



Exterior Glamour,
Engineered
For
Endurance.

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Engineered
For
Endurance.



EXT ERI OR



OUR PRODUCT RANGE

- Decorative Laminates •
- Postforming Laminates •
- Anti-Fingerprint HPL •
- Digital Laminates HPL •
- Synchronized HPL •
- Unicore HPL •
- Metallic HPL •
- Writeons (chalk and board) HPL •
- External Wall Cladding •
- Internal Wall Cladding •
- Cubicles •
- FR+ Laminates •
- Edge Banding •

The Ultimate Enhancement to Your
Home's Exterior Appearance!



“Transform your outdoor spaces into a canvas of modern sophistication with our glamorous array!”

MAKERS Exterior Laminates – the ultimate solution for all your exterior applications. Our innovative laminates seamlessly integrate with any architectural design, offering unparalleled durability and timeless style. Whether you're building a contemporary masterpiece or restoring a classic facade, our products provide the perfect finishing touch. Trust MAKERS to elevate your exterior spaces with unmatched quality and sophistication.

Backed by cutting-edge technology and a commitment to excellence, MAKERS Exterior offers a seamless integration that endures the test of time. Elevate your exteriors with confidence – choose MAKERS for a flawless fusion of form and function.

story

PROPERTIES OF

MAKERS EXTERIOR GRADE COMPACT PANEL.

UV Resistance:

Our exterior-grade compact panels, equipped with a specialized UV protective film, exhibit heightened resistance to UV rays, ensuring durability under pure UV irradiation, condensation or water spray exposure. This testing method is a standard practice for initial material screening to choose the best material. The incorporated protective layers are instrumental in preventing surface discoloration and decorative design from fading. Complying with European standards, particularly EN-438-6-28 for 1500 hours, our panel known as MAKERS Exterior Grade Compact Panel, demonstrates robustness and resilience against UV-induced damage making them a reliable solution for a range of applications.

Artificial Weathering:

Accelerating the weather testing process is achieved through specialized weathering chambers, significantly reducing the time required to obtain results. Our MAKERS Exterior Grade Compact Panel undergoes rigorous testing in an advanced climate test facility, allowing simulation of various weather conditions—both natural such as sunlight, salt mist, temperatures, rain, and combined exposures and man-made including air pollution, chemicals, and extreme temperatures. This ensures that our product meets diverse requirements for weathering conditions. Compliant with EN-438-6-27 & 29 and boasting an appearance rating of > 4, MAKERS Exterior Grade Compact Panel demonstrates resilience and durability in the face of artificial weathering tests with different environmental conditions.

Resistance to Climatic Shock:

Throughout a product's lifespan, it faces exposure to diverse climates worldwide beyond our control. MAKERS Exterior Grade Compact Panels adhere to rigorous testing in accordance with European standards, specifically EN-438-6-9, demonstrating excellent flexural strength and flexural modulus. Employing custom-tailored climate tests and scenarios, we collaborate with our customers to enhance the robustness and reliability of our product. Our aim is not only to meet design and performance standards but also to surpass consumer expectations ensuring MAKERS Exterior Grade Compact Panels can withstand climatic shocks and variations across different environments.

Dimensional Stability at Elevated Temperature:

MAKERS Exterior Grade Compact Panel demonstrates exceptional dimensional stability amidst diverse extreme climatic conditions, encompassing temperature and humidity variations. It conforms to EN-438-6-17, with tests conducted to assess its performance across an extensive range of relative humidity at elevated temperatures. This underscores the commitment of MAKERS to providing a panel that maintains structural integrity and precise dimensions, even in challenging environmental scenarios meeting stringent standards for reliability and durability.

Mechanical Properties of MAKERS Exterior Panel:

The panel's elasticity properties adhere to standards ISO-178, surpassing expectations with values exceeding 9000 MPa, affirming its robust strength and bending capabilities.

Flexural Strength:

Flexural strength characterizes the maximum stress endured by the material at its yield point, quantified in terms of stress load-bearing capacity, and has been determined to be more than 90 MPa.

Tensile Strength:

Ultimate tensile strength is measured by the maximum stress that a material can withstand while being stretched or pulled before breaking. MAKERS Compact Panel tends to achieve more than 70 MPa when tested as per EN-ISO-527-2.

Density of Panel:

Min 1.45 gram/cm³

Reaction to Fire:

MAKERS adheres to the EU classification standard for evaluating the reaction to fire of construction and building materials. This standard, outlined in the EN 13501 Part 1 series, establishes consistent requirements for fire protection across Europe, promoting the unhindered trade of construction products. The reaction to fire is categorized into classes (Euro class A1, A2, and B through F). Verification is provided through a fire test conducted on the entire building element, accompanied by a corresponding test certificate according to EN 13501 Part 2.

In the MAKERS Exterior Grade Compact Panel, falling under the construction materials category, key characteristics such as Flame retardant classification, B, 52, DO are evident. Our product complies with the European standard requirements for building materials categories, assessing key characteristics related to reaction to fire, including inflammability, combustibility, flame propagation, smoke development and dropping while burning.

CLASS	TEST PROCEDURE	CLASSIFICATION CRITERIA
B	EN-13823	FIGRA ≤ 120 W/S and LFS < edge of the specimen and THR600 s ≤ 7.5 MJ
B	EN ISO 11925-2 load = 30 s	Fs ≤ 1500 mm (S.91") within 60 s

Spread of Flame:

With a flame exposure of 30 kW, the SBI test assesses various factors, including the total heat released (THR), longitudinal flame spread(LFS), fire growth rate (FICRA), smoke growth rate (SMOGRA), and dripping/dropping while burning. MAKERS Exterior Grade Compact Panel, designated as FR GRADE, complies with Class-1 standards when tested for the spread of flame.

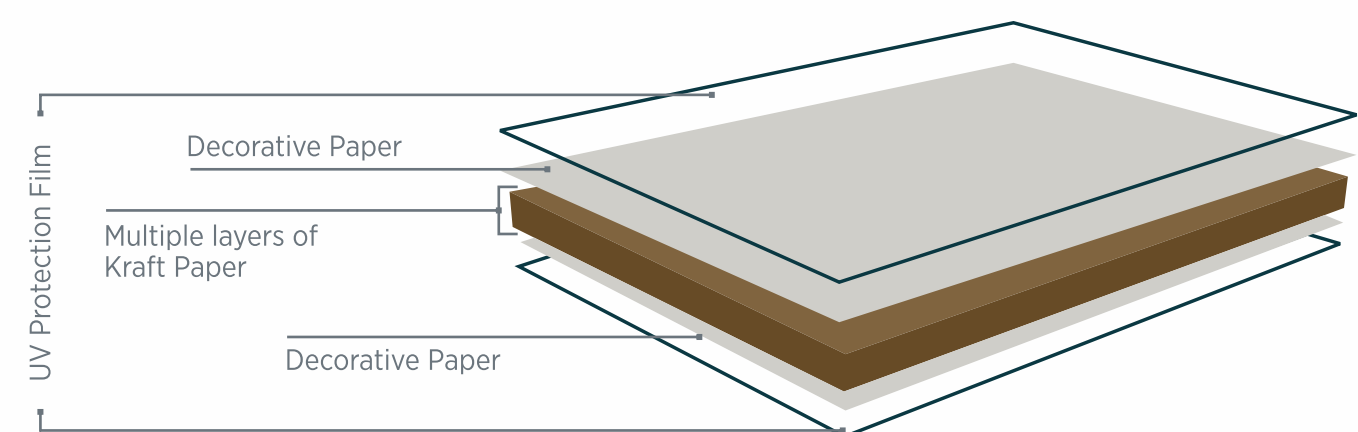
Special Features & Advantages of Using MAKERS Exterior Grade Compact Panel:

1. Waterproof against rain, frost, snowfall.
2. Acts as a sound barrier.
3. Solvent resistant.
4. Exhibits resistance to impact.
5. Requires lesser time and is easy to install on-site.
6. Enhanced light fastness.
7. Easy to clean.
8. Protects wall surfaces from external heat, thereby reducing thermal conductivity rates.
9. Equipped with special UV protective acrylic film on both sides, preventing fading of decorative surfaces.
10. Can be used for both vertical and horizontal panel alignment.
11. Surface with anti-graffiti property.
12. 100% corrosion-free product.
13. Demonstrates high stability in various environment across the globe.



THE PRODUCT

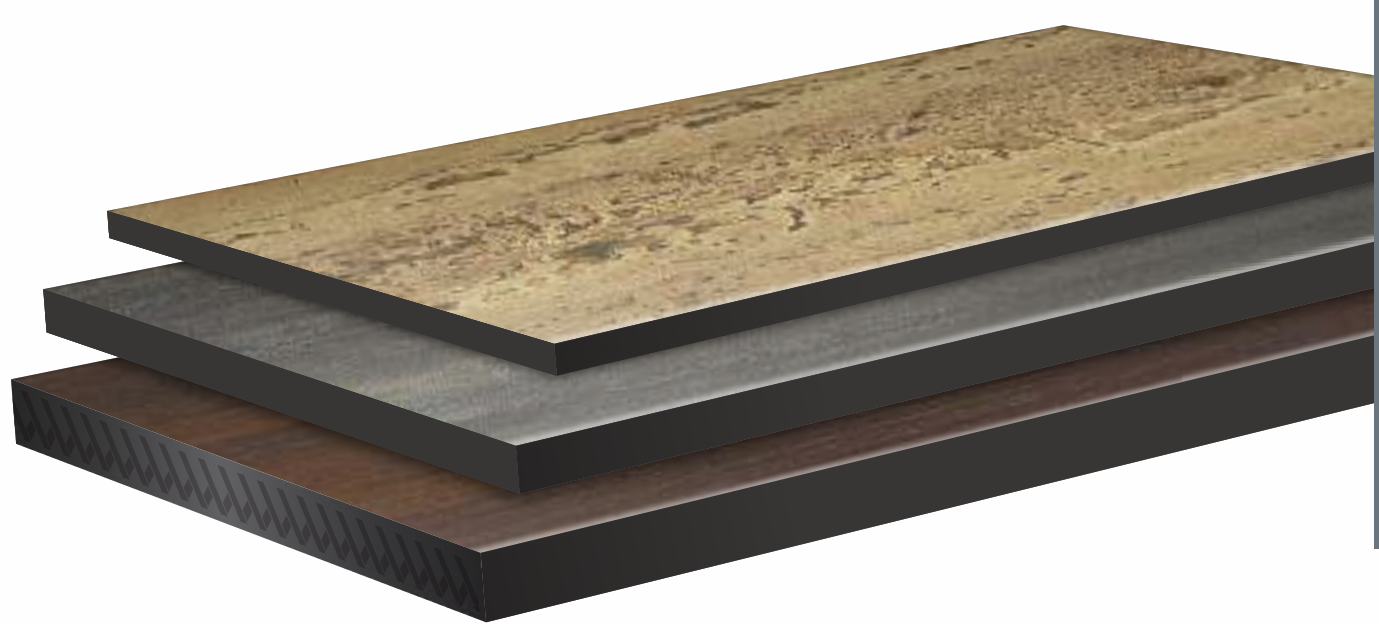
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FEATURES

- ✓ **DIMENSIONS:**
1220 X 2440 MM/4'X8'
1220 X 3050 MM/4'X10'
1300 X 3050 MM/4'.25"X10'
- ✓ **DECOR:**
Double Sided Decor Single Sided Decor
(available upon request)
- ✓ **CORE:**
Black and Natural
(On request White and Grey)
- ✓ **FINISH:**
Suede (SF), Other Finishes
available on demand.

✓ **THICKNESS: 2MM - 25MM**

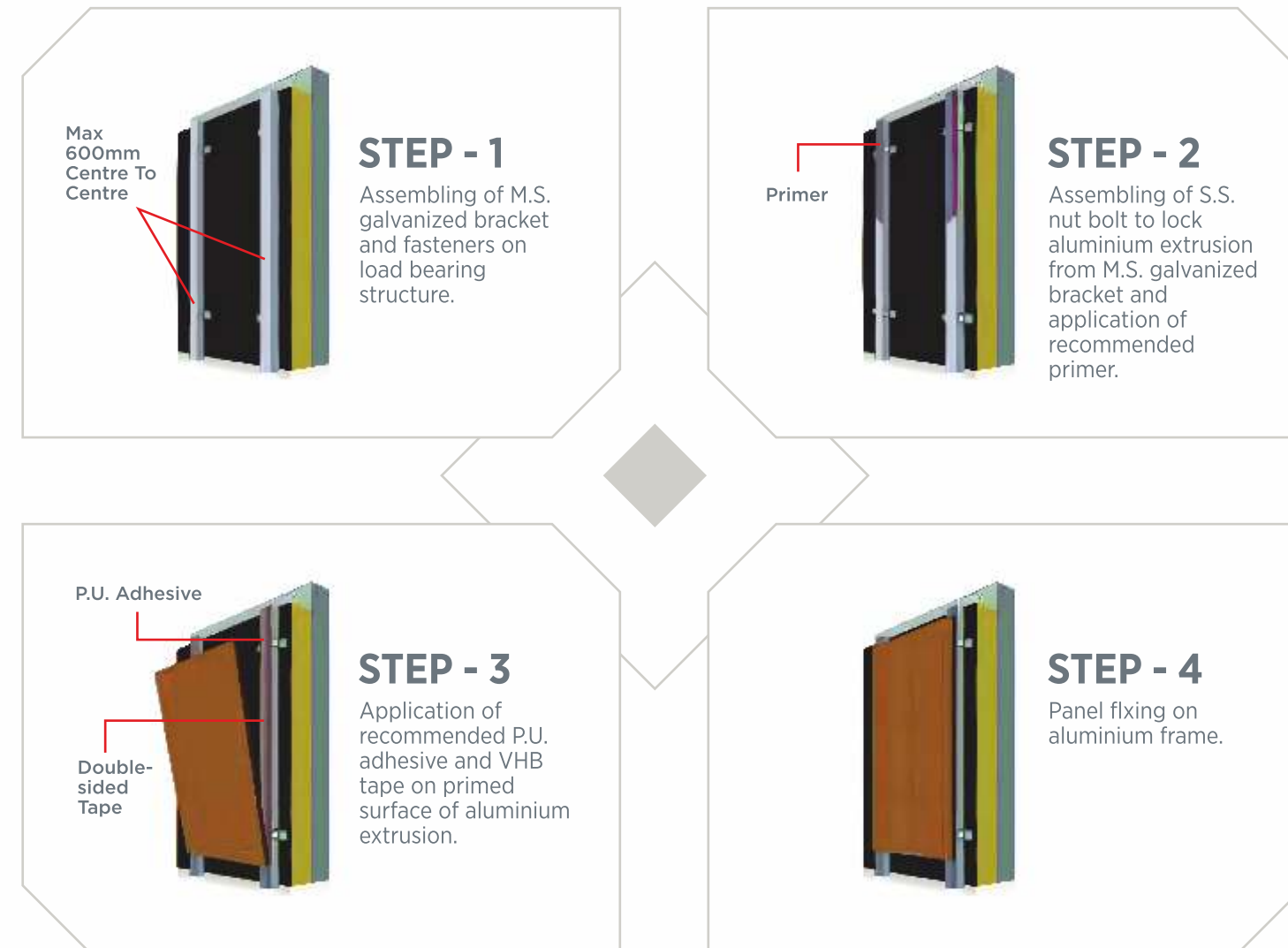


ENHANCE YOUR EXTERIORS

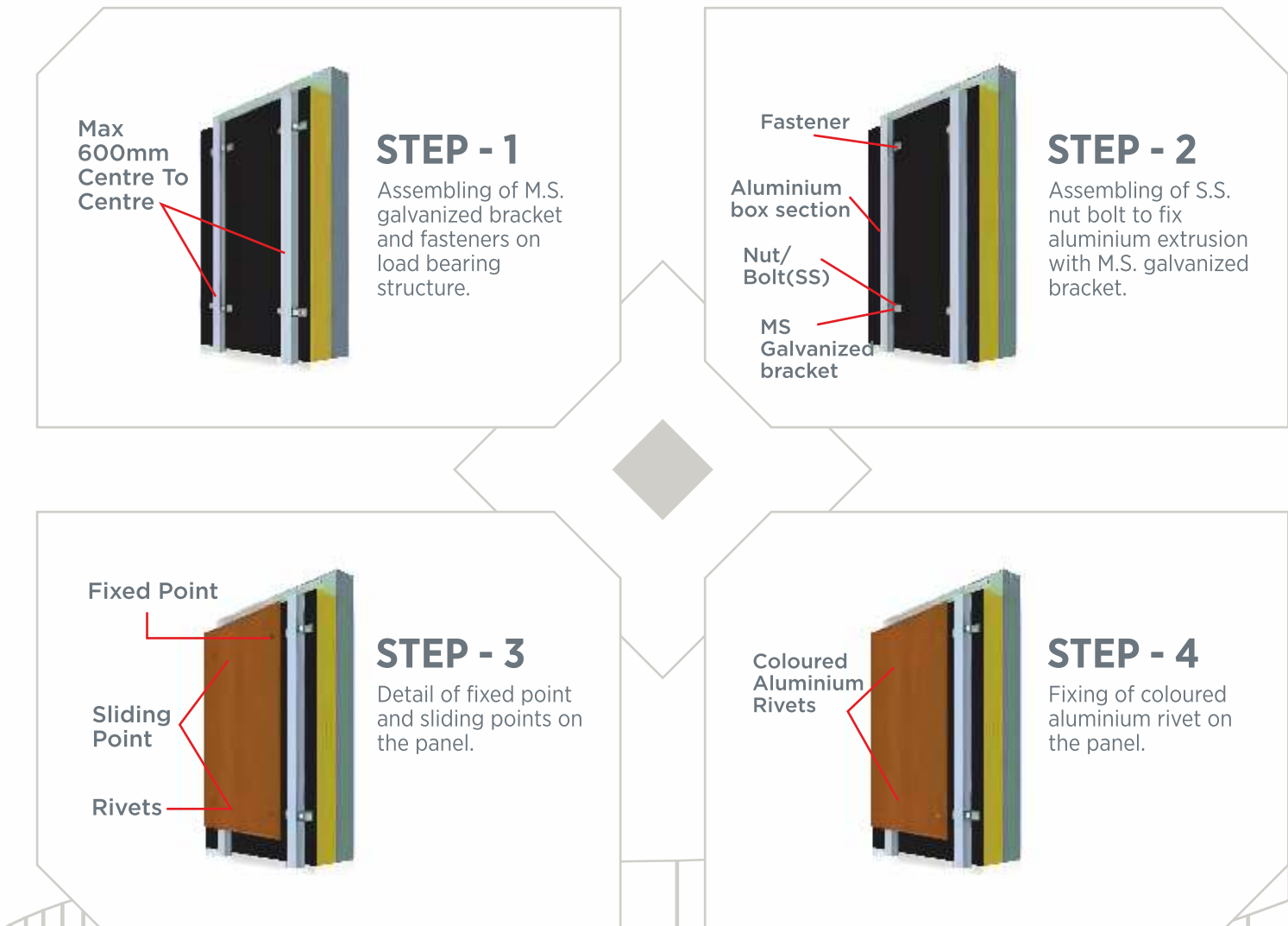
 UV RESISTANCE	 FIRE RESISTANCE	 ANTI- GRAFFITI	 THERMAL-HEAT & COLD INSULATION
 ENVIRONMENT FRIENDLY	 SOLVENT RESISTANT	 SAVES ENERGY	 EXCLUSIVE RANGE
 TRAINED & CERTIFIED FABRICATORS	 COMPLEMENTING HARDWARE	 GLOBAL BRAND	 QUICK DELIVERY

FIXATION SYSTEM

ADHESIVE FIXATION SYSTEM



RIVET FIXATION SYSTEM



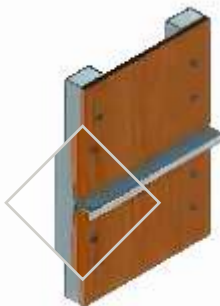
OTHER FIXATIONS



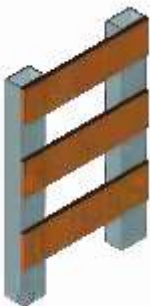
UNDERCUT
CONCEALED
FIXATION



H-CLIP
CONCEALED
FIXATION



RAINWATER
DRAINAGE
FIXATION



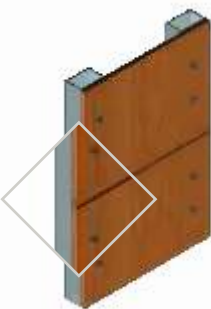
DUCT CLADDING



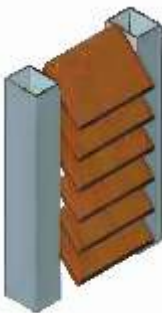
UNDERCUT CONCEALED
FIXATION WITH JOINT
CONNECTOR



OVERLAP FIXATION



SHIPLAP FIXATION



LOUVRE CLADDING

COMPARISON

Point of Comparison	ACPs	MAKERS Exterior
Decors	Defined 30 decors	Defined over 300 decors
Range	Plain colors and few designs	Not only plain colors are available, but a very wide color range. Also available in wood grain decors, stone finishes.
Features	One sided and batch to shade variation is a possibility	Both side design paper minimizes wastage.
Scratch Resistance	Prone to scratches	Not only scratch resistant, but nearly scratch proof.
Impact Resistance	Takes dents and easily visible	Double hardened and will take no dents and can be used for high rise buildings as well.
Maintenance	Can be cleaned	Comparably easier to clean because of the surface finish
Solvent Resistance	Reacts to certain Acids / solvents	Special grade and can be used as laboratory furniture too
Raw Material	Aluminum foil with polyurethane. Most of the times recycled plastic is used.	Use of UV protection film, decorative paper on top and kraft paper at the bottom, the core is impregnated with different synthetic resins.
Insulation	Aluminum is normally a conducting material and deters only because of Polyurethane film inside	Very good insulating material
Structure	Installed on lighter substructure	Installed on heavier substructure hence more durable and stable
UV	Being metallic, it tends to lose its shine	Optimal light fastness
Weather Resistant	Since foil is on the two sides and Polyurethane film used as sandwich, if not properly bonded, it may get loose	Material is compressed into one layer and it is extremely weather resistant
Environment	—	Environment friendly as it consists of natural fibers and synthetic resins. Panels do not contain organic halogen (chlorine, fluorine, bromine, etc.) compounds, such as they occur in propellant gases or PVC. They contain neither asbestos nor wood preservatives (fungicide, pesticide, etc.) and are free of heavy metals. The precisely managed production processes have no negative effect of any kind on environment. Even with thermal disposal of waste, no environmental poisons such as Hydrochloric acid, organic chlorine compounds or dioxins can arise.
Bending	Bends and dents on light impact	Doesn't bend at all
Applications	Facades largely	Façade claddings, Rear ventilated facades, Balcony claddings, Partitions, railings, Fences, Attic claddings, Ceilings, Outdoor furniture, Public facilities, Playground facilities, Sports facilities, Sun protection, Awnings, Business entry portals, Functional constructions, etc.

APPLICATION



SOFFIT



PARAPET WALL



BALCONY



PARTITION WALL



PILLAR



BOUNDARY WALL



GATE

HANDLING AND LOGISTICS

Handle Compact Panels with care in order to not damage the edges and surface of high quality material. In spite of the excellent surface hardness and the protection film applied, the stack weight of the panel could be a possible cause of the damage. Therefore any form of dirt or dust between these panels must be avoided. Panels must be secured against slippages during the transportation. While loading and unloading, the panels must be lifted and not pushed or pulled over the edges.

Compact panels must be stacked horizontally on a flat and stable surface with supporting panels. These panels must lie completely flat on the surface and a cover plate should be kept on the stack. The top cover should be weighed down and must be wrapped by plastic.

These panels are to be stored in a closed room under normal climatic conditions to avoid excess humidity and heat. Appropriate distance should be maintained between each side of the panel.

It is advised to use protection like hand gloves during the handling and installation.



CARE & MAINTENANCE

MAKERS Exterior Laminates are durable, abrasion and impact resistant. They hardly require maintenance under normal use. However proper care makes them more durable to last longer.- Do not use any of the above mentioned products on gloss surface laminates.

- Do not use any sharp objects, chopper, hammer or slice directly on the surface.
- Do not expose the surface directly to hot cookware as well as prevent exposure to heat which may cause delamination of surface from original substrate.
- Do not use cleansing agents and steel wool for cleaning. Instead use natural detergent or cleansing agents. However for difficult stains soft nylon scrub in a circular motion may be used. If the stain still persists, baking soda paste with water can be used carefully and moderately. In some instances acetone (nail polish remover) denatured alcohol or undiluted household bleach can also be used. Any stain as well as cleaning agents must be wiped immediately and should not be allowed to rest for more than two minutes.
- Do not use acid, alkalies, iodine, hair dye, hair tonic etc. which may cause discolouration and deterioration of the surface.
- Do not use any of the above mentioned products on gloss surface laminates.



STONE



88809 | TAUPE MARMI



A ravishing display of designs to enliven your spaces to spectacular grace.



88832 | VALONGO LIGHT



88833 | VALONGO DARK



PLAIN COLOR



81111 | SILVER GREY



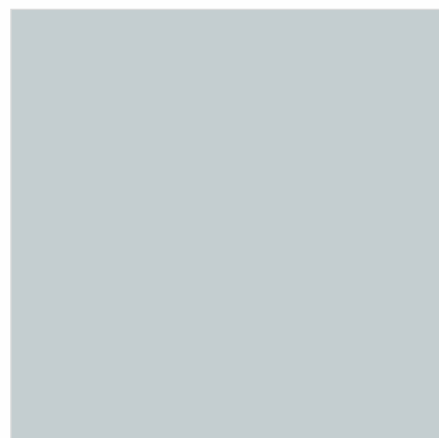
81110 | SLATE GREY



81151 | JADE BLACK



81113 | GOTHIC GREY



81101 | WHITE



81102 | OFF WHITE



81108 | IVORY



81184 | BEIGE



81181 | TAUPE



81182 | DEER



81135 | BRIGHT RED

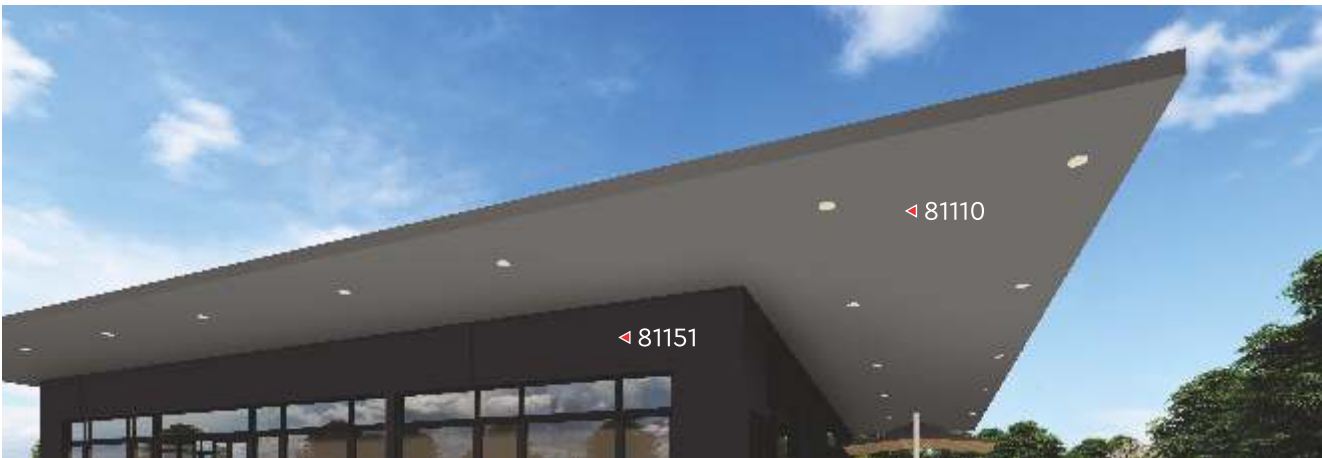


Trending and classy, each pattern is all that you need for an exuberant appeal.

14

15

EXT
ERI
OR



WOOD



88840 | YALTA CHERRY



Stunning variety of laminate textures for spaces that exude a spellbound impact of elegance.



88802 | GRENADA PINE



88801 | ONTARIO RICH



WOOD

Uber chic realm of beautiful textures that elevate your decors to another level of enchanting appearances.



88835 | CATANIA EICHE



88834 | CATANIA OAK



88836 | CANYON MONUMENT OAK



88837 | NOCE LYON



WOOD



88817 | MONUMENT OAK



Versatile surfaces to give your ambiance an upstyle look that suits your style.



88804 | ISTANBUL WALNUT LIGHT



88803 | ISTANBUL WALNUT DARK



WOOD

Niche patterns of sophisticated style that look brilliant and add flamboyance to your ambiance..



88843 | SALVADOR_OAK



88841 | LOME CHERRY



88838 | BORNHOLM ASH



88839 | BORNHOLM ESCHÉ



WOOD



88808 | DELANO OAK BROWN



88807 | DELANO OAK LIGHT



WARRANTY FOR EXT-LAM

10 *Years*
WARRANTY
BEST QUALITY | PREMIUM PRODUCT

- MAKERS Exterior product offering Exterior grade compact panel endorses & confirm to EN-438-6 provided for a Limited warranty period of 10 Years.
- This warranty covers on products for any Delamination in panel.
- Slight loss of brightness or homogeneous variation in color occurring during course of time in use is acceptable as per EN-438-6 Std.
- The warranty is evoked with immediate effect on the sale of the products to the first consumers, purchaser whose name & details are mentioned in the invoice. The warranty on our products is non-transferable. These terms of warranty shall be deemed to have accepted upon purchase of product by first consumer purchaser.
- Our warranty shall not cover any damage or deviation from the Std 438-6 upon normal wear and tear or in the event products are spoiled as a result of misuse, mishandling, neglect, accident, improper application, extreme temperature, improper fabrication leading to deformation, installation, improper maintenance. This warranty shall be void subject to other terms & conditions contained herein, upon non-production of the original warranty documents.
- MAKERS Exterior shall have the sole & absolute right to determine the reason for such damage or deviation. We shall have the right to inspect our supplied any products claimed as a defective product at the buyer's premises, or require the buyer to return the product to us only if such products are proven to be defective and not confirming to std EN-438-6, as covered by this warranty. And are returned within the warranty period stated above. In case of any claims, quarrels, the obligation of MAKERS Exterior to purchaser/buyer under this warranty is, however, limited to the repair/servicing/replace of the unit only when the product is returned back to the retailer upon forwarding original warranty documents with the invoice copy.
- Our Authorized dealers are our mutual partner in supporting the warranty requests. The company MAKERS Exterior shall not entertain any direct claim/service.
- To obtain service under this warranty, please contact our authorized Dealers.
- *The jurisdiction in respect of this warranty or incidental matters thereof shall be exclusively at Ajmer only.
- **Slight Deformation/Warping is excluded for modified/customize/Altered Product offerings under this warranty.

TECHNICAL SPECIFICATIONS

ACHIEVEMENTS :



MANAGEMENT
SYSTEM
CERTIFICATION

PROPERTIES		UNITS	TEST METHOD AS PER EN 438 PART 2 & 4 : 2016	SPECIFIED VALUES AS IN EN 438 PART 6:2016	TYPICAL MAKERS RESULT
Classification		EN 438-6-4		EXTERIOR, SEVERE USE FLAME RETARDANT GRADE, EDF	
PHYSICAL & DIMENSIONAL PROPERTIES					
Nominal Thickness			mm	6.0	
Thickness Variation		EN 438-2-5	mm	6.0 ± 0.40	6.0 ± 0.30
Length and width Variation		EN 438-2-6	mm	+10mm / -0mm	+5mm / -0mm
Edges Straightness		EN 438-2-7	mm/M	1.5 (max)	≤ 1
Edges Swuareness		EN 438-2-8	mm/M	1.5 (max)	Complies
Flatness		EN 438-2-9	mm/M	5.0 (max)	Complies
Density		EN ISO 1183-1:2004	g/cm³	1.35	1.38
Dimensional Stability at Elevated Temperature		EN 438-2-17			
Longitudinal Direction			%	0.30 (max)	0.18
Transverse Direction			%	0.60 (max)	0.38
MECHANICAL PROPERTIES					
Resistance to wet conditions,		EN 438-2 : 15			
Increase in mass			%	8.0 (max)	4.1
Surface Rating			Rating	4 (min)	5
Edge Rating			Rating	3 (min)	3
Resistance to climatic shock		EN 438-2 : 19	Rating	Appearance -4 (min)	4
			Index	D-0.80 (min)	≥0.95
			Index	D-0.80 (min)	≥0.95
Resistance to Impact by Large Diameter Ball					
Drop Height		EN 438-2-22	mm	1800	2000
Diameter of Indentation			mm	10 (max)	7
Resistance to Crazing		EN 438-2-24	Class	Not Worse than 4	5
Flexural Strength		EN ISO 178:2003	Mpa	80 (min)	100
Flexural Modulus		EN ISO 178:2003	Mpa	9000 (min)	10700
Thermal Conductivity		EN 12524:2000	W/MSK	No Requirement	0.24
Resistance to Fixing (Srew pull out strength)		ISO 13894-1:P	N	2000 (min)	≥2000
SURFACE PROPERTIES					
Resistance to Scratching		EN 438-2-25	N	3.0 (min)	>3.0
Resistance to wet heat (100 C)		EN 438-2-18	Class	4 (min)	5
Resistance to Water Vapour		EN 438-2-14	Class	Not worse then 4	5
Resistance to Dry Heat at 160 C		EN 438-2-16	Class	Not worse then 4	5
Resistance to Surface Wear (Initial Point)		EN 438-2-10	Rev.	150 (min)	200
Resistance to staining		EN 438-2-26	Class		
Group 1 & 2				5	5
Group 3				4	>4
Resistance to UV Light after 1500 hours exposure		EN 438-2-28	Rating	Gery Scale Contrast-3 (min)	3-4
				Appearance-4 (min)	4-5
Resistance to artificial weathering including light fastness, after 650 M1/M2 Radiant exposure		EN 438-2-29	Rating	Gery Scale Contrast-3 (min)	3-4
				Appearance-4 (min)	4-5
FIRE PERFORMANCE					
Reaction to Fire		EN 13501-1	Euroclass	B-52,do	B-51,do
Calorific Value		ISO 1716:2010	MJ/kg	19.91 (max)	19.88
HEALTH CHARACTERISTICS					
Anti-bacterial Efficacy & activity		JIS 2801-2012			
% Reduction in 24 hours			%	95.0 (min)	99.99
Activity after 24 hours			Log Reduction	2.0 (min)	Exceeds
Anti-Fungus Efficacy		ASTM G-21-2015			
Growth after 28 days			Class	1	0 (No Growth)



88802 | GRENADA PINE

ACTUAL SAMPLE (6MM THICKNESS)