

B-EYE 3740 IP

User Manual



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TECHNICAL PARAMETERS

Light source

Rated Voltage: AC100V-240V 50/60Hz

Input Power: 1500W

Light Source: 37 40W 4-in-1 OSRAM LEDs

Rated Lifespan: 30,000 hours

Color: Multiple colors (red, green, blue, and white)

Optical

Focus: 2°-60° DMX linear focus with autofocus

Color Temperature Control: Built-in CTO DMX Linear Dimming

Controls

21CH/132CH/169CH/22CH/133CH/170CH/35CH/146CH/183CH/36CH/147CH/184CH

(standard), 5 channel control modes, standard DMX512 protocol, RDM protocol

Control Interface: DMX512 interface (3-pin/optional 5-pin), power cord hand-in-hand socket

Sleep Function: Advanced technology enables remote sleep mode, automatically entering sleep mode when the light loses signal, ensuring greater stability and safety

Display: 2.8-inch touchscreen display, bilingual Chinese and English menu, sensor fault indicator, temperature display

Effect

Electronic strobe, 0.3-25 times/second, with synchronous or asynchronous random strobe options.

Dimming: Electronic dimming with 0-100% linear adjustment, gamma curve dimming frequency adjustable from 1.2kHz to 25kHz, and macro dimming for smooth, stable linearity and flicker-free operation. Utilizes a stable constant current driver and power supply, making it suitable for video recording.

Effect Modes: (Swirl, Kaleidoscope, Wash, Beam)

The front mirror offers infinitely rotatable, seamlessly spliced mirrors, aspherical lens construction, and single-point control of the LEDs. Light strip effects include strobe and running horse racing, with built-in programmable functions.

Construction

Rotation Angle: The X and Y axes are driven by a high-speed, silent, 60° thickened three-phase motor, equipped with a high-precision imported magnetic encoder positioning device for more precise positioning. Automatic return to position in the event of a misoperation. Adjustable horizontal and vertical speeds; X and Y axis rotation and inversion functions.

Horizontal 540° (16-bit scanning accuracy), vertical 270° (16-bit scanning accuracy), (bit-accurate scanning)

Cooling System: Utilizes a high-conductivity copper tube heat sink. Intelligent fan monitoring technology automatically adjusts fan speed based on lamp temperature. Built-in intelligent overheat protection system and intelligent temperature and noise balance module.

Ingress Protection: IP65

Weight&Dimension

Dimensions: 475*280*663mm

Packaging: 79*64*45cm

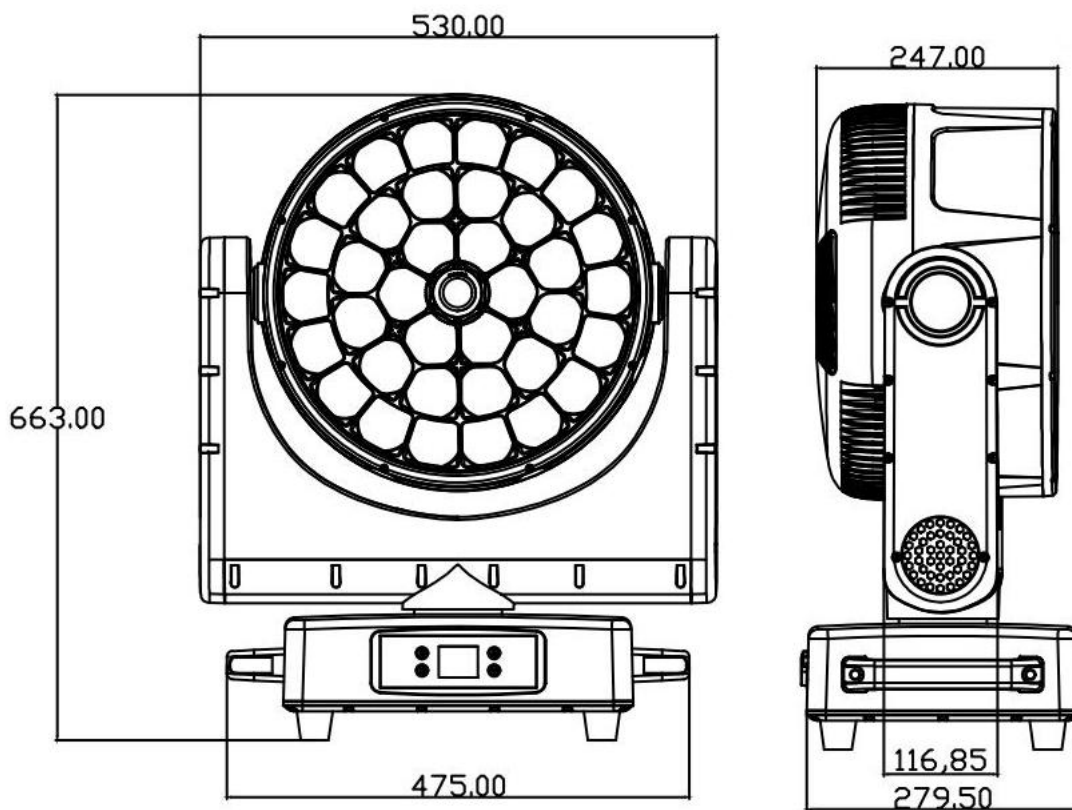
Net Weight: 35kg

Packaging Standards: One power cord, one signal cable, one instruction manual, and one set of hanging hardware.

Features

Automatic screen rotation function: The system automatically rotates the screen based on gravity, eliminating manual rotation. The automatic rotation function can also be disabled.

SIZE DRAWING



1. Unpacking

For the correct and safe use of this product, please read this manual carefully before installing and using it. This manual contains important installation and application information. Please strictly follow the instructions in this manual during installation and operation. Please also keep this manual in a safe place.

These 37-piece 40W waterproof bee eyes are designed and manufactured in strict accordance with CE standards and conform to the international DMX512 signal protocol. They can be controlled individually or in a network. They feature fast rotation, low noise, and powerful functionality, making them suitable for small and medium-sized concerts, theaters, studios, nightclubs, and bars.

Please carefully unpack the product. After unpacking, inspect the product for any damage during transportation and verify that the following information is complete.

37-piece 40W waterproof bee eyes - 1 unit
Instruction manual - 1 power cord - 1

2. Safety Instructions

Caution!

Exercise extreme caution before operating this product. This product contains high voltage and may cause electric shock if it comes into contact with the electrical wires.

This product is shipped in perfect condition. To maintain this product in perfect condition and ensure safe operation, please follow the safety precautions and warnings in this manual.

Important: Damage caused by failure to follow these instructions is not covered by the warranty. The supplier is not responsible for any product problems caused by this.

If the product has been exposed to extreme, unstable temperatures (such as after transportation), do not immediately connect it to the power supply. Water droplets formed by temperature fluctuations may damage the product. Wait until the product has returned to normal temperature before use.

This product operates within a voltage range of 90-240V and is intended for indoor use. Ensure that the ground voltage does not exceed the product's rated voltage! The power plug must be plugged into a properly protected Class I outlet. The green or tan conductor must be grounded.

Inspect the power cord regularly. Ensure that the power cord is not bent, damaged, or scratched, and is not connected to other cords. Exercise extreme caution when connecting the power cord or related wiring. Always unplug this product when not in use or before cleaning.

Before using it, familiarize yourself with its functions. Keep children and untrained personnel away from it.

Do not shake it. Do not use excessive force when installing or operating it. Do not allow untrained personnel to operate it. Most damage is caused by untrained personnel.

This product does not come with repair parts. Maintenance and repair should only be performed by qualified personnel.

Do not tamper with this product without authorization. Doing so may damage the product and void the warranty. Furthermore, untrained personnel may cause short circuits, burns, or electric shock.

3. Operating Instructions

- This product is a moving head wash beam light designed to create wash effects.
- If the product has been exposed to a significant temperature difference (for example, after transportation), do not operate it immediately, as thermal contraction can damage the product. Wait until the device reaches normal room temperature before operating it.
- Prevent vibrations. Avoid strong impacts during installation.
- Do not lift the entire product by the lamp head, as this may damage the device's mechanical properties.
- When selecting an installation location, ensure that the product is not exposed to excessive heat, humidity, or dust. Do not place any wires on the ground, as this may cause electric shock.
- Before installing the product, ensure the installation site is secure.
- Attach a safety rope to the product and check that all screws are properly secured during installation.
- Ensure the lens is in good condition. If the lens is damaged or scratched, replace it.
- It is recommended that technicians familiar with this product operate this product. Untrained personnel are prohibited from operating this device, as many losses are caused by unprofessional operation.
- Please store the packaging materials in case it is necessary for further transportation. --Do not modify the product without the manufacturer's or dealer's instructions.
- Any equipment failure caused by operation not in accordance with the instructions is not covered by the warranty. Furthermore, any resulting short circuit, injury, electric shock, damage from ultraviolet radiation, or bulb explosion is not covered by the warranty.

4. Product Hanging and Installation

Note: For increased safety, hang and install this product away from aisles, seating areas, or areas easily accessible.

Before hanging this product, ensure that the mounting point can withstand ten times the weight of the product.

A secondary safety device, such as a safety lanyard, must be used for product installation.

Do not stand under the mounting point when hanging, removing, or repairing this product.

Ensure that this product is installed at least 0.5 meters away from flammable materials.

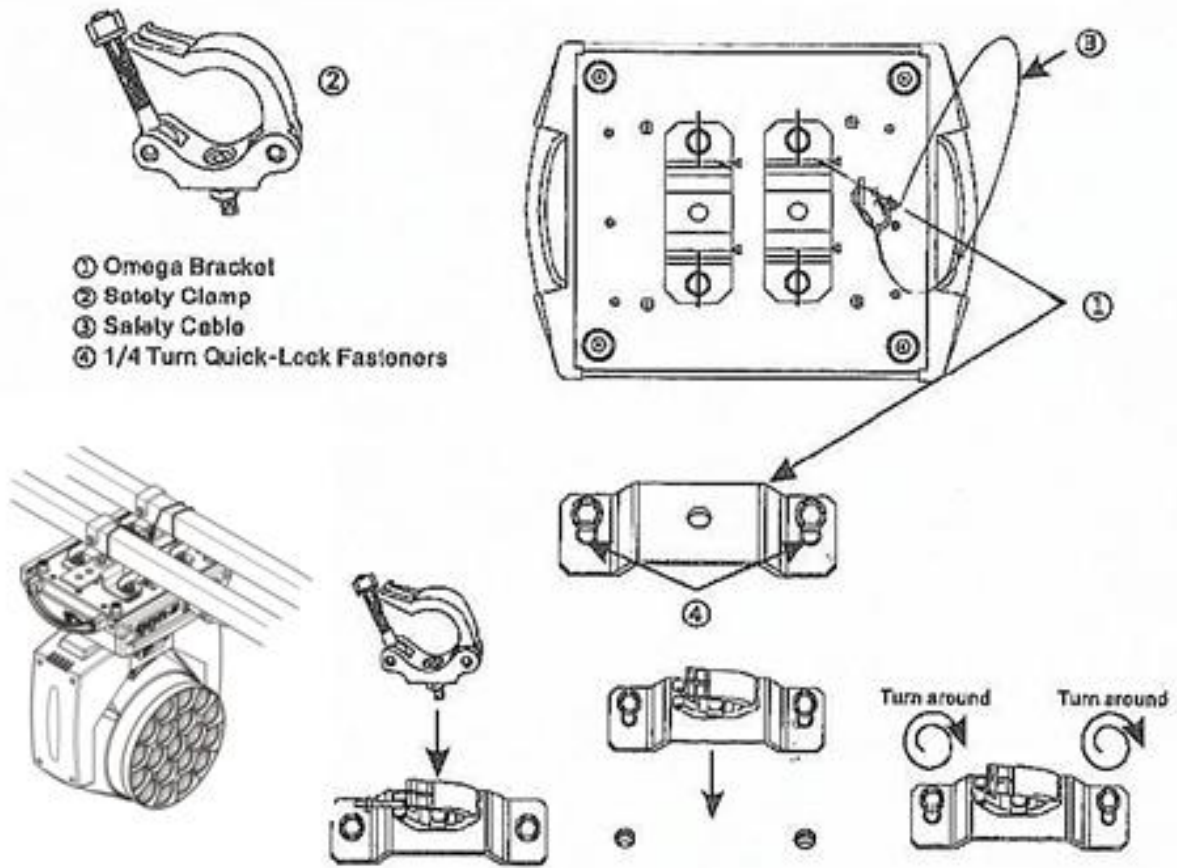
Remember to use a safety lanyard as a safety precaution to prevent accidents if the lanyard is about to loosen.

Hanging Points: Top-mounted installation requires experienced installers, including knowledge of load-bearing requirements, installation materials, and periodic inspections of the installation materials and the product's safety. If you lack this knowledge, do not attempt to install the product yourself. Improper operation could result in serious injury or other serious consequences.

Before powering on the product, ensure that all required hanging and installation steps are completed.

Quick-Lock Hanging: This product has a specially designed, professional hanging fixture on the bottom, including a quick-lock hanger and a safety lanyard hanging point (see the image below).

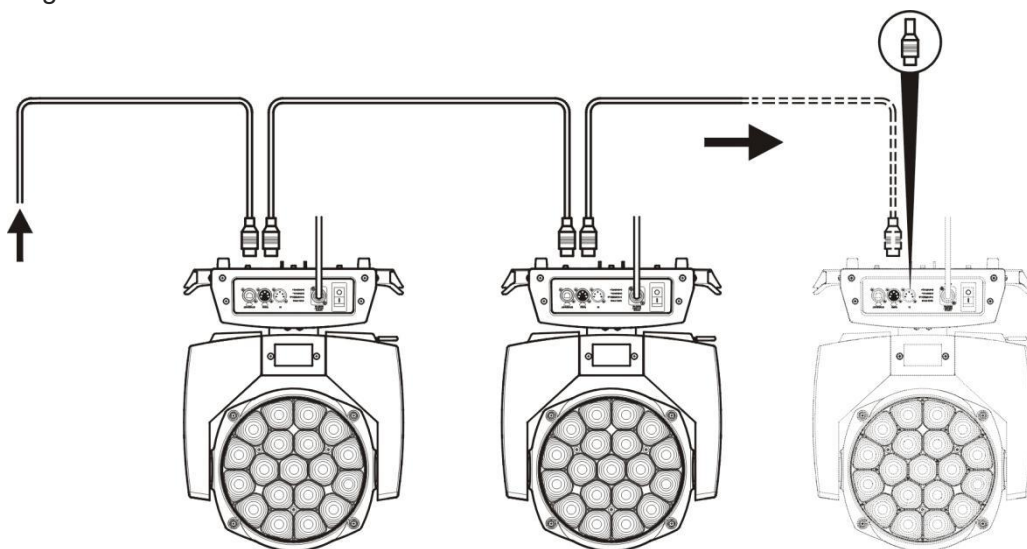
When hanging this product from a truss, remember to use a suitable quick-lock, secure it to the quick-lock hanger, and secure it with an M10 screw. For added safety, attach a safety lanyard to the safety lanyard hanging point on the bottom of the product and secure it to the truss.

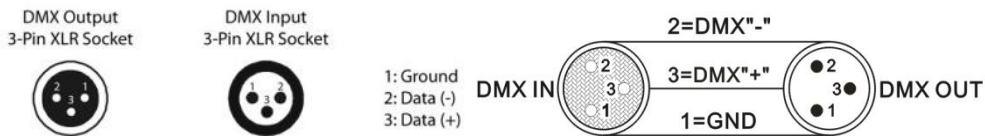


Regardless of the hanging method you choose, please remember to use a safety rope. There are dedicated safety rope hanging points on the bottom of the product. Please refer to the picture above. Please remember to use the dedicated safety rope hanging points and never install the safety rope on the handle.

5. DMX-512 Connection

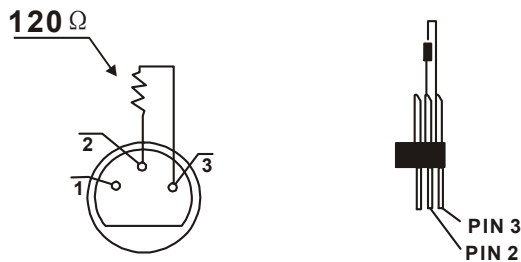
Please connect the male end of the included XLR signal cable to the controller's signal output port, and the female end to the signal input port on the back panel of this product. You can connect multiple products in series. The signal cable must be three-core, shielded, and have XLR input and output connectors. Please refer to the diagram below.





DMX-512 connections require a terminator (loop-through connection).

During installation, if the signal cable is laid over long distances or in a noisy environment, such as a dance hall, it is recommended to use a DMX terminator (loop-through connection). This prevents digital control signal distortion caused by electrical noise. A DMX terminator consists of a simple 2-pin and 3-pin XLR connector connected to a 120-ohm resistor. Plug the terminator into the XLR output port of the last unit. See the diagram below.



6. Menu

menu	Secondary menu	Level 3 menu/parameters	
Quick Menu interface	return	Return to the main screen	
	Chinese/EN	Chinese/EN	
	The Truth Revealed	Display screen interface flip	
	set up	Enter the settings interface	
Settings interface	address	address code 001-512	
	System setup	running mode	DMX/Voice Control/Auto 1/Auto 2/
		Channel Mode	21CH/132CH/169CH/22CH/133CH/170CH/35CH/146 CH/183CH/36CH/147CH/184CH
		Horizontal reversal	open/close
		Vertical reversal	open/close
		Hall Correction	open/close
		Optical coupling error correction	open/close
		Signal retention	open/close
		Screen Protection	open/close
		Screen flip	automatic/close
		Synced updates	open/close
		language	Chinese/EN
		Screen lock	open/close
		Lighting curve	Curve 1-4
		Dimming speed	Standard/ fast
		Mute mode	open/close

		factory data reset	Confirm/Cancel
	manual mode	Manually control channel values	000-255
	system calibration	enter password	Lamp calibration
	reset	Effect motor reset	
		Scan motor reset	
		All motors reset	
	system info	Repositioning information	Display specific information content
		DMX data detection	Display specific DMX detection content
		sensor information	Display the specific information of optocoupler and Hall effect
		Hardware version	Display the hardware version number
		software version	Display the software version number

Auto-rotate screen function:

The system automatically rotates the screen based on gravity, eliminating the need for manual rotation. You can also disable the auto-rotate function.

Manual Control

This interface is used to control the current fixture. See the channel table for details.

Press the "OK" button to enter the editing mode. Press the "Up" and "Down" buttons to change the channel value. Press "OK" again to save the changes and exit the editing mode. Press "Exit" to exit the editing mode without saving the changes.

System Calibration

Set a password here to prevent unauthorized operation. Press "OK" to verify the password.

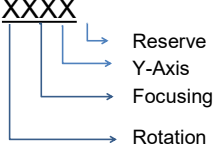
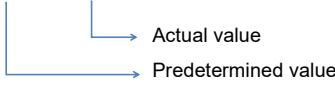
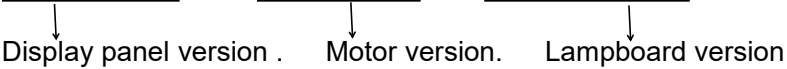
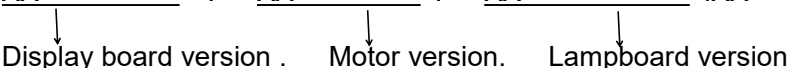
option	instruction
Initial position calibration	After entering the sub-interface, you can adjust the reset position of the motor of X-axis, Y-axis, focus, rotation, etc., to compensate for the error in hardware installation. The adjustment range is 0~255, and 127 means no adjustment.
White balance calibration	The power of the red, green, blue and white lights and LEDs 1-37 can be adjusted from 0 to 255, where 255 means no adjustment.
Power calibration	The maximum power of the entire lamp can be adjusted from 0 to 255, where 255 means no adjustment.
Voice control sensitivity	Adjust the voice control sensitivity.
change password	Set the system calibration password.

Advanced:

Press the "Up" or "Down" key to switch between reset modes. Press "OK" to reset directly.

option	illustration
Lamp head reset	Adjust the focus and rotate the motor to reset
XY reset	XY Axis realignment
Full reset	Light fixture reset

system information

option	instruction
Repositioning error message	If the red ERR indicator is on, it indicates a lighting error: 1) IC1 communication failure (communication between the motor and the display board failed) 2) X/Y optocoupler error 3) Focus adjustment or rotation reset failure
DMX data monitoring	Enter the sub-interface and display the channel value in numerical form for viewing. You can turn the page
sensor information	1) Hoare XXXX  2) Sensors: 3) X、Y Optocoupler: XXXX--XXXX 
Hardware version number	Lighting hardware information XX . XX . XX .XX 
Software version number	Lighting software version XX . XX . XX .XX 

Channel Table

21通道 (21CH)	21+RGB通道 (132CH)	21+RGBW通道 (169CH)	功能	DMX 数值	描述
1	1	1	red	0-255	Red Linear dimming from dark to bright
2	2	2	Red fine-tuning	0-255	Red Linear fine-tuning from dark to light
3	3	3	green	0-255	greenLinear dimming from dark to bright
4	4	4	Green fine-tuning	0-255	Green Linear fine-tuning from dark to light
5	5	5	blue	0-255	Blue Linear dimming from dark to bright
6	6	6	Blue fine-tuning	0-255	Blue Linear fine-tuning from dark to light
7	7	7	white	0-255	White Linear dimming from dark to bright
8	8	8	White fine-tuning	0-255	White Linear fine-tuning from dark to light

9	9	9	color temperature	0-255	Linear color temperature adjustment
10	10	10	wash	0-255	Built-in color gradient
11	11	11	strobe	0-3	lighting-off
				4-103	Synchronous strobe speed from slow to fast (1HZ-25HZ)
				104-107	light up
				108-207	Bisect the strobe speed from slow to fast (1HZ-25HZ)
				208-212	light up
				213-225	Low-speed random strobe
				226-238	Medium-speed random strobe
				239-251	High-speed random strobe
				252-255	light up
12	12	12	Overall dimming	0-255	Linear dimming from dark to bright
13	13	13	Dimming fine-tuning	0-255	Dimming fine-tuning control
14	14	14	X轴	0-255	0-540 degree
15	15	15	X轴 fine-tuning	0-255	16bit adjustable
16	16	16	Y轴	0-255	0-205 degree
17	17	17	Y轴 fine-tuning	0-255	16bit adjustable
18	18	18	function	0-255	Reserve
19	19	19	复位	0-25	No function
				26-76	灯头复位5s有效
				77-127	XY复位5s有效
				128-255	全部复位5s有效
20	20	20	调焦	0-255	角度由小变大线性调节
21	21	21	旋转	0-127	0~60度
				128-188	逆时针由快到慢无极转

				189-193	旋转停止
				194-255	顺时针由慢到快无级转
	22	22	R1 LED 调光	0-255	R1 LED 调光
	23	23	G1 LED调光	0-255	G1 LED 调光
	24	24	B1 LED 调光	0-255	B1 LED 调光
		25	W1 LED 调光	0-255	W1 LED调光

	130	166	R37 LED 调光	0-255	R37 LED 调光
	131	167	G37 LED 调光	0-255	G37 LED 调光
	132	168	B37 LED 调光	0-255	B37 LED 调光
		169	W37 LED调光	0-255	W37 LED 调光

REMARK

The product has perfect performance and integrity packing.

All users should be strictly comply with the warning and operating instructions as stated.

Or we aren't in charge of any result by misusing.

Any damage resulting by misuse is not within the Company's warranty.

Any fault or problem caused by neglecting the manual is also not in the charge of dealers.

Errors and omissions for every information given in this manual excepted.

All information is subject to change without prior notice.