ANNEXURE B – RECORD OF TITLE

Quickmap Title Details

Information last updated as at 05-Jan-2025

RECORD OF TITLE
DERIVED FROM LAND INFORMATION NEW ZEALAND
FREEHOLD

Identifier **1023645**

Land Registration District **Canterbury**
Date Issued 13 January 2022

Prior References
546114

Type Fee Simple
Area 8.3862 hectares more or less
Legal Description Lot 1 Deposited Plan 568166

Registered Owners
Midlands Properties Limited

Land Covenant in Covenant Instrument 12287406.3 - 13.1.2022 at 9:15 am

View Instrument Details

Instrument No	12287406.3
Status	Registered
Date & Time Lodged	13 January 2022 09:15
Lodged By	McKay, Angela Jean
Instrument Type	Land Covenant under s116(1)(a) or (b) Land Transfer Act 2017

Affected Records of Title	Land District
1023645	Canterbury
1023646	Canterbury
1023647	Canterbury
462466	Canterbury
462467	Canterbury
546110	Canterbury

Annexure Schedule Contains 2 Pages.

Covenantor Certifications

I certify that I have the authority to act for the Covenantor and that the party has the legal capacity to authorise me to lodge this instrument ☑

I certify that I have taken reasonable steps to confirm the identity of the person who gave me authority to lodge this instrument ☑

I certify that any statutory provisions specified by the Registrar for this class of instrument have been complied with or do not apply ☑

I certify that I hold evidence showing the truth of the certifications I have given and will retain that evidence for the prescribed period ☑

Signature

Signed by Angela Jean McKay as Covenantor Representative on 13/01/2022 09:15 AM

Covenantee Certifications

I certify that I have the authority to act for the Covenantee and that the party has the legal capacity to authorise me to lodge this instrument ☑

I certify that I have taken reasonable steps to confirm the identity of the person who gave me authority to lodge this instrument ☑

I certify that any statutory provisions specified by the Registrar for this class of instrument have been complied with or do not apply ☑

I certify that I hold evidence showing the truth of the certifications I have given and will retain that evidence for the prescribed period ☑

Signature

Signed by Angela Jean McKay as Covenantee Representative on 13/01/2022 09:15 AM

***** End of Report *****

Covenant Instrument to note land covenant

(Section 116(1)(a) & (b) Land Transfer Act 2017)

Covenantor

Bruce Kenneth McIlroy, Philomena Rose McIlroy and BK Trustees [2005] Limited

Covenantee

Bruce Kenneth McIlroy, Philomena Rose McIlroy and BK Trustees [2005] Limited

Grant of Covenant

The Covenantor, being the registered owner of the burdened land(s) set out in Schedule A, **grants to the Covenantee** (and, if so stated, in gross) the covenant(s) set out in Schedule A, with the rights and powers or provisions set out in the Annexure Schedule(s).

Schedule A *Continue in additional Annexure Schedule, if required*

Purpose of covenant	Shown (plan reference)	Burdened Land (Record of Title)	Benefited Land (Record of Title) or in gross
Land Covenant	N/A	Lot 1 Deposited Plan 568166 (Record of Title 1023645)	Lot 2 Deposited Plan 568166 and Lot 2 Deposited Plan 415027 (Record of Title 1023646) Lot 3 Deposited Plan 568166 and Lot 2 Deposited Plan 439991 (Record of Title 1023647) Lot 3 Deposited Plan 415027 (Record of Title 462466) Lot 4-5 Deposited Plan 415027 (Record of Title 462467) Lot 1 Deposited Plan 439991 (Record of Title 546110)

Covenant rights and powers (including terms, covenants and conditions)

The provisions applying to the specified covenants are those set out in the Annexure Schedule.

ANNEXURE SCHEDULE

BACKGROUND

A. The Covenantor covenants with the Covenantee as set out in this Instrument and requests that the Covenants be noted against the Benefited Land and the Burdened Land.

B. The Covenants shall:

a. be for the burden of the Burdened Land;
b. be for the benefit of the Benefited Land; and
c. continue to run forever.

COVENANT TERMS

1. Covenants

The Covenantor shall not carry out, do, facilitate and/permit any of the following to be carried out from the Burdened Land:

a. The keeping of more than 6 pigs;
b. The keeping of more than 24 hens; and
c. The operation of commercial dog kennels.

2. Enforcement

If there is any breach or non-observance of any of the foregoing Covenants, the Covenantor in breach agrees to and shall, at their cost, (with respect to each individual breach):

a. Immediately upon receipt of a breach notice from the Covenantee, remove or cause to be removed from the Land any item erected on the Land in breach or in non-observance of the Covenants;

b. Immediately upon receipt of a breach notice from the Covenantee, carry out any such remedial work or any other work or actions so as to remedy such breach or non-performance of these Covenants; and

c. Immediately upon receipt of a breach notice from the Covenantee, undertake any action to remedy the breach or non-observance of the Covenants.

3. Dispute Resolution

3.1 Without prejudice to the Enforcement provisions of this Instrument, if any dispute arises between or among the parties concerning the Covenants, then the parties shall enter into negotiations in good faith to resolve their dispute.

3.2 If the dispute is not resolved within twenty working days from the date on which the parties begin their negotiations, then the parties shall submit the dispute to arbitration by an independent arbitrator appointed jointly between the parties. If the parties agree, that person appointed may act as an expert and not an arbitrator.

3.3 If an arbitrator cannot be agreed upon within a further ten working days, then the independent arbitrator will be appointed by the President of the time being of the Canterbury Westland Branch of the New Zealand Law Society (or his/her nominee).

3.4 Such arbitration shall be determined in accordance with the Arbitration Act 1996 (and its Amendments or any enactment passed in its substitution).

Quickmap Title Details

Information last updated as at 05-Jan-2025

RECORD OF TITLE
DERIVED FROM LAND INFORMATION NEW ZEALAND
FREEHOLD

Identifier **1023646**

Land Registration District **Canterbury**

Date Issued 13 January 2022

Prior References

462465 546114

Type Fee Simple

Area 8.1980 hectares more or less

Legal Description Lot 2 Deposited Plan 415027 and Lot 2 Deposited Plan 568166

Registered Owners

Midlands Properties Limited

9249963.1 Compensation Certificate pursuant to Section 19 Public Works Act 1981 by Canterbury Regional Council - 26.11.2012 at 3:46 pm

Subject to Section 241(2) and Sections 242(1) and (2) Resource Management Act 1991 (affects DP 568166)

Subject to a right to convey water over part Lot 2 DP 415027 marked A and over part Lot 2 DP 568166 marked B all on DP 568166 created by Easement Instrument 12287406.2 - 13.1.2022 at 9:15 am

Land Covenant in Covenant Instrument 12287406.3 - 13.1.2022 at 9:15 am

ANNEXURE C – CONCEPT DEVELOPMENT PLANS-RMM LANDSCAPE ARCHITECTURE

RMM

ROUGH MILNE MITCHELL
LANDSCAPE ARCHITECTS

Midlands Seed Campus Development, Racecourse Road, Ashburton

06 Nov 2024

Document Information

Project
Midlands Campus Development
Address
Racecourse Road, Ashburton
Client
Midland Seeds
Document
Resource Consent Stage
Status
For Consent
Revision
0
Prepared By
Rough Milne Mitchell Landscape Architects Ltd
Project Number: 24074
Authors: Vikramjit Singh + Divya Bishnoi
Peer Reviewed: Tony Milne

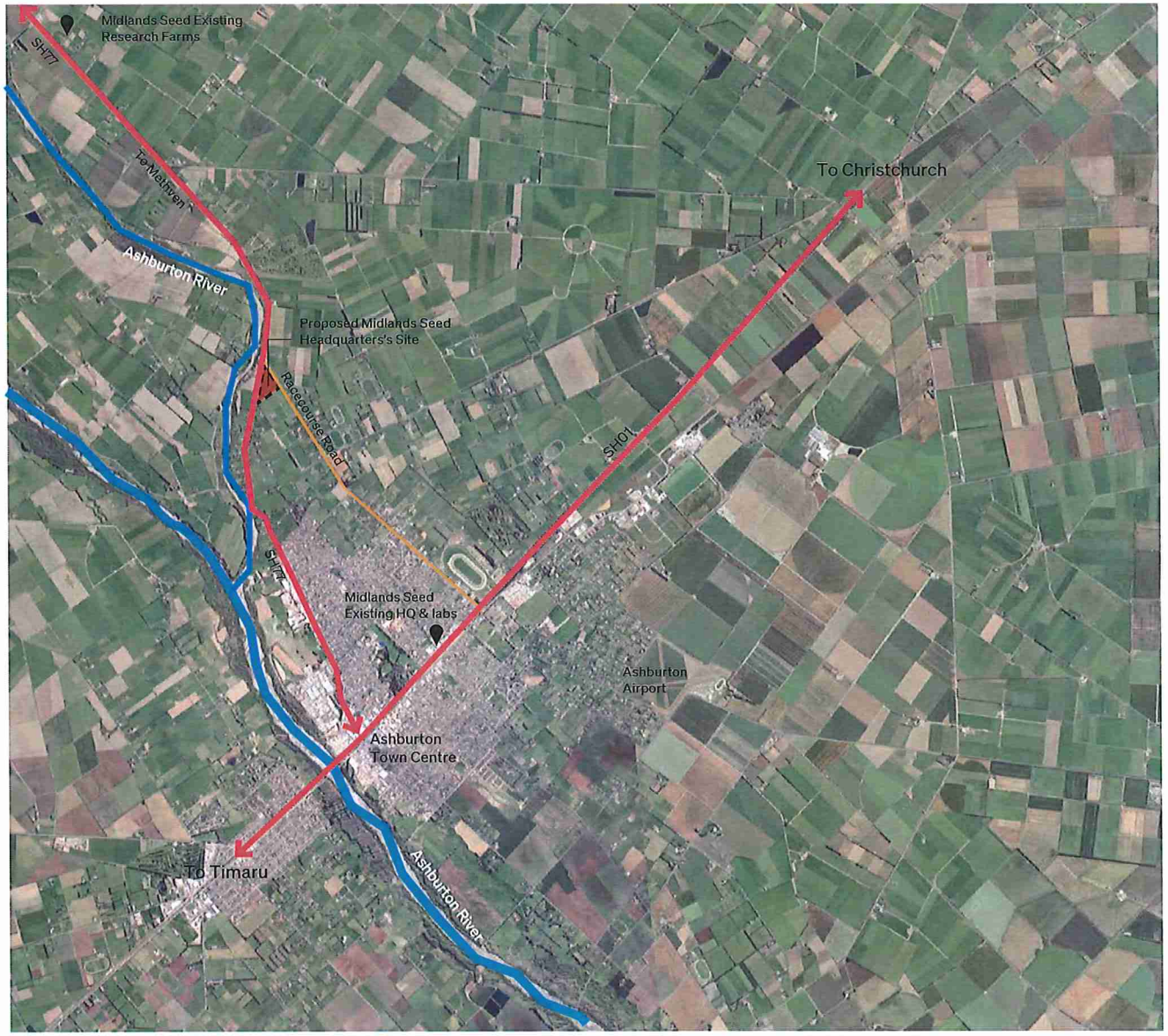
Contents

Site Location

Legend

- Site
- SH1 - State Highway
- Key Local Roads

The Site is located at the junction of Methven Highway-SH77 and Racecourse Road approximately 5.5 kms from Ashburton Town Centre. The total land area of the Site is 8.5275 Ha.



Scale: Not to Scale
Data Source: Aerial: Google Earth

Ashburton District Plan

Legend

- Site
- Flood Risk
- Stopbank Locations
- Zone- Rural A
- Area of Significant Conservation Value (ASCV)

Site Zoning - Rural A

Building Height. - 10m

Setbacks - 10 m (Road boundary),

- 20m (State Highway)

- 100 m (Stopbanks)

The Site falls under the Ashburton Operative District Plan's (ADP) Rural A zoning. The Site is near Ashburton River which runs approximately 170m to 400m way from the eastern edge of the Site. Given the land use activities, in addition to the applicable provision of the RMA, the council shall apply the following assessment matters under Section 3.4 Objective and policies as below:

Objective 3.1 - Rural Primary Production

Objective 3.5- Rural Character and Amentity.

Land Area = LOT 1 + LOT2
= (8.3822+0.1453) Ha
= 8.5275Ha

Scale: As Mentioned
Data Source: Ashburton District Maps

Site Context

Legend

- Site
- Road Network
- Ashburton River
- Existing Road Junction- SH77 with Racecourse Road
- Restricted Views
- Open Views
- Existing Shelterbelt
- Flood Stop Bank
- Unformed Road Edge
- Bridge Crossing
- Proposed Road Entry To Site

The Site comprises two land parcels measuring 8.3822 Ha and 0.1453Ha with a total area of 8.52 Ha. Being triangular in shape, the Site has SH77 along the northwestern edge and Racecourse Road along the eastern edge.

The Northern tip of the Site has the road junction of SH77 with Racecourse Road. The Bruce McIlroy Bentley service centre is located to the north of the Site. The Ashburton river runs approximately 200m away from the west of the northern tip of the Site, while to the south of the Site there exists cultivated farm properties with shelter belts.

Currently, the Site is enclosed with post and wire fencing along with existing tree lines and shelterbelts that run along the Site frontage to the highway. The Site has restricted views towards the SH77 and Racecourse Road but the view opens up towards the junction of the roads to the north. The main access is proposed off Racecourse Road.

Scale: Not to Scale
Data Source: Aerial: Google Earth Pro

Site Photographs

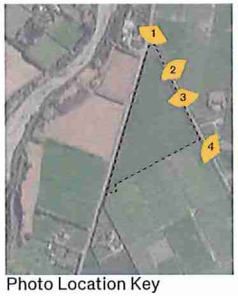


Photo Location Key

Photograph 1: View across the Site from north along Racecourse Road and SH77 junction.

Photograph 2: View of eastern edge looking towards the SH77- Racecourse Road junction.

Photograph 3: View looking south- southeast along Racecourse Road with existing shelterbelts along the proposed Site to the right.

Photograph 4: View looking north-northwest along Racecourse Road with existing shelterbelts along the proposed Site to the left.

Data Source: Aerial: Google Earth Pro

Site Photographs

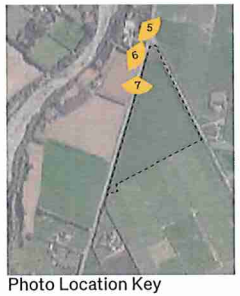


Photo Location Key

Photograph 5: View of the Site from the intersection of SH77 & Racecourse Road.

Photograph 6: View of the Site northern edge open to view from SH77.

Photograph 7: View looking north from southern edge of the Site along SH77.

Data Source: Aerial: Google Earth Pro

Design Response

Design Response

The proposed parkland style campus aims to create a harmonious blend of built form and picturesque landscapes, fostering a serene and inspiring atmosphere for learning, collaboration, and research. The proposed development will “speak of the place”.

The campus design will emphasise the intent of the research fields cultivated landscape with expansive green spaces, mature trees, and winding pathways that encourage outdoor activities and promote well-being. The design prioritises an agriculture led land use, pedestrian-friendly zones, ensuring safety and accessibility while minimising vehicular traffic.

Buildings are strategically placed to integrate with the landscape, featuring eco-friendly architecture and sustainable practices. Northsouth orientation of the proposed built form ensure main workspaces are design with views towards Mt.Hutt. The main landscape areas with outdoor seating spaces, recreational facilities, and gardens are thoughtfully incorporated to enhance interaction and provide a holistic professional and learning experience, a key to any research facility.

Design Drivers

The following design principles have been established from the outset to guide early design outcomes, serve as a 'measuring stick' for concept design and set a benchmark for final preliminary design outcomes. They will be revisited through out the project to ensure design integrity to the intent of the project.

Natural Environment

A number of opportunities are to be explored to bring natural landscape elements into the project, increase reference to the surrounding ecology through specimen trees, a diverse plant palette and using underlying geology as landscape features. The effort would be to explore the design with minimal environmental intervention.

Local Identity

This project will seek to reference the rich history within the wider cultural landscape through design narrative, plant selection, materiality, forms and colour palette. It will celebrate indigenous and interesting flora and fauna species.

Innovation

The design aims to celebrate Midlands as a top agricultural producer of specialty seeds and provide a quality and innovative space to suit the needs required. The building hub and gathering space will facilitate the critical research and development while the developed seed plots and planted routes through will provide spaces to grow, gather, prepare and observe.

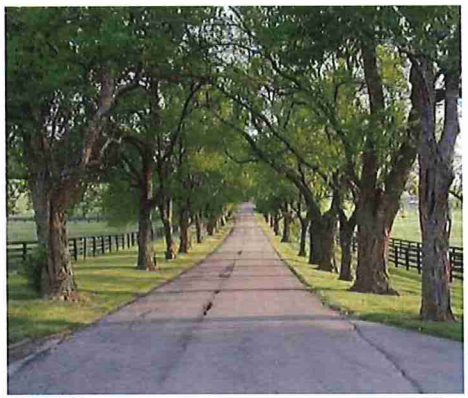
Connection

The new headquarters will represent Midlands as the heart of a global supply chain. Trusted partners, suppliers and international buyers can engage on site and see the products, the research and people involved. Human wellness and accessibility is integrated with ecological outcomes and opportunities. Ecological connections are also implemented from the road through to the river and surrounding rural landscape.

Natural Environment and Local Identity

The regions foothills and mountainous backdrop and braided river will provide design inspiration within the site. We recoganise the consistent clean water supply for irrigation, and exceptional soil types which allow Midlands to produce quality products.

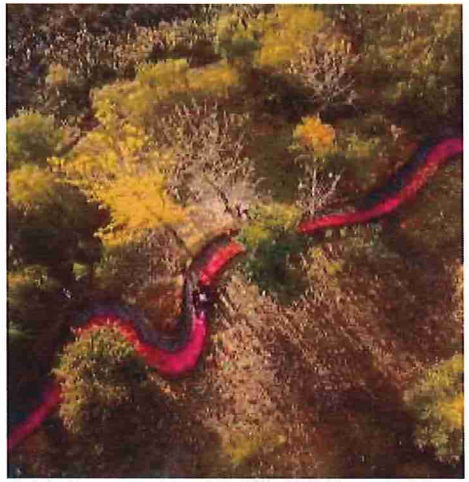
A mix of native and exotic plants could be used in the site which will reference the region's landscape. The landscape design philosophy will take inspiration from these natural element and weave them through the proposed Site with a tone of locally found natural materials.



Innovation and Connection

Avenues and paths are proposed through the trial paddock providing connection with the main campus buildings. This will provide definition, hierarchy and connectivity. Connections lined with seasonal flowering varieties of planting will give legibility to the movement structure.

Site-appropriate storm water infrastructure will enhance water quality and introduce best practice as well as enhance and support the unique visual identity of the site.



Design Layers

Layout

Site Layout

SIte layout comprises a 4.0 Ha area to support research planting fields. These would be organised with a movement pattern supporting biodiversity strips 5m wide with an attempt to support insect life with flowering species.

As a design principle the "bio- strips" will form the armature for the layout, with the balance of the land earmarked for the office campus design.

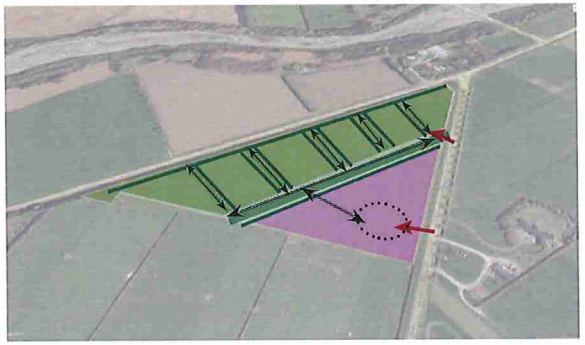
Edges

Edge Treatment : Planting + Green Space

East West green 'spines' will provide opportunity for native planting. Secondary avenues of trees highlight the edge along the Site perimeter with wide open circulation green areas for service, recreation and maintenance. Cross movement is supported by tree lined avenues leading to the centre of the site from all research fields.

Edged by trees, gradual planting spills out to form with green rolling mounds along the Racecourse Road frontage providing a gentle undulating edge. Water stills and races provide for water retention and rain water harvesting.

Location & Arrival



Campus placement & Movement Patterns :

Main access from Racecourse Road.

Location of Proposed Campus

An arrival zone along an landscape access avenue provides a pleasant experience for visitors.

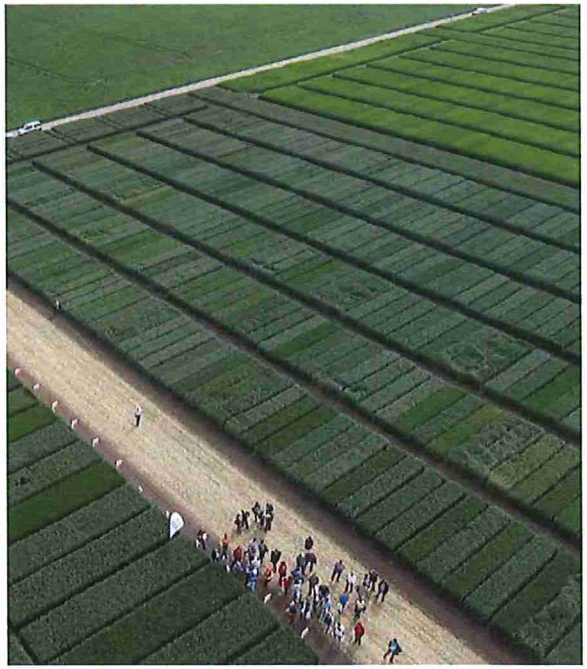
Primary routes through the campus forming connections along the test fields.

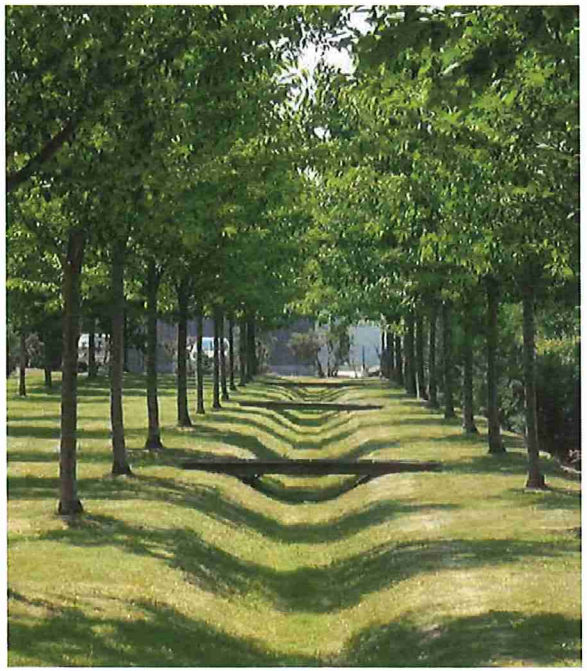
Secondary tree lined axis providing a eastwest link alongside seed plots and defines hierarchy.

Scale: Not to Scale

Open Fields Landscape Character

Open fields for agricultural research provide the basis for the landscape approach setting the framework for the edge interfaces, connections and built form layout. The integration of storm water management, movement corridors and use of local building elements will define the Midlands Seed new proposed campus.



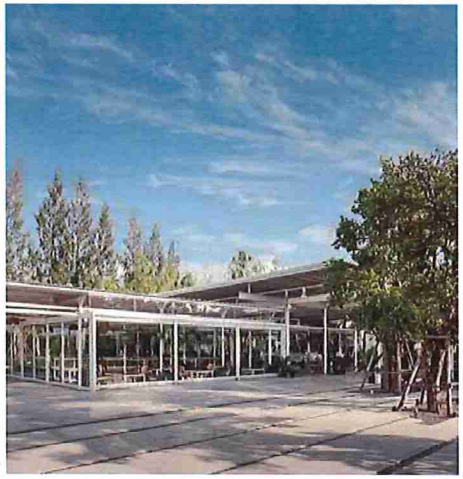


Access and Connections

The access and connections will take design cues from the cultivated field edges to the clean and crisp edges along the campus buildings.

The connection along the open field will be tree lined and defined for legibility while providing native variety with a under layer of planting supportive of bio diversity.

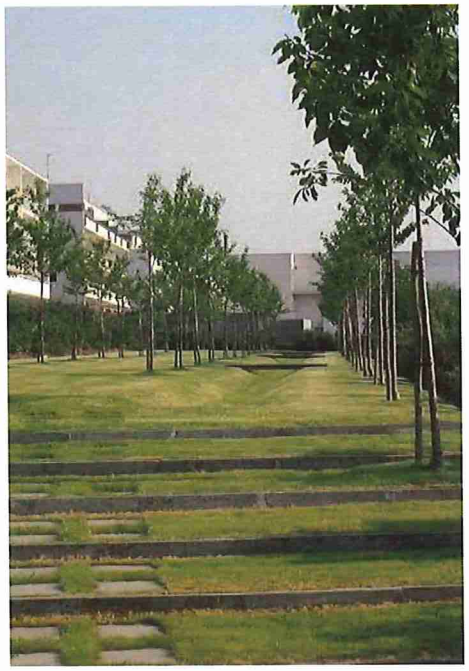
Products like geocells with permeable concrete would ensure maximum water attenuation in hard scaped area like the car parking. The overall idea is the provision of a green framework for the proposed campus development.

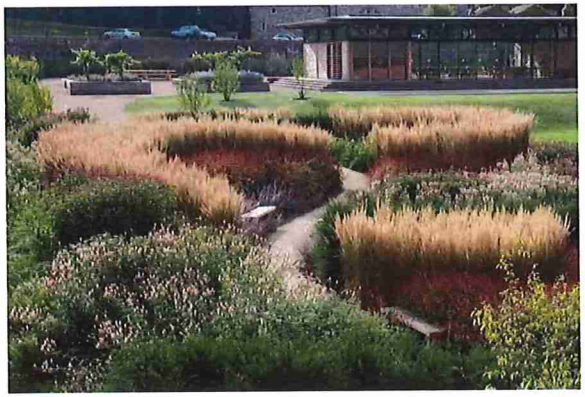


Building Landscape Character

The landscape along the campus would tend to become more formal and supportive of a variety of amenities. This open spaces will support active use of the outdoors for leisure, sport and community interactions.

The landscape elements would be featured within a well landscape garden along the main campus building zone. From the arrival zone to the open garden the campus will use the access routes as elements will bind these spaces as a contiguous experience for the visitors and staff alike.





Schematic Masterplan

1. Main entrance with signage
2. Administrative block- 600sqm
3. Field Office- 200 sqm
4. Landscape plaza
5. Western event lawn
6. Staff & Visitor car parking
7. Service yard with parking
8. Avenue Laneway-18m
9. Entrance tree glade
10. Arrival plaza
11. Low mounding 15m wide with Manuka planting along Racecourse Road
12. Perimeter laneway
13. Campus plaza
14. Trial Plots
15. Swales/Storm water management
16. Service entry
17. Future Fields (only for information)
18. Future expansion zone

Site Boundary

Existing water race

Scale: 1:2000@A3

RMM

Schematic Campus Layout

1. Main entrance with signage
2. Administrative block- 600sqm
3. Field Office- 200 sqm
4. Landscape plaza
5. Western event lawn
6. Staff & Visitor car parking
7. Service yard with parking
8. Avenue Laneway-18m
9. Entrance tree glade
10. Arrival plaza
11. Low mounding 15m wide with Manuka planting along Racecourse Road
12. Perimeter laneway
13. Campus plaza
14. Trial Plots
15. Swales/Storm water management
16. Service entry
17. Future Fields (only for information)
18. Future expansion zone

Site Boundary

Existing water race

Scale: 1:1250@A3

RMM

View of the Site Entrance (indicative only)

Main Entrance from Racecourse Road

View of Campus Complex (indicative only)

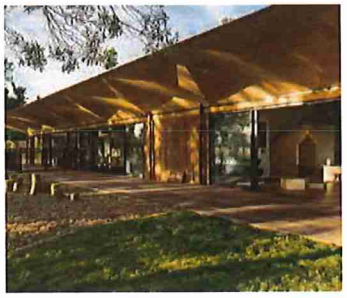
View of the campus garden with amenities

Administrative Block (indicative only)

The main building design is envisaged as a large open plan office space with space to support flexibility of uses for current and future use. The concept building design would make use of a combination of metal with soft timber finish for a humane touch at the eye level.

The blocks would north to address the great views towards Mt. Hutt with the interior layout expected to place maximum work spaces along the northern facade to capitalise on the sun's warmth and enjoy the expanse of the west lawns.

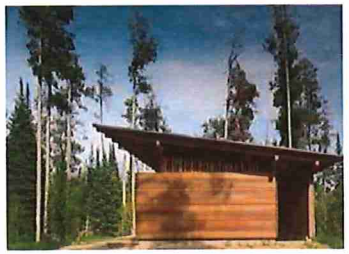
The roof design would be gently sloped with solar photovoltaic panels fitted for energy generation. Weather protected connections would be provided to Field office, constructed would make use of timber frames with glass or polycarbonate roofs. The parking would be laid out hidden from the Site frontage and will have easy access via the connecting corridors.



Field Office Block (indicative only)

The Field office as a ancillary block for housing the research labs and office spaces for the field technicians and officers . The location of the block is central for access of the test fields and Administrative block.

The architectural expression would follow from the Administrative block with a signature roof form which would support a photo voltaic arrangement for clean energy generation. The layout would enable future development of spaces which would easily link up with the proposed structure.



View of Western Event Lawns

The field office is designed as a ancillary block for housing the research labs and office spaces for the field technicians . The location of the block is central for access of the test fields and Administrative block.

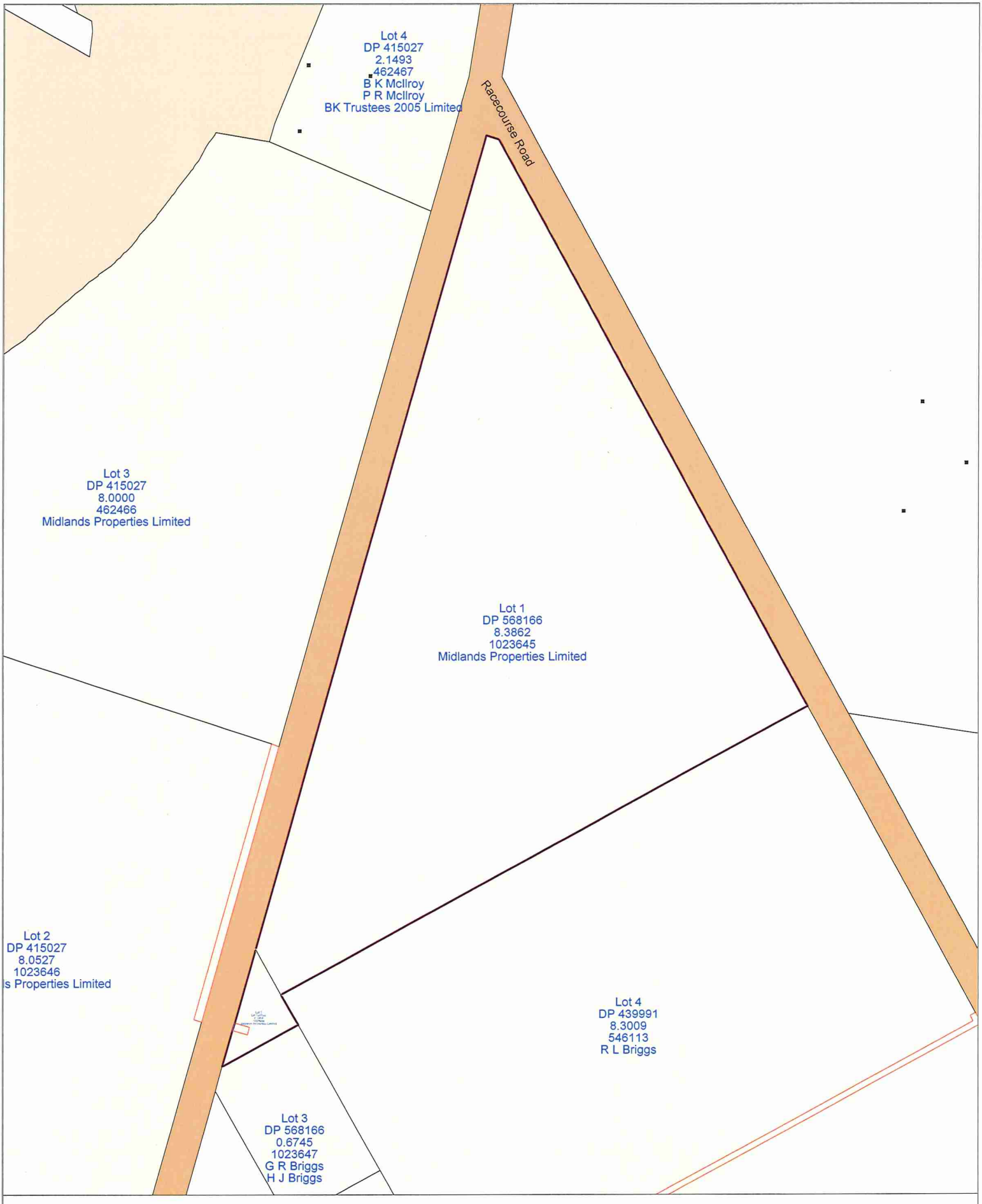
The architectural expression follows from the main block with a signature roof form supporting a photo voltaic arrangement for clean energy generation. The layout will have capacity for future development of areas which would easily link up with the proposed structures.

ROUGH MILNE MITCHELL
LANDSCAPE ARCHITECTS

RMM

rmmla.co.nz

ANNEXURE D – LOCATION PLAN

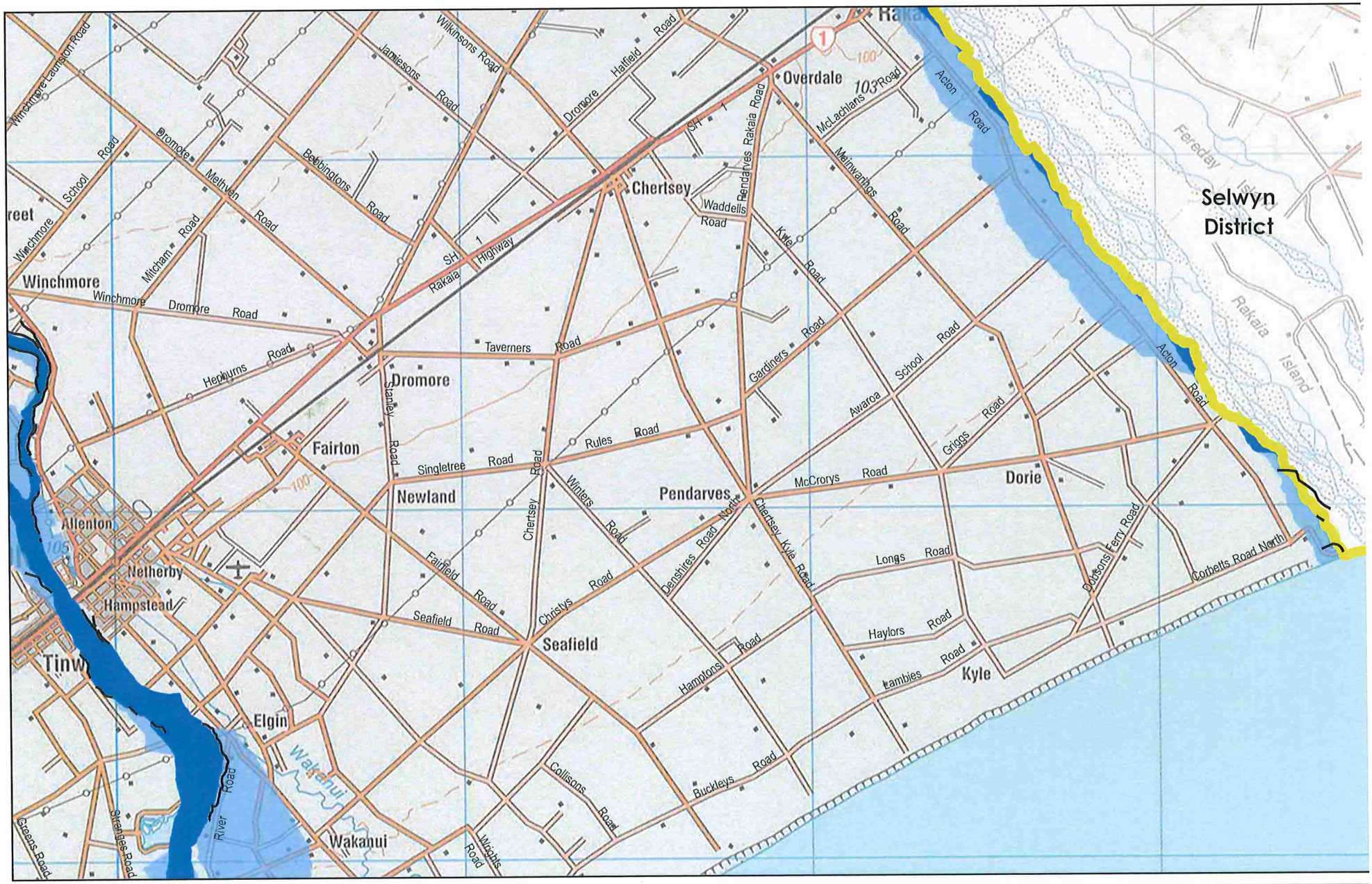


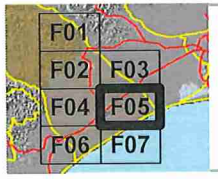
QuickMap
Custom Software Ltd

Any person wishing to rely on the information shown on this map must independently verify the information

Scale 1:3000 Topographical and Cadastral map derived from LINZ data. Printed: 08-Jan-2025 04:45.

ANNEXURE E – PLANNING MAP





Ashburton District Plan

Floodable Areas

Refer to Floodable Areas Map Index for Disclaimer

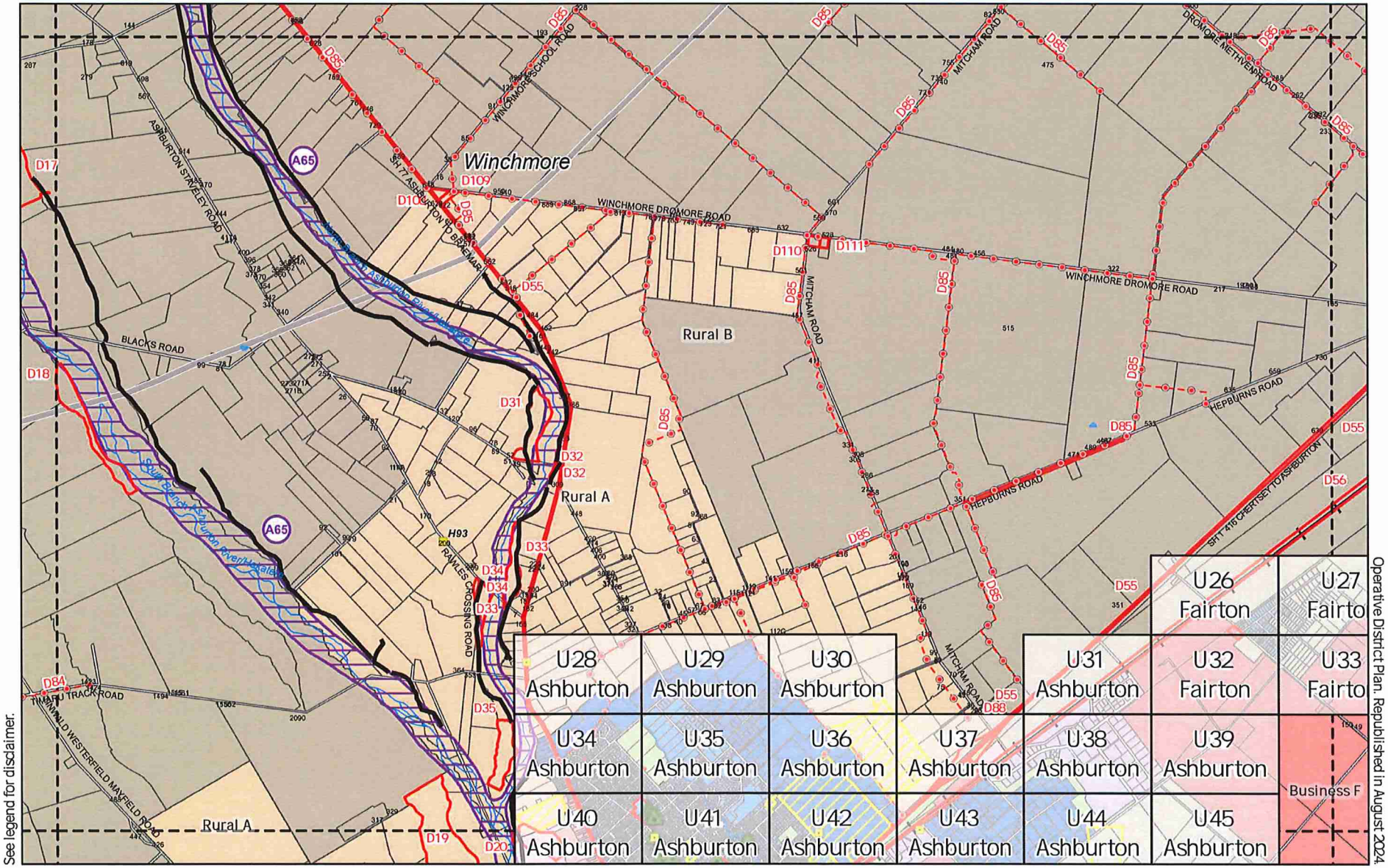
0 1.5 3 6 9 km

Stop Bank
Flood Risk
River Channel
District Boundary

Ashburton District Council

Map F05

08-Mar-1(



See legend for disclaimer.

Operative District Plan. Republished in August 2024

See Rural Index for more context

R58 R59 R60
R64 R65 R66
R71 R72 R73

N

Map R65

Operative District Plan

Rural Map Series

Scale @ A4: 1:50,000

0 1,000

Metres

Ashburton DISTRICT COUNCIL

ANNEXURE F – LLUR

Environment Canterbury
Regional Council
Kaunihera Taiao ki Waitaha

Customer Services
P. 03 353 9007 or 0800 324 636

PO Box 345
Christchurch 8140

P. 03 365 3828
F. 03 365 3194
E. ecinfo@ecan.govt.nz

www.ecan.govt.nz

Dear Sir/Madam

Thank you for submitting your property enquiry from our Listed Land Use Register (LLUR). The LLUR holds information about sites that have been used or are currently used for activities which have the potential to cause contamination.

The LLUR statement shows the land parcel(s) you enquired about and provides information regarding any potential LLUR sites within a specified radius.

Please note that if a property is not currently registered on the LLUR, it does not mean that an activity with the potential to cause contamination has never occurred, or is not currently occurring there. The LLUR database is not complete, and new sites are regularly being added as we receive information and conduct our own investigations into current and historic land uses.

The LLUR only contains information held by Environment Canterbury in relation to contaminated or potentially contaminated land; additional relevant information may be held in other files (for example consent and enforcement files).

Please contact Environment Canterbury if you wish to discuss the contents of this property statement.

Yours sincerely

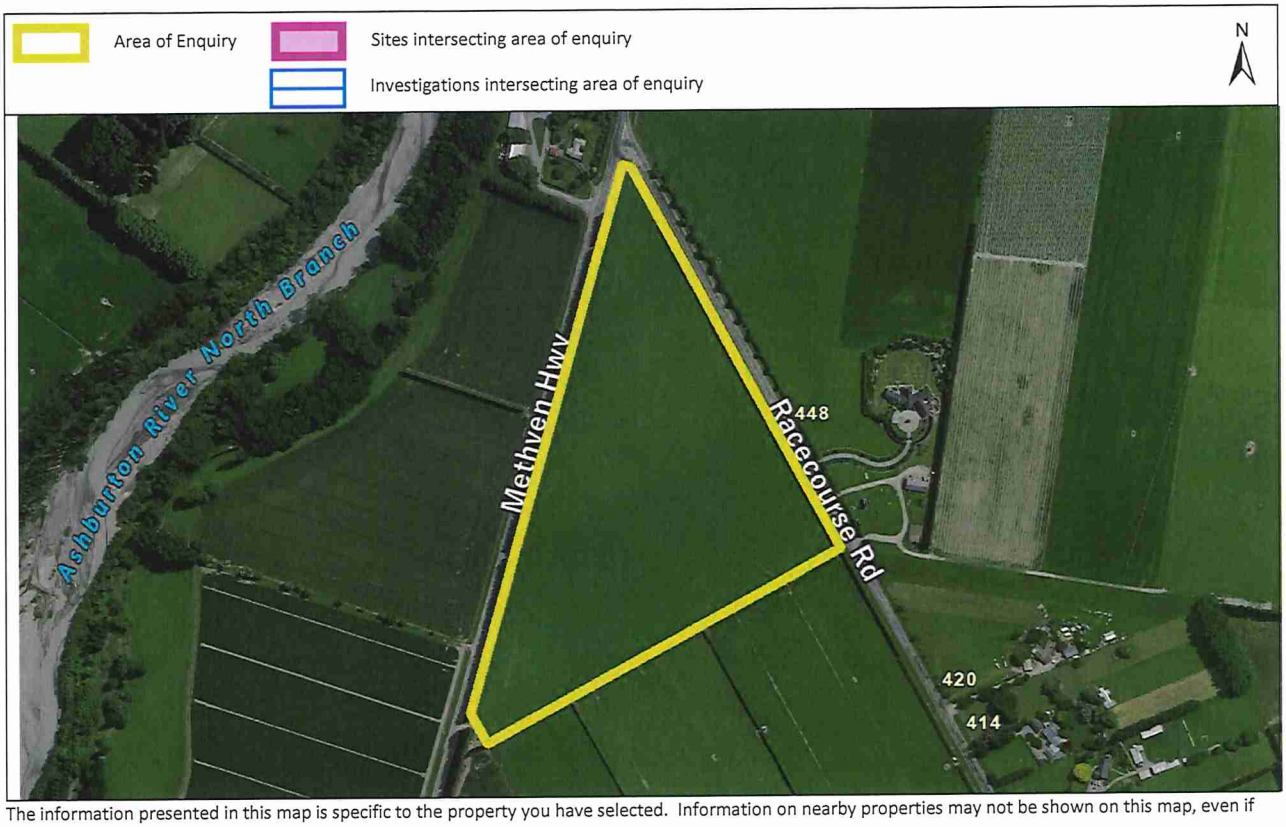
Contaminated Sites Team

Property Statement
from the Listed Land Use Register

Environment Canterbury Regional Council
Kaunihera Taiao ki Waitaha

Visit ecan.govt.nz/HAIL for more information or
contact Customer Services at ecan.govt.nz/contact/ and quote ENQ400950

Date generated: 06 January 2025
Land parcels: Lot 1 DP 568166
Lot 1 DP 568166



The information presented in this map is specific to the property you have selected. Information on nearby properties may not be shown on this map, even if the property is visible.

Sites at a glance

Sites within enquiry area

There are no sites associated with the area of enquiry.

More detail about the sites

There are no sites associated with the area of enquiry.

Disclaimer

The enclosed information is derived from Environment Canterbury's Listed Land Use Register and is made available to you under the Local Government Official Information and Meetings Act 1987.

The information contained in this report reflects the current records held by Environment Canterbury regarding the activities undertaken on the site, its possible contamination and based on that information, the categorisation of the site. Environment Canterbury has not verified the accuracy or completeness of this information. It is released only as a copy of Environment Canterbury's records and is not intended to provide a full, complete or totally accurate assessment of the site. It is provided on the basis that Environment Canterbury makes no warranty or representation regarding the reliability, accuracy or completeness of the information provided or the level of contamination (if any) at the relevant site or that the site is suitable or otherwise for any particular purpose. Environment Canterbury accepts no responsibility for any loss, cost, damage or expense any person may incur as a result of the use, reference to or reliance on the information contained in this report.

Any person receiving and using this information is bound by the provisions of the Privacy Act 1993.

ANNEXURE G – TRAFFIC IMPACT ASSESSMENT

novo group
Planning. Traffic. Development.

Integrated Transport Assessment

prepared for

MIDLANDS PROPERTIES LIMITED

Midlands Seed Campus Development

29 November 2024

Integrated Transport Assessment

prepared for:

MIDLANDS PROPERTIES LIMITED

Midlands Seed Campus Development

Novo Group Ltd
allie@novogroup.co.nz
PO Box 365, Christchurch 8140
P: (03) 365 5570
E: info@novogroup.co.nz
W: www.novogroup.co.nz

Document Date:	29 November 2024
Document Version/Status:	REVISION 1 | FINAL
Project Reference:	0206045
Project Manager:	Rhys Chesterman, Director and Transport Engineer/Planner
Prepared by:	Allie Mace-Cochrane, Transport Engineer
Reviewed by:	Wayne Gallot, Senior Transport Engineer

Table of Contents

List of Figures and Tables

Appendices

Introduction

1. Midlands Properties Limited has commissioned Novo Group to prepare an Integrated Transport Assessment (ITA) for the development of the Midlands Seed Campus at Lot 1 DP568166 and Lot 2 DP568166, Ashburton.

2. This report provides an assessment of the transport aspects of the proposed development. It also describes the transport environment in the vicinity of the site, the transport related components of the proposal, and identifies compliance issues with the transport provisions in the District Plan. It has been prepared broadly in accordance with the Integrated Transportation Assessment Guidelines specified in New Zealand Transport Agency Research Report 422, November 2010.

3. It is proposed to develop the site at Lot 1 DP568166 and Lot 2 DP568166 as a campus servicing Midlands administration and field staff and seed research, within the *Rural A Zone*. The proposal includes the following:

   - Administrative block (600m^2);
   - Field office (200m^2);
   - Event lawn; and
   - Trial plots.

4. The proposal will be supported by two accesses on Racecourse Road; one near the southeastern end of the site (main entrance) and one near the northwestern end of the site (service entry). In addition, 48 car parking spaces are proposed.

5. The proposal is estimated to generate approximately 166 vehicle movements per day (including seasonal workers) in the busiest season.

6. The site location is illustrated in **Figure 1** and a copy of the proposed site layout is provided in **Appendix 1**.

Figure 1. Locality of the site (Canterbury Maps).

Existing Transport Environment

Existing Road Network

Racecourse Road and State Highway 77

7. The site is bordered by two roads; Racecourse Road and State Highway 77. The key characteristics of these roads are summarised in **Table 1**.

Table 1. Summary of Racecourse Road and State Highway 77 road characteristics.

Key Feature	Racecourse Road	State Highway 77
Road Classification	Principal Road	State Highway
Cross-Section Description	Carriageway width of approximately 7.0m, with two 3.5m wide lanes. Marked centre line. Edge lines and dual marked centre lines, including no overtaking restrictions, leading up to the Racecourse Road/State Highway 77 intersection.	Carriageway width of approximately 8.0m, with two 3.5m lanes and 0.5m wide sealed shoulders on both sides. Marked centre line and edge lines.
Traffic Volumes (veh/d)	1,125 (16.0% heavy)[1]	2,451 (7.1% heavy)[2]
Speed (km/h)	100	100
Pedestrian and Cycle Infrastructure	None available.	None available.
Public Transport	None available.	None available.

Racecourse Road and State Highway 77 Intersection

8. The intersection of Racecourse Road and State Highway 77 is a give way controlled T-intersection, as shown in **Figure 2**. The intersection includes a left-turn slip lane, delineated by a raised concrete island, a central raised concrete median island, and flag lighting.

[1]Mobile Road estimate, December 2023
[2]New Zealand Transport Agency State Highway Traffic Monitoring (State highway traffic monitoring – annual average daily traffic)

Figure 2. Layout of the Racecourse Road/State Highway 77 intersection (Canterbury Maps).

Crash History

9. The New Zealand Transport Agency's (NZTA) Crash Analysis System (CAS) has been reviewed to identify crashes that have been reported along Racecourse Road, in the vicinity of the site, and at the Racecourse Road/State Highway 77 intersection, as shown in **Figure 3**. This review has been undertaken for the most recent five-year period (01/07/2019 to 01/07/2024).

Figure 4. CAS search area and location of crashes.

10. No crashes have been reported in this five-year period.

Proposed Development

11. It is proposed to develop the site at Lot 1 DP568166 and Lot 2 DP568166 as a campus servicing Midlands administration and field staff and seed research. The proposal includes the following:

- Administrative block (600m^2);
- Field office (200m^2);
- Event lawn; and
- Trial plots.

Trip Generation

Traffic Generation

12. The proposal is intended to serve the rural sector; therefore, its operation will differ seasonally. The Applicant has provided the following operational data:

- 30 full-time staff; and
- up to 10 visitors or groups per month (it is assumed that visiting groups will be accommodated in the bus movements noted below).

13. In addition, the Applicant has provided the following estimated traffic movement data (includes entry and exit):

- 10-20 tractor movements per day during sowing and harvest;
- 16-20 staff vehicle movements per day during growth and pre-harvest;
- 2-4 bus movements per month (for expert group discussions and farm tour activities); and
- 10 delivery vehicle movements per week (includes heavy and light vehicles).

14. It is anticipated that the majority of vehicle movements will occur at the main access, with the service access accommodating some delivery vehicles and tractor movements.

15. The New Zealand Transport Agency's (NZTA) *Planning Policy Manual*[3] defines an equivalent car movement (ecm) as the following:

- One car to and from a property = 2ecm (i.e.,1ecm each way);
- One truck to and from a property = 6ecm (i.e.,3ecm each way); and
- One truck and trailer to and from a property = 10ecm (i.e.,5ecm each way).

16. Based on information provided by the Applicant, the highest period of traffic generation associated with the site will be during harvesting. Therefore, the estimated traffic generation

[3]planning-policy-manual-appendix-1-glossary.pdf (nzta.govt.nz)

during this period, and subsequent equivalent car movements, is shown in **Table 2**. Where the Applicant has provided data for a month, this has been averaged across the month to give the daily vehicle movements.

Table 2. Estimated daily vehicle movements and equivalent car movements for the proposal.

	Vehicle Movements per Day (in and out)	Equivalent Car Movements per Day (in and out)
Staff Travel	60	60
Work Related Staff Travel	20	20
Visitors (visitors for meetings)	2	2
Bus (group visitors)	2	6
Tractor/Other Machinery	20	60
Delivery Vehicles	2	6
Total	**106**	**154**

17. It is noted that the **Table 2** accounts for the maximum number of vehicle movements per day; therefore, on average, vehicle movements will be less. In addition, the majority of tractor movements will remain on-site, meaning the equivalent car movements to/from Racecourse Road will be lower.

18. The rural location of the site suggests that staff will drive to the site in the morning and leave the site at the end of the working day, without any non-work related vehicle trips during the day. Therefore, all staff related traffic movements will be localised around the start and end of the day (i.e., 30 vehicle movements in the morning and 30 vehicle movements in the evening) during the adjacent network peak periods.

19. All other vehicle movements associated with the site will be spread throughout the day and will typically occur outside of the adjacent network peak periods. There are very few heavy vehicle movements associated with the site, and the 16.0% of heavy vehicles on the adjoining Racecourse Road suggest these can be accommodated on the road network with inconsequential effects.

20. Racecourse Road is classified as a *Principal Road* in the District Plan, suggesting it is suitable to accommodate the number of traffic movements and types of vehicles associated with the site.

21. The above traffic generation does not consider causal staff and seasonal workers. However, it is considered reasonable to assume this will not exceed 60 additional vehicle movements a day during peak season.

Distribution

22. It is challenging to quantify the distribution of traffic associated with the site, due to the nature of the activity. It is considered that traffic will be spread across the network, as it is dependent on the season and the location of off-site farms.

23. The State Highway 77/Racecourse Road intersection is considered suitable to accommodate the traffic associated with the site. State Highway 77 is a low volume State Highway; therefore, the likelihood of significant delay to westbound vehicles caused by a vehicle associated with the site turning right into Racecourse Road is low. There is already a left-turn slip lane for eastbound vehicles turning into Racecourse Road.

24. The State Highway 1/Racecourse Road intersection is also considered suitable to accommodate the traffic associated with the site. There is already a right-turn bay on the State Highway, with sufficient stacking length to accommodate multiple vehicles queueing to turn.

25. It is anticipated that all work specific vehicles will use major roads (*arterial, principal, and collector*) when routing towards its destination or the site. These roads and intersections are considered suitable to accommodate vehicles associated with the site. On some occasions, vehicles will be required to travel down *Local Roads* to reach destinations within the surrounding rural area; however, given these vehicles are servicing farming activities, the associated roads will have been constructed to accommodate all vehicles associated with farming and will be suitable. It is not expected that site generated traffic will need to use the local road network within the Allenton residential/urban area south of the site.

Parking Demand

Car Parking Demand and Supply

26. At least 48 parking spaces are proposed on-site, which is sufficient to accommodate all staff and anticipated visitors. There is also sufficient space for buses to park on-site, as well as informal staff parking if required during peak season.

Site Layout

27. The proposed main access is 12.0m wide, which provides for two-way traffic movements. A 6.0m wide access road, off the main access, provides for site circulation, access to the parking spaces, and access to the research fields.

28. The proposed service access also provides for two-way traffic movements and is 12.0m wide. This provides access to the research fields and service yards, which will be utilised by the farm vehicles associated with the site.

District Plan Compliance

29. The site is located in the *Rural A Zone* and the proposed activity is understood to be *Discretionary*. An assessment of compliance against the transport rules of the District Plan has been undertaken and is provided in **Appendix 2**. **Table 1** summarises the identified non-compliances.

Table 1. Summary of identified District Plan non-compliances.

Rule	Commentary
10.8.6 Cycle Parking	No cycle parks are proposed.
10.9.4 Spacing Between Vehicle Crossings	The proposed main vehicle crossing is immediately opposite one of the farming accesses of 448 Racecourse Road. This vehicle crossing is approximately 40.0m from the main access of 448 Racecourse Road. The proposed service vehicle crossing is approximately 150.0m from the main access of 448 Racecourse Road. The two proposed vehicle crossings are separated by approximately 190m.
10.9.5 Maximum Number of Vehicle Crossings	The site frontage is greater than 100m along Racecourse Road; therefore, one vehicle crossing is allowed. Two vehicle crossings are proposed.

Assessment of Transport Effects

Cycle Parking

30. The District Plan requires one long-term cycle park for a service activity. No cycle parking spaces are proposed.

31. Due to the rural location of the site, the lack of cycle infrastructure in the immediate vicinity, and the higher speed rural road environment, staff and visitors are not anticipated to cycle to the site. It is noted, however, that there is sufficient space on-site for bikes to be stored within the facility.

32. For these reasons, the effects of this non-compliance are considered to be **acceptable** and **less than minor**.

Vehicle Crossing Separation

33. The District Plan requires vehicle crossings on *Principal Roads,* within a posted 100km/h speed limit zone, to be separated by 200m. The proposed main vehicle crossing is approximately 40m from the residential access, and immediately opposite and 45m from the two farming accesses of 448 Racecourse Road. The proposed service vehicle crossing is approximately 150m from the residential access of 448 Racecourse Road. Additionally, the proposed service and main vehicle crossing of the site are separated by approximately 190m.

34. Trotts Garden is also located on Racecourse Road, within the 100km/h posted speed limit zone. This is a commercial site, operating Tuesday-Sunday, with a pub and 'tourist-attraction' garden. The site regularly serves tour buses and is also available for weddings and other private functions. The existing vehicle crossing for the site does not achieve the required vehicle crossing separation distance to multiple residential properties. It is considered that the operation of this commercial vehicle crossing is generally commensurate with the proposed vehicle crossings; therefore, the CAS database has been reviewed for the most recent 10-year period (01/08/2014-01/08/2024) to determine if there are any safety issues with the operation of this access. This search returned no results relating to the function of this access.

35. The residential and farm accesses of the 448 Racecourse Road generate low volumes of traffic; therefore, the likelihood of a vehicle turning into the Midlands site and a vehicle turning into 448 Racecourse Road at the same time is low.

36. Austroads *Guide to Road Design Part 3* (AGRD03) defines stopping sight distance (SSD) as '*...the distance to enable a normally alert driver, travelling at the design speed on wet pavement, to perceive, react, and brake to a stop before reaching a hazard on the road ahead'.* The formula provided in AGRD03 yields a corresponding SSD of approximately 179m[4], which is achieved along Racecourse Road. Therefore, any following vehicle will be able to observe a vehicle turning into/out of the site and/or 448 Racecourse Road and react accordingly. It is also noted that the available sight distance from each access exceeds the requirements of the District Plan.

37. The accesses for 448 Racecourse Road are located on the opposite side of the road from the proposal; therefore, it will also be obvious to following vehicles which site an indicating vehicle is turning into.

38. Drivers are required to indicate for three seconds prior to undertaking a turning manoeuvre. The New Zealand Transport Agency's Mega Maps suggest the mean operating speed past the site is 81km/h; however, to provide a robust assessment it has been assumed that vehicles will be travelling at the posted speed limit. On this basis, a driver would need to indicate for approximately 83m[5] prior to turning. The two proposed site accesses are separated by 190m; therefore, it will be obvious to following vehicles as to which vehicle crossing of the site the indicating vehicle is turning into.

39. For these reasons, the effects of this non-compliance are considered **acceptable** and **less than minor**.

Number of Vehicle Crossings

40. Irrespective of frontage length, a site located on a *Principal Road* with a 100km/h speed limit, is only permitted to have one vehicle crossing, whereas two vehicle crossings are proposed.

41. The proposed site has an area of 8ha; therefore, it is not unreasonable for a site of this size it to have a second vehicle crossing.

42. As noted previously, there is sufficient distance between the two vehicle crossing to ensure there is no confusion for following vehicles as to which vehicle crossing the indicating vehicle is turning into.

43. The second vehicle crossing is proposed as a service access only; therefore, less site generated traffic will use this access. This is not dissimilar to the arrangement at 448 Racecourse Road, and multiple other sites along Racecourse Road.

44. For these reasons, the effects of this non-compliance are considered **acceptable** and **less than minor**.

[4] $SSD = (R_T)V / 3.6 + (V)^2 / (254 (d + 0.01a))$, using a reaction time of 2.5 sec, d of 0.36, and a of 0.
[5] $d = v*t$

Conclusion

45. The proposed site layout has been reviewed against the Transport Rules of the District Plan and the identified non-compliances are in regard to:

- 10.8.6 - Cycle parking,
- 10.9.4 - Spacing between vehicle crossings, and
- 10.9.5 - Maximum number of vehicle crossings.

46. The above section details the effects resulting from these non-compliances; however, overall, it is considered that these are **acceptable** and **less than minor**.

Appendix 1: Proposed Site Layout

RMM

ROUGH MILNE MITCHELL
LANDSCAPE ARCHITECTS

Midlands Seed Campus Development, Racecourse Road, Ashburton

06 Nov 2024

Schematic Masterplan

1. Main entrance with signage
2. Administrative block- 600sqm
3. Field Office- 200 sqm
4. Landscape plaza
5. Western event lawn
6. Staff & Visitor car parking
7. Service yard with parking
8. Avenue Laneway-18m
9. Entrance tree glade
10. Arrival plaza
11. Low mounding 15m wide with Manuka planting along Racecourse Road
12. Perimeter laneway
13. Campus plaza
14. Trial Plots
15. Swales/Storm water management
16. Service entry
17. Future Fields (only for information)
18. Future expansion zone

Site Boundary

Existing water race

Scale: 1:2000@A3

RMM

Schematic Campus Layout

1. Main entrance with signage
2. Administrative block- 600sqm
3. Field Office- 200 sqm
4. Landscape plaza
5. Western event lawn
6. Staff & Visitor car parking
7. Service yard with parking
8. Avenue Laneway-18m
9. Entrance tree glade
10. Arrival plaza
11. Low mounding 15m wide with Manuka planting along Racecourse Road
12. Perimeter laneway
13. Campus plaza
14. Trial Plots
15. Swales/Storm water management
16. Service entry
17. Future Fields (only for information)
18. Future expansion zone

Site Boundary

Existing water race

Scale: 1:1250@A3

RMM

View of the Site Entrance (indicative only)

Main Entrance from Racecourse Road

Appendix 2: District Plan Transport Compliance Assessment

Rule	Assessment	Status
10.8.1 High Traffic Generating Activities a) Any new subdivision or land use activity, or expansion of an existing activity, that exceeds the thresholds set out Table 10-1 shall be classified as a High Traffic Generator and a restricted discretionary activity. b) A Basic Integrated Transport Assessment shall be undertaken for activities that exceed the threshold for a Basic Assessment in Table 10-1 below. The relevant assessment matters shall be restricted to those set out in 10.10.1 a. to c. (Safety and efficiency, Design and Layout, and ITA requirements). c) A Full Integrated Transport Assessment shall be undertaken for activities that exceed the threshold for a Full Assessment in Table 10-1 below. The relevant assessment matters shall be restricted to those set out in 10.10.1 a. to e. (Safety and efficiency, Design and layout, ITA requirements, Heavy vehicles, and Network effects). d) Where an Integrated Transport Assessment has already been approved for the site as part of a granted resource consent, then these rules do not apply to any development that is within scope of that Integrated Transport Assessment and in accordance with the resource consent, unless the resource consent has lapsed.	The site will not generate 50 vehicle movements per peak hour.	**Complies**
10.8.2 Car Parking Spaces in the Business A Zone a) In the Business A Zone of Ashburton where on-site car parking for the convenience of persons working or living on-site is proposed, it shall be provided to the rear of any building(s) on the site and all required loading spaces shall be provided at the rear of building(s) on the site.	The site is not located within the *Business A Zone*.	N/A
10.8.3 Mobility Parking Spaces a) The minimum number of mobility parking spaces provided shall be as specified in Table 10-2: b) Mobility parking spaces shall be: • on the same site as the activity; • located as close as practicable via the most direct route to the accessible entrance to the activity with which they are associated; • on a level surface; • clearly marked; and	Based on the indicative site layout, 48 parking spaces are proposed. Therefore, two mobility spaces are required. Two mobility parking spaces will be included within the parking area.	**Complies**

• designed & constructed in accordance with NZS 4121: 2001 Design for access and mobility: Buildings and associated facilities.		
10.8.4 Size of Parking Spaces a) All parking spaces, other than for residential units, shall be designed to accommodate a 90-percentile design motor car (refer Appendix 10-2) and shall be laid out in accordance with the minimum dimensions specified within Table 10-3 below and as illustrated within Appendix 10-2:	There is sufficient space on-site for the parking spaces to comply with the requirements of the District Plan; therefore, these are assumed to comply.	**Complies**
10.8.5 Residential Parking Spaces a) Where residential car parking spaces are provided within a garage, the minimum internal dimensions shall be as set out in Table 10-4: b) The minimum width of the entrance to a single garage shall be no less than 2.4 m.	The proposed parking spaces are not for residential use.	N/A
10.8.6 Cycle Parking a) All developments in the Business A Zone are to provide long term cycle parking on the same site as the activity to at least the minimum numbers specified in Table 10-5. b) In other zones, all developments other than farming activities are to provide Visitor and Long Term cycle parking on the same site as the activity to at least the minimum numbers specified in Table 10-5. c) Where the calculation of the number of cycle parks results in a fractional number, any fraction under one half shall be disregarded and any fraction of one half or more shall be counted as one space. d) Where a land use corresponds with two or more similar activities in Table 10-5, the activity with the higher cycle parking rate shall apply. Where there are two or more separate activities on a site, the total requirement for the site shall be the sum of the cycle parking requirements for each activity. e) All required visitor cycle parking shall be provided as follows: • in cycle stands and laid out in accordance with Appendix 10-3 and securely anchored to an immovable object; • on the same site and conveniently located to the activity it serves; • clearly visible to cyclists entering the site or appropriately signposted; and • well lit. f) All required long term cycle parking shall be provided as follows:	Based on the gross floor area of the indicative buildings, one long term cycle park is required (rural services activity). No cycle parking is proposed.	**Does not comply**

• provided in cycle stands and laid out in accordance with Appendix 10-3; • on the same site as the activity; • well lit and covered; • located in a secure area, unless located in an area where access by the general public is generally excluded; and • where a cycle stand is provided, it shall be laid out in accordance with Appendix 10-3.		
10.8.7 On-site Manoeuvring a) The manoeuvring area from the road transport network boundary to any parking space shall be designed to accommodate a 90-percentile car (refer Appendix 10-4). b) Onsite manoeuvring for a 90 percentile car (refer Appendix 10-4) shall be provided to ensure that no vehicle is required to reverse either onto or off a site where: • any activity has vehicle access and/or vehicle crossings to an arterial road; • any activity provides 4 or more parking spaces having vehicle access and/or vehicle crossings onto a principal or collector road; • any activity provides 10 or more parking spaces; • three or more residential units share a common vehicle access.	The manoeuvring area has been designed to accommodate a 90-percentile car and no vehicle is required to reverse onto or off the site.	**Complies**
10.8.8 Loading Space Provisions a) Every site in the Business Zones and in the Commercial Area of the Aquatic Park Zone, except for the Business A Zone, shall provide one loading space and associated manoeuvring area.	The site is not located in either of these zones.	**N/A**
10.8.9 Loading Area a) Every loading space provided shall be of a useable shape and in accordance with the following minimum dimensions: • 9m deep • 3.5m wide • 4.5m high Except for: activities not involving the trading of goods (e.g. offices), where the gross floor area is less than 1500m², and on street space is available for occasional servicing	There is sufficient space to accommodate loading on-site. As such, no formal loading bays are proposed. It is noted that no formal loading bays are required. No heavy vehicle is required to reverse onto or off the site.	**Complies**

by larger vehicles, then loading space dimensions shall be in accordance with the following minimum dimensions: • 6.4m deep • 3.5m wide • 3.5m high b) The manoeuvring area from the road boundary to any loading space shall be designed to accommodate a 90 percentile two axle truck (refer Appendix 10-5). c) Onsite manoeuvring for a 90 percentile two axle truck shall be provided to ensure that no truck is required to reverse onto or off a site where any development provides loading areas or trade vehicle storage having vehicle access and/or a vehicle crossing onto an arterial, principal or a collector road. d) If parking or servicing by a large heavy vehicle, such as an articulated truck, is anticipated to occur on a site, then both b) and c) from above apply for the manoeuvring requirements of the vehicle. e) All loading spaces/areas shall be provided in a location that does not impede any through traffic, or manoeuvring areas, or any pedestrian or cycle access.		
10.8.10 Surface of Parking and Loading Areas a) The surface of all parking, loading and trade vehicle storage areas in the Residential Zone, Business A, B, and C Zones, and the Aquatic Park Zone (except parking areas within the Recreational Area of the Aquatic Park Zone), shall be formed to provide an all weather surface. b) The first 3m of all such areas (as measured from the road boundary) shall be formed and sealed for the full width of the vehicle crossing, to ensure that material such as mud, stone chips or gravel is not carried onto any footpath, road transport network or service lane. c) Parking and loading areas in the Recreational Area of the Aquatic Park Zone shall be formed and oversown with grass so as to maintain the character and appearance of the surrounding recreational area.	The site is not located within these zones.	N/A
10.8.11 Tree Planting within Car Parking Areas a) Where a car parking area has central parking rows, which do not abut a site boundary or building, trees shall be planted at least 7.5m apart adjacent to the central car parking spaces. The trees shall be protected from damage by vehicles.	Assumed to comply.	**Complies**

10.8.12 Queuing Requirements a) Where car parking is provided within a site, a minimum queuing length shall be provided in accordance with Table 10-6 below for vehicles entering the site: b) The required queuing length shall be measured from the road boundary at the car park entrance to the nearest vehicle control point or the point where entering cars could conflict with vehicles already on the site. c) Where more than one vehicle crossing is provided to a site, the required queuing length may be assessed for each access point individually, with each parking space allocated to the nearest entry vehicle crossing for the purpose of the assessment. d) Where the following facilities are provided within a site, minimum queuing spaces shall be provided in accordance with Table 10-7 below:	Based on the indicative site layout, 48 parking spaces are proposed. Therefore, 12m of queue space is required. Approximately 16m is provided.	**Complies**
10.9.1 Roading, Access and Vehicle Crossings All new roads shall be laid out and vested in the Council, in accordance with Standard NZS4404:2010, other than as specified below: a) Where a new road transport network is proposed that is located in a manner that makes it capable of being extended in the future to service additional land, the future potential daily traffic volume for the extended road shall be used to determine the minimum and maximum widths required in Table 10- above. This determination shall be based on the greater of the actual number of allotments served or the potential number of allotments that could be served as a permitted or controlled activity. b) The carriageway of all new road transport networks laid out and vested in accordance with a) above shall be formed and sealed. c) Footpaths shall be constructed as a sealed strip of 1.5m width within the berm. d) All areas of berms not sealed in footpath are to be formed in grass. e) Cul-de-sac shall be constructed with turning heads of the following radii, measured from the centre of the turning head to the kerb face: • Residential zones and the Residential and Rural-Residential Areas of the Aquatic Park Zone – 9.5m • All other zones – 15m f) If the corner lot is included in any subdivision, the corner at the road intersection shall be splayed with a diagonal line reducing each boundary by at least 4 metres from the corner, except that in a Business or Rural Zone or if the highest speed limit on either frontage road is greater than 50km/h, then the diagonal line reducing each	No roading infrastructure is proposed to be vested in Council.	**N/A**

boundary shall be at least 6 metres from the corner. The corner rounding or splay shall be vested in the Council. g) Within any new subdivision, provision shall be made for pedestrian and cycle access links, to a level appropriate to the scale and location of the development. h) Where a subdivision adjoins land not yet subdivided, provision shall be made for pedestrian, cyclist and vehicle access linkages between the areas, including vesting of land for future road transport network reserves for the purpose of facilitating connections to future roading extensions to serve surrounding land, or planned road links that may need to pass through the subdivision.		
10.9.2 Vehicular Access a) All vehicular access to fee simple title allotments, cross leases, unit titles or leased premises shall be in accordance with the standards set out in Table 10-9 below. This rule shall not apply to vehicle crossings directly on to individual sites, which do not involve an access (refer to the definition of "access"). The following standards in Table 10-9 are minimum standards: b) The minimum height clearance for all vehicular accesses shall be 4.5m. c) Access to allotments with the potential to accommodate more than 6 residential units shall be provided by way of a road and not by a private way or access lot. d) All vehicle crossings from sealed roads to vehicular accesses shall be sealed for the full berm width of the adjoining road. In the case of the Rural A, B and C Zones, if the access slopes up from the road, the crossing shall be sealed to a minimum distance of 10m from the edge of the carriageway. e) Where an allotment being created by subdivision or a new land use activity establishes on an existing site that has frontage to a state highway as well as to another road, vehicle access and vehicle crossings to the allotment shall be from the other road transport network, rather than the State Highway. f) No activity in the lower density area of the Residential C Zone as shown on the Lochhead Outline Development Plan shall have a vehicle access or vehicle crossing to State Highway 77. Note: For the purposes of this rule, an access shall be taken to slope up from the road if the access has an average gradient of 1:20 or steeper within 10m of the edge of the carriageway.	The proposed service entry has a formed width of approximately 12m and the proposed main entrance has a formed width of approximately 12.0m, including a 3m wide planted median. The access will be sealed for the full berm width.	**Complies**
10.9.3 Distance of Vehicle Crossings from Intersections	The proposed service access is greater than 60.0m from the Racecourse Road/State Highway 77 intersection.	**Complies**

a) No part of any vehicle crossing shall be located closer to the intersection of any roads than the minimum distances specified in Table 10-10 below: b) Distances shall be measured from the point at which the legal boundary lines of the two road frontages intersect. c) Where the boundaries of the site do not allow the provision of any vehicle crossing whatsoever in conformity with the above distances, a single vehicle crossing may be constructed provided it is located in the position which most nearly complies with the provisions of these rules.		
10.9.4 Spacing Between Vehicle Crossings a) On Principal and Arterial Roads where the legal speed limit is 100km/hr, the minimum spacing between successive vehicle crossings (regardless of the side of the road on which they are located) shall not be less than 200m. This rule shall not apply to vehicle crossings to farming activities, which do not provide access or a driveway to buildings (other than haysheds). b) On Principal and Arterial Roads where the legal speed limit is less than 100km/hr, the minimum spacing between successive vehicle crossings (either single or combined) on the same side of the road, shall not be less than 15m. This rule shall not apply to vehicle crossings which serve residential activities only. c) The separation distances shall be measured from the centre of one vehicle crossing to the centre of the succeeding vehicle crossing, parallel to the centreline of the transport network. d) Where the boundaries of the site do not allow the provision of any vehicle crossing whatsoever in conformity with the above distances a single vehicle crossing may be constructed in the position which most nearly complies with the provisions of this rule.	The proposed main vehicle crossing is immediately opposite one of the farming accesses of 448 Racecourse Road. This vehicle crossing is approximately 40m from the main access of 448 Racecourse Road. The proposed service vehicle crossing is approximately 150m from the main access of 448 Racecourse Road. The two proposed vehicle crossings are separated by approximately 190m.	**Does not comply**
10.9.5 Maximum Number of Vehicle Crossings a) The maximum number of vehicle crossings to a site per road frontage shall be in accordance with Table 10-11 below:	The site frontage is greater than 100m along Racecourse Road; therefore, one vehicle crossing is allowed. Two vehicle crossings are proposed.	**Does not comply**
10.9.6 Sight Distances from Vehicle Crossings a) Unobstructed sight distances shall be available from all vehicle crossings, in accordance with the minimum sight distances specified in Table 10-12 below: b) All sight distance measurements shall be undertaken in accordance with the diagram in Appendix 10-6.	160m of sight distance is required from each vehicle crossing. There are no vertical or horizontal alignment changes along Racecourse Road, and there is sufficient separation between the service access and the intersection of Racecourse Road/State Highway 77 to ensure that 160m of sight distance is achieved.	**Complies**

10.9.7 Design and Construction of Vehicle Crossings onto Arterial Roads a) The length of any vehicle crossing shall be in accordance with dimensions set out in Table 10-13 below: b) The vehicle crossing length shall be measured along the property boundary. c) All vehicle crossings on to arterial and principal roads where the speed limit exceeds 50km/hr shall be designed and constructed in accordance with the diagrams included in Appendices 10-7 – 10-8, except for vehicle crossings to farming activities in Rural Zones; this standard shall only apply where a vehicle crossing provides access or a driveway to building(s).	Racecourse Road is not classified as an *Arterial Road*; therefore, this rule does not apply.	N/A
10.9.8 Vehicle Orientated Commercial Activities a) Notwithstanding rules 10.9.3-10.9.6 above, all: • service stations; • truck stops; • commercial activities (or groups of retail activities using common vehicle crossings) containing a total gross floor area of more than 500m²; shall comply with the following additional rules: • No part of any vehicle crossing on to an arterial road shall be located closer than: - 60m to the departure side of any intersection; or - 30m to the approach side of any intersection. • Distance shall be measured from the point at which the legal boundary lines of the two road frontages intersect. • Unobstructed sight distances shall be available from all vehicle crossings, in accordance with the minimum sight distances specified in Table 10-14 below: • Where the legal road speed limit is 50km/hr, the above rule shall only apply to Arterial and Principal roads. • All sight distance measurements shall be undertaken in accordance with the relevant diagram in Appendix 10-6.	The site is considered a rural services activity.	N/A
10.9.9 State Highway Access a) Any new subdivision or land use activity that would require direct access to a state highway at a location where there is currently no such direct access, or would require	Access is not proposed to State Highway 77.	N/A

any alteration to, or increase in the use of an existing direct access to such a state highway, shall be a restricted discretionary activity.		
10.9.10 Minimum Sight Distance from Intersections a) Unobstructed sight distances shall be available from all intersections, in accordance with the minimum sight distances specified in Table 10-15 below: b) All sight distance measurements shall be undertaken in accordance with the relevant diagram in Appendix 10-6.	No intersections are proposed.	N/A
10.9.11 Spacing Between Intersections a) All intersections shall be designed and located such that the minimum spacing between successive intersections is not less than the minimum distance specified in Table 10-16 below: b) The distance shall be measured from the centre of one intersection to the centre of the succeeding intersection, parallel to the centreline of the road. c) In Rural Zones where the legal speed limit for the road is 100km/hr, the above standard shall apply regardless of the side of the road on which the intersections are located. d) On roads in other zones, the above standard shall apply to intersections on the same side of the road only.	No intersections are proposed.	N/A
10.9.12 Tree Planting – Shading and Intersection Visibility a) No tree shall be allowed to grow such that it shades the carriageway of a road throughout the hours of 10am and 2pm on the shortest day of the year. b) No tree shall be planted within 30m of a road intersection, measured to the point at which the legal boundary lines of the two road frontages intersect.	The proposed trees will not shade the carriageway.	**Complies**
10.9.13 Direct Access via Railway Level Crossing a) Any new subdivision or land use activity that would require direct access over a railway level crossing at a location where there is currently no such direct access, and where no alternative access is provided, or would require any alteration to or increase in use of an existing direct access over a railway level crossing, shall be a restricted discretionary activity. b) Any new accessway shall be located a minimum of 30 metres from a road/rail level crossing. The 30 metres shall be measured from the closest rail track to the edge of seal on the proposed accessway.	The site does not have direct access to a level crossing.	N/A

10.9.14 Railway Level Crossings – Vehicle Accessway Location and Minimum Sight Distances a) Any new vehicle accessway onto a road shall be located a minimum of 30 metres from a railway level crossing, measured from the closest railway track to the edge of seal of the proposed accessway. b) No obstruction shall be located such that it fails to comply with the railway level crossing approach sight triangles determined in accordance with Appendix 10-9. Notes: • The above controls apply to established level crossings. Sightlines are also a factor in the development of the design of new level crossings: however further technical assessment against rail and road design standards, and formal statutory approvals under the Railways Act 2005, are also required from the railway operator (Kiwirail). • The rail operator (Kiwirail) also has the authority to require the removal of vegetation, walls, fences, and other obstructions from these sightlines under Section 77 of the Railways Act 2005. The inclusion of the above sightline control standard ensures that development and road/rail safety standards are well integrated, and reduce the (later) risk of a landowner being required to remove obstructions.	The site is not located near a level crossing.	N/A

ANNEXURE H – AGRICULTURAL REPORT

PROPOSED SEED OFFICE & RESEARCH FARM

Agricultural Effects

Report on Property – Cnr Racecource Road & Methven Highway

Table of Contents

Proposed SEED OFFICE & RESEARCH FARM

1. Background

The property located at the corner of Racecourse Road and Methven Highway is being considered for the location of Midlands Groups seed offices and research farm. Midlands is a long-established producer of a variety of specialty seeds for export to a range of markets. The capability to develop the production systems required to produce these specialty seeds to the required standard has been established over a prolonged period of time and has required specialist locations and infrastructure to undertake the research and development required. In addition to this the ability to demonstrate this capability and market these seeds to the world is a critical element.

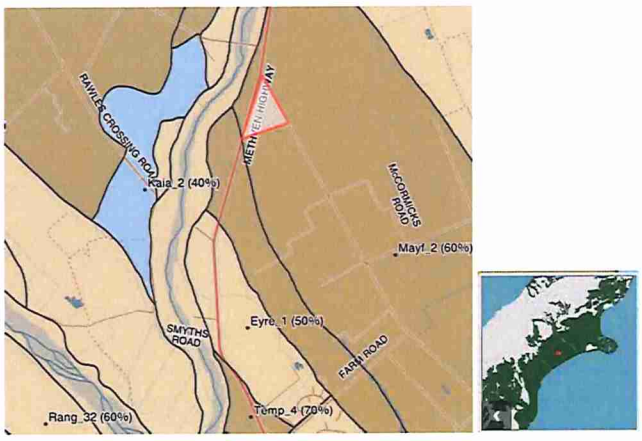
The global investment in this sector has been significant to the point where Midlands deems it prudent to upgrade its current supporting infrastructure and locations to support Midlands maintaining its current market leading position.

The current district plan does not accommodate the required combined attributes that Midlands require for a site to carry out its business activities. Midlands requires a site which is a combination of arable land for field trials, offices and labs to support the field trial work and a place to host international customers to the standard that they are accustomed to in other parts of the world.

The Midlands group propose to own and operate the site.

2. Soil Type & Properties

The property consists of one LINZ parcel which is shown on the map below totaling 8.3862ha. The block is located c1.9km from the Ashburton town boundary and c4.4km from SHW 1 amongst lifestyle blocks, small holdings and plant nurseries. There are external shelter belts around the circumference of the property reducing the effective ha to an estimated 8ha.



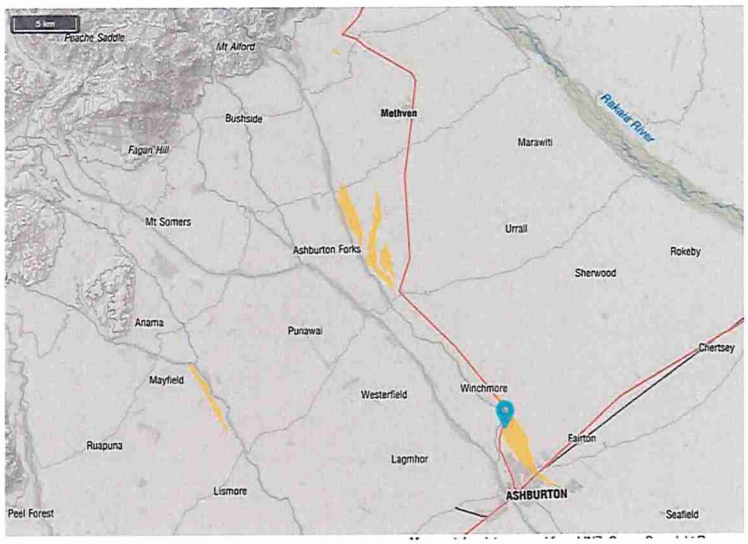
The dominant soil type on this block is Mayfield. This is an alluvial soil suitable for arable farming.

The map of soil siblings below shows where is soil type is located in Mid Canterbury

Soil Siblings

Sibling	Area	Proportion
Mayf_2a.1	5 ha	59.9%
Mayf_1a.1	3 ha	40.0%
Temp_1a.1	< 1 ha	0.1%

All of the siblings in the area selected are listed above - including the non-dominant siblings in each soil polygon.



More detailed information in **appendix 1**

3. Farming Productivity

3.1 Background

This location has been influenced by the expansion of Ashburton and the demand for small rural holdings. This has seen productive farms subdivided into lifestyle blocks which has seen productivity on these blocks fall from commercial norms. The subject property is a case in point as it has not been actively managed and farmed for the last two years. The exceptions to a reduction in commercial normal productivity is where intensification into nursery, horticulture or some other specialist use has occurred. This has often required specific consenting.

3.2 Land use options

The proposal to establish a seed office and research farm would see a more intensive and appropriate use for the property than its current employment. The establishment of the required infrastructure would only require a small/modest element of the property with the majority available for trial plots of arable, vegetable and horticultural crops. The proposed research farm and infrastructure are planned to be established in park like grounds. This is a most suitable farming use for these soils, consistent with the district plan and in keeping with the surrounding properties.

Trial plots will be established on suitable crop rotations similar to an arable farm.

3.3 Useable Area

It is estimated that infrastructure will occupy 0.20ha, parking and entranceway will occupy 0.50ha, park like grounds will occupy 2.3ha and the research farm will occupy 5ha with the remaining being boundary trees. This layout has been designed by Rough Milne Mitchell Landscape Architects. Areas are estimates.

3.4 Irrigation

The property has been developed with a fully consented irrigation system in place since 2002. Previous owners were not irrigating.

Irrigation water is provided at 20l/sec from a 250mm well with a depth of 66m. Water is pressurized to a mainline with irrigation taking place from traveling irrigators.

It is proposed to recommence irrigating on the block of both the crop trials and the parklike grounds. Midlands have had all their irrigation consenting reviewed by Matt Bubb at Aqualinc who confirms all is in order to irrigate.

3.5 Seed office and research farm effects

Given the small area dedicated to buildings and the large area dedicated to crop trials and parklike grounds it is determined that the overall effects of this activity will be negligible.

Any chemical use is in line with label regulations. In addition many of Midlands trials focus on learning how to farm with reduced or no chemicals.

4 Productivity change

Currently, under previous ownership, the property has not been actively farmed. Midlands proposal will see the majority of the land employed for its highest and best use of intensive arable, albeit in capacity of crop trials. This will result in a much more suitable and productive use for this land than under previous ownership where it was not being actively farmed or managed.

Productivity will increase significantly due to the high value activity of research and development of a vast range of crops. See appendix two of photos of some of Midlands existing research and development trails.

4.1 Other land use

As described above a small amount of land is proposed for infrastructure. This has only a very minimal negative effect on the productivity of the block as a whole. Alternatively this block of land could be used for a lifestyle block. A residence suitable for a block of land, including associated buildings, in this location would use a similar amount of land to the proposed offices and would not afford the same highly productive land use of the research farm.

4.2 Weather

Specialist seed production is suitable for Mid Canterbury due to its soil types, irrigation, weather and capability of its farmers and support industries.

Whilst the location does get some rainfall it is often unreliable and requires irrigation. The real strength of the locations weather is its often dry summers for pollination and maturing of crops.

Ashburton Rainfall Data	
Year	mm rainfall per year
2019	648.2
2020	519.8
2021	807.7
2022	836.0
2023	753.9

source: https://ashburtonweather.co.nz/

5. National Policy Statement High Production Land

Under the National Policy Statement – Highly Productive Land there are requirements for the Council to consider potential soil loss for land use activities on higher classes of soil. In particular, under Land Use Classifications (LUC 1-3), the location of this site is on LUC 2 land (sourced from *OurEnvironment Landcare Research website)* which is land that has *very good multiple-use land, slight limitations, suitable for cropping, viticulture, berry fruit, pastoralism, tree crops and forestry.*

In effect some small portion of the land will be taken out of production with the use of the site for buildings and hardstand areas with some landscaping about the site. However alongside these buildings comes the trial crops and plantings that are required and fully intended as part of the development.

The intent is very much to continue this as a research and development block which still requires over 62% of the available land area to be used for arable production through careful trials and management.

Clause 3.9 of the NPS HPL sets out that the inappropriate use or development of HPL that is not land-based primary production, must be avoided. It does contain a list of circumstances where the use or development of HPL is appropriate.

In particular 3.9(2)(a) requires that, A use or development of highly productive land is inappropriate except where at least one of the following applies to the use or development, and the measures in subclause (3) are applied:

(a) it provides for supporting activities on the land:

This proposal for a world standard specialist arable research and development facility, which it is my view, supports the activities on the land. As detailed in the resource consent application that this report supports, there are a number of various arable and some pastoral activities reliant upon the soil and land that Midlands undertake.

The measures set out in clause 3.9(3) still need to be applied, meaning that territorial authorities must still take measures to ensure that use and development on HPL minimizes and mitigates loss of HPL in the relevant district.

Therefore, in terms of potential soil loss this is not considered to be an effect; the predominant use of land, for agriculture and the connected research and development facilities in terms of the buildings and ancillary driveways and parking areas, still has a large positive net effect.

6. Summary of Assessment

- The soils on this block are suitable for the intended use of crop trials.
- Only a very minor portion of the block is being committed to building infrastructure with the overwhelming majority of the block being used for crop trials.
- The proposed use will take a property which is not being actively farmed and employ it in a significantly more productive way.
- The proposed activity is considered to fit within the rural, intensive rural, commercial nursery and lifestyle activities in the community.
- There are no significant adverse effects.
- The soils and land will be maintained due to appropriate crop rotations in keeping with best management practice.
- Appropriate professionals are employed to ensure the property is developed in an appealing way.
- The location is good due to beneficial climatic characteristics.

Report Completed by Richard Bowman. B.Com.Ag. Lincoln University

.....

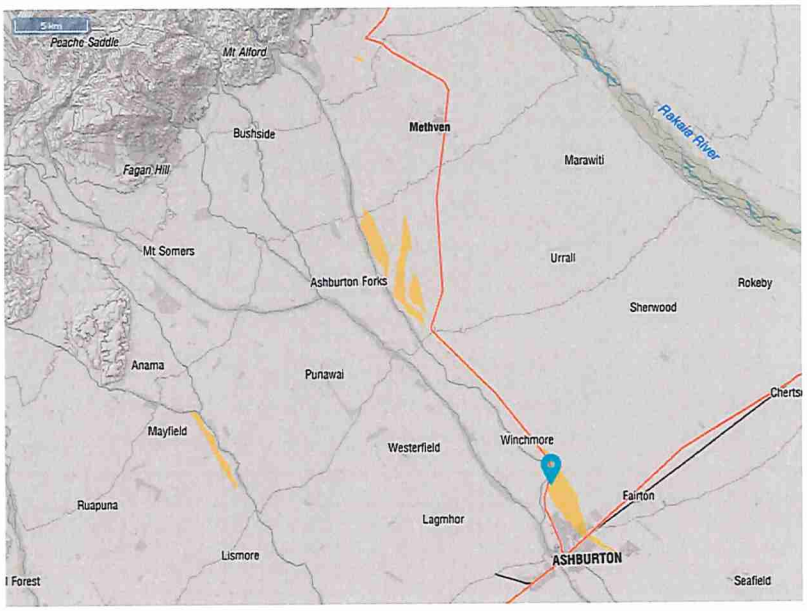
1st November 2024

Appendix one

Soil map unit factsheet

Report generated: 16/10/2024 from https://smap.landcareresearch.co.nz/maps-and-tools/app?gislayer=PandD&soilmapuc=mcc56&factsheetType=undefined&siblingNumber=undefined&objectId=undefined&pinCoordinate=1498179.230999727%2C5142889.846008257

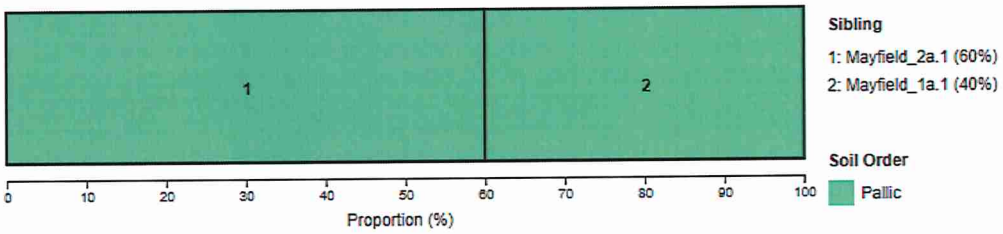
Areas with PandD\mcc56 map unit code are shown on the map below. A soil map unit is a collection of areas that have the same soils (i.e. siblings) in the same proportion.



Map contains data sourced from LINZ. Crown Copyright Reserved

Proportion of siblings in this map unit

Graph is coloured according to the NZSC soil order of each sibling within this map unit.



Soil properties of the siblings within the soil map unit

This table shows the details of the soil siblings within the map unit. The profile available water (Paw) is a measure of the capacity of the soil sibling to store water to a depth of 1 metre. Click the links below to find out more about each item:

Soil Order, Drainage Class, Depth Class

No.	Smap name	Proportion (%)	Depth	Texture	Drainage class	PAW (mm)	Order
1	Mayfield_2a.1	60	Moderately Deep	silt	Moderately well drained	119.3	Pallic
2	Mayfield_1a.1	40	Deep	silt	Moderately well drained	139.3	Pallic

Soil Survey

This soil mapunit was mapped within the following soil survey:

Survey Title: Mid Canterbury
Survey Scale: 50000
Survey Date: 2000 to 2012
Origin: legacy update major
Map Unit Delineation Method: Hand-drawn
Map Unit Labelling Method: Observations
Sibling Base Property Classification Method: Observations
Description: Average quality for a 1:50,000 soil map. Most of S-map

Landform

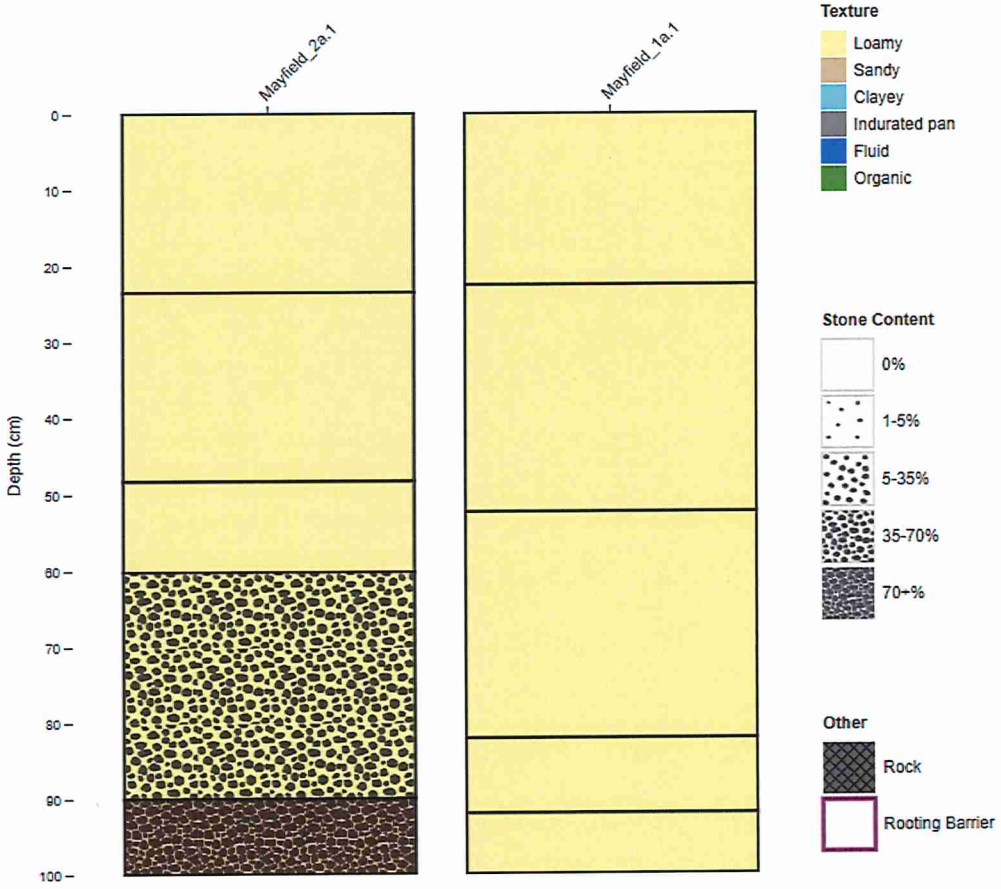
The landform tree hierarchy below shows where the selected soil mapunit fits within the wider landscape

Land province - East Coast plains and downs
Extensive, coalescing, broad outwash piedmont fans, aggradational and degradational terraces, lower fan, and low-gradient coastal plain depositional sequences; associated interior basins, and the rolling to strongly rolling to moderately steep hills and downlands underlain by moderately soft and hard young non-calcareous and calcareous rocks, greywacke, and weathered older gravels, with or without a significant loess mantle.

- **Land region** - Plains
  Extensive, coalescing, broad outwash piedmont fans, aggradational and degradational terraces, lower fan, and low-gradient coastal plain depositional sequences; and associated interior basins.
  - **Land subregion** - Terraces and fans
    - **Land system** - Older intermediate terraces
      Soils on terraces that were formed 6000 to 12000 years ago.
      - **Land unit** - Subhygrous
        Soils occur in subhumid climate where moderately deep soils experience 10-14 weeks below wilting point and 4-8 weeks at, or above, field capacity.

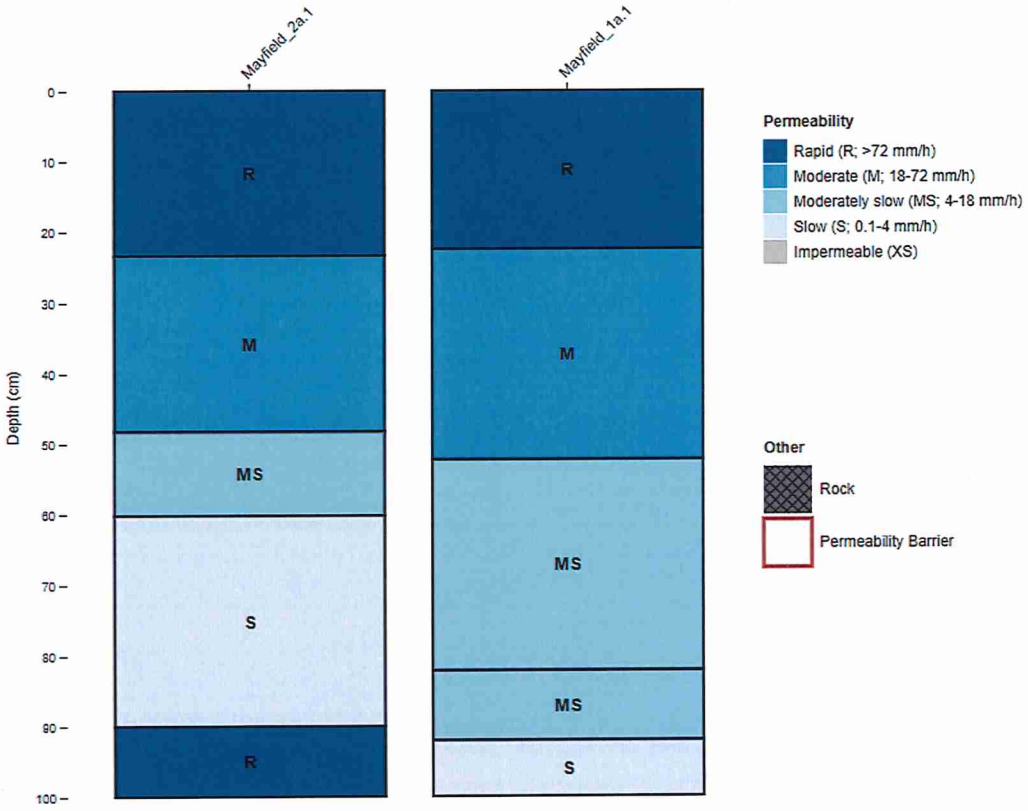
Texture graph

This graph shows the texture profile of the siblings found in the map unit. Each horizon is coloured according to its texture.



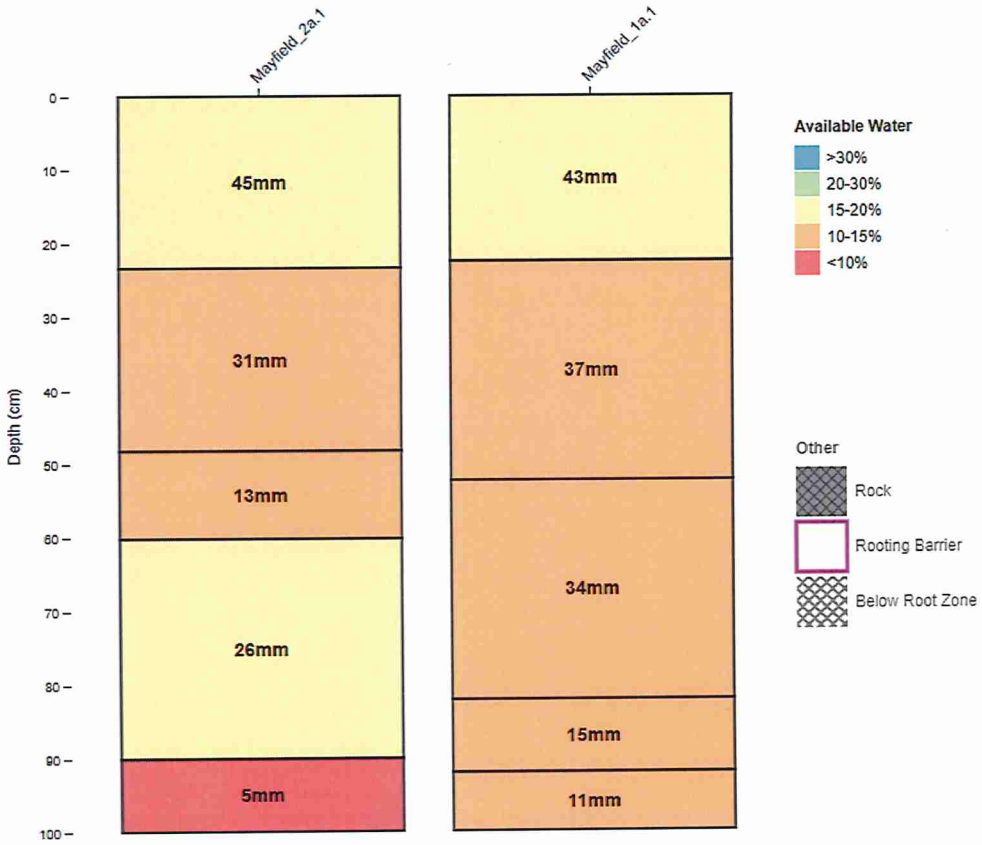
Permeability graph

This graph shows the permeability profile of the siblings found in the map unit. Each horizon is coloured according to its permeability. Click here for more information on permeability.



Available Water Graph

This graph shows the available water profile of the siblings found in the map unit. This is capacity of the soil to hold water that is available to plants. Each horizon is coloured according to its percent available water content. Click here for more information on available water.



Appendix two.

Carrot grow out trials

Raddish trials

Brassica trials

Vegetable flowering trials

Harvesting with a mini trial harvester

Planting