



Crown FX PAR 77 LED spotlight

Musikhaus Thomann

Thomann GmbH

Hans-Thomann-Straße 1

96138 Burgebrach

Germany

Telephone: +49 (0) 9546 9223-0

E-mail: info@thomann.de

Internet: www.thomann.de

06.02.2018, ID: 416120

Table of contents

1		ieral notes	
	1.1	Further information	. 6
		Notational conventions	
	1.3	Symbols and signal words	. 7
2	Safe	ety instructions	10
3	Fea	tures	15
4	Inst	allation	16
5	Con	nections and operating elements	20
6		erating	
		Operating on the unit	
		Remote control functions	
		Menu overview	
		Functions in 2-channel DMX mode	
		Functions in 6-channel DMX mode	
	6.6	Functions in 9-channel DMX mode	35



Table of contents

	6.7 Functions in 22-channel DMX mode	37
7	Technical specifications	43
8	Cleaning	44
9	Protecting the environment	45



1 General notes

This manual contains important instructions for the safe operation of the unit. Read and follow the safety instructions and all other instructions. Keep the manual for future reference. Make sure that it is available to all those using the device. If you sell the unit please make sure that the buyer also receives this manual.

Our products are subject to a process of continuous development. Thus, they are subject to change.



1.1 Further information

On our website (<u>www.thomann.de</u>) you will find lots of further information and details on the following points:

Download	This manual is also available as PDF file for you to download.
Keyword search	Use the search function in the electronic version to find the topics of interest for you quickly.
Online guides	Our online guides provide detailed information on technical basics and terms.
Personal consultation	For personal consultation please contact our technical hotline.
Service	If you have any problems with the device the customer service will gladly assist you.



1.2 Notational conventions

This manual uses the following notational conventions:

Letterings The letterings for connectors and controls are marked by square brackets and italics.

Examples: [VOLUME] control, [Mono] button.

DisplaysTexts and values displayed on the device are marked by quotation marks and italics.

Examples: '24ch', 'OFF'.

1.3 Symbols and signal words

In this section you will find an overview of the meaning of symbols and signal words that are used in this manual.



Signal word	Meaning
DANGER!	This combination of symbol and signal word indicates an immediate dangerous situation that will result in death or serious injury if it is not avoided.
WARNING!	This combination of symbol and signal word indicates a possible dangerous situation that can result in death or serious injury if it is not avoided.
NOTICE!	This combination of symbol and signal word indicates a possible dangerous situation that can result in material and environmental damage if it is not avoided.
Warning signs	Type of danger
A	Warning – high-voltage.
	Warning – suspended load.



Warning signs	Type of danger
<u>^</u>	Warning – danger zone.

2 Safety instructions

Intended use

This device is intended to be used as an electronic illumination effect using LED technics. The device is designed for professional use and is not suitable for use in households. Use the device only as described in this user manual. Any other use or use under other operating conditions is considered to be improper and may result in personal injury or property damage. No liability will be assumed for damages resulting from improper use.

This device may be used only by persons with sufficient physical, sensorial, and intellectual abilities and having corresponding knowledge and experience. Other persons may use this device only if they are supervised or instructed by a person who is responsible for their safety.



Safety



DANGER!

Danger for children

Ensure that plastic bags, packaging, etc. are disposed of properly and are not within reach of babies and young children. Choking hazard!

Ensure that children do not detach any small parts (e.g. knobs or the like) from the unit. They could swallow the pieces and choke!

Never let children unattended use electrical devices.



DANGER!

Electric shock caused by high voltages inside

Within the device there are areas where high voltages may be present. Never remove any covers.

There are no user-serviceable parts inside.

Do not use the device if covers, protectors or optical components are missing or damaged.





DANGER!

Electric shock caused by short-circuit

Always use proper ready-made insulated mains cabling (power cord) with a protective contact plug. Do not modify the mains cable or the plug. Failure to do so could result in electric shock/death or fire. If in doubt, seek advice from a registered electrician.



WARNING!

Eye damage caused by high light intensity

Never look directly into the light source.



WARNING!

Risk of epileptic shock

Strobe lighting can trigger seizures in photosensitive epilepsy. Sensitive persons should avoid looking at strobe lights.





NOTICE!

Risk of fire

Do not block areas of ventilation. Do not install the device near any direct heat source. Keep the device away from naked flames.



NOTICE!

Operating conditions

This device has been designed for indoor use only. To prevent damage, never expose the device to any liquid or moisture. Avoid direct sunlight, heavy dirt, and strong vibrations.





NOTICE!

Power supply

Before connecting the device, ensure that the input voltage (AC outlet) matches the voltage rating of the device and that the AC outlet is protected by a residual current circuit breaker. Failure to do so could result in damage to the device and possibly injure the user.

Unplug the device before electrical storms occur and when it is unused for long periods of time to reduce the risk of electric shock or fire.



3 Features

LED spotlight with stroboscope and pixel effect ring.

- 9 × RGBUV LEDs (4 W), grouped into three zones
- 1 × RGB COB LED (30 W)
- 21 × stroboscope LEDs (0.5 W)
- Control via DMX (four modes), the supplied remote control and via buttons and display on the unit
- 17 preprogrammed automatic shows
- Sound control
- Master / Slave operation



4 Installation

Unpack and carefully check that there is no transportation damage before using the unit. Keep the equipment packaging. To fully protect the device against vibration, dust and moisture during transportation or storage use the original packaging or your own packaging material suitable for transport or storage, respectively.



WARNING!

Risk of injury caused by falling objects

Make sure that the installation complies with the standards and rules that apply in your country. Always secure the device with a secondary safety attachment, such as a safety cable or a safety chain.





NOTICE!

Risk of overheating

Always ensure sufficient ventilation.

The ambient temperature must always be below 40 °C (104 °F).



NOTICE!

Use of stands



When mounting the device onto a stand, ensure that the stand is in a safe and stable position and that the weight of the device does not exceed the maximum permissible load capacity of the stand.





NOTICE!

Possible data transmission errors

For error-free operation make use of dedicated DMX cables and do not use ordinary microphone cables.

Never connect the DMX input or output to audio devices such as mixers or amplifiers.

Mounting options

You can install the unit in hanging or standing position. When in use, the device must always be attached to a solid surface or an approved truss. Use the openings provided on the two-piece bracket for attaching.

Always work from a stable platform whenever installing, moving or servicing the unit. In doing so, the area underneath the unit must be cordoned off.

The safety cable must be threaded through the safety eyelet.

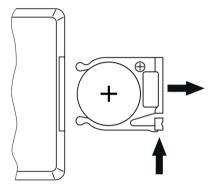
Infrared sensor for the remote control

The infrared sensor for the remote control signals is located on the front panel near the central LED. Make sure it's not covered.



LED spotlight

Inserting the battery into the remote control

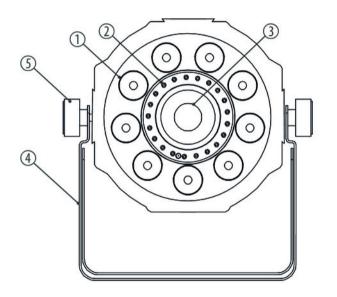


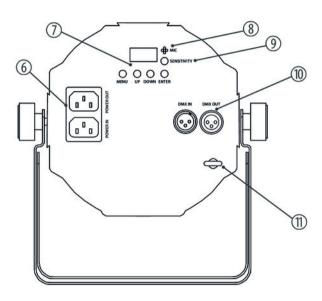
Press the lock of the battery holder to the centre of the housing and pull out the battery holder like a drawer. Insert the battery. The battery is correct if the positive pole points to the housing base of the remote control. Slide the battery holder back into the remote until it clicks into place.

When shipping, the battery is already installed in the remote and protected against discharge by a transparent plastic foil. Remove the plastic foil prior to first use.



5 Connections and operating elements





1	9 × RGBUV LEDs, grouped into three zones.		
2	21 × stroboscope LEDs.		
3	1 × RGB COB LED.		
4	Mounting bracket.		
5	Locking screws for the mounting bracket.		
6	[POWER OUT]		
	IEC chassis socket to power another device with mains voltage.		
	[POWER IN]		
	IEC chassis plug for operating voltage supply, with fuse holder.		



Connections and operating elements

7	Display and control buttons:		
	[MENU]: Activates the main menu and toggles between menu items.		
	[UP]: Increases the displayed value by one.		
	[DOWN]: Decreases the displayed value by one.		
	[ENTER]: Selects an option of the respective operating mode.		
8	[MIC]		
	Built-in microphone for sound-controlled operation.		
9	[SENSITIVITY]		
	Control to adjust the sensitivity of the built-in microphone.		
10	[DMX IN]: DMX input socket		
	[DMX OUT]: DMX output socket		
11	Safety cable eyelet.		



6 Operating

6.1 Operating on the unit

Connect the device to the power supply to start operation. All functions of the device are controlled via the buttons and display on the unit as well as the supplied remote control.

Press [MENU] to open the main menu. Use [UP] and [DOWN] to select a submenu or to change the respectively indicated value. When the display shows the desired value press [ENTER].

Operating mode 'Automatic'

In automatic mode, you can call up one of 17 automatic shows. This setting is only relevant if the device is not controlled via DMX.

Press [MENU] repeatedly until the display shows 'Aut'. Confirm with [ENTER] and use [UP] or [DOWN] one of 17 LED shows 'P01' ... 'P17'. Confirm with [ENTER]. The display shows 'Sxx'. Use [UP] or [DOWN] to set the programme speed in a range from 'S01' (slow) to 'S99' (fast). Confirm again with [ENTER] to apply the setting.



Operating mode 'Sound'

In sound-controlled mode, you have the option to select one of 13 colour LED shows. This setting is only relevant if the device is not controlled via DMX. The programme control is based on the signals received via the built-in microphone. The sensitivity of the built-in microphone is set manually via the controller on the device.

Press [MENU] repeatedly until the display shows 'Sou'. Confirm with [ENTER] and use [UP] or [DOWN] to select one of the colour LED shows 'S01' ... 'S12'. Confirm with [ENTER] to apply the setting.



Constant colour pattern

In this mode, you can manually set a constant colour pattern for all LEDs. This setting is only relevant if the device is not controlled via DMX.

Press [MENU] repeatedly until the display shows 'CoLo'.

Use [UP] or [DOWN] to select the submenu 'r.xxx'. Confirm with [ENTER] and use [UP] or [DOWN] to adjust the intensity of the colour red for all LEDs in a range from 'r.000' ... 'r.255'. Confirm with [ENTER].

Use [UP] or [DOWN] to select the submenu 'G.xxx'. Confirm with [ENTER] and use [UP] or [DOWN] to adjust the intensity of the colour green for all LEDs in a range from 'G.000' ... 'G. 255'. Confirm with [ENTER].

Use [UP] or [DOWN] to select the submenu 'b.xxx'. Confirm with [ENTER] and use [UP] or [DOWN] to adjust the intensity of the colour blue for all LEDs in a range from 'b.000' ... 'b.255'. Confirm with [ENTER].

Use [UP] or [DOWN] to select the submenu 'U.xxx'. Confirm with [ENTER] and use [UP] or [DOWN] to adjust the intensity of the colour white for all LEDs in a range from 'U.000' ... 'U. 255'. Confirm with [ENTER].

Use [UP] or [DOWN] to select the submenu 'S.xxx'. Confirm with [ENTER] and use [UP] or [DOWN] to set the flash frequency for the stroboscope effect in a range from 'S.001' (slow) to 'S.099' (fast). Confirm again with [ENTER] to apply the setting.



DMX mode

This setting is only relevant when the device is controlled via DMX.

Press [MENU] repeatedly until the display shows 'dMH'. Confirm with [ENTER] and use [UP] or [DOWN] to select the desired DMX mode.

Mode	Display	Highest possible DMX address
2-channel	′02Ch′	511
6-channel	′06Ch′	507
9-channel	′09Ch′	504
22-channel	'22Ch'	491

Confirm with [ENTER]. Now you can set the number of the first DMX channel to be used by the device (DMX address). Use [UP] and [DOWN] to select a value between 'd001' ... 'd511' and confirm with [ENTER].

Operating mode 'Slave'

This setting is only relevant if the device is working as Slave in a Master / Slave configuration and is not controlled via DMX.

Press [MENU] repeatedly until the display shows 'SLA'. Press [ENTER] to enable the Slave mode.



LED spotlight

Power saving mode

In this menu, you have the option to enable the power saving mode.

Press [MENU] repeatedly until the display shows 'SyS'. Use [UP] or [DOWN] to select the option 'LEds'. Confirm with [ENTER].

Use [UP] or [DOWN] to select the option 'oN' to enable the power saving mode, or 'oFF' to disable the mode. Confirm with [ENTER] to apply the setting.

Inverting the Display by 180°

In this menu, you have the option to rotate the Display by 180°. This makes it easier to read the display when the unit is installed overhead.

Press [MENU] repeatedly until the display shows 'SyS'. Use [UP] or [DOWN] to select the option 'LEdr'. Confirm with [ENTER].

Use [UP] or [DOWN] to select the option 'ON' to rotate the display by 180°, or 'OFF' for normal display. Confirm with [ENTER] to apply the setting.

Reset to factory defaults

Proceed as follows to reset the device to factory defaults:

Press [MENU] repeatedly until the display shows 'SyS'. Use [UP] or [DOWN] to select the option 'rEST'.

Confirm with [ENTER] to reset the device to the factory default settings.



6.2 Remote control functions

The unit functions can be controlled by the included remote control. To use the remote control, point its infrared diode at the infrared sensor on the unit and press the desired buttons.

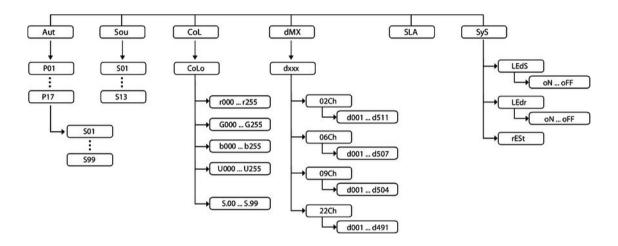




Button labelling:	Function
[AUTO]	Enable / disable the automatic mode, selecting programme P01 P17.
[MUSIC]	Enable / disable the sound-controlled mode, selecting S01 S13.
[ON/OFF]	Blackout
[-]	Selecting fixed colour C01 C23.
[11]	Pause button
[+]	Selecting fixed colour C01 C23.
[A]	No function.
[B]	No function.
[C]	No function.
[0] [9]	Selecting programme speed (0 = slow, 9 = fast)
[-/]	No function.
Arrow button	Button to switch between auto and sound-controlled mode.



6.3 Menu overview





6.4 Functions in 2-channel DMX mode

Channel	Value	Function
1	05	all LEDs off
	6 19	Auto programme 1, if channel $2 = 0 \dots 250$
		Sound programme 1, if channel 2 = 251 255
	20 34	Auto programme 2, if channel $2 = 0 \dots 250$
		Sound programme 2, if channel 2 = 251 255
	35 48	Auto programme 3, if channel $2 = 0 \dots 250$
		Sound programme 3, if channel 2 = 251 255
	49 63	Auto programme 4, if channel $2 = 0 \dots 250$
		Sound programme 4, if channel 2 = 251 255
	64 77	Auto programme 5, if channel $2 = 0 \dots 250$
		Sound programme 5, if channel 2 = 251 255



Channel	Value	Function
	78 92	Auto programme 6, if channel $2 = 0 \dots 250$
		Sound programme 6, if channel 2 = 251 255
	93 106	Auto programme 7, if channel $2 = 0 \dots 250$
		Sound programme 7, if channel 2 = 251 255
	107 121	Auto programme 8, if channel 2 = 0 250
		Sound programme 8, if channel 2 = 251 255
	122 135	Auto programme 9, if channel $2 = 0 \dots 250$
		Sound programme 9, if channel 2 = 251 255
	136 150	Auto programme 10, if channel 2 = 0 250
		Sound programme 10, if channel 2 = 251 255
	151 164	Auto programme 11, if channel 2 = 0 250
		Sound programme 11, if channel 2 = 251 255



Channel	Value	Function
	165 179	Auto programme 12, if channel 2 = 0 250
		Sound programme 12, if channel 2 = 251 255
	180 193	Auto programme 13, if channel 2 = 0 250
		Sound programme 13, if channel 2 = 251 255
	194 208	Auto programme 14, if channel 2 = 0 250
		Sound programme 13, if channel 2 = 251 255
	209 222	Auto programme 15, if channel 2 = 0 250
		Sound programme 13, if channel 2 = 251 255
	223 237	Auto programme 16, if channel 2 = 0 250
		Sound programme 13, if channel 2 = 251 255
	238 255	Auto programme 17, if channel 2 = 0 250
		Sound programme 13, if channel 2 = 251 255

Channel	Value	Function
2	0 250	Programme speed increasing
	251 255	Sound-controlled mode, specifies the auto programme / sound programme setting for channel 1.

6.5 Functions in 6-channel DMX mode

Channel	Value	Function
1	0 255	Intensity red (0 % to 100 %), PAR and COB LEDs
2	0 255	Intensity green (0 % to 100 %), PAR and COB LEDs
3	0 255	Intensity blue (0 % to 100 %), PAR and COB LEDs
4	0 255	Intensity UV (0 % to 100 %), PAR and COB LEDs
5	0 5	Strobe effect off
	6 250	Strobe effect, increasing speed, all colour LEDs



Channel	Value	Function
	251 255	Strobe effect sound mode, all colour LEDs
6	05	No function
	6 20	Strobe LED ring constantly on
	21 250	Strobe effect, increasing speed, strobe LED ring
	251 255	Strobe effect sound mode, strobe LED ring

6.6 Functions in 9-channel DMX mode

Channel	Value	Function
1	0 255	Intensity red (0 % to 100 %), PAR LEDs
2	0 255	Intensity green (0 % to 100 %), PAR LEDs
3	0 255	Intensity blue (0 % to 100 %), PAR LEDs



Operating

Channel	Value	Function
4	0 255	Intensity UV (0 % to 100 %), PAR LEDs
5	0 255	Intensity red (0 % to 100 %), COB LED
6	0 255	Intensity green (0 % to 100 %), COB LED
7	0 255	Intensity blue (0 % to 100 %), COB LED
8	0 5	Strobe effect off
	6 250	Strobe effect, increasing speed, all colour LEDs
	251 255	Strobe effect sound mode, all colour LEDs
9	0 5	No function
	6 20	Strobe LED ring constantly on
	21 250	Strobe effect, increasing speed, strobe LED ring
	251 255	Strobe effect sound mode, strobe LED ring



6.7 Functions in 22-channel DMX mode

Channel	Value	Function
1	0 255	Intensity red (0 % to 100 %), PAR LEDs zone 1
2	0 255	Intensity green (0 % to 100 %), PAR LEDs zone 1
3	0 255	Intensity blue (0 % to 100 %), PAR LEDs zone 1
4	0 255	Intensity UV (0 % to 100 %), PAR LEDs zone 1
5	0 5	Strobe effect off, zone 1
	6 250	Strobe effect, increasing speed, zone 1
	251 255	Strobe effect sound mode, zone 1
6	0 255	Intensity red (0 % to 100 %), PAR LEDs zone 2
7	0 255	Intensity green (0 % to 100 %), PAR LEDs zone 2
8	0 255	Intensity blue (0 % to 100 %), PAR LEDs zone 2
9	0 255	Intensity UV (0 % to 100 %), PAR LEDs zone 2



Operating

Channel	Value	Function
10	0 5	Strobe effect off, zone 2
	6 250	Strobe effect, increasing speed, zone 2
	251 255	Strobe effect sound mode, zone 2
11	0 255	Intensity red (0 % to 100 %), PAR LEDs zone 3
12	0 255	Intensity green (0 % to 100 %), PAR LEDs zone 3
13	0 255	Intensity blue (0 % to 100 %), PAR LEDs zone 3
14	0 255	Intensity UV (0 % to 100 %), PAR LEDs zone 3
15	0 5	Strobe effect off, zone 3
	6 250	Strobe effect, increasing speed, zone 3
	251 255	Strobe effect sound mode, zone 3
16	0 255	Intensity red (0 % to 100 %), COB LED
17	0 255	Intensity green (0 % to 100 %), COB LED
18	0 255	Intensity blue (0 % to 100 %), COB LED



LED spotlight

Channel	Value	Function
19	05	Strobe effect off
	6 250	Strobe effect, increasing speed, COB LED
	251 255	Strobe effect sound mode, COB LED
20	05	No function
	6 20	Strobe LED ring constantly on
	21 250	Strobe effect, increasing speed, strobe LED ring
	251 255	Strobe effect sound mode, strobe LED ring
21	05	all LEDs off
	619	Auto programme 1, if channel 22 = 0 250
		Sound programme 1, if channel 22 = 251 255
	20 34	Auto programme 2, if channel 22 = 0 250
		Sound programme 2, if channel 22 = 251 255

Channel	Value	Function
	35 48	Auto programme 3, if channel 22 = 0 250
		Sound programme 3, if channel 22 = 251 255
	49 63	Auto programme 4, if channel 22 = 0 250
		Sound programme 4, if channel 22 = 251 255
	64 77	Auto programme 5, if channel 22 = 0 250
		Sound programme 5, if channel 22 = 251 255
	78 92	Auto programme 6, if channel 22 = 0 250
		Sound programme 6, if channel 22 = 251 255
	93 106	Auto programme 7, if channel 22 = 0 250
		Sound programme 7, if channel 22 = 251 255
	107 121	Auto programme 8, if channel 22 = 0 250
		Sound programme 8, if channel 22 = 251 255



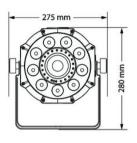
Channel	Value	Function
	122 135	Auto programme 9, if channel 22 = 0 250
		Sound programme 9, if channel 22 = 251 255
	136 150	Auto programme 10, if channel 22 = 0 250
		Sound programme 10, if channel 22 = 251 255
	151 164	Auto programme 11, if channel 22 = 0 250
		Sound programme 11, if channel 22 = 251 255
	165 179	Auto programme 12, if channel 22 = 0 250
		Sound programme 12, if channel 22 = 251 255
	180 193	Auto programme 13, if channel 22 = 0 250
		Sound programme 13, if channel 22 = 251 255
	194 208	Auto programme 14, if channel 22 = 0 250
		Sound programme 13, if channel 22 = 251 255

Operating

Channel	Value	Function
	209 222	Auto programme 15, if channel $22 = 0 \dots 250$
		Sound programme 13, if channel 22 = 251 255
	223 237	Auto programme 16, if channel $22 = 0 \dots 250$
		Sound programme 13, if channel 22 = 251 255
	238 255	Auto programme 17, if channel $22 = 0 \dots 250$
		Sound programme 13, if channel 22 = 251 255
22	0 250	Programme speed increasing
	251 255	Sound-controlled mode, specifies the auto programme / sound programme setting for channel 21.



7 Technical specifications





LED configuration:	$9 \times RGBUV$ LEDs (4 W), grouped into three zones
	1 × RGB COB LED (30 W)
	21 × stroboscope LEDs (0.5 W)
Number of DMX channels	2, 6, 9, 22
Operating supply voltage	AC 100 240 V ~ 50/60 Hz
Power consumption	78 W
Fuse	5 mm × 20 mm, 1.6 A, 250 V, slow-blow
Dimensions (W \times H \times D)	275 mm × 280 mm × 76 mm
Weight	Approx. 1.7 kg

8 Cleaning

Device components

Clean the device components that are accessible from the outside regularly. The cleaning frequency depends on the operating environment: damp, smoky or particularly dirty environments can cause greater accumulation of dirt on the device components.

- Clean with a dry soft cloth.
- Stubborn dirt can be removed with a slightly dampened cloth.
- Never use solvents or alcohol for cleaning.



9 Protecting the environment

Disposal of the packaging material



For the transport and protective packaging, environmentally friendly materials have been chosen that can be supplied to normal recycling.

Ensure that plastic bags, packaging, etc. are properly disposed of.

Do not just dispose these materials with your normal household waste, but make sure that they are fed to a recovery. Please follow the notes and markings on the packaging.

Disposal of batteries



Batteries must not be disposed of as domestic waste or thrown into fire. Dispose of the batteries according to national or local regulations regarding hazardous waste. To protect the environment, dispose of empty batteries at your retail store or at appropriate collection sites.



Disposal of your old device



This product is subject to the European Waste Electrical and Electronic Equipment Directive (WEEE) in its currently valid version. Do not dispose with your normal household waste.

Dispose this device through an approved waste disposal firm or through your local waste facility. When discarding the device, comply with the rules and regulations that apply in your country. If in doubt, consult your local waste disposal facility.



