22 July 2014

Marlene H. Dortch, Office of the Secretary
Federal Communications Commission
445 12th Street SW
Washington, DC 20554

In the Matter of: EB Docket No. 04-296
Notice of Proposed Rulemaking "FCC 14-93"

COMMENTS OF GARY E. TIMM, AN INDIVIDUAL

The following Comments are in response to the FCC request for comment regarding proposed rules to revise the FCC Part 11 rules governing the EAS.

Although the filer of these Comments serves on a number of EAS-related committees, such as Broadcast Chair of the Wisconsin SECC, the Comments below are strictly those of the filer as an individual and do not necessarily represent the views of any committee or organization with which the filer is associated. These Comments likewise do not represent the views of the filer's employer or its clients.

Comments requested in NPRM:

Para. 11 to 14: Use of a National Location Code

Designation of 000000 as the National EAS Location Code is a prudent move and should be adopted as a new FCC EAS rule.

Para. 15 to 21: Use of the National Periodic Test Code (NPT)

The National Periodic Test (NPT) EAS Event Code should not be redefined to emulate the EAN Event Code. The NPT code should remain limited to a length of 2 minutes, and should not have priority handling; those two properties should be reserved for the EAN code. In its current form, the NPT code would function adequately for FEMA to test its nationwide distribution channels, both via legacy EAS and IPAWS. If FEMA wishes to test the two-minute limit of EAS encoder/decoders, and test whether the President's message would truly be broadcast nationwide, it can simply utilize the EAN code for those tests. Even if the NPT code were to be designated to emulate the EAN code, it is still no guarantee that because the NPT code is broadcast properly, that the EAN code would as well; they are two different codes, and the only way to truly know if the President's message will be broadcast properly is to test using the EAN code. In addition, if the NPT code were to emulate the EAN code with the two codes causing the exact same reaction in EAS encoder/decoders, what's the point of having an NPT code other than having legacy EAS crawls saying "test" instead of looking like a real alert? Is that singular advantage worth FEMA losing the flexibility of having the use of two codes that cause either a closed-circuit-type reaction (the current NPT code) or a full-system, end-to-end test (the EAN code)? It would be envisioned that with the NPT code operating in its current form, most nationwide tests would use the NPT code, with infrequent end-to-end tests using the EAN code.

Para. 22 to 30: Updated EAS Test Reporting System / State Plan Data Tables

Considering that an electronic EAS test reporting system eases the entry of information by EAS participants and the FCC's task of analyzing the results, requiring EAS Participants to utilize an electronic reporting system is reasonable and prudent. In that the Commission feels that the electronic reporting system used for the 2011 Nationwide EAS Test worked well, it is logical to base a future reporting system on that model. Further, leveraging this new ETRS database to double as a source of data for the State EAS FCC Mapbooks is a valid FCC concept which will ease the data-entry burden on EAS Participants and make best use of the Commission's time and resources.

Current Fields and My Proposed New Fields on ETRS Form One:

Table 1 below shows current ETRS Form One fields, along with my comments on each.

Table 2 below shows my proposed new ETRS Form One fields, and my comments.

Table 1: Current ETRS Form One Fields:

Current Field	My Comment
Legal Name of EAS Participant	My suggested change: Legal Name of EAS Participant Licensee
FCC Registration No.	Is the FRN something the average user filling out Form One would typically know? Is it needed in order for this database to tie into other FCC databases? I suggest dropping it unless it is needed.
Broadcaster Facility No. and Station Call Sign Cable Operator CUID and PSID	This information is definitely needed. My suggested change: Broadcaster Facility ID No.
Transmitter/Headend Location Provide the latitude and longitude of the facility.	Transmitter/headend lat/long is of no interest in EAS. We should rather ask: City of License, State, and County. Those are the basis for EAS Monitoring Assignments. [See my proposed new fields in Table 2.]
EAS Designation	FCC needs to drop "NN" from its list.
Station you monitor for EAS identified by Call sign.	My suggested change: The two sources you monitor as your required EAS Monitoring Assignments. (This section should have two blank fields to enter the two sources.)
Any alternate stations you monitor identified by Call sign.	"Any alternate" made it sound like the second Monitoring Assignment is an option, which it is not, so FCC should not use this language to refer to the second Assignment – rather, do as recommended above and treat the two mandated Monitoring Assignments equally. However, FCC can ask here for sources monitored beyond the first two if the FCC system can handle that amount of data. Suggested language for that: Any additional EAS sources you monitor.
Your EAS equipment manufacturer and model number/software version.	OK

Table 2: My Proposed New Additional ETRS Form One Fields:

My Proposed New Field	My Comment
Contact Person Contact Phone Number Contact Email Address	Having this information will aid the FCC in emailing reminders when the annual info update required in the new EAS rules is due. It will also aid the SECC in contacting the EAS Participant if there is a monitoring issue. Requesting this name/number/email is not without precedent, as it is requested in the FCC's DIRS registration; but that database cannot be tied to this database, as DIRS only identifies the Licensee but is not station-specific.
City of License.	This should replace Lat/Long. This is what EAS Monitoring Assignments are based on and what the SECC needs.
State that City of License is located in.	Necessary detail.
County that City of License is located in.	This will aid the FCC and SECCs in matching up the EAS Participant to the correct EAS Monitoring Assignment, which is frequently determined by county.
Does your station hold a Monitoring Assignment waiver? If so, what two sources are stipulated in the waiver as your new Monitoring Assignments?	This will aid FCC and SECCs in adjudicating variances in the EAS Participant's stated monitoring vs. the required Monitoring Assignments shown in the State EAS Plan.
EAS Monitoring Assignment Disclaimer	The FCC should post a warning on this website in the proximity of the location on the form where EAS Monitoring Assignments are entered, stating, "Although EAS Participants are requested to enter on this form the EAS sources they currently monitor, the FCC considers the EAS Monitoring Assignments shown in the State EAS Plan to be the proper and correct sources for compliance with the Commission's Part 11 EAS Rules."

<u>Pre-populating ETRS Fields from other FCC Databases:</u>

Regarding the possibility of the ETRS pulling in data from the DIRS database, this does not seem viable as the DIRS database only identifies the Licensee but is not station-specific. Additionally, the data requested in the DIRS form is mostly contact information, and it is not safe to assume that the DIRS contact would necessarily also be the EAS contact.

The Consolidated Database System (CDBS) looks to be linkable primarily through the Facility ID No. The common elements appear to be: Name of Licensee, Facility ID, Call Sign, City of License and State. Perhaps the Facility ID/Cable CUID could be moved to the top of ETRS Form One, and when filled in it would auto-complete the rest of the items above. One would presume that not much else on ETRS Form One above, whether current or proposed, would be found in other FCC databases, but certainly pre-populating anything and everything possible will be of assistance to the EAS Participant and make for a more accurate record.

Capabilities Needed in ETRS Database Functionality:

In order for the ETRS database to maximize EAS Participant ease of use, to ensure the integrity of the database, and to create the needed EAN path data table for the FCC Mapbook, the following functionality is necessary:

Table 3: My Proposed Capabilities of the ETRS Database:

Capability	My Comments
Date this Data Record Last Accessed	The FCC database should automatically insert the date when a record is logged into by the EAS Participant. This will aid the FCC in tracking the due date of the annual information update required in the new EAS rules.
The system should send a reminder to the email address in the record when it is time for the annual information update required in the new EAS rules.	Without a reminder, EAS Participants will likely forget to update their information and the database will become more inaccurate with time.
The user interface should offer a “Forgot Password” functionality for those previously registered returning to the site.	Clicking this link should cause the system to send the password to the email address in the record.
The user interface, perhaps on every page, should offer a phone number and/or email address at the FCC for help.	This is not without precedence at the FCC, as the DIRS user interface offers both an email address and phone numbers for help. If it is not immediately apparent to EAS Participants where to go for help, they will likely give up quickly and not complete their data entry.
The system should have a method to verify the legitimacy of a new user to enter data for a particular EAS Participant to prevent random people from creating records.	Is there an existing FCC database that EAS Participants have access to where a temporary user name and password could be retrieved, such as the Licensee logging

	into its FCC Registration Number (FRN) record? The FCC sending out a temporary user name and password to each EAS Participant would be burdensome. What other method exists to ensure that records are created only by legitimate parties?
The system should detect/prevent duplicate entries for the same EAS Participant.	Only one record should exist in the ETRS database for any given EAS Participant.
Most importantly, the ETRS system must have the capability to create for each state the FCC Mapbook "specific primary and backup path for the EAN messages that are formatted in the EAS Protocol, from the PEP to each station in the plan."	The responsibility for this EAN path data table currently rests with the SECC as a required element of the State EAS Plan. With the FCC now having the database to easily create this EAN path data table, the responsibility should be shifted to the FCC. The data collected in ETRS would be used by FCC to create these EAN path data tables. See more details below.

Creating the EAN Path Data Table for Each State's FCC Mapbook:

The FCC has a desire to have available a data table for each state showing "the specific primary and backup path for the EAN messages that are formatted in the EAS Protocol, from the PEP to each station in the plan." Currently, SECCs are saddled with that responsibility in Part 11.21(a) as a required element of the State EAS Plan, but the FCC in this NPRM points out that SECCs have not been fulfilling that duty. Since the Commission will now be creating the ETRS database which will contain the EAS Participant Call Sign or CUID/PSID and its two stated monitored sources (the three pieces of data needed to construct the EAN path data table), the FCC is now in the best position to create the EAN path data table. Indeed, although the FCC did not propose rule changes to address it, the FCC indirectly takes responsibility for this data table in NPRM Paragraph 29 stating, "To date, however, the SECCs have not been able to supply the Commission with the data necessary to populate the data tables or Mapbook." As the FCC infers, it is in the best position to create these EAN path data tables. New EAS rules should reflect this realignment of responsibility for the EAN path data table.

A simple representation of the EAN path data table could be just a printout of each station/source that is monitored by another EAS Participant, with those monitoring it listed below it; this may even be easily accomplished in an Excel spreadsheet by using the correct filtering hierarchy.

With proper database manipulation, it should be possible to use the data to construct a more-elegant EAS monitoring block diagram. Any station/source which is listed as being monitored by any EAS Participant is given a box at the top of the chart, with all EAS Participants who state they monitor that station/source listed below it. The block diagram would thus fill itself in by virtue of using just the indicated three pieces of information for each EAS Participant.

Whatever the solution, these requirements for the ETRS to have the ability to create each State's EAN path data table should be communicated early on to the database developers, so it is designed into the system as a capability from the beginning.

EAS Rule Changes Realigning Responsibilities for the FCC Mapbook:

As outlined in the preceding section of my comments, revised EAS rules should reflect the shifting of responsibility for creating the EAN path data table from the SECC to the FCC, with the Commission then logically creating the FCC Mapbook for each state as well. The concept of the Commission creating the FCC Mapbook is not without precedent. Up until the year 2000, the Commission produced the FCC Mapbooks and sent them out to the SECCs. The last FCC Mapbook created by the Commission for the Wisconsin SECC is still posted here: www.sbe24.org/eas/FCC-MAPBOOK-0400.pdf. The Commission should return to the practice of producing the FCC Mapbook, especially now that it will have the data available to create and continually update the Mapbook. My proposed revised rules are below:

Table 4: Proposed Rule Changes to Realign Responsibility for the EAN Path Data Table and the FCC Mapbook:

EAS Rule	Language Shown in NPRM Appendix B	My Proposed New Language
11.21(a) Second sentence This is existing language:	EAS State Plans should include a data table, in computer readable form, clearly showing monitoring assignments and the specific primary and backup path for emergency action notification ("EAN") messages that are formatted in the EAS Protocol (specified in 11.31), from the PEP to each station in the plan.	EAS State Plans should include a data table clearly showing monitoring assignments and the counties or other descriptions defining the EAS Local Areas.

11.21(c) This is the FCC's proposed language in the NPRM:	The FCC Mapbook is based on the consolidation of the data table required in each State EAS plan with the identifying data contained in Form One of the ETRS. The Mapbook organizes all EAS Participants according to their State, EAS Local Area, and EAS designation.	The FCC Mapbook is based on the consolidation of the data table required in each State EAS plan with the identifying data contained in Form One of the ETRS. The FCC will utilize this data to create the FCC Mapbook for each state. The Mapbook shows the specific primary and backup path for emergency action notification ("EAN") messages that are formatted in the EAS Protocol (specified in 11.31), from the PEP to each EAS Participant in the plan, and organizes all EAS Participants according to their State, EAS Local Area, and EAS designation.

<u>SECC Access to ETRS Data:</u>

Considering that the ETRS database is to serve as a source of data for each State's FCC Mapbook, it is imperative that the SECCs are given access to this database. For convenience of access, the SECCs should be given a log-in to view the database at any time of day. SECCs could thus detect issues with an EAS Participant's stated monitoring, and use the EAS Participant contact information listed in the database to contact the EAS Participant to either remedy the monitoring anomaly or issue a waiver for the altered monitoring. If possible, each SECC log-in should reveal only data for that SECC's state. The viewing of this data by the SECC should be in a read-only mode (so that an SECC member could not inadvertently, or intentionally, delete or corrupt the entire database), but it should be downloadable as an Excel or similar format file. The EAS Participant user name and password values should not be visible under the SECC log-in, so any changes or updates to data would need to be made by the EAS Participant itself. A field within the database where SECCs could enter a note regarding any EAS Participant would be helpful, such as noting "Station contacted on 1/1/2015 to correct EAS monitoring, but no response."

If the log-in scenario described above is not possible for the FCC to achieve, an alternate option of emailing a weekly or monthly report of each state's database results to the corresponding SECC would be a possible second choice.

SECC Involvement with Designing the ETRS:

It can be realized from the extensive discussion above that the development of the ETRS database, especially as it relates to its capability to create the FCC Mapbook, will be a process requiring careful consideration of a multitude of factors affecting its usability. The FCC is encouraged to engage the SECCs in this process, possibly to the level of creating an SECC Advisory Committee to consult with the FCC database development team. At a minimum, a variety of SECC members should be given an opportunity to access and comment on a beta version of the site, as well as the data that will be available to SECCs, before the site and database are launched.

Para. 31 to 38: Visual Crawl

The FCC states in Paragraph 37, "Thus, we propose to revise Section 11.51(d) of the Commission's EAS rules to require that an EAS text crawl must be displayed continuously throughout the duration of any EAS activation." The EAS community presumes what the FCC means is, "…an EAS text crawl must be displayed continuously throughout the transmission of any EAS message.", meaning the crawl should last as long as the 2-minute EAS alert itself is on the air, not for the entire duration of a 6-hour Tornado Watch, for instance. For clarity, the FCC should change the proposed 11.51(d)(3) rule shown in NPRM Appendix B to read, "(3) Continuously throughout the transmission of any EAS message,".

If the FCC truly is proposing to require a crawl for the entire effective period of an EAS activation, such as 6 hours for a Tornado Watch, this would not be a prudent step.

Para. 39 to 40: Audio Accessibility

The goal is for EAS alert audio and video to be identical, or at a minimum, comparable to each other. This seems very difficult to achieve in legacy EAS alerts. Mandating Text-to-Speech (TTS) for legacy EAS messages, as the Commission suggests, would require

extensive changes to EAS encoder/decoder software, and may not even be possible for that software to accomplish.

It could be presumed that the CAP version of an EAS message is the preferable version to select for airing as it is most likely to have matching audio and video. Although this solution would require major upgrades in EAS encoder/decoder software as well, and also may not even be possible, the FCC could require that immediately upon starting to receive a legacy EAS message, the EAS encoder/decoder should force a poll of the CAP servers it has access to. If the EAS encoder/decoder detects a CAP message that is exactly the same as the incoming legacy EAS message, it should abort the legacy EAS message in favor of retransmitting the CAP version of the message. This would yield the highest likelihood of matching audio and video.

The feature described above would also help address one other thorny issue for EAS. The EAS community has been promoting since before CAP was introduced that once we have CAP the TV crawls will contain improved information and recorded audio files delivered digitally will sound better than scratchy reception on the average EAS monitoring receiver. While these advantages are true when the CAP version of a message is retransmitted, by virtue of the fact that legacy EAS over-the-air monitoring continues, it frequently happens that an LP or SR station receives the CAP message and retransmits it as legacy EAS and downstream EAS Participants end up retransmitting that legacy EAS message before their own EAS encoder/decoder happens to poll for the CAP version of the message. This downside of legacy EAS will persist as long as legacy over-the-air monitoring continues, and both FCC and FEMA have stated that they intend to preserve legacy EAS as a viable “back-up” to CAP, although legacy EAS often circumvents the much-improved CAP message, as pointed out above. The EAS encoder/decoder feature of replacing a received legacy EAS message with its CAP version, as described in the above paragraph, would help to eliminate this issue of legacy EAS messages airing instead of CAP messages.

Para. 25, 41 and Appendix B: Proposed Effective Dates

The requirement set out in the text of the proposed rules in NPRM Appendix B for EAS Participants to complete the ETRS Form One within 60 days of adoption of these rules is a reasonable time period, but considering that there appears to be a significant amount of work needed to launch the ETRS, the rule might be best to modify the triggering event from the adoption of these rules to, "within 60 days of the FCC declaring the ETRS operational." Also, note that NPRM Paragraph 25 states "within one year of the effective date of the rules" regarding this topic, so this contradiction may be confusing to some commenters.

The requirement for EAS Participants to implement all other changes in this NPRM within 6 months of adoption of these rules is reasonable. If the NPT code were to be required to emulate the EAN code, that may take more time, but I am not advocating for that requirement.

Para. 52-57: Acknowledgement of all EAS Header Codes / Retransmission of EAN Immediately Upon Receipt

In this NPRM, the Commission clarified its rules that EAS equipment should not ignore some of the EAS Header Code elements by processing them as "wildcards", and also that an EAN message must be broadcast immediately upon receipt rather than delaying the transmission based on the Time of Release. It was acknowledged by the Commission that some EAS equipment manufacturers released software that does not comply with these rules. This raises two questions:

Should the FCC establish a timeframe for EAS equipment manufacturers to release updated software that corrects this situation?

Secondly, should the FCC establish a timeframe for EAS Participants to install the updated software into their EAS equipment, which remedies this situation and brings their EAS equipment into compliance with FCC rules? This may be especially important if FEMA is to conduct another nationwide EAS test "in the near future" as it intends. If outdated software persists in EAS Participant equipment, issues experienced during the 2011 Nationwide EAS Test may reoccur in the next test as well.

Topics of Future NPRMs:

Decisions deferred in the EAS Fifth Report and Order, Released January 10, 2012

In the EAS Fifth Report and Order, Released January 10, 2012, the Commission's decision on a number of comments was stated as, "We defer taking any action on this issue until, at a minimum, we have completed our review of the test data we will be receiving from EAS Participants as a result of the November 9, 2011, Nationwide EAS Test". These deferred issues are:

- Revision or elimination of the FCC Mapbook now required in each State EAS Plan in EAS Rule 11.21(c). [R&O paragraph 119]
- Whether manual operation of EAS equipment should be allowed for processing the EAN. [R&O paragraph 202]
- If the EAS Operating Handbook now required to be posted at all normal duty positions in EAS Rule 11.15 should be eliminated. [R&O paragraph 210]
- Response to a commenter on a request that translators and satellite stations no longer be exempted from having EAS equipment so that they may carry State and local alerts. [R&O paragraph 268]
- Possible new rules on State EAS Plans and SECC authority and responsibilities. [R&O paragraph 274]
- Possible changes to the current Required Weekly Test (RWT) and Required Monthly Test (RMT) rules. [R&O paragraph 277]
- Consider adding a new National EAS Location Code [R&O Footnote 496]

Considering that on April 12, 2013, the FCC PSHSB released a report summarizing the findings from the 2011 Nationwide EAS Test, it would seem appropriate that the Commission should in its next NPRM render a decision on a final disposition of the seven items deferred in the EAS Fifth Report and Order, Released January 10, 2012. Although one of those items, the National EAS Location Code, is addressed in this current NPRM, and other items such as rules on the FCC Mapbook, State EAS Plans and SECCs will likely be addressed in a near-future NPRM as a result of the CSRIC report, it

is nonetheless imperative that the disposition of these seven items be declared by the Commission in some form or fashion in order to release these items from limbo. This is particularly important as SECCs rewrite their State EAS Plans. Some SECCs may be reticent to put the time into revising their State EAS Plans if they feel there are still other possible new FCC rules lingering from the EAS Fifth Report and Order that could precipitate a further revision of their State EAS Plan virtually immediately after the SECC has finished doing the previous set of changes and submitted the plan to the FCC for approval. Disposing of these deferred items would serve well both the SECCs and the Commission.

FCC-Planned Future NPRMs

Subsequent to the disposition of the seven deferred items in the EAS Fifth Report and Order, the Commission's "In the future, we plan to consider" list in Paragraph 2 of the current NPRM would be good next steps. A suggested priority list would be:

1) Considering and taking action on recent and future recommendations of the FCC's CSRIC regarding the streamlining of the EAS State Plan process.
2) Standardizing the waiver process for EAS "live code" exercises. [This would seem to be an "easy lift" as the Commission has already laid out guidelines previously, and as an SECC-related item might be easily combined with the CSRIC recommendations above.]
3) Basic EAS security guidelines. [This is another CSRIC topic, but drafting rules along these guidelines could clearly become quite involved.]
4) The addition of other elements of the FEMA's IPAWS to the testing paradigm. [This presumably means WEA, which would involve FCC Part 10 rule changes and possible collaboration with the wireless carriers and others. Although this may be a "heavy lift", state and local alerting authorities are clearly clamoring for a way to test WEA which is currently not possible as the WEA system does not react to any of the EAS-designated test codes.]

Respectfully submitted,

Gary E. Timm