

**MULTIMEDIA PROJECTOR  
WUX450 / WX520 / WUX400ST / WX450ST**

**User Commands**

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## 1. Overview

These specifications describe the methods of controlling Projector WUX450 / WX520 / WUX400ST / WX450ST from PC or other controllers over an RS232C connection or LAN.

### ■ Symbol

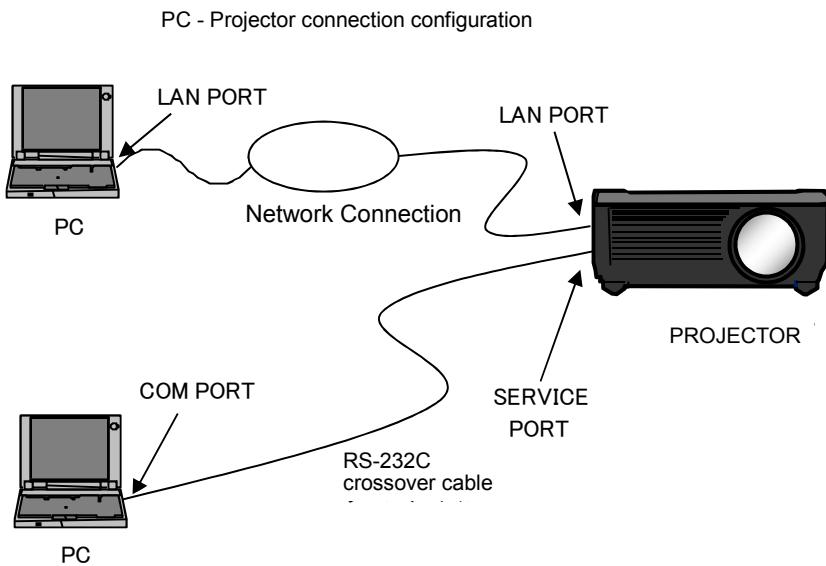
The following symbols are used in these specifications:

Symbol	Description
[ ]	Data in [ ] can be omitted.
	Same as OR.

## 2. Communication Specifications

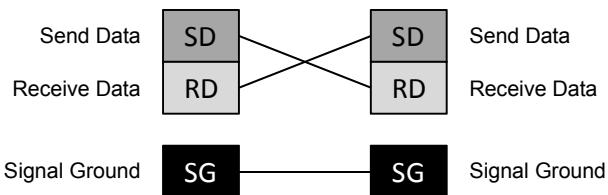
### Communication Specifications

The projector can be controlled via RS-232C or LAN connection.



RS-232C connection	
Item	Specifications
Connection system	PC and projector connected on a "1:1" basis
Connection signal line	3-line connection of SD, RD, and SG
Connection cable	9-pin RS-232C Cable (Cross)

LAN connection	
Item	Specifications
Connection system	TCP / IP Connection
Connection signal line	Straight when connecting via network
Connection cable	LAN Cable
LAN	1000BASE-T 100BASE-TX 10BASE-T



\* Signal lines other than the three SD, RD, and SG lines are not used in the projector.

\* Loop back its own signals on the PC side as necessary.

## Usable Character Codes

Use ASCII codes in the red and blue areas of below table.

No distinction is made between double-byte characters and single-byte characters. Do not use double-byte or triple-byte characters. They will all be recognized as single-byte characters.

Uppercase and lowercase alphabet letters are recognized as the same character.

	0	1	2	3	4	5	6	7	8	9	A	B	C	D	E	F
0	NUL		SP	0	@	P	'	p								
1			!	1	A	Q	a	q								
2			"	2	B	R	b	r								
3			#	3	C	S	c	s								
4			\$	4	D	T	d	t								
5			%	5	E	U	e	u								
6			&	6	F	V	f	v								
7			'	7	G	W	g	w								
8			(	8	H	X	h	x								
9			)	9	I	Y	i	y								
A	LF		*	:	J	Z	j	z								
B			+	;	K	[	k	{								
C			,	<	L	¥	l									
D	CR		-	=	M	]	m	}								
E			.	>	N	^	n	~								
F			/	?	O	-	o									

Item	Specifications
Delimiters	CR(0Dh) 7Bh ~ 7Eh Characters usable as delimiters.
General Characters	20h to 60Eh 7Bh to 7Eh Characters usable in commands.
Invalid Characters	Do not use the codes in regions other than the red and blue areas. If used, it will be processed in the same way as space (20h).
Unrecommended characters	Do not use as general rule. Both upper case and lower case letters can be used in commands, but upper case should be used in most cases.

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## Communication System (Serial)

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Item	Specifications
Communication system	RS-232-C Start-stop synchronization Semi-duplex communication
Transmission speed	19.2 Kbps
Character length	8 bits / character
Stop bit	2 bits
Parity	None
Command format	Variable-length records with terminals as delimiters
Maximum transmission length	Maximum of 256 characters (bytes) including delimiters.
Delimiters	CR (0Dh) can be used as delimiter. Delimiter in the response is CR.
Command code	ASCII codes (20h to 7Eh)
	Anything other than the above code and delimiter codes are processed in the same way as space (20h).
Communication procedure	No procedure
Flow control	None
Error control	None
Break signal	Not supported
Timeout	Tc Between characters: 1s
	Tr Between command / response interval: 15s

\* For timeout, see "Communication flow" on page 8.

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## Communication System (LAN)

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Item	Specifications
Communication system	Uses the TCP / IP protocol. Port: 33336

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## Command Format

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### Format

Commands are sent from PC to the projector in the following format:

<command text><delimiter> or  
<command text>=<value>(delimiter)

<command text>	Character strings consisting of 1 or more alphanumeric letters
<value>	Character strings consisting of 1 or more alphanumeric letters
<delimiter>	CR(0Dh)

For <command strings> and <value>, see explanation about each command.

Example) When checking the power status (POWER)  
PC to PJ

G	E	T	=	P	O	W	E	R	CR
47h	45h	54h	3Dh	50h	4Fh	57h	45h	52h	0Dh

## Response Format

Responses are sent from the projector to PC in the following format:

<Response character string> <Delimiter>

There are multiple response types, each having different <response string> format.

<b>&lt;Response character string&gt;</b> Strings consisting of 1 or more alphanumeric letters First 2 digits are always 1 lowercase alphabet letter and a ":" (colon) The first character indicates the response type.	<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="background-color: #cccccc;">Response type</th><th style="background-color: #cccccc;">Meaning</th><th style="background-color: #cccccc;">Example</th></tr> </thead> <tbody> <tr> <td>i</td><td>Normal response</td><td>i:OK</td></tr> <tr> <td>g</td><td>Reference command response</td><td>g:BRI=0</td></tr> <tr> <td>e</td><td>Error response</td><td>e:0002 INVALID_COMMAND</td></tr> </tbody> </table>	Response type	Meaning	Example	i	Normal response	i:OK	g	Reference command response	g:BRI=0	e	Error response	e:0002 INVALID_COMMAND
Response type	Meaning	Example											
i	Normal response	i:OK											
g	Reference command response	g:BRI=0											
e	Error response	e:0002 INVALID_COMMAND											
<b>&lt;Delimiter&gt;</b>	CR(0Dh)												

Format varies according to the type, as follows:

### ■ Normal response

A response when command is processed normally.

The projector receives the next command only after receiving this response.

Format)

i:OK<delimiter>

Example)

PC to PJ

P	O	W	E	R	=	O	N	CR
50h	4Fh	57h	45h	52h	3Dh	4Fh	4Eh	0Dh

PJ to PC

i	:	O	K	CR
69h	3Ah	4Fh	4Bh	0Dh

### ■ Reference command response

A response when reference is made properly for a reference command.

Format)

g:<command string>=<value><delimiter>

<command string>	Character strings consisting of 1 or more alphanumeric letters
<value>	Character strings consisting of 1 or more alphanumeric letters

Example)

PC to PJ

G	E	T	=	P	O	W	E	R	CR
47h	45h	54h	3Dh	50h	4Fh	57h	45h	52h	0Dh

PJ to PC

g	:	P	O	W	E	R	=	O	N	CR
67h	3Ah	50H	4Fh	57h	45h	52h	3Dh	4Fh	4Eh	0Dh

### ■ Error response

A response when an error occurred.

Format)

e:<error ID><space><error info string>

<error ID>	4 alphanumeric letters
<space>	Space character (20h)
<error info string>	Character strings consisting of 1 or more alphanumeric letters

\* Refer to "Error List"

Example)

PC to PJ

A	U	T	O	P	C	CR
41h	55h	54h	4Fh	50h	43h	0Dh

PJ to PC

e	:	2	0	1	F		I	N	V	A	L	I	D	_
65h	3Ah	32h	30h	31h	46h	20h	49h	4Eh	56h	41h	4Ch	49h	44h	5Fh
S	I	G	N	A	L	CR								
53h	49h	47h	4Eh	41h	4Ch	0Dh								

**█ Normal response (BUSY)**

This response is sent when a command cannot be received during processing.

Format)

i:BUSY<delimiter>

Example)

PC to PJ

A	U	T	O	P	C	CR
41h	55h	54h	4Fh	50h	43h	0Dh

PJ to PC

i	:	B	U	S	Y	CR
69h	3Ah	42h	55h	53h	59h	0Dh

## Other

**█ Command recognition**

The receiver (projector) retains incoming characters within a specific Tc, and recognizes the data as "received command" when delimiter is received.

If the character interval received exceeds the Tc or if a delimiter is not received within 256 characters, all data already received is lost, and the mode is reset to standby to receive commands again.

**█ Parameter value**

Definition of <Parameter value> is as follows:

<Parameter value>	<value 1>, <value 2>⋯, <value n>
<value n>	<Numerical value>   <ID>   "<Character string>"
<numerical value>	[<sign>]<decimal numeric string> The decimal string consists of minimum 1 letter and maximum 5 letters. Valid value range is -32768 to 32767.
<ID>	1 or more ASCII characters (20h to 60h, 7Bh to 7Eh)
<character string>	0 or more ASCII characters (20h to 60h, 7Bh to 7Eh)

### 3. Communication Flow

#### Command Transmission (PC side)

Commands should be sent from PC in a way that each character is sent within the specified Tc (inter-character timeout)

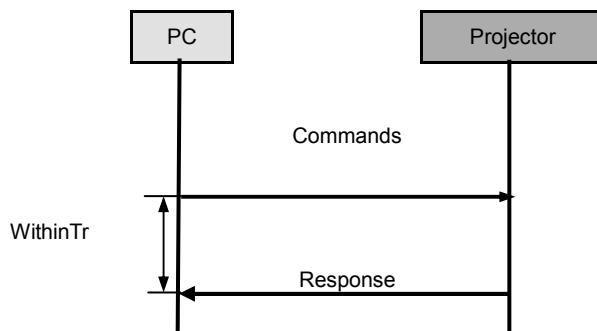
#### Command Reception (projector side)

The receiver (projector) retains incoming characters within a specific Tc, and recognizes the data as "received command" when delimiter is received.

If the character interval received exceeds the Tc or if a delimiter is not received within 256 characters, all data already received is lost, and the mode is reset to standby to receive commands again.

#### Command / Response

One response is always returned for each command sent from the PC.



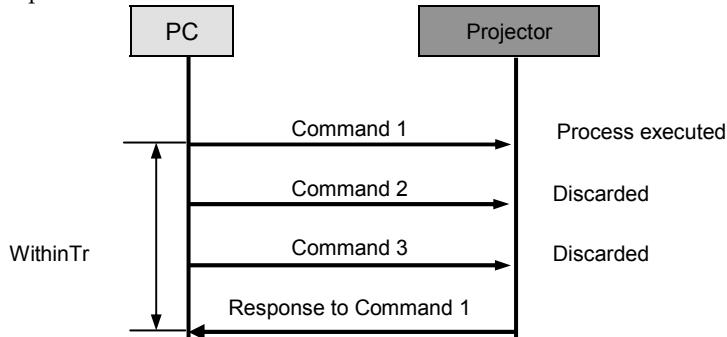
\* The timeout interval between command and response (Tr) is 15 seconds.

#### Response Reception Timeout

If a response is not received within the Tr (timeout interval between command and response) while standing by a waiting response after sending a command from the PC, it is deemed to have exceeded the "response reception timeout." Please resend the command.

#### Other

The projector can be communicated as long as it is supplied with AC power, even in standby mode. The PC side cannot send the next user command before a response for the first command is returned. If 2 or more user commands are received in a single port, user commands from 2nd one are discarded. If 2 or more user commands are received in a single port, only 1st command is processed, and a response is returned when finished.



Note: Timeout (Tr) between a command and a response is 15 seconds.

## 4. Command List

Item	Commands	Setting	Reference	Description	Power mode restriction			
					SL1	SL3	ST	ON
1	<a href="#">6AXADJ</a>	Yes	Yes	6-axis adjustment ON/OFF	-	-	-	Yes
2	<a href="#">6AXR</a>	Yes	Yes	6-axis correction R Hue / Saturation / Brightness	-	-	-	Yes
3	<a href="#">6AXG</a>	Yes	Yes	6-axis correction G Hue / Saturation / Brightness	-	-	-	Yes
4	<a href="#">6AXB</a>	Yes	Yes	6-axis correction B Hue / Saturation / Brightness	-	-	-	Yes
5	<a href="#">6AXC</a>	Yes	Yes	6-axis correction C Hue / Saturation / Brightness	-	-	-	Yes
6	<a href="#">6AXM</a>	Yes	Yes	6-axis correction M Hue / Saturation / Brightness	-	-	-	Yes
7	<a href="#">6AXY</a>	Yes	Yes	6-axis correction Y Hue / Saturation / Brightness	-	-	-	Yes
8	<a href="#">AMBADJ</a>	Yes	Yes	Ambient light correction adjustment ON/OFF	-	-	-	Yes
9	<a href="#">AMBLEVEL</a>	Yes	Yes	Ambient light level settings	-	-	-	Yes
10	<a href="#">AMBTYPE</a>	Yes	Yes	Ambient light type settings	-	-	-	Yes
11	<a href="#">ASELA1</a>	Yes	Yes	Analog PC-1 audio terminal selection	-	-	-	Yes
12	<a href="#">ASELA2</a>	Yes	Yes	Analog PC-2 audio terminal selection	-	-	-	Yes
13	<a href="#">ASELC</a>	Yes	Yes	Component audio terminal selection	-	-	-	Yes
14	<a href="#">ASELD</a>	Yes	Yes	Digital PC audio terminal selection	-	-	-	Yes
15	<a href="#">ASELH</a>	Yes	Yes	HDMI audio terminal selection	-	-	-	Yes
16	<a href="#">ASPECT</a>	Yes	Yes	Screen settings	-	-	-	Yes
17	<a href="#">AUTOPC</a>	Yes	-	Auto PC	-	-	-	Yes
18	<a href="#">AUTOSETEXE</a>	Yes	-	Auto setup	-	-	-	Yes
19	<a href="#">AVOL</a>	Yes	Yes	Audio volume adjustment	-	-	-	Yes
20	<a href="#">BLANK</a>	Yes	Yes	BLANK function	-	-	-	Yes
21	<a href="#">BRI</a>	Yes	Yes	Brightness setting	-	-	-	Yes
22	<a href="#">COLOR_TEMP</a>	Yes	Yes	Color temperature setting	-	-	-	Yes
23	<a href="#">COMVER</a>	-	Yes	User command version inquiry	Yes	Yes	Yes	Yes
24	<a href="#">CONT</a>	Yes	Yes	Contrast setting	-	-	-	Yes
25	<a href="#">DGAMMA</a>	Yes	Yes	Dynamic gamma	-	-	-	Yes
26	<a href="#">DZOOM_POS</a>	Yes	Yes	DZOOM position setting	-	-	-	Yes
27	<a href="#">DZOOM_RAT</a>	Yes	Yes	DZOOM ratio setting	-	-	-	Yes
28	<a href="#">ERR</a>	-	Yes	Error information inquiry	Yes	Yes	Yes	Yes
29	<a href="#">FINE_GAMMA_B</a>	Yes	Yes	Fine gamma (B) adjustment	-	-	-	Yes
30	<a href="#">FINE_GAMMA_G</a>	Yes	Yes	Fine gamma (G) adjustment	-	-	-	Yes
31	<a href="#">FINE_GAMMA_R</a>	Yes	Yes	Fine gamma (R) adjustment	-	-	-	Yes
32	<a href="#">FLTWRN</a>	Yes	Yes	Filter warning indication at startup	-	-	-	Yes
33	<a href="#">FREEZE</a>	Yes	Yes	Freeze status	-	-	-	Yes
34	<a href="#">GAMMA</a>	Yes	Yes	Gamma adjustment	-	-	-	Yes
35	<a href="#">HDMI_IN</a>	Yes	Yes	HDMI input setting	-	-	-	Yes

Item	Commands	Setting	Reference	Description	Power mode restriction			
					SL1	SL3	ST	ON
36	<a href="#">HDMI_OVSCAN</a>	Yes	Yes	HDMI overscan setting	-	-	-	Yes
37	<a href="#">HUE</a>	Yes	Yes	Hue setting	-	-	-	Yes
38	<a href="#">IMAGE</a>	Yes	Yes	Image mode setting	-	-	-	Yes
39	<a href="#">IMAGEFLIP</a>	Yes	Yes	Flip display	-	-	-	Yes
40	<a href="#">INPUT</a>	Yes	Yes	Input selection	-	-	-	Yes
41	<a href="#">KREP</a>	Yes	Yes	Key repeat	-	-	-	Yes
42	<a href="#">LAMP</a>	Yes	Yes	Lamp output setting	-	-	-	Yes
43	<a href="#">LAMPCOUNTER</a>	-	Yes	Lamp ON time inquiry	Yes	Yes	Yes	Yes
44	<a href="#">LMPWRN</a>	Yes	Yes	Lamp warning indication at startup	-	-	-	Yes
45	<a href="#">MAIN</a>	Yes	-	Side control operation emulation	Yes	Yes	Yes	Yes
46	<a href="#">MEMF</a>	Yes	Yes	Memory color adjustment (flesh)	-	-	-	Yes
47	<a href="#">MEMS</a>	Yes	Yes	Memory color adjustment (sky)	-	-	-	Yes
48	<a href="#">MEMG</a>	Yes	Yes	Memory color adjustment (green)	-	-	-	Yes
49	<a href="#">MUTE</a>	Yes	Yes	Mute control	-	-	-	Yes
50	<a href="#">NR</a>	Yes	Yes	Noise reduction	-	-	-	Yes
51	<a href="#">POWER</a>	Yes	Yes	This controls the power supply	Yes	Yes	Yes	Yes
52	<a href="#">PRODCODE</a>	-	Yes	Product information inquiry	Yes	Yes	Yes	Yes
53	<a href="#">RC</a>	Yes	-	Remote control operation emulate	Yes	Yes	Yes	Yes
54	<a href="#">RGBGAIN</a>	Yes	Yes	RGB gain adjustment	-	-	-	Yes
55	<a href="#">RGBOFFSET</a>	Yes	Yes	RGB offset adjustment	-	-	-	Yes
56	<a href="#">ROMVER</a>	-	Yes	ROM version inquiry	Yes	Yes	Yes	Yes
57	<a href="#">SAT</a>	Yes	Yes	Color saturation setting	-	-	-	Yes
58	<a href="#">SAVEIMGPROF</a>	Yes	Yes	Create user memory	-	-	-	Yes
59	<a href="#">SCRNASPECT</a>	Yes	Yes	Screen aspect setting	-	-	-	Yes
60	<a href="#">SHARP</a>	Yes	Yes	Sharpness setting	-	-	-	Yes
61	<a href="#">SIGNAL_INFO</a>	-	Yes	Input signal information inquiry	-	-	-	Yes
62	<a href="#">SIGNALSTATUS</a>	-	Yes	Signal status inquiry	-	-	-	Yes
63	<a href="#">TEMP</a>	-	Yes	Temperature sensor value inquiry	-	-	-	Yes
64	<a href="#">TPTN</a>	Yes	Yes	Test pattern	-	-	-	Yes

Note: About "Power mode restriction"

Commands are executable only when the projector is in the mode indicated by "○." Meaning of each mode is as follows:

SL1: Standby mode when "Network standby setting" is set to "Eco" (for commands sent through LAN)

SL3: Standby mode when "Network standby setting" is set to "Normal" (for commands sent through LAN)

ST: Standby mode (for all commands sent via RS-232C, regardless of the network setting)

ON: Power on status

## 5. Guide to command description

This section explains how commands are described.

The command descriptions have the format shown below.

### EXAMPLE

Summary of the function

#### Format

Setting	Command	A command format when a command is sent to the projector to make a setting for the function. "-" is shown when there is no setting command.  Example) 6AXADJ=<6-axis adjustment parameter: ID>
	Response	A response format for the setting command. "-" is shown when there is no setting command.  Example) i:OK
Reference	Command	A command format when a command is sent to the projector to refer to the current setting, status and others for the function. "-" is shown when there is no reference command.  Example) GET=6AXADJ
	Response	A response format for a reference command. "-" is shown when there is no reference command.  Example) g:6AXADJ=<6-axis adjustment parameter: ID>

Note: See "Error list" for any response other than the above.

When parameters exist for the command, a list of parameter is inserted in this position.

Example)

<6-axis adjustment parameter: ID>

Parameter	Meaning
ON	Valid
OFF	Invalid

## ■ Environment

This defines the environments that support the command (power supply state, input signal state). The command is executable when the projector is in the mode indicated by "○" in the table of corresponding command description page.

Power mode restriction						Input *8						
LAN *1				RS-232C *6		D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	*8	*8	*8	*8	*8	*8	*8
*2	*3	*4	*5	*7	*5							

\*1 Power mode restriction/LAN      Indicates whether the command coming through LAN is executable.

\*2 SL0      Standby mode, and the network function is turned off.

When the network function is turned off, the command is not executable if coming from LAN, in which case, this should never be "O".

\*3 SL1      "O" if enabled in a power ON state.

\*4 SL3      Standby mode, and the network standby setting is set to "Eco."

\*5 ON      Normal projection status

\*6 Power / RS-232C      Indicates whether the command coming through RS-232C is executable.

\*7 ST      Standby mode (includes SL0, SL1 and SL3 altogether, regardless of the network setting).

\*8 Input      Indicates whether the command that is depending on input signal is executable while the power is on.

## ■ Remarks

Remarks about the command is inserted when necessary.

## ■ Example

Specific example of the command is inserted when necessary.

## 6. Command Details

### 6AXADJ

6-axis adjustment / OFF

#### Format

Setting	Command	6AXADJ=<6-axis adjustment parameter: ID>
	Response	i:OK
Reference	Command	GET=6AXADJ
	Response	g:6AXADJ=<6-axis adjustment parameter: ID>

Note: See "Error list" for any response other than the above.

<6-axis adjustment parameter:ID>

Parameter	Meaning
OFF	Turned off
ON	Adjusted

#### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

#### Remarks

- (1) Use "6AXR - Y" command when this is set to "ON" and the corrected 6-axis values need to be changed.
- (2) This sets the currently selected input signal and image mode.

## 6AXR

6-axis adjustment (red), hue/saturation/brightness

### Format

Setting	Command	6AXR=<R hue:Number>,<R saturation:Number>,<R brightness:Number>
	Response	i:OK
Reference	Command	GET=6AXR
	Response	g:6AXR=<R hue:Number>,<R saturation:Number>,<R brightness:Number>

Note: See "Error list" for any response other than the above.

<R hue:Number> is within -20 to 20

<R saturation:Number> is within -20 to 20

<R brightness:Number> is within -20 to 20

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) When 6-axis adjustment is turned on, these settings are shown over the displayed image. However, the settings can be changed regardless of whether 6-axis adjustment is turned on or not.
- (2) This sets the currently selected input signal and image mode.

## 6AXG

6-axis adjustment (green), hue/saturation/brightness

### Format

Setting	Command	6AXG=<G hue:Number>,<G saturation:Number>,<G brightness:Number>
	Response	i:OK
Reference	Command	GET=6AXG
	Response	g:6AXG=<G hue:Number>,<G saturation:Number>,<G brightness:Number>

Note: See "Error list" for any response other than the above.

<G hue:Number> is within -20 to 20

<G saturation:Number> is within -20 to 20

<G brightness:Number> is within -20 to 20

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) When 6-axis adjustment is turned on, these settings are shown over the displayed image. However, the settings can be changed regardless of whether 6-axis adjustment is turned on or not.
- (2) This sets the currently selected input signal and image mode.

## 6AXB

6-axis adjustment (blue), hue/saturation/brightness

### Format

Setting	Command	6AXB=<B hue:Number>,<B saturation:Number>,<B brightness:Number>
	Response	i:OK
Reference	Command	GET=6AXB
	Response	g:6AXB=<B hue:Number>,<B saturation:Number>,<B brightness:Number>

Note: See "Error list" for any response other than the above.

<B hue:Number> is within -20 to 20

<B saturation:Number> is within -20 to 20

<B brightness:Number> is within -20 to 20

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) When 6-axis adjustment is turned on, these settings are shown over the displayed image. However, the settings can be changed regardless of whether 6-axis adjustment is turned on or not.
- (2) This sets the currently selected input signal and image mode.

## 6AXC

6-axis adjustment (cyan), hue/saturation/brightness

### Format

Setting	Command	6AXC=<C hue:Number>,<C saturation:Number>,<C brightness:Number>
	Response	i:OK
Reference	Command	GET=6AXC
	Response	g:6AXC=<C hue:Number>,<C saturation:Number>,<C brightness:Number>

Note: See "Error list" for any response other than the above.

<C hue:Number> is within -20 to 20

<C saturation:Number> is within -20 to 20

<C brightness:Number> is within -20 to 20

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) When 6-axis adjustment is turned on, these settings are shown over the displayed image. However, the settings can be changed regardless of whether 6-axis adjustment is turned on or not.
- (2) This sets the currently selected input signal and image mode.

## 6AXM

6-axis adjustment (magenta), hue/saturation/brightness

### Format

Setting	Command	6AXM=<M hue:Number>,<M saturation:Number>,<M brightness:Number>
	Response	i:OK
Reference	Command	GET=6AXM
	Response	g:6AXC=<M hue:Number>,<M saturation:Number>,<M brightness:Number>

Note: See "Error list" for any response other than the above.

<M hue:Number> is within -20 to 20

<M saturation:Number> is within -20 to 20

<M brightness:Number> is within -20 to 20

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes							

### Remarks

- (1) When 6-axis adjustment is turned on, these settings are shown over the displayed image. However, the settings can be changed regardless of whether 6-axis adjustment is turned on or not.
- (2) This sets the currently selected input signal and image mode.

## 6AXY

6-axis adjustment (yellow), hue/saturation/brightness

### Format

Setting	Command	6AXY=<Y hue:Number>,<Y saturation:Number>,<Y brightness:Number>
	Response	i:OK
Reference	Command	GET=6AXY
	Response	g:6AXY=<Y hue:Number>,<Y saturation:Number>,<Y brightness:Number>

Note: See "Error list" for any response other than the above.

<Y hue:Number> is within -20 to 20

<Y saturation:Number> is within -20 to 20

<Y brightness:Number> is within -20 to 20

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) When 6-axis adjustment is turned on, these settings are shown over the displayed image. However, the settings can be changed regardless of whether 6-axis adjustment is turned on or not.
- (2) This sets the currently selected input signal and image mode.

## AMBADJ

Ambient light adjustment / OFF

### Format

Setting	Command	AMBADJ=<Ambient light correction adjustment parameter:ID>
	Response	i:OK
Reference	Command	GET=AMBADJ
	Response	g:AMBADJ=<Ambient light correction adjustment parameter:ID>

Note: See "Error list" for any response other than the above.

< Ambient light correction adjustment parameter:ID >

Parameter	Meaning
OFF	Turned off
ON	Adjusted

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) "Ambient light level" and "Ambient light type" settings take effect on the displayed image when "Ambient light correction" is activated.  
To adjust the "Ambient light level" or "Ambient light type", use "AMB\_LEVEL" or "AMB\_TYPE" command, respectively.
- (2) This sets the currently selected input signal and image mode.

## AMBLEVEL

Ambient light level settings

### Format

Setting	Command	AMBLEVEL=<Ambient light level settings parameter:ID>
	Response	i:OK
Reference	Command	GET=AMBLEVEL
	Response	g:AMBLEVEL=<Ambient light level settings parameter:ID>

Note: See "Error list" for any response other than the above.

< Ambient light level settings parameter:ID >

Parameter	Meaning
OFF	Weak
ON	Strong

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This sets the currently selected input signal and image mode.

## AMBTYPE

Ambient light type setting

### Format

Setting	Command	AMBTYPE=<Ambient light type settings parameter:ID>
	Response	i:OK
Reference	Command	GET=AMBTYPE
	Response	g:AMBTYPE=<Ambient light type settings parameter:ID>

Note: See "Error list" for any response other than the above.

< Ambient light type settings parameter:ID >

Parameter	Meaning
TG	Tungsten lamp
FL	Fluorescent lamp

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This sets the currently selected input signal and image mode.

## ASELA1

Analog PC-1 audio terminal selection

### Format

Setting	Command	ASELA1=<Analog PC-1 audio terminal selection: ID>
	Response	i:OK
Reference	Command	GET=ASELA1
	Response	g:ASELA1=<Analog PC-1 audio terminal selection: ID>

Note: See "Error list" for any response other than the above.

< Analog PC-1 audio terminal selection: ID >

Parameter	Meaning
1	Audio In 1
2	Audio In 2
OFF	Turned off

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## ASELA2

Analog PC-2 Audio input terminal selection

### Format

Setting	Command	ASELA2=<Analog PC-2 audio terminal selection parameter: ID>
	Response	i:OK
Reference	Command	GET=ASELA2
	Response	g:ASELA2=<Analog PC-2 audio terminal selection parameter: ID>

Note: See "Error list" for any response other than the above.

&lt; Analog PC-2 audio terminal selection parameter: ID &gt;

Parameter	Meaning
1	Audio In 1
2	Audio In 2
OFF	Turned off

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## ASELC

Component Audio input terminal selection

### Format

Setting	Command	ASELC=<Component audio terminal selection parameter: ID>
	Response	i:OK
Reference	Command	GET=ASELC
	Response	g:ASELC=<Component audio terminal selection parameter: ID>

Note: See "Error list" for any response other than the above.

&lt; Component audio terminal selection parameter: ID &gt;

Parameter	Meaning
1	Audio In 1
2	Audio In 2
OFF	Turned off

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## ASELD

Digital PC Audio input terminal selection

### Format

Setting	Command	ASELD=<Digital PC audio terminal selection parameter: ID>
	Response	i:OK
Reference	Command	GET=ASELD
	Response	g:ASELD=<Digital PC audio terminal selection parameter: ID>

Note: See "Error list" for any response other than the above.

&lt; Digital PC audio terminal selection parameter: ID &gt;

Parameter	Meaning
1	Audio In 1
2	Audio In 2
OFF	Turned off

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## ASELH

HDMI Audio input terminal selection

### Format

Setting	Command	ASELH=<HDMI audio terminal selection parameter: ID>
	Response	i:OK
Reference	Command	GET=ASELH
	Response	g:ASELH=<HDMI audio terminal selection parameter: ID>

Note: See "Error list" for any response other than the above.

&lt; HDMI audio terminal selection parameter: ID &gt;

Parameter	Meaning
H	HDMI audio
1	Audio In 1
2	Audio In 2
OFF	Turned off

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## ASPECT

Aspect ratio

### Format

Setting	Command	ASPECT=<Screen setting parameters: ID>
	Response	i:OK
Reference	Command	GET=ASPECT
	Response	g:ASPECT=<Screen setting parameters: ID>

Note: See "Error list" for any response other than the above.

< Screen setting parameters:ID >

Parameter	Meaning
AUTO	Auto
4:3	4:3
16:9	16:9
16:10	16:10
ZOOM	Zoom
TRUE	Real

### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- Aspect setting may be automatically changed by other setting when the input terminal is changed or input signal is disturbed.

## AUTOPC

Auto PC

### Format

Setting	Command	AUTOPC
	Response	i:OK
Reference	Command	-
	Response	-

Note: See "Error list" for any response other than the above.

### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	No	Yes	No	No	No	No	No	No

### Remarks

- Execution of this command may modify the following setting values.
  - Total number of dots
  - Tracking
  - Horizontal / vertical positions
  - Number of horizontal / vertical display dots

## AUTOSETEXE

### Auto setup

#### Format

Setting	Command	AUTOSETEXE=<Auto set parameter:ID>
	Response	i:OK
Reference	Command	-
	Response	-

Note: See "Error list" for any response other than the above.

< Auto set parameter:ID >

Parameter	Meaning
INPUT	Runs auto input

#### Environment

Power mode restriction						Input							
LAN			RS-232C										
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

## AVOL

### Audio volume adjustment

#### Format

Setting	Command	AVOL=<Audio volume:Number>
	Response	i:OK
Reference	Command	GET=AVOL
	Response	g:AVOL=<Audio volume:Number>

Note: See "Error list" for any response other than the above.

Setting values for <Audio volume:Number> are 0 to 20.

#### Environment

Power mode restriction						Input							
LAN			RS-232C										
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

#### Remarks

- (1) The volume level can be set even while the sound is muted.

## BLANK

### BLANK setting

#### Format

Setting	Command	BLANK=<BLANK parameter:ID>
	Response	i:OK
Reference	Command	GET=BLANK
	Response	g:BLANK=<BLANK parameter:ID>

Note: See "Error list" for any response other than the above.

< BLANK parameter:ID >

Parameter	Meaning
ON	BLANK ON
OFF	BLANK OFF

#### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

#### Remarks

- (1) Executing this command in a FREEZE status will cancel the FREEZE status and become BLANK.

## BRI

### Brightness

#### Format

Setting	Command	BRI=<Brightness setting:Number>
	Response	i:OK
Reference	Command	GET=BRI
	Response	g:BRI=<Brightness setting:Number>

Note: See "Error list" for any response other than the above.

Setting values for <Brightness setting:Number> are -20 to 20.

#### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
X	X	X	O	X	O	O	O	O	O	O	O	O	

#### Remarks

- (1) This sets the currently selected input signal and image mode.

## COLOR\_TEMP

Color temperature

### Format

Setting	Command	COLOR_TEMP=<Color temperature setting:Number>
	Response	i:OK
Reference	Command	GET=COLOR_TEMP
	Response	g:COLOR_TEMP=<Color temperature setting:Number>

Note: See "Error list" for any response other than the above.

Setting values for <Color temperature setting:Number> are -17 to 21.

### Environment

Power mode restriction						Input						
LAN				RS-232C								
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This sets the currently selected input signal and image mode.

## COMVER

User command version reference

### Format

Setting	Command	-
	Response	-
Reference	Command	GET=COMVER
	Response	g:COMVER=<User command version:Character string>

Note: See "Error list" for any response other than the above.

### Environment

Power mode restriction						Input						
LAN				RS-232C								
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) User command version consists of <2-digit number> and <4-digit number>. (Example "01.1234")

## CONT

### Contrast

#### Format

Setting	Command	CONT=<Contrast setting:Number>
	Response	i:OK
Reference	Command	GET=CONT
	Response	g:COMVER=<User command version:Character string>

Note: See "Error list" for any response other than the above.

Setting values for <Contrast setting:Number> are -20 to 20.

#### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

#### Remarks

- (1) This sets the currently selected input signal and image mode.

## DGAMMA

### Dynamic gamma

#### Format

Setting	Command	DGAMMA=<Dynamic gamma setting parameter:ID>
	Response	i:OK
Reference	Command	GET=DGAMMA
	Response	g:DGAMMA=<Dynamic gamma setting parameter:ID>

Note: See "Error list" for any response other than the above.

< Dynamic gamma setting parameter:ID >

Parameter		Meaning
OFF		Off
WEAK		Weak
MIDDLE		Middle
STRONG		Strong

#### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

#### Remarks

- (1) This sets the currently selected input signal and image mode.

## DZOOM\_POS

DZOOM position setting

### Format

Setting	Command	DZOOM_POS=<DZOOM position X:Number>,<DZOOM position Y:Number>
	Response	i:OK
Reference	Command	GET=DZOOM_POS
	Response	g:DZOOM_POS=<DZOOM position X:Number>,<DZOOM position Y:Number>

Note: See "Error list" for any response other than the above.

<DZOOM position X / Y:Number> is a signed integer indicating the central position of the enlarged input image.

### Environment

Power mode restriction						Input						
LAN				RS-232C								
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This command is identical to pressing the arrow keys to move while DZOOM is enabled, however, the position can be specified in more detail.
  - (2) If a position outside the range is specified, the position is automatically moved to the nearest position within the range.
  - (3) 0 for <DZOOM position X / Y:Number> indicates the center position of the input image.
  - (4) Positive direction for <DZOOM position X / Y:Number> corresponds to RIGHT and UP keys, and negative direction corresponds to LEFT and DOWN keys.
  - (5) The numerical value for <DZOOM position X / Y:Number> represents units in pixels of the input image.
- \* For example, in a case where an input image of XGA (1024 x 768) size is enlarged twice the size (range of 512 x 384 is displayed), up to ±256 for <DZOOM position X:Number>, and up to ±192 for <DZOOM position Y:Number> can be specified.

## DZOOM\_RAT

### DZOOM ratio setting

#### Format

Setting	Command	DZOOM_RAT=<DZOOM ratio parameter:ID>
	Response	i:OK
Reference	Command	GET=DZOOM_RAT
	Response	g: DZOOM_RAT=<DZOOM ratio parameter:ID>

Note: See "Error list" for any response other than the above.

< DZOOM ratio parameter:ID >

Parameter	Meaning
1	same size (DZOOM disabled)
1.5	1.5x
2	2x
3	3x
4	4x
5	5x
6	6x
8	8x
10	10x
12	12x

#### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

#### Remarks

- (1) The SET command can be used when DZOOM is disabled and set to other than "1", to enable DZOOM and display the ratio on the screen.
- (2) The SET command can be used when DZOOM is enabled and set to "1", to disable DZOOM and hide the ratio from the screen.

## ERR

Error information reference

### Format

Setting	Command	-
	Response	-
Reference	Command	GET=ERR
	Response	g:ERR=<ErrorID:Character string>

Note: See "Error list" for any response other than the above.

< DZOOM ratio parameter:ID >

Parameter	Meaning
NO_ERROR	No error
ABNORMAL_TEMPERATURE	Temperature error
FAULTY_LAMP	Lamp error
FAULTY_LAMP_COVER	Lamp cover error
FAULTY_COOLING_FAN	Cooling fan error
FAULTY_POWER_SUPPLY	Power supply error
FAULTY_AIR_FILTER	Air filter error

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) Information when the warning LED of the projector is flashing can be obtained. "NO\_ERROR" is returned when the warning LED is not lighted.

## FINE\_GAMMA\_R

Fine gamma (R) adjustment

### Format

Setting	Command	FINE_GAMMA_R=<Fine gamma (R) adjustment point 1 adjustment value:Number>,<Fine gamma (R) adjustment point 2 adjustment value:Number>, · · · ,<Fine gamma (R) adjustment point n adjustment value:Number>
	Response	i:OK
Reference	Command	GET=FINE_GAMMA_R
	Response	g: FINE_GAMMA_R=<Fine gamma (R) adjustment point 1 adjustment value:Number>,<Fine gamma (R) adjustment point 2 adjustment value:Number>, · · · ,<Fine gamma (R) adjustment point n adjustment value:Number>

Note: See "Error list" for any response other than the above.

Adjustment values for <Fine gamma (R) adjustment point n adjustment value:Number> are 0 to 1024.

### Environment

Power mode restriction						Input						
LAN				RS-232C		D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes							

### Remarks

- (1) This sets the currently selected input signal and image mode.

### Example

#### Setting

```
> FINE_GAMMA_R=0,128,256,384,512,640,768,896,1024
< i:OK
```

#### Reference

```
> GET=FINE_GAMMA_R
< g:FINE_GAMMA_R=9:0,128,256,384,512,640,768,896,1024
```

\* Commands are indicated by ">", and responses are indicated by "<".

## FINE\_GAMMA\_G

Fine gamma (G) adjustment

### Format

Setting	Command	FINE_GAMMA_G=<Fine gamma (G) adjustment point 1 adjustment value:Number>,<Fine gamma (G) adjustment point 2 adjustment value:Number>, · · · ,<Fine gamma (G) adjustment point n adjustment value:Number>
	Response	i:OK
Reference	Command	GET=FINE_GAMMA_G
	Response	g: FINE_GAMMA_G=<Fine gamma (G) adjustment point 1 adjustment value:Number>,<Fine gamma (G) adjustment point 2 adjustment value:Number>, · · · ,<Fine gamma (G) adjustment point n adjustment value:Number>

Note: See "Error list" for any response other than the above.

Adjustment values for <Fine gamma (G) adjustment point n adjustment value:Number> are 0 to 1024.

### Environment

Power mode restriction						Input						
LAN				RS-232C		D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes							

### Remarks

- (1) This sets the currently selected input signal and image mode.

### Example

#### Setting

```
> FINE_GAMMA_G=0,128,256,384,512,640,768,896,1024
< i:OK
```

#### Reference

```
> GET=FINE_GAMMA_G
< g:FINE_GAMMA_G=9:0,128,256,384,512,640,768,896,1024
```

\* Commands are indicated by ">", and responses are indicated by "<".

## FINE\_GAMMA\_B

Fine gamma (B) adjustment

### Format

Setting	Command	FINE_GAMMA_B=<Fine gamma (B) adjustment point 1 adjustment value:Number>,<Fine gamma (B) adjustment point 2 adjustment value:Number>, · · · ,<Fine gamma (B) adjustment point n adjustment value:Number>
	Response	i:OK
Reference	Command	GET=FINE_GAMMA_B
	Response	g: FINE_GAMMA_B=<Fine gamma (B) adjustment point 1 adjustment value:Number>,<Fine gamma (B) adjustment point 2 adjustment value:Number>, · · · ,<Fine gamma (B) adjustment point n adjustment value:Number>

Note: See "Error list" for any response other than the above.

Adjustment values for <Fine gamma (B) adjustment point n adjustment value:Number> are 0 to 1024.

### Environment

Power mode restriction						Input						
LAN				RS-232C		D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes							

### Remarks

- (1) This sets the currently selected input signal and image mode.

### Example

#### Setting

```
> FINE_GAMMA_B=0,128,256,384,512,640,768,896,1024
< i:OK
```

#### Reference

```
> GET=FINE_GAMMA_B
< g:FINE_GAMMA_B=9:0,128,256,384,512,640,768,896,1024
```

\* Commands are indicated by ">", and responses are indicated by "<".

## FLTWRN

Air filter cleaning warning

### Format

Setting	Command	FLTWRN=<Filter warning parameter: ID>
	Response	i:OK
Reference	Command	GET=FLTWRN
	Response	g: FLTWRN=<Filter warning parameter: ID>

Note: See "Error list" for any response other than the above.

< Filter warning parameter: ID >

Parameter	Meaning
OFF	Turned off
ON	Turned on

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## FREEZE

Freeze ON / OFF

### Format

Setting	Command	FREEZE=<FREEZE parameter:ID>
	Response	i:OK
Reference	Command	GET=FREEZE
	Response	g:FREEZE=<FREEZE parameter:ID>

Note: See "Error list" for any response other than the above.

< FREEZE parameter:ID >

Parameter	Meaning
OFF	Off
ON	On

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	No

## GAMMA

### Gamma adjustment

#### Format

Setting	Command	GAMMA=<Gamma adjustment:Number>
	Response	i:OK
Reference	Command	GET=GAMMA
	Response	g: GAMMA=<Gamma adjustment:Number>

Note: See "Error list" for any response other than the above.

Setting values for <Gamma adjustment: Number> are -10 to 10.

#### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

#### Remarks

- (1) This sets the currently selected input signal and image mode.

## HDMI\_IN

### HDMI input setting

#### Format

Setting	Command	HDMI_IN=<HDMI input setting parameter:ID>
	Response	i:OK
Reference	Command	GET=HDMI_IN
	Response	g: HDMI_IN=<HDMI input setting parameter:ID>

Note: See "Error list" for any response other than the above.

< HDMI input setting parameter:ID >

Parameter		Meaning	
AUTO		Incoming HDMI signals (HDMI input) are treated as AV source.	
PC		Incoming HDMI signals (HDMI input) are treated as PC source.	

#### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## HDMI\_OVSCAN

HDMI overscan setting

### Format

Setting	Command	HDMI_OVSCAN=<HDMI overscan setting parameter:ID>
	Response	i:OK
Reference	Command	GET= HDMI_OVSCAN
	Response	g: HDMI_OVSCAN=<HDMI overscan setting parameter:ID>

Note: See "Error list" for any response other than the above.

< HDMI overscan setting parameter:ID >

Parameter	Meaning
OFF	Turns overscan to OFF
ON	Turns overscan to ON.

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	No	No	No	Yes	No	No	Yes

### Remarks

- (1) The setting is fixed to [OFF] depending on the setting status of other functions or the status of the input signal.

## HUE

Hue setting

### Format

Setting	Command	HUE=<Hue setting value:Number>
	Response	i:OK
Reference	Command	GET= HUE
	Response	g: HUE=<Hue setting value:Number>

Note: See "Error list" for any response other than the above.

Setting values for <Hue setting value:Number> are -20 to 20.

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This sets the currently selected input signal and image mode.

## IMAGE

Image mode setting

### Format

Setting	Command	IMAGE=<Image mode setting parameter:ID>
Response		i:OK
Reference	Command	GET= IMAGE
Response		g: IMAGE=<Image mode setting parameter:ID>

Note: See "Error list" for any response other than the above.

< Image mode setting parameter:ID >

Parameter	Meaning
STANDARD	Standard
PRESENTATION	Presentation
PHOTO_SRGB	Photo / sRGB
DYNAMIC	Dynamic
VIDEO	Video
USER_1	User 1
USER_2	User 2
USER_3	User 3
USER_4	User 4
USER_5	User 5

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) When Image Mode setting is changed, the following set of setting items are reapplied as these sets are unique to the individual image modes.

## IMAGEFLIP

### Flip display

#### Format

Setting	Command	IMAGEFLIP=<Image flip setting parameters:ID>
	Response	i:OK
Reference	Command	GET=IMAGEFLIP
	Response	g:IMAGEFLIP=<Image flip setting parameters:ID>

Note: See "Error list" for any response other than the above.

< Image flip setting parameters:ID >

Parameter	Meaning
NONE	None
CEILING	Ceiling mount (upside down and right side left)
REAR	Rear (right side left)
REAR_CEILING	Rear, ceiling mount (upside down)

#### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

#### Remarks

- When the display is flipped, the "keystone distortion" settings (HKS, VKS, 4CNR) are initialized.

## INPUT

### Input signal selection

#### Format

Setting	Command	INPUT=<Input selection parameters:ID>
	Response	i:OK
Reference	Command	GET=INPUT
	Response	g:INPUT=<Input selection parameters:ID>

Note: See "Error list" for any response other than the above.

< Image flip setting parameters:ID >

Parameter	Meaning
HDMI	HDMI
D-RGB	Digital PC
A-RGB1	Analog PC-1
A-RGB2	Analog PC-2
COMP	Component
LAN	LAN
USB	USB

#### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## KREP

Key repeat

### Format

Setting	Command	KREP=<Key repeat parameter: ID>
	Response	i:OK
Reference	Command	GET=KREP
	Response	g:KREP=<Key repeat parameter: ID>

Note: See "Error list" for any response other than the above.

< Key repeat parameter: ID >

Parameter	Meaning
OFF	Turned off
ON	Turned on

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## LAMP

Lamp output setting

### Format

Setting	Command	LAMP=<Lamp output setting parameters:ID>
	Response	i:OK
Reference	Command	GET=LAMP
	Response	g:LAMP=<Lamp output setting parameters:ID>

Note: See "Error list" for any response other than the above.

< Lamp output setting parameters:ID >

Parameter	Meaning
FULL	Full power
ECO	Eco

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This sets the currently selected input signal and image mode.

## LAMPCOUNTER

Lamp counter reference

### Format

Setting	Command	-
	Response	-
Reference	Command	GET=LAMPCOUNTER
	Response	g:LAMPCOUNTER=<Lamp ON time:Character string>

Note: See "Error list" for any response other than the above.

< Lamp ON time:Character string >

Lamp counter	ON time:H
"[G ____]"	0~539
"[GG ____]"	540~1079
"[GGG ____]"	1080~1619
"[GGGG ____]"	1620~2159
"[GGGGG ____]"	2160~2699
"[GGGGGY ____]"	2700~2849
"[GGGGGYY ____]"	2850~2999
"[GGGGGYYR]"	3000~

### Environment

Power mode restriction						Input							
LAN				RS-232C		Input							
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

## LMPWRN

Lamp replacement warning

### Format

Setting	Command	LMPWRN=<Lamp warning parameter: ID>
	Response	i:OK
Reference	Command	GET=LMPWRN
	Response	g:LMPWRN=<Lamp warning parameter: ID>

Note: See "Error list" for any response other than the above.

< Lamp warning parameter: ID >

Parameter	Meaning
OFF	Turned off
ON	Turned on

### Environment

Power mode restriction						Input							
LAN				RS-232C		Input							
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

## MAIN

Unit control panel emulation

### Format

Setting	Command	MAIN=<Side control emulation button parameters:ID>
Response	i:OK	
Reference	Command	-
Response	-	

Note: See "Error list" for any response other than the above.

< Side control emulation button parameters:ID >

Parameter	Meaning	
	Operation	Remarks
POWER	POWER	
POWER_OFF	-	POWER button pressed twice
MENU	MENU	
INPUT	INPUT	
AUTOPC	AUTOPC	
KEYSTONE	KEYSTONE	
UP	UP	
UP+REP		Button press start
DOWN	DOWN	
DOWN +REP		Button press start
LEFT	LEFT	
LEFT +REP		Button press start
RIGHT	RIGHT	
RIGHT +REP		Button press start
OK	OK	
*-REP	-	Button press end

### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

### Remarks

- (1) Parameters with "+REP" indicates "Button press start" (same state as when the front panel button is held down).  
Be absolutely sure to send the '\*-REP' parameter, and end the button pressing last of all.  
The button pressing is ended in the cases below as well.
  - <1> When buttons on the panel or the remote are operated
  - <2> When some command has been received
- (2) When ceiling mount setting is made, functions of UP/DOWN/LEFT/RIGHT buttons on the unit control panel are reversed. But the "MAIN" command's UP/DOWN/LEFT/RIGHT are unaffected and always work in the same way as when installed on the floor.
- (3) Adjust the time between each button press using the application.
- (4) When a button press request is accepted properly, the projector returns "i:OK" even when the function is inexecutable.
- (5) All parameters except "Power" are invalid during standby mode.

## MEMF

Memory color adjustment (flesh)

### Format

Setting	Command	MEMF=<Memory color adjustment parameter:ID>
	Response	i:OK
Reference	Command	GET=MEMF
	Response	g:MEMF=<Memory color adjustment parameter:ID>

Note: See "Error list" for any response other than the above.

&lt; Memory color adjustment parameter:ID &gt;

Parameter		Meaning
OFF		Turns off
WEAK		Weak
MIDDLE		Middle
STRONG		Strong

### Environment

Power mode restriction						Input							
LAN			RS-232C										
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This setting applies to the currently selected input signals and the image mode.

## MEMG

Memory color adjustment (green)

### Format

Setting	Command	MEMG=<Memory color adjustment parameter:ID>
	Response	i:OK
Reference	Command	GET=MEMG
	Response	g:MEMG=<Memory color adjustment parameter:ID>

Note: See "Error list" for any response other than the above.

&lt; Memory color adjustment parameter:ID &gt;

Parameter		Meaning
OFF		Turns off
WEAK		Weak
MIDDLE		Middle
STRONG		Strong

### Environment

Power mode restriction						Input							
LAN			RS-232C										
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This setting applies to the currently selected input signals and the image mode.

## MEMS

Memory color adjustment (sky)

### Format

Setting	Command	MEMS=<Memory color adjustment parameter:ID>
	Response	i:OK
Reference	Command	GET=MEMS
	Response	g:MEMS=<Memory color adjustment parameter:ID>

Note: See "Error list" for any response other than the above.

< Memory color adjustment parameter:ID >

Parameter	Meaning
OFF	Turns off
WEAK	Weak
MIDDLE	Middle
STRONG	Strong

### Environment

Power mode restriction						Input							
LAN			RS-232C										
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This setting applies to the currently selected input signals and the image mode.

## MUTE

Mute control

### Format

Setting	Command	MUTE=<Mute control parameter: ID>
	Response	i:OK
Reference	Command	GET=MUTE
	Response	g:MUTE=<Mute control parameter: ID>

Note: See "Error list" for any response other than the above.

< Mute control parameter: ID >

Parameter	Meaning
ON	Disables the audio / beep sound.
OFF	Enables the audio / beep sound.

### Environment

Power mode restriction						Input							
LAN			RS-232C										
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) Mute setting is always set to "OFF" after the projector is turned on.  
Mute setting is canceled if audio volume is adjusted during mute.

## NR

### Noise reduction

#### Format

Setting	Command	NR=<Noise reduction setting parameter:ID>
	Response	i:OK
Reference	Command	GET=NR
	Response	g:NR=<Noise reduction setting parameter:ID>

Note: See "Error list" for any response other than the above.

< Noise reduction setting parameter:ID >

Parameter	Meaning
OFF	Turns off
WEAK	Weak
MIDDLE	Middle
STRONG	Strong

#### Environment

Power mode restriction						Input							
LAN			RS-232C										
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

#### Remarks

- (1) This sets the currently selected input signal and image mode.

## POWER

This controls the power supply

### Format

Setting	Command	POWER=<power control parameter:ID>
	Response	i:OK
Reference	Command	GET=POWER
	Response	g:POWER=<power mode parameter:ID>

Note: See "Error list" for any response other than the above.

< Power control parameter:ID >

Parameter	Meaning
ON	Power ON
OFF	Power OFF

< Power mode parameter:ID >

Parameter	Meaning
OFF	OFF
OFF2ON	OFF -> ON in transition
ON	ON
ON2OFF	ON -> OFF in transition

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) "Lamp Replacement Preparation," "Lamp Replacement Warning," and ""Air Filter Cleaning Warning" are displayed for 10 seconds, regardless of whether the projector was started by the button or command.
- (2) Note that there are different parameters for the setting command and the reference command.

## PRODCODE

Product name inquiry

### Format

Setting	Command	-
	Response	-
Reference	Command	GET=PRODCODE
	Response	g:PRODCODE=<Product name:Character string>

Note: See "Error list" for any response other than the above.

< Product name:Character string >

Parameter	Meaning
WUX450	WUX450 model
WX520	WX520 model
WUX400ST	WUX400ST model
WX450ST	WX450ST model

### Environment

Power mode restriction						Input							
LAN			RS-232C										
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

**RC**

Remote control operation emulate

**Format**

Setting	Command	RC=<Remote control emulation button parameters:ID>
	Response	i:OK
Reference	Command	-
	Response	-

Note: See "Error list" for any response other than the above.

&lt; Remote control emulation button parameters:ID &gt;

Parameter	Meaning	
	Operation	Remarks
POWER	POWER	
POWER_OFF	-	POWER button pressed twice
MENU	MENU	
EXIT	EXIT	
INPUT	INPUT	
DPC	DIGITAL	
APC1	ANALOG PC1	
APC2	ANALOG PC2	
HDMI	HDMI	
COMP	COMPONENT	
ASPECT	ASPECT	
AUTOPC	AUTOPC	
UP	UP	
UP+REP		Button press start
DOWN	DOWN	
DOWN+REP		Button press start
LEFT	LEFT	
LEFT+REP		Button press start
RIGHT	RIGHT	
RIGHT+REP		Button press start
OK	OK	
FOCUS	FOCUS	WUX450 / WX520 / WUX400ST / WX450ST returns "i:OK" without showing any behavior.
ZOOM	ZOOM	WUX450 / WX520 / WUX400ST / WX450ST returns "i:OK" without showing any behavior.
SHIFT	SHIFT	WUX450 / WX520 / WUX400ST / WX450ST returns "i:OK" without showing any behavior.
TPTN	TEST PATTERN	
KEYSTONE	KEYSTONE	
NUM_0	0	
NUM_1	1	
NUM_2	2	
NUM_3	3	
NUM_4	4	
NUM_5	5	
NUM_6	6	
NUM_7	7	
NUM_8	8	
NUM_9	9	

DZOOM_P	DZOOM +	
DZOOM_P+REP		Button press start
DZOOM_M	DZOOM -	
DZOOM_M+REP		Button press start
VOL_P	VOL +	
VOL_P+REP	VOL +	Button press start
VOL_M	VOL -	
VOL_M+REP	VOL -	Button press start
MUTE	MUTE	
FN	Fn	
IMAGE	IMAGE	
FREEZE	FREEZE	
BLANK	BLANK	
GAMMA	GAMMA	
SPLIT	SPLIT	
ECO	ECO	
*-REP	-	Button press ends ("2Ah," "2Dh," "52h," "45h," and "50h" in hexadecimal form)

## ■ Remarks

- (1) A parameter with '+REP' signifies "button press start". (This is the same as the status in which the remote control button is held down.)  
When executing these commands, be sure to send '\*-REP' at the end to finish the button press.  
The button pressing is ended in the cases below as well.  
<1> When buttons on the panel or remote are operated  
<2> When a command has been received
- (2) When a button press request is accepted properly, "i:OK" is returned.  
(without notifying the resulting execution of button operation)

## RGBGAIN

RGB gain adjustment

### Format

Setting	Command	RGBGAIN=<R gain setting:Number>,<G gain setting:Number>,<B gain setting:Number>
	Response	i:OK
Reference	Command	GET=RGBGAIN
	Response	g:RGBGAIN=<R gain setting:Number>,<G gain setting:Number>,<B gain setting:Number>

Note: See "Error list" for any response other than the above.

Setting values for <R/G/B gain setting:Number> are -60 to 60.

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes							

### Remarks

- (1) This sets the currently selected input signal and image mode.

## RGBOFFSET

RGB offset adjustment

### Format

Setting	Command	RGBOFFSET=<R offset setting:Number>,<G offset setting:Number>,<B offset setting:Number>
	Response	i:OK
Reference	Command	GET=RGBOFFSET
	Response	g:RGBOFFSET=<R offset setting:Number>,<G offset setting:Number>,<B offset setting:Number>

Note: See "Error list" for any response other than the above.

Setting values for <R/G/B offset setting:Number> are -60 to 60.

### Environment

Power mode restriction						Input						
LAN			RS-232C			D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
SL0	SL1	SL3	ON	ST	ON	Yes	Yes	Yes	Yes	Yes	Yes	Yes
No	No	No	Yes	No	Yes							

### Remarks

- (1) This sets the currently selected input signal and image mode.

## ROMVER

Firmware version inquiry

### Format

Setting	Command	-
	Response	-
Reference	Command	GET=ROMVER
	Response	g:ROMVER=<ROM version:Character string>

Note: See "Error list" for any response other than the above.

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## SAT

Color saturation setting

### Format

Setting	Command	SAT=<Color saturation setting value:Number>
	Response	i:OK
Reference	Command	GET=SAT
	Response	g:SAT=<Color saturation setting value:Number>

Note: See "Error list" for any response other than the above.

Setting values for <Color saturation setting value:Number> are -20 to 20.

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This sets the currently selected input signal and image mode.

## SAVEIMGPROF

User memory creation/storage/deletion -- user memory creation status

### Format

Setting	Command	SAVEIMGPROF=<User memory save to parameter:ID>
	Response	i:OK
Reference	Command	GET=SAVEIMGPROF
	Response	g:SAVEIMGPROF=<Number of user memories>:<User 1 present parameter>,<User 2 present parameter>,<User 3 present parameter>,<User 4 present parameter>,<User 5 present parameter>'

Note: See "Error list" for any response other than the above.

< User memory save to parameter:ID >

Parameter	Meaning
USER_1	Save to User 1
USER_2	Save to User 2
USER_3	Save to User 3
USER_4	Save to User 4
USER_5	Save to User 5
DEL_ALL	Delete all User memory

< User memory presence parameter:ID >

Parameter	Meaning
0	User memory not created
1	User memory created

### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

### Example

Setting

```
> SAVEIMGPROF=USER_2
< i:OK
```

Reference

```
> GET=SAVEIMGPROF
< g:SAVEIMGPROF=5:0,1,1,0,0
```

\* Commands are indicated by ">", and responses are indicated by "<".

## SCRNASPECT

Screen aspect setting

### Format

Setting	Command	SCRNASPECT=<Screen aspect setting parameter:ID>
	Response	i:OK
Reference	Command	GET=SCRNASPECT
	Response	g:SCRNASPECT=<Screen aspect setting parameter:ID>

Note: See "Error list" for any response other than the above.

< User memory save to parameter:ID >

Parameter	Meaning
16:10	16:10
16:9	16:9
4:3	4:3
16:9_DIS	16:9 digital image shift
4:3_DIS	4:3 digital image shift

### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

## SHARP

Sharpness setting

### Format

Setting	Command	SHARP=<Sharpness setting:Number>
	Response	i:OK
Reference	Command	GET=SHARP
	Response	g:SHARP=<Sharpness setting:Number>

Note: See "Error list" for any response other than the above.

Setting values for <Sharpness setting:Number> are -10 to 10.

### Environment

Power mode restriction						Input							
LAN				RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

### Remarks

- (1) This sets the currently selected input signal and image mode.

## SIGNAL\_INFO

Inquires about displayed signal information

### Format

Setting	Command	-
	Response	-
Reference	Command	GET=SIGNAL_INFO
	Response	g:SIGNAL_INFO=<Input signal information:Character string>

Note: See "Error list" for any response other than the above.

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

## SIGNALSTATUS

Signal detection inquiry

### Format

Setting	Command	-
	Response	-
Reference	Command	GET=IGNALSTATUS
	Response	g: SIGNALSTATUS=<Signal status:ID>

Note: See "Error list" for any response other than the above.

< Signal status:ID >

Parameter	Meaning
NO_SIGNAL	Signal not detected
DISPLAYING	Image now displayed or display enable status
SETTING	Signal detection and display preparation in progress

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) This returns the signal status of the selected input.
- (2) "e:1011 FUNCTION\_NOT\_AVAILABLE" is returned during BLANK.

## TEMP

Temperature sensor value inquiry

### Format

Setting	Command	-
	Response	-
Reference	Command	GET=TEMP
	Response	g: TEMP=<Number of sensors>,<Sensor 1 value>,...,<Sensor n value>

Note: See "Error list" for any response other than the above.

### Environment

Power mode restriction						Input						
LAN			RS-232C									
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None
No	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

### Remarks

- (1) There are cases when number of sensors is 0. In this case, there will not be a comma.

### Example

Reference

```
> GET=TEMP  
< g:TEMP=6,28.5,53.3,53.3,53.3,33.0,27.6
```

\* Commands are indicated by ">", and responses are indicated by "<".

## TPTN

### Test pattern

#### Format

Setting	Command	TPTN=<Test pattern parameter: ID>
	Response	i:OK
Reference	Command	GET=TPTN
	Response	g:TPTN=<Test pattern parameter: ID>

Note: See "Error list" for any response other than the above.

< Test pattern parameter: ID >

Parameter	Meaning
OFF	Turned off
CB1	Color bar
SSH1	Stair step H No.1
SSH2	Stair step H No.2
SSH3	Stair step H No.3
SSV1	Stair step V No.1
SSV2	Stair step V No.2
SSV3	Stair step V No.3
RTF1	Raster 100% White
RTF2	Raster 100% Red
RTF3	Raster 100% Green
RTF4	Raster 100% Blue
RTH1	Raster 50% White
RTH2	Raster 50% Red
RTH3	Raster 50% Green
RTH4	Raster 50% Blue
SSC1	Stair step color
CKR1	Checker No.1
CKR2	Checker No.2
MUL1	Multi No.1
MUL2	Multi No.2
CHR1	Character
FCS1	Focus
BDR1	Border
CRS1	Cross hatch 8 divided
CRS2	Cross hatch 12 divided
CRS3	Cross hatch 4 divided

#### Environment

Power mode restriction						Input							
LAN				RS-232C		Input							
SL0	SL1	SL3	ON	ST	ON	D-RGB	A-RGB	COMP	HDMI	LAN	USB	None	
No	No	No	Yes	No	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	

## 7. Error List

Response	Meaning	Reaction
i:OK	The command was successfully processed.	
e:0002 INVALID_COMMAND	The command was invalid (not defined), or the command format was incorrect.	Use a correct command or correct command format.
e:000A INVALID_PARAMETER	Argument (parameter) of the command is invalid.	Use a correct argument (parameter).
e:F001 SYSTEM	An internal error occurred.	Note: If the error persists after repeatedly resending the command with some intervals, turn off the projector and then disconnect and reconnect the power cord before resending the command.
e:0005 NOT_POWER_SUPPLIED	The power is off.	Send the command while the power is on.
i:BUSY	Cannot execute as the projector is undergoing internal processing.	Wait for a while, and resend the command.
e:1011 FUNCTION_NOT_AVAILABLE	The operation is currently invalid. The setting cannot be made in the current status.	Take one of the following actions: <ul style="list-style-type: none"><li>• Return the UI state to the usual projection mode, and then resend the command.</li><li>• Activate the function from the menu, and resend the command. (Commands may be deactivated by the related menu items.)</li></ul>
e:201F INVALID_SIGNAL	Cannot execute with the current input signal.	Send the command when a different input signal is input.

## 8. Error Processing

