

10/09/07

This procedure is used to update the flash programming for the FT-2000/D transceiver.

The update software file is available from our website at http://www.yaesu.com. FT-2000 data file [AH025 134 10-09-07.zip]

We recommend Installing the Flash Programming Software on a PC computer with Windows 2000, XP or higher Operating System.

The CT-119 programming cable should be available from your authorized Vertex Standard dealer. You may also order by email to Vertex Standard parts department, vaesuparts@vxstdusa.com.

When using the CT-119 cable it is not required to operate the internal switch S3004 or to remove the cover. Please follow these instructions (PART 1 and 2).

If the CT-119 programming cable is not available you will need a serial cable RS-232C, DB9F to DB9F straight cable. Please follow these instructions (PART 1 and 3).

Ver. 0134 implements improvements:

 Corrected "bug" keyer to permit polarity reversal in the corresponding paddle setting related to menu items 053, & 055.

053 A1A F-REV

Function: Selects the keyer paddle's wiring configuration

for the KEY jack on the front panel.

Available Values: nor/rEU

Default Setting: nor

nor: Tip = Dot, Ring = Dash, Shaft = Ground rEU: Tip = Dash, Ring = Dot, Shaft = Ground

055 A1A R-REV

Function: Selects the keyer paddle's wiring configuration

for the KEY jack on the rear panel.

Available Values: nor/rEU

Default Setting: nor

nor: Tip = Dot, Ring = Dash, Shaft = Ground rEU: Tip = Dash, Ring = Dot, Shaft = Ground

- Permit monitoring the DVS audio on the internal or external speaker during transmit that was affected by V0133 on some radios.
- Also includes all previous updates.

NOTE: Our documents have listed the software in some different ways. For example v0134, v1.34 and v1-34 as used in these instructions and information are referring to the same version of software.

PART 1

Install the data file to PC

1. Down load the FT-2000 data file [AH025_134_10-09-07.zip] from the following website:

http://www.yaesu.com/indexVS.cfm?cmd=DisplayProducts&ProdCatID=102&encProdID=66EA91711DFB68C03DED4AD35153E12C&DivisionID=65&isArchived=0

- 2. Save the FT-2000 data file [AH025_134_10-09-07.zip] to a temporary folder on your hard drive.
- 3. Unzip and Extract the contents of "AH025_134_10-09-07.zip" to a desktop or local disk C:\temp of your computer.
- 4. Two files named [FSW003.exe] and [AH025_V0134.SFL] will be found in a desktop or local disk C:\temp.

The programmer and software are now stored on your computer in the drive and files designated in the last step above and are ready to update your FT-2000 or FT-2000D Transceiver.

PART 2 *CT-119 programming cable

*Don't forget to write down any menu settings you have changed from the default before you start.

This procedure is used for uploading new Software into the FT-2000 and FT-2000D Amateur Transceivers using the CT-119 program cable.

- (1) Turn off the main power switch located on the back of the FT-2000 (or turn off the power supply for FT-2000D) and remove the AC power cord.
- (2) Connect the CT-119 Cable's DB9F connector to the serial port COM1 in the back of your computer. You may also use a USB to serial adaptor if the DB-9 (RS-232C) serial port is not available on your computer.
- (3) Now go to the desktop or local disk C:\temp and find the **FSW003** icon as shown below. Double-click **the FSW003** icon, displayed on the Program Screen.



(4) When the program opens, confirm that the file AH025_V0134.SFL is highlighted; if not, click on it to highlight it.

(5) Remove the black cover from the PGM jack (bottom left on the rear panel). Plug the mini-DIN connector of the CT-119 into the PGM jack. Be sure that the **arrow** indicator on the mini-DIN plug is <u>down</u>. Plug the AC cable into the radio and turn the main power switch on the back of the radio to the ON position. [NOTE: The radio will not show a display now.]



- (6) Click on [WRITE] in the program window. A status bar with green bars should appear below the [WRITE] button. *Note disregard the on screen instruction to [3. Turn "S3004" on]*.
- (7) When the loading process is complete an [OK?] box will appear. Click [OK?].
- (8) Turn off the main power switch, and unplug the AC cable for ten seconds.
- (9) Unplug the CT-119 from the radio.
- (10) Plug the AC cable into the radio and turn the main power switch on the back of the radio to the ON position (or on the power supply for FT-2000D).
- (11) Plug the radio back in. Press and hold in the [FAST] and [LOCK] keys; while holding them in, turn the radio back on (this resets the radio and locks in the new firmware).
- (12) Turn the radio off. The updating process is now complete.

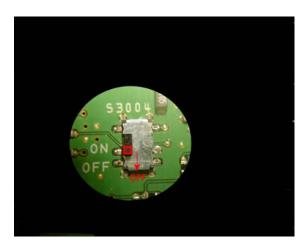
PART 3 * RS-232C, DB9F to DB9F straight cable

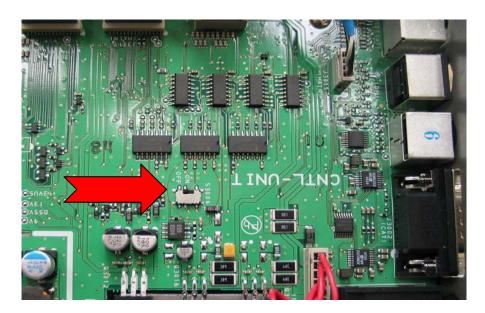
*Don't forget to write down any menu settings you have changed from the default before you start.

This procedure is used for uploading new Software into the FT-2000 and FT-2000D Amateur Transceivers using the RS-232C, DB9F to DB9F straight cable.

We recommend you follow this process, steps (1) thru (18), the first time you program your radio. After you are familiar with the location of the switch S3004 you may wish to bypass Steps (2) and (15), and operate the switch through the hole under the left rear foot (near the CAT connector). See the illustration below Figure A. You must be **extremely careful** to avoid damage to the PC components (which may not be covered by the Limited Warranty). Use a flashlight and insulated tool to operate the switch.

- (1) Turn off the main power switch located on the back of the FT-2000 (or turn off the power supply for FT-2000D) and remove the AC power cord.
- You must access the programming switch S3004. It is located on the control PC board on the bottom of the FT-2000/D. To find and operate the switch, remove the top cover (9 black screws). Remove the bottom cover (seven black screws). Remove the bottom shield (15 silver screws). Carefully Place the Transceiver bottom side up on a sturdy cleared worktable. Find the micro-switch on the pc board near the rear right hand corner when looking down at the bottom of the FT-2000. (See the attached photo.)





- (3) Connect a serial cable RS-232C, DB9F to DB9F straight cable to the **COM1** connector of your computer and the **9-pin CAT connector** on the rear of the transceiver. If you use a USB to serial adaptor you might need to change the COM Port number. It depends on your computer
- (4) Switch the programming micro switch S3004 to on.

- (5) Connect the AC power cable. (In the case of the FT-2000D connect the power supply cables.)
- (6) Turn on the main power switch. (Located on the rear panel of the FT-2000 or on the front of the power supply for the FT-2000D.)
- (7) Now go to the desktop or local disk C:\temp and find the **FSW003** icon as shown below. Double-click on **the FSW003** icon.



- (8) When the program opens, confirm that the file AH025_V0134.SFL is highlighted; if not, click on it to highlight it
- (9) Click on [WRITE] in the program window. A green status bar should appear below the [WRITE] button to show the progress of the download. Do not interrupt the process until it completes.
- (10) When the loading process is complete, an [OK?] box will appear. Click [OK?].
- (11) Turn off the main power switch. (Located on the rear panel of the FT-2000 or on the front of the power supply for the FT-2000D.)
- (12) Disconnect the AC power cable. (In the case of the FT-2000D also disconnect the power supply cables.)
- (13) Switch the programming micro switch S3004 to the off position.
- (14) Remove DB9F straight cable from the CAT connector on the rear of the transceiver.
- (15) Replace the bottom shield panel (15 screws). Replace the bottom case (7 black screws). Replace the top case (9 black screws)
- (16) Reconnect the power cord, (or power supply and connectors for FT-2000D)
- (17) Turn the main power switch located on the back of the FT-2000 to the ON position (or on the power supply for FT-2000D).
- (18) Press and hold in the [FAST] and [LOCK] keys while turning the radio back on. (This resets the radio and locks in the new software.)

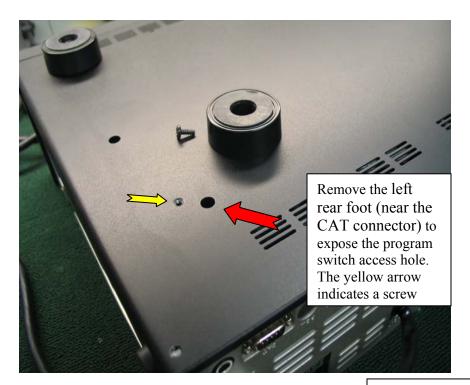
The updating process is now complete.

The software version can be displayed on the radio.

While holding the three buttons [GEN]+[50]+[ENT] turn the radio on. The software version will be displayed in the VFO-A window for 5 seconds 10.29 1.34 and then the radio will start up in normal operation. Example: 10.29 1.34···EDSP v10-29, Main v0134.

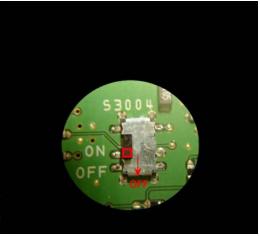
We hope this new software will increase your enjoyment of your FT-2000/D. Thank you for choosing Yaesu radios. If you have any problems or questions please contact Vertex Standard, Amateur Tech Support. amateurtech@vxstdusa.com

Figure A





Switch S3004 is visible through the hole. Move the switch to the on (rear) position. (Top of picture)



Notice that the speech processor default settings are slightly different from the earliest versions. You may wish to verify that the new settings meet your preferences. See the erratum attachment below.

FT-2000 Manual Erratum

Listed below are the actual settings in your FT-2000 and FT-2000D. These settings have been preset at the factory. You may not have the same information in your current operating manual. Please disregard the settings currently listed in your operating manual because the settings listed have been updated to the settings below.

033 GEnETX TOT

Function: Set the Time-Out Timer countdown

time.

Available Values: OFF/3/5/10/15/20/30

Default Setting: Off

The Time-out Timer shuts off the transmitter after continuous transmission of the programmed

time.

132 tAUd PE1FRQ

Function: Selects the center frequency of the lower range for the parametric microphone equalizer when the speech processor is activated. Available Values: OFF/100 ~ 700 Hz (100 Hz/step)

Default Setting: OFF

OFF: The equalizer gain and Q-factor are set to factory defaults (flat).

100 ~ 700: Center frequencies of 100 Hz ~ 700

Hz

You may adjust the equalizer gain and Q-factor at this selected audio frequency via menu items "133 tAUd PE1 LVL" and "134 tAUd

PO1 BW."

133 tAUd PE1 LVL

Function: Adjusts the equalizer gain of the low range of the parametric microphone equalizer when the speech processor is activated.

Available Values: $-10 \sim \pm 10$

Default Setting: -5

135 tAUd PE2 FRQ

Function: Selects the center frequency of the middle range for the parametric microphone equalizer when the speech processor is activated. Available Values: OFF/700~1500 Hz (100 Hz/step)

Default Setting: OFF

OFF: The equalizer gain and Q-factor are set to factory defaults (flat).

 $700 \sim 1500$: Center frequencies of 700 Hz \sim

1500 Hz.

You may adjust the equalizer gain and Q-factor at this selected audio frequency via menu items "136 tAUd PE2 LVL" and "137 EQ2

BW."

136 tAUd PE2 LVL

Function: Adjusts the equalizer gain of the middle range of the parametric microphone equalizer when the speech processor is activated.

Available Values: $-10 \sim \pm 10$

Default Setting: 0

139 tUAd PE3 LVL

Function: Adjusts the equalizer gain of the high range of the parametric microphone equalizer when the speech processor is activated.

Available Values: $-10 \sim \pm 10$

Default Setting: +3

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