

APPLICATION ON NOTIFICATION – Category 2

Applicant:	Springwood Development Nominees
Development Number:	490/E006/19
Nature of Development:	Construction of a shopping centre comprising supermarket and six (6) specialty shops, two (2) standalone shops, associated car parking and signage
Development Type:	Merit
Subject Land:	Calton Road, GAWLER EAST - Lot 9010 CT 6205/146 (Proposed lot 2046 DA 490/D026/19)
Development Plan:	Gawler Development Plan
Zone / Policy Area:	Residential (Gawler East) Zone/ Mixed Use Centre Policy Area 3
Contact Officer:	Hannah Connell
Phone Number:	7109 7828
Consultation Start Date:	15 January 2020
Consultation Close Date:	5:00pm Monday, 3 February 2020
<p>During the notification period, hard copies of the application documentation can be viewed at the Department of Planning, Transport and Infrastructure, Level 5, 50 Flinders St, Adelaide, during normal business hours. Application documentation may also be viewed during normal business hours at the local Council office (if identified on the public notice).</p>	

Written representations must be received by the close date (indicated above) and can either be posted, hand-delivered or emailed to the State Commission Assessment Panel.

Any representations received after the close date will not be considered.

Postal Address:

The Secretary
State Commission Assessment Panel
GPO Box 1815
ADELAIDE SA 5001

Street Address:

Development Division
Department of Planning, Transport and Infrastructure
Level 5, 50 Flinders Street
ADELAIDE

Email Address: scapreps@sa.gov.au

**South Australian
DEVELOPMENT ACT, 1993
REPRESENTATION ON APPLICATION – CATEGORY 2**

Applicant: Springwood Development Nominees
Development Number: 490/E005/19
Nature of Development: Construction of a Sales Centre (two storey) comprising Showroom, Office and Cafe with associated car park and signage.
Development Type: Merit
Zone / Policy Area: Residential (Gawler East) Zone/ Mixed Use Centre Policy Area 3
Subject Land: Calton Road GAWLER EAST – Lot 9010 CT 6205/146
(Proposed Lot 1006 in DA 490/D025/19)
Contact Officer: Hannah Connell
Phone Number: 7109 7828
Close Date: 5:00pm Monday, 3 February 2020

My Name: _____ My phone number: _____

Primary method(s) of contact: Email: _____
Postal Address: _____ Postcode: _____

You may be contacted via your nominated PRIMARY METHOD(s) OF CONTACT if you indicate below that you wish to be heard by the State Commission Assessment Panel in support of your submission.

- My interests are:**
(please tick one)
- owner of local property
 - occupier of local property
 - a representative of a company/other organisation affected by the proposal
 - a private citizen

The address of the property affected is: _____
Postcode _____

- My interests are:**
(please tick one)
- I support the development
 - I support the development with some concerns
 - I oppose the development

The specific aspects of the application to which I make comment on are: _____

- I:** wish to be heard in support of my submission
(please tick one) do not wish to be heard in support of my submission
(Please tick one)
- By:** appearing personally
(please tick one) being represented by the following person
(Please tick one)

Signature: _____
Date: _____

DEVELOPMENT APPLICATION FORM

PLEASE USE BLOCK LETTERS

COUNCIL: Town of Gawler

APPLICANT: Springwood Development Nominees

Postal Address: 7 Easton Drive, Gawler East
SA 5118

Owner: Five Ames Farming Pty Ltd

Postal Address: 63 Gawler Terrace, Gawler South
SA 5118

BUILDER: N/A

Postal Address: _____

_____ Licence No: _____

CONTACT PERSON FOR FURTHER INFORMATION

Name: Kieron Barnes - Ekistics Planning & Design

Telephone: 7231 0286 [work] _____ [Ah]

Fax: _____ [work] _____ [Ah]

EXISTING USE: Vacant

FOR OFFICE USE

Development No: _____

Previous Development No: _____

Assessment No: _____

- Complying
- Non Complying
- Notification Cat 2
- Notification Cat 3
- Referrals/Concurrences
- DA Commission

Application forwarded to DA

Commission/Council on

Decision: _____

Type: _____

Date: / /

	Decision required	Fees	Receipt No	Date
Planning:	_____	_____	_____	_____
Building:	_____	_____	_____	_____
Land Division:	_____	_____	_____	_____
Additional:	_____	_____	_____	_____
Development Approval	_____	_____	_____	_____

DESCRIPTION OF PROPOSED DEVELOPMENT: Supermarket and speciality shops with associated car park, landscaping and signage

LOCATION OF PROPOSED DEVELOPMENT: Proposed Lot 2046 in DA 490/D026/19

House No: _____ Lot No: _____ Street: _____ Town/Suburb: Gawler East

Section No [full/part] _____ Hundred: _____ Volume: _____ Folio: _____

Section No [full/part] _____ Hundred: _____ Volume: _____ Folio: _____

LAND DIVISION:

Site Area [m²] _____ Reserve Area [m²] _____ No of existing allotments _____

Number of additional allotments [excluding road and reserve]: _____ Lease: YES NO

BUILDING RULES CLASSIFICATION SOUGHT: _____ Present classification: _____

If Class 5,6,7,8 or 9 classification is sought, state the proposed number of employees: Male: _____ Female: _____

If Class 9a classification is sought, state the number of persons for whom accommodation is provided: _____

If Class 9b classification is sought, state the proposed number of occupants of the various spaces at the premises: _____

DOES EITHER SCHEDULE 21 OR 22 OF THE DEVELOPMENT REGULATIONS 2008 APPLY? YES NO

HAS THE CONSTRUCTION INDUSTRY TRAINING FUND ACT 2008 LEVY BEEN PAID? YES NO

DEVELOPMENT COST [do not include any fit-out costs]: \$ 6,000,000

I acknowledge that copies of this application and supporting documentation may be provided to interested persons in accordance with the Development Regulations 2008.

SIGNATURE: 

Dated: 14 / 6 / 19.

ekistics

SPRINGWOOD SALES CENTRE

Planning Statement

Prepared for:
Springwood Communities

Date:
June 2019

ekistics

Proprietary Information Statement

The information contained in this document produced by Ekistics Planning and Design is solely for the use of the Client as identified on the cover sheet for the purpose for which it has been prepared and Ekistics Planning and Design undertakes no duty to or accepts any responsibility to any third party who may rely upon this document.

All rights reserved. No section or element of this document may be removed from this document, reproduced, electronically stored or transmitted in any form without the written permission of Ekistics Planning and Design.

Document Control

Revision	Description	Author	Date
V1	Draft Planning Statement	KB	12 June 2019
V2	Final Planning Statement	KB	14 June 2019

Approved by:



Date: 14 June 2019

Contents

1. EXECUTIVE SUMMARY	4
2. INTRODUCTION/BACKGROUND	4
3. THE SUBJECT SITE AND LOCALITY	8
3.1 THE SUBJECT LAND	8
3.2 THE SUBJECT SITE	9
3.3 THE LOCALITY AND SURROUNDING DEVELOPMENT	12
4. PROPOSED DEVELOPMENT	14
4.1 LAND USE, BUILT FORM, ACCESS AND SIGNAGE	14
4.2 STORMWATER MANAGEMENT	15
5. PROCEDURAL REQUIREMENTS	15
5.1 RELEVANT AUTHORITY	15
5.2 NATURE OF DEVELOPMENT	15
5.3 PUBLIC NOTIFICATION	16
5.4 AGENCY REFERRALS	16
6. DEVELOPMENT PLAN ASSESSMENT	16
6.1 OVERVIEW	16
6.2 LAND USE	17
6.3 DESIGN AND APPEARANCE	21
6.4 ACCESS AND PARKING	22
6.5 CRIME PREVENTION	25
6.6 STORMWATER AND FLOODING CONSIDERATIONS	27
6.7 SIGNAGE	27
6.8 LANDSCAPING	30
6.9 INTERFACE CONSIDERATIONS	30
7. CONCLUSION	31

Appendices

<i>Appendix 1. Land Tenure Plan and Certificate of Title</i>	33
<i>Appendix 2. Plan of Division</i>	34
<i>Appendix 3. Proposed plans and elevations Studio Nine</i>	35
<i>Appendix 4. Traffic and Parking Review CIRQA</i>	36

Figures

<i>Figure 2.1 Development Package 1</i>	5
<i>Figure 2.2 Springwood Master Plan (Tract)</i>	6
<i>Figure 2.3 Springwood Place and Community Masterplan (Tract)</i>	6
<i>Figure 2.4 Springwood Village Centre Masterplan (Tract)</i>	7
<i>Figure 3.1 Land Tenure Plan</i>	8
<i>Figure 3.2 Associated land division – subject site is Lot 1006</i>	9
<i>Figure 3.3 Associated land division (enlargement) – subject site is Lot 1006</i>	9
<i>Figure 3.4 Subject site</i>	10
<i>Figure 3.5 Site of the Sales Centre (looking south)</i>	11
<i>Figure 3.6 Site of the Sales Centre (looking east)</i>	11
<i>Figure 3.7 Subject Site and Surrounds</i>	13
<i>Figure 3.8 Site of the proposed supermarket to the north-east of the Sales Centre</i>	13
<i>Figure 3.9 Future residential areas of the Springwood development (looking south-west)</i>	14
<i>Figure 6.1 Zoning and Policy Areas</i>	17
<i>Figure 6.2 Gawler East Structure Plan</i>	20
<i>Figure 6.3 Extract from Table Ga/4</i>	28

1. Executive Summary

Category	Details
PROJECT	Springwood Sales Centre
ADDRESS OF SITE	Proposed Lot 1006 in DA 490/D025/19 – Calton Road, Gawler East
CERTIFICATE OF TITLE	Volume 6205 Folio 146 (Parent title)
SITE AREA	2,604m ²
FRONTAGE	50.82m to the Gawler East Link Road (under construction)
LOCAL GOVERNMENT	Town of Gawler
RELEVANT AUTHORITY	State Commission Assessment Panel
PRE-LODGE MENT PANEL MEETINGS	29 March 2019
DEVELOPMENT PLAN	Gawler (CT) (consolidated 20 February 2018)
ZONING	Residential (Gawler East) Zone
POLICY AREA/PRECINCT	Mixed Use Centre Policy Area 3
EXISTING USE	Vacant
PROPOSAL DESCRIPTION	Springwood Sales Centre incorporating an office and café with associated car parking, landscaping and signage
AGENCY REFERRALS	N/A
PUBLIC NOTIFICATION	Category 2
APPLICANT	Springwood Nominees Pty Ltd
CONTACT PERSON	Kieron Barnes – Ekistics Planning and Design – (08) 7231 0286
OUR REFERENCE	00741

2. Introduction/Background

Springwood is a 217.5 ha master planned community in Gawler East and Kalbeeba which, once completed, will feature approximately 1,750 residential allotments. Approximately 350 of these allotments have already been created (or are in the process of being created), while an additional 1,404 residential allotments will be created via separate land division applications that have been lodged with the State Commission Assessment Panel. In addition to the proposed residential allotments, eleven allotments will be created for commercial or educational purposes. This includes proposed Lot 1,006 in DA 490/D025/19 on which a Sales Centre for the Springwood development will be located.

By letter dated 15 November 2018, the State Coordinator General advised that the State Commission Assessment Panel would be the relevant authority to assess all of the remaining portions of the Springwood development. This 'call-in' by the State Coordinator General was conditional on the development proceeding via a series of 'Development Packages' as follows.

- **Development Package 1** comprising the following elements:
 - » Land division for all of the remaining portions of the Springwood development (including residential areas, retail areas, community areas and school precinct);
 - » Retail area (supermarket, speciality shops and associated car parks); and

- » Sales Centre with retail component.
- **Development Package 2** comprising the following elements:
 - » Retirement village;
 - » Childcare Centre; and
 - » Additional retail.
- **Development Package 3** comprising the following elements:
 - » School precinct.

Figure 2.1 below broadly illustrates the area and scope of Development Package 1. In addition to the application for a Sales Centre, four land division applications and a development application for a supermarket with speciality shops have been lodged concurrently with SCAP.

Figure 2.1 Development Package 1



The Springwood development is proceeding in accordance with a Masterplan developed by Tract Consultants and will include a 'village centre' together with a supermarket and other speciality retail stores, various community uses and a school with large sporting grounds (see **Figures 2.2, 2.3 and 2.4**).

As a large master planned community, Springwood represents a significant economic investment and development for the Gawler Region and the State. Importantly, Springwood will result in significant employment generation and employment multipliers. It will also capitalise on significant embedded Government investment in infrastructure including the new 'Gawler East Link Road' (GELR) which will pass through the northern precinct of Springwood to service the proposed new Springwood Village Centre within which the Sales Centre will be located.

Figure 2.4 Springwood Village Centre Masterplan (Tract)



This planning statement provides information about the subject site and the proposed development while also addressing the merits of the proposal against the relevant provisions of the Gawler (CT) Development Plan – particularly the ‘Mixed Use Centre Policy Area 3’ of the ‘Residential (Gawler East) Zone’.

This planning statement has been informed by specialist advice which forms part of the application and is appended as follows:

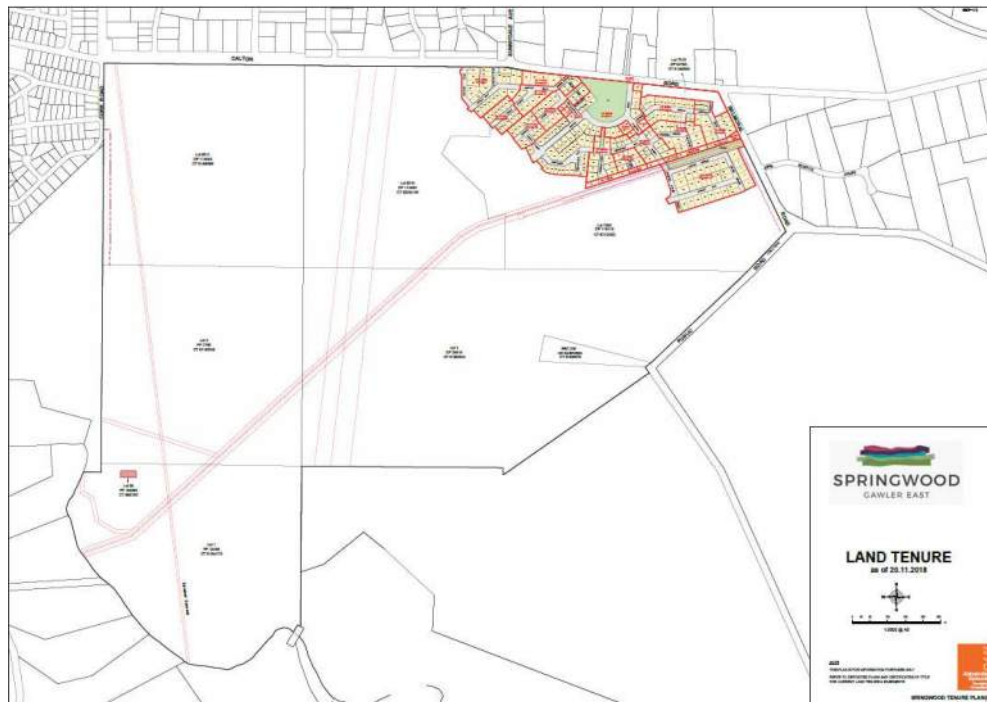
- **Appendix 1:** Land Tenure Plan and Certificate of Title
- **Appendix 2:** Plan of Division
- **Appendix 3:** Proposed plans and elevations Studio Nine
- **Appendix 4:** Traffic Impact Assessment CIRQA

3. The Subject Site and Locality

3.1 The Subject Land

Currently, the subject land forms part of Allotment 9010, Deposited Plan 114845 in Certificate of Title Volume 6205 Folio 146 (refer to **Appendix 1**). Allotment 9010 forms part of a number of titles which are being developed for the broader Springwood development (see **Figure 3.1** below and **Appendix 1**).

Figure 3.1 Land Tenure Plan



There are a number of easements affecting the subject land including (but not limited to):

- A 275kV transmission line within a 100m wide ElectraNet easement that runs in a north-south direction;
- A DN750 MSCL potable water main, known as the Barossa Trunk Main, is located within a 10.06m wide easement running through the south-eastern corner of the land; and
- A 450mm diameter high pressure gas transmission pipeline, owned and operated by South East Australia Gas Pty Ltd (SEA Gas), is located within a 15m wide easement that runs parallel to the Barossa Trunk Main.

The easements listed above do not affect the site of the proposed Sales Centre. Similarly, the Land Management Agreements that are noted on the title, do not affect the site of the proposed Sales Centre.

3.2 The Subject Site

While the subject land currently forms part of Allotment 9010 in Deposited Plan 114845, the subject site comprises proposed Allotment 1006 in Development Application 490/D025/19 see **Figures 3.2** and **3.3**.

Figure 3.2 Associated land division – subject site is Lot 1006

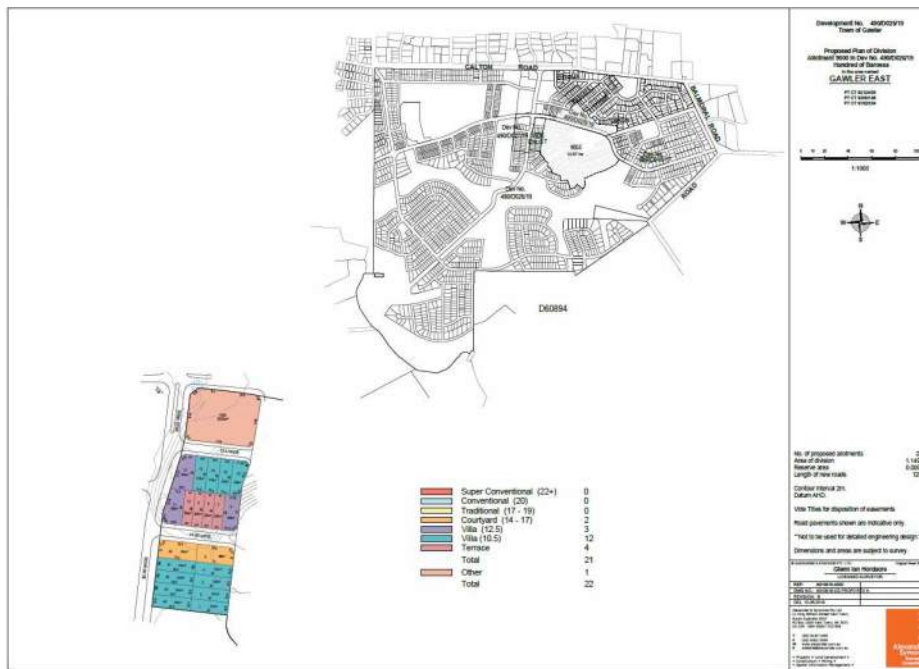
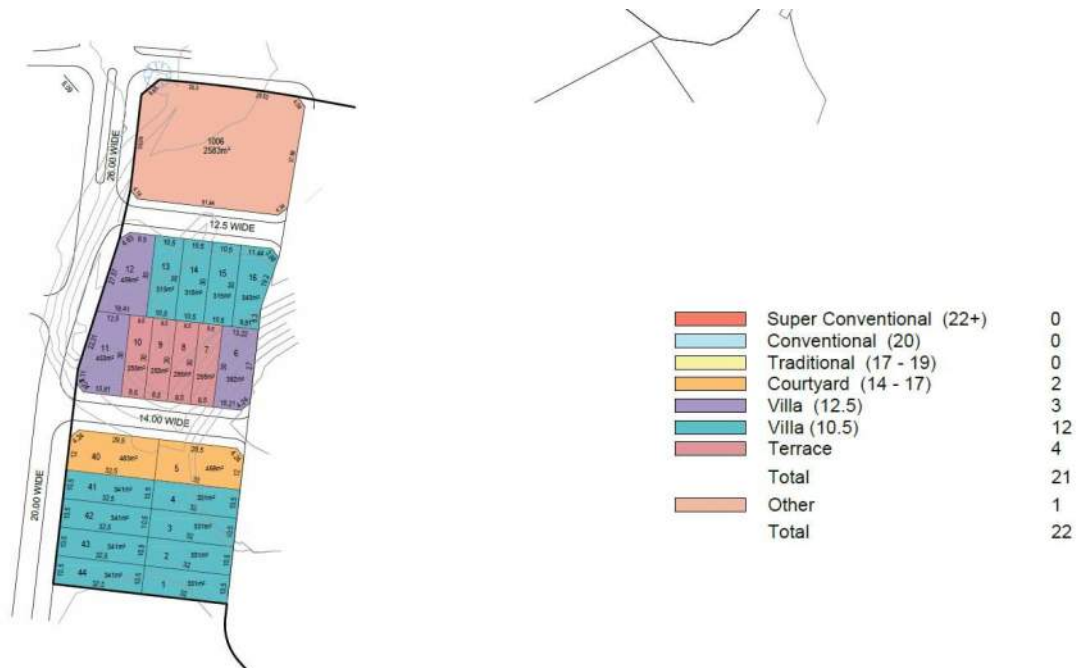


Figure 3.3 Associated land division (enlargement) – subject site is Lot 1006



Proposed Lot 1006 has an area of 2,583m², a primary frontage of 50.82m (excluding corner cut-offs) and secondary frontages as follows:

- 35.06m (excluding corner cut-offs) to the west;
- 51.84m (excluding corner cut-offs) to the south; and
- 37.56m (excluding corner cut-offs) to the east.

The subject site, which previously formed part of the nearby quarry, is currently vacant. A significant amount of fill has been placed in mounds around the site as a consequence of development of the earlier stages of Springwood. Some vegetation in the form of small trees, shrubs and groundcovers is present on the site. However, there are no Regulated or Significant Trees on the subject site. It is noted that some vegetation on and near the site has recently been removed by the Department of Planning, Transport and Infrastructure (DPTI) as part of the construction of the Gawler East Link Road.

The subject site will sit on a prominent corner at the junction of the Gawler East Link Road and the Springwood north-south connector road. Given the site's prominence, the Sales Centre will be a key focal point for the 'village centre' along with the proposed supermarket and speciality shops which will be located on the opposite side of the intersection.

Figure 3.4 Subject site



Figure 3.5 Site of the Sales Centre (looking south)



Figure 3.6 Site of the Sales Centre (looking east)



3.3 The Locality and Surrounding Development

The locality features a range of land uses including the former quarry and associated activities to the immediate west and south of the site, residential development to the north and east and farmland further to the south. Generally speaking, the locality comprises land south of Calton Road which forms part of the master planned Springwood development. For this reason, the nature and character of the locality will be transformed over the coming years to create a vibrant residential community supported by a range of facilities and services within a proposed 'village centre'.

The former quarry, which forms a major element in the existing locality, was historically associated with the excavation of sand. More specifically, excavated sand was processed on-site through a washing plant where silt and clay were separated from the sand and deposited into a series of sedimentation and drying ponds. The material was periodically excavated from the pond and stockpiled on-site or sold as a product. It is understood that sand mining activities ceased operations in 2000.

Beyond the former quarry, the natural topography of the site comprises undulating hills which increase in gradient towards the South Para River which runs roughly in an east-west direction through the central portion of the Springwood development.

Major infrastructure within the locality includes:

- The Gawler East Link Road (under construction);
- An above-ground 750mm diameter Barossa Trunk Main;
- SEA Gas pipeline and associated 'main line' valve; and
- 275kV overhead electricity power lines within a 100 metre wide easement.

Beyond the Springwood development, low-density residential development is located on the northern side of Calton Road and on the western side of Cheek Avenue. Further west is the Gawler Town Centre which features a traditional 'high street' and contains the main shopping, administrative and cultural facilities for the Council area. **Figure 3.7** on the following page identifies the key features of the locality.

Figure 3.7 Subject Site and Surrounds

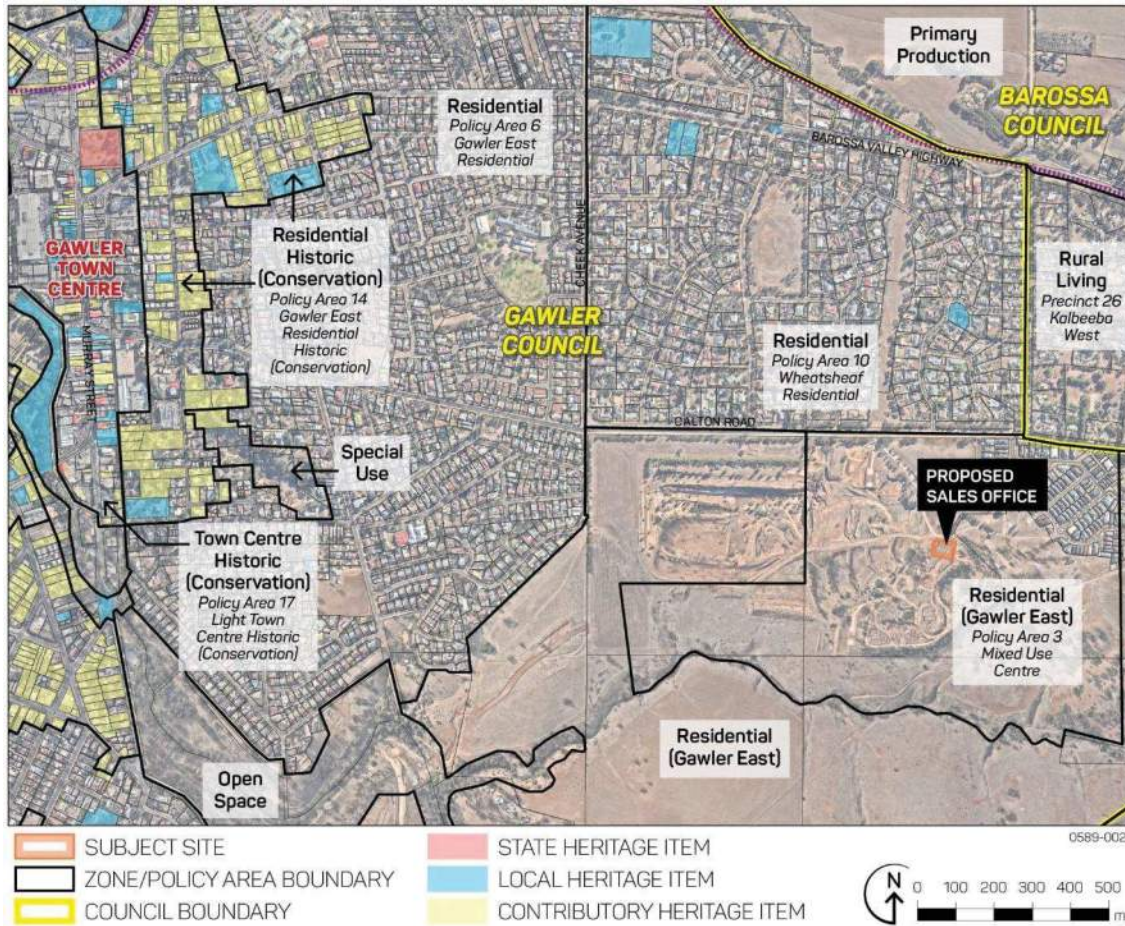


Figure 3.8 Site of the proposed supermarket to the north-east of the Sales Centre



Figure 3.9 Future residential areas of the Springwood development (looking south-west)



4. Proposed Development

4.1 Land Use, Built Form, Access and Signage

The development proposes the construction of a two-storey building to be positioned near the north-western corner of the subject site (refer to architectural plans prepared by Studio Nine in **Appendix 3**).

The building will comprise the following key elements:

- A Sales Centre (132.55m²) at ground floor which will allow prospective residents to view a model of the Springwood development (as well as other supporting material), while discussing the development with sales staff;
- A café (79.4m²) at ground level with servery, back of house (9.47m²) and outdoor dining area which will provide seats for approximately 40 customers;
- Amenities and a small storage area at ground floor to cater for customers of the sales centre and café;
- Offices with associated amenities (159.93m²) on the first floor which will be used for the administrative functions associated with the Springwood development;
- A viewing deck (64m²) to enable prospective residents to view the Springwood development; and
- Signage (measuring 1.5m by 4.5m) on the northern and western elevations at the upper level which will accommodate the Springwood logo.

A car park providing 35 parking spaces, including a space for those with a disability, will be located at the rear of the Sales Centre. A pedestrian link will be provided within the car park to enable prospective residents to walk between the Sales Centre and the proposed display village to the south. It is anticipated that the display village will accommodate approximately 30-35 display homes which will be constructed separately by a range of building companies that have partnered with Springwood. Over time, these display homes will be sold as private dwellings as the Springwood development progresses.

Access to the car park at the rear of the Sales Centre will be provided via the proposed north-south collector road as well as from a proposed local road which will border the subject site to the east.

Appendix 4 contains a detailed assessment undertaken by CIRQA Traffic Consultants of the access and parking arrangements for the Sales Centre. CIRQA's assessment confirms that the access points will be provided in accordance with the relevant Australian Standards and there will be sufficient car parking spaces to accommodate the various elements of the Sales Centre.

The proposed development also includes a substantial landscaped area to the east of the Sales Centre for the use of prospective purchasers. It is intended that this area will remain in private ownership and won't form part of the open space network for Springwood. Additional landscaping will be provided around the building and within the car park including trees, bushes, shrubs and groundcovers.

A variety of building materials will be used including clear glazing, 'proprietary pre-finished lightweight cladding', face brick and 'proprietary aluminium screen 'timber look' finish. The aluminium screen at the upper level will be a key design feature that will provide additional visual presence for the building which reflects its prominent location at a major intersection within the 'village centre'.

4.2 Stormwater Management

A site specific Stormwater Management Plan for the subject site will be provided by Wallbridge Gilbert Aztec (WGA). This plan will complement and build upon the overall Stormwater Management Plan for the entire Springwood development which has been submitted with the concurrent land division applications.

5. Procedural Requirements

5.1 Relevant Authority

By letter dated 15 November 2018 and pursuant to Schedule 10(20) of the *Development Regulations 2009*, the State Coordinator General has assigned the State Commission Assessment Panel (SCAP) as the relevant Planning Authority.

5.2 Nature of Development

The proposed development is perhaps best described as a 'Sales Centre incorporating an office and café with associated car parking, landscaping and signage'.

Pursuant to the Procedural Matters section of the Residential (Gawler East Zone), the application is neither a 'Complying' nor 'Non-complying' form of development. Therefore, this Development Application is to be assessed as a '**Consent use**' on its merits against the relevant provisions of the Gawler (CT) Development Plan.

5.3 Public Notification

Principle of Development Control (PDC) 38 of the Residential (Gawler East) Zone provides the following guidance in relation to public notification:

***PDC 38** Categories of public notification are prescribed in Schedule 9 of the Development Regulations 2008. Further, all development listed within Principle of Development Control 1 of the Residential (Gawler East) Zone, Mixed Use Policy Area 3 and/or Local Centre Policy Area 19 are designated category 2 (except where the development is classified as Category 1 or non-complying).*

We note that Schedule 9 of the *Development Regulations* does not specifically assign a category of notification for a Sales Centre (or an office/shop) in the Residential (Gawler East) Zone. Therefore, it is necessary to refer to the lists of envisaged forms of development contained within PDC 1 of the Zone and PDC 1 of the Policy Area to determine the correct category of notification. Both of these PDCs list an 'office' and a 'shop' as envisaged forms of development. Given that the main land use elements of the Sales Centre are an 'office' and a 'shop', the proposal constitutes a '**Category 2**' form of development.

5.4 Agency Referrals

Pursuant to Schedule 8 of the Development Regulations, the proposed development does not trigger any referrals to Government Agencies. However, given that SCAP is the relevant Authority, the proposal will be referred to the Town of Gawler for comments.

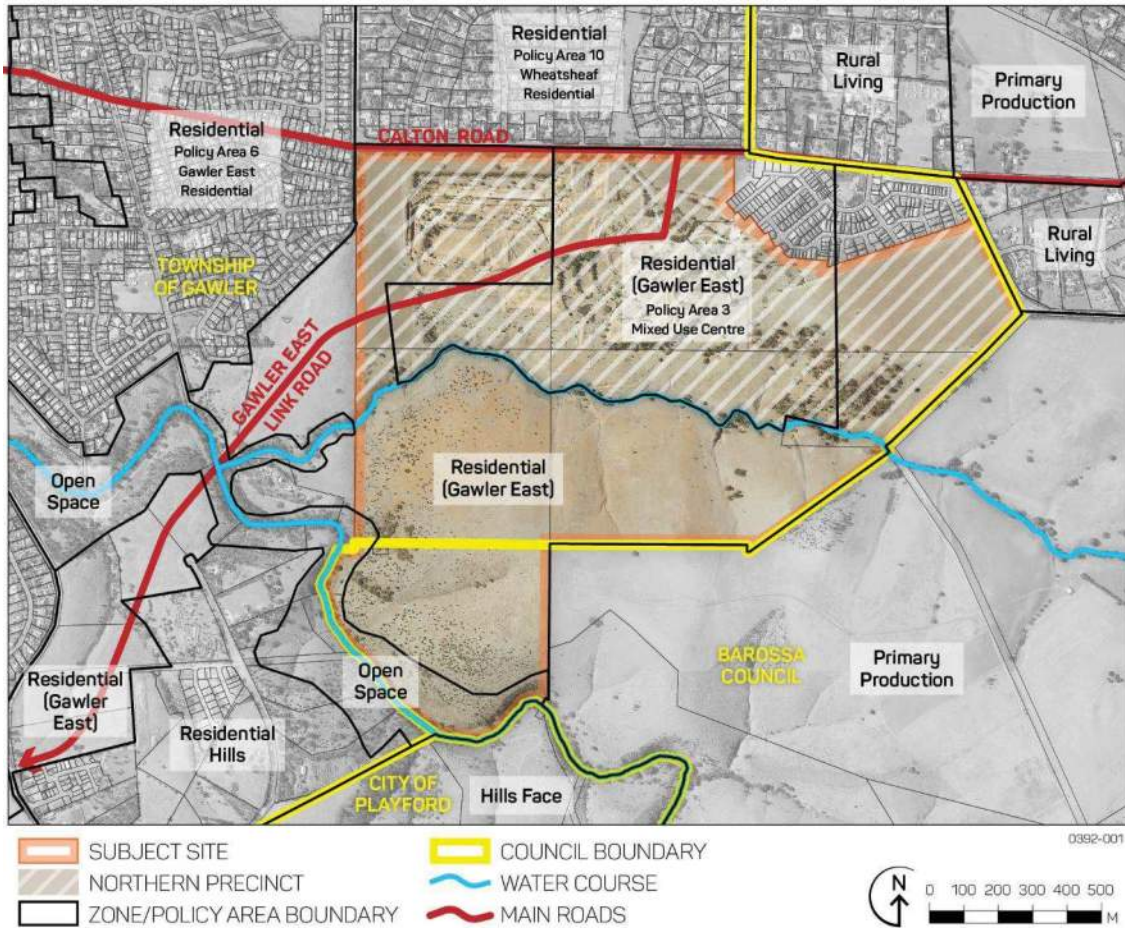
6. Development Plan Assessment

6.1 Overview

The subject site is located within the Town of Gawler and, accordingly, the relevant Development Plan is the Gawler (CT) Development Plan – consolidated 20 February 2018. More specifically, the subject site is located within the '**Residential (Gawler East) Zone**', and the '**Mixed Use Centre Policy Area 3**' as identified in *Figure 6.1* on the following page.

The following section provides an assessment of the proposal against the Gawler (CT) Development Plan. For convenience, this assessment has been grouped under a series of headings which reflect the key relevant planning 'themes' from the Development Plan.

Figure 6.1 Zoning and Policy Areas



6.2 Land Use

The Residential (Gawler East) Zone contemplates a wide range of land uses within broadly defined areas that are illustrated at a 'high-level' on the *Gawler East Structure Plan Map Ga/1 (Overlay 1) Enlargement G*. The Structure Plan identifies areas that will be developed for residential uses as well as other areas that are intended to be developed as a 'Mixed Use Centre' and 'Neighbourhood Centres'. This desired mix of land uses is expressed within Objective (Obj) 1 and the Desired Character of the Zone as well as Obj 1 and the Desired Character of the Policy Area:

Zone

Obj 1 *A predominately residential area comprising a range of low and medium-density dwellings, with associated infrastructure, retail, commercial, recreational, educational and community development in master-planned locations in accordance with Structure Plan Map Ga/1 (Overlay 1) Enlargement G.*

Desired Character (extract)

The zone will accommodate a diversity of housing forms. The Mixed Use Centre Policy Area 3 will comprise a mix of residential development and a range of commercial, retail, educational, recreational and community facilities. ---

Policy Area

***Obj 1:** A functional and diverse zone accommodating a mix of commercial, retail, recreation, community, residential, office, consulting rooms and educational uses.*

Desired Character (extract)

Mixed Use Centre Policy Area 3 will accommodate retail, commercial, community, education and formal recreation facilities and clubrooms to service the local community.

Low impact, commercial business activities that provide employment opportunities for the local population are envisaged. Such development will need to have particular regard to ensuring that minimal off-site impacts occur with respect to noise, air, water and waste emissions, commercial traffic generation and movement.

A retail facility, not exceeding 10 000 square metres in floor area, will comprise a supermarket and a range of specialty shops to serve the weekly shopping needs of the community. Restaurants, cafes, hotels (incorporating dining) and take away outlets are envisaged and will develop the centre as a destination point and provide uses that extend the hours of the centres operation to promote surveillance and safety of the adjacent recreation and education facilities.

In addition, specific guidance in relation to envisaged land uses is provided in PDC 1 of the Zone and PDC 1 of the Policy Area. While a Sales Centre is not specifically listed in these PDCs, both an 'office' and a 'shop' are listed as envisaged uses:

Zone

***PDC 1** The following forms of development are envisaged in the zone:*

Non-residential use that serves the local community, for example:

- *child care facility*
- *health and welfare service*
- *open space*
- *primary and secondary school*
- *recreation area*

- *shop, office or consulting room*

Policy Area

PDC 1 *The following forms of development are envisaged in the policy area:*

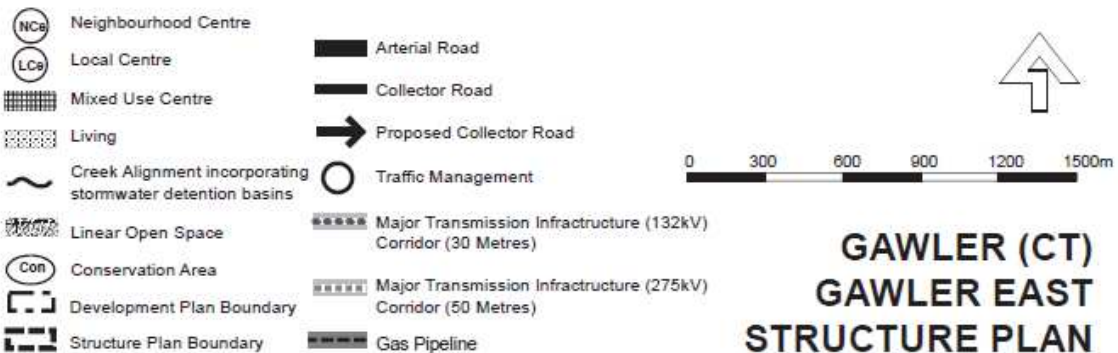
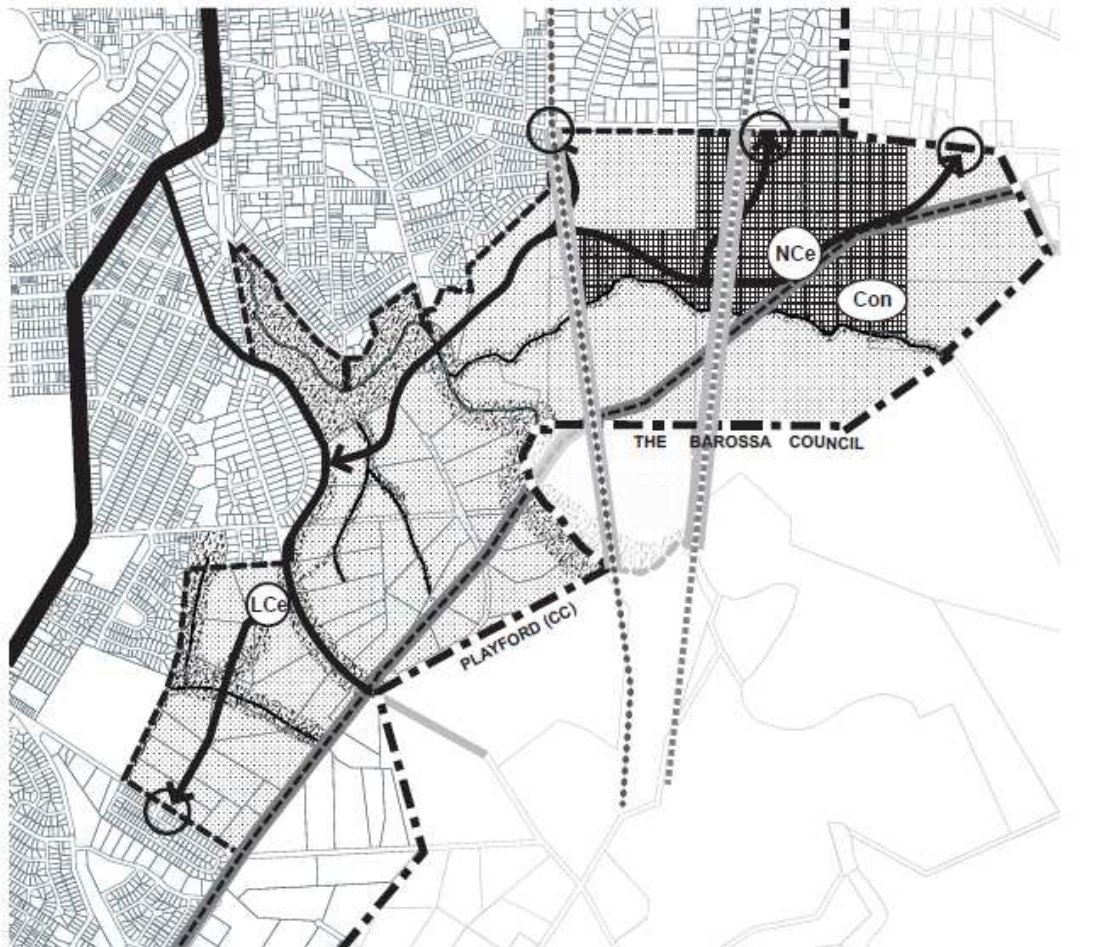
Office

Shop

For the above reasons, the proposed Sales Centre (which comprises an office and a shop), is an appropriate land use on the subject site. In terms of the strategic location of the proposed Sales Centre, *Structure Plan Map Ga/1 (Overlay 1) Enlargement G* (see Figure 6.2 on the following page) provides indicative, high-level direction for development within the Springwood development. In particular, it provides indicative locations for a potential Neighbourhood Centre (see **Figure 6.2**).

The proposed Sales Centre and other proposed development in the Springwood 'village centre' are located reasonably close to the Neighbourhood Centre nominated on the Structure Plan and reflect the final alignment of the Gawler East Link Road. For this reason and noting that the Springwood 'village centre' will be located in the 'heart' of the Mixed Use Policy Area 3, the location of the Sales Centre is generally consistent with the strategic direction provided by the Structure Plan.

Figure 6.2 Gawler East Structure Plan



6.3 Design and Appearance

The Development Plan contains a variety of provisions which seek to ensure that development is of a high architectural standard, complements the character of the locality and minimises any visual impact on nearby existing development. For example, the Desired Character of the Policy Area provides the following guidelines in relation to the design and appearance of development.

Desired Character (extract)

In terms of urban design and built form, a 'main street' environment will be created, where buildings address the street and car parks are primarily located to the rear. In order to minimise the overall extent of off street parking shared car parking is encouraged, and the convenience, availability and function of on street parking in mixed use environments will be recognised.

Gathering points for formal and informal community events will be established, either by means of a central pedestrian plaza, a village green or series of nodes.

Commercial and mixed use buildings will be established close to the street frontage and incorporate verandas and other protruding elements in order to create a pedestrian-friendly environment and outdoor dining opportunities. These areas will be enhanced by large street trees, high quality paving, lighting and street furniture. Building facades will be designed in a manner to create diversity of interest through the appearance of an aggregation of smaller buildings.

The Desired Character of the Policy Area is reinforced by the following PDCs which seek to provide more specific guidance in terms of the design and appearance of new buildings:

PDC 3 *Development should be designed to ensure that:*

- (a) buildings are designed to address the street frontage with servicing areas located internal to the centre and appropriately screened from public view;*
- (b) the establishment of shared car parking areas to the rear of buildings and on-street.*

PDC 4 *Public space established should be activated by uses around its edges.*

PDC 5 *Buildings should have a maximum of 5 storeys in height.*

PDC 6 *Development should not be undertaken unless it is consistent with the desired character for the policy area.*

The proposed Sales Centre directly responds to the design and appearance provisions in the following ways:

- It will assist to create a 'main street' environment through its siting close to the intersection of the Gawler East Link Road and the proposed north-south collector road;
- The associated car park will be located to the rear of the building;

- The car parking area will be shared with the associated display village to the south with the intention that prospective purchasers will visit the Sales Centre first and then walk through the various homes within the display village;
- The architecturally designed two-storey building will address the street frontages and will incorporate "... protruding elements in order to create a pedestrian-friendly environment and outdoor dining opportunities";
- The façade of the building and the materials used have been designed to reflect the high-profile location of the subject site in the 'village centre' with additional visual interest created by the vertical screening at the upper level;
- The building will assist to activate the street frontages by providing a main entry point near the intersection, through the provision of outdoor dining along the Gawler East Link Road and through the inclusion of high quality paving, street furniture and landscaping; and
- The proposed landscaped area to the east of the Sales Centre will further assist to provide an attractive main street environment for the Springwood 'village centre' while also potentially providing a gathering point for formal and informal community events.

6.4 Access and Parking

In order to address the relevant transportation and access provisions of the Development Plan, CIRQA Traffic Consultants has been engaged to review the proposed development and provide a traffic impact assessment (*Appendix 4*).

In terms of parking supply, the proposed development will provide a total of 35 onsite parking spaces at the rear of the Sales Centre. In order to determine the likely parking demand of the Sales Centre, CIRQA has broken down the various land use elements of the proposal and compared them against the relevant parking standards expressed in PDC 32 of the Policy Area (see extract from CIRQA report below).

Table 1 - Parking requirement assessment

Land Use	Area (m ²)	Seats	Rate	Spaces Required
Sales Centre*	205.65	n/a	5.5 sp. per 100 m ²	11.3
Café	88.87	40	1 sp. per 3 seats	13.3
Office	159.93	n/a	4 sp. per 100 m ²	6.4
			Total	31.0 spaces

* conservatively assessed on 'shop' rate

Given that 35 spaces will be provided, CIRQA considers that the proposal will provide sufficient parking to meet the demands of the Sales Centre. In terms of the associated display village, CIRQA notes that additional parking opportunities will be provided on the sites of the display homes as well as on the adjoining streets (noting that this area will not be required for residential parking). For these reasons, CIRQA considers that an appropriate level of parking will be provided to service the proposed development.

In terms of the design of the car parks, the CIRQA report demonstrates that all spaces have been designed to comply with *AS/NZS 2890.1:2004* as summarised below:

- Parking spaces will have a length of 5.4 m;
- Regular spaces will have a width of 2.5 m;
- Aisles will be at least 5.8 m wide; and
- Spaces will be at least 300 mm clear of objects greater than 0.15m in height.

One of the spaces will be allocated for use by people with a disability. This space will be a minimum of 2.4m wide with an adjacent 2.4m wide shared space, in accordance with the requirements of the Australian/New Zealand Standard, *Parking facilities Part 6: Off-street parking for people with disabilities* (AS/NZS 2890.6:2009).

In terms of the proposed access to the subject site, CIRQA has confirmed that pedestrian sight line requirements at the access points will be provided. Also, CIRQA advises that traffic movements associated with the proposed Sales Centre will be easily accommodated in the surrounding road network which has been specifically designed to accommodate the anticipated commercial development in the 'village centre'.

Based on CIRQA's assessment, the Sales Centre appropriately addresses the following key provisions of the Development Plan in relation to transportation and access.

PDC 26 *Provision for the movement of people and goods within business, centre, shopping or mixed use zones or associated policy areas, should:*

- (a) *not cause inconvenient and unsafe traffic and pedestrian movements;*
- (b) *provide safe and convenient access for private cars, cyclists, pedestrians, service vehicles, emergency vehicles and public utility vehicles;*
- (c) *concentrate development for pedestrian convenience, and not extend unnecessarily along road frontages; (increasing the depth of development is a more desirable alternative);*
- (d) *separate pedestrian and vehicle movements within zones or areas, for pedestrian safety and convenience.*
- (e) *provide access points onto the arterial roads as shown on the relevant Structure Plans to: minimize traffic hazards; queuing on the roads; right turn movements; and interference with the function of intersections, junctions and traffic control devices.*
- (f) *not cause congestion or detract from the safety of traffic on abutting roads, and minimize: traffic hazards; queuing on public roads; and intrusion into adjacent residential areas.*
- (g) *provide for service vehicles and the storage and removal of waste goods and materials.*
- (h) *provide sufficient off-street parking to accommodate customer, employee and service vehicles if there is insufficient public car parking in the locality.*

- (i) *consolidate and co-ordinate parking areas into convenient groups, rather than located individually, and the access points minimized, and so located and designed that:

 - (i) *vehicular movement between them does not require the use of public roads;*
 - (ii) *the number of access points is minimized; and*
 - (iii) *it is not necessary for vehicles to back onto public roads.**
- (j) *locate, design and orientate car parks in such a way as to facilitate safe, direct and convenient access of pedestrians between them and the facilities they serve, safe and convenient traffic circulation, minimal conflict between customer and service vehicles, and should include adequate provision for manoeuvring into and out of parking bays.*
- (k) *provide on-site parking determined by:

 - (i) *the amount, type and timing of movement generated by the use;*
 - (ii) *the design, location and configuration of parking spaces;*
 - (iii) *the ability of the site to accommodate the parking spaces;*
 - (iv) *the potential for shared use of parking spaces; and*
 - (v) *the effect on surrounding activities and uses.**
- (l) *share use of car parking between developments to reduce the total extent of car parking areas.*
- (m) *provide for landscaping in order to screen, shade and enhance the appearance of car parking areas.*
- (n) *ensure that all sources of noise, including refrigeration and air conditioning equipment, garbage collection and car parking, do not cause excessive or disturbing noise at neighbouring properties.*

PDC 340 *Development should provide safe and convenient access for all anticipated modes of transport including cycling, walking, public and community transport, and motor vehicles.*

PDC 341 *Development at intersections, pedestrian and cycle crossings, and crossovers to allotments should maintain or enhance sightlines for motorists, cyclists and pedestrians to ensure safety for all road users and pedestrians.*

PDC 355 *Development should be provided with safe and convenient access which:*

- (a) *avoids unreasonable interference with the flow of traffic on adjoining roads;*
- (b) *accommodates the type and volume of traffic likely to be generated by the development or land use and minimises induced traffic through over-provision;*

(c) *is sited and designed to minimise any adverse impacts on the occupants of and visitors to neighbouring properties.*

PDC 362 *Development should be consistent with Australian Standard AS 2890 Parking facilities.*

PDC 363 *Vehicle parking areas should be sited and designed in a manner that will:*

- (a) *facilitate safe and convenient pedestrian linkages to the development and areas of significant activity or interest in the vicinity of the development;*
- (b) *include safe pedestrian and bicycle linkages that complement the overall pedestrian and cycling network;*
- (c) *not inhibit safe and convenient traffic circulation;*
- (d) *result in minimal conflict between customer and service vehicles;*
- (e) *avoid the necessity to use public roads when moving from one part of a parking area to another;*
- (f) *minimise the number of vehicle access points to public roads;*
- (g) *avoid the necessity for backing onto public roads;*
- (h) *provide the opportunity for shared use of car parking and integration of car parking areas with adjoining development to reduce the total extent of vehicle parking areas and the requirement for access points;*
- (i) *not dominate the character and appearance of a centre when viewed from public roads and spaces;*
- (j) *provide landscaping that will shade and enhance the appearance of the vehicle parking areas.*

PDC 367 *Parking areas should be sealed or paved in order to minimise dust and mud nuisance.*

PDC 368 *To assist with stormwater detention and reduce heat loads in summer, vehicle parking areas should include soft (living) landscaping.*

PDC 369 *Parking areas should be line-marked to indicate parking bays, movement aisles and direction of traffic flow.*

6.5 Crime Prevention

The Crime Prevention provisions in the Development Plan seek to ensure that new development prioritises safety and security by incorporating design features which discourage crime and facilitates community surveillance. The proposed development has responded to these provisions in the following ways:

- Through the prominent siting of the building, at the intersection of two collector roads where clear views into the site are available to traffic travelling along the Gawler East Link Road and the proposed north-south collector road;
- By providing large windows which will overlook the adjoining streets and car park to maximise opportunities for casual surveillance;
- By ensuring that landscaping selected for the development will be limited to low level plants to provide unobstructed sightlines;
- By avoiding the construction of boundary fencing or other structures which may obstruct sightlines or be used for concealment or entrapment spots; and
- By ensuring that the site will be illuminated in accordance with the relevant Australian Standards to maximise opportunities for casual surveillance.

For the reasons outlined above, the development is closely aligned with the following relevant Crime Prevention provisions of the Development Plan.

Obj 20: *A safe, secure, crime resistant environment where land uses are integrated and designed to facilitate community surveillance.*

PDC 42 *Development should be designed to maximise surveillance of public spaces through the incorporation of clear lines of sight, appropriate lighting and the use of visible permeable barriers wherever practicable.*

PDC 43 *Buildings should be designed to overlook public and communal streets and public open space to allow casual surveillance.*

PDC 44 *Development should provide a robust environment that is resistant to vandalism and graffiti.*

PDC 45 *Development should provide lighting in frequently used public spaces including those:*

- (a) *along dedicated cyclist and pedestrian pathways, laneways and access routes*
- (b) *around public facilities such as toilets, telephones, bus stops, seating, litter bins, automatic teller machines, taxi ranks and car parks.*

PDC 46 *Development, including car park facilities should incorporate signage and lighting that indicate the entrances and pathways to, from and within sites.*

PDC 47 *Landscaping should be used to assist in discouraging crime by:*

- (a) *screen planting areas susceptible to vandalism*
- (b) *planting trees or ground covers, rather than shrubs, alongside footpaths*
- (c) *planting vegetation other than ground covers a minimum distance of 2 metres from footpaths to reduce concealment opportunities.*

PDC 48 *Site planning, buildings, fences, landscaping and other features should clearly differentiate public, communal and private areas.*

PDC 49 *Buildings should be designed to minimise and discourage access between roofs, balconies and windows of adjoining dwellings.*

PDC 51 *Development should avoid pedestrian entrapment spots and movement predictors (eg routes or paths that are predictable or unchangeable and offer no choice to pedestrians).*

PDC 364 *Vehicle parking areas should be designed to reduce opportunities for crime by:*

- (a) maximising the potential for passive surveillance by ensuring they can be overlooked from nearby buildings and roads;*
- (b) incorporating walls and landscaping that do not obscure vehicles or provide potential hiding places;*
- (c) being appropriately lit;*
- (d) having clearly visible walkways.*

6.6 Stormwater and Flooding Considerations

A site specific Stormwater Management Plan for the subject site will be provided by Wallbridge Gilbert Aztec (WGA). This plan will complement and build upon the overall Stormwater Management Plan for the entire Springwood development which has been submitted with the concurrent land division applications. In particular, the Stormwater Management Plan will address the relevant provisions of the Development Plan.

6.7 Signage




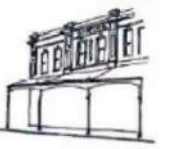
The proposed development includes signage at the upper level on the northern and western elevations which reflect the intended use of the site as a Sales Centre. Additional directional signage will provided around the site.

It is noted that the design, extent and size of the proposed signage does not visually dominate the building on which they will be attached. Further, the proposed signage will:

- Complement the design of the building;
- Be contained within the boundaries of the site;
- Not affect existing street trees or obscure views to attractive landscaping;
- Not cause a distraction for drivers or obstruct their views of other vehicles; and
- Be limited to information relating to the proposed use of the land.

For the reasons outlined above, the nature, quantity and design of the proposed signage is closely aligned with the following key 'Advertisements' provisions of the Development Plan including *Table Ga/4 – Advertising and Advertising Displays Definitions and Design Criteria*:

Figure 6.3 Extract from Table Ga/4

Sign Type	Criteria	
FLAT WALL SIGN	<p>Maximum number: 1 per side wall 1 per rear wall</p> <p>Placement and size of signs in scale and integrated with the architectural features and elements of the building gable wall.</p> <p>Positioned not to conceal architectural features or detailing.</p>	 ✓
		 ✗
		 ✗
		 ✓

Obj 69: An urban environment and rural landscape not disfigured by advertisements.

Obj 70: Advertisements in retail, commercial and industrial urban areas, and centre zones, designed to enhance the appearance of those areas.

Obj 71: Advertisements not hazardous to any person.

PDC 199 Advertising and advertising displays should, in addition to general provisions, conform with the performance criteria in Table Ga/4.

PDC 200 The location, siting, size, shape and materials of construction, of advertisements should be:

- (a) consistent with the desired character of areas or zones as described by their objectives;
- (b) consistent with the predominant character of the urban or rural landscape; or
- (c) in harmony with any building or site of historic significance or heritage value in the locality.

PDC 201 Advertisements should not detrimentally affect by way of their siting, size, shape, scale, glare, reflection or colour the amenity of areas, zones, or localities, in which they are situated.

PDC 202 Advertisements should not impair the amenity of areas, zones, or localities, in which they are situated by creating, or adding to, clutter, visual disorder and the untidiness of buildings and spaces.

PDC 203 Advertisements should not obscure views of attractive landscapes or particular trees or groups of trees.

- PDC 204** *The scale of advertisements should be compatible with the buildings on which they are situated and with nearby buildings and spaces.*
- PDC 207** *Advertisements on buildings that have a single architectural theme but which contain a number of tenancies, should be attached and displayed so as to be co-coordinated with that theme.*
- PDC 209** *Advertisements should not create a hazard to persons travelling by any means.*
- PDC 210** *Advertisements should not obscure a driver's view of other road vehicles, of rail vehicles at or approaching level crossings, of pedestrians and of features of the road such as junctions, bends, changes in width, traffic control devices and the like that are potentially hazardous.*
- PDC 211** *Advertisements should not be so highly illuminated as to cause discomfort to an approaching driver, or create difficulty in his perception of the road, or of persons or objects on it.*
- PDC 212** *Advertisements should not be liable to interpretation by drivers as an official traffic sign, or convey to drivers information that might be confused with instructions given by traffic signals or other control devices, or impair the conspicuous nature of traffic signs or signals.*
- PDC 213** *Advertisements should not detract drivers from the primary driving task at a location.*
- PDC 214** *Advertisements or advertising displays should:*
- (a) convey in clear and concise language, symbols, print style, layout, and in a limited number of colours, the owner/occupier and/or generic type of business, merchandise or services;*
 - (b) be minimised in number to avoid proliferation of advertisements or advertising displays;*
 - (c) be of a form, style, scale and size and in locations appropriate to the desired character and future use of land or character of the locality or zone and to preserve reasonable exposure to the public for all adjacent sites;*
 - (d) not have an adverse impact on the amenity of adjacent land uses and areas from which they are visible and without limiting the foregoing, no bunting, whirligigs or other like displays should be displayed;*
 - (e) conceal the supporting structure from view wherever possible;*
 - (f) be completely contained within the boundaries of the subject property, and if road widening is applicable, be within the proposed property boundary realignment;*
 - (g) be unified in colour, style, placement and proportion to present a coordinated theme and design for a site, centre or building; and*
 - (h) be designed and located to avoid damage to, pruning or lopping of on-site landscaping or street trees.*
- PDC 221** *Advertisements or advertising displays should only identify premises or the nature of business, goods or services conducted on the land or building.*

6.8 Landscaping

A conceptual landscaping plan has been prepared for the development and is included on the site plan contained in **Appendix 2**.

The proposal includes landscaping around the perimeter of the site as well as within the car parking area. A larger landscaped area will also be provided to the east of the Sales Centre fronting the Gawler East Link Road. These landscaped areas will be planted with a range of species which complement the overall landscape theme of the Springwood development. More specifically, the proposed landscaping will assist to create a sense of place and a high-quality, coordinated development outcome.

Accordingly, the development satisfies PDC 25 of the Development Plan which seeks:

PDC 25 *Development or redevelopment within business, centre, shopping or mixed use zone or associated policy areas, should:*

- (i) *be designed to be compatible with existing development through:*
 - (i) *a buffer between development in the zone and adjacent areas;*
 - (ii) *landscaping which complements adjacent development and enhances the visual appearance and character of the zone;*
 - (iii) *pedestrian paths and spaces which are shaded, defined and protected from the wind;*
and
 - (iv) *service yards, loading areas and outdoor storage areas which are screened;*
 - (v) *foster human scale, define spaces, reinforce paths and edges, screen utility areas, and generally enhance the visual amenity of the area.*

6.9 Interface Considerations

The subject site is located within the Mixed Use Centre Policy Area 3 which clearly anticipates a neighbourhood level centre in this area. Currently, the site and nearby land is vacant but will be developed over time to create a master-planned community comprising residential development supported by a range of non-residential land uses. On this basis, potential interface issues have been carefully considered during the preparation of the Springwood masterplan and as part of the wider urban design of the whole project. In addition, by its nature, the Sales Centre is unlikely to create any significant interface issues in terms of noise or light spillage. While the building will be two-storeys in height, it will be located a significant distance from the proposed residential areas to the south. For these reasons, potential issues relating to overshadowing and overlooking will be managed appropriately. Therefore, the proposed development appropriately responds to the following relevant interface provisions within the Development Plan:

Zone

PDC 28 *Development should be designed and sited to minimise negative impact on existing and potential future land uses considered appropriate in the locality.*

Council Wide

Obj 42: *Development located and designed to minimise adverse impact and conflict between land uses.*

Obj 43: *Protect community health and amenity from adverse impacts of development.*

PDC 107 *Development should not detrimentally affect the amenity of the locality or cause unreasonable interference through any of the following:*

- (a) *the emission of effluent, odour, smoke, fumes, dust or other airborne pollutants;*
- (b) *noise;*
- (c) *vibration;*
- (d) *electrical interference;*
- (e) *light spill;*
- (f) *glare;*
- (g) *hours of operation;*
- (h) *traffic impacts.*

PDC 108 *Development should be sited and designed to minimise negative impacts on existing and potential future land uses desired in the locality.*

7. Conclusion

This development application seeks approval to establish a Sales Centre incorporating an office and café with associated car parking, signage and landscaping.

Having undertaken a comprehensive assessment of the application against the relevant provisions of the Gawler (CT) Development Plan, we believe that the proposal represents orderly development which accords with the relevant provisions of the Development Plan for the reasons summarised below:

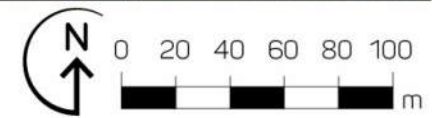
- The main land use elements of the Sales Centre (office and shop) are envisaged forms of development in the Residential (Gawler East) Zone and Mixed Use Policy Area 3;
- The general area of the subject site is indicatively identified as a Neighbourhood Centre within the *Gawler East Structure Plan Map Ga/1 (Overlay 1) Enlargement G* as well as the Springwood Masterplan;
- The location and design of the proposed development will complement other proposed development in the Springwood 'village centre' such as the supermarket on the opposite side of the Gawler East Link Road;

- The Sales Centre has been designed to address both road frontages, and the building exhibits a high degree of architectural merit achieved by using a variety of complementary colours, building materials and articulation;
- A coordinated signage theme is proposed, with all signage designed in accordance with the relevant provisions of the Development Plan;
- Large windows along the elevations of the Sales Centre will maximise opportunities for casual surveillance across the site;
- The proposed development has been designed to accommodate safe and convenient movements for vehicles, and the CIRQA report concludes that sufficient onsite parking will be provided to cater for the anticipated parking demand;
- The additional traffic volumes to be generated by the development will not have a significant impact on the road network;
- Stormwater will be managed appropriately in accordance with the overall stormwater management plan for the Springwood development which has been submitted with the land division applications; and
- The proposed landscaping will assist to create a sense of place and enhance the amenity of the locality.

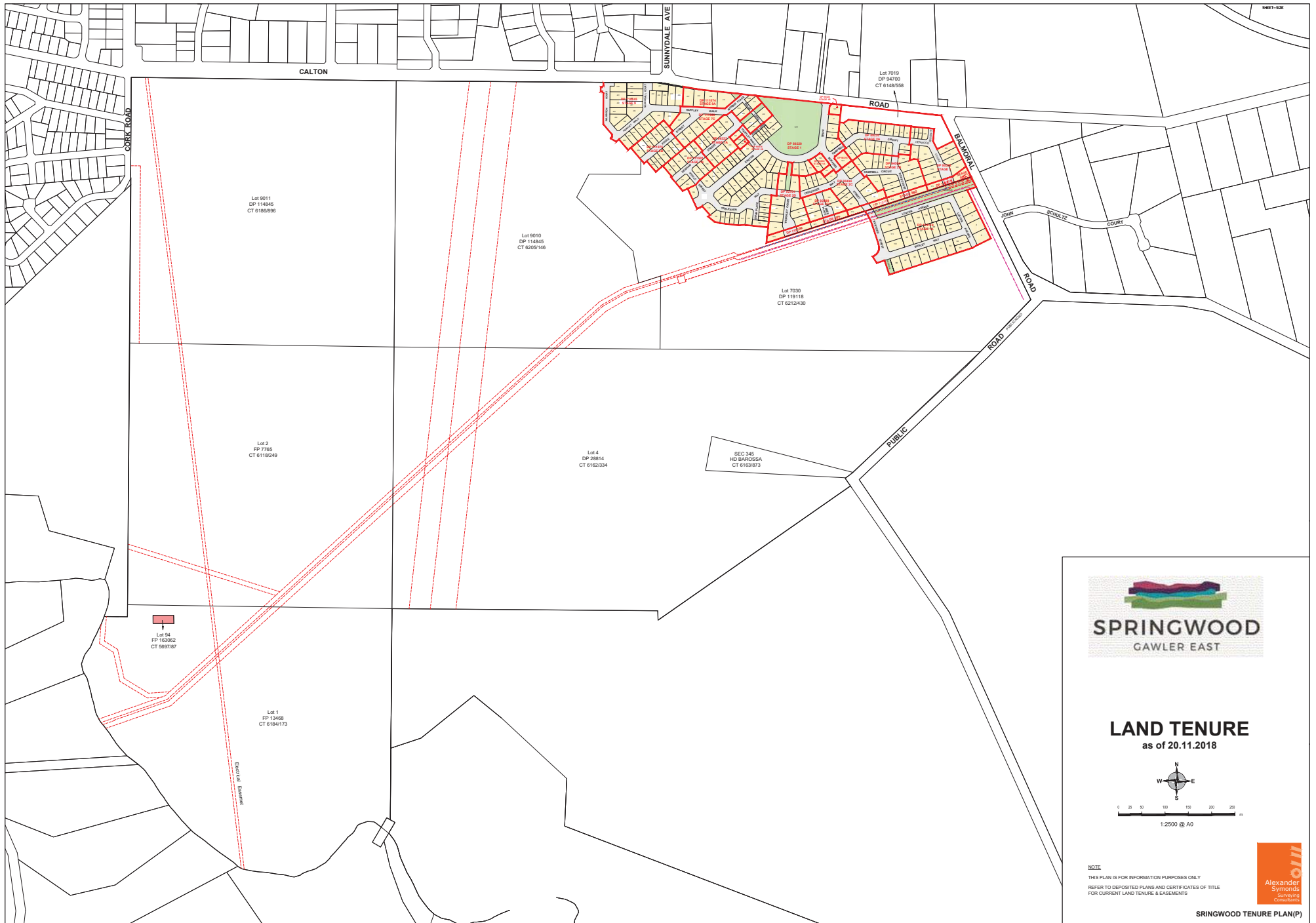
Based on our assessment, the application is closely aligned within the relevant provisions of the Development Plan and therefore warrants Development Plan Consent subject to reasonable and relevant conditions.



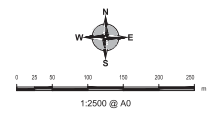
 SUBJECT SITE



Appendix 1. Land Tenure Plan and Certificate of Title



LAND TENURE
as of 20.11.2018



NOTE
THIS PLAN IS FOR INFORMATION PURPOSES ONLY
REFER TO DEPOSITED PLANS AND CERTIFICATES OF TITLE
FOR CURRENT LAND TENURE & EASEMENTS



REAL PROPERTY ACT, 1986



The Registrar-General certifies that this Title Register Search displays the records maintained in the Register Book and other notations at the time of searching.



Certificate of Title - Volume 6205 Folio 146

Parent Title(s) CT 6186/895
Creating Dealing(s) VE 12885392
Title Issued 26/03/2018 Edition 2 Edition Issued 06/07/2018

Estate Type

FEE SIMPLE

Registered Proprietor

FIVE AMES FARMING PTY. LTD. (ACN: 609 760 536)
OF 63 GAWLER TERRACE GAWLER SOUTH SA 5118

Description of Land

ALLOTMENT 9010 DEPOSITED PLAN 114845
IN THE AREA NAMED GAWLER EAST
HUNDRED OF BAROSSA

Easements

SUBJECT TO EASEMENT(S) OVER THE LAND MARKED A ON D114845 TO THE MINISTER FOR INFRASTRUCTURE (T 1374106)

SUBJECT TO EASEMENT(S) OVER THE LAND MARKED C ON D114845 TO TRANSMISSION LESSOR CORPORATION OF 1 UNDIVIDED 2ND PART (SUBJECT TO LEASE 9061500) AND ELECTRANET PTY. LTD. OF 1 UNDIVIDED 2ND PART (T 2370109)

SUBJECT TO EASEMENT(S) OVER THE LAND MARKED E ON D114845 TO ELECTRANET PTY. LTD. (TG 12371822)

SUBJECT TO EASEMENT(S) OVER THE LAND MARKED T ON D114845 (TG 9662213)

SUBJECT TO EASEMENT(S) OVER THE LAND MARKED U ON D114845 (TG 10297076)

SUBJECT TO SERVICE EASEMENT(S) OVER THE LAND MARKED H ON D114845 FOR DRAINAGE PURPOSES TO THE COUNCIL FOR THE AREA (223LG RPA)

SUBJECT TO SERVICE EASEMENT(S) OVER THE LAND MARKED J ON F252234 FOR ELECTRICITY SUPPLY PURPOSES TO DISTRIBUTION LESSOR CORPORATION (SUBJECT TO LEASE 8890000) (223LG RPA)

SUBJECT TO SERVICE EASEMENT(S) OVER THE LAND MARKED K(T/F) ON F252234 FOR ELECTRICITY SUPPLY PURPOSES TO DISTRIBUTION LESSOR CORPORATION (SUBJECT TO LEASE 8890000) (223LG RPA)

Schedule of Dealings

Dealing Number	Description
11764743	AGREEMENT UNDER DEVELOPMENT ACT 1993 PURSUANT TO SECTION 57A
12459905	AGREEMENT UNDER DEVELOPMENT ACT, 1993 PURSUANT TO SECTION 57(2)
12915311	MORTGAGE TO NATIONAL AUSTRALIA BANK LTD. (ACN: 004 044 937)



Notations

Dealings Affecting Title	NIL
Priority Notices	NIL
Notations on Plan	NIL
Registrar-General's Notes	NIL
Administrative Interests	NIL

Appendix 2. Plan of Division



Development No. 490/D026/19
 Town of Gawler
 Development No. 960/D025/19
 The Barossa Council

Proposed Plan of Division
 Allotment 2 in F7365
 Allotment 1 in F13468
 Allotment 3010 & 3011 in D114846
 Allotment 3201 in Dev No. 490/D019/17
 Allotment 4 in D28814
 Hundred of Barossa
 In the area named
**GAWLER EAST
 & KALBEEBA**
 CT 616898 CT 6265146
 CT 616828 CT 6162334
 CT 6164173 PT CT 6212140

1:2500

SHEET 1 OF 4

D60894
The Barossa Council

Kalbeeba

- Significant tree
- Regulated tree

	Super Conventional (22+)	129
	Conventional (20)	47
	Traditional (17 - 19)	110
	Courtyard (14 - 17)	444
	Villa (12.5)	185
	Villa (10.5)	93
	Terrace	164
	Total	1172
	Other	8
	Total	1180

No. of proposed allotments	1180
Total area	185.6ha
Area of Development	168.5ha
Reserve area	71.28ha
Length of new roads	19.8k

Contour interval 2m.
 Datum AHD.

Vide Titles for disposition of easements.

Road pavements shown are indicative only.

****Not to be used for detailed engineering design.****

Dimensions and areas are subject to survey.

© ALEXANDER & SYMONDS PTY. LTD. Original Sheet Size A0

Glenn Ian Hordacre
 LICENSED SURVEYOR

REF: A218916-CG
 DWG NO: A218916-CG PROPRT REV D

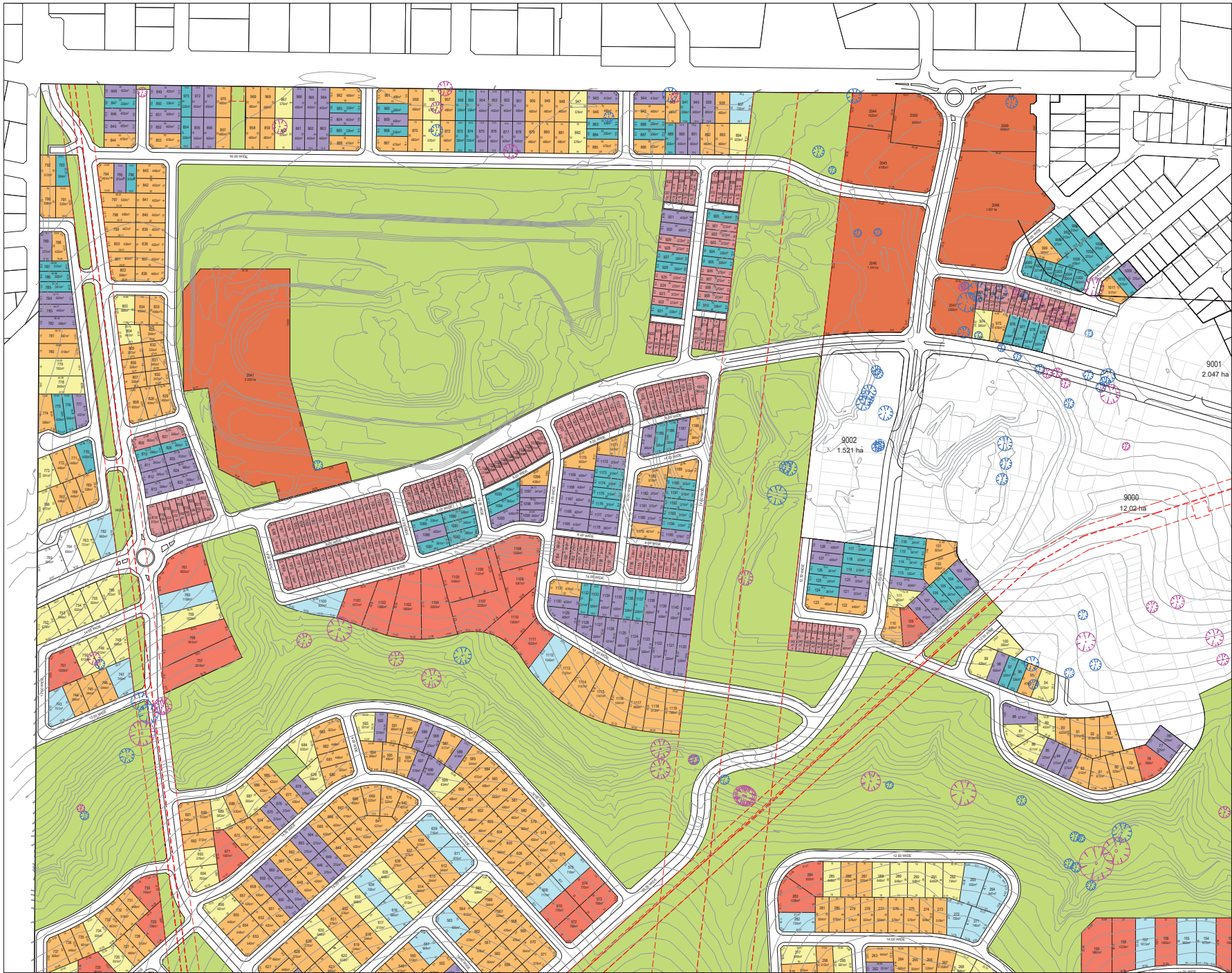
REVISION: 0
 DEL: 13.08.2019

Alexander & Symonds Pty Ltd
 11 Long Walk Drive, West Town,
 South Australia 5031
 PO Box 2000 West Town, SA 5071
 ABN 62007 753 888

T (80) 6330 6566
 F (80) 6332 6566
 www.alexander.com.au
 info@alexander.com.au

• Property • Land Development •
 • Construction • Mining •
 • Spatial Information Management •

Alexander Symonds
 CONSTRUCTION CONSULTANTS



Development No. 490/D026/19
Town of Gawler

Development No. 960/D025/19
The Barossa Council

Proposed Plan of Division
Allotment 2 in FT765
Allotment 1 in F13468
Allotment 9010 & 9011 in D114646
Allotment 9201 in Dev No. 490/D026/19
Allotment 4 in D28814
Hundred of Barossa
in the area named
**GAWLER EAST
& KALBEEBA**
CT 618698 CT 6205146
CT 618628 CT 6186334
CT 6184173 PT CT 6214340

0 25 50 100 150 200 250
1:2500

SHEET 2 OF 4

9001
2.047 ha

9002
1.521 ha

9000
12.02 ha

Significant tree
Regulated tree

No. of proposed allotments 1180
Total area 185.6ha
Area of Development 168.5ha
Reserve area 71.23ha
Length of new roads 19.8k

Contour interval 2m.
Datum AHD.

Vide Titles for disposition of easements.

Road pavements shown are indicative only.

Not to be used for detailed engineering design.

Dimensions and areas are subject to survey.

© HALLIDAY & SPINNOCK PTY LTD. Original Sheet Size A0
Glenn Ian Hordacre
LICENSED SURVEYOR

REF: A21816-CG
DRAWING: A21816-CG PROPRIETARY
REVISION: 1
DEL: 13.06.2019

Alexander Symonds
CONSULTANTS



Development No. 490/D026/19
Town of Gawler

Development No. 960/D025/19
The Barossa Council

Proposed Plan of Division
Allotment 2 in FT765
Allotment 1 in F13468
Allotment 3010 & 3011 in D114646
Allotment 3201 in Dev No. 490/D016/17
Allotment 4 in D28814
Hundred of Barossa
In the area named
**GAWLER EAST
& KALBEEBA**
CT 618686 CT 6206146
CT 618628 CT 6186334
CT 6184173 PT CT 6214240

0 25 50 100 150 200 250
1:2500

SHEET 3 OF 4

Significant tree
 Regulated tree

No. of proposed allotments 1180
Total area 185.6ha
Area of Development 168.5ha
Reserve area 71.28ha
Length of new roads 19.8k

Contour interval 2m.
Datum AHD.

Vide Titles for disposition of easements.

Road pavements shown are indicative only.

Not to be used for detailed engineering design.

Dimensions and areas are subject to survey.

© ALEXANDER & SYMONDS PTY. LTD. Original Sheet Size A0

Glenn Ian Hordacre
LICENSED SURVEYOR

REF: A21816-CG
DWG NO: A21816-CG-PROP1-REV D

REVISION: 1
DEL: 12/08/2019

Alexander & Symonds Pty Ltd
15 Long Walk Street, Mount Town,
South Australia 5092
PO Box 2000, Mount Town, SA 5071
ABN 62007 751 866

T (80) 8130 0566
F (80) 8130 0569
www.alexander.com.au
a.s@alexander.com.au

• Property • Land Development •
• Construction • Mining •
• Spatial Information Management •



Development No. 490/D026/19
Town of Gawler

Development No. 960/D025/19
The Barossa Council

Proposed Plan of Division
Allotment 2 in FT765
Allotment 1 in F13468
Allotment 9010 & 9011 in D114646
Allotment 9201 in Dev No. 490/D016/17
Allotment 4 in D28814
Hundred of Barossa
in the area named

**GAWLER EAST
& KALBEEBA**

CT 618698 CT 6265146
CT 618628 CT 6186334
CT 6184173 PT CT 6214340

1 25 50 100 150 200 250
1:2500

SHEET 4 OF 4

Significant tree
 Regulated tree

No. of proposed allotments 1180
Total area 185.6ha
Area of Development 168.5ha
Reserve area 71.23ha
Length of new roads 19.8k

Contour interval 2m.
Datum AHD.

Vide Titles for disposition of easements.
Road pavements shown are indicative only.

Not to be used for detailed engineering design.
Dimensions and areas are subject to survey.

© ALEXANDER & SYMONDS PTY. LTD. Original Sheet Size A0
Glenn Ian Hordacre
LICENSED SURVEYOR

REF: A21816-CG
DWG NO: A21816-CG PROP1 REV D

REVISION: C
DEL: 12/05/2018

Alexander & Symonds Pty Ltd
15 Long Walk Drive, West Town,
South Australia 5007
PO Box 2000 West Town, SA 5071
AHL 15/07/13 1868

T (80) 6130 0566
F (80) 6130 0569
W www.alexander.com.au
E ahl@alexander.com.au

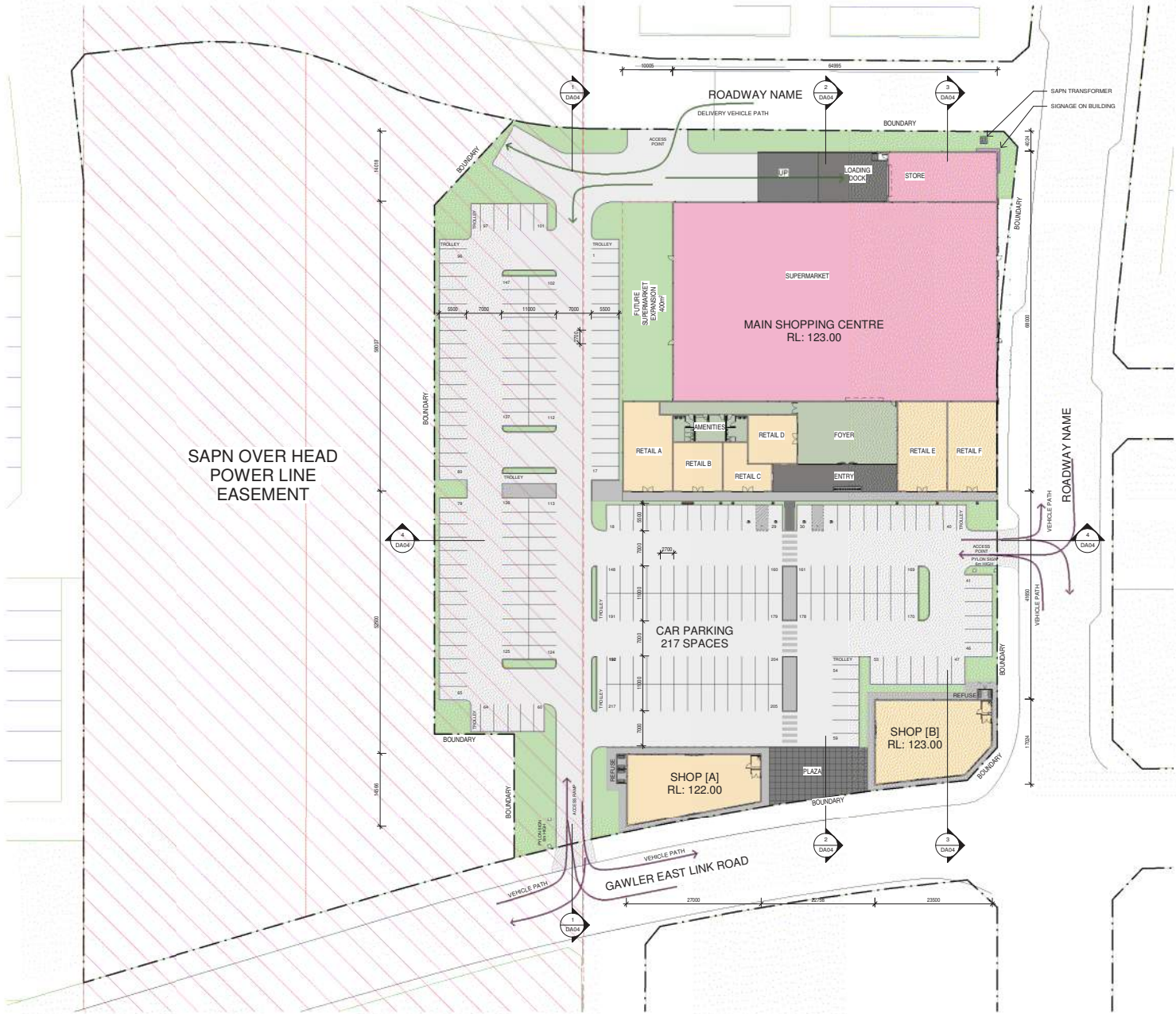
• Property • LAND Development •
• Construction • Mining •
• Spatial Information Management •

Appendix 3. Proposed plans and elevations

Brown Falconer

SITE SUMMARY

SITE AREA	27,980m ²
SUPERMARKET	2,600m ²
RETAIL (A-F)	780m ²
SHOP A	325m ²
SHOP B	355m ²
TOTAL BUILDING AREA	4,060m²
CARPARKING SPACES	217



SAPN OVER HEAD
POWER LINE
EASEMENT

SITE PLAN
1:400

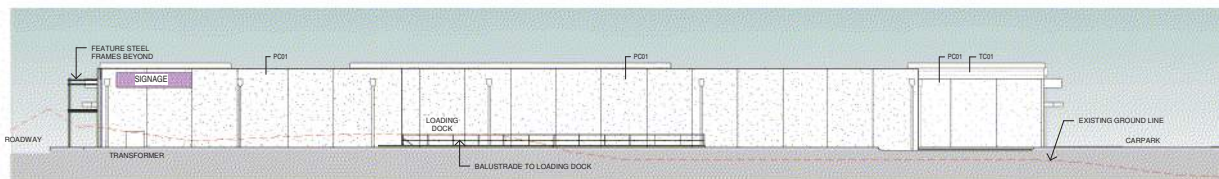


BROWN FALCONER
 28 Chesser Street, Adelaide, South Australia 5000
 Telephone: (08) 8233 3600 Facsimile: (08) 8232 3440
 AIN 65 007 846 585 brownfalconer.com.au

ARCADIAN PROPERTY
 SPRINGWOOD TOWN CENTRE

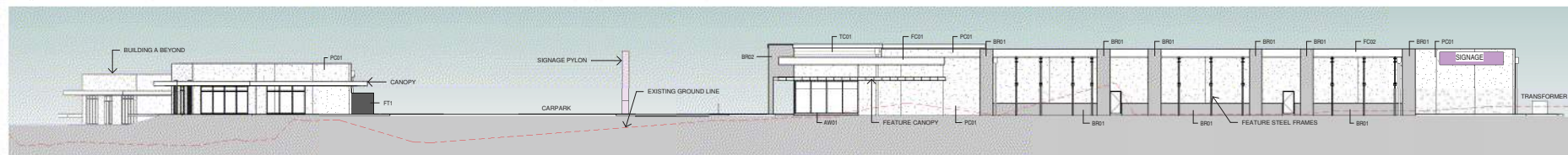
SITE PLAN

C:\Users\hampel\Documents\2016040 DA_wfkampes.rvt
 14/05/2019 11:30:44 AM



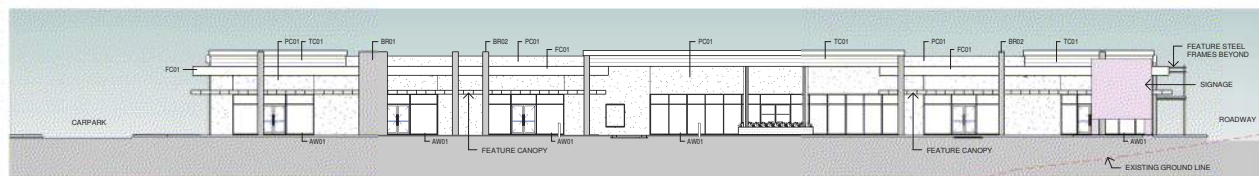
North - Supermarket

1:200



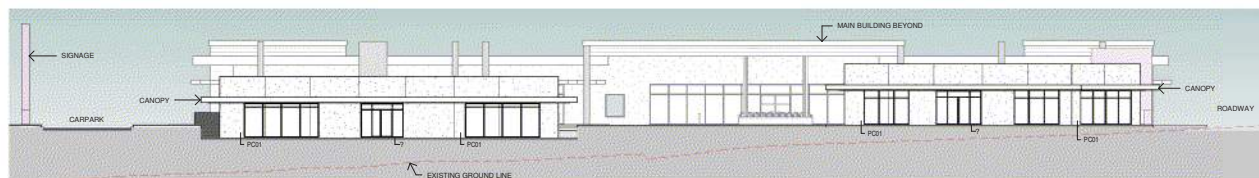
East - Street Elevation

1:200



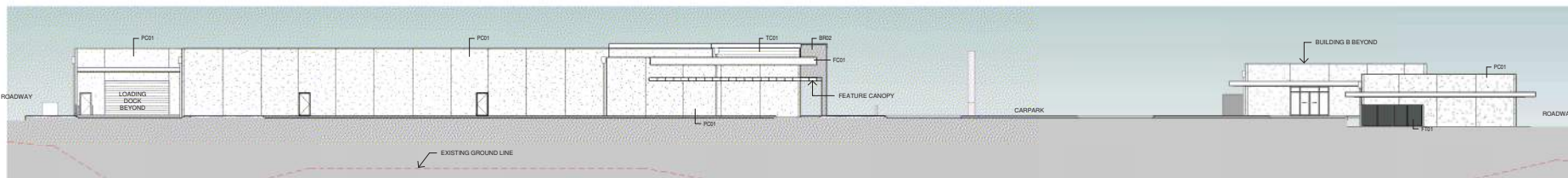
South - Supermarket

1:200



South - Street Elevation

1:200



West

1:200



MATERIAL LEGEND

- AW01 POWDER COATED ALUMINUM DOOR/WINDOW
- FC01 PAINTED FIBRE CEMENT FACADE
- FC02 PAINTED FIBRE CEMENT FACADE



28 Chesser Street, Adelaide, South Australia 5000
Telephone: 08 8233 3900 Facsimile: 08 8232 3440
ABN 65 007 846 585 brookfalconer.com.au

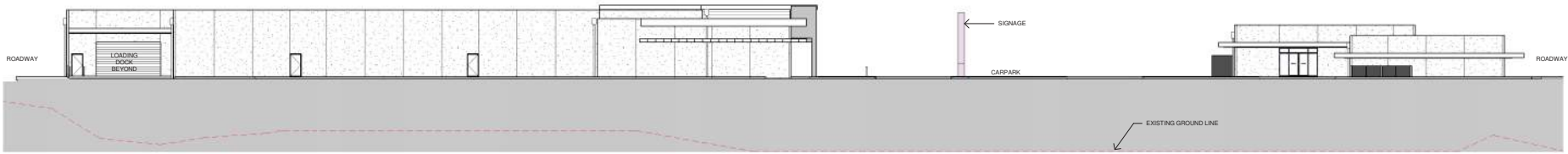
ARCADIAN PROPERTY

SPRINGWOOD TOWN CENTRE

ELEVATIONS

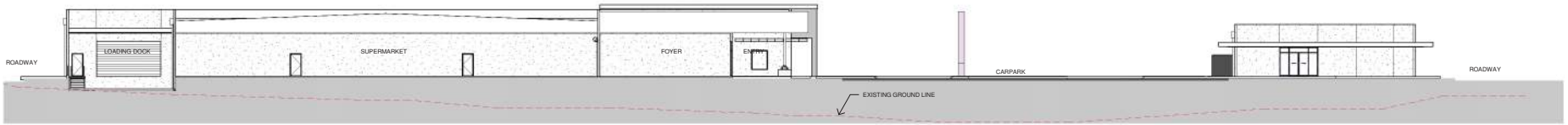


Scale 1:200
Drawn JSM
Date 15/05/2019
JOB No. 2019040
Dwg No. 2569 DA03 Rev: 1 A1 SHEET



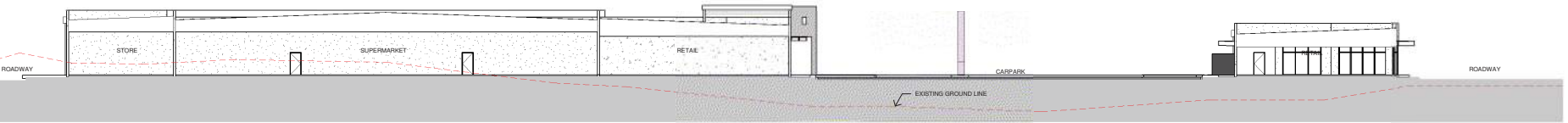
DA - Section 1

1:200



DA - Section 2

1:200



DA - Section 3

1:200



DA - Section 4

1:200



SAPN OVER HEAD
POWER LINE
EASEMENT

LANDSCAPE LEGEND

NEW LANDSCAPING WITHIN MULCHED BEDS
AREAS WITHIN PROPOSED SITE ONLY

NOTES

ALL LANDSCAPING TO BE IRRIGATED
MULCH TO BE INSTALLED TO ALL GARDEN BEDS

TREE SCHEDULE

T1 GALLERY PEAR
T2 JAPANESE ELM



PLANT SCHEDULE

ALL TUBE STOCK

SEDGES / GRASSES

AGAPANTHUS SMALL CULTIVARS	ASC	2 per m ²
DISTICHLIS DISTICHOPHYLLA	DD	2 per m ²
LOMANDRA CULTIVARS	LC	2 per m ²
MANDIOLA SPP	MS	2 per m ²
POA SPP	PS	2 per m ²

GROUND COVERS

ASPERILLA CONFERTA	AC	2 per m ²
LEPTOSPERMUM LANGERUM	LL	2 per m ²



28 Chesser Street, Adelaide, South Australia 5000
Telephone: (08) 8223 3920 Facsimile: (08) 8223 3440
ABN 66 007 846 588 brookfalconer.com.au

ARCADIAN PROPERTY

SPRINGWOOD TOWN CENTRE

LANDSCAPING PLAN

Scale As Indicated
Drawn Author
Date 06/07/19
JOB No. 2016040
Dwg No. 2569 DA05 Rev: 1 A1 SHEET



DA ISSUE

ISSUED FOR DISCUSSION APPROVAL
14/05/2019 11:20:49 AM

Rev	Amendment	Date
1	LODGE/MENT ISSUE	14/5/19



**BROOK
FALCONER**

28 Chesser Street, Adelaide, South Australia 5000
Telephone: 08 8233 3900 Facsimile: 08 8233 3440
ABN 65 007 846 588 brookfalconer.com.au

ARCADIAN PROPERTY

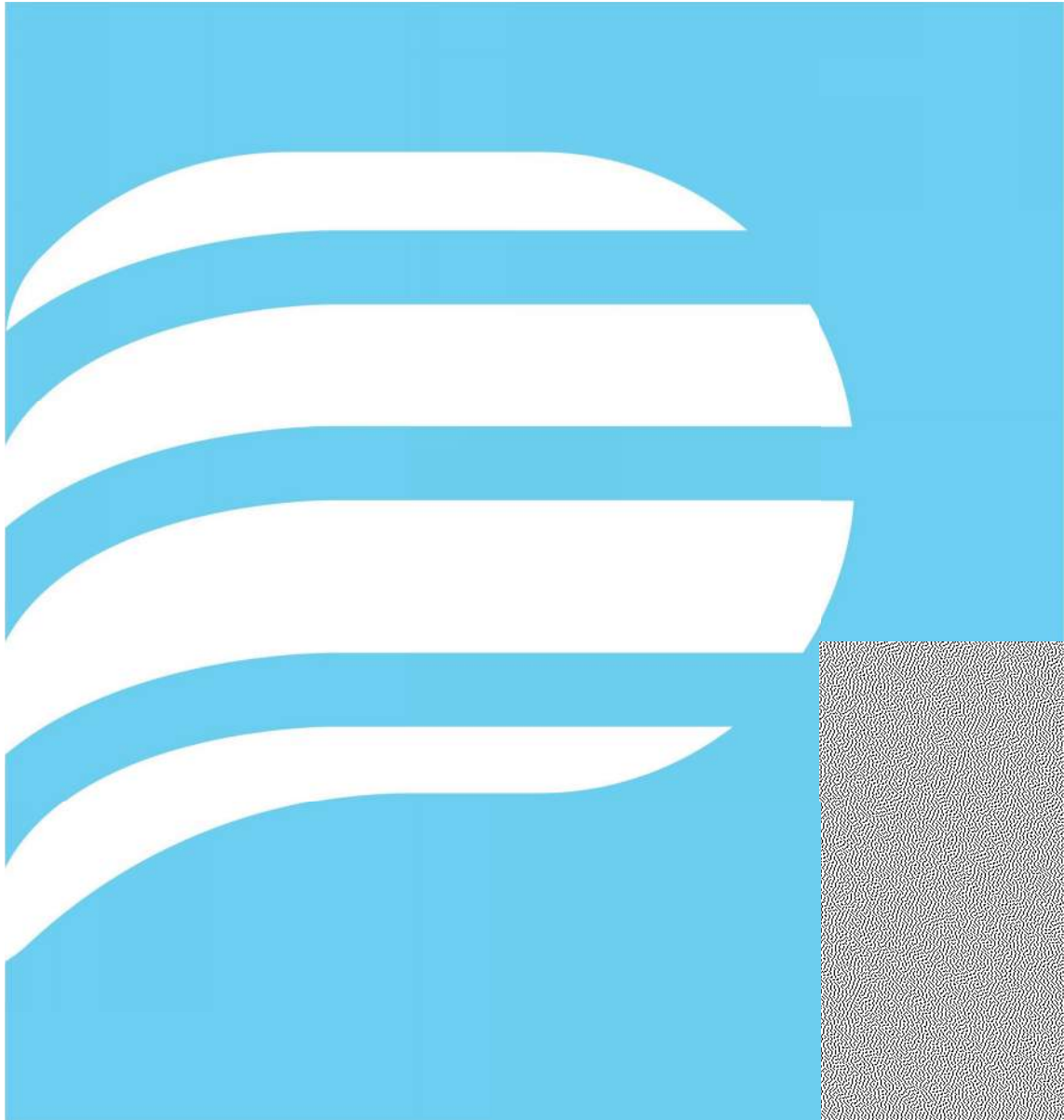
SPRINGWOOD TOWN CENTRE

3D IMAGES

Scale
Drawn JSM
Date 15/05/2019
Job No. 2019040
Dwg No. 2569 DA06 Rev: 1 A1 SHEET

Appendix 4. Traffic and Parking Review

CIRQA



**SPRINGWOOD SHOPPING CENTRE
GAWLER EAST**

TRAFFIC AND PARKING REPORT



DISCLAIMER

The information and data contained within this document are the property of CIRQA Pty Ltd and copyright. This document and the information contained therein is for the use of the authorised Client noted below. The document may not be used, copied, reproduced or modified in whole or in part for any purpose other than for which it was supplied by CIRQA Pty Ltd. CIRQA Pty Ltd accepts no responsibility or liability to any other party who may use or rely upon this document or the information contained therein.

DOCUMENT CONTROL

Report title: Springwood Shopping Centre, Gawler East – Traffic and Parking report

Project number: 19140

Client: Arcadian Property

Client contact: Warwick Mittiga

Version	Date	Details/status	Prepared by	Approved by
Draft	5 Jun 19	For review	BNW	BNW
V1	12 Jun 19	For submission	BNW	BNW

CIRQA Pty Ltd

ABN 12 681 029 983

PO Box 144, Glenside SA 5065

150 Halifax Street, Adelaide SA 5000

(08) 7078 1801

www.cirqa.com.au

1. INTRODUCTION

CIRQA has been engaged to provide design and assessment advice for the Springwood Shopping Centre at Gawler East. Specifically, CIRQA has been engaged to provide advice in respect to traffic and parking aspects of the proposal.

This report provides a review of the subject site, the proposed development (and its associated operation), its access and parking provisions and the associated traffic impact on the adjacent road network. The traffic and parking assessments have been based upon plans prepared by Brown Falconer (drawing no. 2569-DA01 to DA05, dated 16 May 2019, refer Appendix A).

2. BACKGROUND

2.1 SUBJECT SITE

The subject site is located adjacent the north-western corner of the Gawler East Link Road and a new north-south collector road at Gawler East. The site (Lot 2046) forms part of the Village Centre of the broader Springwood development (approximately 2 km east of the township of Gawler). The site will be bound by the Gawler East Link Road to the south, a new north-south collector road to the east, a local road to the north and a reserve/easement to the west.

The City of Gawler's Development Plan identifies that the site is located within the Residential Zone (Gawler East) Zone and the Mixed Use Centre Policy Area.

2.2 ADJACENT ROAD NETWORK

The Gawler East Link Road is a proposed major link road which will provide access to/from Main North Road without the need to travel through the centre of the Gawler township. In the vicinity of the subject site, the road will generally comprise a single traffic lane and bicycle lane in each direction separated by a raised central median (with opportunities for sheltered right turn lanes where required). Footpaths will be provided on both sides of the Gawler East Link Road. Previous traffic forecasts (by others) indicate volumes on the Gawler East Link Road will ultimately be in the order of 12,500 vehicles per day (vpd).

Adjacent the site, the Gawler East Link Road will intersect with the new north-south collector road. The intersection will be controlled with traffic signals (including pedestrian crossing facilities on all legs). Additional right turn lanes will be provided on all approaches. The design of the intersection has been based on detailed analysis prepared as part of the Gawler East Link Road planning and design inputs (by others). It is understood that a 50 km/h speed limit will apply on Gawler East Link Road.

The north-south collector road will also comprise a single traffic lane and a bicycle lane in each direction separated by a raised central median (or right turn lanes where required). Footpaths will be provided on both sides of the north-south road. A 50 km/h speed limit will apply on the north-south collector road. Previous forecasting for the broader development has indicated ultimate volumes in the order of 6,500 vpd will be experienced on the north-south collector road.

Figure 1 illustrates the location of the subject site and adjacent road network.

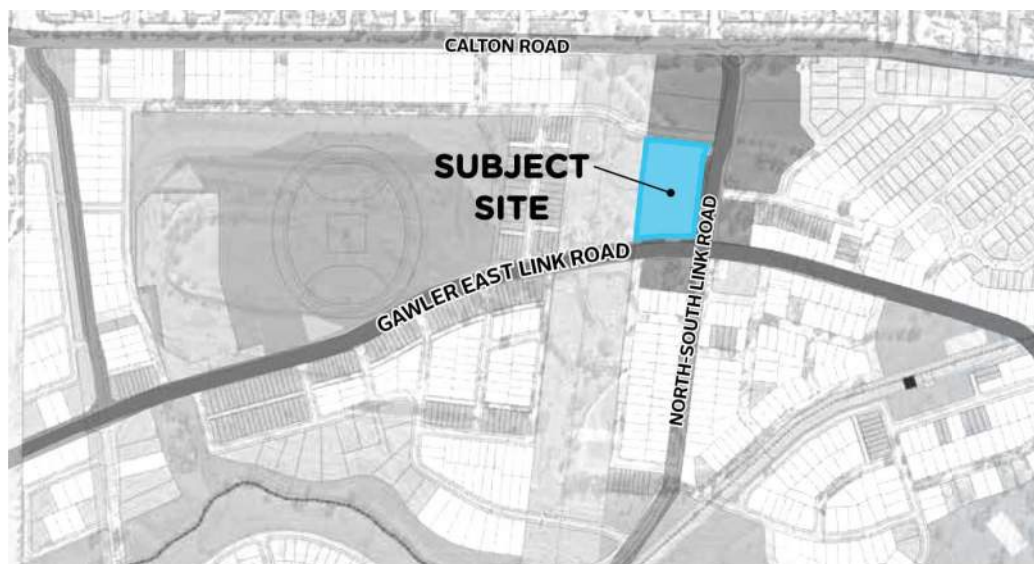


Figure 1 – Location of the subject site and adjacent road network

(Source: after Tract, 2019)

2.3 WALKING AND CYCLING

The site will be highly accessible for residents of the surrounding area by walking and cycling. Footpaths will be provided on both sides of all bounding roads and on-road cycling facilities will be provided on the Gawler East Link Road and north-south collector road (including ‘bicycle boxes’ at the signalised intersection approaches).

2.4 PUBLIC TRANSPORT

It is understood that public transport (bus) services will operate along the Gawler East Link Road with bus stops in close proximity to the subject site.

3. PROPOSED DEVELOPMENT

3.1 LAND USE AND YIELD

The proposed development comprises the construction of a new shopping centre on the subject site. Specifically, the shopping centre will comprise a 2,600 m² floor area supermarket and a total of 1,460 m² floor area of specialty tenancies (totalling 4,060 m² of floor area).

3.2 ACCESS AND PARKING DESIGN

The site will be serviced by a 217-space parking area (inclusive of 4 spaces reserved exclusively for use by people with disabilities). A further 20 bicycle parking spaces are also proposed. The parking area will comply with the requirements of Australian/New Zealand Standard, *Parking Facilities Part 1: Off-street car parking* (AS/NZS 2890.1:2004) and Australian/New Zealand Standard, *Parking Facilities Part 6: Off-street parking for people with disabilities* (AS/NZS 2890.6:2009) in that:

- regular parking spaces will be 2.7 m wide and 5.4 m long (or 4.8 m long with 0.6 m overhang);
- disabled parking spaces will be at least 2.4 m wide and 5.4 m long (with an adjacent shared space of the same dimension);
- the parking aisles will exceed 6.6 m in width;
- 0.3 m clearance will be provided to all objects greater than 0.15 m in height; and
- pedestrian sightlines will be provided at the site's property boundary.

Vehicle access to the site will be provided via the following locations:

- a two-way access point on the Gawler East Link Road (which will accommodate left-in, left-out, right-in and right-out movements);
- a two-way access point on the north-south collector road (which will accommodate left-in, left-out, right-in and right-out movements); and
- a two-way access point on the local road to the north which will primarily provide access for commercial vehicle movements, albeit customers will also be able to utilise the access point.

All vehicles will be able to enter and exit the site in a forward direction.

3.3 SERVICING AND DELIVERIES

Commercial vehicle access will primarily be accommodated via the loading area located at the rear (north) of the shopping centre. This will include a recessed dock for the supermarket tenant. Figure 2 illustrates the turn path of a Semi-Trailer entering and exiting the dock.

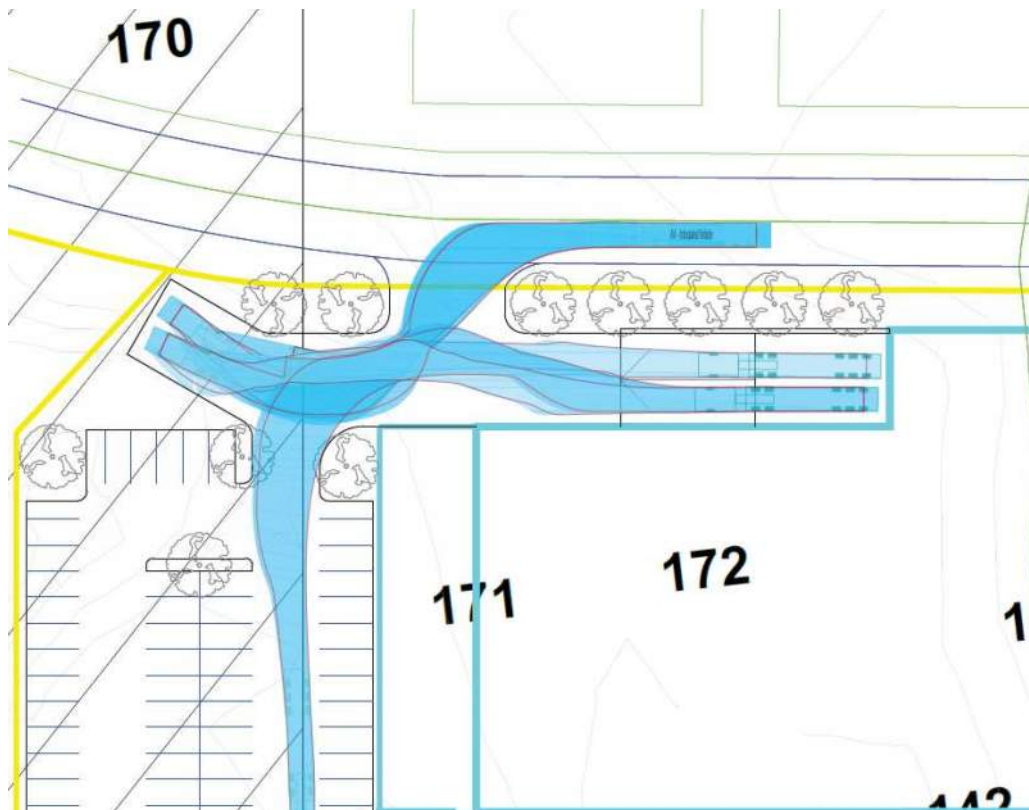


Figure 2 - Semi-Trailer access movements at the loading dock

In addition, other minor service and delivery movements will be undertaken via the car park (particularly for the individual tenancies fronting the Gawler East Link Road. Such movements would be undertaken via medium rigid vehicles or smaller and would typically be undertaken outside of peak trading periods (particularly refuse collection which would occur outside of trading hours).

4. PARKING ASSESSMENT

4.1 CAR PARKING

The Development Plan identifies a rate of 5.5 spaces per 100 m² floor area for shop (retail use) within the Mixed Use Centre Policy Area 3 of the Residential (Gawler East) Zone). On this basis, there is a theoretical requirement for 224 Parking spaces associated with the proposal. The provision of 217 spaces therefore results in a theoretical shortfall of 7 spaces.

However, recent surveys of shopping centres indicate peak parking demands are more commonly in the range of 3.0 to 5.0 spaces per 100 m² floor area. These rates equate to peak demands in the order of 122 to 203 spaces. Such demands would be accommodated by the proposed level of parking provisions.

In comparison, the Aurecon “Parking Spaces for Urban Places” (parking provision) study recommended a rate of 6 spaces per 100 m² for shops within a retail centre with a potential discount of up to 25% (depending on a variety of factors). A discount of 15% is considered appropriate for application to the proposal. On this basis, there would be a requirement for 207 parking spaces. The proposed provision would meet such a requirement.

On the basis of the above, it is considered that the proposed level of parking will more than adequately accommodate peak demands.

4.2 BICYCLE PARKING

The Development Plan does not identify rates for the provision of bicycle parking. However, the following rates are typically applied for bicycle parking provision for shops:

- one bicycle parking space for every 300 m² of gross leasable floor area for employees, plus
- one visitor space for every 600 m² of gross leasable floor area for shoppers.

On the basis of the above, the provision of 20 bicycle spaces (10 bicycle rails) is considered sufficient.

5. TRAFFIC ASSESSMENT

5.1 TRAFFIC GENERATION AND DISTRIBUTION

Previous traffic impact assessments have been undertaken as part of the broader Springwood land division project. This has included consideration of the traffic generation of development within the town centre including the shopping centre site.

Previous planning and design inputs (by others) have also considered the appropriateness of the proposed access arrangements for the shopping centre. Adequate design provisions have been made to accommodate the proposed turning movements at all access points.

The broader land division layout (including adjacent signalised intersection) has been designed to accommodate future traffic flows, including traffic generation

associated with the subject site. As such, the traffic movements associated with the proposed use will be easily accommodated in the surrounding road network.

Notwithstanding the above, a high level assessment of conditions at the two primary access points has been undertaken utilising SIDRA intersection analysis. The assessment has been based on the traffic generation and distribution detailed in the GTA "Springwood Land Division – Transport Impact Assessment" report (2019). The worst-case pm weekday peak has been modelled based on the traffic generation rates for retail uses (as identified in the GTA report) and forecast future movements on the adjacent road network.

Detailed output of the SIDRA modelling is provided in Appendix B. The SIDRA analysis confirms that the proposed access arrangements will have sufficient capacity to accommodate the forecast traffic movements associated with the proposed development (as well as other movements on the adjacent roads).

6. SUMMARY

The proposal comprises the development of a shopping centre within the Springwood land development. Specifically, the shopping centre will include a supermarket as well as specialty tenancies.

The site will be well serviced by active (walking and cycling) facilities and public transport services which will minimise reliance on private motor vehicles. Access to the parking areas will be provided via the Gawler East Link Road, a new north-south collector road and a local road (adjacent the site's northern boundary).

The development will be serviced by parking areas containing 217 vehicle parking spaces (in total). A total of 20 bicycle spaces will also be provided. The proposed level of parking will result in a small shortfall against the requirements of Council's Development Plan. However, based on more recent surveys for shopping centres, it is considered that more than adequate parking will be provided as part of the development.

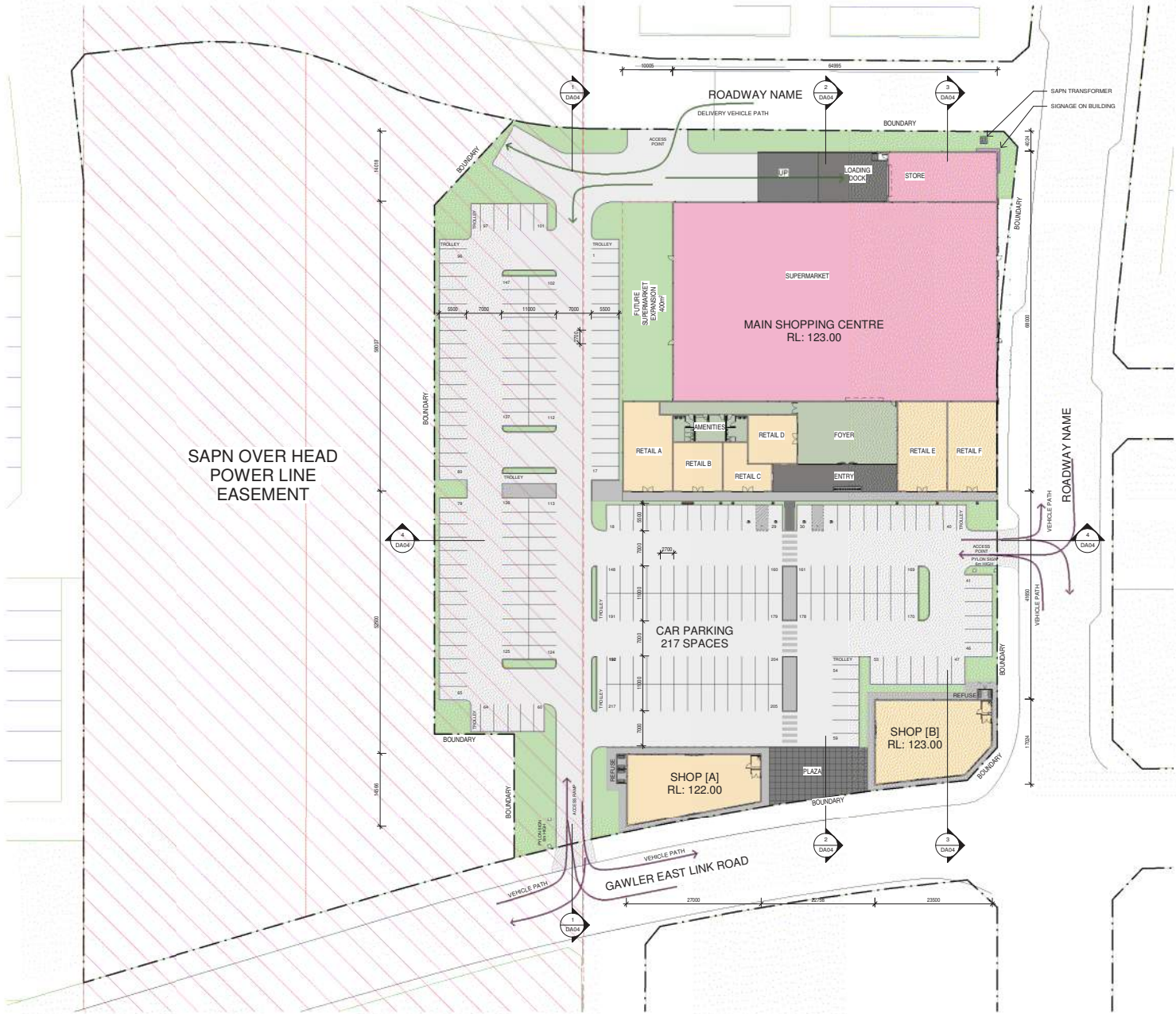
Traffic impacts associated with the proposal have been assessed as part of the broader land division application and planning for the Gawler East Link Road. The proposed access arrangements and associated traffic impacts will be in line with the previous assessments. Additional SIDRA modelling of the primary access points indicates that the forecast movements will be adequately accommodated.

APPENDIX A

BROWN FALCONER'S PLANS DATED MAY 2019

SITE SUMMARY

SITE AREA	27,980m ²
SUPERMARKET	2,600m ²
RETAIL (A-F)	780m ²
SHOP A	325m ²
SHOP B	355m ²
TOTAL BUILDING AREA	4,060m²
CARPARKING SPACES	217



SAPN OVER HEAD
POWER LINE
EASEMENT

SITE PLAN
1:400



BROWN FALCONER
 28 Chesser Street, Adelaide, South Australia 5000
 Telephone: (08) 8233 3600 Facsimile: (08) 8232 3440
 AIN 65 007 846 585 brownfalconer.com.au

ARCADIAN PROPERTY
 SPRINGWOOD TOWN CENTRE

SITE PLAN

Scale As Indicated
 Drawn JSM
 Date 15/05/2019
 Job No. 2016040
 Dwg No. 2569 DA02 Rev: 1 A1 SHEET



APPENDIX B

SIDRA OUTPUT

MOVEMENT SUMMARY

▽ Site: 101 [North-South Link Rd - Future PM Peak]

New Site
 Giveway / Yield (Two-Way)

Movement Performance - Vehicles											
Mov ID	OD Mov	Demand Total veh/h	Flows HV %	Deg. Satn v/c	Average Delay sec	Level of Service	95% Back of Queue Vehicles veh	of Queue Distance m	Prop. Queued	Effective Stop Rate per veh	Average Speed km/h
South: North-South Link Rd (S)											
1	L2	84	5.0	0.153	5.6	LOS A	0.0	0.0	0.00	0.18	56.6
2	T1	200	5.0	0.153	0.0	LOS A	0.0	0.0	0.00	0.18	58.4
Approach		284	5.0	0.153	1.7	NA	0.0	0.0	0.00	0.18	57.8
North: North-South Link Rd (N)											
8	T1	379	5.0	0.201	0.0	LOS A	0.0	0.0	0.00	0.00	60.0
9	R2	53	5.0	0.040	6.5	LOS A	0.2	1.3	0.38	0.60	51.9
Approach		432	5.0	0.201	0.8	NA	0.2	1.3	0.05	0.07	58.8
West: Shopping Centre Access											
10	L2	53	5.0	0.084	6.3	LOS A	0.3	2.3	0.37	0.62	51.7
12	R2	21	5.0	0.084	11.6	LOS B	0.3	2.3	0.37	0.62	51.2
Approach		74	5.0	0.084	7.8	LOS A	0.3	2.3	0.37	0.62	51.6
All Vehicles		789	5.0	0.201	1.8	NA	0.3	2.3	0.06	0.16	57.7

Site Level of Service (LOS) Method: Delay (SIDRA). Site LOS Method is specified in the Parameter Settings dialog (Site tab).

Vehicle movement LOS values are based on average delay per movement.

Minor Road Approach LOS values are based on average delay for all vehicle movements.

NA: Intersection LOS and Major Road Approach LOS values are Not Applicable for two-way sign control since the average delay is not a good LOS measure due to zero delays associated with major road movements.

SIDRA Standard Delay Model is used. Control Delay includes Geometric Delay.

Gap-Acceptance Capacity: SIDRA Standard (Akçelik M3D).

HV (%) values are calculated for All Movement Classes of All Heavy Vehicle Model Designation.

MOVEMENT SUMMARY

▽ Site: 101 [Gawler East Link Rd - Future PM Peak]

New Site
 Giveway / Yield (Two-Way)

Movement Performance - Vehicles												
Mov ID	OD Mov	Demand Total veh/h	Flows HV %	Deg. Satn v/c	Average Delay sec	Level of Service	95% Back of Queue Vehicles veh	Queue Distance m	Prop. Queued	Effective Stop Rate per veh	Average Speed km/h	
East: Gawler East Link Rd (E)												
8	T1	426	5.0	0.226	0.0	LOS A	0.0	0.0	0.00	0.00	60.0	
9	R2	63	5.0	0.145	12.9	LOS B	0.5	3.7	0.72	0.89	47.8	
Approach		489	5.0	0.226	1.7	NA	0.5	3.7	0.09	0.11	58.0	
North: Shopping Centre Access												
10	L2	84	5.0	0.399	15.6	LOS C	1.5	11.2	0.83	1.00	43.0	
12	R2	21	5.0	0.399	48.9	LOS E	1.5	11.2	0.83	1.00	42.8	
Approach		105	5.0	0.399	22.3	LOS C	1.5	11.2	0.83	1.00	42.9	
West: Gawler East Link Rd (W)												
1	L2	84	5.0	0.047	5.6	LOS A	0.0	0.0	0.00	0.58	53.4	
2	T1	784	5.0	0.415	0.1	LOS A	0.0	0.0	0.00	0.00	59.9	
Approach		868	5.0	0.415	0.6	NA	0.0	0.0	0.00	0.06	59.2	
All Vehicles		1463	5.0	0.415	2.5	NA	1.5	11.2	0.09	0.14	57.2	

Site Level of Service (LOS) Method: Delay (SIDRA). Site LOS Method is specified in the Parameter Settings dialog (Site tab).

Vehicle movement LOS values are based on average delay per movement.

Minor Road Approach LOS values are based on average delay for all vehicle movements.

NA: Intersection LOS and Major Road Approach LOS values are Not Applicable for two-way sign control since the average delay is not a good LOS measure due to zero delays associated with major road movements.

SIDRA Standard Delay Model is used. Control Delay includes Geometric Delay.

Gap-Acceptance Capacity: SIDRA Standard (Akçelik M3D).

HV (%) values are calculated for All Movement Classes of All Heavy Vehicle Model Designation.

INTERSECTION SUMMARY

▽ Site: 101 [North-South Link Rd - Future PM Peak]

New Site
Giveway / Yield (Two-Way)

Intersection Performance - Hourly Values		
Performance Measure	Vehicles	Persons
Travel Speed (Average)	57.7 km/h	57.7 km/h
Travel Distance (Total)	798.2 veh-km/h	957.8 pers-km/h
Travel Time (Total)	13.8 veh-h/h	16.6 pers-h/h
Demand Flows (Total)	789 veh/h	947 pers/h
Percent Heavy Vehicles (Demand)	5.0 %	
Degree of Saturation	0.201	
Practical Spare Capacity	388.4 %	
Effective Intersection Capacity	3935 veh/h	
Control Delay (Total)	0.39 veh-h/h	0.47 pers-h/h
Control Delay (Average)	1.8 sec	1.8 sec
Control Delay (Worst Lane)	7.8 sec	
Control Delay (Worst Movement)	11.6 sec	11.6 sec
Geometric Delay (Average)	1.5 sec	
Stop-Line Delay (Average)	0.3 sec	
Idling Time (Average)	0.1 sec	
Intersection Level of Service (LOS)	NA	
95% Back of Queue - Vehicles (Worst Lane)	0.3 veh	
95% Back of Queue - Distance (Worst Lane)	2.3 m	
Queue Storage Ratio (Worst Lane)	0.00	
Total Effective Stops	127 veh/h	153 pers/h
Effective Stop Rate	0.16 per veh	0.16 per pers
Proportion Queued	0.06	0.06
Performance Index	15.0	15.0
Cost (Total)	324.08 \$/h	324.08 \$/h
Fuel Consumption (Total)	61.4 L/h	
Carbon Dioxide (Total)	146.5 kg/h	
Hydrocarbons (Total)	0.011 kg/h	
Carbon Monoxide (Total)	0.168 kg/h	
NOx (Total)	0.264 kg/h	

Site Level of Service (LOS) Method: Delay (SIDRA). Site LOS Method is specified in the Parameter Settings dialog (Site tab).

NA: Intersection LOS for Vehicles is Not Applicable for two-way sign control since the average intersection delay is not a good LOS measure due to zero delays associated with major road movements.

SIDRA Standard Delay Model is used. Control Delay includes Geometric Delay.

Intersection Performance - Annual Values		
Performance Measure	Vehicles	Persons
Demand Flows (Total)	378,947 veh/y	454,737 pers/y
Delay	187 veh-h/y	224 pers-h/y
Effective Stops	61,010 veh/y	73,212 pers/y
Travel Distance	383,125 veh-km/y	459,750 pers-km/y
Travel Time	6,637 veh-h/y	7,964 pers-h/y
Cost	155,559 \$/y	155,559 \$/y
Fuel Consumption	29,495 L/y	
Carbon Dioxide	70,322 kg/y	
Hydrocarbons	5 kg/y	
Carbon Monoxide	81 kg/y	
NOx	127 kg/y	

INTERSECTION SUMMARY

▽ Site: 101 [Gawler East Link Rd - Future PM Peak]

New Site
Giveway / Yield (Two-Way)

Intersection Performance - Hourly Values		
Performance Measure	Vehicles	Persons
Travel Speed (Average)	57.2 km/h	57.2 km/h
Travel Distance (Total)	1478.8 veh-km/h	1774.6 pers-km/h
Travel Time (Total)	25.8 veh-h/h	31.0 pers-h/h
Demand Flows (Total)	1463 veh/h	1756 pers/h
Percent Heavy Vehicles (Demand)	5.0 %	
Degree of Saturation	0.415	
Practical Spare Capacity	100.5 %	
Effective Intersection Capacity	3524 veh/h	
Control Delay (Total)	1.02 veh-h/h	1.23 pers-h/h
Control Delay (Average)	2.5 sec	2.5 sec
Control Delay (Worst Lane)	22.3 sec	
Control Delay (Worst Movement)	48.9 sec	48.9 sec
Geometric Delay (Average)	1.0 sec	
Stop-Line Delay (Average)	1.6 sec	
Idling Time (Average)	1.1 sec	
Intersection Level of Service (LOS)	NA	
95% Back of Queue - Vehicles (Worst Lane)	1.5 veh	
95% Back of Queue - Distance (Worst Lane)	11.2 m	
Queue Storage Ratio (Worst Lane)	0.01	
Total Effective Stops	210 veh/h	252 pers/h
Effective Stop Rate	0.14 per veh	0.14 per pers
Proportion Queued	0.09	0.09
Performance Index	29.7	29.7
Cost (Total)	592.22 \$/h	592.22 \$/h
Fuel Consumption (Total)	110.2 L/h	
Carbon Dioxide (Total)	262.8 kg/h	
Hydrocarbons (Total)	0.019 kg/h	
Carbon Monoxide (Total)	0.303 kg/h	
NOx (Total)	0.457 kg/h	

Site Level of Service (LOS) Method: Delay (SIDRA). Site LOS Method is specified in the Parameter Settings dialog (Site tab).

NA: Intersection LOS for Vehicles is Not Applicable for two-way sign control since the average intersection delay is not a good LOS measure due to zero delays associated with major road movements.

SIDRA Standard Delay Model is used. Control Delay includes Geometric Delay.

Intersection Performance - Annual Values		
Performance Measure	Vehicles	Persons
Demand Flows (Total)	702,316 veh/y	842,779 pers/y
Delay	492 veh-h/y	590 pers-h/y
Effective Stops	100,849 veh/y	121,019 pers/y
Travel Distance	709,844 veh-km/y	851,813 pers-km/y
Travel Time	12,401 veh-h/y	14,882 pers-h/y
Cost	284,266 \$/y	284,266 \$/y
Fuel Consumption	52,886 L/y	
Carbon Dioxide	126,125 kg/y	
Hydrocarbons	9 kg/y	
Carbon Monoxide	146 kg/y	
NOx	219 kg/y	