

**Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, DC 20554**

In the Matter of

Amending the Definition of Interconnected
VoIP Service in Section 9.3 of the
Commission's Rules

GN Docket No. 11-117

Wireless E911 Location Accuracy
Requirements

PS Docket No. 07-114

E911 Requirements for IP-Enabled Service
Providers

WC Docket No. 05-196

COMMENTS OF VERIZON AND VERIZON WIRELESS

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Verizon and Verizon Wireless¹ support the Commission's objectives of improving the accuracy and availability of location information for 911 callers using Voice over Internet Protocol ("VoIP") and wireless services. In this proceeding,² the Commission should: (1) ensure that any new E911 requirements for outbound-only VoIP providers are consistent with the New and Emerging Technologies 911 Improvement Act of 2008 ("NET 911 Act")³ and limited to services that enable calling to substantially all domestic U.S. North American Numbering Plan

¹ In addition to Verizon Wireless, the Verizon companies participating in this filing are the regulated, wholly owned subsidiaries of Verizon Communications Inc.

² See *Amending the Definition of Interconnected VoIP Service in Section 9.3 of the Commission's Rules, Wireless E911 Location Accuracy Requirements, and E911 Requirements for IP-Enabled Service Providers*, Notice of Proposed Rulemaking, Third Report and Order, and Second Further Notice of Proposed Rulemaking, 26 FCC Rcd 10074 (2011) ("*NPRM*" or "*Third Report and Order*").

³ New and Emerging Technologies 911 Improvement Act of 2008, Pub. L. 110-283, 122 Stat. 2620 (codified at 47 U.S.C. § 615a-1(a)), amending the Wireless Communications and Public Safety Act of 1999, Pub. L. 106-81, 113 Stat. 1286 (1999).

(“NANP”) numbers; (2) allow the Communications Security, Reliability, and Interoperability Council (“CSRIC”) and standards bodies to continue to lead the migration towards automatic location information (“ALI”) methods for VoIP, without a regulatory mandate at this time and without imposing regulation on broadband providers; (3) defer consideration of indoor accuracy matters until the CSRIC and industry standards bodies complete their efforts; and (4) refrain from applying unnecessary privacy restrictions and consumer disclosure requirements that could have the unintended effect of increasing customer confusion. In all events, any new requirements must be consistent with the Commission’s statutory authority under the NET 911 Act and account for technical and economic feasibility considerations.

INTRODUCTION AND SUMMARY

Verizon is committed to the safety and security of its customers and is an industry leader in developing, testing and deploying E911 services and location technologies. Verizon Wireless has deployed and maintains E911 Phase I and II service to more than 4000 PSAPs nationwide at a cost of several hundred million dollars, and has sold tens of millions of Assisted-GPS (“A-GPS”) capable handsets to its subscribers. Verizon Wireless is committed to deploying A-GPS capability throughout its 4G Long Term Evolution (“LTE”) network and, eventually, to voice-capable LTE handsets. For many of its wireline interconnected VoIP customers, including its FiOS Digital Voice residential end users, Verizon already employs the ALI database functionality used by local exchange carriers, rather than the customer-dependent Registered Location determination method. Verizon is also a market leader in developing IP-enabled platforms for Next Generation 911 (“NG911”) services. Verizon is a long-time participant in the NRIC’s and CSRIC’s efforts to address E911 location accuracy technologies and testing, and

will remain active in the CSRIC's forthcoming efforts to address the location accuracy issues raised in the *NPRM*.

Verizon similarly shares many of the Commission's objectives in this proceeding. The Commission must ensure that its proposal to amend the definition of "interconnected VoIP" at section 9.3 of the rules to apply to outbound-only interconnected VoIP providers is consistent with the NET 911 Act, and provide sufficient time to enable newly-covered entities to deploy and, where necessary, develop standards for Registered Location and ANI capabilities. In no event should new requirements apply to VoIP services that do not enable users to dial substantially all NANP numbers in the United States, and the Commission should evaluate 911 capabilities for other VoIP services in the NG911 proceeding.

In the longer term, the Commission should support stakeholders' efforts, including efforts at CSRIC and standards bodies, to develop automatic location information ("ALI") methods for different interconnected VoIP platforms. A regulatory mandate at this time is premature, however, given the substantial standards development required for wireline and wireless services alike; further, the NET 911 Act does not authorize the Commission to impose its proposed access obligation on broadband providers and such a requirement is unnecessary. It is also unnecessary to impose new privacy regulations on broadband providers, as interconnected VoIP providers' existing CPNI obligations are sufficient to address those concerns. Broadband providers are also entitled to liability protection under the NET 911 Act's provider parity provisions when entering into commercial arrangements with interconnected VoIP providers, both as providers of "other emergency communications service" and vendors of the interconnected VoIP provider.

The Commission should not adopt requirements for the disclosure of location technology capabilities to consumers. Detailed information is proprietary and would result in customer

confusion. At most, the CSRIC should encourage consumer disclosures based on industry best practices.

Indoor accuracy test methodologies should await CSRIC recommendations, which should focus on best practice guidelines for possible inclusion in an updated OET Bulletin 71. CSRIC should not recommend (and the Commission should not adopt) mandatory indoor testing at regular intervals. Best practice guidelines that apply independent of the existing rules and guidelines for outdoor testing, and that allowing the use of representative environments, may be appropriate. In addition, leveraging existing location-based services to improve indoor accuracy would require substantial standards development and, ultimately, a standardized indoor-based technology akin to GPS. The CSRIC should work to initiate a common technical forum involving stakeholders to help develop such a solution.

The Commission has sufficient authority to adopt VoIP E911 rules under the NET 911 Act. There is no need for the Commission to exercise ancillary jurisdiction to achieve its objectives in this proceeding. Finally, modifying the rule definition will have implications for its accessibility and Truth In Caller ID regulations, and the Commission should address other regulations that reference the current definition in separate notice and comment rulemakings.

DISCUSSION

I. REGISTERED LOCATION AND AUTOMATIC NUMBER INFORMATION REQUIREMENTS SHOULD NOT APPLY TO VOIP SERVICES INCAPABLE OF DIALING SUBSTANTIALLY ALL U.S. NANP NUMBERS

The Commission seeks comment on whether to extend its Part 9 automatic number information (“ANI”) and Registered Location obligations to outbound-only interconnected VoIP

service providers.⁴ The Commission must be mindful of the scope of its authority under the NET 911 Act. The NET 911 Act authorizes the Commission to modify its regulations. Congress, however, “recognize[d] that new technologies or successor protocols may enter the marketplace” but contemplated that additional VoIP services would be covered only as they “become widely accepted and fungible substitutes for telephony ...”⁵ Not all outbound-only services will meet this high standard, and in no event should the current VoIP 911 rules apply to services that do not permit users to terminate calls to substantially all United States-based NANP telephone numbers.

For example, services that enable the VoIP user to make only *international calls* via the VoIP service, such as Skype mobile™, should not be covered by the rules at this time. Users of such international-only services do not have the same calling and service expectations as outbound-only VoIP services that enable calls to domestic U.S. numbers. Indeed, Skype mobile™ users’ 911 calls are completed via Verizon Wireless’s CMRS network. Moreover, Skype mobile™ users are notified on their handset screen that “Calls to 911 will be completed by Verizon Wireless” as well as the fact that domestic calls are handled via Verizon Wireless’s CMRS network and billed accordingly.⁶ Thus, there is no reason for services such as Skype mobile™ to be subject to new E911 requirements.

⁴ *NPRM* ¶¶ 48-58.

⁵ H.R. Rep. 110-442, at 16 (2007) (“NET 911 Act House Report”).

⁶ *See* http://support.vzw.com/clc/faqs/Features%20and%20Optional%20Services/skype_mobile.html (describing Skype mobile™).

The Commission also asks whether E911 requirements might be appropriate for other VoIP services not otherwise covered by its proposed definition.⁷ The Commission should defer consideration of whether to apply 911 and E911 requirements to other non-interconnected VoIP services, such as those enabling calls to non-NANP personal addresses or identifiers, to its NG911 rulemaking. Issues raised in the NG911 proceeding – including distinguishing between “primary” versus “secondary” media and determining which of those media (e.g. voice, text, data) a NG911 network should support,⁸ location determination and associated call routing capabilities,⁹ communications to devices with identifiers other than phone numbers,¹⁰ IP-enabled NG911 architecture and related standards,¹¹ and PSAP capabilities,¹² are all relevant to whether other non-interconnected VoIP services should fall within a NG911 regime in the first place.

The Commission must also base any requirements on realistic deployment timetables that reflect the need for any necessary standards development processes and service deployment. While some outbound-only providers may be able to employ call routing and Registered Location information delivery methods similar to two-way interconnected VoIP providers, the Commission correctly acknowledges that providing ANI call-back capability for an outbound-only service poses new challenges because there is no 10-digit NANP number associated with

⁷ See *NPRM* ¶ 58.

⁸ See *Framework for Next Generation 911 Deployment*, Notice of Inquiry, 25 FCC Rcd 17869, 17883 ¶¶ 39-40 (2010) (“*NG911 NOI*”); *Facilitating the Deployment of Text-to-911 and Other Next Generation 911 Applications*, *Framework for Next Generation 911 Deployment*, Notice of Proposed Rulemaking, PS Docket Nos. 11-153 & 10-255, FCC 11-134, ¶ 24 (rel. Sept. 22, 2011) (“*NG911 NPRM*”).

⁹ See *NG911 NOI* at 17877-78 ¶ 19, 17894 ¶ 76; *NG911 NPRM* at ¶ 56.

¹⁰ See *NG911 NOI* at 17879 ¶ 24.

¹¹ See *NG911 NOI* at 17866-88 ¶¶ 49-56; *NG911 NPRM* ¶ 77.

¹² See *NG911 NOI* at 17891 ¶ 66; *NG911 NPRM* ¶¶ 90-103. PSAPs would require NG911 IP-enabled capabilities to handle such communications.

the 911 caller.¹³ A published industry standard is required to provide outbound-only interconnected VoIP providers a common method to enable a callback number for the outbound-only interconnected VoIP device. Any newly-covered interconnected VoIP providers would need time after standards are published to implement these 911 callback capabilities. Implementation deadlines must reflect the different technical challenges for ANI and Registered Location capabilities, as well as adequate time to deploy and test services, and to educate consumers and PSAPs.

II. THE COMMISSION SHOULD SUPPORT STAKEHOLDER EFFORTS TO DEVELOP PLATFORM-APPROPRIATE AUTOMATIC LOCATION INFORMATION SOLUTIONS

Verizon generally agrees that industry should “continue working towards” ALI solutions for interconnected VoIP providers.¹⁴ Many of Verizon’s wireline VoIP services already provide ALI to PSAPs, and interconnected VoIP services that Verizon Wireless will offer via its LTE network will employ A-GPS technology to provide ALI to PSAPs. Given interconnected VoIP providers’ growth in the market, it is appropriate for the Commission and industry to reassess the current regulatory framework’s competitive and public safety implications. It is also critical, however, that 911 requirements continue to accommodate different platforms and account for technological and economic feasibility factors, and that VoIP providers themselves engage in the development of solutions. And any new requirements, if necessary, must be consistent with the Commission’s jurisdiction. The Commission should encourage and continue to monitor the industry standards processes under way, as well as the CSRIC’s examination of location

¹³ See *NPRM* ¶ 52.

¹⁴ See *id.* ¶ 69.

technologies, so it can better determine the need and extent of any new requirements and seek further comment as standards- and consensus-driven solutions emerge.

A. Different VoIP Technologies Will Warrant Different Solutions and Timetables

The Commission has appropriately declined to propose specific ALI or other technical requirements for interconnected VoIP providers in this *NPRM*, and should maintain this approach should it consider new requirements at a later date. In the NET 911 Act, Congress expressly provided that nothing in that legislation is to “be construed to permit the Commission to issue regulations that require or impose a specific technology or technological standard.”¹⁵ Congress also required that the Commission’s E911 regulations account for “changes in the market or technology,” and the NET 911 Act House Report further instructed that:

The Commission should take into account technical feasibility as it implements the provisions of [the NET 911 Act], particularly for nascent technologies such as mobile VoIP service.... As mobile VoIP develops into a full-fledged, widely-used service, providers should strive to use E911 technologies *that comply with the same accuracy standards as wireless services*.¹⁶

The House Committee issued this instruction concurrently with ratifying the Part 9 Registered Location requirements. The NET 911 Act’s legislative history thus confirms that different location accuracy solutions could be employed for different service platforms as circumstances warrant.

Further, the Commission’s own experience implementing E911 rules counsels against imposing uniform technical requirements. The original wireless Phase II accuracy requirements,

¹⁵ 47 U.S.C. § 615a(e)(1). The NET 911 Act’s legislative history clarifies that “[t]he Commission may ... adopt technology-neutral, performance-based standards or requirements.” See NET 911 Act House Report at 15.

¹⁶ NET 911 Act, § 101; Wireless 911 Act § 6(c)(3) (codified at 47 U.S.C. 615a-1(c)(3)); NET 911 Act House Report at 14 (emphasis added).

for example, required flash-cut network-wide implementation in a manner that did not accommodate the highly accurate (and now predominant) handset-based A-GPS solutions then under development, and the Commission was compelled to modify its rules just three years later.¹⁷ The Commission should ensure that its policies here do not similarly bind interconnected VoIP providers to a particular location solution that is inappropriate for service providers' technologies and consumers' needs and expectations.

Consistent with this objective, the Commission should ensure that E911 interconnected VoIP providers have the flexibility to employ ALI technologies that comport with their networks. For example, as many parties commented on the earlier *Notice of Inquiry* in this proceeding¹⁸ such a framework would expressly permit a provider of mobile or nomadic VoIP services to employ an A-GPS or other dynamic solution that generates the 911 caller's geographic coordinates in real time.¹⁹ Other VoIP technologies may be able to generate a civic/MSAG address recorded at the time of installation or subscription. The rulemaking record may also warrant differences in the implementation and accuracy and reliability requirements for mobile interconnected VoIP.

¹⁷ *Revision of the Commission's Rules to Ensure Compatibility with Enhanced 911 Emergency Calling Systems*, First Report and Order and Further Notice of Proposed Rulemaking, 11 FCC Rcd 18676, 18711 ¶ 68 (1996) (“*Wireless E911 First Report and Order*”); *Revision of the Commission's Rules to Ensure Compatibility with Enhanced 911 Emergency Calling Systems*, Third Report and Order, 14 FCC Rcd 17388, 17417-23 ¶¶ 66-77 (1999), *modified on recon.*, Fourth Memorandum Opinion and Order, 15 FCC Rcd 17442 (2000).

¹⁸ *See Wireless E911 Location Accuracy Requirements; E911 Requirements for IP-Enabled Service Providers*, Further Notice of Proposed Rulemaking and Notice of Inquiry, 25 FCC Rcd. 18957 (2010).

¹⁹ *See NPRM* ¶ 67. As noted above, such an approach is arguably required under the NET 911 Act. *See supra* note 16 (citing NET 911 Act House Report at 14).

B. The NET 911 Act Does Not Authorize the Proposed Network Access Requirement for Broadband Providers, and Such Regulation Is Unnecessary

The Commission posits that where an over-the-top (“OTT”) interconnected VoIP service is involved, “the most efficient and accurate ALI solution may require that both the broadband provider and the [OTT] VoIP provider play a part.”²⁰ Nothing in the NET 911 Act or its legislative history, however, authorizes the Commission’s proposed access obligation for broadband providers. In any event, such a requirement is unnecessary and could have the unintended effect of delaying E911 deployment. The Internet’s open access environment and broadband providers’ own business incentives will facilitate commercial agreements, without the need for imposing a new regulatory obligation on broadband services.

1. *The NET 911 Act’s Access Requirements Only Apply to 911 Infrastructure Capabilities*

The Commission seeks comment on whether to require that a broadband provider “be capable of providing location information regarding the access point being used by the [OTT] device or application, using industry-standard protocols on commercially reasonable and non-discriminatory terms.”²¹ Interconnected VoIP providers’ rights of access, if any, to location information via a broadband provider’s services must be consistent with the NET 911 Act. Under the NET 911 Act, an interconnected VoIP provider “that seeks capabilities to provide 9-1-1 and enhanced 9-1-1 service from an entity with ownership or control over such capabilities” has “a right of access to such capabilities, including interconnection, to provide 9-1-1 and enhanced 9-1-1 service on the same rates, terms, and conditions that are provided to a” CMRS

²⁰ See *NPRM* ¶ 72.

²¹ *Id.* ¶ 72.

provider.²² Similarly, where a particular capability is “not required to be made available to a [CMRS] provider” but the Commission determines that the capability is “necessary for [the interconnected VOIP provider to comply with its] E911 obligations, that capability must “be available at the same rates, terms, and conditions as would apply if such capabilities were made available to a [CMRS] provider.”²³ Thus, in order to impose its proposed access obligation on broadband providers, the Commission must find that a broadband provider is an “entity” covered by the NET 911 Act, and that providing location information to the interconnected VoIP provider is a “capability” for that purpose as well.

Neither “entity” nor “capability” is defined in the NET 911 Act. It is plain from the legislative history, however, that the “capabilities” to which interconnected VoIP providers’ have access rights only includes network components used for 911 call transmission, deliver and completion, and only entities with such capabilities are covered. The legislative history reflects that Congress was principally concerned with fixing perceived legal gaps left by the Commission’s 2005 Order imposing VoIP 911 obligations²⁴ and the Wireless 911 Act, neither of which addressed VoIP providers’ interconnection rights to “the emergency services infrastructure” or “911 infrastructure” needed to complete 911 calls.²⁵ While the legislative history indicates that the term “entity” should be interpreted broadly, this is to ensure that “critical components of the 911 infrastructure” under the control of various entities are covered, including entities otherwise exempt from regulation such as the non-LEC third party service

²² 47 U.S.C. § 615a-1(b) (emphasis added).

²³ See *id.* § 615a-1(c)(1)(C).

²⁴ See *IP-Enabled Services; E911 Requirements for IP-Enabled Service Providers*, First Report and Order and Notice of Proposed Rulemaking, 20 FCC Rcd 10245 (2005) (“*VoIP 911 Order*”), *aff’d sub nom. Nuvio Corp. v. FCC*, 473 F.3d 302 (D.C. Cir. 2007).

²⁵ See NET 911 Act House Report at 6.

providers on which CMRS and interconnected VoIP providers rely.²⁶ The term “911 infrastructure,” in turn, is limited to those components “needed to transmit, deliver, and complete 911 and E-911 calls and associated E-911 information.”²⁷ Moreover, neither the statute nor the legislative history suggests that the Commission may require a service provider to create an entirely *new* capability for interconnected VoIP providers.

The NET 911 Act thus limits interconnected VoIP providers’ access rights to 911 infrastructure (i.e. network) components used for 911 call transmission, delivery and completion that are already used to provide service; it does not extend to device- or application-level capabilities, or to location-determination technologies, nor does it compel service providers to create new capabilities where none exist. Consistent with the NET 911 Act, the Commission itself has defined the covered “capabilities” in relation to elements of the wireline and wireless “local architecture” transmission and service delivery components associated with 911 calling.²⁸ The Commission’s action largely echoes the legislative history, which describes various “components” of the 911 infrastructure involved in the transmission and delivery of 911 calls and E911 data.²⁹ In contrast, the Commission’s proposed access obligation would require that the interconnected VoIP provider have access beyond the “911 infrastructure” to the level of the broadband consumer’s device or device-level application, where the location generating

²⁶ See NET 911 Act House Report at 14 (emphasis added); see also *Implementation of the NET 911 Improvement Act of 2008*, 23 FCC Rcd 15884, 15896-97 ¶ 29 (2008) (“*NET 911 Act Order*”).

²⁷ See NET 911 Act House Report at 14.

²⁸ See *NET 911 Act Order*, at 15896 ¶ 27 (describing the capabilities and elements “in a typical local architecture”); *id.* at 15887-88 ¶¶ 6-13 (“describing the nation’s 911 network architecture” for wireline and wireless 911/E911 service); NET 911 Act House Report at 6, 13 (NET 911 Act gives “access to the 911 infrastructure”).

²⁹ See NET 911 Act House Report at 14.

capability and the OTT provider's software or application likely resides, and to other ALI-generating functions. The NET 911 Act does not afford interconnected VoIP providers such a broad right of access. Similarly, the Commission in the *NET 911 Act Order* appropriately did not interpret the term "capability" to include the location capability of consumer-level devices or applications either, even though device-level GPS capabilities and other position determining equipment capabilities are integral to many CMRS providers' E911 location solutions.³⁰

Finally, broadband providers do not currently offer or maintain technology that would enable an interconnected VoIP provider to access and utilize a broadband provider's location data, yet the NET 911 Act prohibits the Commission from "impos[ing] a specific technology."³¹ This underscores that the term "capability" relates to 911 infrastructure components already in the marketplace, which would exclude the Commission's contemplated broadband provider access capability. For this reason as well, the Commission's proposed access rule could extend VoIP providers' rights well beyond what Congress intended.³²

2. *The Commission Would Give Interconnected VoIP Providers More Favorable Rights than CMRS Providers*

Even insofar as a broadband provider might offer other "capabilities" subject to the NET 911 Act, interconnected VoIP providers are not entitled to more favorable rates, terms and conditions than CMRS providers. Specifically, capabilities that are not required to be made available to CMRS providers must "be available at the same rates, terms, and conditions as would apply if such capabilities were made available to a [CMRS] provider."³³ Broadband

³⁰ See *NET 911 Act Order*, at 15896 ¶ 27.

³¹ See 47 U.S.C. § 615a-1(e)(1).

³² See *NPRM* ¶ 72.

³³ 47 U.S.C. § 615a(c)(1)(C).

providers are not required to make location or other 911 capabilities available to CMRS providers, and to the extent they were to make those capabilities available to CMRS providers at all, they would do so without any sort of overarching regulatory obligation. The statute and legislative history plainly reflects Congress’s intent that interconnected VoIP providers are able to step into the CMRS provider’s shoes – nothing more.

Broadband providers therefore are free to determine whether or not to enter into these types of access requirements without an overarching reasonableness and nondiscrimination obligation. Rather, the NET 911 Act would put broadband providers on a legal par with other 911 vendors, such as third party Mobile Positioning Center solution providers who have always offered capabilities to CMRS providers free to negotiate particular rates, terms and conditions without Commission oversight. Giving an interconnected VoIP provider a *legal right* to commercially reasonable and nondiscriminatory rates, terms and conditions, as proposed in the *NPRM*, would leave it more favorably situated than a CMRS provider, contrary to the NET 911 Act.

3. The Marketplace and Technology do Not Necessitate Imposing an Access Obligation on the Broadband Provider

Finally, a capability subject to the NET 911 Act must be “*necessary* for the [interconnected VoIP] provider to provide E911 service,” and the Commission’s new proposed access requirement, even if a covered “capability” in the first place, must be “*necessitated by* changes in the market or technology”³⁴ It is premature to conclude that any particular capability is “necessary” for interconnected VoIP providers given the nascency of standards

³⁴ *Id.* §§ 615a(c)(1)(C), 615a(c)(3) (emphasis added).

development processes and, in any event, the Commission’s proposed framework is not “necessitated by” marketplace or technology changes at this time.

As discussed below, forthcoming industry standards efforts may give interconnected VoIP providers the technical wherewithal to use location information for emergency calling purposes. Verizon also anticipates that the Internet’s open environment will facilitate mutually beneficial commercial arrangements, particularly given that broadband providers have incentives to promote use of their broadband networks in order to recoup the deployment costs incurred in a competitive market environment. Nor are there anticompetitive incentives for broadband providers *not* to enter into commercial agreements, which present broadband providers with new opportunities to monetize their innovative services. For these reasons, neither the market nor technology necessitates the Commission’s proposed access requirement.

Moreover, such an approach would have detrimental public policy implications. Imposing potentially costly new requirements on network providers will undermine the Commission’s objective of promoting deployment of new IP-enabled and other broadband networks and services, and ultimately increase the costs of those services to consumers. The Commission should also maximize interconnected VoIP providers’ incentive to participate in standards development efforts and expedite their E911 deployment efforts. Shifting regulatory responsibilities from the interconnected VoIP provider, however, risks embroiling the Commission in disputes in the standards process and over the reasonableness of the broadband provider’s charges and practices – all at the expense of timely deployment.³⁵ Also, giving *every*

³⁵ The Commission imposed E911 deployment costs and responsibilities exclusively on wireless carriers, rather than imposing joint responsibilities or conditions on other E911 stakeholders, in large part to avoid disputes over regulatory obligations that might delay E911 deployment and because of wireless carriers’ legal authority to recover their costs through largely unregulated

interconnected VoIP provider a blanket right to access a broadband provider's location capabilities, irrespective of resources and capabilities, will undermine interconnected VoIP providers' incentives to invest in and develop new technologies, and potentially undermine broadband providers' incentive to migrate to newer, more innovative location solutions out of concern for compliance implications.

C. Significant Standards, Solution and Product Development at the Network, Device and Application Level, Are Required to Ensure that Compliance is Technically Feasible

At a minimum, any new E911 accuracy obligations for interconnected VoIP services must be technically and economically feasible in order to pass muster under the Administrative Procedure Act.³⁶ Among other things, implementation timeframes must account for (1) the necessary standards development efforts, (2) the subsequent product development needed to incorporate the standard into networks, devices and applications, (3) technically and economically reasonable deployment periods, and (4) PSAPs' capability to handle the data in the first instance. ATIS recently initiated efforts to begin addressing these issues, and Verizon expects that other standards bodies will follow suit, but significant work remains. Because the first step – standards development – is a necessary prerequisite for the subsequent measures, the

rates. *See Revision of the Commission's Rules To Ensure Compatibility with Enhanced 911 Emergency Calling Systems*, Second Memorandum Opinion and Order, 14 FCC Rcd 20850, 20870-73 ¶¶ 49-55 (1999), *aff'd sub. nom. United States Cellular Corp. v. FCC*, 254 F.3d 78 (D.C. Cir. 2001); *see also Revision of the Commission's Rules To Ensure Compatibility with Enhanced 911 Emergency Calling Systems; Request of King County, Washington*, Order on Reconsideration, 17 FCC Rcd 14789 (2002) (finding that establishing a bright line for allocating costs between wireless carriers and PSAPs, at the input to the selective router “is consistent with our objectives in enacting section 20.18, namely, the rapid and ubiquitous deployment of wireless E911 capabilities.”).

³⁶ *See Nuvio Corp. v. FCC*, 473 F.3d at 303 (adequate consideration of “the technical and economic feasibility of” interconnected VoIP E911 deadlines was “made necessary by the bar against arbitrary and capricious decision-making”).

Commission should defer consideration of new requirements until the outcome of those efforts, as well as the CSRIC's examination of commercial location services, are completed. This will enable stakeholders to better understand the implications for deployment to the public and provide the Commission with a more sound record basis on which to determine the necessity, if any, for new requirements.

1. *Threshold Standards and Capabilities Requirements*

The Commission seeks comment on the potential costs and technology-related challenges involved in extending ALI requirements to interconnected VoIP services.³⁷ While the necessary technical and network changes and related costs are difficult to identify without a published industry standard, any standard would have to address network *and* handset capabilities, and address a number of important interfacing capabilities simply to ensure that 911 calls are appropriately routed:

- The broadband and interconnected VoIP provider alike would likely have to interact with the end user VoIP device to determine a location with sufficient accuracy to enable routing the emergency call to the correct PSAP serving that area.³⁸
- Broadband providers would also need to provide a means to identify the originating network end point and the physical location of the device associated with that network end point. This might be accomplished interacting with Location Information Server ("LIS") through use of a Wire Map for non-IMS-based networks.
- There would be a need to provide associated support systems for updating and administering the LIS (where a LIS is needed).

³⁷ See *NPRM* ¶¶ 73, 75.

³⁸ The Internet Engineering Task Force ("IETF")-based HTTP-Enabled Location Delivery ("HELD") protocol for location acquisition has potential with respect to fixed broadband services. For mobile and nomadic devices, it might also prove possible to use GPS- or A-GPS-derived information to determine the device location.

An OTT interconnected VoIP provider today can use various standards to interface with either the broadband provider-hosted (*e.g.* A-GPS) or third party-hosted location determination service, but for various commercial, non-emergency purposes. These include the IETF-based HELD and SIP interfaces,³⁹ and the Open Mobile Alliance (“OMA”) MLP and LOCSIP interfaces, although further standards development in 3GPP and other accredited standards bodies is currently under way.⁴⁰ Using a third party option for 911 might minimize the impact on and cost to the broadband provider, but if the broadband provider’s solution is used it will likely incur costs that will require compensation from the cost-causing OTT interconnected VoIP provider. Different standards will also apply to different platforms, so the publication of one 911-related standard for one class of service providers and manufacturers will not necessarily enable others to begin product development and service deployment. Importantly, both end user devices *and* applications must function with the desired protocol.

2. Wireline-Based Services

For wireline-based services, carriers would need to ensure that broadband networks, OTT software, applications and user devices could accommodate the new protocols, and to provide the LIS function described above to enable wireline devices to derive the calling party location. Network signaling would need to pass the location to a 911 routing function to identify the target

³⁹ ATIS’s Technical Report ATIS-0500012 (<http://www.atis.org/docstore/product.aspx?id=22766>) covering Location Acquisition lists a number of protocols that could potentially serve to provide location information to subscriber devices: DHCP, LLPD-MED, HELD, RELO, LREP-SIP, and LCP.

⁴⁰ See 3GPP TS 22.101, Technical Specification Group Services and System Aspects; *Service aspects; Service principles*, <http://www.3gpp.org/ftp/Specs/html-info/22101.htm>. ATIS has already announced its intention to create an Issue Statement with regard to E911 location accuracy for VoIP services, and ATIS members will work on a draft of this document at a forthcoming meeting in early October. The Issue Statement is the first formal step in ATIS’s processes that, in this case, will develop a standard or a Technical Report, as appropriate, that will address the technical requirements necessary for ALI capability.

PSAP to receive the call. (For example, providers might be able to use GPS-derived location information in some cases for routing purposes.) Stakeholders would also need to create or augment operations procedures, interconnection agreements and Service Level Agreements among affected broadband providers and VoIP service providers, as well as other parties involved with the service, to ensure that the location information is transmitted accurately and reliably.

3. *Mobile Broadband Providers and Commercial LBS*

The Commission specifically inquires about the extent to which mobile broadband providers can leverage commercial LBS technologies for 911 purposes.⁴¹ Verizon and other stakeholders will examine these issues in the CSRIC, and before the Commission considers any rules in this area it should seek comment in a further rulemaking after the CSRIC issues its findings. For wireless services, the VoIP provider's OTT software must be able to access the location Application Programming Interface ("API") exposed by the device software. Where the device software exposes the location API, Operating System- or platform vendor-specific measures would be necessary to enable broadband and interconnected VoIP providers to leverage existing commercial LBS solutions. Such an approach potentially could enable the OTT provider software to obtain commercial LBS location information that it could use for emergency dispatch purposes, including locations provided solely by third party vendors.

Commercial LBS technologies, including Wi-Fi based technologies, potentially could serve as a supplement to A-GPS, particularly for indoor areas, and Verizon Wireless evaluates these emerging and evolving technologies on an ongoing basis. As with newly-covered VoIP services and ALI capability generally, industry standards are needed before commercial LBS

⁴¹ *NPRM* ¶ 79.

data is used for E911. Emergency services and situations present a more difficult use case than commercial LBS: a short “time to first fix” is critical in emergencies; the device must handle simultaneous voice and data communications; and as many commercial LBS services are “MS-based,” not “MS-assisted,”⁴² a method is needed to deliver location data that resides solely in the handset – *not* in the broadband provider’s network – to the PSAP. These capabilities would require significant changes to the wireless network and handsets.

Also, not all customers subscribe to commercial LBS, and even those who do may not have the service turned on at the moment they make a 911 call. Moreover, not all handsets will support commercial LBS applications, many of which employ Wi-Fi-based services or applications. Further, in today’s open access environment, mobile broadband providers do not always play a service provider or intermediary role in the LBS products available to their customers, and broadband providers have no control over the quality of the location information provided by those third parties. For these reasons, using such LBS products for 911 purposes would require industry standards work and handset modifications.

D. It Is Unnecessary to Impose New Privacy Regulations on Broadband Providers

The Commission asks how Section 222 of the Act would apply to broadband providers if they were obligated to assist interconnected VoIP service providers in providing ALI to PSAPs.⁴³ Irrespective of whether the Commission has authority to impose such a requirement on

⁴² “MS” refers to the “Mobile Station” or device. Assisted-GPS is an example of an MS-assisted solution. In the 3G environment, commercial LBS is based on user plane technology (MS-based), whereas the A-GPS solution used for E911 is based on control plane technology (MS-assisted).

⁴³ *NPRM* ¶ 76.

broadband providers, consumers' privacy interests are already addressed through interconnected VoIP providers' existing CPNI obligations.

As a threshold matter, Section 222 and its restrictions on the disclosure of or access to location information only apply to telecommunications carriers.⁴⁴ Moreover, the Communications Act and Commission precedent require that where an entity offers both telecommunications services and information services, information derived from information services is exempt from Section 222. Specifically, CPNI itself, including "location," is defined in relation to a carrier's provision of a telecommunications service to its customer,⁴⁵ and the restrictions on "call location" at Section 222(f) relate to a "user of a *commercial mobile service*" which, in turn, is defined as a common carrier telecommunications service.⁴⁶ Broadband Internet access service, however, is an information service, not a telecommunications service, and a broadband provider's provision of ALI as the Commission has proposed would derive from the

⁴⁴ See 47 U.S.C. § 222(c)(1); *id.* § 222(f) (express prior authorization required for use, disclosure of, or access to a user's "call location information" applies "[f]or purposes of subsection (c)(1)").

⁴⁵ See *id.* § 222(h) (defining CPNI as "information that relates to the ... location ... of a telecommunications service subscribed to by any customer of a telecommunications carrier, and that is made available to the carrier by the customer *solely by virtue of the carrier-customer relationship* ...") (emphasis added). The term "location" was added to the definition concurrently with Section 222(f), thus underscoring Congress's intention that Section 222(f) be interpreted to apply only to location information that falls within the statutory CPNI definition. See H.R. Rep. No. 106-25, at 15 (1999) ("Section 222 is amended to expressly include location information in that section's definition of [CPNI] and to require user's express prior authorization before [it] can be used for commercial purposes").

⁴⁶ See 47 U.S.C. § 222(f) (imposing prior consent requirement for CPNI purposes on "call location concerning the user of a commercial mobile service (as such term is defined in section 332(d))....") (emphasis added); *id.* § 222(d)(4) permitting use of "call location information concerning the user of a commercial mobile service" as an express exemption to Section 222(c)(1)'s CPNI restrictions; *id.* § 332(c)(1) (requiring that "[a] person engaged in the provision of a service that is a commercial mobile service shall, insofar as such person is so engaged, be treated as a common carrier for purposes of this Act").

provision of an information service and be exempt from Section 222.⁴⁷ Thus, by its terms, Section 222, including Section 222(d)(4), does not apply to broadband providers and does not restrict a broadband provider's authority to share such information.⁴⁸

The Commission also asks whether it could exercise ancillary jurisdiction to require broadband providers to maintain the confidentiality of location information and whether there are other sources of authority that enable the Commission to address privacy concerns.⁴⁹ There is no need for the Commission to exercise ancillary jurisdiction here, or to speculate whether it has ancillary authority. As noted above, if rules are necessary at all then the interconnected VoIP provider alone should be obligated to provide ALI to the PSAP using location solutions procured in the commercial marketplace. Under such a framework, customers' privacy interests under Section 222 would be protected through the regulatory obligations that *already* apply to interconnected VoIP providers.

Interconnected VoIP providers are obligated to protect CPNI, including their customers' call location information, under the Commission's Part 64 rules, and Section 222(d)(4) expressly

⁴⁷ See *Implementation of the Telecommunications Act of 1996: Telecommunications Carriers' Use of Customer Proprietary Network Information and Other Customer Information*, Order, 13 FCC Rcd 12390, 12392-95 ¶¶ 2-7 (1998) ("any customer information derived from ... the customer's subscription to the carrier's information service would not be 'CPNI'" and thus "in situations where the bundling of a telecommunications with ... information services ... is permissible, a carrier may use ... the customer's subscription to a particular information service ... to market its bundled offering.").

⁴⁸ While the Commission seems to suggest that a broadband provider might need to invoke Section 222(d)(4) as a "provider of emergency services," this is inconsistent with the statute because (i) a broadband provider is not a PSAP, emergency medical service provider or other entity covered under Section 222(d)(4)(A), and (ii) the exemption from the prior disclosure requirement applies to the interconnected VoIP provider, not the emergency service provider. See 47 U.S.C. § 222(d)(4)(A) (Section 222 does not prohibit a carrier from disclosing CPNI "to provide call location information").

⁴⁹ *NPRM* ¶ 76.

authorizes an interconnected VoIP provider to disclose the call location information without the customer's prior approval for emergency service purposes.⁵⁰ Moreover, customers will be deterred from using the full capabilities of broadband providers' innovative new products and services if they are concerned that their information will not be protected. Broadband providers therefore have significant incentives to protect such information, and to notify customers of the privacy implications of over-the-top services and the circumstances in which location information is shared with third parties. Verizon Wireless, for example, already advises customers to "use caution when determining whether or not Location Information should be made available to others and [to] review any applicable third party privacy policies before providing access."⁵¹ Verizon Wireless also discloses that "[b]y enabling location settings [a customer is] permitting third party access to Location Information ... [and] authorizing Verizon Wireless to collect, use and disclose your Location Information as appropriate to provide you with any location services that you enabled."⁵² Other wireless broadband providers similarly disclose how they use and disclose customers' location information.⁵³ In light of these incentives, expanding the scope of Section 222 and the Commission's CPNI rules is unnecessary here.

⁵⁰ 47 C.F.R. § 64.2003(o).

⁵¹ http://wirelessupport.verizon.com/faqs/Wireless+Issues/wireless_location_based_services.html.

⁵² *Id.*

⁵³ *See, e.g.*, AT&T, http://www.att.com/Common/about_us/privacy_policy/print_policy.html; Sprint Nextel http://newsroom.sprint.com/article_display.cfm?article_id=1545; and T-Mobile <http://www.t-mobile.com/company/website/privacypolicy.aspx>.

E. Broadband Providers are Entitled to Liability Protection Under the NET 911 Act's Provider Parity Provisions

The Commission seeks comment on whether the NET 911 Act's amendments to the Wireless 911 Act provide adequate liability protection for interconnected VoIP and broadband providers should the Commission "extend ALI requirements to them."⁵⁴ In particular, the Commission inquires whether a broadband provider would be considered an "other emergency communications provider" entitled to protection under the statute if it were obligated to provide access point location to the interconnected VoIP provider (or to the PSAP on the interconnected VoIP provider's behalf). As discussed above, the Commission may not impose its proposed access obligation on the broadband provider, but in any case the underlying broadband provider is entitled to protection, whether as an "other emergency communications service provider" or as a vendor of the interconnected VoIP provider.

An "other emergency communications service" is defined in relevant part as "the provision of emergency information to a [PSAP] ... and may include 9-1-1 and enhanced 9-1-1 service."⁵⁵ "Enhanced 9-1-1 service," in turn, is defined in relevant part as "the delivery of 9-1-1 calls ... with [ALI], or successor or equivalent information features over the wireline E911 network ... and equivalent or successor networks and technologies."⁵⁶ A broadband provider providing such location information for 911 purposes, even voluntarily, is providing ALI either directly or indirectly to the PSAP via a successor technology. Given Congress's intent that the liability protection apply broadly, such a provider should be deemed covered by the statutory

⁵⁴ *NPRM* ¶ 77.

⁵⁵ 47 U.S.C. § 615b(8).

⁵⁶ *See id.* § 615b(10).

liability protection.⁵⁷ In addition, the current liability protection statute unequivocally applies to interconnected VoIP providers and their “vendors,” which Congress intended to be interpreted broadly and to include non-carrier entities. The Senate Report for the original Wireless 911 Act states “it is the Committee’s intent that the definition of ‘vendors’ include, *but not be limited to*, the owners of the property on which a wireless facility is situated, emergency location service providers and providers of database management.”⁵⁸ Therefore, where a covered interconnected VoIP provider enters into a commercial arrangement with an underlying broadband provider, consistent with the NET 911 Act, the broadband provider would be covered as a vendor as well.

Nevertheless, while the current Federal statute and many state laws provide important protection, the degree of immunity will vary from state to state and will remain subject to the vagaries of common law tort actions. The Wireless 911 Act and NET 911 Act’s liability provisions are closely intertwined with the Commission’s E911 rules, however, underscoring Congress’s intent that the statute’s liability protection would promote the rules’ effectiveness by facilitating nationwide deployment of Commission-authorized E911 services.⁵⁹

⁵⁷ See *id.* § 615b(9); *id.* § 615a(a) (extending protection to “[a] wireless carrier, IP-enabled voice service provider, or other emergency communications provider, and their officers, directors, employees, vendors, and agents”); S. Rep. No. 106-138, at 6 (1999) (“Wireless 911 Act Senate Report”).

⁵⁸ See Wireless 911 Act Senate Report at 6 (emphasis added).

⁵⁹ See Wireless 911 Act § 2(b) (“[t]he purpose of this Act is to encourage and facilitate the prompt deployment throughout the United States of a seamless, ubiquitous, and reliable end-to-end infrastructure for communications”); Wireless 911 Act Senate Report at 2 (in providing liability protection, “S.800 will help expedite the development of an ubiquitous, national, enhanced, emergency services network.”); NET 911 Act House Report at 6 (“H.R. 3403 would resolve issues” raised in *VoIP 911 Order* including the Commission’s prior “conclu[sion] that it lacked authority to extend the liability protections afforded to wireline and wireless 911 calls to VoIP 911 calls”).

To help ensure that Congress’s NET 911 Act and Wireless 911 Act objectives are met to the fullest extent possible, the Commission should affirm that the Wireless 911 Act’s liability protections are to be interpreted and applied broadly to include all components in an end-to-end 911 call and all entities whose networks and products are used to provide 911 and E911 service. The express purpose of the Wireless 911 Act was “to encourage and facilitate the prompt deployment throughout the United States of a seamless, ubiquitous, and reliable *end-to-end infrastructure for communications, including wireless communications*, to meet the Nation’s public safety and other communications needs.”⁶⁰ Applying the Federal liability statute to an OTT provider’s underlying broadband provider would therefore be entirely consistent with the NET 911 Act’s expansion of liability protection to include interconnected VoIP services and underlying technologies. The Commission should also reiterate that state laws and regulations (including judicial decisions) that conflict with Federal rules and policy in this area will be subject to preemption.⁶¹

III. CSRIC SHOULD ENCOURAGE CONSUMER DISCLOSURES BASED ON INDUSTRY BEST PRACTICES

The Commission seeks comment on “developing operational benchmarks to assist consumers in evaluating” carriers’ and devices’ location capabilities.⁶² The Commission should await any CSRIC recommendations, but in no event should adopt binding rules in this regard or

⁶⁰ See Wireless 911 Act § 2(b) (emphasis added).

⁶¹ *Wireless E911 First Report and Order*, at 18730 ¶ 105 (“conclud[ing] that state actions that are incompatible with the policies and rules adopted in this Order are subject to preemption.”). This is fully consistent with the NET 911 Act, which authorized the Commission to “delegate authority to *enforce the regulations issued under subsection (c)* to” certain state or local agencies. 47 U.S.C. § 615a-1(d) (emphasis added). The Commission retains exclusive authority to issue those regulations.

⁶² See *NPRM* ¶ 79.

require the disclosure of granular test data to consumers. As the Commission has appropriately recognized in the Order adopted concurrently with the *NPRM*, such detailed information is proprietary⁶³ and, in any event, is not useful for the sort of “comparison shopping” the Commission contemplates here.

Because of the public safety and customer goodwill implications, service providers already have significant incentives to ensure that their disclosures are simple, accurate and do not “over-promise” on the E911 location accuracy capabilities of their networks.⁶⁴ It is also difficult to imagine a simple solution involving detailed disclosure that could address each customer’s situation. A particular customer may reside or work in a particularly challenging RF environment, and it would be difficult (if not impossible) to convey that fact using mountains of statistics. Service providers may also need to account for other legal issues unrelated to Commission regulations in crafting their consumer disclosures. At most, the Commission should

⁶³ See *Third Report and Order* ¶ 34.

⁶⁴ Verizon Wireless already provides the following disclosures on its website:

Verizon Wireless provides enhanced location information to emergency call takers but it cannot guarantee your precise location. Customers should remember that wireless phones are radios and can react to the environment. Rain, snow, fog, falling leaves, water, mountains, canyons and buildings may affect service. And in some places Public Safety call takers still rely only on the caller's descriptions to locate and dispatch help to people in emergency situations.

and

Verizon Wireless' Phase 2 E911 location technology is built into the phone's handset; GPS-capable phones rely on signals from the Federal Government's Global Positioning System satellites to help estimate their location when you make a 911 call. Verizon Wireless' handset-based location technology provides the most accurate capability over varied terrain, and is generally capable of estimating locations within 50 to 150 meters in most cases.

See http://support.vzw.com/clc/faqs/Wireless%20Issues/faq_e911_compliance.html.

encourage the development of industry best practices concerning disclosure of location accuracy information, based on industry consensus.

IV. INDOOR ACCURACY REQUIREMENTS SHOULD AWAIT CSRIC RECOMMENDATIONS

A. The Commission Should Defer Indoor Testing Methodologies to the CSRIC to Develop Best Practice Guidelines

The Commission seeks comment on whether to require indoor location accuracy testing and, if so the appropriate standards, methodologies, costs and benefits.⁶⁵ These issues are particularly appropriate for the CSRIC's expert consideration, and the Commission should defer to those recommendations and revisit this issue at that time. At most, the Commission should incorporate any such recommendations into an updated non-binding OET Bulletin 71. Verizon will actively participate in CSRIC's consideration of this issue.

First, the limitations of A-GPS technologies in indoor GPS-denied environments are well understood, so the principal impact of mandatory indoor testing at regular intervals would be to drain carriers' resources with little countervailing prospect of accuracy improvement. While the Commission notes the NRIC VII's recommendation and the Emergency Services Interconnection Forum's subsequent provision of a five percent indoor testing sample,⁶⁶ this was the *highest* limit of indoor test samples that industry felt could be included in existing outdoor testing compliance standards, and was contemplated in the context of nationwide or state-wide averaging of test results. The Commission's adoption of county- or PSAP-level measurements has rendered this recommendation moot.

⁶⁵ See *NPRM* ¶ 87.

⁶⁶ See *id.* ¶ 30.

Second, any indoor accuracy guidelines would need to apply separately from the current outdoor-based testing regime, in order to account for a significantly larger error and different measurement techniques and methodology. Unlike outdoor testing, carriers do not have the freedom to intrude into random indoor areas in order to conduct accuracy testing. Therefore, it makes more sense to measure indoor accuracy based on representative locations – for instance, using criteria such as “two-story wood frame structure,” “multi-story glass structure,” etc. The carrier can apply accuracy metrics and results for representative indoor environments universally across jurisdictions, without the need for costly and time-consuming testing.

B. Leveraging Existing Location-Capable Services and Devices to Improve Indoor Accuracy Will Require Substantial Standards Development

The Commission seeks comment on the feasibility, costs, and limitations of using Wi-Fi positioning and fixed broadband Internet access devices to help improve the availability and reliability of indoor location information for 911 calls.⁶⁷ As with other location capabilities raised in the *NPRM*, those solutions would require substantial industry standards development. Verizon Wireless uses Wi-Fi-based information in some circumstances, whereby a commercial Wi-Fi database associates a handset’s coordinates with a particular access point, but this is not a true location positioning solution that a carrier can deploy itself. Verizon Wireless has performed some testing with a true Wi-Fi-based solution, but test results to date indicate that a slight but not significant improvement in indoor location accuracy may be possible. While other consumer-level access devices, such as some femtocells and Verizon Wireless’s CDMA-based Home Phone Connect, have location capability, they do not currently have the ability to pass that data to another third party device in a manner that could facilitate 911 call routing or ALI

⁶⁷ See *id.* ¶¶ 93-95.

provision from indoor areas. Moreover, devices must have Wi-Fi hardware and software, but as noted above not all handsets support Wi-Fi. Also, many customers with a Wi-Fi-equipped handset often turn the feature off to save battery life; thus, if the customer calls 911, the handset would have to automatically turn on the Wi-Fi capability to scan for access points.

With respect to fixed providers' network access devices, many of the technical protocols discussed above, such as the IETF-based HELD standard, could potentially provide a foundation for a standard that facilitates the device-to-device sharing contemplated in the *NPRM*. Significant modifications in device and network capabilities, however, must be addressed and implemented as well. For example, the devices must be capable of interfacing with the broadband provider's protocols that can be used for location acquisition.

Just as wireless carriers and other parties share and use the GPS satellite constellation, a standardized indoor-based infrastructure that all wireless carriers can similarly share is needed. Verizon recommends that the CSRIC, as it considers this issue, work to initiate a common technical forum involving industry, government and public safety, to help develop a solution that can accommodate both wireless and wireline-based technology.

V. THE NET 911 ACT GIVES THE COMMISSION SIGNIFICANT BUT NOT UNBOUNDED AUTHORITY TO ADOPT VOIP E911 RULES

The Commission asks a number of questions concerning the extent of its authority to adopt the proposals described in the *NPRM*.⁶⁸ As discussed throughout these comments, the Commission takes its authority to establish E911 rules for IP enabled services from the NET 911 Act, which gives the Commission authority to modify the definition of interconnected VoIP service providers and to modify the 911 obligations of interconnected VoIP service providers.

⁶⁸ See *id.* ¶¶ 96-99.

While the Commission correctly states “Congress did not intend to lock in the then-existing definition of interconnected VoIP service as a permanent definition for Net 911 Improvement Act purposes,”⁶⁹ the NET 911 Act also sets forth the conditions under which the Commission may impose additional requirements on interconnected VoIP providers.⁷⁰ Finally, it goes without saying that the Commission must base any new requirements on an adequate rulemaking record and reasoned decisionmaking.

Therefore, the NET 911 Act defines the scope of the Commission’s authority in this proceeding to modify interconnected VoIP service providers’ 911 and E911 obligations. As a result, there is no need for the Commission to exercise ancillary jurisdiction here, or to speculate, as it does in the *NPRM*, whether it should. Importantly, as discussed above and contrary to the Commission’s belief as described in the *NPRM*,⁷¹ requiring that underlying broadband providers “be capable of providing location information regarding the access point being used by [an OTT] device or application”⁷² is not authorized by the NET 911 Act, which governs interconnected VoIP providers’ access rights vis-à-vis other service providers.

VI. MODIFYING THE RULE DEFINITION WILL HAVE IMPLICATIONS FOR SOME NON-911 REGULATIONS

Since the Commission first defined interconnected VoIP service and adopted Section 9.3 its rules,⁷³ the Commission has established several non-911 requirements that tie back to the

⁶⁹ *Id.*

⁷⁰ See 47 U.S.C. § 615a-1(c)(1), (3); *supra* Section II.B.2-3.

⁷¹ See *NPRM* ¶ 98.

⁷² *Id.* ¶ 72.

⁷³ See *VoIP 911 Order*, at 10277 ¶ 58.

original definition. The Commission recognizes this and seeks comment on the effect on those other rules were the Commission to revise Section 9.3 here.⁷⁴

First, both the 21st Century Communications and Video Accessibility Act (“CVAA”)⁷⁵ and the Truth in Caller ID Act⁷⁶ explicitly reference Section 9.3. The CVAA defines “Interconnected VoIP service” as having “the meaning given such term under section 9.3 of title 47, Code of Federal Regulations, as such section may be amended from time to time.”⁷⁷ The plain language of the CVAA clearly contemplates changes to Section 9.3 and explicitly incorporates amendments to that section. (The practical impact of modifying the definition on CVAA obligations may be limited, however, given that the CVAA already applies to non-interconnected VoIP providers and manufacturers.) Similarly, the Truth in Caller ID Act defines “IP-enabled voice service” by reference to Section 9.3, “as those regulations may be amended by the Commission from time to time.”⁷⁸ In both cases, therefore, the Commission would be required to use the revised definition of interconnected VoIP service in Section 9.3 when implementing the CVAA and the Truth in Caller ID Act.

Many other regulatory requirements unrelated to E911 – including reporting requirements, local number portability and numbering, universal service, CPNI, CALEA and others – refer to the Section 9.3 definition of interconnected VoIP service. As a general rule, a single definition for interconnected VoIP service across the Commission’s regulatory

⁷⁴ *NPRM ¶¶ 100-101.*

⁷⁵ Twenty-First Century Communications and Video Accessibility Act of 2010, Pub. L. No. 111-260, 124 Stat. 2751 (2010).

⁷⁶ Truth in Caller ID Act of 2009, Pub. L. No. 111-331, 124 Stat. 3572 (2010).

⁷⁷ *See* 47 U.S.C. § 153(25).

⁷⁸ *See id.* § 227(e)(8)(C).

requirements for VoIP services would be consistent with Commission policies of competitive and technology neutrality. On the other hand, applying new requirements to outbound-only interconnected VoIP providers merely by changing the E-911 rules, without first assessing the implications for those providers, would likely raise problems under the Administrative Procedure Act, and could also raise broader questions of the Commission's statutory authority. Thus, if the Commission believes that changes in non-911 regulations are necessary for outbound-only interconnected VoIP providers, it should address them in separate rulemaking proceedings.

CONCLUSION

The Commission should: ensure that new E911 requirements for outbound-only interconnected VoIP providers are consistent with the Commission's statutory authority and exclude services enabling calls to U.S. NANP numbers; find that interconnected VoIP providers should migrate to ALI methods without imposing regulation on broadband providers, and await the outcome of CSRIC and standards bodies efforts to consider the necessity and extent of any new regulations for such services; defer consideration of indoor accuracy matters until the CSRIC and industry standards bodies complete their efforts; and refrain from applying unnecessary privacy restrictions and consumer disclosures. The Commission must ensure that any new requirements are consistent with the Commission's statutory authority under the NET 911 Act and account for technical and economic feasibility considerations.

Respectfully submitted,

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