ELC-1024-30K20

Professional COB LED strip 10 W/m, 8 mm wide

The ELC-1024-30K20LED strip of medium power (10 W/m) of high quality is designed for professional use. A very high CRI color rendering index ensures very good reproduction of the colors of the illuminated objects. It is made of high-quality components on a double-sided flexible laminate, which ensures longer life and better protection against mechanical damage. COB LEDs (480 LEDs per meter) ensure even light distribution, no blackouts, discoloration and color artifacts. The tape guarantees a long lifetime and long trouble-free operation even at elevated temperatures.

MAIN ADVANTAGES:

- high luminous efficiency and efficiency
- high durability and lifetime – over 100,000 h@25°C
- very good optical parameters
- CRI above 90
- . color space (Colour Gamut Index) above 100

APPLICATION:

- lighting of advertisements, shop windows, showcases, exhibitions
- edge illumination of transparent plastics
- decorative lighting, mirrors, shelves, furniture
- lighting of interiors, rooms, corridors
- lighting of plants and aquariums

PARAMETER

	VALUE
POWER SUPPLY	
Rated power supply voltage	24 VDC
Power consumption for 1 meter	10 W/m
Power consumption for 1 section	0.5 W
Energy consumption during 1000 hours of operation	10 kWh/meter
Current consumption per meter	0.42 A
Protection class against electrical shock	III
Works with PWM dimmers	Yes
DESIGN FEATURES	
LED type	COB LED
Number of LEDs per meter	480
Cutting section length	50 mm
Adhesive tape type	Thermally conductive
Width	8 mm
Height	1.6 mm
FPC flexible substrate laminate (copper thickness)	0.35 mm, 3 oz
The color of the protective mask for the FPC substrate	White
Beam angle	140°
Ingress protection class	IP 20
For indoor use	Yes
Length of connecting wires	15 cm
ENVIRONMENTAL PARAMETERS	
Operating temperature range	-20 +40°C
Lifetime L80 at 25°C - see table	Over 100,000 h
Declarations and certificates	CE, RoHS
Number of meters per roll	10 m
Packaging	Antistatic bag
Guarantee	5 years
Manufacturer	ESPE

OPTICAL PARAMETERS		PRODUCT LIFETIME AS A FUNCTION OF TEMPERATURE		
CCT range	3000 K	Working temperature	Lumen drop percentage (for the 6000 h test)	Projected lifetime [hours]
The color of the light	Warm white	25℃	L90	over 100,000
Correlated color temperature (CCT)	3000-3200 K		L80	over 100,000
Luminous flux per meter (typical)	850 lm/m		L70	over 100,000
Light output per watt (typical)	78 lm/W		L90	22000
Color Rendering Index CRI (typical)	92-93	40°C	L80	48000
Red Color Reproduction Ratio (R9) (typical)	41		L70	77000
Color space (Colour Gamut Index)	101		L90	7500
CIE1931 chromaticity (x and y) coordinates	x= 0.4293	50°C	L80	16000
CIEISSI Chromaticity (X and y) coordinates	y= 0.4002	0.4002	L70	25000
Energy class	G			

L80 means LED tape operation time until the luminous efficiency drops to 80% of the initial value, i.e. the standard value defined by LM-80-08 and IES TM-21-11

Additional data for technicians:

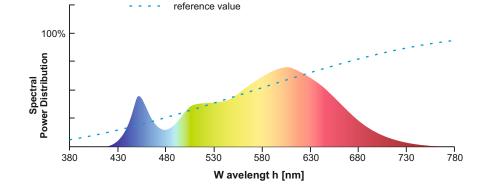
L90 - tape operation time until the lumen drops to 90% of the original value L70 - tape operation time until the lumen drops to 70% of the original value



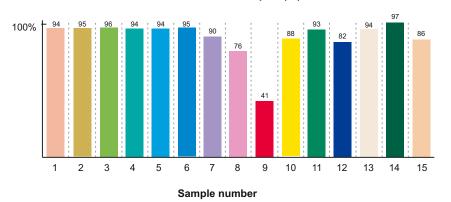


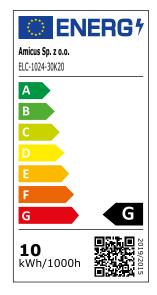
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ENERGY LABEL

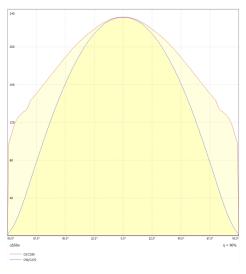


CRI test color samples (Ri)





EMMISION PATTERN



TECHNICAL DRAWING OF LOCATION OF LEDS ON THE TAPE

