
革星

Client:

LumCAT: LNS-4-26-MVD-830/40/50

Luminaire: LED灯具

Report No:

Ballast type:

Test No:

Voltage(V): 120.050

LampCAT:

Current(A): 0.199

Lamp flux(lm): 3731.7

Power (W): 23.470

Number of Lamps: 1

PF: 0.984

Length(mm): 1200

Width(mm): 85

Phm Type: C

Height(mm): 60

Photometric Results

Lumens(lm): 3731.65, Efficiency(%): 100.00% , Luminous Efficacy(lm/W): 159.00

Central intensity(cd): 1104.889, Maximum intensity(cd): 1104.889

Angle of maximum intensity: C=0.0 γ =0.0

Beam Angle(50%Imax): [C0/180]Total=126.4

[C90/270]Total=99.6

Field angle(10%Imax): [C0/180]Total=216.4

[C90/270]Total=154.4

Maximum s/h(1/2): C0_180=1.31 C90_270=1.19

Maximum s/h(1/4): C0_180=1.44 C90_270=1.29

Up flux rate of lamp(%): 8.64%

Down flux rate of lamp(%): 91.36%

Up flux rate of LUM(%): 8.64%

Down flux rate of LUM(%): 91.36%

CIE Type : Direct lighting

Output flux ratio in π solid angle : 66.562%

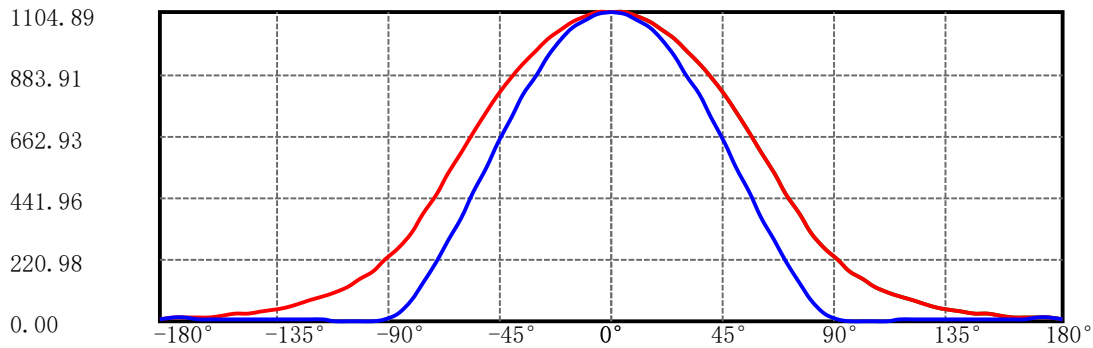
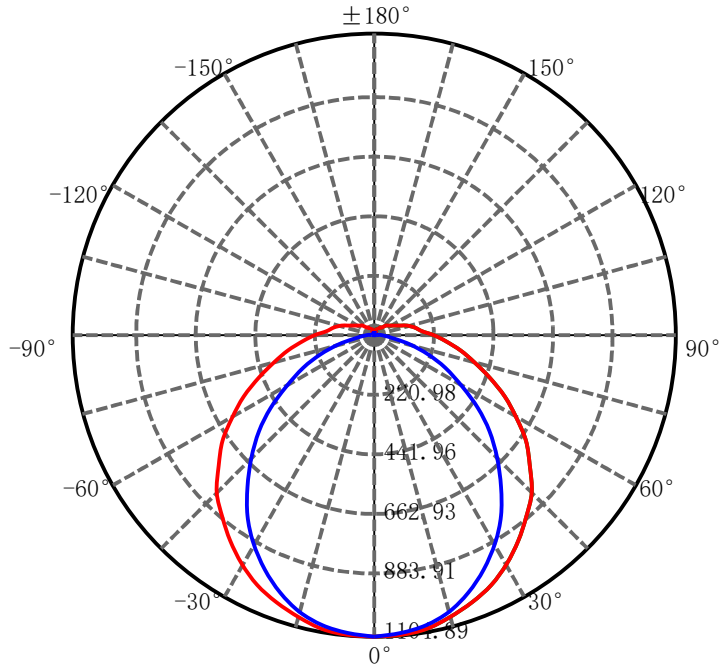
γ (°)	Average I(cd)	Zonal F(1m)	Sum F(1m)	Eff Flux(%)	Eff Sum(%)
0.0	1104.889	0.000	0	0.00%	0.00%
5.0	1099.362	26.351	26.351	0.71%	0.71%
10.0	1084.262	78.115	104.466	2.09%	2.80%
15.0	1058.561	127.111	231.577	3.41%	6.21%
20.0	1026.771	171.861	403.438	4.61%	10.81%
25.0	981.078	210.586	614.024	5.64%	16.45%
30.0	928.878	241.707	855.731	6.48%	22.93%
35.0	868.432	264.667	1120.397	7.09%	30.02%
40.0	802.866	278.843	1399.24	7.47%	37.50%
45.0	733.244	284.423	1683.664	7.62%	45.12%
50.0	656.755	280.870	1964.533	7.53%	52.65%
55.0	580.058	268.924	2233.458	7.21%	59.85%
60.0	503.190	250.390	2483.847	6.71%	66.56%
65.0	425.172	225.687	2709.534	6.05%	72.61%
70.0	352.731	196.970	2906.504	5.28%	77.89%
75.0	287.754	167.413	3073.917	4.49%	82.37%
80.0	227.797	137.947	3211.864	3.70%	86.07%
85.0	178.333	110.355	3322.219	2.96%	89.03%
90.0	139.705	87.081	3409.301	2.33%	91.36%
95.0	111.073	68.665	3477.966	1.84%	93.20%
100.0	89.022	54.371	3532.336	1.46%	94.66%
105.0	72.150	43.125	3575.461	1.16%	95.81%
110.0	59.280	34.354	3609.815	0.92%	96.74%
115.0	48.940	27.402	3637.217	0.73%	97.47%
120.0	40.941	21.850	3659.067	0.59%	98.05%
125.0	34.415	17.418	3676.486	0.47%	98.52%
130.0	28.871	13.760	3690.246	0.37%	98.89%
135.0	24.458	10.776	3701.022	0.29%	99.18%
140.0	20.876	8.394	3709.416	0.22%	99.40%
145.0	17.897	6.469	3715.885	0.17%	99.58%
150.0	15.559	4.927	3720.812	0.13%	99.71%
155.0	13.791	3.714	3724.526	0.10%	99.81%
160.0	12.397	2.747	3727.273	0.07%	99.88%
165.0	11.608	1.978	3729.251	0.05%	99.94%
170.0	11.309	1.359	3730.611	0.04%	99.97%
175.0	11.840	0.828	3731.439	0.02%	99.99%
180.0	6.092	0.214	3731.653	0.01%	100.00%

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixt
0-30	855.73	22.93%	22.93%
0-40	1399.24	37.50%	37.50%
0-60	2483.85	66.56%	66.56%
0-90	3409.30	91.36%	91.36%
0-120	3659.07	98.05%	98.05%
0-180	3731.65	100.00%	100.00%
60-90	925.45	24.80%	24.80%
90-120	249.77	6.69%	6.69%
90-130	280.95	7.53%	7.53%
90-150	311.51	8.35%	8.35%
90-180	322.14	8.63%	8.63%
0-72.35	2985.32	80.00%	80.00%

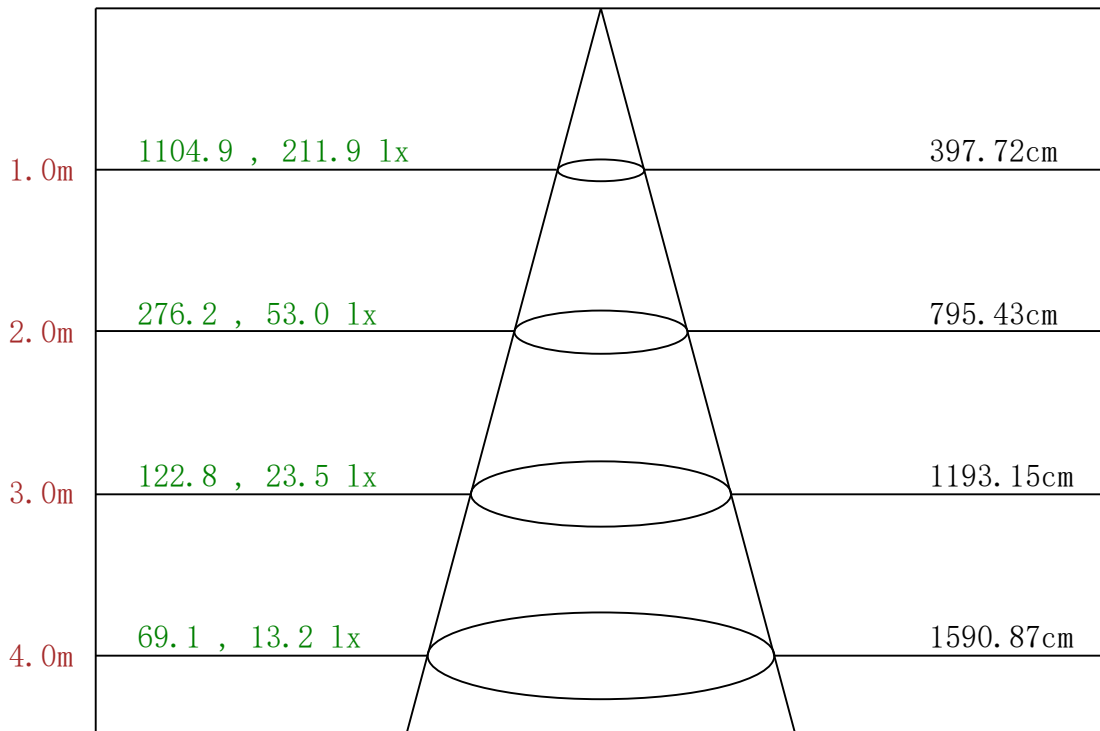
ZONAL LUMEN SUMMARY

0-10	104.47
10-20	298.97
20-30	452.29
30-40	543.51
40-50	565.29
50-60	519.31
60-70	422.66
70-80	305.36
80-90	197.44
90-100	123.04
100-110	77.48
110-120	49.25
120-130	31.18
130-140	19.17
140-150	11.40
150-160	6.46
160-170	3.34
170-180	0.83

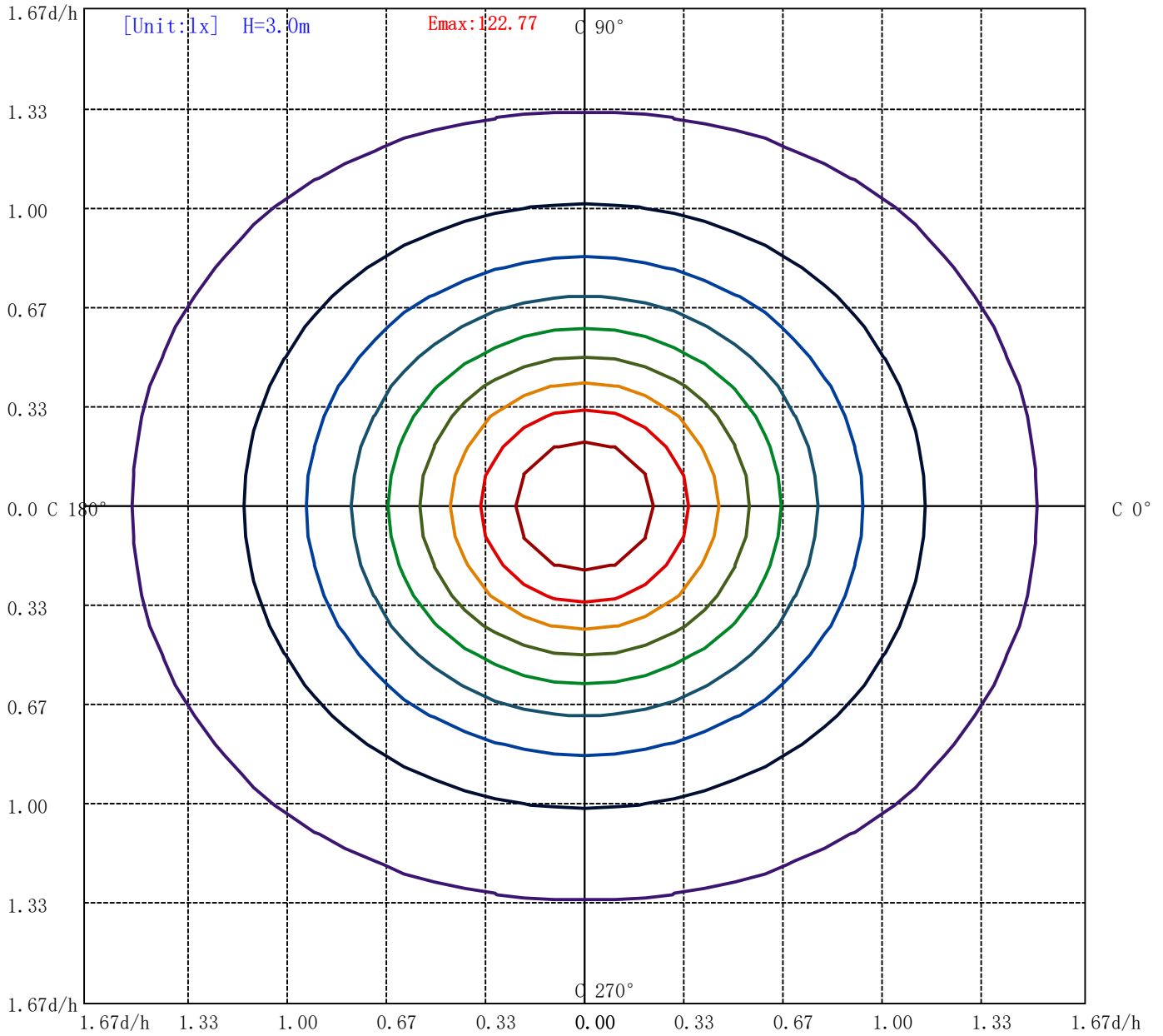


C0(Max): ———
 C0/C180: ———
 C90/C270: ———

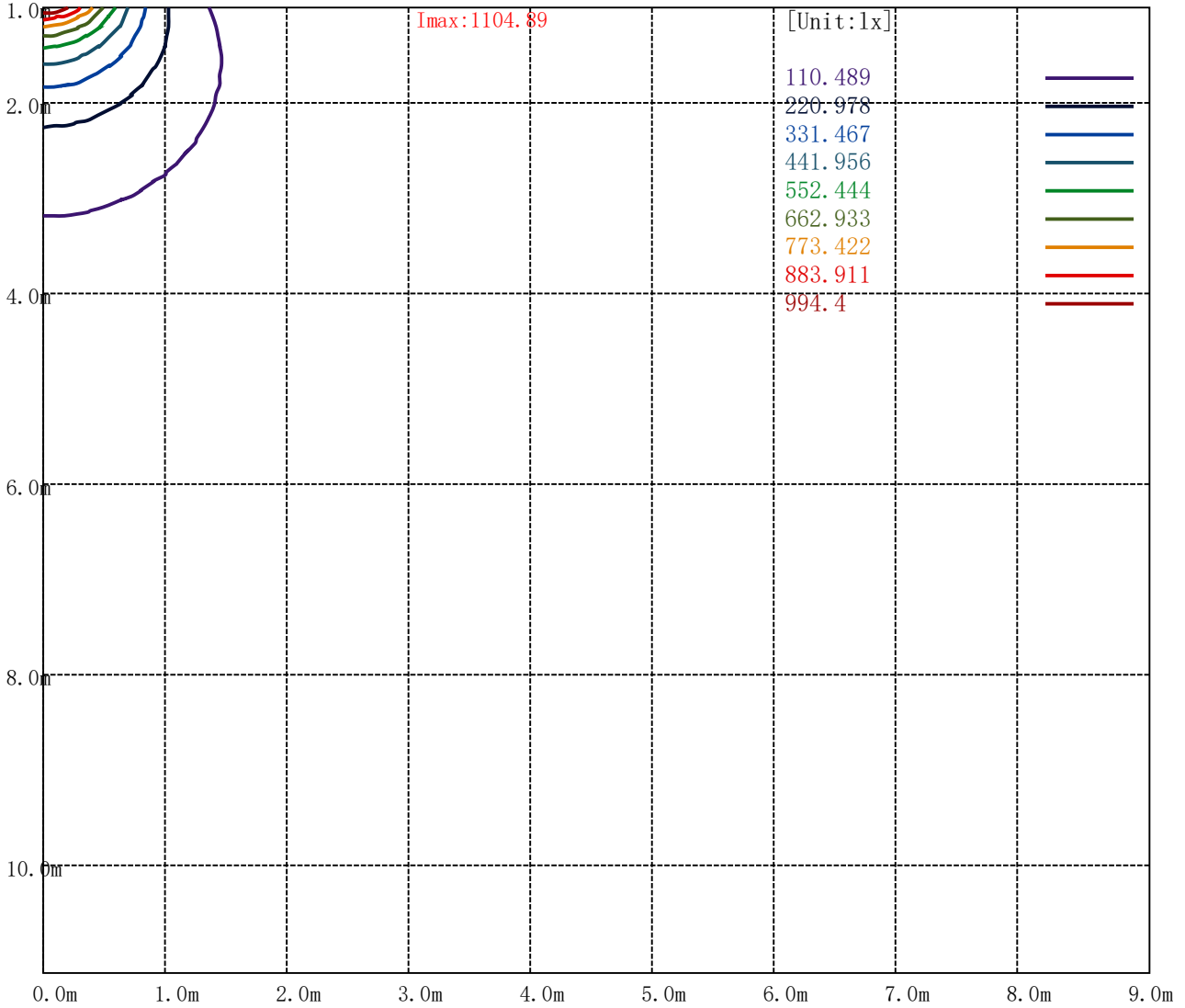
Field angle(10%Imax):C0/180Left:108.2 Right:108.2
 :C90/270Left:77.2 Right:77.2
 Beam Angle(50%Imax):C0/180Left:63.2 Right:63.2
 :C90/270Left:49.8 Right:49.8



Max , Ave Beam angle of C0 plane 126.61



(10%Emax)	12.27656	
(20%Emax)	24.55311	
(30%Emax)	36.82967	
(40%Emax)	49.10611	
(50%Emax)	61.38266	
(60%Emax)	73.65922	
(70%Emax)	85.93578	
(80%Emax)	98.21233	
(90%Emax)	110.4889	



Luminance Table

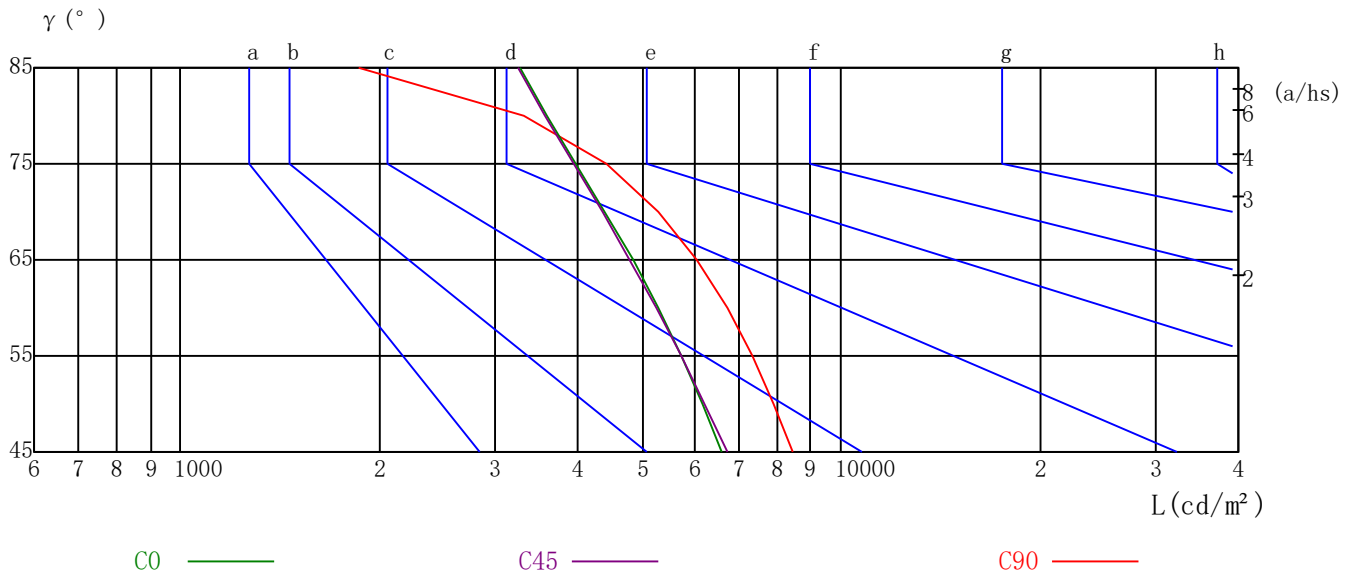
γ	45	50	55	60	65	70	75	80	85
C0	6593	6175	5746	5300	4850	4396	3975	3597	3276
C45	6751	6217	5745	5262	4795	4354	3940	3563	3249
C90	8435	7906	7370	6737	6051	5297	4420	3316	1864

L(Hor) (65)	L(Ver) (65)	L45 (65)	L(Hor) (75)	L(Ver) (75)	L45 (75)	L(Hor) (85)	L(Ver) (85)	L45 (85)
12193	6699	10290	14448	5245	11799	29712	2930	23096

Glare Table

Glare	Quality	Service Values Illuminance(lx)							
1.15	A	2000	1000	500	<=300				
1.5	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.2	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300
		a	b	c	d	e	f	g	h

Luminance Limiting Curve



RHOCC	80			70			50			30			10			0
RHOW	50	30	10	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR	COEFFICIENTS OF UTILIZATION RHOF=20 CU															
0	1.17	1.17	1.17	1.13	1.13	1.13	1.06	1.06	1.06	1.00	1.00	1.00	0.94	0.94	0.94	0.91
1	1.00	0.95	0.90	0.96	0.92	0.88	0.91	0.87	0.84	0.85	0.82	0.80	0.80	0.78	0.76	0.73
2	0.86	0.79	0.73	0.83	0.77	0.71	0.78	0.73	0.68	0.74	0.69	0.65	0.70	0.66	0.62	0.60
3	0.75	0.67	0.60	0.73	0.65	0.59	0.69	0.62	0.57	0.65	0.59	0.54	0.61	0.56	0.52	0.50
4	0.66	0.57	0.50	0.65	0.56	0.50	0.61	0.54	0.48	0.58	0.51	0.46	0.54	0.49	0.45	0.42
5	0.59	0.50	0.43	0.58	0.49	0.43	0.54	0.47	0.41	0.52	0.45	0.40	0.49	0.43	0.39	0.36
6	0.53	0.44	0.38	0.52	0.43	0.37	0.49	0.42	0.36	0.47	0.40	0.35	0.44	0.39	0.34	0.32
7	0.48	0.39	0.33	0.47	0.39	0.33	0.45	0.37	0.32	0.42	0.36	0.31	0.40	0.35	0.30	0.28
8	0.44	0.35	0.29	0.43	0.35	0.29	0.41	0.34	0.28	0.39	0.32	0.28	0.37	0.31	0.27	0.25
9	0.40	0.32	0.26	0.39	0.31	0.26	0.38	0.30	0.25	0.36	0.29	0.25	0.34	0.29	0.24	0.22
10	0.37	0.29	0.24	0.36	0.29	0.24	0.35	0.28	0.23	0.33	0.27	0.23	0.32	0.26	0.22	0.20

Intensity data(cd)									Appendix Page: 10	Total:12
C/γ (°)	0.0	5.0	10.0	15.0	20.0	25.0	30.0	35.0	40.0	
0.0	1104.89	1103.99	1093.25	1076.24	1051.17	1018.93	979.54	932.98	881.94	
15.0	1104.89	1102.19	1092.28	1074.27	1049.96	1016.64	976.12	930.20	875.27	
30.0	1104.89	1102.19	1089.61	1070.73	1044.65	1006.90	961.05	912.50	863.05	
45.0	1104.89	1103.08	1091.35	1068.78	1037.19	1003.79	948.72	890.05	825.96	
60.0	1104.89	1103.09	1088.71	1063.53	1032.97	979.93	922.39	857.66	786.64	
75.0	1104.89	1103.98	1088.45	1061.06	1026.36	971.57	908.57	840.99	765.20	
90.0	1104.89	1101.23	1088.44	1059.19	1019.90	968.72	904.75	831.64	753.96	
105.0	1104.89	1103.06	1089.33	1062.78	1025.25	973.07	914.49	844.00	768.02	
120.0	1104.89	1104.89	1091.18	1066.51	1039.09	985.17	928.51	867.28	798.74	
135.0	1104.89	1102.14	1092.06	1070.99	1039.84	1006.86	950.97	893.26	832.79	
150.0	1104.89	1102.15	1091.18	1071.99	1044.57	1009.84	967.81	921.20	861.80	
165.0	1104.89	1103.07	1092.13	1073.89	1049.28	1016.46	977.26	933.50	880.63	
180.0	1104.89	1100.41	1086.98	1062.81	1035.95	1001.92	961.63	911.49	857.77	
195.0	1104.89	1096.78	1083.28	1058.96	1031.95	993.23	952.71	902.28	849.15	
210.0	1104.89	1095.00	1078.82	1054.54	1022.18	981.72	934.98	881.93	825.30	
225.0	1104.89	1095.86	1077.81	1048.92	1011.91	969.49	922.55	851.23	785.34	
240.0	1104.89	1095.90	1075.22	1041.96	1004.20	945.76	881.93	811.81	745.28	
255.0	1104.89	1096.67	1073.84	1038.23	1002.62	932.31	866.56	791.68	706.76	
270.0	1104.89	1093.01	1069.25	1034.52	991.57	924.85	857.23	784.11	695.47	
285.0	1104.89	1093.90	1071.93	1036.23	998.70	930.96	865.05	789.99	711.27	
300.0	1104.89	1094.84	1075.64	1041.83	1013.50	946.79	887.38	817.01	742.08	
315.0	1104.89	1094.81	1078.32	1049.00	1013.27	983.04	913.41	851.11	786.07	
330.0	1104.89	1095.75	1080.21	1055.54	1024.47	982.43	957.75	892.87	823.41	
345.0	1104.89	1096.68	1083.01	1062.95	1031.96	995.49	951.74	901.60	846.90	
360.0	1104.89	1103.99	1093.25	1076.24	1051.17	1018.93	979.54	932.98	881.94	
C/γ (°)	45.0	50.0	55.0	60.0	65.0	70.0	75.0	80.0	85.0	
0.0	824.64	761.07	691.23	620.49	548.86	474.55	405.60	340.24	284.73	
15.0	818.54	752.80	686.17	615.93	541.19	467.35	399.81	335.88	280.05	
30.0	795.63	726.40	654.48	580.76	509.74	440.52	377.59	314.66	258.92	
45.0	759.16	686.04	612.02	534.39	462.18	391.77	327.68	268.10	218.45	
60.0	709.32	628.41	551.10	470.18	391.97	320.05	256.22	198.68	152.83	
75.0	683.94	597.19	508.61	423.69	338.77	262.07	191.76	128.75	81.27	
90.0	670.79	579.40	492.58	402.11	317.12	234.87	159.93	92.30	36.56	
105.0	685.64	599.59	513.54	428.41	344.19	265.47	194.98	134.56	86.05	
120.0	723.80	646.12	565.70	484.36	407.59	332.65	266.85	207.45	159.02	
135.0	767.74	696.28	623.90	546.95	472.74	399.45	332.57	273.02	219.88	
150.0	800.56	735.68	664.40	592.20	515.43	440.49	370.12	307.98	254.06	
165.0	824.11	758.47	690.10	614.43	539.68	461.28	388.35	321.80	265.28	
180.0	797.78	729.73	658.99	581.10	502.30	427.09	357.25	297.26	243.54	
195.0	786.12	720.38	650.15	571.80	492.56	419.62	352.09	291.76	238.63	
210.0	767.76	691.34	615.82	538.51	465.69	394.67	328.14	270.60	220.26	
225.0	714.03	646.32	567.79	491.06	416.14	349.34	286.15	231.09	184.15	
240.0	656.28	577.17	496.26	418.94	344.32	276.90	216.66	166.32	124.96	
255.0	623.67	538.75	450.17	365.25	286.72	212.76	149.75	97.71	57.53	
270.0	606.82	519.09	431.35	344.54	260.46	185.52	116.98	58.49	15.54	
285.0	625.22	540.09	453.12	370.74	292.01	220.61	184.00	105.27	65.91	
300.0	669.88	584.89	509.03	463.34	352.76	286.96	228.47	180.04	137.08	
315.0	747.59	640.40	567.10	494.73	423.27	359.13	299.58	245.53	198.81	
330.0	753.96	686.33	616.87	544.68	472.48	406.68	344.54	287.87	238.52	
345.0	784.91	720.18	650.90	577.97	505.95	435.76	371.03	311.78	257.99	
360.0	824.64	761.07	691.23	620.49	548.86	474.55	405.60	340.24	284.73	

Intensity data(cd)

C/γ (°)	90.0	95.0	100.0	105.0	110.0	115.0	120.0	125.0	130.0
0.0	234.59	193.40	160.27	131.62	110.13	92.22	77.90	65.36	54.62
15.0	232.32	190.90	156.68	129.67	108.06	89.15	74.74	63.03	52.23
30.0	213.07	174.41	141.15	115.07	94.40	77.32	63.83	53.04	44.05
45.0	175.12	139.92	111.03	87.56	70.41	56.87	46.04	38.82	32.50
60.0	115.07	85.41	63.83	48.55	37.76	29.67	24.27	21.58	17.98
75.0	46.57	27.39	17.35	12.78	10.04	9.13	8.22	8.22	8.22
90.0	4.57	0.91	0.91	1.83	1.83	2.74	3.66	4.57	4.57
105.0	52.18	31.12	19.22	13.73	10.98	9.15	8.24	7.32	7.32
120.0	118.81	88.65	64.89	49.35	38.38	30.16	24.67	20.11	17.36
135.0	174.99	139.26	109.94	87.04	69.63	55.89	44.89	37.56	31.15
150.0	206.54	168.16	137.08	111.49	91.39	74.02	61.23	51.18	42.04
165.0	217.88	178.68	147.68	122.16	101.19	83.87	70.20	58.34	49.23
180.0	200.56	165.64	136.99	114.61	96.70	81.48	68.05	57.30	47.45
195.0	195.40	161.19	134.17	110.76	92.75	77.44	64.83	54.03	44.12
210.0	178.00	144.74	118.67	96.19	79.11	65.63	53.94	44.95	36.86
225.0	145.33	114.64	91.17	72.21	57.77	46.94	38.82	31.59	26.18
240.0	91.70	68.33	50.34	38.66	30.57	25.17	22.48	17.08	14.38
255.0	32.87	20.09	14.61	12.78	10.04	8.22	8.22	7.31	6.39
270.0	5.48	3.66	3.66	3.66	4.57	4.57	4.57	5.48	5.48
285.0	40.28	26.55	18.31	14.65	12.82	10.98	10.07	9.15	9.15
300.0	103.27	78.59	59.40	46.61	37.47	30.16	25.59	21.93	18.28
315.0	160.33	128.26	102.61	82.45	66.88	54.97	45.81	37.56	31.15
330.0	194.66	159.93	131.60	107.84	89.56	74.02	61.23	51.18	42.95
345.0	213.32	175.94	144.95	120.33	100.28	84.78	71.11	59.26	49.23
360.0	234.59	193.40	160.27	131.62	110.13	92.22	77.90	65.36	54.62
C/γ (°)	135.0	140.0	145.0	150.0	155.0	160.0	165.0	170.0	175.0
0.0	45.66	38.50	32.23	26.86	22.38	18.80	15.22	12.54	12.54
15.0	44.12	36.92	30.62	25.21	21.61	18.01	15.31	12.61	12.61
30.0	36.86	31.47	26.07	21.58	18.88	16.18	13.49	12.59	12.59
45.0	27.08	23.47	19.86	17.15	15.35	13.54	12.64	11.73	12.64
60.0	16.18	14.38	13.49	12.59	11.69	11.69	11.69	12.59	12.59
75.0	8.22	8.22	8.22	9.13	10.04	10.96	10.96	11.87	11.87
90.0	5.48	6.40	7.31	7.31	8.22	9.14	10.05	10.97	11.88
105.0	7.32	7.32	7.32	7.32	8.24	9.15	10.07	10.98	11.90
120.0	15.54	13.71	11.88	10.97	10.05	9.14	10.05	10.97	11.88
135.0	25.65	21.99	18.32	15.57	13.74	10.99	10.08	10.08	10.99
150.0	34.73	29.24	23.76	20.11	16.45	14.62	11.88	10.05	10.97
165.0	41.02	33.73	28.26	22.79	19.14	15.50	12.76	10.94	10.03
180.0	38.50	31.34	25.97	21.49	17.01	14.33	11.64	10.74	10.74
195.0	36.02	29.72	24.31	19.81	16.21	13.51	12.61	9.91	9.91
210.0	29.67	25.17	20.68	18.88	14.38	11.69	9.89	9.89	10.79
225.0	23.47	18.05	15.35	13.54	10.83	9.03	9.03	9.93	11.73
240.0	12.59	10.79	9.89	8.99	8.09	8.09	9.89	10.79	11.69
255.0	6.39	6.39	6.39	7.31	7.31	9.13	10.04	10.96	11.87
270.0	5.48	6.40	6.40	7.31	8.22	9.14	10.05	10.97	11.88
285.0	8.24	8.24	8.24	8.24	10.07	10.07	10.98	11.90	11.90
300.0	16.45	14.62	12.79	11.88	11.88	10.97	11.88	11.88	12.79
315.0	26.57	21.99	19.24	16.49	14.66	12.83	11.91	12.83	12.83
330.0	34.73	29.24	24.67	20.11	17.36	14.62	12.79	11.88	12.79
345.0	41.02	33.73	28.26	22.79	19.14	16.41	13.67	11.85	12.76
360.0	45.66	38.50	32.23	26.86	22.38	18.80	15.22	12.54	12.54

Intensity data(cd)

C/γ (°)	180.0
0.0	9.85
15.0	11.71
30.0	12.59
45.0	12.64
60.0	12.59
75.0	12.78
90.0	12.79
105.0	12.82
120.0	12.79
135.0	12.83
150.0	11.88
165.0	10.94
180.0	0.00
195.0	0.00
210.0	0.00
225.0	0.00
240.0	0.00
255.0	0.00
270.0	0.00
285.0	0.00
300.0	0.00
315.0	0.00
330.0	0.00
345.0	0.00
360.0	9.85