

# Sunstrip Active DMX ORDERCODE 30710



#### Congratulations!

You have bought a great, innovative product from Showtec.

The Showtec Sunstrip Active DMX brings excitement to any venue. Whether you want simple plug-&-play action or a sophisticated DMX show, this product provides the effect you need.

You can rely on Showtec, for more excellent lighting products.

We design and manufacture professional light equipment for the entertainment industry.

New products are being launched regularly. We work hard to keep you, our customer, satisfied.

For more information: iwant@showtec.info

You can get some of the best quality, best priced products on the market from Showtec. So next time, turn to Showtec for more great lighting equipment.

Always get the best -- with Showtec!

Thank you!



# Showtec

# Showtec Sunstrip Active DMX™ Product Guide

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# WARNING



#### **CAUTION!**

Keep this device away from rain and moisture! Unplug mains lead before opening the housing!



# FOR YOUR OWN SAFETY, PLEASE READ THIS USER MANUAL CAREFULLY BEFORE YOUR INITIAL START-UP!

#### SAFETY INSTRUCTIONS

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

- be qualified
- follow the instructions of this manual



CAUTION! Be careful with your operations.

With a dangerous voltage you can suffer a dangerous electric shock when touching the wires!



Before your initial start-up, please make sure that there is no damage caused by transportation. Should there be any, consult your dealer and do not use the device.

To maintain perfect 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 manual.

Please consider that damages caused by manual modifications to the device are not subject to warranty.

This device contains no user-serviceable parts. Refer servicing to qualified technicians only.

#### **IMPORTANT:**

The manufacturer will not accept liability for any resulting damages caused by the non-observance of this manual or any unauthorized modification to the device.

- Never let the power-cord come into contact with other cables! Handle the power-cord and all connections with the mains with particular caution!
- Never remove warning or informative labels from the unit.
- Never use anything to cover the ground contact.
- Never run the device without lamp!
- Never ignite the lamp if the objective-lens or any housing-cover is open, as discharge lamps may expose and emit a high ultraviolet radiation, which may cause burns.
- Never lift the fixture by holding it at the projector-head, as the mechanics may be damaged. Always hold the fixture at the transport handles.
- Never look directly into the light source.
- Never leave any cables lying around.
- Do not insert objects into air vents.
- Do not connect this device to a dimmerpack.
- Do not switch the device on and off in short intervals, as this would reduce the lamp's life.
- Do not touch the device's housing bare-handed during its operation (housing becomes very hot).
- Do not shake the device. Avoid brute force when installing or operating the device.
- Only use device indoor, avoid contact with water or other liquids.
- Only operate the fixture after having checked that the housing is firmly closed and all screws are tightly fastened.

- Only operate the device after having familiarized with its functions.
- Avoid flames and do not put close to flammable liquids or gases.
- Always replace the lamp, when it is damaged or deformed due to the heat.
- Always keep case closed while operating.
- Always allow free air space of at least 50 cm around the unit for ventilation.
- Always disconnect power from the mains, when device is not used, before cleaning or when
  replacing lamp! Only handle the power-cord by the plug. Never pull out the plug by tugging the
  power-cord.
- Make sure that the device is not exposed to extreme heat, moisture or dust.
- Make sure that the available voltage is not higher than stated on the rear panel.
- Make sure that the power-cord is never crimped or damaged. Check the device and the power-cord from time to time.
- If the lens is obviously damaged, it has to be replaced. So that its functions are not impaired, due to cracks or deep scratches.
- If device is dropped or struck, disconnect mains power supply immediately. Have a qualified engineer inspect for safety before operating.
- If the device has been exposed to drastic temperature fluctuation (e.g. after transportation), do not switch it on immediately. The arising condensation water might damage your device. Leave the device switched off until it has reached room temperature.
- If your Showtec device fails to work properly, discontinue use immediately. Pack the unit securely (preferably in the original packing material), and return it to your Showtec dealer for service.
- For adult use only. The device must be installed out of the reach of children. Never leave the unit running unattended.
- For replacement use lamps and fuses of same type and rating only.
- Allow time to cool down, before replacing lamp.
- This device falls under protection class I. Therefore it is essential to connect this device to earth.
- During the initial start-up some smoke or smell may arise. This is a normal process and does not necessarily mean that the device is defective.
- Repairs, servicing and electric connection must be carried out by a qualified technician.
- WARRANTY: Till one year after date of purchase.



CAUTION! EYEDAMAGES!.

Avoid looking directly into the light source.

(meant especially for epileptics)!



#### **OPERATING DETERMINATIONS**

This device is not designed for permanent operation. Consistent operation breaks will ensure that the device will serve you for a long time without defects.

The minimum distance between light-output and the illuminated surface must be more than 1.3 meter.

The maximum ambient temperature  $t_a$  must never be exceeded.

If this device is operated in any other way, than the one described in this manual, the product may suffer damages and the warranty becomes void.

Any other operation may lead to dangers like short-circuit, burns, electric shock, lamp explosion, crash etc. You endanger your own safety and the safety of others!

# Rigging

Please follow the European and national guidelines concerning rigging, trussing and all other safety issues.

Do not attempt the installation yourself!

Always let the installation be carried out by an authorized dealer!

#### Procedure:

- If the Sunstrip is lowered from the ceiling or high joists, professional trussing systems have to be used
- Use a clamp to mount the Sunstrip, with the mounting-bracket, to the trussing system.
- The Sunstrip must never be fixed swinging freely in the room.
- The installation must always be secured with a safety attachment, e.g. an appropriate safety net or safety-cable.
- When rigging, derigging or servicing the Sunstrip, always make sure, that the area below the installation place is blocked and staying in the area is forbidden.

Improper installation can cause serious damage to people and property!

#### Connection with the mains

Connect the device to the mains with the power-plug.

Always pay attention, that the right color cable is connected to the right place.

Cable	Pin	International
BROWN	FASE	L
BLUE	NUL	N
YELLOW/GREEN	EARTH	<u></u>

Make sure that the device is always connected properly to the earth!

# **Description of the device**

#### **Features**

The Showtec Sunstrip Active DMX is a light effect with high output and great effects.

- DMX-control via standard DMX-controller
- 1, 2, 5 or 10 DMX-control channels required depending on your setup
- 16 built-in programs subject to Speed and Dimmer, except for Auto & Full
- 0-100% dimming level
- 01 –99 Chase speed adjustment
- Power Failure Memory
- Fuse Protection
- Powercon in- and output
- · Mounting/Floor brackets included
- Built-in Dimmerpack
- 10x Showtec Lamp 240V/75W GU10 (82382) Included!
- Fuse T6.3A / 250V

#### Overview



Fig. 1

1) 10x Showtec Lamp 240V/75W GU10 (82382)

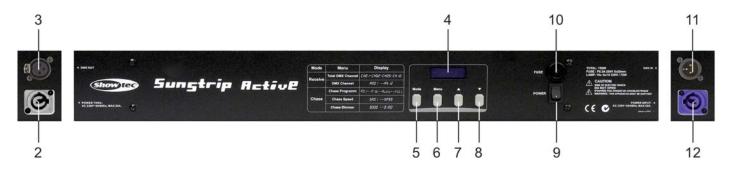


Fig. 2

- 2) Power Thru (Grey): This connector sends the power to the next unit (Max 20A).
- 3) DMX signal connector (OUT): This connector sends the DMX signal to the next unit.
- 4) LED Display
- 5) Mode Button
- 6) Menu Button
- 7) Up Button
- 8) Down Button
- 9) Power On/Off
- 10) Fuse; 6,3A 250V 5\*20mm
- 11) DMX signal connector (IN): This connector accepts the DMX input signal.
- 12) Power Input (Blue): This connector is the input power for this unit (Max 20A).

#### Installation

# Installing the Lamp

The Showtec Sunstrip Active uses the 240V/75W GU10 (82382) bulb as manufactured by all popular manufacturers. Use only the appropriate lamp for your unit. 10 Lamps included.

Note that, product versions that use other lamps, may be offered in the future. Check your product specification label for information.

Always disconnect from electric mains power supply before changing lamps.

The lamp has to be replaced when it is damaged or deformed due to the heat.

**Do not install lamps with a higher wattage!** Lamps with a higher wattage generate temperatures the device was not designed for.

Damages caused by non-observance are not subject to warranty.

#### Procedure:

- **1.** Loosen the 4 screws on the front of the housing.
- 2. Gently remove the metal housing.
- **3.** Read lamp instructions. Do not touch the lamp bulb glass. Push and turn the lamp Counter Clockwise and remove the lamp. Oil on hands shortens the lamp life. (If you touch the bulb glass, wipe off the glass with a clean, lint-free towel and rubbing alcohol.).
- **4.** Insert the lamp pins into the small holes in the lamp socket,. Push and turn Clockwise to install the lamp. Do the same for the remaining lamps.
- 5. Put the metal housing back and fasten the screws snugly.



Fig. 3

# **Set Up and Operation**

Follow the directions below, as they pertain to your preferred operation mode.

Before plugging the unit in, always make sure that the power supply matches the product specification voltage. Do not attempt to operate a 120V specification product on 230V power, or vice versa.

## **One Sunstrip Active**

- 1. Fasten the effect light onto firm trussing (Use a 30-kg rated or stronger C-clamp fastened onto the Sunstrip Active ). Leave at least 1 meter on all sides for air circulation.
- **2.** Plug one end of the electric mains power cord into the IEC socket on the unit. Then plug the other end of the cord into a proper electric power supply socket.

# **Multiple Sunstrip Active**

- **1.** Fasten the effect light onto firm trussing (Use a 30-kg rated or stronger C-clamp fastened onto the Sunstrip Active). Leave at least 1 meter on all sides for air circulation.
- **2.** Use a 3-p XLR cable to connect the Sunstrip Active's.

The pins:



- 1. Earth
- 2. Signal -
- 3. Signal +
- **3.** Link the units as shown in (figure 6), Connect a DMX signal cable from the first unit's DMX "out" socket to the second unit's "in" socket. Repeat this process to link the second, third, and fourth units.
- **4.** Supply electric power: Plug electric mains power cords into each unit's Blue socket, then plug the other end of the mains power cord into proper electric power supply sockets, starting with the first unit. Do not supply power before the whole system is set up and connected properly.

# **Multiple Sunstrip Active DMX Set Up**

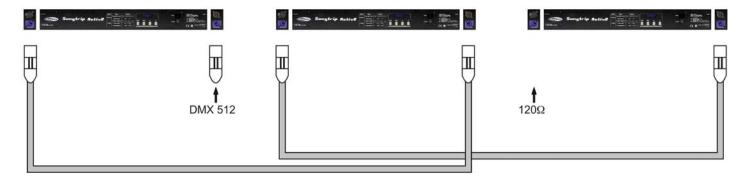


Fig. 6

Note: Link all cables before connecting electric power

# **Operation Modes**

The Sunstrip Active has 2 different operating modes:

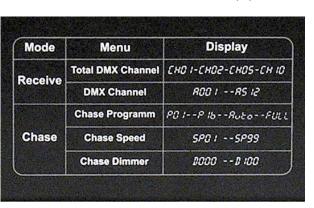
- 10 Channel Chaser (P)
- 1, 2, 5 or 10 Channel DMX Dimmer (A)

In DMX Mode, you can select:

- DMX Address (A)
- Channel (CH)

In Chase Mode, you can select:

- Chase Program (P), Auto, Full
- Chase Dimmer (d)
- Chase Speed (SP)



# **DMX Mode**

You can only use this mode when you are using the device as a DMX Dimmer. This function allows you to set your device as a 1, 2, 5 or 10 Channel DMX Dimmer.

#### **Selecting DMX Mode**

DMX mode is indicated by an "A" followed by 3 digits in the LED Display. "A" means DMX Address and shows the DMX Mode has been activated. If the Display shows "P", means you are in Chase Mode. You can switch between the 2 modes by pushing the MODE Button.



#### **Selecting Channel Mode**

Channel mode is indicated by an "CH" followed by 2 digits (01, 02, 05 or 10) in the LED Display.

You cannot use the MENU Button to select the Channel Mode, unless you have selected the DMX Operation Mode as in Step 1.



#### **Setting the Channel Value**

Once you have activated the Channel Mode, you can push the UP or DOWN button to change the setting from 01, 02, 05 or 10.

- 1) When CH:01 is shown in the display, all channels will be controlled by one DMX Channel.
- 2) When CH:02 is shown in the display, Channel 1 and 2 will be controlled by one DMX Channel, Channel 3 and 4 will be controlled by one DMX Channel, ...., Channel 9 and 10 will be controlled by one DMX Channel. You have a total of 5 DMX Channels available.
- **3)** When CH:05 is shown in the display, Channel 1-5 will be controlled by one DMX Channel and Channel 6-10 will be controlled by the other DMX Channel.
- 4) When CH:10 is shown in the display, each channel will be controlled by one DMX Channel.

Note: Default is CH:10; this means 10 DMX Channels, so every light is individually controllable.



#### **Selecting DMX Address Mode**

DMX mode is indicated by an "A" followed by 3 digits (001-512) in the LED Display.



#### **Setting the DMX Address**

Once you have activated the DMX Mode, you can push the UP or DOWN button to change the setting from 001-512.



# **CHASE Mode**

You can only use this mode when you are using the device as a Chaser. The unit has 16 built-in programs except for Auto and Full. You can select any of these programs to create a chase for a lightshow. You can also control the speed at which the programs will be chasing.

#### **Selecting the Chase Mode**

Chase mode is indicated by a "P" followed by 2 digits (01-16) in the LED Display. "P" means Chase Mode and shows the Chase Mode has been activated. If the Chase Mode has been activated, the Chase program Mode starts and is the Default setting.



# **Setting the Chase Program**

Once you have activated the Chase Mode, you can push the UP or DOWN button to change the setting from 01-16. The Chase pattern is shown by a "**P**" in the display and further by 01-16, AUTO or FULL.

You can select any of these settings to run at a single time.



#### **Selecting the Chase Speed**

To adjust the Chase Speed, you must activate the Chase Speed Mode. Press the MENU Button until the display shows "SP" followed by 2 digits.



#### **Setting the Chase Speed**

In this Mode, you can adjust the Program Chase Speed. Use the UP or DOWN button to change the setting from 01-99. A value of 01 means the slowest chase speed of approximately once every 30 sec. A value of 99 means the fastest chase speed of approximately 0.1 sec.



# Selecting the Intensity (Dimming) Mode

To adjust the output intensity, you must activate the Chase Dimmer Mode. Hold the MENU button until the display shows "d" followed by 2 digits



#### **Setting the Intensity**

Use the UP or DOWN button to change the setting from 00-100. A value of 000 means the weakest output intensity and a value of 100 means the highest output.



#### Auto

The Sunstrip will play all built-in programs, one after the other.



#### Full

All 10 lights on the Sunstrip will light up and stay on at 100%.



#### Maintenance

The operator has to make sure that safety-relating and machine-technical installations are to be inspected by an expert after every four years in the course of an acceptance test.

The operator has to make sure that safety-relating and machine-technical installations are to be inspected by a skilled person once a year.

The following points have to be considered during the inspection:

- **1.** All screws used for installing the device or parts of the device have to be tightly connected and must not be corroded.
- 2. There may not be any deformations on housings, fixations and installation spots.
- 3. Mechanically moving parts like axles, eyes and others may not show any traces of wearing.
- **4.** The electric power supply cables must not show any damages or material fatigue.

The Showtec Sunstrip Active requires almost no maintenance. However, you should keep the unit clean. Otherwise, the fixture's light-output will be significantly reduced. Disconnect the mains power supply, and then wipe the cover with a damp cloth. Do not immerse in liquid. Do not use alcohol or solvents. The device will require monthly cleaning with a soft brush, as smoke-fluid tends to build up residues,

reducing the light-output very quickly.

Please clean internal components once a year with a light brush and vacuum cleaner.

Keep connections clean. Disconnect electric power, and then wipe the DMX and audio connections with a damp cloth. Make sure connections are thoroughly dry before linking equipment or supplying electric power.

#### Changing the Lamp

- **1.** Disconnect mains power supply, and allow 15 minutes to cool down. Loosen the 4 screws on the front of the housing.
- 2. Gently remove the metal housing.
- 3. Follow directions for installing a new lamp, page 6.

#### Replacing a Fuse

Power surges, short-circuit or inappropriate electrical power supply may cause a fuse to burn out. If the fuse burns out, the product will not function whatsoever. If this happens, follow the directions below to do so.

- **1.** Unplug the unit from electric power source.
- 2. Insert a flat-head screwdriver into the slot in the fuse cover. Turn the screwdriver to the left, at the same time gently push a bit (Turn and Push). The fuse will come out.
- 3. Remove the used fuse. If brown or unclear, it is burned out.
- **4.** Insert the replacement fuse into the holder where the old fuse was. Reinsert the fuse cover. Be sure to use a fuse of the same type and specification. See the product specification label for details.

# **Troubleshooting**

# No Light

This troubleshooting guide is meant to help solve simple problems. If a problem occurs, carry out the steps below in sequence until a solution is found. Once the unit operates properly, do not carry out following steps.

If the light effect does not operate properly, refer servicing to a technician.

Response: Suspect three potential problem areas: the power supply, the lamp, the fuse.

- 1. Power supply. Check that the unit is plugged into an appropriate power supply.
- **2.** The lamp. Replace the old lamp with a new one with the same specifications. See page 6 for replacing lamps.
- **3.** The fuse. Replace the fuse. See page 11 for replacing the fuse.

#### No Response to DMX

Response: Suspect the DMX cable or connectors, a controller malfunction, a light effect DMX card malfunction.

- **1.** Check the DMX cable: Unplug the unit; change the DMX cable; then reconnect to electrical power. Try your DMX control again.
- 2. Determine whether the controller or light effect is at fault. Does the controller operate properly with other DMX products? If not, take the controller in for repair. If so, take the DMX cable and the light effect to a qualified technician.

See next page for more problem solving.

Problem	Probable cause(s)	Remedy
One or more	No power to the fixture	·Check that power is switched on and cables are plugged in.
Sunstrip are completely dead.	Primary fuse blown.	·Replace fuse.
Sunstrip reset correctly, but all	The controller is not connected.  3-pin XLR Out of the controller	·Connect controller. ·Install a phase reversing cable
respond erratically or not at all to the controller.	does not match XLR Out of the first fixture on the link (i.e. signal is reversed).	between the controller and the first fixture on the link.
Sunstrip reset correctly, but some respond erratically or not at all to the controller.	Poor data quality	·Check data quality. If much lower than 100 percent, the problem may be a bad data link connection, poor quality or broken cables, missing termination plug, or a defective fixture disturbing the link.
	Bad data link connection	<ul> <li>Inspect connections and cables.</li> <li>Correct poor connections. Repair or replace damaged cables.</li> </ul>
	Data link not terminated with 120 Ohm termination plug.	Insert termination plug in output jack of the last fixture on the link.
	Incorrect addressing of the fixtures.	·Check address setting.
	One of the fixtures is defective and disturbs data transmission on the link.	Bypass one fixture at a time until normal operation is regained: unplug both connectors and connect them directly together.  Have the defective fixture serviced by a qualified technician.
	3-pin XLR Out on the fixtures does not match (pins 2 and 3 reversed).	<ul> <li>Install a phase-reversing cable between the fixtures or swap pin 2 and 3 in the fixture, that behaves erratically.</li> </ul>
No light	The power supply settings do not match local AC voltage and frequency. Only connect this device to 230V.	·Disconnect fixture. Check settings (page 6) and correct if necessary.
	Lamp missing or blown	·Disconnect fixture and replace lamp.

# **Product Specification**

Model: Showtec Sunstrip Active Voltage: 240V-50Hz (CE)

Power: 750W Fuse: 6,3A / 250V

Dimensions: 1000x130x80mm (LxWxH)

Weight: 5,32 kg

# **Operation and Programming**

Signal pin OUT: pin 1 earth, pin 2 (-), pin 3 (+)

Set Up and Addressing: Digital Display

DMX Channels: 1, 2, 5 or 10 Signal input 3-pin XLR male Signal output 3-pin XLR female



810 mm

1000 mm -

30 mm

#### Lamp

Allowed lamp models\*:

Showtec Lamp 240V/75W GU10 (500 hr) ordercode 82382

#### **Electro-mechanical effects**

DMX-control via standard DMX-controller

Max. ambient temperature  $t_a$ : 55°C; Max. housing temperature  $t_B$ : 80°C

#### Minimum distance:

Minimum distance from flammable surfaces: 0.5m

Minimum distance to lighted object: 1.3m

\*: Versions for other lamps may be produced. Please check the specification label on your product.

Design and product specifications are subject to change without prior notice.



