

BROADMEADOW ROUNDHOUSE REFURBISHMENT

Degnan delivered the design and construction of heritage repairs to the Broadmeadow Roundhouse, reconstructing a major section of the timber truss and roof structure following extensive termite and weather damage.



SECTOR
Transport Infrastructure

LOCATION
Broadmeadow, NSW
Awabakal Country

CLIENT
Sydney Trains

PROJECT VALUE
\$2M (approximate)

PROJECT COMPLETION
July 2008

DELIVERY MODEL
Design &Construct

The works included reconstruction of the Roundhouse ridge, replacement of timber trusses and support beams, and temporary propping of major structural elements. New trusses were constructed at ground level and craned into position, with each element designed to match the existing structure and preserve the heritage character of the Roundhouse.

KEY OUTCOMES

- Reconstructed a major section of the Roundhouse timber truss and roof structure, including the entire ridge.
- Replaced structural elements affected by extensive termite infestation and weather damage.
- Constructed replacement trusses at ground level before craning them into position approximately eight metres above ground.
- Matched the design and construction of new trusses to the existing structure to maintain the Roundhouse's heritage character.
- Established purpose-built working platforms and scaffolding to support safe access to elevated work areas.

CHALLENGES OVERCOME

- Sourcing and handling large hardwood sections required for the like-for-like heritage repairs.
- Replacing trusses approximately eight metres above ground while establishing a safe and efficient working environment.
- Propping major trusses while removing and replacing the supporting beams.
- Reconstructing the ridge approximately 14 metres above ground and connecting it to truss sections below the roofline.
- Constructing scaffolding along the full length of the ridge to provide access for the elevated works.
- Replicating the existing truss construction to preserve the heritage qualities of the structure.