

# STD-SCU range

## STD400RC/RL-DIN & SAE

## STD1000RL-DIN & SAE

## SCU10-DIN & SAE



STD400RC/RL-DIN

STD400RC/RL-SAE



STD1000RL-SAE



SCU10-SAE

### Function

- STD and SCU dimmers modulate lighting brightness for unit powers from 40 to 1500 W from one or more switch-on points.
- They can be controlled either with the local control push-button placed on front panel or with auxiliary push-buttons.
- They have soft-On / soft-Off, light level memory and minimum level setting features.
- They are available in 2 different types:
  - DIN type (STD400RC/RL-DIN, STD1000RL-DIN and SCU10-DIN) supplied without digital inputs,
  - SAE type (STD400RC/RL-SAE, STD1000RL-SAE and SCU10-SAE) supplied with 4 digital inputs.

### Common technical data for DIN&SAE types

- Local push-button: short push for On/Off control, long push for dimming.
- Auxiliary push-button input: short push for On/Off control, long push for dimming.
  - up to 25 parallel connected auxiliary push-buttons without indication lamps.
  - up to 5 parallel connected auxiliary push-buttons with indication lamps.
  - max wire length 50 m.
- The minimum light level setting is adjustable.
- Indication blue LED (built in the local push-button) illuminates during the on-state. The LED is blinking in error mode.
- Protection and fuses:
  - electronic overload protection,
  - electronic overvoltage protection,
  - electronic over temperature protection,
  - single shot thermal fuse.
- Supply voltage: 230 V AC  $\pm$  10 %, 50 Hz.
- Power loss: 3 W.
- Standby consumption: 0.8 VA.
- Current sink for 1-10 V output: 0.2- 100 mA,
- Operating temperature: 0 °C to +40 °C , 40 °C to +70 °C with - 6 W /°C de-rating.
- Storage temperature: 0 °C to +60 °C.
- Degree of protection: IP 20.
- Standards: according to EN 60669-2-1.
- Directives: according to CE, EMC 89/336/EEC and LVD 73/73/23/EEC.

### Specific technical data for SAE type

- The **STD400RC/RL-SAE**, **STD1000RL-SAE** and **SCU10-SAE** dimmers are supplied with 4 digital inputs:
  - input 1: On/Off and dimming up/down or only On and dimming up (depends on function mode).
  - input 2: Off and dimming down or only Off (depends on function mode).
  - input 3: adjustable lighting level memory 1 (50% default).
  - input 4: adjustable lighting level memory 2 (100% default).
- Input voltage: 12- 30 V AC/ DC.
- Max wire length: 50m.
- Up to 25 push-buttons per input. No push-button with indication lamp.
- STD400RC/RL-DIN and STD400RC/RL-SAE dimmers are power regulators designed for all dimmable load types. Dimmers have automatic load type detection and the load regulation method is adjusted to fit the load.

### Load table

#### STD400RC/RL-DIN, STD400RC/RL-SAE

230 V incandescent and halogen lamps	40 - 400 W
Low voltage halogen lamps with electronic or conventional transformer	40 - 400 W
Low voltage halogen lamps with toroidal transformer	40 - 300 W
Motors (fans, ventilators...)	40 - 200 W


#### STD1000RL-DIN, STD1000RL-SAE

230 V incandescent and halogen lamps	60 - 1000 W
Low voltage halogen lamps with conventional transformer	60 - 1000 W
Low voltage halogen lamps with toroidal transformer	60 - 1000 W
Motors (fans, ventilators...)	60 - 600 W

#### SCU10-DIN, SCU10-SAE

Mono fluorescent tubes with electronic ballast (dia.26 mm)	50 x 18 W, 40 x 36 W, 25 x 58 W
Duo fluorescent tubes with electronic ballast (dia.26 mm)	40 x 18 W, 20 x 36 W, 12 x 58 W
Fluocompact lamps with electronic ballast	50 max. up to 1500 W

## Common operation for SAE&DIN versions

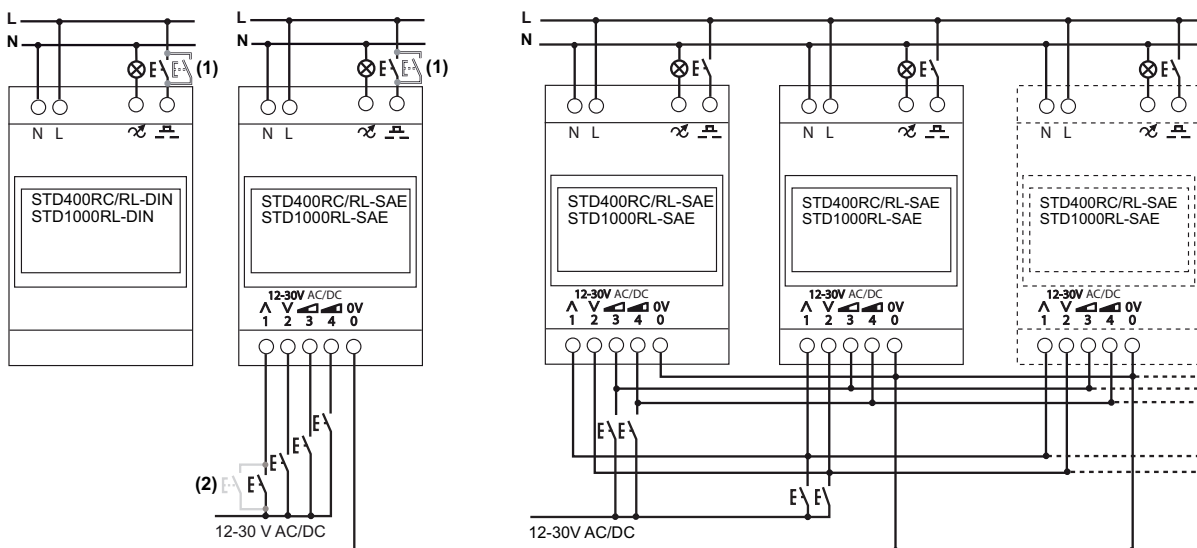
- The dimmer is turned On/Off by shortly pushing the front panel push-button. This push-button lights blue when the dimmer is On.
- The light level is controlled by keeping the front panel push-button pushed until wanted level has been reached.
- The direction of dimming (up/down) is changed every time the front panel push-button is released.
- The dimmer has memory function which stores the light level before Off-command. When the dimmer is turned back On, the light level is the same as it was before Off-command.
- Auxiliary push-buttons connected on  terminal have the same functionality as the push-button on the front panel of the dimmer.

## Specific operation for SAE type

- **STD400RC/RL-SAE, STD1000RL-SAE and SCU10-SAE** dimmers have 2 different operation modes (**A** and **B**) using auxiliary push-buttons connected on digital inputs (1, 2, 3 and 4 terminals).
- Modes **A** and **B** can be changed by pushing the digital inputs 3 and 4 simultaneously for 10 s. After the mode is changed the load and the LED start to blink as long as the inputs are pushed.
- In the mode **A**, the input 1 dims the lights on with a short push and up with a long push and turns light off with a short push and dims the light down with a long push. The direction is changed every time the input 1 is released. The input 2 dims the lights always off.
- In the mode **B**, the input 1 dims lights only up with a long push and turns lights on with a short push. The input 2 dims the lights only down with a long push and turns lights off with a short push.
- Inputs 3 and 4 are for memory places for light levels. The light level is called with a short push and set into the memory with a long push of 3 s.

## STD dimmers connection

- Top connection terminals: 2-pole screw connection for cables up to 4 mm<sup>2</sup>.
- Bottom connection terminals only available for SAE type: 5-pole screw connection for cables up to 2.5 mm<sup>2</sup>.
- With SAE types, it is possible to control a maximum of 20 dimmers combining STD400RC/RL-SAE and STD1000RL-SAE, with only one push-button via the 4 digital inputs.



(1) Use of maximum 25 push-buttons without indication lamp and 5 push-buttons with indication lamp, connected in parallel

(2) Use of maximum 25 push-buttons without indication lamp, connected in parallel, only for STD400RC/RL-SAE and STD1000RL-SAE

# STD-SCU range

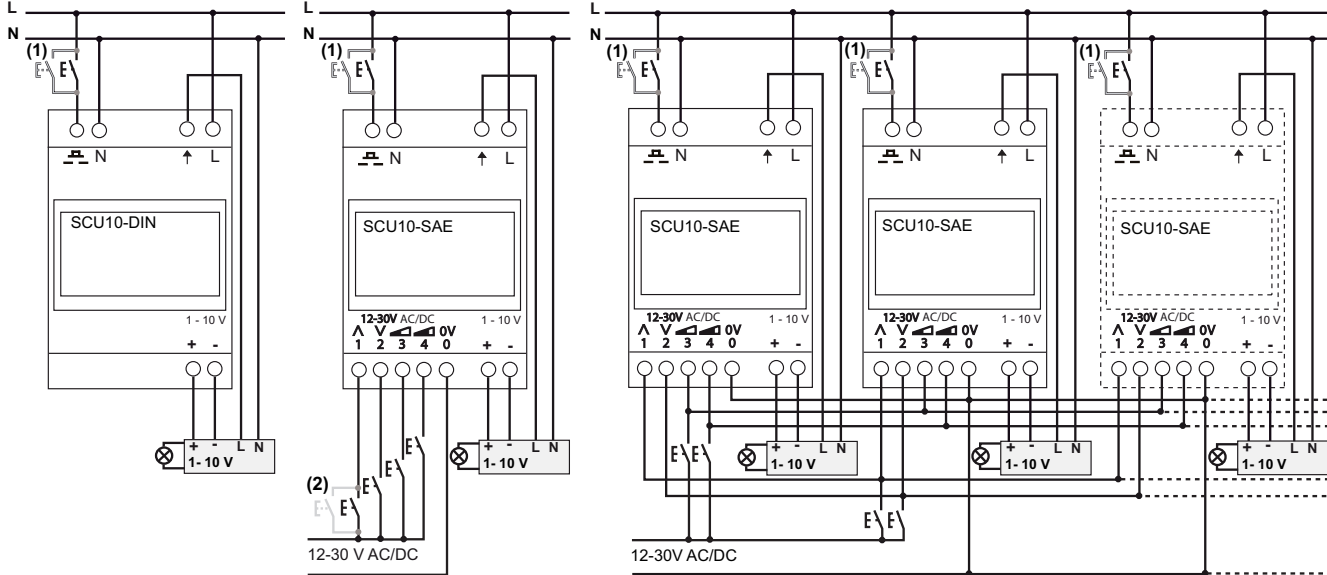
## STD400RC/RL-DIN & SAE

## STD1000RL-DIN & SAE

## SCU10-DIN & SAE

### SCU dimmers connection

- Top connection terminals: 2-pole screw connection for cables up to 4 mm<sup>2</sup>.
- Bottom connection terminals only available for SAE type: 5-pole screw connection for cables up to 2.5 mm<sup>2</sup>.
- With SAE types, it is possible to control a maximum of 20 dimmers combining STD400RC/RL-SAE, STD1000RL-SAE and SCU10-SAE with only one push-button via the 4 digital inputs.



- (1) Use of maximum 25 push-buttons without indication lamp and 5 push-buttons with indication lamp, connected in parallel  
 (2) Use of maximum 25 push-buttons without indication lamp, connected in parallel, only for SCU10-SAE

### Catalogue number

Type	Cat. no.
STD400RC/RL-DIN	CCTDD20001
STD400RC/RL-SAE	CCTDD20002
STD1000RL-DIN	CCTDD20003
STD1000RL-SAE	CCTDD20004
SCU10-DIN	CCTDD20011
SCU10-SAE	CCTDD20012

### Dimensions

Type	Width (mod. of 9 mm)
STD400RC/RL-DIN , STD400RC/RL-SAE	4
STD1000RL-DIN , STD1000RL-SAE, SCU10-DIN, SCU10-SAE	8

