



DCV300

300W DMX LED DRIVER

OPERATORS MANUAL

V6.0





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1.0 – Warnings

1.0.1 – Read Me

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

- Before the initial start-up, please make sure that there is no damage caused during transportation.
- Should there be any damage, consult your dealer and do not use the equipment.
- To maintain the equipment in good working condition and to ensure safe operation, it is necessary for the user to follow the safety instructions and warning notes written in this manual.
- Please note that damages caused by user modifications to this equipment are not subject to warranty.



- This product is designed to be installed by a competent, qualified installation technician into commercial environments.
- Never let the power cable come into contact with other cables. Handle the power cable and all mains voltage connections with particular caution!
- Never remove warning or informative labels from the unit.
- Do not open the equipment and do not modify the unit.
- Do not connect this equipment to a dimmed power supply.
- Do not switch the equipment on and off in short intervals, as this will reduce the system's life.
- Only use the equipment indoors.
- Do not expose to flammable sources, liquids or gases.
- Always disconnect the power from the mains when equipment is not in use or before cleaning! Only handle the power-cable by the plug. Never pull out the plug by pulling the power-cable.
- Make sure that the power cable is never crimped or damaged. Check the equipment and the power cable periodically.
- If the equipment is dropped or damaged, disconnect the mains power supply immediately and have a qualified engineer inspect the equipment before operating again.
- If the equipment has been exposed to drastic temperature fluctuation (e.g. after transportation), do not connect power or switch it on immediately. The arising condensation might damage the equipment. Leave the equipment switched off until it has reached room temperature.
- If your product fails to function correctly, stop use immediately. Pack the unit securely (preferably in the original packing material) and return it to your supplier for service.
- Only use fuses of same type and rating.
- Repairs, servicing and power connection must only be carried out by a qualified technician.
- THIS UNIT CONTAINS NO USER SERVICEABLE PARTS.
- WARRANTY: One year from date of purchase.



OPERATING DETERMINATIONS

If this equipment is operated in any other way than that described in this manual, the product may suffer damage and the warranty become void. Incorrect operation may lead to hazards, short-circuit, burns and electric shocks etc. Do not endanger your own safety or the safety of others! Incorrect installation or use can cause serious damage to people and/or property.

1.0.2 – Power

The DCV 300 is designed with 2 common positive terminals, the 300W load should be spread across these terminals evenly to ensure the phoenix connectors do not burn out.

1.0.3 – IP Rating

The DCV300 is IP20 rated and must be used indoors and in a dry environment.

2.0 – Installation

2.0.1 – Location

Please ensure the DCV300 is installed in a cool dry place, operated by qualified people and always make sure cables are not taut once installed.

2.0.2 – Fixings

The DCV300 requires 4 securely mounted screws to hold it in place on a wall or a stable surface. We recommend using wall plugs for extra security. Items damaged by improper installation are not covered under the warranty.

2.0.3 – Power

The DCV300 requires a 240V AC connection with the IEC provided. Please ensure this is pushed in fully to avoid arcing. Please also ensure the power cable is not taut and has not been damaged during transit.

2.0.4 – Data

2.0.4.1 - DMX

When connecting the data to a DCV it is recommended that you use professional DMX cable to avoid any signal issues. It is also recommended that the DMX chain is correctly terminated to avoid data issues such as signal reflection.



2.0.4.2 - Connectors

Please use the Phoenix terminals provided to connect the DMX, If the terminals are misplaced, please replace them with genuine Phoenix connectors.

2.0.5 – LED Connections

2.0.5.1 – Correct Procedure

When connecting Your LED tape to the DCV300 please ensure the LED tape matches the voltage of the DCV, the standard voltage for a DCV is 24V DC.

Please ensure you are connecting the correct terminals to the correct wires on the LED tape, wiring the tape incorrectly can damage both pieces of equipment.

The common positive load should be split across the two common terminals on the DCV300 to avoid damaging the connector. You can connect a maximum of 150W per common terminal.

2.0.5.2 – Short Circuit Error

The short circuit error tells the user if a fault develops. This can be either:

- 1) Current overload. This is when a user has overloaded the DCV by connecting more than 300W of lighting. This may only occur at certain points when the fixture is pulling its maximum wattage.
- 2) Short Circuit. This can occur when the tape is wired incorrectly or if the tape is short circuiting because it's damaged or faulty. Another common cause of this is when the tails at one end of the tape are touching and creating a short circuit.

3.0 – User Interface Settings

3.0.1 – accessing the UI

To access the UI power the DCV, hold down the “menu” key and press “enter” when prompted whilst maintaining a hold on the menu key.

This feature is on all DCV systems as a security feature to prevent accidental operator changes.

3.0.2 – System Modes

System mode enables different types of control and is set in the system mode menu which is accessed by pressing the menu button repeatedly to cycle settings.

1. DMX – For DMX control.
2. Sound – For sound auto control.
3. Auto – For running stand alone.
4. Slave – Master Slave mode.

3.0.3 – Changing the DMX address

Cycle menu until the display reads “System Mode” and press “enter”



Once you have accessed this screen and selected the DMX Mode you can set the DMX address.

3.0.4 – Changing the LED mode (RGBW/RGB, CCT)

Cycle menu until the display reads “System Mode” and press “enter”

Once you have accessed this screen the display will show a two-digit and a three-digit number, the first two-digit number shows the mode as follows:

1. RGB
2. RGBW
3. Dual White (1&3 and 2&4 Grouped)
4. All Outputs Operate (1 DMX Chanel)
5. Dim + RGBW
6. RGBW + Dim + Strobe
7. Macro Mode (Described Below) MACCH
8. Assign any DMX address to any channel

3.0.5 – Macro Modes & DMX settings

For LED Mode [07] (listed above)

1. (DMX 000-025) RGB Fade + Speed + Dim
2. (DMX 026-051) RGB Step + Speed + Dim
3. (DMX 052-077) RGBW Fade + Speed + Dim
4. (DMX 078-103) RGBW Step + Speed + Dim
5. (DMX 104-129) RGB Audio Step + Dim + Sensitivity
6. (DMX 130-152) RGBW Audio Step + Dim + Sensitivity
7. (DMX 153-178) Red Strobe + Speed + Dim
8. (DMX 179-203) Green Strobe + Speed + Dim
9. (DMX 204-229) Blue Strobe + Speed + Dim
10. (DMX 230-255) White Strobe + Speed + Dim

3.0.6 – Sound Modes & Settings

For standalone Sound control

1. RGB Step Dim & sensitivity (controlled in UI)
2. RGBW Step with dim and sensitivity (controlled in UI)

3.0.7 – Auto Modes & Settings

For standalone auto control.

1. RGB fade with Dim + Speed control (controlled in UI)
2. RGB Step with Dim + Speed control (controlled in UI)
3. RGBW fade with Dim + Speed control (controlled in UI)
4. RGBW Step with Dim + Speed control (controlled in UI)

3.0.8 – Manual Mode

For manual output control.



1. Dim Output 1 (controlled in UI)
2. Dim Output 2 (controlled in UI)
3. Dim Output 3 (controlled in UI)
4. Dim Output 4 (controlled in UI)

4.0 UI Illumination

4.0.1 Display Illumination Settings

1. Go to System Settings in the menu and scroll to backlight.
2. Options are between 10 – 30 Seconds display light or Open which refers to on all the time.

For installation and technical support please contact us on 01603 295 011 or email

Info@tsslighting.co.uk or visit www.tsslighting.co.uk

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