AC Triac Rotary Panel Dimmer

Model No.: KNT240W

Rotary dimming/Leading edge or trailing edge/Min brightness settable/Wireless remote control

Features

- Rotary panel AC phase-cut dimmer, 1 channel output.
- To dim and switch single color dimmable LED lamps, traditional incandescent and halogen lights.
- Rotate knob to change brightness, support push and long push operation.
- Leading edge dimming or trailing edge dimming set by dip switch.
- Min brightness can be set by key.
- Light on/off fade time 3s selectable.
- Compatibility with RF 2.4G dimming remote control.
- Over-heat / Over-load protection, recover automatically.

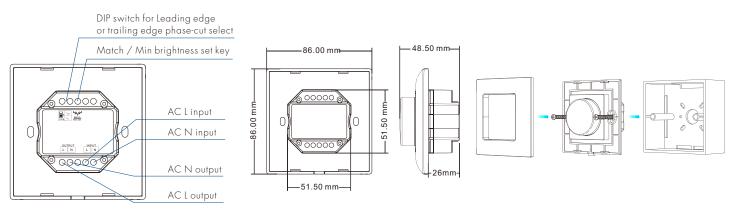
Technical Parameters



CE RoHS emc LVD

Input and Output		Safety and EMC		Environment	
Input voltage	AC100-240V	EMC standard (EMC)	ETSI EN 301 489-1 V2.2.3	Operation temperature	Ta: -30 °C ~ +55 °C
Output voltage	AC100-240V		ETSI EN 301 489-17 V3.2.4	Case temperature (Max.)	Ta: +85 °C
Output current	Max 1.5A	Safety standard(LVD)	EN 62368-1:2020+A11:2020	Package	
Output power	150-360W	Radio Equipment(RED)	ETSI EN 300 328 V2.2.2	Size	L112x W112 x H60mm
Input signal	Rotary knob + RF 2.4GHz	Certification	CE,EMC,LVD,RED	Gross weight	0.113kg
RF Control distance	1 Om(Barrier-free space)	Warranty	5 years		

Mechanical Structures and Installations

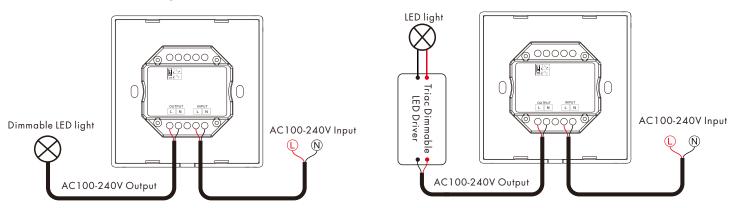


Wiring diagram

Caution: Please carefully ensure all wire connections and polarities are correct and secure before applying power, otherwise this controller will be damaged.

• Connect with dimmable LED driver

• Connect with dimmable LED light



Note: When calculating the maximum number of load lamps or drivers, the input power or input current parameters of a single lamp or driver must be used, the output power parameters can not be used.

In addition, the maximum surge current of the dimmer is 65A, the sum of surge current of multiple dimmable LED drivers should not exceed 2 times. otherwise, the product will be overloaded and damaged.

Compatible Load Types

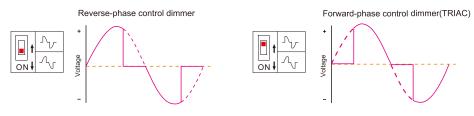
Load Type	Maximum Load	Remarks	
Dimmable LED lamps	200W @ 220V	Due to variety of LED lamp designs, maximum number of LED lamps	
	100W @ 110V	is further dependent on power factor result when connected to dimmer.	
Triac Dimmable	200W @ 220V	Maximum permitted number of drivers is 200W divided by driver nameplate	
LED drivers	100W @ 110V	power rating, and make sure the surge current is no more than 2 times 65A.	
Incandescent lighting,	400W @ 220V		
HV Halogen lamps	200W @ 110V		

Knob function

- Push: Turn on or off light.
- After turn on light:
- Rotate: Rotate knob to adjust brightness, 2.5 turns, 50 levels.
- Long push(1-5s): Continuous 256 levels brightness adjustment.

Leading edge or trailing edge dimming setting

Select leading edge(forward-phase) dimmer or trailing edge(reverse-phase) dimmer according to dimmable LED light or driver.



Caution: before power on, you must confirm the selection of dip switch.

Min brightness setting

Long press Min set key for 2s, the light blink 2 times, ready for min brightness set, then short press Min set key 1-6 times, to get 6 min brightness: 5%, 10%, 15%, 20%, 25% or 30%, the light will output the current min brightness immediately, Long press Min set key for 2s or wait 8s, quit min brightness set, the light will output 100% brightness automatically.

Light on/off fade time

Long press match key 5s, then short press match key 3 times, the light on/off time will be set to 3s, the indicator light blink 3 times. Long press match key 10s, restore factory default parameter, the light on/off time also restore to 0.5s.

Match Remote Control (three match ways)

The AC triac rotary panel dimmer can also match with the RF dimming remote (optional). End user can choose the suitable match/delete ways. Three options are offered for selection:

Use Match key

Match:

Short press match key, immediately press on/off key(single zone remote) or zone key(multiple zone remote) of the remote.

Delete:

Press and hold match key for 5s to delete all match.

Use Knob

Match:

Turn on light, turn off, immediately push the knob for 5s, immediately press on/off key(single zone remote) or zone key(multiple zone remote) of the remote. Delete:

Turn on light, turn off, immediately push the knob for 10s, delete all matched remotes.

Use Power Restart

Match:

Switch off the power, then switch on power, repeat again, immediately short press on/off key (single zone remote) or zone key (multiple zone remote) 3 times on the remote. The light blinks 3 times means match is successful.

Delete:

Switch off the power, then switch on power, repeat again, immediately short press on/off key (single zone remote) or zone key (multiple zone remote) 5 times on the remote. The light blinks 5 times means all matched remotes were deleted.