

**Before the  
Federal Communications Commission  
Washington, D.C. 20554**

In the Matter of	)	
	)	
Review of the Emergency Alert System	)	EB Docket No. 04-296
	)	
	)	

**THIRD REPORT AND ORDER**

**Adopted: February 2, 2011**

**Released: February 3, 2011**

By the Commission:

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## I. INTRODUCTION

1. In this *Third Report and Order*, we amend our Part 11 rules governing the Emergency Alert System (EAS) to provide for national testing and collection of data from such tests. Specifically, we:

- Require all EAS Participants to participate in national EAS tests as scheduled by the Federal Communications Commission (Commission) in consultation with the Federal Emergency Management Agency (FEMA);
- Require that the first national EAS test use the Emergency Alert Notification (EAN), the live event code for nationwide Presidential alerts;
- Require that the national test replace the monthly and weekly EAS tests in the month and week in which it is held;
- Require the Public Safety and Homeland Security Bureau (Bureau) to provide at least two months' public notice prior to any national test of the EAS;
- Require EAS Participants to submit test-related data to the Bureau within 45 days following a national EAS test;
- Require that test data received from EAS Participants be treated as presumptively confidential, but allow test data to be shared on a confidential basis with other Federal agencies and state governmental emergency management agencies that have confidentiality protection at least equal to that provided by the Freedom of Information Act (FOIA); and
- Delegate authority to the Public Safety and Homeland Security Bureau to determine, in consultation with FEMA and with other EAS stakeholders, as appropriate, various administrative procedures for national tests, including location codes to be used and pre-test outreach.

2. The EAS was established primarily to enable the President of the United States to issue warnings to the American public during emergencies.<sup>1</sup> To date, however, the EAS has not

<sup>1</sup> See Amendment of Part 73, Subpart G, of the Commission's Rules Regarding the Emergency Broadcast System, FO Docket 91-301, FO Docket 91-171, *Report and Order and Further Notice of Proposed Rulemaking*, 10 FCC Rcd (continued....)

been used to deliver such a national Presidential alert. Moreover, while the Commission's rules require periodic testing of EAS at the state and local level, in their current form, these rules do not provide for a national, end-to-end test of the system. In addition, no systematic national test of the EAS has ever been conducted to determine whether the system would in fact deliver a Presidential national alert. Today's Order establishes the framework for conducting such tests.

## II. BACKGROUND

### A. The Emergency Alert System

3. The EAS is a national public warning system designed to provide the President with the ability to rapidly and comprehensively communicate with the American public during a national crisis.<sup>2</sup> The EAS is the successor to two prior national warning systems: Control of Electromagnetic Radiation (CONELRAD), established in 1951, and the Emergency Broadcast System (EBS), established in 1963.<sup>3</sup>

4. The Commission, in conjunction with FEMA and the National Weather Service (NWS), implements EAS at the federal level.<sup>4</sup> The respective roles these agencies play are defined by a 1981 Memorandum of Understanding between FEMA, NWS, and the Commission;<sup>5</sup> a 1984 Executive Order;<sup>6</sup> a 1995 Presidential Statement of EAS Requirements;<sup>7</sup> and a 2006 Public Alert and Warning System Executive Order.<sup>8</sup> As a general matter, the Commission, FEMA, and NWS all work closely with radio and television broadcasters, cable providers, and

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1786, 1788-89 ¶¶ 3-4 (1994) (*1994 Report and Order*). See *EAS Second Report and Order and Further Notice of Proposed Rule Making*, 22 FCC Rcd 13275, 13282 ¶ 14 (2007) (*EAS FNPRM*).

<sup>2</sup> The Commission's EAS rules are intended to ensure that national activation of EAS would enable the President to communicate with the American public within ten minutes from any location at any time. These messages must take priority over any other messages and preempt other messages in progress. Review of the Emergency Alert System, EB Docket No. 04-296, *First Report and Order and Further Notice of Proposed Rulemaking*, 20 FCC Rcd 18625, 18628, ¶ 8 (2005) (*First Report and Order*); 47 C.F.R. § 11.44(a).

<sup>3</sup> A more detailed overview of the history of EAS is set out in the first *Notice of Proposed Rulemaking* in this docket. See Review of the Emergency Alert System, EB Docket No. 04-296, *Notice of Proposed Rulemaking*, 19 FCC Rcd 15775, 15776-77, ¶¶ 6-8 (2004 *NPRM*).

<sup>4</sup> FEMA acts as Executive Agent for the development, operation, and maintenance of the national-level EAS. See *Memorandum, Presidential Communications with the General Public During Periods of National Emergency*, The White House (Sept. 15, 1995) (*1995 Presidential Statement*).

<sup>5</sup> See 1981 State and Local Emergency Broadcasting System (EBS) Memorandum of Understanding Among the Federal Emergency Management Agency (FEMA), Federal Communications Commission (FCC), the National Oceanic and Atmospheric Administration (NOAA), and the National Industry Advisory Committee (NIAC) reprinted as Appendix K to Partnership for Public Warning Report 2004-1, *The Emergency Alert System (EAS): An Assessment*.

<sup>6</sup> See Assignment of National Security and Emergency Preparedness Telecommunications Functions, Exec. Order No. 12472, 49 Fed. Reg. 13471 (1984).

<sup>7</sup> See *1995 Presidential Statement*.

<sup>8</sup> See *Public Alert and Warning System, Exec. Order No. 13407, 71 Fed. Reg. 36975 (June 26, 2006) (Executive Order)*. Section 3(b)(iii) of the *Executive Order* directs the Commission to "adopt rules to ensure that communications systems have the capacity to transmit alerts and warnings to the public as part of the public alert and warning system." A discussion of the *Executive Order* is provided in the Second Report and Order in this docket. See *Second Report and Order*, 22 FCC Rcd at 13278-80 ¶¶ 5-7.

other participants in EAS (EAS Participants)<sup>9</sup> as well as with state, local, territorial and tribal governments, to ensure the integrity and utility of EAS.

5. Functionally considered, the present-day EAS is a hierarchical alert message distribution system.<sup>10</sup> Initiating an EAS message, whether at the national, state, or local level, requires the message initiator (*i.e.*, FEMA, which initiates EAS alerts at the national level on behalf of the President) to deliver specially-encoded messages to a broadcast station-based transmission network that, in turn, delivers the messages to individual broadcasters, cable operators, and other EAS Participants who maintain special encoding and decoding equipment that can receive the message for retransmission to other EAS Participants and to end users (broadcast listeners and cable and other service subscribers).<sup>11</sup> Sections 11.32 and 11.33 of the Commission's rules set forth minimum requirements for these EAS encoders and decoders, respectively.<sup>12</sup>

6. The national EAS delivery/transmission system is commonly referred to as a "daisy chain." At its initial level, it consists of various FEMA-designated radio broadcast stations – known as Primary Entry Point (PEP) stations<sup>13</sup> – which are tasked with receiving and transmitting "Presidential Level" messages initiated by FEMA. As the entry point for national level EAS messages, these PEP stations are designated "National Primary" (NP). At the next level (*i.e.*, below the PEP stations), designated "State Primary" stations monitor specifically-designated PEP stations and re-transmit the Presidential-level alert, as well as state-level EAS messages originating from the Governor or a State Emergency Operations Center (EOC). At the level below the State Primary stations, Local Primary stations monitor the State Primary and PEP stations and are monitored, in turn, by all other EAS Participants (radio and television broadcasters, cable TV service providers, *etc.*). At present, the United States is divided into approximately 550 EAS local areas, each of which contains at least two Local Primary stations, designated "Local Primary One" (LP1), "Local Primary Two" (LP2), and so on. The LP stations must monitor at least two EAS sources for Presidential messages (including State Primary stations and in some cases a regional PEP station), and also can serve as the point of contact for state and local authorities and NWS to activate the EAS for localized events such as severe weather alerts. All other EAS Participants are designated Participating National (PN) stations and must monitor at least two EAS sources, including an LP1 and an LP2 station as specified in the state's EAS plan. A functional diagram of the National EAS architecture is contained in Figure 1 below:

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<sup>9</sup> EAS Participants include analog AM, FM and television broadcast stations, digital broadcast stations, analog cable systems, digital cable systems, wireless cables systems, Direct Broadcast Satellite (DBS) services, Satellite Digital Audio Radio Service (SDARS), and other participating entities. *See* 47 C.F.R. § 11.1.

<sup>10</sup> All broadcast stations and cable systems have EAS designations that describe their functions within EAS. *See* 47 C.F.R. § 11.18.

<sup>11</sup> 47 C.F.R. § 11.31. Several commenters objected to our use of the term "ENDEC" to signify an EAS encoder/decoder since this is a trade name used by Sage Alerting Systems, Inc. Accordingly, we use the generic term "encoder/decoder" throughout this *Order*.

<sup>12</sup> 47 C.F.R. §§ 11.32, 11.33. EAS equipment also provides a means to automatically interrupt regular programming and is capable of providing warnings in the primary language that is used by the station or cable system. *See* 47 C.F.R. §§ 11.33(a)(4), 11.51(k)(1), 11.54.

<sup>13</sup> A PEP station can serve more than one role; for example, it can also serve as an SP.

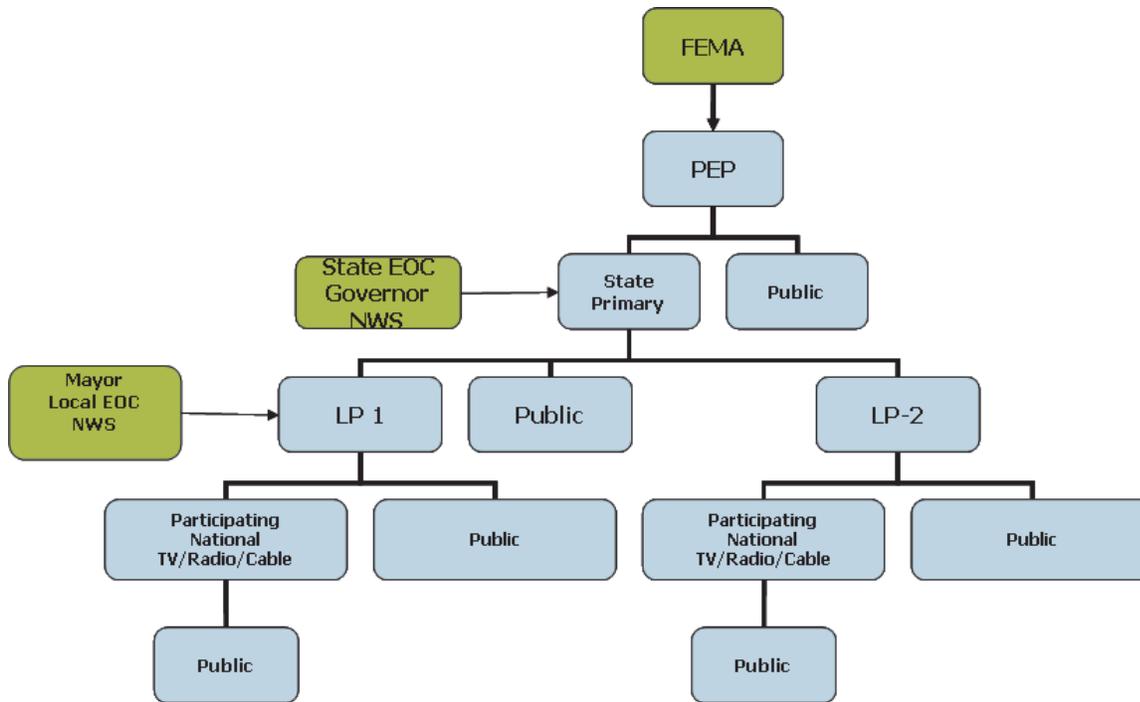


Figure 1.

7. The White House, through FEMA, initiates a presidential-level EAS alert by transmission of a coded message sequence in the header that precedes the actual alert. Like all other EAS alerts, the header for a presidential alert contains an EAS Originator Code to describe the entity originating the EAS activation, the EAS Event Code to describe the type of event that has occurred, a location code to describe the area affected by the event, and other relevant codes depending on the nature of the alert.<sup>14</sup> The event code for a Presidential alert is the EAN event code.<sup>15</sup> Immediately upon receipt of an EAN message, EAS Participants must begin monitoring two EAS sources, discontinue normal programming, follow the transmission procedures in the appropriate section of the EAS Operating Handbook, and undertake various other requirements, until receipt of an Emergency Action Termination (EAT) message.<sup>16</sup> Essentially, upon receipt of an EAN, routine programming ceases and broadcast transmission equipment is made available for the transmission of a presidential message. The equipment is not freed for resumption of regular broadcasting until the EAT is received.<sup>17</sup> An alternative to the EAN is the National

<sup>14</sup> See 47 CFR § 11.31.

<sup>15</sup> See 47 C.F.R. § 11.54 (EAS operation during a national level emergency).

<sup>16</sup> See 47 C.F.R. § 11.54.

<sup>17</sup> *Id.* State and local emergency operations managers also can request activation of the EAS by utilizing state-designated EAS entry points, such as the State Primary stations or State Relay stations. The State Relay Network is composed of State Relay sources, leased common carrier communications facilities, or any other available communication facilities. In addition to EAS monitoring, satellites, microwave, FM subcarrier, or any other communications technology may be used to distribute state emergency messages. See 47 C.F.R. § 11.20. State Relay sources relay state-common emergency messages to local areas. See 47 C.F.R. § 11.18(d). Local Primary sources are responsible for coordinating the carriage of common emergency messages from sources such as the NWS or local emergency management offices as specified in EAS local area plans. See 47 C.F.R. § 11.18(b). State transmission systems vary from state to state, but can include “daisy chain” links between broadcast and other terrestrial communications facilities as well as satellite-based facilities.

Periodic Test (NPT) which is an Event Code to be used strictly for tests of National Primary EAS sources. There is no specific location code for a Presidential alert.

8. Because of its linked structure, the EAS is potentially vulnerable to “single point of failure” problems, *i.e.*, where failure of a participating station, notwithstanding its back-up monitoring obligations, could result in system-wide failure for all points below that station on the daisy chain. The Commission was made aware of one such failure during an inadvertent issuance of a national alert during a testing operation conducted by FEMA. In June 2007, FEMA was testing a new satellite warning system in Illinois and FEMA contractors inadvertently triggered a national-level EAS alert.<sup>18</sup> This event caused some confusion to broadcasters and other communications in the Ohio valley before the test/alert was terminated by a combination of EAS Participant intervention and equipment failure. It was subsequently discovered that some EAS Participant equipment simply did not pass on the alert.<sup>19</sup> The Commission has also received numerous anecdotal reports from EAS Participants and state and local emergency managers of problems with state and local level alert delivery architectures, as well as reports indicating problems with PEP station readiness as tested by FEMA.<sup>20</sup>

### **B. Need for National EAS Testing**

9. The EAS is subject to weekly and monthly tests at the state and local level,<sup>21</sup> such tests may not expose vulnerabilities in functioning or gaps in nationwide coverage. For example, EAS PEP station operational and maintenance requirements are the responsibility of FEMA, which tests the PEP stations but typically does not test other stations. The NWS tests its own National Weather Radio (NWR) facilities independently or as integrated with state and local level emergency alert delivery architectures, but again, its focus is solely on the proper operation of NWS/NWR facilities as those facilities interact with state and local EAS architectures. State EOC facilities are maintained by their respective state officials. None of these entities has been responsible for “top-to-bottom” national testing of EAS.

10. In the *Further Notice of Proposed Rulemaking* in this docket, the Commission sought comment on various issues relating to maintaining the quality of the EAS, including additional testing.<sup>22</sup> Further, in the Chairman’s 30-Day Review on FCC Preparedness for Major Public Emergencies, the Bureau noted that concerns had been raised regarding the frequency and

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<sup>18</sup> See Illinois Emergency Management Agency, *Press Release*, “Federal test of Emergency Alert System mistakenly sends message out over TV, radio airwaves” (June 26, 2007).

<sup>19</sup> See Primary Entry Point Administrative Council, Inc., Encoder/Decoder Closed Circuit Test Report, August 8, 2008 (*2008 PEPAC Report*). The PEPAC administers the PEP stations – the primary entry points for a national-level EAS alert.

<sup>20</sup> See United States Government Accountability Office, Report to Congressional Committees, EMERGENCY PREPAREDNESS: Current Emergency Alert System Has Limitations, and Development of a New Integrated System Will Be Challenging, March 2007 at 15 (*2007 GAO Report*). See also, Letter, John F. Garziglia to Marlene Dortch (Mar. 5, 2010)(*New Jersey Broadcasters Ex Parte*)(“New Jersey Broadcasters are particularly concerned with respect to the adequacy, obsolescence and deterioration of the EAS apparatus currently in place in the state, and its potentially catastrophic failure to act in response to a large regional, statewide, or national emergency.”).

<sup>21</sup> See 47 C.F.R. § 11.61.

<sup>22</sup> *Id.* at ¶¶ 70, 71.

scope of EAS testing,<sup>23</sup> and recommended that the three Federal partners responsible for EAS – the Commission, FEMA, and the National Weather Service (NWS), review the testing regime to see where improvement could be made.<sup>24</sup>

11. Since the 30-Day Review was conducted, the Commission, FEMA and the NWS, along with the Executive Office of the President (EOP), have held discussions and formed a working group to plan for initial testing of the EAS at the national level.<sup>25</sup> The purpose of the test is to assess for the first time the readiness and effectiveness of the EAS from top-to-bottom, *i.e.*, from origination of an alert by the President and transmission through the entire EAS daisy chain, to reception by the American public. Following the conduct and evaluation of the initial national test, it is contemplated that the Commission and its Federal partners will continue to test EAS nationally. As part of this effort, on January 6, 2010, FEMA and the FCC, along with State of Alaska officials and the Alaska Broadcasters Association, conducted a live code test of the Presidential alert and warning capabilities of the EAS in the State of Alaska.<sup>26</sup>

### C. Limitations of the Commission’s EAS Testing Rules

12. The Commission’s EAS regulations are set forth in Part 11 of its rules,<sup>27</sup> and impose requirements governing mandatory participation in the national EAS by all EAS Participants.<sup>28</sup> These rules require EAS Participants to conduct weekly and monthly tests at the state and local level.<sup>29</sup> The rules also provide for “[p]eriodic [n]ational [t]ests”<sup>30</sup> and “special tests” at the state or local level,<sup>31</sup> and state that in addition to the EAS testing at regular intervals prescribed by the rules “additional tests may be performed anytime.”<sup>32</sup>

13. Notwithstanding these powers, Part 11 does not contain rules that specifically authorize testing of EAS at the national level, or establish procedures for such a test. We believe that this is a serious gap. Further, although the Part 11 rules give the Commission broad

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<sup>23</sup> See *FCC Preparedness for Major Public Emergencies Chairman's 30 Day Review*, prepared by the Public Safety and Homeland Security Bureau (Sep. 2009) (*Chairman's Review*) at 24, available at [http://hraunfoss.fcc.gov/edocs\\_public/attachmatch/DOC-293332A1.pdf](http://hraunfoss.fcc.gov/edocs_public/attachmatch/DOC-293332A1.pdf).

<sup>24</sup> *Id.*

<sup>25</sup> See Statement of Damon Penn, Assistant Administrator, Department of Homeland Security, Federal Emergency Management Agency, on “This is NOT a Test: Will the Nation’s Emergency Alert System Deliver the President’s Message to the Public?,” before the Subcommittee on Economic Development, Public Buildings, and Emergency Management, Committee on Transportation and Infrastructure, U.S. House of Representatives, Sep. 30, 2009, at 12.

<sup>26</sup> See “Federal And State Partners To Test National Emergency Alert System In Alaska,” available at <http://www.fema.gov/news/newsrelease.fema?id=50157> (last visited Sep. 9, 2010).

<sup>27</sup> See 47 C.F.R. Part 11.

<sup>28</sup> See 47 C.F.R. §§ 11.1, *et seq.* Part 11 rules also govern voluntary EAS participation at the state and local level. State Emergency Coordination Committees (SECCs) and Local Emergency Coordination Committees (LECCs) undertake the development of operational plans and procedures for implementing state and local EAS activations. These organizations prepare coordinated emergency communications plans utilizing the EAS (which may be combined with other emergency information distribution plans and methodologies). State and local EAS plans must comply with Part 11 requirements and are submitted to the Commission for review. See 47 C.F.R. § 11.21.

<sup>29</sup> 47 C.F.R. § 11.61(a)(1),(2).

<sup>30</sup> 47 C.F.R. § 11.61(a)(3).

<sup>31</sup> 47 C.F.R. § 11.61(a)(4).

<sup>32</sup> 47 C.F.R. § 11.61(a).

authority over EAS testing, the rules generally focus on testing of components of the system rather than the system as a whole. Sections 11.61(a)(1) and (a)(2) specify in detail the requirements for mandatory weekly and monthly EAS tests that are conducted at the state and local level.<sup>33</sup> However, these tests are designed to ascertain whether the EAS equipment belonging to individual EAS Participants is functioning properly; they do not test whether the various EAS Participants' equipment works together within the national EAS infrastructure well or at all. Similarly, while the rules authorize "additional tests" and "special tests," these typically are carried out at the state or local level, and are usually designed to test for readiness during specific warning situations, for example, child abduction cases covered by so-called Amber Alerts.<sup>34</sup>

14. The current Part 11 rules also require EAS participants to record data from EAS tests, but the data collected are limited in scope. Specifically, the rules require EAS Participants to log the dates/times that EAN and EAT messages are received, and to determine and log the cause of any failures in the reception of the required monthly and weekly tests.<sup>35</sup> However, the EAS Participants are not required to supply these data to the Commission. Further, data required are not sufficient to allow the Commission to determine whether the EAS is capable of functioning nationally.

15. Section 11.61(a)(3) of the rules is entitled "Periodic National Tests," indicating that national EAS testing was at least contemplated when the rules were adopted. This rule, however, merely states that NP/PEP stations shall participate in such tests "as appropriate," but does not elaborate upon who would conduct such tests, how they would be conducted, or how often.<sup>36</sup> This lack of guidance and specificity would make it difficult for the Commission to create consistent, efficient, minimally burdensome national EAS test procedures.

16. To address these limitations in the rules, and to facilitate the development of a national testing regime for EAS as discussed above, on January 26, 2010, the Commission released a *Second Further Notice of Proposed Rulemaking (Second FNPRM)*, seeking comment on proposed rules to facilitate a national EAS test program.<sup>37</sup> We received 20 comments, 4 reply comments, and one ex parte comment in response.<sup>38</sup>

### III. DISCUSSION

17. After careful review of the *Second FNPRM* comment record, we now amend our EAS rules to specifically provide broad parameters for an initial national EAS testing and data collection. We adopt these rules based on the widespread support for national testing of the EAS in the comment record.<sup>39</sup> The rules we adopt today represent an initial response to the record

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<sup>33</sup> 47 C.F.R. § 11.61(a)(1),(2).

<sup>34</sup> 47 C.F.R. § 11.61(a)(4).

<sup>35</sup> See 47 C.F.R. §§ 11.35(a), 11.54(b)(13), and 11.61(b).

<sup>36</sup> 47 C.F.R. § 11.61(a)(3).

<sup>37</sup> Review of the Emergency Alert System, EB Docket No. 04-296, *Second Further Notice of Proposed Rulemaking*, 25 FCC Rcd 564 (2010) (*Second FNPRM*).

<sup>38</sup> See Appendix A, *supra*.

<sup>39</sup> See e.g. PEPAC Comments at 1 (supporting "the Commission's proposal to implement annual EAS testing at the national level"); COAT Comments at 2 (supporting "national, annual testing of the Emergency Alert System (EAS) as a means to ensure EAS functionality and to provide EAS participants an opportunity to discover any shortcomings or correct any flaws in their systems"); SBE Comments at 2 (National EAS tests "are long overdue"); (continued....)

developed in this docket sufficient to allow the Commission and its Federal, State and industry partners to develop plans and program equipment for an accurate and efficient initial national test of the EAS, and to provide a framework for subsequent national tests.

#### A. Revised Rule Format

18. In the *Second FNPRM* we proposed to amend our Part 11 rules to require all EAS Participants to participate in national testing and to provide test results to the Commission. Specifically, we proposed to amend section 11.61(a)(3) of our rules to read as follows:

*National Tests.* All EAS Participants shall participate in national tests as scheduled by the Commission in consultation with the Federal Emergency Management Agency (FEMA). Such tests will consist of the delivery by FEMA to PEP/NP stations of a coded EAS message, including EAS header codes, Attention Signal, Test Script, and EOM code. The coded message shall utilize EAS test codes as designated by the Commission's rules or such other EAS codes as the agencies conducting the test deem appropriate. A national test shall replace the required monthly test for all EAS Participants in the month in which it occurs. Notice shall be provided to EAS Participants by the Commission at least two months prior to the conduct of any such national test. Test results as required by the Commission shall be logged by all EAS Participants and shall be provided to the Commission's Public Safety and Homeland Security Bureau within thirty (30) days following the test.

19. Commenters generally supported the proposed rule, with some minor alterations. For example, in response to our proposed rule, Sage suggests that the phrase "*tests will consist of the delivery by FEMA to PEP/NP stations*" in the proposed rule could lead "participants to conclude that if they aren't a PEP or NP station, the test doesn't apply to them."<sup>40</sup> Sage recommends that the following language be substituted: "Such tests will consist of the delivery by FEMA to PEP/NP stations of a coded EAS message, including EAS header codes, Attention Signal, Test Script and EOM code. All other EAS participants [sic] will then be required to relay that EAS message."<sup>41</sup> TFT recommends deletion of the phrase "or such other EAS codes as the agencies conducting the test deem appropriate" from the proposed rule because if, "other agencies are permitted to utilize other codes not codified, then legacy equipment may not recognize those codes and may not receive or be capable of forwarding a message containing them."<sup>42</sup>

20. We agree with Sage and TFT's suggestions and have incorporated them in the rule we adopt today. In addition, as explained further below, we conclude that, in addition to the

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 NAB Comments at 1 (supporting "national ... testing of the Emergency Alert System."); NSBA Comments at i ("Broadcasters ... strongly support the Commission's proposal to establish a procedure for conducting national EAS testing in order to ensure EAS functionality."); NCTA Comments at 2 ("The cable industry supports the Commission's proposal to modify its rules to provide for an annual systematic nationwide test of the whole EAS infrastructure in an effort to ascertain its reliability and performance."); Cox Comments at 2 ("generally supports the Commission's proposal for annual EAS testing at the national level."); DAS Comments at 1 ("applaud[s] the idea of national EAS testing."); Sage Comments at 2 ("applauds the Commission's plan to run a national test of the Emergency Alert System" as there "is no other way to substantiate the operational readiness of the system than periodically testing it in a national environment as proposed in the Notice.").

<sup>40</sup> Sage Comments at 7 (emphasis in original).

<sup>41</sup> *Id.*

<sup>42</sup> TFT Comments at 2 (footnotes omitted). *See also* Trilithic Comments at 1 (similarly urging removal of such discretionary language).

required monthly test, the national test should replace the weekly test for the week in which the national test occurs. Accordingly, we incorporate appropriate language in the rule we adopt today. Thus, the rule we adopt today is as follows:

*National Tests.* (i) All EAS Participants shall participate in national tests as scheduled by the Commission in consultation with the Federal Emergency Management Agency (FEMA). Such tests will consist of the delivery by FEMA to PEP/NP stations of a coded EAS message, including EAS header codes, Attention Signal, Test Script, and EOM code. All other EAS Participants will then be required to relay that EAS message. The coded message shall utilize EAS test codes as designated by the Commission's rules.

(ii) A national test shall replace the required weekly and monthly tests for all EAS Participants, as set forth in (a)(1) and (a)(2) of this section, in the week and month in which it occurs.

(iii) Notice shall be provided to EAS Participants by the Commission at least two months prior to the conduct of any such national test.

(iv) Test results as required by the Commission shall be logged by all EAS Participants and shall be provided to the Commission's Public Safety and Homeland Security Bureau within forty five (45) days following the test.

## **B. Composition of National EAS Test Message**

### **1. Event Codes**

21. The proposed rule did not set forth the precise combination of Event and Location codes to be used in a national test.<sup>43</sup> For the reasons set forth below, we conclude that the first National EAS test will use the EAN and delegate authority to the Bureau to determine, in conjunction with FEMA and other EAS stakeholders, which location code or codes will be used in the first, and subsequent national EAS tests.

#### **a. Use of "EAN" versus "NPT" Event Codes**

22. Commenters all agreed on the need for a specific Event Code for the national test, but differed on the type of code to use. Some commenters advocate conducting live code tests using the EAN, because use of this live code more closely simulates the actual operation of EAS during a national alert. PEPAC states that "because [the EAN] is an existing EAS protocol that is intended to propagate throughout the EAS chain, [] its use would test the system for operational readiness most efficiently under realistic circumstances."<sup>44</sup> Other commenters cite the risks of live code testing and propose using a test code, such as the NPT.<sup>45</sup> As Maine SECC states, use "of EAN or any other 'live code' has the potential to create public confusion and panic[:] under the current EAS schema, the 'text crawl' of an EAS message that appears on a television set includes only the 'digital burst' information contained in the header codes of an EAS message" and thus "does not contain any information from the audio portion of the message," including the information that "this is only a test."<sup>46</sup> Finally, both FEMA and Sage

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<sup>43</sup> See paragraph 7, *supra*, for the definition of the terms Event, Originator and Location Code.

<sup>44</sup> PEPAC Comments at 3.

<sup>45</sup> See paragraph 7, *supra*, for a definition of the NPT.

<sup>46</sup> Maine SECC Comments at 2. Trilithic states that a national test code should "closely mimic an EAN Event," with the exception of the Event, origination time and station ID, in order to "accurately reflect the success of the EAN (continued....)"

recommend a transition, with initial use of the EAN for the first national test, but the NPT to be used for subsequent tests.<sup>47</sup> According to FEMA and SAGE, it would not be necessary to face the risk inherent with the use of a live code after the first test, and the NPT could be an adequate substitute that would allow the system to be tested without unnecessarily disturbing the public.<sup>48</sup>

23. We conclude that the EAN should be used for the initial national test, but that alternatives to live code testing may be considered for future tests. We agree with Sage's analysis that, at this point "the only way to guarantee that an EAN will work is to send an EAN as a test."<sup>49</sup> Use of any event code other than EAN will not replicate the actual promulgation of a presidential level message and thus would not provide us with an accurate assessment of how the national EAS would actually function in the event of a true presidential-level alert. Conversely, while use of a test code such as the NPT in the initial test could reveal certain relay problems, it would not test for problems related to promulgation of the EAN. In addition, commenters have pointed out that use of an NPT in the first national test could lead to a significant risk of errors because each EAS facility operator would have to manually alter its encoder/decoder programming configuration to recognize and accept the new code."<sup>50</sup>

24. For these reasons, we will use the EAN rather than an NPT for the first national test. We are aware of the difficulties attendant upon use of a live code in the test. However, we believe that we can address these difficulties through outreach and through the actual planning of the test message. These methods will allow us to use the EAN in an effective and minimally intrusive manner.

25. We also agree that there is value to testing the national-level EAS without using a "live" code. Such a test would avoid either confusing the public or inuring them to the attention-grabbing aspect of a live alert code. However, for the first test, we believe that the first EAS test needs to duplicate actual Presidential alert conditions as closely as possible. Accordingly, we will use the EAN Event Code for the first national test. We do recognize that subsequent national tests may not need to test basis connectivity and would not need to test the EAN event code. Accordingly, we delegate authority to PSHSB, in consultation with other stakeholders, to determine whether to use the EAN or another code such as the NPT for national testing following the first national test.

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distribution." Trilithic Comments at 1. Trilithic thus also appears to support use of the NPT for national testing. Sage similarly recommends that the NPT be used in the first test to "shake out problems with the relay system in an environment where the public need not be specially informed in advance, just as they are not for regular monthly tests," and recommends subsequent use of "a live code EAN ... after a suitable time for corrections to the State and Local area relay systems." Sage Comments at 8-9 (footnotes omitted).

<sup>47</sup> See FEMA Comments at 2 (recommending "that the FCC take steps to require that EAS devices process National Periodic Test (NPT) two minute time-limited messages in exactly the same fashion as the device process Emergency Action Notification (EAN) and Emergency Action Termination (EAT) messages," as this "would eventually allow testing of national level EAS without using transmission of a live-code EAN message."); Sage Comments at 8 (Given "the difficulties in using live codes in testing ... recommends only one live EAN test be performed, and that all other tests use a test code, clearly showing up in the video crawl as 'test' [with] National Periodic Test (NPT) as the code.").

<sup>48</sup> *Id.*

<sup>49</sup> Sage Comments at 8. See, also DAS Comments at 2 ("running the actual EAN and EAT codes is the most direct way to test the actual system.").

<sup>50</sup> PEPAC Comments at 3-4. See also DAS Comments at 3 (the "existing base of legacy systems will not process NPT as a live alert, like EAN and EAT, without firmware changes. ... trying to use the NPT code in its present form should not be conducted nor considered a valid national field test.").

**b. Use of the “EAT” Event Code**

26. Pursuant to our rules, the EAT event code “is the notice to all EAS Participants and to the general public that the EAN has terminated.”<sup>51</sup> Several commenters express confusion over whether the EAT will also be used in the national test.<sup>52</sup> SBE states that, if the Commission intends to use the EAT as part of the national test, that fact should be included in the proposed rule.<sup>53</sup> For the reasons we discuss below, we believe it is premature for us to make this determination at this time, and delegate to the Bureau authority to determine, in conjunction with FEMA and other stakeholders, whether an EAT code will be used during the first or subsequent national EAS tests.

27. Several commenters expressly endorse use of the EAT as a necessary element of an EAN-based national EAS test. For example, FEMA notes that if “an EAN message is utilized for a live-code test, an EAT message must follow to serve as an indication that Non-Participating National stations may resume broadcasting (assuming that NN stations are either required to cease transmission upon reception of the EAN live-code test or if they do so automatically).”<sup>54</sup> While this militates in favor of using the EAT during national testing of the EAS, other factors militate against this, at least for purposes of the first test. The comment record indicates a lack of certainty in regard to the way the EAN and EAT interact in different encoder/decoders. For example, Sage notes that “[s]ome vendors take ... unique actions on an EAN, and some of these were a source of problems in Alaska, in particular how an EAN and EAT interact, if at all, the significance of the end of message on a [sic] EAN, and other issues.”<sup>55</sup>

28. We further note that the EAT was not used in the Alaska test, which did use the EAN. Finally, Maine SECC notes that “an EAN message should be terminated by an EAT – Emergency Action Termination – message, thus suggesting that not just one, but two, national EAS alerts should be sent for testing purposes.”<sup>56</sup> This second activation of the national-level EAS may be unnecessarily disruptive. These existing uncertainties are the reason we delegate authority to the Bureau to determine, in conjunction with FEMA and other EAS stakeholders, whether to use the EAT event code in the first and subsequent national tests.

**2. Location Codes**

29. In the *Second FNPRM*, we noted that there was no location code dedicated to a Presidential EAS alert, and sought comment on whether the Commission should designate such a national level location code. We also noted that, in the absence of a national code, different EAS

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<sup>51</sup> 47 C.F.R. § 11.13(b).

<sup>52</sup> See PEPAC Comments at 4 (“the Commission should clarify whether NN stations are required to follow these procedures during national EAS tests.”); SBE Comments at 3 (SBE “cannot determine from [the proposed rule] whether or not the test will involve sending an EAT alert following the EAN alert to replicate a real alert sequence.”); FEMA Comments at 3 (the Commission should “clarify the function of an EAT message with respect to both a national live-code EAN test and actual national level EAS activations.”); Abbott Comments at 11 (“Will [National Non-participating] stations be required to go off the air as they would in a real event? Will FEMA issue an EAT as well as an EAN to let these stations know they have to go off the air?”).

<sup>53</sup> SBE Comments at 3.

<sup>54</sup> FEMA Comments at 3. See also TFT Comments at 4 (footnotes omitted) (“Not only is this procedure in keeping with the intent of these two message types but also serves to “reset” the system, should an EAS message with the Event code EAN not be properly completed with an EOM code.”).

<sup>55</sup> Sage Comments at 8.

<sup>56</sup> Maine SECC Comments at 2.

encoder/decoder manufacturers have programmed their devices to receive and transmit EANs in various ways depending on the location code used in the alerting message, a practice that may affect the ability of some EAS encoder/decoders to properly relay an EAN.<sup>57</sup> We also asked whether the Commission should adopt a requirement that all encoder/decoders should relay an EAN message irrespective of which Federal Information Processing Standard (FIPS) code or codes are used.<sup>58</sup> We specifically asked whether this disparity in encoder/decoders programming could result in breaks in the “EAS chain” that could affect the relay of an EAN during a national EAS test; and, if so, how?<sup>59</sup> As explained below, we believe that the location code for Washington, D.C. could be used as an interim national code for the first national EAS test. But we do not adopt that code or any other location code here. Rather, we delegate authority to the Bureau to determine, in conjunction with FEMA and other EAS stakeholders, the specific location code or codes to be used for the first national EAS test and for subsequent tests.

**a. Required Relay of EAN in Conjunction with a National Location Code**

30. Section 11.31(c) of the Commission’s rules requires that the header of all EAS alerts contain a code to indicate the location of the emergency.<sup>60</sup> This location code is a 6 digit ASCII code that utilizes the five character numbers assigned to the various states, counties, cities and portions of counties.<sup>61</sup> There is no national code as such, and the rule section notes that there can be no more than 31 location codes in a particular EAS alert. Thus, in order to send an EAN event code to all 50 states plus the territories, FEMA may have to initiate two separate EAN transmissions, a poor option in an emergency. As indicated above, the Commission has heard anecdotally that some encoder/decoder manufacturers have resolved this problem by programming the encoder/decoders to ignore location codes when an EAN is received, reasoning that an EAN by default is an alert for the entire country thus obviating the need for a location code. We believe that this option, although pragmatic, removes the extra layer of security that the requirement of a location code provides to the transmission of a Presidential alert, and increases the chances for mistake and tampering. A better result we think would be the adoption of a specific location code for the entire country.

<sup>57</sup> *Second FNPRM* ¶32.

<sup>58</sup> *Second FNPRM* ¶32.

<sup>59</sup> *Second FNPRM* ¶32. *See also, 2008 PEPAC Report. See also* Illinois Emergency Management Agency, *Press Release*, “Federal test of Emergency Alert System mistakenly sends message out over TV, radio airwaves” (June 26, 2007).

<sup>60</sup> Section 11.31 (c) states in that portion pertinent to location codes that:

PSSCCC—This [is] the Location code and indicates the geographic area affected by the EAS alert. There may be 31 Location codes in an EAS alert. The Location code uses the Federal Information Processing Standard (FIPS) numbers as described by the U.S. Department of Commerce in National Institute of Standards and Technology publication FIPS PUB 6–4. Each state is assigned an SS number as specified in paragraph (f) of this section. Each county and some cities are assigned a CCC number. A CCC number of 000 refers to an entire State or Territory. P defines county subdivisions as follows: 0 = all or an unspecified portion of a county, 1 = Northwest, 2 = North, 3 = Northeast, 4 = West, 5 = Central, 6 = East, 7 = Southwest, 8 = South, 9 = Southeast. Other numbers may be designated later for special applications. The use of county subdivisions will probably be rare and generally for oddly shaped or unusually large counties. Any subdivisions must be defined and agreed to by the local officials prior to use.

<sup>61</sup> *Id.*

31. Section 11.31(c) also notes that for each subsection of a location code (state, city, county, etc.), the use of all zeros indicates the entire area or portion thereof.<sup>62</sup> Consequently, the use of six zeros (000000), *i.e.*, the absence of any specific location, would default to the entire area of all states, counties, cities, etc., and thus act as a national code by default.<sup>63</sup> Most commenters on this issue favor formalizing this option as a permanent national code.<sup>64</sup> However, we share SBE's concerns that the 000000 code may not be compatible with all current equipment. According to SBE, "National level FIPS codes may not be feasible in existing hardware."<sup>65</sup> Sage suggests an alternative to using a 000000 national location code that, as we conclude below, should satisfy the problems of "orphan" encoder/decoders, at least for an initial National EAS Test. According to Sage, it "may ... be that use of an existing FIPS code, for example, Washington DC, might be best used in the EAN and national test messages."<sup>66</sup> We note that the location code for Washington DC was used in the Alaska test as a substitute for a national event code. We further note that the Washington, D.C. code is likely resident in the settings of most EAS equipment currently in the field.

32. Accordingly, we conclude that a national location code is desirable, and that 000000 eventually may prove to be useful as such a code, but that it is not clear that 000000 is a presently feasible solution. Until we are certain that at least those encoder/decoder devices at critical points of the system (PEP, LP, etc.) can correctly process and retransmit a national level alert using an all zero location code, we decline to adopt it as the national code. Instead, we affirm that determination of which location code to use for national tests – including the first national test – should be resolved at the operational level, *i.e.*, based on a determination of what

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<sup>62</sup> *Id.*

<sup>63</sup> This code is consistent with the American National Standards Institute codes (ANSI codes), a standardized set of numeric or alphabetic codes issued by the American National Standards Institute (ANSI) to ensure uniform identification of geographic entities through all federal government agencies. These standards replace the Federal Information Processing Standards (FIPS) codes previously issued by the National Institute of Standards and Technology (NIST). The entities covered include: states and statistically equivalent entities, counties and statistically equivalent entities, named populated and related location entities (such as, places and county subdivisions), and American Indian and Alaska Native areas.

<sup>64</sup> *See, e.g.* TFT Reply Comments at 2 (this "will provide a Location identification in accordance with EAS protocol and preserve the integrity and order of geographic codes already resident in legacy equipment" as well as eliminate "the necessity of transmitting the individual geographic codes for each State, territory, possession, and offshore marine area.")(footnotes omitted); Wireless RERC Comments at 4 ("The Commission's Part 11 regulations specify that an EAN code is all that is necessary for the unit to capture an EAS participant's facility. Therefore it would seem that units that also require a FIPS number are not operating correctly. Rather than requiring that all of those units be changed, for now it would be easier to require the originator of the EAN message to include a FIPS number in any EAN message, especially since the next generation EAS is currently under development."); COAT Comments at 3 (agreeing with Wireless RERC); Bell Comments at 4 (there "should be a national-level FIPS code, though the use of this for the test being planned is a question of implementation in current encoder/decoders."); NCTA Comments at 5 ("Alternatively [to requiring relay of EAN regardless of FIPS codes], creating one national FIPS code, such as 00000, would be acceptable."); TFT Comments at 4, 5 ("Because the proposed national tests are *national*, they should contain a *national* FIPS code. National tests should always pertain to a *national* event and, by definition, should have a Location code that signifies the entire nation. ... The ability for an EAS Participant to authorize the Location code '000000' ('All United States') already exists in TFT EAS Decoders")(footnotes omitted).

<sup>65</sup> SBE Comments at 7. See also Sage Comments at 12 (it would be not be appropriate at this time to add a hard requirement for a national FIPS code to EAS because many of the installed legacy devices, dating back to 1996, are ROM based, and a software change would be painful at the national level).

<sup>66</sup> Sage Comments at 11.

code is likeliest to function successfully with deployed encoder/decoders. We delegate authority to the Bureau to determine – in collaboration with FEMA - which location code, or codes, will be used for the first national EAS test and also which code or codes should be used for subsequent national tests. While use of the “DC” FIPS code might provide an interim solution for most encoder/decoder devices, we note that this could cause problems for such devices in states located adjacent to the District of Columbia as they might receive non-EAN alerts meant only for the District. We believe that resolution of such issues is appropriate for the Bureau, operating under delegated authority and in consultation with FEMA pursuant to planning for the conduct of the initial and subsequent national tests.<sup>67</sup>

33. Finally, after careful consideration, we reject our initial suggestion (supported by NCTA), that “[r]equiring the relaying of any EAN regardless of FIPS codes would simplify the origination process.”<sup>68</sup> We do not believe that “requiring FIPS codes on an EAN severely decreases its reliability in the event of a national emergency since there are significant risks of errors in the selection of each code on the transmission side and in decoding the message by EAS participants on the receive side,” nor do we think that “ignoring the FIPS code on an EAN will provide an accurate simulation for testing purposes with minimal decoder modifications.”<sup>69</sup> The requirement of a specific location code, or codes, offers an extra layer of security while minimally burdening the manufacturers and EAS Participants with complicated reprogramming requirements.

34. We agree with the TFT position that ignoring “a FIPS code will have a major, not minimal, effect on decoder modifications.”<sup>70</sup> TFT avers that most EAS Type-Notified equipment would have to be upgraded with new hardware or firmware; that ignoring a FIPS code for an EAS message will contravene the requirements of EAS message protocol, requiring changes to all legacy equipment; that EAS messages may be deemed as ‘invalid’ and may not be re-transmitted by equipment presently deployed if a FIPS codes is missing as a part of the protocol structure; and that some manufacturers of EAS Type-Notified equipment that are no longer in business may be unable to comply with a requirement that ignores the FIPS code of an EAN message.<sup>71</sup> TFT also opposes such a requirement because there might be emergency situations that lend themselves to an EAN Event code that may not affect the entire nation. Per TFT, an example would be a threat that might only relate to Hawaii, or Guam, or American Samoa, or the Virgin Islands, and not the remainder of the country, yet still require the emphasis of a presidential origination and authority.<sup>72</sup>

35. We also disagree with Abbott’s suggestion that nothing should be done about encoder/decoder device programming anomalies “until we know how extensive the problem is, and a national test may be the best way to determine this.”<sup>73</sup> Both PEPAC testing and the Alaska

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<sup>67</sup> Notwithstanding this decision, we will revisit this issue if we are persuaded there is good reason to formally adopt a national location code at some future date.

<sup>68</sup> NCTA Comments at 5.

<sup>69</sup> NCTA Comments at 5.

<sup>70</sup> TFT Reply Comments at 5.

<sup>71</sup> TFT Reply Comments at 5.

<sup>72</sup> TFT Reply Comments at 5-6.

<sup>73</sup> Abbott Comments at 14.

test revealed that a number of EAS encoder/decoders did not transmit the test signal.<sup>74</sup> One of the reasons for the Alaska test was to discover potential problems before the actual national test. We believe that it is appropriate for us to have as accurate a national test as possible to increase the public's confidence in the EAS. Accordingly, we believe we should address major known anomalies such as the location code issue prior to the first test.<sup>75</sup>

### **b. EAS Encoder/Decoder Testing**

36. Many commenters suggest some sort of equipment testing prior to a national test to determine the nature, extent, and, if necessary, remedy for any location code problems. A number advise that the Commission, in coordination with all EAS encoder/decoder manufacturers, conduct a closed-circuit test of all types of EAS encoder/decoders to determine what, if any, programming adjustments are needed.<sup>76</sup> However, DSA argues “that simulation testing is not enough” and recommends that “field testing at the national level must certainly be done to improve the system” because there “are issues unique to the deployed EAS system that can only be found by national testing” such as incorrect configurations or out of date software for EAN and EAT handling.<sup>77</sup> As an alternative to government testing of encoder/decoders, Sage recommends “that a limited purpose, informal, vendor led test could be run with less lead time, and at lower cost, than if it were performed formally at a national testing facility.”<sup>78</sup> NCTA recommends permission for “a federal agency, such as the National Weather Service, or LP1 and LP2 broadcast stations [to] conduct a simulated test before and after the national test” which “would enable cable operators, working with these entities, to assess the proper functioning of their equipment in the event of a Presidential alert since cable operators’ EAS encoders/decoders are not capable of generating an EAN message.”<sup>79</sup>

37. NAB and Sage also urge the Commission to require (or request) that EAS equipment manufacturers develop and publicize information on any modifications needed to EAS equipment to relay the national test and national live alerts.<sup>80</sup> Sage urges wide access to this

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<sup>74</sup> See 2008 PEPAC Report.

<sup>75</sup> See DSA Comments at 2 (“there is considerable social and political risk of backlash in an initial national test that could be mitigated with preliminary simulation testing and at a minimum, with rule clarification.”).

<sup>76</sup> PEPAC Comments at 3 (“FEMA and the Commission [should] coordinate with all Encoder/Decoder device manufacturers in advance of the first national test to conduct a closed circuit compatibility test to determine whether any programming adjustments are needed.”); Maine SECC Comments at 3 (one “simple way to answer these questions [regarding capability to transmit the EAN] would be for the Commission to conduct a closed-circuit test of all ENDECs currently available on the market, prior to conducting a national test” which “would give ENDEC manufacturers and programmers an opportunity to address any hardware or software issues that arise, regardless of the code used, and would allow them to notify EAS Participants of any needed upgrades.”); NSBA Comments at 4 (supporting Maine SECC comments); SBE Comments at 6-7 (prior to the national test the Commission should “conduct conformance lab testing and limited field testing of all currently-approved and fielded EAS units to determine each unit’s true reaction to an incoming EAN message. The laboratory tests should first identify the actual issues with each given EAS unit. The Commission should then meet with the EAS unit’s manufacturer (if it is still in business...), to determine solutions either globally or in individual EAS units. Depending on the outcome of the testing recommended herein, the Commission should consult with manufacturers as to what solutions are actually possible and practical”); DAS Comments at 2-3 (“We would consider participating in large scale, multi-vendor lab testing in order to work out the early issues that will certainly be discovered in the field otherwise.

<sup>77</sup> DSA Comments at 3.

<sup>78</sup> Sage Comments at 3-4. See also NAB Reply Comments at 9 (supporting this idea).

<sup>79</sup> NCTA Comments at 3.

<sup>80</sup> See NAB Comments at 8; Sage Comments at 5.

information on the vendor web sites, and elsewhere.<sup>81</sup> TFT disagrees with Sage, stating that not every EAS Participant has access to the Ethernet or Worldwide Web, and that “Websites change locations, companies change ownership, and companies change physical locations.”<sup>82</sup> Rather, TFT recommends that this “information, including geographic codes, should be included with documentation provided with each piece of EAS Type-Notified equipment when delivered to the EAS Participant.”<sup>83</sup> Sage responds that per its estimate, “at least 12,000 legacy devices, across all vendors, are still in place. Those devices were installed more than a decade ago. The manuals shipped with them at that time did not include the particulars of any of the proposed national test scenarios, or any necessary workarounds for the 31 FIPS code limitation that may be developed for the test and for EAN alerts.”<sup>84</sup>

38. At this point, it is not clear to us that testing of devices prior to the first national test is necessary. There may be less involved methods to assess the extent of the problem and any necessary solution. Accordingly, we delegate authority to the Bureau, as part of its outreach efforts, to further investigate and analyze this particular operational aspect of national testing in conjunction with all stakeholders. We also delegate authority to the Bureau to determine whether some type of pre-test operational testing is necessary, and to engage in such testing if necessary.

### c. Other Proposed Solutions

39. *Encoder/Decoder Certification.* NSBA states that the Commission should “require all encoder/decoder manufacturers to officially certify that their equipment performs each of the required steps to receive, record, and rebroadcast an EAS message and more specifically, an EAN.”<sup>85</sup> We do not agree. TFT correctly notes that the “Commission already has rules in place for handling of EAN Event code messages.”<sup>86</sup> Pursuant to section 11.34 of our rules, all EAS equipment must be certified to “show the capability of the equipment to meet the requirements of this part.”<sup>87</sup> For purposes of national testing, which for the vast majority of EAS participants, for the foreseeable future, will continue to involve receipt and transmission of a SAME-formatted EAN, we agree with TFT that requiring manufacturers to recertify prior to a first national test that their already certified equipment performs each of the required steps to receive, record, and rebroadcast an EAN constitutes an unnecessary duplication of the certification process. Moreover, it may delay implementation of the first test to an unacceptable degree. To the extent that our Part 11 rules dealing with legacy EAS need further clarification, we will deal with that in a separate proceeding.

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<sup>81</sup> Sage Comments at 5 (footnotes omitted).

<sup>82</sup> TFT Reply Comments at 7.

<sup>83</sup> TFT Reply Comments at 7.

<sup>84</sup> Sage Reply Comments at 1 (footnotes omitted).

<sup>85</sup> NSBA Comments at 13 (footnotes omitted). *See also* NSBA Reply Comments at 12. *See also* NAB Comments at 8-9 (footnotes and internal citations omitted). *See also* NAB Reply Comments at 8-9

<sup>86</sup> TFT Reply Comments at 6. TFT also implies that any anomalies in encoder/decoder programming are due at least in part to Part 11 “sections [that] are vague and may vary in interpretation by different manufacturers.” TFT states that “[s]uch a certification cannot be possible unless the Commission further details [the] handling of EAN messages.” *Id.* at 6-7 (footnotes omitted).

<sup>87</sup> *See*, 47 C.F.R. §§ 11.34(a) (encoders) and (b) (decoders).

40. *Targeted Temporary Waiver.* Sage notes that it “may be possible that some orphaned hardware, from manufacturers no longer in business, will not be able to be updated to accommodate the otherwise ‘best’ solution” and that the Commission “should consider waiving the requirements on the stations with such orphaned equipment to participate in the national EAS test until such time as the clock starts on the new CAP requirements ... so that stations are not forced to upgrade their equipment sooner than they otherwise need to do. We believe that the number of orphaned users who will not be able to update their settings as needed will be small.”<sup>88</sup> We decline to grant this waiver. First, as we state above, the first national EAS test will be of the legacy EAS system, the rules for which all EAS Participants, including those with older equipment, are currently required to comply. To the extent any participant cannot participate, it may apply for non-participant status under Section 11.18(f) of our rules.<sup>89</sup>

### C. Replacement of Required Weekly and Monthly Tests

41. In the *Second FNPRM*, we envisioned that national EAS testing will involve many of the same test elements that are already included in required monthly EAS testing at the state and local level (e.g., EAS header codes, Attention Signal, Test Script and EOM code).<sup>90</sup> Accordingly, we proposed that the annual national test would replace the required monthly test for the month in which it occurs. We saw no benefit to requiring EAS Participants to give up further broadcast time for a redundant test.

42. All commenters who commented on this proposal support it.<sup>91</sup> However, Abbott asks whether “the annual National Test [will] also replace the Required Weekly Test for the week in which it occurs” and NSBA states that it should.<sup>92</sup> We see no reason why the same justification for replacement of the required monthly test does not apply to the weekly test as well. Accordingly, for the foregoing reasons our final rule states that a “national test shall replace the required weekly and monthly tests for all EAS Participants in the week and month in which it occurs.”

### D. Test Notice, Timing, Frequency, and Outreach

#### 1. Notice

43. In the *Second FNPRM*, we did not propose to specify a set time each year for the national EAS test to occur.<sup>93</sup> We believed that avoiding a set date would yield more realistic data

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<sup>88</sup> Sage Comments at 6.

<sup>89</sup> 47 C.F.R. § 11.18(f).

<sup>90</sup> *Second FNPRM* ¶ 28.

<sup>91</sup> SBE Comments at 4 (“The National Test should clearly supersede and obviate the need for an RMT for that month.”); NAB Comments at 3, fn 6 (“the annual national EAS test should replace the Required Monthly Test (RMT) for the month in which it occurs.”); NSBA Comments at 9 (“National tests should substitute for monthly and weekly EAS testing for the month and week when such testing occurs.”), *see also* NSBA Reply Comments at 8; NCTA Comments at 3 (“it makes sense to replace the required monthly test with the annual national test for the month in which it occurs.”); Verizon Comments at 1 (supporting “the Commission[’s proposal] to eliminate ... redundancy by having the national test ‘replace the required monthly tests for the month in which it occurs.’”); Sage Comments at 9 (“[n]ational testing, in lieu of monthly test for that month, would not add to the broadcasters burden of on air test time.”). *But see* NSBA Reply Comments at 7 (The Commission should not prohibit an SECC from scheduling a second test during a month that the national test occurs.).

<sup>92</sup> Abbott Comments at 13; NSBA Comments at 9.

<sup>93</sup> *Second FNPRM* ¶ 27.

about EAS reliability and performance, and would discourage complacency. On the other hand, we believed it is essential to provide sufficient notice of such tests to EAS Participants so that they can prepare for the test and alert the public that a national-level EAS test is pending. Accordingly, in the *Second FNPRM*, we stated our belief that two months' notice provides enough preparation time for EAS Participants and we sought comment on the sufficiency of a two-month notice period. For the reasons indicated below, we adopt the two-month notice period as proposed, but delegate to the Bureau the authority to extend the notice period where it finds it necessary to do so.

44. Those commenters addressing the issue agree that it is best not to specify a set time for the national EAS test to occur.<sup>94</sup> However, commenters are divided on whether two months provides a sufficient notice period. FEMA, SBE, Abbott and Sage agree that this is sufficient.<sup>95</sup> On the other hand, NCTA states that “a 90-day notice period would give cable operators the option to notify their customers 30 days in advance in their monthly bill or other means of notification.”<sup>96</sup> And NSBA avers that the “Commission should provide at least four months ... advance notice of the national tests, at least during the early years of national testing,” as this will “better insure that the public has been adequately informed of the ‘test’ nature of the national EAS testing [and] will also provide states with sufficient time to modify their EAS testing schedules, which are often established up to a year or more in advance.”<sup>97</sup>

45. We acknowledge commenters' concerns regarding the sufficiency of a two-month notice period. However, we note that the proposed rule provided in relevant part: “Notice shall be provided to EAS Participants by the Commission *at least two months* prior to the conduct of any such national test” (emphasis added). We also anticipate a significant outreach period prior to the initial test, which will allow the industry and public stakeholders to have sufficient time to prepare. Accordingly, we adopt unaltered the two-month notice portion of our proposed rule, and delegate authority to the Bureau to determine on a test by test basis whether more than two months' notice is necessary. This should provide sufficient flexibility should a longer notification period be required.

## 2. Frequency and Timing

46. In the *Second FNPRM*, we stated our belief that regular testing of the EAS is necessary to ensure that it can function properly during emergencies.<sup>98</sup> We also stated our belief that testing the EAS nationally at least once a year may be necessary to produce reliable results

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<sup>94</sup> NAB Comments at 3, fn. 3 (“a reasonable means to prevent complacency and produce a more realistic picture of EAS functionality.”); SBE Comments at 3 (“agrees with the Commission that such should be done on different dates each year, in order to avoid complacency.”); NSBA Comments at 8 (footnote omitted)(“no established set testing date[] is the correct approach.”).

<sup>95</sup> FEMA Comments at 2 (concurring “with the recommendation for a two-month notice period.”); SBE Comments at 4 (“Two months is adequate prior notice for this event.”); Abbott Comments at 12 (“Two months may be sufficient ... Broadcast audiences are already familiar with the Required Monthly Tests and may already be under the impression that such tests are “national” in nature.”); Sage Comments at 2 (““pre-notification of approximately 60 days should be adequate, although an additional month may be necessary to adequately prepare stations for the first national test.”). See also NAB Comments at 3, fn. 3 (supporting two months' notice as sufficient in initial comments).

<sup>96</sup> NCTA Comments at 3.

<sup>97</sup> NSBA Comments at 8. See also NAB Reply Comments at 3 (now stating two months' notice “may prove too brief”).

<sup>98</sup> *Second FNPRM* ¶ 26.

regarding the on-going operational readiness of the EAS. On the other hand, we did not propose to require national testing more frequently than once a year, because we were concerned that this could cause unnecessary disruption of regular broadcasting and other service transmission to the public.<sup>99</sup> We also wished to minimize attendant costs. We sought specific comment on this proposal.

47. *Test Frequency.* Our proposal that the national test be held annually met with wide support in the comment record, and we adopt it accordingly.<sup>100</sup> As NAB notes, this will “produce useful, consistent data on the functional reliability of the system[,] enable measurement of year over year improvements [and] prevent complacency.”<sup>101</sup>

48. We do not agree with those commenters that argue that, at least initially, the national test should occur more frequently than once per year. Although FEMA notes that “the initial national EAS test may yield a number of lessons learned many of which may involve simple, low-cost, rapidly implementable solutions” and thus may justify “a second national EAS test without waiting a full year,”<sup>102</sup> we believe that many of these issues will be resolved during the preparation for the initial test. We believe that a national EAS test is a significant and potentially disruptive event that should not occur too often. We agree with NAB that more “frequent national testing of the EAS could cause the public to ‘tune out’ the exercises, ... could cause unnecessary disruption of regularly scheduled programming[, and] would also unnecessarily burden local stations, especially smaller stations.”<sup>103</sup>

49. On the other hand, we do not adopt NAB’s suggestion that the Commission recognize that it may elect not to conduct a national EAS test in a particular year based on the requirement that all EAS Participants obtain and install CAP compliant equipment within 180 days of FEMA’s adoption of CAP.<sup>104</sup> The national EAS test is strictly of the legacy system and is independent of the transition to CAP. We believe that independent testing of the existing EAS remains important because it is likely that the existing EAS will continue to function as a critical element of any future alerting system.<sup>105</sup> Moreover, while we expect that FEMA’s adoption of

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<sup>99</sup> NSBA Comments at 8 (footnote omitted) (The national tests should be scheduled at least 6 months apart to allow for a thorough review and assessment of the results of each test and the opportunity to correct any deficiencies before the next test). *See also* NSBA Reply Comments at 5.

<sup>100</sup> *See* FEMA Comments at 2 (“EAS should be tested nationally at least once a year on a regular basis.”); COAT Comments at 2 (“testing should be conducted (at least) once a year.”); SBE Comments at 3 (“a yearly test is adequate.”); NAB Comments at 1 (supporting “annual testing of the Emergency Alert System.”); NSBA Reply Comments at 5 (“conducting the national test once a year ... is the correct approach.”); NCTA Comments at 2 (“nationwide testing on a yearly basis is sufficient to evaluate EAS readiness”); Sage Comments at 2 (“a once a year test ... should be adequate.”); DSA Comments at 3 (“We agree ... that yearly national tests be adopted.”).

<sup>101</sup> NAB Reply Comments at 2.

<sup>102</sup> FEMA Comments at 2. FEMA further notes that it is “fully cognizant of the cost, programming disruption and public confusion that may result from excessive testing and do not make this recommendation lightly.” *Id.* *See also* PEPAC Comments at 2.

<sup>103</sup> NAB Comments at 2. *See, also* NCTA Comments at 2-3 (“mandating national testing no more than once-a-year will avoid unnecessary disruption of television viewership and other communications services to the public”).

<sup>104</sup> NAB Comments at 3-4.

<sup>105</sup> *See, e.g.,* FEMA, IPAWS Projects, EAS Modernization and Expansion Project, available at <http://www.fema.gov/emergency/ipaws/projects.shm> (last accessed Sep. 1, 2010). *See, also* NJBA Comments at 7. (“during the Haitian rescue effort, ... portable battery and solar powered radios were the most reliable and ubiquitous communications resource in our humanitarian and rescue endeavors.”).

CAP as part of IPAWS will spur the development of a next generation EAS, there is as yet no established timetable for the replacement of the existing EAS architecture. Rather, we expect that FEMA will rely on the existing EAS daisy chain structure for some time.<sup>106</sup>

50. *Timing.* Commenters also raise issues regarding the time of day in which the first national test will occur. Two commenters advise the Commission to be mindful of time zone differences when conducting national tests.<sup>107</sup> Cox advises the Commission that “the ideal time of day for scheduling a national EAS test is between 5:30-6:00 a.m. Eastern time” in order to minimize “disruption and confusion that viewers and listeners inevitably experience when testing occurs.”<sup>108</sup> FEMA suggests that it “and the FCC confer with industry representatives to establish a window or windows for optimal dates to conduct a national test.”<sup>109</sup> Finally, Cox suggests that the Commission “put suggested testing times to an online vote of EAS Participants.”<sup>110</sup>

51. We are aware that with the initiation of national EAS testing we are treading in uncharted territory. As we proceed, our highest priority must be to insure that the national-level EAS functions in its first test as it is designed to function in the event of an actual, national-level emergency. Although we are aware that this test will involve significant cost and disruption to daily operations, many variables beyond those of concern to EAS Participants must be accounted for prior to scheduling the test, and we cannot base our decision on when to schedule a national test on a vote of EAS Participants. Accordingly, we delegate to the Bureau authority to determine, in consultation with stakeholders, the time of day during which the initial national test will take place.<sup>111</sup>

### 3. Outreach

52. We anticipate that outreach will constitute a major aspect of preparation for the first national EAS test. Several commenters note this, and raise a number of questions in this regard. Abbott, for example, asks “who will be responsible for a public education campaign to prevent panic among listeners and viewers? Will the FCC have requirements similar to the DTV education campaign where stations had to include information on their efforts in the Public Files?”<sup>112</sup> Abbott also asks whether there will “be a notification role for state broadcaster

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<sup>106</sup> Indeed, we note that FEMA is actively expanding the number of PEP stations. *See, e.g.* FEMA, IPAWS Projects, available at <http://www.fema.gov/emergency/ipaws/projects.shtm#2> (last accessed Sep. 17, 2010) (Primary Entry Point expansion).

<sup>107</sup> Abbott Comments at 12-13 (“the test has to be coded to run across five time zones.”); Cox Comments at 3 (“be mindful of the multiple time zones across which the national EAS test will occur (including in Alaska and Hawaii”).

<sup>108</sup> Cox Comments at 3. *See also* NSBA Reply Comments at 6; NAB Reply Comments at 3 (both supporting this view).

<sup>109</sup> FEMA Comments at 2. *See also* Cox Comments at 2 (proposing “that the Commission schedule the annual test in consultation not just with FEMA but EAS Participants as well. Cox believes that such consultation with local stations will strengthen the effectiveness of testing and provide more meaningful results.”).

<sup>110</sup> Cox Comments at 2.

<sup>111</sup> This delegation includes authority to deal with such issues as clock accuracy in encoder/decoders, and time of day for testing. *See, e.g.* EMF Ex Parte at 3 (“EAS equipment contain clocks which can be prone to drifting, even after reasonable efforts by the operators to ensure their accuracy. . . . Also, some states, including Arizona, Connecticut, and Hawaii, do not participate in daylight savings time. And some operators choose not to adjust their clocks for daylight savings time, so they will appear to be an hour out of sync.”).

<sup>112</sup> Abbott Comments at 11.

associations or SECC's?"<sup>113</sup> A number of commenters also provide specific proposals for Commission outreach.<sup>114</sup>

53. In addition to further determination of operational aspects of the test, much work also remains regarding outreach and coordination. Because we recognize the wide potential impact of a national test, we hereby delegate authority to the Bureau to work with our Federal partners and other stakeholders in order to disseminate notice of the test as widely as possible, through as many outlets as possible, including a public notice from Federal authorities. In addition, we instruct the Bureau to examine carefully all of the foregoing proposals submitted by commenters.

#### **E. Test Data**

54. For the reasons set forth below, we adopt the testing and reporting requirements we proposed in the *Second FNPRM*.<sup>115</sup> Accordingly, within forty five (45) days of the date of the first national EAS test, EAS Participants will be required to record and submit to the Commission the following test-related diagnostic information for each alert received from each message source monitored at the time of the national test:

- whether they received the alert message during the designated test;
- whether they retransmitted the alert;
- if they were not able to receive and/or transmit the alert, their 'best effort' diagnostic analysis regarding the cause(s) for such failure;
- a description of their station identification and level of designation (PEP, LP-1, etc.);
- the date/time of receipt of the EAN message by all stations; the date/time of PEP station acknowledgement of receipt of the EAN message to FOC;
- the date/time of initiation of actual broadcast of the Presidential message;
- the date/time of receipt of the EAT message by all stations;
- who they were monitoring at the time of the test, and the make and model number of the EAS equipment that they utilized.<sup>116</sup>

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<sup>113</sup> Abbott Comments at 12. *See also* Abbott Comments at *Id.* (asking whether "these [two-month] notices [prior to the test] go directly to each station" or whether "broadcasters be responsible individually for digging this information out of the Daily Digest?").

<sup>114</sup> *See e.g.* NSBA Comments at 6-7 ("Much work ... needs to be done in a number of states to educate governors, state, regional and local officials about the importance of EAS and the national test" and NSBA suggests such efforts as "a letter to each governor informing them about plans for the test and the FCC's action making broadcast and cable carriage of their alerts mandatory" as well as "sending speakers to ... conventions of stakeholders such as police and fire chiefs, regional councils of government and emergency operations managers."); SBE Comments at 6 (supporting "the involvement of broadcasters, broadcast associations and EAS equipment manufacturers in this process"); Abbott Comments at 14 (broadcasters need to be more involved in the coordination between the FCC, FEMA and NWS); PEPAC Comments at 3-4 (emphasis in original) ("All nationwide EAS tests should commence with a 'live' EAN code, followed by an audible announcement that "*This is a nationwide test of the Emergency Alert System,*" and should terminate with an appropriate End of Message ('EOM').").

<sup>115</sup> *See, Second FNPRM* ¶ 29.

<sup>116</sup> OMB has previously approved this collection. *See* Notice of Office of Management and Budget Action, OMB Control Number 3050-0207 (March 10, 2010).

## 1. Necessity of Mandatory Data Collection from All EAS Participants

55. Most commenters on the issue agree that we should collect at least some diagnostic information related to national EAS testing.<sup>117</sup> However, NSBA disagrees, stating that the “current data stations have been required to log has been more than adequate in determining whether individual station EAS equipment and the daisy-chain structure are working properly.”<sup>118</sup> NSBA suggests that “the Commission should permit licensees to *voluntarily* provide comments that will necessarily include some of the new information the Commission is proposing to collect beyond the traditional log data.”<sup>119</sup> Cox similarly asserts that “[r]outine equipment testing by broadcasters is sufficient to ensure the public receives alert and warning messages in an accurate and timely fashion,” and that any “such reporting should be ... limited to those EAS Participants whose particular tests reveal some type of anomaly.”<sup>120</sup>

56. PEPAC, while supporting the scope of our data collection, suggests that the Commission require the submission of such information only after the first two initial nationwide tests, claiming “the submission of such data once routine annual testing has commenced would be unnecessary since EAS Participants would be required to record those events in the EAS log as the Required Monthly Test for the month in which the test occurred.”<sup>121</sup> Conversely, EMF suggests that the Commission only require submission of test related information after two initial national tests have been conducted, and also “limit the scope of the reporting requirement to a small ‘sampling’ of stations.”<sup>122</sup>

57. We disagree with the foregoing reasoning. If current data collection and reporting procedures were sufficient to determine whether the daisy-chain structure is working properly, there would be no need for national testing. We believe that the nature of the national test – i.e., a test of a system as well as of its components -- justifies a separate collection and reporting of the test data to the Commission that will allow the Commission to analyze the data in an organized and aggregated manner. We also disagree that test data collection becomes unnecessary after the first two national EAS tests. As we discuss further below, the additional data we seek remains relevant for a variety of reasons even after the first two tests have been conducted. We also disagree that data collection is unnecessary until after the initial two national tests. Without such collection, we would have no initial means of determining whether the EAS is functioning properly. Finally, were we to decide that any the data beyond that already required to be logged should only be provided to the Commission on a voluntary basis, this would create a high probability that we would get a patch-work response, and thus we, as well as the Federal and State authorities with which we will be sharing this information, as we discuss in paragraph 74 below, would gain only an incomplete picture of the state-of-readiness of the EAS. We believe this would also be the case were we only to receive data from a small sampling of EAS Participants.

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<sup>117</sup> See e.g. NCTA Comments at 4 (“Cable operators generally support the reporting concept”); Sage Comments at 7 (“stations should report the results of the test.”); TFT Comments at 4 (the “[d]ate and time of receipt and transmission of both [the EAT and EAN] messages should be reported.”)(footnotes omitted).

<sup>118</sup> NSBA Comments at 10 (footnotes omitted).

<sup>119</sup> NSBA Comments at 11 (emphasis in original).

<sup>120</sup> Cox Comments at 3, 10.

<sup>121</sup> PEPAC Comments at 4.

<sup>122</sup> EMF Ex Parte at 1.

## 2. Data to be Reported

58. While there was widespread agreement that some test data collection is warranted, there was also a variety of opinions on the scope of the test data to be collected. FEMA indicates it was too narrow, and suggests “that the FCC collect EAS device operating software version information in addition to the information listed in paragraph 29 of the Notice.”<sup>123</sup> However, TFT disagrees, stating that given the great variety of operating software already extant in the field, and frequent updates of that software, “this reporting requirement will generate volumes of data” and create a “burden too large for both the Commission and EAS Participants to acquire and archive.”<sup>124</sup> TFT suggests a “voluntary requirement that EAS Participants keep current software/firmware in their equipment.”<sup>125</sup> We agree with TFT’s reasoning, and will make provision for voluntary submission of this information.

59. More commenters suggest that our proposed data collection was, to at least some degree, too broad. Verizon states broadly that “the information reported to the Commission may vary greatly depending on the given characteristics of each EAS participant” and the Commission should thus “give participants some latitude in providing the requisite information to allow [it] to determine the success or failure of the national test.”<sup>126</sup> SBE similarly states that the Commission “asks for information that many EAS participants will not be able to provide. At many stations, the principal data that such broadcasters will have available is what is shown on the EAS unit printout.”<sup>127</sup> Accordingly, SBE suggests that “the Commission request only the date and time that the alert was received; the date and time that the alert ended (*i.e.* when the EOM was received); and the station from which the alert was received.”<sup>128</sup> Abbott and NSBA state that the first three data items sought are reasonable as they are information already required to recording in station logs.<sup>129</sup> However, Abbott adds that “[s]tations that are unstaffed or automated may not be able to submit some of this information.”<sup>130</sup>

60. While NAB supports “collection and reporting of most of the information suggested in the Second Further Notice,” it states that reporting “the date and time of the Emergency Action Notification (EAN) messages sent by all message sources that a station monitors ... could be impossible for some EAS Participants because most, if not all, EAS decoders are designed in a manner that, once an EAS Participant receives an EAN message from one source, it locks out other sources.”<sup>131</sup> NSBA and EMF suggests the same problem.<sup>132</sup>

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<sup>123</sup> FEMA Comments at 2.

<sup>124</sup> TFT Reply Comments at 4.

<sup>125</sup> TFT Reply Comments at 4.

<sup>126</sup> Verizon Comments at 3. *See also* NAB Reply Comments at 5.

<sup>127</sup> SBE Comments at 4.

<sup>128</sup> SBE Comments at 4-5. SBE continues that this “should be provided to the Commission for all instances of the alert that were received, including any latent relayed alerts.” *Id.* at 5.

<sup>129</sup> Abbott Comments at 13; NSBA Comments at 9.

<sup>130</sup> Abbott Comments at 13. *See, also* NSBA Comments at 11 (footnotes omitted) (for stations using “automated equipment to receive, retransmit, and to log EAS alerts and tests ... it would not be possible to provide most of the additional data proposed by the Commission.”).

<sup>131</sup> NAB Comments at 4-5 (footnotes and internal citations omitted).

<sup>132</sup> NSBA Comments at 11; EMF Ex Parte at 2.

61. SBE states “that the make and model of EAS equipment used is a matter that is within the discretion of the individual station and the Commission should not have any interest in that data, other than a requirement that the equipment be approved through the normal equipment authorization program.<sup>133</sup> Finally, SBE notes although the Commission is requesting “the date/time of receipt of the EAT message,” it is unclear whether the Commission and FEMA intend to send an EAN message followed by a totally separate EAT message.”<sup>134</sup>

62. We are very mindful of the limited budgets and manpower of many EAS Participants. In the *Second FNPRM*, we established the proposed test data to be collected with this in mind. As noted by several commenters, EAS Participants are already required to maintain logs indicating whether they received the alert message during the designated test; whether they retransmitted the alert; and, if they were not able to receive and/or transmit the alert, their ‘best effort’ diagnostic analysis regarding the cause or causes for such failure. They are also presently required to maintain the date and time of receipt of an EAN and EAT, which, as SBE notes, is readily available from a station’s EAS encoder/decoder printout.<sup>135</sup> We particularly note that this latter request is *not*, as NAB, NSBA, and EMF suggest, for the date/time at which all stations a Participant was monitoring *sent* the EAN or EAT message. As previously discussed, the Commission and its federal partners have not yet made a final determination on whether the EAT code will be used in the first national tests. However, if an EAT is not used, then Participants will of course not be required to provide the Commission with the date/time of receipt of the EAT message.

63. Our new rule simply requires that EAS Participants provide this readily available data to the Commission, rather than merely log it. Such provision is necessary for its accurate and timely assessment. Given that we will provide an electronic option for submission of such information as we discuss in paragraph 68 below, the argument that its provision is unduly burdensome is even less compelling.

64. With regard to the other required data, no commenter explained why a Participant’s description of its station identification, level of designation (PEP, LP-1, etc.), and who it was monitoring at the time of the test, is either unnecessary or unduly burdensome. To the contrary, we believe that such information will allow Commission staff to organize and collate the other information, as well as help provide an overview of the functioning of national EAS. Nor should this information take more than a few moments for each EAS Participant to compile. We also do not see, nor do Abbott and NSBA suggest, how any of this information cannot easily be gathered and submitted within forty five days after the national alerting event occurs, even from stations that are generally unstaffed or automated. The requirement for submission of the date/time of PEP station acknowledgment of receipt of the EAN message to FOC, applies only to the several dozen PEP stations, not to the vast majority of EAS Participants.

65. Finally, we disagree with SBE that the Commission should have no interest in the make and model number of the EAS equipment that EAS participants utilize. As the *Second FNPRM* indicates, and several commenters confirm, different EAS encoder/decoder manufacturers have programmed their devices to receive and transmit EANs in different ways,

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<sup>133</sup> SBE Comments at 5. *See also* NSBA Reply Comments at 10 (agreeing).

<sup>134</sup> SBE Comments at 5. *See, also* NAB Comments at 5 (noting same problem).

<sup>135</sup> *See* 47 C.F.R. § 11.61(b).

which may affect the ability of some EAS encoder/decoders to properly relay an EAN.<sup>136</sup> Accordingly, the Commission needs an overview of the types and distribution of various models of EAS encoder/decoders throughout the country, both to correct this problem, and to be able to correct any similar possible problems in the future. However, for the reasons discussed below, this, and the other data we gather will remain confidential as set forth in subsection 5 below.

### 3. Reporting Method

66. Commenters raise a number of questions regarding the means by which EAS Participants would be required to submit the required information.<sup>137</sup> However, there is widespread agreement that the Commission should make this submission as easy as possible.<sup>138</sup> Many commenters request Commission provision for the submission of such information electronically, either through a dedicated website, by email, or through some other means.<sup>139</sup> Several commenters also suggest that there be a method for Participants to add their own comments.<sup>140</sup> Abbott also asks several other relevant questions, including whether there will be a role for SECCs in collecting this information, and how the information will be collected from cable TV providers.<sup>141</sup> Abbott also suggests that FEMA require “state and local emergency managers with EAS equipment to provide similar reports to the FCC and their SECCs.”<sup>142</sup>

67. As we indicate in the prior section, we believe that the extent and manner of our reporting requirements largely reflect data that the parties collect in the normal course of business, and thus imposes minimal burden. However, we acknowledge the interest in electronic filing methods expressed by the commenters, and agree that electronic filing of test reports and related data could lessen reporting burdens. Accordingly, we will shortly be releasing a public notice establishing a voluntary electronic reporting system that EAS test participants may use as part of their participation in the national EAS test. In this system, discussed in more detail in the public notice, EAS participants, in the period before the actual test, could input essential information via a web-based interface into a confidential database that the Commission would

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<sup>136</sup> *Second FNPRM* ¶ 32. *See, also, e.g.* SBE Comments at 6; Sage Comments at 5.

<sup>137</sup> *See e.g.* Abbott Comments at 12 (Abbott asks who will collect this information following the test and how will it be collected? Will stations have to submit reports through the mail or via the Internet?); Wireless RERC Comments at 4 (the “proposed rule does not specify how EAS participants will report their results of the national test to the Commission”).

<sup>138</sup> *See e.g.* NCTA Comments at 4 (Commission should “design a simple and straightforward national test form and provide an easy way for operators to enter the appropriate data for mandatory reporting purposes.”).

<sup>139</sup> *See e.g.* NSBA Comments at 11 (“the Commission [should] create a simple electronic form on the Commission’s website”); Cox Comments at 10 (“such reporting should be web-based.”); Verizon Comments at 3 (“the Commission should allow results to be delivered electronically, such as through e-mail.”); NSBA Reply Comments at 10 (agreeing with Verizon’s comments); Sage Comments at 10 (the Commission should “provide an online system for filing, including a way to receive the data as an emailed form.”); Wireless RERC Comments at 4 (“the reporting would best be accomplished through a web site”); COAT Comments at 3 (agreeing with Wireless RERC recommendations); EMF Ex Parte at 2 (“Any formal reporting requirements should provide for electronic filing of data and automate the overall process to the extent possible.”).

<sup>140</sup> *See e.g.* Abbott Comments at 13 (voluntary “comments on the audio quality of the tests” might be relevant); SBE Comments at 5 (“within the response mechanism, the opportunity should exist for the EAS participant to provide additional comments”); NSBA Comments at 11 (allow “stations to voluntarily describe in detail their experiences with the national tests.”).

<sup>141</sup> Abbott Comments at 12.

<sup>142</sup> Abbott Comments at 13.

use to monitor and assess the test. This information would include station call letters, license identification number, geographic coordinates, EAS assignment (LP, NP, *etc*), EAS monitoring assignment, as well as a 24/7 emergency contact for the EAS Participant. On the day of the test, EAS Test participants would be able to input immediate test results, (*e.g.*, was the EAN received and did it pass) into a web-based interface. Test participants could submit the remaining data called for by our reporting rules electronically within the 45 day period. We believe that structuring an electronic reporting system in this fashion would allow the participants to populate the database with known information well prior to the test, and thus be able to provide the Commission with actual test data, both close to real-time and within a reasonable period in a minimally burdensome fashion.<sup>143</sup> We are sufficiently convinced that this electronic reporting system would offer an attractive and efficient reporting alternative to a paper system that we will allow any EAS Participant that chooses to use the voluntary electronic reporting system to do so in lieu of the system that we adopt today.

#### 4. Sufficiency of 30-day Reporting Period

68. In the *Second FNPRM*, we proposed requiring that this information be provided to the Commission no more than thirty (30) days following the test date.<sup>144</sup> Although most commenters indicate that such time period would be sufficient,<sup>145</sup> NCTA states that it “would be helpful for EAS participants to have at least a 45-60 day window to submit their test data instead of 30 days given unpredictable operational and technical demands at the system-level.”<sup>146</sup> It notes that, in addition, “many cable companies have centralized government compliance and reporting departments, which review documents from the systems prior to filing. For administrative purposes, a filing period of more than 30 days will assist with accurate and complete submission of EAS reports.”<sup>147</sup> In its reply comment, NSBA agreed with NCTA.<sup>148</sup> We believe that the priority is to get accurate post-test data from participants, but believe that a minimal extension of the 30 day period will suffice. Accordingly, we will require that EAS national test participants provide their test data to the Commission within 45 days of the test.

#### 5. Public Disclosure of Data

69. In the *Second FNPRM*, we anticipated making test data publicly available.<sup>149</sup> We sought comment on whether there were any concerns with this, or whether we should instead limit availability to, for example, only our Federal partners and/or authorized personnel of state, tribal and local government emergency management agencies.<sup>150</sup>

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<sup>143</sup> We do not at this time envision a need for the SECCs to become involved in the collection of this information. FEMA must itself determine the extent to which it would like similar information from state and local emergency managers.

<sup>144</sup> *Second FNPRM* ¶ 30.

<sup>145</sup> PEPAC Comments at 4 (“30 days is a reasonable amount of time within which to report the test-related information.”); SBE Comments at 5 (“a 30-day reply window is adequate.”); Sage Comments at 10 (“Thirty days is sufficient [to provide data to the Commission], provided an electronic method of filing is provided.”).

<sup>146</sup> NCTA Comments at 4 (footnote omitted).

<sup>147</sup> NCTA Comments at 4 (footnote omitted).

<sup>148</sup> See NSBA Comments at 11, NSBA Reply Comments at 10.

<sup>149</sup> *Second FNPRM* ¶ 30.

<sup>150</sup> *Second FNPRM* ¶ 30.

70. Only two commenters support such public release.<sup>151</sup> The great majority of commenters on the issue oppose this. Many of these commenters note that release of such information could make the EAS more vulnerable to attack.<sup>152</sup> NAB also states that in some cases, “due to the complexity of the system and its dependence on multiple entities, it can be extremely difficult to ascertain the precise cause of failure. In cases such as these, publication of data on specific participants could create unnecessary public concern.”<sup>153</sup> Other commenters indicate that revelation of information about particular Participants could cause unnecessary embarrassment and discourage enthusiastic compliance. For instance, Sage indicates that “[f]ailure data and analysis is more likely to be complete if the station knows that the data won’t be made public.”<sup>154</sup> Others note that such disclosure could interfere with the competitive market.<sup>155</sup>

71. However, many of the same commenters do support release of such information to governmental emergency management agencies. For example, PEPAC states that “disclosure of general information relating to the results of nationwide EAS tests would benefit the

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<sup>151</sup> See Wireless RERC Comments at 4 (publicly available web sites with the data would allow “EAS participants and the public including people with disabilities [to be] aware of the system successes and failures”); COAT Comments at 3-4 (generally agreeing and asking “that any such reporting tool be accessible to and usable by people with disabilities.”).

<sup>152</sup> FEMA Comments at 2 (“making too much detail [sic] information publicly available may have a negative influence on critical elements of the national EAS.”); NAB Reply Comments at 7 (agreeing with FEMA’s assessment); NSBA Comments at 12 (footnotes omitted) (“The government has gone to great lengths to ‘harden’ certain broadcast stations against terrorist attacks. It would not serve our country well if data revealing the vulnerabilities of the EAS system got into the wrong hands ...”); NAB Comments at 7 (“In cases where the cause of failure in the system can be precisely identified, the Commission should carefully consider whether security or similar sensitive interests would counsel against widespread dissemination of such specific information, including EAS Participant-specific information.”); COAT Comments at 4 (recognizing “the need for some information not to be made available if it is security related.”); Cox Comments at 4 (“Given the importance of EAS as a means of quickly providing accurate information to the public, any attacks on or unauthorized use of EAS could be devastating. Cox accordingly urges the Commission to account for security issues when weighing the benefits of publicizing EAS operational details.”); Verizon Comments at 4 (“The public disclosure of such information could reveal details about shortcomings in the EAS that could undermine efforts to protect national security.”); Sage Comments at 7 (“while statistics should be made available to the general public, details on each test reception should not be, in this era of added attention to security.”); Trilithic Comments at 1 (test data, if made public, “may provide information on vulnerable entry points and distribution paths which could be exploited to the detriment of the United States” and “would reveal the EAS distribution architecture for the entire nation.”).

<sup>153</sup> NAB Comments at 7-8. See also NSBA Comments at 12 (footnotes omitted) (“It would not serve our country well if data revealing the vulnerabilities of the EAS system ... were misinterpreted in a way that led to public panic.”).

<sup>154</sup> Sage Comments at 10. See also FEMA Comments at 2 (recommending “that detailed station specific information not be publicly available,” because “[o]ur purpose in conducting national level tests of the EAS is not to embarrass or bring pressure upon any regulated entity [but rather] to discover what portions of the system work, what portions need improvement and to establish a plan to execute such improvements as may be necessary.”).

<sup>155</sup> NAB Comments at 8 (“publication of data on specific participants could create ... unnecessary tension among the various entities participating in the process.”); Verizon Comments at 4 (“such information could include details about the location of an EAS participant’s network facilities or the boundaries of its service offerings. Because many EAS participants directly compete against one another, the public disclosure of such information could lead to the release of competitively sensitive information and be competitively harmful.”); Sage Comments at 10 (“equipment types installed at various locations is marketing data that a vendor would love to have on their competitors, and hate to have known about themselves”).

Commission, its Federal partners, and state and local authorities.”<sup>156</sup> NSBA states that “[t]he Commission can decide at a later time whether matters of homeland security remain paramount, but there should be no decision now to make the data public.”<sup>157</sup>

72. While not supporting public release of the data, Abbott nevertheless asks that this information be shared with the SECCs “so they know where there are weaknesses or problems that need to be addressed.”<sup>158</sup> DAS similarly asks that test results be shared with EAS equipment vendors even if the results are not made fully public because “EAS equipment vendors are in essence equal partners with our broadcast customers in regards to diagnosing the results of EAS testing and providing remediation for failures. EAS broadcasters look first to the vendors for expertise.”<sup>159</sup>

73. Based on the foregoing comments, we believe that any benefit accruing to the public from disclosure of test data is outweighed by the potential dangers to national security from such release. Accordingly, test data will be presumed confidential and disclosure of test data will be limited to FEMA, NWS and EOP at the federal level. At the State level, test data will be made available only to State government emergency management agencies that have confidential treatment protections at least equal to FOIA.<sup>160</sup> The process by which these agencies would receive test data will comport with those used to provide access to the Commission’s NORS and DIRS data.

#### **F. Coordination with FEMA**

74. FEMA is the agency responsible for transmission of a presidential-level alert to the PEP stations, and for the implementation and maintenance of PEP stations.<sup>161</sup> Moreover, FEMA is integrating EAS into IPAWS. Accordingly, in *Second FNPRM* we noted that we plan to coordinate with FEMA on a regular basis in the implementation of the national test.<sup>162</sup> Although we stated our belief that it is unnecessary to specifically state in our proposed rule that we will coordinate with FEMA on a regular basis, we sought comment on whether this should in fact be written into the rule.<sup>163</sup>

<sup>156</sup> PEPAC Comments at 4-5. *See also* NAB Reply Comments at 7 (supports disseminating “EAS Participant-specific data [only] to ‘authorized personnel of state, tribal and local government emergency management agencies.’”); NSBA Comments at 12 (footnotes omitted) (“the State Associations have no problem with the Commission sharing the results of the testing data with its federal and state emergency management partners to assist with the analysis and actually urge the Commission to do so, but there is simply no compelling reason to share the data beyond these partners.”); Sage Comments at 10 (endorses providing the raw data “to emergency planners and other authorities, but [it] should be marked confidential and not be made public.”); Verizon Comments at 3 (“While test reports filed with the Commission could be made available to state and local authorities in connection with ‘their evaluation of the system’s regional and local performance,’ public disclosure of such information is not necessary for the Commission to accomplish its goal of providing state and local authorities with ‘necessary diagnostic information’”) (internal citation omitted).

<sup>157</sup> NSBA Comments at 12 (footnotes omitted).

<sup>158</sup> Abbott Comments at 13.

<sup>159</sup> DSA Comments at 3.

<sup>160</sup> 5 U.S.C. § 552.

<sup>161</sup> *See Memorandum, Presidential Communications with the General Public During Periods of National Emergency*, The White House (Sept. 15, 1995) (*1995 Presidential Statement*).

<sup>162</sup> *Second FNPRM* ¶ 31.

<sup>163</sup> *Second FNPRM* ¶ 31.

75. There was little comment on this issue.<sup>164</sup> Based on this paucity of comment, we find it is unnecessary to specifically state in our proposed rule that we will coordinate with FEMA on a regular basis. However, we do agree with COAT on the need for transparency regarding how the national test process will be implemented. As has been our practice in other matters, we plan to issue joint public notices with FEMA on a regular basis in regard to the national EAS test.<sup>165</sup>

### G. Other Issues

76. Commenters raised a number of other issues in response to the *Second FNPRM*, which we address below.

#### 1. Enforcement

77. Many commenters requested that the Commission waive enforcement action for rule violations revealed by the national EAS test.<sup>166</sup> For example, SBE states that the “emphasis should be on encouraging participation, and as a public/private ‘partnership’ of entities involved in a program for the common good, not as a program that will result in Commission sanctions for relatively minor errors or omissions by participants acting in good faith.”<sup>167</sup> Sage adds that the Commission “should be sensitive to the ‘self incrimination’ aspect of such data collection. The quality of data received will be much better if participants are not worried that a submission of a failure report will come with an \$8000 NAL as encouragement to do better next time.”<sup>168</sup> Bell likewise states that EAS should be designed for quality rather than using tests to determine failures.<sup>169</sup>

78. The Commission’s policy goal in requiring national EAS testing is to ensure the system will work as designed if activated by the President during an actual emergency. We

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<sup>164</sup> *But see* SBE Comments at 6 (should be mentioned in the rule, “as a means of describing the comprehensive nature of the national EAS tests.”); COAT Comments at 5 (COAT the FCC rule “should be clear about how coordination with [FEMA] occurs and on what regular basis it does so,” and in this regard also recommends issuance of “some public awareness and educational notices and Fact Sheets.”).

<sup>165</sup> *See, e.g.* FEMA and the FCC Announce Adoption of Standards for Wireless Carriers to Receive and Deliver Emergency Alerts via Mobile Devices (rel. Dec. 7, 2009), *available at* <http://www.fema.gov/news/newsrelease.fema?id=50056> (last accessed Sep. 8, 2010).

<sup>166</sup> *See, e.g.* PEPAC Comments at 5 (“the Commission should make clear that the results of any nationwide EAS tests would not be used as the basis for an enforcement action against any EAS Participant for potential violations of the EAS requirements.”); SBE Comments at 3 (“National EAS tests should be viewed by the industry, and the Commission should treat them, as national “exercises”, rather than as “tests”.”); NAB Reply Comments at 7-8 (the “Commission should adopt a policy, in advance of the first national EAS exercise, that will foster participation by all entities . . . without undue concerns over potential penalties for problems or flaws in the EAS systems discovered during the test.”); NSBA Comments at 13-14 (urging the “Commission to suspend EAS enforcement for any shortcomings by EAS participants relating to national testing.”); NSBA Reply Comments at 13 (this “suggestion [should] be adopted prior to the Commission and FEMA conducting the first national test.”); DSA Comments at 3 (“a great deal of latitude be given, at least initially, to allow vendors and broadcasters to mitigate discovered problems without the threat of fines.”); Sage Comments at 4, 10 (“Prior to a test, the FCC should publish a waiver on enforcement action, at least for the first test, for failure to relay the national test;” The Commission “should include comments in its ruling that the national test report will not be used as enforcement data, except for failure to report, and repeated or intentional violations.”).

<sup>167</sup> SBE Comments at 3.

<sup>168</sup> Sage Comments at 9.

<sup>169</sup> Bell Comments at 1. *See also* Abbott Comments at 11-12.

recognize that achievement of this goal will depend significantly on the active engagement and cooperation by all EAS Participants in all aspects of the national test, including preparations, actual testing, and post-test assessment and problem remediation. As a general matter, the Commission can exercise discretion in its enforcement of the rules, and has a variety of mechanisms by which it can ensure compliance.<sup>170</sup> Accordingly, for the first national test, we intend to exercise the discretion allowed under our rules to promote compliance and encourage EAS Participants to benefit from the educational process, identify problems, and implement corrective measures.<sup>171</sup>

## 2. Test Length

79. FEMA, in support of its recommendation that the national test eventually use the NPT Code, recommends “that the FCC take steps to require that EAS devices process National Periodic Test (NPT) two minute time-limited messages in exactly the same fashion as the device process [EAN] and [EAT] messages.”<sup>172</sup> However, NCTA recommends that “activation of the Presidential-level Emergency Action Notification (EAN) event code for the national test last longer than the standard two minutes used for all other event codes. This will ensure that the EAS equipment does not time out after two minutes as it is designed to do with all other event codes.”<sup>173</sup>

80. TFT opposes NCTA’s “recommendation to alter and extend the length of an audio message that is part of an EAS message that does not have the Event Code ‘EAN’, reserved for national, presidential messages.”<sup>174</sup> Per TFT, “An audio message longer than the minimum of two minutes may delay propagation of that message throughout the EAS dissemination system[, accumulating] at each relaying point.”<sup>175</sup> TFT states that this “is a matter that can be better determined as a part of a Commission-approved State EAS Plan.”<sup>176</sup>

81. We delegate authority to the Bureau to resolve this technical issue in conjunction with the other stakeholders. And again, once a date for the first national test is announced, we will provide further timely guidance to EAS Participants on this parameter of the test as well.

## 3. Updating EAS Operating Handbook

82. We received several comments regarding revision of the EAS operating handbook that section 11.15 of the Commission’s rules required the Commission to issue to EAS

<sup>170</sup> See 47 C.F.R. § 1.80(b)(4), Note (“...The Commission and its staff retain the discretion to issue a higher or lower forfeiture than provided in the guidelines, to issue no forfeiture at all, or to apply alternative or additional sanctions as permitted by the statute...”).

<sup>171</sup> Given the important public policy goals discussed above, in exercising our discretion, we will consider potential violations that may be disclosed in connection with the first national EAS test to be “voluntary disclosures” for enforcement purposes. See, e.g., *Emery Telephone*, Memorandum Opinion and Order, 13 FCC Rcd 23854, 23858 ¶¶ 5, 10 (1998), *recon. denied*, 15 FCC Rcd 7181 (1999) (reducing forfeiture for failure to file operation notifications because the carrier voluntarily disclosed the six violations and promptly filed the forms after discovering its mistake). Such treatment might not apply, however, to potential violations that are repeated, egregious, or not promptly remedied.

<sup>172</sup> FEMA Comments at 2.

<sup>173</sup> NCTA Comments at 3.

<sup>174</sup> TFT Reply Comments at 4-5.

<sup>175</sup> TFT Reply Comments at 5.

<sup>176</sup> TFT Reply Comments at 5.

Participants.<sup>177</sup> Most commenters on this issue suggested such revision in the context of new national testing rules and operating procedures, although other areas for revision were noted.<sup>178</sup> We agree with commenters that revision of the EAS Handbooks will be necessary. However, because the on-going format of the national test, including all of the test codes to be used, is not yet standardized, revision of the EAS Handbook would be premature at this time.

#### 4. Delaying First National Test until 180 Days after FEMA Implements CAP

83. NAB asks the Commission to “consider waiting until the 180-day time period available for broadcasters to become CAP-compliant expires before performing a national test.”<sup>179</sup> NAB reasons that “[a]ssuming that the required CAP-compliant EAS equipment has passed the FEMA CAP-EAS testing process (including those additional requirements included as a result of FCC requirements for successful transmission of nationwide EAN messages), broadcasters should at that point be virtually assured of being able to properly transmit EAN messages for a national test.”<sup>180</sup> NAB also states that such a delay would obviate the possibility of “some broadcasters ... having to upgrade their EAS equipment twice in the near future,” *i.e.*, once to ensure that the EAN is transmitted, and a second time to be CAP compliant.<sup>181</sup>

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<sup>177</sup> As required by section 11.15:

The EAS Operating Handbook states in summary form the actions to be taken by personnel at broadcast stations, cable systems and wireless cable systems, and other participating entities upon receipt of an EAN, an EAT, tests, or State and Local Area alerts. It is issued by the FCC and contains instructions for the above situations. A copy of the Handbook must be located at normal duty positions or EAS equipment locations when an operator is required to be on duty and be immediately available to staff responsible for authenticating messages and initiating actions.

<sup>178</sup> See *e.g.* DAS Comments at 2 (recommending that “the FCC and FEMA improve the broadcaster handbooks for response and handling of the national alerts, as well as improve these periodically after each field test.”); Sage Comments at 4 (proposing that the Commission “update the EAS Handbook to reflect how the EAS system works with the live EAN message and with the national test, including the role of the EAT, if any, the EOM terminating an EAN, unattended automated stations, scripts (if any), etc.”); FEMA Comments at 3 (“consider revising the EAS Handbook coincident with the action on the instant Notice to include revised guidelines for participant action upon receipt of a previously coordinated national level test.”); NAB Comments at 5-6 (footnotes omitted) (“The Commission’s EAS Handbooks indicate that an EAT message will be sent following an EAN message, [but] in fact, in some instances no EAT message is sent. ... NAB has found other examples of confusing instructions in the EAS Handbooks. For example, the Handbooks direct stations to read a stand-by script after receiving the EAN; however, this can be impossible because once the EAN is received, their encoder (5) has been seized by the EAN code and only the Presidential message can be broadcast at that point in time[, so we ask] that, prior to a national EAS test, the Commission ... review and revise the EAS Handbooks to clarify any uncertainties that could hinder the national EAS test.”); FEMA Comments at 3 (this “revision may also present an opportunity for clarification of Handbook Step 5 with regard to automated EAS operation.”); Abbott Comments at 6 (if the EAN seizes control of the station, how can the duty operator can read the script in the EAS Operating Handbook?).

<sup>179</sup> NAB Comments at 9.

<sup>180</sup> NAB Comments at 9.

<sup>181</sup> NAB Comments at 8. See also NSBA Comments at 6 (“nearly all EAS participants will be required to purchase new equipment in order to accept Common Alerting Protocol (“CAP”) formatted messages which could render much of the current generation equipment testing data irrelevant in relation to Next Generation EAS implementation and testing.”); Bell Comments at 3 (the “proposal to have a CAP based delivery system in place before there is a reasonable approximation of what NG EAS will be, may lead to purchasing equipment that will soon be obsolete.”).

84. We note that since the comment period closed, FEMA adopted CAP on September 30, 2010<sup>182</sup> Also, the Commission subsequently adopted an order extending the date for CAP compliance until September 30, 2011.<sup>183</sup> Nevertheless, even given this further extension, we do not believe it is necessary to delay testing until the period for CAP compliance ends. First, FEMA anticipates continuing use of legacy EAS into the foreseeable future.<sup>184</sup> Accordingly, even after the expiration of the now one year period EAS Participants will continue to receive the EAN in the SAME format. In addition, we believe that many state and local message originators will continue to issue SAME-formatted alerts for the foreseeable future. For this reason as well, we need to be able to continue to assess legacy EAS capabilities.

85. Moreover, many EAS encoder/decoder manufacturers assure us that their product can presently receive either a CAP- or SAME-formatted alert. Accordingly, even those Participants that replace their equipment prior to the expiration of the one year period should not need to upgrade again once the one year deadline has passed. Thus current generation equipment testing data will remain relevant for the foreseeable future. For all of the foregoing reasons, we see no benefit in delaying the first national test until one year after FEMA implements CAP.

## 5. Miscellaneous

86. *Convening a Public/Private FCC Advisory Committee.* We believe that it is premature for us to act on SBE's suggestion that "a public/private FCC Advisory Committee should be established and maintained on an ongoing basis, to solicit and assess input from EAS participants and others in the EAS community regarding this and other EAS issues, along the model of the former EAS National Advisory Committee."<sup>185</sup> We do note that there are a number of other ongoing proceedings in this docket, as well as a recommended Broadband Alerting Notice of Inquiry. A policy initiative as comprehensive as an Alert and Warning Advisory Committee can be more fully discussed in these proceedings.

87. *Preventing cross- interference.* FEMA recommends "that the FCC specify that EAS devices not automatically relay additional broadcasts of a previously transmitted EAN message. It is our concern that in a situation where two EAS participants cross-monitor each other (for example an LP-1 and LP-2), if the EAS devices employed by both EAS participants were to automatically relay repetitive EAN messages, the EAS participants may require manual intervention to restore normal broadcast operations and be capable of relaying local EAS messages. Additionally, a repeated broadcast of a previously transmitted EAN message may prevent or (2) delay a time-critical local or regional alert, for example a tornado or tsunami alert, from reaching the public in a timely fashion."<sup>186</sup> However, our rules already prevent such cross interference of EAN messages. Accordingly, it is unnecessary for us to issue such a specification.

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<sup>182</sup> See FEMA, "FEMA Announces Adoption Of New Standard For Emergency Alerts," available at <http://www.fema.gov/news/newsrelease.fema?id=52880> (last visited Nov. 12, 2010).

<sup>183</sup> See Review of the Emergency Alert System, EB Docket No. 04-296, *Order*, FCC 10-191 (rel. Nov. 23, 2010).

<sup>184</sup> See FEMA, IPAWS Projects, available at <http://www.fema.gov/emergency/ipaws/projects.shtml> (last accessed Sep. 3, 2010).

<sup>185</sup> SBE Comments at 7. See also Burns Comments at 3 (agreeing).

<sup>186</sup> FEMA Comments at 2-3.

88. *Testing in the American Territories.* Bell asks whether Puerto Rico, American Samoa, and other outlying islands will be included in the test.<sup>187</sup> This will be decided by FEMA in consultation with the Commission, and will be conveyed to Participants well before the first test.

89. *Bottom-up testing.* Abbott suggests that a “bottom-up” test of local EAS should be developed as well, perhaps by NASBA and the SBE.<sup>188</sup> We agree that such testing could prove very beneficial in improving the reliability of the EAS at those levels. However, such testing would fall under state and local jurisdiction.

90. *Comprehensive review of state plans.* NAB suggests that before the first national EAS test, “the Commission and [FEMA] consider conducting a comprehensive review of State EAS Plans” in order to illuminate obvious discrepancies in certain plans that could hinder the national EAS exercise or highlight localities where more public-private coordination may be needed, and help federal officials discern where to deploy their resources.”<sup>189</sup> We agree that a comprehensive review of state plans is in order. However, because of our concurrent, on-going review of our Part 11 rules in light of FEMA’s adoption of CAP, such a comprehensive review would be premature at this time.<sup>190</sup>

91. *Training message originators.* NCTA states that “instances of improper or invalid coding highlight the need for adequate training of EAS message originators. No matter how effectively(?) the equipment operates, the message must be encoded correctly in order to ensure that vital emergency information is disseminated throughout the system to the public.”<sup>191</sup> We wholeheartedly agree. While we have no jurisdiction over these entities, we will continue to work with FEMA to establish the proper guidelines for message originators.

92. *Non-EAN ‘live’ code tests.* DAS asks us “to state the details about how the national tests differ from the state and local tests.”<sup>192</sup> It avers that the “weekly and monthly test alerts are ... a perfectly adequate test for the non-national EAS alert codes, such as tornadoes? and local civil emergencies.”<sup>193</sup> We note that many state and local jurisdictions do not view the required weekly and monthly tests as adequate for testing non-national EAS alerts, and for that reason, use “live code” tests pursuant to Commission waiver.<sup>194</sup>

93. *Open captioning.* Wireless RERC states that EAS participants that are required to transmit both the audio and visual components of an EAN message, such as television stations and cable systems, only have to transmit certain elements in the digital header portion of the

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<sup>187</sup> Bell Comments at 1.

<sup>188</sup> Abbott Comments at 15.

<sup>189</sup> NAB Comments at 4. *See, also* NSBA Reply Comments at 4 (agreeing with NAB).

<sup>190</sup> *See* Public Safety and Homeland Security Bureau Seeks Informal Comment Regarding Revisions to the FCC’s Part 11 Rules Governing the Emergency Alert System Pending Adoption of the Common Alerting Protocol by the Federal Emergency Management Agency, EB Docket No. 04-296, *Public Notice*, 25 FCC Rcd 2845 (PSHSB rel. Mar. 25, 2010).

<sup>191</sup> NCTA Comments at 6.

<sup>192</sup> DAS Comments at 1.

<sup>193</sup> DAS Comments at 1.

<sup>194</sup> *See, e.g.* Public Safety and Homeland Security Bureau Provides Guidance Regarding “Live Code” Testing of the Emergency Alert System, *Public Notice*, 24 FCC Rcd 3701 (PSHSB rel. Mar. 27, 2009).

EAN message visually, i.e. the Originator, Event, Location and the valid time period of an EAS message.<sup>195</sup> Wireless RERC states that persons with a hearing disability will only see the above EAN message elements and not hear the audio that this is a test, and suggests “that those EAS participants that transmit video be required to transmit an open caption stating that this is a test.”<sup>196</sup> COAT agrees, and also recommends “that a requirement for Text-To-Speech (or “audio”) and Speech-To-Text be an upfront requirement for all EAN and other emergency messaging.”<sup>197</sup> COAT states that “testing of EAS” should address the needs of people with disabilities, as well as the population in general, to access “emergency information via wireless or mobile devices of all sorts.”<sup>198</sup> We agree that captioning is necessary during the national test. However, we note that closed captioning is already required by Part 79 of our rules.<sup>199</sup>

#### **IV. PROCEDURAL MATTERS**

##### **A. Accessible Formats**

94. To request materials in accessible formats for people with disabilities (Braille, large print, electronic files, audio format), send an e-mail to [fcc504@fcc.gov](mailto:fcc504@fcc.gov) or call the Consumer & Governmental Affairs Bureau at 202-418-0530 (voice), 202-418-0432 (TTY).

##### **B. Final Regulatory Flexibility Analysis**

95. As required by the Regulatory Flexibility Act of 1980, *see* 5 U.S.C. § 603, the Commission has prepared a Final Regulatory Flexibility Analysis (FRFA) of the possible significant economic impact on small entities of the policies and rules addressed in this report and order. The FRFA is set forth in Appendix C.

##### **C. Paperwork Reduction Act Analysis**

96. This document contains modified information collection requirements subject to the Paperwork Reduction Act of 1995 (PRA), Public Law 104-13. It has been submitted to the Office of Management and Budget (OMB) for review under Section 3507(d) of the PRA. OMB, the general public, and other Federal agencies are invited to comment on the new or modified information collection requirements contained in this proceeding. In addition, we note that pursuant to the Small Business Paperwork Relief Act of 2002, Public Law 107-198, *see* 44 U.S.C. 3506(c)(4), we previously sought specific comment on how the Commission might further reduce the information collection burden for small business concerns with fewer than 25 employees.

97. In this present document, we have assessed the effects of the information collection associated with national testing of the EAS, and find that because this information collection information that is readily available and easily accessible to all EAS Participants, and, further, may be submitted electronically, none of these requirements will pose a substantial burden for businesses with fewer than 25 employees.

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<sup>195</sup> Wireless RERC Comments at 4.

<sup>196</sup> Wireless RERC Comments at 4.

<sup>197</sup> COAT Comments at 3, 5.

<sup>198</sup> COAT Comments at 3.

<sup>199</sup> *See* 47 C.F.R. § 79.2(b).

**D. Congressional Review Act**

98. The Commission will send a copy of this *Third Report and Order* in a report to be sent to Congress and the Government Accountability Office pursuant to the Congressional Review Act (“CRA”), *see* 5 U.S.C. § 801(a)(1)(A).

**V. ORDERING CLAUSES**

99. Accordingly, IT IS ORDERED that pursuant to sections 1, 2, 4(i), 4(o), 301, 303(r), 303(v), 307, 309, 335, 403, 624(g), 706 and 715 of the Communications Act of 1934, as amended, 47 U.S.C. §§ 151, 152, 154(i) and (o), 301, 303(r), 303(v), 307, 309, 335, 403, 544(g), 606, and 615, this Third Report and Order IS ADOPTED.

100. IT IS FURTHER ORDERED that the Commission’s Consumer and Governmental Affairs Bureau, Reference Information Center, SHALL SEND a copy of this Third Report and Order, including the Final Regulatory Flexibility Analysis, to the Chief Counsel for Advocacy of the Small Business Administration.

FEDERAL COMMUNICATIONS COMMISSION

Marlene H. Dortch  
Secretary

## APPENDIX A

## List of Commenters

## Comments in EB Docket No. 04-296

**Commenters**

Abbott, Adrienne  
 Bell, Frank W.  
 Burns, Dave  
 Coalition of Organizations for Accessible Technology  
 Cox Media Group, Inc.  
 Digital Alert Systems  
 Federal Emergency Management Agency  
 Maine State Emergency Communications Committee  
 McCarthy, Michael  
 Named State Broadcasters Associations  
 National Association of Broadcasters  
 National Cable and Telecommunications Association  
 New Jersey Broadcasters Association  
 Primary Entry Point Advisory Committee  
 Sage Alerting Systems, Inc.  
 Society of Broadcast Engineers, Inc.  
 TFT, Inc.  
 Trilithic, Inc.  
 Verizon Communications, Inc.  
 Wireless RERC  
 RERC

**Abbreviation**

Abbott  
 Bell  
 Burns  
 COAT  
 Cox  
 DAS  
 FEMA  
 Maine SECC  
 McCarthy  
 NSBA  
 NAB  
 NCTA  
 NJBA  
 PEPAC  
 Sage  
 SBE  
 TFT  
 Trilithic  
 Verizon  
 Wireless

**Reply Commenters**

Named State Broadcasters Associations  
 National Association of Broadcasters  
 Sage Alerting Systems, Inc.  
 TFT, Inc.

**Abbreviation**

NSBA  
 NAB  
 Sage  
 TFT

**Ex Parte Commenters**

Educational Media Foundation

**Abbreviation**

EMF

**APPENDIX B****Final Rule****PART 11 – EMERGENCY ALERT SYSTEM (EAS)**

1. Revise § 11.61(a)(3) to read as follows:

*National Tests.* (i) All EAS Participants shall participate in national tests as scheduled by the Commission in consultation with the Federal Emergency Management Agency (FEMA). Such tests will consist of the delivery by FEMA to PEP/NP stations of a coded EAS message, including EAS header codes, Attention Signal, Test Script, and EOM code. All other EAS Participants will then be required to relay that EAS message. The coded message shall utilize EAS test codes as designated by the Commission's rules.

(ii) A national test shall replace the required weekly and monthly tests for all EAS Participants, as set forth in (a)(1) and (a)(2) of this section, in the week and month in which it occurs.

(iii) Notice shall be provided to EAS Participants by the Commission at least two months prior to the conduct of any such national test.

(iv) Test results as required by the Commission shall be logged by all EAS Participants and shall be provided to the Commission's Public Safety and Homeland Security Bureau within forty five (45) days following the test.

## APPENDIX C

## Final Regulatory Flexibility Analysis

1. As required by the Regulatory Flexibility Act of 1980, as amended (RFA),<sup>200</sup> an Initial Regulatory Flexibility Analysis (IRFA) was incorporated into the Second Further Notice of Proposed Rulemaking in EB Docket 04-296 (*Second FNPRM*). The Commission sought written comment on the proposals in the *Second FNPRM*, including comment on the IRFA. This Final Regulatory Flexibility Analysis (FRFA) conforms to the RFA.

**A. Need for, and Objectives of, the Proposed Rules**

2. This *Third Report and Order* seeks to ensure that the Commission's emergency alert services ("EAS") rules better protect the life and property of all Americans.<sup>201</sup> To further serve this goal, this *Third Report and Order* adopts a rule to implement national testing of the Emergency Alert System (EAS) through use of a coded EAS message which will replace a required monthly test, and requiring logging and provision to the Commission of test-related diagnostic information within forty five (45) days of the test.<sup>202</sup>

3. Specifically, this *Third Report and Order*:

- Requires all EAS Participants to participate in national EAS tests as scheduled by the Federal Communications Commission (Commission) in consultation with the Federal Emergency Management Agency (FEMA);
- Requires that the first national EAS test use the Emergency Alert Notification (EAN), the live event code for nationwide Presidential alerts;
- Requires that the national test replace the monthly and weekly EAS tests in the month and week in which it is held;
- Requires the Public Safety and Homeland Security Bureau (Bureau) to provide at least two months' public notice prior to any national test of the EAS;
- Requires EAS Participants to submit test-related data to the Bureau within 45 days following a national EAS test;
- Requires that test data received from EAS Participants be treated as presumptively confidential, but allow test data to be shared on a confidential basis with other Federal agencies and state governmental emergency management agencies that have confidentiality protection at least equal to that provided by the Freedom of Information Act (FOIA); and

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<sup>200</sup> See 5 U.S.C. § 603. The RFA, *see* 5 U.S.C. §§ 601-612, has been amended by the Small Business Regulatory Enforcement Fairness Act of 1996 (SBREFA), Pub. L. No. 104-121, Title II, 110 Stat. 857 (1996).

<sup>201</sup> See Appendix B at ¶ 2 for description of rules the Commission adopted in the *Third Report and Order*.

<sup>202</sup> See *Third Report and Order* at ¶¶ XX for a more detailed discussion of this subject.

- Delegates authority to the Bureau to determine, in consultation with FEMA and with other EAS stakeholders, as appropriate, various administrative procedures for national tests, including test codes to be used and pre-test outreach.

**B. Summary of Significant Issues Raised by Public Comments in Response to the IRFA**

4. There were no comments that specifically addressed the IRFA.

**C. Description and Estimate of the Number of Small Entities to Which Rules Will Apply**

5. The RFA directs agencies to provide a description of, and, where feasible, an estimate of, the number of small entities that may be affected by the rules adopted herein.<sup>203</sup> The RFA generally defines the term “small entity” as having the same meaning as the terms “small business,” “small organization,” and “small governmental jurisdiction.”<sup>204</sup> In addition, the term “small business” has the same meaning as the term “small business concern” under the Small Business Act.<sup>205</sup> A “small business concern” is one which: (1) is independently owned and operated; (2) is not dominant in its field of operation; and (3) satisfies any additional criteria established by the Small Business Administration (“SBA”).<sup>206</sup>

6. *Television Broadcasting.* The SBA has developed a small business sized standard for television broadcasting, which consists of all such firms having \$14 million or less in annual receipts.<sup>207</sup> Business concerns included in this industry are those “primarily engaged in broadcasting images together with sound.”<sup>208</sup> According to Commission staff review of BIA Publications, Inc. Master Access Television Analyzer Database, as of May 16, 2003, about 814 of the 1,220 commercial television stations in the United States had revenues of \$12 million or less. We note, however, that, in assessing whether a business concern qualifies as small under

<sup>203</sup> 5 U.S.C. § 604(a)(3).

<sup>204</sup> 5 U.S.C. § 601(6).

<sup>205</sup> 5 U.S.C. § 601(3) (incorporating by reference the definition of “small-business concern” in the Small Business Act, 15 U.S.C. § 632). Pursuant to 5 U.S.C. § 601(3), the statutory definition of a small business applies “unless an agency, after consultation with the Office of Advocacy of the Small Business Administration and after opportunity for public comment, establishes one or more definitions of such term which are appropriate to the activities of the agency and publishes such definition(s) in the Federal Register.” 5 U.S.C. § 601(3).

<sup>206</sup> 15 U.S.C. § 632.

<sup>207</sup> 13 C.F.R. § 121.201, North American Industry Classification System (NAICS) code 515120.

<sup>208</sup> Office of Management and Budget, North American Industry Classification System: United States, 1997, at 509 (1997). This category description continues, “These establishments operate television broadcasting studios and facilities for the programming and transmission of programs to the public. These establishments also produce or transmit visual programming to affiliated broadcast television stations, which in turn broadcast the programs to the public on a predetermined schedule. Programming may originate in their own studios, from an affiliated network, or from external sources.” Separate census categories pertain to businesses primarily engaged in producing programming. *Id.* at 502-05, NAICS code 512120, Motion Picture and Video Production; NAICS code 512120, Motion Picture and Video Distribution; NAICS code 512191, Teleproduction and Other Post-Production Services; and NAICS code 512199, Other Motion Picture and Video Industries.

the above definition, business (control) affiliations<sup>209</sup> must be included.<sup>210</sup> Our estimate, therefore, likely overstates the number of small entities that might be affected by our action, because the revenue figure on which it is based does not include or aggregate revenues from affiliated companies. There are also 2,127 low power television stations (“LPTV”).<sup>211</sup> Given the nature of this service, we will presume that all LPTV licensees qualify as small entities under the SBA size standard.

7. *Radio Stations.* The revised rules and policies potentially will apply to all AM and commercial FM radio broadcasting licensees and potential licensees. The SBA defines a radio broadcasting station that has \$7 million or less in annual receipts as a small business.<sup>212</sup> A radio broadcasting station is an establishment primarily engaged in broadcasting aural programs by radio to the public.<sup>213</sup> Included in this industry are commercial, religious, educational, and other radio stations.<sup>214</sup> Radio broadcasting stations which primarily are engaged in radio broadcasting and which produce radio program materials are similarly included.<sup>215</sup> However, radio stations that are separate establishments and are primarily engaged in producing radio program material are classified under another NAICS number.<sup>216</sup> According to Commission staff review of BIA Publications, Inc. Master Access Radio Analyzer Database on March 31, 2005, about 10,840 (95 percent) of 11,410 commercial radio stations have revenue of \$6 million or less. We note, however, that many radio stations are affiliated with much larger corporations having much higher revenue. Our estimate, therefore, likely overstates the number of small entities that might be affected by our action.

8. *Wired Telecommunications Carriers.* The 2007 North American Industry Classification System (“NAICS”) defines “Wired Telecommunications Carriers” as follows: “This industry comprises establishments primarily engaged in operating and/or providing access to transmission facilities and infrastructure that they own and/or lease for the transmission of voice, data, text, sound, and video using wired telecommunications networks. Transmission facilities may be based on a single technology or a combination of technologies. Establishments in this industry use the wired telecommunications network facilities that they operate to provide a variety of services, such as wired telephony services, including VoIP services; wired (cable) audio and video programming distribution; and wired broadband Internet services. By exception, establishments providing satellite television distribution services using facilities and

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<sup>209</sup> “Concerns are affiliates of each other when one concern controls or has the power to control the other or a third party or parties controls or has to power to control both.” 13 C.F.R. § 121.103(a)(1).

<sup>210</sup> “SBA counts the receipts or employees of the concern whose size is at issue and those of all its domestic concern’s size.” 13 C.F.R. § 121.103(a)(4).

<sup>211</sup> *Broadcast Station Totals as of September 30, 2002*, FCC News Release (rel. Nov. 6, 2002).

<sup>212</sup> See 13 C.F.R. § 121.201, NAICS code 515112.

<sup>213</sup> *Id.*

<sup>214</sup> *Id.*

<sup>215</sup> *Id.*

<sup>216</sup> *Id.*

infrastructure that they operate are included in this industry.”<sup>217</sup> The SBA has developed a small business size standard for wireline firms within the broad economic census category, “Wired Telecommunications Carriers.”<sup>218</sup> Under this category, the SBA deems a wireline business to be small if it has 1,500 or fewer employees. Census Bureau data for 2002 show that there were 2,432 firms in this category that operated for the entire year.<sup>219</sup> Of this total, 2,395 firms had employment of 999 or fewer employees, and 37 firms had employment of 1,000 employees or more.<sup>220</sup> Thus, under this category and associated small business size standard, the majority of firms can be considered small.

9. *Wired Telecommunications Carriers -- Cable and Other Program Distribution.* This category includes, among others, cable operators, direct broadcast satellite (“DBS”) services, home satellite dish (“HSD”) services, satellite master antenna television (“SMATV”) systems, and open video systems (“OVS”). The data we have available as a basis for estimating the number of such entities were gathered under a superseded SBA small business size standard formerly titled Cable and Other Program Distribution. The former Cable and Other Program Distribution category is now included in the category of Wired Telecommunications Carriers, the majority of which, as discussed above, can be considered small.<sup>221</sup> According to Census Bureau data for 2002, there were a total of 1,191 firms in this previous category that operated for the entire year.<sup>222</sup> Of this total, 1,087 firms had annual receipts of under \$10 million, and 43 firms had receipts of \$10 million or more but less than \$25 million.<sup>223</sup> Thus, we believe that a substantial number of entities included in the former Cable and Other Program Distribution category may have been categorized as small entities under the now superseded SBA small business size standard for Cable and Other Program Distribution. With respect to OVS, the Commission has approved approximately 120 OVS certifications with some OVS operators now providing service.<sup>224</sup> Broadband service providers (BSPs) are currently the only significant holders of OVS certifications or local OVS franchises, even though OVS is one of four statutorily-recognized options for local exchange carriers (LECs) to offer video programming services. As of June 2006, BSPs served approximately 1.4 million subscribers, representing 1.46

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<sup>217</sup> U.S. Census Bureau, 2007 NAICS Definitions, “517110 Wired Telecommunications Carriers”; <http://www.census.gov/naics/2007/def/ND517110.HTM#N517110>.

<sup>218</sup> 13 C.F.R. § 121.201, NAICS code 517110.

<sup>219</sup> U.S. Census Bureau, 2002 Economic Census, Subject Series: Information, “Establishment and Firm Size: 2002 (Including Legal Form of Organization),” Table 5, NAICS code 517110 (issued November 2005).

<sup>220</sup> *Id.* The census data do not provide a more precise estimate of the number of firms that have employment of 1,500 or fewer employees; the largest category provided is for firms with “1000 employees or more.”

<sup>221</sup> *See supra* ¶ [9]. Under the superseded SBA size standard, which had the same NAICS code, 517110, a small entity was defined as one with \$13.5 million or less in annual receipts.

<sup>222</sup> U.S. Census Bureau, 2002 Economic Census, Subject Series: Information, Table 4, Receipts Size of Firms for the United States: 2002 (NAICS code 517510) (issued November 2005).

<sup>223</sup> *Id.* An additional 61 firms had annual receipts of \$25 million or more.

<sup>224</sup> *See* Current Filings for Certification of Open Video Systems, <http://www.fcc.gov/mb/ovs/csovsarc.html> (last visited July 25, 2007); Current Filings for Certification of Open Video Systems, <http://www.fcc.gov/mb/ovs/csovsarc.html> (last visited July 25, 2007).

percent of all MVPD households.<sup>225</sup> Among BSPs, however, those operating under the OVS framework are in the minority.<sup>226</sup> The Commission does not have financial information regarding the entities authorized to provide OVS, some of which may not yet be operational. We thus believe that at least some of the OVS operators may qualify as small entities.

10. *Cable System Operators (Rate Regulation Standard)*. The Commission has developed its own small business size standard for cable system operators, for purposes of rate regulation. Under the Commission's rules, a "small cable company" is one serving 400,000 or fewer subscribers nationwide.<sup>227</sup> We have estimated that there were 1,065 cable operators who qualified as small cable system operators at the end of 2005.<sup>228</sup> Since then, some of those companies may have grown to serve over 400,000 subscribers, and others may have been involved in transactions that caused them to be combined with other cable operators. Consequently, the Commission estimates that there are now fewer than 1,065 small entity cable system operators that may be affected by the rules and policies proposed herein.

11. *Cable System Operators (Telecom Act Standard)*. The Communications Act of 1934, as amended, ("Act") also contains a size standard for small cable system operators, which is "a cable operator that, directly or through an affiliate, serves in the aggregate fewer than 1 percent of all subscribers in the United States and is not affiliated with any entity or entities whose gross annual revenues in the aggregate exceed \$250,000,000."<sup>229</sup> The Commission has determined that there are 67,700,000 subscribers in the United States.<sup>230</sup> Therefore, an operator serving fewer than 677,000 subscribers shall be deemed a small operator, if its annual revenues, when combined with the total annual revenues of all its affiliates, do not exceed \$250 million in the aggregate.<sup>231</sup> Based on available data, the Commission estimates that the number of cable operators serving 677,000 subscribers or fewer, totals 1,065.<sup>232</sup> The Commission neither requests nor collects information on whether cable system operators are affiliated with entities whose gross annual revenues exceed \$250 million,<sup>233</sup> and therefore are unable, at this time, to

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<sup>225</sup> See *Annual Assessment of the Status of Competition in the Market for the Delivery of Video Programming*, Thirteenth Annual Report, 24 FCC Rcd 542, 684, Table B-1 (2009) ("13<sup>th</sup> Annual Report").

<sup>226</sup> OPASTCO reports that fewer than 3 percent of its members provide service under OVS certification. See *id.* at 607, ¶ 135 n.473.

<sup>227</sup> 47 C.F.R. § 76.901(e). The Commission developed this definition based on its determination that a small cable system operator is one with annual revenues of \$100 million or less. *Implementation of Sections of the 1992 Cable Act: Rate Regulation*, Sixth Report and Order and Eleventh Order on Reconsideration, 10 FCC Rcd 7393 (1995), 60 FR 10534 (February 27, 1995).

<sup>228</sup> Paul Kagan Associates, Inc., Cable TV Investor, February 29, 1996 (based on figures for Dec. 30, 1995).

<sup>229</sup> 47 U.S.C. § 543(m)(2).

<sup>230</sup> See *FCC Announces New Subscriber Count for the Definition of Small Cable Operator*, Public Notice, 16 FCC Rcd 2225 (2001) ("Jan. 24, 2001 Public Notice").

<sup>231</sup> 47 C.F.R. § 76.901(f).

<sup>232</sup> See *Jan. 24, 2001 Public Notice*.

<sup>233</sup> The Commission does receive such information on a case-by-case basis if a cable operator appeals a local franchise authority's finding that the operator does not qualify as a small cable operator pursuant to section 76.901(f) of the Commission's rules. See 47 C.F.R. § 76.909(b).

estimate more accurately the number of cable system operators that would qualify as small cable operators under the size standard contained in the Act.

12. *Broadband Radio Service (FCC Auction Standard)*. The established rules apply to Broadband Radio Service (“BRS,” formerly known as Multipoint Distribution Systems, or “MDS”) operated as part of a wireless cable system. The Commission has defined “small entity” for purposes of the auction of BRS frequencies as an entity that, together with its affiliates, has average gross annual revenues that are not more than \$40 million for the preceding three calendar years.<sup>234</sup> This definition of small entity in the context of MDS auctions has been approved by the SBA.<sup>235</sup> The Commission completed its MDS auction in March 1996 for authorizations in 493 basic trading areas. Of 67 winning bidders, 61 qualified as small entities. At this time, we estimate that of the 61 small business MDS auction winners, 48 remain small business licensees.

13. *Wireless Telecommunications Carrier (except satellite)*. BRS also includes licensees of stations authorized prior to the auction. As noted above, the SBA has developed a definition of small entities for pay television services, Cable and Other Subscription Programming, which includes all such companies generating \$15 million or less in annual receipts.<sup>236</sup> This definition includes BRS and thus applies to BRS licensees that did not participate in the MDS auction. Information available to us indicates that there are approximately 392 incumbent BRS licensees that do not generate revenue in excess of \$11 million annually. Therefore, we estimate that there are at least 440 (392 pre-auction plus 48 auction licensees) small BRS providers as defined by the SBA and the Commission’s auction rules which may be affected by the rules adopted herein. In addition, limited preliminary census data for 2002 indicate that the total number of cable and other program distribution companies increased approximately 46 percent from 1997 to 2002.<sup>237</sup>

14. *Educational Broadband Service*. The proposed rules would also apply to Educational Broadband Service (“EBS,” formerly known as Instructional Television Fixed Service or “ITFS”) facilities operated as part of a wireless cable system. The SBA definition of small entities for pay television services, Cable and Other Subscription Programming also appears to apply to EBS.<sup>238</sup> There are presently 2,032 EBS licensees. All but 100 of these licenses are held by educational institutions. Educational institutions are included in the definition of a small business.<sup>239</sup> However, we do not collect annual revenue data for EBS licensees, and are not able to ascertain how many of the 100 non-educational licensees would be

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<sup>234</sup> 47 C.F.R. § 21.961(b)(1).

<sup>235</sup> See *Amendment of Parts 21 and 74 of the Commission’s Rules With Regard to Filing Procedures in the Multipoint Distribution Service and in the Instructional Television Fixed Service and Implementation of Section 309(j) of the Communications Act – Competitive Bidding*, MM Docket No. 94-131 and PP Docket No. 93-253, Report and Order, 10 FCC Rcd 9589 (1995).

<sup>236</sup> 13 C.F.R. § 121.201, NAICS code 515210.

<sup>237</sup> See *supra* note 74.

<sup>238</sup> 13 C.F.R. § 121.201, NAICS code 515210.

<sup>239</sup> 5 U.S.C. § 601(3).

categorized as small under the SBA definition. Thus, we tentatively conclude that at least 1,932 are small businesses and may be affected by the proposed rules.

15. *Incumbent Local Exchange Carriers (“LECs”).* We have included small incumbent LECs in this present IRFA analysis. As noted above, a “small business” under the RFA is one that, *inter alia*, meets the pertinent small business size standard (*e.g.*, a telephone communications business having 1,500 or fewer employees), and “is not dominant in its field of operation.”<sup>240</sup> The SBA’s Office of Advocacy contends that, for RFA purposes, small incumbent LECs are not dominant in their field of operation because any such dominance is not “national” in scope.<sup>241</sup> We have therefore included small incumbent local exchange carriers in this RFA analysis, although we emphasize that this RFA action has no effect on Commission analyses and determinations in other, non-RFA contexts. Neither the Commission nor the SBA has developed a small business size standard specifically for incumbent local exchange services. The appropriate size standard under SBA rules is for the category Wired Telecommunications Carriers. Under that size standard, such a business is small if it has 1,500 or fewer employees.<sup>242</sup> According to Commission data,<sup>243</sup> 1,303 carriers have reported that they are engaged in the provision of incumbent local exchange services. Of these 1,303 carriers, an estimated 1,020 have 1,500 or fewer employees and 283 have more than 1,500 employees. Consequently, the Commission estimates that most providers of incumbent local exchange service are small businesses that may be affected by our proposed rules.

16. *Competitive (LECs), Competitive Access Providers (CAPs), “Shared-Tenant Service Providers,” and “Other Local Service Providers.”* Neither the Commission nor the SBA has developed a small business size standard specifically for these service providers. The appropriate size standard under SBA rules is for the category Wired Telecommunications Carriers. Under that size standard, such a business is small if it has 1,500 or fewer employees.<sup>244</sup> According to Commission data,<sup>245</sup> 769 carriers have reported that they are engaged in the provision of either competitive access provider services or competitive local exchange carrier services. Of these 769 carriers, an estimated 676 have 1,500 or fewer employees and 93 have more than 1,500 employees. In addition, 12 carriers have reported that they are “Shared-Tenant Service Providers,” and all 12 are estimated to have 1,500 or fewer employees. In addition, 39 carriers have reported that they are “Other Local Service Providers.” Of the 39, an estimated 38 have 1,500 or fewer employees and one has more than 1,500 employees. Consequently, the Commission estimates that most providers of competitive local exchange service, competitive

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<sup>240</sup> 15 U.S.C. § 632.

<sup>241</sup> Letter from Jere W. Glover, Chief Counsel for Advocacy, SBA, to William E. Kennard, Chairman, FCC (May 27, 1999). The Small Business Act contains a definition of “small-business concern,” which the RFA incorporates into its own definition of “small business.” See 15 U.S.C. § 632(a) (Small Business Act); 5 U.S.C. § 601(3) (RFA). SBA regulations interpret “small business concern” to include the concept of dominance on a national basis. See 13 C.F.R. § 121.102(b).

<sup>242</sup> 13 C.F.R. § 121.201, NAICS code 517110.

<sup>243</sup> *Trends in Telephone Service*, Table 5.3.

<sup>244</sup> 13 C.F.R. § 121.201, NAICS code 517110.

<sup>245</sup> *Trends in Telephone Service*, Table 5.3.

access providers, “Shared-Tenant Service Providers,” and “Other Local Service Providers” are small entities that may be affected by our proposed rules.

17. *Satellite Telecommunications.* The Commission has not developed a small business size standard specifically for providers of satellite service. The appropriate size standard under SBA rules is for Satellite Telecommunications. Under that category, such a business is small if it has \$15 million or less in average annual receipts.<sup>246</sup> Under the category of Satellite Telecommunications, Census Bureau data for 1997 show that there were a total of 324 firms that operated for the entire year.<sup>247</sup> Of this total, 273 firms had annual receipts of under \$10 million, and an additional twenty-four firms had receipts of \$10 million to \$24,999,999. Thus, the majority of Satellite Telecommunications firms can be considered small.

18. *All Other Telecommunications.* This category includes “establishments primarily engaged in ... providing satellite terminal stations and associated facilities operationally connected with one or more terrestrial communications systems and capable of transmitting telecommunications to or receiving telecommunications from satellite systems.”<sup>248</sup> Under that category, which is defined by the SBA, such a business is small if it has \$25 million or less in average annual receipts.<sup>249</sup> Of this total, 424 firms had annual receipts of \$5 million to \$9,999,999 and an additional 6 firms had annual receipts of \$10 million to \$24,999,990. Thus, under this second size standard, the majority of firms can be considered small.

#### **D. Description of Projected Reporting, Recordkeeping, and Other Compliance Requirements**

19. This *Third Report and Order* requires that EAS Participants record and submit to the Commission the following test-related diagnostic information for each alert received from each message source monitored at the time of the national test: (1) whether they received the alert message during the designated test; (2) whether they retransmitted the alert; and (3) if they were not able to receive and/or transmit the alert, their ‘best effort’ diagnostic analysis regarding the cause or causes for such failure. It also requires EAS Participants to provide us with a description of their station identification and level of designation (PEP, LP-1, etc.); the date/time of receipt of the EAN message by all stations; the date/time of PEP station acknowledgement of receipt of the EAN message to FOC; the date/time of initiation of actual broadcast of the Presidential message; the date/time of receipt of the EAT message by all stations; who they were monitoring at the time of the test, and the make and model number of their EAS equipment that they utilized. These requirements are intended to advance our public safety mission and enhance the performance of the EAS while reducing regulatory burdens wherever possible.

#### **E. Steps Taken to Minimize the Significant Economic Impact on Small Entities, and Significant Alternatives Considered**

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<sup>246</sup> 13 C.F.R. § 121.201, NAICS codes 517410.

<sup>247</sup> U.S. Census Bureau, 1997 Economic Census, Subject Series: Information, *Establishment and Firm Size (Including Legal Form of Organization)*, Table 4, NAICS code 517410.

<sup>248</sup> Office of Management and Budget, North American Industry Classification System, 513 (1997) (NAICS code 517919).

<sup>249</sup> 13 C.F.R. § 121.201, NAICS codes 517919..

20. The RFA requires an agency to describe any significant alternatives that it has considered in developing its approach, which may include the following four alternatives (among others): “(1) the establishment of differing compliance or reporting requirements or timetables that take into account the resources available to small entities; (2) the clarification, consolidation, or simplification of compliance and reporting requirements under the rule for such small entities; (3) the use of performance rather than design standards; and (4) an exemption from coverage of the rule, or any part thereof, for such small entities.”<sup>250</sup>

21. The rules are designed to minimally impact all EAS participants, including small entities, while at the same time protecting the lives and property of all Americans, which confers a direct benefit on small entities. The *Second Further Notice* sought comment on how the Commission may better protect the lives and property of Americans. In commenting on this goal, commenters were invited to propose steps that the Commission may take to further minimize any significant economic impact on small entities. When considering proposals made by other parties, commenters were invited to propose significant alternatives that serve the goals of these proposals.

22. No commenters disputed the proposed requirement that all EAS Participants to participate in national EAS tests as scheduled by the Commission in consultation with FEMA. While some commenters opposed a requirement that the first national EAS test use the EAN, the live event code for nationwide Presidential alerts, there is at present no other way to test the entire system for propagation of a national-level EAS alert. No commenter opposed the requirement that the national test replace the monthly and weekly EAS tests in the month and week in which it is held and this requirement in fact serves to minimize burdens on all participants by relieving them of certain testing obligations. While some commenters sought more than two months notice, the Order requires the Bureau to provide *at least* two months’ public notice prior to any national test of the EAS. The impact on small entities will be a factor considered by the Bureau in making its determination of notice period.

23. The new rule requires EAS Participants to submit test-related data to the Bureau within 45 days following a national EAS test. This was an extension of the 30 days initially proposed in the *Second Further Notice* and will minimize the burden on all participants. A number of commenters requested the ability to submit the required test data electronically and this *Third Report and Order* provides for this alternative method of data submission, also lessening the economic impact on all entities. The requirement that test data received from EAS Participants be treated as presumptively confidential, but allowing test data to be shared on a confidential basis with other Federal agencies and state governmental emergency management agencies that have confidentiality protection at least equal to that provided by the Freedom of Information Act (FOIA), has no economic impact on small entities. In delegating authority to the Bureau to determine, in consultation with FEMA and with other EAS stakeholders, as appropriate, various administrative procedures for national tests, including test codes to be used and pre-test outreach, the Commission has instructed the Bureau to factor in the needs of all stakeholders, including small business entities.

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<sup>250</sup> 5 U.S.C. § 603(c)(1) – (c)(4).

24. **Report to Congress:** The Commission will send a copy of the *Third Report and Order*, including this FRFA, in a report to be sent to Congress and the Government Accountability Office pursuant to the Congressional Review Act.<sup>251</sup> In addition, the Commission will send a copy of the *Third Report and Order*, including this FRFA, to the Chief Counsel for Advocacy of the SBA. A copy of the Second Report and Order and FRFA (or summaries thereof) will also be published in the Federal Register.<sup>252</sup>

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<sup>251</sup> See 5 U.S.C. § 801(a)(1)(A).

<sup>252</sup> See 5 U.S.C. § 604(b).