



AN OSRAM BUSINESS

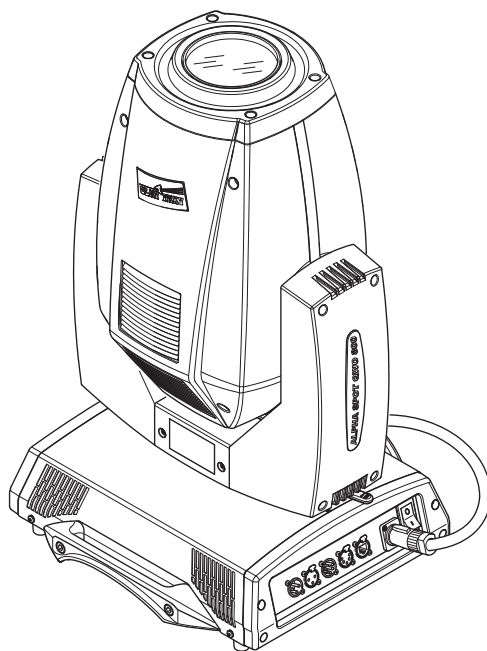
ALPHA SPOT QWO 800

ALPHA SPOT QWO 800 "ST"

C61380

C61381

INSTRUCTION MANUAL



INDEX

Page	Contents
2	Safety Information
3	Unpacking and preparation
4	Installation and start-up
5	Control panel
7	Menu setting
15	Maintenance
24	Optional accessories
26	Technical information
26	Cause and solution of problems
27	Channel functions

Congratulations on choosing a Clay Paky product!

We thank you for your custom.

Please note that this product, as all the others in the rich Clay Paky range, has been designed and made with total quality to ensure excellent performance and best meet your expectations and requirements.

Carefully read this instruction manual in its entirety and keep it safe for future reference. It is essential to know the information and comply with the instructions given in this manual to ensure the fitting is installed, used and serviced correctly and safely.

CLAY PAKY S.p.A. disclaims all liability for damage to the fitting or to other property or persons deriving from installation, use and maintenance that have not been carried out in conformity with this instruction manual, which must always accompany the fitting.

CLAY PAKY S.p.A. reserves the right to modify the characteristics stated in this instruction manual at any time and without prior notice.

SAFETY INFORMATION

EN

SAFETY INFORMATION

IMPORTANT: Clay Paky recommends you carefully read and keep the safety information on this product, also available in digital format at the following link:

<http://www.claypaky.it/en>

Ref: [FIS00Y – Safety Information Alpha 800 series]

IT

INFORMAZIONI DI SICUREZZA

IMPORTANTE: Clay Paky raccomanda di leggere accuratamente e conservare le informazioni di sicurezza relative a questo prodotto, sempre reperibili in versione digitale al seguente link:

<http://www.claypaky.it/en/download>

Rif: [FIS00Y – Safety Information Alpha 800 series]

DE

INFORMATIONEN ZUR SICHERHEIT

WICHTIG: Clay Paky empfiehlt, die Sicherheitsinformationen bezüglich dieses Produkts genau zu lesen und aufzubewahren. Sie sind in Digitalversion immer unter folgendem Link auffindbar:

<http://www.claypaky.it/en/download>

Ref: [FIS00Y – Safety Information Alpha 800 series]

ES

INFORMACIONES DE SEGURIDAD

IMPORTANTE: Clay Paky recomienda leer detenidamente y conservar la información de seguridad relativa a este producto. Además, está disponible una versión digital de la misma en el siguiente enlace:

<http://www.claypaky.it/en/download>

Ref: [FIS00Y – Safety Information Alpha 800 series]

FR

CONSIGNES DE SÉCURITÉ

IMPORTANT: Clay Paky recommande de lire attentivement et de conserver les informations de sécurité relatives à ce produit, disponibles en version digitale au lien suivant:

<http://www.claypaky.it/en/download>

Réf. : [FIS00Y – Safety Information Alpha 800 series]

RU

ИНСТРУКЦИЮ ПО ТЕХНИКЕ БЕЗОПАСНОСТИ

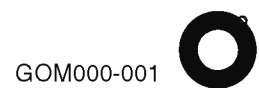
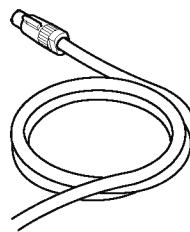
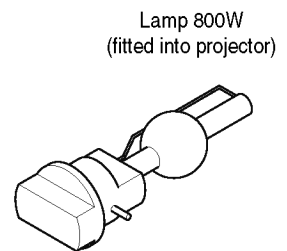
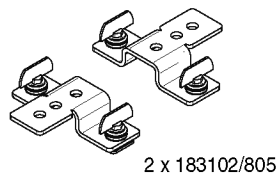
ВАЖНО: Clay Paky рекомендует внимательно прочитать и сохранить инструкцию по технике безопасности данного изделия, которая всегда доступна в электронном формате по следующей ссылке:

<http://www.claypaky.it/en/download>

Наименование: [FIS00Y – Safety Information Alpha 800 series]

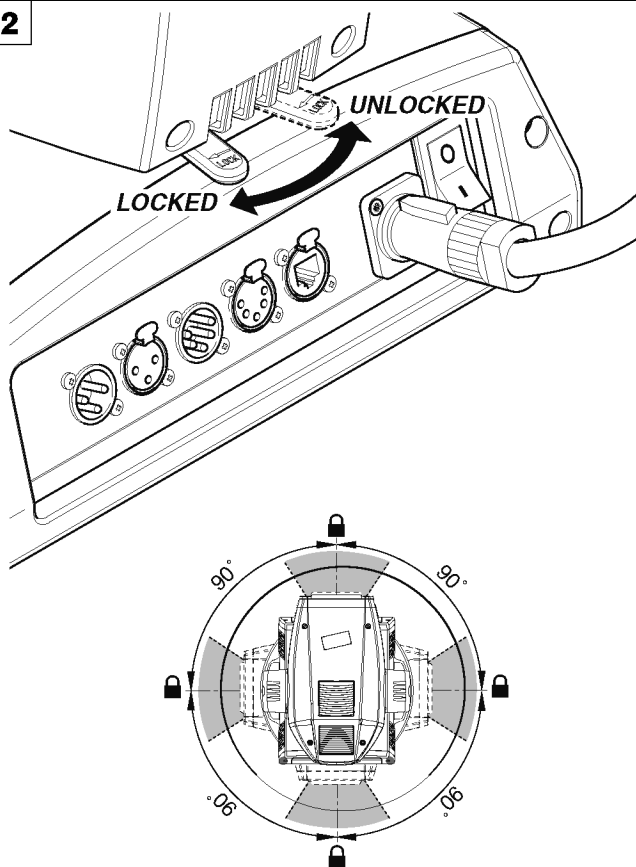
UNPACKING AND PREPARATION

1

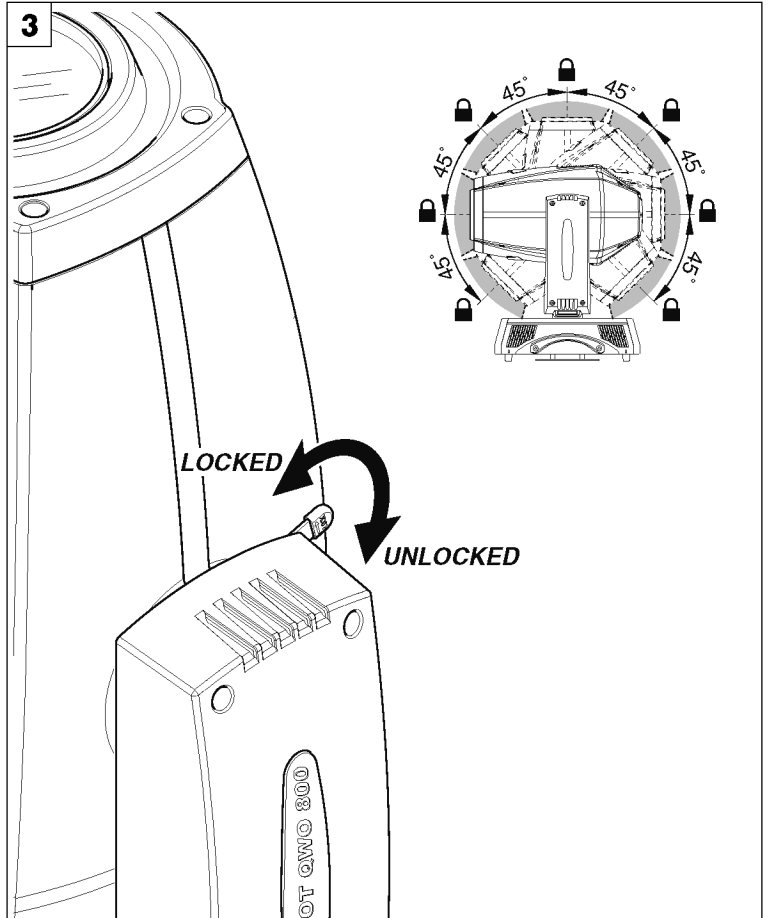


Packing contents - Fig. 1

2



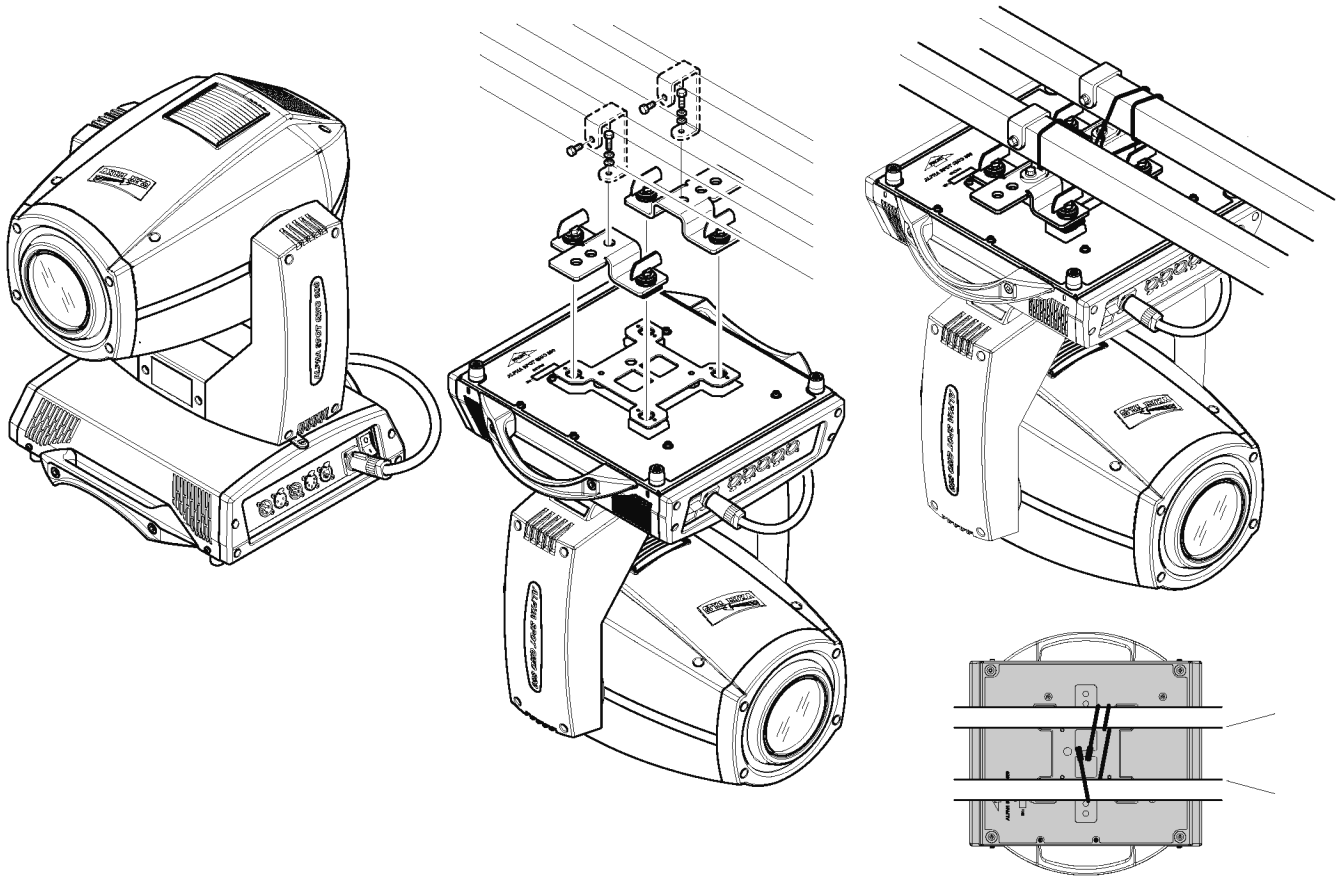
3



PAN Mechanism Lock and Release (every 90°) - Fig. 2

TILT Mechanism Lock and Release (every 45°) - Fig. 3

4

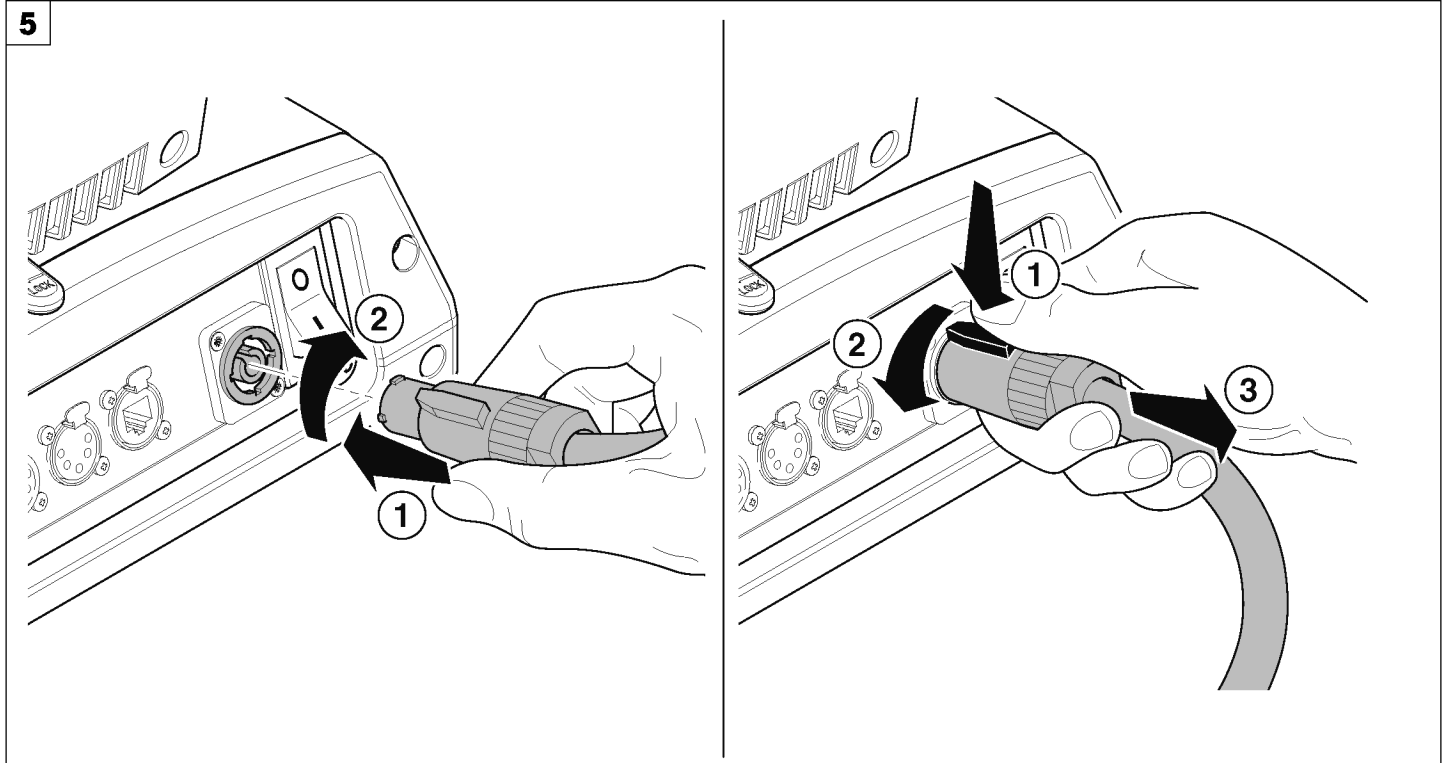


Installing the projector - Fig. 4

The projector can be installed on the floor resting on special rubber feet, on a truss or on the ceiling or wall.

WARNING: with the exception of when the projector is positioned on the floor, the safety cable must be fitted. (Cod. 105041/003 available on request). This must be securely fixed to the support structure of the projector and then connected to the fixing point at the centre of the base.

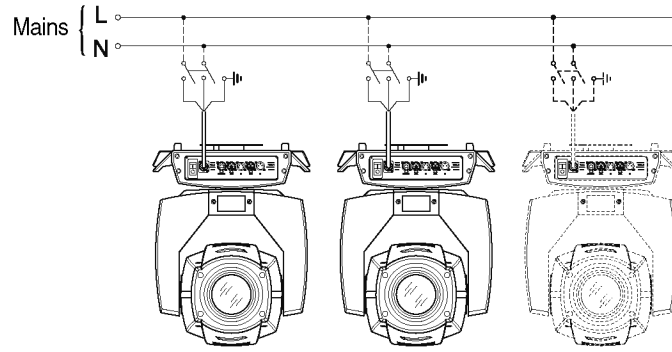
5



Connecting and disconnecting power cable - Fig. 5

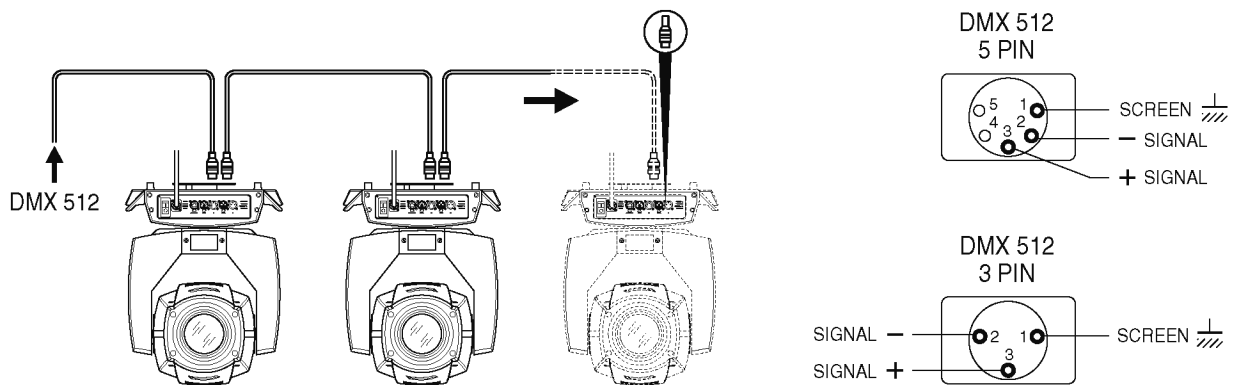
CONTROL PANEL

6



Connecting to the mains supply - Fig. 6

7

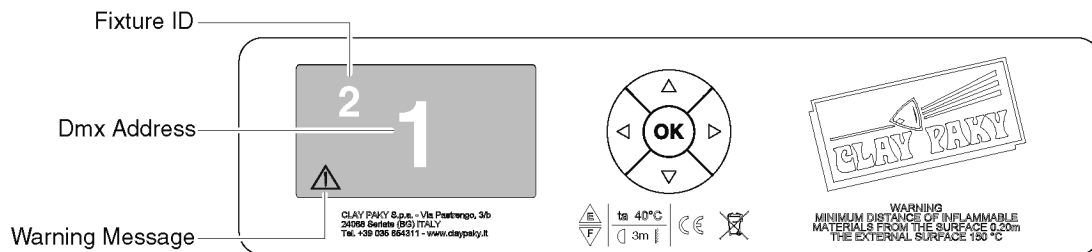


Connecting to the control signal line (DMX) - Fig. 7

Use a cable conforming to specifications EIA RS-485: 2-pole twisted, shielded, 120Ohm characteristic impedance, 22-24 AWG, low capacity. Do not use microphone cable or other cable with characteristics differing from those specified. The end connections must be made using XLR type 3 or 5-pin male/female connectors. A terminating plug must be inserted into the last projector with a resistance of 120Ohm (minimum 1/4 W) between terminals 2 and 3.

IMPORTANT: The wires must not make contact with each other or with the metal casing of the connectors. The casing itself must be connected to the shield braid and to pin 1 of the connectors.

8



Switching on the projector - Fig. 8

Press the switch. The projector starts resetting the effects. At the same time, the following information scrolls on the display:



Model
Alpha SPOT
QWO 800

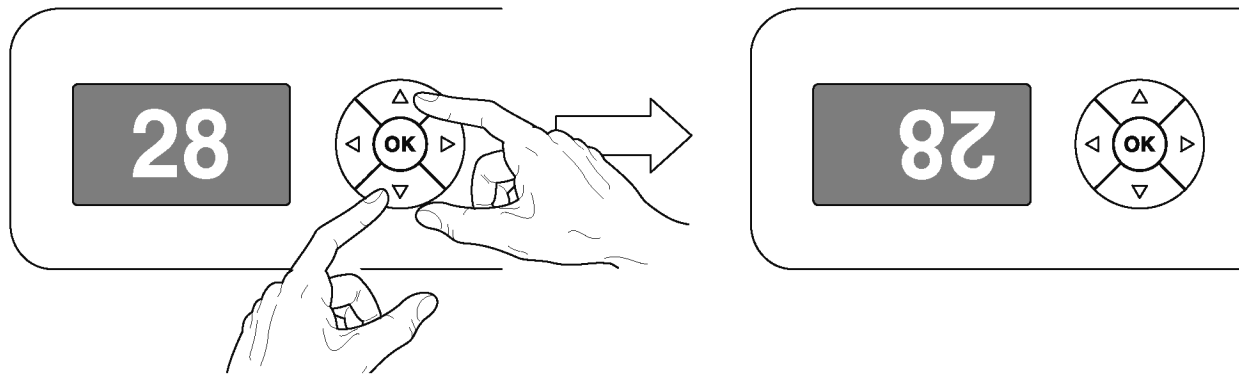
Firmware
Version X.X.X
Date - Hour

xxx (Fixture ID)
Dmx Address xxx

System errors
E:
W:

On conclusion of resetting in case of absence of the dmX signal, Pan and Tilt move to the "Home" position (Pan 128 bit - Tilt 128 bit). The control panel (Fig. 8) has a display and buttons for the complete programming and management of the projector menu. The display can be in one of two conditions: rest status and setting status. When it is in the rest status, the display shows the projector's DMX address and the Fixture ID address (if set).

During menu setting status, after a wait time (about 30 seconds) without any key having been pressed, the display automatically returns to rest status. It should be noted that when this condition occurs, any possible value that has been modified but not yet confirmed with the key will be cancelled.



Reversal of the display - Fig. 9

To activate this function, press UP ▲ and DOWN ▼ keys simultaneously while the display is in the rest mode. This status will be memorised and maintained even for the next time it will be switched on. To return to the initial state, repeat the operation all over again.

Setting the projector starting address

On each projector, the starting address must be set for the control signal (addresses from 1 to 512).

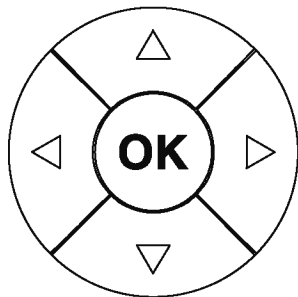
The address can also be set with the projector switched off.

Setting the projector Fixture ID

On each projector, the Fixture ID address must be set for an easy identification of the fixtures in an installation (ID from 1 to 255).

The Fixture ID address can be set with the projector switched off.

Functions of the buttons - Using the menu



Confirms the displayed value, or activates the displayed function, or enters the successive menu.



Decreases the value displayed (with auto-repetitions) or passes to the next item in the menu.



Increases the value displayed (with auto-repetitions) or passes to the previous item in a menu.



Return to the top level



Commute from units, tens, hundreds, in the "Address", "Fixture ID" and "Calibration" menu.

USING THE MENU:

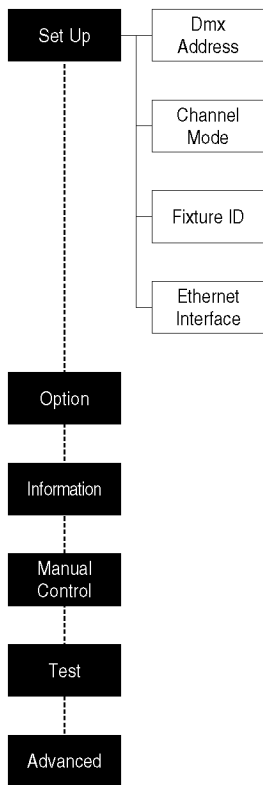
- 1) Press **OK** once – "Main Menu" appears on the display.
- 2) Use the UP ▲ and DOWN ▼ keys to select the menu to be used:
 - Setup (Setup Menu): To set the setting options.
 - Option (Option Menu): To set the operating options
 - Informations (Informations Menu): To read the counters, software version and other information.
 - Manual Control (Manual control Menu): To trigger the test and manual control functions.
 - Test (Test Menu): To check the proper functioning of effects
 - Advanced (Advanced Menu): Access to the "Advanced menu" is recommended for a trained technical personnel.
- 3) Press **OK** to display the first item in the selected menu.
- 4) Use the UP ▲ and DOWN ▼ keys to select the MENU items.

Setting addresses and options with the projector disconnected

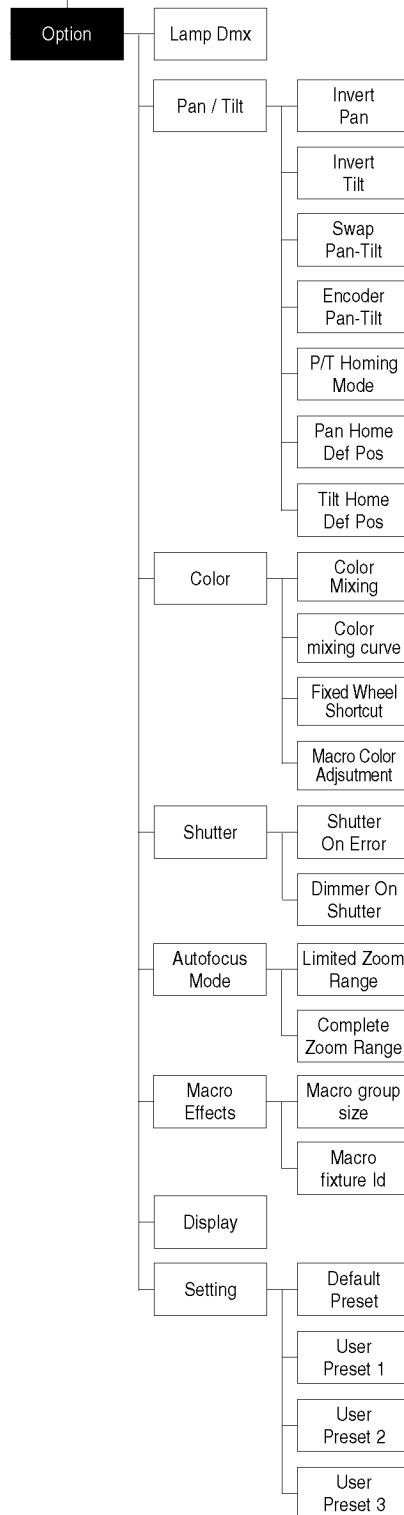
The projector's DMX address, as well as other possible operating options, can also be set when the appliance is disconnected from the electricity supply. All that is needed is to press **OK** to momentarily activate the display and thus access the settings. Once the required operations have been carried out, the display will switch off again after a wait time of 30 seconds.

MENU SETTING

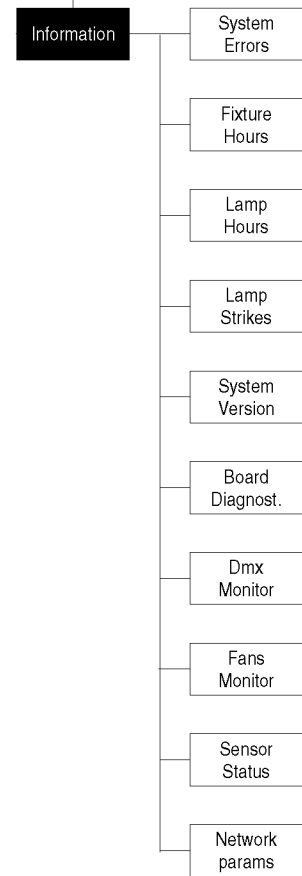
1



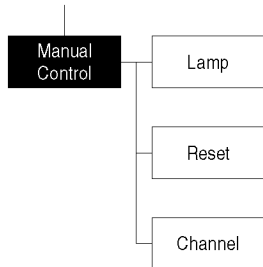
2



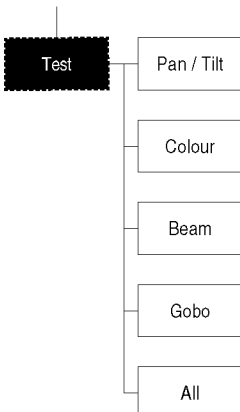
3



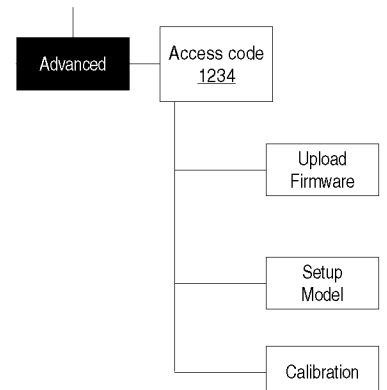
4



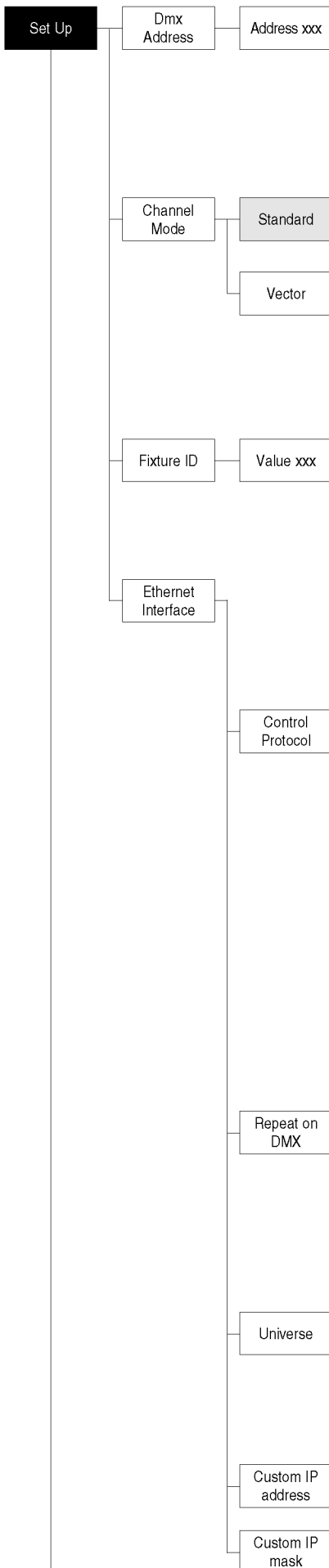
5



6



NOTE: On grey the default options



SET UP MENU

DMX ADDRESS

NOTE: without the DMX signal the Address (XXX) flashing

Allows you to select the DMX ADDRESS.

- 1) Press **OK** - the current DMX Address appear on the display.
- 2) Use the UP **▲** and DOWN **▼**, RIGHT **▶** keys to plan the DMX Address.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep current settings.

CHANNEL MODE

Allows you to select a channel arrangement from the two available.

- 1) Press **OK** - the current settings appear on the display (Standard or Vector).
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:
 - **Standard**
 - **Vector**
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep current settings.

FIXTURE ID

Allows you to select the FIXTURE ID.

- 1) Press **OK** - the current Fixture ID appear on the display.
- 2) Use the UP **▲**, DOWN **▼**, RIGHT **▶** keys to plan the Fixture ID.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep current settings.

ETHERNET INTERFACE

It lets you set the Ethernet settings to be attributed to the projector.

- 1) Premere **OK**.
- 2) Use the UP **▲** and DOWN **▼** keys to select the "Ethernet Interface" options to set:

Control Protocol

It lets you select the "Control Protocol" Art-net to assign according to the control unit used:

- 1) Press **OK** the current setting appears on the display.
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:
 - **Disabled**
 - **Art-net on IP 2**
 - **Art-net on IP 10**
 - **Art-net Custom IP**
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep the current setting. If the Control Protocol option is set on Disabled, when an IP address (IP2, IP10 or IP Custom) is selected, the projector immediately initializes the IP address that was just selected. If the Control Protocol option is enabled (IP2, IP10 or IP Custom) and a new one is selected that is different from the previous one, the projector must be restarted so that it will be correctly initialized.

Repeat on DMX

It lets you enable the transmission of the Ethernet protocol by DMX signal to all the connected projectors.

- 1) Press **OK** the current setting appears on the display.
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:
 - **Disabled:** DMX transmission disabled.
 - **Enabled on primary:** DMX transmission enabled.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep the current setting.

Universe

It lets you assign the "Universe" number to be assigned to a series of projectors.

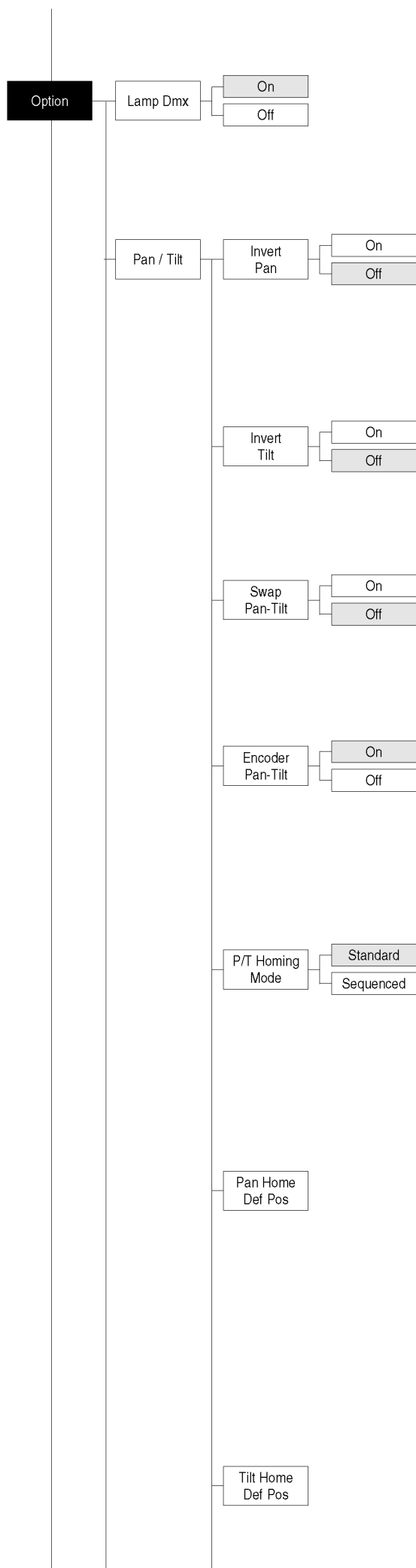
- 1) Press **OK** - the current Universe address appears on the display.
- 2) Use the UP **▲**, DOWN **▼**, RIGHT **▶** keys to set the Universe address.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep the current setting.

Custom IP address

Allows you to set the **IP address** manually by the user default.

Custom IP mask

Allows you to set manually the **Subnet Mask** by the user default.



OPTIONS MENU

LAMP DMX

Used for enabling lamp remote control channel.

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) the lamp remote control channel.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep current settings.

PAN / TILT

Invert pan

Used for reversing Pan movement.

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) PAN inversion.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep current settings.

Invert tilt

Used for reversing tilt movement.

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) Tilt inversion.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep current settings.

Swap Pan-Tilt

Used for swapping Pan and Tilt channels (as well as Pan fine and Tilt fine).

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) Pan and Tilt channel swap.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep current settings.

Encoder Pan-Tilt

Used for enabling the Pan / Tilt encoders.

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) Pan / Tilt encoders.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep current settings.

You can quickly disable the Pan and Tilt Encoder by simultaneously pressing the UP **▲ and DOWN **▼** keys in the "Main Menu".**

P/T Homing Mode

Lets you set the initial projector Reset mode.

- 1) Press **OK**, the current setting appears on the display.
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:
Standard: Pan & Tilt are simultaneously reset.
Sequenced: Tilt is reset first followed by Pan.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep the current setting.

Pan Home Def Pos

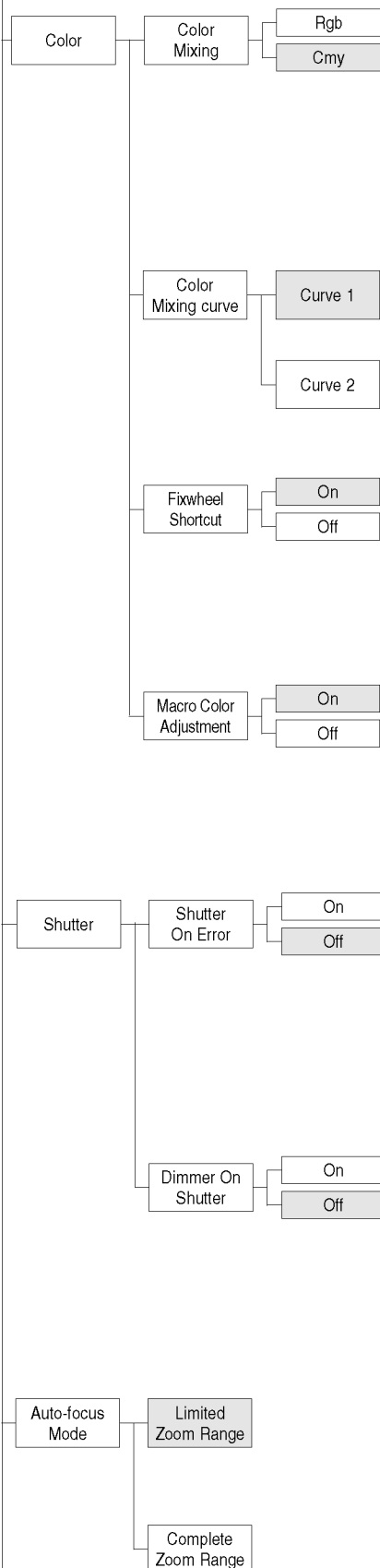
Lets you assign the Pan channel "home" position at the end of Reset, without a DMX input signal.

- 1) Press **OK**, the current setting appears on the display.
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:
0 degree
90 degrees
180 degrees
270 degrees (default)
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep the current setting.

Tilt Home Def Pos

Lets you assign the Tilt channel "home" position at the end of Reset, without a DMX input signal.

- 1) Press **OK**, the current setting appears on the display.
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:



0%
12.5%
25%
50% (default)
75%
87.5%
100%

- 3) Press **OK** to confirm the selection or LEFT **←** to keep the current setting.

COLOR

Color mixing

Used for reversing the CMY color mixing system.

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys select one of the following settings:

RGB color mixing mode

CMY color mixing mode

- 3) Press **OK** to confirm the selection or LEFT **←** to keep current settings.

Color mixing curve

It lets you select the "Color mixing curve" from the two available.

- 1) Press **OK** the current setting appears on the display.
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:

Curve 1

Curve 2

- 3) Press **OK** to confirm the selection or LEFT **←** to keep the current setting.

Fixed wheel short-cut

Used for optimizing color change time so that the disc turns in the direction that requires shorter movement.

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) color change optimization.
- 3) Press **OK** to confirm the selection, or LEFT **←** to keep current settings.

Macro color adjustment

It lets you enable the overwriting of a "Macro Colour" with the Cyan, Magenta, Yellow, CTO and Colour wheel channels.

Press **OK** the current setting appears on the display.

- 1) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) the overwriting.
- 2) Press **OK** to confirm the selection or LEFT **←** to keep the current setting.

SHUTTER

Shutter on error

Used for automatically closing the stop/strobe in the event of Pan/Tilt position error.

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) automatic stop/strobe closing in the event of Pan/Tilt position error.
- 3) Press **OK** to confirm the selection, or LEFT **←** to keep current settings.

Dimmer on Shutter

Enables automatic closing of the dimmer when the strobe is completely closed.

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) the automatic closing of the dimmer.
- 3) Press **OK** to confirm the selection, or LEFT **←** to keep current settings.

AUTO-FOCUS MODE

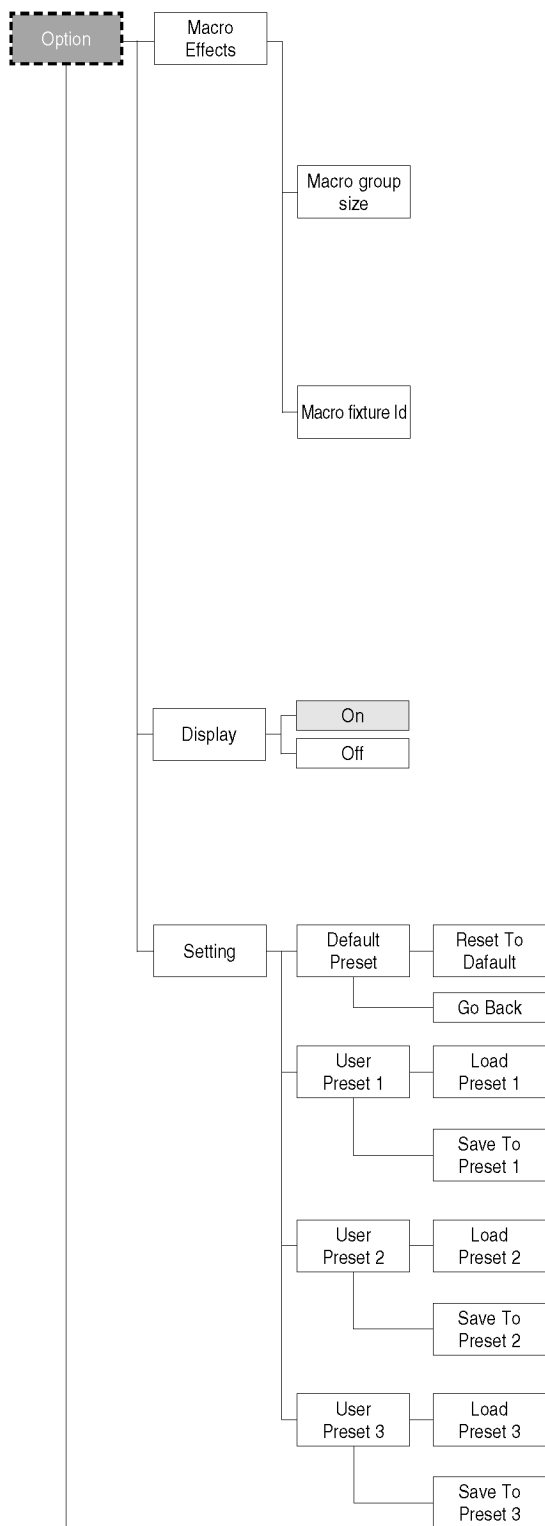
It lets you select the "Auto-focus Mode" from the two available.

- 1) Press **OK** the current setting appears on the display.
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:

Limited Zoom Range: The "Autofocus" works only in the optical run that was specifically designed for the projector in question.

Complete Zoom Range: The "Autofocus" also works in overrun

- 3) Press **OK** to confirm the selection or LEFT **←** to keep the current setting.



MACRO EFFECTS

It lets you select the "Macro Effects" set up from the two available.

- 1) Press **OK** the current setting appears on the display.
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:

Macro group size

It lets you set the number of projectors to be included in the macro mode operation.

- 1) Press **OK**
- 2) Use the UP **▲**, DOWN **▼**, RIGHT keys to set the number of projectors to be included in the "Macro Effect" operation.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep the current setting.

Macro fixture Id

It lets you attribute an ID address to the projector for the phase displacement for the scene's starting time in Macro mode.

- 1) Press **OK**
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following settings:
Fixed to X. (to assign to all the projectors to be included in the Macro operation). **Auto by DMX Address:** According to the DMX address, it automatically detects the starting sequence of the scene in the Macro mode (to assign to all the projectors to be included in the Macro operation).
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep the current setting.

DISPLAY

Used for automatically reduce brightness on the display after about 30 seconds in idle.

- 1) Press **OK** - the current settings appear on the display (On or Off).
- 2) Use the UP **▲** and DOWN **▼** keys to enable (On) or disable (Off) the decreasing of display brightness.
- 3) Press **OK** to confirm the selection or LEFT **◀** to keep current settings.

SETTING

Used to save 3 different settings of the items in the options menu and relative submenus.

- 1) Press **OK** - "Default preset" appears on the display.
- 2) Use the UP **▲** and DOWN **▼** keys to select one of the following configurations:
 - **Default preset (*)**
 - **User preset 1**
 - **User preset 2**
 - **User Preset 3**
- 3) Press **OK** - "Load preset X" appears on the display.
- 4) Use the UP **▲** and DOWN **▼** keys to select:
 - Load preset X to recall a previously stored configuration.
 - Save to preset X to store the current configuration.
 a confirmation message (Are you sure?) appears on the display.
- 5) Select YES to confirm the selection or NO to keep the current setting and return to the next higher level.

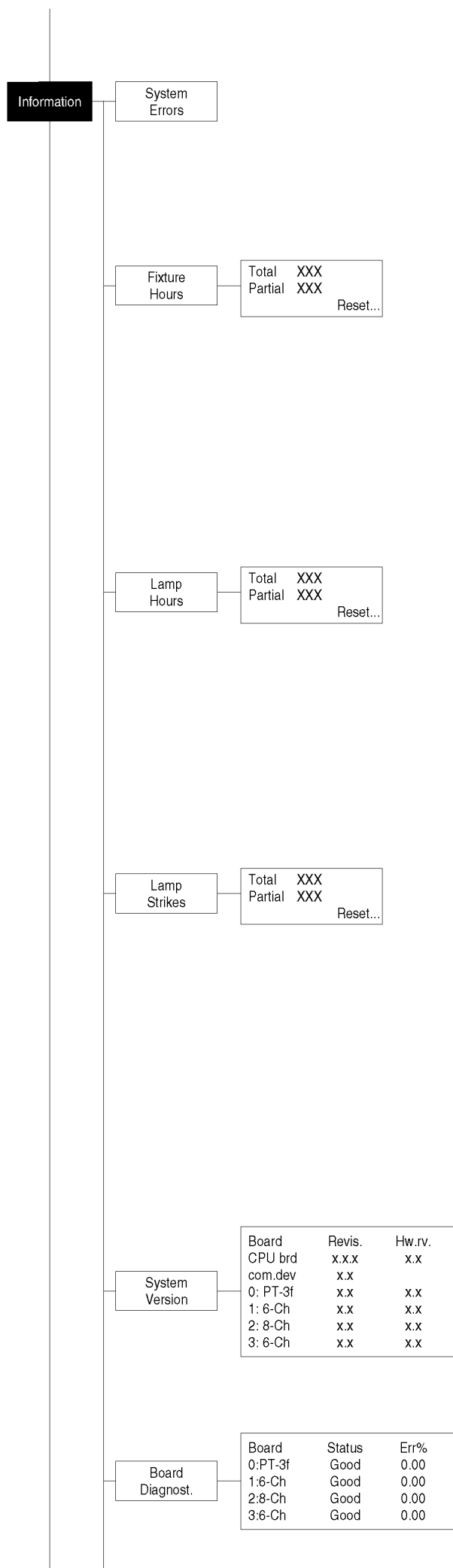
(*) DEFAULT PRESET

By pressing the RIGHT **▶ key and the LEFT **◀** key simultaneously once entered in the "main menu" it is possible to quickly (short cut) reset the default settings (DEFAULT PRESET).**

Used for restoring default values on all options menu items and relevant submenus.

- 1) Press **OK**, a confirmation message (Are you sure?) appears on the display.
- 2) Select YES to confirm the selection or NO to keep current setting.

OPTION	DEFAULT
Lamp DMX	On
Invert Pan	Off
Invert Tilt	Off
Swap Pan-Tilt	Off
Encoder Pan-Tilt	On
P/T Homing Mode	Standard
Pan Home Def Pos	270 degrees
Tilt Home Def Pos	50%
Color mixing	CMY
Color mixing curve	Curve 2
Fixed Wheel Shortcut	On
Macro Color Adjustment	On
Shutter on error	Off
Dimmer on Shutter	Off
Auto-focus mode	Limited zoom range
Display	On



INFORMATION MENU

SYSTEM ERRORS

Shows a list of warnings and messages relevant to errors occurred since the fixtures switching-on.

- Pressing **OK** you are allowed to reset the SYSTEM ERRORS list.
A confirmation message (Are you sure you want to clear error list ?) appears on the display.
- Select YES to reset the list or NO to go back.

FIXTURE HOURS

Used for displaying projector operating hours (total and partial).

- Press **OK** - Hours total and partial appears on the display.
Total counter
Counts the number of projector working life hours (from manufacture to date).
Partial counter
Counts the number of partial projector working life hours since the last reset to date.
- Press **OK** to reset partial projector working hours a confirmation message (Are you sure?) appears on the display.
- Select YES to reset partial projectors counter or NO to keep the current setting and return to the top menu level.

LAMP HOURS

Used for displaying the lamp working hours (total and partial).

- Press **OK** - Hours total and partial appears on the display.
Total counter
Counts the number of projector working hours with the lamp on (from manufacture to date).
Partial counter
Counts the number of lamp working hours since the last reset to date.
- Press **OK** to reset partial lamp working hours, a confirmation message (Are you sure ?) appears on the display.
- Select YES to reset partial counter or NO to keep the current setting and return to the top menu level

LAMP STRIKES

Used for displaying the number of times the lamp was turned on (total and partial).

- Press **OK** - the number of times the lamp was turned on (total and partial) appears on the display.
Total counter
Counts the number of times the lamp was turned on (from manufacture to date).
Partial counter
Counts the number of times the lamp was turned on since the last reset to date.
- Press **OK** to reset partial lamp strikes hours, a confirmation message (Are you sure ?) appears on the display.
- Select YES to reset partial counter or NO to keep the current setting and return to the top menu level

SYSTEM VERSION

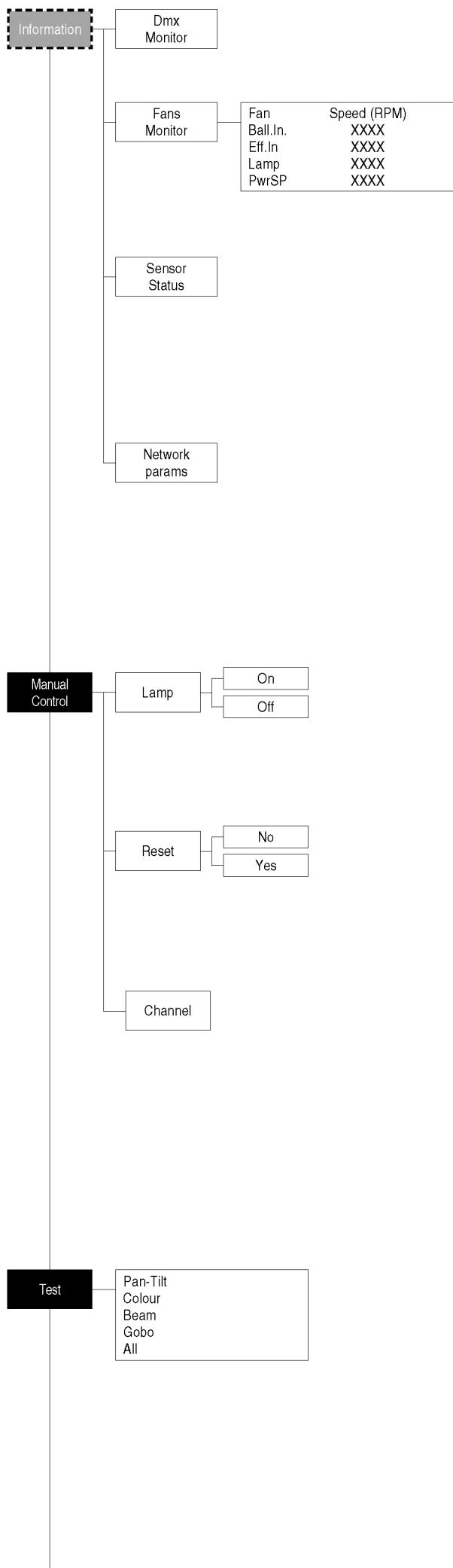
Used for displaying the software and hardware version of each board installed in the projector.

CPU brd (CPU board)
0: PT-3f (Pan / Tilt board)
1: 6-Ch (6 channel board)
2: 8-Ch (8 channel board)
3: 6-Ch (6 channel board)

BOARD DIAGNOSTIC

Used for displaying the status error of each board installed in the projector:

0: PT-3f (Pan / Tilt board)
1: 6-Ch (6 channel board)
2: 8-Ch (8 channel board)
3: 6-Ch (6 channel board)



DMX MONITOR

Used for displaying the projector DMX channel level in bit (Val) and in percentage (Perc).

FANS MONITOR

Used for displaying the speed of each fan installed in the projector:

Ball. IN (Ballast IN Fan)

Eff.IN (Effects IN Fan)

Lamp (Lamp Fan)

PwrSp (Power Supply Fan)

SENSOR STATUS

It lets you check the correct operations of each "sensor" installed in the projector, each channel is associated with one of the following three parameters:

- n.a.= sensor not available
- ON= sensor working
- OFF= sensor defective

NETWORK PARAMS

Allows the "Network" parameters of the projector to be displayed or:

IP address: Internet Protocol address (two projectors must not have the same IP address)

IP mask: 255.0.0.0

Mac address: Media Access Control: the projector's Ethernet Address

MANUAL CONTROL

LAMP

Used for turning lamp on and off from the projector control panel.

- 1) Press - the current settings appear on the display (On or Off).
- 2) Use the UP and DOWN keys to turn the lamp on (On) or off (Off)
- 3) Press to confirm the selection or LEFT to keep current settings and return to the top level.

RESET

Used for resetting the projector.

- 1) Press to reset the projectors, a confirmation message (Are you sure ?) appears on the display.
- 2) Select YES to starting reset the fixture or NO to keep the current setting and return to the top menu level.

CHANNEL

Used for setting channel levels from the projector control panel.

- 1) Press - the first channel appears on the display.
- 2) Use the UP and DOWN keys to select the required channel:
- 3) Press and use the UP and DOWN keys to select the required DMX level (value between 0 and 255).
- 4) Press LEFT to return to the top menu level.

TEST MENU

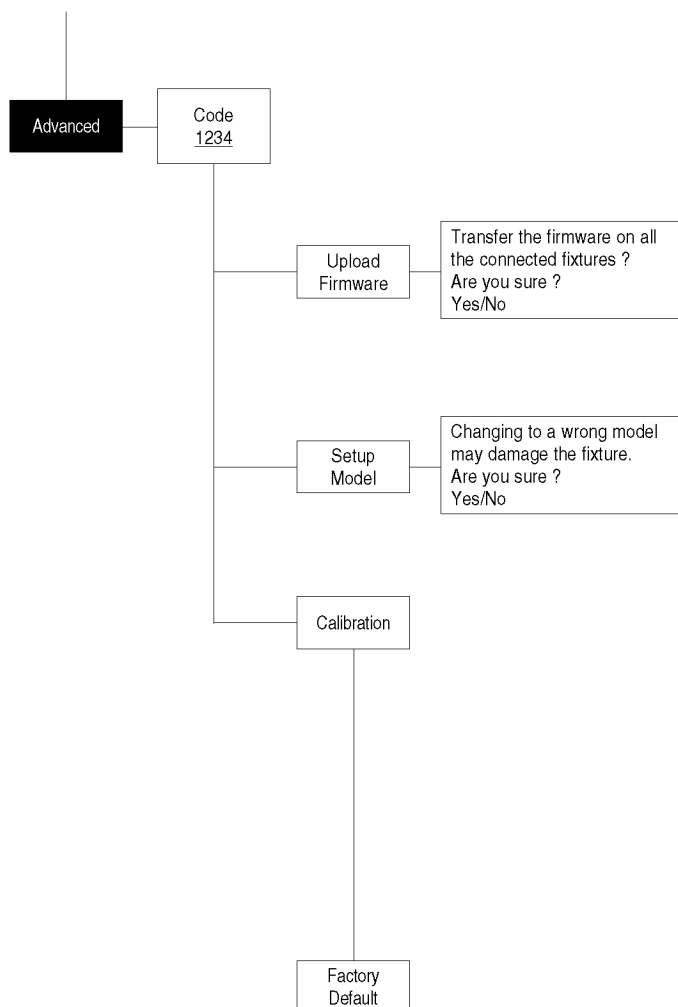
TEST

Allows you to check the proper functioning of effects.

- 1) Press to return to the top menu level.
- 2) Use the UP and DOWN keys to select the required test.
- 3) Press to confirm the selection or LEFT to keep current settings.

Test sequence:

- Pan - Tilt effects (Pan & Tilt)
- Colour effects (CMY, colour wheel / CTO)
- Beam effects (Stopper-Strobe / Dimmer / Iris / Prism / Frost / Focus / Zoom / Animation Disk)
- Gobo effects (Fixed gobo / Rotating gobo)
- All effects



ADVANCED MENU

To enable the "Advanced Menu" set up the "Access code" (1234) using the UP , DOWN , RIGHT keys.

Press - "Menu advanced" appears on the display

UP LOAD FIRMWARE

Allows you to transfer the firmware from 1 fixture to all the connected fixtures.

- 1) Press , a confirmation message appears on the display.
- 2) Select YES to start the firmware loading or NO to keep the current setting and return to the top menu level

SETUP MODEL

Allows you to change the default model of projector.

- 1) Press a confirmation message appears on the display.
- 2) Select YES to define the model of projector or NO to keep the current setting and return to the top menu level.

CALIBRATION

Allows you to adjust effects from the control panel to obtain perfect uniformity between the projectors.

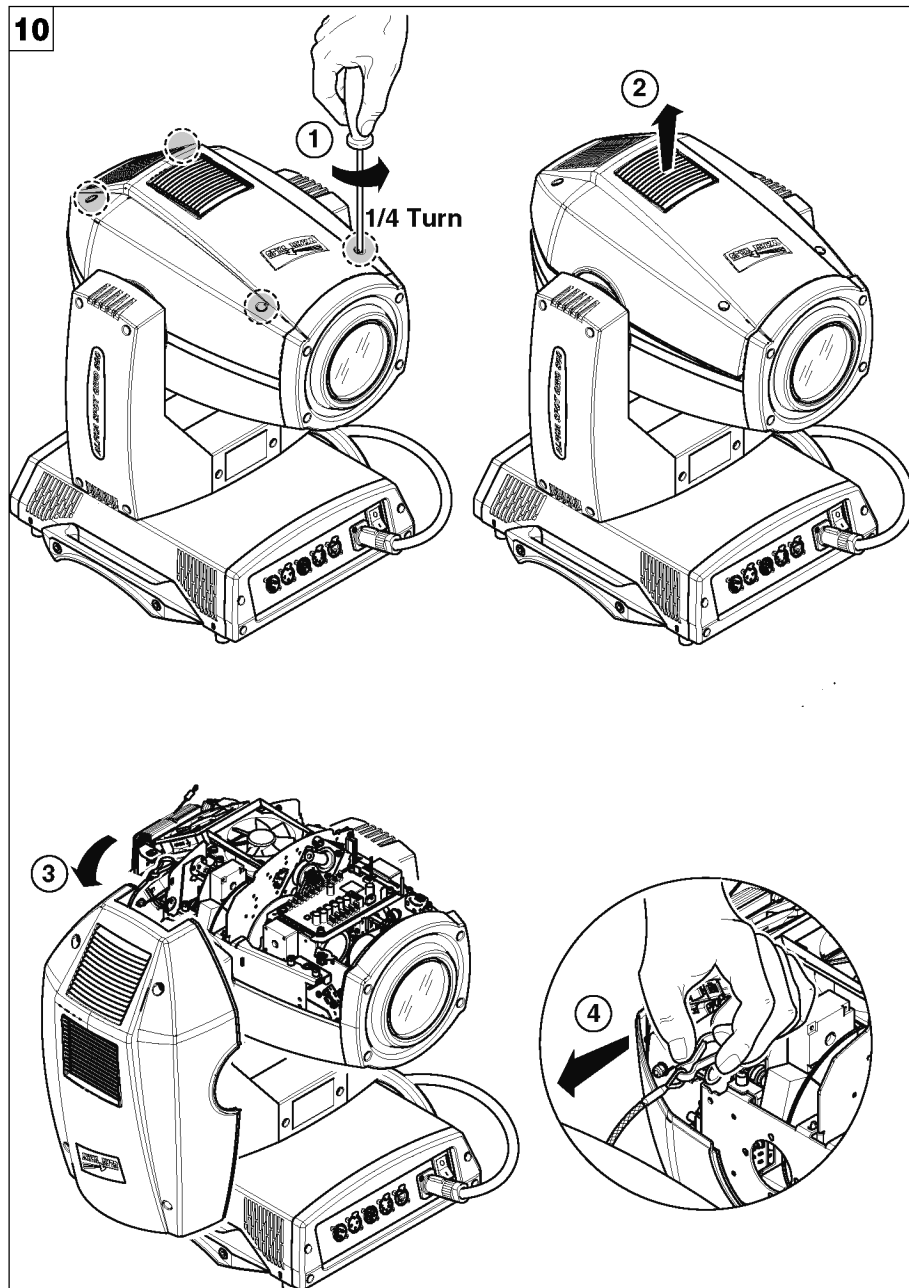
- 1) Press - "channels" appears on the display.
- 2) Using the UP and DOWN keys, select the effect you wish to regulate.
- 3) Press and use the RIGHT , UP and DOWN buttons to make the adjustment by setting a value between 0 and 255.
- 4) Press to confirm the selection or LEFT to keep current settings and return to the top level.

FACTORY DEFAULT

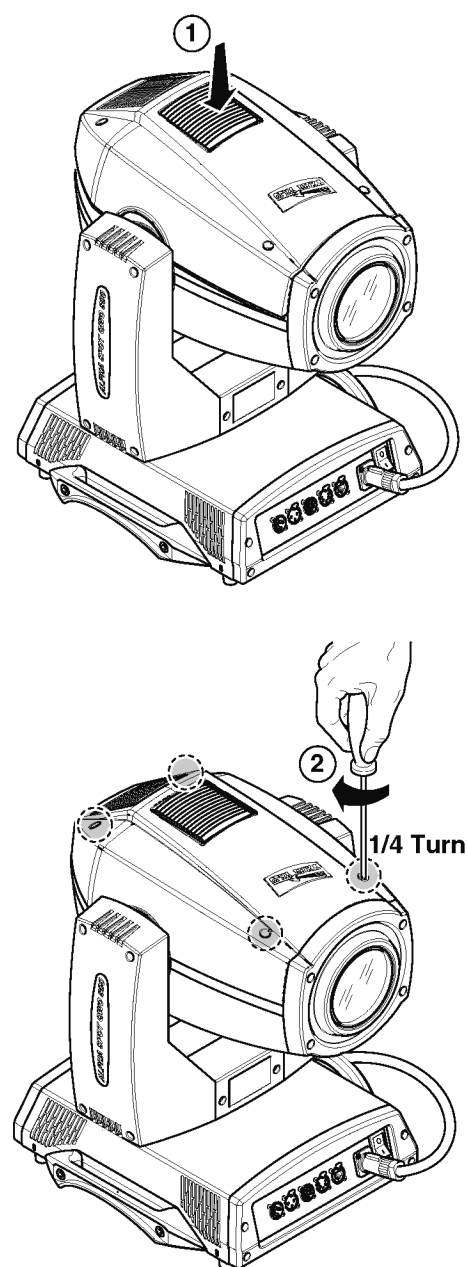
Allows you to restore default values of all channels (128).

- 1) Press - a confirmation message appears on the display (Reset calibration to factory default?).
- 2) Select YES to reset calibration to factory default or NO to keep the current setting and return to the top menu level.

10



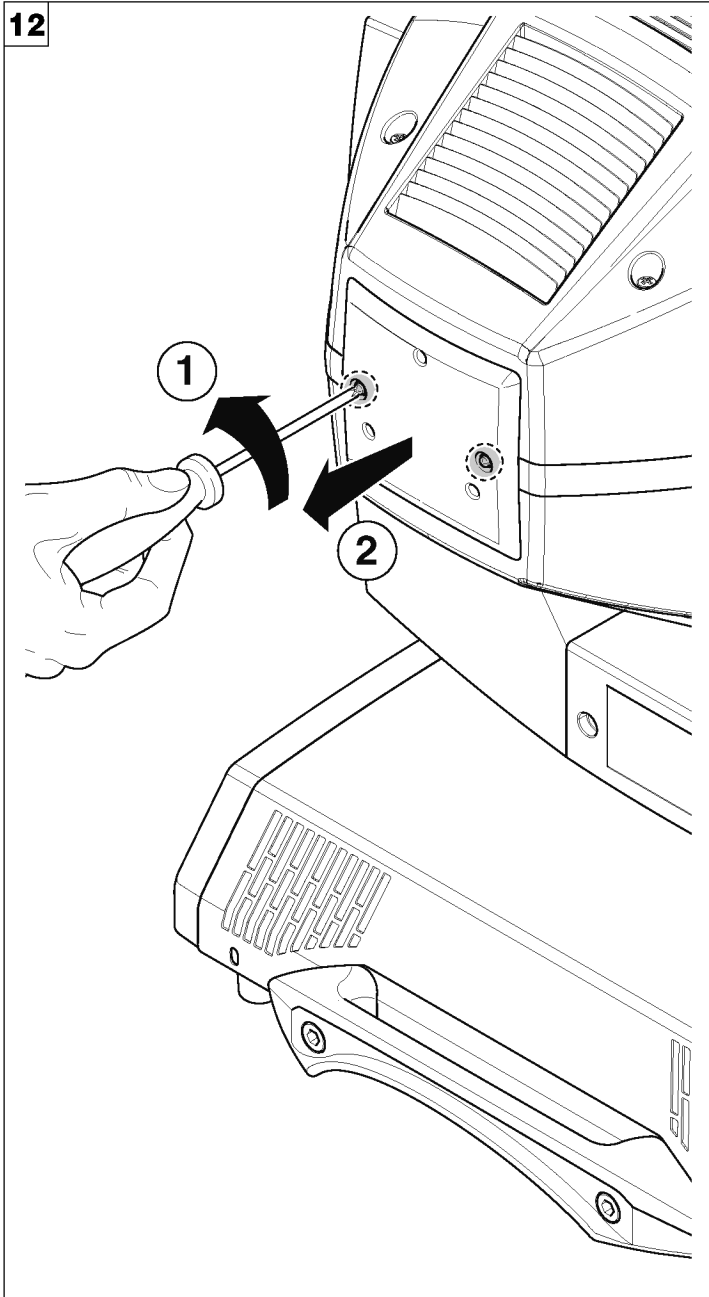
11



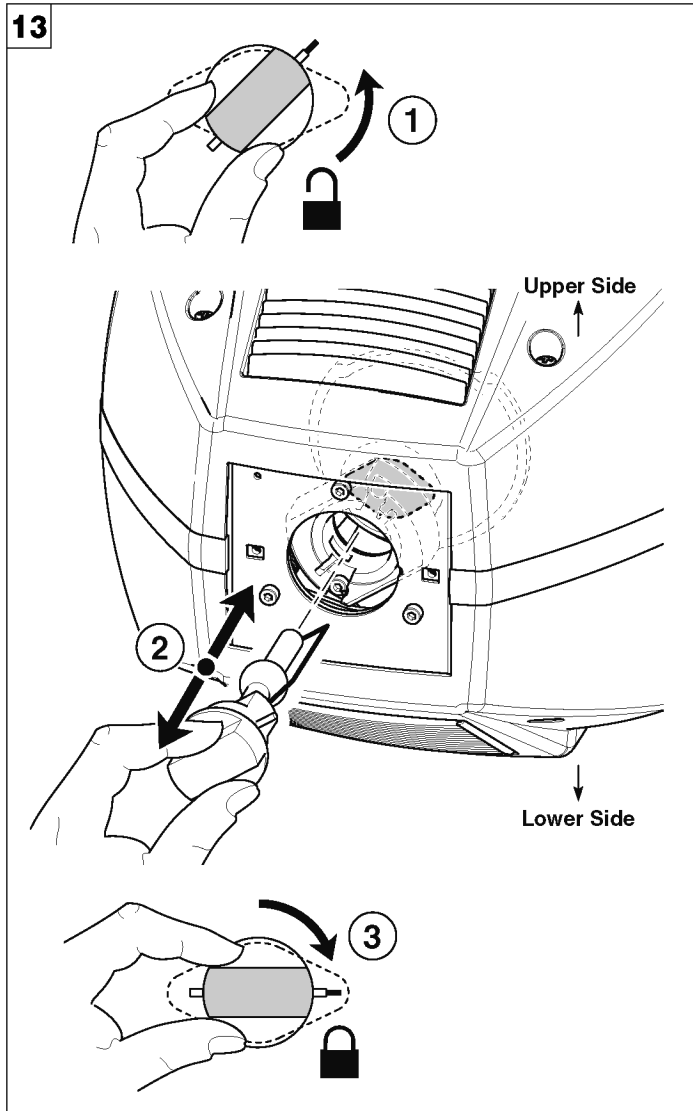
Locking and releasing Pan and Tilt movements - Refer to the instructions in the UNPACKING AND PREPARATION section.

Opening the head covers - Fig. 10.

Closing the head covers - Fig. 11.



Opening and closing lamp compartment - Fig. 12



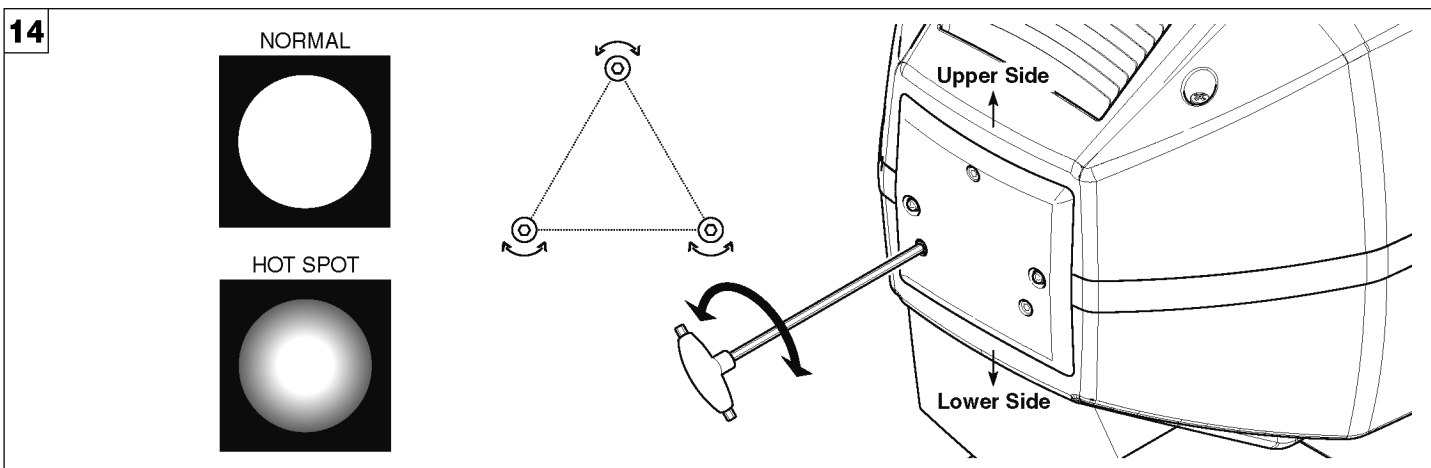
Lamp change - Fig 13

Take the new lamp out of its package and insert in the fitting.

WARNING: do not touch the lamp's envelope with bare hands. Should this happen, clean the bulb with a cloth soaked in alcohol and dry it with a clean, dry cloth.

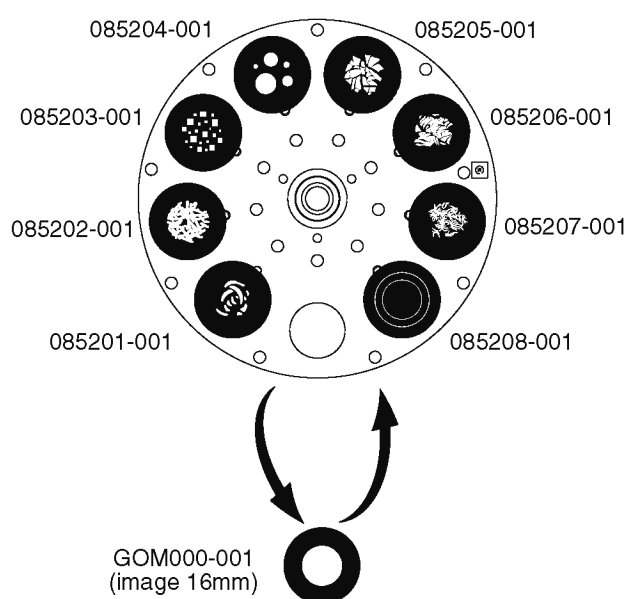
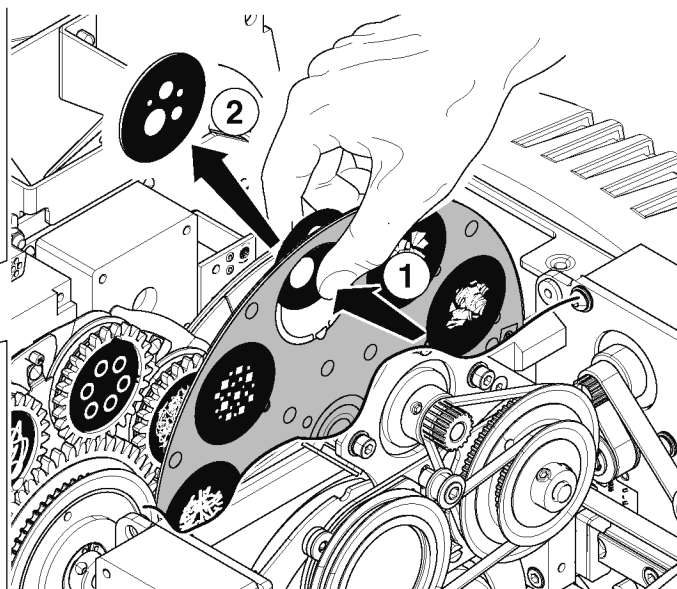
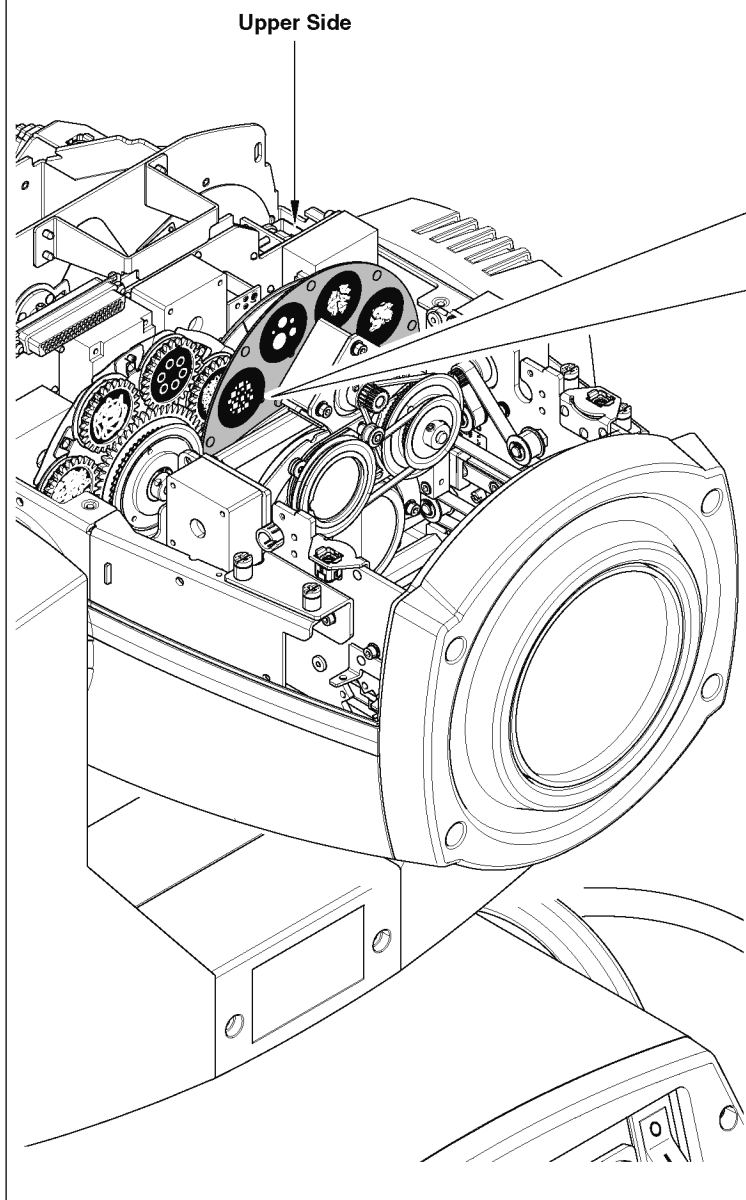
CAUTION:

Fast lamp ON-OFF cycles (for example 10 minutes ON / 10 minutes OFF) will reduce the lamp life.



Lamp regulation - Fig. 14

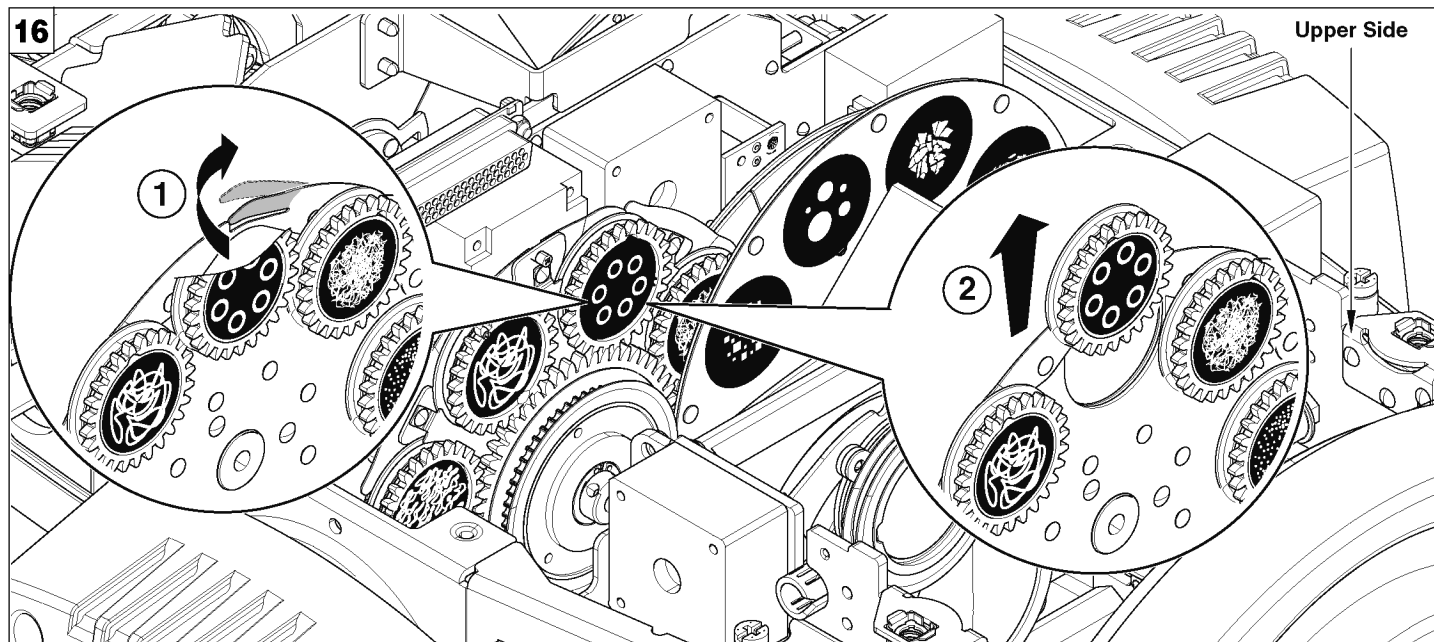
To centre the lamp, turn the three adjusting screws as shown in the figure.



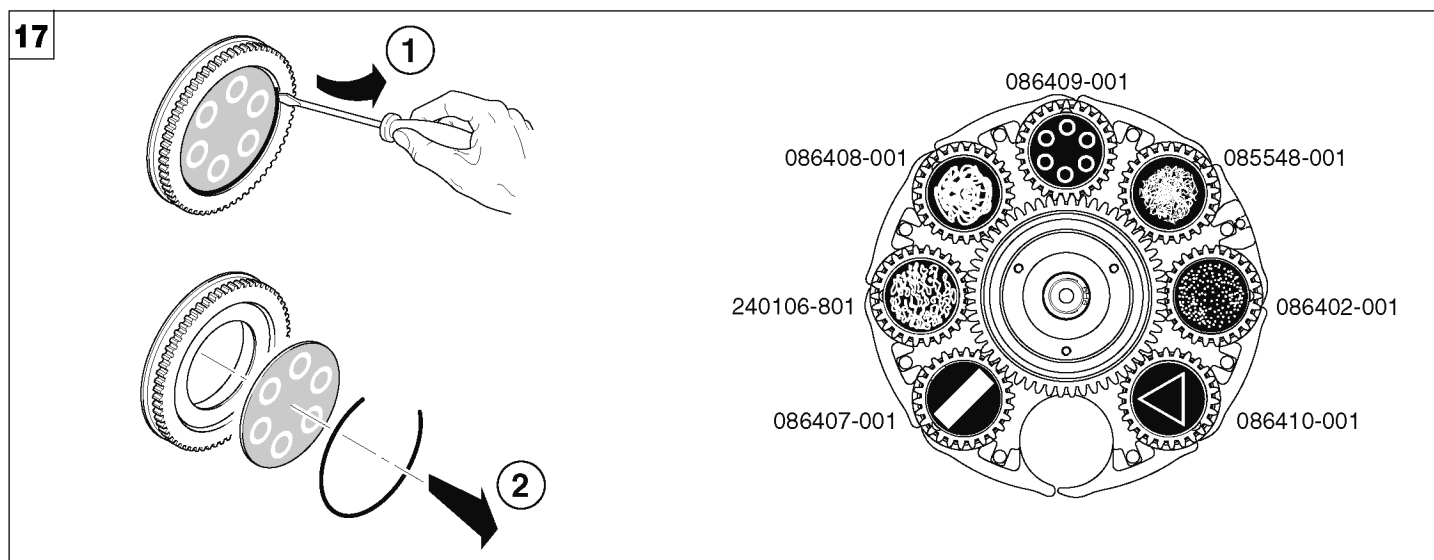
Replacing fixed gobos (\varnothing 31.5 mm – max 19 mm image – thickness max 1.1 mm) - Fig. 15

WARNING: Before using personalised gobos contact Clay Paky.

GOM000-001 is the standard Clay Paky package supply for customers who need to make the projected beam uniform, partially reducing the beam itself. This gobo is interchangeable with any other "fixed gobo wheel" gobo.



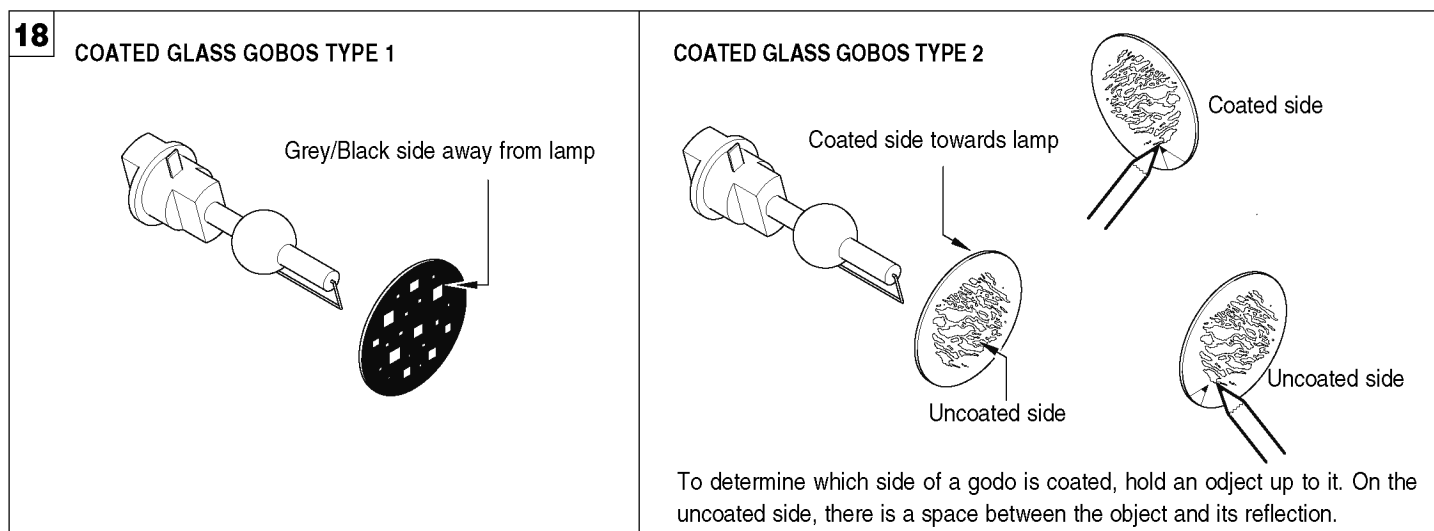
Bearing group replacement - Fig. 16



Replacing rotating gobos (\varnothing 25.7 mm - max 19 mm image – thickness max 1.1 mm) - Fig. 17

IMPORTANT: Use only glass gobos on the rotating gobos wheel.

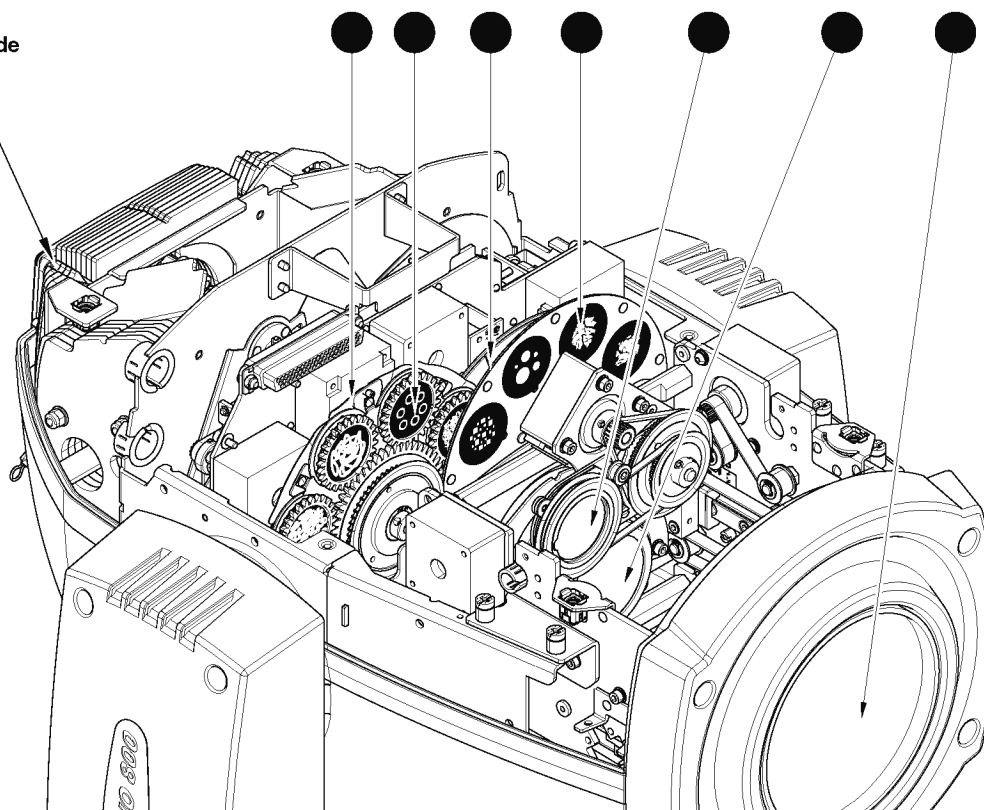
WARNING: Before using personalised gobos contact Clay Paky.



Gobo orientation - Fig. 18

The pictures shown the correct gobos orientation.

Upper Side



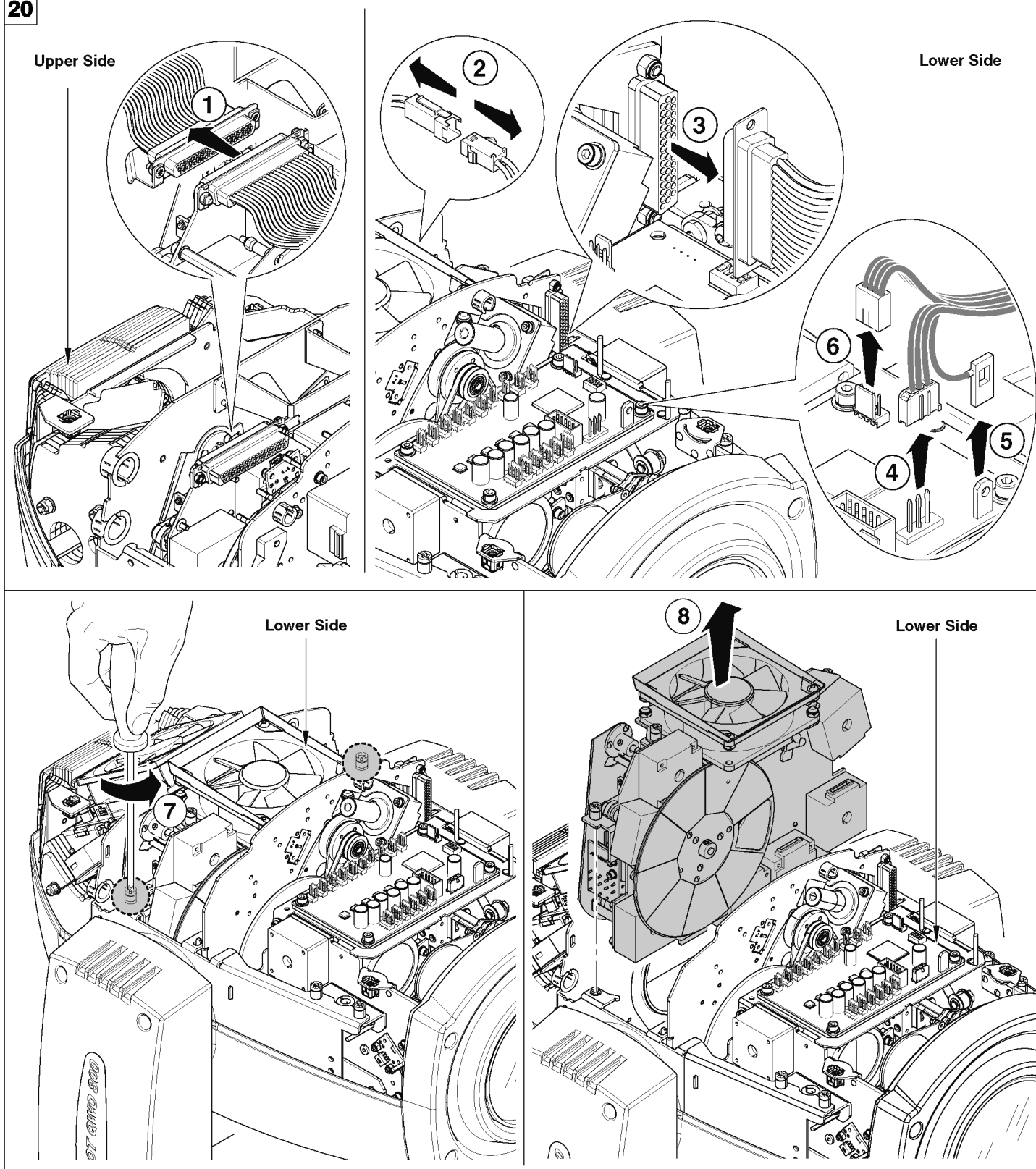
● Parts requiring frequent cleaning.

Periodical cleaning - Fig. 19

To ensure optimal operation and performance for a long time it is essential to periodically clean the parts subject to dust and grease deposits. The frequency with which the following operations are to be carried out depends on various factors, such as the amount of the effects and the quality of the working environment (air humidity, presence of dust, salinity, etc.).

Use a soft cloth dampened with any detergent liquid for cleaning glass to remove the dirt from the reflectors, from the lenses and filters. It is recommended that the projector undergoes an annual service by a qualified technician for special maintenance involving at least the following operations:

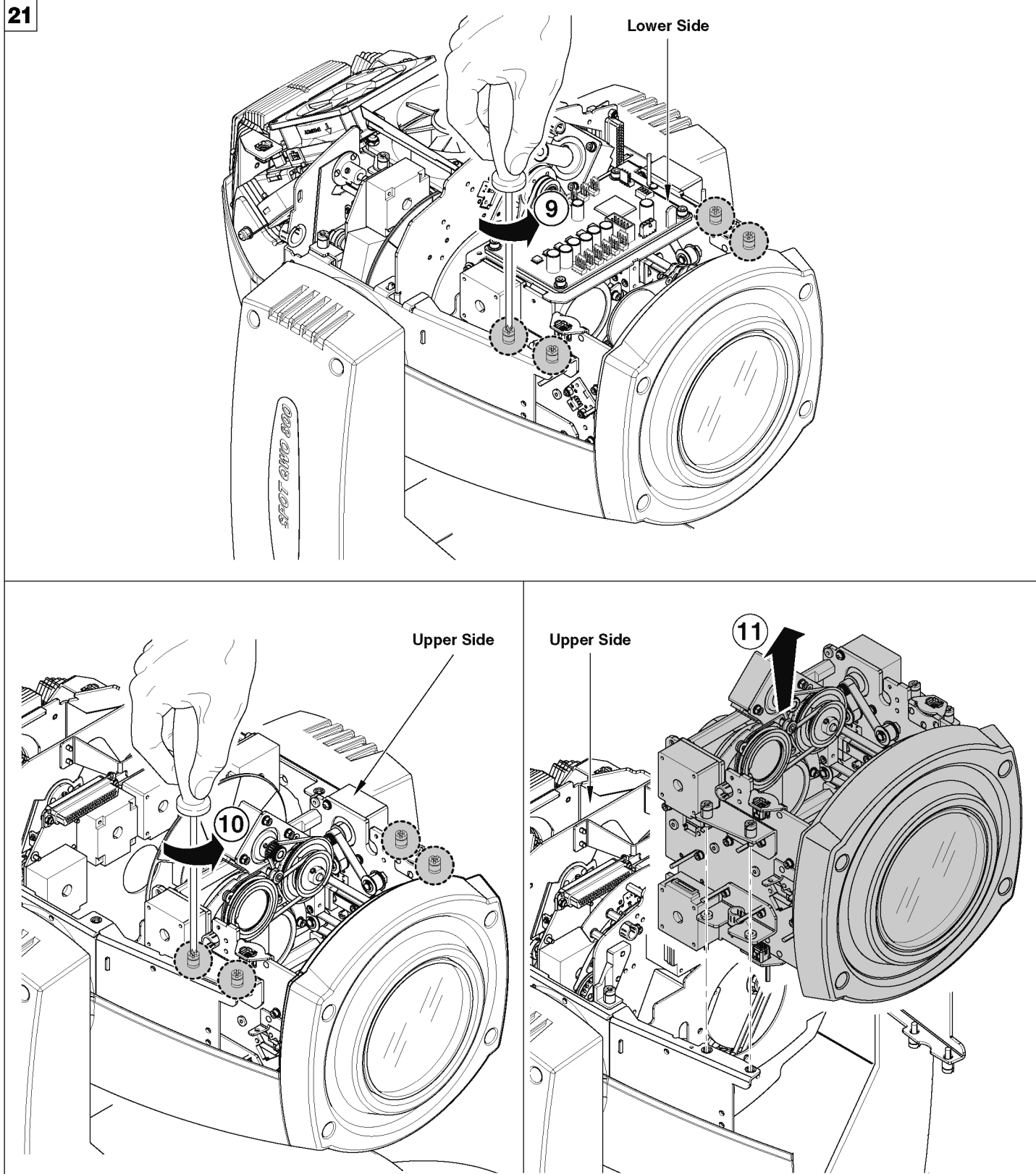
- General cleaning of internal parts.
- Restoring lubrication of all parts subject to friction, using lubricants specifically supplied by Clay Paky.
- General visual check of the internal components, cabling, mechanical parts, etc.
- Electrical, photometric and functional checks; eventual repairs.



Extraction of the effect modules - Fig. 20

IMPORTANT: Grasp the modules using the support structure and not the details which could get damaged.

Insertion of the effect modules: Repeat the operations indicated in Fig. 20, 21 and 22 in reverse order.

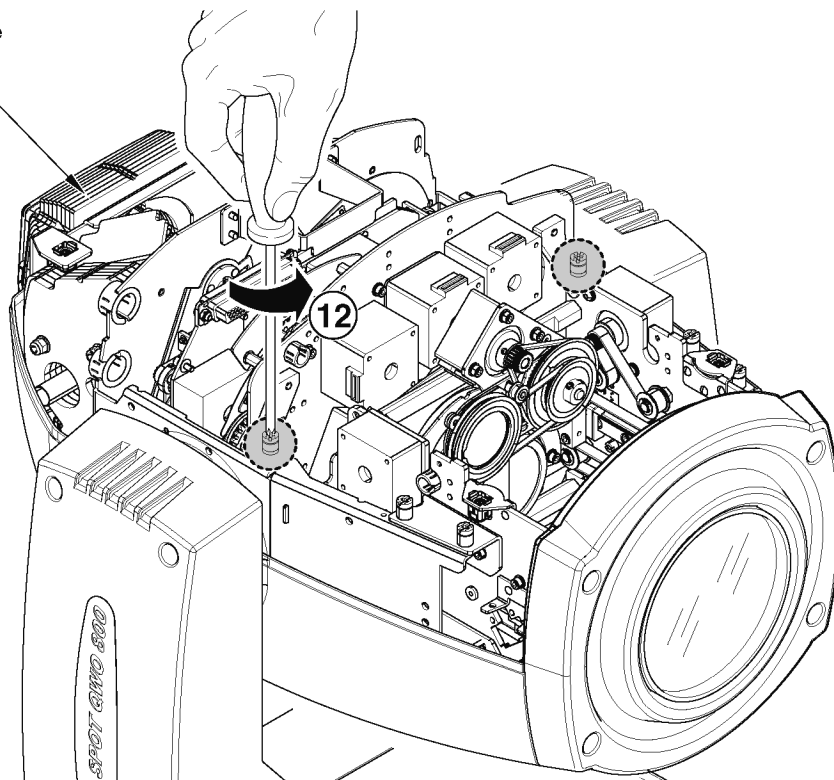


Extraction of the effect modules - Fig. 21

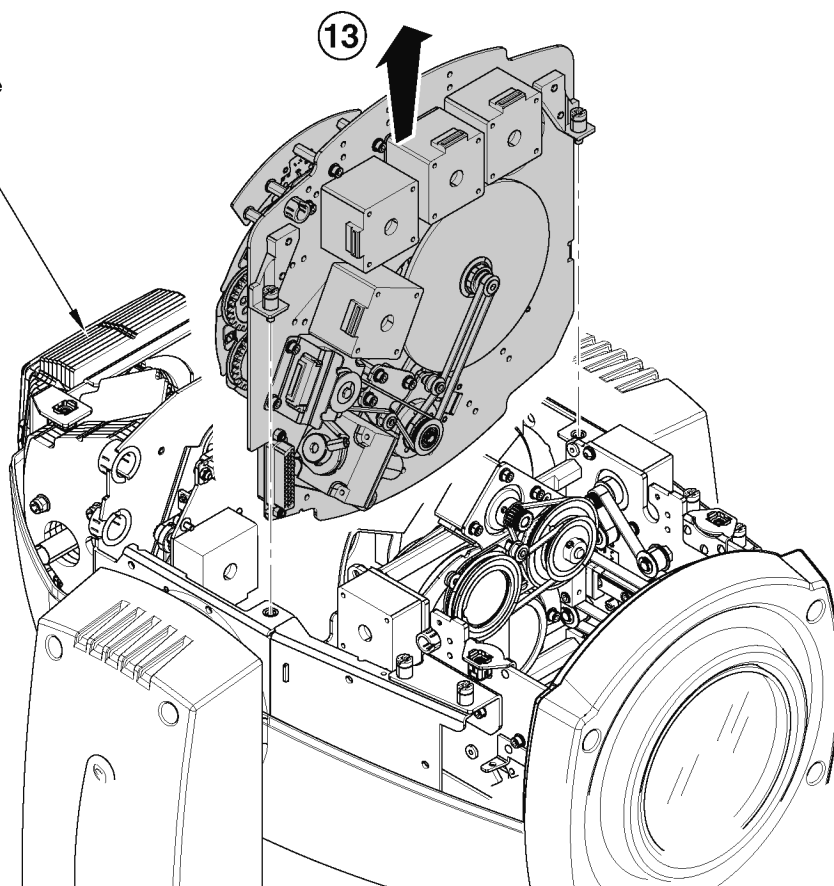
IMPORTANT: Grasp the modules using the support structure and not the details which could get damaged.

Insertion of the effect modules: Repeat the operations indicated in Fig. 20, 21 and 22 in reverse order.

Upper Side



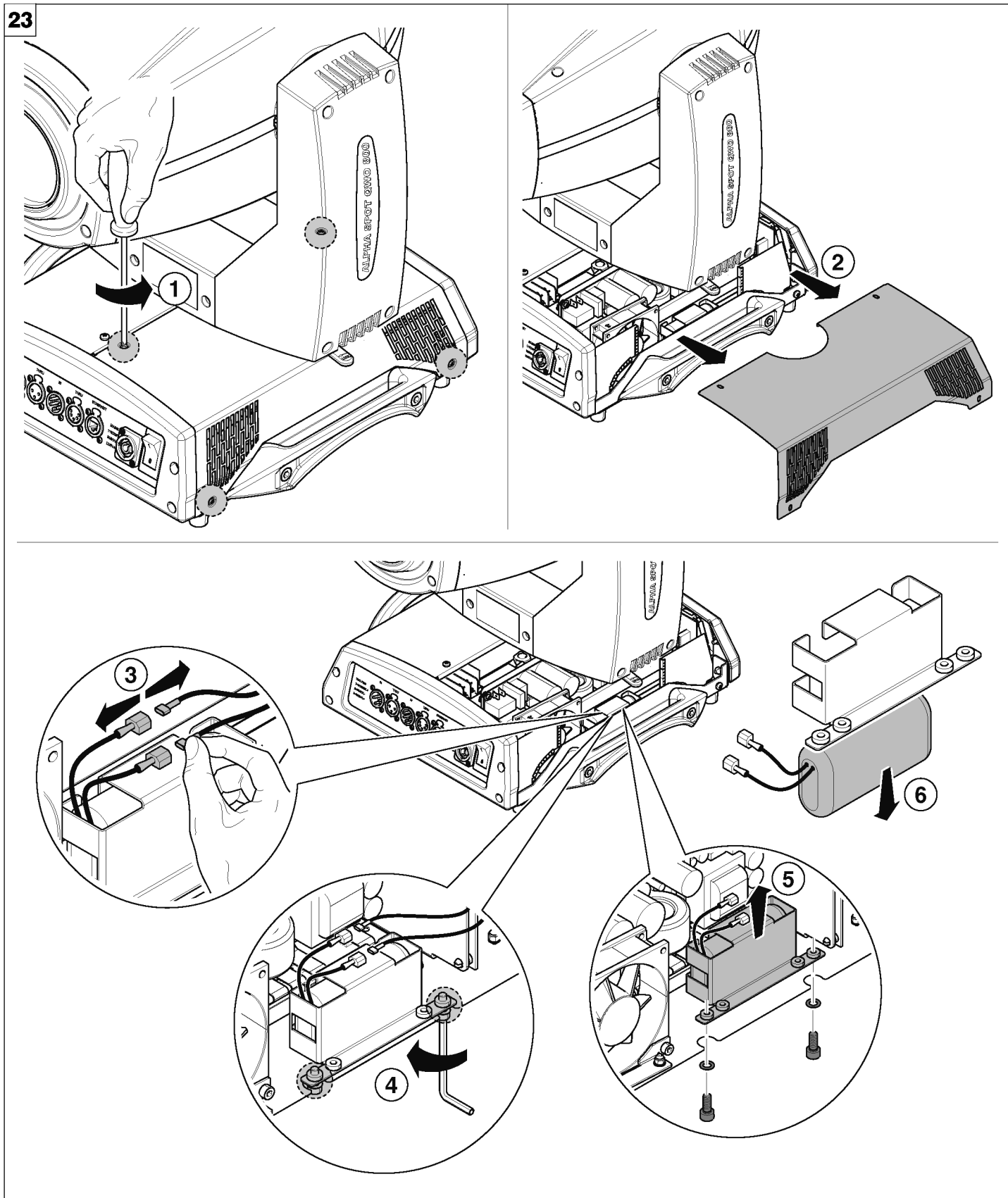
Upper Side



Extraction of the effect modules - Fig. 22

IMPORTANT: Grasp the modules using the support structure and not the details which could get damaged.

Insertion of the effect modules: Repeat the operations indicated in Fig. 20, 21 and 22 in reverse order.



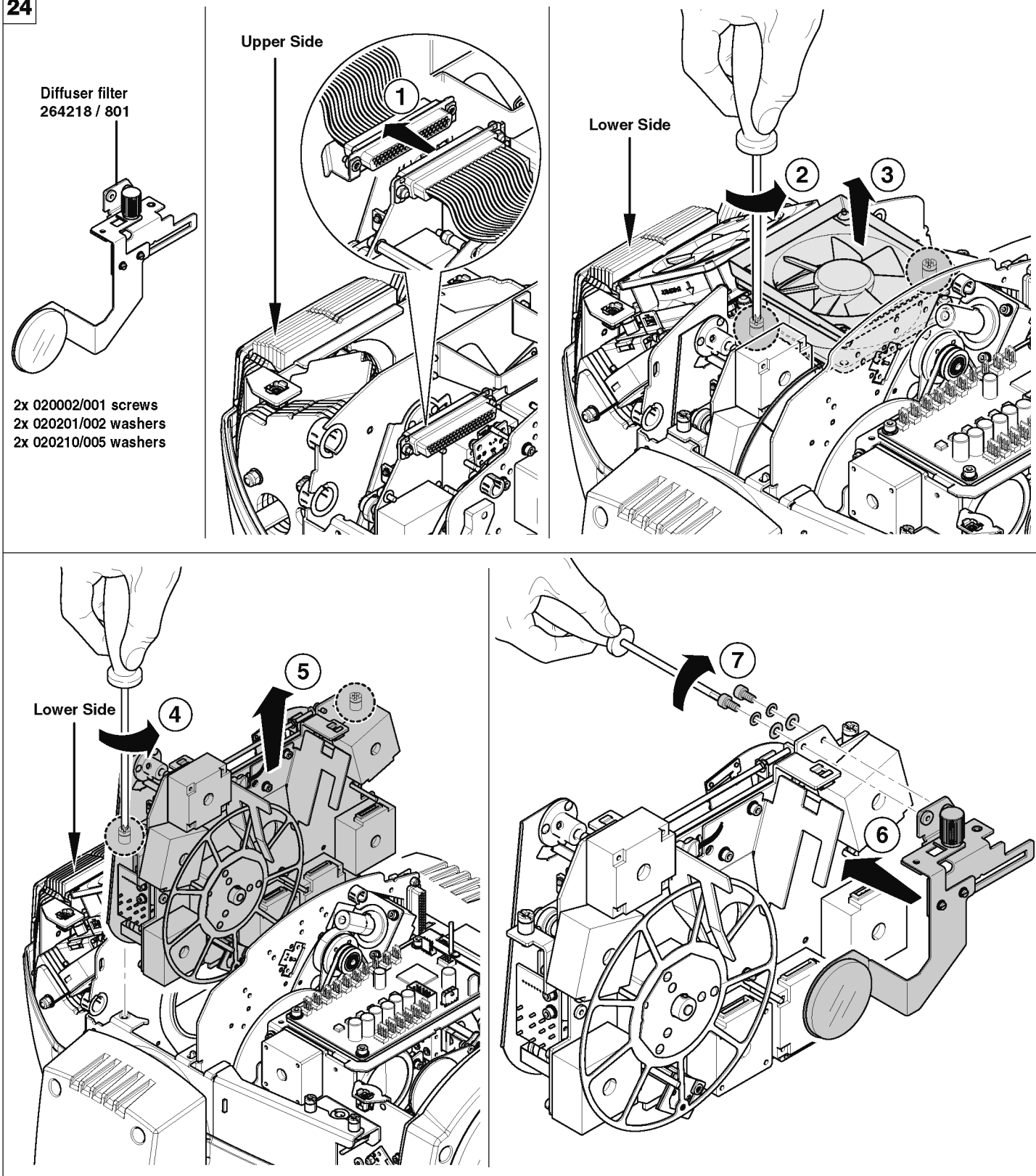
Battery removal - Fig. 23



LiFePO₄

This product contains a rechargeable lithium iron tetraphosphate battery. To preserve the environment, please dispose the battery at the end of its life according to the regulation in force.

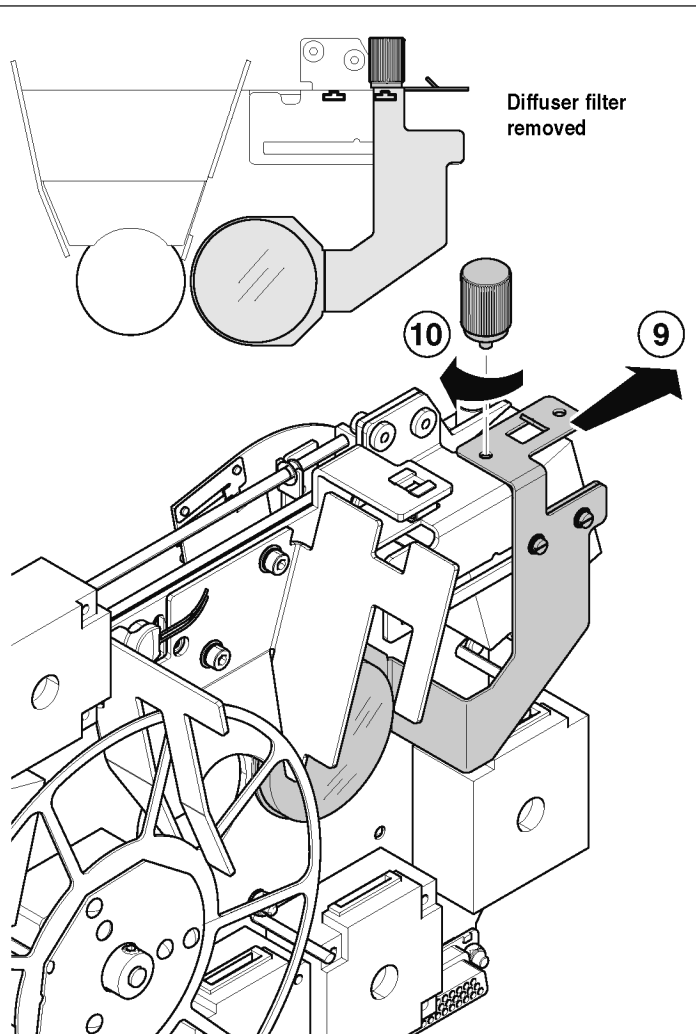
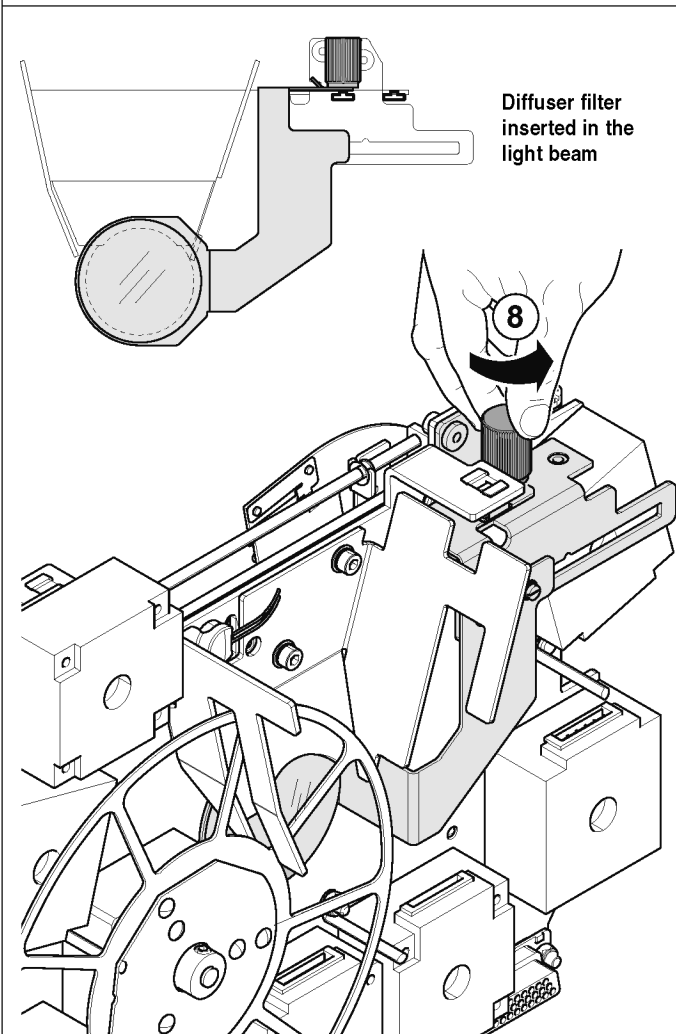
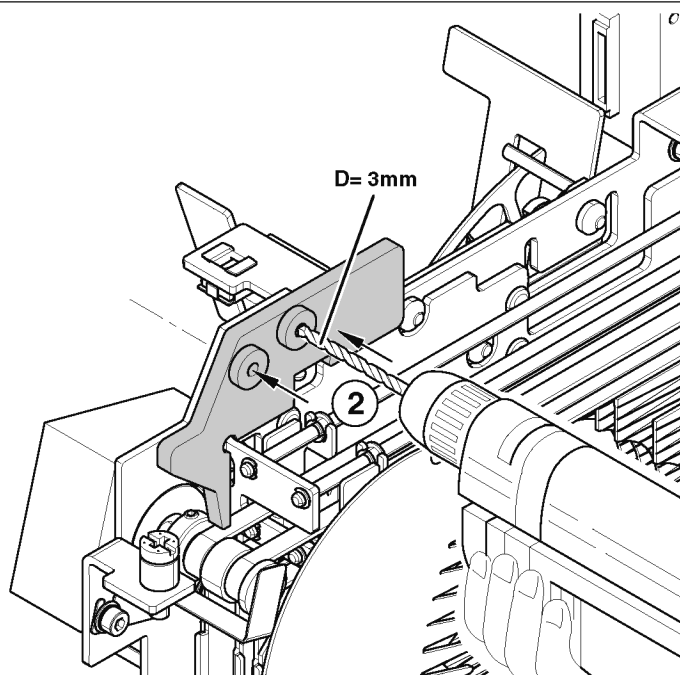
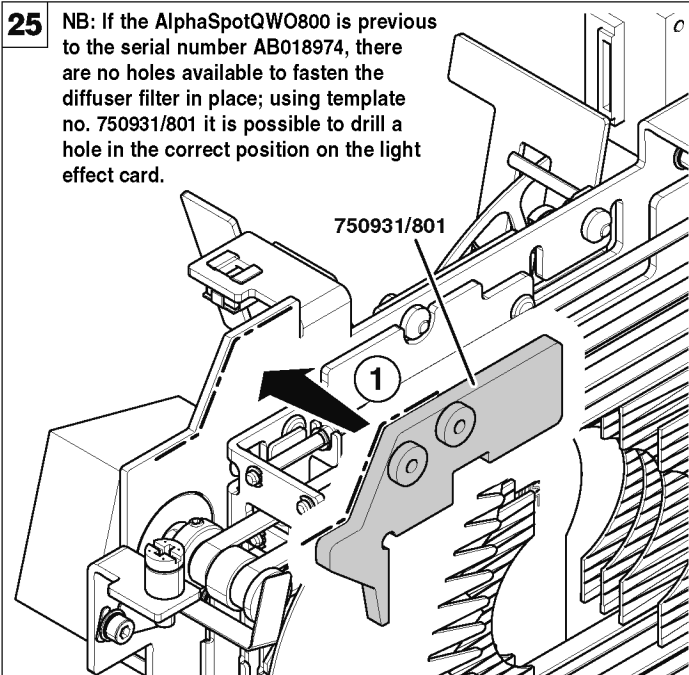
24



Assembling the diffuser filter - Fig. 24

The diffuser filter inserted in the light beam, improves the CMY – CTO and Dimmer projection mix; the light beam itself, with the diffuser filter inserted, loses about 25% of its luminosity.

25 NB: If the AlphaSpotQWO800 is previous to the serial number AB018974, there are no holes available to fasten the diffuser filter in place; using template no. 750931/801 it is possible to drill a hole in the correct position on the light effect card.



Assembling the diffuser filter - Fig. 25

The diffuser filter inserted in the light beam improves the CMY – CTO and Dimmer projection mix; the light beam itself, with the diffuser filter inserted, loses about 25% of its luminosity.

TECHNICAL INFORMATION

Power supplies available

100-120V 50/60Hz

200-240V 50/60Hz

Input power

1200VA a 230V 50Hz.

Total output

Spot QWO 800 & ST: Max 14.500 lumens.

Lamp:

Discharge lamp.

Type MSR Platinum 35 (L10105)

- Cap PGJX36

- Colour temperature 7750 K

- Luminous flux 54500 lm

- Average life 1000 h

- Any working position

Motors

23 stepper motors, operating with microsteps, totally microprocessor controlled.

Optical unit

Elliptic reflector with high luminous efficiency

Channels

Max 36 control channels.

Inputs

• DMX 512

• Ethernet

Moving head:

• Movement by means of two stepper motors, controlled by microprocessor.

• Automatic repositioning of PAN and TILT after accidental movement not controlled by control unit.

• Angle:

- PAN = 540°

- TILT = 240°

• Maximum speeds:

- PAN = 4.78 sec

- TILT = 2.33 sec

• Resolution:

- PAN = 2.11°

- PAN FINE = 0.008°

- TILT = 0.98°

- TILT FINE = 0.004°

IP20 protection rating

• Protected against the entry of solid bodies larger than 12mm (0.47").

• No protection against the entry of liquids.

Safety Devices

• Bipolar circuit breaker with thermal protection.

• Automatic break in power supply in case of overheating or failed operation of cooling system.

Cooling

Forced ventilation with axial fans.

Body

• Aluminium structure with die-cast plastic cover.

• Two side handles for transportation.

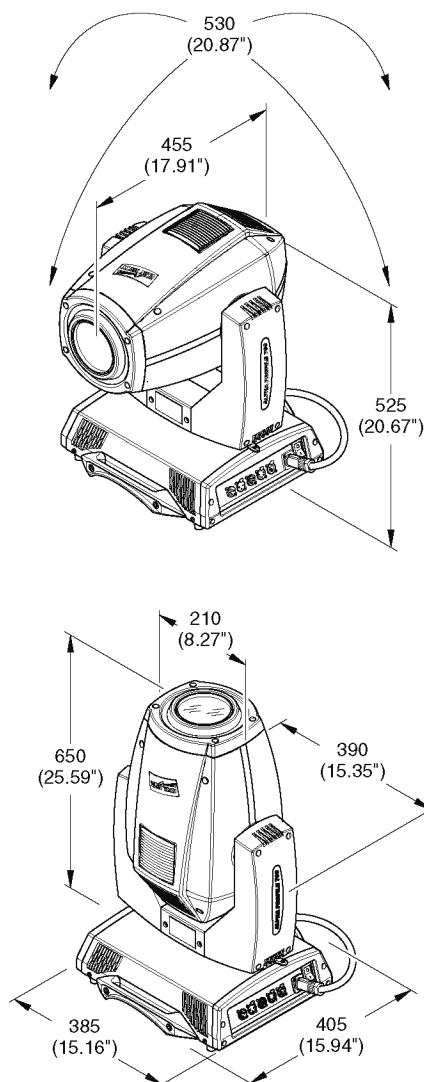
• Device locking PAN and TILT mechanisms for transportation and maintenance.

Working position

Working in any position.

Weight

about 30 Kg (66lbs).



CAUSE AND SOLUTION OF PROBLEMS

THE PROJECTOR WILL NOT SWITCH ON					PROBLEMS	
ELECTRONICS NON-OPERATIONAL						
DEFECTIVE PROJECTION						
REDUCED LUMINOSITY						
					POSSIBLE CAUSES	CHECKS AND REMEDIES
●				No mains supply.		Check the power supply voltage.
●		●		Lamp exhausted or defective.		Replace the lamp. (See instructions).
	●			Signal transmission cable faulty or disconnected.		Replace the cables.
	●			Incorrect addressing.		Check addresses (see instructions).
	●			Fault in the electronic circuits.		Call an authorised technician.
		●		Lenses or reflector broken		Call an authorised technician.
		●	●	Dust or grease deposited.		Clean (see instructions).

CHANNEL FUNCTION

ALPHA SPOT QWO 800 & "ST"

NB: To prevent accidental breakage of the effects, which could collide with each other during transport, before switching the projector OFF check that all the projector Channels have been excluded (DMX level = 0 bit.).

CHANNEL	CHANNEL MODE	
	STANDARD	VECTOR
1	CYAN	CYAN
2	MAGENTA	MAGENTA
3	YELLOW	YELLOW
4	CTO	CTO
5	COLOUR WHEEL	COLOUR WHEEL
6	MACRO COLORS	MACRO COLORS
7	STOP / STROBE	STOP / STROBE
8	DIMMER	DIMMER
9	DIMMER FINE	DIMMER FINE
10	IRIS	IRIS
11	STATIC GOBO CHANGE	STATIC GOBO CHANGE
12	ROTATING GOBO CHANGE	ROTATING GOBO CHANGE
13	GOBO ROTATION	GOBO ROTATION
14	GOBO FINE	GOBO FINE
15	PRISM INSERTION	PRISM INSERTION
16	PRISM ROTATION	PRISM ROTATION
17	FROST	FROST
18	ANIMATION DISK INSERTION	ANIMATION DISK INSERTION
19	ANIMATION DISK ROTATION	ANIMATION DISK ROTATION
20	FOCUS	FOCUS
21	FOCUS FINE	FOCUS FINE
22	ZOOM	ZOOM
23	AUTOFOCUS DISTANCE	AUTOFOCUS DISTANCE
24	AUTOFOCUS ADJUSTMENT	AUTOFOCUS ADJUSTMENT
25	MACRO EFFECTS	MACRO EFFECTS
26	PAN	PAN
27	PAN FINE	PAN FINE
28	TILT	TILT
29	TILT FINE	TILT FINE
30	FUNCTION	FUNCTION
31	RESET	RESET
32	LAMP CONTROL (with Option "Lamp DMX" ON)	LAMP CONTROL (with Option "Lamp DMX" ON)
33		PAN TILT TIME
34		COLOUR TIME
35		BEAM TIME
36		GOBO TIME

• STOPPER / STROBE - channel 7



BIT	EFFECT
252 - 255	OPEN
239 - 251	RANDOM FAST STROBE
226 - 238	RANDOM MEDIUM STROBE
213 - 225	RANDOM SLOW STROBE
208 - 212	OPEN
207	FAST PULSATION
108	SLOW PULSATION
104 - 107	OPEN
103	FAST STROBE (12 flash/sec)
4	SLOW STROBE (1 flash/sec)
0 - 3	CLOSED

• DIMMER - channel 8



BIT	EFFECT
255	
0	

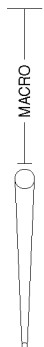
The lamp is linearly dimmed from full power to half power electronically and mechanically from half power to off.

• DIMMER FINE - channel 9



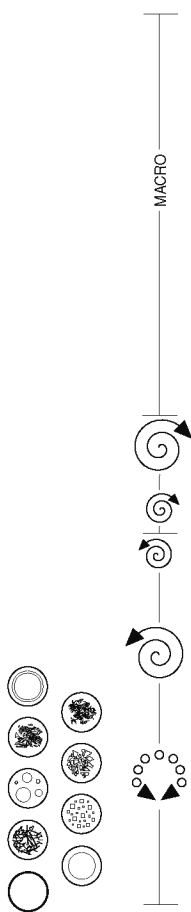
BIT	EFFECT
255	
0	

• IRIS - channel 10



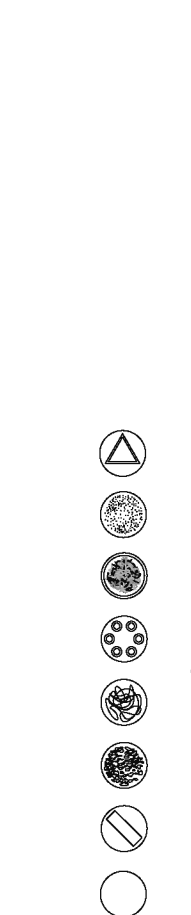
BIT	EFFECT
252 - 255	MAXIMUM APERTURE
251	FAST PULSATION, FAST CLOSING
212	SLOW PULSATION, FAST CLOSING
211	FAST PULSATION, FAST OPENING
172	SLOW PULSATION, FAST OPENING
171	FAST PULSATION
132	SLOW PULSATION
128 - 131	MAXIMUM APERTURE
0	MINIMUM APERTURE

• STATIC GOBO CHANGE - channel 11



BIT	EFFECT
255	GOBO 8 SHAKE, FAST SPEED
244	GOBO 8 SHAKE, SLOW SPEED
243	GOBO 7 SHAKE, FAST SPEED
232	GOBO 7 SHAKE, SLOW SPEED
231	GOBO 6 SHAKE, FAST SPEED
220	GOBO 6 SHAKE, SLOW SPEED
219	GOBO 5 SHAKE, FAST SPEED
208	GOBO 5 SHAKE, SLOW SPEED
207	GOBO 4 SHAKE, FAST SPEED
196	GOBO 4 SHAKE, SLOW SPEED
195	GOBO 3 SHAKE, FAST SPEED
184	GOBO 3 SHAKE, SLOW SPEED
183	GOBO 2 SHAKE, FAST SPEED
172	GOBO 2 SHAKE, SLOW SPEED
171	GOBO 1 SHAKE, FAST SPEED
160	GOBO 1 SHAKE, SLOW SPEED
159	FAST ROTATION (100 rpm)
118	SLOW ROTATION (5 rpm)
114 - 117	STOP
113	SLOW ROTATION (5 rpm)
72	FAST ROTATION (100 rpm)
64 - 71	GOBO 8
56 - 63	GOBO 7
48 - 55	GOBO 6
40 - 47	GOBO 5
32 - 39	GOBO 4
24 - 31	GOBO 3
16 - 23	GOBO 2
8 - 15	GOBO 1
0 - 7	WHITE

• ROTATING GOBO CHANGE - channel 12



BIT	EFFECT
255	GOBO 7 SHAKE, FAST SPEED
238	GOBO 7 SHAKE, SLOW SPEED
237	GOBO 6 SHAKE, FAST SPEED
220	GOBO 6 SHAKE, SLOW SPEED
219	GOBO 5 SHAKE, FAST SPEED
202	GOBO 5 SHAKE, SLOW SPEED
201	GOBO 4 SHAKE, FAST SPEED
184	GOBO 4 SHAKE, SLOW SPEED
183	GOBO 3 SHAKE, FAST SPEED
166	GOBO 3 SHAKE, SLOW SPEED
165	GOBO 2 SHAKE, FAST SPEED
148	GOBO 2 SHAKE, SLOW SPEED
147	GOBO 1 SHAKE, FAST SPEED
130	GOBO 1 SHAKE, SLOW SPEED
114-129	GOBO 7
98-113	GOBO 6
82-97	GOBO 5
65-81	GOBO 4
49-64	GOBO 3
33-48	GOBO 2
17-32	GOBO 1
0-16	WHITE

• GOBO ROTATION - channel 13

BIT	EFFECT
255	FAST ROTATION (180 rpm)
193	SLOW ROTATION (2,2 rph)
191 - 192	STOP
190	SLOW ROTATION (2,2 rph)
128	FAST ROTATION (180 rpm)
127	540° POSITION
105	450° POSITION
84	360° POSITION
63	270° POSITION
42	180° POSITION
21	90° POSITION
0	0° POSITION

• GOBO FINE - channel 14

BIT
255
127
0

• PRISM INSERTION - channel 15

BIT	EFFECT
255	PRISM INSERTED
128	
127	
0	PRISM EXCLUDED

• PRISM ROTATION - channel 16

BIT	EFFECT
255	FAST ROTATION (120 rpm)
193	SLOW ROTATION (3 rph)
191 - 192	STOP
190	SLOW ROTATION (3 rph)
128	FAST ROTATION (120 rpm)
127	POSITION 540°
105	POSITION 450°
84	POSITION 360°
63	POSITION 270°
42	POSITION 180°
21	POSITION 90°
0	POSITION 0°

• FROST - channel 17

BIT	EFFECT
255	FROST INSERTED
0	FROST EXCLUDED

• ANIMATION DISK INSERTION - channel 18

BIT	EFFECT
255	DISK INSERTED
0	DISK EXCLUDED

• ANIMATION DISK ROTATION - channel 19

BIT	EFFECT
255	FAST ROTATION (120 rpm)
131	SLOW ROTATION (4,4 rph)
125 - 130	STOP
124	SLOW ROTATION (4,4 rph)
0	FAST ROTATION (120 rpm)

• FOCUS - channel 20

BIT	EFFECT
255	NEAR
0	DISTANT

• FOCUS FINE -channel 21



BIT	EFFECT
255	NEAR
0	DISTANT

• ZOOM - channel 22



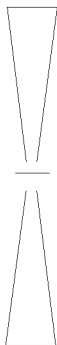
BIT	EFFECT
255	NARROW BEAM
0	WIDE BEAM

• AUTOFOCUS DISTANCE - channel 23

AUTOFOCUS priority:
1 - Rotating gobo
2 - Static gobo
3 - Iris

BIT	EFFECT
255	100 METRES
26	10 METRES
23	9 METRES
20	8 METRES
18	7 METRES
15	6 METRES
13	5 METRES
10	4 METRES
7	3 METRES
0-6	AUTOFOCUS OFF

• AUTOFOCUS ADJUSTMENT - channel 24



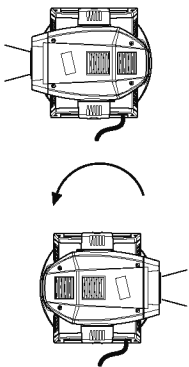
BIT	EFFECT
255	FOCUS FINE
128	
0	FOCUS FINE

• MACRO EFFECTS - channel 25

BIT	EFFECT
232-255	STAND BY BLACK
220-231	RANDOM MACRO 8
208-219	RANDOM MACRO 7
196-207	RANDOM MACRO 6
184-195	RANDOM MACRO 5
172-183	RANDOM MACRO 4
160-171	RANDOM MACRO 3
148-159	RANDOM MACRO 2
136-147	RANDOM MACRO 1
112-135	STAND BY BLACK
100-111	MACRO 8
88-99	MACRO 7
76-87	MACRO 6
64-75	MACRO 5
52-63	MACRO 4
40-51	MACRO 3
28-39	MACRO 2
16-27	MACRO 1
12-15	STAND BY BLACK
8-11	STAND BY
0-7	MACRO OFF

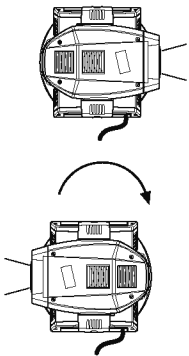
• PAN - channel 26

Operation with option InvertPan \diamond Off
(Tilt conventionally represented at 35 bit and option Invert Tilt \diamond Off)



BIT
255
0

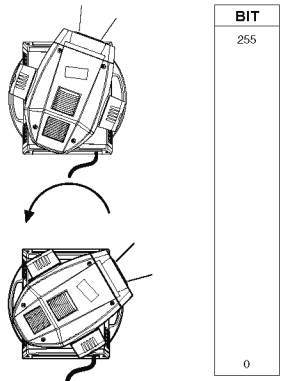
Operation with option InvertPan \diamond On
(Tilt conventionally represented at 35 bit and option Invert Tilt \diamond Off)



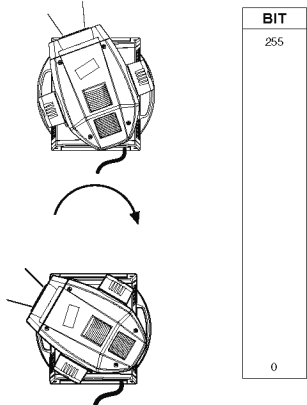
BIT
255
0

• PAN FINE - channel 27

Operation with option InvertPan ⬅ Off
(Tilt conventionally represented at 35 bit and option Invert Tilt ⬅ Off)

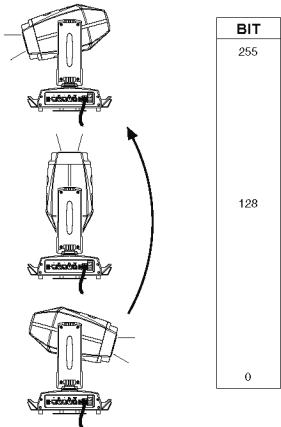


Operation with option InvertPan ⬅ On
(Tilt conventionally represented at 35 bit and option Invert Tilt ⬅ Off)

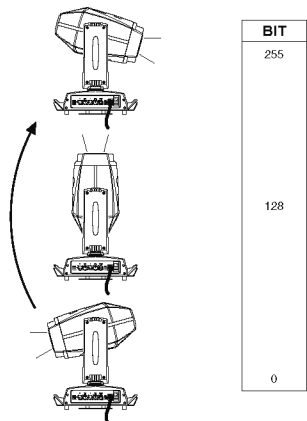


• TILT - channel 28

Operation with option Invert Tilt ⬅ Off
(Pan conventionally represented at 0 bit and option Invert Pan ⬅ Off)

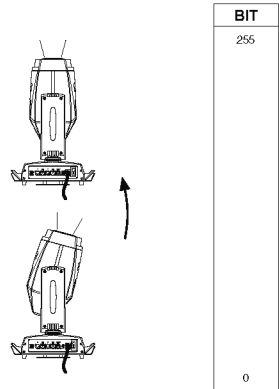


Operation with option Invert Tilt ⬅ On
(Pan conventionally represented at 0 bit and option Invert Pan ⬅ Off)

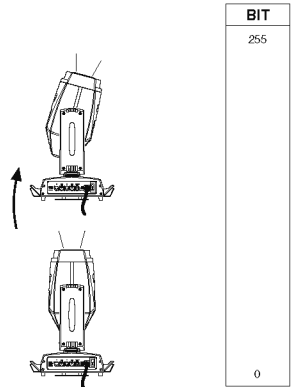


• TILT FINE - channel 29

Operation with option Invert Tilt ⬅ Off
(Pan conventionally represented at 0 bit and option Invert Pan ⬅ Off)



Operation with option Invert Tilt ⬅ On
(Pan conventionally represented at 0 bit and option Invert Pan ⬅ Off)



• FUNCTION - channel: 30

BIT	EFFECT
255	FREE
63	
51-62	
38-50	
25-37	
12-24	DIMMER CURVE FUNCTION
0-11	
12-24	PAN-TILT FUNCTION
0-11	

The functions are activated passing through the unused range and staying 5 seconds in necessary level

• RESET - channel: 31

BIT	EFFECT
255	COMPLETE RESET
128	COMPLETE RESET PAN / TILT RESET
127	
77	PAN / TILT RESET EFFECTS RESET
76	
26	EFFECTS RESET
25	
0	UNUSED RANGE

The functions are activated passing through the unused range and staying 5 seconds in necessary level

• LAMP CONTROL (only with option LAMP DMX On) - channel: 32

IMPORTANT: Alpha Spot QWO 800 is not provided with hot restrike igniter

BIT	EFFECT
255	LAMP ON (FULL POWER)
180	Lamp ignition after 5 s in full power levels. Immediate transition from halt to full power.
179	LAMP ON (FULL POWER)
101	FREE
100	LAMP OFF
26	LAMP OFF
2	LAMP OFF
0	UNUSED RANGE

The functions are activated passing through the unused range and staying 5 seconds in necessary level

TIMING CHANNELS

	Timing Channel	Channel function
33	Pan - Tilt time	Pan - Tilt - (Pan fine - Tilt fine)
34	Colour time	CMY - Colour wheel - CTO
35	Beam time	Dimmer - Frost - Iris - Focus - Zoom - Prism - Animation Disk
36	Gobo time	Static Gobo - Rotating Gobo Change

TIME TABLE

BIT	Seconds	BIT	Seconds	BIT	Seconds	BIT	Seconds	BIT	Seconds	BIT	Seconds
0	Full	43	8.6	86	24	129		172		216	170
1	0.2	44	8.8	87		130	41	173	58	217	
2	0.4	45	9	88		131		174		218	
3	0.6	46	9.2	89	25	132	42	175		219	180
4	0.8	47	9.4	90		133		176	59	220	
5	1	48	9.6	91	26	134	43	177		221	190
6	1.2	49	9.8	92		135		178	60	222	
7	1.4	50	10	93	27	136	44	179		223	
8	1.6	51	10.2	94		137		180	65	224	200
9	1.8	52	10.4	95		138		181		225	
10	2	53	10.6	96	28	139	45	182		226	
11	2.2	54	11	97		140		183	70	227	210
12	2.4	55		98	29	141	46	184		228	
13	2.6	56	12	99		142		185	75	229	
14	2.8	57		100		143		186		230	220
15	3	58	13	101	30	144	47	187		231	
16	3.2	59		102		145		188	80	232	230
17	3.4	60	14	103		146		189		233	
18	3.6	61		104	31	147	48	190	85	234	240
19	3.8	62	15	105		148		191		235	
20	4	63		106	32	149	49	192		236	
21	4.2	64	16	107		150		193	90	237	250
22	4.4	65		108	33	151	50	194		238	
23	4.6	66	17	109		152		195	95	239	260
24	4.8	67		110	34	153	51	196		240	
25	5	68	18	111		154		197	100	241	270
26	5.2	69		112	35	155	52	198		242	
27	5.4	70	19	113		156		199	110	243	280
28	5.6	71		114	36	157	53	200		244	
29	5.8	72	20	115		158		201	120	245	290
30	6	73		116	37	159	54	202		246	
31	6.2	74	21	117		160		203	130	247	300
32	6.4	75		118	38	161	55	204		248	
33	6.6	76	22	119		162		205	140	249	310
34	6.8	77		120	39	163	56	206		250	
35	7	78	23	121		164		207	150	251	
36	7.2	79		122	40	165	57	208		252	
37	7.4	80		123		166		209	160	253	
38	7.6	81		124		167		210		254	
39	7.8	82		125		168		211		255	Follow cue Data
40	8	83		126		169		212			
41	8.2	84		127		170		213			
42	8.4	85		128		171		214			
								215			

