

Amano Research Laboratories



Place/Date
Gifu, Japan 1997–1999

Client
Amano Enzyme

Cost
£9 million

Area
6,353 m²

Cost/m²
£1,417

Architect
Richard Rogers Partnership

Structural Engineer
Umezawa Structural Engineers

Services Engineer
Inuzuka Engineering Consultants

Co-Architect
Kisho Kurokawa & Associates

Landscape Architect
Equipe Espace

Main Contractor
Takenaka



Amano's pedigree belongs to INMOS and Pat Centre Princeton, but instead of adopting a rigorous orthogonal plan, the building follows the sinuous contours of the site.

In 1997, RRP and co-architects Kisho Kurokawa & Associates were approached by Amano Pharmaceutical to design a low budget building at Kagamigahara City, Gifu, to accommodate the company's enzyme research group. The building was to be on the same site as the VR Techno Plaza, completed in 1998 by RRP, to create a small research and development campus for up to ten buildings to be let to research based companies. The building for Amano Pharmaceutical, which has an area of 6,353m², was required to incorporate not only specialised laboratories but also offices and a restaurant.

The building form is strongly influenced by its hilly site, giving a curved plan. The surrounding landscaping is integral to the building design and the impressive views which it affords are maximised by the positioning of the building within the site and its glazed façades.

The roof's steel structure is expressed externally. Rooflights following each structural bay allow natural daylight to penetrate laboratory space. As a consequence of placing the roof structure outside, the design succeeds in minimising dust in laboratory areas.

Inside, the laboratories are open plan, providing visual contact between lab areas and meeting rooms. Specialised booths provide accommodation for work with toxic materials or for work requiring specific environmental conditions.

By partially sinking the building into the hillside, the resultant thermal mass considerably reduces energy consumption whilst glazed façades are protected from solar gain by external shading, resulting in a low-energy services strategy.

