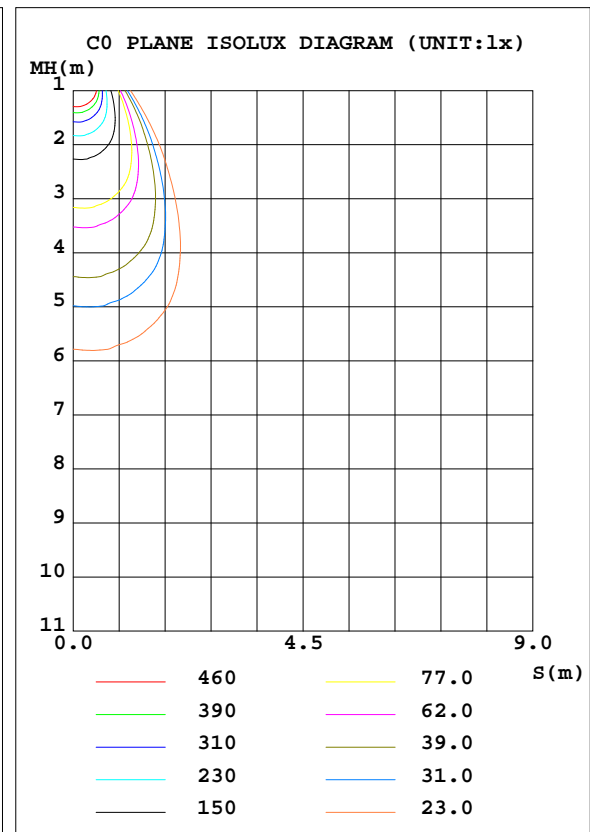
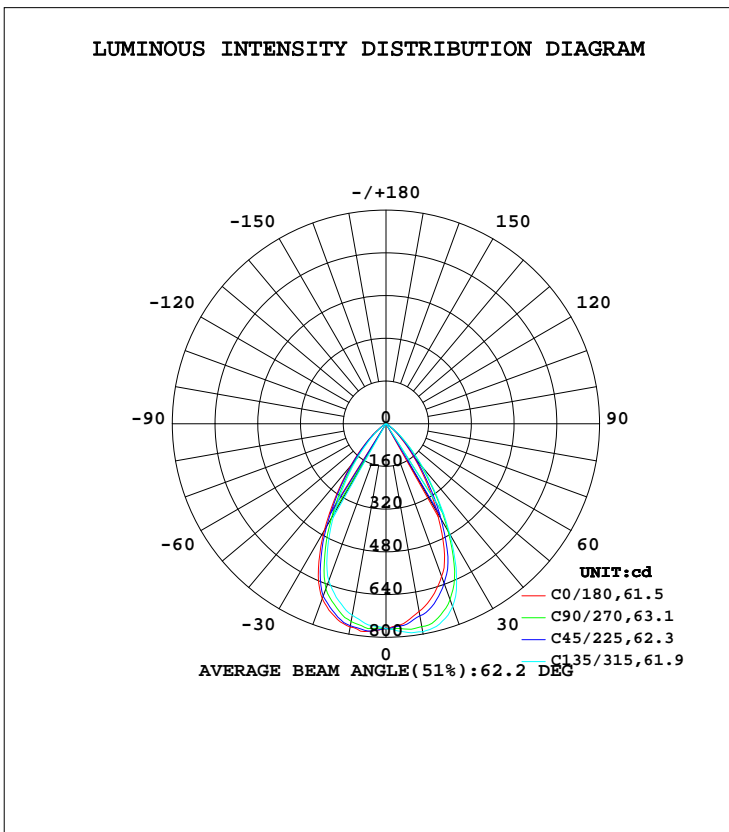


**LUMINAIRE PHOTOMETRIC TEST REPORT**

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA Eff: 87.50 lm/W			
MODEL	CD10W-CC-W-IP65 3000K	I <sub>max</sub> (cd)	791.3	S/MH(C0/180)	0.90
NOMINAL POWER(W)	10	LOR(%)	100.0	S/MH(C90/270)	0.97
RATED VOLTAGE(V)	240	TOTAL FLUX(lm)	835.59	η UP, DN(C0-180)	0.0,49.6
NOMINAL FLUX(lm)	835.59	CIE CLASS	DIRECT	η UP, DN(C180-360)	0.0,50.4
LAMPS INSIDE	1	η up(%)	0.0	CIBSE SHR NOM	0.75
TEST VOLTAGE(V)	240	η down(%)	100.0	CIBSE SHR MAX	0.95



C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature:25.3DEG  
 Operators:  
 Test Date:2023-02-15

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity:65.0%  
 Test Distance:10.450m [K=1.0000]  
 Remarks:

ZONAL FLUX DIAGRAM

ZONAL FLUX DIAGRAM:

γ	C0	C45	C90	C135	C180	C225	C270	C315	γ	Φ zone	Φ total	%lum, lamp
10	773.0	768.2	752.1	727.8	714.3	730.6	771.2	791.3	0- 10	72.79	72.79	8.71,8.71
20	697.4	687.5	658.7	626.1	608.4	636.1	701.3	729.1	10- 20	202.5	275.2	32.9,32.9
30	462.2	444.8	409.4	388.2	383.6	412.8	465.4	479.9	20- 30	256.3	531.5	63.6,63.6
40	208.5	198.5	180.2	168.3	162.7	177.9	208.7	217.3	30- 40	186.6	718.1	85.9,85.9
50	62.61	58.77	51.35	46.67	47.33	53.80	64.83	67.41	40- 50	86.88	805.0	96.3,96.3
60	10.78	9.613	8.519	7.894	7.671	9.014	11.10	11.86	50- 60	22.92	827.9	99.1,99.1
70	3.034	3.395	3.471	3.505	3.001	3.236	3.521	3.346	60- 70	4.866	832.8	99.7,99.7
80	0.9726	0.8575	0.9552	0.9008	0.9119	1.080	1.180	1.145	70- 80	2.238	835.0	99.9,99.9
90	0.0073	0	0.0220	0	0.0146	0.0147	0.0073	0.0147	80- 90	0.5642	835.6	100,100
100									90-100			
110									100-110			
120									110-120			
130									120-130			
140									130-140			
150									140-150			
160									150-160			
170									160-170			
180									170-180			
DEG	LUMINOUS INTENSITY:cd									UNIT:lm		

Conical surface Flux(90deg): 772.5 lm

%lum = 92.4%  
 %lamp = 92.4%

Conical surface Flux(120deg): 827.92 lm

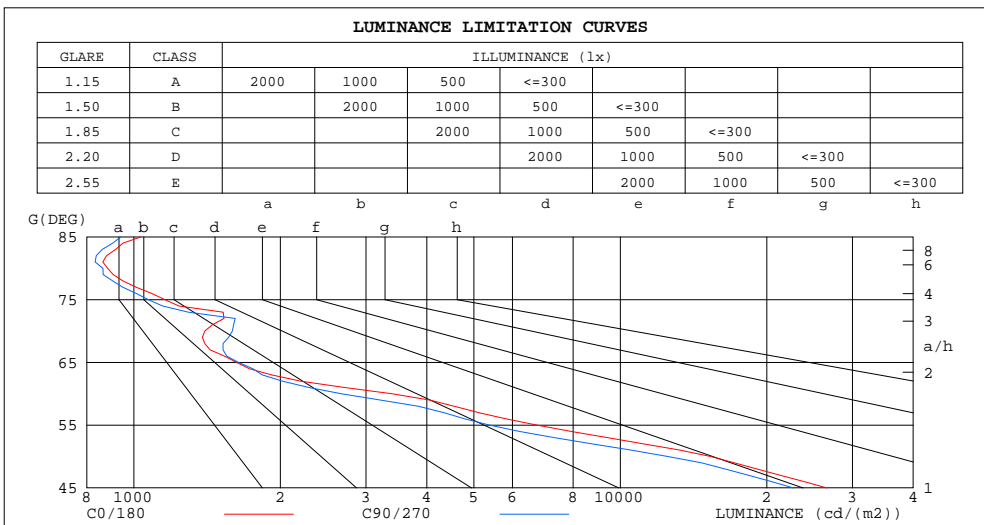
%lum = 99.1%  
 %lamp = 99.1%

C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature:25.3DEG  
 Operators:  
 Test Date:2023-02-15

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity:65.0%  
 Test Distance:10.450m [K=1.0000]  
 Remarks:

**LUMINANCE LIMITATION CURVES**

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:



LUMINANCE cd/(m2)		
G(DEG)	C0/180	C90/270
85	1032	940
80	883	864
75	1159	1071
70	1399	1593
65	1626	1641
60	3401	2675
55	6755	5396
50	15360	12543
45	26575	22687

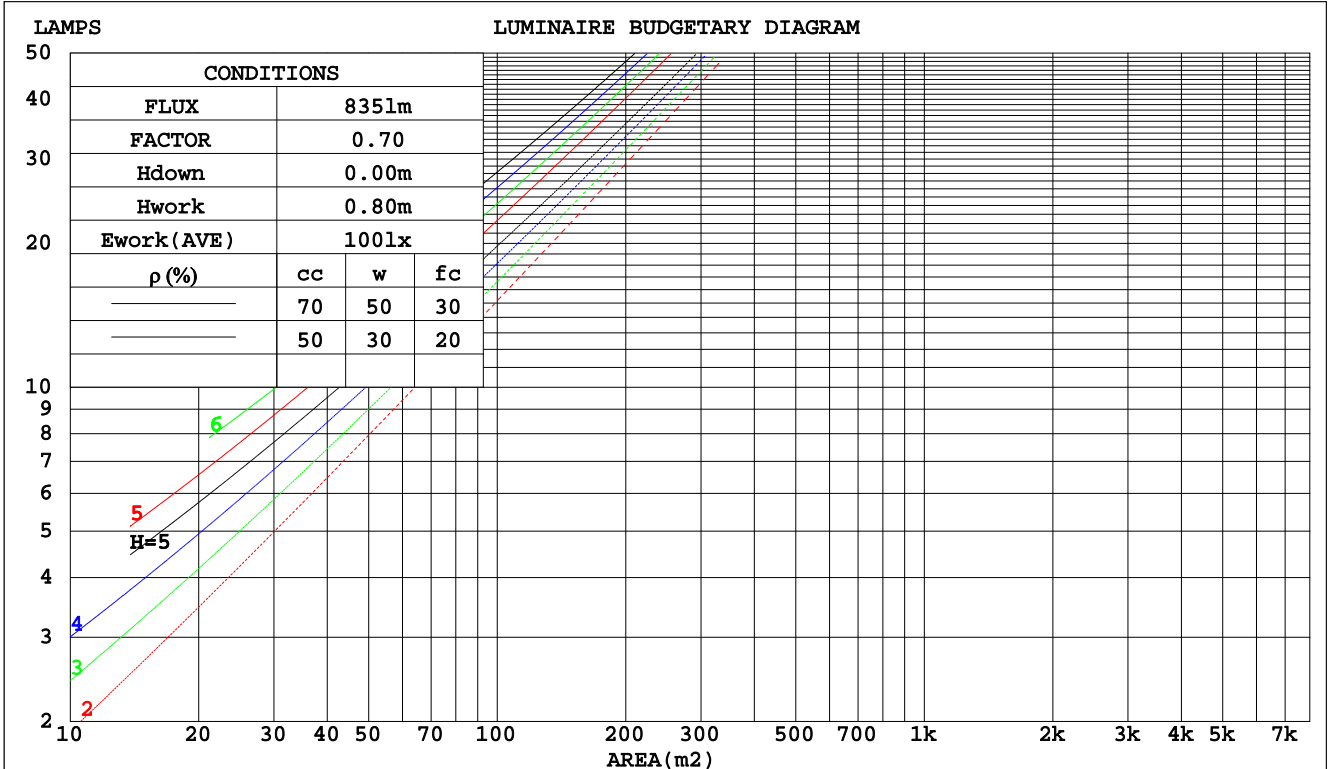
C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature:25.3DEG  
 Operators:  
 Test Date:2023-02-15

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity:65.0%  
 Test Distance:10.450m [K=1.0000]  
 Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:

pcc	80%			70%			50%			30%			10%			0
	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
pw																
pfc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio      Coefficients of Utilization(CU)															
0.0	1.19	1.19	1.19	1.16	1.16	1.16	1.11	1.11	1.11	1.06	1.06	1.06	1.02	1.02	1.02	1.00
1.0	1.10	1.08	1.05	1.08	1.06	1.04	1.04	1.02	1.00	1.00	.99	.97	.97	.96	.94	.93
2.0	1.02	.98	.94	1.00	.96	.93	.97	.94	.91	.94	.91	.89	.91	.89	.87	.85
3.0	.94	.89	.85	.93	.88	.84	.90	.86	.83	.88	.84	.81	.85	.83	.80	.78
4.0	.87	.82	.77	.86	.81	.77	.84	.79	.76	.82	.78	.75	.80	.77	.74	.72
5.0	.81	.75	.71	.80	.75	.70	.79	.73	.70	.77	.72	.69	.75	.71	.68	.67
6.0	.76	.69	.65	.75	.69	.65	.73	.68	.64	.72	.67	.64	.71	.67	.63	.62
7.0	.71	.64	.60	.70	.64	.60	.69	.63	.60	.68	.63	.59	.66	.62	.59	.57
8.0	.66	.60	.56	.66	.60	.56	.65	.59	.55	.64	.59	.55	.63	.58	.55	.53
9.0	.62	.56	.52	.62	.56	.52	.61	.55	.52	.60	.55	.51	.59	.55	.51	.50
10.0	.59	.53	.48	.58	.52	.48	.57	.52	.48	.57	.52	.48	.56	.51	.48	.47



C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature:25.3DEG  
 Operators:  
 Test Date:2023-02-15

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity:65.0%  
 Test Distance:10.450m [K=1.0000]  
 Remarks:

WEC AND CCEC

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:

ρcc	80%			70%			50%			30%			10%			0
ρw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρfc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Wall Exitance Coefficients(WEC)									
0.0																
1.0	.189	.107	.034	.182	.104	.033	.170	.097	.031	.158	.091	.029	.147	.085	.028	
2.0	.182	.100	.031	.177	.097	.030	.166	.092	.029	.156	.088	.027	.147	.083	.026	
3.0	.174	.093	.028	.169	.091	.027	.160	.087	.026	.152	.083	.025	.144	.080	.025	
4.0	.166	.086	.025	.162	.085	.025	.154	.082	.024	.147	.079	.024	.140	.076	.023	
5.0	.159	.081	.023	.155	.079	.023	.148	.077	.023	.141	.075	.022	.135	.072	.022	
6.0	.151	.076	.022	.148	.075	.022	.142	.073	.021	.136	.071	.021	.131	.069	.020	
7.0	.144	.071	.020	.141	.070	.020	.136	.069	.020	.131	.067	.020	.126	.065	.019	
8.0	.138	.067	.019	.135	.067	.019	.130	.065	.019	.126	.064	.018	.121	.062	.018	
9.0	.132	.064	.018	.130	.063	.018	.125	.062	.018	.121	.061	.017	.117	.059	.017	
10.0	.126	.061	.017	.124	.060	.017	.120	.059	.017	.117	.058	.016	.113	.057	.016	

ρcc	80%			70%			50%			30%			10%			0
ρw	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρfc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Ceiling Cavity Exitance Coefficients(CCEC)									
0.0	.190	.190	.190	.163	.163	.163	.111	.111	.111	.064	.064	.064	.020	.020	.020	
1.0	.172	.157	.144	.147	.135	.124	.101	.093	.086	.058	.054	.050	.019	.017	.016	
2.0	.158	.132	.111	.135	.114	.096	.093	.079	.067	.053	.046	.039	.017	.015	.013	
3.0	.146	.114	.088	.125	.098	.076	.086	.068	.053	.050	.040	.031	.016	.013	.010	
4.0	.136	.099	.071	.117	.086	.061	.080	.060	.043	.047	.035	.026	.015	.011	.008	
5.0	.128	.088	.058	.110	.076	.050	.076	.053	.036	.044	.031	.021	.014	.010	.007	
6.0	.121	.079	.048	.104	.068	.042	.072	.048	.030	.042	.028	.018	.013	.009	.006	
7.0	.115	.071	.041	.099	.062	.035	.068	.043	.025	.040	.025	.015	.013	.008	.005	
8.0	.109	.065	.035	.094	.056	.030	.065	.040	.022	.038	.023	.013	.012	.008	.004	
9.0	.104	.060	.030	.090	.052	.026	.062	.037	.019	.036	.022	.011	.012	.007	.004	
10.0	.100	.056	.026	.086	.048	.023	.060	.034	.016	.035	.020	.010	.011	.007	.003	

C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature:25.3DEG  
 Operators:  
 Test Date:2023-02-15

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity:65.0%  
 Test Distance:10.450m [K=1.0000]  
 Remarks:

UGR(Unified Glare Rating) Table

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	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	19.7	20.7	19.9	20.9	21.1	19.1	20.2	19.4	20.3	20.5
3H	19.5	20.5	19.8	20.7	20.9	19.0	19.9	19.2	20.1	20.3
4H	19.5	20.3	19.7	20.6	20.8	18.9	19.8	19.2	20.0	20.2
6H	19.4	20.2	19.7	20.5	20.7	18.8	19.6	19.1	19.9	20.1
8H	19.3	20.1	19.6	20.4	20.7	18.8	19.6	19.1	19.8	20.1
12H	19.3	20.1	19.6	20.3	20.6	18.7	19.5	19.1	19.8	20.0
4H 2H	19.5	20.3	19.7	20.6	20.8	18.9	19.8	19.2	20.0	20.2
3H	19.3	20.1	19.6	20.3	20.6	18.8	19.5	19.1	19.8	20.1
4H	19.2	19.9	19.6	20.2	20.5	18.7	19.4	19.0	19.7	20.0
6H	19.1	19.8	19.5	20.1	20.4	18.6	19.2	19.0	19.5	19.9
8H	19.1	19.7	19.5	20.0	20.4	18.6	19.1	19.0	19.5	19.8
12H	19.1	19.6	19.5	19.9	20.3	18.5	19.0	18.9	19.4	19.8
8H 4H	19.1	19.7	19.5	20.0	20.4	18.6	19.1	18.9	19.5	19.8
6H	19.0	19.5	19.4	19.9	20.3	18.5	18.9	18.9	19.3	19.7
8H	19.0	19.4	19.4	19.8	20.2	18.4	18.8	18.9	19.2	19.7
12H	18.9	19.3	19.4	19.7	20.2	18.4	18.7	18.8	19.2	19.6
12H 4H	19.0	19.6	19.5	19.9	20.3	18.5	19.0	18.9	19.4	19.8
6H	19.0	19.4	19.4	19.8	20.2	18.4	18.8	18.9	19.2	19.7
8H	18.9	19.3	19.4	19.7	20.2	18.4	18.7	18.8	19.2	19.6
Variations with the observer position at spacings(CIE Pub.117):										
S = 1.0H	+ 2.6 / - 8.5					+ 2.4 / - 8.6				
1.5H	+ 3.8 / - 6.8					+ 3.5 / - 6.5				
2.0H	+ 5.8 / - 9.1					+ 5.5 / - 8.4				

CIE Pub.117, 835.6 lm Total Lamp Luminous Flux Corrected (8log(F/F0) = -0.6)  
Area: 0.00636 m2

C Range: 0 - 360DEG  
C Interval: 45.0DEG  
Test Speed: HIGH  
Temperature:25.3DEG  
Operators:  
Test Date:2023-02-15

γ Range: 0 - 90DEG  
γ Interval: 1.0DEG  
Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
Humidity:65.0%  
Test Distance:10.450m [K=1.0000]  
Remarks:

**UTILIZATION FACTORS TABLE**

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:

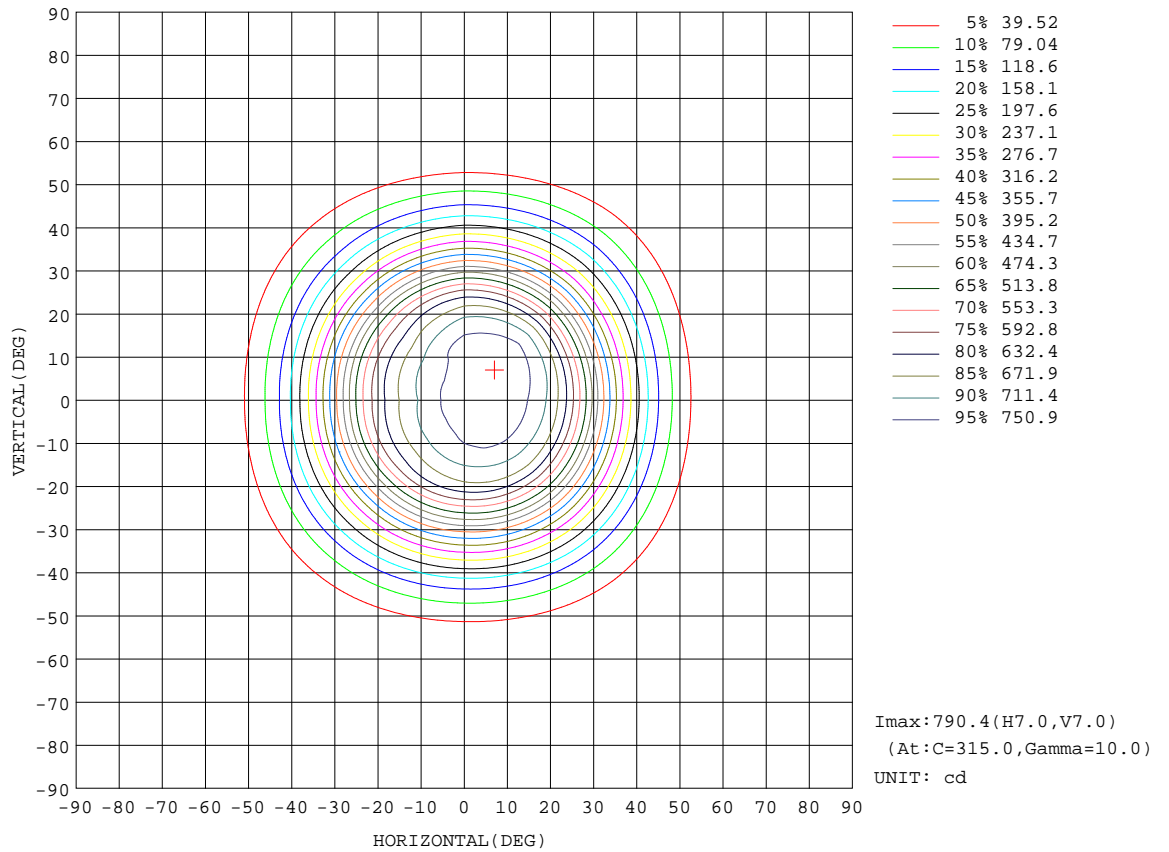
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS(PERCENT) $k(RI) \times RCR = 5$									
k = 0.60	83	75	71	82	75	71	81	75	71	67
0.80	91	84	80	90	84	80	89	83	79	75
1.00	96	90	86	95	90	86	94	90	85	81
1.25	101	95	91	100	95	91	98	93	90	86
1.50	104	99	95	103	98	95	100	96	93	89
2.00	107	103	99	106	102	98	103	100	97	92
2.50	109	105	102	107	104	101	104	101	99	93
3.00	111	107	104	109	106	103	106	103	101	94
4.00	113	110	107	111	108	106	107	105	103	96
5.00	114	112	110	112	110	108	108	106	105	97
ROOM INDEX	UF(total)									Direct
According to DIN EN 13032-2 2004			Suspended				SHRNOM = 1.25			

C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature:25.3DEG  
 Operators:  
 Test Date:2023-02-15

$\gamma$  Range: 0 - 90DEG  
 $\gamma$  Interval: 1.0DEG  
 Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity:65.0%  
 Test Distance:10.450m [K=1.0000]  
 Remarks:

**ISOCANDELA DIAGRAM**

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:



C Range: 0 - 360DEG  
C Interval: 45.0DEG  
Test Speed: HIGH  
Temperature: 25.3DEG  
Operators:  
Test Date: 2023-02-15

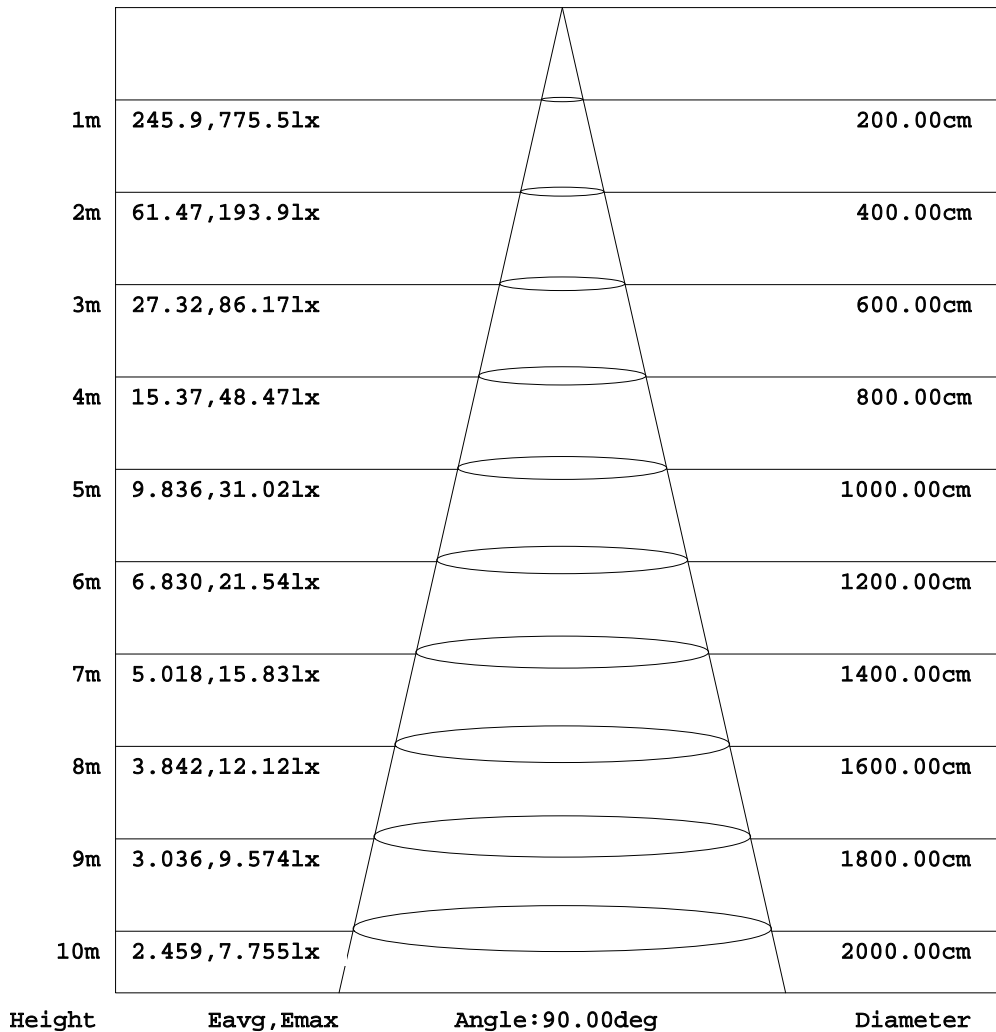
γ Range: 0 - 90DEG  
γ Interval: 1.0DEG  
Test System: EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
Humidity: 65.0%  
Test Distance: 10.450m [K=1.0000]  
Remarks:



**AAI Figure**

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:

Flux out:772.5 lm



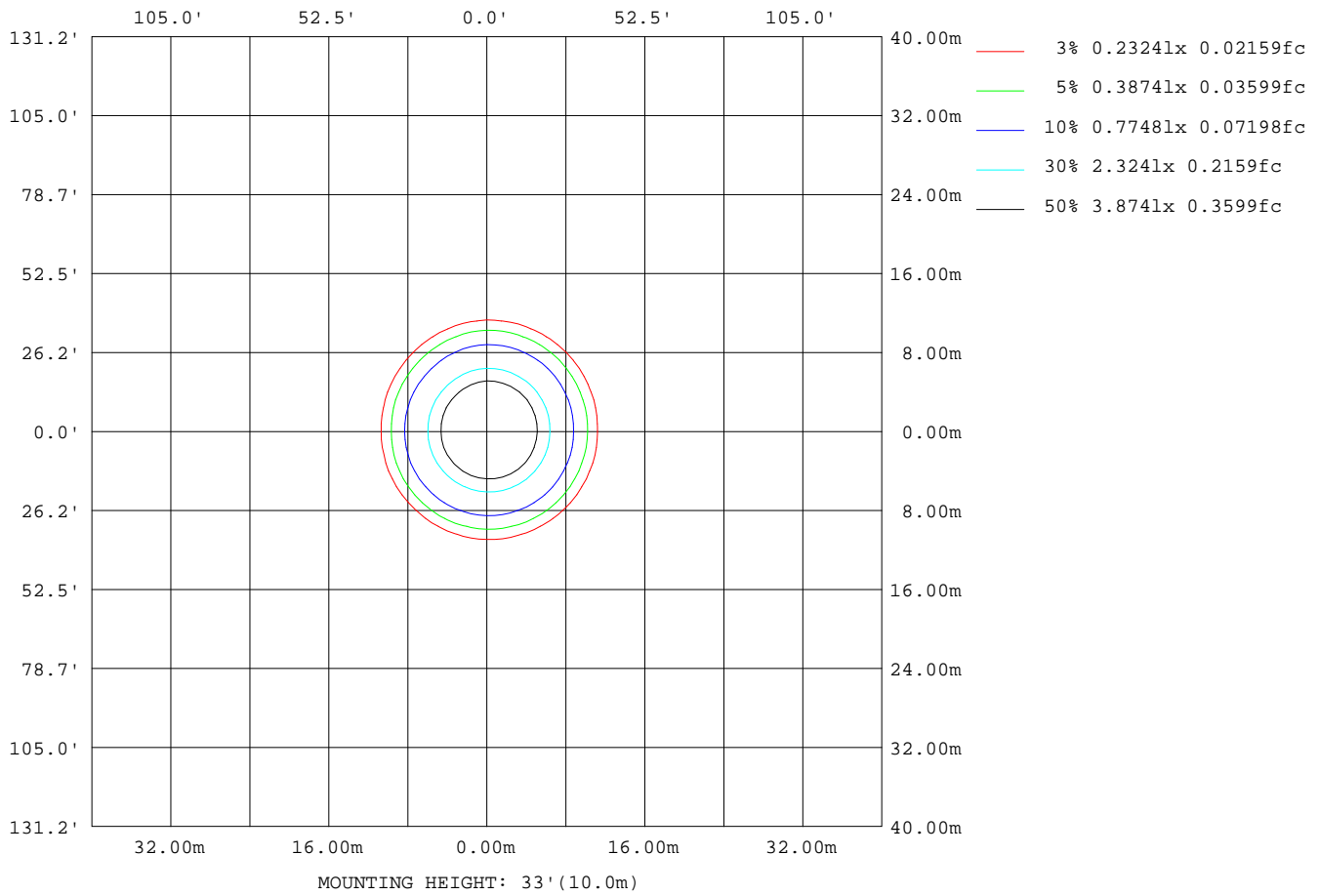
Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG  
C Interval: 45.0DEG  
Test Speed: HIGH  
Temperature:25.3DEG  
Operators:  
Test Date:2023-02-15

γ Range: 0 - 90DEG  
γ Interval: 1.0DEG  
Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
Humidity:65.0%  
Test Distance:10.450m [K=1.0000]  
Remarks:

**ISOLUX DIAGRAM**

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:



C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature:25.3DEG  
 Operators:  
 Test Date:2023-02-15

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity:65.0%  
 Test Distance:10.450m [K=1.0000]  
 Remarks:

LED Avg.L Report

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:

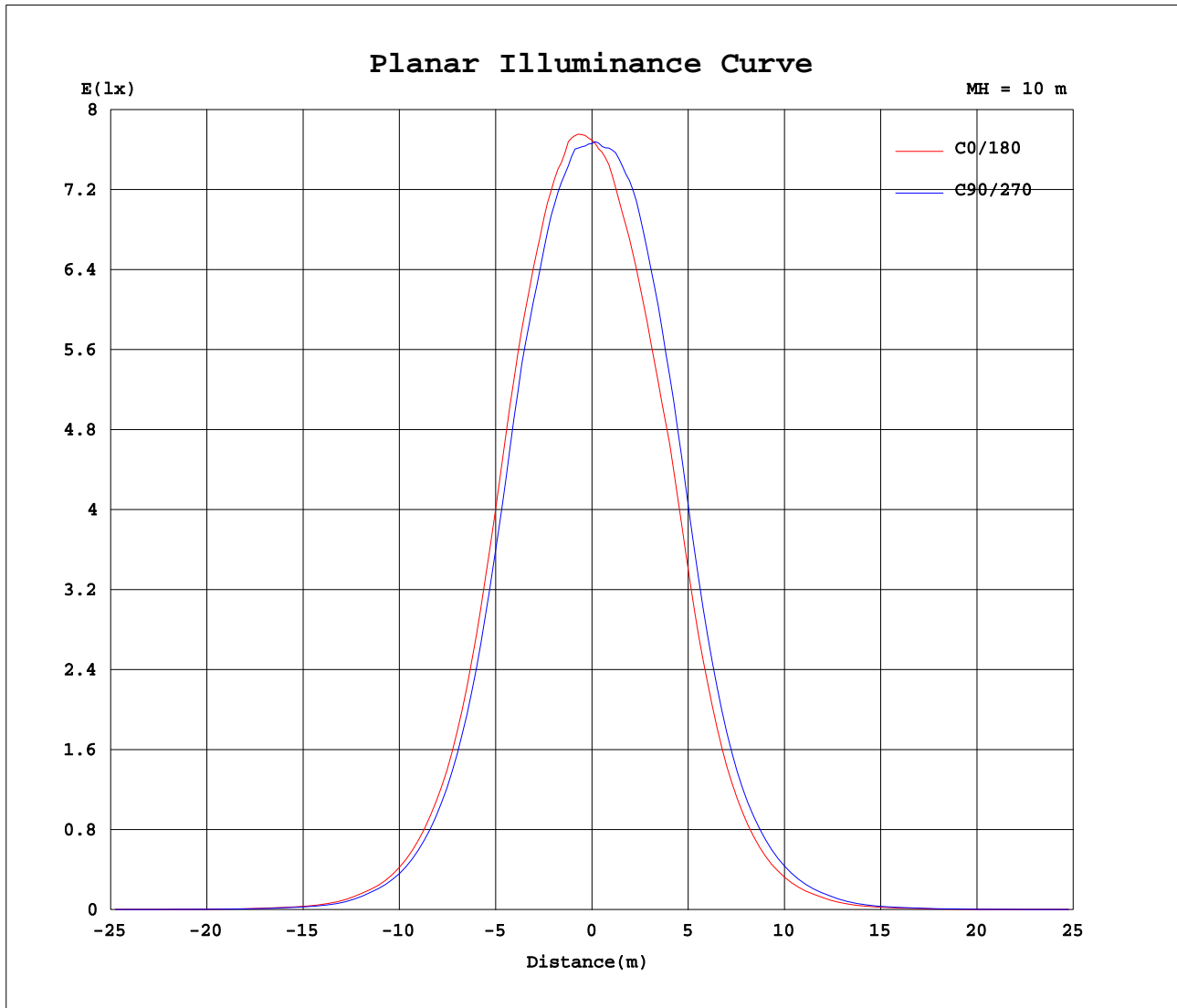
AvgL	cd/m2
L_0~180(65)av	1517
L_0~180(75)av	1170
L_0~180(85)av	1028
L_90~270(65)av	1666
L_90~270(75)av	1278
L_90~270(85)av	1079
L_45(65)av	1627
L_45(75)av	1202
L_45(85)av	1041

Standard: GB/T 29293-2012

C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature:25.3DEG  
 Operators:  
 Test Date:2023-02-15

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity:65.0%  
 Test Distance:10.450m [K=1.0000]  
 Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature: 25.3DEG  
 Operators:  
 Test Date: 2023-02-15

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System: EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity: 65.0%  
 Test Distance: 10.450m [K=1.0000]  
 Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Test:U:240.00V I:0.0440A P:9.5500W PF:0.8860 Freq:49.99Hz Lamp Flux:835.59x1 lm		
NAME: CD10W-CC-W-IP65 3000K	TYPE: 10W	WEIGHT:
SPEC.: 3000K	DIM.:	SERIAL No.:
MFR.:	SUR.: 0.00636	Shielding Angle:

Table--1

UNIT: cd

C( DEG) γ (DEG)	0	45	90	135	180	225	270	315										
0	767	767	767	767	767	767	767	767										
5	781	779	771	757	752	758	772	782										
10	773	768	752	728	714	731	771	791										
15	746	736	714	686	671	697	753	776										
20	697	688	659	626	608	636	701	729										
25	599	581	542	519	515	549	609	625										
30	462	445	409	388	384	413	465	480										
35	322	309	283	265	260	283	323	333										
40	209	199	180	168	163	178	209	217										
45	119	112	102	94.2	91.7	103	123	127										
50	62.6	58.8	51.4	46.7	47.3	53.8	64.8	67.4										
55	24.6	22.8	19.7	18.1	17.8	20.3	25.1	26.4										
60	10.8	9.61	8.52	7.89	7.67	9.01	11.1	11.9										
65	4.36	4.26	4.42	4.29	3.80	4.15	4.54	4.79										
70	3.03	3.40	3.47	3.50	3.00	3.24	3.52	3.35										
75	1.90	1.72	1.77	1.77	1.95	2.17	2.44	2.26										
80	0.97	0.86	0.96	0.90	0.91	1.08	1.18	1.15										
85	0.57	0.47	0.52	0.56	0.57	0.64	0.67	0.64										
90	0.01	0.00	0.02	0.00	0.01	0.01	0.01	0.01										

C Range: 0 - 360DEG  
 C Interval: 45.0DEG  
 Test Speed: HIGH  
 Temperature:25.3DEG  
 Operators:  
 Test Date:2023-02-15

γ Range: 0 - 90DEG  
 γ Interval: 1.0DEG  
 Test System:EVERFINE GO-2000A\_V1 SYSTEM V2.00.446  
 Humidity:65.0%  
 Test Distance:10.450m [K=1.0000]  
 Remarks: