

IES INDOOR REPORT

PHOTOMETRIC FILENAME : 6RCD-LS-9CS-SS-DIM-UNV-12W-5000K_.IES

DESCRIPTION INFORMATION (From Photometric File)

IESNA:LM-63-2002

[TEST] GEN from UL #15006535.01

[TESTLAB] UL Verification Services Inc.

[ISSUE DATE] 17 NOV, 2023

[TEST DATE] 10/18/2023

[MANUFAC] H E Williams Inc

[LUMCAT] 6RCD-LS-9CS-SS-DIM-UNV-12W-5000k

[LUMINAIRE] Round housing with semi-specular reflector and frosted lens

[LAMP] White LEDs

[BALLAST] LED Driver

[OTHER] 24.7 C, 119.991 V, 0.1494 A, 17.765 W, 0.99098 PF, 59.971 Hz

[OTHER] This test was performed using the calibrated photodetector met

[MORE] hod of absolute photometry.

[OTHER] The reported results were measured in a facility that meets th

[MORE] e requirements of ANSI/IES LM-75-19. The device under test emits no de

[MORE] tectable uplight as defined by ANSI/IES LM-75-19.

CHARACTERISTICS

Lumens Per Lamp	N.A. (absolute)
Total Lamp Lumens	N.A. (absolute)
Luminaire Lumens	1071
Total Luminaire Efficiency	N.A.
Luminaire Efficacy Rating (LER)	102
Total Luminaire Watts	10.54
Ballast Factor	1.00
CIE Type	Direct
Spacing Criterion (0-180)	0.94
Spacing Criterion (90-270)	0.94
Spacing Criterion (Diagonal)	1.00
Basic Luminous Shape	Circular
Luminous Length (0-180)	0.50 ft (Diameter)
Luminous Width (90-270)	0.50 ft (Diameter)
Luminous Height	0.00 ft

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LUMINANCE DATA (cd/sq.m)

Angle In Degrees	Average 0-Deg	Average 45-Deg	Average 90-Deg
45	17061	17061	17061
55	7987	7987	7987
65	1047	1047	1047
75	211	211	211
85	174	174	174

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CANDELA TABULATION

	<u>0</u>
0.0	873.007
0.5	873.007
1.0	872.454
1.5	871.900
2.0	870.239
2.5	869.132
3.0	868.025
3.5	865.811
4.0	864.150
4.5	861.382
5.0	859.168
5.5	856.400
6.0	853.078
6.5	849.757
7.0	846.435
7.5	842.560
8.0	838.685
8.5	834.810
9.0	830.935
9.5	826.506
10.0	822.077
10.5	817.095
11.0	812.113
11.5	807.130
12.0	801.594
12.5	795.505
13.0	789.969
13.5	783.880
14.0	777.237
14.5	770.594
15.0	763.397
15.5	756.200
16.0	749.004
16.5	741.253
17.0	733.503
17.5	725.199
18.0	716.896
18.5	708.038
19.0	699.181
19.5	690.877
20.0	681.466
20.5	672.055
21.0	663.198
21.5	654.340
22.0	645.483
22.5	636.072
23.0	627.214
23.5	618.911
24.0	610.053
24.5	600.642
25.0	591.231
25.5	581.820
26.0	572.409
26.5	562.998

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CANDELA TABULATION - (Cont.)

27.0	553.366
27.5	543.567
28.0	533.769
28.5	523.915
29.0	514.117
29.5	504.484
30.0	494.852
30.5	485.053
31.0	475.199
31.5	465.456
32.0	455.436
32.5	445.749
33.0	436.116
33.5	426.539
34.0	416.464
34.5	406.831
35.0	397.088
35.5	387.456
36.0	377.713
36.5	368.136
37.0	358.503
37.5	348.981
38.0	339.515
38.5	330.713
39.0	322.188
39.5	313.275
40.0	304.307
40.5	295.339
41.0	286.481
41.5	277.790
42.0	269.210
42.5	260.906
43.0	252.657
43.5	244.353
44.0	236.216
44.5	228.189
45.0	220.272
45.5	212.467
46.0	204.827
46.5	197.354
47.0	189.880
47.5	182.462
48.0	175.266
48.5	168.014
49.0	160.872
49.5	153.897
50.0	147.033
50.5	140.279
51.0	133.581
51.5	126.938
52.0	120.405
52.5	113.984
53.0	107.728
53.5	101.583
54.0	95.549
54.5	89.515

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CANDELA TABULATION - (Cont.)

55.0	83.647
55.5	78.000
56.0	72.465
56.5	67.095
57.0	61.836
57.5	56.743
58.0	51.816
58.5	47.166
59.0	42.682
59.5	38.474
60.0	34.488
60.5	30.724
61.0	27.236
61.5	24.026
62.0	21.036
62.5	18.324
63.0	15.833
63.5	13.563
64.0	11.515
64.5	9.688
65.0	8.082
65.5	6.698
66.0	5.481
66.5	4.429
67.0	3.598
67.5	2.768
68.0	2.104
68.5	1.716
69.0	1.661
69.5	1.605
70.0	1.550
70.5	1.439
71.0	1.384
71.5	1.329
72.0	1.273
72.5	1.273
73.0	1.218
73.5	1.163
74.0	1.107
74.5	1.052
75.0	0.996
75.5	0.941
76.0	0.941
76.5	0.886
77.0	0.830
77.5	0.775
78.0	0.775
78.5	0.720
79.0	0.664
79.5	0.664
80.0	0.609
80.5	0.554
81.0	0.554
81.5	0.498
82.0	0.443
82.5	0.443

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CANDELA TABULATION - (Cont.)

83.0	0.388
83.5	0.388
84.0	0.332
84.5	0.332
85.0	0.277
85.5	0.221
86.0	0.221
86.5	0.166
87.0	0.166
87.5	0.111
88.0	0.111
88.5	0.055
89.0	0.055
89.5	0.000
90.0	0.000
90.5	0.000
91.0	0.000
91.5	0.000
92.0	0.000
92.5	0.000
93.0	0.000
93.5	0.000
94.0	0.000
94.5	0.000
95.0	0.000
95.5	0.000
96.0	0.000
96.5	0.000
97.0	0.000
97.5	0.000
98.0	0.000
98.5	0.000
99.0	0.000
99.5	0.000
100.0	0.000
100.5	0.000
101.0	0.000
101.5	0.000
102.0	0.000
102.5	0.000
103.0	0.000
103.5	0.000
104.0	0.000
104.5	0.000
105.0	0.000
105.5	0.000
106.0	0.000
106.5	0.000
107.0	0.000
107.5	0.000
108.0	0.000
108.5	0.000
109.0	0.000
109.5	0.000
110.0	0.000
110.5	0.000

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CANDELA TABULATION - (Cont.)

111.0	0.000
111.5	0.000
112.0	0.000
112.5	0.000
113.0	0.000
113.5	0.000
114.0	0.000
114.5	0.000
115.0	0.000
115.5	0.000
116.0	0.000
116.5	0.000
117.0	0.000
117.5	0.000
118.0	0.000
118.5	0.000
119.0	0.000
119.5	0.000
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121.0	0.000
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124.0	0.000
124.5	0.000
125.0	0.000
125.5	0.000
126.0	0.000
126.5	0.000
127.0	0.000
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128.0	0.000
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131.0	0.000
131.5	0.000
132.0	0.000
132.5	0.000
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133.5	0.000
134.0	0.000
134.5	0.000
135.0	0.000
135.5	0.000
136.0	0.000
136.5	0.000
137.0	0.000
137.5	0.000
138.0	0.000
138.5	0.000

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CANDELA TABULATION - (Cont.)

139.0	0.000
139.5	0.000
140.0	0.000
140.5	0.000
141.0	0.000
141.5	0.000
142.0	0.000
142.5	0.000
143.0	0.000
143.5	0.000
144.0	0.000
144.5	0.000
145.0	0.000
145.5	0.000
146.0	0.000
146.5	0.000
147.0	0.000
147.5	0.000
148.0	0.000
148.5	0.000
149.0	0.000
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150.0	0.000
150.5	0.000
151.0	0.000
151.5	0.000
152.0	0.000
152.5	0.000
153.0	0.000
153.5	0.000
154.0	0.000
154.5	0.000
155.0	0.000
155.5	0.000
156.0	0.000
156.5	0.000
157.0	0.000
157.5	0.000
158.0	0.000
158.5	0.000
159.0	0.000
159.5	0.000
160.0	0.000
160.5	0.000
161.0	0.000
161.5	0.000
162.0	0.000
162.5	0.000
163.0	0.000
163.5	0.000
164.0	0.000
164.5	0.000
165.0	0.000
165.5	0.000
166.0	0.000
166.5	0.000

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CANDELA TABULATION - (Cont.)

167.0	0.000
167.5	0.000
168.0	0.000
168.5	0.000
169.0	0.000
169.5	0.000
170.0	0.000
170.5	0.000
171.0	0.000
171.5	0.000
172.0	0.000
172.5	0.000
173.0	0.000
173.5	0.000
174.0	0.000
174.5	0.000
175.0	0.000
175.5	0.000
176.0	0.000
176.5	0.000
177.0	0.000
177.5	0.000
178.0	0.000
178.5	0.000
179.0	0.000
179.5	0.000
180.0	0.000

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ZONAL LUMEN SUMMARY

Zone	Lumens	%Lamp	%Fixt
0-20	293.93	N.A.	27.50
0-30	564.29	N.A.	52.70
0-40	811.69	N.A.	75.80
0-60	1058.06	N.A.	98.80
0-80	1070.24	N.A.	100.00
0-90	1070.55	N.A.	100.00
10-90	989.75	N.A.	92.50
20-40	517.76	N.A.	48.40
20-50	688.00	N.A.	64.30
40-70	257.47	N.A.	24.10
60-80	12.18	N.A.	1.10
70-80	1.08	N.A.	0.10
80-90	0.31	N.A.	0.00
90-110	0.00	N.A.	0.00
90-120	0.00	N.A.	0.00
90-130	0.00	N.A.	0.00
90-150	0.00	N.A.	0.00
90-180	0.00	N.A.	0.00
110-180	0.00	N.A.	0.00
0-180	1070.55	N.A.	100.00

Total Luminaire Efficiency = N.A. %

ZONAL LUMEN SUMMARY

Zone	Lumens
0-10	80.80
10-20	213.14
20-30	270.36
30-40	247.40
40-50	170.24
50-60	76.13
60-70	11.10
70-80	1.08
80-90	0.31
90-100	0.00
100-110	0.00
110-120	0.00
120-130	0.00
130-140	0.00
140-150	0.00
150-160	0.00
160-170	0.00
170-180	0.00

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COEFFICIENTS OF UTILIZATION - ZONAL CAVITY METHOD

Effective Floor Cavity Reflectance 0.20

RC RW	80				70				50			30			10			0
	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
0	65	65	65	65	63	63	63	63	60	60	60	58	58	58	55	55	55	54
1	61	59	58	56	60	58	57	56	56	55	54	54	53	52	52	51	51	50
2	57	54	52	50	56	53	51	49	52	50	48	50	48	47	48	47	46	45
3	54	50	47	44	53	49	46	44	48	45	43	46	44	42	45	43	42	41
4	51	46	42	40	49	45	42	39	44	41	39	43	40	38	42	40	38	37
5	47	42	38	36	46	42	38	36	41	38	35	40	37	35	39	36	35	34
6	45	39	35	33	44	38	35	32	38	34	32	37	34	32	36	34	32	31
7	42	36	32	30	41	36	32	30	35	32	29	34	31	29	34	31	29	28
8	39	34	30	27	39	33	30	27	33	29	27	32	29	27	31	29	27	26
9	37	31	28	25	37	31	28	25	30	27	25	30	27	25	29	27	25	24
10	35	29	26	23	35	29	26	23	29	25	23	28	25	23	28	25	23	22

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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

X=2H	Y=2H	16.0	17.2	16.4	17.5	17.8	UGR Viewed Endwise	16.0	17.2	16.4	17.5	17.8
	3H	15.9	16.9	16.2	17.2	17.6		15.9	16.9	16.2	17.2	17.6
	4H	15.8	16.8	16.2	17.1	17.5		15.8	16.8	16.2	17.1	17.5
	6H	15.7	16.6	16.1	17.0	17.4		15.7	16.6	16.1	17.0	17.4
	8H	15.7	16.5	16.1	16.9	17.3		15.7	16.5	16.1	16.9	17.3
	12H	15.6	16.4	16.0	16.8	17.2		15.6	16.4	16.0	16.8	17.2

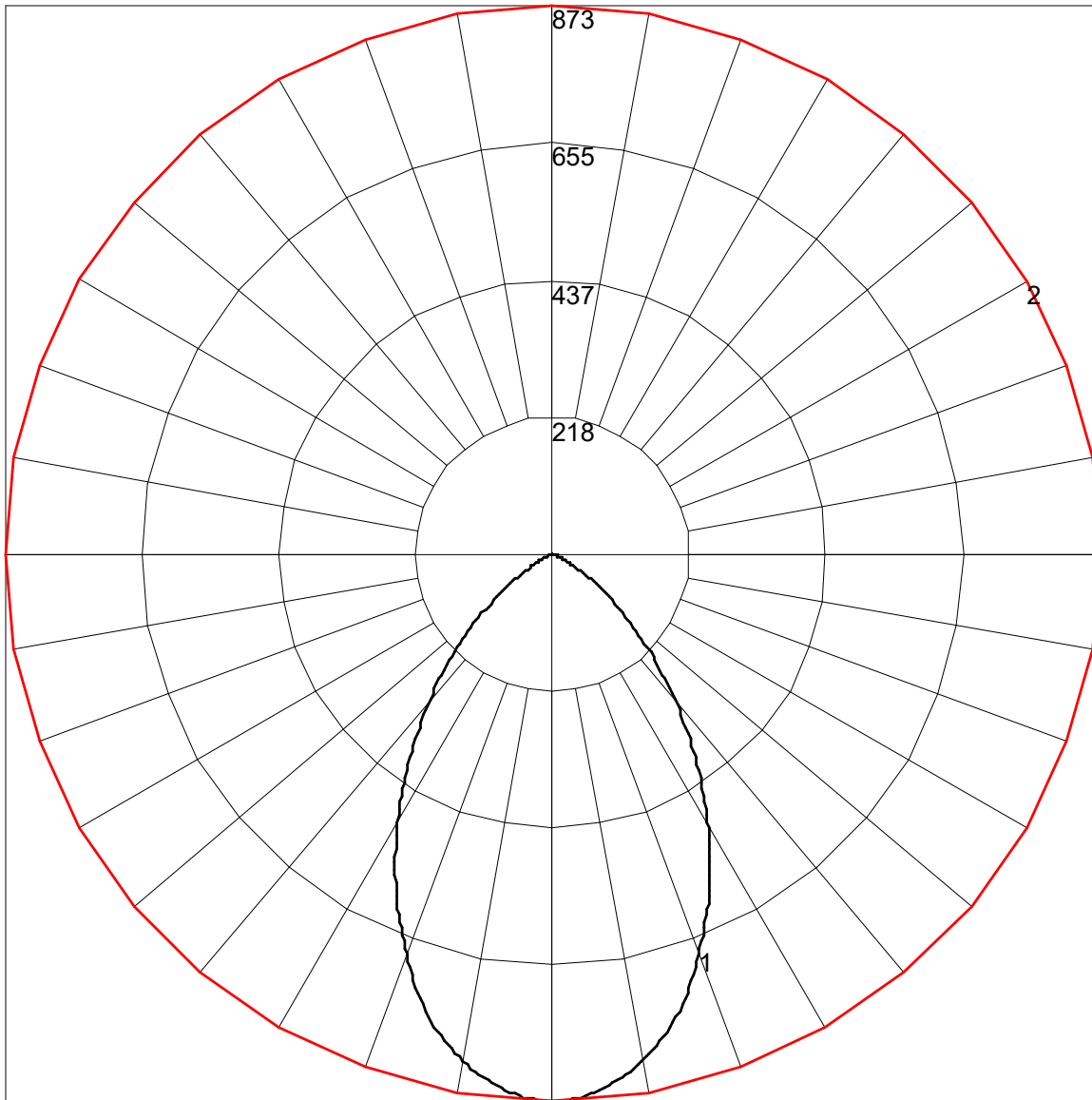
4H	2H	15.8	16.8	16.2	17.1	17.5	15.8	16.8	16.2	17.1	17.5
	3H	15.7	16.4	16.1	16.8	17.3	15.7	16.4	16.1	16.8	17.3
	4H	15.6	16.3	16.0	16.7	17.1	15.6	16.3	16.0	16.7	17.1
	6H	15.5	16.1	15.9	16.5	17.0	15.5	16.1	15.9	16.5	17.0
	8H	15.4	16.0	15.9	16.4	16.9	15.4	16.0	15.9	16.4	16.9
	12H	15.4	15.8	15.8	16.3	16.8	15.4	15.8	15.8	16.3	16.8

8H	4H	15.4	16.0	15.9	16.4	16.9	15.4	16.0	15.9	16.4	16.9
	6H	15.3	15.7	15.8	16.2	16.7	15.3	15.7	15.8	16.2	16.7
	8H	15.2	15.6	15.8	16.2	16.7	15.2	15.6	15.8	16.2	16.7
	12H	15.2	15.5	15.7	16.0	16.6	15.2	15.5	15.7	16.0	16.6

12H	4H	15.4	15.8	15.8	16.3	16.8	15.4	15.8	15.8	16.3	16.8
	6H	15.2	15.6	15.8	16.1	16.7	15.2	15.6	15.8	16.1	16.7
	8H	15.2	15.5	15.7	16.0	16.6	15.2	15.5	15.7	16.0	16.6

Maximum UGR = 17.8

POLAR GRAPH



Maximum Candela = 873.007 Located At Horizontal Angle = 0, Vertical Angle = 0
1 - Vertical Plane Through Horizontal Angles (90 - 270)
2 - Horizontal Cone Through Vertical Angle (0) (Through Max. Cd.)