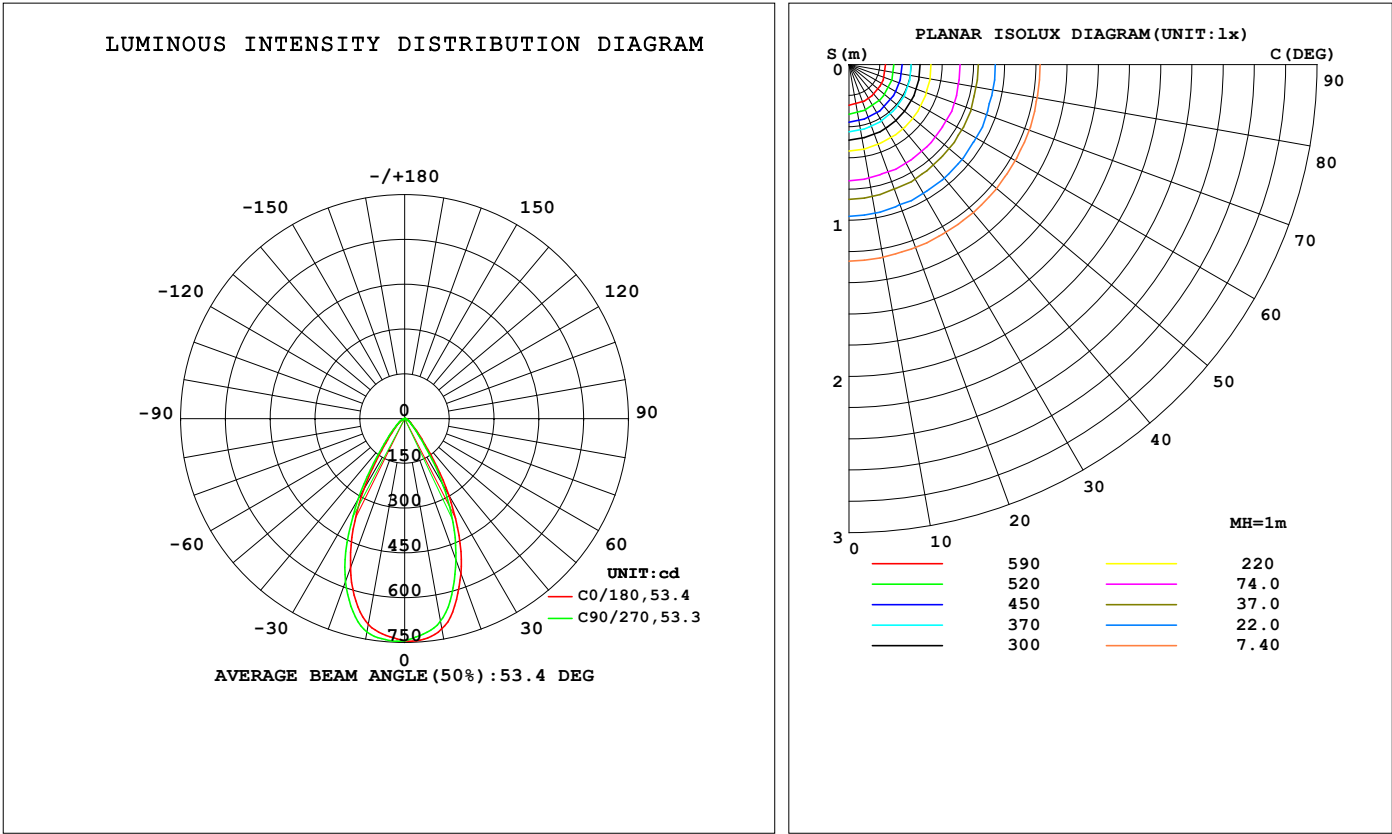


LUMINAIRE PHOTOMETRIC TEST REPORT

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz		
UTHDi:0.17% ITHDi:19.77% KDisp:0.9353 Lamp Flux:618.439x1 lm		
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: Norming lighting	SUR.: 41mm	Shielding Angle:

DATA OF LAMP		PHOTOMETRIC DATA				Eff: 63.21 lm/W
MODEL		Imax (cd)	747.1	S/MH(C0/180)	0.81	
NOMINAL POWER(W)	10	LOR(%)	100.0	S/MH(C90/270)	0.84	
RATED VOLTAGE(V)	240	TOTAL FLUX(lm)	618.44	η UP,DN(C0-180)	0.0,48.2	
NOMINAL FLUX(lm)	618.439	CIE CLASS	DIRECT	η UP,DN(C180-360)	0.0,51.8	
LAMPS INSIDE	1	η up (%)	0.0	CIBSE SHR NOM	0.75	
TEST VOLTAGE(V)	240.4	η down (%)	100.0	CIBSE SHR MAX	0.85	



C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-07-19

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity:65.0%
Test Distance:3.090m [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	715.5	702.0	689.4	691.0	700.6	714.7	726.2	726.7	0- 10	69.33	69.33	11.2,11.2
20	551.4	524.4	503.6	510.6	532.1	561.5	580.3	575.1	10- 20	177.6	246.9	39.9,39.9
30	296.1	276.7	258.8	263.1	274.7	296.2	313.3	310.8	20- 30	189.8	436.8	70.6,70.6
40	90.07	81.67	75.64	76.75	81.91	90.83	97.23	96.61	30- 40	104.5	541.3	87.5,87.5
50	34.03	31.90	30.64	31.36	32.79	35.29	36.52	36.02	40- 50	41.72	583.0	94.3,94.3
60	16.46	15.62	14.83	15.00	15.57	16.90	17.65	17.27	50- 60	21.34	604.4	97.7,97.7
70	6.933	6.382	5.547	6.104	6.400	6.785	6.366	7.139	60- 70	10.63	615.0	99.4,99.4
80	1.596	0.3888	0.1626	0.4442	1.198	0.4479	0.2052	0.5821	70- 80	3.301	618.3	100,100
90	0.0125	0.0067	0.0093	0.0122	0.0122	0.0058	0.0068	0.0084	80- 90	0.1320	618.4	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): 566.22 lm

%lum = 91.6%

%lamp = 91.6%

Conical surface Flux(120deg): 604.37 lm

%lum = 97.7%

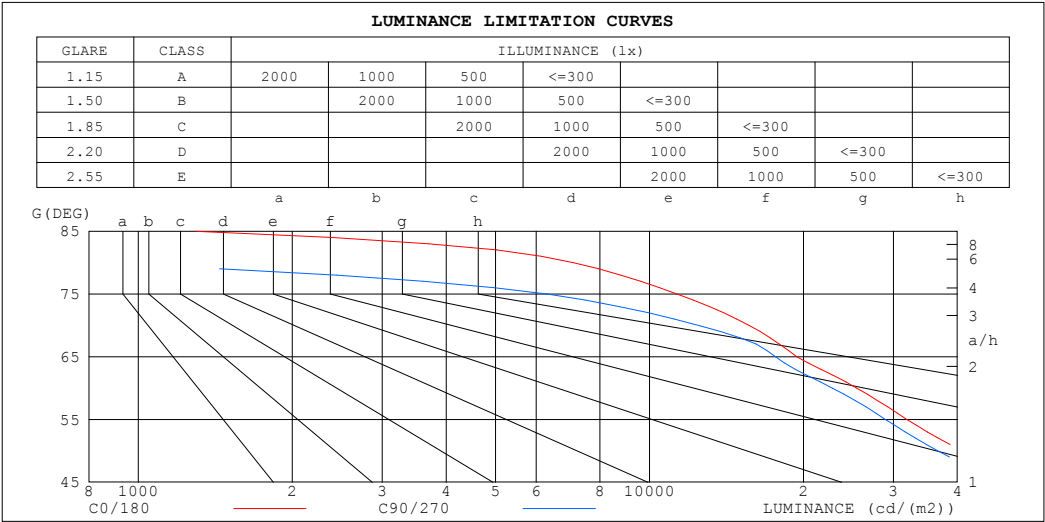
%lamp = 97.7%

C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-07-19

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity:65.0%
Test Distance:3.090m [K=1.0000]
Remarks:

LUMINANCE LIMITATION CURVES

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz		
UTHDi:0.17% ITHDi:19.77% KDisp:0.9353 Lamp Flux:618.439x1 lm		
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: Norming lighting	SUR.: 41mm	Shielding Angle:



LUMINANCE cd/(m2)		
G (DEG)	C0/180	C90/270
85	1296	258
80	7096	720
75	11318	6309
70	15648	12463
65	19410	17641
60	25416	22789
55	31884	28937
50	40865	36635
45	58247	50173

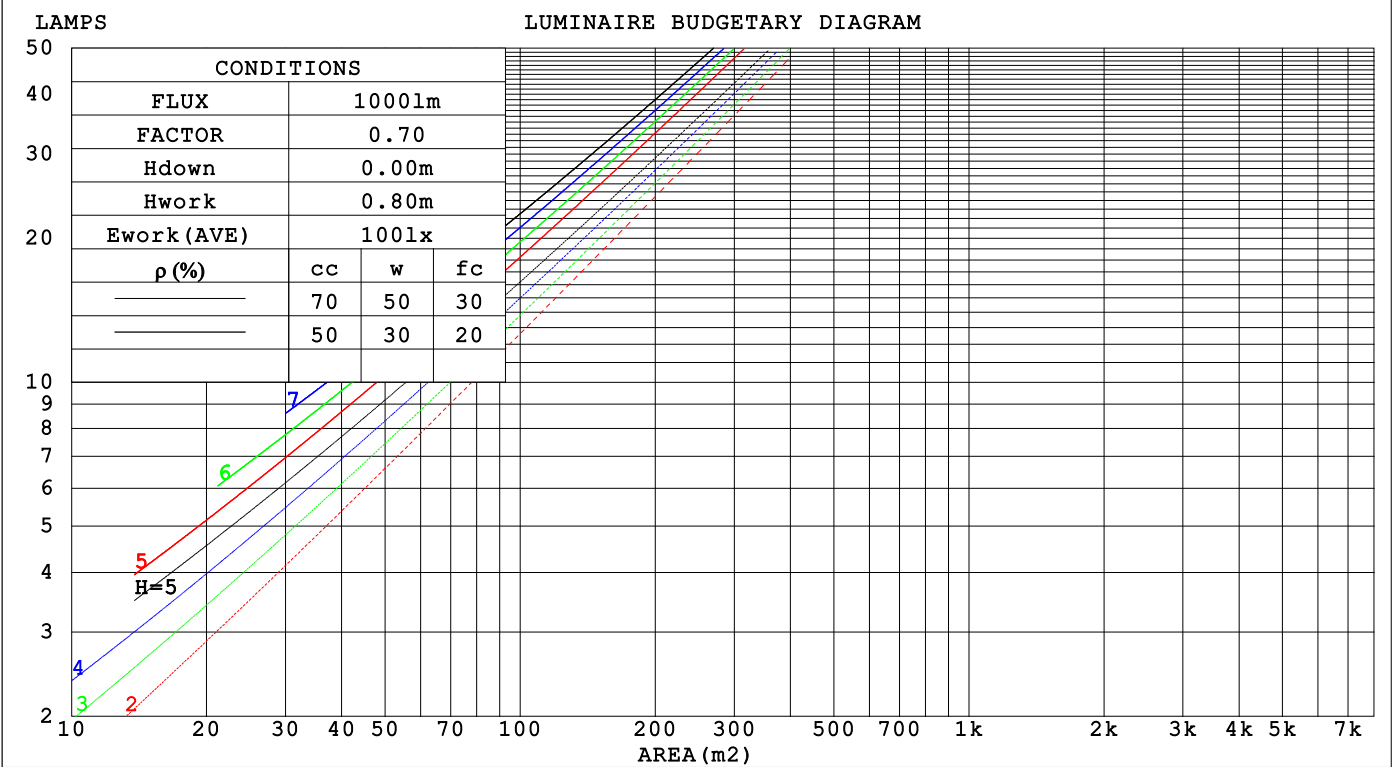
C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-07-19

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity:65.0%
Test Distance:3.090m [K=1.0000]
Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz		
UTHDi:0.17% ITHDi:19.77% KDisp:0.9353		
Lamp Flux:618.439x1 lm		
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: Norming lighting	SUR.: 41mm	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															



C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-07-19

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity:65.0%
Test Distance:3.090m [K=1.0000]
Remarks:

WEC AND CCEC

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz		
UTHDi:0.17% ITHDi:19.77% KDisp:0.9353 Lamp Flux:618.439x1 lm		
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: Norming lighting	SUR.: 41mm	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	.185	.105	.033	.178	.102	.032	.166	.095	.030	.154	.089	.029	.144	.083	.027															
2.0	.178	.097	.030	.172	.095	.029	.161	.090	.028	.152	.085	.027	.143	.081	.025															
3.0	.169	.090	.027	.164	.088	.026	.155	.084	.026	.147	.080	.025	.139	.077	.024															
4.0	.161	.083	.025	.156	.082	.024	.148	.079	.024	.141	.076	.023	.134	.073	.022															
5.0	.152	.078	.023	.149	.076	.022	.142	.074	.022	.135	.071	.021	.129	.069	.021															
6.0	.145	.073	.021	.142	.072	.021	.136	.070	.020	.130	.068	.020	.125	.066	.019															
7.0	.138	.068	.019	.135	.067	.019	.130	.066	.019	.125	.064	.019	.120	.062	.018															
8.0	.132	.064	.018	.129	.064	.018	.124	.062	.018	.120	.061	.018	.116	.059	.017															
9.0	.126	.061	.017	.124	.060	.017	.119	.059	.017	.115	.058	.017	.111	.057	.016															
10.0	.120	.058	.016	.118	.057	.016	.114	.056	.016	.111	.055	.016	.107	.054	.015															

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	.172	.157	.144	.147	.135	.124	.100	.093	.086	.058	.054	.050	.019	.017	.016	
2.0	.157	.132	.112	.135	.114	.097	.092	.079	.067	.053	.046	.040	.017	.015	.013	
3.0	.145	.114	.089	.124	.098	.077	.085	.068	.054	.049	.040	.032	.016	.013	.010	
4.0	.135	.099	.072	.116	.086	.062	.080	.060	.044	.046	.035	.026	.015	.011	.009	
5.0	.126	.087	.059	.109	.076	.051	.075	.053	.036	.043	.031	.021	.014	.010	.007	
6.0	.119	.078	.049	.102	.068	.043	.071	.047	.030	.041	.028	.018	.013	.009	.006	
7.0	.112	.071	.041	.097	.061	.036	.067	.043	.026	.039	.025	.015	.013	.008	.005	
8.0	.107	.065	.036	.092	.056	.031	.064	.039	.022	.037	.023	.013	.012	.008	.004	
9.0	.102	.059	.031	.087	.052	.027	.061	.036	.019	.035	.021	.011	.011	.007	.004	
10.0	.097	.055	.027	.083	.048	.024	.058	.034	.017	.034	.020	.010	.011	.007	.003	

C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-07-19

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity:65.0%
Test Distance:3.090m [K=1.0000]
Remarks:

UGR(Unified Glare Rating) Table

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz										
UTHDi:0.17% ITHDi:19.77% KDisp:0.9353					Lamp Flux:618.439x1 lm					
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX					TYPE:			WEIGHT:		
SPEC.:					DIM.:			SERIAL No.:		
MFR.: Norming lighting					SUR.: 41mm			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	22.3	23.2	22.5	23.4	23.6	21.7	22.7	21.9	22.8	23.0
3H	22.4	23.3	22.7	23.5	23.7	21.8	22.7	22.1	22.9	23.1
4H	22.4	23.3	22.7	23.5	23.7	21.8	22.6	22.1	22.9	23.1
6H	22.4	23.2	22.7	23.4	23.7	21.7	22.5	22.0	22.8	23.0
8H	22.4	23.1	22.7	23.4	23.7	21.7	22.4	22.0	22.7	23.0
12H	22.3	23.1	22.6	23.3	23.6	21.6	22.4	21.9	22.6	22.9
4H 2H	22.2	23.1	22.5	23.3	23.5	21.7	22.5	22.0	22.8	23.0
3H	22.5	23.2	22.8	23.5	23.8	21.9	22.6	22.2	22.9	23.2
4H	22.5	23.2	22.9	23.5	23.8	21.9	22.6	22.2	22.9	23.2
6H	22.5	23.1	22.9	23.4	23.8	21.8	22.4	22.2	22.7	23.1
8H	22.5	23.0	22.8	23.3	23.7	21.8	22.3	22.2	22.7	23.0
12H	22.4	22.9	22.8	23.3	23.7	21.7	22.2	22.1	22.6	23.0
8H 4H	22.4	23.0	22.8	23.3	23.7	21.8	22.4	22.2	22.7	23.1
6H	22.4	22.8	22.8	23.2	23.7	21.7	22.2	22.2	22.6	23.0
8H	22.4	22.8	22.8	23.2	23.6	21.7	22.1	22.1	22.5	22.9
12H	22.3	22.6	22.8	23.1	23.6	21.6	22.0	22.1	22.4	22.9
12H 4H	22.4	22.9	22.8	23.2	23.6	21.8	22.3	22.2	22.6	23.0
6H	22.3	22.7	22.8	23.2	23.6	21.7	22.1	22.1	22.5	22.9
8H	22.3	22.6	22.8	23.1	23.6	21.6	22.0	22.1	22.4	22.9
Variations with the observer position at spacings(CIE Pub.117):										
S = 1.0H	+ 1.9 / - 2.3					+ 1.6 / - 2.3				
1.5H	+ 3.1 / - 1.7					+ 2.6 / - 1.6				
2.0H	+ 2.6 / - 2.0					+ 2.2 / - 1.9				

CIE Pub.117, 618.4 lm Total Lamp Luminous Flux Corrected ($8\log(F/F_0) = -1.7$)
Area: 0.0013 m²

C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-07-19

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity:65.0%
Test Distance:3.090m [K=1.0000]
Remarks:

UTILIZATION FACTORS TABLE

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz		
UTHDi:0.17% ITHDi:19.77% KDisp:0.9353 Lamp Flux:618.439x1 lm		
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: Norming lighting	SUR.: 41mm	Shielding Angle:

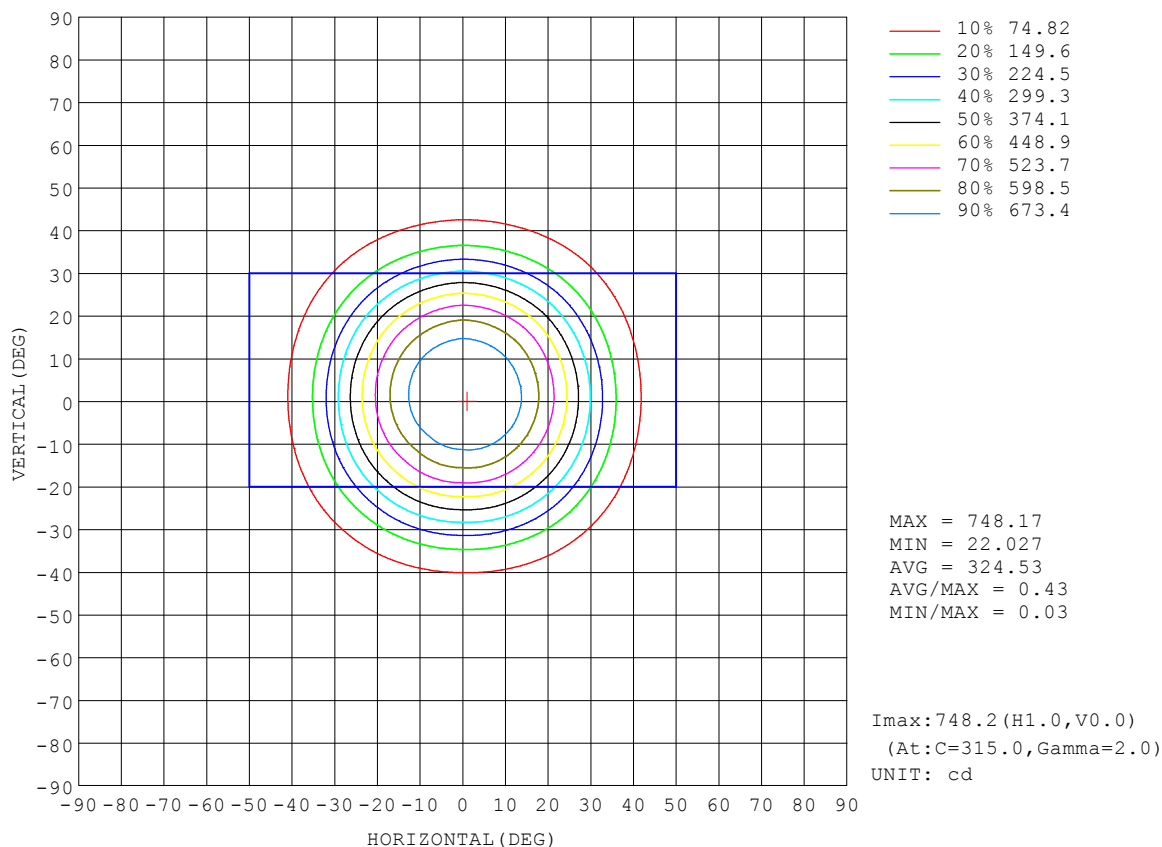
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS (PERCENT) $k(RI) \times RCR = 5$									
$k = 0.60$	84	77	73	83	77	72	82	76	72	68
0.80	92	85	81	91	85	81	90	84	80	76
1.00	97	90	86	96	90	86	94	90	86	81
1.25	101	95	92	100	95	91	98	94	90	86
1.50	104	99	95	103	98	95	101	97	94	89
2.00	107	103	99	106	102	98	103	100	97	91
2.50	109	105	102	108	104	101	104	101	99	93
3.00	111	107	104	109	106	103	106	103	101	94
4.00	113	110	108	111	108	106	107	105	104	96
5.00	114	112	110	112	110	108	108	107	105	98
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: DAMIN
Test Date: 2024-07-19

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
 γ Test System: EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity: 65.0%
Test Distance: 3.090m [K=1.0000]
Remarks:

ISOCANDELA DIAGRAM

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz		
UTHDi:0.17% ITHDi:19.77% KDisp:0.9353 Lamp Flux:618.439x1 lm		
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: Norming lighting	SUR.: 41mm	Shielding Angle:

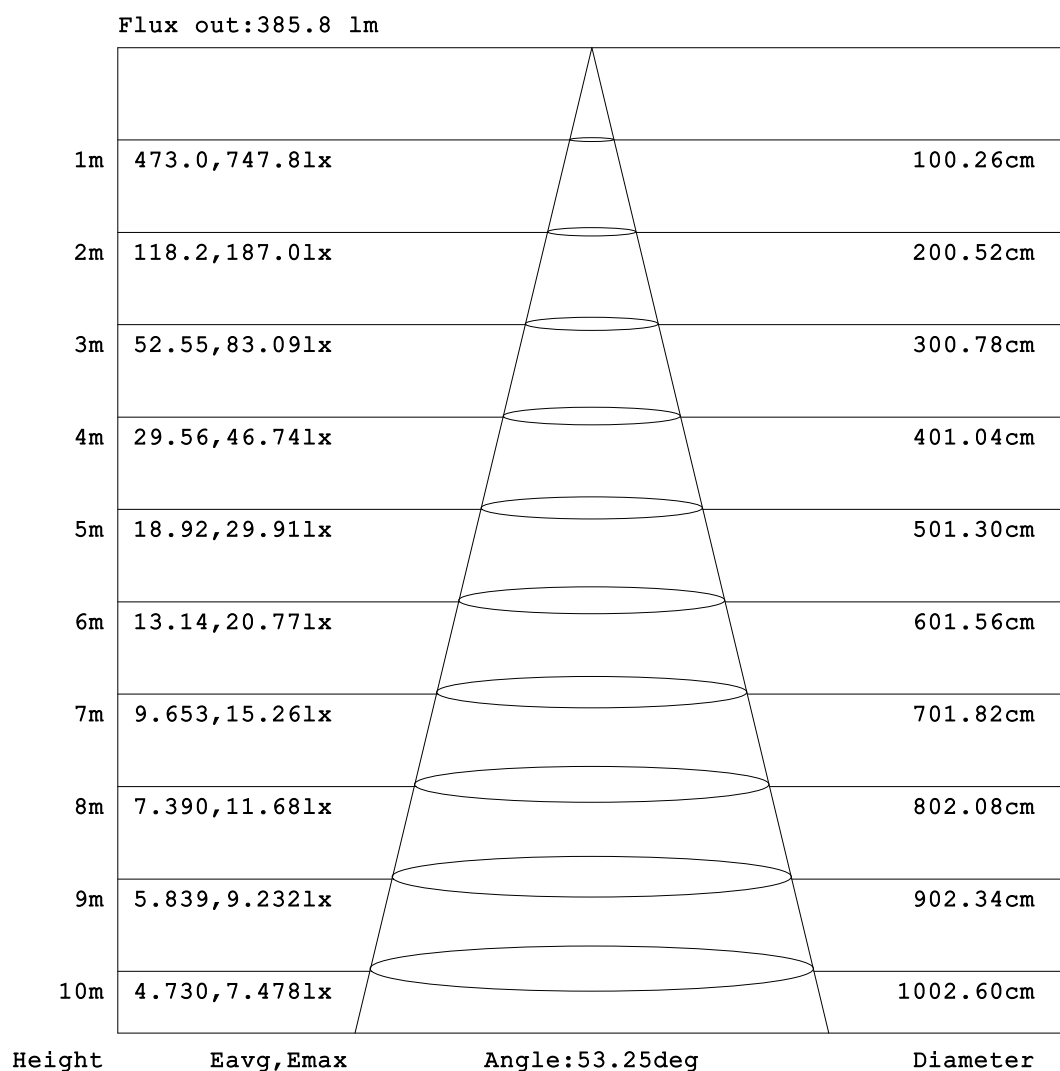


C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: DAMIN
Test Date: 2024-07-19

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity: 65.0%
Test Distance: 3.090m [K=1.0000]
Remarks:

AAI Figure

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz		
UTHDi:0.17% ITHDi:19.77% KDisp:0.9353 Lamp Flux:618.439x1 lm		
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: Norming lighting	SUR.: 41mm	Shielding Angle:

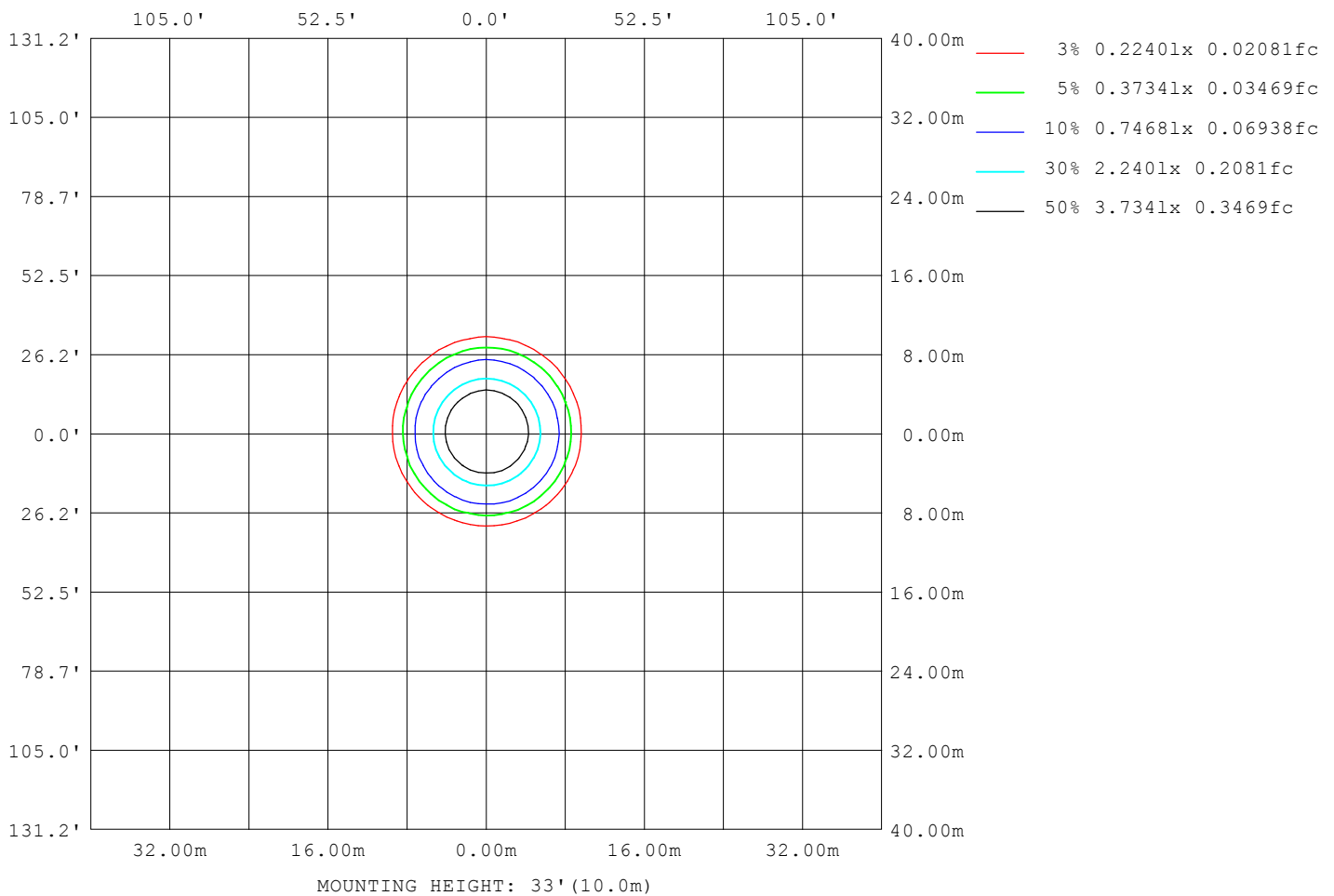


C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-07-19

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System:EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity:65.0%
Test Distance:3.090m [K=1.0000]
Remarks:

ISOLUX DIAGRAM

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz		
UTHDi:0.17% ITHDi:19.77% KDisp:0.9353 Lamp Flux:618.439x1 lm		
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: Norming lighting	SUR.: 41mm	Shielding Angle:



C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: DAMIN
Test Date: 2024-07-19

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity: 65.0%
Test Distance: 3.090m [K=1.0000]
Remarks:

LED Avg.L Report

Test:U:240.4V I:0.0444A P:9.8W PF:0.9171 Freq:49.99Hz UTHDi:0.17% ITHDi:19.77% KDisp:0.9353 Lamp Flux:618.439x1 lm		
NAME: DL56-10-XX-01 2700K RA98 60D MAX DX	TYPE:	WEIGHT:
SPEC.:	DIM.:	SERIAL No.:
MFR.: Norming lighting	SUR.: 41mm	Shielding Angle:

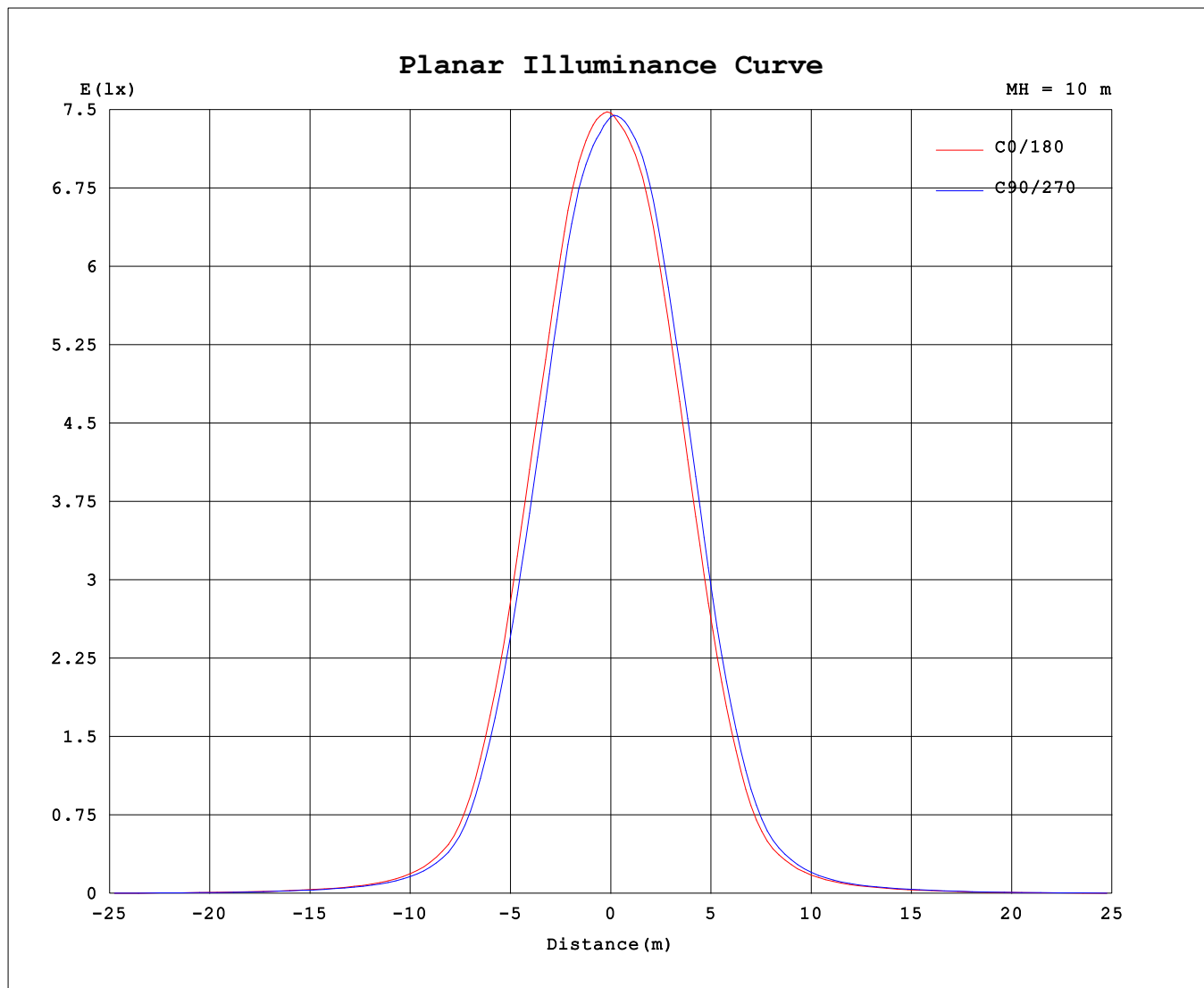
AvgL	cd/m2
L_0~180 (65) av	18904
L_0~180 (75) av	10598
L_0~180 (85) av	938
L_90~270 (65) av	19175
L_90~270 (75) av	6820
L_90~270 (85) av	209
L_45 (65) av	19014
L_45 (75) av	8821
L_45 (85) av	62

Standard: GB/T 29293-2012

C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:DAMIN
Test Date:2024-07-19

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity:65.0%
Test Distance:3.090m [K=1.0000]
Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: DAMIN
Test Date: 2024-07-19

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity: 65.0%
Test Distance: 3.090m [K=1.0000]
Remarks:

```

γ Range: 0 - 90DEG
γ Interval: 1.0DEG
Test System:EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity:65.0%
Test Distance:3.090m [K=1.0000]
Remarks:

```

Photometric Data Table [cd]

G/C	0.0	45.0	90.0	135.0	180.0	225.0	270.0	315.0
0.0	744.1	744.1	744.1	744.1	744.1	744.1	744.1	744.1
3.0	744.6	739.0	731.7	731.2	734.8	740.7	745.8	746.9
6.0	738.3	731.3	719.6	718.8	724.5	732.1	741.0	743.4
9.0	723.6	711.3	700.6	700.0	708.9	721.3	732.0	732.5
12.0	695.9	678.3	664.1	667.1	678.8	696.8	708.9	707.3
15.0	649.1	627.9	610.1	615.2	633.0	654.4	669.6	666.5
18.0	591.7	565.7	547.6	553.6	576.0	601.5	618.6	614.4
21.0	530.1	500.5	480.9	487.8	508.1	538.3	559.0	553.8
24.0	458.1	429.5	409.3	416.1	435.1	463.1	485.9	481.1
27.0	376.1	351.3	333.0	339.0	354.3	378.4	398.5	395.4
30.0	296.1	276.7	258.8	263.1	274.7	296.2	313.3	310.8
33.0	217.8	203.4	186.9	188.6	198.2	217.4	231.4	230.0
36.0	147.8	137.6	123.9	124.5	132.6	147.5	159.9	157.3
39.0	99.48	91.34	84.12	85.08	91.16	100.1	109.0	106.7
42.0	72.96	66.38	61.85	62.84	67.21	73.83	79.18	78.48
45.0	53.35	48.87	46.16	47.10	50.03	54.32	57.63	57.11
48.0	40.15	37.25	35.59	36.41	38.29	41.33	43.19	42.77
51.0	31.55	29.65	28.51	29.17	30.45	32.78	33.86	33.32
54.0	25.41	24.11	23.15	23.64	24.67	26.62	27.37	26.78
57.0	20.61	19.60	18.77	19.07	19.87	21.46	22.22	21.67
60.0	16.46	15.62	14.83	15.00	15.57	16.90	17.65	17.27
63.0	12.71	11.96	11.38	11.44	11.92	12.82	13.56	13.35
66.0	9.850	9.303	8.969	8.997	9.365	10.03	10.43	10.31
69.0	7.642	7.154	6.426	6.796	7.102	7.617	7.358	7.952
72.0	5.586	4.836	3.989	4.697	5.085	5.125	4.574	5.494
75.0	3.795	2.852	2.125	2.782	3.337	2.952	2.465	3.287
78.0	2.365	1.177	0.6616	1.219	1.962	1.251	0.8208	1.522
81.0	1.245	0.1442	0.0903	0.1679	0.8485	0.1625	0.1004	0.2529
84.0	0.3222	0.0115	0.0329	0.0113	0.1207	0.0111	0.0206	0.0151
87.0	0.0202	0.0093	0.0219	0.0064	0.0172	0.0032	0.0151	0.0064
90.0	0.0125	0.0067	0.0093	0.0122	0.0122	0.0058	0.0068	0.0084

C Range: 0 - 360DEG
C Interval: 45.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators: DAMIN
Test Date: 2024-07-19

γ Range: 0 - 90DEG
 γ Interval: 1.0DEG
Test System: EVERFINE GO-SPEX500_V1 SYSTEM V2.00.453
Humidity: 65.0%
Test Distance: 3.090m [K=1.0000]
Remarks: