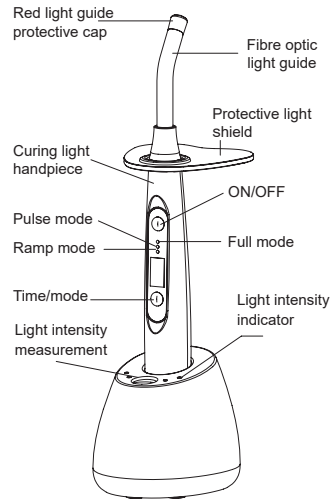




# Maxcure3

## Curing Light Instructions



Intended use:  
This curing light is intended for use by trained dental professionals for the purpose of light curing dental resins and composites

MaxCure3 SPECIFICATIONS		
F.O. Light Guide	8 mm ( dia. )	
Light Wavelength	385-515 nm	
Application	General	
Mode	Full	1600mW/cm <sup>2</sup> ±10% for 5, 10, 15, 20 seconds
	Pulse	0-1600mW/cm <sup>2</sup> ±10% for 5, 10, 15, 20 seconds
	Ramp	1st five seconds from 0-1600mW/cm <sup>2</sup> ±10% next 5, 10, 15, 20, seconds 1600mW/cm <sup>2</sup> ±10%

### Environmental Factors

Operation: 5°C – 40°C / 30% – 75% relative humidity / 70 – 106KPa atmospheric pressure  
Transportation and Storage: -20°C – +40°C / 10% – 93% relative humidity / 70 – 106KPa atmospheric pressure.

### Installation

#### A. CHARGING:

1. Plug the Type-C power cord into the charging base. Once connected, the light intensity indicator will be on. Put the curing light handpiece into the charging base, handpiece display screen will be on and shows CH(charging) during the whole charging process, when the battery is full, charging will stop automatically, and handpiece display screen shows FU(Full).
2. Plug the Type-C power cord directly into the curing light handpiece. Once connected, handpiece display screen will be on and shows CH (charging) during the whole charging process. When battery is full, charging will stop automatically, and handpiece display screen shows FU (Full).

#### B. CURING LIGHT HANDPIECE:

- Insert the fibre optic light guide into the curing light handpiece with a TWISTING motion. Ensure the fibre optic guide fits securely into the curing light handpiece.
- The battery is not fully charged prior to shipment. Please charge the battery for a minimum of 2 hours prior to the first use.
- The curing light circuitry will automatically compensate for power fluctuation during use for a constant light intensity output.
- Continually charging the curing light will not affect the life of the battery as it has a built-in safety function that will stop charging the battery when it is full.
- The light intensity should be checked regularly with a light intensity meter.

### Changing Of Settings And Use

- Activate the curing light by pressing the ON/OFF or TIME/MODE switch ONCE.
- The curing light is preset in the factory to the "FULL" mode for 10 seconds.
- Press and hold the TIME/MODE switch for 2 seconds to change the mode. Press the TIME/MODE switch repeatedly to locate the desired time for the "FULL" "PULSE" or "RAMP" mode.
- Every start and end of a programme or every change of time or mode, will be signaled with a "beep".
- The curing light will automatically turn off if it is not in operation for 1 minute. It will keep the last selected programme in memory once restarted.
- Put on the disposable curing light sleeve to cover the entire curing light for cross infection control.

- Put the protective light shield onto the light guide tip until it is firmly held on the curing light. The curing light is now ready for use.
- Press the ON/OFF or TIME/MODE switch to activate the curing light if no indicator light is on. When the preparation for light curing is ready, press the ON/OFF switch to start using the curing light.
- After the light curing process is finished, remove and dispose the curing light sleeve for every patient.
- When the battery is low, the handpiece display screen shows Lo (Low) and the curing light can still work for about 30times at 10s time mode, we suggest to recharge it in time.

### Curing Light Mode Applications

FULL	For general applications
PULSE	For more gentle processing, designed for reducing the shrinkage of composite.
RAMP	First 0-5 seconds are ramped for more gentle processing, designed for patients sensitive to heat.

### Depth of Cure

MODE	Intensity mW/cm <sup>2</sup>	Time	Depth Measurements	ISO 4049 Depth Measurements (-50%)
FULL	1600±10%	10 seconds	4.3 mm	2.15 mm
PULSE	1600±10%	15 seconds	4.2 mm	2.10 mm
RAMP	1600±10%	15 seconds	4.6 mm	2.30 mm

Remarks: Above data is based on test results using an A2 shade composite. The light guide tip was placed above and pointed perpendicular to the composite. Tests were done as per ISO 4049 Standard. The samples were measured and the data was divided by two (50% of the total composite depth cured). ISO 4049 Standard requires that the results for class II restorative materials should be at least 1.5 mm for non-opaque shades and 1.0 mm for opaque shades.

All resins and composites have different curing times. It is recommended that you should test your resins and composites performance to determine the curing times required.

### Data Is Only For Reference, Always Follow The Instructions From Your Resin And Composite Manufacturers

- There are many variables (distance and angle between the light guide tip and composite, area, shade, thickness and type etc.) affecting composite curing times. It is recommended to place and cure only 2 mm for each composite placement.
- Using a barrier sleeve for the curing light will reduce 5-10% of curing light intensity.
- The light guide tip should be placed approximately 1-2 mm above the resin or composite and pointed perpendicular to tooth surface.
- High intensity lights produce more heat, this is a direct indication of the power of light being emitted. When using the lights for more than 10 seconds, do not keep the light guide tip in one position. It is always recommended to use a dental syringe to blow a cold air flow on the area during long periods of curing. This will maintain a lower temperature for the composite and surrounding area, particularly when using rubber dam so as to avoid any rubber dam breakage due to heat built-up.
- Do not expose soft tissue to curing light for more than 2 seconds or burns may occur.

### Cleaning And Disinfecting

Switch off the curing light and disconnect the Type-C cord of adapter. The curing light handpiece and protective light shield can only be cleaned with a non-alcohol based disinfectant wipe for cold sterilization only. Fibre Optic Guide is autoclavable. Take the Fibre Optic Guide off the curing light handpiece with a TWISTING motion, remove any dirt or debris using a water soaked nylon brush, clean and dry with a wipe, then autoclave as per ISO 17665-1 121°C (250°F) for a minimum of 15 minutes. Always follow the autoclave manufacturer's instruction.

### Warnings

- For use by trained dental professionals only for the intended use.
- This device must be used in strict conformity with these INSTRUCTIONS. The manufacturer rejects all liabilities if INSTRUCTIONS are not followed or if the device is used for any other applications.
- The light radiation produced by this type of device can be dangerous and MUST NOT be pointed at the eyes. The light produced by this device must be directed only at the zone to be treated in the oral cavity. Always use protective shields and eyewear during curing light

- operation.
- Do not use the device near a heat source. Do not use solvents, detergents or flammable products to clean or immerse the device in, this may damage the device or cause a short-circuit.
- Prevent any liquid from entering the curing light or the adapter.
- Never modify the device or any of its components. Any modification may compromise its safety and effectiveness.
- The curing light is not field-repairable. Do not disassemble this product. Unqualified repairing or tampering with internal parts may lead to serious injury and will VOID the manufacturer's warranty.
- Check the device before every use. Do not use the device if it is damaged in any way. The continuous use of a damaged device may cause injury or improper results.
- Do not place the device in a position where it is difficult to disconnect from the power supply.
- Charge the device for no less than 2 hours before use if it has not been used for longer than one month.
- US Federal Law restricts this device to sale by or on the order of a health care professional/dentist.

### Symbol instruction

Symbol	Instruction	Symbol	Instruction
	Warning, Caution and Important! Check the Instruction Manual		Consult the accompanying documents
	Date of manufacture		Manufacturer
	According to the type of protection against electric shock: CLASS II EQUIPMENT		According to the degree of protection against electric shock: Type B applied part
	Screw inside/ outside		Used indoor only
	Recovery		Keep dry
	Handle with care		Atmospheric pressure for storage
	Temperature limitation for storage		Humidity limitation for storage
	Appliance compliance WEEE directive, Dispose as required by the law.		CE Mark
	Authorised Representative in the EUROPEAN COMMUNITY		

### Warranty:

Curing light is warranted to the original purchaser against any defective workmanship and materials under accepted installation, use, and service for a period of 24 months from date of purchase.

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