



## CIT Relays and Switches for the Lighting Systems Industry

Switches and relays are fundamental components in lighting equipment, providing essential control and functionality for a wide range of lighting systems. They allow users to turn lights on and off, adjust brightness, select lighting modes, and ensure safety and energy efficiency. Here's how switches and relays are used in various lighting applications:

### 1. Basic On/Off Control

- **Switches:**
  - **Toggle and Rocker Switches:** Commonly used in residential and commercial settings, these switches provide simple on/off control for lighting fixtures. They are the most straightforward and widely used types of switches for lighting control.
  - **Push Button Switches:** Often used for modern and stylish lighting control, these switches may include additional features like dimming or scene selection. They are popular in contemporary interior designs.
- **Relays:**
  - **Power Relays:** Used to control the power supply to lighting fixtures, especially in situations where the control circuit needs to be electrically isolated from the lighting circuit. Power relays can handle higher currents and are suitable for large lighting installations.

### 2. Dimming and Brightness Control

- **Switches:**
  - **Dimmer Switches:** These switches allow users to adjust the brightness of lights. They work by reducing the power delivered to the light source, which can save energy and extend the life of the lighting fixture. Modern dimmer switches are compatible with various types of bulbs, including LEDs, CFLs, and incandescent bulbs.
- **Relays:**
  - **Dimmer Relays:** In more advanced lighting systems, relays are used to control dimming circuits, especially in large-scale installations or smart lighting systems where centralized control is needed. These relays can be controlled via wall switches, remote controls, or automated systems.

### 3. Specialized Lighting Control

- **Switches:**
  - **Scene Selector Switches:** Used in environments like theaters, restaurants, or multi-purpose rooms, these switches allow users to select different lighting scenes



or moods. They can control multiple lights or groups of lights to create specific atmospheres.

- **Relays:**
  - **Sequential Control Relays:** These relays are used in applications like stage lighting or architectural lighting, where lights need to be activated in a specific sequence. They can be controlled by lighting controllers or automated systems.

#### 4. Industrial and Commercial Lighting Control

- **Switches:**
  - **Heavy-Duty Switches:** Used in industrial environments, these switches are designed to withstand harsh conditions and heavy use. They control lighting in factories, warehouses, and other demanding settings.
- **Relays:**
  - **Contactor Relays:** These are used in commercial and industrial lighting systems to control large numbers of lights or high-power lighting circuits. Contactors can handle large currents and are controlled by low-power signals, often from a building automation system.

Switches and relays are integral to the control and operation of lighting systems, providing functionality ranging from basic on/off control to advanced automation and smart lighting features. They enhance the usability, safety, and energy efficiency of lighting equipment across residential, commercial, and industrial applications.

#### CIT Switches used in the Lighting Systems Industry:

- [Anti-Vandal Switches](#)
- [SH Series](#)
- [ES Series](#)
- [CL1200 Series](#)

#### CIT Relays used in the Lighting Systems Industry:

- [J115F1E Series](#)
- [J115F2E Series](#)
- [J115F3E Series](#)
- [J115F1 50 Amp Series](#)
- [J115F2 50 Amp Series](#)
- [J115F3 50 Amp Series](#)
- [J107F Series](#)
- [J107E Series](#)