

A dream Penthouse: HI-MACS® shines above the roofs of Hamburg



The stunning penthouse flat located on the top floors of this building, has been completely redesigned using HI-MACS® for a spectacular exterior.

The top two floors of this four-storey building, situated high above the Hamburg Harvestehude, have been gutted and redesigned into a fabulous two storey penthouse, with breathtaking views over the Alster. The 1970s penthouse now features a HI-MACS® façade, with a stunning 324 sq. m. roof terrace.

To lend an open spatial design to the penthouse, the maisonette has been completely gutted. It was the only way to develop a modern floor plan with contemporary interior fittings, and to renovate the technical building equipment. The top fourth floor and the roof terrace could not be changed structurally outside. Transformation into an exclusive sun trap was achieved by means of thoughtful use of the solid surface material HI-MACS®. It merges the façade and open area into one unit.

Considering the initial premises, the task was anything but easy for the Gerdt Architecture Office in Hamburg, responsible for the architecture, interior design and construction supervision. The penthouse and roof terrace stretch between the chimney stacks, different lift shafts and installations, with only a few structural components. In this wild conglomerate, the premises hardly contained any formative structures such as component rows or axes.



HI-MACS® turns installation shafts into attractive architectural elements

In these conditions, the responsibility for the HI-MACS® was not only cladding and protecting, but also space-shaping and arranging. "This material enables a level of precision, which is otherwise only known for furniture pieces", describes architect Jan-Erik Gerdt; His reasons for selecting the solid surface material: "Inclined walls, unsightly edges of the premises and water drainage could not just be clad, but also evened out by means of the HI-MACS® ventilated rainscreen facade." Relevant technical solutions appeared, due to close cooperation with the façade construction and solid surface material specialists, from Kiebitzberg.



Furthermore, the room design of the interior space was mirrored to that of the roof terrace, by widening the chimney stack to the pergola. The architects thus made a virtue out of necessity, having created a terrace landscape with open and protected areas using the space-creating and space-separating columns. Once unsightly shafts and chimney stacks appear now as deliberately developed architectural elements, which optically expand outwards the interior space of the penthouse, in a natural way. An open fireplace and lamps in the walls and floor reinforce the impression of an outdoor lounge. The total picture looks as if cast in one piece due to seamless finish of the solid face material. "Precision of edge formation and corner pointing", emphasises Jan-Erik Gerdt when summarising his experience with the solid surface material. Among further benefits of the solid material, are easy processing for joiners, and the possibility of milling as it is done in this project for the large patio planters. HI-MACS® was also used inside for wall cladding of the staircase, and in bathrooms for two wash basin tops.

Along with the visual and design possibilities offered by the Natural Acrylic Stone from LG Hausys, its use in the outdoor area and on the façade is also justified by its longevity and robustness. The non-porous homogeneous surface is composed of 67% natural stone powder, 30% high-quality acrylic and 3% natural pigments, and is resistant to the effects of weather. HI-MACS® can be easily cleaned, as dirt and even paint or bird droppings, is unable to penetrate the surface.

HI-MACS® façade: simple design and assembly



Specifically developed for outdoor application, the HI-MACS® elements in the colour Ivory White, are assembled here in Harvestehude by the solid surface material specialists from Kiebitzberg onto an aluminium substructure and fastened by undercut wedge anchors invisible from outside. Also connections to the roof, floor or window ledges can be easily created using special subframes. Insulation and weather protection are constructively separated in this design. Insulation material is optimally fixed between aluminium profiles and the back wall. Due to the high resistance of the solid surface material against moisture the insulating layer behind the façade is also protected. The space between the façade panel and the insulating material conducts the moisture outwards and ensures perfect air circulation both in summer and in winter.

For the architect Jan-Erik Gerdt, who has worked with HI-MACS® primarily indoors before now, the solid surface material has now also become a material of choice in façade construction due to his experience with this project. "Not only is the processing and diversity of this material so useful, but the sustainable option of on-site repairs and improvements even after the building is completed is hugely appealing."



Project information:

PROJECT: Redesigning and renovation of penthouse, façade / terrace

SITE Hamburg-Harvestehude, Germany

DESIGN: Gerdt Architektur, Hamburg www.gerdt-architektur.de

CONSTRUCTION YEAR: 1970

RENOVATION PERIOD: 2013-2015

FAÇADE ENGINEERING / Production of the HI-MACS® interior fittings:

Kiebitzberg GmbH & Co.KG, Havelberg www.kiebitzberg.de

FACADE BUILDER: Peter Knapp Dach- & Fassadentechnik GmbH, www.knapp-dach.de

FACADE ANCHOR SYSTEM: KEIL Befestigungstechnik GmbH, Engelskirchen,
www.keil.eu

MATERIAL: HI-MACS® Ivory White S029 www.himacs.eu

PHOTOGRAPHER: ©Klaus Stemmler

HI-MACS® by LG Hausys

www.himacs.eu

HI-MACS® is a solid surface material that can be moulded into any shape. It is widely used for architectural and interior applications, such as sculptural and high performance wall-cladding or kitchen, bathroom and furniture surfaces, in commercial, residential and public space projects. It is composed of acrylic, natural minerals and pigments that come together to provide a smooth, non-porous and visually seamless surface which meets the highest standards for aesthetics, fabrication, functionality and hygiene – offering manifold advantages over conventional materials.

HI-MACS® provides limitless possibilities for surfacing solutions and inspires creative minds from all over the world. **Zaha Hadid, Jean Nouvel, Rafael Moneo, Karim Rashid** and **David Chipperfield**, among others, have completed fabulous projects using HI-MACS®, from kitchens to bathrooms, including decorative items, in hotels as well as in museums, shopping centres and on external façades.

LG Hausys' HI-MACS® uses a simple heating process to give three-dimensional thermoplastic forming capabilities, allows visually seamless designs, offers a virtually limitless range of colours and – for some shades - exhibits a special translucency when exposed to light. Although HI-MACS® is almost as robust as stone, it can be worked in a similar way as wood: it can be sawn, routed, drilled or sanded.

HI-MACS® is manufactured using a new generation technology, the **thermal cure**. The temperature reached during the manufacturing process sets HI-MACS® apart from other solid surfaces and creates a denser, even more homogeneous, sturdy, durable surface – with a better resistance and superior thermoforming performance.

As regards hygiene, HI-MACS® does not absorb humidity, is highly resistant to stains, and is easy to clean, maintain and repair.

Countless internationally recognized certificates attest to the quality of HI-MACS® in terms of ecological commitment, hygiene and fire resistance – being the first Solid Surface in the market to receive the official **European Technical Approval (ETA) for façades** – for Alpine White S728 colour.

HI-MACS® offers the longest warranty on the solid surface market with a 15-year warranty for products fabricated by a Quality Club Member.

HI-MACS® The New Generation

Inspired by Architecture

For more information and to stay connected, visit our [website](#) and our [newsroom](#).

Let's connect!



* **HI-MACS®** is designed and produced by **LG HAUSYS**, a world leader in the technology sector belonging to LG Group, and distributed by **LG HAUSYS EUROPE** based in Frankfurt (Germany).

HI-MACS® Media contact for Europe:

Mariana Fredes – LG Hausys Europe - Ph. +41 (0) 22 879 54 83 Mobile +41 (0) 79 693 46 99 – mfredes@lghausys.com

High resolution photos available at www.himacs.eu