

## Light Source Recommendations for LEGO® Solar Panel

The LEGO® Solar Panel can convert light energy into electrical energy. Different types of light sources can be used for this.

### Natural Sunlight

The ideal light source is full natural sunlight and the best effect is achieved outdoors. However, depending on the season, sunlight can be difficult to plan for, which is why artificial light sources are often preferred.

### Incandescent Light Bulbs

The best alternative to natural sunlight is incandescent light bulbs, such as a 60W light bulb. Unfortunately, incandescent light bulbs for private use are being phased out or banned in most countries due to energy-efficiency legislation. This means that this type light bulb may be difficult to obtain from traditional retailers, such as supermarkets and hardware stores.

The ban currently only applies to light bulbs used in private homes, which means that incandescent light bulbs designed for industrial use can often still be obtained. Types of bulbs not affected by the ban include **rough service**, **shatterproof**, and **shatter resistant** light bulbs. Although these types of bulbs are not sold by supermarkets, they continue to be available at specialist lighting and hardware stores, as well as online retailers. Conditions can vary from country to country.

### Halogen Incandescent Light Bulbs

Halogen incandescent light bulbs can be used with the LEGO Solar Panel. Due to the halogen's greater energy efficiency compared to traditional incandescent light bulbs, they are not affected by energy-efficiency legislation and can easily be obtained. However, halogen light bulbs operate at very high temperatures and can therefore pose fire and burn hazards. They are not recommended for use by students.

### Energy-Saving Light Bulbs

Do not use energy-saving light bulbs, such as compact fluorescent lamps (CFL) and light emitting diodes (LED), as they emit insufficient energy to support the LEGO Solar Panel.