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November 18, 2019

**Via Electronic Filing**

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

**Re: *Wireless E911 Location Accuracy Requirements (PS Docket No. 07-114)***

Dear Ms. Dortch:

Google LLC appreciates NENA's thoughtful filing submitted on November 15, 2019, in which it raises some concerns about our proposal to modify the Commission's *Draft Order*<sup>1</sup> to include a floor label alternative in the vertical location requirement. Google's November 15 filing in this proceeding addresses NENA's concerns. Furthermore, contrary to Polaris's suggestion in a separate filing, there is no reason to delay the public safety benefits of including a provision for floor labeling in the Commission's final rule.<sup>2</sup>

First, NENA expresses concern that Google's proposal would not result in a "handset's location, including z-axis, [being] delivered to the 9-1-1 system *in its original format*."<sup>3</sup> This concern relates to our letter dated November 8, 2019,<sup>4</sup> and was addressed in our submission of November 15, 2019 (filed the same day as NENA's letter).<sup>5</sup> Google's November 15 filing identifies an option under which the Commission could provide that solutions selected by carriers to demonstrate their satisfaction of the 80% standard set out in the rule *must* provide

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<sup>1</sup> See *In the Matter of Wireless E911 Location Accuracy Requirements*, Draft Fifth Report and Order and Fifth Further Notice of Proposed Rulemaking, PS Docket No. 07-114, FCC-CIRC1911-02 (rel. Oct. 29, 2019) (*Draft Order*).

<sup>2</sup> See Letter from Ian D. Volner and Meryl E. Bartlett, Counsel to Polaris Wireless, Inc., to Marlene H. Dortch, Sec'y, FCC, in PS Docket No. 07-114 at 2 (filed Nov. 15, 2019) (*Polaris Letter*).

<sup>3</sup> See Letter from Daniel Henry, Dir. of Gov't Affairs, NENA, and Brandon Abley, Dir. of Technical Issues, NENA, to Marlene H. Dortch, Sec'y, FCC, in PS Docket No. 07-114 at 1 (filed Nov. 15, 2019) (emphasis added) (*NENA Letter*).

<sup>4</sup> See Letter from Megan Anne Stull, Counsel, Google LLC, to Marlene H. Dortch, Sec'y, FCC, in PS Docket No. 07-114 at 2 (filed Nov. 8, 2019).

<sup>5</sup> See Letter from Megan Anne Stull, Counsel, Google LLC, to Marlene H. Dortch, Sec'y, FCC, in PS Docket No. 07-114 at 1 (filed Nov. 15, 2019) (*Google November 15 Letter*).

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height above ellipsoid (HAE) and *may* provide a floor label.<sup>6</sup> If both HAE and floor label are provided for a given call, the information could be accompanied by a designation of which data should be considered in testing the carrier's compliance with the 80% requirement. This approach ensures delivery of the HAE data required by the Commission's draft rule, and further offers the possibility of *additional* floor level information.

Second, NENA is mistaken in suggesting that floor label information necessarily would be derived from converting HAE to height above ground level.<sup>7</sup> For Android Emergency Location Services, for example, floor labeling information provided to public safety would be calculated separately, not simply converted from HAE. Sources of error related to terrain models, as referenced by NENA, therefore are not a concern.<sup>8</sup>

Finally, Polaris has asserted that the Commission should defer consideration of Google's floor-labeling proposal to a further notice of proposed rulemaking.<sup>9</sup> As Google has explained, however, including a floor label option in the rule is important to ensuring continued investment into floor-identifying geolocation technologies.<sup>10</sup> Doing so at this time will provide first responders access to a larger breadth of actionable information sooner, and therefore advance the Commission's public safety objectives.

Please do not hesitate to contact me with any questions concerning this filing.

Respectfully submitted,



Megan Anne Stull  
Counsel  
Google LLC

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<sup>6</sup> *See id.*

<sup>7</sup> *NENA Letter* at 1-2.

<sup>8</sup> *Cf. Google November 15 Letter* at 2 (noting that "Google has found terrain elevation data to be particularly challenging because terrain elevation models from different sources often disagree by several meters.").

<sup>9</sup> *Polaris Letter* at 2.

<sup>10</sup> *Google November 15 Letter* at 1.