For 2-lamp luminaires with electronic driver (ECG) to AC mains direct wiring for operation with OSRAM SubstiTUBE T8 EM/UN or OSRAM SubstiTUBE T5 AC
Rewiring must be executed by a qualified electrician.

**Luminaire to be rewired (ECG mounting already removed)**

**Tools needed:** wire cutter, wire stripper, different screwdrivers
New wires must comply with latest version of EN 50525 and EN 60598-1, have a minimum cross section of 0.4 mm$^2$ and the isolation have a nominal thickness of 0.5 mm.

**Material included in conversion kit**

**Content conversion kit:**
- 6 WAGO connectors
- 4 adhesive sockets for cable ties
- 4 cable ties
- New blank name plate for luminaire (to be fixed clearly visible and permanently on the luminaire)
- Pre-wired microfuse (T2A 250V)
1. General Work Steps

Direct wiring circuit diagram of a 2-lamp luminaire on AC mains

Remove wiring from ECG step by step and re-connect as prescribed below

Step 1: Connect mains line “L” to fuse with one wire using a WAGO connector
Step 2: Connect second fuse line to both right lamp holders. Pay attention to correct connection of all ECG clamps within the following steps.
Step 3: Connect lines of left and right lamp holders for lamp 1 and 2.
Step 4: Conenct both left lamp holders to neutral line „N“. Use WAGO connectors if needed.

Step 5: Remove ECG.
Step 6: Fix all wires with adhesive sockets and cable ties.
1. General Work Steps

Step 7: After CE conformity test, fill in and fix new name plate clearly visible and permanently on luminaire while removing or pasting over old name plate.

Step 8: Conduct final visual inspection of all components and check if all wires have been fixed tightly inside of the WAGO connectors. Cables should not be pinched during the mounting of the luminaire. Defect parts must be repaired or replaced.

If needed, re-connect earth conductor (PE)
2. Wiring examples with typical ECG

Remove wiring from ECG step by step and re-connect as prescribed below

Step 1: Connect mains line “L” to fuse with one wire

1. ECG with 7 connectors (e.g. Siemens, OSRAM, BAG)

1.1 Siemens ECG

Step 2 Connect second fuse line to line „7“ and „5“
Step 3: Connect line „6“ to line „3“
Step 4: Connect line „4“ to line „2“
Step 5: Connect line „1“ to line „N“
Further steps according to general work steps.
2. Wiring examples with typical ECG

### 1.2 OSRAM ECG

![OSRAM ECG Diagram]

- Step 2: Connect second fuse line to line „24“ and „26“
- Step 3: Connect line „25“ to line „22“
- Step 4: Connect line „27“ to line „23“
- Step 5: Connect line „21“ to line „N“

Further steps according to general work steps.

### 1.3 BAG ECG

![BAG ECG Diagram]

- Step 2: Connect second fuse line to line „1“ and „7“
- Step 3: Connect line „6“ to line „5“
- Step 4: Connect line „3“ to line „2“
- Step 5: Connect line „4“ to line „N“

Further steps according to general work steps.
2. Wiring examples with typical ECG

2. ECG with 6 connectors (e.g. Philips, Tridonic)

2.1 Philips ECG

Step 2: Connect second fuse line to line „1“ and „6“
Step 3: Connect line „2“ to line „3“
Step 4: Connect line „4“ to line „5“
Step 5: Connect both connection lines of left lamp holders to „N“
Further steps according to general work steps.

2.2 Zumtobel/ Tridonic ECG

Step 2: Connect second fuse line to line „11“ and „16“
Step 3: Connect line „12“ to line „13“
Step 4: Connect line „14“ to line „15“
Step 5: Connect both connection lines of left lamp holders to „N“
Further steps according to general work steps.
ABOUT LEDVANCE
With offices in more than 50 countries and business activities in more than 140 countries, LEDVANCE is one of the world’s leading general lighting providers for professional users and end consumers. Having emerged from the general lighting business of OSRAM GmbH, LEDVANCE offers a wide-ranging assortment of LED luminaires for a broad spectrum of application areas, intelligent lighting products for Smart Homes and Buildings, one of the largest LED lamps portfolios in the industry as well as traditional light sources.