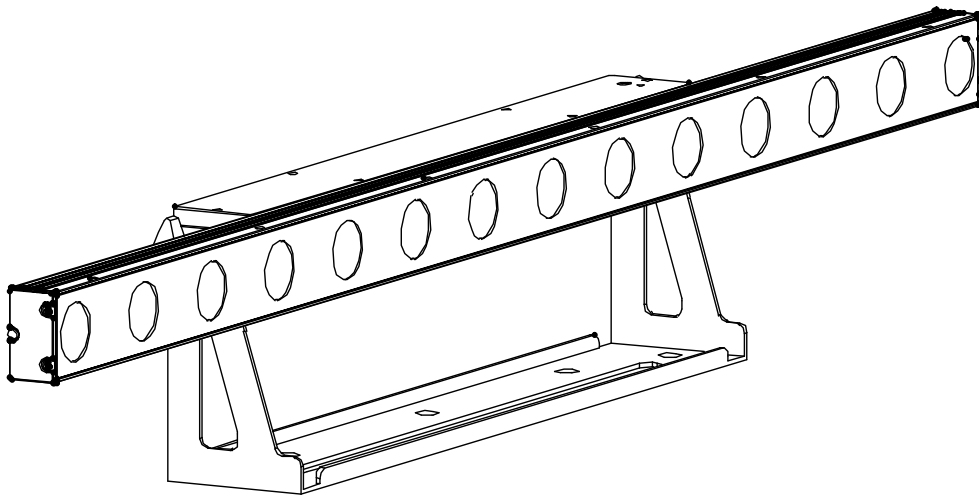


# SUNBAR COMBI

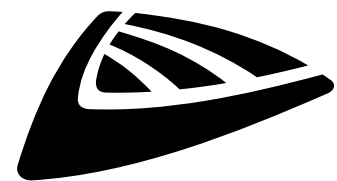


## ENGLISH Operation Manual

Other languages can be downloaded from:  
[WWW.JB-SYSTEMS.EU](http://WWW.JB-SYSTEMS.EU)



*Version: 1.0*



**JB SYSTEMS**



### **EN - DISPOSAL OF THE DEVICE**

Dispose of the unit and used batteries in an environment friendly manner according to your country regulations.

### **FR - DÉCLASSER L'APPAREIL**

Débarrassez-vous de l'appareil et des piles usagées de manière écologique conformément aux dispositions légales de votre pays.

### **NL - VERWIJDEREN VAN HET APPARAAT**

Verwijder het toestel en de gebruikte batterijen op een milieuvriendelijke manier conform de in uw land geldende voorschriften.

### **DU - ENTSORGUNG DES GERÄTS**

Entsorgen Sie das Gerät und die Batterien auf umweltfreundliche Art und Weise gemäß den Vorschriften Ihres Landes.

### **ES - DESHACERSE DEL APARATO**

Reciclar el aparato y pilas usadas de forma ecologica conforme a las disposiciones legales de su país.

### **PT - COMO DESFAZER-SE DA UNIDADE**

Tente reciclar a unidade e as pilhas usadas respeitando o ambiente e em conformidade com as normas vigentes no seu país.

# OPERATION MANUAL

Thank you for buying this JB SYSTEMS® product. To take full advantage of all possibilities and for your own safety, please read these operating instructions very carefully before you start using this unit.

## FEATURES

- This 2in1 bar combines narrow white beams and wide color beams in one single unit!
- 7x 3W warm white LEDs with individual pixel control + 7x 9W RGB Leds.
- The perfect tool for DJs and clubs but also for use one stage!
- Different control options:
  - Full DMX-control via 1, 4, 11, 12 or 17 channels.
  - Many different integrated automatic programs.
  - Sound activated mode with internal microphone.
  - Master/slave mode for bigger setups
- Prepared for wireless DMX: just plug-in an optional WTR-DMX DONGLE ! (Briteq® code: 4645)

## BEFORE USE

- Before you start using this unit, please check if there's no transportation damage. Should there be any, do not use the device and consult your dealer first.
- **Important:** This device left our factory in perfect condition and well packaged. It is absolutely necessary for the user to strictly follow the safety instructions and warnings in this user manual. Any damage caused by mishandling is not subject to warranty. The dealer will not accept responsibility for any resulting defects or problems caused by disregarding this user manual.
- Keep this booklet in a safe place for future consultation. If you sell the fixture, be sure to add this user manual.

### Check the contents:

Check if the packing contains the following items:

- Operating instructions
- SUNBAR COMBI
- Mains cable

## SAFETY INSTRUCTIONS:



**CAUTION**  
RISK OF ELECTRIC SHOCK  
DO NOT OPEN



**CAUTION:** To reduce the risk of electric shock, do not remove the top cover. No user-serviceable parts inside. Refer servicing to qualified service personnel only.



The lightning flash with arrowhead symbol within the equilateral triangle is intended to alert the user or the presence of un-insulated "dangerous voltage" within the product's enclosure that may be of sufficient magnitude to constitute a risk of electric shock.



The exclamation point within the equilateral triangle is intended to alert the user to the presence of important operation and maintenance (servicing) instructions in the literature accompanying this appliance.



This symbol means: indoor use only.



This symbol means: Read instructions.



This symbol determines: the minimum distance from lighted objects. The minimum distance between light-output and the illuminated surface must be more than 0.1 meter.



The device is not suitable for direct mounting on normally flammable surfaces. (suitable only for mounting on non-combustible surfaces)

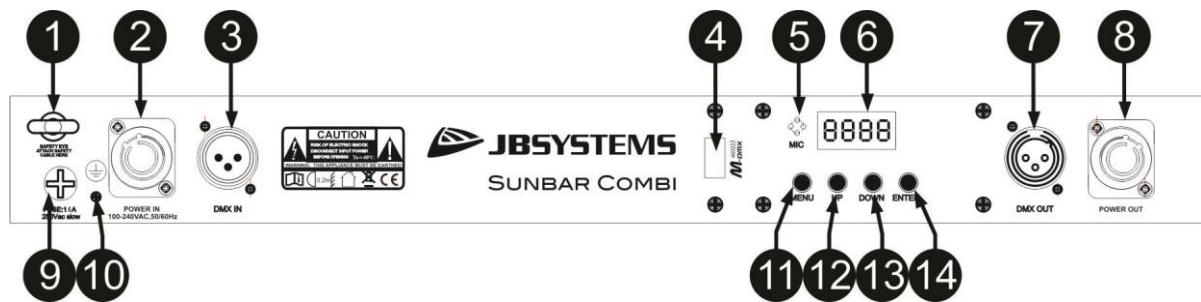
**RISK GROUP 2**  
**CAUTION:**  
**Do not stare at operating lamp**

**CAUTION:** Do not stare at operating lamp.  
May be harmful to the eyes.

- To protect the environment, please try to recycle the packing material as much as possible.
- To prevent fire or shock hazard, do not expose this appliance to rain or moisture.
- To avoid condensation to be formed inside, allow the unit to adapt to the surrounding temperatures when bringing it into a warm room after transport. Condense sometimes prevents the unit from working at full performance or may even cause damages.
- This unit is for indoor use only.
- Don't place metal objects or spill liquid inside the unit. Electric shock or malfunction may result. If a foreign object enters the unit, immediately disconnect the mains power.
- Locate the fixture in a well ventilated spot, away from any flammable materials and/or liquids. The fixture must be fixed at least 50cm from surrounding walls.
- Don't cover any ventilation openings as this may result in overheating.
- Prevent use in dusty environments and clean the unit regularly.
- Keep the unit away from children.
- Inexperienced persons should not operate this device.
- Maximum safe ambient temperature is 40°C. Don't use this unit at higher ambient temperatures.
- Make sure the area below the installation place is free from unwanted persons during rigging, de-rigging and servicing.
- Allow the device about 10 minutes to cool down before to start servicing.
- Always unplug the unit when it is not used for a longer time or before to start servicing.
- The electrical installation should be carried out by qualified persons only, according to the regulations for electrical and mechanical safety in your country.
- Check that the available voltage is not higher than the one stated on the unit.
- The power cord should always be in perfect condition. Switch the unit immediately off when the power cord is squashed or damaged. It must be replaced by the manufacturer, its service agent or similarly qualified persons in order to avoid a hazard.
- Never let the power-cord come into contact with other cables!
- This fixture must be earthed in order to comply with safety regulations.
- Don't connect the unit to any dimmer pack.
- Always use an appropriate and certified safety cable when installing the unit.
- In order to prevent electric shock, do not open the cover. There are no user serviceable parts inside.
- **Never** repair a fuse or bypass the fuse holder. **Always** replace a damaged fuse with a fuse of the same type and electrical specifications!
- In the event of serious operating problems, stop using the fixture and contact your dealer immediately.
- The housing and the lenses must be replaced if they are visibly damaged.
- Please use the original packing when the device is to be transported.
- Due to safety reasons it is prohibited to make unauthorized modifications to the unit.

**Important:** Never look directly into the light source! Don't use the effect in the presence of persons suffering from epilepsy.

## DESCRIPTION:



1. **SAFETY EYE:** used to attach a safety cable when the unit is rigged, see paragraph “overhead rigging”
2. **MAINS INPUT:** connect the included mains cable here. You can also use any power cord with a PowerCon connector.
3. **DMX INPUT:** 3pin male XLR-connector used to connect the projector with the DMX controller or with the previous unit in the DMX chain.
4. **M-DMX INPUT:** Please note that this USB-connector is NOT used for updates or to connect the unit to a PC! Instead this USB-connector makes it very easy to add wireless DMX to the unit! Just add the (optional) WTR-DMX DONGLE from BRITEQ® and you will get wireless DMX! Moreover you will be able to connect other DMX-controlled equipment to the DMX-output so you can share the wireless DMX function with all connected units! No extra settings to be made in the setup menu, just follow the procedure in the user manual supplied with the WTR-DMX DONGLE from BRITEQ®. The separate WTR-DMX DONGLE is available from [WWW.BRITEQ-LIGHTING.COM](http://WWW.BRITEQ-LIGHTING.COM) (order code: 4645)
5. **MICROPHONE:** is used to trigger the sound controlled functions and programs
6. **DISPLAY** shows the various menus and the selected functions.
7. **DMX OUTPUT:** 3pin female XLR-connector used to connect the projector with the next unit in the DMX chain.
8. **MAINS OUTPUT:** you can use this output to power the mains input of the next unit in the DMX chain (for easier linking up to 10A). You can also use a Combi Cable to link power and DMX signal with one cable
9. **FUSE HOLDER:** Important: Always replace the fuse by a model with exactly the same specifications !
10. **GROUND CONNECTOR:** if extra grounding is required, the connection can be done here
11. **MENU button:** used to browse the different functions in the menu
12. **UP button:** to increase the values shown on the display.
13. **DOWN button:** to lower the values shown on the display.
14. **ENTER button:** used to confirm your choice or to enter the setup mode of a function

## OVERHEAD RIGGING

- **Important:** The installation must be carried out by qualified service personal only. Improper installation can result in serious injuries and/or damage to property. Overhead rigging requires extensive experience! Working load limits should be respected, certified installation materials should be used, the installed device should be inspected regularly for safety.
- Make sure the area below the installation place is free from unwanted persons during rigging, de-rigging and servicing.
- The device should be installed out of reach of people and outside areas where persons may walk by or be seated.
- Before rigging make sure that the installation area can hold a minimum point load of 10times the device's weight.
- Always use a certified safety cable that can hold 12 times the weight of the device when installing the unit. This secondary safety attachment should be installed in a way that no part of the installation can drop more than 20cm if the main attachment fails.
- The device should be well fixed; a free-swinging mounting is dangerous and may not be considered!
- Don't cover any ventilation openings as this may result in overheating.
- The operator has to make sure that the safety-relating and machine-technical installations are approved by an expert before using them for the first time. The installations should be inspected every year by a skilled person to be sure that safety is still optimal.

## HOW TO SET UP AND CONTROL THE UNIT

*You can operate the unit in several ways:*

### **1) FIXED MANUAL STANDALONE MODE:**

- Press the [MENU] button until the display shows [MA<sup>n</sup>].
- Press the [ENTER] button to enter the setup. The display shows [MA<sup>n</sup>u].
- Press the [ENTER] button to enter the setup.
- Use the [UP] and [DOWN] buttons to set the intensity for the white beams from [000] = off, to [255] = Full on
- Press the [ENTER] button. [S\*\*\*] (S followed by numbers) appears on the display
- Use the [UP] and [DOWN] buttons to set the strobe speed:
  - [S000] = no strobe, to [S098] = Full speed strobe
  - [S099] = Full ON
  - [S100] = Sound controlled strobe
- Press the [ENTER] button to confirm.
- Use the [UP] and [DOWN] buttons to set the intensity for the RED color from [000] = off, to [255] = Full on
- Press the [ENTER] button to confirm.
- Use the [UP] and [DOWN] buttons to set the intensity for the GREEN color from [000] = off, to [255] = Full on
- Press the [ENTER] button to confirm.
- Use the [UP] and [DOWN] buttons to set the intensity for the BLUE color from [000] = off, to [255] = Full on
- Press the [ENTER] button to confirm.
- Use the [UP] and [DOWN] buttons to set the strobe speed for the RGB led's:
  - [S000] = no strobe, to [S098] = Full speed strobe
  - [S099] = Full ON
  - [S100] = Sound controlled strobe
- Press the [ENTER] button to confirm

### **2) FULL AUTOMATIC STANDALONE MODE:**

The effect automatically runs a preprogrammed sequence. Select this mode when only 1 unit is used (standalone) or when the unit is placed as the first (master) unit in a chain with several units in Master/Slave mode (see below).

**Automatic show mode:** this is how to select one of the preprogrammed shows

- Press the [MENU] button until the display shows [Aut].
- Press the [ENTER] button to enter the setup.
- Use the [UP] and [DOWN] buttons to choose the type of automatic show you would like to use:
  - [CoL] = RGB Shows: select fixed colors, color fade or color chases
  - [bEA] = White Beam shows: select one of the beam patterns or full on
  - [Mi H] = Mixed shows: select one of the combined color + white beam shows
- Press [ENTER] to enter the setting options for this mode
- Use the [UP] and [DOWN] buttons to select one of the automatic shows
- Press the [ENTER] button to confirm.
- Use the [UP] and [DOWN] buttons to select the speed of the program (S.01 to S.99)
- Press the [ENTER] button to confirm.

### **3) SOUND CONTROLLED STANDALONE MODE:**

The Sunbar runs a preprogrammed sequence to the rhythm of the music. Select this mode when only 1 unit is used (standalone) or when the Sunbar is placed as the first (master) unit in a chain with several units.

- Press the [MENU] button until the display shows [Sou].
- Press the [ENTER] button to enter the setup.
- Use the [UP] and [DOWN] buttons to choose the type of automatic show you would like to use:
  - [CoL] = RGB Shows: select fixed colors, color fade or color chases
  - [bEA] = White Beam shows: select one of the beam patterns or full on
  - [Mi H] = Mixed shows: select one of the combined color + white beam shows

- Press [ENTER] to enter the setting options for this mode
- Use the [UP] and [DOWN] buttons to select one of the automatic shows
- Press the [ENTER] button to confirm.
- Use the [UP] and [DOWN] buttons to set the sensitivity of the microphone (u.01 to u.99)
- Press the [ENTER] button to confirm.

**4) MASTER/SLAVE STANDALONE MODE:**

When you have several SUNBAR COMBI units and you want them to all work synchronously, you can work in the so called master/slave mode. To do this, just daisy-chain all the units (see drawing below)

- Select the desired settings for the manual, automatic or sound controlled program in this MASTER unit. (this is the first unit in the chain, that has no controller connected to it)
- Now put all the other units in slave mode. Once this is done, the “slave” units will follow the orders of the Master unit, so they work in perfect synchronicity.

**To set a unit in slave mode:**

- Press the [MENU] button until the display shows [SLA].
- Press the [ENTER] button to enter this mode.
- [SLAV] will appear on the display
- Press the [ENTER] button to confirm the slave mode.



**5) CONTROLLED VIA DMX:**

The unit can be controlled by any standard DMX-controller in 5 different DMX-modes: 1, 4, 11, 12 and 17 channels

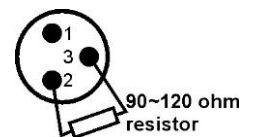
- Connect the DMX input of the Sunbar to the DMX output of the previous unit in the chain or directly to the DMX-output of your controller.
- Press the [MENU] button until the display shows: [dMH].
- Press the [ENTER] button to enter this option
- The actual DMX address is shown on the display.
- Press the [ENTER] button again
- The channel mode is shown on the display
- Use the [UP/DOWN] buttons to select the desired DMX-mode. (1Ch, 4Ch, 11Ch, 12Ch or 17Ch). See the DMX charts below
- Press the [ENTER] button to confirm your choice.
- Now you can use the [UP/DOWN] buttons to set the DMX address. [dxxx]
- Press the [ENTER] button to confirm your choice.



**Some more information on DMX512:**

The DMX-protocol is a widely used high speed signal to control intelligent light equipment. You need to “daisy chain” your DMX controller and all the connected light effects with a good quality XLR M/F balanced cable. To prevent strange behavior of the light effects, due to interferences, you must use a 90Ω to 120Ω terminator at the end of the chain. Never use Y-splitter cables, this simply won't work!

Each effect in the chain needs to have its proper starting address so it knows which commands from the controller it has to decode.



**DMX Chart for the 1 channel DMX-Mode**

Channel	Value	Function
<b>CH 1</b>	000-009	Black-Out
	010-072	Color Fade (slow to fast)
	073-132	Beam Show (slow to fast)
	133-195	Mix Show 3 (slow to fast)
	196-215	Sound Color Show
	216-235	Sound Beam Show
	236-255	Sound Mix Show

**DMX Chart for the 4 channel DMX-Mode**

Channel	Value	Function	
<b>CH 1</b>	000-009	Black-Out	COLOR Selection
	010-031	Red	
	032-054	Green	
	055-077	Yellow	
	078-100	Blue	
	101-123	Pink	
	124-146	Cyan	
	147-169	White	
	170-192	Pattern 1	
	193-215	Pattern 2	
	216-238	Pattern 3	
	239-255	Pattern 4	
<b>CH 2</b>	000-243	Speed (slow to fast)	Color Pattern Speed
	244-255	Music controlled	
<b>CH 3</b>	000-009	Black-Out	WHITE Pattern Selection
	010-022	Pattern 1	
	023-035	Pattern 2	
	036-048	Pattern 3	
	049-061	Pattern 4	
	062-074	Pattern 5	
	075-087	Pattern 6	
	088-100	Pattern 7	
	101-113	Pattern 8	
	114-126	Pattern 9	
	127-139	Pattern 10	
	140-152	Pattern 11	
	153-165	Pattern 12	
	166-178	Pattern 13	
	179-191	Pattern 14	
	192-204	Pattern 15	
	205-217	Pattern 16	
218-230	Pattern 17		
231-255	Random Pattern		
<b>CH 4</b>	000-243	Speed (slow to fast)	Beam Pattern Speed
	244-255	Music controlled	



**DMX Chart for the 11 channel DMX-Mode**

Channel	Value	Function	
<b>CH 1</b>	000-255	Red	Manual Color Control
<b>CH 2</b>	000-255	Green	
<b>CH 3</b>	000-255	Blue	
<b>CH 4</b>	000-255	Dimmer	
<b>CH 5</b>	000-009	NO strobe	
	010-083	Strobe	
	084-163	Random Strobe	
	164-243	On-Off effect	
	244-255	Sound Controlled	
<b>CH 6</b>	000-255	Beam Dimmer	Beam Control
<b>CH 7</b>	000-009	NO strobe	
	010-083	Strobe	
	084-163	Random Strobe	
	164-243	On-Off effect	
	244-255	Sound Controlled	
<b>CH 8</b>	000-009	Manual Control (CH1-CH5)	COLOR Pattern Selection
	010-031	Red	
	032-054	Green	
	055-077	Yellow	
	078-100	Blue	
	101-123	Pink	
	124-146	Cyan	
	147-169	White	
	170-192	Pattern 1	
	193-215	Pattern 2	
	216-238	Pattern 3	
239-255	Pattern 4		
<b>CH 9</b>	000-243	Speed (slow to fast)	Color Pattern Speed
	244-255	Music controlled	
<b>CH 10</b>	000-009	Black-Out	WHITE Pattern Selection
	010-022	Pattern 1	
	023-035	Pattern 2	
	036-048	Pattern 3	
	049-061	Pattern 4	
	062-074	Pattern 5	
	075-087	Pattern 6	
	088-100	Pattern 7	
	101-113	Pattern 8	
	114-126	Pattern 9	
	127-139	Pattern 10	
	140-152	Pattern 11	
	153-165	Pattern 12	
	166-178	Pattern 13	
	179-191	Pattern 14	
	192-204	Pattern 15	
	205-217	Pattern 16	
218-230	Pattern 17		
231-255	Random Pattern		
<b>CH 11</b>	000-243	Speed (slow to fast)	Beam Pattern Speed
	244-255	Music controlled	

**DMX Chart for the 12 channel DMX-Mode**

Channel	Value	Function	
CH 1	000-255	Red	RGB
CH 2	000-255	Green	
CH 3	000-255	Blue	
CH 4	000-255	Dimmer	
CH 5	000-009	NO strobe	
	010-083	Strobe	
	084-163	Random Strobe	
	164-243	On-Off effect	
	244-255	Sound Controlled	
CH 6	000-255	Dimmer LED 1	WHITE Beams
CH 7	000-255	Dimmer LED 2	
CH 8	000-255	Dimmer LED 3	
CH 9	000-255	Dimmer LED 4	
CH 10	000-255	Dimmer LED 5	
CH 11	000-255	Dimmer LED 6	
CH 12	000-255	Dimmer LED 7	

**DMX Chart for the 17 channel DMX-Mode**

Channel	Value	Function	
CH 1	000-255	Red	Manual Color Control
CH 2	000-255	Green	
CH 3	000-255	Blue	
CH 4	000-255	Dimmer	
CH 5	000-009	NO strobe	
	010-083	Strobe	
	084-163	Random Strobe	
	164-243	On-Off effect	
	244-255	Sound Controlled	
CH 6	000-255	Dimmer LED 1	Beam Control
CH 7	000-255	Dimmer LED 2	
CH 8	000-255	Dimmer LED 3	
CH 9	000-255	Dimmer LED 4	
CH 10	000-255	Dimmer LED 5	
CH 11	000-255	Dimmer LED 6	
CH 12	000-255	Dimmer LED 7	
CH 13	000-009	NO strobe	COLOR Pattern Selection
	010-083	Strobe	
	084-163	Random Strobe	
	164-243	On-Off effect	
	244-255	Sound Controlled	
CH 14	000-009	Manual Control (CH1-CH5)	
	010-031	Red	
	032-054	Green	
	055-077	Yellow	
	078-100	Blue	
	101-123	Pink	
	124-146	Cyan	
147-169	White		
	170-192	Pattern 1	

	193-215	Pattern 2	
	216-238	Pattern 3	
	239-255	Pattern 4	
CH 15	000-243	Speed (slow to fast)	Color Pattern Speed
	244-255	Music controlled	
CH 16	000-009	Black-Out	WHITE Beam Pattern Selection
	010-022	Pattern 1	
	023-035	Pattern 2	
	036-048	Pattern 3	
	049-061	Pattern 4	
	062-074	Pattern 5	
	075-087	Pattern 6	
	088-100	Pattern 7	
	101-113	Pattern 8	
	114-126	Pattern 9	
	127-139	Pattern 10	
	140-152	Pattern 11	
	153-165	Pattern 12	
	166-178	Pattern 13	
	179-191	Pattern 14	
192-204	Pattern 15		
205-217	Pattern 16		
218-230	Pattern 17		
231-255	Random Pattern		
CH 17	000-243	Speed (slow to fast)	Beam Pattern Speed
	244-255	Music controlled	

**Extra functions in the menu**

- Press the [MENU] button until the display shows [SYS].
- Press the [ENTER] button if you want to enter this part of the menu with extra options.
- Use the [UP/DOWN] buttons to browse the extra functions in this System menu
  - **[rSEt] = Factory Reset.** This function can be used to reset all the settings of the unit to the original factory settings
    - Just press the [ENTER] button to reset the unit.
  - **[binU] = Beam inversion**  
 With this option you can invert the flow of the beam effects.
    - Press the [ENTER] button to enter the option settings
    - Use the [UP / DOWN] button to select the desired mode:
      - [on] = inverted flow
      - [oFF] = normal flow.

**MAINTENANCE**

- Make sure the area below the installation place is free from unwanted persons during servicing.
- Switch off the unit, unplug the mains cable and wait until the unit has been cooled down.

**During inspection the following points should be checked:**

- All screws used for installing the device and any of its parts should be tightly fastened and may not be corroded.
- Housings, fixations and installations spots (ceiling, truss, suspensions) should be totally free from any deformation.
- When an optical lens is visibly damaged due to cracks or deep scratches, it must be replaced.
- The mains cables must be in impeccable condition and should be replaced immediately when even a small problem is detected.
- In order to protect the device from overheat the cooling fans (if any) and ventilation openings should be cleaned monthly.

- The interior of the device should be cleaned annually using a vacuum cleaner or air-jet.
- The cleaning of internal and external optical lenses and/or mirrors must be carried out periodically to optimize light output. Cleaning frequency depends on the environment in which the fixture operates: damp, smoky or particularly dirty surroundings can cause greater accumulation of dirt on the unit's optics.
  - Clean with a soft cloth using normal glass cleaning products.
  - Always dry the parts carefully.

**Attention: We strongly recommend internal cleaning to be carried out by qualified personnel!**

## **SPECIFICATIONS**

This unit is radio-interference suppressed. This product meets the requirements of the current European and national guidelines. Conformity has been established and the relevant statements and documents have been deposited by the manufacturer.

This device was designed to produce decorative effect lighting and is used in light show systems.

<b>Mains Input:</b>	100-230Vac, 50/60Hz
<b>Power consumption:</b>	180 Watt Max.
<b>Fuse:</b>	250V 1.6A slow blow (20mm glass)
<b>Sound Control:</b>	Internal microphone
<b>DMX connections:</b>	XLR 3pin
<b>DMX modes:</b>	1-4-11-12-17 channels
<b>White LEDs:</b>	7x 3W Warm White, Beam angle = 5°
<b>RGB LEDs:</b>	7x 9W RGB, Beam angle = 60°
<b>Dimensions:</b>	1000 x 140 x 84mm
<b>Weight:</b>	3,9 kg

**All the information is subject to change without prior notice**

You can download the latest version of this user manual on our website: [www.jb-systems.eu](http://www.jb-systems.eu)