

Economical Pico Base Station

Tranzeo's **TR-WMX-5.8-pBS-PlusG** is a carrier-class WiMAX Pico Base Station (pBS) that is fully compliant with the IEEE 802.16-2004 standard (802.16d). Featuring a high performance radio with built-in GPS receiver for synchronization with neighbouring TR-WMX-5.8-pBS-PlusG's to provide highly efficient spectrum utilization. Combined with Tranzeo's full line of subscriber units and the intuitive AirSync™ Element Management System (EMS), the **TR-WMX-5.8-pBS-PlusG** provides the most economical turn-key solution for wireless broadband applications in the license-free 5.8GHz band.

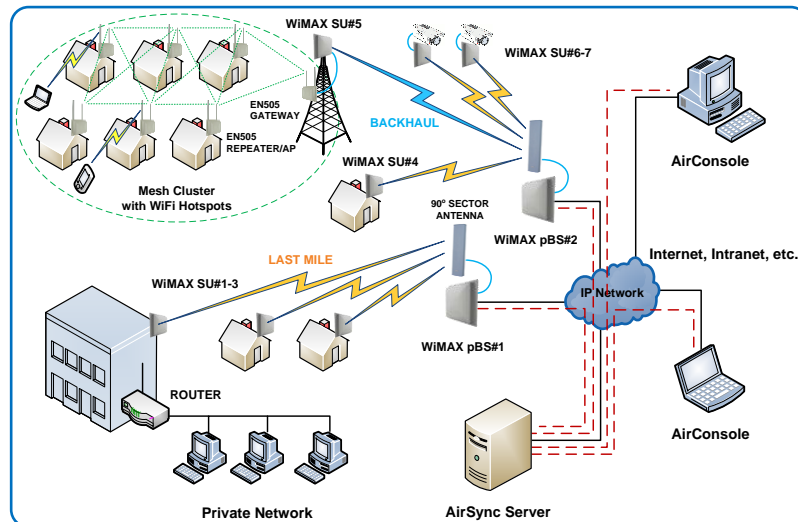
Ideal for rapid deployment and low to medium density applications including rural and enterprise networks, Tranzeo WiMAX products are designed for the lowest total cost of ownership (TCO) and superior performance, offering incredible ROI.

Designed and manufactured at Tranzeo's leading edge engineering facilities and state-of-the-art manufacturing in British Columbia, Canada resulting in the highest quality and lowest price. The **TR-WMX-5.8-pB-PlusG** is RUS accepted with "Buy American" status, making it qualified for stimulus funding.

The ruggedized weatherproof design meets IP67 and NEMA Type 4X environmental standards, requiring minimum installation and maintenance costs in conditions ranging from -35 °C to +50 °C. The **TR-WMX-5.8-pBS-PlusG** is also backed by Tranzeo's **1-Year Parts & Labour Warranty** and unparalleled **Lifetime Technical Support** for worry-free network operation.

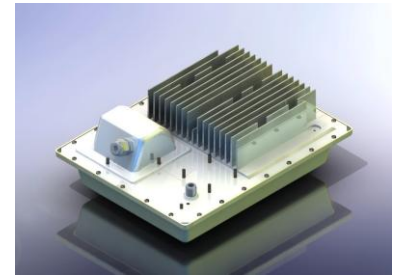
Applications

- Internet Service
- Security and Surveillance
- Community Broadband
- VoIP and IPTV Service
- Data Acquisition
- Backhaul



About Tranzeo Wireless Technologies™

Tranzeo Wireless Technologies Inc. (TSX:TZT) leads the wireless broadband industry for value, by producing high-performance wireless network equipment with a low cost of ownership and unparalleled service allowing communities and businesses to communicate without boundaries. Since the company's inception in 2000, Tranzeo's optimum cost effectiveness, premium quality and responsive support have attracted a growing number of devoted dealers and distributors worldwide.



Key Features

- IEEE 802.16-2004 Compliant
- Based on the Wavesat Chipset
- Up to +20dBm Transmit Power
- Synchronization with Built-in GPS Receiver
- Full QoS Traffic Classifier and Scheduling: UGS, rtPS, nrtPS, BE
- IEEE 802.1Q Management VLAN
- IEEE 802.1d Transparent Bridging
- AirSync™ Element Management System (EMS)
- Remote Firmware Upgrade and Software Management
- Power-over-Ethernet (PoE)
- IP67 & NEMA Type 4X Enclosure

Radio Interface and Model Information	
Standards	IEEE 802.16-2004 (802.16d)
Product Operation	Pico Base Station (LOS, NLOS, Point-to-Multipoint Cellular Architecture)
Frequency Range	5725 – 5875 MHz
Channel Bandwidths ⁽¹⁾	10 MHz
Frequency Resolution	5 MHz Steps
Duplex Method	TDD, OFDM 256-FFT
Adaptive Modulation	64-QAM, 16-QAM, QPSK, BPSK
Spectral Efficiency	5 bits/sec/Hz (64-QAM un-encoded)
Receiver Sensitivity	Burst Type 10MHz
	BPSK ½ -92
	QPSK ½ -89
	QPSK ¼ -86
	16-QAM ½ -84
	16-QAM ¼ -80
	64-QAM ¼ -75
Transmit Power	+20 dBm (max)
RF Output Dynamic Range	30 dB
Synchronization	Built-in GPS receiver with 1 pps signal for synchronization with neighboring units
Antenna Connector	N-Type Female Connector
Model No. ⁽²⁾	TR-WMX-5.8-pBS-PlusG-f/W
Networking and Management	
Management, Provisioning & Monitoring	Airsync™ Element Management System
Network Protocols	TCP/IP, UDP, NAT, DHCP Client/Server, VPN Pass-Through
Bridging	IEEE 802.1d Transparent Bridge
VLAN Support	IEEE 802.1Q Management VLAN
QoS/Scheduling	UGS, rtPS, nrtPS, BE
QoS/Traffic Classifier	ToS, Protocol, Address, Source Port, MAC address, User Priority, VLAN ID
Bandwidth Control	Asymmetric Bandwidth Control
Error Control	Concatenated Reed-Solomon Convolution Code
Ethernet	1 x 10/100Base-T with Auto-Sense (Water-Tight RJ-45)
Power Supply	
Power Consumption	15 Watts (max)
Power Supply	Power over Ethernet (PoE)
DC Adapter	24VDC/2.0A (INPUT: 120-240VAC~ 50-60Hz, 0.4A) f-Model: Fixed UL Plug (US only) W-Model: Snap-In Plugs for US, UK, and EU included
Mechanical and Environmental	
Dimensions	13.25" x 10.25" x 5.50" (337mm x 260mm x 140mm)
Weight	6.4 lbs (2.9 Kg)
Installation Hardware (included)	PoE Injector with Built-in Surge Protection, DC Adapter, Ethernet Boot Cover with Weatherproof Gasket, L-Bracket and U-Bolt for Pole Mounting, GPS Active Antenna with 3m Cable
Weather Rating	IP67 and NEMA Type 4X
Wind Load	182 N @ 100 mph and 285 N @ 125 mph
Operating Temperature	-35°C to +50°C
Compliance and Warranty	
Export Control	HTC 8517.69.0000, ECCN 5A002 ENC, ECL 1-5.A.2.A.1
Compliance & Approvals	RoHS, FCC Part 15, Industry Canada (RSS210), CEI (EMC: EN 301 489, Safety: EN 60950, Radio: EN 302 502)
Warranty	1-Year Parts and Labour

⁽¹⁾ Not all channels are approved for use in all regions. ⁽²⁾ f: FCC Model (for use in the USA only), W: World Model (subject to local regulatory requirements). Specifications are subject to change without notice. Tranzeo and the Tranzeo logo are registered trademarks of Tranzeo Wireless Technologies Inc. All other trademarks mentioned herein are the property of their respective owners.