

N° 12040E

Principal

Jumbo-Markt AG Industriestrasse 34 8305 Dietlikon

Overall project management

RHG Architektur AG Weissensteinstrasse 81 4503 Solothurn

Architect

Pfister Schiess Tropeano & Partner Architekten AG Mainaustrasse 35 8008 Zurich

Construction management mandate

HRS Renovation AG St. Leonhard-Strasse 76 9000 St.Gallen

Civil engineers

Nänny & Partner AG Oberstrasse 222 9014 St.Gallen

Electrical engineers

Schnegg Elektroplanung AG Industriestrasse 28 5600 Lenzburg

Sanitation engineers

Espro AG Simonstrasse 7 9016 St.Gallen

HVAC engineers

Windirsch Haustechnik AG Wenkenrütistrasse 23 9630 Wattwil

Construction physics Kopitsis Bauphysik AG

Kopitsis Bauphysik A Zentralstrasse 52a 5610 Wohlen

Contaminant experts

CSD Ingenieure AG Hardturmstrasse 135 8005 Zurich

Location of the construction project Textilstrasse 1 9320 Arbon

Planning

2014 - 2015

Implementation 2015 – 2016







CONVERSION OF A HISTORIC INDUSTRIAL BUILDING ARBON – TG



LOCATION/HISTORY

Trucks have not been built in Arbon (canton Thurgau) for a long time. In 2007, a concept was designed for the former Saurer WerkZwei site to transform the industrial park into a new district of Arbon. In 2012, HRS Investment AG bought the 208,000 m² site to the west of the railway station in order so that it could be developed on an ongoing basis. The Saurer WerkZwei site was split into construction sectors from A to N.

The "Jumbo Maximo" project described here is located in construction sector K on the southern edge of the site, at the corner where Stickereistrasse crosses the River Aach. Two old industrial buildings of the Arbomec construction group – formerly used as a mechanical workshop by Saurer – were converted into a DIY store with a garden centre. This enabled Jumbo-Markt AG to leave its previous, smaller location by the lake and open the largest Jumbo Maximo in eastern Switzerland with a sales area of 7,300 m² in the converted building.





HRS Renovation AG was in charge of the construction management project.

DESIGN/ARCHITECTURE

The striking two-storey Arbomec building, built in 1961, and the adjoining factory building from 1952, were merged and converted so that Jumbo-Markt AG could set up a large retail store there. The architects managed to preserve the buildings in their essential, historically valuable parts. Interventions only took place where required by its new use – for example on the west façade, where the Jumbo-Markt main entrance is located, or on parts of the supporting structure of the former factory building. The concrete skeleton structure with its characteristic factory

roofing was retained. The north and east façades have been partially reconstructed to underline the holistic nature of the historic structure.

The principal wanted to supplement the existing areas with a greenhouse. For this purpose, a new one-storey building with a flat roof was built along the west and south façades. The building fits volumetrically into the building complex, but the steel construction with metal cladding and large windows is clearly distinct from the existing structure.

The DIY store extends over the ground floor of the former Arbomec building and factory. The upper floor of the Arbomec building is used as office space. 243 parking spaces are aligned in four longitudinal strips at right angles to the roadway.

SPECIAL FEATURES

The Jumbo Maximo in Arbon is the first Jumbo-Markt in Switzerland to be opened in a listed building. The starting point for this was difficult, because only the imposing head building was listed. The factory along-side could therefore have been replaced by a new building. After an appeal for the preservation of the factory, the question then arose as to whether it would be possible to accommodate a large Jumbo-Markt without any functional disadvantages in the existing factory building and also add a reduced extension building alongside.

The position of the columns in the factory building, the storey heights and the windows proved to be the greatest architectural challenges. Thurgau architect Rita Schiess





of Pfister Schiess Tropeano & Partner Architekten AG and the RHG Architektur office in Solothurn finally succeeded in integrating the Jumbo-Markt into the historic buildings while preserving the factory.

Before the renovation, samples of all the listed building parts had to be produced so that the Office for the Preservation of Historic Monuments could grant the release. Ribbed limestone façades were re-used from the adjacent building to be demolished, a former forge, for the partial reconstruction of the north and east façade.

With their single glazing, the historic metal windows on the façades no longer met current insulation standards. For this reason, the metal windows were either reconstructed or renovated using dry ice blasting and fitted with double glazing. The factory roofs have now been triple glazed: they provide constant daylight for the Jumbo-Markt and, at the same time, reduce energy requirements.

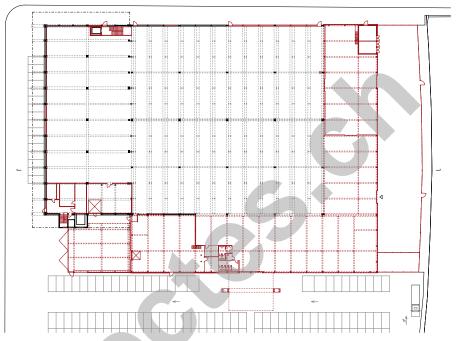
ENERGY CONCEPT/SUSTAINABILITY

To preserve the appearance of the façades, thermal insulation was only applied to the roofs in the historic parts of the building; on the walls, the insulation layers are located inside. Thermal bridges were also minimized

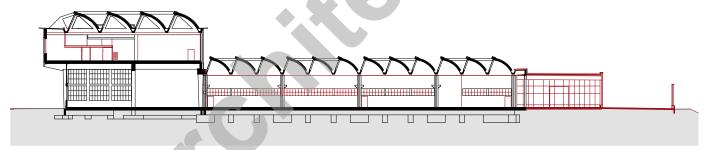
with sufficient overlap of the outer and inner insulation.

The Jumbo-Markt Arbon is connected to the district heating network of the Morgental energy park. Operated by Elektra Birseck

Münchenstein (EBM), the energy park produces district heating for the most part from sewage gas, wastewater from the Morgental waste water treatment plant (ARA), as well as from waste wood.



Ground floor



Cross-section







PROJECT DATA

 Total cost:
 CHF 21 million

 Plot size:
 16,000 m²

 Gross floor area:
 10,000 m²

 SIA volume:
 83,000 m³

Parking spaces

Outdoor: 243



Architekturbau GRP Särl 1020 Renens – © P. Guillemin October 2017 8108 / RZ – Printed on FSC-certified paper from sustainable forest management – Photos: Pit Brunner