

PLUTO



Radio Bridge & Router *Operational Range –15/40 Kms* *Super High Power of +28dBm*

MAKSAT Pluto balances enterprise-scale security, management and Quality of Service features with high performance.

Features Benefits

The MAKSAT Pluto Radio, is a any Point to Multipoint and Multipoint-to Multipoint OFDM Radio Bridge Equipment for High Bandwidth connectivity. It has a range of up to 15kms with the integrated antenna and up to 40kms with external antenna.

HOTSPOT

Built-in HOTSPOT and Bilngo, plus PPPOE server/client

Built-in Router Specifications:

Basic Network Platform

TCP/IP protocol suite

Firewall and NAT

Packet filtering, source and destination NAT, source MAC addresses, ports, protocols, protocol options, interfaces.

Routing

Static, mesh OLSRD

Bridging

Spanning tree protocol, multiple bridge interfaces, bridge firewall

Bandwidth Management

Per IP / protocol / subnet / port, CBQ, RED, SFQ, byte limited queue, packet limited queue

Feature

- Pre WiMAX / OFDM 5Mhz & 10Mhz
- 2.192-2.99Ghz, 4.9-6.1Ghz
- Any Point to Any point and Multipoint to Multipoint.
- IP Routing
- OLSR & Static
- Ultra Secure Wireless 256 bit AES, WPA and WPA2 encryption, Security, VPN and firewall
- GUI, Telnet, SSH
- QOS with Traffic Shaping
- Watch Dog Timer
- Sensitivity of (-)105 XR Rate (Best in the Industry)
- Transmit Power Control
- Pluto with 3G backhaul also available

QOS

Full Scale QOS with traffic shaping and user friendly Presets .

DNS client/Server

Name resolving for local use, Dynamic DNS Client

Multiple SSID

Offers Virtual AP support with multiple SSID and individual encryption and IP address/ DHCP.

SNMPV2

read only access

Tunnels

PPTP, EoIP (Ethernet over IP)

Multicasting support (beta available)

VLAN

NTP Network Time Protocol server and client

Radio Technical Specifications

Frequency Range		Watch Dog Timer	Yes
USA (FCC) :	2.412GHz ~ 2.462 GHz (CH1 ~ CH11), 5150MHz – 5350MHz / 5725MHz – 5850MHz	QOS/COS/GOS	Yes
Europe (ETSI):	2.412 GHz ~ 2.472 GHz (CH1 ~ CH13), 5150 MHz – 5350 MHz / 5470 MHz – 5725MHz	Watch Dog Timer	Yes
Japan (TELEC):	2.412 GHz ~ 2.472 GHz (CH1 ~ CH13), 5150 MHz – 5250 MHz	Bandwidth Management	Yes
Extended Super Channel (optional)	2.192GHz ~ 2.499GHz, 4915MHz - 6075MHz	Router	Yes
Channel Size (pre-wimax)	40 Mhz (5ghz only, turbo), 20 mhz, 10 Mhz, 5 Mhz	Packet Format	IEEE 802.3 and Ethernet II
Receive Sensitivity	1 Mbps -98dBm/ -105dBm (XR) 2 Mbps -96 dBm 6 Mbps -94 dBm 9 Mbps -93 dBm 11 Mbps -92 dBm 12 Mbps -91 dBm 18 Mbps -90 dBm 24 Mbps -86 dBm 36 Mbps -83 dBm 48 Mbps -77 dBm 54 Mbps -74 dBm	Network Connection	10 /100 Base T RJ Female Ethernet Connection with surge protection
Antenna Connector	N Female	Bridge Functionality	Intelligent Local Packet Filtering (self-learning), Node by node user configurable data rates (CIR and MBR)
Integrated antenna	16dBi (30° V and 30° H)	Network Topologies	Any point-to Multipoint Multipoint-to Multipoint
Wireless Data Rate	54 Mbps, 108 Mbps(5Ghz only)	Repeater Mode	Built-in Mode
Super fast Mode upto108 Mbps	Yes	RF Collision Management	Combined TDD and FEC
RF Modulation Scheme	QAM64, QAM16, QPSK, BPSK, CCK (OFDM, DSSS)	Security	256 bit AES, WPA and WPA2 encryption, Security, VPN and firewall
Duplex Format	TDD, FDD	Management	https, http, SSH, Telnet
Certification	FCC , ETSI	SNMP	Version 2
Range	15Km / 40Km(external antenna)	Power	110 VAC or 220 VAC , 18v – (-)48v DC
Transmit Power	+28dBm (600mW)	Power Consumption	Less than 15W (fully loaded)
Extended Range (XR)	Best in the industry (-) 105dBm	Height x Width x Depth Weight	7" x 11" x 5" 1.2Kg
		Operational Temperature	(-)40C to (+)65C
		Humidity	Humidity 0-95% non condensing, Outdoor weatherproof enclosure

*Order options: Pluto 2.4Ghz
Pluto 5.8Ghz