

Report No.: 1

Test Time: 29.01.2020 20:45

Luminaire Property

Luminaire Manufacturer:

Luminaire Description: FW 150 HE 4x28LED 125W 5000K 90x90gr.

Luminous Length (mm): 404

Luminous Width (mm): 153

Luminous Height (mm): 80

Voltage: 221.0 V

Current: 0.574 A

Power: 126.06 W

Power Factor: 0.993

Photometric Results

CIE Class: Direct

Measurement Flux: 18560.1 lm

Downward Ratio: 99%

Total Rated Lamp Lumens: 18560.1 lm

Efficiency: 100%

Upward Ratio: 1%

Field Angle(C0/C180,C90/C270,C45/C225,C135/315): 111.2, 111.1, 120.5, 120.1

Beam Angle(C0/C180,C90/C270,C45/C225,C135/315): 81.4, 81.3, 89.6, 89.6

Luminaire Efficacy Rating (LER): 147.28

Central Intensity: 7507.31 cd

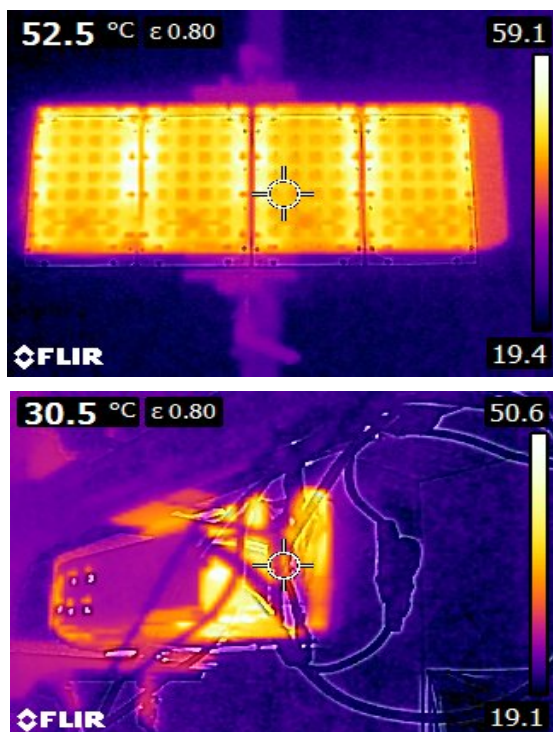
Max. Intensity: 11451.68 cd

Pos of Max. Intensity: H135 V31

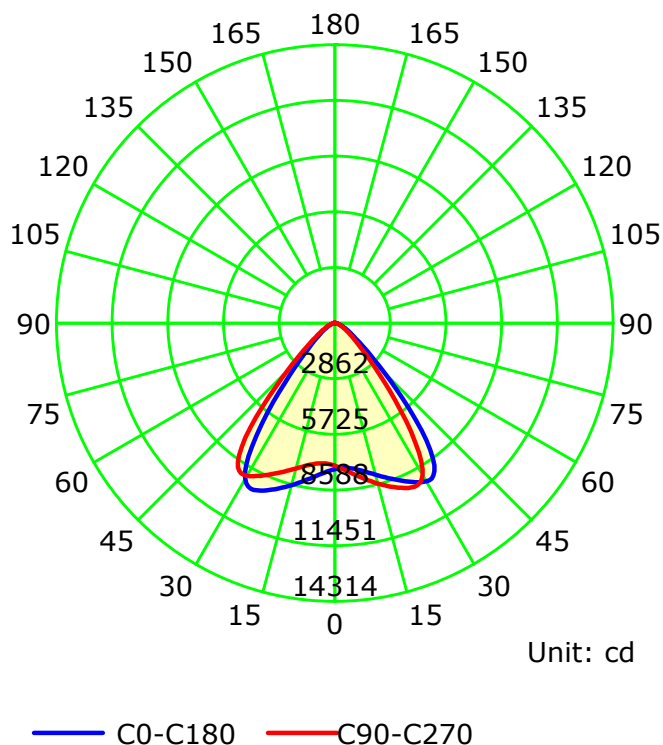
S/MH(C0/C180): 1.48

S/MH(C90/C270): 1.48

Termogramma



Luminous Intensity Distribution Curve



C Plane (°):0.0-360.0: 22.5

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

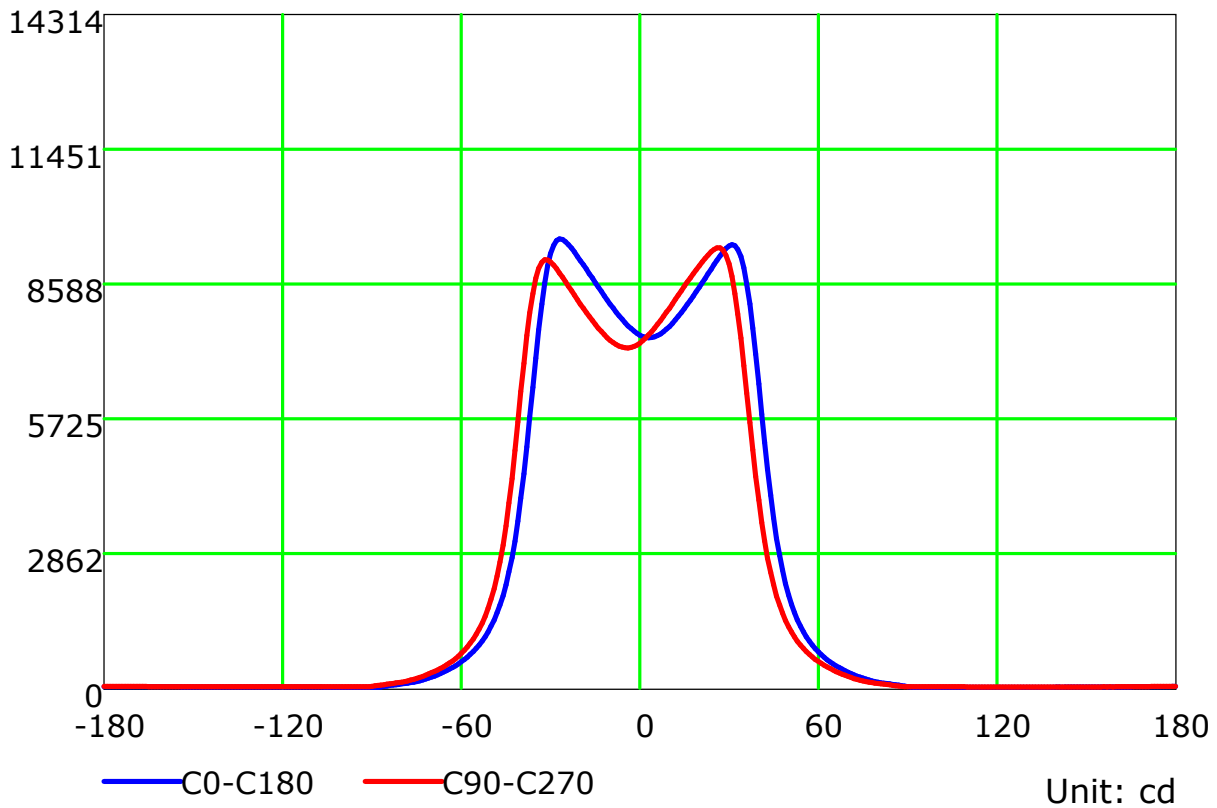
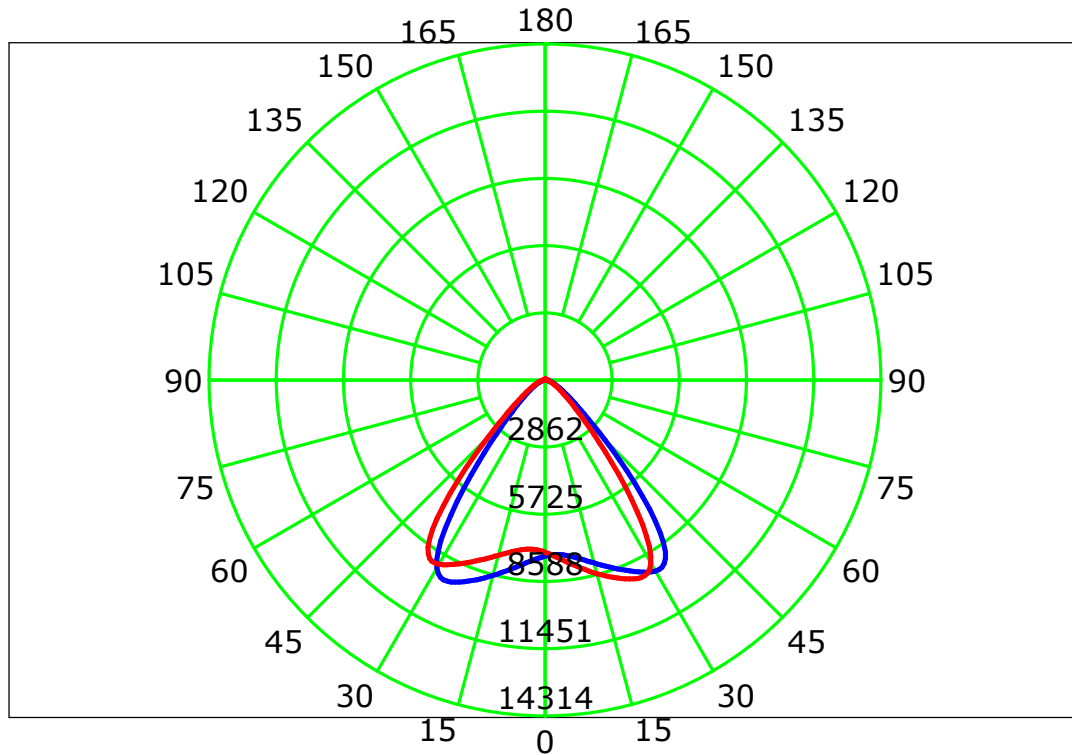
Test Device: LSG-1800B

Distance: 12.677 m

Humidity:

Inspector:

Luminous Intensity Distribution Curve



C Plane (°):0.0-360.0: 22.5

Test Lab:

Test Type: TYPE C

Temperature:

Operator:

Gamma Plane (°):0.0-180.0:1.0

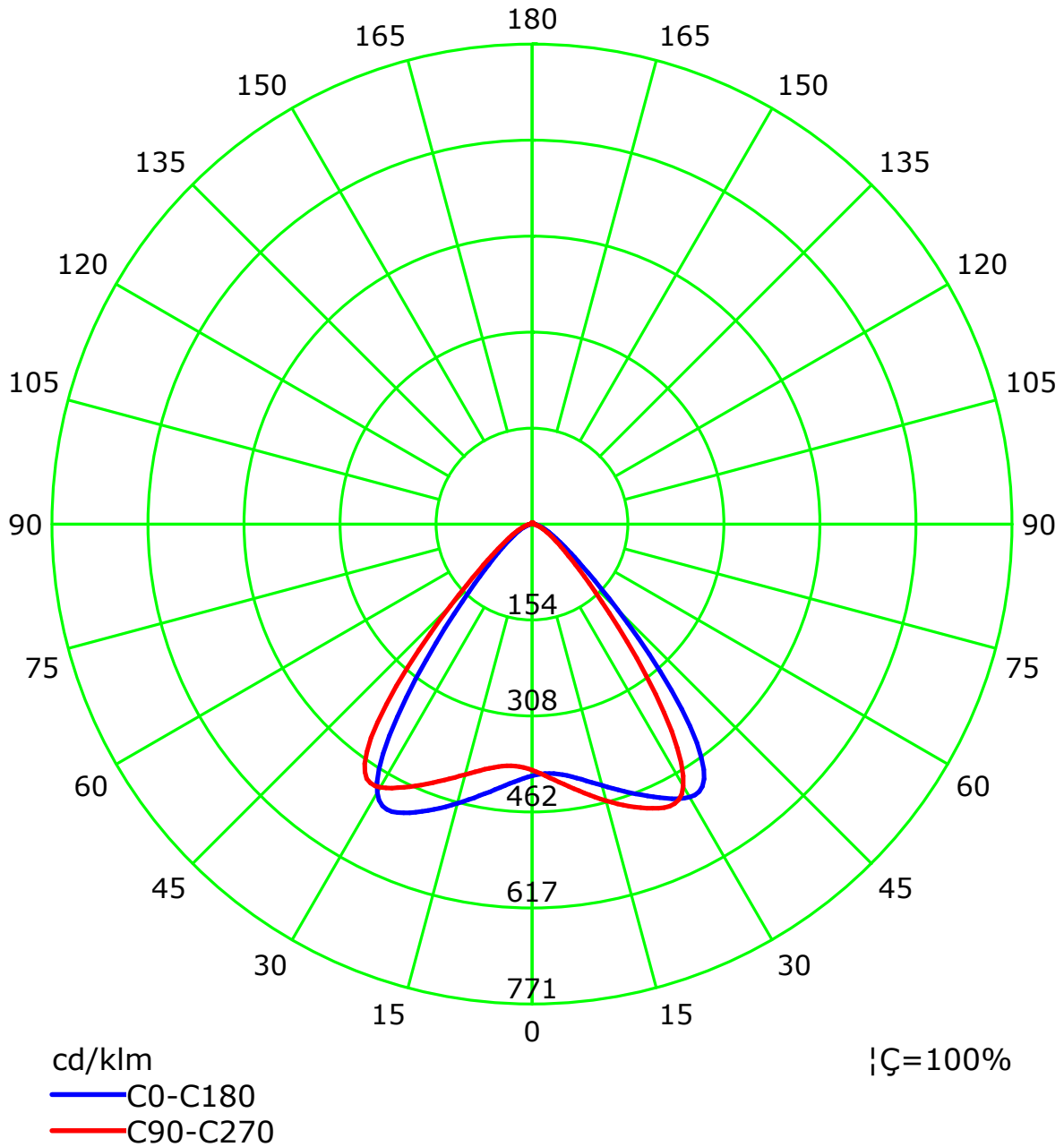
Test Device: LSG-1800B

Distance: 12.677 m

Humidity:

Inspector:

Luminous Intensity Distribution Curve(cd/klm)



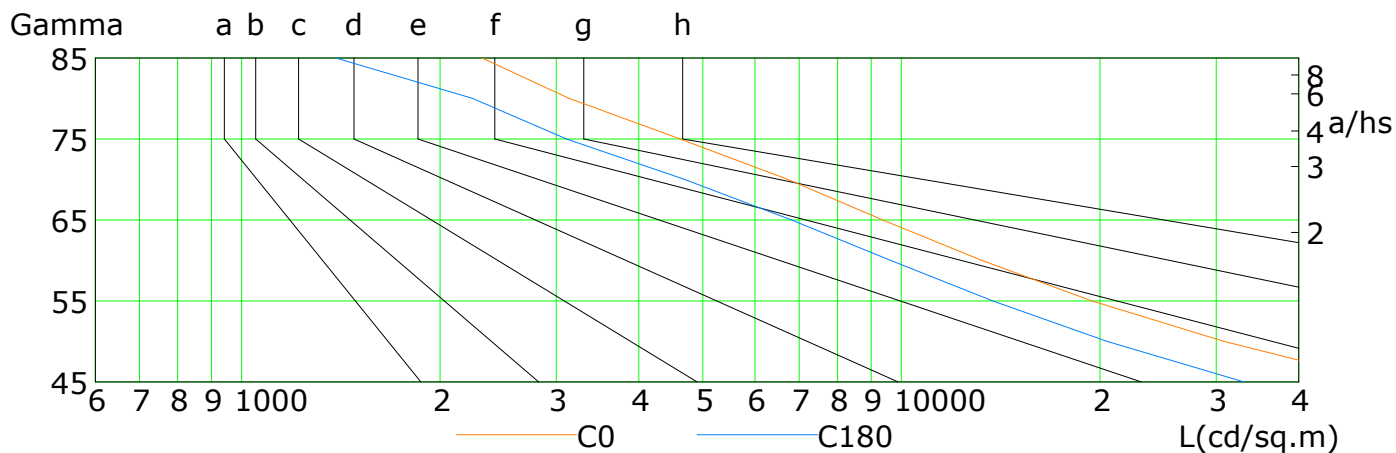
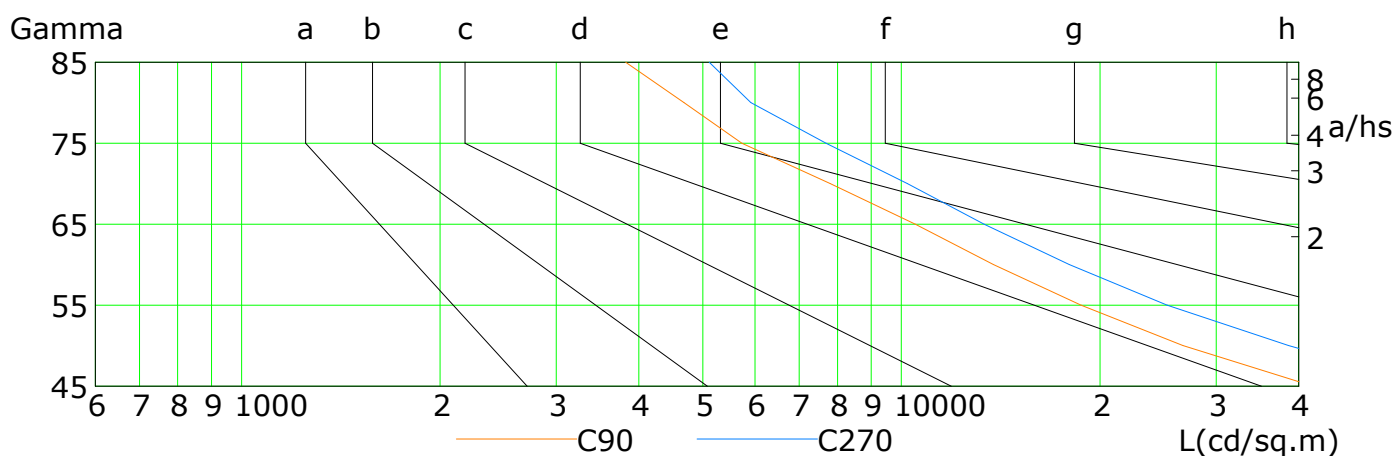
C Plane (°):0.0-360.0: 22.5
Test Lab:
Test Type: TYPE C
Temperature:
Operator:

Gamma Plane (°):0.0-180.0:1.0
Test Device: LSG-1800B
Distance: 12.677 m
Humidity:
Inspector:

Lum Limit Curve

Dazzle	Quality	Illuminance (lx)							
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

a b c d e f g h

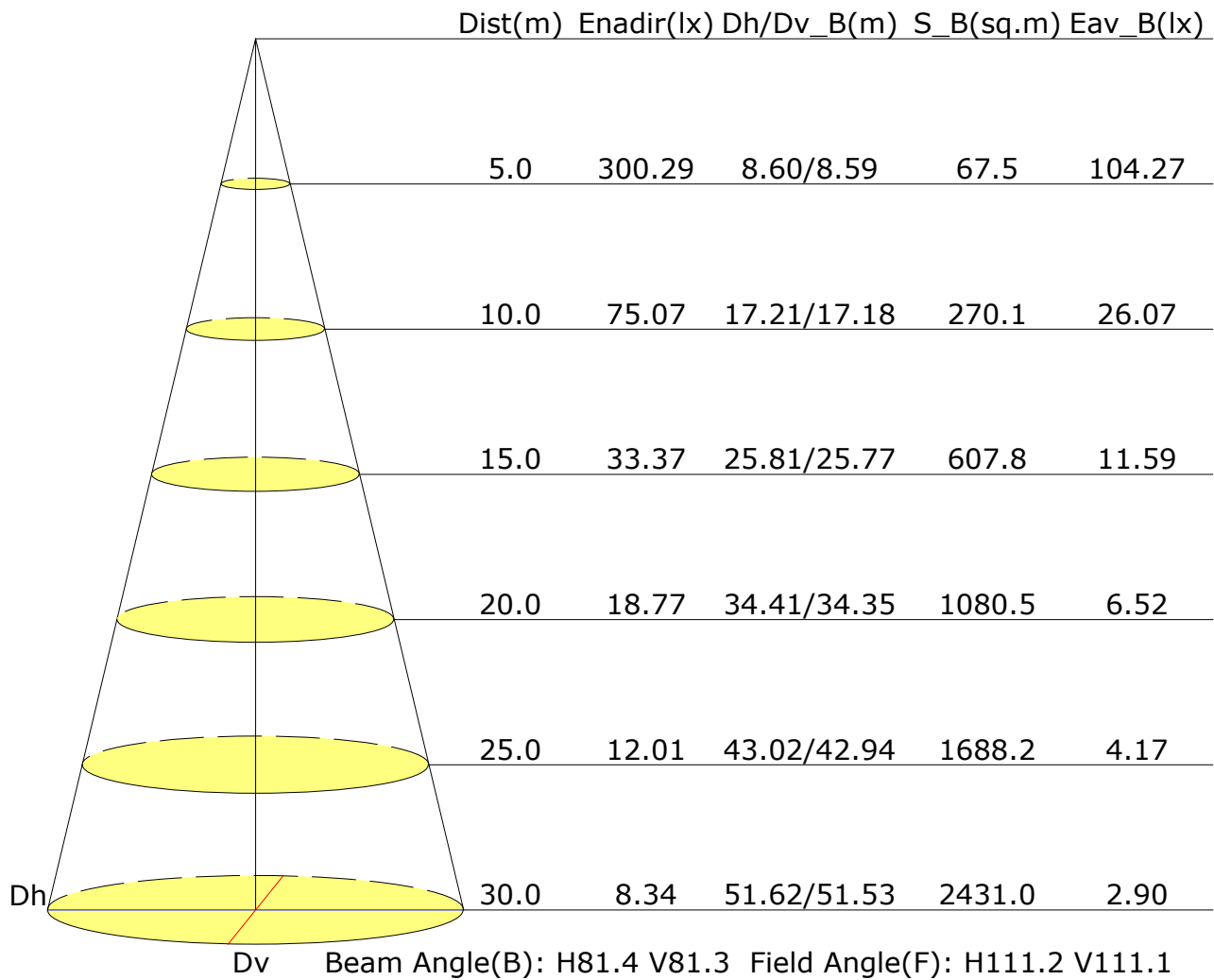


L(cd/sq.m)	G45	G50	G55	G60	G65	G70	G75	G80	G85
C0	54392	30780	19454	13233	9368	6724	4620	3137	2314
C90	42086	26711	18718	13792	10495	7802	5732	4683	3823
C180	33068	20482	13756	9625	6814	4687	3109	2237	1388
C270	65904	38620	25284	17961	13346	10213	7692	5912	5114

C Plane (°):0.0-360.0: 22.5
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: LSG-1800B
 Distance: 12.677 m
 Humidity:
 Inspector:

Illuminance at a Distance



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	24.7	25.8	25.0	26.1	26.3	24.5	25.6	24.8	25.8	26.1
3H	24.7	25.7	25.0	26.0	26.3	24.5	25.5	24.8	25.7	26.0
4H	24.7	25.6	25.0	25.9	26.2	24.4	25.4	24.8	25.7	26.0
6H	24.6	25.5	25.0	25.8	26.1	24.4	25.3	24.8	25.6	25.9
8H	24.6	25.4	25.0	25.7	26.1	24.4	25.2	24.8	25.5	25.9
12H	24.5	25.3	24.9	25.7	26.0	24.4	25.2	24.7	25.5	25.9
X=4H Y=2H	24.7	25.6	25.0	25.9	26.2	24.5	25.4	24.8	25.7	26.0
3H	24.7	25.5	25.1	25.9	26.2	24.5	25.3	24.9	25.7	26.0
4H	24.7	25.4	25.1	25.8	26.2	24.5	25.3	25.0	25.6	26.0
6H	24.7	25.3	25.1	25.7	26.1	24.5	25.2	25.0	25.6	26.0
8H	24.7	25.3	25.1	25.7	26.1	24.5	25.1	25.0	25.5	25.9
12H	24.7	25.2	25.1	25.6	26.1	24.5	25.0	25.0	25.5	25.9
X=8H Y=4H	24.7	25.3	25.1	25.7	26.1	24.5	25.1	25.0	25.5	25.9
6H	24.7	25.1	25.2	25.6	26.1	24.5	25.0	25.0	25.4	25.9
8H	24.7	25.1	25.2	25.5	26.0	24.5	24.9	25.0	25.4	25.9
12H	24.7	25.0	25.2	25.5	26.0	24.5	24.9	25.0	25.4	25.9
X=12H Y=4H	24.7	25.2	25.1	25.6	26.1	24.5	25.0	24.9	25.4	25.9
6H	24.7	25.1	25.2	25.5	26.0	24.5	24.9	25.0	25.4	25.9
8H	24.7	25.0	25.2	25.5	26.0	24.5	24.9	25.0	25.3	25.9
Variations with the observer position at spacings:										
S=1.0H	+2.7/-3.9					+2.3/-3.4				
S=1.5H	+3.5/-5.4					+3.1/-5.2				
S=2.0H	+5.4/-6.4					+4.8/-6.5				

Calculate in accordance with CIE Pub.117. The table is revised with 18560lm ($8\log(F/F_0) = 10.1$).

C Plane (°):0.0-360.0: 22.5
 Test Lab:
 Test Type: TYPE C
 Temperature:
 Operator:

Gamma Plane (°):0.0-180.0:1.0
 Test Device: LSG-1800B
 Distance: 12.677 m
 Humidity:
 Inspector:

Utilisation Factor Table(Floor cavity)

Utilisation Factors UF(F)			SHR NOM = 1.25									
Room Reflectance			Room Index(RI)									
Ceiling	Wall	Floor	0.75	1.00	1.25	1.50	2.00	2.50	3.00	4.00	5.00	
0.70	0.50	0.20	0.73	0.82	0.87	0.92	0.97	1.00	1.03	1.06	1.08	
	0.30		0.67	0.76	0.82	0.87	0.93	0.97	0.99	1.03	1.05	
	0.20		0.62	0.72	0.78	0.83	0.89	0.93	0.96	1.00	1.03	
0.50	0.50	0.20	0.71	0.80	0.85	0.89	0.94	0.97	0.99	1.02	1.03	
	0.30		0.66	0.75	0.81	0.85	0.90	0.94	0.96	0.99	1.01	
	0.20		0.62	0.71	0.77	0.81	0.87	0.91	0.94	0.98	1.00	
0.30	0.50	0.20	0.70	0.78	0.83	0.86	0.91	0.94	0.96	0.98	1.00	
	0.30		0.65	0.74	0.79	0.83	0.88	0.91	0.93	0.96	0.98	
	0.20		0.62	0.70	0.76	0.80	0.85	0.89	0.91	0.95	0.97	
0.00	0.00	0.00	0.60	0.68	0.73	0.77	0.82	0.85	0.87	0.90	0.92	
Rating:126W Photometrically tested without ceiling board. Multiply UF values by service correction factors Calculate in accordance with CIBSE Technical Memorandum NO.5 1980												

Utilisation Factor Table(Wall)

Utilisation Factors UF(W)			SHR NOM = 1.25									
Room Reflectance			Room Index(RI)									
Ceiling	Wall	Floor	0.75	1.00	1.25	1.50	2.00	2.50	3.00	4.00	5.00	
0.70	0.50	0.20	0.75	0.60	0.50	0.43	0.34	0.28	0.24	0.18	0.15	
	0.30		0.63	0.51	0.43	0.38	0.30	0.25	0.22	0.17	0.14	
	0.20		0.54	0.45	0.39	0.34	0.28	0.23	0.20	0.16	0.13	
0.50	0.50	0.20	0.72	0.57	0.47	0.40	0.32	0.30	0.22	0.17	0.14	
	0.30		0.61	0.49	0.42	0.36	0.29	0.24	0.20	0.16	0.13	
	0.20		0.53	0.44	0.37	0.33	0.27	0.22	0.19	0.15	0.13	
0.30	0.50	0.20	0.69	0.54	0.45	0.38	0.30	0.24	0.20	0.16	0.13	
	0.30		0.59	0.48	0.40	0.35	0.27	0.23	0.19	0.15	0.12	
	0.20		0.52	0.42	0.36	0.32	0.25	0.21	0.18	0.14	0.12	
0.00	0.00	0.00	0.39	0.31	0.26	0.22	0.17	0.14	0.12	0.09	0.07	
Rating:126W Photometrically tested without ceiling board. Multiply UF values by service correction factors Calculate in accordance with CIBSE Technical Memorandum NO.5 1980												

Utilisation Factor Table(Ceiling cavity)

Utilisation Factors UF(C)			SHR NOM = 1.25									
Room Reflectance			Room Index(RI)									
Ceiling	Wall	Floor	0.75	1.00	1.25	1.50	2.00	2.50	3.00	4.00	5.00	
0.70	0.50	0.20	0.15	0.17	0.18	0.18	0.20	0.20	0.21	0.22	0.22	
	0.30		0.10	0.12	0.13	0.14	0.16	0.17	0.18	0.20	0.20	
	0.20		0.06	0.08	0.10	0.11	0.13	0.15	0.16	0.18	0.19	
0.50	0.50	0.20	0.15	0.16	0.17	0.18	0.19	0.19	0.20	0.21	0.21	
	0.30		0.10	0.12	0.13	0.14	0.16	0.17	0.18	0.19	0.20	
	0.20		0.06	0.08	0.10	0.11	0.13	0.15	0.16	0.17	0.18	
0.30	0.50	0.20	0.14	0.15	0.16	0.17	0.18	0.19	0.19	0.20	0.20	
	0.30		0.10	0.11	0.13	0.14	0.15	0.16	0.17	0.18	0.19	
	0.20		0.06	0.08	0.10	0.11	0.13	0.14	0.15	0.17	0.18	
0.00	0.00	0.00	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	
Rating:126W Photometrically tested without ceiling board. Multiply UF values by service correction factors Calculate in accordance with CIBSE Technical Memorandum NO.5 1980												