OUTLINE DEVELOPMENT PLAN AREA 1

INTRODUCTION
This Outline Development Plan (ODP) is for Area 1. Area 1 includes 68ha of land comprising the southern half of the "Dairy Block" (a Greenfield site formerly used for educational and research purposes) ~~and a number of existing rural blocks to the southeast of the Dairy Block~~ (Recommendation No.31).

The ODP employs sound urban design principles to establish a framework from which future development of the area will be guided. In its formulation, the ODP has considered the provisions of the Selwyn District Plan, the Canterbury Regional Policy Statement, the Lincoln Structure Plan (LSP), and the Ministry for the Environment's Urban Design Protocol.

The ODP has been broken down into four plans. (Density, Movement Network, Green Network and Blue Network)

INTEGRATION WITH THE TOWNSHIP
Area 1 is located between Lincoln University and the existing Lincoln Town Centre. The formulation of the ODP has considered the relationship between these two significant features, and in particular how that relationship can be enhanced through the future development of the site. The ODP has likewise been designed to integrate with the surrounding land uses, including the approved residential subdivisions which apply to the northern "half" of the Dairy Block.

DENSITY PLAN
The ODP Area shall achieve a minimum net density of 10 households per hectare. Higher density residential uses will be located within 'Medium Density' areas adjacent to key open space linkages having access to Primary and Secondary Roads to provide increased housing choice for future residents.

MOVEMENT NETWORK
The primary aim of the overall movement network is to move away from a car-orientated development to a scheme that allows for safe provision of a range of transport options. This has resulted in the creation of short interconnected blocks to encourage connectivity and inter-block permeability, both within the site, and to neighbouring areas.

Streets run generally east-west where possible to allow for correct solar orientation of buildings. The overall network has been designed to accommodate public transport in the event that local services are expanded in the future.

Primary and secondary routes have been identified which form the "backbone" of the network. The Primary Road - which provides for cycle lanes, footpaths, and parking - functions as a collector road, catering to the large proportion of through traffic. It will connect Springs Road in the west to Southfield Drive in the east, and integrate with the road network created by the subdivisions in the Northern Dairy Block. Secondary Roads will also offer footpaths and parking, however their chief function is to provide local access to residences.

The area will include Tertiary Roads to cater solely to local property access; however most of these have not been shown on the ODP. This will allow for appropriate design flexibility at final subdivision stage.

Provision has been made under the LSP for a potential bypass road in the vicinity of the Dairy Block; however no formal plans for the road have been made to date. Nevertheless,

should the Council eventuate a bypass road via the Dairy Block the landscape buffer shown could potentially accommodate such a use and a linkage road could be formed to provide a connection through to Gerald Street.

Active transport options are encouraged by the overall network design. Blocks are designed to be short in length, but where larger blocks occur, provision for mid-block pedestrian linkages should be made.

In addition to the footpaths provided along the road network, off-road pedestrian routes will be available through reserve spaces, including the integrated stormwater management network.

Cycle lanes shall be provided on both sides of the Primary Road. Secondary Roads will be designed to achieve lower overall speeds, creating a safe, comfortable environment for cyclists and pedestrians alike. Off-Road cycle opportunities should be provided within the stormwater network.

The net result of the active transport network will be a neighbourhood which is well integrated internally, and which connects to and links the University, Town Centre and other neighbouring residential, community-based and employment areas.

GREEN NETWORK
Green open spaces will provide amenity for existing and future residents in Lincoln. Key locations and linkages have been shown on the ODP. These spaces should maintain the "open" character of Lincoln and ensure that local residents (particularly those in higher density areas) have adequate provision of and access to quality outdoor spaces. Council's open space requirements cited in the LTP and Activity Management Plans should be adhered to during subdivision design **and as such, these open space areas may be retained in private ownership (Recommendation 35).**

Landscaped buffer areas are proposed in certain areas along the periphery of the ODP Area where it adjoins non-residential activities. This will ensure effects arising from conflicting land uses are minimised, particularly reverse sensitivity with rural neighbours. Unless otherwise specified by Council, buffers will remain in private ownership.

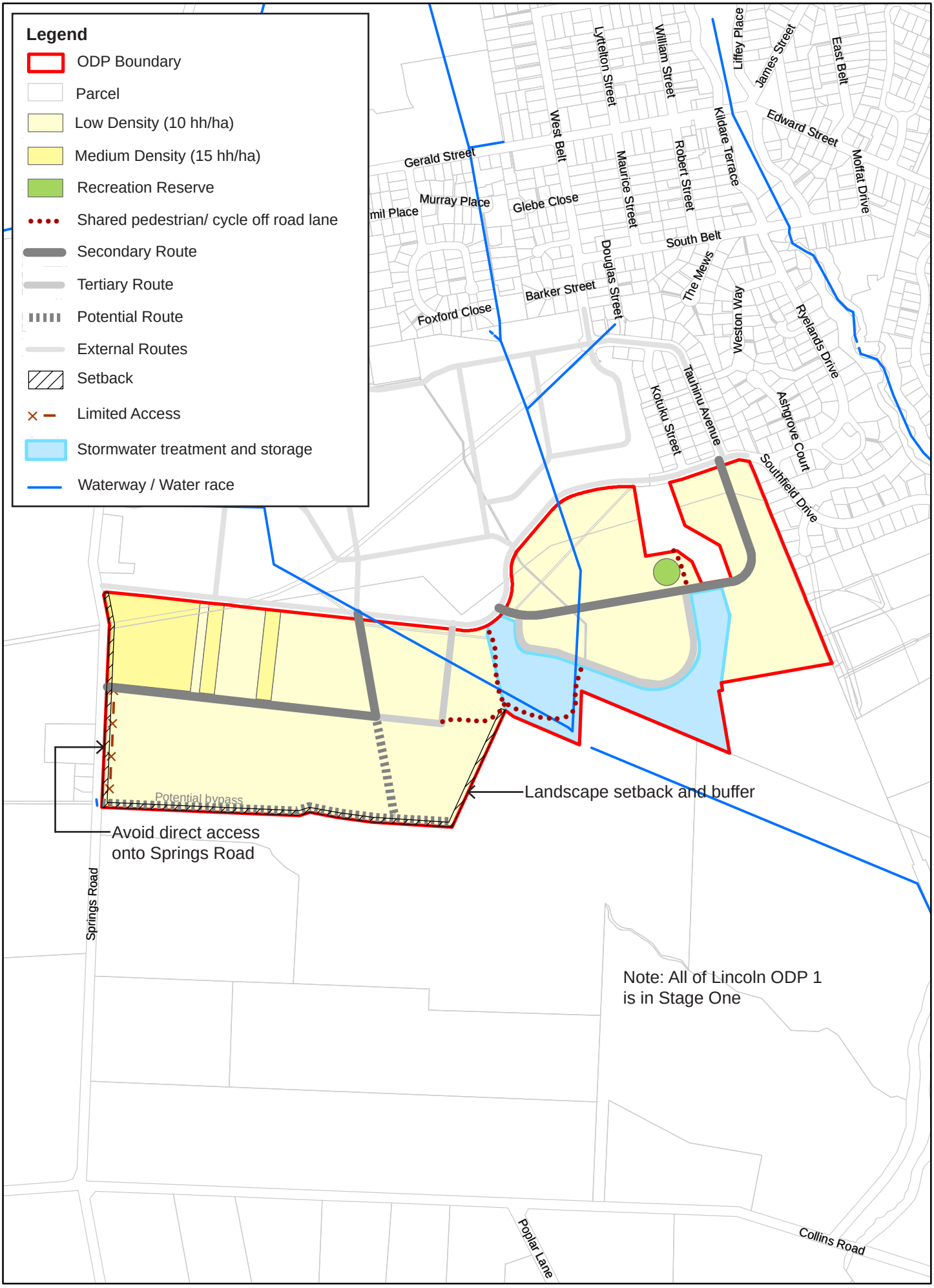
BLUE NETWORK
Area 1 provides for an innovative stormwater management network. This system uses five levels of treatment to ensure that discharge quality to the LII (and eventually to Te Waihora) are equal to or better than pre-development levels. This includes a network of swales, sumps, wetponds, wetlands, and attenuation basins. Where appropriate, educational materials should be integrated into the design of the network to raise local awareness about the importance of the system and the effects that local residents can have on its efficient operation.

~~The ODP also recognises the wetland system identified in the Lincoln Structure Plan as a potential alternate stormwater management solution. This wetland system has not been finalised to date; however it may be developed in lieu of portions of the stormwater management area identified in the Dairy Block.~~ (Recommendation 31)

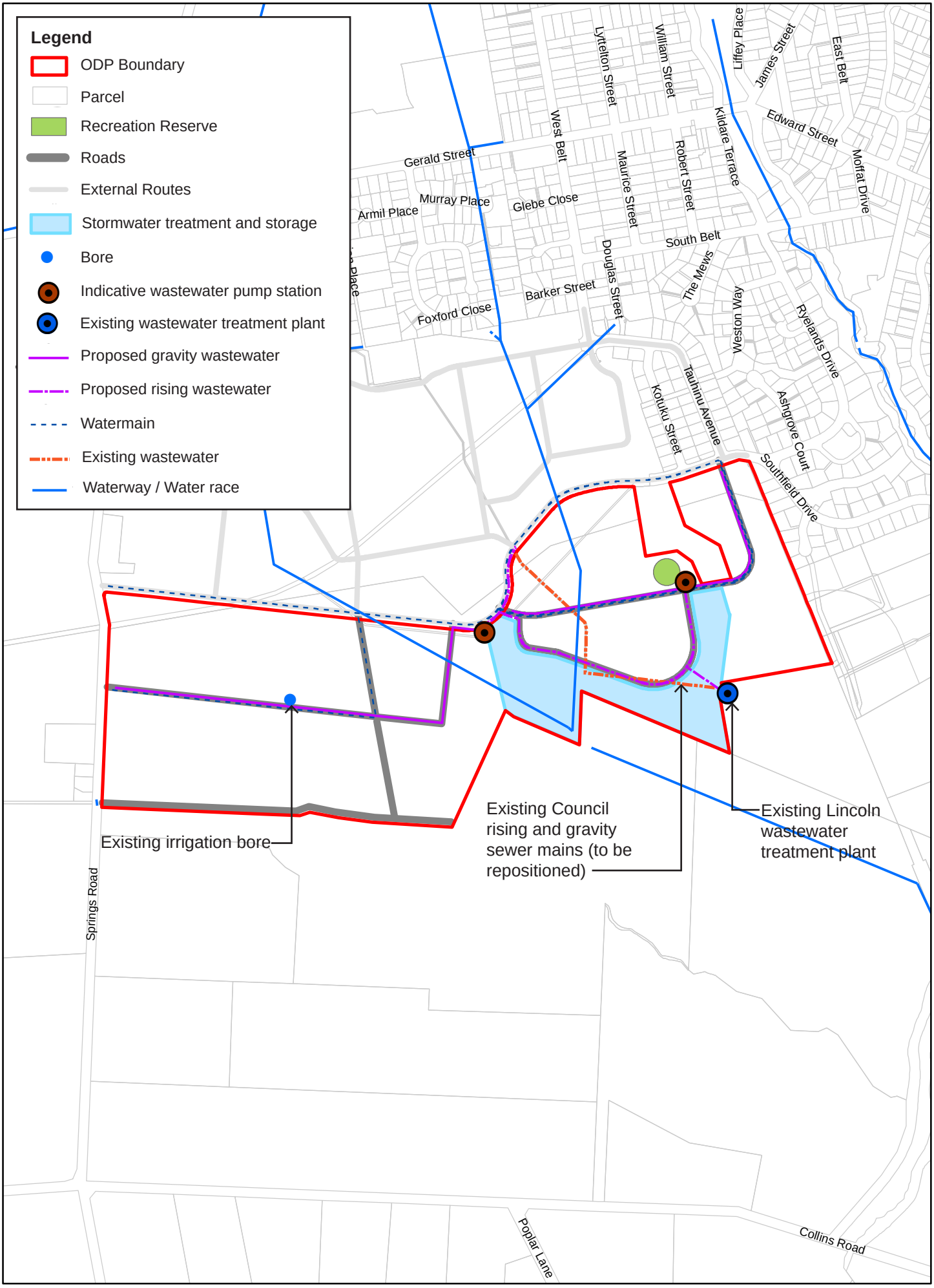
The proposed wastewater network will include a system of gravity mains and pump stations to convey wastewater off-site. This network will integrate with the system which services the Northern Dairy Block subdivisions and includes the relocation of the existing Lincoln Township rising mains. The land to the east of the Dairy Block should gravity feed wastewater toward the south-eastern extent of the ODP area, where it would then be pumped to the existing rising main shown. Indicative locations of pump stations have

been shown; however, the final number and precise location of these assets will be finalised at subdivision stage.

The subdivisions to the north also include the provision of a freshwater bore which could be sized to provide potable water to future dwellings in the ODP area. An existing irrigation bore in the south-western portion of the ODP area could be converted for residential use if required. Water mains in the land to the east of the Dairy Block should align with the future tertiary road configuration.



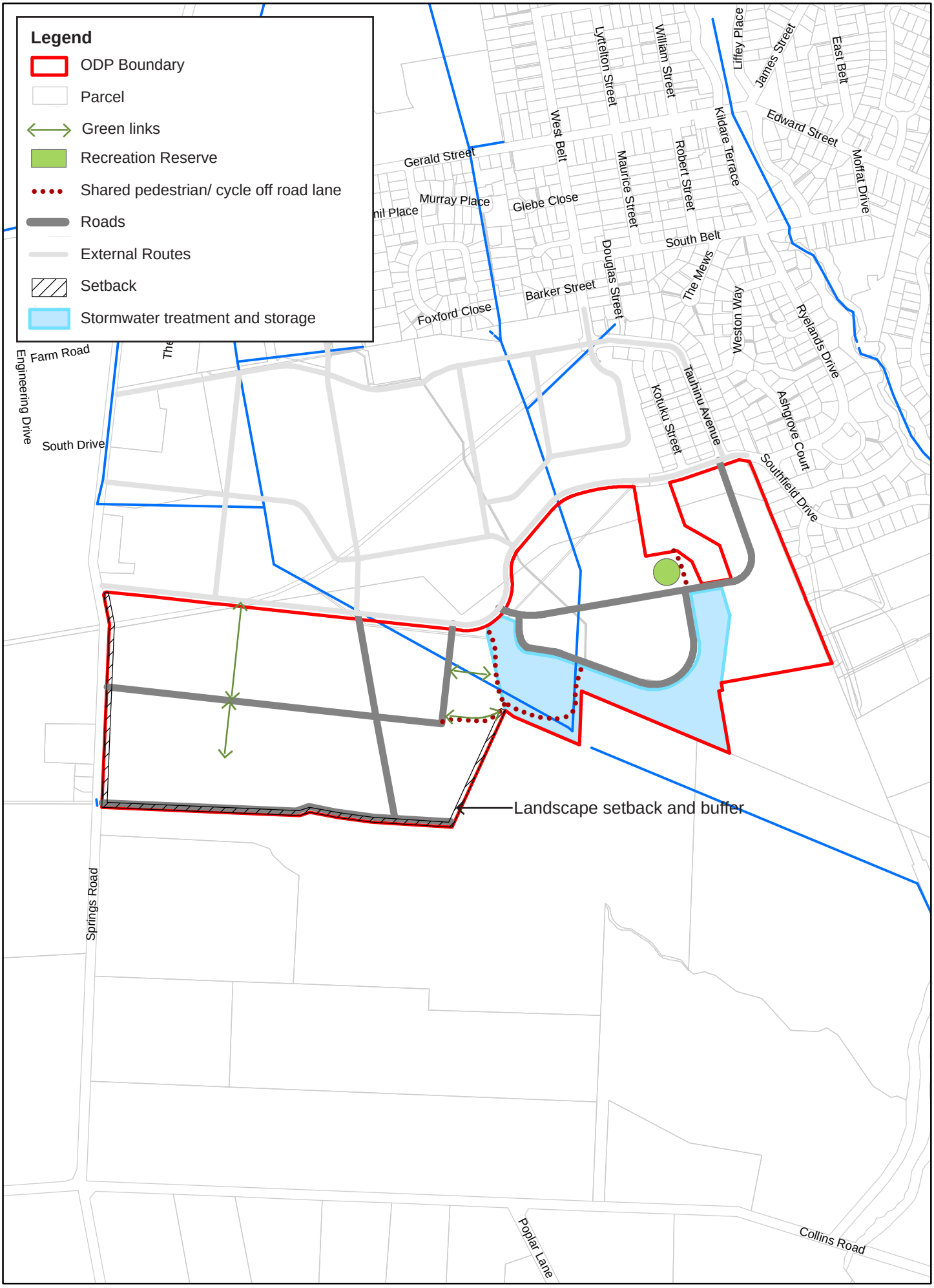
Outline Development Plan
Area 1 - Lincoln
Density Plan



Outline Development Plan

Area 1 - Lincoln

Blue Network



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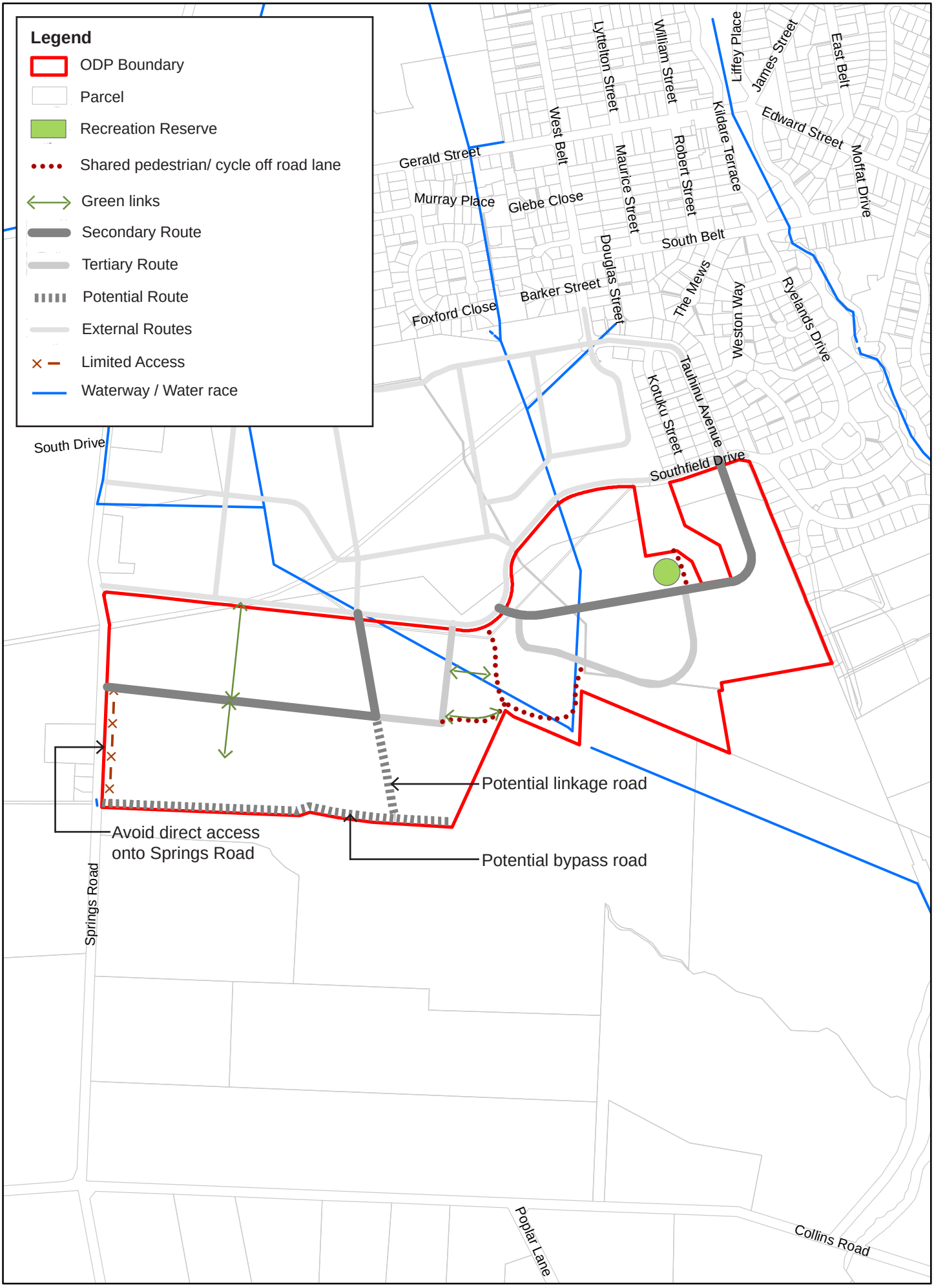
Outline Development Plan
Area 1 - Lincoln
Green Network



Outline Development Plan
Area 1 - Lincoln
Movement Network

OUTLINE DEVELOPMENT AREA 2

INTRODUCTION

This Outline Development Plan (ODP) is for Area 2. The ODP employs sound urban design principles to establish a framework from which future development of the area will be guided. In its formulation, the ODP has considered the provisions of the Selwyn District Plan, the Canterbury Regional Policy Statement, the Lincoln Structure Plan (LSP), and the Ministry for the Environment's Urban Design Protocol.

The ODP has been broken down into four plans. (Density, Movement Network, Green Network and Blue Network)

DENSITY PLAN

Each property within ODP Area 2 will be required to achieve a minimum net density of 10 households per hectare ~~to meet the objectives of the Lincoln Structure Plan~~.

MOVEMENT NETWORK

Overall objectives:

- Design primary roading layout in general accordance with Lincoln Structure Plan.
- Connect Southfield Drive to provide a connection between Lincolndale and Ryelands subdivisions at the western end of ODP Area 2, and Ellesmere Road at the eastern end.
- Provide efficient through-road linkages between properties within ODP Area 2.
- Construct a road bridge across the L2 creek to provide the "southern linkage" to Ellesmere Road
- Align main north-south road with adjoining ODP Area 3.

The Road Network Plan is consistent with the roading network in the Lincoln Structure Plan and shows predominantly the Primary Roading layout through ODP Area 2. The location of the secondary road network has already been designed in some parts of ODP Area 2, but not across the entire ODP Area. The location of secondary routes will be determined at a later stage in conjunction with detailed urban design for specific areas.

The primary route layout shows connections to major arterial roads (Edward Street and Ellesmere Road) with intersections, and corner splays in those locations. This includes the bridging across the L2 creek which will enable a primary east west route across the area to be created (Southfield Drive to Ellesmere Road). This will connect southern areas of Lincoln township to Ellesmere Road providing another main vehicular route to supplement the existing Edward Street route.

The proposed east west connection will also allow an alternative route for public transport services in a logical manner rather than requiring a focus on Edward Street.

The main north-south primary route through Property 4 has been positioned so that it lines up directly with the main entry road servicing land directly to the north of Edward Street (ODP Area 3).

No roading is shown through Property 3 as this property is only part of the ODP Area 2 for stormwater treatment, retention, and disposal reasons. No residential development will occur on this property and therefore no road connections are required.

The ODP p~~P~~rovides efficient and well connected on-road and off road cycle and pedestrian linkages within the site with connections to existing surrounding residential areas such as Lincolndale and Ryelands, together with adjoining ODP areas such as ODP Area 3 to the north. Other characteristics include:

- Provision for the Christchurch to Little River Railtrail alongside the L2 Creek from Edward Street to Moirs Lane within planned esplanade and other reserves. This includes linkages to other internal pedestrian and cycle routes developed in the ODP area and wider connections to the Lincoln University and other southern growth areas of the township via Southfield Drive.
- Providing an integrated network of off street pedestrian and cycling facilities alongside the L1 and L2 Creeks, and within planned stormwater treatment areas capitalising on any amenity opportunities as may be provided by Council as part of this. On road cycling will be provided on primary roads using cycle lanes where appropriate.

OPEN SPACE NETWORK
Overall objectives:

- Utilise the existing natural features of ODP Area 2 and integrate these features into the Open Space Network.
- Integrate the stormwater management system with the Open Space Network System.
- Provide an Open Space Network centred on the L1 and L2 creeks, stormwater management area in Property 3, and an additional reserve area in the centre of Property 4.
- Provide a landscape setback and buffer along Ellesmere Road.
- Provide local reserves with in ODP Area 2 within an approximate 400m walking radius.

The esplanade reserve system along the L1 and L2 creeks will be reinforced by additional open space areas alongside the esplanade reserves. The additional areas will be contributed as part of the reserve contribution required for residential subdivision.

A reserve will be provided in the centre of Property 4. This reserve will be pedestrian accessible from all parts of Property 4 i.e. within a maximum of 380 metres from all parts of Property 4. ~~A reserve within Property 2 adjacent to the Esplanade Reserve will be provided.~~ (Recommendation 37)

A walkway system will be provided between the central reserve area on Property 4 and the reserve system along the L2 creek.

The stormwater management system treatment system on Property 3 will be integrated into the reserve system and allow public access to the L2 creek.

BLUE NETWORK
Overall objectives:

- Ensure that an integrated and efficient services network is provided across the entire ODP Area 2.
- Design the location of services on the basis of an efficient "ODP wide" system rather than on an individual property or subdivision only basis.
- Provide a sewer pump station adjacent to the "east-west primary road" with sufficient capacity to accommodate residential development on all of ODP Area 2.
- Design the primary stormwater management system in general accordance with the Lincoln Integrated Stormwater Management Plan (ISMP).
- Provide on-site stormwater management where ISMP system is not available.
- Where possible, utilise natural drainage patterns and swales for stormwater management.

- Stormwater management areas will be designed to be integrated with reserves and open spaces, pedestrian walkway, and cycling networks.
- Provision of a comprehensive stormwater / wetland system, including stormwater wetland areas where required to accommodate necessary flows and secondary flow paths or flood capacity measures away from residential property.
- Provide a 'springs reserve' to separate spring water from stormwater flows through the wetland into the Ararira / L2 River to protect the tangata whenua values of the spring water. (Recommendation 37)
- Provision of wells and water pumping facilities to provide sufficient capacity for all future growth in this area, including main trunk connections where necessary.

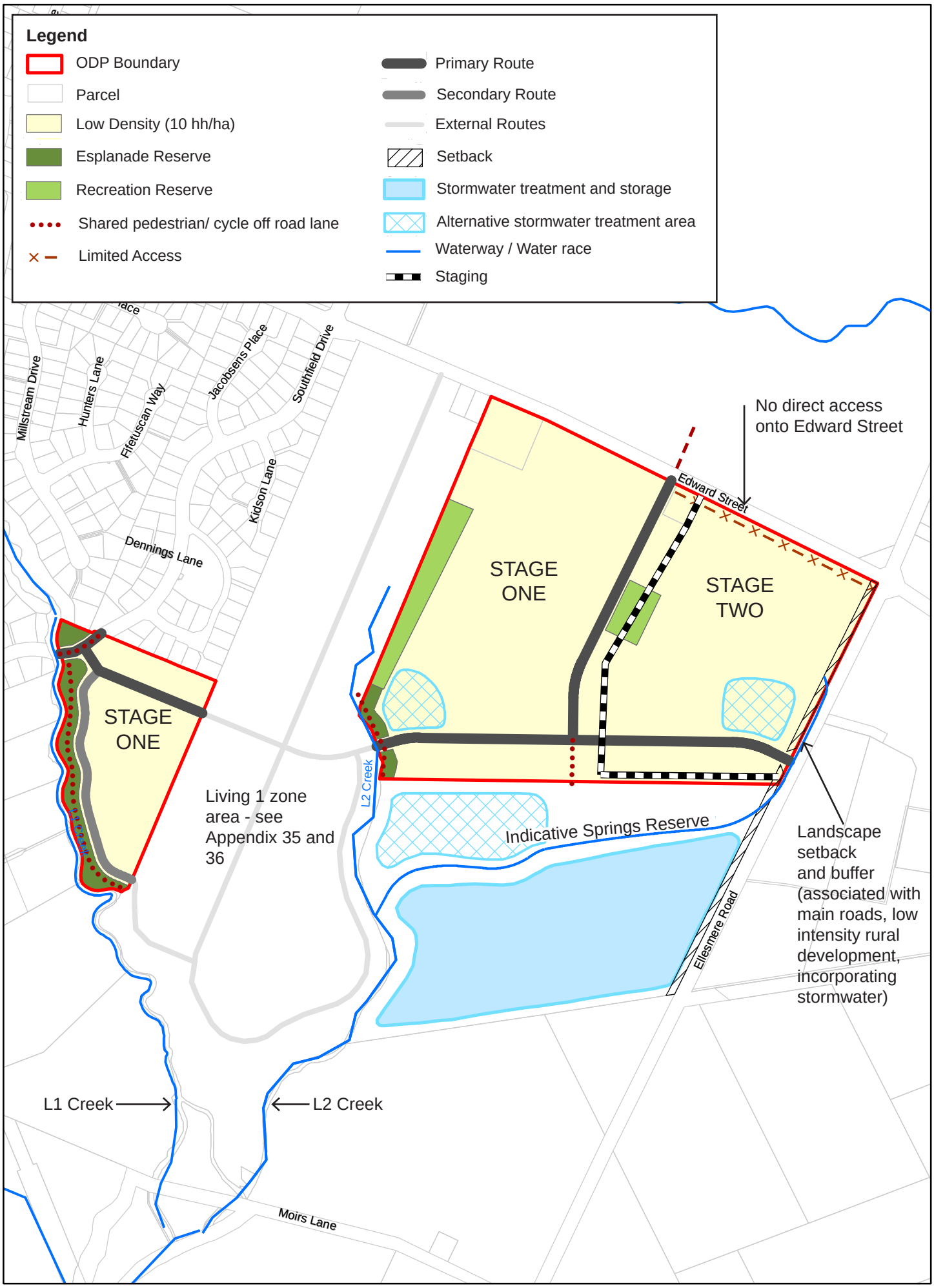
The sewer system in ODP Area 2 will provide sufficient capacity to accommodate flows from within the ODP Area 2. This will provide an efficient, integrated, and cost-effective sewer system for eastern Lincoln.

A sewer pump station will be provided in the southern part of the proposed Liffey Springs subdivision to accommodate flows from all of ODP Area 2.

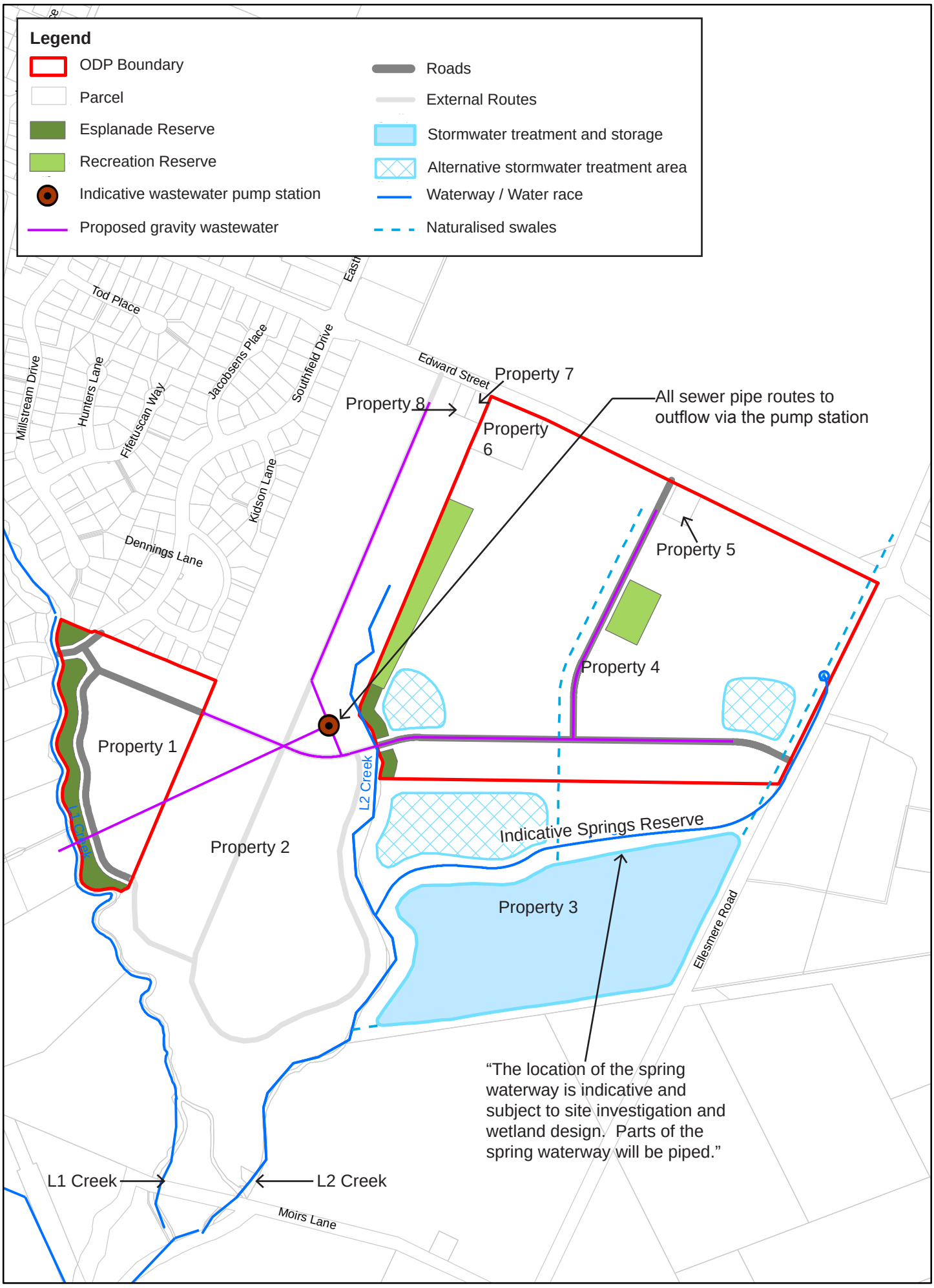
Esplanade reserves and open space areas will be provided along the L1 and L2 creeks and provide a duel purpose of stormwater management and public open space and recreation.

Stormwater management for Properties 1 and 2 will be provided at the southern end of the Liffey Springs and be integrated with the confluence of the L1 and L2 creeks.

A stormwater management and storage area will be provided on Property 3, the storage area will be designed to manage flows from residential development on Property 4 and from urban development on ODP Area 3, north of Edward Street. These flows may be conveyed via a newly constructed SW drain alongside Ellesmere Road through Property 4.



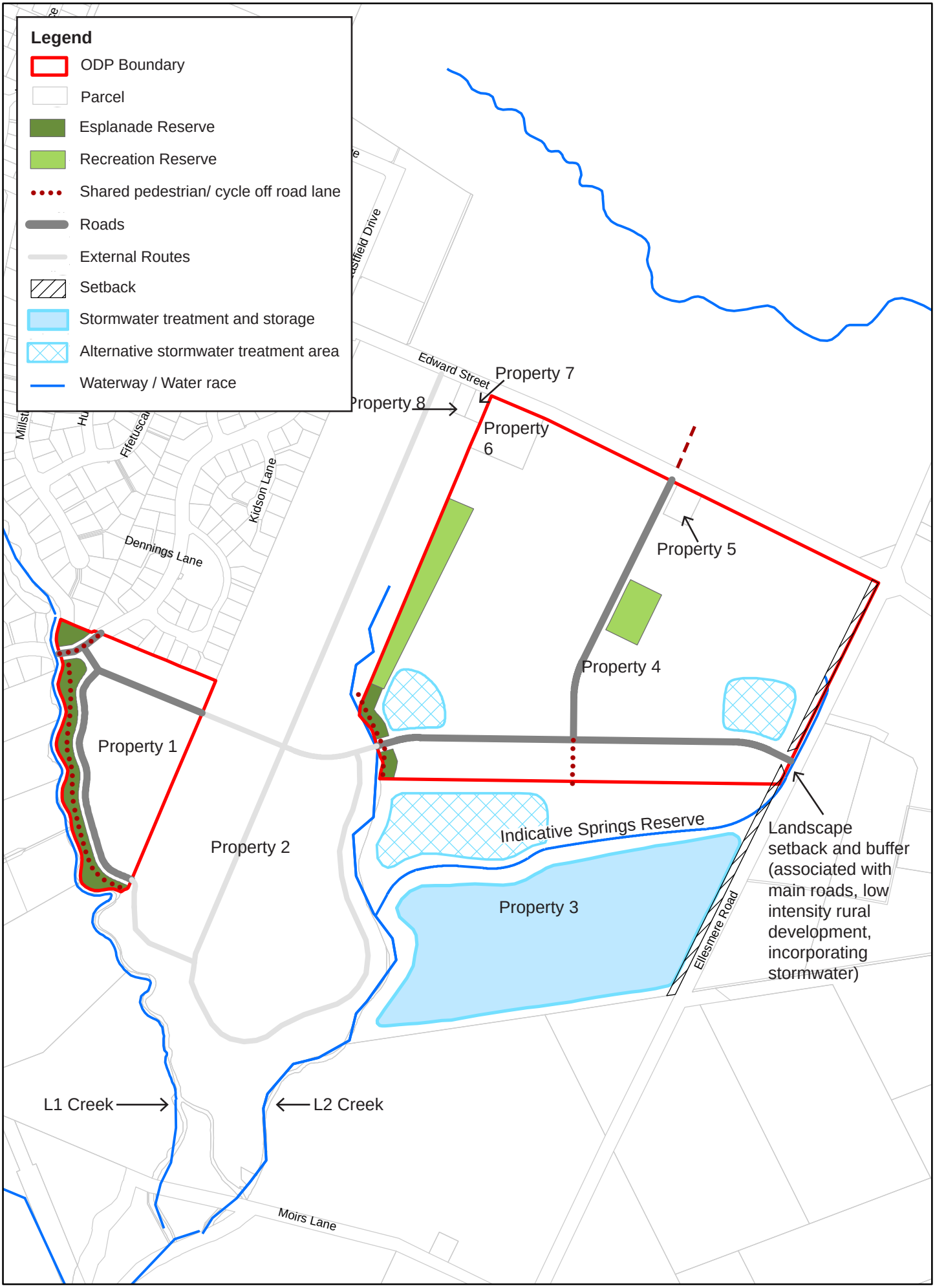
Outline Development Plan
Area 2 - Lincoln
Density Plan



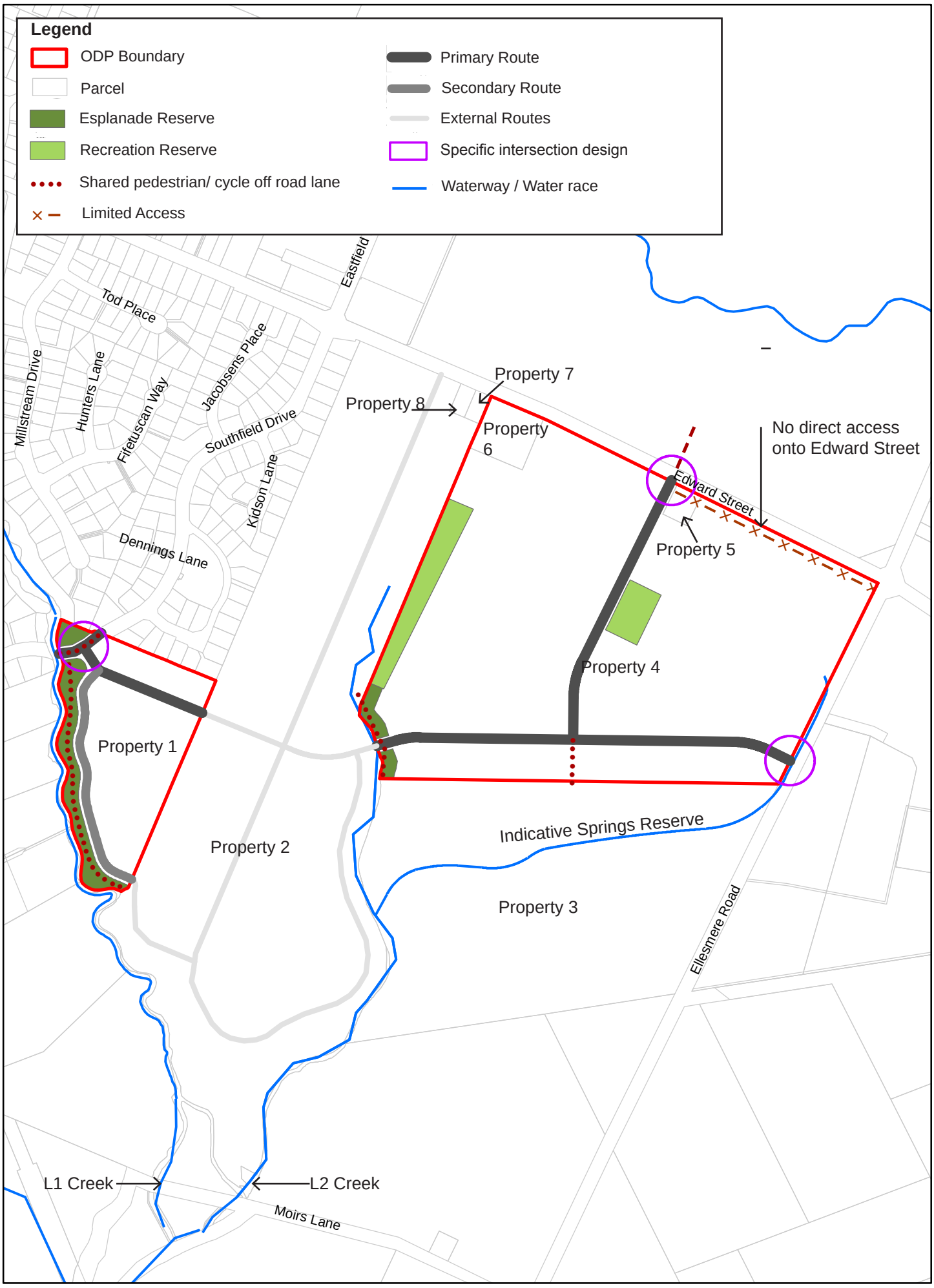
Outline Development Plan

Area 2 - Lincoln

Blue Network



Outline Development Plan
Area 2 - Lincoln
Green Network



Outline Development Plan
Area 2 - Lincoln
Movement Network

OUTLINE DEVELOPMENT PLAN 3

INTRODUCTION
This Outline Development Plan (ODP) is for Area 3. This provides an overarching urban design framework to guide future development of the land. It provides the principles and design intent that will underpin development of the Masterplan.

Consistent with the Lincoln Structure Plan, the ODP supports the principles of strong connectivity to Edward Street, Birchs Road and Ellesmere Road, protection of valued drainage paths through the site and the provision for a Neighbourhood Centre.

The ODP has been broken down into four plans. (Density, Movement Network, Green Network and Blue Network)

URBAN DESIGN PRINCIPLES
The design principles that underpin this ODP are in line with the Ministry for the Environment's design guide for urban New Zealand "People Places Spaces" which is endorsed by the 'New Zealand Urban Design Protocol'.

Principle	Elements	Purpose
Consolidation and dispersal	■ Development patterns ■ Intensity	To promote higher-intensity development around existing or new nodes and lower density on the periphery. This allows local communities, businesses and public transport to be strengthened and resource efficiencies achieved, while reducing environmental impacts on peripheral areas.
Integration and connectivity	■ Movement networks ■ Building interfaces	To promote development that is integrated and connected with its surrounding environment and community. This facilitates ease of access, economy of movement and improved social interaction.
Diversity and adaptability	■ Mixes of uses ■ Flexibility of buildings	To promote choice through the provision of a diverse mix of compatible activities and uses, so built environments can adapt over time. This facilitates the ability to respond efficiently to social, technical and economic changes.
Legibility and identity	■ Town form ■ Visual character	To promote environments that are easily understood by their users, and that display a strong local identity and appropriate visual character. This facilitates an enhanced usage, enjoyment and pride

		in local places.
Environmental responsiveness	■ Ecosystems ■ Green network ■ Urban water ■ Waste ■ Energy	To promote urban environments that are responsive to natural features, ecosystems, water quality, reduced energy usage and waste production, and balance the spatial needs to achieve this with those required for urbanisation. This facilitates improved ecological outcomes.

DENSITY PLAN

Higher intensity residential development with smaller lots, should be located near proposed open space areas that intersect with primary roads, and in close proximity to walkway / cycleway links to Edward St, which in turn provides access to the town centre. This allows for more compact development in the areas where services and amenities are accessible. Lower intensity with larger lots on the periphery will allow for greater setbacks and landscaping along the northern boundary and the Ellesmere Road and Edward Street boundaries.

More intensive density development concentrated around a central open space network will provide greater amenity and high quality development in these areas.
The Neighbourhood Centre (new commercial/ retail node) should be located with frontage onto the primary route, and in close proximity to Edward Street to maximize potential patronage from existing surrounding residential areas. ~~The proposed school should also be located with frontage onto the adjoining primary route, with the playing fields potentially contributing to the overall open space network.~~ A primary school could be located within this ODP, subject to confirmation by the Minister of Education /Ministry of Education and the landowners. (Recommendation 38).

Over the ODP area a minimum net density of 10 households per hectare is to be achieved.

MOVEMENT NETWORK

A legible hierarchy should be created for roads within Area 3, providing integrated connections to adjacent neighbourhoods and future development blocks. The primary routes should be consistent with the Lincoln Structure Plan and support strong connectivity to Edward Street, Birchs Road and Ellesmere Road. The road network should provide efficient and convenient connections between destination points such as community facilities, including the proposed Neighbourhood Centre and school, and allow for public transport. A logical choice of direct routes should be provided to disperse traffic volumes and reduce travel distances.

Provision of primary and secondary routes will enable safe pedestrian and cycle movements through the site, movement paths for stormwater, and green corridor connections with large centralized areas of open space. Design strategies for these roads should be integrated while minimising conflict between vehicles, pedestrians and cyclists. Primary routes will create a 'spine' for the site with commercial and community areas having direct frontage to these routes.

The north-south oriented primary routes will cross the drainage corridor, while other routes will follow the edges of the centralised reserve areas, providing safe, memorable and legible movement patterns that relate to natural site features and vistas.
All other local streets are not included in the ODP to ensure that the layout remains flexible and responds to built form.

The length, location, geometry, width and overall design of these streets should reduce traffic speeds to allow for safe, pedestrian accessible environments. The patterns created by the streets and open space network should connect neighbourhoods, and in general this will mean that most roads will be through-routes, and any cul-de-sacs should be limited in number and length.

The cycle and pedestrian network has a relationship with the underlying road pattern and open space network. Safe and convenient access for pedestrians and cyclists should be provided for all routes, including footpaths and in some cases cycle lanes. Footpaths should be provided on all roads, and widths may vary depending on the road hierarchy and anticipated use. Barrier free access should be provided along and across all roads for all users including those with mobility restrictions. Along Ellesmere Road and Edward Street additional road reserve may need to be vested in council to accommodate infrastructure positioning such as footpath / cycleway in relation to the appropriate design of these frontages.

Dedicated on-street cycle lanes should be provided for all primary routes. All other streets should be slow speed, low traffic volume environments which are pedestrian and cycle friendly, and create liveable public spaces for the community. In some cases these may be shared surfaces.

Roads edging open spaces should provide safe and direct alternative routes for night use that complement open space movement patterns. These roads also provide passive surveillance and multiple entry and exit points to open space areas. These roads should adequately provide for walking and cycling and have good lighting.

The street pattern should provide direct and convenient access so that a maximum 400m walking distance is provided between all dwellings and open space areas within the site. An off- street cycle path is proposed along Edward Street in accordance with the Lincoln Structure Plan. Other off-street walkways and cycleways are proposed through Browns Lane **(which will be deferred until such time as the Duncan Block is developed for residential purposes) (Recommendation 38)** and the connected open space network, including the central drainage reserve, as well as along Ellesmere Road. Pedestrian links should be provided from Edward Street and Ellesmere Road to connect to the street network, and pedestrian access should be provided to an existing walkway on the western boundary of the site. **Any paths crossing the Liffey Fields stormwater facility should be avoided as far as practicable. (Recommendation 38)**

Along the lane from Edward St (Browns Lane) as indicated on the plan fencing is to be restricted to a maximum height of 1m max height for a solid fence, or maximum 1.5m for a semi-transparent fence (i.e. pool style fencing) to provide for surveillance opportunities. Fencing will be along the rear of the adjoining properties so there is a need to retain some flexibility to design for privacy and security in outdoor yards as well as to maintain surveillance.

GREEN NETWORK
The existing natural drainage patterns within the southern portion of the site underpin the connected system of accessible open space. Utilising and enhancing the natural features of the site will contribute to overall character and sense of place, offer more varied

recreational experiences, and create a focal point for the community. Reserves should be consolidated around this central core to create large, well proportioned areas for a range of active and passive recreational activities. ~~The location and orientation of the proposed school and playing fields should complement this extensive recreational asset~~.
(Recommendation 38)

In terms of the northern portion of the site, neighbourhood reserves will be developed as part of the overall subdivision design. These will integrate with drainage channels and natural features to provide for a high level of connectivity, recreational value and neighbourhood character.

For the site as a whole, open space areas (including the stormwater reserves) should be accessible from primary and secondary routes within the site, and within a 400m walking distance of all new dwellings. In general, open space areas bounded by roads are more secure because of informal surveillance from passers-by and overlooking from windows and outdoor areas of nearby houses. Reserves that are clearly visible are likely to attract more users and be more valued by the community.

The design of streets will contribute to the overall character and connectedness of the public network of open space. Wide berms with footpaths and avenues of trees can create a boulevard effect to assist with navigation to open space areas. Vistas and key road junctions that terminate with open spaces and landscape features provide opportunities for good user legibility within the site. The junctions between primary routes should also be considered to ensure that long vistas terminate with landmark features such as trees within a landscape setback, and/or landmark buildings.

Integration with the surrounding green network should be provided, including the existing reserve to the west of the site. Appropriate landscape setbacks should be provided along Edward Street and Ellesmere Road for trees and buffer planting, and to facilitate an off-road cycle and pedestrian connection.

BLUE NETWORK
Additional water supplies will be obtained from the installation of new bores. These bores will be located to suit the required pressures and flows. All water mains will follow the road network or pedestrian routes. There are a number of existing bores over the site that could be upgraded to potable standard.

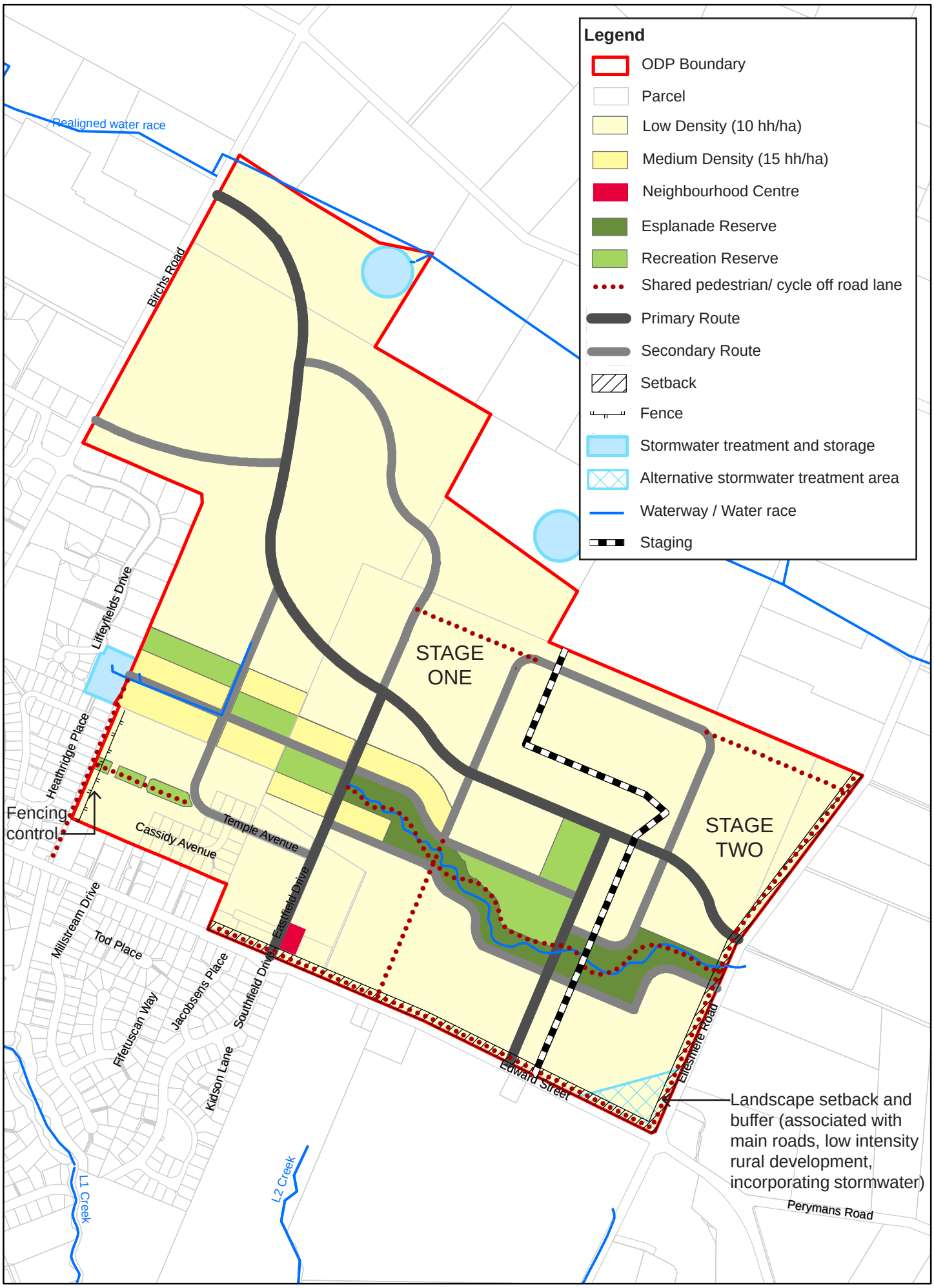
The stormwater network incorporates existing natural drainage patterns that meander east-west through the site, reserves and streets with above- ground stormwater management devices such as swales. Any requirements for stormwater detention and attenuation in the southern catchment should generally be accommodated within the Integrated Stormwater Management Plan (ISMP). The northern catchment is in the Halswell catchment and subject to specific other parameters dictated by Environment Canterbury. The southern catchment discharges to Lake Ellesmere.
Stormwater reserves should also be designed and used for recreational purposes such as walking and cycling, and integrated with the open space network. Along with riparian management techniques, these reserves can create valuable ecological corridors and habitats, as well as significant amenity and localized character for the neighbourhood.
An alternative facility may be available for the southern catchment of Area 3 at the corner of Edward Street and Ellesmere Road. Part of the southern catchment can drain to the Liffey Fields stormwater facility.

Sewer connection from the southern catchment to the Lincoln Storage Facility will be via the existing sewage pump station in Lincoln Dale.

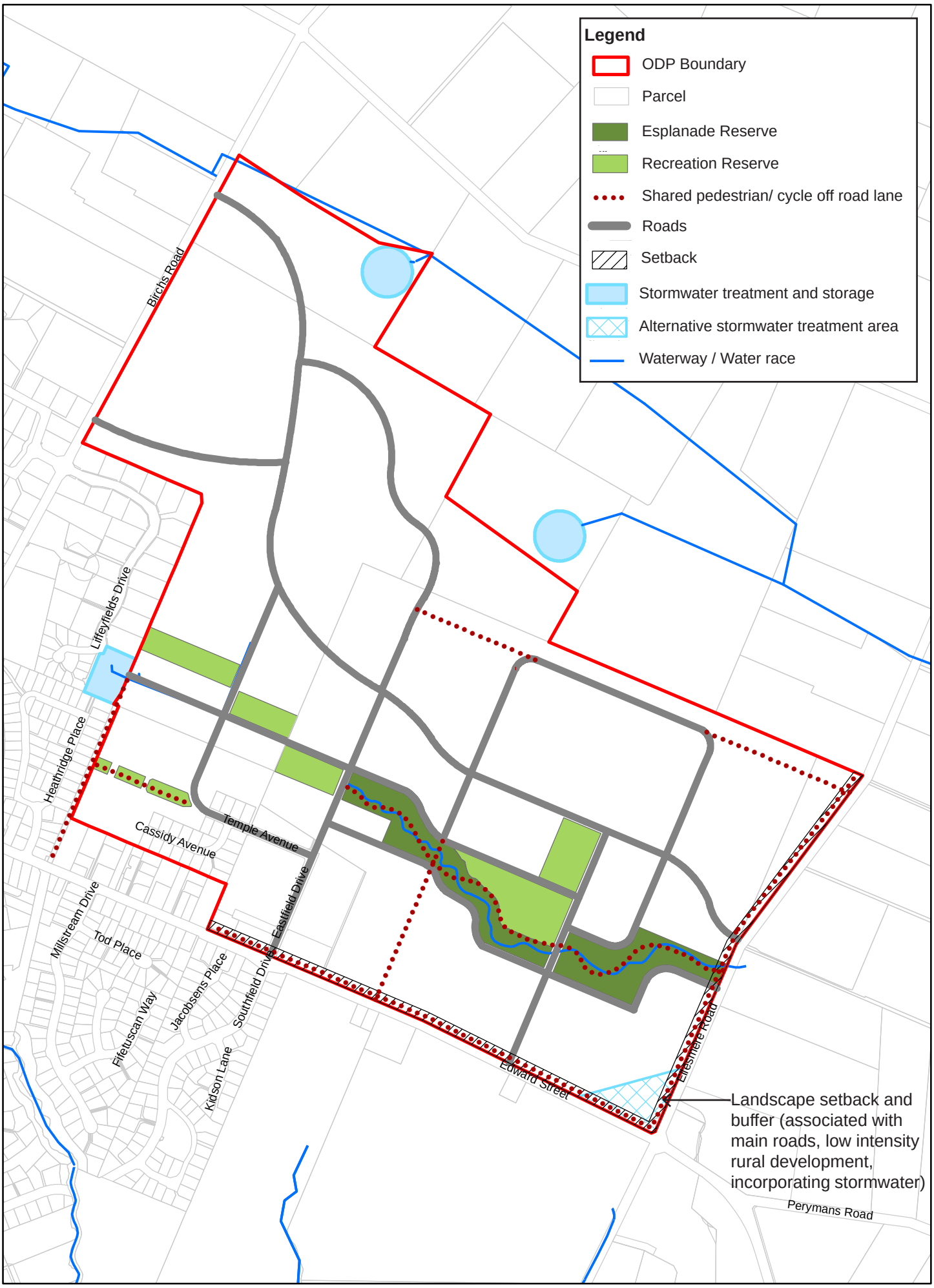
The northern catchment will need to be pumped to the Lincoln storage Facility via proposed pump station (2). The route of the rising sewer from pump station (2) can be agreed at a later date as options exist.

SPECIFIC ODP STANDARDS (Refer to Rule 12.1.3.37):

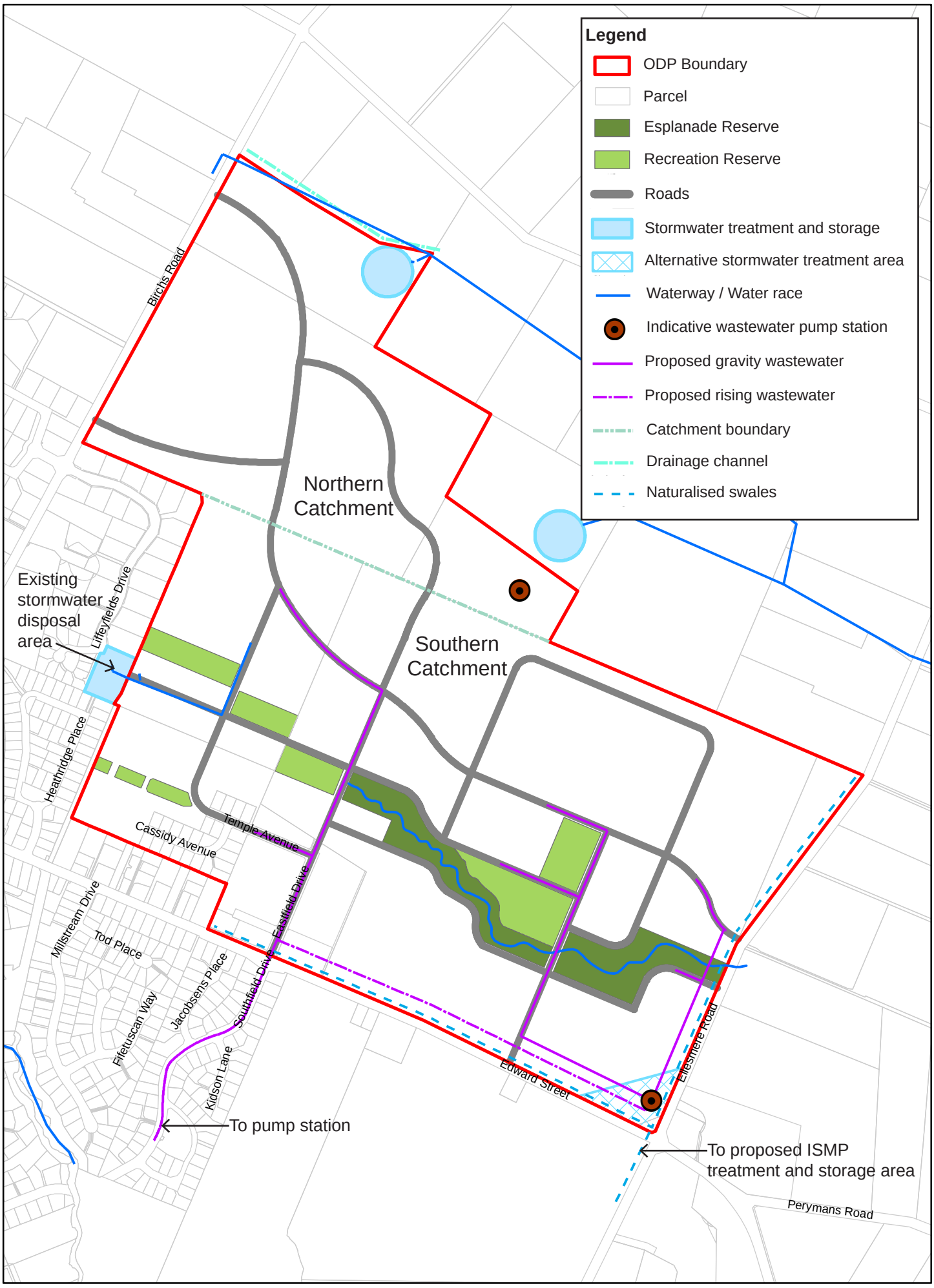
- **Fencing erected adjacent to Browns Lane (as indicated on ODP Area 3) shall not exceed a height of 1m for a solid fence, or 1.5m for a semi-transparent fence. (Recommendation 4)**



Outline Development Plan
Area 3 - Lincoln
Density Plan



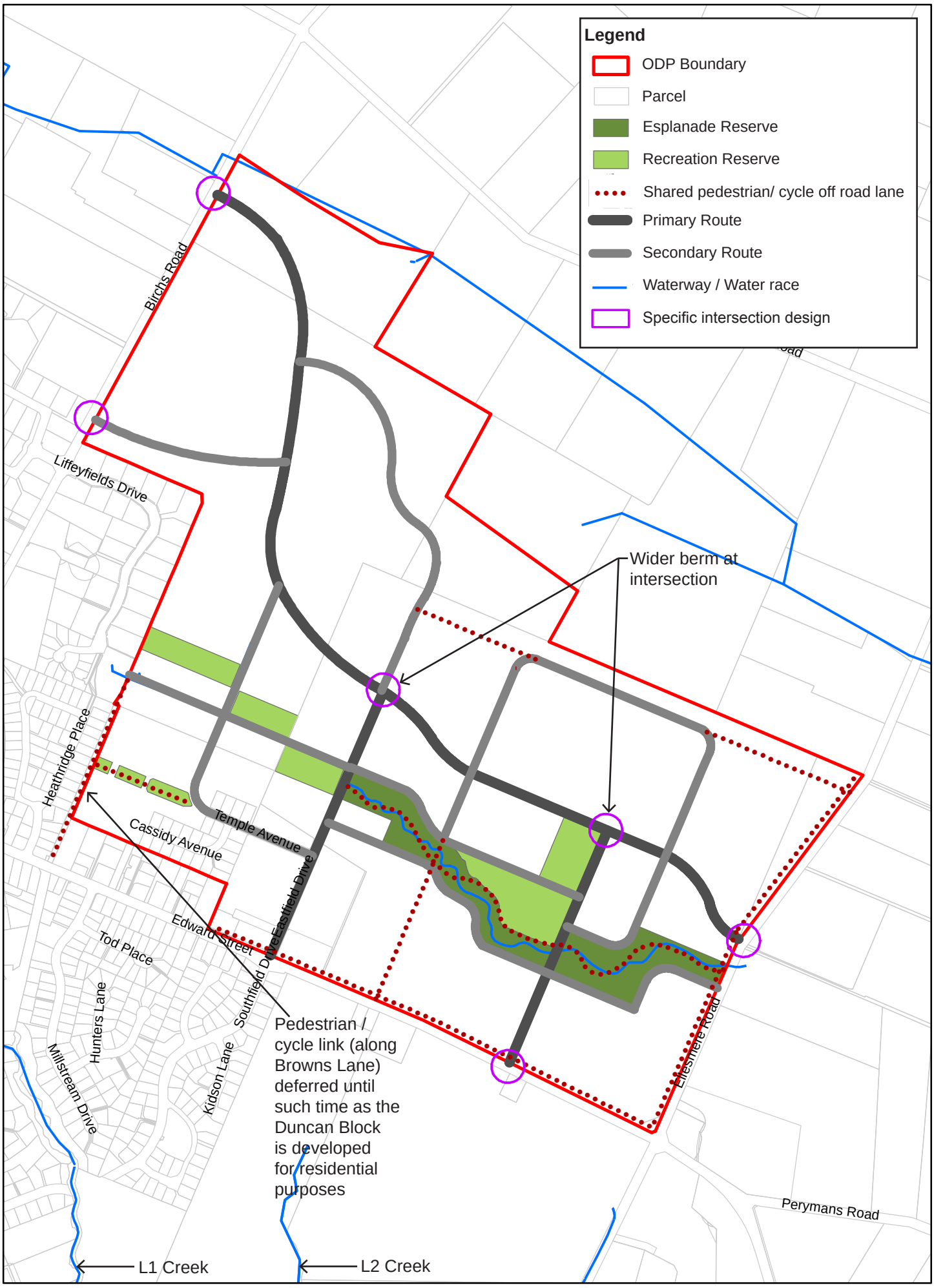
Outline Development Plan
Area 3 - Lincoln
Green Network



Outline Development Plan

Area 3 - Lincoln

Blue Network



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Outline Development Plan
Area 3 - Lincoln
Movement Network

OUTLINE DEVELOPMENT PLAN 4

INTRODUCTION
This Outline Development Plan (ODP) is for Area 4. This ODP provides an overarching urban design framework to guide future development of the land. It provides the principles and design intent that will underpin development of the Masterplan. Development applications will need to demonstrate consistency with the final ODP that is formulated for the area.

Consistent with the Lincoln Structure Plan, the ODP supports the principles of strong connectivity to Birchs Road an integrated transport walking network, protection of valued drainage paths through the site.

The ODP has been broken down into four plans. (Density, Movement Network, Green Network and Blue Network)

DENSITY PLAN
The Area 4 Outline Development Plan area will be comprised entirely of conventional residential development in accordance with the Lincoln Structure Plan. Over the Outline Development Plan area a minimum net density of 10 households per hectare is to be achieved. The Northern extent of the Outline Development Plan area adjoining Tancreds Road, will have a 20m Building Setback requirement. The setback will provide a buffer between the residential development and adjoining rural area. This Setback will be extended onto Birchs Road as far as the first entrance into the area.

MOVEMENT NETWORK
A legible hierarchy should be created for roads within Areas 4, providing integrated connections to adjacent neighbourhoods and future development blocks. The primary routes should be consistent with the Lincoln Structure Plan and support strong connectivity to Birchs Road and Northfield Drive extension in Area 3. The road network should provide efficient and convenient connections between residential areas and destinations such as community facilities and Neighbourhood Centres as well as allowing for public transport. A logical choice of direct routes should be provided to disperse traffic volumes and reduce travel distances.

Provision of primary and secondary routes will enable safe pedestrian and cycle movements through the site, movement paths for stormwater, and green corridor connections that also provide areas of open space. Design strategies for these roads should be integrated while minimising conflict between vehicles, pedestrians and cyclists. The East-West orientated primary route will provide a collector road link across Area 4. It will cross and link with pedestrian , cycleway routes and areas of open space providing legible movement patterns that relate to natural site features and vistas.

The connection to Boundary Road can be routed ~~either~~ through the Golf Course ~~or the directly adjacent land,~~ utilising ~~existing tracks and/or~~ unused parts of the Golf Course. (Recommendation 39)

All other local streets are not included in the ODP to ensure that the layout remains flexible and responds to built form.

There will be no direct property access onto Tancreds Road or Birchs Road. A portion of this frontage will also be subject to a 20m building setback as shown on this plan. The length, location, geometry, width and overall design of these streets should reduce traffic speeds to allow for safe, pedestrian accessible environments. The patterns created by the streets and open space network should connect neighbourhoods and in general this

will mean that most roads will be through-routes, and any cul-de sacs should be limited in number and length.

The cycle and pedestrian network has a relationship with the underlying road pattern and open space network. Safe and convenient access for pedestrians and cyclists should be provided for all routes, including footpaths and in some cases cycle lanes. Footpaths should be provided on all roads, and widths may vary depending on the road hierarchy and anticipated use. Barrier free access should be provided along and across all roads for all users including those with mobility restrictions.

Dedicated on-street cycle lanes should be provided along the primary route. All other streets should be slow speed, low traffic volume environments which are pedestrian and cycle friendly, and create liveable public spaces for the community. In some cases these may be shared surfaces.

Road edging open spaces should provide safe and direct alternative routes for night use that complement open space movement patterns. These roads also provide passive surveillance and multiple entry and exit points to open space areas. These roads should adequately provide for walking and cycling and have good lighting. The street pattern should provide direct and convenient access so that a maximum 400m walking distance is provided between all dwellings and open space areas within the site.

The open space corridor with direct connections to the Little River Rail Trail on Birchs Road is proposed in accordance with the Lincoln Structure Plan.

GREEN NETWORK
The existing natural drainage patterns underpin the connected system of accessible open space. Utilising and enhancing the natural features of the site will contribute to overall character and sense of place, offer more varied recreational experiences, and create a focal point for the community.

Neighbourhood reserves will be developed as part of the overall subdivision design. These will integrate with drainage channels and natural features to provide for a high level of connectivity, recreational value and neighbourhood character. This will include the naturalisation of the water race which will be incorporated into the reserves and road network. The approximate location of the proposed water race is shown here.

For the site as a whole, open space areas (including the stormwater reserves) should be accessible from primary and secondary routes within the site, and within a 400m walking distance of all new dwellings. In general, open space areas bounded by roads are more secure because of informal surveillance from passers-by and overlooking from windows and outdoor areas of nearly houses. Reserves that are clearly visible are likely to attract more users and be more valued by the community.

The design of some streets will contribute to the overall character and connectedness of the public network of open space. Wide berms with footpaths and avenue of trees can create a boulevard effect to assist with navigation to open space areas. Vistas and key road junctions that terminate with open spaces and landscape features provide opportunities for good user legibility within the site. The junctions between primary routes should also be considered to ensure that long vistas terminate with landmark features such as trees within a landscape setbacks, and/or landmark buildings. Appropriate building setbacks should be provided along Tancreds Road and part of Birchs Road. **Provision of a 20 metre building setback and landscaped non-recreational buffer adjacent to 'Smith's Block', with hedging by slow growing, tightly branched evergreen natives.**

should also be provided to avoid potential reverse sensitivity effects on research activities undertaken on the Smith's Block.. (Recommendation 39)

Connection is also to be made to Golf Course and Cemetery.

BLUE NETWORK
A single sewer pump will be constructed on the site to service the whole Outline Development Area. A rising main will be constructed from the pump station to the Lincoln Sewage Facility.

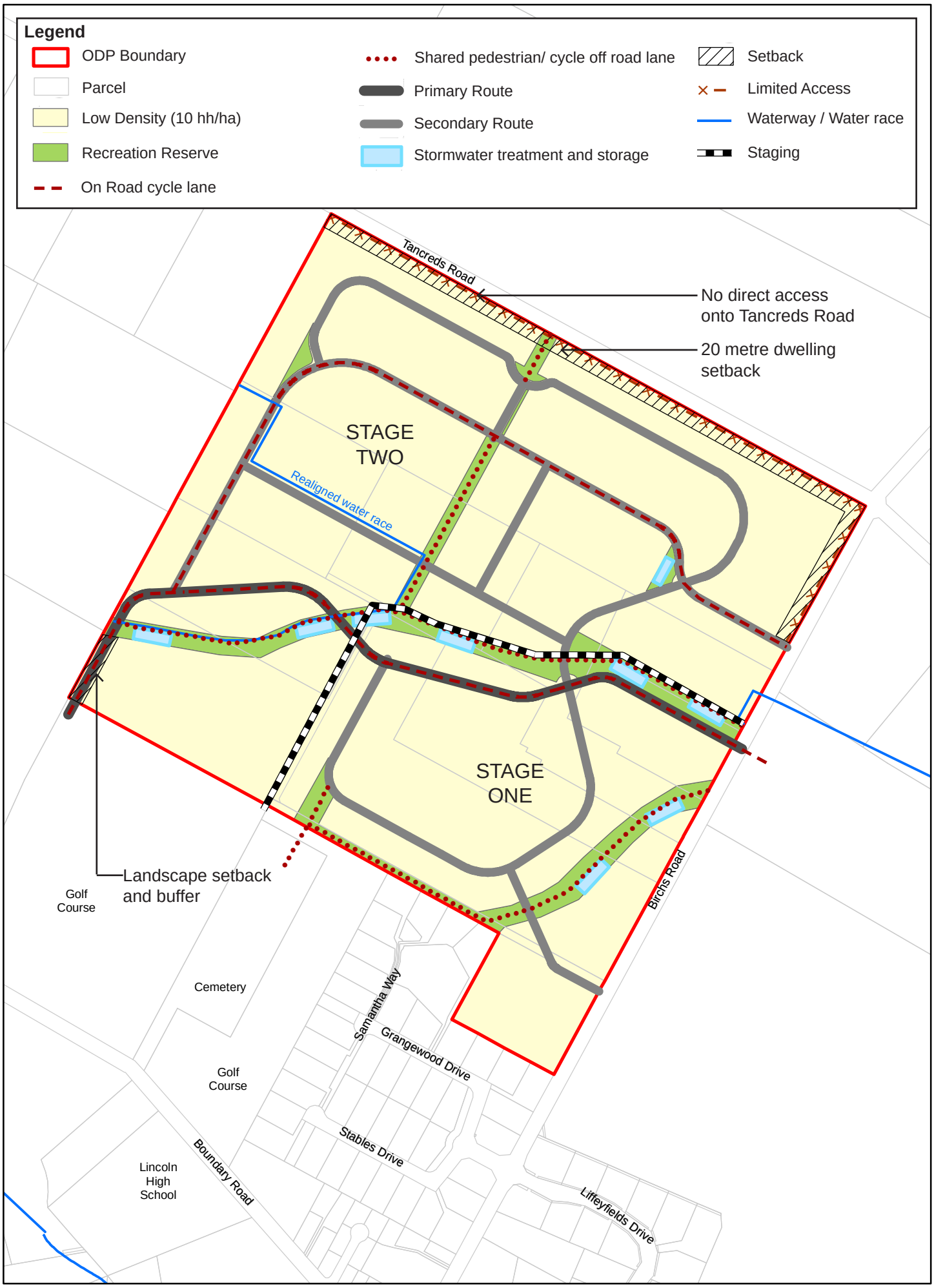
The stormwater network incorporates existing natural drainage patterns that meander east-west through the site, reserves and streets with above-ground stormwater management devices such as swales. Any requirements for stormwater detention and attenuation will generally be accommodation within the proposed development area.

Stormwater reserves should also be designed and used for recreational purposes such as walking and cycling, and integrated with the open space network. Along with riparian management techniques, these reserves can create valuable ecological corridors and habitats, as well as significant amenity and localised character for the neighbourhood.

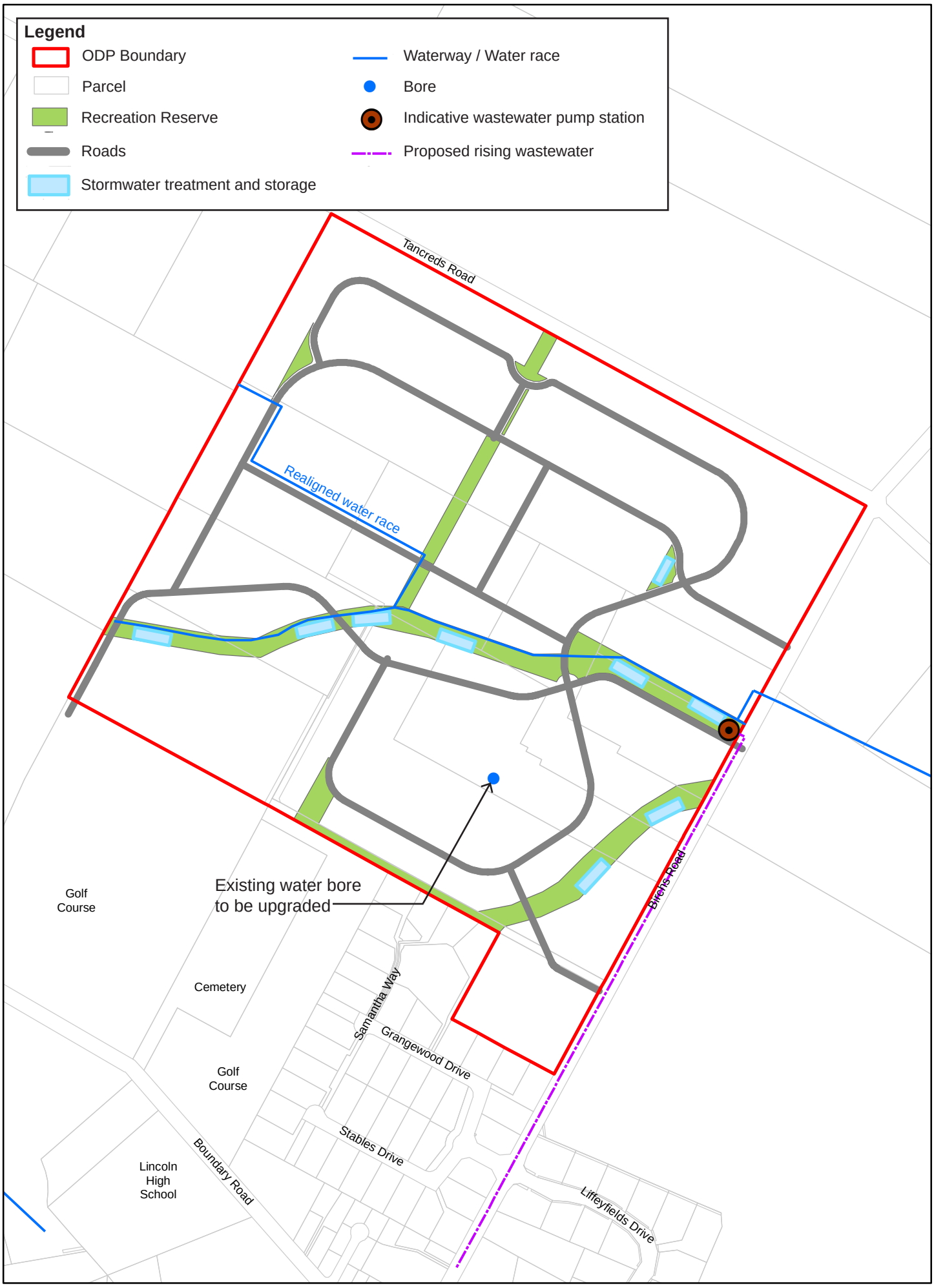
Additional water supplies will be obtained from the installation of new bores. These bores will be located to suit the required pressures and flows, all water mains will follow the road network or pedestrian routes. There is an existing bore on the site that could be upgraded to potable standard. The network would be connected into the existing Lincoln reticulation.

SPECIFIC ODP STANDARDS (Refer to Rule 12.1.3.37):

- No building shall be erected within 20m of the Tancreds Road and Birchs Road boundaries, as shown on ODP Area 4. (Recommendation 4)



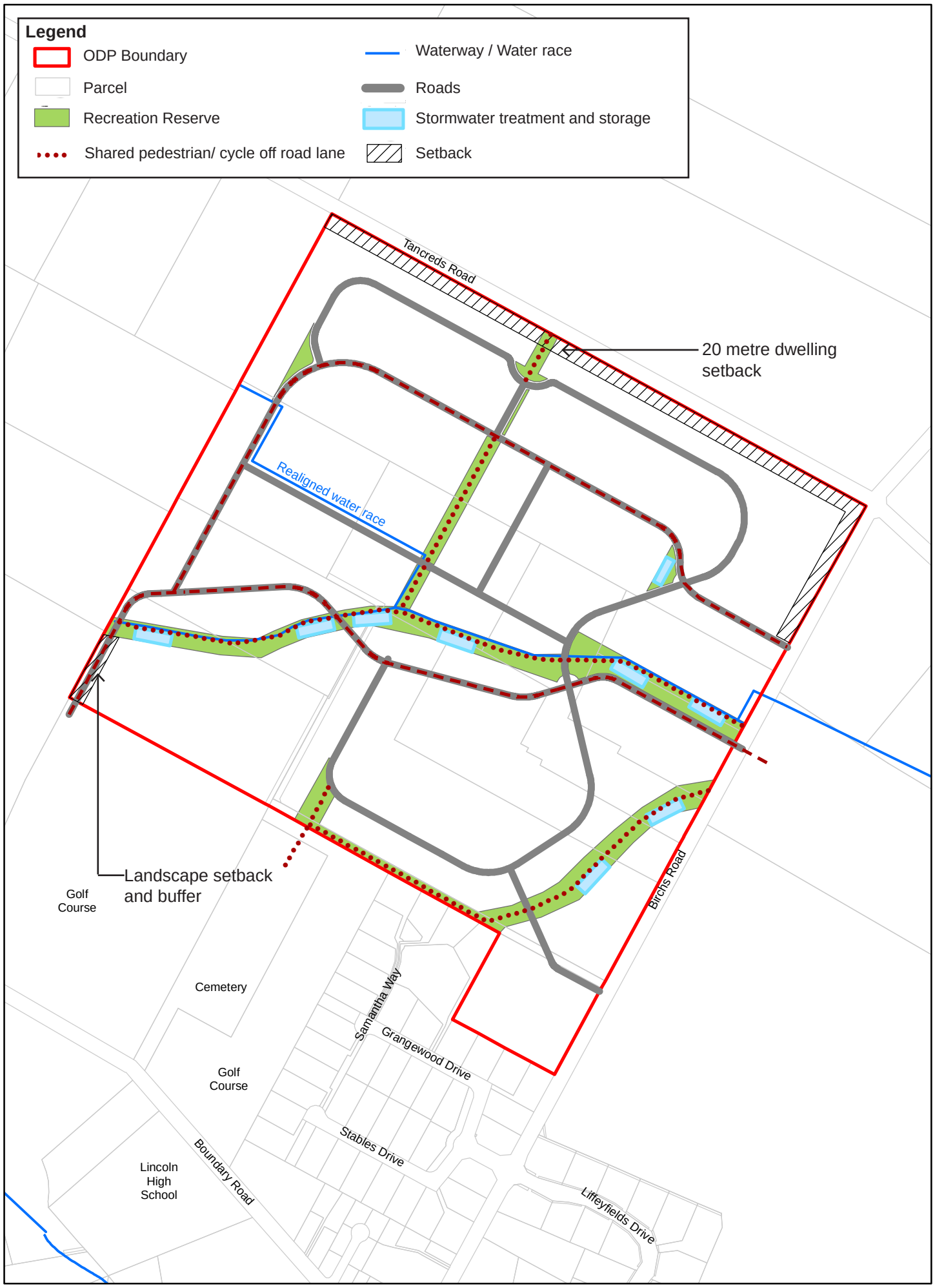
Outline Development Plan
Area 4 - Lincoln
Density Plan



Outline Development Plan

Area 4 - Lincoln

Blue Network



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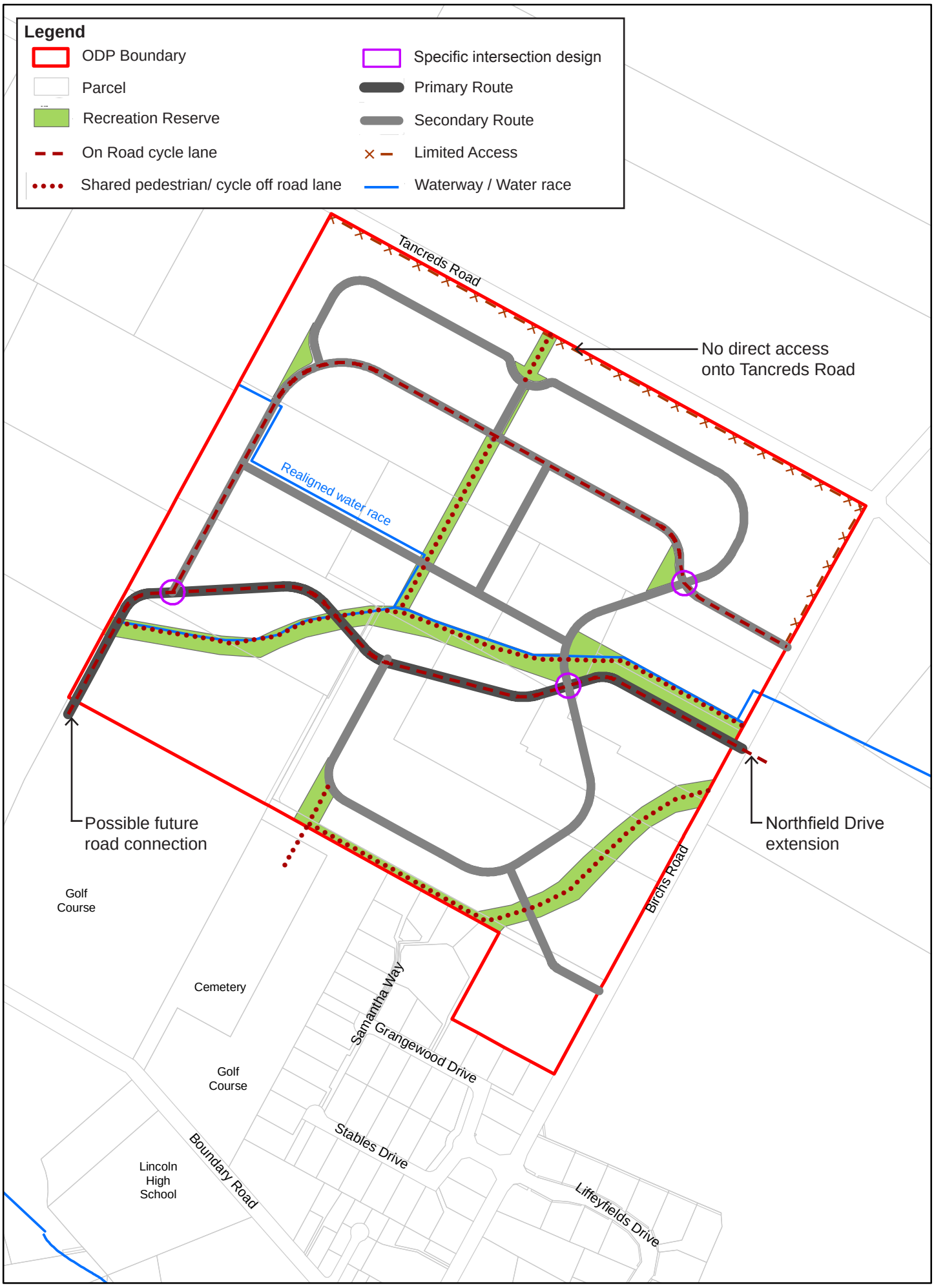
Outline Development Plan
Area 4 - Lincoln
Green Network



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Outline Development Plan
Area 4 - Lincoln
Movement Network

OUTLINE DEVELOPMENT PLAN AREA 6

INTRODUCTION
This Outline Development Plan (ODP) is for ODP Area 6 at Lincoln. The area incorporates the balance of land known as the "Vege Block" which is not required for Community Purposes as part of the Notice of Requirement. It has an area of approximately 7500m² and covers the eastern half of Lot 1 DP 301682 with the western part of this lot being designated for Community Facilities. The ODP provides a framework to guide future development of the land.

ODP Area 6 is proposed to be developed for medium density housing consistent with the Lincoln Structure Plan and in accordance with the Selwyn District Council Medium Density Housing Guide. The development of this area in combination with the Community Facilities area will provide extensive linkages with existing and proposed Council reserves and enable a future road link with Boundary Road.

The ODP has been broken down into four plans. (Density, Movement Network, Green Network and Blue Network).

DENSITY PLAN
The site is rectangular and is 32m wide by 230m in length. Access to the site will be by a new road off North Belt which will provide access of the western boundary of the site. The layout of the sections will be undertaken to maximise sunlight and warmth. The lot sizes will provide for medium density housing and will be laid out to achieve combined accessways for back sections. It is anticipated that 18-19 lots will be developed depending on the final design and layout.

The higher intensity residential development incorporating smaller lots will be directly opposite the proposed new Lincoln Community Centre and Lincoln Domain. The site is also close to the local Primary and High Schools and the Lincoln Shopping Centre. The site backs on to Roblyn Place. A 5m building setback, together with a 12m setback for two-storey buildings, is shown adjacent to this ODP boundary, in order to reduce any privacy, shading and outlook effects on the adjoining Roblyn Place residents. (Recommendation 41)

MOVEMENT NETWORK
The new road within the development is effectively an extension of William Street and is required to access the proposed Lincoln Community Centre and Lincoln Domain and their associated carparks. The Lincoln Structure Plan indicates that the linking of William Street through to Boundary Road would provide significant benefits for local area movement rather than having to backtrack to the village centre. This ODP provides for this linkage through the ODP area and with a connection through to the lot to the north, thus providing the potential for a link through to Boundary Road.

The road is proposed to be a primary road with pedestrian and cycle movements on both verges. The road verges will be 5m wide with provision for landscaping, power, telecom, water, sewer and stormwater services to be contained within them.

Accessibility to the Community Centre and Domain carparks via the new road will alleviate congestion problems along North Belt, particularly on winter sports days. Initially the road will be a cul-de-sac until the balance of the road to Boundary Road is constructed.

In addition to the cycle and pedestrian facilities associated with the new road through to the Community Centre, specific cycle and pedestrian routes from the new road directly to the Domain are to be created.

GREEN NETWORK
Due to the proximity of the Lincoln Domain and the Council's development of the community centre adjacent to this site the provision of separate open space is not warranted. The 5 metre wide street berm will provide for frontages to the residential units to be grassed and planted with trees or for a grassed swale to retain natural elements within the site. The existing pond to the north of the site and the detention basin at the southern end of the community centre as well as landscaping of the centre will all provide a natural fringe to the development providing residents with visual relief.

A linkage to the Lincoln High School may be provided at the northern boundary; however the final location of this link will be determined after the development of the tennis and netball courts in the area.

It is also anticipated that an esplanade reserve will be provided adjacent to the Liffey Stream. (Recommendation 42)

BLUE NETWORK
The northern boundary of this site is adjacent to the Liffey Stream close to where the stream commences. As surface drainage in the area is poor, a comprehensive drainage system for all the land being developed is necessary to provide appropriate treatment and detention of stormwater. The proposed stormwater management system for the area is: *Road, community centre and car parking hardstand areas* – capturing rainwater and directing it through swales in the car park for treatment and then into a detention basin prior to entering the Council reticulated stormwater system.

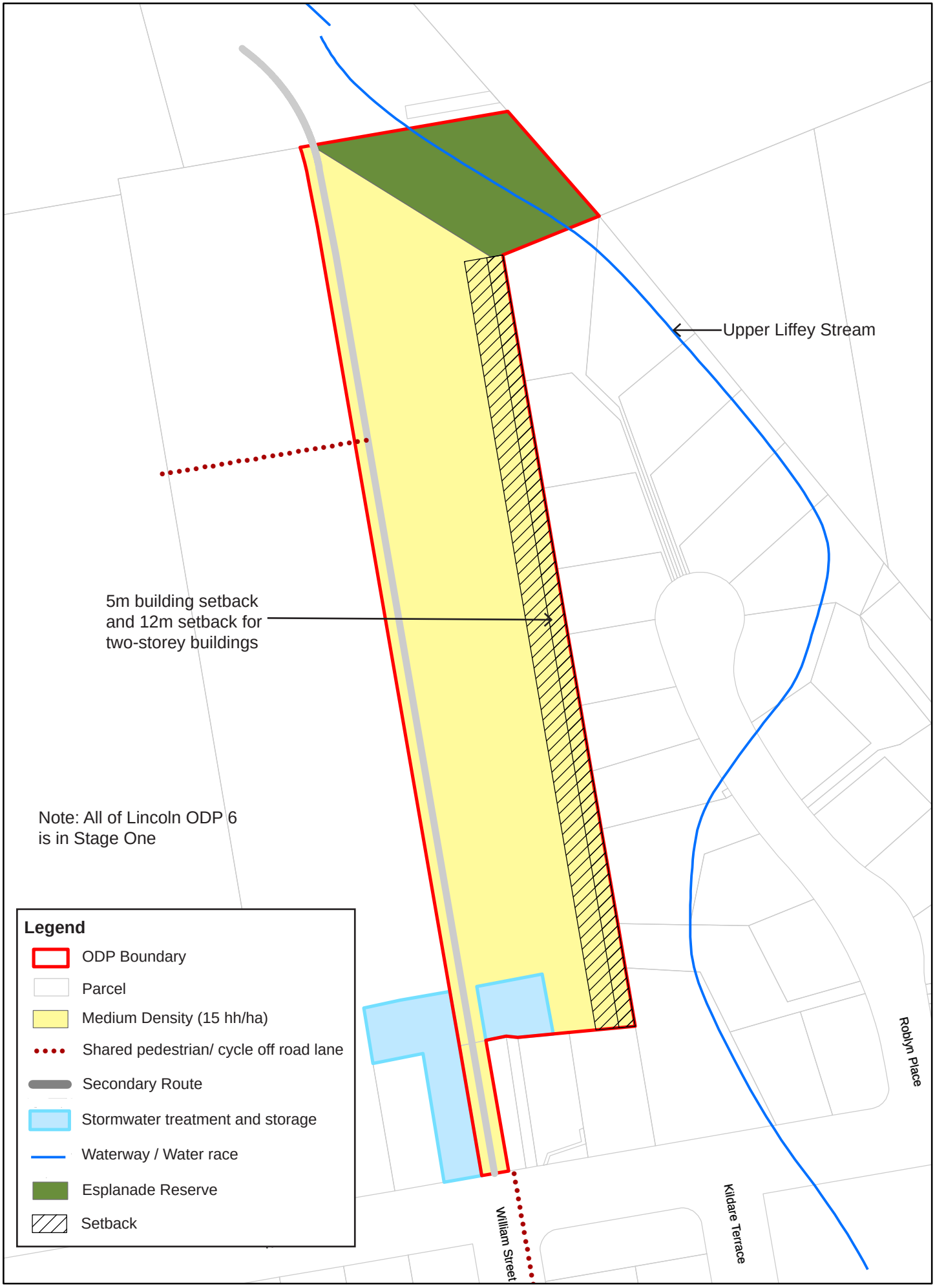
RESIDENTIAL SUBDIVISION – *THREE OPTIONS ARE AVAILABLE NAMELY:*

(a) direct stormwater through piped system to a swale at the southern section of the road berm;
(b) direct stormwater through a piped system to a swale within a section of the road at the southern end of the site; or
(c) direct stormwater through an open swale within the road berm for the full length of the road.

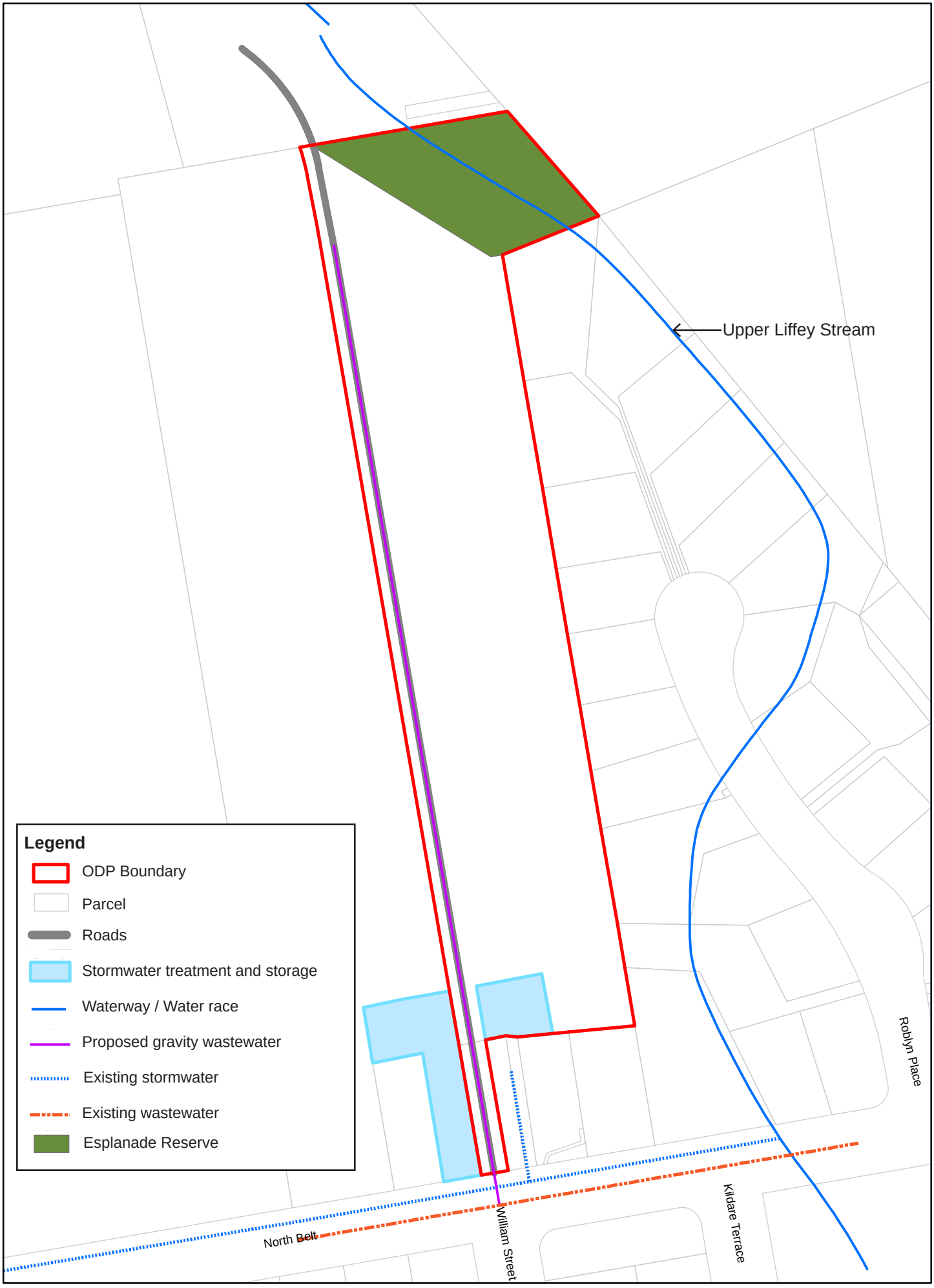
Sewer connection from the medium density development will be to the Lincoln Storage Facility via the existing reticulated sewerage network.

SPECIFIC ODP STANDARDS (Refer to Rule 12.1.3.37):

- **A 5m setback shall be provided between all buildings and the eastern boundary of ODP Area 6.**
- **A 12m setback shall be provided between all two-storey buildings and the eastern boundary of ODP Area 6. (Recommendation 41)**



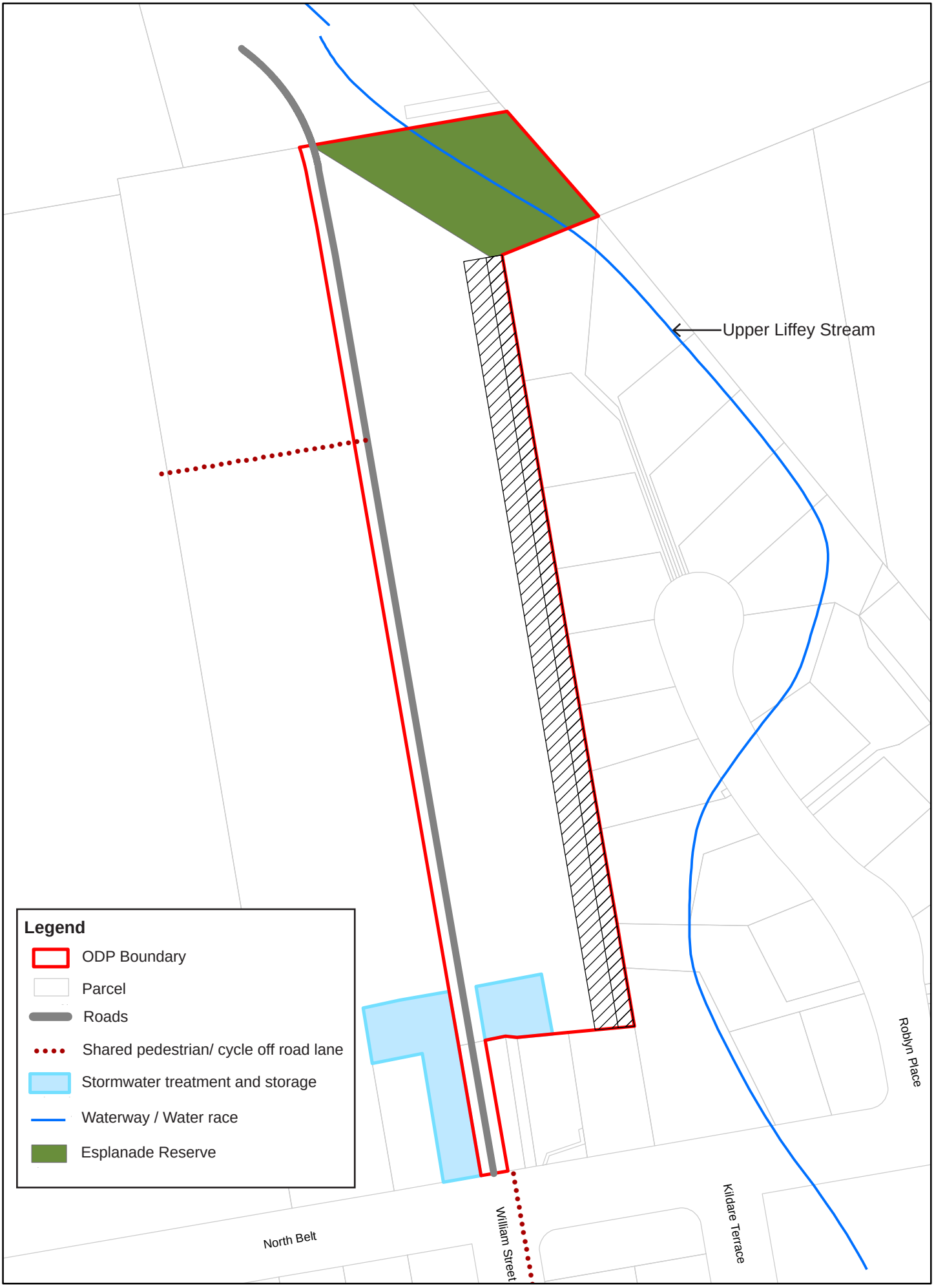
Outline Development Plan
Area 6 - Lincoln
Density Plan



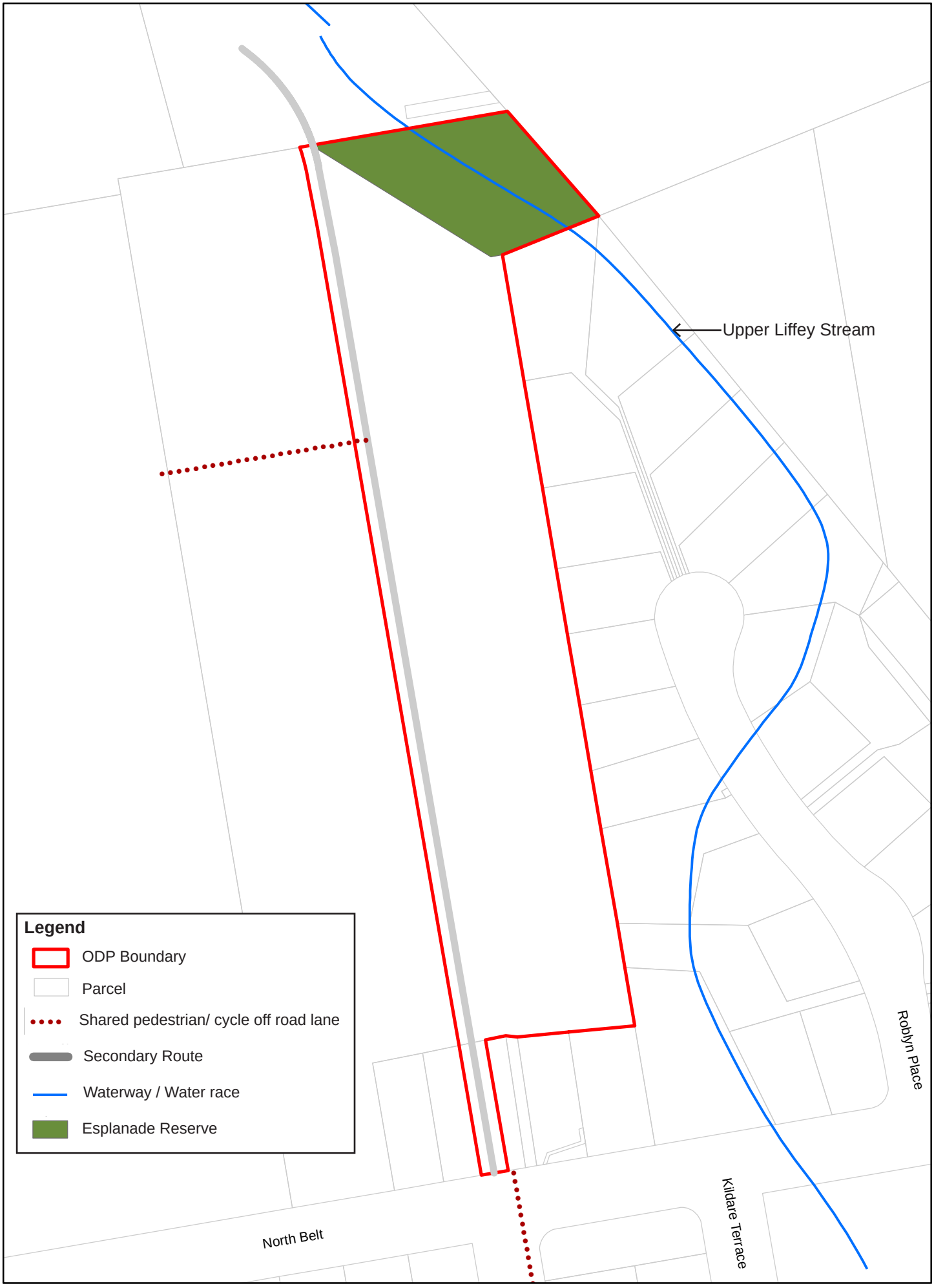
Outline Development Plan

Area 6 - Lincoln

Blue Network



Outline Development Plan
Area 6 - Lincoln
Green Network



Outline Development Plan
Area 6 - Lincoln
Movement Network

PART E

APPENDIX 36

OUTLINE DEVELOPMENT PLANS FOR ROLLESTON

- ODP Area 1
- ODP Area 2
- ODP Area 3
- ODP Area 6
- ODP Area 7
- ODP Area 8