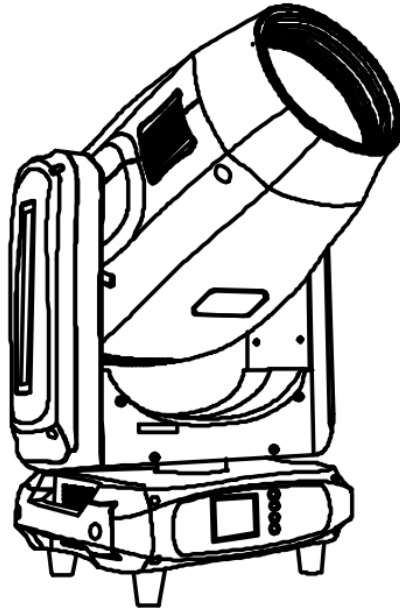


Matrix Hybrid CMY



350W LED CMY Hybrid Moving Head with CMY color mixing , Beam 4 degrees, 4-36 degrees zoom for Spot , CMY For Wash,Beam/Spot/Wash, 3 in 1

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To be on the safe side and under the terms of the security, do not allow to restructure and modify this product. Please note that because of man-made damage caused by improper use, is beyond the scope of our warranty.

This equipment pass strict inspection before shipment, please comply with the instruction manual operation requirements, to ensure the safe operation of the product under normal conditions. Any damage caused by improper operation, will cause the cessation of the warranty claim. Manufacturer does not accept any because of improper operation products or non-compliance of the instructions of any liability for property damage and personal injury.

Please place the manual in safe place for future reference and in products for sale or lease or handling running new holder.

1. Instruction

1.1 Application According to Purpose

- This product is a lighting effect which creates special light effects with one lamp. To generate these effects, the product must be connected to mains and a DMX-512 compatible controller.
- This product is designed for 110/230V, 50/60Hz operation and exclusively for indoor use.
- If used for any purpose other than described in these operating instructions, the device may suffer damage and the warranty expires. Also, any other use is linked with risks such as short circuits, fire, electrical shock, etc.
- The manufacturer's serial number must never be removed as otherwise the warranty expires.
- Safety and Maintenance

1.2 Indoor use only

- Make sure the equipment load-bearing structures can withstand the weight of more than 10 times when above ground installation
- Disconnect with power supply before replacing lamp, fuse or other accessories
- Only operation under electrical standards with leakage protection device A/C
- Cool down for 15 minutes before replacing lamps. Please do not use other company's accessories.
- Contact your specialized dealer for any technical problem

1.3 Safety operation

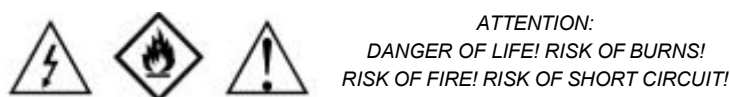
- Do not operate without outer cover or lenses
- Do not look directly to the light
- Replace immediately when lamp broken
- Do not project directly to items near 0.5M
- Do not operate when temperature up to 40°

2. LDiodes



During operation, the lamps will reach temperatures of up to 75° C. Touching the lamps may cause serious burns! Objects coming into contact with the lamps during and shortly after operation may catch fire!

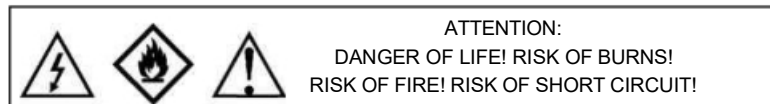
3. Supply Voltages, Mains Cord and Connection to Mains



- The handling of supply voltage, mains cords and connections to mains calls for particular care considering the risk from a life-threatening electric shock, the risk of fire and the risk of short circuits! Please observe the following notes in particular:
- Products operating on supply voltage should be kept out of the reach of children. Therefore ensure the permanent supervision if children are in the immediate vicinity of the product!
- For commercial facilities the regulations on the prevention of accidents of the respective trade association must be observed. The operation of this equipment at schools, training facilities, and hobby or self-help workshops must be supervised responsibly by trained personnel.
- Check the product regularly for any damage to the mains cord! Should you discover any damage to the mains cord, do not operate or disconnect this product! Secure the product against accidental operation and contact your specialized dealer Always separate the product from mains by holding the mains plug by the handling surface. Never disconnect by holding the line cord! Be sure to

- connect the product exclusively to 230 V, 50 Hz A/C!
- Always ensure during installation, operation, transport and when storing the product that the mains cord is not exposed to possible mechanical damage, or damage caused by humidity, fluids, heat or cold!
- The product's cable entry must not be exposed to stress from pull! Create the mains connection once the product has been installed only. Always connect the mains plug last!
- The product must only be connected to a proper outlet of the public supply grid. Connect the mains cord to suitable outlets only! Use extensions cords in compliance with specifications only! Do not allow the mains cord to come into contact with other cords!
- Ensure during installation, operation, transport and storage that none of the cables are freely exposed! Never touch the mains cord, mains plug and outlets with wet or damp hands!
- When not using the product, and prior to cleaning always disconnect the product from mains! To do so, hold the mains plug by the handling surface and never pull the mains cord!
- Never connect the device to dimmer packs!

4. Housing



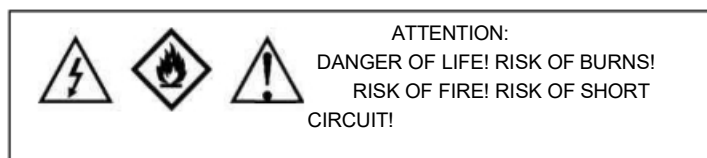
- Always ensure during installation, operation, transport and when storing the product that no shocks or other forces impact the housing!
 - The housing must not touch onto any other devices or objects during operation!
 - Easily flammable materials, e.g. decoration material and other surfaces and objects, must maintain a minimum distance of 3m to the housing! walls must maintain a minimum distance of 50cm to the housing! The device must be installed on a fireproof surface only (no carpet)! Always ensure a proper circulation of air.
- Do not touch the housing during operation it will heat up. The housing is safe to touch approx. 5 minutes following the end of operation!

The device must never be carried via the projector arms. Use the carrying handles only!

Fluids must not enter the housing as this could reduce the protective insulation and may trigger short circuits which may lead to fatal electric shocks! If fluids have entered, disconnect the mains plug immediately and secure the product against unintentional operation and contact your specialized dealer! Damage caused as a result of fluids entering the housing is exempt from warranty.

No metal parts or other items must enter the housing as this may reduce the protective insulation or trigger short circuits which may lead to fatal electric shocks! If metal parts or other items have entered, disconnect the mains plug immediately, secure the product against unintentional operation and contact your specialized dealer! Damage caused by metal parts or other items in the housing is exempt from warranty.

5. Operating Environment



The product must be operated and stored in a dry environment only! Splash water, rain, humidity, fog may reduce the protective insulation which may lead to fatal electric shocks! The limit value for relative humidity is 50% at 45 ° C. A minimum distance of 1.5m to a fog machine must be observed; fog saturation in the room must not reduce the visibility to below 10m.

The product must be operated at a temperature range of between -5 ° C and 45 ° C only. Protect the product against direct exposure to sunlight or other heat, such as from radiators! If the product is taken from a cold environment into a warm environment it must only be taken into operation once it has reached ambient temperature, since the condensation created by the difference in temperature may destroy the device!

Protect the product against dust! Dust may reduce the protective insulation, which may cause fatal

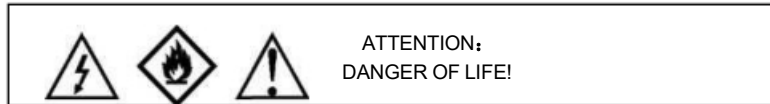
electric shocks!

The product must be operated at altitudes ranging between 20m below and 3000m above sea level only!

The product must not be operated during thunder storms; risk of destruction from surge voltages!

The product must be operated at a minimum distance of 12 m to lit objects only!

6. Installation



This product can be operated suspended or as a stand-alone system.

Should your lighting effect show any signs of damage, do not install the device! In this case, have your lighting effect repaired by your specialized dealer. The manufacturer does not accept responsibility or liability for damage to property or personal injury resulting from an improperly installation!

As a stand-alone system the device must be installed vertically on an absolute planar, firm, fireproof, shock- and vibration-free surface. The installation of this lighting effect must be carried out by trained and professional staff! The installation of this lighting must only be carried out with the appropriate materials

The suspended installation of this lighting effect necessitates a suitable suspension system! The lighting effect must never be fixed swinging freely in the room. No individuals should linger underneath the lighting effect during suspended installation!

It is a must to install this device with a second independent fixture. Such second fixture must guarantee in the event of failure of the main fixture that no assembly parts will fall down. Use the fixture on the under-surface only.

The light effect unit must be attached via two certified hooks and omega bracket to a tie-bar system* Use the screw threads on the under-surface only.

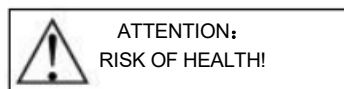
It must be ensured that an expert inspects the mechanical and safety-relevant installation prior to the initial operation and following major modifications, prior to the renewed operation. It must be ensured that an expert inspects the mechanical and safety-relevant installation at least once a year. It must be ensured that an expert inspects the mechanical installation and the installation of relevance to safety within the framework of an acceptance test at least every four years.

The installation fixture must be as such that it can withstand for a period of 60 minutes 10 times the load capacity without harmful deformation.

It is prohibited for any individual to unnecessarily stay or pass beneath the installation during any type of assembly work.

The light effect unit must be secured by a safety arrested cable if fly-mounted. The cable must withstand 12 times the weight of the light effect unit. Use arrester cables equipped with quick closing links. The dropping distance must not exceed 20 cm. Defect arrested cables or arrested cables that have already been exposed to stress must not be used.

7. Operation



7.1 Controls

Link all DMX devices with a DMX-512 controller by using a standard, 3-pin DMX cable or 5-pin DMX cables. Connect the output of the first device with the input of the second device and the output of the second device with the input of the third device and so on.

Connect the mains plug to an outlet.

Connect the mains plug to an outlet.

Operating the product for the first time may generate smoke and odour; this is not a defect. Avoid dis/connecting the product repeatedly and quickly from/with mains! Always wait 15 minutes prior to the next dis/connection

7.2 Menu

- **Display**

LED BSW Moving	
001	Signal: NG Channel: 24CH Mode: DMX Temp: 25
System error reporting an error	

- **Signal:** Show there is signal or not
- **Channel:** Show current channel
- **Mode:** Show current run mode
- **Temp:** Show current temperature

- **First page of menu**

001			
Return	Acc	Setup	EN address Invert Setup

- **Return:** back to display
- **中/EN:** Press or ENTER to change the language
- **Invert:** For display invert
- **Setup:** Into menu

● **Menu structure**

Main menu	Sub menu	Parameter
Add	001 - 512	NO
Setup	ESC	NO
	Run mode	DMX/Auto 1/Auto 2/Sound
	Channel mode	23CH
	Fixture ID	0-255
	Pan Def Pos	0-255
	Tilt Def Pos	0-255
	Invert Pan	YES/NO
	Invert Tilt	YES/NO
	Swap Pan/tilt	YES/NO
	P/T speed mode	YES/NO
	No signal keep	YES/NO
	Linear color	YES/NO
	Encoder correct	YES/NO
	Hall correct	YES/NO

	Backlighting time	15S/30S/60S/OFF
	Screen brightness	20%-100%
	Load default	YES/NO
Adjust	Inset password	Light correct
Test	Corresponding current channel	0-255
Reset	Return	YES/NO
	Reset Head	YES/NO
	Reset XY	YES/NO
	Reset All	YES/NO
Info	ESC	
	Error message	Error message
	DMX data	Channel value
	Software version	01-01-01
	Usage time	

7.3 Channel

24CH	22CH	Function	DMX Value	Function
1	1	Pan	0~255	X movement 0~540 degree
2	2	Pan fine	0~255	X fine 16bit
3	3	Tilt	0~255	Y movement 0~240 degree
4	4	Tilt fine	0~255	Y fine 16bit
5		XY speed	0~255	From fast to slow
6	5	Dimmer	0~255	From dark to bright
7	6	Strobe	0~3	OFF
			4~103	Pulse strobe from slow to fast
			104-107	ON
			108-155	Flicker gradually from slow to fast
			156-207	Flickering from slow to fast
			208-212	ON/OFF
			213-251	Random strobe from slow to fast
			252-255	ON
8	7	Color wheel	0-9	White
			10-19	Color 1
			20-29	Color 2
			30-39	Color 3
			40-49	Color 4
			50-59	Color 5
			60-69	Color 6
			70-79	Color 7
			80-89	Color 8
			90-99	White + Color 1
			100-109	Color 1+ Color 2
			110-119	Color 2+ Color 3
			120-129	Color 3+ Color 4
			130-139	Color 4+ Color 5
			140-149	Color 5+ Color 6
			150-159	Color 6+ Color 7
160-169	Color 7+ Color 8			
170-255	Reverse flow from slow to fast			
9	8	Cyan	0~255	Cyan linear change
10	9	Magenta	0~255	Magenta linear change
11	10	Yellow	0~255	Yellow linear change
12	11	CTO	0-255	CTO
13	12	Fixed gobo wheel	0~9	Small white
			10~14	Gobo1
			15~19	Gobo2
			20~24	Gobo3
			25~29	Gobo4
			30~34	Gobo5
			35~39	Gobo6
			40~44	Gobo7
			45~49	Gobo8
			50~54	Gobo9
			55~59	Gobo10
			60~64	Gobo 11
			65~74	Gobo 1 shake from slow to fast
75~84	Gobo 2 shake from slow to fast			

			85~94	Gobo 3 shake from slow to fast
			95~104	Gobo 4 shake from slow to fast
			105~114	Gobo 5 shake from slow to fast
			115~124	Gobo 6 shake from slow to fast
			125~134	Gobo 7 shake from slow to fast
			135~144	Gobo 8 shake from slow to fast
			145~154	Gobo 9 shake from slow to fast
			155~164	Gobo 10 shake from slow to fast
			165~174	Gobo 11 shake from slow to fast
			175~184	Big white shake from slow to fast
			185~218	Clockwise water flowing effect of gobo, from fast to slow
			219~221	OFF
			222~255	Anti-clockwise water flowing effect of gobo, from slow to fast
14	13	Rotation gobo wheel	0	Small white
			1~9	Big white
			10~19	Gobo1
			20~29	Gobo2
			30~39	Gobo3
			40~49	Gobo4
			50~59	Gobo5
			60~69	Gobo6
			70~79	Gobo7
			80~89	White shake
			90~99	Gobo1 shake
			100~109	Gobo2 shake
			110~119	Gobo3 shake
			120~129	Gobo4 shake
			130~139	Gobo5 shake
			140~149	Gobo6 shake
			150~159	Gobo7 shake
			160~205	Clockwise water flowing effect of gobo, from fast to slow
			206~209	Off
			210~255	Anti-clockwise water flowing effect of gobo, from slow to fast
15	14	Gobo rotation	0~127	Gobo linear rotation
			128~189	Clockwise rotation of gobo, from fast to slow
			190~193	Without rotation
			194~255	Anti-clockwise rotation of gobo, from slow to fast
16	15	Prism 1	0~127	Prism1 out
			128~255	Prism1 in
17	16	Prism 1 rotation	0~127	Prism1 rotation
			128~187	Prism1 Clockwise rotation (from fast to slow)
			188~195	Without rotation
			196~255	Prism1 anti-clockwise rotation, flow slow to fast
18	17	Prism 2	0~127	Prism2 out
			128~255	Prism2 in
19	18	Prism 2 rotation	0~127	Prism 2 rotation
			128~187	Prism 2 clockwise rotation (from fast to slow)
			188~195	Without rotation
			196~255	Prism 2 anti-clockwise rotation, flow slow to

				fast
20	19	Frost	0~127	Frost out
			128~255	Frost in
21	20	Focus	0~255	Linear focus 0-100% from far to near
22	21	Zoom	0~255	Linear zoom 0-100% from small to big
23		Reserved	0~255	Reserved function
24	22	Function	100-150	Reset the effect motor over 6 seconds
			151-200	Reset the effect motor over 6 seconds
			201-255	Reset all over 6 seconds

Features:

All-in-one fixture with 4–36° zoom range

Get beam, spot, and wash effects from a single fixture

CMY color mixing enables you to craft an infinite number of colors

Motorized focus, zoom, and

2 rotating prisms (1 x 6-facet linear and 1 x 3-facet circular)

2 GOBO wheels (1 fixed metal and 1 rotating)

350watt LED engine yields enough output for most large venues and event productions

Light Source:

- 350W Cool White LED Engine
- 50,000 Hour Average LED Life,8,000K

Color:

- Color Wheel: 8 + Open (CTO+UV) ,half-color and rainbow effect . CTO (color temperature optional(3200k-8500k)
- Full CMY Color Mixing

GOBOs:

- GOBO Wheel 1: 12 Fixed + Open (1 Beam Reducers Beam Mode)
- GOBO Wheel 2: 7 Rotating/Replaceable + Open (Size: 22.8mm; Viewable: 15mm)

- Modular design for easy servicing and GOBO replacement

Effects:

- Zoom Range: 4 ~ 36-degrees
- CTO: 3200k-8500k
- Focus: Motorized
- Frost effect for wash
- Prism 1: Rotating 3-facet Circular
- Prism 2: Rotating 6-facet Linear Rotating
- Prism Layering

Connections:

- Power Input: Locking Power IN connection
- AC90-240v,
50/60hz . RDM
function

Control:

- Control Channels: 23ch,
- DMX Modes: 23chs, RDM (Remote Device Management)
- Control: 3-pin and 5-pin DMX

- Full color display menu
- Pan / Tilt Correction: Automatic
- Pan / Tilt Lock
- Pan / Tilt Range: 540° / 270°
- Fine Tilt
- Pan/Tilt Speed: Fast to Slow
- Dimming & Fine Dimming: Electronic

Electrical:

- Input Voltage: 100-240V 50Hz/60Hz (Auto change)
- Power Draw: 400W (3.33A @ 120V; 1.81A @ 220V)

Dimensions/Weight:

- Dimensions (LxWxH): 13.5" x 15.7" x 27.1" / 345 x 400 x 690mm
- Weight: 52.8 lbs. / 24kg