



**Constant Current Dimmable Driver**

**Model: CC48W1050-1200CG DALI**



Model	Output Current	Input Current	Input Power	Output Power Range	PF	Efficiency	Output Voltage	No load Voltage
CC48W1050-1200CG DALI	1050mA	≅ 0.27A	≅ 50W	29.4-42W	≅ 0.92	≅ 87%	28-40V	55V
	1100mA	≅ 0.29A	≅ 51.8W	30.8-44W				
	1150mA	≅ 0.3A	≅ 54W	32.2-46W	≅ 0.95	≅ 88%		
	1200mA	≅ 0.31A	≅ 56.8W	33.6-48W				

**\* Test result @230V, 50Hz, Full Load.**

### 1. Parameters

Category	Item	Technical Norm
Features	Output Type	Constant Current
	Dimming Type	DALI 2
	Output Features	Isolation
	IP Grade	IP20
	Insulation Class	Class II
Input	Rated Input Voltage	220-240VAC or 230-280VDC
	Range of Input Voltage	198-264VAC
	Frequency	50/60Hz
	Input Current	≤ 0.31A (230VAC, full load)
	Input Power	≤ 56.8W (230VAC, full load)
	Power Factor	≥ 0.95 (230VAC, full load)
	THD	≤ 15% (230VAC, full load)
	No-load Power Consumption	≤ 0.5W @230VAC (Dim to off)
Output	Max. Output Power	48W
	Current Ripple (<120Hz)	± 5% (Imax-Imin)/(Imax+Imin)
	PstLM	≤ 1
	SVM	≤ 0.4
	Current Accuracy	± 5%
	Started Delay Time	≤ 0.5S (230VAC, full load)
Control Method	PUSH dimming terminal	PUSH dimming terminal (Max. lead wire length: 20m, same port of DALI)
	DALI function	DALI dimming (Max. lead wire length: 300m) logarithm or linear dimming curve selectable
	Dimming range	DALI dimming: 1%-100% , Dim to off .

Protection	Short Circuit Protection	Auto Recovery
	Overload Protection	Auto Recovery
	No-load Protection	Auto Recovery
	Insulation voltage	3000V 5mA 60S between P-S
	Insulation resistance	>100M ohm @ 500VDC
	Leakage current	< 250 $\mu$ A, I/P to O/P or I/P to PE @230V input
Environment	Ta/Operation Temperature	-20...+50°C
	Ts/Storage Temperature	-40...+85°C
	Tc/Enclosure Temperature	85°C
	Humidity	10% 90%RH
	Atmosphere	86-108KPa
Construction	Connection Method	Push-in Terminal
	Installation	Build-in & Independent
	PRI Wire preparation	0.75-1.5□
	SEC Wire preparation	0.5-0.75□
	Dimension	Independent:172.3*44*30mm (L*W*H) Built in:132.5*44*30.3mm(L*W*H)
Standards	Certification	CE ENEC SAA
	Safety Standards	EN61347-2-13:2014/A1:2017 EN62384:2006/A1:2009,EN 61347-1:2015/A1:2021 AS61347.2.13:2018 AS/NZS61347.1:2016 Inc A1
	EMC Standards	EN IEC 55015:2019 EN IEC 55015:2019/A11:2020 EN IEC 61000-3-2:2019 EN 61000-3-3:2013/A1:2019 EN61547:2009
	Performance	EN62384
	Surge	L-N/2KV
	Others	RoHS
	Life Time	50000h Ta /Tc
	Warranty	5years , F.R. < 10000ppm
	Noise	≤ 28dB @Background noise ≤18dB , Interval ≥ 15cm
Remark: 1.All Parameters, if not specified, are measured at 230VAC/50Hz and 25°C ambient temperature. 2.LED Driver is a component of the luminaires, Luminaires and wire layout will affect the EMC, please check the EMC with end products again.		

### 2. Connected quantities of different current Breaker

TYPE	Connected quantities of different current Breaker						Input Voltage	Inrush Current	Time
	current (A)	10	13	16	20	25			
	Installation wire diameter	1.5mm <sup>2</sup>	2.5mm <sup>2</sup>	2.5mm <sup>2</sup>	4mm <sup>2</sup>	4mm <sup>2</sup>			
TYPE B		24	31	38	48	60	@230VAC	25	300us
TYPE C		38	50	61	77	96			
TYPE D		61	80	98	123	154			

### 3. Label



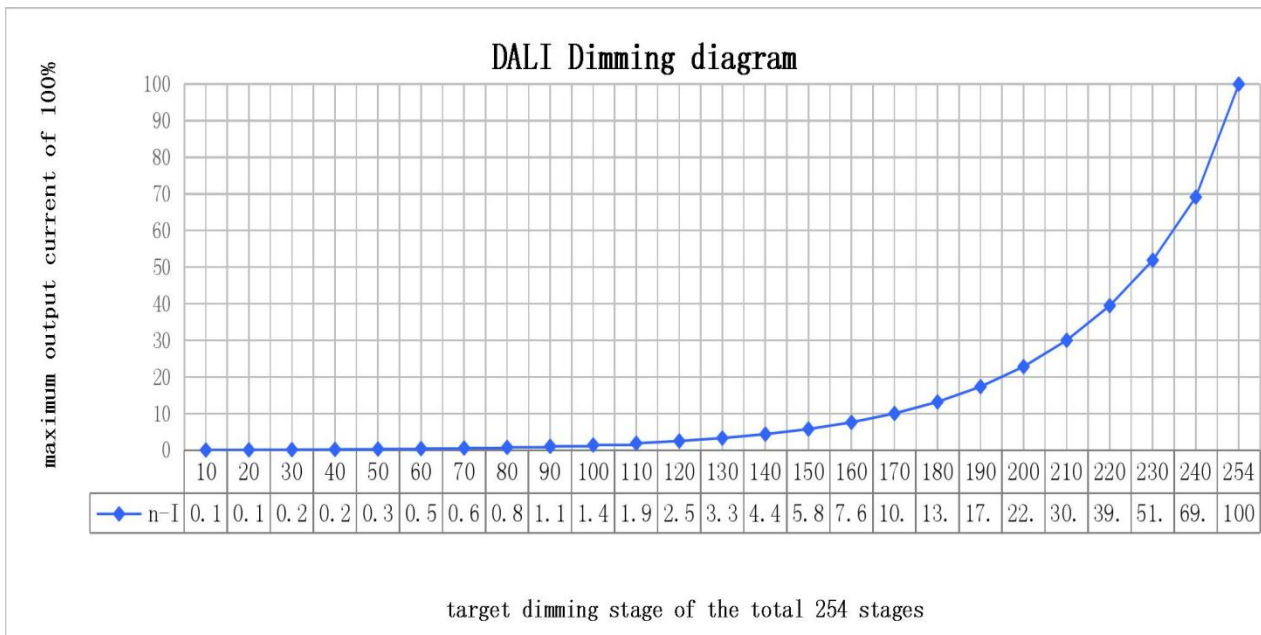
### 4. DALI dimming curve

#### 4.1 formula for DALI dimming.

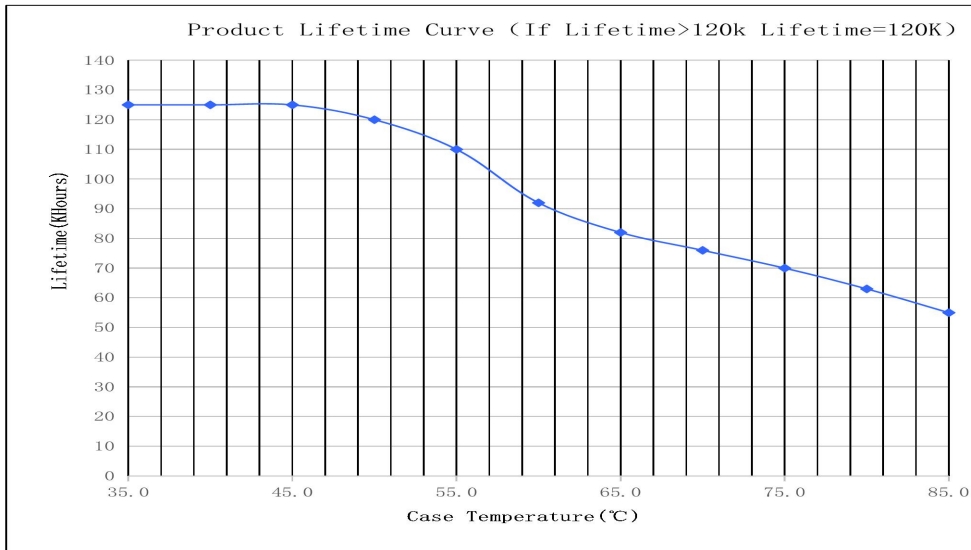
$$X(n) = 10^{\left\{ \left[ \frac{(n-1)}{(253/3)} \right] - 1 \right\}}$$

Here, n means the target dimming stage of the total 254 stages.

X(n) means the percent of the maximum output current.

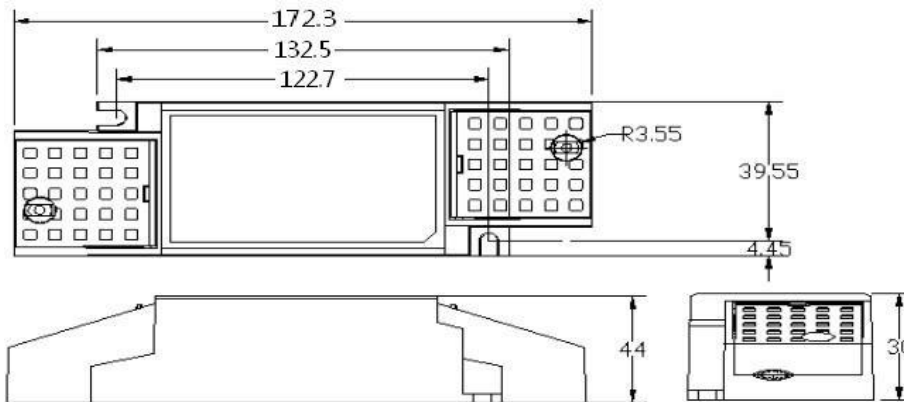


### 5. Lifetime curve

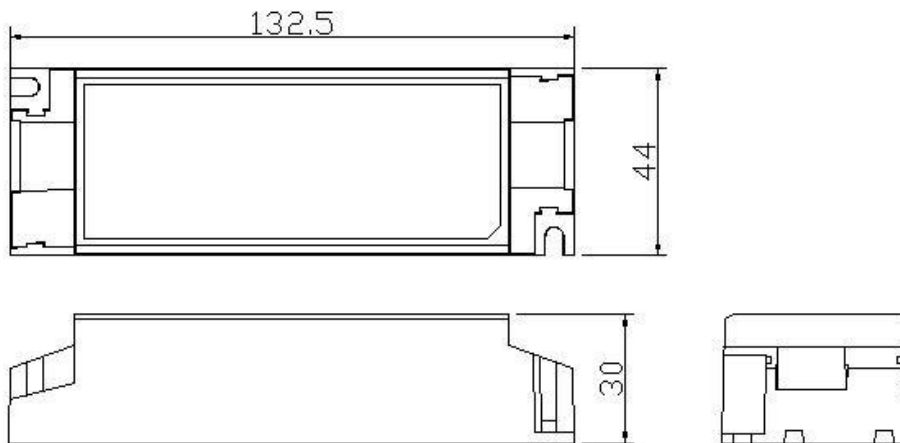


### 6. Dimension (Unit: mm)

Independent type:



Built in type:



### 7. Packing information

Carton L*W*H(mm)	Pcs/Carton	Net weight/ Pcs(kg)	Net weight/ Carton(kg)	Gross weight / Carton(kg)
457*250*220	90	0.16	14.4	15.4

### 8. Wiring Diagram

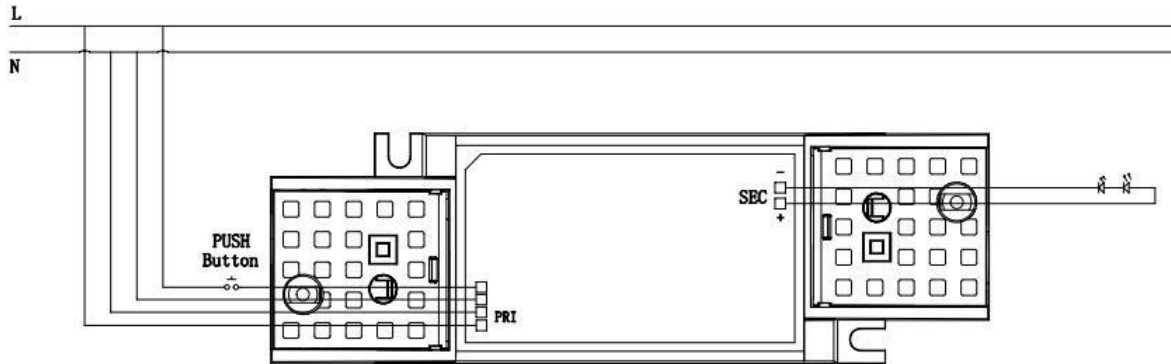


Fig. A: Push Dimming

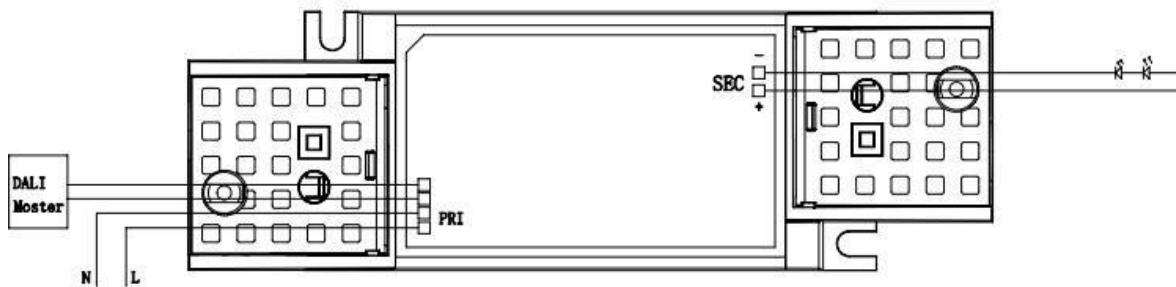


Fig. B: DALI Dimming

### 9. Wiring instructions

- All connections must be kept as short as possible to ensure good EMI behaviour
- Mains leads should be kept apart from LED Driver and other leads (ideally 5 – 10 cm distance)
- Advice the maximum length of output wires is 3 m
- Secondary switching is not permitted ( Except for constant voltage )
- Incorrect wiring can damage LED modules.
- The wiring must be protected against short circuits to earth (sharp edged metals parts, metal cable clips, louver, etc.