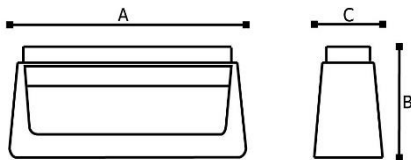


Luminaria para exterior



Dimensiones (mm)

A: 248; **B:** 115
C: 70.



Código

GL16104

Descripción

Luminaria tipo aplique, diseñada con módulo de LED integrado. Para sobreponer en pared o muro, con difusor en policarbonato opal, con protección UV.



Materiales y acabado

Cuerpo en aluminio inyectado con acabado en pintura poliéster electrostática texturizada de alta calidad. Sujetador en plástico inyectado.

Color

Negro.

Características técnicas

LED			IP 65	IK 08
PF 0,99	THD <10%	°C 0-55	V 100-240	Hz 50/60

Fuente de luz

12 diodos de LED.

Potencia Nominal	CRI	K	Lm / W	Lm de Salida
------------------	-----	---	--------	--------------

13W	>80	3000	46	605
-----	-----	------	----	-----

Características de fuente de luz

- Color temperatura disponible 3000K (cálido).
- Marca LED: OSRAM. Marca Driver: ESPL.
- Potencia de Salida: 13,2W.

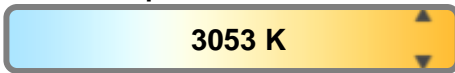
Light efficiency:



Light quality:



Color temperature:



Output: 605 lm

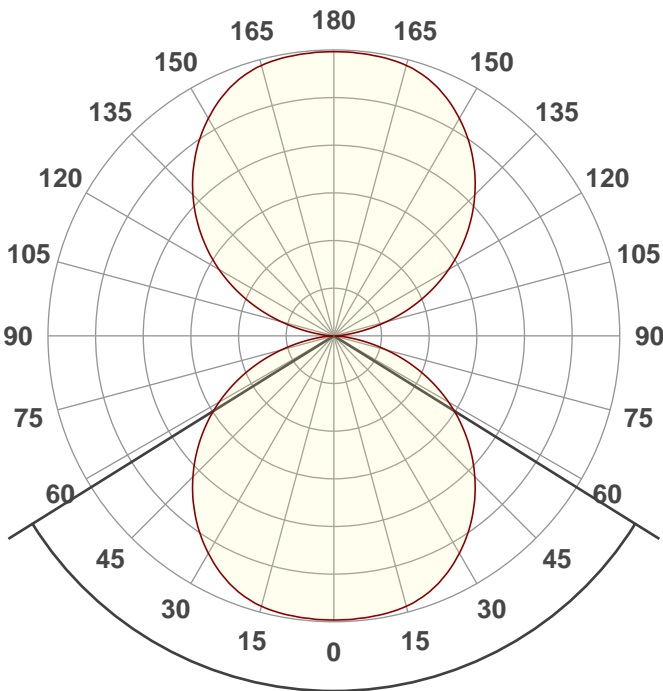
Peak: 102 cd

Power: 13,2 W

PF: 0,99



Product name:
E0090-GL16104



Beam angle **116,1°**



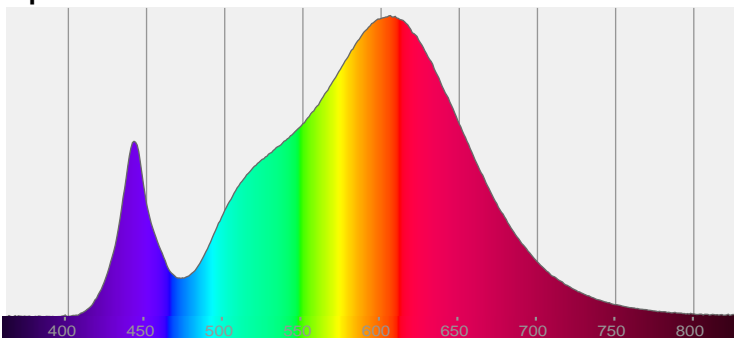
CIE 1931
x: 0,433
y: 0,402

THD Values:

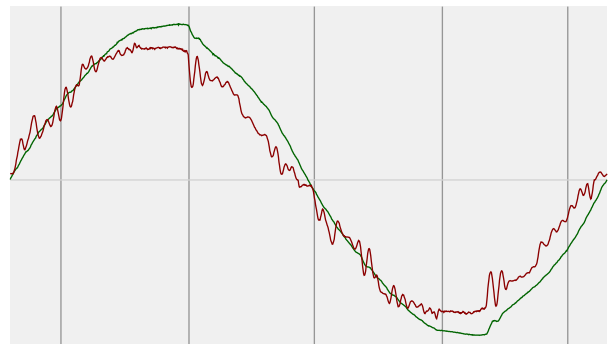
Voltage: 2,64%

Current: 6,28%

Spectra

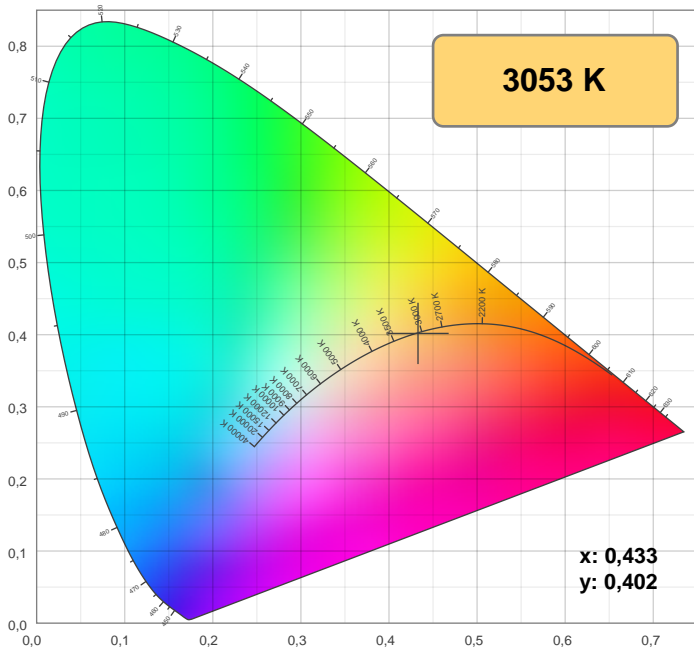


Power



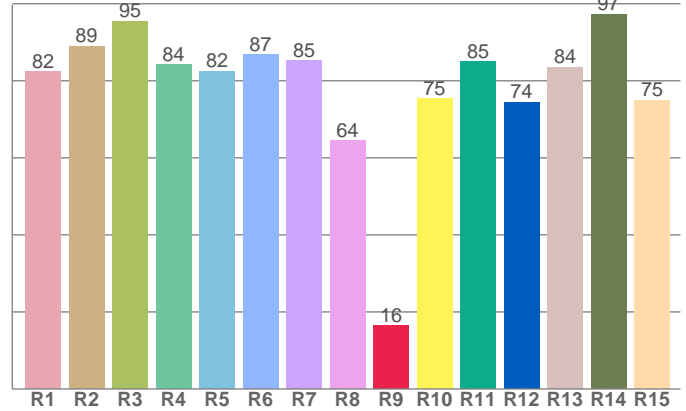
Voltage: 114 V
Current: 0,117 A
Frequency: 59,9 Hz

Color details



CIE 1931

CRI: 83,8 (R1-R8)

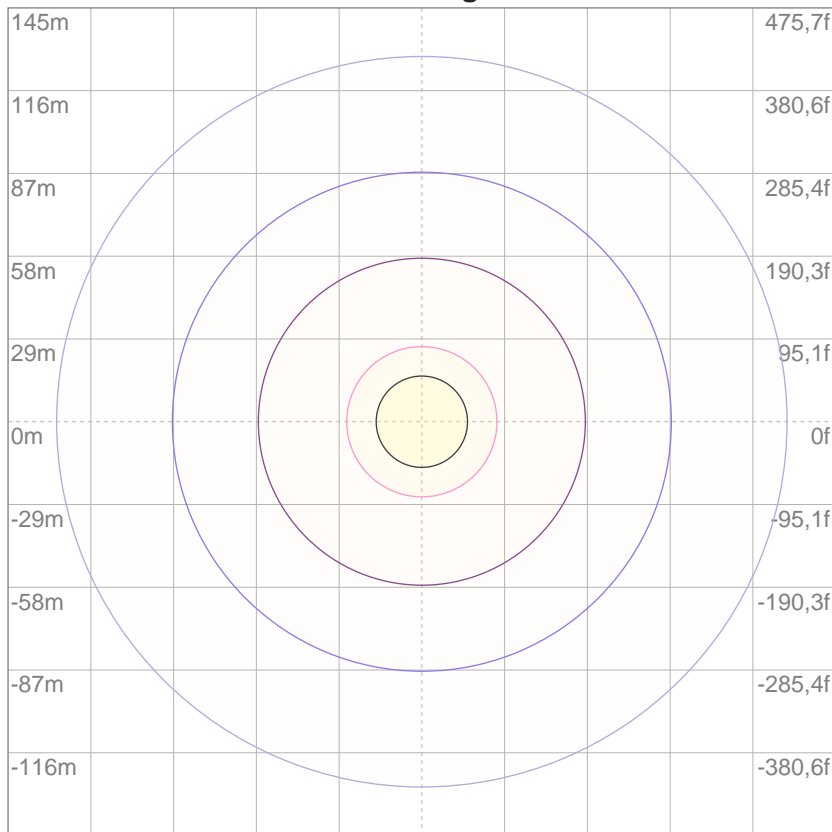


CRI R values, only R1-R8 are used to calculate final CRI value

R	R1	R2	R3	R4	R5	R6	R7	R8	9	R10	R11	R12	R13	R14	R15
Value	82,3	89,0	95,5	84,2	82,5	86,8	85,2	64,5	16,4	75,4	84,9	74,4	83,5	97,2	75,0

ISO Diagrams

ISO lux diagram



Mounting height: 10 meters (33 f)

3%	30,5m lx
5%	50,9m lx
10%	0,102 lx
30%	0,305 lx
50%	0,509 lx

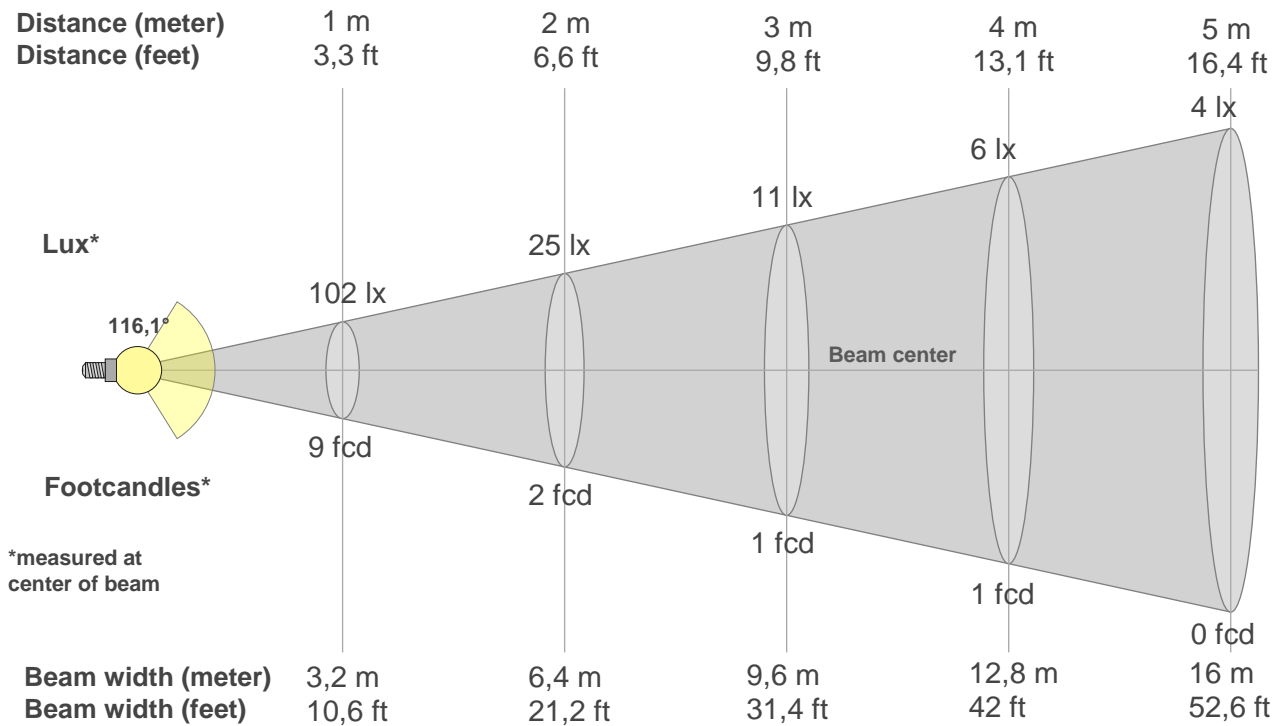
Conditions:

Number of c-planes: 2

Lux at center: 1,02 lx

Lux distribution on a surface when lamp is mounted at 10 meters from the surface.

Beam details



*measured at center of beam

Beam intensities from 1-20m

1m	2m	3m	4m	5m	6m	7m	8m	9m	10m	11m	12m	13m	14m	15m	16m	17m	18m	19m	20m
3,3ft	6,6ft	9,8ft	13,1ft	16,4ft	19,7ft	23ft	26,2ft	29,5ft	32,8ft	36,1ft	39,4ft	42,7ft	45,9ft	49,2ft	52,5ft	55,8ft	59,1ft	62,3ft	65,6ft
102lx	25lx	11lx	6lx	4lx	3lx	2lx	2lx	1lx	1lx	1lx	1lx	1lx	1lx	0lx	0lx	0lx	0lx	0lx	0lx
9,5fcd	2,4fcd	1,1fcd	0,6fcd	0,4fcd	0,3fcd	0,2fcd	0,1fcd	0,1fcd	0,1fcd	0,1fcd	0,1fcd	0,1fcd	0fcd	0fcd	0fcd	0fcd	0fcd	0fcd	0fcd

Intensities in 0° c-plane

0°	9°	18°	27°	36°	45°	54°	63°	72°	81°	90°	99°	108°	117°	126°	135°	144°	153°	162°	171°
102	101	99	93	83	71	58	42	25	9	0	9	25	42	58	71	83	93	99	101
100%	100%	97%	91%	82%	70%	57%	41%	25%	9%	0%	9%	25%	41%	57%	70%	82%	91%	97%	100%

Intensities in 90° c-plane

0°	9°	18°	27°	36°	45°	54°	63°	72°	81°	90°	99°	108°	117°	126°	135°	144°	153°	162°	171°
102	101	99	93	83	71	58	42	25	9	0	9	25	42	58	71	83	93	99	101
100%	100%	97%	91%	82%	70%	57%	41%	25%	9%	0%	9%	25%	41%	57%	70%	82%	91%	97%	100%

Intensities in 180° c-plane

0°	9°	18°	27°	36°	45°	54°	63°	72°	81°	90°	99°	108°	117°	126°	135°	144°	153°	162°	171°
102	101	99	93	83	71	58	42	25	9	0	9	25	42	58	71	83	93	99	101
100%	100%	97%	91%	82%	70%	57%	41%	25%	9%	0%	9%	25%	41%	57%	70%	82%	91%	97%	100%

Intensities in 270° c-plane

0°	9°	18°	27°	36°	45°	54°	63°	72°	81°	90°	99°	108°	117°	126°	135°	144°	153°	162°	171°
102	101	99	93	83	71	58	42	25	9	0	9	25	42	58	71	83	93	99	101
100%	100%	97%	91%	82%	70%	57%	41%	25%	9%	0%	9%	25%	41%	57%	70%	82%	91%	97%	100%

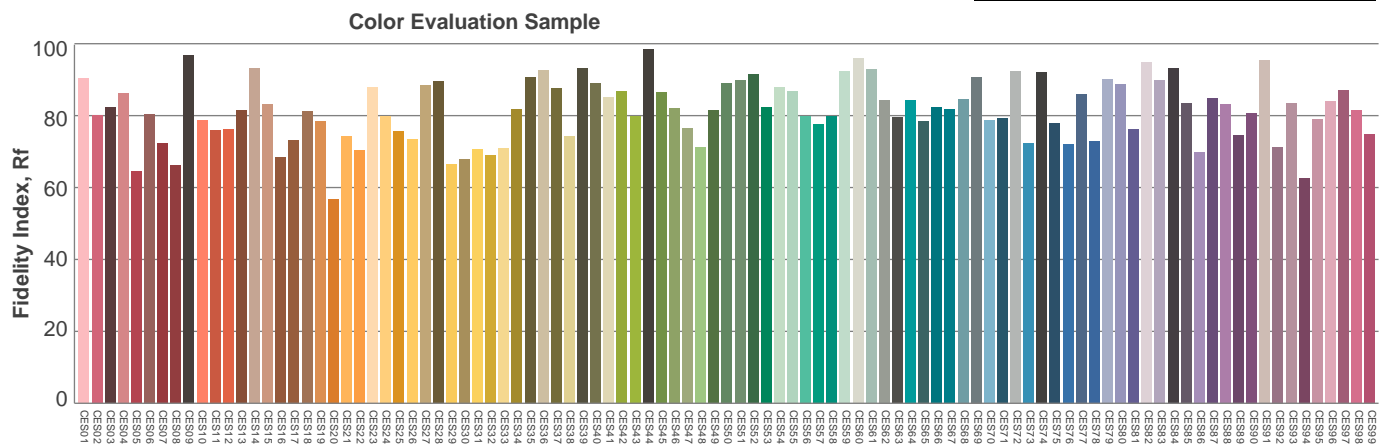
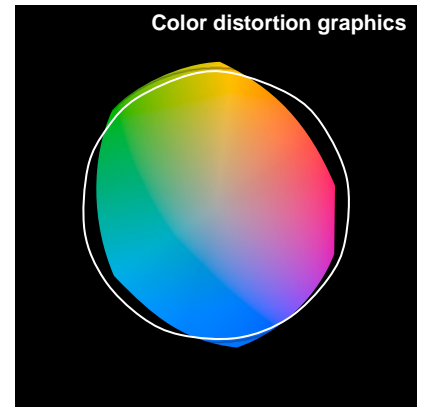
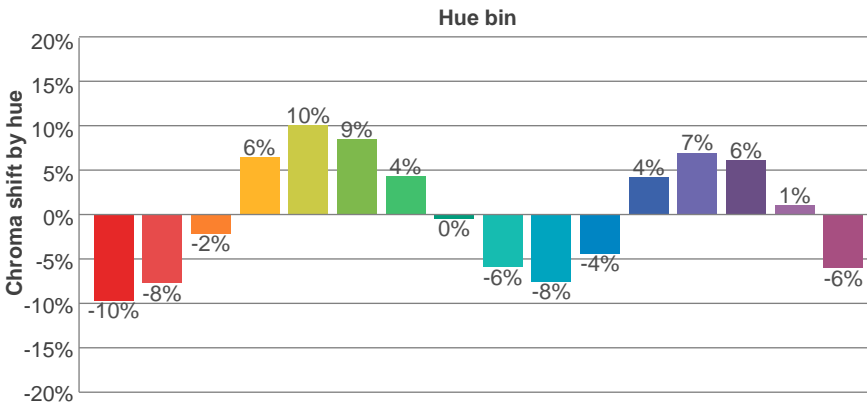
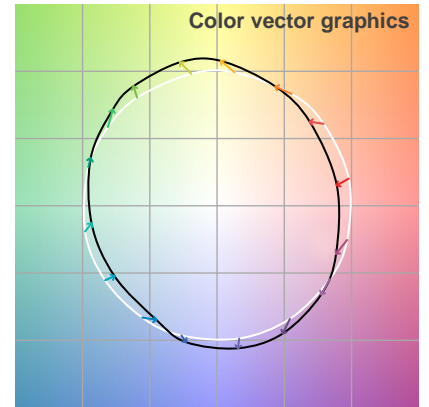
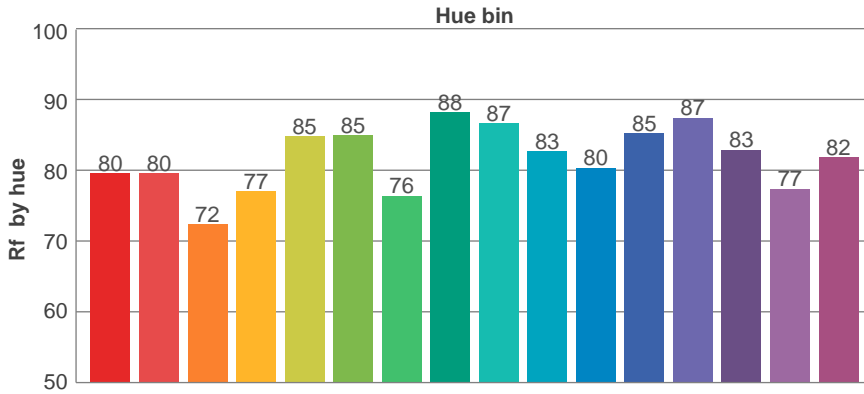
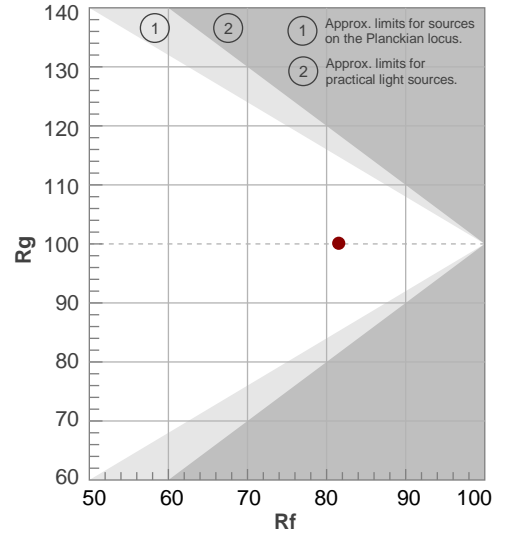
Beam angle 50%	Field angle 10%	Cutoff angle 2,5%	Intensity ratio in 120° cone	Intensity ratio in 90° cone
116,1°	360°	360°	39,6%	26,8%

TM30 details

Rf 81,5
Fidelity index Rf

Rg 100,1
Gammut index Rg

Hue Bin	R _f	Graphic shifts (%)	
		Chroma	Hue
1	80	-10%	-3%
2	80	-8%	7%
3	72	-2%	13%
4	77	6%	12%
5	85	10%	7%
6	85	9%	-2%
7	76	4%	-13%
8	88	0%	-7%
9	87	-6%	-5%
10	83	-8%	1%
11	80	-4%	10%
12	85	4%	4%
13	87	7%	-2%
14	83	6%	-10%
15	77	1%	-13%
16	82	-6%	-12%



UGR

Glare Evaluation According to UGR

p Ceiling	70	70	50	50	30	70	70	50	50	30	
p Walls	50	30	50	30	30	50	30	50	30	30	
p Floor	20	20	20	20	20	20	20	20	20	20	
Room size X Y	Viewing direction at right angles to lamp axis					Viewing direction parallel to lamp axis					
2H	2H	18,8	19,6	19,7	20,5	21,6	18,8	19,6	19,7	20,5	21,6
	3H	20,2	21,0	21,1	21,9	23,0	20,2	21,0	21,1	21,9	23,0
	4H	20,7	21,4	21,7	22,3	23,5	20,7	21,4	21,7	22,3	23,5
	6H	21,0	21,6	22,0	22,6	23,8	21,0	21,6	22,0	22,6	23,8
	8H	21,1	21,7	22,0	22,6	23,8	21,1	21,7	22,0	22,6	23,8
	12H	21,1	21,6	22,0	22,6	23,8	21,1	21,6	22,0	22,6	23,8
4H	2H	19,3	20,0	20,2	20,9	22,1	19,3	20,0	20,2	20,9	22,1
	3H	20,9	21,5	21,9	22,4	23,6	20,9	21,5	21,9	22,4	23,6
	4H	21,5	22,0	22,5	23,0	24,2	21,5	22,0	22,5	23,0	24,2
	6H	21,9	22,3	22,9	23,3	24,6	21,9	22,3	22,9	23,3	24,6
	8H	22,0	22,3	23,0	23,3	24,6	22,0	22,3	23,0	23,3	24,6
	12H	22,0	22,3	23,0	23,3	24,6	22,0	22,3	23,0	23,3	24,6
8H	4H	21,7	22,0	22,7	23,0	24,3	21,7	22,0	22,7	23,0	24,3
	6H	22,1	22,4	23,2	23,5	24,8	22,1	22,4	23,2	23,5	24,8
	8H	22,3	22,5	23,3	23,6	24,9	22,3	22,5	23,3	23,6	24,9
	12H	22,3	22,5	23,3	23,6	24,9	22,3	22,5	23,3	23,6	24,9
12H	4H	21,6	22,0	22,6	23,0	24,3	21,6	22,0	22,6	23,0	24,3
	6H	22,1	22,4	23,2	23,4	24,8	22,1	22,4	23,2	23,4	24,8
	8H	22,3	22,5	23,3	23,5	24,9	22,3	22,5	23,3	23,5	24,9
Variation of the observer position for the luminaire distance S											
S = 1,0H	+0,1 / -0,1					+0,1 / -0,1					
S = 1,5H	+0,2 / -0,4					+0,2 / -0,4					
S = 2,0H	+0,4 / -0,7					+0,4 / -0,7					
Standard table	BK05					BK05					
Correction summand	6,4					6,4					
Corrected glare indices referring to 605 lm total luminous flux											

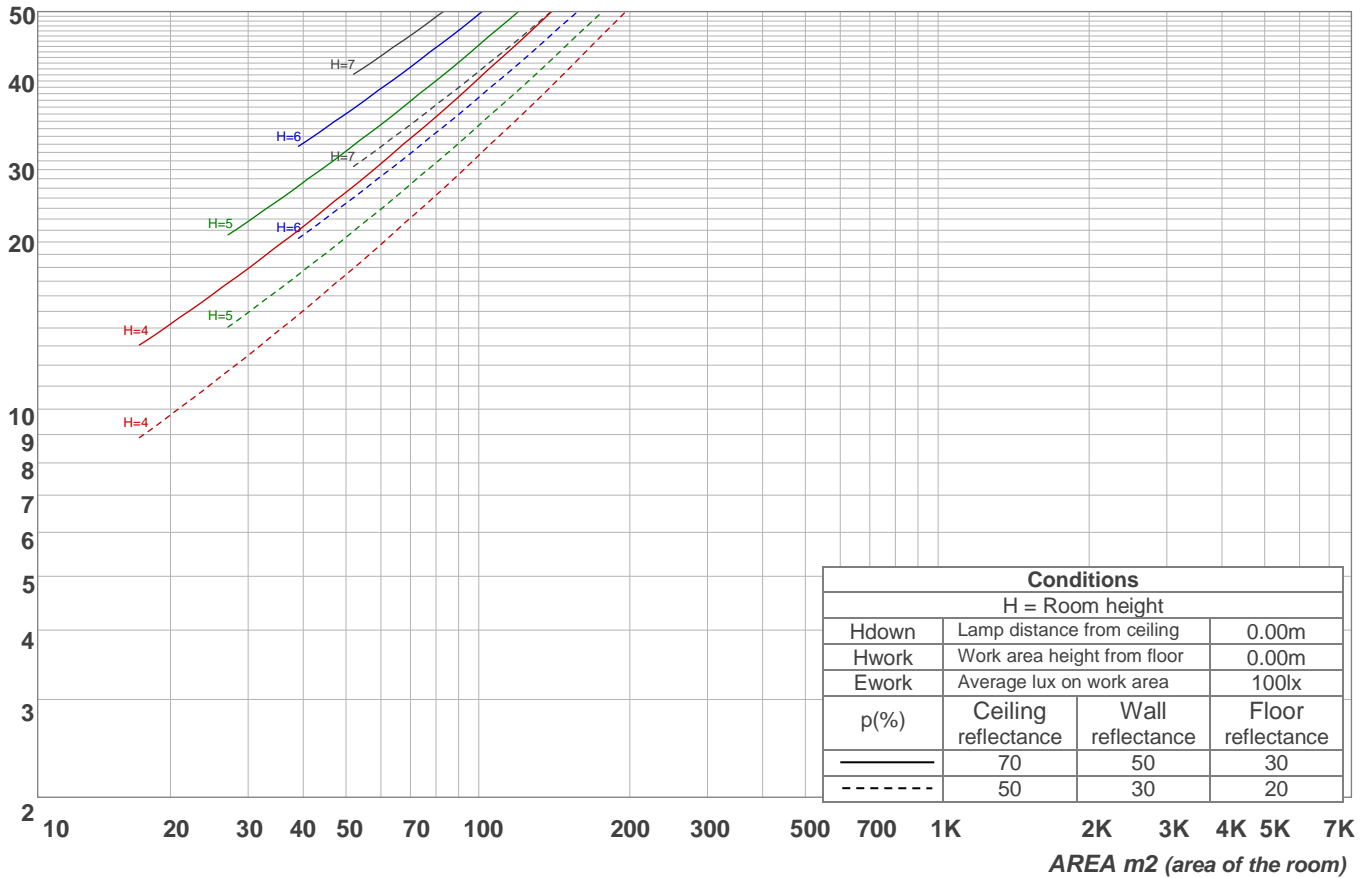
Light planning

Coefficients of Utilization

Ceiling reflectance	80				70				50			30			10			0	
	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0	
Wall reflectance	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0	
Floor reflectance	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	20	0
RCR	(RCR: Room Cavity Ratio) Room Values are expressed as percentage of Lumens delivered to the task surface																		
0	107	107	107	107	99	99	99	99	83	83	83	69	69	69	56	56	56	50	
1	98	93	89	86	90	86	83	80	73	71	68	61	59	57	49	48	47	42	
2	89	81	75	70	82	75	70	65	64	60	56	53	50	48	43	41	40	35	
3	81	71	64	58	74	66	60	54	56	51	47	47	43	40	38	36	33	29	
4	74	63	55	49	68	58	51	46	50	44	40	42	37	34	34	31	29	25	
5	68	56	48	42	62	52	45	39	44	39	34	37	33	29	31	27	25	22	
6	62	50	42	36	57	47	39	34	40	34	30	34	29	26	28	24	22	19	
7	58	45	37	31	53	42	35	30	36	30	26	30	26	23	25	22	19	17	
8	53	41	33	28	49	38	31	26	33	27	23	28	23	20	23	20	17	15	
9	50	37	30	25	46	35	28	23	30	24	21	25	21	18	21	18	15	13	
10	46	34	27	22	43	32	25	21	28	22	19	24	19	16	20	16	14	12	

LAMPS (number of lamps)

Luminaire budgetary diagram

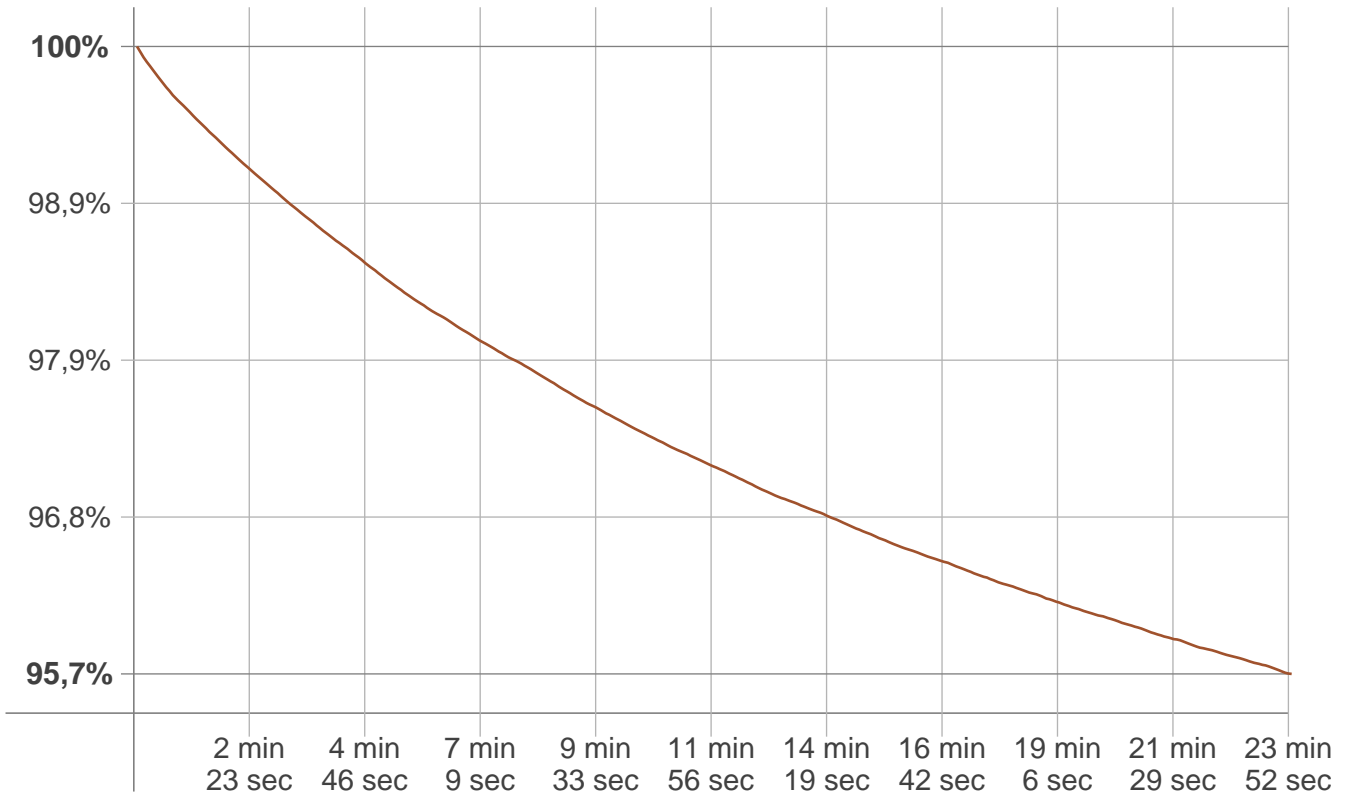


Zonal Lumen Summary

0°-10°	10°-20°	20°-30°	30°-40°	40°-50°	50°-60°	60°-70°	70°-80°	80°-90°
9,69 lm	28,3 lm	43,6 lm	52,8 lm	55,0 lm	50,0 lm	37,9 lm	20,6 lm	4,50 lm
90°-100°	100°-110°	110°-120°	120°-130°	130°-140°	140°-150°	150°-160°	160°-170°	170°-180°
4,51 lm	20,6 lm	38,0 lm	50,0 lm	55,1 lm	52,8 lm	43,6 lm	28,3 lm	9,69 lm

Stabilization

Warmup curve



Warmup result

Warmup time:	23 min 56 sec
Warmup variation	-4,3%

Warmup conditions

Stable period:	15 min
Stable change max:	2,0%
Minimum time:	15 min

Color temperature change

CCT start	CCT change	CCT end
3045 K	+8 K	3053 K

Output change

Output start	Output change	Output end
631 lm	-26 lm	605 lm