



Schankula Architekten

Freiham Nord Social Housing **Sustainable Prefabricated Wooden Façades**Munich, Germany

On the western outskirts of Munich, in an area known as Freiham Nord, four new buildings designed by Schankula Architekten have been constructed to provide social housing, specifically 104 units with innovative and high-quality technological solutions. When the project was commissioned, Progeno Cooperative required that the overarching design concepts be "neighborhood" and "community", which took the specific form of including two workshops, a terrace, and a number of other work and social spaces in the original brief. Mobility was another focus, with a car-sharing parking lot and cycle paths, as well as a preference for eco-friendly and low-impact solutions to connect the four poles of this new 350-ha urban area to

each other and to the outside world. Since sustainability was clearly a central part of the project, the technological solutions used in building the complex had to be up to the task. The construction method chosen was a mixed technique of prefabricated wooden elements from LignoAlp and reinforced concrete, which made it possible to achieve an amount of renewable raw materials of more than 35 kg/sq. m usable surface. In each building, the upper floors are clad with 577 prefabricated wooden modules on the outside for a total of 4,414 sq. m, covered with spruce and treated with a pyrite gray preservative. Composed of a frame structure and lined inside and out with mineral wool for fire protection, the prefabricated elements were completed in 36 weeks at the factory,

which also pre-fitted 328 windows and 330 decentralized ventilation systems. This meant that the pieces arrived at the site ready to be installed, and it took only 24 weeks to put them up. Sections of the façade have non-standard projections and joints, making them particularly tricky. However, the quality of LignoAlp's work ensured that each module was installed exactly as required, starting from the base and working upwards, checking that each piece was sealed to be airtight and windproof.

Overall, the project achieves a balanced combination of sustainability and technology, using other green solutions such as a geothermal system, a photovoltaic installation and a rainwater reuse system.



Photography courtesy of LignoAlp

LignoAlp

Damiani-Holz&KO Via Julius Durst, 68 - I - 39042 Bressanone (BZ) Tel. +39 0472 975790 E-mail: info@lignoalp.com - www.lignoalp.com













