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Address:380JinOu Road,GaoXin Zone,Jiang Men City,Guangdong,Ching

Nata

LumCAT: 1-0940-N
Luminaire: 92.70.360.00
Report No: 220511-B009
Test No: 220511-C009
LampCAT: LUMILEDS 1202 LES6.5
Lamp flux(lm): 910.1
Number of Lamps: 1
Length(mm): 43
Phm Type: C

Voltage(V): 35.8700
Current(A): 0.2010
Power (W): 7.2090
PF: 0.0000
Ballast type: DC
Width(mm): 43
Height(mm): 0

Photometric Results

Lumens(lm): 757.12
Efficiency(%): 83.19%
Lumens(lm)/Power(W): 105.02
Central intensity(cd): 4649.224
Maximum intensity(cd): 4649.224
Angle of maximum intensity: C=0.0 γ=0.0
Beam Angle(50%Imax): [C0/180]Total=16.9
[C90/270]Total=16.9
Field angle(10%Imax): [C0/180]Total=43.7
[C90/270]Total=43.7
Maximum s/h(1/2): C0_180=0.29 C90_270=0.29
Maximum s/h(1/4): C0_180=0.32 C90_270=0.32
Up flux rate of lamp(%): 0.00%
Down flux rate of lamp(%): 83.19%
Up flux rate of LUM(%): - -
Down flux rate of LUM(%): 100.00%
CIE Type : Direct lighting
Output flux ratio in π solid angle : 98.358%

Zonal flux distribution table

γ(°)	Average I(cd)	Zonal F(lm)	Sum F(lm)	Eff Flux(%)	Eff Sum(%)
0.0	4649.224	0.000	0	.000%	.000%
1.0	4614.194	4.432	4.432	.487%	.585%
2.0	4516.049	13.105	17.537	1.440%	2.316%
3.0	4328.127	21.152	38.689	2.324%	5.110%
4.0	4066.334	28.099	66.788	3.087%	8.821%
5.0	3729.627	33.538	100.326	3.685%	13.251%
6.0	3315.539	37.024	137.35	4.068%	18.141%
7.0	2872.173	38.407	175.757	4.220%	23.214%
8.0	2497.447	38.429	214.187	4.223%	28.290%
9.0	2123.618	37.451	251.638	4.115%	33.236%
10.0	1807.675	35.577	287.215	3.909%	37.935%
11.0	1560.201	33.652	320.867	3.698%	42.380%
12.0	1376.528	32.103	352.969	3.527%	46.620%
13.0	1201.168	30.591	383.56	3.361%	50.660%
14.0	1084.403	29.255	412.815	3.215%	54.524%
15.0	978.252	28.317	441.132	3.111%	58.265%
16.0	871.817	27.109	468.241	2.979%	61.845%
17.0	787.334	25.837	494.078	2.839%	65.258%
18.0	711.343	24.710	518.788	2.715%	68.521%
19.0	638.258	23.480	542.269	2.580%	71.623%
20.0	574.240	22.192	564.461	2.438%	74.554%
21.0	514.652	20.909	585.37	2.297%	77.315%
22.0	454.667	19.479	604.848	2.140%	79.888%
23.0	404.744	18.033	622.881	1.981%	82.270%
24.0	356.882	16.652	639.533	1.830%	84.469%
25.0	313.337	15.239	654.772	1.674%	86.482%
26.0	266.528	13.688	668.46	1.504%	88.290%
27.0	231.610	12.187	680.647	1.339%	89.900%
28.0	183.479	10.509	691.156	1.155%	91.288%
29.0	149.584	8.714	699.87	.957%	92.439%
30.0	119.446	7.264	707.134	.798%	93.398%
31.0	87.097	5.748	712.882	.632%	94.157%
32.0	64.234	4.335	717.217	.476%	94.730%
33.0	47.645	3.296	720.513	.362%	95.165%
34.0	34.164	2.476	722.989	.272%	95.492%
35.0	27.957	1.929	724.918	.212%	95.747%
36.0	24.461	1.669	726.587	.183%	95.967%
37.0	21.937	1.513	728.101	.166%	96.167%

Zonal flux distribution table

γ(°)	Average I(cd)	Zonal F(lm)	Sum F(lm)	Eff Flux(%)	Eff Sum(%)
38.0	19.898	1.396	729.497	.153%	96.352%
39.0	17.941	1.292	730.788	.142%	96.522%
40.0	16.006	1.184	731.972	.130%	96.679%
41.0	14.483	1.086	733.058	.119%	96.822%
42.0	12.989	0.998	734.056	.110%	96.954%
43.0	11.517	0.908	734.964	.100%	97.074%
44.0	10.487	0.830	735.794	.091%	97.183%
45.0	9.516	0.769	736.563	.084%	97.285%
46.0	8.604	0.709	737.272	.078%	97.379%
47.0	7.977	0.659	737.931	.072%	97.466%
48.0	7.477	0.625	738.556	.069%	97.548%
49.0	6.999	0.594	739.15	.065%	97.627%
50.0	6.648	0.569	739.719	.063%	97.702%
51.0	6.356	0.550	740.27	.060%	97.775%
52.0	6.072	0.533	740.803	.059%	97.845%
53.0	5.856	0.519	741.322	.057%	97.914%
54.0	5.654	0.507	741.829	.056%	97.981%
55.0	5.452	0.496	742.325	.054%	98.046%
56.0	5.296	0.486	742.811	.053%	98.110%
57.0	5.169	0.478	743.289	.053%	98.173%
58.0	5.027	0.471	743.76	.052%	98.236%
59.0	4.930	0.465	744.226	.051%	98.297%
60.0	4.847	0.462	744.688	.051%	98.358%
61.0	4.758	0.458	745.146	.050%	98.419%
62.0	4.706	0.456	745.602	.050%	98.479%
63.0	4.638	0.454	746.057	.050%	98.539%
64.0	4.564	0.452	746.508	.050%	98.599%
65.0	4.519	0.449	746.958	.049%	98.658%
66.0	4.467	0.448	747.406	.049%	98.717%
67.0	4.407	0.446	747.852	.049%	98.776%
68.0	4.369	0.445	748.297	.049%	98.835%
69.0	4.295	0.442	748.739	.049%	98.893%
70.0	4.242	0.438	749.177	.048%	98.951%
71.0	4.160	0.434	749.611	.048%	99.008%
72.0	4.078	0.428	750.04	.047%	99.065%
73.0	4.011	0.423	750.463	.046%	99.121%
74.0	3.936	0.418	750.881	.046%	99.176%
75.0	3.891	0.414	751.294	.045%	99.231%

Zonal flux distribution table

γ(°)	Average I(cd)	Zonal F(lm)	Sum F(lm)	Eff Flux(%)	Eff Sum(%)
76.0	3.832	0.410	751.704	.045%	99.285%
77.0	3.794	0.407	752.111	.045%	99.339%
78.0	3.742	0.403	752.514	.044%	99.392%
79.0	3.720	0.401	752.915	.044%	99.445%
80.0	3.667	0.398	753.313	.044%	99.497%
81.0	3.690	0.398	753.711	.044%	99.550%
82.0	3.787	0.405	754.117	.045%	99.603%
83.0	3.742	0.409	754.526	.045%	99.658%
84.0	3.720	0.406	754.932	.045%	99.711%
85.0	3.615	0.400	755.333	.044%	99.764%
86.0	3.316	0.379	755.712	.042%	99.814%
87.0	3.242	0.359	756.071	.039%	99.862%
88.0	3.189	0.352	756.423	.039%	99.908%
89.0	3.174	0.349	756.772	.038%	99.954%
90.0	3.159	0.347	757.119	.038%	100.000%

Zonal flux distribution table

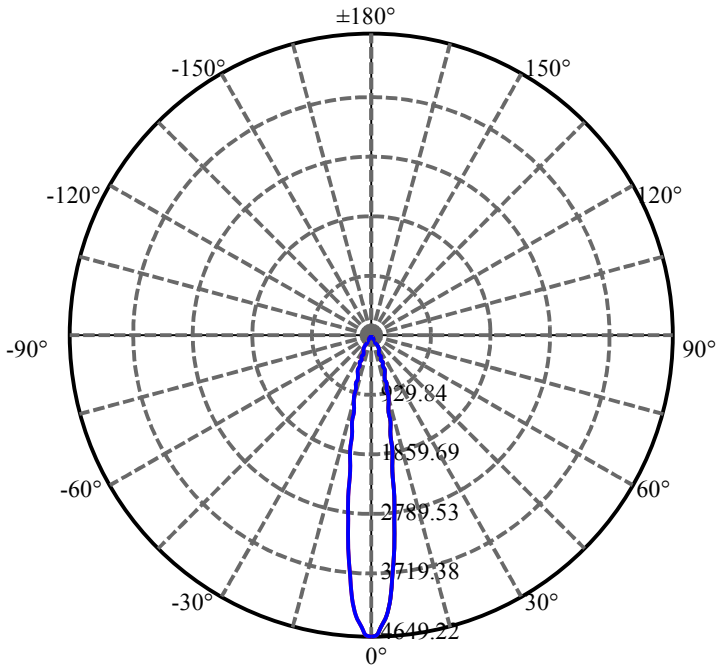
ZONAL LUMEN SUMMARY

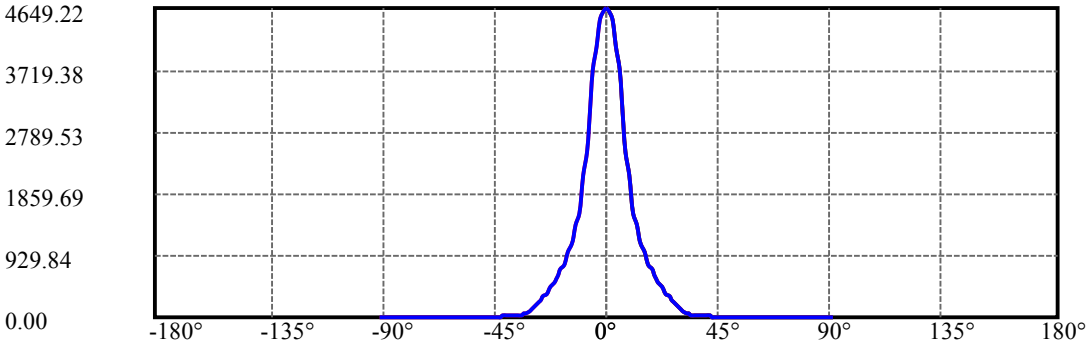
Zone	Lumens	%Lamp	%Fixt
0-30	707.13	77.70%	93.40%
0-40	731.97	80.43%	96.68%
0-60	744.69	81.83%	98.36%
0-90	756.77	83.15%	99.95%
0-120	756.77	83.15%	99.95%
0-180	757.12	83.19%	100.00%
60-90	12.55	1.38%	1.66%
90-120	0.00	0.00%	0.00%
90-130	0.00	0.00%	0.00%
90-150	0.00	0.00%	0.00%
90-180	0.00	0.00%	0.00%
0-22.05	605.70	66.55%	80.00%

ZONAL LUMEN SUMMARY

0-10	287.21
10-20	277.25
20-30	142.67
30-40	24.84
40-50	7.75
50-60	4.97
60-70	4.49
70-80	4.14
80-90	3.46
90-100	0.00
100-110	0.00
110-120	0.00
120-130	0.00
130-140	0.00
140-150	0.00
150-160	0.00
160-170	0.00
170-180	0.00

Light Distribution Curve [Unit:cd]





C0(Max):

C0/C180:

C90/C270:

Field angle(10%Imax):C0/180Left:21.8 Right:21.8
:C90/270Left:21.8 Right:21.8

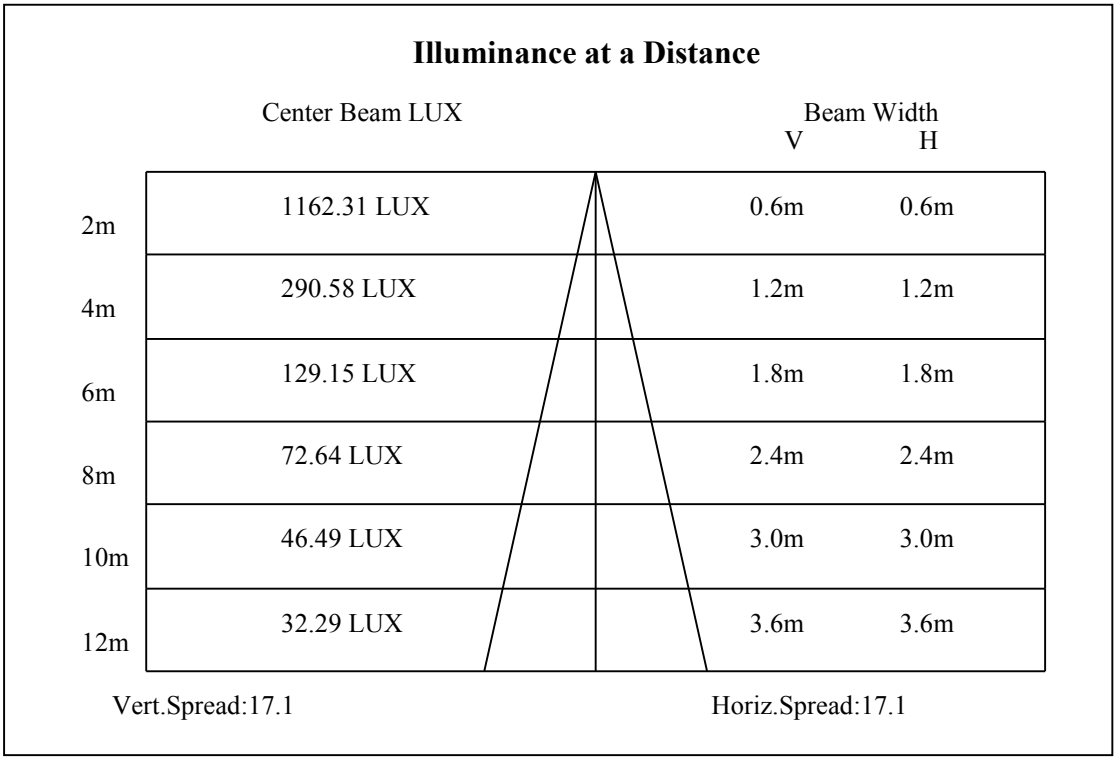
Beam Angle(50%Imax):C0/180Left:8.5 Right:8.5
:C90/270Left:8.5 Right:8.5

Equipment: GMS1980
Temperature(°C): 25.0

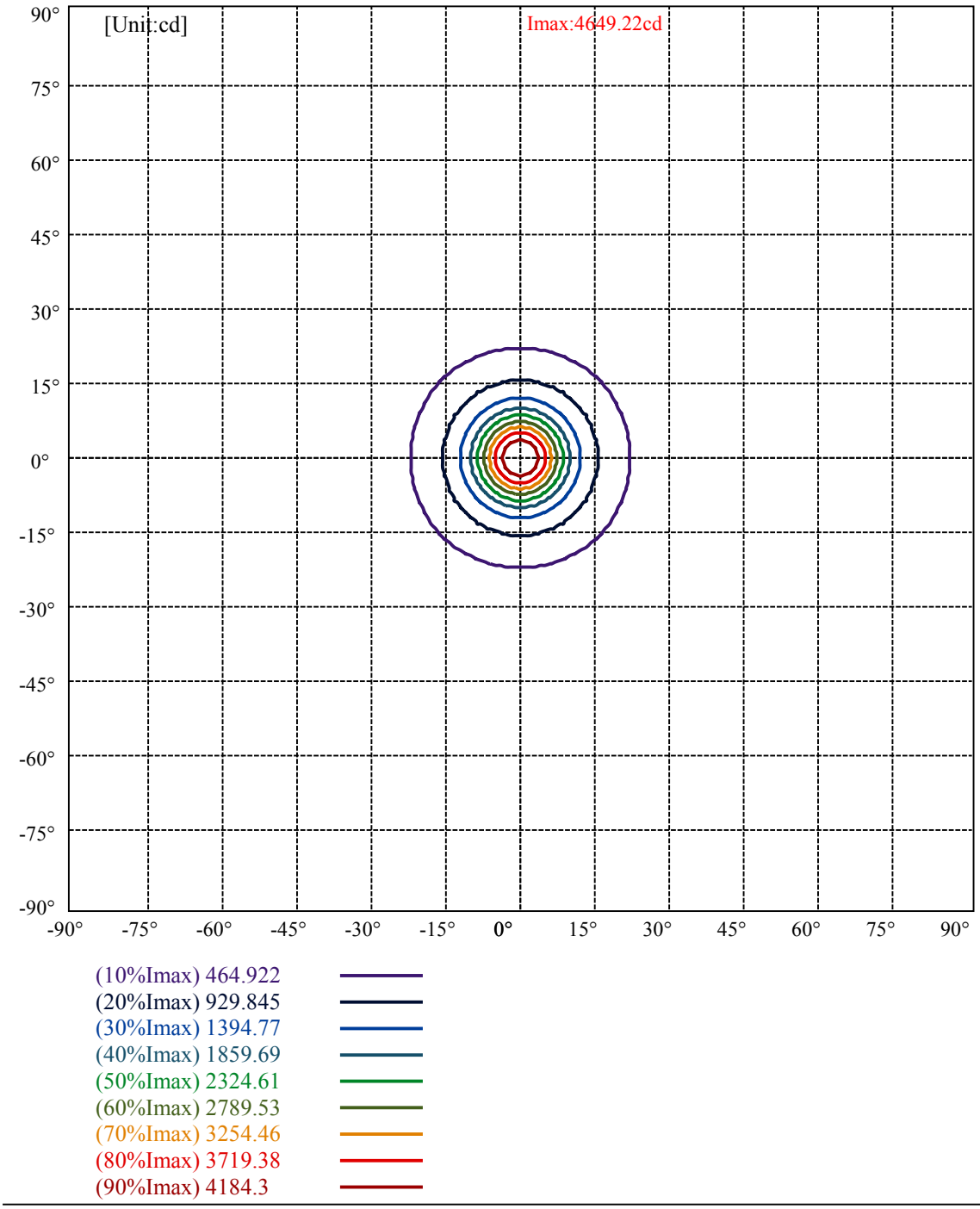
Date: 2022/5/11
Humidity(%): 65.0%

Operator: NT07
Distance(m): 7.73

Lux distance Curve



ISO-Intensity(V-H)

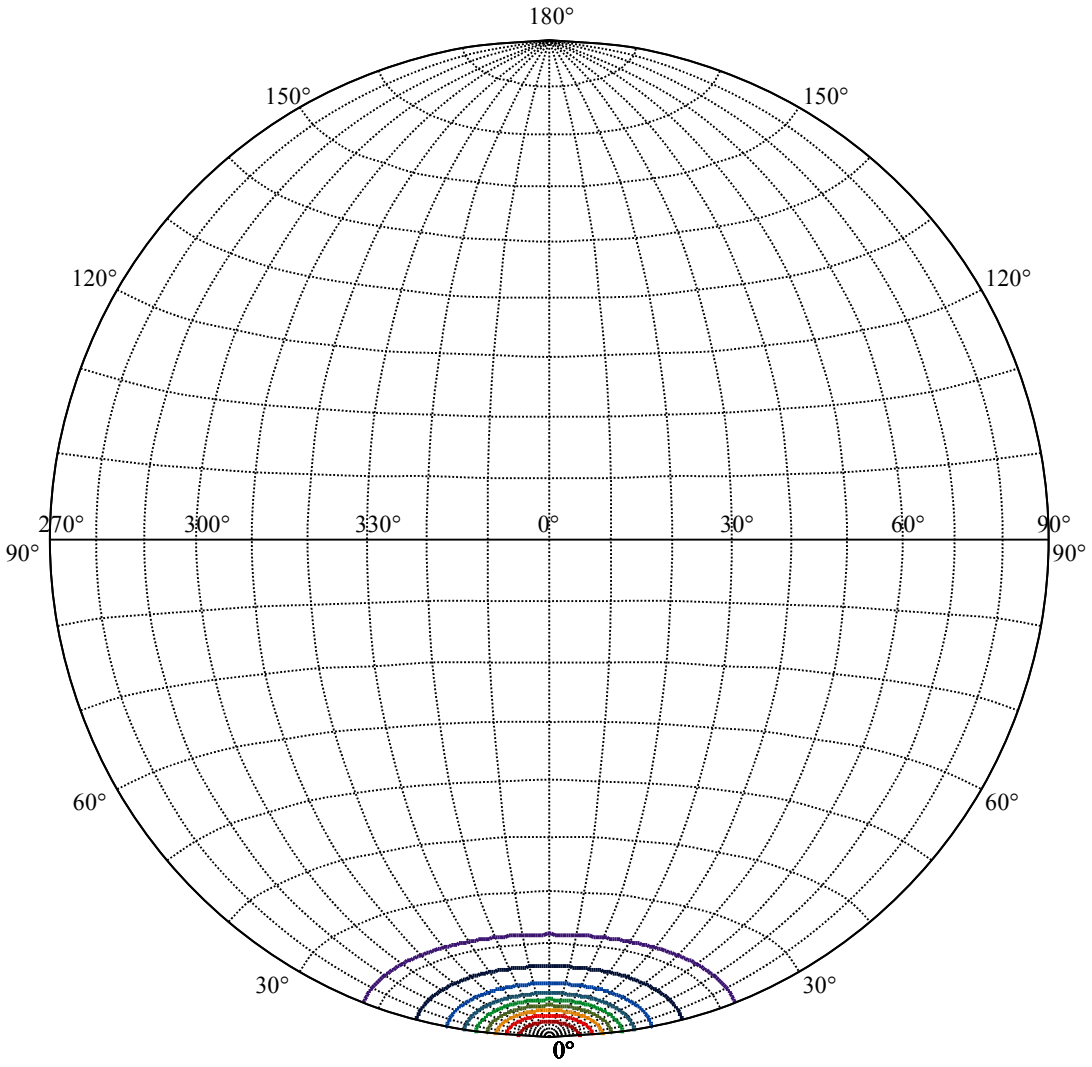


Equipment: GMS1980
Temperature(°C): 25.0

Date: 2022/5/11
Humidity(%): 65.0%

Operator: NT07
Distance(m): 7.73

ISO candela diagram on circular web



House [Unit:cd] Road

Imax:4649.22

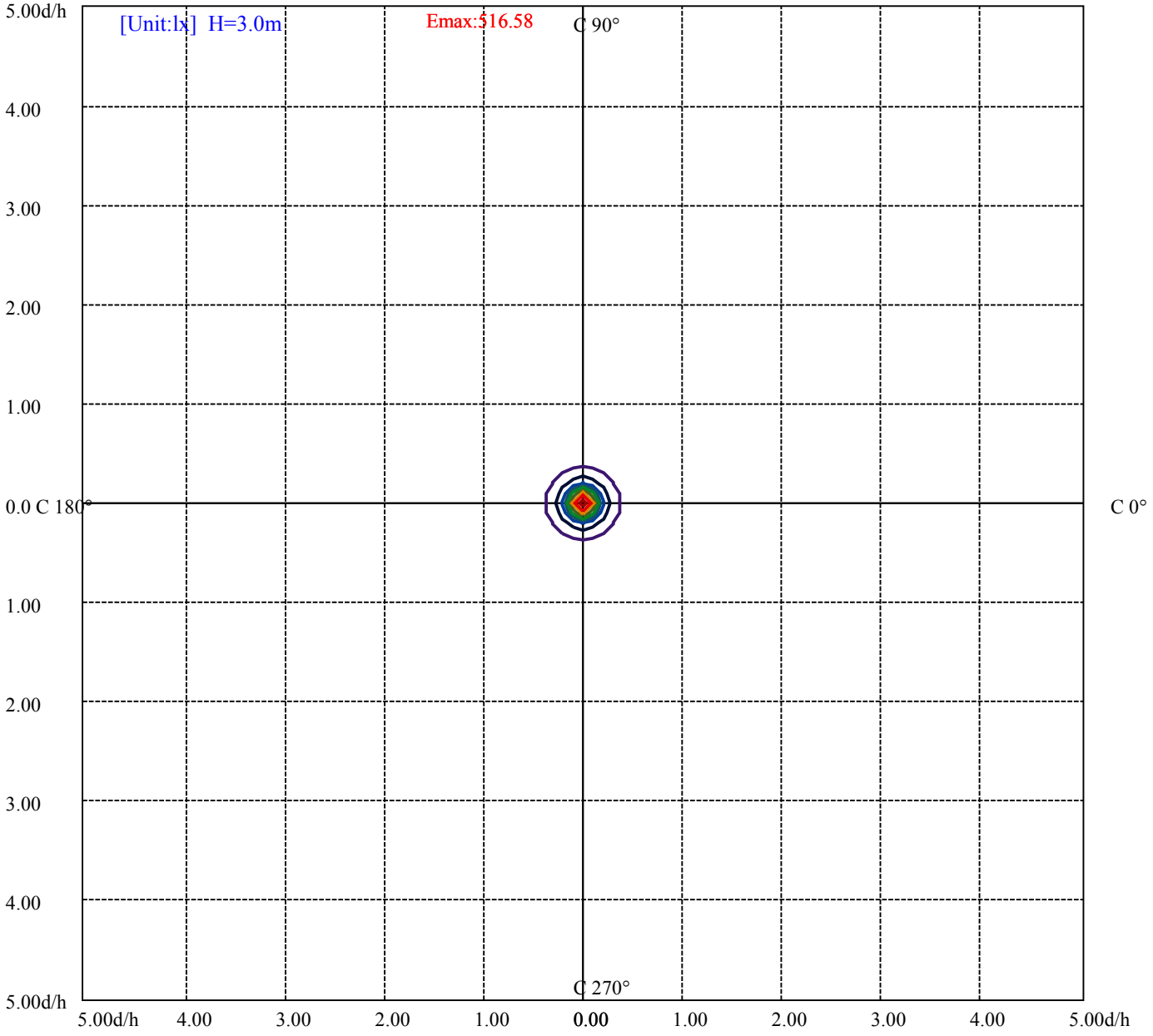
(10%Imax) 464.922
(20%Imax) 929.845
(30%Imax) 1394.77
(40%Imax) 1859.69
(50%Imax) 2324.61
(60%Imax) 2789.53
(70%Imax) 3254.46
(80%Imax) 3719.38
(90%Imax) 4184.3

Equipment: GMS1980
Temperature(°C): 25.0

Date: 2022/5/11
Humidity(%): 65.0%

Operator: NT07
Distance(m): 7.73

ISO illuminance diagram

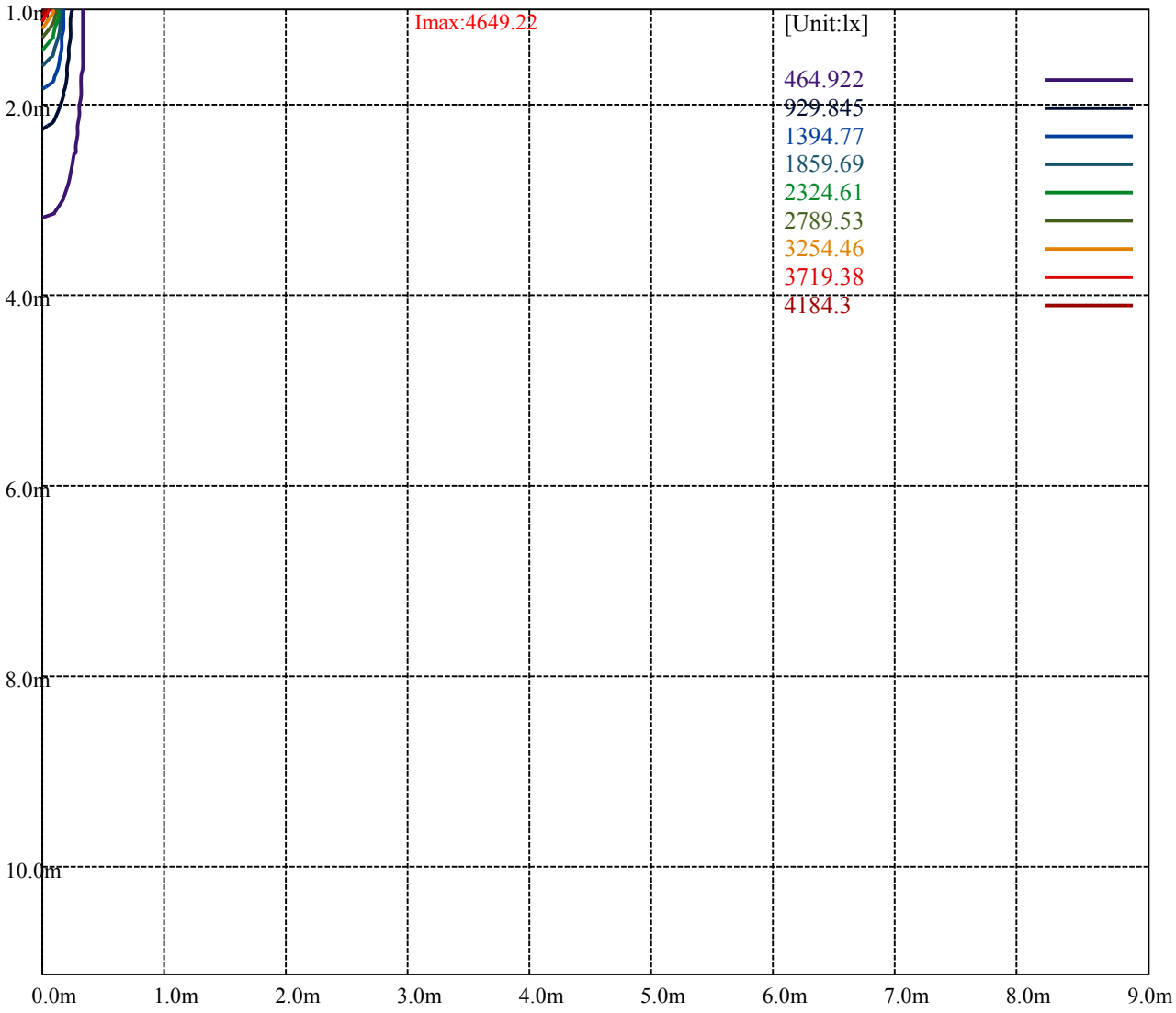


Equipment: GMS1980
Temperature(°C): 25.0

Date: 2022/5/11
Humidity(%): 65.0%

Operator: NT07
Distance(m): 7.73

Space ISO Lux diagram



Equipment: GMS1980
Temperature(°C): 25.0

Date: 2022/5/11
Humidity(%): 65.0%

Operator: NT07
Distance(m): 7.73

Luminance Limitting Curve(no luminous side)

Luminance Table

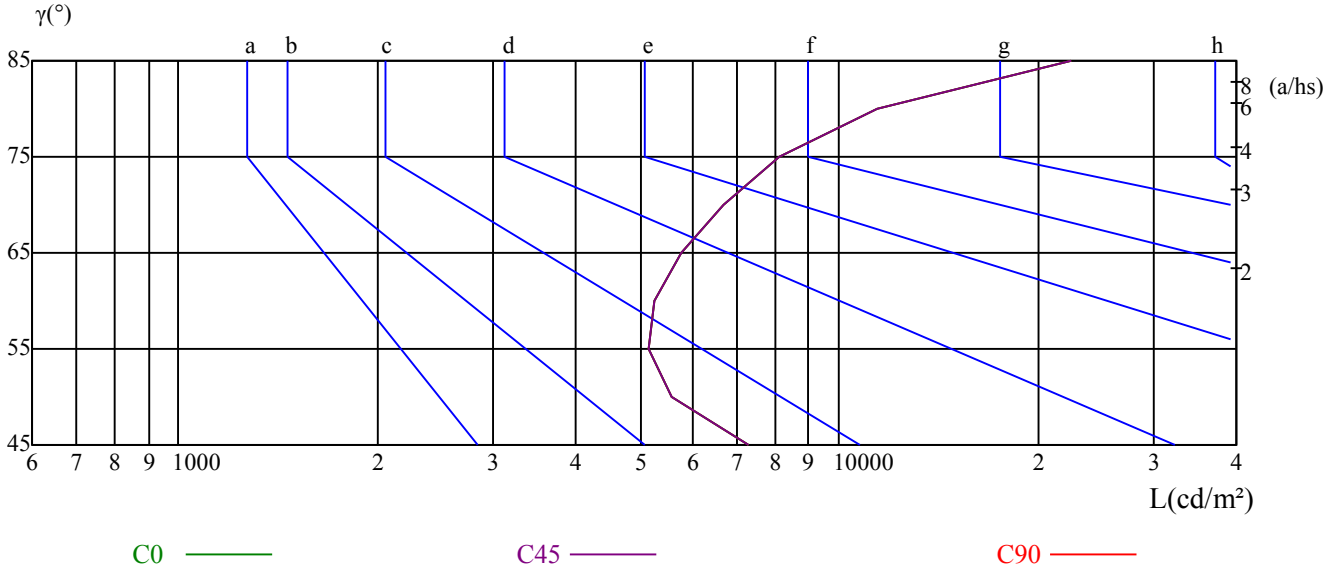
γ	45	50	55	60	65	70	75	80	85
C0	7278	5593	5141	5243	5783	6709	8132	11422	22433
C45	7278	5593	5141	5243	5783	6709	8132	11422	22433
C90	7278	5593	5141	5243	5783	6709	8132	11422	22433

L(Hor)(65)	L(Ver)(65)	L45(65)	L(Hor)(75)	L(Ver)(75)	L45(75)	L(Hor)(85)	L(Ver)(85)	L45(85)
5783	5783	5783	8132	8132	8132	22433	22433	22433

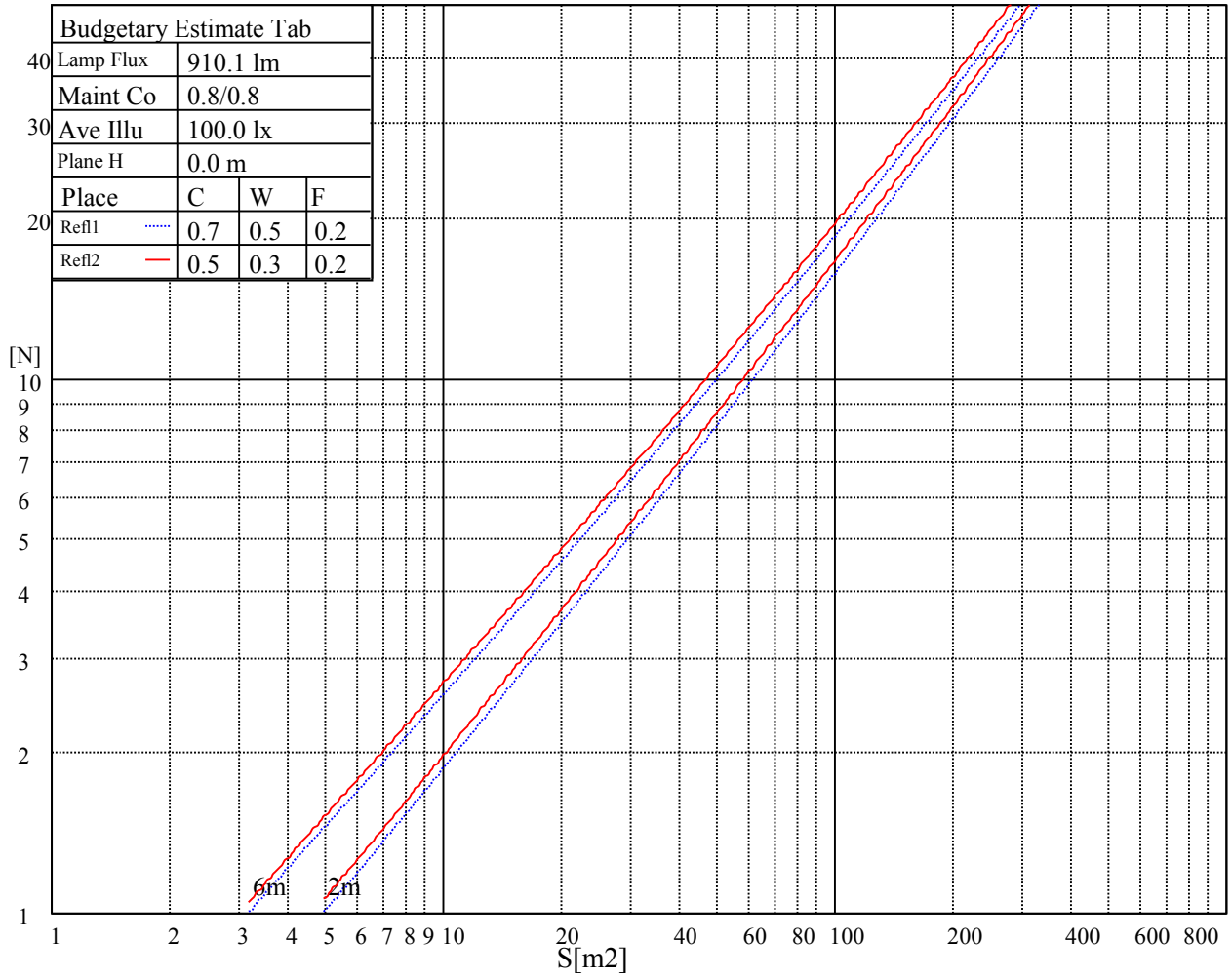
Glare Table

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 Limitting Curve



Budgetary Estimate Table

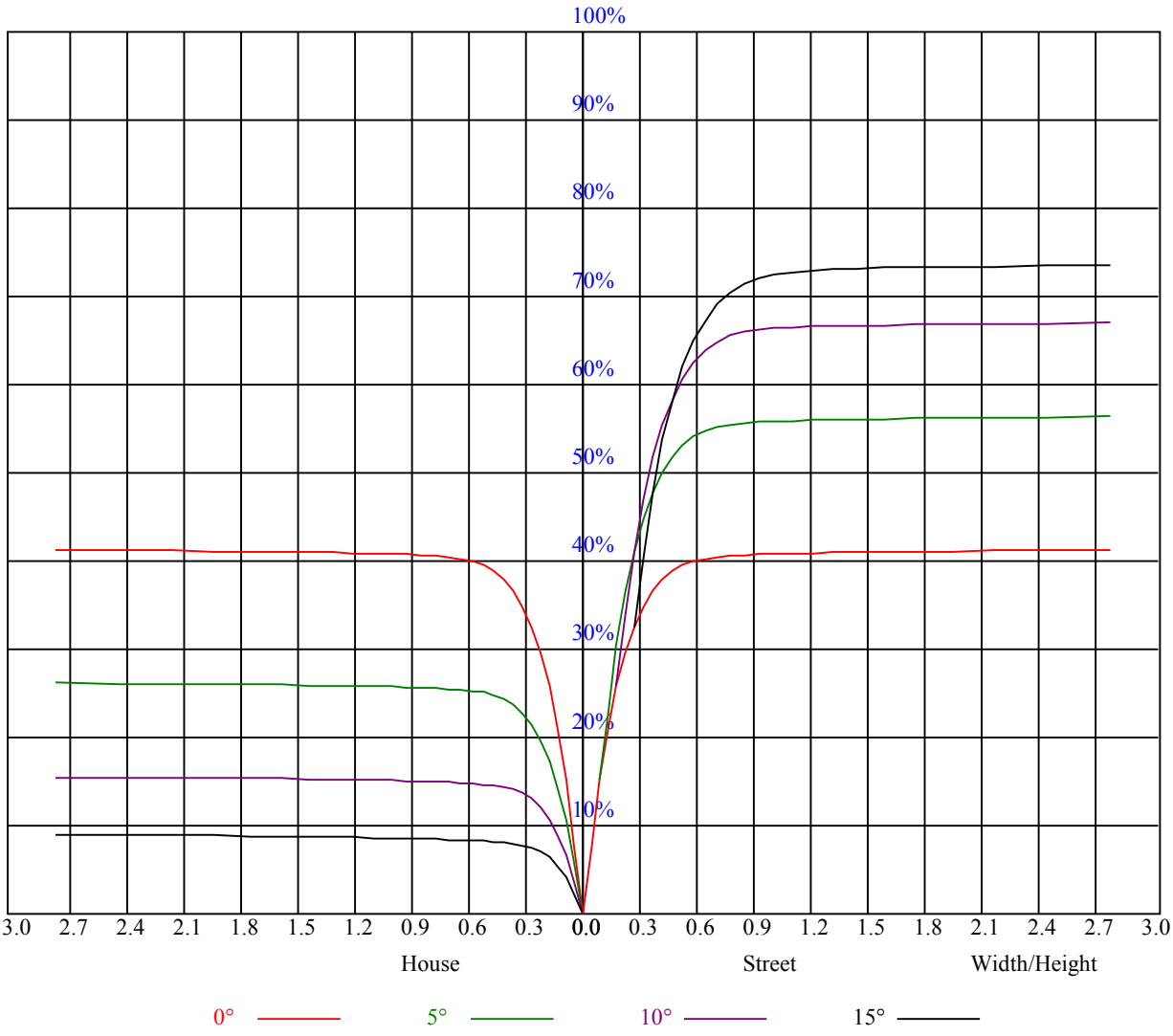


Equipment: GMS1980 Date: 2022/5/11 Operator: NT07
Temperature(°C): 25.0 Humidity(%): 65.0% Distance(m): 7.73

Utilization factor table for indoor luminaire

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	COEFFCIENTS OF UTILIZATION RHOFC=20 CU															
0	0.99	0.99	0.99	0.97	0.97	0.97	0.92	0.92	0.92	0.89	0.89	0.89	0.85	0.85	0.85	0.83
1	0.93	0.92	0.90	0.92	0.90	0.89	0.88	0.87	0.86	0.85	0.84	0.84	0.83	0.82	0.81	0.80
2	0.89	0.86	0.84	0.87	0.85	0.83	0.85	0.83	0.81	0.82	0.81	0.80	0.80	0.79	0.78	0.77
3	0.85	0.82	0.79	0.84	0.81	0.79	0.82	0.79	0.77	0.80	0.78	0.76	0.78	0.77	0.75	0.74
4	0.82	0.78	0.75	0.81	0.77	0.75	0.79	0.76	0.74	0.77	0.75	0.73	0.76	0.74	0.73	0.72
5	0.78	0.75	0.72	0.78	0.74	0.72	0.76	0.74	0.71	0.75	0.73	0.71	0.74	0.72	0.70	0.69
6	0.76	0.72	0.70	0.75	0.72	0.69	0.74	0.71	0.69	0.73	0.70	0.69	0.72	0.70	0.68	0.67
7	0.73	0.70	0.67	0.73	0.69	0.67	0.72	0.69	0.67	0.71	0.68	0.66	0.70	0.68	0.66	0.65
8	0.71	0.68	0.65	0.71	0.67	0.65	0.70	0.67	0.65	0.69	0.66	0.64	0.68	0.66	0.64	0.63
9	0.69	0.66	0.63	0.69	0.65	0.63	0.68	0.65	0.63	0.67	0.65	0.63	0.67	0.64	0.63	0.62
10	0.67	0.64	0.61	0.67	0.64	0.61	0.66	0.63	0.61	0.66	0.63	0.61	0.65	0.63	0.61	0.60

Coefficient Utilization Curve



Equipment: GMS1980	Date: 2022/5/11	Operator: NT07
Temperature(°C): 25.0	Humidity(%): 65.0%	Distance(m): 7.73

Intensity data(cd)

C/γ(°)	0.0	1.0	2.0	3.0	4.0	5.0	6.0	7.0	8.0
0.0	4626.07	4669.69	4654.75	4571.10	4399.01	4139.08	3808.05	3371.26	2972.11
45.0	4672.68	4611.13	4474.30	4284.28	3982.53	3622.82	3158.54	2696.65	2326.78
90.0	4634.43	4534.05	4376.30	4038.70	3734.56	3333.61	2872.32	2431.35	2090.75
135.0	4661.92	4590.22	4442.03	4200.03	3906.64	3490.76	3025.29	2617.18	2250.29
180.0	4626.07	4522.70	4342.24	4053.64	3661.66	3267.89	2854.40	2372.19	2034.59
225.0	4672.68	4654.15	4590.22	4440.84	4223.33	3919.79	3391.57	3043.81	2652.43
270.0	4634.43	4669.09	4633.84	4566.91	4372.72	4091.88	3800.88	3321.07	2924.90
315.0	4665.51	4662.52	4614.72	4469.52	4250.22	3971.18	3613.26	3123.88	2727.72
360.0	4626.07	4669.69	4654.75	4571.10	4399.01	4139.08	3808.05	3371.26	2972.11

C/γ(°)	9.0	10.0	11.0	12.0	13.0	14.0	15.0	16.0	17.0
0.0	2537.71	2155.29	1866.08	1609.74	1403.00	1254.21	1143.07	991.90	895.70
45.0	1963.48	1673.08	1469.92	1307.99	1147.26	1035.52	936.93	840.72	752.29
90.0	1777.05	1533.26	1361.17	1182.75	1079.68	964.53	872.51	783.12	711.48
135.0	1900.14	1613.93	1416.74	1243.46	1104.23	994.89	890.92	800.09	724.80
180.0	1749.56	1477.09	1182.33	1165.90	1035.76	923.42	837.68	752.23	683.51
225.0	2203.69	1892.37	1643.20	1419.73	1189.98	1112.72	993.51	901.55	808.04
270.0	2497.07	2117.64	1830.83	1575.68	1373.12	1224.34	1099.45	965.61	872.39
315.0	2360.24	1998.73	1711.32	1506.97	1276.32	1165.60	1051.95	939.32	850.46
360.0	2537.71	2155.29	1866.08	1609.74	1403.00	1254.21	1143.07	991.90	895.70

C/γ(°)	18.0	19.0	20.0	21.0	22.0	23.0	24.0	25.0	26.0
0.0	822.80	730.18	656.09	604.10	529.41	474.44	423.65	371.07	328.04
45.0	681.78	612.47	548.53	494.16	437.99	390.19	341.79	305.93	251.02
90.0	638.46	570.64	513.82	454.84	401.18	359.89	319.56	267.10	228.67
135.0	648.32	591.55	525.83	464.28	412.30	362.70	317.29	305.93	234.53
180.0	611.63	545.78	489.97	432.61	379.79	338.08	295.48	245.35	209.61
225.0	735.20	661.23	601.59	536.64	475.10	424.13	365.03	321.59	279.76
270.0	790.53	709.27	636.37	577.21	512.68	452.93	402.73	353.74	308.92
315.0	762.03	684.95	621.73	553.37	488.90	435.60	389.53	335.99	291.65
360.0	822.80	730.18	656.09	604.10	529.41	474.44	423.65	371.07	328.04

C/γ(°)	27.0	28.0	29.0	30.0	31.0	32.0	33.0	34.0	35.0
0.0	304.74	230.65	193.96	161.09	123.15	95.96	70.99	46.31	34.60
45.0	214.33	172.75	138.45	108.93	75.29	55.33	41.05	30.59	24.86
90.0	193.30	156.55	122.25	93.93	66.80	45.77	34.42	27.49	24.80
135.0	197.12	157.93	127.09	97.04	65.55	47.09	34.54	26.95	24.32
180.0	175.73	140.36	106.54	80.25	55.27	37.70	29.46	25.81	23.54
225.0	239.97	193.84	160.32	129.48	97.76	70.75	52.04	36.45	28.08
270.0	275.76	212.78	178.12	146.28	110.30	84.43	62.26	41.29	31.91
315.0	251.92	202.98	169.94	138.57	102.66	76.84	56.41	38.42	31.55
360.0	304.74	230.65	193.96	161.09	123.15	95.96	70.99	46.31	34.60

C/γ(°)	36.0	37.0	38.0	39.0	40.0	41.0	42.0	43.0	44.0
0.0	27.79	24.98	22.71	20.61	18.46	16.49	14.76	13.27	12.07
45.0	22.41	19.90	18.34	16.49	14.76	13.44	11.89	10.58	9.62
90.0	22.35	20.08	18.05	16.13	14.04	12.79	11.53	10.34	9.38
135.0	22.23	19.96	17.81	16.07	14.58	13.15	11.65	10.34	9.50
180.0	21.27	19.12	17.33	15.42	13.86	12.49	11.35	10.10	9.20
225.0	24.86	22.47	20.50	18.46	16.55	15.06	13.68	12.01	10.88
270.0	27.31	24.56	22.17	20.20	18.05	16.25	14.46	12.97	11.77
315.0	27.49	24.44	22.29	20.14	17.75	16.19	14.58	12.55	11.47
360.0	27.79	24.98	22.71	20.61	18.46	16.49	14.76	13.27	12.07

Intensity data(cd)

C/γ(°)	45.0	46.0	47.0	48.0	49.0	50.0	51.0	52.0	53.0
0.0	10.88	9.68	8.90	8.25	7.59	7.17	6.81	6.51	6.21
45.0	8.78	8.01	7.47	7.11	6.75	6.39	6.09	5.92	5.68
90.0	8.54	7.89	7.35	6.93	6.57	6.21	5.98	5.68	5.56
135.0	8.72	8.01	7.53	7.11	6.69	6.45	6.21	5.98	5.74
180.0	8.48	7.83	7.35	6.93	6.57	6.27	6.04	5.74	5.56
225.0	9.86	8.78	8.13	7.59	7.05	6.69	6.39	6.09	5.86
270.0	10.58	9.44	8.66	8.01	7.41	7.05	6.69	6.39	6.15
315.0	10.28	9.20	8.43	7.89	7.35	6.93	6.63	6.27	6.09
360.0	10.88	9.68	8.90	8.25	7.59	7.17	6.81	6.51	6.21

C/γ(°)	54.0	55.0	56.0	57.0	58.0	59.0	60.0	61.0	62.0
0.0	6.04	5.80	5.62	5.44	5.32	5.20	5.08	4.90	4.84
45.0	5.50	5.32	5.20	5.02	4.90	4.84	4.78	4.72	4.66
90.0	5.32	5.20	5.08	4.96	4.84	4.72	4.66	4.66	4.60
135.0	5.56	5.38	5.20	5.14	4.96	4.90	4.84	4.72	4.66
180.0	5.38	5.20	5.08	4.96	4.84	4.78	4.72	4.66	4.60
225.0	5.68	5.38	5.20	5.08	4.96	4.84	4.78	4.72	4.66
270.0	5.92	5.68	5.50	5.38	5.20	5.08	4.96	4.84	4.84
315.0	5.86	5.68	5.50	5.38	5.20	5.08	4.96	4.84	4.78
360.0	6.04	5.80	5.62	5.44	5.32	5.20	5.08	4.90	4.84

C/γ(°)	63.0	64.0	65.0	66.0	67.0	68.0	69.0	70.0	71.0
0.0	4.78	4.72	4.66	4.60	4.54	4.54	4.48	4.42	4.30
45.0	4.60	4.48	4.48	4.42	4.36	4.36	4.24	4.18	4.12
90.0	4.54	4.48	4.42	4.42	4.30	4.30	4.18	4.12	4.06
135.0	4.60	4.54	4.48	4.42	4.36	4.30	4.24	4.18	4.06
180.0	4.54	4.48	4.42	4.42	4.36	4.30	4.24	4.12	4.06
225.0	4.60	4.54	4.48	4.42	4.36	4.30	4.30	4.24	4.18
270.0	4.72	4.60	4.60	4.48	4.48	4.42	4.36	4.36	4.30
315.0	4.72	4.66	4.60	4.54	4.48	4.42	4.30	4.30	4.18
360.0	4.78	4.72	4.66	4.60	4.54	4.54	4.48	4.42	4.30

C/γ(°)	72.0	73.0	74.0	75.0	76.0	77.0	78.0	79.0	80.0
0.0	4.24	4.18	4.06	4.00	3.94	3.88	3.82	3.76	3.70
45.0	4.00	3.94	3.88	3.82	3.76	3.70	3.70	3.64	3.59
90.0	4.00	3.94	3.88	3.88	3.76	3.76	3.76	3.76	3.76
135.0	4.00	3.94	3.88	3.82	3.76	3.70	3.64	3.64	3.59
180.0	4.00	3.88	3.82	3.82	3.76	3.76	3.64	3.64	3.59
225.0	4.06	4.00	3.88	3.82	3.82	3.76	3.70	3.64	3.59
270.0	4.18	4.12	4.06	4.00	3.94	3.94	3.88	3.88	3.82
315.0	4.12	4.06	4.00	3.94	3.88	3.82	3.76	3.76	3.70
360.0	4.24	4.18	4.06	4.00	3.94	3.88	3.82	3.76	3.70

C/γ(°)	81.0	82.0	83.0	84.0	85.0	86.0	87.0	88.0	89.0
0.0	3.64	3.59	3.53	3.53	3.47	3.41	3.35	3.29	3.23
45.0	3.53	3.47	3.47	3.41	3.35	3.23	3.23	3.17	3.17
90.0	4.18	5.32	4.96	4.24	3.29	3.23	3.17	3.11	3.17
135.0	3.59	3.53	3.53	3.47	3.29	3.23	3.23	3.17	3.17
180.0	3.53	3.47	3.41	3.41	3.29	3.29	3.23	3.17	3.17
225.0	3.59	3.53	3.47	3.41	3.35	3.35	3.23	3.23	3.17
270.0	3.76	3.76	4.00	4.78	5.44	3.47	3.29	3.23	3.17
315.0	3.70	3.64	3.59	3.53	3.47	3.35	3.23	3.17	3.17
360.0	3.64	3.59	3.53	3.53	3.47	3.41	3.35	3.29	3.23

Intensity data(cd)

C/γ(°)	90.0
0.0	3.23
45.0	3.17
90.0	3.17
135.0	3.17
180.0	3.17
225.0	3.17
270.0	3.11
315.0	3.11
360.0	3.23