





PMP 430 Subscriber Module (5.4GHz)

The Cambium Point-to-Multipoint (PMP) 430 Access Point and Subscriber Module is the ideal solution for developing, enhancing and extending advanced broadband networks with more than 50 Mbps of total aggregate throughput for data transfer, voice and video applications. Based on OFDM technology, the PMP 430 offers robust performance, even in near or non line-of-sight (nLOS or NLOS) conditions. Cambium Networks products combine field-proven toughness with exceptional performance, security, ease-of-use and cost effectiveness.

Because of GPS Synchronization, Access Points can be co-located on the same tower location with other Cambium PMP. Subscriber Modules can be purchased with throughputs of 4, 10, 20 or Uncapped Mbps and throughput can be enhanced to existing modules via a fixed software license.

Cambium Networks provides exceptional wireless broadband connectivity solutions. With more than 3 million modules deployed in thousands of networks around the world, Cambium solutions are proven to provide cost effective, reliable data, voice and video connectivity.

SPECIFICATIONS

PRODUCT	
MODEL NUMBER	5490SM4, 5490SM10, 5490SM20, 5490SM40
SPECTRUM	
CHANNEL SPACING	Configurable on 2.5 MHz increments for 5 MHz Channel Configurable on 5 MHz increments for 10 and 20 MHz Channels
FREQUENCY RANGE	5470-5725 MHz
CHANNEL WIDTH	5 MHz, 10 MHz or 20 MHz
INTERFACE	
PHYSICAL LAYER	OFDM 256FFT
MAC (MEDIA ACCESS CONTROL) LAYER	Cambium Proprietary
ETHERNET INTERFACE	10/100BaseT, half/full duplex, rate auto negotiated (802.3 compliant)
PROTOCOLS USED	IPv4, UDP, TCP, IP, ICMP, Telnet, SNMP, HTTP, FTP
NETWORK MANAGEMENT	HTTP, Telnet, FTP, SNMPv2c Prizm 3.3 and One Point Wireless Manager 2.2
VLAN	802.1ad (DVLAN Q-in-Q), 802.1Q with 802.1p priority, dynamic port VID
PERFORMANCE	
CYCLIC PREFIX	1/4, 1/8 or 1/16 fixed
ARQ	Yes
COLLOCATION WITH PMP 58100	Yes, 10MHz guard band required or 5MHz with 3 ft vertical required; synchronization required
COLLOCATION WITH PMP 54100	Yes, 10MHz guard band separation or 5MHz with 3 ft vertical required; synchronization required
COLLOCATION WITH PMP 52100	YES
MODULATION LEVELS (ADAPTIVE)	1X=QPSK, 2X=16QAM, 3X=64QAM
LATENCY	5 - 7 ms

SPECIFICATIONS		
FORWARD ERROR CORRECTION	3/4 Reed-Solomon block coding	
PACKETS PER SECOND	4,800	
GPS SYNCHRONIZATION	Yes	
QUALITY OF SERVICE	DiffServ QoS	
MAX. AGGREGATE THROUGHPUT PER SECTOR (@20MHZ CHANNEL)	1X: 16.5 Mbps, 2X: 32 Mbps, 3X: >50 Mbps	
MAX. AGGREGATE THROUGHPUT PER SECTOR (@10MHZ CHANNEL)	1X: 8 Mbps, 2X: 16.5Mbps, 3X: 24.5Mbps	
MAX. AGGREGATE THROUGHPUT PER SECTOR (@5 MHZ CHANNEL)	1X: 3.5 Mbps, 2X: 7 Mbps, 3X: 10.5 Mbps	
LINK BUDGET		
ANTENNA BEAM WIDTH	55° azimuth, 55° elevation (3 dB antenna pattern)	
TRANSMIT POWER	-30 to +19 dBm (to EIRP limit by region) (1dBm interval)	
ANTENNA GAIN	10 dBi	
MAXIMUM TRANSMIT POWER	19 dBm	
EIRP	30 dBm FCC, ETSI (20 MHz Channel) 27 dBm FCC, ETSI (10 MHz Channel)	
TYPICAL LOS RANGE	1X: 11 mi. (18 km), 2X: 5 mi. (8 km), 3X: 2.25 mi. (3.6 km)	
REFLECTOR GAIN	+ 15 dBi	
LENS GAIN	+ 6 dBi	
PHYSICAL		
WIND LOADING	90 lbs.	
ANTENNA CONNECTION	N/A - Integrated Antenna	
MEAN TIME BETWEEN FAILURE	> 90 Years	
ENVIRONMENTAL	IP55	
TEMPERATURE	-40°C to +55°C (-40°F to +131°F) 0% - 95% relative humidity, non-condensing	
WEIGHT	0.45kg (1 lb.)	
WIND SURVIVAL	190 km/hour (118 mi/hour)	
DIMENSIONS (HxWxD)	30 x 9 x 9 cm (11.75" x 3.4" x 3.4")	
MAXIMUM POWER CONSUMPTION	10W	
INPUT VOLTAGE	24 to 30V	
SECURITY		
ENCRYPTION	56-bit DES, 128-bit AES Optional	
CERTIFICATIONS		
CE	EN301 893 v1.6.1	
FCC ID	Z8H89FT7638	
INDUSTRY CANADA CERT	109W-5490G	

