LDT-A10-PUSH-4CV-5A

Four-Channel 0/1-10V & Push-Dim LED Controller

Convert analogue dimming inputs into a correctly rated low-voltage PWM LED output. The input control signal is separate from the DC supply that powers the LED load.

Supply voltage	12-48 VDC
LED output	4-channel constant-voltage PWM
Maximum output current	5 A per channel
Maximum output power	4 x (60-240) W
Control inputs	4 x 0/1-10V + Push-Dim
Dimming	0-100%
PWM frequency	2000 Hz (default)
Dimming curve	Logarithmic
Rated input current	20.5 A
Operating temperature	-20 to +55 °C
Maximum case temperature	+85 °C
IP rating	IP20
Body dimensions	175 x 45 x 27 mm

No proprietary RF receiver is specified for this model. An analogue input is not a mains phase-cut input.

The following reference pages include the complete wiring, dimensions, settings and operating instructions. Use the lighting and hardware variant identified above; shared references may illustrate other separate models.

0/1-10V

4 Channel 0/1-10V LED Dimming Driver

- 4 channel 0/1-10V LED dimming driver with push-dim function.
- 4 channel 0/1-10V input, 4 channel PWM constant voltage output.
- 0~100% dimming range via logarithmic characteristic can be very comfortable for human eyes.
- Compatible with active or passive 0-10V, 1-10V dimmer, can solve the fluorescent lamp dimming system compatible with LED lighting.



FC CE RoHS

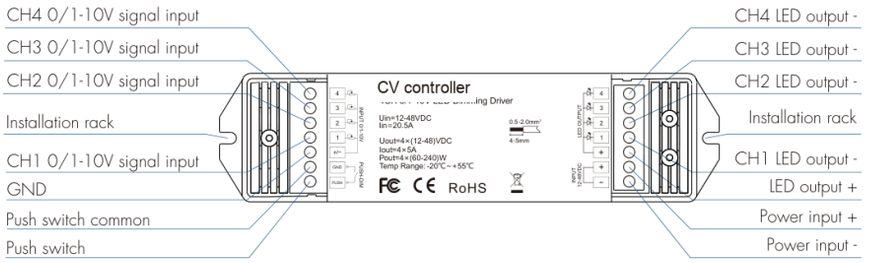
Technical Parameters

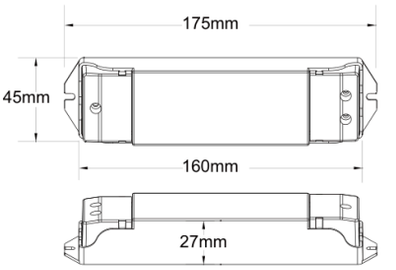
Input and Output	
Input voltage	12-48VDC
Input current	20.5A
Output voltage	12-48VDC
Output current	4CH,5A/CH
Output power	4 x (60-240)W
Output type	Constant voltage
Warranty	
Warranty	5 years

Dimming data	
Input signal	0/1-10V + Push Dim
Dimming range	0-100%
Dimming curve	Logarithmic
PWM Frequency	2000Hz(default)
Package	
Size	L178 x W50 x H38mm
Gross weight	0.136kg

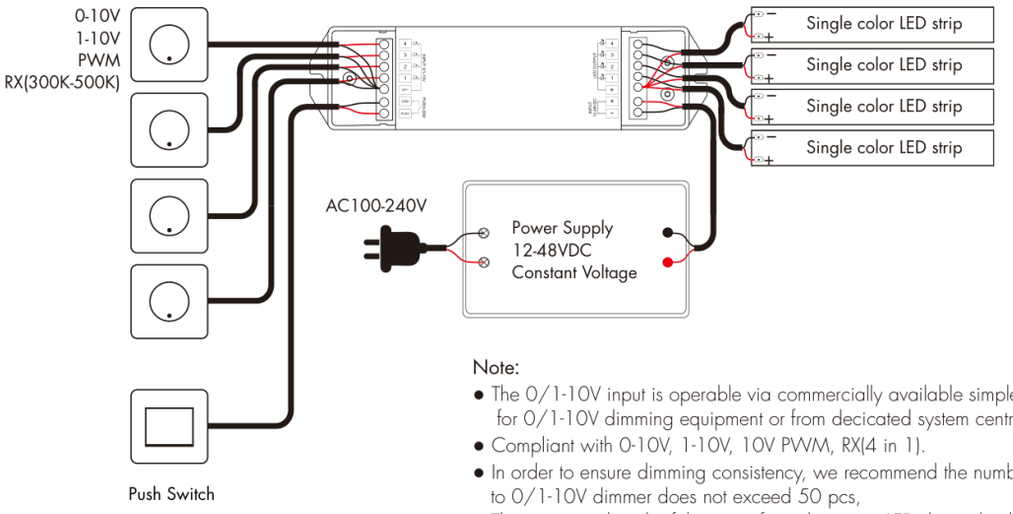
Safety and EMC	
EMC standard	EN IEC 55015/EN IEC 61547
Safety standard	EN 61347-1/-2 EN 62493
Certification	CE RoHS FCC
Environment	
Operation temperature	Ta: -20°C ~ +55°C
Case temperature (Max.)	Tc: +85°C

Mechanical Structures and Installations





Wiring Diagram



Note:

- The 0/1-10V input is operable via commercially available simple rotary wall switchs designed for 0/1-10V dimming equipment or from decicated system central dimming controllers.
- Compliant with 0-10V, 1-10V, 10V PWM, RX(4 in 1).
- In order to ensure dimming consistency, we recommend the number of LED drivers connected to 0/1-10V dimmer does not exceed 50 pcs,
  The maximum length of the wires from dimmer to LED driver should be no more than 50 meters (use copper wire with a cross-sectional area of 0.75 mm^2 for wiring).
- If the LED driver be used with Push-Dim interface prior to using the 0/1-10V interface, the 0/1-10 V signal should change over 10% to return 0/1-10 V control.

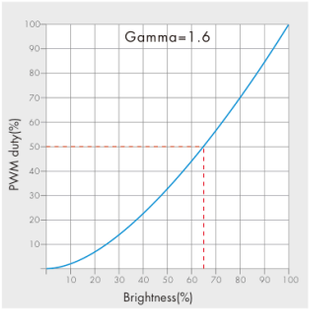
Push Dim Function

The provided Push-Dim interface allows for a simple dimming method using commercially available non-latching (momentary) wall switchs.

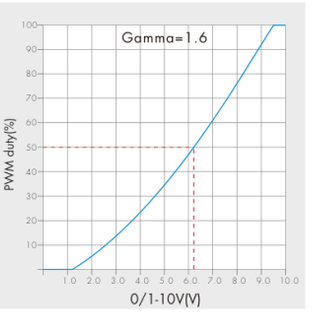
- Short press:
  Turn on or off all 4 channel light.
- Long press (1-6s):
  Press and hold to step-less dimming, adjust 4 channel brightness at the same time.
  With every other long press, the light level goes to the opposite direction.
- Dimming memory:
  Light returns to the previous dimming level when switched off and on again, even at power failure.
- Synchronization:
  If more than one controller are connected to the same push switch, do a long press for more than 10s,
  then the system is synchronized and all lights in the group dim up to 100%.
  This means there is no need for any additional synchrony wire in larger installations.
  We recommend the number of controllers connected to a push switch does not exceed 50 pieces,
  The maximum length of the wires from push to controller should be no more than 50 meters.

Dimming Curve

Push dimming



0/1-10V dimming



Malfunctions Analysis & Troubleshooting

Malfunctions	Causes	Troubleshooting
No light	1. No power. 2. Wrong connection or insecure.	1. Check the power. 2. Check the connection.
Uneven intensity between front and rear,with voltage drop	1. Output cable is too long. 2. Wire diameter is too small. 3. Overload beyond power supply capability. 4. Overload beyond controller capability.	1. Reduce cable or loop supply. 2. Change wider wire. 3. Replace higher power supply. 4. Add power repeater.

Statement

FCC Statement:
This device complies wth Part 15 of the FCC Rules.operation is subject to the following two conditions:
(1)this device may not cause harmful interference,and
(2)this device must accept any interference received,including interference that may cause undesired operation.
IC Statement:
This Class B digital apparatus complies with Canadian ICES-003.
(Cet appareil numérique de la Classe B conforme à la norme NMB-003 du Canada).