



Report No.:

Test Time: 22/01/2021 12:10

Luminaire Property

Luminaire Manufacturer: Lighting Line
 Luminaire Description: LLP-DW11-03 + LLD-03-FK
 Lamp Description: F52-400-60822 90cm
 Lumens per Lamp: 1434 lm
 Current: 0.532 A
 Power Factor: 1.000

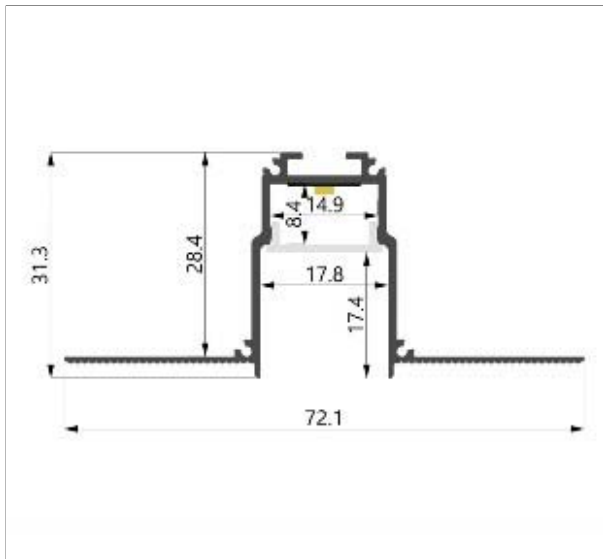
Number of Lamps: 1
 Voltage: 24.0 V
 Power: 12.77 W

Photometric Results

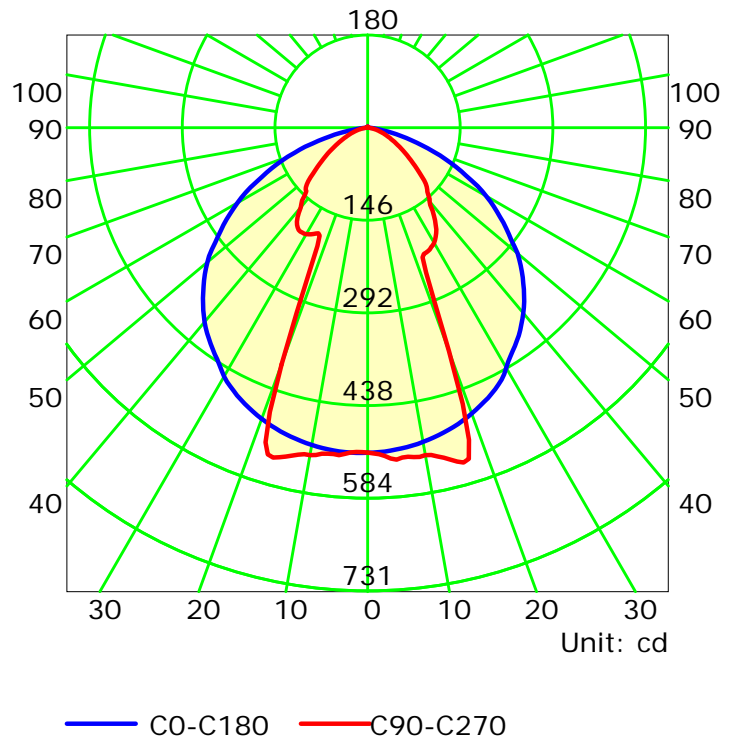
CIE Class: Direct
 Measurement Flux: 908.3 lm
 Downward Ratio: 63.27%
 Field Angle(C0/C180,C90/C270,C45/C225,C135/315): 154.6, 121.6, 130.0, 129.6
 Beam Angle(C0/C180,C90/C270,C45/C225,C135/315): 113.4, 43.0, 72.4, 72.1
 Luminaire Efficacy Rating (LER): 71.18
 Max. Intensity: 549.66 cd
 S/MH(C0/C180): 1.28

Total Rated Lamp Lumens: 1434.0 lm
 Efficiency: 63.34%
 Upward Ratio: 0.07%
 Central Intensity: 513.14 cd
 Pos of Max. Intensity: H90 V16
 S/MH(C90/C270): 0.76

Picture Of Luminaire



Luminous Intensity Distribution Curve

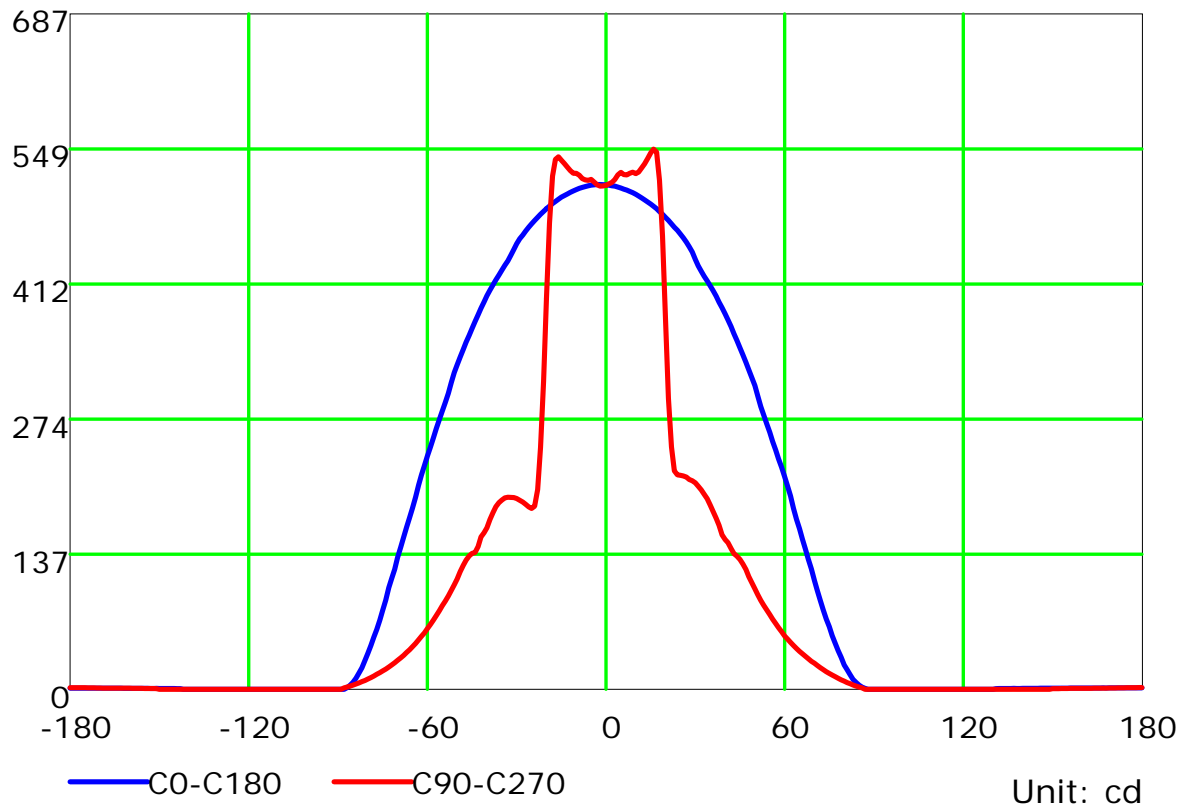
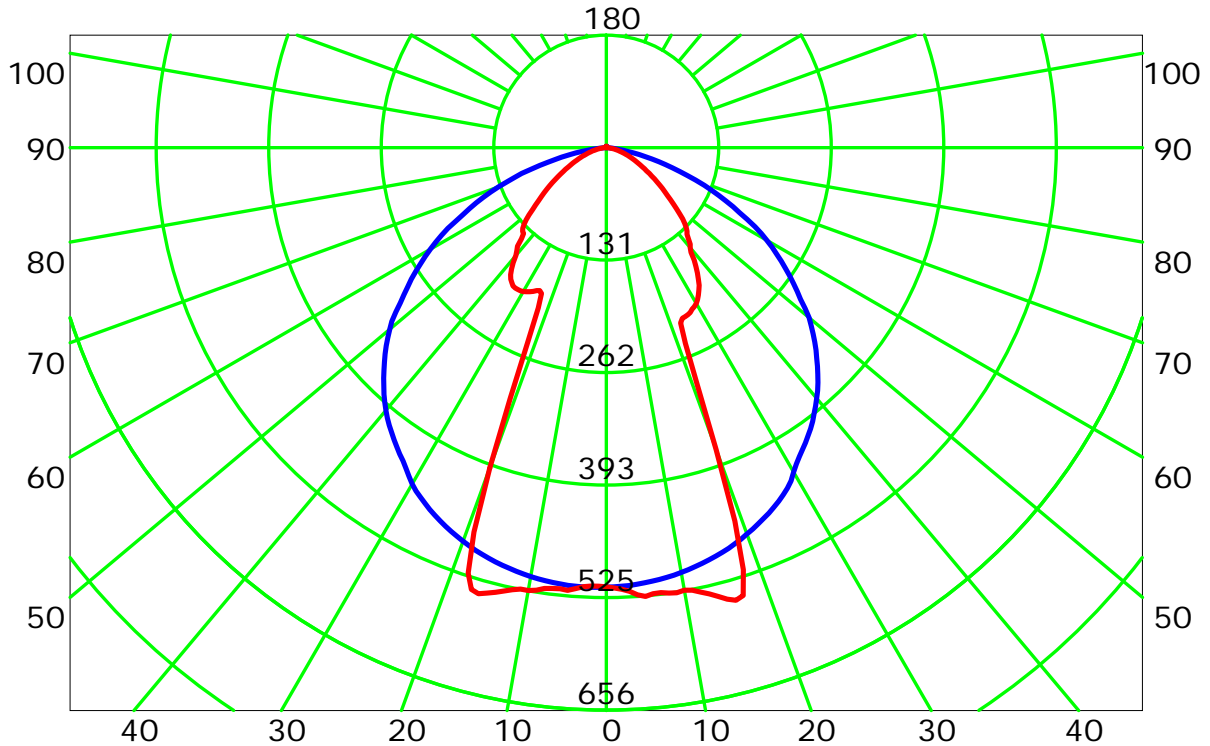


C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Luminous Intensity Distribution Curve

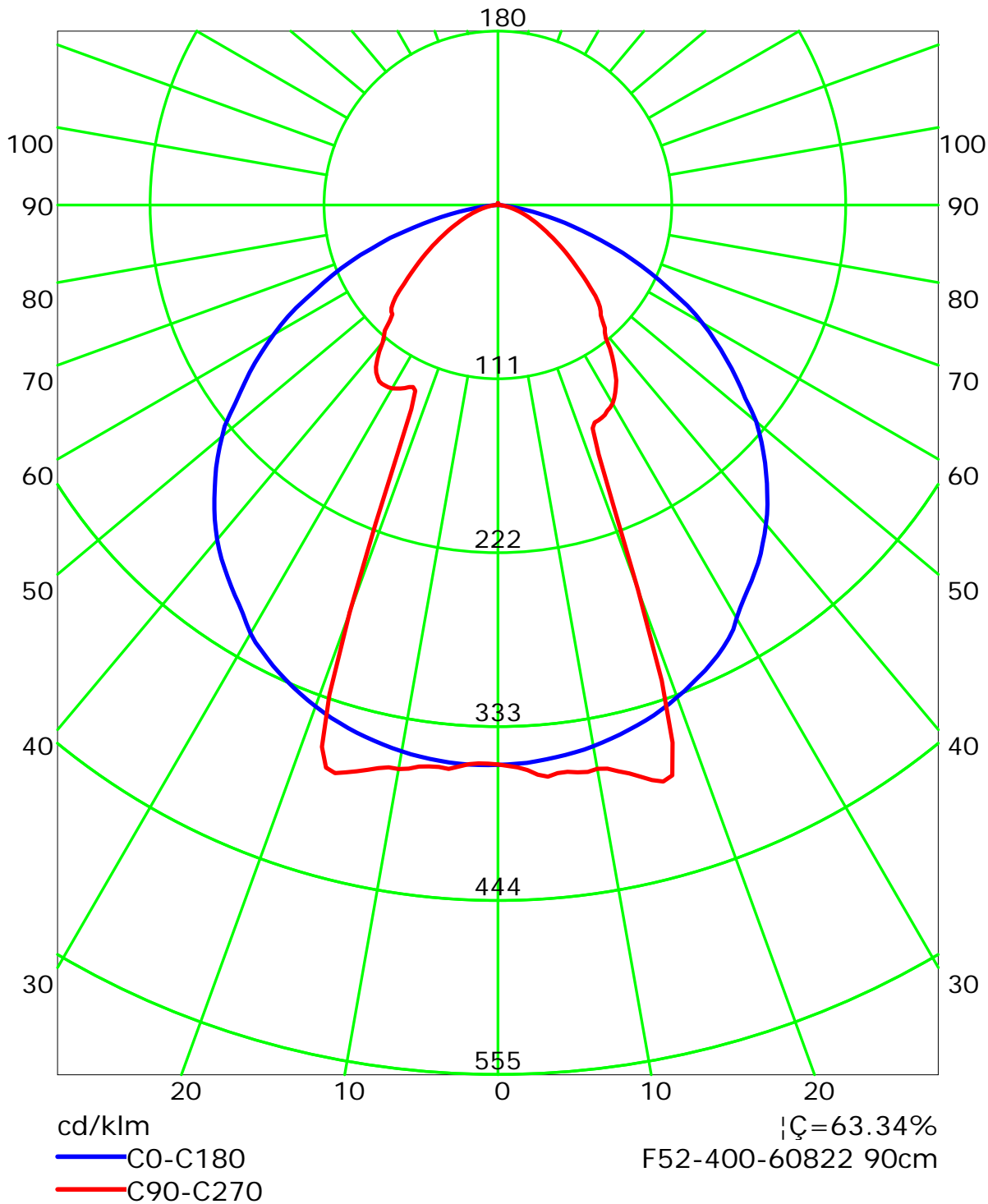


C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:



Luminous Intensity Distribution Curve(cd/klm)

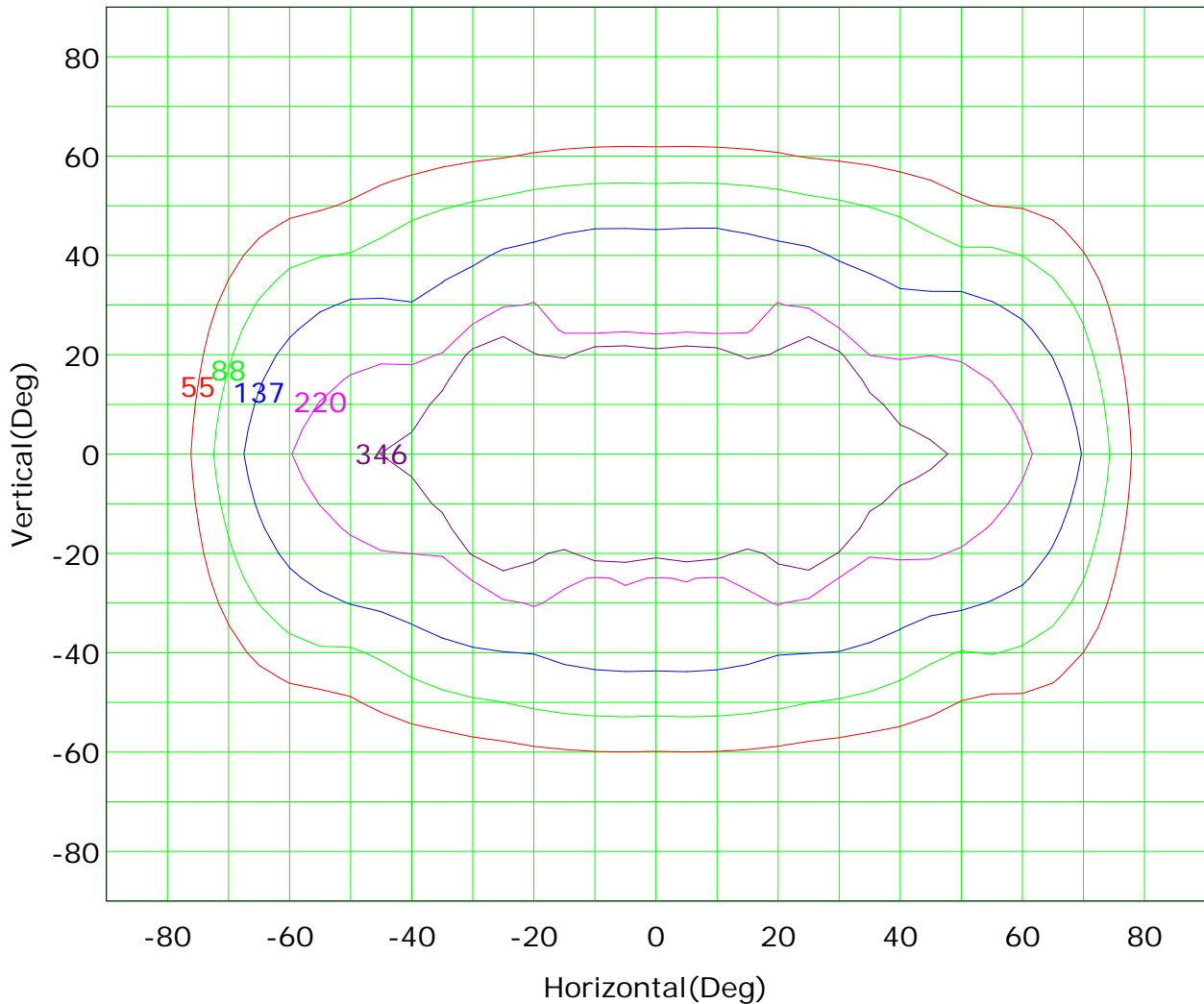


C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:



Isocandela (rectangle)



Imax (100%): 550 cd

- | | | | |
|-----------|--------|-----------|--------|
| — (10%): | 55 cd | — (16%): | 88 cd |
| — (25%): | 137 cd | — (40%): | 220 cd |
| — (63%): | 346 cd | — (100%): | 550 cd |

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

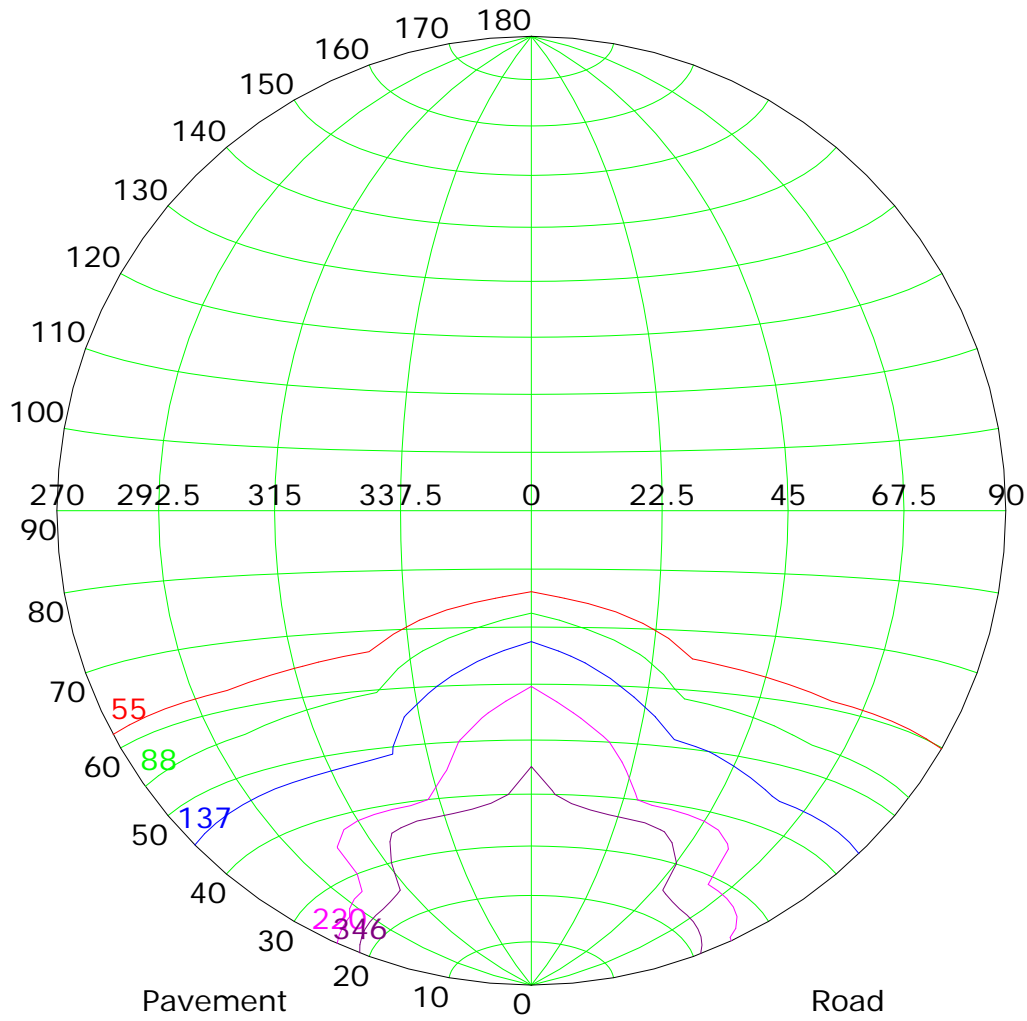
Distance: 7.979 m

Humidity:

Inspector:



Isocandela (sphere)



Imax (100%): 550 cd

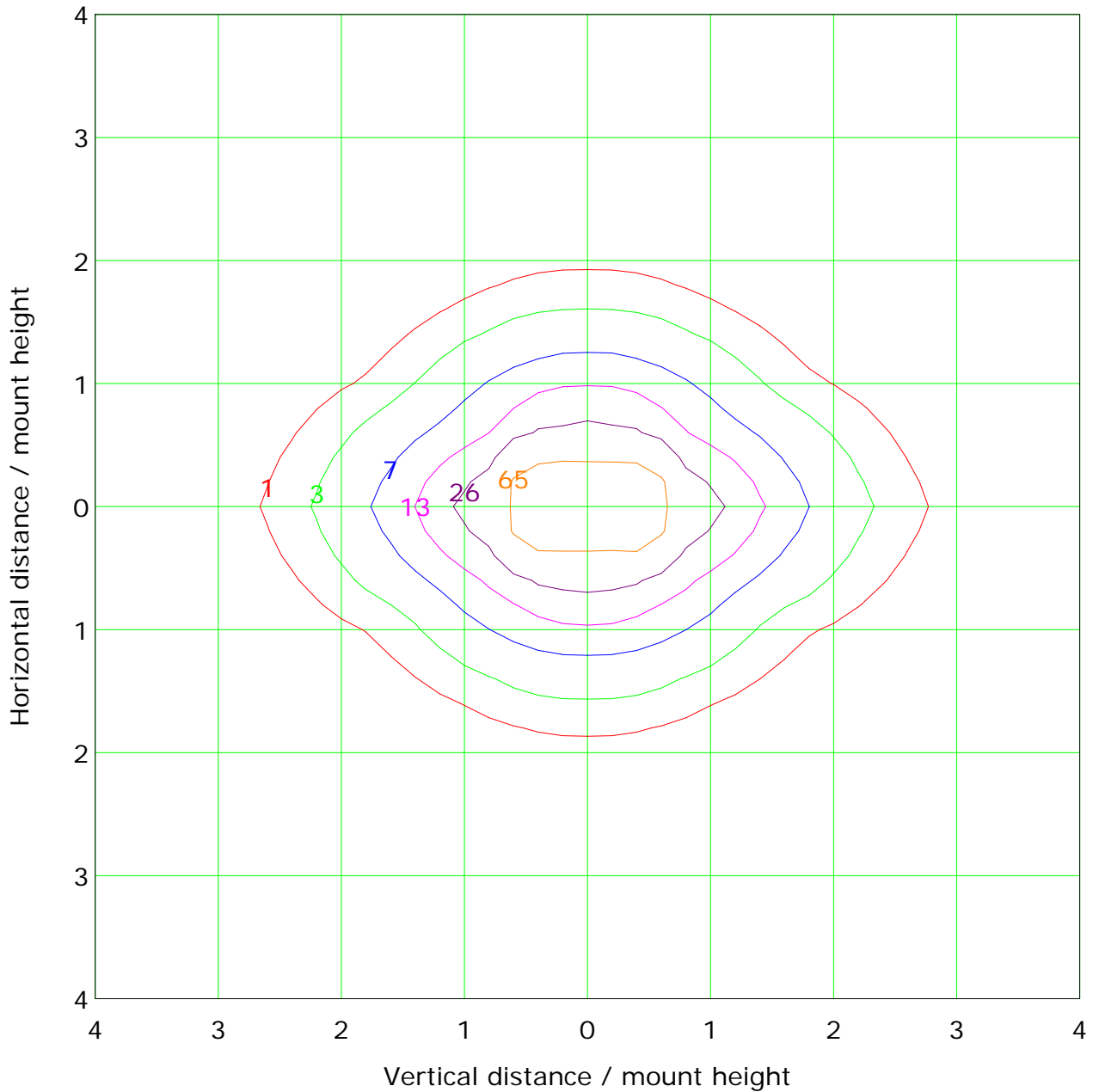
— (10%):	55 cd	— (16%):	88 cd
— (25%):	137 cd	— (40%):	220 cd
— (63%):	346 cd	— (100%):	550 cd

C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



IsoLux Plot



Mounting Height: 2.0m		Max Lux(100%): 130.0 lx
— (1%):	1.3 lx	— (2%): 2.6 lx
— (5%):	6.5 lx	— (10%): 13.0 lx
— (20%):	26.0 lx	— (50%): 65.0 lx
— (100%):	130.0 lx	

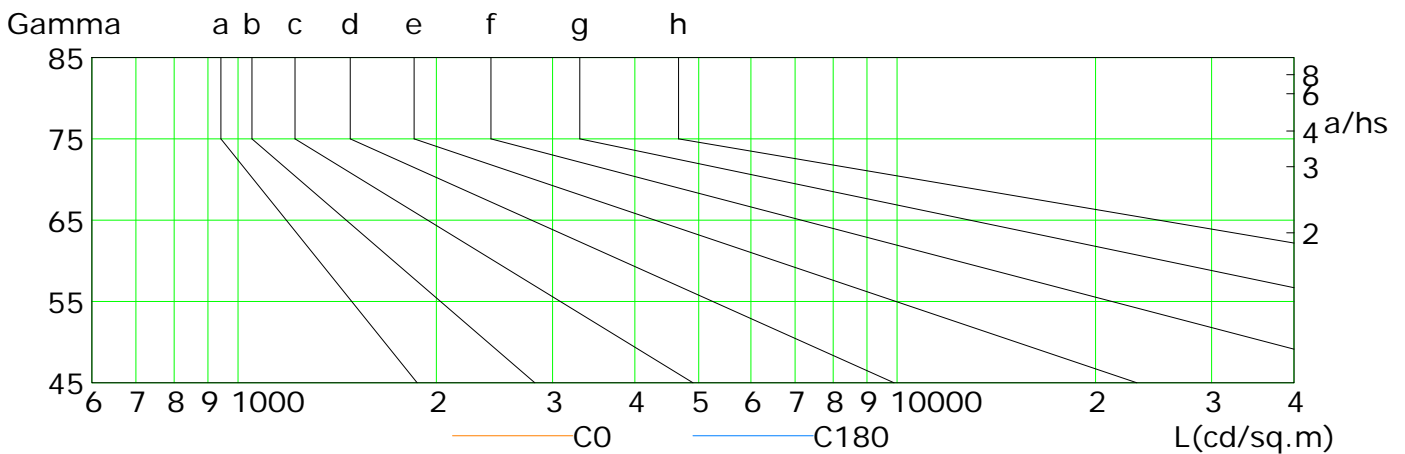
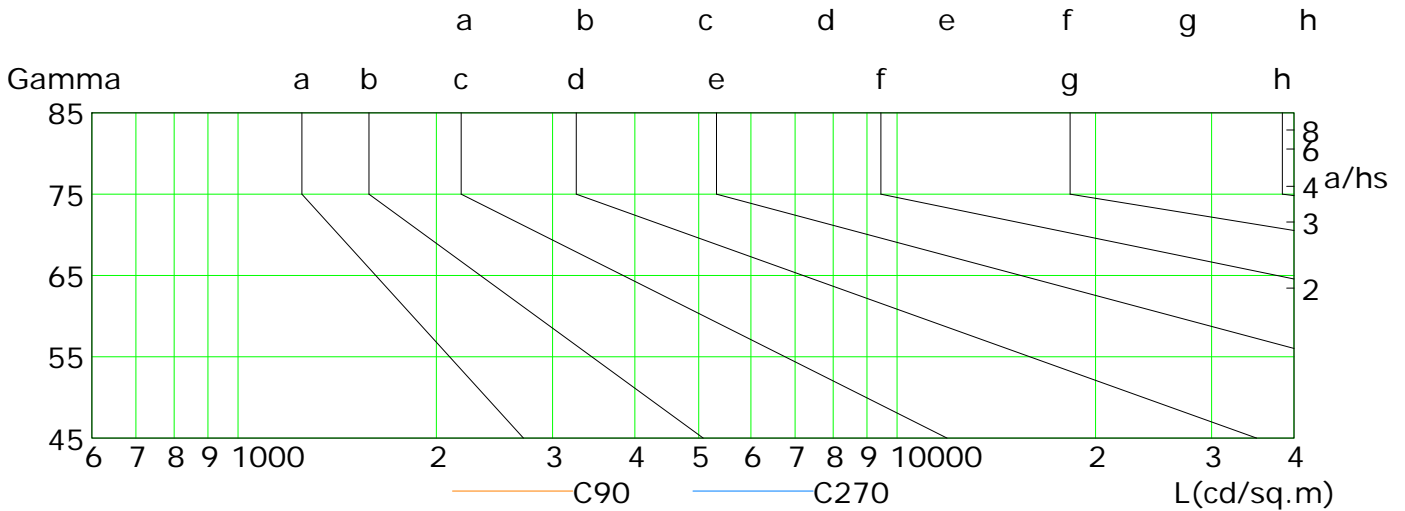
C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Lum Limit Curve

Dazzle	Quality	Illuminance (lx)							
		a	b	c	d	e	f	g	h
1.15	A	2000	1000	500	<=300				
1.50	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.20	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300



L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	347	309	261	216	163	111	64	25	4
C90	132	102	76	54	39	27	16	8	2
C180	367	330	283	237	184	134	81	37	7
C270	138	112	85	62	43	29	19	11	4

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

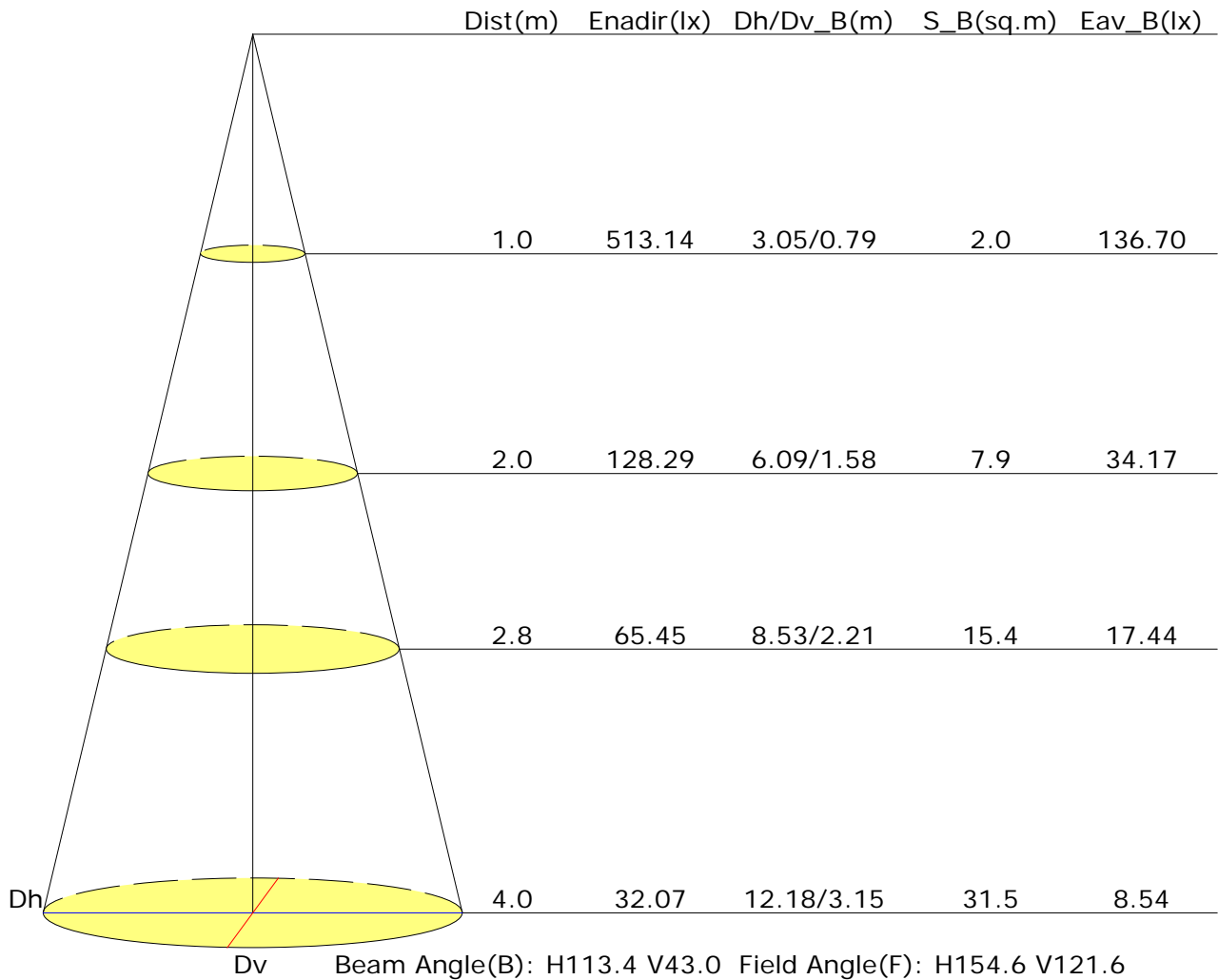
Distance: 7.979 m

Humidity:

Inspector:



Illuminance at a Distance

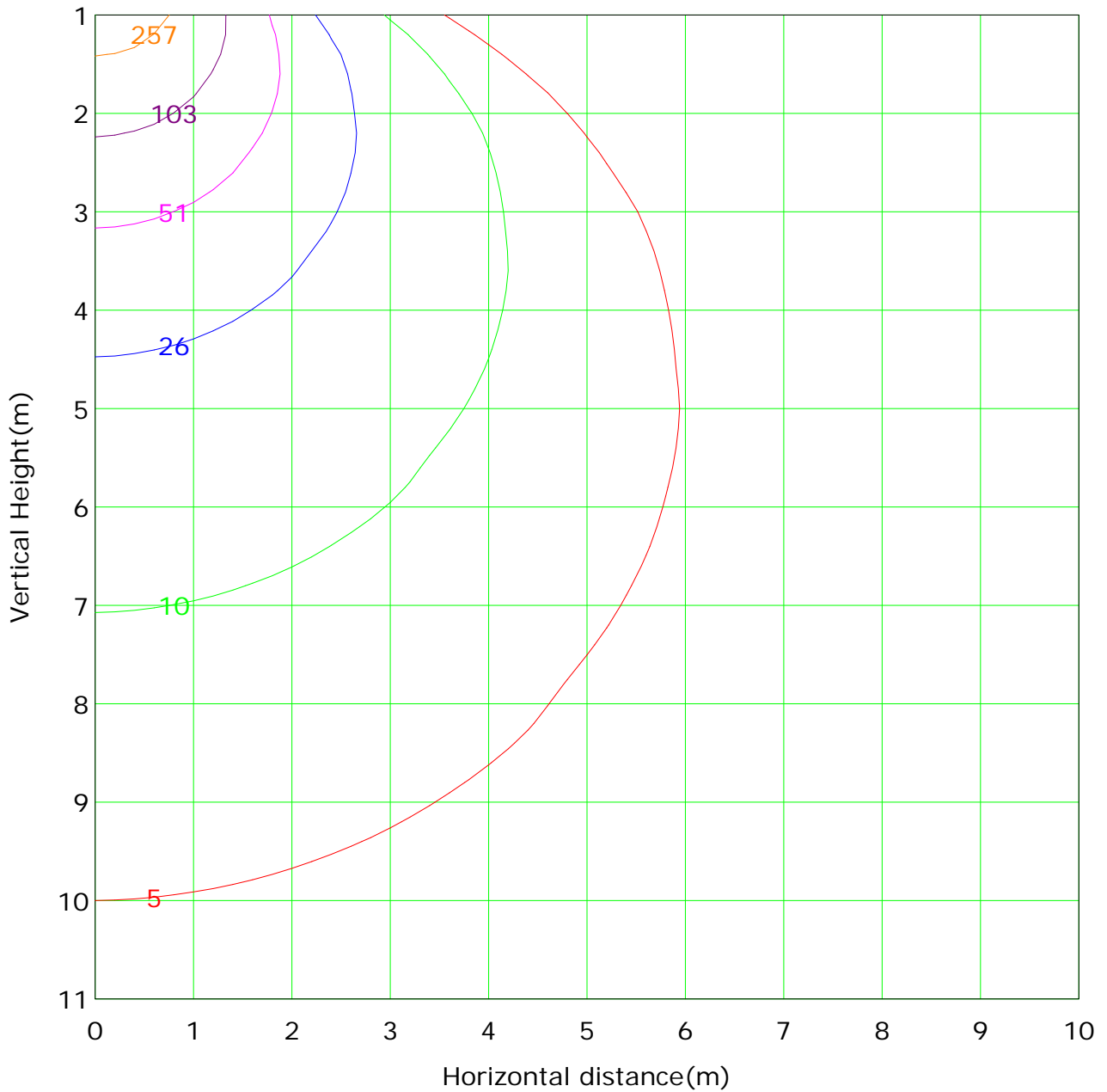


C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Vertical IsoLux Plot



Lowest(m): 1.0m	Highest(m): 11.0m	Max Lux: 513.1 lx
— (1%): 5.1 lx	— (2%): 10.3 lx	
— (5%): 25.7 lx	— (10%): 51.3 lx	
— (20%): 102.6 lx	— (50%): 256.6 lx	
— (100%): 513.1 lx		

C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Report No.:

Test Time: 22/01/2021 11:06

Luminaire Property

Luminaire Manufacturer: Lighting Line
 Luminaire Description: LLP-DW11-03 + LLD-03-FH
 Lamp Description: F52-400-60822 90cm
 Lumens per Lamp: 1434 lm
 Current: 0.528 A
 Power Factor: 1.000

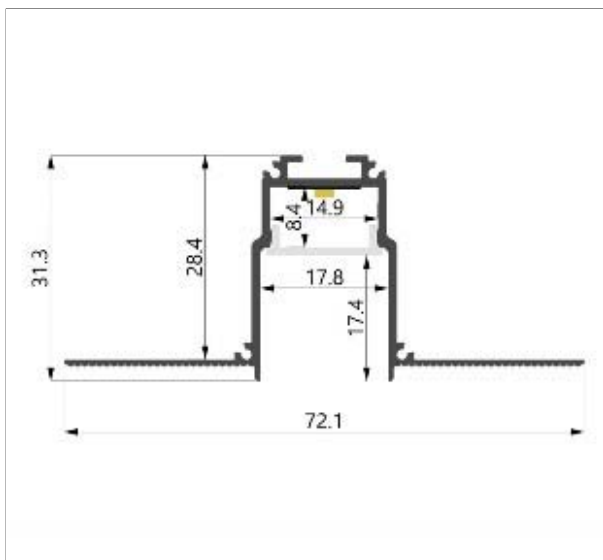
Number of Lamps: 1
 Voltage: 24.0 V
 Power: 12.67 W

Photometric Results

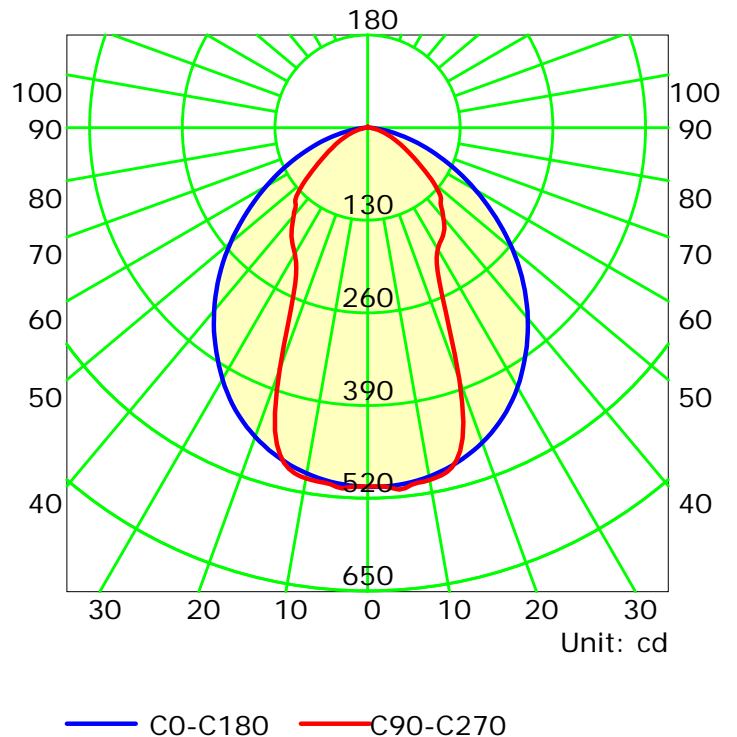
CIE Class: Direct
 Measurement Flux: 864.3 lm
 Downward Ratio: 60.23%
 Field Angle(C0/C180,C90/C270,C45/C225,C135/315): 152.3, 125.7, 133.6, 133.8
 Beam Angle(C0/C180,C90/C270,C45/C225,C135/315): 101.3, 48.2, 70.4, 70.3
 Luminaire Efficacy Rating (LER): 68.27
 Max. Intensity: 510.08 cd
 S/MH(C0/C180): 1.22

Total Rated Lamp Lumens: 1434.0 lm
 Efficiency: 60.27%
 Upward Ratio: 0.04%
 Central Intensity: 504.5 cd
 Pos of Max. Intensity: H90 V5
 S/MH(C90/C270): 0.80

Picture Of Luminaire



Luminous Intensity Distribution Curve



C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

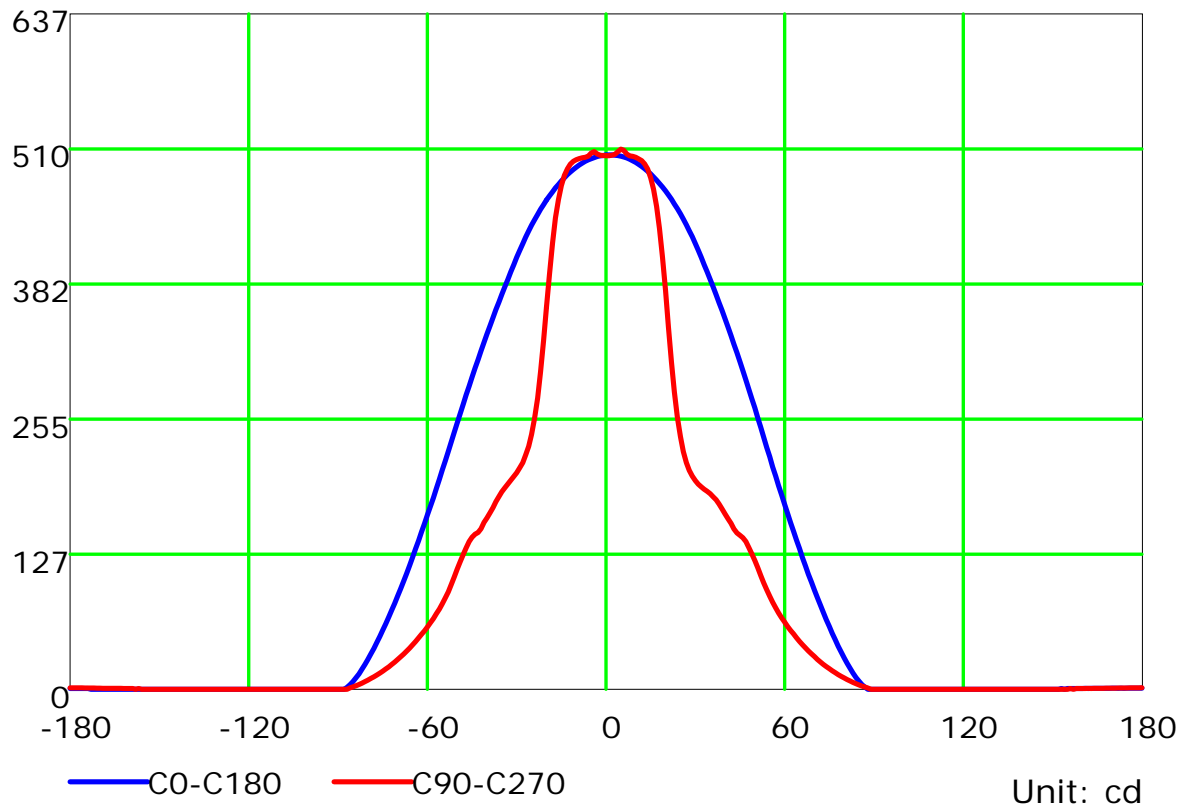
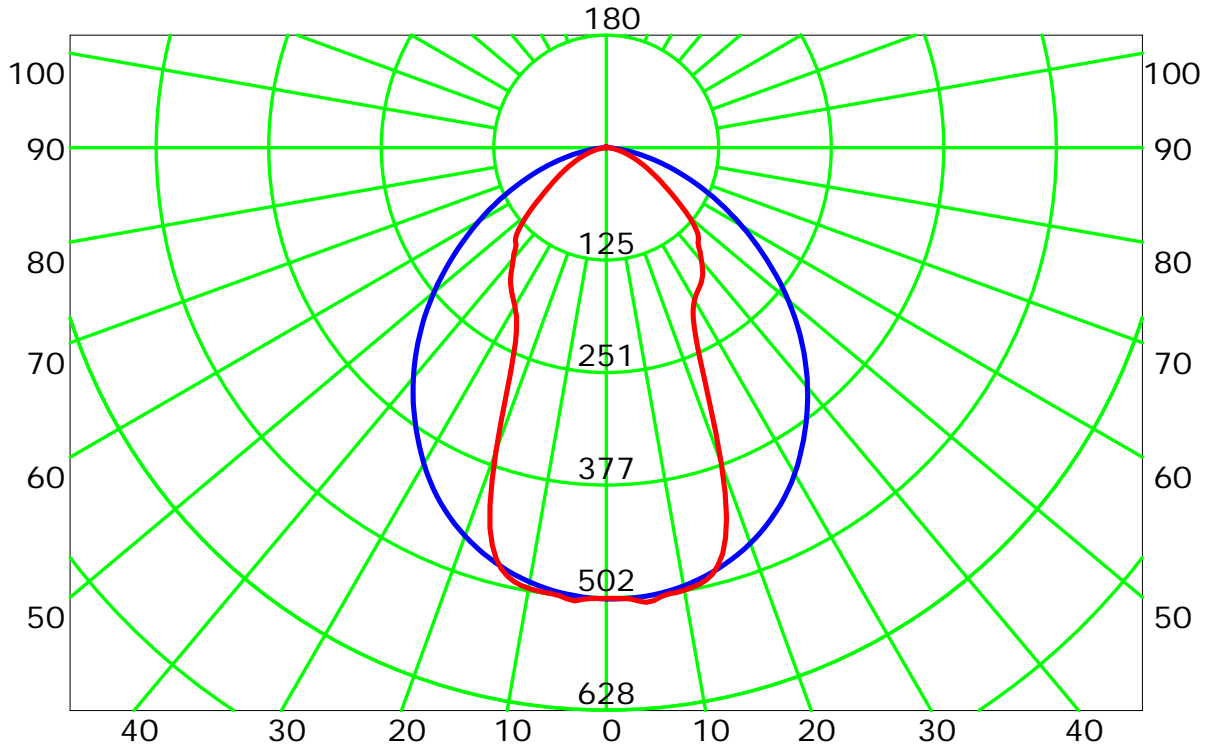
Distance: 7.979 m

Humidity:

Inspector:



Luminous Intensity Distribution Curve

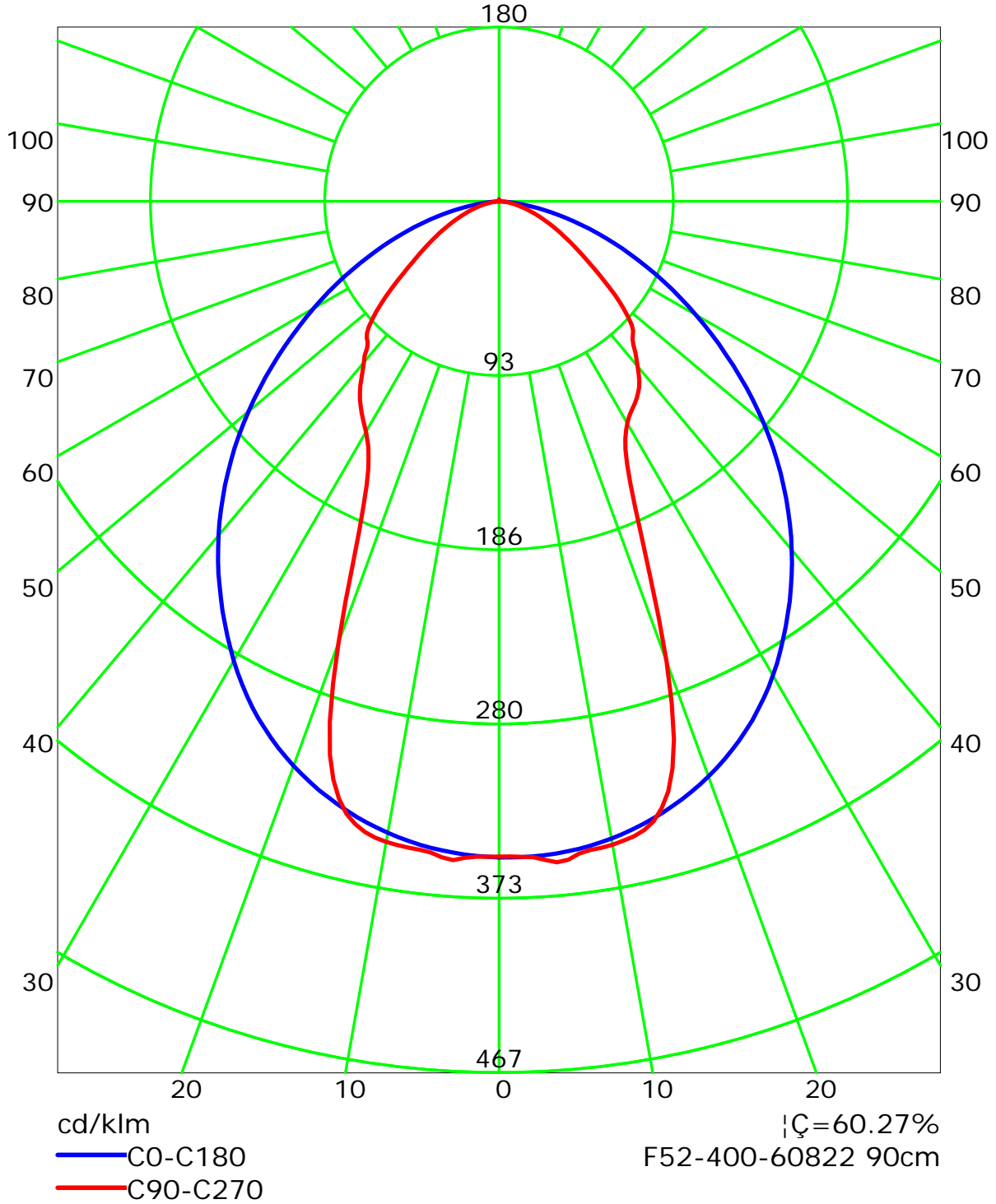


C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Luminous Intensity Distribution Curve(cd/klm)

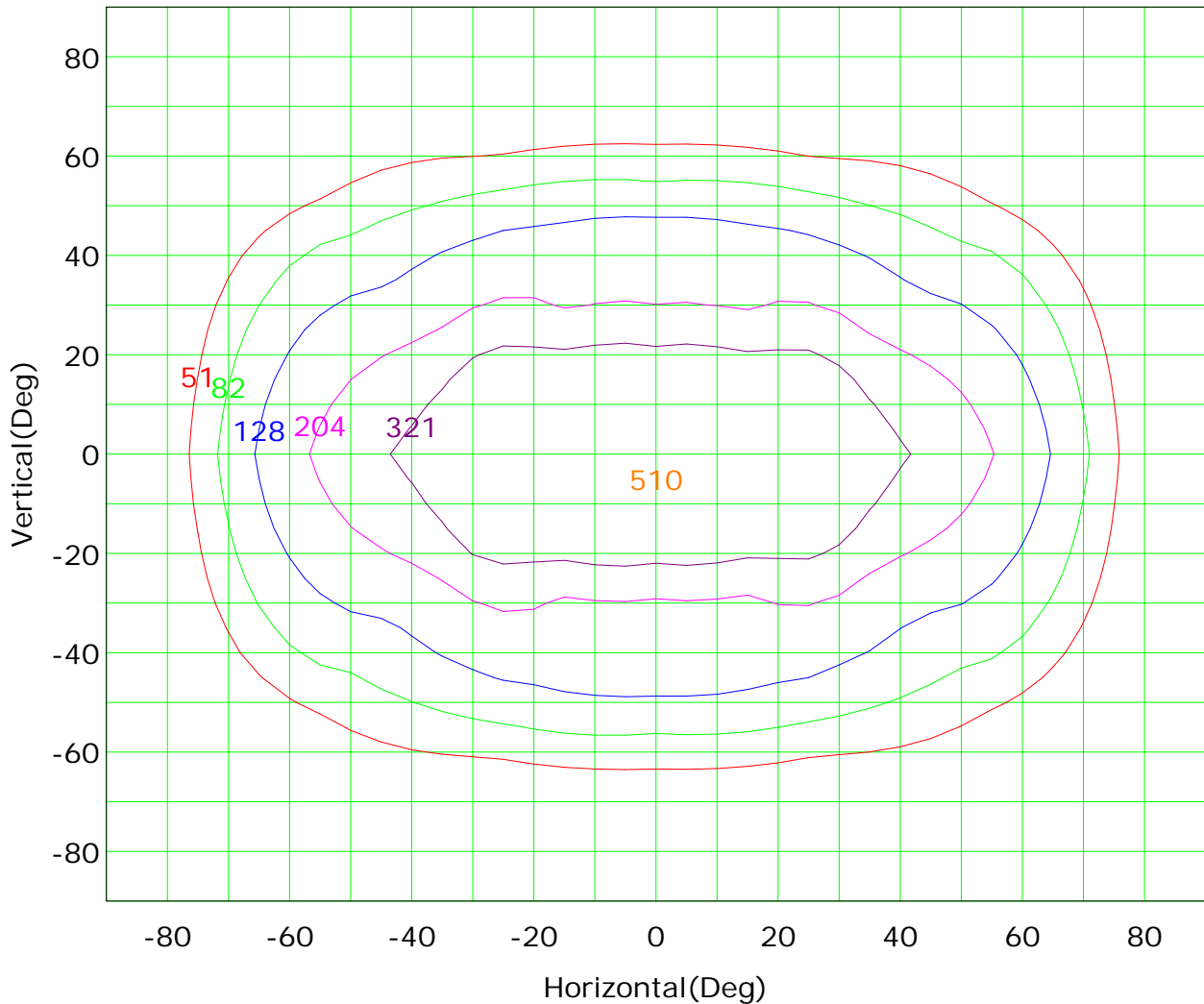


C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Isocandela (rectangle)



Imax (100%): 510 cd

— (10%):	51 cd	— (16%):	82 cd
— (25%):	128 cd	— (40%):	204 cd
— (63%):	321 cd	— (100%):	510 cd

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

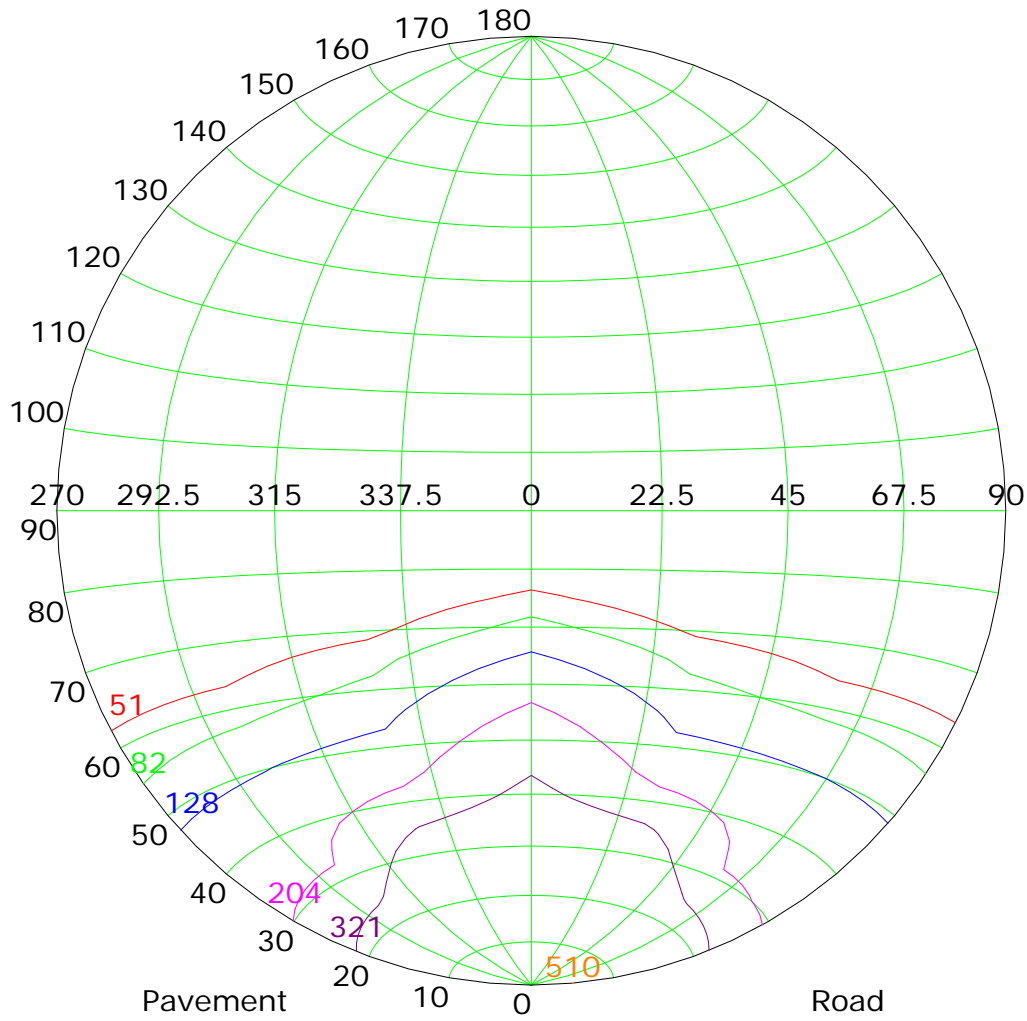
Distance: 7.979 m

Humidity:

Inspector:



Isocandela (sphere)

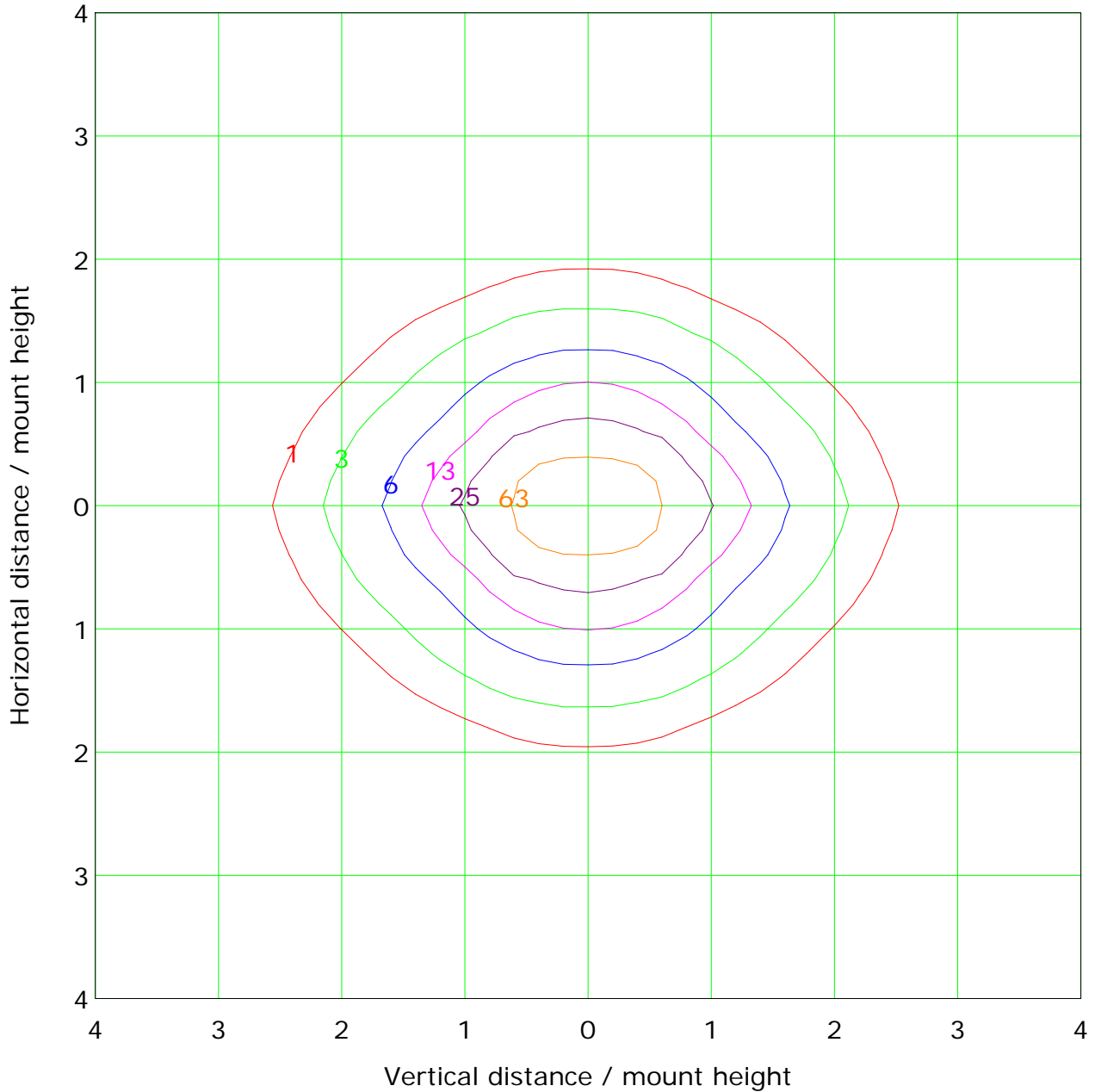


Imax (100%): 510 cd

- | | | | |
|-----------|--------|-----------|--------|
| — (10%): | 51 cd | — (16%): | 82 cd |
| — (25%): | 128 cd | — (40%): | 204 cd |
| — (63%): | 321 cd | — (100%): | 510 cd |



IsoLux Plot



Mounting Height: 2.0m		Max Lux(100%): 126.1 lx
— (1%):	1.3 lx	— (2%): 2.5 lx
— (5%):	6.3 lx	— (10%): 12.6 lx
— (20%):	25.2 lx	— (50%): 63.1 lx
— (100%):	126.1 lx	

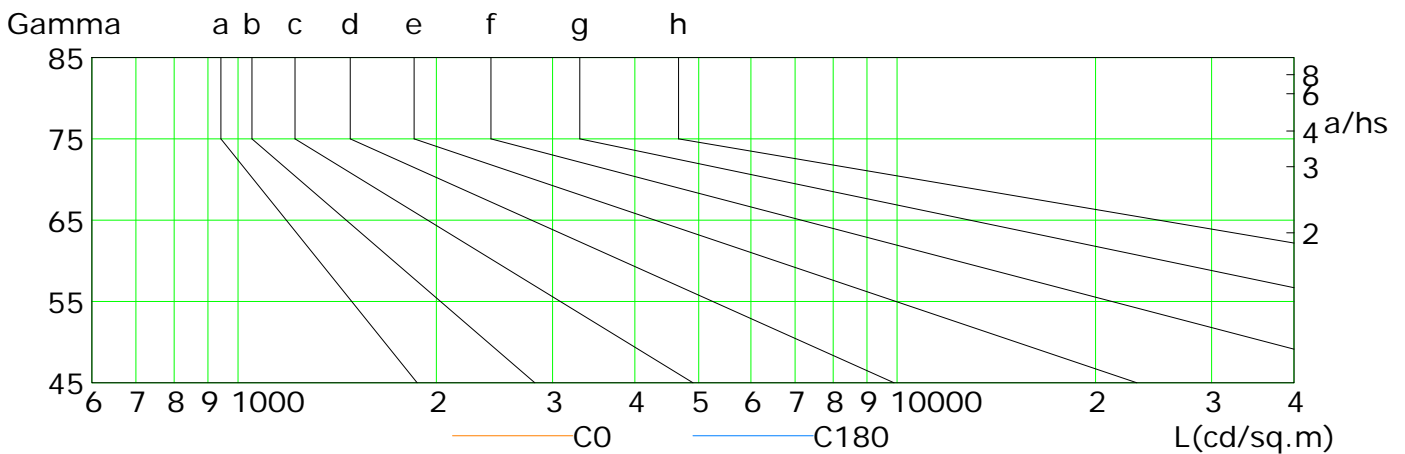
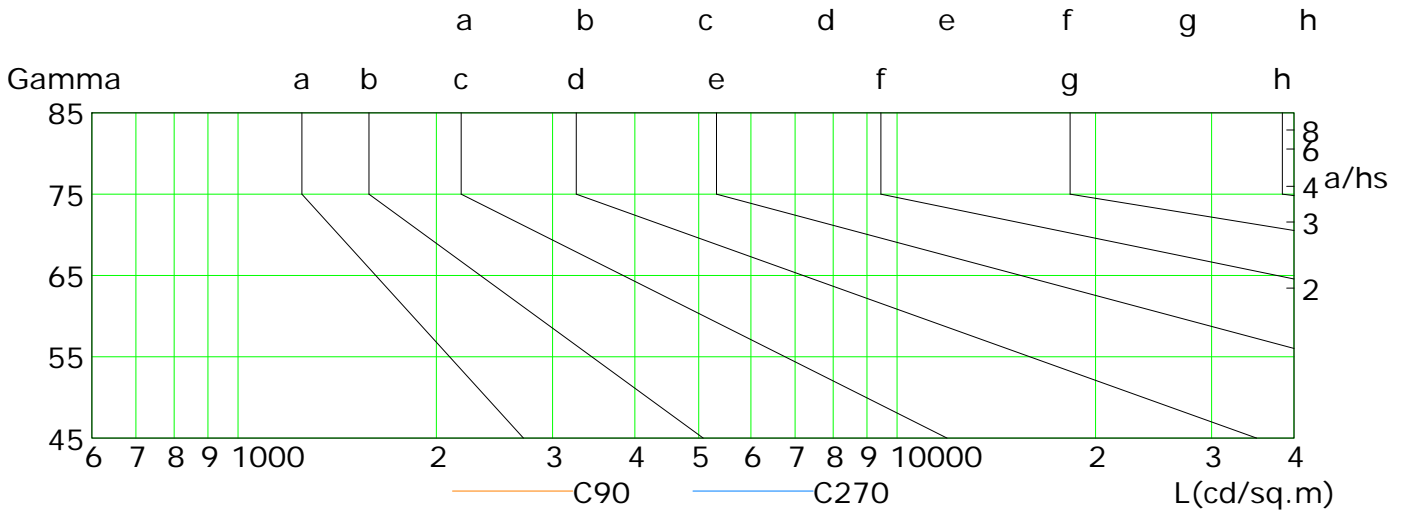
C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Lum Limit Curve

Dazzle	Quality	Illuminance (lx)							
		a	b	c	d	e	f	g	h
1.15	A	2000	1000	500	<=300				
1.50	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.20	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300



L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	309	266	220	175	133	94	59	30	8
C90	145	122	88	64	45	31	20	11	4
C180	295	251	207	165	124	88	56	28	7
C270	144	113	81	59	42	28	17	9	2

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

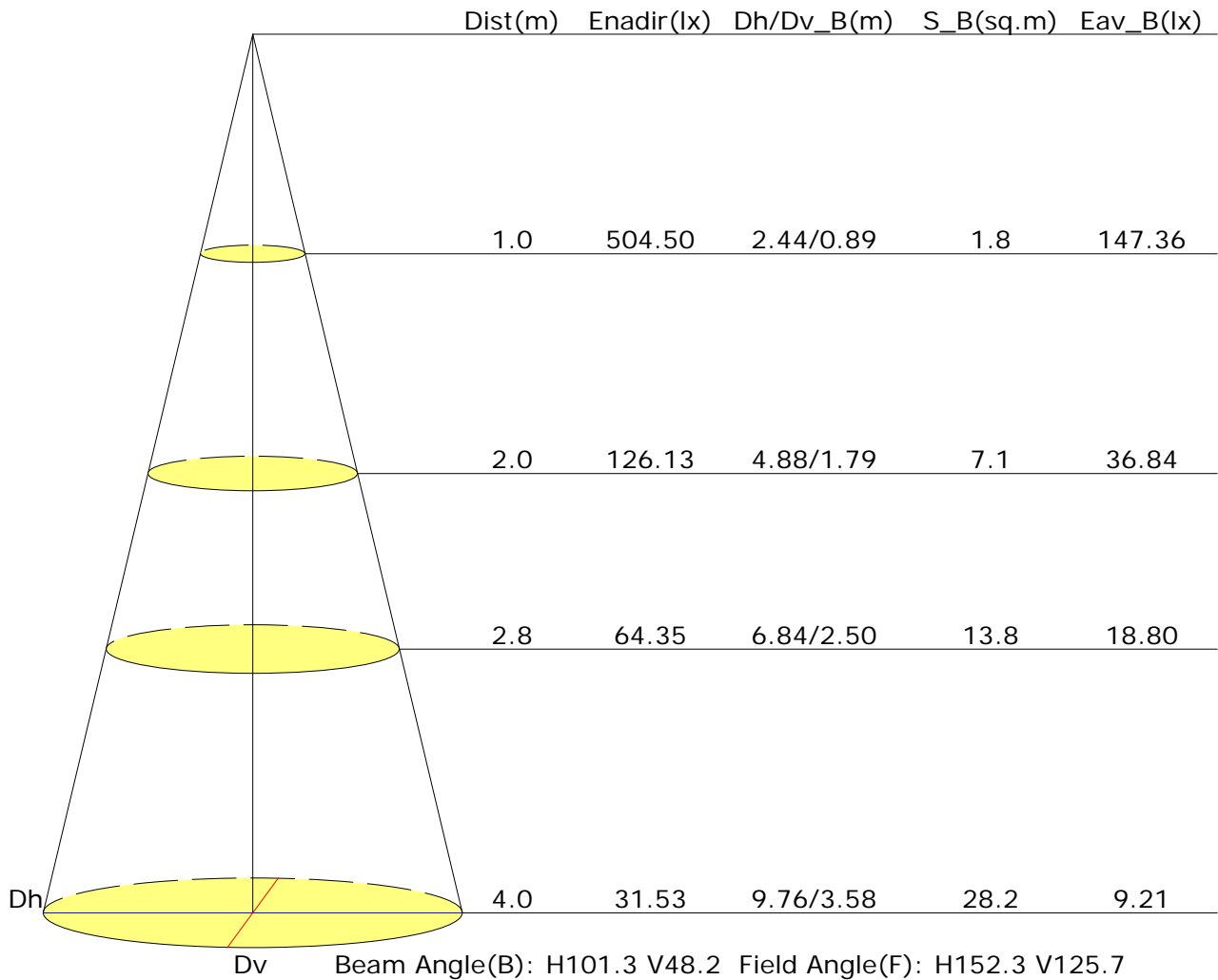
Distance: 7.979 m

Humidity:

Inspector:

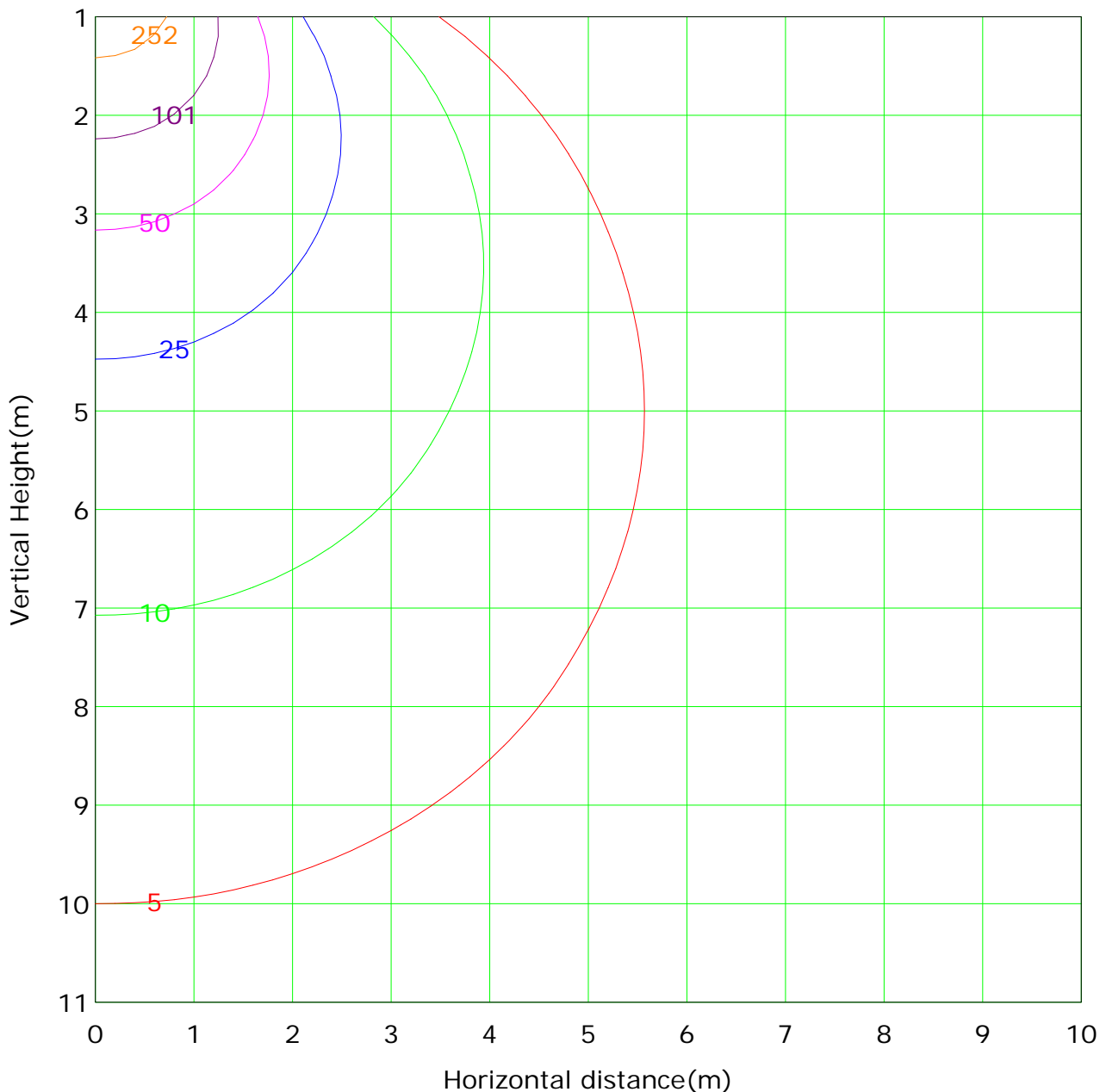


Illuminance at a Distance





Vertical IsoLux Plot



Lowest(m): 1.0m Highest(m): 11.0m Max Lux: 504.5 lx
— (1%): 5.0 lx — (2%): 10.1 lx
— (5%): 25.2 lx — (10%): 50.5 lx
— (20%): 100.9 lx — (50%): 252.3 lx
— (100%): 504.5 lx

C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:



Report No.:

Test Time: 21/01/2021 12:39

Luminaire Property

Luminaire Manufacturer: Lighting Line
 Luminaire Description: LLP-DW11-03 + LLD-03-M
 Lamp Description: F52-400-60822 90cm
 Lumens per Lamp: 1434 lm
 Current: 0.530 A
 Power Factor: 1.000

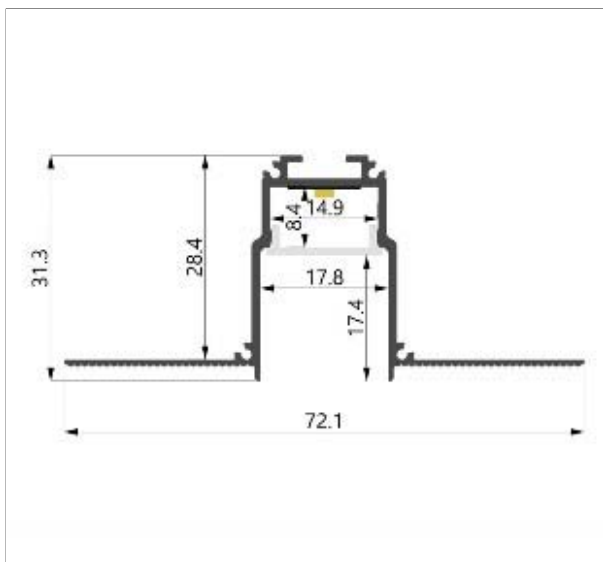
Number of Lamps: 1
 Voltage: 24.0 V
 Power: 12.72 W

Photometric Results

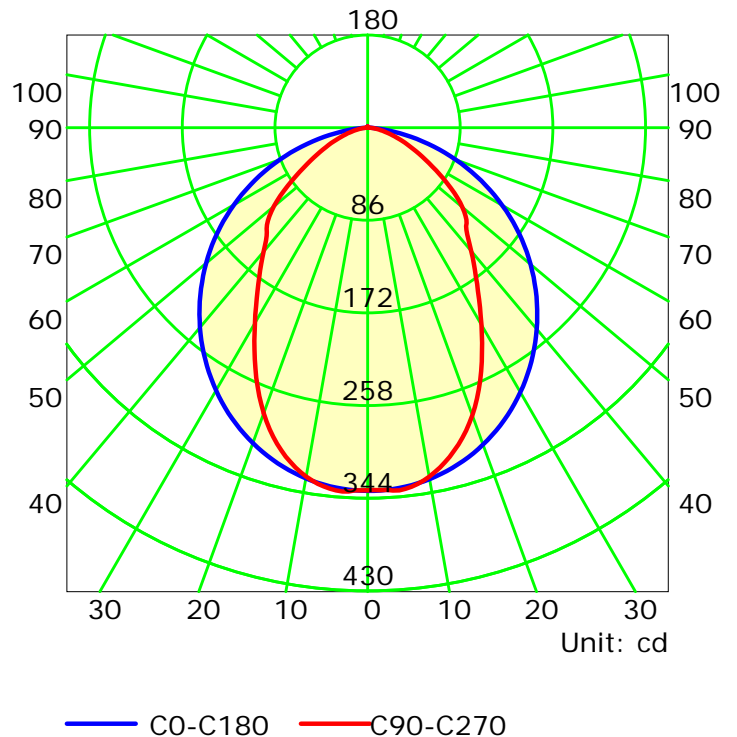
CIE Class: Direct
 Measurement Flux: 716.9 lm
 Downward Ratio: 49.84%
 Field Angle(C0/C180,C90/C270,C45/C225,C135/315): 158.9, 137.1, 143.0, 143.0
 Beam Angle(C0/C180,C90/C270,C45/C225,C135/315): 110.9, 72.7, 86.1, 86.2
 Luminaire Efficacy Rating (LER): 56.41
 Max. Intensity: 338.62 cd
 S/MH(C0/C180): 1.25

Total Rated Lamp Lumens: 1434.0 lm
 Efficiency: 49.99%
 Upward Ratio: 0.16%
 Central Intensity: 337.27 cd
 Pos of Max. Intensity: H270 V4
 S/MH(C90/C270): 1.00

Picture Of Luminaire



Luminous Intensity Distribution Curve

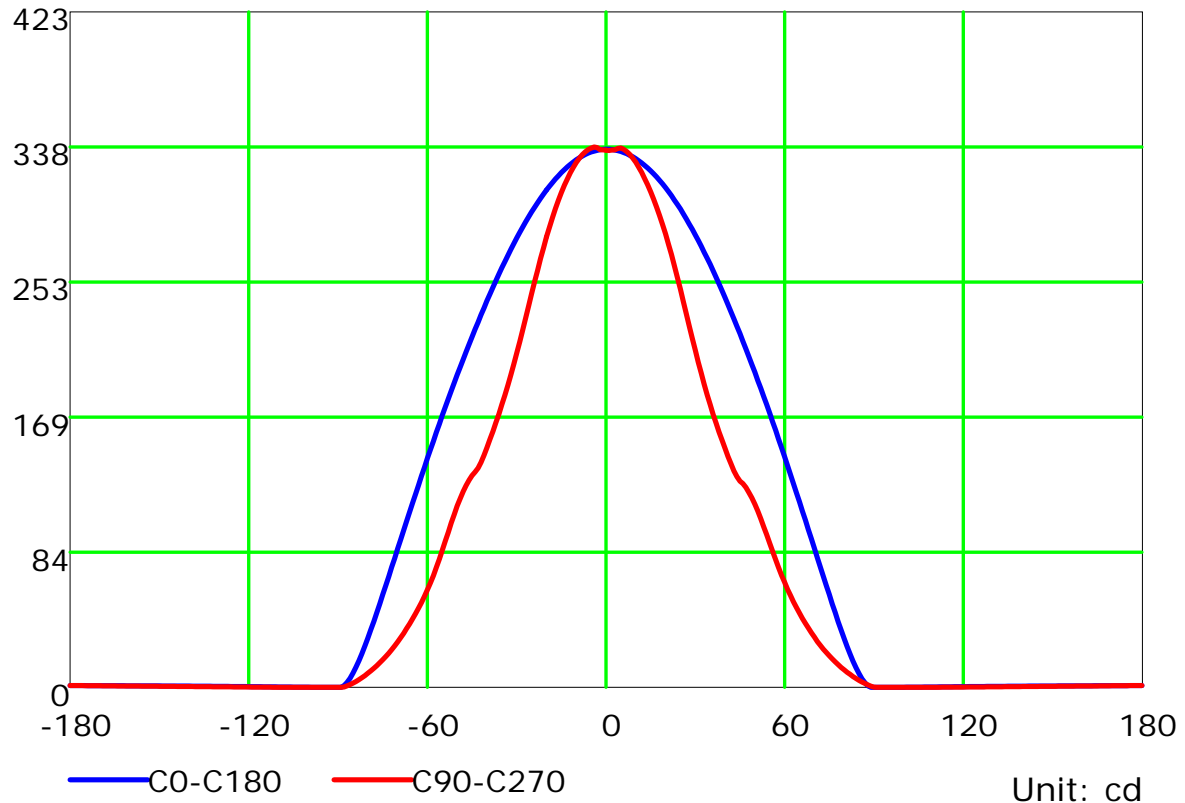
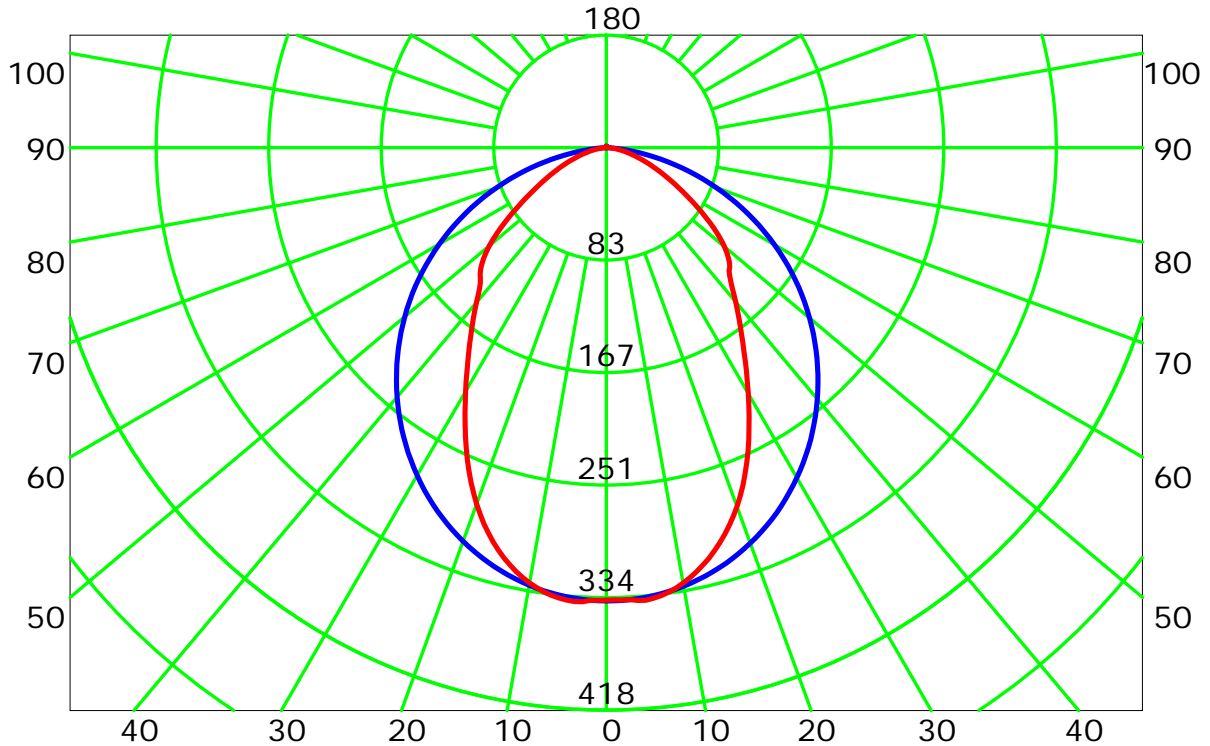


C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Luminous Intensity Distribution Curve

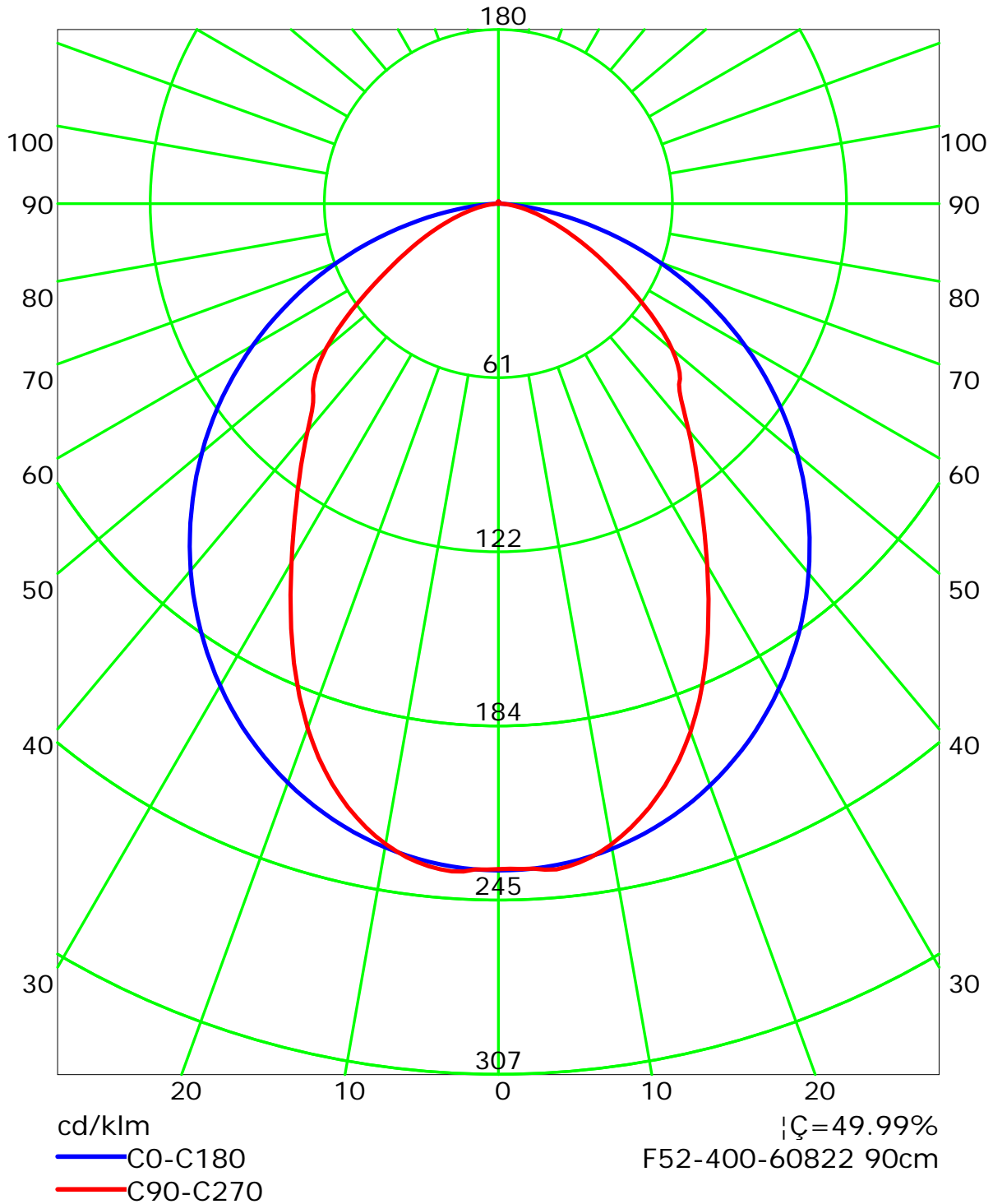


C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Luminous Intensity Distribution Curve(cd/klm)

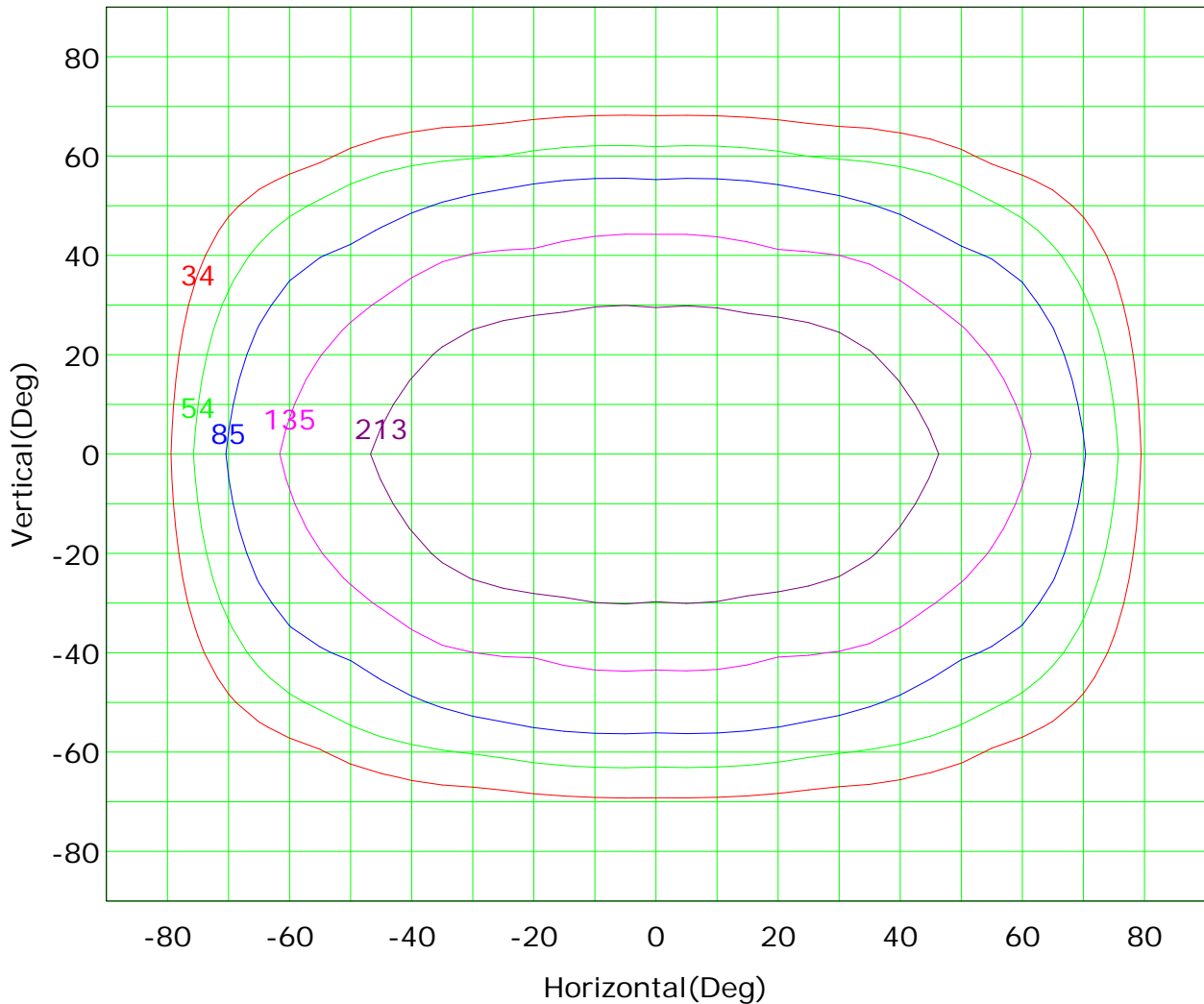


C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:



Isocandela (rectangle)



Imax (100%): 339 cd

— (10%):	34 cd	— (16%):	54 cd
— (25%):	85 cd	— (40%):	135 cd
— (63%):	213 cd	— (100%):	339 cd

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

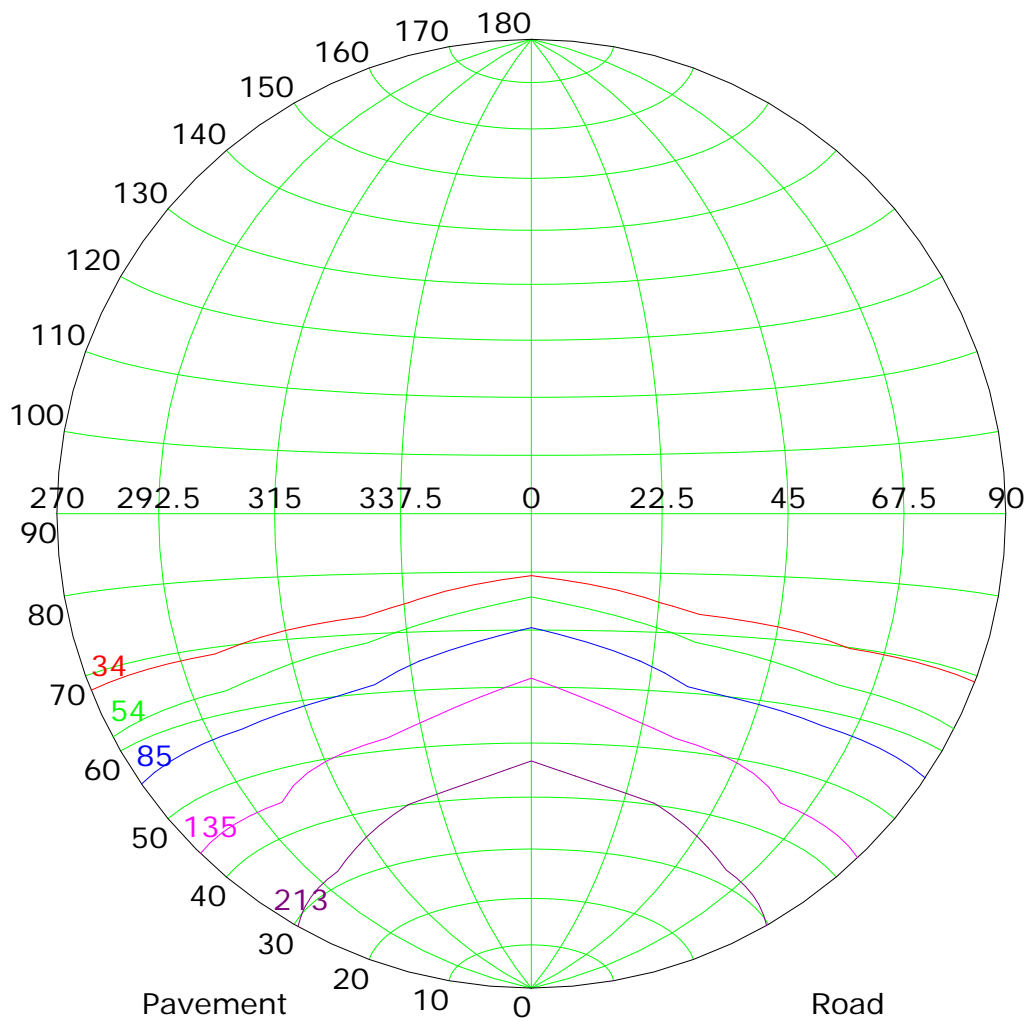
Distance: 7.979 m

Humidity:

Inspector:



Isocandela (sphere)



Imax (100%): 339 cd

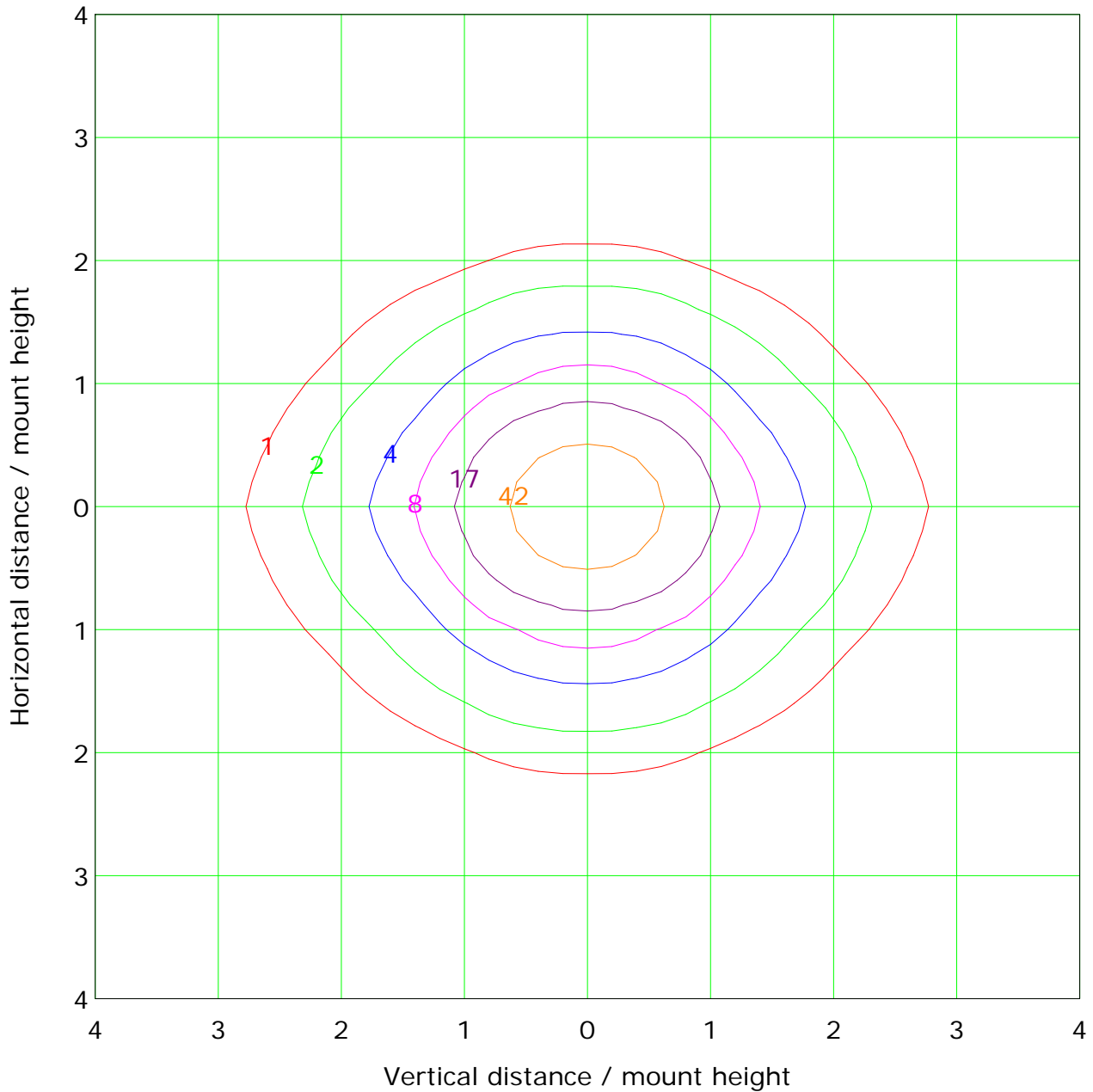
— (10%):	34 cd	— (16%):	54 cd
— (25%):	85 cd	— (40%):	135 cd
— (63%):	213 cd	— (100%):	339 cd

C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



IsoLux Plot



Mounting Height: 2.0m		Max Lux(100%): 84.3 lx
— (1%):	0.8 lx	— (2%): 1.7 lx
— (5%):	4.2 lx	— (10%): 8.4 lx
— (20%):	16.9 lx	— (50%): 42.2 lx
— (100%):	84.3 lx	

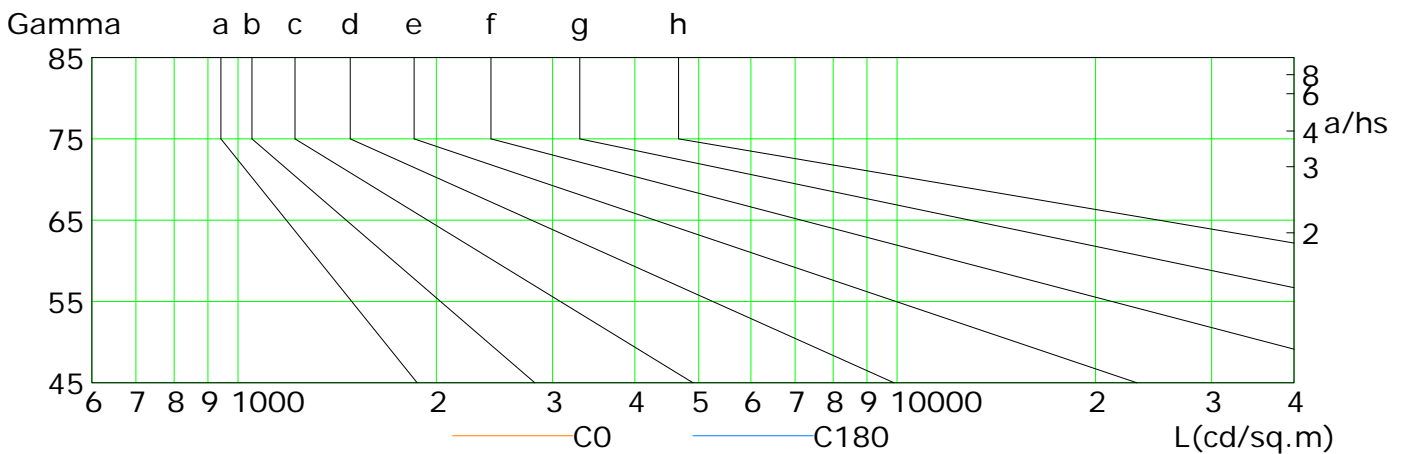
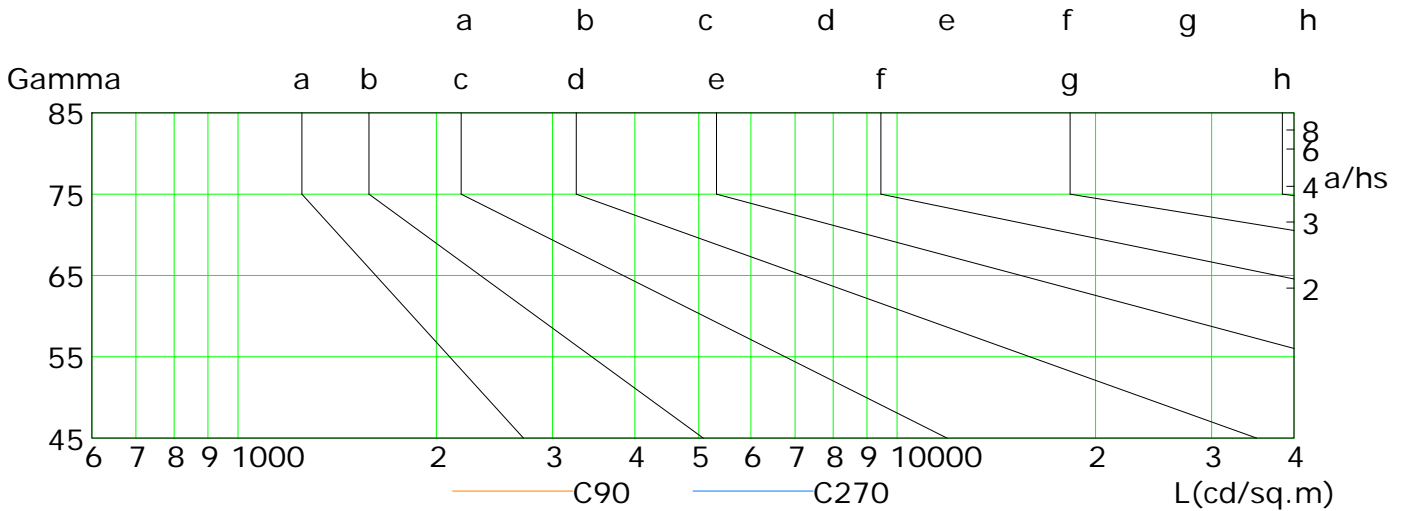
C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Lum Limit Curve

Dazzle	Quality	Illuminance (lx)							
		a	b	c	d	e	f	g	h
1.15	A	2000	1000	500	<=300				
1.50	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.20	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300



L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	222	198	172	144	116	87	58	31	9
C90	129	115	90	66	46	32	20	11	4
C180	220	196	170	144	115	87	58	31	9
C270	133	114	86	61	43	28	17	9	3

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

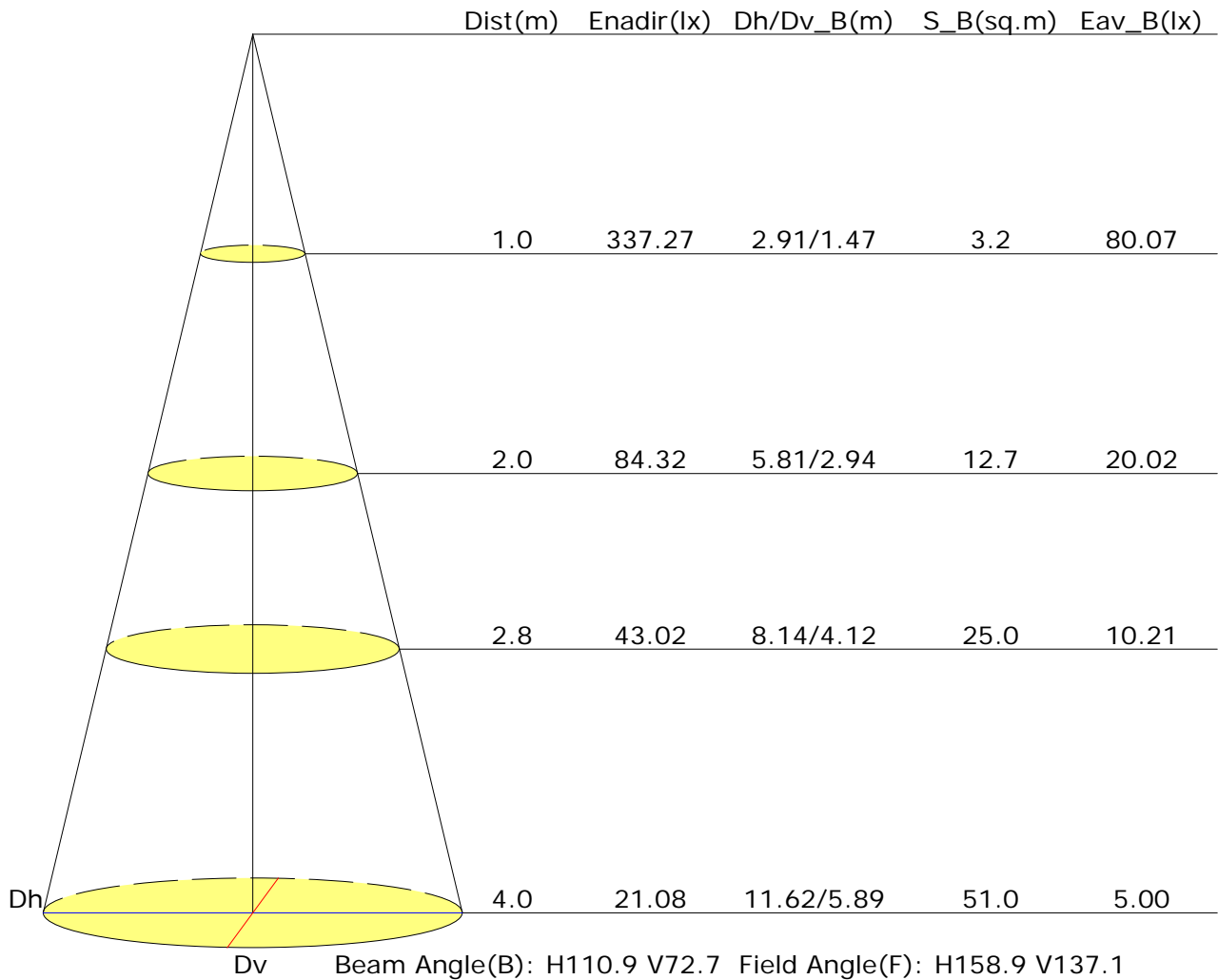
Distance: 7.979 m

Humidity:

Inspector:

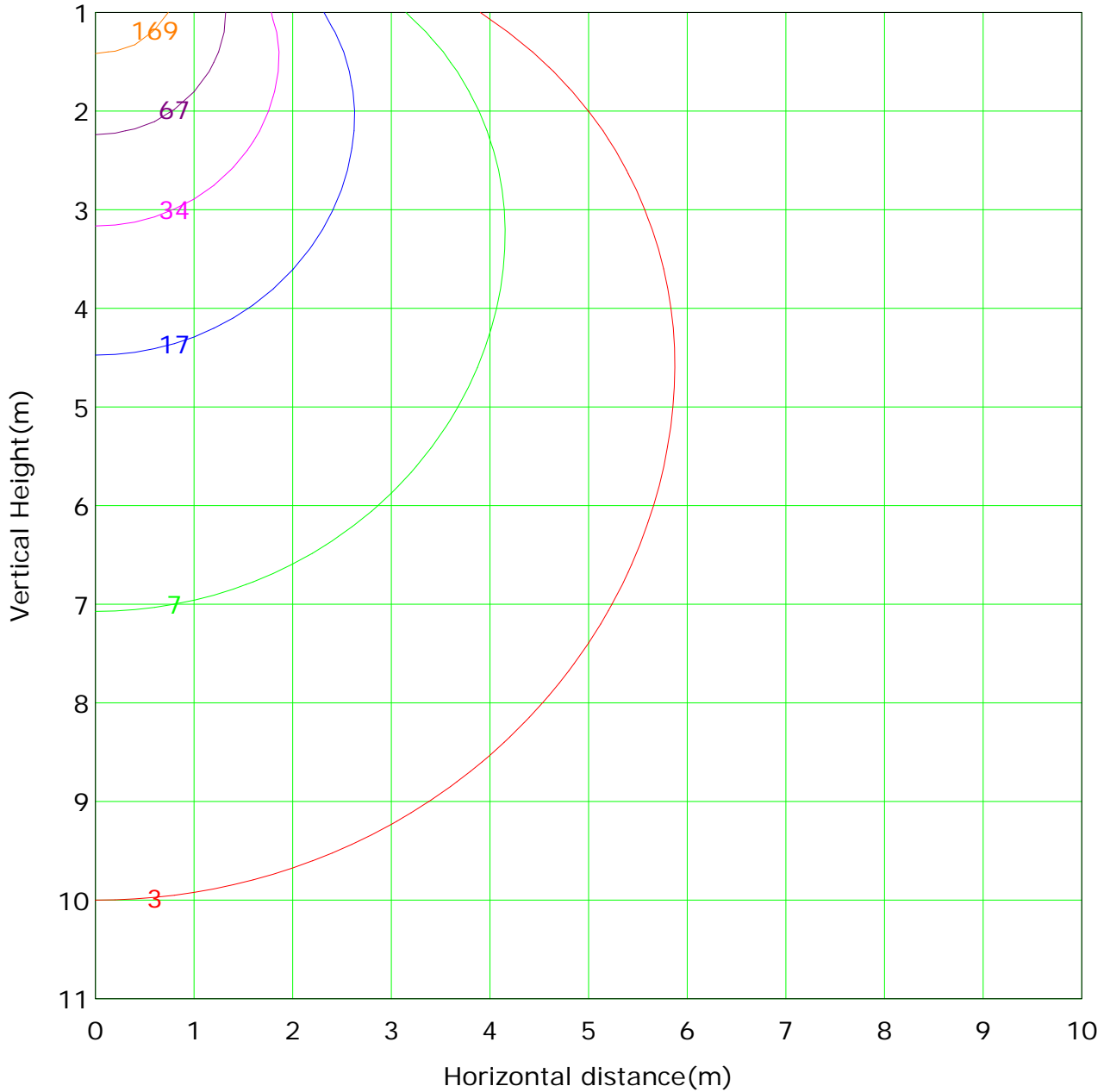


Illuminance at a Distance





Vertical IsoLux Plot



Lowest(m): 1.0m	Highest(m): 11.0m	Max Lux: 337.3 lx
— (1%): 3.4 lx	— (2%): 6.7 lx	
— (5%): 16.9 lx	— (10%): 33.7 lx	
— (20%): 67.5 lx	— (50%): 168.6 lx	
— (100%): 337.3 lx		

C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Report No.:

Test Time: 21/01/2021 14:33

Luminaire Property

Luminaire Manufacturer: Lighting Line
 Luminaire Description: LLP-DW11-03 + LLD-03-FS
 Lamp Description: F52-400-60822 90cm
 Lumens per Lamp: 1434 lm
 Current: 0.532 A
 Power Factor: 1.000

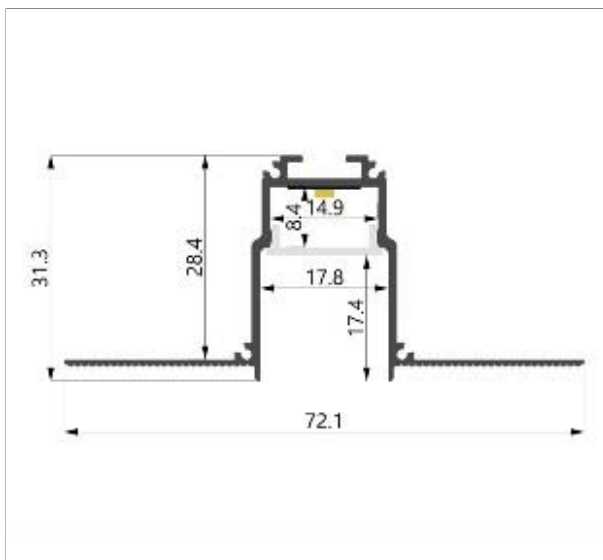
Number of Lamps: 1
 Voltage: 24.0 V
 Power: 12.77 W

Photometric Results

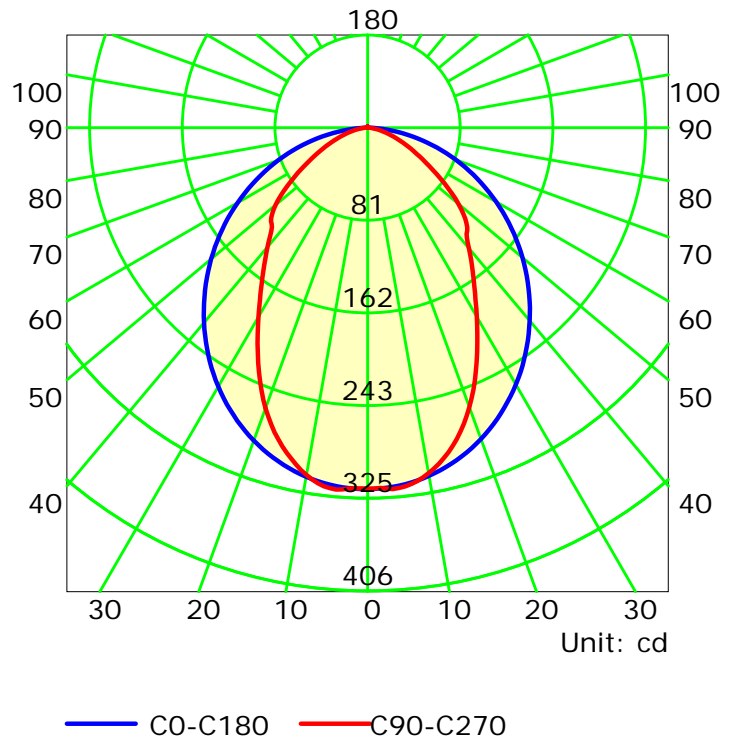
CIE Class: Direct
 Measurement Flux: 660.7 lm
 Downward Ratio: 45.93%
 Field Angle(C0/C180,C90/C270,C45/C225,C135/315): 161.6, 136.6, 142.9, 142.9
 Beam Angle(C0/C180,C90/C270,C45/C225,C135/315): 108.5, 70.9, 84.1, 84.4
 Luminaire Efficacy Rating (LER): 51.79
 Max. Intensity: 318.58 cd
 S/MH(C0/C180): 1.23

Total Rated Lamp Lumens: 1434.0 lm
 Efficiency: 46.07%
 Upward Ratio: 0.14%
 Central Intensity: 317 cd
 Pos of Max. Intensity: H270 V5
 S/MH(C90/C270): 0.98

Picture Of Luminaire



Luminous Intensity Distribution Curve

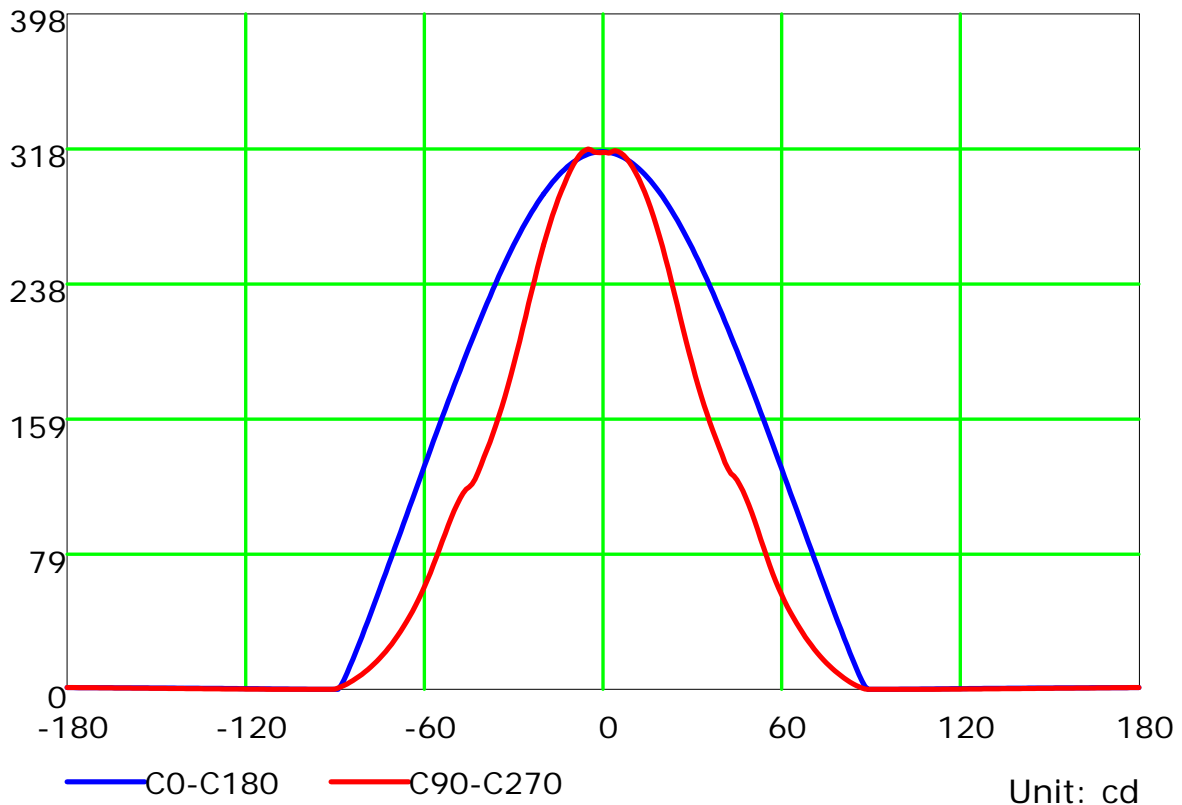
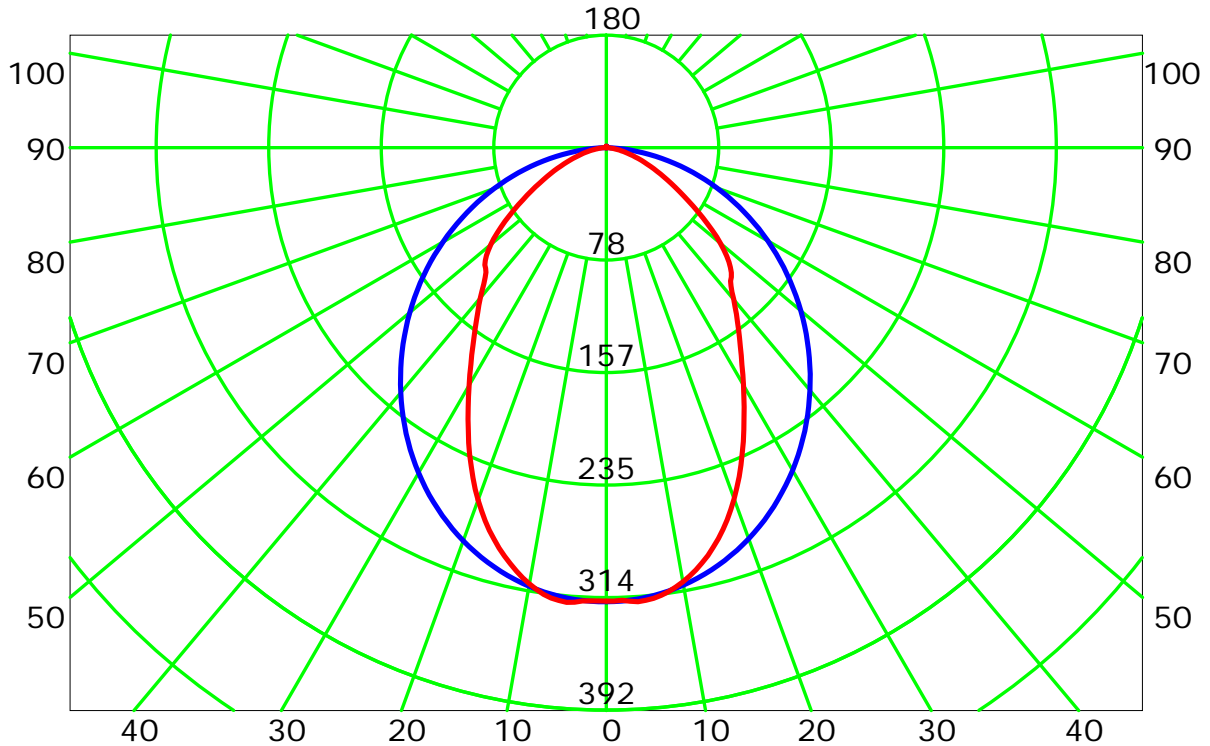


C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



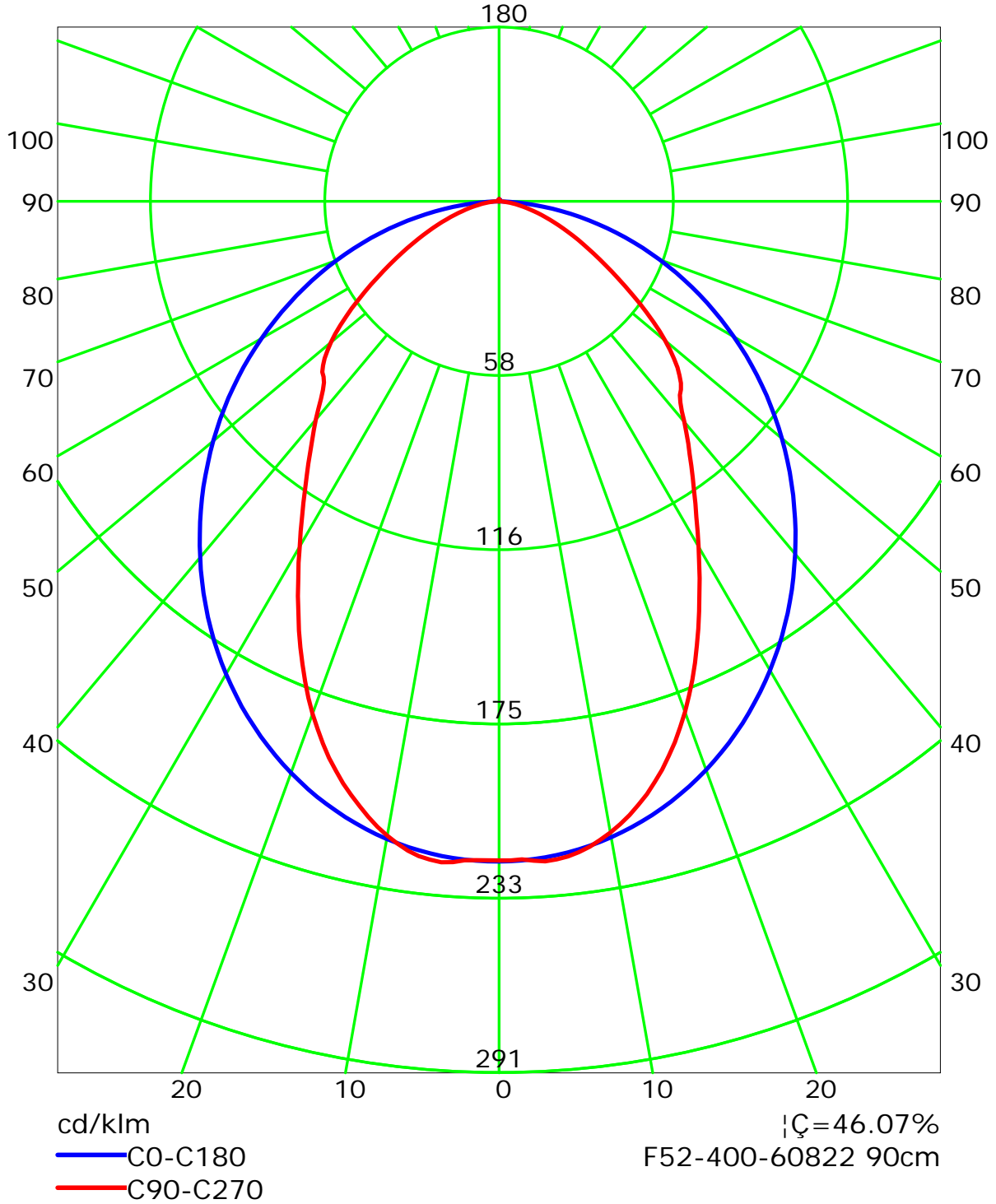
Luminous Intensity Distribution Curve



C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:

Luminous Intensity Distribution Curve(cd/klm)

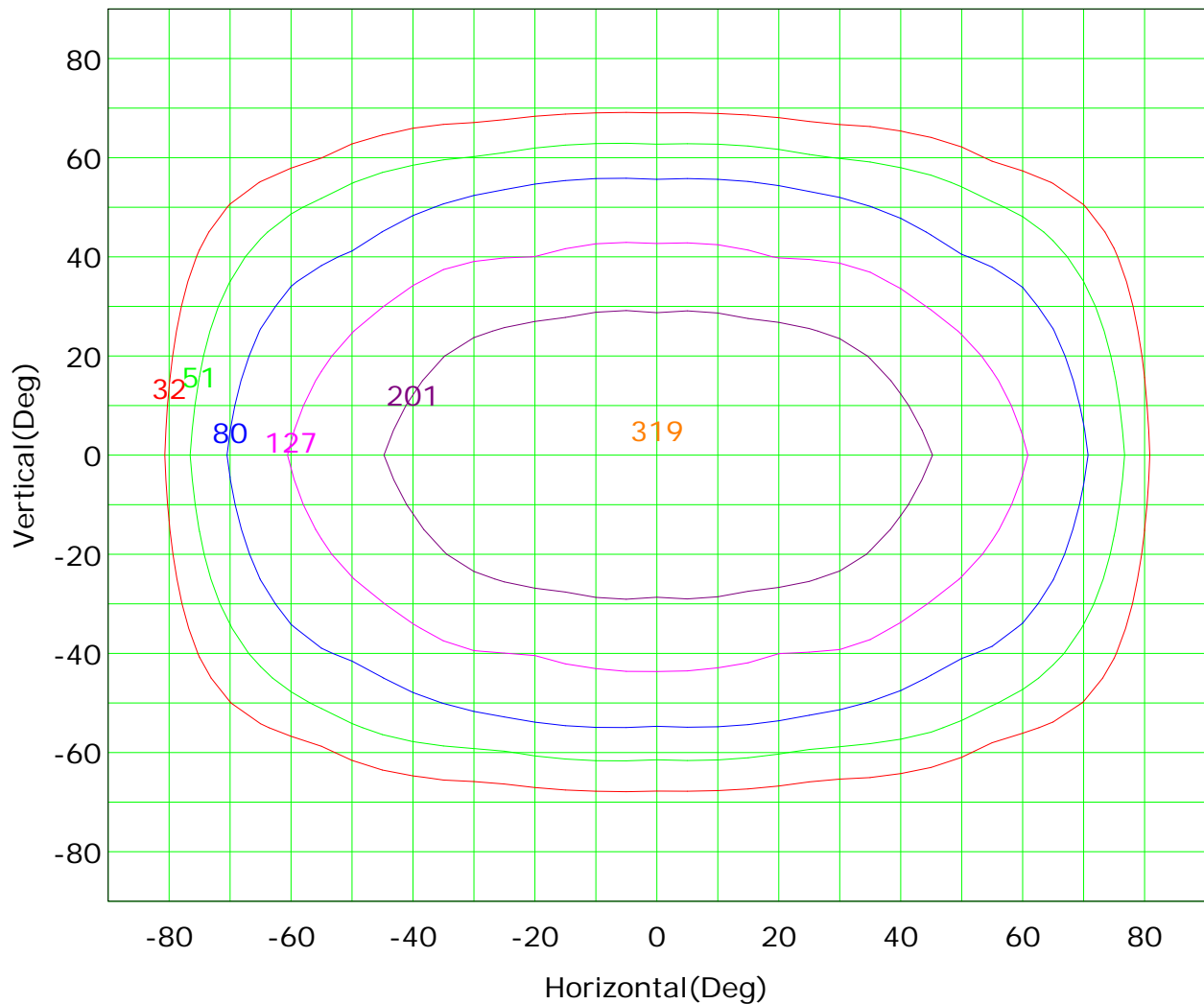


C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Isocandela (rectangle)



Imax (100%): 319 cd

— (10%):	32 cd	— (16%):	51 cd
— (25%):	80 cd	— (40%):	127 cd
— (63%):	201 cd	— (100%):	319 cd

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

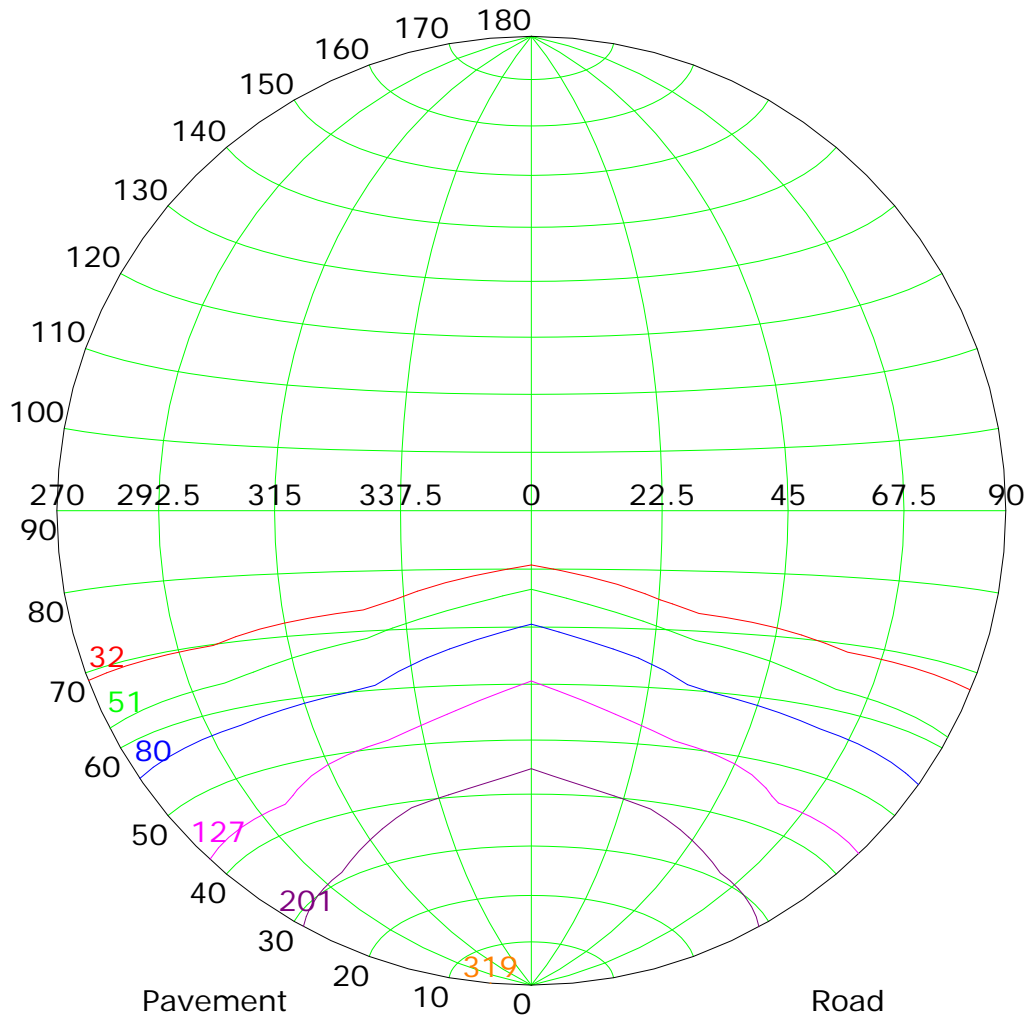
Distance: 7.979 m

Humidity:

Inspector:



Isocandela (sphere)



Imax (100%): 319 cd

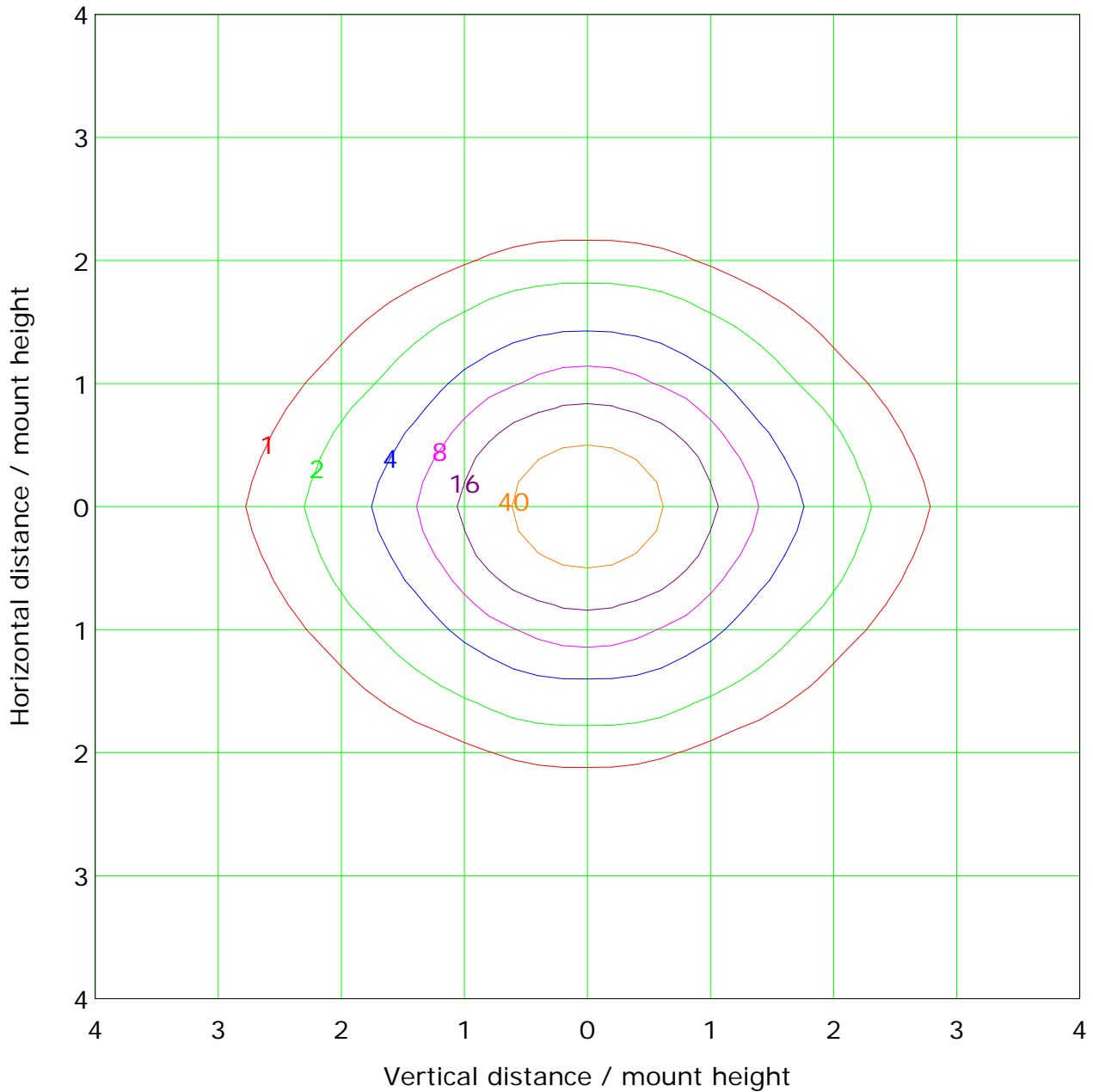
— (10%):	32 cd	— (16%):	51 cd
— (25%):	80 cd	— (40%):	127 cd
— (63%):	201 cd	— (100%):	319 cd

C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



IsoLux Plot



Mounting Height: 2.0m		Max Lux(100%): 79.3 lx
— (1%):	0.8 lx	— (2%): 1.6 lx
— (5%):	4.0 lx	— (10%): 7.9 lx
— (20%):	15.9 lx	— (50%): 39.6 lx
— (100%):	79.3 lx	

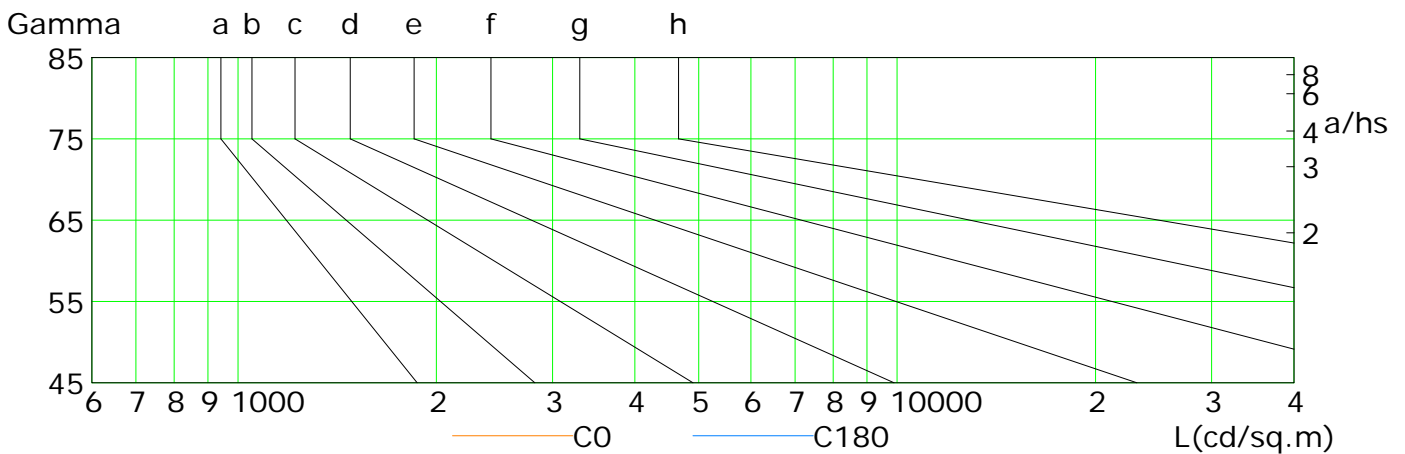
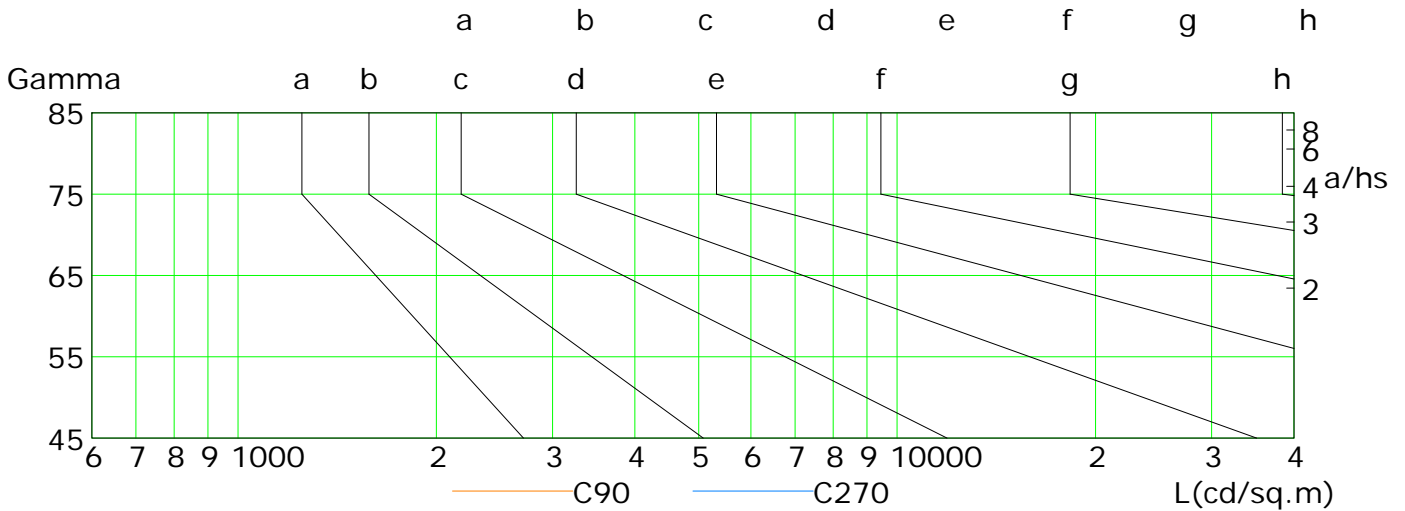
C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Lum Limit Curve

Dazzle	Quality	Illuminance (lx)							
		a	b	c	d	e	f	g	h
1.15	A	2000	1000	500	<=300				
1.50	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.20	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300



L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	200	177	154	130	106	82	58	35	13
C90	123	104	78	56	39	26	16	8	2
C180	202	179	156	132	107	83	59	36	14
C270	119	105	82	60	43	29	18	10	4

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

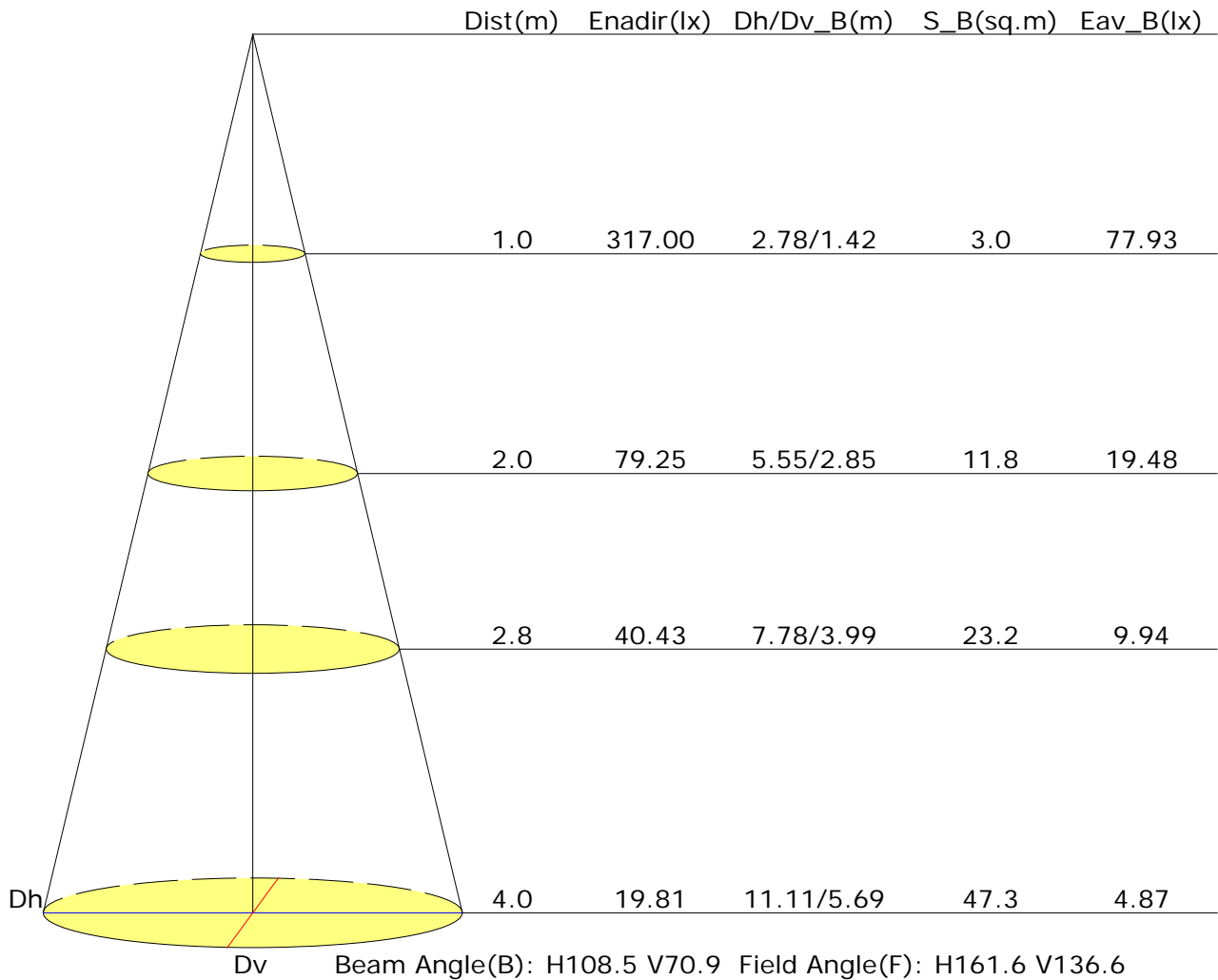
Distance: 7.979 m

Humidity:

Inspector:

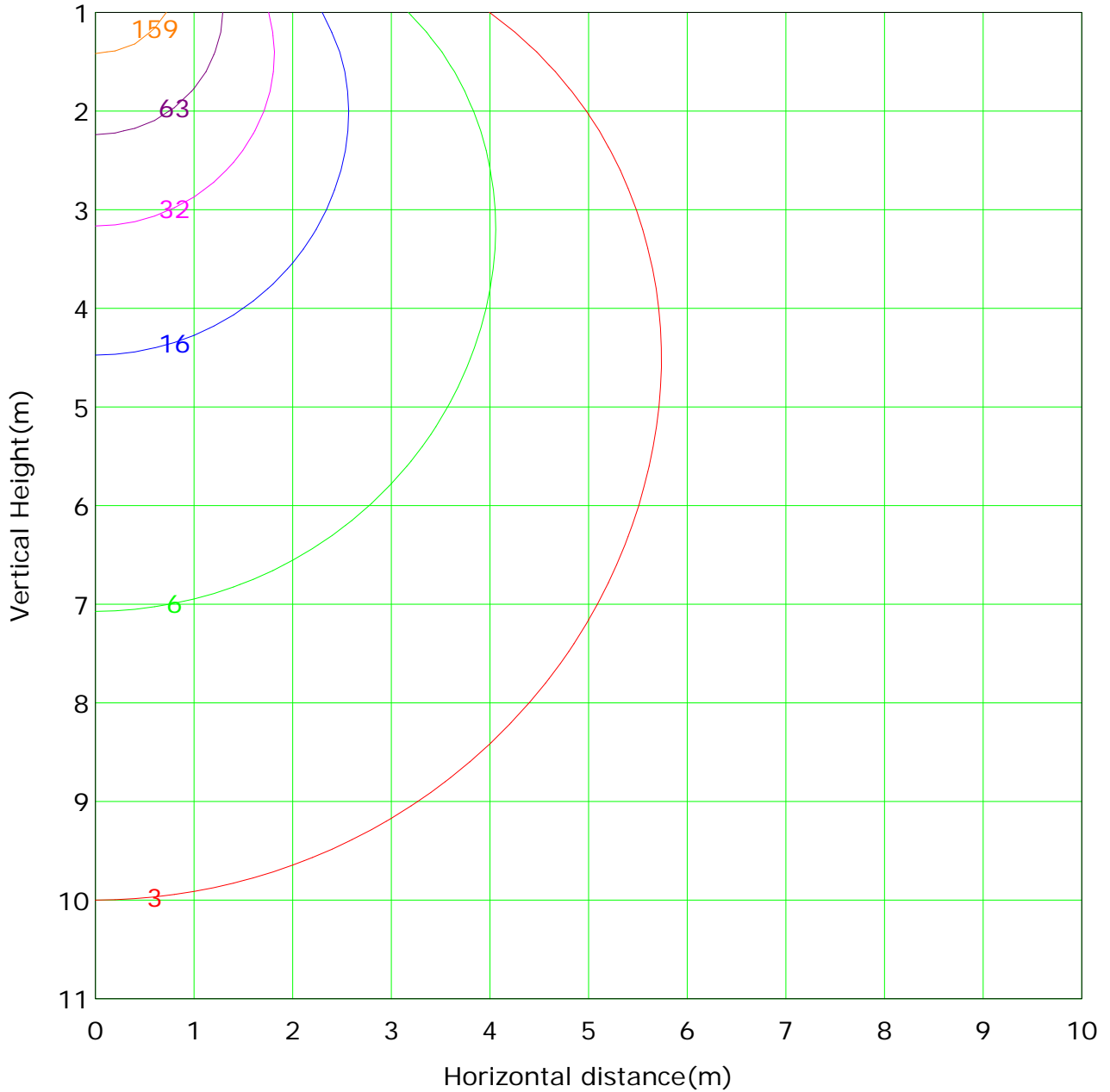


Illuminance at a Distance





Vertical IsoLux Plot



Lowest(m): 1.0m Highest(m): 11.0m Max Lux: 317.0 lx

— (1%): 3.2 lx	— (2%): 6.3 lx
— (5%): 15.9 lx	— (10%): 31.7 lx
— (20%): 63.4 lx	— (50%): 158.5 lx
— (100%): 317.0 lx	

C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Report No.:

Test Time: 22/01/2021 14:39

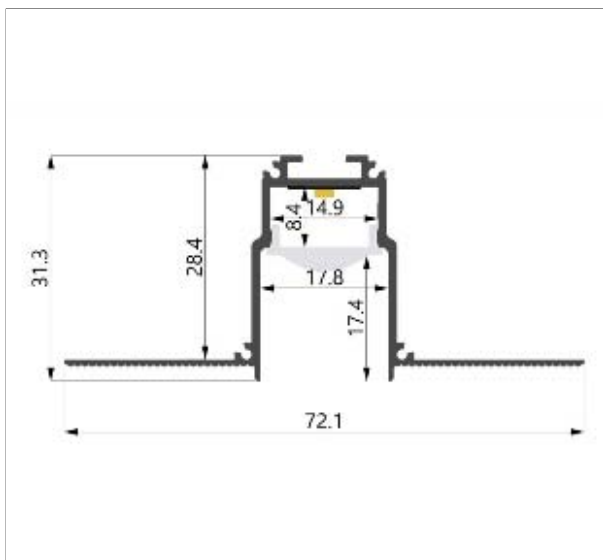
Luminaire Property

Luminaire Manufacturer: Lighting Line
 Luminaire Description: LLP-DW11-03 + LLD-03-XK-L1
 Lamp Description: F52-400-60822 90cm Number of Lamps: 1
 Lumens per Lamp: 1434 lm Voltage: 24.0 V
 Current: 0.532 A Power: 12.77 W
 Power Factor: 1.000

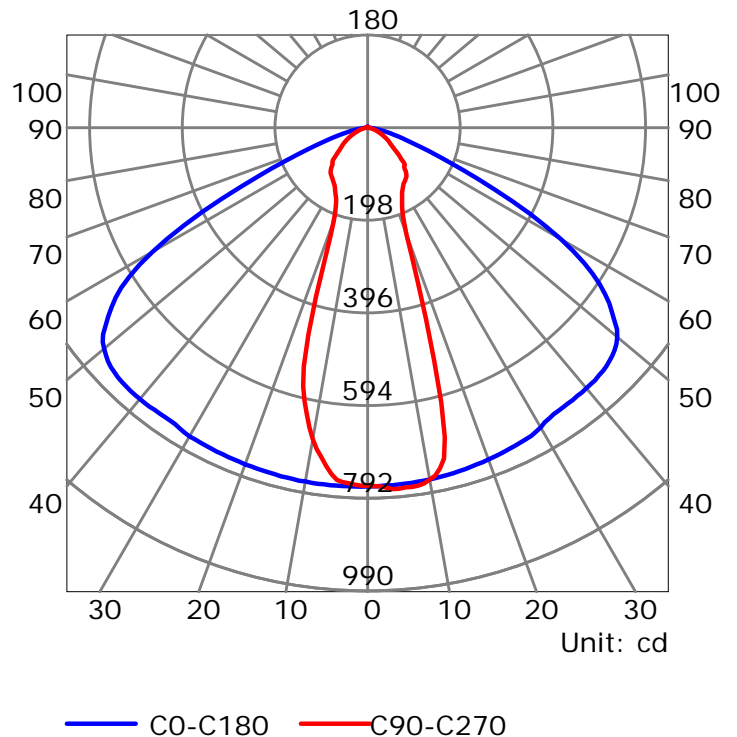
Photometric Results

CIE Class: Direct	Total Rated Lamp Lumens: 1434.0 lm
Measurement Flux: 1037.2 lm	Efficiency: 72.33%
Downward Ratio: 72.22%	Upward Ratio: 0.11%
Field Angle(C0/C180,C90/C270,C45/C225,C135/315): 147.1, 102.1, 106.9, 106.8	
Beam Angle(C0/C180,C90/C270,C45/C225,C135/315): 125.5, 34.4, 50.1, 50.1	
Luminaire Efficacy Rating (LER): 81.27	Central Intensity: 766.58 cd
Max. Intensity: 776.49 cd	Pos of Max. Intensity: H120 V5
S/MH(C0/C180): 1.49	S/MH(C90/C270): 0.60

Picture Of Luminaire



Luminous Intensity Distribution Curve

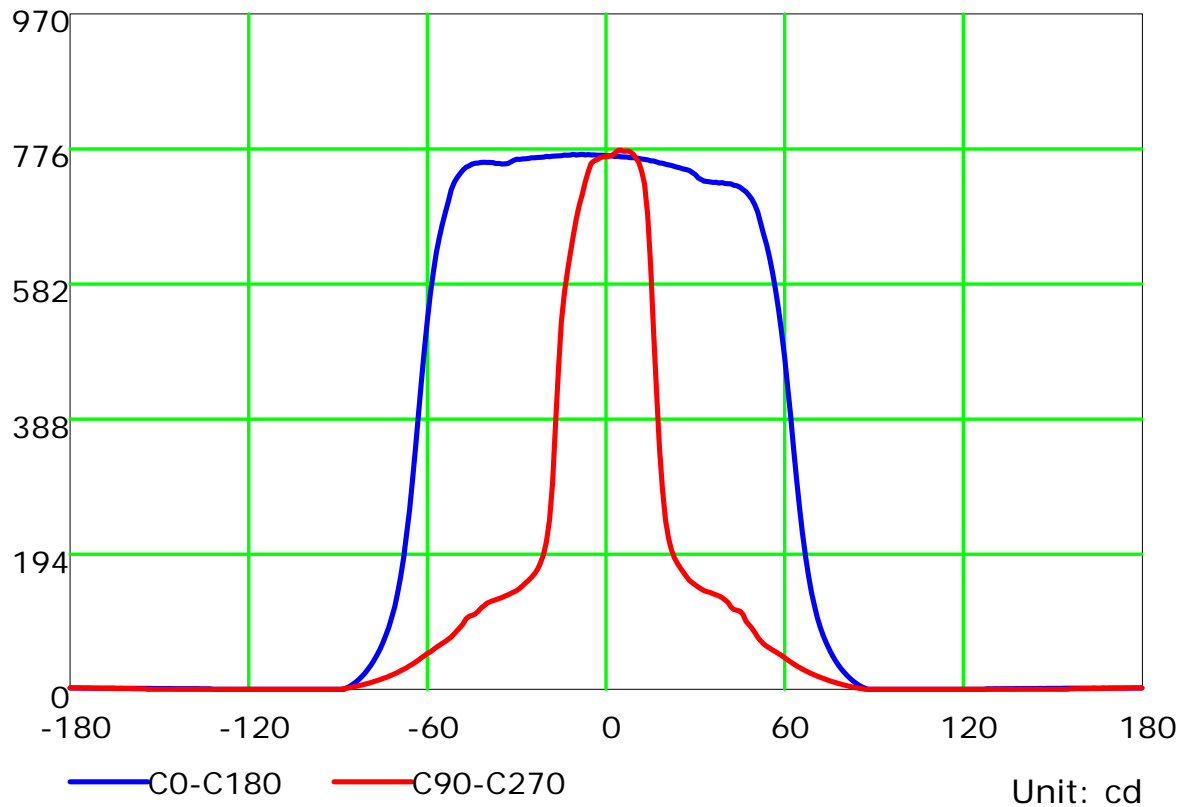
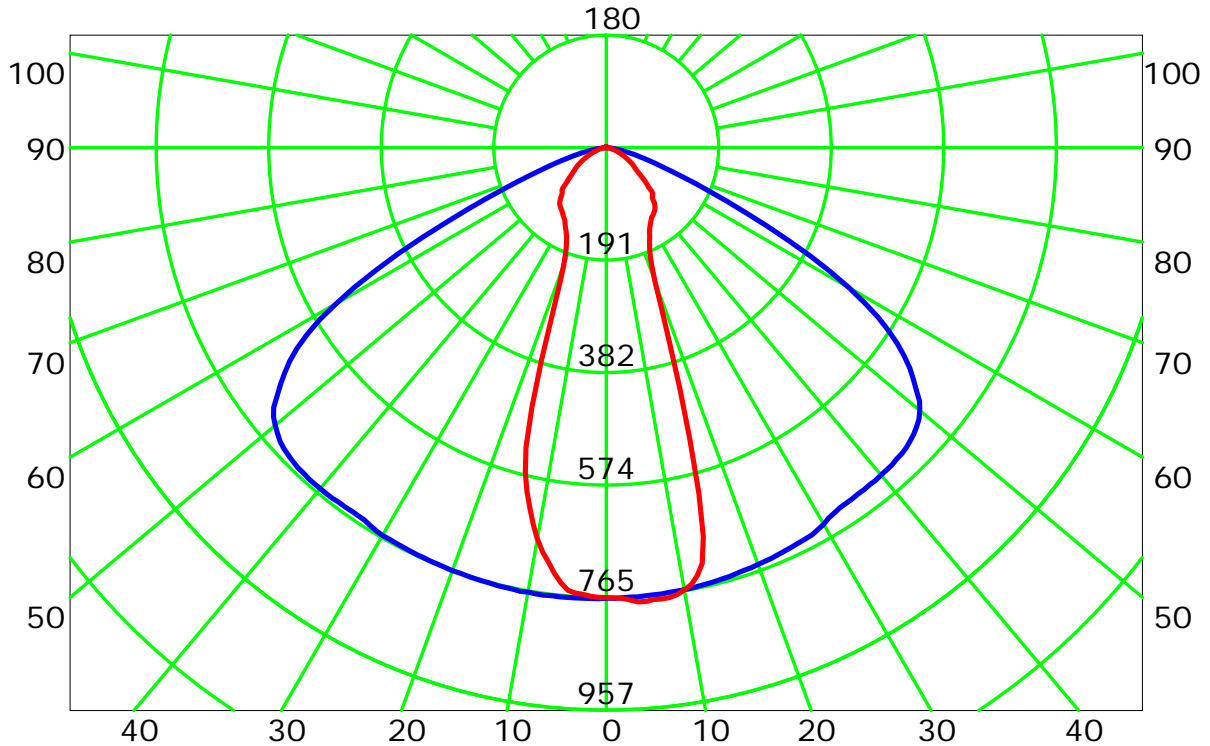


C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Luminous Intensity Distribution Curve

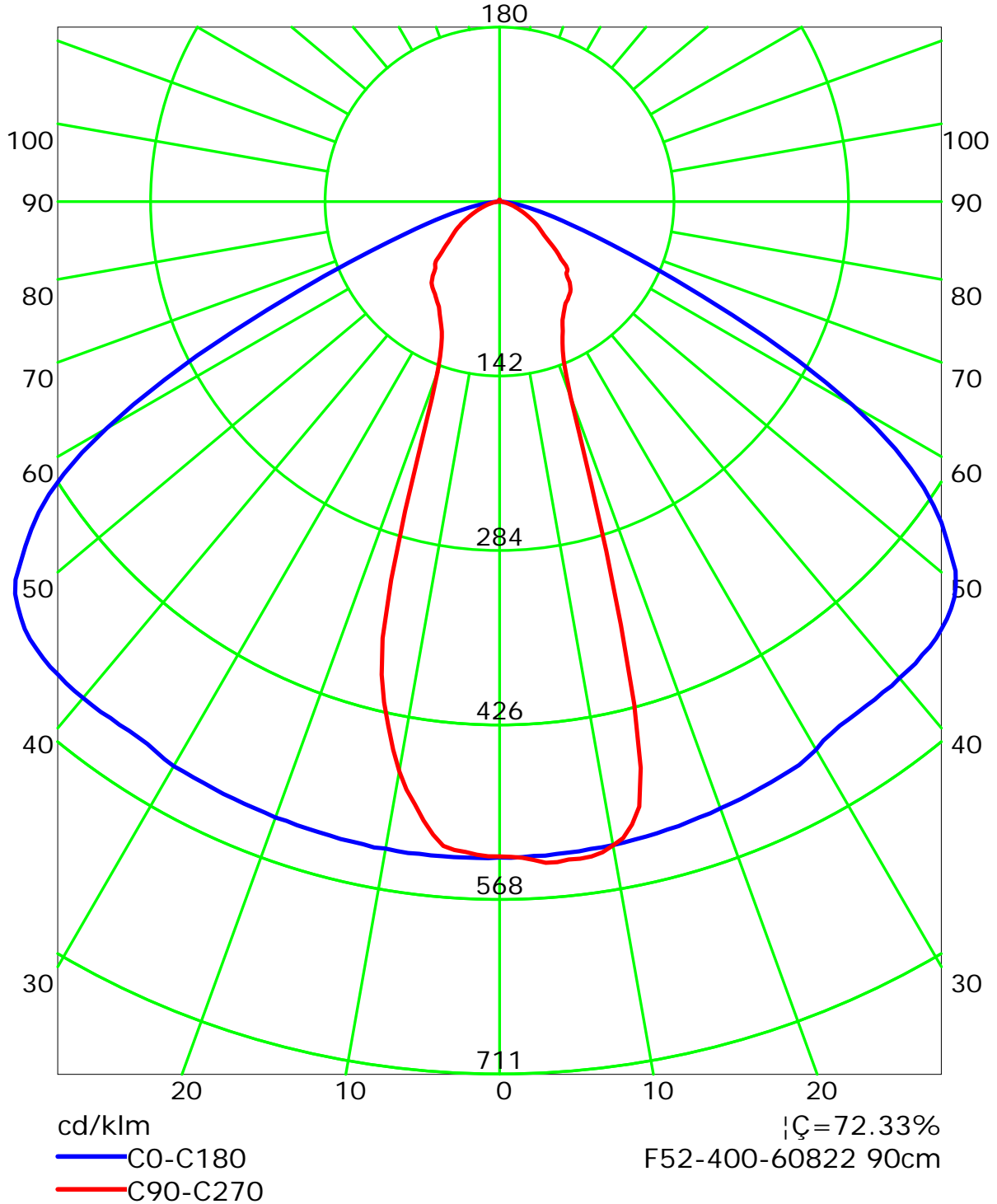


C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:



Luminous Intensity Distribution Curve(cd/klm)

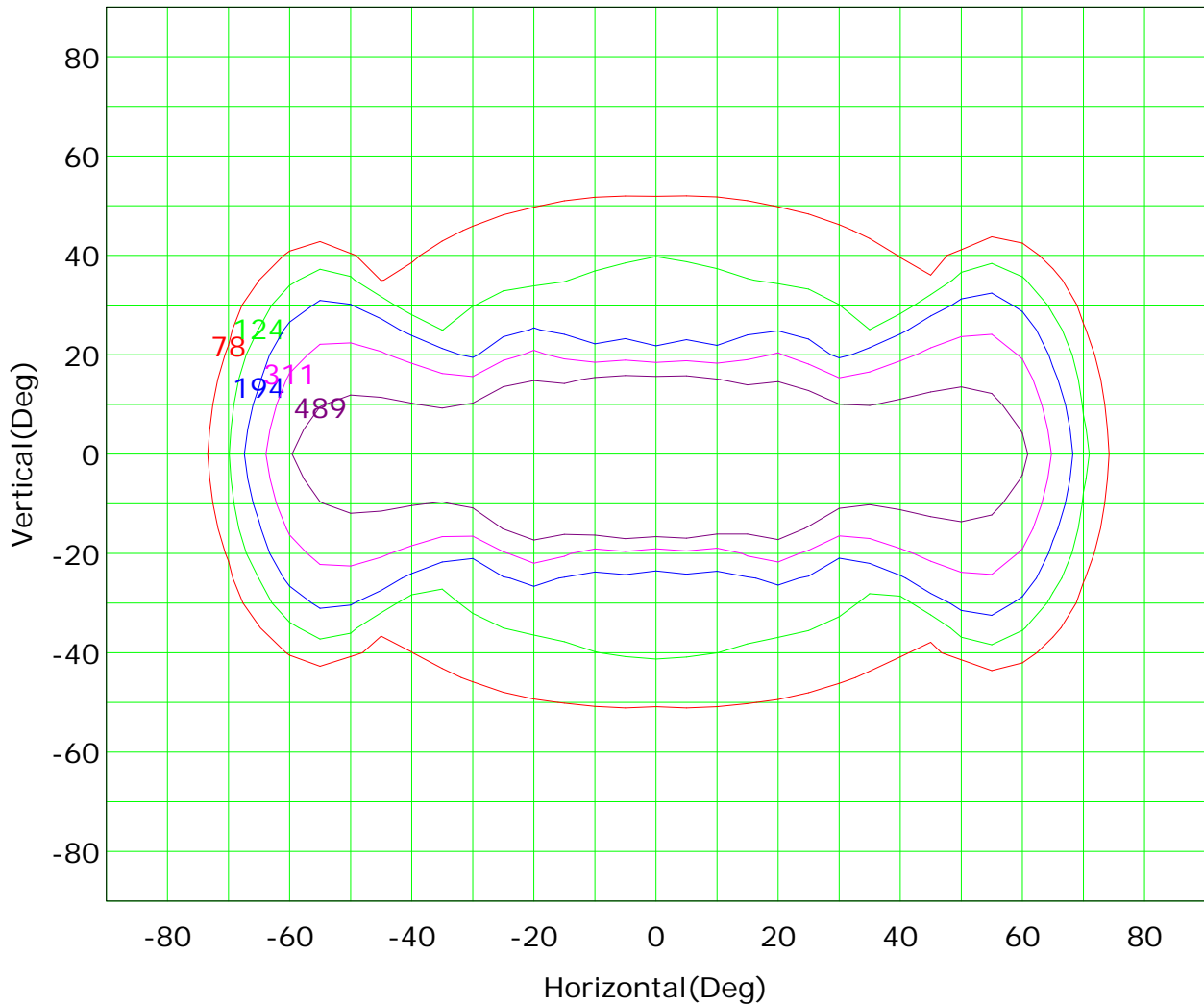


C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:



Isocandela (rectangle)



Imax (100%): 776 cd

— (10%):	78 cd	— (16%):	124 cd
— (25%):	194 cd	— (40%):	311 cd
— (63%):	489 cd	— (100%):	776 cd

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

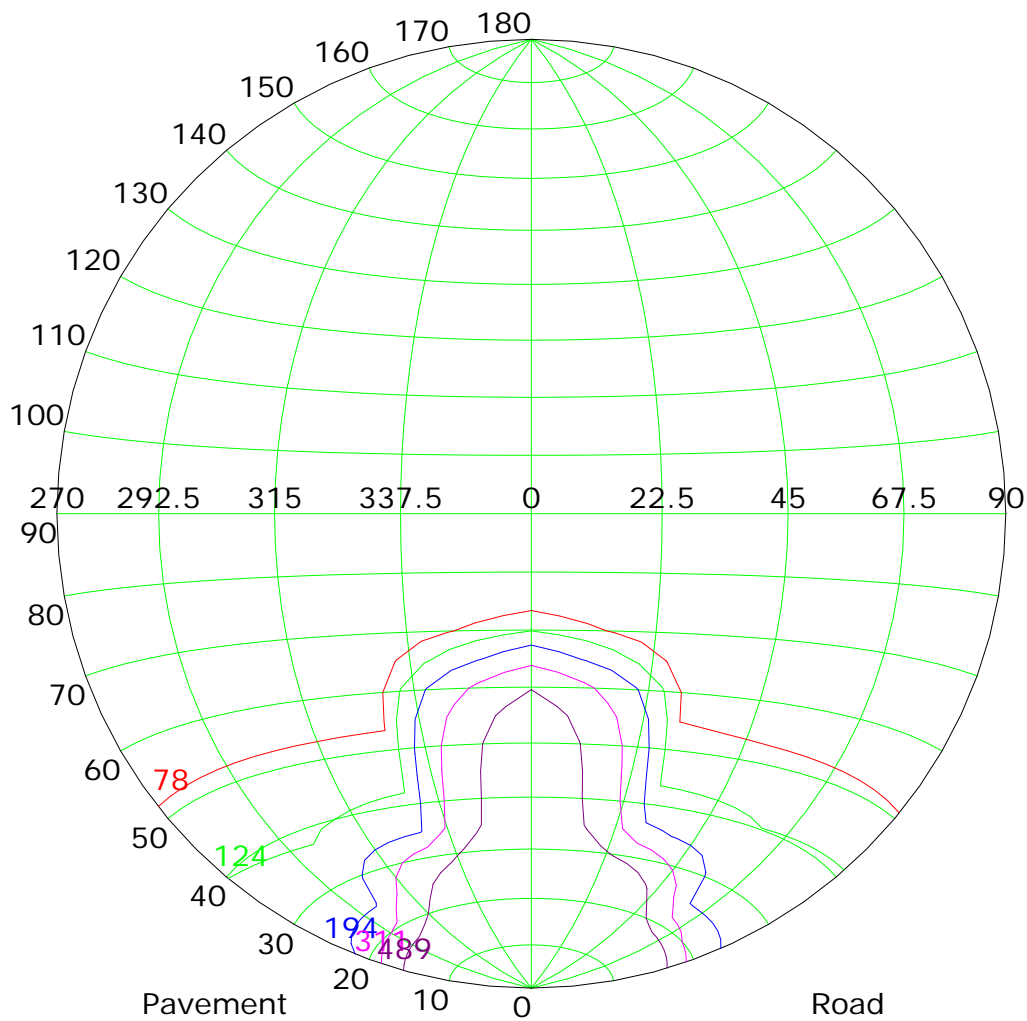
Distance: 7.979 m

Humidity:

Inspector:



Isocandela (sphere)



Imax (100%): 776 cd

- | | | | |
|-----------|--------|-----------|--------|
| — (10%): | 78 cd | — (16%): | 124 cd |
| — (25%): | 194 cd | — (40%): | 311 cd |
| — (63%): | 489 cd | — (100%): | 776 cd |

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

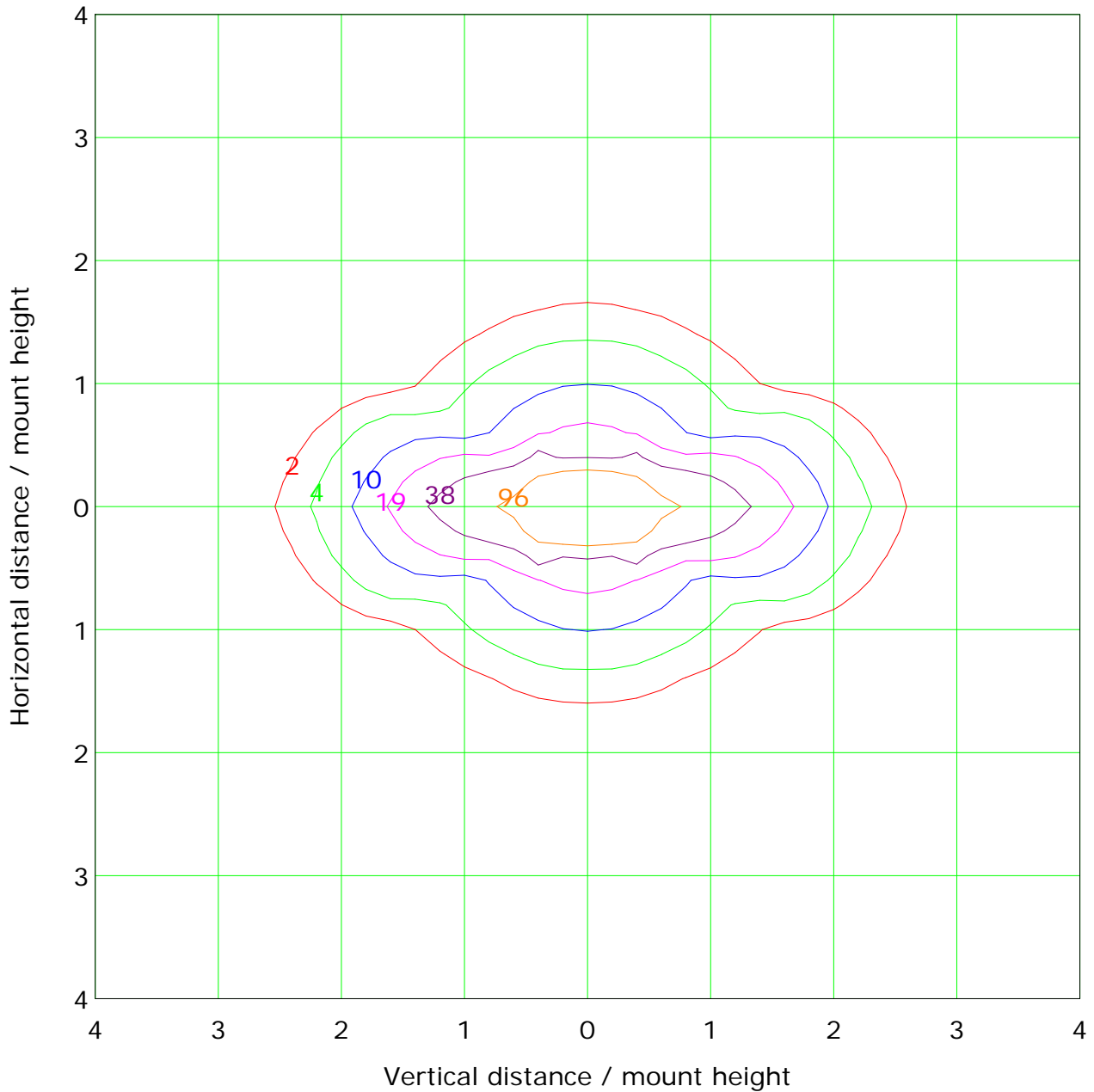
Distance: 7.979 m

Humidity:

Inspector:



IsoLux Plot



Mounting Height: 2.0m		Max Lux(100%): 192.2 lx
— (1%):	1.9 lx	— (2%): 3.8 lx
— (5%):	9.6 lx	— (10%): 19.2 lx
— (20%):	38.4 lx	— (50%): 96.1 lx
— (100%):	192.2 lx	

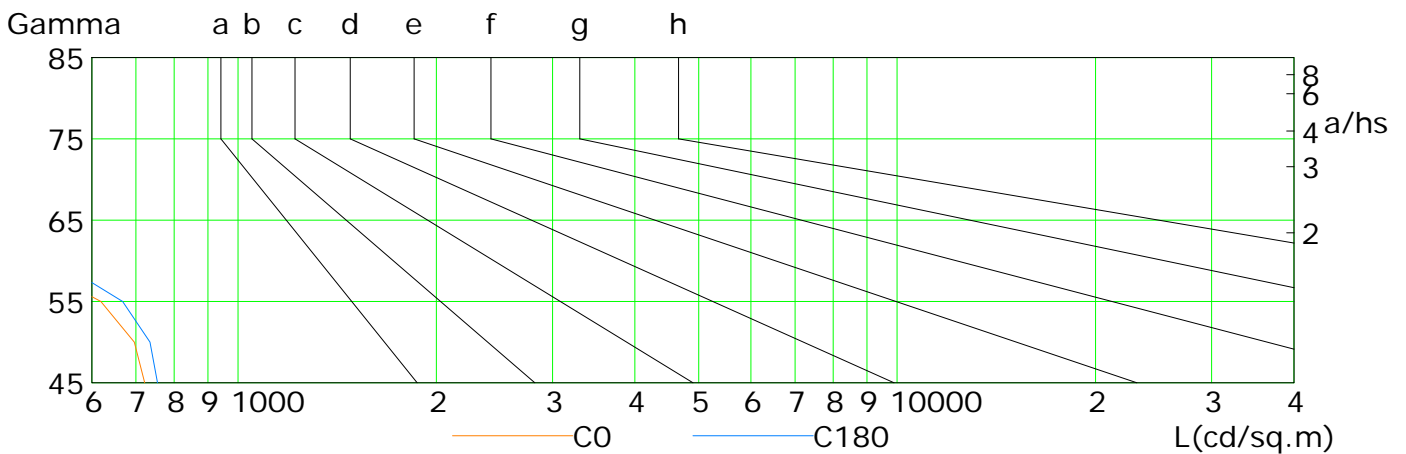
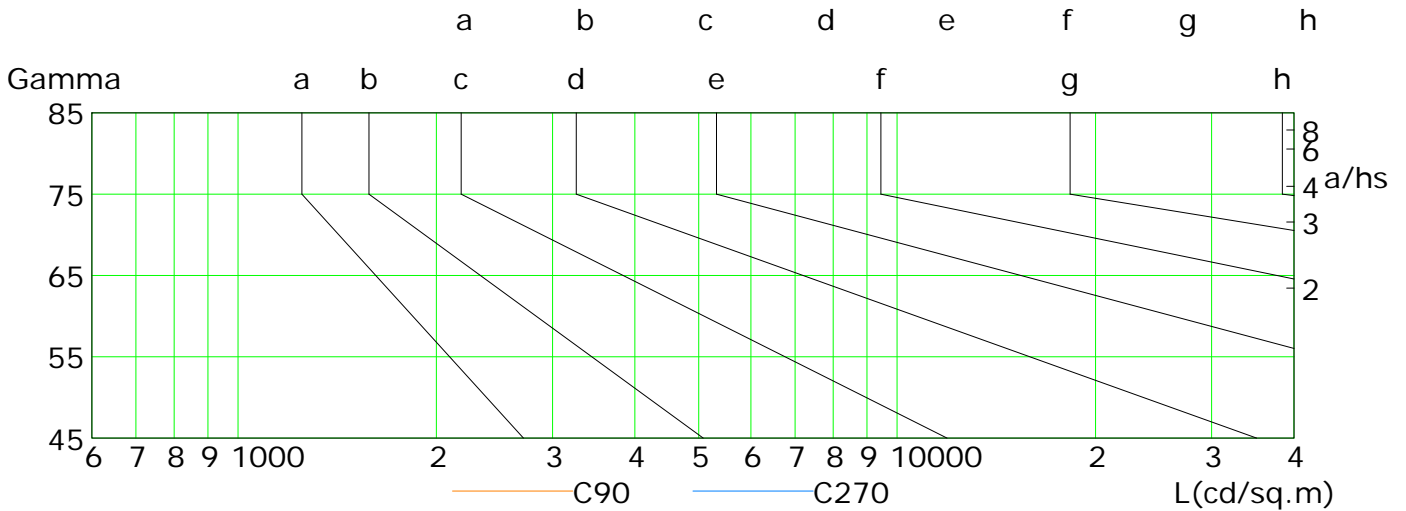
C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Lum Limit Curve

Dazzle	Quality	Illuminance (lx)							
		a	b	c	d	e	f	g	h
1.15	A	2000	1000	500	<=300				
1.50	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.20	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300



L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	722	696	619	477	261	120	57	25	6
C90	112	82	59	46	31	21	13	6	2
C180	755	735	668	530	300	138	66	29	7
C270	106	85	66	52	36	24	16	9	3

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

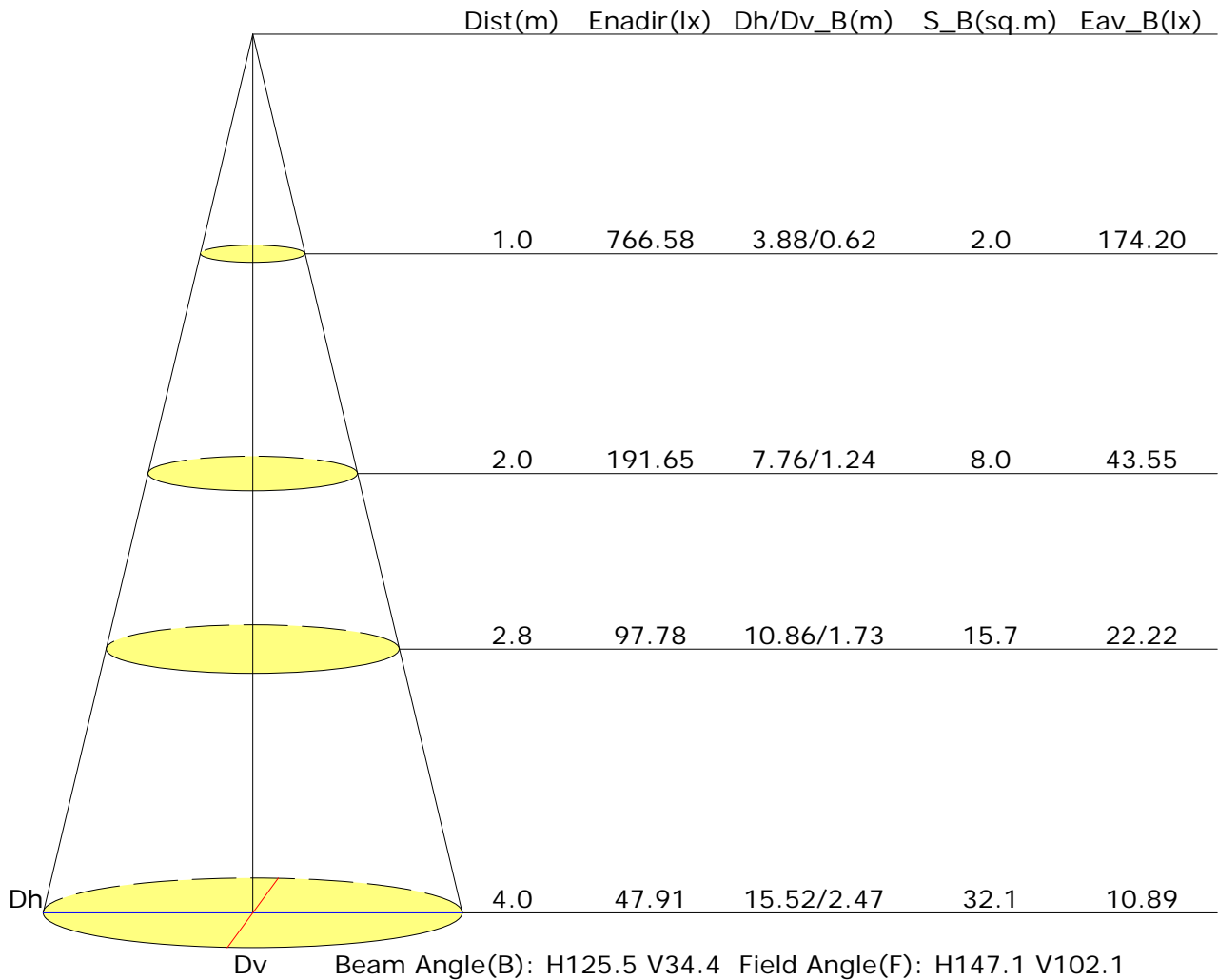
Distance: 7.979 m

Humidity:

Inspector:

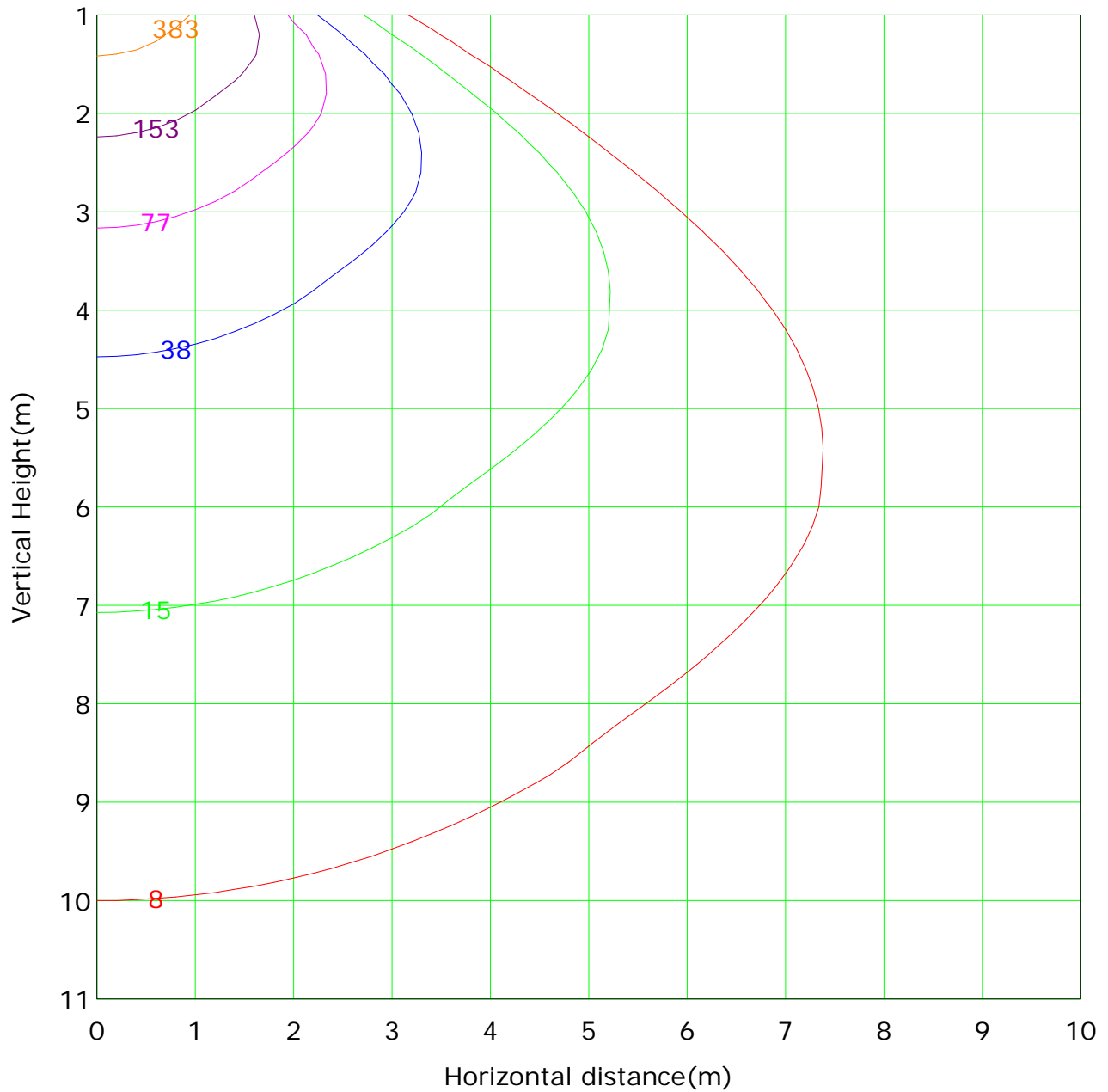


Illuminance at a Distance





Vertical IsoLux Plot



Lowest(m): 1.0m Highest(m): 11.0m Max Lux: 766.6 lx
— (1%): 7.7 lx — (2%): 15.3 lx
— (5%): 38.3 lx — (10%): 76.7 lx
— (20%): 153.3 lx — (50%): 383.3 lx
— (100%): 766.6 lx

C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:



Report No.:

Test Time: 22/01/2021 12:46

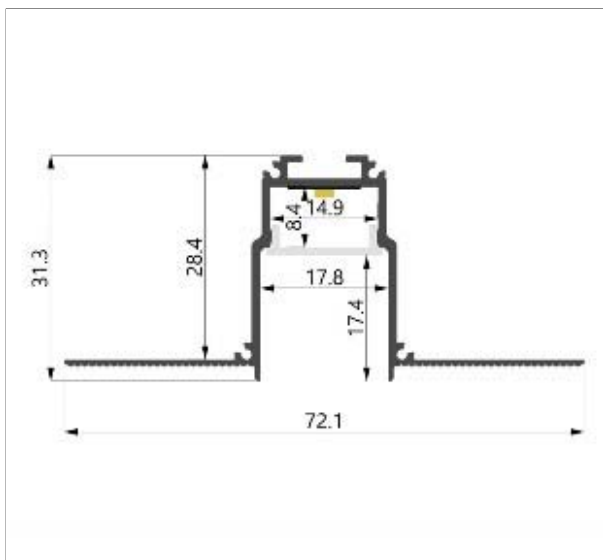
Luminaire Property

Luminaire Manufacturer: Lighting Line
 Luminaire Description: LLP-DW11-03 + LLD-03-FB
 Lamp Description: F52-400-60822 90cm Number of Lamps: 1
 Lumens per Lamp: 1434 lm Voltage: 24.0 V
 Current: 0.533 A Power: 12.79 W
 Power Factor: 1.000

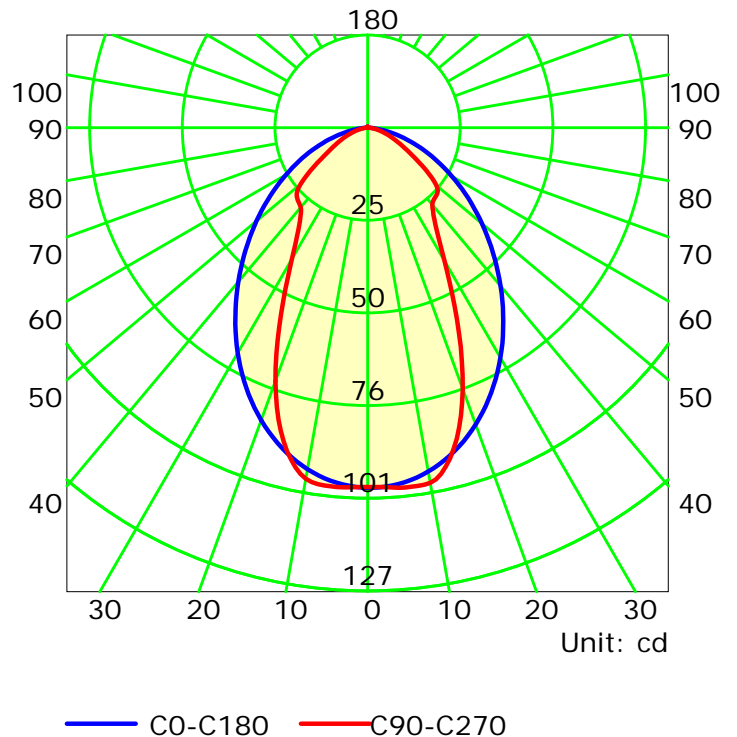
Photometric Results

CIE Class: Direct	Total Rated Lamp Lumens: 1434.0 lm
Measurement Flux: 160.2 lm	Efficiency: 11.17%
Downward Ratio: 11.15%	Upward Ratio: 0.01%
Field Angle(C0/C180,C90/C270,C45/C225,C135/315): 148.6, 125.6, 132.1, 132.2	
Beam Angle(C0/C180,C90/C270,C45/C225,C135/315): 88.2, 54.5, 68.5, 68.4	
Luminaire Efficacy Rating (LER): 12.57	Central Intensity: 99.08 cd
Max. Intensity: 99.56 cd	Pos of Max. Intensity: H90 V6
S/MH(C0/C180): 1.11	S/MH(C90/C270): 0.86

Picture Of Luminaire



Luminous Intensity Distribution Curve



C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

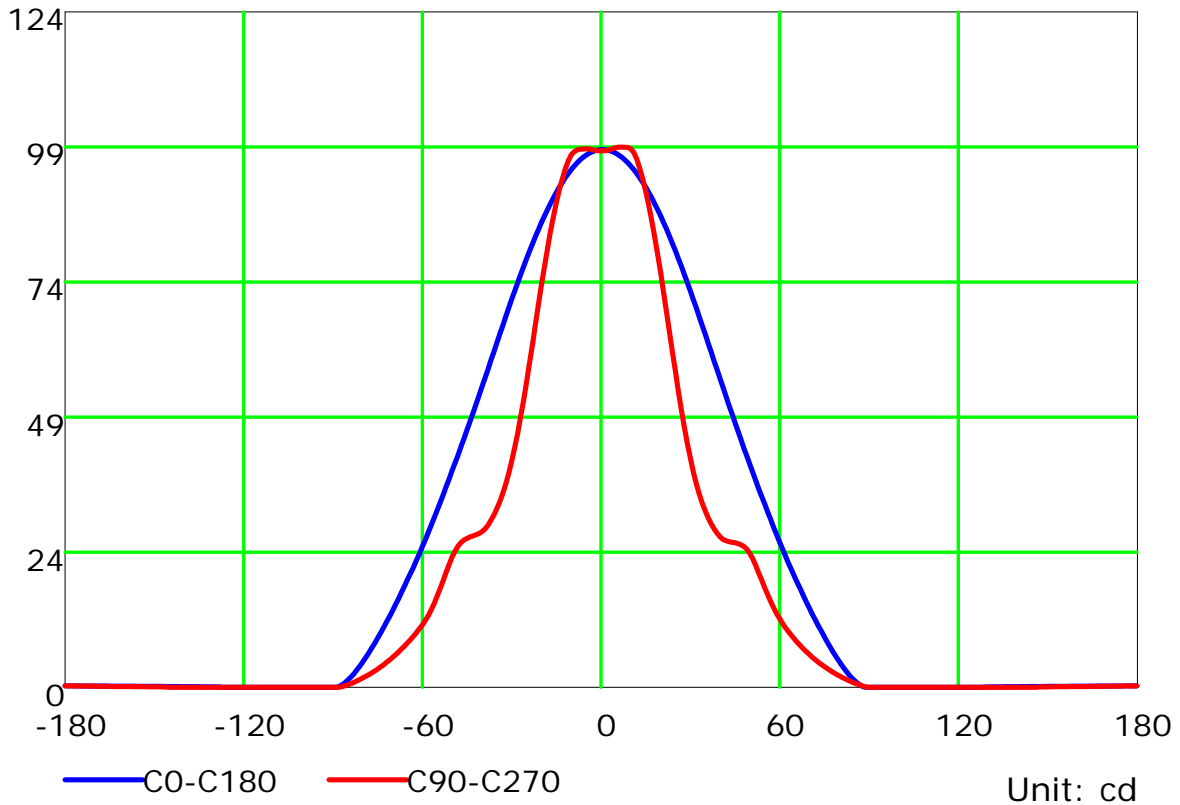
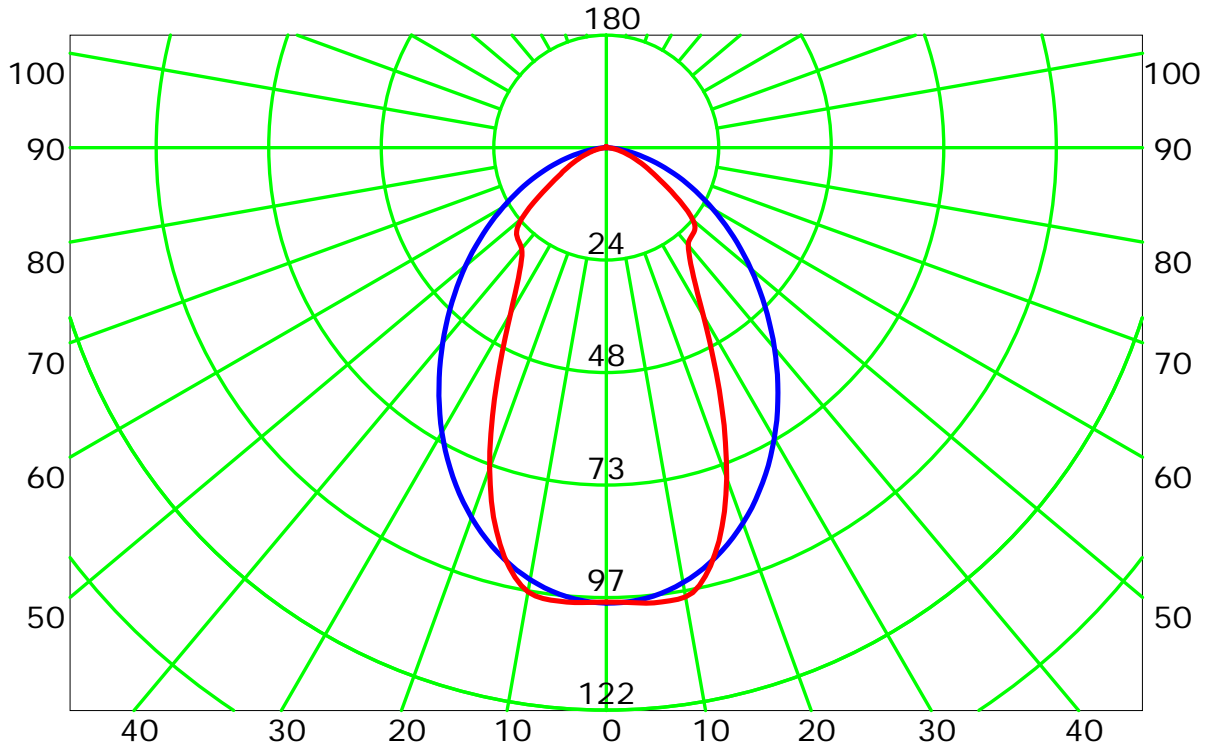
Distance: 7.979 m

Humidity:

Inspector:



Luminous Intensity Distribution Curve

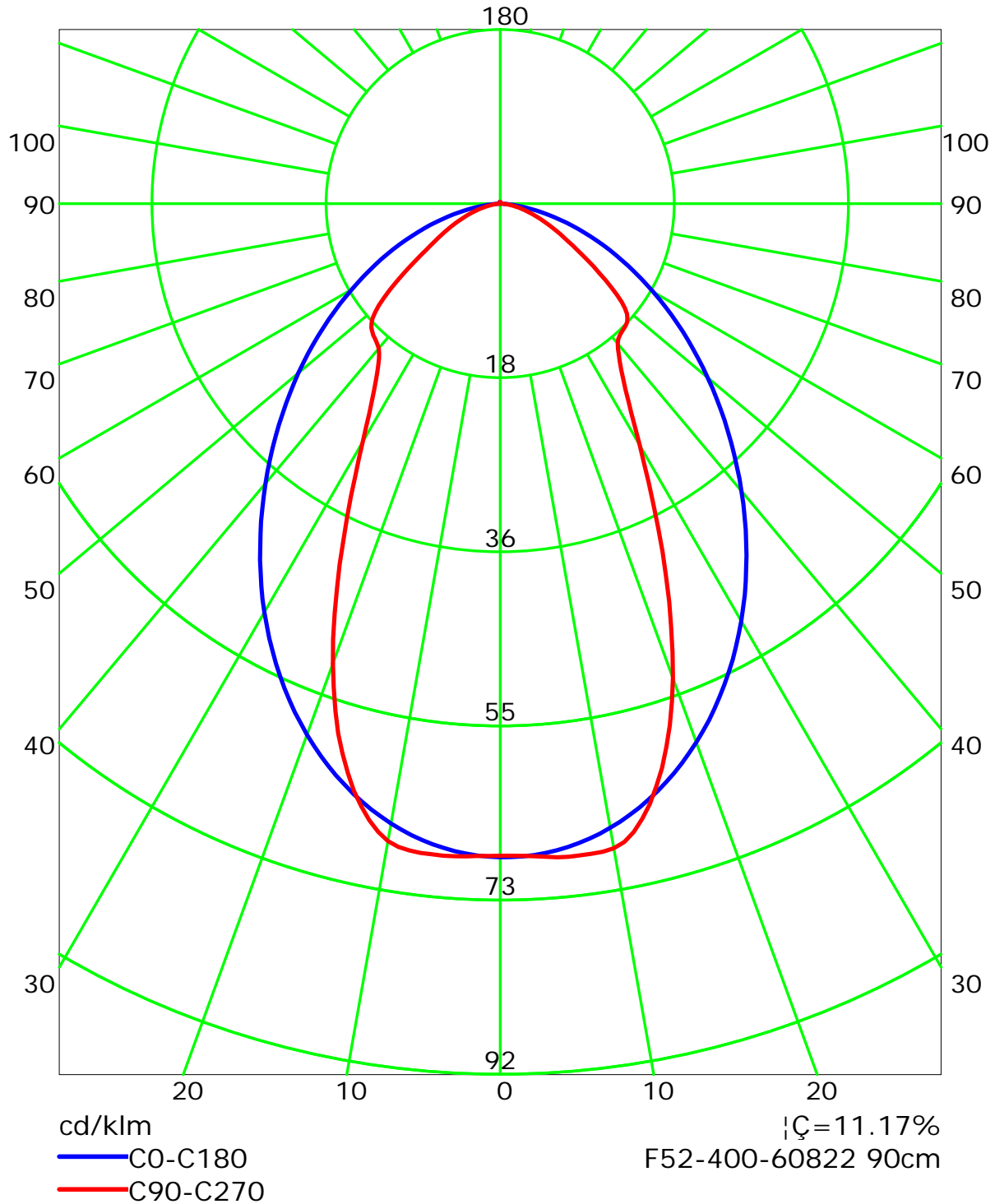


C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:



Luminous Intensity Distribution Curve(cd/klm)

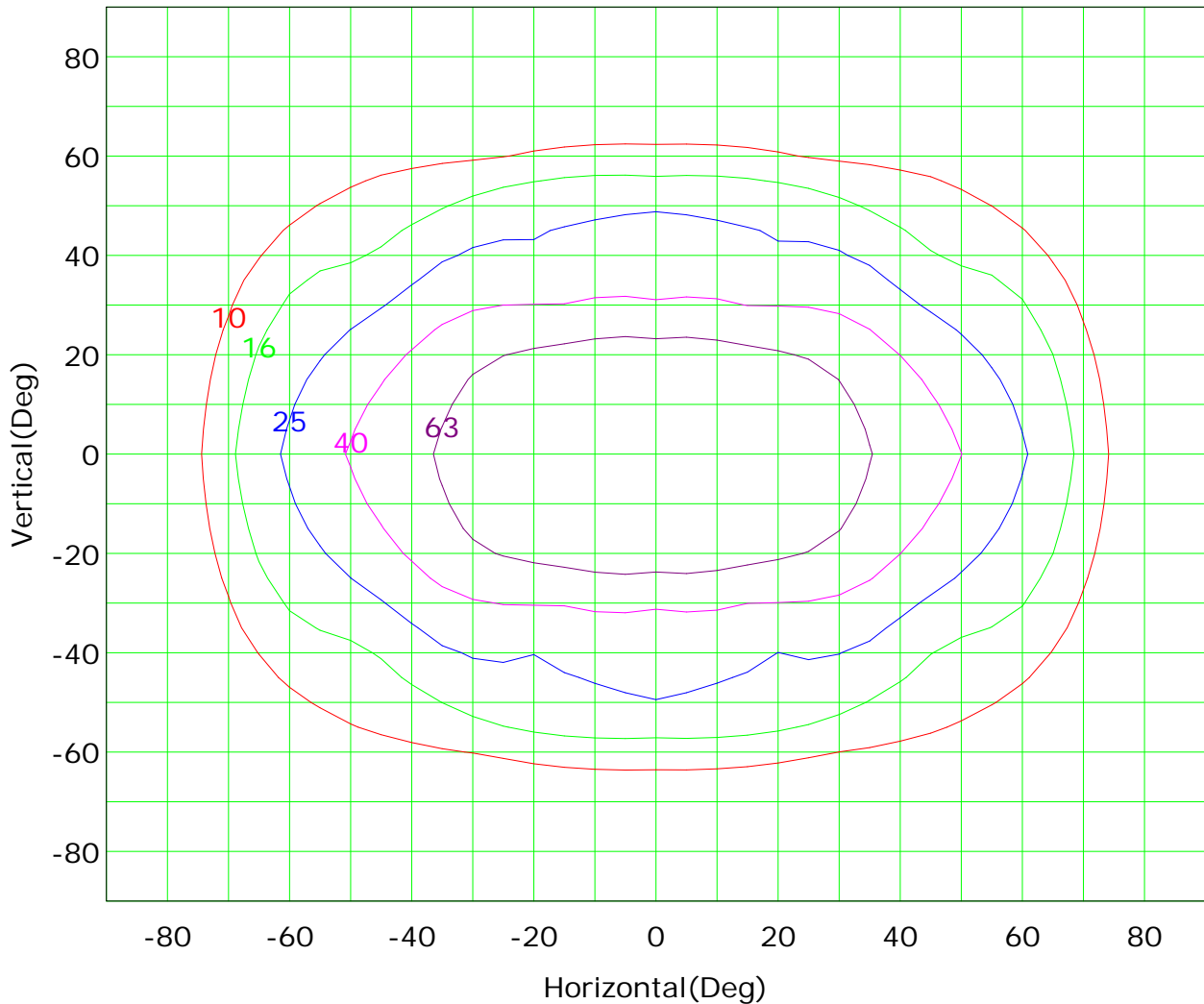


C Plane (°):0.0-360.0: 30.0
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: GPM-1800B
Distance: 7.979 m
Humidity:
Inspector:



Isocandela (rectangle)



Imax (100%): 100 cd

- | | | | |
|-----------|-------|-----------|--------|
| — (10%): | 10 cd | — (16%): | 16 cd |
| — (25%): | 25 cd | — (40%): | 40 cd |
| — (63%): | 63 cd | — (100%): | 100 cd |

C Plane (°):0.0-360.0: 30.0

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

Test Device: GPM-1800B

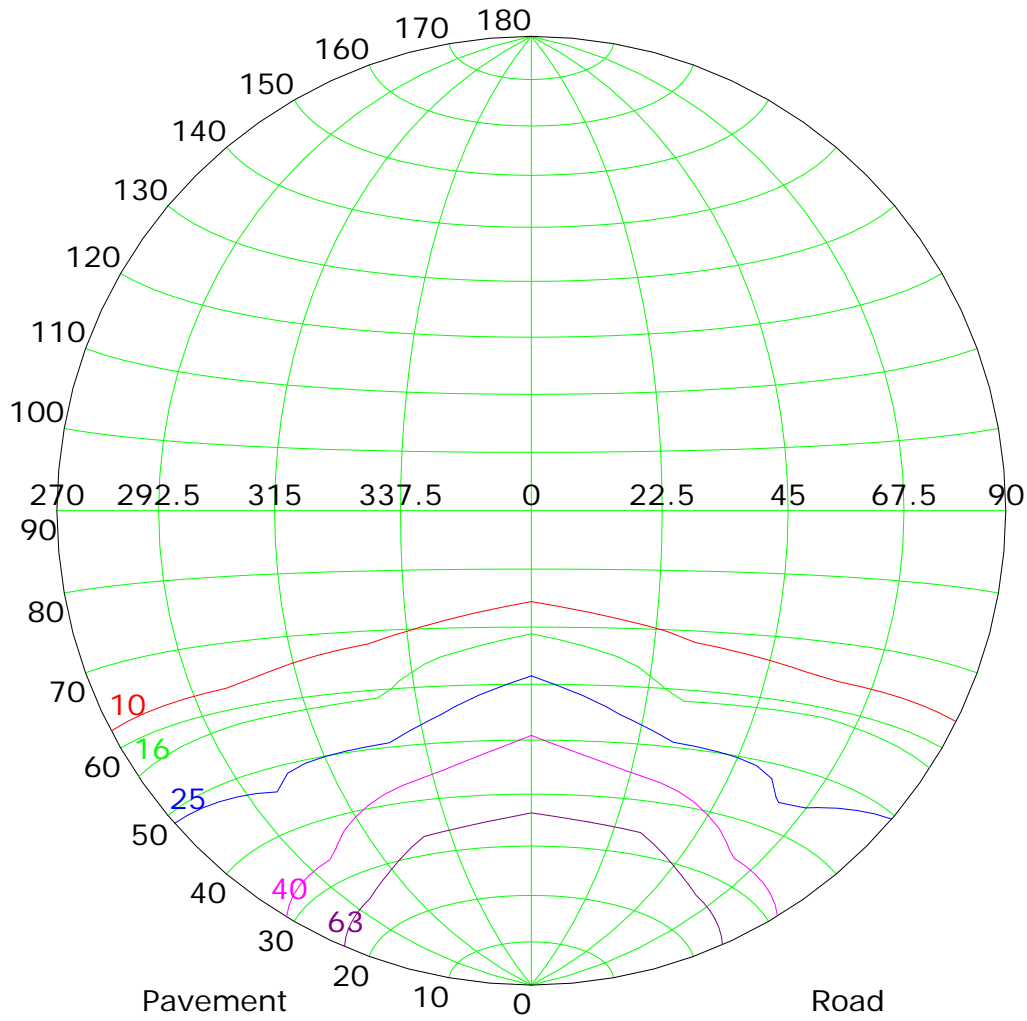
Distance: 7.979 m

Humidity:

Inspector:



Isocandela (sphere)



Imax (100%): 100 cd

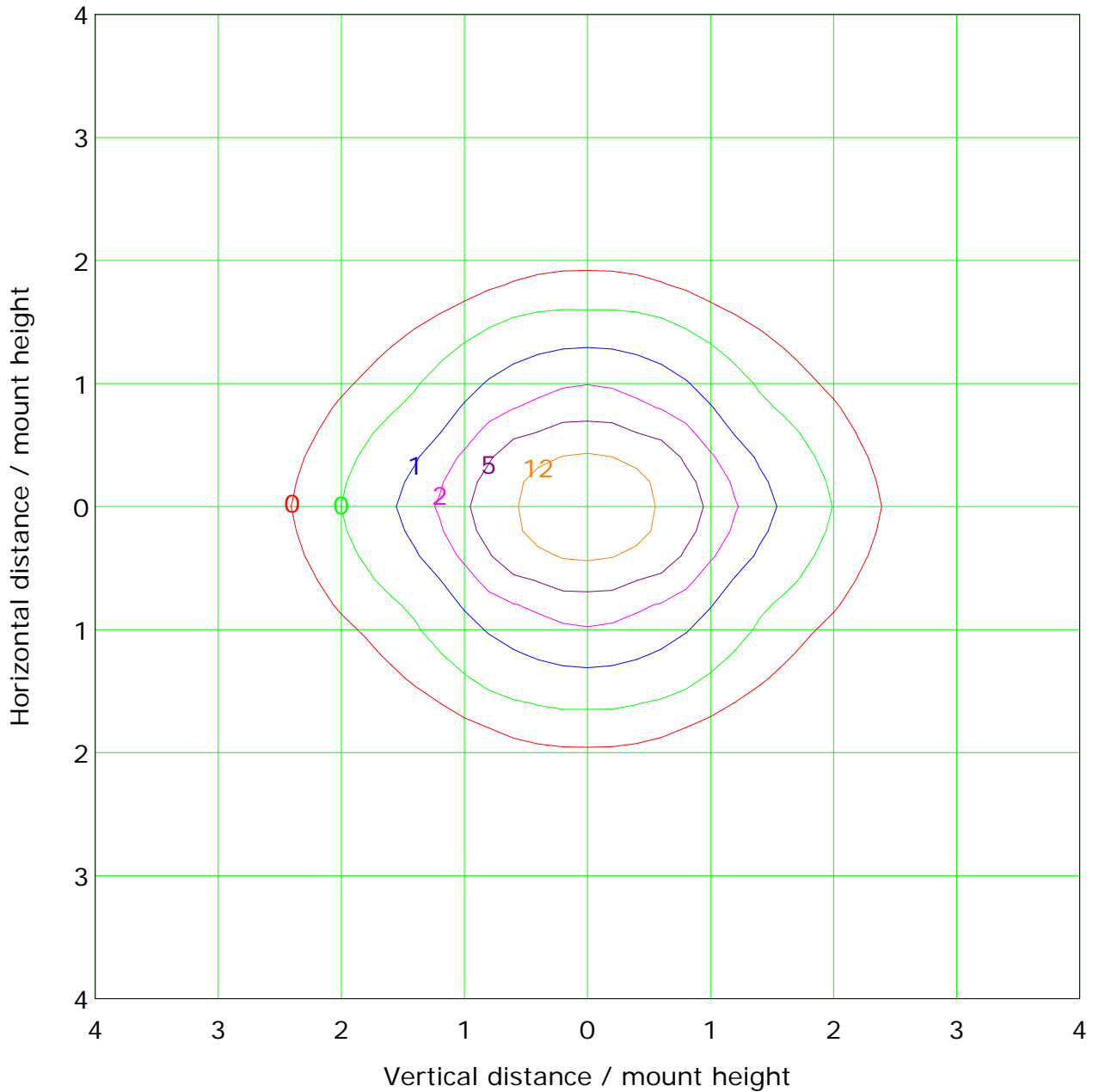
— (10%):	10 cd	— (16%):	16 cd
— (25%):	25 cd	— (40%):	40 cd
— (63%):	63 cd	— (100%):	100 cd

C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



IsoLux Plot



Mounting Height: 2.0m		Max Lux(100%): 24.8 lx
— (1%):	0.2 lx	— (2%): 0.5 lx
— (5%):	1.2 lx	— (10%): 2.5 lx
— (20%):	5.0 lx	— (50%): 12.4 lx
— (100%):	24.8 lx	

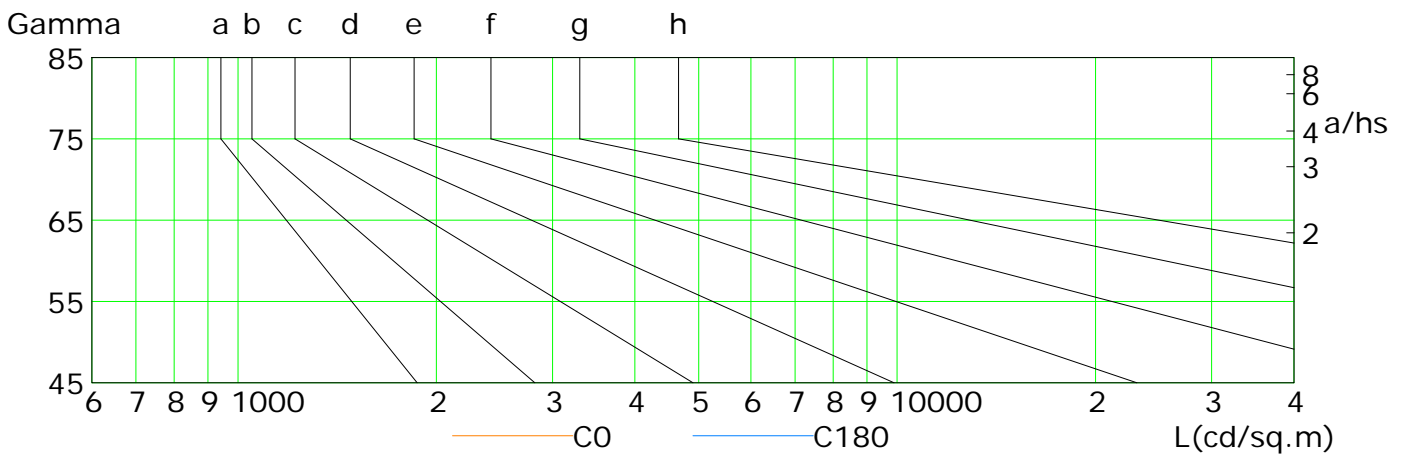
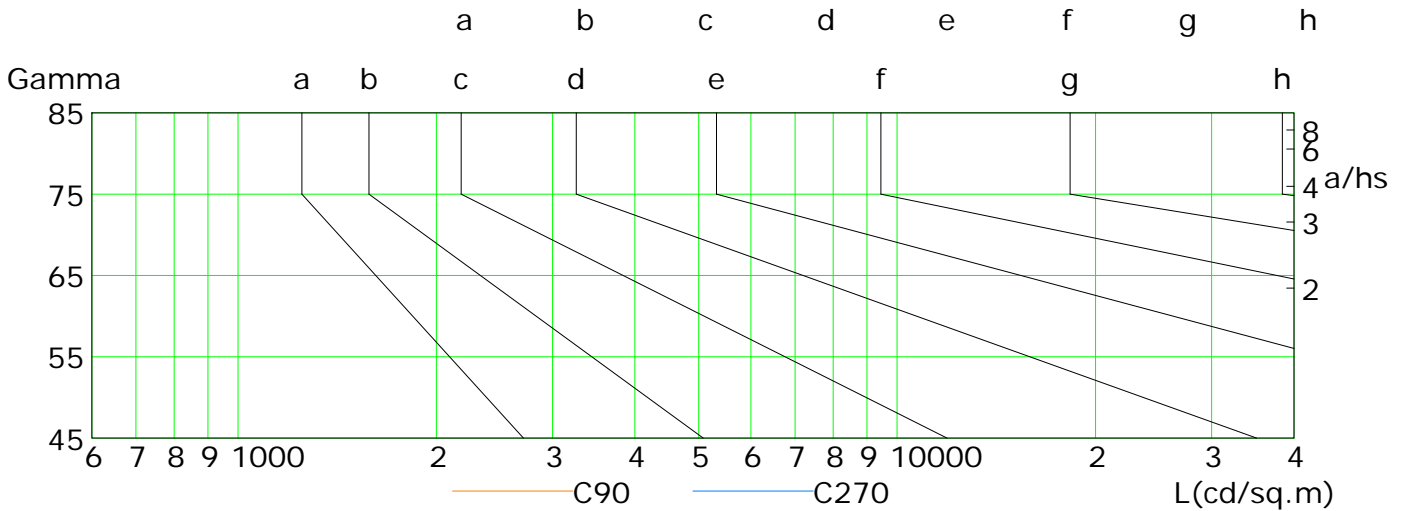
C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:



Lum Limit Curve

Dazzle	Quality	Illuminance (lx)							
		a	b	c	d	e	f	g	h
1.15	A	2000	1000	500	<=300				
1.50	B		2000	1000	500	<=300			
1.85	C			2000	1000	500	<=300		
2.20	D				2000	1000	500	<=300	
2.55	E					2000	1000	500	<=300



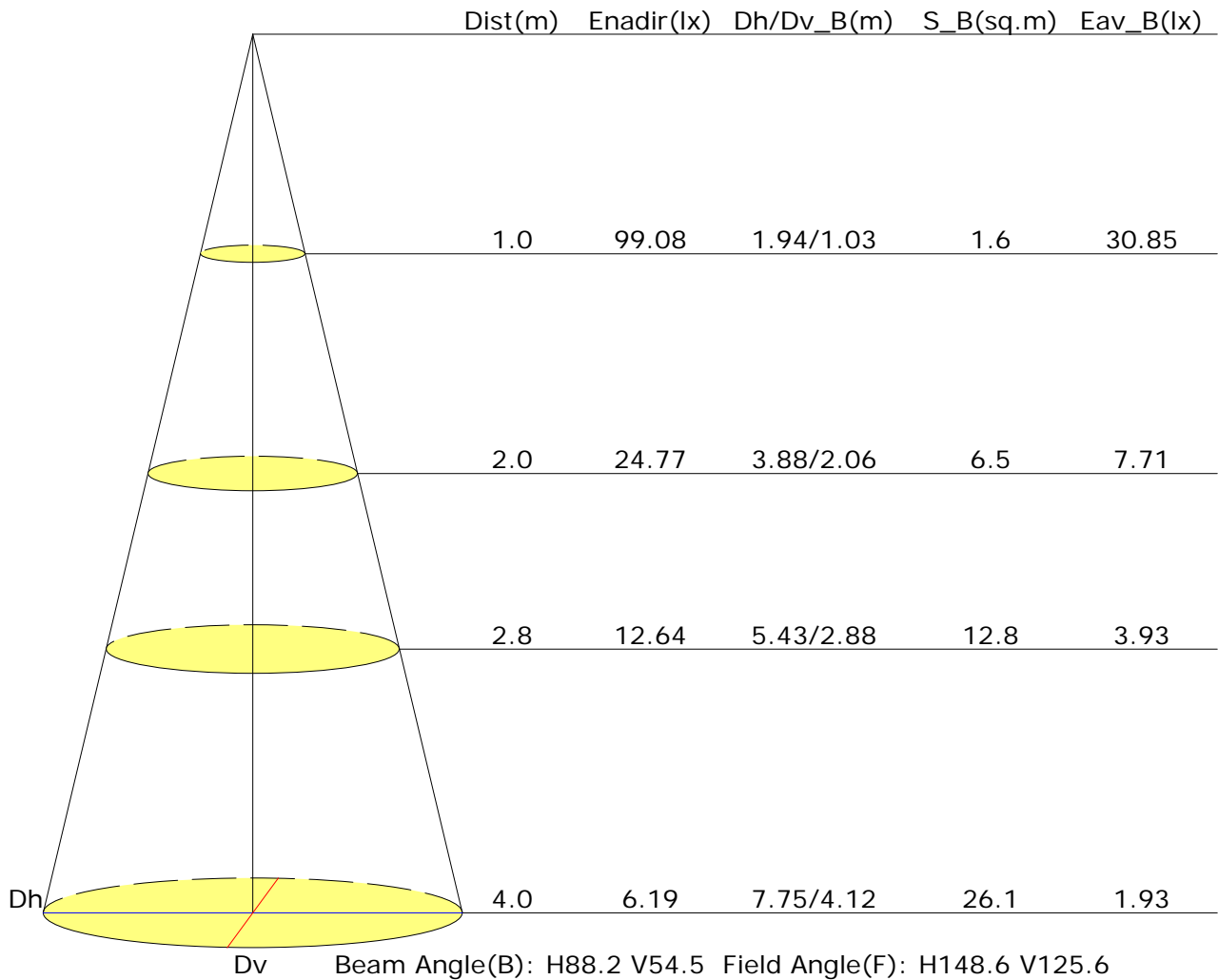
L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	49	41	34	27	20	15	9	5	1
C90	27	25	18	13	9	6	4	2	1
C180	47	40	33	26	20	14	9	5	1
C270	27	24	17	11	8	6	3	2	0

C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector:

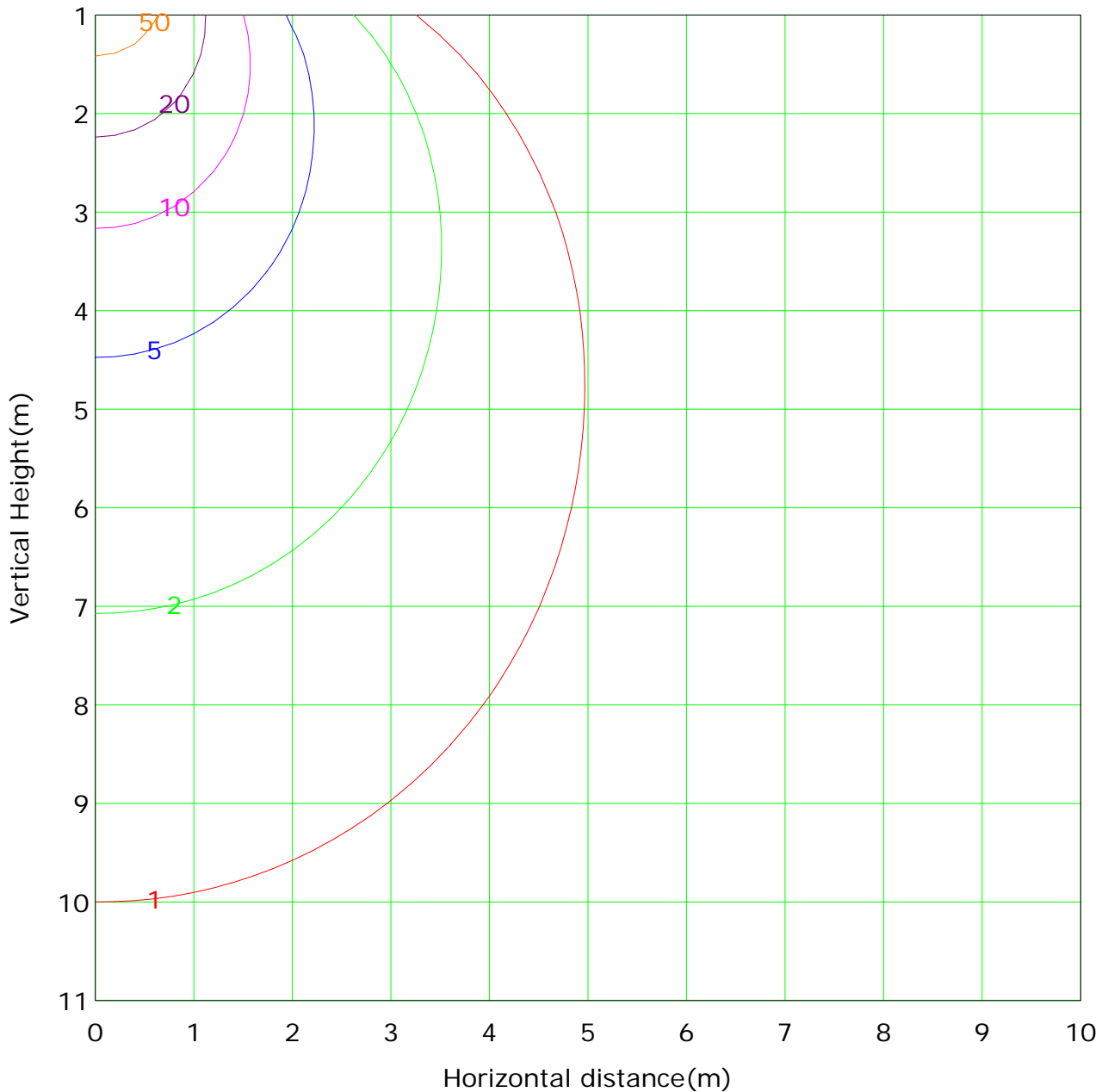


Illuminance at a Distance





Vertical IsoLux Plot



Lowest(m): 1.0m	Highest(m): 11.0m	Max Lux: 99.1 lx
— (1%): 1.0 lx	— (2%): 2.0 lx	
— (5%): 5.0 lx	— (10%): 9.9 lx	
— (20%): 19.8 lx	— (50%): 49.5 lx	
— (100%): 99.1 lx		

C Plane (°):0.0-360.0: 30.0
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: GPM-1800B
 Distance: 7.979 m
 Humidity:
 Inspector: