

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: CORELITE

Report Number: P257049

Luminaire Tested: **HGL-S-UF-80L830-UNV-4**

Issue Date: 3/3/2020

Test Information

Test Method: LM-79-08
Report Number: P257049
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1708-204-13)
Test Lab: INNOVATION CENTER(G2)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: CORELITE
Catalog Number: HGL-S-UF-80L830-UNV-4
Description: HUGO 4 FOOT LINEAR LED LUMINAIRE WITH FROSTED LENS WITH UPLIGHT
Light Source: (168) 3000K CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 7924.0 lumens
Efficiency: N/A
Efficacy: 111.8 lumens/watt
Spacing Criteria (0/90/45): 1.19 / 1.32 / 1.4
Luminous Opening: Rectangular w/ Sides (W: 0.23' x L: 4' x H: 0.1')
CIE Type: Semi-Direct

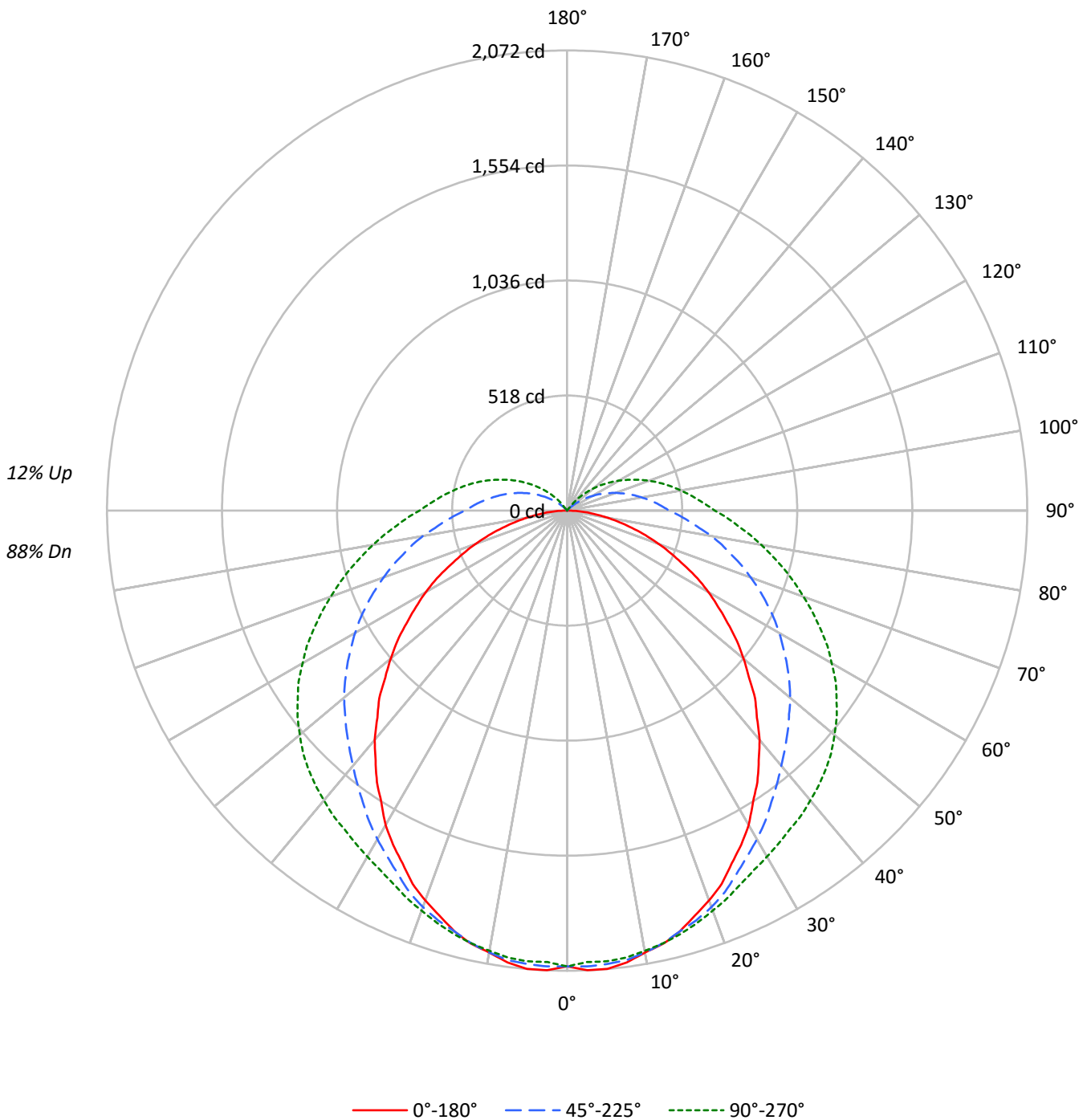
Input Watts (W): 70.9
Input Voltage (V): 120
Input Current (Ain): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20									20									20									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	50	30	10	50	30	10	0														
RCR																																						
0	116	116	116	116	112	112	112	112	105	105	105	98	98	98	91	91	91	88																				
1	103	97	92	87	99	94	89	85	87	84	80	81	78	75	76	73	71	68																				
2	93	84	76	69	89	81	73	67	75	69	64	70	65	61	65	61	58	55																				
3	84	73	64	56	81	70	62	55	65	58	53	61	55	50	57	52	48	45																				
4	77	64	54	47	73	62	53	46	58	50	44	54	48	42	50	45	41	38																				
5	70	57	47	40	67	55	46	39	51	44	38	48	42	36	45	39	35	32																				
6	65	51	42	35	62	49	41	34	46	39	33	43	37	32	41	35	31	28																				
7	60	46	37	31	58	45	36	30	42	34	29	39	33	28	37	31	27	25																				
8	56	42	33	27	54	41	32	27	38	31	26	36	30	25	34	28	24	22																				
9	52	38	30	24	50	37	29	24	35	28	23	33	27	22	31	26	22	20																				
10	49	35	27	22	47	34	27	22	33	26	21	31	25	20	29	24	20	18																				

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	24095	24095	24095
5°	24363	23462	23096
10°	23977	22725	22219
15°	23678	21853	21387
20°	23125	21129	20557
25°	22439	20181	19814
30°	21843	19369	19327
35°	21019	18567	19035
40°	20227	17896	18907
45°	19364	17412	18809
50°	18374	17054	18621
55°	17421	16658	18382
60°	16528	16309	18073
65°	15226	15958	17696
70°	14059	15626	17291
75°	12467	15299	16996
80°	10688	15235	16774
85°	8399	15216	16740



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	194.3	2.5
10°-20°	552.7	7.0
20°-30°	829.2	10.5
30°-40°	1006.8	12.7
40°-50°	1087.4	13.7
50°-60°	1065.0	13.4
60°-70°	944.7	11.9
70°-80°	756.7	9.5
80°-90°	548.4	6.9
90°-100°	386.5	4.9
100°-110°	269.6	3.4
110°-120°	166.9	2.1
120°-130°	84.9	1.1
130°-140°	29.4	0.4
140°-150°	1.4	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	1576.2	19.9
0°-40°	2583.1	32.6
0°-60°	4735.5	59.8
0°-90°	6985.3	88.2
90°-120°	823.0	10.4
90°-150°	938.7	11.8
90°-180°	939.0	11.9
0°-180°	7924.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	2052	2052	2052	2052	2052	
5°	2072	2052	2050	2040	2037	196
15°	1961	1947	1961	1978	1974	552
25°	1753	1758	1804	1834	1853	809
35°	1493	1503	1603	1699	1750	932
45°	1196	1228	1405	1579	1648	919
55°	883	956	1209	1407	1481	791
65°	579	716	993	1184	1258	578
75°	302	493	765	949	1010	322
85°	81	302	552	716	770	87
90°	2	221	458	610	664	6
95°	0	174	400	542	588	0
105°	0	93	287	414	456	0
115°	0	29	181	292	328	0
125°	0	0	88	179	211	0
135°	0	0	15	78	103	1
145°	0	0	0	0	0	0
155°	0	0	0	0	0	0
165°	0	0	0	0	0	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	0



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CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0
2.5°	2071.6	2069.2	2061.8	2054.5	2052.0	2052.0	2049.6	2047.1	2047.1	2044.6	2054.5
5°	2071.6	2069.2	2061.8	2052.0	2049.6	2052.0	2049.6	2044.6	2044.6	2042.2	2049.6
7.5°	2052.0	2047.1	2042.2	2034.8	2032.4	2032.4	2029.9	2029.9	2029.9	2029.9	2042.2
10°	2020.1	2017.7	2012.8	2005.4	2005.4	2003.0	2003.0	2005.4	2005.4	2007.9	2020.1
12.5°	1998.1	1993.2	1985.8	1978.5	1976.0	1976.0	1973.6	1971.1	1973.6	1976.0	1995.6
15°	1961.3	1958.8	1953.9	1946.6	1946.6	1946.6	1946.6	1944.1	1944.1	1946.6	1961.3
17.5°	1912.3	1907.4	1904.9	1900.0	1902.5	1904.9	1907.4	1904.9	1909.8	1917.2	1934.3
20°	1868.1	1863.2	1858.3	1851.0	1851.0	1853.4	1855.9	1855.9	1868.1	1877.9	1900.0
22.5°	1819.1	1816.6	1811.7	1809.3	1809.3	1811.7	1811.7	1806.8	1814.2	1828.9	1858.3
25°	1752.9	1750.5	1748.0	1748.0	1752.9	1757.8	1760.3	1762.7	1770.1	1779.9	1804.4
27.5°	1696.5	1694.1	1689.2	1684.3	1689.2	1694.1	1696.5	1701.4	1716.1	1735.7	1755.4
30°	1635.2	1632.8	1630.3	1630.3	1635.2	1637.7	1640.1	1637.7	1657.3	1686.7	1708.8
32.5°	1556.8	1554.3	1556.8	1556.8	1569.0	1576.4	1581.3	1583.7	1600.9	1627.9	1659.7
35°	1493.0	1493.0	1490.6	1495.5	1497.9	1502.8	1507.7	1520.0	1544.5	1571.5	1603.4
37.5°	1417.0	1417.0	1417.0	1429.3	1439.1	1441.6	1444.0	1458.7	1490.6	1517.6	1551.9
40°	1348.4	1348.4	1348.4	1353.3	1360.6	1368.0	1377.8	1395.0	1426.8	1466.1	1500.4
42.5°	1265.0	1267.5	1272.4	1284.6	1294.5	1299.4	1306.7	1333.7	1368.0	1414.6	1451.4
45°	1196.4	1193.9	1198.8	1208.6	1218.5	1228.3	1240.5	1269.9	1311.6	1363.1	1404.8
47.5°	1110.6	1113.0	1117.9	1135.1	1147.4	1159.6	1174.3	1208.6	1257.7	1309.2	1355.7
50°	1037.0	1039.5	1051.7	1061.5	1073.8	1088.5	1105.7	1149.8	1203.7	1255.2	1311.6
52.5°	963.5	965.9	975.7	983.1	1002.7	1019.9	1041.9	1091.0	1147.4	1203.7	1260.1
55°	882.6	887.5	894.8	912.0	936.5	956.1	980.6	1034.6	1091.0	1152.3	1208.6
57.5°	806.6	809.0	821.3	838.5	867.9	892.4	921.8	978.2	1039.5	1098.3	1154.7
60°	735.5	740.4	747.7	769.8	809.0	833.5	863.0	921.8	985.5	1044.4	1103.2
62.5°	661.9	666.8	676.6	701.2	747.7	774.7	806.6	867.9	931.6	990.5	1049.3
65°	578.6	583.5	598.2	630.1	686.5	715.9	747.7	811.5	872.8	934.1	992.9
67.5°	507.5	509.9	529.5	563.9	622.7	659.5	693.8	755.1	816.4	877.7	936.5
70°	438.8	443.7	458.5	505.0	568.8	598.2	635.0	701.2	762.5	823.7	880.1
72.5°	370.2	375.1	397.2	448.6	514.8	546.7	576.1	647.2	708.5	767.4	823.7
75°	301.5	308.9	338.3	397.2	460.9	492.8	524.6	588.4	654.6	711.0	764.9
77.5°	240.3	247.6	284.4	345.7	409.4	441.3	473.2	534.5	595.7	657.0	713.4
80°	181.4	191.2	235.4	296.6	360.4	392.3	421.7	485.4	544.3	600.6	659.5
82.5°	129.9	142.2	193.7	252.5	316.3	345.7	375.1	436.4	495.2	549.2	600.6
85°	80.9	103.0	154.5	210.8	272.1	301.5	331.0	392.3	448.6	502.6	551.6
87.5°	39.2	68.6	117.7	171.6	230.5	259.9	289.3	348.1	402.1	456.0	505.0
90°	2.5	39.2	83.4	134.8	193.7	220.6	250.1	306.5	360.4	411.9	458.5
92.5°	0.0	24.5	66.2	115.2	169.2	198.6	225.5	281.9	333.4	384.9	429.0
95°	0.0	12.3	51.5	98.1	149.5	174.1	201.0	255.0	306.5	355.5	399.6
97.5°	0.0	2.5	36.8	78.5	127.5	154.5	179.0	230.5	281.9	328.5	370.2
100°	0.0	0.0	24.5	63.7	107.9	132.4	156.9	205.9	255.0	299.1	340.8
102.5°	0.0	0.0	12.3	49.0	90.7	112.8	134.8	183.9	230.5	274.6	313.8
105°	0.0	0.0	2.5	34.3	73.5	93.2	115.2	159.4	205.9	247.6	286.8
107.5°	0.0	0.0	0.0	19.6	56.4	76.0	95.6	137.3	181.4	220.6	257.4
110°	0.0	0.0	0.0	9.8	41.7	58.8	78.5	117.7	156.9	196.1	232.9



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CANDELA DISTRIBUTION (continued):

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
112.5°	0.0	0.0	0.0	2.5	27.0	44.1	61.3	98.1	134.8	171.6	205.9
115°	0.0	0.0	0.0	0.0	14.7	29.4	44.1	78.5	112.8	149.5	181.4
117.5°	0.0	0.0	0.0	0.0	4.9	17.2	29.4	61.3	93.2	125.0	156.9
120°	0.0	0.0	0.0	0.0	0.0	7.4	17.2	44.1	73.5	103.0	132.4
122.5°	0.0	0.0	0.0	0.0	0.0	0.0	4.9	27.0	53.9	83.4	110.3
125°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	14.7	36.8	63.7	88.3
127.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	4.9	22.1	44.1	66.2
130°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	9.8	27.0	46.6
132.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	2.5	14.7	29.4
135°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	4.9	14.7
137.5°	2.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	4.9
140°	2.5	2.5	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
142.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
145°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
147.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
152.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



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CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
0°	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0	2052.0
2.5°	2061.8	2052.0	2052.0	2049.6	2047.1	2044.6	2039.7	2037.3	2032.4	2034.8
5°	2056.9	2047.1	2047.1	2042.2	2039.7	2039.7	2037.3	2037.3	2034.8	2037.3
7.5°	2049.6	2037.3	2037.3	2032.4	2029.9	2027.5	2027.5	2027.5	2027.5	2029.9
10°	2029.9	2022.6	2022.6	2020.1	2017.7	2012.8	2010.3	2012.8	2010.3	2012.8
12.5°	2003.0	1995.6	2000.5	2000.5	2000.5	1995.6	1993.2	1995.6	1993.2	1995.6
15°	1968.6	1966.2	1973.6	1976.0	1978.5	1976.0	1973.6	1973.6	1973.6	1973.6
17.5°	1934.3	1931.9	1941.7	1946.6	1946.6	1946.6	1946.6	1944.1	1944.1	1946.6
20°	1904.9	1895.1	1900.0	1909.8	1912.3	1912.3	1914.7	1917.2	1917.2	1917.2
22.5°	1863.2	1858.3	1860.8	1868.1	1873.0	1875.5	1882.8	1882.8	1885.3	1887.7
25°	1814.2	1821.6	1824.0	1831.4	1833.8	1838.7	1848.5	1853.4	1853.4	1853.4
27.5°	1762.7	1777.4	1787.2	1792.1	1797.0	1801.9	1814.2	1824.0	1824.0	1824.0
30°	1713.7	1728.4	1748.0	1757.8	1762.7	1767.6	1784.8	1797.0	1799.5	1799.5
32.5°	1662.2	1681.8	1711.2	1725.9	1728.4	1735.7	1757.8	1772.5	1775.0	1775.0
35°	1618.1	1642.6	1674.5	1694.1	1699.0	1706.3	1730.8	1748.0	1750.5	1750.5
37.5°	1578.8	1603.4	1637.7	1664.6	1669.6	1679.4	1703.9	1725.9	1728.4	1730.8
40°	1534.7	1564.1	1598.5	1630.3	1640.1	1649.9	1676.9	1699.0	1703.9	1703.9
42.5°	1490.6	1527.4	1561.7	1598.5	1610.7	1620.5	1649.9	1672.0	1676.9	1676.9
45°	1444.0	1490.6	1524.9	1564.1	1578.8	1588.6	1615.6	1640.1	1647.5	1647.5
47.5°	1402.3	1451.4	1485.7	1524.9	1539.6	1554.3	1578.8	1603.4	1610.7	1613.2
50°	1355.7	1409.7	1444.0	1480.8	1500.4	1515.1	1539.6	1566.6	1573.9	1571.5
52.5°	1309.2	1360.6	1397.4	1436.6	1456.3	1471.0	1493.0	1522.5	1529.8	1529.8
55°	1260.1	1311.6	1350.8	1387.6	1407.2	1426.8	1448.9	1473.4	1483.2	1480.8
57.5°	1211.1	1257.7	1299.4	1338.6	1355.7	1375.4	1397.4	1421.9	1429.3	1434.2
60°	1159.6	1201.3	1247.9	1284.6	1301.8	1321.4	1343.5	1365.5	1377.8	1375.4
62.5°	1103.2	1149.8	1193.9	1228.3	1245.4	1265.0	1287.1	1306.7	1316.5	1321.4
65°	1046.8	1091.0	1132.6	1169.4	1184.1	1203.7	1228.3	1243.0	1255.2	1257.7
67.5°	988.0	1032.1	1073.8	1113.0	1127.7	1144.9	1167.0	1181.7	1193.9	1196.4
70°	929.2	975.7	1017.4	1054.2	1068.9	1083.6	1105.7	1120.4	1132.6	1132.6
72.5°	872.8	919.4	958.6	995.4	1010.1	1022.3	1044.4	1059.1	1068.9	1071.4
75°	816.4	860.5	899.7	936.5	948.8	963.5	983.1	997.8	1007.6	1010.1
77.5°	760.0	806.6	843.4	877.7	889.9	902.2	924.3	936.5	946.3	946.3
80°	706.1	750.2	787.0	818.8	828.6	843.4	863.0	875.2	882.6	887.5
82.5°	654.6	696.3	730.6	760.0	774.7	784.5	804.1	816.4	823.7	828.6
85°	598.2	642.3	676.6	706.1	715.9	730.6	747.7	760.0	767.4	769.8
87.5°	546.7	585.9	620.3	654.6	666.8	676.6	693.8	706.1	713.4	718.3
90°	502.6	539.4	571.2	598.2	610.5	622.7	642.3	654.6	661.9	664.4
92.5°	470.7	507.5	536.9	563.9	576.1	585.9	603.1	615.4	622.7	625.2
95°	441.3	475.6	505.0	532.0	541.8	551.6	568.8	578.6	583.5	588.4
97.5°	409.4	446.2	473.2	497.7	509.9	517.3	534.5	544.3	551.6	554.1
100°	380.0	414.3	441.3	468.3	478.1	485.4	502.6	512.4	517.3	519.7
102.5°	350.6	384.9	411.9	436.4	446.2	453.5	468.3	478.1	485.4	487.9
105°	321.2	353.0	380.0	404.5	414.3	421.7	436.4	446.2	453.5	456.0
107.5°	294.2	323.6	350.6	372.6	382.5	389.8	404.5	414.3	421.7	424.1
110°	267.2	294.2	321.2	343.2	353.0	360.4	375.1	382.5	389.8	392.3



TEST NUMBER: P257049

CATALOG NUMBER: HGL-S-UF-80L830-UNV-4

CANDELA DISTRIBUTION (continued):

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
112.5°	237.8	267.2	291.7	313.8	321.2	331.0	343.2	353.0	357.9	360.4
115°	213.3	240.3	262.3	284.4	291.7	299.1	313.8	321.2	328.5	328.5
117.5°	186.3	210.8	235.4	255.0	262.3	269.7	284.4	291.7	296.6	299.1
120°	161.8	183.9	205.9	225.5	235.4	240.3	255.0	262.3	267.2	269.7
122.5°	137.3	159.4	181.4	198.6	205.9	213.3	225.5	232.9	237.8	240.3
125°	112.8	134.8	154.5	171.6	179.0	186.3	196.1	203.5	208.4	210.8
127.5°	90.7	110.3	129.9	144.6	152.0	159.4	169.2	176.5	181.4	183.9
130°	68.6	85.8	105.4	120.1	127.5	132.4	142.2	149.5	154.5	156.9
132.5°	46.6	63.7	80.9	95.6	103.0	107.9	117.7	122.6	127.5	129.9
135°	29.4	44.1	58.8	71.1	78.5	83.4	93.2	98.1	103.0	103.0
137.5°	14.7	27.0	39.2	49.0	53.9	61.3	68.6	73.5	76.0	78.5
140°	4.9	12.3	22.1	29.4	34.3	39.2	46.6	51.5	53.9	56.4
142.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
145°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
147.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
150°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
152.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
155°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
157.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
162.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
165°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
167.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
170°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)