



American Telecommunications Certification Body Inc.
6731 Whittier Ave, McLean, VA 22101

July 25, 2006

RE: LG Electronics

FCC ID: BEJPDA-L12C-BT

I have a few comments on this Application. Depending on your responses, kindly understand there may be additional comments.

- 1.) The FCC ID on the label does not match the FCC ID supplied on Form 731. Please review and correct as necessary.
- 2.) The agent authorization letter authorizes Audix Corporation to act on behalf of LG Electronics in matters with respect to Certification from Compliance Certification Services. This is not correct. What is needed is a letter from LG electronics, addressed to the FCC, authorizing Audix to act on their behalf for FCC matters. Please correct.
- 3.) The uncertainty table in the Test Report is not appropriate. Please explain how there can be an uncertainty of ± 1 channel. What does this mean, especially because the channelization can change from one device to the next? [Example: Bluetooth as opposed to 802.11g]
- 4.) Please review your plots on pages 47 to 54. It appears that your transmitter was pulsing and not operating completely in CW mode. The FCC measurement procedures have always expected that a steady-state carrier would be tested and never a pulsed carrier – especially for 10Hz VBW band-edge plots in the restricted bands of 15.205. In general, good engineering practice requires that average plots should never utilize a VBW shorter than the reciprocal of the shortest pulse width. As an example, your shortest pulse shown in the Test Report is DH1. The reciprocal of this value is approximately $\sim 25,000$. Therefore the smallest VBW which should be used would correspond to about 25KHz. For this specific device the instrumentation bandwidths required to make this measurement should be 1MHz RBW / 25KHz VBW. Assuming an infinitely variable VBW is not available, the smallest VBW possible without going less than 25KHz would be desirable. Using a traditional 1/3/10 ratio bandwidth spectrum analyzer, the appropriate settings should be 1MHz RBW / 30KHz VBW. The key to this setting is to be aware during testing when small changes in VBW cause great changes in displayed amplitude. If you see a standard Bluetooth emission decrease by +30dB when using a 10 Hz VBW, then in all likelihood you are looking at an emission that may not be hopping but is still pulsing on/off. Kindly review your findings. I have confidence that the EUT will still pass, but for this case your test data provides a weak demonstration of compliance.
- 5.) The Confidentiality Request letter asks for confidential treatment of Exhibits that were not part of the filing. Please review your letter. You are only allowed to ask for confidentiality on Exhibits which are uploaded.

William H. Graff
President and Director of Engineering

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The items indicated above must be submitted before processing can continue on the above referenced application. Failure to provide the requested information may result in application termination.

Correspondence should be considered part of the permanent submission and may be viewed from the Internet after a Grant of Equipment Authorization is issued.

Please do not respond to this correspondence using the email reply button. In order for your response to be processed expeditiously, you must submit your documents through the AmericanTCB.com website. Also, please note that partial responses increase processing time and should not be submitted.

Any questions about the content of this correspondence should be directed to the sender.