

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: P256820

Luminaire Tested: **ULA-A5-D-U-SYM-VMx-BK**

Issue Date: 3/3/2020

**Test Information**

Test Method: LM-79-08  
Report Number: P256820  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G2-1804-729-3)  
Test Lab: INNOVATION CENTER(G2)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: STREETWORKS  
Catalog Number: ULA-A5-D-U-SYM-VMx-BK  
Description: UTILITY LIGHT ACORN TYPE V SYMMETRIC  
Light Source: (90) 4000K CCT, 70 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

Lumens per Lamp: N/A  
Luminaire Lumens: 4998.3 lumens  
Efficiency: N/A  
Efficacy: 139.2 lumens/watt  
Luminous Opening: Vertical Cylinder (Dia: 1.17' x H: 2.17')  
IES Classification: Type V - Short - Non-Cutoff  
BUG Rating: B1 - U5 - G3

Input Watts (W): 35.9  
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: 28.75 FT

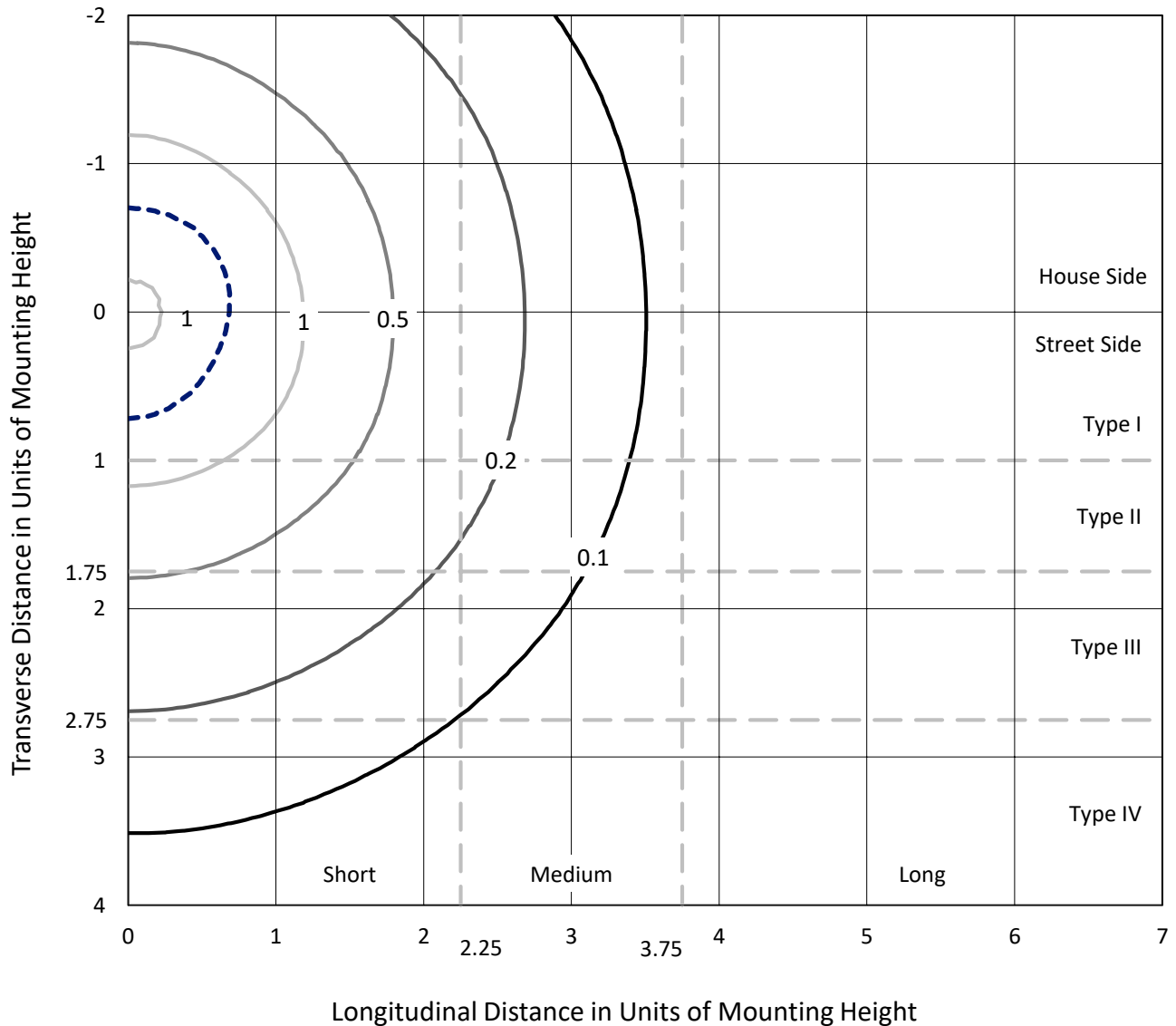


REPORT NUMBER: P256820

CATALOG NUMBER: ULA-A5-D-U-SYM-VMx-BK

### Iso-Footcandle Lines of Horizontal Illumination

× Max cd  
 - - - 1/2 Max cd

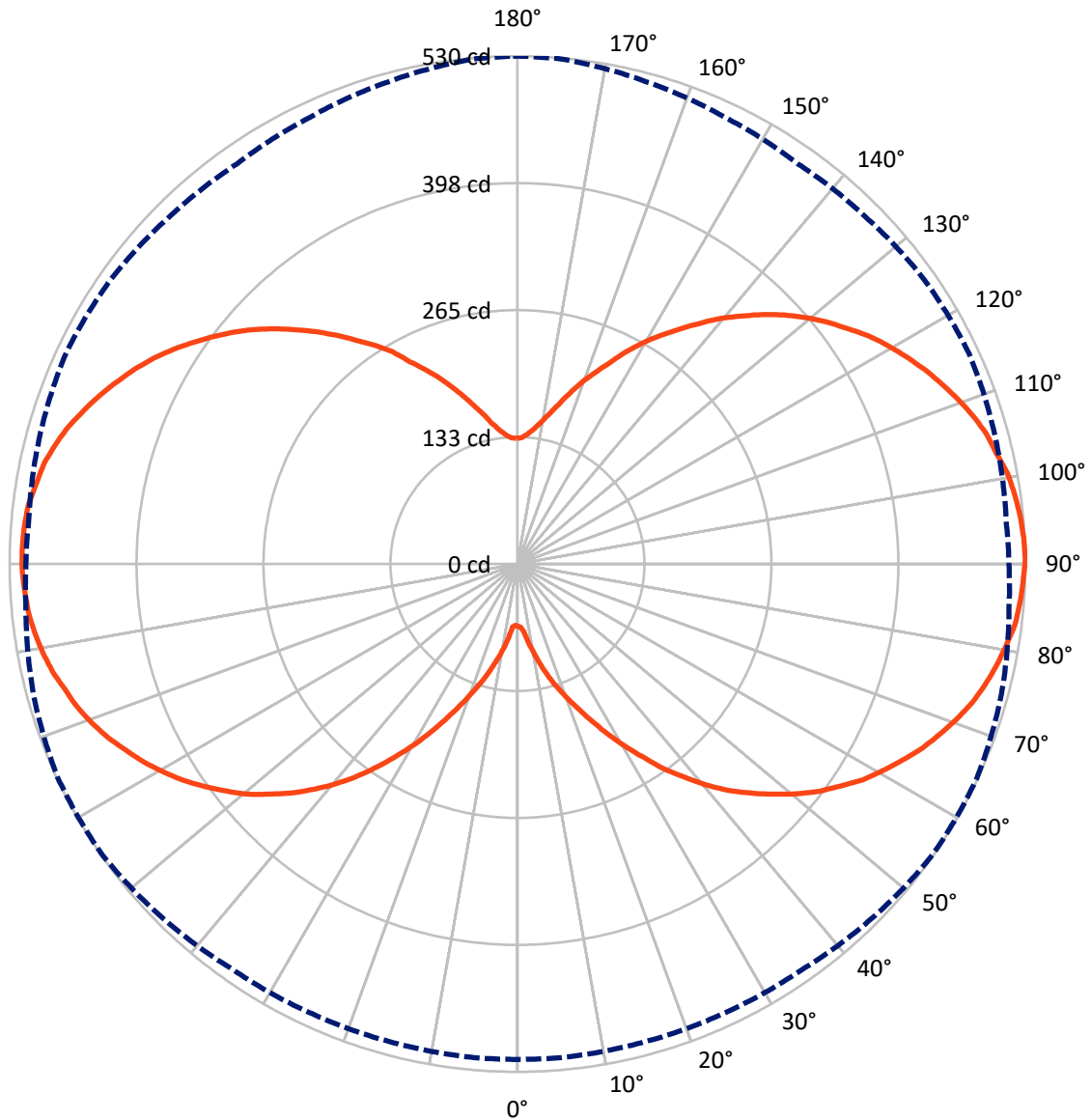


Based on 10 foot mounting height. Maximum calculated value = 1.5 fc  
 Type V - Short - Non-Cutoff

REPORT NUMBER: P256820

CATALOG NUMBER: ULA-A5-D-U-SYM-VMx-BK

### Luminous Intensity Polar Plot



— Vertical Plane Through 180-Deg Lateral      - - - Horizontal Cone Through 90-Deg Vertical



REPORT NUMBER: P256820

CATALOG NUMBER: ULA-A5-D-U-SYM-VMx-BK

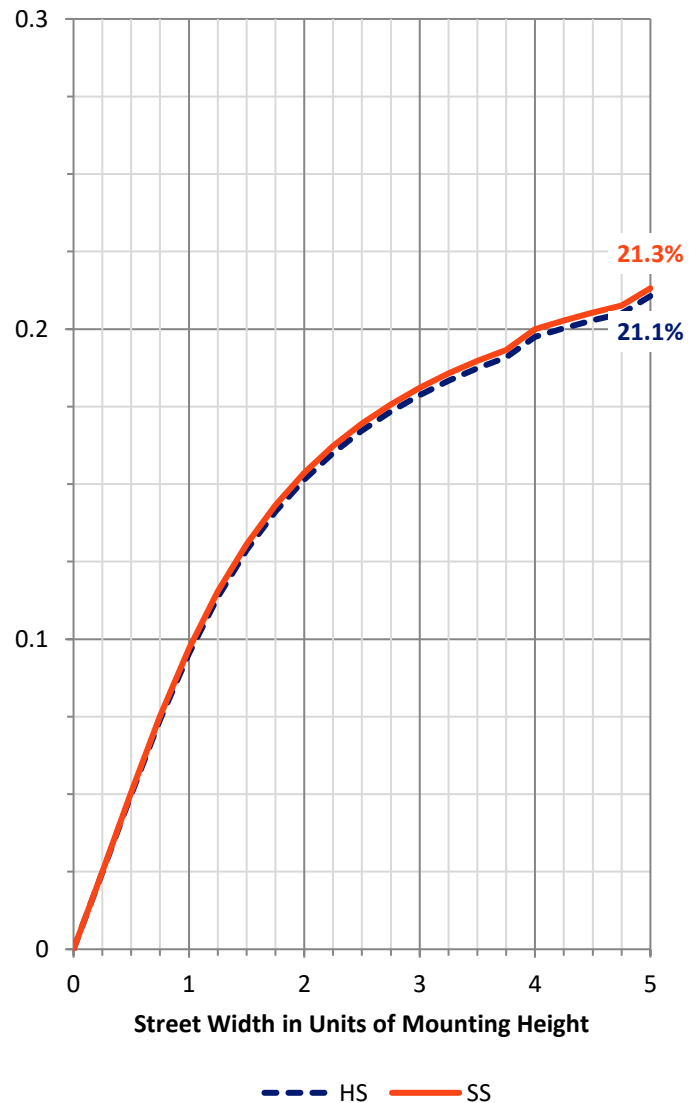
**FLUX DISTRIBUTION:**

		Downward	Upward	Total
<b>House Side</b>	Lumens	1218.4	1267.2	2485.7
	% Fixture	24.4	25.4	49.7
<b>Street Side</b>	Lumens	1234.9	1277.7	2512.6
	% Fixture	24.7	25.6	50.3
<b>Total</b>	Lumens	2453.4	2544.9	4998.3
	% Fixture	49.1	50.9	100.0

**Coefficient of Utilization**

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	7.4	0.1
10°-20°	34.8	0.7
20°-30°	85.8	1.7
30°-40°	166.2	3.3
40°-50°	263.8	5.3
50°-60°	362.4	7.3
60°-70°	451.1	9.0
70°-80°	521.0	10.4
80°-90°	561.0	11.2
90°-100°	563.7	11.3
100°-110°	526.6	10.5
110°-120°	457.5	9.2
120°-130°	370.7	7.4
130°-140°	275.2	5.5
140°-150°	182.8	3.7
150°-160°	105.6	2.1
160°-170°	49.5	1.0
170°-180°	13.4	0.3
0°-90°	2453.4	49.1
0°-180°	4998.3	100.0



REPORT NUMBER: P256820

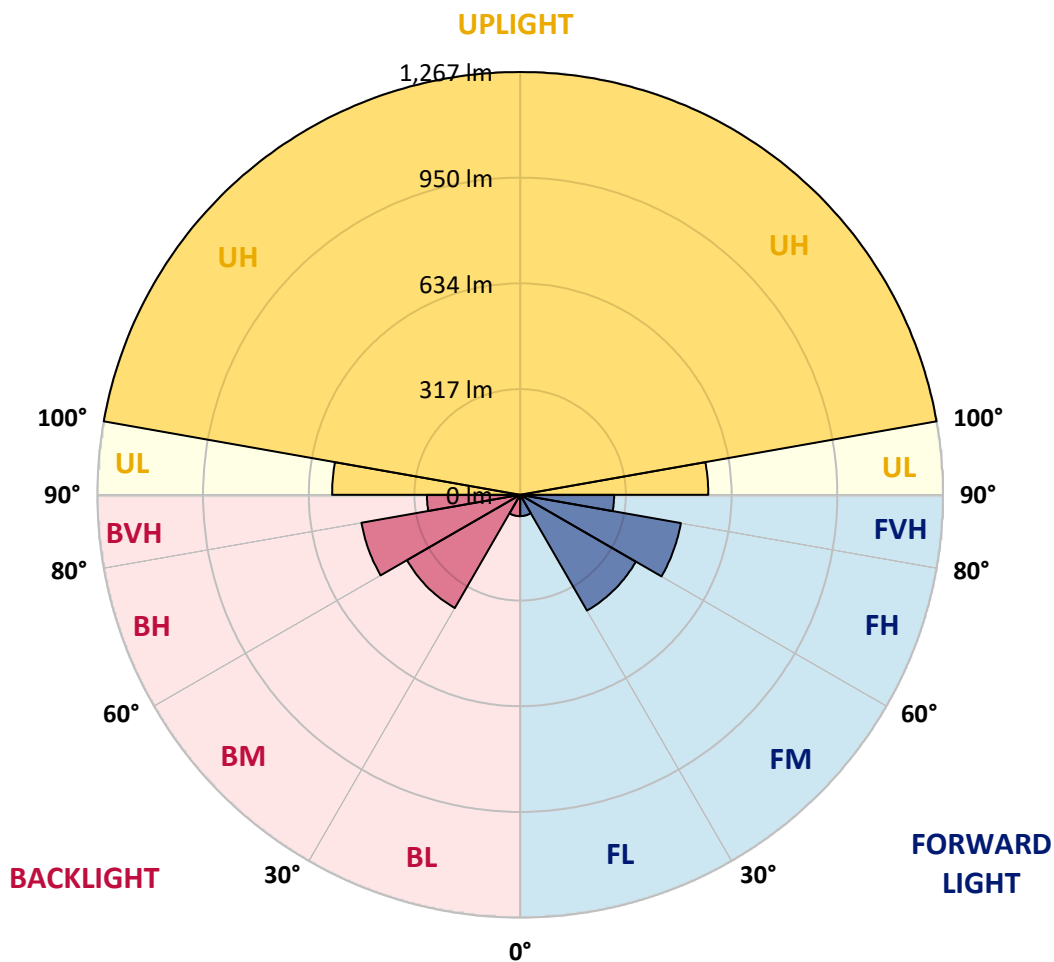
CATALOG NUMBER: ULA-A5-D-U-SYM-VMx-BK

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

Zone	Lumens	% Fixture	Zone Rating/Lumen Limit		
			B	U	G
FL (0°-30°)	63.8	1.3			
FM (30°-60°)	400.5	8.0			
FH (60°-80°)	489.0	9.8			G0/660
FVH (80°-90°)	281.5	5.6			G3/500
BL (0°-30°)	64.1	1.3	B0/110		
BM (30°-60°)	391.9	7.8	B1/1000		
BH (60°-80°)	483.0	9.7	B1/500		G0/660
BVH (80°-90°)	279.5	5.6			G3/500
UL (90°-100°)	563.7	11.3		U4/1000	
UH (100°-180°)	1267.2	25.4		U5	

**BUG Rating: B1-U5-G3**

Type V Short





REPORT NUMBER: P256820

CATALOG NUMBER: ULA-A5-D-U-SYM-VMx-BK

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
0°	65	65	65	65	65	65	65	65	65	65	65
2.5°	64	64	64	63	63	63	63	63	63	64	64
5°	66	66	66	66	66	66	66	67	68	68	69
7.5°	78	77	77	77	77	77	77	78	79	80	80
10°	90	89	89	90	90	91	90	92	92	93	94
12.5°	102	101	102	103	104	104	105	106	106	107	107
15°	115	114	115	116	117	118	119	120	121	121	120
17.5°	129	128	129	130	131	132	134	135	135	135	135
20°	143	142	143	145	146	147	150	151	150	150	149
22.5°	159	158	159	161	164	165	167	168	167	167	166
25°	176	176	177	179	182	184	187	188	186	186	185
27.5°	195	195	196	199	201	204	208	208	207	206	205
30°	215	214	216	219	222	225	229	231	230	227	225
32.5°	235	234	236	240	244	247	251	252	251	248	246
35°	256	257	258	261	266	269	273	274	272	270	267
37.5°	277	277	279	282	287	290	294	295	294	290	288
40°	297	297	299	302	306	310	314	316	313	310	307
42.5°	316	316	318	320	324	329	333	335	333	328	325
45°	335	335	337	339	343	347	352	353	350	345	343
47.5°	352	352	354	356	360	365	369	370	367	362	359
50°	370	369	371	373	377	382	386	386	383	377	374
52.5°	385	386	386	388	392	396	401	402	398	391	389
55°	400	401	401	402	406	411	417	416	412	406	402
57.5°	415	415	416	416	419	425	431	430	426	419	416
60°	428	428	428	430	432	437	443	444	438	431	428
62.5°	441	441	441	442	444	449	456	456	449	442	439
65°	452	453	453	453	456	462	467	467	462	453	451
67.5°	464	464	463	463	466	471	478	478	472	463	461
70°	474	474	473	473	476	482	489	488	481	474	471
72.5°	483	484	482	482	485	491	498	497	490	482	480
75°	490	492	490	489	492	498	505	505	498	489	487
77.5°	498	499	497	497	499	506	512	512	506	497	494
80°	504	505	504	503	505	511	518	518	512	503	500
82.5°	509	509	508	508	510	516	522	522	516	508	506
85°	513	514	513	512	514	520	526	526	520	511	509
87.5°	515	516	515	515	516	522	528	527	522	513	511
90°	517	517	516	516	517	523	529	529	523	515	513
92.5°	517	518	517	517	518	522	528	529	523	515	513
95°	516	516	516	515	516	521	527	527	522	513	511
97.5°	514	514	513	513	514	519	524	524	519	511	509
100°	509	510	510	509	510	514	520	520	514	507	505
102.5°	505	504	504	504	504	508	514	513	508	501	499
105°	498	498	497	497	498	502	508	507	501	494	492
107.5°	490	490	489	489	490	494	500	499	493	486	484
110°	480	480	479	478	481	485	491	490	484	477	475



REPORT NUMBER: P256820

CATALOG NUMBER: ULA-A5-D-U-SYM-VMx-BK

**CANDELA DISTRIBUTION (continued):**

	0°	5°	15°	25°	35°	45°	55°	65°	75°	85°	90°
112.5°	470	470	470	469	472	476	481	480	474	467	466
115°	459	459	458	458	462	466	471	469	463	457	455
117.5°	448	448	446	446	450	455	460	458	452	446	444
120°	436	436	434	434	439	444	449	447	441	434	433
122.5°	423	423	421	422	427	432	437	435	429	423	421
125°	409	409	408	409	414	419	424	422	416	411	408
127.5°	395	395	395	396	401	406	411	408	403	397	396
130°	381	381	380	382	387	392	396	395	389	384	382
132.5°	366	366	366	367	372	377	382	380	375	369	367
135°	350	350	351	352	357	362	366	364	360	354	351
137.5°	334	335	335	337	341	346	349	348	343	338	336
140°	318	318	319	321	325	329	331	330	327	322	319
142.5°	302	302	303	305	308	311	314	313	310	306	303
145°	286	286	287	289	292	294	297	296	293	289	286
147.5°	272	271	272	274	277	278	280	280	277	273	271
150°	257	257	258	259	261	263	264	264	261	257	255
152.5°	239	239	240	243	244	247	248	246	244	239	238
155°	225	225	225	227	228	229	230	229	227	224	223
157.5°	212	211	211	213	214	214	215	214	213	210	209
160°	198	198	198	199	199	201	201	200	198	197	195
162.5°	185	185	185	185	186	186	186	185	184	183	182
165°	172	172	172	172	172	173	173	172	171	170	170
167.5°	161	161	160	160	161	161	161	160	160	159	159
170°	150	151	151	150	150	150	150	150	150	149	149
172.5°	142	142	142	142	142	142	142	142	142	141	141
175°	136	136	136	135	136	136	136	135	135	135	135
177.5°	132	132	132	132	132	132	132	132	132	132	132
180°	131	131	131	131	131	131	131	131	131	131	131





REPORT NUMBER: P256820

CATALOG NUMBER: ULA-A5-D-U-SYM-VMx-BK

**CANDELA DISTRIBUTION (continued):**

	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
0°	65	65	65	65	65	65	65	65	65	65
2.5°	64	64	65	65	66	66	66	66	66	66
5°	69	69	70	70	70	71	71	71	71	71
7.5°	81	82	83	82	82	83	82	82	83	83
10°	93	94	95	95	95	95	95	95	95	94
12.5°	107	107	107	108	108	108	108	108	109	108
15°	120	120	120	121	121	121	121	122	123	122
17.5°	134	134	134	134	134	134	135	136	137	136
20°	149	149	148	148	148	148	149	150	150	150
22.5°	166	164	164	163	163	164	165	166	166	165
25°	184	182	180	181	180	181	182	183	183	182
27.5°	203	201	199	199	198	199	199	201	202	201
30°	223	221	218	218	217	217	219	220	221	220
32.5°	244	240	239	238	236	236	238	239	241	240
35°	266	263	259	257	257	258	259	260	263	262
37.5°	286	282	279	277	277	277	280	281	283	282
40°	305	301	298	296	296	296	299	300	303	303
42.5°	323	319	318	315	314	315	317	320	323	323
45°	340	337	335	333	332	333	335	339	342	341
47.5°	357	354	352	350	349	349	352	356	360	359
50°	373	370	368	367	366	366	369	373	378	377
52.5°	387	385	384	383	381	381	384	389	393	394
55°	401	399	399	397	396	396	399	404	408	409
57.5°	415	413	414	412	410	409	413	419	423	425
60°	427	426	426	425	423	422	426	432	437	438
62.5°	439	438	439	438	435	434	438	444	450	451
65°	450	449	452	450	447	446	450	457	463	464
67.5°	460	460	462	461	457	456	460	467	474	475
70°	470	471	474	472	468	467	470	478	485	486
72.5°	478	480	484	482	477	475	480	488	495	496
75°	487	488	491	490	486	483	488	496	503	504
77.5°	494	496	500	498	493	491	496	504	511	511
80°	500	503	506	505	500	497	502	510	517	517
82.5°	505	508	511	510	505	502	506	514	522	523
85°	509	512	516	515	509	506	510	519	525	526
87.5°	510	514	519	516	512	508	513	520	527	528
90°	512	516	520	518	513	510	514	521	529	530
92.5°	512	516	520	519	514	510	514	522	528	529
95°	511	515	519	518	512	509	513	520	527	527
97.5°	508	512	516	515	510	506	510	517	524	524
100°	504	508	513	512	506	503	506	514	520	520
102.5°	498	502	507	506	501	497	500	508	513	513
105°	492	495	500	499	494	490	494	501	507	508
107.5°	484	487	492	492	487	483	486	494	499	500
110°	475	478	482	482	478	474	477	484	491	491



REPORT NUMBER: P256820

CATALOG NUMBER: ULA-A5-D-U-SYM-VMx-BK

**CANDELA DISTRIBUTION (continued):**

	95°	105°	115°	125°	135°	145°	155°	165°	175°	180°
112.5°	465	468	472	472	467	464	467	475	481	481
115°	455	457	461	461	457	454	458	465	471	471
117.5°	444	446	449	450	446	443	447	453	460	460
120°	432	434	437	437	434	432	435	442	448	449
122.5°	421	422	424	424	421	420	423	431	436	437
125°	408	408	411	410	408	407	411	417	423	423
127.5°	395	395	396	396	394	393	398	404	409	410
130°	381	380	381	381	380	380	384	390	395	396
132.5°	366	365	365	365	365	365	369	375	380	381
135°	350	349	349	349	348	350	354	359	364	365
137.5°	335	333	333	332	333	335	338	343	348	348
140°	318	315	315	315	317	319	322	327	331	332
142.5°	302	299	298	299	300	302	306	311	314	314
145°	285	282	281	282	284	287	290	294	297	297
147.5°	270	267	266	266	269	272	275	279	281	281
150°	254	251	250	251	254	256	260	263	265	265
152.5°	237	234	233	234	236	239	243	246	249	248
155°	222	219	218	219	221	224	226	229	231	230
157.5°	208	206	205	206	208	210	212	214	216	215
160°	195	193	193	193	194	197	198	200	201	201
162.5°	182	180	180	181	182	184	185	186	186	186
165°	170	168	168	169	169	171	171	172	173	172
167.5°	159	158	157	158	159	160	160	160	161	160
170°	149	149	148	148	149	150	150	150	150	150
172.5°	141	141	141	141	142	142	142	142	142	142
175°	135	135	135	135	136	136	136	136	136	136
177.5°	132	132	132	132	132	132	132	132	132	132
180°	131	131	131	131	131	131	131	131	131	131

(END OF REPORT)