

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: METALUX

Report Number: P232508

Luminaire Tested: **8SKB1-LD5-6-N-UNV-L840-CD1-U**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P232508  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1709-317-6)  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: METALUX  
Catalog Number: 8SKB1-LD5-6-N-UNV-L840-CD1-U  
Description: METALUX SKYBAR 8' WAVESTREAM STRIP  
WITH NARROW LENS  
Light Source: (392) 4000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 6433.0 lumens  
Efficiency: N/A  
Efficacy: 153.2 lumens/watt  
Spacing Criteria (0/90/45): 1.19 / 1.53 / 1.51  
Luminous Opening: Rectangular w/ Sides (W: 0.25' x L: 8' x H: 0.29')  
CIE Type: Direct

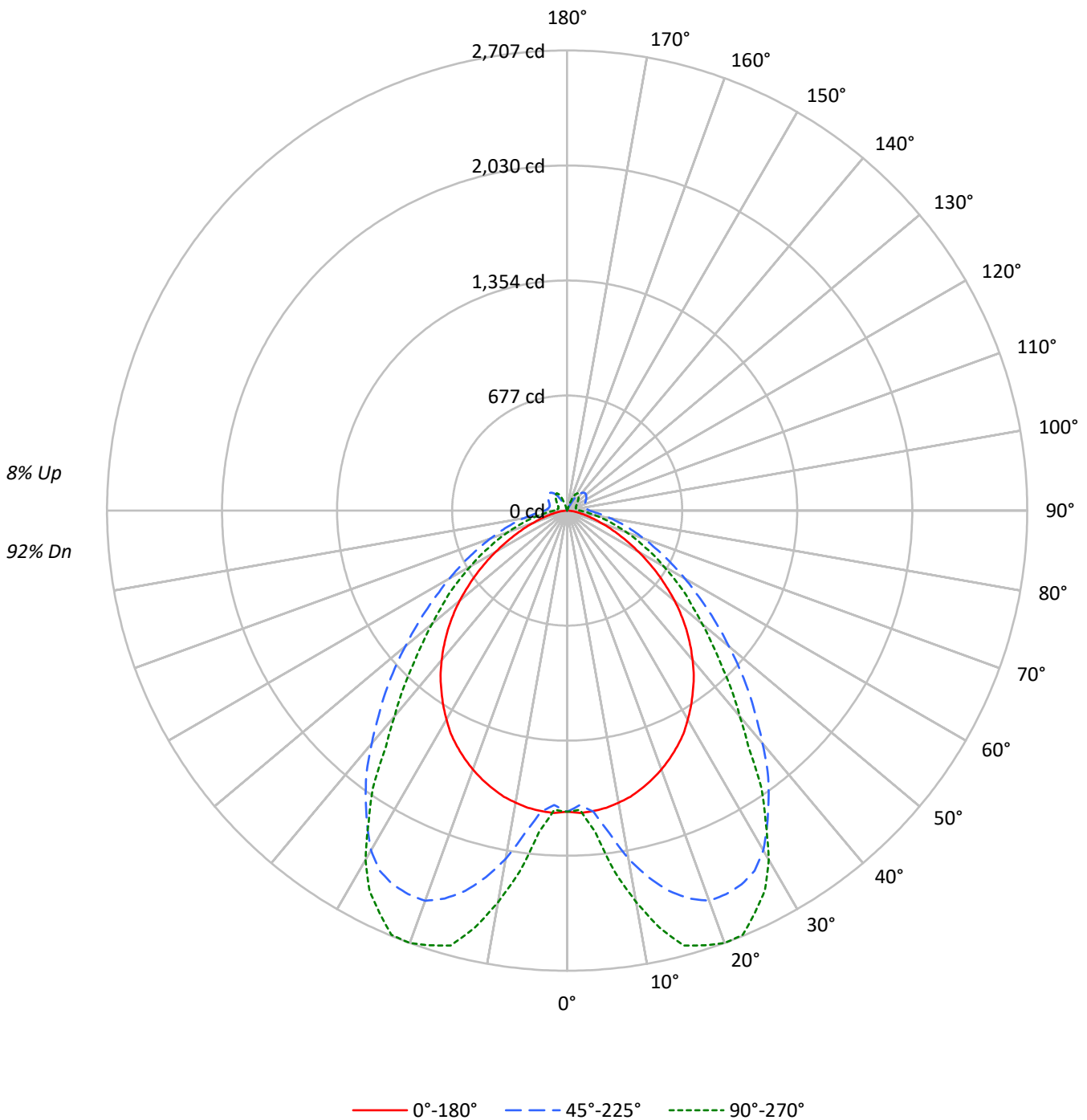
Input Watts (W): 42  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT



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### Luminous Intensity Polar Plot





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**COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:**

RF	20				20				20				20				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
RCR																		
0	117	117	117	117	113	113	113	113	107	107	107	100	100	100	95	95	95	92
1	107	103	98	95	104	99	96	92	94	91	88	88	86	84	84	82	80	77
2	98	90	84	78	95	88	82	77	83	78	74	78	74	71	74	71	68	65
3	90	80	72	66	87	78	70	65	74	68	63	70	65	61	66	62	58	56
4	83	71	63	56	80	69	62	56	66	59	54	63	57	52	60	55	51	48
5	76	64	55	49	74	62	54	48	59	52	47	56	51	46	54	49	45	42
6	70	58	49	43	68	56	48	42	54	47	41	51	45	40	49	44	40	37
7	65	52	44	38	63	51	43	38	49	42	37	47	41	36	45	39	35	33
8	61	48	40	34	59	47	39	34	45	38	33	43	37	32	41	36	32	30
9	57	44	36	31	55	43	36	30	41	35	30	40	34	29	38	33	29	27
10	53	41	33	28	52	40	33	28	38	32	27	37	31	27	35	30	26	24

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	9536	9536	9536
5°	9556	8940	9303
10°	9474	9890	10598
15°	9340	10511	11242
20°	9165	10682	10882
25°	8940	10319	10043
30°	8637	9618	8809
35°	8267	8508	7211
40°	7825	7334	5608
45°	7287	6221	4499
50°	6624	5166	3631
55°	5820	4251	2972
60°	4900	3483	2344
65°	3941	2825	1817
70°	3032	2257	1385
75°	2259	1783	1002
80°	1585	1373	711
85°	946	1036	487



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	181.4	2.8
10°-20°	631.2	9.8
20°-30°	1039.1	16.2
30°-40°	1167.4	18.1
40°-50°	1038.9	16.1
50°-60°	803.4	12.5
60°-70°	545.6	8.5
70°-80°	325.6	5.1
80°-90°	174.6	2.7
90°-100°	114.9	1.8
100°-110°	97.5	1.5
110°-120°	90.2	1.4
120°-130°	84.0	1.3
130°-140°	71.2	1.1
140°-150°	48.7	0.8
150°-160°	18.8	0.3
160°-170°	0.6	0.0
170°-180°	0.0	0.0
0°-30°	1851.7	28.8
0°-40°	3019.1	46.9
0°-60°	4861.3	75.6
0°-90°	5907.1	91.8
90°-120°	302.6	4.7
90°-150°	506.5	7.9
90°-180°	526.0	8.2
0°-180°	6433.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1772	1772	1772	1772	1772	
5°	1774	1750	1778	1873	1898	168
15°	1693	1901	2317	2606	2648	477
25°	1531	1966	2427	2617	2611	704
35°	1290	1771	2066	2047	1994	806
45°	992	1369	1513	1383	1281	763
55°	653	932	1004	911	845	583
65°	334	580	626	565	500	336
75°	123	349	358	308	258	135
85°	22	220	180	141	113	27
90°	2	187	131	96	74	2
95°	1	181	115	81	62	1
105°	1	164	106	69	53	1
115°	1	151	118	75	58	1
125°	1	124	137	91	71	1
135°	1	48	147	117	92	1
145°	1	4	114	133	115	1
155°	1	3	25	88	97	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°	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8
2.5°	1780.5	1773.5	1761.3	1760.5	1752.7	1749.2	1750.1	1747.4	1744.8	1740.5	1733.5
5°	1774.4	1761.3	1741.4	1741.4	1745.7	1750.1	1760.5	1770.0	1772.6	1778.7	1777.9
7.5°	1763.1	1743.1	1724.0	1739.6	1755.3	1761.3	1773.5	1790.9	1817.8	1867.4	1916.0
10°	1744.8	1717.9	1711.8	1737.0	1757.9	1776.1	1803.9	1884.7	1959.5	2033.3	2081.1
12.5°	1724.0	1691.0	1699.7	1731.8	1780.5	1815.2	1886.5	1993.4	2052.4	2138.5	2208.9
15°	1692.7	1661.4	1677.1	1724.9	1826.5	1901.2	1941.2	2071.6	2166.3	2237.5	2316.6
17.5°	1658.8	1631.0	1652.7	1737.0	1875.2	1947.3	2011.6	2122.0	2213.2	2318.3	2393.1
20°	1621.4	1597.1	1624.9	1752.7	1898.6	1972.5	2043.8	2148.9	2269.7	2378.3	2442.6
22.5°	1578.0	1556.3	1598.9	1759.6	1907.3	1981.2	2050.7	2173.2	2298.4	2387.9	2442.6
25°	1531.1	1509.4	1567.6	1745.7	1898.6	1966.4	2041.1	2186.3	2288.8	2359.2	2427.0
27.5°	1480.7	1456.3	1544.1	1717.0	1863.9	1940.4	2024.6	2161.1	2241.9	2320.1	2388.7
30°	1419.0	1397.3	1503.3	1675.3	1815.2	1905.6	1977.7	2100.2	2177.6	2254.9	2307.9
32.5°	1357.3	1336.4	1453.7	1616.2	1759.6	1844.8	1914.3	2009.9	2097.6	2157.6	2190.6
35°	1290.4	1266.9	1396.4	1544.1	1697.0	1770.9	1829.1	1916.0	1989.9	2034.2	2066.3
37.5°	1223.5	1198.3	1323.4	1468.5	1614.5	1682.3	1730.9	1818.7	1875.2	1911.7	1938.6
40°	1147.9	1121.8	1247.8	1383.4	1528.5	1576.3	1626.7	1704.9	1746.6	1776.1	1789.2
42.5°	1071.4	1045.3	1166.1	1293.9	1423.3	1470.3	1522.4	1584.1	1624.9	1642.3	1642.3
45°	992.3	967.1	1081.8	1205.2	1314.7	1368.6	1414.6	1464.2	1498.1	1512.0	1512.8
47.5°	909.8	888.9	998.4	1110.5	1213.0	1260.0	1295.6	1343.4	1372.9	1376.4	1375.5
50°	825.5	807.2	905.4	1015.8	1107.0	1148.7	1180.0	1224.3	1247.8	1246.9	1242.6
52.5°	736.9	725.6	816.8	917.6	1000.2	1037.5	1065.3	1104.4	1123.5	1123.5	1120.1
55°	652.6	645.6	724.7	822.0	899.4	932.4	958.4	993.2	1008.8	1008.8	1003.6
57.5°	567.4	566.6	640.4	727.3	801.2	830.7	858.5	888.9	902.8	902.8	894.1
60°	484.0	488.3	561.3	641.3	709.1	737.7	762.1	791.6	800.3	802.0	800.3
62.5°	406.7	418.0	487.5	560.5	628.2	652.6	674.3	703.0	709.9	712.5	708.2
65°	333.7	351.1	421.4	491.0	554.4	579.6	598.7	618.7	624.8	627.4	626.5
67.5°	273.7	292.0	362.3	431.0	489.2	509.2	528.3	545.7	546.6	550.9	547.4
70°	212.0	239.8	310.2	375.4	430.1	448.4	464.0	476.2	478.8	479.7	478.8
72.5°	163.4	196.4	263.3	327.6	377.1	394.5	406.7	416.2	416.2	417.1	414.5
75°	123.4	163.4	228.5	287.6	331.9	349.3	358.9	365.0	361.5	360.6	358.0
77.5°	89.5	135.6	197.3	252.9	294.6	307.6	316.3	317.2	312.0	311.1	305.9
80°	61.7	110.4	170.3	222.4	260.7	273.7	278.1	274.6	270.2	265.0	258.1
82.5°	40.8	89.5	147.7	197.3	232.9	243.3	246.8	241.6	235.5	226.8	215.5
85°	21.7	72.1	128.6	176.4	210.3	219.8	221.6	212.0	202.5	191.2	179.9
87.5°	9.6	59.1	114.7	162.5	192.0	199.0	199.9	189.4	177.3	164.2	150.3
90°	1.7	50.4	106.0	152.1	180.7	186.8	186.8	172.9	160.8	146.9	131.2
92.5°	0.9	47.8	103.4	148.6	177.3	183.3	182.5	167.7	152.9	137.3	121.7
95°	0.9	41.7	97.3	145.1	174.7	180.7	179.9	164.2	148.6	132.1	114.7
97.5°	0.9	34.8	91.2	139.0	170.3	176.4	176.4	161.6	146.0	128.6	110.4
100°	0.0	26.9	84.3	132.9	164.2	172.1	172.9	159.0	142.5	125.1	107.7
102.5°	0.0	18.2	78.2	127.7	159.9	167.7	169.4	158.1	140.8	123.4	106.0
105°	0.9	11.3	70.4	121.7	155.5	164.2	166.8	157.3	139.9	123.4	106.0
107.5°	0.9	7.8	62.6	115.6	152.1	161.6	165.1	157.3	140.8	124.3	107.7
110°	0.9	7.0	53.0	109.5	147.7	158.1	163.4	158.1	142.5	126.9	110.4



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**CANDELA DISTRIBUTION (continued):**

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
112.5°	0.9	5.2	40.0	101.7	142.5	154.7	161.6	159.0	145.1	129.5	113.8
115°	0.9	4.3	26.9	93.8	137.3	151.2	159.9	159.9	147.7	132.9	118.2
117.5°	0.9	4.3	18.2	83.4	131.2	146.9	156.4	160.8	151.2	136.4	123.4
120°	0.9	3.5	8.7	71.3	123.4	140.8	152.9	160.8	153.8	140.8	127.7
122.5°	0.9	3.5	7.0	54.7	114.7	133.8	147.7	159.9	156.4	144.2	132.9
125°	0.9	2.6	6.1	36.5	103.4	124.3	140.8	157.3	157.3	147.7	137.3
127.5°	0.9	2.6	5.2	26.1	88.6	113.8	131.2	152.9	157.3	150.3	141.6
130°	0.9	2.6	4.3	7.8	67.8	99.1	119.9	146.0	155.5	152.1	144.2
132.5°	0.9	1.7	4.3	6.1	43.4	77.3	104.3	134.7	150.3	152.1	146.9
135°	0.9	1.7	3.5	5.2	31.3	47.8	83.4	120.8	140.8	146.9	146.9
137.5°	0.9	1.7	3.5	4.3	13.9	35.6	52.1	104.3	128.6	139.9	142.5
140°	0.9	1.7	2.6	3.5	5.2	19.1	37.4	82.5	113.8	129.5	136.4
142.5°	0.9	1.7	2.6	3.5	4.3	4.3	22.6	47.8	95.6	115.6	126.9
145°	0.9	1.7	1.7	2.6	3.5	4.3	4.3	36.5	68.6	99.1	113.8
147.5°	0.9	0.9	1.7	2.6	3.5	3.5	3.5	16.5	40.8	75.6	97.3
150°	0.9	0.9	1.7	1.7	2.6	2.6	3.5	3.5	26.9	42.6	72.1
152.5°	0.9	0.9	1.7	1.7	2.6	2.6	2.6	3.5	3.5	28.7	40.0
155°	0.9	0.9	1.7	1.7	1.7	2.6	2.6	2.6	2.6	3.5	25.2
157.5°	0.9	0.9	1.7	1.7	1.7	1.7	1.7	2.6	2.6	3.5	3.5
160°	0.9	1.7	1.7	1.7	1.7	1.7	1.7	2.6	2.6	2.6	3.5
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°	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8	1771.8
2.5°	1742.2	1755.3	1755.3	1766.6	1772.6	1770.9	1772.6	1776.1	1765.7	1762.2
5°	1797.0	1823.0	1836.1	1865.6	1872.6	1885.6	1890.0	1904.7	1908.2	1897.8
7.5°	1969.0	2022.9	2057.7	2093.3	2108.9	2116.7	2130.6	2140.2	2155.0	2143.7
10°	2130.6	2195.8	2245.3	2284.5	2294.0	2301.8	2318.3	2341.8	2340.1	2338.3
12.5°	2270.5	2327.9	2388.7	2445.2	2473.9	2480.0	2504.3	2533.0	2538.2	2514.7
15°	2386.1	2466.1	2534.7	2594.7	2606.0	2621.6	2639.8	2649.4	2645.1	2648.5
17.5°	2482.6	2550.3	2599.0	2631.2	2638.1	2650.3	2666.8	2679.0	2680.7	2681.6
20°	2520.8	2566.0	2612.9	2657.2	2671.1	2683.3	2703.3	2713.7	2712.0	2706.8
22.5°	2513.9	2579.9	2623.3	2659.8	2673.7	2685.0	2702.4	2709.4	2706.8	2701.5
25°	2503.4	2559.9	2598.1	2617.3	2617.3	2625.9	2621.6	2616.4	2610.3	2611.2
27.5°	2453.9	2486.9	2513.0	2534.7	2537.3	2538.2	2535.6	2530.4	2526.9	2519.1
30°	2353.1	2393.1	2405.2	2403.5	2400.0	2399.2	2388.7	2380.9	2371.3	2372.2
32.5°	2234.9	2243.6	2248.8	2234.1	2225.4	2223.6	2214.1	2201.0	2188.0	2174.1
35°	2082.9	2076.8	2064.6	2054.2	2047.2	2036.8	2022.9	2009.9	1993.4	1994.2
37.5°	1936.0	1916.9	1899.5	1870.8	1865.6	1841.3	1814.4	1793.5	1766.6	1751.8
40°	1783.1	1764.0	1742.2	1710.9	1697.0	1674.5	1644.9	1610.2	1588.4	1579.7
42.5°	1637.1	1613.6	1588.4	1551.1	1533.7	1515.4	1484.2	1450.3	1434.6	1432.0
45°	1494.6	1467.6	1443.3	1401.6	1383.4	1361.6	1329.5	1308.6	1286.0	1280.8
47.5°	1357.3	1333.8	1296.5	1264.3	1246.9	1228.7	1195.7	1176.5	1160.0	1154.0
50°	1224.3	1201.7	1173.1	1137.4	1120.9	1103.6	1080.1	1061.8	1042.7	1036.6
52.5°	1105.3	1082.7	1053.2	1025.4	1008.8	998.4	976.7	955.8	941.1	931.5
55°	990.6	969.7	942.8	916.7	910.7	896.7	871.6	853.3	843.7	844.6
57.5°	885.5	867.2	846.4	821.2	811.6	798.6	782.0	760.3	749.0	745.6
60°	789.9	772.5	755.1	736.0	723.8	714.3	691.7	674.3	659.5	657.8
62.5°	698.6	685.6	670.8	651.7	641.3	630.9	610.9	594.4	583.1	579.6
65°	619.6	608.3	590.9	575.2	564.8	554.4	535.3	518.8	509.2	499.6
67.5°	541.4	531.8	518.8	502.2	492.7	482.3	465.8	447.5	436.2	433.6
70°	471.8	461.4	451.0	433.6	424.9	418.8	400.6	382.3	373.6	370.2
72.5°	411.9	400.6	385.8	373.6	368.4	357.1	339.8	327.6	316.3	309.3
75°	349.3	342.4	331.9	318.0	308.5	300.7	286.8	274.6	265.0	258.1
77.5°	298.0	289.4	280.7	266.8	259.8	252.9	238.1	227.7	218.1	214.6
80°	250.3	242.4	230.3	219.8	213.8	207.7	196.4	185.1	178.1	174.7
82.5°	206.8	199.9	190.3	181.6	174.7	170.3	159.9	150.3	144.2	139.0
85°	171.2	162.5	153.8	146.0	140.8	137.3	129.5	122.5	114.7	113.0
87.5°	140.8	133.8	126.0	118.2	114.7	110.4	103.4	98.2	92.1	89.5
90°	120.8	112.1	105.1	99.1	95.6	93.0	87.8	80.8	76.5	73.9
92.5°	109.5	101.7	95.6	89.5	86.9	84.3	78.2	73.0	68.6	65.2
95°	102.5	94.7	88.6	83.4	80.8	79.1	73.9	68.6	64.3	61.7
97.5°	97.3	88.6	82.5	78.2	75.6	73.9	69.5	65.2	60.8	58.2
100°	93.0	84.3	78.2	73.9	72.1	70.4	66.0	61.7	58.2	55.6
102.5°	91.2	81.7	75.6	72.1	70.4	68.6	64.3	60.8	56.5	53.9
105°	91.2	80.8	74.7	70.4	68.6	66.9	63.4	60.0	55.6	53.0
107.5°	93.0	81.7	74.7	71.3	69.5	67.8	63.4	60.0	55.6	53.0
110°	95.6	84.3	76.5	72.1	70.4	68.6	64.3	60.8	56.5	53.9





TEST NUMBER: P232508

CATALOG NUMBER: 8SKB1-LD5-6-N-UNV-L840-CD1-U

**CANDELA DISTRIBUTION (continued):**

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
112.5°	99.1	86.9	79.1	73.9	72.1	70.4	66.0	62.6	58.2	55.6
115°	103.4	90.4	82.5	76.5	74.7	73.0	68.6	64.3	60.8	58.2
117.5°	108.6	95.6	86.0	79.9	78.2	75.6	71.3	66.9	63.4	60.8
120°	113.8	101.7	91.2	84.3	81.7	79.1	74.7	70.4	66.0	63.4
122.5°	119.9	106.9	96.5	89.5	86.9	84.3	79.1	74.7	70.4	66.9
125°	126.0	113.8	102.5	94.7	91.2	88.6	83.4	78.2	74.7	71.3
127.5°	131.2	119.9	108.6	100.8	97.3	93.8	88.6	83.4	79.1	76.5
130°	135.6	126.0	115.6	106.9	103.4	100.8	93.8	88.6	84.3	81.7
132.5°	139.9	131.2	122.5	113.8	110.4	106.9	100.8	94.7	90.4	86.9
135°	142.5	135.6	128.6	120.8	117.3	113.0	106.9	100.8	95.6	92.1
137.5°	142.5	139.0	132.9	126.9	123.4	119.9	113.0	106.9	101.7	99.1
140°	138.2	139.0	136.4	132.1	128.6	126.0	119.9	113.0	107.7	105.1
142.5°	132.1	134.7	136.4	133.8	132.1	130.3	125.1	119.0	113.8	110.4
145°	122.5	127.7	131.2	133.8	132.9	132.1	127.7	123.4	118.2	114.7
147.5°	110.4	118.2	122.5	128.6	130.3	130.3	128.6	125.1	120.8	118.2
150°	93.0	104.3	112.1	118.2	120.8	124.3	124.3	121.7	119.0	116.4
152.5°	66.0	84.3	95.6	104.3	107.7	111.2	115.6	113.8	110.4	108.6
155°	37.4	46.1	69.5	83.4	87.8	92.1	99.1	100.8	99.9	97.3
157.5°	19.1	31.3	39.1	45.2	47.8	54.7	68.6	78.2	77.3	79.1
160°	4.3	5.2	14.8	27.8	31.3	33.0	36.5	39.1	39.1	37.4
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)