

Hinweise für den sicheren Gebrauch

Das Gerät entspricht allen relevanten Richtlinien der EU und trägt deshalb das CE-Zeichen.

WARNUNG



Das Gerät wird mit lebensgefährlicher Netzspannung versorgt. Nehmen Sie deshalb nie selbst Eingriffe am Gerät vor und stecken Sie nichts durch die Lüftungsöffnungen. Es besteht die Gefahr eines elektrischen Schlages.



Blicken Sie nicht für längere Zeit direkt in die Lichtquelle, das kann zu Augenschäden führen.



Beachten Sie, dass schnelle Lichtwechsel bei fotosensiblen Menschen und Epileptikern epileptische Anfälle auslösen können!

Das Gerät muss fachgerecht und sicher montiert werden. Wird es an einer Stelle installiert, unter der sich Personen aufhalten können, muss es zusätzlich gesichert werden (z.B. durch ein Fangseil; das Fangseil so befestigen, dass der Fallweg des Gerätes nicht mehr als 20cm betragen kann).

- Verwenden Sie das Gerät nur im Innenbereich und schützen Sie es vor Tropf- und Spritzwasser sowie vor hoher Luftfeuchtigkeit. Der zulässige Einsatztemperaturbereich beträgt 0–40 °C.

- Stellen Sie keine mit Flüssigkeit gefüllten Gefäße, z.B. Trinkgläser, auf das Gerät.

- Die in dem Gerät entstehende Wärme muss durch Luftzirkulation abgegeben werden. Decken Sie darum die Lüftungsöffnungen des Gehäuses nicht ab.

- Ziehen Sie sofort den Netzstecker aus der Steckdose,
 - wenn sichtbare Schäden am Gerät oder am Netzkabel vorhanden sind,
 - wenn nach einem Sturz oder Ähnlichem der Verdacht auf einen Defekt besteht,
 - wenn Funktionsstörungen auftreten. Geben Sie das Gerät in jedem Fall zur Reparatur in eine Fachwerkstatt.
- Ziehen Sie den Netzstecker nie am Kabel aus der Steckdose, fassen Sie immer am Stecker an.
- Die Strombelastung der Netzausgangsbuchse darf 10A nicht überschreiten.
- Verwenden Sie für die Reinigung nur ein trockenes, weiches Tuch, niemals Wasser oder Chemikalien.
- Fassen Sie das Gerät beim Transport nur am Unterteil an. Auf keinen Fall das Gerät am Schwenkkopf oder Dreharm tragen.
- Wird das Gerät zweckentfremdet, nicht sicher montiert, nicht richtig angeschlossen, falsch bedient oder nicht fachgerecht repariert, kann keine Haftung für daraus resultierende Sach- oder Personenschäden und keine Garantie für das Gerät übernommen werden.



Soll das Gerät endgültig aus dem Betrieb genommen werden, übergeben Sie es zur umweltgerechten Entsorgung einem örtlichen Recyclingbetrieb.

Deutsch

LED Beam Moving Head



TWIST-150LED

Order No. 38.7970



LEUCHTKRAFT

1 SAFETY INSTRUCTIONS

WARNING



The unit uses dangerous mains voltage. Leave servicing to skilled personnel and do not insert anything into the air vents. Inexpert handling may result in electric shock.

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

IMPORTANT



Install the unit safely and expertly. No guarantee claims for the unit and no liability for any resulting personal damage or material damage will be accepted if the unit is used for other purposes than originally intended, if it is not safely installed or not correctly connected or operated, or if it is not repaired in an expert way.

If the device has been exposed to temperature changes due to environmental changes, do not switch it on immediately. The arising condensation could damage the device. Leave the device switched off until it has reached room temperature.

This device falls under protection-class I. Therefore it is essential that the device be earthed. The electric connection must carry out by qualified person.

The device shall only be used with rated voltage and frequency.

Make sure that the available voltage is not higher than stated at the end of this manual. Make sure the power cord is never crimped or damaged by sharp edges. If this would be the case, replacement of the cable must be done by an authorized dealer.

Always disconnect from the mains, when the device is not in use or before cleaning it. Only handle the power cord by the plug. Never pull out the plug by tugging the power cord.

During initial start-up some smoke or smell or smell may arise. This is a normal process and does not necessarily mean that the device is defective, it should decrease gradually. Please don't project the beam onto combustible substances.

Fixtures cannot be installed on combustible substances, keep more than 50cm distance with wall for smooth air flow, so there should be no shelter for fans and ventilation for heat radiation.

If the external flexible cable or cord of this luminaire is damaged, it shall be exclusively replaced by the manufacturer or his service agent or a similar qualified person in order to avoid a hazard.

2 UNPACKING

Thank you for choosing our TWIST-150LED moving head light. For your own safety, please read this manual before installing the device. This manual covers the important information on installation and applications. Please install and operate the fixture with following instructions. Meanwhile, please keep this manual well for future needs.

The TWIST-150LED is made of a new type of high temperature strength of engineering plastic and cast aluminum casing with nice outlook. The fixture is designed and manufactured strictly following CE standards, complying with international standard DMX512 protocol.

It's available independently controlled and linkable with each other for operation. And it is applicable for large-scale live performances, theater, studio, nightclubs and discos.

Please carefully unpack the TWIST-150LED when you receive the package and check whether it is damaged during the transportation.

Please check whether the following items are included inside the box:

- 1x Moving Head
- 1x Power Cable
- 1x Omega Clamp
- 1x Instruction Manual

FEATURES & SPECIFICATIONS

Features

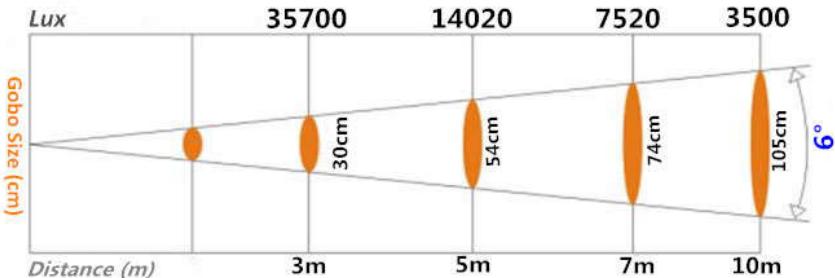
- 150W High Output White LED
- 50,000 hours lifespan and low power consumption
- Beam Angle 6°, Outstanding sharp BEAM effect and remarkable wash effect with pure color mixing and focus Function
- High light output, 14020LUX@5M at White light
- Temperature protect function, when the internal temperature is up to 40° and then the fans begin to work, when the internal temperature is up to 70° and the brightness reduce half.
- Color Wheel: 7 colors +white, rotation with variable direction and speed
- 1 static Gobo Wheel: 8 gobos +white, wheel rotation and shake
- 1 Rotate Gobo Wheel: 6 gobos +white, wheel rotation and shake
- Prism: 8-facet Prism, bi-directionally rotatable at variable speeds
- High speed strobe effect with 1-25 flashers per second
- Internal program available
- 16/14/12/10 DMX Channels USITT DMX-512
- DMX 512, master-slave and sound activated controllable or auto operation
- Colorful LCD display
- Efficient low noise fan cooling system
- POWERCON IN/OUT
- 3-pin XLR connectors IN/OUT
- Two 1/4 turn fastening Omega Clamps
- IP 20 protection rating

Specifications

Input Voltage:	AC90-260V 50/60Hz
Light Source:	150W High Output White LED
Control Signal:	DMX 512, master-slave, sound activated and auto operation
Control Channel:	16/14/12/10 DMX Channels USITT DMX-512
Power Consumption:	215VA
Dimensions:	280(W)*380(H)*275(D)mm
Net Weight:	10.6kg



4 PHOTOMETRIC DATA



5 OPERATION INSTRUCTIONS

- The moving head is for beam effect for on-site decoration purpose.
- Don't turn on the fixture if it's been through severe temperature difference like after transportation because it might damage the light due to the environment changes. So make sure to operate the fixture until it is in normal temperature.
- This light should be kept away from strong shaking during any transportation or movement.
- Don't pull up the light by only the head, or it might cause damages to the mechanical parts.
- Don't expose the fixture in overheat, moisture or environment with too much dust when installing it. And don't lay any power cables on the floor. Or it might cause electronics shock to the people.
- Make sure the installation place is in good safety condition before installing the fixture.
- Make sure to put the safety chain and check whether the screws are screwed properly when installing the fixture.
- Make sure the lens are in good condition. It's recommended to replace the units if there are any damages or severe scratch.
- Make sure the fixture is operated by qualified personnel who know the fixture before using.
- Keep the original packages if any second shipments is needed.
- Don't try to change the fixtures without any instruction by the manufacturer or the appointed repairing agencies.
- It is not in warranty range if there are any malfunctions from not following the user manual to operate or any illegal operation, like shock short circuit, electronic shock, lamp broke, etc.

6 INSTALLATIONS

Cautions: For added protection mount the fixtures in areas outside walking paths, seating areas, or in areas where the fixture might be reached by unauthorized personnel.

Before mounting the fixture to any surface, make sure that the installation area can hold a minimum point load of 10 times the device's weight.

Fixture installation must always be secured with a secondary safety attachment, such as an appropriate safety cable.

Never stand directly below the device when mounting, removing, or servicing the fixture.

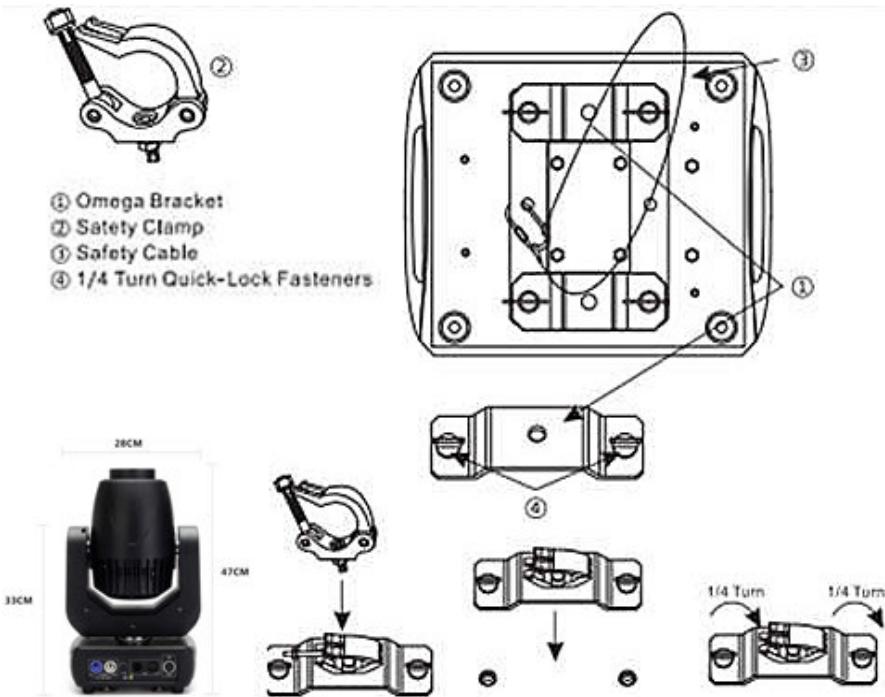
From a ceiling, or set on a flat level surface (see illustration below). Be sure this fixture is kept at least 0.5m (1.5ft) away from any flammable materials (decoration etc.).

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.

Mounting points: Overhead mounting requires extensive experience, including amongst others calculating working load limits, a fine knowledge of the installation material being used, and periodic safety inspection of all installation material and the fixture. If you lack these qualifications, do not attempt the installation yourself. Improper installation can result in bodily injury.

Be sure to complete all rigging and installation procedures before connecting the main power cord to the appropriate wall outlet.

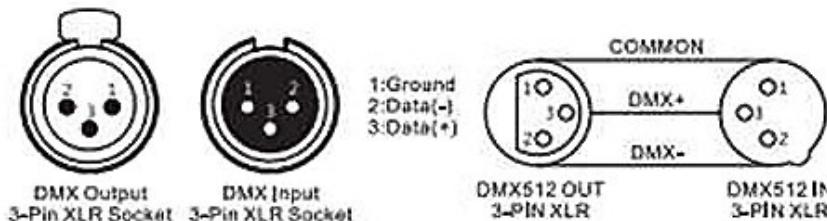
Clamp Mounting: The LED Moving Head provides a unique mounting bracket assembly that integrates the bottom of the base, and the safety cable rigging point in one unit (see the illustration below). When mounting this fixture to truss be sure to secure an appropriately rated clamp to the included omega bracket using a M10 screw fitted through the center hole of the "omega bracket". As an added safety measure be sure to attach at least one properly rated safety cable to the fixture using one of the safety cable rigging point integrated in the base assembly.



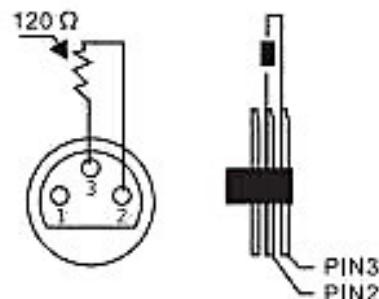
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DMX-512 CONTROL CONNECTIONS

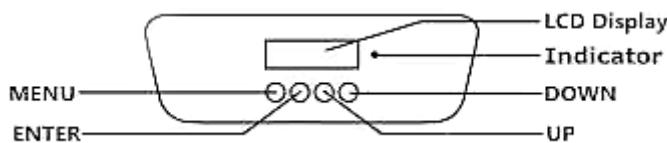
Connect the provided XLR cable to the female 3-pin XLR output of your controller and the other side to the male 3-pin XLR input of the moving head. You can chain multiple moving head together through serial linking. The cable needed should be two core, screened cable with XLR input and output connectors. Please refer to the diagram below.



For installations where the DMX cable has to run 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 by electrical noise. The DMX terminator is simply an XLR plug with a $120\ \Omega$ resistor connected between pins 2 and 3, which is then plugged into the output XLR socket of the last fixture in the chain. Please see illustrations below.



Regardless of the rigging option you choose for your LED Moving Head, always be sure to secure your fixture with a safety cable. The fixture provides a built-in rigging point for a safety cable on the hanging bracket as illustrated above. Be sure to only use the designated rigging point for the safety cable and never secure a safety cable to a carrying handle.

8**MENU OPERATIONS****MENU**

Address Set → [Set Address Numbers]

Run Mode → [DMX]
→ [AUTO] → Auto 1-Auto2
→ [SOUND]
→ [MANUAL] → Manual Test → Function and Operation

Setup → [Advanced Setting]

- Pan reverse
- Tilt reverse
- Display
- Screen Reverse
- Channel (16/14/12/10CH Select)
- Sensitivity (01-100)
- Motor zero
- Reset
- Factory Set

System Information → Ver V1
→ DMX Address
→ Temperature

9**DMX CHANNELS**

16/14/12/10/ channel mode sheet

CH10	CH12	14CH	16CH	Function	Channel Value	Description
CH1	CH1	CH1	CH1	Pan	0-255	0-540°
		CH2	CH2	Pan fine	0-255	Pan Fine
CH2	CH2	CH3	CH3	Tilt	0-255	0-270°
		CH4	CH4	Tilt Fine	0-255	Tilt Fine
CH3	CH3	CH5	CH5	X, Y speed	0-255	From fast to slow
CH4	CH4	CH6	CH6	LED Dimmer	0-255	From dark to bright
CH5	CH5	CH7	CH7	LED Strobe	0-7	Turn on
					8-250	Strobe from slow to fast
					251-255	Turn on
CH6	CH6	CH8	CH8	7 color + White	0-15	White Light
					16-31	Color 1
					32-47	Color 2
					48-63	Color 3
					64-79	Color 4
					80-95	Color 5
					96-111	Color 6
					112-127	Color 7
					128-191	CW from slow to fast
					192-255	CCW from slow to fast
CH7	CH7	CH9	CH9	8 Static Gobos + White	0-6	Open
					7-13	Gobo 1
					14-20	Gobo 2

					21-27	Gobo 3
					28-34	Gobo 4
					35-41	Gobo 5
					42-48	Gobo 6
					49-55	Gobo 7
					56-63	Gobo 8
					64-70	Gobo 8 shake speed from slow to fast
					71-77	Gobo 7 shake speed from slow to fast
					78-84	Gobo 6 shake speed from slow to fast
					85-91	Gobo 5 shake speed from slow to fast
					92-98	Gobo 4 shake speed from slow to fast
					99-105	Gobo 3 shake speed from slow to fast
					106-112	Gobo 2 shake speed from slow to fast
					113-119	Gobo 1 shake speed from slow to fast
					120-127	Open
					128-191	Gobo Rotate CW slow to fast
					192-255	Gobo Rotate CCW slow to fast
CH8	CH10	6 rotation gobos +White	0-15	open		
			16-31	Gobo1		
			32-47	Gobo2		
			48-63	Gobo3		
			64-79	Gobo4		
			80-95	Gobo5		
			96-127	Gobo6		

					128-191	Gobo Rotate CW slow to fast
					192-255	Gobo Rotate CCW slow to fast
CH9	CH11	Gobo Rotation	0-15	open		
			16-95	Gobo Fine 0-360		
			96-135	Gobo Rotating 0-90		
			136-155	Gobo Rotating 0-180		
			156-175	Gobo Rotating 0-720		
			176-215	Gobo self-rotating CW from slow to fast		
			216-255	Gobo self-rotating CCW rotating from slow to fast		
CH8	CH10	CH10	CH12	Focus	0-255	Gobo hazy to clear
CH9	CH11	CH11	CH13	Prism	0-63	Open
					64-255	Prism In
CH10	CH12	CH12	CH14	Prism Rotation	0-15	Stop
					16-135	Rotate CW slow > fast
					136-255	Rotate CCW slow > fast
	CH13	CH15	self-setting Program	0-7	No action	
				8-131	Auto mode	
				132-255	Sound mode	
				0-249	No function	
	CH14	CH16	Reset		250-253	Reset
					254-255	No function

10 MAINTENANCE AND CLEANING

The following points have to be considered during the 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 on the housing, color lenses, fixations and installation spots (ceiling, suspension, trussing).
- 3) Mechanically moved parts must not show any traces of wearing and must not rotate with unbalances.
- 4) The electric power supply cables must not show any damage, material fatigue or sediments.

Further instructions depending on the installation spot and usage have to be adhered by a skilled installer and any safety problems have to be removed.

WARNING



The unit uses dangerous mains voltage.

Always disconnect the mains plug before cleaning.

In order to make the lights in good condition and extend the life time, we suggest a regular cleaning to the lights.

- 1) Clean the inside and outside lens each week to avoid the weakness of the lights due to accumulation of dust.
- 2) Clean the fan each week.
- 3) A detailed electric check by approved electrical engineer each three month, make sure that the circuit contacts are in good condition, prevent the poor contact of circuit from overheating.

We recommend a frequent cleaning of the device. Please use a moist, lint-free cloth.

Never use alcohol solvents.

There are no serviceable parts inside the device. Please refer to the instructions under "Installation instructions".

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

Important Notes

The unit corresponds to all relevant directives of the EU and is therefore marked with CE.

WARNING



The unit uses dangerous mains voltage. Leave servicing to skilled personnel and do not insert anything into the air vents; inexpert handling may result in electric shock.



To prevent damage to your eyes, never look directly into the light source for any length of time.

Please note that fast changes in lighting may trigger epileptic seizures with photosensitive persons or persons with epilepsy!



Install the unit safely and expertly. If it is installed at a place where people may walk or sit under, it must additionally be secured (e.g. by a safety rope; fix the safety rope so that the maximum falling distance of the unit will not exceed 20cm).

In any case the unit must be repaired by skilled personnel.

- Never pull the mains cable to disconnect the mains plug from the socket, always seize the plug.
- The current load of the mains output jack must not exceed 10A.
- For cleaning only use a dry, soft cloth; never use water or chemicals.
- When transporting the unit, always seize its lower part. Never carry the unit by its moving head or rotary arm.
- No guarantee claims for the unit and no liability for any resulting personal damage or material damage will be accepted if the unit is used for other purposes than originally intended, if it is not safely installed or not correctly connected or operated, or if it is not repaired in an expert way.

If the unit is to be put out of operation definitively, take it to a local recycling plant for a disposal which is not harmful to the environment.

