

# LX112

---

**SMART LED PAR PRO – WARM/COLD WHITE LEDS– BLACK**



# USER MANUAL

## 1. Introduction

To all residents of the European Union

### Important environmental information about this product



This symbol on the device or the package indicates that disposal of the device after its lifecycle could harm the environment. Do not dispose of the unit (or batteries) as unsorted municipal waste; it should be taken to a specialized company for recycling. This device should be returned to your distributor or to a local recycling service. Respect the local environmental rules.

**■ If in doubt, contact your local waste disposal authorities.**

Thank you for choosing Luxibel®! Please read the manual thoroughly before bringing this device into service. If the device was damaged in transit, don't install or use it and contact your dealer.

## 2. Safety Instructions

|  |   |
|--|---|
|  | Be very careful during the installation: touching live wires can cause life-threatening electroshocks.  |
|  | Always disconnect mains power when device not in use or when servicing or maintenance activities are performed. Handle the power cord by the plug only.   |
|  | <b>Indoor use only.</b> Keep this device away from rain, moisture, splashing and dripping liquids. Never put objects filled with liquids on top of or close to the device.  |
|  | Keep this device away from children and unauthorized users.   |
|  | <b>Caution:</b> device heats up during use.   |
|  | <b>Do not stare directly at the light source</b> , as this may cause <ul style="list-style-type: none"> <li>• epileptic seizure in sensitive people</li> <li>• temporarily loss of sight (flash blindness)</li> <li>• permanent (irreversible) eye damage.</li> </ul> |
|  | There are no user-serviceable parts inside the device. Refer to an authorized dealer for service and/or spare parts.  |

- This device falls under protection class I. It is therefore essential that the device be earthed. Have a qualified person carry out the electric connection.
- Make sure that the available voltage does not exceed the voltage stated in the specifications of this manual.
- Do not crimp the power cord and protect it against damage. Have an authorised dealer replace it if necessary.
- Use an appropriate safety cable to fix the device (e.g. VDLSC7N or VDLSC8N).
- Install the device at a minimal distance of 0.5 m from flammable and explosive objects or substances.
- Respect a minimum distance of 0.5 m between the device's light output and any illuminated surface.
- The maximum ambient temperature is 40 °C. Do not operate the device at higher temperatures.

## 3. General Guidelines

Refer to the **Velleman® Service and Quality Warranty** on the last pages of this manual.

|  |   |
|--|---|
|  | Keep this device away from dust and extreme temperatures. Make sure the ventilation openings are clear at all times. For sufficient air circulation, leave at least 1" (± 2.5 cm) in front of the openings. |
|  | Protect this device from shocks and abuse. Avoid brute force when operating the device.   |

- Familiarise yourself with the functions of the device before actually using it. Do not allow operation by unqualified people. Any damage that may occur will most probably be due to unprofessional use of the device.
- All modifications of the device are forbidden for safety reasons. Damage caused by user modifications to the device is not covered by the warranty.

- Only use the device for its intended purpose. All other uses may lead to short circuits, burns, electroshocks, lamp explosion, crash, etc. Using the device in an unauthorised way will void the warranty.
- Damage caused by disregard of certain guidelines in this manual is not covered by the warranty and the dealer will not accept responsibility for any ensuing defects or problems.
- Mechanical wear and LEDs are not covered by warranty.
- A qualified technician should install and service this device.
- Do not switch the device on immediately after it has been exposed to changes in temperature. Protect the device against damage by leaving it switched off until it has reached room temperature.
- This device is designed for professional use on stage, in discos, theatres, etc. The device should only be used indoors with an alternating current of 240 VAC, 50 Hz.
- Lighting effects are not designed for permanent operation: regular operation breaks will prolong their lives.
- Use the original packaging if the device is to be transported.
- Keep this manual for future reference.

#### 4. Features

- PAR projector with high-power warm/cold white LEDs
- extremely slim design
- smooth dimming modes
- DMX controlled via 2, 3, or 7 channels
- built-in programs
- double bracket: can be used as a floor spot.

#### 5. Overview



|   |                 |   |                |   |                             |
|---|-----------------|---|----------------|---|-----------------------------|
| 1 | display         | 4 | fuse holder    | 7 | passageway for safety cable |
| 2 | control buttons | 5 | power output   | 8 | DMX output                  |
| 3 | power input     | 6 | double bracket | 9 | DMX input                   |

## 6. Installation

Choose a suitable mounting spot. Mount the device in the desired angle using the included bracket. Connect the power cord to the mains. Disconnect after use.

### Mounting the Device

- Have the device installed by a qualified person, respecting EN 60598-2-17 and all other applicable norms.
- The carrying construction must be able to support 10 times the weight of the device for 1 hour without deforming.
- The installation must always be secured with a secondary attachment e.g. a safety cable.
- Never stand directly below the device when it is being mounted, removed or serviced. Have a qualified technician check the device once a year and once before you bring it into service.
- Install the device in a location with few passers-by that is inaccessible to unauthorised persons.
- Overhead mounting requires extensive experience: calculating workload limits, determining the installation material to be used... Have the material and the device itself checked regularly. Do not attempt to install the device yourself if you lack these qualifications as improper installation may result in injuries.
- For truss mounting, use an appropriate clamp (not incl.) and fit an M10 bolt through the centre of the (folded) bracket.
- Adjust the desired inclination angle via the mounting bracket and tighten the bracket screws.
- Make sure there is no flammable material within a 0.5 m radius of the device.
- Have a qualified electrician carry out the electric connection.
- Connect the device to the mains with the power plug. All devices must be powered directly off a grounded switched circuit. Do not connect to a dimmer pack.
- The device has a power output **[5]** to supply power to another device. When connecting several devices in a daisy chain via this output, make sure that the total current does not exceed the power line's nominal current. Use power cables with an adequate section.
- The installation has to be approved by an expert before the device is taken into service.

### DMX-512 Connection

- When applicable, connect an XLR cable to the female XLR output of a controller (not incl.) and the other side to the male XLR input **[9]** of the device. Multiple devices can be linked through serial linking. The linking cable should be a dual core, screened cable with XLR input and output connectors.
- Maximum recommended serial data link distance is 500 meters (1640 ft). Maximum recommended number of devices on a serial data link is 32 devices.
- A DMX terminator is recommended for installations where the DMX cable has to run a long distance or is in an electrically noisy environment (e.g. discos). The terminator prevents corruption of the digital control signal by electrical noise. The DMX terminator is simply an XLR plug with a 120  $\Omega$  resistor between pins 2 and 3, which is then plugged into the XLR output socket **[8]** of the last device in the chain.

## 7. Operation

The device can be used in the following modes:

- stand-alone mode
- master/slave
- with a DMX512 controller.

### 7.1 Control Panel Navigation

Access the control panel functions using the four panel buttons **[2]** located directly underneath the display **[1]**. From left to right:

| Button | Function  |
|--------|---|
| MENU   | used to access the menu or to return to a previous menu option      |
| UP     | scrolls through the menu options in ascending order                 |
| DOWN   | scrolls through the menu options in descending order                |
| ENTER  | used to select and store the current menu or option within the menu |

## 7.2 Stand-Alone Mode

In stand-alone mode, the device runs one of the built-in programs. You can also select one of the built-in static white colours (various colour temperatures), or define your own custom white colour. You can use a strobe effect with the custom white colour.

**Note:** Make sure to unplug any connection from the DMX input of the device if you want to use it in stand-alone mode. A device in stand-alone mode may transmit DMX signals that could interfere with the DMX signals from the controller.

### Stand-Alone Mode with Built-in Static Colour

To use one of the built-in static colours:

1. Unplug any connection from the DMX input **[9]** of the device.
2. Press MENU until <C--> is displayed and press ENTER.
3. Use UP and DOWN to select a pre-set colour (C-01 to C-03).
4. Press ENTER to confirm.
5. Press MENU to quit.

### Stand-Alone Mode with Custom Static Colour

You can create a custom colour by adjusting the intensity of the cold white (C) and warm white (W) LEDs.

To use a custom static colour:

1. Unplug any connection from the DMX input **[9]** of the device.
2. Press MENU until <U--> is displayed and press ENTER.  
The last set value appears, for example <W215> = warm white LEDs intensity value = 215.
3. Use UP and DOWN to set the intensity (0–255) and press ENTER.  
The cold white LED value appears, for example <C000> = cold white LEDs intensity value = 000 (off).
4. Use UP and DOWN to set the intensity (0–255) and press ENTER.  
The strobe speed value appears.
5. Use UP and DOWN to set the strobe speed from slow to fast (0–20). Set to 0 to switch off the strobe.
6. Press ENTER to confirm.
7. Press MENU to quit.

### Stand-Alone Mode with Built-in Program

To set the device to stand-alone mode with a built-in program:

1. Unplug any connection from the DMX input **[9]** of the device.
2. Press MENU until <P--> is displayed and press ENTER.
3. Use UP and DOWN to select a built-in program (P--1 to P--5) and press ENTER to confirm.  
The current program speed appears.
4. Use UP and DOWN to set the speed from slow (0) to fast (100) and press ENTER to confirm.
5. Press MENU to quit.

### Dimmer Modes

You can choose a dimmer mode to control the colour transitions in the automatic programs. The dimmer mode has no effect on static colours.

To set the dimmer mode, proceed as follows:

1. Press MENU until <dIM> is displayed and press ENTER.
2. Use UP and DOWN to select the desired setting:
  - <OFF>: dimmer off, for abrupt colour transitions.  
**Note:** In master/slave mode, set the dimmer to <OFF> on the slave device if you want the slave device to use the same dimmer mode as the master device.
  - <DIM1>–<DIM3>: dimming modes 1 to 3, for smooth colour transitions.
3. Press ENTER to confirm.  
After changing the dimmer mode, you have to reactivate the automatic program, as follows:
4. Press MENU until <P--> is displayed and press ENTER.
5. Use UP and DOWN to select the desired program and press ENTER.
6. Press MENU to quit.

## 8. Master/Slave Mode

The master/slave mode allows connecting several devices to a single master device. All slave devices will then work synchronously with the master device.

You need to set one device to master mode and all other devices to slave mode.

1. Connect all devices in series with DMX cables.
2. The first unit in the chain functions as the master device. Set up the unit as described in **Stand-Alone Mode**.
3. On each slave device, press MENU until <AddR> is displayed and press ENTER.
4. Use UP and DOWN to set the DMX starting address to <d1> and press ENTER.
5. Repeat for each slave device.

## 9. DMX Mode

This mode allows you to control the device by any universal DMX controller.

- All DMX-controlled devices need a digital start address so that the correct device responds to the signals. This digital start address is the channel number from which the device starts to "listen" to the DMX controller. The same starting address can be used for a whole group of devices or an individual address can be set for every device.
- When all devices have the same address, all the units will "listen" to the control signal on one particular channel. In other words: changing the settings of one channel will affect all devices simultaneously. If you set individual addresses, each device will "listen" to a separate channel number. Changing the settings of one channel will only affect the device in question.
- In case of the 2-channel mode, you will have to set the start address of the first unit to 1 (CH1-2), the second to 3 (1 + 2) (CH3-4), the third to 5 (3 + 2) (CH5-6), and so on. The highest start address is 511.
- In case of the 3-channel mode, you will have to set the start address of the first unit to 1 (CH1-3), the second to 4 (1 + 3) (CH4-6), the third to 7 (4 + 3) (CH7-9), and so on. The highest start address is 510.
- In case of the 7-channel mode, you will have to set the start address of the first unit to 1 (CH1-7), the second to 8 (1 + 7) (CH8-14), the third to 15 (8 + 7) (CH15-21), and so on. The highest start address is 506.

To set the device to work with a DMX controller:

1. Press MENU until <PERS> is displayed and press ENTER.
2. Use UP and DOWN to select the 2, 3, or 7 channel DMX mode (2-CH, 3-CH, or 7-CH) and press ENTER.
3. Press MENU until <AddR> is displayed and press ENTER.
4. Use UP and DOWN to set the DMX starting address (d1-d512) and press ENTER.

### DMX Channel Values

2 channel mode:

| Channel | From | To  | Description        |
|---------|------|-----|--------------------|
| 1       | 0    | 255 | Warm white 0-100 % |
| 2       | 0    | 255 | Cold white 0-100 % |

3 channel mode:

| Channel | From | To  | Description        |
|---------|------|-----|--------------------|
| 1       | 0    | 255 | Master dimmer      |
| 2       | 0    | 255 | Warm white 0-100 % |
| 3       | 0    | 255 | Cold white 0-100 % |

7 channel mode:

| Channel | From | To  | Description         |
|---------|------|-----|---------------------|
| 1       | 0    | 255 | Master dimmer       |
| 2       | 0    | 255 | Warm white 0-100 %  |
| 2       | 0    | 255 | Cold white 0-100 %  |
| 4       | 0    | 9   | Off                 |
|         | 10   | 255 | Strobe slow to fast |

| Channel | From | To  | Description                                |
|---------|------|-----|--|
| 5       | 0    | 51  | Off  |
|         | 52   | 101 | Auto program 1                             |
|         | 102  | 152 | Auto program 2                             |
|         | 153  | 203 | Auto program 3                             |
|         | 204  | 254 | Auto program 4                             |
|         | 255  | 255 | Auto program 5                             |
| 6       | 0    | 255 | Speed slow to fast (if channel 5 = 52-255) |
| 7       | 0    | 51  | Default dimmer speed                       |
|         | 52   | 101 | Linear dimmer                              |
|         | 102  | 152 | Non-linear dimmer 1                        |
|         | 153  | 203 | Non-linear dimmer 2                        |
|         | 204  | 255 | Non-linear dimmer 3                        |

## 10. Cleaning and Maintenance

- All screws should be tightened and free of corrosion.
- The housing, the lenses, the mounting supports and the installation location (e.g. ceiling, suspension, trussing) should not be deformed, modified or tampered with; e.g. do not drill extra holes in mounting supports, do not change the location of the connections...
- Mechanically moving parts must not show any signs of wear and tear.
- The electric power supply cables must not show any damage. Have a qualified technician maintain the device.
- Disconnect the device from the mains prior to maintenance activities. Let the device cool down.
- Wipe the device regularly with a moist, lint-free cloth. Do not use alcohol or solvents.
- Do not immerse the device in any liquid.
- There are no user-serviceable parts, apart from the fuse.
- Contact your dealer for spare parts if necessary.

### Replacing the Fuse

Only replace the fuse by a fuse of the same type and rating.

1. Before replacing the fuse, unplug the mains lead.
2. Unscrew the fuse holder **[4]** with an appropriate screwdriver.
3. Remove the old fuse and install the new fuse in the fuse holder.
4. Place the fuse holder back in the housing and tighten it.

## 11. Technical Specifications

|                   |  |
|-------------------|--|
| power supply      | 240 VAC 50 Hz                            |
| power consumption | 200 W                                    |
| DMX connection    | 3-pin XLR                                |
| light source      | 18 x high-power 9 W warm/cold white LEDs |
| beam angle        | 25°                                      |
| dimensions        | 295 x 255 x 100 mm                       |
| weight            | 5 kg                                     |

**Use this device with original accessories only. Velleman nv cannot be held responsible in the event of damage or injury resulting from (incorrect) use of this device.**

**For more info concerning this product and the latest version of this manual, please visit our website [www.luxibel.com](http://www.luxibel.com).**

**The information in this manual is subject to change without prior notice.**

### © COPYRIGHT NOTICE

**The copyright to this manual is owned by Velleman nv. All worldwide rights reserved.** No part of this manual may be copied, reproduced, translated or reduced to any electronic medium or otherwise without the prior written consent of the copyright holder.

# Velleman® Service and Quality Warranty

Since its foundation in 1972, Velleman® acquired extensive experience in the electronics world and currently distributes its products in over 85 countries.

All our products fulfil strict quality requirements and legal stipulations in the EU. In order to ensure the quality, our products regularly go through an extra quality check, both by an internal quality department and by specialized external organisations. If, all precautionary measures notwithstanding, problems should occur, please make appeal to our warranty (see guarantee conditions).

## General Warranty Conditions Concerning Consumer Products (for EU):

- All consumer products are subject to a 24-month warranty on production flaws and defective material as from the original date of purchase.
- Velleman® can decide to replace an article with an equivalent article, or to refund the retail value totally or partially when the complaint is valid and a free repair or replacement of the article is impossible, or if the expenses are out of proportion.

You will be delivered a replacing article or a refund at the value of 100% of the purchase price in case of a flaw occurred in the first year after the date of purchase and delivery, or a replacing article at 50% of the purchase price or a refund at the value of 50% of the retail value in case of a flaw occurred in the second year after the date of purchase and delivery.

### • Not covered by warranty:

- all direct or indirect damage caused after delivery to the article (e.g. by oxidation, shocks, falls, dust, dirt, humidity...), and by the article, as well as its contents (e.g. data loss), compensation for loss of profits;
- consumable goods, parts or accessories that are subject to an aging process during normal use, such as batteries (rechargeable, non-rechargeable, built-in or replaceable), lamps, rubber parts, drive belts... (unlimited list);
- flaws resulting from fire, water damage, lightning, accident, natural disaster, etc....;
- flaws caused deliberately, negligently or resulting from improper handling, negligent maintenance, abusive use or use contrary to the manufacturer's instructions;
- damage caused by a commercial, professional or collective use of the article (the warranty validity will be reduced to six (6) months when the article is used professionally);
- damage resulting from an inappropriate packing and shipping of the article;
- all damage caused by modification, repair or alteration performed by a third party without written permission by Velleman®.
- Articles to be repaired must be delivered to your Velleman® dealer, solidly packed (preferably in the original packaging), and be completed with the original receipt of purchase and a clear flaw description.
- Hint: In order to save on cost and time, please reread the manual and check if the flaw is caused by obvious causes prior to presenting the article for repair. Note that returning a non-defective article can also involve handling costs.
- Repairs occurring after warranty expiration are subject to shipping costs.
- The above conditions are without prejudice to all commercial warranties.

**The above enumeration is subject to modification according to the article (see article's manual).**