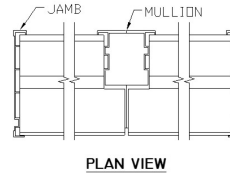
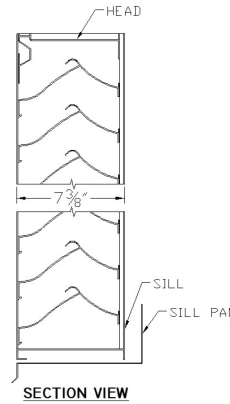


Model BL-7709
7" (177.8 mm) Blast Resistant Horizontal Storm Resistant Louver

Material:

Material:	6063-T6 Alloy
Nominal Thickness:	Heads: 0.063" (1.60 mm) Sills: 0.081" (2.05 mm) Jamb & Mullions: 0.081" (2.05 mm)
Nominal Blade Thickness:	0.075" (1.90 mm)
Furnished With:	Birdscreen: 1/2" intercrimp aluminum mesh, 0.063" diameter wire removeable aluminum bird screen in an aluminum frame
Additional Options (at additional cost):	Insect screen (in lieu of bird screen), Continuous clip angles for attachment Sheet blank off, Insulated blank off Sill pans, Flange frames Integrated glazing frames



Discharge Coefficient
 Intake Cd = 0.35 (Class 2)

AMCA certifies the coefficient class only

Test Summary:

For a 4 Foot by 4 Foot Unit.

Tested with mill finish and no screen

- Free area = 8.00 ft² (0.743 m²)
- Percent free area = 50%
- Free area velocity at the point of beginning water penetration (@ 0.01 oz. / ft² of free area based on a 15 minute interval test) = 1,240 FPM (6.30 m/s)
- 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 2.5 m/s (483 FPM)
 - Max. intake free area velocity 4.4 m/s (871 FPM)

Blast Data:

Model BL-7709 is designed to withstand up to an 12.6 psi blast pressure at an impulse of 77.8 psi-msec.

Typical Blast Requirements:

Pressure	4.0 psi	6.0 psi	8.0 psi	12.6 psi
Impulse	28.0 psi-msec	42.0 psi-msec	59.0 psi-msec	77.8 psi-msec



Construction Specialties Inc. certifies that the louver model BL-7709 shown herein is licensed to bear the AMCA Seal.

The ratings shown are based on tests and procedures performed in accordance with AMCA Publication 511 and comply with the requirements of the AMCA Certified ratings Program. The AMCA Certified Ratings Seal applies to Wind Driven Rain ratings, Water Penetration Ratings and Air Performance ratings.

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

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

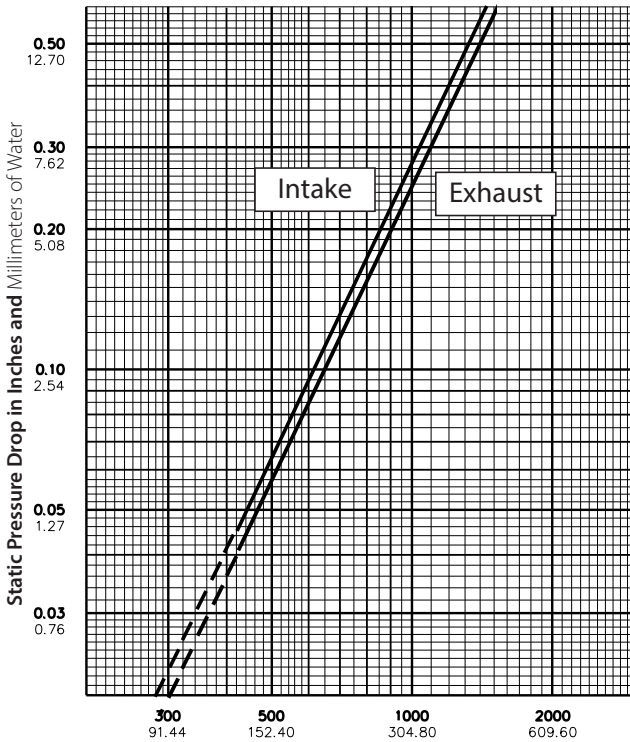
Core Velocity Through Cal. Plate (m/s):	0.0	0.5	1.0	1.5	2.0	2.5	3.0	3.5	4.0	4.5	5.0
Core Velocity Through Louver (ft/min):	0	132	197	295	374	483	584	680	758	870	991
Free Area Velocity (ft/min):	0	238	355	532	675	871	1054	1227	1368	1570	1788
Rating Effectiveness:	A	A	A	A	A	A	B	B	B	B	C
Effectiveness Ratio (%):	100	100	100	100	99.9	99.6	98.8	98.0	98.1	95.6	93.2
Effectiveness Rating:	A = 1 to 0.99			B = 0.989 to 0.95			C = 0.949 to 0.80			D = Below 0.80	

Model BL-7709

7" (177.8 mm) Blast Resistant Horizontal Storm Resistant Louver

Water Penetration Statement

AMCA defines the point of beginning water penetration as the free area velocity at which the AMCA water test has yielded 0.01 or less ounces of water per square foot of louver free area during a 15-minute test period.



Air Velocity in Feet and Meters per Minute Through Free Area

Data corrected to standard air density.
48" x 48" louver tested to figure 5.5.

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									
	18	24	30	36	42	48	54	60	66	72
0.46	0.61	0.76	0.91	1.07	1.22	1.37	1.52	1.68	1.83	
18	0.95	1.30	1.65	2.00	2.35	2.70	3.05	3.40	3.75	4.10
0.46	0.09	0.12	0.15	0.19	0.22	0.25	0.28	0.32	0.35	0.38
24	1.33	1.82	2.31	2.80	3.29	3.78	4.27	4.76	5.25	5.74
0.61	0.12	0.17	0.21	0.26	0.31	0.35	0.40	0.44	0.49	0.53
30	1.71	2.34	2.97	3.60	4.23	4.86	5.50	6.13	6.76	7.39
0.76	0.16	0.22	0.28	0.33	0.39	0.45	0.51	0.57	0.63	0.69
36	2.09	2.87	3.64	4.41	5.18	5.96	6.73	7.50	8.27	9.05
0.91	0.19	0.27	0.34	0.41	0.48	0.55	0.63	0.70	0.77	0.84
42	2.45	3.35	4.26	5.16	6.06	6.97	7.87	8.78	9.68	10.58
1.07	0.23	0.31	0.40	0.48	0.56	0.65	0.73	0.82	0.90	0.98
48	2.84	3.89	4.94	5.98	7.03	8.00	9.13	10.18	11.23	12.28
1.22	0.26	0.36	0.46	0.56	0.65	0.74	0.85	0.95	1.04	1.14
54	3.22	4.40	5.59	6.78	7.97	9.15	10.34	11.53	12.72	13.90
1.37	0.30	0.41	0.52	0.63	0.74	0.85	0.96	1.07	1.18	1.29
60	3.59	4.92	6.25	7.57	8.90	10.23	11.55	12.88	14.21	15.53
1.52	0.33	0.46	0.58	0.70	0.83	0.95	1.07	1.20	1.32	1.44
66	3.97	5.44	6.90	8.37	9.83	11.30	12.77	14.23	15.70	17.16
1.68	0.37	0.51	0.64	0.78	0.91	1.05	1.19	1.32	1.46	1.59
72	4.35	5.95	7.56	9.16	10.77	12.37	13.98	15.58	17.19	18.79
1.83	0.40	0.55	0.70	0.85	1.00	1.15	1.30	1.45	1.60	1.75
78	4.72	6.47	8.21	9.96	11.70	13.45	15.19	16.93	18.68	20.42
1.98	0.44	0.60	0.76	0.93	1.09	1.25	1.41	1.57	1.74	1.90
84	5.10	6.98	8.87	10.75	12.63	14.52	16.40	18.28	20.17	22.05
2.13	0.47	0.65	0.82	1.00	1.17	1.35	1.52	1.70	1.87	2.05
90	5.48	7.50	9.52	11.55	13.57	15.59	17.61	19.64	21.66	23.68
2.29	0.51	0.70	0.88	1.07	1.26	1.45	1.64	1.82	2.01	2.20
96	6.00	8.22	10.43	12.65	14.86	17.08	19.29	21.51	23.73	25.94
2.44	0.56	0.76	0.97	1.17	1.38	1.59	1.79	2.00	2.20	2.41
102	6.38	8.74	11.09	13.45	15.80	18.16	20.52	22.87	25.23	27.58
2.59	0.59	0.81	1.03	1.25	1.47	1.69	1.91	2.12	2.34	2.56
108	6.76	9.26	11.76	14.25	16.75	19.25	21.74	24.24	26.74	29.23
2.74	0.63	0.86	1.09	1.32	1.56	1.79	2.02	2.25	2.48	2.72
114	7.15	9.79	12.43	15.07	17.70	20.34	22.98	25.62	28.26	30.90
2.90	0.66	0.91	1.15	1.40	1.64	1.89	2.14	2.38	2.63	2.87
120	7.51	10.29	13.06	15.83	18.61	21.38	24.16	26.93	29.70	32.48
3.05	0.70	0.96	1.21	1.47	1.73	1.99	2.24	2.50	2.76	3.02
126	7.89	10.80	13.72	16.63	19.54	22.45	25.37	28.28	31.19	34.11
3.20	0.73	1.00	1.27	1.54	1.82	2.09	2.36	2.63	2.90	3.17
132	8.27	11.32	14.37	17.42	20.47	23.53	26.58	29.63	32.68	35.74
3.35	0.77	1.05	1.34	1.62	1.90	2.19	2.47	2.75	3.04	3.32
138	8.64	11.83	15.03	18.22	21.41	24.60	27.79	30.98	34.17	37.37
3.51	0.80	1.10	1.40	1.69	1.99	2.29	2.58	2.88	3.17	3.47
144	9.02	12.35	15.68	19.01	22.34	25.67	29.00	32.33	35.66	38.99
3.66	0.84	1.15	1.46	1.77	2.08	2.39	2.69	3.00	3.31	3.62
150	9.40	12.87	16.34	19.81	23.28	26.75	30.22	33.68	37.15	40.62
3.81	0.87	1.20	1.52	1.84	2.16	2.48	2.81	3.13	3.45	3.77
156	9.77	13.38	16.99	20.60	24.21	27.82	31.43	35.04	38.64	42.25
3.96	0.91	1.24	1.58	1.91	2.25	2.58	2.92	3.25	3.59	3.93

Upper Numerals English Units/Lower Numerals Metric Units