

# **LEDJ**

## **Libretto RGBAL**

### **Cyclorama Wash**

#### **User Manual**



**Order codes: LEDJ604**

### WARNING

## FOR YOUR OWN SAFETY, PLEASE READ THIS USER MANUAL CAREFULLY BEFORE YOUR INITIAL START-UP!

- Before your initial start-up, please make sure that there is no damage caused during transportation.
- Should there be any damage, consult your dealer and do not use the equipment.
- To maintain the equipment in good working condition and to ensure safe operation, it is necessary for the user to follow the safety instructions and warning notes written in this manual.
- Please note that damages caused by user modifications to this equipment are not subject to warranty.



### IMPORTANT:

The manufacturer will not accept liability for any resulting damages caused by the non-observance of this manual or any unauthorised modification to the equipment.

- Never let the power cable come into contact with other cables. Handle the power cable and all mains voltage connections with particular caution!
- Never remove warning or informative labels from the unit.
- Do not open the equipment and do not modify the unit.
- Do not connect this equipment to a dimmer pack.
- Do not switch the equipment on and off in short intervals, as this will reduce the system's life.
- Only use the equipment indoors.
- Do not expose to flammable sources, liquids or gases.
- Always disconnect the power from the mains when equipment is not in use or before cleaning! Only handle the power-cable by the plug. Never pull out the plug by pulling the power-cable.
- Make sure that the available mains supply voltage is between 100~240V AC, 50/60Hz.
- Make sure that the power cable is never crimped or damaged. Check the equipment and the power cable periodically.
- If the equipment has been exposed to drastic temperature fluctuation (e.g. after transportation), do not connect power or switch it on immediately. The arising condensation might damage the equipment. Leave the equipment switched off until it has reached room temperature.
- Never touch the fixture during operation as it may be hot.
- If the equipment is dropped or damaged, disconnect the mains power supply immediately and have a qualified engineer inspect the equipment before operating again.
- If your product fails to function correctly, stop use immediately. Pack the unit securely (preferably in the original packing material), and return it to your Pro Light dealer for service.
- Only use fuses of same type and rating.
- Repairs, servicing and power connection must only be carried out by a qualified technician. THIS UNIT CONTAINS NO USER SERVICEABLE PARTS.
- This lighting fixture is for professional use only - it is not designed for or suitable for household use. The product must be installed by a qualified technician in accordance with local territory regulations. The safety of the installation is the responsibility of the installer. The fixture presents risks of severe injury or death due to fire hazards, electric shock and falls.
- Warning! Risk Group 2 LED product according to EN 62471. Do not view the light output with optical instruments or any device that may concentrate the beam.
- WARRANTY: One year from date of purchase.

### OPERATING DETERMINATIONS

If this equipment is operated in any other way, than those described in this manual, the product may suffer damage and the warranty becomes void. Incorrect operation may lead to danger e.g: short-circuit, burns and electric shocks etc.

Do not endanger your own safety and the safety of others!

Incorrect installation or use can cause serious damage to people and/or property.

**Please note:** These fixtures are intended for stage lighting and entertainment applications only, and are not intended for extended periods of use, including but not limited to house-light, industrial or architectural applications and should only be operated with short duty cycles.

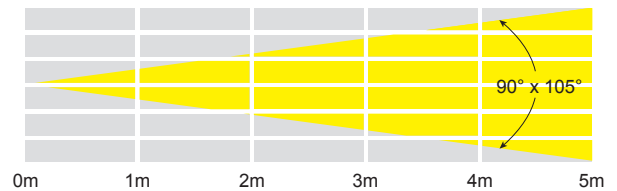
### Libretto RGBAL Cyclorama Wash

The Libretto RGBAL Cyclorama Wash is a compact, five-colour fixture suitable for theatre, studio or stage lighting. The wide angle, 90° x 105° beam is designed to deliver rich, even tones across large areas while the COB LED technology ensures a perfect colour mix without any multicoloured shadows.

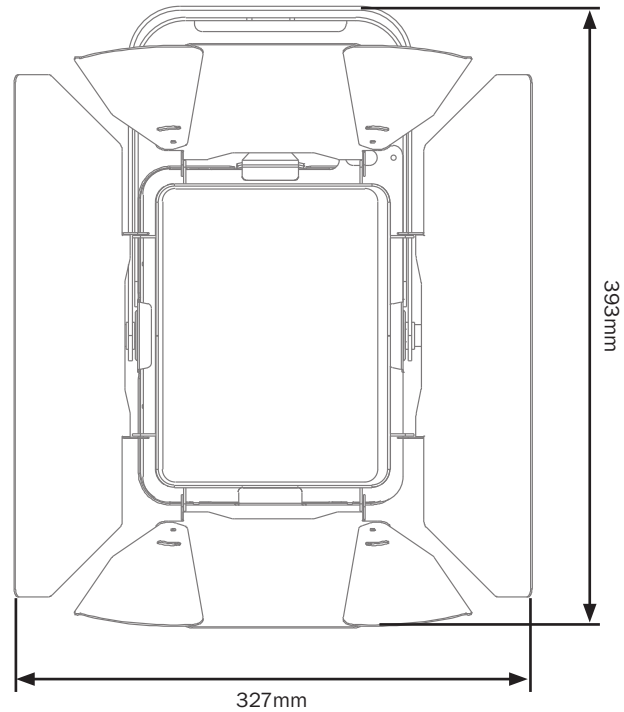
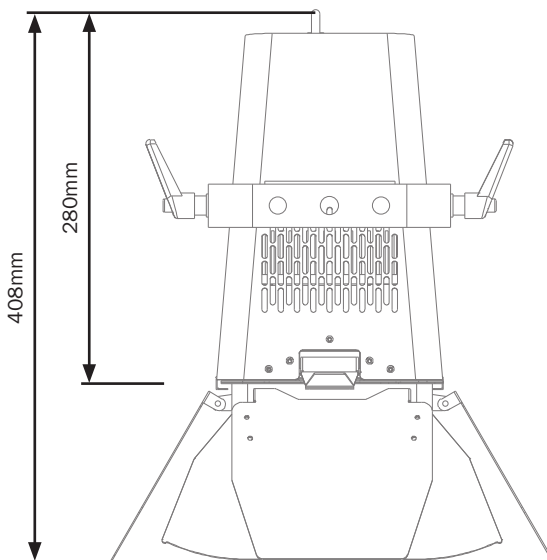
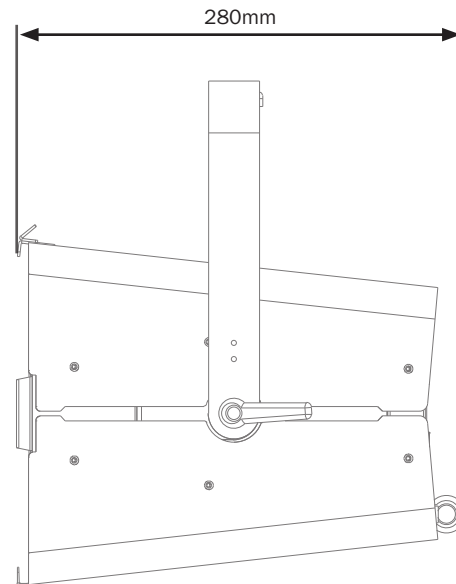
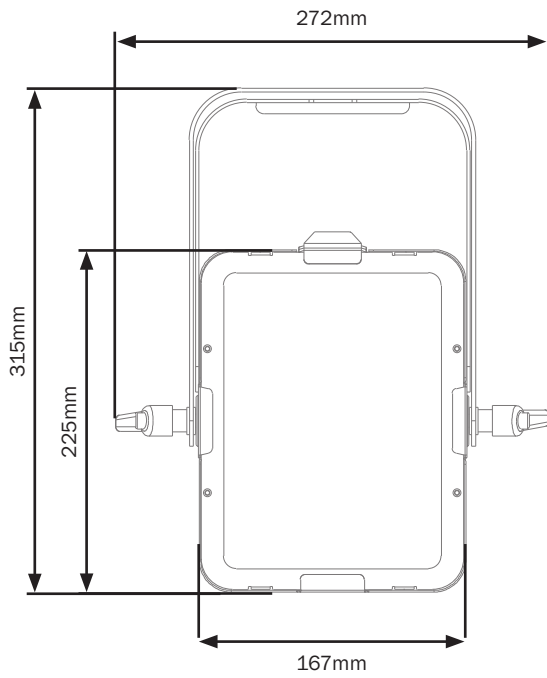
- 1 x 200W five-colour COB LED (RGBAL)
- Beam angle: 90° x 105°
- 1,147 Lux @ 2m (full on)
- CRI: 92
- Refresh rate: 900Hz, 1kHz, 1.2kHz, 1.5kHz, 2.5kHz, 4kHz, 5kHz, 10kHz, 15kHz or 20kHz selectable
- Colour temperature: 2800K-10000K
- DMX channels: 5/9 or 14 selectable
- Auto, static colour and manual modes
- 0-100% dimming
- 4 dimming curves with two dimming response times: Linear, square law, inverse square law and S-curve
- Variable strobe
- Bracket allows for multiple rigging or floor standing applications
- 4 button menu with OLED display
- PowerTwist TR1 input/output
- 5-Pin XLR input/output
- Eight leaf barn doors with integral gel frame
- Temperature controlled fan

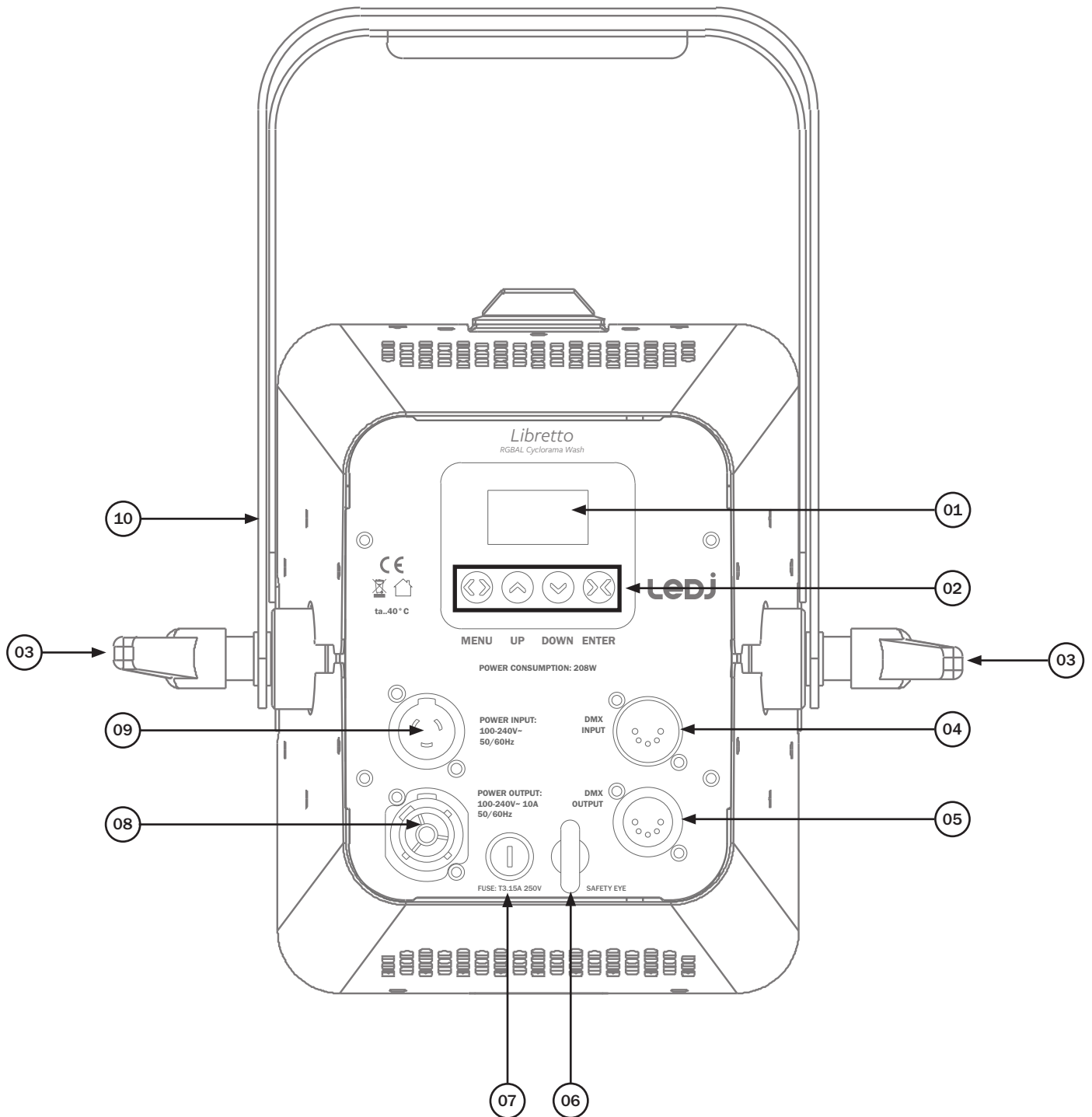


90° x 105° - Lux					
FULL ON	4588	1147	509	286	183
R	1640	410	182	102	65
G	1604	401	178	100	64
B	484	121	53	30	19
A	888	222	98	55	35
L	1860	465	206	116	74



Specifications	RGBAL Cyclorama Wash
Power consumption	208W
Power supply	100~240V, 50/60Hz
Fuse	T3.15A 250V
Dimensions	315 x 272 x 280mm
Weight	5.9kg
Order code	LEDJ604





01 - OLED display  
 02 - Function buttons  
 03 - Hanging bracket adjustment knobs

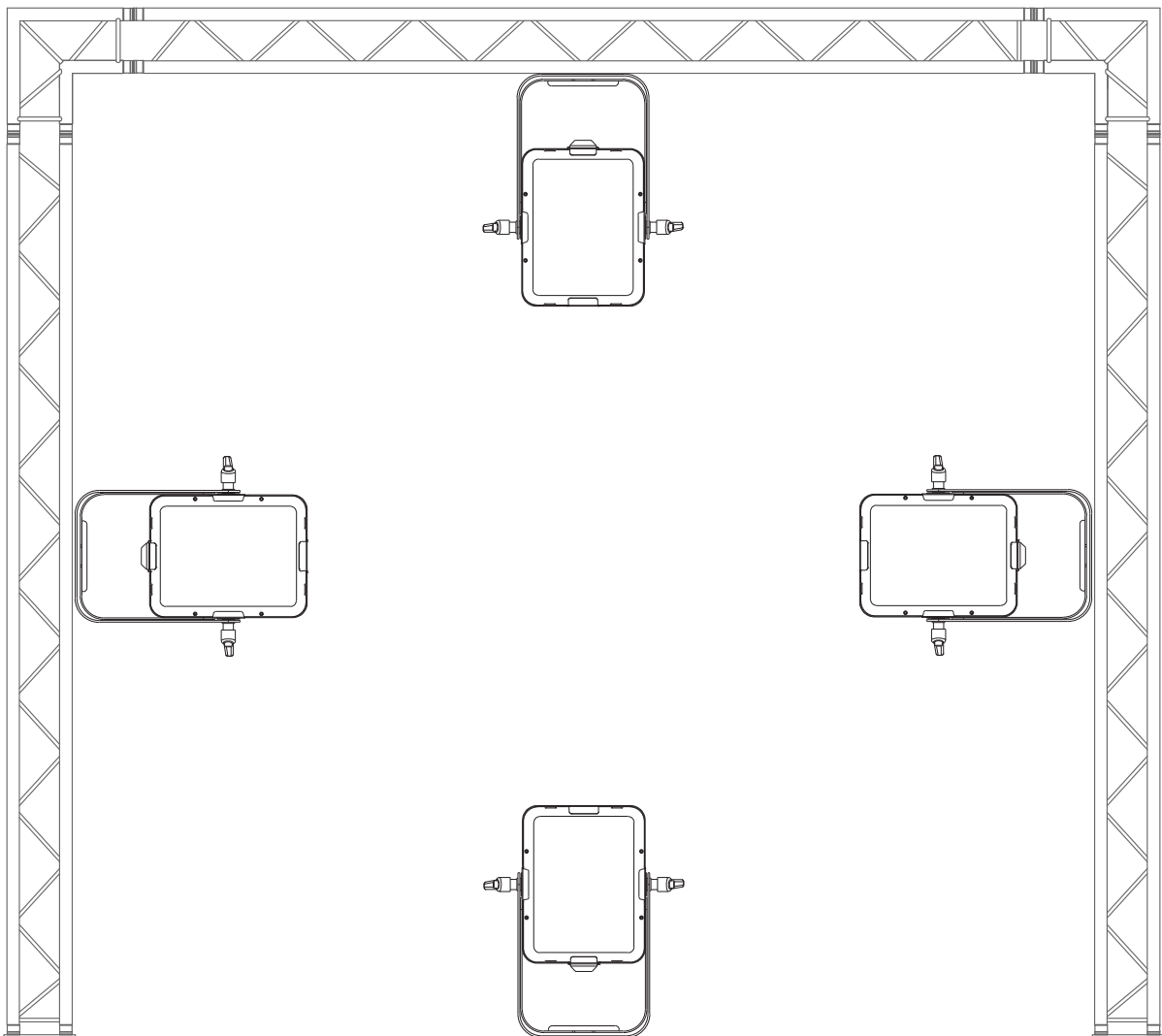
04 - 5-Pin DMX input  
 05 - 5-Pin DMX output  
 06 - Safety Eye  
 07 - Fuse T3.15A 250V

08 - PowerTwist TR1 output  
 09 - PowerTwist TR1 input

In the box: **1 x fixture,**  
**1 x barn door &**  
**1 x power cable**

Before installing the fixture, the supporting structure (ie. truss) must be able to hold a minimum of 10 times the fixtures weight without any deformation (eg. 15kg - 150kg point load). The fixture must be secured with a secondary safety attachment when being installed (ie. an appropriate safety cable). Never stand directly below the fixture when mounting, removing, and/or servicing.

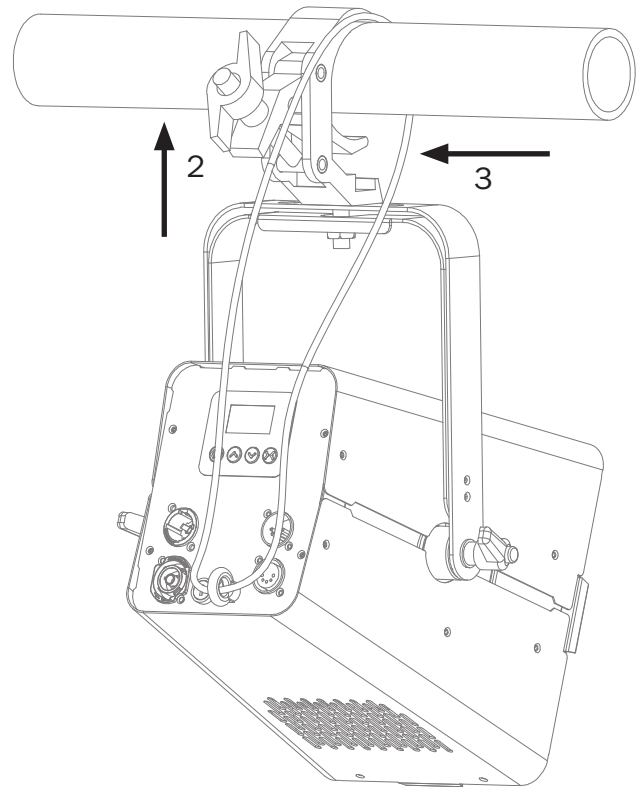
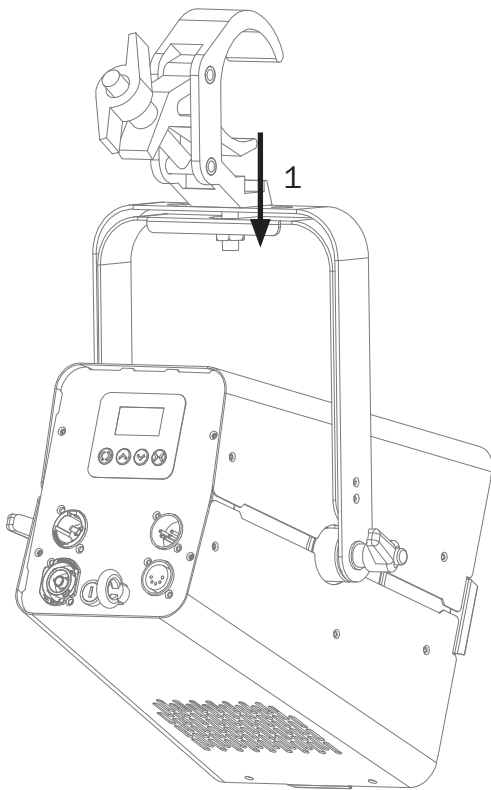
Overhead installation requires experience and qualifications to calculate working load limits, the material being used at the installation area and periodic safety inspections of the fixture and installation material. If you do not have the relevant experience and/or qualifications please do not attempt the installation yourself. The installation should be checked annually by a qualified person.



The LEDJ Libretto RGBAL Cyclorama Wash can be operated in a number of mounting positions as shown in the diagram above, hanging upside-down from the ceiling or truss, mounting sideways on truss or stood upright on a flat level surface. Always use a safety wire as an extra safety precaution to prevent damage/injury in the event a clamp fails (see the next page for clamp installation). Never use the carry handles for secondary attachments.

### Installation:

1. Fasten the clamp to the bracket with a bolt and lock nut to the unit, ensuring it is secure.
2. Mount the fixture onto your truss system via the clamp and tighten to ensure secure.
3. Pull the safety cable through the safety cable holes located on the top/rear of the fixture and around the truss.



**Control Panel Menu:**

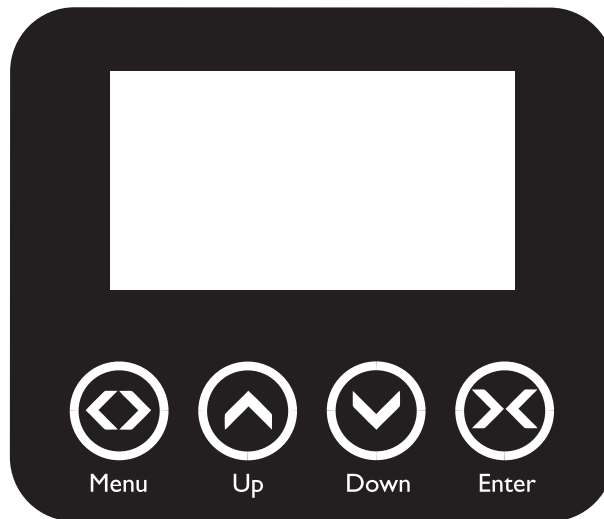
The OLED control panel situated on the front of the fixture allows the user to access the menu system to adjust the fixtures settings.

When the unit has been powered on the display will show “**Libretto RGBAL Cyclorama Wash**”.

The fixture will then return to its home screen.

Pressing the “**MENU**” button once will take the user to the fixtures main menu. Using the “**UP**” and “**DOWN**” buttons you can then navigate between the different options in the main menu. Pressing the “**ENTER**” button on one of these options allows you to access the sub menu where you can use the “**UP**” and “**DOWN**” buttons to select option/value required. Once the option/value has been selected press the “**ENTER**” button once more to confirm the setting.

To exit out of any of the above options, press and hold the “**MENU**” button.





Main Menu	Sub Menu	Options/Values (Default Settings in BOLD)		Description	
DMX Address	DMX Address	<b>001-512</b>		DMX Address Setting	
	Mode	5 Channel		DMX Channel Setting	
		9 Channel			
		<b>14 Channel</b>			
	DMX Fail	M/S (Master/Slave)		DMX Fail Setting	
		<b>Hold</b>			
		Blackout			
	View DMX Value	View DMX Value	1. Red		View DMX Value
			2. Green		
			3. Blue		
			4. White		
			5. Lime		
			6. Colour macros		
7. CCT					
8. Dimmer					
9. Dimmer fine					
10. Strobe					
11. Macro auto					
12. Macro speed					
Show Settings	Mode	<b>Auto</b>		Auto (Show)	
		Manu Defined		Manual Mode Setting	
	Show Chase	Show 0	Co: 1-64	Static Colour Mode	
		<b>Show 1</b> - Show 9	Sp: 0-99	Auto (Show) Modes	
Fixture Settings	Dimmer Curve	<b>Linear</b>		Dimming Curve Setting	
		Square Law			
		Inv SQ Law			
		S Curve			
	Dimmer Speed	LED		Dimming Speed Setting	
		<b>Halogen</b>			
	LED Refresh	900Hz, 1000Hz, 1200Hz, 1500Hz, 2500Hz, 4000Hz, 5000Hz, 10kHz, 15kHz, 20kHz		LED Refresh Setting	
	White Balance	Red	125-255		White Balance Setting
		Green	125-255		
		Blue	125-255		
Amber		125-255			
Lime		125-255			
Display Settings	Display Inverse	<b>No</b>		Display Inverse Setting	
		Yes			
	Backlight Auto Off	No		Backlight Setting	
<b>Yes</b>					
	Display Contrast	0-30 ( <b>10</b> )		Display Brightness Setting	

Main Menu	Sub Menu	Options/Values (Default Settings in BOLD)	Description
Fixture Test	Auto Test		Auto Test
	Manual Defined	1. Red 000-255	Manual Mode
		2. Green 000-255	
		3. Blue 000-255	
		4. Amber 000-255	
		5. Lime 000-255	
		6. Dimmer 000-255	
		7. Strobe 000-255	
Fixture Information	Fixture Hour	xxx h	Fixture Run Time
	Firmware Version	CPU-A V x.x B x.x	Fixture Firmware Version
Special Functions	Factory Settings	<b>No</b>	Default Factory Settings
		Yes	

### DMX channel modes:

Channel			Value	Function
5 Channel	9 Channel	14 Channel		
1	1	1	000-255	Red dimmer (0-100%)
2	2	2	000-255	Green dimmer (0-100%)
3	3	3	000-255	Blue dimmer (0-100%)
4	4	4	000-255	Amber dimmer (0-100%)
5	5	5	000-255	Lime dimmer (0-100%)
-	-	6	000	No function
			001-004	Colour Macro 1
			005-008	Colour Macro 2
			009-012	Colour Macro 3
			013-016	Colour Macro 4
			017-020	Colour Macro 5
			021-024	Colour Macro 6
			025-028	Colour Macro 7
			029-032	Colour Macro 8
			033-036	Colour Macro 9
			037-040	Colour Macro 10
			041-044	Colour Macro 11
			045-048	Colour Macro 12
			049-052	Colour Macro 13
			053-056	Colour Macro 14
			057-060	Colour Macro 15
			061-064	Colour Macro 16
			065-068	Colour Macro 17
			069-072	Colour Macro 18
			073-076	Colour Macro 19
			077-080	Colour Macro 20
			081-084	Colour Macro 21
			085-088	Colour Macro 22
			089-092	Colour Macro 23
			093-096	Colour Macro 24
			097-100	Colour Macro 25
			101-104	Colour Macro 26
			105-108	Colour Macro 27
			109-112	Colour Macro 28
			113-116	Colour Macro 29
			117-120	Colour Macro 30
			121-124	Colour Macro 31
			125-128	Colour Macro 32
			129-132	Colour Macro 33
133-136	Colour Macro 34			

### DMX channel modes:

Channel			Value	Function
5 Channel	9 Channel	14 Channel		
-	-	6 (cont.)	137-140	Colour Macro 35
			141-144	Colour Macro 36
			145-148	Colour Macro 37
			149-152	Colour Macro 38
			153-156	Colour Macro 39
			157-160	Colour Macro 40
			161-164	Colour Macro 41
			165-168	Colour Macro 42
			169-172	Colour Macro 43
			173-176	Colour Macro 44
			177-180	Colour Macro 45
			181-184	Colour Macro 46
			185-188	Colour Macro 47
			189-192	Colour Macro 48
			193-196	Colour Macro 49
			197-200	Colour Macro 50
			201-204	Colour Macro 51
			205-208	Colour Macro 52
			209-212	Colour Macro 53
			213-216	Colour Macro 54
			217-220	Colour Macro 55
			221-224	Colour Macro 56
			225-228	Colour Macro 57
			229-232	Colour Macro 58
233-236	Colour Macro 59			
237-240	Colour Macro 60			
241-244	Colour Macro 61			
245-248	Colour Macro 62			
249-252	Colour Macro 63			
253-255	Colour Macro 64			
-	6	7	000-255	Colour Temperature (2,800K-10,000K)
-	7	8	000-255	Master dimmer (0-100%)
-	-	9	000-255	Dimmer fine (0-100%)

### DMX channel modes:

Channel			Value	Function	
5 Channel	9 Channel	14 Channel			
-	-	10	000-049	Dimming Curve selected via the fixture	
			050-099	Linear	
			100-149	Square Law	
			150-199	Inv SQ Law	
			200-255	S Curve	
	8	11	000-019	LED off	
			021-024	LED on	
			025-064	Strobe (slow-fast)	
			065-069	LED on	
			070-084	Random Strobe (slow-fast)	
			085-089	LED on	
			090-104	Strobe (slow close-fast open)	
			105-109	LED on	
			110-124	Strobe (random)	
			125-129	LED on	
			130-144	Strobe (random, fast close-slow open)	
			145-149	LED on	
			150-164	Strobe (random, slow close-fast open)	
			165-169	LED on	
			170-184	Strobe (burst/pulse)	
			185-189	LED on	
			190-204	Strobe (random, burst pulse)	
			205-209	LED on	
			210-224	Strobe (slow close-slow open)	
			225-229	LED on	
			230-244	Strobe (small bursts)	
			245-255	LED on	
			12	000-002	Not function
				003-127	Colour 1 - Colour 32
				128-191	Colour Macro 1 - 16
192-255	Colour Fade 1 - 16				
13	000-255	Speed (slow to fast)			

### DMX channel modes:

Channel			Value	Function
5 Channel	9 Channel	14 Channel		
-	9	14	000-015	Default (set via menu)
			016-040	900Hz
			041-065	1000Hz
			066-090	1200Hz
			091-115	1500Hz
			116-140	2500Hz
			141-165	4000Hz
			166-190	5000Hz
			190-215	10kHz
			216-240	15kHz
			241-255	20kHz

Please note: the Show modes will not function without the dimmer channel being greater than 0.  
 When using Master/Slave mode via the show modes the slave should be set to Show 0.

### Setting the DMX address:

The DMX mode enables the use of a universal DMX controller. Each fixture requires a “start address” from 1- 512. A fixture requiring one or more channels for control begins to read the data on the channel indicated by the start address. For example, a fixture that occupies or uses 7 channels of DMX and was addressed to start on DMX channel 100, would read data from channels: 100, 101, 102, 103, 104, 105 and 106. Choose a start address so that the channels used do not overlap. E.g. the next unit in the chain starts at 107.

### DMX 512:

DMX (Digital Multiplex) is a universal protocol used as a form of communication between intelligent fixtures and controllers. A DMX controller sends DMX data instructions from the controller to the fixture. DMX data is sent as serial data that travels from fixture to fixture via the DATA “IN” and DATA “OUT” XLR terminals located on all DMX fixtures (most controllers only have a data “out” terminal).

### DMX linking:

DMX is a language allowing all makes and models of different manufactures to be linked together and operate from a single controller, as long as all fixtures and the controller are DMX compliant. To ensure proper DMX data transmission, when using several DMX fixtures try to use the shortest cable path possible. The order in which fixtures are connected in a DMX line does not influence the DMX addressing. For example; a fixture assigned to a DMX address of 1 may be placed anywhere in a DMX line, at the beginning, at the end, or anywhere in the middle. When a fixture is assigned a DMX address of 1, the DMX controller knows to send DATA assigned to address 1 to that unit, no matter where it is located in the DMX chain.

### DATA cable (DMX cable) requirements (for DMX operation):

This fixture can be controlled via DMX-512 protocol. The DMX address is set on the back of the unit. Your unit requires either a standard 3-pin or 5-pin XLR connector for data input/output, see images below.



Further DMX cables can be purchased from all good sound and lighting suppliers or Prolight Concepts dealers.

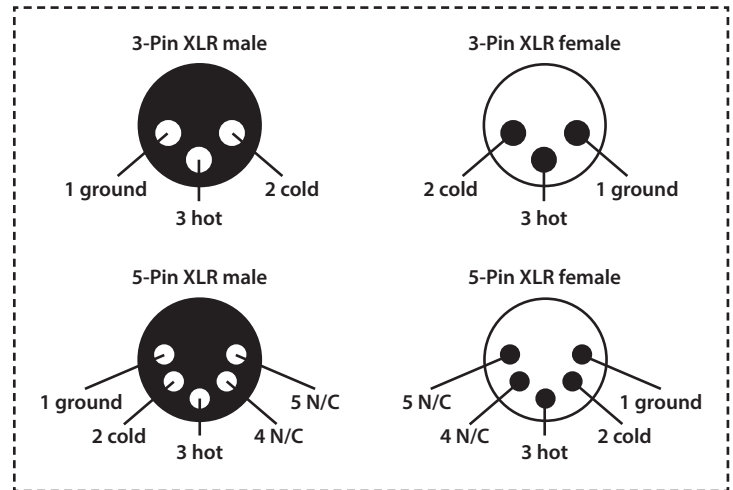
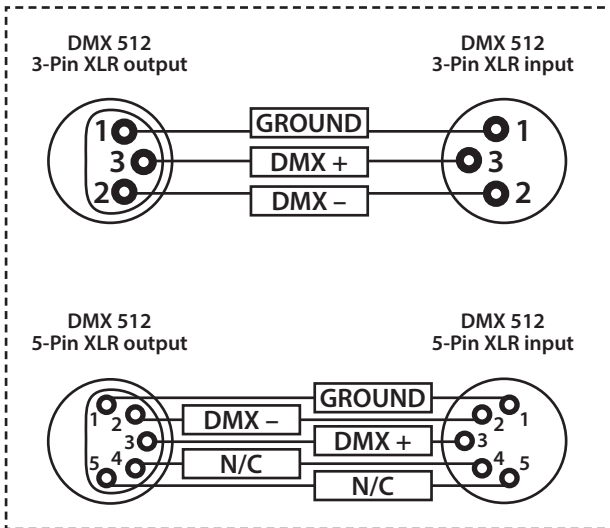
Please quote:	3-Pin:	<b>CABL10 - 2m</b>	<b>CABL11 - 5m</b>	<b>CABL12 - 10m</b>
	5-Pin:	<b>CABL185 - 2m</b>	<b>CABL187 - 5m</b>	<b>CABL188 - 10m</b>

Also remember that DMX cable must be daisy chained and cannot be split.

**Notice:**

Be sure to follow the diagrams below when making your own cables. Do not connect the cables shield conductor to the ground lug or allow the shield conductor to come in contact with the XLRs outer casing. Grounding the shield could cause a short circuit and erratic behaviour.

Pin Configuration	
3-Pin	5-Pin
	Pin 1 - Ground
	Pin 2 - Negative
	Pin 3 - Positive
-	Pin 4 - N/C
-	Pin 5 - N/C

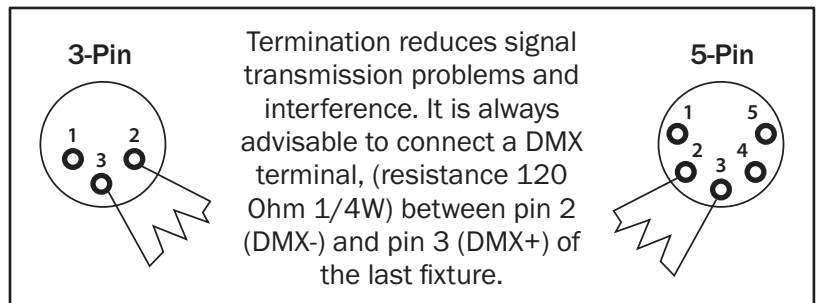


**Line termination:**

When longer runs of cable are used, you may need to use a terminator on the last unit to avoid erratic behaviour.

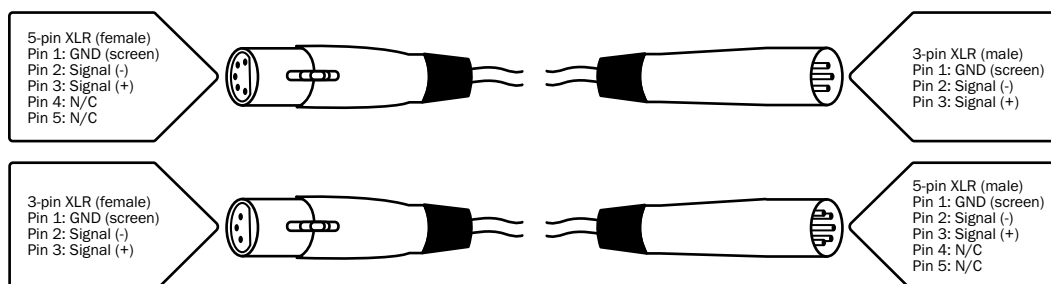
**Using a cable terminator will decrease the possibilities of erratic behaviour.**

(3-pin - Order ref: CABL90,  
5-pin - Order ref: CABL89)



**5-pin XLR DMX connectors:**

Some manufactures use 5-pin XLR connectors for data transmission in place of 3-pin. 5-pin XLR fixtures may be implemented in a 3-pin XLR DMX line. When inserting standard 5-pin XLR connectors in to a 3-pin line a cable adaptor must be used. The diagram below details the correct cable conversion.

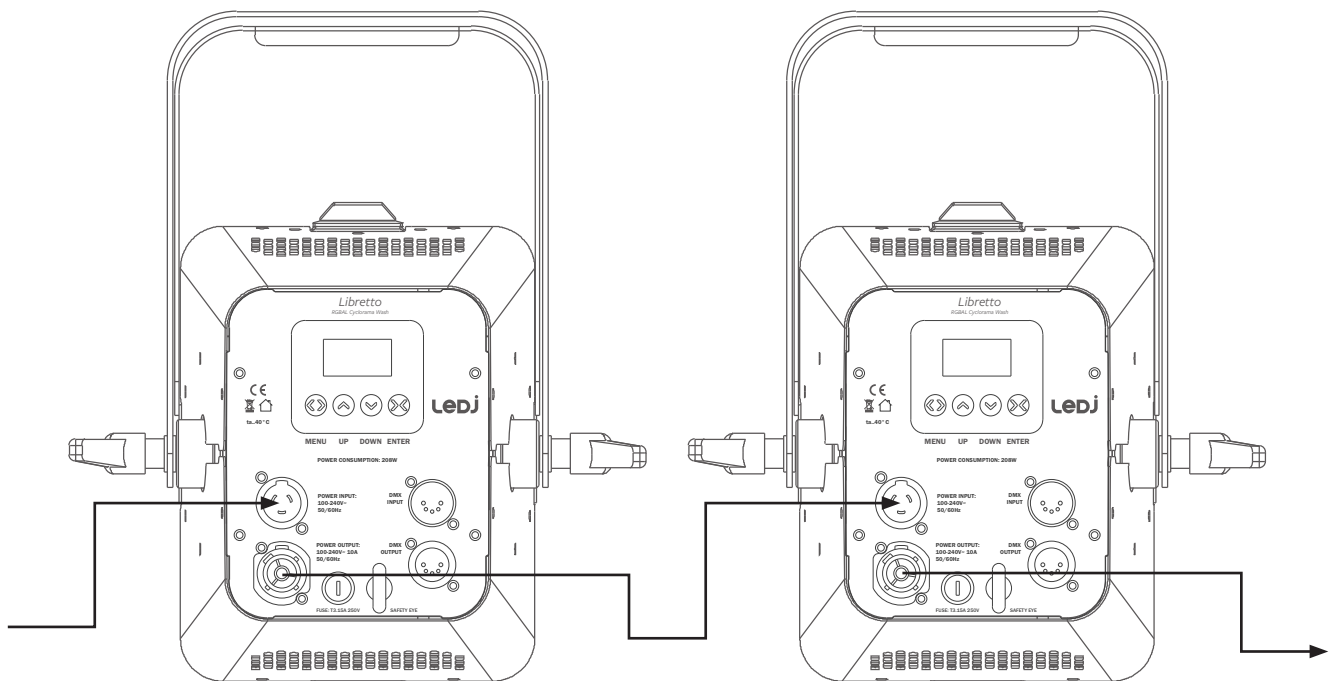




### Power linking:

This fixture provides power linking via the power output on the rear allowing multiple units to be connected together. The maximum number of fixtures that can be connected is 6 fixtures @ 240V or 3 fixtures @ 120V (including the first fixture). After the maximum number of fixtures are connected a new power run will need to be started.

Please note: Caution should be used when power linking other fixtures to the Libretto RGBAL Cyclorama Wash as the power consumption of other fixtures will vary. Fixtures fitted with lamps often require 2/3 times more current on startup, these may require their own power source.





***Correct Disposal of this Product  
(Waste Electrical & Electronic Equipment)***

**(Applicable in the European Union and other European countries  
with separate collection systems)**

This marking shown on the product or its literature, indicates that it should not be disposed with other household wastes at the end of its working life. To prevent possible harm to the environment or human health from uncontrolled waste disposal, please separate this from other types of wastes and recycle it responsibly to promote the sustainable reuse of material resources.

Household users should contact either the retailer where they purchased this product, or their local government office, for details of where and how they can take this item for environmentally safe recycling.

Business users should contact their supplier and check the terms and conditions of the purchase contract. This product should not be mixed with other commercial wastes for disposal.

