

HZ850 WIND-DRIVEN RAIN RESISTANT STATIONARY LOUVER

MIAMI-DADE APPROVED

MIAMI-DADE COUNTY, FLORIDA NOTICE OF ACCEPTANCE NUMBER: 14-0918.06

STANDARD CONSTRUCTION

FRAME

Double frame design produced from 6063T6 extruded aluminum with .060" (1.5) and .095" (2.3) nominal wall thickness. Exterior frame depth is 2" (51) and interior frame depth is 6" (153). Overall combined frame depth is 8" (203) nominal.

BLADES

Sight-proof design produced from 6063T6 extruded aluminum with .080" (2.1) and .062" (1.6) nominal wall thickness. Exterior blades are 2" (51) deep, interior blades are 6" (153) deep.

SCREEN

5/8" x .040" (16 x 1) expanded, flattened aluminum bird screen in removable frame. Screen adds approximately .50" (13) to louver depth.

EXTENDED SILL

.081" (2.1) formed aluminum with end dams.

FINISH

Mill.

MINIMUM SIZE

12"w x 16"h (305 x 407)
Standard NOA installation
12"w x 22"h (305 x 559)
CMU NOA installation

APPROXIMATE SHIPPING WEIGHT

15 lbs. per sq. ft. (75 kg/m²)

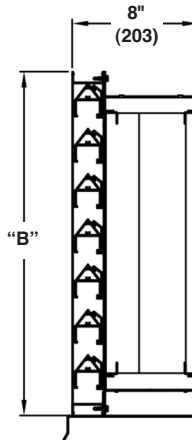
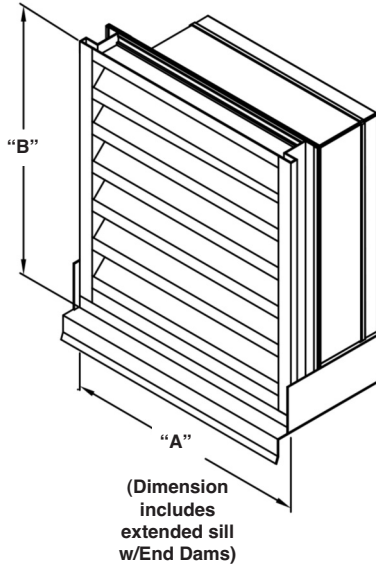
MAXIMUM FACTORY ASSEMBLY SIZE

Standard HZ850 (Unfinished) shall not exceed 144"w x 96"h (3658 x 2439). Standard HZ850 (Finished) shall not exceed 120"w x 90"h (3048 x 2286) as single section. Louvers larger than the maximum factory assembly size will require field assembly of smaller sections. Field assembly = unlimited width x 96"h (2439) and Single Section.

SUPPORTS

Louvers may be provided with rear mounted blade supports that increase overall louver depth depending on louver size, assembly configuration or windload.

Consult Ruskin for additional information.



FEATURES

- Louver blade design provides protection from wind driven rain penetration, reducing damage and additional operating expenses.
- Complies with the AMCA 550 high velocity Rain resistance and 540 Enhanced protection.
- Complies with TAS-201, TAS-202 and TAS-203 For acceptance for use in Miami Dade County.
- Exceptional windload integrity of ±130 PSF (±6.22 KPa).
- Approved for use in the High Velocity Hurricane Zone. Also Miami-Dade approved for use in open structures that have provisions to manage weather infiltration.
- Tested in the AMCA 500-L Wind-Driven Rain Penetration Test.
- Published performance ratings based on testing in accordance with AMCA Publication 511.
- 31% Free Area.
- Aluminum construction for low maintenance and high resistance to corrosion.

VARIATIONS

- Insulated or sheet blank-off panels.
- Filter racks.
- A variety of bird and insect screens.
- Optional finishes available at additional cost: prime coat, 50% PVDF (modified fluoropolymer), epoxy, Acrodize, 70% PVDF clear and color anodize. (Some variation in anodize color consistency is possible.)

Consult Ruskin for other special requirements.



Ruskin certifies that the HZ850 shown herein is approved to bear the AMCA Listing Label. The ratings shown are based on tests and procedures performed in accordance with AMCA Publications and comply with the requirements of the AMCA Listing Label Program.

The AMCA Listing Label applies to Wind Borne Debris Impact Resistant Louvers.

The AMCA Listing Label applies to High Velocity Rain Resistant Louver Louvers.

Please reference our website www.ruskin.com for up to date LEED® information.

Dimensions in inches, parenthesis () indicate millimeters.

TAG	QTY.	SIZE		VARIATIONS
		A*-WIDE	B*-HIGH	
PROJECT		LOCATION		
ARCH./ENGR.		CONTRACTOR		
REPRESENTATIVE		DATE		

SUGGESTED SPECIFICATION

Furnish and install louvers as hereinafter specified where shown on plans or as described in schedules. Louvers shall be manufactured in an ISO9001 certified factory and tested in accordance with AMCA 540 — Test Method for Louvers Impacted by Wind Borne Debris and AMCA 550 — Test Method for High Velocity Wind Driven Rain Resistant Louvers. Louvers shall have vertical wind driven rain (WDR) louver blades in the rear and horizontal architectural blades in the front for high performance and aesthetics. Louver shall meet the performance criteria established by the Florida Building Code. Extended sill shall be provided to capture and drain water to exterior of building. Louver drainable blades shall be contained within an 8" (203) frame. Louver components including heads, jambs, blades and extended sill shall be factory assembled by the louver manufacturer. Louver PVDF in-house finishes shall be warranted for 20 years and shall be designed for

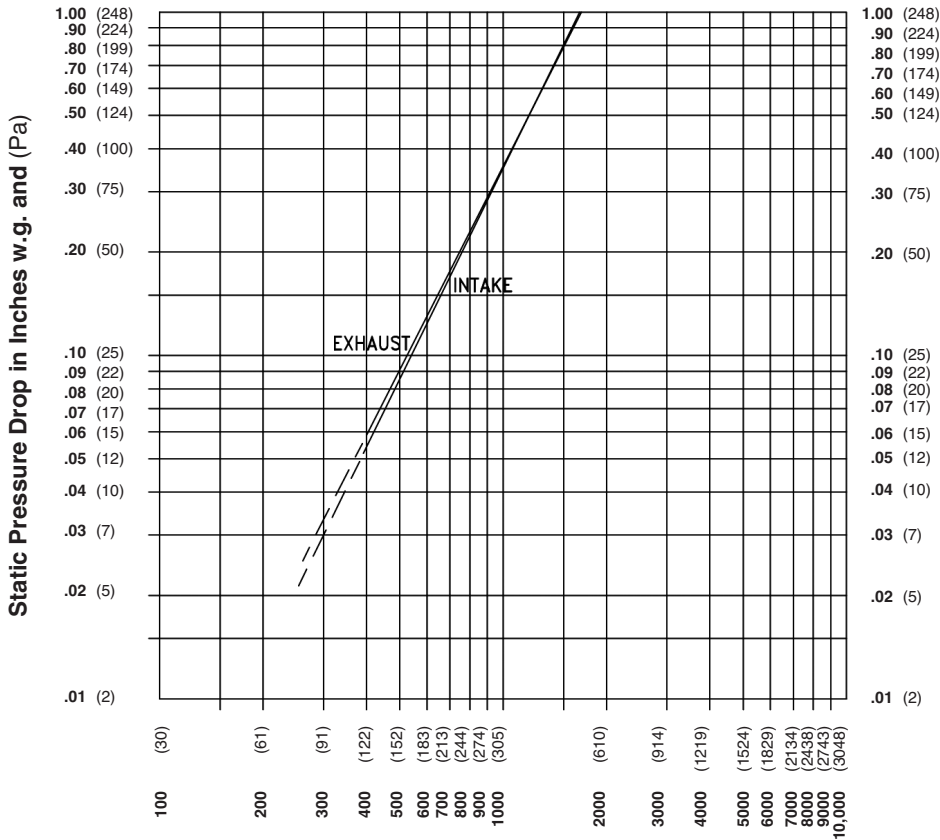
low VOC emissions and eliminate the risk of VOC emissions found in louver finishes that are applied at job site. All blades and frames shall be constructed of 6063T6 High Yield Strength aluminum alloy.

- Frame: .060" (1.5) wall thickness exterior louver and 2" (51) deep. .095" (2.3) wall thickness interior louver and 6" (153) deep. Caulking surfaces provided.
- Blades: .080" (2.1) wall thickness exterior louver (Horizontal) and .062" (1.6) wall thickness interior (Vertical)
- Extended Sill: .081" (2.1) wall thickness with upturned end dams to prevent water leakage.
- Screen: 5/8" x .040" (16 x 1) expanded, flattened aluminum bird screen in removable frame.
- Finish: Select finish specification from Ruskin Finishes Brochure.

PRESSURE DROP

Test size 48" wide x 48" high (1219 x 1219).

Beginning point of water penetration at .01 oz./sq. ft. is above 1250 fpm (381 m/min.)



Air Velocity in feet and (meters) per minute through Free Area

(Data corrected to standard air density and AMCA figure or figures tested to 5.5)



Ruskin Company certifies that the louver 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 air performance ratings, and wind driven rain ratings only.

WIND-DRIVEN RAIN PERFORMANCE – AMCA 500-L WIND-DRIVEN RAIN TEST

Test size is 1.22m x 1.22m (48" x 48"). Free Area of test louver is 5.03 ft² (.47m²).

Wind Velocity mph (kph)	Rain Fall Rate In./hr. (mm/hr.)	Core Velocity ₁ fpm (m/s)	Airflow cfm (m ³ /min)	Free Area Velocity ₂ fpm (m/sec.)	Effectiveness Ratio	Class ₃
29 (46.4)	3 (76)	759 (3.86)	11303 (320)	2247 (11.4)	99.9	A
50 (80.5)	8 (203)	764 (3.88)	11375 (322)	2261 (11.5)	99.9	A

NOTES

- Core area is the open area of the louver face (face area less louver frames). Core Velocity is the airflow velocity through the Core Area of the louver (1m x 1m).
- Free Area of test size is calculated per AMCA standard 500-L.

- Wind Driven Rain Penetration Classes:

Class	Effectiveness	Class	Effectiveness
A	1 to .99	B	0.989 to 0.95
C	0.949 to 0.80	D	Below 0.8

(The higher the coefficient, the less resistance to airflow.)

FREE AREA GUIDE

Free Area Guide shows free area in ft² and m² for various sizes of HZ850.
Width – Inches and Meters

Height – Inches and Millimeters	12		18		24		30		36		42		48		54		60		66		72		78		84		90		96		102		108		114		120		126		132		138		144																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																	
	0.30	0.46	0.61	0.76	0.91	1.07	1.22	1.37	1.52	1.68	1.83	1.98	2.13	2.29	2.44	2.59	2.74	2.90	3.05	3.20	3.35	3.51	3.66	3.81	3.97	4.12	4.28	4.43	4.59	4.74	4.89	5.05	5.20	5.36	5.51	5.67	5.82	5.98	6.13	6.29	6.44	6.59	6.75	6.90	7.06	7.21	7.37	7.52	7.68	7.83	7.99	8.14	8.29	8.45	8.60	8.76	8.91	9.07	9.22	9.38	9.53	9.69	9.84	10.00	10.15	10.31	10.46	10.62	10.77	10.93	11.08	11.24	11.39	11.55	11.70	11.86	12.01	12.17	12.32	12.48	12.63	12.79	12.94	13.10	13.25	13.41	13.56	13.72	13.87	14.03	14.18	14.34	14.49	14.65	14.80	14.96	15.11	15.27	15.42	15.58	15.73	15.89	16.04	16.20	16.35	16.51	16.66	16.82	16.97	17.13	17.28	17.44	17.59	17.75	17.90	18.06	18.21	18.37	18.52	18.68	18.83	18.99	19.14	19.30	19.45	19.61	19.76	19.92	20.07	20.23	20.38	20.54	20.69	20.85	21.00	21.16	21.31	21.47	21.62	21.78	21.93	22.09	22.24	22.40	22.55	22.71	22.86	23.02	23.17	23.33	23.48	23.64	23.79	23.95	24.10	24.26	24.41	24.57	24.72	24.88	25.03	25.19	25.34	25.50	25.65	25.81	25.96	26.12	26.27	26.43	26.58	26.74	26.89	27.05	27.20	27.36	27.51	27.67	27.82	27.98	28.13	28.29	28.44	28.60	28.75	28.91	29.06	29.22	29.37	29.53	29.68	29.84	29.99	30.15	30.30	30.46	30.61	30.77	30.92	31.08	31.23	31.39	31.54	31.70	31.85	32.01	32.16	32.32	32.47	32.62	32.78	32.93	33.09	33.24	33.40	33.55	33.71	33.86	34.02	34.17	34.33	34.48	34.64	34.79	34.95	35.10	35.26	35.41	35.57	35.72	35.88	36.03	36.19	36.34	36.50	36.65	36.81	36.96	37.12	37.27	37.43	37.58	37.74	37.89	38.05	38.20	38.36	38.51	38.67	38.82	38.98	39.13	39.29	39.44	39.60	39.75	39.91	40.06	40.22	40.37	40.53	40.68	40.84	40.99	41.15	41.30	41.46	41.61	41.77	41.92	42.08	42.23	42.39	42.54	42.70	42.85	43.01	43.16	43.32	43.47	43.63	43.78	43.94	44.09	44.25	44.40	44.56	44.71	44.87	45.02	45.18	45.33	45.49	45.64	45.80	45.95	46.11	46.26	46.42	46.57	46.73	46.88	47.04	47.19	47.35	47.50	47.66	47.81	47.97	48.12	48.28	48.43	48.59	48.74	48.90	49.05	49.21	49.36	49.52	49.67	49.83	49.98	50.14	50.29	50.45	50.60	50.76	50.91	51.07	51.22	51.38	51.53	51.69	51.84	52.00	52.15	52.31	52.46	52.62	52.77	52.93	53.08	53.24	53.39	53.55	53.70	53.86	54.01	54.17	54.32	54.48	54.63	54.79	54.94	55.10	55.25	55.41	55.56	55.72	55.87	56.03	56.18	56.34	56.49	56.65	56.80	56.96	57.11	57.27	57.42	57.58	57.73	57.89	58.04	58.20	58.35	58.51	58.66	58.82	58.97	59.13	59.28	59.44	59.59	59.75	59.90	60.06	60.21	60.37	60.52	60.68	60.83	60.99	61.14	61.30	61.45	61.61	61.76	61.92	62.07	62.23	62.38	62.54	62.69	62.85	63.00	63.16	63.31	63.47	63.62	63.78	63.93	64.09	64.24	64.40	64.55	64.71	64.86	65.02	65.17	65.33	65.48	65.64	65.79	65.95	66.10	66.26	66.41	66.57	66.72	66.88	67.03	67.19	67.34	67.50	67.65	67.81	67.96	68.12	68.27	68.43	68.58	68.74	68.89	69.05	69.20	69.36	69.51	69.67	69.82	69.98	70.13	70.29	70.44	70.60	70.75	70.91	71.06	71.22	71.37	71.53	71.68	71.84	71.99	72.15	72.30	72.46	72.61	72.77	72.92	73.08	73.23	73.39	73.54	73.70	73.85	74.01	74.16	74.32	74.47	74.63	74.78	74.94	75.09	75.25	75.40	75.56	75.71	75.87	76.02	76.18	76.33	76.49	76.64	76.80	76.95	77.11	77.26	77.42	77.57	77.73	77.88	78.04	78.19	78.35	78.50	78.66	78.81	78.97	79.12	79.28	79.43	79.59	79.74	79.90	80.05	80.21	80.36	80.52	80.67	80.83	80.98	81.14	81.29	81.45	81.60	81.76	81.91	82.07	82.22	82.38	82.53	82.69	82.84	83.00	83.15	83.31	83.46	83.62	83.77	83.93	84.08	84.24	84.39	84.55	84.70	84.86	85.01	85.17	85.32	85.48	85.63	85.79	85.94	86.10	86.25	86.41	86.56	86.72	86.87	87.03	87.18	87.34	87.49	87.65	87.80	87.96	88.11	88.27	88.42	88.58	88.73	88.89	89.04	89.20	89.35	89.51	89.66	89.82	89.97	90.13	90.28	90.44	90.59	90.75	90.90	91.06	91.21	91.37	91.52	91.68	91.83	91.99	92.14	92.30	92.45	92.61	92.76	92.92	93.07	93.22	93.38	93.53	93.69	93.84	94.00	94.15	94.31	94.46	94.61	94.77	94.92	95.08	95.23	95.39	95.54	95.70	95.85	96.01	96.16	96.32	96.47	96.62	96.78	96.93	97.09	97.24	97.40	97.55	97.71	97.86	98.02	98.17	98.33	98.48	98.64	98.79	98.95	99.10	99.26	99.41	99.57	99.72	99.88	100.03	100.19	100.34	100.50	100.65	100.81	100.96	101.12	101.27	101.43	101.58	101.74	101.89	102.05	102.20	102.36	102.51	102.67	102.82	102.98	103.13	103.29	103.44	103.60	103.75	103.91	104.06	104.22	104.37	104.53	104.68	104.84	104.99	105.15	105.30	105.46	105.61	105.77	105.92	106.08	106.23	106.39	106.54	106.70	106.85	107.01	107.16	107.32	107.47	107.63	107.78	107.94	108.09	108.25	108.40	108.56	108.71	108.87	109.02	109.18	109.33	109.49	109.64	109.80	109.95	110.11	110.26	110.42	110.57	110.73	110.88	111.04	111.19	111.35	111.50	111.66	111.81	111.97	112.12	112.28	112.43	112.59	112.74	112.90	113.05	113.21	113.36	113.52	113.67	113.83	113.98	114.14	114.29	114.45	114.60	114.76	114.91	115.07	115.22	115.38	115.53	115.69	115.84	116.00	116.15	116.31	116.46	116.62	116.77	116.93	117.08	117.24	117.39	117.55	117.70	117.86	118.01	118.17	118.32	118.48	118.63	118.79	118.94	119.10	119.25	119.41	119.56	119.72	119.87	120.03	120.18	120.34	120.49	120.65	120.80	120.96	121.11	121.27	121.42	121.58	121.73	121.89	122.04	122.20	122.35	122.51	122.66	122.82	122.97	123.13	123.28	123.44	123.59	123.75	123.90	124.06	124.21	124.37	124.52	124.68	124.83	125.00	125.15	125.30	125.46	125.61	125.77	125.92	126.08	126.23	126.39	126.54	126.70	126.85	127.01	127.16	127.32	127.47	127.62	127.78	127.93	128.09	128.24	128.40	128.55	128.71	128.86	129.02	129.17	129.33	129.48	129.64	129.79	129.95	130.10	130.26	130.41	130.57	130.72	130.88	131.03	131.19	131.34	131.50	131.65	131.81	131.96	132.12	132.27	132.43	132.58	132.74	132.89	133.05	133.20	133.36	133.51	133.67	133.82	133.98	134.13	134.29	134.44	134.60	134.75	134.91	135.06	135.22	135.37	135.53	135.68	135.84	135.99	136.15	136.30	136.46	136.61	136.77	136.92	137.08	137.23	137.39	137.54	137.70	137.85	138.01	138.16	138.32	138.47	138.63	138.78	138.94	139.09	139.25	139.40	139.56	139.71	139.87	140.02	140.18	140.33	140.49	140.64	140.80	140.95	141.11	141.26	141.42	141.57	141.73	141.88	142.04	142.19	142.35	142.50	142.66	142.81	142.97	143.12	143.28	143.43	143.59	143.74	143.90	144.05	144.21	144.36	144.52	144.67	144.83	144.98	145.14	145.29	145.45	145.60	145.76	145.91	146.07	146.22	146.38	146.53	146.69	146.84	147.00	147.15	147.31	147.46	147.62	147.77	147.93	148.08	148.24	148.39	148.55	148.70	148.86	149.01	149.17	149.32	149.48	149.63	149.79	149.94	150.10	150.25	150.41	150.56	150.72	150.87	151.03	151.18	151.34	151.49	151.65	151.80	151.96	152.11	152.27	152.42	152.58	152.73	152.89	153.04	153.20	153.35	153.51	153.66	153.82	153.97	154.13	154.28	154.44	154.59	154.75	154.90	155.06	155.21	155.37	155.52	155.68	155.83	155.99	156.14	156.30	156.45	156.61	156.76	156.92	157.07	157.23	157.38	157.54	157.69	157.85	158.00	158.16	158.31	158.47	158.62	158.78	158.93	159.09	159.24	159.40	159.55	159.71	159.86	160.02	160.17	160.33	160.48	160.64	160.79	160.95	161.10	161.26	161.41	161.57	161.72	161.88	162.03	162.19	162.34	162.50	162.65	162.81	162.96	163.12	163.27	163.43	163.58	163.74	163.89	164.05	164.20	164.36	164.51	164.67	164.82	164.98	165.13	165.29	165.44	165.60	165.75	165.91	166.06	166.22	166.37	166.53	166.68	166.84	166.99	167.15	167.30	167.46	167.61	167.77	167.92	168.08	168.23	168.39	168.54	168.70	168.85	169.01	169.16	169.32	169.47	169.63	169.78	169.94	170.09	170.25	170.40	170.56	170.71	170.87	171.02	171.18	171.33	171.49	171.64	171.80	171.95	172.11	172.26	172.42	172.57	172.73	172.88	173.04	173.19	173.35	173.50	173.66	173.81	173.97	174.12	174.28	174.43	174.59	174.74	174.90	175.05	175.21	175.36	175.52	175.67	175.83	175.98	176.14	176.29	176.45	176.60	176.76	176.91	177.07	177.22	177.38	177.53	177.69	177.84	178.00	178.15	178.31