



## **XDCA-55 / XDCA-53**

HD Camera Adaptor

## **XDCU-50**

HD Camera Extension Unit

Preliminary

### **XDCAM EX Camera Extension System - Flexibility to Fit Your Preferences in Stand-alone or Multi-camera Operation**

Sony is pleased to announce the introduction of the much-anticipated camera extension system enabling XDCAM EX™ camcorders, with their well-established reputation for high-quality full HD pictures, to be configured for studio operation.

This new system consists of a pair of camera adaptors, which connect to the camcorders, and a camera extension unit, which controls camera parameters via a Sony remote controller. Using a pair of BNC cables, the camera signal and return signal can be transmitted up to 100 meters (328 feet) without degradation.

The system offers an affordable solution for professionals seeking the versatility of an XDCAM EX studio configuration in either a stand-alone or multi-camera operation.

## XDCA-55 / XDCA-53

HD Camera Adaptor

## XDCU-50

HD Camera Extension Unit

### Connection

The XDCA-55 docks to PMW-350 and PMW-320 camcorders\* via an optional CBK-CB01 50-pin connector. Thanks to this mechanism, no other connection cables are required.

The XDCA-53 is used with PMW-EX3 camcorders, and attaches with its supplied bracket to VCT-SP2BP, an optional shoulder support. The adaptor comes with a power supply cable, and a remote control cable. Two BNC cables are required for connection between PMW-EX3 and XDCA-53.

Both the XDCA-55 and XDCA-53 connect to the XDCU-50 camera extension unit via two supplied BNC cables (one for the camera signal, the other for the return signal). They also come with a CCZ-A Cable for power supply.

\* Connection with the XDCA-55 requires a specific firmware version of the PMW-350 and PMW-320. Please contact your local Sony service representative for further detail.

### Features

- High-quality camera pictures are transmitted without degradation via digital signals.
- The maximum cable length is 328 feet (100 m) between the camera adaptor and the XDCU-50.
- Cabling is simplified as the signals for camera control, intercom, tally, and timecode are embedded in the digital signal; only a pair of BNC cables and a single CCZ-A Cable for the power supply are required between the camera adaptor and the XDCU-50.
- The XDCU-50 is designed to fit into a standardized 19-inch rack system, with a compact 1U height.
- For camera parameter control, various remote controllers are available from Sony.
- The XDCU-50 can supply power (up to 70 W) to the XDCA-55 adapter; this is sufficient to drive accessories such as a small display, or servo zoom system.
- The system is suitable for both HD and SD operation. The XDCU-50 has a down-converter function, and outputs SD signals in Squeeze / Letter Box / Edge Crop conversion mode when the camcorder is in HD mode. The system can be set to either of the following TV systems:
  - HD\*: 1080(59.94i/50i), 720(59.94p/50p)
  - SD\*: NTSC(525/60i) / PAL(625/50i)
- \* 29.97p/25p signals also go through as PsF signals.
- \*\* The XDCU-50 performs the down-conversion of the camera output, and the up-conversion of the return signal.
- Since the camera output is down-converted by the XDCU-50, the camcorder is configurable in an SD environment even when the camcorder is set for an HD environment. The XDCU-50 can accept composite or HD/SD-SDI signals as the return signal. In addition, the Frame Synchronize function of the XDCU-50 allows the asynchronous return signal to be locked to a Genlock signal.
- The XDCU-50 accepts black-burst signals and tri-level sync signals as a Genlock signal.
- Two channels of tally for red and green are available. With the XDCA-55, the tally can be indicated on the camcorder's viewfinder screen.
- When the camcorder is in recording mode, the same timecode supplied from the camera extension unit can be recorded.
- A pair of RS-232C communication lines (TX and RX) are reserved so that users can utilize them for any purpose.



PMW-350K with XDCA-55



PMW-EX3 with XDCA-53

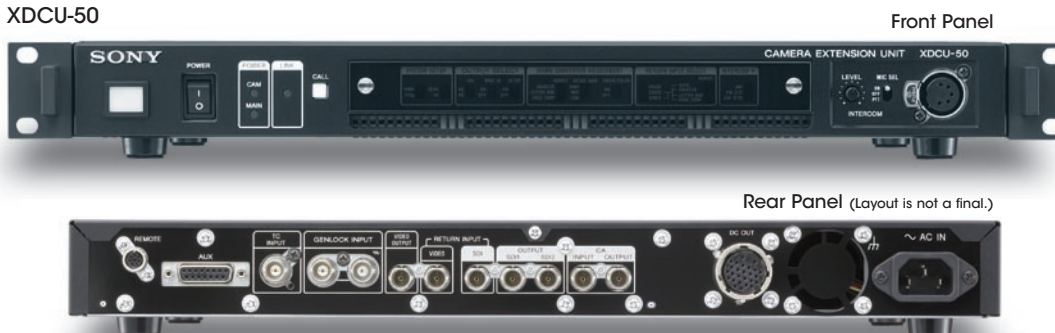


XDCA-55



XDCA-53

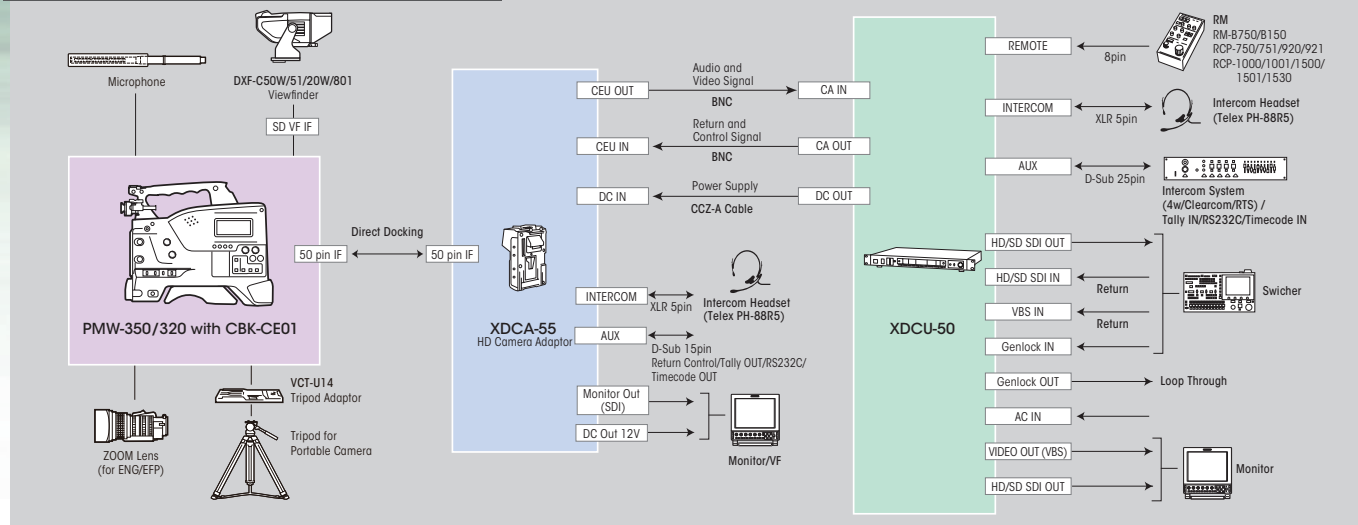
### XDCU-50



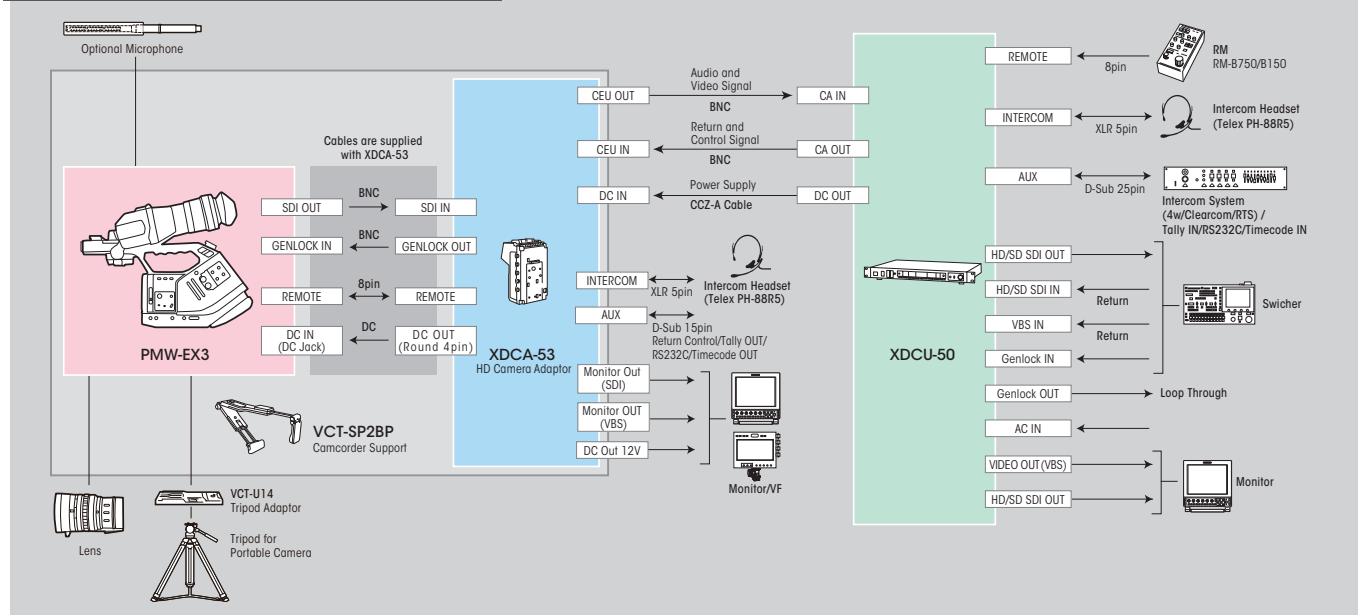
Connectors of XDCA-55/53  
(Layout is not a final)

## Variation of Camera Extension System

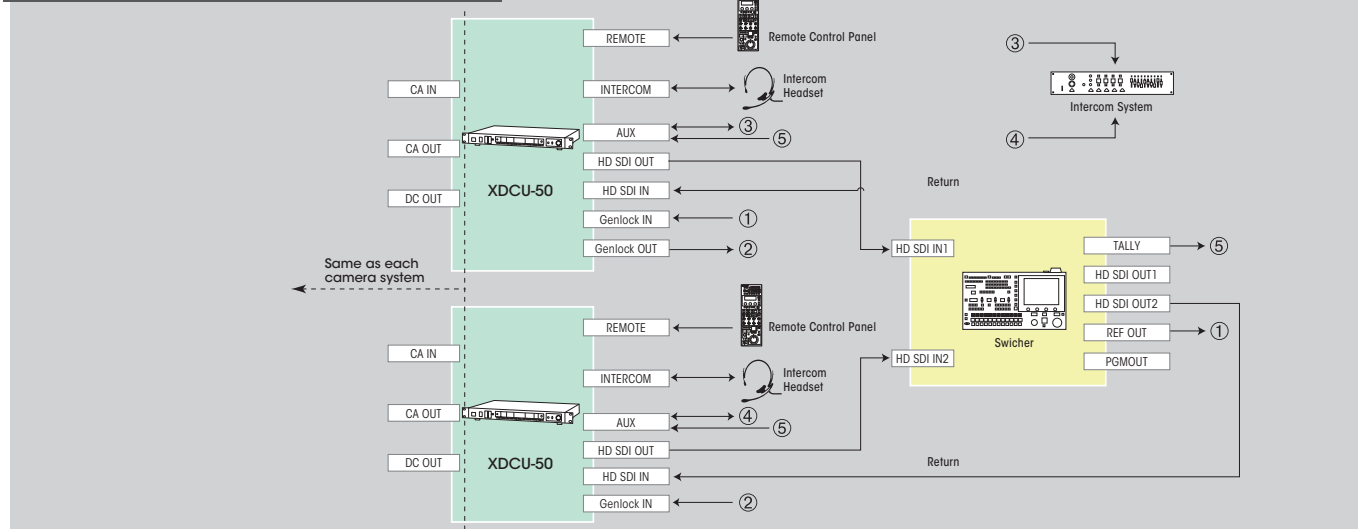
### Camera Extension System for PMW-350/320



### Camera Extension System for PMW-EX3



### Example of Multi-camera operation





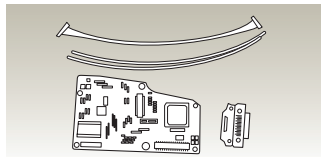
## Controllable Parameters

The following are examples of items that can be controlled by the optional remote controller or remote control panel:

Gain adjustment, Color bar signal output ON/OFF, Shutter ON/OFF and its speed selection, ECS ON/OFF and its frequency selection, execution of AWB/ABB, White R/B adjustment, Black R/B adjustment, White balance memory selection, Auto tracing white ON/OFF, Recording start/stop, Rec review, Rec review stop, Paint function, and more\*.

\* Controllable parameters depend on the combination of camcorder and remote controller/remote control panel. For details, please refer to the operating instructions for each camcorder unit.

## Optional Accessories



**CBK-CE01**  
50-pin Interface and Digital Extender



**VCT-SP2BP**  
Camcorder Support



**VCT-14/U14**  
Tripod Adaptor



**CCZ-A2/A5/A10/A25/A50/A100**  
CCZ-A cable



**RM-B150**  
Remote Control Unit



**RM-B750**  
Remote Control Unit



**RCP-750/751/920/921**  
Remote Control Panel  
Photo shows RCP-920



**RCP-1000/1001/1500/1501/1530**  
Remote Control Panel  
Photo shows RCP-1000



**DXF-C50W**  
5-type LCD Color Viewfinder



**DXF-51**  
5-type Monochrome Viewfinder



**DXF-20W**  
2.0-type Monochrome Viewfinder



**DXF-801**  
1.5-type Monochrome Viewfinder

## Specifications

	XDCA-55	XDCA-53
<b>General</b>		
Power requirements:	DC 13V/5.4A	DC 13V/3.6A
Power consumption:	approx. 5W	approx. 7W
Operating temperature:	23°F to 104°F (-5°C to +40°C)	32°F to 104°F (0°C to +40°C)
Storage temperature:	-4°F to +140°F (-20°C to +60°C)	-4°F to +140°F (-20°C to +60°C)
Dimensions (W x H x D):	4 3/8 x 7 3/8 x 4 5/8 inches (108 x 186 x 116 mm)	4 3/8 x 7 3/8 x 4 3/4 inches (108 x 186 x 118 mm)
Weight:	2 lb 3 oz (1.0 kg)	2 lb 3 oz (1.0 kg)
<b>Input/Output connectors</b>		
Camcorder connection:	50-pin (1)	BNC (x2), 8-pin remote (x1), DC 4-pin (x1)
CEU input:	BNC (x1)	BNC (x1)
CEU output:	BNC (x1)	BNC (x1)
DC input:	CCZ 26-pin (x1)	CCZ 26-pin (x1)
DC output for accessories:	XLR 4-pin (x1)	XLR 4-pin (x1)
SDI output for monitor:	BNC (x1)	BNC (x1)
Composite output for monitor:	-	BNC (x1)
Intercom:	XLR 5-pin (x1)	XLR 5-pin (x1)
AUX:	D-sub 15-pin (x1)	D-sub 15-pin (x1)
Battery terminal:	5-pin (x1)	-

	XDCU-50
<b>General</b>	
Power requirements:	AC 100-240V, 50/60Hz
Maximum current:	1.6-0.6A
Maximum load for CA:	DC 13V/5.4A
Operating temperature:	41°F to 104°F (+5°C to +40°C)
Storage temperature:	-4°F to +140°F (-20°C to +60°C)
Dimensions (W x H x D):	16 3/4 x 1 3/4 x 11 1/2 inches without projection (424 x 44 x 290 mm)
Weight:	7 lb 11 oz (3.5kg)
<b>Input/Output connectors</b>	
Composite output:	BNC (x1)
SDI output:	BNC (x2)
CA input:	BNC (x1)
CA output:	BNC (x1)
DC output:	CCZ 26-pin (x1)
Return input (SDI):	BNC (x1)
Return input (video):	BNC (x1)
Genlock input:	BNC (x1)
Genlock output (Loop through):	BNC (x1)
Intercom:	XLR 5-pin (x1)
AUX:	D-sub 25-pin
Remote:	8-pin (x1)

PMW-350, PMW-320, PMW-EX3, XDCA-55, XDCA-53, and XDCU-50 are produced at Sony EMCS Kosai Tec, which has received ISO14001 the Environmental Management Certification.



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