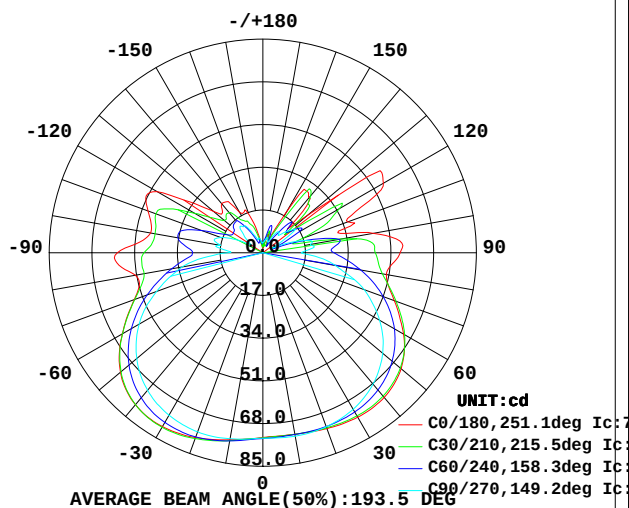


LUMINAIRE PHOTOMETRIC TEST REPORT

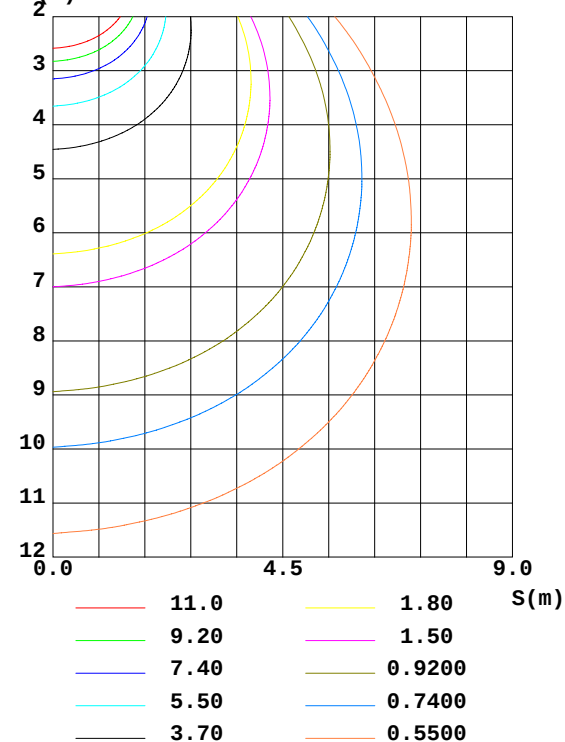
Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm		
NAME:ASD-LWS12-8D10AC-BK	TYPE:LED	WEIGHT:
SPEC.:5000K	DIM.:	SERIAL No.:
MFR.:ASD Lighting Corp	SUR.:	PROTECTION ANGLE:

DATA OF LAMP		PHOTOMETRIC DATA Eff: 61 lm/W			
MODEL	ASD-LWS12-8D10AC-BK	I _{max} (cd)	80.59	S/MH(C0/180)	1.64
NOMINAL POWER(W)	10	LOR(%)	100.0	S/MH(C90/270)	1.51
RATED VOLTAGE(V)	120	TOTAL FLUX(lm)	610	η UP, DN(C0-180)	13.7, 35.2
NOMINAL FLUX(lm)	610	CIE CLASS	SEMI-D.	η UP, DN(C180-360)	14.1, 36.9
LAMPS INSIDE	1	η up(%)	27.9	CIBSE SHR NOM	1.75
TEST VOLTAGE(V)	120	η down(%)	72.1	CIBSE SHR MAX	1.75

LUMINOUS INTENSITY DISTRIBUTION DIAGRAM



C0 PLANE ISOLUX DIAGRAM (UNIT:lx)



C Range: 0 - 360DEG
C Interval: 15.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:
Test Date:2025-06-18

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
Humidity:65.0%
Test Distance:7.500m [K=1.0000]
Remarks:

ZONAL FLUX DIAGRAM

ZONAL FLUX DIAGRAM:

γ	C0	C45	C90	C135	C180	C225	C270	C315	γ	Φ zone	Φ total	%lum, lamp
10	73.35	73.40	74.11	75.60	75.56	76.24	75.18	73.89	0- 10	7.069	7.069	1.38,1.38
20	74.48	73.90	73.70	76.88	78.30	78.67	75.89	74.63	10- 20	21.29	28.35	5.54,5.54
30	75.57	74.33	71.93	76.56	79.91	79.54	74.68	74.79	20- 30	35.04	63.40	12.4,12.4
40	75.14	73.56	68.23	73.60	78.92	77.41	71.40	73.49	30- 40	46.96	110.4	21.5,21.5
50	71.82	70.41	62.27	67.17	73.99	71.52	65.49	69.87	40- 50	55.15	165.5	32.3,32.3
60	64.65	64.29	53.62	57.76	64.58	62.33	56.86	63.46	50- 60	58.11	223.6	43.7,43.7
70	55.68	55.47	42.94	46.18	54.42	51.66	44.92	54.13	60- 70	55.27	278.9	54.4,54.4
80	49.96	45.80	29.32	34.85	51.58	42.96	32.61	42.38	70- 80	48.38	327.3	63.9,63.9
90	54.64	38.28	15.22	30.64	57.94	38.88	14.11	32.24	80- 90	42.23	369.5	72.1,72.1
100	44.70	30.90	19.30	35.37	45.45	40.77	17.06	32.99	90-100	38.31	407.8	79.6,79.6
110	36.09	5.473	12.56	27.99	48.66	40.32	17.91	15.63	100-110	30.64	438.4	85.6,85.6
120	55.36	26.34	7.674	18.08	48.71	22.87	7.860	9.862	110-120	24.53	463.0	90.4,90.4
130	22.94	15.68	13.64	16.60	25.74	19.25	8.797	15.88	120-130	19.32	482.3	94.2,94.2
140	28.60	25.52	9.719	16.86	25.49	17.74	13.87	16.41	130-140	13.29	495.6	96.7,96.7
150	18.66	9.079	6.821	10.92	18.67	12.93	10.87	4.609	140-150	10.45	506.0	98.8,98.8
160	6.111	7.442	5.445	5.493	16.00	7.520	5.547	6.804	150-160	3.924	510.0	99.6,99.6
170	3.247	4.558	5.082	2.258	4.003	3.979	5.137	7.323	160-170	1.942	511.9	99.9,99.9
180	3.154	3.944	4.040	4.171	3.139	3.932	4.017	4.194	170-180	0.3586	512.3	100,100
DEG	LUMINOUS INTENSITY:cd									UNIT: lm		

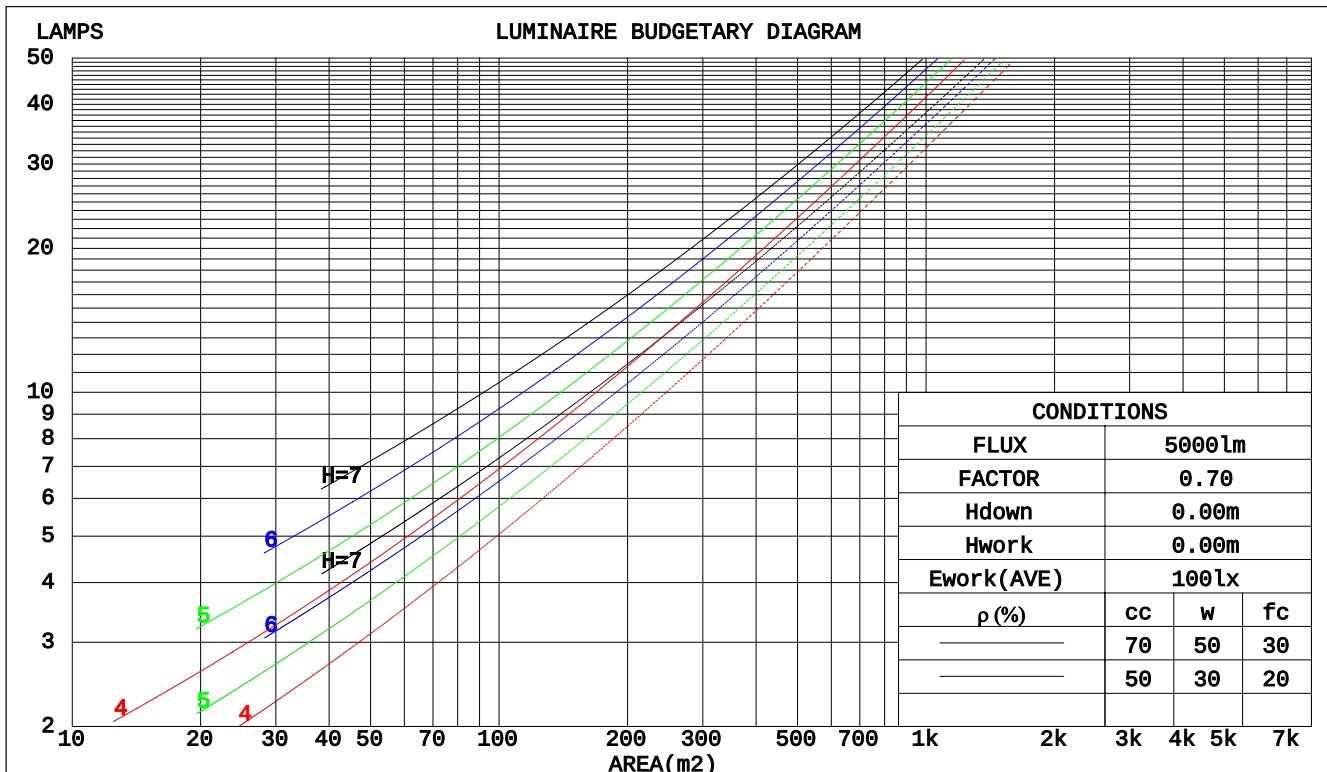
C Range: 0 - 360DEG
 C Interval: 15.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
 Humidity:65.0%
 Test Distance:7.500m [K=1.0000]
 Remarks:

CU AND LUMINAIRE BUDGETARY ESTIMATE DIAGRAM

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm		
NAME:ASD-LWS12-8D10AC-BK	TYPE:LED	WEIGHT:
SPEC.:5000K	DIM.:	SERIAL No.:
MFR.:ASD Lighting Corp	SUR.:	PROTECTION ANGLE:

ρ_{CC}	80%			70%			50%			30%			10%			0
ρ_W	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0
ρ_{fc}	20%			20%			20%			20%			20%			0
RCR	RCR:Room Cavity Ratio						Coefficients of Utilization(CU)									
0.0	1.12	1.12	1.12	1.07	1.07	1.07	.96	.96	.96	.86	.86	.86	.76	.76	.76	.72
1.0	.93	.87	.82	.88	.83	.78	.78	.74	.71	.69	.66	.64	.61	.59	.57	.53
2.0	.79	.71	.64	.74	.67	.61	.66	.60	.55	.59	.54	.50	.52	.48	.45	.41
3.0	.68	.59	.52	.64	.56	.49	.57	.50	.45	.51	.45	.41	.45	.40	.36	.33
4.0	.59	.50	.43	.56	.47	.41	.50	.43	.37	.44	.39	.34	.39	.34	.30	.27
5.0	.52	.43	.36	.50	.41	.34	.44	.37	.31	.39	.33	.29	.35	.30	.26	.23
6.0	.47	.37	.31	.44	.36	.29	.40	.32	.27	.35	.29	.25	.31	.26	.22	.19
7.0	.42	.33	.27	.40	.31	.26	.36	.29	.23	.32	.26	.21	.28	.23	.19	.17
8.0	.38	.29	.23	.36	.28	.22	.33	.26	.21	.29	.23	.19	.26	.21	.17	.15
9.0	.35	.26	.21	.33	.25	.20	.30	.23	.18	.27	.21	.17	.24	.19	.15	.13
10.0	.32	.24	.18	.30	.23	.18	.27	.21	.16	.25	.19	.15	.22	.17	.14	.12



C Range: 0 - 360DEG
 C Interval: 15.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Operators:
 Test Date: 2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE G0-2000A_V1 SYSTEM V2.0.291
 Humidity: 65.0%
 Test Distance: 7.500m [K=1.0000]
 Remarks:

WEC AND CCEC

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm					
NAME:ASD-LWS12-8D10AC-BK			TYPE:LED		WEIGHT:
SPEC.:5000K			DIM.:		SERIAL No.:
MFR.:ASD Lighting Corp			SUR.:		PROTECTION ANGLE:

ρ_{CC}	80%			70%			50%			30%			10%			0	
ρ_W	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0	
ρ_{fc}	20%			20%			20%			20%			20%			0	
RCR	RCR:Room Cavity Ratio						Wall Exitance Coefficients(WEC)										
0.0																	
1.0	.397	.226	.071	.381	.217	.069	.351	.202	.064	.324	.187	.060	.299	.174	.056		
2.0	.339	.186	.057	.325	.179	.055	.298	.166	.052	.274	.153	.048	.251	.142	.045		
3.0	.300	.159	.048	.287	.154	.046	.262	.142	.043	.240	.131	.040	.219	.121	.038		
4.0	.269	.140	.041	.257	.134	.040	.235	.125	.037	.214	.115	.035	.195	.106	.032		
5.0	.244	.124	.036	.233	.120	.035	.213	.111	.033	.194	.102	.030	.176	.094	.028		
6.0	.223	.112	.032	.213	.108	.031	.194	.100	.029	.177	.092	.027	.161	.085	.025		
7.0	.205	.101	.029	.196	.098	.028	.179	.091	.026	.163	.084	.024	.148	.077	.023		
8.0	.190	.093	.026	.182	.089	.025	.166	.083	.024	.151	.077	.022	.137	.070	.021		
9.0	.177	.086	.024	.169	.082	.023	.155	.076	.022	.141	.071	.020	.128	.065	.019		
10.0	.165	.079	.022	.158	.076	.021	.145	.071	.020	.132	.065	.019	.120	.060	.017		

ρ _{CC}	80%			70%			50%			30%			10%			0	
ρ _W	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	50%	30%	10%	0	
ρ _{fc}	20%			20%			20%			20%			20%			0	
RCR	RCR:Room Cavity Ratio						Ceiling Cavity Exitance Coefficients(CCEC)										
0.0	.403	.403	.403	.344	.344	.344	.235	.235	.235	.135	.135	.135	.043	.043	.043		
1.0	.400	.369	.342	.343	.317	.294	.234	.218	.203	.135	.126	.118	.043	.041	.038		
2.0	.394	.347	.308	.338	.299	.266	.231	.207	.186	.133	.120	.109	.043	.039	.035		
3.0	.387	.331	.287	.332	.286	.249	.228	.198	.174	.132	.116	.103	.042	.038	.034		
4.0	.379	.319	.273	.325	.276	.237	.224	.192	.167	.129	.113	.099	.042	.037	.032		
5.0	.372	.310	.264	.319	.268	.229	.220	.187	.162	.127	.110	.096	.041	.036	.032		
6.0	.364	.302	.257	.313	.261	.224	.216	.183	.158	.125	.108	.094	.040	.035	.031		
7.0	.357	.295	.252	.307	.256	.220	.212	.180	.156	.123	.106	.093	.040	.035	.031		
8.0	.351	.290	.248	.302	.252	.216	.209	.177	.154	.122	.104	.091	.039	.034	.030		
9.0	.345	.285	.245	.297	.248	.214	.206	.174	.152	.120	.103	.091	.039	.034	.030		
10.0	.339	.281	.243	.292	.244	.212	.203	.172	.151	.118	.102	.090	.038	.033	.030		

C Range: 0 - 360DEG
 C Interval: 15.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
 Humidity:65.0%
 Test Distance:7.500m [K=1.0000]
 Remarks:

UGR(Unified Glare Rating) Table

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm											
NAME:ASD-LWS12-8D10AC-BK					TYPE:LED			WEIGHT:			
SPEC.:5000K					DIM.:			SERIAL No.:			
MFR.:ASD Lighting Corp					SUR.:			PROTECTION ANGLE:			
ceiling/cavity	0.7	0.7	0.5	0.5	0.3	0.7	0.7	0.5	0.5	0.3	
walls	0.5	0.3	0.5	0.3	0.3	0.5	0.3	0.5	0.3	0.3	
working 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		12.2	13.5	12.8	14.1	14.9	11.4	12.7	12.0	13.3	14.1
3H		14.8	15.9	15.4	16.6	17.4	13.6	14.8	14.3	15.5	16.3
4H		16.2	17.3	16.9	18.0	18.8	14.8	15.9	15.4	16.6	17.4
6H		17.8	18.9	18.5	19.6	20.4	15.8	16.9	16.5	17.6	18.4
8H		18.8	19.8	19.5	20.5	21.4	16.4	17.4	17.1	18.1	19.0
12H		20.0	21.0	20.7	21.7	22.6	17.0	18.0	17.7	18.7	19.6
4H 2H		13.0	14.1	13.6	14.8	15.6	12.4	13.5	13.1	14.2	15.0
3H		15.8	16.7	16.5	17.5	18.3	14.9	15.8	15.6	16.6	17.4
4H		17.4	18.2	18.1	19.0	19.9	16.1	17.0	16.9	17.8	18.7
6H		19.2	20.0	19.9	20.8	21.7	17.4	18.2	18.2	19.0	19.9
8H		20.3	21.0	21.0	21.8	22.7	18.0	18.8	18.8	19.6	20.5
12H		21.6	22.3	22.4	23.1	24.0	18.7	19.4	19.5	20.2	21.2
8H 4H		17.9	18.6	18.7	19.4	20.4	16.9	17.7	17.7	18.5	19.4
6H		20.0	20.6	20.8	21.4	22.4	18.5	19.1	19.3	19.9	20.9
8H		21.3	21.9	22.1	22.7	23.7	19.3	19.9	20.1	20.7	21.7
12H		22.9	23.4	23.7	24.2	25.2	20.2	20.7	21.0	21.5	22.6
12H 4H		18.0	18.7	18.7	19.5	20.4	17.1	17.8	17.9	18.6	19.6
6H		20.2	20.8	21.0	21.6	22.6	18.9	19.4	19.7	20.3	21.3
8H		21.6	22.1	22.4	23.0	24.0	19.8	20.3	20.7	21.2	22.2
Variations with the observer position at spacings:											
S = 1.0H		+ 0.1 / - 0.1					+ 0.1 / - 0.1				
1.5H		+ 0.2 / - 0.3					+ 0.2 / - 0.3				
2.0H		+ 0.3 / - 0.4					+ 0.3 / - 0.4				

CIE Pub.117 Corrected 512.3 lm Total Lamp Luminous Flux.(8log(F/F0) = -2.3)

C Range: 0 - 360DEG
 C Interval: 15.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
 Humidity:65.0%
 Test Distance:7.500m [K=1.0000]
 Remarks:

UTILIZATION FACTORS TABLE

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm		
NAME:ASD-LWS12-8D10AC-BK	TYPE:LED	WEIGHT:
SPEC.:5000K	DIM.:	SERIAL No.:
MFR.:ASD Lighting Corp	SUR.:	PROTECTION ANGLE:

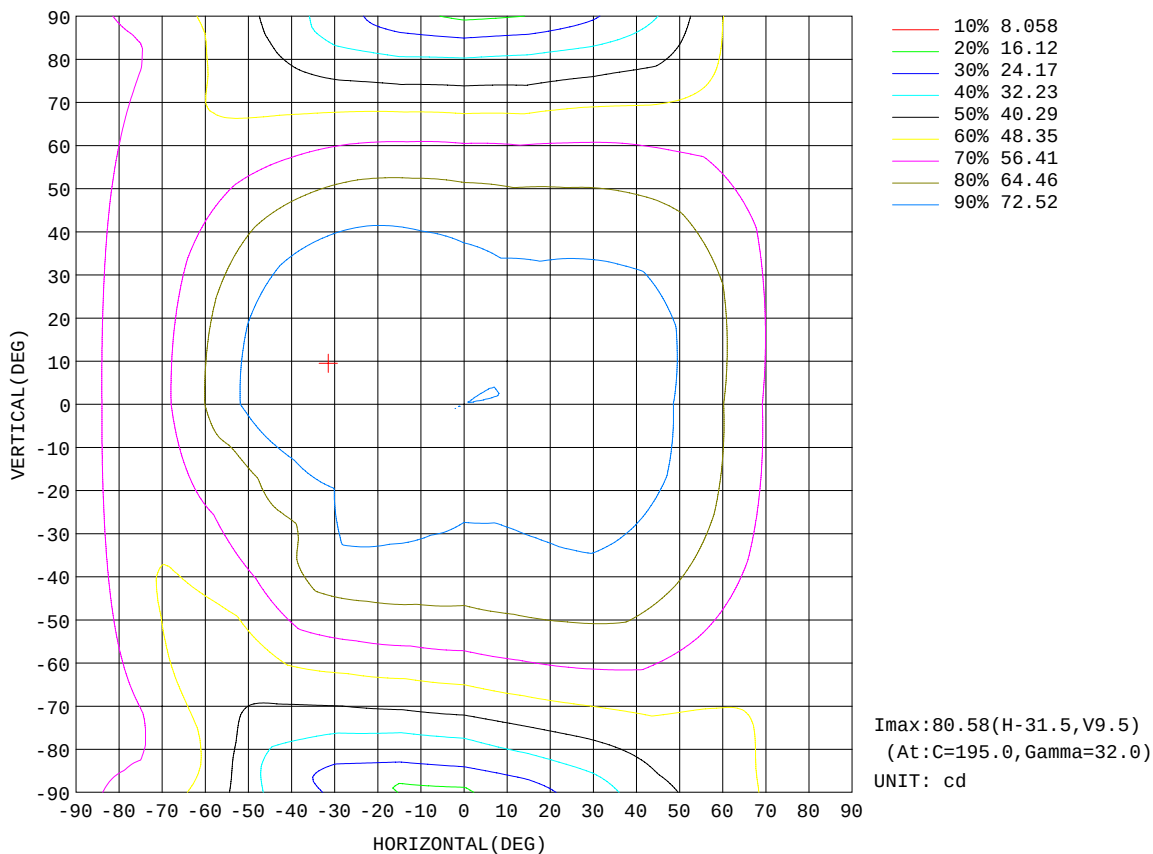
REFLECTANCE										
Ceiling	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.5	0.5	0
Walls	0.7	0.5	0.3	0.7	0.5	0.3	0.7	0.5	0.3	0
Working plane	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0
ROOM INDEX	UTILIZATION FACTORS(PERCENT) $k(RI) \times RCR = 5$									
$k = 0.60$	43	31	23	42	30	23	39	29	22	15
0.80	52	39	31	50	38	30	47	36	29	20
1.00	60	46	38	58	45	37	53	45	35	26
1.25	67	54	45	64	52	43	59	49	41	30
1.50	72	59	50	69	57	49	63	53	46	34
2.00	80	68	59	76	65	57	69	60	53	40
2.50	84	73	65	80	70	63	73	65	58	43
3.00	88	78	70	84	75	68	76	69	63	47
4.00	93	85	78	88	81	74	80	74	68	51
5.00	96	89	82	91	85	79	82	77	72	54
ROOM INDEX	UF(total)									Direct
According to DIN EN 13032-2 2004			Suspended					SHRNOM = 1.25		

C Range: 0 - 360DEG
 C Interval: 15.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
 Humidity:65.0%
 Test Distance:7.500m [K=1.0000]
 Remarks:

ISOCANDELA DIAGRAM

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm		
NAME:ASD-LWS12-8D10AC-BK	TYPE:LED	WEIGHT:
SPEC.:5000K	DIM.:	SERIAL No.:
MFR.:ASD Lighting Corp	SUR.:	PROTECTION ANGLE:

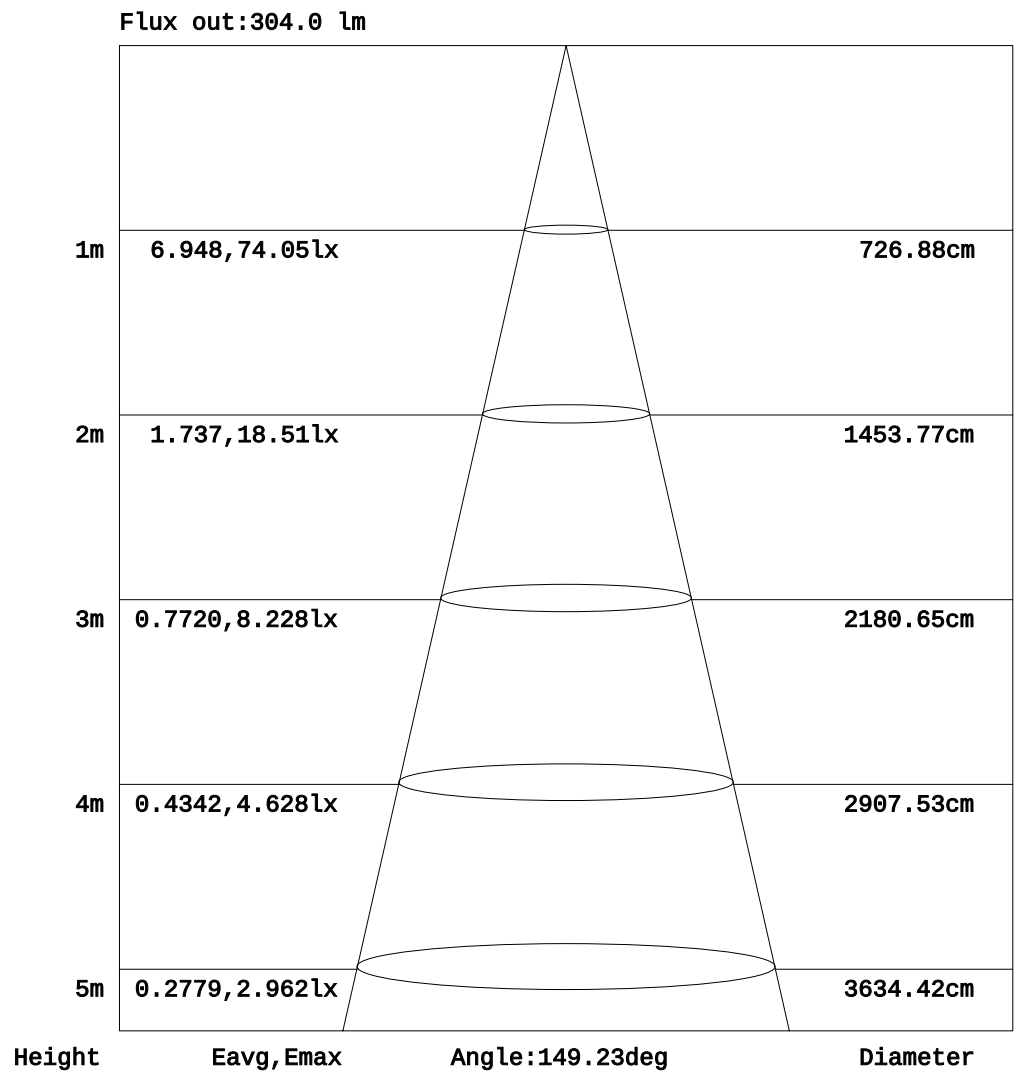


C Range: 0 - 360DEG
C Interval: 15.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:
Test Date:2025-06-18

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
Humidity:65.0%
Test Distance:7.500m [K=1.0000]
Remarks:

AAI Figure

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm		
NAME: ASD-LWS12-8D10AC-BK	TYPE:LED	WEIGHT:
SPEC.:5000K	DIM.:	SERIAL No.:
MFR.:ASD Lighting Corp	SUR.:	PROTECTION ANGLE:



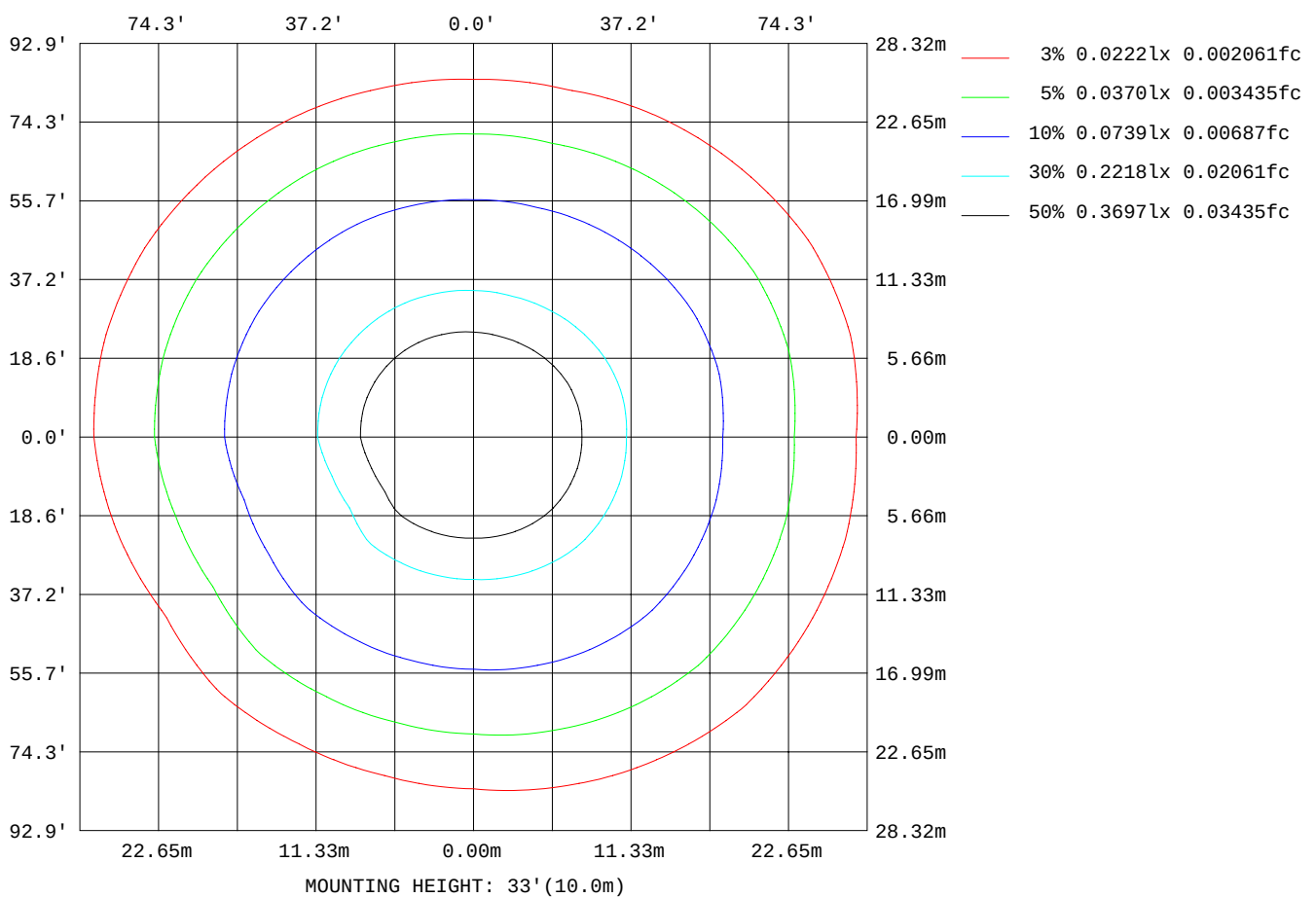
Note:The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

C Range: 0 - 360DEG
 C Interval: 15.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
 Humidity:65.0%
 Test Distance:7.500m [K=1.0000]
 Remarks:

ISOLUX DIAGRAM

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm		
NAME:ASD-LWS12-8D10AC-BK	TYPE:LED	WEIGHT:
SPEC.:5000K	DIM.:	SERIAL No.:
MFR.:ASD Lighting Corp	SUR.:	PROTECTION ANGLE:



C Range: 0 - 360DEG
 C Interval: 15.0DEG
 Test Speed: HIGH
 Temperature: 25.3DEG
 Operators:
 Test Date: 2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System: EVERFINE G0-2000A_V1 SYSTEM V2.0.291
 Humidity: 65.0%
 Test Distance: 7.500m [K=1.0000]
 Remarks:

LED Avg.L Report

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm		
NAME:ASD-LWS12-8D10AC-BK	TYPE:LED	WEIGHT:
SPEC.:5000K	DIM.:	SERIAL No.:
MFR.:ASD Lighting Corp	SUR.:	PROTECTION ANGLE:

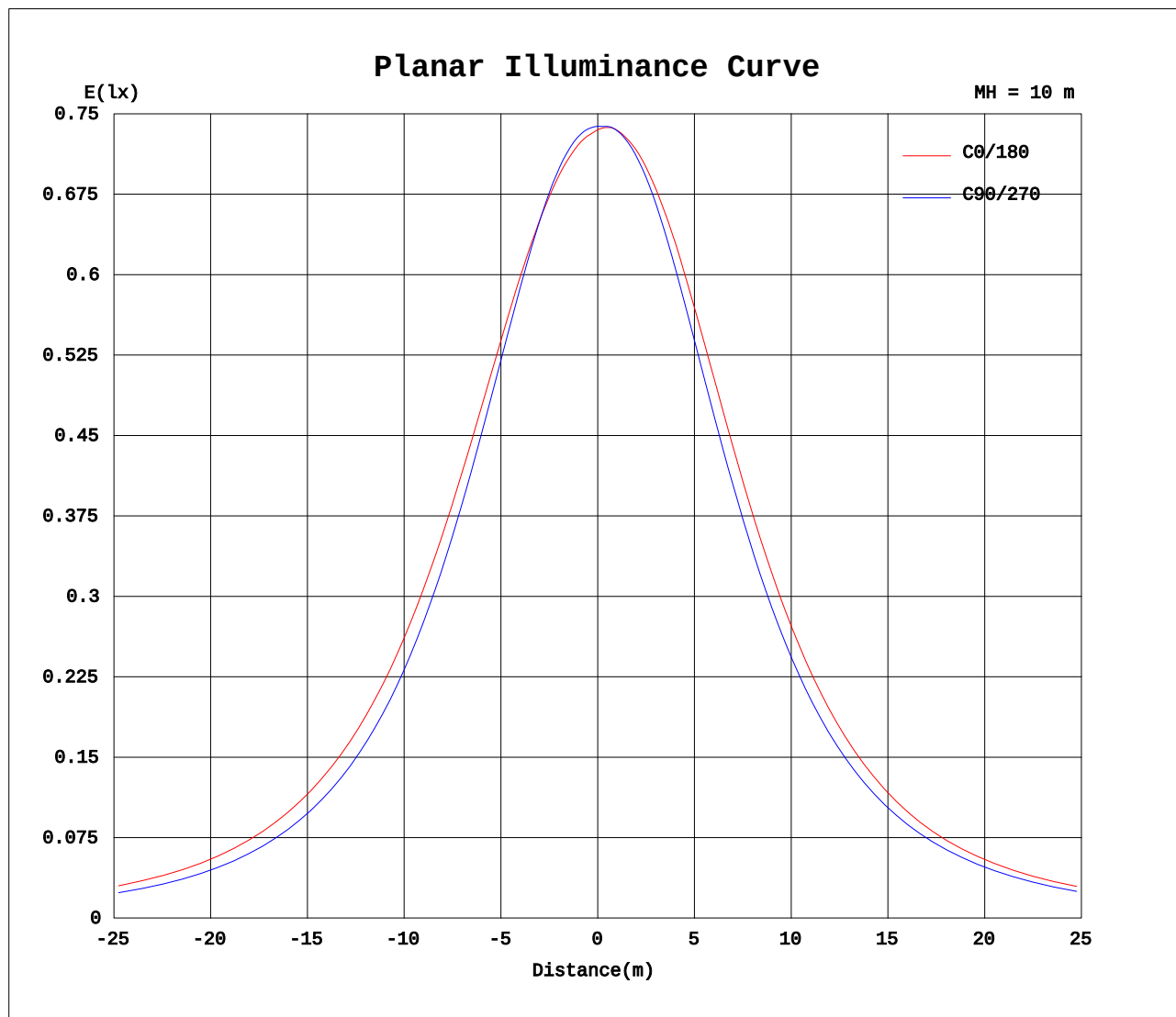
AvgL	cd/m2
L_0~180(65)av	1414
L_0~180(75)av	1986
L_0~180(85)av	6262
L_90~270(65)av	1180
L_90~270(75)av	1442
L_90~270(85)av	2674
L_45(65)av	1351
L_45(75)av	1800
L_45(85)av	4275

Standard: GB/T 29293-2012

C Range: 0 - 360DEG
C Interval: 15.0DEG
Test Speed: HIGH
Temperature:25.3DEG
Operators:
Test Date:2025-06-18

γ Range: 0 - 180DEG
γ Interval: 1.0DEG
γ Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
Humidity:65.0%
Test Distance:7.500m [K=1.0000]
Remarks:

Planar Illuminance Curve



C Range: 0 - 360DEG
C Interval: 15.0DEG
Test Speed: HIGH
Temperature: 25.3DEG
Operators:
Test Date: 2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
Test System: EVERFINE G0-2000A_V1 SYSTEM V2.0.291
Humidity: 65.0%
Test Distance: 7.500m [K=1.0000]
Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm		
NAME:ASD-LWS12-8D10AC-BK	TYPE:LED	WEIGHT:
SPEC.:5000K	DIM.:	SERIAL No.:
MFR.:ASD Lighting Corp	SUR.:	PROTECTION ANGLE:

Table--1

UNIT: cd

C(°) γ (°)	0	15	30	45	60	75	90	105	120	135	150	165	180	195	210	225	240	255	270
0	73.5	73.6	73.7	73.9	73.9	73.9	73.8	73.9	73.9	73.9	72.2	72.6	73.5	73.6	73.7	73.9	73.9	73.9	73.8
5	73.2	73.2	73.3	73.4	73.6	73.8	73.9	74.2	74.4	74.6	72.7	73.4	74.4	74.4	74.4	74.8	74.8	74.6	74.4
10	73.4	73.4	73.4	73.4	73.4	73.7	74.1	74.6	75.1	75.6	73.5	74.4	75.6	75.8	75.9	76.2	76.0	75.6	75.2
15	73.8	73.8	73.7	73.6	73.5	73.6	74.1	74.7	75.4	76.3	74.4	75.3	77.0	77.2	77.4	77.6	77.1	76.4	75.8
20	74.5	74.3	74.2	73.9	73.6	73.4	73.7	74.5	75.6	76.9	74.8	76.1	78.3	78.6	78.7	78.7	78.0	76.9	75.9
25	75.1	75.0	74.6	74.2	73.5	73.0	73.0	73.9	75.4	77.0	74.9	76.6	79.3	79.8	79.8	79.5	78.3	76.8	75.5
30	75.6	75.5	75.0	74.3	73.2	72.2	71.9	72.9	74.5	76.6	74.3	76.4	79.9	80.5	80.2	79.5	78.0	76.2	74.7
35	75.7	75.6	75.0	74.1	72.5	71.0	70.3	71.2	73.1	75.6	72.7	75.4	79.8	80.5	80.0	78.9	77.1	75.0	73.4
40	75.1	75.1	74.5	73.6	71.3	69.3	68.2	69.0	70.9	73.6	70.0	73.2	78.9	79.5	78.9	77.4	75.3	73.1	71.4
45	73.9	74.0	73.3	72.3	69.5	67.1	65.5	66.1	68.0	70.8	66.0	69.7	77.0	77.6	76.8	75.0	72.8	70.4	68.8
50	71.8	72.2	71.4	70.4	67.2	64.3	62.3	62.5	64.3	67.2	63.0	64.6	74.0	74.5	73.7	71.5	69.5	67.1	65.5
55	68.7	69.4	68.7	67.8	64.1	60.8	58.3	58.3	60.0	62.8	61.0	58.0	69.8	70.4	69.6	67.3	65.3	63.0	61.5
60	64.6	65.6	65.1	64.3	60.4	56.6	53.6	53.3	54.9	57.8	55.9	57.4	64.6	65.3	64.5	62.3	60.4	58.2	56.9
65	60.0	61.3	60.9	60.1	56.0	51.8	48.4	47.7	49.2	52.1	50.1	53.7	59.5	60.2	59.3	57.0	55.0	52.7	51.4
70	55.7	57.0	56.4	55.5	50.9	46.6	42.9	42.2	43.4	46.2	44.8	50.0	54.4	55.2	54.2	51.7	48.9	46.3	44.9
75	51.8	53.0	52.0	50.6	45.5	40.6	35.8	34.7	36.7	40.5	43.0	47.7	51.0	51.6	50.1	46.8	42.8	39.8	38.8
80	50.0	50.4	48.3	45.8	39.5	33.9	29.3	28.2	29.7	34.9	44.6	50.9	51.6	51.6	48.0	43.0	36.9	33.4	32.6
85	51.7	50.3	46.2	41.7	33.6	27.3	22.7	21.3	23.3	30.1	47.5	56.3	57.5	55.6	48.4	40.5	31.2	26.4	23.9
90	54.6	51.2	44.8	38.3	28.3	21.2	15.2	15.9	22.7	30.6	46.1	54.2	57.9	55.3	47.3	38.9	28.0	19.5	14.1
95	54.8	49.8	43.9	37.3	28.7	23.3	19.4	20.2	26.6	33.4	43.3	47.7	49.2	48.3	44.2	39.4	30.9	21.9	15.9
100	44.7	35.4	31.7	30.9	30.8	28.0	19.3	18.8	26.4	35.4	43.3	46.1	45.4	45.9	43.6	40.8	34.3	23.8	17.1
105	30.9	21.8	14.3	15.3	20.7	23.0	19.0	18.9	21.2	34.5	44.3	47.3	46.1	46.4	44.1	42.0	33.8	23.7	20.1
110	36.1	23.5	16.6	5.47	8.21	12.3	12.6	12.9	14.0	28.0	46.2	49.9	48.7	48.2	45.3	40.3	26.0	19.8	17.9
115	43.1	37.3	28.4	18.2	7.26	3.65	4.45	5.44	10.2	21.0	46.4	52.5	51.4	48.3	41.4	30.2	17.6	15.5	13.1
120	55.4	47.6	35.2	26.3	16.5	10.2	7.67	7.39	12.0	18.1	35.7	48.4	48.7	39.9	31.5	22.9	14.3	9.92	7.86
125	57.0	42.2	22.0	12.2	16.9	17.9	15.3	13.4	14.8	17.8	26.3	34.8	35.3	29.0	24.1	19.2	14.3	8.62	5.98
130	22.9	17.0	11.3	15.7	12.7	13.7	13.6	12.0	15.0	16.6	20.9	25.7	25.7	22.3	20.1	19.3	15.2	11.1	8.80
135	18.9	25.0	26.4	21.7	15.2	8.43	10.7	9.52	12.4	16.9	22.5	23.8	22.8	20.9	20.7	19.1	16.3	13.2	11.7
140	28.6	29.4	29.6	25.5	13.9	8.73	9.72	7.93	11.0	16.9	23.7	25.7	25.5	23.0	20.8	17.7	16.5	12.7	13.9
145	30.1	32.7	28.5	18.2	7.40	8.84	10.1	8.26	8.95	15.3	19.6	24.7	24.8	20.9	16.7	15.2	13.4	11.7	13.0
150	18.7	15.3	11.7	9.08	3.07	5.66	6.82	7.34	5.62	10.9	15.8	18.3	18.7	16.5	14.6	12.9	8.99	8.53	10.9
155	5.93	4.88	3.35	3.35	5.30	6.59	4.87	6.91	4.06	8.63	16.1	17.5	17.9	15.3	13.3	10.2	5.04	5.83	7.37
160	6.11	6.44	7.23	7.44	10.3	7.79	5.44	7.02	4.95	5.49	12.4	13.4	16.0	13.0	11.0	7.52	4.43	5.49	5.55
165	6.79	6.86	7.92	9.64	10.8	7.19	6.28	6.37	5.05	3.57	6.25	6.40	9.20	7.93	6.23	4.74	5.01	7.10	6.14
170	3.25	2.30	2.91	4.56	6.26	6.18	5.08	4.33	3.13	2.26	2.86	3.17	4.00	3.63	3.46	3.98	5.16	5.60	5.14
175	3.44	3.74	4.19	4.31	4.82	4.69	4.44	4.02	3.52	2.81	1.80	1.93	2.28	2.09	2.37	2.96	3.60	3.88	3.93
180	3.15	3.25	3.60	3.94	4.01	4.00	4.04	4.06	4.11	4.17	3.81	3.82	3.14	3.27	3.59	3.93	3.99	3.98	4.02

C Range: 0 - 360DEG
 C Interval: 15.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
 Humidity:65.0%
 Test Distance:7.500m [K=1.0000]
 Remarks:

LUMINOUS DISTRIBUTION INTENSITY DATA

Test:U:120.0V I:0.0759A P:8.909W PF:0.9773 Lamp Flux:610x1 lm		
NAME:ASD-LWS12-8D10AC-BK	TYPE:LED	WEIGHT:
SPEC.:5000K	DIM.:	SERIAL No.:
MFR.:ASD Lighting Corp	SUR.:	PROTECTION ANGLE:

Table--2

UNIT: cd

C(DEG) γ (DEG)	285	300	315	330	345													
0	73.9	73.9	73.9	72.2	72.6													
5	74.2	74.0	73.7	72.3	72.4													
10	74.7	74.3	73.9	72.8	72.7													
15	75.1	74.6	74.3	73.3	73.2													
20	75.1	74.6	74.6	74.2	74.0													
25	74.6	74.5	74.8	74.8	74.8													
30	73.8	73.9	74.8	75.4	75.4													
35	72.5	73.1	74.3	75.5	75.7													
40	70.7	71.6	73.5	75.1	75.6													
45	68.4	69.7	71.9	74.1	75.0													
50	65.3	67.2	69.9	72.5	73.2													
55	61.7	63.9	67.0	70.0	70.9													
60	57.3	60.2	63.5	66.8	67.6													
65	51.9	55.5	59.2	62.6	63.4													
70	45.9	50.2	54.1	58.3	59.1													
75	39.6	43.9	48.4	54.2	55.2													
80	33.9	37.5	42.4	50.7	52.4													
85	26.2	30.6	36.7	48.7	52.5													
90	16.3	23.3	32.2	48.3	55.4													
95	16.7	22.1	30.3	47.3	55.7													
100	20.6	27.1	33.0	35.2	43.7													
105	20.9	28.8	25.9	17.1	26.9													
110	17.6	19.8	15.6	11.7	27.2													
115	12.4	11.7	7.67	24.4	36.2													
120	7.72	6.23	9.86	32.6	47.3													
125	6.98	9.77	14.0	26.2	50.9													
130	10.2	13.6	15.9	11.9	21.0													
135	12.9	14.2	15.0	17.8	17.7													
140	13.7	12.1	16.4	21.3	20.6													
145	13.0	11.0	10.7	27.9	28.4													
150	10.6	8.02	4.61	12.2	18.5													
155	5.85	4.01	2.80	5.27	6.50													
160	2.95	5.47	6.80	4.16	5.29													
165	4.75	6.80	10.2	9.30	8.10													
170	4.48	5.19	7.32	5.90	4.39													
175	4.18	4.68	5.23	4.30	3.38													
180	4.08	4.10	4.19	3.78	3.81													

C Range: 0 - 360DEG
 C Interval: 15.0DEG
 Test Speed: HIGH
 Temperature:25.3DEG
 Operators:
 Test Date:2025-06-18

γ Range: 0 - 180DEG
 γ Interval: 1.0DEG
 Test System:EVERFINE G0-2000A_V1 SYSTEM V2.0.291
 Humidity:65.0%
 Test Distance:7.500m [K=1.0000]
 Remarks: