

A Styrofoam Lover with (E)motions of Concrete

An installation at the Southern California Institute of Architecture in Los Angeles

At the invitation of the Southern California Institute of Architecture (SCI-Arc) in Los Angeles, USA, the office of the Vienna architect Susanne Zottl designed a location-specific installation in the university's gallery/exhibition room in spring.

The gallery of the Southern California Institute of Architecture is situated inside the university building in downtown Los Angeles and therefore in the vicinity and range of the Museum of Contemporary Art (MOCA), the Disney Concert Hall, the REDCAT Theater and Gallery, the Japanese American Museum and the Chinatown Galleries. The SCI-Arc Gallery is the only one in Los Angeles to provide a platform for experimental projects by contemporary architects. Within the scope of the SCI Gallery's exhibition programme, not only architects and those who teach and study architecture, but also the public is given the opportunity to experience new and trendsetting topics specifically related to architecture.

The program promotes experiments with new materials, concepts and production techniques. In this way SCI-Arc is supporting the experimental access to



building materials and the learning process based on real implementation. It is not the SCI-Arc Gallery's aim to dictate design trends, but rather to offer a showcase for works that spark a critical discussion of common building practices. Each of the six exhibitions per year is arranged as a workshop, in which students collaborate closely with the invited architects on the production, assembly and disassembly of the exhibition.



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The list of projects in architect Susanne Zottl's office shows an emphasis on buildings within the context of existing structures and listed buildings. Regulations for the preservation of listed buildings define the creative limits of extensions and conversions in that all structural changes to the object should be clearly readable as a contemporary intervention and the original appearance of the listed building should be

restorable. However, these requirements 'freeze' the listed building in a particular – and arbitrary – era.

The quality of grown structures lies in the marks left on them by the various design phases they have gone through. Present-day tasks and problems demand the continuous re-interpretation of existing structures. In order to 'retain' listed buildings as living organisms in the city, their conversion in a contemporary context is unavoidable. In comparison with this, for example, the architects and sculptors of the Baroque period had no such reservations when they were transforming Gothic cathedrals to suit their view of the world.

The theme of the exhibition concentrates on two aspects of this discussion:

1. A new use, or one that overlaps the existing use, necessitates changes to the existing rooms, structures and buildings.
2. Conversion and renovation work on existing buildings is at the present time considered in close connection with an improvement in energy efficiency, in particular in the thermal insulation of the building shell.

The examination within the context of this installation aims at linking these two factors with one another and thereby concentrates on the 'wall' as a structural element. Similar consideration could also be given to further elements of the building, such as 'foundation slab', 'roof' etc.





Re. 1: The wall serves not only as a load-dissipating element, which separates the interior from the exterior, or as a skin that defines the room by its dimensions, it contains elements of the spatial programme, the new use. It works in a similar fashion to the 'thick wall' of historical buildings: This area mediates between the geometrically defined interior space and the surrounding urban environment through a sequence comprising development and small-scale rooms.

Re. 2: The cheapest and therefore most widespread method of thermal renovation is that of applying 'full thermal insulation' (thermal insulation composite system). However, adhering foam polystyrene to (existing) facades represents an unsatisfactory solution, not only from the designer's point of view. Over and above that, it is obvious that the area of application of this technology is limited to even existing surfaces. Therefore, there is a need to develop an alternative that allows more room to manoeuvre than the simple 'offset'.

The material used is a mixture of foam polystyrene recycling material, which provides for thermal insulation, and cement, by means of which the stability of the elements is achieved. This special mixture was originally developed as a levelling insulation for horizontal surfaces. The use of the material in space-creating sculptural form has never been attempted until now.

The installation is based on the process of casting. The potential of this technique with regard to spatially

creative possibilities is being checked by means of the introduction of a flexible skin as a constituent part of the formwork. The objects developed within the scope of the installation 'A Styrofoam Lover with (E)motions of Concrete' thus represent prototypes with respect to concept, material and construction.



The implementation technique was checked, adapted and refined within the context of the workshop. Accordingly, it is possible to use the material for the manufacture of space-creating and, at the same time, insulating elements. Ultimately, the goal of the continuative work, following the performance of additional test series, is to develop a production technique or a product for use in the energy-efficient building sector.



Concept

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