

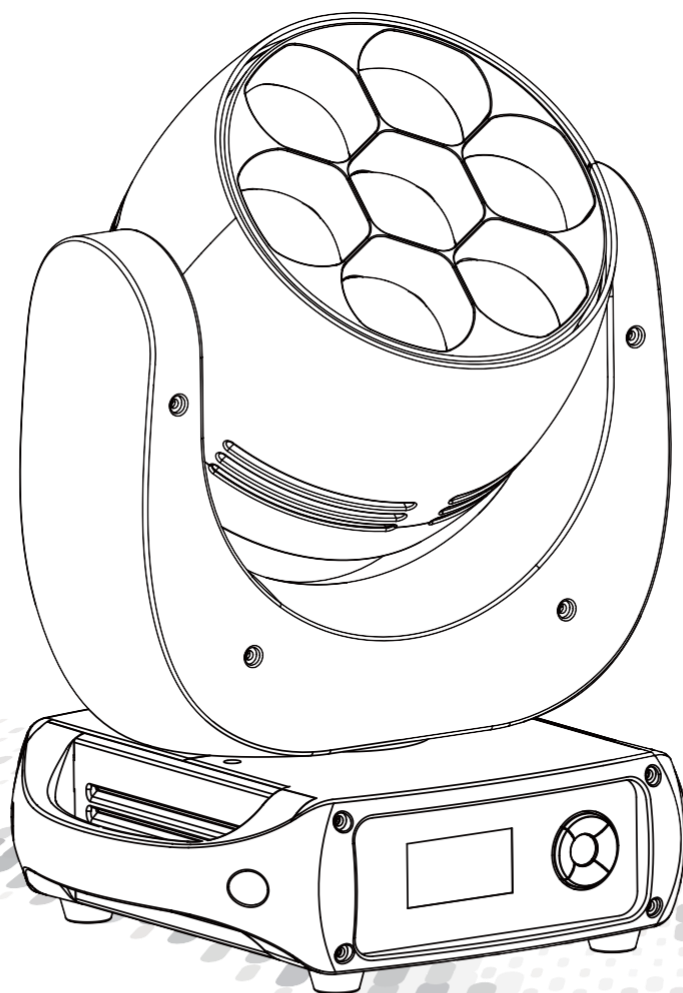
# SHOWPRO

## PLUTO 2000 XE/CCS3

### USER MANUAL

LEDMOV530

LEDMOV535



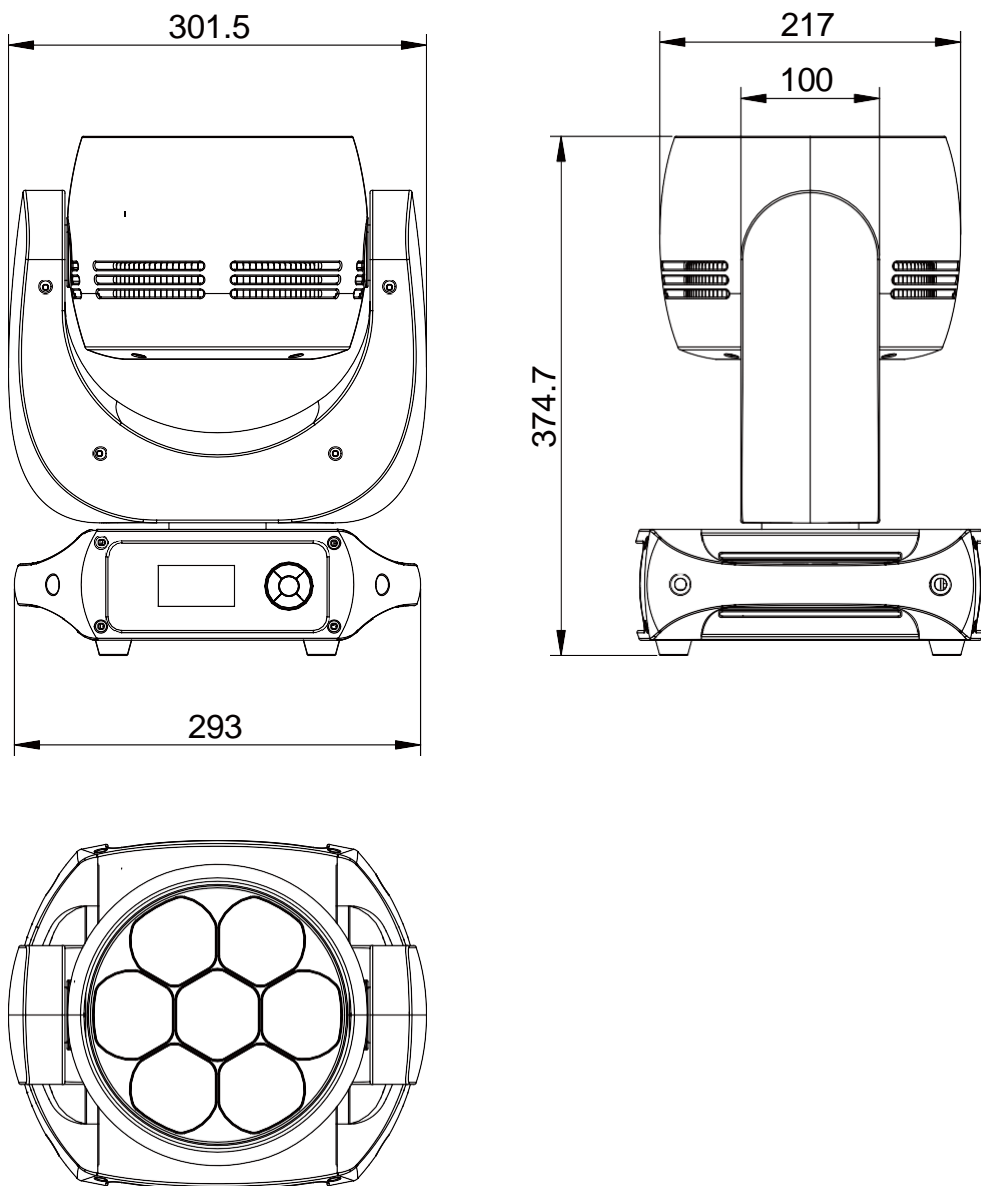
# 1 PRODUCT SPECIFICATIONS

## 1.1 PRODUCT SPECIFICATIONS

### Electrical

- ◆ Voltage:100V-240V~, 50/60Hz
- ◆ Max Power:300W
- ◆ Size:375x302x251mm
- ◆ Weight:9.3kg

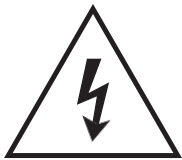
## 1.2 PRODUCT FEATURES



## 1.3 SAFETY WARNING

### IMPORTANT:

- This product must be installed by a qualified professional.
- All maintenance must be carried out by a qualified electrician.
- A minimum distance of 0.5m must be maintained between the equipment and a combustible surface.
- The product must always be operated in a well ventilated area.
- DO NOT stare directly into the LED light source.
- Always disconnect the power before carrying out any maintenance.
- The earth must always be connected to the ground.
- Ensure that all parts of the equipment are kept clean and free of dust.
- Do not open the fixture or remove any cover. Refer any service operation not described in this manual to an authorized Show Technology Service Centre

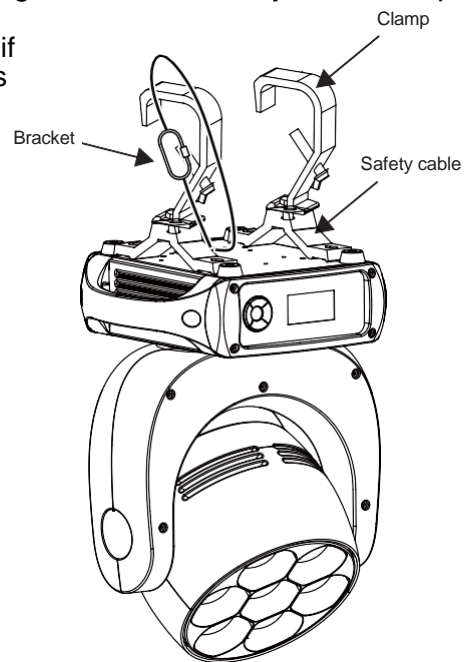
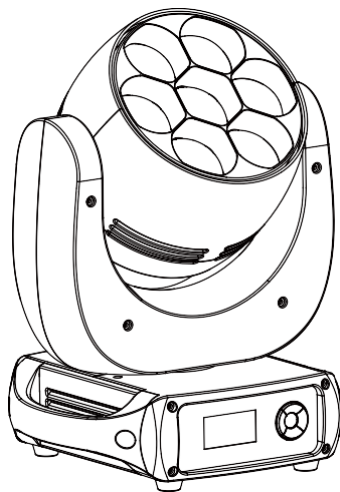


Caution, risk of electric shock  
The light source contained in this luminaire shall only be replaced by the manufacturer or his service agent or a similar qualified person.

## 2 INSTALLATION

### 2.1 MOUNTING:

- The fixture can be mounted in any position.
- Always ensure that mounting surface can withstand 10 times the weight of the fixture.
- Always use a safety cable when mounting the fixture in any elevated position.
- Contact your ShowPRO supplier for assistance if you have any questions about how to install this product safely.



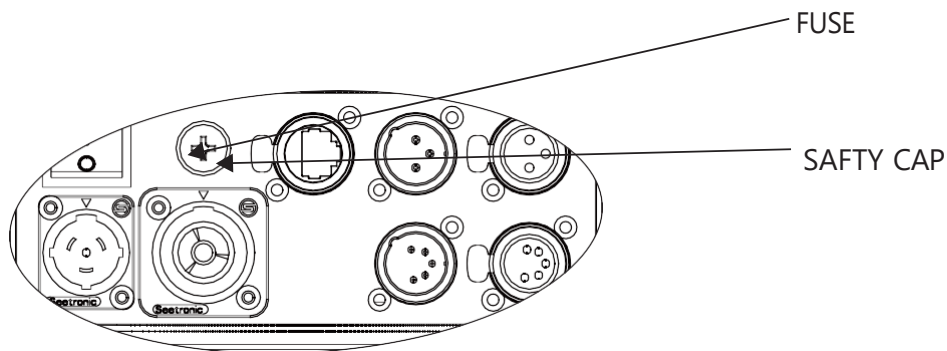
### **IMPORTANT SAFETY NOTE!!**

Always use a safety cable when installing this unit!!

Be sure that the safety cable is connected to a solid load-bearing structure.

### 2.2 FUSE REPLACEMENT

- Remove the safety cap by a screwdriver.
- Fetch the old fuse from safety cap.
- Install a new fuse.
- Install the safety cap.



## 2.3 POWER CONNECTIONS

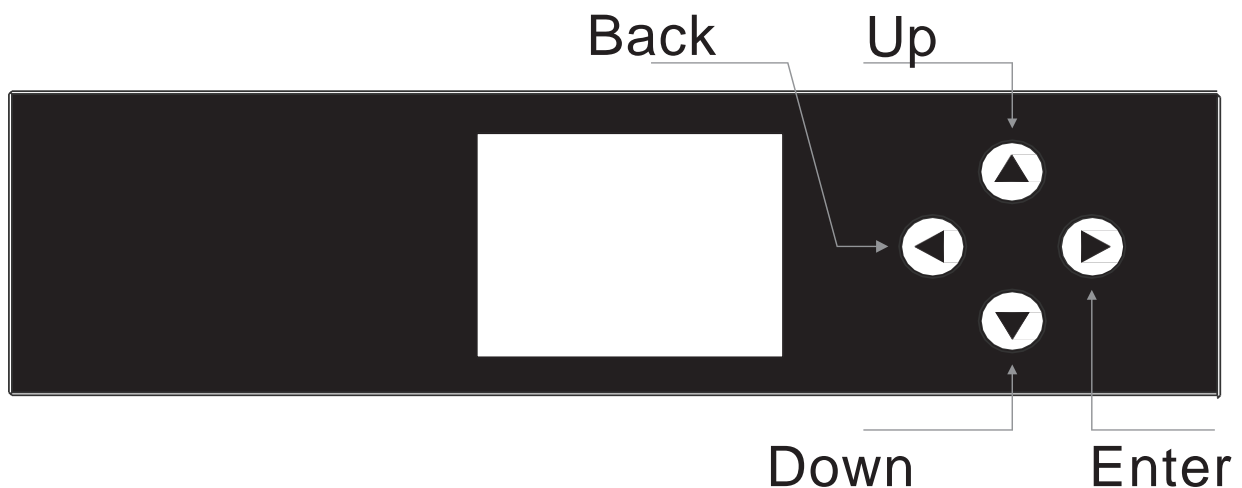
- 220~240V: 6 units may be connected in series
- 110~120V: 3 units may be connected in series

**Note:**

If the signal cable is over 60m between the DMX512 controller and fixture or between two fixtures, then a DMX signal amplifier is needed as well.

# 3 DISPLAY PANEL OPERATION

## 3.1 DISPLAY OPERATION



<UP> Scroll 'UP' through the menu list or increase the value of the current function.

<DOWN> Scroll 'DOWN' through the menu list or decrease the value of the current function.

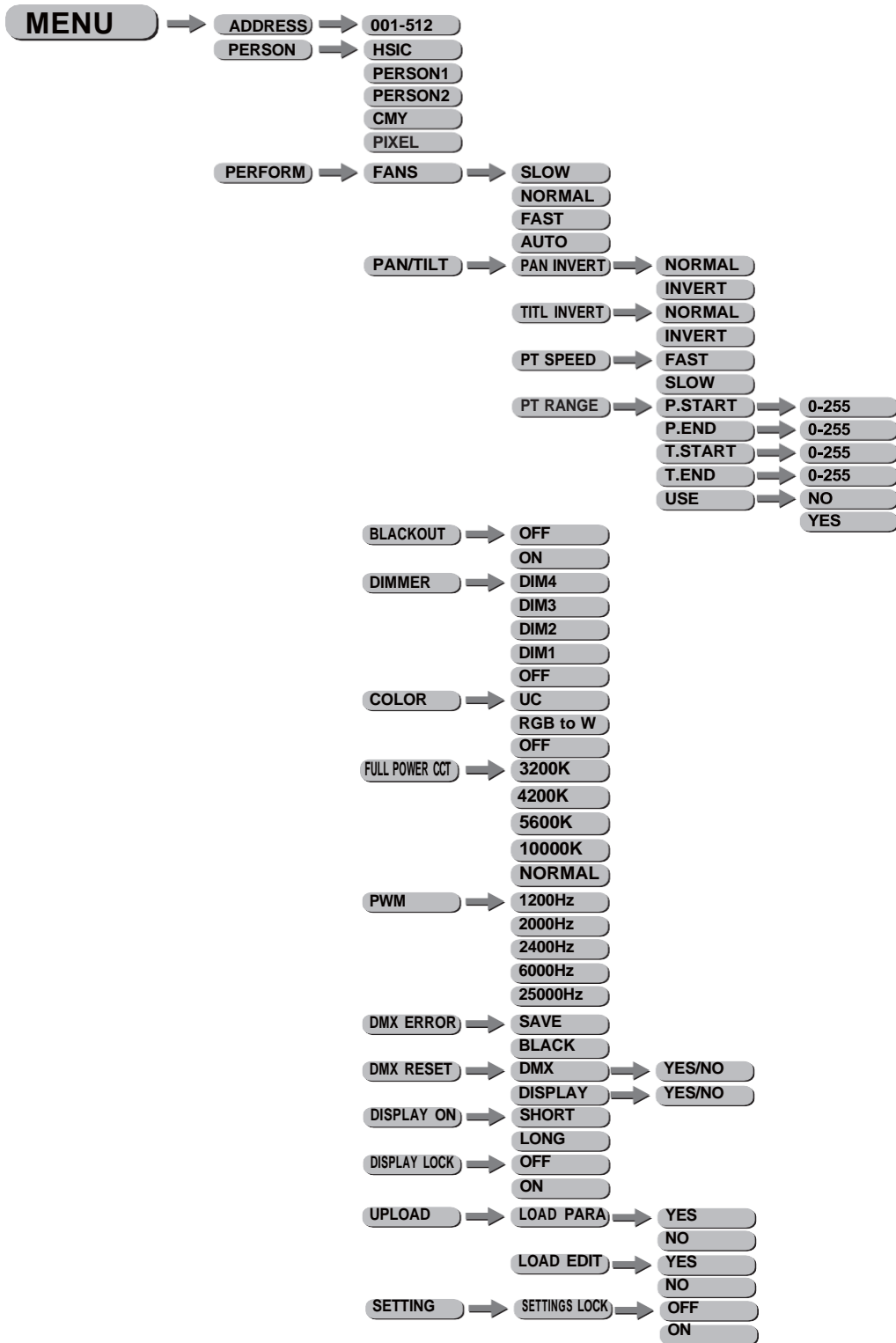
<BACK> Scroll through the main menu or exit current function.

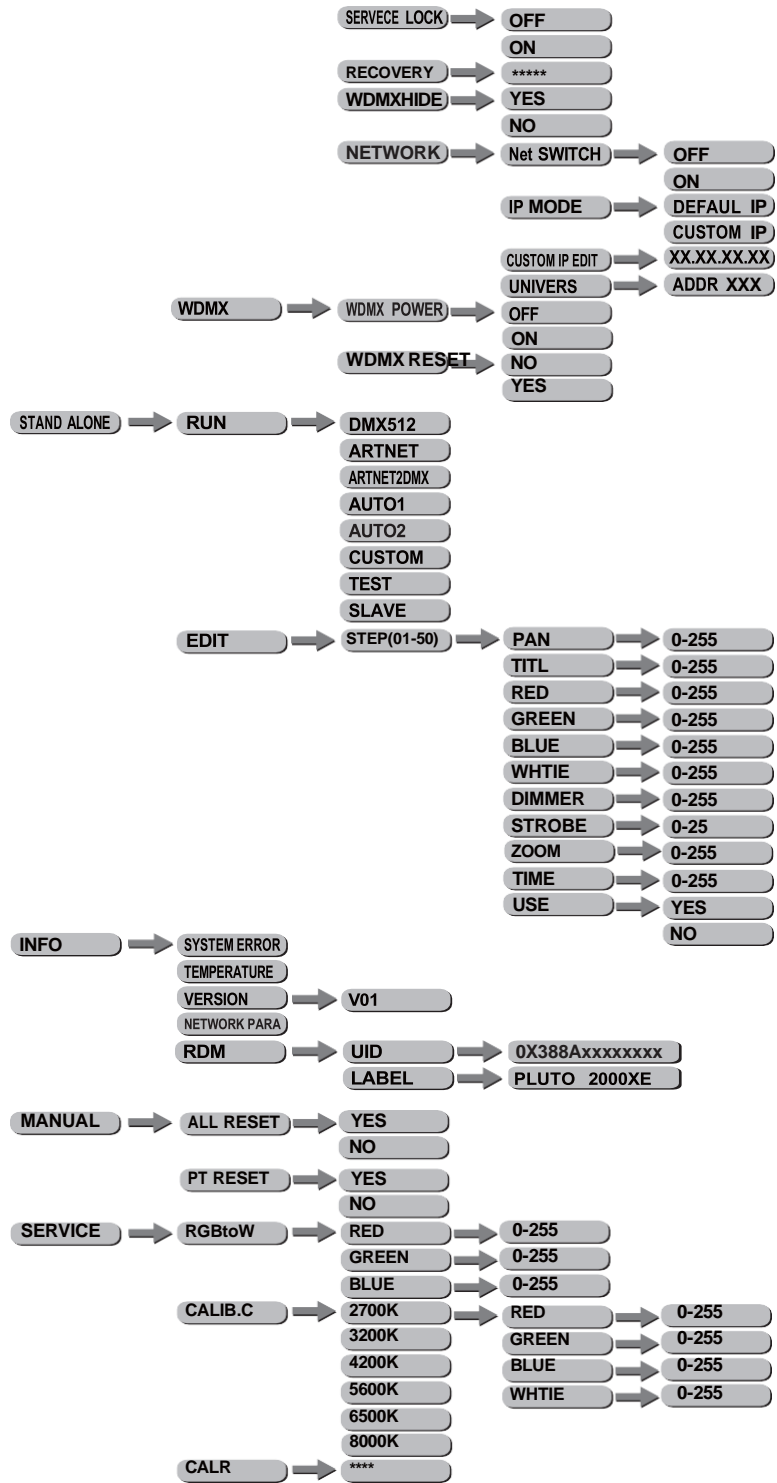
<ENTER> Enter the currently selected menu or confirm the current function value.

To Unlock (Wake) the display:

1. Keep pressing BACK around 5 seconds, until the display shows password prompt
2. Press "<UP> <DOWN><UP><DOWN><ENTER>" to unlock.

### 3.2 MENU MAP



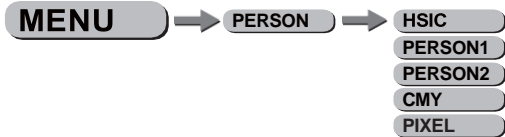


### 3.3 DMX512 SETTINGS



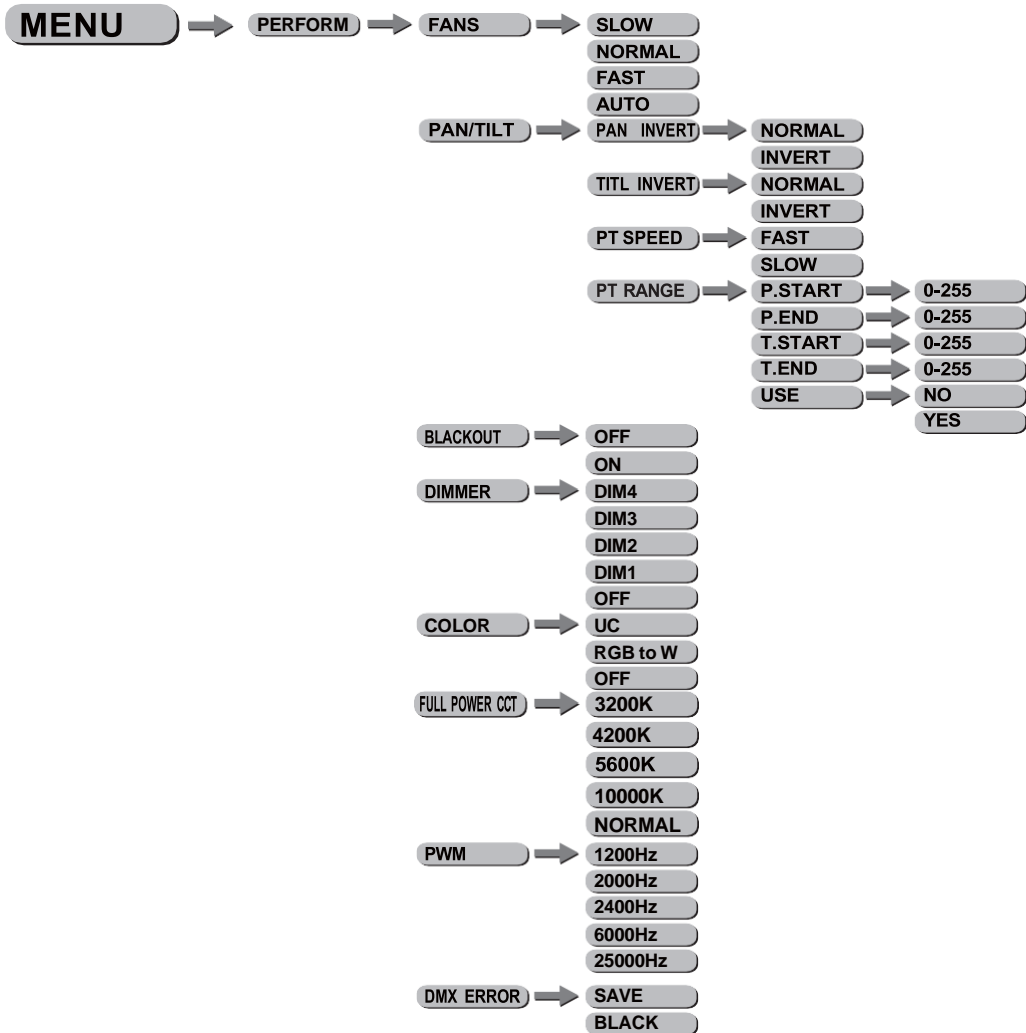
- Enter the **【DMX】** mode to set the DMX ADDRESS.

### 3.4 PERSONALITY

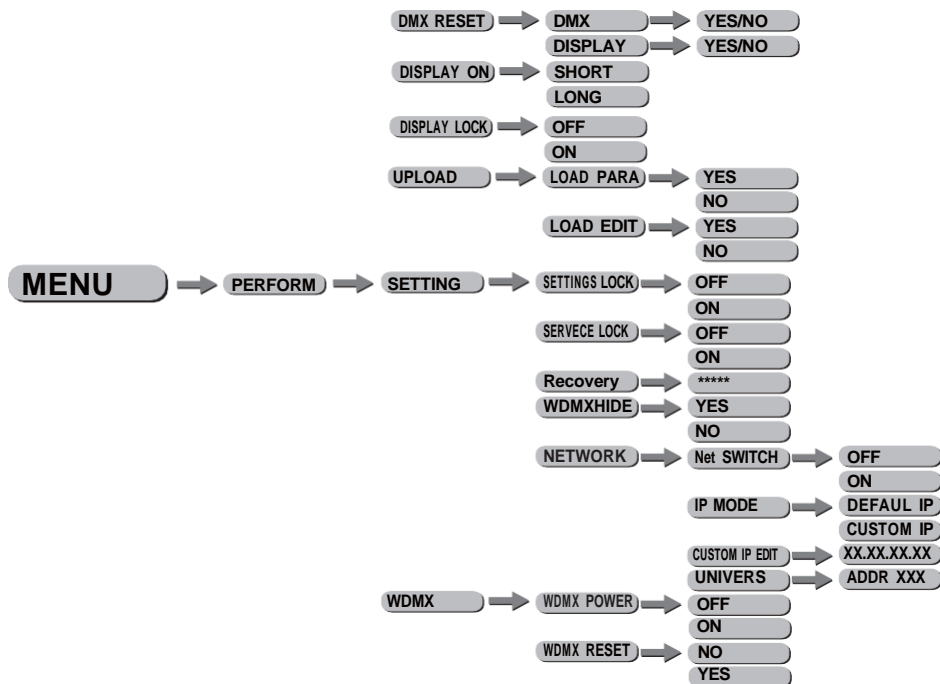


- Enter the **【PERSON】** mode to select DMX mode: **【HSIC】** , **【PERSON1】** , **【PERSON2】** , **【CMY】** , **【PIXEL】** ,

### 3.5 PERFORM



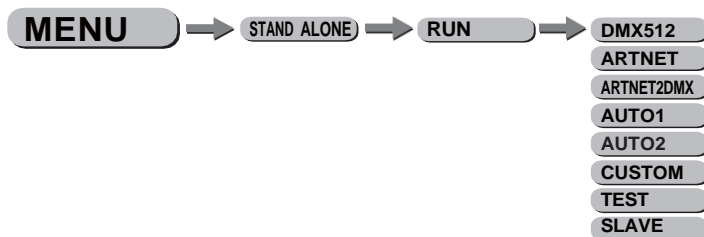




- **【FANS】** menu, select **【Slow/Norm/Fast/Auto】** as required fan speed.
- **【PAN INVERT】** menu, select **【NORM/INVERT】** for normal/inverted control of the PAN function
- **【TILT INVERT】** menu, select **【NORM/INVERT】** for normal/inverted control of the TILT function
- **【PT SPEED】** menu, select **【Slow/Fast】** as required PAN/TILT movement speed.
- **【BLACKD】** menu, select **【OFF】** for immediate activation of PAN/TILT blackout when selected using the control channel or **【ON】** for 3 second delay before activation.
- **【DIMMER】** menu for selection of **【DIM1/DIM2/DIM3/DIM4/OFF】** special dimming curves
- **【COLOR】** is for activate/unactivate the color calibration functions. When **[RGBtoW]** is selected, on RGB = 255,255,255, the color is displayed as calibrated in Service -- RGBtoW. When **[COLOR]** is set **[OFF]**, on RGB = 255,255,255, the RGB values are not adjusted and the output is most powerful. When **[UC]** is selected, the RGB output are adjusted to a standard preset universal color which balances fixtures from different generations.
- **【FULL POWER CCT】** is the color temperature choose bottom, press UP/DOWN to choose, under full power, <3200K>, <4200K>, <5600K>, <10000K> can be chosen, when choose <COLOR>, <3200K>, <4200K>, <5600K>, <10000K> are not work, but choose <NORMAL>.
- **【PWM】** is PWM refresh rate bottom, press UP/DOWN to choose <1200Hz>, <2000Hz>, <2400Hz>, <6000Hz>, <25000Hz>  
Note: with refresh rate increased, gray rate of dimmer will be reduced

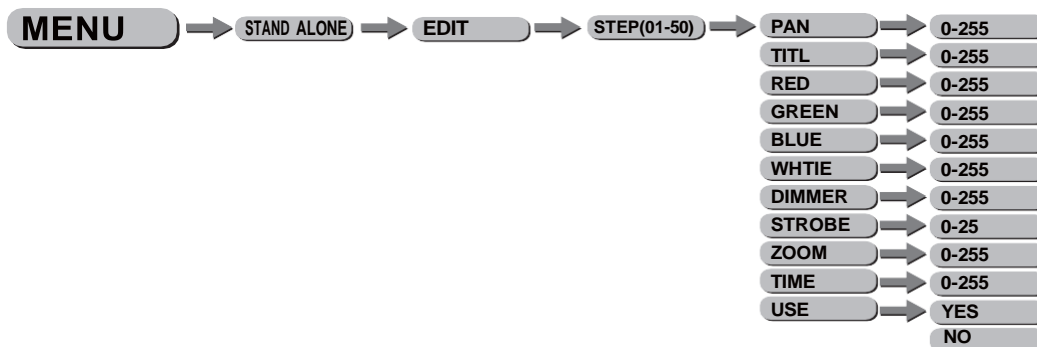
- **【DMXERROR】** menu, select **【SAVE】** to maintain last command in case of DMX error or **【BLACK】** for blackout
- **【DMXRESET】** menu, select **【DMX】** to allow remote reset using DMX controller or **【DISPLAY】** for reset only available at on-fixture display
- **【DISPLAY ON】** menu, select **【LONG/SHORT/DISPLAY LOCK】** for length of time for display backlight
- **【UPLOAD】** upload data setting, choose **【LOAD PARA】** to upload data, choose **【NO】** means do not upload data choose **【YES】** means upload data, choose **【LOAD EDIT】** to program, choose **【NO】** means do not upload, choose **【YES】** means upload
- **【SETTING】** is a protect bottom, **【SETTINGS LOCK】** is the menu lock bottom, choose **【OFF】** means the menu lock bottom is off, choose **【ON】** means the menu lock bottom is on **【RECOVERY】** is the recover to default value. Press **【ENTER】** to password setting, press correct password **【UP+DOWN+UP+DOWN】** ,and press **【ENTER】** ,if password is correct, display will show **【OK】** ,
- **【NET SWITCH】** is net switch, OFF adhere to 2.XX.XX.XX , ON adhere to 2.XX.XX.XX, **【IP MODE】** is IP mode setting, "DEFAULT IP" is default IP, CUSTOM IP is user IP, **【CUSTOM IP SET】** is customer IP setting, **【UNIVERS】** is data bulk setting, output series 0-255
- **【WDMX】** setting , choose **【WDMX POWER】** to turn on/off the DMX , choose **【OFF】** to turn off it . **【ON】** to turn on it . Choose **【WDMX RESET】** to reset the DMX , choose **【NO】** , then DMX will not reset , **【YES】** , then DMX will reset

### 3.6 RUN



- Enter the **【STAND ALONE】** menu to select from **【DMX512/ARTNET/ARTNET2DMX/AUTO 1/AUTO 2/CUSTOM/TEST/SLAVE】** run modes

### 3.7 EDIT



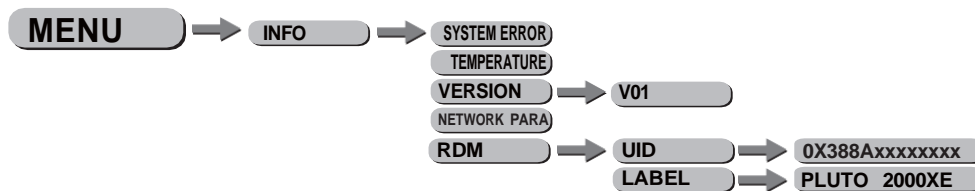
- Enter the **【 EDIT 】** mode to edit the custom programs by adjusting the value of **【 PAN 】** , **【 TILT 】** , **【 RED 】** , **【 GREEN 】** , **【 BLUE 】** , **【 WHITE 】** , **【 DIMMER 】** , **【 STROBE 】** , **【 ZOOM 】** , **【 TIME 】**
- Enter **【 USE 】** and select **【 YES 】** to run the steps user need.

**Note:** if user want to circulate the created steps, please set the last step 's **【 Time 】** as 0

For example, there are 3 steps, the setting should be like belowed:

Step 1 **【 Time 】** = 4    **【 Use 】** = Yes  
 Step 2 **【 Time 】** = 5    **【 Use 】** = Yes  
 Step 3 **【 Time 】** = 0    **【 Use 】** = Yes

### 3.8 INFO



- push **【 OK 】** button into the information search mode in menu **【 INFO 】** , push **【 up/down 】** to choose item.

Choose **【 SYSTEM ERROR 】** system data error .

Choose **【 TEMPERATURE 】** LED working temperature

Choose **【 VERSION 】** software version

Choose **【 NETWORK PARA 】** check network specification

Choose **【 RDM 】** check the fixture ID

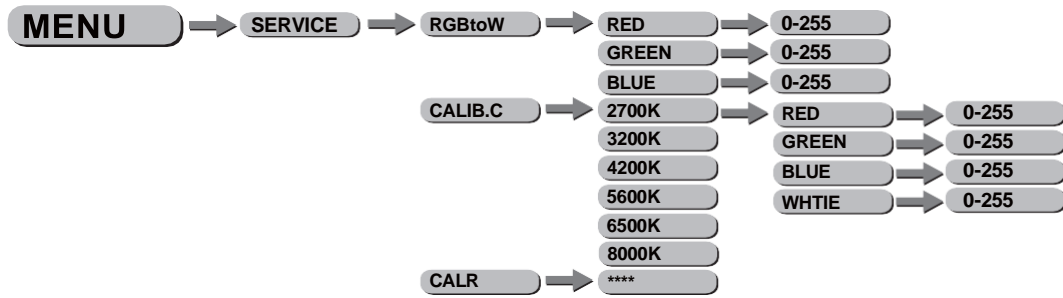
Choose **【 LABEL 】** check model name

### 3.9 MANUAL



- Select **【 RESET 】** from the **【 MANUAL 】** menu
- **【 ALL RESET 】** menu, select **【 YES/NO 】** to carry out full fixture reset
- **【 PT RESET 】** menu, select **【 YES/NO 】** to carry out PAN/TILT reset

### 3.10 SERVICE



- ◆ Enter the **【RGBtoW】** to adjust the RGB parameter to make different whites.
- ◆ When the new setting is activated, the DMX controller choose RGB = 255,255,255 the white color will be made by the actual RGB values on the **【RGBtoW】** .
- ◆ Enter the **【CALIB】** to select white color of different color temperature.
- ◆ There are 11 pre-programmed White colors plus RGB TO WHITE and can be edited by using **【RED】** , **【GREEN】** , **【BLUE】** & **【WHITE】** .
- ◆ Press **【ENTER】** to find **【CALR】** CCT reset , press passcode (Up +Down+ Up+ Down) , then **【SUCCESS】** will be shown

## 4 USING A DMX512 CONTROLLER

### 4.1 CHANNEL ASSIGNMENT

Note: This product has five DMX512 channel configurations: **【HSIC】**, **【PERSON1】**, **【PERSON2】**, **【CMY】**, **【PIXEL】**.

Note: [PERSON2] has different channels for the XE and CCS3 versions

#### HSIC

CHANNEL	VALUE	FUNCTION
1	000 – 255	PAN
2	000 – 255	PAN FINE
3	000 – 255	TILT
4	000 – 255	TILT FINE
5	000 – 255	PT SPEED
6	000 – 255	INTENSITY
7	000 – 255	HUE
8	000 – 255	HUE FINE
9	000 – 255	SATURATION
10		CCT
	000 – 009	NO FUNCTION
	010 – 040	2700K
	041 – 080	3200K
	081 – 120	4200K
	121 – 160	5600K
	161 – 200	6500K
	201 – 255	8000K
11		STROBE
	000 – 009	NO FUNCTION
	010 – 099	STROBE (SLOW TO FAST, 0 – 25Hz)
	100 – 109	NO FUNCTION
	110 – 179	LIGHTNING STROBE
	180 – 189	NO FUNCTION
	190 – 255	RANDOM STROBE
12	000 – 255	ZOOM
13		CONTROL
	000 - 009	NO FUNCTION
	010 – 019	PAN/TILT BLACKOUT ON

	020 – 029	PAN/TILT BLACKOUT OFF
	030 – 039	FAN SLOW
	040 – 049	FAN NORMAL
	050 – 059	FAN FAST
	060 – 069	FAN AUTO
	070 – 079	AUTO1
	080 – 089	AUTO2
	090 – 099	CUSTOM
	100 – 109	TEST
	110 – 119	RESET
	120 – 129	NO FUNCTION
	130 – 139	DIM0
	140 – 149	DIM1
	150 – 159	DIM2
	160 – 169	DIM3
	170 – 179	DIM4
	180 – 255	NO FUNCTION

## PERSON1

CHANNEL	VALUE	FUNCTION
1	000 – 255	PAN
2	000 – 255	TILT
3	000 – 255	RED
4	000 – 255	GREEN
5	000 – 255	BLUE
6	000 – 255	WHITE
7	000 – 255	DIMMER
8		MACROS
	000 – 009	NO FUNCTION
	010 – 029	RED 100% / GREEN UP / BLUE 0%
	030 – 049	RED DOWN / GREEN 100% / BLUE UP
	050 – 069	RED 0% / GREEN 100% / BLUE UP
	070 – 089	RED 0% / GREEN DOWN / BLUE 100%
	090 – 109	RED UP / GREEN 0% / BLUE 100%
	110 – 129	RED 100% / GREEN 0% / BLUE DOWN

	130 – 149	RED 100% / GREEN UP / BLUE UP
	150 – 169	RED DOWN / GREEN DOWN / BLUE 100%
	170 – 189	ALL LED FULL OUTPUT
	190 – 199	2700K
	200 – 209	3200K
	210 – 219	4200K
	220 – 229	5600K
	230 – 239	6500K
	240 – 255	8000K
9		A SINGLE POINT
	000 – 007	NO FUNCTION
	008 – 011	1
	012 – 015	2
	016 – 019	3
	020 – 023	4
	024 – 027	5
	028 – 031	6
	032 – 035	7
	036 – 039	2,3
	040 – 043	4,5
	044 – 047	6,7
	048 – 051	2,5
	052 – 055	3,6
	056 – 059	4,7
	060 – 063	2,3,4
	064 – 067	5,6,7
	068 – 071	1,2,3
	072 – 075	1,4,5
	076 – 079	1,6,7
	080 – 083	1,2,5
	084 – 087	1,3,6
	088 – 091	1,4,7
	092 – 095	3,5,7
	096 – 099	5,6,7
	100 – 103	1,3,5,7
	104 – 107	1,5,6,7
108 – 111	1,2,4,5,7	
112 – 115	1,2,3,5,6	
116 – 119	1,3,4,6,7	
120 – 123	2,3,4,5,6,7	

	124 – 127	BLACK
	128 – 135	ALL ON
	136 – 145	2-3-4-5-6-7
	146 – 155	2,3-4,5-6,7
	156 – 165	2,5-3,6-4-7
	166 – 175	1,2-1,3-1,4-1,5-1,6-1,7
	176 – 185	2,3,4-5,6,7
	186 – 195	1,2,3-1,4,5-1,6,7
	196 – 205	1,2,5-1,3,6-1,4,7
	206 – 215	2,5,7-1,4,6
	216 – 225	2,3,4-3,4,5-4,5,6-5,6,7-6,7,2-7,2,3
	226 – 235	1,2,3,5,6-1,3,4,6,7-1,4,5,7
	236 – 245	1,2,3,5,6-1,3,4,6,7-1,4,5,7,2
	246 – 255	1-2,3,4,5,6,7
10	000 – 255	AUTO SPEED (SLOW TO FAST)
		STROBE
	000 – 009	NO FUNCTION
	010 – 099	STROBE (SLOW TO FAST, 0 – 25Hz)
11	100 – 109	NO FUNCTION
	110 – 179	LIGHTNING STROBE
	180 – 189	NO FUNCTION
	190 – 255	RANDOM STROBE
12	000 – 255	ZOOM
		CONTROL
	000 - 009	NO FUNCTION
	010 – 019	PAN/TILT BLACKOUT ON
	020 – 029	PAN/TILT BLACKOUT OFF
	030 – 039	FAN SLOW
	040 – 049	FAN NORMAL
	050 – 059	FAN FAST
	060 – 069	FAN AUTO
13	070 – 079	AUTO1
	080 – 089	AUTO2
	090 – 099	CUSTOM
	100 – 109	TEST
	110 – 119	RESET
	120 – 129	NO FUNCTION
	130 – 139	DIM0
	140 – 149	DIM1
	150 – 159	DIM2



	160 – 169	DIM3
	170 – 179	DIM4
	180 – 255	NO FUNCTION

### PERSON2 (XE)

CHANNEL	VALUE	FUNCTION
1	000 – 255	PAN
2	000 – 255	PAN FINE
3	000 – 255	TILT
4	000 – 255	TILT FINE
5	000 – 255	PT SPEED
6	000 – 255	RED
7	000 – 255	RED FINE
8	000 – 255	GREEN
9	000 – 255	GREEN FINE
10	000 – 255	BLUE
11	000 – 255	BLUE FINE
12	000 – 255	WHITE
13	000 – 255	WHITE FINE
14	000 – 255	DIMMER
15	000 – 255	DIMMER FINE
16		MACROS
	000 – 009	NO FUNCTION
	010 – 029	RED 100% / GREEN UP / BLUE 0%
	030 – 049	RED DOWN / GREEN 100% / BLUE UP
	050 – 069	RED 0% / GREEN 100% / BLUE UP
	070 – 089	RED 0% / GREEN DOWN / BLUE 100%
	090 – 109	RED UP / GREEN 0% / BLUE 100%
	110 – 129	RED 100% / GREEN 0% / BLUE DOWN
	130 – 149	RED 100% / GREEN UP / BLUE UP
	150 – 169	RED DOWN / GREEN DOWN / BLUE 100%
	170 – 189	ALL LED FULL OUTPUT
	190 – 199	2700K
	200 – 209	3200K

	210 – 219	4200K
	220 – 229	5600K
	230 – 239	6500K
	240 – 255	8000K
17		A SINGLE POINT
	000 – 007	NO FUNCTION
	008 – 011	1
	012 – 015	2
	016 – 019	3
	020 – 023	4
	024 – 027	5
	028 – 031	6
	032 – 035	7
	036 – 039	2,3
	040 – 043	4,5
	044 – 047	6,7
	048 – 051	2,5
	052 – 055	3,6
	056 – 059	4,7
	060 – 063	2,3,4
	064 – 067	5,6,7
	068 – 071	1,2,3
	072 – 075	1,4,5
	076 – 079	1,6,7
	080 – 083	1,2,5
	084 – 087	1,3,6
	088 – 091	1,4,7
	092 – 095	3,5,7
	096 – 099	5,6,7
	100 – 103	1,3,5,7
	104 – 107	1,5,6,7
	108 – 111	1,2,4,5,7
	112 – 115	1,2,3,5,6
	116 – 119	1,3,4,6,7
	120 – 123	2,3,4,5,6,7
	124 – 127	BLACK
128 – 135	ALL ON	
136 – 145	2-3-4-5-6-7	
146 – 155	2,3-4,5-6,7	
156 – 165	2,5-3,6-4-7	

	166 – 175	1,2-1,3-1,4-1,5-1,6-1,7
	176 – 185	2,3,4-5,6,7
	186 – 195	1,2,3-1,4,5-1,6,7
	196 – 205	1,2,5-1,3,6-1,4,7
	206 – 215	2,5,7-1,4,6
	216 – 225	2,3,4-3,4,5-4,5,6-5,6,7-6,7,2-7,2,3
	226 – 235	1,2,3,5,6-1,3,4,6,7-1,4,5,7
	236 – 245	1,2,3,5,6-1,3,4,6,7-1,4,5,7,2
	246 – 255	1-2,3,4,5,6,7
18	000 – 255	AUTO SPEED (SLOW TO FAST)
		STROBE
	000 – 009	NO FUNCTION
	010 – 099	STROBE (SLOW TO FAST, 0 – 25Hz)
19	100 – 109	NO FUNCTION
	110 – 179	LIGHTNING STROBE
	180 – 189	NO FUNCTION
	190 – 255	RANDOM STROBE
20	000 – 255	ZOOM
		CONTROL
	000 - 009	NO FUNCTION
	010 – 019	PAN/TILT BLACKOUT ON
	020 – 029	PAN/TILT BLACKOUT OFF
	030 – 039	FAN SLOW
	040 – 049	FAN NORMAL
	050 – 059	FAN FAST
	060 – 069	FAN AUTO
	070 – 079	AUTO1
	080 – 089	AUTO2
21	090 – 099	CUSTOM
	100 – 109	TEST
	110 – 119	RESET
	120 – 129	NO FUNCTION
	130 – 139	DIM0
	140 – 149	DIM1
	150 – 159	DIM2
	160 – 169	DIM3
	170 – 179	DIM4
	180 – 255	NO FUNCTION

**PERSON2 (CCS3)**

<b>CHANNEL</b>	<b>VALUE</b>	<b>FUNCTION</b>
1	000 – 255	PAN
2	000 – 255	PAN FINE
3	000 – 255	TILT
4	000 – 255	TILT FINE
5	000 – 255	PT SPEED
6	000 – 255	RED
7	000 – 255	RED FINE
8	000 – 255	GREEN
9	000 – 255	GREEN FINE
10	000 – 255	BLUE
11	000 – 255	BLUE FINE
12	000 – 255	WHITE
13	000 – 255	WHITE FINE
14	000 – 255	DIMMER
15	000 – 255	DIMMER FINE
16	000 – 255	PRESET COLOUR (See Annex 1)
17		CCT
	000 – 009	NO FUNCTION
	010 – 040	2700K
	041 – 080	3200K
	081 – 120	4200K
	121 – 160	5600K
	161 – 200	6500K
	201 – 255	8000K
18		A SINGLE POINT
	000 – 007	NO FUNCTION
	008 – 011	1
	012 – 015	2
	016 – 019	3
	020 – 023	4
	024 – 027	5
	028 – 031	6
	032 – 035	7
	036 – 039	2,3
	040 – 043	4,5
	044 – 047	6,7

	048 – 051	2,5
	052 – 055	3,6
	056 – 059	4,7
	060 – 063	2,3,4
	064 – 067	5,6,7
	068 – 071	1,2,3
	072 – 075	1,4,5
	076 – 079	1,6,7
	080 – 083	1,2,5
	084 – 087	1,3,6
	088 – 091	1,4,7
	092 – 095	3,5,7
	096 – 099	5,6,7
	100 – 103	1,3,5,7
	104 – 107	1,5,6,7
	108 – 111	1,2,4,5,7
	112 – 115	1,2,3,5,6
	116 – 119	1,3,4,6,7
	120 – 123	2,3,4,5,6,7
	124 – 127	BLACK
	128 – 135	ALL ON
	136 – 145	2-3-4-5-6-7
	146 – 155	2,3-4,5-6,7
	156 – 165	2,5-3,6-4-7
	166 – 175	1,2-1,3-1,4-1,5-1,6-1,7
	176 – 185	2,3,4-5,6,7
	186 – 195	1,2,3-1,4,5-1,6,7
	196 – 205	1,2,5-1,3,6-1,4,7
	206 – 215	2,5,7-1,4,6
	216 – 225	2,3,4-3,4,5-4,5,6-5,6,7-6,7,2-7,2,3
	226 – 235	1,2,3,5,6-1,3,4,6,7-1,4,5,7
	236 – 245	1,2,3,5,6-1,3,4,6,7-1,4,5,7,2
	246 – 255	1-2,3,4,5,6,7
19	000 – 255	AUTO SPEED (SLOW TO FAST)
		STROBE
20	000 – 009	NO FUNCTION
	010 – 099	STROBE (SLOW TO FAST, 0 – 25Hz)
	100 – 109	NO FUNCTION
	110 – 179	LIGHTNING STROBE
	180 – 189	NO FUNCTION

	190 – 255	RANDOM STROBE
21	000 – 255	ZOOM
22		CONTROL
	000 - 009	NO FUNCTION
	010 – 019	PAN/TILT BLACKOUT ON
	020 – 029	PAN/TILT BLACKOUT OFF
	030 – 039	FAN SLOW
	040 – 049	FAN NORMAL
	050 – 059	FAN FAST
	060 – 069	FAN AUTO
	070 – 079	AUTO1
	080 – 089	AUTO2
	090 – 099	CUSTOM
	100 – 109	TEST
	110 – 119	RESET
	120 – 129	NO FUNCTION
	130 – 139	DIM0
	140 – 149	DIM1
	150 – 159	DIM2
	160 – 169	DIM3
170 – 179	DIM4	
	180 – 255	NO FUNCTION

CMY

CHANNEL	VALUE	FUNCTION
1	000 – 255	PAN
2	000 – 255	PAN FINE
3	000 – 255	TILT
4	000 – 255	TILT FINE
5	000 – 255	PT SPEED
6	000 – 255	CYAN
7	000 – 255	MAGENTA
8	000 – 255	YELLOW
9	000 – 255	DIMMER

10		MACROS
	000 – 009	NO FUNCTION
	010 – 029	RED 100% / GREEN UP / BLUE 0%
	030 – 049	RED DOWN / GREEN 100% / BLUE UP
	050 – 069	RED 0% / GREEN 100% / BLUE UP
	070 – 089	RED 0% / GREEN DOWN / BLUE 100%
	090 – 109	RED UP / GREEN 0% / BLUE 100%
	110 – 129	RED 100% / GREEN 0% / BLUE DOWN
	130 – 149	RED 100% / GREEN UP / BLUE UP
	150 – 169	RED DOWN / GREEN DOWN / BLUE 100%
	170 – 189	ALL LED FULL OUTPUT
	190 – 199	2700K
	200 – 209	3200K
	210 – 219	4200K
	220 – 229	5600K
	230 – 239	6500K
	240 – 255	8000K
11		A SINGLE POINT
	000 – 007	NO FUNCTION
	008 – 011	1
	012 – 015	2
	016 – 019	3
	020 – 023	4
	024 – 027	5
	028 – 031	6
	032 – 035	7
	036 – 039	2,3
	040 – 043	4,5
	044 – 047	6,7
	048 – 051	2,5
	052 – 055	3,6
	056 – 059	4,7
	060 – 063	2,3,4
	064 – 067	5,6,7
	068 – 071	1,2,3
	072 – 075	1,4,5
	076 – 079	1,6,7
080 – 083	1,2,5	
084 – 087	1,3,6	
088 – 091	1,4,7	

	092 – 095	3,5,7
	096 – 099	5,6,7
	100 – 103	1,3,5,7
	104 – 107	1,5,6,7
	108 – 111	1,2,4,5,7
	112 – 115	1,2,3,5,6
	116 – 119	1,3,4,6,7
	120 – 123	2,3,4,5,6,7
	124 – 127	BLACK
	128 – 135	ALL ON
	136 – 145	2-3-4-5-6-7
	146 – 155	2,3-4,5-6,7
	156 – 165	2,5-3,6-4-7
	166 – 175	1,2-1,3-1,4-1,5-1,6-1,7
	176 – 185	2,3,4-5,6,7
	186 – 195	1,2,3-1,4,5-1,6,7
	196 – 205	1,2,5-1,3,6-1,4,7
	206 – 215	2,5,7-1,4,6
	216 – 225	2,3,4-3,4,5-4,5,6-5,6,7-6,7,2-7,2,3
	226 – 235	1,2,3,5,6-1,3,4,6,7-1,4,5,7
	236 – 245	1,2,3,5,6-1,3,4,6,7-1,4,5,7,2
	246 – 255	1-2,3,4,5,6,7
		STROBE
12	000 – 009	NO FUNCTION
	010 – 099	STROBE (SLOW TO FAST, 0 – 25Hz)
	100 – 109	NO FUNCTION
	110 – 179	LIGHTNING STROBE
	180 – 189	NO FUNCTION
	190 – 255	RANDOM STROBE
13	000 – 255	ZOOM
		CONTROL
14	000 - 009	NO FUNCTION
	010 – 019	PAN/TILT BLACKOUT ON
	020 – 029	PAN/TILT BLACKOUT OFF
	030 – 039	FAN SLOW
	040 – 049	FAN NORMAL
	050 – 059	FAN FAST
	060 – 069	FAN AUTO
	070 – 079	AUTO1
	080 – 089	AUTO2



	090 – 099	CUSTOM
	100 – 109	TEST
	110 – 119	RESET
	120 – 129	NO FUNCTION
	130 – 139	DIM0
	140 – 149	DIM1
	150 – 159	DIM2
	160 – 169	DIM3
	170 – 179	DIM4
	180 – 255	NO FUNCTION

PIXEL

CHANNEL	VALUE	FUNCTION
1	000 – 255	PAN
2	000 – 255	PAN FINE
3	000 – 255	TILT
4	000 – 255	TILT FINE
5	000 – 255	PT SPEED
6	000 – 255	DIMMER
7		STROBE
	000 – 009	NO FUNCTION
	010 – 099	STROBE (SLOW TO FAST, 0 – 25Hz)
	100 – 109	NO FUNCTION
	110 – 179	LIGHTNING STROBE
	180 – 189	NO FUNCTION
	190 – 255	RANDOM STROBE
8	000 – 255	ZOOM
9		CONTROL
	000 - 009	NO FUNCTION
	010 – 019	PAN/TILT BLACKOUT ON
	020 – 029	PAN/TILT BLACKOUT OFF
	030 – 039	FAN SLOW
	040 – 049	FAN NORMAL
	050 – 059	FAN FAST
	060 – 069	FAN AUTO
	070 – 079	AUTO1

	080 – 089	AUTO2
	090 – 099	CUSTOM
	100 – 109	TEST
	110 – 119	RESET
	120 – 129	NO FUNCTION
	130 – 139	DIM0
	140 – 149	DIM1
	150 – 159	DIM2
	160 – 169	DIM3
	170 – 179	DIM4
	180 – 255	NO FUNCTION
10	000 – 255	RED1
11	000 – 255	BLUE1
12	000 – 255	GREEN1
13	000 – 255	WHITE1
14	000 – 255	RED2
15	000 – 255	BLUE2
16	000 – 255	GREEN2
17	000 – 255	WHITE2
18	000 – 255	RED3
19	000 – 255	BLUE3
20	000 – 255	GREEN3
21	000 – 255	WHITE3
22	000 – 255	RED4
23	000 – 255	BLUE4
24	000 – 255	GREEN4
25	000 – 255	WHITE4
26	000 – 255	RED5
27	000 – 255	BLUE5
28	000 – 255	GREEN5
29	000 – 255	WHITE5
30	000 – 255	RED6
31	000 – 255	BLUE6
32	000 – 255	GREEN6
33	000 – 255	WHITE6
34	000 – 255	RED7
35	000 – 255	BLUE7
36	000 – 255	GREEN7
37	000 – 255	WHITE7

## Annex 1

PRESET COLOR	Value	Color Names	x	y
	0-10	NO FUNCTION		
COLOR 1	11-15	L176 Loving Amber	0.407	0.321
COLOR 2	16-20	R40 Light Salmon	0.499	0.321
COLOR 3	21-25	L24 Scarlet	0.561	0.296
COLOR 4	26-30	L164 Flame Red	0.659	0.302
COLOR 5	31-35	L747 Easy White	0.389	0.344
COLOR 6	36-40	R303 Warm Peach	0.448	0.353
COLOR 7	41-45	L08 Dark Salmon	0.498	0.347
COLOR 8	46-50	L25 Sunset Red	0.566	0.359
COLOR 9	51-55	L04 Medium Bastard Amber	0.37	0.335
COLOR 10	56-60	L237 CID (To Tungsten)	0.43	0.365
COLOR 11	61-65	R321 Soft Golden Amber	0.477	0.406
COLOR 12	66-70	L652 Urban Sodium	0.535	0.399
COLOR 13	71-75	L212 LCT Yellow(Y1)	0.34	0.363
COLOR 14	76-80	L765 LEE Yellow	0.389	0.412
COLOR 15	81-85	L513 Ice And A Slice	0.38	0.447
COLOR 16	86-90	L100 Spring Yellow	0.41	0.502
COLOR 17	91-95	L244 LEE Plus Green	0.324	0.388
COLOR 18	96-100	R4430 CalColor 30 Green	0.318	0.44
COLOR 19	101-105	L122 Fern Green	0.234	0.543
COLOR 20	106-110	L90 Dark Yellow Green	0.184	0.641
COLOR 21	111-115	L243 LEE Fluorescent3600K	0.286	0.37
COLOR 22	116-120	R92 Turquoise	0.235	0.36
COLOR 23	121-125	R94 Kelly Green	0.185	0.459
COLOR 24	126-130	L327 Forest Green	0.162	0.496
COLOR 25	131-135	L191 Cosmetic Aqua Blue	0.3	0.318
COLOR 26	136-140	L728 Steel Green	0.256	0.302
COLOR 27	141-145	L117 Steel Blue	0.223	0.278
COLOR 28	146-150	L354 Special Steel Blue	0.173	0.265
COLOR 29	151-155	L53 Paler Lavender	0.284	0.284
COLOR 30	156-160	L501 New Colour Blue	0.246	0.249
COLOR 31	161-165	L174 Dark Steel Blue	0.204	0.205
COLOR 32	166-170	L165 Daylight Blue	0.159	0.158
COLOR 33	171-175	L136 Pale Lavender	0.288	0.254
COLOR 34	176-180	L194 Surprise Pink	0.24	0.183
COLOR 35	181-185	L142 Pale Violet	0.209	0.148
COLOR 36	186-190	L700 Perfect Lavender	0.177	0.07
COLOR 37	191-195	L35 Light Pink	0.335	0.289
COLOR 38	196-200	L794 Pretty'n Pink	0.335	0.251
COLOR 39	201-205	L328 Follies Pink	0.335	0.18
COLOR 40	206-210	L795 Magical Magenta	0.327	0.138
COLOR 41	211-215	L154 Pale Rose	0.35	0.318
COLOR 42	216-220	L127 Smokey Pink	0.397	0.265
COLOR 43	221-225	L192 Flesh Pink	0.41	0.237
COLOR 44	226-230	L332 Special Rose Pink	0.465	0.193
COLOR 45	231-235	L790 Moroccan Pink	0.378	0.324
COLOR 46	236-240	L157 Pink	0.457	0.272
COLOR 47	241-245	R332 Cherry Rose	0.489	0.295
COLOR 48	246-250	L128 Cool LED Bright Pink	0.57	0.263
	251-255	NO FUNCTION		