

American TCB
6731 Whittier Avenue, Suite C110
McLean, VA. 22101

To whom it may concern:

The enclosed documents constitute a formal submittal and application for a Class II Permissive change / Reassessment for a U-NII/DTS wireless LAN module pursuant to the following rules:

Subpart E of Part 15 of FCC Rules (CFR 47) , UNII Devices
RSS-210, Issue 7, June 2007, “Low-power Licence-exempt Radiocommunication Devices (All Frequency Bands): Category I Equipment”

The module was approved under three separate rule parts – DTS (2.4GHz and 5.7GHz bands), NII (5250-5250, 5250-5350 and 5470-5725 MHz bands) and JBP (PC peripheral). The proposed change is to add a new antenna, part number WNC 81.EBC15.102 Vader T-Type. The new antenna is of the same type (PIFA) as one of the previously approved antennas but has higher gain in one of the products operating bands, as shown below.

Antenna Name and model	Type	Antenna Gain				Comments
		2.4GHz	5.2GHz	5.5GHz	5.7GHz	
Ethertronics MPC1-8	Magnetic Dipole	3.0	5.0	5.0	5.0	Original Antenna
Universe Technology PIFA	PIFA	3.24	3.73	4.77	4.97	Original Antenna
WNC 81.EBC15.102 Vader T-Type	PIFA	2.93	4.7	4.69	2.68	Proposed new antenna

As the new antenna has a higher gain in the 5150 – 5350 MHz band and lower gain in all other bands when compared to the original PIFA type antenna, only the radiated emissions for operation in the 5150 – 5250 MHz and 5250 – 5350 MHz bands have been re-assessed. The rule parts associated with the other operating bands and the digital device are considered covered by the previous testing. As the output power has not been changed the original antenna port conducted measurements for power, power spectral density, bandwidth, peak excursion and spurious emissions remain valid.

As this is a request for a Permissive Change / Reassessment the only documents being uploaded are the application forms, test report, rf exposure calculation and antenna information. All other documents originally uploaded remain unchanged. American TCB handled the original Industry Canada assessment and should have all the relevant documents on file covering operation in the other bands. Please advise if any of the previous documentation is required to allow you to complete this re-assessment.

Please also note that the Industry Canada application shows G7D as the emission designator to match what is listed on the REL.

Although the MPE calculation remains unchanged (the highest antenna gain in all bands is one of the original antennas - either the Universe PIFA or the Ethertronics magnetic Dipole) the calculation and RSS-102 form have been uploaded to explain that this is the case.

Elliott Laboratories, as duly authorized agent prepared this submittal. A copy of the letter of our appointment as agent is included with the application.

If there are any questions or if further information is needed, please contact Elliott Laboratories for assistance.

Sincerely,



Mark Briggs
Staff Engineer

MB/dmg