

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: PORTFOLIO

Report Number: P250147

Luminaire Tested: **LD8B200D010 ER8B200840 8LBM0WH**

Issue Date: 03/03/2020

Test Information

Test Method: LM-79-08
Report Number: P250147
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (P13942)
Test Lab: INNOVATION CENTER-P1
Issue Date: 03/03/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: PORTFOLIO
Catalog Number: LD8B200D010 ER8B200840 8LBM0WH
Description: PORTFOLIO 8 INCH MEDIUM DISTRIBUTION 55 DEG CUTOFF RECESSED
DOWNLIGHT
80 CRI 4000 CCT WITH WHEAT TRIM
Light Source: -
Ballast/Driver: -

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 21384.0 lumens
Efficiency: N/A
Efficacy: 95.8 lumens/watt
Spacing Criteria (0/90/45): 0.84 / 0.8 / 0.85
Luminous Opening: Circular (Dia: 0.67' x H: 0')
CIE Type: Direct

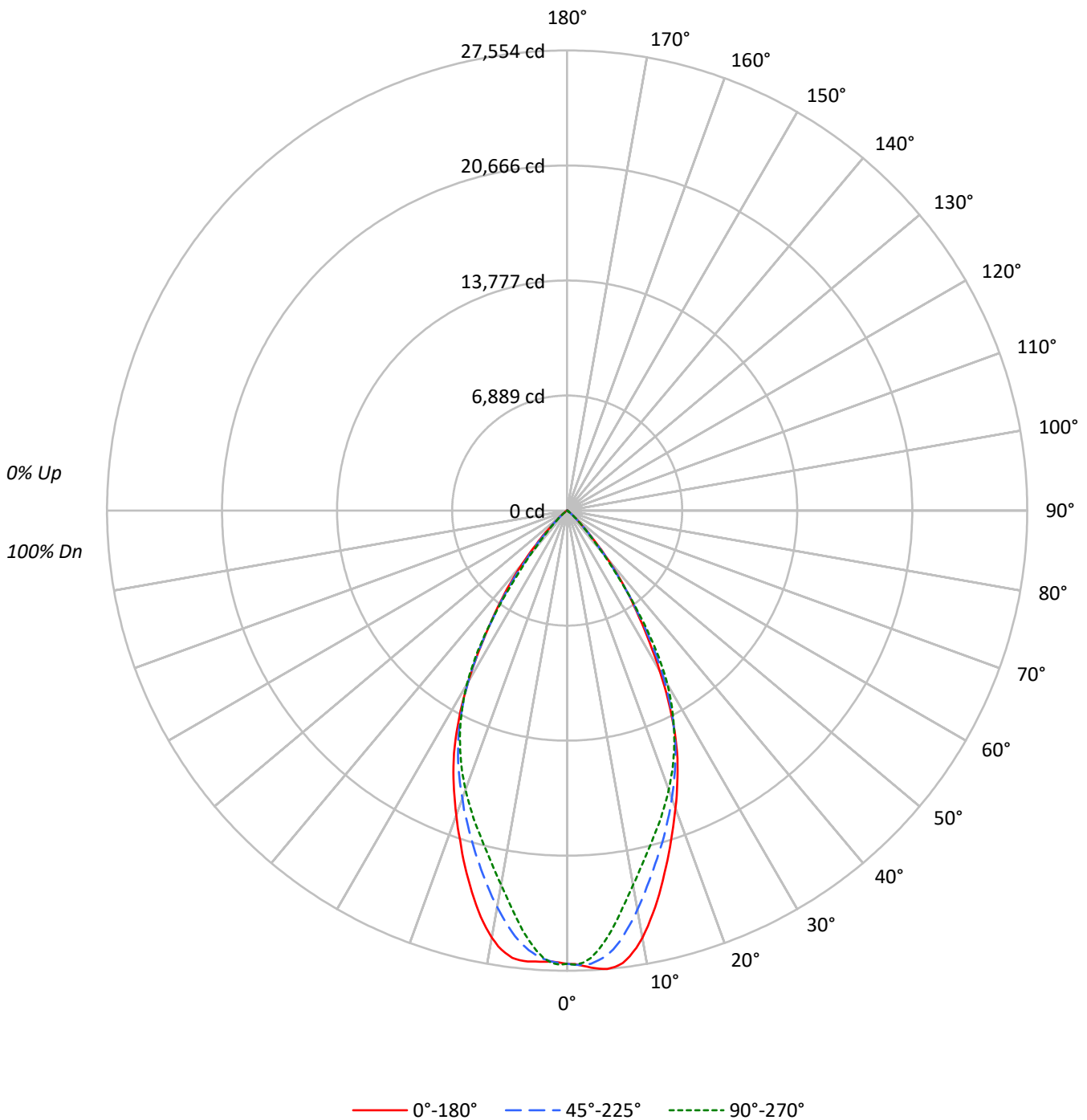
Input Watts (W): 223.3
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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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 | 50 | 30 | 10 | 50 | 30 | 10 | 0 | | |
| RCR | | | | | | | | | | | | | | | | | | | | | | | | | | |
| 0 | 119 | 119 | 119 | 119 | 116 | 116 | 116 | 116 | 111 | 111 | 111 | 106 | 106 | 106 | 102 | 102 | 102 | 100 | 100 | 100 | 100 | 100 | 100 | 100 | | |
| 1 | 114 | 111 | 108 | 106 | 111 | 109 | 107 | 105 | 105 | 103 | 101 | 101 | 100 | 98 | 98 | 97 | 96 | 94 | 94 | 94 | 94 | 94 | 94 | 94 | | |
| 2 | 108 | 103 | 99 | 96 | 106 | 102 | 98 | 95 | 98 | 95 | 93 | 95 | 93 | 91 | 93 | 91 | 89 | 87 | 87 | 87 | 87 | 87 | 87 | 87 | | |
| 3 | 103 | 97 | 92 | 88 | 101 | 95 | 91 | 87 | 93 | 89 | 86 | 90 | 87 | 84 | 88 | 85 | 83 | 81 | 81 | 81 | 81 | 81 | 81 | 81 | | |
| 4 | 98 | 90 | 85 | 81 | 96 | 89 | 84 | 80 | 87 | 83 | 79 | 85 | 81 | 78 | 83 | 80 | 77 | 76 | 76 | 76 | 76 | 76 | 76 | 76 | | |
| 5 | 93 | 85 | 79 | 75 | 91 | 84 | 78 | 74 | 82 | 77 | 74 | 80 | 76 | 73 | 79 | 75 | 72 | 71 | 71 | 71 | 71 | 71 | 71 | 71 | | |
| 6 | 88 | 80 | 74 | 69 | 87 | 79 | 73 | 69 | 77 | 72 | 69 | 76 | 72 | 68 | 75 | 71 | 68 | 66 | 66 | 66 | 66 | 66 | 66 | 66 | | |
| 7 | 84 | 75 | 69 | 65 | 83 | 74 | 69 | 65 | 73 | 68 | 64 | 72 | 67 | 64 | 71 | 67 | 64 | 62 | 62 | 62 | 62 | 62 | 62 | 62 | | |
| 8 | 80 | 71 | 65 | 61 | 79 | 70 | 64 | 61 | 69 | 64 | 60 | 68 | 63 | 60 | 67 | 63 | 60 | 58 | 58 | 58 | 58 | 58 | 58 | 58 | | |
| 9 | 76 | 67 | 61 | 57 | 75 | 66 | 61 | 57 | 65 | 60 | 57 | 64 | 60 | 56 | 64 | 59 | 56 | 55 | 55 | 55 | 55 | 55 | 55 | 55 | | |
| 10 | 73 | 63 | 57 | 54 | 72 | 63 | 57 | 54 | 62 | 57 | 53 | 61 | 56 | 53 | 60 | 56 | 53 | 52 | 52 | 52 | 52 | 52 | 52 | 52 | | |

AVERAGE LUMINANCE (cd/sqm):

| | 0° | 90° | 180° |
|-----|--------|--------|--------|
| 0° | 836842 | 836842 | 836842 |
| 5° | 852906 | 801235 | 839014 |
| 10° | 813182 | 712777 | 812976 |
| 15° | 718072 | 642875 | 730286 |
| 20° | 622280 | 583519 | 637001 |
| 25° | 525771 | 516792 | 545076 |
| 30° | 395167 | 427825 | 422185 |
| 35° | 264529 | 279681 | 286883 |
| 40° | 148207 | 127223 | 169984 |
| 45° | 59561 | 52366 | 70786 |
| 50° | 20571 | 19942 | 24375 |
| 55° | 5677 | 6742 | 6387 |
| 60° | 3256 | 4070 | 3663 |
| 65° | 2889 | 2401 | 1919 |
| 70° | 0 | 1794 | 1190 |
| 75° | 0 | 0 | 0 |
| 80° | 0 | 0 | 1172 |
| 85° | 0 | 0 | 0 |



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ZONAL LUMENS:

| Zone | Lumens | % Fixture |
|-----------|---------|-----------|
| 0°-10° | 2463.6 | 11.5 |
| 10°-20° | 5958.6 | 27.9 |
| 20°-30° | 6983.8 | 32.7 |
| 30°-40° | 4595.0 | 21.5 |
| 40°-50° | 1199.1 | 5.6 |
| 50°-60° | 147.5 | 0.7 |
| 60°-70° | 30.6 | 0.1 |
| 70°-80° | 5.7 | 0.0 |
| 80°-90° | 0.2 | 0.0 |
| 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°-30° | 15406.0 | 72.0 |
| 0°-40° | 20001.0 | 93.5 |
| 0°-60° | 21347.5 | 99.8 |
| 0°-90° | 21384.0 | 100.0 |
| 90°-120° | 0.0 | 0.0 |
| 90°-150° | 0.0 | 0.0 |
| 90°-180° | 0.0 | 0.0 |
| 0°-180° | 21384.0 | 100.0 |

CANDELA DISTRIBUTION:

| | 0° | 45° | 90° | 135° | 180° | Flux |
|-----|-------|-------|-------|-------|-------|------|
| 0° | 27138 | 27138 | 27138 | 27138 | 27138 | |
| 5° | 27554 | 26769 | 25885 | 26419 | 27105 | ### |
| 15° | 22493 | 21220 | 20138 | 21220 | 22876 | 6270 |
| 25° | 15453 | 15301 | 15189 | 15446 | 16020 | 6966 |
| 35° | 7027 | 7185 | 7430 | 7502 | 7621 | 4400 |
| 45° | 1366 | 1287 | 1201 | 1392 | 1623 | 1224 |
| 55° | 106 | 112 | 125 | 125 | 119 | 140 |
| 65° | 40 | 33 | 33 | 26 | 26 | 28 |
| 75° | 0 | 7 | 0 | 0 | 0 | 3 |
| 85° | 0 | 0 | 0 | 0 | 0 | 0 |
| 90° | 0 | 0 | 0 | 0 | 0 | |



TEST NUMBER: P250147

CATALOG NUMBER: LD8B200D010 ER8B200840 8LBM0WH

CANDELA DISTRIBUTION (FULL):

| | 0° | 22.5° | 45° | 67.5° | 90° | 112.5° | 135° | 157.5° | 180° |
|-------|---------|---------|---------|---------|---------|---------|---------|---------|---------|
| 0° | 27138.2 | 27138.2 | 27138.2 | 27138.2 | 27138.2 | 27138.2 | 27138.2 | 27138.2 | 27138.2 |
| 1° | 27157.9 | 27197.6 | 27210.7 | 27250.4 | 27191.0 | 27151.4 | 27098.6 | 27058.9 | 27065.6 |
| 2° | 27276.7 | 27296.6 | 27223.9 | 27197.6 | 27092.0 | 27058.9 | 27019.4 | 27012.8 | 27019.4 |
| 3° | 27402.2 | 27362.5 | 27171.1 | 26993.1 | 26834.7 | 26814.8 | 26887.5 | 26993.1 | 27052.3 |
| 4° | 27501.1 | 27395.5 | 26993.1 | 26663.1 | 26412.3 | 26392.6 | 26682.9 | 26953.4 | 27065.6 |
| 5° | 27553.9 | 27362.5 | 26768.7 | 26214.4 | 25884.6 | 26009.9 | 26419.0 | 26900.6 | 27105.1 |
| 6° | 27481.3 | 27197.6 | 26425.6 | 25686.6 | 25310.5 | 25475.5 | 26075.9 | 26775.3 | 27078.8 |
| 7° | 27296.6 | 26933.7 | 25983.5 | 25112.5 | 24650.7 | 24908.0 | 25673.4 | 26564.1 | 26979.8 |
| 8° | 26953.4 | 26517.9 | 25422.7 | 24446.1 | 23990.8 | 24281.1 | 25178.6 | 26260.6 | 26742.3 |
| 9° | 26504.7 | 26023.1 | 24868.4 | 23839.1 | 23350.9 | 23693.9 | 24663.9 | 25858.1 | 26412.3 |
| 10° | 25970.3 | 25455.6 | 24254.8 | 23205.7 | 22763.7 | 23086.9 | 24109.6 | 25389.6 | 25963.7 |
| 11° | 25343.4 | 24848.6 | 23641.1 | 22611.9 | 22189.6 | 22506.3 | 23555.4 | 24828.9 | 25449.0 |
| 12° | 24663.9 | 24208.6 | 23014.4 | 22037.8 | 21641.9 | 21945.5 | 22961.6 | 24248.2 | 24861.8 |
| 13° | 23984.2 | 23528.9 | 22407.4 | 21483.6 | 21120.6 | 21410.9 | 22380.9 | 23614.8 | 24228.3 |
| 14° | 23251.9 | 22836.2 | 21800.3 | 20955.6 | 20625.8 | 20902.9 | 21787.1 | 22974.7 | 23555.4 |
| 15° | 22493.1 | 22163.1 | 21219.6 | 20447.6 | 20137.6 | 20401.4 | 21219.6 | 22314.9 | 22875.7 |
| 16° | 21780.5 | 21477.0 | 20658.7 | 19946.1 | 19688.9 | 19900.0 | 20645.7 | 21655.2 | 22189.6 |
| 17° | 21054.6 | 20777.6 | 20097.9 | 19451.3 | 19220.4 | 19425.0 | 20058.3 | 20988.7 | 21470.3 |
| 18° | 20328.9 | 20097.9 | 19484.4 | 18930.1 | 18725.6 | 18910.3 | 19477.8 | 20315.7 | 20751.1 |
| 19° | 19655.8 | 19444.7 | 18923.5 | 18455.0 | 18270.3 | 18435.2 | 18969.7 | 19669.1 | 20104.5 |
| 20° | 18963.1 | 18791.5 | 18336.2 | 17953.6 | 17781.9 | 17933.7 | 18349.4 | 19029.1 | 19411.7 |
| 21° | 18296.6 | 18144.9 | 17749.0 | 17425.6 | 17287.1 | 17412.6 | 17795.2 | 18408.8 | 18745.3 |
| 22° | 17603.9 | 17518.1 | 17161.8 | 16891.2 | 16798.9 | 16878.0 | 17227.7 | 17755.6 | 18072.4 |
| 23° | 16924.2 | 16845.1 | 16574.5 | 16350.2 | 16271.0 | 16350.2 | 16660.4 | 17135.4 | 17419.2 |
| 24° | 16238.0 | 16152.3 | 15954.4 | 15809.1 | 15743.2 | 15809.1 | 16073.0 | 16475.5 | 16746.1 |
| 25° | 15452.9 | 15439.7 | 15301.2 | 15221.9 | 15189.0 | 15261.5 | 15446.3 | 15796.0 | 16020.3 |
| 26° | 14700.6 | 14661.0 | 14621.5 | 14608.2 | 14614.9 | 14654.4 | 14806.2 | 15070.1 | 15248.4 |
| 27° | 13777.0 | 13836.4 | 13895.6 | 13974.9 | 14001.2 | 14034.3 | 14106.8 | 14298.1 | 14430.2 |
| 28° | 12892.7 | 13004.9 | 13150.1 | 13308.4 | 13381.1 | 13381.1 | 13387.6 | 13493.1 | 13605.3 |
| 29° | 12015.3 | 12133.9 | 12365.0 | 12602.4 | 12701.4 | 12688.2 | 12635.4 | 12681.6 | 12747.6 |
| 30° | 11098.1 | 11249.9 | 11560.0 | 11870.1 | 12015.3 | 11962.5 | 11863.5 | 11817.3 | 11856.9 |
| 31° | 10200.8 | 10352.5 | 10695.6 | 11032.1 | 11223.4 | 11164.1 | 10992.5 | 10959.6 | 10979.3 |
| 32° | 9343.0 | 9494.8 | 9811.4 | 10167.7 | 10385.5 | 10306.4 | 10128.1 | 10075.3 | 10082.0 |
| 33° | 8511.6 | 8630.4 | 8920.7 | 9250.7 | 9428.7 | 9408.9 | 9263.8 | 9197.9 | 9204.3 |
| 34° | 7726.5 | 7825.4 | 8043.1 | 8293.9 | 8465.4 | 8458.8 | 8353.2 | 8359.8 | 8379.7 |
| 35° | 7027.1 | 7079.9 | 7185.3 | 7324.0 | 7429.6 | 7488.8 | 7502.1 | 7554.8 | 7620.9 |
| 37.5° | 5311.6 | 5331.3 | 5206.0 | 5067.3 | 5041.0 | 5212.6 | 5509.5 | 5766.8 | 5865.8 |
| 40° | 3681.8 | 3635.6 | 3477.2 | 3233.1 | 3160.5 | 3351.9 | 3727.9 | 4090.9 | 4222.8 |
| 42.5° | 2289.6 | 2269.8 | 2170.8 | 1986.1 | 1920.1 | 2032.3 | 2315.9 | 2593.1 | 2725.0 |
| 45° | 1365.8 | 1339.4 | 1286.6 | 1214.1 | 1200.8 | 1247.0 | 1392.1 | 1550.5 | 1623.2 |
| 47.5° | 785.1 | 778.6 | 745.6 | 719.2 | 712.6 | 745.6 | 811.6 | 903.9 | 923.8 |
| 50° | 428.8 | 422.3 | 415.7 | 415.7 | 415.7 | 435.4 | 468.5 | 494.8 | 508.1 |
| 52.5° | 211.2 | 217.8 | 211.2 | 217.8 | 224.4 | 237.5 | 230.9 | 257.3 | 257.3 |
| 55° | 105.6 | 99.0 | 112.2 | 125.4 | 125.4 | 125.4 | 125.4 | 125.4 | 118.8 |
| 57.5° | 79.1 | 85.7 | 72.6 | 79.1 | 72.6 | 72.6 | 66.0 | 72.6 | 79.1 |



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CATALOG NUMBER: LD8B200D010 ER8B200840 8LBM0WH

CANDELA DISTRIBUTION (continued):

| | 0° | 22.5° | 45° | 67.5° | 90° | 112.5° | 135° | 157.5° | 180° |
|-------|------|-------|------|-------|------|--------|------|--------|------|
| 60° | 52.8 | 46.2 | 52.8 | 59.4 | 66.0 | 59.4 | 46.2 | 52.8 | 59.4 |
| 62.5° | 26.3 | 26.3 | 26.3 | 39.6 | 59.4 | 46.2 | 39.6 | 32.9 | 32.9 |
| 65° | 39.6 | 26.3 | 32.9 | 39.6 | 32.9 | 32.9 | 26.3 | 32.9 | 26.3 |
| 67.5° | 19.9 | 32.9 | 19.9 | 13.2 | 19.9 | 26.3 | 19.9 | 13.2 | 13.2 |
| 70° | 0.0 | 6.6 | 6.6 | 19.9 | 19.9 | 19.9 | 19.9 | 13.2 | 13.2 |
| 72.5° | 6.6 | 6.6 | 6.6 | 13.2 | 6.6 | 13.2 | 6.6 | 6.6 | 13.2 |
| 75° | 0.0 | 0.0 | 6.6 | 6.6 | 0.0 | 6.6 | 0.0 | 0.0 | 0.0 |
| 77.5° | 6.6 | 0.0 | 6.6 | 6.6 | 0.0 | 0.0 | 0.0 | 6.6 | 0.0 |
| 80° | 0.0 | 0.0 | 6.6 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 6.6 |
| 82.5° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 85° | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| 87.5° | 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 |

(END OF REPORT)