DMX REFERENCE

# LCBP 450 Combi LEDPanel PIX

LCBP450CombiLED

BeamZ Pro



| | |
|---|---|
| **Manufacturer** | BeamZ Pro |
| **GDTF file** | BeamZ_Pro_LCBP_450_Combi_LEDPanel_PIX_154508.gdtf |
| **GDTF revision** | rev102 RELEASE · 2026-08-07 |
| **Generated** | 2026-11-23 |

# Contents

**1 About this manual** 2
**2 Quick reference** 3
**3 Safety instructions** 4
**4 Product description** 4
**5 Installation** 5
**6 Connections** 5
**7 Operation** 6
**8 Functions at a glance** 6
**9 DMX channels** 10
Mode 175 Ch + Virtual Dimmer / PT 10
Mode 27 Ch 13
Mode 175 Ch 23
**10 Technical specifications** 27
**11 Maintenance and cleaning** 27
**12 Troubleshooting** 28
**13 Disposal** 28

# 1 About this manual

This document describes the LCBP450CombiLED by BeamZ Pro. It was compiled from the GDTF file BeamZ_Pro_LCBP_450_Combi_LEDPanel_PIX_154508.gdtf from the GDTF-Share library.

File revision: “rev102 RELEASE”.

The DMX modes, the channel functions and the technical data are given as the GDTF file states them. Installation, operation from the device's control panel, service and safety instructions are described in the manufacturer's original user manual, which takes precedence over this document.

This document was not issued or endorsed by BeamZ Pro; product names and trademarks belong to their owners.

Safety notices are marked with signal words according to the severity of the hazard: DANGER – an imminent hazard that will result in death or serious injury; WARNING – a potential hazard that could result in death or serious injury; CAUTION – a potential hazard that could result in minor injury or property damage; NOTE – additional information for correct and safe use.

> **NOTE** This product is designed for stage and effect lighting. It is not suitable for household room illumination.

# 2 Quick reference

| Parameter | Value |
|---|---|
| Weight | 8.8 kg |
| Ingress protection | IP20 |

### DMX modes

| Mode | Channels | Units in one universe | First start addresses |
|---|---|---|---|
| 175 Ch + Virtual Dimmer / PT | 175 | 2 | 1, 176 |
| 27 Ch | 27 | 18 | 1, 28, 55, 82, ... |
| 175 Ch | 175 | 2 | 1, 176 |

### No light? Check these channels

- 27 Ch: CH 2 Shutter 1 at 0–3 “Open”; CH 16 Shutter 2 at 0–3 “Open”



Read the manual before use



Do not stare into the light




Indoor use only

# 3 Safety instructions



Read the manual before use



Do not stare into the light




Indoor use only

**⚠ WARNING**

- This device is intended for professional use. Installation, connection, setup and maintenance must be carried out only by suitably qualified persons who have read this manual.
- Use the device only for its intended purpose and as described in this manual.
- Do not open the housing and do not modify or tamper with the device. Refer all repairs to an authorized service center.
- Do not use the device if its housing, power or data cable, or a connector is damaged, if the device has been dropped, or if liquid or a foreign object has entered it. In such a case, have it checked by a service center.
- Disconnect the device from the power supply before cleaning, maintenance or any work on the connections.
- After moving the device from a cold to a warm environment, let it reach room temperature before switching it on to prevent condensation inside.
- The device is not a toy; keep it out of the reach of children.

**⚠ WARNING**

- This device is designed for indoor use only. Protect it from rain, splashing water, moisture and dust, and do not place containers with liquids on it.
- Ingress protection rating: IP20.
- Do not operate the device in high humidity, near water, or where condensation can form on it.

**⚠ CAUTION**

- This device emits intense light. Do not look directly into the light source or the beam at close range; doing so may damage your eyes.
- Do not aim the beam at the eyes of people or animals at close range, and do not view the light source through optical instruments (binoculars, camera lenses).
- Do not aim the beam at flammable or heat-sensitive materials at close range.

**⚠ CAUTION**

- Strobe and fast flashing light effects can trigger epileptic seizures in susceptible people (photosensitive epilepsy) and can cause nausea or disorientation.
- Inform the audience and performers in advance that strobe effects will be used, for example with a notice at the entrance, and do not use them longer than necessary.

# 4 Product description

**Description in the GDTF file**

“Hybrid LED Panel :: IP20 / 25 x 10 W RGBW + 200 x 0,5 W RGB SMD LED”

# 5 Installation

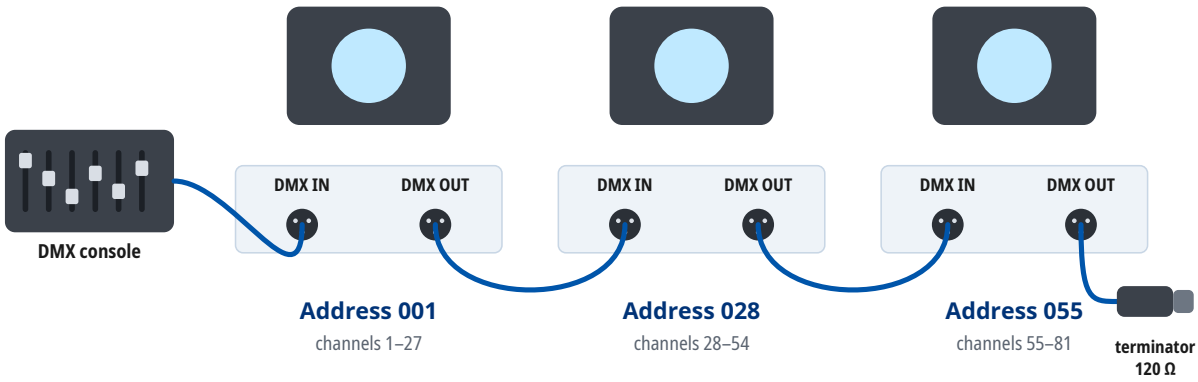
**⚠ WARNING**

- Rigging must be carried out only by qualified persons in accordance with applicable regulations, in particular those for work at height.
- The supporting structure and fixings must safely carry the weight of all suspended devices; verify their load capacity in advance.
- Weight of the device: 8.8 kg.
- Use suitable mounting hardware (for example truss clamps) and tighten all screw connections properly.
- Always secure the suspended device against falling with a safety cable of adequate load capacity, routed through a fixed point of the device and around the supporting structure.
- During installation and removal, keep people out of the area below the work position.
- Regularly inspect the fixings and the safety cable for damage, corrosion and loosening.

# 6 Connections

- Use shielded cable designed for DMX512 with an impedance of 110 Ω. Ordinary microphone cable is not suitable for DMX, especially over longer distances.
- Connect the devices in a daisy chain: connect the DMX OUT of one device to the DMX IN of the next. Do not split the line with Y-cables or wire it in a star; the line may be split only with a DMX splitter.
- Connect the shield to pin 1 only. Do not connect the shield (ground) to the metal shell of the connector; this can cause short circuits or erratic behavior.
- XLR pin assignment: pin 1 – shield (ground), pin 2 – Data- (Data Complement), pin 3 – Data+ (Data True). On 5-pin connectors, pins 4 and 5 are not connected; a 5-pin connector can be connected to a 3-pin one with a cable adapter.
- Terminate the end of the line (for impedance matching): plug an XLR connector with a 120 Ω, ¼ W resistor between pins 2 and 3 into the DMX OUT of the last device. This reduces the risk of erratic behavior.
- Connect no more than 32 devices to one DMX line. For more devices or longer runs, use a DMX splitter or booster.

**DMX line**




Mode 27 Ch: every unit occupies 27 channels from its address. At most 32 units on one line; for more units or longer runs use a DMX splitter. A 120 Ω terminator closes the last DMX OUT.

# 7 Operation

### Setting the DMX address

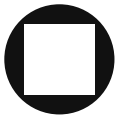
- The device occupies as many consecutive channels in the DMX universe as the selected DMX mode uses, starting at the set start address.
- Number of channels occupied in the DMX mode “175 Ch + Virtual Dimmer / PT”: 175.
- Choose start addresses so that the channels of individual devices do not overlap and the last occupied channel does not exceed 512. Devices with the same start address and mode respond identically.
- For several devices in a row in the DMX mode “175 Ch + Virtual Dimmer / PT”, you can use, for example, the start addresses 1, 176.
- The DMX mode set on the device must match the fixture profile (personality) used in the controller.

# 8 Functions at a glance

### Functions in each DMX mode

| | 175 Ch + Virtual Dimmer / PT<br>175 channels | 27 Ch<br>27 channels | 175 Ch<br>175 channels |
|---|---|---|---|
| Pan / Tilt | ✓ | | |
| Dimmer | ✓ | 1 | |
| Shutter / strobe | | 2, 16 | |
| Color mixing | 1–175 | 14 channels (3–27) | 1–175 |
| Gobo wheel | | 7, 8, 20, 21 | |
| Effects / macros | | 9–11, 22–24 | |
| Pixel control | 25 + 25 cells | ✓ | 25 + 24 cells |

## Gobo wheel 1

1 
Gobo1 Alphabet OFF

2 
Gobo1 Alphabet A

3 
Gobo1 Alphabet B

4 
Gobo1 Alphabet C

5 
Gobo1 Alphabet D

6 
Gobo1 Alphabet E

7 
Gobo1 Alphabet F

8 
Gobo1 Alphabet G

9 
Gobo1 Alphabet H

10 
Gobo1 Alphabet I

11 
Gobo1 Alphabet J

12 
Gobo1 Alphabet K

13 
Gobo1 Alphabet L

14 
Gobo1 Alphabet M

15 
Gobo1 Alphabet N

16 
Gobo1 Alphabet O

17 
Gobo1 Alphabet P

18 
Gobo1 Alphabet Q

19 
Gobo1 Alphabet R

20 
Gobo1 Alphabet S

21 
Gobo1 Alphabet T

22 
Gobo1 Alphabet U

23 
Gobo1 Alphabet V

24 
Gobo1 Alphabet W

25 
Gobo1 Alphabet X

26 
Gobo1 Alphabet Y

27 
Gobo1 Alphabet Z

28 
Gobo1 Alphabet a

29 
Gobo1 Alphabet b

30 
Gobo1 Alphabet c

31 
Gobo1 Alphabet d

32 
Gobo1 Alphabet e

33 
Gobo1 Alphabet f

34 
Gobo1 Alphabet g

35 
Gobo1 Alphabet h

36 
Gobo1 Alphabet i

37 
Gobo1 Alphabet j

38 
Gobo1 Alphabet k

39 
Gobo1 Alphabet l

40 
Gobo1 Alphabet m

41 
Gobo1 Alphabet n

42 
Gobo1 Alphabet o

43 
Gobo1 Alphabet p

44 
Gobo1 Alphabet q

45 
Gobo1 Alphabet r

46 
Gobo1 Alphabet s

47 
Gobo1 Alphabet t

48 
Gobo1 Alphabet u



Gobo1 Alphabet v



Gobo1 Alphabet w



Gobo1 Alphabet x



Gobo1 Alphabet y

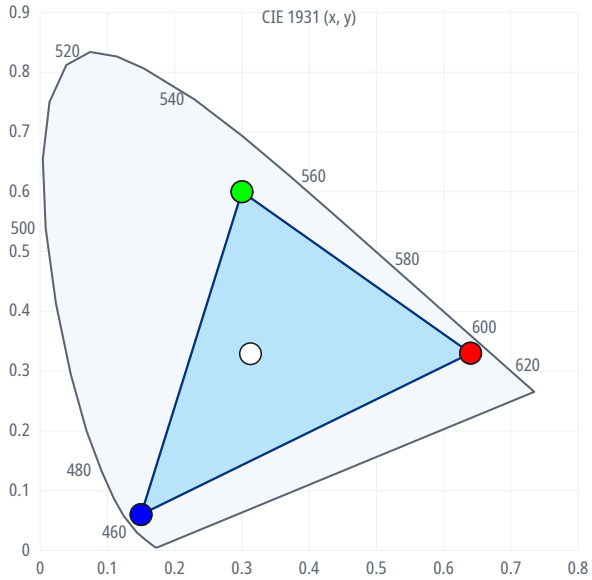


Gobo1 Alphabet z

## Gobo wheel 2

| | | |
|---|---|---|
| 1 Gobo1 Symbols OFF | 21 Gobo1 Symbols 20 | 41 Gobo1 Symbols 40 |
| 2 Gobo1 Symbols 1 | 22 Gobo1 Symbols 21 | 42 Gobo1 Symbols 41 |
| 3 Gobo1 Symbols 2 | 23 Gobo1 Symbols 22 | 43 Gobo1 Symbols 42 |
| 4 Gobo1 Symbols 3 | 24 Gobo1 Symbols 23 | 44 Gobo1 Symbols 43 |
| 5 Gobo1 Symbols 4 | 25 Gobo1 Symbols 24 | 45 Gobo1 Symbols 44 |
| 6 Gobo1 Symbols 5 | 26 Gobo1 Symbols 25 | 46 Gobo1 Symbols 45 |
| 7 Gobo1 Symbols 6 | 27 Gobo1 Symbols 26 | 47 Gobo1 Symbols 46 |
| 8 Gobo1 Symbols 7 | 28 Gobo1 Symbols 27 | 48 Gobo1 Symbols 47 |
| 9 Gobo1 Symbols 8 | 29 Gobo1 Symbols 28 | 49 Gobo1 Symbols 48 |
| 10 Gobo1 Symbols 9 | 30 Gobo1 Symbols 29 | 50 Gobo1 Symbols 49 |
| 11 Gobo1 Symbols 10 | 31 Gobo1 Symbols 30 | 51 Gobo1 Symbols 50 |
| 12 Gobo1 Symbols 11 | 32 Gobo1 Symbols 31 | 52 Gobo1 Symbols 51 |
| 13 Gobo1 Symbols 12 | 33 Gobo1 Symbols 32 | 53 Gobo1 Symbols 52 |
| 14 Gobo1 Symbols 13 | 34 Gobo1 Symbols 33 | 54 Gobo1 Symbols 53 |
| 15 Gobo1 Symbols 14 | 35 Gobo1 Symbols 34 | 55 Gobo1 Symbols 54 |
| 16 Gobo1 Symbols 15 | 36 Gobo1 Symbols 35 | 56 Gobo1 Symbols 55 |
| 17 Gobo1 Symbols 16 | 37 Gobo1 Symbols 36 | 57 Gobo1 Symbols 56 |
| 18 Gobo1 Symbols 17 | 38 Gobo1 Symbols 37 | 58 Gobo1 Symbols 57 |
| 19 Gobo1 Symbols 18 | 39 Gobo1 Symbols 38 | 59 Gobo1 Symbols 58 |
| 20 Gobo1 Symbols 19 | 40 Gobo1 Symbols 39 | 60 Gobo1 Symbols 59 |
| 61 Gobo1 Symbols 60 | 63 Gobo1 Symbols 62 | |
| 62 Gobo1 Symbols 61 | 64 Gobo1 Symbols 63 | |

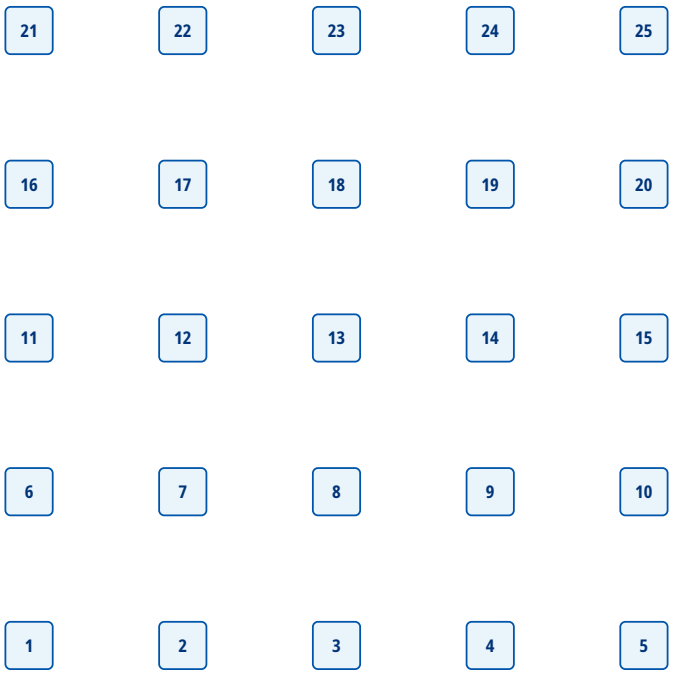
## LED colors and the colors they mix




| LED | x | y |
|---|---|---|
| Beam Pixel RGBW Red | 0.640 | 0.330 |
| Beam Pixel RGBW Green | 0.300 | 0.600 |
| Beam Pixel RGBW Blue | 0.150 | 0.060 |
| Beam Pixel RGBW White | 0.313 | 0.329 |
| Zone RGB Red | 0.640 | 0.330 |
| Zone RGB Green | 0.300 | 0.600 |
| Zone RGB Blue | 0.150 | 0.060 |

The shaded area holds the colors the LEDs can mix; the dots are the LED colors the GDTF file states.

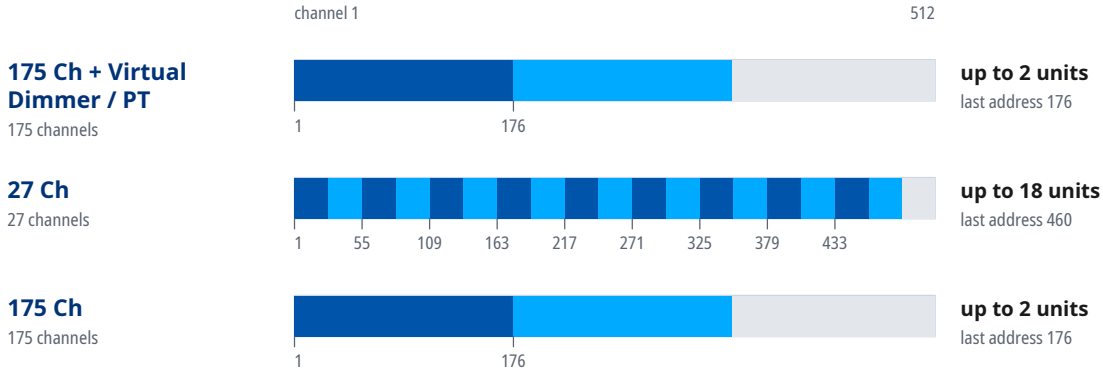
## Cells (pixels)




Cells where the GDTF file places them (seen from above), 25 in all; numbered in the order of their first DMX channel in the mode “175 Ch”.

# 9 DMX channels

### Units in one DMX universe




### Start addresses of 20 units in the mode “175 Ch + Virtual Dimmer / PT”

| Unit | Start address | Unit | Start address | Unit | Start address | Unit | Start address |
|---|---|---|---|---|---|---|---|
| 1 | 1 | 6 | U3 · 176 | 11 | U6 · 1 | 16 | U8 · 176 |
| 2 | 176 | 7 | U4 · 1 | 12 | U6 · 176 | 17 | U9 · 1 |
| 3 | U2 · 1 | 8 | U4 · 176 | 13 | U7 · 1 | 18 | U9 · 176 |
| 4 | U2 · 176 | 9 | U5 · 1 | 14 | U7 · 176 | 19 | U10 · 1 |
| 5 | U3 · 1 | 10 | U5 · 176 | 15 | U8 · 1 | 20 | U10 · 176 |

Where a DMX universe is full, the next units continue in the next universe: “U2 · 1” is address 1 in the second universe, counted from the universe of the first unit.

## Mode 175 Ch + Virtual Dimmer / PT

The GDTF file gives these values for a console's Highlight function: CH 1 Red 255 (the same in each of the 25 cells), CH 2 Green 255 (the same in each of the 25 cells), CH 3 Blue 255 (the same in each of the 25 cells), CH 4 White 0 (the same in each of the 25 cells), CH 101 Red 255 (the same in each of the 25 cells), CH 102 Green 255 (the same in each of the 25 cells), CH 103 Blue 255 (the same in each of the 25 cells).

| CH | Function | DMX | Description |
|---|---|---|---|
| **1** | Red 1 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |
| **2** | Green 1 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **2** | Green 1 (continued) | 128 | 050 |
| | | 129–191 | 050 ... 075 |
| | | 192 | 075 |
| | | 193–254 | 075 ... 100 |
| | | 255 | 100 |
| **3** | Blue 1 | 0 | 000 |
| | | 1–63 | 000 ... 025 |
| | | 64 | 025 |
| | | 65–127 | 025 ... 050 |
| | | 128 | 050 |
| | | 129–191 | 050 ... 075 |
| | | 192 | 075 |
| | | 193–254 | 075 ... 100 |
| | | 255 | 100 |
| **4** | White 1 | 0 | 000 |
| | | 1–63 | 000 ... 025 |
| | | 64 | 025 |
| | | 65–127 | 025 ... 050 |
| | | 128 | 050 |
| | | 129–191 | 050 ... 075 |
| | | 192 | 075 |
| | | 193–254 | 075 ... 100 |
| | | 255 | 100 |
| **101** | Red 26 | 0 | 000 |
| | | 1–63 | 000 ... 025 |
| | | 64 | 025 |
| | | 65–127 | 025 ... 050 |
| | | 128 | 050 |
| | | 129–191 | 050 ... 075 |
| | | 192 | 075 |
| | | 193–254 | 075 ... 100 |
| | | 255 | 100 |
| **102** | Green 26 | 0 | 000 |
| | | 1–63 | 000 ... 025 |
| | | 64 | 025 |
| | | 65–127 | 025 ... 050 |
| | | 128 | 050 |
| | | 129–191 | 050 ... 075 |
| | | 192 | 075 |
| | | 193–254 | 075 ... 100 |
| | | 255 | 100 |
| **103** | Blue 26 | 0 | 000 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **103** | Blue 26 (continued) | 1–63 | 000 ... 025 |
| | | 64 | 025 |
| | | 65–127 | 025 ... 050 |
| | | 128 | 050 |
| | | 129–191 | 050 ... 075 |
| | | 192 | 075 |
| | | 193–254 | 075 ... 100 |
| | | 255 | 100 |

CH 1–100: 25 cells of 4 channels each. Every cell works as cell 1 in the table above (CH 1–4); the table below gives each cell's channel numbers.

| Cell | Red | Green | Blue | White | Cell | Red | Green | Blue | White |
|---|---|---|---|---|---|---|---|---|---|
| 1 | 1 | 2 | 3 | 4 | 2 | 5 | 6 | 7 | 8 |
| 3 | 9 | 10 | 11 | 12 | 4 | 13 | 14 | 15 | 16 |
| 5 | 17 | 18 | 19 | 20 | 6 | 21 | 22 | 23 | 24 |
| 7 | 25 | 26 | 27 | 28 | 8 | 29 | 30 | 31 | 32 |
| 9 | 33 | 34 | 35 | 36 | 10 | 37 | 38 | 39 | 40 |
| 11 | 41 | 42 | 43 | 44 | 12 | 45 | 46 | 47 | 48 |
| 13 | 49 | 50 | 51 | 52 | 14 | 53 | 54 | 55 | 56 |
| 15 | 57 | 58 | 59 | 60 | 16 | 61 | 62 | 63 | 64 |
| 17 | 65 | 66 | 67 | 68 | 18 | 69 | 70 | 71 | 72 |
| 19 | 73 | 74 | 75 | 76 | 20 | 77 | 78 | 79 | 80 |
| 21 | 81 | 82 | 83 | 84 | 22 | 85 | 86 | 87 | 88 |
| 23 | 89 | 90 | 91 | 92 | 24 | 93 | 94 | 95 | 96 |
| 25 | 97 | 98 | 99 | 100 | | | | | |

CH 101–175: 25 cells of 3 channels each. Every cell works as cell 1 in the table above (CH 101–103); the table below gives each cell's channel numbers.

| Cell | Red | Green | Blue | Cell | Red | Green | Blue | Cell | Red | Green | Blue |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | 101 | 102 | 103 | 2 | 104 | 105 | 106 | 3 | 107 | 108 | 109 |
| 4 | 110 | 111 | 112 | 5 | 113 | 114 | 115 | 6 | 116 | 117 | 118 |
| 7 | 119 | 120 | 121 | 8 | 122 | 123 | 124 | 9 | 125 | 126 | 127 |
| 10 | 128 | 129 | 130 | 11 | 131 | 132 | 133 | 12 | 134 | 135 | 136 |
| 13 | 137 | 138 | 139 | 14 | 140 | 141 | 142 | 15 | 143 | 144 | 145 |
| 16 | 146 | 147 | 148 | 17 | 149 | 150 | 151 | 18 | 152 | 153 | 154 |
| 19 | 155 | 156 | 157 | 20 | 158 | 159 | 160 | 21 | 161 | 162 | 163 |
| 22 | 164 | 165 | 166 | 23 | 167 | 168 | 169 | 24 | 170 | 171 | 172 |
| 25 | 173 | 174 | 175 | | | | | | | | |

## Mode 27 Ch

If the device receives DMX in this mode but gives no light, check these channels: CH 2 Shutter 1 at 0–3 “Open”; CH 16 Shutter 2 at 0–3 “Open”. The GDTF file gives these values for a console's Highlight function: CH 1 Dimmer 100, CH 2 Shutter 1 3, CH 3 Red 1 255, CH 4 Green 1 255, CH 5 Blue 1 255, CH 6 White 1 0, CH 16 Shutter 2 3, CH 17 Red 3 255, CH 18 Green 3 255, CH 19 Blue 3 255.

| CH | Function | DMX | Description |
|---|---|---|---|
| **1** | Dimmer | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **2** | Shutter 1 | 0–3 | Shutter 1 Open: Open |
| | | 4 | 001 |
| | | 5–66 | 001 … 025 |
| | | 67 | 025 |
| | | 68–129 | 025 … 050 |
| | | 130 | 050 |
| | | 131–192 | 050 … 075 |
| | | 193 | 075 |
| | | 194–254 | 075 … 100 |
| | | 255 | 100 |
| **3** | Red 1 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |
| **4** | Green 1 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **5** | Blue 1 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **6** | White 1 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **7** | Gobo 1 | 0–3 | Gobo1 Alphabet OFF |
| | | 4–7 | Gobo1 Alphabet A |
| | | 8–11 | Gobo1 Alphabet B |
| | | 12–15 | Gobo1 Alphabet C |
| | | 16–19 | Gobo1 Alphabet D |
| | | 20–23 | Gobo1 Alphabet E |
| | | 24–27 | Gobo1 Alphabet F |
| | | 28–31 | Gobo1 Alphabet G |
| | | 32–35 | Gobo1 Alphabet H |
| | | 36–39 | Gobo1 Alphabet I |
| | | 40–43 | Gobo1 Alphabet J |
| | | 44–47 | Gobo1 Alphabet K |
| | | 48–51 | Gobo1 Alphabet L |
| | | 52–55 | Gobo1 Alphabet M |
| | | 56–59 | Gobo1 Alphabet N |
| | | 60–63 | Gobo1 Alphabet O |
| | | 64–67 | Gobo1 Alphabet P |
| | | 68–71 | Gobo1 Alphabet Q |
| | | 72–75 | Gobo1 Alphabet R |
| | | 76–79 | Gobo1 Alphabet S |
| | | 80–83 | Gobo1 Alphabet T |
| | | 84–87 | Gobo1 Alphabet U |
| | | 88–91 | Gobo1 Alphabet V |

| CH | Function | DMX | Description |
|---|---|---|---|
| **7** | Gobo 1 (continued) | 92–95 | Gobo1 Alphabet W |
| | | 96–99 | Gobo1 Alphabet X |
| | | 100–103 | Gobo1 Alphabet Y |
| | | 104–107 | Gobo1 Alphabet Z |
| | | 108–255 | Idle |
| **8** | Gobo 2 1 | | Gobo 2 Symbols |
| | | 0–3 | Gobo1 Symbols OFF |
| | | 4–7 | Gobo1 Symbols 1 |
| | | 8–11 | Gobo1 Symbols 2 |
| | | 12–15 | Gobo1 Symbols 3 |
| | | 16–19 | Gobo1 Symbols 4 |
| | | 20–23 | Gobo1 Symbols 5 |
| | | 24–27 | Gobo1 Symbols 6 |
| | | 28–31 | Gobo1 Symbols 7 |
| | | 32–35 | Gobo1 Symbols 8 |
| | | 36–39 | Gobo1 Symbols 9 |
| | | 40–43 | Gobo1 Symbols 10 |
| | | 44–47 | Gobo1 Symbols 11 |
| | | 48–51 | Gobo1 Symbols 12 |
| | | 52–55 | Gobo1 Symbols 13 |
| | | 56–59 | Gobo1 Symbols 14 |
| | | 60–63 | Gobo1 Symbols 15 |
| | | 64–67 | Gobo1 Symbols 16 |
| | | 68–71 | Gobo1 Symbols 17 |
| | | 72–75 | Gobo1 Symbols 18 |
| | | 76–79 | Gobo1 Symbols 19 |
| | | 80–83 | Gobo1 Symbols 20 |
| | | 84–87 | Gobo1 Symbols 21 |
| | | 88–91 | Gobo1 Symbols 22 |
| | | 92–95 | Gobo1 Symbols 23 |
| | | 96–99 | Gobo1 Symbols 24 |
| | | 100–103 | Gobo1 Symbols 25 |
| | | 104–107 | Gobo1 Symbols 26 |
| | | 108–111 | Gobo1 Symbols 27 |
| | | 112–115 | Gobo1 Symbols 28 |
| | | 116–119 | Gobo1 Symbols 29 |
| | | 120–123 | Gobo1 Symbols 30 |
| | | 124–127 | Gobo1 Symbols 31 |
| | | 128–131 | Gobo1 Symbols 32 |
| | | 132–135 | Gobo1 Symbols 33 |
| | | 136–139 | Gobo1 Symbols 34 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **8** | Gobo 2 1 (continued) | 140–143 | Gobo1 Symbols 35 |
| | | 144–147 | Gobo1 Symbols 36 |
| | | 148–151 | Gobo1 Symbols 37 |
| | | 152–155 | Gobo1 Symbols 38 |
| | | 156–159 | Gobo1 Symbols 39 |
| | | 160–163 | Gobo1 Symbols 40 |
| | | 164–167 | Gobo1 Symbols 41 |
| | | 168–171 | Gobo1 Symbols 42 |
| | | 172–175 | Gobo1 Symbols 43 |
| | | 176–179 | Gobo1 Symbols 44 |
| | | 180–183 | Gobo1 Symbols 45 |
| | | 184–187 | Gobo1 Symbols 46 |
| | | 188–191 | Gobo1 Symbols 47 |
| | | 192–195 | Gobo1 Symbols 48 |
| | | 196–199 | Gobo1 Symbols 49 |
| | | 200–203 | Gobo1 Symbols 50 |
| | | 204–207 | Gobo1 Symbols 51 |
| | | 208–211 | Gobo1 Symbols 52 |
| | | 212–215 | Gobo1 Symbols 53 |
| | | 216–219 | Gobo1 Symbols 54 |
| | | 220–223 | Gobo1 Symbols 55 |
| | | 224–227 | Gobo1 Symbols 56 |
| | | 228–231 | Gobo1 Symbols 57 |
| | | 232–235 | Gobo1 Symbols 58 |
| | | 236–239 | Gobo1 Symbols 59 |
| | | 240–243 | Gobo1 Symbols 60 |
| | | 244–247 | Gobo1 Symbols 61 |
| | | 248–251 | Gobo1 Symbols 62 |
| | | 252–255 | Gobo1 Symbols 63 |
| **9** | Effects 1 | 0–9 | Wheel Slot 0 OPEN |
| | | 10–21 | Wheel Slot 1 |
| | | 22–27 | Wheel Slot 2 |
| | | 28–33 | Wheel Slot 3 |
| | | 34–39 | Wheel Slot 4 |
| | | 40–45 | Wheel Slot 5 |
| | | 46–51 | Wheel Slot 6 |
| | | 52–57 | Wheel Slot 7 |
| | | 58–63 | Wheel Slot 8 |
| | | 64–69 | Wheel Slot 9 |
| | | 70–75 | Wheel Slot 10 |
| | | 76–81 | Wheel Slot 11 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **9** | Effects 1 (continued) | 82–87 | Wheel Slot 12 |
| | | 88–93 | Wheel Slot 13 |
| | | 94–99 | Wheel Slot 14 |
| | | 100–105 | Wheel Slot 15 |
| | | 106–111 | Wheel Slot 16 |
| | | 112–117 | Wheel Slot 17 |
| | | 118–123 | Wheel Slot 18 |
| | | 124–129 | Wheel Slot 19 |
| | | 130–135 | Wheel Slot 20 |
| | | 136–141 | Wheel Slot 21 |
| | | 142–147 | Wheel Slot 22 |
| | | 148–153 | Wheel Slot 23 |
| | | 154–159 | Wheel Slot 24 |
| | | 160–165 | Wheel Slot 25 |
| | | 166–171 | Wheel Slot 26 |
| | | 172–177 | Wheel Slot 27 |
| | | 178–183 | Wheel Slot 28 |
| | | 184–189 | Wheel Slot 29 |
| | | 190–195 | Wheel Slot 30 |
| | | 196–201 | Wheel Slot 31 |
| | | 202–207 | Wheel Slot 32 |
| | | 208–213 | Wheel Slot 33 |
| | | 214–219 | Wheel Slot 34 |
| | | 220–225 | Wheel Slot 35 |
| | | 226–231 | Wheel Slot 36 |
| | | 232–237 | Wheel Slot 37 |
| | | 238–243 | Wheel Slot 38 |
| | | 244–249 | Wheel Slot 39 |
| | | 250–255 | Wheel Slot 40 |
| **10** | Effects Speed 1 | 0–5 | No Function |
| | | 6 | -100 |
| | | 7–65 | -100 ... -050 |
| | | 66 | -050 |
| | | 67–124 | -050 ... -001 |
| | | 125 | -001 |
| | | 126 | 001 |
| | | 127–190 | 001 ... 050 |
| | | 191 | 050 |
| | | 192–254 | 050 ... 100 |
| | | 255 | 100 |
| **11** | Effects Fade 1 | 0–9 | No Function |

| CH | Function | DMX | Description |
|---|---|---|---|
| **11** | Effects Fade 1 (continued) | 10 | 000 |
| | | 11–132 | 000 … 050 |
| | | 133 | 050 |
| | | 134–254 | 050 … 100 |
| | | 255 | 100 |
| **12** | Red 2 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |
| **13** | Green 2 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |
| **14** | Blue 2 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **15** | White 2 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **16** | Shutter 2 | 0–3 | Shutter 1 Open: Open |

| CH | Function | DMX | Description |
|---|---|---|---|
| **16** | Shutter 2 (continued) | 4 | 001 |
| | | 5–66 | 001 … 025 |
| | | 67 | 025 |
| | | 68–129 | 025 … 050 |
| | | 130 | 050 |
| | | 131–192 | 050 … 075 |
| | | 193 | 075 |
| | | 194–254 | 075 … 100 |
| | | 255 | 100 |
| **17** | Red 3 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |
| **18** | Green 3 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |
| **19** | Blue 3 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **20** | Gobo 2 | 0–3 | Gobo1 Alphabet OFF |
| | | 4–7 | Gobo1 Alphabet A |
| | | 8–11 | Gobo1 Alphabet B |
| | | 12–15 | Gobo1 Alphabet C |
| | | 16–19 | Gobo1 Alphabet D |
| | | 20–23 | Gobo1 Alphabet E |

| CH | Function | DMX | Description |
|---|---|---|---|
| **20** | Gobo 2 (continued) | 24–27 | Gobo1 Alphabet F |
| | | 28–31 | Gobo1 Alphabet G |
| | | 32–35 | Gobo1 Alphabet H |
| | | 36–39 | Gobo1 Alphabet I |
| | | 40–43 | Gobo1 Alphabet J |
| | | 44–47 | Gobo1 Alphabet K |
| | | 48–51 | Gobo1 Alphabet L |
| | | 52–55 | Gobo1 Alphabet M |
| | | 56–59 | Gobo1 Alphabet N |
| | | 60–63 | Gobo1 Alphabet O |
| | | 64–67 | Gobo1 Alphabet P |
| | | 68–71 | Gobo1 Alphabet Q |
| | | 72–75 | Gobo1 Alphabet R |
| | | 76–79 | Gobo1 Alphabet S |
| | | 80–83 | Gobo1 Alphabet T |
| | | 84–87 | Gobo1 Alphabet U |
| | | 88–91 | Gobo1 Alphabet V |
| | | 92–95 | Gobo1 Alphabet W |
| | | 96–99 | Gobo1 Alphabet X |
| | | 100–103 | Gobo1 Alphabet Y |
| | | 104–107 | Gobo1 Alphabet Z |
| | | 108–111 | Gobo1 Alphabet a |
| | | 112–115 | Gobo1 Alphabet b |
| | | 116–119 | Gobo1 Alphabet c |
| | | 120–123 | Gobo1 Alphabet d |
| | | 124–199 | Gobo1 Alphabet |
| | | 200–203 | Gobo1 Alphabet x |
| | | 204–207 | Gobo1 Alphabet y |
| | | 208–211 | Gobo1 Alphabet z |
| | | 212–255 | Idle |
| **21** | Gobo 2 2 | | Gobo 2 Symbols |
| | | 0–3 | Gobo1 Symbols OFF |
| | | 4–7 | Gobo1 Symbols 1 |
| | | 8–11 | Gobo1 Symbols 2 |
| | | 12–15 | Gobo1 Symbols 3 |
| | | 16–19 | Gobo1 Symbols 4 |
| | | 20–23 | Gobo1 Symbols 5 |
| | | 24–27 | Gobo1 Symbols 6 |
| | | 28–31 | Gobo1 Symbols 7 |
| | | 32–35 | Gobo1 Symbols 8 |
| | | 36–39 | Gobo1 Symbols 9 |
| | | 40–43 | Gobo1 Symbols 10 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **21** | Gobo 2 2 (continued) | 44–47 | Gobo1 Symbols 11 |
| | | 48–51 | Gobo1 Symbols 12 |
| | | 52–55 | Gobo1 Symbols 13 |
| | | 56–59 | Gobo1 Symbols 14 |
| | | 60–63 | Gobo1 Symbols 15 |
| | | 64–67 | Gobo1 Symbols 16 |
| | | 68–71 | Gobo1 Symbols 17 |
| | | 72–75 | Gobo1 Symbols 18 |
| | | 76–79 | Gobo1 Symbols 19 |
| | | 80–83 | Gobo1 Symbols 20 |
| | | 84–87 | Gobo1 Symbols 21 |
| | | 88–91 | Gobo1 Symbols 22 |
| | | 92–95 | Gobo1 Symbols 23 |
| | | 96–99 | Gobo1 Symbols 24 |
| | | 100–103 | Gobo1 Symbols 25 |
| | | 104–107 | Gobo1 Symbols 26 |
| | | 108–111 | Gobo1 Symbols 27 |
| | | 112–115 | Gobo1 Symbols 28 |
| | | 116–119 | Gobo1 Symbols 29 |
| | | 120–123 | Gobo1 Symbols 30 |
| | | 124–127 | Gobo1 Symbols 31 |
| | | 128–131 | Gobo1 Symbols 32 |
| | | 132–135 | Gobo1 Symbols 33 |
| | | 136–139 | Gobo1 Symbols 34 |
| | | 140–143 | Gobo1 Symbols 35 |
| | | 144–147 | Gobo1 Symbols 36 |
| | | 148–151 | Gobo1 Symbols 37 |
| | | 152–155 | Gobo1 Symbols 38 |
| | | 156–159 | Gobo1 Symbols 39 |
| | | 160–163 | Gobo1 Symbols 40 |
| | | 164–167 | Gobo1 Symbols 41 |
| | | 168–171 | Gobo1 Symbols 42 |
| | | 172–175 | Gobo1 Symbols 43 |
| | | 176–179 | Gobo1 Symbols 44 |
| | | 180–183 | Gobo1 Symbols 45 |
| | | 184–187 | Gobo1 Symbols 46 |
| | | 188–191 | Gobo1 Symbols 47 |
| | | 192–195 | Gobo1 Symbols 48 |
| | | 196–199 | Gobo1 Symbols 49 |
| | | 200–203 | Gobo1 Symbols 50 |
| | | 204–207 | Gobo1 Symbols 51 |
| | | 208–211 | Gobo1 Symbols 52 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **21** | Gobo 2 2 (continued) | 212–215 | Gobo1 Symbols 53 |
| | | 216–219 | Gobo1 Symbols 54 |
| | | 220–223 | Gobo1 Symbols 55 |
| | | 224–227 | Gobo1 Symbols 56 |
| | | 228–231 | Gobo1 Symbols 57 |
| | | 232–235 | Gobo1 Symbols 58 |
| | | 236–239 | Gobo1 Symbols 59 |
| | | 240–243 | Gobo1 Symbols 60 |
| | | 244–247 | Gobo1 Symbols 61 |
| | | 248–251 | Gobo1 Symbols 62 |
| | | 252–255 | Gobo1 Symbols 63 |
| **22** | Effects 2 | 0–9 | Wheel Slot 00 |
| | | 10–21 | Wheel Slot 01 |
| | | 22–27 | Wheel Slot 02 |
| | | 28–33 | Wheel Slot 03 |
| | | 34–39 | Wheel Slot 04 |
| | | 40–45 | Wheel Slot 05 |
| | | 46–51 | Wheel Slot 06 |
| | | 52–57 | Wheel Slot 07 |
| | | 58–237 | Empty Channel Set |
| | | 238–243 | Wheel Slot 38 |
| | | 244–249 | Wheel Slot 39 |
| | | 250–255 | Wheel Slot 40 |
| **23** | Effects Speed 2 | 0–5 | No Function |
| | | 6 | -100 |
| | | 7–65 | -100 ... -050 |
| | | 66 | -050 |
| | | 67–124 | -050 ... -001 |
| | | 125 | -001 |
| | | 126 | 001 |
| | | 127–190 | 001 ... 050 |
| | | 191 | 050 |
| | | 192–254 | 050 ... 100 |
| | | 255 | 100 |
| **24** | Effects Fade 2 | 0–9 | No Function |
| | | 10 | 000 |
| | | 11–132 | 000 ... 050 |
| | | 133 | 050 |
| | | 134–254 | 050 ... 100 |
| | | 255 | 100 |
| **25** | Red 4 | 0–1 | 000 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **25** | Red 4 (continued) | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |
| **26** | Green 4 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |
| **27** | Blue 4 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |

## Mode 175 Ch

The GDTF file gives these values for a console's Highlight function: CH 1 Red 255 (the same in each of the 25 cells), CH 2 Green 255 (the same in each of the 25 cells), CH 3 Blue 255 (the same in each of the 25 cells), CH 4 White 0 (the same in each of the 25 cells), CH 101 Red 26 255, CH 102 Green 255 (the same in each of the 24 cells), CH 103 Blue 255 (the same in each of the 24 cells), CH 104 Red 255 (the same in each of the 24 cells), CH 174 Green 50 255, CH 175 Blue 50 255.

| CH | Function | DMX | Description |
|---|---|---|---|
| **1** | Red 1 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **2** | Green 1 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **3** | Blue 1 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **4** | White 1 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **101** | Red 26 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **102** | Green 26 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |

| CH | Function | DMX | Description |
|---|---|---|---|
| **102** | Green 26 (continued) | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **103** | Blue 26 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **104** | Red 27 | 0–1 | 000 |
| | | 2–63 | 000 … 025 |
| | | 64–65 | 025 |
| | | 66–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–190 | 050 … 075 |
| | | 191–192 | 075 |
| | | 193–253 | 075 … 100 |
| | | 254–255 | 100 |
| **174** | Green 50 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |
| **175** | Blue 50 | 0 | 000 |
| | | 1–63 | 000 … 025 |
| | | 64 | 025 |
| | | 65–127 | 025 … 050 |
| | | 128 | 050 |
| | | 129–191 | 050 … 075 |
| | | 192 | 075 |
| | | 193–254 | 075 … 100 |
| | | 255 | 100 |

CH 1–100: 25 cells of 4 channels each. Every cell works as cell 1 in the table above (CH 1–4); the table below gives each cell's channel numbers.

| Cell | Red | Green | Blue | White | Cell | Red | Green | Blue | White |
|---|---|---|---|---|---|---|---|---|---|
| 1 | 1 | 2 | 3 | 4 | 2 | 5 | 6 | 7 | 8 |
| 3 | 9 | 10 | 11 | 12 | 4 | 13 | 14 | 15 | 16 |
| 5 | 17 | 18 | 19 | 20 | 6 | 21 | 22 | 23 | 24 |
| 7 | 25 | 26 | 27 | 28 | 8 | 29 | 30 | 31 | 32 |
| 9 | 33 | 34 | 35 | 36 | 10 | 37 | 38 | 39 | 40 |
| 11 | 41 | 42 | 43 | 44 | 12 | 45 | 46 | 47 | 48 |
| 13 | 49 | 50 | 51 | 52 | 14 | 53 | 54 | 55 | 56 |
| 15 | 57 | 58 | 59 | 60 | 16 | 61 | 62 | 63 | 64 |
| 17 | 65 | 66 | 67 | 68 | 18 | 69 | 70 | 71 | 72 |
| 19 | 73 | 74 | 75 | 76 | 20 | 77 | 78 | 79 | 80 |
| 21 | 81 | 82 | 83 | 84 | 22 | 85 | 86 | 87 | 88 |
| 23 | 89 | 90 | 91 | 92 | 24 | 93 | 94 | 95 | 96 |
| 25 | 97 | 98 | 99 | 100 | | | | | |

CH 102–173: 24 cells of 3 channels each. Every cell works as cell 1 in the table above (CH 102–104); the table below gives each cell's channel numbers.

| Cell | Green | Blue | Red | Cell | Green | Blue | Red | Cell | Green | Blue | Red |
|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | 102 | 103 | 104 | 2 | 105 | 106 | 107 | 3 | 108 | 109 | 110 |
| 4 | 111 | 112 | 113 | 5 | 114 | 115 | 116 | 6 | 117 | 118 | 119 |
| 7 | 120 | 121 | 122 | 8 | 123 | 124 | 125 | 9 | 126 | 127 | 128 |
| 10 | 129 | 130 | 131 | 11 | 132 | 133 | 134 | 12 | 135 | 136 | 137 |
| 13 | 138 | 139 | 140 | 14 | 141 | 142 | 143 | 15 | 144 | 145 | 146 |
| 16 | 147 | 148 | 149 | 17 | 150 | 151 | 152 | 18 | 153 | 154 | 155 |
| 19 | 156 | 157 | 158 | 20 | 159 | 160 | 161 | 21 | 162 | 163 | 164 |
| 22 | 165 | 166 | 167 | 23 | 168 | 169 | 170 | 24 | 171 | 172 | 173 |

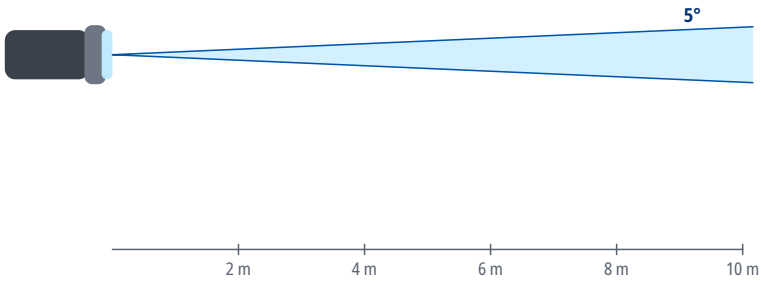
# 10 Technical specifications

| Parameter | Value |
|---|---|
| Weight | 8.8 kg |
| Ingress protection | IP20 |
| Meaning of the IP code (IEC 60529) | Protected against contact with a finger and solid objects of 12.5 mm diameter and larger; no protection against water |
| Operating temperature | -5 to 45 °C |

### Speeds and ranges

| Parameter | Value |
|---|---|
| Strobe frequency | 1–20 Hz |

### Spot diameter




| Distance | Ø 5° |
|---|---|
| 2 m | 0.17 m |
| 4 m | 0.35 m |
| 6 m | 0.52 m |
| 8 m | 0.7 m |
| 10 m | 0.87 m |
| 15 m | 1.3 m |

Spot diameter square to the beam axis, calculated from the beam angle.

# 11 Maintenance and cleaning

- Before cleaning and maintenance, switch the device off, disconnect it from the power supply and let it cool down.
- Clean the housing with a soft, dry or slightly damp cloth. Do not use solvents, abrasive cleaners or pressure washers, and make sure no liquid gets into the device.
- Clean optical parts (lenses, front glass), if the device has any, with a soft lint-free cloth and a cleaner intended for optics or glass.
- Regularly inspect the housing, cables, connectors and fixings. Have damaged parts replaced by a service center.
- How often to clean depends on the environment; dust, smoke and fog make the device dirty much faster.

# 12 Troubleshooting

| Problem | Remedy |
|---|---|
| The device does not switch on | Check the supply voltage, the cables and the fuse, if the device has one. |
| The device does not respond to DMX | Check the start address, the selected DMX mode and whether it matches the profile in the controller, the cable connection to DMX IN, and the controller output (universe). |
| The device behaves erratically or flickers | Check the terminator at the end of the line, the condition and wiring of the cables (shield on pin 1 only), the number of devices on the line (32 at most), and that the line is not split without a splitter. |
| Only some devices on the line respond | Check the cable and connectors between the last working and the first non-working device, and make sure all devices on the line are switched on. |
| Devices respond to the wrong channels or affect each other | Check that the addresses do not overlap and that the DMX mode on the devices matches the patch in the controller. |
| The device or the connected load does not light up although it receives DMX | Check the values of the dimmer, shutter and strobe channels against the DMX channel table. For the DMX modes for which the sources state it, the chapter DMX channels gives under the mode's heading which channels must be open. |

# 13 Disposal

The crossed-out wheeled bin symbol on the product, in the manual or on the packaging means that the product must not be disposed of with unsorted household waste at the end of its life.

Take the end-of-life equipment to a collection point, for example a municipal collection site or a retailer. Proper disposal enables materials to be recycled and helps prevent possible negative effects on the environment and human health.

Follow the regulations applicable in your country; in the Czech Republic, take-back is governed by Act No. 542/2020 Coll., on End-of-Life Products.

Recycle the packaging materials according to their type.