IES Indoor Report

Photometric Filename:HCP-1022202+HCP-1032202 5000K 60D.IES

Indoor Luminaire Photometric Data

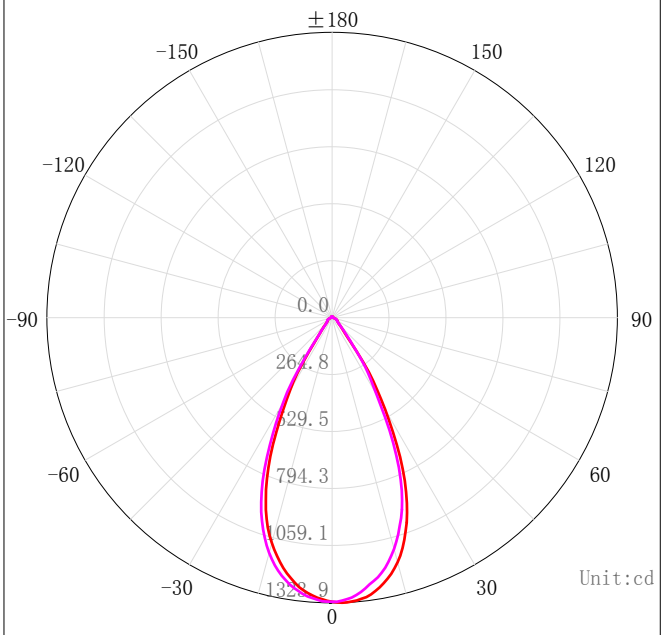
Description Information

Luminary Name: HCP-1022202+HCP-1032202 5000K 60D		Lum. Catelog:	Test ID: 01
Lamp Name:		Lamp Catelog: LED	Test Date: 2020/11/24
Manufacture: Havit Commercial		Shld.Ang(°):	Test Machine:GON-2000
Test Lab: Quality Department		Frequency(Hz):	Lamp CCT(K): Ra:
Lum.Size(W*L*H):0.000m*0.000m*0.000m		Lum.Area(m2):0.000	Lum.W(kg): 0.000
Test System: C, γ	Test Step: C=90.0 γ=1.0	Temp.(℃): 25	Humidity(%):

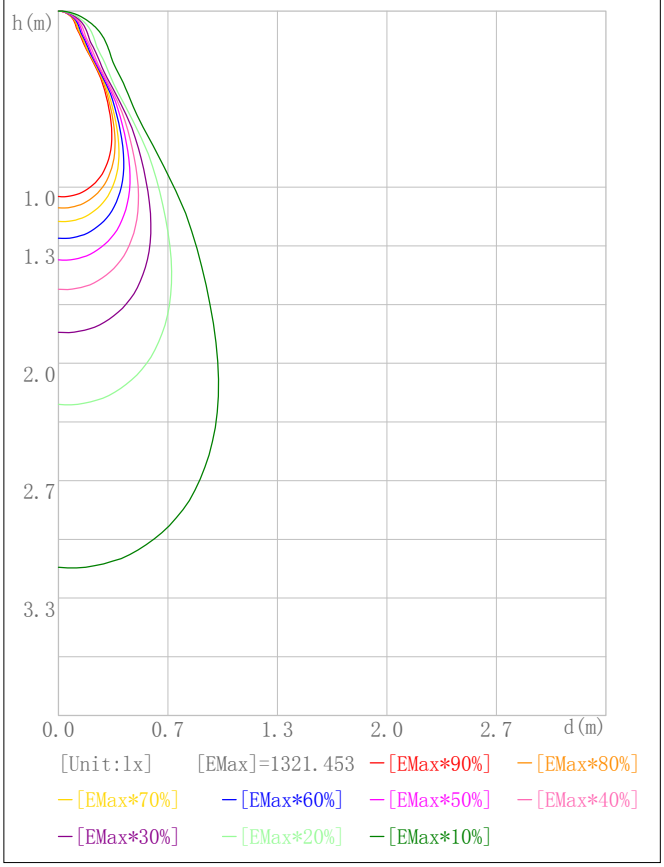
Character Parameter

Lamp Speciality Parameter	Luminaire Speciality Parameter	
Rated Flux(lm): 1001.790	Luminary Flux(lm): 1001.794	Field Angle(10%Imax): 73.1(°)
Rated Power(W):	Luminary Efficiency: 100.00%	Down Lumens&Percent: 990.855lm 98.91%
Rated Voltage(V):	Luminary EER(lm/W): 68.289	Up Lumens&Percent: 10.939lm 1.09%
Tested Power(W): 14.670	Max.Candela(cd): 1323.871	S/MH: C0_a180=0.832 C90_270=0.833
Lamps' Inside: 1	Max Cand@Ang.(°): C=0.0 γ=2.0	CIE Type: Semi-Direct
Tested Electrics(V,A,pf):240.3,0.063	Beam Angle(50%Imax): 51.7(°)	ErP Φuse(90°): 899.899lm
Lamp Size(W*L*H):0.000m*0.000m*0.000m	Left=-24.7° ,Right=27.0°	IRF(%): 284.852

C Plane Distribution Diagram

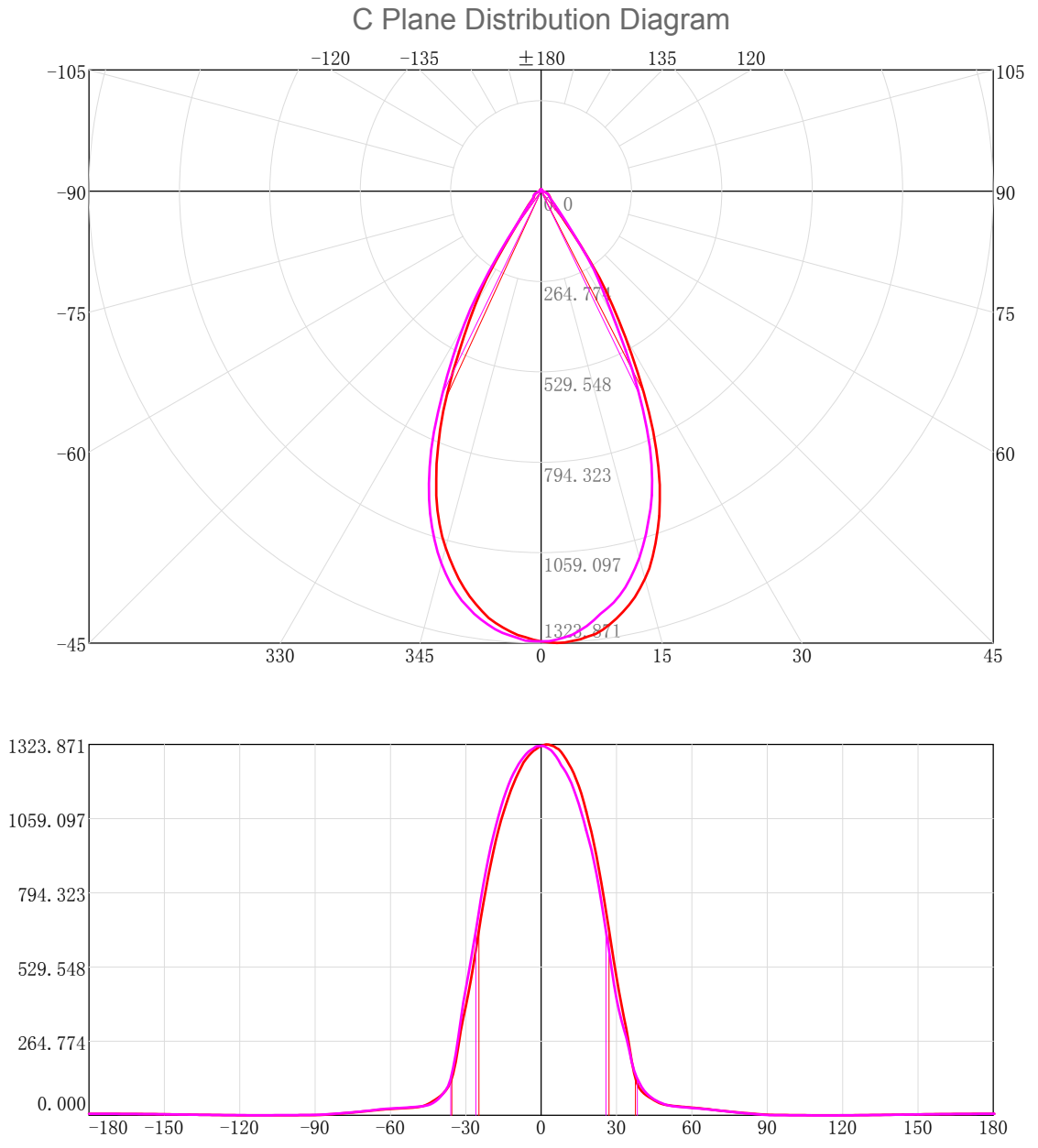


C0 Space ISO Illuminance Curve



2D Plane Light Intensity Distribution Curve

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24

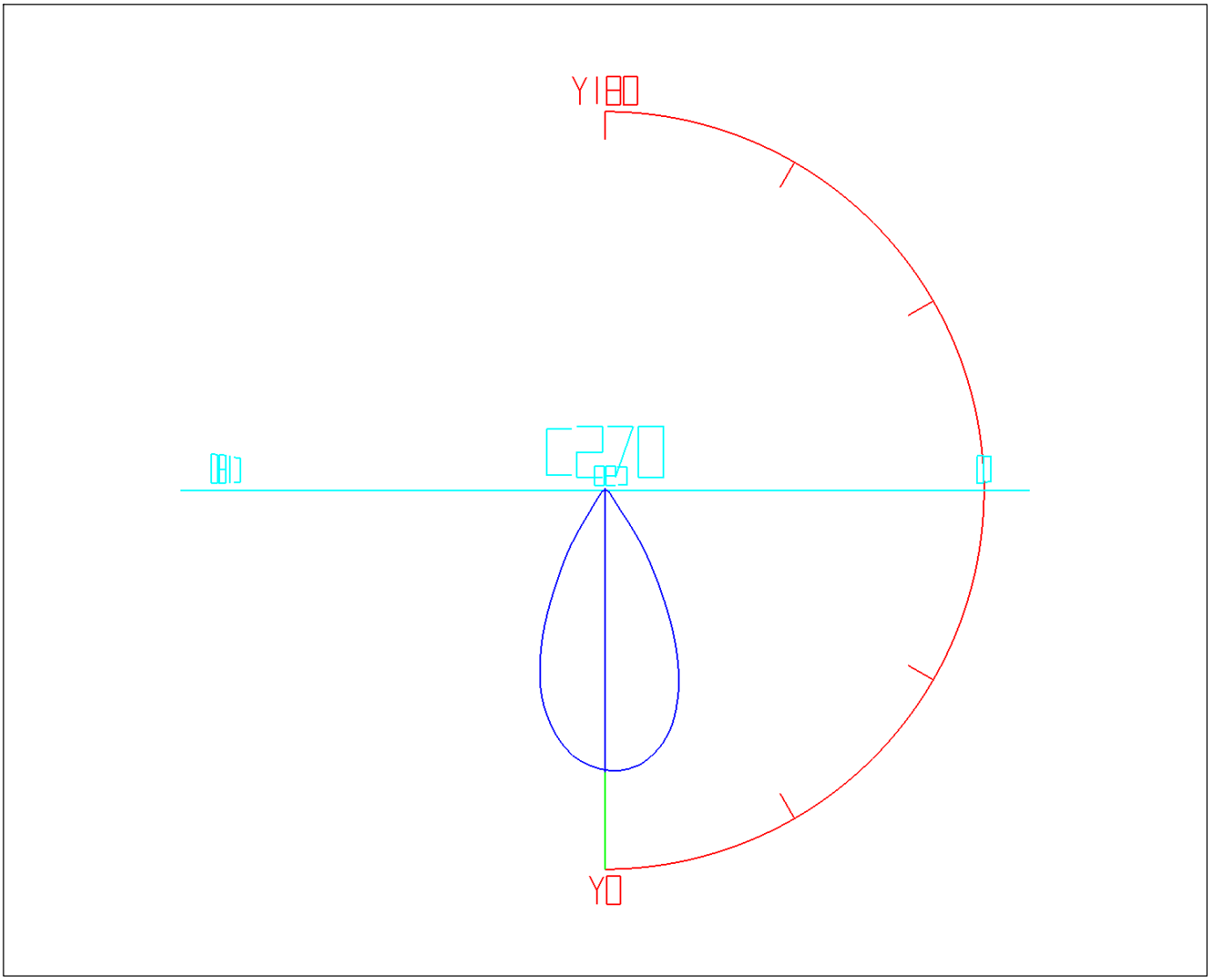


C Plane	[50%MaxAng.]	[10%MaxAng.]	Unit:cd
C0.0_180.0 :	51.7	73.1	
C90.0_270.0 :	51.8	74.2	

3D Light Intensity Distribution Modal

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24

3D Light Intensity Distribution Modal



Curves: 3D Model Fixture Vert. HUD Hori. HUD
View Angles: Orient:0 Tilt:0 Roll:0 Spin:0

Zonal Flux Tabulation

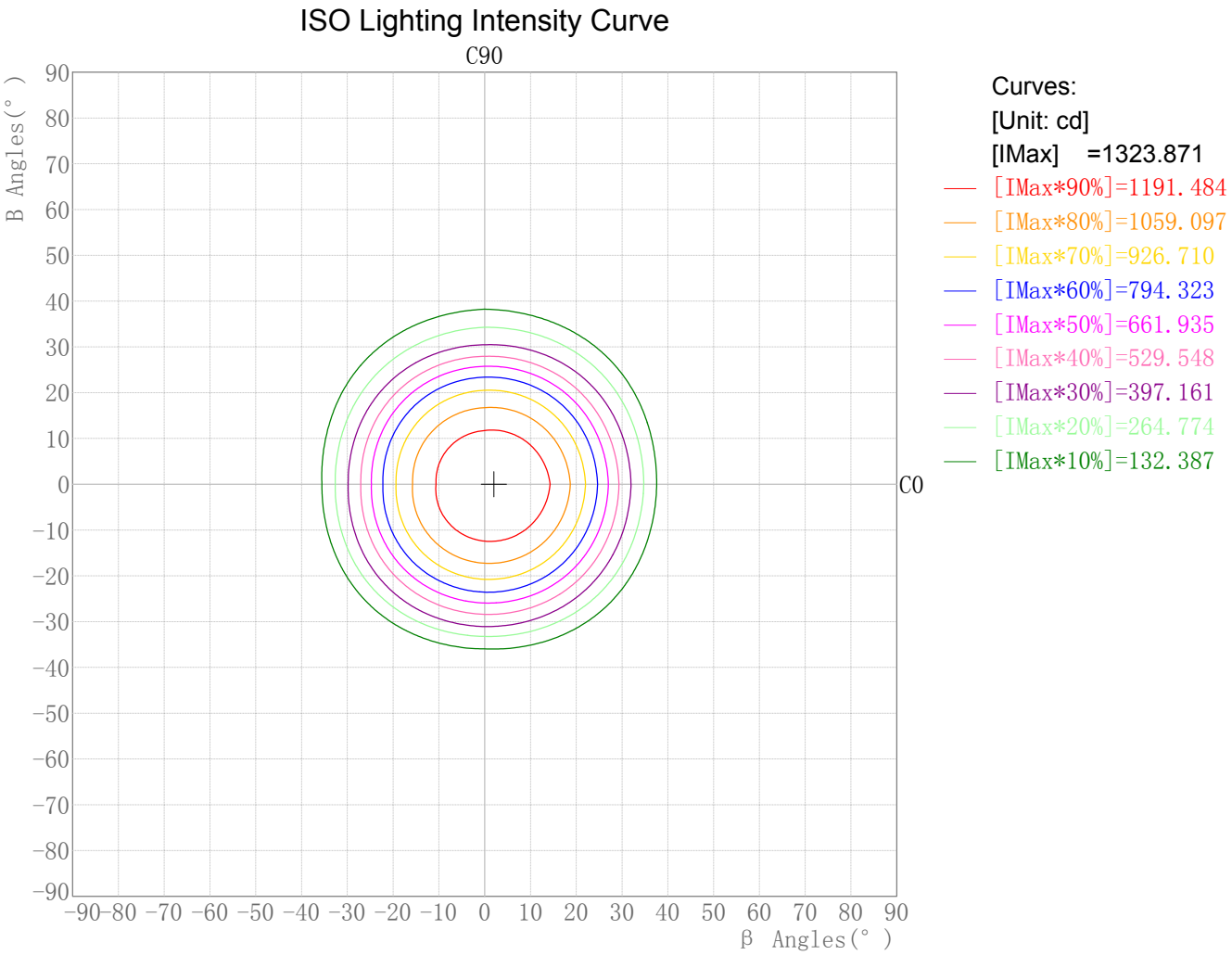
Zone(γ)	Zone Flux (lm)	Sums Flux (lm)	Zone%Lamp	Sums%Lamp	Zone(γ)	Zone Flux (lm)	Sums Flux (lm)	Zone%Lamp	Sums%Lamp
0.0-1.0	1.26	1.26	0.13	0.13	47.0-48.0	3.11	919.82	0.31	91.82
1.0-2.0	3.78	5.04	0.38	0.50	48.0-49.0	2.96	922.77	0.30	92.11
2.0-3.0	6.28	11.32	0.63	1.13	49.0-50.0	2.84	925.62	0.28	92.40
3.0-4.0	8.76	20.08	0.87	2.00	50.0-51.0	2.77	928.39	0.28	92.67
4.0-5.0	11.20	31.27	1.12	3.12	51.0-52.0	2.72	931.10	0.27	92.94
5.0-6.0	13.59	44.86	1.36	4.48	52.0-53.0	2.67	933.78	0.27	93.21
6.0-7.0	15.93	60.79	1.59	6.07	53.0-54.0	2.64	936.41	0.26	93.47
7.0-8.0	18.19	78.98	1.82	7.88	54.0-55.0	2.60	939.02	0.26	93.73
8.0-9.0	20.37	99.34	2.03	9.92	55.0-56.0	2.57	941.59	0.26	93.99
9.0-10.0	22.47	121.82	2.24	12.16	56.0-57.0	2.54	944.13	0.25	94.24
10.0-11.0	24.48	146.30	2.44	14.60	57.0-58.0	2.51	946.64	0.25	94.49
11.0-12.0	26.37	172.67	2.63	17.24	58.0-59.0	2.48	949.12	0.25	94.74
12.0-13.0	28.13	200.81	2.81	20.04	59.0-60.0	2.44	951.56	0.24	94.99
13.0-14.0	29.74	230.55	2.97	23.01	60.0-61.0	2.40	953.96	0.24	95.23
14.0-15.0	31.21	261.76	3.12	26.13	61.0-62.0	2.36	956.32	0.24	95.46
15.0-16.0	32.52	294.28	3.25	29.38	62.0-63.0	2.31	958.63	0.23	95.69
16.0-17.0	33.62	327.90	3.36	32.73	63.0-64.0	2.26	960.89	0.23	95.92
17.0-18.0	34.51	362.41	3.44	36.18	64.0-65.0	2.19	963.08	0.22	96.14
18.0-19.0	35.19	397.60	3.51	39.69	65.0-66.0	2.12	965.20	0.21	96.35
19.0-20.0	35.65	433.24	3.56	43.25	66.0-67.0	2.04	967.24	0.20	96.55
20.0-21.0	35.84	469.08	3.58	46.82	67.0-68.0	1.95	969.19	0.19	96.75
21.0-22.0	35.75	504.83	3.57	50.39	68.0-69.0	1.86	971.04	0.19	96.93
22.0-23.0	35.36	540.19	3.53	53.92	69.0-70.0	1.77	972.82	0.18	97.11
23.0-24.0	34.65	574.85	3.46	57.38	70.0-71.0	1.68	974.50	0.17	97.28
24.0-25.0	33.59	608.44	3.35	60.74	71.0-72.0	1.60	976.10	0.16	97.44
25.0-26.0	32.21	640.65	3.22	63.95	72.0-73.0	1.51	977.61	0.15	97.59
26.0-27.0	30.59	671.24	3.05	67.00	73.0-74.0	1.42	979.03	0.14	97.73
27.0-28.0	28.78	700.02	2.87	69.88	74.0-75.0	1.34	980.37	0.13	97.86
28.0-29.0	26.87	726.89	2.68	72.56	75.0-76.0	1.25	981.62	0.12	97.99
29.0-30.0	24.95	751.84	2.49	75.05	76.0-77.0	1.17	982.78	0.12	98.10
30.0-31.0	23.07	774.91	2.30	77.35	77.0-78.0	1.08	983.87	0.11	98.21
31.0-32.0	21.07	795.98	2.10	79.46	78.0-79.0	1.00	984.86	0.10	98.31
32.0-33.0	18.81	814.79	1.88	81.33	79.0-80.0	0.92	985.78	0.09	98.40
33.0-34.0	16.43	831.22	1.64	82.97	80.0-81.0	0.84	986.62	0.08	98.49
34.0-35.0	13.95	845.17	1.39	84.37	81.0-82.0	0.76	987.38	0.08	98.56
35.0-36.0	11.47	856.64	1.15	85.51	82.0-83.0	0.68	988.06	0.07	98.63
36.0-37.0	9.42	866.06	0.94	86.45	83.0-84.0	0.61	988.66	0.06	98.69
37.0-38.0	7.93	873.99	0.79	87.24	84.0-85.0	0.53	989.19	0.05	98.74
38.0-39.0	6.88	880.86	0.69	87.93	85.0-86.0	0.46	989.65	0.05	98.79
39.0-40.0	6.10	886.97	0.61	88.54	86.0-87.0	0.39	990.05	0.04	98.83
40.0-41.0	5.47	892.44	0.55	89.08	87.0-88.0	0.33	990.37	0.03	98.86
41.0-42.0	4.96	897.40	0.50	89.58	88.0-89.0	0.27	990.64	0.03	98.89
42.0-43.0	4.53	901.93	0.45	90.03	89.0-90.0	0.22	990.85	0.02	98.91
43.0-44.0	4.14	906.07	0.41	90.45	90.0-91.0	0.18	991.04	0.02	98.93
44.0-45.0	3.81	909.88	0.38	90.83	91.0-92.0	0.17	991.20	0.02	98.94
45.0-46.0	3.53	913.41	0.35	91.18	92.0-93.0	0.16	991.36	0.02	98.96
46.0-47.0	3.30	916.71	0.33	91.51	93.0-94.0	0.15	991.51	0.01	98.97

Zonal Flux Tabulation - (Cont.)

Zone(γ)	Zone Flux (lm)	Sums Flux (lm)	Zone%Lamp	Sums%Lamp
94.0-95.0	0.14	991.64	0.01	98.99
95.0-96.0	0.13	991.77	0.01	99.00
96.0-97.0	0.12	991.89	0.01	99.01
97.0-98.0	0.11	992.00	0.01	99.02
98.0-99.0	0.10	992.11	0.01	99.03
99.0-100.0	0.10	992.21	0.01	99.04
100.0-101.0	0.09	992.30	0.01	99.05
101.0-102.0	0.08	992.38	0.01	99.06
102.0-103.0	0.08	992.46	0.01	99.07
103.0-104.0	0.07	992.53	0.01	99.08
104.0-105.0	0.07	992.60	0.01	99.08
105.0-106.0	0.06	992.67	0.01	99.09
106.0-107.0	0.06	992.73	0.01	99.10
107.0-108.0	0.06	992.78	0.01	99.10
108.0-109.0	0.05	992.83	0.01	99.11
109.0-110.0	0.05	992.88	0.01	99.11
110.0-111.0	0.05	992.93	0.00	99.12
111.0-112.0	0.05	992.98	0.00	99.12
112.0-113.0	0.05	993.03	0.00	99.13
113.0-114.0	0.05	993.07	0.00	99.13
114.0-115.0	0.05	993.12	0.00	99.13
115.0-116.0	0.05	993.16	0.00	99.14
116.0-117.0	0.05	993.21	0.00	99.14
117.0-118.0	0.05	993.27	0.01	99.15
118.0-119.0	0.05	993.32	0.01	99.15
119.0-120.0	0.06	993.38	0.01	99.16
120.0-121.0	0.06	993.44	0.01	99.17
121.0-122.0	0.07	993.50	0.01	99.17
122.0-123.0	0.07	993.57	0.01	99.18
123.0-124.0	0.08	993.65	0.01	99.19
124.0-125.0	0.08	993.73	0.01	99.20
125.0-126.0	0.09	993.82	0.01	99.20
126.0-127.0	0.09	993.92	0.01	99.21
127.0-128.0	0.10	994.02	0.01	99.22
128.0-129.0	0.11	994.12	0.01	99.23
129.0-130.0	0.11	994.24	0.01	99.25
130.0-131.0	0.12	994.36	0.01	99.26
131.0-132.0	0.13	994.49	0.01	99.27
132.0-133.0	0.14	994.62	0.01	99.28
133.0-134.0	0.14	994.77	0.01	99.30
134.0-135.0	0.15	994.91	0.01	99.31
135.0-136.0	0.16	995.07	0.02	99.33
136.0-137.0	0.16	995.23	0.02	99.35
137.0-138.0	0.17	995.40	0.02	99.36
138.0-139.0	0.17	995.58	0.02	99.38
139.0-140.0	0.18	995.76	0.02	99.40
140.0-141.0	0.19	995.94	0.02	99.42
141.0-142.0	0.19	996.13	0.02	99.44
142.0-143.0	0.20	996.33	0.02	99.45
143.0-144.0	0.20	996.53	0.02	99.47
144.0-145.0	0.20	996.73	0.02	99.49
145.0-146.0	0.21	996.94	0.02	99.52
146.0-147.0	0.21	997.14	0.02	99.54
147.0-148.0	0.21	997.35	0.02	99.56
148.0-149.0	0.21	997.57	0.02	99.58
149.0-150.0	0.21	997.78	0.02	99.60
150.0-151.0	0.21	997.99	0.02	99.62
151.0-152.0	0.21	998.20	0.02	99.64
152.0-153.0	0.21	998.41	0.02	99.66
153.0-154.0	0.21	998.62	0.02	99.68
154.0-155.0	0.21	998.83	0.02	99.70
155.0-156.0	0.20	999.03	0.02	99.72
156.0-157.0	0.20	999.23	0.02	99.74
157.0-158.0	0.19	999.43	0.02	99.76
158.0-159.0	0.19	999.62	0.02	99.78
159.0-160.0	0.18	999.80	0.02	99.80
160.0-161.0	0.18	999.98	0.02	99.82
161.0-162.0	0.17	1000.15	0.02	99.84
162.0-163.0	0.17	1000.31	0.02	99.85
163.0-164.0	0.16	1000.47	0.02	99.87
164.0-165.0	0.15	1000.62	0.02	99.88
165.0-166.0	0.14	1000.77	0.01	99.90
166.0-167.0	0.14	1000.90	0.01	99.91
167.0-168.0	0.13	1001.03	0.01	99.92
168.0-169.0	0.12	1001.15	0.01	99.94
169.0-170.0	0.11	1001.26	0.01	99.95
170.0-171.0	0.10	1001.36	0.01	99.96
171.0-172.0	0.09	1001.45	0.01	99.97
172.0-173.0	0.08	1001.53	0.01	99.97
173.0-174.0	0.07	1001.60	0.01	99.98
174.0-175.0	0.06	1001.66	0.01	99.99
175.0-176.0	0.05	1001.71	0.00	99.99
176.0-177.0	0.04	1001.74	0.00	100.00
177.0-178.0	0.03	1001.77	0.00	100.00
178.0-179.0	0.02	1001.79	0.00	100.00
179.0-180.0	0.01	1001.79	0.00	100.00

Rectangle ISO Lighting Intensity Diagram

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24

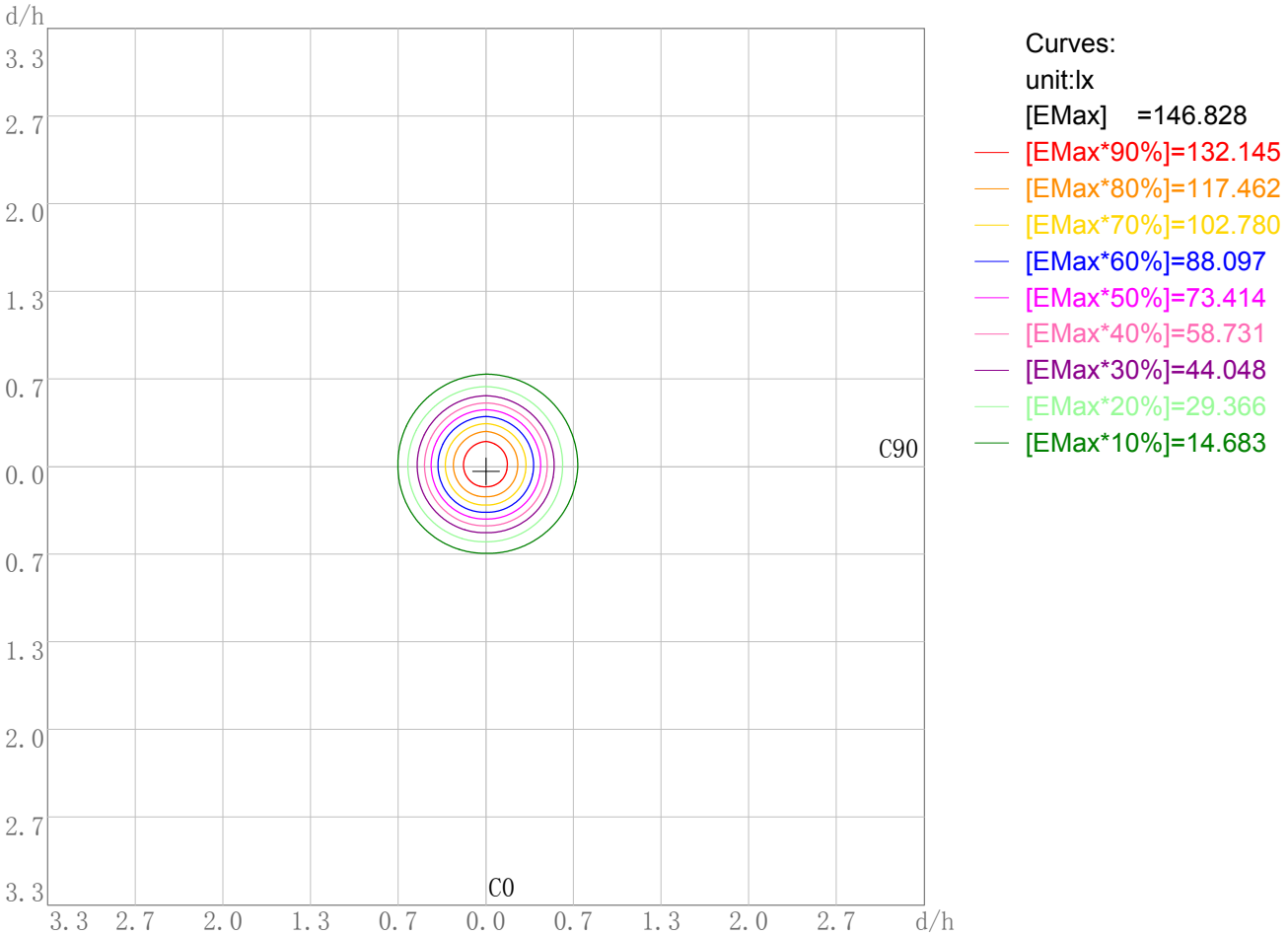


Maximum Light Intensity(cd): 1323.87
Maximum Cand.@Angle: H=2.0°,V=0.0°

Plane ISO-Illuminance Diagram

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24

Plane ISO-Illuminance Curve

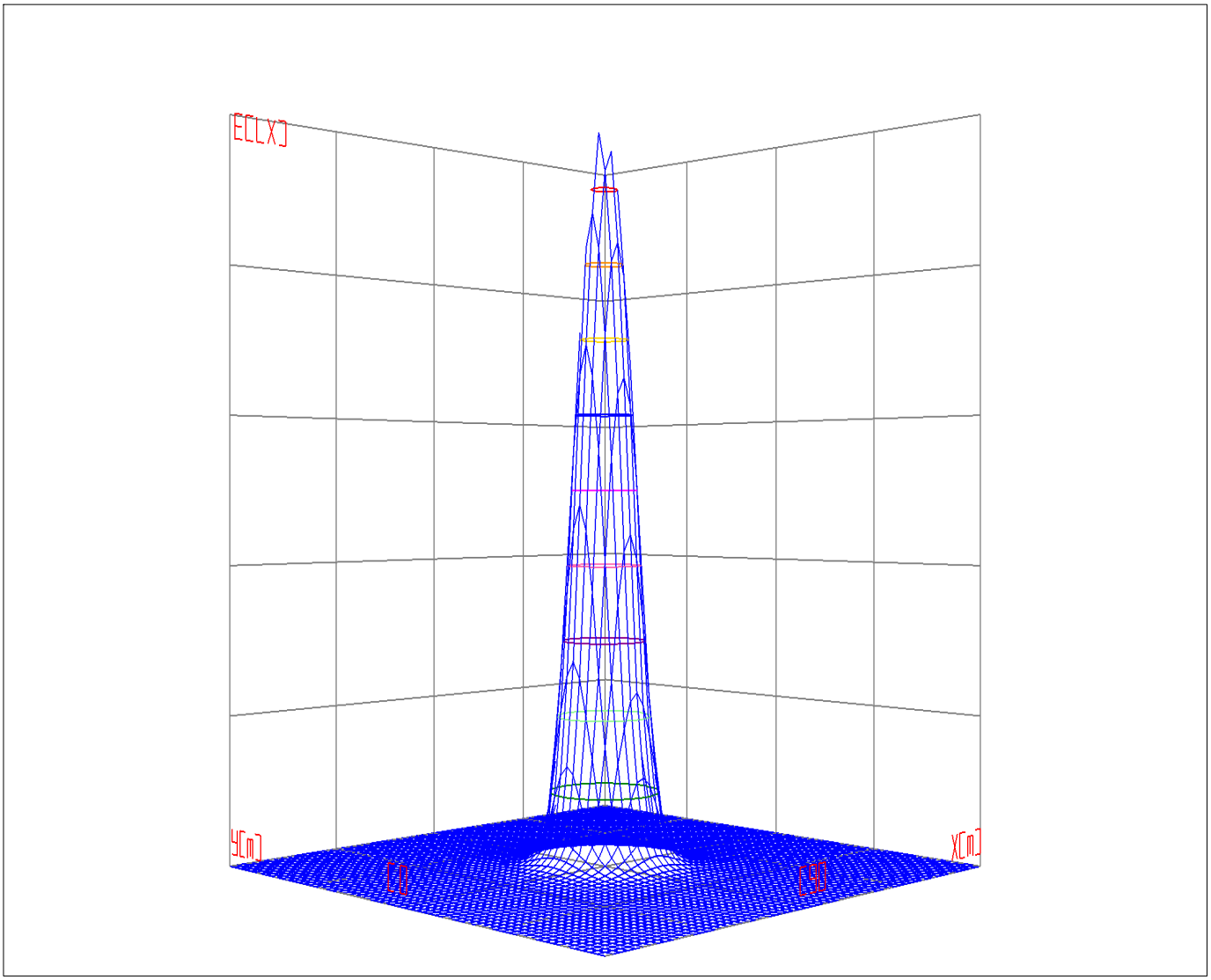


Working Plane Luminaire Mounting Height(m): 3.00
Working Plane Maximum Illuminance(lx): 146.83
Working Plane Maximum Illuminance Position(d/h):H0.0 V0.0

3D Plane ISO Illuminance Diagram

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24

3D Plane Illuminance Modal

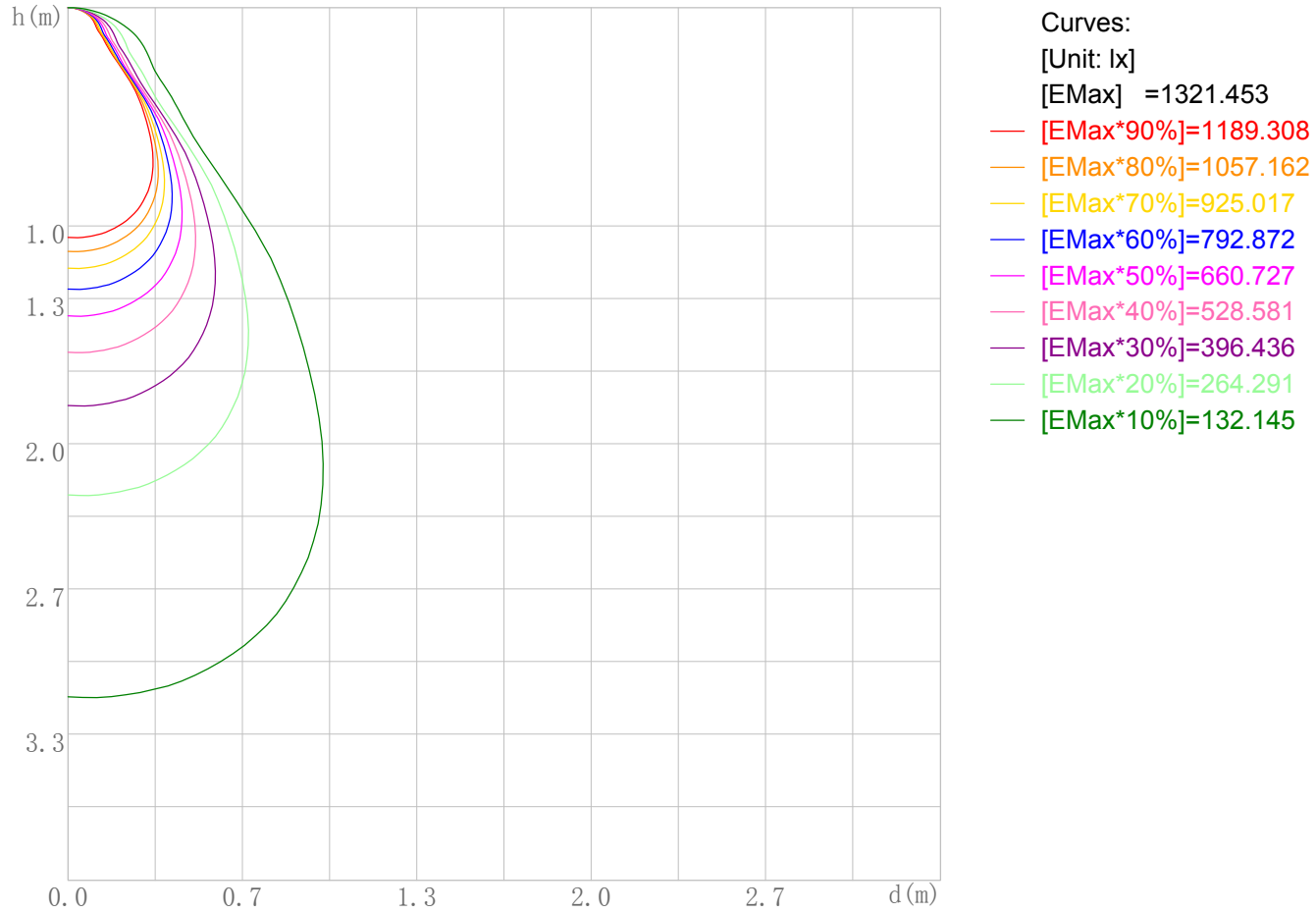


Curves: 3D Model 90% 80% 70% 60% 50% 40% 30% 20% 10%
View Angles(deg): 0 Height(m): 3.0 Distance(m): 10.0

Space ISO Illuminance Diagram

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24

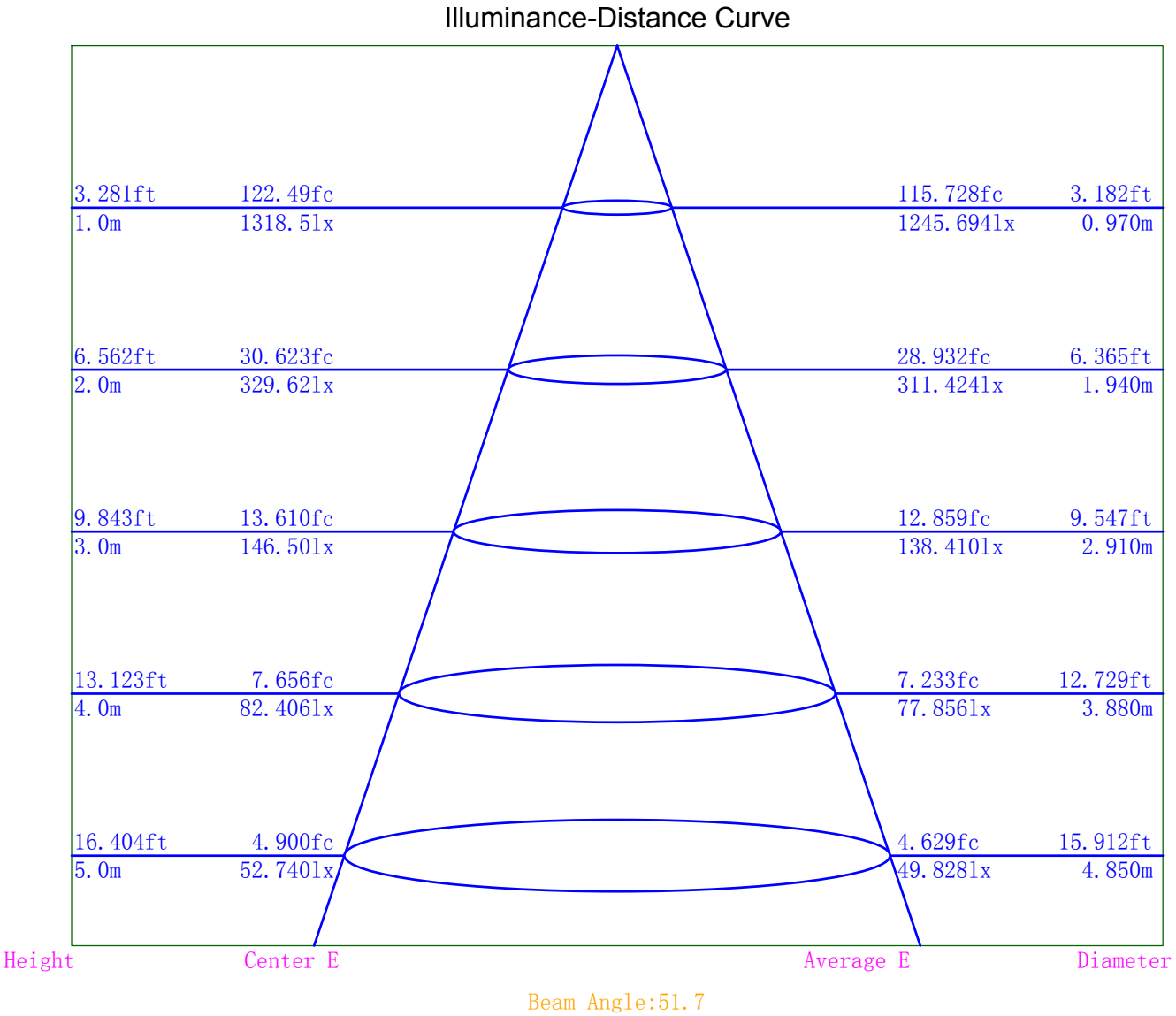
Space ISO Illuminance Curve



Space Plane Maximum Illuminance and @Angle:1321.45lx,2.0deg
Plane Maximum Lighting Intensity and @Angle:1323.871cd,0eg

Illuminance-Distance Diagram

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24



Indoor Luminance Limiting Curves

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24

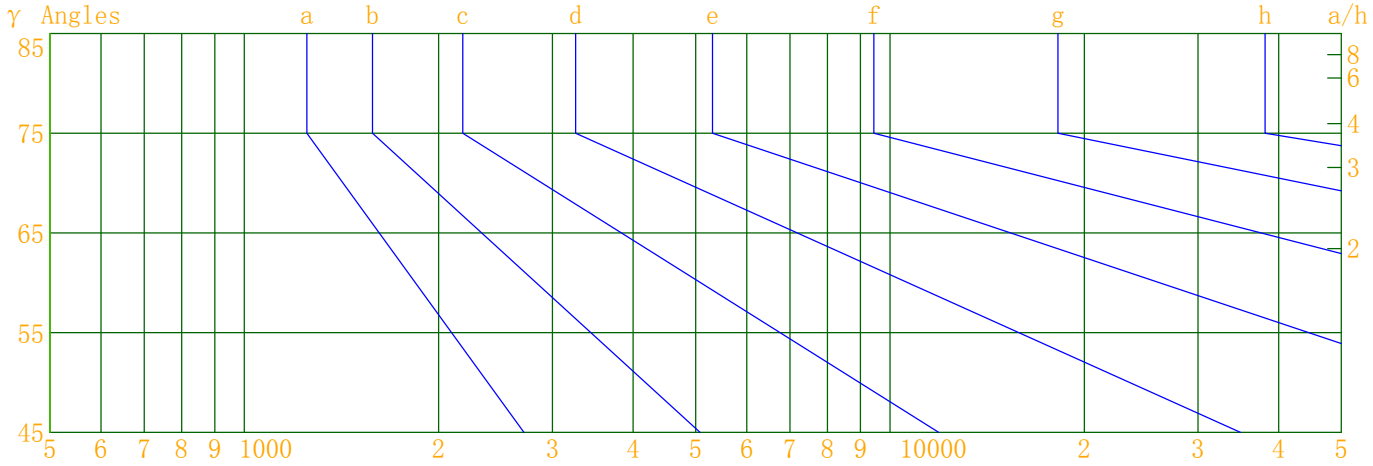
Glare Grade Table

GI	Quality	Using Illuminace							
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	a				2000	1000	500	<=300
			b	c	d	e	f	g	h

Luminance Table

Gama(deg)	45	50	55	60	65	70	75	80	85
C0	0	0	0	0	0	0	0	0	0
C90	0	0	0	0	0	0	0	0	0

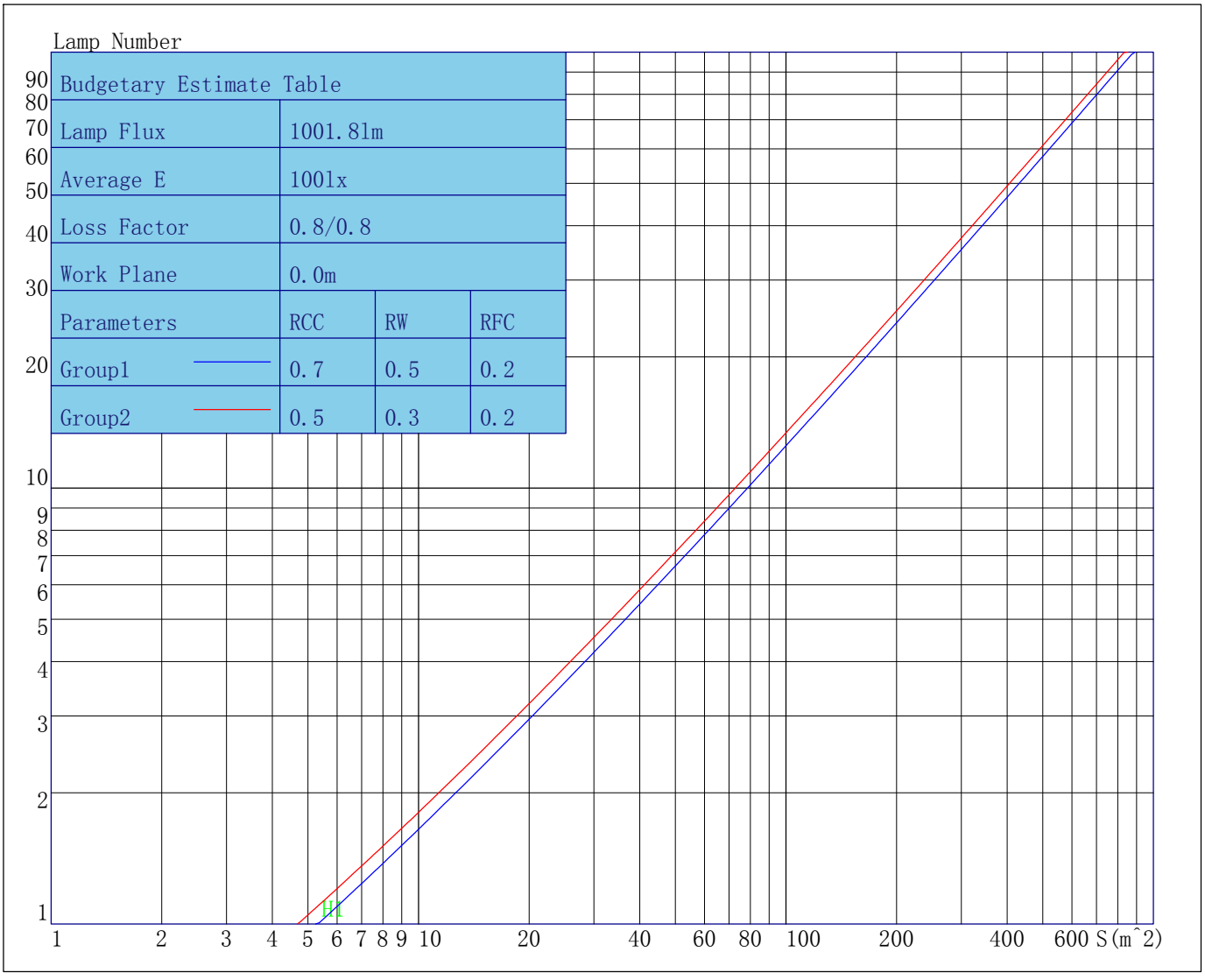
Luminance Limiting Curve



Luminous Size: Length(m)=0.000 Width(m)=0.000 Height(m)=0.000 Area(m^2)=0.000000
Luminous Type: Without Luminous Side
Luminous Curves: C0-C180 Color: C90-C270 Color:

Indoor Budgetary Estimate Table

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24



Parameters1: Rhocc = 0.7 Rhow = 0.5 Rhofc = 0.2 LLF = 0.8
Parameters2: Rhocc = 0.5 Rhow = 0.3 Rhofc = 0.2 LLF = 0.8
Average Illuminance(lx): 100 Cavity Height: H1(m) = 2

Indoor Coefficient of Utilization Table

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24

Coefficients of Utilization - Zonal Cavity Method																		
Coef.	Effective Floor Cavity Reflectance RFC=0.20																	
RhoCC(%)	80				70				50			30			10			0
RhoW(%)	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR	Coefficient of Utilization(%)																	
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	101	101	101	99
1	113	110	107	105	110	108	105	103	103	101	100	99	98	97	96	95	94	92
2	107	102	98	94	105	100	96	93	97	94	91	94	91	89	91	89	87	85
3	102	95	90	86	100	94	89	85	91	87	84	88	85	82	86	83	81	79
4	97	89	83	79	95	88	83	78	85	81	77	83	79	76	81	78	75	74
5	92	83	78	73	90	82	77	73	81	76	72	79	75	71	77	74	71	69
6	88	79	73	68	86	78	72	68	76	71	68	75	70	67	73	69	66	65
7	83	74	68	64	82	74	68	64	72	67	63	71	66	63	70	66	63	61
8	80	70	64	60	78	70	64	60	68	63	60	67	63	60	66	62	59	58
9	76	67	61	57	75	66	61	57	65	60	57	64	60	56	63	59	56	55
10	73	63	58	54	72	63	57	54	62	57	54	61	57	53	60	56	53	52

Unified Glare Rating Table

Lum.Name: HCP-1022202+HCP-1032202 5000K 60D	Lum.Catelog:	Test ID: 01
Lamp Name:	Lamp Catelog: LED	Test Lab: Quality Department
Manufacture: Havit Commercial	Test Machine:GON-2000	Test Date: 2020/11/24

Unified Glare Rating Table

Ceiling RCC		0.70	0.70	0.50	0.50	0.30	0.70	0.70	0.50	0.50	0.30
Wall RW		0.50	0.30	0.50	0.30	0.30	0.50	0.30	0.50	0.30	0.30
Floor RFC		0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20
Room Size		Vewed crosswise					Vewed endwise				
X=2H	Y=2H	-1.0	0.0	-0.6	0.4	0.7	-1.0	0.0	-0.6	0.4	0.7
	Y=3H	-1.2	-0.3	-0.8	0.1	0.5	-1.2	-0.3	-0.8	0.1	0.5
	Y=4H	-1.3	-0.5	-0.9	-0.1	0.3	-1.3	-0.5	-0.9	-0.1	0.3
	Y=6H	-1.4	-0.6	-1.0	-0.2	0.2	-1.4	-0.6	-1.0	-0.2	0.2
	Y=8H	-1.5	-0.7	-1.0	-0.3	0.1	-1.5	-0.7	-1.0	-0.3	0.1
	Y=12H	-1.5	-0.8	-1.1	-0.4	0.0	-1.5	-0.8	-1.1	-0.4	0.0
X=4H	Y=2H	-1.3	-0.5	-0.9	-0.1	0.3	-1.3	-0.5	-0.9	-0.1	0.3
	Y=3H	-1.5	-0.8	-1.1	-0.4	0.1	-1.5	-0.8	-1.1	-0.4	0.1
	Y=4H	-1.6	-1.0	-1.2	-0.6	-0.1	-1.6	-1.0	-1.2	-0.6	-0.1
	Y=6H	-1.7	-1.2	-1.3	-0.7	-0.2	-1.7	-1.2	-1.3	-0.7	-0.2
	Y=8H	-1.8	-1.3	-1.3	-0.8	-0.3	-1.8	-1.3	-1.3	-0.8	-0.3
	Y=12H	-1.9	-1.4	-1.4	-0.9	-0.4	-1.9	-1.4	-1.4	-0.9	-0.4
X=8H	Y=4H	-1.8	-1.3	-1.3	-0.8	-0.3	-1.8	-1.3	-1.3	-0.8	-0.3
	Y=6H	-1.9	-1.5	-1.4	-1.0	-0.4	-1.9	-1.5	-1.4	-1.0	-0.4
	Y=8H	-2.0	-1.6	-1.5	-1.1	-0.6	-2.0	-1.6	-1.5	-1.1	-0.6
	Y=12H	-2.1	-1.7	-1.5	-1.2	-0.6	-2.1	-1.7	-1.5	-1.2	-0.6
X=12H	Y=4H	-1.9	-1.4	-1.4	-0.9	-0.4	-1.9	-1.4	-1.4	-0.9	-0.4
	Y=6H	-2.0	-1.6	-1.5	-1.1	-0.6	-2.0	-1.6	-1.5	-1.1	-0.6
	Y=8H	-2.1	-1.7	-1.5	-1.2	-0.6	-2.1	-1.7	-1.5	-1.2	-0.6
Variations with the objerver position at spacings											
S=1.0H		0.0/0.0					0.0/0.0				
S=1.5H		0.0/0.0					0.0/0.0				
S=2.0H		0.0/0.0					0.0/0.0				
Reduced UGR Table:											
Nordic Standard Table:		BK0					BK0				
Correction Value		0.0					0.0				

o the CIE Pub.117,data has been corrected,refers to the lamp's lumens 8.2flm.

Candela Tabulation

V/H	C0.0	C90.0	C180.0	C270.0
γ 0.0	1318.49	1318.49	1318.49	1318.49
γ 1.0	1321.48	1318.15	1313.85	1317.89
γ 2.0	1323.87	1313.73	1307.10	1317.04
γ 3.0	1323.44	1308.45	1301.47	1310.35
γ 4.0	1320.18	1302.23	1292.60	1304.44
γ 5.0	1317.40	1291.99	1282.84	1298.46
γ 6.0	1311.20	1280.26	1271.57	1289.50
γ 7.0	1306.62	1266.07	1259.47	1278.33
γ 8.0	1296.80	1249.53	1241.89	1266.44
γ 9.0	1284.25	1236.80	1223.84	1253.17
γ 10.0	1270.54	1223.03	1205.09	1236.75
γ 11.0	1254.97	1205.82	1183.46	1220.77
γ 12.0	1238.54	1186.10	1160.45	1200.70
γ 13.0	1220.20	1162.69	1134.79	1179.00
γ 14.0	1197.93	1137.57	1108.16	1154.58
γ 15.0	1175.09	1111.44	1080.81	1128.50
γ 16.0	1149.29	1081.05	1051.71	1099.20
γ 17.0	1117.87	1050.50	1018.40	1067.33
γ 18.0	1084.33	1016.35	982.52	1034.08
γ 19.0	1048.21	983.80	942.85	998.68
γ 20.0	1011.67	947.90	897.72	959.75
γ 21.0	969.89	907.06	854.70	916.67
γ 22.0	927.43	863.58	805.19	871.25
γ 23.0	878.81	815.06	756.03	824.05
γ 24.0	828.81	761.30	704.17	771.72
γ 25.0	775.82	705.49	647.39	714.38
γ 26.0	720.19	647.78	589.25	658.32
γ 27.0	662.03	588.05	532.04	604.24
γ 28.0	603.93	525.89	480.16	550.44
γ 29.0	546.61	467.08	432.87	500.43
γ 30.0	493.64	416.76	388.27	451.05
γ 31.0	441.92	374.55	347.56	402.26
γ 32.0	394.94	338.55	301.71	340.57
γ 33.0	349.17	305.99	244.63	278.18
γ 34.0	306.00	275.94	191.58	219.56
γ 35.0	250.39	235.05	148.51	169.68
γ 36.0	195.49	192.54	119.06	130.39
γ 37.0	151.38	160.30	101.49	104.82
γ 38.0	117.48	136.59	88.61	89.61
γ 39.0	98.21	118.80	78.45	78.03
γ 40.0	87.01	102.21	69.97	67.44
γ 41.0	78.15	88.89	63.15	58.15
γ 42.0	71.25	78.84	56.94	50.72
γ 43.0	64.93	70.27	51.15	44.70
γ 44.0	59.47	63.14	45.42	39.80
γ 45.0	53.92	57.25	40.89	36.47
γ 46.0	49.16	52.38	36.74	34.39

Candela Tabulation - (Cont.)

V/H	C0.0	C90.0	C180.0	C270.0
γ 47.0	44.72	47.74	33.38	33.15
γ 48.0	41.37	43.76	31.23	32.16
γ 49.0	38.80	40.05	29.62	31.20
γ 50.0	37.07	37.08	28.65	30.40
γ 51.0	35.86	35.21	27.78	29.74
γ 52.0	34.64	33.73	27.14	29.10
γ 53.0	33.70	32.54	26.55	28.49
γ 54.0	32.73	31.39	25.99	27.93
γ 55.0	31.83	30.44	25.47	27.36
γ 56.0	30.96	29.60	25.00	26.91
γ 57.0	30.12	28.77	24.54	26.39
γ 58.0	29.33	28.01	24.08	25.86
γ 59.0	28.57	27.25	23.57	25.26
γ 60.0	27.80	26.55	23.03	24.67
γ 61.0	27.02	25.83	22.42	24.03
γ 62.0	26.22	25.15	21.80	23.35
γ 63.0	25.42	24.44	21.11	22.67
γ 64.0	24.60	23.69	20.33	21.85
γ 65.0	23.75	22.92	19.47	20.80
γ 66.0	22.81	22.07	18.48	19.58
γ 67.0	21.74	21.15	17.56	18.54
γ 68.0	20.55	20.12	16.65	17.51
γ 69.0	19.45	19.16	15.75	16.55
γ 70.0	18.44	18.17	14.88	15.59
γ 71.0	17.44	17.20	14.00	14.68
γ 72.0	16.45	16.20	13.15	13.76
γ 73.0	15.50	15.24	12.28	12.90
γ 74.0	14.56	14.29	11.44	12.04
γ 75.0	13.64	13.36	10.62	11.21
γ 76.0	12.76	12.43	9.81	10.40
γ 77.0	11.90	11.52	9.01	9.61
γ 78.0	11.05	10.64	8.23	8.87
γ 79.0	10.20	9.76	7.48	8.11
γ 80.0	9.39	8.91	6.75	7.39
γ 81.0	8.61	8.07	6.04	6.71
γ 82.0	7.84	7.25	5.33	6.03
γ 83.0	7.08	6.46	4.68	5.39
γ 84.0	6.35	5.69	4.03	4.76
γ 85.0	5.65	4.94	3.41	4.15
γ 86.0	4.97	4.22	2.82	3.57
γ 87.0	4.29	3.53	2.26	3.03
γ 88.0	3.64	2.86	1.70	2.49
γ 89.0	3.05	2.21	1.34	2.07
γ 90.0	2.43	1.59	1.26	1.94
γ 91.0	2.00	1.24	1.17	1.84
γ 92.0	1.87	1.15	1.10	1.72
γ 93.0	1.78	1.08	1.02	1.63

Candela Tabulation - (Cont.)

V/H	C0.0	C90.0	C180.0	C270.0
γ 94.0	1.67	1.00	0.96	1.53
γ 95.0	1.58	0.93	0.89	1.46
γ 96.0	1.49	0.85	0.83	1.38
γ 97.0	1.40	0.79	0.77	1.30
γ 98.0	1.32	0.73	0.72	1.23
γ 99.0	1.23	0.66	0.67	1.16
γ 100.0	1.16	0.61	0.63	1.10
γ 101.0	1.09	0.55	0.58	1.05
γ 102.0	1.02	0.49	0.54	0.99
γ 103.0	0.95	0.44	0.51	0.94
γ 104.0	0.90	0.39	0.47	0.90
γ 105.0	0.84	0.35	0.44	0.85
γ 106.0	0.78	0.31	0.43	0.81
γ 107.0	0.74	0.27	0.40	0.78
γ 108.0	0.69	0.24	0.40	0.76
γ 109.0	0.65	0.21	0.39	0.73
γ 110.0	0.61	0.20	0.39	0.71
γ 111.0	0.57	0.18	0.39	0.70
γ 112.0	0.55	0.17	0.40	0.70
γ 113.0	0.54	0.17	0.41	0.70
γ 114.0	0.53	0.16	0.43	0.70
γ 115.0	0.52	0.18	0.46	0.72
γ 116.0	0.52	0.19	0.50	0.73
γ 117.0	0.53	0.22	0.53	0.76
γ 118.0	0.54	0.25	0.58	0.79
γ 119.0	0.57	0.28	0.64	0.83
γ 120.0	0.60	0.33	0.69	0.88
γ 121.0	0.63	0.38	0.77	0.92
γ 122.0	0.68	0.44	0.85	0.98
γ 123.0	0.74	0.50	0.92	1.04
γ 124.0	0.78	0.58	1.00	1.11
γ 125.0	0.85	0.65	1.10	1.19
γ 126.0	0.92	0.73	1.18	1.26
γ 127.0	1.00	0.83	1.28	1.34
γ 128.0	1.07	0.92	1.39	1.43
γ 129.0	1.16	1.01	1.48	1.54
γ 130.0	1.25	1.12	1.61	1.63
γ 131.0	1.35	1.23	1.73	1.74
γ 132.0	1.45	1.33	1.85	1.84
γ 133.0	1.56	1.45	1.96	1.96
γ 134.0	1.66	1.56	2.09	2.07
γ 135.0	1.77	1.68	2.21	2.19
γ 136.0	1.90	1.80	2.35	2.31
γ 137.0	2.01	1.93	2.47	2.42
γ 138.0	2.14	2.06	2.61	2.55
γ 139.0	2.26	2.18	2.74	2.67
γ 140.0	2.38	2.31	2.89	2.80

Candela Tabulation - (Cont.)

V/H	C0.0	C90.0	C180.0	C270.0
γ 141.0	2.52	2.45	3.02	2.92
γ 142.0	2.63	2.58	3.15	3.05
γ 143.0	2.78	2.72	3.29	3.18
γ 144.0	2.91	2.86	3.41	3.30
γ 145.0	3.05	3.00	3.54	3.43
γ 146.0	3.19	3.13	3.67	3.54
γ 147.0	3.32	3.26	3.81	3.66
γ 148.0	3.43	3.39	3.93	3.78
γ 149.0	3.57	3.53	4.05	3.90
γ 150.0	3.69	3.64	4.18	4.02
γ 151.0	3.82	3.76	4.29	4.14
γ 152.0	3.93	3.88	4.38	4.24
γ 153.0	4.05	3.98	4.48	4.35
γ 154.0	4.16	4.09	4.58	4.45
γ 155.0	4.26	4.17	4.67	4.54
γ 156.0	4.37	4.27	4.75	4.63
γ 157.0	4.46	4.36	4.83	4.72
γ 158.0	4.55	4.45	4.91	4.81
γ 159.0	4.64	4.52	4.97	4.88
γ 160.0	4.72	4.61	5.05	4.95
γ 161.0	4.80	4.68	5.12	5.03
γ 162.0	4.88	4.77	5.18	5.09
γ 163.0	4.96	4.84	5.24	5.16
γ 164.0	5.03	4.91	5.30	5.23
γ 165.0	5.10	4.98	5.36	5.29
γ 166.0	5.17	5.05	5.42	5.35
γ 167.0	5.24	5.12	5.47	5.41
γ 168.0	5.31	5.18	5.53	5.47
γ 169.0	5.37	5.25	5.56	5.53
γ 170.0	5.42	5.31	5.63	5.57
γ 171.0	5.47	5.36	5.68	5.61
γ 172.0	5.55	5.42	5.71	5.66
γ 173.0	5.61	5.47	5.74	5.70
γ 174.0	5.65	5.52	5.77	5.73
γ 175.0	5.67	5.56	5.80	5.76
γ 176.0	5.73	5.61	5.82	5.79
γ 177.0	5.76	5.65	5.85	5.80
γ 178.0	5.79	5.69	5.85	5.82
γ 179.0	5.82	5.72	5.85	5.82
γ 180.0	5.82	5.82	5.82	5.82