

# The Sage Hotel, West Perth, WA

**CLIENT** Australian Development Capital Pty Ltd

**YEAR** 2014

**SCOPE OF WORK**

- Geotechnical investigation
- Interpretive analysis and reporting
- Foundation and basement retention advice
- Construction phase support



*The new thirteen storey hotel building, The Sage Hotel, located in West Perth.*

**Increasing urban density is a major component of Perth's strategic future planning. Douglas Partners is pleased to assist clients in their high rise projects across Perth. One example is a new thirteen storey hotel building with basement, located in West Perth.**

The Sage Hotel is located in West Perth, 1.5 km west of the city centre. The proposed high rise hotel was to be located immediately adjacent to a two storey brick and tile heritage building, which was to be retained as part of the new development.

Our geotechnical specialists were engaged to undertake field investigations and provide advice on the encountered ground conditions, foundation systems, site formation and retaining systems for the basement excavation. The advice had to take account of the presence of the adjacent heritage building, which was extremely sensitive to movement and vibration. The scope and layout of the investigations were limited by the previous building on the site, which was to be demolished to make way for the hotel. Contiguous flight auger piles were recommended by Douglas Partners for both retaining the basement excavation and supporting the heavily loaded lift core slab to minimise vibrations caused during installation compared to other methods. Douglas Partners also provided advice on soil permeability to allow design of stormwater disposal systems.

Following demolition of the previous building, a second stage of geotechnical

investigation was undertaken in the previously inaccessible areas of the site. Douglas Partners worked closely with the structural engineer and the piling contractor at this stage to develop the most efficient foundation system for the proposed tower. The timely advice from Douglas Partners allowed the pile design to be optimised with confidence and lesser loaded slabs to be ground bearing, and for the project to progress on schedule. Douglas Partners continued to provide construction phase support until the ground works were completed.

The project was completed successfully, and with the heritage building intact, and the hotel has become a landmark in West Perth.

*“Close liaison between Douglas Partners, the structural engineer and piling contractor was vital to the success of the project, as access to most of the site was only available during the construction phase.”*

*Paul Hutchinson  
Project Manager*

