BEMO PERFORATED FACADES

ECONOMIC AND
SUSTAINABLE
BUILDING ENVELOPES

WÄSCHEKRONE | LAICHINGEN | GERMANY
Architecture: Ott Architekten Laichingen
Product: Standing seam perforated
Photo: Walter G. Allgöwer / vor-ort-foto.de

BEMO FAÇADE SYSTEMS – EXCEPTIONALLY DIVERSE

As the industry's innovation leader with unique planning and production solutions, we are number 1 for very complex free form projects. Think freely, design freely, plan freely! These are the BEMO principles. The variety of our durable material and colour selection is unparalleled, just as the possibility of designing any optional shapes for our roofs and façades.

With BEMO, you have a competent partner by your side from the planning phase. The economic feasibility and cost-efficiency of the project are taken into consideration from the start. BEMO uses patented production processes to shape the metal surfaces with almost infinite variability. The materials are sustainable and can still be recycled decades from now.

BEMO-BOND: Aluminium composite panels are ideal for highest-quality façade designs. Perforated panels with integrated backlit elements, letterings, coats of arms or logos – the possibilities provided by BEMO-BOND composite panels are almost limitless.

BEMO standing seam: The BEMO standing seam profile meets the most stringent building physics and acoustic requirements. It adapts to almost any building shape. The visual design variety is almost limitless due to free profile shape, free choice of metal, surface and colour.

BEMO trapezoidal profile: BEMO trapezoidal profiles are particularly suitable for cladding cassette systems, direct mounting on substructures for cold halls and cladding for curtain-type rear-ventilated façades.

BEMO corrugated profiles: Corrugated profiles are an attractive and sustainable façade solution, especially in residential construction, but also in commercial and industrial buildings.

BEMO-SOLID: Aluminium panels made of 3.00 mm or 4.00 mm solid material combine a variety of properties that make the design almost limitless. Countless possibilities of perforation or engraving as well as different colour coatings and anodizing are also feasible for smaller areas. By using non-combustible materials, the construction can also be carried out in A1.

All our BEMO façade products are also available in perforated design.

WHY BEMO?

- ECONOMIC FEASIBILITY AND COST-EFFICIENCY SUPPORT IN PLANNING
- SUSTAINABLE, DURABLE AND RECYCLABLE SYSTEMS
- SIMPLE AND QUICK INSTALLATION
- VERY LARGE PROFILE LENGTHS POSSIBLE WITHOUT TRANSVERSE JOINTS
- NON-PENETRATING ROOF ACCESSORIES

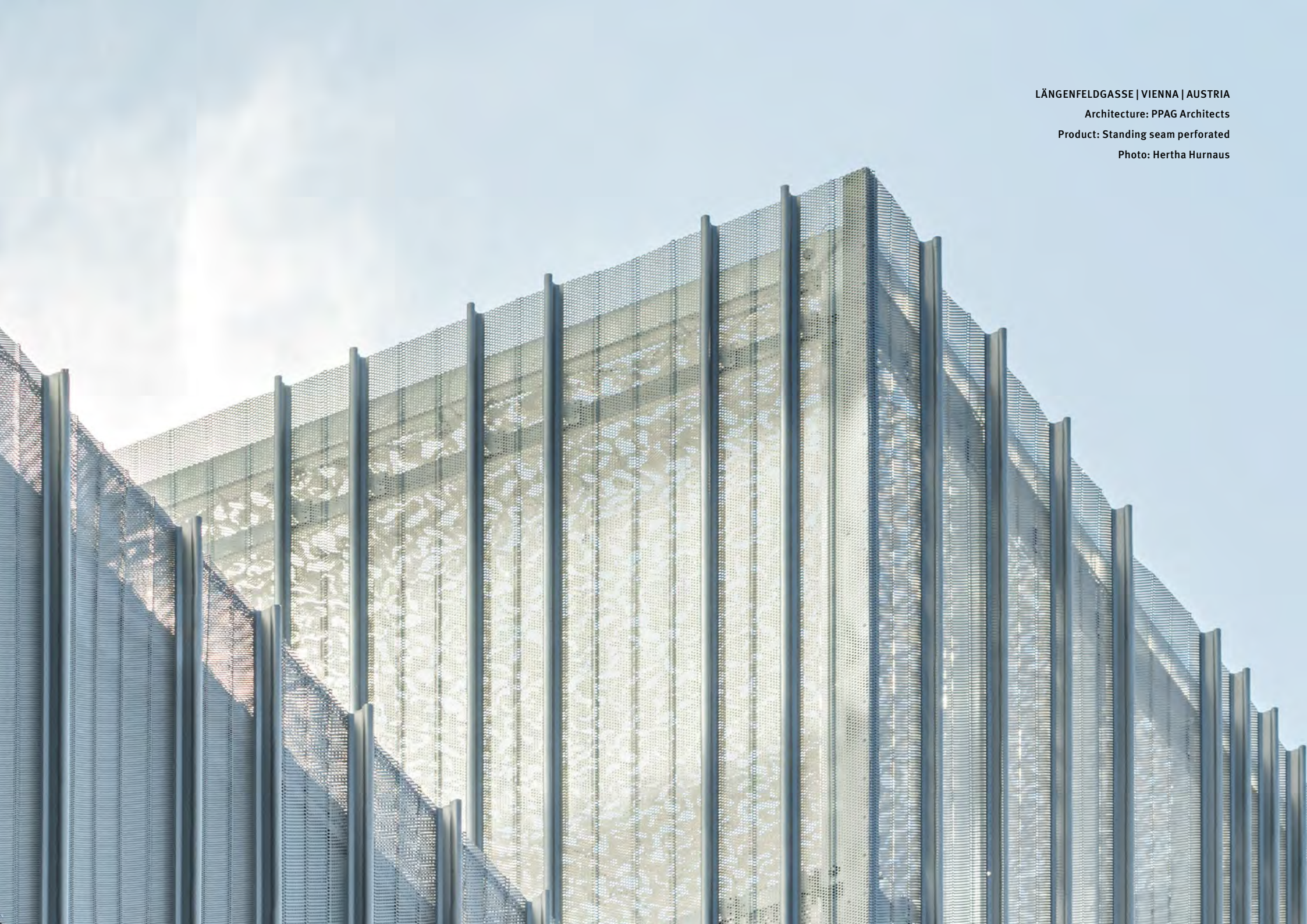
A DIFFERENT KIND OF FAÇADE –
THE PLAY OF LIGHT AND SHADE

The areas of application and design possibilities of our perforated façade products are almost unlimited – they are suitable for an exciting design or energy-saving shading solution on exterior façades, for extraordinary lighting effects or acoustic measures inside buildings. The profile variants are ideally suited for individual and unique design options both interior and exterior.

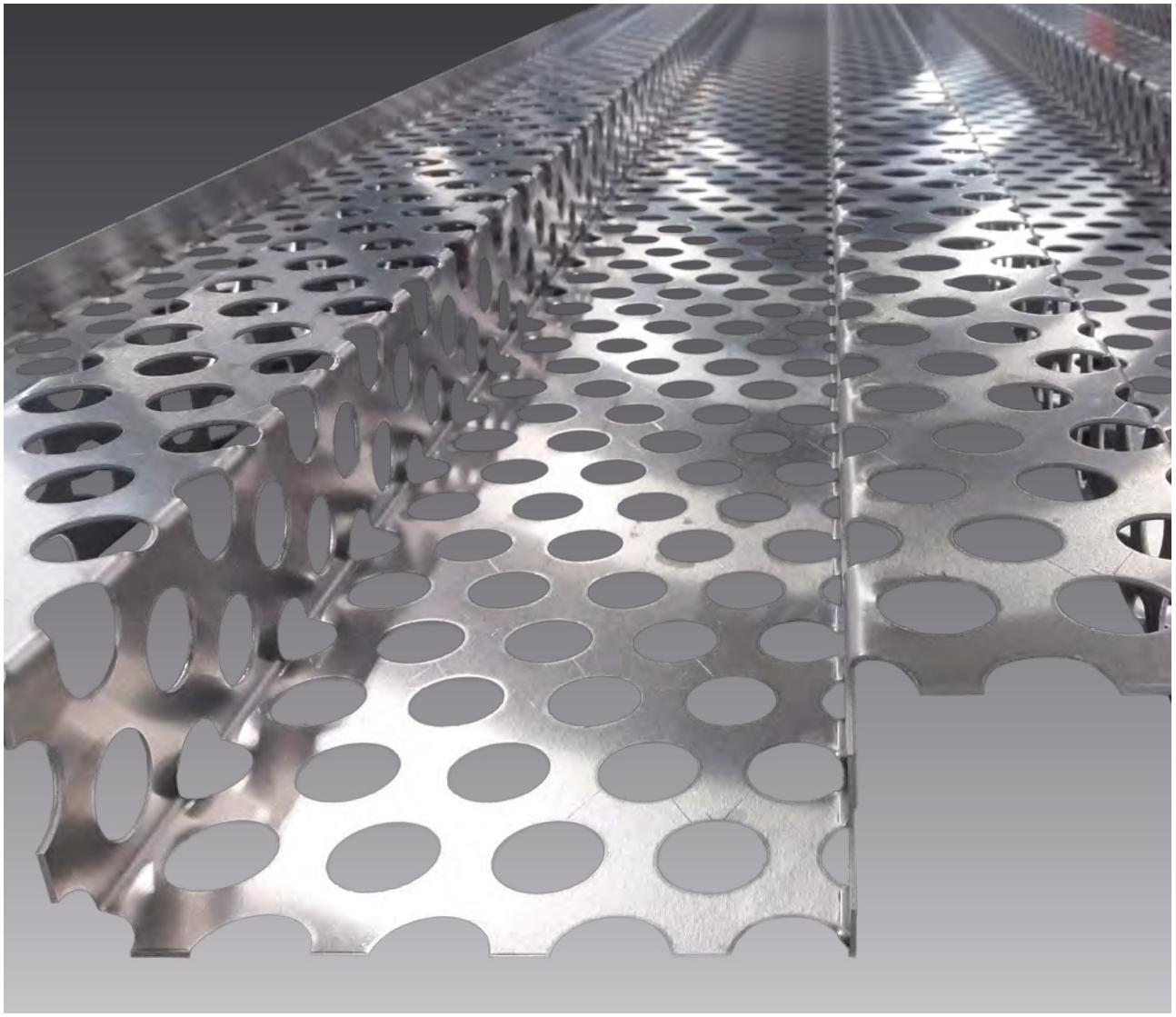
With perforated façade profiles made of high-quality aluminium, a wide range of perforation patterns is available for standing seam and corrugated profiles, façade panels and façade composite panels. The options for the perforation depend on the static requirements – we will be happy to advise you on this topic. These countless possibilities of material, colour and profile geometries allow unique overall designs to be combined.

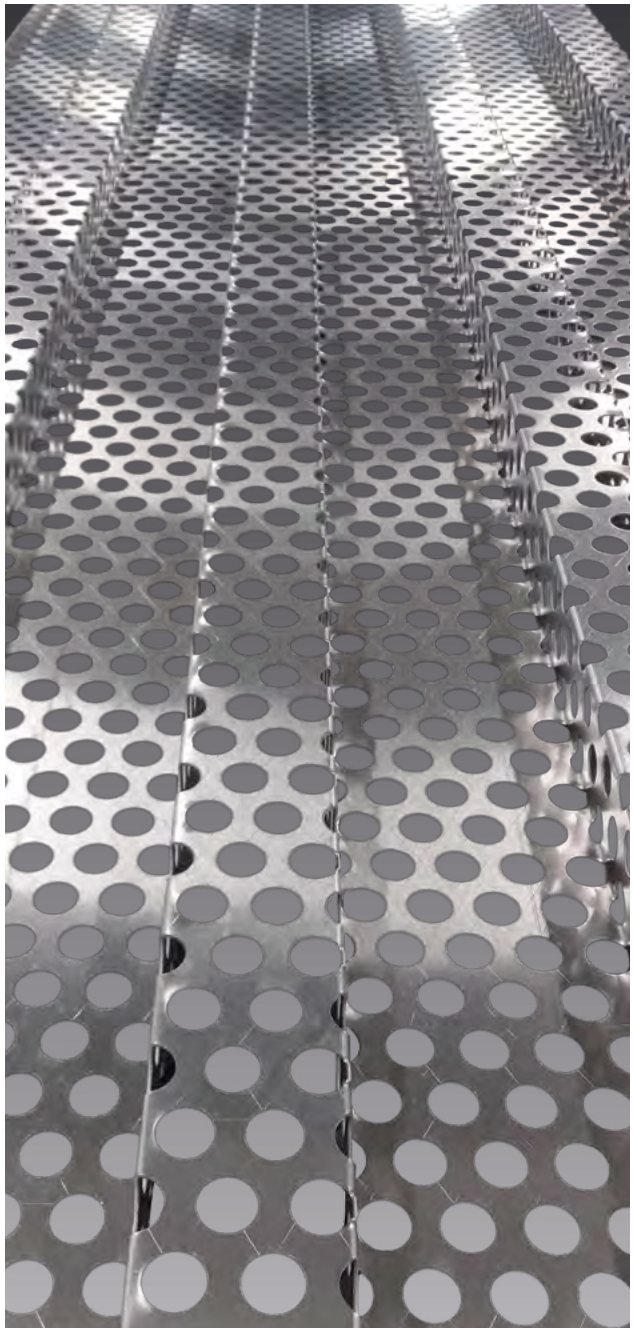
Façades with perforated profiles change with the incidence of light, the position of the sun or special lighting. Rear lighting as a stylistic device can additionally emphasise the characteristics of your transparent façade.

There are almost no limits to façade design with BEMO. Develop your unique façade together with BEMO.



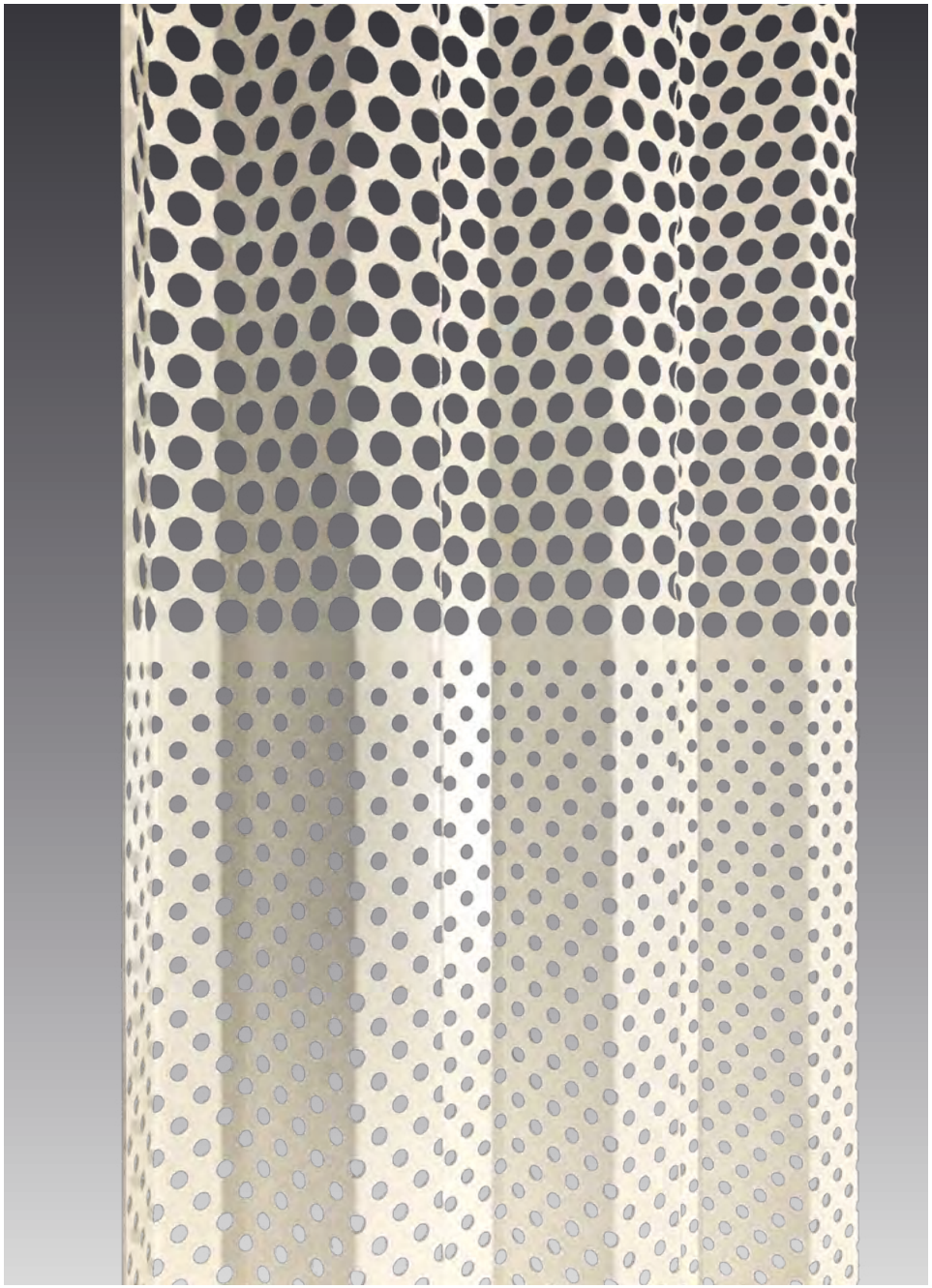
LÄNGENFELDGASSE | VIENNA | AUSTRIA
Architecture: PPAG Architects
Product: Standing seam perforated
Photo: Hertha Hurnaus





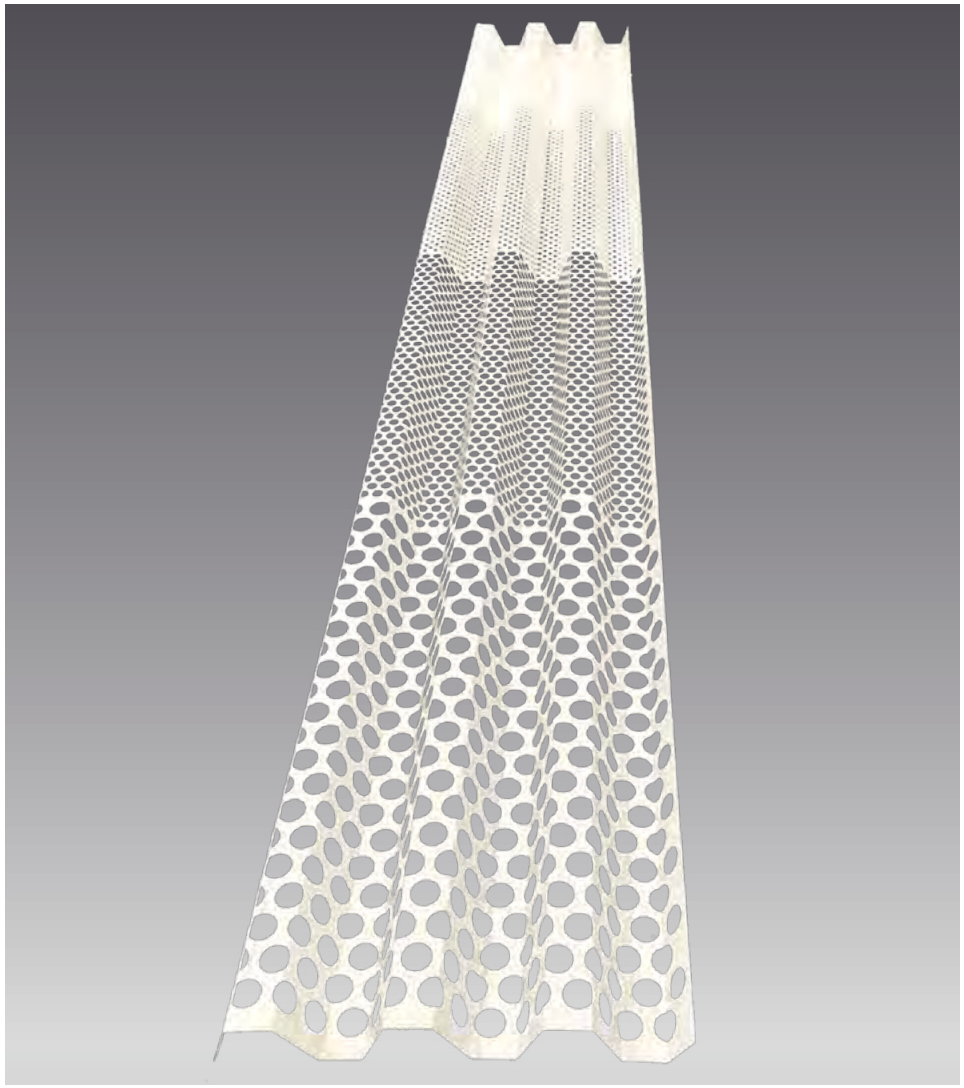
MEANDER PANELS, PERFORATED

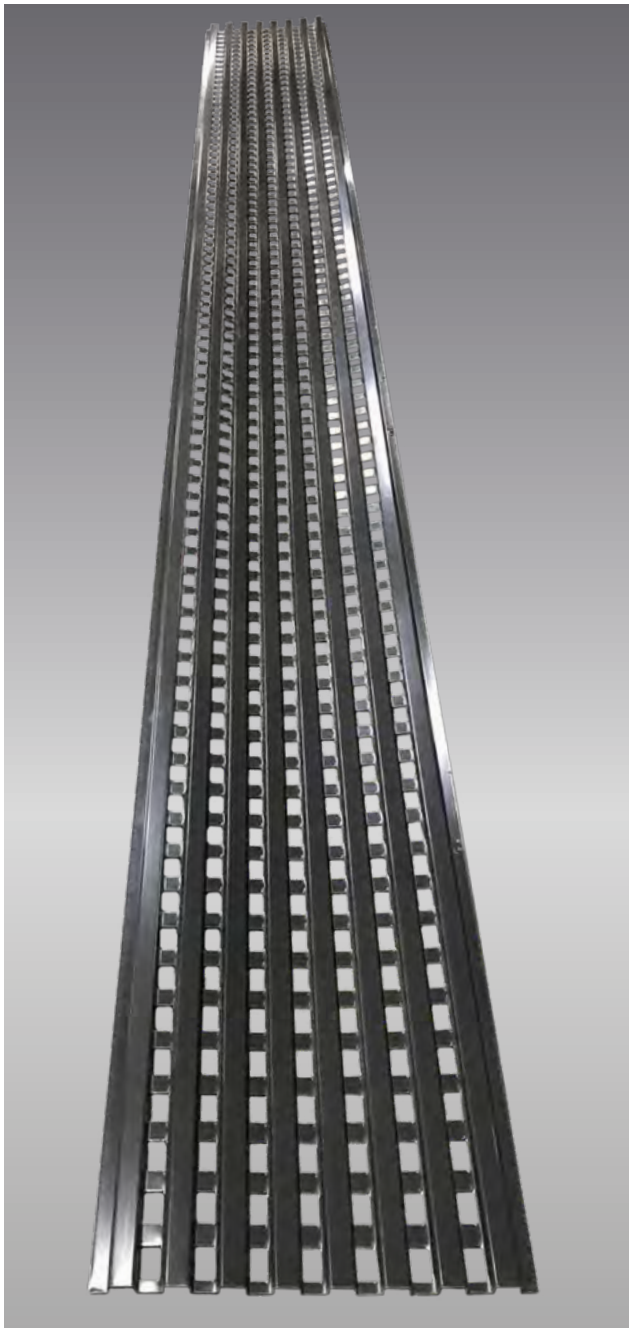
Material: Aluminium, 1.0 mm to 2.0 mm
Coatings: PE, PVDF, BEMO-FLON, BEMO-Protect
Perforations: according to customer requirements and agreement; primarily round holes
Lengths: up to 6,000 mm

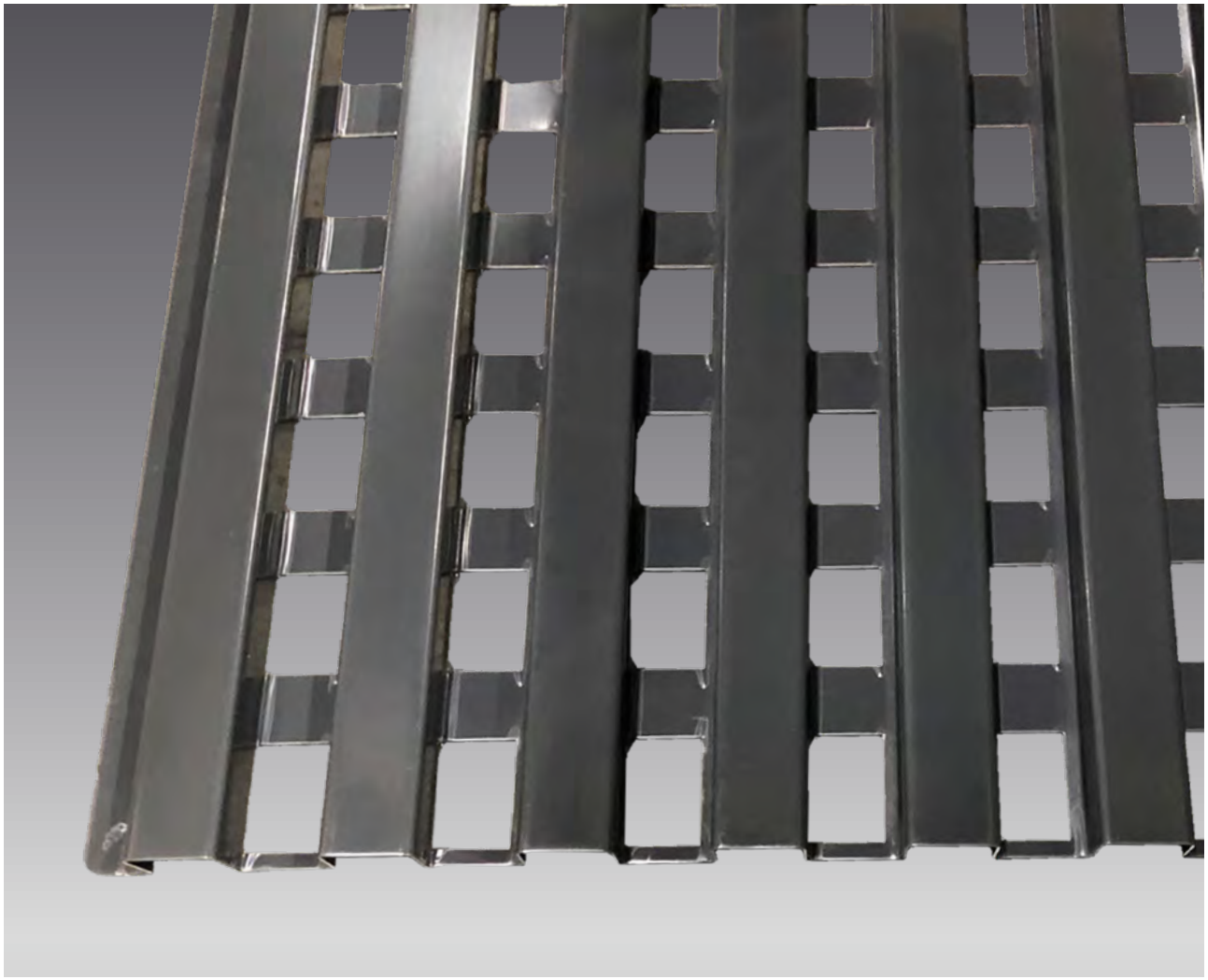


SPECIAL PANELS, PERFORATED

Material: Aluminium, 1.0 mm to 2.0 mm
Coatings: PE, PVDF, BEMO-FLON, BEMO-Protect
Perforations: according to customer requirements and agreement; primarily round holes
Geometries and design according to customer and architect requirements
Lengths: up to 6,000 mm







PERFORATED SPECIAL PANELS FOR RAILINGS, CLADDING AND SPECIAL SOLUTIONS

Material: Aluminium, 1.0 mm to 2.0 mm

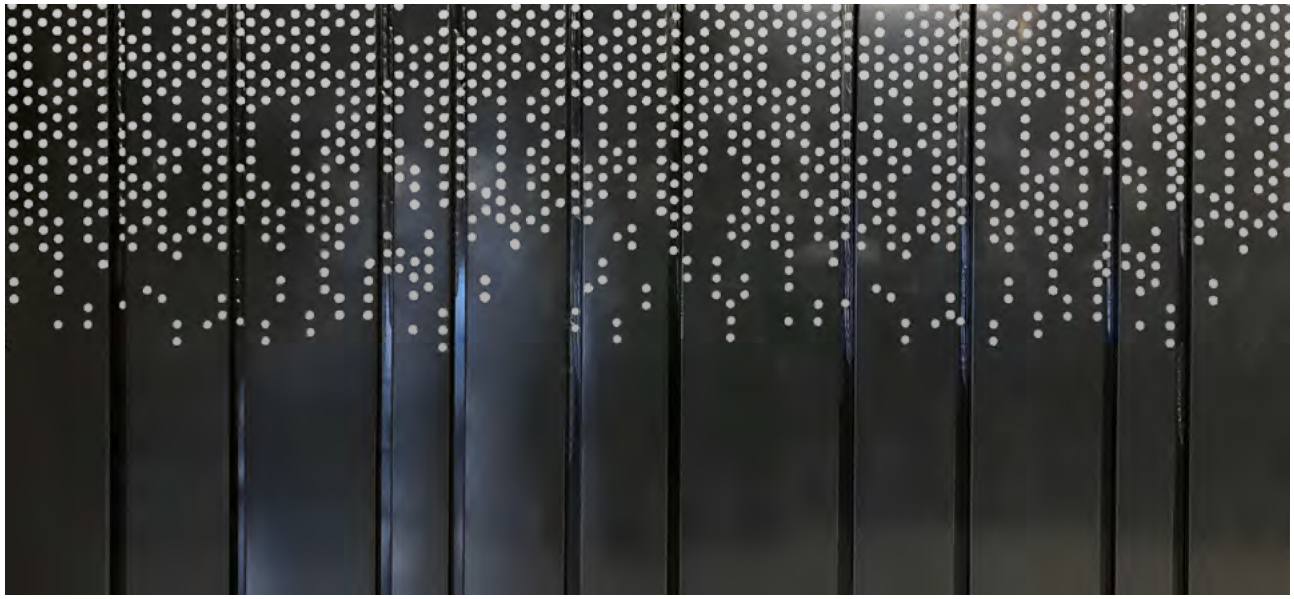
Coatings: PE, PVDF, BEMO-FLON, BEMO-Protect

Perforations: according to customer requirements and agreement; primarily square holes
Geometries and design according to customer and architect requirements

Lengths: up to 6,000 mm

DESIGN SERIES WITH SPECIAL PERFORATIONS

Material: Aluminium, 1.0 mm to 1.5 mm
Coatings: PE, PVDF, BEMO-FLON, BEMO-Protect
Geometries and design according to customer and architect requirements
Lengths: up to 6,000 mm
Perforations: on request

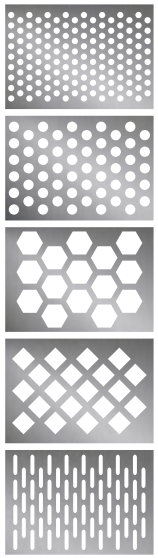


LARGE SPANS AND MAXIMUM PERFORATION –
PERFECT FAÇADES FOR CAR PARKS AND STAIRCASES

Large spans can be easily bridged with perforated BEMO standing seam profiles. The great advantage lies in the variety of possible combinations. The profile widths, material thickness, web heights and perforation patterns have an influence on the load-bearing capacity and the possible span. Thanks to the flexible combination options, perforated standing seam profiles offer maximum freedom in the design of the façade.

Perforated BEMO standing seam profiles are perfect for the façades of multi-storey car parks. Standing seam profiles are only fixed in the storey area and then span up to 2.80 m without any problems. Pre-assembled and adjustable substructure systems ideally complement the perforated standing seam profiles. Simple, fast and economical. The large-scale smoke extraction possibility offers a clear advantage here. Thus, perforated profiles have a positive influence on fire protection in multi-storey construction. In addition, fully insulated cassette solutions incl. perforated inner shells can contribute to the acoustics in a multi-storey car park.

PROFILES	MATERIAL THICKNESSES	AVAILABLE SPANS*	POSSIBLE PERFORATIONS ON THE PANELS
65 – 250	1.0 – 1.2 mm	2.5 – 3.0 m	Round holes, parallel or offset, squares, oblong holes and hexagonal holes are possible
65 – 305	1.0 – 1.2 mm	2.5 – 3.0 m	
65 – 333	1.0 – 1.2 mm	2.5 – 3.0 m	
65 – 350	1.0 – 1.2 mm	2.2 – 2.7 m	
65 – 400	1.0 – 1.2 mm	2.0 – 2.7 m	
65 – 500	1.0 – 1.2 mm	1.8 – 2.2 m	
65 – 600	1.0 – 1.2 mm	1.8 – 2.2 m	
50 – 250	1.0 – 1.2 mm	2.3 – 2.8 m	
50 – 300	1.0 – 1.2 mm	2.3 – 2.8 m	
50 – 333	1.0 – 1.2 mm	2.1 – 2.5 m	
50 – 400	1.0 – 1.2 mm	2.1 – 2.5 m	
50 – 429	1.0 – 1.2 mm	1.8 – 2.2 m	
50 – 500	1.0 – 1.2 mm	1.6 – 2.2 m	



* exact spans according to statics / Note: other profiles on request.

COTRA AIRPORT-CAR-CENTER | RUEMLANG | GERMANY

Photo: www.cotra.ch

MULTI-STOREY CAR PARK | ZOFINGEN | SWITZERLAND

Product: BEMO-BOND INVISIO 6 mm with FR core
Material: Aluminium
Surface finish: golden BEMO-FLON coating

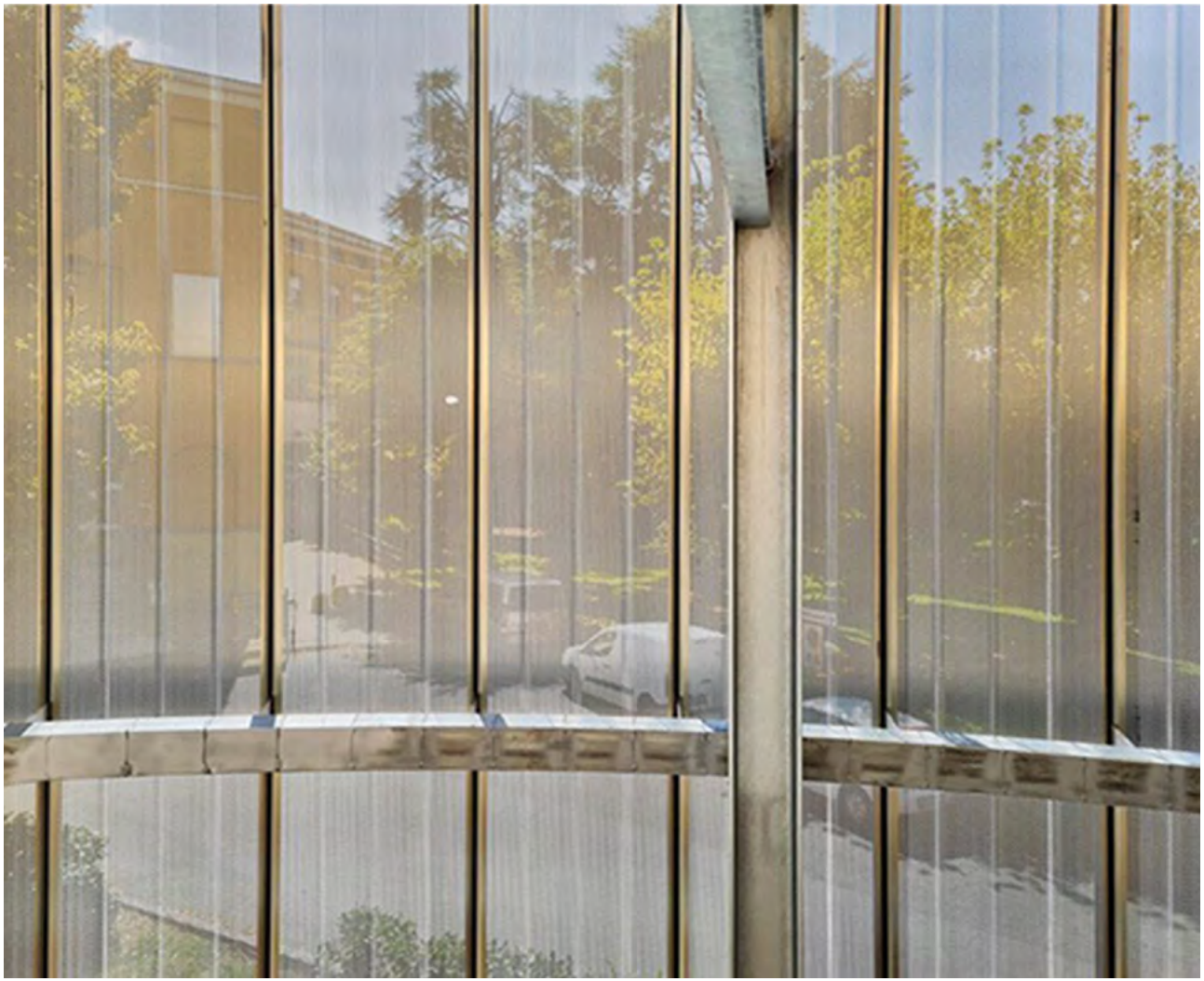

AUSFAHRT
EINFAHRT

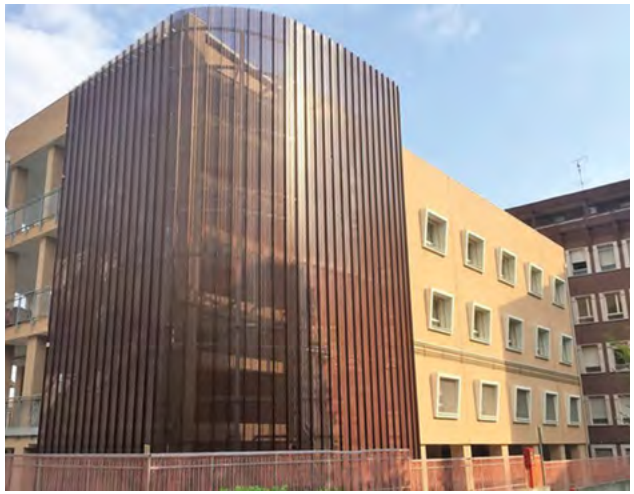
IBIS HOTEL | LANDSHUT | GERMANY

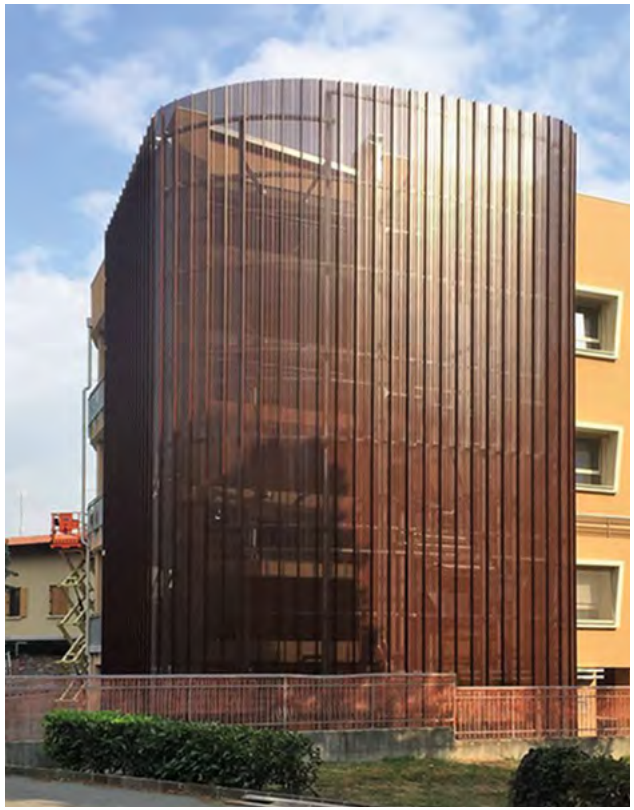
Architect: Hgs – Architektur + Energieberatung
Product: Standing seam, perforated
Material: Aluminium
Surface finish: RAL 7016

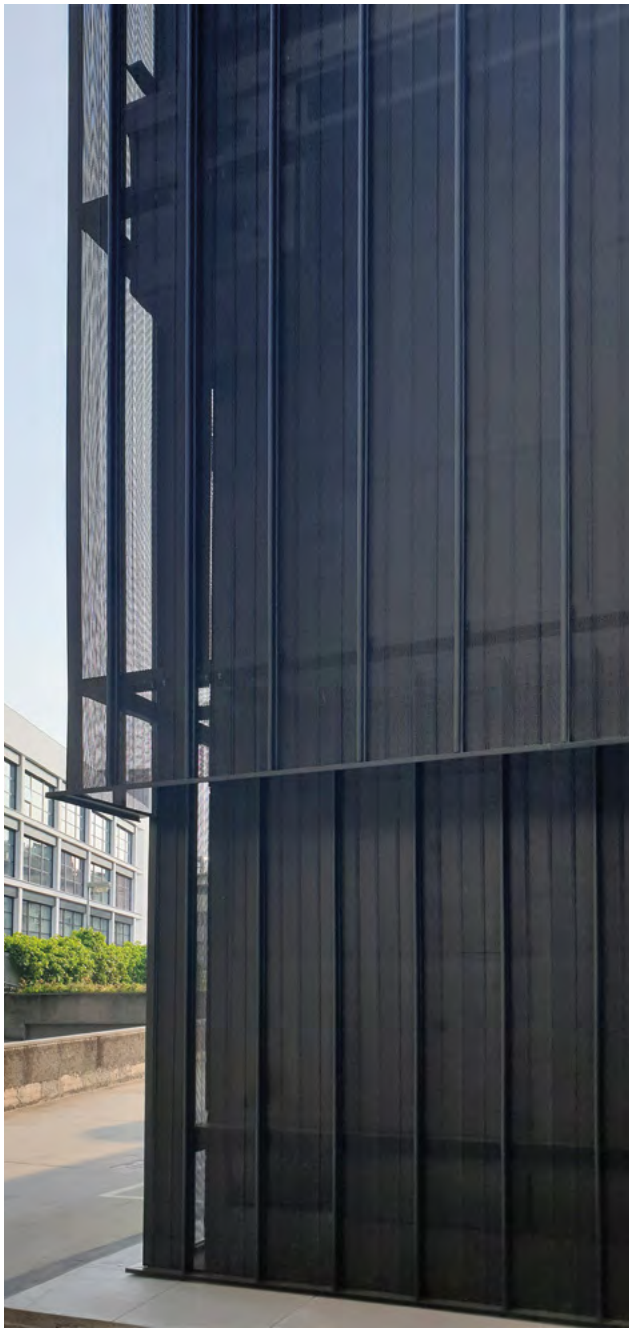
MANERBIO HOSPITAL | MANERBIO | ITALY

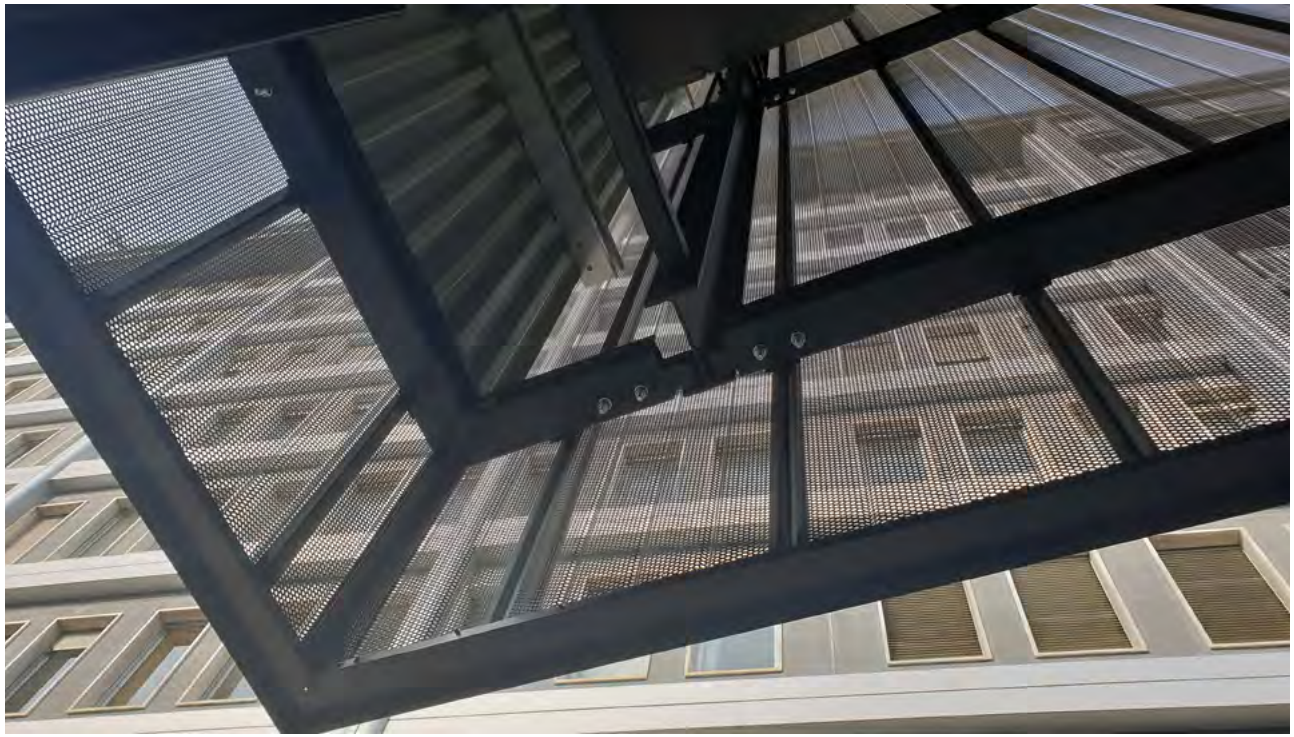
Architect: Ing. Enrico Fermi
Product: Micro-perforated façade with BEMO N 65 system
Material: Aluminium
Surface finish: RAL 8016 polyester coating
Special feature: Microperforated R3/5











GOLDEN GOOSE | MILANO | ITALY

Architects: “Golden Goose” in collaboration with Studio ML Architettura
Product: BEMO N 65/400 standing seam profile, micro-perforated
Material: Aluminium
Colour: Black similar to RAL 7021
Area: 3,000 m²

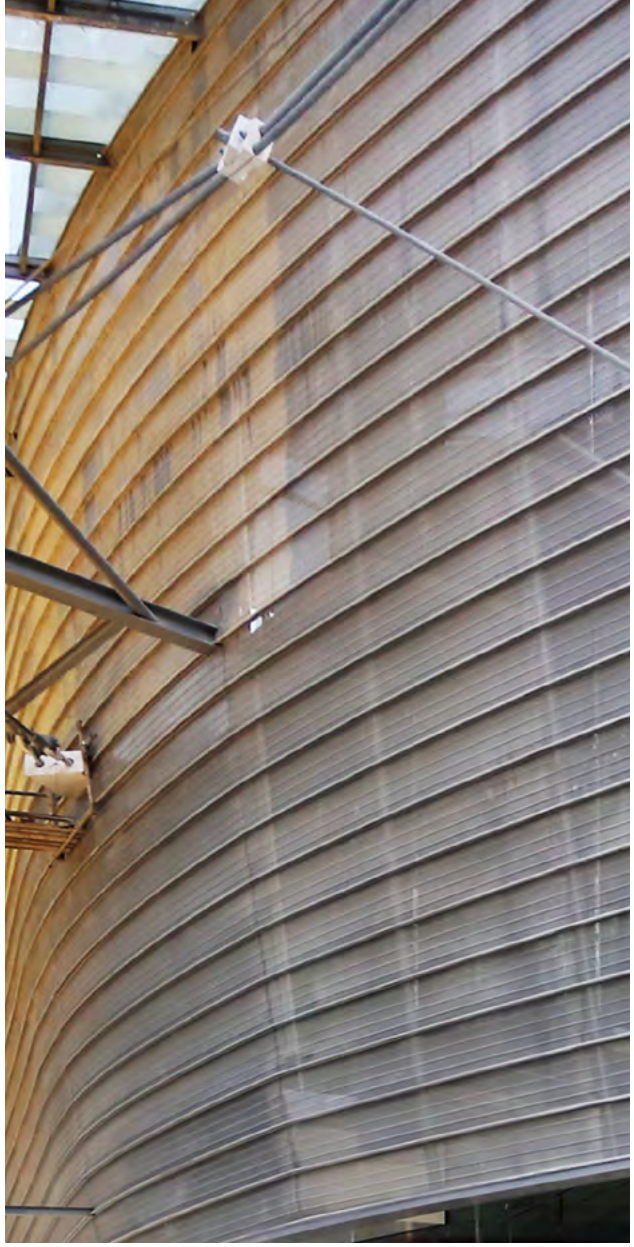


Photo: Petra Aluminium Company

ABDALI MALL | AMMAN | JORDANIEN

Architecture: Laceco Architects & Engineers
Product: Standing seam N65-400 conical, perforated, cambered

Material: Aluminium
Coatings: PVDF
Colour: sim. RAL 9007

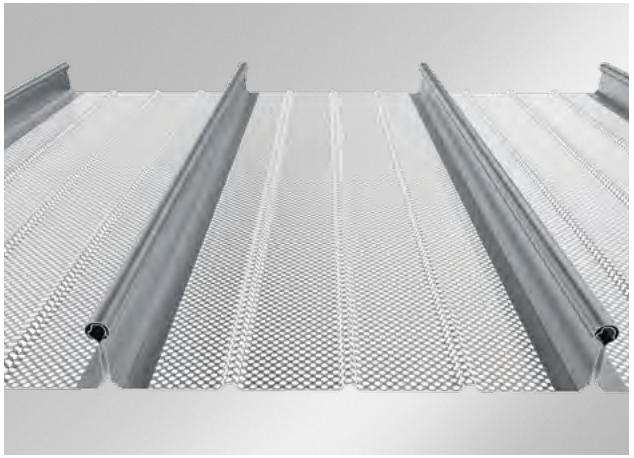
Area: 3,700 m²
Special features: Perforated facade Rv6-9

BEMO STANDING SEAM PROFILES – ROUND, MULTIDIMENSIONAL AND FREEFORM

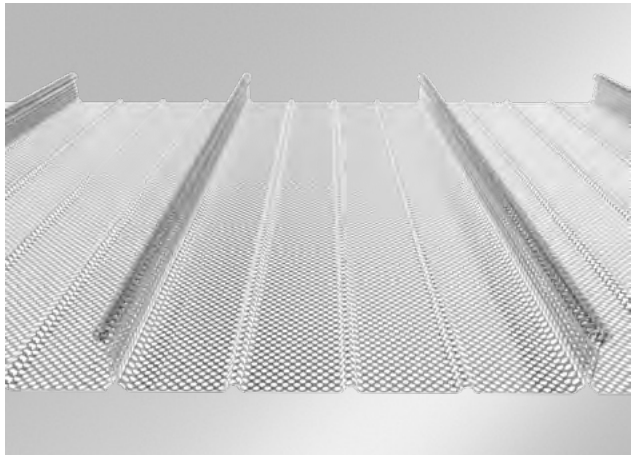
Free forms, flowing transitions from the roof to the façade as well as cylindrical and 3-dimensional building shapes are increasingly demanded in modern architecture. A BEMO standing seam façade is exactly the right solution for such requirements. BEMO standing seam impresses with many advantages, a variety of different systems and is suitable for both new construction and renovation.

The BEMO standing seam system offers unprecedented potential: Different profile widths from 100 mm to 800 mm, 2 profile heights, almost infinite panel lengths, parallel, conical and “freeform profiles” offer architects, designers and planners a wide range of design options. Standard standing seam panels are made of aluminium or steel, but they can also be made of stainless steel, zinc or copper. The radii for curved profiles start at 600 mm, depending on the design. Convex and concave radii are possible. The penetration-free and thus invisible fastening leaves nothing to be desired, and that in combination with the highest level of safety. The length expansion takes place on the system holders, smoothly, permanently and with a very long-lasting effect.

Thermal bridge-optimised BEMO standing seam holders improve thermal insulation with a low system build-up height. The standing seam system is completed by extremely variable, economical BEMO substructure systems for optimum tolerance compensation for every building shape.



Perforation Rv 5-8 with unperforated web for parallel profiles



Perforation Rv 5-8 full-surface for conical and MONRO profiles

ADVANTAGES OF STANDING SEAM SYSTEMS

- VARIABLE PROFILE WIDTHS AND LENGTHS
- INDIVIDUAL PERFORATION DESIGN
- PERFORATED STANDING SEAM PANELS ALSO FOR ROUNDED OR BIAXIALLY CURVED PROFILES
- FREE CHOICE OF COLOUR
- CAN BE COMBINED WITH NON-PERFORATED STANDING SEAM PROFILES
- FASTENING WITHOUT VISIBLE SCREWS

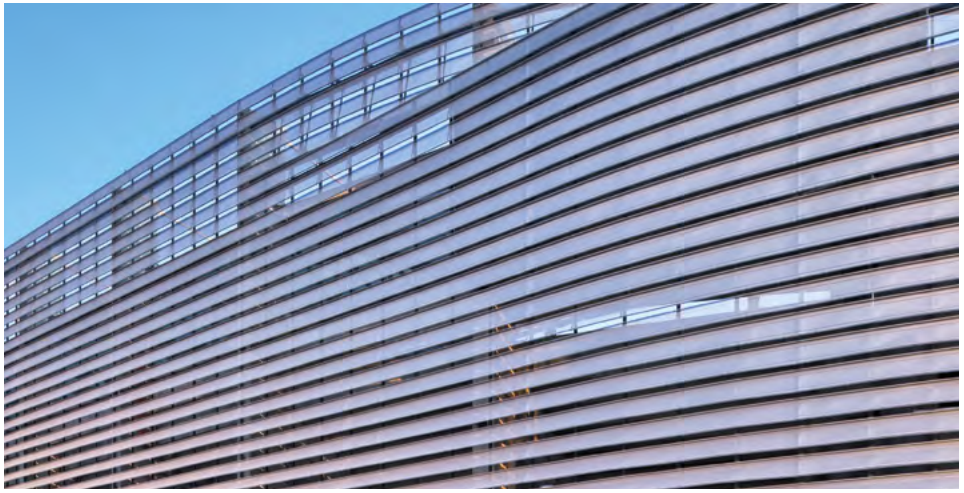


Photo: Bartosz Makowski

LUBLIN STADIUM | LUBLIN | POLAND

Product: SF N65-500, BEMO-MONRO, perforated Rv5-3
Material: Aluminium
Surface finish: painted

Colour: similar to RAL 9006 (both sides)
Area: 7,500 m²

Special features: The profiles were painted on both sides, perforated façade solution.

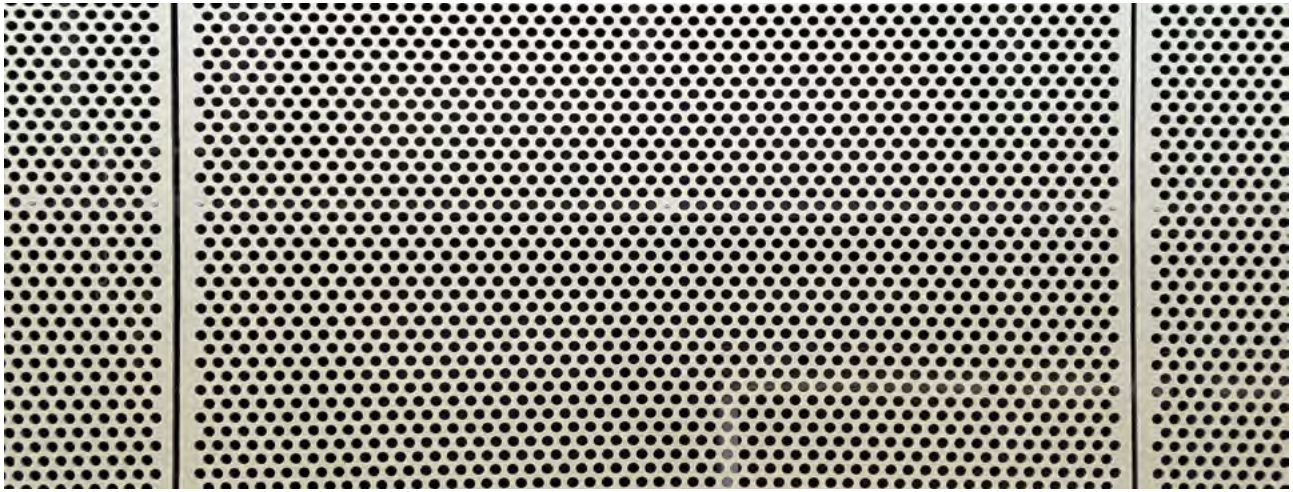
Photo: Hertha Hurnaus

LÄNGENFELDGASSE | VIENNA | AUSTRIA

Product: BEMO standing seam, perforated
Material: Aluminium
Surface finish: painted

Coating: BEMO-FLON
Colour: similar to RAL 9006
Area: approx. 4,000 m²

Special features: 13 different panel widths with different perforations



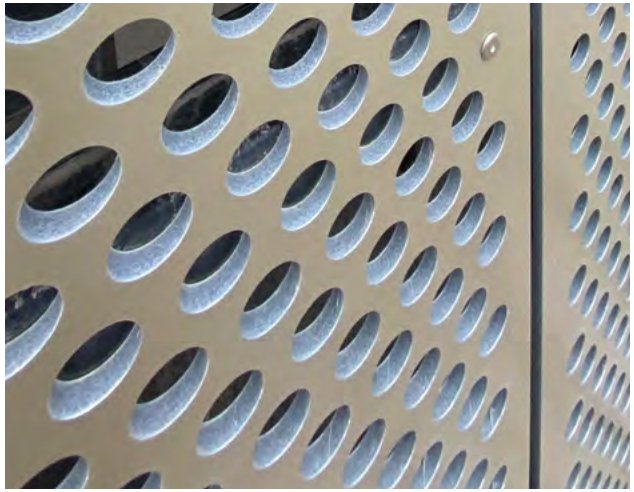


Photo: BEMO

NAUTILAND | WUERZBURG | GERMANY

Product: BEMO-BOND INVISIO 6 mm with FR core
Material: Aluminium
Surface finish: golden BEMO-FLON coating

Colour: Pearl-Beige GE 15
Area: 1,900 m²

Special features: Composite façade panels in large formats of approx. 2 x 4 m with bevel cuts, vertically oriented along the façade

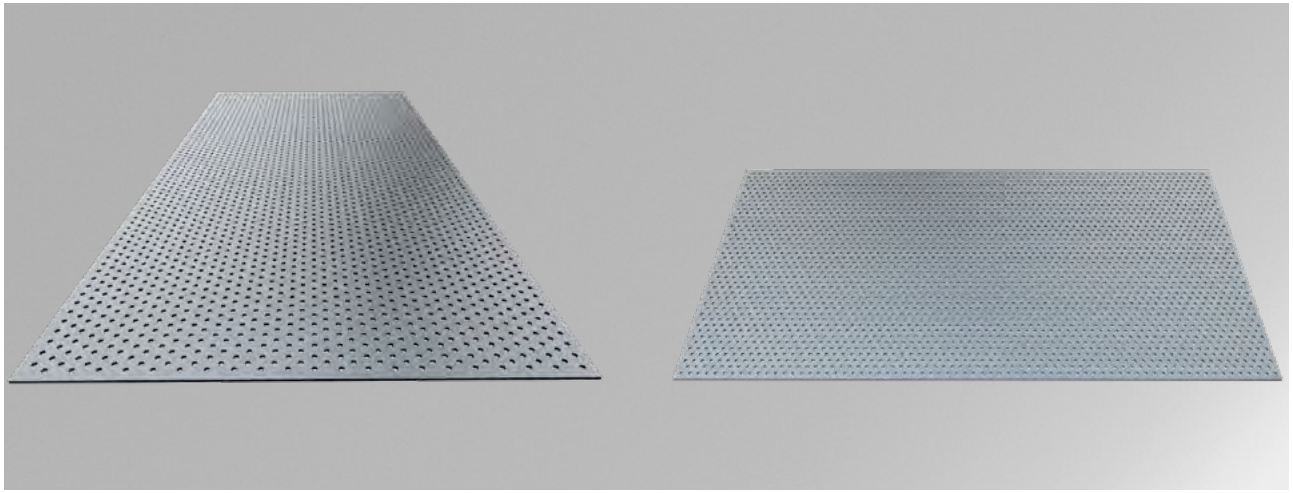
BEMO BOND – THE PERFECT CHOICE FOR HIGH-QUALITY COMMERCIAL CONSTRUCTION

BEMO-BOND aluminium composite panels can be used in various designs as high-quality façade cladding for ventilated façades. Visible or invisible fixing options – in freely designable panel dimensions of 7,200 mm x 2,000 mm – with a high variety of colours and individual detail solutions.

Perforated panels with optional integrated backlit elements, letterings, coats of arms or logos can be designed – the possibilities provided by BEMO-BOND composite panels are almost limitless.

The BEMO-BOND panel offers the complete BEMO colour palette – and the possibility to mix your own colour preferences in the BEMO colour laboratory. Suitable connecting and edging parts from the same batch can be ordered and supplied. The panel fastening can be visible, e.g. by means of screws or rivets in panel colours. Covered and invisible façade fastenings are available, either as cassette systems or with the new, innovative BEMO-BOND INVISIO system. Optionally, closed cut edges seal the panel core and ensure surface colour all around the panel.

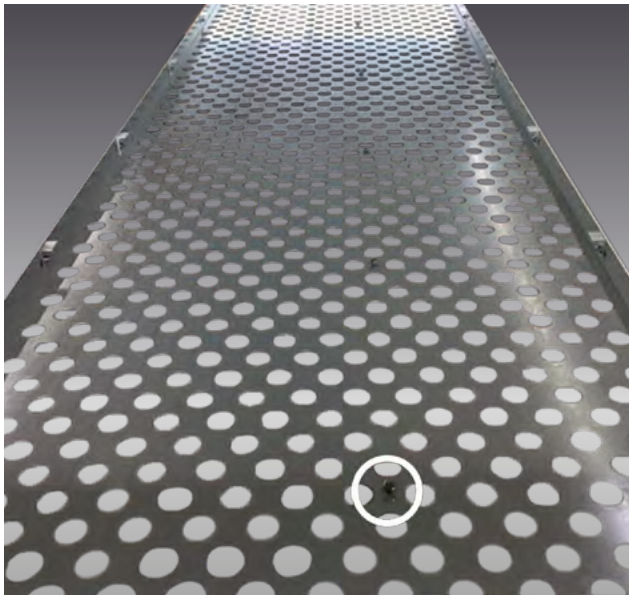
The panels are machined in BEMO's own machining centre, also including BEMO's design and engineering if required. The panels are pre-processed according to requirements and delivered to the project "just-in-time".

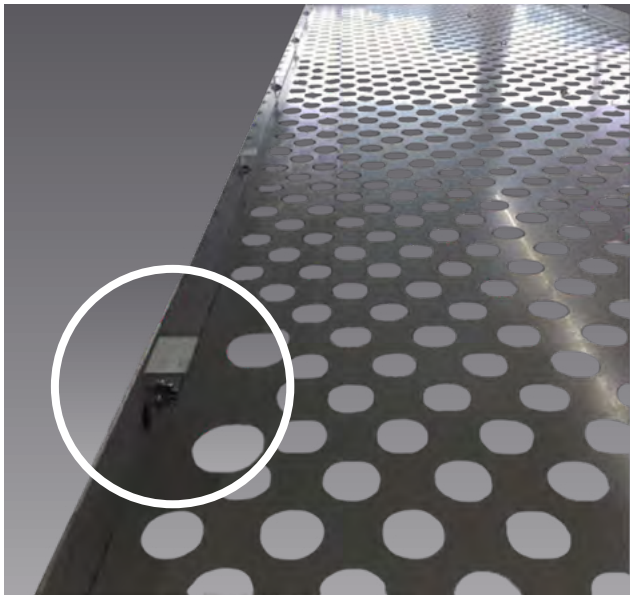


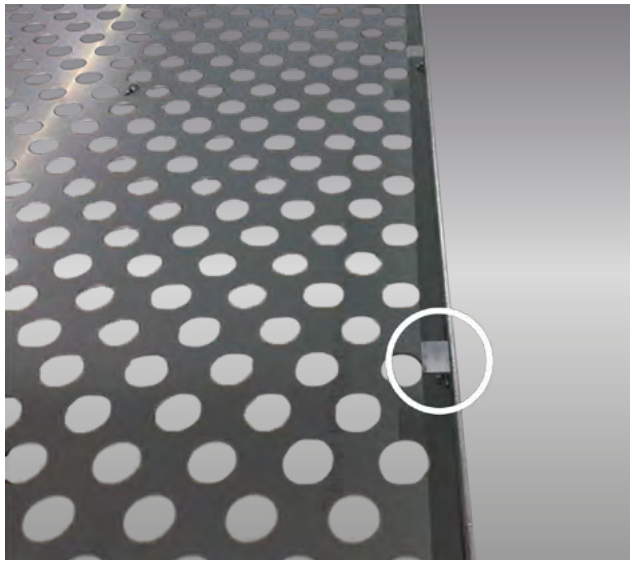
BEMO-Bond perforated

BEMO-BOND ADVANTAGES

- ALMOST UNLIMITED FREEDOM IN SURFACE AND PERFORATION DESIGN
- SEALED AND PROTECTED SURFACES THANKS TO BEMO-FLON COATING
- LARGE FORMATS UP TO 14 M²
- EASY INSTALLATION THAT CAN BE DONE IN ALL WEATHER CONDITIONS
- CLOSED CUT EDGES
- JOINT BACKING POSSIBLE
- STABLE AND DURABLE CORNER AND JAM LIPPING

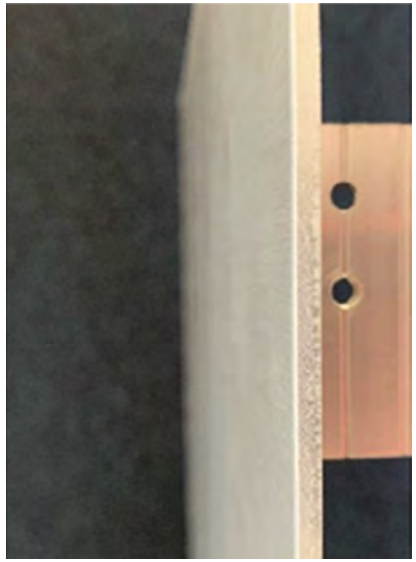






Invisible fixed framing and cassettes support

Backside with bracket



Cross view / Corner

Front view

THE NON-COMBUSTIBLE SOLUTION

- COATING: BEMO-FLON AND POWDER COATING
- COATING: BEMO-FLON, PVDF AND POWDER COATING
- ANODIZING: VARIOUS APPEARANCES POSSIBLE
- CORE: SOLID
- FORMAT: W: 800–1.950 MM, L: UP TO 6.000 MM
- FIRE RATING ACCORDING DIN EN 13501-1: A1
- MATERIAL THICKNESS: 3.00 / 4.00 MM

BEMO-SOLID – ALUMINIUM PANELS THE NON-COMBUSTIBLE SOLUTION

The unique combination of BEMO-TEKOFIX A++ and BEMO-SOLID INVISIO for non-combustible applications!

BEMO-SOLID panels can be used flexibly for a large variety of applications. Whether for the external facade of your building, as suspended ceilings, internal walls or balcony claddings. Visible or invisible fixing options – in freely designable panel dimensions of 6,000 mm x 2,000 mm – with a high variety of individual detail solutions and geometries.

The BEMO-SOLID panel offers the complete BEMO colour palette – and the possibility of tailor-made coating and anodizing of even small areas in different colours and appearances.

Suitable connecting and edging parts from the same material and coating type can be ordered and supplied.

The panel fastening can be visible, e.g. by means of screws or rivets in panel colours. Covered and invisible façade fastenings are available, either as cassette systems or with the new, innovative BEMO-INVISIO system.

In addition to the design options, the BEMO-SOLID panel is made of solid Aluminium and is therefore non-combustible! In conjunction with an appropriate substructure such as our BEMO-TEKOFIX A++ bracket, the component can be classified as A1 - non-combustible, which is a significant advantage for facades and suspended ceilings.

The panels are machined in BEMO's own machining centre, also including BEMO's design and engineering if required. The panels are pre-processed according to requirements and delivered to the project "just-in-time".

TEKOFIX A++

BEMO-SOLID Fire Class A1

COMMUNITY CENTRE | LANDAU | GERMANY

Photo: vor-ort-foto

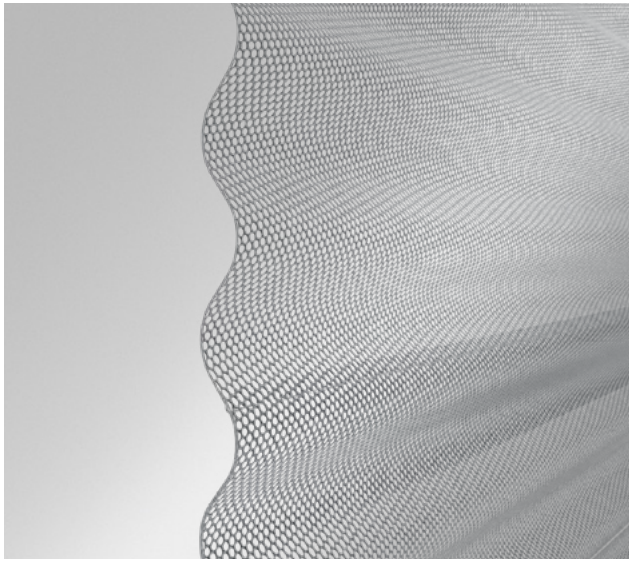
FAÇADES WITH CORRUGATED AND TRAPEZOIDAL PROFILES – THE CLASSIC VARIANT. COST-EFFICIENT. SAFE.

The classic solution for façade design is the corrugated profile. Corrugated profiles are an attractive and sustainable façade solution, especially in residential construction, but also in commercial and industrial buildings. In combination with the large variety of possibilities of colours, surfaces and materials, they give every building a special touch.

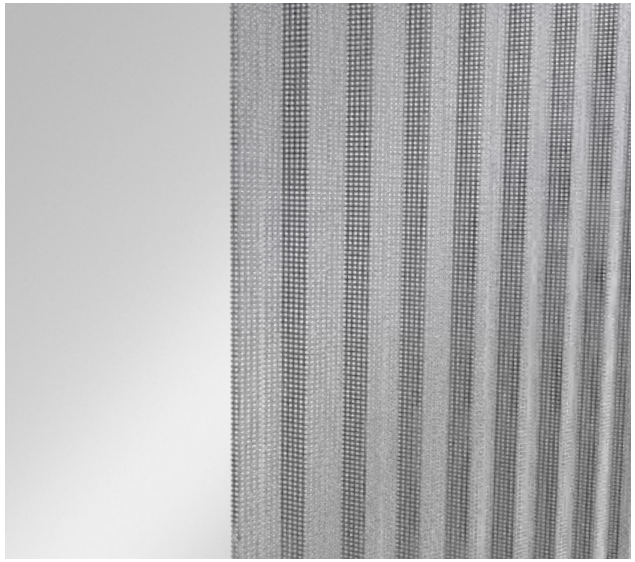
Depending on the size of the façade area, you can choose between four different sinusoidal waves. Each profile can be used both horizontally and vertically.

BEMO trapezoidal profiles are suitable for cladding cassette systems, direct installation on substructures for cold halls and / or cladding for curtain-type rear-ventilated façades. BEMO trapezoidal profiles represent an economical façade system. Depending on the profile geometry, high distances between the necessary fastening points can be achieved, thus reducing the effort required for the substructure. The different profile geometries offer a number of design variations.

Uniformly profiled geometries appear harmonious from a distance – unevenly profiled ones increase the surface effect.



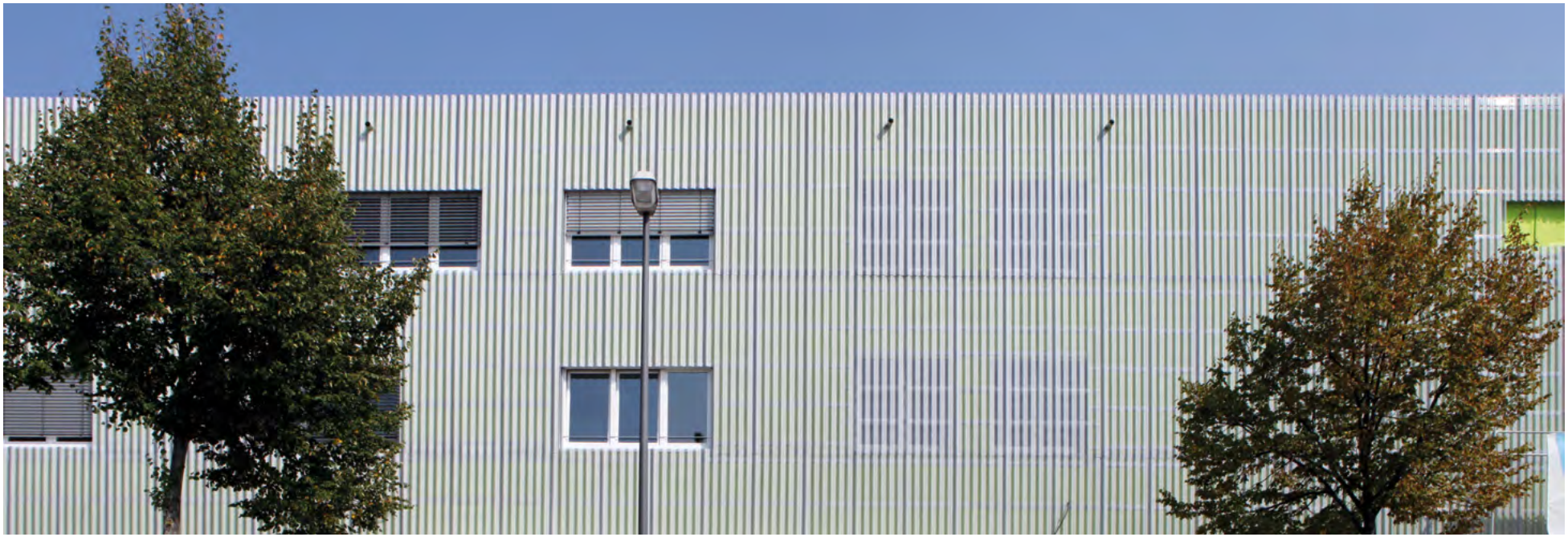
Corrugated profile perforated



Trapezoidal profile perforated

ADVANTAGES OF CORRUGATED AND TRAPEZOIDAL PROFILES

- SEALED AND PROTECTED SURFACES THANKS TO BEMO-FLON COATING
- VARIABLE PROFILE LENGTHS
- EASY INSTALLATION THAT CAN BE DONE IN ALL WEATHER CONDITIONS
- STABLE AND DURABLE CORNER AND JAM LIPPING



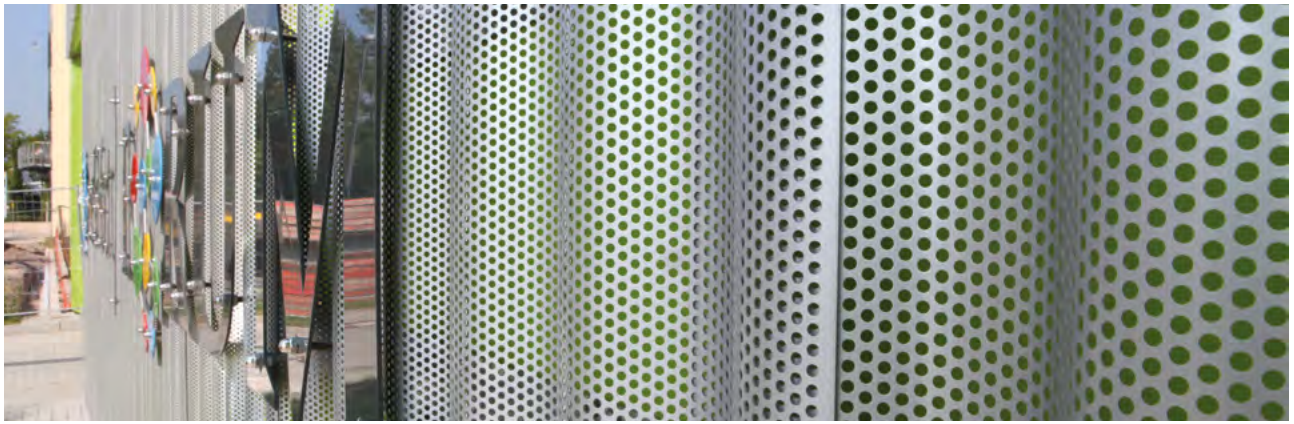


Photo: vor-ort-foto

COMMUNITY CENTRE | LANDAU | GERMANY

Architecture: Krampulz Meyer Architekten, Stuttgart
Product: Corrugated profile 42-160, perforated RV 5-8
Material: Aluminium

Surface finish: Polyester paint
Colour: similar to RAL 9006
Area: 1,900 m²

Special features: Heat insulation with light green lamination

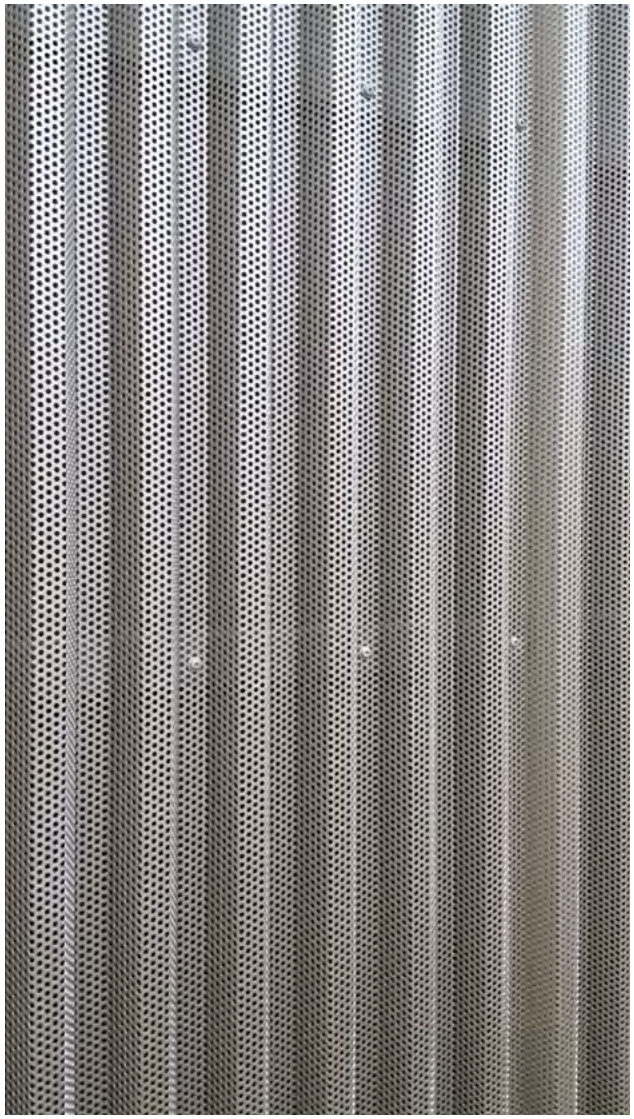


Photo: BEMO, VfB Stuttgart Instagram

HOUSE OF YOUTH | ST. JOHANN | AUSTRIA

Architecture: ARCHITEKTENGRUPPE P3-ZT GmbH
Product: Trapezoidal profile 40-100, perforated Rv 5-8
Material: Aluminium

Surface finish: Band-coated
Colour: AnoMax ultra matt, similar to Anodized Autumn
Area: 750 m²

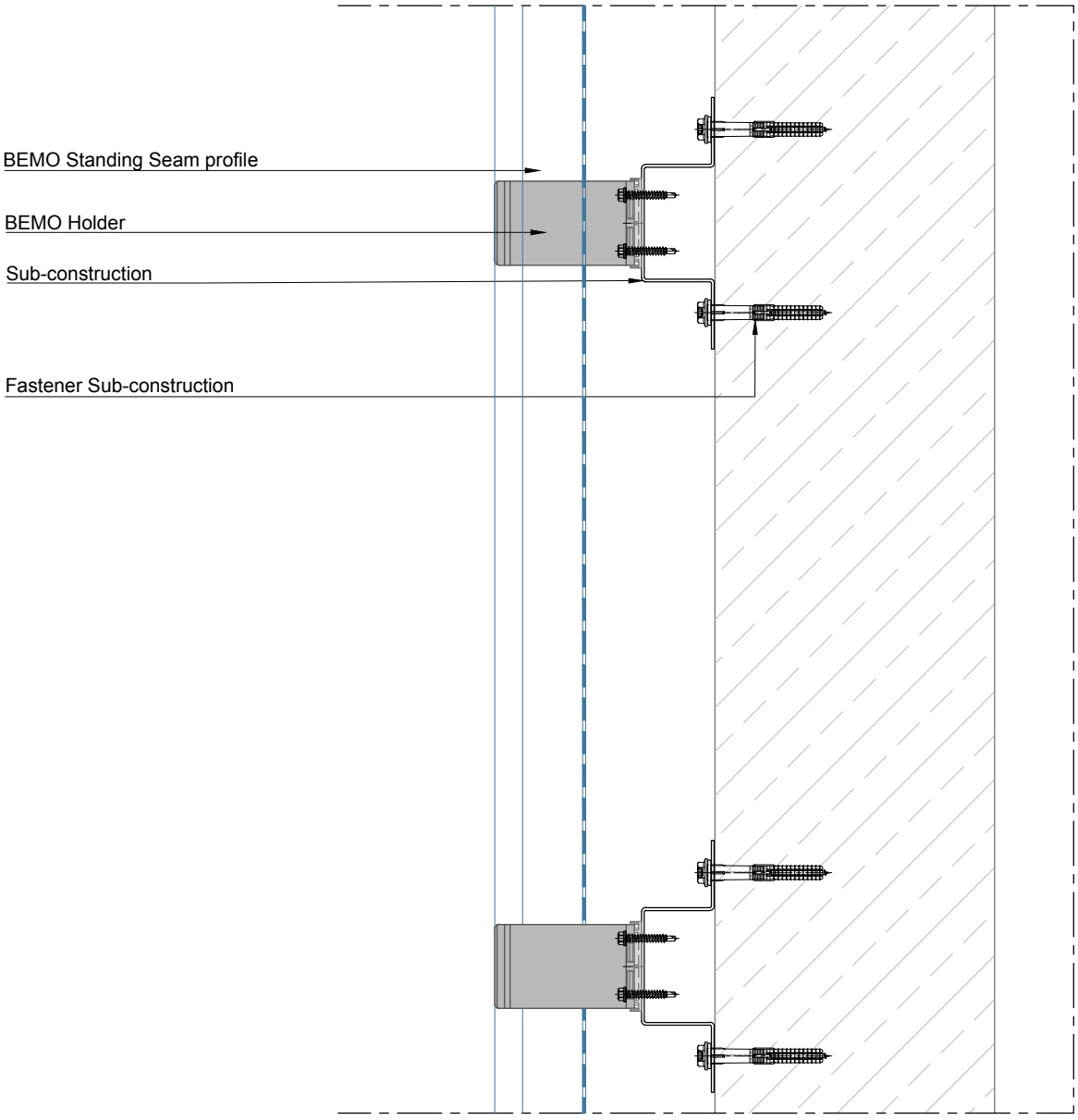
Photo: S+T Fassaden GmbH

SOS CHILDREN'S VILLAGE | WILHELMSHAVEN | GERMANY

Architecture: Thalen Consult GmbH
Product: Trapezoidal profile 35-207,
corrugated profile 42-160, perforated

Material: Aluminium
Surface finish: BEMO-FLON
Colour: similar to RAL 6018 and 7022

Area: 1,100 m²
Special features: Trapezoidal profile as substructure and perforated corrugated panels installed above



07/2021

Drawing title:

Façade build-up

BEMO Standing Seam perforated

Type:

Cross Section

Principle Detail

BEMO SYSTEMS GmbH
Max-Eyth-Straße 2
D-74532 Ilshofen-Eckartshausen
Germany

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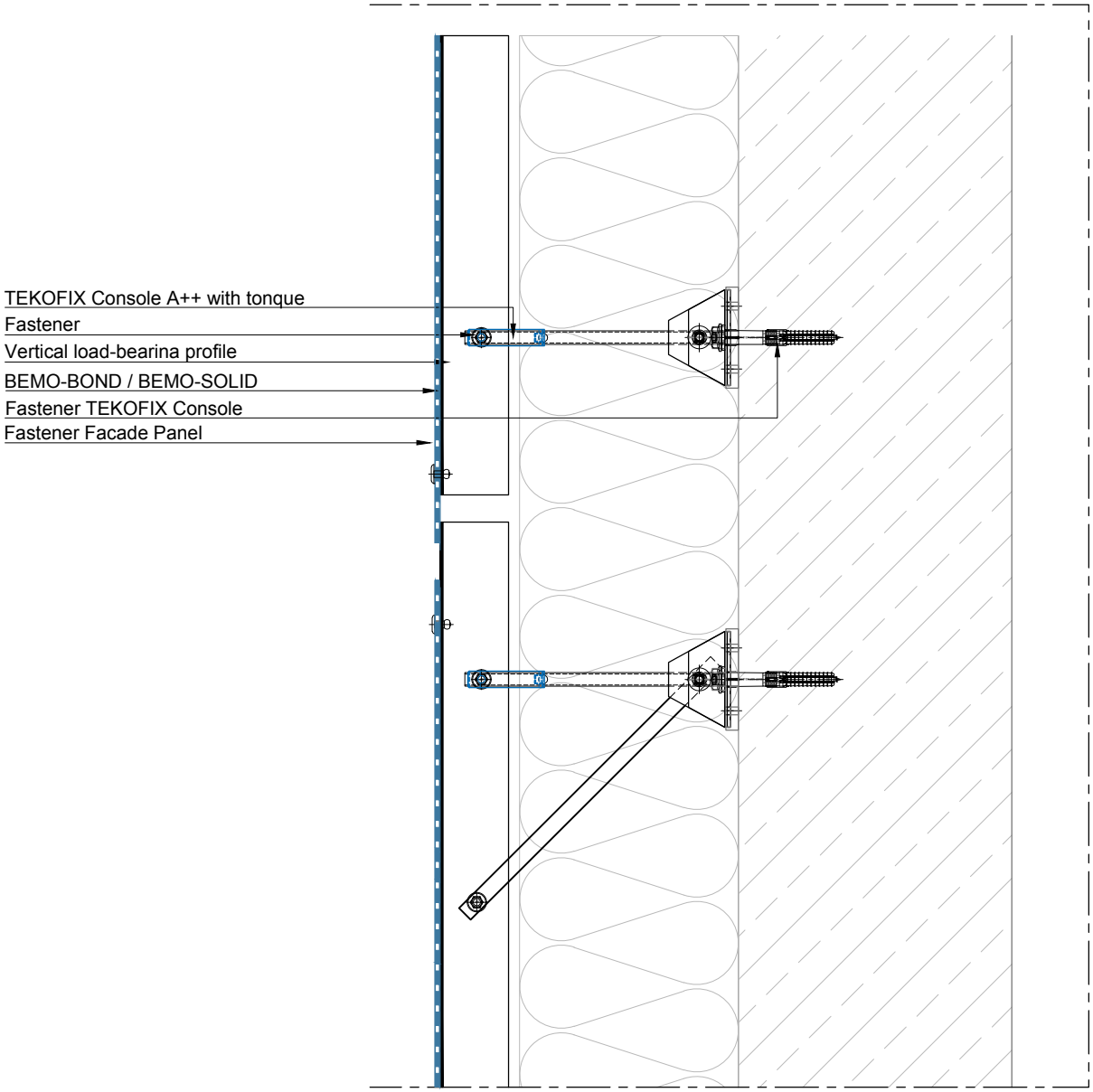
F: +49(0)7904 29899-61
E: sales@bemo.com
W: www.bemo.com

Maximum load-bearing profile length for this type of joint depending on the selected cladding profile, fixation scheme and the colour of the cladding.



07/2020

Drawing title:

Façade build-up

BEMO-BOND / BEMO-SOLID perforated

Type:

Cross Section

Principle Detail

BEMO SYSTEMS GmbH
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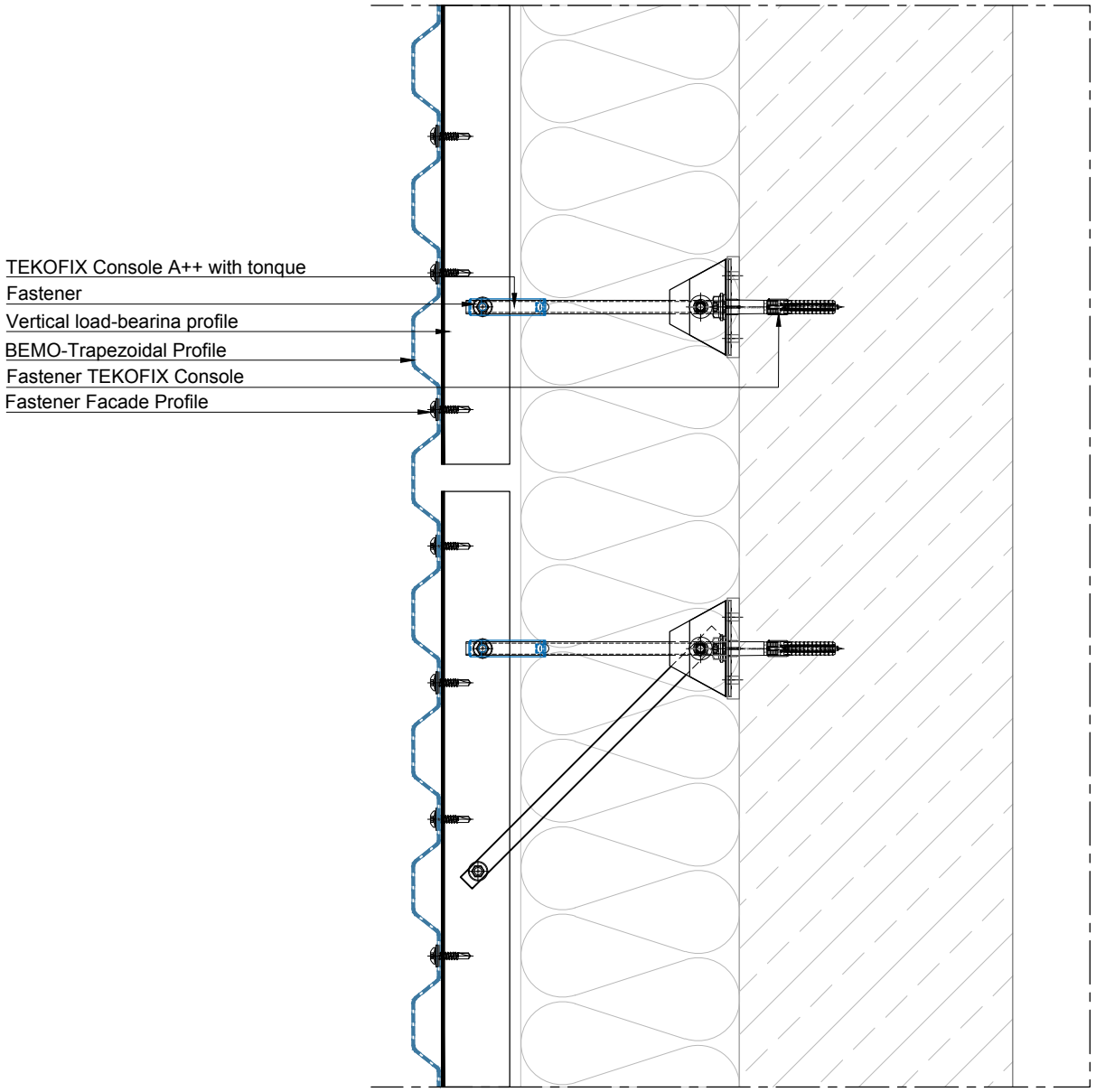

07/2020

Drawing title:

Façade build-up

Trapezoidal profile perforated / horizontally aligned

Type:

Cross Section

Principle Detail

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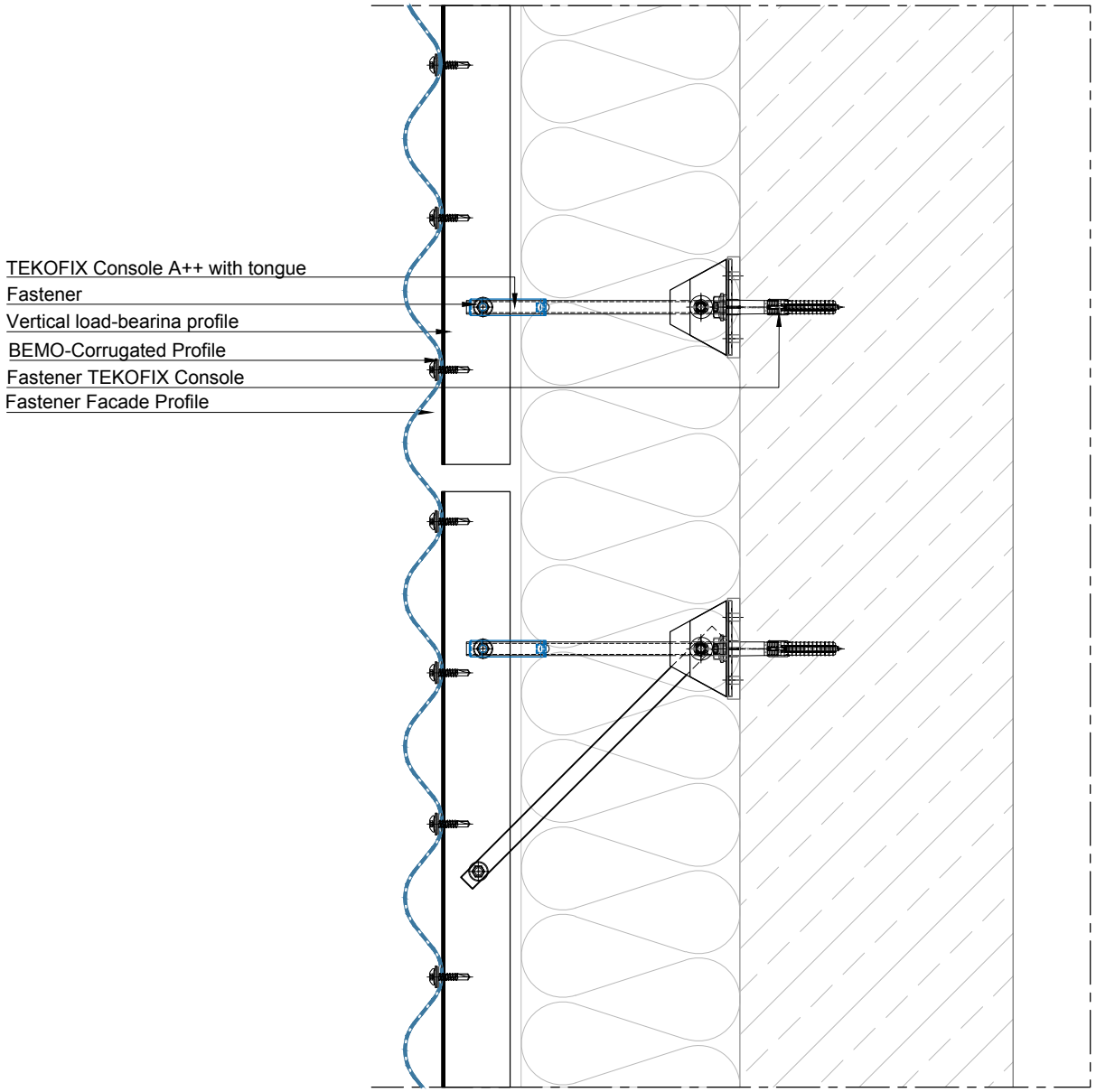
Maximum load-bearing profile length for this type of joint depending on the selected cladding profile, fixation scheme and the colour of the cladding.



07/2020

Drawing title:

Façade build-up

Corrugated profile perforated / horizontally aligned

Type:

Cross Section

Principle Detail

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08 / 2022

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