

FEATURES

- 5/8" deep troffer eliminates lens shadowing
- Contoured housing maximizes photometric performance with uniform lens brightness and no lamp striping on the lens
- Mitered corners on door present a clean uninterrupted appearance
- Full black reveal presents a coating door appearance
- Full air handling capabilities available
- Mechanical light trap prevents light leaks
- Heavy duty post-painted door frame enhances appearance
- Snug door fit eliminates light leaks
- Damp label standard
- Optional 6PA unit allows subsequent changeover of the lens to a 3" parabolic louver

PROJECT INFORMATION

Project Name _____

Type _____

Catalog No. _____

Date _____

HOUSING

Fixture is constructed of die formed and embossed code gauge steel. End caps are hinged and riveted to the housing for added rigidity. Designed for installation in all ceilings as shown below. Specify exact ceiling type. Two T-bar clips are provided with each grid fixture.

6PA

A 6PA housing may be specified so the lens can be replaced with a 3" parabolic louver at a later date.

ELECTRICAL

Standard class P, thermally protected, auto-resetting HPF ballast, sound rated A. All ballast leads extend a minimum of 6" through access location. NEC/CEC-compliant ballast disconnect is standard.

FINISH

All metal parts are processed with a multi-stage phosphate bonding treatment and finished with a high reflectance baked white enamel. Regressed air slots and control vanes are finished in flat black. For a post painted housing finish see catalog number with PAF.

SHIELDING

Standard lens is a 100% clear prismatic acrylic pattern 12. For other available lenses consult lens option sheet or contact your Columbia representative. Steel or aluminum door frames are retained by steel hinges and spring steel latches. Door hinges and latches from either side of fixture and can be easily removed without tools. Door frames feature snug fitting mitered corner joints and are available in flush or regress design. All door frames are painted after fabrication. Doors are surrounded by a uniform black reveal. A mechanical light trap prevents light leaks.

AIR COMPATIBILITY

All units may be used for heated or cooled air outlet or return air vent in ceiling. Also may be used for direct air return to plenum of non-combustible construction. Fixtures are compatible with air diffusers by all major air boot manufacturers. Air removal options must be specified.

CERTIFICATION

All luminaires are built to UL 1598 standards and bear appropriate UL and cUL or CSA labels. Damp location labeling is standard. Emergency-equipped fixtures labeled UL 924.

ORDERING INFORMATION

EXAMPLE 5PA14 232G FAA12 AV EU EL

6PA 14

MODEL	NO. OF LAMPS	CEILING TYPE	DOOR	AIR HANDLING	AIR CONTROL	VOLTAGE	OPTIONS
6PA 7"-8" Housing	1 One 2 Two 3 Three	G Grid F Overlap Flange M Modular Fit-in Trim SG Slot Grid	FA Flush Aluminum RA Regressed Aluminum	S Static A Air Supply/Return H Heat Extract C Combination Supply/Extract	Blank None V Air Supply/Return Vanes D Heat Extract Dampers VD Supply/Return Vanes & Heat Extract Dampers	U 120V-277V 347 347V	F0735 35K 75 CRI T8 Lamps Installed F0835 35K 80 CRI T8 Lamps Installed F5835 35K 80 CRI T5 Lamps Installed GLR Fast Blow Fuse GMF Slow Blow Fuse EL Emergency Battery Pack MS9 Master/Satellite w/9' Harness PAF Paint After Fabrication
SIZE	LAMP TYPE	SHIELDING	BALLAST				
14 1' x 4'	28 4', T5: 28 Watt 32 4', T8: 32, 30, 28 or 25 Watt 54 4', T5HO: 54 or 51 Watt	A12 Acrylic Prismatic Pattern 12 A19 Acrylic Prismatic Pattern 19 PC1 1/2" x 1/2" x 1/2" Specular Silver Polystyrene Louver PC2 1 1/2" x 1 1/2" x 1" Specular Silver Polystyrene Louver	E Electronic T8, Instant Start 3E 3-Lamp Electronic T8, Instant Start EP Electronic T5 or T8, Programmed Start 3EP 3-Lamp Electronic T5HO or T8, Programmed Start	For a specific ballast vendor, show as option.			

For thicker lens, specify - i.e. A12.125.

PHOTOMETRIC DATA

Test A10609 Test Date 1/8/03

LUMINAIRE DATA

Luminaire	5PA14-232G-FAA12-E 5PA Lensed Troffer 1' x 4' 2-Lamp with A12 Pattern Acrylic Prisms Lens
Ballast	B2321120RH
Ballast Factor	0.95
Lamp	FO32/741
Lumens per Lamp	2850
Total Input Watts	60
Shielding Angle	N/A
Spacing Criterion	0° = 1.19 90° = 1.13
Luminous Opening in Feet	Length: 3.67 Width: 0.71 Height: 0.00

ZONAL LUMEN SUMMARY

Zone	Lumens	% Lamp	% Fixt.
0-30	1272	22.3	36.5
0-40	2008	35.2	57.6
0-60	3051	53.5	87.5
0-90	3486	61.2	100.0
0-180	3486	61.2	100.0

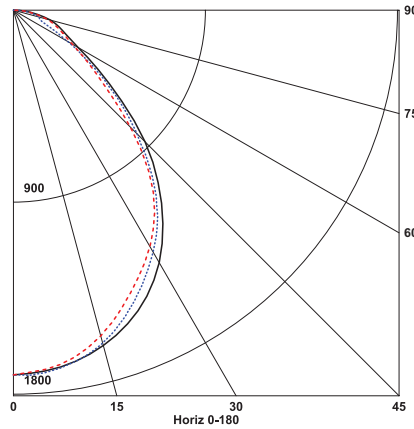
ENERGY DATA

Total Luminaire Efficiency	61.2%
Luminaire Efficacy Rating (LER)	55
IESNA RP-1-1993 Compliance ANSI/IESNA RP-1-2004 Compliance	Noncompliant Yes-VDT Normal Use
Comparative Yearly Lighting Energy Cost per 1000 Lumens	\$4.36 based on 3000 hrs. and \$0.08 per KWH

COEFFICIENTS OF UTILIZATION (%)

RCR	RW	80				70				50				0
		70	50	30	10	70	50	30	10	50	30	10	0	
1	67	65	63	60	66	63	61	59	61	59	58	53		
2	62	58	54	51	61	57	53	50	54	52	49	46		
3	57	52	47	44	56	51	47	43	49	45	43	40		
4	53	46	42	38	52	46	41	38	44	40	37	35		
5	49	42	37	33	48	41	37	33	40	36	33	31		
6	46	38	33	30	45	38	33	30	37	32	29	28		
7	43	35	30	27	42	35	30	27	34	29	26	25		
8	40	32	27	24	39	32	27	24	31	27	24	23		
9	37	30	25	22	37	29	25	22	29	25	22	20		
10	35	28	23	20	34	27	23	20	27	23	20	19		

INDOOR CANDELA PLOT



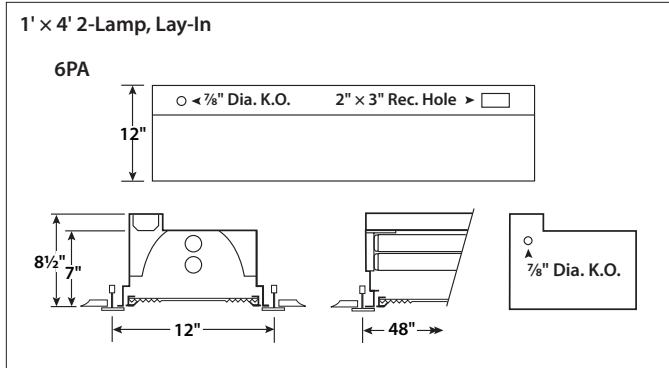
AVG. LUMINANCE (Candela/Sq. M.)

Average Luminance Angle	0.0	22.5	45.0	67.5	90.0
0	7060	7060	7060	7060	7060
30	6516	6420	6244	6139	6101
40	5689	5587	5446	5344	5322
45	5094	4901	4785	4580	4522
50	4254	4261	4055	3785	3657
55	3486	3529	3227	3133	3054
60	2900	2801	2437	2586	2636
65	2678	2219	1808	2199	2493
70	2742	2090	1606	2150	2524
75	2857	2139	1979	2123	2602
80	2736	2308	2165	2260	2498
85	2749	2607	2512	2465	2607

RCR = Room Cavity Ratio

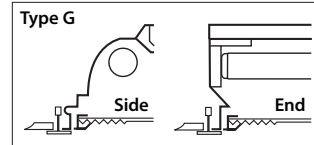
RC = Effective Ceiling Cavity Reflectance RW = Wall Reflectance

DIMENSIONAL DATA

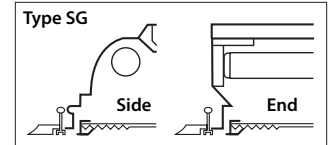


NOTE: All dimensions are in inches; dimensions and specifications are subject to change without notice. Please consult factory or check sample for verification.

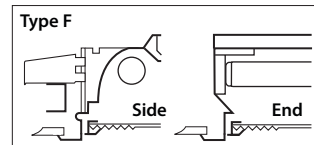
CEILING COMPATIBILITY



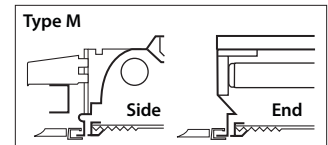
For lay-in installation in exposed grid ceilings. Maximum tee widths of 1" and maximum tee heights of 1 1/2" allowed.



For 3/8" slot grid type ceilings. Louver will be level with the ceiling plane. Shoulder heights of tee or exact slot grid must be specified.



For tile, plaster or plasterboard type ceilings. Overlapping extruded aluminum trim conceals edges of ceiling opening. Wing hanger suspension system included. For row mounting, row information is required.



For metal pan ceilings "Fit-in" style extruded trim aligns with modular tile joints. Fixture is supported from concealed suspension and includes all adjustable wing hangers.

Flange kit rough in dimensions for single unit only: 12 1/8" x 48 1/8"