

Report No.:

Test Time: 2025-08-26 21:13

Luminaire Property

Luminaire Manufacturer:

Lamp Description: V10A F90 930

Luminous Width (mm): -55

Current: 0.091 A

Power Factor: 0.947

Luminous Length (mm): -55

Voltage: 229.1 V

Power: 19.80 W

Photometric Results

CIE Class: Direct

Measurement Flux: 1880.7 lm

Downward Ratio: 100%

Horizontal Diffuse Angle(50%): H17

Vertical Diffuse Angle(50%): V17

Luminaire Efficacy Rating (LER): 95.03

Max. Intensity: 17345.95 cd

S/MH(C0/C180): 0.29

Total Rated Lamp Lumens: 1880.7 lm

Efficiency: 100%

Upward Ratio: 0%

Central Intensity: 17345.95 cd

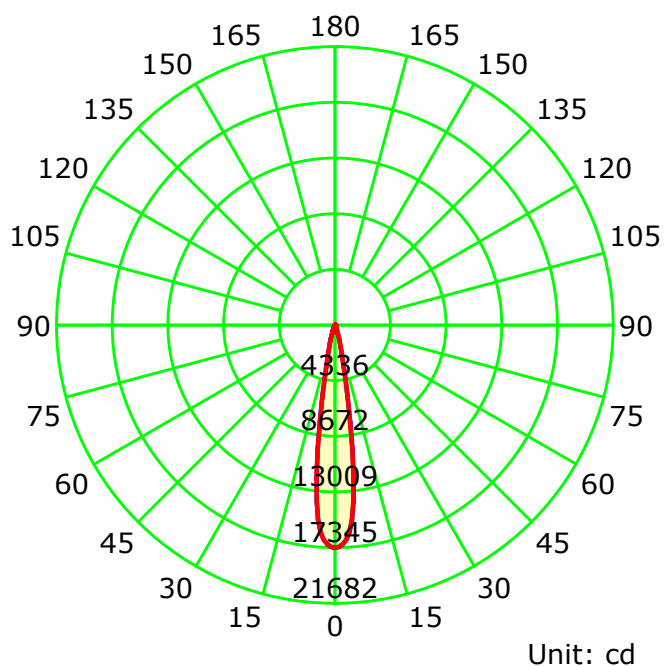
Pos of Max. Intensity: H0 V0

S/MH(C90/C270): 0.29

Picture Of Luminaire



Luminous Intensity Distribution Curve



— C0-C180 — C90-C270

C Plane (°):0.0-180.0: 180.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-90.0:1.0

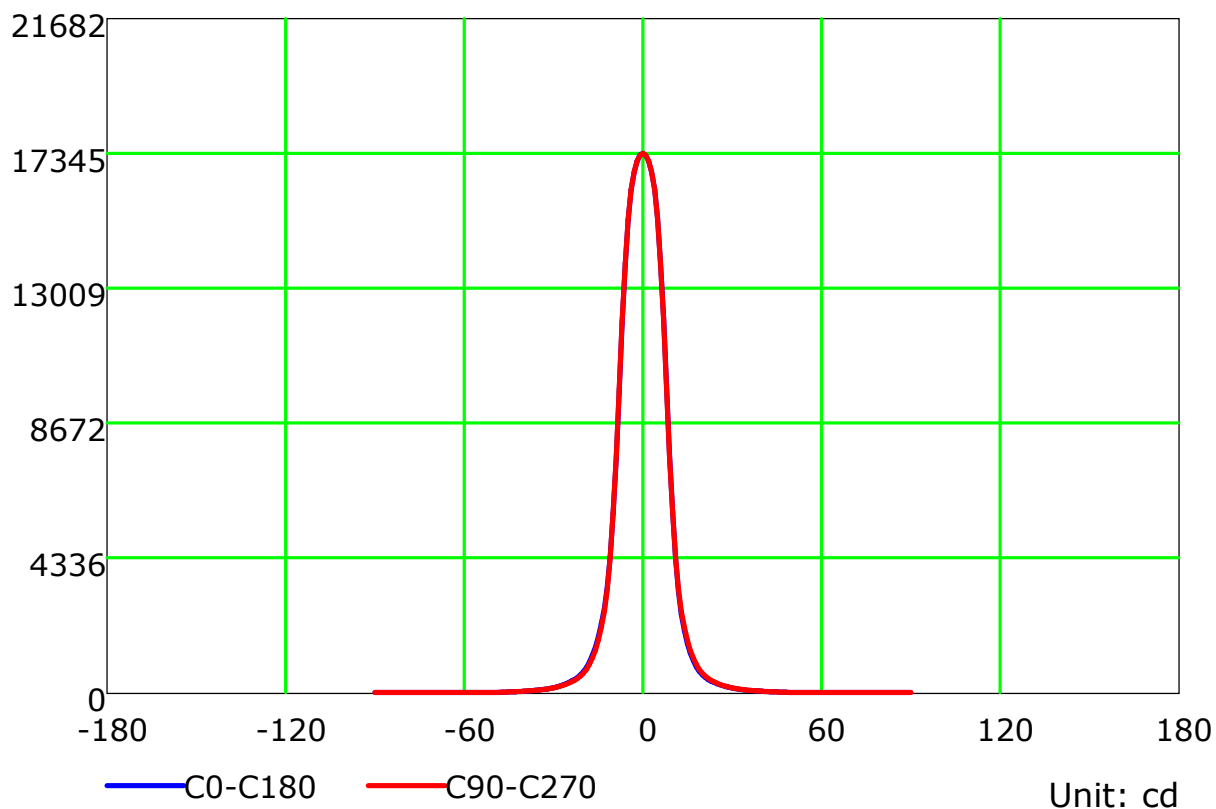
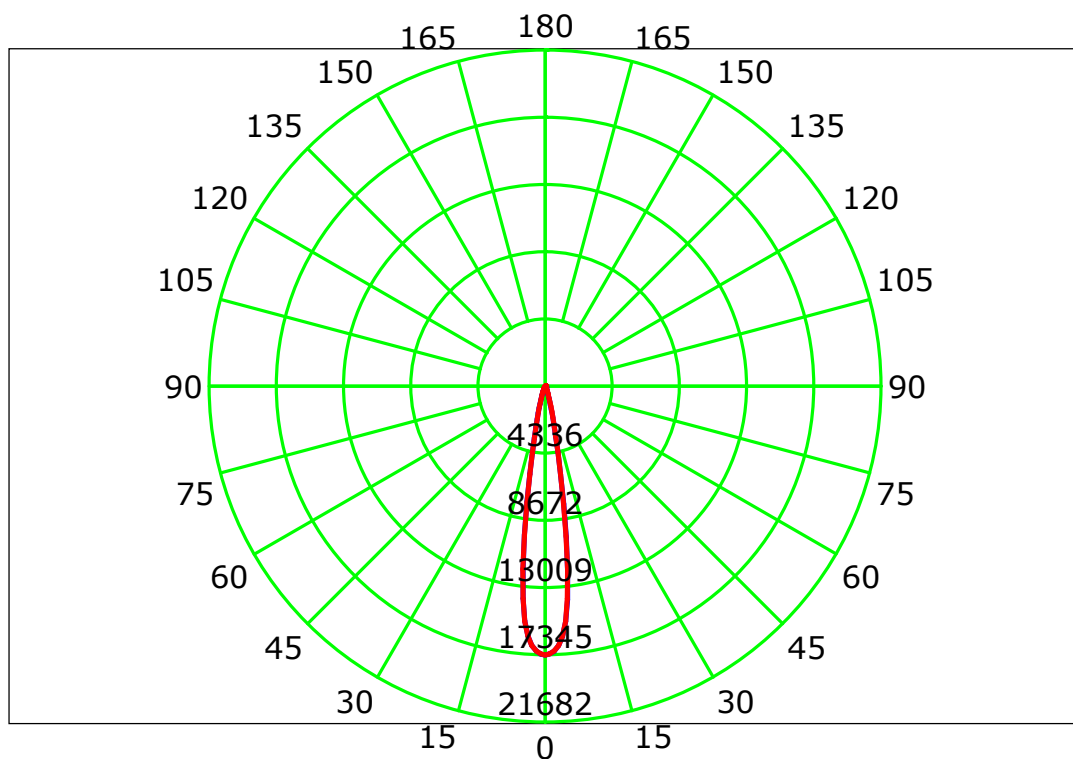
Test Device: CHL-6E

Distance: 2.905 m

Humidity:

Inspector:

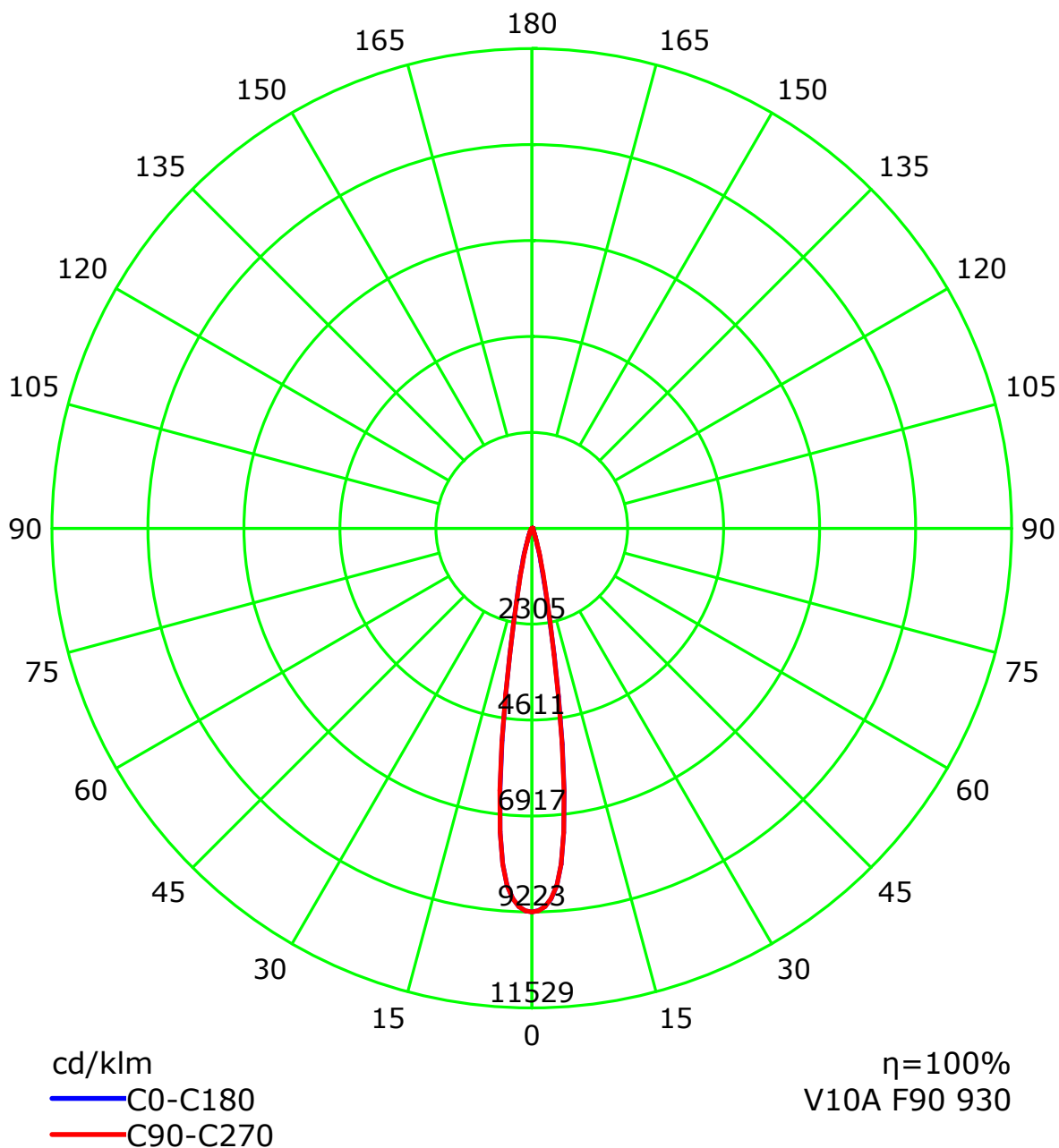
Luminous Intensity Distribution Curve



C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

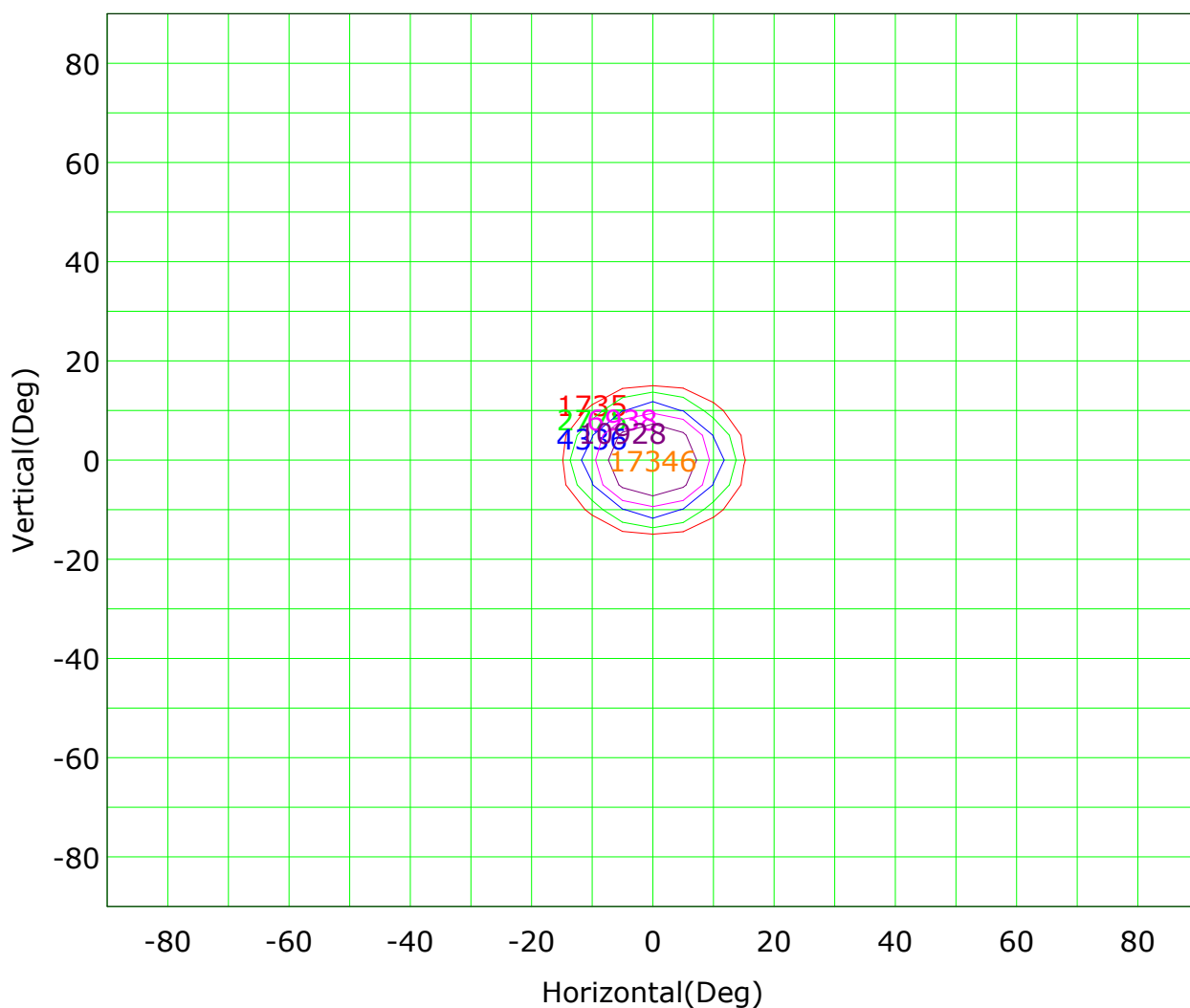
Luminous Intensity Distribution Curve(cd/klm)



C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Isocandela (rectangle)



Imax (100%): 17346 cd

(10%): 1735 cd	(16%): 2775 cd
(25%): 4336 cd	(40%): 6938 cd
(63%): 10928 cd	(100%): 17346 cd

C Plane (°):0.0-180.0: 180.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-90.0:1.0

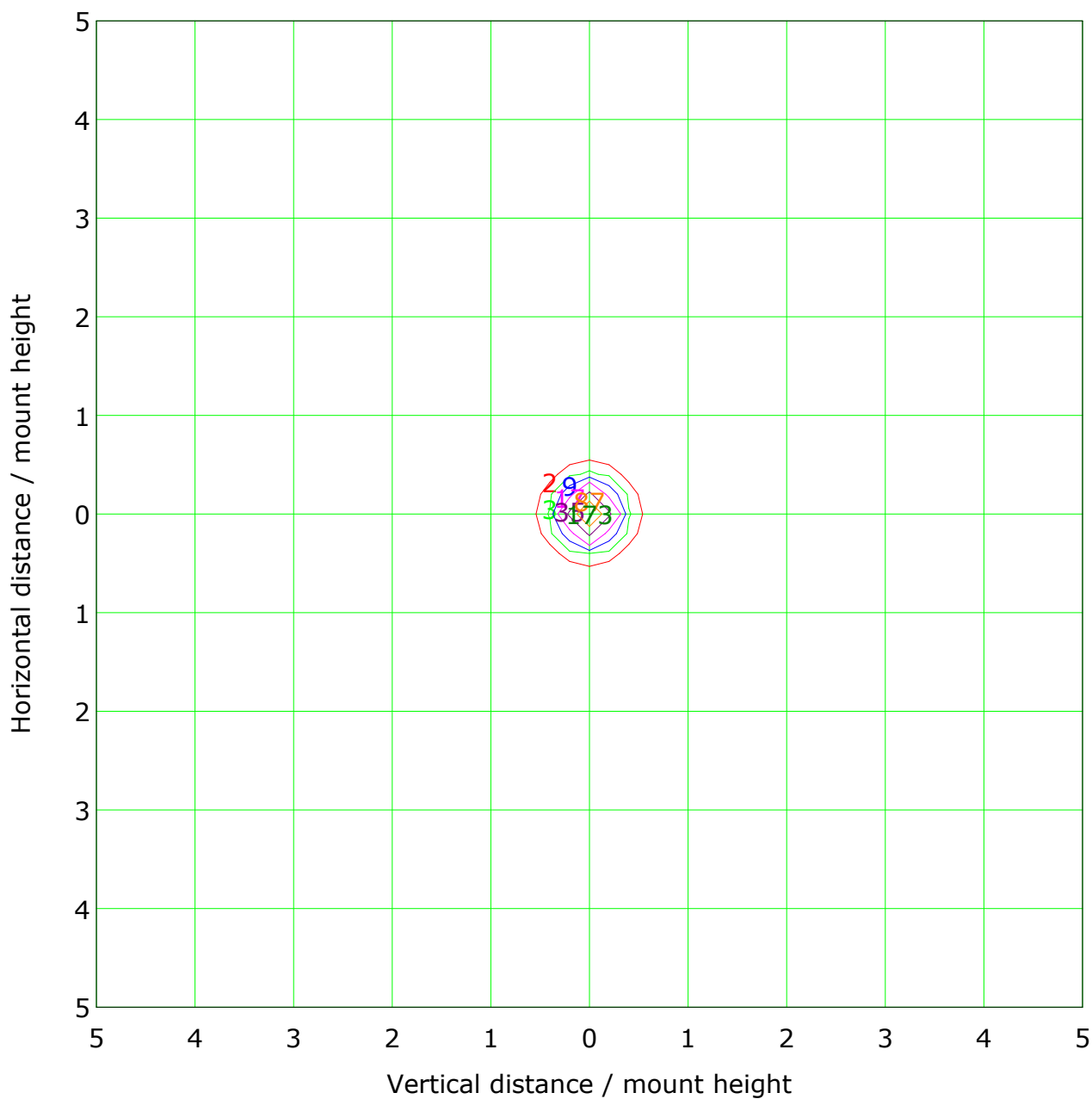
Test Device: CHL-6E

Distance: 2.905 m

Humidity:

Inspector:

IsoLux Plot



Mounting Height: 10.0m Max Lux(100%): 173.5 lx

(1%): 1.7 lx	(2%): 3.5 lx
(5%): 8.7 lx	(10%): 17.3 lx
(20%): 34.7 lx	(50%): 86.7 lx
(100%): 173.5 lx	

C Plane (°):0.0-180.0: 180.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-90.0:1.0

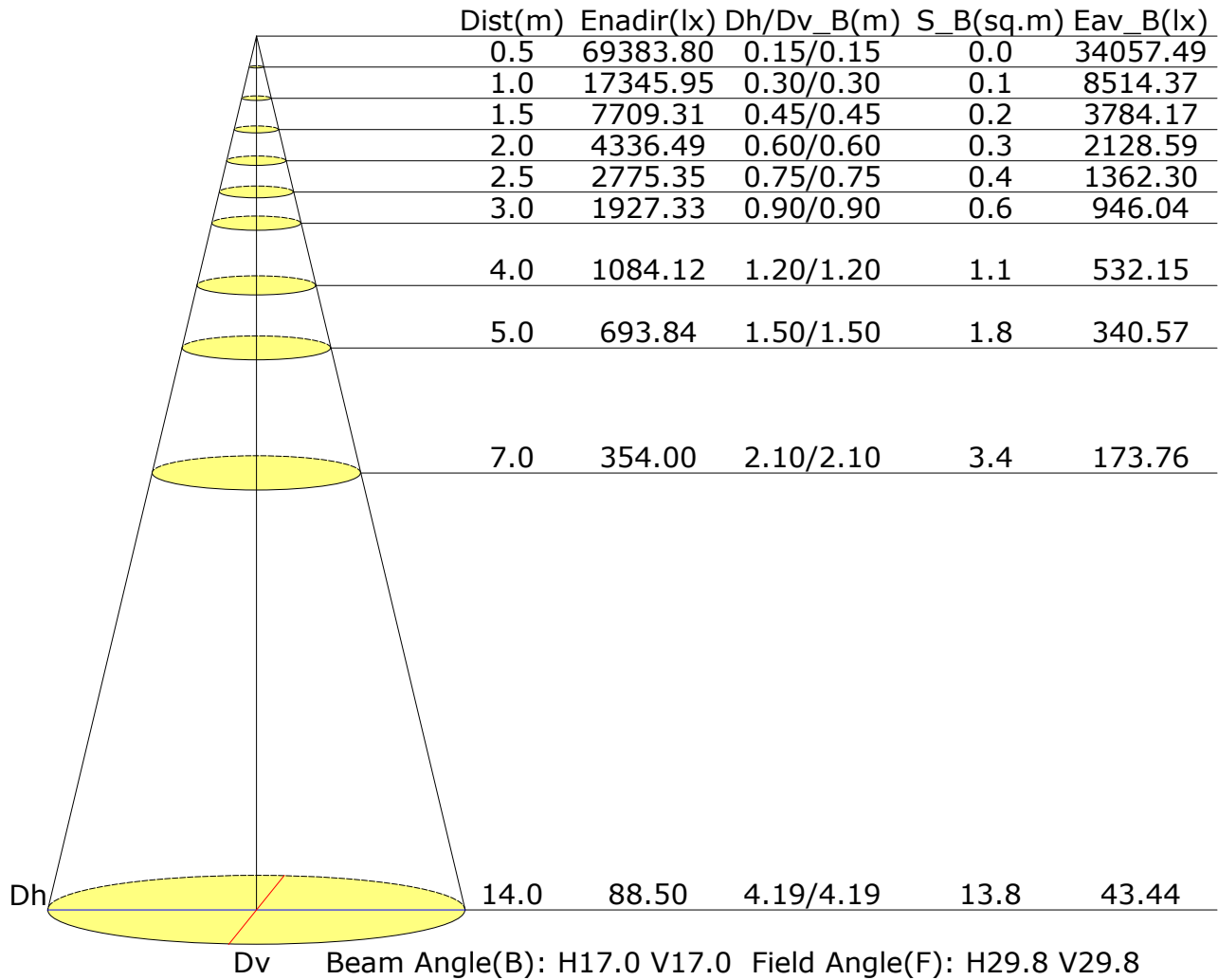
Test Device: CHL-6E

Distance: 2.905 m

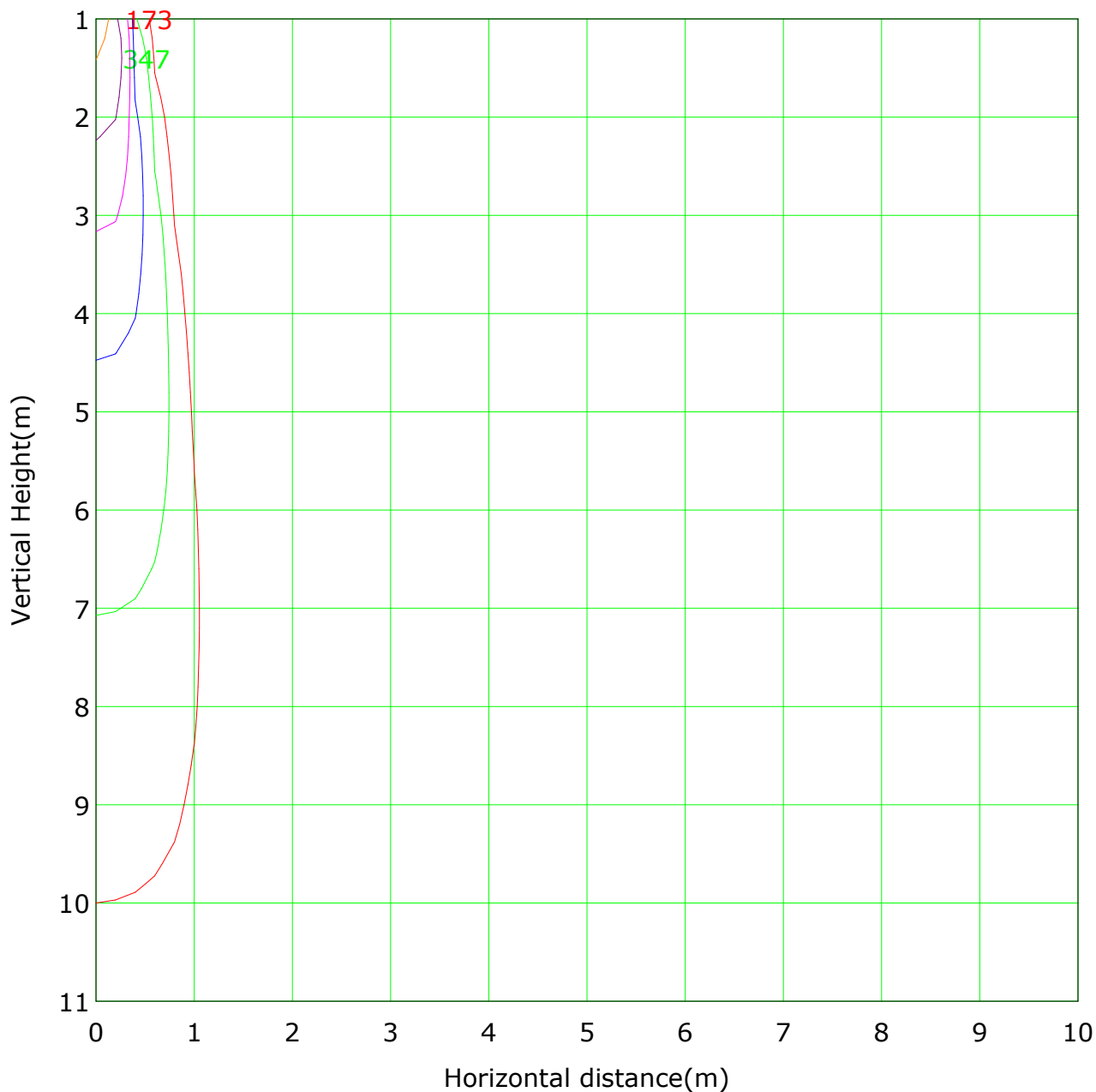
Humidity:

Inspector:

Illuminance at a Distance



Vertical IsoLux Plot



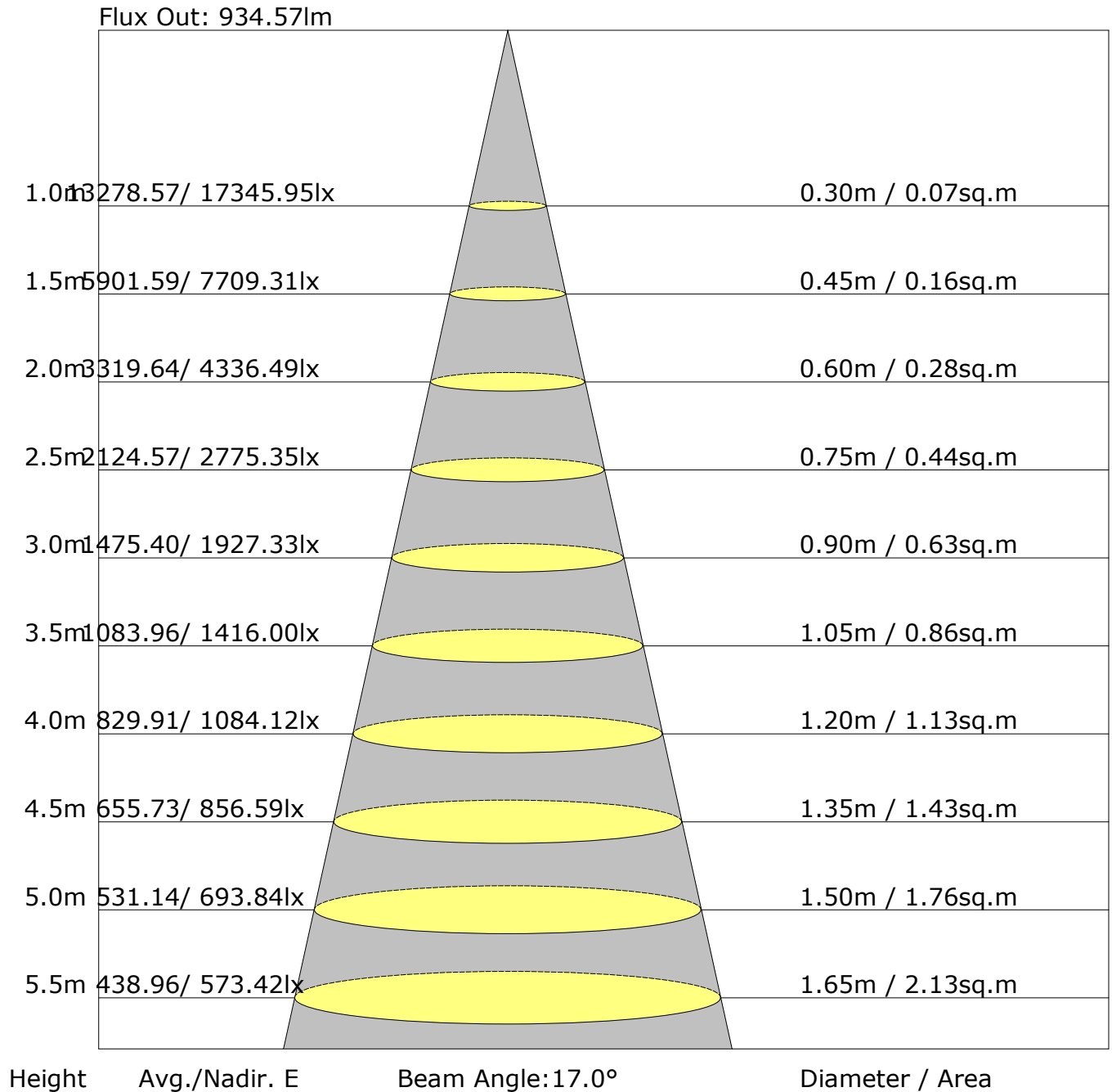
Lowest(m): 1.0m Highest(m): 11.0m Max Lux: 17345.9 lx
— (1%): 173.5 lx — (2%): 346.9 lx
— (5%): 867.3 lx — (10%): 1734.6 lx
— (20%): 3469.2 lx — (50%): 8673.0 lx
— (100%): 17345.9 lx

C Plane (°): 0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°): 0.0-90.0: 1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

The Average Illuminance Effective Figure



C Plane (°): 0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°): 0.0-90.0: 1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

UGR Table

Reflectance:										
Ceiling (cavity)	0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3
Wall	0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3
Reference 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	9.9	10.4	10.2	10.6	10.8	10.0	10.5	10.2	10.7	10.8
3H	9.8	10.3	10.1	10.5	10.7	9.9	10.3	10.1	10.5	10.8
4H	9.7	10.2	10.0	10.4	10.7	9.8	10.2	10.1	10.5	10.7
6H	9.6	10.1	10.0	10.3	10.6	9.7	10.1	10.0	10.4	10.7
8H	9.6	10.0	9.9	10.3	10.6	9.7	10.1	10.0	10.3	10.6
12H	9.6	9.9	9.9	10.2	10.6	9.6	10.0	10.0	10.3	10.6
X=4H Y=2H	9.7	10.2	10.0	10.4	10.7	9.8	10.2	10.1	10.5	10.7
3H	9.6	9.9	9.9	10.2	10.6	9.6	10.0	10.0	10.3	10.6
4H	9.5	9.8	9.8	10.1	10.5	9.5	9.9	9.9	10.2	10.6
6H	9.4	9.7	9.8	10.1	10.4	9.4	9.7	9.8	10.1	10.5
8H	9.3	9.6	9.8	10.0	10.4	9.4	9.7	9.8	10.1	10.5
12H	9.3	9.5	9.7	9.9	10.4	9.3	9.6	9.8	10.0	10.4
X=8H Y=4H	9.3	9.6	9.8	10.0	10.4	9.4	9.7	9.8	10.1	10.5
6H	9.2	9.5	9.7	9.9	10.3	9.3	9.5	9.7	9.9	10.4
8H	9.2	9.4	9.6	9.8	10.3	9.2	9.4	9.7	9.9	10.4
12H	9.1	9.3	9.6	9.8	10.3	9.2	9.4	9.7	9.8	10.3
X=12H Y=4H	9.3	9.5	9.7	9.9	10.4	9.3	9.6	9.8	10.0	10.4
6H	9.2	9.4	9.6	9.8	10.3	9.2	9.4	9.7	9.9	10.4
8H	9.1	9.3	9.6	9.8	10.3	9.2	9.4	9.7	9.8	10.3
Variations with the observer position at spacings:										
S=1.0H	+4.5/-1.\$					+4.6/-1.\$				
S=1.5H	+7.3/-1.\$					+7.4/-1.\$				
S=2.0H	+9.3/-1.\$					+9.4/-1.\$				

Calculate in accordance with CIE Pub.117. The table is revised with 1881lm ($8\log(F/F_0) = 2.2$).

C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

FLUX DISTRIBUTION TABLE BASED ON THE IESNA LUMINAIRE CLASSIFICATION SYSTEM

	ZONE	LUMENS	% LAMP LUMENS
	FORWARD LIGHT	933	49.6
	FL (0°-30°)	897	47.7
	FM (30°-60°)	36	1.9
	FH (60°-80°)	0	0.0
	FVH (80°-90°)	0	0.0
	BACK LIGHT	947	50.4
	BL (0°-30°)	911	48.4
	BM (30°-60°)	36	1.9
	BH (60°-80°)	0	0.0
	BVH (80°-90°)	0	0.0
	UP LIGHT	0	0.0
	UL (90°-100°)	0	0.0
	UH (100°-180°)	0	0.0
	TRAPPED LIGHT	NA	NA

BUG(Backlight,Uplight,Glare) Rating Base On TM-15-07	
Asymmetrical Luminaire Types (Type I,II,III,IV)	B2 U0 G0
Quadrilateral Symmetrical Luminaire Types (Type V,Area Light)	B2 U0 G0

C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Zonal Lumen

Gamma [°]	I _{mean} [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
0.0-1.0	17316.1	16.6	16.6	0.88	0.88
1.0-2.0	17196.0	49.4	65.9	2.62	3.51
2.0-3.0	16933.1	81.0	146.9	4.31	7.81
3.0-4.0	16469.0	110.3	257.2	5.86	13.68
4.0-5.0	15704.0	135.1	392.3	7.18	20.86
5.0-6.0	14518.7	152.6	544.9	8.11	28.97
6.0-7.0	12873.9	159.8	704.7	8.50	37.47
7.0-8.0	10856.3	155.4	860.1	8.26	45.73
8.0-9.0	8701.1	141.0	1001.1	7.50	53.23
9.0-10.0	6712.2	121.5	1122.6	6.46	59.69
10.0-11.0	5079.4	101.5	1224.1	5.40	65.09
11.0-12.0	3855.5	84.3	1308.4	4.48	69.57
12.0-13.0	2983.4	70.8	1379.2	3.77	73.34
13.0-14.0	2356.8	60.3	1439.6	3.21	76.55
14.0-15.0	1891.2	51.9	1491.5	2.76	79.31
15.0-16.0	1528.6	44.8	1536.3	2.38	81.69
16.0-17.0	1239.7	38.6	1574.9	2.05	83.74
17.0-18.0	1009.3	33.3	1608.2	1.77	85.51
18.0-19.0	826.8	28.8	1637.0	1.53	87.04
19.0-20.0	686.0	25.1	1662.1	1.34	88.38
20.0-21.0	577.9	22.2	1684.3	1.18	89.56
21.0-22.0	493.3	19.8	1704.1	1.05	90.61
22.0-23.0	426.6	17.9	1722.0	0.95	91.56
23.0-24.0	371.8	16.3	1738.2	0.86	92.43
24.0-25.0	324.7	14.8	1753.0	0.79	93.21
25.0-26.0	283.7	13.4	1766.4	0.71	93.92
26.0-27.0	248.2	12.1	1778.6	0.65	94.57
27.0-28.0	217.0	11.0	1789.5	0.58	95.15
28.0-29.0	189.2	9.9	1799.4	0.53	95.68
29.0-30.0	165.0	8.9	1808.3	0.47	96.16
30.0-31.0	144.6	8.1	1816.4	0.43	96.58
31.0-32.0	127.1	7.3	1823.7	0.39	96.97
32.0-33.0	112.0	6.6	1830.3	0.35	97.32
33.0-34.0	99.4	6.0	1836.3	0.32	97.64
34.0-35.0	87.4	5.4	1841.7	0.29	97.93
35.0-36.0	76.9	4.9	1846.6	0.26	98.19

C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Zonal Lumen (Continue 1)

Gamma [°]	I _{mean} [cd]	Zonal Flux [lm]	Sum Zonal Flux [lm]	Rel Zonal Flux [%]	Sum Rel Zonal Flux [%]
36.0-37.0	68.5	4.5	1851.1	0.24	98.43
37.0-38.0	61.1	4.1	1855.2	0.22	98.64
38.0-39.0	54.8	3.7	1858.9	0.20	98.84
39.0-40.0	48.8	3.4	1862.3	0.18	99.02
40.0-41.0	42.5	3.0	1865.3	0.16	99.18
41.0-42.0	37.2	2.7	1868.0	0.14	99.33
42.0-43.0	32.3	2.4	1870.4	0.13	99.46
43.0-44.0	27.4	2.1	1872.5	0.11	99.57
44.0-45.0	23.2	1.8	1874.3	0.09	99.66
45.0-46.0	19.3	1.5	1875.8	0.08	99.74
46.0-47.0	15.8	1.3	1877.0	0.07	99.81
47.0-48.0	12.3	1.0	1878.0	0.05	99.86
48.0-49.0	9.5	0.8	1878.8	0.04	99.90
49.0-50.0	8.1	0.7	1879.5	0.04	99.94
50.0-51.0	6.3	0.5	1880.0	0.03	99.97
51.0-52.0	4.2	0.4	1880.4	0.02	99.99
52.0-53.0	2.5	0.2	1880.6	0.01	100.00
53.0-54.0	0.7	0.1	1880.7	0.00	100.00
54.0-55.0	0.0	0.0	1880.7	0.00	100.00
55.0-56.0	0.0	0.0	1880.7	0.00	100.00
56.0-57.0	0.0	0.0	1880.7	0.00	100.00
57.0-58.0	0.0	0.0	1880.7	0.00	100.00
58.0-59.0	0.0	0.0	1880.7	0.00	100.00
59.0-60.0	0.0	0.0	1880.7	0.00	100.00
60.0-61.0	0.0	0.0	1880.7	0.00	100.00
61.0-62.0	0.0	0.0	1880.7	0.00	100.00
62.0-63.0	0.0	0.0	1880.7	0.00	100.00
63.0-64.0	0.0	0.0	1880.7	0.00	100.00
64.0-65.0	0.0	0.0	1880.7	0.00	100.00
65.0-66.0	0.0	0.0	1880.7	0.00	100.00
66.0-67.0	0.0	0.0	1880.7	0.00	100.00
67.0-68.0	0.0	0.0	1880.7	0.00	100.00
68.0-69.0	0.0	0.0	1880.7	0.00	100.00
69.0-70.0	0.0	0.0	1880.7	0.00	100.00
70.0-71.0	0.0	0.0	1880.7	0.00	100.00
71.0-72.0	0.0	0.0	1880.7	0.00	100.00

C Plane (°):0.0-180.0: 180.0
Test Lab:
Test Type: TYPE C
Temperature:
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Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Candlepower Table

Unit: cd

G\C	C0.0	C180.0								
G0.0	17345.9	17345.9								
G1.0	17277.1	17295.4								
G2.0	17108.6	17103.0								
G3.0	16767.4	16753.3								
G4.0	16188.8	16166.3								
G5.0	15255.0	15205.8								
G6.0	13839.4	13774.8								
G7.0	12023.6	11857.9								
G8.0	9865.2	9678.5								
G9.0	7697.0	7563.6								
G10.0	5822.2	5766.1								
G11.0	4337.9	4391.3								
G12.0	3270.6	3422.3								
G13.0	2516.5	2724.4								
G14.0	1978.7	2207.6								
G15.0	1581.3	1797.5								
G16.0	1269.5	1466.1								
G17.0	1023.7	1199.3								
G18.0	831.3	983.0								
G19.0	681.1	811.7								
G20.0	571.5	679.7								
G21.0	485.9	574.4								
G22.0	418.5	494.3								
G23.0	366.5	426.9								
G24.0	321.6	372.1								
G25.0	282.3	323.0								
G26.0	248.6	280.9								
G27.0	219.1	244.4								
G28.0	192.4	212.1								
G29.0	168.5	184.0								
G30.0	146.1	161.5								
G31.0	130.6	140.4								
G32.0	115.2	122.2								
G33.0	101.1	109.5								
G34.0	91.3	95.5								
G35.0	80.1	82.8								
G36.0	71.6	73.0								

C Plane (°):0.0-180.0: 180.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-90.0:1.0

Test Device: CHL-6E

Distance: 2.905 m

Humidity:

Inspector:

Candlepower Table (Continue 1)

Unit: cd

G\C	C0.0	C180.0								
G37.0	64.6	64.6								
G38.0	57.6	57.6								
G39.0	53.4	50.5								
G40.0	46.3	44.9								
G41.0	39.3	39.3								
G42.0	36.5	33.7								
G43.0	29.5	29.5								
G44.0	25.3	25.3								
G45.0	21.1	21.1								
G46.0	18.3	16.9								
G47.0	14.0	14.0								
G48.0	11.2	9.8								
G49.0	9.8	7.0								
G50.0	8.4	7.0								
G51.0	5.6	4.2								
G52.0	4.2	2.8								
G53.0	2.8	0.0								
G54.0	0.0	0.0								
G55.0	0.0	0.0								
G56.0	0.0	0.0								
G57.0	0.0	0.0								
G58.0	0.0	0.0								
G59.0	0.0	0.0								
G60.0	0.0	0.0								
G61.0	0.0	0.0								
G62.0	0.0	0.0								
G63.0	0.0	0.0								
G64.0	0.0	0.0								
G65.0	0.0	0.0								
G66.0	0.0	0.0								
G67.0	0.0	0.0								
G68.0	0.0	0.0								
G69.0	0.0	0.0								
G70.0	0.0	0.0								
G71.0	0.0	0.0								
G72.0	0.0	0.0								
G73.0	0.0	0.0								

C Plane (°):0.0-180.0: 180.0
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Gamma Plane (°):0.0-90.0:1.0
Test Device: CHL-6E
Distance: 2.905 m
Humidity:
Inspector:

Unit: cd

Inspector: