

Property report: Town hall in Täby, Sweden



A MODEL OF LONG-TERM SUSTAINABILITY

The new town hall in Täby (Sweden) meets the very highest standards with regard to sustainability, as do the insulation materials used.



The small Swedish town of Täby is part of Stockholm County, and lies just 15 km north of the centre of the Swedish capital. As Täby is the main centre of the Täby municipality, a number of administrative departments are based there. In order to manage these efficiently in future, staff and visitors to the departments are to have access to premises that are characterised by openness and generous spaces. The plan aims to enhance the work and working environment of every employee. However, the modernisation of the building, which to date has been used for administration purposes, was faced with a long list of mandatory requirements. The cost of complete modernisation would also have been unreasonably high, and so the municipality decided to relocate the town hall and construct a new building.

A 6-storey building was planned with 10,000 m² of office and conference room space, 3,000 m² of underground parking and 60 m² of floor space for building services. The intended result is a municipal building with a total area of over 13,060 m², which sets a benchmark for long-term ecological and economic sustainability. The focus was on cost-effective operation, efficient and flexible management of the premises, and the lowest possible energy consumption. As a futuristically planned and architecturally attractive structure, the new town hall is to reflect the municipality in a positive light on the town hall square and pedestrian areas, as well as enhancing the overall appearance of the town itself.

Investment in the new building: around 350 million Swedish krona.

Green Building certification and other challenges

The building, which will open in April 2017, was awarded provisional certification with the Green Building Gold Label. The Green Building Label (bronze, silver or gold) is awarded e.g. for high resource efficiency and sustainable use of energy, water and materials. Damaging impact on health and the environment is to be markedly reduced. In relation to energy efficiency, this means that energy consumption for the Green Building Gold Label must be 65% or less than is provided for in the BBR planning regulations.



Since the aim was to obtain Green Building certification, sustainability was taken into account in the installation of all fixtures and fittings during construction of the town hall. Fittings and furnishings for example had to comply with environmental directives, as did all construction materials used — this of course also applied to insulating technical building installations.

In addition to these requirements, all those involved in the Täby construction project faced the specific challenges involved in constructing a public and frequently visited building such as a town hall. These include not only energy efficiency, but also strict requirements regarding sound-proofing and fire protection.









Insulation material to meet the highest standards

In order to optimise pipe insulation in the cooling/air conditioning-related systems and the plumbing systems, as well as the four air conditioning units of the new town hall itself, the constructor, Sweco Structures, and subcontractors Skanska Sverige AB and Projektbyrån Stockholm AB chose the insulation materials Kaiflex HF and Kaiflex HFplus. Key criteria: in order to meet the Green Building standards, the products had to be halogen-free and were not permitted to contain bromine, or heavy metals such as lead and cadmium. The products also had to be easy and flexible to process. The Kaiflex insulation material met all the criteria, and was therefore the ideal choice for insulation.

Kaiflex products were also the first choice when it came to sustainability. Technically optimised insulation does far more than simply reduce energy losses and greenhouse emissions. It fulfils another purpose with specific regard to cooling and air conditioning systems, i.e. preventing dew and the related condensation on the outside of pipes. Experience shows that a lack of insulation or the wrong material often results in frozen condensation, dripping, damp, corrosion, and therefore mould. This can lead to increased energy consumption, disruptions or the total failure of the system. In the long-term, this means rising and incalculable operating costs, or even replacement of all of the insulation.

Kaiflex insulation reliably prevents the build-up of dew and related condensation, and the low thermal conductivity of Kaiflex products is also of benefit. In relation to cooling and air conditioning systems, this ensures that the low temperature of the transported medium remains constant throughout the system, therefore preventing temperature drops.

Opening in April 2017

After around three years of construction work, the new town hall will open its doors on 18th April 2017. Thanks to diligent planning, high-quality building materials and contemporary architecture, this model of long-term sustainability will be a source of pride for the municipal employees and residents of Täby for many years to come, as well as enhancing the overall appearance of the town itself.

PropertyCity hall of the community Täby, Sweden

Building floor space 13.060 m²

Level of investment Approx. 350 Mio. SEK

Construction time 2014 to 2017

Products

Approx. 4,300 m of Kaiflex HF and Kaiflex HFplus (Tubes and sheets)

