

**XLED 3019** 

PR-8127

This product manual contains important information about the safe installation and use of this projector. Please read and follow these instructions carefully and keep this manual in a safe place for future reference.

PR LIGHTING LTD. http://www.pr-lighting.com

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Please note that as part of our ongoing commitment to continuous product development, specifications are subject to change without notice. Whilst every care is taken in the preparation of this manual we reserve the right to change specifications in the course of product improvement. The publishers cannot be held responsible for the accuracy of the information herein, or any consequence arising from them.

Every unit is tested completely and packed properly by the manufacturer. Please make sure the packing and / or the unit are in good condition before installation and use. Should there be any damage caused by transportation, consult your dealer and do not use the unit. Any damage caused by improper use will not be assumed by the manufacturer and / or dealer.

# **ACCESSORIES**

These items are packed together with the projector:

Name	Quantity	Unit	Remark	
G clamp	2	Pcs		
$\Omega$ clamp	2	Pcs	Optional	
XLR cable	1	Pc	With Plug & Socket	
Safety cord	1	Pc		
User's manual	1	Pc		
Wireless Receiver's Antenna	1	pc	Mounted with a projector via its interface before use	

# SAFE USAGE OF THE PROJECTOR

When unpacking and before disposing of the carton check there is no transportation damage before using the projector. Should there be any damage caused by transportation, consult your dealer and do not use the apparatus.

The projector is for indoor use only, IP20. Use only in dry locations. Keep this device away from rain and moisture, excessive heat, humidity and dust. Do not allow contact with water or any other liquids.

DO NOT mount the projector directly onto inflammable surface



The projector is only intended for installation, operation and maintenance by qualified personnel.

The projector must be installed in a location with adequate ventilation, at least 50cm from adjacent wall surfaces. Be sure that no ventilation slots are blocked.

Do not project the beam onto inflammable surfaces, minimum distance is 5m. 0 5m 🖹

Avoid direct exposure to the light from the lamp. The light is harmful to the eye.

Do not attempt to dismantle and/or modify the projector in any way.

Electrical connection must only be carried out by qualified personnel.

Before installation, ensure that the voltage and frequency of power supply match the power requirements of the projector.

It is essential that each projector is correctly earthed and that electrical installation conforms to all relevant standards.

Do not connect this device to any other types of dimmer apparatus.

Make sure that the power-cord is never crimped or damaged by sharp edges. Never let the power-cord come into contact with other cables. Only handle the power-cord by the plug. Never pull out the plug by tugging the power-cord.

Keep a projector's optical system clean. Do not touch LED lens with bare hands.

The projector should always be installed with a secondary safety fixing. A safety cord is supplied for this; it should be attached as shown in "installing the projector" section.

Shields and lens shall be changed if they have become visibly damaged to such an extent than their effectiveness is impaired, for example by cracks or deep scratches.

LED lamps should be replaced if damaged or having reached life limit.

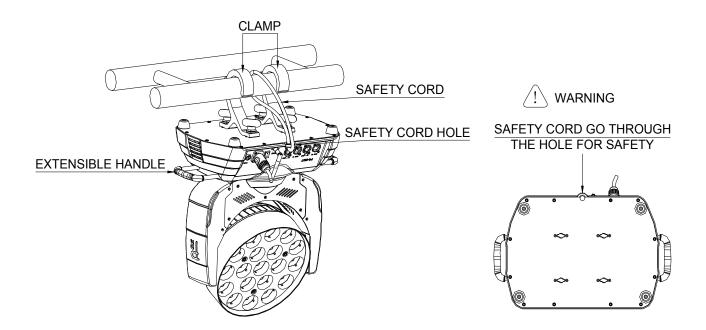
Exterior surface temperatures of the projector hen at steady state is 55°C,

There is no user serviceable parts inside the projector, do not open the housing and never operate the projector with the covers removed.

If you have any questions, don't hesitate to consult your dealer or manufacturer.

Always disconnect a projector from the POWER when not in use or before cleaning or any maintenance work!

# INSTALL THE PROJECTOR



Take 2 clamps and 1 safety cord out from the package and mount 2 clamps on the underside of projector with 2 retainers attached to each clamp. Hang the projector on the structure and fasten the screws attached to each clamp. (See the **WARNING** on the underside of the base as shown above) Always ensure that the projector is firmly anchored to avoid vibration and slipping whilst functioning. Always ensure that the structure that you are going to mount the projector is secure and is strong enough to support a weight of each projector.

#### **WARNING:**

- 1. The projector MUST be lifted or carried by the HANDLES instead of clamps.
- 2. For safety the safety cord should afford 10 times of the unit's weight.

# POWER SUPPLY-MAINS

Connect the power cord as follows:

L(live) =brown

E (earth) = yellow/green

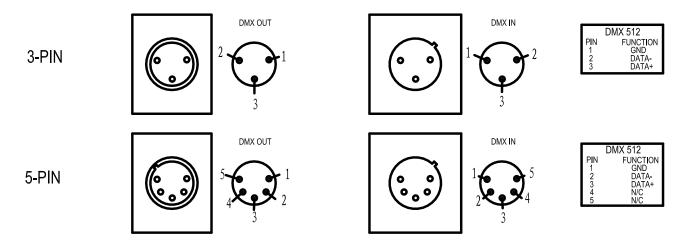
N (neutral) =blue

Use the plug provided to connect the mains power to the projector paying attention to the voltage and frequency marked on the panel of the projector. It is recommended that each projector be supplied separately so that they may be individually switched on and off.

#### **IMPORTANT**

It is essential that each projector is correctly earthed and the electrical installation conforms to all relevant standards.

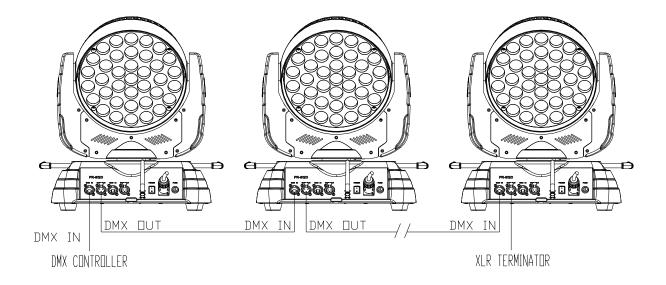
# CONTROL CONNECTION



Connection between controller and projector and between one projector and another must be made with a 2 core-screened cable, with each core having at least a 0.5mm diameter. Connection to and from the projector is via cannon 5 pin (which are included with the projector) or 3 pin XLR plugs and sockets. The XLR's are connected as shown in the figure above.

Note: care should be taken to ensure that none of the pins touch the metallic body of the plug or each other. The body of the plug is not connected in any way. The projector accepts digital control signals in protocol DMX512 (1990).

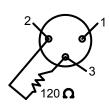
Connect the controller's output to the first fixture's input, and connect the first fixture's output to the second fixture's input and connect the rest fixtures in the same way. Eventually connect the last fixture's output to a DMX terminator as shown in the figure below.



# DMX TERMINATOR

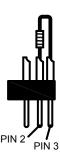
In the Controller mode, at the last projector in the chain, the DMX output has to be connected with a DMX terminator. This prevents electrical noise from disturbing and corrupting the DMX control signals.

The DMX terminator is simply an XLR connector with a  $120\Omega$  (ohm) resistor connected across pins 2 and 3, which is then plugged into the output socket on the last projector in the chain. The connections are illustrated below.

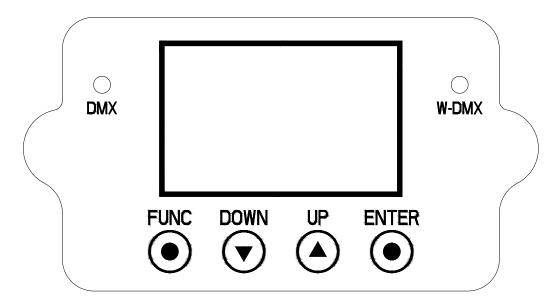


# DMX TERMINATOR CONNECTION

Connect a 120 Ω(OHM) resistor across pins 2 and 3 in an XLR plug and insert into the DMX out socket on the last unit in the chain.



# SETUP OPTIONS-PROJECTOR CONFIGURATION



Projector configuration can be set conveniently via gentle press of button switch and LCD display.

To browse or change its setup options, after button ENTER has been pressed for more than 3 seconds to unlock panel, the DMX Address will be displayed, which means the menus have been entered into.

Press button UP or DOWN to browse or change through the various Setup Options.

Press button ENTER to save your settings or enter the next menu while currently displayed parameters flashing.

Press button UP or DOWN to change values.(Add or subtract)

# TO SET THE DMX START ADDRESS

Each projector must be given a DMX start address so that the correct projector responds to the correct control signals. This DMX start address is the channel number from which the projector starts to "listen" to the digital control information being sent out from the controller. The projector have two modes of 12CH and 20CH. For example 12CH mode has 12 channels, so set the No. 1 projector's address 001, No. 2 projector's address 013, No. 3 projector's address 025, No. 4 projector's address 037 and so on.

Launch the projector. Press button ENTER more than 3 seconds to unlock the display to enter into menus.

Press button ENTER to display flashing **DMX address**;

Press button UP and DOWN, you can set the address;

Press button ENTER to confirm it while LED Indication stops from flashing and the projector enters into the upper menu, which means the projector has saved the Start Address. When powered on next time, it will display the value saved last time.

Press button FUNC, it will return to the upper menu.

# **OPERATION MENU**

1 <sup>st</sup> level	2 <sup>nd</sup> level	3 <sup>rd</sup> level	4 <sup>th</sup> level	5 <sup>th</sup> level	Descriptions
DMX Address	Standard mode: 1-501 Extended mode: 1-493				
Reset	Are You Sure				
	DMX Channel	Standard 12			
	Mode	Extended 20			
	Pan Invert	No			
	r an mvert	Yes			
	Tilt Invert	No			
	The mivere	Yes			
		XLR First			
	DMX Mode (Default: XLR first)	XLR Only			
		Wireless Only			
		Wireless First			
Config Setup		Wireless To XLR			Wireless ONLY
	Unlink Wireless	Yes			
	MasterSlaveSelec	Slave			Default: Slave
	iviasiei siaveseiec	Master			
	Factory Setting	Yes			Fixture's and Lamp's hours not cleared
	Language Setup	Chinese			
		English			
	Lcd Dimmer (Default:10)	1 - 10			From dark to bright
	Lcd Light Setup	Yes			LCD backlight will be off 3 minutes after the display is locked without any buttons being pressed
		No			Always on

	D: 1 1 :	No			D: 1 1 :
	Display Inversion	Yes			Display Inversion
	LED Temperature	XXXX			LED temperature
Information	Fixture's Time	XXXX			Fixture's hours
	Software Version	A V.X.X B V.X.X C V.X.X			CPU: A, B, C Software Versions
	Auto Test				
		Red	000 - 255		From dark to bright
		Green	000 - 255		From dark to bright
Test Mode		Blue	000 - 255		From dark to bright
rest iviode	Manual Test	White	000 - 255		From dark to bright
		ZOOM	000 - 255		Linear Light Spot adjustment
		Pan Location	000 - 255		
		Tilt Location	000 - 255		
	Progra Select	Preset Memory			Valid under Master mode
		User Process			Valid under Master mode
	User Progra Edit	Static Scene 1~16	Strobe	000 - 255	Channel 1's functions as reference
			Red	000 - 255	Linear from dark to bright adjustment
			Green	000 - 255	Linear from dark to bright adjustment
Operation Mode			Blue	000 - 255	Linear from dark to bright adjustment
			White	000 - 255	Linear from dark to bright adjustment
			ZOOM	000 - 255	Linear Light Spot adjustment
			Pan Location	000 - 255	
			Tilt Location	000 - 255	
			P&T Speed	000 - 255	
			Keep Time	000 - 255	0*0.1s ~ 255*0.1s

DMX PROTOCOL					
Standard	Extended	Functions	DMX	Descriptions	
			000-007	NO Strobe	
			008-127	Pulse from slow to fast	
			128-135	NO Strobe	
			136-177	Pulse Strobe 1	
1	1	Strobe	178-185	NO Strobe	
			186-227	Pulse Strobe 2	
			228-235	NO Strobe	
			236-249	Random Strobe	
			250-255	NO Strobe	
2	2	Dimmer	000-255	Linear Dimming from dark to Bright	
			000	NO	
3	3	Color Temp	001-255	Linear Color Temp adjustment from low to high (2700K –	
			001-233	10000K)	
			000-007	NO	
	4	Color effect	008-231	32 colors	
			232-255	Rainbow effect from fast to slow	
4	5	Area 1 Red	000-255	Linear adjustment in Red from light to dark of Area 1	
	9	Area 2 Red	000-255	Linear adjustment in Red from light to dark of Area 2	
5	6	Area 1 Green	000-255	Linear adjustment in Green from light to dark of Area 1	
	10	Area 2 Green	000-255	Linear adjustment in Green from light to dark of Area 2	
6	7	Area 1 Blue	000-255	Linear adjustment in Blue from light to dark of Area 1	
	11	Area 2 Blue	000-255	Linear adjustment in Blue from light to dark of Area 2	
7	8	Area 1 White	000-255	Linear adjustment in White from light to dark of Area 1	
,	12	Area 2 White	000-255	Linear adjustment in White from light to dark of Area 2	
8	13	Zoom	000-255	Linear Zooming (0%~100%)	
	14	Zoom in 16 bit	000-255	Zooming in 16 bit precision	
9	15	Pan	000-255	Pan (0°∼540°)	
	16	Pan in 16 bit	000-255	Pan in 16 bit Precision	
10	17	Tilt	000-255	Tilt (0°~270°)	
	18	Tilt in 16 Bit	000-255	Tilt in 16 bit Precision	
11	19	Pan & Tilt Speeds	000-255	Pan and Tilt Speeds from fast to slow	
12	20	Control Function	000-049	Reserved	
12	20	Conuoi Function	050-255	Reset ( Reset after 2 seconds)	

Priority: color effects->single colors-> CT

Note: While at rainbow effects, strobe does not work.

# INDICATION OF LED DIGITAL TUBE

Specifications for LED indications:

Green indication	On	DMX signal OK
Green indication	Off	No DMX signal
	on	Wireless signal OK
Blue Indication	Off	Not linked to any transmitter
	Flashing	Losing link with or being linked with a transmitter

# **MAINTENANCE**

To prolong a Projector's life, Regular maintenance should be done for its LED optical System to ensure that the system be in best operational condition. If the projector does not function, check the fuses on the power socket of the projector, if burned, they should only be replaced by fuses of the same specification. Should these be damaged call a qualified technician before replacement. The projector has thermal protection device that will switch off the projector in case of overheating, should this occur, check if the fans work normally or fan and fan shield are blocked by dust. If the projector not operational, call a qualified technician. After cleaned and repaired, the projector can be restarted.

Any maintenance work should only be carried out by qualified technicians.

# KEEPING THE PROJECTOR CLEAN

It definitely necessary to keep a projector clean for its reliable use. Cooling fans and their shield should be cleaned every 15days. LED lamps' lens and cover should be cleaned regularly for optimized light output.

Cleaning frequency depends on how often a projector is used and its operational environment. A soft cloth and typical glass cleaning products should be used in cleaning. It is recommended to clean the external optics at least once every 20 days.

Do not use any organic solvent, e.g. alcohol, to clean t housing of the apparatus.

# TROUBLESHOOTING

PROBLEM	ACTION
The projector can't be started	<ul> <li>Power Cable not connected well</li> <li>Power supply damaged or not connected well, a qualified Technician should be required</li> <li>Control board not connected well and a qualified Technician should be required.</li> </ul>
The lamp can be started, but LED lamps are off and not controlled	➤ LED boards not connected properly, a qualified technician is needed
A projector's lamps are on but it doesn't respond to the controller	<ul> <li>Make sure that the projector's start address is correctly set</li> <li>Replace or repair the DMX cable.</li> </ul>
The beam appears dim and its brightness slows sharply	Ambient temperature too high which result in a projector overheating, necessary ventilating measures needed.

# TECHNICAL DATA

#### **VOLTAGES:**

100V~240V AC, 50/60Hz

#### **POWER CONSUMPTION:**

400W@220V

#### LED:

Model LEDEngine (LZ4-04MDCA)

Quantity 19pcs

Manufacturers Rated LED Life 50000 Hours

#### **COLOURS:**

RGBW linear color mixing with Macro

#### **COLOR TEMPERATURE CORRECTION:**

Linear color temperature correction from 2700K to 10000K

#### **DIMMER:**

0-100% linearly adjustable

#### STROBE:

Electronic Strobe 0~25F.P.S

# PAN AND TILT:

PAN(0°~540°) and TILT(0°~270) with Auto Position Correction Function

#### LIGHT ANGLE:

Beam Angle(1/2 Maximum)  $7^{\circ}$ ~42° Light Spot Angle(1/10 Maximum)  $17^{\circ}$ ~60°

#### **CONTROL:**

DMX512, 3 pins and 5 pins interfaces

RDM Control Protocol

12channels in standard mode, and 20 channels in extended mode

Master/Salve Synchronous Control Mode

Self test mode, manual test mode

DMX 512 wireless signal function with optional DMX 512 wireless transmitter

#### **OTHER FUNCTIONS:**

Pan & Tilt Speed adjustable

Auto speed adjustment of Fans

Auto light output decrease while lamp temperature is too high

Display's Brightness adjustable

Lamp temperature & Project's use time display

# DMX512 Channel Value Display

Menu Invert Function

# **HOUSING:**

High temperature ABS +die-casting aluminum, IP20

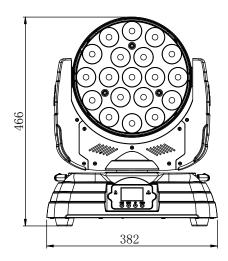
# WORK ENVIRONMENT TEMPERATURE:

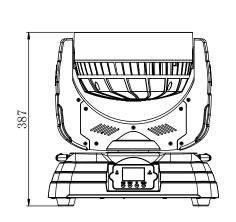
-20°C~40°C

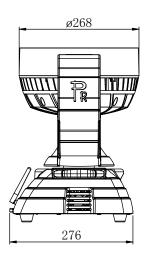
#### **WEIGHT:**

Net weight: 13Kg Gross Weight: 17.5 Kg

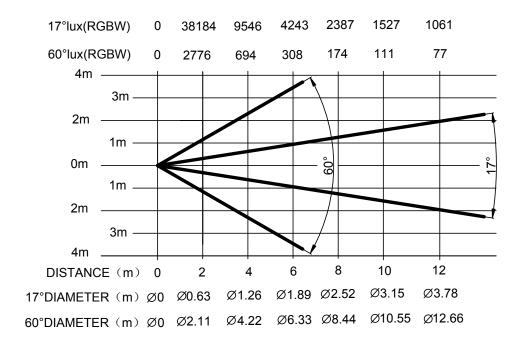
# SIZE:

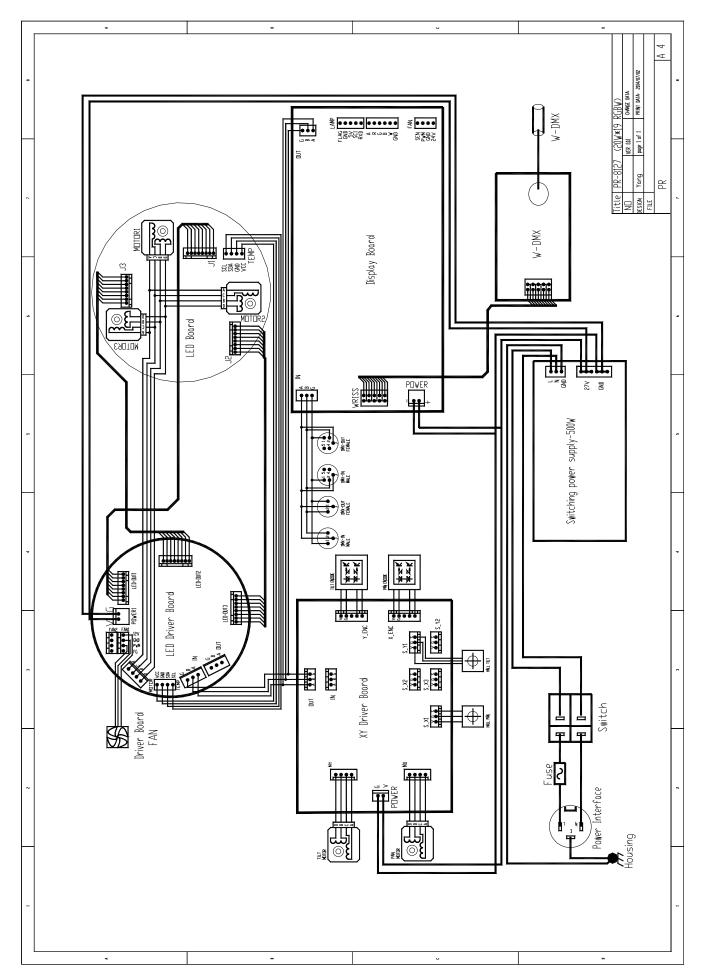






# LIGHT OUTPUT:





# COMPONENT ORDER CODES

NAME	PART NO.	QUANTITY	REMARK
Wireless Antenna	W006503	1	A40501 360*360
Wireless Receiver	W006502	1	A40901G4
Fuse(VDE Certificate )	270041037	1	
Magnet Coupler Board on the Right(with sockets)	230020113	1	
Belt	290151352	1	HTD447-3M, 8MM Wide
Belt	290151353	1	HTD342-3M,8MM Wide
First Lens	071100058	19	
Second Lens	071100059	19	
Stepper Motors	030040235	3	NMB-MAT PL25L-A24-YHW9
Stepper Motors	030040174	2	PAN/TILT
PWM Speed variable Fan	030060097	1	
LED Lamp Board	230060339	1	
LCD Display	230060338	1	
LED Drive Board	230060294	1	
Pan/Tilt Control Board	230060340	1	Pan/Tilt Motors Control

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