

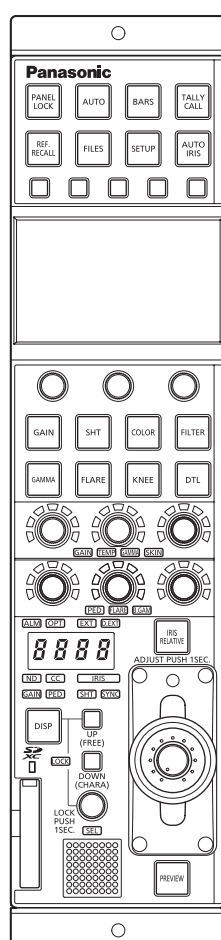
# Operating Guide

Remote Operation Panel

Model No.

# AK-HRP1015G

Read this document when using the AK-HRP1015G Remote Operation Panel in conjunction with AK-UB300G Series Multi-Purpose Cameras.



For details of operating Remote Operation Panel AK-HRP1015G, please visit the Panasonic website (<https://pro-av.panasonic.net/manual/en/index.html>), and refer to the Operating Instructions (HTML or PDF).

# Panasonic

ENGLISH

DVQP2521ZA

# Table of Contents

<b>Connecting the Unit to AK-UB300G Series Cameras</b>	<b>3</b>
System block diagram .....	3
Connections .....	4
Compatible Functions List .....	5
<b>ROP Menu (when AK-UB300G is connected)</b>	<b>8</b>
ROP menu list .....	8
01 PAINT SWITCH .....	14
02 SCENE .....	15
03 SHUTTER SPEED .....	16
04 FILTER .....	17
05 PEDESTAL .....	18
06 CHROMA .....	19
07 RB GAIN .....	20
08 COLOR TEMP .....	21
09 FLARE .....	22
10 GAMMA .....	23
11 BLACK GAMMA .....	24
12 KNEE .....	25
13 DETAIL .....	26
14 SKIN TONE DTL .....	28
15 MATRIX .....	30
16 COLOR CORRECTION .....	32
17 SKIN CORRECTION .....	35
18 DNR .....	36
19 HAZE REDUCTION .....	37
20 LENS CONTROL .....	38
21 SYSTEM CAM .....	39
22 CAMERA MENU CONTROL .....	40
23 ROP SETTING .....	41
24 CONNECT SETTING .....	42
25 ROP IP SETTING .....	43
26 CAMERA IP SETTING .....	43
27 AUTO IRIS SETTING .....	44
28 IRIS RELATIVE .....	45
29 HDR-PAINT .....	46
30 SWITCHER LINK .....	48
31 AW CONTROLLER LINK .....	48

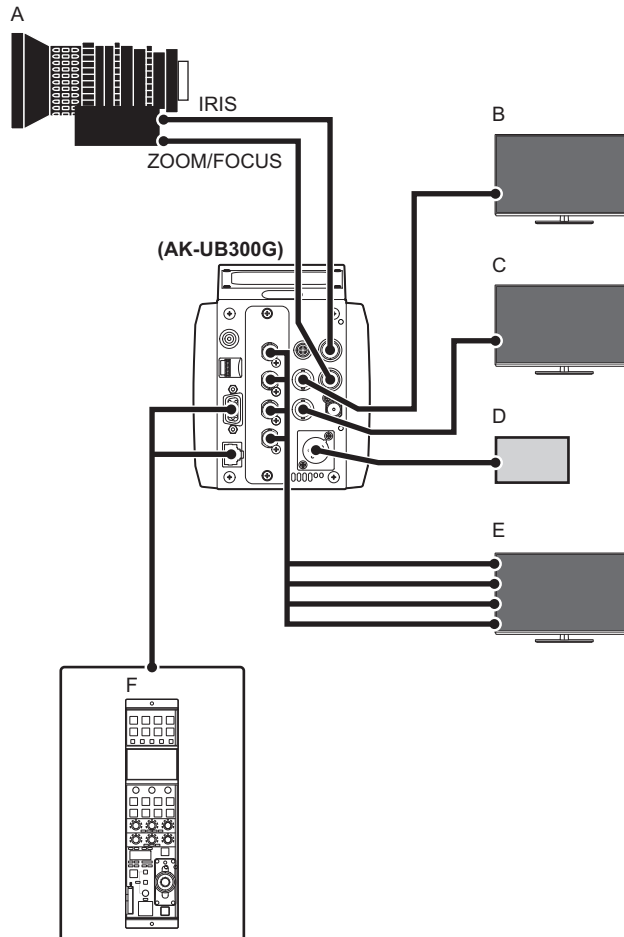
# Connecting the Unit to AK-UB300G Series Cameras

## NOTE

- The descriptions in this document assume that the system version of the unit is V2.00-00-0.00 or later. Make sure that the system version of the AK-UB300G used in conjunction with the unit is V7.52-000-00.00 or later.

## System block diagram

This is the configuration for connecting one AK-UB300G and one remote operation panel.



- A. Remote control lens**
- B. HD monitor (for HD main line)**
- C. HD monitor (for HD monitor)**
- D. External DC power supply**
- E. UHD/HD monitor (for UHD/HD main line)**
- F. AK-HRP1015G**

- Video output

### For UHD mode

- For UHD main line: Use the output from the <UHD/HD SDI OUT 1> to <UHD/HD SDI OUT 4> terminals.
- For HD main line: Use the output from the <HD SDI OUT 1> terminal.
- For HD monitor: Use the output from the <HD SDI OUT 2> terminal.

### For UHD CROP mode/HD mode

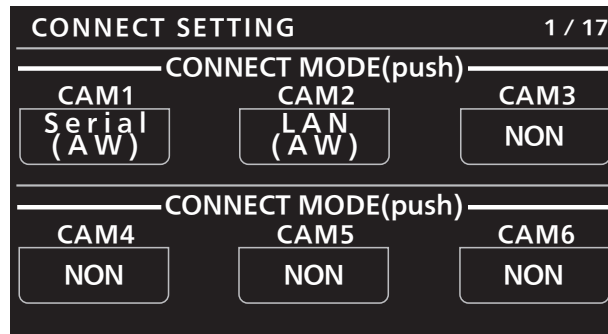
- For HD main line: Use the output from the <HD SDI OUT 1> terminal, or the output from the <UHD/HD SDI OUT 1>/<UHD/HD SDI OUT 2> terminal.
- For HD monitor: Use the output from the <HD SDI OUT 2> terminal.

- Remote operation panel

Connect AK-HRP1015G to the <I/F> terminal or the <LAN> terminal of the AK-UB300G.

## Connections

- Set the connection setting to [Serial(AW)] or [LAN(AW)] in the [CONNECT SETTING] menu.



- When connecting, observe the following points.

### Serial connection

- Use a dedicated cable to connect the [CCU] connector of this unit to the <I/F> terminal of the AK-UB300G.
- Use a PoE injector for the power supply.

### LAN connection

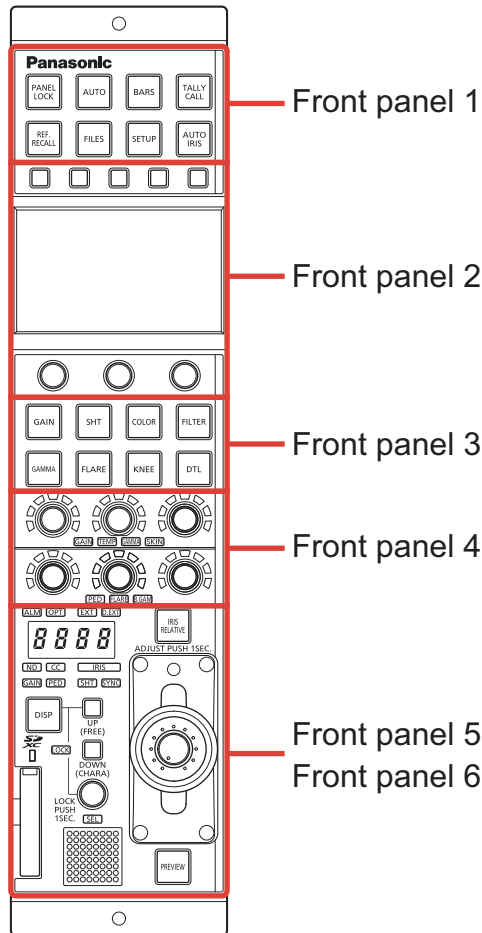
- Connect the [LAN] connector on this unit to the <LAN> connector on the AK-UB300G using a LAN cable (sold separately).
- This unit can be powered using PoE. Use a switching hub with PoE support.
- Use a straight cable (category 5e or higher; up to 100 m (328.0 ft) in length) for the LAN cable (STP).
- For details on switching hubs and PoE injectors that have been verified to support PoE, consult with your dealer.

## Compatible Functions List

When the unit is used in conjunction with an AK-UB300G Series Multi-Purpose Camera, some of the unit's button, dial, and other control functions will be limited or disabled. Be sure to refer to the following table.

**NOTE**

- The descriptions in this document assume that the system version of the unit is V2.00-00-0.00 or later. Make sure that the system version of the AK-UB300G used in conjunction with the unit is V7.52-000-00.00 or later.



Number	Part name	✓ : Enabled	Remarks
		✕ : Disabled	
Front panel 1	[PANEL LOCK] button	✓	
	[AUTO] button	✓	If auto setup has been assigned, this will not operate.
	[BARS] button	✓	Only the ON/OFF for the color bar signal output will function.
	[TALLY/CALL] lamp/button	✕	
	[REF. RECALL] button	✕	
	[FILES] button	✓	This indicator is off when a scene file is not selected.
	[SETUP] button	✓	
	[AUTO IRIS] button	✓	
Front panel 2	Function buttons	✓	
	LCD panel	✓	
	Menu operation dials	✓	

Number	Part name	✓ : Enabled ×: Disabled	Remarks
Front panel 3	[GAIN] button	✓	When this is set to ON, the white balance menu appears on the LCD panel.
	[SHT] button	✓	When this is set to ON, the shutter menu appears on the LCD panel.
	[COLOR] button	✓	The menus will switch with each press of the button. [COLOR TEMP] > [CHROMA] > [MATRIX] > [SKIN CORRECTION] > menu off (status screen)
	[FILTER] button	✓	Only the ND filter can be configured.
	[GAMMA] button	✓	
	[FLARE] button	✓	
	[KNEE] button	✓	
Front panel 4	[GAIN], [TEMP], [GAMMA], [SKIN] adjustment block	✓	When [GAIN] is lit, "GAIN AWB R" and "GAIN AWB B" are adjusted using the red (R) and blue (B) adjustment dials respectively. When [TEMP] is lit, "COLOR TEMP" is adjusted using the green (G) adjustment dial. [GAMMA] adjustment is disabled. When [SKIN] is lit, "Q PHASE", "I CENTER", and "CRISP" are adjusted using the red (R), green (G), and blue (B) adjustment dials respectively.
	[PED], [FLARE], [B.GAM] adjustment block	✓	When [PED] is lit, "PED R" and "PED B" are adjusted using the red (R) and blue (B) adjustment dials respectively. [FLARE] and [B.GAM] adjustments are disabled.

Number	Part name	✓ : Enabled × : Disabled	Remarks
Front panel 5	[ALM] indicator	✓	
	[OPT] indicator	×	
	[EXT] indicator	×	
	[D.EXT] indicator	×	
	Adjustment value display	✓	The adjustment value of the CC filter is not displayed.
	[ND] indicator	✓	
	[CC] indicator	×	
	[IRIS] indicator	✓	
	[GAIN] indicator	✓	
	[PED] indicator	✓	
	[SHT] indicator	✓	
	[SYNC] indicator	✓	
	[DISP] button	✓	
	[UP (FREE)] button	✓	
	[DOWN (CHARA)] button	✓	
[LOCK] indicator	✓		
[SEL] dial	✓		
Front panel 6	Memory card slot	✓	
	Memory card access indicator	✓	
	Camera number/tally display	✓	Only camera numbers are displayed, but starting with the following system version, tally (red, green) display will also be possible (only during LAN connection). AK-UB300G: V7.52-000-00.00 This unit: V2.00-00-0.00
	[IRIS RELATIVE] button	✓	
	Torque adjustment screw	✓	
	IRIS lever	✓	
	Master pedestal dial	✓	
[PREVIEW] button	×		

# ROP Menu (when AK-UB300G is connected)

## ROP menu list

When an AK-UB300G Multi-Purpose Camera is connected, the ROP menu will be as follows.

### NOTE

- The descriptions in this document assume that the system version of the unit is V2.00-00-0.00 or later. Make sure that the system version of the AK-UB300G used in conjunction with the unit is V7.52-000-00.00 or later.

For details on menu operations, refer to the following sections in the operating instructions.

- ➔ “Displaying menus”
- ➔ “Basic menu operations”

01 PAINT SWITCH	MATRIX	➔ “MATRIX” (see page 14)
	LINEAR MATRIX	➔ “LINEAR MATRIX” (see page 14)
	COLOR CORRECT	➔ “COLOR CORRECT” (see page 14)
	SKIN DTL	➔ “SKIN DTL” (see page 14)
	DTL	➔ “DTL” (see page 14)
	DNR	➔ “DNR” (see page 14)
	D. HAZE CLEAR	➔ “D. HAZE CLEAR” (see page 14)
	DRS	➔ “DRS” (see page 14)
	FLARE	➔ “FLARE” (see page 14)
	GAMMA	➔ “GAMMA” (see page 14)
	BLACK GAMMA	➔ “BLACK GAMMA” (see page 14)
	KNEE	➔ “KNEE” (see page 14)
02 SCENE	SCENE1(push)	➔ “SCENE1(push)” (see page 15)
	SCENE2(push)	➔ “SCENE2(push)” (see page 15)
	SCENE3(push)	➔ “SCENE3(push)” (see page 15)
	SCENE4(push)	➔ “SCENE4(push)” (see page 15)
	SCENE5(push)	➔ “SCENE5(push)” (see page 15)
	SCENE6(push)	➔ “SCENE6(push)” (see page 15)
	SCENE7(push)	➔ “SCENE7(push)” (see page 15)
	SCENE8(push)	➔ “SCENE8(push)” (see page 15)
	BUTTON SEL MODE	➔ “BUTTON SEL MODE” (see page 15)
03 SHUTTER SPEED	SHUTTER SPEED	➔ “SHUTTER SPEED” (see page 16)
	SHUTTER SYNCHRO	➔ “SHUTTER SYNCHRO” (see page 16)
	SHUTTER SW	➔ “SHUTTER SW” (see page 16)
	SHUTTER MODE	➔ “SHUTTER MODE” (see page 16)
04 FILTER	ND	➔ “ND” (see page 17)
05 PEDESTAL	PED R	➔ “PED R” (see page 18)
	PED B	➔ “PED B” (see page 18)
	M. PED	➔ “M. PED” (see page 18)
06 CHROMA	CHROMA LEVEL	➔ “CHROMA LEVEL” (see page 19)
	CHROMA LEVEL SW	➔ “CHROMA LEVEL SW” (see page 19)
07 RB GAIN	GAIN AWB R	➔ “GAIN AWB R” (see page 20)
	GAIN AWB B	➔ “GAIN AWB B” (see page 20)
08 COLOR TEMP	COLOR TEMP	➔ “COLOR TEMP” (see page 21)



09 FLARE	FLARE R	➔ "FLARE R" (see page 22)
	FLARE G	➔ "FLARE G" (see page 22)
	FLARE B	➔ "FLARE B" (see page 22)
	M.FLARE	➔ "M.FLARE" (see page 22)
	FLARE	➔ "FLARE" (see page 22)
10 GAMMA	GAMMA R	➔ "GAMMA R" (see page 23)
	GAMMA MASTER	➔ "GAMMA MASTER" (see page 23)
	GAMMA B	➔ "GAMMA B" (see page 23)
	GAMMA MODE	➔ "GAMMA MODE" (see page 23)
	BLACK STRETCH	➔ "BLACK STRETCH" (see page 23)
	DYNAMIC LEVEL	➔ "DYNAMIC LEVEL" (see page 23)
	KNEE POINT	➔ "KNEE POINT" (see page 23)
	KNEE SLOPE	➔ "KNEE SLOPE" (see page 23)
	GAMMA	➔ "GAMMA" (see page 23)
	ABB	➔ "ABB" (see page 23)
11 BLACK GAMMA	BLACK GAMMA R	➔ "BLACK GAMMA R" (see page 24)
	BLACK GAMMA MASTER	➔ "BLACK GAMMA MASTER" (see page 24)
	BLACK GAMMA B	➔ "BLACK GAMMA B" (see page 24)
	B.GAMMA	➔ "B.GAMMA" (see page 24)
12 KNEE	POINT (%) R	➔ "POINT (%) R" (see page 25)
	POINT (%) MASTER	➔ "POINT (%) MASTER" (see page 25)
	POINT (%) B	➔ "POINT (%) B" (see page 25)
	SLOPE R	➔ "SLOPE R" (see page 25)
	SLOPE MASTER	➔ "SLOPE MASTER" (see page 25)
	SLOPE B	➔ "SLOPE B" (see page 25)
	AUTO KNEE POINT %	➔ "AUTO KNEE POINT %" (see page 25)
	AUTO KNEE LEVEL	➔ "AUTO KNEE LEVEL" (see page 25)
	AUTO KNEE RESPONSE	➔ "AUTO KNEE RESPONSE" (see page 25)
	KNEE	➔ "KNEE" (see page 25)
13 DETAIL	MASTER DETAIL	➔ "MASTER DETAIL" (see page 26)
	DETAIL LV H	➔ "DETAIL LV H" (see page 26)
	DETAIL LV V	➔ "DETAIL LV V" (see page 26)
	PEAK FRQ	➔ "PEAK FRQ" (see page 26)
	V DETAIL FRQ	➔ "V DETAIL FRQ" (see page 26)
	CRISP	➔ "CRISP" (see page 26)
	LEVEL DEPENDENT	➔ "LEVEL DEPENDENT" (see page 26)
	DETAIL SOURCE	➔ "DETAIL SOURCE" (see page 26)
	DETAIL GAIN (+)	➔ "DETAIL GAIN (+)" (see page 26)
	DETAIL GAIN (-)	➔ "DETAIL GAIN (-)" (see page 26)
	DETAIL CLIP+	➔ "DETAIL CLIP+" (see page 26)
	DETAIL CLIP-	➔ "DETAIL CLIP-" (see page 27)
	KNEE APERTURE	➔ "KNEE APERTURE" (see page 27)
	DETAIL	➔ "DETAIL" (see page 27)
LV DPN SW	🔌 "LV DPN SW" (see page 27)	

14 SKIN TONE DTL	MEMORY SELECT	➔ "MEMORY SELECT" (see page 28)
	CURSOR	➔ "CURSOR" (see page 28)
	POS H	➔ "POS H" (see page 28)
	POS V	➔ "POS V" (see page 28)
	SKIN GET	➔ "SKIN GET" (see page 28)
	ZEBRA SWITCH	➔ "ZEBRA SWITCH" (see page 28)
	ZEBRA EFFECT	➔ "ZEBRA EFFECT" (see page 28)
	EFFECT MEMORY	➔ "EFFECT MEMORY" (see page 28)
	SKIN TONE CRISP	➔ "SKIN TONE CRISP" (see page 28)
	I CENTER	➔ "I CENTER" (see page 29)
	I WIDTH	➔ "I WIDTH" (see page 29)
	Q WIDTH	➔ "Q WIDTH" (see page 29)
	Q PHASE	➔ "Q PHASE" (see page 29)
	SKIN TONE DETAIL	➔ "SKIN TONE DETAIL" (see page 29)
15 MATRIX	LINEAR TABLE	➔ "LINEAR TABLE" (see page 30)
	COLOR CORRECT	➔ "COLOR CORRECT" (see page 30)
	MATRIX (R-G) P	➔ "MATRIX (R-G) P" (see page 30)
	MATRIX (R-G) N	➔ "MATRIX (R-G) N" (see page 30)
	MATRIX (R-B) P	➔ "MATRIX (R-B) P" (see page 30)
	MATRIX (R-B) N	➔ "MATRIX (R-B) N" (see page 30)
	MATRIX (G-R) P	➔ "MATRIX (G-R) P" (see page 30)
	MATRIX (G-R) N	➔ "MATRIX (G-R) N" (see page 31)
	MATRIX (G-B) P	➔ "MATRIX (G-B) P" (see page 31)
	MATRIX (G-B) N	➔ "MATRIX (G-B) N" (see page 31)
	MATRIX (B-R) P	➔ "MATRIX (B-R) P" (see page 31)
	MATRIX (B-R) N	➔ "MATRIX (B-R) N" (see page 31)
	MATRIX (B-G) P	➔ "MATRIX (B-G) P" (see page 31)
	MATRIX (B-G) N	➔ "MATRIX (B-G) N" (see page 31)
	MATRIX	➔ "MATRIX" (see page 31)
	COLOR CORRECT	➔ "COLOR CORRECT" (see page 31)
	LINEAR MATRIX	➔ "LINEAR MATRIX" (see page 31)

16 COLOR CORRECTION	LINEAR TABLE	➔ "LINEAR TABLE" (see page 33)
	COLOR CORRECT	➔ "COLOR CORRECT" (see page 33)
	COLOR CORRECT	➔ "COLOR CORRECT" (see page 33)
	SAT	➔ "SAT" (see page 33)
	PHASE	➔ "PHASE" (see page 33)
	SAT G	➔ "SAT G" (see page 33)
	PHASE G	➔ "PHASE G" (see page 33)
	SAT CY_G	➔ "SAT CY_G" (see page 33)
	PHASE CY_G	➔ "PHASE CY_G" (see page 33)
	SAT CY	➔ "SAT CY" (see page 33)
	PHASE CY	➔ "PHASE CY" (see page 33)
	SAT B_CY	➔ "SAT B_CY" (see page 33)
	PHASE B_CY	➔ "PHASE B_CY" (see page 33)
	SAT B	➔ "SAT B" (see page 33)
	PHASE B	➔ "PHASE B" (see page 33)
	SAT MG_B	➔ "SAT MG_B" (see page 33)
	PHASE MG_B	➔ "PHASE MG_B" (see page 33)
	SAT MG	➔ "SAT MG" (see page 33)
	PHASE MG	➔ "PHASE MG" (see page 33)
	SAT R_MG	➔ "SAT R_MG" (see page 33)
	PHASE R_MG	➔ "PHASE R_MG" (see page 33)
	SAT R	➔ "SAT R" (see page 34)
	PHASE R	➔ "PHASE R" (see page 34)
	SAT YL_R	➔ "SAT YL_R" (see page 34)
	PHASE YL_R	➔ "PHASE YL_R" (see page 34)
	SAT YL	➔ "SAT YL" (see page 34)
	PHASE YL	➔ "PHASE YL" (see page 34)
	SAT G_YL	➔ "SAT G_YL" (see page 34)
	PHASE G_YL	➔ "PHASE G_YL" (see page 34)
	MATRIX	➔ "MATRIX" (see page 34)
COLOR CORRECT	➔ "COLOR CORRECT" (see page 34)	
LINEAR MATRIX	➔ "LINEAR MATRIX" (see page 34)	
17 SKIN CORRECTION	SKIN AREA HUE	➔ "SKIN AREA HUE" (see page 35)
	SKIN AREA TONE	➔ "SKIN AREA TONE" (see page 35)
	SKIN AREA SW	➔ "SKIN AREA SW" (see page 35)
	SKIN AREA TABLE	➔ "SKIN AREA TABLE" (see page 35)
18 DNR	DNR LEVEL	➔ "DNR LEVEL" (see page 36)
	DNR SW	➔ "DNR SW" (see page 36)
19 HAZE REDUCTION	LEVEL	➔ "LEVEL" (see page 37)
	SW	➔ "SW" (see page 37)
20 LENS CONTROL	FOCUS MODE	➔ "FOCUS MODE" (see page 38)
	FOCUS SPEED	➔ "FOCUS SPEED" (see page 38)
	FOCUS	➔ "FOCUS" (see page 38)
	ZOOM WIDE	➔ "ZOOM WIDE" (see page 38)
	ZOOM SPEED	➔ "ZOOM SPEED" (see page 38)
	ZOOM TELE	➔ "ZOOM TELE" (see page 38)

21 SYSTEM CAM	FORMAT	➔ "FORMAT" (see page 39)
	CROP OUT	➔ "CROP OUT" (see page 39)
	CROP MARKER	➔ "CROP MARKER" (see page 39)
	CROP ADJ	➔ "CROP ADJ" (see page 39)
	CROP H POS (%)	➔ "CROP H POS (%)" (see page 39)
	CROP V POS (%)	➔ "CROP V POS (%)" (see page 39)
	GEN LOCK INPUT	➔ "GEN LOCK INPUT" (see page 39)
	GEN LOCK COARSE	➔ "GEN LOCK COARSE" (see page 39)
	GEN LOCK FINE	➔ "GEN LOCK FINE" (see page 39)
	SHOOTING MODE	➔ "SHOOTING MODE" (see page 39)
22 CAMERA MENU CONTROL	MENU ON/OFF	➔ "MENU ON/OFF" (see page 40)
	CURSOR/PARAMETER	➔ "CURSOR/PARAMETER" (see page 40)
	EXECUTE	➔ "EXECUTE" (see page 40)
23 ROP SETTING	IRIS LEV MOD	Refer to the following section in the operating instructions. ➔ "37 ROP SETTING"
	M.PED CONT	
	LOCK SELECT	
	AUTO BUTTON	
	G/M PED VOL	
	FREE+LOCK	
	CAM SEL	
	DTL BUTTON	
	SKIN VOL	
	LCD BRIGHT	
	PANEL BRIGHT	
	B.GAMMA VOL	
	BUZZER	
	PERIOD	
	CYCLE	
	STD POSITION M.PED	
	STD POSITION VAR	
	STD POSITION ND	
	STD POSITION CC	
	IRIS PRIORITY	
	ROP DATA SAVE	
	ROP DATA LOAD	
	SD CARD FORMAT	
	INITIAL with NW	
	INITIAL	
UPGRADE		
IRIS CALIBRATION TOP		
IRIS CALIBRATION BOTTOM		
SYSTEM VERSION		
SOFT VERSION		
FPGA VERSION		
24 CONNECT SETTING	CONNECT MODE CAM1	➔ "CONNECT MODE CAM1" (see page 42)
	CONNECT MODE CAM2 to CAM99	➔ "CONNECT MODE CAM2 to CAM99" (see page 42)

25 ROP IP SETTING	IP ADDRESS 1	Refer to the following section in the operating instructions. ➔ "39 ROP IP SETTING"
	IP ADDRESS 2	
	IP ADDRESS 3	
	IP ADDRESS 4	
	IP ADDRESS PORT	
	IP ADDRESS UPLOAD	
	SUBNET MASK 1	
	SUBNET MASK 2	
	SUBNET MASK 3	
	SUBNET MASK 4	
	SUBNET MASK UPLOAD	
	DEFAULT GATEWAY	
	DEFAULT GATEWAY UPLOAD	
	MAC ADDRESS	
26 CAMERA IP SETTING	CAM1 to CAM99 IP ADDRESS	Refer to the following section in the operating instructions. ➔ "40 CAMERA IP SETTING"
	CAM1 to CAM99 PORT	
	CAM1 to CAM99 INF UPLOAD	
27 AUTO IRIS SETTING	LEVEL	➔ "LEVEL" (see page 44)
28 IRIS RELATIVE	SENSE	Refer to the following section in the operating instructions. ➔ "29 IRIS RELATIVE"
	COARSE	
	RELATIVE	
29 HDR-PAINT	HLG BLACK GAMMA R	➔ "HLG BLACK GAMMA R" (see page 46)
	HLG BLACK GAMMA MASTER	➔ "HLG BLACK GAMMA MASTER" (see page 46)
	HLG BLACK GAMMA B	➔ "HLG BLACK GAMMA B" (see page 46)
	HLG B.GAMMA	➔ "HLG B.GAMMA" (see page 46)
	HLG KNEE POINT	➔ "HLG KNEE POINT" (see page 46)
	HLG KNEE SLOPE	➔ "HLG KNEE SLOPE" (see page 46)
	HLG KNEE SW	➔ "HLG KNEE SW" (see page 46)
	HLG TYPE	➔ "HLG TYPE" (see page 46)
	HLG MODE	➔ "HLG MODE" (see page 46)
	SDR CNVRT MD	➔ "SDR CNVRT MD" (see page 46)
	SHOOTING MODE	➔ "SHOOTING MODE" (see page 46)
	DNR LEVEL	➔ "DNR LEVEL" (see page 47)
	DNR SW	➔ "DNR SW" (see page 47)
	SDR CONVERT GAIN	➔ "SDR CONVERT GAIN" (see page 47)
	SDR CONVERT CLIP	➔ "SDR CONVERT CLIP" (see page 47)
30 SWITCHER LINK	SWITCHER IP ADDRESS	Refer to the following section in the "Linking the Unit to the AV-HS6000". ➔ "47 SWITCHER LINK"
	SWITCHER UDP PORT	
	INFO UPLOAD	
	SWITCHER LINK	
	TALLY RECEIVE	
	PREVIEW	
	TALLY ACTION MATERIAL	
	TALLY ACTION CAM No.	
31 AW CONTROLLER LINK	RECEIVE PORT	Refer to the following section in the Operating Instructions. ➔ "47 AW CONTROLLER LINK"
	INFO UPLOAD	
	AW CONT LINK	

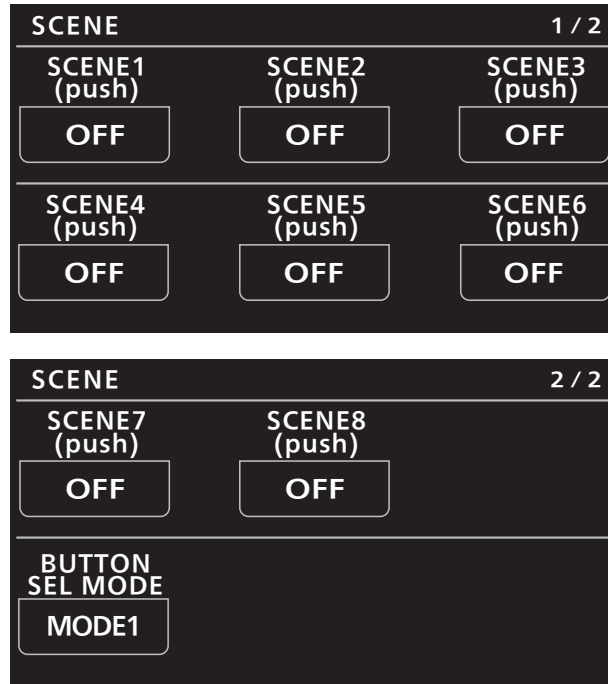
## 01 PAINT SWITCH

PAINT SWITCH			1 / 2
MATRIX	LINEAR MATRIX	COLOR CORRECT	
OFF	OFF	OFF	
SKIN DTL	DTL	DNR	
OFF	OFF	OFF	

PAINT SWITCH			2 / 2
D. HAZE CLEAR	DRS	FLARE	
OFF	OFF	OFF	
GAMMA	BLACK GAMMA	KNEE	
OFF	OFF	MANUAL	

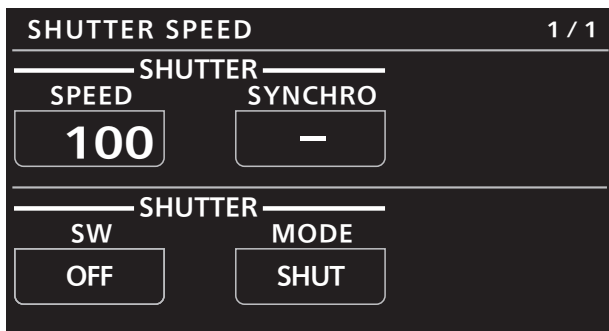
Item	Setting details
MATRIX	Enables/disables the matrix (linear matrix / 12-axis color correction).
LINEAR MATRIX	Enables/disables linear matrix.
COLOR CORRECT	Enables/disables 12-axis color correction.
SKIN DTL	Enables/disables the skin tone detail function.
DTL	Enables/disables the detail.
DNR	Enables/disables the noise reduction function.
D. HAZE CLEAR	Enables/disables the haze elimination function.
DRS	Enables or disables the dynamic range stretcher. [---] is displayed during UHD mode or UHD CROP mode.
FLARE	Enables or disables the flare.
GAMMA	Enables or disables the gamma.
BLACK GAMMA	Enables or disables the black gamma. <ul style="list-style-type: none"> <li>This setting is not available when [DRS] of [PAINT SWITCH] is set to [ON].</li> </ul>
KNEE	Enables or disables the knee.

## 02 SCENE



Item	Setting details
SCENE1(push)	Set the scene file to ON/OFF. <ul style="list-style-type: none"> <li>• When a scene file is set to ON, the other scene files will be set to OFF.</li> <li>• If you reselect a scene file that is set to ON, it will be set to SCENE OFF.</li> </ul>
SCENE2(push)	
SCENE3(push)	
SCENE4(push)	
SCENE5(push)	
SCENE6(push)	
SCENE7(push)	
SCENE8(push)	
BUTTON SEL MODE	Interchanges the function performed when the [FILES] button on the panel is pressed. <p><b>MODE1 (default)</b></p> Short press: Recall a scene file Long press: Display the menu <p><b>MODE2</b></p> Short press: Display the menu Long press: Recall a scene file

### 03 SHUTTER SPEED



Item	Setting details
<b>SHUTTER SPEED</b>	Sets the shutter speed for when [SHUTTER MODE] is set to [SHUT].
<b>SHUTTER SYNCHRO</b>	The setting cannot be set.
<b>SHUTTER SW</b>	Enables/disables the shutter function.
<b>SHUTTER MODE</b>	Selects the operation mode of the shutter. <b>SHUT</b> The shutter speed set in [SHUTTER SPEED] is used. <b>SYNC</b> The shutter speed set in [SHUTTER SYNCHRO] is used.

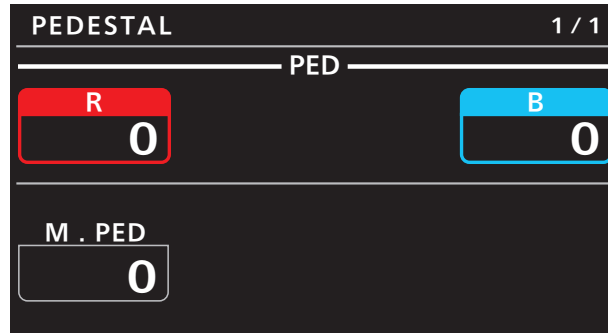


**04 FILTER**



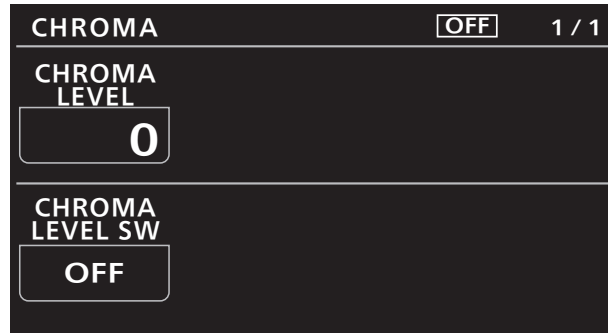
Item	Setting details
ND	Sets the ND filter position.

## 05 PEDESTAL



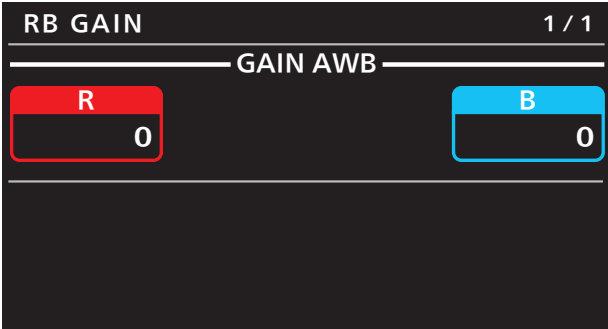
Item	Setting details
<b>PED R</b>	Sets the correction level of red to the master pedestal.
<b>PED B</b>	Sets the correction level of blue to the master pedestal.
<b>M. PED</b>	Adjusts the black level of the master pedestal.

## 06 CHROMA



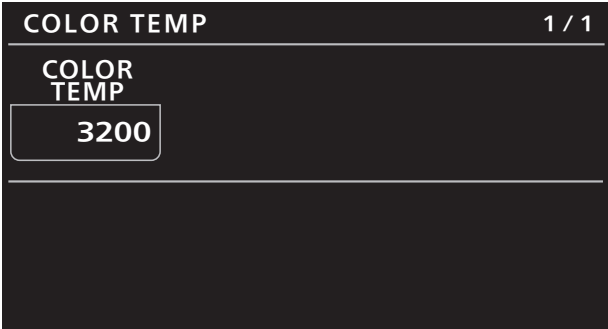
Item	Setting details
<b>CHROMA LEVEL</b>	Adjusts the chroma gain when [CHROMA SW] is set to [ON].
<b>CHROMA LEVEL SW</b>	Enables/disables the gain adjustment of chroma.

# 07 RB GAIN



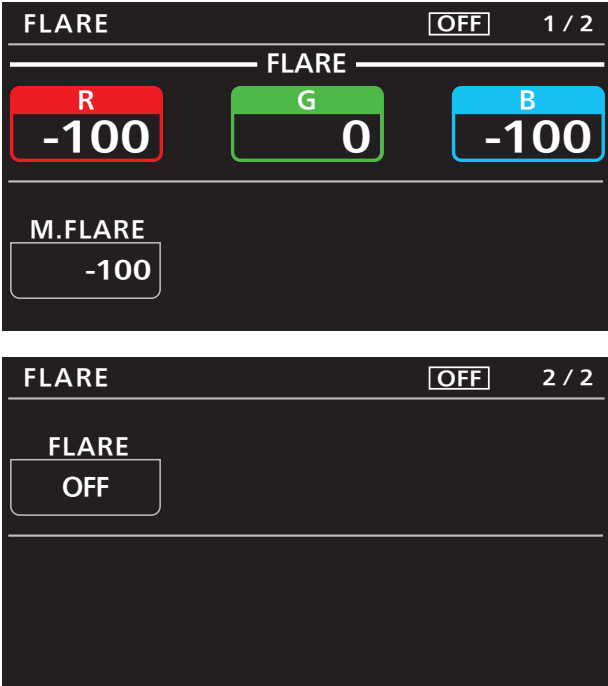
Item	Setting details
GAIN AWB R	Sets the correction level of red to the gain.
GAIN AWB B	Sets the correction level of blue to the gain.

**08 COLOR TEMP**



Item	Setting details
COLOR TEMP	Sets color temperature settings.

**09 FLARE**



Item	Setting details
FLARE R	Adjusts the Rch flare.
FLARE G	Adjusts the Gch flare.
FLARE B	Adjusts the Bch flare.
M.FLARE	Adjusts the master flare.
FLARE	Enables or disables flare correction.

## 10 GAMMA

GAMMA OFF 1 / 3

---

GAMMA MASTER

R 0.045 B 0

0

---

GAMMA MODE

HD

GAMMA OFF 2 / 3

---

BLACK STRETCH DYNAMIC LEVEL

30 200

---

KNEE

POINT SLOPE

30 150

GAMMA OFF 3 / 3

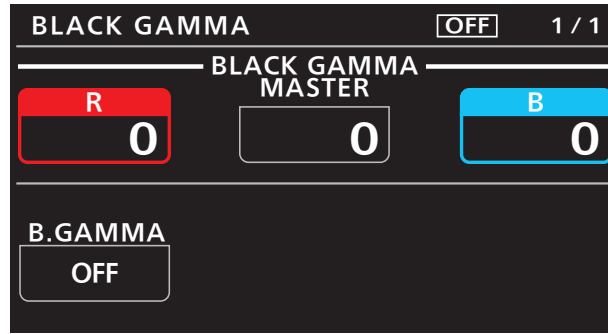
---

GAMMA ABB (push)

OFF NO?

Item	Setting details
GAMMA R	Adjusts the red gamma characteristic for the master gamma.
GAMMA MASTER	Adjusts the gamma characteristic.
GAMMA B	Adjusts the blue gamma characteristic for the master gamma.
GAMMA MODE	Sets the gamma characteristic type.
BLACK STRETCH	Sets the gamma stretch position for when [GAMMA MODE] is set to [FILM REC].
DYNAMIC LEVEL	Sets the dynamic range for when [GAMMA MODE] is set to [FILM REC].
KNEE POINT	Sets the knee point for when [GAMMA MODE] is set to [VIDEO REC].
KNEE SLOPE	Sets the knee slope for when [GAMMA MODE] is set to [VIDEO REC].
GAMMA	Enables or disables gamma correction.
ABB	Select [YES?] to perform auto black balance adjustment. Press and hold the button during black balance adjustment (lamp on) to cancel adjustment. ([BREAK] appears on the picture monitor (PM) of the CCU.)

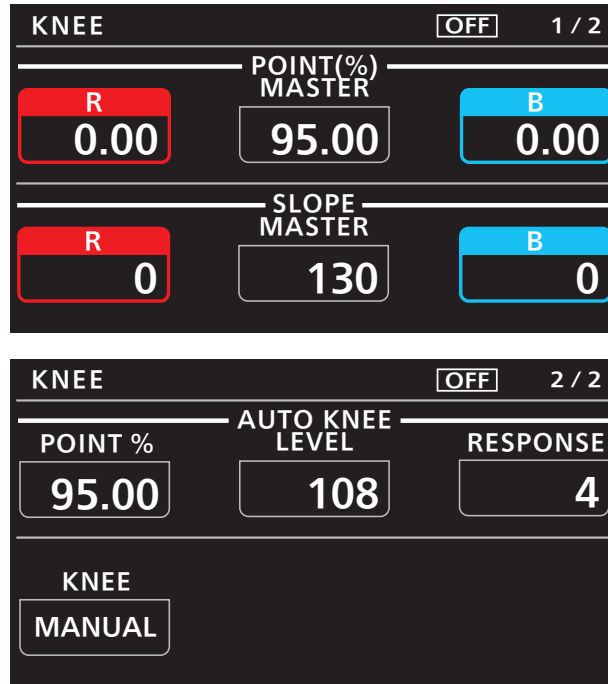
## 11 BLACK GAMMA



Item	Setting details
<b>BLACK GAMMA R</b>	Adjusts the red gamma characteristic near black for the master gamma.
<b>BLACK GAMMA MASTER</b>	Adjusts the gamma characteristic near black.
<b>BLACK GAMMA B</b>	Adjusts the blue gamma characteristic near black for the master gamma.
<b>B.GAMMA</b>	Enables or disables the black gamma. <ul style="list-style-type: none"> <li>This setting is not available when [DRS] of [PAINT SWITCH] is set to [ON].</li> </ul>



## 12 KNEE



Item	Setting details
POINT (%) R	Adjusts the red knee point for [POINT MASTER].
POINT (%) MASTER	Sets the knee point position.
POINT (%) B	Adjusts the blue knee point for [POINT MASTER].
SLOPE R	Adjusts the red knee slope for [SLOPE MASTER].
SLOPE MASTER	Sets the knee slope.
SLOPE B	Adjusts the blue knee slope for [SLOPE MASTER].
AUTO KNEE POINT %	Sets the bend position for auto knee.
AUTO KNEE LEVEL	Sets the maximum level for auto knee.
AUTO KNEE RESPONSE	Sets the auto knee response speed. Smaller setting values increase the response speed.
KNEE	Enables or disables the knee function.

## 13 DETAIL

DETAIL ON 1 / 4

---

MASTER DETAIL DETAIL LV

H V

---

PEAK FRQ V DETAIL FRQ CRISP

DETAIL ON 2 / 4

---

LEVEL DEPENDENT

---

DETAIL SOURCE

DETAIL ON 3 / 4

---

DETAIL

GAIN(+) GAIN(-)

---

DETAIL

CLIP+ CLIP-

DETAIL ON 4 / 4

---

KNEE APERTURE

---

DETAIL LV DPN SW

Item	Setting details
MASTER DETAIL	Adjusts the level of master detail.
DETAIL LV H	Adjusts the level of horizontal detail.
DETAIL LV V	Adjusts the level of vertical detail.
PEAK FRQ	Sets the peak frequency of the horizontal detail.
V DETAIL FRQ	Sets the vertical detail frequency.
CRISP	Sets the detail signal noise elimination level.
LEVEL DEPENDENT	Sets the level to eliminate the detail in the dark areas.
DETAIL SOURCE	Selects the source signals for creating the detail components.
DETAIL GAIN (+)	Changes the detail gain level in the + (up) direction.
DETAIL GAIN (-)	Changes the detail gain level in the - (down) direction.
DETAIL CLIP+	Adjust the detail clip to reduce glare produced by an excess of details.

---

Item	Setting details
<b>DETAIL CLIP-</b>	This limits the length of the undershoot portion of the detail edge component.
<b>KNEE APERTURE</b>	Adjusts the knee aperture level.
<b>DETAIL</b>	Enables/disables all detail functions.
<b>LV DPN SW</b>	Enables/disables the function to remove details of dark areas.

## 14 SKIN TONE DTL

SKIN TONE DTL OFF 1 / 4

MEMORY SELECT      CURSOR

A      OFF

---

POS

H      V      SKIN GET

50 . 00      50 . 00      (push)

SKIN TONE DTL OFF 2 / 4

ZEBRA SWITCH      ZEBRA EFFECT      EFFECT MEMORY

OFF      A+B+C      A+B+C

---

SKIN TONE CRISP

+63

SKIN TONE DTL OFF 3 / 4

I CENTER      I WIDH

87      20

---

Q WIDH      Q PHASE

43      90

SKIN TONE DTL OFF 4 / 4

SKIN TONE DETAIL

OFF

Item	Setting details
MEMORY SELECT	Selects the skin tone table for the subject to apply the skin tone detail to.
CURSOR	Enables/disables the position cursor that obtains the saturation and color phase information for controlling skin tone detail effects.
POS H	Sets horizontal cursor position.
POS V	Sets vertical cursor position.
SKIN GET	Automatically acquire saturation and hue information from the cursor position.
ZEBRA SWITCH	Sets whether to add a zebra pattern to the Y signals of the PM output to make areas subject to skin tone detail effects easily identifiable.
ZEBRA EFFECT	Selects the table of the zebra display.
EFFECT MEMORY	Selects the skin tone table used for applying the skin tone detail.
SKIN TONE CRISP	Adjusts the skin tone detail.

---

Item	Setting details
<b>I CENTER</b>	Sets the center position (area to which skin tone is applied) on the I axis.
<b>I WIDTH</b>	Sets the width of the area to which skin tone is applied on the I axis using the [I CENTER] setting as the center.
<b>Q WIDTH</b>	Sets the width of the area to which skin tone is applied on the Q axis using the [I CENTER] setting as the center.
<b>Q PHASE</b>	Sets the phase of the area where the skin tone effect is applied, with the Q axis being the reference.
<b>SKIN TONE DETAIL</b>	Enables/disables the skin tone detail function.

## 15 MATRIX

MATRIX [OFF] 1 / 4

LINEAR TABLE      COLOR CORRECT

A                      A

---

MATRIX(R-G)

P                      N

0                      0

MATRIX [OFF] 2 / 4

MATRIX(R-B)

P                      N

0                      0

---

MATRIX(G-R)

P                      N

0                      0

MATRIX [OFF] 3 / 4

MATRIX(G-B)

P                      N

0                      0

---

MATRIX(B-R)

P                      N

0                      0

MATRIX [OFF] 4 / 4

MATRIX(B-G)

P                      N

0                      0

---

MATRIX      COLOR CORRECT      LINEAR MATRIX

OFF                      OFF                      OFF

Item	Setting details
LINEAR TABLE	Selects the table for linear matrix.
COLOR CORRECT	Selects the table for color correction.
MATRIX (R-G) P	Adjusts the linear matrix between red and green. Not available when [MATRIX] is set to [OFF].
MATRIX (R-G) N	Adjusts the linear matrix between red and green. Not available when [MATRIX] is set to [OFF].
MATRIX (R-B) P	Adjusts the linear matrix between red and blue. Not available when [MATRIX] is set to [OFF].
MATRIX (R-B) N	Adjusts the linear matrix between red and blue. Not available when [MATRIX] is set to [OFF].
MATRIX (G-R) P	Adjusts the linear matrix between green and red. Not available when [MATRIX] is set to [OFF].

Item	Setting details
<b>MATRIX (G-R) N</b>	Adjusts the linear matrix between green and red. Not available when [MATRIX] is set to [OFF].
<b>MATRIX (G-B) P</b>	Adjusts the linear matrix between green and blue. Not available when [MATRIX] is set to [OFF].
<b>MATRIX (G-B) N</b>	Adjusts the linear matrix between green and blue. Not available when [MATRIX] is set to [OFF].
<b>MATRIX (B-R) P</b>	Adjusts the linear matrix between blue and red. Not available when [MATRIX] is set to [OFF].
<b>MATRIX (B-R) N</b>	Adjusts the linear matrix between blue and red. Not available when [MATRIX] is set to [OFF].
<b>MATRIX (B-G) P</b>	Adjusts the linear matrix between blue and green. Not available when [MATRIX] is set to [OFF].
<b>MATRIX (B-G) N</b>	Adjusts the linear matrix between blue and green. Not available when [MATRIX] is set to [OFF].
<b>MATRIX</b>	Enables/disables the matrix function.
<b>COLOR CORRECT</b>	Enables/disables the 12-axis color correction function.
<b>LINEAR MATRIX</b>	Enables/disables the linear matrix function.

# 16 COLOR CORRECTION

COLOR CORRECTION  OFF 1 / 8

LINEAR TABLE A	COLOR CORRECT A	
COLOR CORRECT G	SAT 0	PHASE 0

COLOR CORRECTION  OFF 2 / 8

SAT G 0	PHASE G 0
SAT CY_G 0	PHASE CY_G 0

COLOR CORRECTION  OFF 3 / 8

SAT CY 0	PHASE CY 0
SAT B_CY 0	PHASE B_CY 0

COLOR CORRECTION  OFF 4 / 8

SAT B 0	PHASE B 0
SAT MG_B 0	PHASE MG_B 0

COLOR CORRECTION  OFF 5 / 8

SAT MG 0	PHASE MG 0
SAT R_MG 0	PHASE R_MG 0



**COLOR CORRECTION**  OFF 6 / 8

---

SAT<sub>R</sub>                      PHASE<sub>R</sub>

---

SAT<sub>YL\_R</sub>                      PHASE<sub>YL\_R</sub>

**COLOR CORRECTION**  OFF 7 / 8

---

SAT<sub>YL</sub>                      PHASE<sub>YL</sub>

---

SAT<sub>G\_YL</sub>                      PHASE<sub>G\_YL</sub>

**COLOR CORRECTION**  OFF 8 / 8

---

MATRIX                      COLOR CORRECT                      LINEAR MATRIX

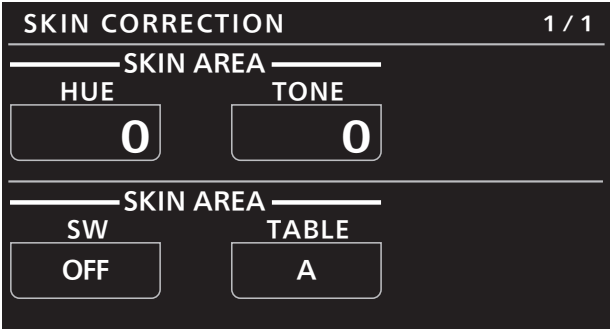
                                          

---

Item	Setting details
LINEAR TABLE	Selects the table for linear matrix.
COLOR CORRECT	Selects the table for color correction.
COLOR CORRECT	Selects the color component in 12-axis matrix memory to adjust.
SAT	Adjusts the saturation of the color component selected in [COLOR CORRECT].
PHASE	Adjusts the hue of the color component selected in [COLOR CORRECT].
SAT G	Adjusts green color saturation.
PHASE G	Adjusts green hue.
SAT CY_G	Adjusts the color saturation between green and cyan.
PHASE CY_G	Adjusts the hue between green and cyan.
SAT CY	Adjusts cyan color saturation.
PHASE CY	Adjusts cyan hue.
SAT B_CY	Adjusts the color saturation between cyan and blue.
PHASE B_CY	Adjusts the hue between cyan and blue.
SAT B	Adjusts blue color saturation.
PHASE B	Adjusts blue hue.
SAT MG_B	Adjusts the color saturation between blue and magenta.
PHASE MG_B	Adjusts the hue between blue and magenta.
SAT MG	Adjusts magenta color saturation.
PHASE MG	Adjusts magenta hue.
SAT R_MG	Adjusts the color saturation between magenta and red.
PHASE R_MG	Adjusts the hue between magenta and red.

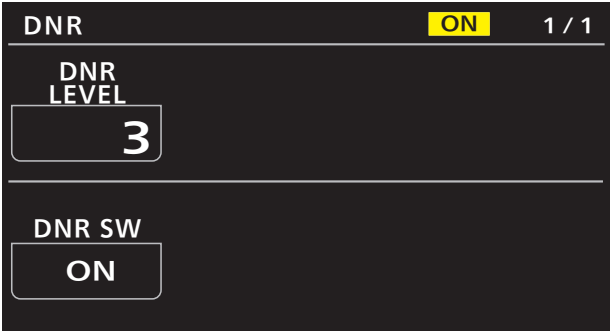
Item	Setting details
<b>SAT R</b>	Adjusts red color saturation.
<b>PHASE R</b>	Adjusts red hue.
<b>SAT YL_R</b>	Adjusts the color saturation between red and yellow.
<b>PHASE YL_R</b>	Adjusts the hue between red and yellow.
<b>SAT YL</b>	Adjusts yellow color saturation.
<b>PHASE YL</b>	Adjusts yellow hue.
<b>SAT G_YL</b>	Adjusts the color saturation between yellow and green.
<b>PHASE G_YL</b>	Adjusts the hue between yellow and green.
<b>MATRIX</b>	Enables/disables the matrix function.
<b>COLOR CORRECT</b>	Enables/disables the 12-axis color correction function.
<b>LINEAR MATRIX</b>	Enables/disables the linear matrix function.

# 17 SKIN CORRECTION



Item	Setting details
SKIN AREA HUE	Finely adjusts the hue of the skin tone area.
SKIN AREA TONE	Finely adjusts the tone of the skin tone area.
SKIN AREA SW	Enables/disables the function to finely adjust the color of the skin tone area.
SKIN AREA TABLE	Selects the table for the skin tone area.

**18 DNR**



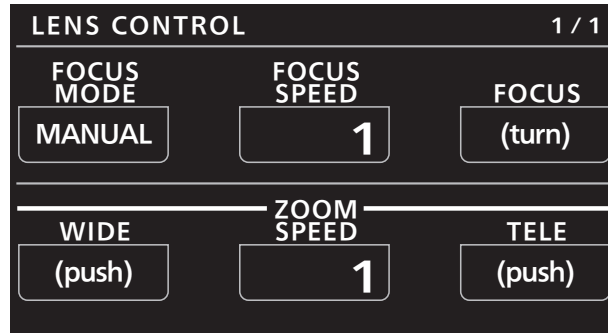
Item	Setting details
DNR LEVEL	Sets the level for the noise reduction. The larger the value, the stronger the noise reduction effect.
DNR SW	Enables/disables the noise reduction function.

# 19 HAZE REDUCTION



Item	Setting details
LEVEL	Sets the level of the haze elimination. The larger the value, the stronger the haze elimination effect.
SW	Enables/disables the haze elimination function.

## 20 LENS CONTROL



Item	Setting details
<b>FOCUS MODE</b>	Selects auto or manual mode for the focus adjustment function. (This function is only for lenses on which AUTO/MANUAL control is possible. [-] is displayed when such control is not possible.)
<b>FOCUS SPEED</b>	Adjusts the focus operation speed.
<b>FOCUS</b>	Adjusts the lens focus manually.
<b>ZOOM WIDE</b>	Adjusts the lens zoom to wide angle (Wide).
<b>ZOOM SPEED</b>	Adjusts the zoom operation speed.
<b>ZOOM TELE</b>	Adjusts the lens zoom to telephoto (Tele).

## 21 SYSTEM CAM

**SYSTEM CAM** 1 / 3

---

**FORMAT**

2160/59.94P

---

**CROP**

**MARKER**

Y+G+M

**ADJ**

YL

**SYSTEM CAM** 2 / 3

---

**CROP**

**H POS(%)**      **V POS(%)**

0 . 00      0 . 00

---

**GEN LOCK**

**COARSE**      **FINE**

BNC      0      0

**SYSTEM CAM** 3 / 3

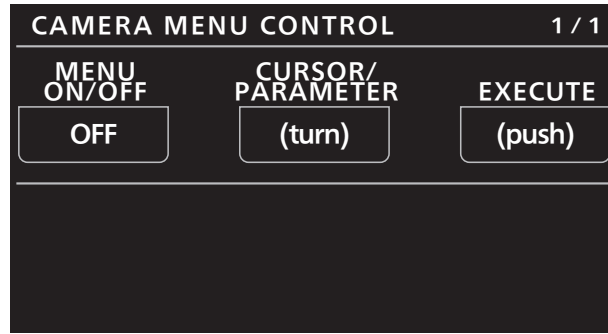
---

**SHOOTING MODE**

NORMAL

Item	Setting details
<b>FORMAT</b>	Sets the system format.
<b>CROP OUT</b>	Sets the crop output image during cropping.
<b>CROP MARKER</b>	Sets the crop frame to display during cropping.
<b>CROP ADJ</b>	Sets the crop frame to adjust the position during cropping.
<b>CROP H POS (%)</b>	Sets the horizontal position of crop during cropping.
<b>CROP V POS (%)</b>	Sets the vertical position of crop during cropping.
<b>GEN LOCK INPUT</b>	Sets whether the synchronization signal is inputted from BNC or from D-SUB.
<b>GEN LOCK COARSE</b>	Roughly adjusts the phase of horizontal synchronization.
<b>GEN LOCK FINE</b>	Finely adjusts the phase of horizontal synchronization.
<b>SHOOTING MODE</b>	Sets the shooting mode.

## 22 CAMERA MENU CONTROL



Item	Setting details
<b>MENU ON/OFF</b>	Turns the menu on/off.
<b>CURSOR/PARAMETER</b>	Moves the menu cursor or changes setting values.
<b>EXECUTE</b>	Executes the selected process.



## **23 ROP SETTING**

---

For details on operations and settings, refer to the following sections in the Operating Instructions.

➡ "37 ROP SETTING"

## 24 CONNECT SETTING

**CONNECT SETTING** 1 / 17

CONNECT MODE(push)

CAM1	CAM2	CAM3
Serial	LAN	NON

CONNECT MODE(push)

CAM4	CAM5	CAM6
NON	NON	NON

**CONNECT SETTING** 2 / 17

CONNECT MODE(push)

CAM7	CAM8	CAM9
NON	NON	NON

CONNECT MODE(push)

CAM10	CAM11	CAM12
NON	NON	NON



**CONNECT SETTING** 17 / 17

CONNECT MODE(push)

CAM97	CAM98	CAM99
NON	NON	NON

Item	Setting details
<b>CONNECT MODE CAM1</b>	<p>Sets the connection method for camera 1 . Changes to settings are applied by pressing the [MENU] dial. Serial, LAN: Select this when connecting to the AK-JC3000 series or AK-HC5000 series. Serial(AK), LAN(AK): Select this when connecting to the AK-HC3500A series or AK-HC3800 series. Serial(AW), LAN(AW): Select these when connecting the AK-UB300G series.</p> <ul style="list-style-type: none"> <li>• [Serial], [Serial(AK)], and [Serial(AW)] cannot be set for multiple cameras.</li> </ul>
<b>CONNECT MODE CAM2 to CAM99</b>	<p>Sets the connection method for cameras 2 to 99. Changes to settings are applied by pressing the [MENU] dial. Serial, LAN: Select this when connecting to the AK-JC3000 series or AK-HC5000 series. Serial(AK), LAN(AK): Select this when connecting to the AK-HC3500A series or AK-HC3800 series. Serial(AW), LAN(AW): Select these when connecting the AK-UB300G series.</p> <ul style="list-style-type: none"> <li>• [Serial], [Serial(AK)], and [Serial(AW)] cannot be set for multiple cameras.</li> </ul>

**NOTE**

- An AK-UB300G with a system version of 07.0A-000-00.00 or later can be connected.
- [Serial(AW)] can be selected if this unit has a system version of 2.00-00-0.00 or later.

---

## **25 ROP IP SETTING**

---

For details on operations and settings, refer to the following sections in the Operating Instructions.

➔ “39 ROP IP SETTING”

---

## **26 CAMERA IP SETTING**

---

For details on operations and settings, refer to the following sections in the Operating Instructions.

➔ “40 CAMERA IP SETTING”

## 27 AUTO IRIS SETTING



Item	Setting details
LEVEL	Adjusts the auto iris level.

## **28 IRIS RELATIVE**

---

For details on operations and settings, refer to the following sections in the Operating Instructions.

➡ "29 IRIS RELATIVE"

## 29 HDR-PAINT

HDR-PAINT 1 / 4

HLG BLACK GAMMA MASTER

R 0 B 0

HLG B.GAMMA OFF

HDR-PAINT 2 / 4

HLG KNEE

POINT 80.00 SLOPE 130

HLG KNEE SW OFF TYPE NORMAL

HDR-PAINT 3 / 4

HLG MODE FIX SDR CNVRT MD FIX

SHOOTING MODE NORMAL DNR LEVEL 3 SW ON

HDR-PAINT 4 / 4

SDR CONVERT

GAIN 0 CLIP HIGH

Item	Setting details
HLG BLACK GAMMA R	Adjusts the red gamma characteristic near black for the master gamma.
HLG BLACK GAMMA MASTER	Adjusts the gamma characteristic near black.
HLG BLACK GAMMA B	Adjusts the blue gamma characteristic near black for the master gamma.
HLG B.GAMMA	Enables or disables the black gamma.
HLG KNEE POINT	Sets the knee point for when [GAMMA MODE] is set to [VIDEO REC].
HLG KNEE SLOPE	Sets the knee slope for when [GAMMA MODE] is set to [VIDEO REC].
HLG KNEE SW	Enables or disables the knee function.
HLG TYPE	Sets the HLG type.
HLG MODE	Sets the HLG mode.
SDR CNVRT MD	Sets the SDR mode.
SHOOTING MODE	Sets the shooting mode.

---

Item	Setting details
<b>DNR LEVEL</b>	Sets the level for the noise reduction.
<b>DNR SW</b>	Enables/disables the noise reduction function.
<b>SDR CONVERT GAIN</b>	Sets the SDR gain.
<b>SDR CONVERT CLIP</b>	Sets the SDR clip.

---

## **30 SWITCHER LINK**

---

For details on operations and settings, refer to the following section in the “Linking the Unit to the AV-HS6000”.

➡ “47 SWITCHER LINK”

---

## **31 AW CONTROLLER LINK**

---

For details on operations and settings, refer to the following section in the Operating Instructions.

➡ “47 AW CONTROLLER LINK”