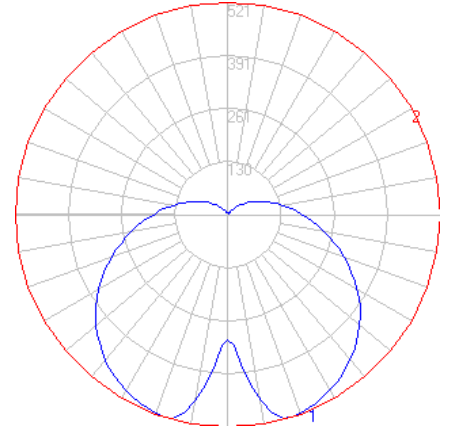


BEGA

TEST: BE_88157K4
 TEST LAB: BEGA
 DATE: 6/26/2017
 LUMINAIRE: 88 157K4
 LAMP: 32.0W LED

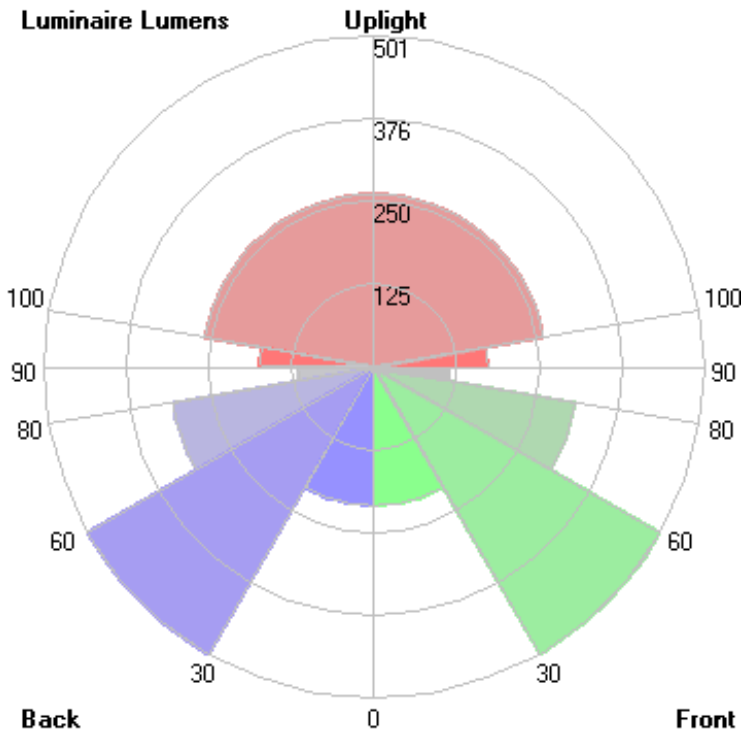
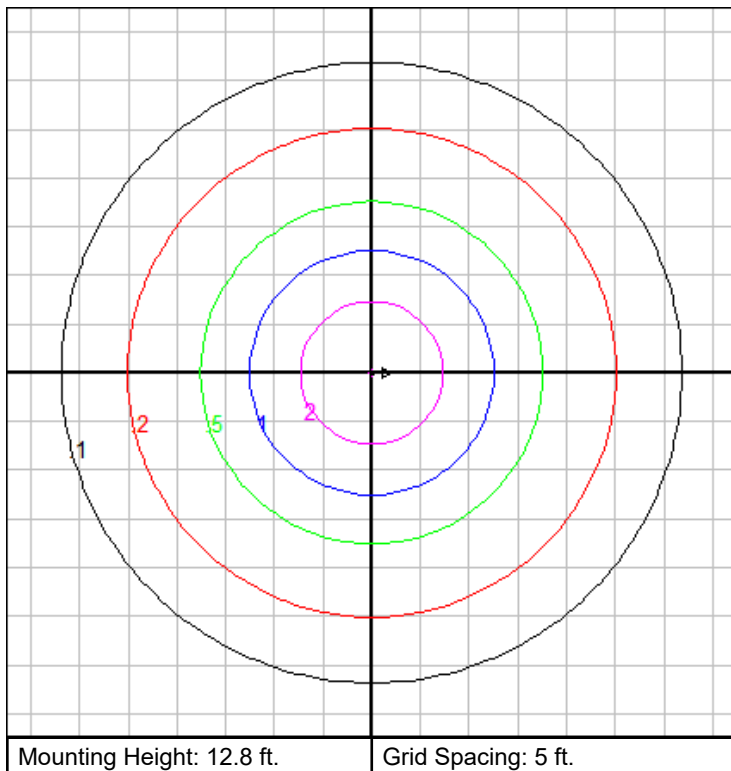


Characteristics

IES Classification	Type V
Longitudinal Classification	Very Short
Lumens Per Lamp	N.A. (absolute)
Total Lamp Lumens	N.A. (absolute)
Luminaire Lumens	2704
Downward Total Efficiency	N.A.
Total Luminaire Efficiency	N.A.
Luminaire Efficacy Rating (LER)	71
Total Luminaire Watts	38
Ballast Factor	1.00
Upward Waste Light Ratio	0.16
Max. Cd.	521.2 (0H, 17.5V)
Max. Cd. (<90 Vert.)	521.2 (0H, 17.5V)
Max. Cd. (At 90 Deg. Vert.)	182.8 (6.8%Lum)
Max. Cd. (80 to <90 Deg. Vert.)	240.7 (8.9%Lum)
Cutoff Classification (deprecated)	N.A. (absolute)

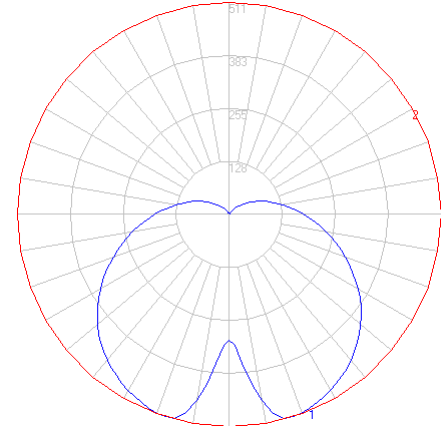
Zonal Lumen Summary

LCS Zone	Lumens	%Lamp	%Lum
FL(0-30)	209.5	N.A.	7.7
FM(30-60)	500.8	N.A.	18.5
FH(60-80)	309.9	N.A.	11.5
FVH(80-90)	115.3	N.A.	4.3
BL(0-30)	209.5	N.A.	7.7
BM(30-60)	500.8	N.A.	18.5
BH(60-80)	309.9	N.A.	11.5
BVH(80-90)	115.3	N.A.	4.3
UL(90-100)	172.4	N.A.	6.4
UH(100-180)	260.3	N.A.	9.6
Total	2703.7	N.A.	100.0
BUG Rating	B1-U3-G2		



BEGA

TEST: BE_88157K4
 TEST LAB: BEGA
 DATE: 6/26/2017
 LUMINAIRE: 88 157K35
 LAMP: 32.0W LED

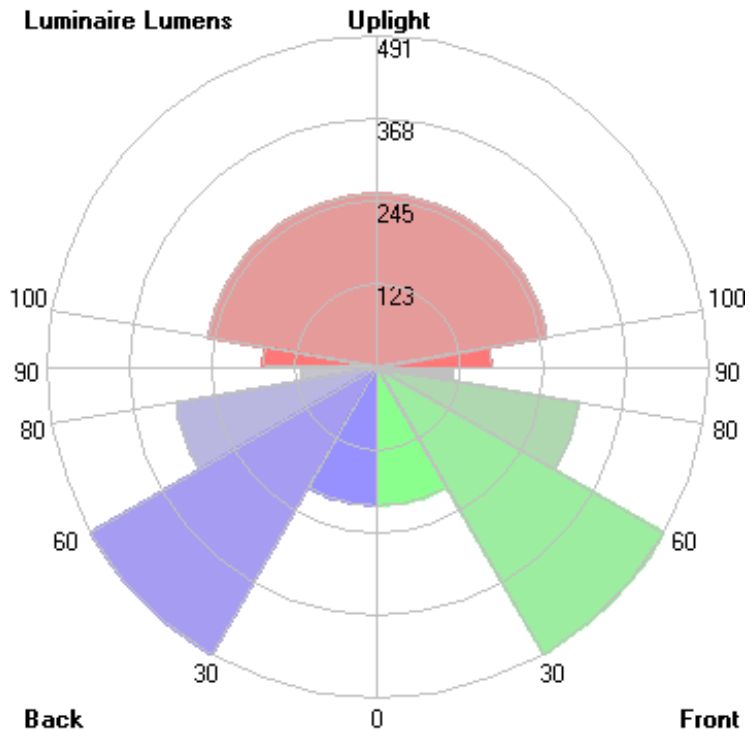
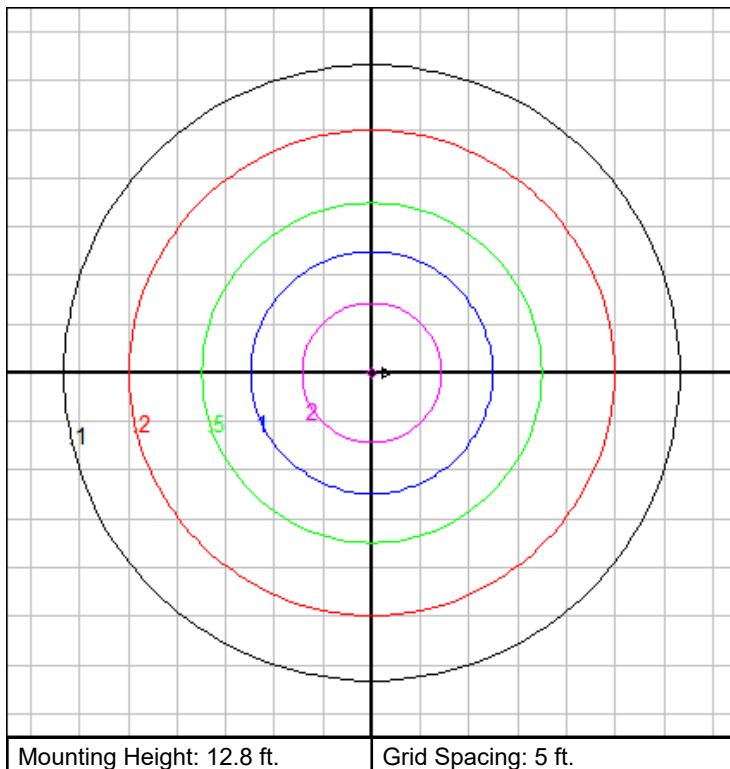


Characteristics

IES Classification	Type V
Longitudinal Classification	Very Short
Lumens Per Lamp	N.A. (absolute)
Total Lamp Lumens	N.A. (absolute)
Luminaire Lumens	2650
Downward Total Efficiency	N.A.
Total Luminaire Efficiency	N.A.
Luminaire Efficacy Rating (LER)	70
Total Luminaire Watts	38
Ballast Factor	1.00
Upward Waste Light Ratio	0.16
Max. Cd.	510.776 (0H, 17.5V)
Max. Cd. (<90 Vert.)	510.776 (0H, 17.5V)
Max. Cd. (At 90 Deg. Vert.)	179.144 (6.8%Lum)
Max. Cd. (80 to <90 Deg. Vert.)	235.886 (8.9%Lum)
Cutoff Classification (deprecated)	N.A. (absolute)

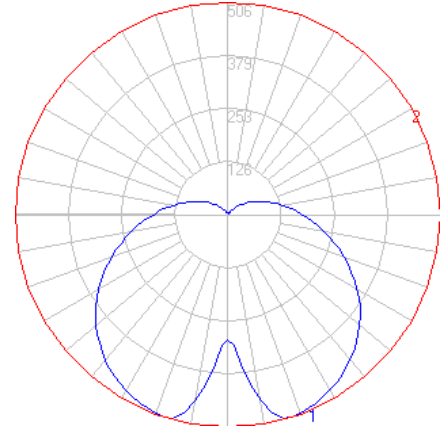
Zonal Lumen Summary

LCS Zone	Lumens	%Lamp	%Lum
FL(0-30)	205.3	N.A.	7.7
FM(30-60)	490.8	N.A.	18.5
FH(60-80)	303.7	N.A.	11.5
FVH(80-90)	113.0	N.A.	4.3
BL(0-30)	205.3	N.A.	7.7
BM(30-60)	490.8	N.A.	18.5
BH(60-80)	303.7	N.A.	11.5
BVH(80-90)	113.0	N.A.	4.3
UL(90-100)	168.9	N.A.	6.4
UH(100-180)	255.1	N.A.	9.6
Total	2649.6	N.A.	100.0
BUG Rating	B1-U3-G2		



BEGA

TEST: BE_88157K4
 TEST LAB: BEGA
 DATE: 6/26/2017
 LUMINAIRE: 88 157K3
 LAMP: 32.0W LED

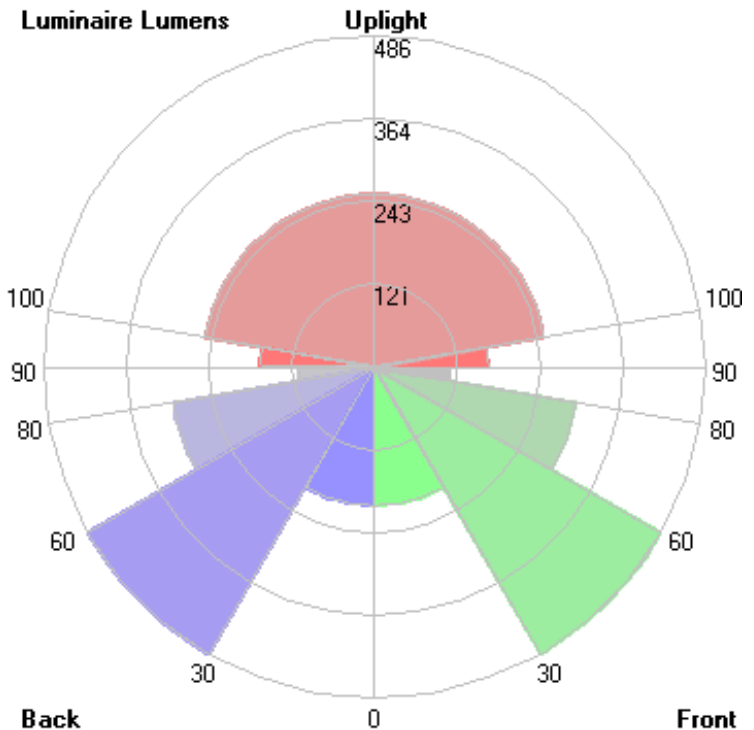
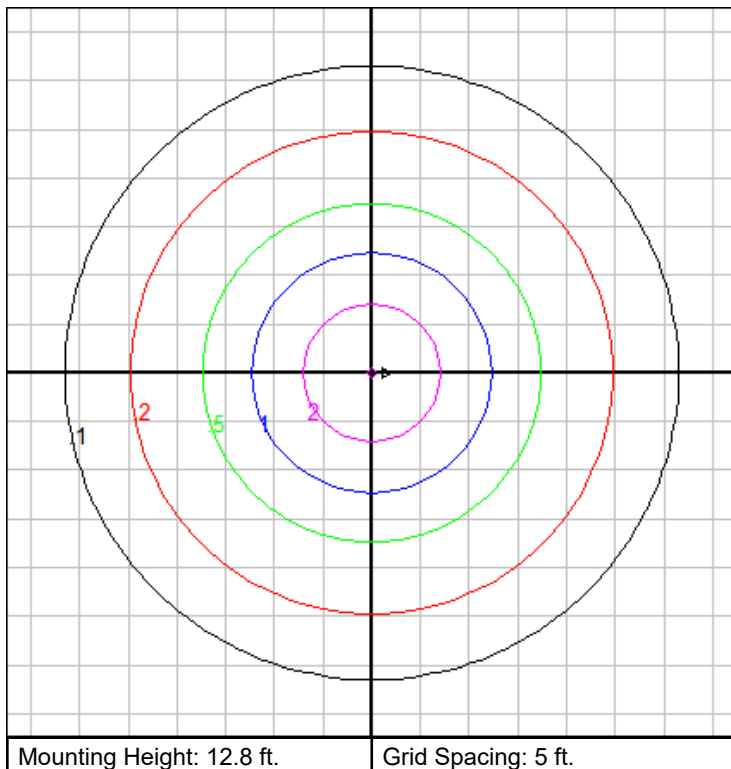


Characteristics

IES Classification	Type V
Longitudinal Classification	Very Short
Lumens Per Lamp	N.A. (absolute)
Total Lamp Lumens	N.A. (absolute)
Luminaire Lumens	2623
Downward Total Efficiency	N.A.
Total Luminaire Efficiency	N.A.
Luminaire Efficacy Rating (LER)	69
Total Luminaire Watts	38
Ballast Factor	1.00
Upward Waste Light Ratio	0.16
Max. Cd.	505.564 (0H, 17.5V)
Max. Cd. (<90 Vert.)	505.564 (0H, 17.5V)
Max. Cd. (At 90 Deg. Vert.)	177.316 (6.8%Lum)
Max. Cd. (80 to <90 Deg. Vert.)	233.479 (8.9%Lum)
Cutoff Classification (deprecated)	N.A. (absolute)

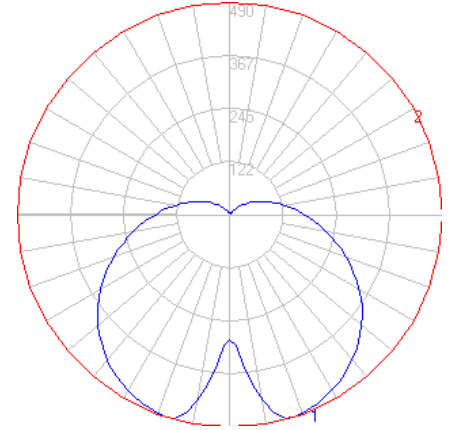
Zonal Lumen Summary

LCS Zone	Lumens	%Lamp	%Lum
FL(0-30)	203.2	N.A.	7.7
FM(30-60)	485.8	N.A.	18.5
FH(60-80)	300.6	N.A.	11.5
FVH(80-90)	111.8	N.A.	4.3
BL(0-30)	203.2	N.A.	7.7
BM(30-60)	485.8	N.A.	18.5
BH(60-80)	300.6	N.A.	11.5
BVH(80-90)	111.8	N.A.	4.3
UL(90-100)	167.2	N.A.	6.4
UH(100-180)	252.5	N.A.	9.6
Total	2622.5	N.A.	100.0
BUG Rating	B1-U3-G2		



BEGA

TEST: BE_88157K4
 TEST LAB: BEGA
 DATE: 6/26/2017
 LUMINAIRE: 88 157K27
 LAMP: 32.0W LED



Characteristics

IES Classification	Type V
Longitudinal Classification	Very Short
Lumens Per Lamp	N.A. (absolute)
Total Lamp Lumens	N.A. (absolute)
Luminaire Lumens	2542
Downward Total Efficiency	N.A.
Total Luminaire Efficiency	N.A.
Luminaire Efficacy Rating (LER)	67
Total Luminaire Watts	38
Ballast Factor	1.00
Upward Waste Light Ratio	0.16
Max. Cd.	489.928 (0H, 17.5V)
Max. Cd. (<90 Vert.)	489.928 (0H, 17.5V)
Max. Cd. (At 90 Deg. Vert.)	171.832 (6.8%Lum)
Max. Cd. (80 to <90 Deg. Vert.)	226.258 (8.9%Lum)
Cutoff Classification (deprecated)	N.A. (absolute)

Zonal Lumen Summary

LCS Zone	Lumens	%Lamp	%Lum
FL(0-30)	197.0	N.A.	7.7
FM(30-60)	470.8	N.A.	18.5
FH(60-80)	291.3	N.A.	11.5
FVH(80-90)	108.4	N.A.	4.3
BL(0-30)	197.0	N.A.	7.7
BM(30-60)	470.8	N.A.	18.5
BH(60-80)	291.3	N.A.	11.5
BVH(80-90)	108.4	N.A.	4.3
UL(90-100)	162.0	N.A.	6.4
UH(100-180)	244.7	N.A.	9.6
Total	2541.7	N.A.	100.0
BUG Rating	B1-U3-G2		

