

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: McGRAW-EDISON

Report Number: P651183

Luminaire Tested: **GALN-SA1D-840-U-SL4**

Issue Date: 1/4/2021

**Test Information**

Test Method: LM-79-08  
Report Number: P651183  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-2011-042-18)  
Test Lab: INNOVATION CENTER  
Issue Date: 1/4/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: McGRAW-EDISON  
Catalog Number: GALN-SA1D-840-U-SL4  
Description: GALLEON AREA AND ROADWAY LUMINAIRE  
(1) 80 CRI, 4000K, 1200mA LIGHTSQUARE WITH 16 LEDS AND TYPE IV SPILL  
LIGHT ELIMINATOR OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 6443.7 lumens  
Efficiency: N/A  
Efficacy: 99.1 lumens/watt  
Luminous Opening: Rectangular (W 0.5' x L: 0.5' x H: 0')  
IES Classification: Type IV - Short  
BUG Rating: B1 - U0 - G2

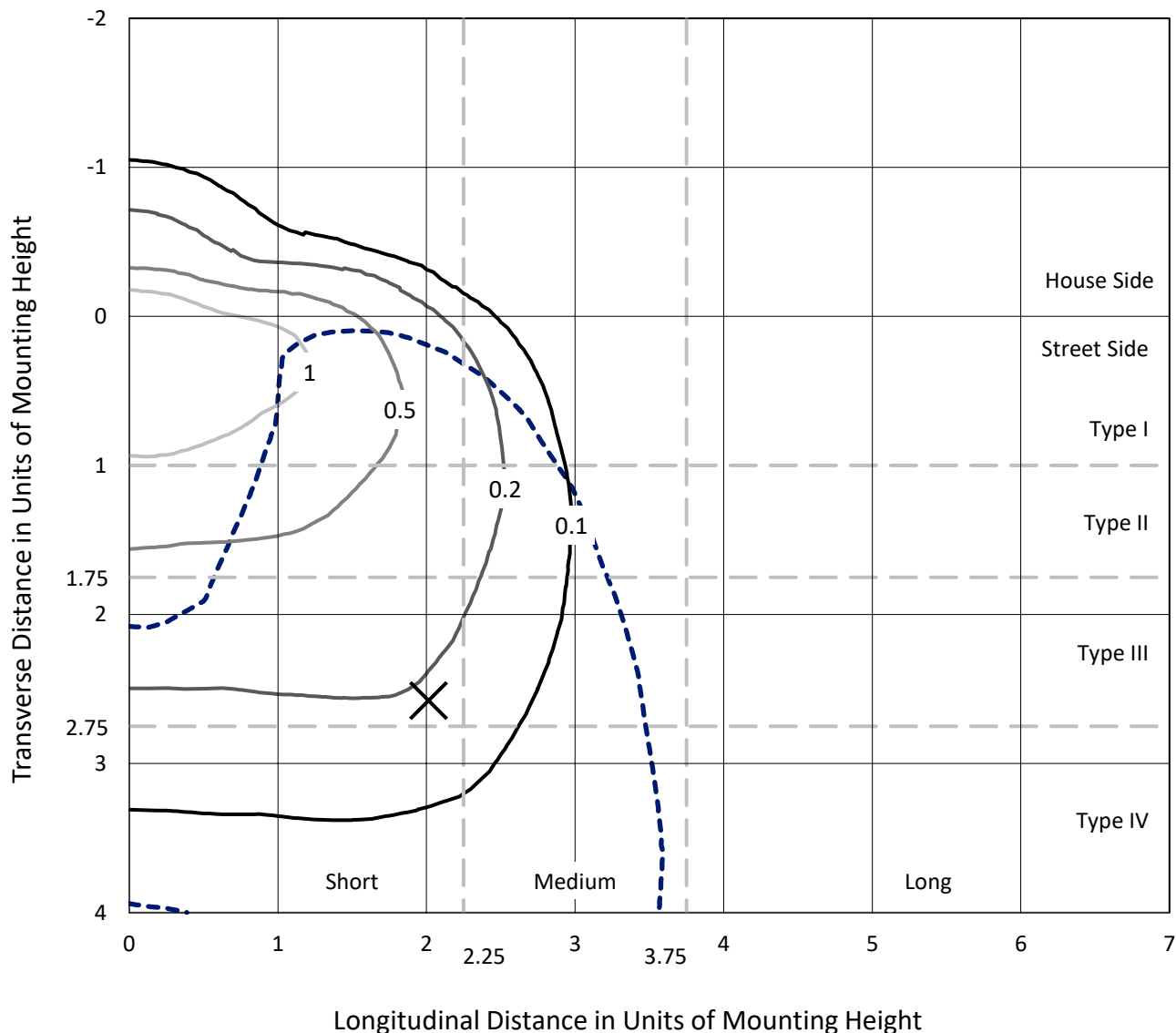
Input Watts (W): 65  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



REPORT NUMBER: P651183  
 CATALOG NUMBER: GALN-SA1D-840-U-SL4

### Iso-Footcandle Lines of Horizontal Illumination

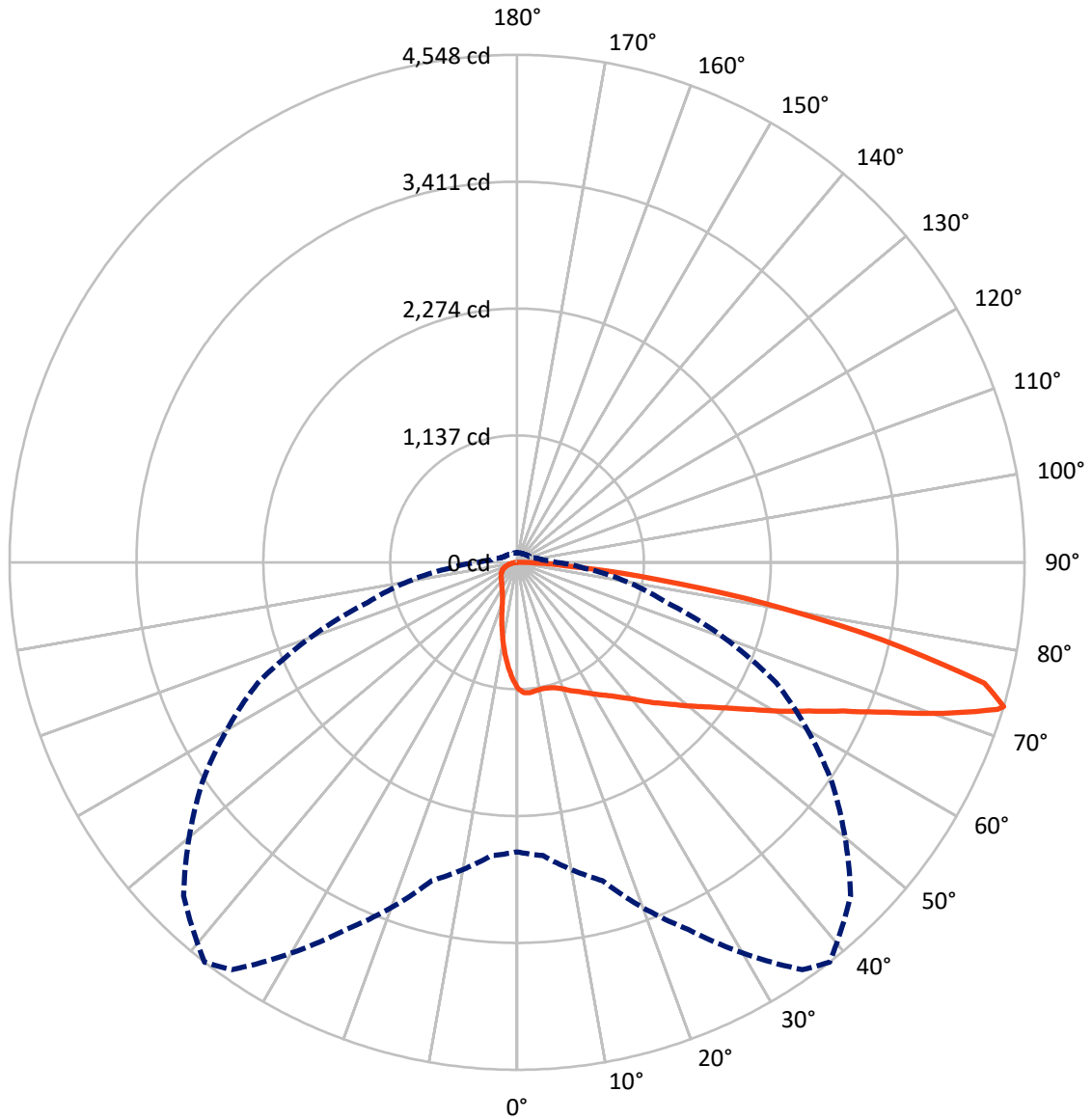
× Max cd  
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 1.8 fc  
 Type IV - Short - N/A

REPORT NUMBER: P651183  
CATALOG NUMBER: GALN-SA1D-840-U-SL4

### Luminous Intensity Polar Plot



— Vertical Plane Through 38-Deg Lateral    - - - Horizontal Cone Through 73-Deg Vertical

REPORT NUMBER: P651183  
 CATALOG NUMBER: GALN-SA1D-840-U-SL4

**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	866.2	0.0	866.2
	% Fixture	13.4	0.0	13.4
<b>Street Side</b>	Lumens	5577.5	0.0	5577.5
	% Fixture	86.6	0.0	86.6
<b>Total</b>	Lumens	6443.7	0.0	6443.7
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	98.8	1.5
10°-20°	253.4	3.9
20°-30°	394.6	6.1
30°-40°	578.8	9.0
40°-50°	858.5	13.3
50°-60°	1216.4	18.9
60°-70°	1543.0	23.9
70°-80°	1284.4	19.9
80°-90°	215.8	3.3
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-90°	6443.7	100.0
0°-180°	6443.7	100.0

**Coefficient of Utilization**



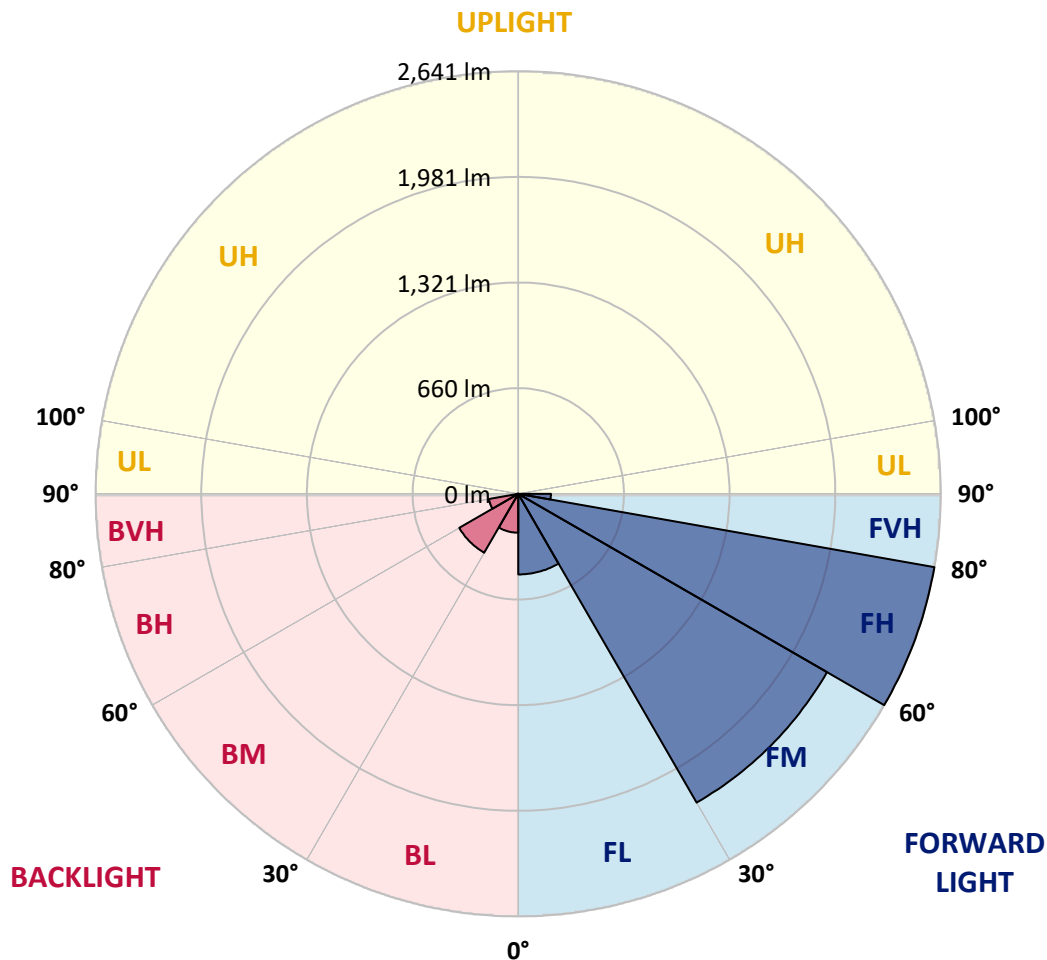
REPORT NUMBER: P651183  
 CATALOG NUMBER: GALN-SA1D-840-U-SL4

**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	503.7	7.8			
FM (30°-60°)	2228.4	34.6			
FH (60°-80°)	2641.3	41.0			G2/5000
FVH (80°-90°)	204.1	3.2			G2/225
BL (0°-30°)	243.1	3.8	B1/500		
BM (30°-60°)	425.3	6.6	B1/1000		
BH (60°-80°)	186.2	2.9	B1/500		G1/500
BVH (80°-90°)	11.7	0.2			G1/100
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B1-U0-G2**

Type IV Short





REPORT NUMBER: P651183  
 CATALOG NUMBER: GALN-SA1D-840-U-SL4

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	38°	45°	55°	65°	75°	85°
0°	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1
2.5°	1177.6	1183.4	1180.4	1176.5	1173.9	1171.3	1167.7	1157.1	1148.8	1139.7	1125.5
5°	1186.3	1189.9	1187.4	1182.3	1176.5	1173.9	1167.0	1153.2	1139.7	1124.4	1103.3
7.5°	1181.2	1182.6	1179.8	1173.5	1168.5	1163.7	1155.7	1140.4	1124.1	1105.5	1077.8
10°	1163.0	1168.5	1168.5	1163.4	1158.2	1155.7	1147.7	1133.2	1118.2	1097.1	1064.4
12.5°	1148.0	1153.9	1158.6	1157.1	1156.8	1156.8	1150.7	1139.7	1122.2	1102.2	1063.3
15°	1137.9	1144.8	1154.9	1160.8	1164.4	1165.5	1163.0	1153.5	1135.7	1112.4	1067.6
17.5°	1135.7	1144.1	1162.6	1175.4	1184.8	1184.5	1183.7	1170.6	1151.0	1126.9	1073.1
20°	1145.5	1156.5	1182.3	1202.3	1216.1	1213.6	1209.5	1192.5	1169.6	1142.6	1078.2
22.5°	1175.0	1186.3	1214.7	1236.5	1250.0	1250.0	1238.0	1215.4	1191.0	1160.8	1085.1
25°	1217.2	1229.5	1259.8	1281.9	1288.2	1283.5	1271.4	1244.2	1216.1	1187.0	1099.7
27.5°	1268.9	1283.8	1311.8	1330.4	1328.5	1324.9	1312.5	1277.6	1249.6	1223.1	1124.4
30°	1333.3	1344.2	1373.4	1377.6	1371.2	1370.4	1352.9	1318.0	1291.8	1271.4	1159.7
32.5°	1394.0	1403.9	1427.2	1429.0	1417.3	1418.8	1402.5	1370.4	1355.5	1348.2	1219.0
35°	1458.5	1463.6	1483.6	1481.4	1473.8	1472.7	1466.1	1435.5	1440.3	1453.3	1303.0
37.5°	1512.3	1522.5	1533.8	1535.6	1535.2	1538.9	1543.2	1528.7	1556.0	1597.1	1413.3
40°	1561.8	1570.6	1587.3	1593.1	1607.3	1614.6	1629.5	1629.9	1692.8	1760.5	1549.0
42.5°	1595.3	1610.2	1641.5	1652.1	1686.6	1708.5	1730.7	1754.3	1845.7	1932.6	1709.2
45°	1624.4	1644.1	1696.0	1728.8	1775.8	1802.3	1849.3	1898.8	2030.2	2144.0	1871.8
47.5°	1668.5	1685.9	1745.6	1803.4	1874.4	1904.9	1975.2	2049.1	2220.8	2345.6	2027.6
50°	1729.6	1740.1	1800.9	1895.1	1985.8	2025.0	2117.8	2224.4	2424.6	2544.7	2164.4
52.5°	1807.8	1812.2	1860.5	1986.1	2105.4	2154.2	2277.2	2401.6	2602.9	2717.5	2272.9
55°	1900.2	1892.9	1930.8	2082.6	2242.3	2305.9	2438.1	2581.0	2803.4	2857.2	2351.8
57.5°	1991.6	1980.3	2010.5	2199.7	2411.1	2487.9	2641.8	2765.9	2982.4	2987.9	2407.1
60°	2088.4	2080.0	2116.0	2337.2	2618.2	2709.1	2851.4	2957.7	3155.6	3078.8	2415.9
62.5°	2187.7	2174.2	2225.5	2491.9	2851.4	2934.0	3071.9	3161.5	3325.6	3112.7	2331.8
65°	2284.2	2277.9	2357.2	2675.6	3117.1	3210.9	3344.8	3405.6	3461.6	3061.7	2123.3
67.5°	2386.8	2399.1	2525.8	2921.0	3463.5	3581.4	3725.9	3668.7	3500.6	2820.5	1788.1
70°	2543.2	2551.3	2747.0	3242.2	3910.0	4052.3	4122.2	3762.2	3312.9	2362.4	1344.2
72.5°	2610.5	2645.9	2944.6	3579.5	4417.3	4504.2	4255.3	3553.7	2759.7	1604.7	706.3
73°	2595.6	2637.8	2953.7	3630.8	4456.9	4548.2	4227.0	3446.4	2565.4	1382.0	605.5
75°	2409.6	2461.7	2835.4	3588.0	4379.8	4325.2	3770.6	2937.3	1733.6	628.4	275.8
77.5°	1901.3	1916.2	2246.6	2897.2	3448.9	3347.8	2822.0	1835.8	708.1	233.6	156.5
80°	953.8	1008.7	1266.3	1659.7	2306.4	2273.2	1781.2	868.2	295.1	137.2	103.7
82.5°	458.8	497.8	616.8	809.3	1274.4	1244.2	882.0	474.5	187.4	80.1	61.1
85°	295.4	324.6	392.7	386.1	524.0	500.3	396.3	359.2	111.0	41.9	42.6
87.5°	195.0	213.6	256.2	204.9	190.7	172.5	175.0	202.3	21.9	16.0	5.8
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



REPORT NUMBER: P651183  
 CATALOG NUMBER: GALN-SA1D-840-U-SL4

**CANDELA DISTRIBUTION (continued):**

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1	1132.1
2.5°	1119.7	1114.9	1099.3	1084.0	1069.5	1055.6	1046.5	1034.5	1026.5	1028.7	1032.0
5°	1091.7	1081.1	1053.4	1026.5	1001.0	970.9	946.5	926.8	911.9	906.4	905.3
7.5°	1062.2	1044.4	1004.7	958.5	915.2	877.7	834.4	812.9	787.8	779.1	776.2
10°	1044.4	1020.3	964.6	900.3	835.1	772.9	726.0	687.8	653.2	646.6	643.4
12.5°	1039.2	1007.6	932.7	849.7	763.0	686.7	617.1	566.9	533.4	525.8	514.5
15°	1036.4	997.1	902.8	798.7	688.9	595.7	522.5	464.0	433.4	413.0	413.4
17.5°	1033.8	985.1	869.3	743.0	624.8	517.5	436.6	383.9	355.9	345.0	343.9
20°	1030.1	970.9	830.7	684.5	551.7	446.2	373.0	333.7	314.8	305.7	305.3
22.5°	1028.7	957.1	792.9	624.8	486.9	391.1	330.8	303.1	291.1	284.9	284.9
25°	1032.3	947.2	753.3	568.0	429.4	344.2	301.7	282.7	275.8	272.6	271.5
27.5°	1043.6	942.8	713.9	511.2	376.6	312.2	282.0	269.0	263.8	261.3	261.6
30°	1065.1	942.5	675.4	455.2	337.3	287.9	266.3	257.3	253.2	251.8	251.5
32.5°	1099.7	950.5	637.6	409.0	304.2	267.4	251.8	245.2	243.5	242.4	242.0
35°	1158.2	973.0	600.1	366.8	278.7	249.3	238.0	234.7	232.2	233.3	233.6
37.5°	1237.2	1012.0	564.4	333.7	259.4	235.8	226.3	223.5	221.9	223.0	224.1
40°	1343.1	1068.0	534.5	307.1	245.7	224.5	216.1	213.6	212.2	214.0	214.4
42.5°	1459.9	1132.7	509.8	286.4	234.3	215.0	207.1	204.1	203.0	204.1	204.5
45°	1580.0	1208.1	497.0	271.5	224.9	208.1	199.7	196.5	193.9	193.3	194.4
47.5°	1698.2	1273.6	496.7	262.4	217.2	201.9	192.8	189.2	185.9	184.1	183.8
50°	1794.7	1325.7	505.4	258.4	210.7	195.0	185.9	182.3	178.0	174.3	175.0
52.5°	1867.4	1359.5	509.5	256.5	207.1	187.8	178.6	175.4	170.3	165.6	165.6
55°	1914.5	1367.5	499.6	254.7	204.1	180.1	170.3	167.4	162.3	157.6	157.6
57.5°	1930.4	1342.7	464.3	250.4	201.3	173.6	161.9	159.4	155.4	150.6	150.0
60°	1893.3	1259.1	402.4	237.2	195.4	166.7	152.8	151.7	150.3	146.2	145.9
62.5°	1750.3	1081.4	335.1	220.2	185.6	159.4	144.5	146.2	147.3	145.2	144.8
65°	1512.3	878.1	286.4	196.5	172.5	149.2	135.4	140.1	143.0	143.0	142.3
67.5°	1226.7	674.3	241.3	176.1	156.1	135.4	125.1	128.8	131.0	130.3	132.1
70°	871.9	456.7	196.5	152.8	135.4	119.8	112.1	112.1	110.6	109.9	109.9
72.5°	422.9	260.9	159.4	127.7	115.4	102.3	96.0	93.5	90.6	90.2	88.4
73°	353.3	234.0	152.1	123.0	110.6	99.7	92.8	88.8	87.0	85.5	85.1
75°	215.0	177.6	127.0	103.7	94.3	85.9	79.7	76.0	74.3	73.2	72.7
77.5°	141.5	132.5	98.6	79.3	72.1	66.9	64.4	60.8	59.7	58.2	58.2
80°	105.5	101.2	70.6	56.0	51.6	47.3	46.6	45.8	43.0	41.1	40.4
82.5°	68.0	72.1	48.0	37.5	32.7	29.1	29.4	30.5	27.7	25.1	24.4
85°	48.4	52.1	29.1	17.1	13.8	12.0	13.5	12.0	12.4	9.8	8.0
87.5°	8.0	13.8	5.1	2.2	1.1	0.8	0.0	0.0	0.0	0.0	0.0
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)