

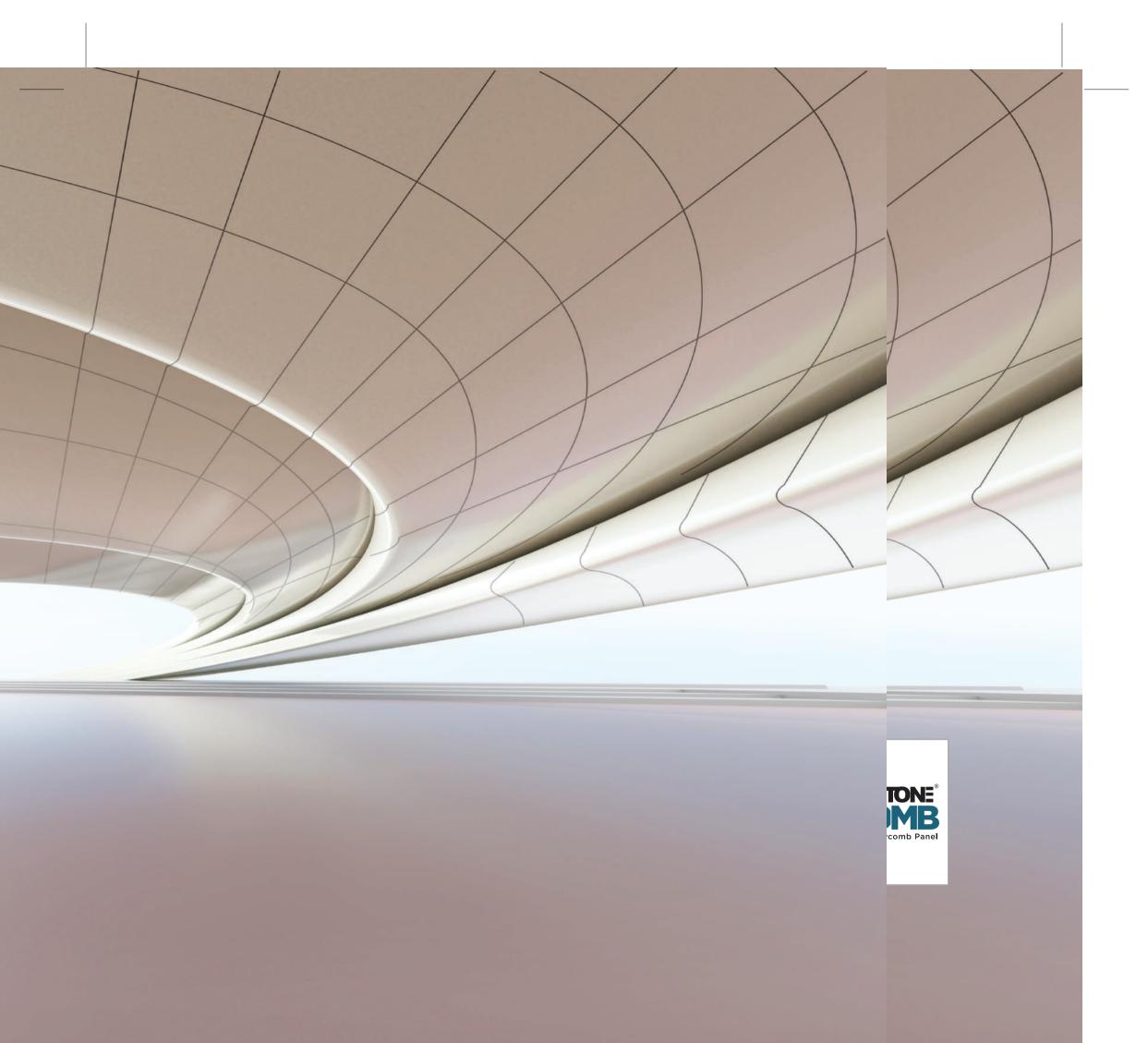
HELLO FUTURE!



THE FUTURE OF EXTERIOR CLADDING



THE FUTURE



THE LEGACY OF TWO DECADES OF DELIVERING OVER 600+ MILLION SQ FT OF MCPs,

NOW DELIVERS EVEN MORE.

THINK | CLADDING | THINK

ALSTONE®



20+ YEARS OF TRUST 600+
MILLION SQ FT
OF MCP DELIVERED

500+
CHANNEL PARTNERS

300+ PRIMARY SHADES 16 OFFICES PAN INDIA

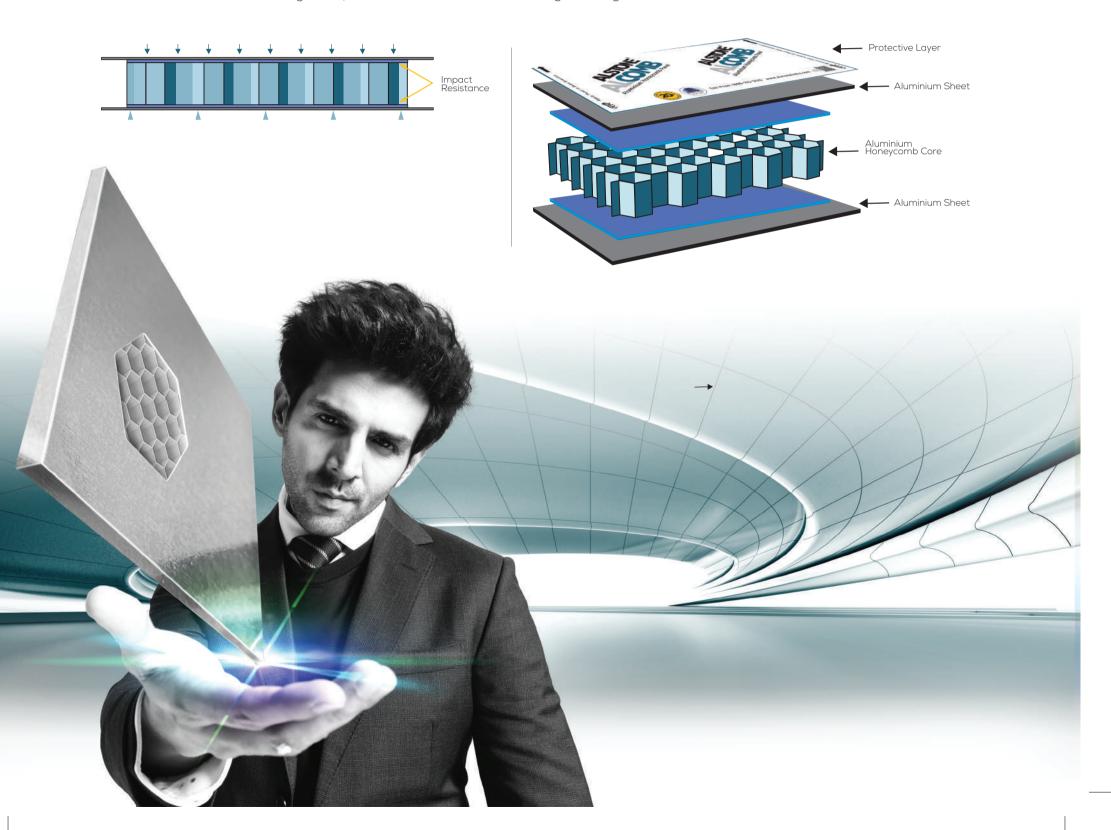
INTRODUCING





THE FUTURE OF EXTERIOR CLADDING

Alstone, a leading and trusted brand in the cladding industry, now introduces Aluminium Honeycomb Panels (AHP). The panel consists of lightweight structure of aluminium hexagonal cells, sandwiched between two thin aluminium sheets. This design offers exceptional strength-to-weight ratios, high rigidity and excellent wind pressure resistance. Alcomb is ideal for exterior cladding and a perfect solution to meet modern design challenges.



APPLICATIONS

THE **FUTURE** OF EXTERIOR CLADDING



BULLNOSE & COPING **EXTERIOR CLADDING** INTERIOR CLADDING INTERIOR CEILING CANOPY SUN LOUVERS



WHY ALSTONE ALCOMB?

THE FUTURE OF EXTERIOR CLADDING





NON COMBUSTIBLE

Engineered with non-combustible materials, ensuring safety and compliance.

Certified by THOMAS BELL WRIGHT.



LIGHT WEIGHT

Despite its robust structure, the honeycomb panel is incredibly lightweight, which is great for transportation and installation.



HIGH STRENGTH

With exceptional high strength, Alcomb offers superior durability, standing up to extreme conditions.



100% SUSTAINABLE

Crafted from recyclable materials, these panels are eco-friendly and aligns with sustainability goals.



ACOUSTIC CAPABILITIES

The honeycomb design also offers excellent acoustic insulation, reducing noise levels to ensure a quieter environment.



SUPERIOR FLATNESS

With Alcomb panels, you can achieve perfect aesthetics with flawless flatness, ensuring a smooth, polished and pleasing appearance.

THINK CLADDING THINK

ALSTONE®

NON COMBUSTIBLE A2 GRADE

WE'RE COMMITTED TO SAFE BUILDINGS



Alcomb honeycomb panels, certified by **Thomas Bell Wright**, meet the stringent non-combustible A2 grade classification. This rating ensures minimal combustible content and negligible contribution to fire spread or smoke production.





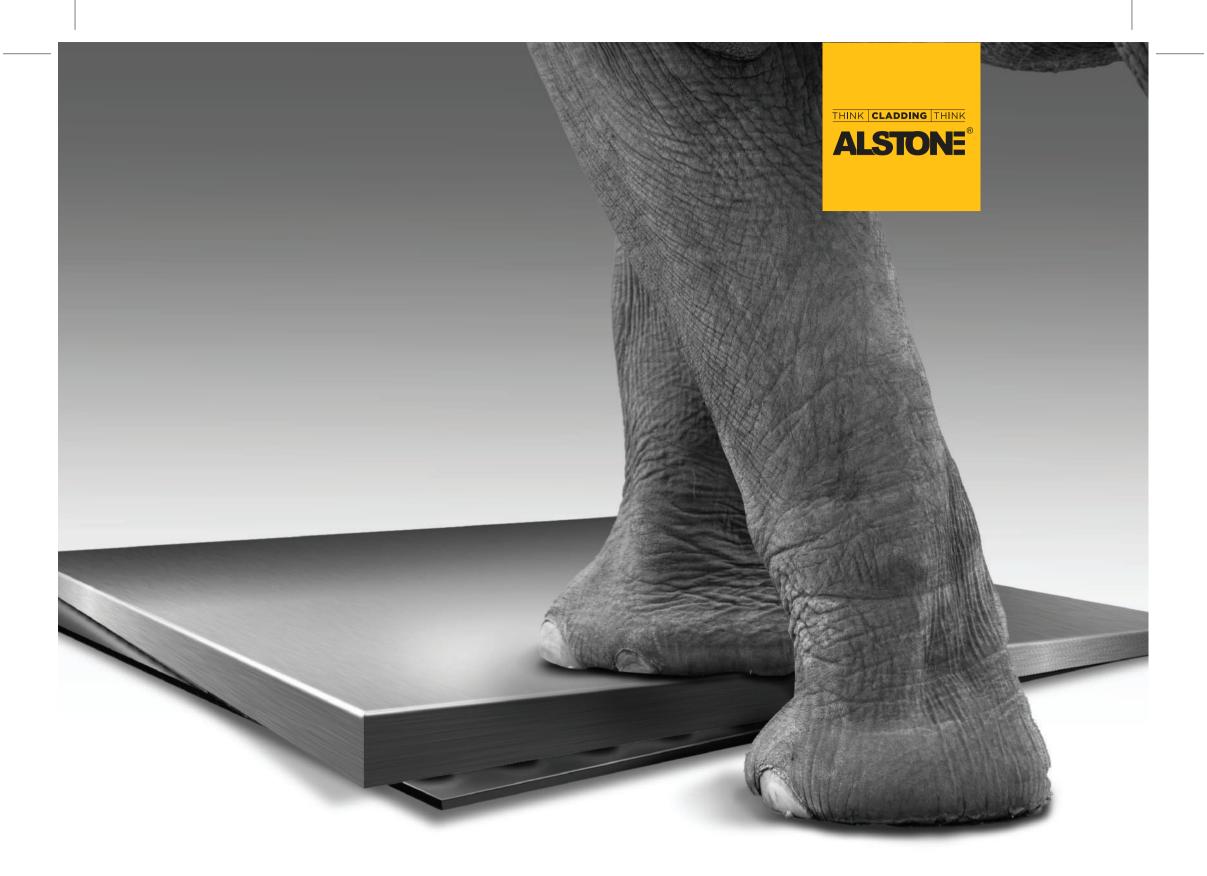






LIGHT WEIGHT





HIGH STRENGTH

High Strength

Alcomb Honeycomb Panels offer superior rigidity and load-bearing capacity, these panels enable architects and facade consultants to create more ambitious, durable structures. Their high strength-to-weight ratio allows for larger spans and enhanced longevity while resisting bending, wind, and environmental stresses.







100% SUSTAINABLE

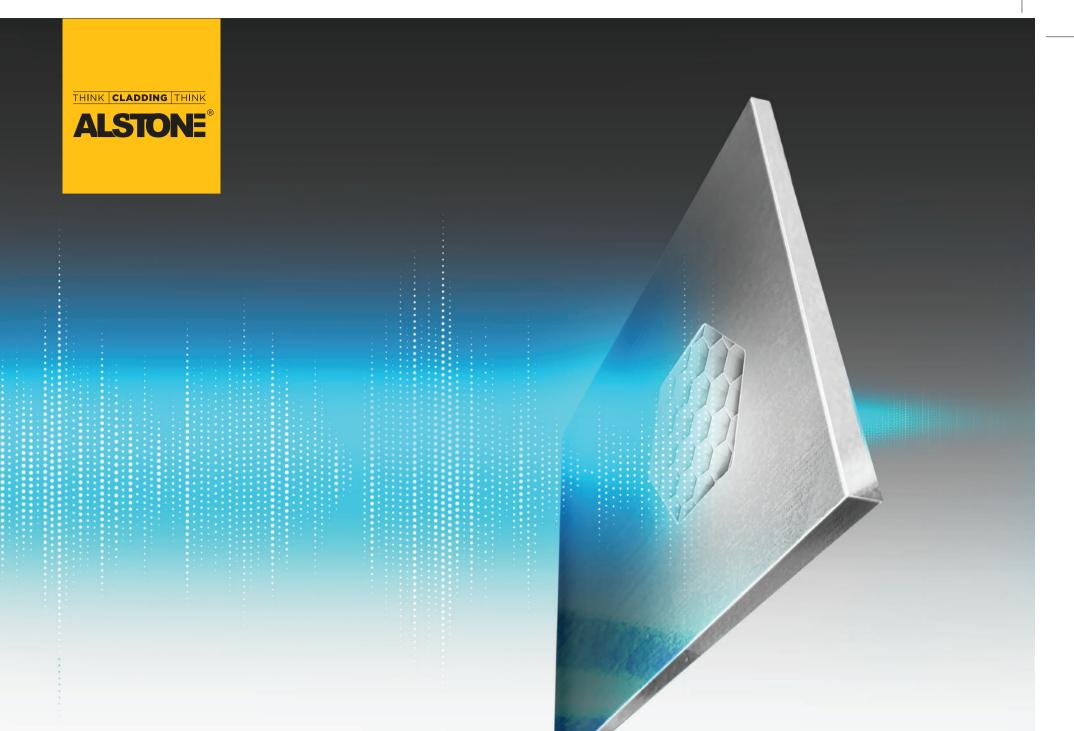
100% Sustainable

Alcomb honeycomb panels embody 100% sustainability, setting a new benchmark in eco-friendly construction materials. Fully recyclable and produced with minimal environmental impact, these panels align perfectly with green building initiatives. For architects and facade consultants committed to sustainability, Alcomb offers a responsible choice without compromising on performance or aesthetics.

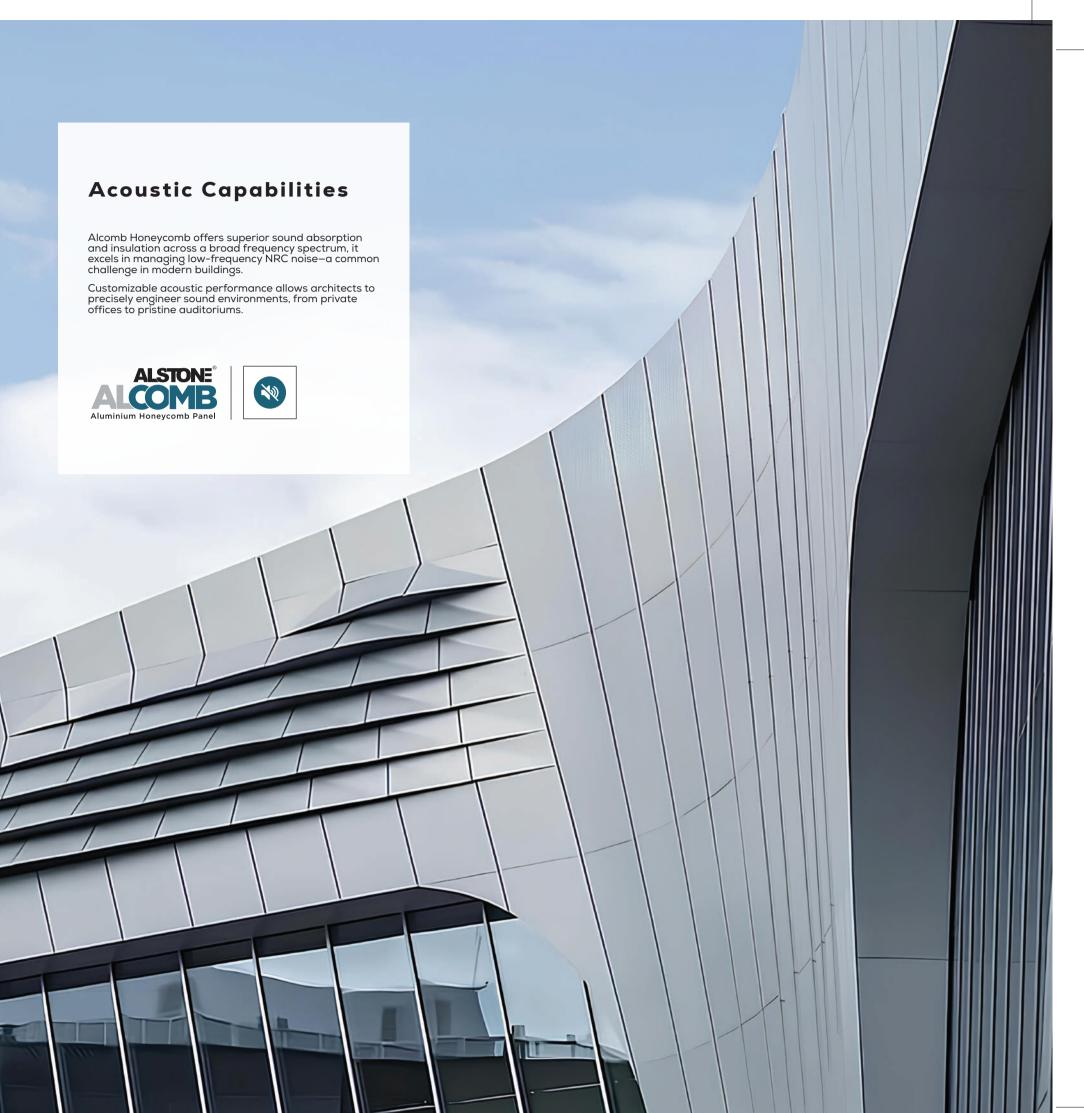
The panels' lightweight nature reduces transportation emissions, while their durability ensures a long lifecycle, minimizing waste.







ACOUSTIC CAPABILITIES





SUPERIOR FLATNESS

Superior Flatness

Alcomb honeycomb panels set the industry standard for superior flatness, offering architects and facade consultants unparalleled surface consistency. Their innovative core structure ensures minimal warping and deflection, even across large spans. This exceptional flatness enables seamless integration in modern designs, from sleek building facades to precision-dependent interiors.







IMAGINE ANY COLOUR,













Dr. Jayant Jain Professor

भारतीय प्रौद्योगिकी संस्थान दिल्ली INDIAN INSTITUTE OF TECHNOLOGY DELHI Department of Materials Science & Engineering Hauz Khas, New Delhi - 110016, India Tel.: +91-11-2659 1246 E-mail: jayanti@mse.litd.ac.in

Web.: https://sites.google.com/view/profjayantjain/home

Date: 30-08-2024

				Date: 30-08-2024		
Alstone Alcomb Panel, 12 mm thick						
Sr.No	Mechanical property	Test method	Units	Results		
1	Tensile Strength	ASTM E8	MPa	10.6		
2	Yield strength	ASTM E8	MPa	10.26		
3	Elongation	ASTM E8	%	5.57		
4	Flexural Rigidity El	DIN 53293	KNcm ² /m	20337		
5	Section Modulus Z	DIN 53293	mm³	588		
6	Shear Punch Strength	ASTM D732	MPa	20.7		
7	Flexural Strength	ASTM D7264	MPa	23.3		
8	Compressive Strength	ASTM C365	MPa	1.26		
9	Crush Strength	ASTM-C 365	MPa	1.05		
10	Bonding Strength Between Foil	ASTM D1781	N/mm	1.21		
11	Cell Size	Physical	Shape and size	Hexagonal, side length 6.5 mm		
12	Alloy		Aluminum alloy	AA 3105		
13	Foil Thickness	Physical	mm	0.70		
14	Tensile Strength (Foil)	ASTM E8	MPa	179.4		
15	Yield Strength (Foil)	ASTM E8	MPa	169		
16	Elongation (Foil)	ASTM E8	%	11.1		
17	Modulus of Elasticity (Foil)	ASTM E8	MPa	77481		
18	Density	AMS-C 7438	g/cm ³	0.889		
19	Inorganic Analysis by Xray Spectrometer (EDX Analysis)	ASTM E 1508	-	Al 97.3%, Mn 0.48%, Fe 0.35%, Mg 1.23%, Si 0.56%, Ti 0.08%		
20	Thermal Resistance	-	K/W	0.00084		
21	Thermal conductivity (k)	-	W/m-K	1.5		
22	Heat Transition co- efficient (U)	-	W/m²-K	5.62		

Test results pertain only to samples submitted to us

Dr. Jayant Jain
Dr. Jayant Jain
Professor
Department of the Engineering
Indian Institutes of Technology Delhi
Hauz Khas, New Delhi-110018, India

Dr Suresh Neelakantan

Dr. Suresh Neelakantan Associate Professor Department of Materials Science & Engineering Indian Institute of Technology Delhi Heuz Khas, New Delhi-110016, India

Page 1 of 2



मारतीय प्रौद्योगिकी संस्थान दिल्ली INDIAN INSTITUTE OF TECHNOLOGY DELHI Department of Materials Science & Engineering Hauz Khas, New Delhi - 110016, India Tel. : +91-11-2659 1246 E-mail : jayantj@mse.iltd.ac.in

Web.: https://sites.google.com/view/profjayantjain/home

Professor

Date: 30-08-2024

				Date: 30-08-2024		
Alstone Alcomb Panel, 25 mm thick						
Sr.No	Mechanical property	Test method	Units	Results		
1	Tensile Strength	ASTM E8	MPa	8.67		
2	Yield strength	ASTM E8	MPa	8.51		
3	Elongation	ASTM E8	%	6.6		
4	Flexural Rigidity El	DIN 53293	KNcm ² /m	10341		
5	Section Modulus Z	DIN 53293	mm³	2552.1		
6	Shear Punch Strength	ASTM D732	MPa	19.5		
7	Flexural Strength	ASTM D7264	MPa	4.78		
8	Compressive Strength	ASTM C365	MPa	0.84		
9	Crush Strength	ASTM-C 365	MPa	0.62		
10	Bonding Strength Between Foil	ASTM D1781	N/mm	1.48		
11	Cell Size	Physical	Shape and size	Hexagonal, side length 6.8 mm		
12	Alloy		Aluminum alloy	AA 3105		
13	Foil Thickness	Physical	mm	0.70		
14	Tensile Strength (Foil)	ASTM E8	MPa	174.4		
15	Yield Strength (Foil)	ASTM E8	MPa	167.3		
16	Elongation (Foil)	ASTM E8	%	9.6		
17	Modulus of Elasticity (Foil)	ASTM E8	MPa	71600		
18	Density	AMS-C 7438	g/cm ³	0.645		
19	Inorganic Analysis by Xray Spectrometer (EDX Analysis)	ASTM E 1508	-	Al 97.40%, Mn 0.46%, Fe 0.34%, Mg 1.24%, Si 0.49%, Cu 0.04%, Ti 0.02%		
20	Thermal Resistance	-	K/W	0.0009		
21	Thermal conductivity (k)	-	W/m-K	2.7		
22	Heat Transition co- efficient (U)	-	W/m²-K	5.58		

Test results pertain only to samples submitted to us

Dr Jayant Jain

Dr. Jayant Jain Professor Department of Materials Science & Engineering Indian Institute of Technology Delhi Hauz Khas, New Delhi-110016, India

Dr Suresh Neelakantan

Dr. Suresh Neelakantan Associate Professor Department of Meterials Science & Engineering Indian Institute of Technology Delhi Heuz Khas, New Delhi-110015, India

Page 2 of 2

THE FUTURE OF EXTERIOR CLADDING







THOMAS BELL-WRIGHT

In accordance with UKAS accreditation to ISO/IEC 17065 Certification is Hereby Granted

Alstone Manufacturing Pvt. Ltd. 15th Floor Vijaya Building, 17 Barakhamba Rd, Connaught Place, 110001 New Delhi, India

for

"Alcomb"

Aluminium Honeycomb Core Composite Material (Classified according to BS EN 13501-1:2018)

which, subject to limitations described on the following pages and continued listing on www.tbwcert.com, complies with Product Certification Scheme SD03 Exterior Wall Assemblies, Curtain Walls, Building Materials, Products & Assemblies

In witness whereof, this Certificate is issued this 29th day of August 2024

TEST CERTIFICATE





Sandy Dweik Chief Executive Officer

Nicholas Purcell Director of Certification

Certificate Number: TBW0301077

Expiration: August 28, 2027

This certificate and schedules are held in force by regular Factor.
Refer to www.tbwcert.com or contact TBWIC Certificat
This certificate remains a property of
P.O. Box 26385, Dubai, UAE, I Tel: +971 4 8215777 I Em
This document must not be reproduced except in its sentirety and w



TECHNICAL DATA SHEET, CLOSED PANEL ALLOY SPECIFICATION

ALLOY SPECIFICATIONS

Top & Bottom Coil

AA 3105

H16, H24

Honeycomb Core

AA 3003

H16

PANEL PROPERTIES

Panel Thickness 6mm to 200mm ± 0.5mm

Top Coil Thickness 1.0mm, 0.7mm ± 0.05mm

Bottom Coil Thickness 0.7mm, 0.05mm ± 0.05mm

Panel Width- Max 1500mm ± 2mm

Panel Length - Max < 9000mm ± 2mm

Weight (kg/m2) 4.0 (12mm) \pm 0.2kg

 $4.5 (25 \text{mm}) \pm 0.2 \text{kg}$

U Value 5.58W/m2K

HONEYCOMB CORE PROPERTIES

Honeycomb Cell Size (D) 10mm to 20mm

Honeycomb Foil Thickness 0.076mm

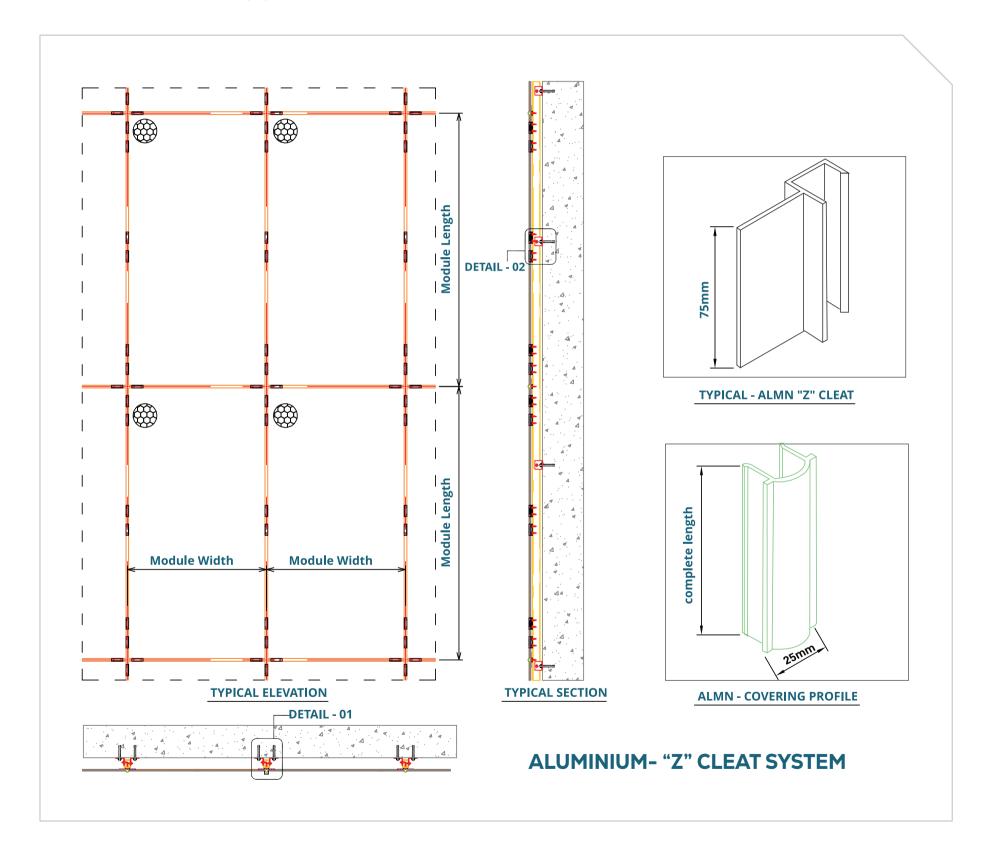
GLUE

Two Component PU - Automatically Sprayed

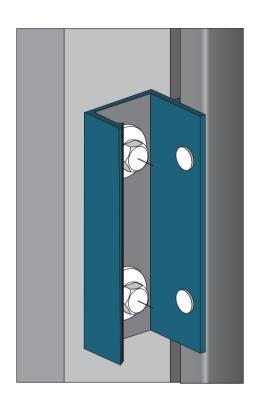
Cutomised Specifications Available on Request

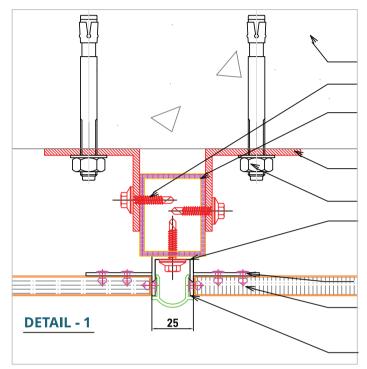


FIXING SYSTEM (1) -Z CLEAT









SUB STRUCTURE

SELF TAPPING SCREW

ALUMINIUM EXTRUDED BOX SECTION

MS L ANGLE IN STAGGERING FIXING SYSTEM

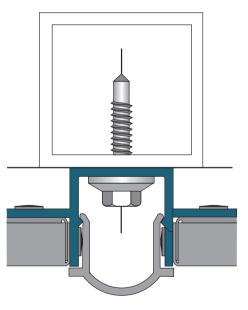
ANCHOR BOLTS

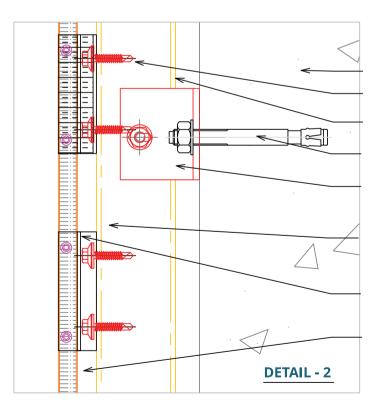
ALUMINIUM EXTRUDED "Z" CLEAT - CUSTOMIZED

ALUMINIUM POP RIVETS

HONEY COMB PANEL -12mm THK

ALUMINIUM EXTRUDED COVERING PROFILE





SUB STRUCTURE

SELF TAPPING SCREW

ALUMINIUM EXTRUDED BOX SECTION ANCHOR BOLTS

MS L ANGLE IN STAGGERING FIXING SYSTEM

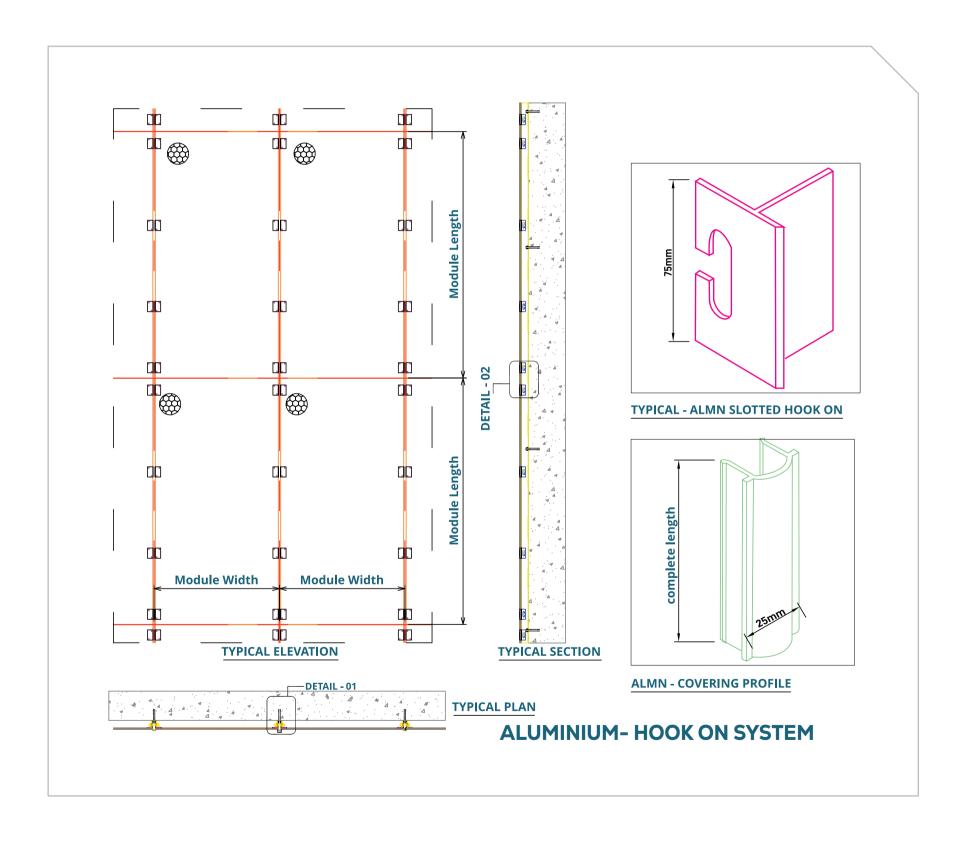
ALUMINIUM EXTRUDED "Z"
CLEAT - CUSTOMIZED

ALUMINIUM POP RIVETS

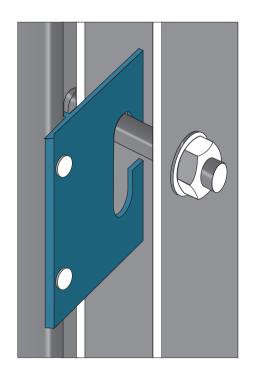
HONEY COMB PANEL -12mm THK

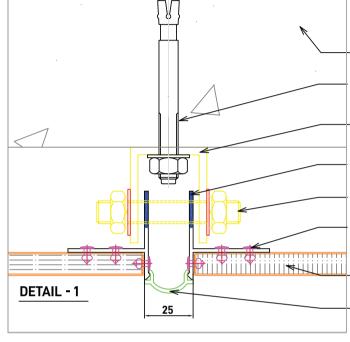


FIXING SYSTEM (2) -HOOK ON









SUB STRUCTURE

ANCHOR BOLTS

MS "U" CHANNEL SECTION - CONTINOUS

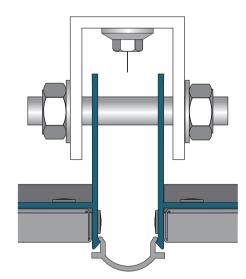
ALUMINIUM EXTRUDED -SLOTTED HOOK ON TYPE MS PLAIN SHANK BOLT &

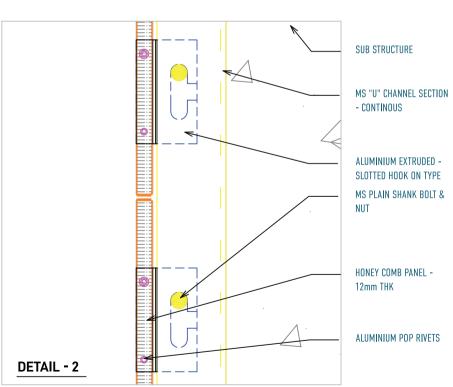
ALUMINIUM POP RIVETS

HONEY COMB PANEL -12mm THK

ALUMINIUM EXTRUDED

COVERING PROFILE - # 2







OUR PRODUCT RANGE



























Corporate Office

15th Floor, Vijaya Building.17, Barakhamba Road, Connaught Place, New Delhi- 110001

Manufacturing

Khasra No-421, Keshwana Industrial Area, Tehsil- Kotputli, Jaipur, Rajasthan-303108

Manufacturing

R288, Al Ghail Industrial Area, Ras Al Khaimah (RAK), UAE. PH: +971 54793 6042

Branche

Ahmedabad, Bengaluru, Bhubneshwar, Chennai, Delhi, Hyderabad, Indore, Jaipur, Kochi, Kolkata, Lucknow, Mumbai, Noida, Patna, Pune, Raipur, Ranchi.

CONTACT:

www.alstoneindia.com info@alstoneindia.com Whatsapp: 9599040030



