

Scaled data based on original data using

LM-41-14 Approved Method for Photometric Testing Of Indoor Fluorescent Luminaires

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: McGRAW-EDISON

Report Number: P152353

Luminaire Tested: **TLM-F01-LED-E1-SL4-8030**

Issue Date: 3/3/2020

Test Information

Test Method: LM-41-14
Report Number: P152353
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (P33680)
Test Lab: INNOVATION CENTER-P3
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: MCGRAW-EDISON
Catalog Number: TLM-F01-LED-E1-SL4-8030
Description: TALON MEDIUM LED SITE LUMINAIRE
(1) LIGHTBARS WITH AccuLED OPTICS - TYPE 4 W/ SPILL LIGHT CONTROL
Light Source: (7) 3000K CCT, 80 CRI LEDs
Ballast/Driver: -

Summary

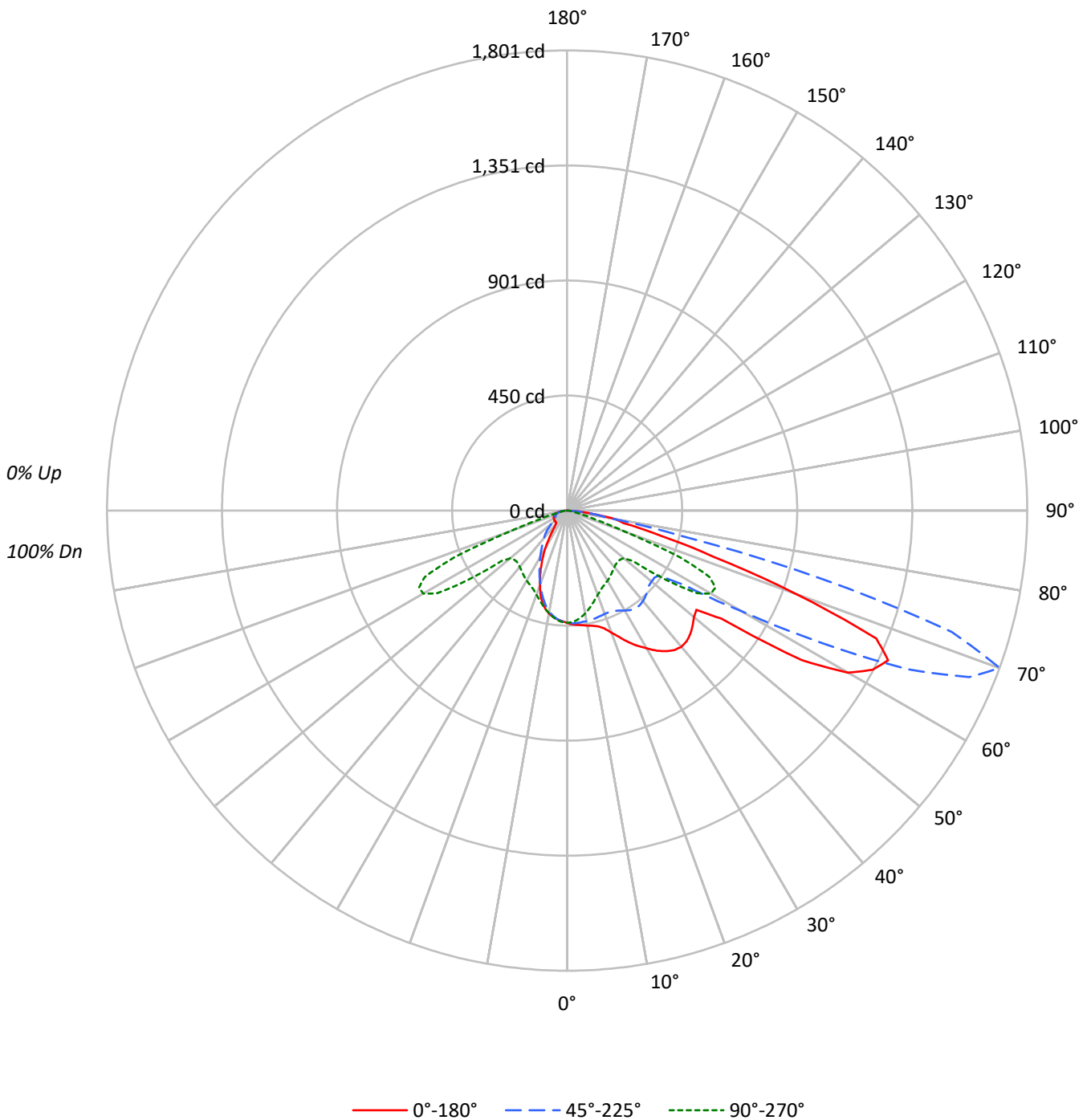
Lumens per Lamp: N/A
Luminaire Lumens: 2058.2 lumens
Efficiency: N/A
Efficacy: 79.5 lumens/watt
Spacing Criteria (0/90/45): 1.36 / 1.07 / 1.36
Luminous Opening: Rectangular (W 0.17' x L: 1' x H: 0')
CIE Type: Direct

Input Watts (W): 25.9
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: 25 FT



TEST NUMBER: P152353
CATALOG NUMBER: TLM-F01-LED-E1-SL4-8030

Luminous Intensity Polar Plot





TEST NUMBER: P152353

CATALOG NUMBER: TLM-F01-LED-E1-SL4-8030

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			
1	106	100	94	89	103	97	92	88	93	89	85	89	86	82	85	82	80	78					78			
2	93	83	74	67	90	81	73	66	77	70	64	73	68	63	70	66	61	59					59			
3	83	70	59	51	80	68	58	51	65	57	50	62	55	49	59	53	48	45					45			
4	74	60	49	41	72	58	48	40	55	47	40	53	45	39	51	44	39	36					36			
5	67	52	41	33	65	51	41	33	48	40	33	46	38	32	44	37	32	29					29			
6	61	46	36	28	59	45	35	28	43	34	28	41	33	27	39	32	27	25					25			
7	57	41	31	24	55	40	31	24	39	30	24	37	29	23	36	29	23	21					21			
8	53	37	28	21	51	36	27	21	35	27	21	34	26	21	32	26	20	18					18			
9	49	34	25	19	47	33	25	19	32	24	18	31	24	18	30	23	18	16					16			
10	46	31	23	17	44	31	22	17	30	22	17	29	21	16	28	21	16	14					14			

AVERAGE LUMINANCE (cd/sqm):

	0°	90°	180°
0°	27809	27809	27809
5°	28551	27381	27203
10°	29389	26251	26296
15°	30770	24863	24496
20°	34243	23597	20982
25°	39703	23006	16774
30°	45505	23147	12531
35°	51951	23320	8147
40°	57495	23805	5621
45°	61078	25144	5614
50°	63870	28576	6245
55°	81269	52303	6822
60°	160674	82262	7649
65°	207697	92200	8600
70°	176704	43597	9682
75°	92889	16024	11938
80°	69097	8715	12944
85°	39957	8427	13004



TEST NUMBER: P152353

CATALOG NUMBER: TLM-F01-LED-E1-SL4-8030

ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	41.0	2.0
10°-20°	112.3	5.5
20°-30°	166.3	8.1
30°-40°	210.1	10.2
40°-50°	237.6	11.5
50°-60°	338.2	16.4
60°-70°	629.8	30.6
70°-80°	288.6	14.0
80°-90°	34.3	1.7
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°	319.6	15.5
0°-40°	529.7	25.7
0°-60°	1105.5	53.7
0°-90°	2058.2	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	2058.2	100.0

CANDELA DISTRIBUTION:

	0°	45°	90°	135°	180°	Flux
0°	439	439	439	439	439	
5°	449	442	431	427	428	43
15°	469	436	379	359	374	135
25°	568	433	329	257	240	264
35°	672	468	302	172	105	420
45°	682	444	281	112	63	525
55°	736	442	474	57	62	774
65°	1386	1468	615	51	57	1278
75°	380	1032	66	40	49	467
85°	55	48	12	18	18	69
90°	0	0	0	0	0	



TEST NUMBER: P152353

CATALOG NUMBER: TLM-F01-LED-E1-SL4-8030

CANDELA DISTRIBUTION (FULL):

	0°	5°	10°	15°	20°	25°	30°	35°	40°	45°	50°
0°	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2
2.5°	445.9	447.1	445.7	445.4	445.4	445.2	443.8	443.6	441.7	442.0	442.4
5°	449.2	449.6	448.7	448.5	448.0	447.1	445.9	444.5	443.1	441.7	440.6
7.5°	452.4	451.9	451.3	451.3	450.6	449.2	446.8	445.0	442.0	440.3	438.2
10°	457.1	456.4	455.4	455.0	453.8	451.7	448.5	445.9	442.2	438.9	435.5
12.5°	461.5	461.2	459.8	459.1	457.3	455.2	451.3	447.3	442.4	437.3	432.7
15°	469.4	468.4	467.0	465.7	462.6	459.8	453.8	449.2	442.2	435.5	428.3
17.5°	483.1	481.4	480.1	477.0	473.3	468.4	459.6	451.7	442.2	432.4	424.3
20°	508.2	504.7	502.8	498.9	492.4	483.5	469.8	457.1	442.9	430.4	419.4
22.5°	536.5	534.2	531.6	529.1	518.8	506.1	487.5	468.4	447.1	429.4	415.5
25°	568.3	565.3	563.9	559.5	550.0	535.3	510.0	483.5	456.6	433.1	415.5
27.5°	596.6	595.7	595.5	590.4	581.3	564.1	534.2	502.3	469.6	440.8	419.0
30°	622.4	621.5	621.0	618.2	607.8	587.3	554.8	519.1	483.8	451.5	425.5
32.5°	649.8	646.8	645.4	640.1	628.2	604.3	567.1	530.0	494.9	461.9	432.7
35°	672.1	669.6	666.8	659.1	642.4	614.1	572.5	533.7	499.3	467.7	436.4
37.5°	688.4	685.8	681.9	672.1	651.4	617.3	572.3	532.5	497.7	466.8	437.1
40°	695.6	693.0	688.8	676.5	653.1	615.4	567.8	527.2	492.8	461.9	434.3
42.5°	692.8	690.9	685.6	673.7	648.0	607.1	559.0	517.2	483.5	454.0	428.0
45°	682.1	680.7	675.6	663.1	636.4	593.6	546.0	504.7	472.4	444.3	419.7
47.5°	666.1	665.6	660.5	648.2	621.7	580.1	532.5	492.4	461.2	434.8	412.7
50°	648.4	646.1	643.6	632.2	608.0	568.5	522.8	484.7	455.0	431.3	409.7
52.5°	637.3	636.6	634.3	624.0	600.8	561.8	518.4	481.9	454.5	430.6	408.1
55°	736.2	737.8	716.5	672.1	633.1	580.4	531.6	496.1	465.9	441.7	425.2
57.5°	1089.0	1081.8	1045.1	957.1	857.7	726.5	631.9	574.6	537.2	541.4	549.7
60°	1268.8	1267.4	1260.6	1226.5	1160.3	1060.4	949.7	822.6	782.2	786.6	789.9
62.5°	1349.1	1351.2	1356.3	1343.5	1326.1	1297.1	1241.8	1190.7	1136.6	1116.4	1062.3
65°	1386.3	1390.0	1401.6	1408.8	1415.5	1420.6	1442.5	1502.4	1541.9	1468.0	1296.2
67.5°	1309.4	1327.3	1365.6	1403.0	1436.4	1484.0	1557.9	1697.0	1793.9	1703.1	1453.9
70°	954.5	978.9	1022.8	1138.5	1262.0	1370.0	1513.1	1724.9	1871.0	1800.8	1492.9
72.5°	598.5	605.2	624.7	667.2	759.0	897.6	1147.8	1465.5	1634.1	1578.1	1261.8
75°	379.7	382.0	381.3	391.1	406.7	436.9	535.8	865.6	1119.4	1032.1	703.2
77.5°	226.2	229.7	231.1	234.1	241.5	252.2	260.3	294.5	469.4	455.7	255.2
80°	189.5	192.3	190.0	189.3	184.6	181.4	185.3	181.4	168.4	162.1	149.3
82.5°	100.3	100.1	99.4	106.1	119.8	130.5	138.7	136.8	123.8	105.4	89.4
85°	55.0	56.9	56.9	59.2	57.1	57.4	59.2	62.5	57.8	48.3	39.5
87.5°	4.6	7.2	5.8	7.2	9.8	7.0	6.7	6.7	5.8	4.2	3.7
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P152353

CATALOG NUMBER: TLM-F01-LED-E1-SL4-8030

CANDELA DISTRIBUTION (continued):

	55°	60°	65°	70°	75°	80°	85°	90°	95°	100°	105°
0°	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2
2.5°	441.3	440.8	439.9	439.2	439.2	438.0	437.3	436.9	436.6	435.7	435.7
5°	439.9	438.2	436.6	435.5	434.8	433.6	431.7	430.8	429.7	428.7	428.3
7.5°	436.9	433.8	431.3	429.4	427.1	425.2	422.9	420.8	418.7	417.8	417.3
10°	432.2	428.3	424.3	420.8	417.6	414.3	411.3	408.3	405.7	403.9	402.0
12.5°	427.8	421.8	416.6	411.5	406.4	402.5	398.3	393.9	390.2	386.7	385.8
15°	421.8	414.8	408.3	402.0	395.7	389.2	384.1	379.3	373.2	369.3	366.3
17.5°	416.2	407.8	399.9	392.5	384.8	378.1	370.4	363.9	357.9	351.9	347.4
20°	410.1	401.1	392.7	384.4	376.0	367.4	358.6	350.2	342.8	335.6	328.4
22.5°	404.8	395.5	387.4	378.3	369.0	359.3	349.1	338.6	330.0	320.7	312.4
25°	401.6	391.3	383.0	374.1	363.9	353.2	341.6	329.3	318.9	308.2	298.2
27.5°	401.6	388.3	379.7	370.9	360.4	349.1	336.3	322.8	311.0	299.1	286.8
30°	405.0	388.8	377.2	367.9	357.2	344.9	330.7	316.6	303.5	289.6	277.8
32.5°	408.3	389.7	375.3	363.5	351.2	339.1	324.7	309.6	295.2	281.9	269.4
35°	410.4	389.7	371.8	356.7	342.8	330.9	316.8	301.7	287.1	274.0	262.4
37.5°	410.6	387.8	366.3	349.1	334.4	322.1	308.7	294.5	280.6	268.5	258.7
40°	408.3	384.1	360.7	340.9	325.6	313.1	300.8	288.0	275.4	265.5	257.1
42.5°	404.1	380.2	355.3	334.4	318.4	305.4	294.0	283.1	272.2	263.6	256.6
45°	397.8	374.8	350.5	330.5	314.7	301.0	289.8	280.8	271.5	264.3	257.3
47.5°	392.3	373.0	352.1	333.0	316.6	302.4	291.0	283.3	276.1	271.3	261.7
50°	391.1	372.1	352.8	335.1	318.4	304.0	294.0	290.1	288.0	285.0	270.3
52.5°	387.8	371.8	357.9	348.1	337.5	330.7	320.3	324.0	321.7	311.0	284.5
55°	422.0	426.6	439.6	458.2	475.4	479.4	478.2	473.8	450.3	387.4	318.6
57.5°	580.1	606.4	631.0	641.9	640.5	628.2	619.4	601.5	567.6	491.0	386.0
60°	799.9	804.0	791.0	771.8	739.2	712.1	683.0	649.6	600.4	525.3	427.3
62.5°	1002.1	945.9	888.1	833.8	784.3	741.1	700.7	654.0	589.9	511.6	422.0
65°	1145.0	1026.1	934.8	856.8	786.8	726.5	676.1	615.4	543.2	472.6	391.1
67.5°	1218.6	1036.3	896.2	787.5	688.4	604.8	537.6	478.7	425.0	394.1	342.3
70°	1136.4	879.5	684.4	561.6	442.9	355.1	280.6	235.5	219.9	249.2	259.2
72.5°	846.8	572.5	407.1	314.9	241.3	192.3	147.5	115.9	94.3	98.9	128.4
75°	400.4	247.1	174.6	132.8	105.7	87.6	71.5	65.5	54.8	45.5	42.7
77.5°	155.8	113.6	93.8	68.7	48.8	39.2	33.4	32.3	33.0	32.0	31.6
80°	118.7	80.4	50.4	36.9	31.8	28.1	24.9	23.9	24.4	25.5	26.7
82.5°	66.2	41.3	30.7	26.7	23.9	20.4	18.6	17.2	17.4	18.8	21.4
85°	25.5	20.0	18.3	17.7	16.5	13.2	11.4	11.6	13.2	15.8	15.8
87.5°	2.8	2.8	3.7	2.8	2.8	2.8	2.6	3.0	3.3	4.2	4.9
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P152353

CATALOG NUMBER: TLM-F01-LED-E1-SL4-8030

CANDELA DISTRIBUTION (continued):

	110°	115°	120°	125°	130°	135°	140°	145°	150°	155°	160°
0°	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2	439.2
2.5°	435.2	435.2	435.2	434.8	435.0	434.1	434.1	433.4	434.5	433.8	433.6
5°	428.5	428.3	427.3	427.3	427.3	427.3	428.0	426.2	427.6	427.6	426.9
7.5°	417.1	417.1	414.6	416.0	415.5	416.2	417.1	416.2	417.6	418.5	417.8
10°	401.3	401.3	399.2	400.9	400.2	401.8	403.4	402.5	403.4	404.8	405.3
12.5°	383.9	383.0	381.1	381.8	381.8	382.7	383.4	384.6	385.8	387.6	388.5
15°	363.7	362.3	360.0	360.0	358.6	359.1	360.4	360.9	363.2	365.8	368.8
17.5°	343.0	339.5	337.0	334.0	331.6	333.5	335.1	336.3	338.1	342.1	344.2
20°	323.5	316.6	311.7	307.7	305.2	306.3	308.4	309.8	311.4	312.4	313.1
22.5°	304.2	296.3	289.6	284.7	280.6	281.7	280.8	280.1	281.2	278.2	278.0
25°	287.5	278.2	269.2	263.4	258.3	256.6	251.8	250.6	247.3	244.8	242.9
27.5°	275.4	263.4	253.4	246.6	238.5	232.5	226.2	219.9	216.5	212.3	210.2
30°	265.9	253.1	241.3	229.9	219.2	209.9	201.6	193.5	187.9	181.8	177.9
32.5°	257.1	245.3	230.9	215.3	200.9	190.4	179.5	170.2	161.4	153.5	147.7
35°	251.1	237.8	219.5	200.4	184.2	171.9	160.2	147.0	136.3	126.1	119.8
37.5°	247.8	231.5	209.0	187.9	169.8	155.8	141.4	126.1	113.1	103.6	94.1
40°	245.3	225.3	199.7	176.7	157.7	141.0	124.3	106.1	91.7	81.8	74.3
42.5°	242.5	218.3	191.6	167.9	146.8	127.3	107.1	87.8	74.1	67.1	63.9
45°	239.4	212.3	183.9	159.6	136.1	112.4	89.2	71.3	63.2	60.8	60.8
47.5°	238.7	208.3	178.4	151.4	124.0	95.2	72.7	61.5	59.2	59.7	60.6
50°	241.5	207.2	173.5	141.9	108.0	77.1	61.5	57.8	58.3	59.7	61.1
52.5°	248.3	208.1	168.4	128.7	88.9	63.6	56.9	56.7	58.1	60.2	61.5
55°	259.7	208.1	158.6	108.9	71.1	57.1	55.3	56.2	58.1	59.9	61.1
57.5°	284.0	206.0	141.4	87.1	59.5	54.8	54.8	56.0	57.6	59.5	60.4
60°	313.1	203.2	117.3	67.4	53.6	53.0	54.6	56.0	57.4	59.0	59.9
62.5°	314.9	196.0	92.9	55.7	50.6	51.8	54.3	56.2	56.7	57.8	59.0
65°	289.4	170.9	73.9	49.9	49.2	51.1	53.6	55.0	55.3	55.7	56.9
67.5°	253.4	139.3	59.7	47.1	47.8	49.9	51.3	52.5	53.2	54.3	54.6
70°	208.1	111.9	51.1	44.4	45.1	47.4	48.5	49.7	51.1	52.5	51.8
72.5°	147.5	87.1	44.8	41.3	42.3	44.4	45.8	46.7	47.8	49.2	48.3
75°	62.7	60.8	38.8	37.4	38.8	40.2	41.6	43.0	44.1	44.8	44.8
77.5°	32.0	35.8	33.4	33.4	34.4	35.8	36.9	38.3	39.0	39.7	40.6
80°	27.2	27.6	28.1	29.0	30.0	31.4	32.5	33.7	33.9	34.1	34.6
82.5°	22.5	23.5	23.9	25.3	26.0	26.5	27.2	27.2	27.6	27.6	26.9
85°	16.3	17.4	18.1	18.3	18.1	18.3	18.6	19.0	20.2	20.2	19.3
87.5°	4.6	4.4	5.6	5.8	6.3	7.2	8.1	9.8	10.2	10.7	10.7
90°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P152353

CATALOG NUMBER: TLM-F01-LED-E1-SL4-8030

CANDELA DISTRIBUTION (continued):

	165°	170°	175°	180°
0°	439.2	439.2	439.2	439.2
2.5°	433.4	433.8	432.9	433.1
5°	426.9	427.8	426.6	428.0
7.5°	418.5	419.9	419.7	419.4
10°	406.4	408.3	408.3	409.0
12.5°	391.1	392.3	393.2	393.7
15°	370.4	372.5	373.7	373.7
17.5°	345.6	347.0	347.7	346.7
20°	314.0	313.5	313.8	311.4
22.5°	277.5	278.2	276.1	276.6
25°	241.8	240.6	241.5	240.1
27.5°	207.2	207.4	204.8	206.0
30°	174.2	173.0	169.8	171.4
32.5°	142.4	139.3	135.9	133.8
35°	112.4	107.8	106.1	105.4
37.5°	88.3	83.1	81.5	79.7
40°	70.1	68.3	67.6	68.0
42.5°	62.9	62.9	63.4	63.6
45°	61.1	61.8	62.5	62.7
47.5°	61.3	62.0	62.9	63.2
50°	61.8	62.5	63.2	63.4
52.5°	62.0	62.0	62.5	62.7
55°	61.5	61.3	61.5	61.8
57.5°	60.6	60.2	60.4	61.1
60°	60.2	59.5	59.9	60.4
62.5°	59.0	58.8	59.2	59.5
65°	56.4	56.7	57.4	57.4
67.5°	54.1	54.3	54.6	54.8
70°	51.3	51.6	52.0	52.3
72.5°	48.1	49.0	49.7	50.6
75°	45.5	46.4	47.8	48.8
77.5°	41.1	41.8	43.4	44.6
80°	34.8	34.6	34.8	35.5
82.5°	26.7	26.7	26.5	26.2
85°	18.8	18.6	17.9	17.9
87.5°	10.2	10.0	9.8	9.3
90°	0.0	0.0	0.0	0.0

(END OF REPORT)