

## Technical Description

The transmitter of the EUT is powered by host equipment. The antennas are Omni-Directional Antenna, Patch -Directional Antenna, Directional Antenna, Directional Wide Angle Antenna, Window Antenna with UFL connector. This device is an 802.11a/b/g miniPCI module for use in Proxim model Alpha-1 access points, and operates in both the 5GHz and 2.4GHz bands. The maximum data rate could be 108Mbps in turbo mode.

For more detailed instruction, please take a look at the user's manual.

FCC 15.407(c) states : The device shall automatically discontinue transmission in case of either absence of information to transmit or operational failure. These provisions are not intended to preclude the transmission of control or signaling information or the use of repetitive codes used by certain digital technologies to complete frame or burst intervals.

Applicants shall include in their application for equipment authorization a description of how this requirement is met.

Data transmission is always initiated by software, which is then pass down through the MAC, through the digital and analog baseband, and finally to the RF chip.

Several special packets (ACKs, CTS, PSpoll, etc...) are initiated by the MAC. There are the only ways the digital baseband portion will turn on the RF transmitter, which it then turns off at the end of the packet. Therefore, the transmitter will be on only while one of the aforementioned packets is being transmitted.

### Table of the power of each antenna

For 2.4GHz:

Antenna Name	Apply	modulation type	Ch.01 (dBm)	Ch.06 (dBm)	Ch.11 (dBm)
IAN-WB-OD (IAN-WB-OD-S)	FCC	11b	20.00	20.22	20.39
	FCC	11g	19.41	19.24	19.11
AOU24-OD-55-B	FCC 15.247	11b	20.00	20.22	20.39
		11g	19.41	19.24	19.11
AIN-WB-OD	FCC 15.247	11b	20.00	20.22	20.39
		11g	19.41	19.24	19.11
AIN-WB-OD-B	FCC 15.247	11b	15.09	15.36	15.67
		11g	15.12	15.29	15.83
AOU24-OD-10	FCC 15.247	11b	16.58	16.24	16.90
		11g	15.24	15.71	15.30
AOU24-DI-14	FCC 15.247	11b	11.89	11.76	11.93
		11g	9.70	9.81	9.59
AOU24-YA-1414	FCC 15.247	11b	12.03	12.24	12.60
		11g	10.55	10.46	10.70

For 5GHz:

Antenna Name	Apply	5180 (dBm)	5240 (dBm)	5260 (dBm)	5320 (dBm)	5210 (dBm)	5250 (dBm)	5290 (dBm)
IAN-WB-OD (IAN-WB-OD-S)	FCC 15.407	16.59	16.75	19.04	19.05	16.95	16.72	19.20
IAN-WB-OD (IAN-WB-OD-S)	FCC 15.247	19.23	19.20	19.64	19.17	19.39		
AIN-WB-OD	FCC 15.407	NA	NA	19.04	19.05	16.95	16.72	19.20
AIN-WB-OD	FCC 15.247	19.23	19.20	19.64	19.17	19.39		
AIN-WB-OD-B	FCC 15.407	NA	NA	15.24	15.30	NA	NA	15.11
AIN-WB-OD-B	FCC 15.247	15.38	15.27	15.13	15.04	15.10		