



LIGHT TECHNOLOGY

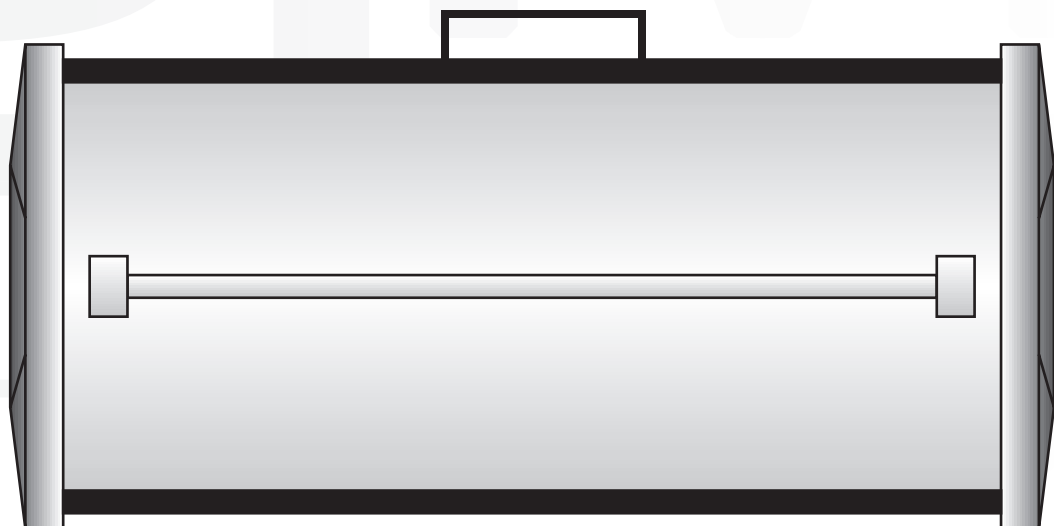


Flasher *DMX 1.5*

professional strobe projector

user manual

rel. 1.00



General warnings

Carefully read the warnings contained in this manual, since they supply important instructions concerning safety of installation, use and maintenance.

It is very important that this manual be kept with the equipment for future consultation.

In case of sale or transfer of the equipment to another user, ensure that this manual always accompanies the equipment to allow the new owner to obtain information about the operation and the relevant warnings.

- Not for residential use.
- After unpacking check the integrity of the equipment. In case of doubt, do not use the equipment, and contact an authorized SGM Technical Service Centre.
- The packaging materials (plastic bags, expanded polystyrene, nails, etc.) must be kept out of reach of children since they are potential sources of danger.
- This equipment may only be operated by adults. Do not allow children to tamper with the machine or play with the product.
- The electrical and mechanical work necessary for the installation of the equipment must be carried out by a qualified electrician or by a competent person.
- Before connecting the unit, check that the data on the registration plate is the same as that of the electrical grid.
- Avoid using the equipment:
 - in places subject to excessive humidity
 - in places subject to vibrations or knocks
 - in places with temperatures higher than 45°C or lower than 2°C
 - Protect the equipment from excessively humid conditions
(the optimum values are between 35 and 80%).
- Do not disassemble or modify the equipment.
- Prevent inflammable liquids, water or metallic objects from penetrating the equipment.
- In case of spilling liquid on the equipment, immediately disconnect the power supply of the mixer.
- The minimum distance between the projector and the surface to be illuminated must not be less than 1.5 m.
- In case of serious functioning problems, switch off the equipment and contact the nearest SGM retailer or the manufacturer directly for inspection.
- Avoid opening the equipment: there are no parts repairable by the user.
- Never try to repair the equipment alone. Repairs carried out by inexperienced persons may cause damage or serious malfunctioning. Contact the nearest authorised Technical Service Centre.

Always insist on original spare parts.

Protect the environment: do not throw the packaging in your dustbin, but return it to your retailer or take it to a collection point for special waste disposal.

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***Made in Italy by SGM Electronic
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Main features

SGM's new Flasher DMX 1.5 strobe unit is another result of the firm's lengthy experience in manufacturing this type of fixture. The quality and design philosophy are those which all SGM products have had in common for years and the sophisticated electronics used combined with ground-breaking performance earn it a rightful place at among the world's top products.

In-depth function study, an on-going search for innovative materials, technical updating and constant research aimed at ensuring even further safety have resulted in a truly unique product.

The mechanism and electronics were designed entirely by our in-house research labs, ensuring complete command of all know-how and an optimum quality:price ratio.

Like all other SGM products, the Flasher passed the firm's long trail period and strict tests brilliantly before being put on the market, ensuring high quality and reliability up to the firm's customary standards.

Particular care taken with the unit's looks and optimisation of the outer structure to ensure functionality enable the fixture to be easily installed in any position and ensure extremely rapid maintenance.

The Flasher is built in compliance with current CE norms

Lamp

The Flasher is fitted with a Xenon XOP15 lamp with exceptional luminous output optimized by electronic control.

Dimmer

The Flasher also has a dimmer function that enables flash power to be adjusted from zero to 100%.

Technical Specifications

Power required	90-260V, 50Hz, 60Hz - universal, automatic voltage changer
Lamp	1,500W - XOP15, special base
Power absorbed	400W
Reflector	Polished aluminium with high transmission factor
Electronics	Completely designed by SGM R&D lab engineers.
Main board	(CS 0218), input board (CS 0217) and IGBT controller board (CS 0228).
Settings	Via rotary dip switches for addressing the fixture's control channels.
Input	ch1 - dimmer / ch2 -strobe
Safety norms	Protected to IP20. Automatic power cut-off in the event of overheating or faulty cooling system operation.
Cooling	Forced ventilation via an axial fan.
Body	Sheet metal with epoxy powder finish
Mounting bracket	Steel metal with epoxy powder finish
Dimensions	49 x 21 x 17 cm. Weight: 5.6kg.

SGM Elettronica reserves the right to carry out improvements or modifications on its products without prior notice. Always consult the handbook of the unit being used to avoid errors and any difference between actual functions and handbook contents.

Positioning

To position the fixture, set the channels as follows:

Channel 1	dimmer	100% open
Channel 2	strobe	positioned at 128 (ref. scale 0÷255)

Position the fixture by turning it on the support bracket and locking in the required position using the bolts supplied.

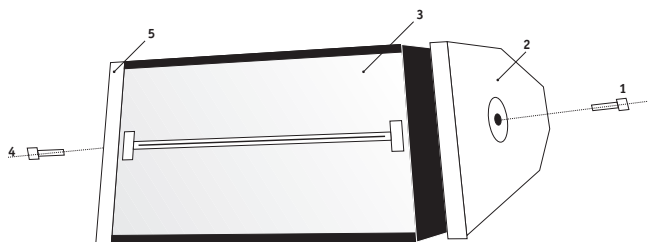
Flasher does not require focussing.

Trouble-free horizontal, vertical or tilted positioning is possible, provided sufficient space is left round the unit for air circulation.

Flasher DMX 1.5 maintenance

Access to internal components

The Flasher has a system for access to the fixture's internal components, which prevents accidental opening. To open the fixture, it must be dismantled from its operating position and disconnected from the mains supply: screw 1 can then be unscrewed. Once side panel 2 has been removed, the front glass (3) must be removed extremely carefully. If the fixture must be completely dismantled, screw 4 and side panel 5 must also be removed. The lamp and reflector can then be removed for access to the electronics.



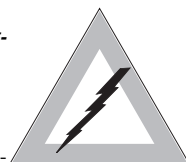
Fitting the lamp and re-lamping

ATTENTION: Before re-lamping, make certain that it's really necessary and disconnect the fixture's main power supply. If the unit has been used recently, wait for the lamp and mechanical parts to cool before opening (10 - 30 minutes).

Be very careful to avoid touching the reflector and the actual lamp with your bare hands, as any residue subject to high temperature burns, causing components to blacken, and definitively damages the lamp. Fit the new lamp carefully.

After re-lamping, it's always advisable to clean the fixture completely.

ATTENTION: THIS TYPE OF LAMP MUST ONLY BE REPLACED BY QUALIFIED PERSONNEL SUFFICIENTLY INFORMED ON RISKS AND METHODS OF OPERATION.



Cleaning the fixture / periodic checks

Cleaning the glass and reflector (inside and out) is decisive for the utmost luminous output and must be carried out periodically. Cleaning frequency depends

above all on the surroundings in which the unit is used: damp, smoky or dusty surroundings in particular favour a greater build-up of dirt on the unit's glass.

Clean using a soft cloth and normal glass cleaning products or methylated spirits, always being certain to dry the parts. Clean the outside of the glass at least every 15/20 days and the inner group at least every 40/60 days.

To ensure utmost fixture efficiency, it's advisable to carry out a general periodic check-up every 700 running hours. Electrical and mechanical components must be checked by qualified technical personnel.

Switching the fixture on / fixture status

The Flasher doesn't have a manual switch for turning it on. In fact its special electronics check the DMX signal line continually and only turn on the fixture when the control signal is sent.

In particular, when channel 2 (see further ahead) is set at 0 (zero), the fixture automatically goes into stand-by.

The power supply connector is used as a local cut-out. The red pilot light below the connector indicates that there is voltage on the in-coming power line.

The green "DMX OK" LED indicates that the connection of the DMX network is operating and the signal matches protocol specs.

The red "SYSTEM FAILURE" LED lights up when the lamp doesn't light up, in spite of the DMX command. Striking lasts for a very short period (approx. 1 sec.).

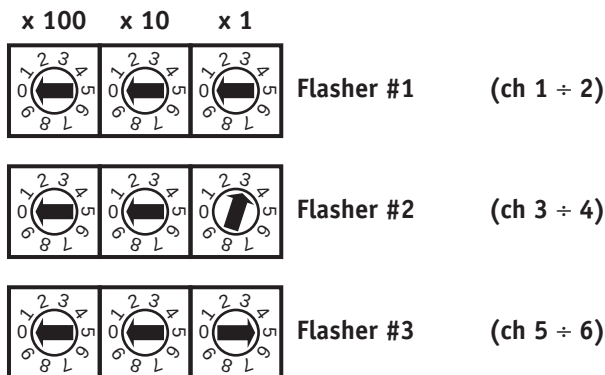
In this case, call the nearest assistance centre, disconnect the fixture from the mains supply and carry out a check.

Start addresses

When connecting, each fixture must be appropriately configured.

The start address is set using the rotary dip switch located on the rear of the fixture. The address can be changed even when the fixture is on.

The lowest start address is 001. When 000 is used as the address, as in the following example, the Flasher's built-in computer uses 001 anyway.



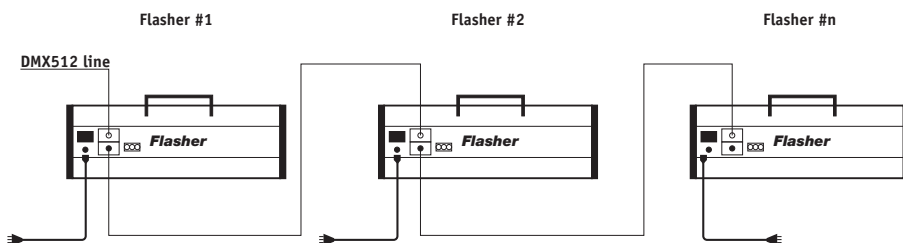
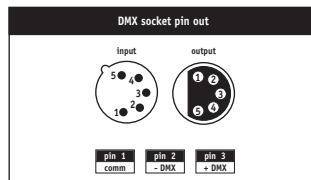
Connecting the Flashers

The fixture has DMX 512 input/output.

For connection, always use quality balanced microphone cables such as RF 60/12 2x0.25mm² or similar to avoid faulty fixture operation.

To reduce interference, it may be necessary to fit the last fixture in the DMX chain with a system terminator, made using a 120Ohm 1/4W resistor between pins 2 and 3 on the DMX connector.

Attention: the cable screen (sheath) must NEVER be connected to the system's ground as this would cause faulty fixture and controller operation.



Control channels

ch 1

dimmer

Channel 1 allows linear control of luminous intensity from zero to 100%.

When channel 2 (strobe) is set at 0 (zero), channel 1 enables **SINGLE SHOOT** use.

In this case, a single flash is given at the power required by the operator: it's sufficient to use the channel 1 slider on the desk or the controller starting from 0 and stopping at the value of the required scale (parameter 0÷10, 0÷255 or 0÷100, according to the controller used).

When the value of channel 1 or channel 2 is 0 (zero), the fixture automatically goes into standby: the Flasher doesn't in fact have a power switch, which is replaced by the control electronics.

ch 2

strobe

Channel 2 allows the flash rate of the Flasher to be regulated continuously.

The range goes from zero to 50 flashes per second, i.e. from off to continuous light.

When channel 1 or channel 2 are set at 0 (zero) the fixture automatically goes into standby: the Flasher doesn't in fact have a power switch, which is replaced by the control electronics.

Setting the strobe at 0 (zero), enables **SINGLE SHOOT** use (see channel 1 - dimmer).



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