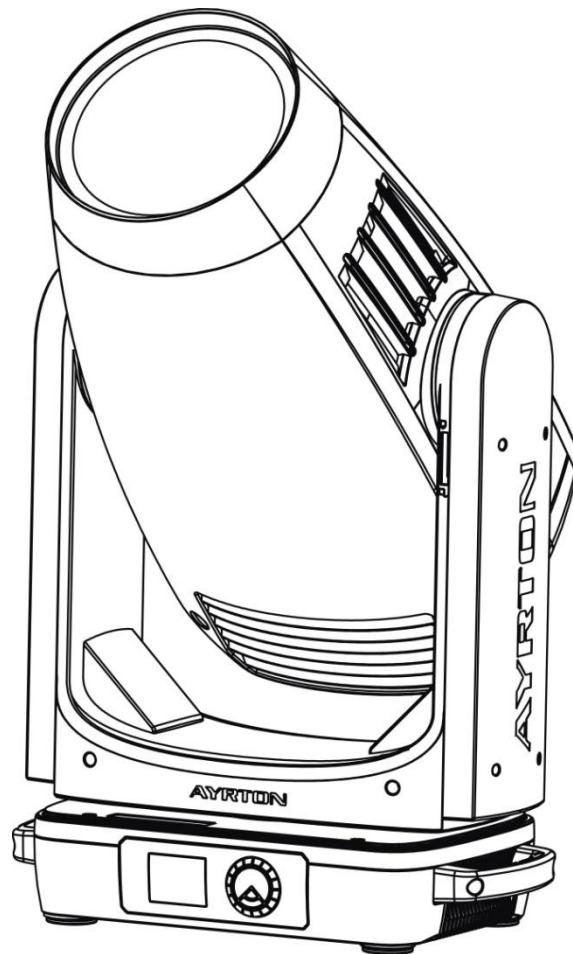




*User Manual*



**huracán<sup>LT</sup>**

KEEP THIS MANUAL FOR FUTURE NEEDS



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# 1. SAFETY INSTRUCTIONS


## 1.1. IMPORTANT SAFETY WARNING

This device has left the factory in perfect condition. In order to maintain this condition and to ensure safe operation, it is absolutely necessary for the user to follow the safety instructions and warning notes written in this user manual.

In order to install, operate, and maintain the lighting fixture safely and correctly we suggest that the installation and operation be carried out by qualified technicians and these instructions be carefully followed.

	<b>CAUTION!</b> HIGH VOLTAGE. RISK OF SEVERE OR FATAL ELECTRIC SHOCK
---	---

	<b>CAUTION!</b> ALWAYS DISCONNECT MAINS SUPPLY BEFORE REMOVING ANY FIXTURE COVERS
---	--

	<b>CAUTION!</b> NEVER LOOK DIRECTLY INTO THE LIGHT SOURCE. SENSITIVE PERSONS MAY SUFFER AN EPILEPTIC SHOCK
--	---

	<b>CAUTION!</b> NEVER TOUCH THE DEVICE DURING OPERATION! COVERS MAY BE HOT
---	---

***Important:***



***Damage caused by the disregard of this user manual is not subject to warranty. The dealer and manufacturer will not accept liability for any resulting defects or problems.***

- If the device has been exposed to temperature changes due to environmental conditions, do not power on immediately. The resulting condensation could damage the device. Leave the device powered off until it has reached room temperature.
- This device falls under protection-class I. Therefore, it is essential that the device be earthed.
- If either lenses or display are damaged (damage may include cracks or gashes in the material) they must be replaced.
- Electrical connections, such as replacing the power plug, must be performed by a qualified person.
- Make sure that the available voltage is not higher than that which is stated in this manual.
- Make sure the power cord is never crushed or damaged by sharp edges. If this should be the case, replacement of the cable must be done by an authorized dealer.
- If the external flexible power cord of this device is damaged, it shall be exclusively replaced by the manufacturer or their service agent or a similar qualified person in order to avoid injury.
- When the device is not in use or before performing maintenance, always disconnect the

device from the mains. Only handle the power cord from the plug. Never pull the plug out of a socket by tugging the power cord.

- When powered on for the first time, some smoke or smell may occur. This is caused by coating on metal parts when heated and is normal. If you are concerned, please contact your distributor.
- Do not focus the beam onto flammable surfaces. The minimum distance between the exiting lens of the device and the illuminated surface must be greater than 5 meter.

**Please be aware that damage caused by any modifications to the device are not subject to warranty. Keep away from children and non-professionals.**

## 1.2. GENERAL GUIDELINES

- This device is a lighting effect for professional use on stages, in discotheques, theatres, etc. the device was designed for indoor use.
- This fixture is only allowed to be operated within the maximum alternating current as stated in the technical specifications in section 2 of this manual.
- Handle the device with care, avoid shaking or using force when installing or maintaining the device.
- If you use the quick lock cam when rigging the device, make sure the quick lock fasteners are located in the quick lock holes correctly and securely.
- Operate the device only after having familiarized yourself with its functions. Do not permit operation by persons not qualified for operating the device. Most damage is the result of unprofessional operation.
- Please use the original packaging if the device is to be transported.
- The applicable temperature for the device is between -10 °C to 45 °C. Do not use the device outside of this temperature range.
- The light source of this luminaire is not replaceable; when the light source reaches its end of life the whole luminaire shall be replaced.

**For safety reasons, please be aware that all modifications to the device are forbidden.**

**If this device is operated in any way different to the ones described in this manual, the product may suffer damage and the warranty becomes void. Furthermore, any other operation may lead to short-circuits, burns, electric shocks etc.**

## **2. FEATURES**

### **POWER SUPPLY**

- AC120-240V~, 50/60Hz
- Power Consumption: 1470W

### **LIGHT SOURCE**

- LED: White 1050W LED, 8200±400K Color Temperature
- Extremely long Life: >20,000H

### **MOVEMENT**

- Pan movement: 540° /630° Optional (16 bit)
- Tilt movement: 270° (16 bit)
- Advanced moving system: fast, stable and quite, auto x-y repositioning

### **COLORS**

- CMY+CTO+CTB+CTP color mixing, uniform, linear and speed can be adjustable
- 1 Color wheel: 6 dichroic filters + open, indexable, rainbow effect

### **GOBOS**

- 2 Rotating gobo wheel: 7 interchangeable, rotating, and indexable, gobo+open
- “Slot in & out” gobo wheel system

### **FEATURES**

- 3 Control channel modes: 46/44/70 channels
- 2 Operation modes: DMX-512, Master / Slave mode
- Strobe effect with 1-25 flashes per second and pulse effect
- Rotating prism: 5-Facet Prism and Linear Prism
- 2 Animation wheel: can make special dynamic effect
- Focus: Motorized focus
- Blade System
- Stepless frost: 0%~100% linear change frost
- Stepless iris: 5%~100% linear change iris, pulse iris effect
- Dimmer: 0%~100% full range dimming

### **DISPLAY**

- Advanced and convenient full –color LCD
- Can be changed 180° reverse to fit for different installation position

### **SOFTWARE**

Upgrades: fast and convenient through DMX cable with DMX-512 controller

Reset DMX address, remote lamp control, reset can all be done by the DMX controller

Running time of fixture on display for reference

### **OTHER SPEC**

Input signal isolation: guarantees stable signal transmission without interference

# Advanced RDM function

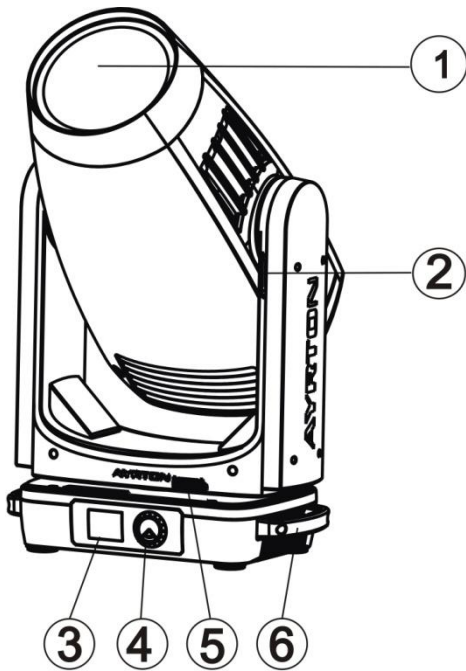
## WEIGHT

Net weight: 53.8 kg

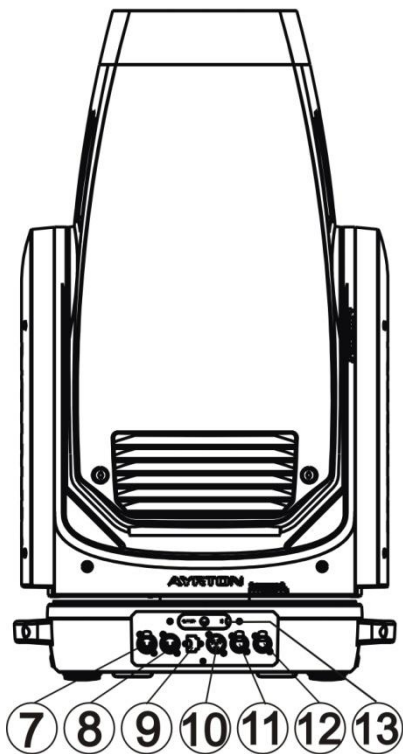
## DMX CHANNEL CHART

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	
%	Pan	Pan Fine	Tilt	Tilt Fine	Speed Pan / Tilt movement	Strobe	Dimmer intensity	Zoom	Focus	Auto Focus	AutoFocus Fine	Color	C	M	Y	CTO	CTB	CTP	Color Presets	Reserved	Reserved	Reserved	
100%		16bit Pan Fine		16bit Tilt Fine	No function Blackout by all wheel changing					15m									See Appendix	Reserved	Reserved	Reserved	
75%					Blackout by movement	RANDOM STROBE				10m													
50%					Min	Pulse-effect in sequence				7.5m													
25%					Moving speed					5m													
0%					Max					Auto Focus Off													
	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37/39 41/43	38/40 42/44	45	46					
%	Rota Gobo 1	Gobo Rotation 1	Rota Gobo 2	Gobo Rotation 2	Animation wheel 1	Animation wheel 2	Rotating Animation	Iris	Prism 1	Prism Rotation 1	Prism 2	Prism Rotation 2	Frost 1	Frost 2	Blade 1A / 2A / 3A / 4A	Blade 1B / 2B / 3B / 4B Rotation	All Blade Rotation	Auto programs					
100%							Backwards rotation from slow to fast	Pulse opening slow to fast	Linear Prism		5 Prism				Close			Unused CMY speed Slow CMY speed Fast Frost Progressive On Frost Progressive Off Other motor reset Reset P/T Fade On Reset P/T Fade Off Unused Gobo motor reset Colors motor reset Scan motor reset All motor reset Gobo correction On Gobo correction Off 12K 1.2K Linear Square Law Unused Constant Fans On Constant Fans Off Super Silence fan control mode Silence fan control mode Stage fan control mode Auto fan control mode Display Invert On Display Invert Off Display On Display Off Unused					
75%							No rotation	Pulse closing fast to slow	Linear Prism		5 Prism				Close								
50%	Gobo Shake	Stop	Gobo Shake	Stop			Forwards rotation from fast to slow		Open		Open		Moving speed	Moving speed	Open								
25%							No rotation		Open		Open				Open								
0%		GOBO INDEXING		GOBO INDEXING			No rotation		Open		Open				Open								

### 3. FIXTURE OVERVIEW



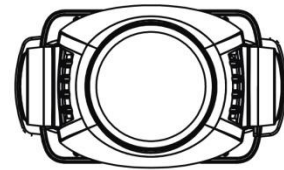
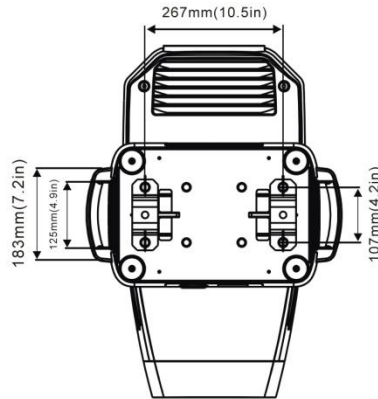
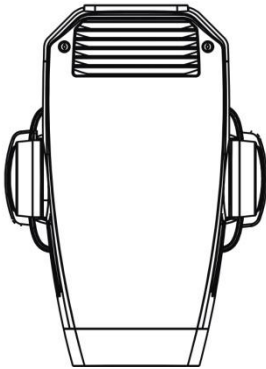
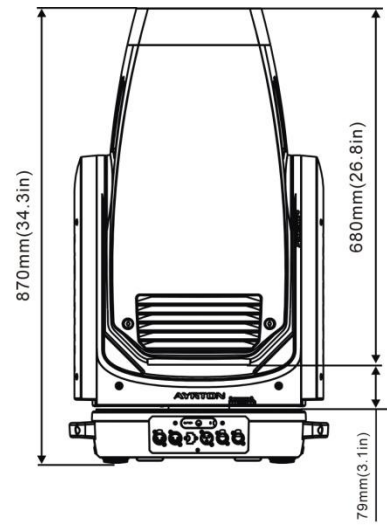
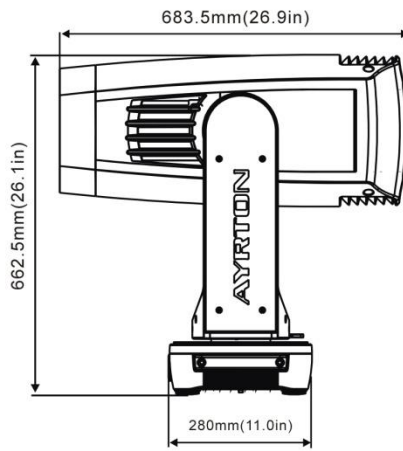
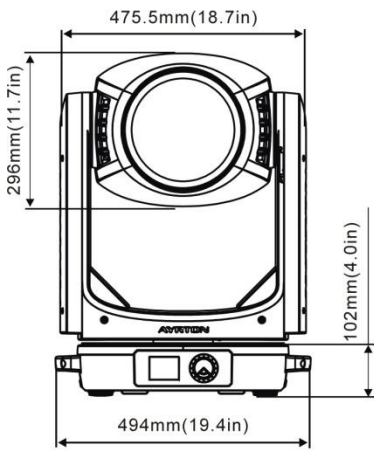
- 1) Lens
- 2) Tilt Lock
- 3) Display
- 4) Jog Wheel
- 5) Pan Lock
- 6) Handle



- 7) DMX Out
- 8) DMX In
- 9) USB
- 10) Power In
- 11) RJ45 Out
- 12) RJ45 In
- 13) Battery

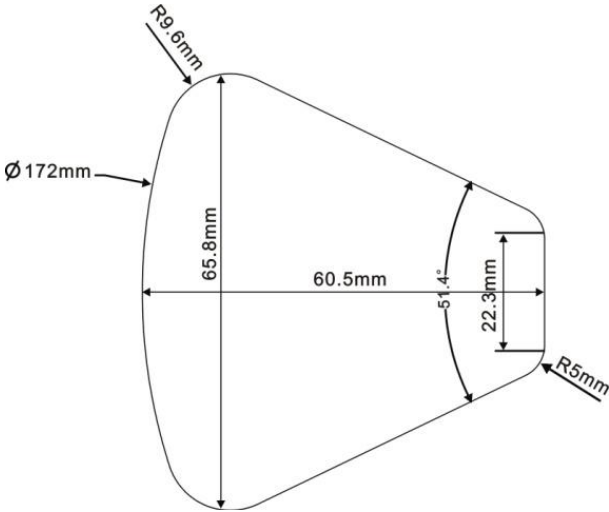
## 4. DIMENSIONAL DRAWINGS

### 4.1. Fixture Dimension

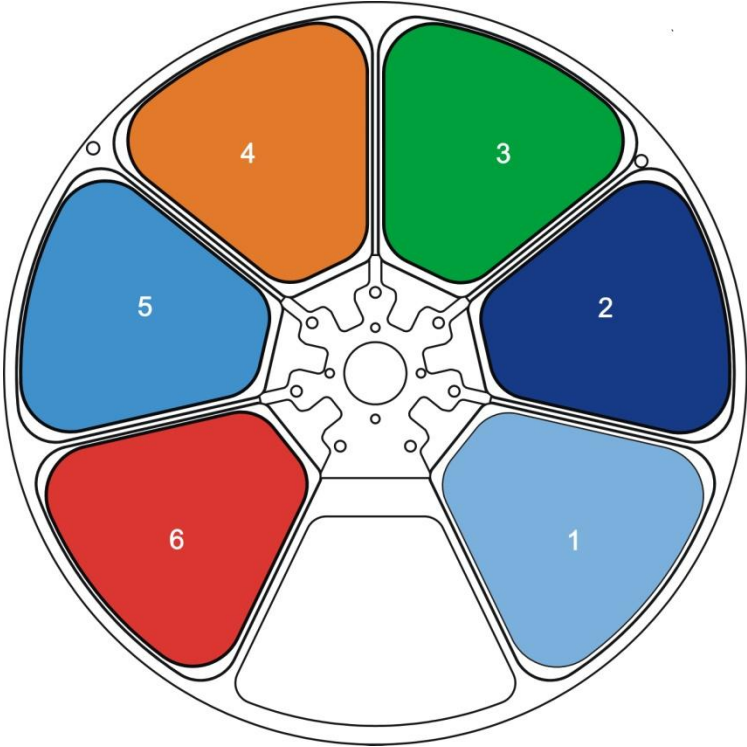




## 4.2. Color Filter Dimension

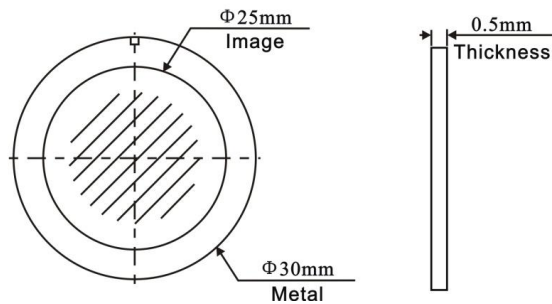


- 1. CTB1/4  
(6.03.05.03.2864)
- 2. Congo Blue  
(6.03.05.03.2855)
- 3. Green  
(6.03.05.03.2856)
- 4. Orange  
(6.03.05.03.2857)
- 5. Blue  
(6.03.05.03.2858)
- 6. Red  
(6.03.05.03.2859)



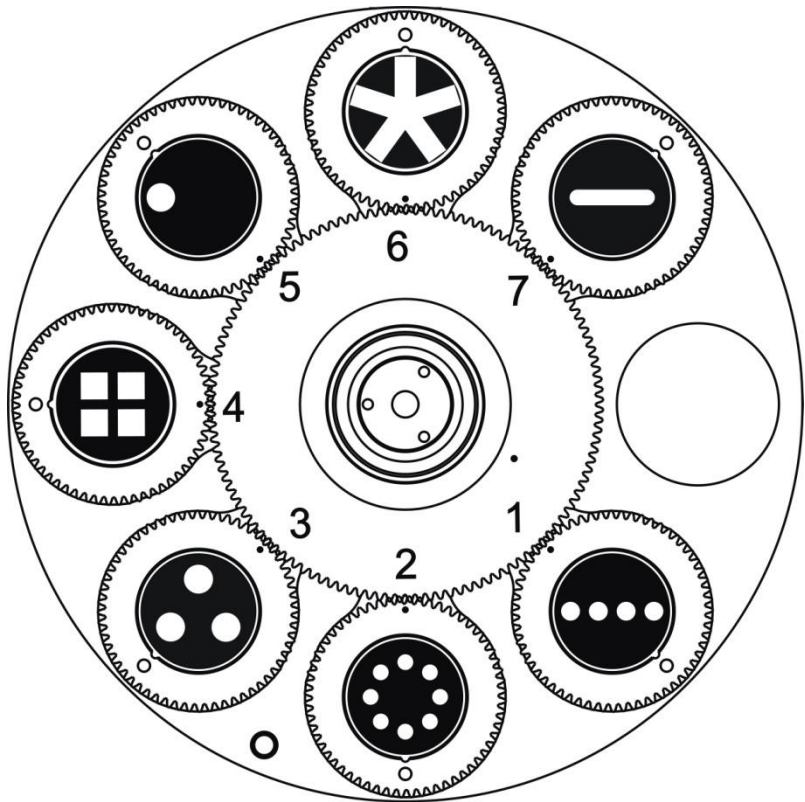
### 4.3. Rotating Gobo Filter Dimension

#### Metal Gobo:

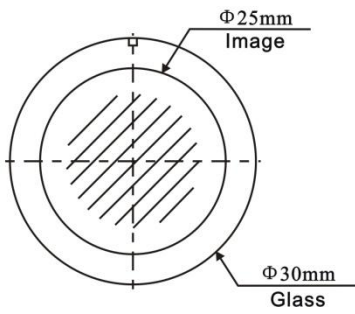


#### Rotating Gobo 1:

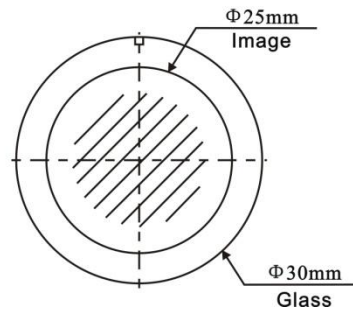
1. 314 – Dot Line 4  
(6.03.03.05.1968)
2. 322 – Dot Ring 8  
(6.03.03.05.1969)
3. 326 – Dot Triangle 3  
(6.03.03.05.2026)
4. 332 – Square Beam 4  
(6.03.03.05.1967)
5. 310 – Eccentric Dot  
(6.03.03.05.1970)
6. 342 – Five Spokes  
(6.03.03.05.2019)
7. 347 Beam Shaper  
(6.03.03.05.2020)



## Black & White Gobo:

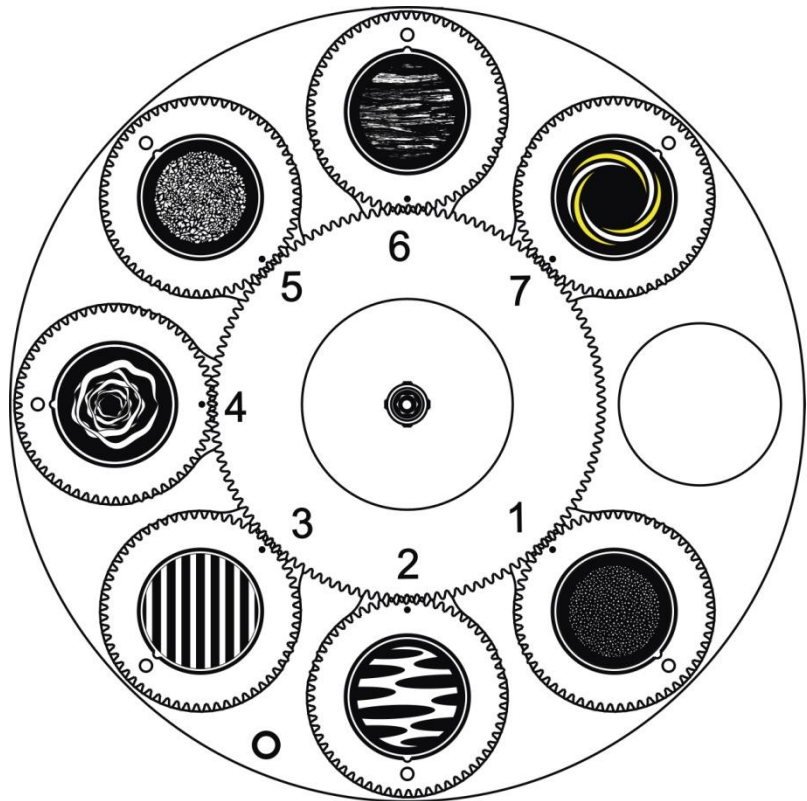


## Color Gobo:



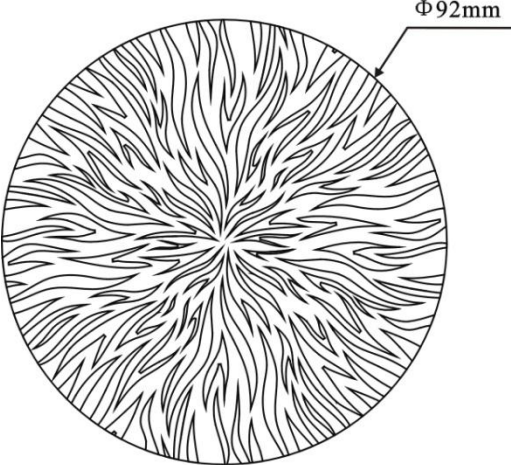
## Rotating Gobo 2:

1. 074 – Star Dust  
(6.03.03.01.1172-A)
2. 077 - Water  
(6.03.03.01.1575-0)
3. 275 – Prison Bars  
(6.03.03.01.1576-0)
4. 049 – Smoke Rings  
(6.03.03.01.1177-A)
5. 101 – Deep Forest  
(6.03.03.01.1182-0)
6. 105 – Tree Bark  
(6.03.03.01.1183-A)
7. 112Y – Nested Ring Yellow  
(6.03.03.06.0124)

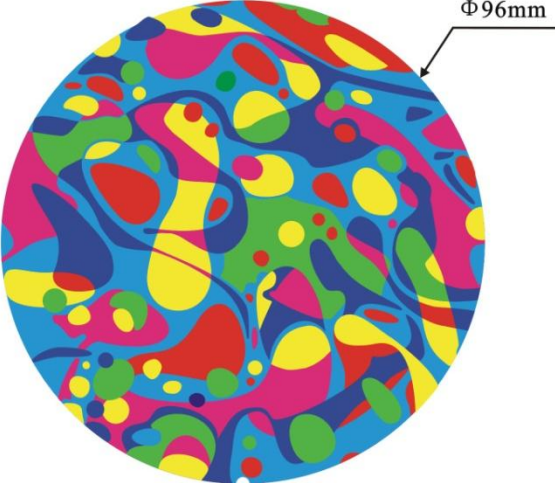


#### 4.4. Animation Filter Dimension

Black & White Animation:



Color Animation:



## 5. INSTALLATION INSTRUCTIONS

### 5.1. Rigging the device

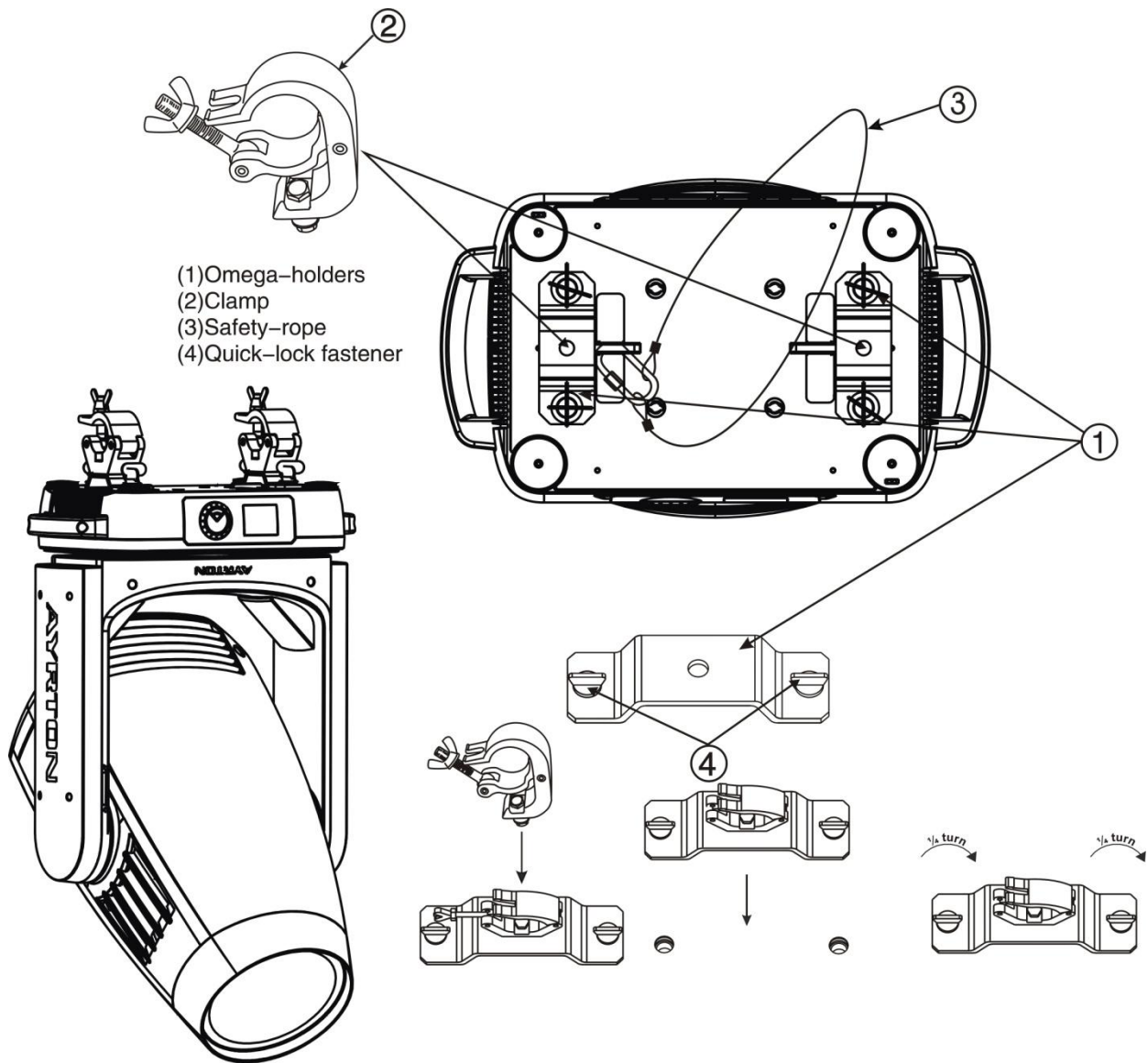


#### **CAUTION!**

PLEASE CONSIDER THE RESPECTIVE NATIONAL NORMS DURING INSTALLATION. THE INSTALLATION MUST ONLY BE CARRIED OUT BY A QUALIFIED PERSON.

- The applicable temperature for the lighting is between -10 °C to 45 °C. Do not use the lighting under or above this temperature range.
- The installation of the fixture has to be built and constructed in a way that it can hold 10 times the weight for 1 hour without any harming deformation.
- The installation must always be secured with a secondary safety attachment, e. g. an appropriate safety rope.
- Never stand directly below the device when mounting, removing or servicing the fixture.
- The operator has to make sure the safety relating and machine technical installations are approved by an expert before taking the device into operation for the first time.
- These installations have to be approved by a skilled person once a year.
- Overhead mounting requires extensive experience, including amongst others calculating working load limits, installation material being used, and periodic safety inspection of all installation material and the device. If you lack these qualifications, do not attempt the installation yourself. Improper installation can result in bodily injury.

## 5.2. Rigging using the omega brackets



- Fix the clamp to the bracket by tightening the M12 nut and bolt to the bracket through the  $\Phi 13$  hole in the middle of the bracket.
- Insert the quick-lock fasteners of the first Omega holder into the respective holes on the bottom of the device. Tighten the quick-lock fasteners fully clockwise.
- Install the second Omega holder.
- Pull the safety cable through the holes on the bottom of the base and over the trussing system or another suitable rigging point. Insert the end into the carabiner and tighten the safety screw.

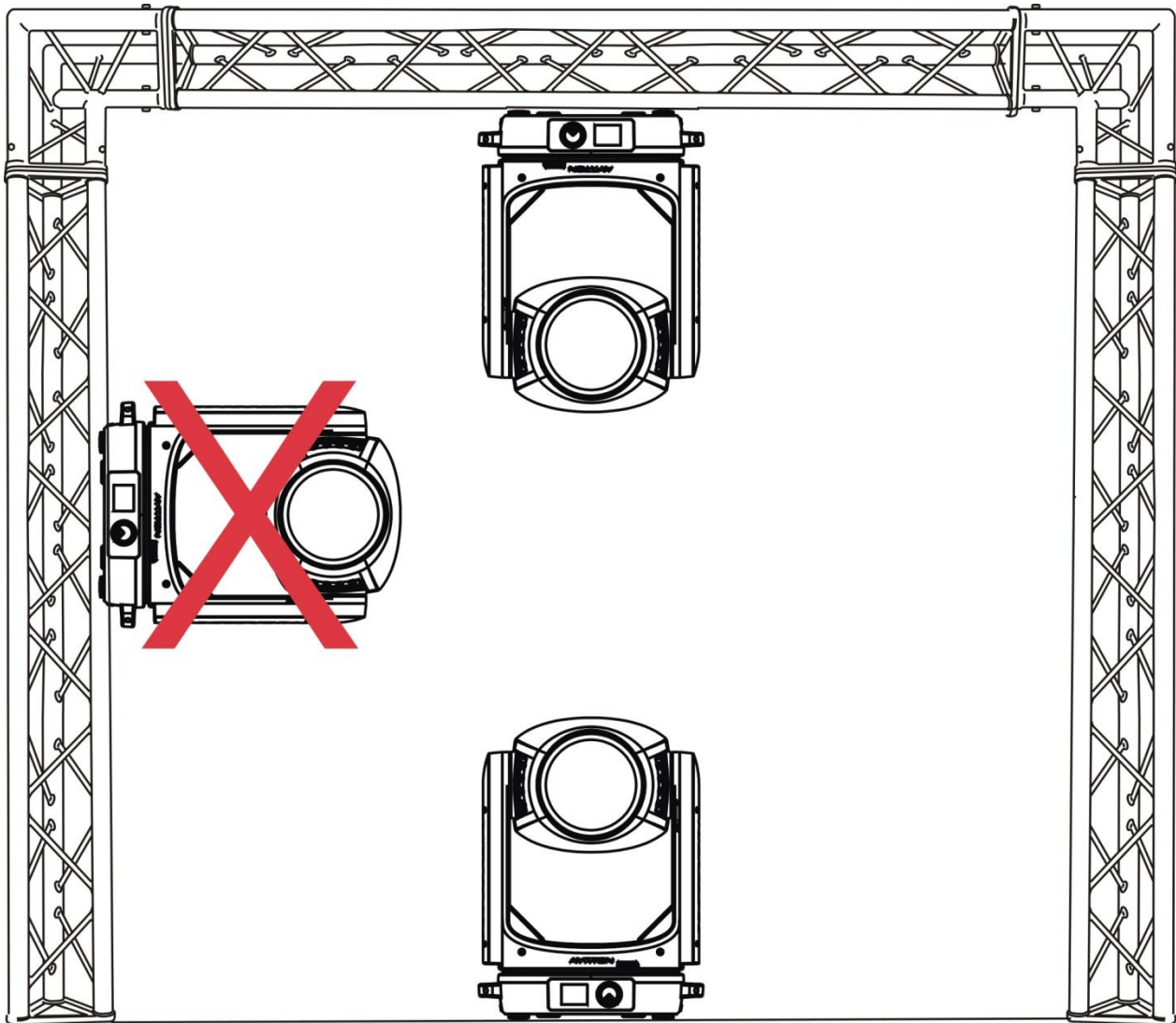


### Important:

This step is very important to ensure safe rigging of the fixture.



### 5.3. RIGGING DRAWINGS



- Be sure this fixture is kept at least 0.1 m away from any flammable materials (decoration etc. ).
- Always use and install the supplied safety cable as a safety measure to prevent accidental damage and/or injury in the event the clamp fails.

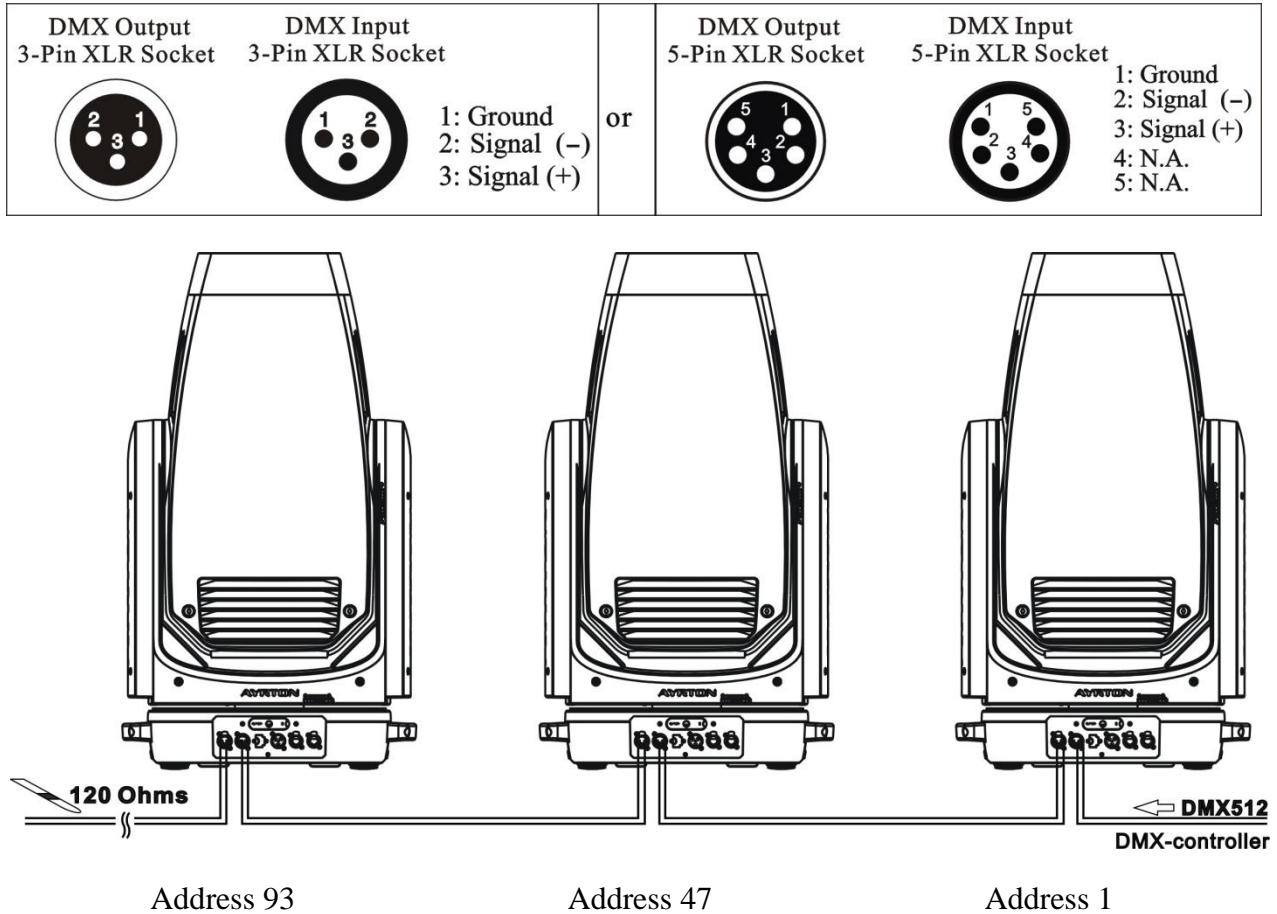


**Important:**

Overhead rigging requires extensive experience, including (but not limited to) calculating working load limits, specifying installation/ rigging materials, and periodic safety inspection of all installation material as well as the device. If you lack these qualifications, do not attempt the rigging of this device yourself. Improper installation/ rigging can result in serious bodily injury.

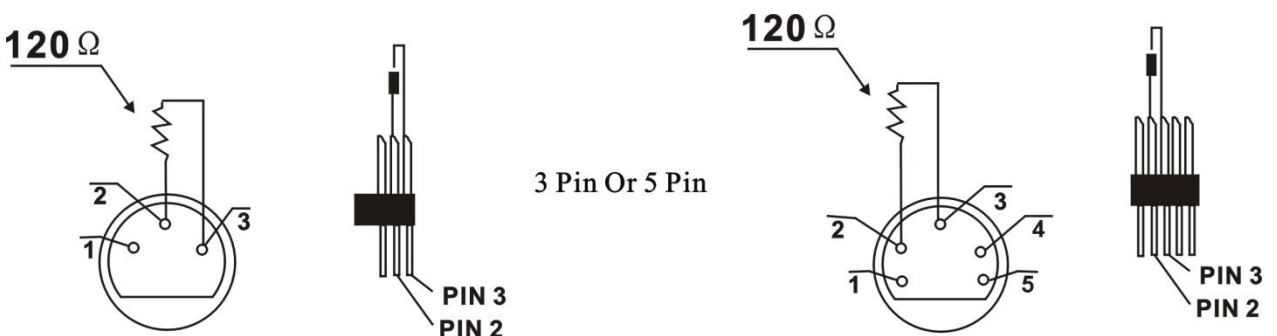
## 6. DMX-512 CONTROL CONNECTION

Connect the provided male side of the XLR cable to the female XLR output of your controller and the female side of the XLR cable to the male XLR input of the device. You can connect multiple devices together in a serial fashion. The cable needed should be two core, screened cable with XLR input and output connectors. Please refer to the diagram below.



## 7. DMX-512 CONNECTION WITH DMX TERMINATOR

For installations where the DMX cable has to run over a long distance or is in an electrically noisy environment, such as in a discotheque, it is recommended to use a DMX terminator. This helps in preventing corruption of the digital control signal caused by electrical noise. The DMX terminator is an XLR plug with a 120 Ω resistor connected between pins 2 and 3, which is then plugged into the output (female) XLR socket of the last fixture in the chain. Please see illustrations below.





## 8. DEVICE DMX START ADDRESS SELECTION

All fixtures should be given a DMX starting address when using a DMX signal, so that the correct fixture responds to the correct control signals. This digital starting address is the channel number from which the fixture starts to “listen” to the digital control information sent out from the DMX controller. The allocation of this starting address is achieved by setting the correct address number on the display located on the base of the device.

You can set the same starting address for all fixtures or a group of fixtures, or set different addresses for each fixture individually.

If you set the same address on all devices, all the devices will start to “listen” to the same control signal from the same channel number. In other words, changing the settings of one channel will affect all the fixtures simultaneously.

If you set a different address, each unit will start to “listen” to the channel number you have set, based on the quantity of control channels of the unit. That means changing the settings of one channel will affect only the selected device.

In the case of the LED moving head, in 46 channel mode, you should set the starting address of the first unit to 1, the second unit to 47 (46 + 1), the third unit to 93 (46+ 47), and so on.

## 9. OPERATING INSTRUCTIONS OF THE INTERNAL DMX WIRELESS SYSTEM

### 9.1 Equipments:

DMX 512 controller, wireless transmitter, and the fixtures with wireless receiver.

### 9.2 Message from the LED indicator:

- 1) Rapid flashing red/Green: logging in to a transmitter.
- 2) Slow flashing Red/Green: Logged on a transmitter and the DMX line is idle (No DMX is connected to transmitter) .
- 3) Solid Green: Logged on to a transmitter and receiving DMX data.
- 4) Solid Red: Not logged on to a transmitter (free) .

### 9.3 WDMX in the menu of the fixture:

On a fixture installed with wireless system, in order to switch between wireless control system and traditional DMX control (with cable) , a new menu WDMX is added to the display board.

ON: (Activate WDMX)

- 1) When the fixture is on power, and the WDMX is activated to ON status, but did not connect to the controller and did not log in to the transmitter, the fixture will search for the DMX signal source. If the fixture is connected to the DMX controller it can be controlled by DMX controller; if it is log in to the wireless transmitter, it can be controlled by the Transmitter.
- 2) When the fixture is power off, and the WDMX is in ON status, if the fixture is connected

to DMX controller. After the fixture is power on, it can be controlled only by the DMX controller which connected. The fixture can log in the wireless transmitter, and receive only radio signal from transmitter, but not DMX from the transmitter.

**OFF:** (De-activate WDMX)

In this status, wireless system is not activated, so the fixture can not log in the transmitter.

**REST:** (reset WDMX memory)

Can remove the fixture from the connection with the transmitter, the fixture become free and ready to log in any transmitter.

#### **9.4 Setup the wireless system:**

- 1) Connect the transmitter with the DMX controller.
- 2) To make the fixture installed with wireless receiver log in to the transmitter.
  - a) Initially, the indicator on the receiver fixture should be in Solid red.
  - b) Press and hold the configuration button on transmitter for less than 3 seconds the red/green LEDs on the transmitter and the receiver fixture will flash rapidly for about 5~ 10 seconds while the system goes through its setup procedure.
  - c) Once the receiver fixture is logged in to the transmitter (T1), the fixture with wireless receiver will keep the memory, even if restart the power, this unit will log in the transmitter (T1) automatically.
- 3) Use the DMX 512 to control the fixture

#### **9.5 Remove the receivers from transmitter (T1) and to log in to another transmitter (T2) :**

Case 1: Remove a receiver:

- a) On the control board of the fixture, enter menu to activated the function of REST;
- b) The LED for wireless on the fixture should turn to Solid red; the receiver can log out from the transmitter (T1) ;
- c) press the configuration button on transmitter (T2) for less than 3 second, then the fixture will start to connect with the transmitter (T2) .

Case 2: Remove all receivers from a transmitter (T1) to log in to T2:

- a) Press and hold the configuration button on the T1 as least 5 seconds, can clear the connection with all the fixtures;
- b) All the red/green LEDs on the receiver fixtures will turn to Solid red to indicate that the receivers are unassigned and removed from the transmitter (T1) ;
- c) Press and hold the configuration button on the T2 less then less than 3 second, the fixtures will connect with the T2.

#### **PS:**

1. Please log the receivers out from the transmitter after every job, so that the receivers are in free un assigned state and ready to be assigned to a transmitter.
2. Do not connect the fixture which is under the communication of wireless system to the DMX controller, otherwise it will cause interference from the DMX controller.

## 10. DISPLAY

The Display offers Jog wheel features: you can set the starting address, run the pre-programmed program or reset the device.

The main menu is accessed by long pressing the jog wheel until the display starts flashing. Browse through the menu by turning jog wheel clockwise or counterclockwise.

Double clicking in order to select the desired menu or long pressing to exit menu, double click the Jog wheel for confirm. After accessing the edit mode, the unit will automatically exit to the main menu after 15 seconds from the last button press. Clockwise is positive direction while counterclockwise is opposite direction.

When the unit is powered on, if no data signal is connected after 1 minute, then the display will switch off automatically.

### Default settings shaded

Address	Address	DMX address:001-XXX		DMX address setting
Mode	User Mode	Stand Mode Basic Mode Extend Mode Domino Mode User Mode A User Mode B User Mode C		User's mode to change channel numbers
	Edit User ModeA	Max channel PAN		Preset User modes A,B,C
Options	Status	No DMX Mode	Close/Hold/Auto	Auto run if no DMX
		Pan Reverse	ON/OFF	Pan Reverse movement
		Tilt Reverse	ON/OFF	Tilt Reverse movement
		Pan Degree	630/540	Pan Degree Select
		Feedback	ON/OFF	Movement Feedback
		Init PAN	ON/OFF	Init PAN
		Init TILT	ON/OFF	Init TILT
		Reset Mode	Fast /All Rot Gobos	Reset Mode
		Pan/Tilt Spd	Medium/Fast/Slow	Movement Speed
		CMY Spd	Fast/Slow	CMY Spd
		Zoom/Focus Spd	Fast/Medium/Slow	Zoom/Focus Spd
		Hibernation	OFF , 01M~99M	Stand by Mode
DMX Output	ON/OFF	Art-Net to DMX		

	Service PIN	Service PIN Set Ip Set Mask Ip DHCP Cross Load SW USB Update Clr LED Time	Password=XXX xxx.xxx.xxx.xxx xxx.xxx.xxx.xxx ON/OFF ON/OFF ON/OFF ON/OFF	Service Password”=050” Set Ip Set Mask Ip DHCP Cross Load SW USB Update Clr LED Time
	Fans Control	Fans Speed	Auto Stage Silence Super Silence	Fans Speed select
		Constant Fans	ON/OFF	Constant Fans
	Disp.Setting	Shutoff Time Flip Display Key Lock DispFlash	02~60m 05m ON/OFF ON/OFF ON/OFF	Display shutoff time Reverse 180 degree Key Lock DispFlash
	Signal Select	DMX WDMX Art—Net sACN		DMX WDMX Art-Net sACN
	Temp. C/F	Celsius Fahrenheit		Temperature switch between °C/°F
	Initial Pos.	PAN =XXX		Initial effect position
	Wireless DMX	Activate WDMX Rest WDMX		Activate WDMX Rest WDMX
	Dim Curve	Square Law Linear		Dim Curve
	Refresh Select	1.2K 2.4K 16K 25K		Refresh Select
	Gobo Correction	ON/OFF		Gobo Correction
	Reset P/T Fade	ON/OFF		Reset P/T Fade
	Frost (Progressive)	ON/OFF		Frost (Progressive)
	Trigger	DMX Value Disp. Set To Slave Auto Program	PAN..... Slave1,Slave2,Slave3 Master / Alone	DMX Value Disp. Set To Slave Auto Program
	ResetDefault	ON/OFF		Restore factory set.
Info	Time Info.	Current Time Ttl Life Hrs Last Run Hrs LED Hours Timer PIN Clr Last Run		XXXX(Hours) XXXX(Hours) XXXX(Hours) XXXX(Hours) Password=XXX ON/OFF
	Temp. Info	XXX°C/°F		
	Fan Info.	xxxxRPM		Fan information
	Software Ver	V1.0.....		Software version

	Network	IP,Mask,Mac	Network
Test	Home	All Pan&Tilt Color Gobo Other	Reset All Reset Pan&Tilt Reset Color Reset Gobo Reset Others
	Test Channel	PAN .....	Test function
	Manual Ctrl.	PAN =XXX :	Fine adjustment of the lamp
	Calibration	-Password- PAN :	Password "050" Calbrate and adjust the effects to standard/right position
	Gobo Replace	Gobo Wheel 1 Gobo Wheel 2	Gobo Replace
Preset	Select Prog.	Prog. Part 1 = Program 1 ~ 10 <b>Program 1</b> Prog. Part 2 = Program 1 ~ 10 <b>Program 2</b> Prog. Part 3 = Program 1 ~ 10 <b>Program 3</b>	Select programs to be run
	Edit Prog.	Program 1 : Program 10	Program Test Step 01=SCxxx Step 64=SCxxx
	Edit Scenes	Edit Scene 001 ~ Edit Scene 250	Pan,Tilt,..... --Fade Time-- --Secne Time-- Input By Outside
	Scenes Input	XX~XX	Scenes Input

## 10.1. Address

### 10.1.1. Set DMX Address

With this function, you can adjust the desired DMX-address via the Display.

1. Double clicking jog wheel to access main menu.
2. The display will show "ADDRESS" .
3. Double click then display "Set DMX Address" .
4. Turn the jog wheel clockwise then display "001~XXX" .
5. Long press the jog wheel to back to last button press – "Set DMX Address", then back to main menu by long press again.

## 10.2.Mode

### 10.2.1. User Mode

With this function, you can create user defined channel orders.

1. Double clicking jog wheel to access main menu, turn the jog wheel clockwise to display "USERS MODE" .
2. Double click to edit.
3. Turn the jog wheel clockwise to display "User mode", Double click to edit.
4. When in "Extend Mode", turn the jog wheel to select "Basic mode", "Stand Mode", "Domino Mode", "User Mode A", "User Mode B" and "User Mode C" .

5. Long press the jog wheel to back to last button press – “User Mode”, then back to main menu by long press again.

### 10.2.2. Edit User Mode

With this function, you can adjust the rest user defined channel order.

1. Double clicking jog wheel to access “USERS MODE” menu, turn the jog wheel until display “Edit User” .
2. Double click to access “Edit User” menu.
3. Set up “Max Channel=xxx” and select channel value.
4. Set up “Mode B” and “Mode C” by the same way.
5. Long press the jog wheel to back to last button press – “Edit User”, then back to main menu by long press again.

## 10.3.Options

### 10.3.1. Status

#### No DMX Status

With this function, when the drive is not DMX signal, it runs automatism, close, hold and music, the default is hold.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “No DMX Status” .
5. Double click to access “No DMX Status”, The display will show “Hold”, Turn the jog wheel to select “Close”, “Auto” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

#### Pan Reverse

With this function you can reverse the Pan-movement.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Pan Reverse” .
5. Double click to access “Pan Reverse”, The display will show “OFF”, Turn the jog wheel to select “NO” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

#### Tilt Reverse

With this function you can reverse the Tilt-movement.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Tilt Reverse” .
5. Double click to access “Tilt Reverse”, The display will show “OFF”, Turn the jog wheel to select “NO” .

6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **Pan Degree**

With this function, you can select pan degree for 630 or 540.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Pan Degree” .
5. Double click to access “Pan Degree”, The display will show “540”, Turn the jog wheel to select “630” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **Feedback**

With this function, you can feedback switch of pan movement or tilt movement.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Feedback” .
5. Double click to access “Feedback”, The display will show “ON”, Turn the jog wheel to select “OFF” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **Init PAN**

With this function, you can feedback switch of pan movement or tilt movement.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Init PAN” .
5. Double click to access “Init PAN”, The display will show “ON”, Turn the jog wheel to select “OFF” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **Init TILT**

With this function, you can feedback switch of pan movement or tilt movement.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Init TILT” .
5. Double click to access “Init TILT”, The display will show “ON”, Turn the jog wheel to select “OFF” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **Reset Mode**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Reset Mode” .
5. Double click to access “Reset Mode”, The display will show “Fast”, Turn the jog wheel to select “All Rot Gobos” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **Pan/Tilt Spd**

With this function, you can select scan mode from Fast to Slow.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Pan/Tilt Spd” .
5. Double click to access “Pan/Tilt Spd”, The display will show “Medium”, Turn the jog wheel to select “Medium”, “Fast”, “Slow” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **CMY Spd**

With this function, you can select scan mode from 1Fast to Slow.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “CMY Spd” .
5. Double click to access “CMY Spd”, The display will show “Fast”, Turn the jog wheel to select “Fast”, “Slow” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **Zoom/Focus Spd**

With this function, you can select zoom/focus mode from fast、medium、slow.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Zoom/Focus Spd” .
5. Double click to access “Zoom/Focus Spd”, The display will show “Fast”, Turn the jog wheel to select “Fast”, “Medium”, “Slow” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **Hibernation: Standby mode**

The device and step motors will be power off if the fixture stay without DMX signal for 15 mins (Factory default). And the fixture will be reset before working once it receive DMX signal again.



1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Hibernation” .
5. Double click to access “Hibernation”, The display will show “OFF”, Turn the jog wheel to select “01M”, “02M” . . . “99M” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **DMX Output**

With this function, you can select Art-Net to DMX.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Status” .
4. Double click to access “Status” menu, The display will show “Art-Net to DMX” .
5. Double click to access “Art-Net to DMX”, The display will show “OFF”, Turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press –“Status”, then back to main menu by long press again.

### **10.3.2. Service PIN**

#### **Password**

The Password for this function is “050” .

#### **Set IP**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Service PIN” .
4. Double click to access “Service PIN” menu, The display will show “Set IP” .
5. Double click to access “Set IP”, The display will show “XXX. XXX. XXX. XXX” .
6. Long press the jog wheel to back to last button press –“Service PIN”, then back to main menu by long press again.

#### **Set Mask IP**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Service PIN” .
4. Double click to access “Service PIN” menu, The display will show “Set Mask IP” .
5. Double click to access “Set Mask IP”, The display will show “XXX. XXX. XXX. XXX” .
6. Long press the jog wheel to back to last button press –“Service PIN”, then back to main menu by long press again.

#### **DHCP**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Service PIN” .
4. Double click to access “Service PIN” menu, The display will show “DHCP” .

5. Double click to access “DHCP”, The display will show “OFF”, Turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press –“Service PIN”, then back to main menu by long press again.

### **Cross Load SW**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Service PIN” .
4. Double click to access “Service PIN” menu, The display will show “Cross Load SW” .
5. Double click to access “Cross Load SW”, The display will show “OFF”, Turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press –“Service PIN”, then back to main menu by long press again.

### **USB Update**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Service PIN” .
4. Double click to access “Service PIN” menu, The display will show “USB Update” .
5. Double click to access “USB Update”, The display will show “OFF”, Turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press –“Service PIN”, then back to main menu by long press again.

### **Clr LED Timer**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Service PIN” .
4. Double click to access “Service PIN” menu, The display will show “Clr LED Timer” .
5. Double click to access “Clr LED Timer”, The display will show “OFF”, Turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press –“Service PIN”, then back to main menu by long press again.

## **10.3.3. Fans Control**

### **Fans Speed**

With this function you can set the speed of the running fans. The selections have Auto、Stage 、Silence and Super Silence.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Fans Control” .
4. Double click to access “Fans Control” menu, The display will show “Fans Speed” .
5. Double click to access “Fans Speed”, The display will show “Auto”, Turn the jog wheel to select “Auto” , “Stage” , “Silence” , “Super Silence” .
6. Long press the jog wheel to back to last button press – “Fans Control”, then back to main menu by long press again.

### **Constant Fans**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Fans Control” .
4. Double click to access “Fans Control” menu, The display will show “Constant Fans” .
5. Double click to access “Constant Fans”, The display will show “OFF”, Turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press – “Fans Control”, then back to main menu by long press again.

### **10.3.4. Disp. Setting**

#### **Shut off Time**

With this function you can shut off the LCD display after 2 to 60 minutes. The default is 5 minutes.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Display Setting” .
4. Double click to access “Display Setting” menu, The display will show “Shut off Time” .
5. Double click to access “Shut off Time”, The display will show “05m”, Turn the jog wheel to select “02~60m” .
6. Long press the jog wheel to back to last button press – “Display Setting”, then back to main menu by long press again.

#### **Flip Display**

With this function you can rotate the display by 180°.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Display Setting” .
4. Double click to access “Display Setting” menu, The display will show “Flip Display” .
5. Double click to access “Flip Display”, The display will show “OFF”, Turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press – “Display Setting”, then back to main menu by long press again.

#### **Key Lock**

With this function you can activate the automatic key lock function. If this function is activated, the keys will be locked automatically after exiting the edit mode for 15 seconds. Keeping press the <MODE/ESC> key for 3 seconds if you do not need this function.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Display Setting” .
4. Double click to access “Display Setting” menu, The display will show “Key Lock” .
5. Double click to access “Key Lock”, The display will show “OFF”, Turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press – “Display Setting”, then back to

main menu by long press again.

### **DispFlash**

With this function you can the entire display to be flipped by 180 °to allow for better view when the fixture is hung from truss or a ceiling. This function is disabled as default.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Display Setting” .
4. Double click to access “Display Setting” menu, The display will show “DispFlash” .
5. Double click to access “DispFlash”, The display will show “OFF”, Turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press – “Display Setting”, then back to main menu by long press again.

### **10.3.5. Signal Select**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Signal Select” .
4. Double click to access “Signal Select”, The display will show “DMX”, Turn the jog wheel to select “DMX”, “WDMX”, “Art--Net”, “sACN” .
5. Long press the jog wheel to back to last button press – “Signal Select”, then back to main menu by long press again.

### **10.3.6. Temperature C/F**

With this function you can display the temperature in Celsius or Fahrenheit.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Temperature C/ F” .
4. Double click to access “Temperature C/ F”, The display will show “Fahrenheit”, Turn the jog wheel to select “Celsius” .
5. Long press the jog wheel to back to last button press –“Temperature C/ F”, then back to main menu by long press again.

### **10.3.7. Initial Pos.**

With this function you can display initial effect position.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Initial Pos. ” .
4. Double click to access “Initial Pos. ”, The display will show “PAN=XXX” .
5. Long press the jog wheel to back to last button press –“Initial Pos. ”, then back to main menu by long press again.

### **10.3.8. Wireless DMX**

From factory, this projector is prepared for wireless data transmission (W-DMX) . If you wish to de-activate W-DMX control, you can select the function “De-activate WDMX” by turning the encoder. With the function “rest” , you can log out the projector from the wireless sender.

1. Double clicking jog wheel to access main menu.

2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Wireless DMX” .
4. Double click to access “Wireless DMX”, The display will show “Activate WDMX”, Turn the jog wheel to select “Activate WDMX” , “Rest WDMX” .
5. Long press the jog wheel to back to last button press – “Wireless DMX”, then back to main menu by long press again.

#### **10.3.9. Dim Curve**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Dim Curve” .
4. Double click to access “Dim Curve”, The display will show “Square Law”, Turn the jog wheel to select “Linear” .
5. Long press the jog wheel to back to last button press – “Dim Curve”, then back to main menu by long press again.

#### **10.3.10. Refresh Select**

With this function you can select the refresh.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Refresh Select” .
4. Double click to access “Refresh Select”, The display will show “1.2K”, Turn the jog wheel to select “2.4K” , “16K” , “25K” .
5. Long press the jog wheel to back to last button press – “Refresh Select”, then back to main menu by long press again.

#### **10.3.11. Gobo Correction**

With this function you can select the CTB.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Gobo Correction” .
4. Double click to access “Gobo Correction”, The display will show “ON”, Turn the jog wheel to select “OFF” .
5. Long press the jog wheel to back to last button press – “Gobo Correction”, then back to main menu by long press again.

#### **10.3.12. Reset P/T Fade**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Reset P/T Fade” .
4. Double click to access “Reset P/T Fade”, The display will show “OFF”, Turn the jog wheel to select “ON” .
5. Long press the jog wheel to back to last button press – “Gobo Correction”, then back to main menu by long press again.

#### **10.3.13. Frost (Progressive)**

1. Double clicking jog wheel to access main menu.

2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Frost (Progressive)” .
4. Double click to access “Frost (Progressive)”, The display will show “NO”, Turn the jog wheel to select “OFF” .
5. Long press the jog wheel to back to last button press – “Gobo Correction”, then back to main menu by long press again.

#### 10.3.14. Trigger

##### **DMX Value Disp.**

With this function you can display the DMX 512 value of each channel. The display automatically shows the channel with a value changing.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Trigger” .
4. Double click to access “Trigger” menu, The display will show “DMX Value Disp” .
5. Double click to access “DMX Value Disp”, The display will show “PAN.....” .
6. Long press the jog wheel to back to last button press – “Trigger”, then back to main menu by long press again.

##### **Set To Slave**

With this function, you can define the device as slave.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Trigger” .
4. Double click to access “Trigger” menu, The display will show “Set To Slave” .
5. Double click to access “Set To Slave”, The display will show “Slave1”, “Slave2”, “Slave3” .
6. Long press the jog wheel to back to last button press – “Trigger”, then back to main menu by long press again.

##### **Auto Program**

With this function, you can run the internal program. You can select the desired program under “**Select program**” . You can set the number of steps under “**Edit program**” . You can edit the individual scenes under “**Edit scenes**” . With this function, you can run the individual scenes either automatically, i. e. with the adjusted Step-Time.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .
3. Double click to access “Options”, turn the jog wheel to select “Trigger” .
4. Double click to access “Trigger” menu, The display will show “Auto Program” .
5. Double click to access “Auto Program”, The display will show “Master”, “Alone” .
6. Long press the jog wheel to back to last button press – “Trigger”, then back to main menu by long press again.

#### 10.3.15. Reset Default

With this function, you can select restore factory set for ON or OFF, the default is OFF.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Options” .

3. Double click to access “Options”, turn the jog wheel to select “Reset Default” .
4. Double click to access “Reset Default” menu, The display will show “OFF”, Turn the jog wheel to select “ON” .
5. Long press the jog wheel to back to last button press – “Reset Default”, then back to main menu by long press again.

## **10.4. Info**

### **10.4.1. Time Info.**

#### **Current Time**

With this function, you can display the temporary running time of the device from the last power on. The display shows “XXXX” , “XXXX” stands for the number of hours. The counter is reset after turning the device off.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Time Info.” .
4. Double click to access “Time Info.”, The display will show “Current Time” .
5. Double click to access “Current Time”, The display will show “XXXX (Hours)” .
6. Long press the jog wheel to back to last button press – “Time Info”, then back to main menu by long press again.

#### **Ttl Life Hrs**

With this function, you can display the running time of the device. The display shows “XXXX” , “XXXX” stands for the number of hours.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Time Info.” .
4. Double click to access “Time Info.”, The display will show “Ttl Life Hrs” .
5. Double click to access “Ttl Life Hrs”, The display will show “XXXX (Hours)” .
6. Long press the jog wheel to back to last button press – “Time Info”, then back to main menu by long press again.

#### **Last Run Hrs**

With this function, you can display last the running time of the device. The display shows “XXXX” , “XXXX” stands for the number of hours.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Time Info.” .
4. Double click to access “Time Info.”, The display will show “Last Run Hrs” .
5. Double click to access “Last Run Hrs”, The display will show “XXXX (Hours)” .
6. Long press the jog wheel to back to last button press – “Time Info”, then back to main menu by long press again.

#### **LED Hours**

With this function, you can display the time of LED. The display shows “XXXX”, “XXXX” stands for the time of LED.

1. Double clicking jog wheel to access main menu.

2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Time Info.” .
4. Double click to access “Time Info.”, The display will show “LED Hours” .
5. Double click to access “LED Hours”, The display will show “XXXX (Hours)” .
6. Long press the jog wheel to back to last button press – “Time Info”, then back to main menu by long press again.

### **Timer PIN**

With this function, you can display the timer password.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Time Info.” .
4. Double click to access “Time Info.”, The display will show “Timer PIN” .
5. Double click to access “Timer PIN”, The display will show “Password=038” .
6. Long press the jog wheel to back to last button press – “Time Info”, then back to main menu by long press again.

### **Clr Last Run**

With this function, you can clear last run time of the fixture. The display shows “ON” or “OFF”, Press “Enter” to confirm.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Time Info.” .
4. Double click to access “Time Info.”, The display will show “Clear Last Run” .
5. Double click to access “Clear Last Run”, The display will show “OFF”, turn the jog wheel to select “ON” .
6. Long press the jog wheel to back to last button press – “Time Info”, then back to main menu by long press again.

### **10.4.2. Temp. Info**

With this function you can display the temperature on the display board of the base (near CMY-filter) in Celsius.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Temp Info” .
4. Double click to access “Temp Info”, The display will show “Head Temp. ” .
5. Double click to access “Head Temp. ”, The display will show “XXX °C/ °F” .
6. Long press the jog wheel to back to last button press – “Temp Info”, then back to main menu by long press again.

### **10.4.3. Fan Info.**

With this function, you can display the software version of the device.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Fan Info.” .
4. Double click to access “Fan Info.”, The display will show “xxxxRPM” .
5. Long press the jog wheel to back to last button press – “Fan Info.”, then back to main



menu by long press again.

#### **10.4.4. Software Ver**

With this function, you can display the software version of the device.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Software Ver” .
4. Double click to access “Software Ver”, The display will show “Ver x.x.x” .
5. Long press the jog wheel to back to last button press – “Software Ver”, then back to main menu by long press again.

#### **10.4.5. Network**

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Info” .
3. Double click to access “Info”, turn the jog wheel to select “Network” .
4. Double click to access “Network”, The display will show “IP” , Turn the jog wheel to select “Mask”, “Mac” .
5. Long press the jog wheel to back to last button press – “Network”, then back to main menu by long press again.

### **10.5. Test**

#### **10.5.1. Home**

With this function you can reset the device via the Control Board. You can select the different reset functions by turning the encoder.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Test” .
3. Double click to access “Test”, turn the jog wheel to select “Home” .
4. Double click to access “Home”, The display will show “All” , Turn the jog wheel to select “All”, “Pan&Tilt”, “Color”, “Gobo”, “Other” .
5. Long press the jog wheel to back to last button press – “Test”, then back to main menu by long press again.

#### **10.5.2. Test Channel**

With this function you can test each channel’s function to ensure correct operation.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Test” .
3. Double click to access “Test”, turn the jog wheel to select “Test Channel” .
4. Double click to access “Test Channel”, The display will show “Pan”, Turn the jog wheel to select other channel.
5. Long press the jog wheel to back to last button press – “Test”, then back to main menu by long press again.

#### **10.5.3. Manual Control**

When set to Manual Mode, fixture will be back to factory settings. If want to adjust brightness, can adjust by shutter and dimming channel, channel value is 0-255. Other functions can be set according to user's real need.

1. Double clicking jog wheel to access main menu.

2. Turn the jog wheel clockwise then display “Test” .
3. Double click to access “Test”, turn the jog wheel to select “Manual control” .
4. Double click to access “Manual control”, The display will show “PAN=XXX” .
5. Long press the jog wheel to back to last button press – “Test”, then back to main menu by long press again.

#### 10.5.4. Calibration

With this function, you can calibrate and adjust the effect wheels to their correct positions. The password of calibrate values is 050.

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Test” .
3. Double click to access “Test”, turn the jog wheel to select “Calibration” .
4. Double click to access “Calibration”, The display will show “Password=050” .
5. Long press the jog wheel to back to last button press – “Test”, then back to main menu by long press again.

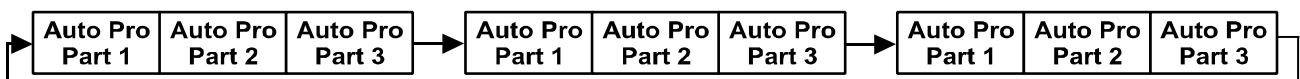
#### 10.5.5. Gobo Replace

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Test” .
3. Double click to access “Test”, turn the jog wheel to select “Gobo Replace” .
4. Double click to access “Gobo Replace”, The display will show “Gobo Wheel 1”, Turn the jog wheel to select “Gobo Wheel 2” .
5. Long press the jog wheel to back to last button press – “Test”, then back to main menu by long press again.

### 10.6. Preset

1. Double clicking jog wheel to access main menu.
2. Turn the jog wheel clockwise then display “Preset” .
3. Double click to access “Preset”, turn the jog wheel to select “Select prog. ”, “Edit prog. ”, “Edit Scenes”, “Scenes Input” .
4. Long press the jog wheel to back to last button press – “Preset” .

Run the auto program: A master fixture can output to three different program signals to the slave fixture to operate. It means the host will send cyclically in the following orders (The host will keep operating the program of Part 1) Then the slave fixture will make the selectively receiving according to its own set.



1. If the slave fixture chooses Run For Slave 1 from the menu of 1-3, then it will receive the part 1’s automatic program from link, in the same way, when the slave fixture chooses Run For Slave 2, then it will receive the part 2’s automatic program from link.
2. Enter the menu of 1-3 Function Mode---Set To Slave, Here to set machine operate which part of the program during the host-slave connection
3. Enter the menu of 1-4, 1-5 Function Mode---Set To Master
4. Enter the menu of 8-1 Edit Program---Auto Program Part1. The host outputs three groups driven program---Part1, Part2, Part3(Part1 program runs the same effect as the

host)

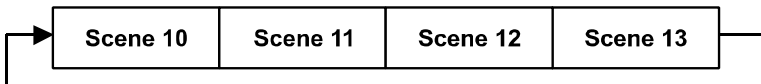
5. Enter the menu of 8-2 Edit Program---Edit Program. Edit the program's connection, connect the scene in order
6. The editor of the scene, there are as many as 250 scenario editors, and every scene can have a program connection of 10.

**Note:**

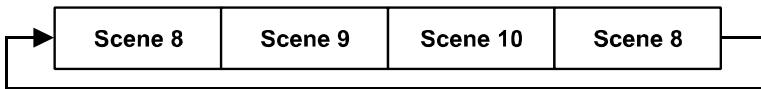
Part 2, Part 3 repeat in accordance with the Part1's repeat. For example: When Part 1 uses Program 2, Part 2 uses Program 4, Part 3 uses Program 6, Assume: Program 2 includes scene of 10, 11, 12, 13; Program 4 includes scene of 8, 9, 10; Program 6 includes scene of 12, 13, 14, 15; Then it will run as below.

Example:

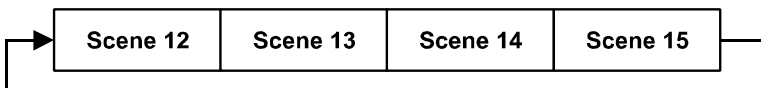
**Part 1:**



**Part 2:**



**Part 3:**



## 11. DMX PROTOCOL

DMX channel § functions and their values (70DMX channels):				
Mode/Channel			Value	Function
St	Ba	Ex		
1	1	1		<b><u>PAN Movement 8bit :</u></b>
			0-255	Pan Movement
2		2		<b><u>Pan Fine 16bit</u></b>
			0-255	Fine control of Pan movement
3	2	3		<b><u>TILT Movement 8bit :</u></b>
			0-255	Tilt Movement
4		4		<b><u>Tilt Fine 16bit</u></b>
			0-255	Fine control of Tilt movement
5	3	5		<b><u>Speed Pan/Tilt movement:</u></b>
			0-225	max to min speed
			226-235	blackout by movement
			236-245	blackout by all wheel changing
			246-255	no function
6	4	6		<b><u>Shutter, strobe:</u></b>
			0-10	Shutter closed
			11-20	No function (shutter open)
			21-117	Strobe effect slow to fast
			118-126	No function (shutter open)
			127-180	Pulse-effect in sequences
			181-191	No function (shutter open)
			192-245	Random strobe effect slow to fast
246-255	No function (shutter open)			
7	5	7		<b><u>Dimmer intensity:</u></b>
			0-255	Intensity 0 to 100%
		8		<b><u>Fine Dimmer intensity:</u></b>
			0-255	Dimmer intensity fine
8	6	9		<b><u>Zoom :</u></b>
			0-255	Zoom adjustment from small to big
		10		<b><u>Zoom Fine:</u></b>
			0-255	Zoom adjustment Fine
9	7	11		<b><u>Focus :</u></b>
			0-255	Continuous adjustment from near to far
		12		<b><u>Focus Fine:</u></b>
			0-255	Continuous adjustment Fine
10	8	13		<b><u>Auto Focus :</u></b>
			0-50	Auto Focus Off
			51-100	5m
			101-150	7.5m
			151-200	10m

			201-255	15m
11	9	14		<b><u>AutoFocus Fine:</u></b>
			0-255	Continuous adjustment Fine
12	10	15		<b><u>Color Wheel:</u></b>
			0-3	Open / white
			4-7	Color 1
			8-11	Color 2
			12-15	Color 3
			16-19	Color 4
			20-23	Color 5
			24-27	Color 6
			28-127	Color indexing
			128-189	Forwards rainbow effect from fast to slow
			190-193	No rotation
			194-255	Backwards rainbow effect from slow to fast
		16		<b><u>Color Wheel Fine:</u></b>
			0-255	Color Wheel colour change to any position Fine
13	11	17		<b><u>Cyan Color :</u></b>
			0-255	Cyan (0-white, 255-100% Cyan)
		18		<b><u>Cyan Color Fine :</u></b>
			0-255	Cyan Fine
14	12	19		<b><u>Magenta Color :</u></b>
			0-255	Magenta (0-white, 255-100% magenta)
		20		<b><u>Magenta Color Fine :</u></b>
			0-255	Magenta Fine
15	13	21		<b><u>Yellow Color :</u></b>
			0-255	Yellow (0-white, 255-100% Yellow)
		22		<b><u>Yellow Color Fine :</u></b>
			0-255	Yellow Fine
16	14	23		<b><u>CTO Color :</u></b>
			0-255	CTO (0-white, 255-100% CTO)
		24		<b><u>CTO Color Fine :</u></b>
			0-255	CTO Fine
17	15	25		<b><u>CTB Color :</u></b>
			0-255	CTB (0-white, 255-100% CTO)
		26		<b><u>CTB Color Fine :</u></b>
			0-255	CTB Fine
18	16	27		<b><u>CTP Color :</u></b>
			0-255	CTP (0-white, 255-100% CTO)
		28		<b><u>CTP Color Fine :</u></b>
			0-255	CTP Fine
19	17	29		<b><u>Color Presets:</u></b>
			0-255	See Appendix

20	18	30		Reserved
21	19	31		Reserved
22	20	32		Reserved
23	21	33		<b><u>Rotating gobos, cont. rotation 1:</u></b>
			0-9	Open
			10-19	Rot. gobo 1
			20-29	Rot. gobo 2
			30-39	Rot. gobo 3
			40-49	Rot. gobo 4
			50-59	Rot. gobo 5
			60-69	Rot. gobo 6
			70-77	Rot. Gobo 7
			78-93	Gobo 1 shake slow to fast
			94-109	Gobo 2 shake slow to fast
			110-125	Gobo 3 shake slow to fast
			126-141	Gobo 4 shake slow to fast
			142-157	Gobo 5 shake slow to fast
			158-173	Gobo 6 shake slow to fast
			174-189	Gobo 7 shake slow to fast
190-221	Gobo wheel rotation forwards from fast to slow			
222-223	No rotation			
224-255	Gobo wheel rotation f backwards from slow to fast			
24	22	34		<b><u>Rotating gobo index,rotating gobo rotation 1:</u></b>
			0-127	Gobo indexing
			128-189	Forwards gobo rotation from fast to slow
			190-193	No rotation
			194-255	Backwards gobo rotation from slow to fast
		35		<b><u>Rotating gobo indexing Fine 1:</u></b>
			0-255	Fine indexing
25	23	36		<b><u>Rotating gobos, cont. rotation 2:</u></b>
			0-9	Open
			10-19	Rot. gobo 1
			20-29	Rot. gobo 2
			30-39	Rot. gobo 3
			40-49	Rot. gobo 4
			50-59	Rot. gobo 5
			60-69	Rot. gobo 6
			70-77	Rot. Gobo 7
			78-93	Gobo 1 shake slow to fast
			94-109	Gobo 2 shake slow to fast
			110-125	Gobo 3 shake slow to fast
126-141	Gobo 4 shake slow to fast			

			142-157	Gobo 5 shake slow to fast
			158-173	Gobo 6 shake slow to fast
			174-189	Gobo 7 shake slow to fast
			190-221	Gobo wheel rotation forwards from fast to slow
			222-223	No rotation
			224-255	Gobo wheel rotation f backwards from slow to fast
26	24	37		<b><u>Rotating gobo index,rotating gobo rotation 2:</u></b>
			0-127	Gobo indexing
			128-189	Forwards gobo rotation from fast to slow
			190-193	No rotation
			194-255	Backwards gobo rotation from slow to fast
		38		<b><u>Rotating gobo indexing Fine 2:</u></b>
			0-255	Fine indexing
27	25	39		<b><u>Animation wheel 1:</u></b>
			0-7	No rotation
			8-127	Forwards rotation from fast to slow
			128-135	No rotation
			136-255	Backwards rotation from slow to fast
28	26	40		<b><u>Animation wheel 2:</u></b>
			0-255	Animation indexing
29	27	41		<b><u>Rotating Animation wheel 2:</u></b>
			0-7	No rotation
			8-127	Forwards rotation from fast to slow
			128-135	No rotation
			136-255	Backwards rotation from slow to fast
30	28	42		<b><u>Iris:</u></b>
			0-191	Max. diameter to Min.diameter
			192-223	Pulse closing fast to slow
			224-255	Pulse opening slow to fast
		43		<b><u>Iris Fine:</u></b>
			0-255	Iris Fine
31	29	44		<b><u>Prism 1:</u></b>
			0-127	Open
			128-255	Prism 1
32	30	45		<b><u>Rotating prism index, rotating prism rotation 1</u></b>
			0-127	Prism indexing
			128-189	Forwards prism rotation from fast to slow
			190-193	No rotation
			194-255	Backwards prism rotation from slow to fast
		46		<b><u>Rotating prism indexing Fine 1:</u></b>
			0-255	Fine indexing

33	31	47		<b><u>Prism 2:</u></b>
			0-127	Open
			128-255	Prism 2
34	32	48		<b><u>Rotating prism index, rotating prism rotation 2</u></b>
			0-127	Prism indexing
			128-189	Forwards prism rotation from fast to slow
			190-193	No rotation
			194-255	Backwards prism rotation from slow to fast
		49		<b><u>Rotating prism indexing Fine 2:</u></b>
			0-255	Fine indexing
35	33	50		<b><u>Frost 1:</u></b>
			0-255	0-100%
36	34	51		<b><u>Frost 2:</u></b>
			0-255	0-100%
37	35	52		<b><u>Blade 1A :</u></b>
			0-255	Open to Close
		53		<b><u>Blade 1A Fine :</u></b>
			0-255	Open to Close Fine
38	36	54		<b><u>Blade 1B :</u></b>
			0-255	Open to Close
		55		<b><u>Blade 1B Fine :</u></b>
			0-255	Open to Close Fine
39	37	56		<b><u>Blade 2A :</u></b>
			0-255	Open to Close
		57		<b><u>Blade 2A Fine :</u></b>
			0-255	Open to Close Fine
40	38	58		<b><u>Blade 2B :</u></b>
			0-255	Open to Close
		59		<b><u>Blade 2B Fine :</u></b>
			0-255	Open to Close Fine
41	39	60		<b><u>Blade 3A :</u></b>
			0-255	Open to Close
		61		<b><u>Blade 3A Fine :</u></b>
			0-255	Open to Close Fine
42	40	62		<b><u>Blade 3B :</u></b>
			0-255	Open to Close
		63		<b><u>Blade 3B Fine :</u></b>
			0-255	Open to Close Fine
43	41	64		<b><u>Blade 4A :</u></b>
			0-255	Open to Close
		65		<b><u>Blade 4A Fine :</u></b>
			0-255	Open to Close Fine
44	42	66		<b><u>Blade 4B :</u></b>
			0-255	Open to Close



		67		<b><u>Blade 4B Fine</u></b> :
			0-255	Open to Close Fine
45	43	68		<b><u>All Blade Rotation</u></b> :
			0-255	All Blade Rotation
		69		<b><u>All Blade Rotation Fine</u></b> :
			0-255	All Blade Rotation Fine
46	44	70		<b><u>Control, reset, internal programs:</u></b>
			0-4	unused
			5-9	Display Off
			10-14	Display On
			15-19	Display Invert Off
			20-24	Display Invert On
			25-26	Auto fan control mode
			27-28	Stage fan control mode
			29-30	Silence fan control mode
			31-32	Super Silence fan control mode
			33-34	Constant Fans Off
			35-36	Constant Fans On
			37-44	unused
			45-49	Square Law
			50-54	Linear
			55-58	1.2K
			59-62	2.4K
			63-66	16K
			67-69	25K
			70-74	Gobo correction Off
			75-79	Gobo correction On
			80-84	All motor reset
			85-87	Scan motor reset
			88-90	Colors motor reset
			91-93	Gobo motor reset
			94	unused
			95	Reset P/T Fade Off
			96	Reset P/T Fade On
			97-99	Other motor reset
			100-102	Frost Progressive Off
103-105	Frost Progressive On			
106-108	CMY speed Fast			
109-111	CMY speed Slow			
			112-255	unused

Mode/Channel	Value	Function
<b>Domino Mode</b>		
1		<b><u>PAN Movement 8bit :</u></b>
	0-255	Pan Movement
2		<b><u>Pan Fine 16bit</u></b>
	0-255	Fine control of Pan movement
3		<b><u>TILT Movement 8bit :</u></b>
	0-255	Tilt Movement
4		<b><u>Tilt Fine 16bit</u></b>
	0-255	Fine control of Tilt movement
5		<b><u>Speed Pan/Tilt movement:</u></b>
	0-225	max to min speed
	226-235	blackout by movement
	236-245	blackout by all wheel changing
	246-255	no function
6		<b><u>Shutter, strobe:</u></b>
	0-10	Shutter closed
	11-20	No function (shutter open)
	21-117	Strobe effect slow to fast
	118-126	No function (shutter open)
	127-180	Pulse-effect in sequences
	181-191	No function (shutter open)
	192-245	Random strobe effect slow to fast
246-255	No function (shutter open)	
7		<b><u>Dimmer intensity:</u></b>
	0-255	Intensity 0 to 100%
8		<b><u>Fine Dimmer intensity:</u></b>
	0-255	Dimmer intensity fine
12		<b><u>Zoom :</u></b>
	0-255	Zoom adjustment from small to big
13		<b><u>Zoom Fine:</u></b>
	0-255	Zoom adjustment Fine
14		<b><u>Focus :</u></b>
	0-255	Continuous adjustment from near to far
15		<b><u>Focus Fine:</u></b>
	0-255	Continuous adjustment Fine
16		<b><u>Auto Focus :</u></b>
	0-50	Auto Focus Off
	51-100	5m
	101-150	7.5m
	151-200	10m
201-255	15m	
17		<b><u>AutoFocus Fine:</u></b>
	0-255	Continuous adjustment Fine
18		<b><u>Color Wheel:</u></b>
	0-3	Open / white

	4-7	Color 1
	8-11	Color 2
	12-15	Color 3
	16-19	Color 4
	20-23	Color 5
	24-27	Color 6
	28-127	Color indexing
	128-189	Forwards rainbow effect from fast to slow
	190-193	No rotation
	194-255	Backwards rainbow effect from slow to fast
19		<b><u>Color Wheel Fine:</u></b>
	0-255	Color Wheel colour change to any position Fine
20		<b><u>CTB/CRI:</u></b>
	0-63	Open
	64-127	CTB
	128-255	unused
21		<b><u>Cyan Color :</u></b>
	0-255	Cyan (0-white, 255-100% Cyan)
22		<b><u>Cyan Color Fine :</u></b>
	0-255	Cyan Fine
23		<b><u>Magenta Color :</u></b>
	0-255	Magenta (0-white, 255-100% magenta)
24		<b><u>Magenta Color Fine :</u></b>
	0-255	Magenta Fine
25		<b><u>Yellow Color :</u></b>
	0-255	Yellow (0-white, 255-100% Yellow)
26		<b><u>Yellow Color Fine :</u></b>
	0-255	Yellow Fine
27		<b><u>CTO Color :</u></b>
	0-255	CTO (0-white, 255-100% CTO)
28		<b><u>CTO Color Fine :</u></b>
	0-255	CTO Fine
9		Reserved
10		Reserved
11		Reserved
29		<b><u>Rotating gobos, cont. rotation 1:</u></b>
	0-9	Open
	10-19	Rot. gobo 1
	20-29	Rot. gobo 2
	30-39	Rot. gobo 3
	40-49	Rot. gobo 4
	50-59	Rot. gobo 5
	60-69	Rot. gobo 6
	70-77	Rot. Gobo 7
	78-93	Gobo 1 shake slow to fast
	94-109	Gobo 2 shake slow to fast

	110-125	Gobo 3 shake slow to fast
	126-141	Gobo 4 shake slow to fast
	142-157	Gobo 5 shake slow to fast
	158-173	Gobo 6 shake slow to fast
	174-189	Gobo 7 shake slow to fast
	190-221	Gobo wheel rotation forwards from fast to slow
	222-223	No rotation
	224-255	Gobo wheel rotation f backwards from slow to fast
30		<b><u>Rotating gobo index,rotating gobo rotation 1:</u></b>
	0-127	Gobo indexing
	128-189	Forwards gobo rotation from fast to slow
	190-193	No rotation
	194-255	Backwards gobo rotation from slow to fast
31		<b><u>Rotating gobo indexing Fine 1:</u></b>
	0-255	Fine indexing
32		<b><u>Rotating gobos, cont. rotation 2:</u></b>
	0-9	Open
	10-19	Rot. gobo 1
	20-29	Rot. gobo 2
	30-39	Rot. gobo 3
	40-49	Rot. gobo 4
	50-59	Rot. gobo 5
	60-69	Rot. gobo 6
	70-77	Rot. Gobo 7
	78-93	Gobo 1 shake slow to fast
	94-109	Gobo 2 shake slow to fast
	110-125	Gobo 3 shake slow to fast
	126-141	Gobo 4 shake slow to fast
	142-157	Gobo 5 shake slow to fast
	158-173	Gobo 6 shake slow to fast
	174-189	Gobo 7 shake slow to fast
	190-221	Gobo wheel rotation forwards from fast to slow
	222-223	No rotation
	224-255	Gobo wheel rotation f backwards from slow to fast
	33	
0-127		Gobo indexing
128-189		Forwards gobo rotation from fast to slow
190-193		No rotation
194-255		Backwards gobo rotation from slow to fast
34		<b><u>Rotating gobo indexing Fine 2:</u></b>
	0-255	Fine indexing
35		<b><u>Animation wheel 1:</u></b>
	0	open
	1-239	Animation indexing
	240-255	shake slow to fast
36		<b><u>Animation wheel 1:</u></b>

	0-7	No rotation
	8-127	Forwards rotation from fast to slow
	128-135	No rotation
	136-255	Backwards rotation from slow to fast
		<b><u>Animation wheel 2:</u></b>
37	0-7	open
	8-127	Forwards rotation from fast to slow
	128-135	No rotation
	136-255	Backwards rotation from slow to fast
		<b><u>Iris:</u></b>
38	0-191	Max. diameter to Min.diameter
	192-223	Pulse closing fast to slow
	224-255	Pulse opening slow to fast
		<b><u>Iris Fine:</u></b>
39	0-255	Iris Fine
		<b><u>Prism 1:</u></b>
40	0-127	Open
	128-255	5-Facet Prism
		<b><u>Rotating prism index, rotating prism rotation 1</u></b>
41	0-127	Prism indexing
	128-189	Forwards prism rotation from fast to slow
	190-193	No rotation
	194-255	Backwards prism rotation from slow to fast
		<b><u>Rotating prism indexing Fine 1:</u></b>
42	0-255	Fine indexing
		<b><u>Prism 2:</u></b>
43	0-127	Open
	128-255	Linear Prism
		<b><u>Rotating prism index, rotating prism rotation 2</u></b>
44	0-127	Prism indexing
	128-189	Forwards prism rotation from fast to slow
	190-193	No rotation
	194-255	Backwards prism rotation from slow to fast
		<b><u>Rotating prism indexing Fine 2:</u></b>
45	0-255	Fine indexing
		<b><u>Frost 1:</u></b>
46	0-255	0-100%
		<b><u>Frost 2:</u></b>
47	0-255	0-100%
		<b><u>Blade 1A :</u></b>
48	0-255	Open to Close
		<b><u>Blade 1A Fine :</u></b>
49	0-255	Open to Close Fine
		<b><u>Blade 1B :</u></b>
50	0-255	Open to Close
51		<b><u>Blade 1B Fine :</u></b>

	0-255	Open to Close Fine
52		<b><u>Blade 2A :</u></b>
	0-255	Open to Close
53		<b><u>Blade 2A Fine :</u></b>
	0-255	Open to Close Fine
54		<b><u>Blade 2B :</u></b>
	0-255	Open to Close
55		<b><u>Blade 2B Fine :</u></b>
	0-255	Open to Close Fine
56		<b><u>Blade 3A :</u></b>
	0-255	Open to Close
57		<b><u>Blade 3A Fine :</u></b>
	0-255	Open to Close Fine
58		<b><u>Blade 3B :</u></b>
	0-255	Open to Close
59		<b><u>Blade 3B Fine :</u></b>
	0-255	Open to Close Fine
60		<b><u>Blade 4A :</u></b>
	0-255	Open to Close
61		<b><u>Blade 4A Fine :</u></b>
	0-255	Open to Close Fine
62		<b><u>Blade 4B :</u></b>
	0-255	Open to Close
63		<b><u>Blade 4B Fine :</u></b>
	0-255	Open to Close Fine
64		<b><u>All Blade Rotation :</u></b>
	0-255	All Blade Rotation
65		<b><u>All Blade Rotation Fine :</u></b>
	0-255	All Blade Rotation Fine
66		<b><u>Control, reset, internal programs:</u></b>
	0-4	unused
	5-9	Display Off
	10-14	Display On
	15-19	Display Invert Off
	20-24	Display Invert On
	25-26	Auto fan control mode
	27-28	Stage fan control mode
	29-30	Silence fan control mode
	31-32	Super Silence fan control mode
	33-34	Constant Fans Off
	35-36	Constant Fans On
	37-44	unused
	45-49	Square Law
	50-54	Linear
55-57	1.2K	
58-60	2.4K	

61-63	16K
64-69	25K
70-74	Gobo correction Off
75-79	Gobo correction On
80-84	All motor reset
85-87	Scan motor reset
88-90	Colors motor reset
91-93	Gobo motor reset
94	unused
95	Reset P/T Fade Off
96	Reset P/T Fade On
97-99	Other motor reset
100-102	Frost Progressive Off
103-105	Frost Progressive On
106-108	CMY speed Fast
109-111	CMY speed Slow
112-255	unused

<b>Appendix</b>	
<b>name (=DMX value)</b>	<b>color name</b>
EC003	LAVENDER TINT
EC004	MEDIUM BASTARD AMBER
EC007	PALE YELLOW
EC008	DARK SALMON
EC009	PALE AMBER GOLD
EC010	MEDIUM YELLOW
EC013	STRAW TINT
EC015	DEEP STRAW
EC017	SURPRISE PEACH
EC020	MEDIUM AMBER
EC021	GOLD AMBER
EC022	DARK AMBER
EC024	SCARLET
EC025	SUNSET RED
EC026	BRIGHT RED
EC029	PALSA RED
EC035	LIGHT PINK
EC036	MEDIUM PINK
EC046	DARK MAGENTA
EC048	DARK PURPLE
EC052	LIGHT LAVENDER
EC053	PALE LAVENDER
EC058	LAVENDER
EC063	PALE BLUE

EC068	SKY BLUE
EC071	TOKIO BLUE
EC075	EVENING BLUE
EC079	JUST BLUE
EC085	DEEPER BLUE
EC088	LIME GREEN
EC089	MOSS GREEN
EC090	DARKYELLOW GREEN
EC100	SPRING YELLOW
EC101	YELLOW
EC102	LIGHT AMBER
EC103	STRAW
EC104	DEEP AMBER
EC105	ORANGE
EC106	PRIMAY RED
EC107	LIGHT ROSE
EC108	ENGLISH ROSE
EC109	LIGHT SALMON
EC110	MIDDLE ROSE
EC111	DARK PINK
EC113	MAGENTA
EC116	MEDIUM BLUE GREEN
EC118	LIGHT BLUE
EC119	DARK BLUE
EC120	DEEP BLUE
EC124	DARK GREEN
EC126	MAUVE
EC127	SMOKEY PINK
EC128	BRIGHT PINK
EC132	MEDIUM BLUE
EC134	GOLDEN AMBER
EC136	PALE LAVENDER
EC137	SPECIAL LAVENDER
EC138	PALE GREEN
EC139	PRIMARY GREEN
EC140	SUMMER BLUE
EC141	BRIGHT BLUE
EC142	PALE VIOLET
EC143	PALE NAVY BLUE
EC147	APRICOT
EC148	BRIGHT ROSE
EC151	GOLD TINT
EC152	PALE GOLD
EC153	PALE SALMON
EC154	PALE ROSE
EC156	CHOCOLATE



EC158	DEEP ORANGE
EC159	NO COLOR STRAW
EC161	SLATE BLUE
EC162	BASTARD AMBER
EC164	FLAME RED
EC165	DAYLIGHT BLUE
EC169	LILAC TINT
EC170	DEEP LAVENDER
EC172	LAGOON BLUE
EC174	DARK STEEL BLUE
EC176	LOVING AMBER
EC179	CHROME ORANGE
EC180	DARK LAVENDER
EC181	CONGO BLUE
EC182	LIGHT RED
EC183	MOONLIGHT BLUE
EC192	FLESH PINK
EC193	ROSY AMBER
EC194	SURPRISE PINK
EC195	ZENITH BLUE
EC196	TRUE BLUE
EC197	ALICE BLUE
EC198	PALACE BLUE

## 12. ERROR MESSAGES

When you turn on the device, it will first perform a reset. The display may show “Err channel is XX” should there be problems with one or more functions. “XX” stands for channel 1, 2, 3, 4, 5, 6 etc whose sensor has encountered a problem. For example, when the display shows “Err channel is Pan movement”, it means there is an error on channel 1. If there are errors on channel 1, channel 3, channel 6 at the same time, you may see the error message, “Err channel is Pan movement”, “Err channel is Tilt movement” “Err channel is Shutter”, flash twice, and then the device will generate a second reset. If the error messages persist after performing a reset more than twice, the channels which have errors may not work properly however, all other functions can work as usual. Please contact your dealer or manufacturer for service. Self repair is not allowed.

### **PAN- movement Er**

(PAN- yoke movement error) This message will appear after the reset of the fixture if the yoke’s magnetic-indexing circuit malfunction (Optical Sensor or Magnetic Sensor fails) or the stepper motor is defective (or its driving IC on the main PCB). The PAN- movement is not located in the default position after the reset.

### **TILT- movement Er**

(TILT- head movement error) This message will appear after the reset of the fixture if the head’s magnetic-indexing circuit malfunctions ((Optical Sensor or Magnetic Sensor fails)) or the stepper motor is defective (or its driving IC on the main PCB). The TILT- movement is not located in the default position after the reset.

### **Zoom wheel Er**

(Zoom wheel error) This message will appear after the reset of the fixture if the head’s magnetic-indexing circuit malfunctions (Optical Sensor or Magnetic Sensor fails) or the stepper motor is defective (or its driving IC on the main PCB). The Zoom - movement is not located in the default position after the reset.

### **Focus 1 wheel Er**

(Focus 1 wheel error) This message will appear after the reset of the fixture if the head’s magnetic-indexing circuit malfunctions (Optical Sensor or Magnetic Sensor fails) or the stepper motor is defective (or its driving IC on the main PCB). The Focus 1 - movement is not located in the default position after the reset.

### **Focus 2 wheel Er**

(Focus 2 wheel error) This message will appear after the reset of the fixture if the head’s magnetic-indexing circuit malfunctions (Optical Sensor or Magnetic Sensor fails) or the stepper motor is defective (or its driving IC on the main PCB). The Focus 2 - movement is not located in the default position after the reset.

### **Color wheel Er**

(Color wheel- error) This message will appear after the reset of the fixture if the head’s magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Color - movement is not located in the default position after the reset.

**Cyan Color wheel Er**

(Cyan Color wheel- error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The CMY - movement is not located in the default position after the reset.

**Magenta Color wheel Er**

(Magenta Color wheel- error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The CMY - movement is not located in the default position after the reset.

**Yellow Color wheel Er**

(Yellow Color wheel- error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The CMY - movement is not located in the default position after the reset.

**CTO wheel Er**

(CTO wheel- error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The CTO - movement is not located in the default position after the reset.

**Rot\_Gobo1 wheel Er**

(Rot\_Gobo1 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Rot\_Gobo1 - movement is not located in the default position after the reset.

**Rot\_Gobo2 wheel Er**

(Rot\_Gobo2 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Rot\_Gobo2 - movement is not located in the default position after the reset.

**Animation 1 wheel Er**

(Animation 1 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Animation 1 - movement is not located in the default position after the reset.

**Animation 2 wheel Er**

(Animation 2 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Animation 2 - movement is not located in the default position after the reset.

**Iris wheel Er**

(Iris wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Iris - movement is not located in the default position after the reset.

**Prism\_1 wheel Er**

(Prism\_1 wheel- error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Prism\_1 - movement is not located in the default position after the reset.

**Prism\_2 wheel Er**

(Prism\_2 wheel- error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Prism\_2 - movement is not located in the default position after the reset.

**Prism\_3 wheel Er**

(Prism\_3 wheel- error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Prism\_3 - movement is not located in the default position after the reset.

**Blade 1 wheel Er**

(Blade 1 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Blade 1 - movement is not located in the default position after the reset.

**Blade 1\_Rot wheel Er**

(Blade 1\_Rot wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Blade 1\_Rot - movement is not located in the default position after the reset.

**Blade 2 wheel Er**

(Blade 2 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Blade 2 - movement is not located in the default position after the reset.

**Blade 2\_Rot wheel Er**

(Blade 2\_Rot wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Blade 2\_Rot - movement is not located in the default position after the reset.

**Blade 3 wheel Er**

(Blade 3 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Blade 3 - movement is not located in the default position after the reset.

**Blade 3\_Rot wheel Er**

(Blade 3\_Rot wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Blade 3\_Rot - movement is not located in the default position after the reset.

**Blade 4 wheel Er**

(Blade 4 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Blade 4 - movement is not located in the default position after the reset.

**Blade 4\_Rot wheel Er**

(Blade 4\_Rot wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Blade 4\_Rot - movement is not located in the default position after the reset.

**All\_Blade\_Rot wheel Er**

(All\_Blade\_Rot wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The All\_Blade\_Rot - movement is not located in the default position after the reset.

**Frost 1 wheel Er**

(Frost 1 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Frost 1 - movement is not located in the default position after the reset.

**Frost 2 wheel Er**

(Frost 2 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Frost 2 - movement is not located in the default position after the reset.

**Frost 3 wheel Er**

(Frost 3 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Frost 3 - movement is not located in the default position after the reset.

**Animation\_Rot 1 wheel Er**

(Animation\_Rot 1 wheel - error) This message will appear after the reset of the fixture if the

head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Animation\_Rot 1 - movement is not located in the default position after the reset.

#### **Animation\_Rot 2 wheel Er**

(Animation\_Rot 2 wheel - error) This message will appear after the reset of the fixture if the head's magnetic-indexing circuit malfunctions (sensor failed or magnet missing) or the stepper motor is defective (or its driving IC on the main PCB). The Animation\_Rot 2 - movement is not located in the default position after the reset.

### **13. CLEANING AND MAINTENANCE**

The following points have to be considered during inspection:

- 1) All screws for installing the devices or parts of the device have to be tightly connected and must not be corroded.
  - 2) There must not be any deformations to the housing, lenses, rigging and installation points (ceiling, suspension, trussing).
  - 3) Motorized parts must not show any signs of wear and must move smoothly without issue.
  - 4) The power supply cables must not show any damage, material fatigue or sediment.
- Further instructions depending on the installation location and usage have to be adhered to by a qualified installer and any safety concerns have to be removed.



#### **CAUTION!**

Disconnect from mains before starting maintenance operation.

In order to ensure the device remains in good condition and does not fail prematurely, we suggest regular maintenance.

- 1) Clean the inside and outside lens each week to avoid loss of output due to accumulation of dust/ dirt on the lens.
- 2) Clean the fans each week to ensure maximum airflow and efficient thermal cooling. This will ensure the light source is operated in the best possible condition.
- 3) A detailed electrical check by an approved electrician every quarter to make sure that the circuit contacts are in good condition. This will prevent poor circuit contacts and the resultant overheating.

We recommend frequent cleaning of the device. Please use a moist, lint- free cloth. Never use alcohol or solvents.

Please refer to the instructions under “Installation instructions” .

Should you need any spare parts, please order genuine parts from your local dealer.

**Remark:** Errors and omissions for all information given in this manual are excepted. All information is subject to change without prior notice.



