

# Case Study

Research & Development



## Header House & Glasshouses AgResearch



**Completion Date:** 2019

**Location:** Palmerston North

**Services:** Lead Design Consultant

**Awards:** NZ Commercial Project Awards 2020  
- Gold Award & Industrial Category Winner



The opportunity to invest in world class facilities to support the research being undertaken at the AgResearch Grasslands Campus resulted in the construction of the new PC2 Header House and Glasshouses.

The new facility which was completed in 2019 comprises a single Header House connected to 2 separate glasshouses each comprising 3 rooms to enable different projects requiring varying conditions to be run concurrently.

The header house comprises a large open potting area, Clean Laboratory, Equipment Store and Extraction Room along with 6 Control Temperature Rooms incorporating grow lights, waste store and decontamination area to allow for the future installation of an autoclave. Windows within the open working area face towards the glasshouse to provide views into the glasshouse for observation without the need to enter. The design and orientation of the complex enables



the header house to be extended with future glasshouses to be constructed without compromising operation or PC2 compliance.

Some of the complexities with this project included the need for pollen to be contained within the glasshouses and allowing for appropriate seismic separation between the header house and glasshouse without affecting the integrity of the glasshouse structure and undertaking the staged construction project within a fully-operational site. The outcome has been a 'state of the art' building which successfully incorporates architectural, mechanical and structural requirements alongside client research requirements.

As this was the first time the specific requirements for this building were being considered for a glasshouse in New Zealand the design team along with the client user representatives worked closely with the approval body, Ministry for Primary Industries to ensure the smooth running of the compliance approval process.

Lab-works Architecture worked in collaboration with L2D Architects, Melbourne and NDY, Brisbane for the masterplanning of the project and specialist Glasshouse advice and expertise.

