

October 5, 2015

**Ex Parte**

Marlene H. Dortch, Secretary  
Federal Communications Commission  
445 12th Street SW  
Washington, DC 20554

*Re: Office of Engineering and Technology and Wireless Telecommunications Bureau  
Seek Information on Current Trends In LTE-U and LAA Technology, ET Docket  
No. 15-105*

Dear Ms. Dortch:

On October 1, 2015, Nelson Sollenberger, Vice President and Chief Technologist, Cellular Systems for Broadcom Corporation (“Broadcom”), Christopher Szymanski, Director of Global Regulatory Affairs at Broadcom, and I met with Julius Knapp, Ira Keltz, Mark Settle, and Rashmi Doshi of the Office of Engineering and Technology and Chris Helzer of the Wireless Telecommunications Bureau. In addition, on October 2, 2015, Messrs. Sollenberger and Szymanski and I met with Chairman Wheeler’s legal advisor Jessica Almond.

During these meetings, Broadcom described the important role that recognized standards bodies have played in collaborative technology development to ensure equitable co-existence and efficient use of unlicensed spectrum, particularly for broadband technologies that have the potential to use a band intensively.

With respect to the Licensed Assisted Access (“LAA”) unlicensed LTE deployment model under consideration by 3rd Generation Partnership Project (3GPP) for 3GPP Release 13, Broadcom noted that, while 3GPP is not a traditional venue for developing standards for unlicensed operation, Broadcom was nevertheless cautiously optimistic that consensus on workable co-existence solutions is possible.

With regard to LTE-U, however, Broadcom stated that the situation is far different. Here, as the record demonstrates, planned Wi-Fi/LTE-U co-existence mechanisms will not be effective, and co-existence analyses performed by LTE-U supporters to date are deeply flawed.<sup>1</sup> Importantly, Broadcom also observed that the LTE-U specification itself does not mandate any meaningful co-existence features, only requiring co-existence capabilities. This distinction is critical. It

---

<sup>1</sup> See, e.g., Comments of Broadcom Corporation, ET Docket No. 15-105 at 2-5 (filed Jun. 11, 2015); Reply Comments of Broadcom Corporation, ET Docket No. 15-105 at 1-4 (filed Jun. 26, 2015).

Ms. Marlene H. Dortch

October 5, 2015

Page 2 of 2

means that even if an individual company were to commit to deploy effective co-existence mechanisms, LTE-U equipment that fully complies with the LTE-U specification could nevertheless be manufactured and operated in a manner that executes no co-existence efforts, or insufficient efforts, thereby significantly undermining existing Wi-Fi consumers.

Pursuant to the Commission's rules, a copy of this notice is being filed electronically in the above-referenced docket. If you require any additional information please contact the undersigned.

Sincerely,

*/s/ Rob Carter*

S. Roberts Carter

cc: meeting participants