



Permanent-load scaffolding for heritage roof and timber conservation

# MINKA HOUSE

## Conservation of the historic Minka House at Kew Gardens

**M**inka House is a rare and culturally significant 20th-century Japanese farmhouse set within Kew Gardens' Bamboo Garden. Originally transported to the UK in 2001, the building is constructed using traditional Japanese techniques and materials and requires specialist conservation to preserve its historic fabric and integrity.

The current phase of works focuses on the repair of the historic timber frame and the renewal of the thatched roof. Alltask was appointed by DBR Limited to design, install and manage specialist scaffolding and access solutions to support these sensitive conservation works, while protecting both the structure and its surrounding landscape.

The project presented several technical and structural challenges. Minka House is built using a lightweight timber frame incorporating bamboo elements, which provide minimal structural capacity. As a result, the building was unable to support any imposed loads from temporary works,

requiring the scaffolding to be entirely independent of the structure.

All access solutions had to be non-invasive, avoid any reliance on the historic fabric for support, and accommodate long-term use throughout the conservation programme.

### Alltask's Scaffolding Solution

Alltask delivered a bespoke scaffolding solution specifically designed to respond to the building's lack of load-bearing capacity and the sensitivity of its construction.

The scaffolding was engineered to carry permanent load, with all imposed loads transferred directly into the scaffold structure rather than the historic building. No loads were applied to the bamboo or timber frame at any stage.

### Key elements of the solution

- An internal birdcage scaffold, independently founded and carefully threaded through the structure to provide stable, level working platforms around the historic timber frame





- Fully propped and self-supporting scaffold standards, positioned to maintain clearances around primary beams, posts and traditional jointing
- A full perimeter external scaffold, providing access to the elevations and supporting envelope protection
- A temporary roof structure, incorporating lattice roof beams and weatherproof sheeting, allowing the existing thatch to be removed and replaced while keeping the building protected
- Fully wrapped external scaffold, minimising environmental impact and protecting the surrounding Bamboo Garden

#### Heritage and Environmental Considerations

Given the cultural significance of Minka House and its location within Kew Gardens, heritage protection was central to the scaffolding strategy. All fixing methods were non-intrusive, with scaffold foundations and propping designed to avoid contact with historic fabric wherever possible.

Externally, the temporary roof and fully wrapped scaffold protect the building from the elements while reducing visual impact and safeguarding surrounding planting and pathways. Regular inspections and close coordination with DBR Limited ensure continued compliance and protection throughout the works.

#### Outcome

Alltask's tailored scaffolding and temporary works solution is enabling DBR Limited and their specialist conservation teams to safely carry out detailed timber surveys, structural repairs and the renewal of the thatched roof. The independently supported, permanent-load scaffold design is ensuring the preservation of a rare and culturally significant structure, while respecting both its historic fabric and its unique setting within Kew Gardens.

