

Sage Alerting Systems
Digital ENDEC model 3644
Firmware Revision: 89-32 (BLU event)
Released January 17, 2019

Release notes for version 89-32, adding the BLU event code – for United States ENDECs only

This release is to be applied to ENDECs that already have version 89-30 with cr-rev4 and si-rev5 installed.

Summary: (complete details are provided in the installation instructions later in this document)

- 1) This release implements the voluntary Blue Alert by adding a BLU event code. Based on your state plan, some originators may start using this event code. You are not required to carry Blue Alerts, and you are not required to load this update.
- 2) This release removes support for the old “New Events” facility. You will need to check to see if your ENDEC has any “new events” installed, and remove them. Most users will not have used that feature. Your ENDEC will blink the AUTO led if New Events are detected, but it will continue to function properly (though ignoring any New Event definitions).
- 3) You will need to download a new version (2.53) of the ENDECSetD editing program to review your current settings file for New Events, and to add Blue Alert to a filter if you choose to carry that event. Download it from here:
<https://s3.amazonaws.com/sagealertingsystems/release/EndecSetD53.msi> and run it to install.
- 4) You will need to check to see if you already have the 89-30 release with cr-rev4 and si-rev5 installed, and then upload this 89-32 firmware release to your ENDEC. Download it from here:
<https://s3.amazonaws.com/sagealertingsystems/release/89-32.x>

Please read the rest of this document for important information. If your AUTO led is blinking, and you see the message “New Events detected in settings file, see release notes”, you will need to read the section in this document titled “New Events”.

Introduction

This release adds the Blue Alert (BLU) to the list of permitted events in the Sage ENDEC. This is a voluntary event code. If you do not want to relay BLU alerts, you do not need to install this update.

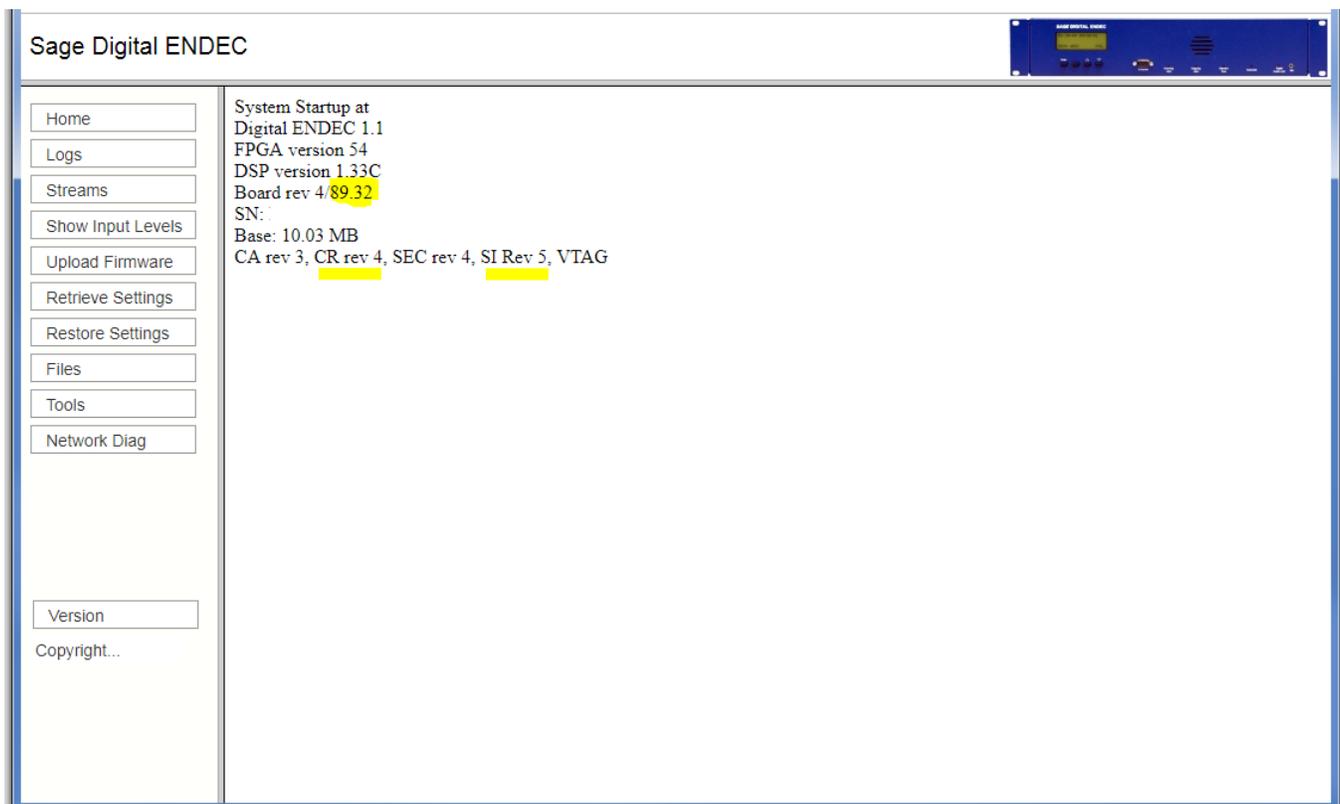
This release is only to be applied to ENDECs that already have version 89-30 installed and the cr-rev4 and si-rev 5 updates. The cr-rev4 update was released in May 2018, the si-rev5 update in August 2018. If you are receiving IPAWS messages now (January 2019), you probably have all of these updates installed, though you should read these notes and follow the instructions to make sure.

Do not install this release on ENDECs in Canada.

As always, the detailed instructions are far more complex than the actual steps you need to take. We've split this release note into two parts, one simplified, and one detailed. The simple version is first. It assumes that you know how to access your ENDEC's web page. There are six steps.

Step 1. Verify that your ENDEC is up to date, and is ready for this update. Check your version by clicking the version button on the ENDEC's web page. If you see version 89.30 as shown below, continue to step two, otherwise see the details section to add the 89-30 update. Ignore the number in front of the '/

Step 2. Check to see if your ENDEC has the cr-rev4 and si-rev5 updates. Look for the areas highlighted below, CR rev 4 and SI rev 5. If you don't see these, you will need to add these updates. See the "Details Section" below.



The screenshot displays the Sage Digital ENDEC web interface. At the top left, the title "Sage Digital ENDEC" is visible. On the right side of the header, there is a small image of the physical device. The main content area is divided into a left sidebar with navigation buttons and a main panel displaying system information. The sidebar buttons include: Home, Logs, Streams, Show Input Levels, Upload Firmware, Retrieve Settings, Restore Settings, Files, Tools, Network Diag, Version, and Copyright... The main panel displays the following system information: System Startup at Digital ENDEC 1.1, FPGA version 54, DSP version 1.33C, Board rev 4, 89.32 (highlighted in yellow), SN: Base: 10.03 MB, CA rev 3, CR rev 4, SEC rev 4, SI Rev 5, VTAG (CR rev 4 and SI Rev 5 are highlighted in yellow).

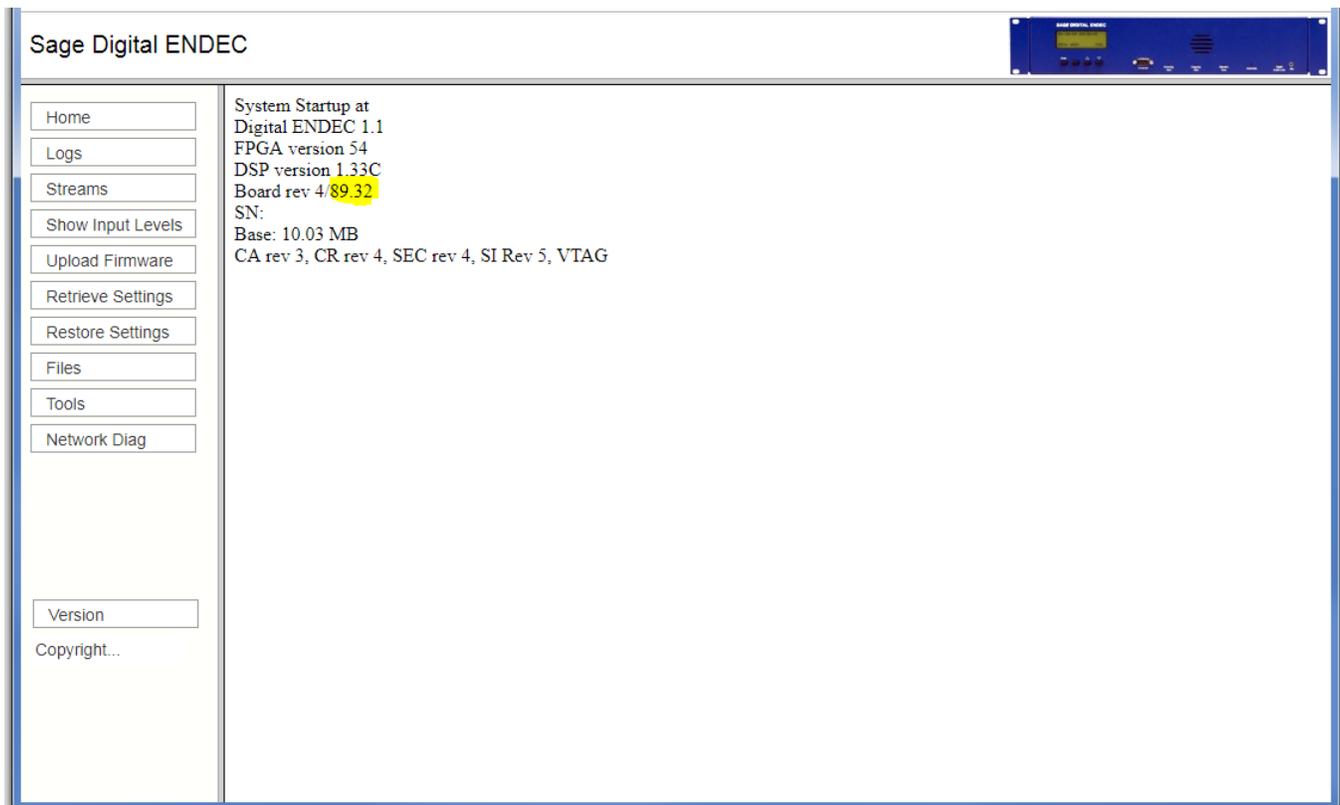
Step 3. Download the firmware, and upload to the ENDEC

Download it from the Sage web site here:

<https://s3.amazonaws.com/sagealertingsystems/release/89-32.x>

and then upload it to your ENDEC with the Upload Firmware button on the ENDEC's web page.

Step 4. Once the ENDEC has rebooted (you will need to manually refresh the web page after about two minutes), click the version button again. Check to make sure you now have version 89-32 installed as shown by clicking the version button and looking at the highlighted area below.



Step 5. Some users might see a message at the end of the version information. You will also see it if your ENDEC sends startup messages via email. You'll see it on the front panels MSG display as well. The version information will look like this:

```
System Startup at
Digital ENDEC 1.1
FPGA version 54
DSP version 1.33C
Board rev 4/89.32
SN:
Base: 10.03 MB
CA rev 3, CR rev 4, SEC rev 4, SI Rev 5, VTAG
New Events detected in settings file, see release notes
```

The ENDEC's front panel AUTO light will also be blinking. The ENDEC is trying to get your attention. This means that your settings file has used the old "new event" feature. We explain what this all means in a later section called "New Events". You will need to review your settings file with the new version of ENDECSetD, and upload a new settings file.

Step 6. If you want to add the Blue Alert to a filter, you'll need to download the ENDECSetD settings file program. Download it from here:

<https://s3.amazonaws.com/sagealertingsystems/release/EndecSetD53.msi>

and run it to install.

New Events

The following information is only of interest if your settings file contains New Event definitions. If your ENDEC's AUTO led is blinking, or you see "New Events detected in settings file, see release notes" in any messages from the ENDEC or on its front panel, then you need continue reading.

Previous versions of the ENDEC supported the ability to add new Event Codes with ENDECSetD. We have removed this feature for three reasons:

- 1) While early versions of Part 11 allowed for States to add their own event codes, this language has since been removed. Only FCC-approved codes in Part 11 are now permitted.
- 2) Some users thought they needed to add any event they wanted to use in a filter to the New Events section. This leads to confusion, and difficult to maintain filters.
- 3) Events added through New Events conflicted with new FCC mandated events.

Starting with version 89-32, the ENDEC will ignore any events added with the New Events facility. Starting with version 2.53 of ENDECSetD, "New Events" can no longer be added.

To avoid any confusion between what is seen in the settings, and what the ENDEC is doing, the ENDEC will blink the AUTO led and send messages saying that the settings includes New Events. You will need to edit the setting file with latest version of ENDECSetD to remove those events, and remove those events from any incoming filter or outgoing header that uses them.

Download and install ENDECSetD from here:

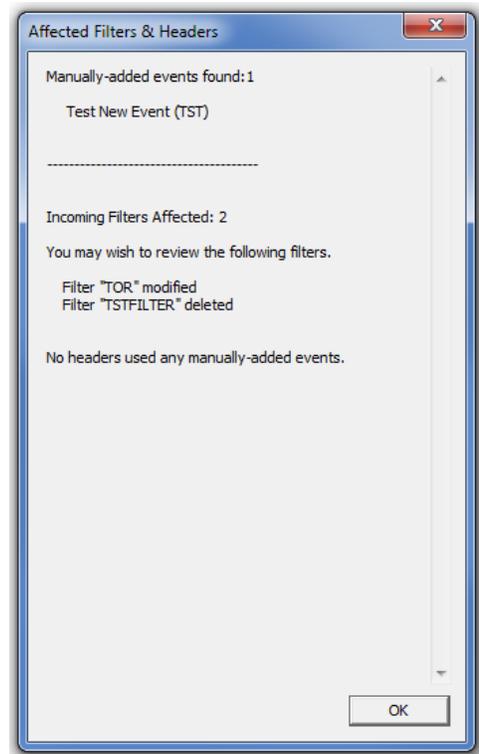
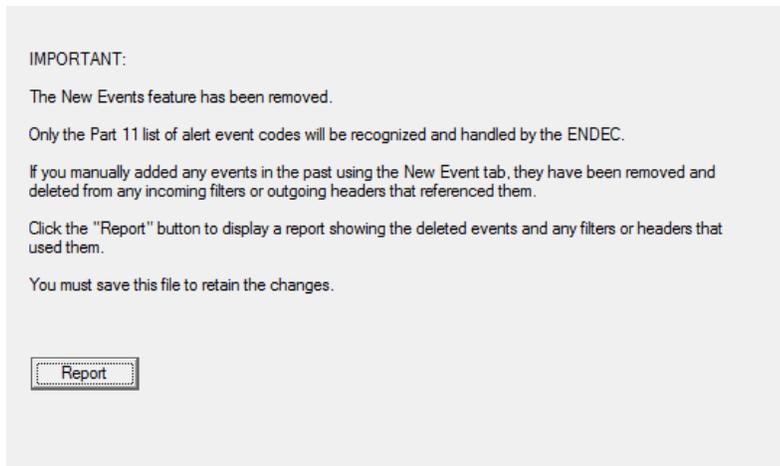
<https://s3.amazonaws.com/sagealertingsystems/release/EndecSetD53.msi>

To assist in this process, ENDECSetD will check for the presence of New Events. If any are found when a settings file is opened, ENDECSetD will show you a tab explaining what happened to New Events, and if you click the report button, will open a window showing a list of the new events, along with the filters and headers that used them. It will remove those events, and remove them from filters and headers. Any filter or header that contained only a new event will also be removed. You should review any headers and filters that are affected, and make any necessary changes.

It is possible that there is a conflict between old New Events that were added, and the new weather codes added in 2016. In that case, those weather events will have been removed from any filters that used them, and you will need to add them back to the affected filter.

Again, this only applies to the small number of users who have added New Events.

Below is the page you will see when you open a new file with New Events, and the result of clicking the Report Button.



You will need to save the settings file and upload it to the ENDEC.

Details Section

Read this section only if you want more details or your previous version was not 89.30.

Here are the steps you must follow to install this release.

Step 1. Before installing this release, use the version button on the ENDEC's home page and check this line:

Board rev x/nn.mm

nn (major version) must be 89, mm (minor version) must be 30. If you have 89.30, skip to the next step.

If you have a major version less than 89, you must first install version 89. If you have a major version 89 but a minor version less than 30, you must install 89-30 before installing the cr-rev 4 update. Read the 89-30 release notes at <https://www.sagealertingsystems.com/support-firmware-89-30.htm> for details.

Note that the ENDEC uses a major.minor release identification system. The "." is a separator, not a decimal point. The ENDEC will show you a version number like this: 89.30, meaning major release 89, sub release 30. A displayed version of 89.6 is a major release of 89, and a minor release of 6. As 6 is less than 30, the 89.6 version is older than 89.30, and your ENDEC should be updated before continuing this procedure.

If you have a major release number of 90 or 91, see the section on special releases in the 89-30 release notes at https://s3.amazonaws.com/sagealertingsystems/release/89-30_release_notes.pdf.

Step 2. From the information on the version page you obtained above, look at the last line. You will see a list of feature codes, for example:

CR rev 2, CA rev 2, SEC rev 2

If your CR rev is less than 4, as shown above, then you need to install the cr-rev4 release and should continue to step 3. If you have version 89-30 and the feature code line shows CR rev 4, continue with step 6.

If you do not see a line of feature codes, refer to step 1.

Step 3. As you don't have CR rev 4 installed, you will need to install it. Download the firmware update file from here:

<https://www.sagealertingsystems.com/release1-1/cr-rev4.x>

Save the file to your desktop or another convenient location.

Step 4. Install the cr-rev4 release by using the Upload Firmware button on the ENDEC's home page. Upload the cr-rev4.x file you downloaded in the above step.

Step 5. After the reboot, use the version button on the ENDEC's home page and check for this line:

CA rev 3, CR rev 4, SEC rev 4, VTAG

Note that the browser won't refresh on its own, you'll need to click the home button on the ENDEC's web page once it has rebooted. If you do not see that line, the update did not

install. Check to see that you have performed the above steps, then contact us at support@sagealertingsystems.com, or call us at 914-872-4069 – press 1 for support.

Step 6. You now have (or already had) CR Rev 4 installed. Use the version button on the ENDEC's home page and check for this line:

CA rev 3, CR rev 4, SEC rev 4, SI Rev 5, VTAG

If you do not see SI Rev 5, then you need to install that release.

Step 7. Download the firmware update file from here:

<https://www.sagealertingsystems.com/release1-1/si-rev5.x>

Save the file to your desktop or another convenient location.

Step 8. Install the si-rev5 release by using the Upload Firmware button on the ENDEC's home page. Upload the si-rev5.x file you downloaded in the above step.

Step 9. After the reboot, use the version button on the ENDEC's home page and check for this line:

CA rev 3, CR rev 4, SEC rev 4, SI Rev 5, VTAG

Note that the browser won't refresh on its own, you'll need to click the home button on the ENDEC's web page once it has rebooted. If you do not see that line, the update did not install. Check to see that you have performed the above steps, then contact us at support@sagealertingsystems.com, or call us at 914-872-4069 – press 1 for support. Leave a message if you reach voicemail.

Release Contents

- Support is added for the Blue Alert event code (BLU). This is a voluntary code, you do not need to carry this alert, and you do not need to install this software update.
- Support is removed for the "New Events" feature. As described in the section on New Events, that feature was left over from the early days of Part 11 when states were permitted to add new events as long as they were in the state plan. Part 11 no longer permits this, and only FCC authorized codes are permitted.
- The ENDEC now checks to see if the RWT outgoing header contains an RWT code, and will not send this header if it does not.