

Only one wireless CPE

without any technological or frequency constraint, has to be provided on the roof of the building.

Plug-and-play device

MAWiND can be installed as easily as a standard ASDL modem, with a plug-and-play process. No installation procedures will be necessary. The WISP can provide MAWiND already configured with all the network's parameters (PPPoE, VPN etc.).

Remote management

Both Master and modem MAWiND devices can be managed through a remote control as a standard AP or CPE. The WISP will be able to get access to the devices for administration and maintenance.

MAWiND Everywhere

MAWiND solution is useful where an antenna TV system is present and you need to distribute a broadband signal: hotels, touristic villages, campings, residences, cruise ships, schools, universities ......

MAWiND
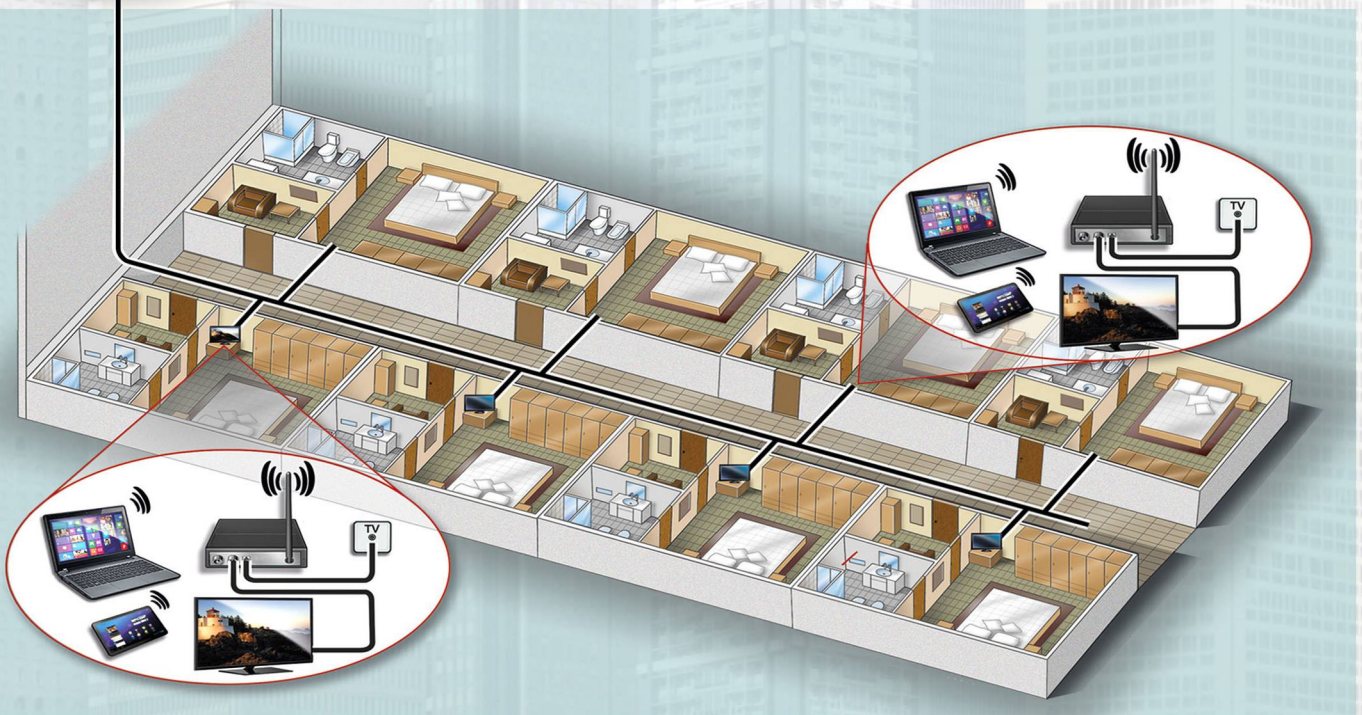
Technical Specifications

The broadband signal from a wireless network, without any technology or radio frequencies constraint, is spread through buildings by MAWiND system, using the existing TV signal distribution system.
MAWiND is composed of an head unit and many user modems.

MAWiND head unit is connected to the master antenna TV system and:

- receives as input:
  - the signal coming from the TV antenna amplifier – bands I, III, IV, V (48 - 240 and 470 - 860 MHz);
  - the IP signal coming from wireless CPE;
- generates a 350MHz signal from the incoming IP data and send it together with the TV signals through the coaxial network.

Each **MAWiND user modem**:

- is connected between the TV socket and the TV set in a transparent way;
- extracts the IP broadband signal from the coaxial network;
- makes available the IP for a new home lan network.

I	III	DATA	IV	V

Technical Characteristics	HEAD UNIT MWD9301	USER MODEM MWD1304
Television Pass Through Frequency	0 – 250 MHz & 470 – 2150 MHz	
IP Data Frequency	320 – 380 MHz	
Modulation	DSSS (DBPSK, DQPSK, CCK) OFDM (BPSK, QPSK, 16-QAM, 64-QAM)	
Channels Bandwidth	20MHz – 2 x 20MHz	
Antenna Connectors	75 ohm F type	75 ohm IEC PAL type
Line Transmission Power	+8 dBm	+3 dBm
Rx Sensitivity	-90 dBm @ 6 Mbps -81 dBm @ 24 Mbps -76 dBm @ 36Mbps -71 dBm @ 54 Mbps -67 dBm @ 117 Mbps -62 dBm @ 150 Mbps	
Cable Operating mode	Access Point - Bridge - WDS	WDS, Station, Station-Bridge
Data Security	WEP 64,128 bit, WPA, WPA2, TKIP, AES-CCM	
Ethernet Standard	10/100/1000 Gigabit Ethernet	4 x 10/100 Fast Ethernet
VLAN Management	802.1q - Multiple VLAN interface – Inter VLAN routing	
VPN Management	IPSEC, PPPoE, EoIP, PPTP, L2TP	
Network Routing	OSFP, RIP, BGP, STP, RSTP, NAT, MPLS, IPv6, MME	
Admin Management	Telnet, SSH, Proprietary GUI, WEB	
Power Supply	12 V dc / 800 mA	5 V dc / 500 mA
Operating Temperature	-30°C / +60°C	-20°C / +45°C
Weight	750g	250g
Dimension mm (H x L x D)	180 x 130 x 30	120 x 90 x 27

* Modem is also available with 2.4GHz IEEE802.11bgn standard wireless AP included