Ntec **XFM070**

Owner's Manual_V1.0

AVtec
LCD Monitors

Important Safety Instructions

The device repair must be done by qualified specialists only.

Do not expose this product to direct sunlight, heat or humid conditions.
Please use a sun shade outdoors if necessary.

WARNING! To avoid possible malfunctions the device must not be
exposed to rain or moisture. Prevent water or other liquids from
getting inside the device.

Do not use any damaged or leaking batteries and please replace the battery
immediately if its working life becomes significantly short

Keep away from strong light while using this product so as to obtain the
clearest and the most colorful picture.

Please use the supplied power sources.

Do not use chemical solutions to clean this unit. Simply wipe with a
clean soft cloth to remove fingerprints or smudges.

Please avoid heavy impact or drop on the ground.

Please do not cover the vents and holes on the device to ensure good
ventilation. Otherwise it will lead to overheating and reduces the service life.

FCC (Federal Communications Commission)

This equipment has been tested and found to comply with the limits for class B digital device,
pursuant to part 15 of the FCC Rules.

These limits are designed to provide reasonable protection against harmful interface when the
equipment is operated in a commercial environment. This equipment generates, uses and can
radiate radio frequency energy and if not installed and used in accordance with the instruction
manual, may cause harmful interference to radio communications. Operation of this equipment in
a residential to correct the interference at his own expense

CAUTION: Change or modifications not expressly approved by the manufacturer responsible
for compliance could void the user's authority to operate the equipment.

RoHS FC C E

1. Overview

Thank you for purchasing the AVtec XFM070 Full HD On-camera monitor. This 7" color LCD monitor is a great tool for focusing, composing, and viewing images/video clips directly from your digital camera/video camera. It has advanced integrated digital signal processing circuits and a IPS LED Panel which makes it high brightness with low power consumption, stable performance and low radiation. It is conveniently sized for easy transportation, and it is perfect for difficult shooting situations. To obtain the best results with your new XFM070, please take the time to read this manual.

2. Features

- Ultra Thin 7" IPS LCD Panel in Aluminum housing
- 3840×2160p (30/29.97/25/24/23.98 Hz), 4096×2160p (24Hz)
- 1920x1080 HD screen, PAL/NTSC color system
- Supports 4K UHD HDMI input
- Built-in speaker & integrated jack port for headphones
- Firmware upgradable through USB
- Supports a variety of battery types (F970/ LP-E6/ U60)
- AC/DC Adapter with EU, UK, US & AU plugs included
- Detachable sun hood attachment & foldable sun hood
- Four assignable function buttons
- Focus Assist, Center Marker, Safe Frames, Check Field
- Image Freeze, Image Flip & Pixel-to-Pixel
- Histogram, Exposure (Zebras) & False Colors
- Analog stereo L/R, Embedded Audio Display
- Image Zoom function, Image Nine Grid and Anamorphic Mode
- Brightness, Contrast, Tint, Saturation and Color Temperature adjust

3. Included in this box

1x AVtec XFM070 Full HD Monitor

3x Battery bracket for NP-F, BP-U & LP-E6 batteries

1x AC/DC Combi adapter with EU, US, UK & AU plugs

1x Sun hood attachment & detachable sun hood

1x Ball head with 1/4" camera screw

1x HDMI cable

1x Owner's Manual

3.1 Battery brackets & AC/DC Adapter

Battery brackets

The battery bracket for Sony NP-F batteries is installed on the monitor. You can easily change the battery bracket by unscrewing the 4 small screws on the back of the battery bracket. Unplug the bracket connector from the slot, plug in the connector of the bracket you would like to install and fasten the 4 screws.

The following table will give you an idea which brackets you are able to use for the Sony and Canon battery types.

Item:	For use with:
NP-F bracket	Sony NP-F970, NP-F960, NP-F950, NP-F930, NP-F770, NP-F750, NP-F730, NP-F570, NP-F550, NP-F530, NP-QM91D, NP-QM91, NP-QM90D, NP-QM90, NP-QM71D, NP-QM71, NP-QM70D, NP-QM70, NP-QM51D, NP-QM51, NP-FM71 & NP-FM70 series.
BP-U bracket	Sony BP-U30, BP-U60 & BP-U90
LP-E6 bracket	Canon LP-E6

NOTE: Please remove the battery from the bracket before changing the battery bracket itself.

AC/DC Combi adapter

The supplied AC/DC combi adapter (100-240V~) supports AC or DC power and uses wall, vehicle, or airplane power outlets to power your device. Four power plugs are supplied for EU, US, UK and AU. Slide the selected plug on to the adapter until you hear a soft click.

3.2 Other included accessories

Sun hood

The firm but flexible plastic sun hood is designed to protect your screen and reduces strong light reflection. It mounts to the monitor with a strong easy-on-easy-off construction with hook and loop fasteners.
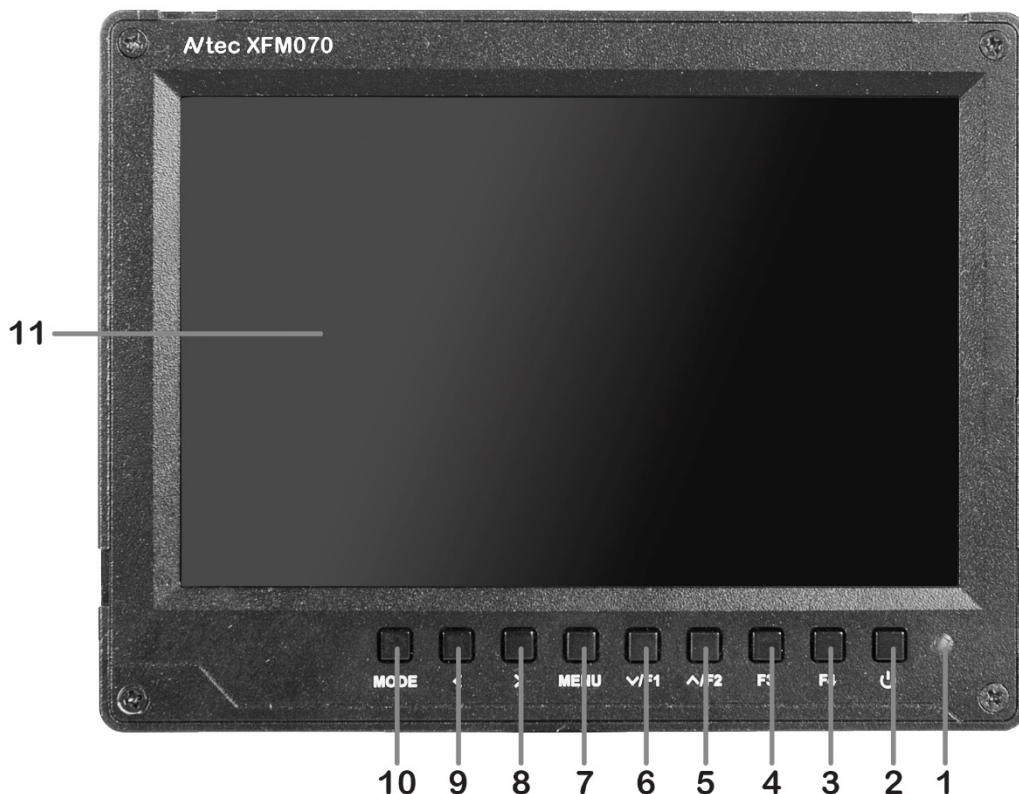

Ball head

The ball and socket joint of the supplied ball head allows movement on all axes at the same time and has a single locking screw for easy fixation to your device. Slide the ball head into a hot shoe and fasten it by turning the wheel on the bottom of the ball head to the right.
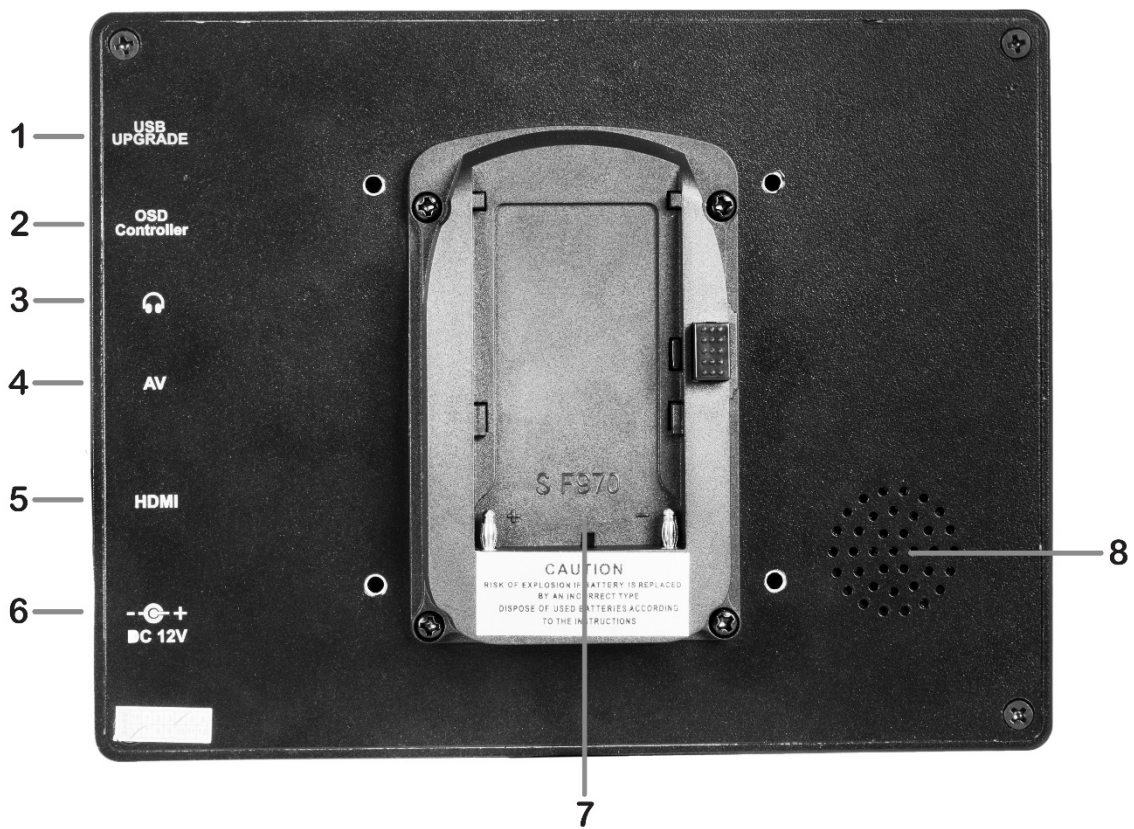
4. Front panel & Controls

Item:	Description:
1	**Power Indicator light** when power on/standby, it turns red; when signal in, it turns green.
2	⏻ **Power on/off button**
3	**F4** Function button, enter secondary menu item F (self-defined button), then self-define the function that user need
4	**F3** Function button enter secondary menu item F (self-defined button), then self-define the function that user need
5	**▲/F2** Menu control button / F2: Function button to navigate into the menu or when not in menu for use of function button
6	**▼/F1** Menu control button / F1: Function button to navigate into the menu or when not in menu for use of function button
7	**MENU** To enter or exit the menu
8	**►** Volume up / increase the value of selected menu item
9	**◄** Volume down / decrease the value of selected menu item
10	**MODE** To switch signal mode
11	**LCD display**

5. Rear panel

Item:	Description:
1	USB Upgrade port
2	OSD Controller port
3	Headphone Jack port
4	AV port
5	HDMI-in port
6	DC Power input (12V)
7	Battery Bracket
8	Built-in speaker

6. Operation instructions

After correctly connecting to the power supply, the indicator will turn (Red), press ⏻ to turn on monitor power, the indicator will be Yellow, and then input AV or HDMI signals, the indicator will turn from Yellow to Green.

1. Press **MENU** button in the front of the panel to enter the main menu, and press ◄ or ► button to go through the contents of the menu and secondary menu functions.

2. Then press ▼/F1 button to enter secondary menu (cursor moves to secondary menu position). If you need to go through or select the items in the secondary menu, then press ▼/F1 or ▲/F2 button to move the cursor.

Pic. Mode	User
Brightness	50
Contrast	50
Saturation	50
Sharpness	0
Color Temp.	User
Red	128
Green	128

3. After selecting the items in the secondary menu, then press ◄ or ► button to adjust the item parameters.
4. Press ▼/F1 or ▲/F2 button to choose another parameter adjustment after confirming the item adjustment.
5. Press **MENU** button to exit the menu.

7. Menu instructions

Image Color menu

Use one of the ▼/F1 button to enter the Image Color menu. Press ▲/F2 or ▼/F1 to navigate through the settings. Once the desired setting is highlighted, use the ◄ or ►buttons to navigate through the sub-menu functions. Press the MENU button to activate the function.

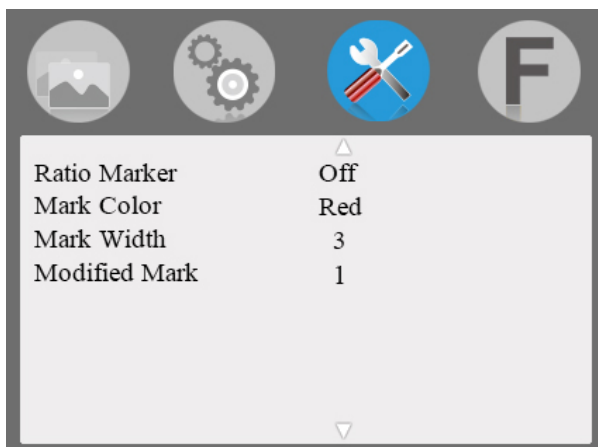| Menu item:	Description:
Pic. Mode	Standard, Dynamic, Mild, User Select "user" to adjust the image of Brightness, Contrast, Saturation, Sharpness" according to the practical situation.
Brightness	To adjust the monitors brightness.
Contrast	To adjust the contrast.
Saturation	To adjust color concentration.
Sharpness	Also called "Resolution", an indicator for the image plane definition and image edge sharpness.
Color Temp.	6500 K, 9300 K or User. The User option allows you to adjust Red, Green & Blue.
Tint	On NTSC video mode, the image color tint difference is adjusted by tint.

Settings menu

Use one of the ▼/F1 button to enter the Settings menu. Press ▲/F2 or ▼/F1 to navigate through the settings. Once the desired setting is highlighted, use the ◄ or ►buttons to navigate through the sub-menu functions. Press the MENU button to activate the function.

Language	English
Aspect Ratio	16:9
No signal	Blue Screen
OSD Trans.	Off
OSD H	50
OSD V	50
Camera Mode	Off
Zoom All	0

OSD Time	Off
U/D Zoom	0
L/R Zoom	0
Backlight	90
Power On	Auto.
USB Upgrade	
Reset	

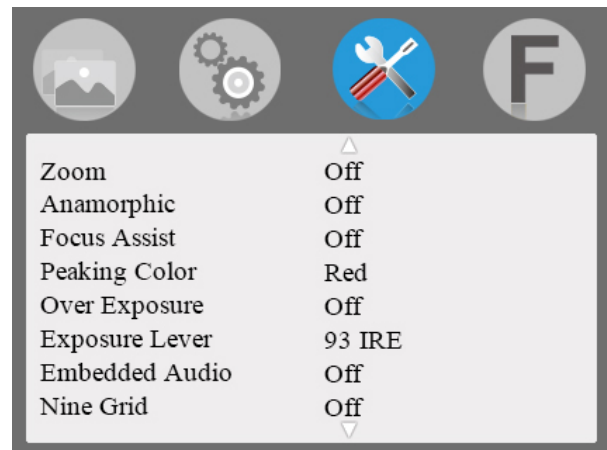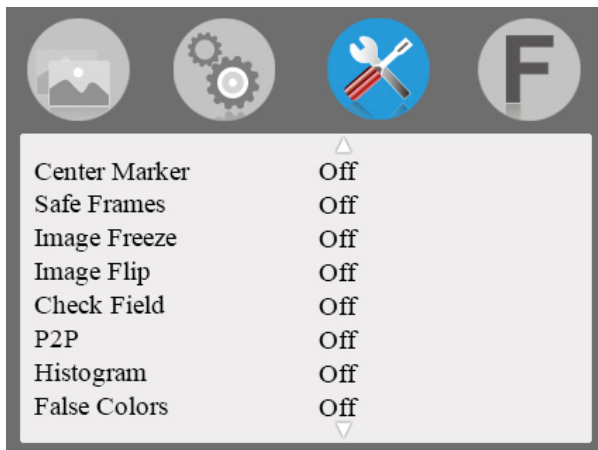| Menu item:	Description:
Language	To change the menu language.
Aspect Ratio	To change the display ratio to: Panorama, Automatic, Just Scan, Zoom 1, Zoom 2, 16:9, 4:3.
No Signal	To select screen color when no signal. Black (recommended), White, Red, Green or Blue Screen.
OSD Trans.	Menu transparency. Off, Low, Medium or High.
OSD H	To adjust the horizontal position of the menu.
OSD V	To adjust the vertical position of the menu.
Camera Mode	Mode Off, 480p, 1080i
Zoom All	Image Zoom. Use ◄ or ► to zoom.
OSD Time	Adjust the menu time. Off, 10s, 20s, 30s
U/D Zoom	Use ◄ or ►, to adjust the proportion of the image Up and Down to Zoom In or Zoom Out.
L/R Zoom	Use ◄ or ►, to adjust the proportion of the image Left and Right to Zoom In or Zoom Out.
Backlight	To adjust the brightness of screen backlight
Power On	Manual or Auto setting
USB Upgrade	To update the firmware via USB. Please check the firmware page on AVtec.tv.
Reset	Restore factory settings by pressing ► button.

Function menu

Use one of the ▼/F1 button to enter the Function menu. Press ▲/F2 or ▼/F1 to navigate through the settings. Once the desired setting is highlighted, use the ◄ or ►buttons to navigate through the sub-menu functions. Press the MENU button to activate the function.

Center Marker	Off
Safe Frames	Off
Image Freeze	Off
Image Flip	Off
Check Field	Off
P2P	Off
Histogram	Off
False Colors	Off

Zoom	Off
Anamorphic	Off
Focus Assist	Off
Peaking Color	Red
Over Exposure	Off
Exposure Lever	93 IRE
Embedded Audio	Off
Nine Grid	Off

Ratio Marker	Off
Mark Color	Red
Mark Width	3
Modified Mark	1

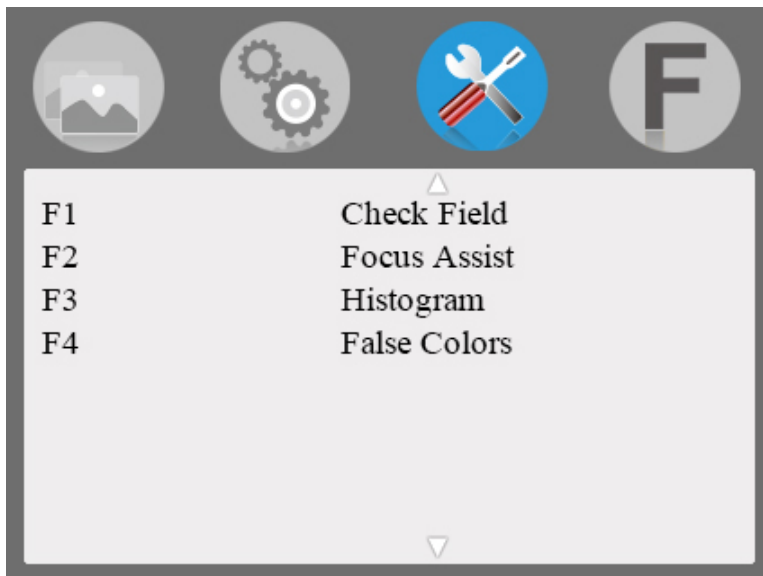| Menu Item:	Description:
Center Marker	To set center mark (cross mark) display.
Safe Frames	To select screen markers; 96%, 93%, 90%, 85%, 80%, 2.35:1 or Off.
Image Freeze	To capture the current picture.
Image Flip	Flip the image, horizontally, vertically or in both directions.
Check Field	Color overlay; Red, Green, Blue, Mono or Off.
P2P (Pixel-to-Pixel) (Not in 4K mode)	The display mode that made the resolution of the image consistent with display of the physical resolution.
Histogram	Turns on the Histogram in the right corner of the screen. To check the picture brightness.
False Colors	Turns on False Colors to show scene lighting levels. Red areas are overexposed, blue areas are insufficient lighting, green areas are good lighting levels.
Zoom (Not in 4K mode)	Image zoom settings; Off, 4x, 9x, 16x
Anamorphic (Not in 4K mode)	Restore the real proportions of the scene; Off, 1.3x, 2.0x, 2.0x MAG
Focus Assist	Turns on the Focus Assist function that makes it easier to focus.
Peaking Color	The edge line color can be chosen according to the situation; Red, Green and Blue
Exposure (Zebras)	Over Exposure can be turned On and Off. Shows red stripes to check what is overexposed. Settings from 1~100 IRE
Embedded Audio	The audio meter is green, and will turn yellow when it exceeds -20dB, and turn red when it exceeds -9dB.
Nine Grid (Not in 4K mode)	Open it to set the image Nine Grid and select ◄ or ► button to choose an image, and then press ▼/F1 or ▲/F2 button to zoom the image to full screen, press MENU button to exit.
Ratio Marker (Not in 4K mode)	Image display ratio marker; Off, 4:3, 13:9, 14:9, 15:9, 16:9, 1.85:1, 2.35:1
Marker Color	To select the above high contrast mark color according to different image; Red, Green, Blue, Black, White.
Mark Width	To select the above mark color display width; 1~7
Modified Marker	Adjust the brightness of the image outside tag line to highlight the inside tag line of the image; 0~6

🛠️ Custom Buttons Setting

Use one of the ▼/F1 button to enter the Function buttons menu. Press ▲/F2 or ▼/F1 to navigate through the settings. Once the desired setting is highlighted, use the ◄ or ►buttons to navigate through the sub-menu functions. Press the MENU button to activate the function to save it under the specific function button.

Menu Item:	Description:
F1 F2 F3 F4	To set the 4 shortcut custom buttons on the front panel; Center Marker, Safe Frames, Check Field, Focus Assist, Aspect Ratio, Camera Mode, Image Flip, P2P, Image Freeze, Histogram, False Colors, Over Exposure, Embedded Audio, Nine Grid, Zoom, Anamorphic
For example:	When in menu "🇫", press ▼/F1 button and then select F1, press ► button to pop-up function items and select one of them, such as "Focus Assist", and press **MENU** button to confirm. So when you exit OSD menu, you could press F1 directly on the front of panel to turn on "Focus Assist" function. Same settings for F2, F3 and F4

8. Technical Specifications

Panel Size	7.0 inch
Panel Type	IPS LCD
Resolution	1920x1080
Backlight	LED
Dot Pitch	0.07875 (W) x 0.07875 (H) mm
Aspect Ratio	16:9
Brightness	450cd/m2
Contrast Ratio	1200:1
Viewing Angle	80°/80° (Left/Right) 80°/80° (Up/Down)
Input Signal	Video / Audio / HDMI
Video Color System	NTSC 3.58 / PAL 4.43
HDMI Support Format	480i /480p /576i /576p 720p (60/59.94/50/30/29/25/24/23.98) 1080i (60/59.94/50) 1080p (60/59.94/50/30/29.97/25/24/24sF/23.98/23.98sF) 4K UHD 3840x2160p (30/29.97/25/24/23.98 Hz) 4096x2160p (24 Hz)
Headphone Output	Stereo 3.5mm
Input Voltage	DC:7.4~24V
Power Consumption	≦8W
Unit Size (LxWxH)	180 x 140 x 17 mm
	7.09 x 5.51 x 0.67 inch
Unit Weight	490/520g (with F970 battery plate) 17.28/18.34 oz
Installation Method	1/4 inch bracket screw hole, can be easily connected to the hot shoe mount, tripod fixed installation
Working Temperature	-20°C~55°C / -4°F~131°F
Storage Temperature	-30°C~65°C / -22°F~149°F

9. Trouble shooting

Problem 1. Only black and white or monochrome picture:
① Check saturation, brightness & contrast adjustment.
② Check if "Check Field" is in black and white or monochrome image or other condition.

Problem 2. No Image after switching on power
① Check if signal cable connections are in good condition and whether the monitor is synchronized with the input signal, then press the **MODE** button and try again.
② Check signal cable connection and make sure to use the standard adapter to connect the monitor. If power is supplied by battery, please check if the battery is fully charged.

3. No sound
① Check Volume control; press the volume button, and try to increase the volume.
② Check the AUDIO input and ensure there is AUDIO signal.

If other issues with the device may occur, please contact us.

http://www.AVtec.tv