

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: P241021

Luminaire Tested: **UTLD-AF24-50-D-U-T4W-CL**

Issue Date: 5/28/2020

Test Information

Test Method: LM-79-08
Report Number: P241021
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G1-1710-388-47)
Test Lab: INNOVATION CENTER(G1)
Issue Date: 5/28/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: STREETWORKS
Catalog Number: UTLD-AF24-50-D-U-T4W-CL
Description: TRADITIONAIRE LED DOWNLIGHT LUMINAIRE
(1) 70 CRI, 4000K, 670mA LIGHT ENGINE WITH 24 LEDS AND TYPE IV WIDE OPTICS AND CLEAR LENS PANELS
Light Source: -
Ballast/Driver: ELECTRONIC DRIVER

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 5390.9 lumens
Efficiency: N/A
Efficacy: 99.8 lumens/watt
Luminous Opening: Rectangular w/ Sides (W: 1.21' x L: 1.21' x H: 0.96')
IES Classification: Type IV - Short - Non-Cutoff
BUG Rating: B2 - U2 - G2

Input Watts (W): 54
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

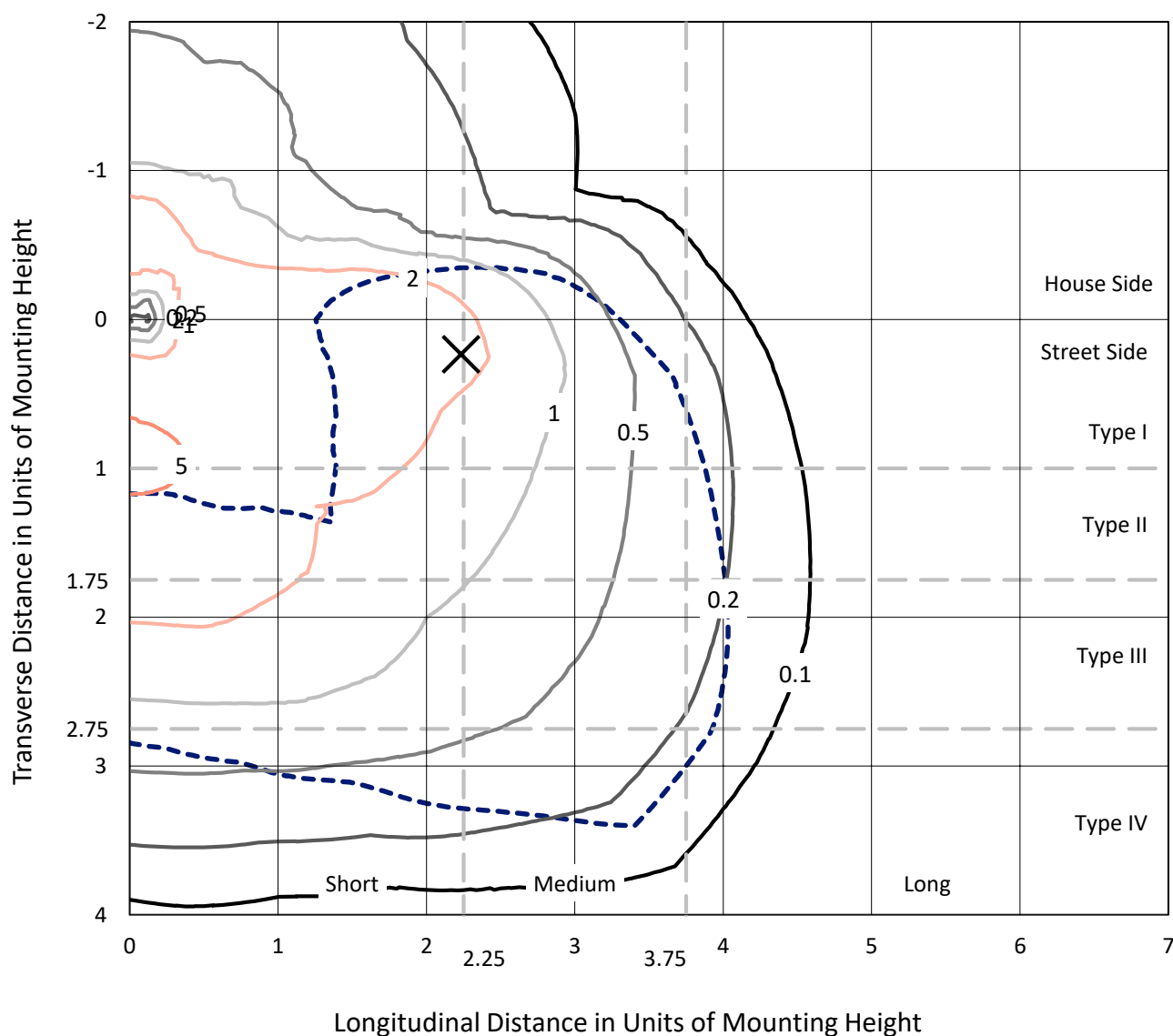


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Iso-Footcandle Lines of Horizontal Illumination

× Max cd
 --- 1/2 Max cd

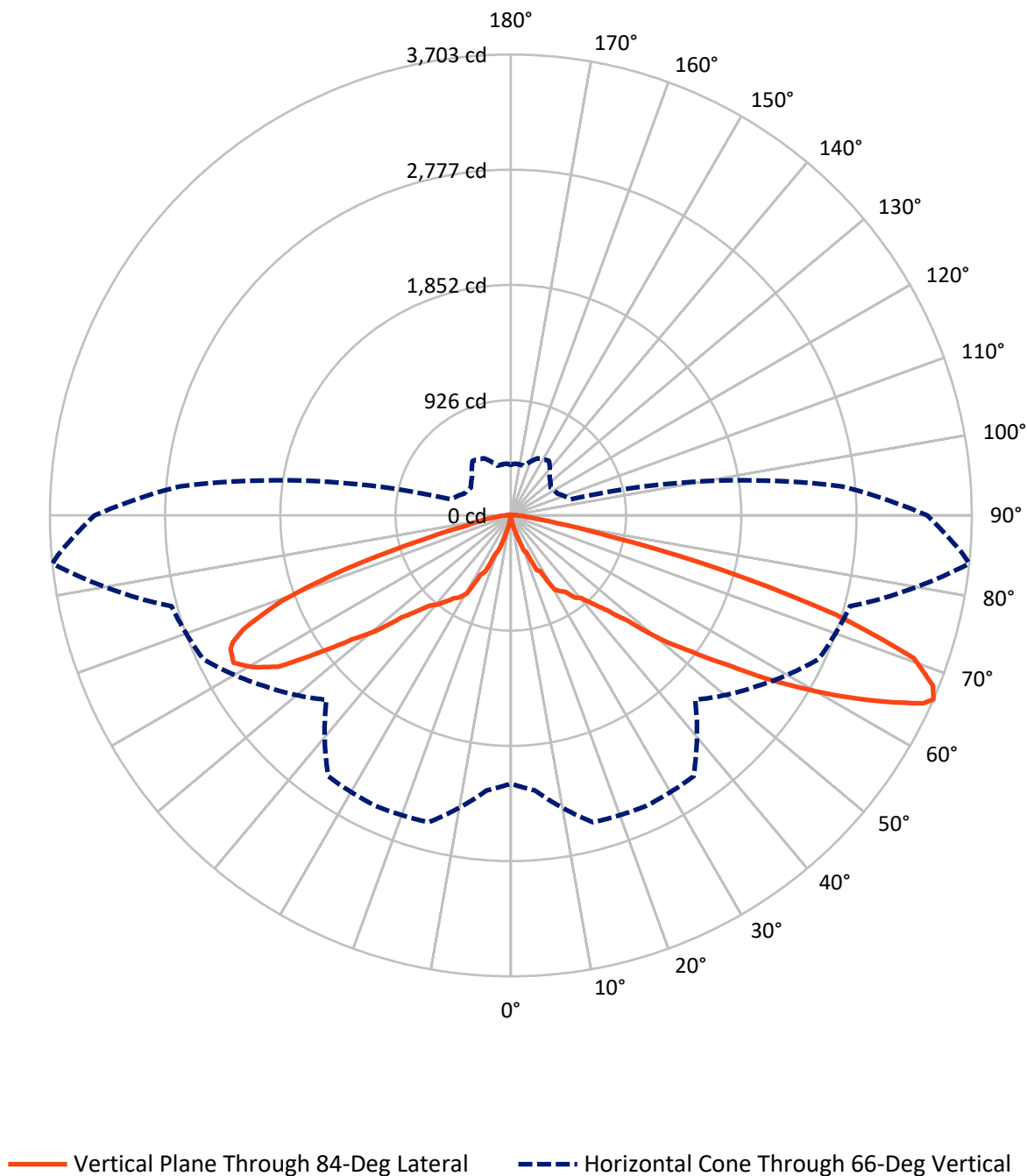


Based on 10 foot mounting height. Maximum calculated value = 6.1 fc
 Type IV - Short - Non-Cutoff

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Luminous Intensity Polar Plot



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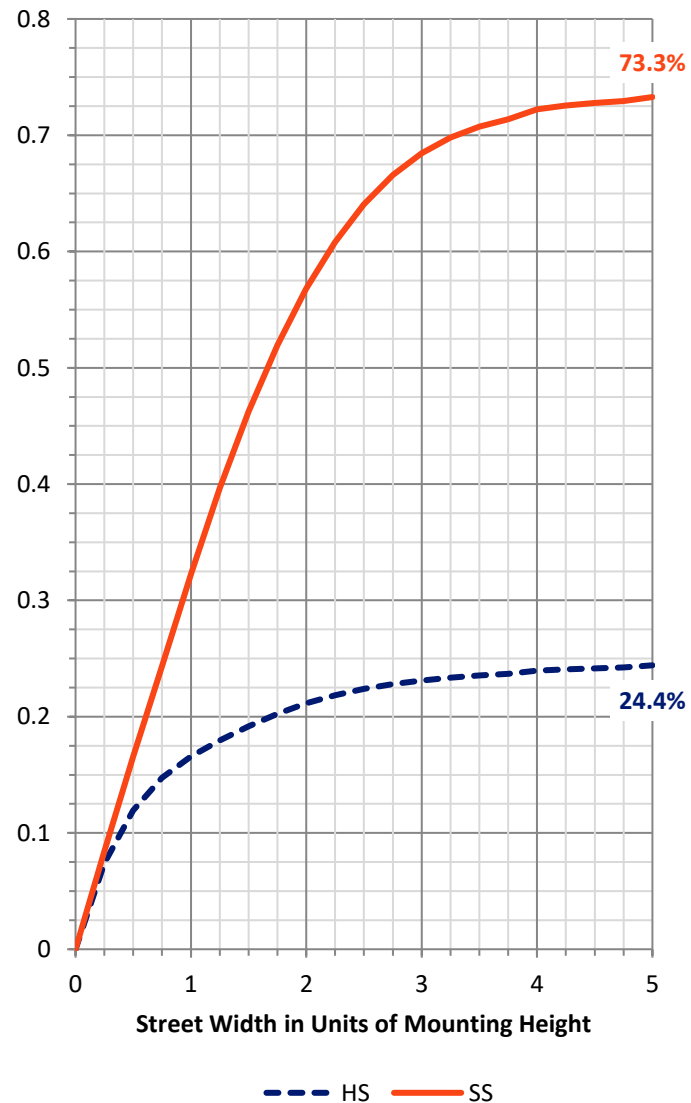
FLUX DISTRIBUTION:

		Downward	Upward	Total
House Side	Lumens	1349.0	32.8	1381.8
	% Fixture	25.0	0.6	25.6
Street Side	Lumens	3978.3	30.8	4009.1
	% Fixture	73.8	0.6	74.4
Total	Lumens	5327.3	63.6	5390.9
	% Fixture	98.8	1.2	100.0

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	4.0	0.1
10°-20°	50.0	0.9
20°-30°	184.9	3.4
30°-40°	380.2	7.1
40°-50°	630.8	11.7
50°-60°	1100.0	20.4
60°-70°	1620.4	30.1
70°-80°	1182.5	21.9
80°-90°	174.4	3.2
90°-100°	32.5	0.6
100°-110°	14.9	0.3
110°-120°	7.0	0.1
120°-130°	4.8	0.1
130°-140°	2.9	0.1
140°-150°	1.3	0.0
150°-160°	0.2	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-90°	5327.3	98.8
0°-180°	5390.9	100.0

Coefficient of Utilization



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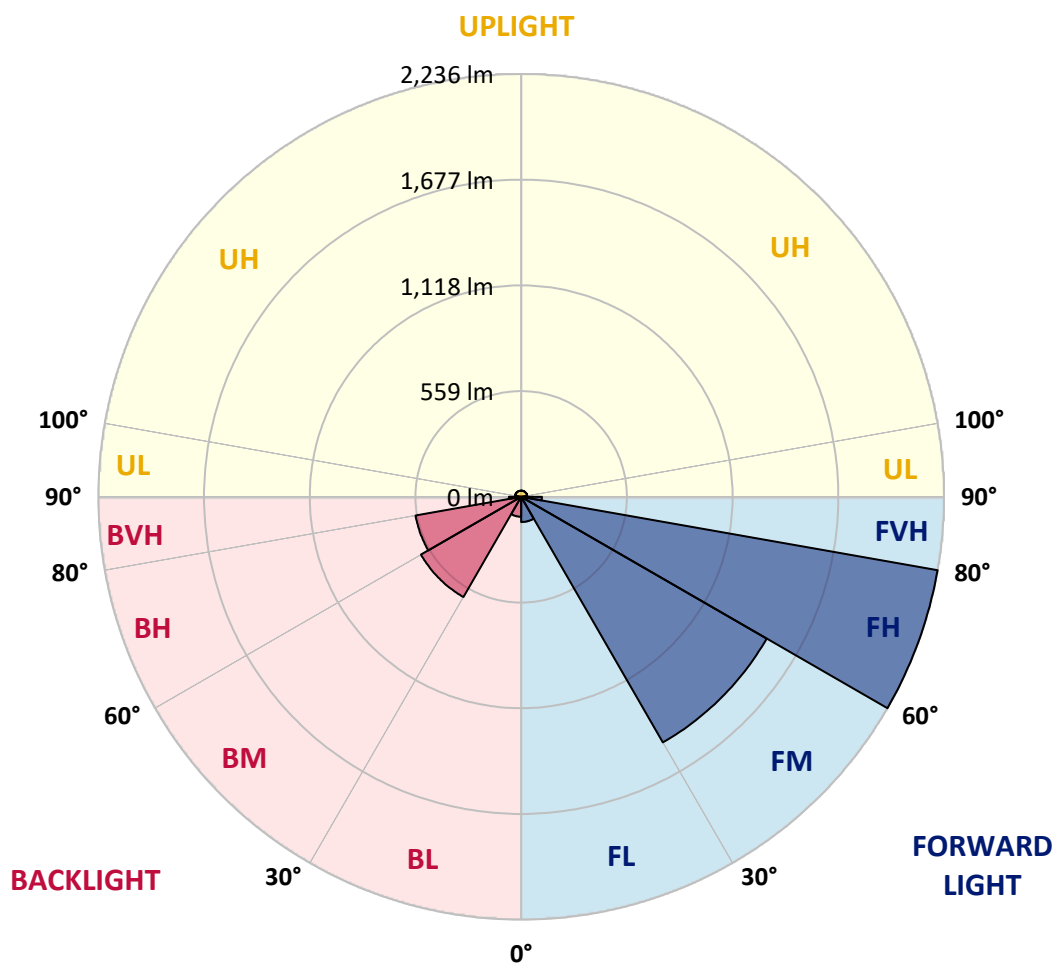
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LUMINAIRE CLASSIFICATION SYSTEM LUMEN TABLE AND BUG RATING:

Zone		Lumens	% Fixture	Zone Rating/Lumen Limit		
				B	U	G
FL	(0°-30°)	133.4	2.5			
FM	(30°-60°)	1499.3	27.8			
FH	(60°-80°)	2235.9	41.5			G2/5000
FVH	(80°-90°)	109.7	2.0			G2/225
BL	(0°-30°)	105.5	2.0	B0/110		
BM	(30°-60°)	611.7	11.3	B1/1000		
BH	(60°-80°)	567.1	10.5	B2/1000		G2/1000
BVH	(80°-90°)	64.8	1.2			G1/100
UL	(90°-100°)	32.5	0.6		U2/50	
UH	(100°-180°)	32.8	0.6		U2/50	

BUG Rating: B2-U2-G2

Type IV Short



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CANDELA DISTRIBUTION (FULL):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	84°	85°
0°	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6
2.5°	31.8	28.5	28.5	27.2	24.6	21.9	17.3	14.6	12.6	12.6	12.0
5°	61.0	64.3	74.3	68.3	56.4	73.7	33.1	21.9	13.9	12.0	12.0
7.5°	96.8	102.1	78.3	69.7	69.7	74.3	60.4	36.5	18.6	13.9	13.3
10°	203.0	191.7	133.3	135.3	114.8	80.2	55.0	48.4	28.5	22.5	20.6
12.5°	196.9	194.3	198.2	173.1	174.4	126.6	70.3	112.7	102.1	97.5	107.4
15°	254.0	251.3	201.6	205.6	186.4	193.6	163.2	162.4	157.1	132.0	126.6
17.5°	352.8	350.2	394.6	262.6	187.0	242.0	210.2	181.1	187.7	198.2	206.2
20°	352.1	348.2	366.7	315.0	319.0	250.0	224.1	329.6	301.1	302.4	285.2
22.5°	520.0	496.0	435.7	329.0	359.5	292.5	332.3	325.6	303.7	321.6	316.3
25°	504.6	513.9	493.4	486.7	366.1	419.1	365.4	376.0	464.2	488.0	488.8
27.5°	585.5	567.6	551.8	500.0	492.0	407.9	376.0	500.7	486.1	508.0	507.3
30°	698.3	692.3	688.3	555.8	532.5	449.6	506.7	511.3	590.2	689.7	710.2
32.5°	807.1	778.6	714.2	643.2	534.5	531.2	503.3	635.4	677.1	724.1	731.5
35°	979.5	978.9	870.1	687.7	598.2	564.4	651.9	684.4	683.7	754.7	797.8
37.5°	1126.7	1134.0	1020.0	830.3	618.8	570.3	680.4	738.1	740.7	836.9	820.3
40°	1350.9	1331.7	1229.5	991.4	707.0	608.1	746.0	754.7	809.1	873.4	897.2
42.5°	1510.0	1502.7	1469.6	1179.8	809.1	677.7	823.7	786.5	856.8	973.5	998.7
45°	1609.5	1573.7	1606.2	1317.7	972.8	827.0	840.9	890.6	965.6	1088.9	1159.9
47.5°	1709.7	1736.9	1660.6	1421.8	1120.1	895.9	925.2	1082.3	1154.6	1265.3	1310.4
50°	1883.4	1854.2	1827.7	1578.3	1346.9	1006.1	1157.3	1136.0	1338.9	1565.1	1573.0
52.5°	1989.5	1989.5	1946.4	1715.0	1503.4	1168.5	1234.8	1310.4	1612.8	1817.8	1892.0
55°	2140.0	2171.2	2163.2	1876.1	1687.8	1389.4	1437.8	1596.9	1863.5	2126.8	2310.4
57.5°	2246.8	2289.9	2383.4	2048.6	1866.8	1479.5	1734.2	1911.3	2200.4	2520.7	2742.8
60°	2405.3	2406.0	2502.1	2201.1	2093.0	1651.2	1848.9	2203.0	2385.4	2899.3	3016.8
62.5°	2421.2	2448.4	2650.1	2438.5	2318.4	1830.4	2224.3	2353.6	2593.6	3280.0	3382.8
65°	2228.9	2301.8	2639.4	2549.9	2524.6	1995.5	2334.4	2651.4	2762.8	3640.8	3611.6
66°	2155.3	2216.9	2551.9	2574.4	2558.5	2094.3	2398.7	2728.9	2821.8	3703.1	3652.0
67.5°	2129.4	2174.5	2447.1	2601.0	2673.2	2273.3	2555.8	2766.8	2929.8	3658.0	3637.5
70°	1949.7	2006.1	2262.1	2776.0	2918.0	2601.6	2758.1	2858.2	3006.1	3434.6	3345.7
72.5°	1486.9	1544.6	1733.5	2290.6	2938.5	3087.1	3071.8	2973.6	2758.1	2728.9	2586.3
75°	737.4	799.1	932.4	1335.0	2286.6	3032.6	3053.9	2681.2	2228.9	1760.1	1650.6
77.5°	381.4	429.7	360.1	511.3	1175.8	2151.3	2161.3	1768.0	1291.9	822.4	767.9
80°	259.9	270.6	245.4	252.0	484.1	1099.6	1025.3	941.0	520.0	377.4	393.9
82.5°	191.0	176.4	169.1	183.7	261.3	343.5	368.7	407.1	277.8	191.7	202.2
85°	90.2	99.4	97.5	112.1	159.2	117.3	180.3	244.7	185.1	123.4	121.3
87.5°	56.4	55.8	59.6	68.9	96.2	77.5	98.8	121.3	111.4	76.9	75.6
90°	37.1	33.1	31.2	37.1	53.7	38.5	53.1	68.9	63.0	41.7	39.1
92.5°	25.2	25.2	27.2	31.2	46.4	41.1	37.8	39.1	39.1	32.5	31.2
95°	18.6	19.8	22.5	23.2	27.8	23.8	30.5	33.9	34.5	26.5	25.9
97.5°	16.0	17.3	18.6	19.2	23.2	19.2	25.2	29.9	29.2	21.2	21.9
100°	14.6	16.0	16.0	16.6	18.6	14.6	20.6	27.8	26.5	18.6	17.9
102.5°	13.9	13.9	13.3	13.3	14.6	11.3	17.3	24.6	19.8	15.2	13.9
105°	13.3	13.3	11.3	10.6	11.3	9.3	13.9	18.6	13.9	12.6	12.6
107.5°	12.6	12.0	9.9	8.6	9.3	7.3	11.3	12.0	9.9	11.3	12.0



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CANDELA DISTRIBUTION (continued):

	0°	5°	15°	25°	35°	45°	55°	65°	75°	84°	85°
110°	11.3	11.3	8.6	7.3	7.3	5.9	8.0	8.6	8.6	11.3	12.0
112.5°	10.6	9.9	7.3	5.9	5.9	5.3	5.9	6.6	7.3	10.6	11.3
115°	9.9	9.3	6.6	5.3	4.6	4.0	4.6	5.3	6.6	10.6	10.6
117.5°	9.3	8.6	5.9	4.6	4.0	3.3	4.0	4.6	6.6	10.6	10.6
120°	9.3	8.6	5.9	4.0	3.3	3.3	3.3	4.0	7.3	10.6	11.3
122.5°	8.6	8.6	5.9	4.0	3.3	2.7	2.7	4.0	6.6	9.9	9.9
125°	8.6	8.6	5.3	3.3	2.7	2.7	2.7	3.3	6.6	9.3	9.9
127.5°	8.0	8.0	5.3	3.3	2.7	1.9	1.9	3.3	5.9	9.3	9.3
130°	8.0	8.0	5.3	2.7	1.9	1.9	1.9	2.7	5.9	8.6	8.6
132.5°	6.6	6.6	4.6	2.7	1.9	1.3	1.9	2.7	5.3	7.3	8.0
135°	6.6	6.6	4.6	2.7	1.9	1.3	1.3	2.7	4.6	6.6	6.6
137.5°	5.9	5.9	4.0	2.7	1.9	1.3	1.3	1.9	4.0	5.9	5.9
140°	5.3	5.3	4.6	2.7	1.9	1.3	1.3	1.3	3.3	4.6	4.6
142.5°	5.3	5.3	4.0	2.7	1.3	0.6	0.6	1.3	2.7	3.3	3.3
145°	4.6	4.6	4.0	2.7	1.3	0.6	0.6	1.3	1.9	2.7	2.7
147.5°	4.6	4.6	4.0	1.9	0.6	0.6	0.6	1.3	1.9	2.7	2.7
150°	4.0	4.0	2.7	1.3	0.0	0.0	0.6	0.6	1.3	1.9	1.9
152.5°	2.7	2.7	1.9	0.6	0.0	0.0	0.0	0.6	1.3	1.3	1.3
155°	1.3	1.3	0.6	0.0	0.0	0.0	0.0	0.0	0.6	0.6	0.6
157.5°	0.6	0.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.6
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
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):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6	12.6
2.5°	12.0	12.0	12.0	12.0	12.0	12.0	11.3	11.3	11.3	11.3	11.3
5°	11.3	11.3	11.3	11.3	11.3	11.3	11.3	12.0	12.6	12.6	12.6
7.5°	12.6	12.6	12.0	11.3	12.0	13.3	19.8	45.7	67.0	82.2	81.5
10°	20.6	20.6	19.2	16.6	20.6	45.1	88.9	89.5	74.3	68.3	71.0
12.5°	108.7	96.8	82.2	67.6	66.3	80.2	75.6	105.5	118.0	126.6	125.3
15°	124.7	132.0	120.7	135.3	138.6	82.2	128.7	172.5	185.7	191.0	196.9
17.5°	205.6	227.5	162.4	153.9	154.6	164.5	173.8	182.4	186.4	184.3	185.1
20°	309.6	295.1	317.0	270.6	206.9	220.1	201.6	199.0	262.6	319.0	311.7
22.5°	316.3	341.6	312.3	285.8	316.3	224.1	277.8	295.1	303.7	311.0	320.3
25°	512.0	500.0	437.7	328.3	312.3	299.1	301.8	308.4	325.0	350.2	365.4
27.5°	543.8	541.1	484.1	442.3	332.9	374.0	309.6	372.7	402.5	429.0	434.3
30°	731.5	738.8	557.1	425.1	386.0	320.3	359.5	384.0	407.1	444.4	445.0
32.5°	777.2	792.5	616.1	470.1	404.6	331.5	361.4	380.0	468.2	502.7	504.0
35°	789.2	828.3	635.4	453.6	390.6	330.2	333.6	397.2	441.0	511.3	536.5
37.5°	914.5	886.0	675.1	459.6	365.4	317.6	360.1	381.4	450.3	495.4	504.0
40°	967.6	951.7	700.9	471.5	360.8	353.4	333.6	355.5	387.9	420.4	420.4
42.5°	1066.3	1004.0	715.6	462.9	350.8	379.3	304.4	329.0	359.5	340.2	348.2
45°	1197.7	1114.1	765.3	417.2	332.3	322.3	292.5	330.2	311.0	311.0	307.1
47.5°	1367.5	1253.4	748.7	401.2	374.0	305.0	386.0	310.4	286.5	297.1	297.8
50°	1636.0	1500.8	799.7	390.6	354.8	299.1	330.2	299.7	299.7	307.1	304.4
52.5°	1973.0	1706.3	821.6	389.9	335.5	348.2	327.7	358.7	310.4	336.2	332.9
55°	2337.6	2016.0	844.2	384.6	332.3	314.4	400.6	343.5	322.3	369.4	370.7
57.5°	2799.9	2374.8	937.0	374.0	333.6	315.0	378.0	384.6	392.6	423.8	428.4
60°	3087.7	2573.7	854.8	393.9	330.2	359.5	439.7	429.7	405.2	520.6	537.9
62.5°	3307.2	2724.3	704.3	410.5	390.6	362.1	454.3	501.3	478.8	525.2	538.5
65°	3347.0	2711.0	538.5	410.5	385.3	421.8	545.1	500.0	426.4	431.1	425.8
66°	3344.3	2670.6	496.0	413.8	390.6	439.7	535.2	506.0	412.5	417.2	407.1
67.5°	3234.9	2542.5	431.1	409.2	427.7	451.6	525.9	472.2	396.6	397.9	387.9
70°	2813.8	2144.7	366.7	420.4	443.7	453.0	575.0	439.7	364.1	354.8	352.8
72.5°	2069.7	1521.3	343.5	418.5	450.3	439.1	484.8	361.4	314.4	295.7	293.8
75°	1163.8	777.2	342.2	401.2	398.5	376.7	366.7	278.5	259.9	238.0	234.1
77.5°	536.5	374.7	289.8	322.9	301.1	297.8	273.2	232.1	221.5	206.9	200.9
80°	310.4	264.6	206.2	214.2	216.1	210.2	220.9	208.9	197.6	187.0	177.1
82.5°	181.1	167.8	150.6	141.3	141.3	151.2	181.7	173.8	165.1	155.8	134.0
85°	113.4	108.7	102.8	98.8	98.8	90.8	130.6	145.3	137.3	117.3	104.8
87.5°	74.3	77.5	68.9	69.7	67.6	60.4	88.2	97.5	83.6	67.0	55.8
90°	33.9	37.1	40.4	39.8	43.1	33.1	48.4	49.7	44.4	30.5	21.9
92.5°	25.9	30.5	33.9	33.9	37.1	22.5	35.2	39.1	36.5	28.5	20.6
95°	21.9	27.2	32.5	31.8	31.8	17.9	32.5	36.5	34.5	24.6	17.9
97.5°	17.9	21.9	26.5	26.5	29.2	15.2	29.9	35.2	33.1	24.6	17.3
100°	16.6	19.8	23.2	23.8	26.5	12.0	27.2	33.1	29.9	20.6	16.6
102.5°	15.2	16.6	19.2	19.2	19.8	10.6	21.9	27.2	23.8	16.0	16.0
105°	13.9	13.9	13.9	12.6	12.6	8.6	13.3	18.6	14.6	12.6	13.9
107.5°	13.3	12.6	10.6	9.9	9.3	7.3	9.3	11.3	8.6	11.3	12.6



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CATALOG NUMBER: UTLD-AF24-50-D-U-T4W-CL

CANDELA DISTRIBUTION (continued):

	90°	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
110°	12.6	12.6	9.9	8.6	8.0	6.6	8.0	7.3	7.3	11.3	12.0
112.5°	12.6	12.0	8.6	7.3	6.6	5.9	6.6	5.3	6.6	11.3	12.0
115°	12.0	12.0	8.0	6.6	6.6	5.3	5.3	4.6	5.9	10.6	12.0
117.5°	12.0	12.0	8.0	5.9	5.3	4.6	4.6	4.6	5.9	10.6	12.0
120°	12.0	11.3	8.0	5.9	4.6	4.0	4.0	4.0	5.9	10.6	11.3
122.5°	11.3	10.6	7.3	5.3	4.6	4.0	3.3	4.0	5.9	9.9	10.6
125°	10.6	10.6	7.3	4.6	4.0	3.3	2.7	3.3	5.9	9.9	10.6
127.5°	10.6	9.9	6.6	4.0	3.3	3.3	2.7	3.3	5.9	9.3	9.9
130°	9.3	9.3	5.9	4.0	2.7	2.7	1.9	2.7	5.9	9.3	9.3
132.5°	8.6	8.0	5.3	3.3	2.7	1.9	1.9	1.9	5.3	8.0	8.6
135°	7.3	6.6	4.6	2.7	1.9	1.9	1.3	1.9	4.6	7.3	7.3
137.5°	5.9	5.9	4.6	2.7	1.9	1.3	1.3	1.9	4.6	6.6	7.3
140°	5.3	4.6	3.3	1.9	1.3	1.3	1.3	1.9	4.0	5.3	5.9
142.5°	4.0	4.0	2.7	1.9	1.3	1.3	0.6	1.3	3.3	4.6	4.6
145°	3.3	3.3	2.7	1.3	1.3	0.6	0.6	0.6	2.7	3.3	4.0
147.5°	2.7	2.7	1.9	1.3	0.6	0.6	0.0	0.6	1.9	2.7	2.7
150°	1.9	1.9	1.9	1.3	0.6	0.0	0.0	0.0	0.6	1.3	1.3
152.5°	1.3	1.3	1.3	0.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0
155°	1.3	0.6	0.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
157.5°	0.6	0.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
160°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
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

(END OF REPORT)