

PLAN CHANGE 08005

Rezoning of rural land to Business 2 at Izone Rolleston

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1. Proposed Plan Change

Introduction

- 1.1 Selwyn District Council proposes changes to the Selwyn District Plan ("the District Plan") by rezoning land at Hoskyns Road, Rolleston from the existing Rural Zone to Business 2 so as to provide for industrial business activities. The proposed zone presently applies over adjacent land to the west and south. In addition to the rules that apply to Business Zones generally there are some site specific controls proposed that will apply to the subject site. These are set out at Section 2 below.
- 1.2 In addition the plan change incorporates a requirement for development over the land in question to be in accordance with a specific Outline Development Plan to be included at Appendix 33 to the District Plan.
- 1.3 Rules relating to the abovementioned Outline Development Plan will control the location of main road connections to and within the extension to the Business 2 Zone, as well as introducing a requirement for landscaping along the boundary with the Rural zoned properties to the north.
- 1.4 The site is identified on the following Figure 1 and is identified at Appendix A.



Site plan

Purpose of Request

- 1.5 The purpose of the plan change is to rezone rural zoned land that currently adjoins the existing IZONE Southern Business Hub to Business 2 to allow for the future development of the site for business and industrial purposes.
- 1.6 The subject site encompasses approximately 56.3 hectares and is located north of the Rolleston Town Centre and State Highway 1. The adjoining properties to the west and south of the subject site are zoned Business 2, whereas the properties to north and east across Hoskyns Rd are zoned Rural. Refer to section 4 for further description of the site and its locality.

Reasons for Request

- 1.7 The existing IZONE Southern Business Hub comprises some 71 hectares and is in a prime location for business and industrial activities. Since its inception in 2001 the IZONE Southern Business Hub has experienced a positive reception from the industry. Lots incorporating up to Stage 3 have been sold. Stage 4 of the development has proceeded resulting in an additional 27 lots for sale. The current rate of sales of lots within the IZONE Southern Business Hub is at 15-20ha per annum. At this rate the current business zoned land would be exhausted somewhere within the next 2-4 years.
- 1.8 To meet the future demand and growth of the IZONE Southern Business Hub it is necessary to expand the business park. Selwyn District Council have acquired adjoining land to the east of the current IZONE Southern Business Hub site to provide for development that meets the existing and future needs of the surrounding community and that is established in an integrated manner.
- 1.9 Given the uptake of the existing IZONE Southern Business Hub land (Business 2 Zone) there is predicted to be a lack of appropriately zoned land available in the locality that is capable of meeting future needs (beyond the short term) for commercial growth of this nature. As such, it is appropriate to rezone further land adjacent to the existing business area to provide for the improved services being proposed. Given the lead in time involved with rezoning land and then obtaining subdivision consent, completing site works and obtaining new Titles it is necessary to begin that process now to avoid a lack of availability of appropriately zoned land in the near future. To ensure the future viability of the IZONE- Southern Business Hub it is vital to maintain the supply of appropriately zoned land to continue the momentum of the market response to the existing IZONE Southern Business Hub.
- 1.10 Through the development of the existing IZONE Southern Business Hub area it has become evident that the strongest market demand has been for larger lots (14,000m² +) where businesses can establish larger warehouse/storage buildings of reasonably large sizes. This demand continues and is in part driven by IZONE's good access to SH1, close proximity to Christchurch City, easy access to the Airport and to SH73 to the West Coast. The proposed rezoning is intended to cater for this demand into the future and reflects the recognition that the IZONE Southern Business Hub has become a business area of regional importance given the role it can play in supporting economic growth in the Greater Christchurch area.
- 1.11 Under the current rural zoning of the site any proposed future business or industrial development would require resource consent to enable its construction and operation.
- 1.12 Amendments to the District Plan are considered to be the most appropriate method by which to provide for the proposed development of the site, and to adequately provide for the on-going operation of a business park of regional importance at this location.

2. Schedule of requested amendments to the Selwyn District Plan

- 2.1 The following changes are proposed to the Selwyn District Plan to enable the proposed rezoning to proceed.
- a. Amendment 1:- Amend Planning Maps 13 and 96 (Sheets 1 and 2) to identify the zoning of the site as Business 2. See amended planning maps attached at Appendix A.
- Amendment 2: Amend the following Rule 13.1.3 Controlled Activities of the 'Business Zone Rules Status of Activities (page C13-001) as follows:
 - 13.1.3 In that those parts of the Business 2 Zone at Railway Road, Rolleston, as is depicted on the Outline Development Plans at Appendices 22 and 33 all of the following activities shall be controlled activities, irrespective of whether they comply with the conditions for permitted activities in Rules 14 to 23.
- c. Amendment 3: Amend Rule 16.1.1 of the Land Use rules for Business Zones Buildings and Landscaping as follows:
 - 16.1.1 Except as provided in Rules 16.1.2 to 16.1.5 any principal building"
- d. Amendment 4:- Insert the following Rule 16.1.5 of the Land use rules for Business Zones Buildings and Landscaping:
- 16.1.5 Any principal building in that part of the Business 2 Zone as is shown on the Outline Development Plan at Appendix 33 if the following standards are met:
 - 16.1.5.1 A landscaping strip of at least 3 metres width be planted along every road frontage of the site in accordance with (a) to (d) below..
 - (a) The landscaping shall consist of only those species listed in Appendix 21. Planting for each allotment shall include:
 - A minimum of two trees from Group A for every 10 metres of road frontage.
 - At least 35% of the required area shall be planted in species from List C.
 - At least 10% of the required area shall be planted in species from List D.
 - (b) All plants shall be of the following maximum spacings:
 - List B 1.5 metre centres;
 - List C 1.5 metre centres;
 - List D 700mm centres.
 - (c) The landscaping planted shall be maintained and if dead, diseased or damaged shall be removed and replaced.
 - (d) No fences or structures shall be erected within the 3 metre landscaping strip.

- e. **Amendment 5:-** Amend Rule 16.1.6 of the Land Use rules for Business Zones Buildings and Landscaping:
 - 16.1.6 Any <u>principal building which does not comply with Rule 16.1.2 or 16.1.3 or 16.1.4 or 16.1.5 shall be a non-complying activity.</u>
- f. Amendment 6:- Amend the numbering of the following rules of the Land Use rules for Business Zones Buildings and Landscaping to that described below:

Existing rule	Amend numbering to
16.1.5	<u>16.1.6</u>
16.1.6	16.1.7

- g. Amendment 7: Insert the following Rule 16.7.2.8 to the Land Use Rules for Business Zones
 Buildings and Building Position (page C16-007):
 - 16.7.2.8 <u>In that part of the Business 2 Zone Business 2 Zone as is shown on the Outline Development Plan at Appendix 33:</u>

Road Boundaries - 10 metres
Internal Boundaries - 15 metres (only along the common boundary with land within a Rural Zone)

- h. Amendment 8: Amend Rule 16.7.5 of the Land Use rules for Business Zones Buildings and Building Position (page C16-007) as follows:
 - 16.7.5 Any activity which does not comply with Rules 16.7.2.2-16.7.2.8 shall be a restricted discretionary activity.
- i. Amendment 9: Amend the following Rules 18.2.1.2(b) and (c) of the Land Use rules for Business Zones Height and Setbacks Utility Buildings (page C18-004):
 - (b) Business 2 Zone (excluding <u>the</u> area<u>s</u> at Rolleston that is <u>are</u> depicted on the Outline Development Plan<u>s</u> at Appendix 22 <u>and 33</u>): 2m from a <u>road boundary</u>, or any boundary adjoining a Living Zone.
 - (c) Business 2 Zone at Rolleston as is depicted on the Outline Development Plans at Appendix Appendices 22 and 33:
- j. Amendment 10: Amend the following Rule 18.5.2 of the Land Use rules for Business Zones -Landscaping – Utility Buildings (page C18-007):
 - Any <u>principal building</u> in that part those parts of the Business 2 Zone located at Railway Road, Rolleston as is shown on the Outline Development Plans at Appendix Appendices 22 and 33 shall be a permitted activity if the following standards are met:
 - 18.5.2.1 The area between the common boundary of the Business 2 Zone and the Rural zone, as depicted on the Outline Development Plans at Appendix Appendices 22 and 33. and the
 - A landscaping strip of at least 3m shall be provided along every road frontage in that part those parts of the Business 2 Zone located at Railway Road, Rolleston and Hoskyns Rd, Rolleston as depicted on the Outline Development Plan Plans at Appendix-Appendices 22 and 33. The landscaping shall meet the following standards:

- k. Amendment 11:- Amend the following Rule 22.4.1 of the Land Use rules for Business Zones -Activities and Noise (page C22-003).
 - In that part those parts of Business 2 Zone at Rolleston as is depicted on the Outline Development Plans at Appendix Appendices 22 and 33
- Amendment 12:- Insert the following Rule 22.6.1.4 of the Land Use rules for Business Zones Activities and Light Spill.
 - 22.6.1.4 Any lighting in the Business 2 Zone at Hoskyns Road North, Rolleston as depicted on the Outline Development Plan at Appendix 33 shall be designed so that:
 - (a) All outdoor lighting shall be shielded from above in such a manner that the light source is not visible from any property within the Rural Zone.
 - (b) All fixed outdoor lighting shall be directed away from adjacent roads outside of the Business 2 Zone and from adjacent properties within the Rural Zone.
- m. Amendment 13: Amend Rule 22.12.1.1 of the Land Use rules for Business Zones Retailing Within the Business 2 Zone, Rolleston as follows:
 - 22.12.1 The following shall be a permitted activity:
 - 22.12.1.1 Any retail activity undertaken from an <u>allotment</u> in the Business 2 Zone at Rolleston as depicted on the Outline Development Plans at Appendix Appendices 22 and 33 provided that it only occupies up to 20% of the gross floor area of building on that <u>allotment</u> or 2,000m², whichever is the lesser.
- n. Amendment 14:- Insert the following as Rule 24.1.3.11 of the Business Zone Subdivision Rules
 - 24.1.3.11 In the Business 2 Zone at Hoskyns Road North, Rolleston as depicted on the Outline Development Plan at Appendix 33 road connections shall be provided to Hoskyns Road and the land to the west and north and a pedestrian link shall be provided to the adjacent B2 Zone to the west generally in accordance with those locations identified on the Outline Development Plan.
- o. Amendment 15:- Insert the following as Rule 24.1.3.12 of the Business Zone Subdivision Rules
 - 24.1.3.12 In the Business 2 Zone at Hoskyns Road North as is depicted on the Outline

 Development Plan at Appendix 33 the following street plantings shall be planted in the roads prior to vesting of the roads in the Council.
 - (i) Boulevard Road:
 - Planting in the median of the road.
 - A planting strip of 2 metres down each side of the road.
 - Planting shall consist of the species listed in Appendix 21 and shall be in accordance with the standards listed at Business Zone Rule 16.1.5.1.
 - (ii) Secondary roads:
 - A planting strip of 2 metres down each side of the road.
 - Planting shall consist of the species listed in Appendix 21 and shall be in accordance with the standards listed at Business Zone Rule 16.1.5.1.

- p. Amendment 16: Insert the following as Rule 24.1.3.13 of the Business Zone Subdivision Rules
 - 24.1.3.13 The area between the common boundary of the Business 2 Zone and the Rural Zone, as depicted on the Outline Development Plan at Appendix 33, and the principal building shall be landscaped to the following standards:
 - (a) The landscaping shall be planted along the Business 2 Zone side of the common boundary.
 - (b) The landscaping shall achieve, once matured, a minimum width of 2.5 metres and a minimum height of 6.5 metres.
 - (c) The landscaping planted shall be maintained, and if dead, diseased, or damaged, shall be removed and replaced.
 - (d) The landscaping shall consist of one or more of the following species:

 Macrocarpa
 Levland cypress

Leyland cypress Radiata pine Kahikatea

- q. Amendment 17:- Include the Outline Development Plan attached at Appendix A to this document as a new Appendix 33 to the District Plan.
- r. Amendment 18 Make the following amendments to "Appendix 21 Planting requirements for Business 2 Zone (Appendix 22) at Rolleston".
 - (i) Add the following tree species to Group A "Higher canopy trees with an ultimate....."

 Abbreviation Scientific Name Common Name

 Qr Quercus robur English Oak
 - (ii) Delete the 'Note' at the start of the Appendix.

3. Statutory Framework

3.1 The Resource Management Act 1991 ("the Act") provides the legislative framework that defines the responsibilities of territorial local authorities for managing natural and physical resources.

Framework for Plan Change Requests

- 3.2 Section 73(1A) identifies that Schedule 1 of the Act provides the manner in which the District Plan may be changed by a territorial authority:
 - "73 Preparation and change of district plans
 - (1A) A district plan may be changed by a territorial authority in the manner set out in Schedule 1."
- 3.3 Schedule 1, Part 2, clause 21 of the Act provides that:

"Where a local authority proposes to prepare or change its policy statement or plan, the provisions of this part shall not apply and the procedure set out in Part I shall apply."

- 3.4 Schedule 1, Part 1 sets out the framework within which a territorial authority may undertake a plan change to the District Plan. This specifies (among other matters) the consultation to be undertaken and procedures regarding notification of the Plan Change. Refer to Section 6 of this report for discussion of consultation undertaken to date.
- 3.5 Regard must also be given to the matters set out in sections 74 and 75 of the RMA in relation to decision making by territorial authorities. Matters raised in these sections that are relevant to the present proposal are as follows:

Section 74 - Matters to be considered by territorial authority

- (1) A territorial authority shall prepare and change its district plan in accordance with its functions under section 31, the provisions of Part 2, any direction given under section 25A(2), its duty under section 32, and any regulations.
- (2) In addition to the requirements of section 75(3) and (4), when preparing or changing a district plan, a territorial authority shall have regard to—
 - (a) Any-
 - (i) Proposed regional policy statement; or
 - (ii) Proposed regional plan of its region in regard to any matter of regional significance or for which the regional council has primary responsibility under Part 4; and
 - (b) Any--
 - (i) Management plans and strategies prepared under other Acts; and
 - (iia) Relevant entry in the Historic Places Register; ...
 - (c) The extent to which the district plan needs to be consistent with the plans or proposed plans of adjacent territorial authorities.
- (2A) A territorial authority, when preparing or changing a district plan, must-
 - (a) take into account any relevant planning document recognised by an iwi authority and lodged with the territorial authority, to the extent that its content has a bearing on resource management issues of the district...
- 75 Contents of district plans
- (3) A district plan must give effect to-
 - (c) any regional policy statement.

- (4) A district plan must not be inconsistent with—
 - (b) a regional plan for any matter specified in section 30(1).
- (5) A district plan may incorporate material by reference under Part 3 of Schedule 1.
- 3.6 The relevant regional planning documents are the Regional Policy Statement, Proposed Change 1 to the Regional Policy Statement, the Proposed Natural Resource Regional Plan and the Regional Land Transport Strategy. There are no entries in the Historic Places Register which are impacted on by the current proposal. Furthermore, the proposal does not impact on any resource management issue identified in the Ngai Tahu Resource Management Strategy for the Canterbury Region (Te Whakatau Kaupapa).

Canterbury Regional Policy Statement

- 3.7 The Canterbury Regional Policy Statement ("RPS") has been operative since 26 June 1998. The RPS provides an overview of the resource management issues of the region and is a general guide as to how natural and physical resources are to be managed in an integrated way to promote sustainable management.
- 3.8 An issue requiring consideration is whether the expansion and modification of an existing Business 2 Zone would render the District Plan not giving effect to the RPS. For the purposes of this assessment, it is assumed that the District Plan currently gives effect to the RPS.
- 3.9 Chapter 7 of the RPS is concerned with soils and land use. Objectives and policies in this section relate to safeguarding the life supporting capacity of soil and the protection of land and the surrounding environment from contamination. The soils of the subject site are considered to be of a low quality and are characterised by a stony soil structure. As identified in the infrastructure assessment forming part of the following AEE sewerage discharge from the site will be directed to the Council's reticulated system. As identified in the attached Stormwater Management Assessment, it is considered that there are no stormwater issues that are a barrier to the proposal subject to the identified methods being put in place. Furthermore resource consent will be the required from the Regional Council which provides a sufficient safeguard to ensure this aspect of the proposal will not offend the RPS.
- 3.10 Chapter 9 of the RPS is concerned with water. Objectives and policies in this section relate to the sustainable use of water and water quality. The attached Stormwater Management Assessment provides comments and an assessment of the stormwater infrastructure against Chapter 9 of the RPS. Furthermore resource consent will be required from the Regional Council which provides a sufficient safeguard to ensure this aspect of the proposal will not offend the RPS.
- 3.11 Chapter 12 of the RPS includes objectives and policies concerned with settlement and the built environment in the context of managing effects of development on the environment and natural and physical resources. Objective 1 relates to enabling sustainable urban development and provision of network utilities. The policies of this chapter relate to managing effects of urban development and settlement expansion on amenity values. As identified in the following AEE, compliance with District Plan performance standards in combination with the proposed site specific controls will adequately mitigate any potential adverse amenity effects.
- 3.12 Policies 1 and 7 of Chapter 12 seek to promote urban development and the development of towns in a way that makes efficient and effective use of resources. The AEE and other material that follows address how the proposal is consistent with such outcomes. In short the site has business zoning to the south and west and there is sufficient capacity in the infrastructure serving the area to enable the expansion to occur.
- 3.13 Objective 2 and Policy 3 of Chapter 12 seek to ensure adverse effects on the region's transport infrastructure arising from urban development are avoided. As detailed in the traffic

- assessment, completed by Traffic Design Group, the proposal will have no more than minor effects on the road network and existing traffic safety levels in the locality of the subject site.
- 3.14 In summary, the proposed plan change is considered to be consistent and give effect to the relevant objectives and policies of the RPS.

Regional Policy Statement Proposed Plan Change 1

- 3.15 Proposed Change 1 to the Regional Policy Statement was publicly notified on 28 July 2007. The Plan Change amends the Regional Policy Statement through the insertion of a new chapter 'Chapter 12A Development of Greater Christchurch'. This chapter provides the sub regional policy framework to implement the Greater Christchurch Urban Development Strategy which has been adopted by the Selwyn District Council (among others). The purpose of Chapter 12A is to provide for development in a way which achieves quality outcomes and takes a sustainable development approach to managing growth.
- 3.16 With regard to Proposed Change 1, the subject site is within the Urban Limits and is identified as a "Greenfield Outline Development Plan Area Business". Furthermore, the site is specifically referenced as "SR2" and an area of land adjacent to the north west boundary of the existing IZONE Business Hub is referenced as "SR1"(see Map 1H of Proposed Change 1 to the Regional Policy Statement). The rezoning of the subject site (SR2) is considered to be more appropriate and logical than SR1 at this time given the location provides direct access to Hoskyns Road being a main connection to State Highway 1 and will enable the utilisation of the existing reticulated services that service the IZONE Southern Business Hub. In any event there is nothing in Proposed Plan Change 1 as notified to suggest the sequencing of development with regard to areas SR1 and SR2. In the recommended amendments to Change 1 included in the Officer's Report both SR1 and SR2 are identified as being available for development in the first planning period (2007-2016) and SR2 is in no way dependant on infrastructure from area SR1. As such, there are no practical reasons why SR1 should be developed ahead of SR2.
- 3.17 Some 256 submissions were received by the Regional Council as part of the notification process of the Proposed Change 1. Ten of those submissions relate specifically to the subject site. Whilst eight of these submissions opposed the Proposed Change in general, six of the submissions support the expansion of business and industrial land within the vicinity of the subject site. Five submissions relate specifically to the subject site and are in support of expanding the business and industrial land. Adjacent property owners who have submitted in favour of Proposed Change 1 include those owners at the northern boundary of the subject site (RS 6618) and the property to the east of the subject site across Hoskyns Road (Lot 1 DP 344284, Lot 2 DP 344284 and Lot 4 DP 344284). Both of these property owners have requested that the proposed Greenfield development area is expanded further. The road layout included on the Outline Development Plan has taken the desires of these properties into account.
- 3.18 Objective 12A.3 relates to managing urban development to achieve consolidation of existing urban areas and to avoid unsustainable expansion outside these areas. Rolleston is identified as an existing urban area where sustainable and self sufficient growth is provided for.
- 3.19 Objectives 2 and 3 relate to providing for sustainable urban growth and recognising amenity values and urban growth limitations. The proposal is considered to be consistent with these objectives. As discussed the subject site is identified in an area within the Urban Limits and as a Business Greenfield development area. Furthermore, the proposed provisions to be applied to the rezoned land incorporate stringent rules that relate directly to amenity which includes rules regarding setbacks, landscaping, noise generation and light spill. These will result in future development over the site being consistent with the amenity values of the properties to the west whilst protecting the amenity values of rural zoned land to the east and north.

- 3.20 Objectives 4 to 9 relate to efficient land use planning to provide for growth and the integration of transport infrastructure and land use. Policies 3 and 5 relate to the provision of business land and key activity centres and commercial activities. The proposal is consistent with these objectives and policies. The proposal will provide for employment and industrial growth opportunities within close proximity to the Rolleston Town Centre (identified as a Key Activity Centre in the Plan Change), State Highway 1 and the South Island Main Trunk Railway Line.
- 3.21 Policy 1 identifies that urban activities should only occur within the urban limits. The subject site is within the proposed urban limits.
- 3.22 Policy 8 requires that development of urban activities within the described Greenfield areas defined in Map 1 shall occur in accordance with an Outline Development Plan when proposed to amend the District Plan. This application is for a plan change to the District Plan and the subject site is within an identified Greenfield area in Map 1. An Outline Development Plan Report is attached at Appendix B.
- 3.23 In summary, the present request is considered to be consistent with and gives effect to the relevant objectives and policies of proposed Change 1 to the RPS. Further assessment of the proposal against Proposed Change 1 to the Regional Policy Statement is provided in the Outline Development Plan report attached at Appendix B prepared by Harrison Grierson.

Regional Land Transport Strategy (RLTS)

- 3.24 Policy 4.1 seeks to promote the location of employment areas that supports sustainable transport choices and reduces the need to travel, especially by private motor vehicle. Policy 4.4 seeks to ensure a high level of accessibility to business destinations, including town centres and industrial areas. In this instance the proposal is entirely consistent with these provisions, as the plan change will enable the ongoing success of a modern commercial centre providing for the needs of surrounding communities which will avoid people having to travel further for employment opportunities which could otherwise occur. The subject site is located within close proximity to State Highway 1 (and the South Island Main Trunk Railway) which provides a high level of accessibility to the Rolleston town centre and further afield. It is estimated that from the buildings committed to proceed (beyond those already constructed and operating) at the existing IZONE site a further 300-450 jobs will be created. In addition to those created through future development of the subject site, the IZONE Southern Business Hub will create a node from which future public transport can be based upon.
- 3.25 Given the above, it is considered that the subject site has high connectivity to the surrounding environment and provides opportunities for sustainable transport choices. Therefore, it is considered that the plan change is consistent with the RLTS.

Proposed Natural Resources Regional Plan (NRRP)

- 3.26 Any activity over the site will need to be assessed against the provisions of the Proposed NRRP before development can proceed. Whilst sewerage effluent will be generated from the site this will be directed to Council's existing reticulated network in the locality of the subject site. In the case of stormwater, a resource consent will be required from ECAN and this will be sought once detailed design is completed. In any event the consent will be considered against the Proposed NRRP at the time it is sought which will be before development of the site can proceed.
- 3.27 Therefore, it is considered that the plan change is consistent with the NRRP as subsequent stormwater consent will be assessed against those provisions before any development on the site can proceed.

Section 31 RMA

3.28 The relevant clauses from Section 31 of the Act are as follows:

- "(1) Every territorial authority shall have the following functions for the purpose of giving effect to this Act in its district:
 - (a) The establishment, implementation, and review of objectives, policies, and methods to achieve integrated management of the effects of the use, development, or protection of land and associated natural and physical resources of the district:
 - (b) the control of any actual or potential effects of the use, development, or protection of land, including for the purpose of—
 - (i) the avoidance or mitigation of natural hazards;..."
- 3.29 The Selwyn District Plan has been prepared to give effect to these functions, and the proposed plan change makes changes that are consistent with these functions of the Council. Adoption of the existing Business Zone rules will ensure this is the case and the changes to the existing provisions are in the form of controls over the site directed at achieving the integrated management of the effects of activities.

Section 32 RMA

- 3.30 Section 32 of the RMA sets out the manner in which any proposed objective, policy, rule or other method is to be evaluated. The parts of Section 32 relevant to the present request are as follows:
 - "(1) In achieving the purpose of this Act, before a proposed plan, proposed policy statement, change, or variation is publicly notified, a national policy statement or New Zealand coastal policy statement is notified under section 48, or a regulation is made, an evaluation must be carried out by
 - (c) the local authority, for a policy statement or a plan (except for plan changes that have been requested and the request accepted under clause 25(2)(b) of Part 2 of Schedule 1);
 - (3) An evaluation must examine—
 - (a) the extent to which each objective is the most appropriate way to achieve the purpose of this Act; and
 - (b) whether, having regard to their efficiency and effectiveness, the policies, rules, or other methods are the most appropriate for achieving the objectives.
 - (4) For the purposes of the examinations referred to in subsections (3) and (3A), an evaluation must take into account—
 - (a) the benefits and costs of policies, rules, or other methods; and
 - (b) the risk of acting or not acting if there is uncertain or insufficient information about the subject matter of the policies, rules, or other methods."
- 3.31 The assessment required under Section 32(3)(a) is whether the provisions promoted by the proposed change are the most appropriate way to achieve the purpose of the RMA. This matter is addressed in Section 5 of this assessment.
- 3.32 Other relevant matters relating to efficiency and effectiveness (Section 32(3)(b)), benefits and costs (Section 32(4)(a)), and any potential risks arising from uncertain or insufficient information (Section 32(4)(b)) are also addressed at Section 5 of this report.

Part II RMA

3.33 Part II of the RMA includes the purpose of the Act, which is to promote the sustainable management of natural and physical resources. Sustainable management is defined in section 5(2) as:

...managing the use, development, and protection of natural and physical resources in a way, or at a rate, which enables people and communities to provide for their social, economic, and cultural wellbeing and for their health and safety while —

- (a) Sustaining the potential of natural and physical resources (excluding minerals) to meet the reasonably foreseeable needs of future generations; and
- (b) Safeguarding the life-supporting capacity of air, water, soil, and ecosystems;
- (c) Avoiding, remedying, or mitigating any adverse effects of activities on the environment.
- 3.34 Sections 6 through 8 of the Act provide further guidance as to what sustainable management is concerned with.
- 3.35 Section 6 of the Act contains six matters that the Council must recognise and provide for as Matters of National Importance. None of these matters are affected by the present proposal.
- 3.36 Section 7 outlines a number of "other matters" to which a territorial authority shall have regard. Of these, the following are considered to be of relevance to this request:
 - The efficient use and development of natural and physical resources (7(b));
 - The maintenance and enhancement of amenity values(7(c));
 - The maintenance and enhancement of the quality of the environment (7(f)).
- 3.37 The following definitions (contained within section 2 of the Act) are instructive for the purpose of obtaining a comprehensive understanding of sections 5 and 7:
 - "Natural and physical resources" includes land, water, soil, minerals and energy, all forms of plants and animals (whether native to New Zealand or introduced), and all structures.

"Environment" includes -

- (a) Ecosystems and their constituent parts, including people and communities; and
- (b) All natural and physical resources; and
- (c) Amenity values; and
- (d) The social, economic, aesthetic, and cultural conditions which affect the matters stated in paragraphs (a) to (c) of this definition or which are affected by those matters.
- "Amenity Values" means those natural or physical qualities or characteristics of an area that contribute to people's appreciation of its pleasantness, aesthetic coherence, and cultural and recreational attributes.
- 3.38 The above matters will be addressed in the following sections of this assessment. In summary from the conclusions reached in the following sections its is considered that the proposal is consistent with Part II of the RMA

4. Assessment of Environmental Effects (AEE)

- 4.1 This AEE has been prepared to satisfy Clause 22(2) of the First Schedule to the Act, which requires:
 - "2) Where environmental effects are anticipated, the request shall describe those effects, taking into account the provisions of Schedule 4, in such detail as corresponds with the scale and significance of the actual or potential environmental effects anticipated from the implementation of the change, policy statement, or plan."
- 4.2 The AEE is largely a summary of the specialist reports/technical documents supporting this request. These include:
 - Outline Development Plan Report by Harrison Grierson
 - Transportation Assessment by Traffic Design Group
 - Stormwater Management Assessment by Kerr and Partners
 - Infrastructure Assessment by Connell Wagner
- 4.3 This Proposed Plan Change does not relate to rules regulating the use of hazardous substances and installations. A risk assessment, as required by clause 1(e) of the Fourth Schedule, is not therefore required. Likewise, clause 1(f) of the Fourth Schedule is not relevant.

The Site

- 4.4 The site is located on Hoskyns Road, Rolleston, some 1.5km from the Rolleston town centre.
- 4.5 The site is bounded by Hoskyns Road to the east, Rural zoned land to the north and the existing IZONE Southern Business Hub to the west. Land to the south of the subject site is zoned Business 2.
- 4.6 The site incorporates the following allotments:
 - Lot 2 DP 24317 and Pt Lot 1 DP 24045, (35 Hoskyns Rd, Rolleston, 18.5ha)
 - L0t 1 DP 24317 (49 Hoskyns Rd, Rolleston, 2ha)
 - RS 40914 (61 Hoskyns Rd, Rolleston, 2ha)
 - Lot 1 DP 23723 (71 Hoskyns Rd, Rolleston, 2ha)
 - Lot 3 DP 33313 (85 Hoskyns Rd, Rolleston, 10.3ha)
 - Lot 2 DP 333131 (25 Hoskyns Rd, Rolleston, 10.45ha)
 - Lot 2 DP 82076 (2/131 Hoskyns Rd, Rolleston, 6ha)
 - Lot 1 DP 82076 (1/131 Hoskyns Rd, Rolleston, 5ha)
- 4.7 Selwyn District Council owns or has a contract to purchase all of the above parcels of land apart from RS 40914.
- 4.8 The site is relatively flat with a fall to the east and as with the majority of the surrounding area, has a stony soil structure. There are a variety of rural buildings and dwellings over the land as well as typical rural shelter plantings.

Planning Background

4.9 In September 2001 the Rural Volume of the Proposed Selwyn District Plan was publicly notified.

Around the same time the District Council acquired approximately 130 hectares of rural land located north of State Highway 1 adjoining existing industrial zoned land along Jones Road,

- Rolleston. Council rezoned some 72 hectares of this land for business purposes to facilitate further business development and employment opportunities in the Rolleston area.
- 4.10 Spurred by the ongoing success of the existing IZONE Southern Business Hub the Selwyn District Council has continued to acquire land to the east of the business hub comprising the existing site to provide for the future growth of the Business Hub.
- 4.11 The plan change will provide an extension to the IZONE Southern Business Hub at Rolleston as depicted in the Outline Development Plan at Appendix B of this document.
- 4.12 As part of the proposed plan change, Selwyn District Council has undertaken consultation with neighbouring property owners and others. Refer to section 6 of this report for further discussion of consultation undertaken to date.

Existing Business Activities

- 4.13 The site that is subject to this proposed plan change is currently zoned rural. Historically the site has been predominantly used for rural purposes including horse agistment and pastoral farming activities.
- 4.14 The existing IZONE Southern Business Hub is located to the west of the subject site. Various industries have established or are in the process of being established in the adjoining IZONE area including large scale warehouses and manufacturing entities. The largest building in the existing Business 2 area is the Warehouse South Island distribution centre covering approximately 4 hectares.
- 4.15 The number of business activities over the IZONE site will continue to increase as Certificates of Titles become available for purchasers and building consents are obtained. Existing development is predominantly in the southern and western portions of the IZONE site; however, this will extend to the north and east in the near future.
- 4.16 The existing roading network at IZONE extends to the western boundary of the subject site. In time this will extend to Hoskyns Road so as to provide another entry/exit point to the wider area.

Extent of Development Proposed

- 4.17 The exact nature of development to follow once the land has been rezoned is not known at this stage. However, the development will comprise a range of business and industrial entities typical of such areas which is consistent with the activities being developed within the adjacent IZONE area.
- 4.18 The proposed lots sizes will be created with consideration to the IZONE Southern Business Hub as a whole. The Business Hub contains a range of allotment sizes to provide flexibility for prospective tenants. The most recent stage of development, Stage 4 includes mostly smaller lots being within the range of 2000m² to 8000m². However, based on current expressions of interest it is expected that future lots will in all likelihood be larger than these. All future development will be subject to the proposed rules identified in Section 2 of this report and the remaining Business Zone provisions in the District Plan that apply across the various business zones. These are described in further detail in the following section.
- 4.19 The proposed development will involve the construction of roading as illustrated in the Outline Development Plan, attached at Appendix B. The proposed roading will connect to the existing roading at the IZONE Business Hub. One new road is proposed onto Hoskyns Road and the nature of this road is described in the attached Outline Development Plan report.
- 4.20 Newly developed civil infrastructure that serves the IZONE Southern Business Hub will be extended to service the area to be rezoned.

Effects on the Amenity Values of the Surrounding Locality

- 4.21 The locality can be described as a rural area dominated by business activity to the west and south. Rural land is located to the east of the site, across Hoskyns Road, and to the north of the site. A sawmill is located adjacent to the southern boundary of the site.
- 4.22 Residential buildings are dispersed near the Hoskyns Road boundary of the site, coupled with buildings for farming activities throughout. A macracarpa shelter belt extends along the majority of the Hoskyns Road boundary of the site. Other vegetation of a shelter belt nature is distributed throughout and along common boundaries. The land is characterised by low quality pasture being a result of the poor soil conditions of the area. It would appear that there are limited rural activities occurring over the land in question which in part is a factor of the fragmented land holding which affects utilisation.
- 4.23 The need to not adversely impact the existing amenity values and character of the locality has been recognised as an issue and has been addressed particularly in relation to adjoining potentially amenity-sensitive rural properties. The proposed provisions to be applied to the rezoned land incorporate rules directed to matters of amenity and which includes rules regarding larger building setbacks, more extensive landscaping, and more stringent noise generation and light spill controls than what are typically required in industrial business areas. In addition to these controls the inclusion of the Outline Development Plan into the District Plan provides a further layer of control to ensure an acceptable outcome in terms of the amenity and character of the area.
- 4.24 The following table identifies the proposed rules relating to amenity values against those that apply to similar business zones in the Christchurch City Council City Plan:

Activity	Proposed rules to apply to subject site	Christchurch City Council City Plan
Light spill	All lighting to be designed so that: (i) All outdoor lighting shall be shielded so that the light source is not visible from any property within the Rural Zone.	20lux spill (horizontal and vertical)
	All fixed outdoor lighting is directed away from adjacent roads outside of the Business 2 Zone at Railway Road (Appendix 22) and the Business 2A Zone and from adjacent properties within the Rural Zone.	
Setback	Road Boundaries - 10 metres Internal Boundaries - 15 metres (only along the common boundary with land within a Rural Zone)	10 metres
Noise	Measured at the boundary of an adjoining rural boundary:: 7.30 am - 8.00 pm 60dBA L10 8.00 pm - 7.30 am 40dBA L10 7.30 am - 8.00 pm 80dBA Lmax, 8.00 pm - 7.30 am 65dBA Lmax	7.00am - 10.00pm 60dBA L10, 10.00pm - 7.00am 48 dBA L10 7.00am - 10.00pm 85dBA Lmax 10.00pm - 7.00am 75dBA Lmax

4.25 As can be seen, the proposed rules to apply to the subject site that relate to amenity are more onerous than those that apply to other similar zones in Christchurch City. Furthermore, detailed

- landscaping will be required to be undertaken in accordance with proposed rules included at Section 2 of this report.
- 4.26 It is recognised that the rezoning of the site will lead to a greater level of development over the land in question than is likely to occur under the current rural zoning. Having said that it is also evident that the quality of the IZONE development is much higher than the older industrial area along Jones Road and it is this higher quality development that will occur over the subject site as well. This will come about through the landscaping and setback provisions that will apply to the area and the fact that it will be new buildings that are erected.
- 4.27 Given the business zoning of the land to the west and south potential visual and amenity effects need to be considered in terms of the land to the north and east. In respect of the land in these directions it is relevant to note the land owner to the north and the owner of the vast majority of the land to the east have both sought that these areas also be included within Greenfield development areas for business growth in the RPS throughs submissions on PC1 to the same. Therefore, it can be seen that the owners of the major land holdings in the area are supportive of business growth at this locality. In addition to the larger land holdings there are two smaller rural residential sites across Hoskyns Road towards the southern end of the area along Hoskyns Road to be rezoned. These have recently been purchased by Solid Energy who have an operation in the current B2 Zone at Rolleston and who are also supportive of business growth at this location.

Visual Amenity

Existing on-site landscaping

4.28 As described above the existing onsite landscaping is limited to shelter belts along allotment boundaries along with some plantings around dwellings over the site. It is expected that the majority of the existing shelterbelts will be removed and replaced with new plantings of a higher quality as has occurred through the adjacent IZONE area.

Prominence and visibility

- 4.29 The site currently has a low prominence to the surrounding area. This is due to the site not being highly visible beyond the site and being of a rural nature similar to the surrounding environment. The visibility of the site from Jones Road to the south is obscured by existing buildings along Jones Road and shelter belts.
- 4.30 The proposed rezoning and eventual development will see the site opened up more to Hoskyns Road and the area beyond. The visibility will be softened with an improved landscape design and building setbacks. Visual and physical linkages from the existing IZONE Southern Business Hub to the site will be created.
- 4.31 It is recognised that the rezoning of the site will lead to a greater level of development over the land in question than is likely to occur under the current zoning. However, it is considered that the site will be able to absorb such development given it's flat nature, proximity to other business activities, separation from residential and rural residential areas, and the landscaping and setback provisions being proposed in respect of Hoskyns Road and the adjacent rural area to the north.

Proposed Landscape description

4.32 The proposed landscaping is an important component of the suite of controls developed to reduce the overall dominance of the proposed development and to create a high-level amenity site for workers and visitors to the area and surrounding properties.

- 4.33 Landscaping of the site will be in accordance with the proposed provisions as described in section 2 of this report. These provisions are consistent with those developed for the existing IZONE area which are extensive and require more than what would typically be required for such a business area. One change to the existing provisions is the addition of English Oaks to the scheduled species list. These are seen as being an appropriate species over the area in question and the change proposed to the species schedule will not lead to any adverse effects.
- 4.34 In the development of the landscape components of the concept for the site significant attention has been paid to creating an attractive business park which provides landscaping that is complementary to the surrounding environment. The landscaping required includes the provision of a 2m planting strip along each road boundary of sites as well as additional planting within the road reserve. An additional landscape control applies to the rural zone boundary on the north of the area. In addition to the landscape strip along road boundaries a 10m building setback applies so as to avoid large buildings being sited near roads to provide a sense of open space and a greater level of amenity for road users and others nearby.
- 4.35 The proposed landscape rules are provided to mitigate any potential adverse effects of the development on the character and amenity of the surrounding environment. The proposed provisions will also assist to mitigate potential adverse effects on the residential dwellings located on the eastern side of Hoskyns Road. The landscape provisions also seek to enhance the landscaping amenity of the site to create an attractive work place for employees and visitors to the area.

Traffic Assessment

- 4.36 In general terms, the sustainable management of District growth includes maintaining a safe and efficient land transport system both now and in the future. Consideration of the potential traffic effects of future activities enabled through the rezoning is therefore necessary in order to ensure that the proposal is able to achieve the integrated management of natural and physical resources.
- 4.37 In the context of this rezoning, the issue of whether the specific provisions for the development of the rural land for commercial and industrial purposes would create adverse impacts on the functioning of the road network has to be addressed. This is addressed in detail in the attached traffic assessment undertaken by Traffic Design Group (refer to Appendix D). The conclusions reached in the TDG report are such that there is no reason why the proposal can not proceed on transportation grounds.

Noise Assessment

- 4.38 In rezoning and developing the site it is important to ensure that the adjacent rural properties continue to maintain their health, wellbeing and a level of amenity consistent with the locality. One aspect of this is whether noise generated by future activities would impact on the amenity of the area.
- 4.39 An Acoustic Assessment was undertaken as part of Variation 2 to the Selwyn District Plan, assessing the noise effects of what is now the existing IZONE Business Hub. This resulted in the suite of noise rules that now apply to the IZONE Business Hub. Those noise rules that apply to the existing Business Hub will also apply over the subject site. This includes the requirement that noise levels are to be measured at any boundary adjoining a different zone which results in no internal noise limits. This approach is consistent to rules applied to similar industrial zones such as those in the Christchurch City Plan.

Building Height

- 4.40 The height limit for the Business 2 Zone is 15m for buildings and 25m for structures which are features that do not fall within the definition of a building. As such, they are very limited and the vast majority of construction is subject to the 15m height limit.
- 4.41 The current rural zoning has a range of height limits based on the nature of the activity. These are 8m for residential buildings, 12m for all other buildings expect for grain silos which have a 25m height limit. As such, there is not a large difference between the hight limit in the Business 2 Zone (15m) compared with the Rural Zone (12m) for non-residential buildings.
- 4.42 In terms of the reasoning given for the present height limits in the District Plan the following is relevant (Page C16-010):

"Rule 22 sets maximum height and bulk requirements for buildings and structures, to ensure they are in keeping with the visual character of townships. The permitted maximum height of buildings and structures is greater than that allowed for in the Living zones. This acknowledges that issues associated with the protection of sunlight and privacy to adjoining properties is less of an issue in industrial areas in comparison with residential areas. This rule differentiates between the height of buildings and other structures because of the differences in effects they will create on these urban areas."

- 4.43 The reasoning of Rule 22 relates to the effects of building height to visual character, protection of sunlight and privacy to Living Zones and residential areas. As identified in the reasoning, these effects are less of an issue in industrial business areas. Land to the west and south of the subject site is zoned the same as that proposed, which provides for industrial activities. Factors that favour the proposed height limit over the subject site are the separation of the site from Living zones, rural residential areas, and State Highway 1 and the fact that the existing Business 2 Zone exists between the subject site and all of the abovementioned features. Whilst the site does have rural zoned land to the east and north the owners of these properties either have an interest in the existing Business Zone (Solid Energy) or have signalled a desire for business zoning over their land through submissions to Proposed Change 1 to the RPS (Cockburn and Whitham).
- 4.44 The combination of road setbacks (10m) and the 15m setback from the rural zone to the north combined with the landscaping provisions means that the height limit proposed for the site (which is only 3m above that for the rural zone for non-residential buildings) will not alter the character of the area in a negative way.

Summary of Amenity Issues

4.45 It is acknowledged that the rezoning will see larger buildings and more activity over the subject area than what the current rural zoning allows for. In recognition of this particular setback, landscape, noise and light spill controls have been developed in respect of the surrounding rural zoned properties. In addition to these the SDC through covenants in its favour retains control over the design and appearance of buildings among other matters. With the suite of controls in place that will govern development over the site it is expected that a high quality business park will eventuate that will have higher amenity values consistent with those being generated within the existing IZONE area.

Effects on Infrastructural Services

Sewerage and Water Reticulation

4.46 The attached infrastructure report at Appendix E concludes that there is sufficient capacity within the existing reticulation and plant capacity in forms of both water and sewerage to serve the proposed rezoning.

Stormwater

- 4.47 The proposed plan change and redevelopment will result in an increase in non permeable surfaces on the site.
- 4.48 An assessment of stormwater management and feasibility of providing for an effective and sustainable stormwater system has been undertaken by Kerr and Partners and is attached at Appendix C.
- 4.49 It is identified in the stormwater report that a stormwater discharge consent from impervious surfaces (CRC06044) has been granted by Environment Canterbury covering the existing IZONE Business Hub. The consent covers the discharge of stormwater from each individual lot and all roads within the existing development.
- 4.50 The report identifies specific methods that can be used to address potential stormwater issues arising from the development of the land in question and concludes that stormwater management should not be a barrier to the proposed development of the site.

Summary of Effects

- 4.51 The technical reports referred to above all conclude that effects associated with the proposed rezoning can be appropriately managed either by the provisions of the Plan Change or through future ECAN resource consent process in terms of stormwater. In terms of the maintenance of the amenity values of the locality the adoption of the proposed rules for the rezoned area will ensure that any potential effects will be mitigated to an acceptable level.
- 4.52 Given the above the Plan Change provides the framework for the Council to achieve its statutory function under section 31 of the RMA to control potential effects resulting from the use and development of the site and to achieve the integrated management of such effects.

5. Section 32 Assessment

- 5.1 Section 32 of the Act establishes a procedure to test the appropriateness of any proposed provisions, including objectives, policies, rules and other methods when considering the merits of any plan change. This procedure has been developed to ensure that environmental issues are addressed and that the outcome will achieve the purpose of the Act.
- 5.2 This assessment has been prepared to fulfil the requirements of section 32(1)(c) of the Act. The Act requires local authorities to undertake an evaluation of the plan change prior to public notification. A report summarising such an evaluation must be undertaken and publicly notified along with the plan change (Sections 32 (5) and (6)).
- 5.3 Section 32(3) states that an evaluation must examine -
 - The extent to which each objective is the most appropriate to achieve the purpose of this Act; and
 - Whether, having regard to their efficiency and effectiveness, the policies, rules, or other methods are the most appropriate for achieving the objectives.
- 5.4 'Effectiveness' means how successful a particular option is in achieving the desired environmental outcome as stated in the objectives.
- 5.5 'Efficiency' means measuring by comparison of the benefits to costs. The most efficient method will achieve the environmental outcome at the least overall cost.
- 5.6 In addition section 32 (4) states that an evaluation must take into account:
 - the benefits and costs of policies, rules, or other methods; and
 - the risk of acting or not acting if there is uncertain or insufficient information about the subject matter of the policies, rules, or other methods.

Level of analysis

- 5.7 As there are no proposed alterations to the objectives of the Selwyn District Plan, this assessment is limited to a focus on whether, having regard to the efficiency and effectiveness, the proposed amendments (including the use of the Outline Development Plan) are the most appropriate methods for achieving the existing objectives. In this respect the key issue is whether the existing outcomes sought in the District Plan as they relate to rural and business areas will continue to be met through the adoption of the Business 2 Zone over the land in question.
- 5.8 In terms of the Natural Resource objectives (Part 2, Section 1) of particular relevance is Objective (i)(2) which relates to avoiding the creation of new business activities that restricts the use of land for other activities in the future. Policy (ii) 8 relates directly to this objective:

"Avoid rezoning land which contains versatile soils for new residential or business development if:

- the land is appropriate for other activities; and
- there are other areas adjoining the township which are appropriate for new residential or business development which do not contain versatile soils".
- 5.9 The subject site is considered to be appropriate for business development. The rezoning of the subject rural land to a Business 2 zoning and specific provisions are not contrary to the identified policy as the site exhibits a low quality stony soil structure which is a characteristic of the soils of the surrounding locality.

- 5.10 The objective concerning water quality is identified in Part 2, Section 1 of the Plan. The objective relates to activities on land not adversely affecting ground or surface water resources or waahi tapu or waahi taonga, amongst others. The policies which relate directly to the proposed plan change and future development of the site includes policy 2:
 - "2. Ensure land rezoned to Living or Business zone can be serviced with a water supply and effluent and stormwater disposal without adversely affecting groundwater or surface waterbodies."
- 5.11 The proposed is consistent with the above policy. The existing IZONE Business Hub is serviced by a potable water supply and effluent disposal infrastructure. These services are to be extended to provide for the subject site. Infrastructure services for the site are further discussed in the Infrastructure Services report attached at Appendix E. Stormwater treatment and disposal is to be provided onsite and the available options are identified in the Stormwater Management Assessment attached at Appendix C. Consultation has been undertaken with tangata whenua regarding the proposal and is further discussed in Section 6 of this report.
- 5.12 In terms of the Physical Resources objectives (Part 2, Section 2) of importance is Objectives 1-3 and 5. These objectives relate to the safe and efficient operation of the Districts transport network not being impeded by growth or development, and avoiding the potential of reverse sensitivity issues occurring and minimising adverse effects of transport networks on physical resources, amenity values and on adjoining land. Polices (ii)1-4(b) relate directly to these objectives:
 - "1. Apply a road hierarchy in Selwyn District.
 - 2. Manage effects of activities on the safe and efficient operation of the District's road network, considering the classification and function of each road in the hierarchy.
 - 3. Manage roads classified as Strategic Roads in Appendix 7, primarily to ensure the safe and efficient flow of 'through' traffic en route to its destination.
 - 4(a) Ensure all sites, allotments or properties have legal access to a legal road which is formed to the standard necessary to meet the needs of the activity considering:the number and type of vehicle movements generated by the activity;- the road classification and function; and – any pedestrian, cycle or stock access required by the activity.
 - 4(b) Avoid adverse effects on the safe flow of traffic along Strategic Roads and arterial roads from new property access, where the speed limit is more than 70 km/hr".
- 5.13 A traffic impact assessment has been undertaken and is attached at Appendix D. Particular road design and access provisions for individual sites will occur at the subdivision consent stage and there are adequate controls in the District Plan to ensure these are established to the appropriate standards.
- In terms of Growth of Townships, Residential and Business Development (Part 2 Section 4.3), Objective 1 relates to ensuring that expansion of townships do not adversely affect natural or physical resources or the surrounding environment. The proposal has the potential to adversely affect the existing rural character of the site and surrounding locality through allowing business land use activities on the site. As discussed above the existing provisions that apply across the Business zones and the further specific provisions proposed are designed to mitigate potential adverse effects on the environment. In addition it must be noted that the effects will be limited in that the land will be zoned in a very similar way to the land to south and west. As such, it is the potential effects on rural zoned land to the north and east that has been the focus of the controls developed to address the matter of amenity.
- 5.15 Specific policies relating to the growth of Rolleston Township are provided at Part 2.4 Section 4.3 [I] (iv)xvi of the Plan. Those policies that apply to the proposal include:

- "1. Avoid rezoning land for new residential or business development (other than Business 2 zoning), west of SH1 and the South Island Main Trunk Line (SIMTL)
- 3. Encourage land rezoned for new business development to adjoin an existing Business zone of similar character, where sites are available and appropriate for the proposed activity.
- 4. Encourage additional Business 2 zones to locate west of SH1, preferably adjoining the existing Business 2 zone."
- 5.16 It is considered that the proposal is consistent with the identified policies. The site is located to the west of State Highway 1 and South Island Main Trunk Line and adjoins the existing Business 2 Zone.
- 5.17 General policies that are identified in the Plan as being relevant to Rolleston and are considered to be relevant to the proposal relate to landscaping, amenity and reverse sensitivity issues. In consideration of these policies, this plan change proposes that the majority of the existing Business 2 zone provisions be applied to the site along with the amended provisions relating to landscaping and amenity issues. Land adjoining the site includes Business 2 zone in a consolidation of a business area.
- 5.18 The identified objectives and supporting policies are implemented by a range of methods. These methods include the setting of performance standards in the business zones that establish maximum levels of effects acceptable in specific areas while giving recognition to the character of existing activities.
- 5.19 Under the proposed Plan Change, the development controls will be supplemented by the inclusion of an Outline Development Plan. This includes links to rules requiring comprehensive landscaping that reinforces the maintenance of amenity for rural and rural residential sites to the east of Hoskyns Road.
- 5.20 Whilst each plan change must be considered on it's own merits it must be noted that the present proposal will result in the extension of the IZONE Business Hub. The current proposal is considered to assist in fulfilling the reasonably foreseeable future needs of the Rolleston community in terms of business development in the locality of the subject site.
- 5.21 The proposed plan change has been assessed as being consistent with the relevant Business zone objectives, policies and performance standards of the District Plan, subject to site specific amendments to rules. Any actual or potential adverse effects have been assessed as likely to be appropriately managed by the existing District Plan framework, as supplemented by the inclusion of the Outline Development Plan.

Alternatives Considered

- 5.22 In determining which is the most appropriate method of achieving the existing objectives of the Selwyn District Plan, the following alternatives were considered:
 - Option 1:- maintain the rural zoning of the site (the 'do nothing' option);
 - Option 2:- rezoning the area as Business 2 with the adherence to a concept plan that includes restrictions on locations of buildings, and the creation of landscape buffers to adjoining rural zoned land as proposed.
 - Option 3 Creation of a new zone that is applicable only to the subject site.

- 5.23 Option 2 is considered the most appropriate means of achieving the overall objectives of the Selwyn District Plan for the following reasons.
- 5.24 Development of the site in accordance with the Outline Development Plan addresses the particular planning background and circumstances of the site and locality. Option 2 will ensure a comprehensive, as opposed to piecemeal, approach to the development of the site.
- 5.25 Option 2 provides for the mitigation of adverse effects to an acceptable level that will see the purpose of the Ram achieved.
- 5.26 Option 2 provides certainty as to the future use of the site and clear parameters by which such uses can be established. The Outline Development Plan addresses the location of main roads and rules have been developed around specific landscape requirements.
- 5.27 There will be significant benefits to the Rolleston community in providing an expanded Business 2 Zone that enables the development of the subject site to provide for employment and economic growth in the area.

Analysis of Benefits and Costs of the Zone Change

Option 1:- Do Nothing

BENEFITS

5.28 The do nothing approach would leave the status-quo in place. The benefits arising from this would be retention of the existing character and amenity of the area for surrounding properties, albeit the current rural zone provisions allow for a range of different activities to occur over the site, some of which are of a business nature.

COSTS

- As identified in Plan Change 1 to the Regional Policy Statement, the Rolleston Township is experiencing population growth and has been identified as one of tow main centres in Selwyn District to continue ot provide for such growth. Further business zoned land is required to provide for the growth of the area and provide further employment opportunities for the District. The subject site provides an opportunity to help meet the future employment needs of Rolleston residents as well as others in the District.
- 5.30 The cost of the do nothing option, leaving the site as rural land is a missed opportunity for redevelopment of relatively low quality rural land into a quality business hub that would better achieve the purpose of the Act than what currently exists.

Option 2:- Plan Change as proposed

COSTS

5.31 The costs of the present proposal extend to social, economic and environmental.

Socia

5.32 There will be a loss of rural character and residential activity over the subject site which will be replaced with business activity. This can be seen to be a social cost of the proposal.

Economic

5.33 The economic costs arising will fall on the Applicant. These will be in the form of Council processing costs and development contributions. These are costs that the Applicant is willing to incur to generate further employment opportunities at Rolleston. These costs will be temporary in that the sale of the land in the future will cover such costs.

Environmental

5.34 The environmental costs of the proposal have been assessed at Section 4 of this report. There it was concluded that whilst some residential properties will have business activity closer to them than at present, the suite of Business 2 Zone rules along with the new controls proposed will ensure that any effects generated will be no more than of a minor nature. In addition there are no servicing or transport and traffic constraints to the rezoning proceeding. To this end the environmental costs of the plan change are considered to be low.

BENEFITS

- 5.35 This option would assist in meeting predicted future demand for business and industrial property at Rolleston and provide further employment opportunities in Selwyn District.
- 5.36 The benefits arising are predominantly in the form of social and economic for the Rolleston community through the expansion of a high quality commercial Business hub that is located in close proximity to the Rolleston residential area. The Business Hub will be developed in accordance with an outline development plan and District Plan rules ensuring compliance with landscaping and other amenity related provisions to ensure an aesthetically pleasing commercial environment.
- 5.37 The proposed rezoning would result in enhanced employment opportunities for the Rolleston community as well as the wider Selwyn District. This includes both short-term related opportunities at the time of construction, together with long-term employment associated with the development to follow rezoning as discussed in section 3.25 of this report.
- 5.38 The identified benefits of Option 2 offset the environmental costs identified for this option.

Option 3:- Alternative Zone

- 5.39 It may be that an alternative zone and suite of provisions along similar lines as those proposed could also achieve the purpose of the Act. At the same time creating an alternative zone and new types of controls may no better achieve the purpose of the Act than those proposed. The activities provided for through the current approach are consistent with those allowed in the adjacent IZONE area. Given this it is considered unnecessary to develop a specific new zone for the proposed expanded business area.
- 5.40 The current approach of adding further and specific controls to the existing suite of the Business 2 zone provisions is considered to be the most effective and efficient approach to ensuring the outcome is consistent with the sustainable management purpose of the Act, given the current Plan framework and the types of activities to be provided for.

Conclusion

- 5.41 Retaining the current rural zoning over the site is not considered to be as effective and efficient as Option 2, the amended Business 2 zoning. Option 2 provides a more efficient outcome, due mainly to the overall social and community benefits enabled through the application of an expanded Business 2 zone to the area so that the future business development can occur with certainty. At the same time the potential adverse affects of business use over the site will not result in any effects on the rural and rural residential neighbours along Hoskyns Road that are of more than a minor nature. This will be assured through the adoption of the Business 2 Zone rules and further provisions regarding amenity such as landscaping and light spill which have been formulated to address the potential effects of activities on areas outside of the Business zone.
- 5.42 The rezoning proposed will allow a greater level of development to occur than the present zoning does. Whether or not this change is necessary to achieve the purpose of the Act ultimately turns of the adverse effects of the proposal. Such effects have been assessed above

- at Section 4 and the conclusions reached have informed the costs and benefits assessment above.
- 5.43 The approach will be relatively benign in terms of any negative effects in relation to servicing, transport safety and efficiency in comparison to the existing rural zoning. Ultimately, it is considered that the benefits of the proposal are greater than the opportunity cost of not rezoning the land and leaving it for rural purposes.
- 5.44 It is considered that the present proposal will better achieve the purpose of the Act than the current rural zone over the site in question does. This is on the basis that the change seeks to provide for greater development opportunities than currently exist. This is because of the enabling intention of the legislation that stems from the provisions of sections 5, 9 and 32 of the Act. It is understood that the above provisions require that people's aspirations and property rights must only be interfered with or controlled to the extent necessary to achieve the purpose of the Act. Therefore, if a plan change is in line with the purpose of the RMA, i.e. the adverse effects of the new activities are within appropriate levels, then the more permissive controls contained in the plan change will better achieve the purpose of the Act.

6. Consultation

6.1 The Fourth Schedule of the RMA specifies that an AEE should include:

Identification of the persons affected by the proposal, the consultation undertaken, if any, and any response to the views of any person consulted (Clause 1(h)).

6.2 This obligation to report on the consultation undertaken is further clarified by Clause 1AA:

"To avoid doubt, clause 1(h) obliges an applicant to report as to the persons identified as being affected by the proposal, but does not -

- (a) oblige the applicant to consult with any person; or
- (b) create any ground for expecting that the applicant will consult with any person."
- 6.3 Prior to the notification of this request, Selwyn District Council has undertaken preliminary consultation with a view to obtaining feedback from parties before finalising the content of the request.
- 6.4 Consultation has been undertaken by the relevant consultants that have assisted with the preparation of this plan change and accompanying technical reports. This consultation has included contact with:

Transit NZ (Transportation)
Environment Canterbury (Stormwater)
Surrounding Property Owners

- 6.5 Discussions have also taken place with Council Asset staff in terms of engineering and servicing matters and in terms of the planning process to be followed.
- 6.6 Refer to Appendix F for a summary of the consultation undertaken.

Clause 3 of the First Schedule

6.7 In terms of Clause 3 of the First Schedule of the RMA consultation has been undertaken with Ngai Tahu, Environment Canterbury and the Ministry for the Environment. Copies of the letters sent and responses received from these parties are included at Appendix F.

Other Local Authorities

6.8 Whilst the area in question has been included as a new Greenfield Business Area in Proposed Change 1 to the RPS and the proposal does not give rise to any cross boundary issues adjoining local authorities (Ashburton, Christchurch and Waimakariri) have been notified of the proposed plan change. Copies of the letters sent are included at Appendix F.

7. Conclusions

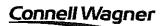
- 7.1 Rezoning of the subject site to provide for an expanded IZONE Southern Business Hub represents the most appropriate way for the Selwyn District Plan to achieve the purpose of the Act in terms of the subject site.
- 7.2 Changing the zone of the site Business 2 will better reflect the existing business park to the west of the site and enable expansion of the Business Hub to meet the future needs of the surrounding community.
- 7.3 The existing Business 2 Zone provisions have been designed to address potential amenity effects on the surrounding environment. These provisions are being retained for the expanded Business 2 Zone area as well as being complemented by amended controls on landscaping and building setbacks. This combination of provisions will govern future development to avoid or mitigate any adverse effects that may be generated from activities that establish on site, and will limit any potential adverse effects on the surrounding rural environment and rural residential properties.
- 7.4 Positive effects that the new development following the rezoning will bring to the community of Rolleston are its convenience, location, employment opportunities, safe access points, landscaping, and economic turnover. The benefits can been seen to date where the employment growth from buildings committed to proceed within the existing IZONE Southern Business Hub is within the range of 450 600 full time equivalent positions, which will contribute to the growth of Rolleston. This growth is confirmed in Proposed Change 1 to the Regional Policy Statement. The current IZONE Southern Business Hub acts as a commercial hub for the Rolleston community and the wider Selwyn District area. The proposed development of the site for business purposes will ensure that the IZONE Southern Business Hub provides the Rolleston Community with future sustainable development opportunities that meet the community's social and economic needs.

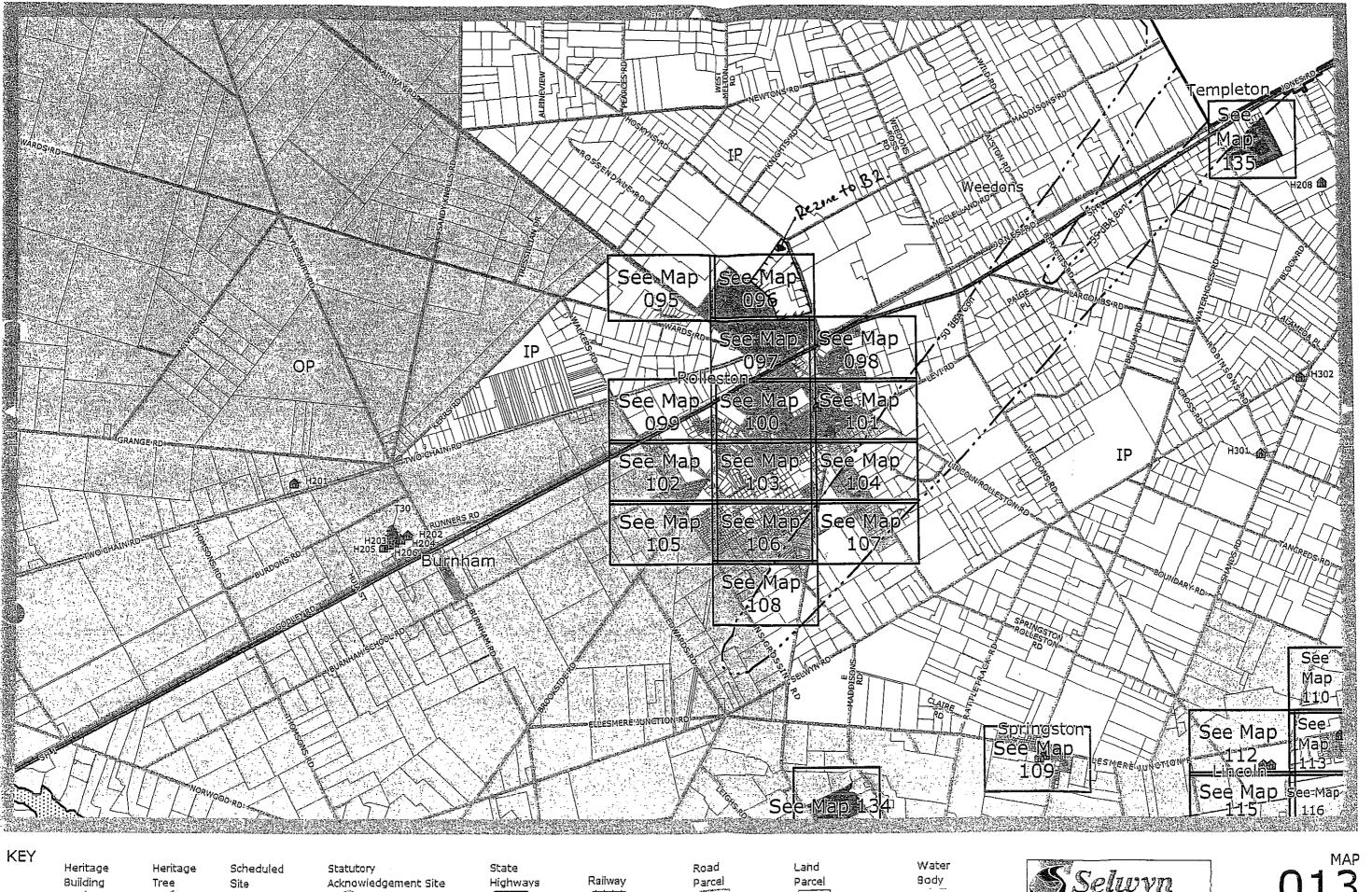
Appendix A

Area to be rezoned and ODP for inclusion in the District Plan

Appendix A

Schedule of Amendments





â Cultural Site

Silent File Area

Waahi Taonga Area

Contours Above Sea level --- 160m - 2.74m

Zones High Country Port Hills Existing Development Area

Living 1 Living 2

Living X

Deferred Living

Businass 1 Business 2 Business 3

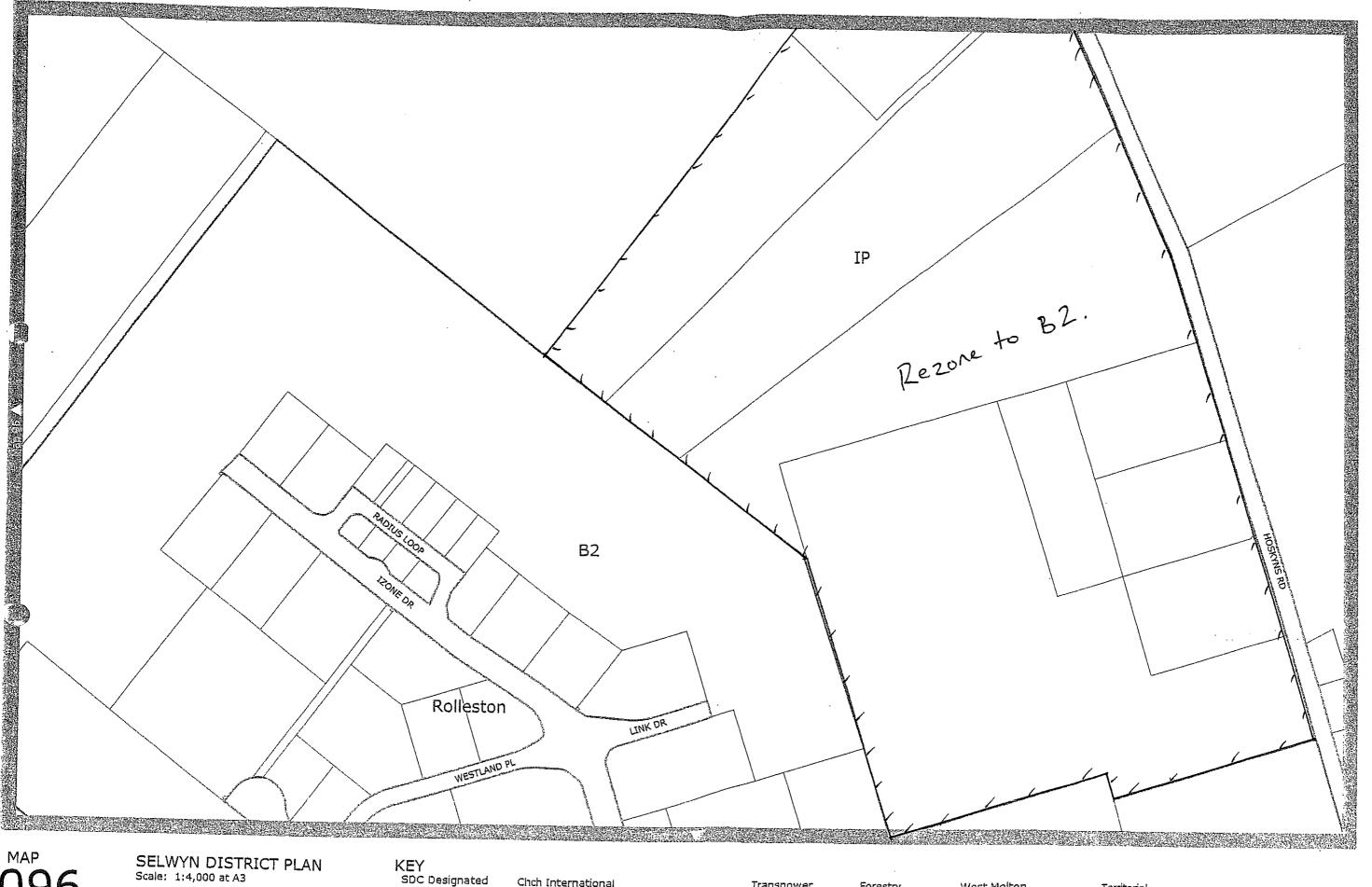
Inner Plains Outer Plains Malvern Hills

Archaeological



CRITCHLOW

SHEET 2



096 SHEET 1



▲ NORTH

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Sites

Other Designations Chch International Airport Noise Contour

Transit Widening Designation Ħ

Fault Lines

Hazard

Coastal

Transpower Main Lines

Zones

Forestry Exclusions 11:11:

Outstanding Landscape

11111

West Melton Observatory Zone

Outstanding Natural Feature

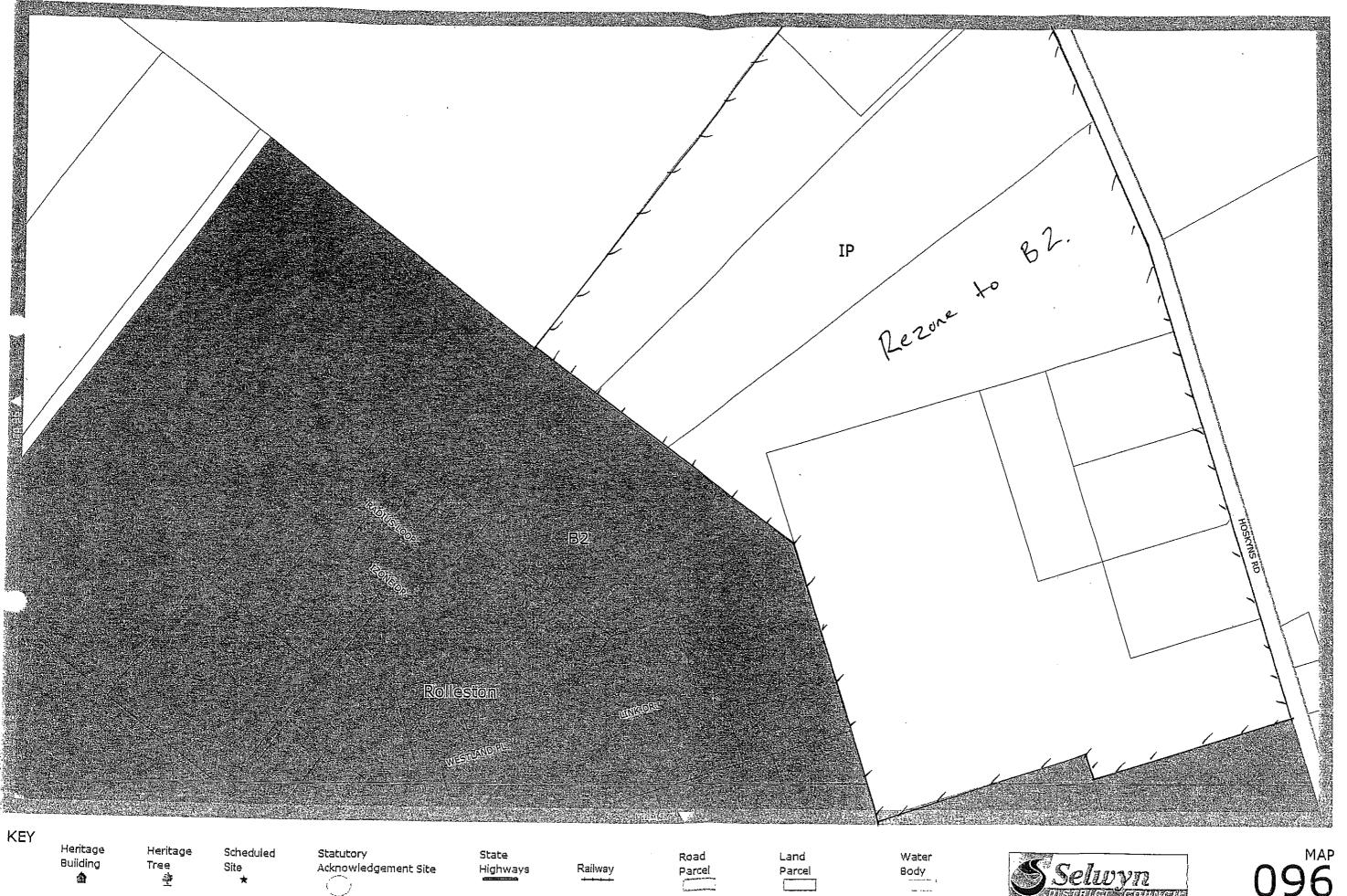
Territorial Authority

---- Surrounding Districts Selwyn District

Flood Zone



Waimakariri Flood Plain Lower Plains Flood Area Lake Ellesmere Flood Area



â

Cultural Site

Silent File Area

Waahi Taonga Агеа

Contours Above Sea level — 160m **—** 2.74m

Zones

High Country Port Hills Existing Development Area

Living 1

Living 2

Living X

Deferred Living

Business 1

8usiness 2

Business 3

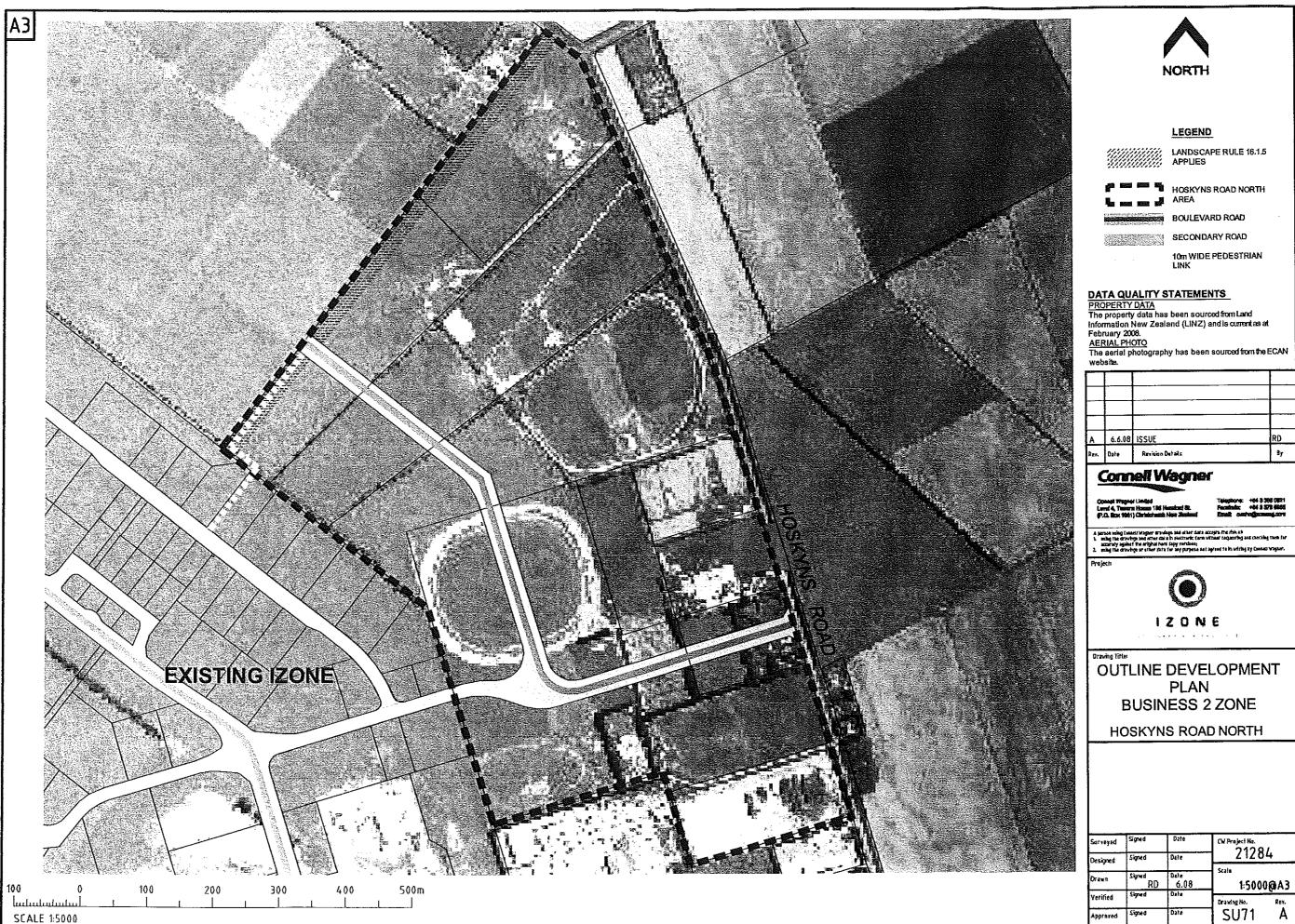
Site



CRITCHLOW

SHEET 2

Archaeological Inner Plains Outer Plains Malvern Hills





LEGEND

LANDSCAPE RULE 16.1.5
APPLIES



HOSKYNS ROAD NORTH





SECONDARY ROAD

10m WIDE PEDESTRIAN LINK

			l
Α	6.6.08	ISSUE	RD
Rev.	Date	Revision Details	By

Connell Wagner



IZONE

OUTLINE DEVELOPMENT PLAN **BUSINESS 2 ZONE**

HOSKYNS ROAD NORTH

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Approved	Signed	Date	SU71	Α	

Appendix B

Outline Development Plan Report

Selwyn District Council IZONE SOUTHERN BUSINESS HUB EXPANSION INTO AREA SR2



IZONE

SOUTHERN BUSINESS HUB

Outline Development Plan

June 2008



Harrison Grierson Consultants Limited

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Izone Southern Business Hub, Rolleston

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Reviewed:

Daniel Julian - Senior Landscape Architect

Approved for Issue:

Ian Craig - Senior Principal

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Auckland

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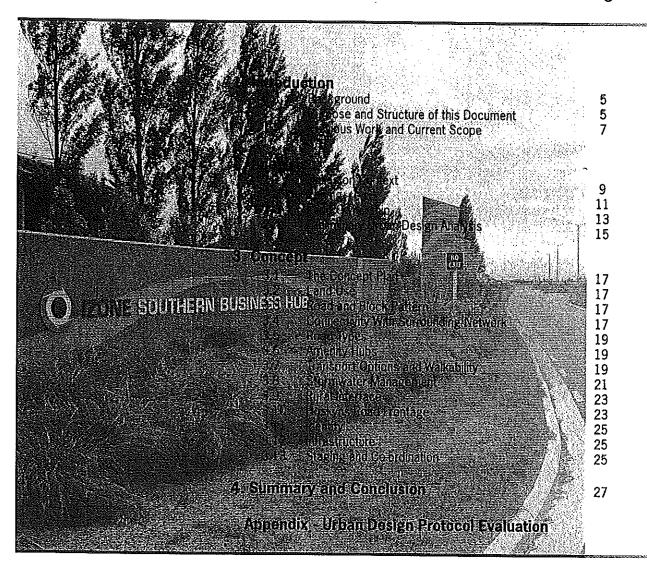
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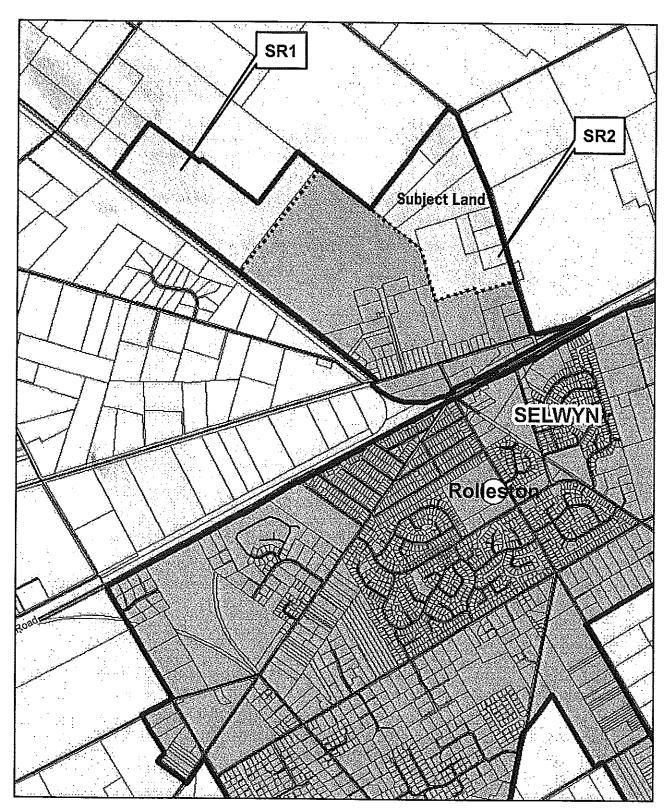


Fig 1 Canterbury Regional Policy Statement - Proposed Plan Change 1 Map

INTRODUCTION

1.1 Background

The township of Rolleston, Canterbury, is growing at a steady rate and offers a small-town lifestyle within easy commuting distance of Christchurch City. As it grows, Rolleston is establishing an attractive residential character, supported by some local commercial activity. However there is limited vacant land within the existing township zoned for business activity.

Izone Southern Business Hub is a business and industrial park on the northern side of Rolleston. Located in an expansive area of flat rural land, and with easy access to the South Island's major highway and railway corridors, Izone is in a very strategic location for business and industrial activity, and has experienced a very good take-up rate since its original design in 2001.

Based on preliminary sales and take-up data to date, absorption of the remaining business land in Izone is estimated by the Izone Board at 10 to 15 hectares per annum.

As such, the owners of Izone, Selwyn District Council, are actively planning for its expansion.

1.2 Purpose and Structure of this Document

Proposed Plan Change No.1 to the Regional Policy Statement for Canterbury maps a series of identified greenfield residential and business growth areas. One of the latter is Area SR2, located immediately to the east of Izone (refer Figure 1).

Policy 8 of Proposed Plan Change No.1 requires that when it is proposed to amend a district plan to provide for urban activities an Outline Development Plan shall be prepared, and then sets down requirements for it.

Policy 7 is of particular relevance to the content of an *Outline Development Plan*. This policy identifies a series of design matters to be provided for when preparing any urban development, in addition to identifying that the principles of the Urban Design Protocol (Ministry for the Environment, 2005) shall be observed.

Methods 7.1 and 7.2 note that:

- 7.1 "Territorial authorities and developers will apply the Urban Design Protocol (Ministry for the Environment, 2005).
- 7.2 Territorial authorities will ensure that Outline Development Plans are completed in accordance with Policies 7 and 8 for inclusion in the district plans."

This report and its associated graphics together comprise an Outline Development Plan under Policies 7 and 8, and traverses all those matters required for inclusion under these policies. They are not reproduced as a whole here, but where necessary the document refers back to and quotes the relevant policy clause. Where necessary, reporting is cross-referenced to the reporting of other specialists in matters such as traffic (Traffic Design Group), infrastructure (Connell Wagner), and stormwater management (Kerr and Partners).

In accordance with Policy 8(k), which requires that an Outline Development Plan shall: "include any other information which is relevant to an understanding of the development and its proposed zoning", Section 2 provides context and urban design analysis that informed the preparation of the plans and concepts.

The concepts and their rationale are then described in Section 3.

This Outline Development Plan has also been prepared to be consistent with the non-statutory Urban Design Protocol. For completeness, Appendix 1 provides a summary assessment of the Outline Development Plan against the principles of the Protocol, under its "seven Cs" of good urban design.



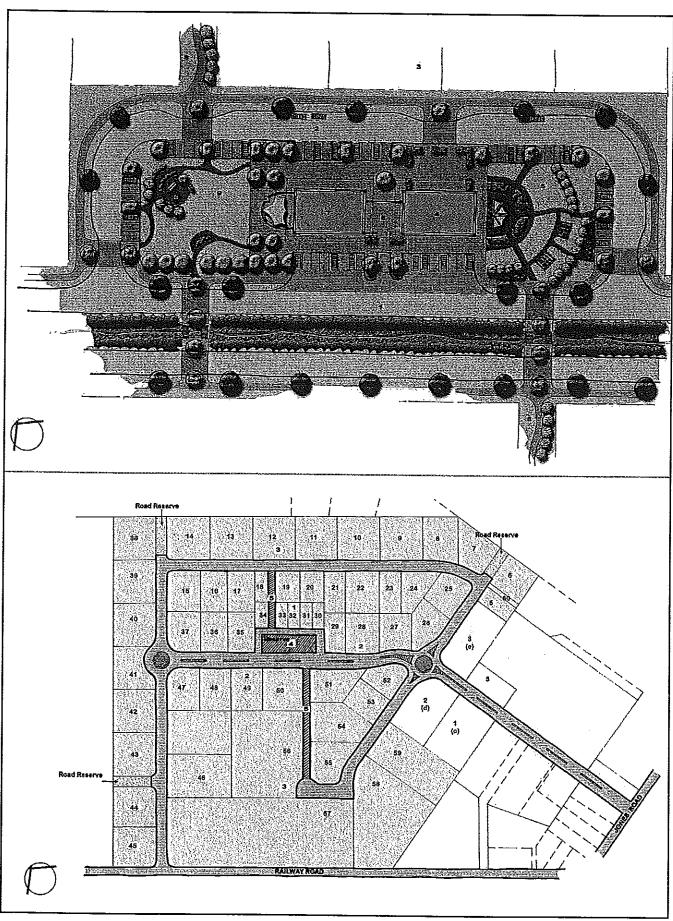


Fig 2 Amenity Hub Concept in Existing Izone

1.3 Previous Work and Current Scope

Harrison Grierson has provided urban design services in relation to the Izone Southern Business Hub periodically, since preparing the original master plan for Izone in 2001. That master plan was the basis upon which a variation to the Proposed District Plan was prepared to re-zone the land to its existing Business 2 zoning.

During the realization of the development Harrison Grierson also provided urban design concepts for the "Amenity Hub" (and linkages to it), which has now been established in the existing Business Park (refer Figure 2).

Most recently, Harrison Grierson was engaged to provide a concept plan and associated advice from an urban design perspective on the possible direction, scale and content of a long term extended business park concept, potentially much greater in area than Area SR2, should this occur in future.

Policy 8 (a) requires that an Outline Development Plan shall:

"Be prepared as a single plan for the whole area or in accordance with a comprehensive plan such as a District Development Strategy, an Area Plan or a Structure Plan which includes the whole of the relevant Greenfield Area..."

The current Outline Development Plan provides a single plan for the whole of Area SR2.

The recently-produced Greater Christchurch Urban Development Strategy and Action Plan (UDS) report states that Izone is the main employment area for Selwyn District, and supports Rolleston becoming its major town. The Strategy provides for key approaches to be taken, such as access to transport and protection from incompatible activities, which strongly favours Rolleston as a growth node. It notes that Area Plans for Rolleston will be produced to outline in more detail the intended pattern of future business growth.

A "District Development Strategy, an Area Plan or a Structure Plan" has not yet been prepared for Rolleston. However, the above Harrison Grierson study did consider a much wider area than Area SR2, from an urban design perspective, and so where necessary the Outline Development Plan draws from that analysis and considers the layout in the context of possible expansion.

The earlier work also concluded that Area SR2 was more logical to develop in advance of Area SR1 (refer Figure 1) because it is considerably closer to Rolleston, and enables a road connection from the existing Business Park through to Hoskyns Road.





Fig 3 Location of Rolleston Facilities

ANALYSIS

2.1 Rolleston Context

Rolleston has a population of 3822 people (2006 census) and has grown by 87.5% since 1996.

Rolleston and its existing facilities are shown on Figure 3.

Most of the town is located south of State Highway 1, where the township's businesses include: a supermarket and shopping centre; a dairy and post shop; a petrol station; a medical centre, and; a vet clinic. Its community facilities include: a police station; a fire station; a community centre and library; a combined church and plunket; a play centre, and; a primary school.

New Selwyn District Council buildings have recently been constructed in a prominent location near the entrance to Rolleston.

Rolleston township includes a retail centre that comprises a collection of local stores and the supermarket. "Rolleston Square" is a new 4000m² local retail development which has been recently completed.

Residential development in Rolleston is conventional single-storey housing on attractively landscaped cul-de-sac development. Each new subdivision tends to have a unique and attractive entry feature (not gated) and often unique forms of street lighting and footpath treatments.

Along the edge of State Highway 1 near the intersection of Tennyson Street is a significant planted bund protecting the residential development behind it from noise from the State Highway, and possibly wind, dust, industrial noise and other development.

Urbanised land to the north consists mostly of industrial development. New development is taking place predominantly in Izone. A new Business 2 subdivision of 7.6 hectares in total is also planned, south of Jones Road. It will be called "Selwyn Business Park" and will comprise 40 serviced lots of between 600m² and 3000m².

The surrounding rural landscape is a mixture of tidy and untidy features on very flat land, with lots often bordered by high dense hedgerows that provide screening and shelter. Orchards, a vineyard, lower-density residential neighbourhoods, and various types of farming occur in the area around Rolleston.



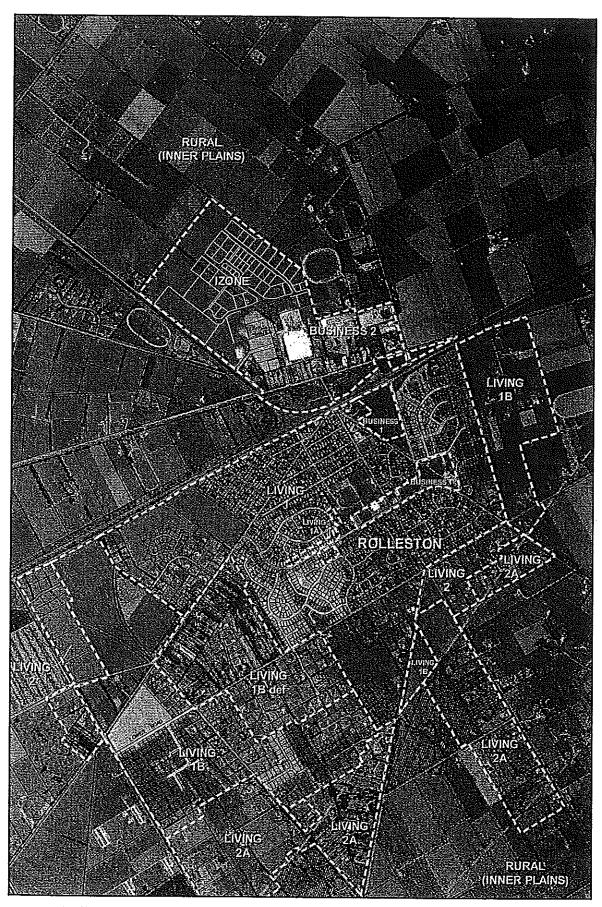


Fig 4 Rolleston Current Zoning

2.2 Zoning

The existing zoning pattern is shown on Figure 4.

The existing Izone development is subject to the Business 2 zoning with a number of specific provisions, and a similar suite of controls is being proposed for Area SR2. The Selwyn District Plan encourages expansion of the Business 2 zone at Rolleston, north of State Highway 1. Existing policies within the District Plan encourage development adjacent to existing development and in such a way as to achieve a compact township shape. Compact zones are encouraged in preference to long strips of development.

The Business 2 zone is permissive in terms of activities – any activity which can comply with all of the "effects based" rules and which is not listed as another activity type (e.g. discretionary) is a permitted activity. The "effects-based rules" render residential activity as discretionary (except caretaker dwellings), and retail development is limited to the smaller of 2000m² GFA per site or 20% of site coverage.

The District Plan includes as Appendix 22 a drawing entitled "Outline Development Plan" for the existing Izone Business 2 area (note that this level of information would not constitute an "Outline Development Plan" as defined by Proposed Plan Change No.1 to the RPS).

Rules that effect built form and site development at the existing Izone Business 2 zoned area may be summarised as follows:

- · Height: 15m for buildings, 25m for structures.
- Recession planes: recession planes apply on internal boundaries, and more restrictive recession planes apply on the boundary with the Rural zone (as shown in Appendix 22)
- Setbacks: 10m from road boundaries, 10m from Rural zone boundaries (additional restrictions in one area until shelter belt matures)
- · Lighting: to be directed away from roads and neighbours to minimize light spill.
- Outdoor storage areas must be screened by 1.8m fence, wall or vegetation
- Quite specific requirements for soft landscaping apply (rule 11.2), which refer to Appendix 22 and also to Appendix 21, which provides specific planting requirements and species schedules for Izone. These controls include:
- The area between the principal building and the Rural zone and Railway Road boundaries shall, in effect, be maintained in accordance with the existing shelter belts, and achieve 6.5m height, 2.5m minimum width, and comprise macrocarpa, or Leyland cypress, or radiata pine.
- All new roads require a 3m landscaping strip made up of species selected from Appendix 21 and provided according
 to the rule (e.g. two "list A" trees per 10m of road frontage).



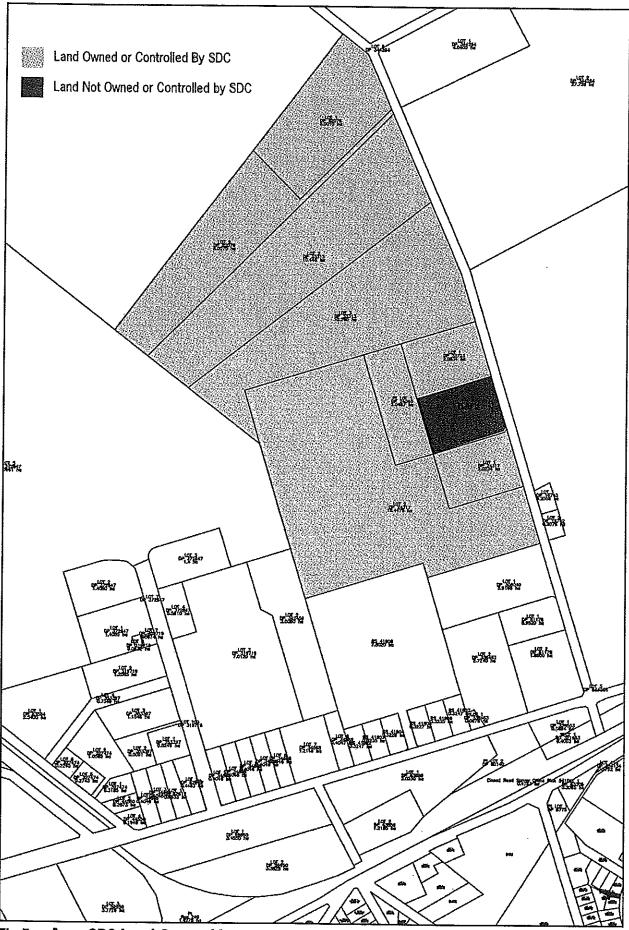


Fig 5 Area SR2 Land Ownership

2.3 Land Ownership

Area SR2 currently comprises a total of 56.31 hectares, as shown on Figure 5. Of this, 54.29 hectares is owned or under contract for purchase by Selwyn District Council.



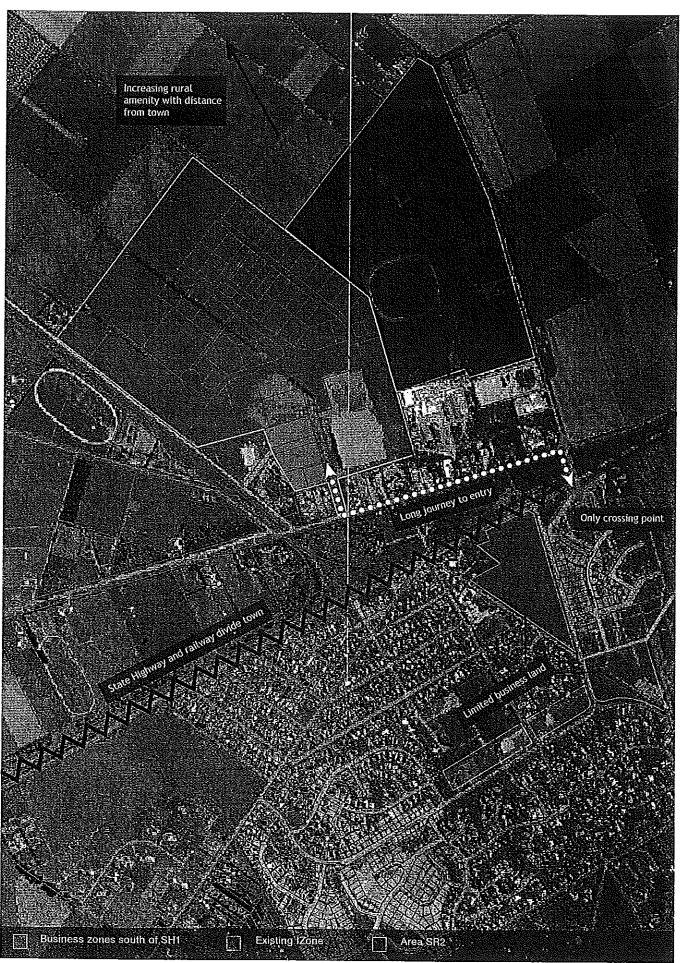


Fig 6 Preliminary Urban Design Analysis

2.4 Preliminary Urban Design Analysis

A preliminary urban design assessment was completed in September 2007 as part of the earlier work looking at the possible directions and extent of an expanded Izone long term. This informal analysis helped to define the issues, opportunities and constraints that have guided the design of the Concept Plan shown later.

The findings of the analysis (with particular reference where required to Area SR2) are summarised below and illustrated graphically on Figure 6.

- Existing business and commercial land south of State Highway 1 is mostly developed i.e. there is limited
 opportunity at present for more business and commercial uses to establish in other parts of Rolleston township.
- State Highway 1 and the railway corridor act as a barrier between the north (business) and south (living) parts of Rolleston, with only one crossing opportunity at the existing intersection of Hoskyns Road, Main South Road (SH1) and Rolleston Drive. Centering long term growth based on distance from this intersection would allow more efficient connection between the two sides of Rolleston.
- Apart from Izone, Business 2 development so far has occurred haphazardly and does not present an attractive appearance to users of SH1 or from Rolleston township. Creating more attractive road frontages along roads such as Hoskyns Road (i.e. visible from the State Highway) could promote the establishment of higher amenity businesses.
- The existing entrance to Izone is well removed from State Highway 1, and requires a journey past unattractive industrial development. The development would benefit from entrances directly off Hoskyns Road (to the west and eventually to the east) which as noted connects directly to the existing intersection with SH1.
- The use of dense hedgerows is common in the surrounding rural landscape at the edges of landholdings. These rows
 create axes along the very flat rural land, giving it a strong character, and they can form effective visual screens.
- While it does include several stretches of established hedgerow, the land in Area SR2 itself has no "significant cultural, and historic or heritage features and values" (Policy 8(e)).
- Future expansion into the land to the northwest of Area SR2 would enable "squaring off" the shape of the completed development. Connection to the land northwest of Area SR2 should be planned for in the long term in the design of Area SR2 (and in the ongoing development of the existing Izone).
- Some controls on scale may be required along the edge of this rural land to reduce the visual impact of large buildings
 on rural character, and allow for more effective screening by vegetation. As noted, the Selwyn District Plan limits
 height of structures to 25m and buildings to 15m. This, in combination with setbacks, is an appropriate height limit to
 enable hedges and rows of trees to be effective at screening most buildings from adjacent sites. Given the large size
 of the site, a greater height limit located away from the boundaries, could potential be mitigated.
- While there are also hedgerows along the eastern boundary of Hoskyns Road, the land beyond is open and flat, suggesting that future expansion in this direction may be appropriate in the future. Area SR2 should be designed to connect to Hoskyns Road in the longer term.

In summary, the early analysis confirmed Area SR2 as an appropriate next area into which to expand. It identified the need longer term to plan for Hoskyns Road to be integrated as a key road within Izone (rather than acting as a barrier between its western and possible future eastern sides).





Fig 7 Area SR2 Concept Plan

CONCEPT

3.1 The Concept Plan

The Concept Plan (Figure 7) shows for Area SR2 relevant features as set down in Policy 8(c) of Proposed Plan Change No.1, and also includes indication of possible future connections to adjoining land.

The sections below provide further discussion of the Concept Plan and evaluation in the light of relevant RPS Proposed Plan Change No.1 policies, together with further graphical elaboration of the design concept.

3.2 Land Use

The predominant land use proposed in Area SR2 is business and industrial use consistent with the Business 2 zone. No land is proposed to be set aside for other uses except that two possible locations of a further amenity hub are shown within Area SR2. It is envisaged that the recreation and amenity needs of the workers will be fulfilled by the existing amenity hub in Izone presently being developed, in combination with one amenity hub located in either of the locations shown indicatively on the Concept Plan. Please refer to the discussion below in respect of the function, sequence and possible nature of amenity hubs.

3.3 Road and Block Pattern

The roads shown on the Concept Plan indicates the minimum extent of key roads proposed for Area SR2.

Flexibility in lot size to meet buyer needs is very important in the design of Business Parks. Therefore, further roads in addition to those shown may be required to service lots according to buyer needs while avoiding rear lots. In particular, as indicated by the dashed line "additional connection if possible," it would be highly desirable to provide at least one further connection to Hoskyns Road from the proposed boulevard, somewhere along its length. This should be by way of a road with a "secondary road" cross section as a first preference.

However, it is possible that if lots proposed are particularly large the roads shown on Figure 7 may be the only roads required. Were that the case, a second option would be a pedestrian connection between the boulevard and Hoskyns Road and open at least in business hours. At worst, as a third option it would be important that there were lots designed in such a way that users at least could gain access to both Hoskyns Road and the boulevard road, to give them further route options.

It is proposed that lots with boundaries to Hoskyns Road will front onto and access Hoskyns Road, as noted on the Concept Plan. Corner lots with boundaries to Hoskyns Road and internal roads, could access either frontage. Through lots between Hoskyns Road and the proposed boulevard, as described above, should access both roads.

In addition, a pedestrian link is proposed into another part of existing Izone as shown. It should be noted that the specific design will take into account CPTED Principles (eg it should not 'kink' as shown if it is entirely abutted with private properties.

3.4 Connectivity With Surrounding Network

The layout for Area SR2 has been developed to provide adequate road connection and integration with the surrounding road network and adjoining land.

A boulevard road is proposed to link to the land to the northwest.

One road is proposed to link back into existing Izone, linking with an existing road stub, as well as a separate footpath connection.

One road is proposed to connect to Hoskyns Road. These will be by T intersection initially. Connection into the land to the east, opposite each, is possible longer term. The intersection with Hoskyns Road is seen as an important future location to establish an identity for Izone, if expansion continues to the east longer term. Once that occurs, the intersection may be suitable for further development as roundabouts with iconic pacific-influenced sculptural features, as a means to bring Hoskyns Road into the identity of Izone.



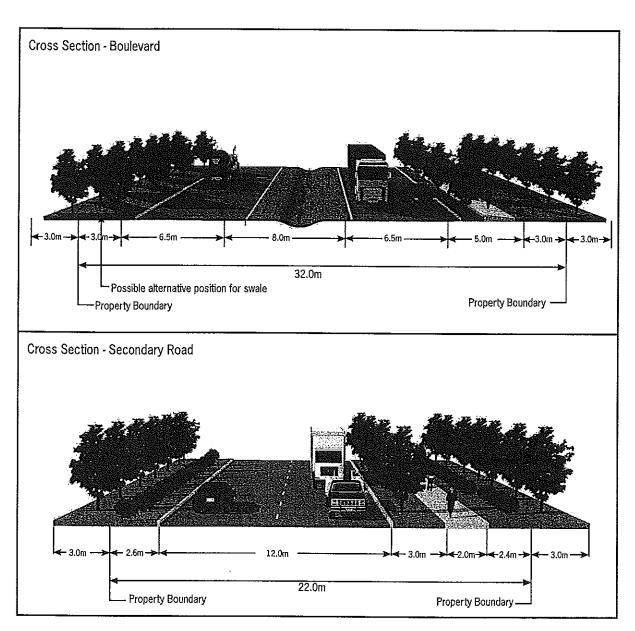


Fig 8 Road Types

While roads may be required in addition to those shown on the Concept Plan, it is not envisaged that further road connection out of Area SR2 is essential, but, as described in Section 3.3 above, it is highly desirable that a further connection of some description is achieved to Hoskyns Road.

Roading matters are covered in detail in the report by Traffic Design Group.

3.5 Road Types

As shown on the Concept Plan, there are two road types proposed in Area SR2 – boulevards and secondary roads. A boulevard is proposed on the entrance into Area SR2 from Hoskyns Road. It runs into a roundabout controlled intersection, achieving a similar sense of entry to that achieved by the boulevard entry to the existing Izone area. The boulevard treatment then extends towards the north, again similar to the central spine road in the existing Izone.

A secondary road treatment is proposed for the link to the road stub in the existing Izone, which already has a similar treatment.

More detail on the treatment of these can be seen in Figure 8. These have been generally derived from the existing Izone treatments, but with a wider berm on the footpath side (accommodating a wider street berm for planting, and a wider footpath). Minor variations from these dimensions might occur as detailed design is progressed. It is also possible that a swale might be accommodated instead on the non-footpath side, as indicated. Where this is the case, additional planting would be established in the central median.

The two types help to establish legibility and identity, and reinforce that Area SR2 is very much an extension of existing Izone.

Roading matters are covered in detail in the report by Traffic Design Group.

3.6 Amenity Hubs

An area of smaller lots around a small park currently under construction in the first stage of Izone is in urban design terms seen as an "amenity hub" (refer Figure 9). It is intended that this will form the first in a series of similar amenity hubs as Izone expands.

The goal of these hubs is to service the day to day needs of nearby employees and provide a pleasant open space area within walkable distance of most lots. It is not anticipated that the hubs will be identical. For example a cafe may establish in one amenity hub, a second hub might include a creche, a chemist, or some other function as determined by future demand. In some cases, it may be that market demand will indicate that a hub might provide only a passive open space, for people to meet and sit in during lunch breaks.

It is proposed that these amenity hubs should differ as much as possible from each other in architectural and landscape style, to define their own identity and provide a point of difference. This may encourage people to walk between amenity hubs.

It is proposed that a hub be provided within Area SR2, and the best location would appear to be in the general location shown as a blue star on the Concept Plan. As an alternative, a second location is postulated, generally around the entrance from Hoskyns Road, shown as a red star.

As noted, the nature and scale of the hub for Area SR2, and its mix of passive and commercial uses (if any) would be determined in response to market demand as the development progressed. At the detailed level, like the open space areas of the existing hub, its publicly accessible spaces will be designed to be accessible for people with disabilities.

3.7 Transport Options and Walkability

There are several references to the importance of catering for a range of transport options and encouraging walkability in Proposed Plan Change No.1, including Policy 8(h) which asks that the Outline Development Plan demonstrates "how effective provision is made for a range of transport options and changing between transport modes, including pedestrian, cycling, passenger transport, freight, private motor vehicles".



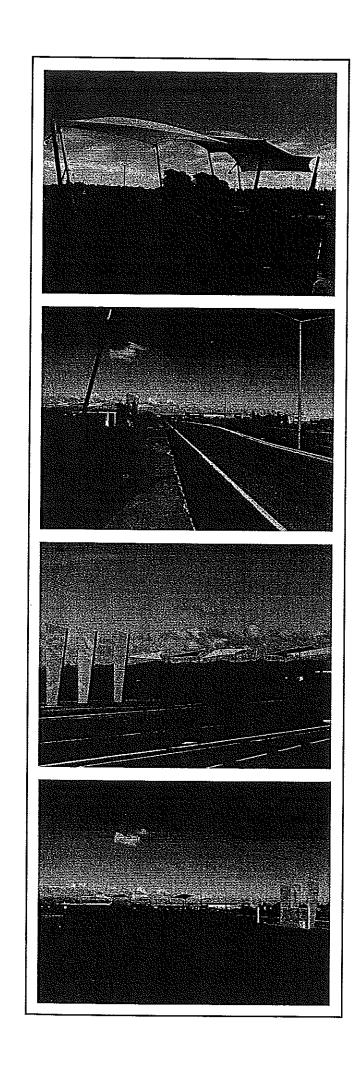


Fig 9 Photographs of Amenity Hub at Existing Izone

Matters to be provided for under Policy 7 also include:

- "Good safe connectivity within the area and to surrounding areas, by a variety of transport modes, including motor vehicles, cycling, pedestrian and public transport, and provision for safe and easy transfer between modes of transport,
- Location within walkable distance to community, social and commercial facilities.
- Provision for effective, efficient and attractive walkways and cycleways preferably integrated with open space and stormwater detention areas, within, across and linking beyond the area"

The roading pattern and wide industrial roads enables numerous options for bus routes. Bus stops would logically be located at amenity hubs.

Much of Area SR2 is located within walking distance of the railway and former rail station, should passenger transport resume on the rail system in the future. Railway connections by way of sidings into other parts of Izone area are being considered for freight interchanges (not in Area SR2).

Pedestrian and cycle networks are generally within the road network with one specific pedestrian-only link proposed, as shown on the Concept Plan. Paths on the proposed roads consist of high amenity landscaped walkways as shown in the relevant cross sections.

In regard to walkability, dashed circles on the Concept Plan indicate an approximately 10-minute (800m) walking distance from the possible amenity hubs. Location of the proposed amenity hubs has been guided by distance so all sites in Area SR2 will be within walking distance of an amenity hub and its possible community, social and commercial facilities.

Roading matters are covered in detail in the report by Traffic Design Group.

3.8 Stormwater Management

Stormwater management is referred to in Policies 7 and 8 of Proposed Plan Change No.1.

Policy 7 requires that one matter to be provided for is "provision for the protection of surface and groundwater quality, including appropriate stormwater management facilities to avoid downstream flooding and preserve or enhance water quality". Policy 8(i) requires demonstration of "how other potential adverse effects on the environment, including the protection and enhancement of surface and groundwater quality, are to avoided, remedied or mitigated".

The stormwater system proposed for Area SR2 will be similar to that used for the existing Izone development.

The Concept Plan identifies "boulevard" roads in which the central medians (or a side berm as an alternative) are used as treatment/storage and soakage systems. These swales would be grassed with possibly some light planting. The roundabouts also will be designed as soakage basins and will thus be depressed. They will include planting and sculptural features (further detail in the section on "Identity" below). Other stormwater management devices such as on-site soakage do not require particular land to be identified in the Concept Plan.

Stormwater matters are covered in detail in the report by Kerr and Partners entitled Stormwater Management Assessment for Plan Change.



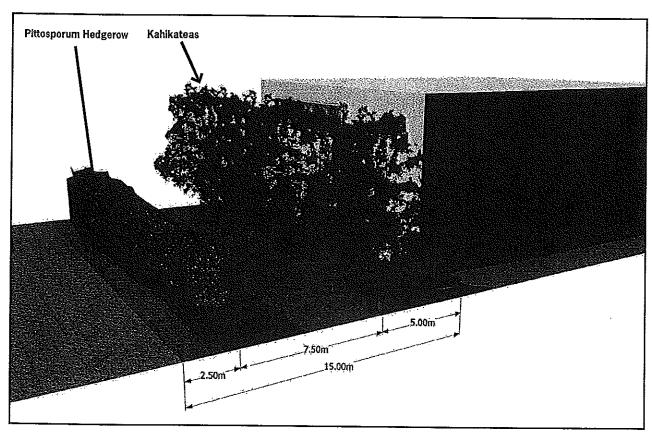


Fig 10 Buffer Treatment at Rural Boundary

3.9 Rural Interface

In addition to specific reference to groundwater treatment, Policy 8(i) of Proposed Plan Change No.1 also asks that the Outline Development Plan shows "how other potential adverse effects on the environment... are to be avoided remedied or mitigated". One such potential effect is loss of rural character, though to a large extent the fact that the land is identified for business expansion in the RPS confirms that this change of character from rural is expected.

The rules for the existing Izone area seek to maintain and enhance an existing shelterbelt that runs along Railway Road and along most of its Rural zone boundaries. On one length of boundary where the shelterbelt did not exist at the time of the original variation, rules require its establishment, and Izone has already planted this section of boundary. Specific setback controls (10 metres) also apply to the Rural zone boundary, and until the shelterbelt matures a setback of 30m currently applies to that area with new planting. It is noted that with expansion into Area SR2 the 30m restriction need no longer apply.

As noted throughout, however, the Concept Plan layout has been derived from a wider study that confirmed the view that Railway Road should be the long-term boundary of the business zoned area, but that eventual expansion across Hoskyns Road should be planned for. Moreover, as noted, Hoskyns Road should be seen as a key road within a wider business area, and should have direct vehicle access. As such it is not proposed that existing shelterbelts along the Hoskyns Road frontage must be retained.

In terms of the land to the northwest, again it is envisaged that expansion will progress in this direction at some stage. Given that there is no hedgerow on the northern boundary of Area SR2, it is not proposed that requiring the establishment of an exotic shelterbelt is necessary to protect a rural view from land that will not be rural long term. However, this boundary is an appropriate location to require a buffer treatment which in the short term helps with the transition to rural land and in the long term provides visual interest and legibility by demarcating different stages of the development.

The nature of the minimum recommended treatment at this boundary is shown in Figure 10 using pittosporum to establish a hedgerow, and a secondary row of kahikateas. Building setback would be 15m to allow space for the trees to establish. It is possible that a publicly accessible walkway might be located within this buffer for part or all of its length.

This buffer should be established as soon as possible to allow good growth prior to development.

3.10 Hoskyns Road Frontage

In general it is considered that existing development controls for the Business 2 zone at Izone will maintain a minimum level of amenity for road frontages throughout Area SR2. However, the introduction of oak trees is proposed as part of the treatment specifically for the Hoskyns Road frontage.



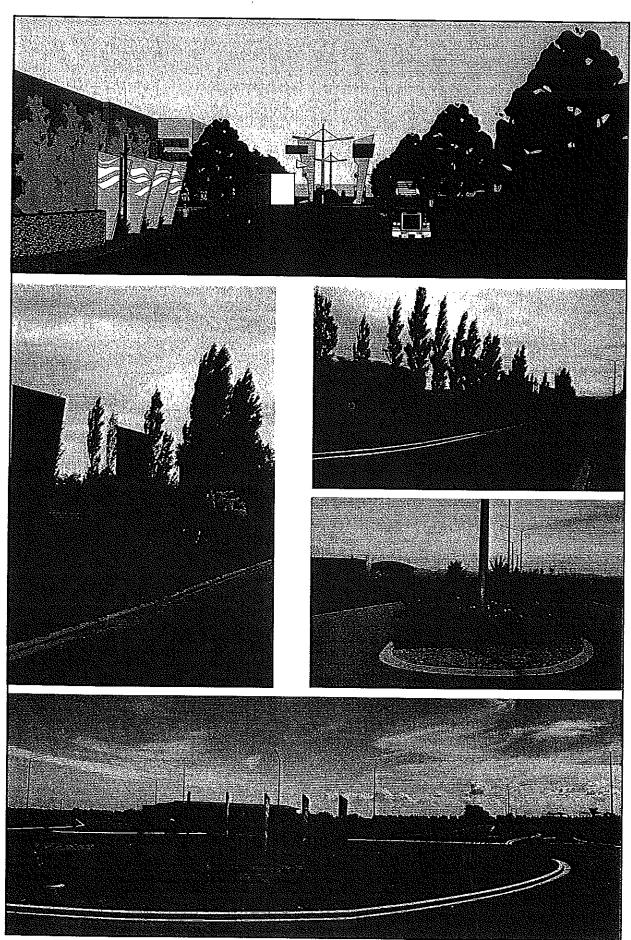


Fig 11 Identity Features

3.11 Identity

The Izone brand is well established through its hard and soft landscape treatments, and presents an attractive image, as shown in the photographs and image comprising Figure 11. It is expected and recommended that this brand will continue, with any proposed subdivision forming an identifiable business area congruent with the existing stages.

The use of structural "icons" as well as soft landscaping treatments (particularly on roundabouts, boulevards and at gateway intersections) will continue the theme.

In urban design terms, the legibility of the site will be supported by this structured arrangement of features and planting, from boulevards and iconic roundabouts, to secondary roads and intersections.

Roundabouts in particular are seen as locations to reinforce the brand.

3.12 Infrastructure

Policy 8(f) of Proposed Plan Change No.1 requires that an Outline Development Plan "Document the infrastructure required, when it will be required and how it will be funded" and Policy 7 refers to "efficient and effective use of existing and new infrastructure networks". This matter is covered in the report by Connell Wagner entitled "Infrastructre Assessment."

3.13 Staging and Co-ordination.

Policy 8(g) of Proposed Plan Change No.1 requires that an Outline Development Plan sets out "the staging and coordination of subdivision and development between landowners". As noted, area SR2 includes one parcel of land not controlled by Council. This has direct frontage to Hoskyns Road and can be developed independently of Izone. The Concept Plan identifies a road pattern such that usable lots (as shown on the indicative subdivision pattern) can be created around these two parcels - conversely this may be a suitable alternative location for the Area SR2 amenity hub.

The balance of Area SR2 is likely to be developed as a single stage.



SUMMARY AND CONCLUSION

Area SR2 has been identified for business growth in RPS Proposed Plan Change 1, and is ideally suited for this. It is located close to road and rail connections and provides a logical next expansion area for the successful Izone Southern Business Hub.

RPS Proposed Plan Change 1 requires the preparation of an Outline Development Plan when it is proposed to amend a district plan to provide for urban activities. Policies 7 and 8 set down its content and the matters to be provided for.

This document forms the Outline Development Plan and addresses all relevant matters, or makes reference to reports by others which address infrastructure, stormwater management and traffic. The Concept Plan and other conceptual proposals outlined in this document have been derived from a wider urban design review of growth directions and linkages which considered the integration of the land with other possible future business expansion areas (which have been raised by others in submissions to the RPS Proposed Plan Change 1). The concepts provide a suitable degree of certainty on key matters, while enabling flexibility for changes to be accommodated during the likely development time frame.

The Outline Development Plan endorses the successful features of the existing Izone development - such as its simple road structure and hierarchy, its boulevard streets accommodating stormwater management, its iconic landscape features and its amenity hub - and outlines how these concepts should be carried over and improved upon as Izone expands into Area SR2. Improvements include a more generous and pleasant pedestrian environment on the roads, and ensuring that users will have somewhere pleasant to walk to and pause at in terms of the amenity hub concept. It is hoped that this, in combination with additional routes back towards the railway line and the existing township, will result in higher walking rates and thus better health benefits, and reduced usage of private vehicles.

Expansion of Izone in this way will enable Rolleston to fulfill its role (as identified in the URS) as the main employment area for Selwyn District, in a way which is consistent with RPS Plan Change 1 and with the Urban Design Protocol which it identifies as a relevant matter for application.



Appendix - Evaluation Against Urban Design Protocol

Assessment of the Outline Development Plan against the seven Cs of the New Zealand Urban Design Protocol is set down below.

Context

The Protocol states that:

Quality urban design sees buildings, places and spaces not as isolated elements, but as part of the whole town or city. For example, a building is connected to its street, the street to its neighbourhood, the neighbourhood to its city, and the city to its region. Urban design has a strong spatial dimension and optimises relationships between buildings, places, spaces, activities and networks. It also recognises that towns and cities are part of a constantly evolving relationship between people, land, culture and the wider environment.

The Protocol checklist states that:

Context	
Quality urban design:	Comment
• takes a long term view	The concept plan for Area SR2 has been prepared in the context of a longer term study of the expansion of Izone over the next 10-15 years, and connections to these possible future expansion areas are planned for.
 recognises and builds on landscape context and character 	A new form of planted buffer is required for the northwestern boundary reminiscient of existing hedge patterns. The rectilinear roading pattern recognises existing landholding and roading patterns.
 results in buildings and places that are adapted to local climatic conditions 	This is at a level of detail beyond that which can be ensured by the concept plan.
 examines each project in relation to its setting and ensures that each development fits in with and enhances its surroundings 	The expansion has been planned in the context of a conceptual study of possible wider business expansion, which in turn looked at the role of Izone as part of Rolleston, and as part of the Region.
 understands the social, cultural and economic context as well as physical elements and relationships 	The expansion recognises the economic and social context of Rolleston as a key employment area enabling the wellbeing of the people of the region. There is no particular cultural context to which a business park expansion should refer.
 considers the impact on the health of the population who live and work there 	
 celebrates cultural identity and recognises the heritage values of a place 	The land has no particular cultural or heritage values.
ensures incremental development contributes to an agreed and coherent overall result	Area SR2 is virtually all in one ownership and while incremental flexibility of block pattern is essential as it unfolds, it is in the interests of the developer to maintain the agreed and coherent overall theme.

Summary:

The expansion of Izone into Area SR2 has been planned in the context of possible wider future expansion of business activity at Rolleston, consistent with its regional context as the main employment provider for Selwyn District. As a development area under largely a single ownership, it will build upon the identity it has already developed, and maintain these overall themes even as development progresses.

The land has no particular heritage or cultural values, but the rectilinear parcel and landscape patterns are recognised in the base roading layout, in the retention of key shelterbelts in existing Izone, and, in the establishment of a new one on the northwest boundary.

Character

The Protocol states that:

Quality urban design reflects and enhances the distinctive character and culture of our urban environment, and recognises that character is dynamic and evolving, not static. It ensures new buildings and spaces are unique, are appropriate to their location and compliment their historic identity, adding value to our towns and cities by increasing tourism, investment and community pride.

The Protocol checklist states that:

Character	
Quality urban design:	Comment
 reflects the unique identity of each town, city and neighbourhood and strengthens the positive characteristics that make each place distinctive 	The distinctive hard and soft landscape treatment of the existing lzone development establishes an identity for Izone, and this it is proposed to carry this through and enhance it in Area SR2.
protects and manages our heritage, including buildings, places and landscapes	The land has no particular cultural or heritage values.
 protects and enhances distinctive landforms, water bodies and indigenous plants and animals 	The land has no distinct landforms, and no water bodies.
 creates locally appropriate and inspiring architecture, spaces and places 	The distinctive iconic hard landscape treatment is proposed to be continued and evolved as Area SR2 is developed.
 reflects and celebrates our unique New Zealand culture and identity and celebrates our multi- cultural society 	The existing hard and soft landscape features of the development create a unique branding, though this refers more to a 'pacific' style. Ongoing evolution of these landscape themes will not necessarily refer to a unique or multi-cultural New Zealand theme.

Summary:

The land is flat and has no particular heritage or cultural features. However the existing Izone development has a distinct character and identity - established by its landscape treatments, road cross sections, and iconic hard landscape features - which will be carried though and evolved as expansion into Area SR2 unfolds.

Choice

The Protocol states that:

Quality urban design fosters diversity and offers people choice in the urban design form of our towns and cities, and choice in densities, building types, transport options, and activities. Flexible and adaptable design provides for unforeseen uses, and creates resilient and robust towns and cities.

The Protocol checklist states that:

Choice	
Quality urban design:	Comment
 ensures urban environments provide opportunities for all, especially the disadvantaged 	Rolleston is predominantly a residential commuter town at present, for which household car ownership would be essential.
 allows people to choose different sustainable lifestyle options, locations, modes of transport, types of buildings and forms of tenure 	An increased provision of business land at this location in Rolleston results in an opportunity for people to choose a sustainable lifestyle option of living and working in the same town, and of walking or cycling to work, thus reducing travel costs.
 encourages a diversity of activities within mixed use developments and neighbourhoods 	The Business 2 zoning enables a wide variety of activities, but limits retail and residential opportunities. The business park will not tend to have a great diversity of activities.
 supports designs which are flexible and adaptable and which will remain useful over the long term 	The layout is adaptable in terms of lot sizes, to enable response to different buyer types over time.
 ensures public spaces are accessible by everybody, including people with disabilities 	Public spaces in amenity hubs will be accessible by people with disabilities.

Summary:

It is not expected that there will be an extensive diversity of activities in Area SR2. However in the wider sense of the settlement of Rolleston, the expansion of Izone into Area SR2 offers people further choice in terms of the locations where they live and work, and in their modes of transport. This is particularly the case if they choose to live in Rolleston, but also insofar as the increased scale of settlement might in time support further public transport options.

The proposed key road pattern provides certainty of key connections and geometry, but also allows for flexibility and adaptability of lot pattern and therefore scale and form of buildings, over time.

Connections

The Protocol states that:

Good connections enhance choice, support social cohesion, make places lively and safe, and facilitate contact among people. Quality urban design recognises how all networks – streets, railways, walking and cycling routes, services, infrastructure and communication networks – connect and support healthy neighbourhoods, towns and cities. Places with good connections between activities and with careful placement of facilities benefit from reduced travel times and lower environmental impacts. Where physical layouts and activity layouts and patters are easily understood, residents and visitors can navigate around the city easily.

The Protocol checklist states that:

Connections	
Quality urban design:	Comment
 creates safe, attractive and secure pathways and links between centres, landmarks and neighbourhoods 	Attractive pathways are incorporated into the road cross sections, where they are visible and safe. Planning for linkages to the hubs is not expected to rely on separate pedestrian pathways.
 facilitates green networks that link public and private open space 	Contiguous green networks are not proposed. A "network" of sorts, between the hubs, will be established by the hubs, which will include green spaces.
 places a high priority on walking, cycling and public transport 	Pathways and berms are enhanced relative to existing Izone, and Amenity Hubs are called for, encouraging walking around the area. Wide through roads are suitable for a future bus connection.
 anticipates travel demands and provides a sustainable choice of integrated transport modes 	
 improves accessibility to public services and facilities. 	The roading layout facilitates an alternative route to the services and facilities of Rolleston, in connecting existing Izone through to Hoskyns Road. Public services and facilities may be present in the amenity hubs.
 treats streets and other thoroughfares as positive spaces with multiple functions 	The proposed road treatments provide legibility, provide amenity through their landscape treatment, and in the case of boulevard swales and roundabouts, fulfil a stormwater management function.
 provides formal and informal opportunities for social and cultural interaction 	The amenity hubs are intended to provide for both formal and informal opportunities for interaction in the wider Izone. Two possible locations within Area SR2 are identified for an amenity hub.
 facilitates access to services and efficient movement of goods and people 	The key road pattern proposed provides for satisfactory movement into, around, and out of Area SR2.
 provides environments that encourage people to become more physically active 	Pathways and berms are enhanced relative to existing Izone, and amenity hubs are called for, encouraging walking around the area.

Summary:

The simple road pattern provides connections to surrounding land and roads, and thus increases options for access to services and facilities. Legible road cross sections incorporating safe and pleasant pathways are proposed.

Creativity

The Protocol states that:

Quality urban design encourages creative and innovative approaches. Creativity adds richness and diversity, and turns a functional place into a memorable place. Creativity facilitates new ways of thinking, and willingness to think through problems afresh, to experiment and rewrite rules, to harness new technology, and to visualise new futures. Creative urban design supports a dynamic urban cultural life and fosters strong urban identifies.

The Protocol checklist states that:

Creativity	
Quality urban design:	Comment
emphasises innovative and imaginative solutions	The distinctive hard and soft landscape treatment, road cross-sections, and amenity hub concept in the existing Izone development were innovative in the context of Canterbury business parks at the time. It is proposed to carry through and further emphasise these innovations in Area SR2.
combines processes and design responses that enhance the experience we have of urban environments	Planning for Izone was established from its outset based on urban design driven master plans, and this continues to be the case. The current outline development plan process ensures a greater statutory reference to these matters than was the case under the existing modified zoning.
 incorporates art and artists in the design process at an early stage to contribute to creative approaches 	Art and artists will not be incorporated in the design process. The "art" of the project landscape architect in the detail of the hard landscape features of existing Izone is evident, and a similar approach to landscape as art will be pursued in Area SR2.
 values public art that is integrated into a building, space or place 	The distinctive hard and soft landscape treatment of the existing Izone development establishes a strong identity for Izone. The
builds a strong and distinctive local identity	hard landscape treatment integrates iconic sculptural features into the layout, signalling entrances, roundabouts and hubs. It is proposed to carry this through and evolve this approach in Area SR2.
utilises new technology	Contemporary stormwater management solutions are proposed.
incorporates different cultural perspectives	The project does not incorporate different cultural perspectives.

Summary:

The concept integrates creative and artistic solutions into the layout, and in the future details, to a level suitable for a business and industrial park in a New Zealand country town.

Custodianship

The Protocol states that:

Quality urban design reduces the environmental impacts of our towns and cities through environmentally sustainable and responsive design solutions. Custodianship recognises the lifetime costs of buildings and infrastructure, and aims to hand on places to the next generation in as good or better condition. Stewardship of our towns includes the concept of kaitiakitanga. It creates enjoyable, safe public spaces, a quality environment that is cared for, and a sense of ownership and responsibility in all residents and visitors.

The Protocol checklist states that:

Custodianship	
Quality urban design:	Comment
 protects landscapes, ecological systems and cultural heritage values 	The site has no particular landscape features, cultural heritage values, or ecological features.
 manages the use of resources carefully, through environmentally responsive and sustainable design solutions 	A sustainable design solution is utilised for stormwater management – refer to Stormwater Management Assessment by Kerr and Partners.
manages land wisely	Based on sales data to date the scale of the expansion is appropriate to meet reasonably foreseeable business land needs for the coming few years.
 utilises 'green' technology in the design and construction of buildings and infrastructure 	The swale-based solution utilised for stormwater management could be described as 'green' technology.
 incorporates renewable energy sources and passive solar gain 	This is at a level of detail unable to be ensured by the concept plan.
 creates buildings, spaces, places and transport networks that are safer, with less crime and fear of crime 	The proposed roads include safe publicly visible paths, and it is not proposed that separate walkways be created (which would require greater attention to CPTED issues).
	In regard to buildings and development of private land this is at a level of detail unable to be ensured by the concept plan.
 avoids or mitigates the effects of natural and man- made hazards 	There are no known natural hazards on the site.
 considers the on-going care and maintenance of buildings, spaces, places and networks 	Maintenance of public spaces can be ensured through the subdivision process. Covenants in the existing sales process are designed to secure ongoing maintenance of properties by the purchasers. As a long term developer, it is in the interests of Izone to ensure purchasers and tenants take care of their properties.
 uses design to improve the environmental performance of infrastructure 	Refer Infrastructure Assessment by Connell Wagner.
 considers the impact of design on people's health 	Pathways and berms are enhanced relative to existing Izone, and amenity hubs are called for, encouraging walking around the area, which has health benefits.

Summary:

The concept plan for area SR2 includes a 'green' stormwater management solution that identifies the basis of a safe movement network. As part of a long term project maintenance levels of the development can reasonably be assumed. The proposed business use and concept plan are considered to be the basis of a sustainable and wise use of land in the long term.

Collaboration

The Protocol states that:

Towns and cities are designed incrementally as we make decisions on individual projects. Quality urban design requires good communication and co-ordinated actions from all decision-makers: central government, local government, professionals, transport operators, developers and users. To improve our urban design capability we need integrated training, adequately funded research and shared examples of best practice.

The Protocol checklist states that:

Collaboration	
Quality urban design:	Comment
supports a common vision that can be achieved over time	The vision for expansion of business development into Area SR2 been recognised since its first rezoning – refer Outline Development plan in District Plan Appendix 22. The vision has since been expressed in the identification of the land in RPS Proposed Plan Change No. 1.
 depends on leadership at many levels 	Not relevant to the Outline Development Plan process.
 uses a collaborative approach to design that acknowledges the contributions of many different disciplines and perspectives 	Design of the development to date, and formulation of the Outline Development Plan, has been by collaboration of the Izone Board and consultants in planning, urban design, landscape architecture, surveying, and engineering (infrastructural, stormwater and traffic)
 involves communities in meaningful decision- making processes 	notified Proposed Plan Change No.1 to the Regional Policy Statement. Submissions in regard to this were limited. The concept plan layout recognises the aspirations of nearby submitters.
	The outline development plan will form part of a notified Plan Change, enabling further public participation by submission.
 acknowledges and celebrates examples of good practice 	
 recognises the importance of training in urban design and research at national, regional and local levels 	Not relevant to the Outline Development Plan process.

Summary:

Expansion of Izone into Area SR2 is a step that forms part of a long term vision. Design has been progressed on a multi-disciplinary basis, and recognising good practice models. Community participation is enabled by the submissions process.

Summary and Conclusion

The expansion of Izone into Area SR2 has been planned in the context of a long term vision for future expansion of business activity at Rolleston.

The proposed simple key road pattern provides certainty of the minimum key connections likely to be required, but also allows for flexibility and adaptability over time.

Business Parks are by nature single-use and is not expected that there will be an extensive diversity of activities in Area SR2. However the proposal includes a new amenity hub as a potential location for supporting activities and as a destination for users to walk to.

The expansion is also positive in terms of its overall contribution to the growth of Rolleston as a balanced town offering people choice in the locations where they live and work, and in their modes of transport. Legible road cross sections incorporating safe and pleasant pathways are proposed to encourage walking, and the roads of Area SR2 also incorporate a 'green' stormwater management solution.

The land has no particular heritage or cultural values, but the rectilinear parcel and landscape patterns are recognised in the layout. The development will build upon the distinct character and identity it has already created, and maintain these overall themes as development progresses.

In conclusion the proposed expansion of Izone into Area SR2 in the manner described by this Outline Development Plan is found to be consistent with the Urban Design Protocol to such a level as can be determined at this stage of planning and design.

Appendix C

Stormwater Management Assessment

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Izone Industrial Park, Rolleston

Selwyn District Council

Stormwater Management
Assessment for Plan Change

June 2008 Reference 1003 Revision E



1. Introduction

This report is prepared in support of an application to change the Selwyn District Plan to allow industrial and commercial zoning (Business 2) of approximately 56.31ha of land as an extension to the existing izone Industrial Park, Rolleston.

The report discusses the issues for managing stormwater in the proposed industrial area and assesses the feasibility of providing an effective and sustainable system.

2. Site Description

2.1 Existing and Surrounding Land Use

The subject site is characterised by land use activities typical of a rural setting, being paddocks demarcated by fencelines and shelterbeits, dwellings and associated accessory buildings and landscape plantings.

2.2 Geology and Topography

The central Canterbury Plains are formed by scenes of coalescing glacial outwash and alluvial fans progressively built up from the erosion of the Southern Alps during the quaternay period.

The site is slightly sloping to the south east, however, it has a fairly flat and even gradient.

2.3 Rainfail

The monthly rain gauge averages from data collected from Wigram Aerodrome in Table 1 provide a reasonable approximation of Rolleston rainfall. This is compared to evapo-transpiration (based on 75% of average raised pan evaporation from Christchurch Airport), to give an average monthly moisture budget.

Table 1: Monthly Mean Rainfall and Evaporation (mm)

Month	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sept	Oct	Nov	Dec	Vr
Rainfall	56	44	52	58	75	55	62	54	45	42	50	55	648
ETo	153	126	92	58	34	19	20	36	68	105	122	155	997
Balance	-97	-82	-40	0	41	36	42	18	-23	-63	-82	-100	-349

The table shows that rainfall exceeds evaporation for the winter months of May to August. The rainfall surplus is usually small.

2.4 Solls

According to the Environment Canterbury GIS system, the site is traversed by Eyre shallow sandy loam with bands of Templeton moderately deep silt loam also running through the area. Eyre and Templeton soils are associated with flood channels of the Waimakariri River of which a relict form is apparent in the site contours. Consistent with this origin, the soils are likely to be underlain by fine sands and clay silts in outwash gravel as has been revealed by test pits dug to 4 metres depth at other similar locations within Rolleston and borelogs from local wells.

Although the soils have good water retention capabilities 70-110mm (average 85mm WHC) and 90-150mm (average 120mm) respectively, they are also described by Cox (1974) as well drained, of a depth between 0.5 and 1 metre and may be suited to cropping if retained within common ownership and managed appropriately. Infiltration is expected to be in the range of 30 to 50mm/hr in common with measurements from other sites of similar soil type in the vicinity.

2.5 Groundwater

The site is located over a semi-confined or unconfined aquifer within the Selwyn-Waimakariri Groundwater Allocation Zone. There are a number of wells in the vicinity of the site that range in depth from 25m to 195 m bgl with an average depth of 104 m bgl (or 46 m bgl if the 5 deep wells at or about 195 m bgl are disregarded). No wells have been successfully commissioned at depths less than 25 m. The shallowest water of any kind is at 20 m bgl on the top of a clay rich layer. This may well be percolated surface water.

Although water-level observation data shows that groundwater levels can come within 10 m of the surface, the geology would indicate that this is unlikely to represent a water table aquifer, with confinement of the deeper water bearing strata by the above mentioned clay rich layer providing sub-artesian pressure. This confinement is supported by the initial static water levels which are consistently less than half the average well depth.

For most of the wells in this area, yields are only moderate (specific capacity between 0.215 to 0.72 L/s/m) due to aquifers of limited areal extent or the presence of tight clay rich gravels that extend to as much as 135 m bgl where free gravels are encountered and yields increase substantially (e.g. SC of 11.97 L/s/m at 195 m bgl for the Izone industrial bore).

According to the piezometric information contained in Table WQL20 in the Proposed Natural Resources Regional Plan (PNRRP), public supply bore M36/2495, 1700 m to the east and 101 m deep, is recorded as having a groundwater flow direction of 99 degrees, and bore M36/3922, 1080 m to the Southeast and 200 m deep, has a flow direction of 116 degrees. This means that groundwater in the locality runs in a general east-south-east direction.

2.6 Surface Water and Drainage

No functioning natural or constructed surface water bodies are located on the site. Land drainage under existing land use on the site is to the ground with no visible off-site runoff.



3. Issues

3.1 Receiving Waters

As no natural or man made surface water systems exist in the area, the only option is to discharge stormwater to ground. This replicates pre-development conditions.

3.2 Land Use Options

The B2 zoning allows a wide range of enterprises to be developed at the industrial park. This leads to the possibility that enterprises which have the potential to discharge significant amounts or toxic levels of contaminants may be established. The stormwater system will need to be appropriately designed to manage the risk of diffuse pollution from the sources as well as the potential for accidental spillage of hazardous substances.

An individual stormwater system will need to be designed for each site.

3.3 Water Quality

The contaminants referred to above, along with contaminants discharged from more typical land uses and road traffic will have the potential to adversely affect the groundwater quality. This groundwater feed wells downstream are used for domestic supply as well as stock and irrigation, and may include the Christchurch City water supply. Therefore, it is essential that any discharge is appropriately treated to remove the risk that contaminants will affect human health (in line with Drinking Water Standards for New Zealand 2005) and stock water guidelines (ANZECC 2000).

3.4 Flood Risk

The creation of hardstand and roof areas, and the establishment of assets in the area that demand a suitable level of flood protection raises the issue of how intense rainstorms will be managed to ensure water does not enter buildings or otherwise cause damage or threaten safety. The system will have to be appropriately designed to ensure that this can be achieved.

3.5 Stormwater consent for existing stages of IZONE

A 'global' stormwater consent has been granted by Environment Canterbury for the Izone Industrial Park. This consent (CRC06044) covers the discharge of stormwater from all impervious surfaces within the 72 ha park. As such, there is no requirement for any lot owner to obtain a consent to discharge stormwater provided that they can meet the conditions of the consent.

The consent covers the discharge of stormwater from each individual lot, and all the roads in the development. Conditions 11 to 16 of the consent set out the type of systems required to be used within each lot, and where they can be used. It also states that each lot must discharge all of its stormwater within the confines of the individual lot boundaries.

A combination of swales, soakage pits, Humesceptors and soakage basins are used for the public road network. Options involving swales, raingardens, oil/grit separators and soakage pits are used for the on-lot works.

Activities undertaken that fall within Schedule WQL3 of the PNRRP are not covered by the consent. (WQL3 lists activities where hazardous substances are used).



4. Stormwater Management Options

4.1 Treatment Options

The proposed land use, being potentially contaminated producing enterprises, coupled with the sensitivity of the receiving waters demand a reasonably high level of treatment before discharging to ground waters.

Treatment Options identified as offering promise either alone or in series include:

- · Infiltration basins
- · Infiltration swales, trenches and raingardens
- · Humesceptors, cartridge filter system and other similar propriety devices
- Sand filters
- · Oil and grit separators
- Sumps

4.2 Flood Risk Protection Options

Flood risk management options that offer promise include:

- Soakage chambers
- Soakpits
- Swales
- Infiltration basins

4.3 Potential System Combinations

The following combinations of the above elements offer potential for managing stormwater in the industrial park:

For road runoff and light industrial enterprise yards.

- Humesceptor or cartridge filter to soakage chambers (smaller catchments).
- · Humesceptor or cartridge filters to soakage pits with overflow to infiltration basins.
- · Infiltration basins with sumps or swales providing pre-treatment.
- Infiltration swales and raingardens with overflow to soakage chambers (smaller areas only).

Heavy Industrial Yards

- Sump, Humesceptor or cartridge filter or sand filters to above ground infiltration swale with overflow to soakage chamber(s),
- As above, however with infiltration basins in place of swale and soakage chambers.

Roofs

Soak pits to ground, sealed from surface water ingress

Carparks, driveways and other areas

- Infiltration swales.
- Any other system used for road runoff outlined above.



4.4 Likely Stormwater System

The concept as outlined in the plan change application documentation, notably the Harrison Grierson Outline Development Plan has been reviewed to develop the likely stormwater system to be used in the development.

The proposed scheme is outlined below, and generally follows the scheme used for the earlier stages of the Industrial Park.

4.4.1 On-lot stormwater

Each part of the lot is divided into one of four categories and the system is specified for each one. These are as follows:

Land Use Type	System
Driveways	Discharge to swale and infiltration trench
Carparks and pedestrian areas	Discharge to raingarden
Storage and loading yards	Sumps, then oil/sediment traps, then swales before discharging to ground via an infiltration trench
Roofs.	Discharge to a soakpit via a sealed system

4.4.1 Road Runoff

The runoff from the public roads is likely to be managed as follows:

- Kerb and channel will pick up runoff from carriageways, footpaths and berms.
- Sumps with traps will then discharge via bubble up sump to a swale located in the road reserve
- The runoff will pass over a minimum of 20m of grass swale before discharging to a soakpit
- Alternatively, in roads without swales, Humesceptors will pre-treat runoff prior to discharge to soakage pits
- Secondary flows will be conveyed overland to soakage basins in the roundabouts or separate areas.
 These will be sized to accept the 2% AEP event, with an allowance for freeboard, before over topping.
- Extreme events will pass along the carriageways and discharge as they do prior to development

4.5 Management of activities that may discharge hazardous substances

Schedule WQL3 of the proposed Natural Resources Regional Plan provides a list of activities that use hazardous substances. Due to the risk to the groundwater presented by these types of substances, it is proposed that these activities will not be included in any global stormwater discharge consent sought from Environment Canterbury. Hence specific system design and discharge consent will be required for such activities.



5. Assessment

5.1 Feasibility of providing a sustainable solution

There are a large number of systems available for treating and discharging stormwater runoff to ground from the proposed development.

Infiltration basins, raingardens, Humesceptor and the cartridge filters available are all able to treat runoff to a high standard. Using these and pre-treatment systems such as swales and sumps in a series (the treatment train) will result in high levels of treatment. In addition, as the groundwater is some 20 m below ground level and there is some distance between the site and the nearest well then there will be additional treatment provided by the unsaturated (vadose) zone.

Some industrial enterprises will require particular design, particularly those listed in schedule WQL3 of the proposed Natural Resources Regional Plan. Provided that the discharge from these enterprises are appropriately managed as described in the preceding sections and the discharge to an above ground swale or basin (to allow monitoring of spills more easily) then these issues are able to be managed without undue cost or risk to the environment. If this is not feasible, then consent to discharge for the activity will not be able to be obtained from Environment Canterbury, hence excluding it from the development.

Appropriate groundwater quality modelling will need be undertaken to confirm that the system is able to discharge water of an appropriate standard and not adversely affect downstream wells, however based on experience with similar developments and issues in the Canterbury region, it is clear that suitable solutions will be able to be found.

Therefore, as the receiving waters are all well separated from other users, and with the above measures put in place, I consider that there are suitable and cost-effective systems available to manage storm water from the proposed development and my assessment is that stormwater management does not represent a barrier to the proposed development of this site.

5.2 Assessment against Plans and Policies

Policy	Comment
Selwyn District Plan Part 2 Natural Resources Section 1.2 - Water • Ensure all activities in townships have appropriate systems for water supply, and effluent and stormwater treatment and disposal to avoid adverse effects on the quality of ground water or surface waterbodies.	System described above
Ensure land rezoned to a Living or Business zone can be serviced with a water supply and effluent and stormwater disposal without adversely affecting groundwater or surface waterbodies.	Robust system proposed. Similar system has received Regional Discharge consent for previous stages of IZONE.
2.1.2 Water Activities in townships have the level of services they require to avoid adverse effects on groundwater and surface water resources. Urban activities undertaken in proximity to rivers, lakes and wetlands have minimal risk of unforeseen adverse effects on water quality. The water quality in waterbodies is maintained and enhanced.	20% AEP primary and 2% AEP secondary Level of Service proposed Not relevant Not relevant
Groundwater quality is maintained and enhanced	Protected by treatment systems and restriction on activities
Part 2 Section 3.1 Avoid allowing new residential or business development in areas known to be vulnerable to a natural hazard, unless any potential risk of loss of life or damage to property is adequately mitigated.	No natural hazards relating to flood risk present.
 Ensure any measures proposed to mitigate a potential natural hazard: Do not lead to or intensify a potential natural hazard elsewhere; and That any other adverse effects on the environment are avoided, remedied or mitigated 	Refer above

izone Industrial Park Stormwater Assessment

Selwyn District Council

3.3.1 Natural Hazards	
 Increased awareness in the community of the risk and nature of natural hazards and how to respond. No new natural hazards created as a result of new residential or business activities or from mitigating existing natural hazards. New residential and business development does not increase risk of flooding from the District's waterbodies. 	Refer above
Reduced natural hazard risk to the community	
Regional Policy Statement	
Chapter 9, Water	
Policy 11 Promote land use practices which maintain and where appropriate enhance water quality.	Restriction likely on Schedule WQL3 activities as part of discharge consent
Policy 12 Activities which could result in a release of hazardous substances should not be located in areas where water resources are vulnerable to contamination unless adequate precautionary measures are implemented to avoid that contamination	As above

Ch 12 Settlement and the Built Environment Policy 2

The use of land for urban development and the physical expansion of settlements should be discouraged and the adverse effects of network utility use and provision minimised where such use would:

- (a) result in the contamination of sources of drinking water.
- (b) have an adverse effect on flows and level regimes of water bodies, including the flow regimes of spring-fed streams.....

Policy 6 ·

Use of land for urban development or the physical expansion of settlements should be discouraged where there are significant adverse effects from natural hazards.

Policy 7

The development and expansion of rural towns should enable people and communities to provide for their wellbeing, health and safety, and have particular regard to the efficient use and development of natural and physical resources.

Robust and proven stormwater treatment system using swales, Humesceptors, raingardens and soakage basins designed to mitigate the effect of contaminants being discharged.

Returns all water to ground as pre-development, hence no effect on springs

Stormwater effects can be mitigated by use of effective treatment system, as demonstrated in earlier stages of development.

By keeping system within the road reserve this makes efficient use of the land

Ch 17 Hazardous Substances Policy 1...

- (b) District/city councils shall have the following particular responsibilities in their own areas for developing objectives, policies and rules relating to the control of the use of land:
- (I) prevention or mitigation of any adverse effects of the storage, use, disposal or transportation, outside the coastal marine area, of any hazardous substances that are not listed under (a) (II) above.
- (ii) prevention or mitigation of any adverse effects, other than adverse effects on the quality of water in water bodies or coastal water, of the storage, use, or disposal, outside the coastal marine area, of the hazardous substances that are listed under (a) (ii) above.
- (iii) prevention or mitigation of any adverse effects, of the transportation, outside the coastal marine area, and other than through a pipe, of the hazardous substances that are listed under (a) (ii) above.

Refer comments above regarding WQL3 activities and effectiveness of treatment systems.

Chapter 12a (RPS Change One)

Policy 7: Development Form and Design Development of Activities in Greenfields, Intensification Areas, and Key Activity Centres should give effect to urban design best practice. The principles of the Urban Design Protocol (Ministry for the Environment, 2005) shall be observed when preparing or assessing any urban development and the following matters shall be provided for:

......provision for the protection of surface and groundwater quality, including appropriate stormwater management facilities to avoid down stream flooding and to preserve or enhance water quality,

Central swales and soakage basins in roundabouts. Sufficient area has been set aside in these elements to accept road runoff. Each lot will manage runoff from within the site, and the lots are sufficiently large to enable this to be achieved.



Policy 8: Outline Development Plans and Changes of	f
Zoning in District Plans	

Development of urban activities within the greenfields areas defined in Map 1 shall occur in accordance with an Outline Development Plan. This Plan shall be prepared when it is proposed to amend the district plan and be included in the district plan to provide for urban activities (Greenfields land). Outline Development Plans shall:

- (vi) show land required for stormwater treatment, retention and drainage paths,
- (j) Show how other potential adverse effects on the environment, including the protection and enhancement of surface and groundwater quality, are to be avoided, remedied or mitigated,

Policy 15: Circumstances for Altering Growth and Sequencing

The Canterbury Regional Council, following relevant territorial authority input, shall initiate a reconsideration of the extent, location and timing of land for development as provided for under Policies 1 and 6 if any of the following situations occur.

In reconsidering the extent, location and timing of land for development any alteration to the Urban Limits, Greenfields, Intensification Areas, or provision for new business land shall give effect to the following:

urban land use, including industrial and commercial activities, does not increase the risk of contamination of drinking water sources, including the groundwater recharge zone for Christchurch's drinking water

Roundabouts and central swales shown

System described in preceding sections

Refer comments above regarding effectiveness of system.

Conclusion

From analysis of the plans and policies that have authority over the proposed development, there are no considerations with regard to stormwater management that represent a barrier to the development proceeding.

Rob Kerr June 2008

End of report



Appendix D

Traffic Impact Assessment

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IZONE Industrial Park Expansion - Proposed Plan Change

I. INTRODUCTION

Selwyn District Council is proposing a Plan Change to the Selwyn District Plan (District Plan) to enable development of approximately 53.5ha of rural land to the east of the existing IZONE industrial park on Hoskyns Road, and to the north-west of State Highway One (SH1) in Rolleston. The Plan Change proposal would result in this land being rezoned from Rural to Business 2 (B2) as defined in the District Plan. The proposed Plan Change will effectively enable the expansion of the existing IZONE industrial park.

This Transportation Assessment assesses the potential transportation effects of the proposal and connections to the existing roading network, including reference to the relevant transportation policies, objectives, and recommendations within the District Plan, the Canterbury Regional Policy Statement (including the Proposed Change No.1), and the Christchurch Rolleston and Environs Transportation Study (CRETS).

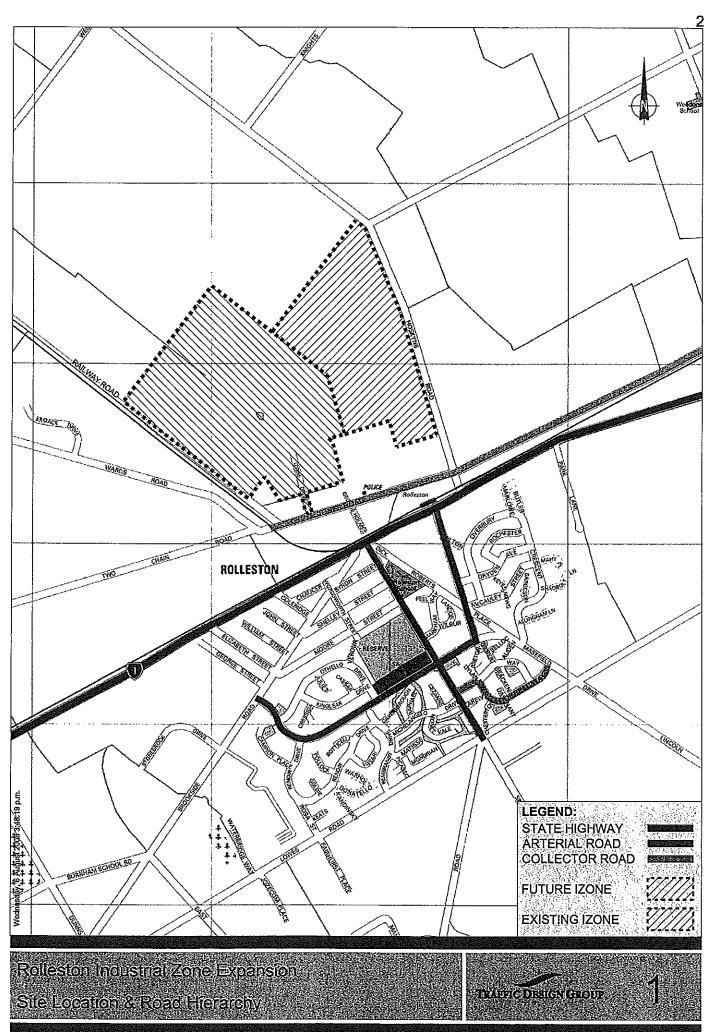
This assessment also considers the implications of travel to and from the site on the adjacent transportation network, and demonstrates how any potential adverse effects can be mitigated or avoided. Whilst this Transportation Assessment includes major coverage of travel by private motor vehicle, it also recognises the importance of other forms of transport. Consequently consideration has also been given to function of public transport, walking and cycling in association with the IZONE expansion.

The IZONE site is located adjacent to a residential population, providing a large employment base and easy access to the strategic road network. Accordingly the Plan Change is considered to be consistent with the objectives of the Land Transport Management Act 2003, which aims to achieve an integrated, safe, responsive and sustainable land transport system.

2. EXISTING TRANSPORT ENVIRONMENT

2.1 Site Location

Figure 1 shows the location of the subject site in relation to the existing IZONE industrial park, the Rolleston Township, and the existing road network, as well as the various roading hierarchy classifications defined in the District Plan. As can be seen the subject site is located immediately east of the existing IZONE industrial park. The site lies to the north-west of SH1 and the Main Trunk railway, with Hoskyns Road forming the eastern site boundary. Hoskyns Road also provides the main access to the area from SH1.

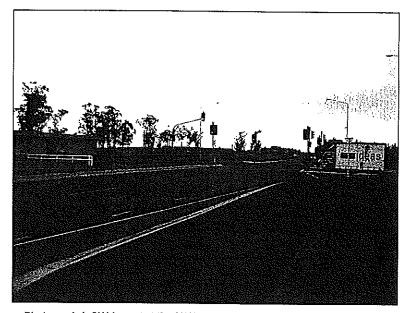


The Main South Road (SH1) is defined in the District Plan as a Strategic Route, providing the main road link along the East Coast of the South Island. Jones Road is defined as a Collector Road and with Railway Road and Hoskyns Road which are unclassified roads in the District Plan, form part of the wider road network servicing the rural area. Rolleston Drive and Tennyson Street are classified as Arterial Roads in the District Plan and provide the main distributor links between SH1 and the Rolleston Township to the south. The only other direct links to and from SH in the vicinity of the site are Brookside Road and Elizabeth Street. The latter connection is due to be closed during 2008 and replaced with an extension of Rolleston Drive.

2.2 Roading Network

2.2.1 State Highway One

SH1 generally has a two lane single carriageway through the Rolleston Township which widens to two lanes in each direction with separated carriageways in the vicinity of the signalised intersections of SH1 with Rolleston Drive and Hoskyns Road. SH1 has a posted speed limit of 100km/hr on its rural sections and an 80km/hr speed restriction through Rolleston. Photograph 1 below shows the layout of SH1 at the intersection of Rolleston Drive.



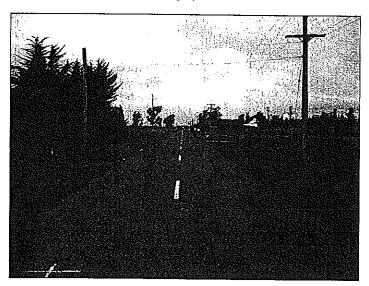
Photograph 1:SH1 Layout at the SH1/Rolleston Drive Intersection (looking East)

The intersections of SH1 with Hoskyns Road and Rolleston Drive have recently been upgraded from "Give Way" controlled T-intersections to signalised intersections. Figure 2 shows the layout of the new signalised intersections which both provide separate right turn lanes and left turn lanes as well as two through traffic lanes in both directions along SH1. A signalised pedestrian crossing is also provided across SH1 at the SH1/Rolleston Drive intersection.

It is noted that there are some differences between the layout shown in Figure 2 and the as-built situation, such as the provision of two right turn lanes from Hoskyns Road rather than the one shown in Figure 2. Similarly the Rolleston Drive approach is shown in Figure 2 as having a shared left and right lane whereas a separate left turn lane has been provided in addition to the two right turn lanes.

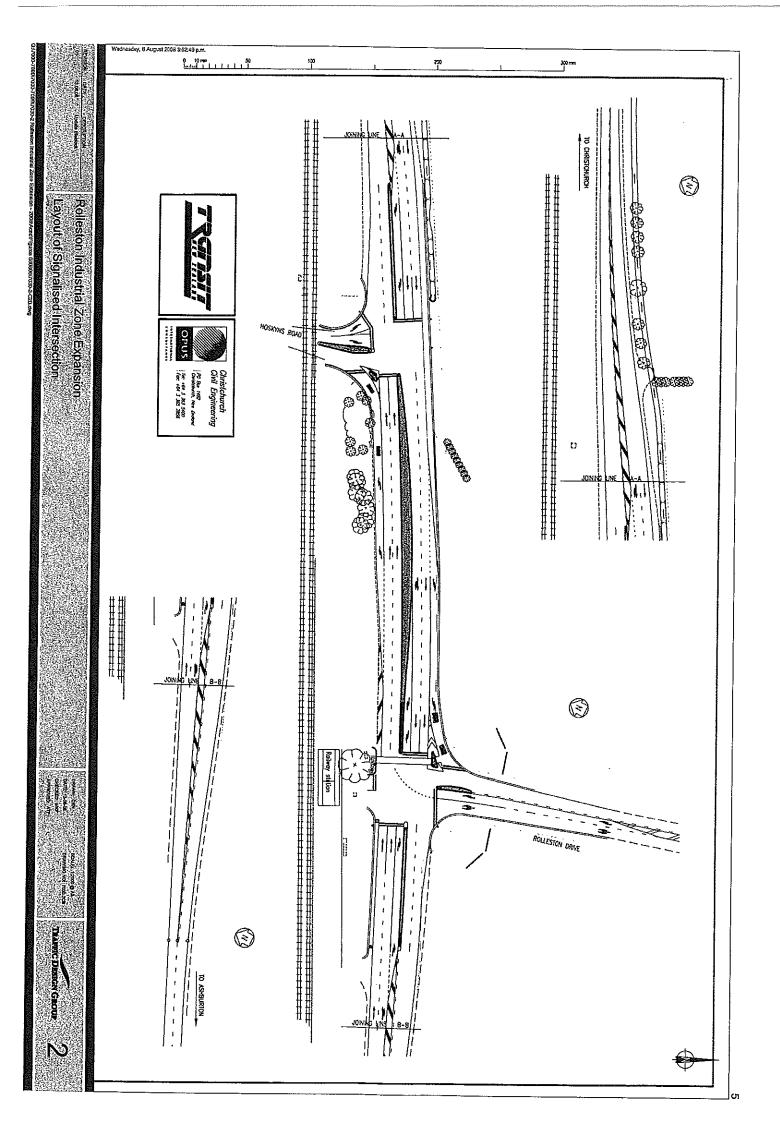
2.2.2 Hoskyns Road

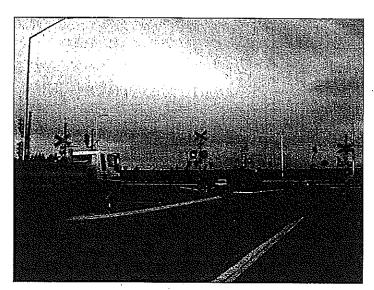
Hoskyns Road in the vicinity of the subject site provides one 3.5m wide traffic lane in each direction. From SH1 to approximately 100m north of Jones Road the posted speed limit along Hoskyns Road is 70km/hr but increases to 100km/hr further to the north. A footpath is provided on the western side of Hoskyns Road between SH1 and Jones Road. Generous grassed berms are also provided on both sides of the carriageway as shown below in Photograph 2.



Photograph 2: Layout of Hoskyns Road

The Main Trunk railway crosses Hoskyns Road between SH1 and Jones Road. The railway crossing is signalised with barrier arms as shown below in Photograph 3.

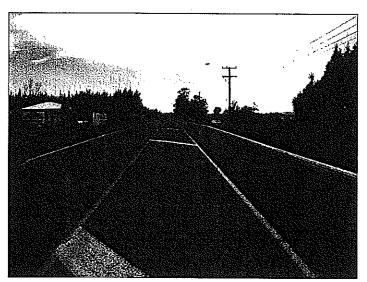




Photograph 3: Rail crossing on Hoskyns Road

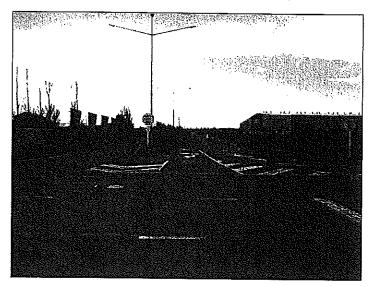
2.2.3 Jones Road

Jones Road provides one 3.5m wide traffic lane in each direction, separated by a 3.1m wide central flush median between Hoskyns Road and Railway Road. Yellow "no stopping" lines are marked on both sides of the carriageway between Hoskyns Road and Railway Road. This section of Jones Road also has a posted speed limit of 60km/hr. A footpath is provided on the northern side of the carriageway between Railway Road and George Holmes Road. Photograph 4 below shows the layout of Jones Road in the vicinity of the subject site:



Photograph 4: Layout of Jones Road

The intersection of Jones Road and IZONE Drive is "Stop" sign controlled with Jones Road having priority. A right turn bay is provided on the Jones Road approach and separate right and left turn lanes are provided on the IZONE Drive approach as shown below in Photograph 5.



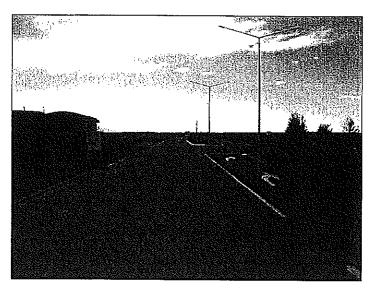
Photograph 5: Jones Road/ IZONE Drive Intersection.

2.2.4 Railway Road

Railway Road in the vicinity of the subject site provides one 3.5m wide traffic lane in each direction. It has a posted speed limit of 70km/hr near Jones Road which increases to 100km/hr to the north of the existing IZONE site. Grassed berms are provided on both sides of the carriageway, but no footpaths are provided.

2.2.5 Existing IZONE Site

IZONE Drive (the primary road within the existing IZONE industrial park) consists of two 6.5m wide lanes separated by a central landscaped median strip. A footpath is provided on the eastern side of the road, with generous berms also provided on both sides of the road. Breaks in the median and right turn bays are also provided to allow for access to key individual sites. A roundabout in the mid-section of the road also enables vehicles to turn to access sites where direct access is blocked by the median strip. This boulevard road has been designed to a high level of amenity and caters well for pedestrians and cyclists through the provision of footpaths and wide traffic lanes. Photograph 6 below shows the general layout of IZONE Drive.



Photograph 6: Layout of IZONE Drive

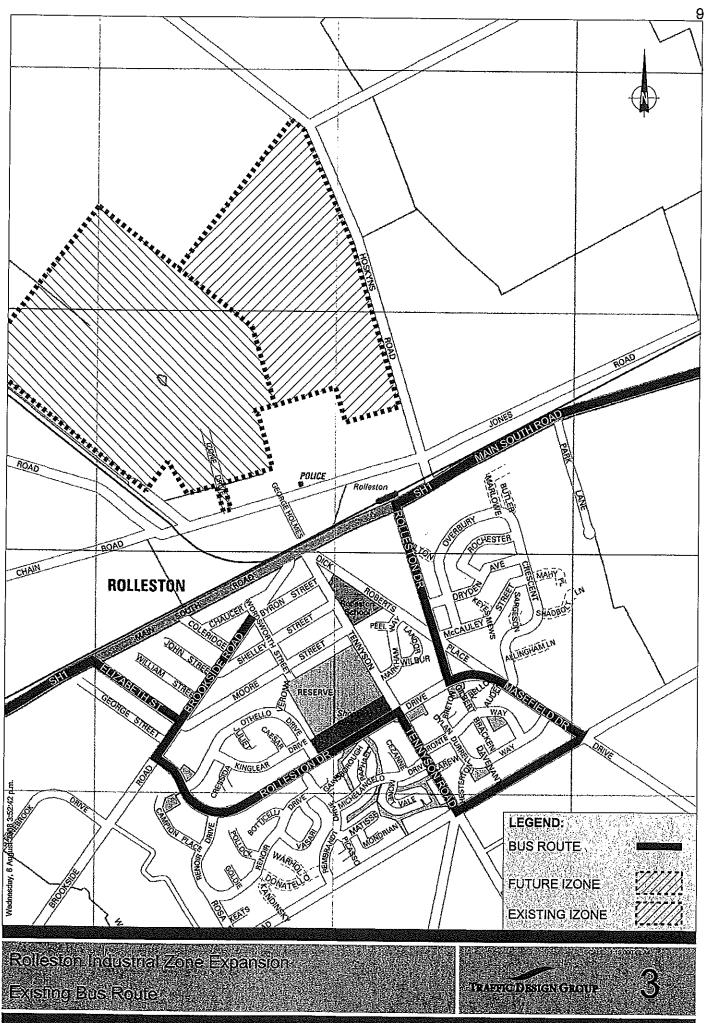
2.3 Public Transport

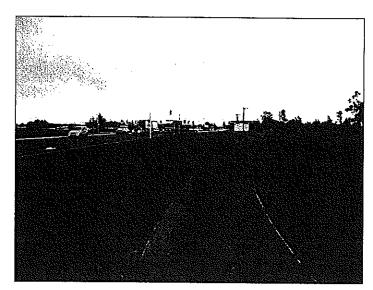
Environment Canterbury operates a public bus service between Burnham, Rolleston and Hornby, with peak period services to and from the Christchurch CBD. The route currently operates along Main South Road to the east and west of Rolleston. The route through Rolleston is shown in Figure 3.

The service typically operates with a weekday frequency of one trip per hour in each direction, with additional services in the morning and evening commuter peaks. Weekend services also operate hourly in each direction, with Sunday services terminating in the late afternoon.

2.4 Pedestrian Facilities

A recently formed pedestrian path exists on the north side of SH1 between the intersections of SH1/Rolleston Drive and SH1/ Hoskyns Road. Photograph 7 below shows this pedestrian path.





Photograph 7: Pedestrian path on SH1

The pedestrian path connects the signalised pedestrian crossing at the SH1/Rolleston Drive intersection to the footpath on the western side of Hoskyns Road. A short pedestrian footpath also exists on the southern side of SH1 between Rolleston Drive and the bus stop to the south of Rolleston Drive (approximately 70m in length). The combined pedestrian facilities on SH1 allow for safe pedestrian movements between the Rolleston Township (via Rolleston Drive) and the existing industrial area located on Jones Road (including IZONE).

2.5 Cycle Facilities

There are no separate cycle lanes on any of the roads surrounding the subject site, however sufficient width is provided within the carriageways of the existing roads (Izone Drive, Jones Road and Hoskyns Road) to allow for safe cyclist movements.

CURRENT TRAFFIC CONDITIONS

3.1 Peak Traffic Flows

Key intersections in the vicinity of the IZONE site (SH1/ Hoskyns Road, SH1/ Rolleston Drive, Hoskyns Road/ Jones Road and Jones Road/ IZONE Drive) were surveyed by Traffic Design Group on Wednesday 27June and Thursday 28June 2007 during the morning (7:00am to 9:00am) and evening (4:30pm to 6:30pm) weekday commuter peak periods to gain an understanding of the existing traffic flows. The results of the survey showed that the morning peak hour was 7:30 to 8:30am and the evening peak hour was 4:30 to 5:30pm.

The surveyed peak hour traffic flows, illustrated by turning movement volumes are presented in Figures 4 and 5.

3.2 Daily Traffic Volumes

Traffic counts obtained from the Selwyn District Council and Transit New Zealand for roads surrounding the subject site are summarised below in Table 1.

LOCATION	AVERAGE DAILY TRAFFIC (VPD)	YEAR
SH1, south of Weedons Ross Road	17,800	2006
Hoskyns Road between SH1 and Jones Road	3,175	2005
Jones Road west of Hoskyns Road	1,142	2006
Tennyson Street, south of SH1	4,038	2007

Table 1: Daily Traffic Volumes

The daily traffic volume on Rolleston Drive was last recorded in 2001, but with the large amount of development in the area over recent times the average daily traffic (ADT) for Rolleston Drive is estimated to be about 5,000 vpd based on peak hour traffic survey results.

The traffic flows along Hoskyns Road and Jones Road will also increase as the existing IZONE site (and the Proposed Plan Change expansion area) is developed and occupied.

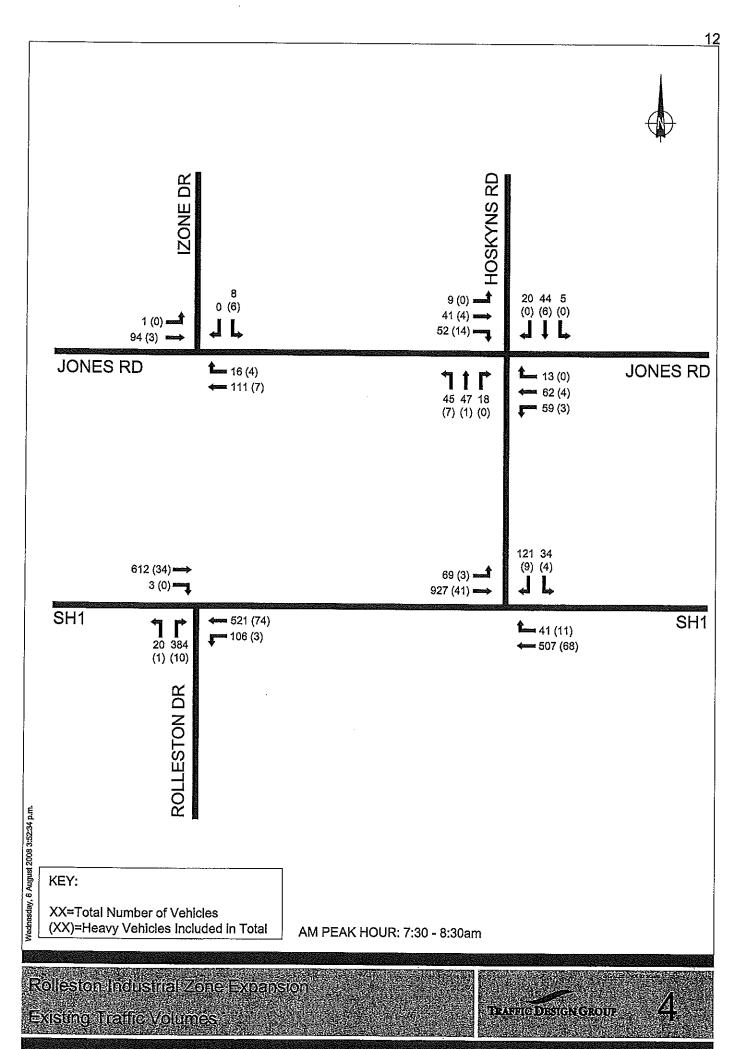
3.3 State Highway Traffic Patterns

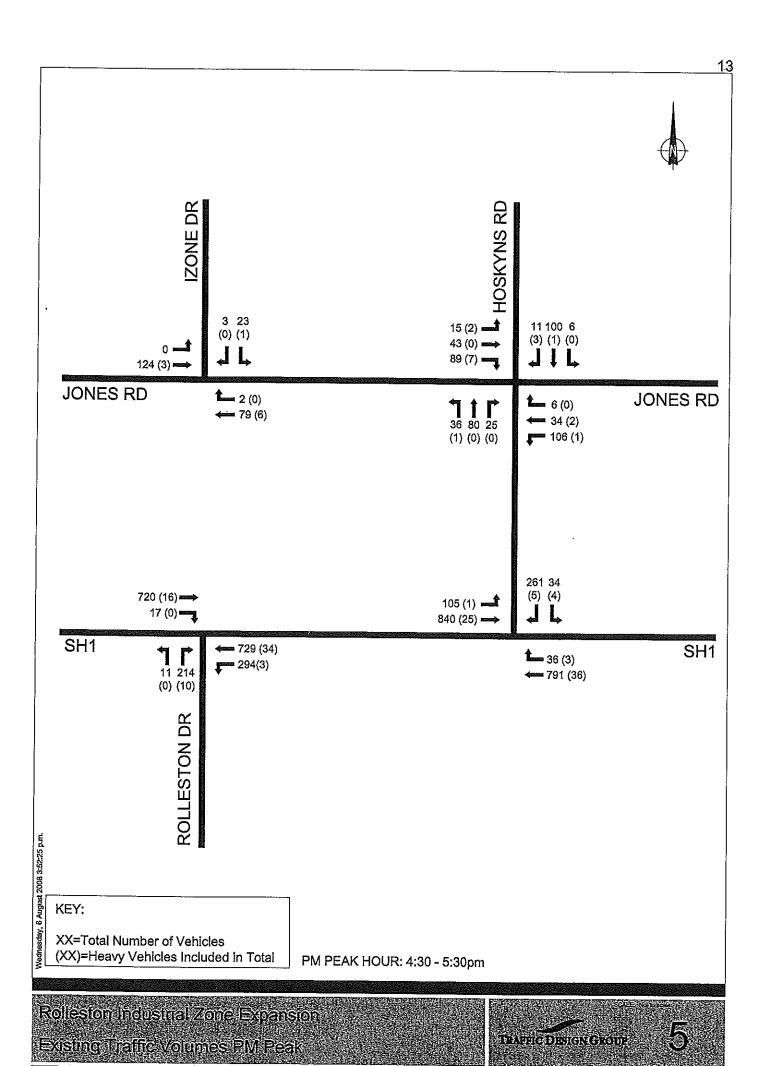
The traffic patterns along SH1 near Rolleston (south of Weedons Ross Road) have been assessed using an automatic traffic count recorded in February 2008 as part of Transit New Zealand's national counting program. The pattern of hour by hour flows in this location over the period of a week is illustrated in Figure 6.

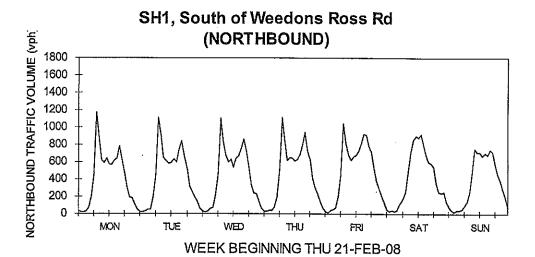
The main features to note from the pattern recorded on this section of highway are:

- the directional flows recorded through the course of the weekdays show distinctive peaks
 in northbound volumes during the morning commuter period of around 1,100 vehicles per
 hour (vph) and also distinctive and consistent peaks of around 900 vph in the
 southbound direction during the evening peak commuter period.
- both Saturday and Sunday patterns display a broad spread of traffic activity through the course of each day, rising to a maximum of approximately 1,600vph (two-way) during the early afternoon on Saturday.
- the highest single directional flow is approximately 1,170vph northbound on Monday during the morning commuter peak period.

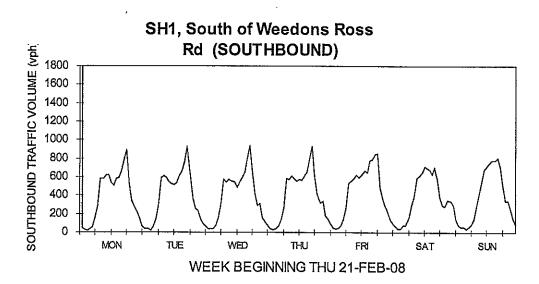
This SH1 traffic pattern exhibits a distinct level of peak hour commuter travel between Rolleston and the major employment centres to the north (Christchurch), while also displaying a steady demand through the middle of the day with activity corresponding to personal, freight and business travel. Moderate recreational traffic flows are also evident during the weekend along this section of the highway.

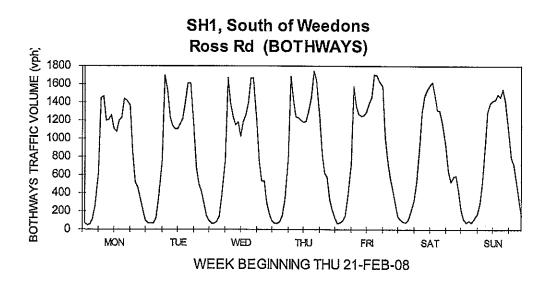












Wednesday, 6 August 2008 3:52:19 p.m.

Rolleston Industrial Zone Expansion

H1 Hourly Volumes





3.4 State Highway Traffic Growth

Figure 7 displays the traffic growth on SH1, calculated from regular traffic counts undertaken by Transit New Zealand on SH1 south of Weedons Ross Road. Annual average daily volumes (AADT) recorded at the count site have increased from 13,470 vehicles per day (vpd) in 2001 to 17,800vpd in 2006. This represents an average linear growth of approximately 4.9% per annum expressed in relation to the 2006 average daily volume.

4. ROAD ACCIDENTS

The Land Transport New Zealand Crash Analysis System (CAS) has been used to identify all reported crashes on the key routes within the study area. The search covered all reported crashes, both injury and non-injury, for the most recent full five year period between 2003 and 2007 inclusive, as well as all available reports for the partial 2008 records.

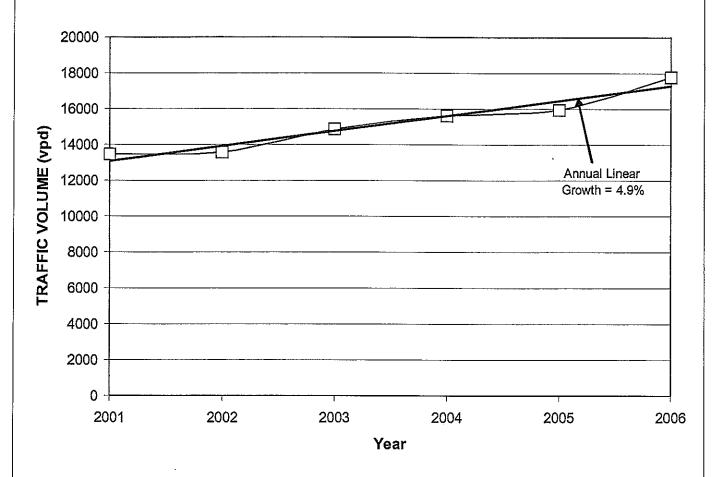
A total of four injury (three minor injury and one fatal) crashes and seven non-injury crashes were reported in close proximity of the subject site.

The above totals include five non-injury crashes and two minor injury crashes occurring within 50m of the intersection of Main South Road (SH1) and Hoskyns Road. The two minor injury crashes and four of the five non injury crashes involved vehicles turning right to/from Hoskyns Road failing to give way to through traffic. It is noted however that all of these crashes occurred prior to signals being installed at the intersection. The other non-injury crash occurred during the period after the upgrade (to traffic signals) of the intersection and was classified as a rear end crash caused by a vehicle crashing into another stopped at the traffic signals.

Of the crashes that did not occur at the SH1/Hoskyns Road intersection, one fatal injury crash occurred at the rail crossing on Two Chains Road (west of Jones Road) and was the result of a vehicle failing to stop at the "Stop" sign and hitting an oncoming train. One minor injury crash was also reported on Jones Road and was the result of a motorcyclist losing control when entering/exiting a private driveway. The remaining non-injury crash occurred at the Jones Road/Hoskyns Road intersection and was the result of a driver on Jones Road losing control of a vehicle and hitting a ditch on the side of the road.

With good sight distance available at the intersections in the immediate vicinity of the subject site, there are no significant engineering deficiencies attributable to these crashes and they are instead primarily the result of driver error. With the upgrading of the SH1 intersections to traffic signal control, this crash record does not suggest that there are any significant underlying safety issues on the roads in the vicinity of the development area.

State Highway 1 Traffic Growth



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Rolleston Industrial Zone Expansion SH1 Traffic Growth



5. STRATEGIC ROADING PROPOSALS

The recently completed Christchurch Rolleston and Environs Transport Study (CRETS) that was commissioned by Transit New Zealand, Selwyn District Council, Christchurch City Council, Environment Canterbury and Christchurch International Airport Limited, focused on identifying deficiencies in the strategic transport network to the west and south of Christchurch and on developing and assessing various options to find a strategy to offset the shortcomings identified. The area assessed included the Rolleston Township.

The principal changes to the roading network recommended by the CRETS study that affect the IZONE proposal are:

- provision of a new grade-separated connection between the Rolleston Township and Rolleston industrial area by connecting Rolleston Drive with Jones Road, near the Hoskyns Road/ Jones Road intersection which would be upgraded to a roundabout. The connection would most likely be a bridge which would include pedestrian and cycle facilities.
- upgrading Hoskyns Road between Jones Road and SH73 to a District Arterial standard to improve access to the north.
- construction of a full diamond, grade-separated interchange at the SH1 / Weedons Road / Weedons Ross Road intersection. This interchange would provide the primary access to the IZONE from the east (Christchurch) via Jones Road and also to the Rolleston Township via Weedons Road.

The development of these roading projects are all indicated as medium term improvements within a possible 2021 timeframe.

The CRETS study also notes that while it is not beneficial for SH1 and the Main Trunk railway to segregate the residential and industrial areas of Rolleston, it is not practical or economical to remove the segregation. Instead a grade-separated connection between the two areas is proposed, allowing travel between the residential and industrial portions of Rolleston to be unimpeded by SH1 traffic flows. The study also suggests that a further grade-separated pedestrian/cyclist link closer to Tennyson Street would help encourage the use of these alternative transportation modes for people working and living in Rolleston.

6. PROPOSED DEVELOPMENT

6.1 General Layout

Figure 8 shows the concept plan for the proposed expansion of the IZONE. The concept plan for the Industrial Park expansion includes a simple road network that extends from the existing network to cover the area of the proposed Plan Change. The concept plan allows for possible further extensions of the road network to additional areas to the north of the current zone and to the east of Hoskyns Road associated with potential future expansion of IZONE. The road network proposed allows for good road connection and integration with the surrounding road network and adjoining land.

CONCEPT ROADING
JUNE 2008 DATA CIU ALITY STATEMENTS

RECENTIVE DATA
THE PROPERT DAT MATERIAN MATERIANAN SECONDARY POAD TYTHE LEGISZUNYS THIK STOP RESIDENT TO WELLT PROPERTY PRO 3 C C Z BOUTEVARDROWD 0 FUTUREIZINE EXISTINGIZONE 10x WIDEPEDESTRIAN

Rolleston Industrial Zone Expansion
Proposed Internal Layout

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TRAFFIC DESIGN GRO

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Within the site for this Plan Change application, the proposed road network connects to the existing road network via a primary road that links with IZONE Drive and Hoskyns Road. The connections of the site to the existing road network allow for good integration of the site with its surrounds, and allows for traffic to be distributed efficiently onto the existing network at more than one point. The structure of the new road network within the site is intended to be consistent with the existing IZONE roads in terms of the road layout, hierarchy, intersection form, and carriageway standards.

Footpaths are proposed on at least one side of all the roads within the development to ensure that the site is a pedestrian friendly environment, and wide carriageway widths provide a convenient environment for cyclists. The internal road layout of the extended zone area is also beneficial from a walking (and cycling) view point as it results in reduced travel distances due to the high level of connectivity of the internal roads.

All new roads will have a posted speed limit of 50km/hr to be consistent with the speed limit within the existing IZONE site.

6.2 Primary "Boulevard" Road

To accommodate truck movements the primary "boulevard" road within the development will consist of two 6.5m wide lanes which will be separated by a central landscaped median. Landscaped berms will be provided on both sides of the carriageway along with a footpath on one side of the carriageway.

Given the industrial/business nature of the zone, regular breaks will be provided in the median to facilitate direct vehicle movements to and from major individual allotments. Elsewhere u-turns can be executed as necessary at the breaks in the median and roundabouts proposed at the main internal intersections.

The boulevard roads provide the key gateways to the IZONE site and also allow for the expansion of the primary road network should land further to the north and the east be developed in the future.

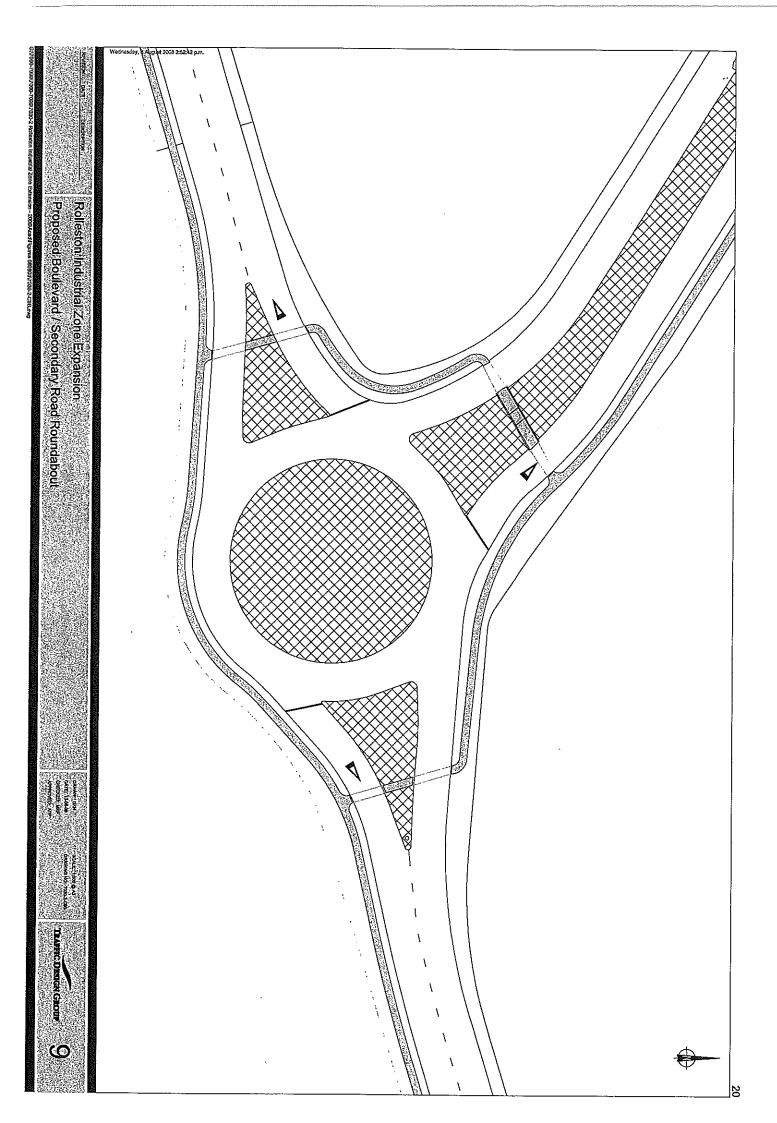
6.3 Secondary Roads

The secondary road network within the subject site will consist of roads with a 12m wide, two lane, undivided carriageway. Again generous wide berms are provided on both sides of the road with a footpath also provided on one side of the road.

Whilst secondary roads do not have the landscaping features of the primary roads, they will be of sufficient capacity appropriate to provide connections between the primary roads.

6.4 Internal Connections

For the existing IZONE site and the expansion proposed by this Plan Change the boulevard roads will be connected to the secondary roads by roundabouts at key locations. Figure 9 shows the general standard for the roundabout connections which have been designed to allow for safe and easy heavy vehicle manoeuvring.



Priority controlled intersections will also be used within the site to connect secondary and primary roads where appropriate. These intersections will again be designed to allow for the safe and efficient movement of heavy vehicles.

6.5 External Connections

One road is proposed to connect the area covered by this Plan Change to Hoskyns Road. The intersection will initially be in the form of priority controlled T-intersections with Hoskyns Road having priority, and will be of a similar layout to the existing IZONE Drive/Jones Road "Stop" sign controlled intersection. The form of the intersection will also allow for connection with the land to the east of Hoskyns Road in the future should this be developed for business purposes (which is noted as the desire of the property owners). If expansion to the east (in the longer term) occurs this intersection could be developed into roundabout if necessary. The proposed form of this intersection and the future of Hoskyns Road is discussed further in Section 6.6.

There is ample sight distance along Hosykns Road at the proposed intersection location as a result of the straight and flat alignment of Hoskyns Road. Accordingly the intersection is expected to operate safely and efficiently.

It is also expected that the speed limit along Hoskyns Road in the vicinity of the site will be reduced from 100km/hr to 70km/hr to be consistent with the existing speed limit on Jones Road near the existing IZONE access intersection.

Currently SH1 and the railway line split the Rolleston urban area, with industrial land uses located to the north, and residential land uses located to the south. There is only one existing connection to the northern side, which is via the intersection of Hoskyns Road and SH1. The Plan Change proposal does not include provision for any new connections between the two parts of Rolleston.

In the longer term it is noted that the CRETS proposals indicate a grade-separated connection with a link from Rolleston Drive to Jones Road being provided over SH1. This link would effectively replace the existing connection between Rolleston and the IZone which is currently provided by the two sets of traffic signals on SH1. Access to SH1 itself would be provided by the interchange at Weedons Ross Road.

6.6 Hoskyns Road Upgrade

Under the CRETS proposals it is intended that Hoskyns Road be upgraded between SH73 and Jones Road to a District Arterial standard.

As part of the current Plan Change the developers propose to upgrade the section of Hoskyns Road from the Jones Road/Hoskyns Road intersection to the proposed new IZone access to Hoskyns Road.

The proposed cross-section includes:

- One 3.5m wide traffic lane in each direction
- One 2.5m wide parking lane on the western side

- One 2.0m wide off-road shared pedestrian/cycle path on the western side
- · A 0.5m sealed shoulder width on the eastern side

This cross section which has an overall width of 10m plus a 2m off-road cycle/pedestrian path has been designed to provide an appropriate standard of access, parking and pedestrian and cycle provision for the proposed development on the western side of Hoskyns Road. The eastern side of Hoskyns Road is undeveloped rural land and it is proposed that this side of the carriageway will remain as a 3.5m carriageway with a 0.5m sealed shoulder which can be upgraded if and when development of that land occurs.

The proposed design of Hoskyns Road is shown in Figure 10. This also includes the proposed design of the Hoskyns Road/IZone intersection which includes left and right turn lanes on Hoskyns Road and a footpath/cycle connection into the IZone site.

At present all access to the IZone site is via the IZone Drive/Jones Road intersection. Review of Figure 8 which shows the layout of the existing IZone and the proposed expansion, indicates that it is likely that as the new areas are occupied the focus for access to IZone will move away from Jones Road and towards Hoskyns Road.

6.7 Hoskyns Road/Jones Road Intersection Upgrade

Under the CRETS proposals the long-term future of the Jones Road/Hoskyns Road intersection is a two-lane roundabout. This roundabout is shown in Figure 11 with other CRETS proposals for the area.

The analysis presented in subsequent sections of this report demonstrates that this roundabout is not required to accommodate the traffic demands associated with the Plan Change even with full development by 2021.

Sufficient capacity is provided by an upgraded priority intersection which has been designed to improve the geometry of this intersection and enhance its capacity. The proposed upgrade is shown in Figure 12 and includes:

- Exclusive right turn lanes on the Hoskyns Road (North), Hoskyns Road (South) and Jones Road (West) approaches
- An exclusive left turn lane on the Jones Road (East) approach
- Widening of some corner radii

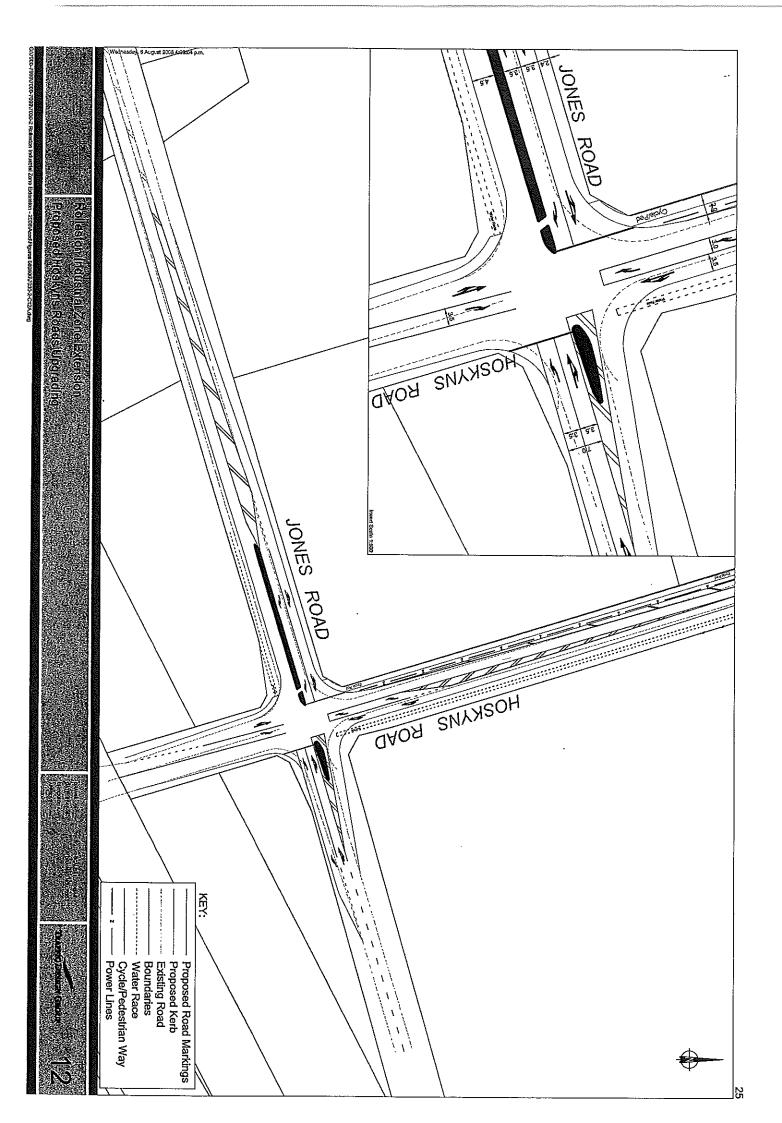
The intersection has been designed considering the pattern of traffic volumes expected in the year 2021, the requirements of heavy vehicles turning through the intersection and the needs of pedestrians crossing the intersection.

The intersection has been designed to ensure that heavy vehicles can perform all turning movements whilst staying in their allocated lane.

Confirmation that this intersection layout has sufficient capacity to accommodate the expected traffic demands at the year 2021 at an acceptable level of service is provided in later sections of this report.

公司 Proposed Road Markings
Proposed Kerb
Existing Road
Boundaries
Water Race
Cycle/Pedestrian Way Power Lines

Izome Proposed Rolleston Access Rolleston Industrial Zone Expansion òн Weedons/SH1 CHRISTCHURCH ROLLESTON
AND ENVIRONS berchange X Kirry ROLLESTON TRANSPORT STRATEGY FINAL REPORT TRAMSPORTATION STUDY A (Bus altroort 17-06-117



In earlier stages of this project a single-lane roundabout was proposed as a possible option for this intersection. Further analysis of the likely distribution of IZone traffic movements, the overall design of Hoskyns Road and consideration of the potential interaction of the Jones Road/Hoskyns Road intersection with the railway line has lead to the upgraded priority intersection now being preferred.

The separation between the railway crossing and the Jones Road/Hoskyns Road intersection is approximately 80m. A roundabout introduces some potential for traffic to queue back from the roundabout, in this case on the Hoskyns Road approach to Jones Road from the south, and across the railway line. Although analysis showed that the queue length generated by a single lane roundabout was generally much shorter than this, the option of Hoskyns Road retaining priority and therefore having no potential to queue back over the railway was still considered preferable.

For this reason it is also considered that a long-term solution of traffic signals may be preferable to a large roundabout. The advantage of traffic signals being that when a train is approaching, the traffic signals at surrounding intersections can be programmed to clear areas near the railway crossing.

Either of these long-term solutions, the large roundabout or traffic signals can be constructed when they are justified and/or when the various other CRETS proposals take effect. In the interim the proposed upgraded priority intersection has sufficient capacity to accommodate the traffic generated by the Plan Change proposal.

TRAFFIC GENERATION AND DISTRIBUTION

7.1 Land-Use Projections

It is anticipated that the industrial expansion proposed by this Plan Change will be developed from 2010 and be fully occupied by about 2021.

As a base estimate of the employment potential of the extended IZONE, the land-use projections for the area adopted for the CRETS modelling of 2021 have been utilised. The projection is that Rolleston will consist of approximately 5,300 households and approximately 2,100 jobs. This is based on a ratio of 0.40 jobs per household for the area. The CRETS study also used a projected total employment for the existing IZONE site (when fully occupied) and industrial area north of SH1 of 1,250 in 2021, which equates to approximately 11.4 employees per hectare of developable area.

The existing industrial area on Jones Road which is not part of IZONE accommodates approximately 200 employees at a density of about 5 per ha. It is predicted that the existing IZONE (when fully occupied) will have a higher employee density than this area, given that this area is dominated by a high proportion of rural service activities. The IZONE site is expected to attract more industrial based activities and therefore a higher employee density is anticipated. The CRETS projection for the existing IZONE site is equivalent to 905 employees in 72ha of developed area (that is allotment area excluding road reserve), which equates to approximately 13.5 employees per ha.

In order to check the validity of the CRETS employment prediction for the IZONE site, overseas traffic generation databases have been researched. Using average rates reported in the Institute of Transportation Engineers (USA) Trips Generation Guide 6th Edition (ITE Guide), the employee density

varies from about 36 employees per ha for warehousing activities to 47 employees per ha for industrial parks. The Roads and Traffic Authority (NSW) "Guide to Traffic Generating Developments" (RTA Guide) document suggests an employee density of 28 employees per ha for industrial parks. These employee densities are somewhat higher that that adopted for the CRETS study, but generally relate to industrial areas in major urban areas and therefore form an upper limit for Rolleston.

The employee density of The Warehouse's large distribution centre located in the existing industrial area is approximately 10 employees per ha (70 employees in 7ha) which is more consistent with that adopted for the CRETS modelling. The use of densities lower than what the overseas data indicate can hence be justified on the basis that the site is more likely to accommodate less intensive development that would be more viable in the IZONE where property costs will be lower as a result of its distance from Christchurch.

7.2 Expected Traffic Generation

Trip generation rates for industrial parks such as IZONE can also be highly variable, and in order to estimate the likely traffic generation characteristics of the subject site, land-use traffic generation data published in both the ITE Guide and RTA Guide has been reviewed. The following table presents the traffic generation rates determined for each of the weekday morning and evening commuter peaks, and the total daily generation.

		TRAFFIC GENERATION RATES				
LAND USE	SOURCE	AM PEAK (VPH/EMPLOYEE)	PM PEAK (VPH/EMPLOYEE)	DAILY (VPD/EMPLOYEE)		
Industrial Bods	RTA	0.32	0.37	2.30		
Industrial Park	ITE	0.49	0.46	3.34		
Light industrial	ITE	0.44	0.42	3.00		
Warehouse	ITE	0.51	0.59	3.89		
Manufacturing	ITE	0.40	0.37	2.10		
ZONE Adopted Rate		0.50	0.45	3.0		

Table 2: Industrial Park Traffic Generation Rates

Based on the overseas data, traffic generation ratios of 0.5 and 0.45 vph/employee and 3.0 vpd/employee have been adopted for the morning peak, afternoon peak and whole day respectively. The ITE data shows that directional split is approximately 80% in / 20% out during the morning peak, and 20% in / 80% out during the evening peak. These spits have been adopted in the analysis of the expansion of the IZONE site proposed by this Plan Change.

As noted previously it is expected that the expanded IZONE site will be fully developed and occupied by 2021. A summary of the ultimate (2021) traffic generation of the expanded IZONE site, together with the separate predictions for the existing and additional areas is provided in the following table:

	DEVELOPABLE	EMPLOYEES/	TOTAL	TRAFFIC GENERATION (IN +OUT)			
AREA	AREA (HA)	HA	TOTAL EMPLOYEES	AM PEAK (VPH)	PM PEAK (VPH)	DAILY (VPD)	
Existing IZONE site	75.9	13.5	1,025	513	461	3,075	
Proposed Plan Change Area	49.7	13.5	671	335	302	2,013	
Total	125.6		1,696	1,013	912	6,079	

Table 3: Industrial Park Traffic Generation

The proportion of developable area for the proposed Plan Change site has been estimated to be similar to that for the existing IZONE site in which approximately 93% of the total area is available for development.

The traffic generation of the fully developed, extended IZONE is hence predicted to be approximately 1,013 vph in the morning peak, 912vph in the evening peak and 6,079 vpd.

7.3 Traffic Distribution

The traffic distribution model formulated for the site takes into consideration the location of the site with respect to the surrounding residential centres, and the strategic road network. Output from previous modelling work has been considered in determining the trip distribution. The calculated generalised distributions of trips to and from the expanded IZONE industrial park at full development are shown in Figures 13 and 14 for the morning and evening peaks respectively. The addition of the trips associated with the industrial rezoning also allows for a reduction in the proportion of movements to the east as trips would have otherwise been made to employment areas in Christchurch.

As can be seen in Figures 13 and 14, the majority of the trips generated by IZONE in the peak periods are expected to be shared between Rolleston and Christchurch.

8. TRAFFIC ASSESSMENT

Given that the majority of the traffic generated by the development proposal will utilise SH1 for travel to/from Christchurch and Rolleston, it has been identified that the greatest potential effect of the development is its effect on the operation of the SH1 intersections in Rolleston.

As the SH1 intersections with Hoskyns Road and Rolleston Drive are closely spaced and therefore include a high level of traffic interaction, the operation of the intersections has been assessed using microscopic simulation modelling.

Rolleston industrial Zone Expansion
Izone Traffic Distribution

Wednesday, 6 August 2008 3:55:27 p.m.



Rolleston Industrial Zone Expansion Izone Traffic Distribution



The microscopic simulation models have been developed using PARAMICS software. Simulation represents traffic flow within a network by simulating individual vehicles and their interactions with other vehicles and the roading environment. As with real traffic conditions, these modelled interactions are probabilistic and vary each time the model is run. To obtain statistically meaningful results, all network performance measures included in this report are averaged from five simulation runs.

The modelling process carried out involved developing calibrated base models of the network for the weekday morning and evening peak periods which were then used to test traffic demand changes associated with development of the proposed zone.

8.1 Modelled Scenarios

The simulation models developed by Traffic Design Group to assess the effects of the existing IZONE industrial park have been updated, re-calibrated and expanded to evaluate the effects of the fully developed expanded IZONE site for the year 2021. The following travel demand scenarios were assessed to determine the effects of the development proposal:

- Existing Demand, based on 2007 traffic surveys (AM & PM Peak)
- 2021 Demand without Plan Change (AM & PM Peak)
- 2021 Full Development Demand (AM & PM Peak)

The 2021 future year models include the signalised intersections on SH1, but not the grade-separated connection between Jones Road and Rolleston Drive or any of the other proposals recommended by the CRETS study. The Full Development model also includes the upgrades at the Hoskyns Road/IZone intersection and the Hoskyns Road/Jones Road intersection.

The Existing Network + Existing Demands models were developed as a calibrated base scenario to which future traffic volume predictions were added in order to develop the Existing Network + 2021 Demand without the Plan Change models (which included the full development of the existing IZONE industrial park).

The future traffic volumes travelling along SH1 through Rolleston were predicted from existing growth trends and from comparison with previous modelling. Other traffic that will use the SH1 intersections in Rolleston, excluding traffic generated by the industrial park, was determined by consideration of the surrounding land-use projections used for the CRETS model.

The Existing Network + 2021 Full Development Demand scenarios assess how the road network would operate in 2021 with the full development of the expanded IZONE site. It is noted that for this scenario the traffic generated by the expansion area has been simply added to the 2021 base models, and no allowances have been made for diverted or pass-by trips, hence resulting in a conservative and high travel demand assessment.

8.2 Traffic Capacity Analysis

The various simulation models were used to determine the delays experienced by vehicles in the vicinity of the development site. The effect of the development proposal on the key intersections and travel paths through the study area are summarised as follows:

8.2.1 Key Travel Paths

The change in average delay as a result of the development proposal on key paths through the two sets of signals on SH1 in Rolleston during the morning and evening peak hours is summarised in the following tables. This analysis assesses the overall performance and level of service of the two intersections, particularly focussing on key movements which travel through both intersections.

	LENGTH	BASE 2021 DEMAND			OPMENT 2021	DIFFERENCES		
PATH	(KM)	NUMBER OF JOURNEYS	AVERAGE DELAY (S/VEH)	NUMBER OF JOURNEYS	AVERAGE DELAY (S/VEH)	NUMBER OF JOURNEYS	AVERAGE DELAY (S/VEH)	
SH1 Eastbound	4.5	931	50	925	48	-5	-2	
SH1 Westbound	4.5	874	40	876	45	2	5	
Rolleston Drive to Hoskyns Road	0.5	282	27	531	38	249	11	
Rolleston Drive to west on SH1	0.4	38	14	39	24	1	11	
Rolleston Drive to east on SH1	1.0	513	44	514	46	1	2	
Hoskyns Road to Rolleston Drive	0.5	151	38	182	35	31	-3	
Hoskyns Road to west on SH1	0.4	63	42	65	43	2	1	
Hoskyns Road to east on SH1	0.6	62	28	77	25	16	-3	

Table 4: Performance of Key Paths AM Peak (2021) 7:30-8:30am

As shown in the above table the addition of the development generated traffic to the road network will have a negligible impact on through traffic travelling along SH1 during the AM peak period. Only the average delay for vehicles travelling between Rolleston Drive and Hoskyns Road will increase noticeably by approximately 11 seconds. This is a result of a substantial proportion of the traffic generated by the site in the AM peak being inbound from the Rolleston Township. Small increases in delays will also be experienced by vehicles accessing SH1 from Rolleston Drive as a result of increased traffic volumes utilising this intersection.

	LENGTH	DO-MIINIMUM NETWORK + 2021 DEMAND			ETWORK + FULL ENT DEMAND	DIFFERENCES		
PATH	(KM)	NUMBER OF JOURNEYS	AVERAGE DELAY (S/VEH)	NUMBER OF JOURNEYS	AVERAGE DELAY (S/VEH)	NUMBER OF JOURNEYS	AVERAGE DELAY (S/VEH)	
SH1 Eastbound	4.5	1043	39	1039	47	-4	8	
SH1 Westbound	4.5	930	41	925	48	-5	7	
Rolleston Drive to Hoskyns Road	0.5	92	36	102	33	10	-3	
Rolleston Drive to west on SH1	0.4	18	12	17	11	1	-1'	
Rolleston Drive to east on SH1	1.0	250	48	248	50	-2	2	
Hoskyns Road to Rolleston Drive	0.5	361	34	491	32	130	-2	
Hoskyns Road to west on SH1	0.4	166	33	178	29	12	-4	
Hoskyns Road to east on SH1	0.6	140	34	179	28	39	-6	

Table 5: Performance of Key Paths PM Peak (2021) 5:00-6:00pm

As shown in the above table the addition of the development generated traffic to the road network will have a minimal impact on through traffic travelling along SH1 during the 2021 PM peak hour. The additional traffic also has a minor impact on journey times for vehicles travelling between Hoskyns Road and Rolleston Drive.

Overall the analysis confirms that the intersections of Rolleston Drive/SH1 and Hoskyns Road/SH1 have sufficient capacity to accommodate the expected traffic volumes associated with the proposed Plan Change in the year 2021. The greatest average delay for any movement, all of which pass through two signalised intersections, is 50 seconds/vehicle. This is considered to be an appropriate level of service. Furthermore the difference between the proposed Plan Change scenario and the base 2021 scenario has been shown to be very small.

8.2.2 Site Access Intersections

In order to provide thresholds for acceptable intersection performance against which to assess the development traffic effects, reference has been made to the Canterbury Regional Land Transport Strategy 2005-2015 (RLTS). The RTLS defines the minimum level of service (LOS) that should be maintained within the strategic road network. LOS measures range from LOS A which is free flow conditions to LOS F where traffic flow has broken down.

The performance measures for LOS are taken from the Highway Capacity Manual (HCM) and are based on average delay for vehicles at the intersections.

The simulation analysis clearly demonstrated that the site access intersections on Jones Road and Hoskyns Road will provide efficiently for 2021 full development demands. These intersections will be

"Stop" sign controlled with Jones Road and Hoskyns Road having priority. The AM and PM peak intersection performance for the Jones Road / IZONE Drive intersection and the site access intersection on Hoskyns Road are summarised below in Tables 6 and Table 7:

	2021 AM	PEAK (7:30-8:30	AM)	2021 PM PEAK (5:00-6:00PM)			
PRIORITY CONTROLLED INTERSECTION OF JONES ROAD AND IZONE DRIVE		VOLUME (VPH)	AVERAGE DELAY (SEC/VEH)	LOS	VOLUME (VPH)	AVERAGE DELAY (SEC/VEH)	Los
Jones Road West Approach	Left	41	8	Α	10	1	A
	Through	111	3	A	126	1	Α
IZONE Drive Approach	Left	46	3	Α	150	3	A
	Right	55	6	A	72	2	Α.
Jones Road East Approach	Right	246	4	Α	26	3	Α
	Through	152	2	A	97	2	Α

Table 6: Jones Road / IZONE Drive Intersection Performance (2021)

5	2021 AM	PEAK (7:30-8:30	AM)	2021 PM PEAK (5:00-6:00PM)			
PRIORITY CONTROLLED INTERSECTION OF HOSKYNS ROAD AND SITE ACCESS ROAD		VOLUME (VPH)	AVERAGE DELAY (SEC/VEH)	LOS	VOLUME (VPH)	AVERAGE DELAY (SEC/VEH)	Los
Hoskyns Road South Approach	Left	332	6	Α	52	3	Α
	Through	205	0	Α	115	0	Α
Site Access Road Approach	Left	72	6	Α	36	2	Α
	Right	24	3	A	352	12	Α
Hoskyns Road North Approach	Right	23	2	Α	31	1	Α
	Through	137	0	A	136	0	Α

Table 7: Hoskyns Road / Site Access Road Intersection Performance (2021)

As can be seen in the above tables both access points are expected to operate at an excellent level of service during both peak hour periods.

8.2.3 Jones Road / Hoskyns Road Intersection

The results of the simulation analysis for the Jones Road /Hoskyns Road intersection are shown in the below table:

PRIORITY CONTROLLED INTERSECTION OF HOSKYNS ROAD AND JONES ROAD		2021 AM PE	AK (7:30-8:30	AM)	2021 PM PEAK (5:00-6:00PM)			
		VOLUME (VPH)	AVERAGE DELAY (SEC/VEH)	Los	VOLUME (VPH)	AVERAGE DELAY (SEC/VEH)	LOS	
	Left	297	6	Α	68	2	A	
Hoskyns Road South Approach	Through	418	6	A	145	1	A	
	Right	13	1	A	24	5	A	
Jones Road East Approach	Left	71	2	Α	135	25	С	
	Through	33	8	Α	41	. 21	С	
Pressur	Right	91	8	Α	7	9	В	
	Left	14	2	A	13	2	Α	
Hoskyns Road North Approach	Through	127	2	Α	469	7	Α	
	Right	67	4	Α	12	2	Α	
	Left	29	4	Α	13	6	Α	
Jones Road West Approach	Through	8	6	Α	49	15	В	
11	Right	126	8	Α	212	27	С	

Table 8: Hoskyns Road / Jones Road Intersection Performance (2021)

The tables show that the Jones Road /Hoskyns Road intersection, with the proposed upgrade, will provide efficiently for 2021 full development demands during the AM and PM peak periods. All movements experience LOS C or better which is within the recommended minimum level of service guidelines described in the RLTS.

8.2.4 Traffic Capacity Analysis Conclusions

The analysis has shown that the existing road network surrounding the site, with the upgrade of the Hoskyns Road/Jones Road intersection described earlier in this report, can accommodate the traffic expected to be generated by the proposed development at an acceptable level of service.

In particular the analysis has demonstrated that the two signalised intersections on SH1 at Hoskyns Road and Rolleston Drive can accommodate the expected traffic demands in the year 2021 at an acceptable level of service in their existing form.

Beyond this analysis year there are various proposals such as those outlined in CRETS that will take effect. In the longer term, the proposed grade-separated connection between Rolleston and the Hoskyns Road area will provide for travel between the IZone and Rolleston and the proposed interchange at Weedons Ross Road will provide for travel between the IZone and SH1. CRETS also includes some provisions for alternative modes.

9. OTHER TRANSPORT MODES

Consideration has been given to the needs and effects of other transport modes at the local level within the expanded IZONE site as well as at the wider District level in terms of integration with the surrounding area. For a development of this size there is a need for careful consideration of internal transport functions and facilities.

9.1 Pedestrians and Cyclists

The operation of the internal roading network has been specifically designed to incorporate the need of all road users including pedestrians and cyclists. In particular, the IZONE site includes a simple road network with pedestrian linkages which have been designed to enable efficiencies from reduced travel distances to encourage walking and cycling.

As noted previously, all internal roads will include footpaths on one side of the carriageway and the wide traffic lanes have been designed to safely accommodate cycle movements.

Currently there are reasonable facilities for pedestrians and cyclists to travel between the Rolleston Township and IZONE. Existing pedestrian and cyclist infrastructure was described in Section 2.4 and 2.5 of this report. Figure 15 summarises the existing pedestrian and cycle infrastructure in the area.

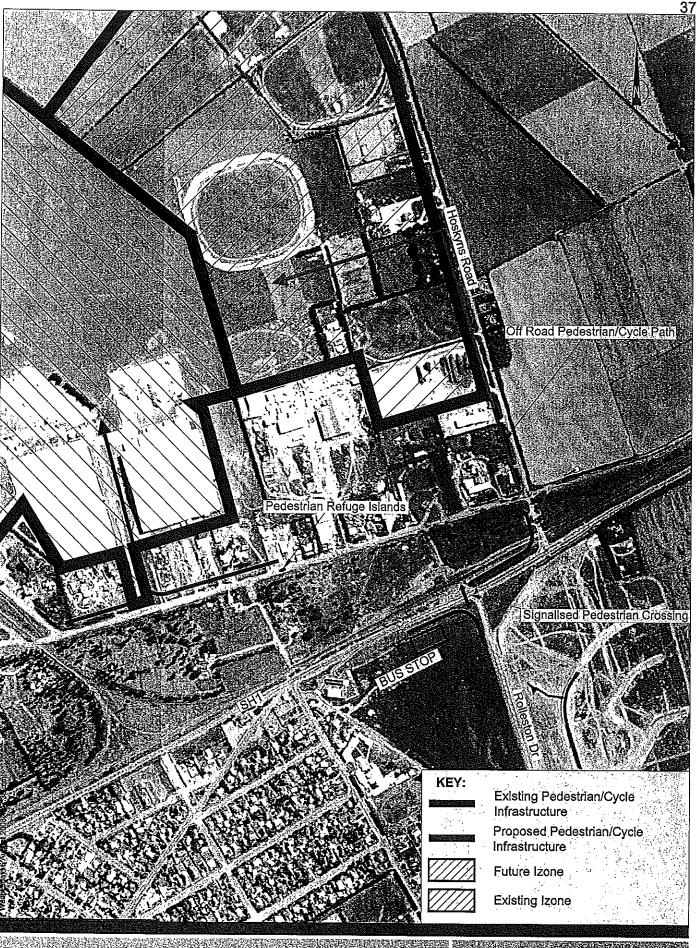
In addition to the internal pedestrian and cyclist provisions within the site, an upgrade of Hoskyns Road is proposed that will include an off-road pedestrian and cycle path along the western side, connecting between the end of the existing footpath and the proposed new IZone access. This proposal is also illustrated in Figure 15.

The long term intentions for the area outlined in CRETS include a grade-separated connection over SH1 which would provide a further connection between the IZone area and Rolleston.

9.2 Public Transport

While the proposed Plan Change rules cannot regulate for specific public transport services for IZONE, the design concept developed has been framed to support the introduction of such a service. The proposed internal road network has good connectivity and in accordance with Selwyn District Council recommendations regarding public transport, the internal road network is off sufficient geometric and pavement strength standard to accommodate public transport vehicles to allow routes to be provided through the area in the future.

In the long term it is envisaged that the bus service would utilise the proposed grade separated connection across SH1 provide for local trips between the Rolleston Township and IZONE as well for trips beyond Rolleston.



Rolleston Industrial Zone Extension Indicative Pedestrian & Cycle

Tractic design Group

10. ROAD SAFETY EFFECTS

The establishment of the expanded IZONE industrial area will have the following main road safety advantages over a comparable extent of industrial development elsewhere in the District:

- the design concepts for the road network have focused on a general structure that has simple intersections and quality facilities for pedestrians and cyclists (through the provision of footpaths and wide carriageways).
- by limiting access to the external road network to two high standard connections on Hoskyns Road, the number of potential traffic conflicts can be controlled to specific locations where high standards of intersection design can minimise the effects.
- the site is located with easy access to SH1
- the site is separated from the Rolleston Township, hence heavy vehicle movements within the residential area and near community facilities are minimised.
- any travel between IZONE and Christchurch will utilise SH1 for practically all its length.
 SH1 is designed as a high-standard, major arterial route to carry high volumes of traffic.

These factors demonstrate that IZONE, a comprehensive well designed industrial park, is likely to have better road safety effects than equivalent alternative provisions in smaller industrial development schemes elsewhere in the District.

11. PLANNING REQUIREMENTS

11.1 Canterbury Regional Policy Statement

The Canterbury Regional Policy Statement (RPS) has been prepared to meet the requirements of the Resource Management Act 1991, and aims to promote sustainable management of natural and physical resources.

Chapter 15 of the RPS outlines four transport related policies. These policies are:

Policy 1: "Protect Canterbury's existing transport infrastructure and land transport corridors necessary for future strategic transport requirements by avoiding, remedying, or mitigating the adverse effects of the use, development or protection of land and associated natural and physical resources on transport infrastructure."

Policy 2: "Promote the use of transport modes which have low adverse environmental effects."

Policy 3: "Promote changes in movement patterns, travel habits and the location of activities, which achieve a safe, efficient and cost-effective use of the transport infrastructure and reduce the demand for transport."

Policy 4: "Ensure that in the provision, realignment or maintenance of transport infrastructure, adverse effects on natural resources that meet the criteria of sub-chapter 20.4 are avoided, remedied, or mitigated."



Sub-chapter 20.4 of the RPS outlines matters of "regional significance" from an environmental conservation (plant, wildlife, and heritage) view point, but is not applicable to the subject site from a transportation perspective.

The Plan Change proposal adheres to the relevant policies of the RPS as:

- the major connection of the site to the existing strategic road network (SH1) will still only be via one intersection at Hoskyns Road and travel times on SH1 do not increase significantly; hence the primary through traffic movement function of SH1will be safeguarded.
- the internal layout of the site consists of primary and secondary roads set out in a hierarchal manner that allows for safe, efficient and direct access to properties within the site, and minimises travel distances, hence allowing for cost-effective transport movements.
- the internal layout of the site is pedestrian and cycle friendly through the provision of footpaths and wide carriageways, hence transport modes with low adverse environmental effects are promoted.
- the location of the site close to the Rolleston Township will result in increased employment opportunities for the local community which will in turn result in reduced demand for travel (through reductions in distance travelled) to and from employment locations further afield.
- there is potential for bus services to run through the site which would further result in reduced use of non-renewable energy sources.
- for the longer term a flyover has been recommended by the CRETS study linking the residential and industrial areas of Rolleston. This will further protect SH1 and provide for convenient and safe walking and cycling.

11.2 Proposed Change No.1 to the RPS

Proposed Change No.1 (PC1) to the RPS introduces a new Chapter, 12A (Development of Greater Christchurch), which provides direction for the growth, development and enhancement of the urban and rural areas of the Greater Christchurch area. It identifies and maps a number of greenfield areas for residential and business growth, including the area subject to this Plan Change proposal. Therefore this proposal is already contemplated by PC1 which emanates from the Urban Development Strategy Study.

Policies 7 (Development Form and Design), 8 (Outline Development Plans and Changes of Zoning in District Plans) and 9 (Transport Effectiveness) of the PC1 are relevant to this Plan Change proposal from a transportation perspective. The relevant elements of these policies are discussed below.

11.2.1 Policy 7: Development Form and Design

Policy 7 stipulates that activities in greenfield sites should provide for the following:

- good safe connectivity within the area, and to surrounding areas, by a variety of transport modes, including motor vehicles, cycling, pedestrian and public transport, and provision for easy and safe transfer between modes of transport,
- being located within walkable distance to community, social and commercial facilities,
- provide effective, efficient and attractive walking paths and cycleways, preferably integrated with open space and stormwater detention areas, within, across and linking beyond the areas.

The subject site is well connected to the existing road network, and caters for a range of transportation modes through wide carriageway widths which are cyclist friendly and the provision of footpaths for pedestrians. There is potential for future bus services to run through the site. The provision of footpaths on at least one side of all internal roads will allow for safe transfer between modes (i.e. motor vehicle/buses to walking). The site is also located within an 800m walking distance (10 minute walking distance) from the centre of the Rolleston Township. Currently the pedestrian link between the site and the township is provided by the signalised crossing at the intersection of Rolleston Drive / SH1. The flyover proposed by the CRETS study across SH1 is also expected to include pedestrian and cyclist provisions.

11.2.2 Policy 8: Outline Development Plans and Changes of Zoning in District Plans

Policy 8 stipulates that an area plan needs to demonstrate how effective provision is made for a range of transport options and changing between modes, including pedestrian, cycling, passenger transport, freight and private motor vehicles.

As noted above, the development proposal caters for a range of transportation modes through wide carriageway widths and footpaths, with the provision for buses to also run through the site. The wide carriageway widths and footpaths also allow for safe changing between modes. The location of the site close to the existing strategic road network also allows for straightforward and efficient freight movements.

11.2.3 Policy 9: Transport Effectiveness

Policy 9 requires that development of greenfield sites shall not result in overloading the existing transport network infrastructure, in particular strategic roads, and avoid detracting from the primary through-traffic function of state highways and arterial roads. It also states that territorial authorities should ensure that transport networks provide for safe, sustainable, integrated movement of goods and people both within the sub-region, and to and from locations outside the sub-region.

It is not expected that the development of the subject site will result in the overloading of the existing transport network (as discussed in earlier sections of this report), and will not detract from the primary function of SH1, as no new connections to SH1 are proposed. The grade-separated connection between the Rolleston Township and IZONE detailed in the CRETS study will also ensure that the primary function of SH1 is not compromised.

The location of the site and internal layout of the site also allows for safe and efficient movement of goods and people, internally through the structure of roads, footpath provisions, and wide carriageway widths, and externally through good connections to the existing strategic road network.

11.3 Canterbury Regional Land Transport Strategy

The Canterbury Regional Land Transport Strategy (RLTS) 2005-2015 describes a series of key result areas for achieving the vision of "the best possible quality of life".

The RLTS takes into account the priorities, needs and aspirations contained in the Updated New Zealand Land Transport Strategy and the Land Transport Management Act as well as other national policy documents specifically addressing vehicle emissions, road safety, walking and cycling and climate change.

The RLTS states that quality of life is supported by a land transport system that:

- provides equitable access for all sectors of the community
- supports a thriving economy
- promotes a social environment that is safe and supportive
- is consistent with a health, pleasant and pollution-free environment
- is safe to use
- involves community participation in land transport decision-making
- is part of an integrated planning framework
- is innovative and responsive to change

The RLTS identifies five key result areas that represent a balanced approach to achieving this vision. These areas are:

- alternative modes
- · roads: safety, environment and infrastructure
- demand management
- land use
- freight

The proposed IZONE expansion development is consistent with the RLTS in the following ways:

- there is potential for future public transport services to run through the site offering convenient connections and potential for future services to Christchurch and the wider Selwyn District.
- in terms of private transport the site location offers excellent access to the strategic road network for both light and heavy vehicles. This is consistent with the RLTS policy to locate major traffic attractors within areas of high accessibility.
- the composition of activities within the proposed development as well as those existing land
 uses nearby, offers the potential for trip linking where a user can make one trip to the area
 and perform a range of tasks. The site location and the range of activities in the surrounding
 area also offer potential opportunities for people to travel less, which is a goal of the RLTS.
 It is also a policy of the RLTS to encourage co-location of land uses at focal points that
 reduce the need to travel.
- a high standard pedestrian and cycle environment will be provided within the site. This
 promotes the use of these alternative modes within the site, and between the site and the
 other surrounding land uses located within Rolleston.
- a high standard internal layout for those moving around the site on foot, including private
 vehicle users and potential public transport passengers, also contributes to achieving a safe
 and pleasant environment as well as contributing to the overall long term success of the
 development.
- the site is also well located in terms of access to SH1

11.4 District Plan Policies and Objectives

Section 2.1 of the District Plan outlines the transportation related objectives and policies of the plan, along with the environmental outcomes expected as a result of their implementation. The following table discusses each expected outcome in relation to the development proposal.

EXPECTED ENVIRONMENTAL OUTCOME	COMMENTS
Strategic Roads are safe and efficient transport routes for "through" traffic travelling across the District.	The through movement function of SH1 will not be compromised as no new connections to SH1 are proposed.
Other roads in the District serve all their functions safely and efficiently.	The road network within the site is well integrated with the existing road network, ensuring that the safety and efficiency of the existing road network is not compromised.
The visibility of roads, intersections, vehicular accessways and railway crossings is not impaired.	The layout of the site allows for good visibility internally at property accessways and intersections, and also externally at the intersections connecting the site to the existing road network.
Roads are designed, maintained, and if necessary, upgraded to the standard required for their traffic volume, traffic type and the amenity values of the zone.	The roads within the site will be designed to a standard appropriate for their use, including wide carriageway widths allowing for heavy vehicle movement and cyclists. The internal network will have similar amenity values to the existing IZONE Industrial Park.
Adverse effects of residential and business growth in Selwyn District on road links into Christchurch City are addressed.	The adverse effects of the Industrial Park expansion on link roads to Christchurch (in particular SH1) are expected to be minor because it provides employment locally and because the CRETS study has proposed the upgrading of the routes to Christchurch.
Heavy traffic bypasses townships, where practical.	Heavy traffic generated by the site for the most part will utilise SH1, and hence "bypass" the residential portion of the Rolleston Township.
An increase in separate cycleways and walkways in townships.	Separate waikways are proposed but on-road cycling is proposed
No increase in the extent to which main transport routes "bisect" townships.	The development of the subject site will not result in an increase to the extent to which SH1 bisects the residential portion of the Rolleston township from IZONE.
Fewer impacts from the construction, maintenance and repair of roads or other utilities in road reserves, on people and the environment.	The site is a greenfield site, hence the construction of the project will have a minimal impact of the existing road network, and the local community.
New settlement and residential activities occur closer to places of work or existing townships.	The site will provide additional work places close to the expanding residential population of Rolleston.
The number of walkways and cycleways increase that are effective in providing alternative linkages within townships.	It is expected that the grade-separated link between Jones Road and Rolleston Drive proposed by the CRETS study will include pedestrian and cyclist provisions.

Table 11: District Plan Policies and Objectives

As can be seen in the above table, the development proposal is expected to achieve the desired outcomes of implementing the transportation policies and objectives of the District Plan.

11.5 District Plan Rules

It is proposed that the subject site will be developed on the basis of the existing traffic and transportation rules within the District Plan.

While an indicative development layout has been prepared, it is not appropriate to undertake a full assessment of the development against the District Plan Rules as part of this Plan Change application. The District Plan Rules will be taken into account during the design process, and in general it is expected that the development will comply with the majority of the transportation rules set out in the District Plan. If this is not the case than the relevant resource consent applications will be sought and will be able to be assessed against the relevant District Plan criteria.

12. SUMMARY AND CONCLUSIONS

Having undertaken a thorough investigation of all the traffic and transportation issues associated with the IZONE expansion proposal, it is concluded that the transportation needs of the proposal will not have any significant long-term adverse effects on the transportation system, even if the roading improvements suggested by the CRETS study in the vicinity of the site are not implemented by their projected dates.

It has been demonstrated that the existing road network surrounding the site, including the signalised intersections with SH1 at Rolleston Drive and Hoskyns Road have sufficient capacity in their existing form to accommodate the traffic generated by the proposal whilst retaining an acceptable level of service.

An upgrade is proposed of Hoskyns Road between Jones Road and the proposed IZone access and this is consistent with the long-term future of Hoskyns Road identified in CRETS. This upgrade includes works to improve the priority-controlled intersection of Hoskyns Road/Jones Road and also includes an off-road pedestrian and cycle path.

The proposed connections between the site and the existing road network allow for good integration of the site with its surrounds, and allow for traffic to be distributed efficiently onto the existing road network at more than one point. The internal roading layout caters for the industrial nature of the site through the provision of wide carriageways and an efficient road layout. This in turn lends the site towards accommodating public transport vehicles to be provided through the area in future. Consideration has also been given to the needs of cyclists and pedestrians through the provision of footpaths and road widths with enough space to accommodate cyclists.

The full development of the expanded IZONE Industrial Park is expected to result in increased traffic volumes on the surrounding roads approaching 6,100vpd. This increase is expected over a number of years with full development occurring over a 10-15 year period depending on demand for sites.

In terms of road safety, the comprehensive well designed industrial park, is likely to have better road safety effects than equivalent alternative provisions in smaller industrial development schemes

elsewhere in the District, as access to the external road network via high standard connections will result in the number of potential traffic conflicts being controlled to specific locations where high standards of intersection design can minimise adverse safety effects.

It is concluded that from a transportation viewpoint that the proposed IZONE expansion Plan Change (in conjunction with the full development of the existing IZONE site) will facilitate the establishment of a comprehensive employment centre in close proximity to the Rolleston Township that is consistent with the objectives of the Land Transport Management Act 2003, and other relevant transportation policies and objectives within the District Plan and the Canterbury Regional Policy Statement.

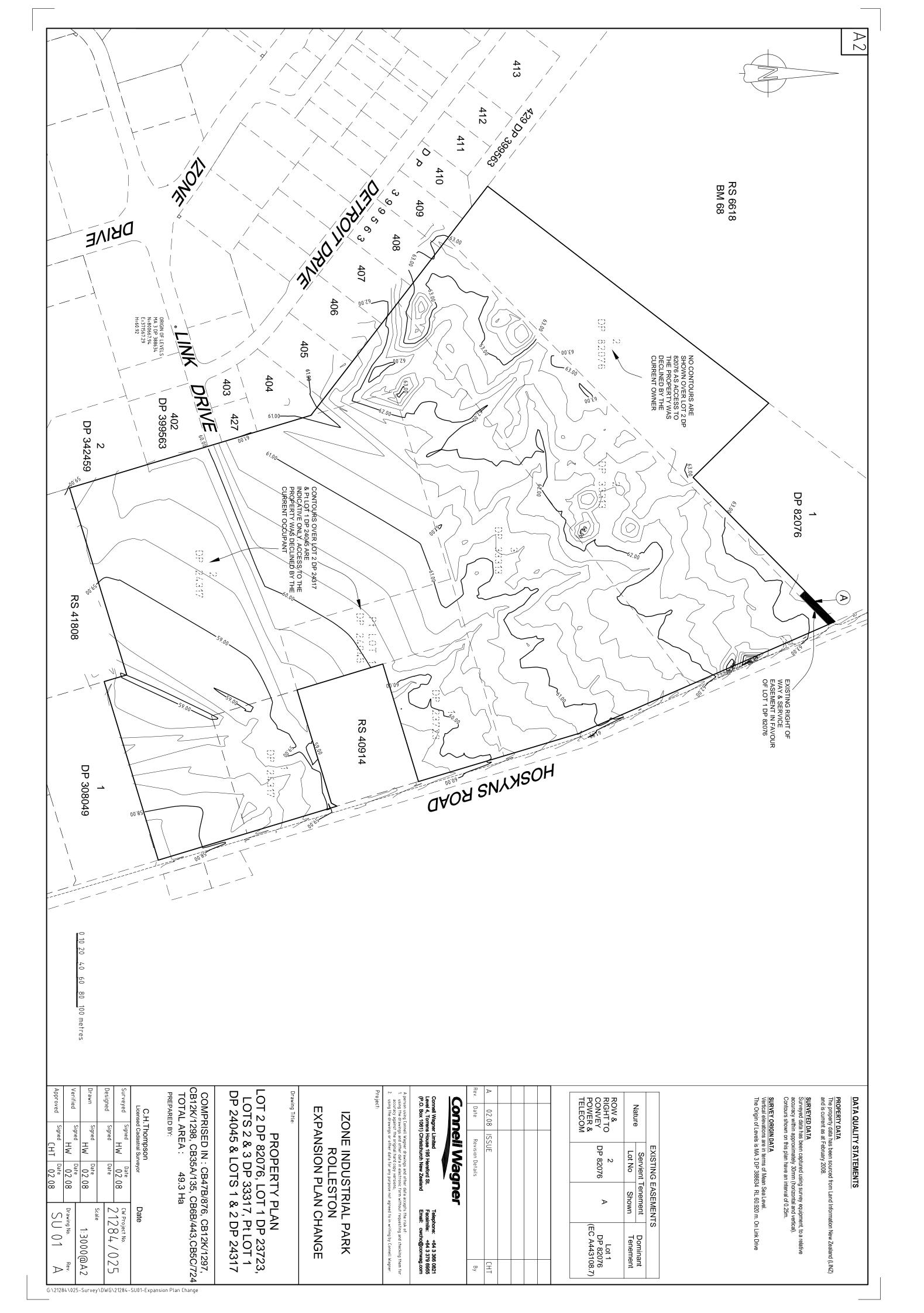
Accordingly it is recommended that there are no transportation-related reasons for opposing the Plan Change application.

Traffic Design Group Ltd 6 August 2008

Appendix A

Contour Plan





Appendix E

Infrastructure Assessment

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www.conwag.com

Izone Industrial Park, Rolleston Selwyn District Council Infrastructure Assessment

August 2008 Reference: 21284-025 Revision B

Revision

Document Control

Connell VVagner

Document ID: G:\21284\025-SURVEY\DOCS\REPORT INFRASTRUCTURE ASSESSMENT REV B 2008-08-05 DOC

		Revision Details	Typist	Author	Verifier	Approver
A A	pril 2008	Report	TS	СНТ	WŒ	GJD
B August	gust 2008	Easement Details Added (Sewage)	TS	CHT	DW	GJD

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Using the documents or data in electronic form without requesting and checking them for accuracy against the original hard copy version. Using the documents or data for any purpose not agreed to in writing by Connell Wagner.

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4.	Options/Assessment	5
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Appendix A

Contour Plan

Appendix B

Sewage Options
Certificates of Title for Lot 1 DP 336463, Lot 2 DP 336463
SDC Resource Consent Approval Conditions R 085160
Existing/Proposed Easement Route for Sewage (Option 2)

Appendix C

High Pressure Water Options



1. Introduction

This report has been prepared in support of a proposed change the Selwyn District Plan to allow industrial and commercial zoning (Business 2) of approximately 56.3ha of land as an extension to the existing Izone Industrial Park at Rolleston.

This report discusses the issues in relation to the disposal of sewage, together with the supply of high pressure water to the proposed expansion area.



2. Site Description

Development Area

- 2.1 The 'Development Area' is characterised by land use activities typical of a rural setting, being paddocks demarcated by fencelines and shelterbelts, dwellings and associated accessory buildings and landscaping. In addition 'horse' training tracks exist on some of the properties.
- 2.2 In terms of the contour of the land, enclosed as 'Appendix A' is a site 'Property Plan' which includes topographical information gathered over the majority of the site.
- 2.3 Based on the 'Property Plan' it is evident that the land generally falls from the northwest to the southeast, with a fall over the site of approximately 5.5m. This equates to a grade of approximately 1:200.

Surrounding Environs

- 2.4 To the north of the subject site, the land is characterised by rural farming activities, whilst to the east the property is bordered by Hoskyns Road, with rural farming activities being to the east of Hoskyns Road again.
- 2.5 To the south are established 'industrial activities', whilst to the west lies the existing stages of 'Izone Industrial Park' which have been constructed/developed over the last 5 years.



3. Existing Reticulation

Sewage Disposal

- 3.1 To date, existing reticulation providing outfalls for the discharge of sewage from the 'Subject Site' are twofold;
 - i) To the west, within the adjacent Izone Industrial Park Development, this being a 300mm dia pipeline laid at a grade of 1:300.
 - ii) To the south in Jones Road, where contractors on behalf of the Selwyn District Council are presently extending the existing reticulation east, to the junction of Jones Road/Hoskyns Road. This being a 300mm dia pipeline at a grade of 1:300.
- 3.2 In both instances, the existing reticulation discharges via a 300mm diameter pipeline to the sewer pump station located in George Holmes Road. This in turn discharges via a 300mm diameter rising main to Selwyn District Council's new treatment plant. The capacity of the pipe entering the pump station, the pump station itself and the outlet being the limitation on expanding the existing network.
- 3.3 Having discussed the existing network with Mr Kris Kaser of Selwyn District Council, we further understand that;
 - The existing pump station in George Holmes Road is monitored, including the quantum of discharge
 - The pump station has been designed to be readily upgraded to accommodate larger pumps if required
 - At present the quantum of discharge from the pump station is small, and is being pumped via a second rising main which is less than 300mm in diameter
 - Capacity of the system is not perceived to be an issue, as most of the industry being established within Izone and adjoining area to date is of a 'dry' nature, and as such are producing minimal discharge.

High Pressure Water

- 3.4 To date, existing water reticulation providing connection points for the potential supply of the subject site are twofold;
 - To the west within the Izone Industrial Park Development. This being a 300mm diameter pipeline fed by one 'bore' (owned by Selwyn District Council) located within the Izone Development.
 - ii) To the south in Jones Road, where an existing 200mm diameter main is located approximately 160m west of the intersection with Hoskyns Road. This network being supplied by the bore/s described above, together with the network supply from Rolleston Drive to the south.
- 3.5 There is also an existing 100mm diameter main located along the northern side of Jones Road, which is extended partially along the western side of Hoskyns Road.
- 3.6 Having discussed the existing network with Mr Kris Kaser at Selwyn District Council we further understand that;
 - Consent (CRC 050888) exists for up to 5 bores to be established within the overall area of Izone Industrial Park. At present 1 bore has been established.
 - A total of 300litres/second is able to be 'drawn upon' in terms of the above consent.
 Refer to a copy of the consent attached as 'Appendix B'.

Capacity of the system is not perceived to be an issue due to the 'water take' available
by the consent, the pipe sizes of the existing network together with the ability to install
more bore's in terms of the abovementioned consent.

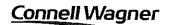
4. Options/Assessment

Sewage Disposal

- 4.1 As indicated above, existing reticulation exists to both the west (existing Izone Development) and to the south (Jones Road) of the subject site.
- 4.2 In terms of the reticulation to the west, the depth of the existing discharge point together with the natural gradient of the land away from this outfall precludes much of the site discharging to this point. This leaves the option of the existing network in Jones Road.

To that end three options exist:

- Extending the network (currently being installed) north along Hoskyns Road from the Jones Road intersection to a point adjacent to the northern end of the site.
 - In addition, internal reticulation within the site would then be placed from any new sewer main located in Hoskyns Road. In doing so it is important to note that initial assessments would indicate that insufficient cover would exist to service the northern extent of the subject site by utilising this option alone.
- ii) Install a new network from the existing main in Jones Road northward through privately owned land into the subject site. This in turn would then be extended to the north (internally), out to Hoskyns Road, and then north along Hoskyns Road to the northern end of the subject site, providing coverage for the discharge of sewage. This option does however require easements through whose land the sewage main is to pass. To this end we advise that:
 - a) Easements exist over Lots 1 and 2 DP 336463 in favour of the Selwyn District Council for the right to drain sewage in gross. The easements being created by El 6165898.7.
 - b) An easement is proposed over Lot 1 DP 308049 as shown on the subdivision application plan submitted and consented to under R 085160.
 - To date, Connell Wagner is presently undertaking the legal survey associated with this subdivision, with the easements to "drain sewage in gross" in favour of the Selwyn District Council to be registered as part of the process to the plan depositing, and new titles issuing.
- iii) A combination of the above.
- 4.3 Please see Appendix C for diagrams relating to the above options, together with existing and proposed easement details.
- 4.4 In assessing the above options, other matters for consideration include;
 - The potential for what could be future expansion to the north of the site. To that end our initial assessment of option (ii) above, would indicate that cover in the order of 2.5m should be achievable from both within the internal site and Hoskyns Road for any main feeder lines.
 - The ability for the existing network to have capacity to take the discharge from this site.
 As detailed above under 'Section 3 Existing Reticulation' the existing network is only limited by;



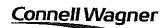
- Capacity of the incoming pipes/outgoing rising main
- Capacity of the pump station
- 4.5 In both instances Council (Mr Kris Kaser) has indicated that he is of the opinion that neither is an issue as;
 - Capacity exists within the existing network
 - If the demand exceeds the capacity of the existing pumps, new pumps can be installed within the existing pump station wet well. To this end we understand that the monitoring of the pump station is such that the quantum of the discharge is known, and therefore should capacity look likely to exceed the ability of the pumps, the pumps could be changed with limited disruption. In our opinion storage in the piped network exists to allow for a 'short down time' in the pumpstation to install any new pumps.
 - It may, however, be necessary that the top end of any new sewer mains have the ability to flush the system until adequate flows can be achieved.
- 4.6 We, therefore, consider that there are suitable options for the discharge of sewer from the subject site and that this does not represent a barrier to the rezoning of this site.

High pressure water

4.7 As indicated above, reticulation exists both to the west (existing Izone Development) and to the south (Jones Road) of the land subject to this application.

In terms of the subject site;

- A 300mm diameter main exists in the existing izone Development adjacent.
- A 200mm diameter main exists to the south in Jones Road
- Consent has been granted by Environment Canterbury to the Selwyn District Council to establish up to 5 bores for water supply purpose, and take up to 300 litres/second.
- 4.8 Accordingly the option exists to link to either system, with the likelihood that a connection to both systems would eventuate to provide a ringmain.
- 4.9 We therefore consider that there are suitable options for high pressure water to the subject site, and that this does not represent a barrier to the rezoning of the site.



5. Conclusion

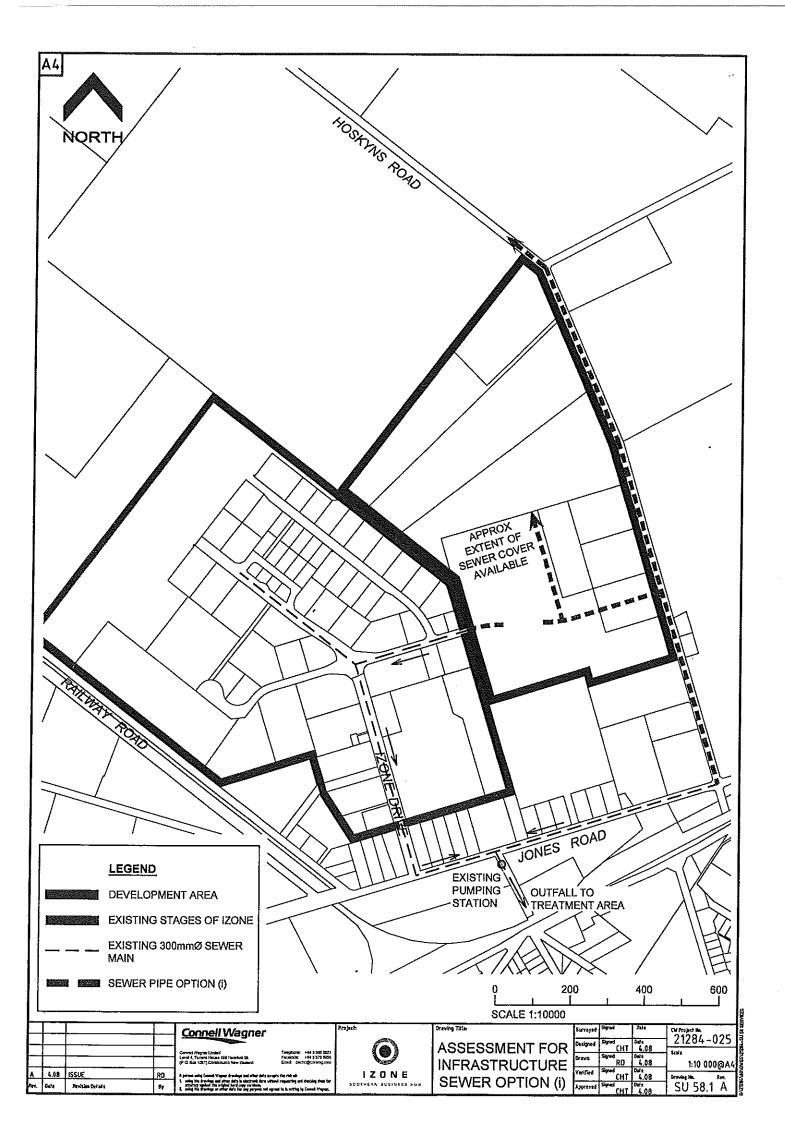
5.1 Based on the above, together with investigations undertaken to date, we consider that with regard to Sewage Disposal and High Pressure Water to the subject site, that there are no limitations that would represent a barrier to the rezoning proceeding.

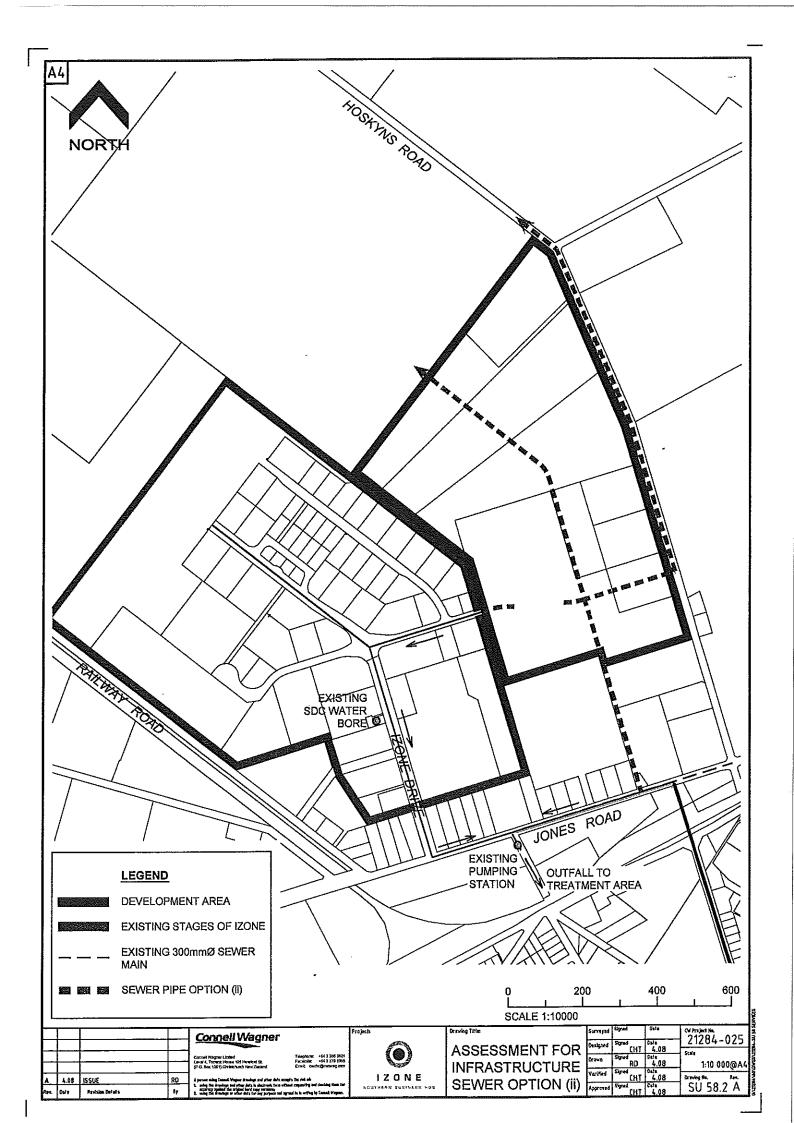


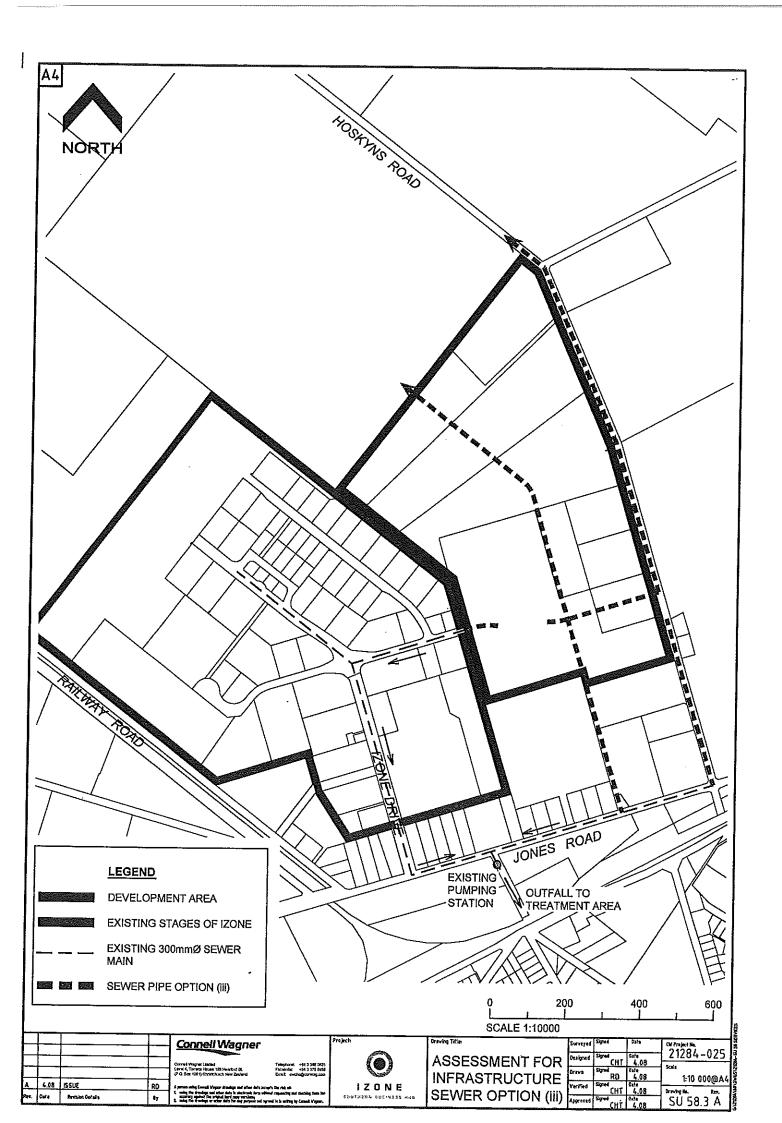
Appendix B

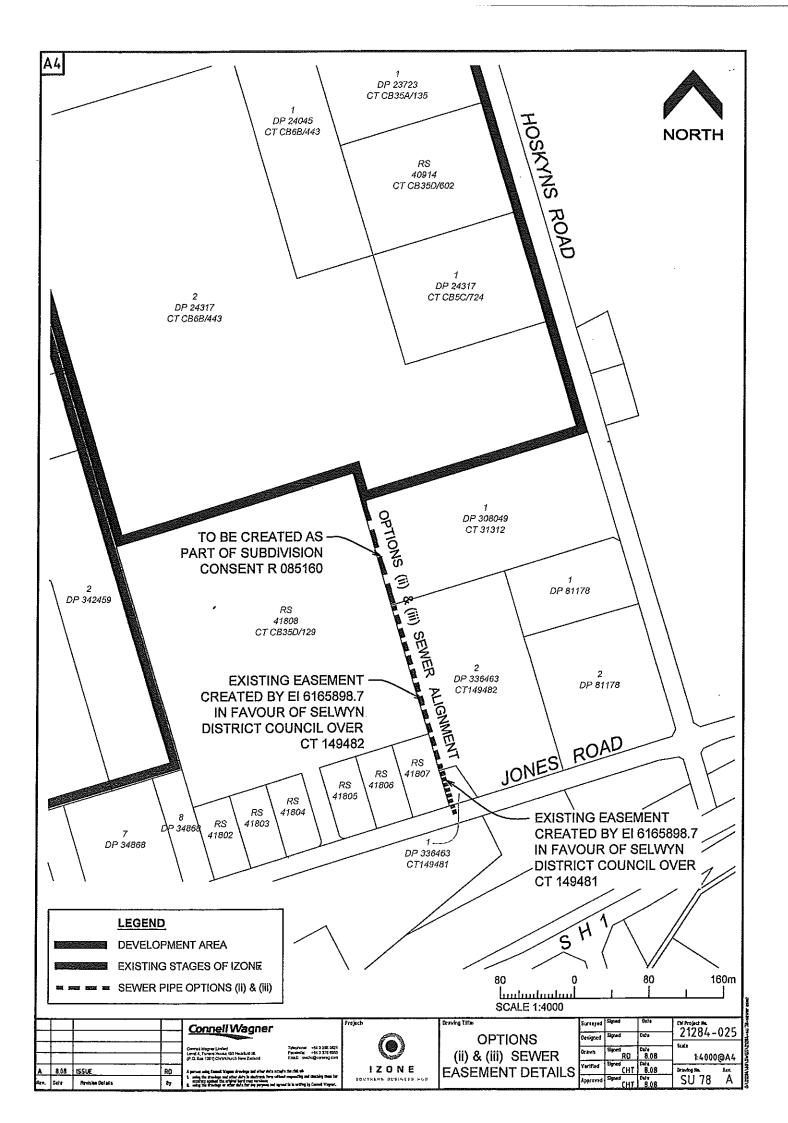
Sewage Options

Certificates of Title for Lot 1 DP 336463, Lot 2 DP 336463 SDC Resource Consent Approval Conditions R 085160 Existing/Proposed Easement Route for Sewage (Option 2)











COMPUTER FREEHOLD REGISTER **UNDER LAND TRANSFER ACT 1952**



Search Copy

Identifier

149481

Land Registration District Canterbury

Date Issued

30 September 2004

Prior References

31313

Estate

Fee Simple

Area

978 square metres more or less

Legal Description Lot 1 Deposited Plan 336463

Proprietors

Jones Investments Limited

Interests

5239332.2 Consent Notice pursuant to Section 221 Resource Management Act 1991 - 4.6.2002 at 9:48 am 6165898.3 Consent Notice pursuant to Section 221 Resource Management Act 1991 - 30.9.2004 at 9:00 am Subject to a right to drain sewage in gross over part marked A on DP 336463 in favour of Selwyn District Council created by Easement Instrument 6165898.7 - 30.9.2004 at 9:00 am

The easement created by Easement Instrument 6165898.7 is subject to Section 243 (a) Resource Management Act 1991

Subject to a right to convey electric power over part marked A on DP 336463 created by Transfer 6165898.8 -30.9.2004 at 9:00 am

The easement created by Transfer 6165898.8 is subject to Section 243 (a) Resource Management Act 1991 6962866.3 Mortgage to Bank of New Zealand - 28.7.2006 at 3:21 pm



COMPUTER FREEHOLD REGISTER **UNDER LAND TRANSFER ACT 1952**



Search Copy

Identifier

149482

Land Registration District Canterbury

Date Issued

30 September 2004

Prior References

31313

Estate

Fee Simple

Area

2.7240 hectares more or less

Legal Description Lot 2 Deposited Plan 336463

Proprietors

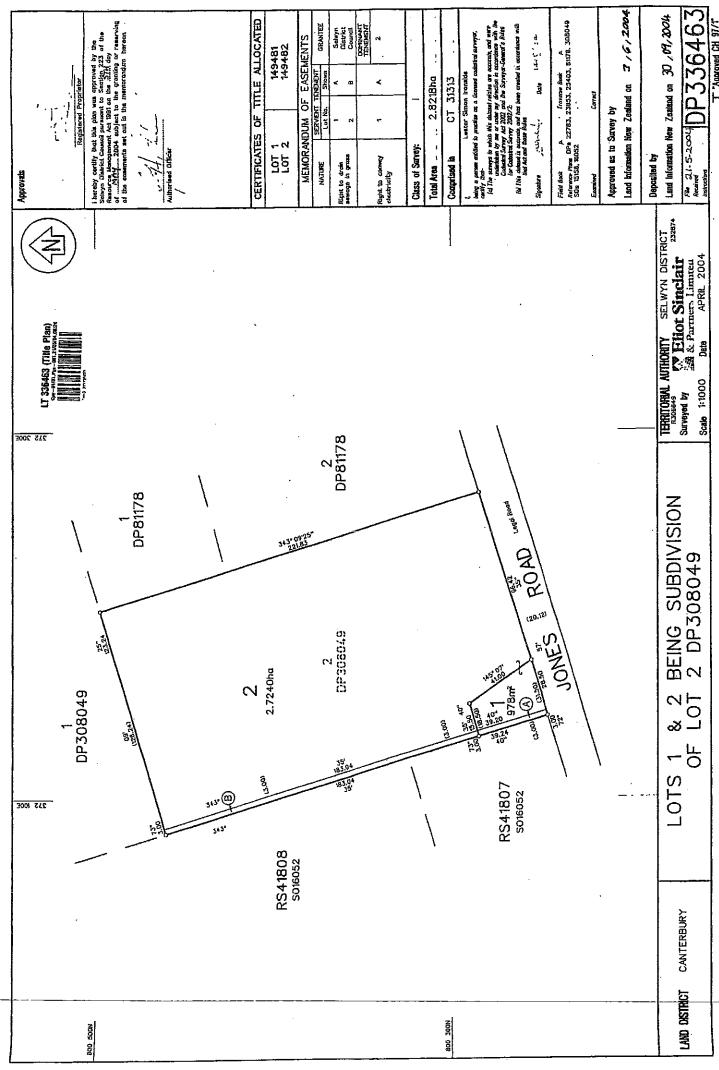
Taylor Coal Properties Limited

Interests

5239332.2 Consent Notice pursuant to Section 221 Resource Management Act 1991 - 4.6:2002 at 9:48 am 6165898.3 Consent Notice pursuant to Section 221 Resource Management Act 1991 - 30.9.2004 at 9:00 am Subject to a right to drain sewage in gross over part marked B on DP 336463 in favour of Selwyn District Council created by Easement Instrument 6165898.7 - 30.9.2004 at 9:00 am

The easement created by Easement Instrument 6165898.7 is subject to Section 243 (a) Resource Management Act 1991

Appurtenant hereto is a right to convey electric power created by Transfer 6165898.8 - 30.9.2004 at 9:00 am The easement created by Transfer 6165898.8 is subject to Section 243 (a) Resource Management Act 1991 7284489.3 Mortgage to Westpac New Zealand Limited - 4.4.2007 at 10:18 am



Approved CH 97/1



2 NORMAN KIRK DRIVE PO BOX 90, ROLLESTON 7643 PH: (03) 347 2800 FAX: (03) 347 2799

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10 June 2008

Selwyn District Council C/- Connell Wagner PO Box 1061 CHRISTCHURCH

Attn: Daniel Thorne

CONNELL WAGNER LTD.									
DATE 11 JUN	2008	FILE							
PROJ. DIR.	ACTION	ED.	DATE						
OT									
NARRATION									

Dear Sir/Madam

RE: RESOURCE CONSENT APPLICATION - 085160

APPLICANT:

Selwyn District Council

. LOCATION:

35 & 49 Hoskyns Road

LEGAL DESCRIPTION:

Lot 2 DP 24317, Part Lot 24025, Lot 1 DP 24317

and Lot 1 DP 308049

ZONING:

The property is zoned Inner Plains under the

provisions of the Proposed District Plan - Rural

Section.

PROPOSAL:

To undertake a boundary adjustment between Lot

2 DP 24317, Part Lot 24025 and Lot 1 DP 24317 with a 3.0ha area being amalgamated with Lot 1

DP 308049

TYPE OF APPLICATION:

This application has been assessed as a subdivision consent for a Controlled activity under the Proposed District Plan. As such the relevant provisions of the Proposed District Plan – Rural Section and the Resource Management Act 1991,

have been taken into account.

COUNCIL DECISION

This application was lodged and formally received with the Selwyn District Council on 22 13 May 2008. Assessment and approval took place on the 10 June 2008 under a delegation given by the Council.

The following conditions are imposed on this consent:

"Resource consent 085160 is granted pursuant to Sections 104, 104A, 405 and 407 of the Resource Management Act 1991 subject to the following conditions imposed under Sections 108 and 220 of the Act."

The following conditions are imposed on this consent:

- That the following conditions of consent shall be met prior to the issue of the Section 224(c) Completion Certificate, at the expense of the Consent Holder.
- That the subdivision proceeds in accordance with the attached approved plan (Connell Wagner, Project number 21284, Dwg No. SU 44 Rev B now marked SDC 085160) and the details submitted with the application, except where varied by the following conditions.
- 3. That all required easements shall be created and granted or reserved.

Amaigamation

4. That Lot 601 hereon be transferred to the owner of Lot 1 DP 308049 (CR 31312) and one computer register be issued to include both parcels (CSN Request 744604)

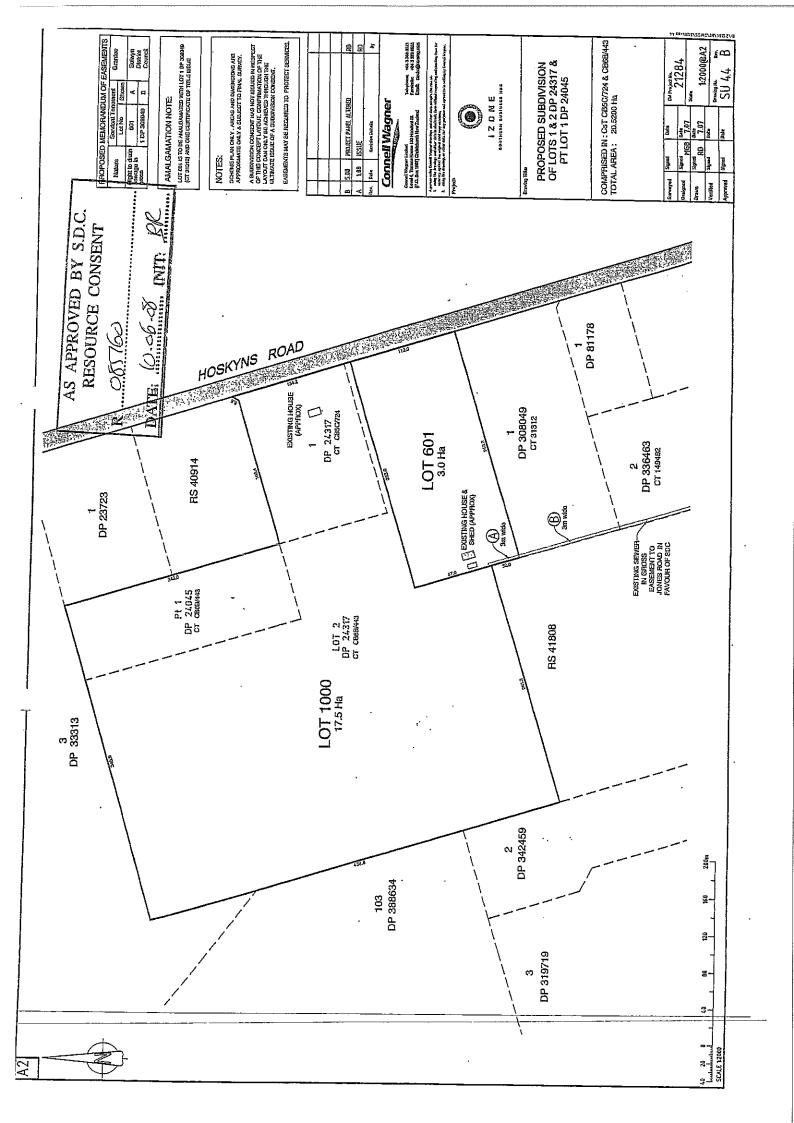
Notes to the Consent Holder

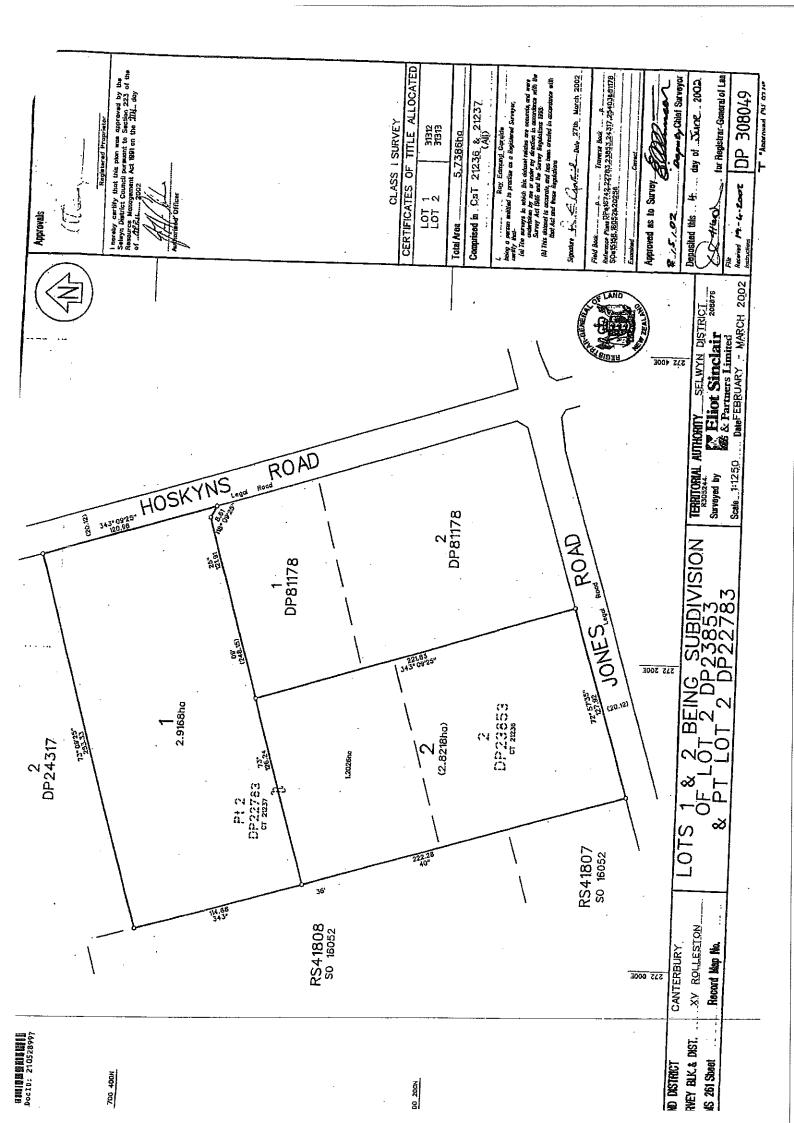
- a) Pursuant to section 125 of the Resource Management Act 1991, if not given effect to, this resource consent shall lapse five years after the date of this decision unless a longer period is specified by the Council upon application under Section 125 of the Act.
- b) In accordance with Section 36 of the Resource Management Act 1991, the Council's basic monitoring fee has been charged.
- c) Linz reference number: 744604

Yours faithfully Selwyn District Gouncil

Ben Rhodes

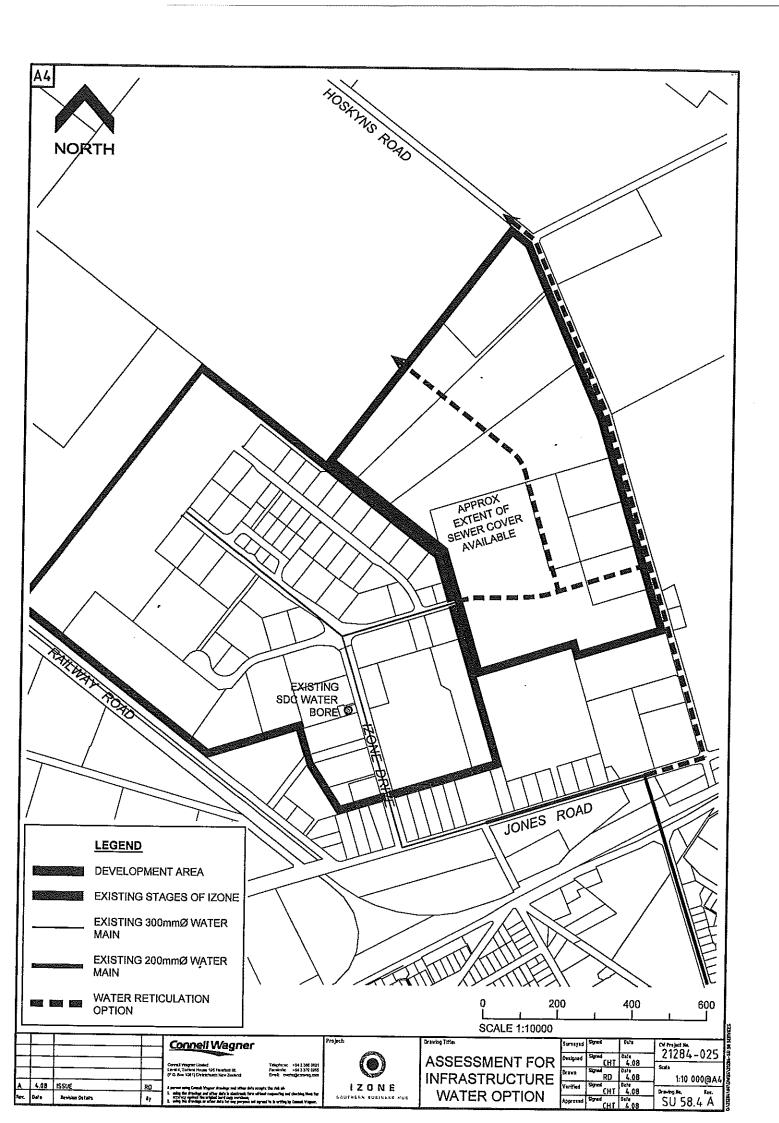
RESOURCE MANAGEMENT PLANNER





Appendix C

High Pressure Water Options



Appendix F

Responses Received to Consultation

<u>Summary of Consultation for IZONE Business Hub Expansion</u>

- Consultation with those parties identified under Clause 3 of the First schedule of the RMA has
 occurred. Copies of letters sent to these parties are attached along with the response received from
 ECAN. The issues raised by ECAN are addressed in the TDG Transportation Assessment and the
 Harrison Grierson Outline Development Plan report. No other responses were received.
- 2. Kerr and Partners meet with Peter Savage of ECAN, assisted by Ivan Holland from Golder Associates, on 16th June 2008 to discuss the proposed method of stormwater treatment and discharge. Discussions revolved around the options for developing consent conditions that would allow greater flexibility in the implementation of the systems, and the various options for treatment that were available.

General agreement was reached that a design criteria led approach to the specification of treatment measures could be incorporated into any consent granted, and that ECan has a general preference for above ground systems, particularly where there is a risk of accidental spills occurring. No issues were raised that presented an impediment to the development or the proposed options for stormwater management.

- 3. Connell Wagner met with the following surrounding landowners (see attached plan for property locations):
 - Shane and Leanne Brown
 - Norris, Patricia and Mark Watson
- 4. Feedback from these parties is as follows:

Shane and Leanne Brown

The Brown's were generally supportive of the initiative and raised some detailed questions regarding servicing and access. In terms of access the Brown's are interested in gaining an alternative access to their property other than from Hoskyns Road and this is something that has been agreed to in principle. The exact location of the access is being worked on at present.

The other matter raised was regarding connections to water and sewer reticulation that will be extended into the area. It has been confirmed that these will be available for the Brown's to connect to in the future if they were to develop their site.

Norris, Patricia and Mark Watson

The Watson's are concerned about additional traffic along Maddisons Rd in terms of the capacity of the road, safety, disruption of their farming operation which involves moving stock across Maddisons Rd and along Hoskyns Rd, traffic safety at the Hoskyns/Maddisons intersection, and potential reverse sensitivity issues with people in the business area complaining about farming practices undertaken – spraying, burn-offs and other such activities.

The traffic issues raised are being investigated by Traffic Design Group and the spoil that has been dumped near the Hoskyns/Maddisons intersection which limits visibility has been arranged to be removed.

The potential reverse sensitivity effects are being investigated further, however, it is not expected that this is a matter that can be addressed through any particular District Plan provision. Rather the Council's booklet on rural activities to raise awareness for those people moving to a rural area is an educational tool that may assist in respect of this matter.

- 5. The IZONE project team met with and/or held discussions with the following surrounding landowners (see attached plan for property locations):
 - Solid Energy
 - A.J Cockburn
 - A.T Whitham
- 6. A summary of where discussions have got to with these parties is as follows and these will be ongoing throughout the plan change process.

Solid Energy

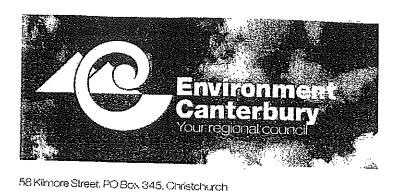
Solid Energy has contracted to purchase land within the subject area and as a condition of purchase has agreed to support the plan change application.

A J Cockburn

Discussions have been ongoing with the Cockburn family, commencing in February 2008. An agreement on matters including the Cockburn support to the plan change application and treatment of the boundary interface with their property are in the course of being documented.

A T Whitham

Discussions are ongoing with representatives of the Whitham family. It is felt that there is general alignment of views in terms of the prospective future uses for the subject land and the Whitham land holdings. This is reinforced by the fact that the Whitham's have made submissions to have their property included in the Regional Planning Strategy. Whitham's representatives have been provided with summary information from the plan change application.



16 May 2008

General enquiries: 03 365 3828

Fax: 03 365 3194 Email: ecinto@ecan.govt.riz. Customer services: 03 353 9007 or: 0800 EC INFO (0800 324 636) Website: www.ecan.govi.nz

Connell Wagner Limited PO Box 9762 Auckland

Attention: Tom Hurdley

Dear Tom.

PROPOSED PLAN CHANGE - IZONE BUSINESS HUB EXPANSION

Thank you for the opportunity to provide comment on the proposed zoning pattern for this area.

As you will be aware Environment Canterbury (ECan) and Selwyn District Council (SDC) are signatories to the Urban Development Strategy and are currently working on the Proposed Change 1 to the Regional Policy Statement which in the near future will require Rolleston's Urban Growth / Form to be determined. It is within this context that the following comments are provided.

From the information provided it appears that considerable consideration has been given to how the IZone expansion will have regard to the provisions of Proposed Change 1 to the Regional Policy Statement (PC1). A number of connectivity matters require further thought however, or we would welcome receiving the TDG Traffic report should these matters have already been considered.

Internal connectivity

Page 21 states "the laying out of the block with reference to the possible future hub locations means that no separate pedestrian or cycle paths are proposed". This statement is contrary to the Canterbury Regional Land Transport Strategy, PC1 and the operative RPS that actively supports alternative car dependent transport patterns being developed, such as cycling and walking particularly for short to medium distance journeys.

Cycling and walking routes and priority measures can facilitate a safe, efficient, permeable and accessible environment. Conveniently located, secure and covered cycle parking at destination endpoints (such as an interchange) will also assist this mode of transport being adopted. Further thought should therefore be given to internal on-road and of-road cycling and walking opportunities within the IZone.

External connectivity

Little information has been provided on how cycling and walking journeys between Rolleston and the IZone will occur, as many IZone employees will be drawn from the town as the distances between are not great. Consideration needs to given to facilitating state highway / rail corridor underpass or overpass opportunities so that the IZone does not become an

Our Ref:

NO1C/SELW/DIS/200/CHA/1

Your Ref: Contact: isolated and private vehicle dominated dormitory of Christchurch City. ECan would welcome further discussion on this matter.

Passenger transport

Passenger Transport services are provided through Rolleston to Burnham and are due for review in 2010. Given that a significant diversion would occur to service this area any further iZone development should occur as close to the state highway as possible so as to enable employees to access the existing Rolleston bus service.

As the scale of IZone development increases and demand for public transport grows, it may become viable to provide a separate service through the IZone without inconveniencing Rolleston residents. However, it should be noted that industrial areas are often difficult to service with public transport because many workers start or finish their shifts outside of bus operating hours. There is also usually an abundant supply of car parks in these industrial areas, so it is very convenient for most people to drive private vehicles to and from work. Further assessment would need to be carried out to determine the viability of such a service.

I hope that these comments are of assistance.

Yours sincerely



Vin Smith Manager, Territorial Authority Liaison & Coasts



17 April 2008

Director of Planning Environment Canterbury PO Box 345 CHRISTEHURCH Connell: Wagner Limited 139 Carlton Gore Road: PO Box 9762 Auckland New Zealand Telephone: +64.9.520.6019; Facsimile: +64.9.524.7815. Email::owakl@conwag.com: www.conwag.com

Attention: Don Rule

Dear Don.

PROPOSED REZONING BY SELWYN DISTRICT COUNCIL AT HOSKYNS ROAD, ROLLESTON, CONSULTATION UNDER SECTION 3(1) OF SCHEDULE 1 OF THE RMA

We write to you on behalf of our client, Selwyn District Council, in regards to their proposal to rezone land at Hoskyns Road, Rolleston. The remainder of this letter outlines the proposed Plan Change. We welcome any comments Environment Canterbury may have regarding the proposal, as this letter serves to fulfill our obligations under Clause 3(1) of the First Schedule to the Resource Management Act 1991.

Please find enclosed a plan illustrating the area of land to the west of Hoskyns Road to be rezoned for business purposes (Business 2 Zone). The area of the subject land is 56.3 heetares. The proposed incorporates as requirement for development over the land in question to be in accordance with a specific Outline Development. Plan prepared in accordance with Plan Change 1 to the Regional Policy Statement which is to be included as an appendix to the District Plan. Please find enclosed a draft of the Outline Development Plan. Selwyn District Council owns or has a contract to purchase all of the concerned parcels of land apart from parcel RS 40914. The land in question is presently zoned Rural and is situated directly adjacent to a Business 2 Zone where the existing IZONE Business Hub is located. The area is identified in Plan Change 1 to the Regional Policy Statement as a greenfield growth area.

The plan change is being promoted to enable the expansion of the existing IZONE Business Hub. Since its initial inception in 2001 the IZONE Business Hub has experienced positive reception from the industry. To date the rate of sales of lots within the IZONE Business Hub has been 10-15 a per annum. At this rate the current business zoned land will be exhausted within the next 2-4 years. To meet the future demand and growth of the IZONE Business Hub it is necessary to expand the business park. As such, it is considered necessary to expand beyond the existing Business 2 Zone to facilitate the development of the site to provide for future demand.

We welcome any comments you may have on this preliminary proposal. Should you require any further information please contact the writer directly. Over the next 4 weeks we will be looking to complete the documentation required to support the Plan Change. To this end if you are able to provide any comments within the next few weeks it would be appreciated.

If you have any queries regarding the above, please do not he sitate to contact the writer.



Tom Hurdley Planner



15 April 2008

Te Runanga o Ngai Tahu PO Box 13 046 Christchurch

Attn: Paul Horgan

Dear Sir.

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New Zealand

Spelling, numbedgov referenting, com date eta comeció diel etated?

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Technically correct?
Everything necessary covered?

Risk to TW minimized? Appropriate discissioners included? Cost estimates independently checked?

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(Yhite NA if not applicable)

Bre 15/4/08

PROPOSED REZONING BY SELWYN DISTRCIT COUNCIL AT HOSKYNS ROAD, ROLLESTON.

CONSULTATION UNDER SECTION 3(1) OF SCHEDULE 1 OF THE RINA

We write to you on behalf of our client, Selwyn District Council, in regards to their proposal to rezone land at Hoskyns Road, Rolleston. The remainder of this letter outlines the proposed Plan Change. We welcome any comments Te Runanga o Ngai Tahu may have regarding the proposal, as this letter serves to fulfil our obligations under Clause 3(1) of the First Schedule to the Resource Management Act 1991.

Please find enclosed a plan illustrating the area of land to the west of Hoskyns Road to be rezoned for business purposes (Business 2 Zone). The area of the subject land is 56.3 hectares. The proposed Incorporates a requirement for development over the land in question to be in accordance with a specific Outline Development Plan prepared in accordance with Plan Change 1 to the Regional Policy Statement which is to be included as an appendix to the District Plan. Selwyn District Council owns or has a contract to purchase all of the concerned parcels of land apart from parcel RS 40914. The land in question is presently zoned Rural and is situated directly adjacent to a Business 2 Zone where the existing IZONE Business Hub is located. The area is identified in Plan Change 1 to the Regional Policy Statement as a greenfield growth area.

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We welcome any comments you may have on this preliminary proposal. Should you require any further information please contact the writer directly. Over the next 4 weeks we will be looking to complete the documentation required to support the Plan Change Request. To this end if you are able to provide any comments within the next few weeks it would be appreciated.

If you have any queries regarding the above, please do not hesitate to contact the writer.

Yours sincerely

Tom Hurdley

Tom Hurdley Planner

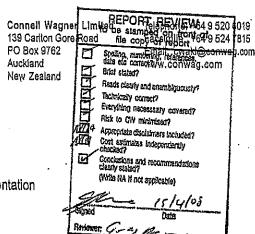


15 April 2008

Ministry for the Environment PO Box 10362 Wellington 6143

Attn: Craig Mallett - Manager Resource Management Act Implementation

Dear Craig,



PROPOSED REZONING BY SELWYN DISTRCIT COUNCIL AT HOSKYNS ROAD, ROLLESTON, CONSULTATION UNDER SECTION 3(1) OF SCHEDULE 1 OF THE RMA

We write to you on behalf of our client, Selwyn District Council, in regards to their proposal to rezone land at Hoskyns Road, Rolleston. The remainder of this letter outlines the proposed Plan Change. We welcome any comments the Ministry for the Environment may have regarding the proposal, as this letter serves to fulfil our obligations under Clause 3(1) of the First Schedule to the Resource Management Act 1991.

Please find enclosed a plan illustrating the area of land to the west of Hoskyns Road to be rezoned for business purposes (Business 2 Zone). The area of the subject land is 56.3 hectares. The proposed Incorporates a requirement for development over the land in question to be in accordance with a specific Outline Development Plan prepared in accordance with Plan Change 1 to the Regional Policy Statement which is to be included as an appendix to the District Plan. Selwyn District Council owns or has a contract to purchase all of the concerned parcels of land apart from parcel RS 40914. The land in question is presently zoned Rural and is situated directly adjacent to a Business 2 Zone where the existing IZONE Business Hub is located. The area is identified in Plan Change 1 to the Regional Policy Statement as a greenfield growth area.

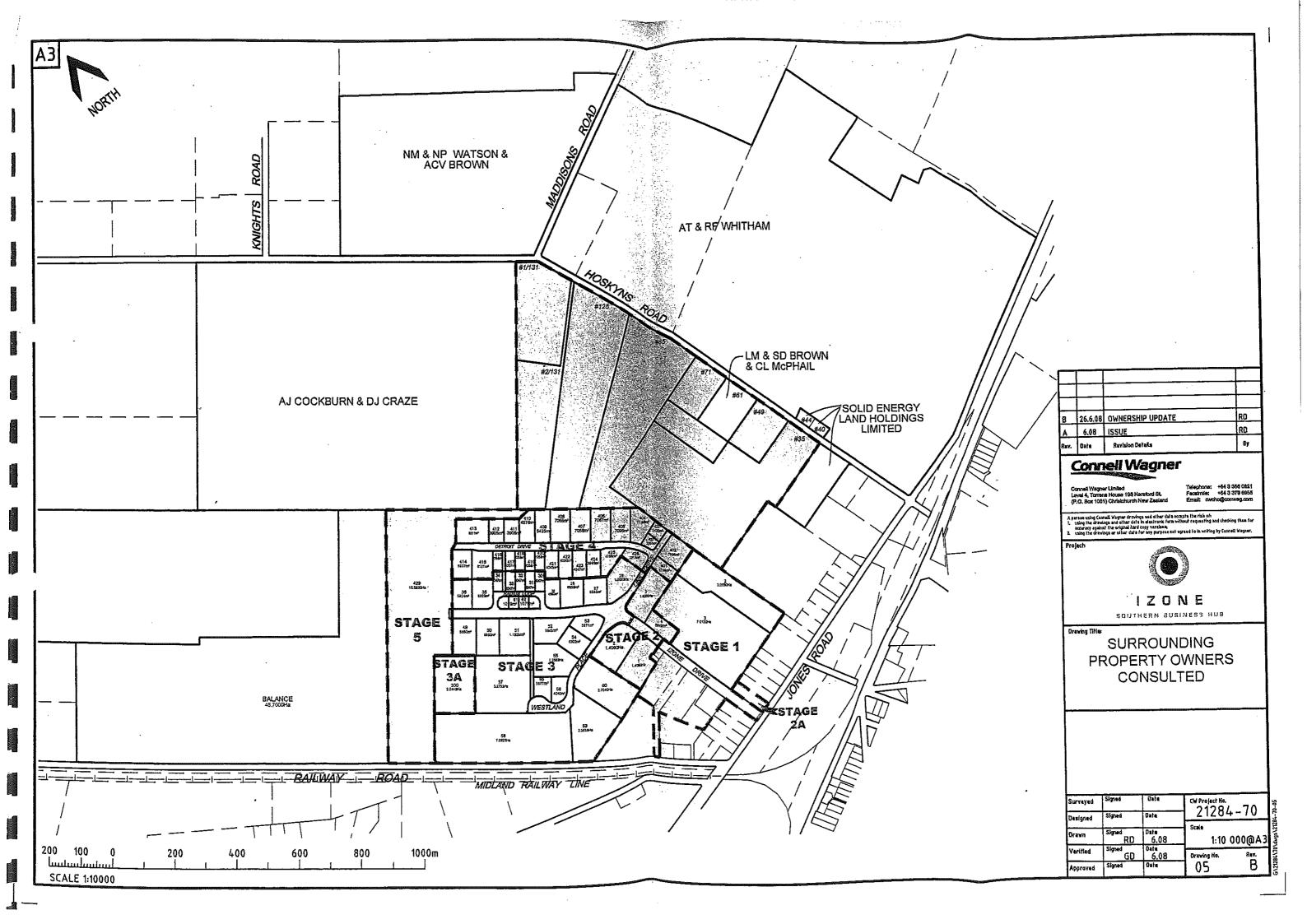
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We welcome any comments you may have on this preliminary proposal. Should you require any further information please contact the writer directly. Over the next 4 weeks we will be tooking to complete the documentation required to support the Plan Change Request. To this end if you are able to provide any comments within the next few weeks it would be appreciated.

If you have any queries regarding the above, please do not hesitate to contact the writer.



Tom Hurdley Planner





23 July 2008

Christchurch City Council P O Box 237 CHRISTCHURCH 8140

Attention: David Mountford

Dear David

Connell Wagner Limited Level 4, Torrens House 195 Hereford Street (PO Box 1061) Christchurch 8140 New Zealand Telephone: +64 3 366 0821 Facsimile: +64 3 379 6955 Email: cwchc@conwag.com www.conwag.com

PROPOSED REZONING BY SELWYN DISTRCIT COUNCIL AT HOSKYNS ROAD, ROLLESTON. CONSULTATION UNDER SECTION 3(1) OF SCHEDULE 1 OF THE RMA

We write to you on behalf of our client, Selwyn District Council, in regards to their proposal to rezone land at Hoskyns Road, Rolleston. The remainder of this letter outlines the proposed Plan Change. We welcome any comments you may have regarding the proposal.

Please find enclosed a plan illustrating the area of land to the west of Hoskyns Road to be rezoned for business purposes (Business 2 Zone). The area of the subject land is approximately 56.3 hectares. The proposed incorporates a requirement for development over the land in question to be in accordance with a specific Outline Development Plan prepared in accordance with Plan Change 1 to the Regional Policy Statement which is to be included as an appendix to the District Plan. The land in question is presently zoned Rural and is situated directly adjacent to a Business 2 Zone where the existing IZONE Southern Business Hub is located. The area is identified in Plan Change 1 to the Regional Policy Statement as a greenfield growth area for business purposes.

The plan change is being promoted to enable the expansion of the existing IZONE Business Hub. Since its initial inception in 2001 the IZONE Business Hub has experienced positive reception from the industry. To date the rate of sales of lots within the IZONE Business Hub has been 10-15ha per annum. At this rate the current business zoned land will be exhausted within the next 2-4 years. To meet the future demand and growth of the IZONE Business Hub it is necessary to expand the business park. As such, it is considered necessary to expand beyond the existing Business 2 Zone to facilitate the development of the site to provide for future demand.

We welcome any comments you may have on this proposal. Should you require any further information please contact the writer directly.

Yours sincerely

Greg Dewe

Greg Dewe Principal



23 July 2008

Ashburton District Council P O Box 94 ASHBURTON 7740

Attention: Peter Kloosterman

Dear Peter

Connell Wagner Limited Level 4, Torrens House 195 Hereford Street (PO Box 1061) Christchurch 8140 New Zealand Telaphone: +64 3 366 0821 Facsimile: +64 3 379 6955 Email: cwchc@conwag.com www.conwag.com

PROPOSED REZONING BY SELWYN DISTRCIT COUNCIL AT HOSKYNS ROAD, ROLLESTON. CONSULTATION UNDER SECTION 3(1) OF SCHEDULE 1 OF THE RMA

We write to you on behalf of our client, Selwyn District Council, in regards to their proposal to rezone land at Hoskyns Road, Rolleston. The remainder of this letter outlines the proposed Plan Change. We welcome any comments you may have regarding the proposal.

Please find enclosed a plan illustrating the area of land to the west of Hoskyns Road to be rezoned for business purposes (Business 2 Zone). The area of the subject land is approximately 56.3 hectares. The proposed incorporates a requirement for development over the land in question to be in accordance with a specific Outline Development Plan prepared in accordance with Plan Change 1 to the Regional Policy Statement which is to be included as an appendix to the District Plan. The land in question is presently zoned Rural and is situated directly adjacent to a Business 2 Zone where the existing IZONE Southern Business Hub is located. The area is identified in Plan Change 1 to the Regional Policy Statement as a greenfield growth area for business purposes.

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We welcome any comments you may have on this proposal. Should you require any further information please contact the writer directly.



Greg Dewe Principal



23 July 2008

Waimakariri District Council Private Bag 1005 RANGIORA 7440

Attention: Victoria Caseley

Dear Victoria

Connell Wagner Limited Level 4, Torrens House 195 Hereford Street (PO Box 1061) Christchurch 8140 New Zealand Telephone: +64 3 366 0821 Facsimile: +64 3 379 6955 Email: cwchc@conwag.com www.conwag.com

PROPOSED REZONING BY SELWYN DISTRCIT COUNCIL AT HOSKYNS ROAD, ROLLESTON. CONSULTATION UNDER SECTION 3(1) OF SCHEDULE 1 OF THE RMA

We write to you on behalf of our client, Selwyn District Council, in regards to their proposal to rezone land at Hoskyns Road, Rolleston. The remainder of this letter outlines the proposed Plan Change. We welcome any comments you may have regarding the proposal.

Please find enclosed a plan illustrating the area of land to the west of Hoskyns Road to be rezoned for business purposes (Business 2 Zone). The area of the subject land is approximately 56.3 hectares. The proposed incorporates a requirement for development over the land in question to be in accordance with a specific Outline Development Plan prepared in accordance with Plan Change 1 to the Regional Policy Statement which is to be included as an appendix to the District Plan. The land in question is presently zoned Rural and is situated directly adjacent to a Business 2 Zone where the existing IZONE Southern Business Hub is located. The area is identified in Plan Change 1 to the Regional Policy Statement as a greenfield growth area for business purposes.

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We welcome any comments you may have on this proposal. Should you require any further information please contact the writer directly.

Greg Dewe Principal



7 August, 2008

Greg Dewe Principal Connell Wagner Ltd PO Box 1061 Christchurch 8140

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Dear Greg-

RE; PROPOSED REZONING BY SELWYN COUNCIL AT HOSKYNS ROAD, ROLLESTON. CONSULTATION UNDER SECTION 3(1) OF SCHEDULE 1 OF THE RMA.

Thank you for the opportunity to offer Christchurch City Council comments on the proposed rezoning at Rolleston.

The area of land you identify is within the proposed urban limits and is identified as SR1 Greenfield Outline Development Plan Area – Business, on Map 1, of the proposed Plan Change 1 to the Canterbury Regional Policy Statement.

Christchurch City Council has no objection to the proposal. If you have any further questions I am happy to discuss with you.

Yours Sincerely



David Mountfort Team Leader City Plan

