



HDW-750/750P/730 Specifications

General	HDW-750	HDW-750P	HDW-730
Mass	Approx. 3.7 kg (8 lb 3 oz): Main Body Approx. 5.4 kg (11 lb 14 oz) (with MIC, VF, BCT-40HD, BP-L60A)		
Dimensions (WxHxD)	127 x 206 x 308 mm (5 x 8 1/8 x 12 1/4 inch)		
Power requirement	DC 12V + 5.0 V/-1.0 V		
Power consumption	34 W (with 12 V power supply, REC mode, without VF)		33 W (with 12 V power supply, REC mode, without VF)
Operating temperature	0 °C to +40 °C (+32 °F to +104 °F)		
Storage temperature	-20 °C to +60 °C (-4 °F to +140 °F)		
Operating humidity	25% to 80% (Relative humidity)		
Continuous operating time	Approx. 110 min with BP-L60A, Approx. 130 min with BP-L90A		
Inputs/outputs/connectors			
Genlock video input	BNC type x 1, 1.0 Vp-p, 75 Ω		
Time code input	BNC type x 1, 0.5 V to 1.8 Vp-p, 10 kΩ		
Audio CH1/CH2 input	XLR-3-pin type x 2 (Female), -60 dBu selectable, high impedance, balanced (0 dBu = 0.775 Vrms)		
Mic input (Stereo)	XLR-5-pin type x 1 (Female), -60 dBu		
Test output	BNC type x 1, 1.0 Vp-p, 75 Ω, unbalanced		
VBS/SDI output(option: HKDW-702)	BNC type x 1, 75 Ω/VBS out: 1.0 Vp-p/SDI out: 0.8 Vp-p		
HD-SDI output	BNC type x 1, 0.8 Vp-p, 75 Ω, unbalanced		
Audio output	XLR-5-pin type x 1 (Male), 0 dBm		
Time code output	BNC type x 1, 1.0 Vp-p, 75 Ω		
Earphone	Mini-jack (x 2), 8 Ω, ∞ to -16 dBs variable		
Lens	12-pin		
Remote	8-pin		
Light	2-pin, DC 12 V, max. 50 W		
DC input	XLR-4-pin type (Male), DC 11 V to 17 V		
DC output	4-pin (for wireless microphone receiver), DC 11 V to 17 V, maximum current 0.1 A		
VTR section			
Recording format	HDCAM		
Tape speed	Approx. 96.7 mm/s (for 59.94i format)	Approx. 80.6 mm/s (at 50i/25P format)	Approx. 96.7 mm/s (at 59.94i format) Approx. 80.6 mm/s (at 50i format)
Playback/Recording time	Max. 40 min with BCT-40HD	Max. 48 min. with BCT-40HD	Max. 40 min. with BCT-40HD (at 59.94i format) Max. 48 min. with BCT-40HD (at 50i format)
Fast forward/rewind time	Approx. 5 min. with BCT-40HD		
Recommended tape	Sony HDCAM cassette BCT-22HD, BCT-40HD		
Digital video performance			
Sampling frequency	Y: 74.25 MHz, PB/PR: 37.125 MHz		
Quantization	10 bits/sample (8 bits/sample for compression processing)		
Channel coding	S-NRZI PR-IV		
Compression	Coefficient recording system		
Error correction	Reed-Solomon code		
Error concealment	Adaptive three dimensional		
Audio performance (Playback with standard HDW-500/550/M2000/M2100)			
Frequency response	20 Hz to 20 kHz, + 0.5 dB/-1.0 dB		
Dynamic range	More than 85 dB (emphasis ON)		
Distortion(at 1kHz, emphasis ON, reference level)	Less than 0.08%		
Cross talk(at 1kHz, reference level)	Less than -70 dB		
Wow & flutter	Below measurable limit		
Camera section (Performance)			
Pickup device	3-chip 2/3-inch type FIT CCD		3-chip 2/3-inch type IT CCD
Effective Picture elements	1920 (H) x 1080 (V)		
Optical system	F1.4 prism (Equipped with Quarz Filter)		
Lens mount	Special bayonet mount		
Built-in filters	ND 1: Clear, 2: 1/4ND, 3: 1/16ND, 4: 1/64ND CC A: CROSS, B: 3200K, C: 4300K, D: 6100K		
Sensitivity (2000 lx, 89.9% reflectance)	F10.0 (typical) Equivalent to ISO 600 or more		
Minimum illumination	Approx. 0.3 lx (F1.4 lens, +42 dB turbo gain)		
Smear level	-135 dB		-125 dB
S/N ratio	54 dB (typical)		
Modulation depth at 5MHz	45% +/-5%		
Horizontal resolution	1000 TV lines		
Shutter speed	1/100, 1/125, 1/250, 1/500, 1/1000, 1/2000 (s)	1/60, 1/125, 1/250, 1/500, 1/1000, 1/2000 (s) 1/3, 1/5, 1/6, 1/10, 1/15, 1/25, 1/50, 1/100, 1/200 (s) (at 25P format)	1/100, 1/125, 1/250, 1/500, 1/1000, 1/2000 (s) (at 59.94i format) 1/60, 1/125, 1/250, 1/500, 1/1000, 1/2000 (s) (at 50i format)
Clear Scan	30.0 Hz to 4300 Hz	25 Hz to 4700 Hz	60 Hz to 4300 Hz (at 59.94i format) 50 Hz to 4700 Hz (at 50i format)
Programable Gain	-3, 0, 3, 6, 9, 12, 18, 24, 30, 36, 42 dB (select in camera setup menu for L/M/H/TURBO)		
View finder			
CRT	2.0-inch monochrome		
Controls	BRIGHT, CONTRAST, PEAKING controls TALLY, ZEBRA, DISPLAY/ASPECT switches		
Horizontal resolution	500 TV lines (16:9, at center)		
Microphone	Ultra-directional stereo microphone (Detachable)		
Supplied accessories	HDVF-20A, HD Electric viewfinder (1) Stereo microphone, Super cardioid directional, external power supply type (1) Operation manual (1)/Lens cap (1)/Shoulder strap (1)/XLR cap (4)		
Optional accessories	HKDW-702, HD-SD Down Converter Board HKDW-703, Picture Cache Board HKDW-704, GPS Unit VCT-14, Tripod Adapter HDCA-901, Camcorder Adapter BKW-401, Viewfinder Rotation Unit BKDW-701, Servo Filter Unit RM-B150, Remote Control Unit RM-B750, Remote Control Panel HDVF-C750W, HD LCD Color Viewfinder BP-L60A/L90A, Lithium-ion Battery BP-M50/M100, Ni-MH Battery BC-L120, Battery Charger BC-M50, Battery Charger AC-550/550CE, AC Adapter	AC-DN2B, AC Adapter MSA-BA/16A/32A/64A, Memory Stick WRR-855A/855B, UHF Synthesized Tuner Unit WRR-810A/860A/862A/862B, UHF Synthesized Tuner Unit (A-8278-057-A, WRR mounting bracket required) ECM-M55, Stereo Microphone C-74, Microphone CAC-12, Microphone Holder CRS-3P, Cradle Suspension CCXA-53, Audio Cable MLB-1M-100, Memory Label BCT-22HD/40HD, HDCAM tape cassette BCT-HD12CL, Cleaning Cassette LC-DS300SFT, Soft Carrying Case	

HDW-F500 Specifications

General	
Power requirements	100 to 240 V AC ($\pm 10\%$, 50/60 Hz)
Power consumption	230 W
Operating temperature	+5 °C to +40 °C (+41 °F to +104 °F)
Storage temperature	-20 °C to +60 °C (-4 °F to +140 °F)
Operating humidity	25 % to 80 % (Relative humidity)
Mass (Approx.)	35 kg (77 lb. 2 oz)
Dimensions (W x H x D)	427 x 237 x 520 mm (16 3/4 x 9 3/8 x 20 1/2 inches)
Tape speed	77.4 mm/s (24P mode)
Digital recording/Playback time	Max. 155 min with BCT-124HDL cassette (24P mode)
Fast forward/rewind time	Approx. 3 min with BCT-124HDL cassette
Search speed range	± 60 times normal playback speed (24P mode)
Servo lock time	1.0 sec or less (From standby on)
Load/unload time	6.0 sec or less
Input/output	
HD serial V/A input	BNC (x1 with a monitoring loop-through), Serial digital (1.485 Gb/s), SMPTE 292M/BTA S-004/ITU-R.BT 709
HD reference video input	BNC (x1, with a loop-through), Tri Level sync, 0.6 Vp-p, 75 Ω , sync negative
SD reference video input	BNC (x1, with a loop-through), Black Burst, 0.286 Vp-p, 75 Ω , sync negative
Digital audio input (CH1/2, CH3/4)	BNC (x2, with 2 loop-through), AES/EBU
Analog audio input (CH1/2/3/4/Cue)	XLR-5-pin type (Male) Low OFF: -60 dBu, high impedance, balanced High OFF: +4 dBu, high impedance, balanced High ON: +4 dBm, 600 Ω termination, balanced
Time code input	XLR-3-pin type, (Male x1), 0.5 to 18 Vp-p, 10 k Ω , balanced
HD serial V/A output	BNC (x4, with a character out), Serial digital (1.485 Gb/s), SMPTE 292M/BTA S004/ITU-R.BT 709
Pull-down output (Optional BKDV-507 required)	BNC (x2), with character
Standard Definition V/A output (Optional BKDV-501A required)	BNC (x3, with a character out), D1 serial digital (270 Mb/s), SMPTE 259M
Analog I/O down converted output (Optional BKDV-501A required)	Composite: BNC (x1 with a character out) 1.0 Vp-p, 75 Ω , sync negative) SD sync: BNC (x1), Black Burst, 0.286 Vp-p, 75 Ω , sync negative)
Analog I/O reference output	1125 Sync: BNC (x2), Tri Level sync, 0.6 Vp-p, 75 Ω , sync negative
Digital audio output (CH1/2 CH3/4)	BNC (x2), AES/EBU, unbalanced
Analog audio output (CH1/2/3/4/Cue)	XLR-3-pin type, (Female x5), +4 dBm, (With a 600 Ω load), low impedance, balanced
Monitor output (L/R)	XLR-3-pin type, (Female x2), +4 dBm, (With a 600 Ω load), low impedance, balanced
Time code output	XLR-3-pin type, (Female x1), 2.2 Vp-p low impedance, balanced
Phones	JM-60 stereo phone jack, - ∞ to -12 dBu (With an 8 Ω load), unbalanced
HD SDTI input/output	BNC (x2), Input/output, Serial digital
Remote 1 input	D-sub 9-pin, Female, Sony 9-pin remote interface
Remote 1 output	D-sub 9-pin, Female, Sony 9-pin remote interface
RS-232C	D-sub 25-pin, Female
Video control	D-sub 9-pin, Female (For optional HKDV-503)
Parallel remote (Optional BKDV-509 required)	D-sub 50-pin, Female
Panel remote	D-sub 15-pin, Female
Digital video performance	
Sampling frequency	Y: 74.25 MHz, Pb/Pk: 37.125 MHz
Quantization	10 bits/sample of input-output signals (8 bit sample for internal compression process)
Compression	Coefficient recording system
Channel coding	S-NRZI PR-IV
Error correction	Reed-Solomon code
Error concealment	Adaptive three dimensional
Analog composite output performance (With optional HKDV-501A)	
Bandwidth	Y: 0 to 5.75 MHz +5.0 dB/-3.0 dB
S/N ratio	56 dB or more
Y/C delay	15 ns or less
K Factor (2T Pulse)	1 % or less
Output SCH phase	Based upon RS-170A/CCIR R.624-3
Digital audio performance	
Sampling frequency	48 kHz (Synchronized with video)
Quantization	20 bits/sample
Wow & flutter	Below measurable level
Headroom	20 dB (Or 18 dB selectable)
Emphasis	T1 = 50 μ s, T2 = 15 μ s (on/off selectable in recording mode)
Analog audio output performance	
A/D quantization	20 bits/sample
D/A quantization	20 bits/sample
Frequency response	20 Hz to 20 kHz, +0.5 dB/-1.0 dB (0 dB at 1 kHz)
Dynamic range	More than 95 dB (At 1 kHz emphasis ON)
Distortion	Less than 0.05 % (At 1 kHz, emphasis ON, reference level)
Cross talk	Less than -90 dB (At 1 kHz, between any two channels)
Cue track	
Frequency response	90 Hz to 12 kHz ± 3 dB
S/N ratio	More than 45 dB (At 3 % distortion level)
Distortion	Less than 2 % (T.H.D at 1 kHz, reference level)
Wow & flutter	Less than 0.2 % rms
Supplied Accessories	
	AC power cord (1) RCC-5G, 9-pin remote cable (1) PSW4 x 16screws, for rack mounting (4) SRAM 64 KB memory card (1) Operation manual (1) Maintenance manual part 1 (1)
Optional Accessories	
	HKDV-501A, HD-SD Converter board HKDV-502, HD Line converter board HKDV-503, HD Digital Video Controller HKDV-506A, SDTI input and output board HKDV-507, HD Pull-down board BKDV-509, Parallel 50-pin interface kit RMM-110, Rack Mount Adapter BCT-HD12CL, Cleaning Cassette BCT-124HDL/64HDL/40HD/22HD, HDCAM tape cassette