Reflex

Design iGuzzini **iGuzzini**

Last information update: October 2024

Product configuration: Q045
Q045: Fixed circular recessed luminaire - Ø 96 mm - warm white - medium optic - UGR<19

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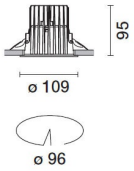
Technical description
Fixed round luminaire designed to use a LED lamp with C.O.B. technology. Version with rim for surface-mounting. Reflector vacuum-metallised with aluminium vapours with an anti-scratch protective layer. Die-cast aluminium body and passive dissipation system. Product complete with LED lamp in warm white colour tone CRI 90 (3000K). General light emission, with controlled luminance UGR<19 1500 cd/m2 α>65° medium optic.

Installation
Recessed using torsion springs which allow easy installation in false ceilings with thickness ranging from 1 mm to 20 mm.

Colour
White / Aluminium (39)

Mounting
ceiling recessed



Wiring
product complete with 1-10V components

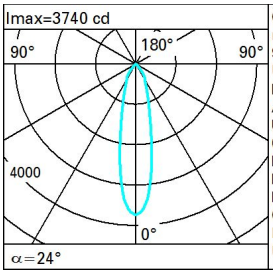
Complies with EN60598-1 and pertinent regulations

IP20 IP54 On the visible part of the product once installed

Technical data

lm system:	1202	CRI (minimum):	90
W system:	14	Colour temperature [K]:	3000
lm source:	1650	MacAdam Step:	2
W source:	12	Life Time LED 1:	> 50,000h - L90 - B10 (Ta 25°C)
Luminous efficiency (lm/W, real value):	85.9	Lamp code:	LED
lm in emergency mode:	-	Number of lamps for optical assembly:	1
Total light flux at or above an angle of 90° [Lm]:	0	ZVEI Code:	LED
Light Output Ratio (L.O.R.) [%]:	73	Number of optical assemblies:	1
Beam angle [°]:	24°	Control:	1-10V

Polar



CIE
nL 0.73
97-100-100-100-73
UGR 16.5-16.5
DIN
A.61
UTE
0.73A+0.00T
F"1=973
F"1+F"2=999
F"1+F"2+F"3=1000
CIBSE
LG3 L<1500 cd/m² at 65°
UGR<19 I L<1500 cd/mq @65°

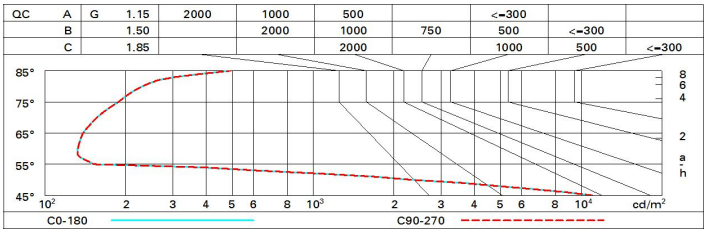
Lux

h	d	Em	Emax
2	0.9	729	935
4	1.7	182	234
6	2.6	81	104
8	3.4	46	58

Utilisation factors

R	77	75	73	71	55	53	33	00	DRR
K0.8	65	61	59	57	61	58	58	56	77
1.0	68	65	62	61	64	62	62	59	81
1.5	72	69	67	66	68	67	66	64	88
2.0	74	72	71	70	71	70	69	67	92
2.5	75	74	73	72	73	72	71	69	95
3.0	76	75	75	74	74	73	73	71	97
4.0	77	76	76	75	75	75	74	72	99
5.0	78	77	77	76	76	76	74	73	100

Luminance curve limit



UGR diagram

Corrected UGR values (at 1650 lm bare lamp luminous flux)

Riflect.: ceil/cav		0.70	0.70	0.50	0.50	0.30	0.70	0.70	0.50	0.50	0.30
walls		0.50	0.30	0.50	0.30	0.30	0.50	0.30	0.50	0.30	0.30
work pl.		0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20
Room dim				viewed crosswise					viewed endwise		
x	y										
2H	2H	17.4	19.0	17.7	19.3	19.6	17.4	19.0	17.7	19.3	19.6
	3H	17.2	18.5	17.6	18.8	19.1	17.2	18.5	17.6	18.8	19.1
	4H	17.1	18.3	17.5	18.6	19.0	17.1	18.3	17.5	18.6	19.0
	6H	17.0	18.2	17.4	18.5	18.9	17.0	18.2	17.4	18.5	18.9
	8H	17.0	18.1	17.4	18.5	18.8	17.0	18.1	17.4	18.5	18.8
	12H	16.9	18.0	17.3	18.4	18.8	16.9	18.0	17.3	18.4	18.8
4H	2H	17.1	18.3	17.5	18.6	19.0	17.1	18.3	17.5	18.6	19.0
	3H	16.9	18.0	17.3	18.4	18.8	16.9	18.0	17.3	18.4	18.8
	4H	16.8	17.9	17.3	18.3	18.7	16.8	17.9	17.3	18.3	18.7
	6H	16.6	17.9	17.1	18.3	18.8	16.6	17.9	17.1	18.3	18.8
	8H	16.5	17.9	17.0	18.4	18.8	16.5	17.9	17.0	18.4	18.8
	12H	16.4	17.9	16.9	18.4	18.9	16.4	17.9	16.9	18.4	18.9
8H	4H	16.5	17.9	17.0	18.4	18.8	16.5	17.9	17.0	18.4	18.8
	6H	16.3	17.8	16.8	18.3	18.8	16.3	17.8	16.8	18.3	18.8
	8H	16.3	17.6	16.8	18.1	18.6	16.3	17.6	16.8	18.1	18.6
	12H	16.4	17.3	16.9	17.8	18.4	16.4	17.3	16.9	17.8	18.4
12H	4H	16.4	17.9	16.9	18.4	18.9	16.4	17.9	16.9	18.4	18.9
	6H	16.3	17.6	16.8	18.1	18.6	16.3	17.6	16.8	18.1	18.6
	8H	16.4	17.3	16.9	17.8	18.4	16.4	17.3	16.9	17.8	18.4

Variations with the observer position at spacing:

S =			
	1.0H	4.4 / -22.6	4.4 / -22.6
	1.5H	7.2 / -22.8	7.2 / -22.8
	2.0H	9.2 / -23.1	9.2 / -23.1