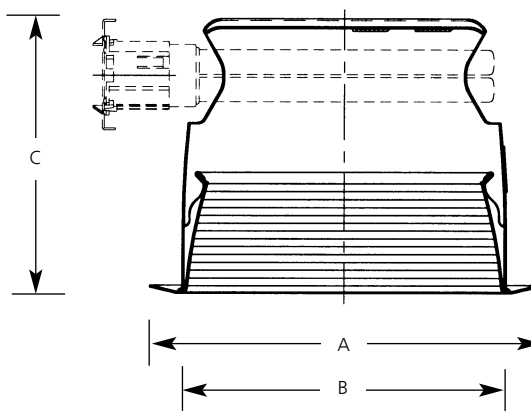


Type _____
 -28 -31
 P8031

Catalog No.	Finish		Dimensions (Inches)		
	White	Black	A	B	C
P8031	-28	-31	7-3/4	6-3/8	5-5/16

Maximum Ceiling Thickness: 1-1/8"



*Lamps shown are 13w twin tube compact fluorescent

Lamp Wattage

Housing	IC	Non-IC
P69	N/A	2 9w Twin
P63	N/A	2 13w Twin or Quad
P63-EBIC	2 13w Quad	2 13w Quad
P68	N/A	2 18w Quad
P66	N/A	2 26w Quad
P28	N/A	2 28w Quad

Specifications:

Flange

- Bright white powdered painted metal flange

Trim

- All aluminum construction
- One-piece construction with integral flange
- No light leaks around trim flange
- Socket box mounts to trim for optimum performance and consistent lamp position
- Trim retention accomplished by 3 spring clips located in aperture of housing
- Powder painted bright white finish

Baffle

- Enamel painted
- Spun aluminum multigroove step baffle

Labeling

- UL 1570 and CUL listed for damp locations

Options

- Specify after Catalog No.:
 White baffle (-28)
 Black baffle (-31)

P63

P63 WITH P8031-28

Report No. 98138

No. Lamps: 2 Type Lamp: 13 W CF TWIN - GE Total Lumens: 1800

Fixture Efficiency: 35.6%

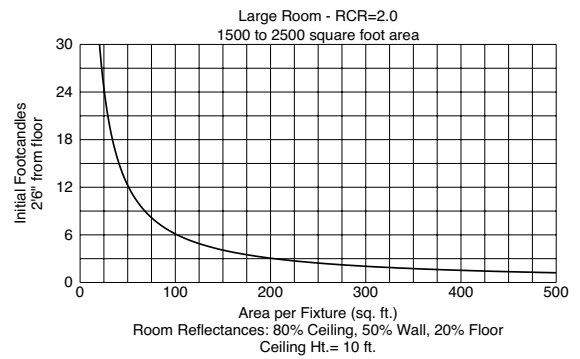
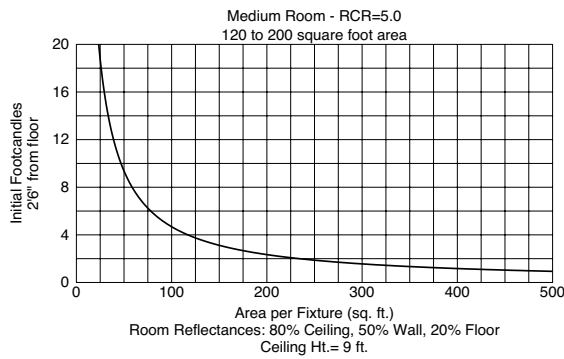
S/MH Ratio: 0.9 (0) 1.1 (90)

Single Fixture Data

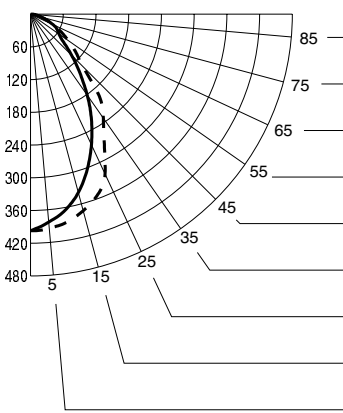
Ceiling Ht.(Ft.)	10% Values		Zero Degrees Ft.-C	50% Values	
	Beam Angle - 92			Beam Angle - 53	
	Ft.-C	Beam Dia.		Ft.-C	Beam Dia.
8	1.3	11	13.1	6.6	6
10	0.7	15	7.1	3.5	8
12	0.4	20	4.4	2.2	10
14	0.3	24	3.0	1.5	12
16	0.2	28	2.2	1.1	14

Ft.-C (Footcandles) are initial and measured 2'-6" from floor

Quick Calculator Charts



DISTRIBUTION CURVE



INTENSITY DATA

DEGREES	CANDELA	
	AT 0°	AT 90°
90	0	0
85	6	5
80	13	12
75	21	20
70	32	32
65	46	47
60	56	64
55	64	85
50	78	109
45	107	136
40	141	196
35	181	233
30	223	270
25	264	324
20	304	355
15	339	373
10	365	387
5	383	394
0	397	397

ZONAL CAVITY COEFFICIENTS OF UTILIZATION

Effective Floor Cavity Reflectance 0.20

RC	Effective Floor Cavity Reflectance 0.20																						
	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	0		
0	42	42	42	42	41	41	41	41	40	40	40	38	38	38	36	36	36	36	36	36	36		
1	40	38	37	36	39	37	36	35	36	35	34	35	34	33	33	33	32	32	32	32	32		
2	37	34	32	31	36	34	32	30	32	31	30	31	30	29	30	29	28	28	28	28	28		
3	34	31	29	27	33	30	28	26	29	27	26	28	27	25	28	26	25	24	24	24	24		
4	32	28	25	23	31	28	25	23	27	25	23	26	24	23	25	24	22	22	22	22	22		
5	29	26	23	21	29	25	23	21	24	22	20	24	22	20	23	21	20	19	19	19	19		
6	28	23	21	19	27	23	20	19	22	20	18	22	20	18	21	20	18	17	17	17	17		
7	26	22	19	17	25	21	19	17	21	18	17	20	18	17	20	18	16	16	16	16	16		
8	24	20	17	15	24	20	17	15	19	17	15	19	17	15	18	17	15	14	14	14	14		
9	23	18	16	14	22	18	16	14	18	16	14	18	15	14	17	15	14	13	13	13	13		
10	21	17	15	13	21	17	15	13	17	14	13	16	14	13	16	14	13	12	12	12	12		

P68-EB

P68-EB WITH P8031-28

Report No. 98214

No. Lamps: 2 Type Lamp: 18W CF QUAD-GE Total Lumens: 2500

Fixture Efficiency: 38.7%

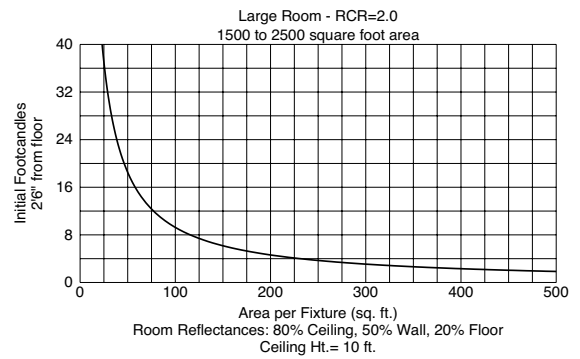
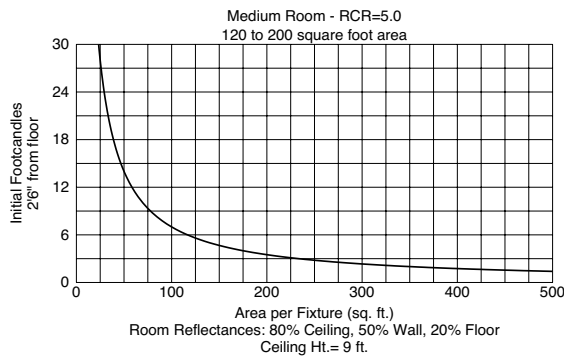
S/MH Ratio: 1.0 (0) 1.0 (90)

Single Fixture Data

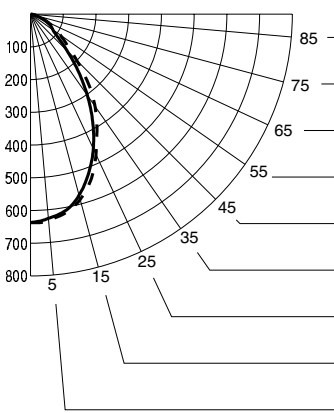
Ceiling Ht.(Ft.)	10% Values		Zero Degrees Ft.-C	50% Values	
	Beam Angle - 90			Beam Angle - 53	
	Ft.-C	Beam Dia.		Ft.-C	Beam Dia.
8	2.1	11	21.1	10.5	5
10	1.1	15	11.3	5.7	7
12	0.7	19	7.1	3.5	9
14	0.5	23	4.8	2.4	11
16	0.3	27	3.5	1.7	13

Ft.-C (Footcandles) are initial and measured 2'-6" from floor

Quick Calculator Charts



DISTRIBUTION CURVE



INTENSITY DATA

DEGREES	CANDELA	
	AT 0°	AT 90°
90	0	0
85	3	6
80	11	15
75	21	25
70	33	39
65	51	59
60	71	83
55	83	111
50	108	144
45	158	200
40	226	273
35	303	343
30	380	406
25	454	473
20	518	539
15	573	586
10	610	617
5	627	632
0	637	637

ZONAL CAVITY COEFFICIENTS OF UTILIZATION

Effective Floor Cavity Reflectance 0.20

RC	Effective Floor Cavity Reflectance 0.20																						
	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	0		
0	46	46	46	46	45	45	45	45	43	43	43	41	41	41	40	40	40	39	39	39	39		
1	43	42	40	39	42	41	40	39	39	38	37	38	37	36	36	36	35	34	34	34	34		
2	40	37	35	34	39	37	35	33	35	34	32	34	33	32	33	32	31	30	30	30	30		
3	37	34	31	29	36	33	31	29	32	30	28	31	29	28	30	29	28	27	27	27	27		
4	35	31	28	26	34	30	28	26	29	27	25	29	27	25	28	26	25	24	24	24	24		
5	32	28	25	23	32	28	25	23	27	25	23	26	24	22	26	24	22	22	22	22	22		
6	30	26	23	21	30	25	23	21	25	22	20	24	22	20	24	22	20	20	20	20	20		
7	28	24	21	19	28	23	21	19	23	20	19	22	20	19	22	20	18	18	18	18	18		
8	27	22	19	17	26	22	19	17	21	19	17	21	19	17	20	18	17	16	16	16	16		
9	25	20	18	16	25	20	18	16	20	17	16	19	17	16	19	17	16	15	15	15	15		
10	24	19	16	15	23	19	16	15	19	16	15	18	16	14	18	16	14	14	14	14	14		

P66-EB

P66-EB WITH P8031-28

Report No. 98178

No. Lamps: 2 Type Lamp: 26W CF QUAD-GE Total Lumens: 3400

Fixture Efficiency: 35.8%

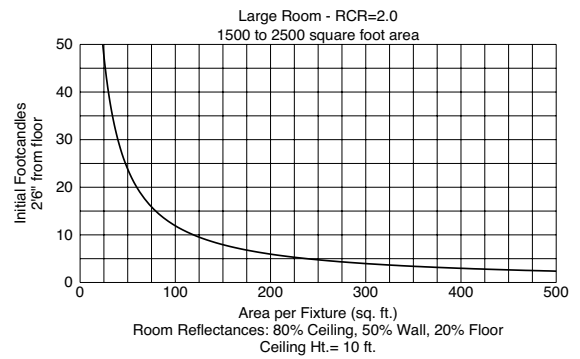
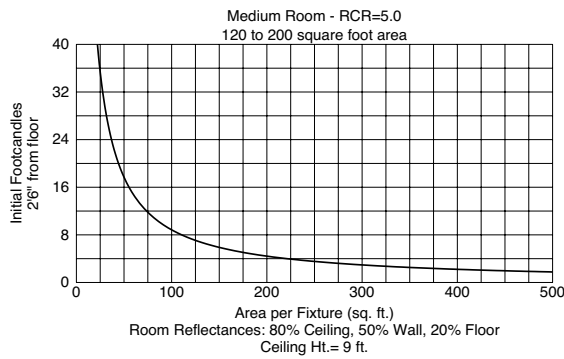
S/MH Ratio: 0.9 (0) 1.1 (90)

Single Fixture Data

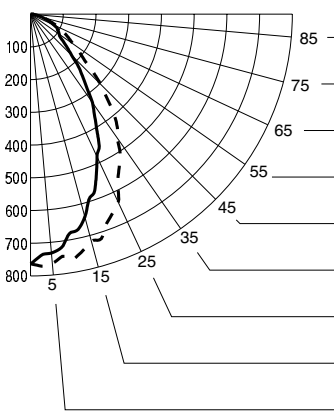
Ceiling Ht.(Ft.)	10% Values		Zero Degrees Ft.-C	50% Values	
	Beam Angle - 92			Beam Angle - 53	
	Ft.-C	Beam Dia.		Ft.-C	Beam Dia.
8	2.5	11	25.2	12.6	5
10	1.4	16	13.6	6.8	7
12	0.8	20	8.5	4.2	9
14	0.6	24	5.8	2.9	11
16	0.4	28	4.2	2.1	13

Ft.-C (Footcandles) are initial and measured 2'-6" from floor

Quick Calculator Charts



DISTRIBUTION CURVE



INTENSITY DATA

DEGREES	CANDELA	
	AT 0'	AT 90'
90	0	0
85	11	13
80	23	26
75	37	41
70	58	63
65	79	92
60	95	125
55	107	160
50	132	211
45	178	302
40	247	395
35	330	462
30	404	542
25	481	634
20	574	680
15	641	719
10	681	760
5	733	765
0	763	763

ZONAL CAVITY COEFFICIENTS OF UTILIZATION

Effective Floor Cavity Reflectance 0.20

RC	Effective Floor Cavity Reflectance 0.20																							
	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
0	43	43	43	43	42	42	42	42	40	40	40	38	38	38	37	37	37	36	36	36	36	36	36	36
1	40	38	37	36	39	38	37	36	36	35	34	35	34	33	34	33	32	34	33	32	34	33	32	32
2	37	35	33	31	36	34	32	31	33	31	30	32	30	29	31	29	28	31	29	28	31	29	28	28
3	34	31	29	27	33	31	28	27	30	28	26	29	27	26	28	26	25	28	26	25	28	26	25	25
4	32	28	26	24	31	28	25	23	27	25	23	26	24	23	25	24	23	25	24	23	25	24	23	22
5	30	26	23	21	29	25	23	21	25	22	21	24	22	21	23	22	20	23	22	20	23	22	20	20
6	28	24	21	19	27	23	21	19	23	20	19	22	20	19	22	20	18	22	20	18	22	20	18	18
7	26	22	19	17	25	21	19	17	21	19	17	21	18	17	20	18	17	20	18	17	20	18	17	16
8	24	20	17	16	24	20	17	16	19	17	15	19	17	15	19	17	15	19	17	15	19	17	15	15
9	23	19	16	14	22	18	16	14	18	16	14	18	16	14	17	15	14	17	15	14	17	15	14	14
10	22	17	15	13	21	17	15	13	17	15	13	17	15	13	16	14	13	16	14	13	16	14	13	12

P69

P69 WITH P8031-28

Report No. 98231

No. Lamps: 2 Type Lamp: 9W CF TWIN-GE Total Lumens: 1200

Fixture Efficiency: 32.3%

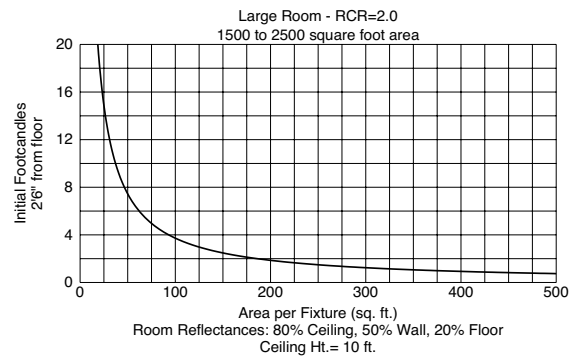
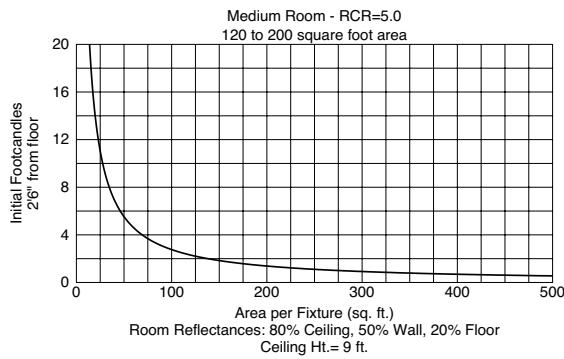
S/MH Ratio: 0.9 (0) 1.1 (90)

Single Fixture Data

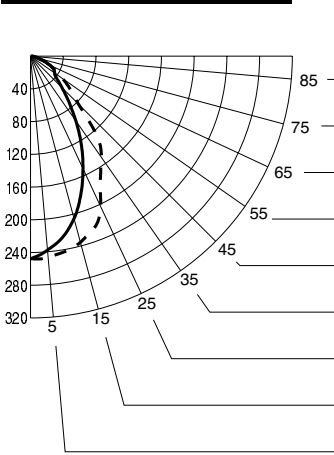
Ceiling Ht.(Ft.)	10% Values		Zero Degrees Ft.-C	50% Values	
	Beam Angle - 90			Beam Angle - 52	
	Ft.-C	Beam Dia.		Ft.-C	Beam Dia.
8	0.8	11	8.2	4.1	5
10	0.4	15	4.4	2.2	7
12	0.3	19	2.7	1.4	9
14	0.2	23	1.9	0.9	11
16	0.1	27	1.4	0.7	13

Ft.-C (Footcandles) are initial and measured 2'-6" from floor

Quick Calculator Charts



DISTRIBUTION CURVE



INTENSITY DATA

DEGREES	CANDELA	
	AT 0'	AT 90'
90	0	0
85	4	2
80	8	6
75	12	10
70	18	16
65	26	26
60	33	36
55	36	48
50	41	64
45	54	83
40	73	125
35	97	151
30	124	171
25	152	203
20	180	225
15	206	236
10	225	243
5	238	246
0	248	248

ZONAL CAVITY COEFFICIENTS OF UTILIZATION

Effective Floor Cavity Reflectance 0.20

RC	Effective Floor Cavity Reflectance 0.20																						
	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	0		
0	38	38	38	38	38	38	38	38	36	36	36	34	34	34	33	33	33	32	32	32	32		
1	36	35	33	32	35	34	33	32	33	32	31	31	31	30	30	30	29	29	29	29	29		
2	33	31	29	28	32	31	29	27	29	28	27	28	27	26	27	27	26	25	25	25	25		
3	31	28	26	24	30	28	26	24	27	25	24	26	24	23	25	24	23	22	22	22	22		
4	29	25	23	21	28	25	23	21	24	22	21	24	22	21	23	22	20	20	20	20	20		
5	27	23	21	19	26	23	21	19	22	20	19	22	20	18	21	20	18	18	18	18	18		
6	25	21	19	17	24	21	19	17	20	18	17	20	18	17	19	18	17	16	16	16	16		
7	23	20	17	15	23	19	17	15	19	17	15	18	17	15	18	16	15	15	15	15	15		
8	22	18	16	14	22	18	16	14	18	15	14	17	15	14	17	15	14	13	13	13	13		
9	21	17	15	13	20	17	14	13	16	14	13	16	14	13	16	14	13	12	12	12	12		
10	20	16	13	12	19	16	13	12	15	13	12	15	13	12	15	13	12	11	11	11	11		

P63

P63 WITH P8031-31

Report No. 98139

No. Lamps: 2 Type Lamp: 13 W CF TWIN - GE Total Lumens: 1800

Fixture Efficiency: 24.9%

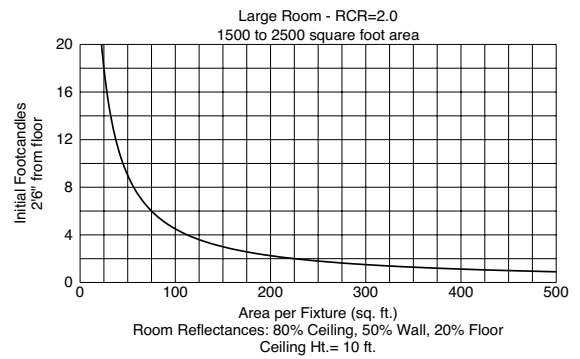
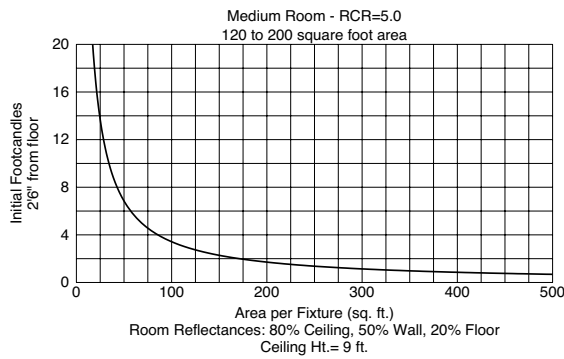
S/MH Ratio: 0.9 (0) 1.1 (90)

Single Fixture Data

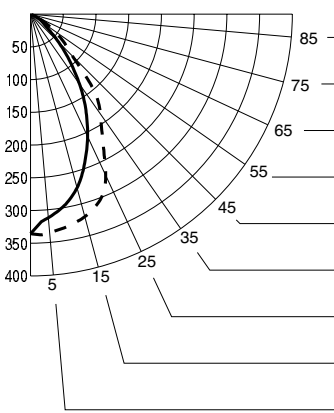
Ceiling Ht.(Ft.)	10% Values		Zero Degrees Ft.-C	50% Values	
	Beam Angle - 87			Beam Angle - 52	
	Ft.-C	Beam Dia.		Ft.-C	Beam Dia.
8	1.1	10	11.1	5.5	5
10	0.6	14	6.0	3.0	7
12	0.4	18	3.7	1.9	9
14	0.3	22	2.5	1.3	11
16	0.2	26	1.8	0.9	13

Ft.-C (Footcandles) are initial and measured 2'-6" from floor

Quick Calculator Charts



DISTRIBUTION CURVE



INTENSITY DATA

DEGREES	CANDELA	
	AT 0'	AT 90'
90	0	0
85	0	0
80	0	0
75	1	1
70	1	2
65	9	11
60	17	26
55	24	44
50	36	67
45	61	91
40	93	149
35	131	186
30	169	221
25	206	272
20	242	305
15	275	320
10	297	329
5	312	335
0	335	335

ZONAL CAVITY COEFFICIENTS OF UTILIZATION

Effective Floor Cavity Reflectance 0.20

RC	Effective Floor Cavity Reflectance 0.20																						
	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	0		
0	30	30	30	30	29	29	29	29	28	28	28	27	27	27	25	25	25	25	25	25	25		
1	28	27	27	26	27	27	26	26	26	25	25	25	24	24	24	24	24	23	23	23	23		
2	26	25	24	23	26	24	23	23	24	23	22	23	22	22	22	22	21	21	21	21	21		
3	25	23	21	20	24	22	21	20	22	21	20	21	20	19	21	20	19	19	19	19	19		
4	23	21	19	18	23	21	19	18	20	19	18	20	18	18	19	18	17	17	17	17	17		
5	22	19	18	16	21	19	17	16	19	17	16	18	17	16	18	17	16	16	16	16	16		
6	20	18	16	15	20	18	16	15	17	16	15	17	16	15	16	15	14	14	14	14	14		
7	19	16	15	14	19	16	15	13	16	14	13	16	14	13	15	14	13	13	13	13	13		
8	18	15	14	12	18	15	14	12	15	13	12	15	13	12	14	13	12	12	12	12	12		
9	17	14	13	11	17	14	13	11	14	12	11	14	12	11	13	12	11	11	11	11	11		
10	16	13	12	11	16	13	12	11	13	12	11	13	11	11	13	11	10	10	10	10	10		

P68-EB

P68-EB WITH P8031-31

Report No. 98215

No. Lamps: 2 Type Lamp: 18W CF QUAD-GE Total Lumens: 2500

Fixture Efficiency: 27.7%

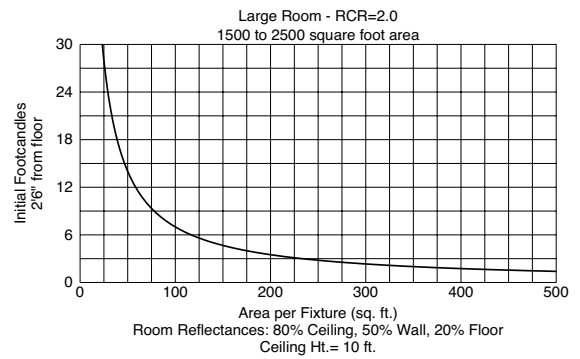
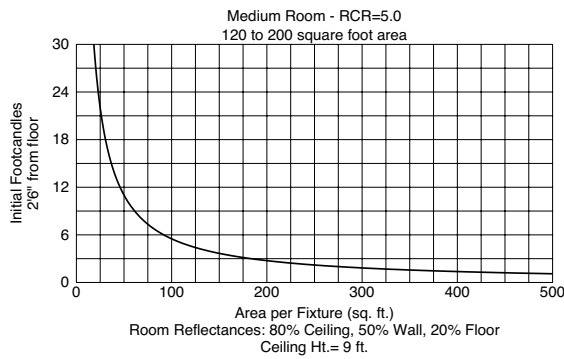
S/MH Ratio: 1.0 (0) 1.1 (90)

Single Fixture Data

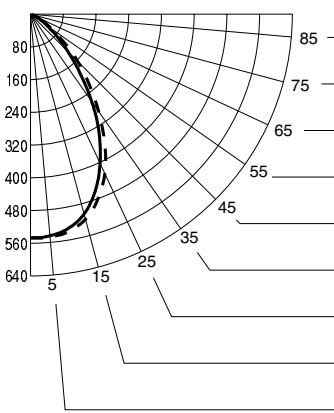
Ceiling Ht.(Ft.)	10% Values		Zero Degrees Ft.-C	50% Values	
	Beam Angle - 89			Beam Angle - 54	
	Ft.-C	Beam Dia.		Ft.-C	Beam Dia.
8	1.8	11	18.1	9.0	6
10	1.0	15	9.7	4.9	8
12	0.6	19	6.1	3.0	10
14	0.4	23	4.1	2.1	12
16	0.3	27	3.0	1.5	14

Ft.-C (Footcandles) are initial and measured 2'-6" from floor

Quick Calculator Charts



DISTRIBUTION CURVE



INTENSITY DATA

DEGREES	CANDELA	
	AT 0'	AT 90'
90	0	0
85	0	1
80	0	1
75	1	1
70	4	3
65	18	17
60	33	37
55	50	63
50	84	106
45	130	163
40	189	223
35	261	290
30	335	362
25	402	430
20	462	481
15	506	519
10	532	540
5	544	547
0	547	547

ZONAL CAVITY COEFFICIENTS OF UTILIZATION

Effective Floor Cavity Reflectance 0.20

RC	Effective Floor Cavity Reflectance 0.20																						
	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	0		
0	33	33	33	33	32	32	32	32	31	31	31	29	29	29	28	28	28	28	28	28	28		
1	31	30	30	29	30	30	29	28	29	28	27	28	27	27	27	26	26	26	25	25	25		
2	29	28	26	25	29	27	26	25	26	25	25	26	25	24	25	24	24	23	23	23	23		
3	28	25	24	23	27	25	24	22	24	23	22	24	23	22	23	22	21	21	21	21	21		
4	26	23	22	20	25	23	21	20	22	21	20	22	21	20	21	20	19	19	19	19	19		
5	24	22	20	18	24	21	20	18	21	19	18	20	19	18	20	19	18	17	17	17	17		
6	23	20	18	17	22	20	18	17	19	18	17	19	17	16	18	17	16	16	16	16	16		
7	21	19	17	15	21	18	17	15	18	16	15	18	16	15	17	16	15	15	15	15	15		
8	20	17	15	14	20	17	15	14	17	15	14	16	15	14	16	15	14	14	14	14	14		
9	19	16	14	13	19	16	14	13	16	14	13	15	14	13	15	14	13	13	13	13	13		
10	18	15	13	12	18	15	13	12	15	13	12	14	13	12	14	13	12	12	12	12	12		

P66-EB

P66-EB WITH P8031-31

Report No. 98179

No. Lamps: 2 Type Lamp: 26W CF QUAD-GE Total Lumens: 3400

Fixture Efficiency: 25.2%

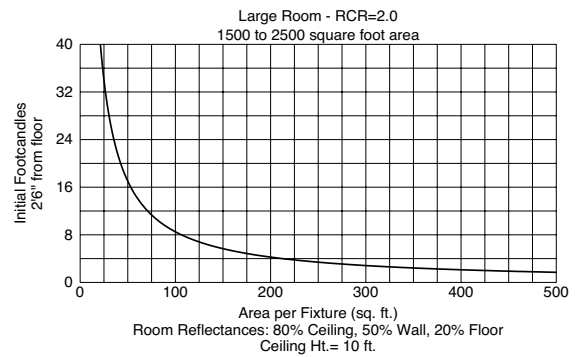
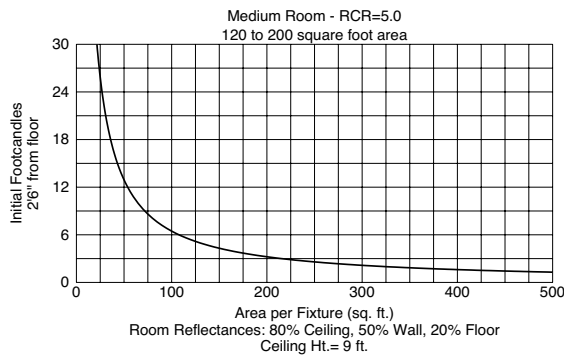
S/MH Ratio: 0.9 (0) 1.0 (90)

Single Fixture Data

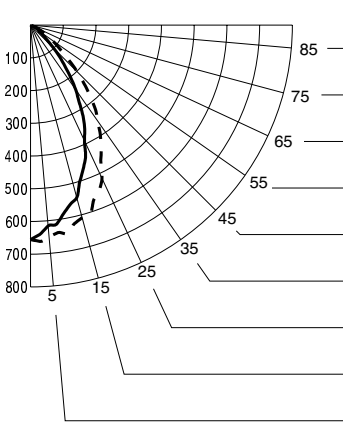
Ceiling Ht.(Ft.)	10% Values		Zero Degrees Ft.-C	50% Values	
	Beam Angle - 87			Beam Angle - 51	
	Ft.-C	Beam Dia.		Ft.-C	Beam Dia.
8	2.2	10	21.7	10.8	5
10	1.2	14	11.6	5.8	7
12	0.7	18	7.3	3.6	9
14	0.5	22	5.0	2.5	11
16	0.4	26	3.6	1.8	13

Ft.-C (Footcandles) are initial and measured 2'-6" from floor

Quick Calculator Charts



DISTRIBUTION CURVE



INTENSITY DATA

DEGREES	CANDELA	
	AT 0'	AT 90'
90	0	0
85	0	0
80	1	1
75	1	1
70	2	6
65	14	24
60	27	49
55	34	80
50	55	125
45	100	203
40	163	284
35	241	356
30	321	432
25	390	517
20	469	566
15	546	609
10	584	646
5	616	649
0	655	655

ZONAL CAVITY COEFFICIENTS OF UTILIZATION

Effective Floor Cavity Reflectance 0.20

RC	Effective Floor Cavity Reflectance 0.20																						
	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	0		
0	30	30	30	30	29	29	29	29	28	28	28	27	27	27	26	26	26	25	25	25	25		
1	28	27	27	26	28	27	26	26	26	25	25	25	25	24	24	24	23	23	23	23	23		
2	27	25	24	23	26	25	24	23	24	23	22	23	22	22	22	22	21	21	21	21	21		
3	25	23	22	20	24	23	21	20	22	21	20	21	20	20	21	20	19	19	19	19	19		
4	23	21	20	18	23	21	19	18	20	19	18	20	19	18	19	18	18	17	17	17	17		
5	22	19	18	17	21	19	18	16	19	17	16	18	17	16	18	17	16	16	16	16	16		
6	21	18	16	15	20	18	16	15	17	16	15	17	16	15	17	16	15	15	15	15	15		
7	19	17	15	14	19	16	15	14	16	15	14	16	14	13	16	14	13	13	13	13	13		
8	18	15	14	13	18	15	14	13	15	14	12	15	13	12	15	13	12	12	12	12	12		
9	17	14	13	12	17	14	13	12	14	13	12	14	12	11	14	12	11	11	11	11	11		
10	16	14	12	11	16	13	12	11	13	12	11	13	12	11	13	12	11	11	11	11	11		

