

PROFILO LED 200 FC



User's Manual rel 1.0 GB



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INDEX:

1- SYMBOLS	4
2- GENERAL WARNING	4
3- GENERAL WARRANTY CONDITIONS	4
4- TECHNICAL FEATURES	5
5- ACCESSORIES	6
6- IMPORTANT SAFETY INFORMATION	7
6.1 Fire prevention	7
6.2 Prevention of electric shock	7
6.3 Safety	7
6.4 Waste Electrical and Electronic Equipment directive	8
7- INSTALLATION	8
8- INPUT / OUTPUT CONNECTIONS	9
9- DMX SIGNAL CONNECTION	10
9.1 DMX Addresses	11
9.2 Selecting the DMX address	11
10- RDM FUNCTIONS	12
11- FIRMWARE UPDATING	13
12- DISPLAY FUNCTIONS	13
13- REC MODE	16
14- MANUAL MODE	16
15- ERROR MESSAGES	17
16- DMX PROTOCOL	18

1- SYMBOLS

Graphic symbols used on this manual:



THIS SYMBOL INDICATES A HOT SURFACE



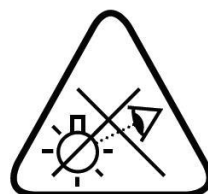
THIS SYMBOL INDICATES ELECTRIC SHOCK RISK



THIS SYMBOL INDICATES GENERAL RISK

t_a 40°C

THIS SYMBOL INDICATES THE MAXIMUM OPERATING AMBIENT TEMPERATURE



THIS SYMBOL MEANS “DO NOT STARE AT THE OPERATING LIGHT SOURCE”



THIS SYMBOL INDICATES PHOTOBIOLOGICAL SAFETY

Risk Group 2



THIS SYMBOL INDICATES THE EUROPEAN COMMUNITY DIRECTIVE 2012/19/EC ON WASTE ELECTRICAL AND ELECTRONIC EQUIPMENT (WEEE)

2- GENERAL WARNING

Read the instruction contained in this user manual carefully, as they give important information regarding safety during installation, use and maintenance.

The unit is not for residential use and must be installed by a qualified electrician or experienced person.

Always disconnect the device from the mains before maintenance.

The device must always be equipped with an efficient ground connection.

3- GENERAL WARRANTY CONDITIONS

The unit is guaranteed for 36 months from the date of purchase against manufacturing material defects.

4- TECHNICAL FEATURES

DTS Product code:

03.TP038.46 PROFILO LED 200 FC 5P BLACK
03.TP044.46 PROFILO LED 200 FC 3P BLACK

Output

Single high-power 200W FULL RGBW LED with Cold White 5600K
Cold White CRI > 90
LED lifespan: 50.000 hours (70% lumen output)

Optical group

19°- 41° linear zoom
High definition zoom lens with double optical condenser lens

Color generation

28 Gel Filters Macros
Linear color temperature correction from 2700K to 8000K

Control

DMX 512 / RDM or Manual control
10 DMX channels (Default)
4-digit 7-segment LED display + 4 soft keys
Internal operating system updatable via DTS Dongle Firmware Uploader

Power supply

Full-range 100-240Vac 50-60 Hz
Consumption: 200W Max

Connections

Power supply: PowerCON TRUE1 In&Out panel connectors
DMX: XLR 5 pins or XLR 3 pins In&Out panel connectors

Internal safety devices

Overvoltage and overtemperature circuits protection

Operating temperature

-10° / 40°C

Physical

IP20
Internal system with four removable shutters
Yoke featuring an exclusive sliding system with clutch for a wider tilt
Weight: 15 Kg

Certifications



2014/35/UE ; 2014/30/UE
IEC 62471 ; IEC 695-2-1

EN 60598-1 ; EN 62471 ; EN 61347-2-13
EN 60598-2-17 ; EN 55015 EMC ; EN 61347-1

6- IMPORTANT SAFETY INFORMATION

6.1 Fire prevention:

Replace any blown or damaged fuses only with those of identical value: T 3.15A 250V.

6.2 Prevention from electric shock:



High voltage is present inside the unit. Unplug the unit prior to performing any operation which involves touching the inside of the unit.
This equipment must be grounded, do not connect to non-grounded supplies.
The use of a thermal magnetic circuit breaker is recommended for each PROFILO LED 200 FC unit. Use only AC supplies 100-240V 50-60 Hz.
PROFILO LED 200 FC should never be located in position exposed to rain or in areas of extreme humidity.
A good air ventilation is essential for proper equipment work.

6.3 Safety:



Risk Group 2 product according to EN 62471. Risk Group 2



CAUTION. Do not look directly into the light output. May be harmful to the eyes and skin.



Do not stare at the operating light source.

The light source contained in this luminaire shall only be replaced by the manufacturer or his service agent or a similar qualified person.

The unit is not for household use and must be installed by a qualified electrician or experienced person.

The external surface of the unit may exceed 60°C; never handle the unit until at least 5 minutes have elapsed since the unit was turned off.

Never install the unit in an enclosed area lacking sufficient air flow.



The ambient temperature should not exceed 40°C. t_a 40°C

6.4 Waste Electrical and Electronic equipment (WEEE) directive:



The unit, accessories and packaging should be sorted for environmental-friendly recycling.

For EC countries: according to the European Directive 2012/19/EC for Waste Electrical and Electronic Equipment and its implementation into national right, luminaires that are no longer usable must be collected separately and disposed of in an environmentally correct manner.

7- INSTALLATION

The unit is suitable for dry locations only.

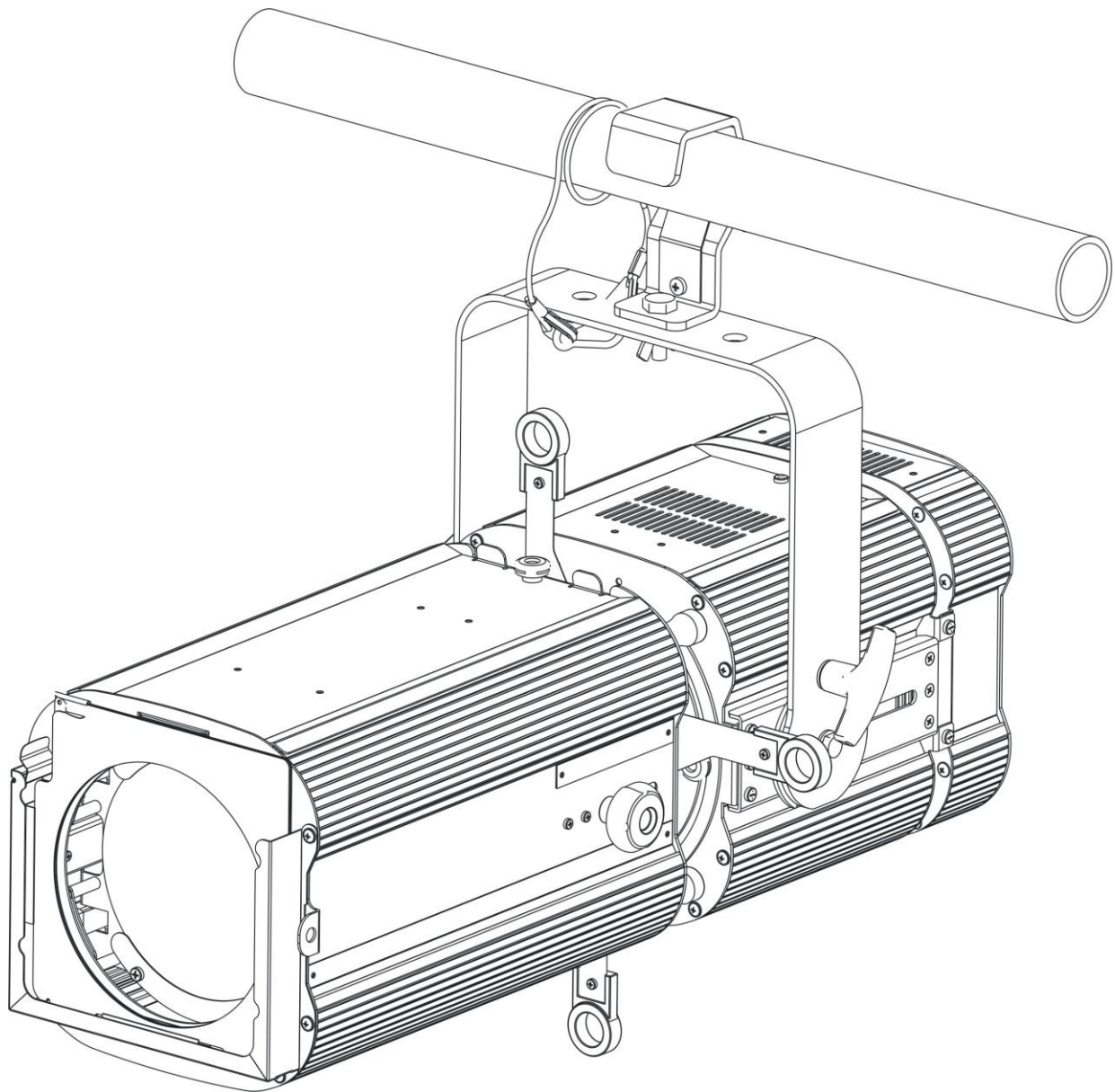
PROFILO LED 200 FC can be installed on a truss or on the ceiling.

It is recommended the use of appropriate clamps to fix the unit to the mounting surface.

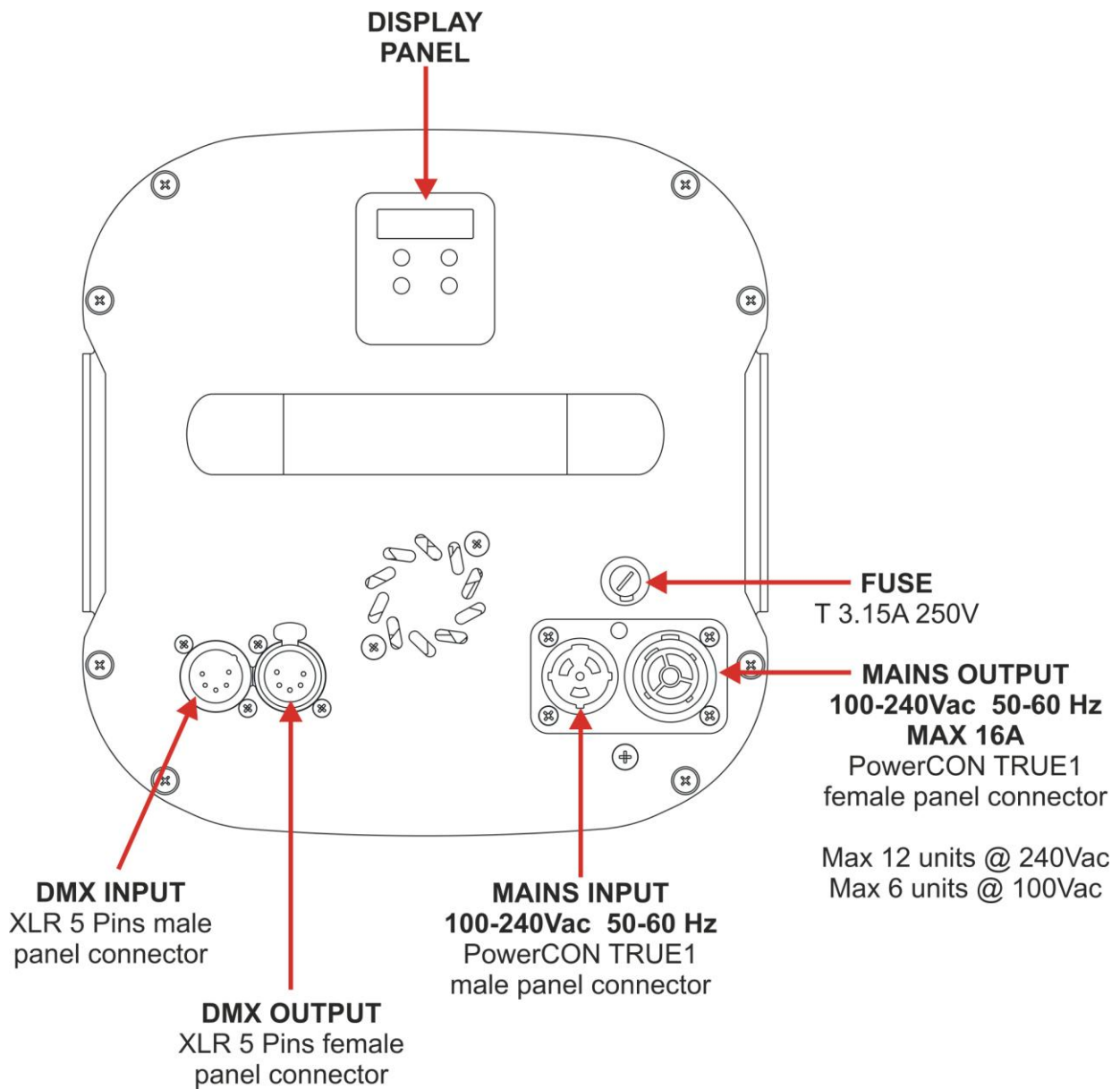
ATTENTION:

A safety cable (code 0521A010) must be securely fixed to the unit's mounting bracket and to the support structure of the projector as shown in the picture below.

Fixing clamps and safety cable are available on request.



8- INPUT / OUTPUT CONNECTIONS



9- DMX SIGNAL CONNECTION:

The unit operates using a digital DMX 512 signal.

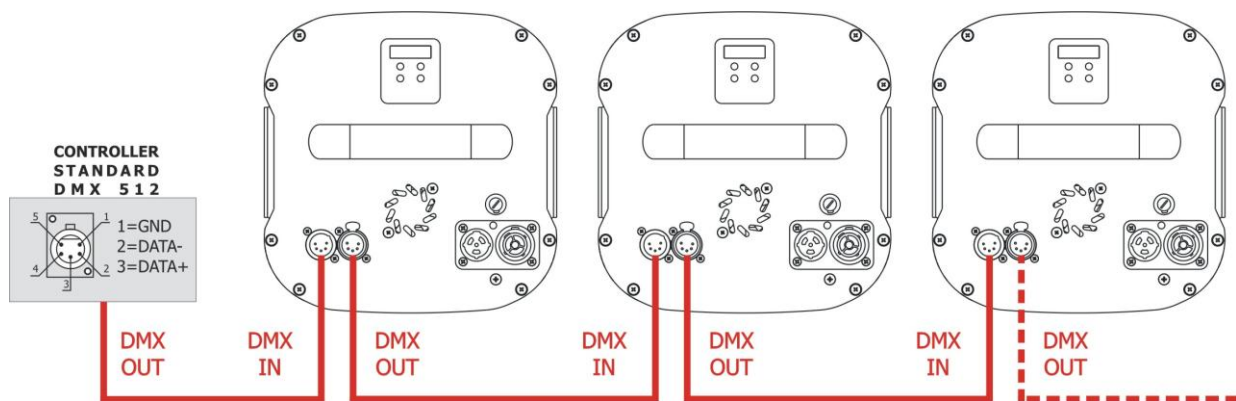
Connection between the controller and the unit or between units must be carried out using a two pair screened \varnothing 0.5 mm.

Ensure that the conductors do not touch each other.

Do not connect the cable ground to the DMX connector chassis.

The plug housing must be isolated. Connect the mixer signal to the DMX IN projector plug and connect it to the next projector by connecting the DMX OUT plug on the first unit to the DMX IN plug of the second one.

In this way, all the projectors are cascade connected.



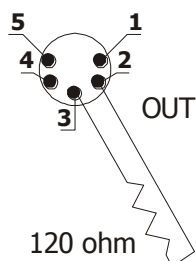
If the display showing the DMX address flashes, then one of the following errors has occurred:

- DMX signal not present
- DMX reception problem

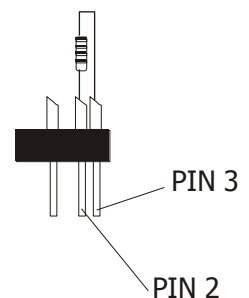
For Installations where long distance DMX cable connections are needed, we suggest to use a DMX terminator.

The DMX terminator is a male XLR 3-5 pins connector with a 120 ohm resistor Between pin 2 and 3.

The DMX terminator must be plugged into the last unit (DMX out panel connector) of the DMX line.



PLACE A 120 OHM RESISTOR BETWEEN PIN 2 AND 3 OF A MALE XRL CONNECTOR AND PLUG IT INTO THE DMX OUT PANEL CONNECTOR OF THE LAST UNIT CONNECTED TO THE DMX LINE



9.1 DMX addresses

PROFILO LED 200 FC can be controlled with 10 DMX channels (Default).

In order to use the unit in 10 DMX channels mode, set the following addresses on the mixer:

Projector 1 A001

Projector 2 A011

Projector 3 A021

..... A.....

projector 6 A051

If you want to select the next projector, just add "10"

9.2 Selecting the DMX address

1) Press the UP-DOWN key until you reach the required DMX address. The numbers on the display will start to flash (but the new DMX address hasn't yet been set).

2) Press ENTER to confirm your selection. The numbers on the display will stop flashing and the projector is now controlled by the new DMX address.

TIPS: if you keep pushed the UP or DOWN keys, the channels are calculated more quickly and you get a faster selection.

10- RDM FUNCTIONS

By using a RDM controller it is possible to set DMX address, DMX mode and other parameters. PROFILO LED 200 FC accepts the following RDM commands:

DEVICE_INFO	To read the following parameters: <ul style="list-style-type: none"> • RDM protocol version • Fixture model ID • Fixture type • Software version ID • DMX channels • DMX mode • DMX address • Total sub-fixtures • Total sensors
IDENTIFY_DEVICE	All LED channels ON at max power to identify the fixture
DMX_START_ADDRESS	To read / set the DMX address
SOFTWARE_VERSION_LABEL	Software version ID
SUPPORTED_PARAMETERS	List of all supported parameters
PARAMETER_DESCRIPTION	Description / details of Manufacturer Specific parameter as "NO DMX ACTION"
DMX_PERSONALITY	To set the DMX mode
DMX_PERSONALITY_DESCRIPTION	Description / details of the DMX mode
DEVICE_MODEL_DESCRIPTION	Description / details of the Fixture model
MANUFACTURER_LABEL	Producer ID
SENSOR_DEFINITION, SENSOR VALUE	Description / values of sensors
SENSORS	
1: Led Temperature	LED temperature
2: Micro Temperature	Micro controller temperature
3: Driver 1 Temperature	Output 1 and 2 of LED Driver board temperature
4: Driver 2 Temperature	Output 3 and 4 of LED Driver board temperature
RDM MANUFACTURER-SPECIFIC PIDs	
NO DMX ACTION	<p>To set the desired fixture's behavior in case DMX signal is missing or not available.</p> <p>1 = Black-out</p> <p>2 = CHPR as per display menu AUTO > CHPR</p> <p>3 = RGB @ 100% (White channel OFF)</p> <p>4 = CUSTOM:</p> <p>NO DMX CUSTOM RED 0 ÷ 255 (Default = 255)</p> <p>NO DMX CUSTOM GREEN 0 ÷ 255 (Default = 255)</p> <p>NO DMX CUSTOM BLUE 0 ÷ 255 (Default = 255)</p> <p>NO DMX CUSTOM WHITE 0 ÷ 255 (Default = 255)</p> <p>NO DMX CUSTOM SHUTTER 0 ÷ 255 (Default = 15)</p> <p>NO DMX CUSTOM DIMMER 0 ÷ 255 (Default = 255)</p> <p>NO DMX CUSTOM CCT 0 = OFF (Default)</p> <p>1 = 2700K</p> <p>2 = 3000K</p> <p>3 = 3200K</p> <p>4 = 3500K</p> <p>5 = 4000K</p> <p>6 = 4500K</p> <p>7 = 5000K</p> <p>8 = 5600K</p> <p>9 = 6000K</p> <p>10 = 6500K</p> <p>11 = 7000K</p> <p>12 = 8000K</p> <p>5 = Keep last valid DMX signal (Default)</p>

11- FIRMWARE UPDATING

To update the firmware release of the PROFILO LED 200 FC you need:

- DTS Dongle Firmware Uploader (code 03.LA.206).
- “DTS Firmware Upgrade Utility v.2.02” program installed on PC.
- Latest firmware release available for PROFILO LED 200 FC unit.

Updating the firmware release.

Please follow the procedure below to perform the update:

1. Connect the DTS Dongle Firmware Uploader to a spare USB port on the PC.
2. Connect the unit DMX input to the DTS Dongle Firmware Uploader DMX output with a standard DMX cable and turn ON the unit.
3. Send the new firmware release into the unit by using “DTS Firmware Upgrade Utility v.2.02” program. At the end of the procedure, the unit will reset.

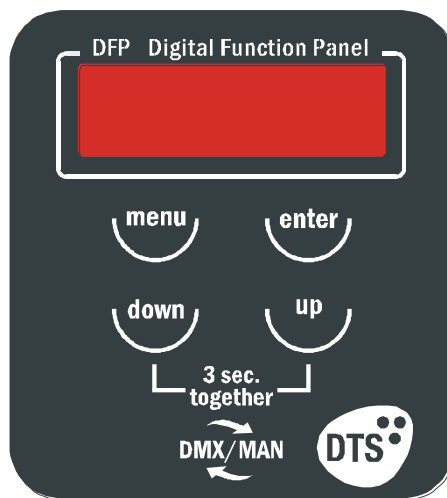
For more information please refer to an authorised DTS service centre.

12- DISPLAY FUNCTIONS

The PROFILO LED 200 FC display panel shows all the available control menus.

Using these options, it is possible to change the fixture’s setting.

Changing the DTS settings can vary the functions of the unit so that it does not respond to the DMX 512 used to control it. Carefully follow the instructions below before carrying out any variations or selections.



MENU	<ul style="list-style-type: none"> • To access the control menus in the display panel. • To return to the previous level in the menu structure without making a change. • To exit the menus.
ENTER	<ul style="list-style-type: none"> • To select any required menu. • To confirm any changes.
UP / DOWN	<ul style="list-style-type: none"> • To navigate the menus structure. • To change any value.

FIRMWARE RELEASE	1.00
RDM Device Model ID	0x0D4F
DMX Personality IDs	0x01 “RGBW 10 chans” 0x02 “RGBW 4 chans” 0x03 “RGBW 6 chans” 0x04 “RGBW FINE 10 chans”

MAIN MENU	LEVEL 1	LEVEL 2	LEVEL 3	FUNCTION
dISP	Pos 1	RR		Display normal orientation for floor mounting position (Default)
		BB		Display inverted orientation for suspended mounting position
	Stby	OFF		Display always ON (Default)
		on		Display goes OFF after 10 seconds
Node	10 cH			Allows to select 10 DMX channels mode (Default)
	4 cH			Allows to select 4 DMX channel mode
	6 cH			Allows to select 6 DMX channel mode
	FInE			Allows to select FINE mode (10 DMX channels)
LEd	Snth	OFF-20		Allows to select the value of the delay (in milliseconds) for Dimmer channel reaction to DMX or Program variation. Off = Instant response to DMX variation. 4 = 100 ms Smooth response to DMX variation (Default) 20 = 500 ms Smooth response to DMX variation.
	cOnP	QuAd		Allows to select Quadratic current for linear light output (Default)
		LinE		Allows to select Linear current output
	SynC	6 10-5000		Allows to adjust the PWM frequency value (Hz) in order to reduce flickering in the process of your camera recordings. Default = 610 Hz
	bSt	on		Allows to increase the LED's current from 70% to 100% Default = ON
		OFF		
Auto	cHP r- STEP 01-16	SPEE	1-3600	Automatic mode without DMX controller. Chase with 16 steps previously created in REC mode. Speed time and wait time values (in seconds) selectable by user (Default = 10). In Auto mode the unit do generate DMX for slave units.
		URIt	1-3600	
	cPO 1 cP 16	rEd	0-255	16 customizable Colour Macros. RGBW values selectable by user (Default = 255).
		GrEE	0-255	
		bluE	0-255	
		WHIt	0-255	
	rAln	SPEE	1-3600	Rainbow colours effect. Speed time value (in seconds) selectable by user (Default = 10).
	cUD 1 cU28			28 Colour Macros as on DMX channel 9 (MACRO COLOR). Default = 01
	cct	2700 8000		12 White color temperature from 2700K to 8000K as on DMX channel 8 (CCT). Default = 2700K
	dInn			Dimmer level selectable by user as on DMX channel 6 (DIMMER) Default = 255
	SHut			Shutter level selectable by user as on DMX channel 5 (SHUTTER) Default = 15
	ESc			Esc from automatic mode.

MAIN MENU	LEVEL 1	LEVEL 2	LEVEL 3	FUNCTION
REC	10CH	001 0001 0016		In DMX Recorder mode it is possible to create and store the scenes of the CHPR menu by using an external DMX controller. The unit must be set to 10 DMX channels mode. Refer to "REC MODE" at page 16.
SLAV	SurE	SLV		Slave mode. The unit is forced to DMX address 1 and 10 DMX channels mode receiving signal from the unit set in Auto mode.
		Esc		Esc from slave mode
FAN	Std SIL			Allows to select the internal fans speed. Standard mode: High fans speed. Silent mode: Low fans speed for a very low noise operation. Default = STD
ndNH	LdNH			No DMX action. Keep last valid DMX signal (Default)
	CHPR	SPEE WAIT	1-3600 1-3600	Chase with 16 steps previously created in REC mode. Speed time and wait time values (in seconds) selectable by user (Default = 10).
	100			RGB @ 100% (White channel (OFF))
	cust	red GrEE bLue WHIt SHut dimm cct	0-255 0-255 0-255 0-255 0-255 0-255 0FF 2700 8000	Custom. RGBW level selectable by user Default = 255 Shutter level selectable by user as on DMX channel 5 (SHUTTER) Default = 15 Dimmer level selectable by user as on DMX channel 6 (DIMMER) Default = 255 12 White color temperature from 2700K to 8000K as on DMX channel 8 (CCT). Default = OFF
	0FF			Black-out
dfSE	SurE			To restore default settings
TEMP	LEd	025.0		LED temperature monitoring
	micr	025.0		Micro controller temperature monitoring
	drU1	025.0		Output 1 and 2 of LED Driver board temperature monitoring
	drU2	025.0		Output 3 and 4 of LED Driver board temperature monitoring
LINE	red GrEE bLue WHIt unit			Shows the total unit life time and the RGBW LEDs life time
Soft	v.1.00			Software version

13- REC MODE

DMX Recorder mode

For the programming of ChPr by using a DMX controller, besides the 10 channels necessary to control the unit a further 3 DMX channels are needed.

So that in RECORDER mode (via DMX) the unit will need 15 channels to be correctly programmed.

The three new DMX channels are:

DMX channel 11 = SCENES channel

From 0-10 = no function (r001)

From 11-255 are displayed the programmable scenes (max 16 scenes from M001 to M0016)

DMX channel 12 = EDIT channel:

-From 0-19 = no function

-From 20-234 the unit runs the configuration given by the received input DMX values.

With the channel SCENES it is possible to pass from one step to the next while with REC it is possible to record the selected scene.

-From 235-255 the unit runs the configuration given by the received input DMX values closing the sequence as last scene.

With the channel REC it is possible to record the selected scene as last scene.

DMX channel 13 = RECORDING channel

Records the set scene with a variation between 0 to 255 (the display flashes indicating that the scene has been recorded). It is advised that you keep the REC channel set to 0 and to run through the 255 only once you have decided to save the scene. If ChPr is not closed, by indicating the last scene (Edit channel between 235-255), in playback mode all 16 scenes will be played through even if not programmed.

14- MANUAL MODE

Manual mode can be activated by pressing at the same time 'UP' and 'DOWN' keys on unit display for 3 seconds (A001).

In Manual mode it is possible to select:

<i>red</i>	<i>0-255</i>	RGBW level selectable by user Default = 255
<i>grEE</i>	<i>0-255</i>	
<i>bluE</i>	<i>0-255</i>	
<i>WHtE</i>	<i>0-255</i>	
<i>SHut</i>	<i>0-255</i>	Shutter level selectable by user as on DMX channel 5 (SHUTTER) Default = 15
<i>dimm</i>	<i>0-255</i>	Dimmer level selectable by user as on DMX channel 6 (DIMMER) Default = 255
<i>cct</i>	<i>OFF</i> <i>2700</i> <i>8000</i>	12 White color temperature selection from 2700K to 8000K as on DMX channel 8 (CCT). Default = OFF
<i>Esc</i>		Esc from Manual mode

When Manual mode is active, unit switch OFF/ON cycle will maintain Manual Mode selection.

In Manual mode the DMX signal is ignored.

15- ERROR MESSAGES

ERROR SHOWED ON DISPLAY	APPEARS WHEN
<i>LEd SEnSor Error</i>	LED thermal sensor damaged (open or in short circuit). Unit immediately goes in black-out.
<i>LEd ouErteMPERAturE</i>	LED temperature detected over 70°C. Unit immediately goes in black-out.
<i>Micro SEnSor Error</i>	Micro controller thermal sensor damaged (open or in short circuit). Unit immediately goes in black-out.
<i>Micro ouErteMPERAturE</i>	Micro controller temperature detected over 70°C. Unit immediately goes in black-out.
<i>drU1 SEnSor Error</i>	Thermal sensor on outputs 1 and 2 of LED Driver board damaged (open or in short circuit). Unit immediately goes in black-out.
<i>drU1 ouErteMPERAturE</i>	Temperature detected over 70°C on outputs 1 and 2 of LED Driver board. Unit immediately goes in black-out.
<i>drU2 SEnSor Error</i>	Thermal sensor on outputs 3 and 4 of LED Driver board damaged (open or in short circuit). Unit immediately goes in black-out.
<i>drU2 ouErteMPERAturE</i>	Temperature detected over 70°C on outputs 3 and 4 of LED Driver board. Unit immediately goes in black-out.

16- DMX PROTOCOL

FIRMWARE RELEASE	1.00
RDM Device Model ID	0x0D4F
DMX Personality IDs	0x01 “RGBW 10 chans” 0x02 “RGBW 4 chans” 0x03 “RGBW 6 chans” 0x04 “RGBW FINE 10 chans”

10 CHANNELS MODE (Default)

- 1** **RED**
- 2** **GREEN**
- 3** **BLUE**
- 4** **WHITE**
- 5** **SHUTTER**
- 6** **DIMMER**
- 7** **DIMMER FINE**
- 8** **CCT**
- 9** **MACRO COLOR**
- 10** **FUNCTIONS**

<i>Ch</i>	<i>Name</i>	<i>DMX levels</i>	
1	RED	0..255	Proportional color from min to max
2	GREEN	0..255	Proportional color from min to max
3	BLUE	0..255	Proportional color from min to max
4	WHITE	0..255	Proportional color from min to max
5	SHUTTER	0..9	Black-out
		10..19	Open
		20..29	Black-out
		30..119	Strobe (da 3,27 s a 30 ms)
		120..149	Pulse up (da 42,6 s a 120 ms)
		150..179	Pulse down (da 42,6 s a 120 ms)
		180..204	Random strobe (RGBW, CCT, Macro, Dimmer, Dimmer Fine active)
		205..229	Independent random strobe (Dimmer, Dimmer Fine active)
		230..235	Single flash 30 ms (RGBW, CCT, Macro, Dimmer, Dimmer Fine active)
		236..255	Open
6	DIMMER	0..255	Proportional dimmer from min to max
7	DIMMER FINE	0..255	Proportional dimmer from min to max
8	CCT	0..009 — No func. 010 — 2700K 033 — 3000K 055 — 3200K 077 — 3500K 099 — 4000K 121 — 4500K 143 — 5000K 165 — 5600K 187 — 6000K 209 — 6500K 232 — 7000K 255 — 8000K	Linear color temperature correction from 2700K to 8000K. Relevant CCT (Correlated Color Temperature) values: 10 = 2700K 33 = 3000K 55 = 3200K 77 = 3500K 99 = 4000K 121 = 4500K 143 = 5000K 165 = 5600K 187 = 6000K 209 = 6500K 232 = 7000K 255 = 8000K

Ch	Name	DMX levels	
9	MACRO COLOR	0..09	No function
		10..20	1: GEL FILTER NO.19 "FIRE" (R255 G15 B0 W0 $\text{color} = \text{LinE}$) (R255 G62 B0 W0 $\text{color} = \text{Quad}$)
		21..25	2: GEL FILTER NO.20 "MEDIUM AMBER" (R231 G80 B0 W0 $\text{color} = \text{LinE}$) (R243 G143 B0 W0 $\text{color} = \text{Quad}$)
		26..30	3: GEL FILTER NO.25 "SUNSET RED" (R231 G39 B1 W0 $\text{color} = \text{LinE}$) (R243 G100 B16 W0 $\text{color} = \text{Quad}$)
		31..35	4: GEL FILTER NO.68 "SKY BLUE" (R0 G255 B109 W28 $\text{color} = \text{LinE}$) (R0 G255 B167 W85 $\text{color} = \text{Quad}$)
		36..40	5: GEL FILTER NO.101 "YELLOW" (R255 G135 B0 W0 $\text{color} = \text{LinE}$) (R255 G186 B0 W0 $\text{color} = \text{Quad}$)
		41..45	6: GEL FILTER NO.104 "DEEP AMBER" (R255 G117 B0 W0 $\text{color} = \text{LinE}$) (R255 G173 B0 W0 $\text{color} = \text{Quad}$)
		46..50	7: GEL FILTER NO.105 "ORANGE" (R255 G68 B0 W0 $\text{color} = \text{LinE}$) (R255 G132 B0 W0 $\text{color} = \text{Quad}$)
		51..55	8: GEL FILTER NO.106 "PRIMARY RED" (R255 G0 B0 W0 $\text{color} = \text{LinE}$) (R255 G0 B0 W0 $\text{color} = \text{Quad}$)
		56..60	9: GEL FILTER NO.111 "DARK PINK" (R247 G10 B0 W96 $\text{color} = \text{LinE}$) (R251 G51 B0 W157 $\text{color} = \text{Quad}$)
		61..65	10: GEL FILTER NO.113 "MAGENTA" (R255 G5 B4 W19 $\text{color} = \text{LinE}$) (R255 G36 B32 W0 $\text{color} = \text{Quad}$)
		66..70	11: GEL FILTER NO.117 "STEEL BLUE" (R56 G110 B0 W255 $\text{color} = \text{LinE}$) (R120 G168 B0 W255 $\text{color} = \text{Quad}$)
		71..75	12: GEL FILTER NO.118 "LIGHT BLUE" (R0 G230 B44 W23 $\text{color} = \text{LinE}$) (R0 G243 B106 W77 $\text{color} = \text{Quad}$)
		76..80	13: GEL FILTER NO.122 "FERN GREEN" (R107 G255 B0 W30 $\text{color} = \text{LinE}$) (R166 G255 B0 W88 $\text{color} = \text{Quad}$)
		81..85	14: GEL FILTER NO.126 "MAUVE" (R255 G0 B40 W0 $\text{color} = \text{LinE}$) (R255 G0 B101 W0 $\text{color} = \text{Quad}$)
		86..90	15: GEL FILTER NO.132 "MEDIUM BLUE" (R0 G255 B95 W0 $\text{color} = \text{LinE}$) (R0 G255 B156 W0 $\text{color} = \text{Quad}$)
		91..95	16: GEL FILTER NO.136 "PALE LAVANDER" (R255 G75 B0 W255 $\text{color} = \text{LinE}$) (R255 G139 B0 W255 $\text{color} = \text{Quad}$)
		96..100	17: GEL FILTER NO.137 "LAVANDER" (R255 G189 B52 W255 $\text{color} = \text{LinE}$) (R255 G218 B115 W255 $\text{color} = \text{Quad}$)
		101..105	18: GEL FILTER NO. 138 "PALE GREEN" (R255 G177 B0 W45 $\text{color} = \text{LinE}$) (R255 G213 B0 W107 $\text{color} = \text{Quad}$)
		106..110	19: GEL FILTER NO.139 "PRIMARY GREEN" (R26 G255 B0 W0 $\text{color} = \text{LinE}$) (R82 G255 B0 W0 $\text{color} = \text{Quad}$)
		111..115	20: GEL FILTER NO.147 "APRICOT" (R255 G80 B0 W22 $\text{color} = \text{LinE}$) (R255 G143 B0 W75 $\text{color} = \text{Quad}$)
		116..120	21: GEL FILTER NO.151 "GOLD TINT" (R255 G94 B0 W75 $\text{color} = \text{LinE}$) (R255 G155 B0 W139 $\text{color} = \text{Quad}$)
		121..125	22: GEL FILTER NO.154 "PALE ROSE" (R224 G90 B0 W85 $\text{color} = \text{LinE}$) (R239 G152 B0 W148 $\text{color} = \text{Quad}$)
		126..130	23: GEL FILTER NO.156 "CHOCOLATE" (R255 G98 B0 W50 $\text{color} = \text{LinE}$) (R255 G158 B0 W113 $\text{color} = \text{Quad}$)
		131..135	24: GEL FILTER NO. 181 "CONGO BLUE" (R37 G57 B240 W0 $\text{color} = \text{LinE}$) (R97 G121 B248 W0 $\text{color} = \text{Quad}$)
		136..140	25: GEL FILTER NO.200 "DOUBLE CT BLUE" (R23 G128 B51 W104 $\text{color} = \text{LinE}$) (R77 G181 B114 W163 $\text{color} = \text{Quad}$)
		141..145	26: GEL FILTER NO.201 "FULL CT BLUE" (R0 G16 B0 W255 $\text{color} = \text{LinE}$) (R0 G64 B0 W255 $\text{color} = \text{Quad}$)
		146..150	27: GEL FILTER NO.204 "FULL CT ORANGE" (R255 G102 B0 W25 $\text{color} = \text{LinE}$) (R255 G162 B0 W80 $\text{color} = \text{Quad}$)
		151..155	28: GEL FILTER NO.341 "PLUM" (R255 G46 B0 W173 $\text{color} = \text{LinE}$) (R255 G109 B0 W210 $\text{color} = \text{Quad}$)
		156..235	RESERVED
		236..237	RGB RAINBOW COLOR MIXING: SPEED 1 (6 SEC.)
		238..239	RGB RAINBOW COLOR MIXING: SPEED 2 (15 SEC.)
		240..241	RGB RAINBOW COLOR MIXING: SPEED 3 (30 SEC.)
		242..243	RGB RAINBOW COLOR MIXING: SPEED 4 (45 SEC.)
		244..245	RGB RAINBOW COLOR MIXING: SPEED 5 (60 SEC.)
		246..247	RGB RAINBOW COLOR MIXING: SPEED 6 (120 SEC.)
		248..249	RGB RAINBOW COLOR MIXING: SPEED 7 (150 SEC.)
		250..255	RGB RAINBOW COLOR MIXING: SPEED 8 (180 SEC.)

<i>Ch</i>	<i>Name</i>	<i>DMX levels</i>	
10	FUNCTIONS (staying on desired option for 5 seconds)	0..9	No function
		10..24	SMOOTH OFF
		25..26	SMOOTH 1 (25 ms)
		27..28	SMOOTH 2 (50 ms)
		29..30	SMOOTH 3 (75 ms)
		31..32	SMOOTH 4 (100 ms) (DEFAULT)
		33..34	SMOOTH 5 (125 ms)
		35..36	SMOOTH 6 (150 ms)
		37..38	SMOOTH 7 (175 ms)
		39..40	SMOOTH 8 (200 ms)
		41..42	SMOOTH 9 (225 ms)
		43..44	SMOOTH 10 (250 ms)
		45..46	SMOOTH 11 (275 ms)
		47..48	SMOOTH 12 (300 ms)
		49..50	SMOOTH 13 (325 ms)
		51..52	SMOOTH 14 (350 ms)
		53..54	SMOOTH 15 (375 ms)
		55..56	SMOOTH 16 (400 ms)
		57..58	SMOOTH 17 (425 ms)
		59..60	SMOOTH 18 (450 ms)
		61..62	SMOOTH 19 (475 ms)
		63..64	SMOOTH 20 (500 ms)
		65..74	GAMMA CORRECTION ($\cos^2 P$) QUADRATIC (DEFAULT)
		75..84	GAMMA CORRECTION ($\cos^2 P$) LINEAR
		85..104	OUTPUT FREQUENCY 610 Hz (DEFAULT)
		105	OUTPUT FREQUENCY 800 Hz
		106	OUTPUT FREQUENCY 1000 Hz
		107	OUTPUT FREQUENCY 1500 Hz
		108	OUTPUT FREQUENCY 2000 Hz
		109	OUTPUT FREQUENCY 2500 Hz
		110	OUTPUT FREQUENCY 3000 Hz
		111	OUTPUT FREQUENCY 3500 Hz
		112	OUTPUT FREQUENCY 4000 Hz
		113	OUTPUT FREQUENCY 4500 Hz
		114	OUTPUT FREQUENCY 5000 Hz
		115..134	RESERVED
		135..144	BOOST ON (DEFAULT)
		145..154	BOOST OFF
		155..164	DISPLAY STAND-BY OFF (DEFAULT)
		165..174	DISPLAY STAND-BY ON
		175..176	NO DMX ACTION – KEEP LAST DMX (DEFAULT)
		177..178	NO DMX ACTION – Black-out
		179..180	NO DMX ACTION – RGB @ 100% (White channel OFF)
		181..182	NO DMX ACTION – CHPR (PROGRAM STEPS 01..16) WAIT and SPEED time selectable via NDMX > CHPR menu
		183..184	NO DMX ACTION – CUSTOM (RGBW, CCT, Dimmer, Zoom values selectable via NDMX > CUSTOM menu or via RDM Custom PIDs)
		185..194	RESERVED
		195..204	RESERVED
		205..214	RESERVED
		215..224	RESERVED
		225..234	RESERVED
		235..244	FAN STANDARD MODE
		245..252	FAN SILENT MODE (DEFAULT)

<i>Ch</i>	<i>Name</i>	<i>DMX levels</i>	
10	FUNCTIONS (staying on desired option for 5 seconds)	253..255	SET DEFAULTS VALUES FOR FUNCTIONS: SMOOTH = 4 (100 ms) GAMMA CORRECTION (γ) = QUADRATIC OUTPUT FREQUENCY = 610 Hz BOOST = ON DISPLAY STAND-BY = OFF NO DMX ACTION = KEEP LAST DMX FAN MODE = SILENT

4 CHANNELS MODE

- 1 RED
- 2 GREEN
- 3 BLUE
- 4 WHITE

<i>Ch</i>	<i>Name</i>	<i>DMX levels</i>	
1	RED	0..255	Proportional color from min to max
2	GREEN	0..255	Proportional color from min to max
3	BLUE	0..255	Proportional color from min to max
4	WHITE	0..255	Proportional color from min to max

6 CHANNELS MODE

- 1 RED
- 2 GREEN
- 3 BLUE
- 4 WHITE
- 5 SHUTTER
- 6 DIMMER

<i>Ch</i>	<i>Name</i>	<i>DMX levels</i>	
1	RED	0..255	Proportional color from min to max
2	GREEN	0..255	Proportional color from min to max
3	BLUE	0..255	Proportional color from min to max
4	WHITE	0..255	Proportional color from min to max
5	SHUTTER	0..9	Black-out
		10..19	Open
		20..29	Black-out
		30..119	Strobe (da 3,27 s a 30 ms)
		120..149	Pulse up (da 42,6 s a 120 ms)
		150..179	Pulse down (da 42,6 s a 120 ms)
		180..204	Random strobe (RGBW, CCT, Macro, Dimmer, Dimmer Fine active)
		205..229	Independent random strobe (Dimmer, Dimmer Fine active)
		230..235	Single flash 30 ms (RGBW, CCT, Macro, Dimmer, Dimmer Fine active)
		236..255	Open
6	DIMMER	0..255	Proportional dimmer from min to max

“FINE” MODE (10 CHANNELS)

- 1 RED**
- 2 RED FINE**
- 3 GREEN**
- 4 GREEN FINE**
- 5 BLUE**
- 6 BLUE FINE**
- 7 WHITE**
- 8 WHITE FINE**
- 9 DIMMER**
- 10 DIMMER FINE**

<i>Ch</i>	<i>Name</i>	<i>DMX levels</i>	
1	RED	0..255	Proportional color from min to max
2	RED FINE	0..255	Proportional color from min to max
3	GREEN	0..255	Proportional color from min to max
4	GREEN FINE	0..255	Proportional color from min to max
5	BLUE	0..255	Proportional color from min to max
6	BLUE FINE	0..255	Proportional color from min to max
7	WHITE	0..255	Proportional color from min to max
8	WHITE FINE	0..255	Proportional color from min to max
9	DIMMER	0..255	Proportional dimmer from min to max
10	DIMMER FINE	0..255	Proportional dimmer from min to max

NOTES

PROUDLY
MADE IN ITALY



DTS products are designed
and manufactured at the
DTS plants in Italy



ISO 9001:2008

DTS quality system is certified
to the ISO 9001:2008 standard

D.T.S. Illuminazione s.r.l. • Via Fagnano Selve 12-14
47843 Misano Adriatico (RN) Italy
Tel.: +39 0541 611131 • Fax +39 0541 611111
info@dots-lighting.it • www.dots-lighting.it



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