



StoraEnso

04 Aug 2026

Maskinparken Tre Trondheim, Norway

Partner of Stora
Enso



WOODCON

Maskinparken TRE is an 8-story wooden apartment building with a total of 47 apartments. The building is built to meet the passive house standard NS 3700. The walls, slabs, main staircase and the elevator shaft are made of CLT-elements. Outer and inner load bearing walls and the ceilings are encapsulated with a fire resistant liner. The façade cladding is wooden panels. Maskinparken TRE has a technical room underneath the building in the underground car park.

With 38 acres of open green space, Lilleby is Trondheim's Green District. The car-free residential and commercial placemaking scheme is being redeveloped from a former industrial area over a ten-year period set to complete in 2026.

Maskinparken Tre represents the sixth stage a Lilleby, with terraced houses and apartment blocks, extensively using sustainable wood. Prefabricated [Sylva™ CLT \(Cross-Laminated Timber\) Walls and Floors](#) are used instead of steel and concrete for load-bearing walls and roof structures. The walls, slabs, main staircase and the elevator shaft are made of [Sylva™ CLT and GLT elements](#).

Outer and inner load bearing walls and the ceilings are lined and covered with a [Fire-Resistant Lining](#). The façade cladding is wooden panels. Maskinparken Tre has a technical room underneath the building in the underground car park that connects to another building.

This approach offers numerous advantages:

-Low carbon material: Wood is considered a low carbon emission material, reducing the greenhouse gas footprint of the overall building.

-Minimal residual raw material: The construction process minimises residual material.

-Passive House Standards: Maskinparken Tre is a passive house, using insulation and other passive measures to reduce energy requirements, resulting in a more even temperature throughout the building. The building is built to meet the [passive house standard NS 3700](#).

Rapid Construction: It took only eight weeks, (one floor for each week) for the eight-storey apartment block to be erected in collaboration with our partners, Woodcon AS and Veidekke Entreprenør.

One floor per week consisted of:

-Half a day: Manoeuvring and placing stairs

-Half a day: Bathroom modules, and plastering

-Two days: Install Sylva CLT Walls and other glued laminated timber (GLT/Glulam), elements

-One day: Balconies

-One day: Completing the floor.

Bathroom modules, plaster and windows were hoisted into place before the floor was closed, and they were ready for a new week and a new floor.

Concrete or wood which is better?

The renewable materials company



As an environmental experiment, Veidekke chose to build Maskinparken 2 and Maskinparken Tre as almost identical buildings, one is based on steel and concrete and the other Sylva™ CLT and GLT elements so they could compare the two construction methods.

"The intention was to compare both environmental properties, costs, time, quality, efficiency and working environment of the two methods. The choice to build one of the houses in solid wood resulted in a reduced carbon footprint for the material part, and by increasing the energy requirement for passive house standard, this gave us a further reduction on energy use in the use phase," says project manager Erlend Dragesæt.

[Read the full research of the comparison here](#)

Low carbon footprint

The Sylva kit generated 76 tonnes of greenhouse gases (CO₂e) to manufacture and 11 tonnes of CO₂e to transport by rail from the mill to the site (2,000 km). Compared to the 1,107 tonnes of carbon dioxide that the trees removed while growing and will store in the building, this is a small fraction. Choosing Sylva CLT elements instead of non-renewables avoided 1,660 tonnes of greenhouse gases. (Source: [Stora Enso Carbon Calculator](#). Try it out and see what how small the carbon footprint of [your project would be](#) too).

About Woodcon AS

Our partner's Woodcon, is headquartered in Brumunddal, were the turnkey supplier for the load-bearing structure. This has included design, delivery of materials and assembly, together with safeguarding interfaces for adjacent disciplines.

"From our point of view, the project went smoothly, thanks to good planning by the project management and good design," says project manager at Woodcon.

Quick sales with wood

"All the apartments have been taken over. It was a very good sales period for the entire project. It's always good when we've completed a project that everything is sold out. We have had a good sales rate. We kept an apartment to have as a show apartment, but that too was quickly sold out", said, Solveig Haugli, project manager at Veidekke Eiendom.

Awards: In 2018, Maskinparken TRE was named Wood Building of the Year. The jury noted that the project is the largest KL-wood (massive wood) dwelling project in Norway, showcasing innovative solutions combined with high architectural quality and ambitious environmental goals.

Learn more about:

- The advantages with mass timber [Download whitepaper](#)
- Watch short videos about building with prefabricated Sylva™ on [Sylva™ Talks](#)
- Watch the [Timelapse of the construction](#)



2018 Wood Building of the Year



Photo credit: Woodcon AS/©Veidekke v/
Sigbjørn Faanes

General

Delivery year

2018

Building type

Multi Residential

Area (m²)

4,160

Storeys

8

Units

47

Products

Products and Services

Sylva™ CLT Floors and Roofs,
Sylva™ CLT Walls, Sylva™ GLT
Beams and Columns,
Preinserted lifting devices

Product quality

NVI

Product volume (m³)

1,452



Team

Partner of Stora Enso

Woodcon AS

Developer

Veidekke Entreprenør AS Lilleby
Eiendom
Trøndelag Fylkeskommune

Architect

KHR
HUS

Structural Engineer

Rambøll

Main contractor

Skanska Norway

Specialist Timber
Subcontractor

Woodcon AS

Timber Engineer

WSP Engineering

Others

Timber superstructure
erection duration (weeks)

8