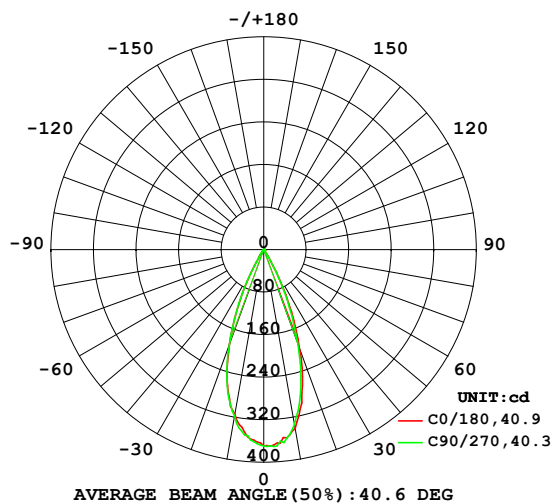


LUMINAIRE PHOTOMETRIC TEST REPORT

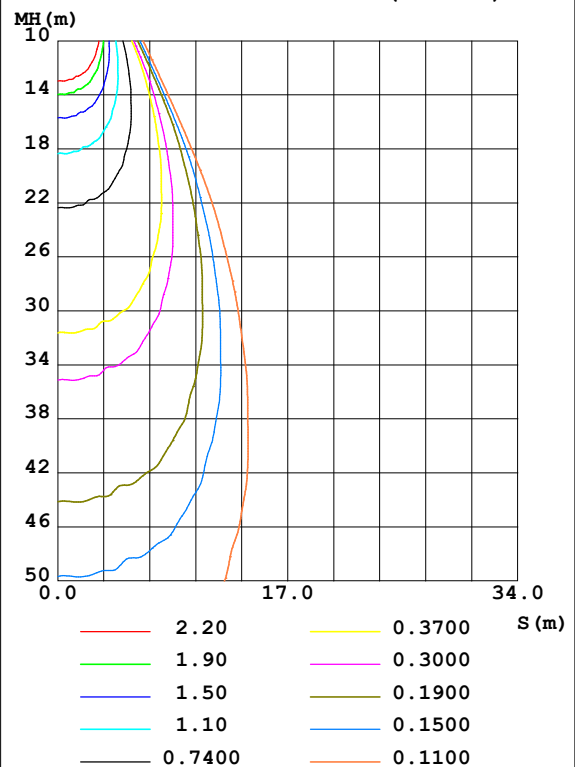
Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm		
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOOTLED		WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: DARKON	SUR.:	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA Eff: 54.30 lm/W			
MODEL	CREE XPG-3	I _{max} (cd)	372.8	S/MH(C0/180)	0.64
NOMINAL POWER(W)		LOR(%)	100.0	S/MH(C90/270)	0.64
RATED VOLTAGE(V)	230.0	TOTAL FLUX(lm)	164.61	η UP,DN(C0-180)	0.0,50.5
NOMINAL FLUX(lm)	164.606	CIE CLASS	DIRECT	η UP,DN(C180-360)	0.0,49.5
LAMPS INSIDE	1	η up(%)	0.0	CIBSE SHR NOM	0.50
TEST VOLTAGE(V)	230	η down(%)	100.0	CIBSE SHR MAX	0.65

LUMINOUS INTENSITY DISTRIBUTION DIAGRAM



C0 PLANE ISOLUX DIAGRAM (UNIT:lx)



C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:JEFF
Test Date:02 September 2024

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.295
Humidity:65.0%
Test Distance:7.888m [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	341.5	338.1	333.7	326.9	314.7	314.0	318.1	327.9	0- 10	33.27	33.27	20.2,20.2
20	196.9	193.4	186.8	191.8	188.5	181.3	189.8	193.3	10- 20	73.46	106.7	64.8,64.8
30	35.93	32.67	33.08	36.14	36.64	34.10	37.13	36.76	20- 30	48.42	155.2	94.3,94.3
40	3.461	3.535	3.448	3.421	3.555	3.423	3.458	3.599	30- 40	7.518	162.7	98.8,98.8
50	0.8939	1.061	0.7970	0.7830	0.8681	0.9377	0.8122	0.8871	40- 50	1.569	164.2	99.8,99.8
60	0.1644	0.1612	0.1724	0.1732	0.1313	0.1170	0.1210	0.1250	50- 60	0.2724	164.5	99.9,99.9
70	0.0365	0.0366	0.0368	0.0332	0	0	0	0	60- 70	0.0836	164.6	100,100
80	0	0	0	0	0	0	0	0	70- 80	0.0039	164.6	100,100
90	0	0	0	0	0	0	0	0	80- 90	0	164.6	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): 163.66 lm

%lum = 99.4%

%lamp = 99.4%

Conical surface Flux(120deg): 164.52 lm

%lum = 99.9%

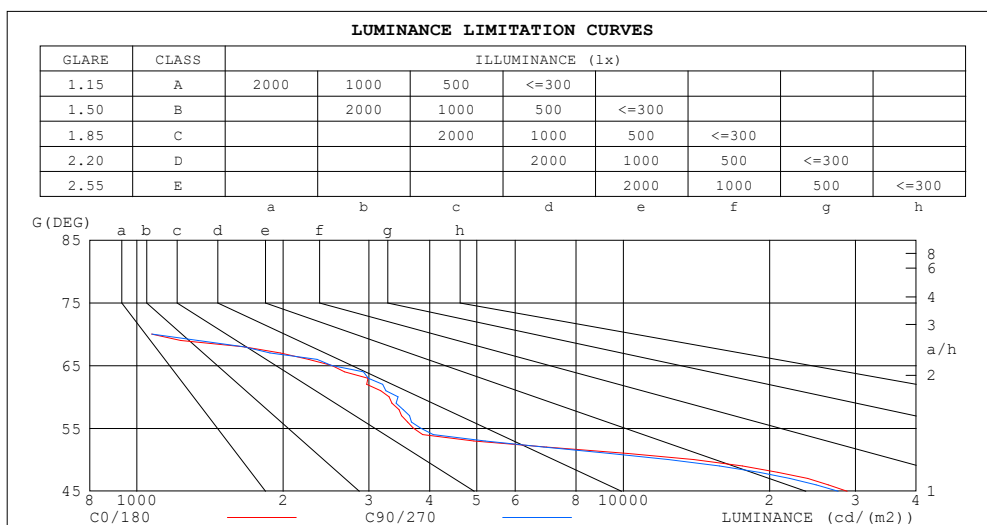
%lamp = 99.9%

C Range: 0 - 360DEG
 C Interval: 22.5DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:JEFF
 Test Date:02 September 2024

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.295
 Humidity:65.0%
 Test Distance:7.888m [K=1.0000]
 Remarks:

LUMINANCE LIMITATION CURVES

Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm		
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOUTLED	WEIGHT:	
SPEC.:	DIM.:	SERIAL No.:1
MFR.: DARKON	SUR.:	Shielding Angle:



LUMINANCE cd/(m2)		
G (DEG)	C0/180	C90/270
85	0	0
80	0	0
75	141	143
70	1072	1075
65	2516	2515
60	3300	3445
55	3706	3835
50	13958	12385
45	28867	27679

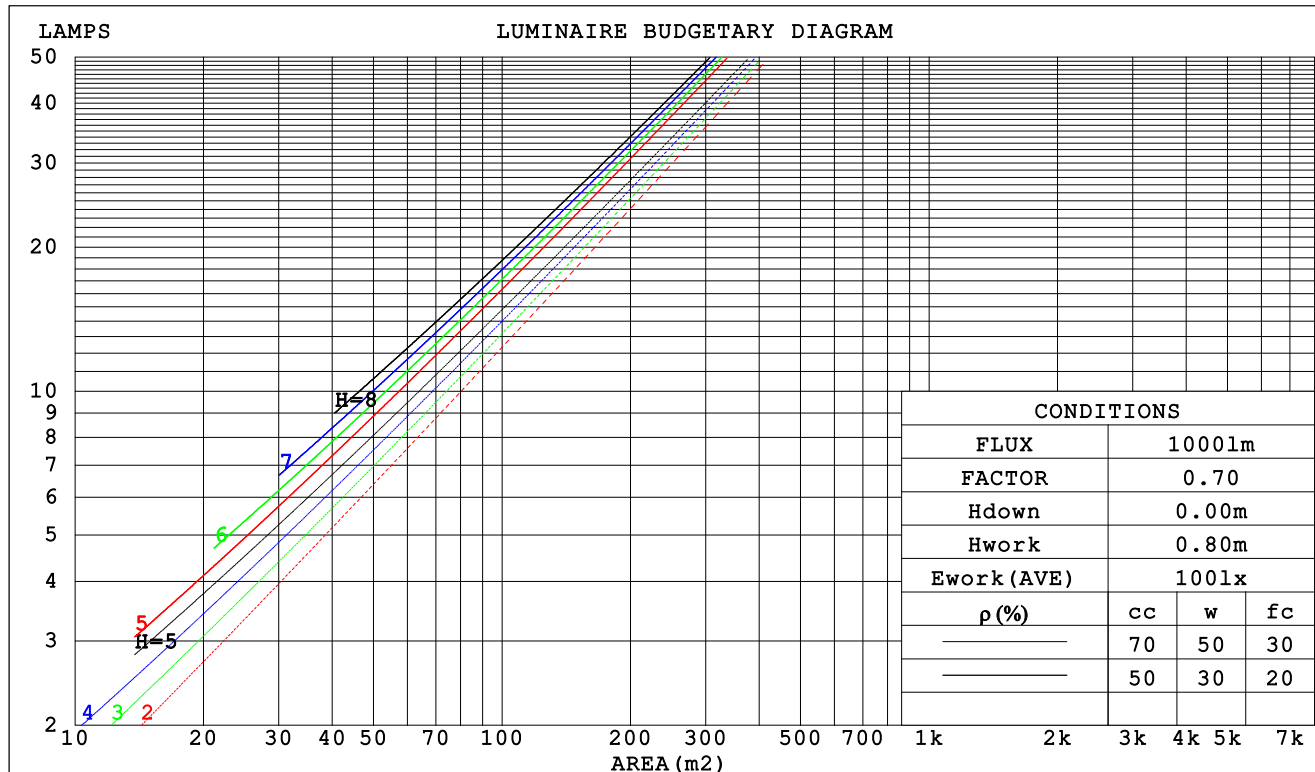
C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: JEFF
Test Date: 02 September 2024

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-2000A_V1 SYSTEM V2.0.295
Humidity: 65.0%
Test Distance: 7.888m [K=1.0000]
Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm		
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOOTLED		WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: DARKON	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)															
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	1.12	1.10	1.08	1.10	1.08	1.07	1.06	1.05	1.03	1.02	1.01	1.00	.99	.98	.97	.96
2.0	1.06	1.03	1.00	1.05	1.02	.99	1.01	.99	.97	.98	.97	.95	.96	.94	.93	.91
3.0	1.01	.97	.94	.99	.96	.93	.97	.94	.91	.95	.92	.90	.93	.90	.89	.87
4.0	.96	.92	.88	.95	.91	.88	.93	.89	.87	.91	.88	.86	.89	.87	.85	.83
5.0	.92	.87	.84	.91	.86	.83	.89	.85	.82	.88	.84	.82	.86	.83	.81	.80
6.0	.88	.83	.79	.87	.82	.79	.86	.82	.79	.84	.81	.78	.83	.80	.78	.77
7.0	.84	.79	.76	.83	.79	.76	.82	.78	.75	.81	.78	.75	.80	.77	.75	.73
8.0	.81	.76	.73	.80	.76	.72	.79	.75	.72	.78	.75	.72	.77	.74	.72	.70
9.0	.77	.73	.70	.77	.73	.69	.76	.72	.69	.75	.72	.69	.75	.71	.69	.68
10.0	.75	.70	.67	.74	.70	.67	.73	.69	.67	.73	.69	.66	.72	.69	.66	.65



C Range: 0 - 360DEG

C Interval: 22.5DEG

Test Speed: HIGH

Temperature:25.3DEG

Operators:JEFF

Test Date:02 September 2024

 γ Range: 0 - 90DEG γ Interval: 1.0DEG

Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.295

Humidity:65.0%

Test Distance:7.888m [K=1.0000]

Remarks:

WEC AND CCEC

Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm		
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOOTLED	WEIGHT:	
SPEC.:	DIM.:	SERIAL No.:1
MFR.: DARKON	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	.150	.085	.027	.143	.082	.026	.131	.075	.024	.119	.069	.022	.109	.063	.020		
2.0	.141	.077	.024	.135	.074	.023	.125	.069	.022	.115	.065	.020	.106	.060	.019		
3.0	.132	.070	.021	.128	.068	.021	.119	.065	.020	.111	.061	.019	.104	.057	.018		
4.0	.125	.065	.019	.121	.063	.019	.114	.060	.018	.107	.057	.017	.101	.055	.017		
5.0	.119	.061	.018	.115	.059	.017	.109	.057	.017	.103	.054	.016	.098	.052	.016		
6.0	.113	.057	.016	.110	.056	.016	.105	.054	.016	.100	.052	.015	.095	.050	.015		
7.0	.108	.053	.015	.106	.053	.015	.101	.051	.015	.096	.049	.014	.092	.048	.014		
8.0	.104	.051	.014	.101	.050	.014	.097	.048	.014	.093	.047	.014	.089	.046	.013		
9.0	.099	.048	.013	.097	.047	.013	.094	.046	.013	.090	.045	.013	.087	.044	.013		
10.0	.096	.046	.013	.094	.045	.013	.090	.044	.012	.087	.043	.012	.084	.042	.012		

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	.190	.190	.190	.163	.163	.163	.111	.111	.111	.064	.064	.064	.020	.020	.020	
1.0	.169	.158	.147	.145	.135	.127	.099	.093	.088	.057	.054	.051	.018	.017	.016	
2.0	.152	.133	.116	.130	.114	.101	.089	.079	.070	.051	.046	.041	.017	.015	.013	
3.0	.138	.113	.094	.118	.098	.081	.081	.068	.057	.047	.040	.034	.015	.013	.011	
4.0	.126	.098	.077	.108	.085	.067	.075	.059	.047	.043	.035	.028	.014	.011	.009	
5.0	.116	.086	.064	.100	.075	.055	.069	.052	.039	.040	.031	.023	.013	.010	.008	
6.0	.108	.076	.054	.093	.066	.047	.064	.046	.033	.037	.027	.020	.012	.009	.006	
7.0	.101	.068	.046	.087	.059	.040	.060	.042	.028	.035	.025	.017	.011	.008	.006	
8.0	.095	.062	.039	.082	.054	.034	.057	.038	.024	.033	.022	.014	.011	.007	.005	
9.0	.090	.056	.034	.077	.049	.030	.054	.034	.021	.031	.020	.013	.010	.007	.004	
10.0	.085	.052	.030	.073	.045	.026	.051	.032	.018	.030	.019	.011	.010	.006	.004	

C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:JEFF
Test Date:02 September 2024

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.295
Humidity:65.0%
Test Distance:7.888m [K=1.0000]
Remarks:

UGR(Unified Glare Rating) Table

Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm										
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOUTLED								WEIGHT:		
SPEC.:					DIM.:			SERIAL No.:1		
MFR.: DARKON					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	15.1	15.9	15.4	16.0	16.2	14.7	15.4	14.9	15.6	15.7
3H	15.0	15.7	15.2	15.9	16.1	14.5	15.2	14.7	15.4	15.6
4H	14.9	15.6	15.2	15.8	16.0	14.4	15.1	14.7	15.3	15.5
6H	14.8	15.4	15.1	15.7	15.9	14.3	15.0	14.6	15.2	15.4
8H	14.8	15.4	15.1	15.6	15.9	14.3	14.9	14.6	15.1	15.4
12H	14.7	15.3	15.0	15.6	15.8	14.2	14.8	14.6	15.1	15.3
4H 2H	14.9	15.6	15.2	15.8	16.0	14.4	15.1	14.7	15.3	15.5
3H	14.7	15.3	15.1	15.6	15.8	14.3	14.8	14.6	15.1	15.4
4H	14.6	15.2	15.0	15.5	15.8	14.2	14.7	14.5	15.0	15.3
6H	14.5	15.0	14.9	15.3	15.7	14.1	14.5	14.4	14.9	15.2
8H	14.5	14.9	14.9	15.3	15.6	14.0	14.4	14.4	14.8	15.1
12H	14.4	14.8	14.8	15.2	15.6	14.0	14.3	14.4	14.7	15.1
8H 4H	14.5	14.9	14.9	15.3	15.6	14.0	14.4	14.4	14.8	15.1
6H	14.4	14.7	14.8	15.1	15.5	13.9	14.3	14.3	14.6	15.1
8H	14.3	14.6	14.8	15.1	15.5	13.8	14.2	14.3	14.6	15.0
12H	14.3	14.5	14.7	15.0	15.4	13.8	14.0	14.2	14.5	15.0
12H 4H	14.4	14.8	14.8	15.2	15.6	14.0	14.3	14.4	14.7	15.1
6H	14.3	14.6	14.8	15.1	15.5	13.8	14.2	14.3	14.6	15.0
8H	14.3	14.5	14.7	15.0	15.4	13.8	14.0	14.2	14.5	15.0
Variations with the observer position at spacings:										
S = 1.0H	+ 3.3 / -13.0					+ 3.4 / -12.7				
1.5H	+ 4.9 / -12.5					+ 5.1 / -12.2				
2.0H	+ 6.2 / - 9.5					+ 6.3 / - 8.9				

CIE Pub.117 Corrected 164.6 lm Total Lamp Luminous Flux.(8log(F/F0) = -6.3)

C Range: 0 - 360DEG

C Interval: 22.5DEG

Test Speed: HIGH

Temperature:25.3DEG

Operators:JEFF

Test Date:02 September 2024

γ Range: 0 - 90DEG

γ Interval: 1.0DEG

Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.295

Humidity:65.0%

Test Distance:7.888m [K=1.0000]

Remarks:

UTILIZATION FACTORS TABLE

Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm		
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOOTLED	WEIGHT:	
SPEC.:	DIM.:	SERIAL No.:1
MFR.: DARKON	SUR.:	Shielding Angle:

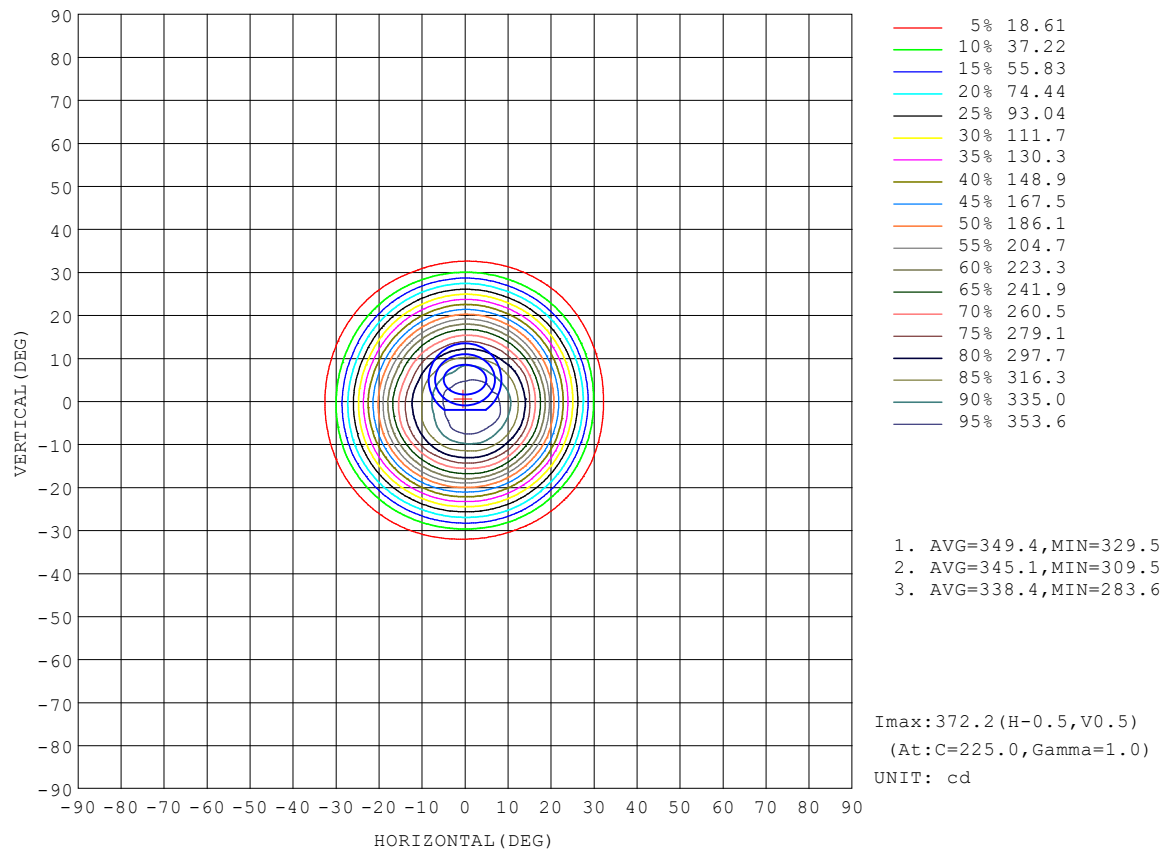
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS (PERCENT) $k(RI) \times RCR = 5$									
$k = 0.60$	91	85	82	90	85	82	90	85	81	78
0.80	98	93	89	97	92	89	96	92	89	85
1.00	102	97	93	101	96	93	99	96	93	89
1.25	105	101	97	104	100	97	102	99	96	92
1.50	108	103	100	106	103	100	104	101	99	95
2.00	110	106	103	108	105	102	106	103	101	96
2.50	111	108	105	110	107	104	107	104	102	97
3.00	113	110	107	111	108	106	108	106	104	98
4.00	115	112	110	112	110	109	109	107	106	99
5.00	116	114	112	114	112	110	110	108	107	100
ROOM INDEX	UF (total)									Direct
According to DIN EN 13032-2 2004			Suspended					SHRNM = 1.25		

C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: JEFF
Test Date: 02 September 2024

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-2000A_V1 SYSTEM V2.0.295
Humidity: 65.0%
Test Distance: 7.888m [K=1.0000]
Remarks:

ISOCANDELA DIAGRAM

Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm		
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOOTLED	WEIGHT:	
SPEC.:	DIM.:	SERIAL No.:1
MFR.: DARKON	SUR.:	Shielding Angle:

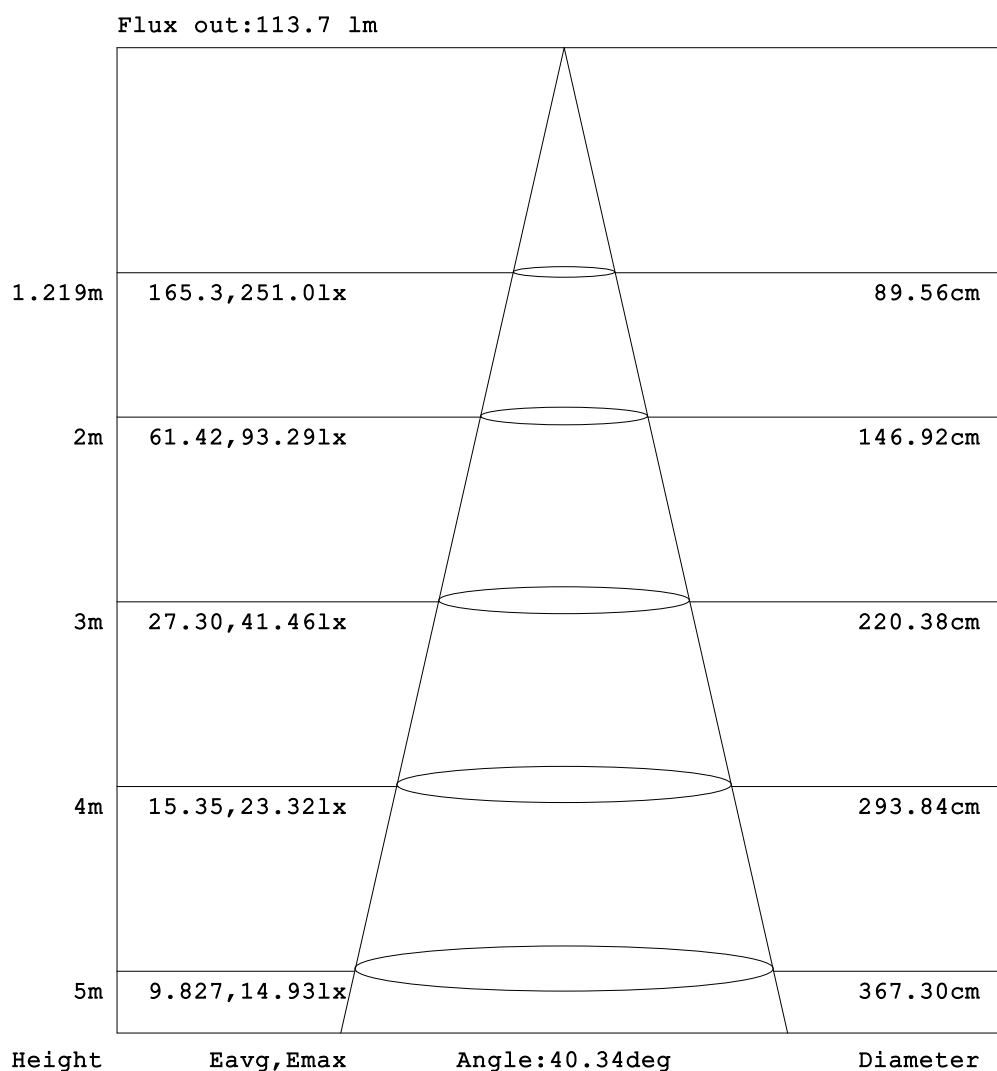


C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:JEFF
Test Date:02 September 2024

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.295
Humidity:65.0%
Test Distance:7.888m [K=1.0000]
Remarks:

AAI Figure

Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm		
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOOTLED	WEIGHT:	
SPEC.:	DIM.:	SERIAL No.:1
MFR.: DARKON	SUR.:	Shielding Angle:



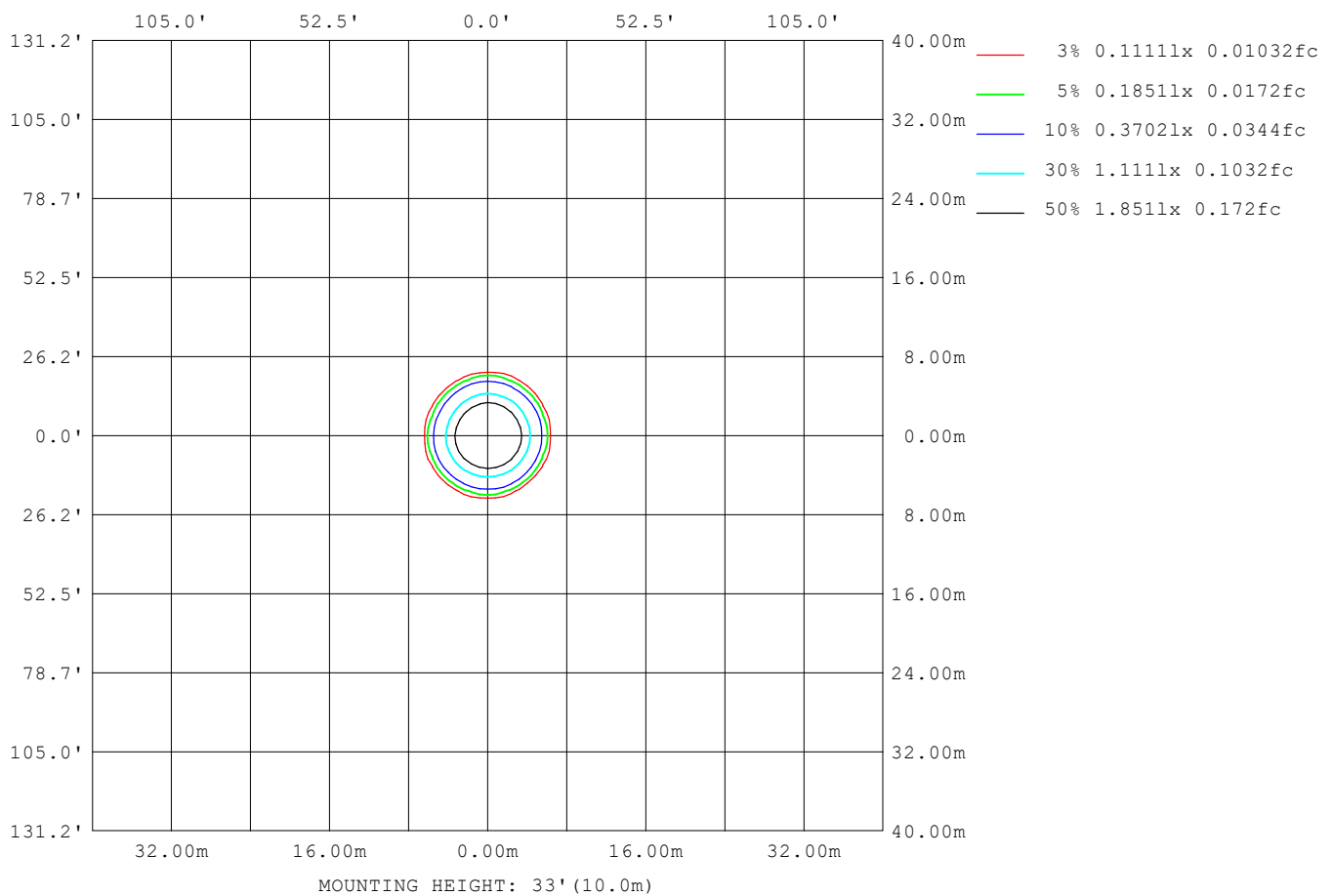
Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: JEFF
Test Date: 02 September 2024

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System: EVERFINE GO-2000A_V1 SYSTEM V2.0.295
Humidity: 65.0%
Test Distance: 7.888m [K=1.0000]
Remarks:

ISOLUX DIAGRAM

Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm		
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOOTLED	WEIGHT:	
SPEC.:	DIM.:	SERIAL No.:1
MFR.: DARKON	SUR.:	Shielding Angle:



C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:JEFF
Test Date:02 September 2024

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.295
Humidity:65.0%
Test Distance:7.888m [K=1.0000]
Remarks:

LED Avg.L Report

Test:U:240.1V I:0.0191A P:3.031W PF:0.6622 Lamp Flux:164.606x1 lm		
NAME: DRAGON EYE_BLK_36 DEG_500mA_3000K 80CRI_WITH SNOOTLED	WEIGHT:	
SPEC.:	DIM.:	SERIAL No.:1
MFR.: DARKON	SUR.:	Shielding Angle:

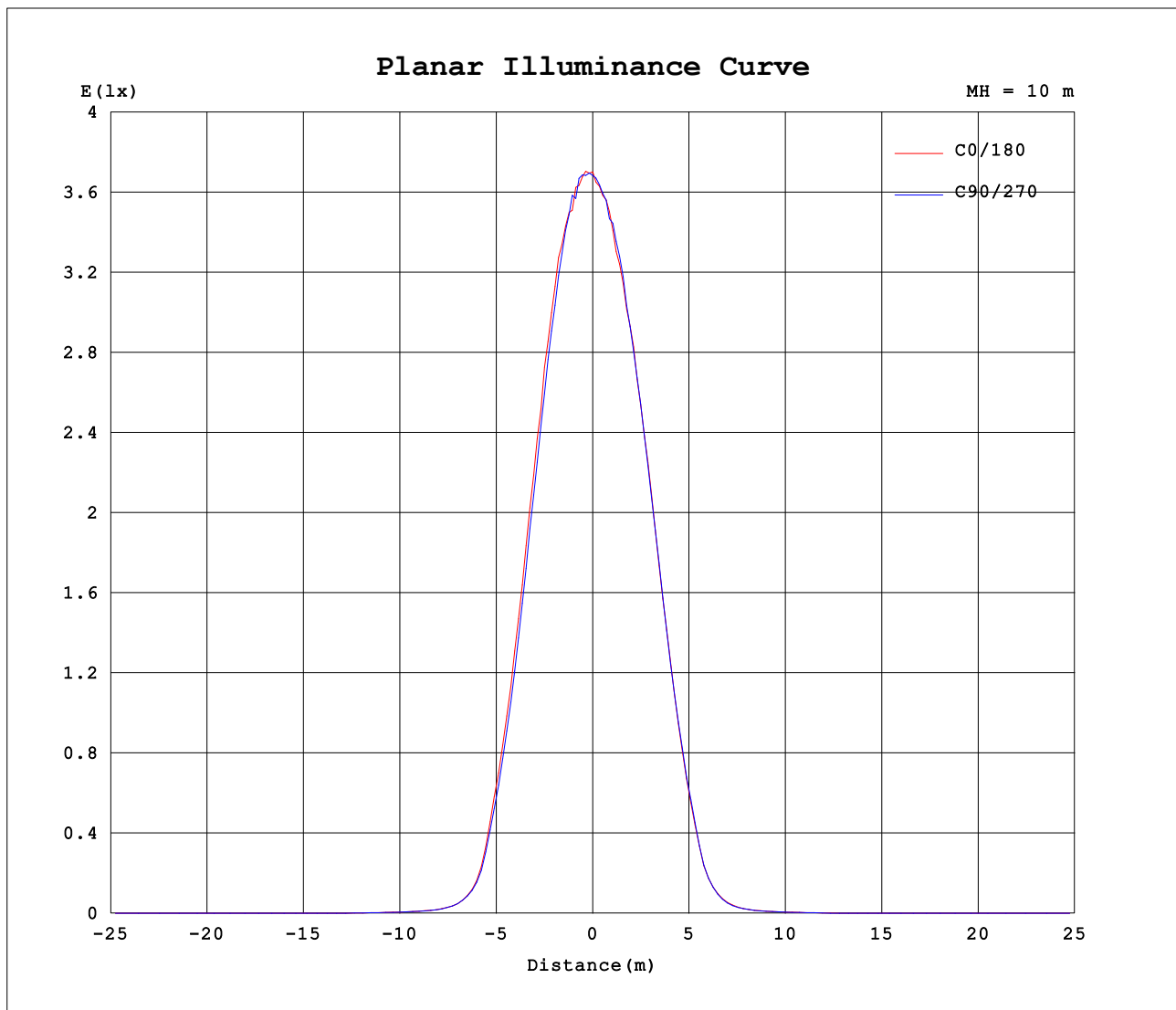
AvgL	cd/m2
L_0~180 (65) av	2116
L_0~180 (75) av	70
L_0~180 (85) av	0
L_90~270 (65) av	1995
L_90~270 (75) av	72
L_90~270 (85) av	0
L_45 (65) av	2064
L_45 (75) av	36
L_45 (85) av	0

Standard: GB/T 29293-2012

C Range: 0 - 360DEG
C Interval: 22.5DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:JEFF
Test Date:02 September 2024

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.295
Humidity:65.0%
Test Distance:7.888m [K=1.0000]
Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG

C Interval: 22.5DEG

Test Speed: HIGH

Temperature: 25.3DEG

Operators: JEFF

Test Date: 02 September 2024

γ Range: 0 - 90DEG

γ Interval: 1.0DEG

Test System: EVERFINE GO-2000A_V1 SYSTEM V2.0.295

Humidity: 65.0%

Test Distance: 7.888m [K=1.0000]

Remarks:

