
Client: SATCO

LumCAT: SDL4/RND/10W/5CCT/**/9(3000K)

Luminaire: S11826 LED Fixed Luminaires

Report No:

Ballast type:

Test No:

Voltage(V): 120.020

LampCAT:

Current(A): 0.082

Lamp flux(lm): 700.9

Power (W): 9.570

Number of Lamps: 1

PF: 0.974

Length(mm): -75

Width(mm): -75

Phm Type: C

Height(mm): 0

Photometric Results

Lumens(lm): 700.89, Efficiency(%): 100.00% , Luminous Efficacy(lm/W): 73.24

Central intensity(cd): 237.405, Maximum intensity(cd): 237.405

Angle of maximum intensity: C=0.0 γ =0.0

Beam Angle(50%Imax): [C0/180]Total=113.8

[C90/270]Total=113.6

Field angle(10%Imax): [C0/180]Total=159.4

[C90/270]Total=162.4

Maximum s/h(1/2): C0_180=1.31 C90_270=1.30

Maximum s/h(1/4): C0_180=1.41 C90_270=1.41

Up flux rate of lamp(%): 0.20%

Down flux rate of lamp(%): 99.80%

Up flux rate of LUM(%): 0.20%

Down flux rate of LUM(%): 99.80%

CIE Type : Direct lighting

Output flux ratio in π solid angle : 79.061%

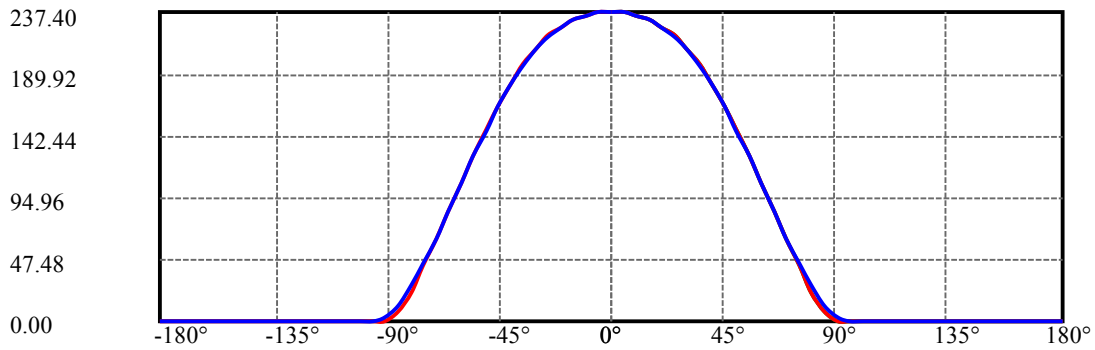
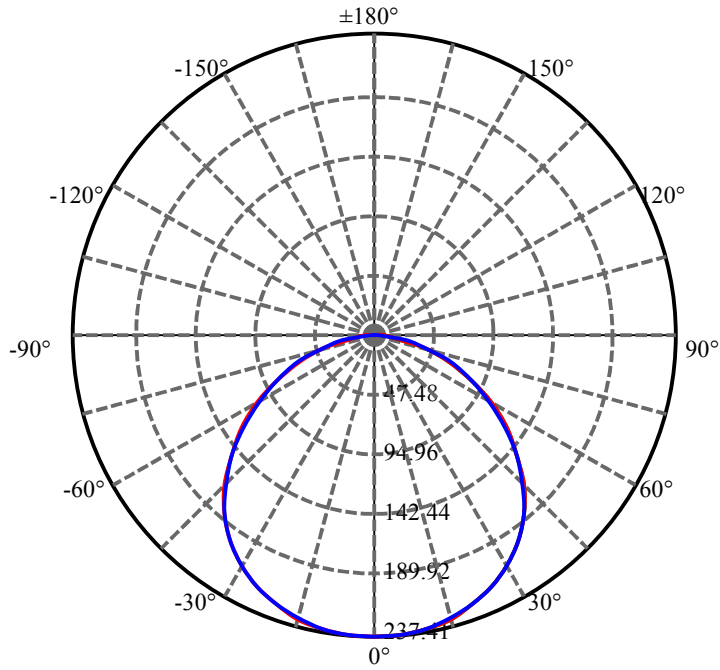
$\gamma(^{\circ})$	Average I(cd)	Zonal F(lm)	Sum F(lm)	Eff Flux(%)	Eff Sum(%)
0.0	237.405	0.000	0	0.00%	0.00%
5.0	236.995	5.671	5.671	0.81%	0.81%
10.0	234.901	16.881	22.553	2.41%	3.22%
15.0	231.478	27.665	50.218	3.95%	7.16%
20.0	226.109	37.712	87.929	5.38%	12.55%
25.0	219.078	46.692	134.621	6.66%	19.21%
30.0	209.580	54.247	188.868	7.74%	26.95%
35.0	197.427	59.935	248.803	8.55%	35.50%
40.0	183.155	63.497	312.3	9.06%	44.56%
45.0	166.316	64.707	377.007	9.23%	53.79%
50.0	147.424	63.396	440.403	9.05%	62.84%
55.0	127.317	59.738	500.141	8.52%	71.36%
60.0	106.250	53.988	554.129	7.70%	79.06%
65.0	85.002	46.494	600.623	6.63%	85.69%
70.0	64.371	37.822	638.445	5.40%	91.09%
75.0	44.553	28.471	666.916	4.06%	95.15%
80.0	26.293	18.956	685.872	2.70%	97.86%
85.0	10.832	10.088	695.96	1.44%	99.30%
90.0	2.087	3.537	699.498	0.50%	99.80%
95.0	0.074	0.592	700.089	0.08%	99.89%
100.0	0.081	0.042	700.131	0.01%	99.89%
105.0	0.092	0.046	700.178	0.01%	99.90%
110.0	0.074	0.043	700.221	0.01%	99.91%
115.0	0.081	0.039	700.261	0.01%	99.91%
120.0	0.059	0.034	700.295	0.00%	99.92%
125.0	0.070	0.030	700.325	0.00%	99.92%
130.0	0.078	0.032	700.357	0.00%	99.92%
135.0	0.126	0.041	700.398	0.01%	99.93%
140.0	0.111	0.044	700.442	0.01%	99.94%
145.0	0.177	0.048	700.49	0.01%	99.94%
150.0	0.207	0.057	700.546	0.01%	99.95%
155.0	0.329	0.068	700.614	0.01%	99.96%
160.0	0.388	0.075	700.689	0.01%	99.97%
165.0	0.510	0.074	700.763	0.01%	99.98%
170.0	0.613	0.067	700.83	0.01%	99.99%
175.0	0.609	0.044	700.873	0.01%	100.00%
180.0	0.373	0.012	700.885	0.00%	100.00%

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixt
0-30	188.87	26.95%	26.95%
0-40	312.30	44.56%	44.56%
0-60	554.13	79.06%	79.06%
0-90	699.50	99.80%	99.80%
0-120	700.29	99.92%	99.92%
0-180	700.89	100.00%	100.00%
60-90	145.37	20.74%	20.74%
90-120	0.80	0.11%	0.11%
90-130	0.86	0.12%	0.12%
90-150	1.05	0.15%	0.15%
90-180	1.38	0.20%	0.20%
0-60.71	560.71	80.00%	80.00%

ZONAL LUMEN SUMMARY

0-10	22.55
10-20	65.38
20-30	100.94
30-40	123.43
40-50	128.10
50-60	113.73
60-70	84.32
70-80	47.43
80-90	13.63
90-100	0.63
100-110	0.09
110-120	0.07
120-130	0.06
130-140	0.08
140-150	0.10
150-160	0.14
160-170	0.14
170-180	0.04



C0(Max): —————

C0/C180: —————

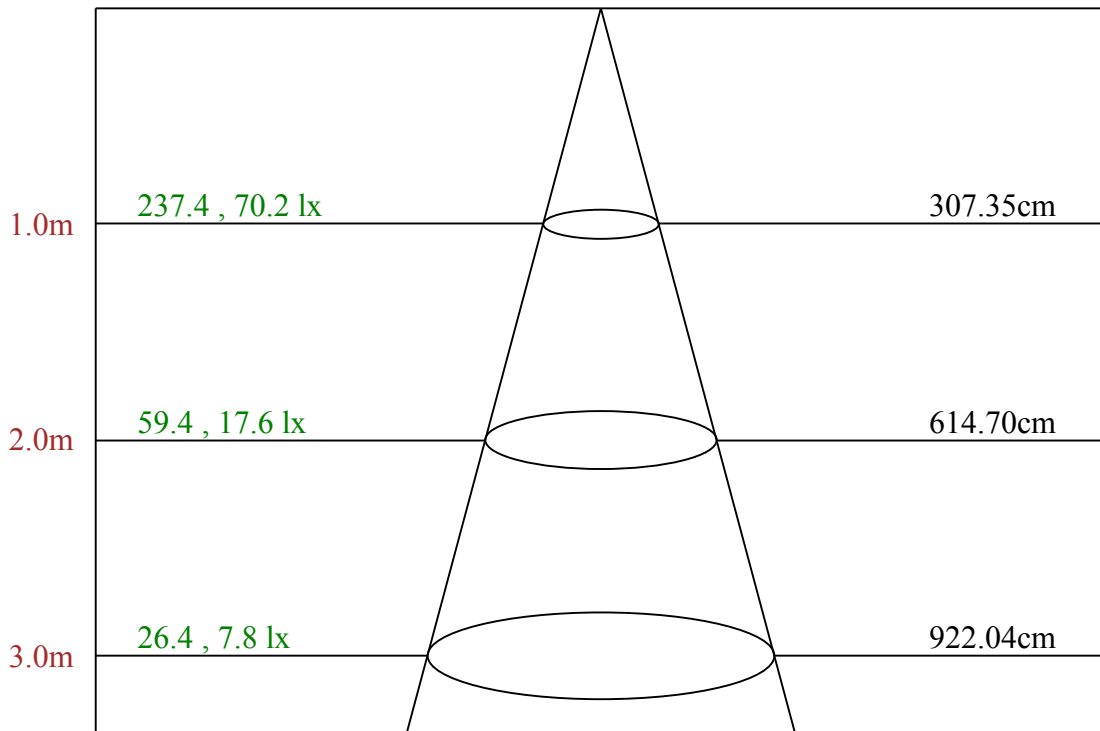
C90/C270: —————

Field angle(10%Imax):C0/180Left:79.7 Right:79.7

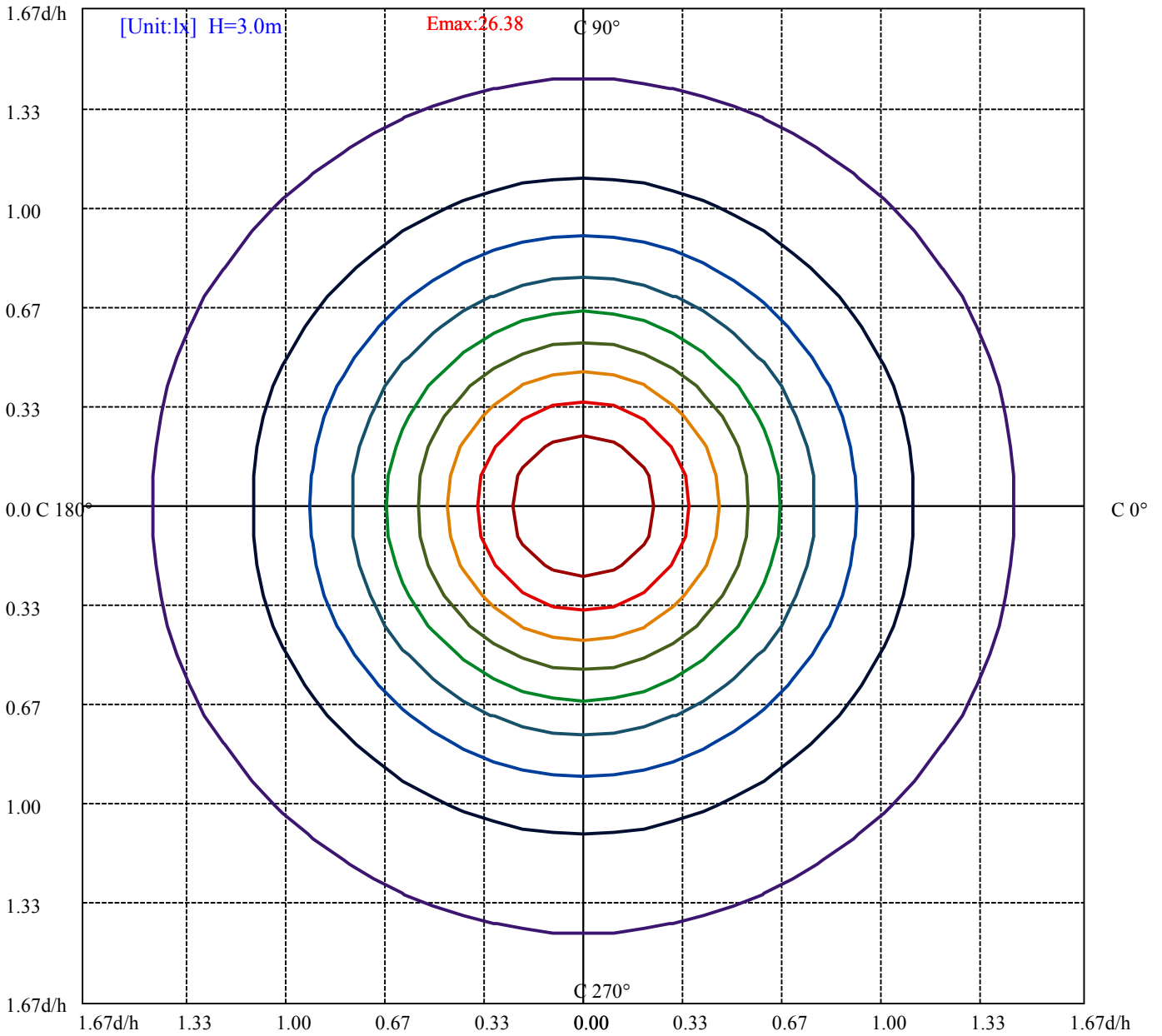
:C90/270Left:81.2 Right:81.2

Beam Angle(50%Imax):C0/180Left:56.9 Right:56.9

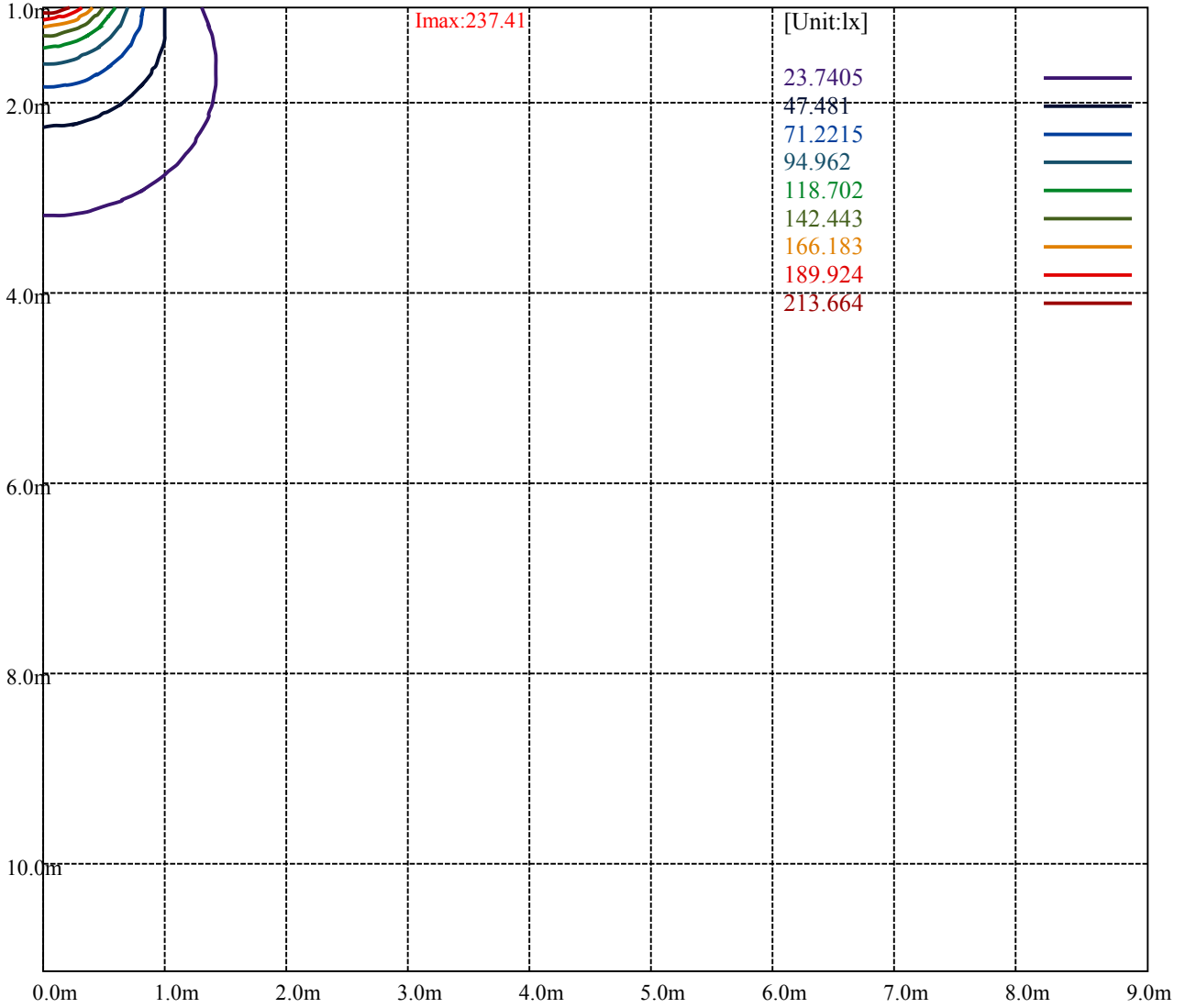
:C90/270Left:56.8 Right:56.8



Max , Ave Beam angle of C0 plane 113.89



- (10%Emax) 2.637833
- (20%Emax) 5.275667
- (30%Emax) 7.9135
- (40%Emax) 10.55133
- (50%Emax) 13.18911
- (60%Emax) 15.827
- (70%Emax) 18.46478
- (80%Emax) 21.10267
- (90%Emax) 23.74044



Luminance Table

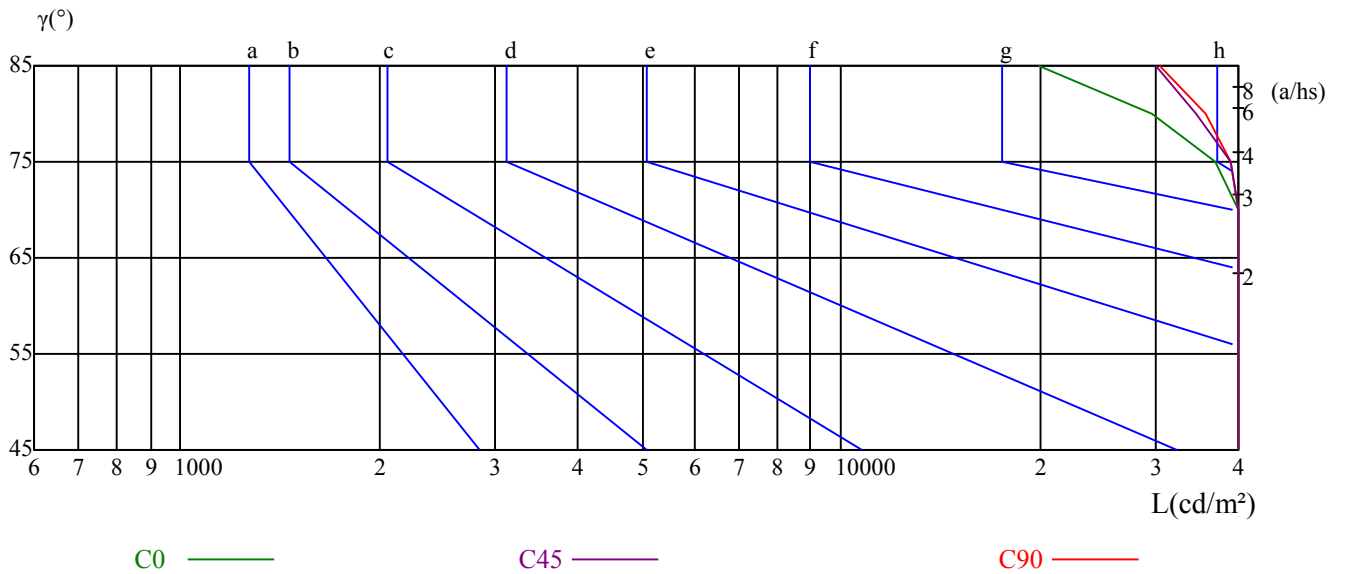
γ	45	50	55	60	65	70	75	80	85
C0	53073	51744	49988	47927	45182	42062	36849	29654	19886
C45	53094	51763	50108	47836	45171	42273	39012	34565	29943
C90	53019	51537	49887	47760	45256	42315	39022	35694	30380

L(Hor)(65)	L(Ver)(65)	L45(65)	L(Hor)(75)	L(Ver)(75)	L45(75)	L(Hor)(85)	L(Ver)(85)	L45(85)
45182	45256	45171	36849	39022	39012	19886	30380	29943

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 RHOFC=20 CU															
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	1.04	1.00	0.96	1.02	0.98	0.94	0.97	0.94	0.91	0.93	0.91	0.88	0.90	0.88	0.86	0.83
2	0.90	0.84	0.78	0.89	0.82	0.77	0.85	0.80	0.75	0.82	0.77	0.73	0.79	0.75	0.72	0.69
3	0.79	0.71	0.65	0.78	0.70	0.64	0.75	0.68	0.63	0.72	0.66	0.62	0.69	0.65	0.61	0.58
4	0.70	0.61	0.55	0.69	0.61	0.54	0.66	0.59	0.54	0.64	0.58	0.53	0.62	0.56	0.52	0.50
5	0.63	0.54	0.47	0.62	0.53	0.47	0.59	0.52	0.46	0.57	0.51	0.46	0.56	0.50	0.45	0.43
6	0.56	0.47	0.41	0.55	0.47	0.41	0.54	0.46	0.40	0.52	0.45	0.40	0.50	0.44	0.40	0.38
7	0.51	0.42	0.36	0.50	0.42	0.36	0.49	0.41	0.36	0.47	0.40	0.35	0.46	0.40	0.35	0.33
8	0.47	0.38	0.32	0.46	0.38	0.32	0.45	0.37	0.32	0.43	0.37	0.32	0.42	0.36	0.31	0.30
9	0.43	0.34	0.29	0.42	0.34	0.29	0.41	0.34	0.29	0.40	0.33	0.28	0.39	0.33	0.28	0.26
10	0.39	0.31	0.26	0.39	0.31	0.26	0.38	0.31	0.26	0.37	0.30	0.26	0.36	0.30	0.26	0.24

Intensity data(cd)

C/γ(°)	0.0	5.0	10.0	15.0	20.0	25.0	30.0	35.0	40.0
0.0	237.40	237.40	235.19	232.45	227.14	220.41	211.03	199.43	185.71
15.0	237.40	237.40	235.19	232.45	227.14	220.41	211.03	199.43	185.71
30.0	237.40	237.40	235.19	232.45	227.14	220.41	211.03	199.43	185.71
45.0	237.40	237.40	235.90	233.06	228.54	222.43	214.19	202.49	189.64
60.0	237.40	237.40	235.90	233.06	228.54	222.43	214.19	202.49	189.64
75.0	237.40	237.40	235.90	233.06	228.54	222.43	214.19	202.49	189.64
90.0	237.40	237.05	235.99	233.42	229.25	223.31	214.90	204.62	191.86
105.0	237.40	237.05	235.99	233.42	229.25	223.31	214.90	204.62	191.86
120.0	237.40	237.05	235.99	233.42	229.25	223.31	214.90	204.62	191.86
135.0	237.40	237.58	235.81	233.50	228.88	222.85	214.60	203.95	190.90
150.0	237.40	237.58	235.81	233.50	228.88	222.85	214.60	203.95	190.90
165.0	237.40	237.58	235.81	233.50	228.88	222.85	214.60	203.95	190.90
180.0	237.40	236.87	234.40	230.59	224.57	217.67	207.93	195.27	180.13
195.0	237.40	236.61	234.04	229.61	223.40	215.52	204.62	191.06	175.55
210.0	237.40	236.61	234.04	229.61	223.40	215.52	204.62	191.06	175.55
225.0	237.40	236.61	234.04	229.61	223.40	215.52	204.62	191.06	175.55
240.0	237.40	236.70	233.68	228.37	222.34	214.28	202.58	189.02	172.80
255.0	237.40	236.70	233.68	228.37	222.34	214.28	202.58	189.02	172.80
270.0	237.40	236.70	233.68	228.37	222.34	214.28	202.58	189.02	172.80
285.0	237.40	235.98	233.68	229.59	223.03	214.33	204.75	190.81	174.93
300.0	237.40	235.98	233.68	229.59	223.03	214.33	204.75	190.81	174.93
315.0	237.40	235.98	233.68	229.59	223.03	214.33	204.75	190.81	174.93
330.0	237.40	237.40	235.19	232.45	227.14	220.41	211.03	199.43	185.71
345.0	237.40	237.40	235.19	232.45	227.14	220.41	211.03	199.43	185.71
360.0	237.40	237.40	235.19	232.45	227.14	220.41	211.03	199.43	185.71
C/γ(°)	45.0	50.0	55.0	60.0	65.0	70.0	75.0	80.0	85.0
0.0	168.98	150.57	130.03	109.32	88.08	66.92	45.50	25.76	9.03
15.0	168.98	150.57	130.03	109.32	88.08	66.92	45.50	25.76	9.03
30.0	168.98	150.57	130.03	109.32	88.08	66.92	45.50	25.76	9.03
45.0	173.96	155.61	136.56	115.11	93.67	73.20	53.61	33.59	16.84
60.0	173.96	155.61	136.56	115.11	93.67	73.20	53.61	33.59	16.84
75.0	173.96	155.61	136.56	115.11	93.67	73.20	53.61	33.59	16.84
90.0	176.26	157.83	138.77	118.30	97.57	76.21	56.27	37.93	20.82
105.0	176.26	157.83	138.77	118.30	97.57	76.21	56.27	37.93	20.82
120.0	176.26	157.83	138.77	118.30	97.57	76.21	56.27	37.93	20.82
135.0	175.19	157.97	138.45	117.42	96.91	74.73	55.11	36.65	20.59
150.0	175.19	157.97	138.45	117.42	96.91	74.73	55.11	36.65	20.59
165.0	175.19	157.97	138.45	117.42	96.91	74.73	55.11	36.65	20.59
180.0	162.61	143.31	123.31	102.42	80.64	60.19	38.77	19.74	6.28
195.0	158.09	137.71	117.06	95.88	73.91	54.41	35.00	17.99	4.79
210.0	158.09	137.71	117.06	95.88	73.91	54.41	35.00	17.99	4.79
225.0	158.09	137.71	117.06	95.88	73.91	54.41	35.00	17.99	4.79
240.0	154.99	134.88	114.05	92.69	71.43	51.66	32.97	16.84	2.57
255.0	154.99	134.88	114.05	92.69	71.43	51.66	32.97	16.84	2.57
270.0	154.99	134.88	114.05	92.69	71.43	51.66	32.97	16.84	2.57
285.0	156.20	136.67	115.82	94.25	72.86	53.16	34.70	17.84	3.90
300.0	156.20	136.67	115.82	94.25	72.86	53.16	34.70	17.84	3.90
315.0	156.20	136.67	115.82	94.25	72.86	53.16	34.70	17.84	3.90
330.0	168.98	150.57	130.03	109.32	88.08	66.92	45.50	25.76	9.03
345.0	168.98	150.57	130.03	109.32	88.08	66.92	45.50	25.76	9.03
360.0	168.98	150.57	130.03	109.32	88.08	66.92	45.50	25.76	9.03

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	0.35	0.09	0.00	0.00	0.00	0.00	0.00	0.00	0.09
15.0	0.35	0.09	0.00	0.00	0.00	0.00	0.00	0.00	0.09
30.0	0.35	0.09	0.00	0.00	0.00	0.00	0.00	0.00	0.09
45.0	3.90	0.09	0.00	0.00	0.00	0.00	0.00	0.09	0.00
60.0	3.90	0.09	0.00	0.00	0.00	0.00	0.00	0.09	0.00
75.0	3.90	0.09	0.00	0.00	0.00	0.00	0.00	0.09	0.00
90.0	6.03	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
105.0	6.03	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
120.0	6.03	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
135.0	5.59	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.09
150.0	5.59	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.09
165.0	5.59	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.09
180.0	0.18	0.00	0.09	0.09	0.18	0.09	0.09	0.09	0.09
195.0	0.18	0.09	0.18	0.18	0.09	0.18	0.18	0.09	0.09
210.0	0.18	0.09	0.18	0.18	0.09	0.18	0.18	0.09	0.09
225.0	0.18	0.09	0.18	0.18	0.09	0.18	0.18	0.09	0.09
240.0	0.18	0.18	0.27	0.27	0.27	0.27	0.18	0.18	0.09
255.0	0.18	0.18	0.27	0.27	0.27	0.27	0.18	0.18	0.09
270.0	0.18	0.18	0.27	0.27	0.27	0.27	0.18	0.18	0.09
285.0	0.18	0.09	0.18	0.27	0.18	0.18	0.09	0.18	0.18
300.0	0.18	0.09	0.18	0.27	0.18	0.18	0.09	0.18	0.18
315.0	0.18	0.09	0.18	0.27	0.18	0.18	0.09	0.18	0.18
330.0	0.35	0.09	0.00	0.00	0.00	0.00	0.00	0.00	0.09
345.0	0.35	0.09	0.00	0.00	0.00	0.00	0.00	0.00	0.09
360.0	0.35	0.09	0.00	0.00	0.00	0.00	0.00	0.00	0.09
C/γ(°)	135.0	140.0	145.0	150.0	155.0	160.0	165.0	170.0	175.0
0.0	0.18	0.09	0.18	0.27	0.35	0.35	0.44	0.71	0.62
15.0	0.18	0.09	0.18	0.27	0.35	0.35	0.44	0.71	0.62
30.0	0.18	0.09	0.18	0.27	0.35	0.35	0.44	0.71	0.62
45.0	0.18	0.18	0.27	0.27	0.35	0.35	0.53	0.62	0.62
60.0	0.18	0.18	0.27	0.27	0.35	0.35	0.53	0.62	0.62
75.0	0.18	0.18	0.27	0.27	0.35	0.35	0.53	0.62	0.62
90.0	0.09	0.09	0.18	0.18	0.27	0.44	0.53	0.62	0.53
105.0	0.09	0.09	0.18	0.18	0.27	0.44	0.53	0.62	0.53
120.0	0.09	0.09	0.18	0.18	0.27	0.44	0.53	0.62	0.53
135.0	0.18	0.18	0.18	0.18	0.35	0.44	0.53	0.62	0.62
150.0	0.18	0.18	0.18	0.18	0.35	0.44	0.53	0.62	0.62
165.0	0.18	0.18	0.18	0.18	0.35	0.44	0.53	0.62	0.62
180.0	0.00	0.09	0.18	0.18	0.27	0.35	0.44	0.53	0.62
195.0	0.09	0.09	0.18	0.18	0.27	0.35	0.53	0.62	0.62
210.0	0.09	0.09	0.18	0.18	0.27	0.35	0.53	0.62	0.62
225.0	0.09	0.09	0.18	0.18	0.27	0.35	0.53	0.62	0.62
240.0	0.09	0.09	0.18	0.18	0.35	0.44	0.53	0.53	0.62
255.0	0.09	0.09	0.18	0.18	0.35	0.44	0.53	0.53	0.62
270.0	0.09	0.09	0.18	0.18	0.35	0.44	0.53	0.53	0.62
285.0	0.09	0.09	0.09	0.18	0.35	0.35	0.53	0.53	0.62
300.0	0.09	0.09	0.09	0.18	0.35	0.35	0.53	0.53	0.62
315.0	0.09	0.09	0.09	0.18	0.35	0.35	0.53	0.53	0.62
330.0	0.18	0.09	0.18	0.27	0.35	0.35	0.44	0.71	0.62
345.0	0.18	0.09	0.18	0.27	0.35	0.35	0.44	0.71	0.62
360.0	0.18	0.09	0.18	0.27	0.35	0.35	0.44	0.71	0.62

Intensity data(cd)

C/γ(°)	180.0
0.0	0.62
15.0	0.62
30.0	0.62
45.0	0.62
60.0	0.62
75.0	0.62
90.0	0.71
105.0	0.71
120.0	0.71
135.0	0.62
150.0	0.62
165.0	0.62
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	0.62
345.0	0.62
360.0	0.62