

SONY[®]

Multiscan Projector

VPH-D50HTU
VPH-D50HTM



VPH-D50HT

HOME THEATER

CRT PROJECTOR

Theatrical impact has never been easier to bring into your home.

The VPH-D50HT*¹ Home Theater Projector is multi-format compatible, expandable, and affordable. With startling clarity, its cinematic image makes video movies, sporting events, and TV specials really come alive on screens up to 250 inches*². With its compact design and attractive neutral finish, the VPH-D50HT easily integrates into the design of your home theater.

Features

Versatile inputs.

Naturally you want a system that accepts all your video sources - so the Sony Home Theater Projector is equipped to meet your needs. The VPH-D50HT has sufficient inputs to connect HDTV*³ (Y/P_B/P_R or RGB), Component (Y/R-Y/B-Y, Y/C_R/C_B), composite and S Video signals all at the same time.



Advanced CRT Design:

This Sony projector uses 7-inch cathode-ray tubes to project brilliant color images with superb resolution.

High brightness.

The Sony high-performance 7-inch CRTs produce a high peak light output of 800 lumens/160 ANSI lumens - for a brilliant giant-screen picture that gives you a truly theatrical experience.





Multiscan capability.

Whatever you feel like watching, your Sony Home Theater Projector is ready. The Sony Multiscan feature accommodates a broad range of signal input frequencies for superb reproduction of standard and cable TV programs, analog and digital satellite, VHS, Laser Disc and DVD movies, computer text and graphics, and video games.

HDTV-Ready*3.

Its Multiscan capability also means that the VPH-D50HT is ready for High Definition TV formats, opening your home theater to a whole new world of video entertainment.

Internal line doubler.

An internal line doubler (EXB-DS10) is included as a standard feature to make your large screen images even more spectacular. Combined with an advanced Sony motion compensation system, it helps give you sharp, film-like pictures by smoothing out visible scan lines.



Compact design.

Designed specifically for home theater use, this projector is not only compact - ideal for ceiling-mount or table-top installations - but also whisper-quiet. To preserve your theatrical experience, the VPH-D50HT is designed to blend in to its surroundings.

Simple setup and operation.

Determining the size of your projected image is quick and easy. For precise optical adjustment, the Sony design of universal air coupling allows vivid, high-contrast images to be projected at various screen sizes with simple adjustments. You make these adjustments while watching the image on your screen, so you decide when the picture looks best. With six preset aspect ratios, you also have the freedom to choose the right format for your image.

Get the big picture.

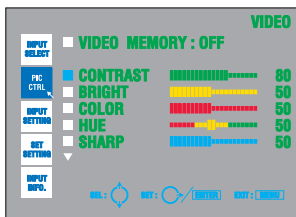
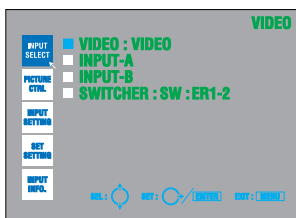
Unlike an ordinary television, your Sony Home Theater Projector casts an image from three precision-aligned CRTs (cathode-ray tubes) to create a powerful, high-resolution image on screens up to 250 inches.

Remote control with on-screen menus.

Sit back, relax, and pick up your Sony Remote Commander. You can set up all your theater projector functions and adjustments with the Remote Commander RM-PJ1001. And with the card-size Remote Commander RM-PJD50, daily operation of your system is as user-friendly as any conventional TV.



Advanced Remote Commanders:
The RM-PJ1001 and RM-PJD50 infrared remote commanders are supplied with your VPH-D50HT.



Simple On-Screen Menus:
Setting up your system is quick and simple with on-screen menus to guide you every step of the way.

Sharp detail.

The more pixels (picture elements), the better your picture. An addressable pixel resolution of 2500 x 1500 pixels combines with Sony advances in circuitry and electronics to produce bright, sharp images of uncompromising detail.

Memory function.

Registration and picture setting data can be stored in memory for each signal input, so your picture remains in perfect adjustment even as you switch from a TV show to your computer output, VHS tape, or DVD playback.

*1 The VPH-D50HT is available in two models: the VPH-D50HTU for countries operating at AC 100-120 V and the VPH-D50HTM for AC 220-240 V.

*2 Viewable area, measured diagonally.

*3 HDTV: 1125/60/2:1 and 1125/59.94/2:1 (SMPTE-240M/274M) HDTV systems.

Specifications

OPTICAL

Projection system:	3 picture tubes, 3 lenses, direct projection
Picture tube:	7-inch (phosphor size 5.5-inch) high luminance air coupled (Color corrected: Red/Green), static focus tubes
Projection lens:	Double focus, F1.0/135 mm
Screen coverage:	60 to 250 inches measured diagonally (factory preset to 100 inches)
Light output:	ANSI*1: 160 lm (FH: 64 kHz, IV: 50 Hz, 6500K) ANSI*1: 130 lm (FH: 15 kHz, IV: 60 Hz, 6500K) Peak white: 800 lm All white: 200 lm
Throwing distance:	60 inch 1902 mm (6 ft 2 7/8 inches) 70 inch 2179 mm (7 ft 1 25/32 inches) 100 inch 3016 mm (9 ft 10 3/4 inches) 120 inch 3571 mm (11 ft 8 19/32 inches) 150 inch 4424 mm (14 ft 6 3/16 inches) 200 inch 5844 mm (19 ft 2 3/32 inches) 250 inch 7257 mm (23 ft 9 23/32 inches)

SIGNALS

Color system:	NTSC, PAL, SECAM, NTSC4.43, PAL-M (automatically selected)
Resolution:	700 TV lines (video) 1000 TV lines (HDTV) 1280 x 1024 pixels (RGB, measured at fh: 64 kHz, IV: 60 Hz)
Scanning frequency:	Horizontal: 15 to 64 kHz Vertical: 38 to 150 Hz
RGB bandwidth:	75 MHz (-3 dB)
Test signals:	Crosshair, Hatch (9 x 9/17 x 17) reverse, Dot (9 x 9), H/H reverse, ME/ME reverse, All white, Window, Window and line, Color bar, Pluge, Stair-step, Sub-pattern, Cross (9 x 9)

GENERAL

Power requirements:	VPH-D5OHTU: AC 120 V, 50/60 Hz VPH-D5OHTM: AC 220 to 240 V, 50/60 Hz
Power consumption:	VPH-D5OHTU: 450 W (Max.), 7 W (Standby) VPH-D5OHTM: 450 W (Max.), 7 W (Standby)
Heat dissipation:	1535.7 BTU
Temperature:	Operating: 0 to 40°C (32 to 104°F) Storage: -20 to 60°C (-4 to 140°F)
Humidity:	Operating: 35 to 85% Storage: 10 to 90%
Dimensions:	603 (W) x 345 (H) x 671 (D) mm (23 3/4 x 13 5/8 x 26 1/2 inches)
Mass:	Approx. 54 kg (119 lb 1 oz)

INPUTS/OUTPUTS

Video	
Composite:	Loop-through BNC 1.0 Vp-p ±2 dB sync negative, 75 Ω automatic termination
Y IN:	BNC, 1.0 Vp-p ±2 dB sync negative, 75 Ω terminated
C IN:	BNC, Burst 0.286 Vp-p ±2 dB (NTSC), 75 Ω terminated or 0.3 Vp-p ±2 dB (PAL), 75 Ω terminated
Y/C IN:	Loop-through Mini DIN 4-pin
Y:	1.0 Vp-p ±2 dB sync negative, 75 Ω automatic termination
C:	Burst 0.286 Vp-p ±2 dB (NTSC), 75 Ω automatic termination or 0.3 Vp-p ±2 dB (PAL), 75 Ω automatic termination

INPUT A/B

Analog RGB/Component: BNC	
R/R-Y:	0.7 Vp-p ±2 dB positive, 75 Ω terminated
G/Y:	0.7 Vp-p ±2 dB positive, 75 Ω terminated
G with sync:	1.0 Vp-p ±2 dB sync negative, 75 Ω terminated
B/B-Y:	0.7 Vp-p ±2 dB positive, 75 Ω terminated
SYNC/HD	
Composite sync:	0.6 - 8 Vp-p high impedance, sync positive/negative
Horizontal sync:	0.6 - 8 Vp-p high impedance, sync positive/negative
VD	
Vertical sync:	0.6 - 8 Vp-p high impedance, sync positive/negative
HDTV*2 (Y/Ps/Pz): BNC	
Y:	1.0 Vp-p ±2 dB, 75 Ω terminated
Ps/Pz:	Tri-sync: ±0.3 Vp-p, bi-sync: 0.3 Vp-p ±0.35 Vp-p ±2 dB, 75 Ω
HDTV*2 (GBR): BNC	
G with sync:	1.0 Vp-p ±2 dB, 75 Ω terminated
	Tri-sync: ±0.3 Vp-p, bi-sync: 0.3 Vp-p
B/R:	0.7 Vp-p ±2 dB, 75 Ω terminated
Video (YC)*3	
Y:	BNC, 1.0 Vp-p ±2 dB sync negative, 75 Ω terminated
C:	BNC, Burst 0.286 Vp-p ±2 dB (NTSC), 75 Ω terminated or 0.3 Vp-p ±2 dB (PAL), 75 Ω terminated
Video (Composite)*3	
VIDEO:	1.0 Vp-p ±2 dB sync negative, 75 Ω automatic termination
CONTROL S/:	Stereo mini-jack 5 Vp-p,
PLUG IN POWER:	Plug in power DC 5 V, Max. output: 60 mA
CONTROL S OUT:	Stereo mini-jack 5 Vp-p

REMOTE:

RS-422A IN:	D-sub 9-pin (female)
ABL Link:	
IN:	Mini-jack
OUT:	Mini-jack
Trig:	Mini-jack
Power ON:	DC 12 V, output impedance 4.7 kΩ
Power OFF:	0 V

SAFETY REGULATIONS

VPH-D5OHTU:	UL 1950, cUL 950, DHHS, DNHW, FCC Class B, IC Class B
VPH-D5OHTM:	EN 60 950 (TÜV), CE, PTB

ACCESSORIES

Supplied accessories:	
	Remote commander RM-PJ1001
	Remote commander RM-PJD50
	Remote commander cable (15 m)
	Adjustment plate
	AA size battery (x3)
	Button battery CR2025 (x1)
	AC power cord
	Operating manual
	Installation manual
Optional accessories:	
	Signal interface cable SIC-10
	Interface unit IFU-1271/1271M
	Suspension support PSS-70
	Suspension support PSS-10
	Remote commander RM-PJM800
	Infrared remote control receiver RM-PJ10
	Mouse receiver RM-PJ21
	Monitor cable SMF-400 (HD D-sub 15-pin to 5 BNC)
	Remote cable RCC-5G/10G/30G (D-sub 9-pin to D-sub 9-pin for RS-422A)
	100-inch flat screen VPS-100FH
	120-inch flat screen VPS-120FH**
	80-inch portable screen VPS-80C

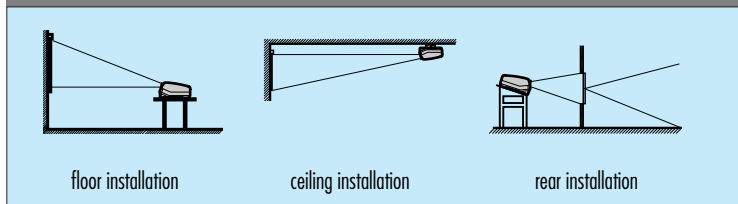
*1 ANSI lumen is a measuring method of the American National Standards Institute IT7.215.

*2 HDTV: 1125/60/2:1 and 1125/59.94/2:1 (SMPTE-240M/274M) HDTV systems.

*3 INPUT B only.

*4 Some items are not available in some areas. For further details, please contact your nearest Sony office.

INSTALLATION EXAMPLES



CONTROL PANEL



CONNECTOR SECTION



Distributed by

©1998 Sony Corporation. All rights reserved.
Reproduction in whole or in part without written permission is prohibited.
Features and specifications are subject to change without notice.
All non-metric weights and measures are approximate.
Sony is a registered trademark of Sony Corporation.
Macintosh is a registered trademark of Apple Computer, Inc.
All other trademarks are the property of their respective owners.

Printed in Japan
©1998 Sony Corporation