

Dal 1992 CEL produce pannelli sandwich e alveolari in diversi materiali, realizzati secondo le esigenze dei clienti.

ANIME ALVEOLARI E SCHIUME

- ALLUMINIO ALVEOLARE: leggero, resistente alla compressione, al taglio, alla corrosione incombustibile e riciclabile.
- ALVEOLARI TERMOPLASTICI IN POLICARBONATO PC, POLIPROPILENE PP, POLIETERIMIDE PEI: sono maneggevoli e consentono di realizzare pannelli leggeri, economici e resistenti agli agenti chimici ed atmosferici, fonoisolanti, termoisolanti, antiurto, radar trasparenti.
- CARTA ARAMIDICA (Nomex®) ALVEOLARE: leggero, resistente alle alte temperature.
- SCHIUME IN PVC, PMI, PET: resistenti alla compressione, con ottimo rapporto prestazioni/peso, non assorbono acqua e sono ottimi isolanti termici.

PANNELLI SANDWICH COMPOCEL

L'utilizzo delle lastre alveolari o delle schiume, come anima, permette la produzione di pannelli che integrano in un unico materiale varie funzioni: leggerezza, rigidità, resistenza agli urti, al fuoco ed agli agenti atmosferici e chimici, isolamento termico ed acustico.

PANNELLI SANDWICH ALUSTEP

Pannelli realizzati con differenti anime alveolari e stuoie in fibra di vetro impregnate con resina epossidica o fenolica utilizzati come supporto di marmi e pietre semi-preziose.
 Permettono di limitare lo spessore della pietra, rinforzando la struttura che rimane egualmente molto leggera.

PANNELLI FLOOR

Pannelli con una pelle antiscivolo su un lato utilizzati per rampe, ascensori, sale macchine, locali tecnici.

ADESIVI POLIURETANICI ED EPOSSIDICI BICOMPONENTI

Formulazione specifica per pannelli honeycomb.

Certificazioni al fuoco				
Pannelli e alveolari	Tipo	Norma	Settore	Certificazione/ Classe
Alluminio alveolare, CompoCEL AL (FR), Alustep F, Alustep FN	Propagazione di fiamma	IMO MED FTP Code 2010	Nautica	Mod. B e D
CompoCEL AL (FR)	Fumi, sgocciolamento, potere calorifico	UNI EN 13501-1	Edilizia	Classe A2, B, BFL
Alluminio Alveolare	Fumi, sgocciolamento, potere calorifico	UNI EN 13501-1	Edilizia	Classe A1
CompoCEL AL (FR)	Pavimenti, paratie interiors, soffitti, R1, R2, R10	UNI EN 45545-4	Ferrovuario	HL3
Alustep F ed FN	Paratie interiors, soffitti, R1, R2	UNI EN 45545-4	Ferrovuario	HL2
Alustep F ed FN	Pavimenti, R10	UNI EN 45545-4	Ferrovuario	HL3
CompoCEL AL (FR)	Bassa propagazione	NFP 92-507	Edilizia	M1
Alluminio alveolare	Incombustibilità	NFP 92-507	Edilizia	M0

Since 1992 CEL has been producing sandwich panels and honeycombs, realized according to our customers' specifications.

HONEYCOMBS AND FOAMS

- ALUMINIUM HONEYCOMB: lightweight, shear-, compression-, corrosion- and fire-resistant and recyclable material.
- POLYCARBONATE, POLYPROPYLENE, POLYETHERIMIDE HONEYCOMBS: these thermoplastic materials are handy, lightweight, cost effective, resistant to chemicals, recyclable, sound- and heat-insulating, shock proof.
- ARAMID PAPER HONEYCOMB (Nomex®): resistant to high temperatures, and it is also used in corrosion sensitive applications.
- PVC, PMI and PET FOAMS: resistant to compression and they offer optimal stiffness-to-weight-ratio. They are waterproof and very good heat-insulating materials.

COMPOCEL SANDWICH PANELS

Honeycombs and foams are used as core materials for sandwich panels. The main characteristics of these panels are: lightweight, rigidity; shocks-, fatigue-, weather-, chemicals- and fire resistance thermal and acoustic isolation.

SANDWICH PANELS -STEP SERIES

These sandwich panels have different core materials bonded with fibreglass impregnated with epoxy or phenolic resin. Their application permits huge savings as far as weight and thickness of slabs are concerned, therefore logistics and installation costs can be significantly reduced.

FLOOR SANDWICH PANELS

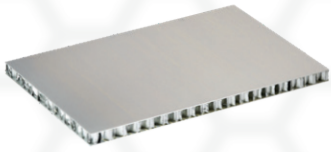
These panels have an antiskid surface on one side used as flooring for ramps, lifts, engine rooms and for all application where antiskid properties are required.

TWO COMPONENTS POLYURETHANE ADHESIVE

They have been formulated for honeycomb panels specifically.

Fire Certifications				
Sandwich panels and honeycombs	Type	Norm	Sector	Certification/ Class
Aluminium honeycomb, CompoCEL AL (FR), Alustep F, Alustep FN	Low Flame Spread	IMO MED FTP Code 2010	Shipbuilding	Mod. B and D
CompoCEL AL (FR)	Fumes, droplets and calorific value	UNI EN 13501-1	Building	Class A2, B, BFL
Aluminium honeycomb	Fumes, droplets and calorific value	UNI EN 13501-1	Building	A1
CompoCEL AL (FR)	Floors, separating walls, ceilings, R1, R2, R10	UNI EN 45545-2	Railway	HL3
Alustep F and FN	Separating walls, Ceilings, R1, R2	UNI EN 45545-2	Railway	HL2
Alustep F and FN	Floors, R10	UNI EN 45545-2	Railway	HL3
CompoCEL AL (FR)	Low flame spread	NFP 92-507	Building	M1
Aluminium honeycomb	No-combustibility	NFP 92-507	Building	M0

PANNELLI SANDWICH CON ANIMA IN ALLUMINIO / SANDWICH PANELS WITH ALUMINIUM HONEYCOMB CORE



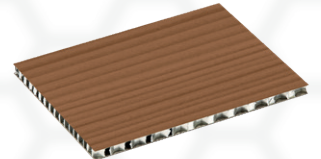
COMPOCEL AL (FR) 
Pelli: alluminio.
Skins: aluminium.



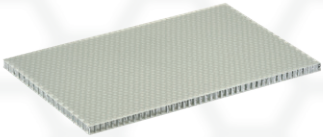
COMPOCEL H
Pelli: laminato plastico.
Skins: high pressure laminate.



COMPOCEL W
Pelli: compensato marino.
Skins: plywood.



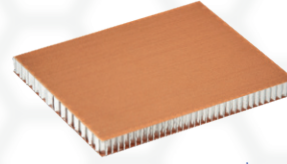
COMPOCEL ALH
Pelli: laminato plastico decorativo.
Skins: decorative laminate.




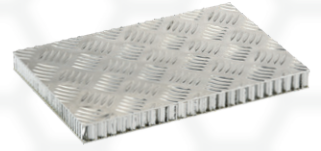
ALUSTEP 300 LIGHT
Pelli: fibra di vetro impregnata con resina epossidica.
Skins: fibreglass impregnated with epoxy resin.



ALUSTEP 500
Pelli: fibra di vetro impregnata con resina epossidica.
Skins: fibreglass impregnated with epoxy resin.

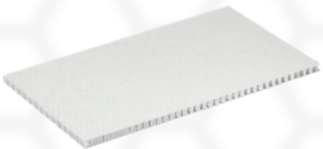


ALUSTEP F 
Pelli: fibra di vetro impregnata con resina fenolica.
Skins: fibreglass impregnated with phenolic resin.



COMPOCEL FLOOR ALURIS 
COMPOCEL FLOOR ALUMAN
Pelle superiore:
in alluminio mandorlato o grana di riso.
Pelle inferiore: in lamiera grezza.
Upper skin: antiskid/anti-slip coatings.
Lower skin: raw aluminium.

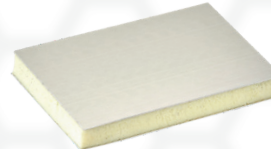
PANNELLI SANDWICH CON ANIMA IN POLIPROPILENE SANDWICH PANELS WITH POLYPROPYLENE HONEYCOMB CORE



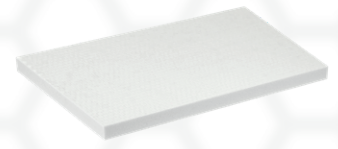
CLEARSTEP
Pelli: fibra di vetro impregnata con resina epossidica.
Skins: fibreglass impregnated with epoxy resin.



COMPOCEL WP
Pelli: compensato marino.
Skins: plywood.




COMPOCEL ALF
Pelli: alluminio.
Skins: aluminium.



CLEARPET
Pelli: fibra di vetro impregnata con resina epossidica.
Skins: fibreglass impregnated with epoxy resin.

PANNELLI SANDWICH CON ANIMA IN CARTA ARAMIDICA SANDWICH PANELS WITH CORE IN ARAMID PAPER HONEYCOMB



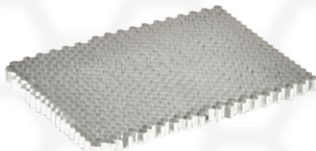
ALUSTEP FN 
Pelli: fibra di vetro impregnata con resina fenolica.
Skins: fibreglass impregnated with phenolic resin.



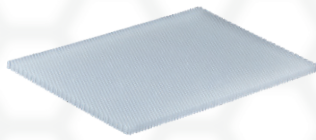
ADESIVI POLIURETANICI ED EPOSSIDICI BICOMPONENTI TWO-COMPONENTS POLYURETHANE AND EPOXY ADHESIVES

Resistenti all'umidità ed alle intemperie. Ottime proprietà adesive.
Humidity and weather resistant.
Strong bonding.

ANIME ALVEOLARI E SCHIUME / HONEYCOMB CORES AND FOAMS



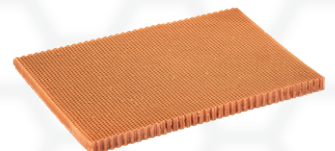
ALLUMINIO
ALUMINIUM



POLICARBONATO
POLYCARBONATE



POLIPROPILENE
POLYPROPYLENE



CARTA ARAMIDICA
ARAMID PAPER



PVC - PET
PVC - PET



PMI
PMI