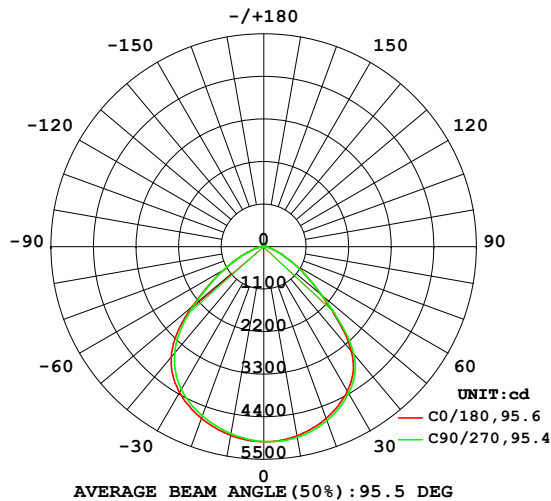


LUMINAIRE PHOTOMETRIC TEST REPORT

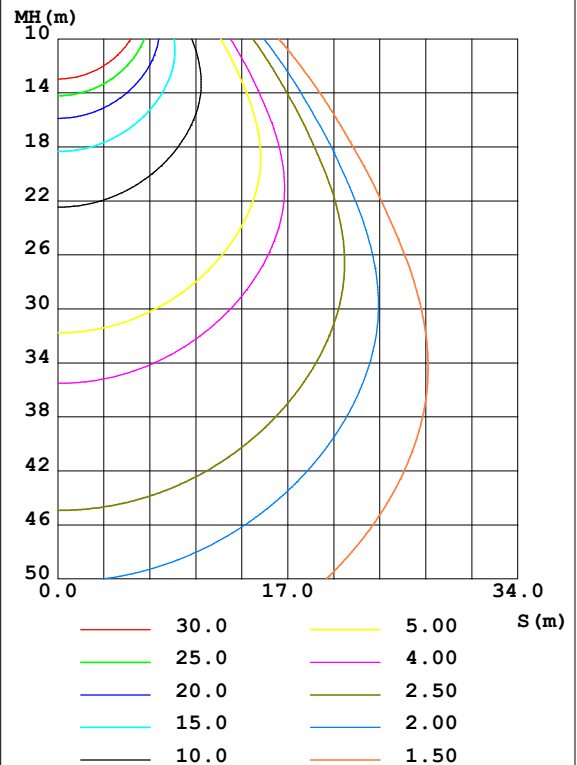
Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA Eff: 192.52 lm/W			
MODEL		I _{max} (cd)	5048	S/MH (C0/180)	1.28
NOMINAL POWER(W)	60	LOR(%)	100.0	S/MH (C90/270)	1.26
RATED VOLTAGE(V)	220	TOTAL FLUX(lm)	11366	η UP,DN(C0-180)	1.2,47.2
NOMINAL FLUX(lm)	11366.2	CIE CLASS	DIRECT	η UP,DN(C180-360)	1.1,50.5
LAMPS INSIDE	1	η up (%)	2.3	CIBSE SHR NOM	1.25
TEST VOLTAGE(V)	220	η down (%)	97.7	CIBSE SHR MAX	1.35

LUMINOUS INTENSITY DISTRIBUTION DIAGRAM



C0 PLANE ISOLUX DIAGRAM (UNIT:lx)



C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: DAMIN
Test Date: 2024-11-12

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System: EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity: 65.0%
Test Distance: 9.250m [K=1.0000]
Remarks:

ZONAL FLUX DIAGRAM

ZONAL FLUX DIAGRAM:

γ	C0	C90	C180	C270					γ	Φ zone	Φ total	%lum,lamp
10	4965	5004	4954	4909					0- 10	477.3	477.3	4.2,4.2
20	4723	4785	4723	4654					10- 20	1371	1849	16.3,16.3
30	4322	4385	4357	4264					20- 30	2097	3945	34.7,34.7
40	3525	3620	3726	3590					30- 40	2517	6462	56.9,56.9
50	1953	1985	2428	2358					40- 50	2252	8714	76.7,76.7
60	923.5	919.2	1192	1174					50- 60	1398	10113	89,89
70	351.0	339.5	458.9	460.5					60- 70	680.0	10793	95,95
80	90.43	86.71	137.4	141.0					70- 80	253.9	11047	97.2,97.2
90	34.68	34.82	21.14	21.24					80- 90	57.45	11104	97.7,97.7
100	31.31	31.33	24.00	24.17					90-100	29.85	11134	98,98
110	33.10	33.10	29.65	29.98					100-110	31.01	11165	98.2,98.2
120	38.18	38.13	36.89	37.43					110-120	34.10	11199	98.5,98.5
130	45.04	44.89	45.25	46.04					120-130	37.06	11236	98.9,98.9
140	52.60	52.24	53.88	54.48					130-140	38.12	11274	99.2,99.2
150	59.91	59.35	61.37	61.63					140-150	35.70	11310	99.5,99.5
160	66.48	66.02	68.23	68.23					150-160	29.53	11339	99.8,99.8
170	71.65	71.31	73.29	73.00					160-170	19.76	11359	99.9,99.9
180	74.90	74.61	75.02	74.51					170-180	7.004	11366	100,100
DEG	LUMINOUS INTENSITY:cd									UNIT:lm		

Conical surface Flux(90deg): 7682.5 lm

%lum = 67.6%

%lamp = 67.6%

Conical surface Flux(120deg): 10113 lm

%lum = 89.0%

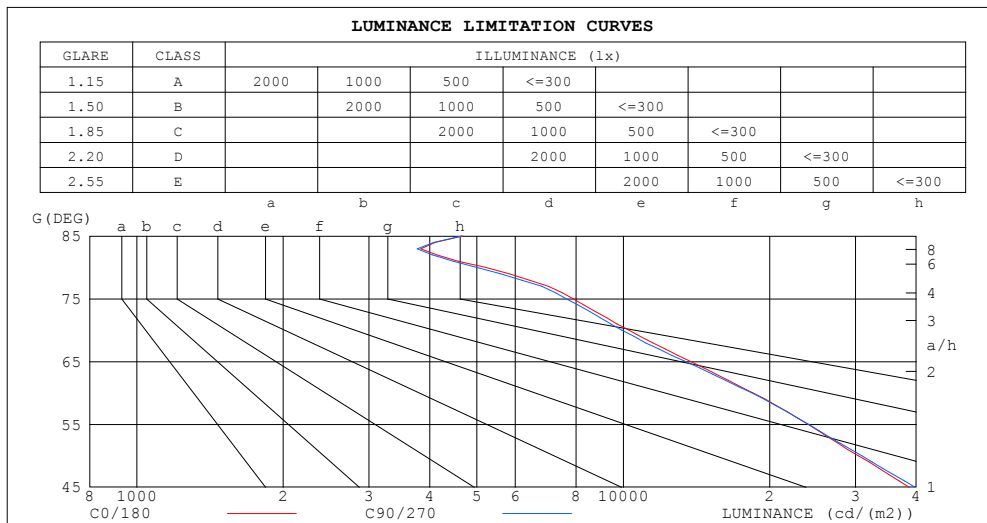
%lamp = 89.0%

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity:65.0%
Test Distance:9.250m [K=1.0000]
Remarks:

LUMINANCE LIMITATION CURVES

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:



LUMINANCE cd/(m2)		
G (DEG)	C0/180	C90/270
85	4675	4660
80	5207	4994
75	7888	7633
70	10263	9926
65	13759	13432
60	18470	18385
55	23960	24009
50	30376	30876
45	38698	39805

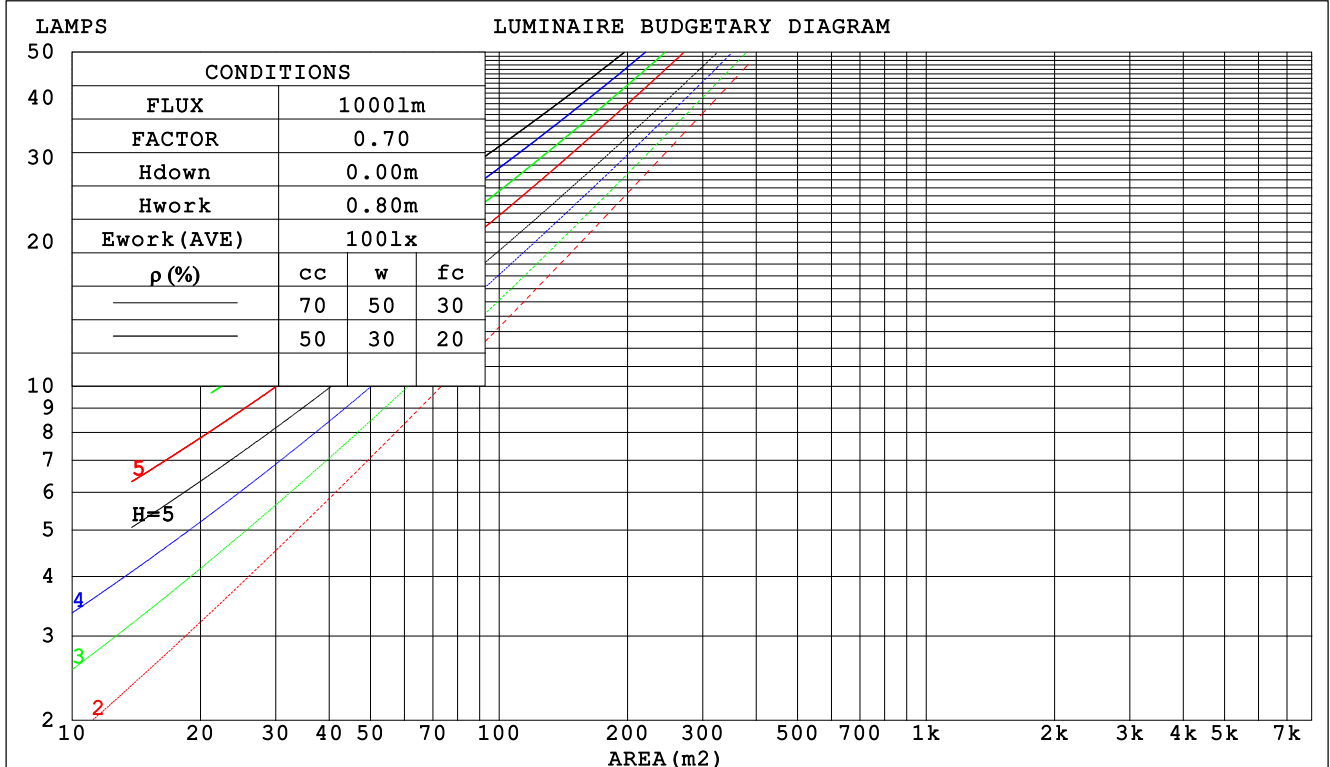
C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: DAMIN
Test Date: 2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity: 65.0%
Test Distance: 9.250m [K=1.0000]
Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:

ρ_{cc}	80%			70%			50%			30%			10%			0
ρ_w	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρ_{fc}	20%			20%			20%			20%			20%			0
RCR	Coefficients of Utilization(CU)															
RCR:Room Cavity Ratio																
0.0	1.18	1.18	1.18	1.15	1.15	1.15	1.10	1.10	1.10	1.05	1.05	1.05	.00	.00	.00	.98
1.0	1.06	1.03	.00	1.04	1.01	.98	.99	.97	.95	.95	.93	.91	.91	.90	.88	.86
2.0	.95	.89	.85	.93	.88	.83	.89	.85	.81	.86	.82	.79	.82	.80	.77	.75
3.0	.85	.78	.73	.83	.77	.72	.80	.75	.70	.77	.73	.69	.75	.71	.67	.65
4.0	.76	.69	.63	.75	.68	.62	.72	.66	.61	.70	.65	.60	.68	.63	.59	.57
5.0	.69	.61	.55	.68	.60	.55	.66	.59	.54	.63	.58	.53	.62	.57	.53	.51
6.0	.63	.55	.49	.62	.54	.49	.60	.53	.48	.58	.52	.47	.56	.51	.47	.45
7.0	.57	.49	.44	.56	.49	.43	.55	.48	.43	.53	.47	.43	.52	.46	.42	.40
8.0	.52	.45	.39	.52	.44	.39	.50	.44	.39	.49	.43	.38	.48	.42	.38	.36
9.0	.48	.41	.36	.48	.40	.35	.46	.40	.35	.45	.39	.35	.44	.39	.35	.33
10.0	.45	.37	.32	.44	.37	.32	.43	.37	.32	.42	.36	.32	.41	.36	.32	.30



C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 γ Test System:EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity:65.0%
Test Distance:9.250m [K=1.0000]
Remarks:

WEC AND CCEC

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm					
NAME:		TYPE:		WEIGHT:	
SPEC.:		DIM.:		SERIAL No.:	
MFR.: EVERFINE		SUR.:		Shielding Angle:	

pcc	80%			70%			50%			30%			10%			0	
pw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0	
pfc	20%			20%			20%			20%			20%			0	
RCR	RCR:Room Cavity Ratio						Wall Exitance Coefficients(WEC)										
0.0																	
1.0	.250	.142	.045	.242	.138	.044	.228	.131	.042	.215	.124	.040	.203	.118	.038		
2.0	.242	.133	.041	.236	.130	.040	.223	.124	.039	.212	.119	.037	.201	.114	.036		
3.0	.230	.122	.037	.224	.120	.036	.213	.115	.035	.203	.111	.034	.193	.107	.033		
4.0	.216	.113	.033	.211	.111	.033	.202	.107	.032	.192	.103	.031	.184	.100	.030		
5.0	.204	.104	.030	.199	.102	.030	.190	.099	.029	.182	.096	.029	.175	.093	.028		
6.0	.192	.096	.027	.187	.095	.027	.180	.092	.027	.172	.090	.026	.166	.087	.026		
7.0	.180	.089	.025	.177	.088	.025	.170	.086	.025	.163	.084	.024	.157	.082	.024		
8.0	.170	.083	.023	.167	.082	.023	.161	.080	.023	.155	.078	.023	.149	.077	.022		
9.0	.161	.078	.022	.158	.077	.022	.152	.075	.021	.147	.074	.021	.142	.072	.021		
10.0	.152	.073	.020	.150	.072	.020	.145	.071	.020	.140	.069	.020	.135	.068	.019		

pcc	80%			70%			50%			30%			10%			0
pw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
pfc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Ceiling Cavity Exitance Coefficients(CCEC)									
0.0	.208	.208	.208	.178	.178	.178	.121	.121	.121	.070	.070	.070	.022	.022	.022	
1.0	.194	.174	.157	.166	.150	.135	.113	.103	.093	.065	.060	.054	.021	.019	.018	
2.0	.183	.150	.122	.157	.129	.105	.108	.089	.073	.062	.052	.043	.020	.017	.014	
3.0	.175	.132	.098	.150	.114	.085	.103	.079	.060	.059	.046	.035	.019	.015	.011	
4.0	.167	.118	.081	.143	.102	.071	.098	.071	.050	.057	.042	.029	.018	.014	.010	
5.0	.160	.108	.069	.137	.093	.060	.094	.065	.043	.055	.038	.025	.018	.012	.008	
6.0	.153	.099	.060	.131	.086	.053	.091	.060	.037	.053	.035	.022	.017	.012	.007	
7.0	.147	.092	.054	.126	.080	.047	.087	.056	.033	.051	.033	.020	.016	.011	.007	
8.0	.141	.086	.049	.121	.075	.043	.084	.053	.030	.049	.031	.018	.016	.010	.006	
9.0	.135	.081	.045	.117	.071	.039	.081	.050	.028	.047	.029	.017	.015	.010	.006	
10.0	.130	.077	.042	.112	.067	.037	.078	.047	.026	.045	.028	.016	.015	.009	.005	

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:DAMIN
 Test Date:2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.00.411
 Humidity:65.0%
 Test Distance:9.250m [K=1.0000]
 Remarks:

UGR(Unified Glare Rating) Table

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm										
NAME:					TYPE:			WEIGHT:		
SPEC.:					DIM.:			SERIAL No.:		
MFR.: EVERFINE					SUR.:			Shielding Angle:		
ceiling/cavity	0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
walls	0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Room dimensions	Viewed crosswise					Viewed endwise				
x = 2H y = 2H	14.7	16.0	15.0	16.2	16.5	14.7	16.0	15.0	16.3	16.5
3H	15.0	16.2	15.3	16.4	16.7	15.0	16.2	15.3	16.4	16.7
4H	15.0	16.2	15.4	16.4	16.7	15.0	16.2	15.4	16.4	16.7
6H	15.0	16.1	15.4	16.4	16.7	15.0	16.1	15.4	16.4	16.7
8H	15.0	16.0	15.3	16.3	16.6	15.0	16.0	15.3	16.3	16.6
12H	14.9	15.9	15.3	16.2	16.6	14.9	15.9	15.3	16.2	16.6
4H 2H	14.8	15.9	15.1	16.2	16.5	14.8	16.0	15.2	16.2	16.5
3H	15.2	16.1	15.5	16.5	16.8	15.2	16.2	15.5	16.5	16.8
4H	15.3	16.2	15.7	16.5	16.9	15.3	16.2	15.7	16.5	16.9
6H	15.3	16.1	15.7	16.5	16.9	15.3	16.1	15.7	16.5	16.9
8H	15.3	16.0	15.7	16.4	16.8	15.3	16.0	15.7	16.4	16.8
12H	15.3	15.9	15.7	16.3	16.8	15.3	15.9	15.7	16.3	16.8
8H 4H	15.2	16.0	15.7	16.4	16.8	15.2	16.0	15.7	16.4	16.8
6H	15.3	15.9	15.8	16.3	16.8	15.3	15.9	15.8	16.3	16.8
8H	15.3	15.8	15.8	16.3	16.8	15.3	15.8	15.8	16.3	16.8
12H	15.3	15.8	15.8	16.2	16.8	15.3	15.7	15.8	16.2	16.7
12H 4H	15.2	15.9	15.7	16.3	16.7	15.2	15.9	15.7	16.3	16.7
6H	15.3	15.8	15.8	16.3	16.8	15.3	15.8	15.8	16.3	16.8
8H	15.3	15.7	15.8	16.2	16.7	15.3	15.7	15.8	16.2	16.7
Variations with the observer position at spacings:										
S = 1.0H	+ 1.0 / - 1.2					+ 1.0 / - 1.2				
1.5H	+ 0.6 / - 0.6					+ 0.6 / - 0.7				
2.0H	+ 1.9 / - 1.9					+ 2.0 / - 1.9				

CIE Pub.117, 11366 lm Total Lamp Luminous Flux Correct ($8\log(F/F_0) = 8.4$)
Area: 0.1 m²

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity:65.0%
Test Distance:9.250m [K=1.0000]
Remarks:

UTILIZATION FACTORS TABLE

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:

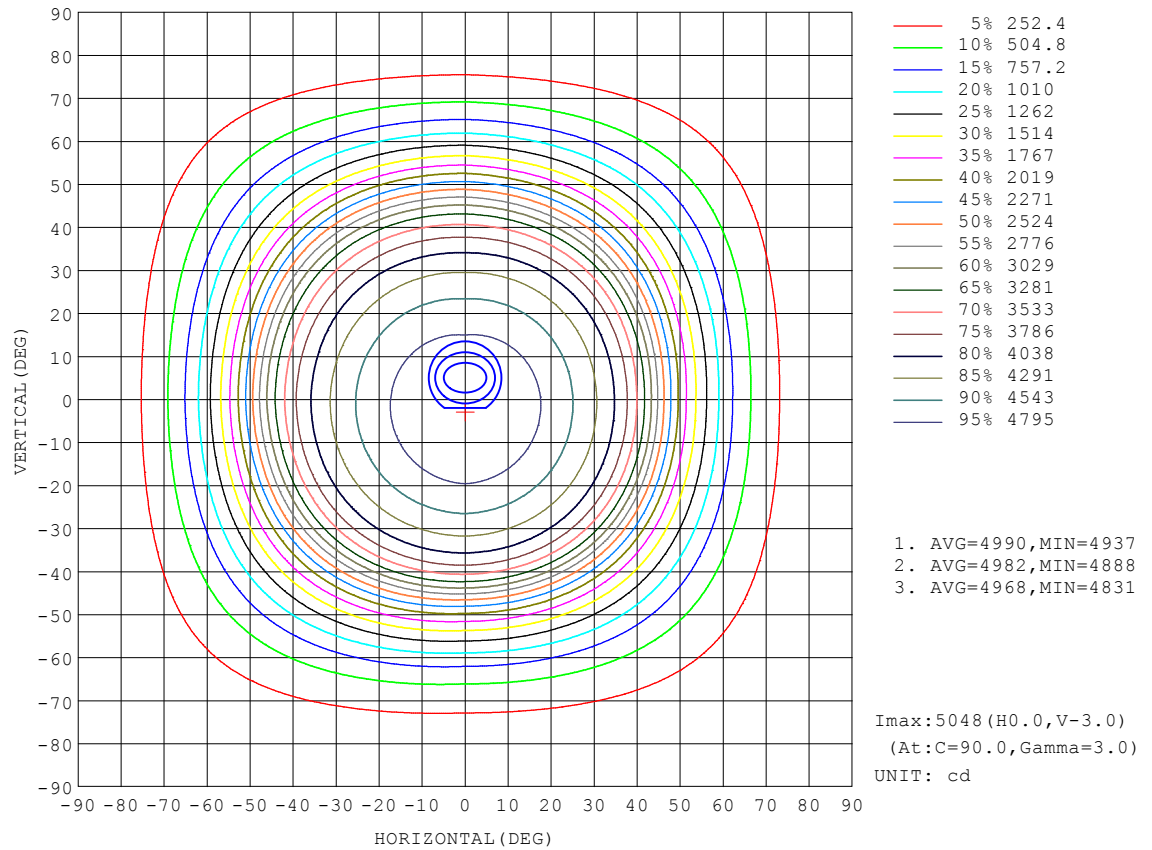
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS (PERCENT) $k(RI) \times RCR = 5$									
$k = 0.60$	64	54	48	63	54	48	62	53	47	42
0.80	74	64	58	73	64	58	72	63	57	51
1.00	83	73	67	81	73	67	79	73	66	60
1.25	89	81	75	88	80	74	85	78	73	67
1.50	94	86	80	92	85	79	89	83	78	71
2.00	100	93	87	98	91	87	94	89	85	78
2.50	103	96	91	101	95	90	97	92	88	80
3.00	105	100	95	103	98	94	99	95	92	83
4.00	109	104	100	106	102	99	102	98	96	87
5.00	110	106	103	108	104	101	103	100	98	89
ROOM INDEX	UF (total)									Direct
According to DIN EN 13032-2 2004			Suspended					SHRNOM = 1.25		

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: DAMIN
Test Date: 2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity: 65.0%
Test Distance: 9.250m [K=1.0000]
Remarks:

ISOCANDELA DIAGRAM

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:

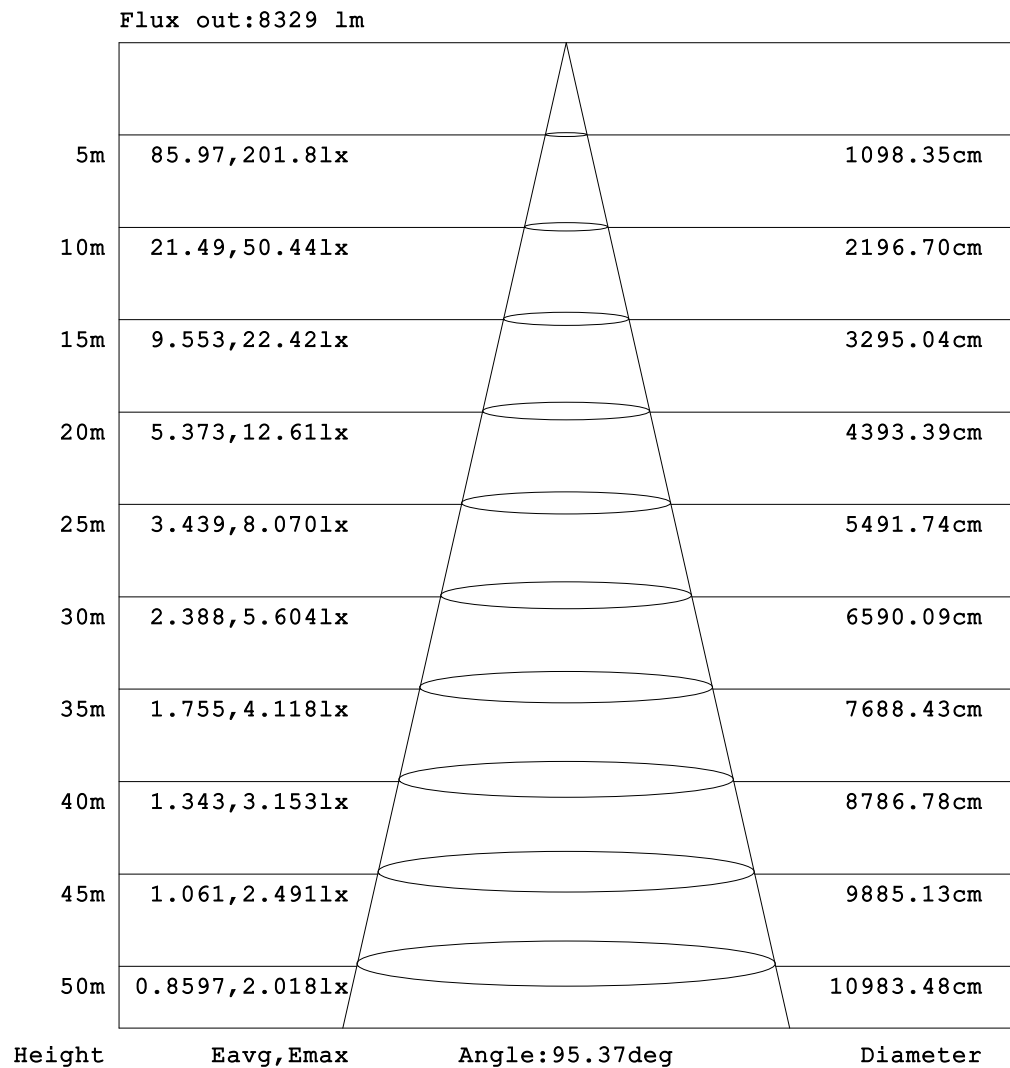


C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: DAMIN
Test Date: 2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity: 65.0%
Test Distance: 9.250m [K=1.0000]
Remarks:

AAI Figure

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:



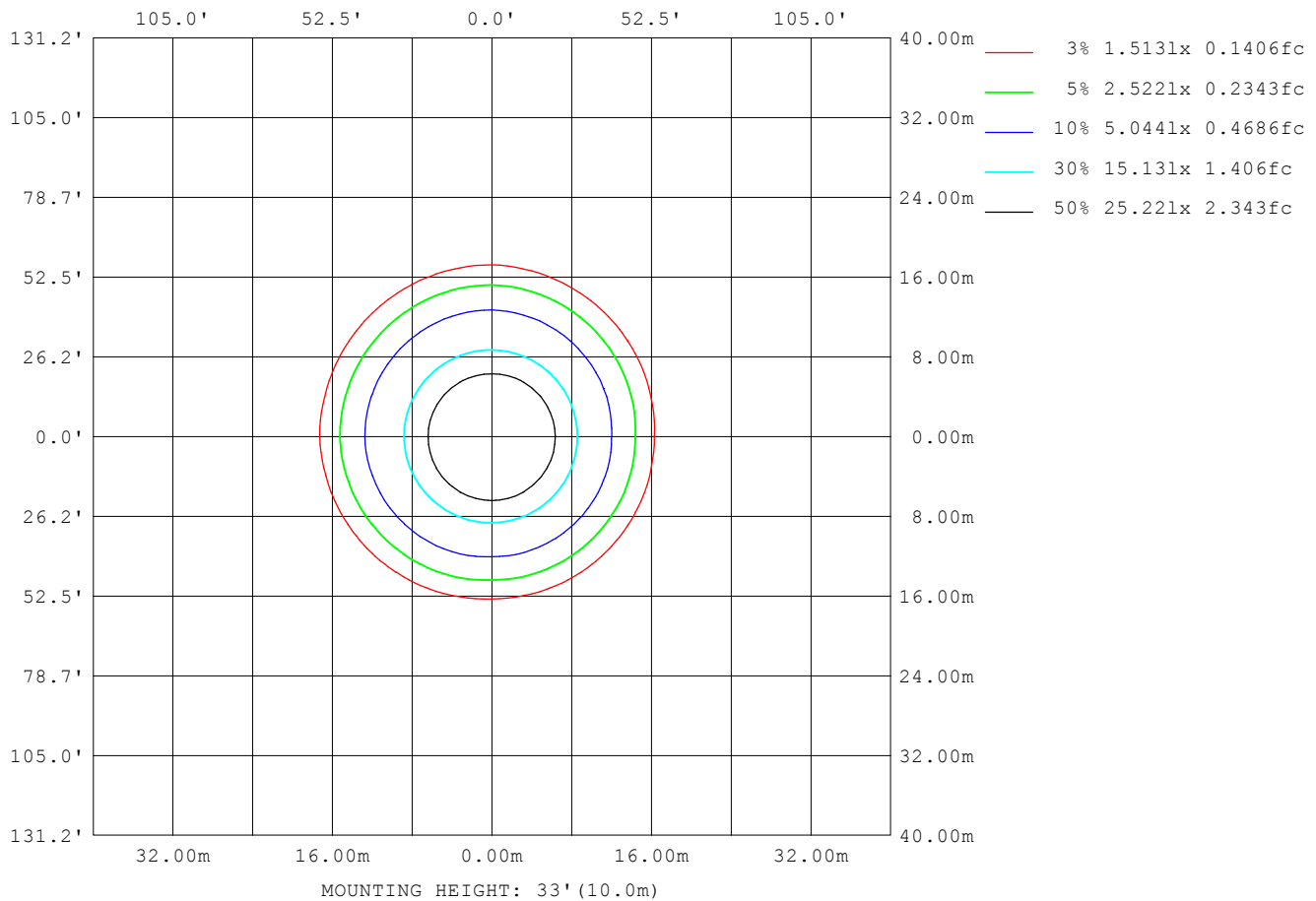
Note: The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG
 C Interval: 90.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Operators: DAMIN
 Test Date: 2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE GO-2000A_V1 SYSTEM V2.00.411
 Humidity: 65.0%
 Test Distance: 9.250m [K=1.0000]
 Remarks:

ISOLUX DIAGRAM

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:



C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-11-12

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity:65.0%
Test Distance:9.250m [K=1.0000]
Remarks:

LED Avg.L Report

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:

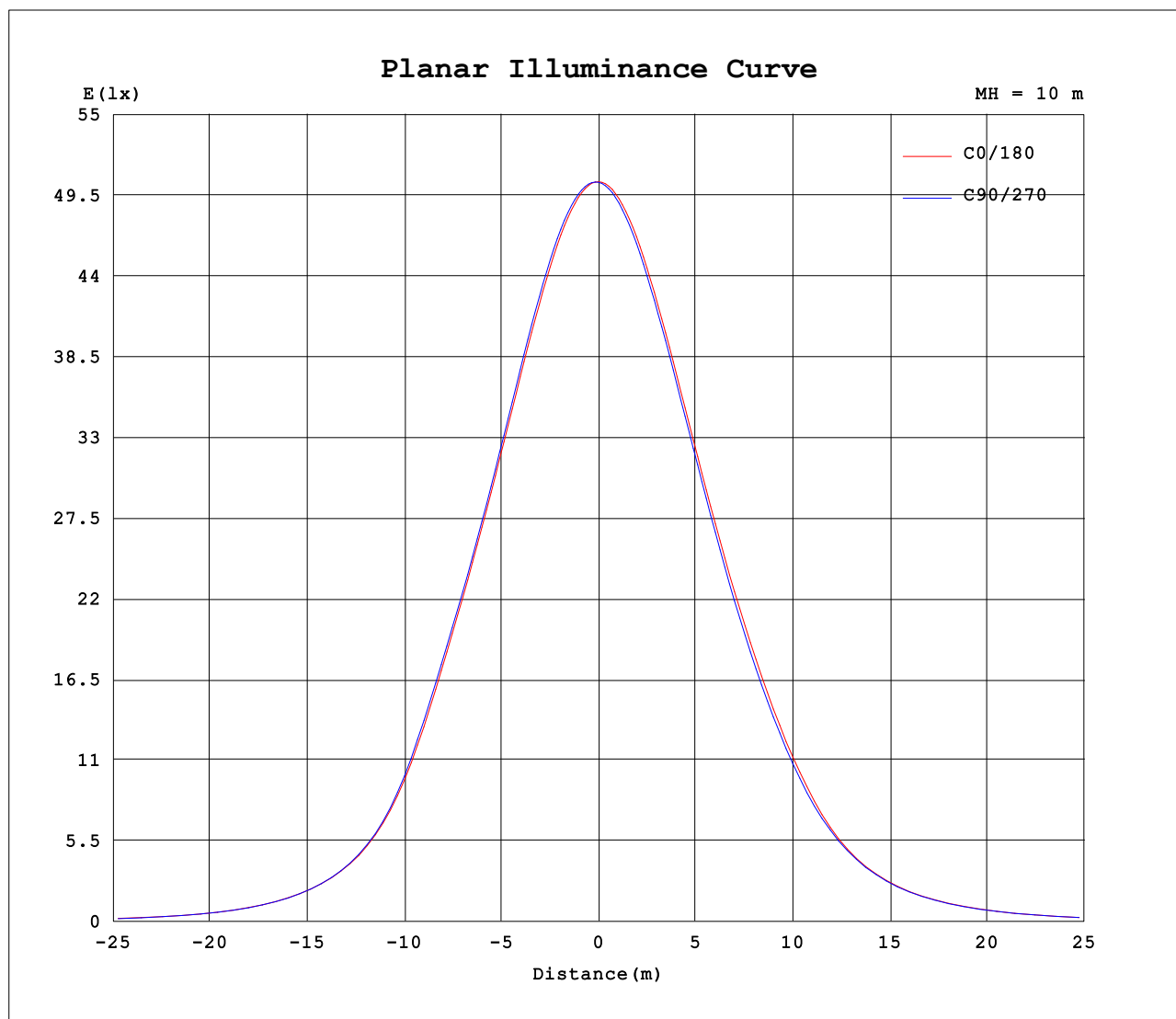
AvgL	cd/m2
L_0~180 (65) av	15959
L_0~180 (75) av	8986
L_0~180 (85) av	4894
L_90~270 (65) av	15717
L_90~270 (75) av	8932
L_90~270 (85) av	4940
L_45 (65) av	15946
L_45 (75) av	9021
L_45 (85) av	4937

Standard: GB/T 29293-2012

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity:65.0%
Test Distance:9.250m [K=1.0000]
Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: DAMIN
Test Date: 2024-11-12

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity: 65.0%
Test Distance: 9.250m [K=1.0000]
Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Test:U:218.61V I:0.2763A P:59.038W PF:0.9772 Freq:49.99Hz Lamp Flux:11366.2x1 lm		
NAME:	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: EVERFINE	SUR.:	Shielding Angle:

Table--1

UNIT: cd

C (DEG) γ (DEG)	0	90	180	270															
0	5044	5040	5044	5040															
5	5026	5045	5019	4993															
10	4965	5004	4954	4909															
15	4863	4917	4853	4793															
20	4723	4785	4723	4654															
25	4546	4608	4560	4483															
30	4322	4385	4357	4264															
35	4019	4094	4095	3977															
40	3525	3620	3726	3590															
45	2736	2815	3179	3050															
50	1953	1985	2428	2358															
55	1374	1377	1732	1703															
60	924	919	1192	1174															
65	581	568	767	761															
70	351	339	459	460															
75	204	198	261	265															
80	90.4	86.7	137	141															
85	40.7	40.6	44.6	45.5															
90	34.7	34.8	21.1	21.2															
95	32.3	32.4	22.0	22.1															
100	31.3	31.3	24.0	24.2															
105	31.7	31.7	26.6	26.8															
110	33.1	33.1	29.7	30.0															
115	35.3	35.3	33.1	33.5															
120	38.2	38.1	36.9	37.4															
125	41.5	41.4	40.9	41.6															
130	45.0	44.9	45.3	46.0															
135	48.8	48.5	49.7	50.4															
140	52.6	52.2	53.9	54.5															
145	56.3	55.8	57.7	58.1															
150	59.9	59.4	61.4	61.6															
155	63.3	62.8	64.9	65.1															
160	66.5	66.0	68.2	68.2															
165	69.3	68.9	71.2	71.0															
170	71.7	71.3	73.3	73.0															
175	73.7	73.5	74.6	74.1															
180	74.9	74.6	75.0	74.5															

C Range: 0 - 360DEG
C Interval: 90.0DEG
Test Speed: HIGH
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Operators:DAMIN
Test Date:2024-11-12

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.00.411
Humidity:65.0%
Test Distance:9.250m [K=1.0000]
Remarks: