

445DD

Stationary Louver Double Drainable Blade Extruded Aluminum



APPLICATION

The 445DD is a 4" deep, extruded aluminum, drainable, stationary louver that is designed to protect air intake and exhaust openings on exterior walls. This louver is designed with drainable gutter systems that channel water from the blades to downspouts in the jambs. Here, water is exhausted out of the front of the louver.

STANDARD CONSTRUCTION

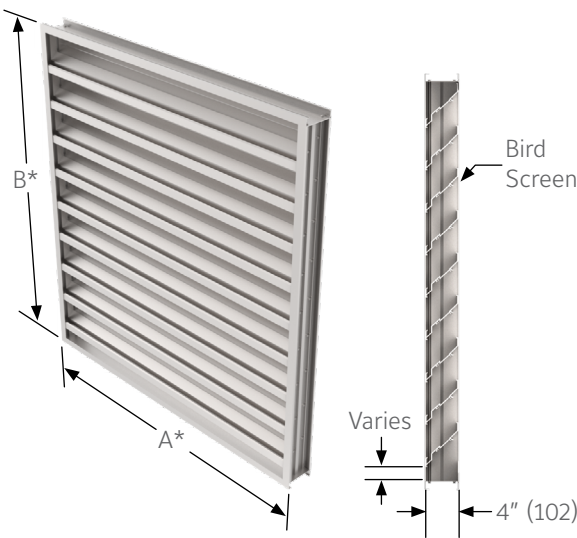
Frame	4" (102) deep, 6063T6 extruded aluminum with .090" (2.3) nominal wall thickness. Downspouts and caulking surfaces provided.
Blades	6063T6 extruded aluminum with .081" (2.1) nominal wall thickness. Double drainable blades are positioned at 45° angle and spaced approximately 5 3/32" (129) center to center.
Screen	3/4" x .051" (19 x 1.3) expanded flattened aluminum bird screen in removable frame. Screen adds approximately 1/2" (13) to louver depth.
Finish	Mill.
Minimum Size	12"w x 12"h (305 x 305).
Approximate Shipping Weight	4 lbs. per sq. ft. (20 kg/m²)
Maximum Factory Assembly Size	Shall be 75 sq. ft. (7m²) per section, not to exceed 120"w x 90"h (3048 x 2286) or 90"w x 120"h (2286 x 3048). Louvers larger than the maximum factory assembly size will require field assembly of smaller sections.
Supports	Louvers may be provided with rear mounted blade supports that increase overall louver depth depending on louver size, assembly configuration or windload.

Consult Reliable for additional information.

FEATURES

- Published performance ratings based on testing in accordance with AMCA Publication 511
- Double drain gutters in each blade and downspouts in jambs and mullions to drain water from louver for minimum water cascade from blade to blade
- Architecturally styled hidden mullions allowing continuous line appearance up to 120" (3048)
- All aluminum construction for low maintenance and high resistance to corrosion
- Low pressure drop and low water penetration
- 44% free area based on 48" x 48" (1219 x 1219) unit

Note:
- Dimensions in inches, parenthesis () indicate millimeters.
- Units can be furnished actual size or with size deducts.



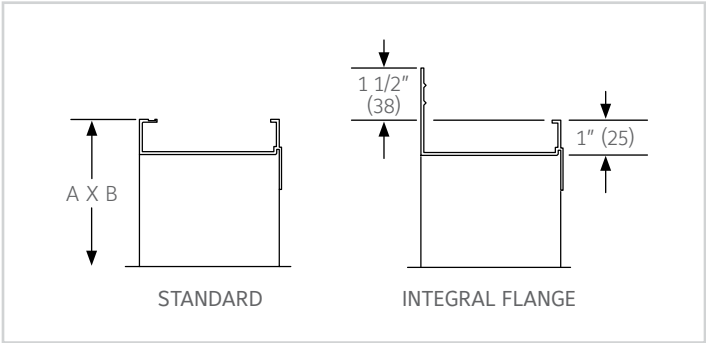
VARIATIONS

Variations to the basic design of this louver are available at additional cost. They include:

- Extended sill
- Hinged frame
- Front or rear security bars
- Glazing frame
- Filter racks
- Installation angles
- A variety of bird and insect screens
- Optional finishes available at additional cost: Prime coat, 50% PVDF (modified fluoropolymer), Epoxy, Pearledize, 70% PVDF, Clear and Anodized finishes. (Some variation in anodize color consistency is possible)

Consult Reliable for other special requirements.

FRAME CONSTRUCTION



PERFORMANCE DATA

AMCA Standard 500 provides a reasonable basis for testing and rating louvers. Testing to AMCA 500-L is performed under a certain set of laboratory conditions. This does not guarantee that other conditions will not occur in the actual environment where louvers must operate.

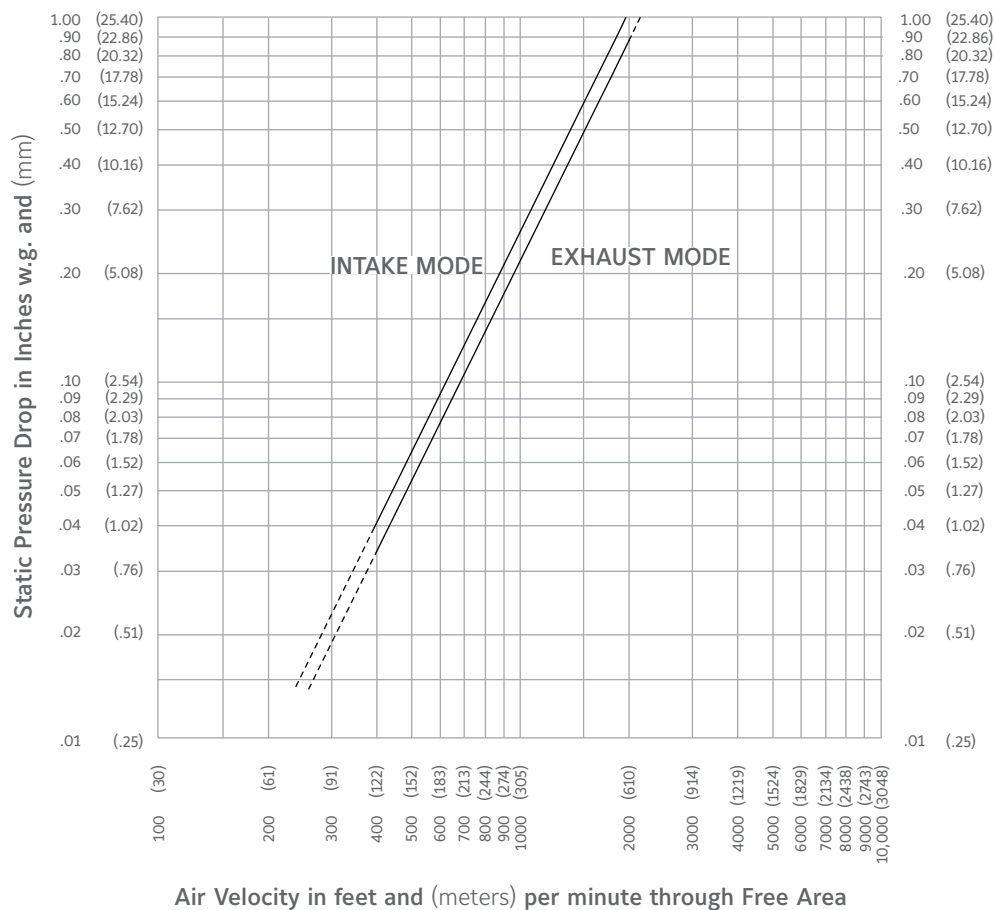
The louver system should be designed with a reasonable safety factor for louver performance. To ensure protection from water carry-over, design with a performance level somewhat below maximum desired pressure drop and .01 oz. of water penetration.

FREE AREA GUIDE

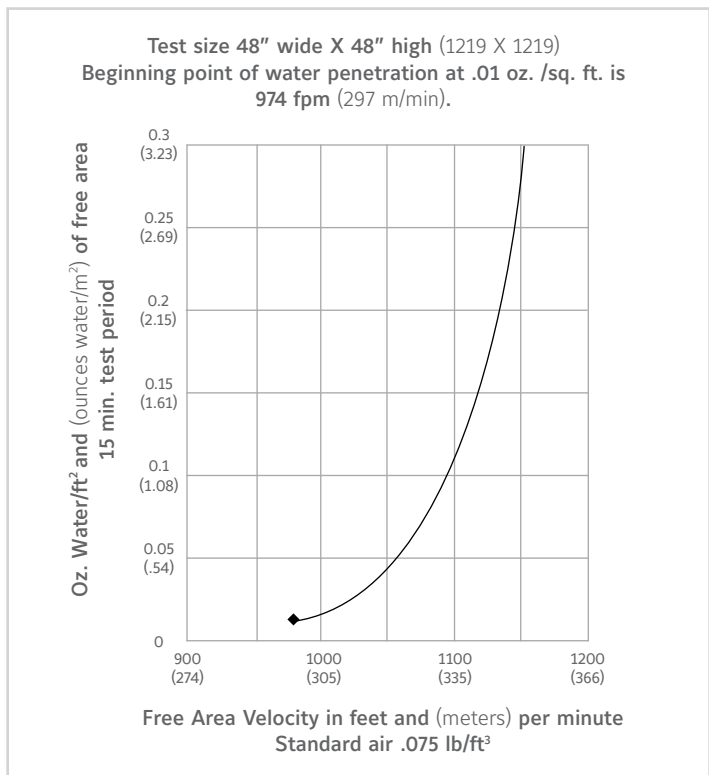
Free Area Guide shows free area in ft² and m² for various sizes of 445DD.

		Width – Inches and Meters																		
Height – Inches and Meters		12	18	24	30	36	42	48	54	60	66	72	78	84	90	96	102	108	114	120
		0.30	0.45	0.60	0.75	0.90	1.05	1.20	1.35	1.50	1.65	1.80	1.95	2.10	2.25	2.40	2.55	2.70	2.85	3.00
	12	0.19	0.30	0.42	0.53	0.65	0.76	0.88	0.99	1.11	1.22	1.34	1.45	1.57	1.68	1.80	1.92	2.03	2.15	2.26
		0.30	0.02	0.03	0.04	0.05	0.06	0.07	0.08	0.09	0.10	0.11	0.12	0.14	0.15	0.16	0.17	0.19	0.20	0.21
	18	0.39	0.63	0.87	1.11	1.35	1.59	1.83	2.06	2.30	2.54	2.78	3.02	3.26	3.50	3.74	3.98	4.22	4.46	4.70
		0.45	0.04	0.06	0.08	0.10	0.13	0.15	0.17	0.19	0.21	0.24	0.26	0.28	0.30	0.33	0.35	0.37	0.39	0.41
	24	0.61	0.99	1.36	1.74	2.11	2.49	2.86	3.24	3.62	3.99	4.37	4.74	5.12	5.50	5.87	6.25	6.62	7.00	7.37
		0.60	0.06	0.09	0.13	0.16	0.20	0.23	0.27	0.30	0.34	0.37	0.41	0.44	0.48	0.51	0.55	0.58	0.62	0.65
	30	0.83	1.34	1.86	2.37	2.88	3.39	3.90	4.42	5.93	5.44	5.95	6.46	6.98	7.49	8.00	8.51	9.03	9.54	10.05
		0.75	0.08	0.13	0.17	0.22	0.27	0.32	0.36	0.41	0.46	0.51	0.55	0.60	0.65	0.70	0.74	0.79	0.84	0.89
	36	1.05	1.70	2.35	3.00	3.65	4.30	4.94	5.59	6.24	6.89	7.54	8.19	8.83	9.48	10.13	10.78	11.43	12.08	12.73
		0.90	0.10	0.16	0.22	0.28	0.34	0.40	0.46	0.52	0.58	0.64	0.70	0.76	0.82	0.88	0.94	1.00	1.06	1.12
	42	1.28	2.06	2.84	3.63	4.41	5.20	5.98	6.77	7.55	8.34	9.12	9.91	10.69	11.48	12.26	13.05	13.83	14.62	15.40
		1.05	0.12	0.19	0.26	0.34	0.41	0.48	0.56	0.63	0.70	0.78	0.85	0.92	0.99	1.07	1.14	1.21	1.29	1.36
	48	1.50	2.42	3.34	4.26	5.18	6.10	7.02	7.94	8.87	9.79	10.71	11.63	12.55	13.47	14.39	15.31	16.24	17.16	18.08
		1.20	0.14	0.22	0.31	0.40	0.48	0.57	0.65	0.74	0.82	0.91	1.00	1.08	1.17	1.25	1.34	1.42	1.51	1.60
	54	1.70	2.74	3.79	4.83	5.88	6.92	7.97	9.02	10.06	11.11	12.15	13.20	14.24	15.29	16.33	17.38	18.42	19.47	20.51
		1.35	0.16	0.26	0.35	0.45	0.55	0.64	0.74	0.84	0.94	1.03	1.13	1.23	1.32	1.42	1.52	1.62	1.71	1.81
	60	1.92	3.10	4.28	5.46	6.65	7.83	9.01	10.19	11.37	12.55	13.74	14.92	16.10	17.28	18.46	19.64	20.83	22.01	23.19
		1.50	0.18	0.29	0.40	0.51	0.62	0.73	0.84	0.95	1.06	1.17	1.28	1.39	1.50	1.61	1.72	1.83	1.94	2.05
	66	2.14	3.46	4.78	6.10	7.41	8.73	10.05	11.37	12.69	14.00	15.32	16.64	17.96	19.28	20.59	21.91	23.23	24.55	25.86
		1.65	0.20	0.32	0.44	0.57	0.69	0.81	0.93	1.06	1.18	1.30	1.42	1.55	1.67	1.79	1.92	2.04	2.16	2.28
	72	2.36	3.82	5.27	6.73	8.18	9.63	11.09	12.54	14.00	15.45	16.91	18.36	19.81	21.27	22.72	24.18	25.63	27.09	28.54
		1.80	0.22	0.36	0.49	0.63	0.76	0.90	1.03	1.17	1.30	1.44	1.57	1.71	1.84	1.98	2.11	2.25	2.38	2.52
	78	2.58	4.18	5.77	7.36	8.95	10.54	12.13	13.72	15.31	16.90	18.49	20.08	21.67	23.26	24.85	26.44	28.03	29.63	31.22
		1.95	0.24	0.39	0.54	0.68	0.83	0.98	1.13	1.28	1.42	1.57	1.72	1.87	2.02	2.16	2.31	2.46	2.61	2.76
	84	2.79	4.50	6.22	7.93	9.65	11.36	13.08	14.79	16.51	18.22	19.93	21.65	23.36	25.08	26.79	28.51	30.22	31.94	33.65
		2.10	0.26	0.42	0.58	0.74	0.90	1.06	1.22	1.38	1.53	1.69	1.85	2.01	2.17	2.33	2.49	2.65	2.81	2.97
	90	3.01	4.86	6.71	8.56	10.41	12.26	14.12	15.97	17.82	19.67	21.52	23.37	25.22	27.07	28.92	30.78	32.63	34.48	36.33
		2.25	0.28	0.45	0.62	0.80	0.97	1.14	1.31	1.48	1.66	1.83	2.00	2.17	2.35	2.52	2.69	2.86	3.03	3.21
	96	3.23	5.22	7.20	9.19	11.18	13.17	15.15	17.14	19.13	21.12	23.10	25.09	27.08	29.07					
		2.40	0.30	0.49	0.67	0.85	1.04	1.22	1.41	1.59	1.78	1.96	2.15	2.33	2.52	2.70				
	102	3.45	5.58	7.70	9.82	11.95	14.07	16.19	18.32	20.44	22.57	24.69	26.81	28.94	31.06					
		2.55	0.32	0.52	0.72	0.91	1.11	1.31	1.51	1.70	1.90	2.10	2.30	2.49	2.69	2.89				
	108	3.67	5.93	8.19	10.45	12.71	14.97	17.23	19.49	21.75	24.01	26.27	28.53	30.79	33.06					
		2.70	0.34	0.55	0.76	0.97	1.18	1.39	1.60	1.81	2.02	2.23	2.44	2.65	2.86	3.07				
	114	3.89	6.29	8.69	11.08	13.48	15.88	18.27	20.67	23.07	25.46	27.86	30.26	32.65	35.05					
		2.85	0.36	0.59	0.81	1.03	1.25	1.48	1.70	1.92	2.15	2.37	2.59	2.81	3.04	3.26				
	120	4.10	6.62	9.14	11.66	14.18	16.70	19.22	21.74	24.26	26.78	29.30	31.82	34.34	36.87					
		2.00	0.38	0.62	0.85	1.08	1.32	1.55	1.79	2.02	2.26	2.49	2.73	2.96	3.19	3.43				

PRESSURE DROP



WATER PENETRATION GRAPH

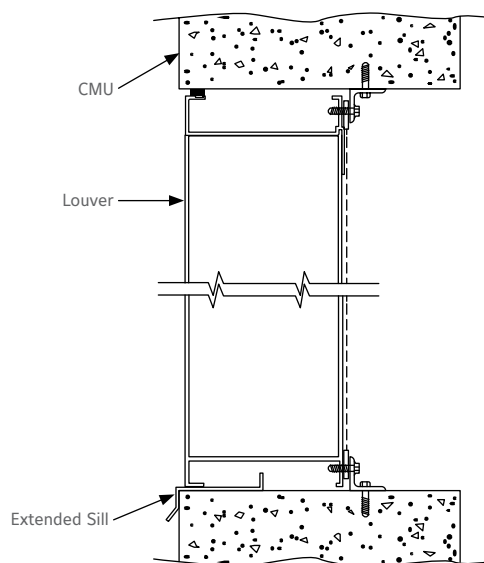


Ratings do not include the effect of a bird screen.

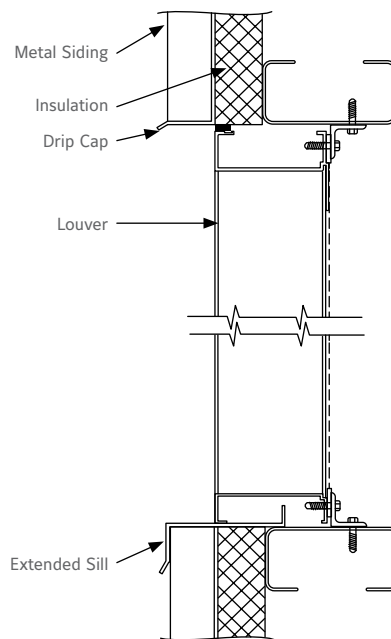


Reliable Products certifies that the 445DD Louvers shown herein are licensed to bear the AMCA Seal. The ratings shown are based on tests and procedures performed in accordance with AMCA Publication 511 and comply with the requirements of the AMCA Certified Rating Program. The AMCA Certified Ratings Seal applies to air performance ratings and water penetration ratings only.

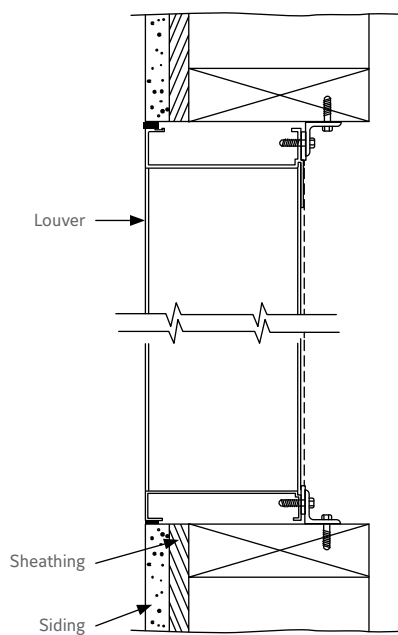
TYPICAL INSTALLATION DETAILS



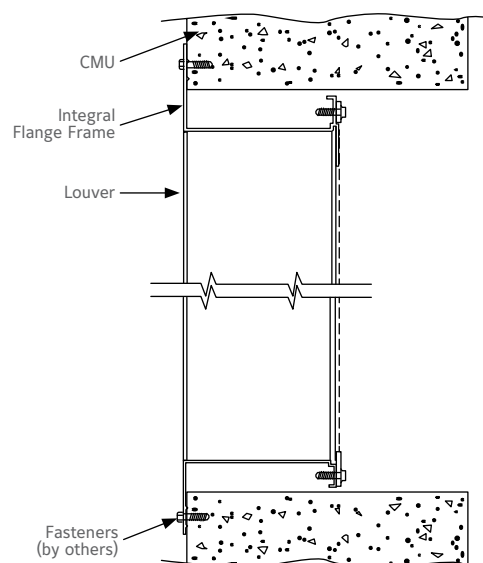
MASONRY WALL



METAL PANEL WALL



WOOD INSTALLATION



FLANGE MOUNT

Caulk and anchors are not provided by Reliable.

*Accessories at additional cost.

SUGGESTED SPECIFICATION

Furnish and install louvers as hereinafter specified where shown on plans or as described in schedules. Louvers shall be stationary double drainable with drain gutters in each blade and downspouts in jambs and mullions. Stationary drainable blades shall be contained within a 4" (102) frame. Louver components (heads, jambs, sills, blades & mullions) shall be factory assembled by the louver manufacturer. Louver sizes too large for shipping shall be built up by the contractor from factory assembled louver sections to provide overall sizes required. Louver design shall limit span between visible mullions to 10 ft. (3) and shall incorporate structural supports required to withstand a wind load of 30 PSF (1.44 kpa) or 110 MPH (177 kph) - specifier may substitute any loading required).

Louvers shall be Reliable Model 445DD extruded 6063T6 aluminum alloy construction as follows:

Frame: .090" (2.3) wall thickness.

Blades: .081" (2.1) wall thickness at 45° angle on approximately 5 3/32" (129) centers.

Screen: 3/4" x .051" (19 x 1.3) expanded, flattened aluminum bird screen in removable frame.

Finish: Select finish specification from Reliable Finishes Brochure.

Published louver performance data bearing the AMCA Certified Ratings Seal for Air Performance and Water Penetration must be submitted for approval prior to fabrication and must demonstrate pressure drop equal to or less than the Reliable model specified.

LINKS TO IMPORTANT DOCUMENTS

Document Title
Finishes and Color Guide
Limited Warranty Document



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580, Geneva, Alabama 36340
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