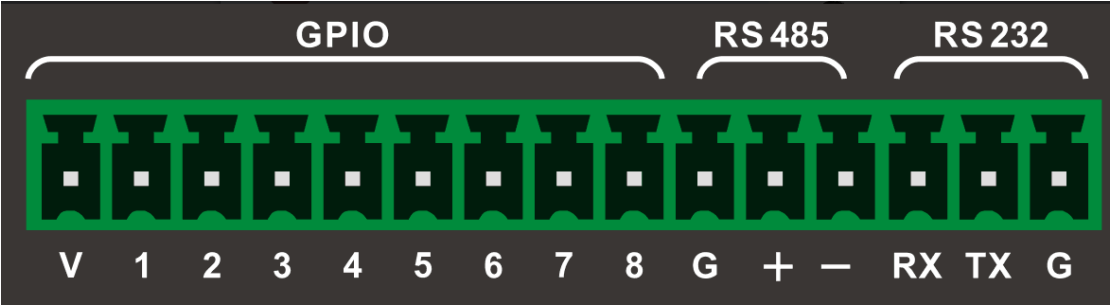




GPIO And Center Control Code

User Manual

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1. GPIO Description

2. Central Control

2.1 Serial port parameters

Boute(Baud rate)	Available with 115200(default), 2400, 4800, 9600, 19200, 38400, 57600, 115200
Check digit	NONE
Data	8 bits
Stop	1 bit
Command sending interval	>200ms When scene is called, needs to be more than 3s.

2.2 Command format

2.2.1 Code sending

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x00 - 0xFF

8	9	10		11	12
Data length	Data bit 1	Data bit 2		Data bit n	Frame end
0x00 - 0x03	0x??	0x??	...	0x??	0xEE

1-4 bits: communication command frame header, four bytes.

5 bits: device ID, the default is 0xFF.

6 bits: read and write bits, 0x36 means write, 0x63 means read.

7 bits: function code, refer to function description.

8 bits: data length, that is, the number of bytes from data 1 to data n. Generally the length is 1 to 4.

9-11 bits: data, refer to the function description.

12 bits: the end of the communication command frame, one byte.

2.2.2 Command return

(1) When the sending command is a write command (read and write bit 0x36), the machine returns

1
Response bit
0x00/0x01

1: 0x00 indicates that the write is successful, and 0x01 indicates that the write fails.

(2) When the sending command is a read command (read and write bit 0x63), and the command format is correct, the machine returns the command format:

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x00 - 0xFF

8	9	10		11	12
Data length	Data bit 1	Data bit 2		Data bit n	Frame end
0x00 - 0x03	0x??	0x??	...	0x??	0xEE

1-4 bits: communication command frame header, four bytes.

5 bits: device ID, the default is 0xFF.

6 bits: read and write bits, 0x36 means write, 0x63 means read.

7 bits: function code, refer to function description

8 bits: data length, that is, the number of bytes from data 1 to data n. Generally the length is 1 to 4.

9-11 bits: data, refer to the function description.

12 bits: the end of the communication command frame, one byte.

If the command format is wrong, the machine returns:

1
Response bit
0x01

1: 0x01 means reading failed.

2.3 Function Description

2.3.1 Scene (preset) call

Function code: 0x02

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x02

8	9	10
Data length	Scene number	Frame end
0x01	0x01 - 0x1F	0xEE

Read and write bits: 0x36.

Scene No.: The value range is 1 to 30 (0x01-0x1F). Scene 1 is the factory default setting.

Example: A5 C3 3C 5A FF 36 02 01 01 EE means to call scene 1.

(The instructions in the example are hexadecimal numbers, and the prefix "0x" is removed).

The command returns:

1
Response bit
0x00/0x01

Response bit: 0x00 means writing is successful, 1: 0x01 means writing failed.

2.3.2 Scene (Preset) Read

Function code: 0x02

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x02

8	9
Data length	Frame end
0x00	0xEE

The command returns:

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x02

8	9	10
Data length	Scene number	Frame end
0x01	0x01 - 0x1E	0xEE

Read and write bits: 0x63.

Scene number: indicates the scene number currently called, the value range is 1 to 30 (0x01-0x1E)

Example: The machine returns A5 C3 3C 5A FF 63 02 01 01 EE, which means that the current calling scene number is 1.

2.3.3 Mute control

Function code: 0x03

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x03

8	9	10	11	12
Data length	Frame end	Channel No.	Mute control	Frame end
0x03	0x01/0x02	0x00 - 0x08	0x00/0x01	0xEE

Read and write bits: 0x36.

Input/Output: 0x01 means input, 0x02 means output.

Channel number: 0x01 means channel 1; 0x08 means channel 8; 0x00 means channel 1 to channel 8.

Mute control: 0x00 means unmute, 0x01 means mute.

Example: A5 C3 3C 5A FF 36 03 03 01 01 01 EE means input channel 1 is muted.

The command returns:

1
Response bit
0x00/0x01

Response bit: 0x00 means writing is successful, 1: 0x01 means writing failed.

Mute status read

Function code: 0x03

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x03

8	9	10	11
Data length	Input/Output	Channel No.	Frame end
0x02	0x01 - 0x02	0x01 - 0x08	0xEE

Read and write bits: 0x63.

Input/Output: 0x01 means input, 0x02 means output.

Channel number: 0x01 means channel 1; 0x08 means channel 8.

The command returns:

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x03

8	9	10	11	12
Data length	Input/output	Channel No.	Mute control	Frame end

0x03	0x01 - 0x02	0x01 - 0x08	0x00/0x01	0xEE
------	-------------	-------------	-----------	------

Read and write bits: 0x63.

Input/Output: 0x01 means input, 0x02 means output.

Channel number: 0x01 means channel 1; 0x08 means channel 8.

Mute control: 0x00 means unmute, 0x01 means mute.

Example: The machine returns A5 C3 3C 5A FF 63 03 03 01 02 00 EE, which means that the current state of input channel 2 is unmute.

2.3.4 Input and output volume gain setting

Function code: 0x04

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x04

8	9	10	11	12	13
Data length	Input/Output	Channel No.	Volume (low byte)	Volume (high byte)	Frame end
0x04	0x01 - 0x02	0x01 - 0x08	0x00 - 0xFF	0x00 - 0xFF	0xEE

Read and write bits: 0x36.

Input/Output: 0x01 means input, 0x02 means output.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

Volume (low byte-high byte): the high and low bytes form a 16-bit signed hexadecimal number, the unit is 0.1dB, the input channel range is -60.0dB to 6.0dB, the output channel range is -60.0dB to 12.0dB. For example: low byte 0x01 and high byte 0x00 form 0x0001, which means 0.1dB. When the set value exceeds the adjustable range, the machine automatically takes the extreme value.

Example: A5 C3 3C 5A FF 36 04 04 01 01 C8 00 EE means to set the volume of input channel 1 to 20.0dB.

The command returns:

1
Response bit
0x00/0x01

Response bit: 0x00 means writing is successful, 1: 0x01 means writing failed.

2.3.5 Input and output volume gain reading

Function code: 0x04

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x04

8	9	10	11
Data length	Input/Output	Channel No.	Frame end
0x02	0x01 - 0x02	0x01 - 0x08	0xEE

Read and write bits: 0x63.**Input/Output:** 0x01 means input, 0x02 means output.**Channel number:** 0x01 means channel 1, and 0x08 means channel 8.

The command returns:

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x04

8	9	10	11	12	13
Data length	Input/output	Channel No.	Volume (low byte)	Volume (high byte)	Frame end
0x04	0x01 - 0x02	0x01 - 0x08	0x00 - 0xFF	0x00 - 0xFF	0xEE

Read and write bits: 0x63.**Input/Output:** 0x01 means input, 0x02 means output.**Channel number:** 0x01 means channel 1, and 0x08 means channel 8.**Volume (low byte-high byte):** The high and low bytes form a 16-bit signed hexadecimal number, and the unit is 0.1dB.**For example:** low byte 0x01 and high byte 0x00 form 0x0001, which means 0.1dB.**Example:** The machine returns A5 C3 3C 5A FF 63 03 04 02 07 EC FF EE, which means that the volume of output channel 7 is -2.0dB.

2.3.6 Volume gain increases and decreases

Function code: 0x05

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x05

8	9	10	11	12	13
Data length	Input/Output	Channel No.	Increase/decrease	Volume increase and decrease value	Frame end
0x04	0x01 - 0x02	0x01 - 0x08	0x00/0x01	0x00 - 0xFF	0xEE

Read and write bits: 0x36.

Input/Output: 0x01 means input, 0x02 means output.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

Plus/minus: 0x00 means volume up, 0x01 means volume down.

Volume increase (decrease) value: the volume increase or decrease setting range is 0 to 25.6dB, the step value is 0.1dB, such as 0x0A means 1.0dB, when the volume increases or decreases, the volume value exceeds the adjustable range, the extreme value is taken.

Example: A5 C3 3C 5A FF 36 04 04 01 01 00 19 EE means to increase the volume of input channel 1 by 2.5dB.

The command returns:

1
Response bit
0x00/0x01

Response bit: 0x00 means writing is successful, 1: 0x01 means writing failed.

2.3.7 Line/Mic switch settings

Function code: 0x06

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code

0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x06
------	------	------	------	------	------	------

8	9	10	11	12
Data length	Channel No.	Line/Mic	Sensitivity	Frame end
0x03	0x01 - 0x08	0x01/0x00	0x00 - 0x07	0xEE

Read and write bits: 0x36.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

Line/Mic: 0x01 means Line in input, 0x00 means Mic input.

Sensitivity: 0x00 means 0dB, 0x01 means 5dB, 0x02 means 10dB, 0x03 means 15dB, 0x04 means 20dB, 0x05 means 25dB, 0x06 means 30dB, 0x07 means 35dB,

The command returns:

1
Response bit
0x00/0x01

Response bit: 0x00 means writing is successful, 1: 0x01 means writing failed.

Line/Mic Status read

Function code: 0x06

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x06

8	9	10
Data length	Channel No.	Frame end
0x0	0x01 - 0x08	0xEE

Read and write bits: 0x63.

Input/Output: 0x01 means input, 0x02 means output.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

The command returns:

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x06

8	9	10	11
Data length	Channel No.	Line/Mic	Frame end
0x02	0x01 - 0x08	0x01/0x00	0xEE

Read and write bits: 0x63.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

Line/Mic: 0x01 means Line in input, 0x00 means Mic input.

Example: The machine returns A5 C3 3C 5A FF 63 06 02 01 00 EE, which means that input channel 1 is Mic input.

2.3.8 Phantom power settings

Function code: 0x07

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x07

8	9	10	11
Data length	Channel No.	Phantom power switch	Frame end
0x02	0x01 - 0x08	0x00/0x01	0xEE

Read and write bits: 0x36.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

Phantom power switch: 0x01 means phantom power is turned on, 0x00 means phantom power is turned off.

Note: When the Line/Mic input is in Line state, the phantom power setting is invalid.

Example: A5 C3 3C 5A FF 36 07 02 08 01 EE means that the phantom power of input channel 8 is turned on.

The command returns:

1
Response bit
0x00/0x01

Response bit: 0x00 means writing is successful, 1: 0x01 means writing failed.

Phantom power status read

Function code: 0x06

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x07

8	9	10
Data length	Channel No.	Frame end
0x01	0x01 - 0x08	0xEE

Read and write bits: 0x63.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

The command returns:

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x07

8	9	10	11
Data length	Channel No.	Phantom power switch	Frame end
0x02	0x01 - 0x08	0x00/0x01	0xEE

Read and write bits: 0x63.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

Phantom power switch: 0x01 means phantom power is turned on, 0x00 means phantom power is turned off.

Example: The machine returns A5 C3 3C 5A FF 63 07 02 05 00 EE, which means that the phantom power of input channel 5 is off.

2.3.9 Feedback suppression level setting

Function code: 0x08

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x08

8	9	10	11
Data length	Channel No.	Feedback suppression level	Frame end
0x02	0x01 - 0x08	0x00/0x01/0x02	0xEE

Read and write bits: 0x36.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

Feedback suppression level: 0x00 means feedback suppression is off, 0x01 means feedback suppression level 1, and 0x02 means feedback suppression level 2

Note: When the Line/Mic input is Line, the feedback suppression level setting is invalid.

Example: A5 C3 3C 5A FF 36 08 02 01 02 EE means to set the feedback suppression level of input channel 1 to level 2.

The command returns:

1
Response bit
0x00/0x01

Response bit: 0x00 means writing is successful, 1: 0x01 means writing failed.

Feedback suppression status reading

Function code: 0x08

1	2	3	4	5	6	7
---	---	---	---	---	---	---

Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x08

8	9	10
Data length	Channel No.	Frame end
0x01	0x01 - 0x08	0xEE

Read and write bits: 0x63.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

The command returns:

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x08

8	9	10	11
Data length	Channel No.	Feedback suppression level	Frame end
0x02	0x01 - 0x08	0x00/0x01/0x02	0xEE

Read and write bits: 0x63.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

Feedback suppression level: 0x00 means feedback suppression is off, 0x01 means feedback suppression level 1, and 0x02 means feedback suppression level 2.

Example: The machine returns A5 C3 3C 5A FF 63 08 02 02 01 EE, indicating that the feedback suppression level of input channel 2 is level 1.

2.3.10 Matrix mixing settings

Function code: 0x09

1	2	3	4	5	6	7
---	---	---	---	---	---	---

Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x36	0x09

8	9	10	11	12
Data length	Input channel No.	Output channel No.	Route on/off	Frame end
0x03	0x01 - 0x08	0x01 - 0x08	0x01/0x00	0xEE

Read and write bits: 0x36.

Input channel number: 0x01 means input channel 1, and 0x08 means input channel 8.

Output channel number: 0x01 means output channel 1, and 0x08 means output channel 8.

Route on/off: 0x01 means route on, 0x00 means route off.

Note: When the input channel has been connected to the corresponding output channel through automatic mixing, setting this input and output channel connection is invalid. Example: A5 C3 3C 5A FF 36 09 03 02 01 01 EE means to set the input channel 2-output channel 1 to be routed on.

The command returns:

1
Response bit
0x00/0x01

Response bit: 0x00 means writing is successful, 1: 0x01 means writing failed.

Matrix mixing status read

Function code: 0x09

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x09

8	9	10	11
Data length	Input channel No.	Output channel No.	Frame end
0x02	0x01 - 0x08	0x01 - 0x08	0xEE

Read and write bits: 0x63.

Channel number: 0x01 means channel 1, and 0x08 means channel 8.

The command returns:

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x09

8	9	10	11	12
Data length	Channel No.	Feedback suppression level	Route on/off	Frame end
0x03	0x01 - 0x08	0x01 - 0x08	0x01/0x00	0xEE

Read and write bits: 0x63.

Input channel number: 0x01 means input channel 1, and 0x08 means input channel 8.

Output channel number: 0x01 means output channel 1, and 0x08 means output channel 8.

Route on/off: 0x01 means route on, 0x00 means route off.

Example: The machine returns A5 C3 3C 5A FF 63 09 03 01 05 00 EE, indicating that the input channel 1-output channel 5 route is disconnected.

2.3.11 Camera position return

When the machine sets the camera tracking function through the host computer, when the input channel detects the sound input and meets the setting requirements, the machine will return to the position where the camera should be set (turned) through the serial port.

Function code: 0x0A

1	2	3	4	5	6	7
Frame header				ID	Read and write	Function code
0xA5	0xC3	0x3C	0x5A	0xFF	0x63	0x0A

8	9	10
---	---	----

Data length	Camera position	Frame end
0x01	0x00 - 0x08	0xEE

Read and write bits: 0x63.

Camera position: 0x00 indicates the default position, 0x01 indicates the position corresponding to input channel 1, and 0x08 indicates the position corresponding to input channel 8.

Example: A5 C3 3C 5A FF 63 0A 01 08 EE means that the camera should be set (turned) to the position corresponding to input channel 8.

3 Attachment: Commonly used central control commands

3.1 Scene (preset) management

3.1.1 Scene recall

Scene recall 1(Factory default scene)	A5 C3 3C 5A FF 36 02 01 01 EE
Scene recall 2	A5 C3 3C 5A FF 36 02 01 02 EE
Scene recall 3	A5 C3 3C 5A FF 36 02 01 03 EE
Scene recall 4	A5 C3 3C 5A FF 36 02 01 04 EE
Scene recall 5	A5 C3 3C 5A FF 36 02 01 05 EE
Scene recall 6	A5 C3 3C 5A FF 36 02 01 06 EE
Scene recall 7	A5 C3 3C 5A FF 36 02 01 07 EE
Scene recall 8	A5 C3 3C 5A FF 36 02 01 08 EE
Scene recall 9	A5 C3 3C 5A FF 36 02 01 09 EE
Scene recall 10	A5 C3 3C 5A FF 36 02 01 0A EE
Scene recall 11	A5 C3 3C 5A FF 36 02 01 0B EE
Scene recall 12	A5 C3 3C 5A FF 36 02 01 0C EE
Scene recall 13	A5 C3 3C 5A FF 36 02 01 0D EE
Scene recall 14	A5 C3 3C 5A FF 36 02 01 0E EE
Scene recall 15	A5 C3 3C 5A FF 36 02 01 0F EE
Scene recall 16	A5 C3 3C 5A FF 36 02 01 10 EE
Scene recall 17	A5 C3 3C 5A FF 36 02 01 11 EE
Scene recall 18	A5 C3 3C 5A FF 36 02 01 12 EE
Scene recall 19	A5 C3 3C 5A FF 36 02 01 13 EE
Scene recall 20	A5 C3 3C 5A FF 36 02 01 14 EE
Scene recall 21	A5 C3 3C 5A FF 36 02 01 15 EE
Scene recall 22	A5 C3 3C 5A FF 36 02 01 16 EE
Scene recall 23	A5 C3 3C 5A FF 36 02 01 17 EE
Scene recall 24	A5 C3 3C 5A FF 36 02 01 18 EE
Scene recall 25	A5 C3 3C 5A FF 36 02 01 19 EE
Scene recall 26	A5 C3 3C 5A FF 36 02 01 1A EE
Scene recall 27	A5 C3 3C 5A FF 36 02 01 1B EE
Scene recall 28	A5 C3 3C 5A FF 36 02 01 1C EE
Scene recall 29	A5 C3 3C 5A FF 36 02 01 1D EE
Scene recall 30	A5 C3 3C 5A FF 36 02 01 1E EE

3.1.2 Scene (preset) read

Read current preset	A5 C3 3C 5A FF 63 02 00 EE
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3.2 Mute control

3.2.1 Input output channel mute

Input channel 1 mute	A5 C3 3C 5A FF 36 03 03 01 01 01 EE
Input channel 2 mute	A5 C3 3C 5A FF 36 03 03 01 02 01 EE
Input channel 3 mute	A5 C3 3C 5A FF 36 03 03 01 03 01 EE
Input channel 4 mute	A5 C3 3C 5A FF 36 03 03 01 04 01 EE
Input channel 5 mute	A5 C3 3C 5A FF 36 03 03 01 05 01 EE
Input channel 6 mute	A5 C3 3C 5A FF 36 03 03 01 06 01 EE
Input channel 7 mute	A5 C3 3C 5A FF 36 03 03 01 07 01 EE
Input channel 8 mute	A5 C3 3C 5A FF 36 03 03 01 08 01 EE
Input channel 1 unmute	A5 C3 3C 5A FF 36 03 03 01 01 00 EE
Input channel 2 unmute	A5 C3 3C 5A FF 36 03 03 01 02 00 EE
Input channel 3 unmute	A5 C3 3C 5A FF 36 03 03 01 03 00 EE
Input channel 4 unmute	A5 C3 3C 5A FF 36 03 03 01 04 00 EE
Input channel 5 unmute	A5 C3 3C 5A FF 36 03 03 01 05 00 EE
Input channel 6 unmute	A5 C3 3C 5A FF 36 03 03 01 06 00 EE
Input channel 7 unmute	A5 C3 3C 5A FF 36 03 03 01 07 00 EE
Input channel 8 unmute	A5 C3 3C 5A FF 36 03 03 01 08 00 EE
Total output mute	A5 C3 3C 5A FF 36 03 03 02 00 01 EE
Total output unmute	A5 C3 3C 5A FF 36 03 03 02 00 00 EE
Output channel 3 mute	A5 C3 3C 5A FF 36 03 03 02 03 01 EE
Output channel 4 mute	A5 C3 3C 5A FF 36 03 03 02 04 01 EE
Output channel 5 mute	A5 C3 3C 5A FF 36 03 03 02 05 01 EE
Output channel 6mute	A5 C3 3C 5A FF 36 03 03 02 06 01 EE
Output channel 7 mute	A5 C3 3C 5A FF 36 03 03 02 07 01 EE
Output channel 8 mute	A5 C3 3C 5A FF 36 03 03 02 08 01 EE
Output channel 1 unmute	A5 C3 3C 5A FF 36 03 03 02 01 00 EE
Output channel 2 unmute	A5 C3 3C 5A FF 36 03 03 02 02 00 EE
Output channel 3 unmute	A5 C3 3C 5A FF 36 03 03 02 03 00 EE
Output channel 4 unmute	A5 C3 3C 5A FF 36 03 03 02 04 00 EE
Output channel 5 unmute	A5 C3 3C 5A FF 36 03 03 02 05 00 EE
Output channel 6 unmute	A5 C3 3C 5A FF 36 03 03 02 06 00 EE
Output channel 7 unmute	A5 C3 3C 5A FF 36 03 03 02 07 00 EE
Output channel 8 unmute	A5 C3 3C 5A FF 36 03 03 02 08 00 EE

3.2.2 Input and output channels Mute status read

Read the mute status of input channel 1	A5 C3 3C 5A FF 63 03 02 01 01 EE
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3.3 Input and output channel volume gain setting

Input channel 1 volume gain is set to -20.0dB	A5 C3 3C 5A FF 36 04 04 01 05 69 00 EE
The volume gain of output channel 8 is set to 6.0dB	A5 C3 3C 5A FF 36 04 04 02 08 3C 00 EE

3.3.1 Input and output channel volume gain volume reading

Read input channel 1 volume gain	A5 C3 3C 5A FF 63 04 02 01 01 EE
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3.4 Input and output volume gain increase and decrease

Input channel 1 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 01 00 0A EE
Input channel 2 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 02 00 0A EE
Input channel 3 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 03 00 0A EE
Input channel 4 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 04 00 0A EE
Input channel 5 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 05 00 0A EE
Input channel 6 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 06 00 0A EE
Input channel 7 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 07 00 0A EE
Input channel 8 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 08 00 0A EE
Input channel 1 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 01 01 0A EE
Input channel 2 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 02 01 0A EE
Input channel 3 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 03 01 0A EE
Input channel 4 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 04 01 0A EE
Input channel 5 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 05 01 0A EE
Input channel 6 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 06 01 0A EE

Input channel 7 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 07 01 0A EE
Input channel 8 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 01 08 01 0A EE
Output channel 1 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 01 00 0A EE
Output channel 2 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 02 00 0A EE
Output channel 3 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 03 00 0A EE
Output channel 4 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 04 00 0A EE
Output channel 5 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 05 00 0A EE
Output channel 6 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 06 00 0A EE
Output channel 7 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 07 00 0A EE
Output channel 8 volume gain increased by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 08 00 0A EE
Output channel 1 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 01 01 0A EE
Output channel 2 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 02 01 0A EE
Output channel 3 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 03 01 0A EE
Output channel 4 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 04 01 0A EE
Output channel 5 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 05 01 0A EE
Output channel 6 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 06 01 0A EE
Output channel 7 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 07 01 0A EE
Output channel 8 volume gain reduced by 1.0dB	A5 C3 3C 5A FF 36 05 04 00 08 01 0A EE

3.5 Line/Mic Switch settings

Input channel 1 set Line input	A5 C3 3C 5A FF 36 06 02 01 01 EE
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Input channel 2 set Line input	A5 C3 3C 5A FF 36 06 02 02 01 EE
Input channel 3 set Line input	A5 C3 3C 5A FF 36 06 02 03 01 EE
Input channel 4 set Line input	A5 C3 3C 5A FF 36 06 02 04 01 EE
Input channel 5 set Line input	A5 C3 3C 5A FF 36 06 02 05 01 EE
Input channel 6 set Line input	A5 C3 3C 5A FF 36 06 02 06 01 EE
Input channel 7 set Line input	A5 C3 3C 5A FF 36 06 02 07 01 EE
Input channel 8 set Line input	A5 C3 3C 5A FF 36 06 02 08 01 EE
Input channel 1 set Mic input	A5 C3 3C 5A FF 36 06 02 01 00 EE
Input channel 2 set Mic input	A5 C3 3C 5A FF 36 06 02 02 00 EE
Input channel 3 set Mic input	A5 C3 3C 5A FF 36 06 02 03 00 EE
Input channel 4 set Mic input	A5 C3 3C 5A FF 36 06 02 04 00 EE
Input channel 5 set Mic input	A5 C3 3C 5A FF 36 06 02 05 00 EE
Input channel 6 set Mic input	A5 C3 3C 5A FF 36 06 02 06 00 EE
Input channel 7 set Mic input	A5 C3 3C 5A FF 36 06 02 07 00 EE
Input channel 8 set Mic input	A5 C3 3C 5A FF 36 06 02 08 00 EE

3.5.1 Line/Mic Status read

Read the Line/Mic status of input channel 1	A5 C3 3C 5A FF 63 06 01 01 EE
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3.6 Phantom power settings

Set input channel 1 phantom power on	A5 C3 3C 5A FF 36 07 02 01 01 EE
Set input channel 2 phantom power on	A5 C3 3C 5A FF 36 07 02 02 01 EE
Set input channel 3 phantom power on	A5 C3 3C 5A FF 36 07 02 03 01 EE
Set input channel 4 phantom power on	A5 C3 3C 5A FF 36 07 02 04 01 EE
Set input channel 5 phantom power on	A5 C3 3C 5A FF 36 07 02 05 01 EE
Set input channel 6 phantom power on	A5 C3 3C 5A FF 36 07 02 06 01 EE
Set input channel 7 phantom power on	A5 C3 3C 5A FF 36 07 02 07 01 EE
Set input channel 8 phantom power on	A5 C3 3C 5A FF 36 07 02 08 01 EE
Set input channel 1 phantom power off	A5 C3 3C 5A FF 36 07 02 01 00 EE
Set input channel 2 phantom power off	A5 C3 3C 5A FF 36 07 02 02 00 EE
Set input channel 3 phantom power off	A5 C3 3C 5A FF 36 07 02 03 00 EE
Set input channel 4 phantom power off	A5 C3 3C 5A FF 36 07 02 04 00 EE
Set input channel 5 phantom power off	A5 C3 3C 5A FF 36 07 02 05 00 EE
Set input channel 6 phantom power off	A5 C3 3C 5A FF 36 07 02 06 00 EE
Set input channel 7 phantom power off	A5 C3 3C 5A FF 36 07 02 07 00 EE
Set input channel 8 phantom power off	A5 C3 3C 5A FF 36 07 02 08 00 EE

3.6.1 Phantom power status read

Read the phantom power state of input channel 1	A5 C3 3C 5A FF 63 07 01 01 EE
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3.7 Feedback suppression settings

Turn off the feedback suppression state of input channel 1	A5 C3 3C 5A FF 36 08 02 01 00 EE
Turn off the feedback suppression state of input channel 2	A5 C3 3C 5A FF 36 08 02 02 00 EE
Turn off the feedback suppression state of input channel 3	A5 C3 3C 5A FF 36 08 02 03 00 EE
Turn off the feedback suppression state of input channel 4	A5 C3 3C 5A FF 36 08 02 04 00 EE
Turn off the feedback suppression state of input channel 5	A5 C3 3C 5A FF 36 08 02 05 00 EE
Turn off the feedback suppression state of input channel 6	A5 C3 3C 5A FF 36 08 02 06 00 EE
Turn off the feedback suppression state of input channel 7	A5 C3 3C 5A FF 36 08 02 07 00 EE
Turn off the feedback suppression state of input channel 8	A5 C3 3C 5A FF 36 08 02 08 00 EE
Set the feedback suppression level 1 of input channel 1	A5 C3 3C 5A FF 36 08 02 01 01 EE
Set the feedback suppression level 1 of input channel 2	A5 C3 3C 5A FF 36 08 02 02 01 EE
Set the feedback suppression level 1 of input channel 3	A5 C3 3C 5A FF 36 08 02 03 01 EE
Set the feedback suppression level 1 of input channel 4	A5 C3 3C 5A FF 36 08 02 04 01 EE
Set the feedback suppression level 1 of input channel 5	A5 C3 3C 5A FF 36 08 02 05 01 EE
Set the feedback suppression level 1 of input channel 6	A5 C3 3C 5A FF 36 08 02 06 01 EE
Set the feedback suppression level 1 of input channel 7	A5 C3 3C 5A FF 36 08 02 07 01 EE
Set the feedback suppression level 1 of input channel 8	A5 C3 3C 5A FF 36 08 02 08 01 EE
Set the feedback suppression level 1 of input channel 1	A5 C3 3C 5A FF 36 08 02 01 02 EE

Set the feedback suppression level 1 of input channel 2	A5 C3 3C 5A FF 36 08 02 02 02 EE
Set the feedback suppression level 1 of input channel 3	A5 C3 3C 5A FF 36 08 02 03 02 EE
Set the feedback suppression level 1 of input channel 4	A5 C3 3C 5A FF 36 08 02 04 02 EE
Set the feedback suppression level 1 of input channel 5	A5 C3 3C 5A FF 36 08 02 05 02 EE
Set the feedback suppression level 1 of input channel 6	A5 C3 3C 5A FF 36 08 02 06 02 EE
Set the feedback suppression level 1 of input channel 7	A5 C3 3C 5A FF 36 08 02 07 02 EE
Set the feedback suppression level 1 of input channel 8	A5 C3 3C 5A FF 36 08 02 08 02 EE

3.7.1 Feedback suppression status read

Read the feedback inhibition status of input channel 1	A5 C3 3C 5A FF 63 08 01 01 EE
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3.8 Matrix mixing settings

Set input channel 1-output channel 1 connected	A5 C3 3C 5A FF 36 09 03 01 01 01 EE
Set input channel 1-output channel 2 connected	A5 C3 3C 5A FF 36 09 03 01 02 01 EE
Set input channel 1-output channel 3 connected	A5 C3 3C 5A FF 36 09 03 01 03 01 EE
Set input channel 1-output channel 4 connected	A5 C3 3C 5A FF 36 09 03 01 04 01 EE
Set input channel 1-output channel 5 connected	A5 C3 3C 5A FF 36 09 03 01 05 01 EE
Set input channel 1-output channel 6 connected	A5 C3 3C 5A FF 36 09 03 01 06 01 EE
Set input channel 1-output channel 7 connected	A5 C3 3C 5A FF 36 09 03 01 07 01 EE
Set input channel 1-output channel 8 connected	A5 C3 3C 5A FF 36 09 03 01 08 01 EE
Set input channel 1-output channel 1 disconnected	A5 C3 3C 5A FF 36 09 03 01 01 00 EE
Set input channel 1-output channel 2	A5 C3 3C 5A FF 36 09 03 01 02 00 EE

disconnected	
Set input channel 1-output channel 3 disconnected	A5 C3 3C 5A FF 36 09 03 01 03 00 EE
Set input channel 1-output channel 4 disconnected	A5 C3 3C 5A FF 36 09 03 01 04 00 EE
Set input channel 1-output channel 5 disconnected	A5 C3 3C 5A FF 36 09 03 01 05 00 EE
Set input channel 1-output channel 6 disconnected	A5 C3 3C 5A FF 36 09 03 01 06 00 EE
Set input channel 1-output channel 7 disconnected	A5 C3 3C 5A FF 36 09 03 01 07 00 EE
Set input channel 1-output channel 8 disconnected	A5 C3 3C 5A FF 36 09 03 01 08 00 EE

3.8.1 Matrix mixing status read

Read the connection status of input channel 1-output channel 1	A5 C3 3C 5A FF 63 09 02 01 01 EE
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3.9 Camera position return

Turned back to the default position	A5 C3 3C 5A FF 63 0A 01 00 EE
Turned to the position corresponding to channel 1	A5 C3 3C 5A FF 63 0A 01 01 EE
Turned to the position corresponding to channel 2	A5 C3 3C 5A FF 63 0A 01 02 EE
Turned to the position corresponding to channel 3	A5 C3 3C 5A FF 63 0A 01 03 EE
Turned to the position corresponding to channel 4	A5 C3 3C 5A FF 63 0A 01 04 EE
Turned to the position corresponding to channel 5	A5 C3 3C 5A FF 63 0A 01 05 EE
Turned to the position corresponding to channel 6	A5 C3 3C 5A FF 63 0A 01 06 EE
Turned to the position corresponding to channel 7	A5 C3 3C 5A FF 63 0A 01 07 EE
Turned to the position corresponding to channel 8	A5 C3 3C 5A FF 63 0A 01 08 EE