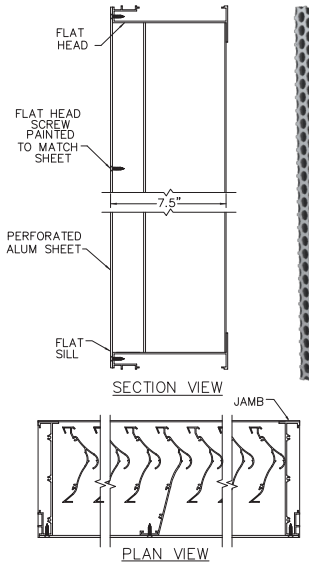
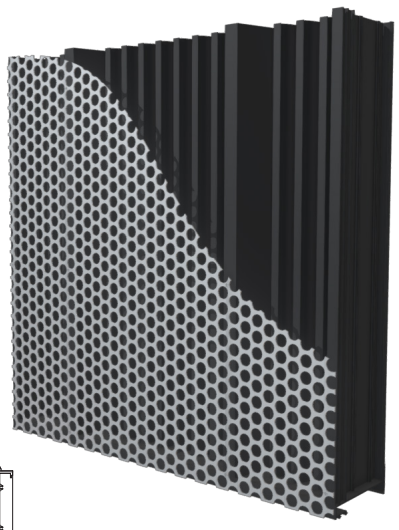
Model PL-5700 - 1" (25.4mm) Hole Pattern 7.5" (190.5 mm) Vertical Storm Resistant Louver

Material:

Material:	Louver 6063-T6 Alloy Perforated Sheet 3003 H14 aluminum
Nominal Thickness (heads, sills, jambs, & mullions):	0.10" (2.54 mm)
Nominal Blade Thickness:	0.060" (1.52 mm) & 0.075" (1.91 mm)
Additional Options (at additional cost):	Rear bird or Insect screen Continuous clip angles for attachment Sheet blank off, Insulated blank off Sill pans, Flange frames Integrated glazing frames





Discharge Coefficient
Intake Cd = 0.29 (Class 3)

Test Summary:
For a 4 Foot by 4 Foot Unit.
Tested with mill finish and no rear bird or insect screen

- Free area = 7.12 ft² (0.66 m²)
- Percent free area = 44.5%
- Intake Pressure Drop at 1,000 FPM free area velocity = 0.17 in H2O (41.5 Pa)
- To maintain a CLASS A (99%) effectiveness rating* with:
  - a 29.1 mph wind speed and rainfall rate of 3 in/hr
    - Max. intake core velocity 5.0 m/s (991 FPM)
    - Max. intake free area velocity 10.43 m/s (2,055 FPM)
  - a 50 mph wind speed and rainfall rate of 8 in/hr
    - Max. intake core velocity 4.0 m/s (800 FPM)
    - Max. intake free area velocity 8.42 m/s (1659 FPM)

Wind Driven Rain Performance: *Tested with 1m² core area, mill finish and no rear bird or insect screen**

The louver test was based on a 39.370" (1.0 m) x 39.370" (1.0 m) core area unit tested at a rainfall rate of 3" per hour (75 mm/hr) and with a wind directed to the face of the louver at a velocity of 29.1 mph (13 m/s) as well as a rainfall rate of 8" per hour (203 mm) and a wind velocity of 50 mph (23.3 m/s). The test data shall show the water penetration effectiveness rating at each corresponding ventilation rate.

29.1 mph (13 m/s) & 3" (75 mm) rain per hour

Core Velocity Through Cal. Plate (m/s):	0	0.5	1.0	1.5	2.0	2.5	3.0	3.5	4.0	4.5	5.0
Core Velocity Through Louver (ft/min):	0	98	196	294	393	492	590	688	786	892	991
Free Area Velocity (ft/min):	0	203	406	610	815	1020	1224	1427	1630	1850	2055
Rating Effectiveness:	A	A	A	A	A	A	A	A	A	A	A
Effectiveness Ratio (%):										100	99.5

50 mph (22.3 m/s) & 8" (203 mm) rain per hour

Core Velocity Through Cal. Plate (m/s):	0	0.5	1.0	1.5	2.0	2.5	3.0	3.5	4.0	4.5	5.0
Core Velocity Through Louver (ft/min):	0	96	196	288	396	481	573	697	800	895	1008
Free Area Velocity (ft/min):	0	199	406	597	821	998	1188	1446	1659	1856	2091
Rating Effectiveness:	A	A	A	A	A	A	A	A	A	B	B
Effectiveness Ratio (%):							100	99.8	99.3	98	95.4

Effectiveness Rating:	A = 1 to 0.99	B = 0.989 to 0.95	C = 0.949 to 0.80	D = Below 0.80

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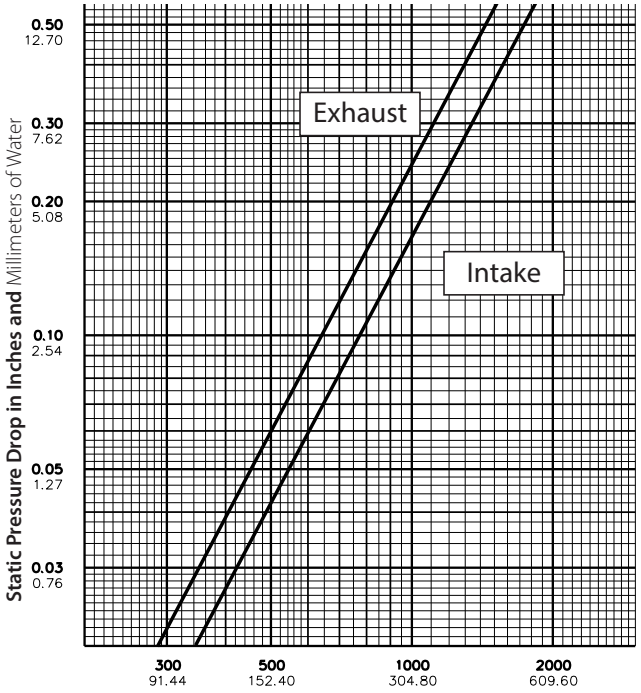

Air Velocity in Feet and Meters per Minute **Through Free Area**

Data corrected to standard air density.
48" x 48" (121.92cm x 121.92cm).

Free Area Table (Free area in **sq. feet** and sq. meters)
For additional sizes, please visit:
https://www.c-sgroup.com/architectural-louvers/louvers-airflow-tool

Width in Inches and Meters

Height in Inches and Meters

	18	**24**	**30**	**36**	**42**	**48**	**54**	**60**
	0.46	0.61	0.76	0.91	1.07	1.22	1.37	1.52
18	**0.74**	**1.06**	**1.38**	**1.69**	**2.01**	**2.33**	**2.65**	**2.96**
0.46	0.07	0.10	0.13	0.16	0.19	0.22	0.25	0.28
24	**1.05**	**1.49**	**1.94**	**2.39**	**2.84**	**3.29**	**3.74**	**4.18**
0.61	0.10	0.14	0.18	0.22	0.26	0.31	0.35	0.39
30	**1.35**	**1.93**	**2.51**	**3.09**	**3.67**	**4.25**	**4.82**	**5.40**
0.76	0.13	0.18	0.23	0.29	0.34	0.39	0.45	0.50
36	**1.66**	**2.37**	**3.07**	**3.78**	**4.49**	**5.20**	**5.91**	**6.62**
0.91	0.15	0.22	0.29	0.35	0.42	0.48	0.55	0.62
42	**1.96**	**2.80**	**3.64**	**4.48**	**5.32**	**6.16**	**7.00**	**7.84**
1.07	0.18	0.26	0.34	0.42	0.49	0.57	0.65	0.73
48	**2.27**	**3.24**	**4.21**	**5.18**	**6.15**	**7.12**	**8.09**	**9.06**
1.22	0.21	0.30	0.39	0.48	0.57	0.66	0.75	0.84
54	**2.57**	**3.67**	**4.77**	**5.87**	**6.98**	**8.08**	**9.18**	**10.28**
1.37	0.24	0.34	0.44	0.55	0.65	0.75	0.85	0.96
60	**2.87**	**4.11**	**5.34**	**6.57**	**7.80**	**9.04**	**10.27**	**11.50**
1.52	0.27	0.38	0.50	0.61	0.72	0.84	0.95	1.07
66	**3.18**	**4.54**	**5.91**	**7.27**	**8.63**	**9.99**	**11.36**	**12.72**
1.68	0.30	0.42	0.55	0.68	0.80	0.93	1.06	1.18
72	**3.48**	**4.98**	**6.47**	**7.96**	**9.46**	**10.95**	**12.44**	**13.94**
1.83	0.32	0.46	0.60	0.74	0.88	1.02	1.16	1.29
78	**3.79**	**5.41**	**7.04**	**8.66**	**10.29**	**11.91**	**13.53**	**15.16**
1.98	0.35	0.50	0.65	0.80	0.96	1.11	1.26	1.41
84	**4.09**	**5.85**	**7.60**	**9.36**	**11.11**	**12.87**	**14.62**	**16.38**
2.13	0.38	0.54	0.71	0.87	1.03	1.20	1.36	1.52
90	**4.40**	**6.28**	**8.17**	**10.05**	**11.94**	**13.83**	**15.71**	**17.60**
2.29	0.41	0.58	0.76	0.93	1.11	1.28	1.46	1.63
96	**4.70**	**6.72**	**8.74**	**10.75**	**12.77**	**14.78**	**16.80**	**18.82**
2.44	0.44	0.62	0.81	1.00	1.19	1.37	1.56	1.75
102	**5.01**	**7.16**	**9.30**	**11.45**	**13.59**	**15.74**	**17.89**	**20.03**
2.59	0.47	0.66	0.86	1.06	1.26	1.46	1.66	1.86
108	**5.31**	**7.59**	**9.87**	**12.14**	**14.42**	**16.70**	**18.98**	**21.25**
2.74	0.49	0.71	0.92	1.13	1.34	1.55	1.76	1.97
114	**5.62**	**8.03**	**10.43**	**12.84**	**15.25**	**17.66**	**20.07**	**22.47**
2.90	0.52	0.75	0.97	1.19	1.42	1.64	1.86	2.09
120	**5.92**	**8.46**	**11.00**	**13.54**	**16.08**	**18.62**	**21.15**	**23.69**
3.05	0.55	0.79	1.02	1.26	1.49	1.73	1.97	2.20

Upper Numerals English Units/Lower Numerals Metric Units

