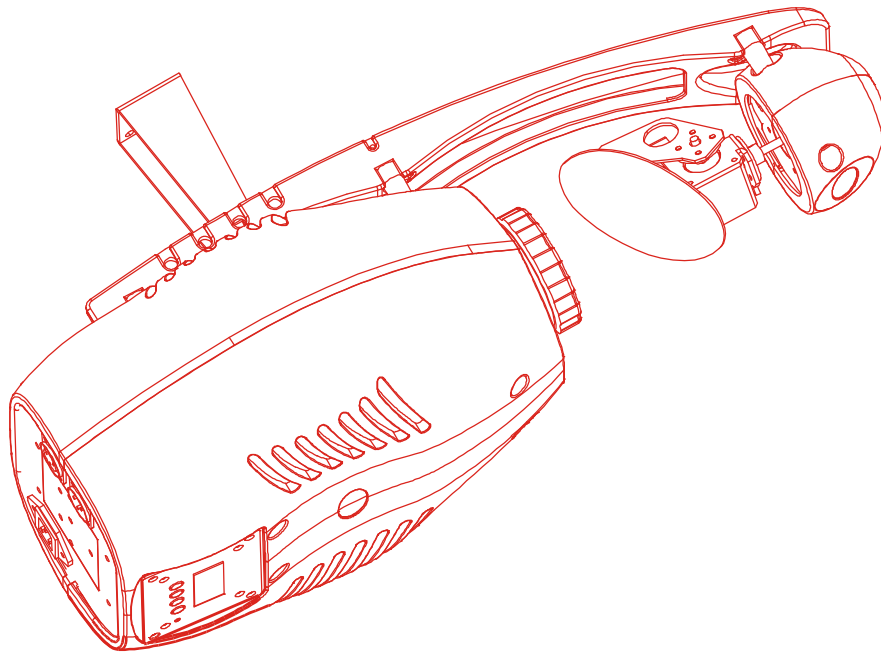




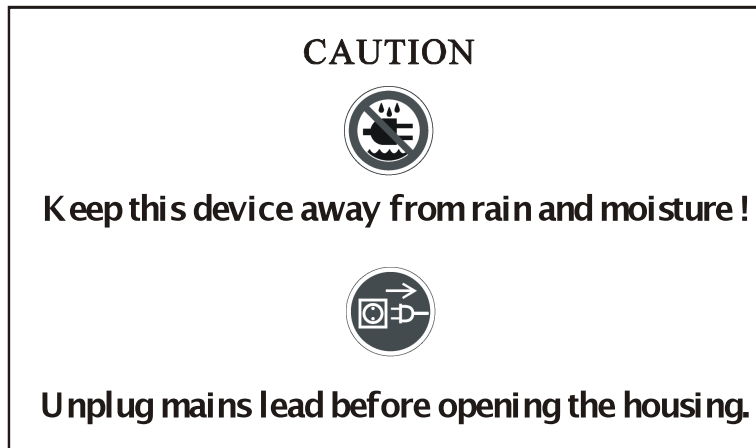
***PROFESSIONAL SCANNER USER'S MANUAL***

**VIVA 250S**



**KEEP THIS MANUAL FOR FUTURE NEEDS** 

**For your own safety, please read this user manual carefully before installing the device.**



**Every person involved with the installation, operation and maintenance of this device has to:**

- be qualified**
- follow carefully the instructions of this manual**

## **INTRODUCTION:**

**Thank you for having chosen this professional moving head.  
You will see you have acquired a powerful and versatile device.**

**Unpack the device. Inside the box you should find: the fixture device, a power cable, an XLR connection cable, a safety cable and this manual. Please check carefully that there is no damage caused by transportation. Should there be any, consult your dealer and don't install this device.**

## **Features**

- Philips MSD250/2,8500K base: GY 9.5**
- 8 standard DMX-512 channels.**
- Operation mode: DMX controller, stand alone, sound activated, master slave.**
- Pan: 156° movement, Tilt: 45° movement.**
- Colours: 9 colours plus white, with rainbow effect.**
- Gobos: 7 rotating gobos plus open, with different speed gobo shaking.**
- Strobe: 0~10 flashes per second, or random strobe.**
- Display: 4-digit display.**
- Editable program: Program via control panel or external DMX controller. Up to 48 scenes can be saved into units EEPROM, then can be run by stand alone function.**

## **SAFETY INSTRUCTIONS**



### **CAUTION**

Be very careful during installation. Since you will be working with a dangerous voltage you can suffer a life-threatening electric shock when touching live v

**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**

**Damages caused by the disregard of this user manual are not subject to warranty. The dealer will not accept liability for any resulting defects or problems.**

**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.**

**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 may arise. This is a normal process and does not necessarily mean that the device is defective, it should decrease gradually.**



Please be aware that damages caused by manual modifications to the device are not subject to warranty. Keep away from children and non-professionals.

## **GENERAL GUIDELINES**

This device is a lighting effect for professional use on stages, in discotheques, theatres, etc.

This fixture is only allowed to be operated with the max alternating current which is stated in the technical specifications in the last page of this manual, the device was designed for indoor use only.

Lighting effects are not designed for permanent operation. Consistent operation breaks may ensure that the device will serve you for a long time without defects. Do not shake the device.

Avoid brute force when installing or operating the device.

While choosing the installation-spot, please make sure that the device is not exposed to extreme heat, moisture or dust. The minimum distance between light-output from the projector and the illuminated surface must be more than 0,5 meter.

Operate the device only after having familiarized with its functions. Do not permit operation by persons not qualified for operating the device. Most damages are the result of unprofessional operation.

Please use the original packaging if the device is to be transported.  
For safety reasons, please be aware that all modifications on the device are forbidden.

If this device will be operated in any way different to the one described in this manual, the product may suffer damages and the guarantee becomes void. Furthermore, any other operation may lead to short-circuit, burns, electric shock, lamp explosion, crash, etc.

## INSTALLATION INSTRUCTIONS

### a) *Installing or replacing the lamp*



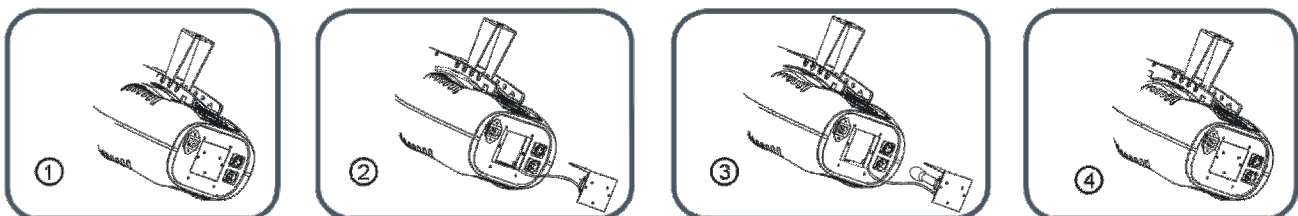
Before replacing the lamp let the lamp cool down, because during operation, the lamp can reach very high temperature.

During the installation of halogen lamps do not touch the glass bulbs bare handed. Always use a cloth to handle the lamps during insertion and removal.

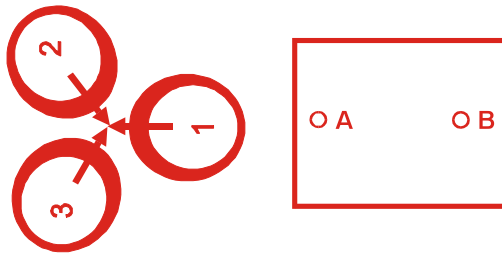
Do not install lamps with a higher wattage. They generate higher temperatures than which the device was designed for.

For the installation, you need one: MSD250/2 GY9.5 lamp;

Procedure:



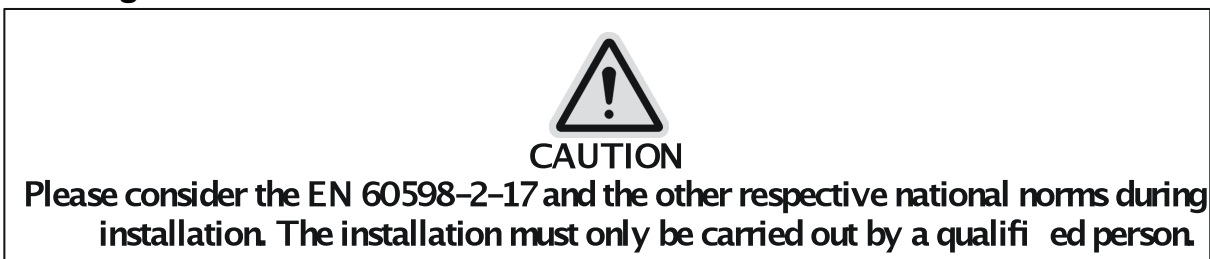
- 1) Unscrew the 2 screws on the back of the housing, holding the plate where the lamp is underneath.
- 2) Gently pull the socket holder using the knob in the middle.
- 3) Carefully insert the lamp into the socket. Please remember there is only one way to insert the lamp. Gently slide the lamp and its lamp holder back into place and fasten the 2 screws.
- 4) On the access plate there are 3 small screws marked 1, 2 and 3 which are used to adjust the lamp holder in the lamp housing. You can adjust the 3 screws to fine-tune the position of the lamp to get the maximum light output as shown below.



Please remember the lamp is not a hot-restrike type, you must wait for approximately 10 minutes after having turned off the lamp before you can turn it back on again.



**b) Mounting the device**



The installation of the effect has to be built and constructed in a way that it can hold 10 times the weight for 1 hour without any harming deformation.

The installation must always be secured with a secondary safety attachment, e.g. an appropriate safety cable.

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

The operator has to make sure the safety relating and machine technical installations are approved by an expert before taking the device into operation for the first time. These installations have to be approved by a skilled person once a year.



**Cautions:**

The effect should be installed outside areas where persons may reach it, walk by or be seated.



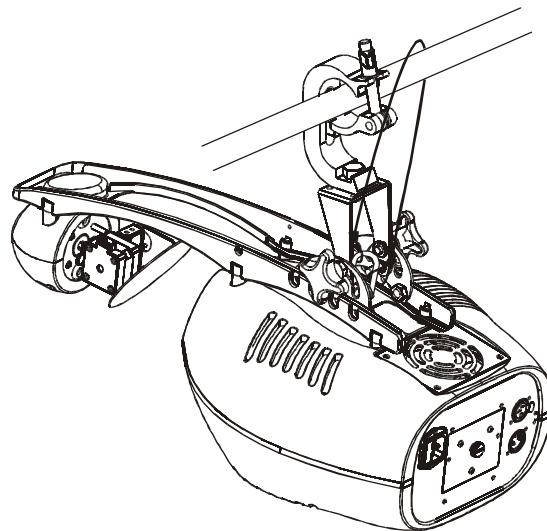
Overhead mounting requires extensive experience, including amongst others calculating working load limits, installation material being used, and periodic safety inspection of all installation material and the device. If you lack these qualifications, do not attempt the installation yourself. Improper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



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

Connect the fixture to the mains with the power plug.

Installation via the Omega holders

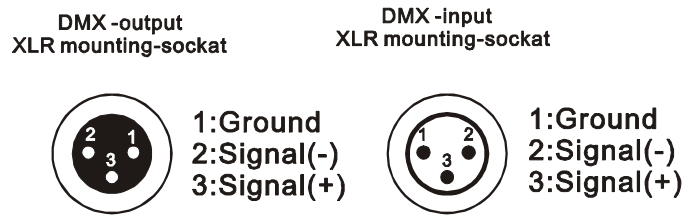


Screw one clamp each via a M10 screw and nut directly into the bracket of the scanner. Pull the safety-chain through the bracket of the base and over the trussing system or a safe fixation spot.

### DMX-512 control connection

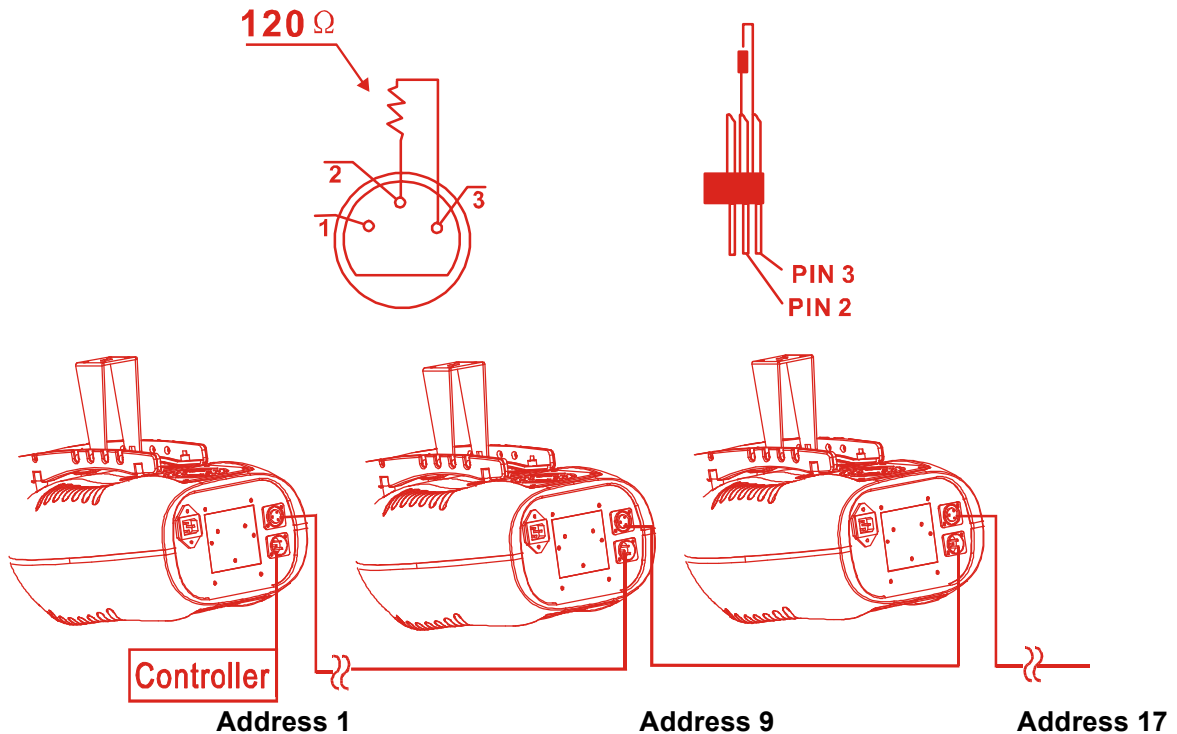
Connect the provided XLR cable to the female 3-pin XLR output of your controller and the other side to the male 3-pin XLR input of the moving head. You can chain multiple

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.



### DMX-512 connection with DMX terminator

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 Ω 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.



### Projector DMX start address selection

All fixtures should be given a DMX starting address when using a DMX signal, so that the correct fixture responds to the correct control signals. This digital starting address is the channel number from which the fixture starts to “listen” to the digital control information sent out from the DMX controller. The allocation of this starting address is achieved by setting the correct number on the display located on the base of the device.

You can set the same starting address for all fixtures or a group of fixtures, or make



different address for each fixture individually.

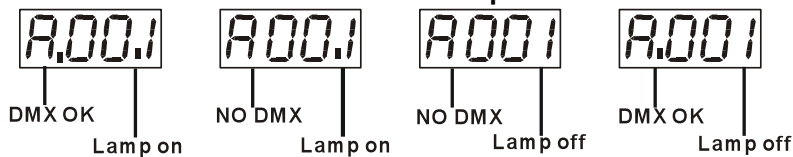
If you set the same address, all the units will start to “listen” to the same control signal from the same channel number. In other words, changing the settings of one channel will affect all the fixtures simultaneously.

If you set a different address, each unit will start to “listen” to the channel number you have set, based on the quantity of control channels of the unit. That means changing the settings of one channel will affect only the selected fixture.

In the case of the scanner, which is 8 channel fixture, you should set the starting address of the first unit to 1, the second unit to 9 (8 + 1), the third to 17 (9 + 8), and so on.

#### Note:

The modes of DMX 512 data and lamp are shown via the display:



1. After switching on, the device will automatically detect whether DMX 512 data is received or not. If the data is received, the display will show "A.X01" with the actually set address. If there is no data received at the DMX-input, the display will flash "A001" with the actually set address.

This situation can occur if:

- The 3 PIN XLR plug (cable with DMX signal from controller) is not connected with the input of the device.
- The controller is switched off or defective, if the cable or connector is defective or the signal wires are swap in the input connector.

It's necessary to insert the XLR termination plug (with 120 Ohm) in the last lighting in the link in order to ensure proper transmission on the DMX data link.

2. If the lamp is on, the display will show "A00.1" with the actually set address. If the lamp is off, the display will show "A001" with the actually set address.

## Control Board

The Control Board offers several features: you can simply set the starting address, switch on and off the lamp, run the pre-programmed program or make a reset.

The main menu is accessed by pressing the Mode/esc-button until the display starts flashing. Browse through the menu by pressing the Up-button or Down-button. Press the Enter-button in order to select the desired menu. You can change the selection by pressing the Up-button or Down-button. Confirm every selection by pressing the Enter-button. You can leave every mode by pressing the Mode/esc-button. The functions provided are described in the following sections.

**Default settings shaded.**

	Main menu	Sub. menu	Extension	Display	Function
0	MODE	ADDR	VALU	A001~AXXX (AXXX)	DMX address setting
			SLAV	ON/OFF (SLAV)	Slave setting
		RUN	AUTO	ALON (AU-A)	Automatic Run in Stand Alone
				MAST (AU-M)	Automatic Run as Master
			SOUN	ALON (SO-A)	Sound-controlled Run in Stand Alone
				MAST (SO-M)	Sound-controlled Run as Master
		DISP	VALU	D-XX D-00 (DXXX)	Display the DMX 512 value of each channel
			RDIS	ON/OFF	Reverse display
			CLDI	ON/OFF	Shut off LED display
1	SET	RPAN	ON/OFF	Pan Reverse	
		RTIL	ON/OFF	Tilt Reverse	
		MIC	M-XX	Mic sensitivity	
		AUTO	ON/OFF	Automatic Run by no DMX	
		SOUN	ON/OFF	Sound Run by no DMX	
		REST		Reset	
		LODA	ON/OFF	Restore factory settings	
		VER	V-1.0~V-9.9	Software version	
2	ADJU	LADJ	ON/OFF	Lamp adjustment	
		TEST	T-01~T-30	Test function of each channel	
		WHEL	CODE	CXXX	Fixture code *code is "C050"
			CH01~CH30	XXXX(-128~127)	Motor Calibration
3	TIME	MATI	0000~9999(hours)	Fixture running time	
		LATI	0000~9999(hours)	Lamp running time	
		CLMT	ON/OFF	Clear fixture time	
		CLLT	ON/OFF	Clear lamp time	
4	EDIT	STEP	S-01 ~S-48	Steps of Program Run	
		REC.	RE.XX	Auto Save Scene	
		SC01 ~SC48	C-01~C-30	01 XX(00~FFH) 30 XX(00~FFH)	Edit the channels of each scene
			TIME	TXXX(001~999)	Time for each scene
			CNIN	ON/OFF	Edit program via controller

## Main functions

MODE - SET - ADJUST - EDIT

MODE - Main menu 0

MODE - ADDR  
RUN  
DISP

1. Press [MODE/ESC] to enter the main menu "MODE" (display flashing)
2. Press [ENTER] and select "ADDR", "RUN" or "DISP" by pressing [UP] or [DOWN] button.
3. Press [ENTER] for selecting the desired sub menu.

ADDR - DMX address setting, Slave setting

MODE - ADDR - VALU - ADDR-111111  
SLAV - ON/OFF

VALU - DMX address setting

With this function, you can adjust the desired DMX-address via the Control Board.

1. Select "VALU" by pressing [UP] or [DOWN] button.
2. Press [ENTER], adjust the DMX address by pressing [UP] or [DOWN] button.
3. Press [ENTER] to confirm or pressing [MODE/ESC] to return to main menu.

SLAV - Slave setting

With this function, you can define the device as slave.

1. Select "SLAV" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or press [DOWN] to select "OFF" if you don't.
4. Press [ENTER] to confirm or press [MODE/ESC] to return to main menu.

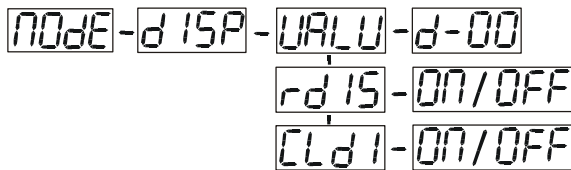
RUN - Program Run, Master setting

With the function "RUN", you can run the internal program. You can set the number of steps under Step. You can edit the individual scenes under Edit. You can run the individual scenes either automatically (AUTO), i.e. with the adjusted Step-Time or sound-controlled (SOUN). The selection "ALON" means Stand Alone-mode and "MAST" that the device is defined as master.

MODE - RUN - AUTO - ALON  
| MAST  
SOUN - ALON  
| MAST

1. Select "AUTO" or "SOUN" by pressing [UP] or [DOWN] button.
2. Press [ENTER] for selecting the desired extension menu.
3. Select "ALON" or "MAST" by pressing [UP] or [DOWN] button.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

**d 15P** - Display the DMX-value, Reverse display, Shut off LED display



**VALU** - Display the DMX 512 value of each channel  
 With this function you can display the DMX 512 value of each channel.

1. Select "VALU" by pressing [UP] or [DOWN] button.
2. Press [ENTER] to confirm; the display shows "D-00". In this setting, the DMX-adjustment of every channel will be displayed.
3. Press [UP] or [DOWN] button in order to select the desired channel. If you select "D-14" the display will only show the DMX-value of the 14<sup>th</sup> channel.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.
5. The display shows "D- XX", "X" stands for the DMX-value of the selected channel.

**rd 15** - Reverse display

With this function you can rotate the display by 180°.

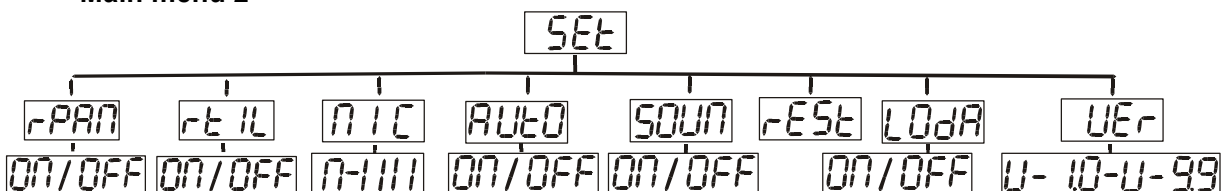
1. Select "RDIS" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or press [DOWN] button to "OFF" if you don't; the display will rotate by 180°.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

**CLd1** - Shut off LED display

With this function you can shut off the LED display after 2 minutes.

1. Select "CLDI" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or press [DOWN] button to "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

**SEt** - Main menu 2



1. Press [MODE/ESC] to enter the main menu (display flashing).
2. Press [UP] or [DOWN] button. To select "SET".

**rPAN** - Pan Reverse

With this function you can reverse the Pan-movement.

1. Select "RPAN" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or press [DOWN] button to "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

#### **RTIL** - Tilt Reverse

With this function you can reverse the Tilt-movement.

1. Select "RTIL" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or press [DOWN] button to "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

#### **MIC** - Mic sensitivity

With this function you can adjust the sensitivity of the microphone.

1. Select "MIC" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "M-XX", "XX" stands for the number from 0 to 99.
3. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

#### **AUTO** - Automatic Run by no DMX

With this function you can automatic run the device by no DMX.

1. Select "AUTO" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

#### **SOUN** - Sound Run by no DMX

With this function you can sound run the device by no DMX.

1. Select "SOUN" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

#### **REST** - Reset

With this function you can reset the device via the Control Board.

1. Select "REST" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

#### **LOdA** - Restore factory settings

With this function you can restore the factory settings of the device. All settings will be set back to the default values (shaded). Any edited scenes will be lost.

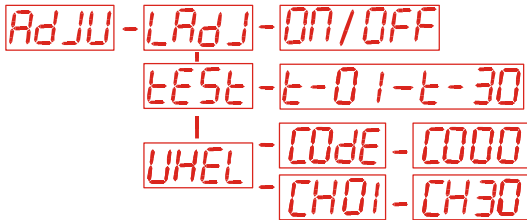
1. Select "LOdA" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or press [DOWN] button to "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

**VER** - Software version

With this function you can display the software version of the device.

1. Select "VER" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "V-X.X", "X.X" stands for the version number, e.g. "V-1.0", "V-2.6".
3. Press [MODE/ESC] to return to the main menu.

**ADJU** - Main menu 3



1. Press [MODE/ESC] to enter the main menu (display flashing).
2. Press [UP] or [DOWN] button to select "ADJU".

**LADJ** - Lamp adjustment

With this function you can adjust the lamp via the Control Board. The shutter opens and the lamp can be adjusted. In this mode, the device will not react to any control signal.

1. Select "LADJ" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or press [DOWN] button to "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

**TEST** - Test function of each channel

With this function you can test channel on its (correct) function.

1. Select "TEST" by pressing [UP] button.
2. Press [ENTER], the display shows "T-XX", "X" stands for the channel number.
3. The current channel will be tested.
4. Select the desired channel by pressing [UP] or [DOWN] button.
5. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

**WHEL** - Fixture code and motor fix

1. Select "WHEL" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "CODE" or "CH01-CH30".
4. Select "CODE" or "CH01-CH30" by pressing [UP] or [DOWN] button.
5. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

**TINE** - Main menu 4

TIME - MAT 1 - 0000-9999  
           |  
           LRT 1 - 0000-9999  
           |  
           CLMT - ON/OFF  
           |  
           CLLT - ON/OFF

1. Press [MODE/ESC] to enter the main menu (display flashing).
2. Press [UP] or [DOWN] button to select "TIME".

**MAT 1** - Fixture running time

With this function you can display the running time of the device.

1. Select "MATI" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "XXXX", "X" stands for the number of hours.
3. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

**LRT 1** - Lamp running time

With this function you can display the running time of the lamp.

1. Select "LATI" by pressing [UP] button.
2. Press [ENTER], the display shows "XXXX", "X" stands for the number of hours.
3. Press [MODE/ESC] to return to the main menu.

**CLMT** - Clear fixture time

With this function you can clear the running time of the device.

1. Select "CLMT" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or press [DOWN] button to "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

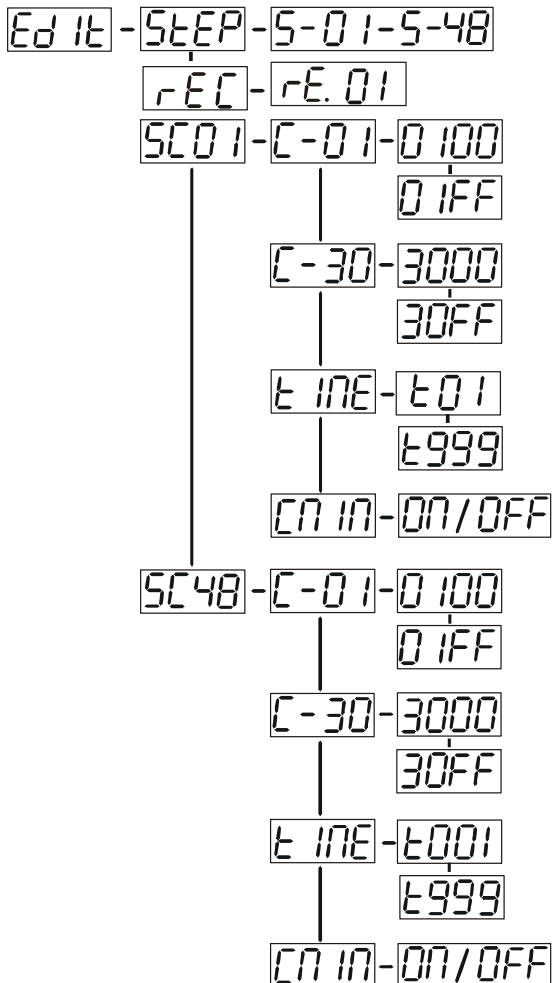
**CLLT** - Clear lamp time

With this function you can clear the running time of the lamp. Please clear the lamp time every time you replace the lamp.

1. Select "CLLT" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "ON" or "OFF".
3. Press [UP] to select "ON" if you wish to enable this function or press [DOWN] button to "OFF" if you don't.
4. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

## EDIT - Main menu 5

1. Press [MODE/ESC] to enter the main menu (display flashing).
2. Press [UP] or [DOWN] button to select "EDIT".



### STEP

- Define the number of steps in Run  
With this function you can define the number of steps in the Program Run.

1. Select "STEP" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "S-XX", "X" stands for the total amount of steps you want to save, so you can call up to 48 scenes in "RUN". For example if the "XX" is 05, it means that "RUN" will run the first 5 scenes you saved in "EDIT".
3. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

### REC

-Auto Save

With this function you can automatic save the number of steps in the Program Run.

1. Select "REC" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "RE.XX", "XX" stands for the number from 1 to 400.
3. Press [ENTER] to confirm or Press [MODE/ESC] to return to the main menu.

### SC01

- Editing the channels of the individual scenes

With this function you can edit the program to be called up in Run.

a) Editing via the Control Board

1. Select "SC01" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "SCXX", "X"

stands for the scene no. to be edited.

3. Change the scene no. by pressing [UP] or [DOWN] button.
4. Press [ENTER], the display shows "C-X", "X" stands for the channel no. Such as "C-01", it means you are editing channel 1 of the selected scene.
5. Select the channel no. you would like to edit by pressing [UP] or [DOWN] button.
6. Press [ENTER] to enter editing for the selected channel, the fixture reacts to your settings. The display shows the DMX value of the edited channel. Such as "11XX", it stands for in the channel 11 of the editing scene, the DMX value is XX, XX is a hexadecimal number value "01-FF". Adjust the desired DMX value by pressing [UP] or [DOWN] button.
7. Press [ENTER] in order to edit other channels of this scene.
8. Repeat steps 5-9 until you finish setting all the DMX values for all channels of this scene.
9. Once all the channels completed, the display will flash "TIME"
10. Press [ENTER] to edit the time needed, the display shows "TXXX", "XXX" stands for the time needed to run the current scene, value "001-999". E.g., "002" means you need 0.4ms (002\*0.2ms) to run the current scene.
11. Adjust the desired time by pressing [UP] or [DOWN] button.
12. Press [ENTER] to save the settings for the scene you are editing, the display will change to the next scene automatically.
13. Repeat step 3-14 to edit and other scenes, you can edit and save a maximum of 48 scenes.



14. Press [MODE/ESC] to exit. The number of steps can be defined under "STEP" and the scenes can be called up under "RUN"

**b) Editing via the external controller**

Call up the first scene in your controller now.

1. Select "SC01" by pressing [UP] or [DOWN] button.
2. Press [ENTER], the display shows "SC01".
3. Press [ENTER], the display shows "C-01".
4. Select "CNIN" by pressing [UP] or [DOWN] button.
5. Press [ENTER], the display shows "OFF".
6. Press [UP] or [DOWN] button .the display shows "ON".
7. Press [ENTER], the display shows "SC02". You successfully downloaded the first scene.
8. Adjust the Step-time as described above under point 12.
9. Call up the second scene in your controller now.
10. Repeat steps 5-11 until all desired scenes are downloaded.
11. Press [MODE/ESC] to exit. The number of steps can be defined under "STEP" and the scenes can be called up under "RUN"

## **DMX channel´s functions and their values:**

### **Channel 1 - Color Wheel 1:**

- 0-12 Open / white
- 13-25 Color 1
- 26-38 Color 2
- 39-51 Color 3
- 52-64 Color 4
- 65-77 Color 5
- 78-90 Color 6
- 91-103 Color 7
- 104-116 Color 8
- 117-127 Color 9
- 128-187 Forwards rainbow effect from fast to slow
- 188-193 No rotation
- 194-255 Backwards rainbow effect from slow to fast

### **Channel 2 - Rotating gobos, cont. rotation:**

- 0-13 Open
- 14-27 Rot. gobo 1 (metal)
- 28-41 Rot. gobo 2 (metal)
- 42-55 Rot. gobo 3 (metal)
- 56-69 Rot. gobo 4 (metal)
- 70-83 Rot. gobo 5 (metal)
- 84-97 Rot. gobo 6 (metal)
- 98-115 Rot. gobo 7 (metal)
- 116-135 Rot. gobo 1 (metal) shake

136-155 Rot. gobo 2 (metal) shake  
156-175 Rot. gobo 3 (metal) shake  
176-195 Rot. gobo 4 (metal) shake  
196-215 Rot. gobo 5 (metal) shake  
216-235 Rot. gobo 6 (metal) shake  
236-255 Rot. gobo 7 (metal) shake

**Channel 3 - rotating gobo rotation:**

0-7 No rotation  
8-127 forwards gobo rotation from fast to slow  
128-135 No rotation  
136-255 Backwards gobo rotation from slow to fast

**Channel 4 - Shutter, strobe:**

0-31 Shutter closed  
32-63 Dimmer (close to open)  
64-95 Strobe effect slow to fast  
96-127 No function (shutter open)  
128-159 Pulse-effect in sequences  
160-191 No function (shutter open)  
192-223 Random strobe effect slow to fast  
224-255 No function (shutter open)

**Channel 5 - PAN movement 8bit :**

**Channel 6 - TILT movement 8bit :**

**Channel 7 - Speed pan/tilt movement:**

0-225 max to min speed  
226-235 blackout by movement  
236-245 blackout by all wheel changing  
246-255 no function

**Channel 8 – reset, internal programs:**

0-19 Color change normal  
20-39 Color change to any position  
40-79 No function  
80-99 Motor reset  
100-119 Internal program 1  
120-139 Internal program 2

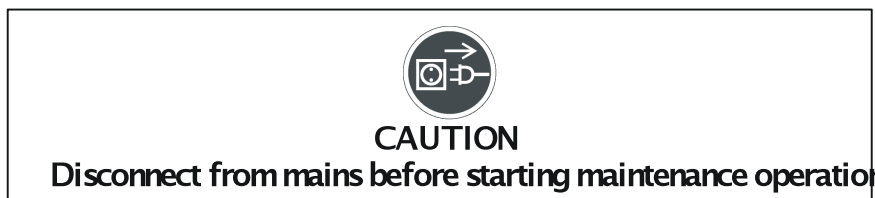
- 140-159 Internal program 3
- 160-179 Internal program 4
- 180-199 Internal program 5
- 200-219 Internal program 6
- 220-239 Internal program 7
- 240-255 Internal program 8

## CLEANING AND MAINTENANCE

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.



We recommend a frequent cleaning of the device. Please use a moist, lint-free cloth. Never use alcohol or solvents.

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

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

## TECHNICAL SPECIFICATIONS

### **Power supply:**

100VAC,50Hz;  120VAC, 50Hz;  208VAC, 50Hz;  220VAC,50Hz;  230VAC,50Hz;  240VAC, 50Hz;  
 100VAC,60Hz;  120VAC,60Hz;  208VAC, 60Hz;  220VAC,60Hz;  230VAC,60Hz;  240VAC,60Hz;

**Power consumption:** max. 400W

**Lamp:** MSD250 GY9.5

**Packing dimensions:** 67.5x37x33cm

**Net weight:** 11KGS

**Gross weight:** 13KGS

**Remark:** errors and omissions for every information given in this manual excepted. All information is subject to change without prior notice.