

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: LUMARK

Report Number: P381195

Luminaire Tested: **PRV-XL-PA4B-740-U-T2R-HSS**

Issue Date: 1/15/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P381195  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1910-568-13)  
Test Lab: INNOVATIONS CENTER  
Issue Date: 1/15/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: LUMARK  
Catalog Number: PRV-XL-PA4B-740-U-T2R-HSS  
Description: PREVAIL AREA AND ROADWAY LUMINAIRE  
(4) 70 CRI, 4000K, 970mA LIGHT ENGINES WITH 24 LEDS AND TYPE II ROADWAY OPTICS WITH HOUSE SIDE SHIELD  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

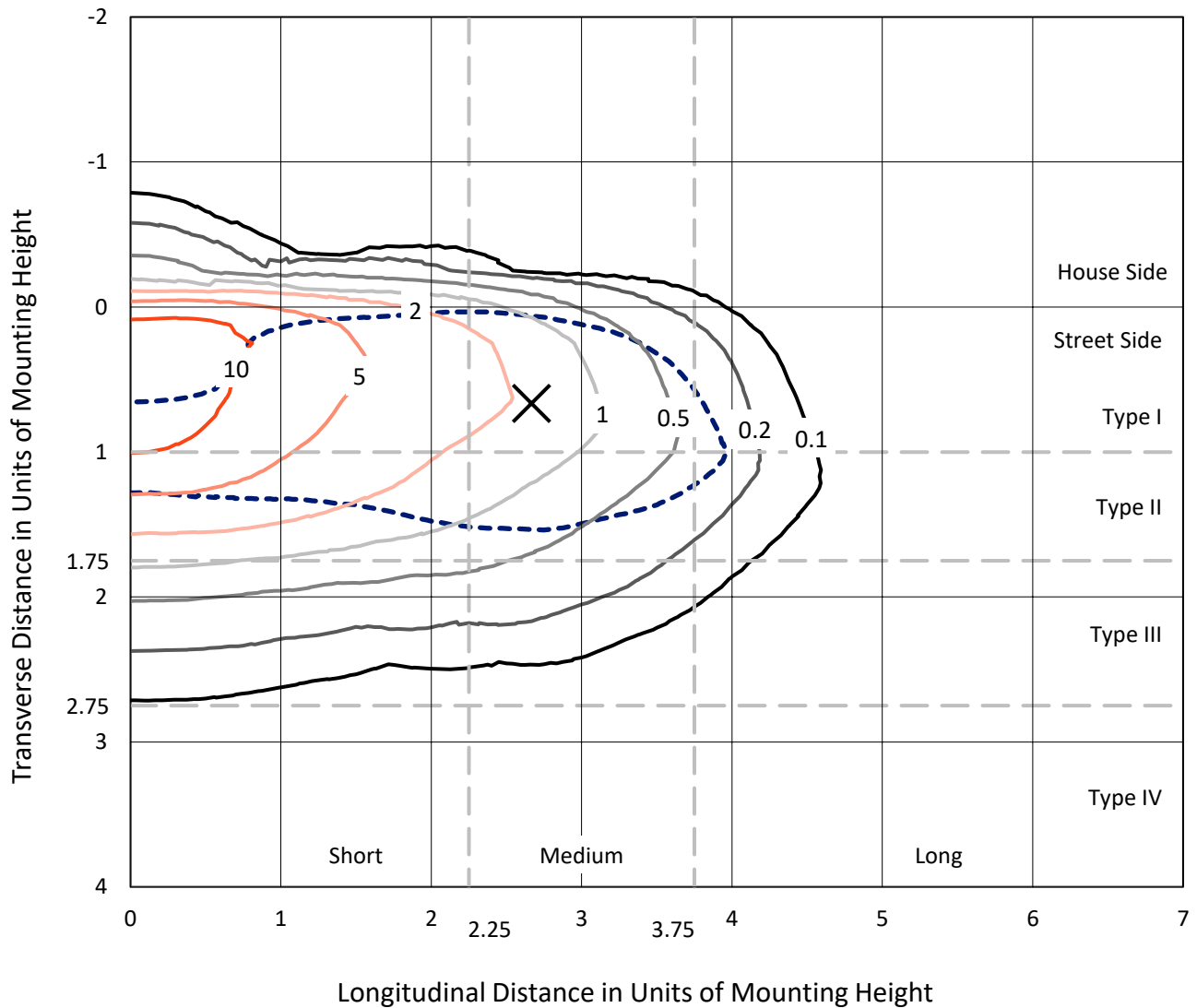
Lumens per Lamp: N/A  
Luminaire Lumens: 31344 lumens  
Efficiency: N/A  
Efficacy: 103.4 lumens/watt  
Luminous Opening: Rectangular (W 1.42' x L: 1.79' x H: 0')  
IES Classification: Type II - Medium  
BUG Rating: B1 - U0 - G4  
  
Input Watts (W): 303  
Input Voltage (V): NR  
Input Current (Ain): 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: 28.75 FT



REPORT NUMBER: P381195  
 CATALOG NUMBER: PRV-XL-PA4B-740-U-T2R-HSS

### Iso-Footcandle Lines of Horizontal Illumination

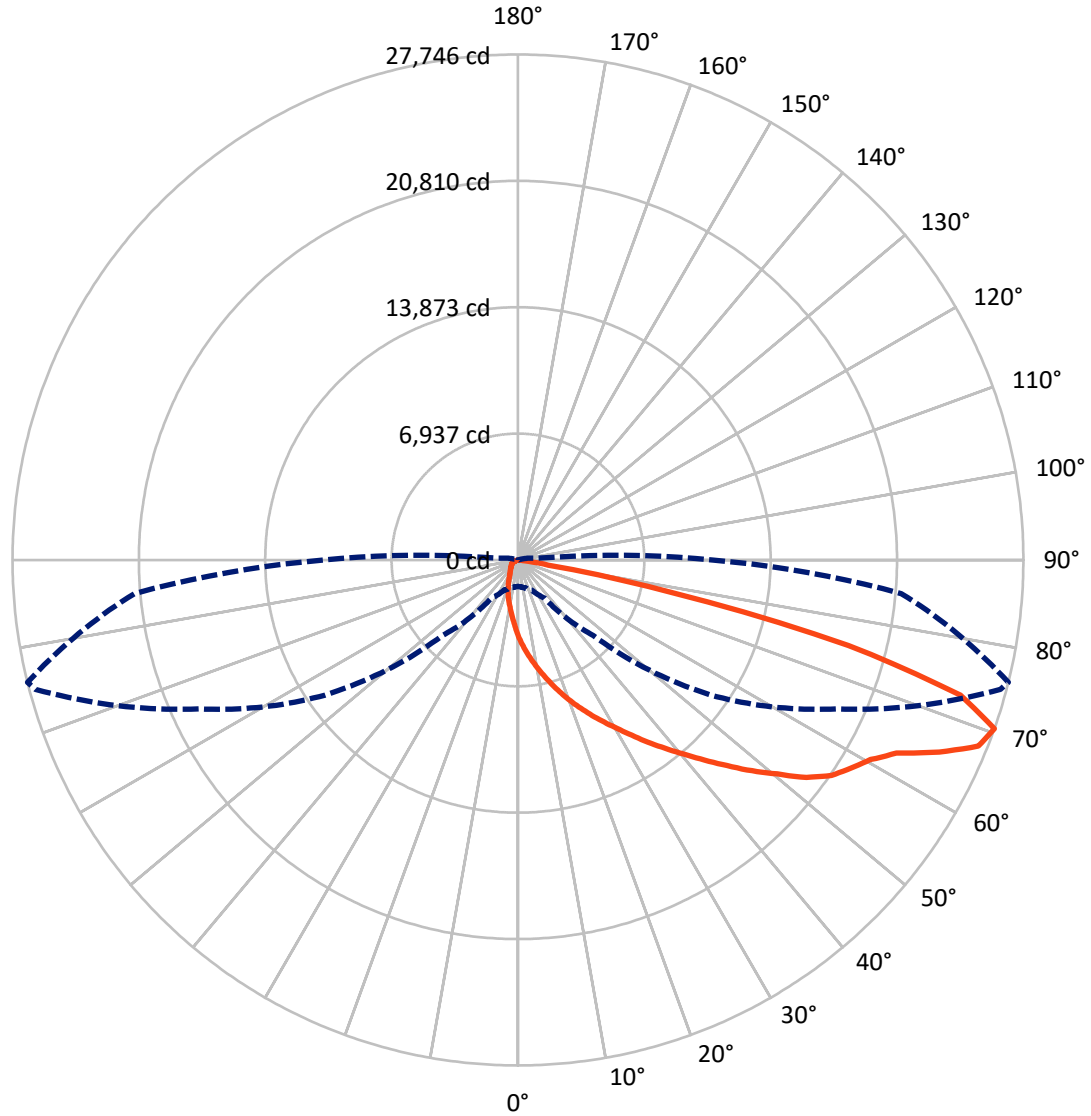
✕ Max cd  
 - - - 1/2 Max cd



Based on 25 foot mounting height. Maximum calculated value = 12.8 fc  
 Type II - Medium - N/A

REPORT NUMBER: P381195  
CATALOG NUMBER: PRV-XL-PA4B-740-U-T2R-HSS

### Luminous Intensity Polar Plot



— Vertical Plane Through 76-Deg Lateral      - - - Horizontal Cone Through 70-Deg Vertical

REPORT NUMBER: P381195  
 CATALOG NUMBER: PRV-XL-PA4B-740-U-T2R-HSS

**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	1478.3	0.0	1478.3
	% Fixture	4.7	0.0	4.7
<b>Street Side</b>	Lumens	29865.7	0.0	29865.7
	% Fixture	95.3	0.0	95.3
<b>Total</b>	Lumens	31344.0	0.0	31344.0
	% Fixture	100.0	0.0	100.0

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	395.2	1.3
10°-20°	1275.7	4.1
20°-30°	2375.8	7.6
30°-40°	4202.2	13.4
40°-50°	6426.2	20.5
50°-60°	7285.8	23.2
60°-70°	6245.7	19.9
70°-80°	3025.1	9.7
80°-90°	112.2	0.4
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°	31344.0	100.0
0°-180°	31344.0	100.0

**Coefficient of Utilization**

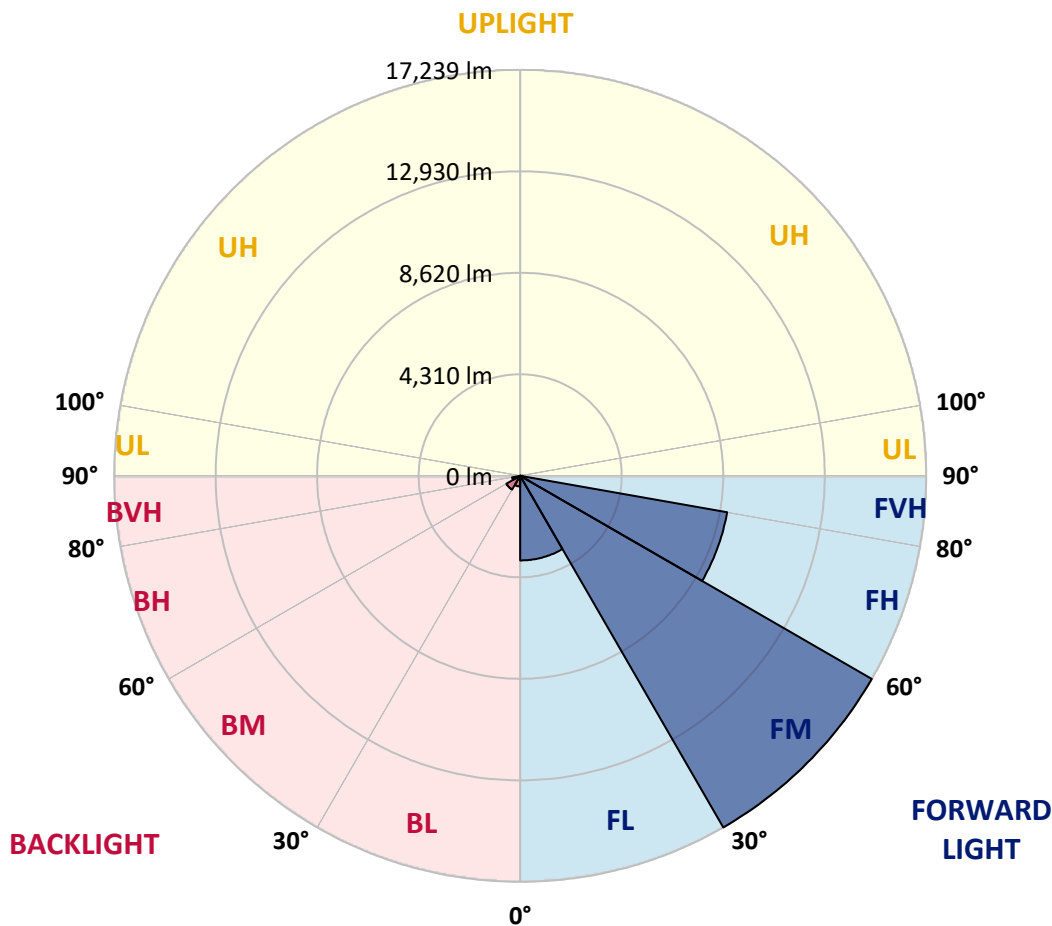


REPORT NUMBER: P381195  
 CATALOG NUMBER: PRV-XL-PA4B-740-U-T2R-HSS

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

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	3593.2	11.5			
FM (30°-60°)	17239.5	55.0			
FH (60°-80°)	8922.7	28.5			G4/12000
FVH (80°-90°)	110.3	0.4			G2/225
BL (0°-30°)	453.5	1.4	B1/500		
BM (30°-60°)	674.8	2.2	B1/1000		
BH (60°-80°)	348.1	1.1	B1/500		G1/500
BVH (80°-90°)	1.9	0.0			G0/10
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B1-U0-G4**  
 Type II Medium





REPORT NUMBER: P381195

CATALOG NUMBER: PRV-XL-PA4B-740-U-T2R-HSS

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	76°	85°
0°	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6
2.5°	5735.0	5703.7	5672.4	5552.4	5442.8	5343.6	5155.8	4910.5	4691.3	4644.4	4388.7
5°	6737.0	6700.4	6653.5	6533.4	6392.5	6225.6	5949.0	5573.3	5187.1	5103.6	4628.7
7.5°	7415.4	7384.0	7316.2	7258.8	7117.9	6956.1	6648.2	6209.9	5677.6	5573.3	4905.3
10°	7879.8	7858.9	7848.5	7801.5	7697.1	7566.7	7258.8	6799.6	6173.4	6053.3	5197.5
12.5°	8046.8	8046.8	8099.0	8177.2	8192.9	8151.1	7869.4	7410.1	6695.2	6570.0	5541.9
15°	7822.4	7848.5	7963.3	8213.8	8474.7	8646.9	8469.5	8041.6	7269.2	7133.6	5949.0
17.5°	7759.8	7785.9	7864.1	8083.3	8432.9	8892.2	8980.9	8652.1	7811.9	7697.1	6366.5
20°	7937.2	7963.3	8031.1	8219.0	8485.1	8949.6	9320.1	9241.8	8386.0	8265.9	6789.1
22.5°	8359.9	8375.5	8375.5	8521.7	8756.5	9100.9	9534.0	9800.2	8975.7	8845.2	7206.6
25°	9267.9	9236.6	9111.3	9038.3	9189.6	9471.4	9805.4	10290.7	9633.2	9455.7	7655.4
27.5°	10457.7	10562.0	10259.4	9909.7	9794.9	9956.7	10186.3	10723.8	10269.8	10082.0	8062.4
30°	12070.2	12028.4	11631.8	11130.9	10635.1	10577.7	10656.0	11094.3	10906.5	10729.0	8516.4
32.5°	13395.6	13473.9	13056.4	12445.9	11704.9	11355.2	11271.7	11537.9	11584.9	11470.0	9053.9
35°	14757.6	14841.1	14434.1	13755.7	12873.8	12289.3	12049.3	12085.8	12425.0	12278.9	9617.5
37.5°	15978.7	16051.8	15650.0	14955.9	14074.0	13359.1	13014.7	12732.9	13239.1	13108.6	10212.4
40°	16907.6	16918.1	16646.7	16025.7	15190.8	14449.8	14058.4	13505.2	14100.1	14011.4	10833.4
42.5°	17565.1	17586.0	17387.7	16855.4	16083.1	15394.3	15076.0	14418.4	15091.6	15013.3	11553.5
45°	17873.0	17909.6	17888.7	17398.2	16756.3	16161.4	16057.0	15389.1	16177.0	16104.0	12383.3
47.5°	17580.8	17580.8	17846.9	17779.1	17189.4	16792.8	16912.8	16401.4	17356.4	17288.6	13228.7
50°	16364.9	16380.6	16923.3	17700.8	17356.4	17267.7	17643.4	17392.9	18426.2	18467.9	14241.0
52.5°	13171.2	13145.2	14976.8	16469.3	17241.6	17481.6	18316.6	18405.3	19709.9	19835.1	15248.2
55°	9841.9	9826.3	11579.6	14288.0	16438.0	17372.1	18692.3	19308.1	20805.8	20884.0	15999.6
57.5°	7791.1	7749.3	8714.7	11517.0	14622.0	16881.5	18708.0	19480.3	21416.3	21552.0	16730.2
60°	5990.7	5954.2	6674.3	8568.6	12049.3	15576.9	18259.2	19490.7	22006.0	22246.1	17711.3
62.5°	4284.3	4326.1	4879.2	6147.3	9267.9	13734.8	17674.7	19636.8	23054.9	23326.3	19104.6
65°	2891.0	2870.1	3329.3	4185.2	6590.8	11256.1	16777.2	19944.7	24944.0	25418.8	20774.5
67.5°	2009.1	2024.7	2233.5	2724.0	4185.2	8641.7	15284.7	20116.9	26895.6	27266.2	21943.4
70°	1450.7	1471.6	1586.4	1831.7	2557.0	5860.3	12920.8	19329.0	27422.7	27746.2	21129.3
72.5°	955.0	996.7	1168.9	1299.4	1633.4	3668.5	9518.4	16651.9	25152.7	25392.7	17726.9
75°	516.6	527.1	751.4	970.6	1163.7	2285.7	5677.6	11230.0	18817.6	18739.3	11689.2
77.5°	401.8	417.5	464.4	694.0	782.8	1257.6	2243.9	5072.3	8913.0	8673.0	3986.9
80°	245.3	255.7	323.5	412.3	547.9	730.6	657.5	1377.7	1810.8	1696.0	584.5
82.5°	146.1	156.6	193.1	344.4	433.1	344.4	229.6	334.0	339.2	334.0	146.1
85°	26.1	26.1	135.7	240.0	229.6	99.1	135.7	109.6	99.1	104.4	31.3
87.5°	0.0	0.0	52.2	73.1	104.4	36.5	52.2	26.1	26.1	26.1	15.7
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: P381195

CATALOG NUMBER: PRV-XL-PA4B-740-U-T2R-HSS

**CANDELA DISTRIBUTION (continued):**

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6	4195.6
2.5°	4232.1	4054.7	3689.4	3371.1	3052.8	2817.9	2640.5	2457.9	2395.2	2317.0	2275.2
5°	4305.2	3955.5	3230.2	2650.9	2160.4	1784.7	1544.6	1398.5	1304.6	1236.8	1221.1
7.5°	4414.8	3877.3	2859.7	2076.9	1539.4	1163.7	965.4	866.3	814.1	782.8	772.3
10°	4545.2	3809.4	2494.4	1617.7	1085.4	819.3	709.7	668.0	647.1	636.6	631.4
12.5°	4727.9	3783.3	2186.5	1247.2	819.3	673.2	615.8	589.7	574.0	558.4	553.2
15°	4967.9	3793.8	1904.7	965.4	678.4	600.1	553.2	527.1	506.2	490.5	490.5
17.5°	5218.4	3809.4	1628.1	782.8	615.8	547.9	495.7	459.2	443.6	427.9	422.7
20°	5453.2	3804.2	1362.0	668.0	558.4	490.5	438.3	401.8	375.7	360.1	360.1
22.5°	5677.6	3772.9	1111.5	600.1	511.4	433.1	375.7	339.2	318.3	302.7	302.7
25°	5917.7	3710.3	908.0	547.9	454.0	380.9	323.5	287.0	271.4	255.7	255.7
27.5°	6105.5	3605.9	741.0	501.0	401.8	328.8	276.6	245.3	229.6	219.2	219.2
30°	6309.0	3454.6	615.8	448.8	349.6	281.8	234.8	208.7	193.1	187.9	187.9
32.5°	6533.4	3287.6	527.1	396.6	297.4	240.0	198.3	182.6	167.0	161.8	161.8
35°	6794.4	3141.5	474.9	344.4	260.9	203.5	172.2	156.6	146.1	146.1	146.1
37.5°	7091.8	2990.1	427.9	302.7	224.4	172.2	146.1	140.9	135.7	130.5	130.5
40°	7415.4	2828.4	386.2	266.1	193.1	146.1	125.2	125.2	120.0	120.0	120.0
42.5°	7780.6	2687.5	349.6	234.8	167.0	125.2	109.6	109.6	104.4	104.4	104.4
45°	8177.2	2557.0	318.3	208.7	146.1	109.6	99.1	93.9	88.7	88.7	88.7
47.5°	8646.9	2484.0	292.2	182.6	125.2	93.9	83.5	78.3	73.1	67.8	67.8
50°	9247.0	2515.3	266.1	151.3	109.6	78.3	67.8	62.6	57.4	52.2	52.2
52.5°	9721.9	2499.6	229.6	130.5	88.7	62.6	52.2	47.0	41.7	36.5	36.5
55°	10066.3	2437.0	198.3	109.6	67.8	52.2	41.7	31.3	26.1	26.1	26.1
57.5°	10405.5	2374.4	167.0	88.7	52.2	36.5	26.1	20.9	20.9	20.9	20.9
60°	10932.6	2285.7	146.1	73.1	41.7	26.1	15.7	15.7	10.4	10.4	10.4
62.5°	11574.4	2176.1	120.0	62.6	31.3	20.9	10.4	10.4	0.0	0.0	0.0
65°	12278.9	1983.0	99.1	47.0	26.1	15.7	10.4	0.0	0.0	0.0	0.0
67.5°	12117.1	1591.6	83.5	31.3	20.9	10.4	5.2	0.0	0.0	0.0	0.0
70°	10718.6	1075.0	67.8	26.1	15.7	10.4	5.2	0.0	0.0	0.0	0.0
72.5°	8396.4	636.6	47.0	20.9	10.4	5.2	0.0	0.0	0.0	0.0	0.0
75°	5375.0	318.3	31.3	15.7	10.4	5.2	0.0	0.0	0.0	0.0	0.0
77.5°	1800.3	156.6	20.9	10.4	5.2	0.0	0.0	0.0	0.0	0.0	0.0
80°	255.7	52.2	10.4	5.2	5.2	0.0	0.0	0.0	0.0	0.0	0.0
82.5°	57.4	20.9	5.2	5.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0
85°	20.9	10.4	5.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
87.5°	10.4	5.2	0.0	0.0	0.0	0.0	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)