

Lighting system that combines "Cloudy Day" and "Dark Field" lighting type.

The DOKL90 is designed to illuminate an object in all the directions producing an uniform illumination highlighting too the object outlines and superficial elevations.

Ideal for shining spherical pieces or in which the reflection is desired to attenuate.



**LIGHTING TECHNIQUE**

Lighting mode: Cloudy day + Dark field  
Light source: 480+240 Leds  
Colour (nm): See table 1  
LED life: 100.000 hours

**ELECTRICAL**

Max. power supply: 24VDC (Continuous models)  
Max. consumption: 2.2A (IL040AA)  
Wire include: Yes  
Wire terminal: Brown -> 24VDC  
Blue -> 0V (GND)

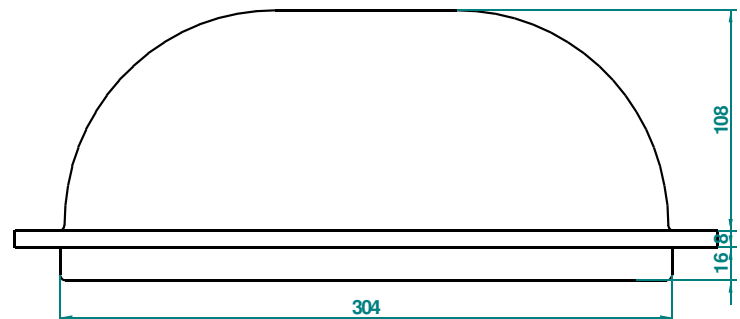
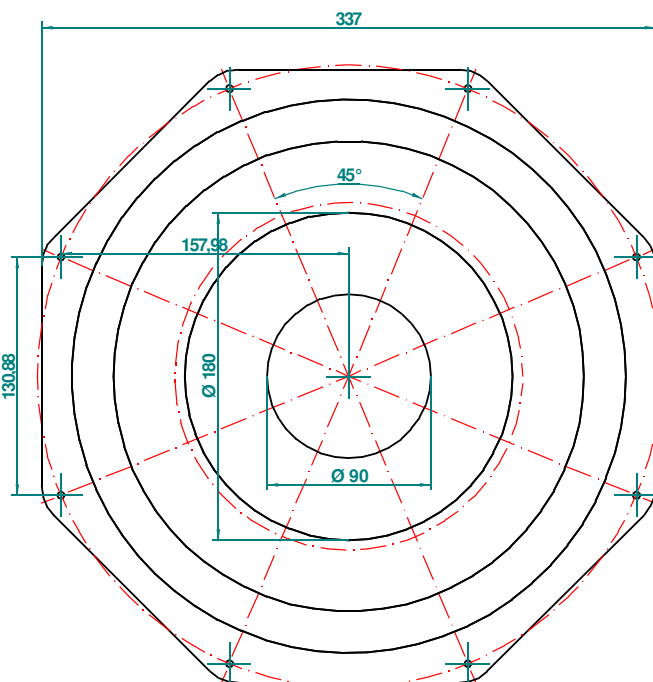
**MECHANICAL**

LxWxH: See external plane  
Mounting: 8(Ø 4)  
Housing material: Black anodized aluminium  
Weight: 1700 grs.

**ENVIRONMENTAL**

Max. Operating Humidity: 95% non-condensing  
Operating temp: 0..40°C  
Storage temp: 0..60°C

**EXTERNAL PLANE**



## MODELS

Table 1.

Ligth colour	Wavelength	Type	Reference
Red	660nm	Continuous	IL040AA
Red	660nm	Strobe	IL040AS
Near infrared	880nm	Continuous	IL040AN
Near infrared	880nm	Strobe	IL040AM
Infrared	940nm	Continuous	IL040AI
Infrared	940nm	Strobe	IL040AJ
White	-----	Continuous	IL040AB
White	-----	Strobe	IL040AC
Others	-----	????	Consult

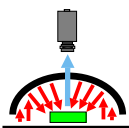
## COMPLEMENTS

Table 2.

Complement	Type	Reference
Strobe controller with 3 outputs	Strobe	IL004BB

## LIGHTING MODES

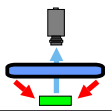
### DIFFUSE SPHERICAL ILLUMINATION (SMOOTH LIGHT)



The object is illuminated from all the directions with diffuse light, eliminating the shades and reflections, smoothing the textures and diminishing the influence of rays, the dust and the reliefs and curvatures that can have the inspected object.

Indicated for the mark sensing of different colors, characters and detection of everything what as much supposes a change of color in smooth surfaces, spherical, rough or with brightness

### DARK FIELD LIGHT



Direct light of high intensity that falls on the object with very little angle with regards to the surface where it lies. In that way cracked or raised surfaces interfere in the trajectory of the light producing bright areas. The most common applications for this technique are those to verify engravings, (laser), or defects on the surface...

### DIFFUSE SPHERICAL AND DARKFIELD LIGHT



The object is illuminated from all the directions with diffuse light and with high intensity light falling on the objet with a very little angle. In this way we attain to eliminate shades and reflections, smoothing the textures and highlighting outlines and surface defects. Indicated for highlight outlines, surface defects, mark sensing of different colors, characters and detection of everything what as much supposes a change of color in smooth surfaces, spherical, rough or with brightness.