

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: STREETWORKS

Report Number: P198650

Luminaire Tested: **XNV-AF-01-LED-U-5NQ-600**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P198650  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P24130)  
Test Lab: INNOVATION CENTER P2  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: XNV-AF-01-LED-U-5NQ-600  
Description: XNV ROADWAY AND AREA LUMINAIRE  
(1) 70 CRI, 4000K, 615mA LIGHTSQUARE WITH 16 LEDS EACH AND TYPE V NARROW OPTICS  
Light Source: -  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4191 lumens  
Efficiency: N/A  
Efficacy: 123.3 lumens/watt  
Luminous Opening: Rectangular (W 0.5' x L: 0.5' x H: 0')  
IES Classification: Type V - Short - Full Cutoff  
BUG Rating: B2 - U0 - G1

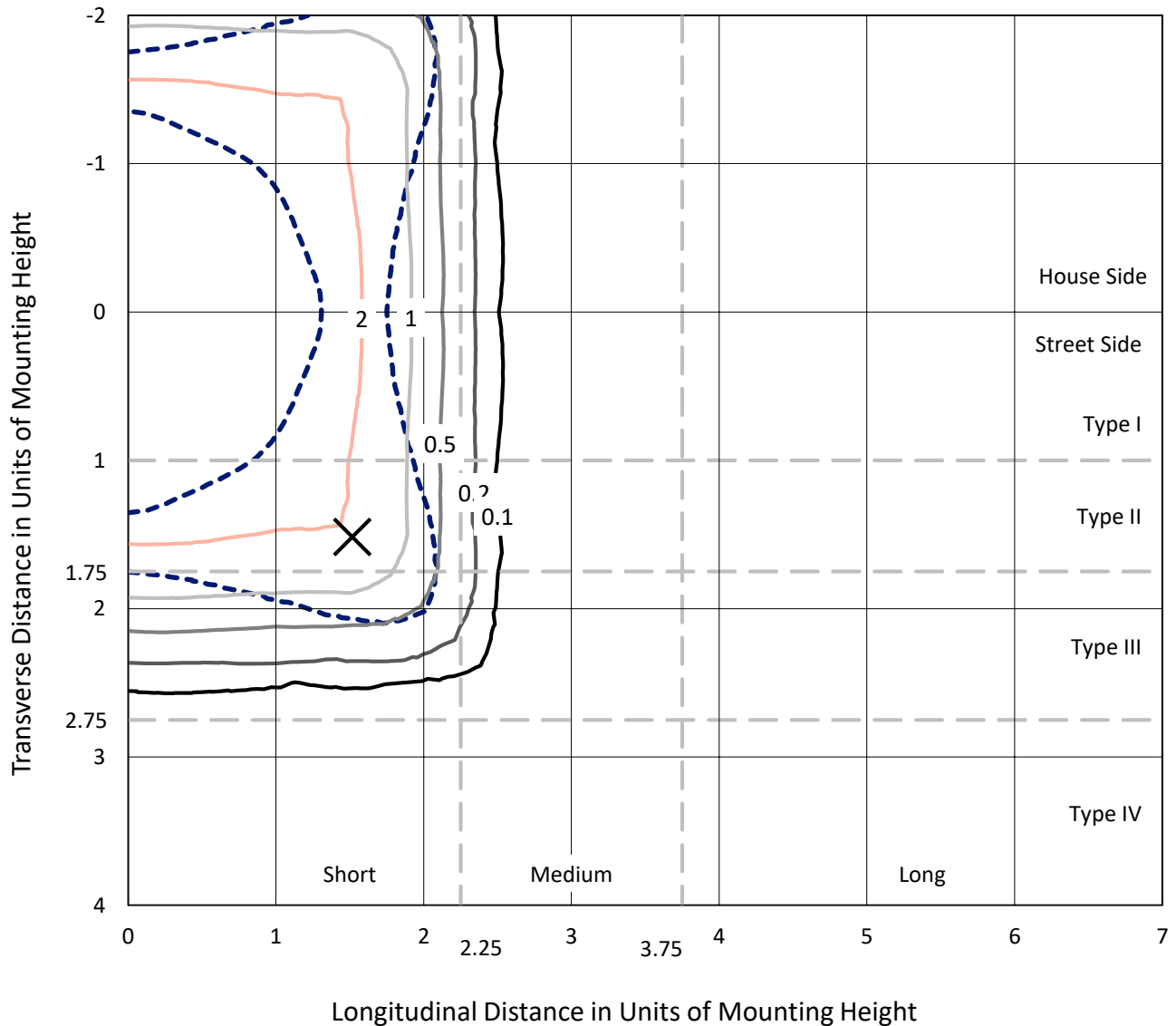
Input Watts (W): 34  
Input Voltage (V): NR  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 28.75 FT



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### Iso-Footcandle Lines of Horizontal Illumination

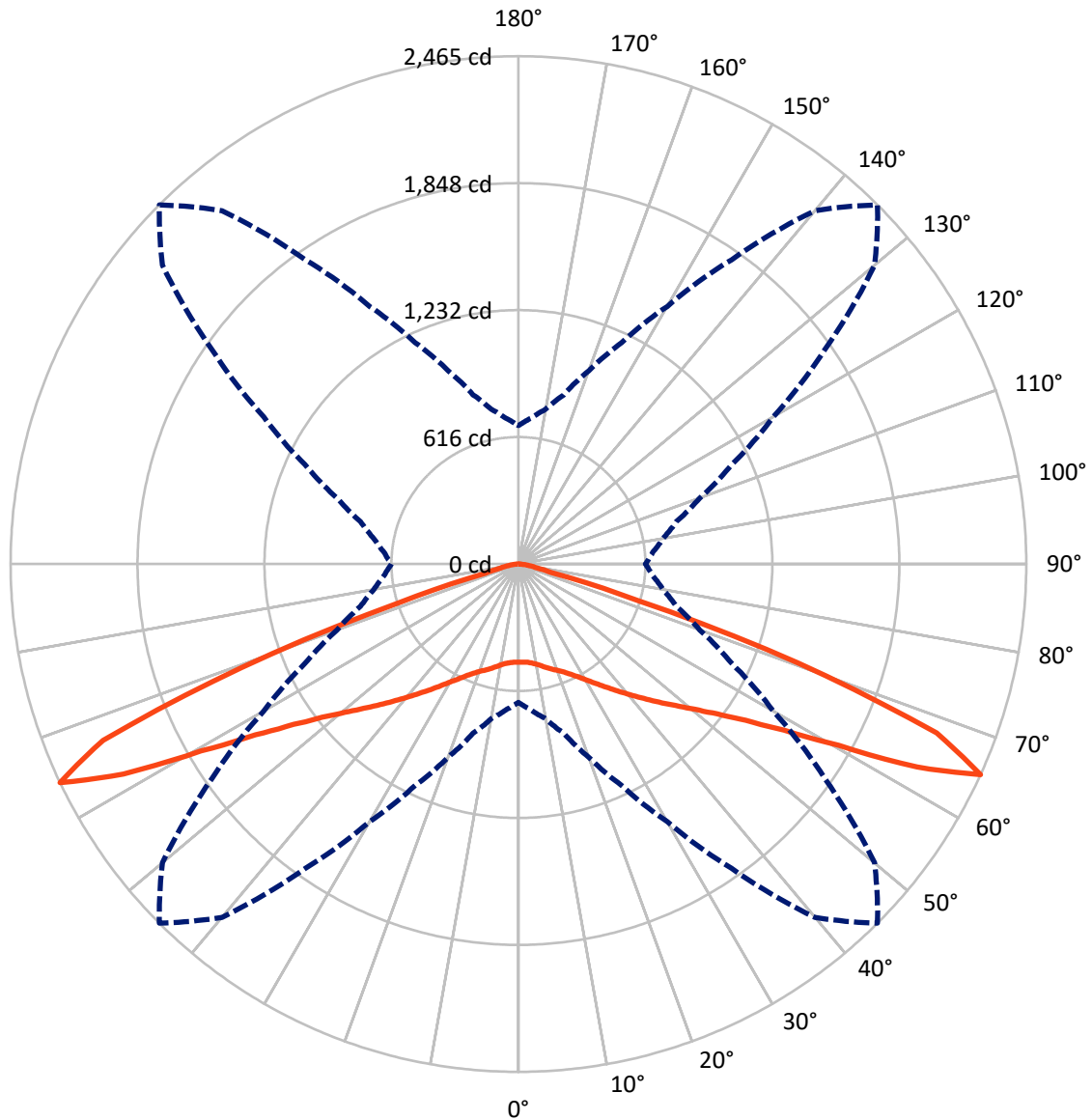
✕ Max cd  
 - - - 1/2 Max cd



Based on 10 foot mounting height. Maximum calculated value = 4.8 fc  
 Type V - Short - Full Cutoff

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### Luminous Intensity Polar Plot



— Vertical Plane Through 45-Deg Lateral      - - - Horizontal Cone Through 65-Deg Vertical

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**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	2095.5	0.0	2095.5
	% Fixture	50.0	0.0	50.0
<b>Street Side</b>	Lumens	2095.5	0.0	2095.5
	% Fixture	50.0	0.0	50.0
<b>Total</b>	Lumens	4191.0	0.0	4191.0
	% Fixture	100.0	0.0	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	46.4	1.1
10°-20°	148.8	3.6
20°-30°	277.6	6.6
30°-40°	468.0	11.2
40°-50°	760.2	18.1
50°-60°	1191.1	28.4
60°-70°	1124.3	26.8
70°-80°	151.5	3.6
80°-90°	23.1	0.6
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°	4191.0	100.0
0°-180°	4191.0	100.0



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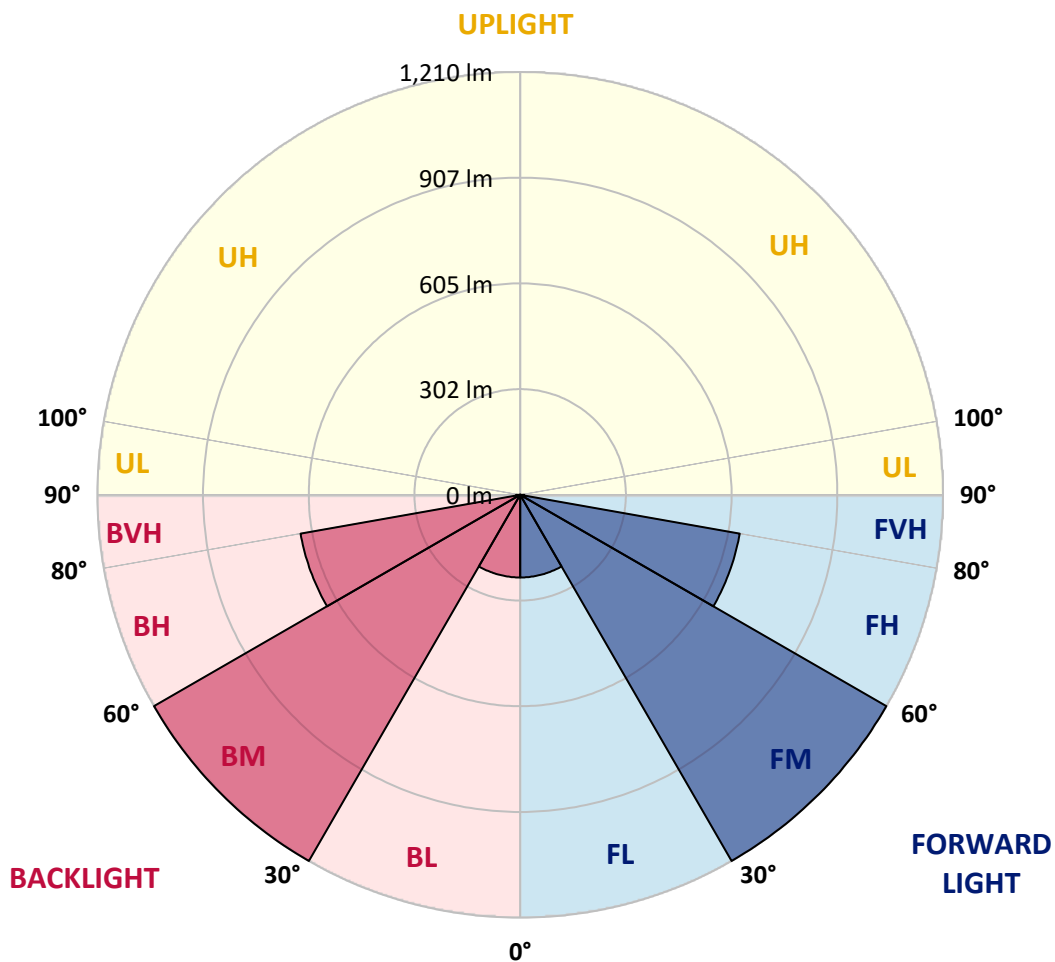
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**LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:**

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	236.4	5.6			
FM (30°-60°)	1209.6	28.9			
FH (60°-80°)	637.9	15.2			G0/660
FVH (80°-90°)	11.5	0.3			G1/100
BL (0°-30°)	236.4	5.6	B1/500		
BM (30°-60°)	1209.6	28.9	B2/2500		
BH (60°-80°)	637.9	15.2	B2/1000		G0/660
BVH (80°-90°)	11.5	0.3			G1/100
UL (90°-100°)	0.0	0.0		U0/0	
UH (100°-180°)	0.0	0.0		U0/0	

**BUG Rating: B2-U0-G1**

Type V Short





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**CANDELA DISTRIBUTION (FULL):**

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	476.7	476.7	476.7	476.7	476.7	476.7	476.7	476.7	476.7	476.7	476.7
2.5°	480.7	480.7	481.4	481.2	480.1	479.4	478.5	477.5	477.0	476.5	476.2
5°	483.2	483.2	484.1	483.8	483.0	481.9	481.4	480.7	479.9	479.4	479.6
7.5°	489.8	490.0	490.3	490.0	489.3	488.5	487.4	487.1	486.1	485.4	485.9
10°	499.7	499.7	499.9	500.2	499.7	497.9	497.9	497.4	496.3	495.2	495.5
12.5°	510.7	510.7	511.0	511.0	511.0	509.8	510.1	509.8	508.6	508.1	508.6
15°	521.4	521.6	521.6	522.1	522.1	522.4	523.4	523.4	522.9	522.6	522.6
17.5°	533.9	534.4	534.7	535.5	535.7	536.2	537.3	537.6	537.8	537.0	537.3
20°	550.7	550.9	551.7	551.9	553.0	553.0	553.5	553.2	552.7	551.7	551.7
22.5°	569.4	569.9	571.5	571.5	572.8	572.0	572.2	571.5	570.2	569.7	569.2
25°	593.9	594.7	596.1	595.6	596.1	594.7	594.7	594.7	593.9	593.2	592.9
27.5°	625.0	623.7	625.0	624.0	623.7	622.7	623.0	622.4	621.6	621.3	620.3
30°	657.3	655.8	656.6	656.8	656.3	656.1	655.0	654.3	652.9	653.3	652.4
32.5°	694.5	692.8	693.7	694.0	693.5	694.0	693.7	691.8	690.3	691.3	691.3
35°	738.6	737.5	739.6	740.4	738.9	738.1	737.0	734.9	732.5	734.2	734.4
37.5°	791.6	790.2	791.9	793.9	791.0	789.5	785.3	782.1	780.6	781.4	782.5
40°	846.7	846.9	851.4	851.9	848.7	846.9	842.7	838.1	833.6	833.6	834.9
42.5°	904.6	905.4	910.6	912.5	911.4	908.0	902.2	896.5	890.8	891.8	893.4
45°	970.2	969.1	974.6	979.1	978.2	977.2	971.7	961.3	956.0	955.8	958.4
47.5°	1039.1	1041.2	1046.9	1054.5	1054.3	1051.6	1044.5	1034.9	1025.2	1026.0	1029.2
50°	1119.5	1122.4	1132.0	1139.6	1140.6	1139.9	1131.5	1120.2	1106.7	1107.4	1111.6
52.5°	1191.5	1195.7	1207.0	1222.6	1232.2	1236.7	1231.2	1220.8	1207.0	1207.7	1212.2
55°	1256.8	1263.3	1280.0	1301.5	1320.8	1338.8	1346.9	1346.6	1336.5	1338.8	1344.6
57.5°	1297.8	1306.9	1332.3	1366.8	1405.1	1441.4	1472.7	1502.2	1508.8	1521.0	1521.0
60°	1242.7	1264.2	1297.8	1356.8	1432.2	1513.8	1601.9	1687.9	1743.2	1786.8	1763.3
62.5°	1037.8	1069.4	1116.7	1194.4	1311.9	1457.3	1634.6	1834.4	2042.6	2170.1	2076.6
65°	671.5	711.2	762.6	850.1	998.1	1185.3	1443.5	1802.4	2238.4	2464.6	2255.7
67.5°	266.1	293.0	324.3	386.4	514.9	698.7	988.5	1431.2	1976.6	2189.9	1955.7
70°	127.2	131.6	137.6	150.9	183.0	246.9	397.1	705.1	1212.2	1436.9	1183.1
72.5°	91.9	92.7	95.5	99.9	109.4	122.4	148.8	215.6	418.0	607.7	418.5
75°	69.7	70.8	72.3	74.7	79.6	85.9	95.9	114.9	143.1	165.0	142.8
77.5°	53.0	54.0	55.3	57.7	60.4	64.8	68.4	76.0	88.0	92.7	92.2
80°	38.7	40.5	42.6	44.6	46.4	48.6	48.8	52.5	59.2	63.7	62.4
82.5°	24.6	26.1	31.6	34.0	34.2	34.7	34.5	34.7	38.4	41.5	40.5
85°	15.7	16.7	19.5	22.2	21.7	22.7	22.7	22.2	20.7	17.8	21.2
87.5°	7.9	8.1	9.4	11.8	11.3	9.9	9.6	9.6	7.1	6.0	6.5
90°	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):**

	55°	60°	65°	70°	75°	80°	85°	90°
0°	476.7	476.7	476.7	476.7	476.7	476.7	476.7	476.7
2.5°	475.5	476.0	475.2	475.2	474.9	475.5	474.6	474.6
5°	479.0	479.9	479.6	479.6	480.1	480.7	480.4	480.1
7.5°	485.6	486.1	486.6	486.9	487.4	487.1	487.6	487.4
10°	495.5	495.0	495.8	495.0	495.2	494.7	495.0	495.0
12.5°	508.1	507.3	506.8	506.3	506.3	505.1	505.1	505.4
15°	522.4	521.1	520.1	519.6	519.0	519.0	518.2	518.7
17.5°	536.5	535.2	533.4	533.4	532.5	532.0	531.5	532.9
20°	551.4	550.0	549.0	548.8	547.2	546.7	547.0	548.5
22.5°	568.7	567.8	567.8	567.3	566.3	565.5	565.5	567.3
25°	591.9	590.2	590.5	590.9	590.2	590.2	589.7	591.1
27.5°	620.3	619.0	619.8	620.3	619.8	620.6	619.8	620.8
30°	653.8	652.9	653.8	654.5	653.3	653.3	652.6	653.5
32.5°	693.7	692.6	693.2	693.2	691.3	689.8	687.6	689.3
35°	737.5	736.2	737.2	738.1	736.0	734.4	731.3	732.5
37.5°	785.8	786.3	787.7	791.0	790.5	787.9	785.6	786.6
40°	839.8	842.5	848.2	850.6	850.1	847.4	844.3	844.9
42.5°	901.0	904.4	910.3	914.3	912.5	908.8	904.9	906.4
45°	967.5	972.7	980.6	984.5	982.1	978.2	972.7	975.7
47.5°	1038.0	1048.5	1059.0	1064.2	1063.4	1057.8	1050.9	1051.6
50°	1122.4	1136.2	1149.5	1154.7	1150.8	1142.4	1132.5	1132.3
52.5°	1227.3	1242.2	1253.1	1251.9	1242.2	1229.2	1217.9	1217.4
55°	1358.4	1363.4	1361.8	1350.5	1333.6	1313.2	1298.8	1296.5
57.5°	1516.8	1500.2	1475.6	1441.6	1403.6	1364.9	1338.8	1329.1
60°	1710.6	1635.1	1547.4	1454.9	1370.7	1307.4	1267.5	1243.3
62.5°	1870.6	1652.1	1456.1	1295.5	1164.1	1086.1	1031.5	997.8
65°	1815.7	1427.3	1143.2	936.2	792.9	712.2	654.5	616.1
67.5°	1402.8	953.7	663.7	460.0	348.8	295.3	258.0	233.6
70°	707.3	365.8	221.7	156.4	133.7	124.3	118.0	114.4
72.5°	207.6	138.6	115.2	101.8	93.7	88.0	84.3	82.4
75°	114.9	93.7	82.8	75.2	70.0	66.1	63.7	62.1
77.5°	79.1	68.1	62.7	57.7	53.5	50.6	48.8	47.3
80°	55.3	49.8	47.5	44.9	41.7	39.4	36.8	35.8
82.5°	36.8	34.5	34.0	31.8	30.1	27.4	22.7	21.2
85°	21.7	21.4	21.4	20.7	19.3	17.0	13.6	13.6
87.5°	7.6	7.9	8.1	8.6	8.4	7.1	5.7	5.5
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)