

Candle 8,000 hours

Compact Fluorescent Lamps Integrated
9W

Product information

The 8,000 hours CFL candle lamps offer traditional incandescent shape, 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 characterized by outstanding fast run-up time.

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 CO₂ 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 similar to the incandescent lamps that they replace to ensure that they are discreet – yet high performing.

- 8,000 hours life
- Fast warm-up
- Small dimensions due to T2 tubes
- Decorative shapes and colours
- 'A' energy class



Application areas

Candle 8,000 hours lamps are recommended for general indoor and outdoor applications such as:

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

Product range

Candle 8,000 hours lamps are available in a full range of:

- 9W
- E14, E27, B22 caps
- Warm white (2700K), Cool (4000K) and Daylight (6500K) 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)

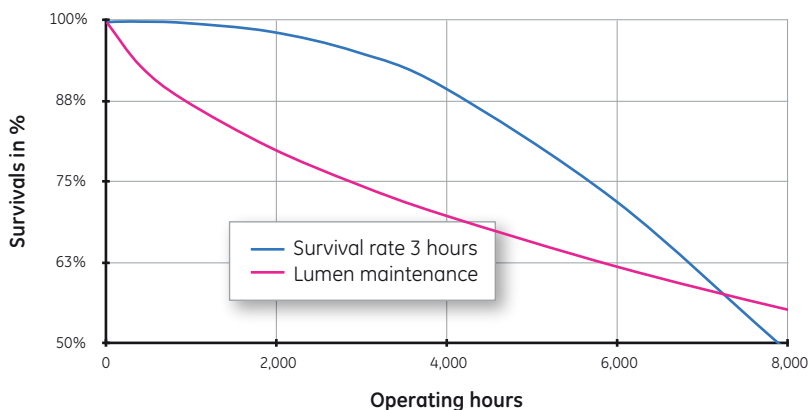
Basic data

Rated* Wattage [W]	Volts [V]	Cap	Product Description	Box	Blister	Rated* Lumen [lm]	CCT [K]	CRI [Ra]	Life [h]	Diameter [mm]	Length [mm]	EEC	EuP Inca Watt Equivalent
9,0	220-240V	E27	OT FLE9CDL/T2/827/E27	63624	65247	405	2700K	82	8000	37	110.5	A	38
9,0	220-240V	B22	OT FLE9CDL/T2/827/B22	63625		405	2700K	82	8000	37	109.5	A	38
9,0	220-240V	E14	OT FLE9CDL/T2/827/E14	63623	65244	405	2700K	82	8000	37	113	A	38
9,0	220-240V	B15	OT FLE9CDL/T2/827/B15	97145		405	2700K	82	8000	37	111.5	A	38
9,0	220-240V	E14	OT FLE9CDL/T2/840/E14	65248		405	4000K	82	8000	37	113	A	38

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

Survival rate and lumen maintenance

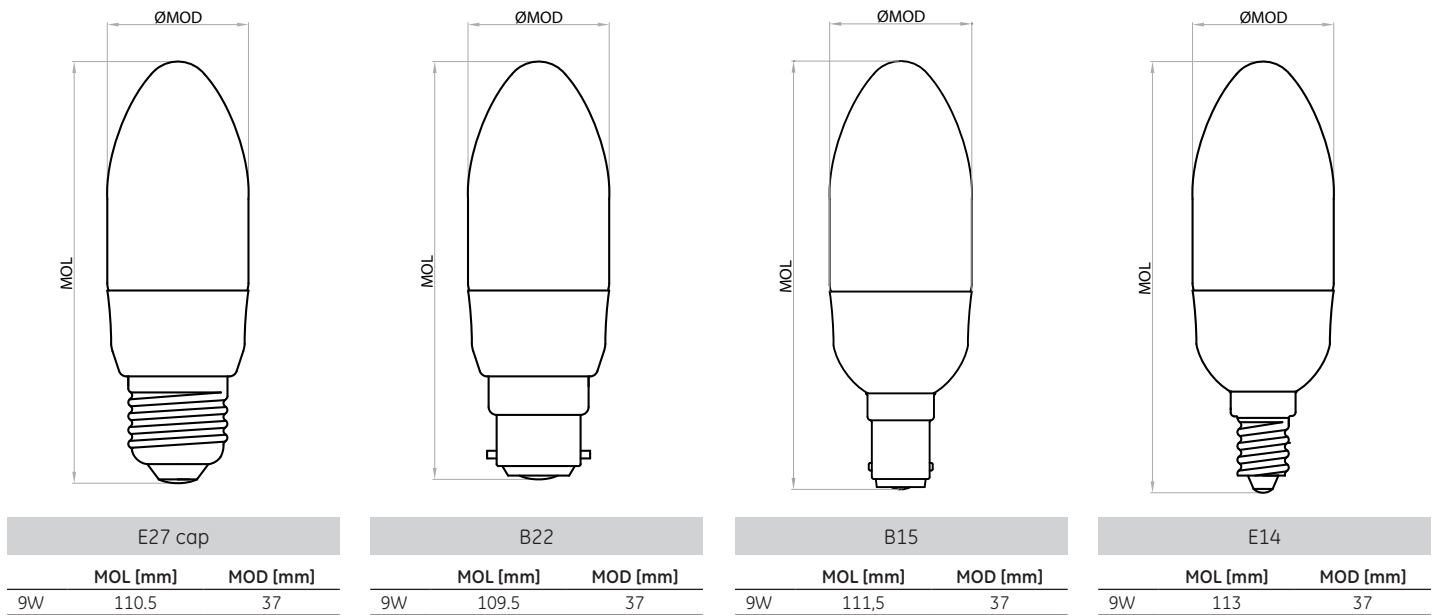
Life Expectancy and lumen maintenance



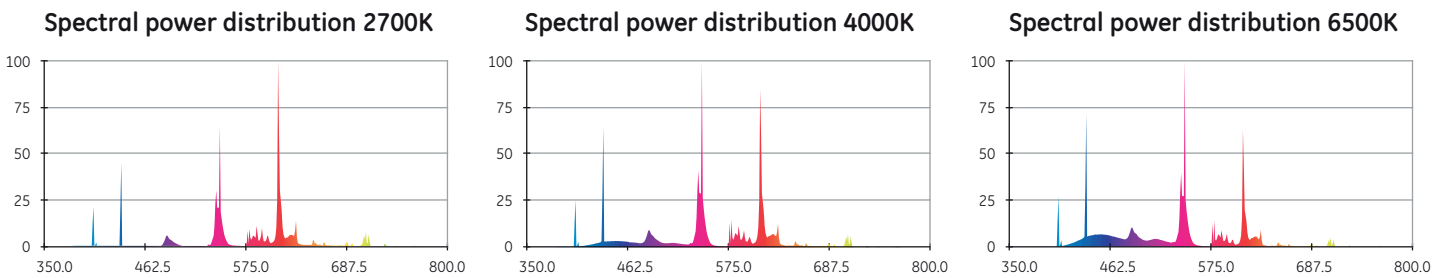
Test condition: 50Hz 230V 3 hours cycling - according to IEC60969

Hours	Survival rate 3 hours	Lumen maintenance
100	1.00	1.00
2,000	0.98	0.80
4,000	0.90	0.70
6,000	0.72	0.62
8,000	0.49	0.55

Dimensions

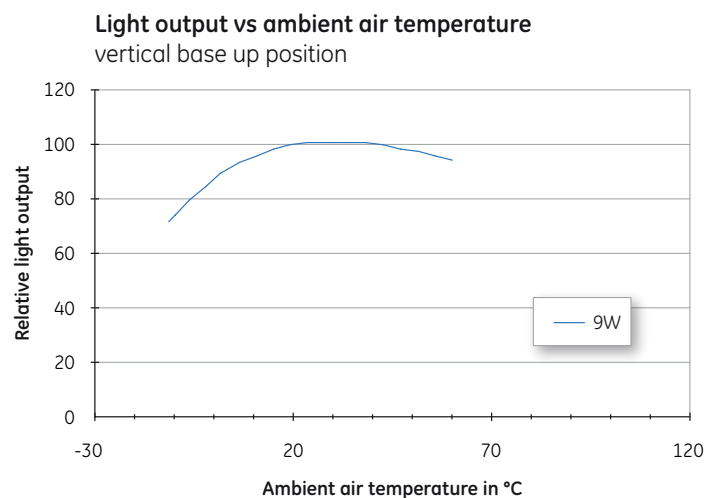


Spectral power distribution



Influence of ambient temperature on light output

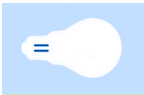
Photometrical and light parameters of a fluorescent lamp depend on the mercury vapor pressure inside the lamp. Mercury vapor pressure in turn is controlled by temperature. When installed in a luminaire, the temperature of the air surrounding the lamp cap changes and this can affect the light output of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



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.



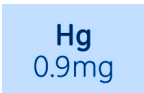
Incandescent watt equivalence: select the preferred wattage to enjoy the same light output as the original incandescent bulb while at the same time achieving significant energy savings. The Basic Data table and the updated EuP packaging include the CFL-Incandescent wattage equivalences according to the 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).
Candle 8,000 hours starting time: standard



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).
Candle 8,000 hours: fast warm-up (<30sec)



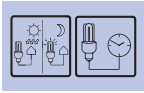
Mercury content: GE Lighting's CFL lamps contain a minimised level of mercury, some of our best-in class lamps as low as 0.9mg vs. the max. 5.0mg allowed by RoHS. **Candle 8,000 hours mercury content: 1.4mg**



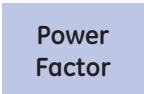
Switching cycle: switching endurance is a minimum 3000 cycles based on official EU standard – one minute on, three minutes off. **Candle 8,000 hours: switching cycle 10,000**



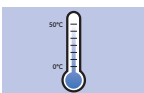
Dimming: not recommended to use with dimmers.



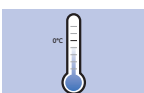
Timer, photo cell circuits: not suitable for use with electronically switched devices. Please refer to the device instructions.



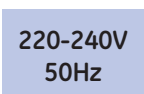
Power Factor: ratio of the measured active input power to the product of the supply voltage (r.m.s.) and the supply current (r.m.s.). measures how efficiently the current is being converted into real power. Lamps of power factor >0.9 are referred to as High Power Factor lamps, below that as Low Power Factor lamps. All CFL lamps above 25 watts sold in EU need to be High Power Factor lamp. **Candle 8,000 hours power factor: >0.5**



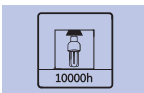
Ambient temperature range: temperature at which a lighting product can be safely used and can meet the claimed rated life. Outside of this temperature range, the product might still operate, although the life could be reduced. **Candle 6,000 hours ambient operating temperature range: -15-50°C**



Minimum starting temperature: the lowest temperature condition at which the product can reliably start at within 3sec at 230V. **Candle 6,000 hours minimum starting temperature: -15°C**



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.