



FRACTAL
LIGHTS



MORPH 150

LED Moving Head Light

USER MANUAL

1. GENERAL INFORMATION:

Thank you very much for choosing our product. For safety purpose, please read this manual carefully before your operation. This manual included installation and using information. Please install and operate it according to this manual.

Unpacking: Once receive it, please handle it carefully and check if there is some shatter because of transportation and the following fittings are OK.

In the carton, there are four things available:

Moving head light: 1PC

Power cable: 1PC

Fast Lock: 2PCS

User manual: 1 PC

Warning! To prevent or reduce the risk of electrical shock or fire, do not expose this unit to rain or moisture.

Caution! There are no user serviceable parts inside this unit. Do not attempt any repairs yourself. Doing so will void your manufacturer's warranty. In the unlikely event your unit may require service please contact us.

SECURITY TIPS

WARNING!!! To reduce the risk of fire, electric shock, or injury to persons, follow these important safety instructions:

- Non-professionals are not to disassemble the moving head LED unit and lighting accessories inside.
- Rated voltage range: AC110V-120V/60Hz or AC200V-240V / 50HZ (to be selected).
- The unit should not be placed near flammable materials and should maintain at least 1M distances from its projection area.
- The moving head should only be used in ambient temperature: $-15^{\circ}\text{C} > 40^{\circ}\text{C}$, the highest temperature of the surface of the lamp: 60°C .
- To keep away from the liquid substance and humid environment.
- Before using the moving head please ensure a good earth is fitted.
- The installation of the moving heads, you must check fixing screw fasteners with additional security cable and a regular inspection done.
- LED consecutive working hours is not recommended for more than 10 hours per time.
- Moving head should not be used in time when unusual conditions are in play.
- Moving head should be regularly inspected of the rotation, external accessories and paste parts, in a timely manner to prevent accident or damage to the unit or persons.
- Moving head fans should be checked weekly as it is easy to accumulate the dust, so weekly cleaning of especially the cooling air opening and fans, otherwise unit may over heat and cause damage.



Zgodnie z przepisami ustawy z dnia 1 lipca 2005 roku o zużytych sprzęcie elektrycznym i elektronicznym, zabronione jest umieszczanie go łącznie z innymi odpadami. Użytkownik, który zamierza pozbyć się tego produktu, jest zobowiązany do oddania zużytego sprzętu elektrycznego i elektronicznego do punktu zbierania zużytego sprzętu. Punkty zbierania prowadzone są m.in. przez sprzedawców hurtowych i detalicznych tego sprzętu oraz przez gminne jednostki organizacyjne prowadzące działalność w zakresie odbierania odpadów. Powyższe obowiązki ustawowe wprowadzone zostały w celu ograniczenia ilości odpadów powstałych ze zużytego sprzętu elektrycznego i elektronicznego oraz zapewnienia odpowiedniego poziomu zbierania, odzysku i recyklingu zużytego sprzętu. Prawidłowa realizacja tych obowiązków ma znaczenie zwłaszcza w przypadku gdy w zużytych sprzęcie znajdują się składniki niebezpieczne, które mają szczególnie negatywny wpływ na środowisko i zdrowie ludzi.

3. TECHNOLOGY REFERENCE

Input Power: AC100-240V, 50/60 Hz
 Power Consumption: 200W
 Light Source: 150W White LED
 DMX Channel: 18 channels
 Pan Scan: 540°(16bit) Electric correction
 Tilt Scan: 270° (16bit) Electric correction
 Color Wheel: 7 Colors + White, Half-color, rain-bow flow effect
 Static Gobo: 9 gobos+open. Gobo shake
 Rotation Gobo: 6 glass gobos+open, Gobo shake
 Prism: 3-faced Prism, can rotation in both direction
 Lens: Optical system mechanical focus .
 Beam Angle: 3°-7°
 Zoom Angle: 7°-21°
 Control Mode: DMX512/Master-Slave/Auto run/Sound active
 Support RDM
 Dimmer: 0- 100 % linear dimmer
 Strobe: 0-20 HZ
 Frost: A frost soft light mirror
 Display: LCD display
 Light Size: 28*21.5*48.5 cm
 Weight: 9.33 kg

4. DISPLAYCODE SETTING METHOS

Menu - Press any key to the initial interface

Setting	Run Mode	DMX
		Sound
		AUTO1
		AUTO2
		AUTO3
		AUTO4
		Rand
	Address	001-512
	Channel	18CH
	Sens	80
	InvertPan	ON/OFF
	InvertTilt	ON/OFF
	SwapPanTilt	ON/OFF
	Codewheel	ON/OFF
	SigTimeOut	KEEP/CLEAR
	ScreenSaver	ON/OFF
	ColourSmooth	ON/OFF
	LoadFactorySet	>

Test	Pan	0-255
	Pan Fine	0-255
	Tilt	0-255
	Tilt Fine	0-255
	PanTiltTime	0-255
	Dimmer	0-255
	Strobe	0-255
	Colour	0-255
	Gobo	0-255
	Gobo2	0-255
	Gobo2Rotation	0-255
	Prism	0-255
	PrismRotation	0-255
	Focus	0-255
	Zoom	0-255
	Frost	0-255
	Macro	0-255
	Reset	>
Offset	PanOffset	(-128) - (+127)
	TiltOffset	(-128) - (+127)
	ColourOffset	(-128) - (+127)
	GoboOffset	(-128) - (+127)
	Gobo2Offset	(-128) - (+127)
	FocusOffset	(-128) - (+127)
	ZoomOffset	(-128) - (+127)
	PrismOffset	(-128) - (+127)
	FrostOffset	(-128) - (+127)
Advance	LanguageSwitch	>
	ScreenRot	>
	HoursClear	>
	TopTemperature	0-120
HardWare	PanHall	X
	TiltHall	X
	ColourHall	X
	Gobo2FrostHall	X
	FocusHall	X
	ZoomHall	X
	PrismHall	X
	FrostHall	X
	GoboHall	X
	PanCodewheel	XX
	PanSteps	XXXXX
	TiltCodewheel	XX
	TiltSteps	XXXXX
SysInfo	Version	XXXXXXXXXX
	TotalHours	XXXXX
	OnHours	XXXXX
	Temperature	XXX

Menu Instruction

1. Setting

Run Mode:

DMX, 18CH.

Sound Mode, It can set as master, The other fixtures can follow it running

AUTO1-AUTO4, It can set as master, The other fixtures can follow it running

Random Mode, It can set as master, The other fixtures can follow it running

DMX Address: Set the address from 1-512

Channel: Set the DMX Channel: 18CH

Sens: Sound sensitive, 1-99 to adjust the sound sensitive, 1 is the most insensitive, 99 is most sensitive

InvertPan: Pan Invert

InvertTilt: Tilt Invert

SwapPanTilt: Pan/Tilt Swap

Codewheel: It can Open or Close Codewheel error correction function

SigTimeOut: Signal Time Out, Disconnect the signal from Controller or Master light, Your can choose KEEP or CLEAR to keep the DMX signal

ScreenSaver: Screen Save

ColourSmooth: Color linear

LoadFactorySet: Restore to factory setting

Test:

Corresponds to the DMX channel, It will change the Initial value as the auto running mode or DMX Control Mode. It can set in Channel Mode

Offset

PanOffset: Adjust the Pan Offset

TiltOffset: Adjust the Tilt Offset

ColourOffset: Adjust the Colour Wheel Offset

GoboOffset: Adjust the Gobo Wheel Offset

Gobo2Offset: Adjust the Gobo2 Wheel Offset

FocusOffset: Adjust the Focus Offset

ZoomOffset: Adjust the Zoom Offset

PrismOffset: Adjust the Prism Offset

FrostOffset: Adjust the Frost Offset

Advance

LanguageSwitch: Press OK to Change the current language (English/Chinese)

ScreenRot: Switch the screen display direction.

HourClear: Clear the lighting hour or the using hour

TopTemperature: If detected the current temperature is over the protection temperature, It will decrease the brightness

HardWare

PanHall: The Status of Pan Hall

TiltHall: The Status of Tilt Hall

ColourHall: The Status of Colour Hall

Gobo2Hall: The Status of Gobo2 Hall

FocusHall: The Status of Focus Hall

ZoomHall: The Status of Zoom Hall

PrismHall: The Status of Prism Hall

FrostHall: The Status of Frost Hall

GoboHall: The Status of Gobo Hall

PanCodeWheel: The Status of Pan Codewheel

PanSteps: The Steps of Pan Codewheel

TiltCodeWheel: The Status of Tilt Codewheel

TiltSteps: The Steps of Tilt Codewheel

SysInfo

Version: Current Version: 190327091945

TotalHours: The fixture's total using hours, It can be clear in Advance

OnHours: This time on hours

Temperature: The led's temperature, If the temperature over the protection value, It will decrease the brightness

5. DMX Channel Sheet

18CH	Function	Value	Instruction
1	Pan	0-255	Pan
2	Pan Fine	0-255	Pan 16bit
3	Tilt	0-255	Tilt
4	Tilt Fine	0-255	Tilt 16bit
5	Pan/Tilt Speed	0-255	Pan/Tilt Speed from slow to fast
6	Dimmer	0-255	Linear dimmer from dark to brighter
7	Strobe	0-10	No Strobe
		11-255	Strobe from slow to fast
8	Color	0-4	White
		5-9	White + Color 1
		10-14	Color 1
		15-19	Color 1 + Color 2
		20-24	Color 2
		25-29	Color 2 + Color 3
		30-34	Color 3
		35-39	Color 3 + Color 4
		40-44	Color 4
		45-49	Color 4 + Color 5
		50-54	Color 5
		55-59	Color 5 + Color 6
		60-64	Color 6
		65-69	Color 6 + Color 7
		70-74	Color 7
		75-79	Color 7 + White
		80-167	Color Rotation(CW): Fast -> Slow
		168-255	Color Rotation(CCW): Slow -> Fast

9	Static Gobo	When CH 10 adjusted, It's only White	
		0-9	White
		10-15	Gobo 1
		15-19	Gobo 2
		20-24	Gobo 3
		25-29	Gobo 4
		30-34	Gobo 5
		35-39	Gobo 6
		40-44	Gobo 7
		45-49	Gobo 8
		50-54	Gobo 9
		55-59	Gobo 1 Shake
		60-64	Gobo 2 Shake
		65-69	Gobo 3 Shake
		70-74	Gobo 4 Shake
		75-79	Gobo 5 Shake
		80-84	Gobo 6 Shake
		85-89	Gobo 7 Shake
		90-94	Gobo 8 Shake
		95-99	Gobo 9 Shake
		100-177	Gobo Rotation(CW): Fast -> Slow
		178-255	Gobo Rotation(CCW): Slow -> Fast
10	Rot Gobo	0-9	White
		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
		70-79	Rot Gobo 1 Shake
		80-89	Rot Gobo 2 Shake
		90-99	Rot Gobo 3 Shake
		100-109	Rot Gobo 4 Shake
		110-119	Rot Gobo 5 Shake
		120-129	Rot Gobo 6 Shake
		130-193	Gobo Wheel Rotation (CW): Fast -> Slow
		194-255	Gobo Wheel Rotation (CCW): Slow -> Fast
11	Gobo Rot	0-127	Gobo Position
		128-190	Gobo Rotation(CW): Fast -> Slow
		191-192	Stop
		193-255	Gobo Rotation(CCW): Slow -> Fast
12	Prism	0-127	Invalid
		127-255	Prism

13	Prism Rot	0-127	Prism Position
		128-190	Prism Rotation(CW): Fast -> Slow
		191-192	Stop
		193-255	Prism Rotation(CCW): Slow -> Fast
14	Focus	0-255	Focus
15	Zoom	0-255	Zoom
16	Frost	0-127	Invalid
		128-255	Frost
17	Macro Function	0-5	Invalid
		6-55	Mode 1
		56-105	Mode 2
		106-155	Mode 3
		156-205	Mode 4
		206-255	Random Mode
18	Reset	0-25	Invalid
		26-76	Small Motors Reset after 5s
		77-127	XY Reset after 5s
		128-255	All reset after 5s

6. DIFFICULTY RESOLUTIONS

The following is a list of problems and resolutions should only be preformed by professionally qualified staff.

1. Bulb not working

- Check whether approaching the service life of LED, then change it
- Check whether LED circuitry is not loss or connect poorly
- 2. Beam appears flash or is patchy
- The LED maybe approach the service life, then change it, or the optical components are unclean.
- LED has an accumulation of dust, so the LED and other parts inside the lamp should be cleaned and maintained in regular period.

3. LCD Display works intermittently

- Check whether the fan running
- Check inner temperature-response control plug is off
- Check whether the circuitry is good and contacted properly

4. The computer lamp not controlled by controller during lighting

- Check numeral starting address and the connection of communication control circuit
- The corresponding channel button of controller is open or not
- Check whether the fuse on power supply input jack is broken off

7. CLEANING

To make sure the stable run of the moving head, you should keep it clean. All fans, lens and color filters, do not use any soluble detergent when cleaning the color filter avoiding the damage to LED.