

# Spherical T2 6,000 hours

Compact Fluorescent Lamps Integrated  
5W and 7W

## Product information

The T2 6,000 hours spherical lamps offer traditional incandescent shape and sizes, long life and elegant light. Suitable for multi-arm fixtures or anywhere the bulb is visible, GE Lighting's Decor CFL range is an ideal and eco-friendly solution.

## Features

Compact Fluorescent Lamps (CFL) have an important role to play in the future of lighting, helping to protect the environment by using less energy and creating less CO<sub>2</sub> emissions. In addition, CFL lamps contribute to the reduction of maintenance costs, ensuring that financial benefits are enjoyed alongside environmental benefits.

There are a variety of performance advantages afforded by GE Lighting CFL lamps. They use almost 80% less energy and last six times longer than their incandescent predecessors, are rated Energy Class 'A' and offer high quality light.

With continuing technological advancements and miniaturisation, today's T2 CFL lamps are even smaller than the incandescent lamps that they replace to ensure that they are discreet – yet high performing.

- 6,000 hours life
- T2 tube inside, small sizes
- High colour rendering
- Low mercury content
- 'A' energy class



## Application areas

Spherical T2 6,000 hours lamps are recommended for general indoor and outdoor applications such as:

- Home lighting
- Retail lighting
- Hotels
- Restaurants
- Corridors, hallways
- Gardens, courtyards

## Product range

Spherical T2 6,000 hours lamps are available in a range of:

- 5 and 7 wattages
- E14, E27, B22 caps
- Warm (2700K) and Cool (4000K) colours
- Box and blister packs



# Compliance

## Standards

- IEC 60061-1: Lamp caps and holders together with gauges for the control of interchangeability and safety
- IEC or EN 60969: Self ballasted lamps for general lighting services – performance requirements
- IEC or EN 60968: Self-ballasted lamps for general lighting services – safety requirements
- EN 50285: Energy labelling of household lamps
- CIE S 009/E:2002: Photobiological safety of lamps and lamp systems
- EN 61547: Requirement for general lighting purposes – EMC immunity requirement
- EN 55015 or CISPR 15: Limits and methods of measurement of radio disturbance characteristics of electrical lighting and similar equipment
- EN 61000-3-2: Electromagnetic compatibility (EMC) – Part 3-2: Limits – limits for harmonic current emissions (equipment input current up to and including 16A per phase)
- EN 61000-3-3: Electromagnetic compatibility (EMC) – Part 3-3: Limits – limitation of voltage fluctuations and flicker in low-voltage supply systems for equipment with rated current up to 16A

## European Directives:

- Safety: Low Voltage (LVD) 2006/95/EC
- Electromagnetic Compatibility: (EMC) 2004/108/EC
- RoHS: Directive 2011/65/EC on Restrictions of the use of certain Hazardous Substances (RoHS)
- ErP household: Directive 2009/125/EC on ecodesign requirements (of Energy-related Products) and its Implementing Measure for non-directional Household Lamps: 244/2009/EC
- Energy Labelling: Commission Directive 98/11/EC of 27 January 1998 implementing Council Directive 92/75/EEC with regard to energy labelling of household lamps
- WEEE: Directive 2002/96/EC on Waste Electrical and Electronic Equipment (WEEE)
- REACH: Commission Regulation 453/2010/EC on Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH)

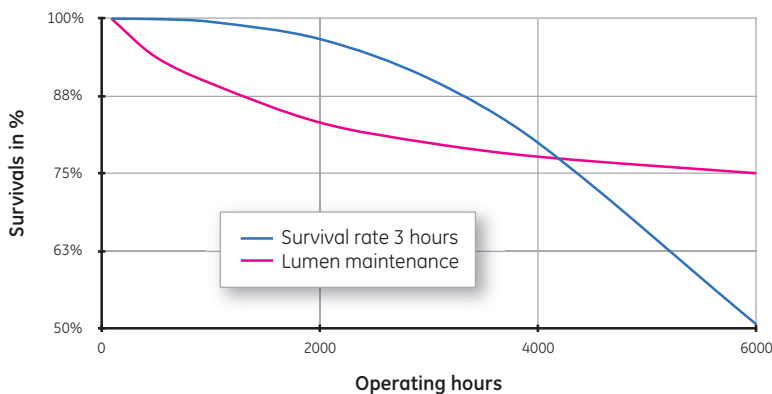
## Basic data

Rated* Wattage [W]	Volts [V]	Cap	Product Description	Product Code Box pack	Product Code Blister pack	Rated* Lumen [lm]	CCT [K]	CRI [Ra]	Rated* Life [h]	Length [mm]	Diameter [mm]	EEC	Pack Qty	EuP Inca Watt Equivalent
5,0	220-240	E14	FLE5SPH/T2/827/E14	88839	73385	200	2700	80	6,000	100	45	A	8	22
5,0	220-240	E27	FLE5SPH/T2/827/E27	78691	88840	200	2700	80	6,000	89	45	A	8	22
5,0	220-240	B22	FLE5SPH/T2/827/B22	88841		200	2700	80	6,000	88	45	A	8	22
5,0	220-240	E14	FLE5SPH/T2/840/E14	73387	73388	200	4000	80	6,000	100	45	A	10	22
5,0	220-240	E27	FLE5SPH/T2/840/E27	73389	73394	200	4000	80	6,000	89	45	A	10	22
7,0	220-240	E14	FLE7SPH/T2/827/E14	88842	73397	310	2700	80	6,000	100	45	A	8	31
7,0	220-240	E27	FLE7SPH/T2/827/E27	75313		310	2700	80	6,000	89	45	A	8	31
7,0	220-240	B22	FLE7SPH/T2/827/B22	88844	88843	310	2700	80	6,000	88	45	A	8	31
7,0	220-240	E14	FLE7SPH/T2/840/E14	73402	73583	310	4000	80	6,000	100	45	A	10	31
7,0	220-240	E27	FLE7SPH/T2/840/E27	73398	73399	310	4000	80	6,000	89	45	A	10	31

\*Rated wattage, life and lumen are equivalent to nominal values, which are indicated on product packaging

## Survival rate and lumen maintenance

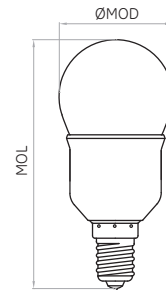
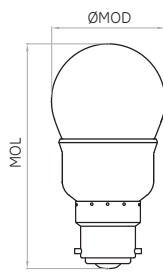
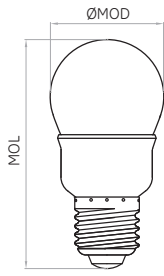
Life Expectancy and Lumen Maintenance



Test condition: 50Hz 230V 3 hours cycling - according to IEC60969

Hours	Survival rate 3 hours	Lumen maintenance
100	1.00	1.00
2,000	0.97	0.83
4,000	0.80	0.78
6,000	0.51	0.75

## Dimensions



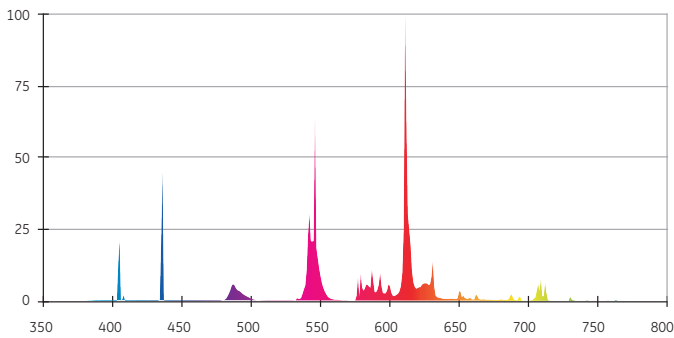
E27 cap		
	MOL [mm]	MOD [mm]
5W	89	45
7W	89	45

B22 cap		
	MOL [mm]	MOD [mm]
5W	88	45
7W	88	45

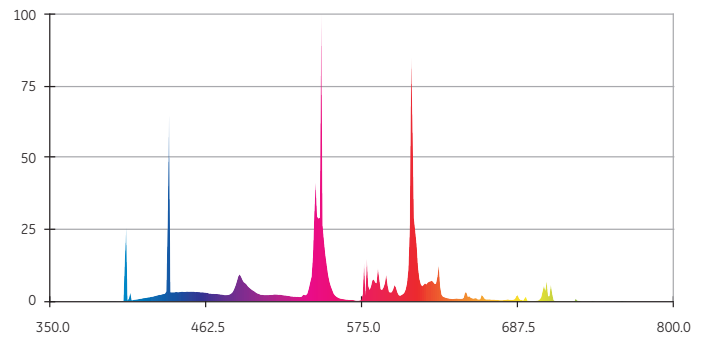
E14 cap		
	MOL [mm]	MOD [mm]
5W	100	45
7W	100	45

## Spectral power distribution

Spectral power distribution 2700K



Spectral Distribution 4000K

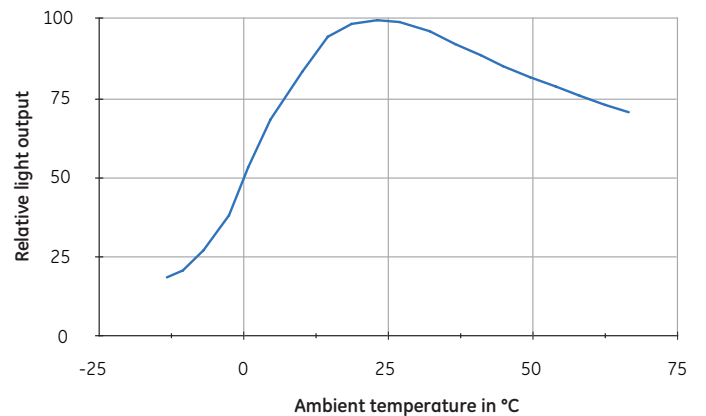


## Influence of ambient temperature on light output

Photometrical and light parameters of a fluorescent lamp depend on the mercury vapor pressure inside the lamp. Mercury vapor pressure in turn is controlled by temperature. When installed in a luminaire, the temperature of the air surrounding the lamp cap changes and this can affect the light output of the lamp. The effects of changes in ambient temperature for a typical lamp are shown on the graph.

Light output vs ambient temperature

Vertical base up position



## Additional information – EuP Compliance

**EU Regulations:** GE Lighting's CFL lamps are all compliant with WEEE (Waste Electrical and Electronic Equipment), RoHS (Reduction of Hazardous Substances) and EuP (Energy Using Products) directives and are available in compliant packaging.

**Incandescent watt equivalence:** select the preferred wattage to enjoy the same light output as the original incandescent bulb while at the same time achieving significant energy savings. The Basic Data table and the updated EuP packaging include the CFL-Incandescent wattage equivalences according to the new EuP luminous flux standards.

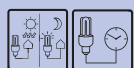


**Starting time:** the time needed for the lamp to start fully and remain alight. GE Lighting's CFL lamps are usually instant light on. Starting categories are: instant on (<0.3sec), quick (0.3-1sec), standard (1-1.5sec).  
**Spherical T2 6,000 hours starting time: instant**

**Warm-up:** GE Lighting's CFL lamps are usually characterised by fast warm-up times. Warm-up categories at 60% lumen are: fast (<30sec), standard (30-60sec) and slow (60-120sec).  
**Spherical T2 6,000 hours: standard warm-up (<60sec)**

**Mercury content:** GE Lighting's CFL lamps contain a minimised level of mercury, some of our best-in class lamps as low as 0.9mg vs. the max. 5.0mg allowed by RoHS.  
**Spherical T2 6,000 hours: mercury content 2.0mg.**

**Dimming:** not recommended to use with dimmers.



**Timer, photo cell circuits:** not suitable for use with electronically switched devices. Please refer to the device instructions.



**Switching cycle:** switching endurance is minimum 3000 cycles based on official EU standard – one minute on, three minutes off.  
**Spherical T2 6,000 hours switching cycle: 5,000**

### Power Factor

**Power Factor:** ratio of the measured active input power to the product of the supply voltage (r.m.s.) and the supply current (r.m.s.). measures how efficiently the current is being converted into real power. Lamps of power factor >0.9 are referred to as High Power Factor lamps, below that as Low Power Factor lamps. All CFL lamps above 25 watts sold in EU need to be High Power Factor lamp.  
**Spherical T2 6,000 hours power factor: >0.5**



**Ambient temperature range:** temperature at which a lighting product can be safely used and can meet the claimed rated life. Outside of this temperature range, the product might still operate, although the life could be reduced.  
**Spherical T2 6,000 hours 5W ambient operating temperature range: 0-50°C**  
**Spherical T2 6,000 hours 7W ambient operating temperature range: -10-50°C**



**Minimum starting temperature:** the lowest temperature condition at which the product can reliably start at within 3sec at 230V.  
**Spherical T2 6,000 hours 5W minimum starting temperature: 0°C**  
**Spherical T2 6,000 hours 7W minimum starting temperature: -10°C.**

220-240V  
50Hz

**220-240V 50Hz:** all lamps operate on 220-240 Volt (-10%; +6%), 50 Hertz



**Enclosed fixture:** usage in enclosed fixture may reduce life. Not recommended in totally enclosed fixture.

**Website:** instructions on how to dispose of lamps at end of life or in the case of accidental lamp breakage are available on the GE Lighting website.