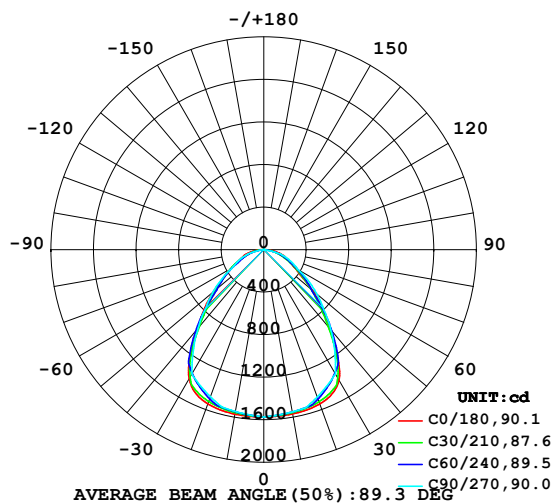


LUMINAIRE PHOTOMETRIC TEST REPORT

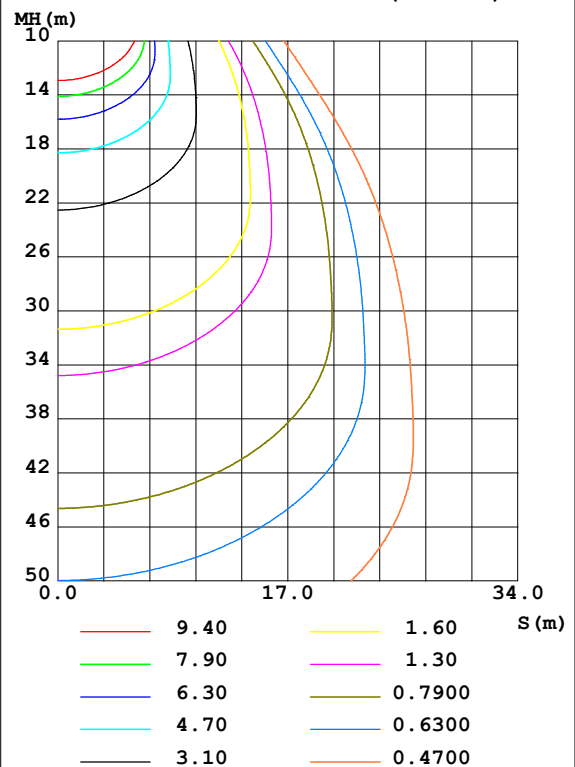
Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm		
NAME: GLM-SPL12030-27W-E (RA90)	TYPE:LED	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: EVERFINE	SUR.:	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA Eff: 122.97 lm/W			
MODEL		I _{max} (cd)	1573	S/MH (C0/180)	1.24
NOMINAL POWER (W)	27	LOR (%)	100.0	S/MH (C90/270)	1.24
RATED VOLTAGE (V)	220.0	TOTAL FLUX (lm)	3427.6	□ UP, DN (C0-180)	0.0, 50.3
NOMINAL FLUX (lm)	3427.59	CIE CLASS	DIRECT	□ UP, DN (C180-360)	0.0, 49.7
LAMPS INSIDE	1	□ up (%)	0.0	CIBSE SHR NOM	1.25
TEST VOLTAGE (V)	220	□ down (%)	100.0	CIBSE SHR MAX	1.30

LUMINOUS INTENSITY DISTRIBUTION DIAGRAM



C0 PLANE ISOLUX DIAGRAM (UNIT:lx)



H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

ZONAL FLUX DIAGRAM

ZONAL FLUX DIAGRAM:

°	C0	C45	C90	C135	C180	C225	C270	C315	°	□ zone	□ total	%lum, lamp
10	1568	1552	1549	1555	1570	1551	1545	1550	0- 10	149.0	149.0	4.35,4.35
20	1544	1521	1474	1525	1543	1518	1471	1515	10- 20	435.1	584.1	17,17
30	1415	1341	1349	1340	1404	1345	1353	1342	20- 30	667.2	1251	36.5,36.5
40	977.6	961.7	982.3	959.0	971.5	971.3	963.7	963.4	30- 40	736.0	1987	58,58
50	598.5	566.5	655.1	575.9	618.5	563.8	626.4	546.7	40- 50	591.0	2578	75.2,75.2
60	331.5	333.8	367.0	346.9	356.0	323.9	341.5	310.2	50- 60	417.3	2996	87.4,87.4
70	219.2	191.4	229.2	207.1	217.5	186.8	209.4	178.2	60- 70	272.0	3268	95.3,95.3
80	109.4	63.88	0	73.65	110.8	60.29	0	58.09	70- 80	143.8	3411	99.5,99.5
90	0	0	0	0	0	0	0	0	80- 90	16.21	3428	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): 2306.4 lm

%lum = 67.3%

%lamp = 67.3%

Conical surface Flux(120deg): 2995.6 lm

%lum = 87.4%

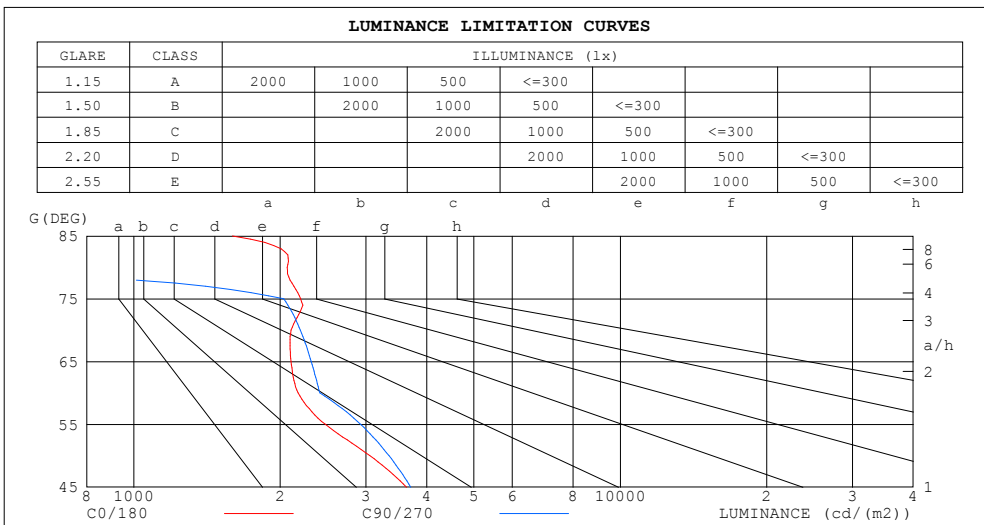
%lamp = 87.4%

H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

LUMINANCE LIMITATION CURVES

Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm		
NAME: GLM-SPL12030-27W-E (RA90)	TYPE:LED	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: EVERFINE	SUR.:	Shielding Angle:



LUMINANCE cd/(m2)		
G (DEG)	C0/180	C90/270
85	1595	0
80	2068	0
75	2201	2034
70	2105	2201
65	2104	2317
60	2177	2411
55	2474	2926
50	3058	3347
45	3639	3712

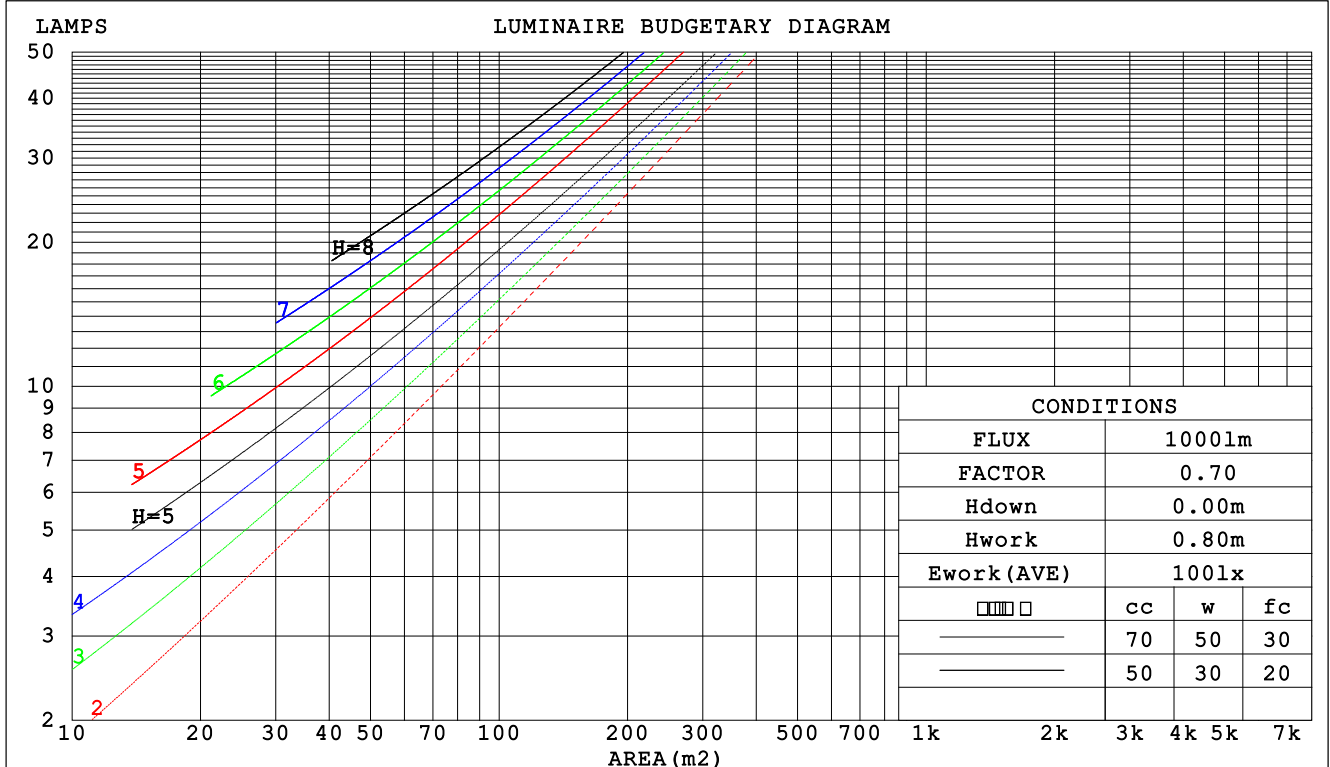
H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm		
NAME: GLM-SPL12030-27W-E (RA90)	TYPE:LED	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: EVERFINE	SUR.:	Shielding Angle:

□cc	80%			70%			50%			30%			10%			0
□w	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
□fc	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio															



H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

WEC AND CCEC

Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm		
NAME: GLM-SPL12030-27W-E (RA90)	TYPE:LED	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: EVERFINE	SUR.:	Shielding Angle:

□cc	80%	70%	50%	30%	10%	0
□w	50% 30% 10%	50% 30% 10%	50% 30% 10%	50% 30% 10%	50% 30% 10%	0
□fc	20%	20%	20%	20%	20%	0
RCR	RCR:Room Cavity Ratio Wall Exitance Coefficients (WEC)					
0.0						
1.0	.261 .148 .047	.254 .145 .046	.241 .138 .044	.229 .132 .042	.218 .126 .041	
2.0	.251 .138 .042	.245 .135 .042	.234 .130 .040	.224 .125 .039	.214 .121 .038	
3.0	.237 .126 .038	.231 .124 .037	.222 .120 .036	.212 .116 .036	.204 .113 .035	
4.0	.222 .115 .034	.217 .114 .034	.208 .110 .033	.200 .107 .032	.192 .105 .032	
5.0	.207 .106 .031	.203 .104 .030	.195 .102 .030	.188 .099 .030	.181 .097 .029	
6.0	.194 .097 .028	.191 .096 .028	.184 .094 .027	.177 .092 .027	.171 .090 .027	
7.0	.182 .090 .026	.179 .089 .025	.173 .087 .025	.167 .086 .025	.162 .084 .025	
8.0	.172 .084 .024	.169 .083 .023	.163 .082 .023	.158 .080 .023	.153 .079 .023	
9.0	.162 .078 .022	.159 .078 .022	.154 .076 .022	.150 .075 .021	.145 .074 .021	
10.0	.153 .073 .020	.151 .073 .020	.146 .072 .020	.142 .071 .020	.138 .069 .020	

□cc	80%	70%	50%	30%	10%	0
□w	50% 30% 10%	50% 30% 10%	50% 30% 10%	50% 30% 10%	50% 30% 10%	0
□fc	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	.177 .157 .138	.151 .134 .119	.104 .092 .082	.060 .053 .048	.019 .017 .015	
2.0	.167 .132 .103	.143 .114 .089	.098 .079 .062	.056 .046 .036	.018 .015 .012	
3.0	.158 .114 .079	.136 .098 .068	.093 .068 .048	.054 .040 .028	.017 .013 .009	
4.0	.150 .100 .062	.129 .087 .054	.089 .060 .038	.051 .035 .023	.016 .012 .007	
5.0	.143 .090 .051	.122 .078 .044	.084 .054 .031	.049 .032 .018	.016 .010 .006	
6.0	.136 .081 .042	.117 .070 .037	.080 .049 .026	.047 .029 .015	.015 .009 .005	
7.0	.129 .074 .035	.111 .064 .031	.077 .045 .022	.045 .027 .013	.014 .009 .004	
8.0	.123 .068 .030	.106 .059 .027	.073 .042 .019	.043 .025 .011	.014 .008 .004	
9.0	.118 .063 .027	.101 .055 .023	.070 .039 .016	.041 .023 .010	.013 .007 .003	
10.0	.112 .059 .024	.097 .051 .021	.067 .036 .015	.039 .021 .009	.013 .007 .003	

H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

UGR(Unified Glare Rating) Table

Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm										
NAME: GLM-SPL12030-27W-E (RA90)					TYPE:LED			WEIGHT:		
SPEC.:					DIM.:			SERIAL No.:1		
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	15.5	16.8	15.7	17.0	17.2	15.9	17.3	16.2	17.5	17.7
3H	16.5	17.8	16.8	18.0	18.2	17.0	18.3	17.3	18.5	18.7
4H	17.0	18.2	17.3	18.4	18.7	17.5	18.7	17.8	18.9	19.2
6H	17.4	18.5	17.7	18.8	19.0	17.5	18.7	17.9	18.9	19.2
8H	17.5	18.6	17.9	18.9	19.2	17.5	18.6	17.8	18.8	19.1
12H	17.6	18.6	17.9	18.9	19.2	17.4	18.5	17.8	18.8	19.1
4H 2H	15.8	17.0	16.1	17.3	17.5	16.2	17.4	16.5	17.6	17.9
3H	17.0	18.1	17.4	18.4	18.7	17.5	18.6	17.9	18.8	19.1
4H	17.6	18.6	18.0	18.9	19.2	18.1	19.1	18.5	19.4	19.7
6H	18.1	19.0	18.5	19.3	19.7	18.2	19.0	18.6	19.4	19.7
8H	18.3	19.1	18.7	19.4	19.8	18.2	18.9	18.6	19.3	19.7
12H	18.4	19.1	18.8	19.5	19.9	18.1	18.8	18.5	19.2	19.6
8H 4H	17.8	18.6	18.2	18.9	19.3	18.2	19.0	18.6	19.4	19.8
6H	18.4	19.0	18.8	19.4	19.9	18.4	19.0	18.8	19.4	19.8
8H	18.6	19.2	19.1	19.6	20.1	18.3	18.9	18.8	19.3	19.7
12H	18.8	19.2	19.2	19.7	20.2	18.3	18.8	18.7	19.2	19.7
12H 4H	17.8	18.5	18.2	18.9	19.3	18.2	18.9	18.7	19.3	19.7
6H	18.4	18.9	18.8	19.4	19.8	18.4	18.9	18.8	19.3	19.8
8H	18.6	19.1	19.1	19.6	20.0	18.3	18.8	18.8	19.2	19.7
Variations with the observer position at spacings:										
S = 1.0H	+ 0.3 / - 0.4					+ 0.4 / - 0.5				
1.5H	+ 0.3 / - 0.3					+ 0.2 / - 0.2				
2.0H	+ 0.8 / - 0.7					+ 0.7 / - 0.7				

CIE Pub.117, 3428 lm Total Lamp Luminous Flux Corrected ($8\log(F/F_0) = 4.3$)

H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

UTILIZATION FACTORS TABLE

Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm		
NAME: GLM-SPL12030-27W-E (RA90)	TYPE:LED	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: EVERFINE	SUR.:	Shielding Angle:

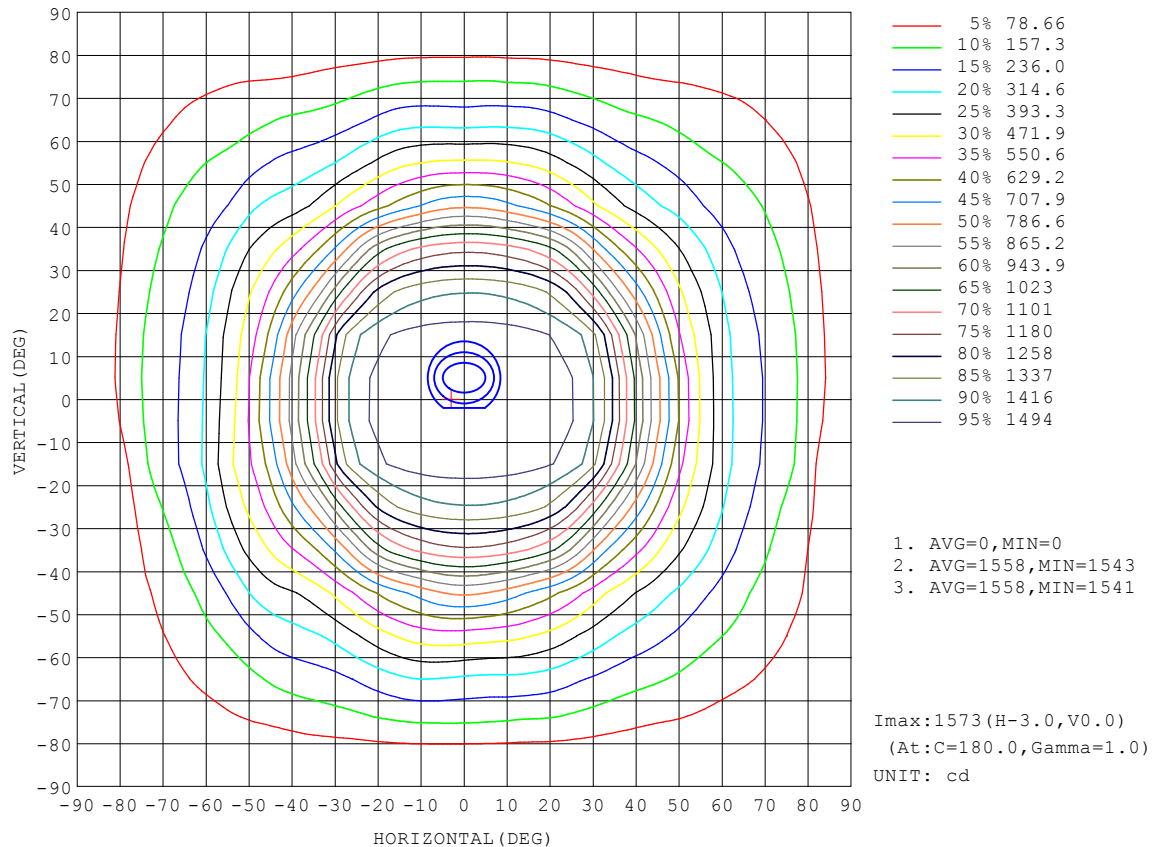
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS (PERCENT) $k(RI) \times RCR = 5$									
$k = 0.60$	65	55	49	65	55	49	64	54	49	43
0.80	75	65	59	74	65	59	73	64	58	52
1.00	83	73	67	82	73	67	80	74	66	60
1.25	89	80	74	88	80	74	86	78	73	67
1.50	94	86	80	92	85	79	89	83	78	72
2.00	100	92	87	98	91	86	95	89	85	78
2.50	103	96	91	101	95	90	97	92	88	81
3.00	106	100	95	103	98	94	100	96	92	84
4.00	109	104	100	107	102	99	103	99	96	88
5.00	111	107	104	109	105	102	104	101	99	90
ROOM INDEX	UF (total)									Direct
According to DIN EN 13032-2 2004			Suspended					SHRNOM = 1.25		

H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

ISOCANDELA DIAGRAM

Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm		
NAME: GLM-SPL12030-27W-E (RA90)	TYPE:LED	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: EVERFINE	SUR.:	Shielding Angle:

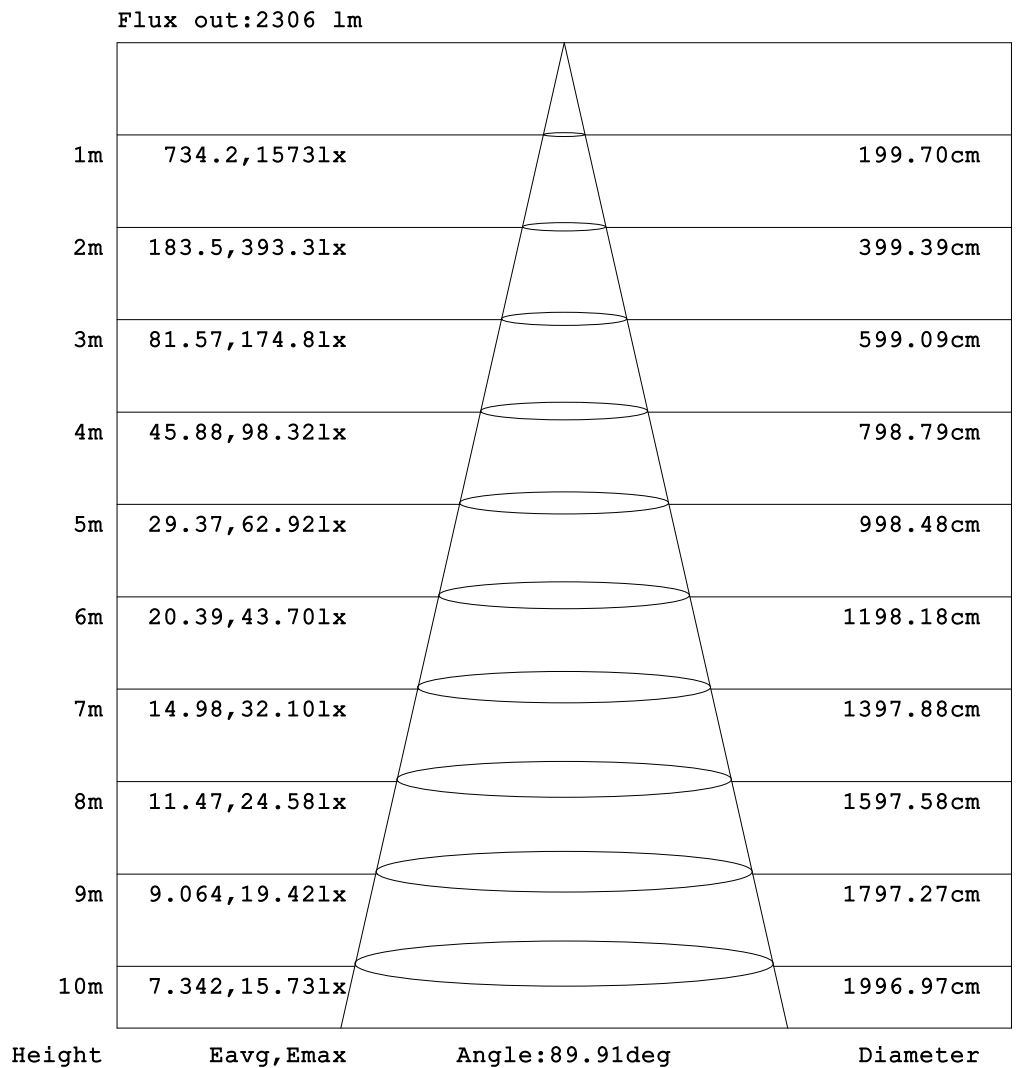


H() Range:-90 - 90DEG
H() Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

AAI Figure

Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm		
NAME: GLM-SPL12030-27W-E (RA90)	TYPE:LED	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: EVERFINE	SUR.:	Shielding Angle:



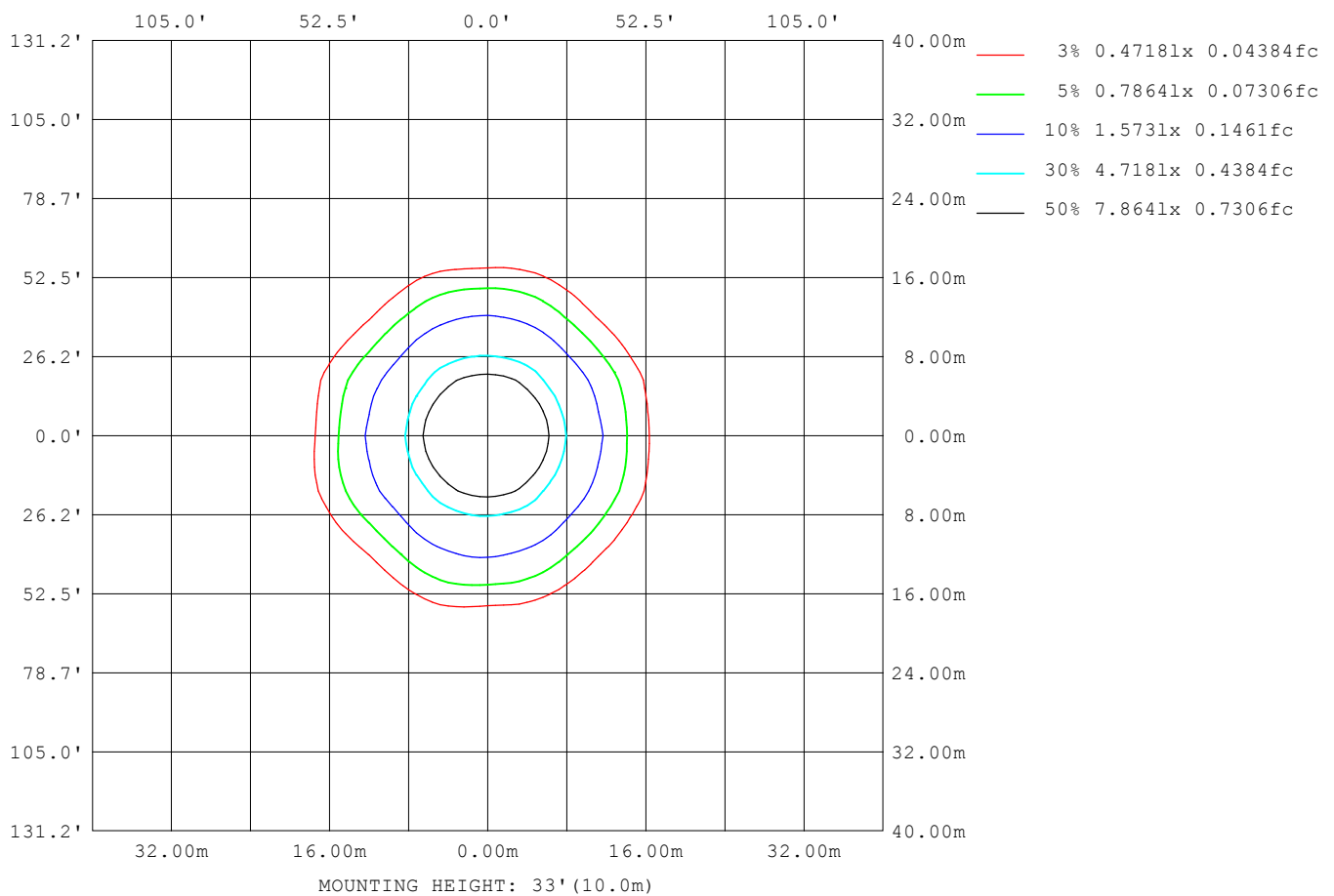
Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

ISOLUX DIAGRAM

Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm		
NAME: GLM-SPL12030-27W-E (RA90)	TYPE:LED	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: EVERFINE	SUR.:	Shielding Angle:



H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

LED Avg.L Report

Test:U:220.23V I:0.1507A P:27.873W PF:0.9569 Freq:50.00Hz Lamp Flux:3427.59x1 lm		
NAME: GLM-SPL12030-27W-E (RA90)	TYPE:LED	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:1
MFR.: EVERFINE	SUR.:	Shielding Angle:

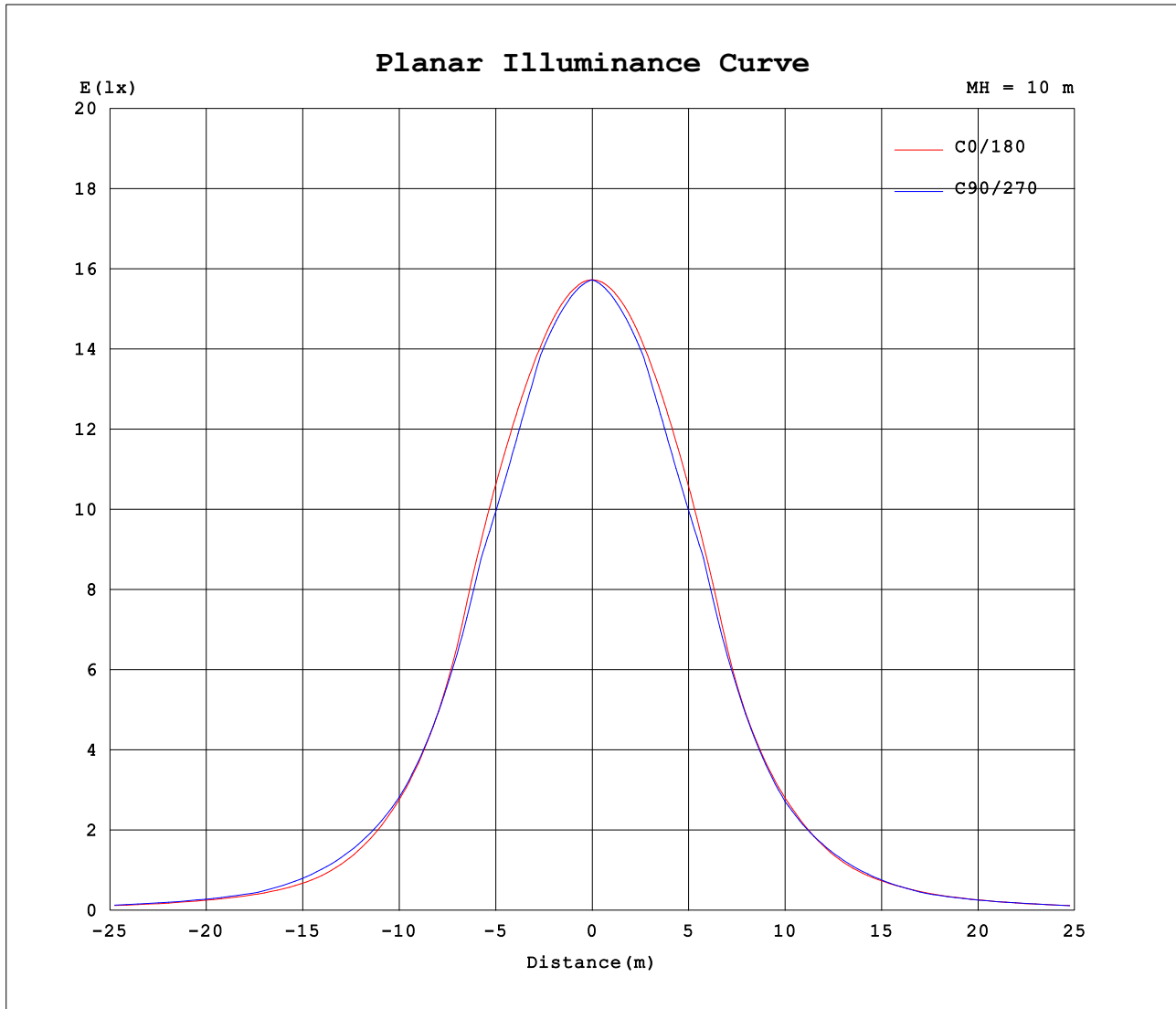
AvgL	cd/m2
L_0~180 (65) av	2116
L_0~180 (75) av	2229
L_0~180 (85) av	1668
L_90~270 (65) av	2229
L_90~270 (75) av	1926
L_90~270 (85) av	0
L_45 (65) av	1981
L_45 (75) av	1660
L_45 (85) av	0

Standard: GB/T 29293-2012

H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

Planar Illuminance Curve



H(□) Range:-90 - 90DEG
H(□) Interval: 1.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2021-08-18

V(B) Range:-75 - 75DEG
V(B) Interval: 5.0DEG
Test System:EVERFINE GO-2000A_V1 SYSTEM V2.0.290
Humidity:65.0%
Test Distance:7.500m [K=1.0267]
Remarks:

