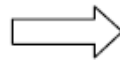
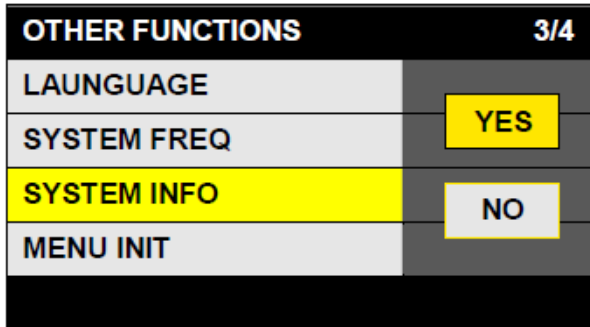


Firmware update procedure for AG-AC120, AC130/A, AC160/A series

1. How to check firmware version

1. Switch ON the power of the camera recorder.
2. Press **MENU** button > choose “**OTHER FUNCTIONS**” > “**SYSTEM INFO**” to display the current version.



* This menu display is for the AG-AC160 series.

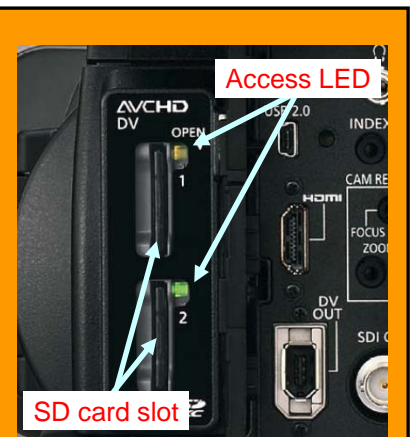
2. Preparation

Prepare following equipment and a firmware file prior to update.

Name	Qty	Remark
SD memory card	1	64MB or larger
Firmware package (VSI****.zip)	1	Can be downloaded at http://panasonic.biz/sav/pass_e
AC adaptor	1	
PC/Mac	1	Use for downloading, unzipping, copying firmware package

Important: Please read before performing update:

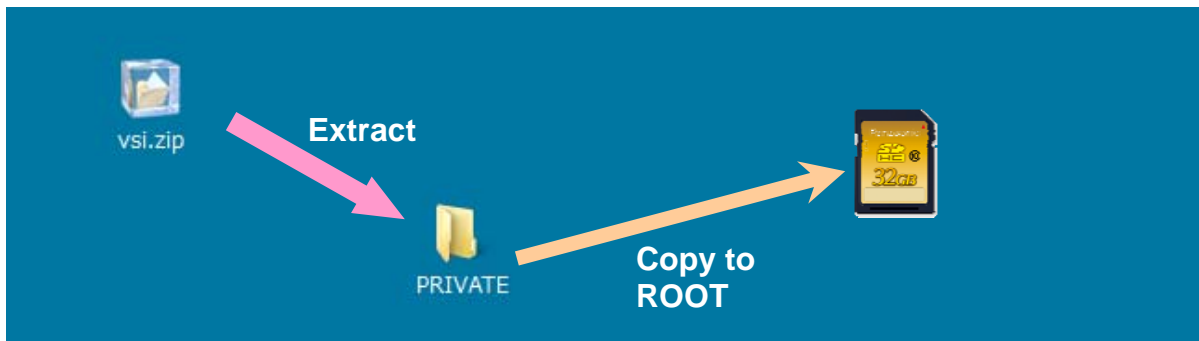
- Update work may take minimum 1 to 2 minutes), use secure power supply (AC adaptor), unexpected shutdown while in update may cause an unrecoverable failure.
- Do Not eject SD memory card while update is in progress (while access LED blinks), interrupting communication between SD card and equipment may cause unrecoverable failure.



3.Updating firmware

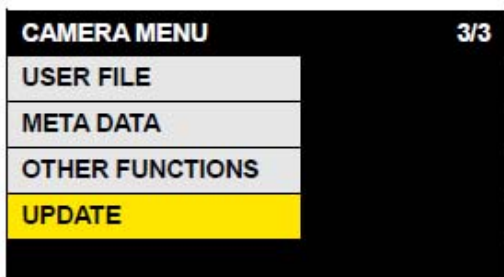
[Preparation]

1. Insert an SD memory card into the SD card slot1 in the camera recorder.
2. Format the SD card (MENU > CARD FUNCTIONS > CARD FORMAT > SLOT1 : YES)
3. Visit Panasonic professional video support website below and download "vsi*****.zip" firmware package.
http://panasonic.biz/sav/pass_e
4. Extract the ZIP package (you will see "PRIVATE" folder under "VSI*****" directory).
5. Mount the formatted SD card to the computer then copy the "PRIVATE" folder to the SD card.



[Perform update]

6. Insert the SD card ("PRIVATE" folder copied) into the SD card slot1 in the camera recorder.
7. While simultaneously pressing both "EXEC" and "STOP (joystick down)", push **MENU** button. (UPDATE menu item now appears at the bottom of CAMERA MENU page 3/3.)



LCD Display
UPDATE menu can be displayed in addition to a setup menus.

8. Perform update (select "UPDATE" : YES).
9. LCD display goes turn OFF and a mode indicator (CAMERA) blinks while update work is in progress.
10. When update work is finished, blinking stops.



Mode indicator blinks while update is in progress



Mode indicator lights when update is finished.

11. Remove the SD memory card and switch OFF the power and disconnect DC power then connect.