



IES INDOOR REPORT

PHOTOMETRIC FILENAME : 75R-4-L85-840-DIM-UNV_.IES

DESCRIPTION INFORMATION (From Photometric File)

IESNA:LM-63-2002

[TEST] GEN FROM BALLABS TEST NO. 19750.0

[TESTLAB] BUILDING ACOUSTICS & LIGHTING LABORATORIES, INC

[ISSUEDATE] 12-10-2021

[MANUFAC] WILLIAMS INDOOR

[OTHER] H.E. WILLIAMS, INC - CARTHAGE, MO

[LUMINAIRE] 2-56 LED 22"ARRAYS 4'SURFACE MOUNT LED STRIP

[MORE] WHITE REFLECTOR w/FROSTED ACRYLIC ROUND LENS

[LUMCAT] 75R-4-L85-840-DIM-UNV

[LAMPCAT] HLM 80 CRI 4000K CCT

[_SEARCH_SOURCETYPE] LED

[_SEARCH_APPLICATION] Indoor, Commercial, Industrial, Manufacturing, Utility, Warehouse, Linear

[_SEARCH_MOUNTING] Surface, Suspended

CHARACTERISTICS

Lumens Per Lamp	N.A. (absolute)
Total Lamp Lumens	N.A. (absolute)
Luminaire Lumens	8340
Total Luminaire Efficiency	N.A.
Luminaire Efficacy Rating (LER)	148
Total Luminaire Watts	56.2
Ballast Factor	1.00
CIE Type	Direct
Spacing Criterion (0-180)	1.22
Spacing Criterion (90-270)	1.28
Spacing Criterion (Diagonal)	1.36
Basic Luminous Shape	Rectangular w/Sides
Luminous Length (0-180)	3.72 ft
Luminous Width (90-270)	0.21 ft
Luminous Height	0.10 ft



LUMINANCE DATA (cd/sq.m)

Angle In Degrees	Average 0-Deg	Average 45-Deg	Average 90-Deg
45	29168	24663	24619
55	24073	21106	21673
65	19826	17728	18258
75	13396	14567	14960
85	7861	12512	12267

IES INDOOR REPORT
PHOTOMETRIC FILENAME : 75R-4-L85-840-DIM-UNV_.IES

CANDELA TABULATION

	<u>0.0</u>	<u>22.5</u>	<u>45.0</u>	<u>67.5</u>	<u>90.0</u>
0	2671.498	2671.498	2671.498	2671.498	2671.498
5	2700.827	2661.296	2662.572	2656.196	2629.417
10	2656.196	2623.041	2629.417	2625.591	2601.363
15	2578.410	2554.181	2572.034	2579.685	2554.181
20	2461.093	2454.718	2485.322	2498.074	2482.771
25	2323.374	2332.300	2375.657	2404.986	2393.509
30	2165.252	2178.004	2251.964	2296.595	2294.045
35	1972.700	1995.654	2102.768	2165.252	2174.178
40	1767.397	1783.974	1919.143	2013.506	2035.184
45	1525.113	1567.194	1722.765	1847.733	1878.337
50	1273.903	1341.487	1531.489	1667.933	1706.188
55	1032.894	1120.881	1335.111	1477.931	1532.764
60	831.416	913.027	1146.385	1289.205	1346.588
65	638.864	728.127	970.410	1100.479	1150.211
70	447.587	567.454	803.362	916.853	965.310
75	275.438	428.460	649.066	756.181	798.261
80	153.021	295.841	517.722	617.186	643.965
85	65.034	204.028	413.158	498.595	516.447
90	8.926	140.270	320.070	395.305	419.534
95	1.275	95.638	256.311	313.694	339.197
100	0.000	62.484	198.928	256.311	276.714
105	0.000	44.631	154.297	209.129	225.706
110	0.000	30.604	118.592	170.874	184.901
115	0.000	25.504	96.914	142.820	153.021
120	0.000	19.128	73.960	117.316	127.518
125	0.000	11.477	54.833	93.088	104.565
130	0.000	7.651	39.531	72.685	82.887
135	0.000	3.826	29.329	57.383	65.034
140	0.000	3.826	20.403	44.631	51.007
145	0.000	0.000	12.752	28.054	35.705
150	0.000	0.000	8.926	20.403	25.504
155	0.000	0.000	6.376	10.201	16.577
160	0.000	0.000	2.550	7.651	8.926
165	0.000	0.000	0.000	2.550	3.826
170	0.000	0.000	0.000	0.000	0.000
175	0.000	0.000	0.000	0.000	0.000
180	0.000	0.000	0.000	0.000	0.000

IES INDOOR REPORT
PHOTOMETRIC FILENAME : 75R-4-L85-840-DIM-UNV_.IES

ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixt
0-20	976.89	N.A.	11.70
0-30	2068.09	N.A.	24.80
0-40	3370.23	N.A.	40.40
0-60	5858.91	N.A.	70.20
0-80	7407.93	N.A.	88.80
0-90	7797.25	N.A.	93.50
10-90	7544.33	N.A.	90.50
20-40	2393.33	N.A.	28.70
20-50	3712.72	N.A.	44.50
40-70	3406.2	N.A.	40.80
60-80	1549.01	N.A.	18.60
70-80	631.50	N.A.	7.60
80-90	389.32	N.A.	4.70
90-110	371.53	N.A.	4.50
90-120	456.71	N.A.	5.50
90-130	505.06	N.A.	6.10
90-150	539.58	N.A.	6.50
90-180	543.20	N.A.	6.50
110-180	171.66	N.A.	2.10
0-180	8340.44	N.A.	100.00

Total Luminaire Efficiency = N.A. %

ZONAL LUMEN SUMMARY

Zone	Lumens
0-10	252.92
10-20	723.97
20-30	1091.2
30-40	1302.13
40-50	1319.38
50-60	1169.3
60-70	917.52
70-80	631.50
80-90	389.32
90-100	231.80
100-110	139.73
110-120	85.18
120-130	48.35
130-140	24.43
140-150	10.09
150-160	3.15
160-170	0.46
170-180	0.00

IES INDOOR REPORT
PHOTOMETRIC FILENAME : 75R-4-L85-840-DIM-UNV_.IES

COEFFICIENTS OF UTILIZATION - ZONAL CAVITY METHOD

Effective Floor Cavity Reflectance 0.20

RC	80				70				50			30			10			0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
0	118	118	118	118	114	114	114	114	107	107	107	102	102	102	96	96	96	93
1	106	101	96	92	103	98	94	90	92	89	86	87	84	82	83	80	78	76
2	96	87	80	74	93	85	78	73	80	75	70	76	72	68	72	68	65	62
3	88	77	68	61	84	75	67	61	71	64	59	67	61	57	64	59	55	52
4	80	68	59	52	77	66	58	51	63	56	50	60	53	48	57	51	47	45
5	74	61	51	45	71	59	51	44	56	49	43	54	47	42	51	45	41	39
6	68	55	46	39	66	53	45	39	51	43	38	48	42	37	46	41	36	34
7	63	49	41	34	61	48	40	34	46	39	33	44	38	33	42	36	32	30
8	59	45	37	31	57	44	36	30	42	35	30	41	34	29	39	33	29	27
9	55	41	33	28	53	41	33	27	39	32	27	37	31	26	36	30	26	24
10	51	38	30	25	50	37	30	25	36	29	24	35	28	24	33	28	24	22

IES INDOOR REPORT
PHOTOMETRIC FILENAME : 75R-4-L85-840-DIM-UNV_.IES

UGR TABLE - CORRECTED

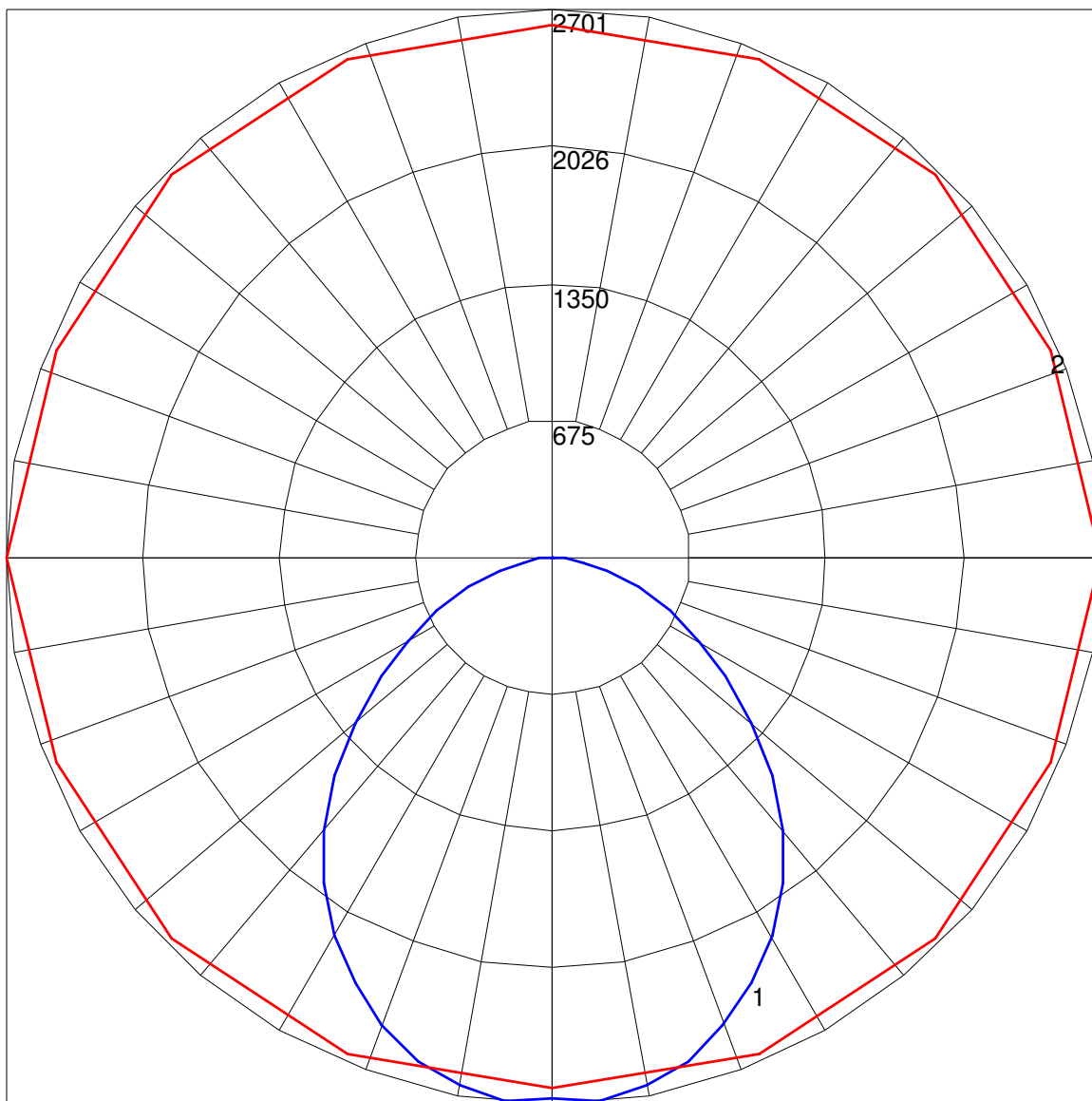
Reflectances

Ceiling Cavity	70	70	50	50	30	70	70	50	50	30
Walls	50	30	50	30	30	50	30	50	30	30
Floor Cavity	20	20	20	20	20	20	20	20	20	20

Room Size		UGR Viewed Crosswise					UGR Viewed Endwise				
X=2H	Y=2H	20.2	21.7	20.6	22.1	22.6	23.6	25.1	24.0	25.5	26.0
	3H	21.4	22.7	21.8	23.2	23.7	25.8	27.1	26.2	27.6	28.1
	4H	21.7	23.0	22.2	23.5	24.0	26.8	28.1	27.3	28.6	29.1
	6H	21.9	23.1	22.4	23.6	24.1	27.8	29.0	28.4	29.5	30.1
	8H	21.9	23.0	22.4	23.6	24.1	28.4	29.5	28.9	30.0	30.6
	12H	21.9	23.0	22.4	23.5	24.1	28.9	30.0	29.5	30.5	31.1
4H	2H	21.2	22.5	21.7	23.0	23.5	23.9	25.2	24.4	25.7	26.2
	3H	22.7	23.8	23.2	24.3	24.8	26.3	27.4	26.8	27.9	28.5
	4H	23.1	24.1	23.7	24.7	25.3	27.5	28.5	28.0	29.0	29.6
	6H	23.4	24.3	24.0	24.8	25.5	28.7	29.6	29.3	30.2	30.8
	8H	23.5	24.3	24.0	24.9	25.5	29.3	30.2	29.9	30.7	31.3
	12H	23.5	24.2	24.1	24.8	25.5	30.0	30.8	30.6	31.4	32.0
8H	4H	23.9	24.7	24.5	25.3	25.9	27.7	28.5	28.2	29.0	29.7
	6H	24.4	25.1	25.0	25.7	26.3	29.0	29.7	29.6	30.3	30.9
	8H	24.5	25.1	25.1	25.8	26.4	29.8	30.4	30.4	31.0	31.7
	12H	24.6	25.2	25.2	25.8	26.5	30.6	31.2	31.2	31.8	32.5
12H	4H	24.1	24.8	24.7	25.4	26.1	27.6	28.4	28.2	29.0	29.6
	6H	24.7	25.3	25.3	25.9	26.6	29.1	29.7	29.7	30.3	31.0
	8H	24.9	25.5	25.5	26.1	26.8	29.8	30.4	30.5	31.0	31.7

Maximum UGR = 32.5

POLAR GRAPH



Maximum Candela = 2700.827 Located At Horizontal Angle = 0, Vertical Angle = 5
1 - Vertical Plane Through Horizontal Angles (0 - 180) (Through Max. Cd.)
2 - Horizontal Cone Through Vertical Angle (5) (Through Max. Cd.)