



FORMED STEEL LOUVER

4" (102) DEEP • DRAINABLE BLADE

MODEL: 1704SD

Model 1704SD, single drainable blade type formed louver, provides excellent weather protection in a 4" (102) deep frame, with good air performance and pleasing aesthetics that compliment any structure's exterior styling. Suitable for use in exhaust and low to medium velocity intake applications, the drainable blade design utilizes rain gutters that divert collected water down concealed side downspouts and out the sill. Galvanized steel construction is economical, yet durable and the design provides good air performance through it's 53% free area as well as maximum protection against the elements. Model 1704SD is available with channel or flanged type frame to suit most architectural and mechanical installation requirements.

STANDARD CONSTRUCTION:

- FRAME:** 4" (102) deep, 20 ga. (1.0) formed galvanized steel.
- BLADES:** 20 ga. (1.0) formed galvanized steel (Drainable style).
- BLADE ANGLE:** Fixed at 45 degrees.
- BLADE SPACING:** Approx. 4" (102) on centers.
- BLADE SUPPORT BRACKETS:** Concealed type, factory installed on rear of louver on maximum 48" (1219) centers. Reinforced with 1" x 1" (25 x 25) angle (adds approx. 1" (25) to overall louver depth).
- MULLIONS:** Visible type. See Note #1.
- SCREEN:** 1/2" x 1/2" x 19 ga. (13 x 13 x 1.0) galvanized bird screen.
- FINISH:** Mill.
- MINIMUM SIZE:** 12" wide x 12" high (305 x 305).
- MAXIMUM SECTION SIZE:** 60" wide x 96" high (1524 x 2438).

OPTIONS:

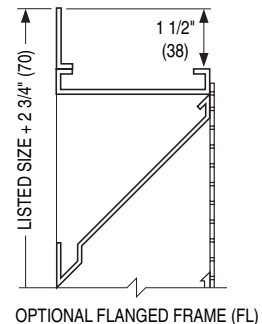
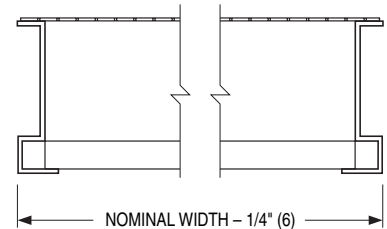
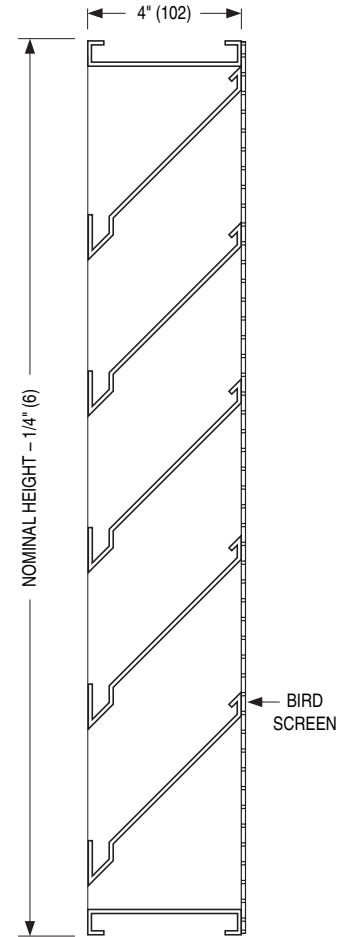
- FL** Flanged Frame.
- BSA** Aluminum Bird Screen.
- ISA** Aluminum Insect Screen.

OPTIONAL FINISHES:

- BE** Baked Enamel. Color: _____ .
- KY** Kynar 500®/Hylar 5000®. Color: _____ .
- PCF** Prime Coat.

NOTES:

1. Sizes larger than maximum section size will be manufactured in multiple equal size panels with visible mullion frames for assembly in the field. Installation of multiple panels may require structural reinforcing (not by Nailor) to provide sufficient support. Standard individual sections are designed to withstand a 25 p.s.f. wind load (100 mph). Contact Nailor for higher wind loads. For additional installation information, see AMCA Publication 501 (Application Manual for Air Louvers).
2. Bird screen adds 3/8" (10) to louver depth.
3. All mounting hardware, clip angles, etc. by others.



Dimensions are in inches (mm).

SCHEDULE TYPE:					
PROJECT:					
ENGINEER:		DATE	B SERIES	SUPERSEDES	DRAWING NO.
CONTRACTOR:		7 - 27 - 09	1700	NEW	1704SD-1



**FORMED STEEL LOUVER
4" (102) DEEP • DRAINABLE BLADE
PERFORMANCE DATA
MODEL: 1704SD**

FREE AREA in Square Feet and Square Meters

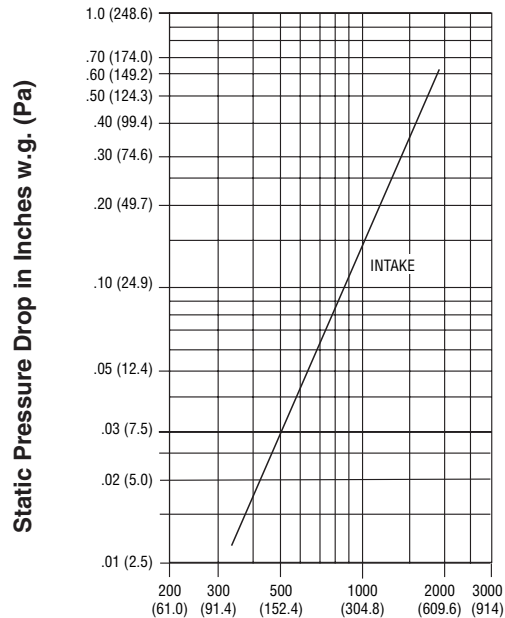
		Width in Inches and Meters								
		12 0.30	18 0.46	24 0.61	30 0.76	36 0.91	42 1.07	48 1.22	54 1.37	60 1.52
I N T A K E	12 0.30	0.26 0.02	0.40 0.04	0.55 0.05	0.69 0.06	0.84 0.08	0.99 0.09	1.13 0.11	1.28 0.12	1.43 0.13
	18 0.46	0.54 0.05	0.85 0.08	1.16 0.11	1.46 0.14	1.77 0.16	2.08 0.19	2.39 0.22	2.70 0.25	3.01 0.28
	24 0.61	0.80 0.07	1.25 0.12	1.71 0.16	2.16 0.20	2.62 0.24	3.08 0.29	3.53 0.33	3.99 0.37	4.44 0.41
	30 0.76	1.08 0.10	1.70 0.16	2.32 0.22	2.93 0.27	3.55 0.33	4.17 0.39	4.79 0.44	5.40 0.50	6.02 0.56
	36 0.91	1.36 0.13	2.14 0.20	2.92 0.27	3.70 0.34	4.48 0.42	5.26 0.49	6.04 0.56	6.82 0.63	7.60 0.71
	42 1.07	1.62 0.15	2.55 0.24	3.48 0.32	4.40 0.41	5.33 0.50	6.26 0.58	7.18 0.67	8.11 0.75	9.04 0.84
	48 1.22	1.91 0.18	2.99 0.28	4.08 0.38	5.17 0.48	6.26 0.58	7.35 0.68	8.44 0.78	9.53 0.89	10.62 0.99
	54 1.37	2.16 0.20	3.40 0.32	4.64 0.43	5.87 0.55	7.11 0.66	8.35 0.78	9.58 0.89	10.82 1.01	12.05 1.12
	60 1.52	2.45 0.23	3.85 0.36	5.24 0.49	6.64 0.62	8.04 0.75	9.44 0.88	10.84 1.01	12.24 1.14	13.63 1.27
	66 1.68	2.71 0.25	4.25 0.39	5.80 0.54	7.34 0.68	8.89 0.83	10.43 0.97	11.98 1.11	13.53 1.26	15.07 1.40
	72 1.83	2.99 0.28	4.70 0.44	6.40 0.59	8.11 0.75	9.82 0.91	11.53 1.07	13.24 1.23	14.94 1.39	16.65 1.55
	78 1.98	3.27 0.30	5.14 0.48	7.01 0.65	8.88 0.83	10.75 1.00	12.62 1.17	14.49 1.35	16.36 1.52	18.23 1.69
	84 2.13	3.53 0.33	5.55 0.52	7.56 0.70	9.58 0.89	11.60 1.08	13.62 1.26	15.63 1.45	17.65 1.64	19.67 1.83
	90 2.29	3.81 0.35	5.99 0.56	8.17 0.76	10.35 0.96	12.53 1.16	14.71 1.37	16.89 1.57	19.07 1.77	21.25 1.97
	96 2.44	4.07 0.38	6.40 0.59	8.72 0.81	11.05 1.03	13.38 1.24	15.70 1.46	18.03 1.68	20.36 1.89	22.68 2.11

**AIRFLOW/WATER PENETRATION DATA
for 48" x 48" (1219 x 1219) Louver Size**

Free Area %	53%
Free Area sq. ft. (sq. m.)	8.44 (0.78)
Free Area Velocity at Point of Beginning Water Penetration at .01 oz./sq. ft. (3 ml/sq. m) (15 min. test duration)	976 fpm (297 m/min.)
Air Volume at 976 fpm	8237 cfm (3887 l/s)
Free Area Velocity	
Pressure Drop @ 976 fpm	.14 in. w.g. (37 Pa)

NOTE: To minimize water penetration when sizing intake louvers, select a Free Area Velocity that is **below** the point of beginning water penetration.

PRESSURE DROP



Air Velocity in Feet (Meters) Per Minute Through Free Area
Louver test size: 48" x 48" (1219 x 1219 mm). Standard air density @ 0.075 lbs/ft³.
Tested to AMCA Fig. 5.5-6.5.

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SCHEDULE TYPE:				
PROJECT:				
ENGINEER:	DATE	B SERIES	SUPERSEDES	DRAWING NO.
CONTRACTOR:	7 - 27 - 09	1700	NEW	1704SD-2