



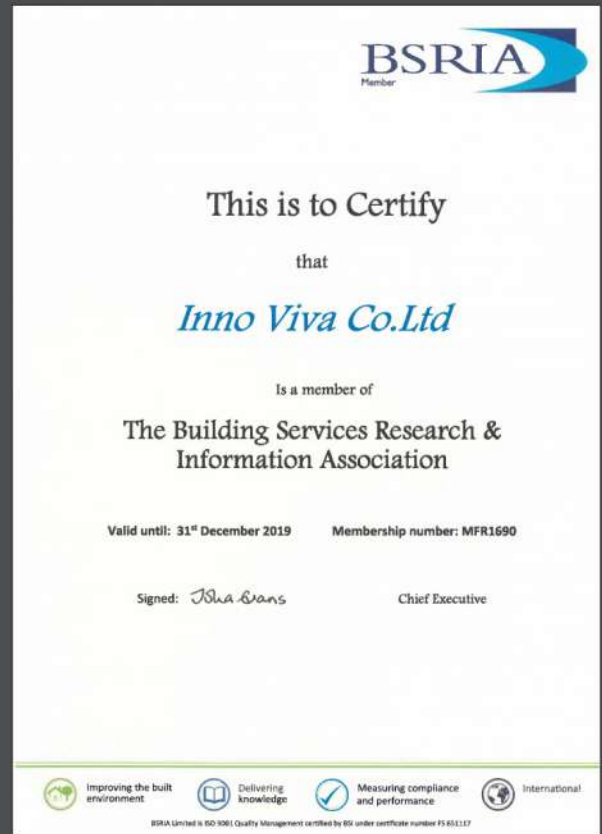
LOUVER
CATALOGUE

INTRODUCTION

BACKGROUND

Inno Viva Company Limited is one of the Thailand's most progressive and importers of building material products. We are fast growing company focus on delivering the best service and quality products to our customer.

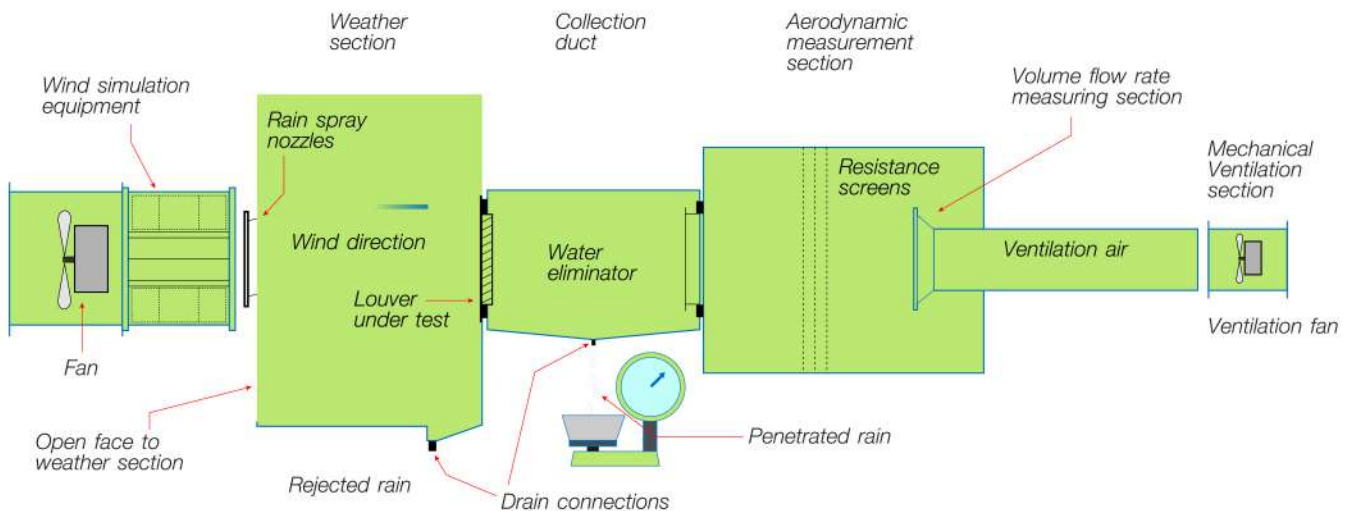
Presently we have several major projects in Thailand with particularly strength in Architectural products as Expansion Joint Cover, Entrance Mat, Wall Protection and Performance Louver with strong experience in architectural products. We are developing products bases on extensive surveys of the international and local market, in an effort to offer the best quality to our customers.



BSRIA ACCREDITED TEST REPORT

BSRIA TESTING

BSRIA has the only independent testing facility in Europe, and is one of two in the world to test weather louvers against EN13030v. The test at BSRIA is based on a method that realistically simulates the actual operating conditions that a louver will undergo when installed. This is achieved using rain, ventilation and simulated wind speed.



Class	Effectiveness (%)	Max Allowed Penetration of Simulated Rain (litre/hr/m ²)	Rating
A	99 to 100%	0.75	Excellent
B	95 - 98.9%	3.75	Good
C	80 - 94.9%	15	Fair
D	Below 80%	More than 15	Not Applicable

Class	Max Air flow Coefficient	Rating
1	0.4 and above	Excellent
2	0.3 to 0.399	Very Good
3	0.2 to 0.299	Good
4	0.199 and below	Fair

CONSIDERATION

Inno Viva Performance Louver is developed to keep out rain but allowed light and air penetrate to building, an extensive experience in the area of louver system. It is intended to assist customer to select a louver classification to sit each specific requirement, recommendation for the selection of louver model based on area of site location. We are able to defined several factors that will impact to determination include.

Inno Louver – Performance Louver

Inno Viva designed, developed & produce Performance Louver to meet the most demanding requirement from Architect, Engineer & Developer.

Performance Louver are louver which their profiles are Aerodynamically designed to maximize air flow through with minimum resistant and yet rain water are trap and collect to louver mullion drain system.

Performance louver are weather louver are tested to EN 13030 Standard with wind driven rain at Velocity 13 m/s and rain spray at 75 L/h plus. Air suction at 0 - 3.5 m/s by BSRIA (UK).



SITE LOCATION AND WEATHER CONDITION

The site location is the actual location of a settlement on the local and is composed of the physical characteristics of the landscape specific to the area. Site factors including climate, weather and wind that are therefore intended to select the appropriate louver classification.

PRESSURE DROP

Pressure drop is defined as the difference in pressure between two points of air network. It is occurred when air flows through the other side of louver.

AIRFLOW RATE

Airflow Rate is defined a measurement of the amount of air per unit of time that flows through a particular device that is importance for designer to selection product to suit with area in building.

WATER PENETRATION

Water Penetration is defined the maximum water that allowed penetration to building and influenced to rain defense performance.

SYSTEM CONSTRUCTION

Louver Materials Mullion Clip Fix Brackets Accessories Finishes.



LOUVER

The aluminum extrusions with various design shape

MATERIALS

Extruded aluminum alloy conforming to ASTM B221M, JIS H4100/ H4040/ H4080, DIN EN754/ EN755/ EN573, TIS 284-1987 For alloy grade 6063-T5, 6063-T6 or 6061-T6.

MULLION

The mullion are fixed back to aluminum adjustable bracket at around 1,200 - 1,500 mm. Here are two different type of mullion available. Hidden mullion and visible mullion which allows the louver system to match the building facade.

CLIP

The unique all aluminum tension clip system locates into slot in the louver and lock. Once positioned the clip becomes immovable.

FIX BRACKETS

Aluminum angle with slotted holes both horizontally and vertically to overcome small tolerances.

ACCESSORIES

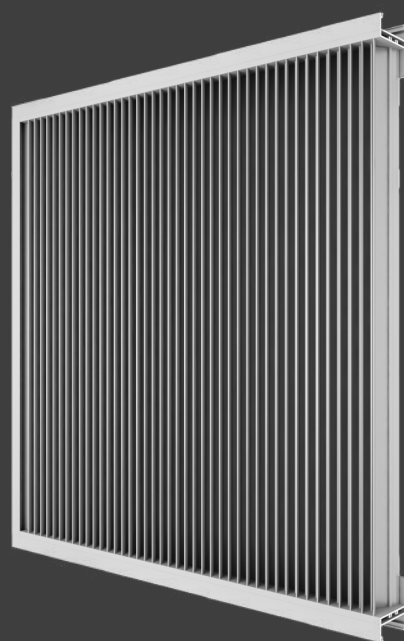
Optional for the louver include bird screen, door casement and backing.

FINISHES

Available in Mill, Anodizes, Powder Coated, PVDF and Na Titanium Finish.

FUSION SERIES

Inno Viva Performance Louver Fusion Series is developed to use 2 model of louvers that have same front blade for design that use different rain defense class model in the same place but need keep same face for continuous in design.



CONTENT

VENTILATION AND SCREEN LOUVER

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STORM RESISTANT LOUVER

HIGH PERFORMANCE CONTINUOUS LINE

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STORM RESISTANT LOUVER

HIGH PERFORMANCE MULLION LINE

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STORM RESISTANT LOUVER

RS CLASSIC CONTINUOUS LINE

P. 17-20





VENTILATION AND SCREEN LOUVER



VENTILATION AND SCREEN LOUVER

RS 1100

PRODUCT DETAIL

RS 1100 is a new generation of Single Blade louver, including a new 150 mm. of systems depth, the systems design for ventilation applications and screening rain defns is not priority and completed facade design with horizontal blades.

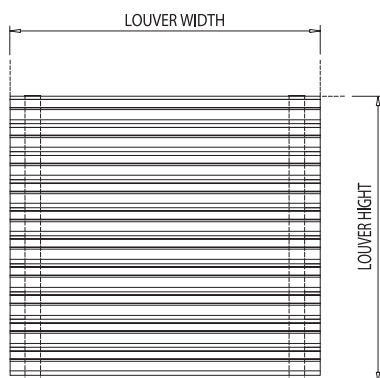


PERFORMANCE COMPARISON TABLE

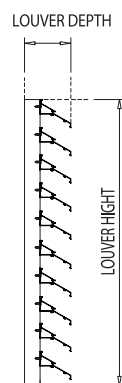
Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RS 1100	Aluminium Extruded	150 mm.	300 x 300 mm.	Single Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s					Airflow Class	
			0.0	0.5	1.0	1.5	2.0		2.5
Horizontal	Mullions/Hidden	86.94%	Rain Defense Classification*					NA	NA

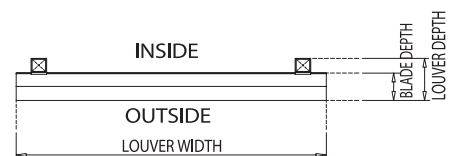
LOUVER DETAIL RS 1100 LOUVER



FRONT VIEW



SECTION VIEW



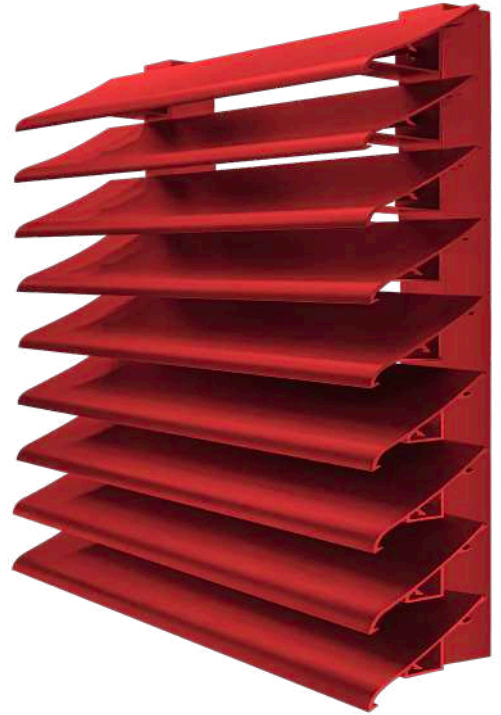
PLAN VIEW

VENTILATION AND SCREEN LOUVER

RHP 1500

PRODUCT DETAIL

RHP 1500 is a new generation of Single Blade Louver, including a new 2" - 3" system depth, the systems design for ventilation and screening applications rain defense is not priority and completed facade design that seamlessly combined with RHP 2500 (double blade) and RHP 3500 (triple blade) to suit architect and engineer design function and requirement resulting in perfect harmony architectural faced design.



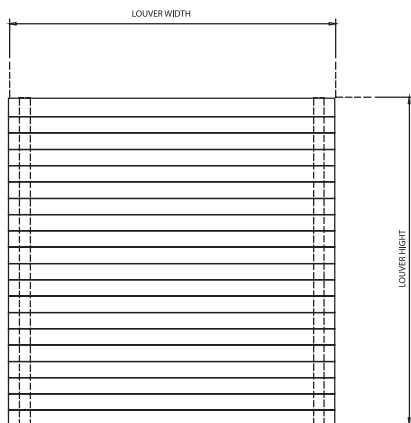
PERFORMANCE COMPARISON TABLE

Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RHP 1500	Aluminium Extruded	88 mm.	300 x 300 mm.	Single Blade	Anodize Powder Coat PVDF

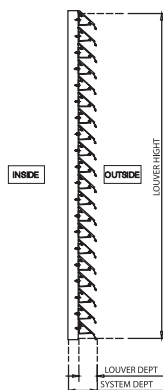
Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s					Airflow Class
			0.0	0.5	1.0	1.5	2.0	
Horizontal	Mullions/Hidden	57.58%	Rain Defense Classification*					NA
			NA					NA

LOUVER DETAIL

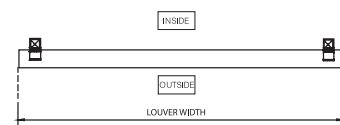
RHP 1500 LOUVER



FRONT VIEW



SECTION VIEW



PLAN VIEW

VENTILATION AND SCREEN LOUVER

RSH 301

PRODUCT DETAIL

RSH 301 is a new generation of Single Blade louver, including a new 79 mm. of systems depth, the systems design for ventilation applications and screening rain defens is not priority and completed facade design with horizontal blades.



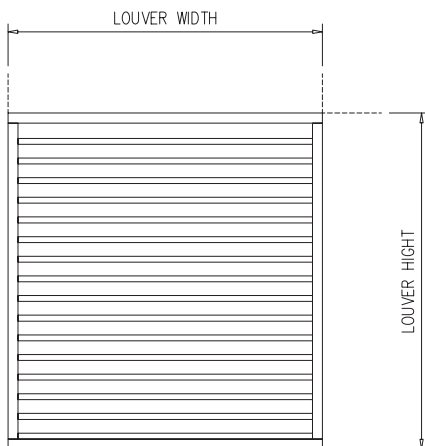
PERFORMANCE COMPARISON TABLE

Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RSH 301	Aluminium Extruded	79	300 x 300 mm.	Single Blade	Anodize Powder Coat PVDF

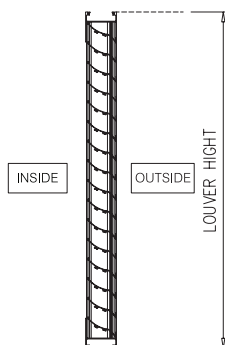
Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s						Airflow Class
			0.0	0.5	1.0	1.5	2.0	2.5	
Horizontal	Mullions	65.37%	Rain Defense Classification*						NA

LOUVER DETAIL

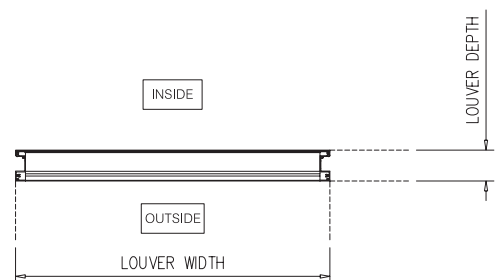
RSH 301 LOUVER



FRONT VIEW



SECTION VIEW



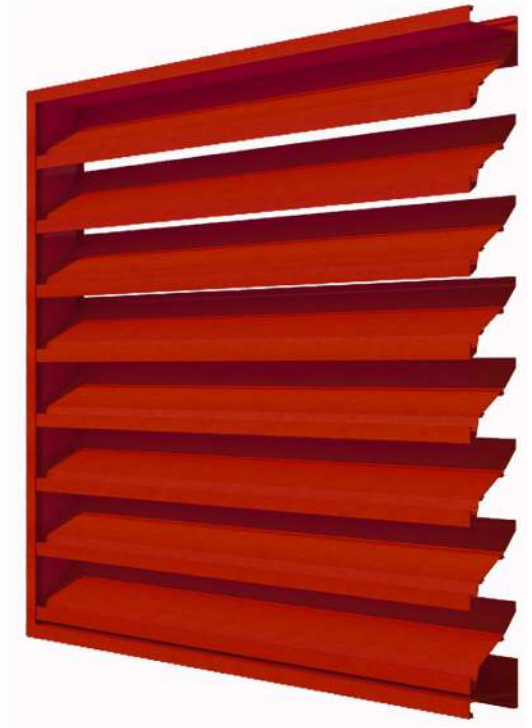
PLAN VIEW

VENTILATION AND SCREEN LOUVER

RSD 401

PRODUCT DETAIL

RSD 401 is a new generation of Drainable Louver, the new 4" (106 mm.) system depth with high performance drainable blade designed to channel water away from the blades to our mullion drain system. This feature minimized water entraining through the louver and allow higher air intake velocities.



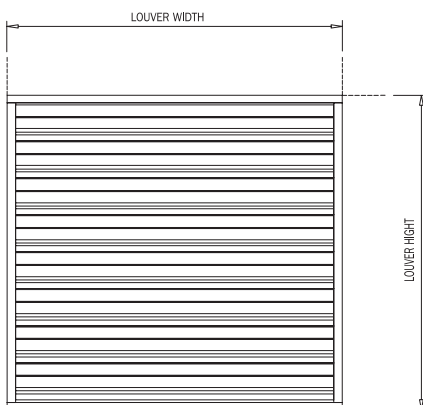
PERFORMANCE COMPARISON TABLE

Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RSD 401	Aluminium Extruded	101 mm.	300 x 300 mm.	Single Blade	Anodize Powder Coat PVDF

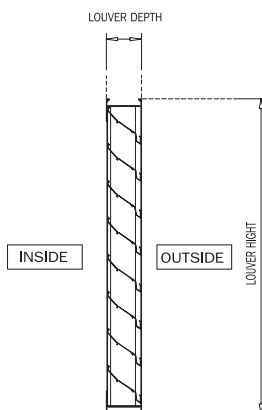
Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s						Airflow Class
			0.0	0.5	1.0	1.5	2.0	2.5	
Horizontal	Mullions	58.92%	Rain Defense Classification*						NA

LOUVER DETAIL

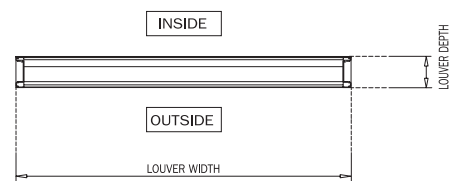
RSD 401 LOUVER



FRONT VIEW



SECTION VIEW



PLAN VIEW

VENTILATION AND SCREEN LOUVER

RS 850Z

PRODUCT DETAIL

RS 850Z is a Innoviva Z Louver is developed for all facade design, RS 850Z Series is one of the most popular for any building, the systems designed for simple and useful, RS 850Z can be protect the building from water penetration and sun ultra violet in order to reduce 70% of sunlight. RS 850Z composed of aluminum extrusion 6063 T5 profile fixed with galvanized or aluminum fixing components, all front blade is completed with natural anodize na10 finished from manufacturer that could help louver for long life color.

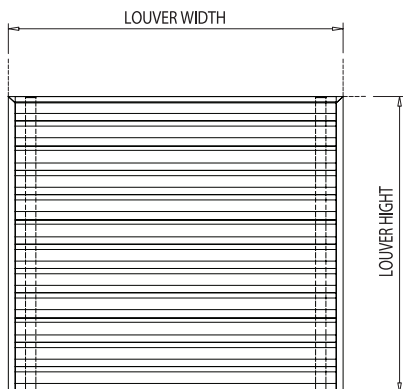


PERFORMANCE COMPARISON TABLE

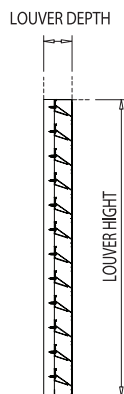
Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RS 850Z	Aluminium Extruded	85 mm.	300 x 300 mm.	Single Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s					Airflow Class
			0.0	0.5	1.0	1.5	2.0	
Horizontal	Mullions/Hidden	61.57%	Rain Defense Classification*					NA

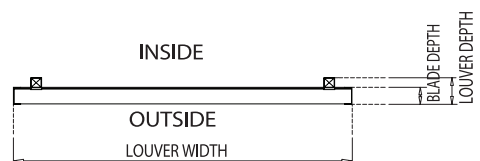
LOUVER DETAIL RS 850Z LOUVER



FRONT VIEW



SECTION VIEW



PLAN VIEW



**STORM
RESISTANT LOUVER**
HIGH PERFORMANCE CONTINUOUS LINE



STORM RESISTANT LOUVER

HIGH PERFORMANCE CONTINUOUS LINE

RHP 2500

PRODUCT DETAIL

RHP 2500 is a new generation of Double Bank louver, including a new 135 mm. of systems depth, the systems design more effective to minimize water penetration while still get high fresh air and completed facade design with horizontal blades.

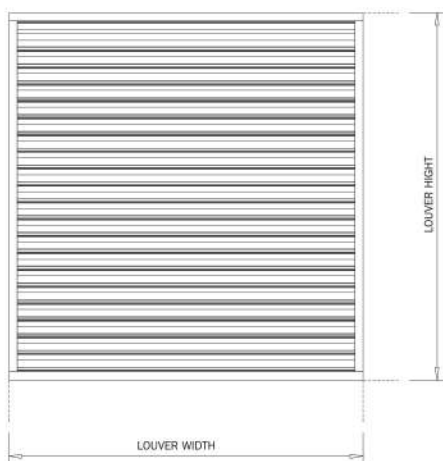


PERFORMANCE COMPARISON TABLE

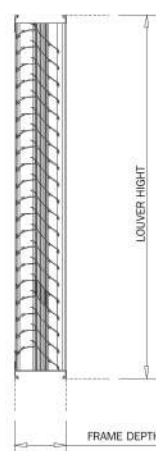
Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RHP 2500	Aluminium Extruded	154 mm.	300 x 300 mm.	Double Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s							Airflow Class	
			0.0	0.5	1.0	1.5	2.0	2.5	3.0		3.5
Horizontal	Mullions/Hidden	57.58%	A	A	A	A	A	A	A	B	2

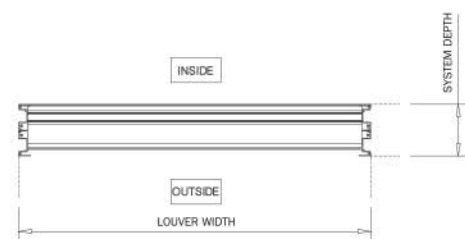
LOUVER DETAIL RHP 2500 LOUVER



FRONT VIEW



SECTION VIEW

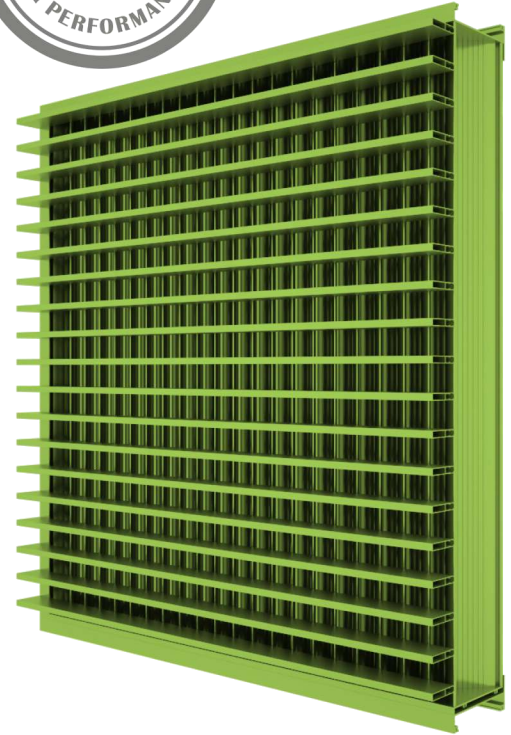


PLAN VIEW

STORM RESISTANT LOUVER

HIGH PERFORMANCE CONTINUOUS LINE

RSX 701



PRODUCT DETAIL

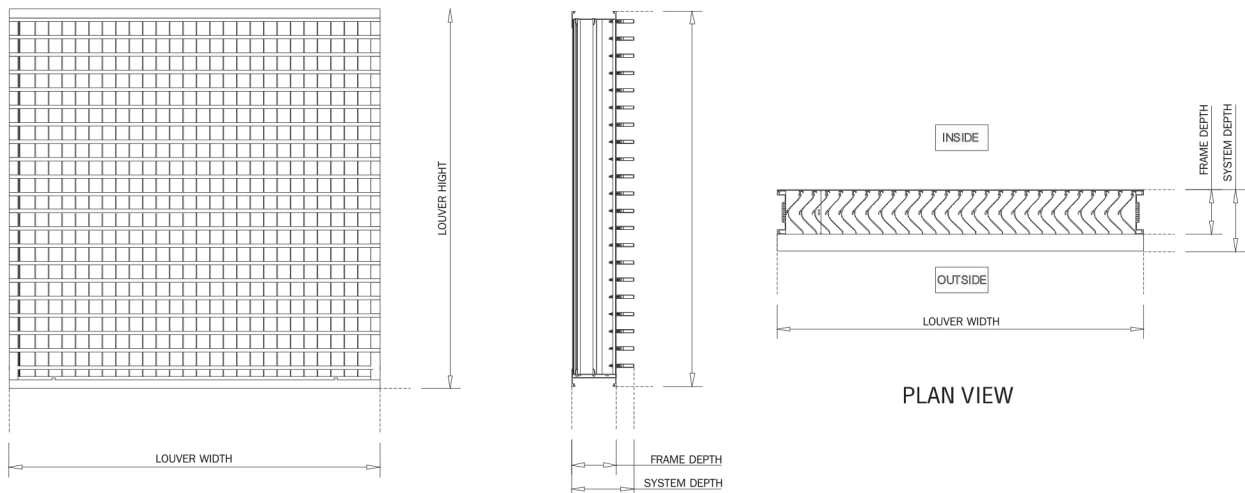
RSX 701 is a new generation of Triple Bank louver with grill, including a new 179 mm. of system depth, the systems design more effective to minimize water penetration while still get high fresh air and completed facade design with horizontal blades.

PERFORMANCE COMPARISON TABLE

Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RSX 701	Aluminium Extruded	179 mm.	300 x 300 mm.	Triple Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s							Airflow Class	
			0.0	0.5	1.0	1.5	2.0	2.5	3.0		3.5
Horizontal/Vertical	Mullions/Hidden	60.74%	A	A	A	A	A	A	A	A	2

LOUVER DETAIL RSX 701 LOUVER



FRONT VIEW

SECTION VIEW

PLAN VIEW

STORM RESISTANT LOUVER

HIGH PERFORMANCE MULLION LINE

RSH 501



PRODUCT DETAIL

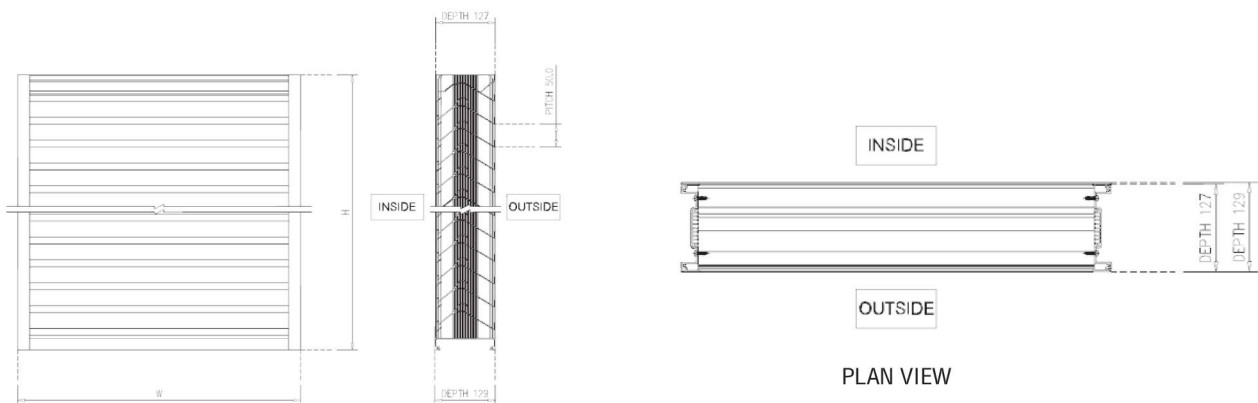
RSH 501 is a Double Bank louver, this model is available with Horizontal blades, the high performance louvers designed to minimize water penetration and high volume intake and air ventilation in order to provide maximum resistance to wind-driven rain.

PERFORMANCE COMPARISON TABLE

Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RSH 501	Aluminium Extruded	129 mm.	300 x 300 mm.	Double Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s							Airflow Class	
			0.0	0.5	1.0	1.5	2.0	2.5	3.0		3.5
Horizontal	Mullions/Hidden	59.20%	A	A	A	A	A	B	B	B	2

LOUVER DETAIL RSH 501 LOUVER



FRONT VIEW

SECTION VIEW

PLAN VIEW

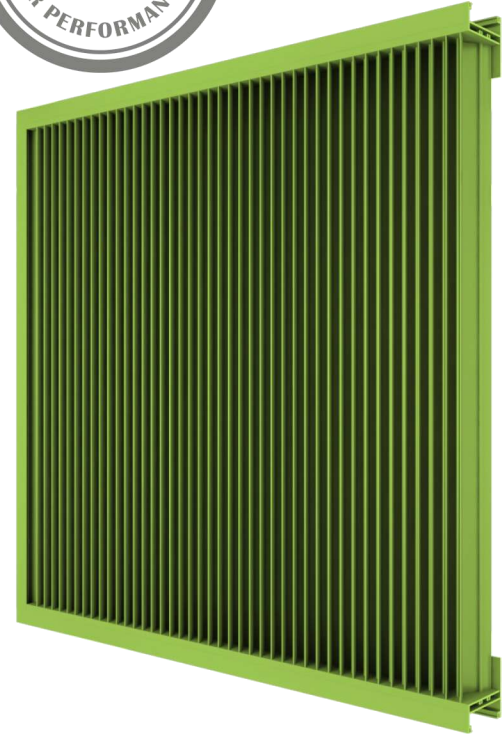
STORM RESISTANT LOUVER

HIGH PERFORMANCE MULLION LINE

RSV 301

PRODUCT DETAIL

RSV 301 is a new generation of Double Bank louver, including a new 79 mm. of systems depth, the systems design more effective to minimize water penetration while still get high fresh air and completed facade design with vertical blades.

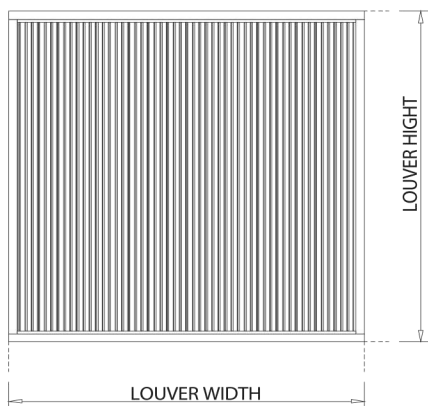


PERFORMANCE COMPARISON TABLE

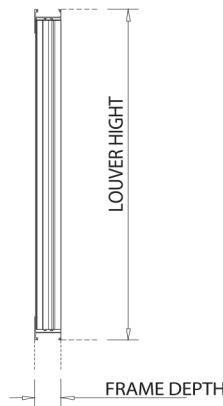
Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RSV 301	Aluminium Extruded	79 mm.	300 x 300 mm.	Double Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s							Airflow Class	
			0.0	0.5	1.0	1.5	2.0	2.5	3.0		3.5
Vertical	Mullions	46.56%	A	A	A	A	A	A	A	A	2

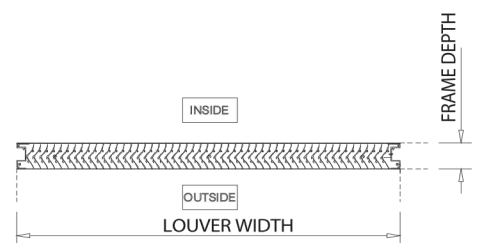
LOUVER DETAIL RSV 301 LOUVER



FRONT VIEW



SECTION VIEW



PLAN VIEW

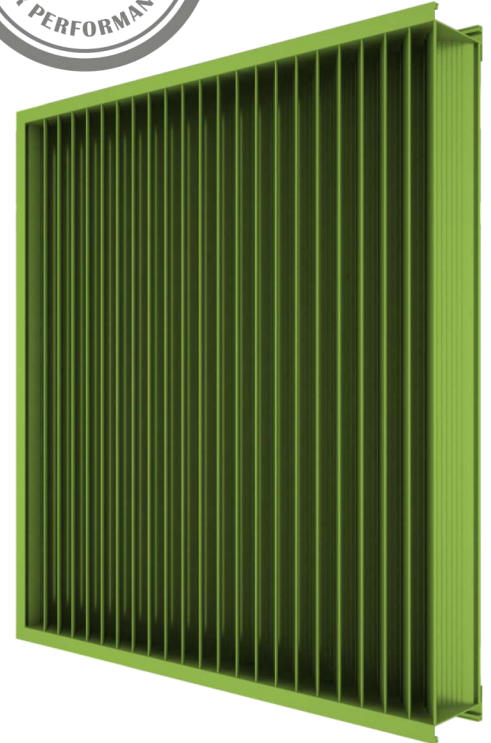
STORM RESISTANT LOUVER

HIGH PERFORMANCE MULLION LINE

RSV 501

PRODUCT DETAIL

RSV 501 is a storm class louver, the louvers is designed and rated to provide high performance of rain resistant and exhaust ventilation with Vertical Blades. The design is achieving the desired balance and optimum flexibility in aesthetic in order to complete architecture design.

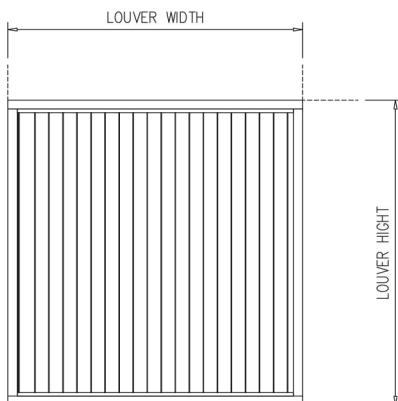


PERFORMANCE COMPARISON TABLE

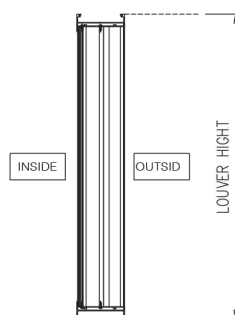
Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RSV 501	Aluminium Extruded	129 mm.	300 x 300 mm.	Double Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s								Airflow Class
			0.0	0.5	1.0	1.5	2.0	2.5	3.0	3.5	
Vertical	Mullions/Hidden	66.42%	A	A	A	A	A	A	A	A	2

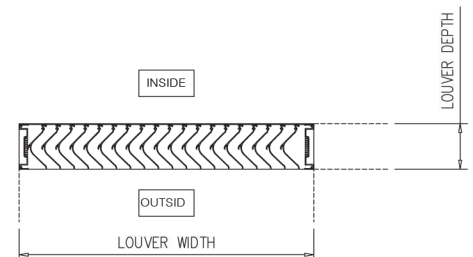
LOUVER DETAIL RSV 501 LOUVER



FRONT VIEW



SECTION VIEW



PLAN VIEW



STORM RESISTANT LOUVER

RS CLASSIC CONTINUOUS LINE



STORM RESISTANT LOUVER

RS CLASSIC CONTINUOUS LINE

RS 1200

PRODUCT DETAIL

RS 1200 is an extruded aluminum alloy Single Blade louver, the louver is a simple and usable, the system developed for ventilation applications and screening, rain defense is not a priority in this model but be able to reduce damage from water penetration than standard or local louver.



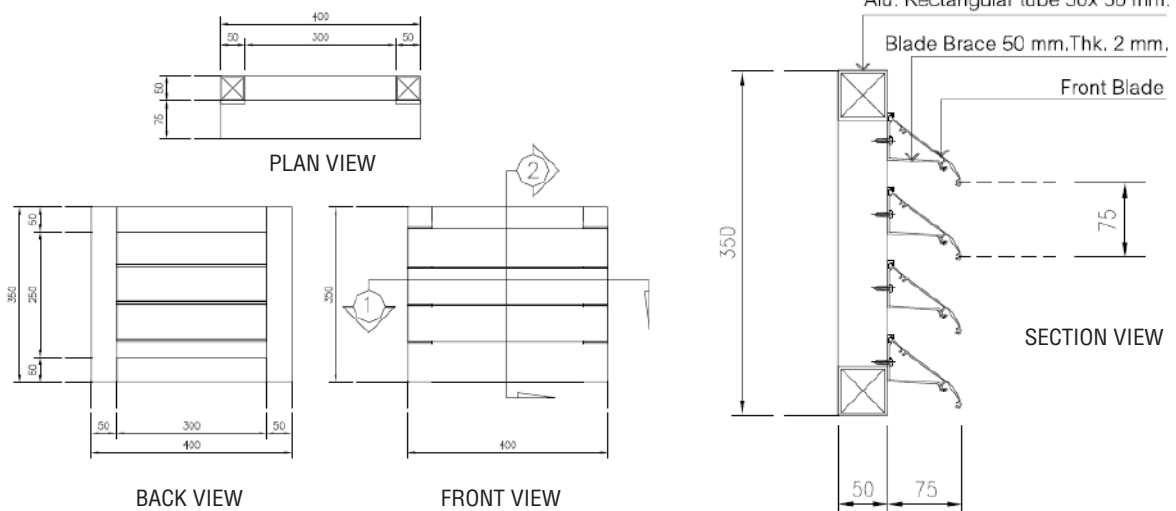
PERFORMANCE COMPARISON TABLE

Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RS 1200	Aluminium Extruded	125 mm.	300 x 300 mm.	Single Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s							Airflow Class	
			0.0	0.5	1.0	1.5	2.0	2.5	3.0		3.5
Horizontal	Mullions/Hidden	62.12%	D	D	D	D	D	D	D	D	2

LOUVER DETAIL

RS 1200 LOUVER



STORM RESISTANT LOUVER

RS CLASSIC CONTINUOUS LINE

RS 2200

PRODUCT DETAIL

RS 2200 is an extruded aluminum alloy Double Blade louver, dry area is the priority consideration for selecting product in this series, the system delivery a good degree of rain defense and ventilation, for that reason, the louver is suit for any building that need to be protection and ventilation.



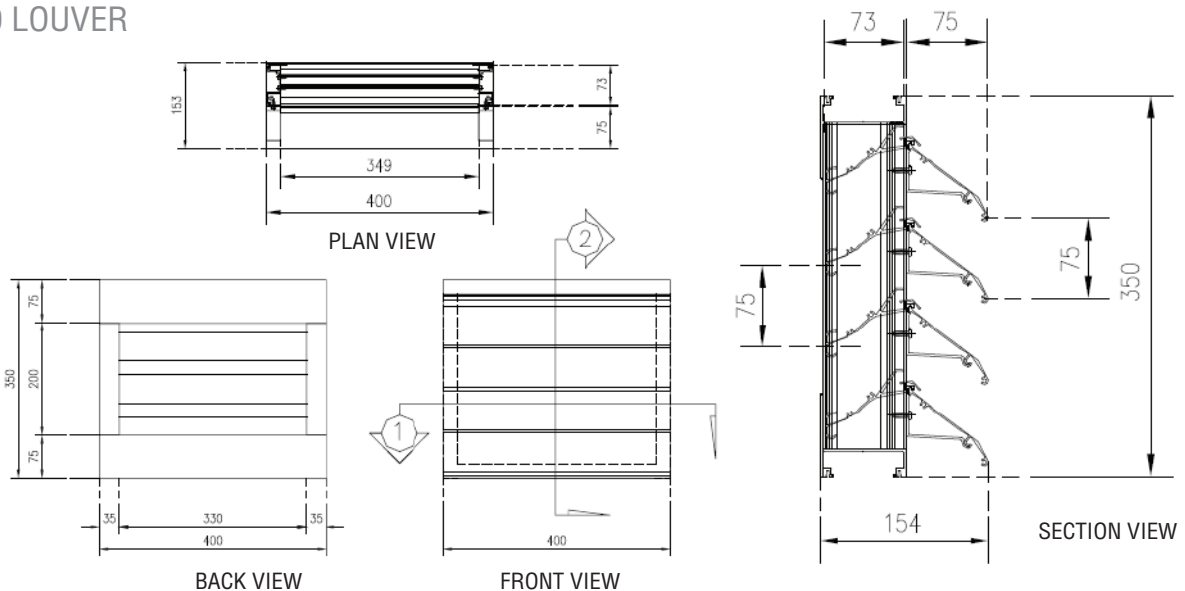
PERFORMANCE COMPARISON TABLE

Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RS 2200	Aluminium Extruded	154 mm.	300 x 300 mm.	Double Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s							Airflow Class	
			0.0	0.5	1.0	1.5	2.0	2.5	3.0		3.5
Horizontal	Mullions/Hidden	57.09%	B	B	B	C	C	D	D	D	3

LOUVER DETAIL

RS 2200 LOUVER



STORM RESISTANT LOUVER

RS CLASSIC CONTINUOUS LINE

RS 3200

PRODUCT DETAIL

RS 3200 is an extruded aluminum alloy Triple Blade louver, the system developed under requirement of high ability to permit airflow and suit for any area when the high degrees of rain defense and ventilation are the priority concern.



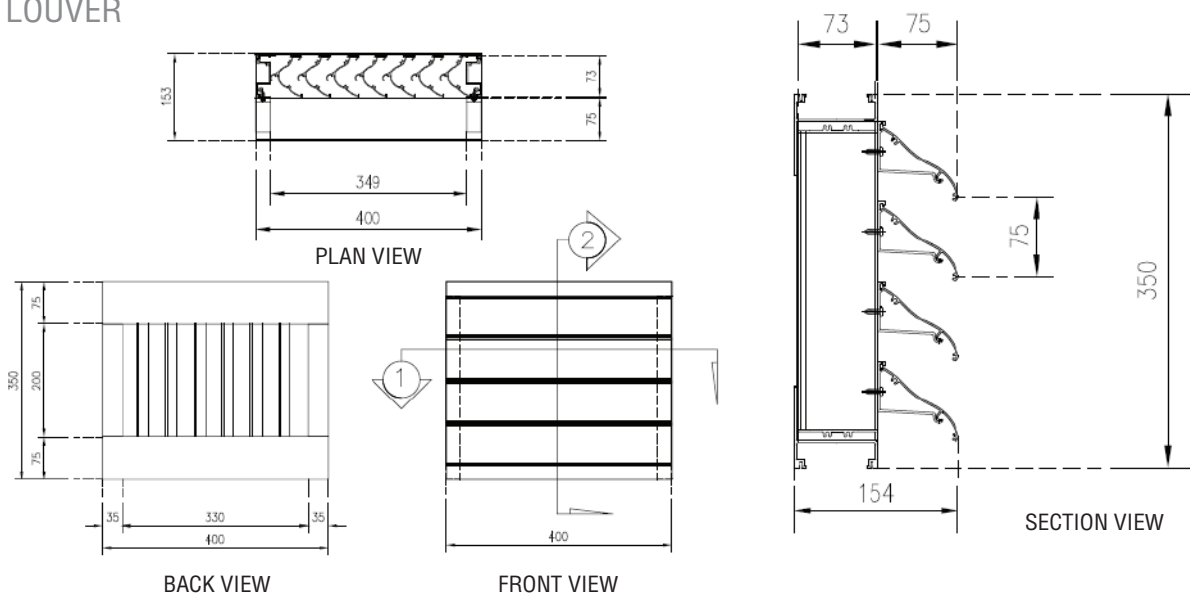
PERFORMANCE COMPARISON TABLE

Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RS 3200	Aluminium Extruded	154 mm.	300 x 300 mm.	Triple Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s							Airflow Class	
			0.0	0.5	1.0	1.5	2.0	2.5	3.0		3.5
Horizontal/Vertical	Mullions/Hidden	51.25%	A	A	A	A	A	A	A	C	4

LOUVER DETAIL

RS 3200 LOUVER



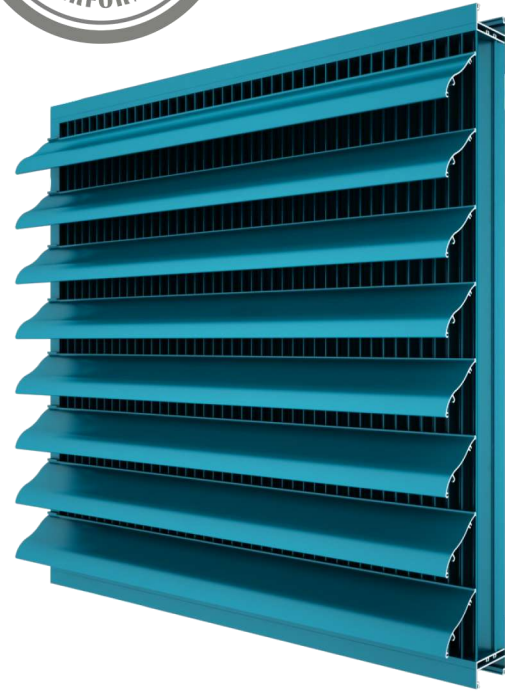
STORM RESISTANT LOUVER

RS CLASSIC CONTINOUS LINE

RS 3300

PRODUCT DETAIL

RS 3300 is a new generation of Triple Blade louver, including a new 153 mm. of systems depth, the systems design more effective to minimize water penetration while still get high fresh air and completed facade design with horizontal blade front and vertical blade rear.

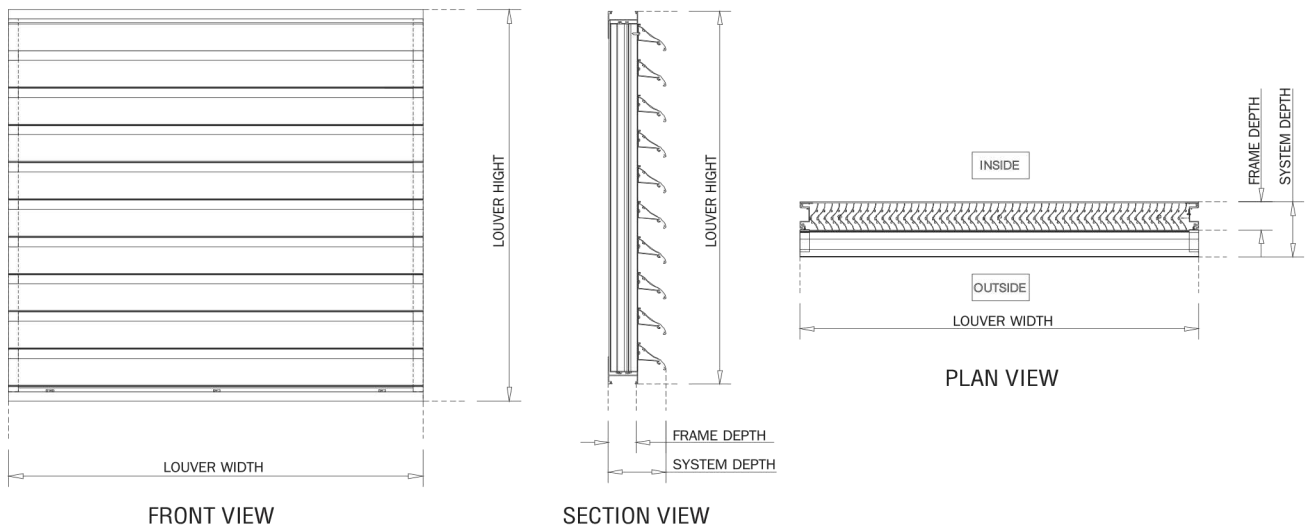


PERFORMANCE COMPARISON TABLE

Model	Material	System Depth	Minimum Size	Blade Configuration	Finish
RS 3300	Aluminium Extruded	153 mm.	300 x 300 mm.	Triple Blade	Anodize Powder Coat PVDF

Visual Blade Orientation	Visual Impact of Mullions	Free Area Wind load (20 lb/sq')	Airflow Rate in m ³ /s Rain Defense Classification*							Airflow Class	
			0.0	0.5	1.0	1.5	2.0	2.5	3.0		3.5
Horizontal/Vertical	Mullions/Hidden	46.36%	A	A	A	A	A	A	A	A	3

LOUVER DETAIL RS 3300 LOUVER



REFERENCE





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