



601 Pennsylvania Ave., NW  
Suite 800  
Washington, DC 20004  
202-654-5900

March 15, 2018

***VIA ELECTRONIC FILING***

Ms. Marlene H. Dortch, Secretary  
Federal Communications Commission  
445 12th Street, S.W.  
Washington, D.C. 20554

**Re: *Ex Parte Notification***

**WT Docket No. 10-4**, *Amendment of Parts 1, 2, 22, 24, 27, 90 and 95 of the Commission's Rules to Improve Wireless Coverage Through the Use of Signal Boosters*;

**PS Docket No. 18-64**, *Location-Based Routing for Wireless 911 Calls*;

**WP Docket No. 07-100**, *Amendment of Part 90 of the Commission's Rule (Governing the 4940-4990 MHz Band)*;

**GN Docket No. 17-258**, *Promoting Investment in the 3550-3700 MHz Band*; and

**GN Docket No. 14-177**, *Use of Spectrum Bands Above 24 GHz for Mobile Radio Services*

Dear Ms. Dortch:

On March 14<sup>th</sup>, I spoke by telephone with Erin McGrath, Legal Advisor to Commissioner O'Rielly, regarding the above-referenced proceedings.

*Signal Boosters*

I noted that T-Mobile supports the Commission's efforts to allow greater use of Provider-Specific signal boosters so that a range of entities, and not just individuals, can benefit from the enhanced signal strength that those devices may provide. The Commission's rules offer protections against the operation of Provider-Specific signal boosters that may otherwise potentially harm a provider's network operations. However, T-Mobile remains concerned that those protections may not be effective for the expanded use of Wideband Consumer Signal boosters and may present a greater interference risk to carrier systems. We look forward to responding to the Second Further Notice of Proposed Rulemaking that the Commission plans to adopt.

### *Location-Based Routing for Wireless 911 Calls*

I stated that T-Mobile strongly supports public safety and the Commission's efforts to ensure that 911 calls are effectively routed to Public Safety Answering Points. The draft Notice of Inquiry appropriately seeks additional information regarding the current and projected state of location-based technologies and carriers' abilities to timely incorporate new technical solutions into their networks. Altering the initial routing of wireless calls will require a significant change to how devices and the network operate and will require modifications to standards and equipment. Nevertheless, T-Mobile looks forward to working with the Commission, considering these potential challenges, to evaluate options for ensuring the most accurate routing of 911 calls.

### *Use of the 4.9 GHz Band*

I observed that T-Mobile strongly supports ensuring that first responders have the spectrum resources required to perform their critical missions. Like the Commission, T-Mobile recognizes that the 4.9 GHz band has been historically underutilized. We therefore support Commission proposals in the draft *Sixth Further Notice of Proposed Rulemaking* to evaluate how this spectrum can be available to others, including, potentially, commercial wireless providers, while still ensuring that public safety entities have access to reliable communications.

### *3.5 GHz Band*

I reiterated T-Mobile's continued interest in this proceeding and urged the Commission to adopt rules that will promote investment in the 3.5 GHz band by making it attractive for Fifth Generation Wireless ("5G") networks. The current rules governing Priority Access Licenses ("PALs") will limit the spectrum's utility and will depress the band's use by licensed network providers, which, in turn, will make the entire 3.5 GHz ecosystem less robust, to the detriment of consumers. One way the Commission can make the use of PALs more attractive is to eliminate the engineering challenges that will be created by the use of too-small geographic license areas.<sup>1/</sup> T-Mobile has suggested that PALs be issued for Partial Economic Areas, which itself is a compromise between larger and smaller licensed areas. Nevertheless, T-Mobile recognizes that there are competing interests with respect to the appropriate license size for the band, particularly in rural areas. Accordingly, the Commission may wish to consider the use of Cellular Market Areas to license the band as a compromise in some or all locations.

### *Millimeter Wave Auctions*

Finally, I noted that Chairman Pai recently announced that the Commission plans to begin auctions for millimeter wave spectrum – an action T-Mobile strongly supports.<sup>2/</sup> I observed, however, that the public interest can be even better served by the Commission moving quickly to auction *all* of the millimeter wave bands allocated for terrestrial mobile use in the *Spectrum Frontiers* proceeding, including multiple (if not all) of those bands together in the initial

---

<sup>1/</sup> Comments of T-Mobile USA, Inc., GN Docket No. 17-258, at 9 (filed Dec. 28, 2017).

<sup>2/</sup> Ajit Pai, Chairman, Fed. Comm. Comm'n, Remarks at the Mobile World Congress in Barcelona, Spain (Feb. 26, 2018), [https://apps.fcc.gov/edocs\\_public/attachmatch/DOC-343646A1.pdf](https://apps.fcc.gov/edocs_public/attachmatch/DOC-343646A1.pdf).

millimeter wave auction. These include the 24 GHz, 28 GHz, 37 GHz, 39 GHz, and 47 GHz bands. T-Mobile is well positioned to launch 5G services in high-band spectrum, but the Commission must act soon to make this additional spectrum available to ensure that consumer expectations can be met. Auctioning all of the spectrum together is particularly important to promoting more competition among wireless providers – including those that have already obtained millimeter wave spectrum – and to hastening American leadership on 5G services for the benefit of American consumers and industries. Much of the 28 GHz and 39 GHz bands is already licensed.<sup>3/</sup> Auctioning more than just the 28 GHz band will, among other benefits, draw more participants and capital, resulting in greater benefits to the U.S. Treasury and the American taxpayer, and in a faster, broader, and more competitive roll out of 5G services.

\*

\*

\*

Pursuant to Section 1.1206(b)(2) of the Commission’s rules, an electronic copy of this letter is being filed in the above-referenced dockets and a copy is being provided to Ms. McGrath. Please direct any questions regarding this filing to me.

Respectfully submitted,

/s/ Steve B. Sharkey

Steve B. Sharkey

Vice President, Government Affairs  
Technology and Engineering Policy

cc: (electronically)  
Erin McGrath

---

<sup>3/</sup> See *Application of AT&T Mobility Spectrum LLC and FiberTower Corporation For Consent to Transfer Control of 39 GHz Licenses*, Memorandum Opinion and Order, DA 18-125 (rel. Feb. 8, 2018) (approving transfer of 39 GHz licenses from FiberTower to AT&T); *Application of Verizon Communications Inc. and Straight Path Communications, Inc. for Consent to Transfer Control of Local Multipoint Distribution Service, 39 GHz, Common Carrier Point-to-Point Microwave, and 3650-3700 MHz Service Licenses*, Memorandum Opinion and Order, 33 FCC Rcd 188 (2018) (approving transfer of 28 GHz and 39 GHz licenses from Straight Path to Verizon); *Application of Celco Partnership d/b/a Verizon Wireless and XO Holdings For Consent to Transfer Control of Local Multipoint Distribution Service and 39 GHz Licenses*, Memorandum Opinion and Order, 32 FCC Rcd 10125 (2017) (approving the transfer of 28 GHz and 39 GHz licenses from XO Holdings to Verizon).