SONY

HVR-HD1000E

HDV 1/2.9-inch ClearVid CMOS Shoulder Mount Camcorder

Digital HD Video Camcorder

The HVR-HD1000E has been created to meet the growing demand from users who are looking for an entry-level professional shoulder mount design with full 1080i HDV recording as well as retaining DV capabilities.

The HVR-HD1000E's shoulder-mount design and black matte body is similar to that of other professional camcorders; making it perfect for weddings, corporate communications and sporting events where appearance can make a big difference. The ergonomically balanced shoulder mount design also reduces operator fatigue on long shoots where a tripod might not be practical.

As well as offering highdefinition HDVTM1080i recording, the HVR-HD1000E features a built-in down converter to output DV content - ideal for standard DVD productions. It can also record natively in DV, including a Long Play DV mode for maximum flexibility.

For multi-tasking videographers, the HVR-HD1000E also features three special still photo modes - ideal for producing DVD cases and even making wedding photo albums.

Whether you are recording weddings and corporate communications or teaching students, the HVR-HD1000E is simply the best choice on the market today for an entry level, shoulder mount professional camcorder.

Features

1/2.9-inch ClearVid CMOS SensorTM

The next generation of Sony imaging sensor, the ClearVid CMOS Sensor is quite unique and different from current CMOS technology.

The ClearVid CMOS Sensor uses a unique pixel layout rotated 45 degrees to provide high resolution and high sensitivity. This pixel layout technology is also used in higher end professional camcorders.

The ClearVid CMOS Sensor, coupled with an Enhanced Imaging ProcessorTM (EIP), generates stunning images. Moreover, thanks to the CMOS technology, bright objects do not cause vertical smear.

Optical 10x zoom with Carl Zeiss Vario-Sonner T* lens

The HVR-HD1000E camcorder can adapt to a wide range of shooting situations thanks to a Carl Zeiss Vario-Sonner T* lens with 10x optical zoom, as featured on higher end professional HDV camcorders. The T* lens coating suppresses unwanted reflections and faithfully reproduces colours for professional-looking results.

Super SteadyShotTM (Optical) Image Stabilizer

An active optical lens system avoidsany deterioration in image quality. The lens itself shifts vertically and horizontally to compensate for the polarized light axis in real time.

Wide Clear Photo LCD plusTM Monitor on Viewfinder

A large, freely rotating 2.7-inch type LCD screen is located on the top of the viewfinder unit to provide easy viewing when the HVR-HD1000E camcorder is in a low-level position or on a tripod. This also makes it easy for

adirector or client to see what the camera operator is shooting. The 211,200 dotwidescreen Clear Photo LCD plus device provides proper brightness and a high level of colour reproduction.

Camera Control Ring

A special camera control ring is located on the lens unit of the HVR-HD1000E camcorder. Any one of the following functions can be assigned to the ring for easy adjustment:

* Focus (default)
* Zoom
* Brightness
* Shutter
* Video: 1/4~1/10000 sec
* Photo: 1/4~1/500 sec.
* AE Shift
* WB Shift

Ergonomically Designed Handle

The ergonomically designed handle contains a convenient record button and zoom control, essential for low position shooting. There are also two cold shoes on the front and rear of the handle where you can attach accessories like the HVL-LBP Battery Video Light and HVR-DR60 Hard Disk Recording Unit.

Long Operating Time With infoLITHIUMTM L Series Battery

The HVR-HD1000E camcorder uses standard infoLITHIUM L series batteries, like the DSR-PD170P, HVR-Z1E, and HVR-V1E. With the NP-F970, a maximum operating time of approximately 10 hours can be achieved thanks to the power management system and low power consumption of the ClearVid CMOS Sensor.

Smooth Slow Record

The Smooth Slow Record function enables slow-motion playback by capturing images at four times faster than the normal field rate (200 fields/s). In this mode, quad-speed images are captured for three seconds, stored in the built-in buffer memory, and then recorded to tape (in either HDV or DV format) as slow-motion pictures lasting 12 seconds.*

* When using this function, the resolution of the camera image is decreased. Sound can not be recorded while shooting in this mode.

Super NightShotTM

The Super NightShot function uses a built-in infrared light emitter that allows you to record an object in zero lux light levels. It also enables night-time monitoring and surveillance.

Photo Mode

In Photo mode you can take high quality 6.1-megapixel, 2848 x 2136-quality, 4:3-aspect images.

Dual Record Stills & Video

You can take 4.6-megapixel (16:9-aspect) photos while you are shooting HDV video simply by pressing the photo button.

Capturing stills from recorded video

In case you missed the perfect timing for your still photo while videotaping, you can capture and save still frames from recorded video by simply pressing the photo button of the HVR-HD1000E camcorder during playback. HDV footage will give you a 1.2-megapixel, 1440 x 810 pixel still image of that magic moment.

Benefits

Record HD on inexpensive miniDV Cassette Tape

Video and television technology, as well as viewer preferences, are moving from standard definition (SD) to high definition (HD) - just like black and white television moved to colour in the past.

HD has almost twice the number of scanning lines available than SD. This means you can see much sharper detail and finer image quality when your work is viewed on a HD display monitor. The HVR-HD1000E adopts the popular HDV format for HD recording. The HDV format allows you to shoot approximate 63 minutes of HD video on a miniDV cassette tape.*

There are two standards of HDV format. One is HDV720p and the other is HDV1080i, which has 1,080 scanning lines and is used by most broadcasters already using HD. Sony has adopted the HDV1080i standard for all its HDV products.

* When the PHDVM-63DM miniDV cassette tape is used. The PHDVM-63DV is recommended for the HDV recording mode. The recording data rate of HDV1080i format is almost the same as that of DV format.

Full Compatibility with your Current DV System

If you don't want to upgrade your existing NLE system to HD, or simply want the option to work in DV, the HVR-HD1000E has a down-conversion feature that outputs converted DV signals through the i.LINK connector* to your current DV non-linear editing system, while also retaining a HD master on the tape for future use.

Furthermore, the HVR-HD1000E offers a DV recording

mode (4:3 or 16:9**), which can provide a recording time of approximately 120 minutes in LP mode.***

* i.LINK is a trademark of Sony used only to designate that a product contains an IEEE 1394 connector. Not all products with an i.LINK connector will necessarily communicate with each other. For information on compatibility, operating conditions, and proper connection, please refer to the documentation supplied with any device with an i.LINK connector. For information on devices that include an i.LINK connection, please contact your nearest Sony office.

** Squeezed recording.

*** When a DVM80PRL standard miniDV cassette tape is used. If you record in LP mode, pictures may appear mosaic-like or sound may be interrupted when you play back the tape on other camcorders or VCRs which do not support Sony LP mode.

Nonlinear acquisition with HVR-DR60

The optional external HVR-DR60 Hard Disk Recording Unit gives you a hybrid operation, where video and audio is recorded simultaneously to hard disk drive (HDD) and tape. The HDV or DV images are recorded as movie files in the HDDfor quick nonlinear editing, enabling the operator to archive the source tape as soon as the shoot is finished.

Easy to use

The shoulder-mount design of the HVR-HD1000E is lightweight and easy to use even for beginners, it allows for easy balance and stable operation.

Capture stills and video

To further enhance the multi-tasking of hard-working videographers, the HVR-HD1000E offers three still mode options that could be used to capture images for a DVD cover or even wedding album;

- 1.2-megapixel 1440x810 pixel images taken from playback of standard HDV footage

- 4.6 megapixel 16:9 aspect photos captured while simultaneously shooting HDV

- 6.1 megapixel 2838x2136 4:3 aspect images shot when not recording video footage Please see Features section for more information.

Technical Specifications

--Camera section--

Lens	Carl Zeiss Vario-Sonnar T* zoom lens, 10x (optical), f = 5.4 to 54 mm, filter diameter: 37 mm
Focal length	16:9 video mode 40 to 400mm 4:3 video mode 49 to 490mm 16:9 photo mode 40 to 400mm 4:3 photo mode 37 to 370mm
Focus System	Auto, manual (Ring/Panel)
Imaging system	1/2.9-inch, ClearVid CMOS Sensor system
Maximum still image recording	MAX. 6.1M (2848 x 2136) (4:3)
Gross pixels	Approx. 3200K pixels
Effective pixels	16:9 video mode Approx. 2280K pixels 4:3 video mode Approx. 1710K pixels 16:9 photo mode Approx. 2280K pixels 4:3 photo mode Approx. 3040K pixels
Shutter Speed	Auto Slow Shutter ON 1/25-1/215 Auto Slow Shutter OFF 1/50-1/215 Manual 1/3-1/10000 (Still Image: 1/3-1/425) Scene Selection 1/2-1/425

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	Super NightShot 1/3-1/100 Colour Slow Shutter 1/2-1/215 Smooth Slow Rec 1/200-1/800
Minimum illumination	Auto Slow Shutter ON 5 lux(1/25 Shutter Speed) Auto Slow Shutter OFF 11 lux(1/25 Shutter Speed)

--VTR section--

Recording format	HDV1080/50i, DV/DV(LP)576/50i (NTSC)
Play out/Down conversion format	HDV1080/50i, DV/DV(LP)576/50i (NTSC)
Playback/Recording time	HDV/DV SP Max. 63 min with PHDVM-63DM cassette DV LP Max. 94.5 min with PHDVM-63DM cassette

--Connectors--

Component video output	RCA Pin x3
Composite video output	RCA Pin x1
S-Video output	mini-DIN 4-pin x1
HDMI output	HDMI connector
HDV/DV input/output	i.LINK interface (IEEE 1394, 4-pin connector)
Audio output	RCA Pin x2 (L,R)
Audio input	Stereo mini jack (3.5 mm diameter), ECM-PS1 external shot-gun stereo microphone is supplied.
Headphone	Stereo mini jack (3.5 mm diameter)
LANC	Stereo mini-mini jack (2.5 mm diameter)
USB	TYPE B connector
DC Input	AC-L100 AC adaptor is supplied.

--Others--

LCD viewfinder	0.27-inch type, approx. 123,200 dots, 16:9 aspect ratio
LCD monitor	2.7-inch type, Clear Photo LCD plus, approx. 211,200 dots, hybrid type, 16:9 aspect ratio, touchscreen
Speaker	16mm diameter

--General--

Mass (w/o Tape,Battery,etc)	2.7Kg (6 lb 0 oz)
Mass (w/Battery)	NP-F570 3.0Kg (6 lb 10 oz) NP-F770 3.1Kg (6 lb 13 oz) NP-F970 3.2Kg (7 lb 1 oz)
Power Requirements (AC adaptor/ Battery)	8.4V / 7.2V
Power Consumption (VF/VF+LCD)	HDV 4.4W / 4.8W DV 4.2W / 4.6W
Operating temperature	0 to 40°C (32 to 104°F)
Storage temperature	-20 to +60°C (-4 to 140°F)

Accessories

HDV

HVR-DR60

Portable Hard Disk Recording Unit

Camera Adaptors

HVL-LBP

LED Battery Video Light

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Remote Controls

RM-1BP

Remote Commander

Tripods

VCT-PG11RMB

Tripod

Batteries and Power Supplies

NP-F570

InfoLITHIUM Rechargeable Battery Pack

NP-F770

InfoLITHIUM Rechargeable Battery Pack

NP-F970

InfoLITHIUM Rechargeable Battery Pack

UWP Wireless Series

UWP-V1

UWP Wireless Microphone package