Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, D.C. 20554

In the Matter of

Revision of the Commission’s Rules to Ensure Compatibility With Enhanced 911 Emergency Calling Systems

Location-Based Routing For Wireless 911 Calls

Facilitating the Deployment of Text-to-911 and Other Next Generation 911 Applications

Request and Petitions of NASNA to Facilitate Implementation of Next Generation 911 Services

PETITION FOR RULEMAKING; ALTERNATIVELY, PETITION FOR NOTICE OF INQUIRY

The National Association of State 911 Administrators Association (NASNA)\(^1\) respectfully requests Federal Communications Commission (Commission) assistance, petitions for rulemaking per Commission regulation 1.401;\(^2\) and, in the alternative, petitions for a notice of inquiry per Commission regulation 1.430.\(^3\)

On behalf of our members representing the 911 programs of forty-nine states and territories, including the District of Columbia, we request and petition the Commission to act to facilitate the implementation of and transition to Next Generation 911 services (NG911).\(^4\)

\(^1\) The National Association of State 911 Administrators (NASNA) is comprised of members representing the states and U.S. territories on public policy issues impacting the successful implementation of 911 systems. While each state is unique in its 911 implementation based on its own needs and demographics, members face common issues and challenges. NASNA serves as a centralized information sharing and support network for state 911 program administrators. The 911 leadership represented by the NASNA’s membership can assist industry associations, public policymakers, the private sector, and emergency communications professionals at all levels in address complex issues surrounding emergency communications.

\(^2\) 47 C.F.R. §§ 1.401, 1.411, 1.430.

\(^3\) Id. at § 1.439.

\(^4\) Defined in 47 U.S.C. § 942(e)(5) (includes Next Generation Core Services) as: “[A]n IP-based system comprised of hardware, software, data, and operational policies and procedures that—(A) provides standardized interfaces from
I. Introduction and Summary

Historically, and when necessary, the Commission has actively pursued and participated in the implementation and improvement of 911 service. Such valued efforts have included enhancements to and extensions of 911 service as a result of advances in technology.\(^5\) The Commission possesses authority under federal law and regulation to conduct proceedings and adopt rules to advance the implementation of NG911, including, \textit{inter alia}, 47 U.S.C. §§ 154(i)-(j), 157, 160, 201-202, 218, 251(a), (b)(5), (e)(3), 256, 303(r), 332, 615 note (a)(3), (b), 615a-1(e)(2), 615(b)(10); 47 C.F.R. §§ 0.131, 0.331; 1.401, 1.411, 1.430.\(^6\)

Specifically, NASNA asks that the Commission provide assistance and initiate a rulemaking proceeding or notice of inquiry to:

1) Establish Commission authority over originating service providers’ (OSPs) \textit{i.e.}, wireless, landline, and interconnected VoIP) delivery of 911 services through IP-based emergency services networks (ESInets).

2) Amend 47 C.F.R §§ 9.4 and 9.5 as needed to advance the transition to and implementation of NG911 services.

3) Require the cost of compliance, as it was with the implementation of wireless enhanced emergency call and message services to support emergency communications; (B) processes all types of emergency calls, including voice, data, and multimedia information; (C) acquires and integrates additional emergency call data useful to call routing and handling; (D) delivers the emergency calls, messages, and data to the appropriate public safety answering point and other appropriate emergency entities; (E) supports data or video communications needs for coordinated incident response and management; and (F) provides broadband service to public safety answering points or other first responder entities.


911 service, text-to-911, and real-time text (RTT), is the responsibility of the OSPs, except where cost-recovery is provided by state law or regulation. Specifically, and comparable to the FCC’s King County decision, that the FCC establish a NG911 cost demarcation point or points, for allocating costs when the parties cannot agree on the appropriate demarcation point(s). Any action of the Commission should clearly be established in a manner that does not preempt state/local authority over 911, including existing 911 cost-recovery mechanisms, but to serve rather as a “floor” of required services by carriers to establish a baseline for 911 delivery in the emerging environment of NG911.

Additionally, NASNA urges the Commission to consider adding a NG911 Readiness Registry (NG911 Registry) to its existing text-to-911 or public safety answering point (PSAP) registries—or combine the two and add a NG911 Registry. While the aforementioned registries are voluntary, we believe having a NG911 Registry would be a meaningful tool for state and local 911 authorities and OSPs to use to advance the implementation of NG911. Alternatively, that the FCC establish NG911 Readiness stages or phases to be utilized by both state/local 911 authorities and OSPs in transitioning to NG911 services.

As demonstrated in the Commission’s Twelfth Annual Report to Congress on State Collection and Distribution of 911 and Enhanced 911 Fees and Charges, thirty-seven states have Emergency Service IP Networks (ESInets) operating in their states, with eighteen of those states reporting that ESInets have been deployed on a statewide basis. ESInets, being a foundational

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7 With the understanding that once delivered to the ESInet gateway, the provider’s responsibility ends in keeping with the FCC’s order in CG Docket No. 16-145 GN Docket No. 15-178 regarding the delivery of Real-Time Text (RTT).

8 Revision of the Commission’s Rules To Ensure Compatibility with Enhanced 911 Emergency Calling Systems, CC Docket No. 94-102, Order on Reconsideration, FCC 02-146 (July 24, 2002) (Reconsideration of King County Decision).

9 Petitioners request regarding demarcation point(s) and cost allocation is consistent with the Commission’s Ending 911 Fee Diversion Now Strike Force, Report and Recommendations, submitted to Congress (September 23, 2021) https://www.fcc.gov/911strikeforce.

10 Twelfth Annual Report to Congress on State Collection and Distribution of 911 and Enhanced 911 Fees and
component of NG911, indicates that the implementation of NG911 is happening now. To coordinate and facilitate implementing NG911 warrants Commission guidance and the establishing of a framework and mechanism for migrating to NG911.

II. Establish Commission Authority Over NG911

The initial step towards transitioning to NG911 services is for the Commission to establish its authority and role over NG911; specifically, its authority over carriers’ (wireless, landline, interconnected VoIP) delivery of 911 services through ESInets. The Commission’s recognition and utilization of such authority served to advance the implementation of wireless 911 (Phases I, II, z-axis), VoIP 911 service, Text-to-911, and RTT. Without the Commission’s direct involvement, the notable advances made in 911 services would have been interminably delayed if not foreclosed.

III. Amend 47 C.F.R. §§ 9.4 and 9.5 as Needed

Amending Commission regulations 9.4 and/or 9.5 to affirmatively recognize the transition to NG911 services not only serves to confirm Commission authority but makes clear the Commission’s role in transitioning to NG911.

Section 9.4 states that “[a]ll telecommunications carriers shall transmit all 911 calls to a PSAP, to a designated statewide default answering point, or to an appropriate local emergency authority as set forth in § 9.5.” Amending 9.4 to make clear its applicability to all carriers required to provide 911 services and to expand upon the term “transmit” to account for transmitting 911 calls utilizing NG911 protocols and format would clearly establish the Commission’s intent to transition the current legacy 911 system to NG911 throughout the country. Section 9.5 establishes the requirement for 911 call delivery in phases; the applicable deadlines for which expired years ago. Additionally, or in the alternative, amend section 9.5 to specifically address NG911, including the standardized requirements associated with NG911 (e.g., Session Initiation Protocol [SIP] format

and provide location information attached to the SIP header of the call using Presence Information Data Format Location Object [PIDF-LO]). In updating these sections of the Commission’s rules, we wish to affirm in the context of NG911 that:

(1) the Commission requires that all carriers obligated to provide 911 service are required to transmit all 911 calls to the designated PSAP, statewide default answering point (in the absence of a designated PSAP), or to an appropriate local emergency authority (in the absence of a statewide default answering point);

(2) the timeframe for compliance is established by the Commission in its rules and initiated by certification of NG911 readiness by the appropriate 911 authority (see infra NG911 Readiness); and

(3) that the cost of compliance, as it was with the implementation of wireless enhanced 911 service, text-to-911, and RTT, is the responsibility of the OSP, except where cost-recovery is provided by state or federal law or regulation. (See infra Establish NG911 Demarcation Point(s)).

NASNA’s understanding is that the communications industry, as a whole, has been migrating toward an IP/SIP infrastructure for some time. With the rapid ongoing deployment of ESInets at the state and regional level, the need for a structured model for compliance by OSPs is greatly needed, and that need will grow as states continue to reach a state of NG911 readiness.

IV. Establish NG911 Cost Demarcation Point(s)

Full end state implementation of NG911 requires, at a minimum, that OSPs deliver 911 calls in SIP format and include location information attached to the SIP header of the call using PIDF-LO. NG911 also requires that state and local authorities, including their underlying PSAPs, be ready and capable of receiving NG911 calls and therefore ready to cut-over all OSPs in their 911 service area; including for end-state NG911 that their NG911 System Services Provider provides
Next Generation Core Services.\textsuperscript{11} Certification of NG911 readiness by 911 authorities would benefit both OSPs and state and local 911 authorities; and advanced the transition to NG911.

It is essential to implementing NG911 that the Commission establish a cost allocation demarcation point, or points. As the Commission did with wireless 911 in the \textit{King County} decision, establishing a demarcation point(s) for cost allocation addresses the critical component, and biggest regulatory roadblock, to transitioning to NG911 services.

Each one of our member states are in various stages of migration towards ESI\textsuperscript{net} deployments. Currently, state and local 911 authorities and OSPs have no defined mechanism for coordinating and implementing fully compliant end-to-end NG911 call delivery. Fortunately, the Commission has in the past created the framework, precedence, and established timelines for transitions as warranted by advancements in 911 technologies. To be clear, NASNA is not asking for Commission preemption, but rather that it establish the “floor” for transitioning to NG911—specifically including establishing a demarcation point(s) for cost allocation. NASNA believes such serves as a model for the transition to NG911.

Critically important to implementing NG911 services is preserving state/local authority over 911, specifically existing 911 cost recovery mechanisms. Cost recovery mechanisms vary considerably among NASNA’s members. Preserving state/local authority over such mechanisms, when coupled with the Commission’s establishing cost allocation demarcation point(s), strikes the appropriate balance between state/local and federal authority over 911 while promoting the transition throughout the country to NG911 services. Accordingly, we are not requesting

\textsuperscript{11} \textit{FCC Task Force on Optimal PSAP Architecture (TFOPA)Working Group 2: NG911 Readiness Scorecard} (December 12, 2016) defines NGCS, consistent with the NENA Master Glossary, as: “The base set of services needed to process a 911 call on an ESI\textsuperscript{net}. Includes the ESRP, ECRF, LVF, BCF, Bridge, Policy Store, Logging Services and typical IP services such as DNS and DHCP. The term NG911 Core Services includes the services and not the network on which they operate.”
Commission preemption of state/local authority, but rather the exercise of Commission authority to advance the transition to NG911 services.

V. NG911 Readiness Phases

The Commission’s Task Force on Optimal PSAP Architecture (TFOPA)\(^{12}\) was directed to “study and report findings and recommendations on structure and architecture in order to determine whether additional consolidation of PSAP infrastructure and architecture improvements would promote greater efficiency of operations, safety of life, and cost containment, while retaining needed integration with local first responder dispatch and support.” In December 2016, TFOPA Working Group 2 released its *Phase II Supplemental Report: NG911 Readiness Scorecard.* (Readiness Scorecard).\(^{14}\)

The Readiness Scorecard provides 911 authorities and OSPs with an “understanding of essential elements in each NG911 Implementation Maturity State.”\(^{15}\) The Readiness Scorecard is broken down into areas of interest, which are further broken down by “Maturity State”—*i.e.*, Legacy, Foundational, Transitional, Intermediate, and End State.

For example, the Readiness Scorecard could be distilled into the following NG911 readiness phases:

**Phase I:** The ESInet is ready to receive 911 calls from the OSPs via a Legacy Network Gateway. This may require a change in the demarcation point between the OSP and the NG911 system provider. Specific information should be certified and provided by the 911 authority/ESInet administrator to its single state entity to be conveyed to OSPs, including what is required of the OSPs in order to comply with the change.


\(^{13}\) *Id.*


\(^{15}\) *Id.* at § 3.4 NG911 Readiness Scorecard (pg. 14-17).
Phase II: The ESInet is ready to receive 911 calls in SIP format. In some cases, no change in the demarcation point may have been required for the implementation of the Legacy Network Gateways, so 911 authorities/ESInet administrators should have the opportunity to request both Phase I and Phase II simultaneously. Again, to the extent that there are specific requirements beyond SIP format that the 911 authority/ESInet administrator has, they should be explicitly certified and conveyed by a single state entity to OSPs.

Phase III: The ESInet is ready to receive 911 calls in NG911 format; it requires that the 911 authority’s NG911 System includes NGCS and that its underlying PSAPs are capable of utilizing the corresponding elements. The 911 authority/ESInet administrator may request all three phases simultaneously if the implementation of the ESInet allows for this. As with the other two phases, any specific requirements that the 911 authority/ESInet administrator has for the delivery of NG911 format calls to the ESInet should be certified and conveyed by a single state entity to OSPs.

VI. Conclusion

Over the years, the Commission has been instrumental in creating processes for the orderly but timely implementation of new 911 technologies, including wireless enhanced 911 service, delivery of 911 calls originating from Voice-over-Internet-Protocol providers, and text-to-911 service. NASNA believes the Commission should play a similar role in the implementation of Next Generation 911 services. Without action from the Commission, it is difficult to envision how full, nationwide implementation of NG911 can be achieved. With the Commission’s support and direction, however, NG911 can be implemented in a timely and coordinated manner that will provide a better result for the citizens who call 911 every day and rely on 911 to provide them with the emergency services they require.
Respectfully Submitted,

[Signature]

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