



INLAND RAIL - ILLABO TO STOCKINBINGAL PROJECT

Visual and Landscape Impact Mitigation Plan

INLAND RAIL - ILLABO TO STOCKINBINGAL PROJECT

Visual and Landscape Impact Mitigation Plan

Revision	Date	Description	By	Chk	App
0	21/05/2026	Visual and Landscape Impact Mitigation Plan	BL	BL	KR

Prepared for: **JOHN HOLLAND**  **INLAND RAIL ILLABO TO STOCKINBINGAL**

By:
Conybeare Morrison International Pty Ltd
Architecture + Master Planning + Urban Design | Level 8, 9 Barrack Street Sydney NSW 2000
Nominated Architects: Antonino Lalli NSW ARB No 7633 | Martin Virveste ARB NSW No 11898
T: +61 2 8244 8888 | enquiries@cmplus.com.au | www.cmplus.com.au

Table of Contents

Figures	b
Tables	b
Abbreviations	c
Terminology	c
1.0 Introduction	1
1.1 The Project	1
1.2 Purpose	1
1.3 Key Documents	1
2.0 Landscape Character and Existing Environment	2
2.1 Non-Aboriginal Cultural Heritage	2
2.2 Land Zoning	2
2.3 Landscape Character	3
3.0 Landscape and Visual Impact - Construction and Operation	4
3.1 Landscape Character Impact Assessment	4
3.2 Visual Impact Assessment	4
3.3 Mitigation Measures	4
4.0 Landscape Strategy	6
4.1 Landscape Control Measures	6
4.2 Design Vision and Objectives	6
4.3 Community Consultation and Cultural Values Plan	7
4.4 Planting strategy	9
4.5 Landscape Typologies	10
4.6 Rural Landscapes	10
4.7 Townships	14
4.8 Ecologically Sensitive Areas	15
4.9 Maintenance Strategy	16
4.10 Temporary Works	17
4.11 Summary of Landscape Strategy and Mitigation Measures	18
4.12 Crime Prevention Through Environmental Design (CPTED)	18

Appendix A - Landscape Plans

Appendix B - Plant Schedules

Appendix C - Land Zoning Plan

Figures

Fig.1. Project overview (Source: ARTC, 2023)	1
Fig.2. Land zone	2
Fig.3. The main street of Stockinbingal	3
Fig.4. Typical agricultural landscape (CLOUSTON Associates, 2022)	3
Fig.5. Dudauman Creek (Coast Ecology Environmental Assessment, 2022)	3
Fig.6. Typical woodlands (CLOUSTON Associates, 2022)	3
Fig.7. Viewpoint locations (CLOUSTON Associates, 2022)	5
Fig.8. Cultural values exercise - Young LALC workshop	7
Fig.9. Fill batter typical section (NTS)	10
Fig.10. Cut batter typical section (NTS)	10
Fig.11. Typical Section showing fill batters	11
Fig.12. Typical Section showing at grade rail line	12
Fig.13. Typical Section showing significant cut batters	13
Fig.14. Detail plan at Stockinbingal Junction	14
Fig.15. Detail plan at Ulandra Creek crossing	15
Fig.16. Key Plan	20
Fig.17. Landscape plan (Sheet 1 of 26)	21
Fig.18. Landscape plan (Sheet 2 of 26)	22
Fig.19. Landscape plan (Sheet 3 of 26)	23
Fig.20. Landscape plan (Sheet 4 of 26)	24
Fig.21. Landscape plan (Sheet 5 of 26)	25
Fig.22. Landscape plan (Sheet 6 of 26)	26
Fig.23. Landscape plan (Sheet 7 of 26)	27
Fig.24. Landscape plan (Sheet 8 of 26)	28
Fig.25. Landscape plan (Sheet 9 of 26)	29
Fig.26. Landscape plan (Sheet 10 of 26)	30
Fig.27. Landscape plan (Sheet 11 of 26)	31
Fig.28. Landscape plan (Sheet 12 of 26)	32
Fig.29. Landscape plan (Sheet 13 of 26)	33
Fig.30. Landscape plan (Sheet 14 of 26)	34

Fig.31. Landscape plan (Sheet 15 of 26)	35
Fig.32. Landscape plan (Sheet 16 of 26)	36
Fig.33. Landscape plan (Sheet 17 of 26)	37
Fig.34. Landscape plan (Sheet 18 of 26)	38
Fig.35. Landscape plan (Sheet 19 of 26)	39
Fig.36. Landscape plan (Sheet 20 of 26)	40
Fig.37. Landscape plan (Sheet 21 of 26)	41
Fig.38. Landscape plan (Sheet 22 of 26)	42
Fig.39. Landscape plan (Sheet 23 of 26)	43
Fig.40. Landscape plan (Sheet 24 of 26)	44
Fig.41. Landscape plan (Sheet 25 of 26)	45
Fig.42. Landscape plan (Sheet 26 of 26)	46

Tables

Tab.1. <i>Non-Aboriginal Cultural Heritage items</i>	1
Tab.2. <i>Recommended Mitigation Measures (Chapter 19, EIS)</i>	2
Tab.3. <i>Recommended Mitigation Measures</i>	4
Tab.4. <i>Design Objectives</i>	6
Tab.5. <i>Community Consultation Results</i>	8
Tab.6. <i>Maintenance Strategy</i>	16
Tab.7. <i>Mitigation Measures at Operation</i>	18
Tab.8. <i>Mitigation Measures at Construction</i>	18

Abbreviations

ARTC	Australian Rail Track Corporation
AUDP	Australian Urban Design Protocol
CPTED	Crime Prevention Through Environmental Design
CSSI	Critical State Significant Infrastructure
CVP	Cultural Values Plan
EIS	Environmental Impact Statement
ISCA	Infrastructure Sustainability Council of Australia
km	kilometres
LALC	Local Aboriginal Land Council
LCVIA	Landscape Character and Visual Impact Assessment
LCZ	Landscape Character Zone
LEP	Local Environment Plan
m	metres
mm	millimetres
NTS	Not to Scale
PCT	Plant Community Type
NTS	Not to Scale
VLIMP	Visual and Landscape Impact Mitigation Plan

Terminology

Community consultation	Engagement with local residents and Indigenous communities to inform species selection and design decisions.
Crime Prevention Through Environmental Design	A design approach to enhance safety and minimise crime activity
Cut batter	Sloped earth surface created by excavation, treated with vegetation or stabilisation methods
Fill batter	Sloped earth surface created by filling, treated with vegetation or stabilisation methods
Hydroseed	A planting technique using a slurry of seeds to establish vegetation on slopes
Infrastructure Approval Condition E126	Regulatory requirement guiding the preparation and implementation of the mitigation plan
Landscape Character	The combined quality of built, natural, and cultural aspects that define an area's unique sense of place
Mitigation Measures	Strategies to reduce negative impacts on landscape and visual character during construction and operation
Planting Community Types	Ecological classifications used to guide species selection for revegetation
Visual Impact Assessment	Evaluation of how visible the project is from various viewpoints and its effect on visual amenity

1.0 Introduction

1.1 The Project

The Australian Rail Track Corporation (ARTC) Inland Rail project (the project) is the upgrade of the freight rail network from Melbourne to Brisbane via Victoria, New South Wales (NSW) and Queensland. The project will improve connections with regional and local rail and road networks. The route comprises 12 sections, with approximately 1,100 kilometres (km) of major upgrades and enhancements to existing rail routes and 600 km of new track.

The project involves the construction and operation of approximately 39 km of new, greenfield single-track standard gauge railway. Designed to accommodate trains up to 1,800 metres (m) in length, this new rail section will provide a direct connection between Illabo and Stockinbingal in NSW. It will also link seamlessly with Inland Rail's adjoining enhancement projects: Albury to Illabo (A2I) and Stockinbingal to Parkes (S2P).

Key features of the project include:

- Connection to other rail lines, including Stockinbingal to Parkes line, Lake Cargelligo line and Main Southern Railway;
- One crossing loop and maintenance siding;
- Level crossings and stock crossings;
- Bridges over rivers and other watercourses, floodplains and roads;
- Upgrade of around 3.5 km of existing track for the tie-in works to the existing Main South Line at Illabo;
- New track to maintain Lake Cargelligo line connection either side of the project;
- Realignment and road-over rail bridge for a section of the Burley Griffin Way at Stockinbingal;
- Realignment of Iron bong Road to allow for safe sight lines at the new active level crossing;
- Ancillary infrastructure to support the project, inclusive of signalling and communications; drainage, drainage control areas, signage and fencing, and services and utilities; and
- Construction infrastructure, including ancillary facilities, and a temporary workforce accommodation facility.

1.2 Purpose

This landscape plan aims to identify and mitigate visual and landscape impacts of the project, and to establish a framework for managing these impacts during construction and operation, in line with the Infrastructure Approval. The landscape plan covers the construction impact zone (CIZ) including all areas disturbed during construction. It is guided by best practice standards and

legal requirements, including provisions for landscape visual impact mitigation. The purpose of the Visual and Landscape Impact Mitigation Plan (VLIMP) is to:

- Implement appropriate landscape strategies and mitigation measures within the to address identified impacts within.
- Ensure the rail line contributes positively to the evolving identity and character of south-west NSW.
- Minimise landscape and visual amenity impacts throughout the operational phase.

1.3 Key Documents

This VLIMP has been prepared to address the requirements of Condition E126 of the Infrastructure Approval (Application No. SSI-9406), as approved by the Minister for Planning and Public Spaces on 4 September 2024. Table 1 outlines the requirements of Condition E126 and where they are addressed in this VLIMP.

Tab.1. Condition E126 requirements

Condition	Section of VLIMP
<i>The Proponent must prepare and implement a Visual and Landscape Impact Mitigation Plan to mitigate visual and landscape impacts of the Critical State Significant Infrastructure (CSSI). In preparing the plan, the Proponent must:</i>	N/A
<i>a. consult landowners and residents of land zoned RU1 within 500 metres of the CSSI and all landowners and residents of all other land within 100 metres of the CSSI;</i>	Section 4.3
<i>b. prepare a landscaping plan for all locations identified in (a) above that specifies plants and trees to be used, with a preference for native vegetation and a program for implementation and ongoing maintenance;</i>	Section 4.4 to 4.9 (landscape and maintenance strategies) Appendix A (Landscape plan)
<i>c. document the responses in (a) above and detail how the Plan responds to them.</i>	Section 4.3
<i>The Visual and Landscape Impact Mitigation Plan must be made publicly available no later than six (6) months after the commencement of construction of the CSSI.</i>	N/A

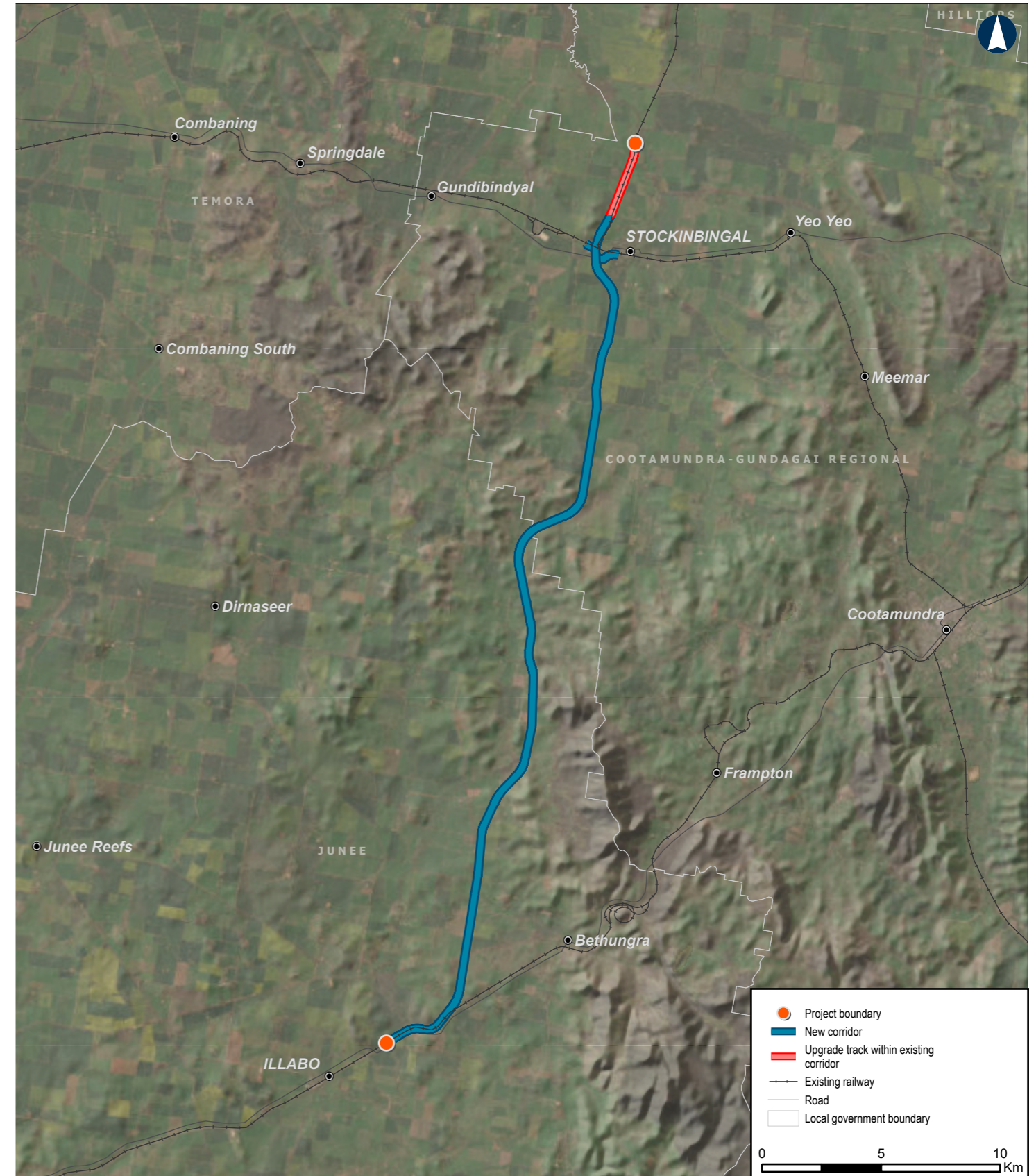


Fig. 1. Project overview (Source: ARTC, 2023)

2.0 Landscape Character and Existing Environment

The following section describes the existing landscape character and visual environment surrounding the project, based on findings in the Landscape Character and Visual Impact Assessment (LCVIA). The LCVIA was produced by CLOUSTON Associates in 2022 to assess the potential impacts of the project on existing landscape character and visual amenity, and propose mitigation measures to reduce these impacts. The following analysis helps to inform the landscaping plans and treatments, ensuring they integrate the project into the existing landscape.

2.1 Non-Aboriginal Cultural Heritage

A number of non-Aboriginal heritage-listed items are identified within 2km of the project, all located within the township of Stockinbingal. Most of these items are locally-listed within the Cootamundra Local Environment Plan (LEP) except for Stockinbingal Public School (5064338) which is a state-listed site.

Two non-Aboriginal local heritage-listings are located within the project site and include the following:

- Stockinbingal Heritage Conservation Area (C3)
- Stockinbingal Railway Station (I78)

Tab.2. Non-Aboriginal Cultural Heritage items

Item	Listing (item number)
Baker, William Fallon	Cootamundra LEP (i75)
Bank of NSW and residence	Cootamundra LEP (i73)
Cohen's Trade Palace, CWA Rooms	Cootamundra LEP (i71)
Ellwood's Hall	Cootamundra LEP (i82)
Federation period shop	Cootamundra LEP (i24)
Public school original buildings	Cootamundra LEP (i65)
Soldiers' War Memorial Hospital	Cootamundra LEP (i03)
St. Ita's Convent	Cootamundra LEP (i68)
St. Ita's Convent School	Cootamundra LEP (i69)
Stock and station (former Powderhorn Museum)	Cootamundra LEP (i76)
Stockinbingal Cemetery	Cootamundra LEP (i10)
Stockinbingal Heritage Conservation Area	Cootamundra LEP (C3)
Courthouse	Cootamundra LEP (i80)
Stockinbingal Hotel (former)	Cootamundra LEP (i81)
Police residence	Cootamundra LEP (i79)
Post office and residence	Cootamundra LEP (i66)
Stockinbingal Railway Station	Cootamundra LEP (i78)
Kurrajong trees	Cootamundra LEP (i77)
Stockinbingal Public School—Buildings B00A, B00B and B00D	NSW Department of Education S.170 listing (5064338)

The Stockinbingal Heritage Conservation Area is centered around Hibernia Street in Stockinbingal and includes a group of late nineteenth and early twentieth century buildings. The area has preserved its Federation-era architecture, with intact commercial buildings showcasing the Australian vernacular style. Key, intact examples of this architecture include the Hotel and a row of shops on Hibernia Street. Mature vegetation and existing buildings along Hibernia Street in Stockinbingal help screen views, ensuring the project does not visually impact these heritage elements.

2.2 Land Zoning

As outlined in Section 1.3, Condition E126 of the Infrastructure Approval requires community consultation with:

- landowners and residents of land zoned RU1 within 500 m of the project
- landowners and residents of all other land zoning within 100 m of the project

The project spans two Local Government Areas (LGA) including Junee Shire Council to the south and Cootamundra-Gundagai Regional Council to the north. Figure 2 shows the land zoning in the vicinity of the project. The majority of the project falls within the RU1 (Primary Production) land zone. Areas of RU5 (Village) are located within the towns of Illabo to the south and Stockinbingal to the north.

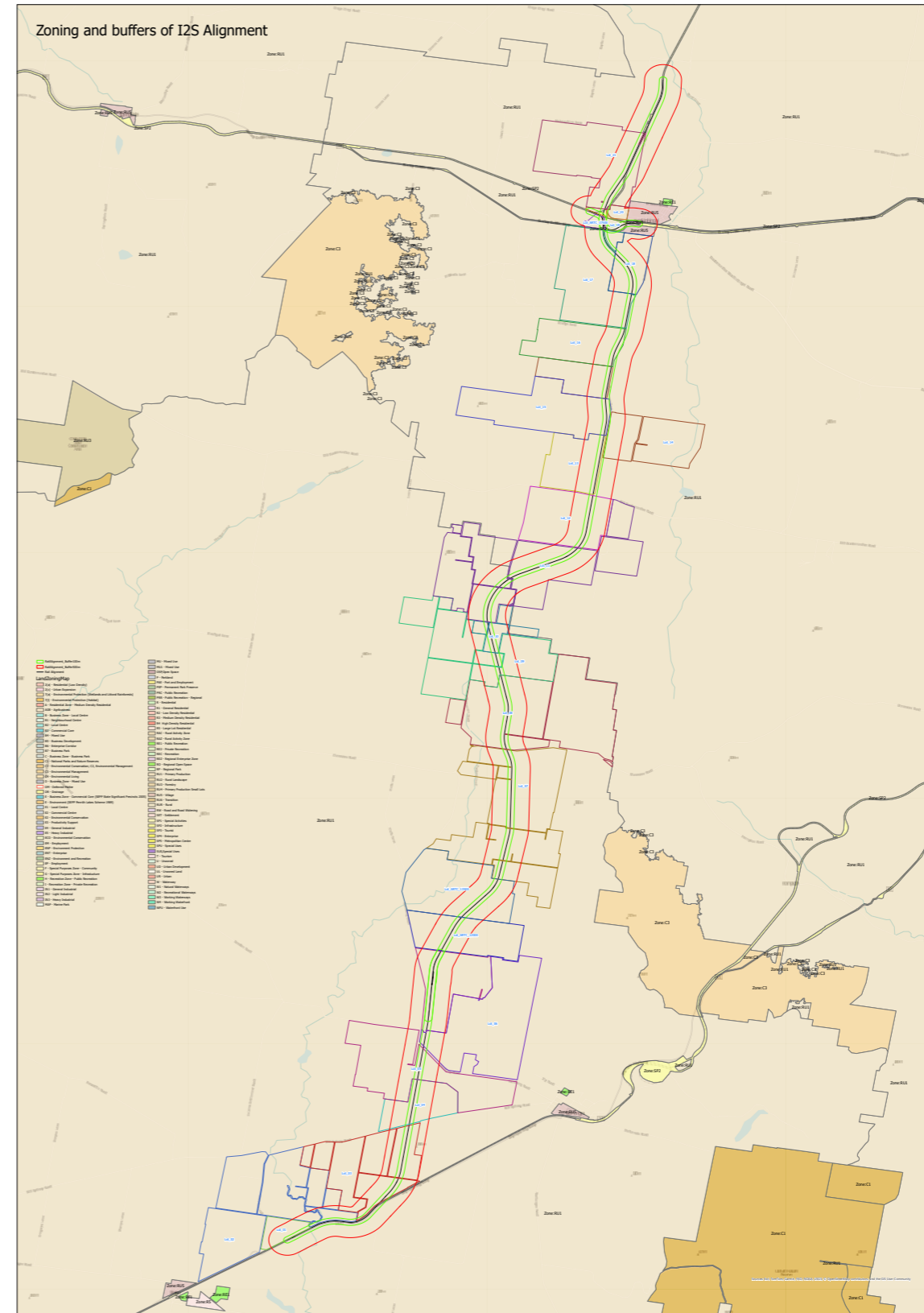


Fig.2. Land zoning plan (Refer to Appendix 3 for a larger plan)

2.3 Landscape Character

The project passes through predominately rural and agricultural landscapes. The study area assessed in the LCVIA was broken down into four landscape character zones (LCZ) to help describe and analyse the overall character of the landscapes surrounding the project. Landscape character is “the combined quality of built, natural and cultural aspects which make up an area and provide its unique sense of place” (Transport for NSW, 2023).

The LCZs include:

- LCZ1 - Rural Settlements
- LCZ2 - Agricultural Land
- LCZ3 - Watercourse
- LCZ4 - Woodlands

This VLIMP should prioritise landscape treatments that preserve the unique landscape character of the area including the non-Aboriginal cultural heritage values associated with the township of Stockinbingal.

LCZ1 - Rural Settlement

Two villages are located within proximity to the project including Stockinbingal to the north and Illabo to the south. Both are small, railway towns located within the South West Slopes of the Riverina region of NSW. The towns predominately comprise of RU5 (Village) land zoning as well as elements of RE1 (Public Recreation), R5 (Large Lot Residential) and SP2 (Infrastructure).



Fig.3. The main street of Stockinbingal

LCZ2 - Agricultural Land

Most of the project is located on rural and agricultural land which has been heavily modified for historical and current agricultural activities. It predominately comprises open grasslands on undulating and flat terrain, with small areas of remnant vegetation. Most of the land outside of the townships of Illabo and Stockinbingal is zoned as RU1 (Primary Production) and is mostly used for activities such as livestock husbandry, wool production and wheat cultivation.



Fig.4. Typical agricultural landscape (CLOUSTON Associates, 2022)

LCZ3 - Watercourse

The project is located within the Murrumbidgee River and Lachlan River catchments and crosses nine named creeks, as well as other shallow, ephemeral creeks and tributaries. The Aquatic Biodiversity Assessment (Coast Ecology Environmental Assessment, 2022) found that most watercourses are 1st or 2nd order streams with “intermittent flow following rain events, little or poorly defined channel with no aquatic flora species.”



Fig.5. Dudauman Creek (Coast Ecology Environmental Assessment, 2022)

LCZ4 - Woodlands

The project site is located within the South Western Slopes Bioregion. This region has been extensively cleared and cultivated which has resulted in mostly fragmented areas of remnant vegetation and intermittent tree groupings. Dominant species within the Woodlands include White Box (*Eucalyptus albens*), and, to the west and north, communities dominated by Grey Box (*Eucalyptus microcarpa*) and White Cypress Pine (*Callitris glaucophylla*).



Fig.6. Typical woodlands (CLOUSTON Associates, 2022)

3.0 Landscape and Visual Impact - Construction and Operation

The following section summarises the results of the LCVIA for the project, (CLOUSTON Associates, 2022) including the identified impacts on landscape character and visual amenity, as well as the proposed mitigation measures to reduce these impacts.

3.1 Landscape Character Impact Assessment

The LCVIA assessed potential impacts of the project on each of the four identified LCZs. Two of the LCZs (LCZ2 and LCZ3) received a low overall impact rating due primarily to low sensitivity associated with previous widespread landscape clearing and modification. The remaining two LCZs received a moderate/low rating due to higher sensitivity ratings attached to the remnant woodland environments (LCZ4) and the distinctive, historical rural settlements of Illabo and Stockinbingal (LCZ1).

3.2 Visual Impact Assessment

A total of 14 viewpoints, including private and public locations, were identified and assessed as part of the visual impact assessment. The impact of the project on these viewpoints was assessed during construction and operation phases. A revised rating was also identified based on proposed mitigation options being implemented at each location.

Construction

During the construction phase, visual impacts were rated at their highest generally due to many temporary elements being present within the views. These elements include hoardings, stockpiles, construction compounds and heavy vehicle movements. The ratings included high/moderate ratings at several locations including at private residences (Viewpoints 2 and 3) and where a new bridge is proposed at Viewpoint 8.

Operation

At operation, some viewpoints see a reduced visual impact rating with the removal of construction machinery and equipment. Eight viewpoints have a negligible to moderate/low impact.

Some of these ratings are reduced further when considering the implementation of mitigation measures at various viewpoints.

Figure 7 shows the viewpoint locations.

3.3 Mitigation Measures

The LCVIA identifies a number of strategies to mitigate the landscape character and visual impacts of the project. A list of recommended mitigation measures are included in Chapter 19 of the EIS and are shown in Table 3. The ways in which the landscape plan addresses each of the relevant mitigation measures in summarised in Table 7 and 8 in Section 4.11 of this VLIMP.

Tab.3. Recommended mitigation measures (Chapter 19, EIS)

Ref	Impact	Mitigation measure
LV-1	Minimising the potential for visual and landscape impacts	Detailed design and construction planning would seek to minimise the construction and operation footprints, and avoid impacts on mature native vegetation as far as reasonably practicable.
LV-2	Minimising the potential for visual and landscape impacts	An urban design and landscape plan (L5) would be prepared to provide a consistent approach to design and landscaping. The urban design and landscape plan would include: <ul style="list-style-type: none"> - vegetation screening in strategic locations to visually mitigate impacts from new structures and rail operations, including around bridges and locations where the proposal would be visible from sensitive receivers, where the presence of screening does not impact safe rail operations - appropriate species that respond to the existing landscape character setting and environmental conditions. All plant species have been selected are based on the local PCTs.
LV-3	Batter slopes in contrast with the existing landform	Batter slopes would be integrated into the surrounding landscape as far as practicable. Appropriate slope stabilisation would be integrated into batter design to ensure successful rehabilitation and stabilisation. Refer to L5 for detailed drawings .
LV-4	Visual impacts of construction compounds	Construction compounds would be located, as far as practicable, within cleared areas and away from sensitive receivers. Construction compounds would be designed and orientated to minimise visual impacts. This would include locating areas of low visual amenity away from sensitive receivers, and erecting boundary screening around construction compounds where appropriate.
LV-5	Landscape character and visual impacts	Rehabilitation of disturbed areas would be undertaken progressively in accordance with the rehabilitation strategy (mitigation measure BD-8 and the Appendix of the Landscape character and visual impact assessment for the proposal) to be undertaken during detailed design and individual property agreements (where relevant).
LV-6	Minimising light spill	Lighting of work areas, construction compounds, and work sites would be oriented to minimise glare and light spill impact on adjacent receivers.
LV-7	Visual impacts of construction	Mitigation measures for visual impacts would be included in the CEMP, including (where relevant): <ul style="list-style-type: none"> - selecting laydown areas and other ancillary sites to reduce visual impacts - locating construction compounds as far from sensitive receivers as possible - use of hoarding and other visual screening methods - keeping stockpile height to a minimum in the vicinity of sensitive receivers. Any existing ground surface or vegetation that has been disturbed in order to replace any existing track would be reinstated to match the adjoining landscape surface in order to maintain the current visual scene.
LV-8	Landscape character and visual impacts	Vegetation provided in accordance with the rehabilitation strategy (mitigation measure BD-8) and the urban design and landscape plan (mitigation measure LV-2) would be subject to ongoing monitoring and maintenance in accordance with ARTCs standard operating procedures.

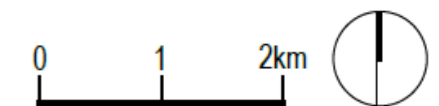
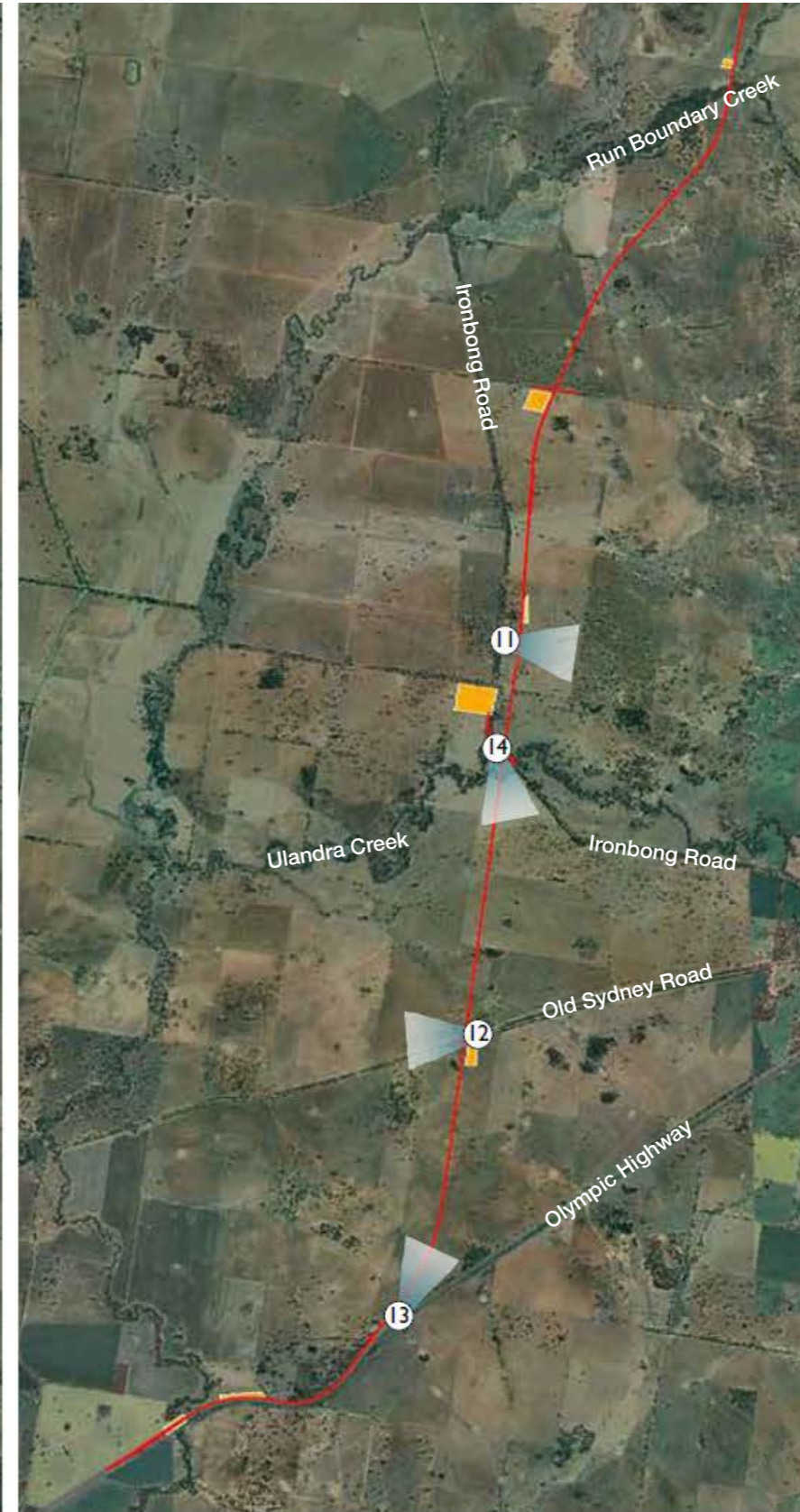
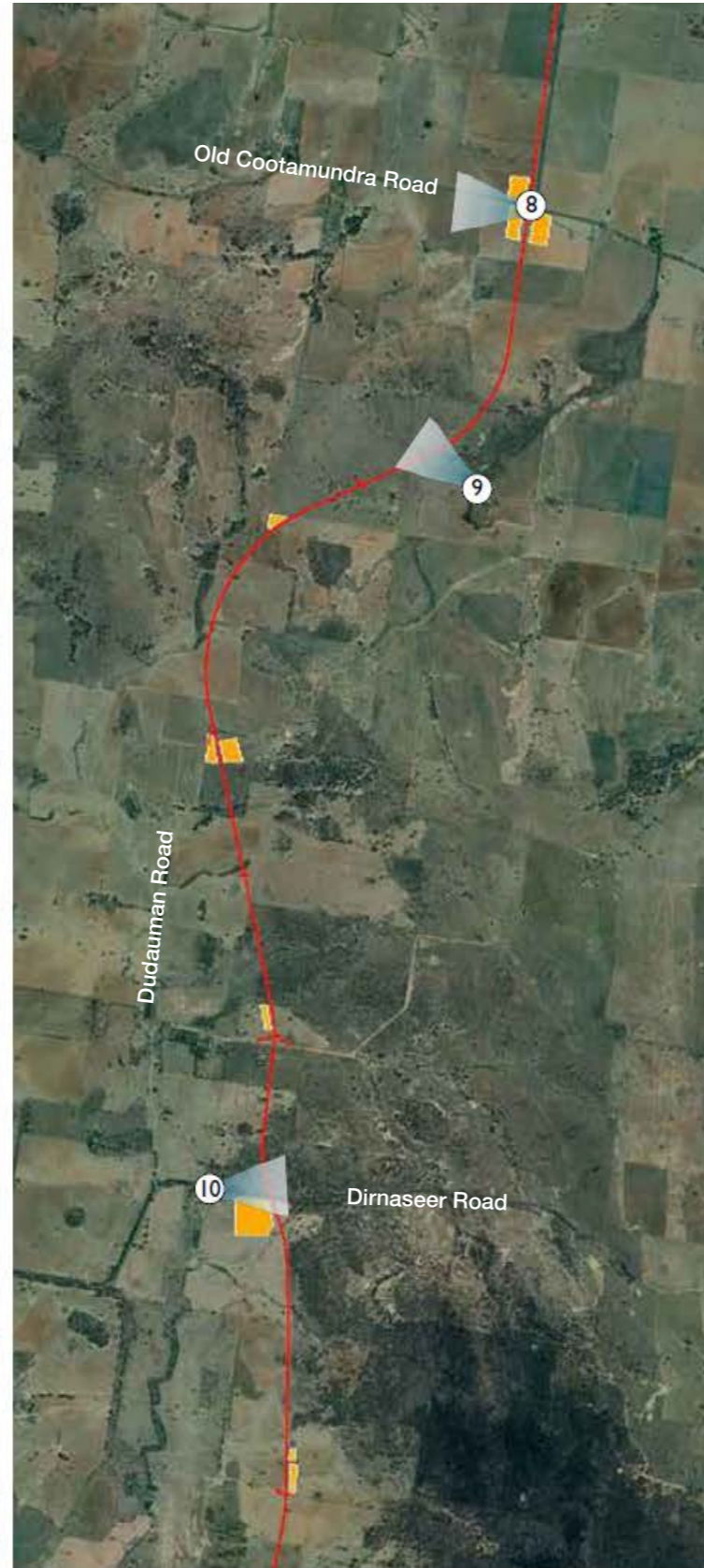
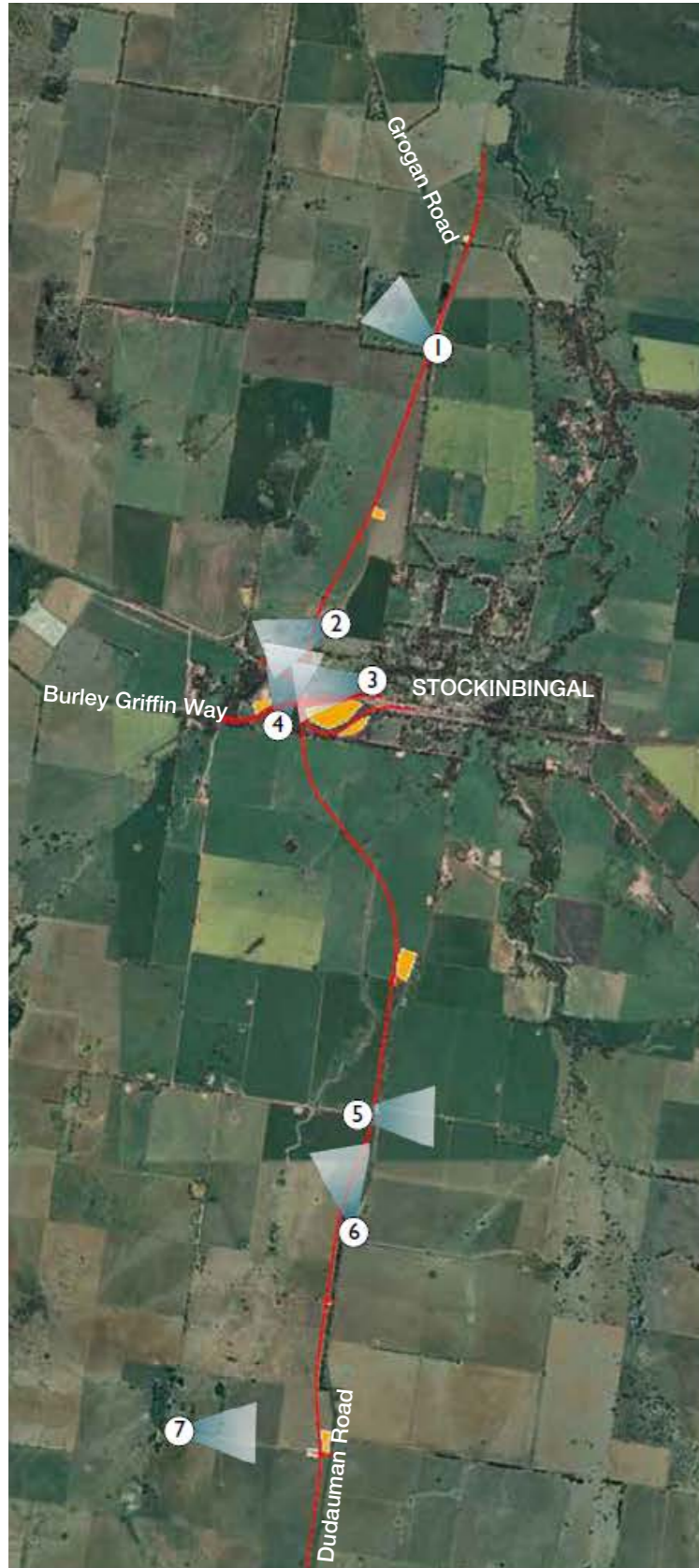


Fig.7. Viewpoint locations (CLOUSTON Associates, 2022)

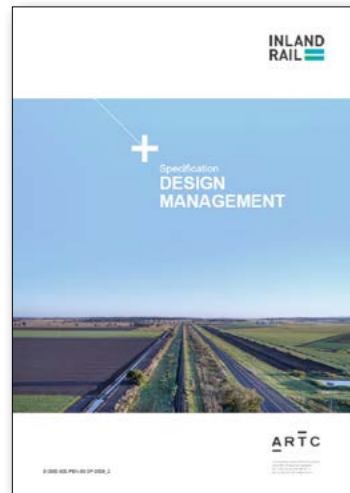
4.0 Landscape Strategy

4.1 Landscape Control Measures

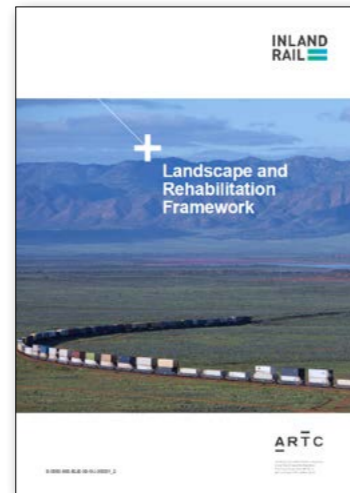
This VLIMP has been developed based on the following documents and frameworks:

- LCVIA (CLOUSTON Associates, 2022)
- Landscape and Rehabilitation Strategy (ARTC, 2021)
- Landscape and Rehabilitation Framework (ARTC, 2021)
- Landscape Design Specification (ARTC, 2022)
- Design Management Specification (ARTC, 2021)

Other project documents used to inform the VLIMP include specialist assessments that are part of the EIS including the Hydrology and flooding assessment (Chapter 12) and the Draft Connectivity Strategy (Appendix L). The drainage drawing set was also used to inform the landscape plan. The Plan incorporates a range of landscape treatments and control measures to mitigate potential impacts of the project on landscape character and visual amenity.



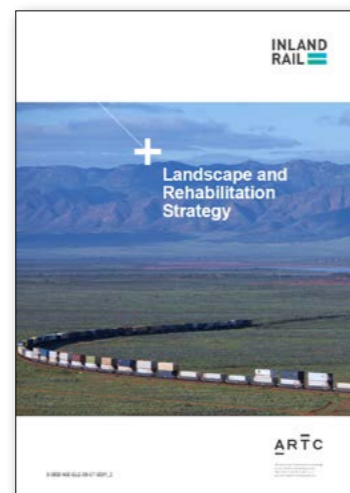
Design Management Specification (ARTC, 2021)



Landscape and Rehabilitation Framework (ARTC, 2021)



Landscape Design Specification (ARTC, 2022)







Landscape and Rehabilitation Strategy (ARTC, 2021)

4.2 Design Vision and Objectives

The landscape design aims to minimise the visual and landscape character impacts of the project on sensitive receivers. The design will create a well-vegetated corridor with low-maintenance landscape treatments.

The Landscape and Rehabilitation Strategy (ARTC, 2021) and Landscape and Rehabilitation Framework (ARTC, 2021) outline four key design objectives with supporting principles to support the design development. The objectives and relevant principles are summarised below.

Tab.4. Design objectives

	<p>Objective 1 : Conserve and connect</p>	<ul style="list-style-type: none"> • respond to the natural landscape, topography and landform, incorporating slope and stabilisation measures • maintain or enhance ecological connections and protect natural assets • protect and enhance the character, form and function of the public areas and heritage buildings • realise opportunities for beneficial reuse of materials • minimise environmental footprint and impacts on land, water and ecosystems
	<p>Objective 2: Self-sustaining solutions</p>	<ul style="list-style-type: none"> • incorporate efficient and durable materials • respond to identified climate change risks • result in a minimal maintenance landscape • address both permanent (rail corridor), and temporary works (construction areas, borrow pits etc)
	<p>Objective 3: Integrated outcomes</p>	<ul style="list-style-type: none"> • be the result of collaboration across multiple design disciplines • respond to operational and maintenance requirements
	<p>Objective 4: Beyond delivery</p>	<ul style="list-style-type: none"> • appropriately respond to the scale and extent of Inland Rail infrastructure and its interface with the local landscape context • demonstrate continuous improvement as the Inland Rail Program delivery progresses

4.3 Community Consultation and Cultural Values Plan

This VLIMP has been prepared to accordance with condition E126 of the Infrastructure Approval (Application No. SSI-9406), as approved by the Minister for Planning and Public Spaces on 4 September 2024. These requirements are outlined in Section 1.3 of this report and includes community consultation (E126 (a)) with residents within proximity of the project.

Table 5 summarises the outcomes of the community consultation process. These results include the following:

- Species lists include species from local Plant Community Types (PCTs). These were reviewed and approved by the community.
- The community has requested no trees to be planted as screening along the project corridor due to concerns for trees falling down.
- There are no concerns about biosecurity as selected species are native from local PCTs.

A Cultural Values Plan (CVP) was developed through three separate cultural values workshops with Indigenous communities. These workshops included:

- Young Local Aboriginal Land Council (LALC) - 6 May 2025
- Cootamundra Aboriginal Working Party - 8 May 2025
- Aboriginal community member from Wagga Wagga and Narrandera - 1 July 2025

The workshop attendees were asked to share cultural values that they would like to see maintained for future generations, refer to Figure 8. They also created lists of specific fauna and flora species they would like to see used in regeneration and landscaping for the project. These species are shown to the right, and have been included in the species lists for the project.



Hibiscus heterophyllus
Native Rosella
 The native hibiscus - a symbol of the Stolen Generations



Centipeda cunninghamii
Old Man Weed
 Suited to wet conditions, drunk with water as a tonic or mixed with oil as a salve



Dianella revoluta
Blue Flax-Lily
 Leaves for weaving, berries and tubers for food



Acacia spp.
Wattle
 Multiple uses for the wood, seeds used for cooking etc.



Themeda triandra
Kangaroo Grass
 Ground seeds for food, weave baskets



Carpobrotus glaucescens
Pigface
 Purple flowers



Arthropodium strictum
Chocolate lillies



Atriplex nummularia
Old Man Saltbush
 Leaves used for food



Maireana erioclada
Rosy Bluebush
 Medicine in the leaves and seeds



Boerhavia diffusa
Tarvine
 Taproot contains water and energy



Microseris lanceolata
Yam Daisies
 Used as food



Hardenbergia violacea
Native Sarsaparilla

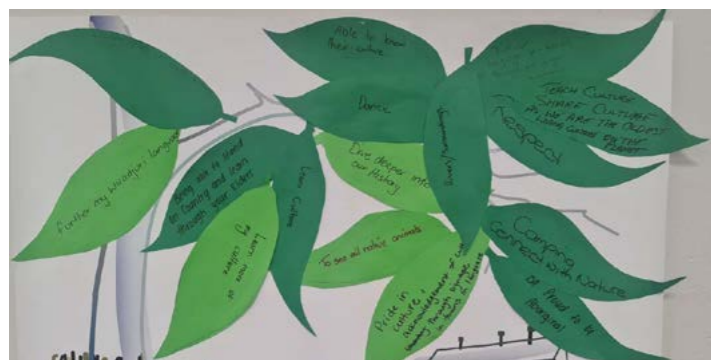


Fig.8. Cultural values exercise - Young LALC workshop

Tab.5. Community consultation results

Landowner No.	Date	Comment raised	How has this been addressed?	Where is the feedback addressed in this VLIMP?
Landowner 1	11/07/2025	During consultation, the landowner expressed a preference for revegetation that is not overly dense or bushy, in order to minimize the potential for rabbit habitation.	The species list has been checked by the ecology team to confirm the species will not encourage pest or rabbit activity.	The species list in Section 4.4 includes species that do not encourage pests. Landowner 1's property appears in Appendix A - Landscape Plan (Sheet 1)
Landowner 2	30/01/26	A draft Visual Landscape Impact Mitigation Plan (VLIMP) was presented to the landowner, who was consulted regarding any preferences for vegetation species. The landowner indicated that they had no specific preferences for species selection and raised no concerns regarding the proposed VLIMP.	No action required.	Landowner 2's property appears in Appendix A - Landscape Plan (Sheet 1 & 2)
Landowner 3	9/12/2025	The landowner reviewed the proposed Visual Landscape Impact Mitigation Plan (VLIMP) and advised that they prefer only grass species, with no shrubs or gum trees included. The landowner provided feedback specifying the plants they do not want incorporated into the plan.	On request, the following species have been excluded from the landowners property:	Landowner 3's property appears in Appendix A - Landscape Plan (Sheet 2, 3 & 4) A note has been added to these plans to exclude these species from Landowner 3's property.
Landowner 4	8/12/2025	The landowner reviewed the Visual Landscape Impact Mitigation Plan (VLIMP) and the proposed vegetation selections. They confirmed satisfaction with all species retained and raised no further concerns.]	No action required	Landowner 4's property appears in Appendix A - Landscape Plan (Sheet 4 & 5)
Landowner 5	26/11/2025	The landowner suggested plant species they preferred, but these were not included in the design, as they are neither part of the local PCTs nor native to the area, and could potentially become invasive if planted adjacent to agricultural land.	No action required	Landowner 5's property appears in Appendix A - Landscape Plan (Sheet 5, 6, 7 & 8)1
Landowner 6	27/11/2025	Discussions have been undertaken with landowners with no issues raised	No action required	Landowner 6's property appears in Appendix A - Landscape Plan (Sheet 6)

Tab.5. Community consultation results (continued)

Landowner No.	Date	Comment raised	How has this been addressed?	Where is the feedback addressed in this VLIMP?
Landowner 7	22/07/2025	No feedback has been received despite multiple attempts to contact the landowner	No action required	Landowner 7's property appears in Appendix A - Landscape Plan (Sheet 10, 11 & 12)
Landowner 8	22/07/2025 and 04/02/2025	Discussions have been undertaken with landowners with no issues raised	No action required	Landowner 8's property appears in Appendix A - Landscape Plan (Sheet 13 & 14)
Landowner 9	22/07/2025 and 04/02/2025	Discussions have been undertaken with landowners with no issues raised	No action required	Landowner 9's property appears in Appendix A - Landscape Plan (Sheet 14 & 15)
Landowner 10	30/07/2025 and 03/02/2026	Discussions have been undertaken with landowners with no issues raised	No action required	Landowner 10's property appears in Appendix A - Landscape Plan (Sheet 15 & 16)
Landowner 11	25/11/2025	Discussions have been undertaken with landowners with no issues raised	No action required	Landowner 11's property appears in Appendix A - Landscape Plan (Sheet 15, 16, 17 & 18)
Landowner 12	4/02/2026	Landowner prefers not to see plains grass/plump speargrass	No action required	Landowner 12's property appears in Appendix A - Landscape Plan (Sheet 17, 18 & 19)
Landowner 13	27/01/2026	Discussions have been undertaken with landowners with no issues raised	No action required	Landowner 13's property appears in Appendix A - Landscape Plan (Sheet 19 & 20)
Landowner 14	22/07/2025	Landowner advised that native species are preferred.	No action required	Landowner 14's property appears in Appendix A - Landscape Plan (Sheet 20 & 21)
Landowner 15	22/07/2025	Landowner advised that native species are preferred.	No action required	Landowner 15's property appears in Appendix A - Landscape Plan (Sheet 20 & 21)
Landowner 16	22/07/2025	Landowner advised that native species are preferred.	No action required	Landowner 16's property appears in Appendix A - Landscape Plan (Sheet 21 & 22)
Landowner 17	28/01/2026	Discussions have been undertaken with landowners with no issues raised	No action required	Landowner 17's property appears in Appendix A - Landscape Plan (Sheet 22, 23, 24 & 25)
Landowner 18	22/07/2025	Landowner advised that native species are preferred.	No action required	Landowner 18's property appears in Appendix A - Landscape Plan (Sheet 23 & 24)
Landowner 19	22/07/2025	Discussions have been had with landowners with no issues raised (VLIMP)	No action required	Landowner 19's property appears in Appendix A - Landscape Plan (Sheet 25)
Landowner 20	26/11/2025	Discussions have been had with landowners with no issues raised (VLIMP)	No action required	Landowner 20's property appears in Appendix A - Landscape Plan (Sheet 25)
Landowner 21	29/01/2026	Discussions have been had with landowners with no issues raised (VLIMP)	No action required	Landowner 21's property appears in Appendix A - Landscape Plan (Sheet 25 & 26)
ARTC 12000	31/07/2025	Discussions have been had with landowners with no issues raised (VLIMP)	No action required	Landowner's property appears in Appendix A - Landscape Plan (Sheet 8 & 9)
ARTC 13500	31/07/2025	Discussions have been had with landowners with no issues raised (VLIMP)	No action required	Landowner's property appears in Appendix A - Landscape Plan (Sheet 9 & 10)
ARTC 37500	28/01/2026	Discussions have been had with landowners with no issues raised (VLIMP)	No action required	Landowner's property appears in Appendix A - Landscape Plan (Sheet 20)

4.4 Planting strategy

The VLIMP aims to mitigate landscape character, visual and lighting impacts through landscape strategies. These strategies are primarily based on the Landscape and Rehabilitation Strategy (ARTC, 2021) and would be required along the length of the project site.

The landscape design will provide a well-vegetated corridor with low-maintenance landscape and distinctive key intersections, such as at the Stockinbingal Junction. Revegetation is proposed along the rail corridor as well as at key locations. Species have been selected to minimise rail safety risks. The proposed landscape treatments and planting strategy are summarised below:

- implement a landscape design with low maintenance species that minimise rail safety risks
- establish appropriate native grass planting to minimise exposed surfaces
- revegetate disturbed areas with native species and match species to local ecological communities and PCTs where possible
- provide for fauna habitat and connectivity where possible
- select species that are compatible with biosecurity concerns of the region and adjoining landowner requirements
- provide planting on cuttings and embankments to maintain the character of undulating green hills against the horizon line
- ensure non-frangible planted and seeded areas conform to clear zone requirements and setbacks from structures and maintenance access are considered
- retain all threatened and culturally significant plant species identified in the EIS

Where possible, plant species have been selected based on local PCTs identified in the Biodiversity Development Assessment Report (BDAR), (Mott Macdonald, 2022). Figures in the BDAR show the extent of each PCT which has been used to inform the planting strategy. Native species proposed by local Aboriginal communities in the community consultation workshops have also been included. While these species are not all found in local PCTs, they are all native to Australia Appendix B list the selected plant species and which PCTs they are part of, or whether they were included following community consultation.

4.5 Landscape Typologies

The ARTC documents outline four typical landscape scenarios along the project alignment which have associated design control measures, including:

- Rural landscapes
- Townships
- Ecologically sensitive areas

The following sections outline the landscape treatments that have been implemented at each typology to align with the requirements of the ARTC documents and the mitigation measures outlined in the LCVIA.

4.6 Rural Landscapes

Most of the project site is located within rural landscapes along the length of the rail corridor. The Landscape Design Specification (ARTC, 2022) outlines the following requirements for design within rural landscapes:

- respect the landscape character of established rural and agricultural land uses.
- reinforce the existing landscape character through strengthening areas of existing vegetation pattern or established field boundaries.
- protect and reconnect sensitive areas of remnant vegetation and high fauna and flora value.
- strive to improve the landscape condition in areas disrupted by project related works.

Based on the above requirements and the impacts identified in the

LCVIA, the following landscape treatments were integrated into the design of rural landscapes:

- retain and preserve existing, native vegetation wherever possible and consider localised pruning and maintenance rather than vegetation clearing
- integrate low maintenance landscape treatments that respond to existing vegetation conditions
- protect and enhance native flora and fauna habitats through selection of species from local PCTs that are endemic to the area.
- include species selected by Indigenous communities in community consultation workshops
- provide visual continuity and identity by selecting consistent planting palettes along the entire project corridor
- tie earthworks into surrounding areas in a gradual and natural manner
- avoid using trees and use only low grass and small shrub species along most of the project site to accommodate concerns of adjacent landowners
- provide planted swales rather than hard surfaces where possible, using species appropriate for predicted water flow velocities
- use appropriate batter stabilisation methods on cut and fill batters including using jute mesh to encourage vegetation establishment on slopes
- prioritise planted batters and natural stone rock faces over the use of shotcrete on steep slopes where possible

Fill batters

- Fill batters are to be graded up to 2H:1V and are to be revegetated using a hydroseed species mix comprising low shrubs, grasses and groundcovers from local PCTs
- No trees will be planted along the rail corridor except in select locations in accordance with community concerns about trees falling on their properties
- Rock fill embankments potentially comprise rock material of 450mm diameter or less which limits the ability to revegetate. These embankments will be revegetated along the base and at the top of the slope.

Cut batters

- Cut batters which are 2H:1V or flatter and are rippable are to be revegetated using a hydroseed mix of low shrubs, grasses and groundcovers.
- Cut batters up to 1.5H:1V where there is a risk of erosion of the cut face, may not be able to be revegetated and are to be treated in accordance with the relevant geotechnical packages.

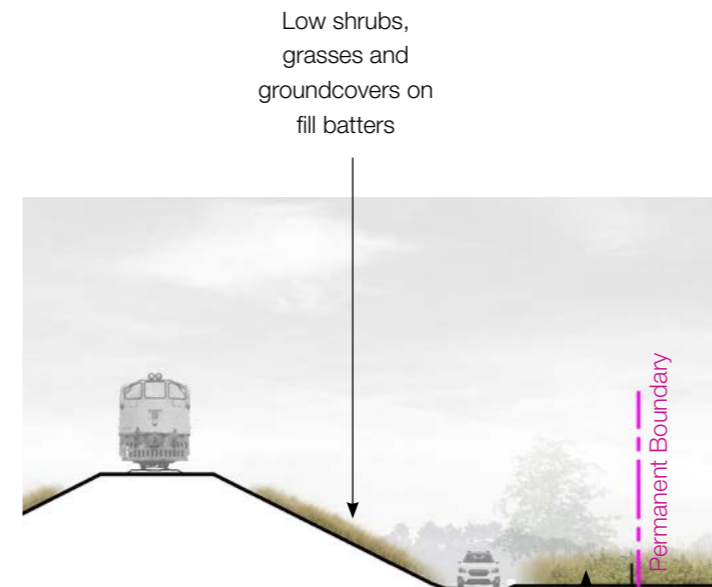


Fig.9. Fill batter typical section (NTS)

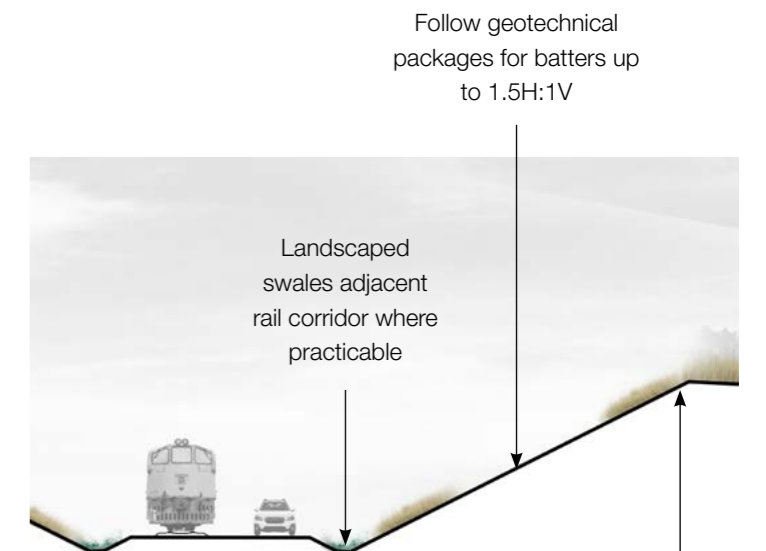


Fig.10. Cut batter typical section (NTS)

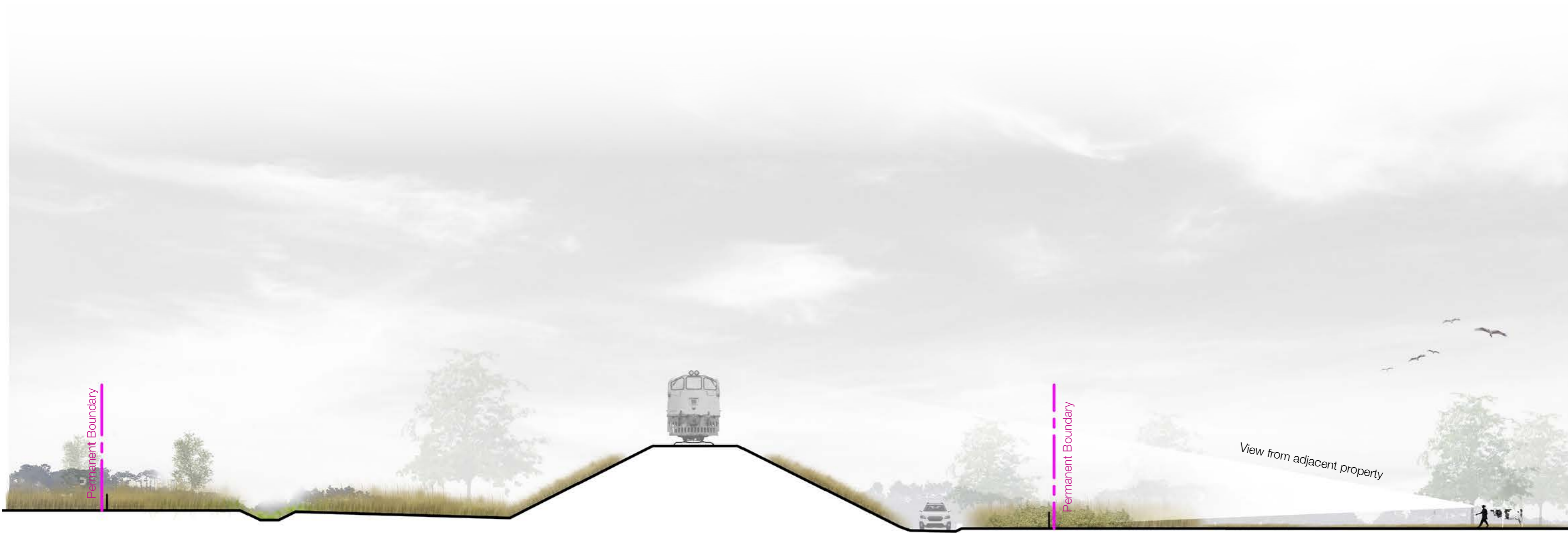


Fig. 11. Typical Section showing fill batters

Fence

Swale planting

Existing trees to be retained
wherever possible

Rail line

Maintenance access

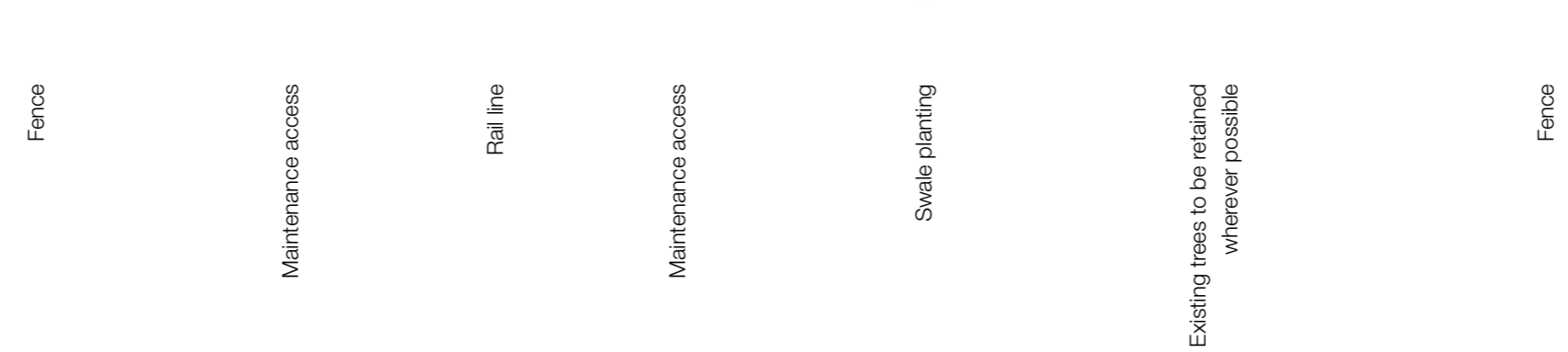
Existing trees to be retained
wherever possible

Fence

Applies to Chainage	
419000	436000
421000	437000
423000	441000
425000	447000
426000	452000
430000	453000
435000	



Fig. 12. Typical Section showing at grade rail line



Applies to Chainage	
418000	446000
422000	448000
428000	449000
429000	450000
431000	451000
433000	454000
434000	455000
440000	

Note
The section illustrates how the RMAR will be positioned on both sides of the corridor.

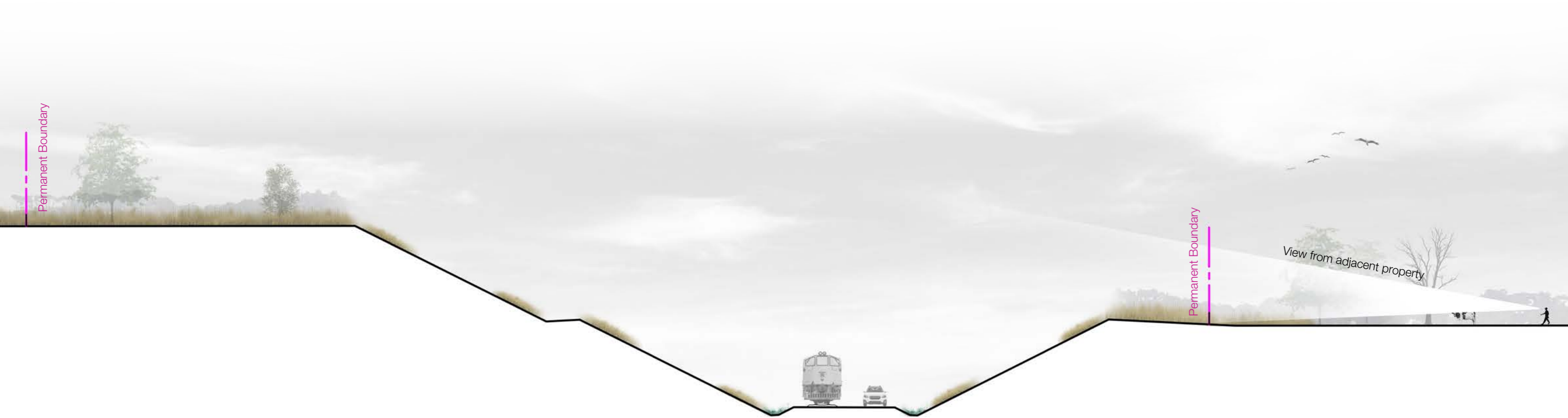


Fig.13. Typical Section showing significant cut batters

Existing trees to be retained
wherever possible

Swale planting

Rail line

Maintenance access

Swale planting

Fence

Applies to Chainage

- 420000
- 424000
- 427000
- 439000
- 442000
- 443000
- 444000
- 445000
- 456000

4.7 Townships

The project is located within proximity to the townships of Illabo to the south and Stockinbingal to the north. The Landscape Design Specification (ARTC, 2022) outlines the following requirements for landscape design near townships:

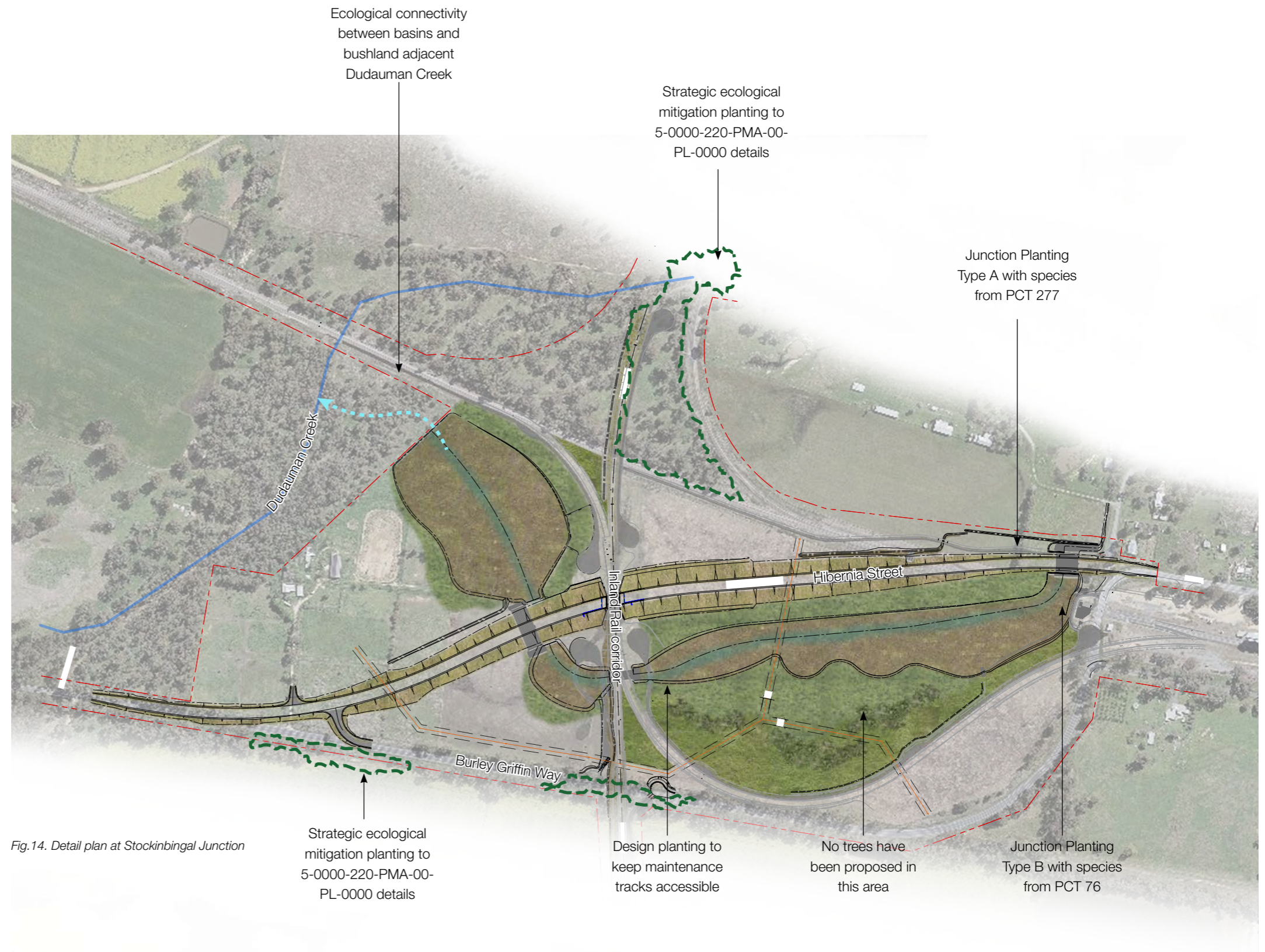
- respect the community and local context of the project
- mitigate impacts associated with surrounding sensitive receptors
- where appropriate, maintain visual connectivity across the landscape

The main location where these requirements are applied in the VLIMP is where the project is located immediately west of Stockinbingal. The project design at this location includes large detention basins and other planting treatments.

Sensitive receivers on the western extents of the town, such as Viewpoints 2 and 3 in the LCVIA, would likely have views of the project. These viewpoints received moderate or high visual impact ratings and required the consideration of mitigation measures to reduce visual impacts.

Based on these requirements, the following landscape treatments were integrated into the landscape design near townships:

- plant low maintenance, native species from local PCTs that are appropriate for detention basin and swale requirements
- include planting types that respond to adjacent PCTs and provide diversity to the 'look and feel' of the landscape. For example, two different planting types are used around the edges of the basins - one that integrates into PCT 277 and the other for PCT 76.
- provide native vegetation that fosters ecological connectivity, such as connections from the basins, to native bushland around Dudauman Creek as shown in Figure 14.
- select appropriate species that are climate resilient, provide shade and reduce potential heat island effects
- ensure planting palettes celebrate the local character and amenity of rural townships
- incorporate tree planting to define and add character to the Stockinbingal Junction
- design around and incorporate maintenance requirements such as maintenance access tracks
- Strategic ecological mitigation planting will be installed on both side of railway at 454800 and 455500 according to the recommendation from the Design Package 5-0000-220-PMA-00-PL-0000



4.8 Ecologically Sensitive Areas

The project crosses through ecologically sensitive areas including creeks and riparian corridors. The Landscape Design Specification (ARTC, 2022) outlines the following requirements for ecologically sensitive areas:

- consider the existing sensitive existing habitats of flora and fauna, water courses and the associated riparian settings, and movement of these communities.
- consider and embed cultural aspects of traversing water courses into the design.
- harness the opportunity to enhance the quality of habitat through species.
- respond to the existing landscape setting.

Based on these requirements, the following landscape treatments were integrated into the landscape design near ecologically sensitive areas:

- retain and preserve vegetation and consider pruning rather than vegetation clearing where possible
- revegetate watercourses, overland flow paths and ephemeral streams where possible to achieve enhanced habitat, biodiversity and better water quality outcomes
- select low maintenance, native species from local PCTs that are appropriate for survival in riparian corridors
- consider the local hydrological network including the cultural flow of water in consultation with local Indigenous communities

These treatments are to be implemented at the locations shown in the plans in Appendix A. These locations are watercourses of a Strahler stream order 3 or above and have been identified as opportunities for fauna connectivity in the Biodiversity Development Assessment Report - Final Fauna Connectivity Strategy (FCS).

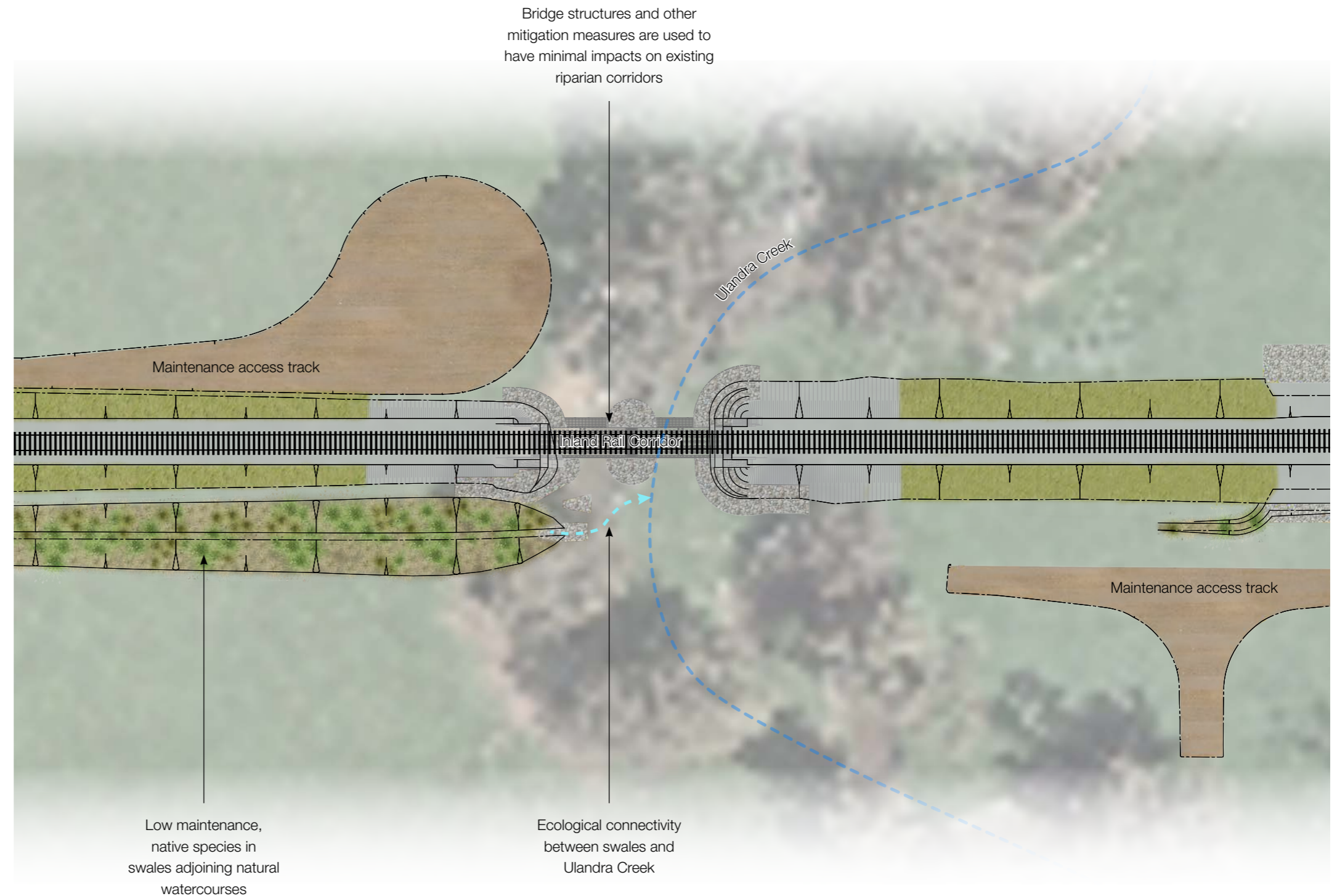


Fig.15. Detail plan at Ulandra Creek crossing

4.9 Maintenance Strategy

Table 6 provides a high level summary of the landscape maintenance strategy for the Project. Maintenance tasks are separated into those required during the establishment period in the first 52 weeks after installation, and ongoing maintenance after this period. The first 52 weeks focuses on plant survival, root establishment, weed suppression and ensuring safe visibility and access across the rail corridor.

Contractually, it is worth noting that the contractor is responsible for maintaining all revegetated and grassed areas up to Practical Completion and beyond if a defects liability period applies. This maintenance shall include (but is not limited to) the following activities to achieve the performance outcome:

- Watering (using water of suitable quality and via a method that doesn't induce erosion or contamination) of the Works, and in suitable quantities for the species requirements;
- Fertilizing; Reseeding; Weed control; Pest & disease control; Vegetation control & management; Repair/reinstallation of failed treatments; Topping up of mulch; Protection of vegetation works from surface water flows through installation of appropriate temporary measures; and Removal of any rubbish or contamination.

Tab.6. Maintenance Strategy

Maintenance Strategy	
Establishment period (first 52 weeks)	Ongoing maintenance (after the first 52 weeks)
<p>Watering</p> <ul style="list-style-type: none"> • Weeks 0–12: 2–3 times per week (depending on rainfall, soil moisture). • Weeks 12–26: Reduce to weekly or fortnightly. • Weeks 26–52: As-needed based on seasonal conditions. <p>Use gentle watering or temporary dripline systems to minimise erosion and overspray near tracks</p>	<p>Watering</p> <ul style="list-style-type: none"> • Generally not required for native species unless severe drought conditions occur. • Emergency watering may occur during extended heatwaves to prevent mass plant loss.
<p>Weed control</p> <ul style="list-style-type: none"> • Regular inspections, fortnightly during growth season (spring/summer) • Use hand removal around tubestock • Apply selective herbicide where permitted and safe • Replenish mulch to suppress weeds and retain moisture 	<p>Weed management</p> <ul style="list-style-type: none"> • Regular inspections; depending on seasonal growth • Continue selective herbicide or manual control • Maintain mulched surfaces to minimise regrowth.
<p>Mulching</p> <ul style="list-style-type: none"> • Maintain organic mulch over all planted areas to the depth specified in landscape drawings • Replenish any areas disturbed by water runoff, wind or fauna • Keep mulch clear of plant stems to avoid rot 	<p>Pruning and vegetation management</p> <ul style="list-style-type: none"> • Annual structural pruning to maintain access, visibility and safety clearances around rail tracks, signage and signals, and overhead or underground utilities
<p>Plant replacement</p> <ul style="list-style-type: none"> • Regularly assess plant health and replace dead plants • Ensure species provenance aligns with original specification 	<p>Pest and disease control</p> <ul style="list-style-type: none"> • Treat only as required if plant health is compromised
<p>Pest and disease management</p> <ul style="list-style-type: none"> • Regular inspections for insects and fungal issues • Maintain hygiene by removing infected material 	<p>Erosion and soil stability</p> <ul style="list-style-type: none"> • Inspect after major storm or flooding events
<p>Soil condition and erosion control</p> <ul style="list-style-type: none"> • Monitor soil moisture and compaction • Rectify erosion immediately to prevent undermining of root zones or rail infrastructure 	<p>Litter and debris removal</p> <ul style="list-style-type: none"> • Remove debris washed or blown into planting areas that may impede plant growth or present fire hazards
<p>Pruning</p> <ul style="list-style-type: none"> • Minimal structural pruning to encourage natural form. • Maintain clearances from rail infrastructure and signal sightlines. • Remove damaged or wind-affected growth. 	<p>Fire risk and management</p> <ul style="list-style-type: none"> • Maintain low-fuel zones where required by rail authority standards. • Prune or thin dense vegetation as needed before fire season

4.10 Temporary Works

The areas of the project associated with temporary works include requirements such as storage of construction material and equipment, ancillary facilities, temporary access road, laydown areas, site offices and site amenities.

Temporary works areas should consider the following to mitigate visual and landscape character impacts during construction:

- retain and protect as many existing mature trees and established vegetation as possible. Use appropriate construction site fencing and additional mitigation measures where required.
- minimise construction footprints and extents of earthworks
- utilise existing cleared and/or disturbed areas to locate storage, site offices and construction compounds where possible
- in consultation with landowners, restore all disturbed site construction areas
- ensure site areas are regularly maintained and kept tidy
- minimise visual impact of ancillary facilities including:
 - selecting the locations of visible structures, equipment and perimeter fencing away from sensitive receivers
 - considering the colours of site hoardings and incorporate colours to blend into the surrounding environment and respond to associated landscape character areas
- design site lighting to minimise glare issues and light spillage into adjoining properties in accordance with the Australian Standard 4282-1997 C
- minimise the use of night lighting where possible
- direct light away from residential receivers and ecological areas

4.11 Summary of Landscape Strategy and Mitigation Measures

Table 7 outlines how the landscape plan addresses the recommended mitigation measures at operation. Table 8 outlines the landscape treatments to be implemented during the construction phase based on the proposed LCVIA mitigation measures.

Tab.7. Mitigation measures at operation

Ref	How and where is it addressed?
LV-8	Refer to Section 4.9 - Maintenance Strategy

Tab.8. Mitigation measures at construction

Ref	Landscape treatments to be implemented
LV-1	<ul style="list-style-type: none"> Minimise construction footprints and extents of earthworks (Section 4.10) Retain and protect as many existing mature trees and established vegetation as possible. Use appropriate construction site fencing and additional mitigation measures where required (Section 4.10) Retain and preserve existing, native vegetation wherever possible and consider localised pruning and maintenance rather than vegetation clearing (Section 4.6) Retain all threatened and culturally significant plant species identified in the EIS (Section 4.4)
LV-2	<ul style="list-style-type: none"> Create a consistent planting palette along the rail corridor comprising native vegetation to match local ecological communities and PCTs (Section 4.4) Respect the landscape character of established rural and agricultural land uses (Section 4.6) Reinforce the existing landscape character through strengthening areas of existing vegetation pattern or established field boundaries (Section 4.6) <p>Off-site screening is also proposed as an effective form of mitigating visual impacts through planting on private properties at specific locations to filter views of the project. This would need to be implemented in consultation with affected landowners.</p>

LV-3	<ul style="list-style-type: none"> Revegetate cuttings and embankments to maintain the character of undulating green hills against the horizon line (Section 4.4) Use appropriate batter stabilisation methods on cut and fill batters including using jute mesh to encourage vegetation establishment on slopes (Section 4.6) Prioritise planted batters and natural stone rock faces over the use of shotcrete on steep slopes where possible (Section 4.6) Tie earthworks into surrounding areas in a gradual and natural manner (Section 4.6) Fill batters are to be graded up to 2H:1V and are to be revegetated using a hydroseed species mix comprising low shrubs, grasses and groundcovers from local PCTs (Section 4.6) Cut batters which are 2H:1V or flatter and are rippable are to be revegetated using a hydroseed mix of low shrubs, grasses and groundcovers (Section 4.6) Cut batters up to 1.5H:1V where there is a risk of erosion of the cut face, may not be able to be revegetated and are to be treated in accordance with the relevant geotechnical packages (Section 4.6)
LV-4	<ul style="list-style-type: none"> Utilise existing cleared and/or disturbed areas to locate storage, site offices and construction compounds where possible (Section 4.10) Locate construction compounds within cleared areas and away from sensitive receivers where possible (Section 4.10)
LV-5	<ul style="list-style-type: none"> Revegetate disturbed areas with native species from local PCTs (Section 4.4)
LV-6	<ul style="list-style-type: none"> Minimise glare and light spill impact on nearby receivers at construction sites (Section 4.10) Design site lighting to minimise glare issues and light spillage into adjoining properties in accordance with the Australian Standard 4282-1997 C (Section 4.10) Minimise the use of night lighting where possible (Section 4.10) Direct light away from residential receivers and ecological areas (Section 4.10)
LV-7	<ul style="list-style-type: none"> Minimise visual impact of ancillary facilities including: <ul style="list-style-type: none"> Selecting the locations of visible structures, equipment and perimeter fencing away from sensitive receivers (Section 4.10) Considering the colours of site hoardings and incorporate colours to blend into the surrounding environment and respond to associated landscape character areas (Section 4.10) Keep stockpile heights to a minimum near sensitive receivers (Section 4.10)

4.12 Crime Prevention Through Environmental Design (CPTED)

Crime Prevention Through Environmental Design (CPTED) principles have been considered in the I2S Inland Rail project to minimise opportunities for unauthorised access and improve corridor security. As the rail alignment largely traverses private rural properties with minimal public interface, the risk of public interaction with the corridor is inherently low. Security measures therefore focus on physical deterrence, including continuous fencing along the rail corridor to prevent public entry and clearly define the operational boundary. Low vegetation planting and limited landscaping are proposed to maintain clear sightlines for maintenance and security monitoring, supporting passive surveillance and reducing potential concealment opportunities.



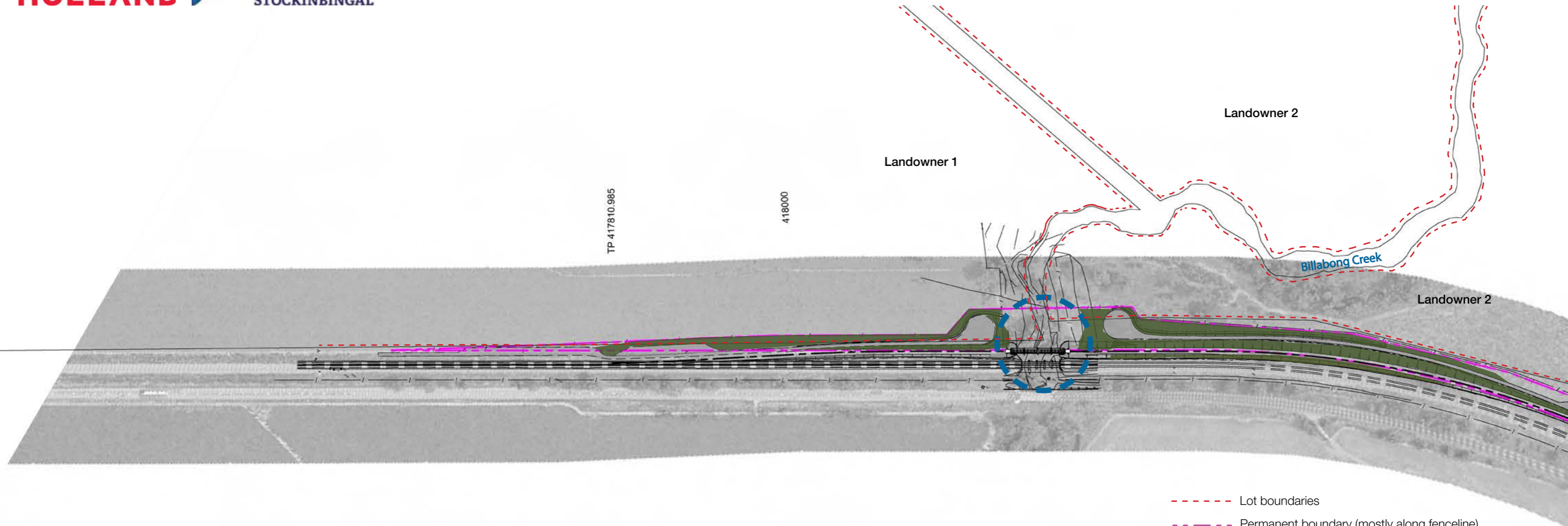
Appendix A

Landscape Plans



Fig.16. Key Plan

NTS 



- - - Lot boundaries
- - - Permanent boundary (mostly along fence line)
- █ Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCTs 79, 276 and 277
- Riparian zone - includes mix of trees, shrubs, grasses and groundcovers



Juncus usitatus



Carex inversa



Microlaena stipoides



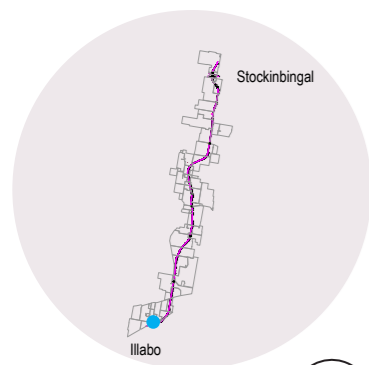
Rumex brownii



Elymus scaber



Wahlenbergia stricta

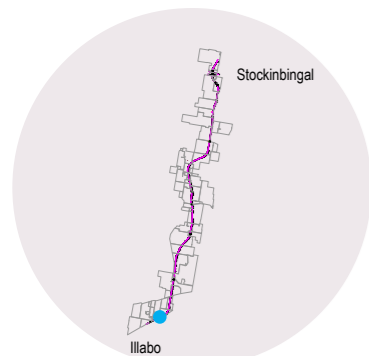
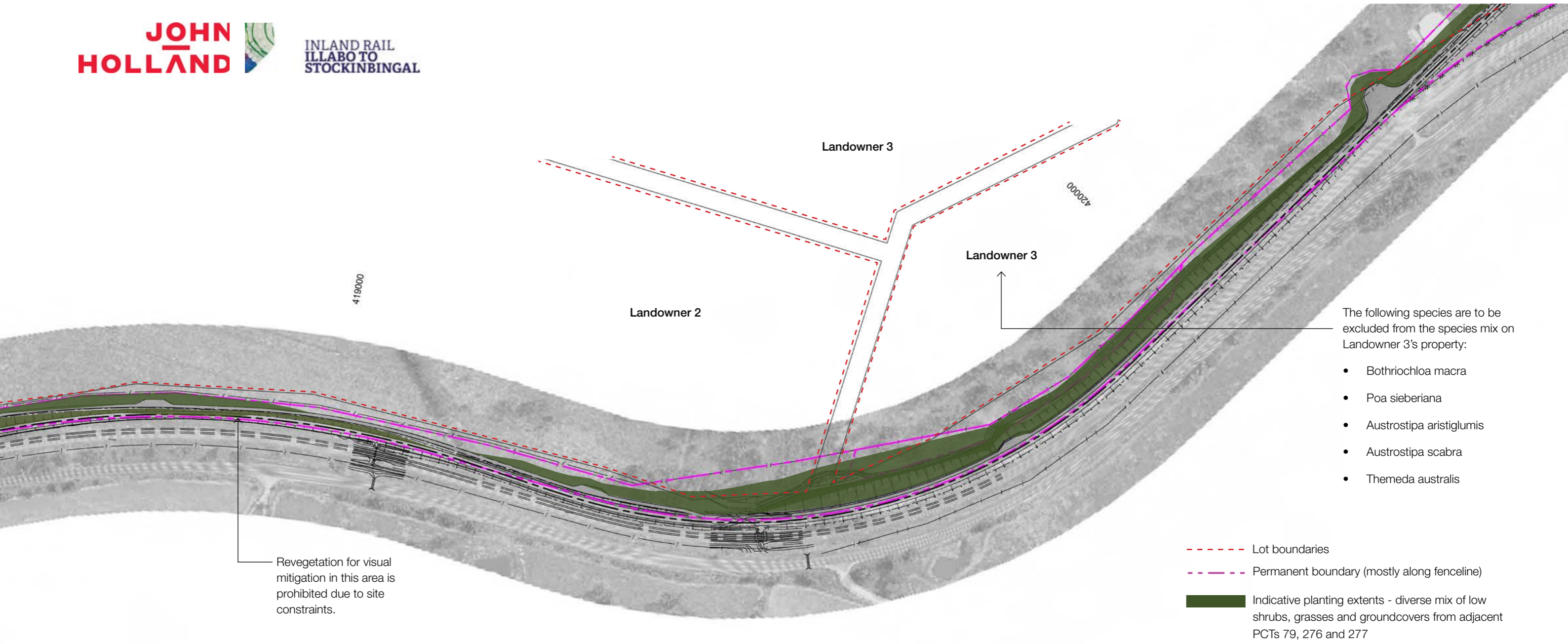


Key Plan

1:4000 @ A3



Fig.17. Landscape plan (Sheet 1 of 26)



Key Plan

1:4000 @ A3



Fig.18. Landscape plan (Sheet 2 of 26)



Lomandra filiformis



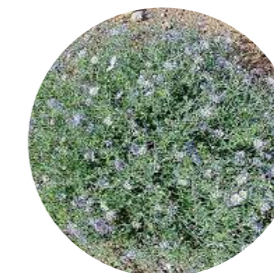
Convolvulus erubescens



Bothriochloa macra



Atriplex semibaccata



Calotis cuneifolia



Poa sieberiana



Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



Sida corrugata



Austrostipa scabra



Themeda australis

The following species are to be excluded from the species mix on Landowner 3's property:

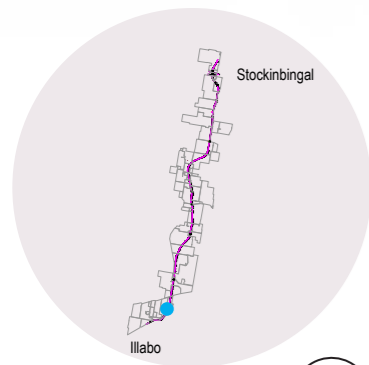
- Bothriochloa macra
- Poa sieberiana
- Austrostipa aristiglumis
- Austrostipa scabra
- Themeda australis

Landowner 3

Landowner 3

Landowner 3

- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- █ Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCT 76



Key Plan

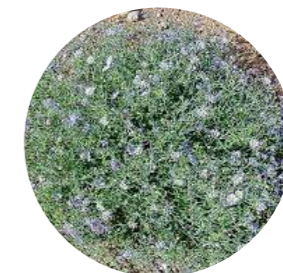
1:4000 @ A3



Fig.19. Landscape plan (Sheet 3 of 26)



Atriplex semibaccata



Calotis cuneifolia



Poa sieberiana



Sida corrugata



Austrostipa scabra

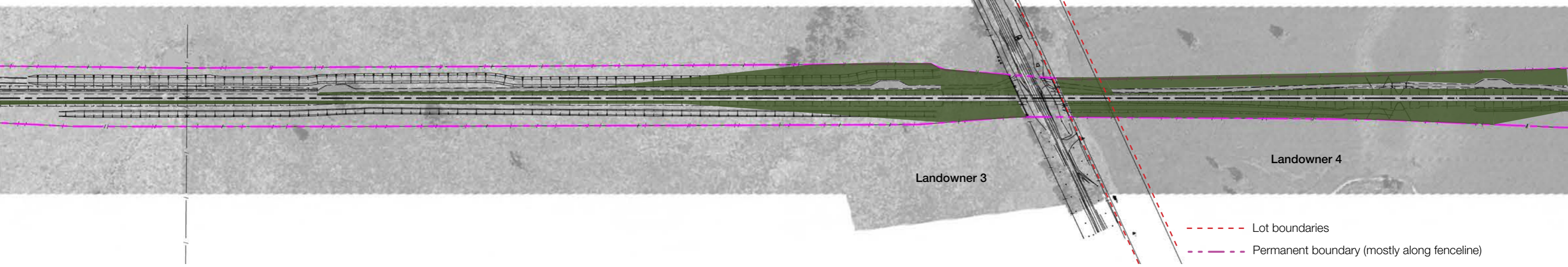


Themeda australis

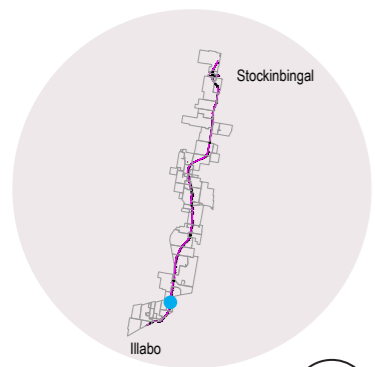
The following species are to be excluded from the species mix on Landowner 3's property:

- Bothriochloa macra
- Poa sieberiana
- Austrostipa aristiglumis
- Austrostipa scabra
- Themeda australis

422000



--- Lot boundaries
 --- Permanent boundary (mostly along fenceline)
 ■ Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCT 76



Key Plan
 1:4000 @ A3
 Fig.20. Landscape plan (Sheet 4 of 26)

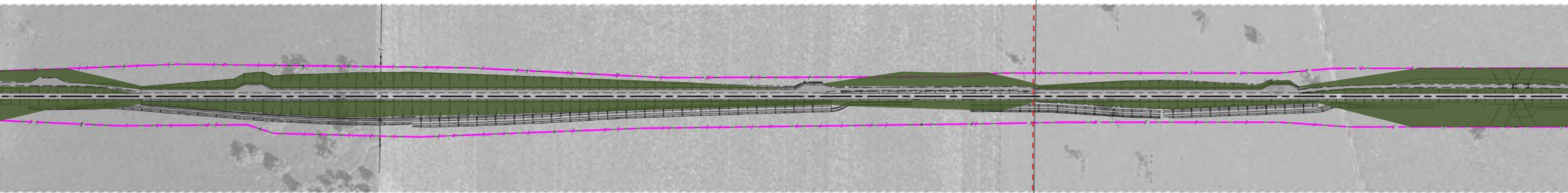


Landowner 4

424000

Landowner 5

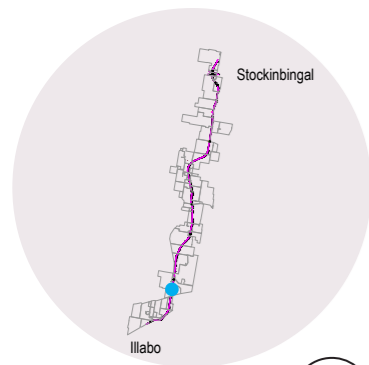
425000



Landowner 4

Landowner 5

- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCT 80



Key Plan

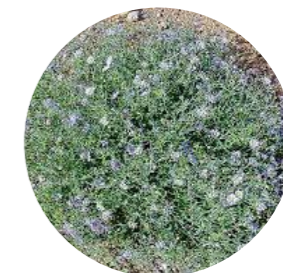
1:4000 @ A3



Fig.21. Landscape plan (Sheet 5 of 26)



Atriplex semibaccata



Calotis cuneifolia



Poa sieberiana



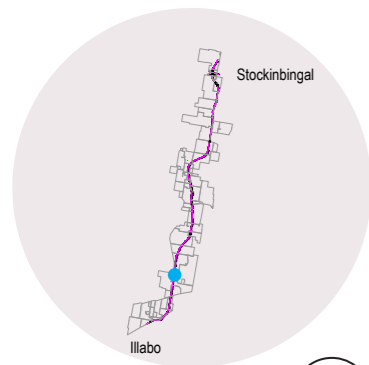
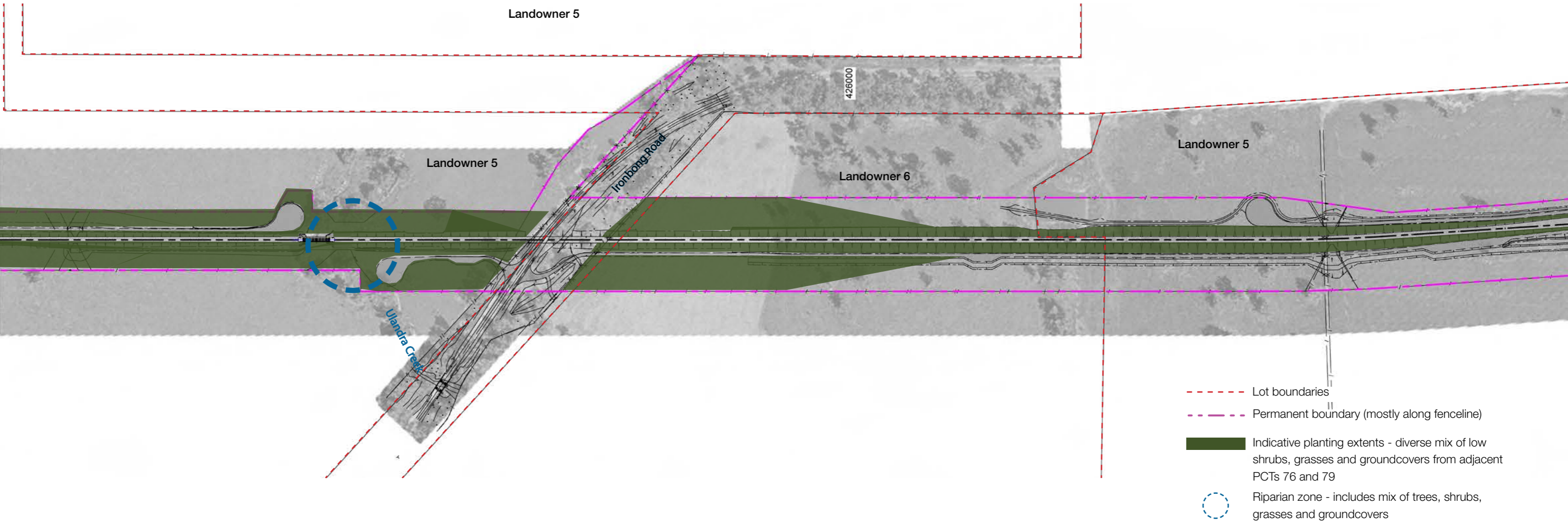
Sida corrugata



Austrostipa scabra



Themeda australis



Key Plan

1:4000 @ A3



Fig.22. Landscape plan (Sheet 6 of 26)



Juncus usitatus



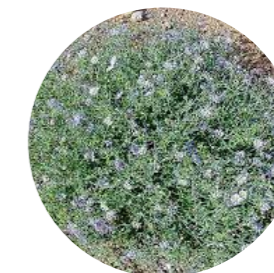
Carex inversa



Microlaena stipoides



Atriplex semibaccata



Calotis cuneifolia



Poa sieberiana



Rumex brownii



Elymus scaber



Wahlenbergia stricta



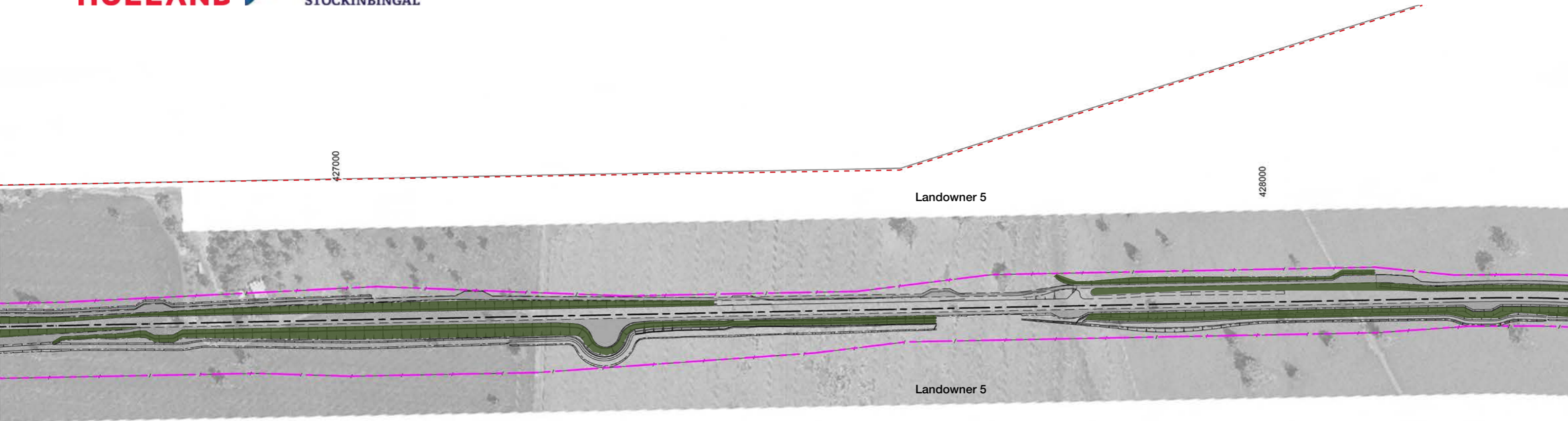
Sida corrugata



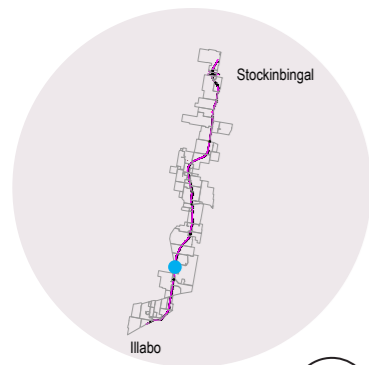
Austrostipa scabra



Themeda australis



- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCTs 76, 80 and 277



Key Plan

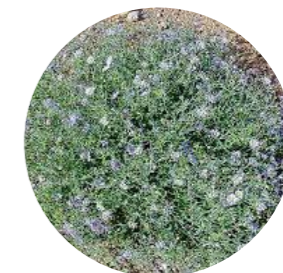
1:4000 @ A3



Fig.23. Landscape plan (Sheet 7 of 26)



Atriplex semibaccata



Calotis cuneifolia



Poa sieberiana



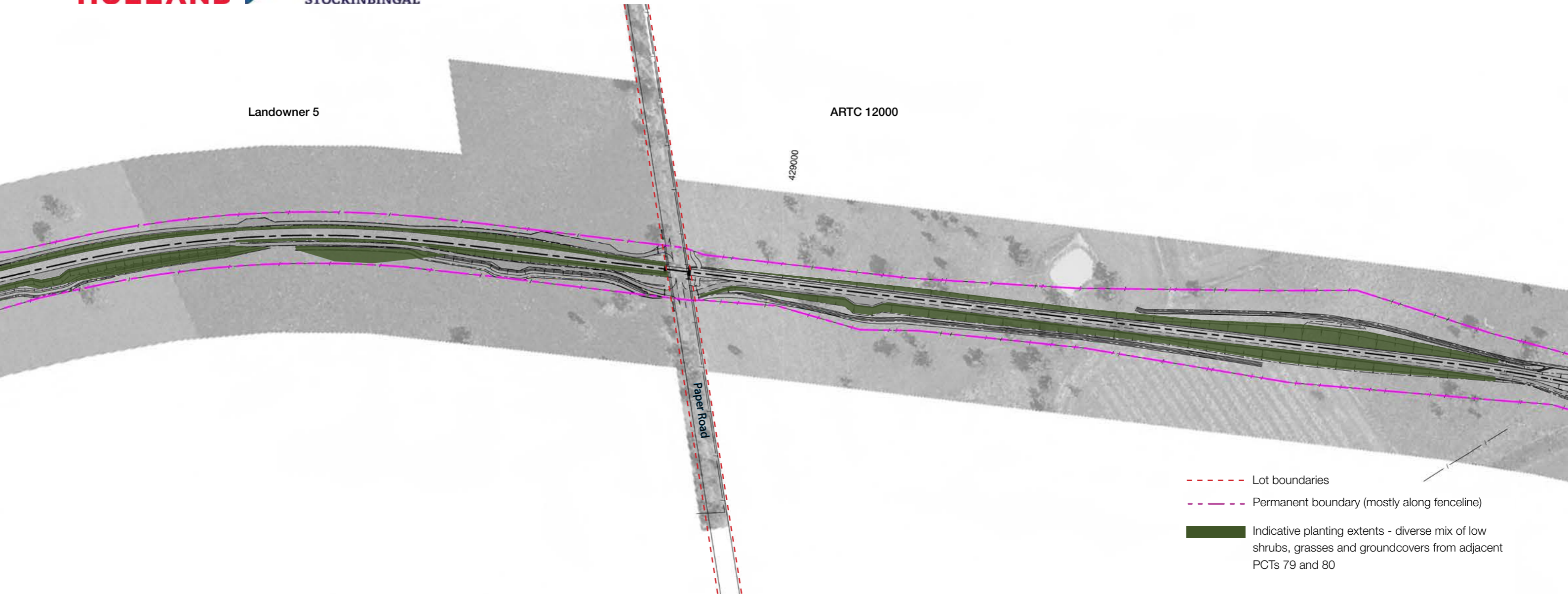
Sida corrugata



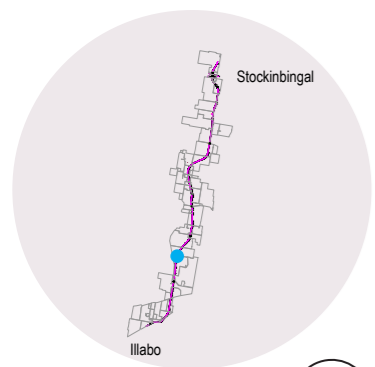
Austrostipa scabra



Themeda australis



- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- █ Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCTs 79 and 80



Key Plan
1:4000 @ A3
Fig.24. Landscape plan (Sheet 8 of 26)



Atriplex semibaccata



Calotis cuneifolia



Poa sieberiana



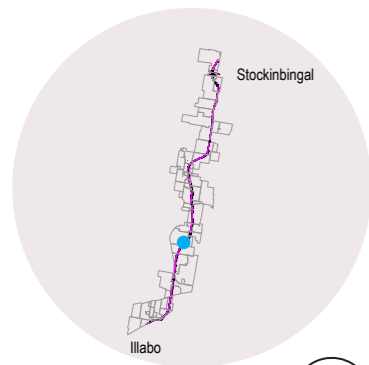
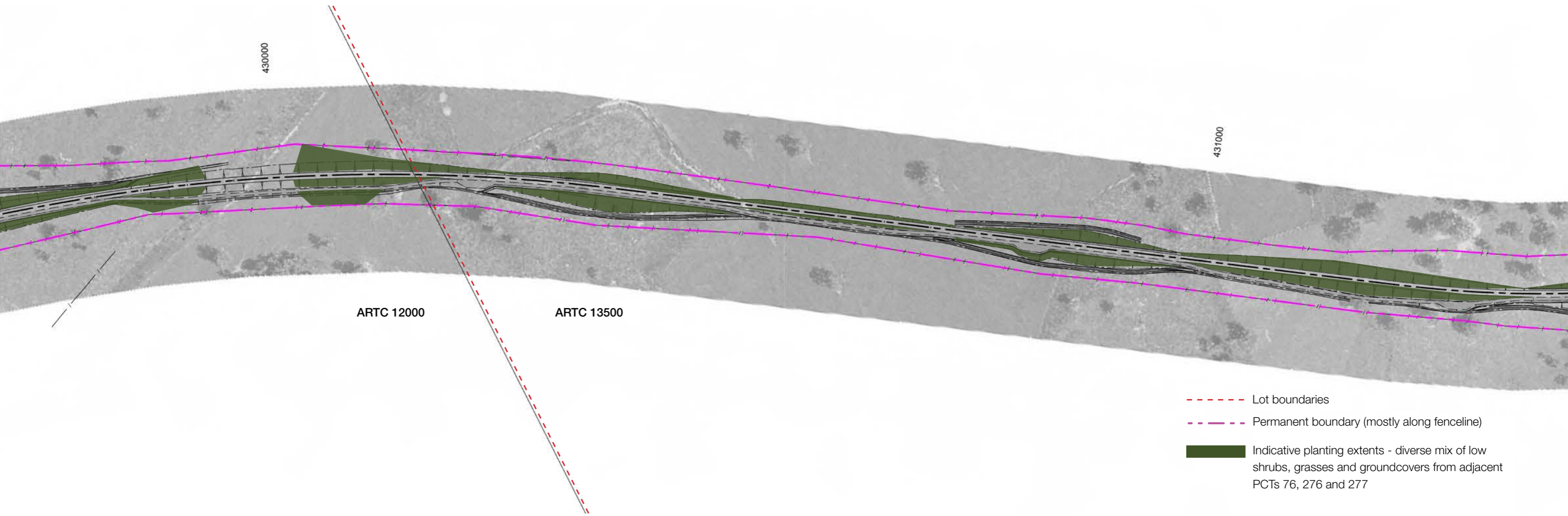
Sida corrugata



Austrostipa scabra



Themeda australis



Key Plan

1:4000 @ A3



Fig.25. Landscape plan (Sheet 9 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



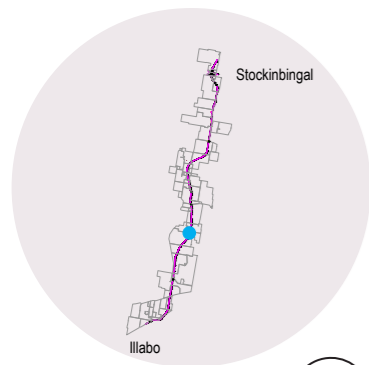
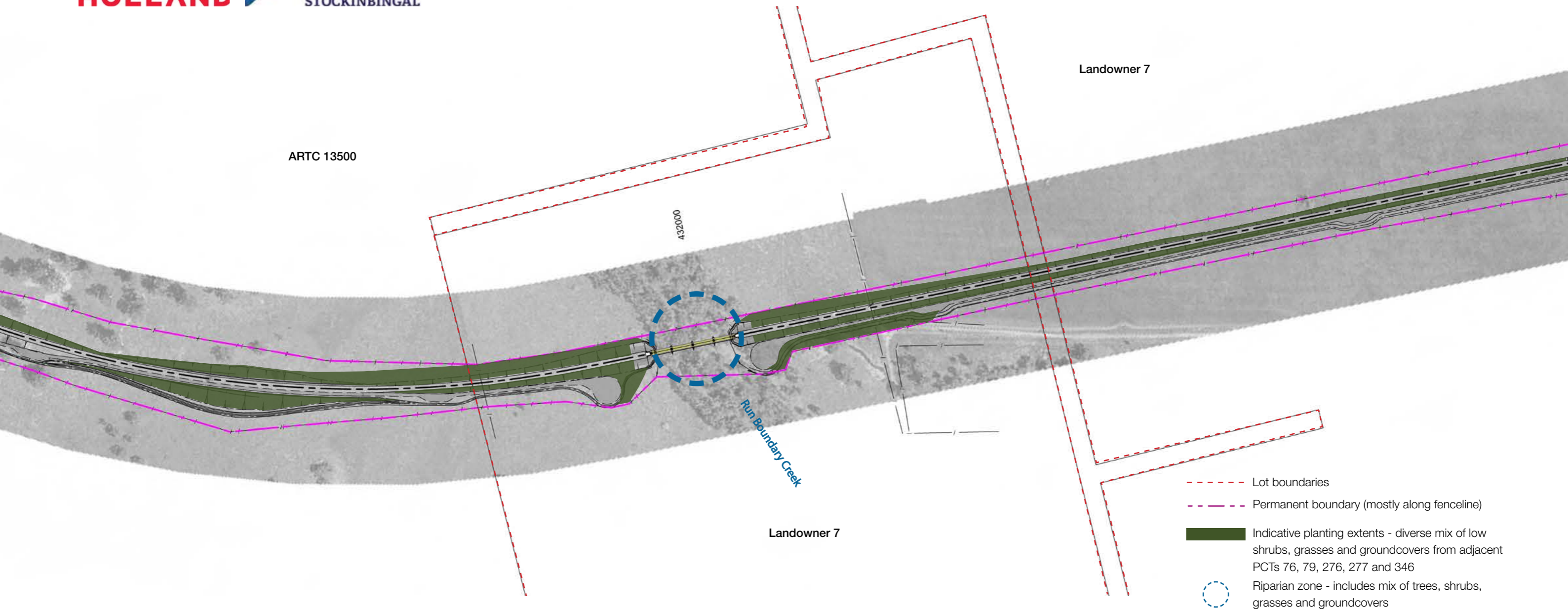
Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



Key Plan

1:4000 @ A3



Fig.26. Landscape plan (Sheet 10 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



Juncus usitatus



Carex inversa



Microlaena stipoides



Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



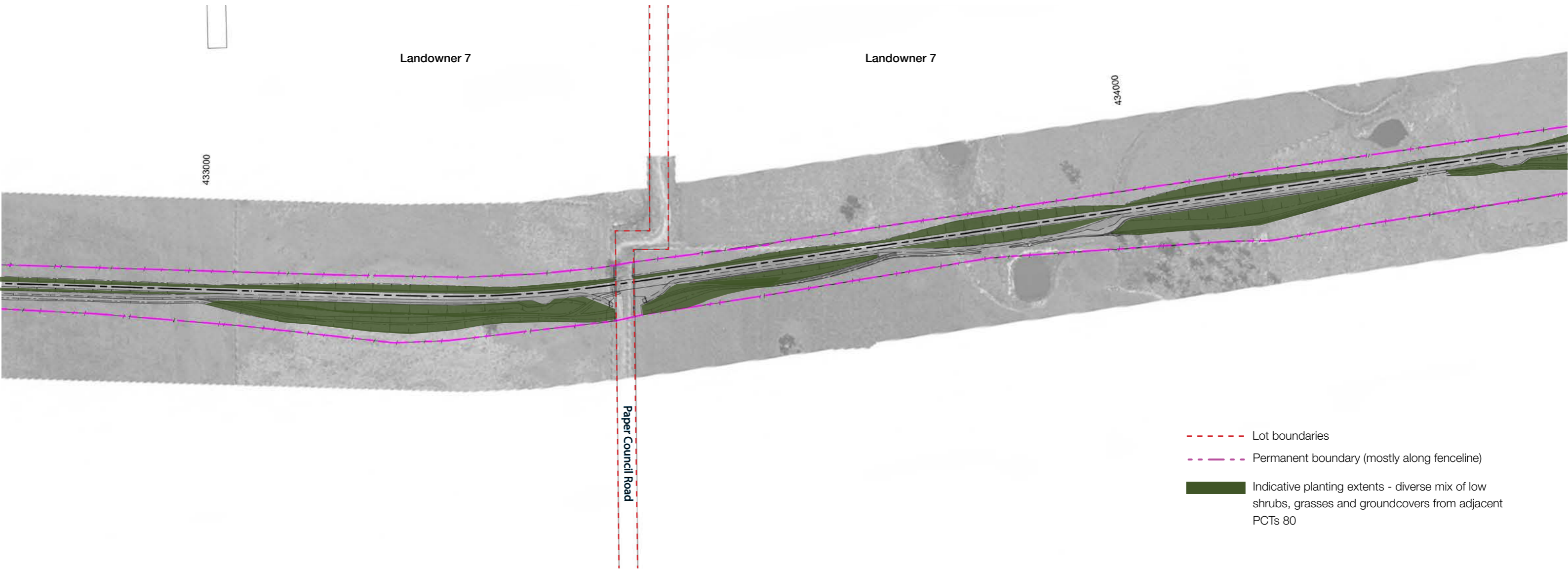
Rumex brownii



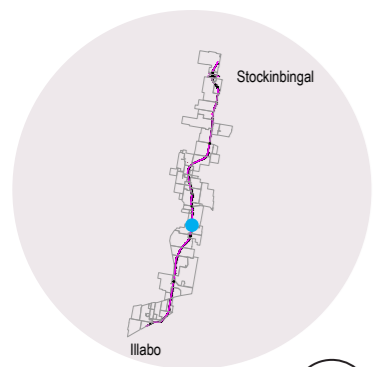
Elymus scaber



Wahlenbergia stricta



- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCTs 80



Key Plan

1:4000 @ A3



Fig.27. Landscape plan (Sheet 11 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



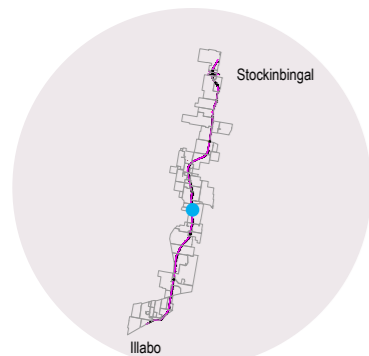
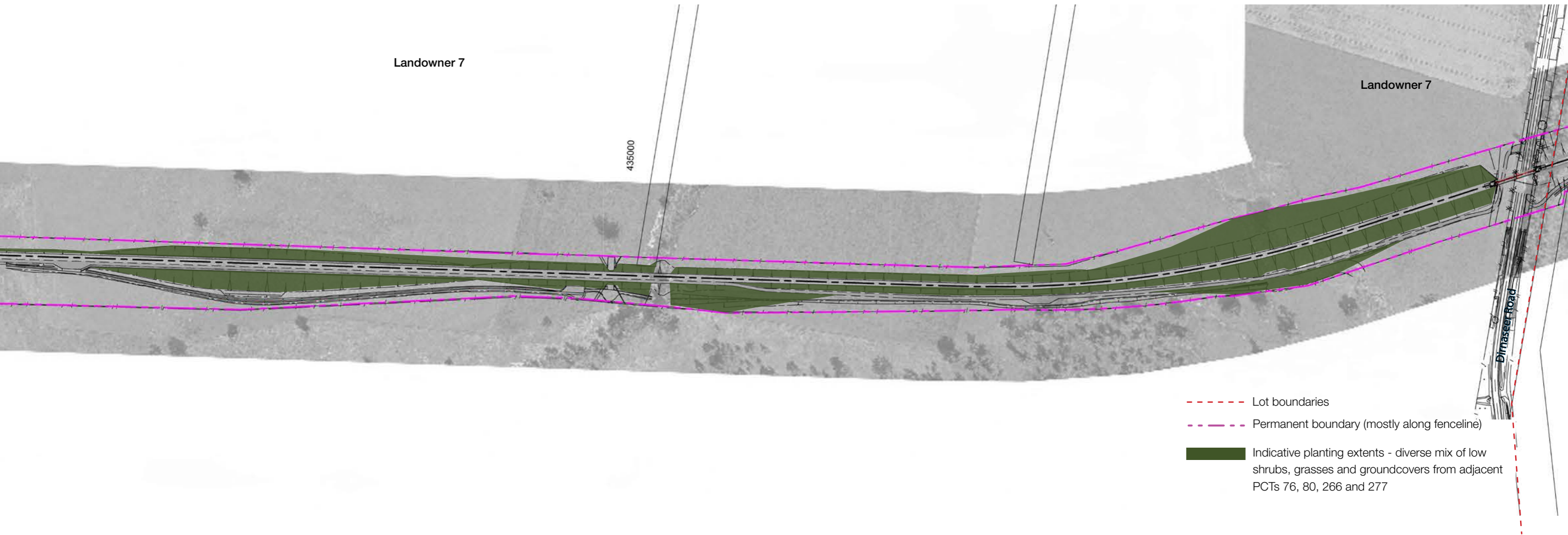
Austrostipa aristiglumis



Leptorhynchos squamatus



Stackhousia monogyna



Key Plan

1:4000 @ A3



Fig.28. Landscape plan (Sheet 12 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



Atriplex semibaccata



Calotis cuneifolia



Poa sieberiana



Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



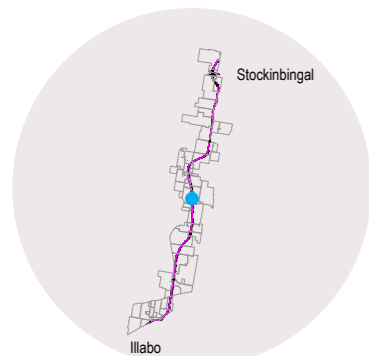
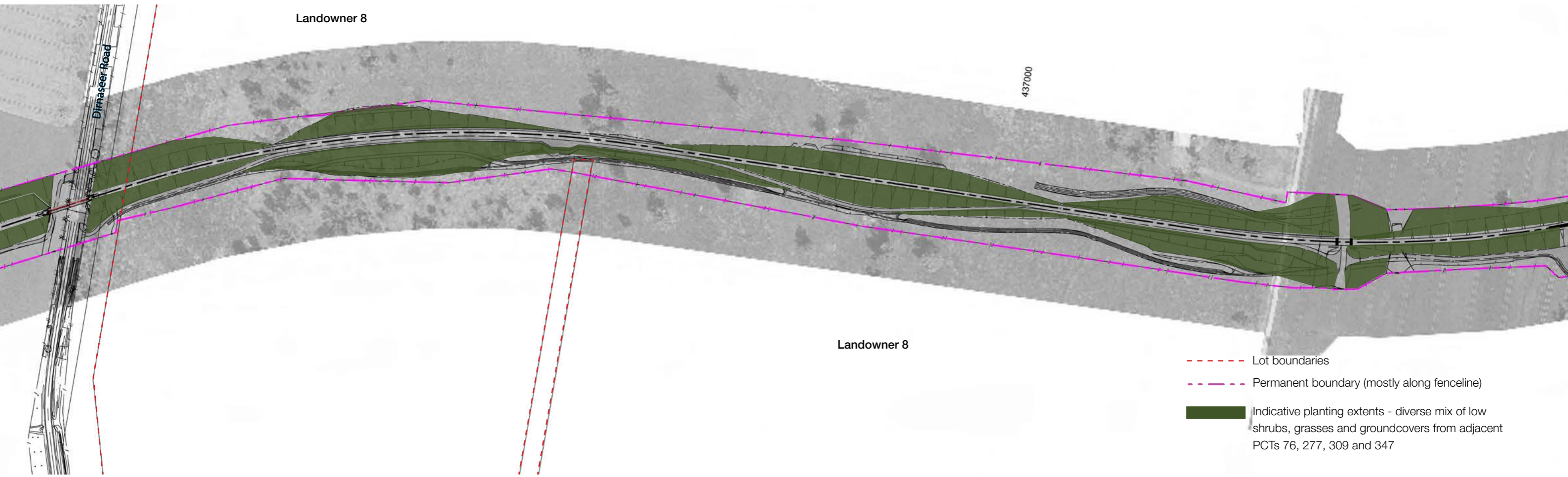
Sida corrugata



Austrostipa scabra



Themeda australis



Key Plan

1:4000 @ A3



Fig.29. Landscape plan (Sheet 13 of 26)



Atriplex semibaccata



Calotis cuneifolia



Dodonaea viscosa subsp. cuneata



Stypandra glauca



Cheilanthes sieberi



Calytrix tetragona



Sida corrugata



Austrostipa scabra



Bursaria spinosa subsp. spinosa



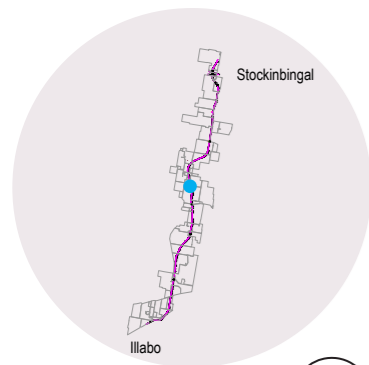
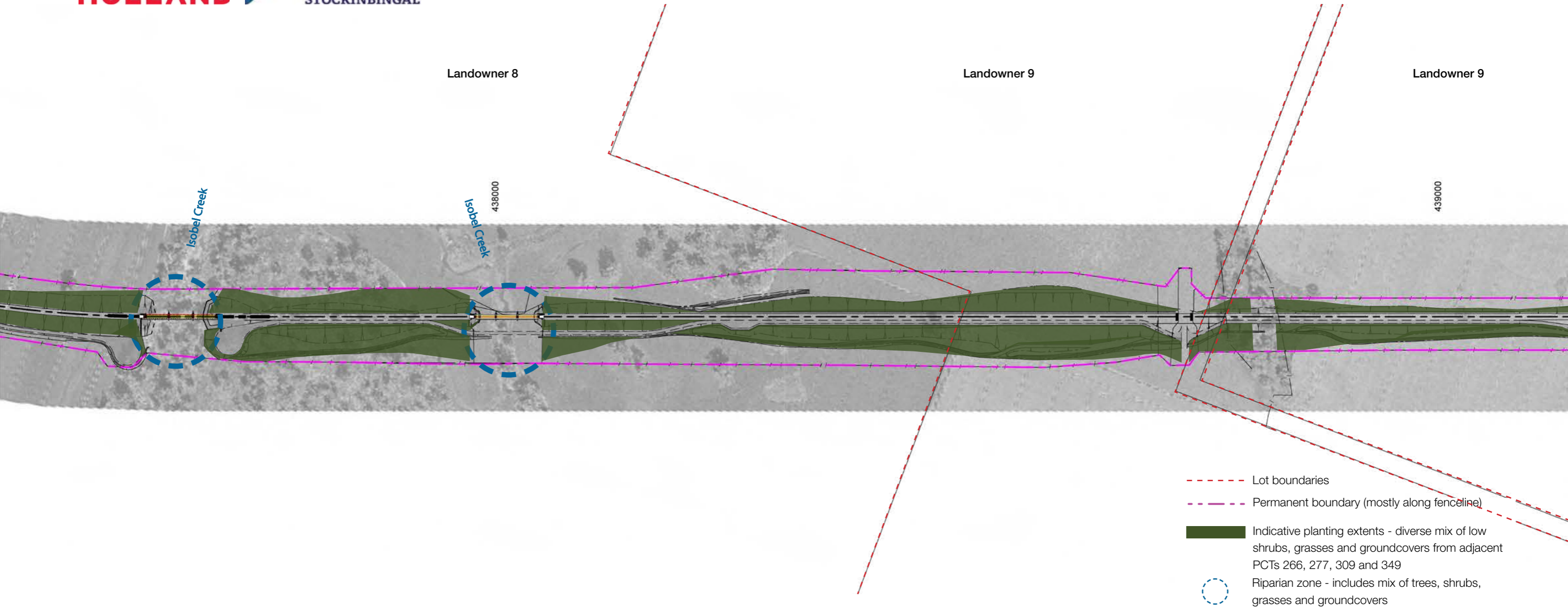
Joycea pallida



Senecio bathurstianus



Acacia paradoxa



Key Plan

1:4000 @ A3



Fig.30. Landscape plan (Sheet 14 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



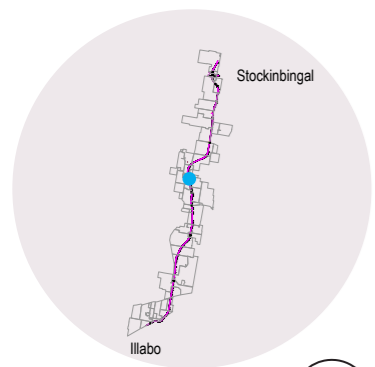
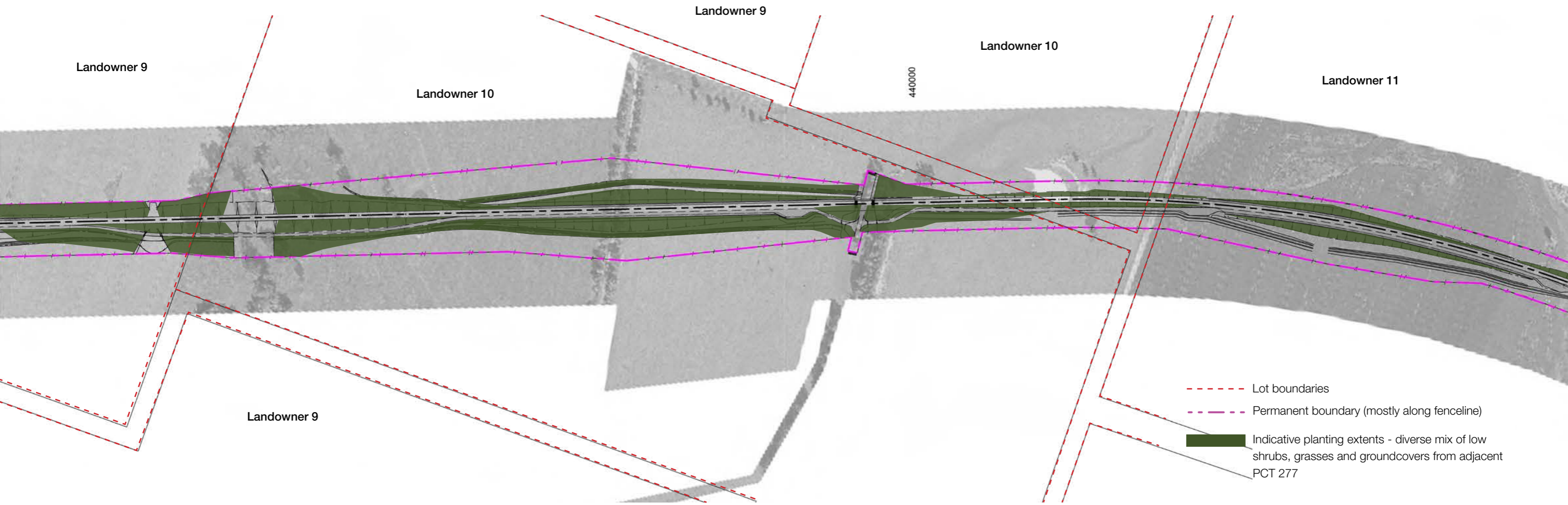
Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



Key Plan

1:4000 @ A3



Fig.31. Landscape plan (Sheet 15 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



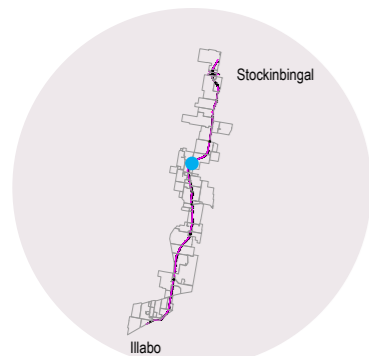
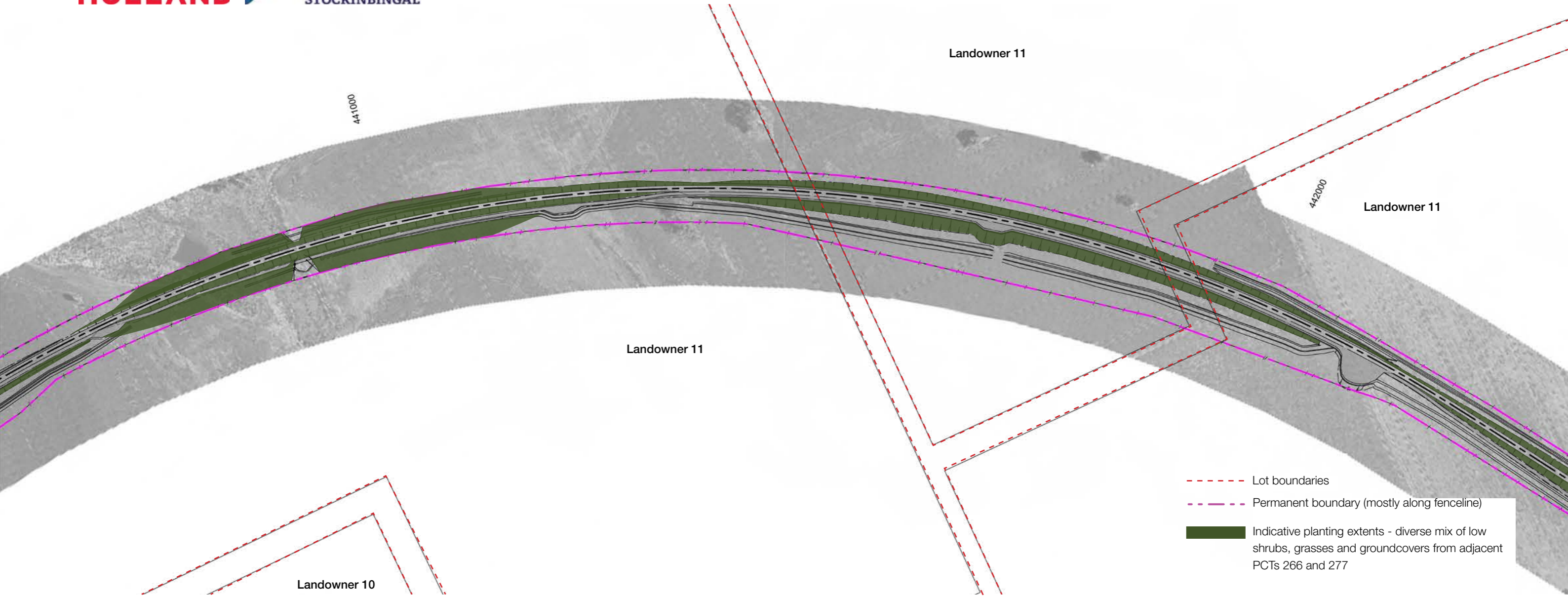
Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



Key Plan

1:4000 @ A3



Fig.32. Landscape plan (Sheet 16 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



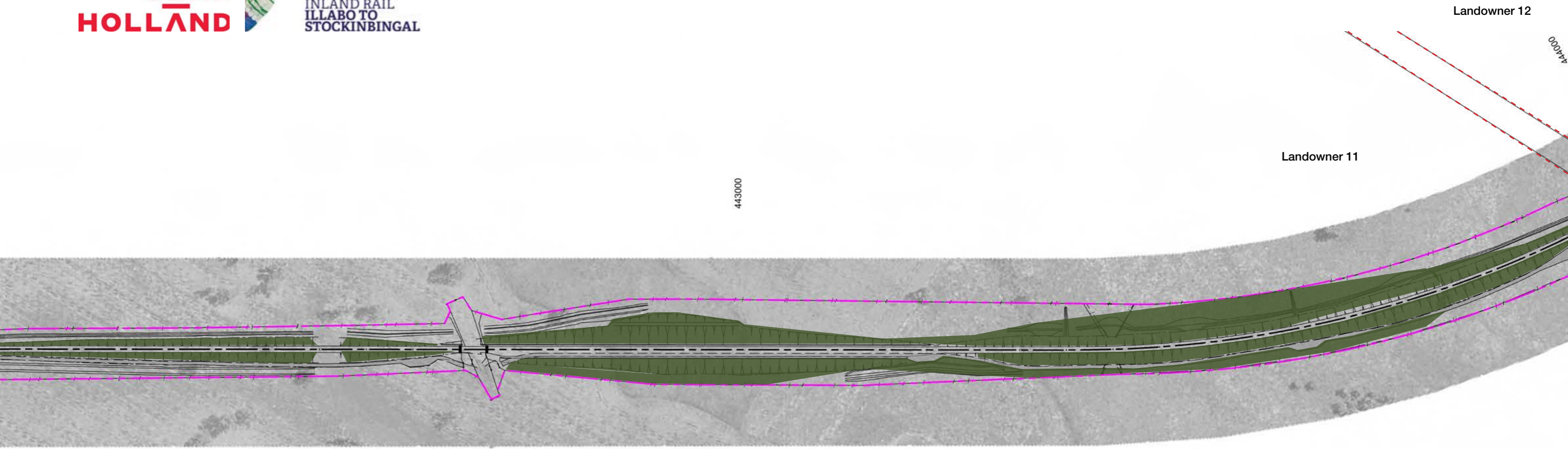
Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCTs 266 and 277



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



Brachychiton populneus



Eucalyptus albens



Eucalyptus blakelyi



Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



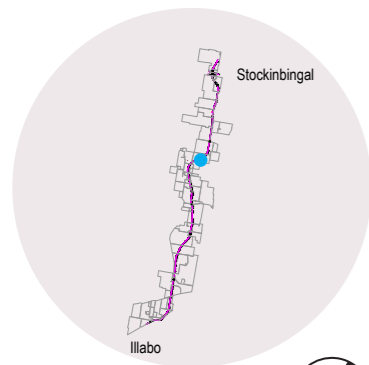
Asperula conferta



Dodonaea viscosa



Acacia decora

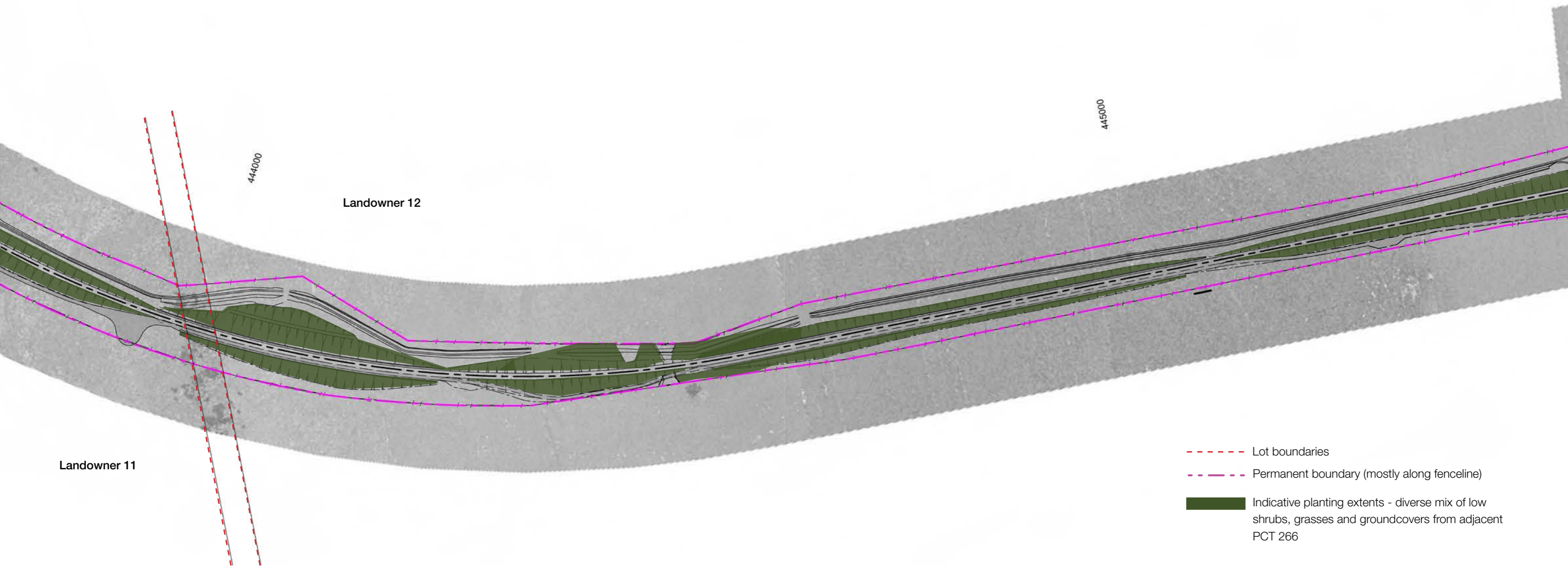


Key Plan

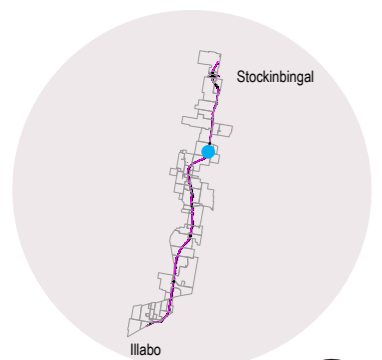
1:4000 @ A3



Fig.33. Landscape plan (Sheet 17 of 26)



- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- █ Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCT 266



Key Plan
1:4000 @ A3
Fig.34. Landscape plan (Sheet 18 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



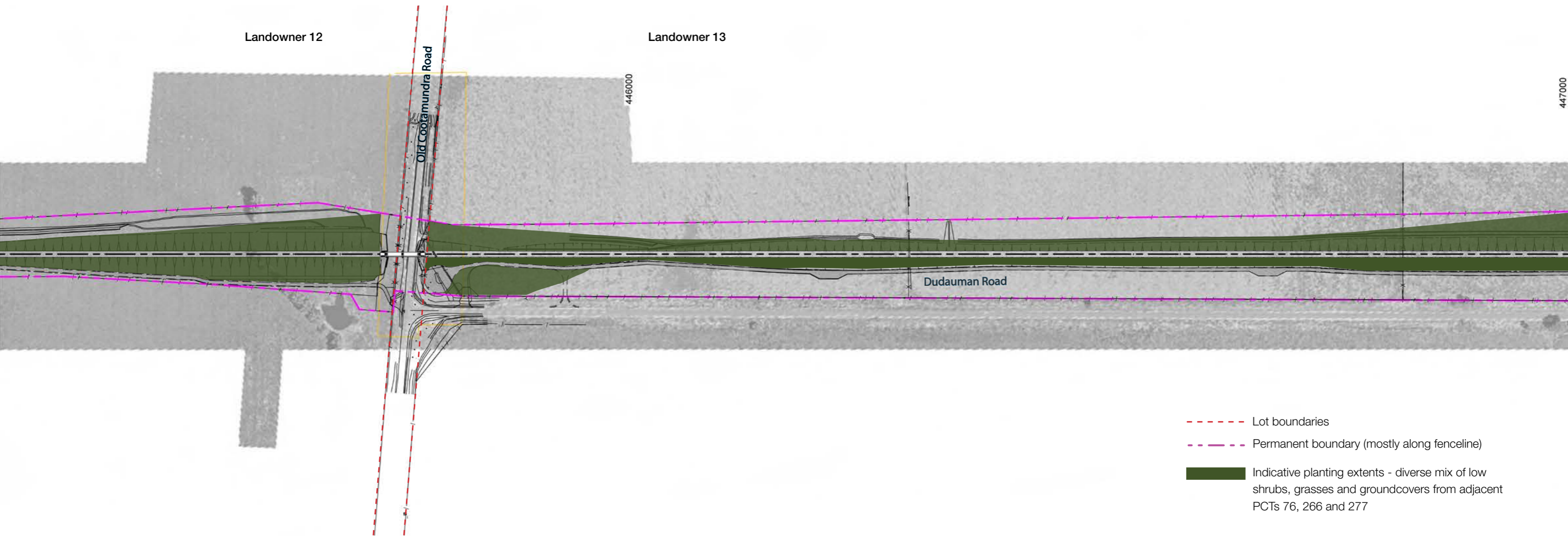
Austrostipa aristiglumis



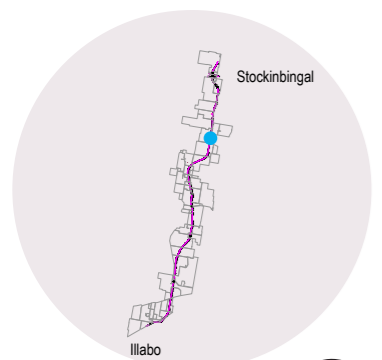
Leptorhynchus squamatus



Stackhousia monogyna



- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCTs 76, 266 and 277



Key Plan
1:4000 @ A3
Fig.35. Landscape plan (Sheet 19 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



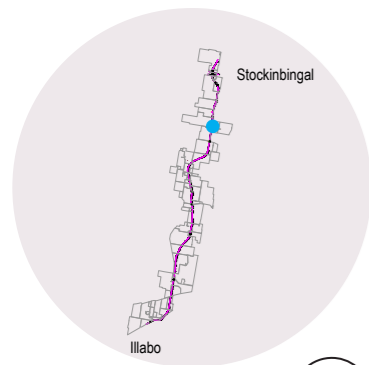
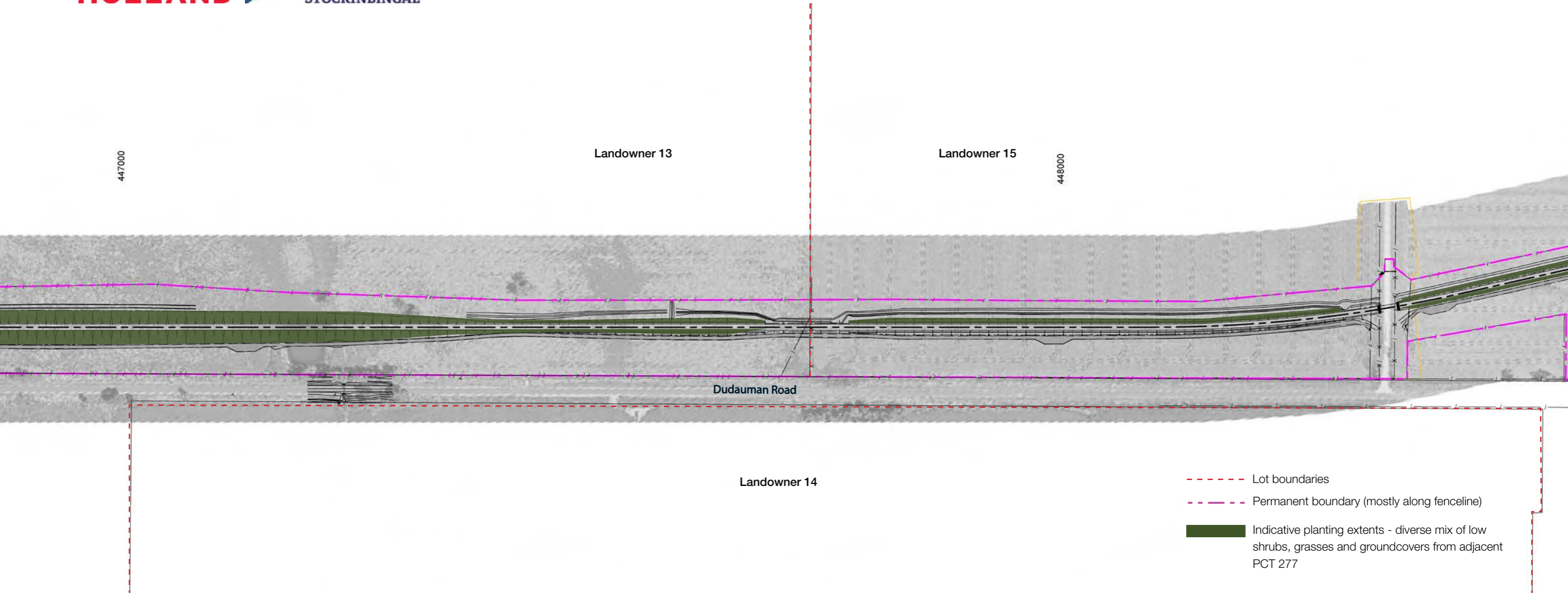
Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



Key Plan

1:4000 @ A3



Fig.36. Landscape plan (Sheet 20 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



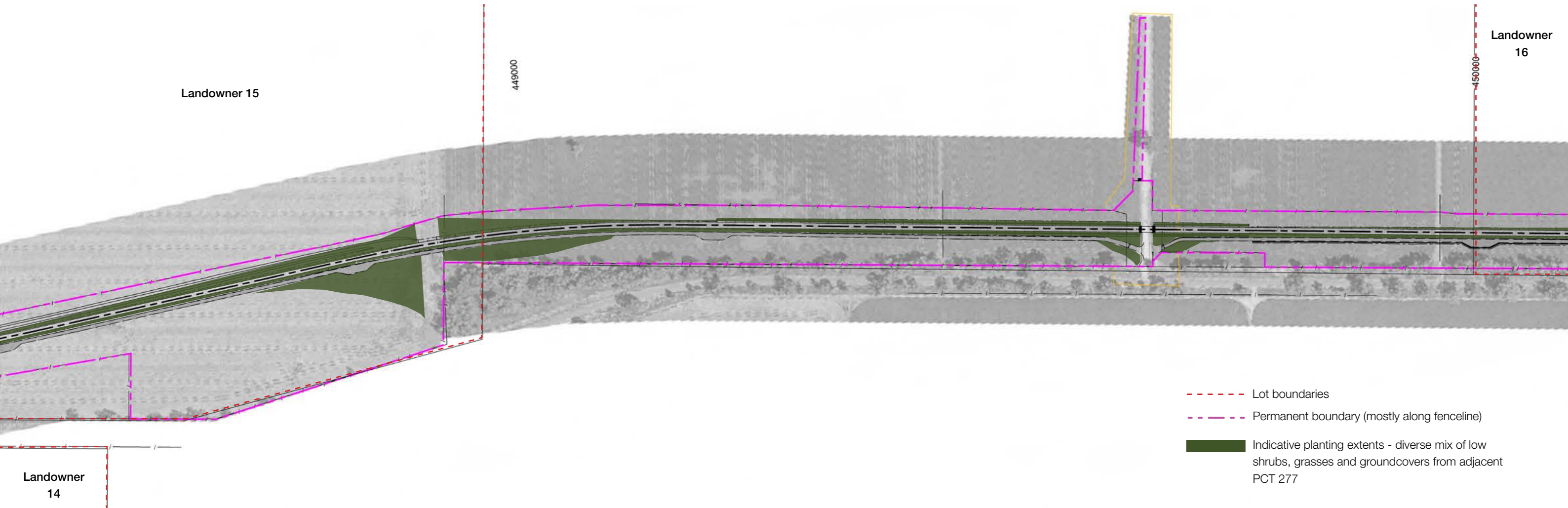
Austrostipa aristiglumis



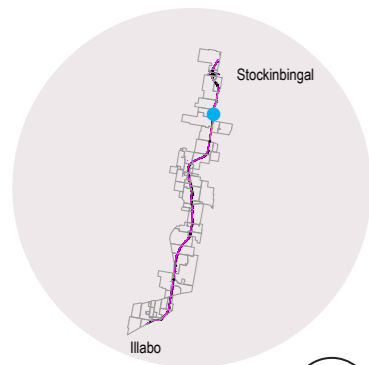
Leptorhynchus squamatus



Stackhousia monogyna



- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCT 277



Key Plan

1:4000 @ A3



Fig.37. Landscape plan (Sheet 21 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



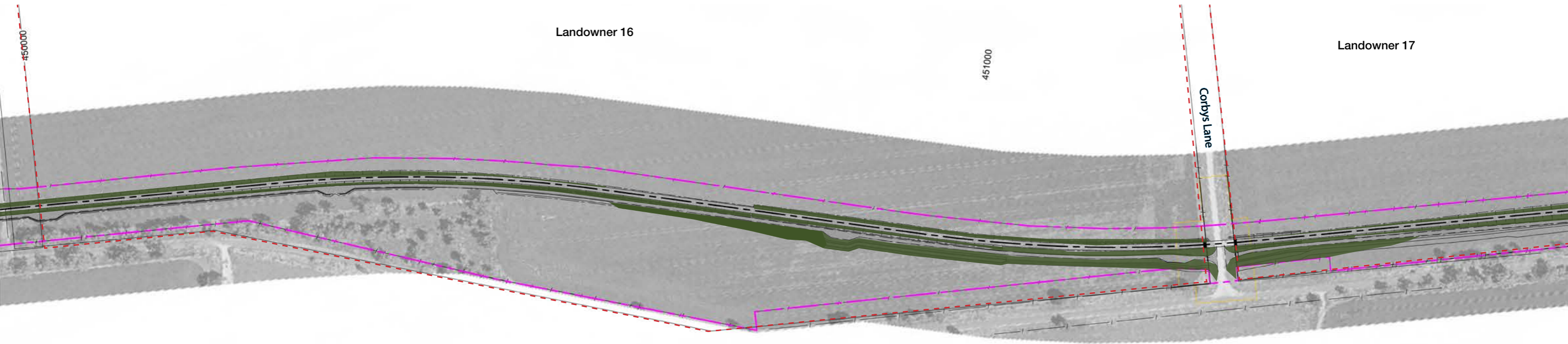
Austrostipa aristiglumis



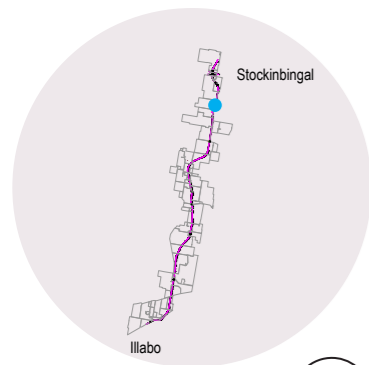
Leptorhynchus squamatus



Stackhousia monogyna



- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCTs 76 and 277



Key Plan

1:4000 @ A3



Fig.38. Landscape plan (Sheet 22 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



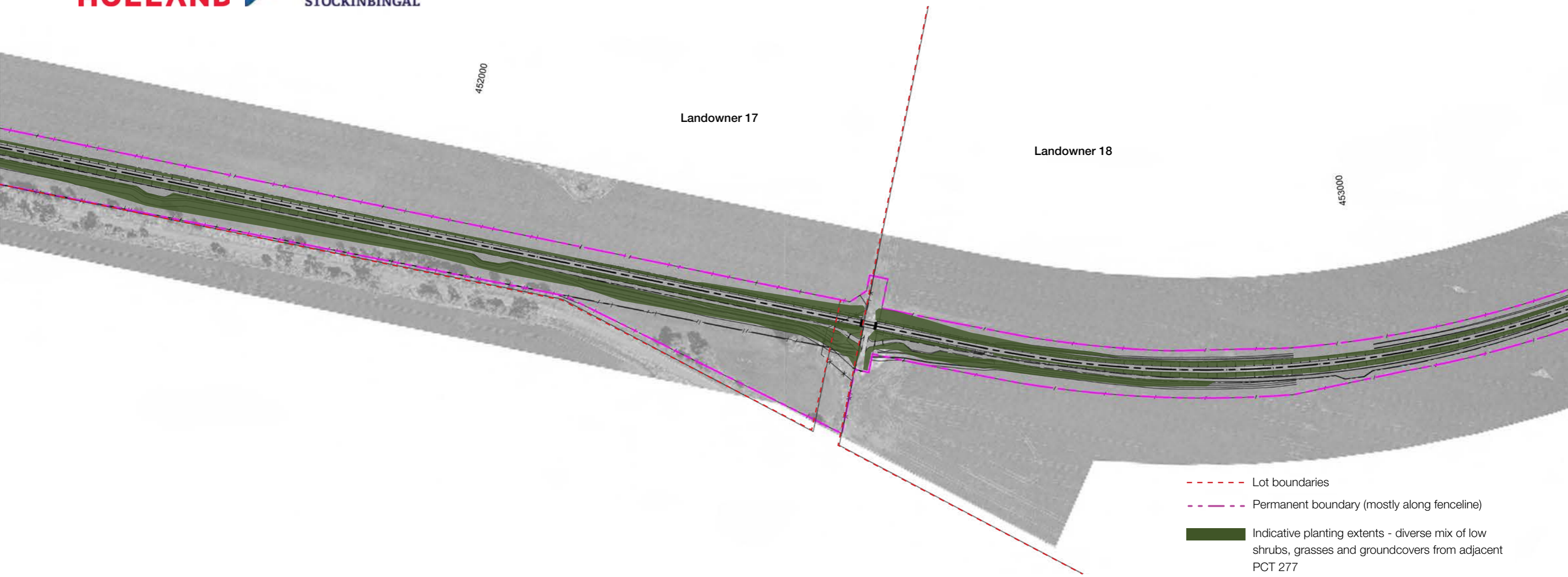
Austrostipa aristiglumis



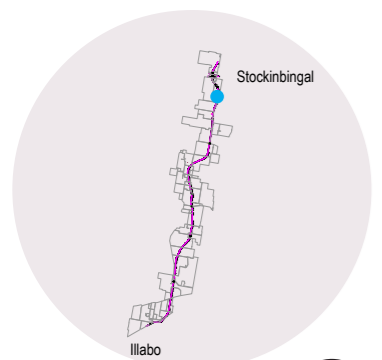
Leptorhynchus squamatus



Stackhousia monogyna



- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCT 277



Key Plan
1:4000 @ A3
Fig.39. Landscape plan (Sheet 23 of 26)



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



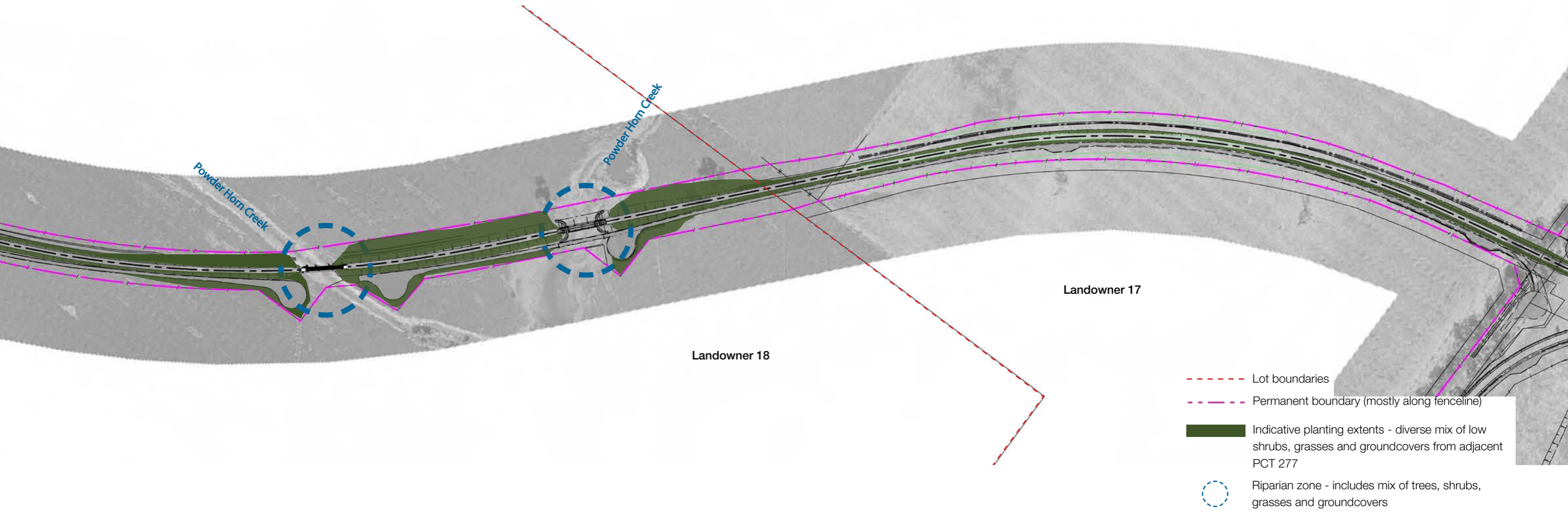
Austrostipa aristiglumis



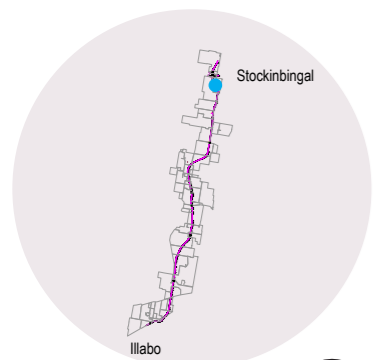
Leptorhynchos squamatus



Stackhousia monogyna



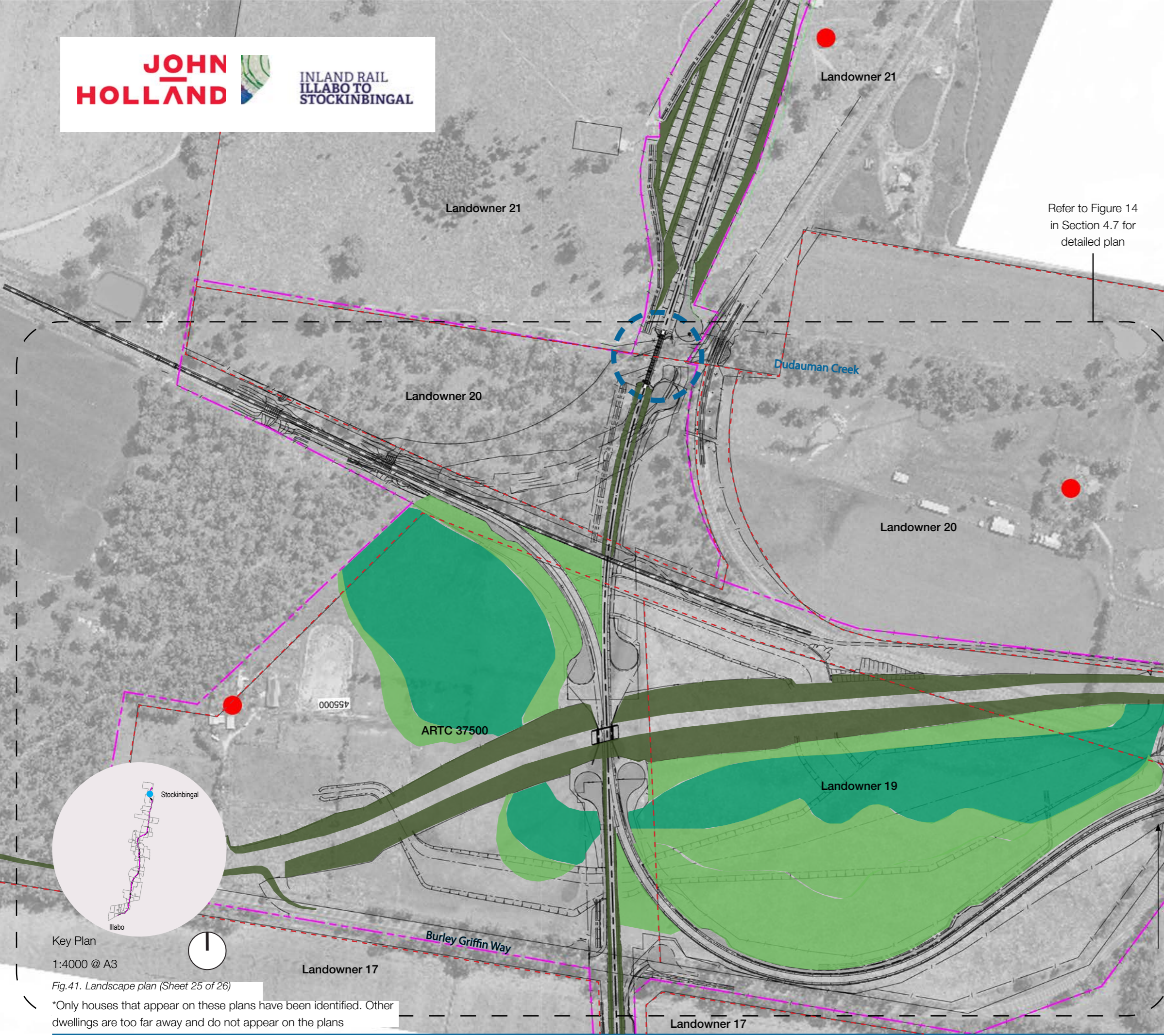
- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCT 277
- Riparian zone - includes mix of trees, shrubs, grasses and groundcovers



Key Plan
1:4000 @ A3
Fig.40. Landscape plan (Sheet 24 of 26)

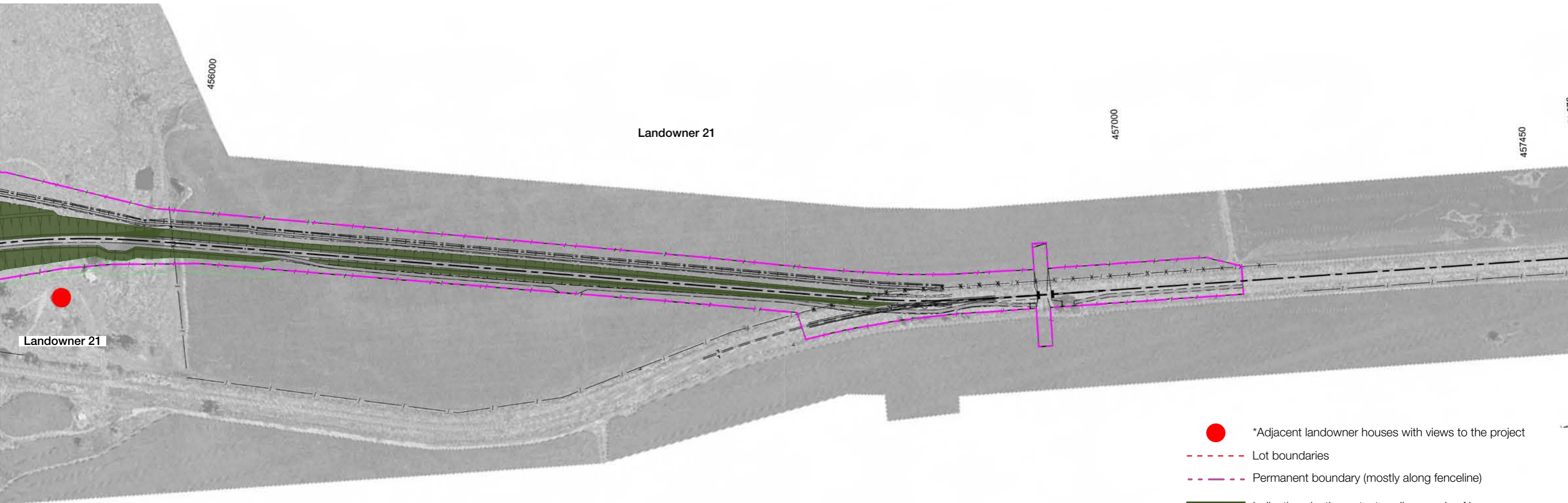


- *Adjacent landowner houses with views to the project
 - - - Permanent boundary (mostly along fenceline)
 - Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers
 - Indicative planting extents - Detention basins
 - Indicative planting extents - Junction Planting
 - Riparian zone - includes mix of trees, shrubs, grasses and groundcovers
 - - - Lot boundaries
- Refer to Figure 14 in Section 4.7 for detailed plan
- *Adjacent PCTs at this location include PCT 76, PCT 266 and PCT 277

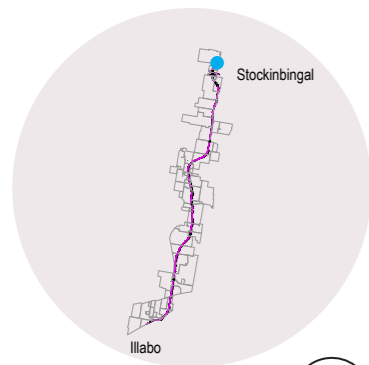


Key Plan
1:4000 @ A3
Fig.41. Landscape plan (Sheet 25 of 26)

*Only houses that appear on these plans have been identified. Other dwellings are too far away and do not appear on the plans



- *Adjacent landowner houses with views to the project
- - - Lot boundaries
- - - Permanent boundary (mostly along fenceline)
- Indicative planting extents - diverse mix of low shrubs, grasses and groundcovers from adjacent PCTs 76 and 266



Key Plan

1:4000 @ A3

Fig.42. Landscape plan (Sheet 26 of 26)

*Only houses that appear on these plans have been identified. Other dwellings are too far away and do not appear on the plans



Lomandra filiformis



Convolvulus erubescens



Bothriochloa macra



Austrostipa aristiglumis



Leptorhynchus squamatus



Stackhousia monogyna



Appendix B

Plant Schedules

PLANTING SCHEDULE - FOR FILL STRATEGY						
BOTANICAL NAME	COMMON NAME	MAXIMUM HGT+SPD AT 12 Years	PCT APPEARANCE	APPLICATION RATE OF SEED (KG PER HECTARE)	Total (KG) For 44.1Ha	
SMALL SHRUB / GRASSES						
<i>Aristida behriana</i>	Bunch wire grass	0.4 X 0.5m	76, 80, 266	0.4	17.64	
<i>Aristida ramosa</i>	Purple wiregrass	1.2 X 0.5m	79, 80, 266, 277, 347	0.4	17.64	
<i>Arthropodium strictum</i>	Chocolate lilies	1.2 X 1.2m	Community Consultation	0.3	13.23	
<i>Atriplex nummularia</i>	Old Man Saltbush	3 X 4m	Community Consultation	0.3	13.23	
<i>Austrodanthonia auriculata</i>	Lobed Wallaby-grass	0.5 X 0.5m	79, 266, 276, 277	0.4	17.64	
<i>Austrodanthonia caespitosa</i>	Common wallaby-grass	0.9 X 0.12m	76, 80, 266	0.4	17.64	
<i>Austrodanthonia fulva</i>	Wallaby grass	0.4 X 0.4m	79, 80	0.4	17.64	
<i>Austrodanthonia setacea</i>	Small-flowered wallaby-grass	0.6 X 0.6m	76, 80, 276, 277, 347	0.5	22.05	
<i>Austrostipa bigeniculata</i>	Kneed Spear-grass	1.2 X 0.5m	76, 79, 266, 276, 277	0.5	22.05	
<i>Brachyloma daphnoides subsp. daphnoides</i>	Daphne Heath	1.5 X 1.5m	309, 347	0.4	17.64	
<i>Calytrix tetragona</i>	Common Fringe Myrtle	2 X 1.5m	309	0.4	17.64	
<i>Chloris truncata</i>	Australian fingergrass	0.5 X 0.5m	76, 266, 276, 277	0.4	17.64	
<i>Dianella revoluta</i>	Flax lily	1 X 0.8m	Community Consultation	0.4	17.64	
<i>Dodonaea viscosa subsp. cuneata</i>	Wedge-leaved Hop Bush	4 X 2m	76, 80, 266	0.3	13.23	
<i>Elymus scaber var. scaber</i>	Common wheat grass	0.4 X 0.2m	76, 79, 80, 266, 276, 277, 309	0.5	22.05	
<i>Enteropogon acicularis</i>	Spider Grass	0.4 X 0.3m	80, 266, 277	0.4	17.64	
<i>Joycea pallida</i>	Red-anther wallaby grass	1 X 0.5m	309	0.3	13.23	
<i>Lepidosperma laterale</i>	Variable Sword-sedge	1.5 X 2m	309, 347	0.35	15.435	
<i>Maireana enchlyaenoides</i>	Wingless bluebush	0.2 X 0.6m	80	0.4	17.64	
<i>Maireana microphylla</i>	Cotton bush	1 X 1m	80, 276	0.35	15.435	
<i>Melichrus urceolatus</i>	Um heath	1.5 X 0.5m	309, 347	0.35	15.435	
<i>Microlaena stipoides</i>	Weeping grass	0.75 X 0.5m	79, 266, 309	0.4	17.64	
<i>Panicum effusum</i>	Hairy panic	0.7 X 0.5m	266, 277	0.35	15.435	
<i>Paspalidium constrictum</i>	Box grass	0.6 X 0.5m	76	0.35	15.435	
<i>Stypandra glauca</i>	Nodding Blue Lily	1 X 1m	309, 347	0.5	22.05	
<i>Themeda triandra</i>	Kangaroo grass	1.5 X 0.5m	Community Consultation	0.35	15.435	
<i>Vittadinia cuneata</i>	Purple Fuzzweed	0.4 X 0.5m	266, 276, 277	0.4	17.64	
GROUND COVER						
<i>Boerhavia diffusa</i>	Tarvine	0.1 X 0.5m	Community Consultation	0.6	26.46	
<i>Calotis cuneifolia</i>	Purple burr-daisy	0.6 X 0.6m	80	0.7	30.87	
<i>Carpobrotus glaucescens</i>	Native pigface	0.3 X 2m	Community Consultation	0.3	13.23	
<i>Convolvulus graminifolius</i>	Grassland Bindweed	0.5 X 0.5m	276, 277	0.6	26.46	
<i>Cymbonotus lawsonianus</i>	Bear's Ear	0.3 X 0.5m	266	0.6	26.46	
<i>Einadia nutans subsp. nutans</i>	Climbing Saltbush	0.3 X 1.2m	76, 79, 80	0.6	26.46	
<i>Goodenia pinnatifida</i>	Cut-leaf Goodenia	0.4 X 0.15m	80, 266, 276	0.6	26.46	
<i>Hardenbergia violacea</i>	Native sarsaparilla	2 X 1m	Community Consultation	0.6	26.46	
<i>Hibbertia obtusifolia</i>	Hoary guinea flower	0.8 X 2m	277, 309, 347	0.7	30.87	
<i>Microseris lanceolata</i>	Yam daisies	0.3 X 0.3m	Community Consultation	0.6	26.46	
<i>Oxalis perennans</i>	Native Oxalis	0.1 X 0.3m	76, 80, 266, 347	0.6	26.46	
<i>Sida corrugata</i>	Corrugated Sida	0.1 X 0.3m	76, 80, 276, 277	0.6	26.46	
<i>Sturtina muelleri</i>	Spoon-leaved Cudweed	0.1 X 0.3m	80	0.7	30.87	
<i>Stypandra glauca</i>	Nodding blue lily	1 X 0.5m	309, 347	0.5	22.05	
<i>Wahlenbergia gracilis</i>	Australian Bluebell	0.4 X 0.4m	76	0.6	26.46	
<i>Wurmbea dioica</i>	Early Nancy	0.3 X 0.3m	80, 266, 309, 347	0.6	26.46	
				TOTAL SEED WEIGHT	20	882

PLANTING SCHEDULE - FOR CUT STRATEGY / M3 EMBANKMENT						
BOTANICAL NAME	COMMON NAME	MAXIMUM HGT+SPD AT 12 Years	PCT APPEARANCE	APPLICATION RATE OF SEED (KG PER HECTARE)	Total (KG) For 31Ha	NOTE
SMALL SHRUB / GRASSES						
<i>Aristida behriana</i>	Bunch wire grass	0.4 X 0.5m	76, 80, 266	0.4	12.4	
<i>Aristida ramosa</i>	Purple wiregrass	1.2 X 0.5m	79, 80, 266, 277, 347	0.5	15.5	
<i>Arthropodium strictum</i>	Chocolate lilies	1.2 X 1.2m	Community Consultation	0.4	12.4	
<i>Austrodanthonia auriculata</i>	Lobed Wallaby-grass	0.5 X 0.5m	79, 266, 276, 277	0.5	15.5	
<i>Austrodanthonia caespitosa</i>	Common wallaby-grass	0.9 X 0.12m	76, 80, 266	0.5	15.5	
<i>Austrodanthonia fulva</i>	Wallaby grass	0.4 X 0.4m	79, 80	0.5	15.5	
<i>Austrodanthonia setacea</i>	Small-flowered wallaby-grass	0.6 X 0.6m	76, 80, 276, 277, 347	0.5	15.5	
<i>Austrostipa bigeniculata</i>	Kneed Spear-grass	1.2 X 0.5m	76, 79, 266, 276, 277	0.5	15.5	
<i>Calytrix tetragona</i>	Common Fringe Myrtle	2 X 1.5m	309	0.4	12.4	
<i>Chloris truncata</i>	Australian fingergrass	0.5 X 0.5m	76, 266, 276, 277	0.4	12.4	
<i>Dianella revoluta</i>	Flax lily	1 X 0.8m	Community Consultation	0.4	12.4	APPLY TO CUT EMBANKMENTS SOIL AND ROCK TYPE R5 ONLY
<i>Elymus scaber var. scaber</i>	Common wheat grass	0.4 X 0.2m	76, 79, 80, 266, 276, 277, 309	0.6	18.6	
<i>Enteropogon acicularis</i>	Spider Grass	0.4 X 0.3m	80, 266, 277	0.4	12.4	
<i>Joycea pallida</i>	Red-anther wallaby grass	1 X 0.5m	309	0.4	12.4	
<i>Lepidosperma laterale</i>	Variable Sword-sedge	1.5 X 2m	309, 347	0.4	12.4	
<i>Maireana enchlyaenoides</i>	Wingless bluebush	0.2 X 0.6m	80	0.4	12.4	
<i>Maireana microphylla</i>	Cotton bush	1 X 1m	80, 276	0.4	12.4	
<i>Melichrus urceolatus</i>	Um heath	1.5 X 0.5m	309, 347	0.4	12.4	
<i>Microlaena stipoides</i>	Weeping grass	0.75 X 0.5m	79, 266, 309	0.5	15.5	
<i>Panicum effusum</i>	Hairy panic	0.7 X 0.5m	266, 277	0.4	12.4	
<i>Paspalidium constrictum</i>	Box grass	0.6 X 0.5m	76	0.4	12.4	
<i>Stypandra glauca</i>	Nodding Blue Lily	1 X 1m	309, 347	0.4	12.4	
<i>Themeda triandra</i>	Kangaroo grass	1.5 X 0.5m	Community Consultation	0.4	12.4	
<i>Vittadinia cuneata</i>	Purple Fuzzweed	0.4 X 0.5m	266, 276, 277	0.5	15.5	
GROUND COVER						
<i>Boerhavia diffusa</i>	Tarvine	0.1 X 0.5m	Community Consultation	0.5	15.5	
<i>Calotis cuneifolia</i>	Purple burr-daisy	0.6 X 0.6m	80	0.6	18.6	
<i>Carpobrotus glaucescens</i>	Native pigface	0.3 X 2m	Community Consultation	0.3	9.3	
<i>Convolvulus graminifolius</i>	Grassland Bindweed	0.5 X 0.5m	276, 277	0.6	18.6	
<i>Cymbonotus lawsonianus</i>	Bear's Ear	0.3 X 0.5m	266	0.6	18.6	
<i>Einadia nutans subsp. nutans</i>	Climbing Saltbush	0.3 X 1.2m	76, 79, 80	0.5	15.5	
<i>Goodenia pinnatifida</i>	Cut-leaf Goodenia	0.4 X 0.15m	80, 266, 276	0.7	21.7	
<i>Hardenbergia violacea</i>	Native sarsaparilla	2 X 1m	Community Consultation	0.6	18.6	
<i>Hibbertia obtusifolia</i>	Hoary guinea flower	0.8 X 2m	277, 309, 347	0.6	18.6	
<i>Microseris lanceolata</i>	Yam daisies	0.3 X 0.3m	Community Consultation	0.6	18.6	
<i>Oxalis perennans</i>	Native Oxalis	0.1 X 0.3m	76, 80, 266, 347	0.7	21.7	
<i>Sida corrugata</i>	Corrugated Sida	0.1 X 0.3m	76, 80, 276, 277	0.7	21.7	
<i>Sturtina muelleri</i>	Spoon-leaved Cudweed	0.1 X 0.3m	80	0.5	15.5	
<i>Stypandra glauca</i>	Nodding blue lily	1 X 0.5m	309, 347	0.7	21.7	
<i>Wahlenbergia gracilis</i>	Australian Bluebell	0.4 X 0.4m	76	0.5	15.5	
<i>Wurmbea dioica</i>	Early Nancy	0.3 X 0.3m	80, 266, 309, 347	0.7	21.7	
				TOTAL SEED WEIGHT	20	620

PLANTING SCHEDULE - FOR GRASS LINED DRAIN / DETENTION BASIN						
BOTANICAL NAME	COMMON NAME	MAXIMUM HGT+SPD AT 12 Years	PCT APPEARANCE	APPLICATION RATE OF SEED (KG PER HECTARE)	Total (KG) For 18.8Ha	
SMALL SHRUB / GRASSES						
<i>Austrodanthonia auriculata</i>	Lobed Wallaby-grass	0.5 X 0.5m	79, 266, 276, 277	0.9	16.92	
<i>Austrodanthonia fulva</i>	Wallaby grass	0.4 X 0.4m	79, 80	0.8	15.04	
<i>Austrodanthonia racemosa</i>	Slender Wallaby-grass	0.6 X 0.2m	79, 309, 347	0.8	15.04	
<i>Carex appressa</i>	Tall Sedge	0.8 X 1m	79	0.8	15.04	
<i>Carex inversa</i>	Knob sedge	0.75 X 1m	76, 79, 80, 276, 277	0.9	16.92	
<i>Cyperus eragrostis</i>	Umbrella Sedge	0.9 X 0.5m	79	0.8	15.04	
<i>Eleocharis acuta</i>	Common Spike-rush	0.7 X 0.1m	79	0.8	15.04	
<i>Eleocharis pusilla</i>	Small Spike-rush	0.15 X 0.15m	79	0.8	15.04	
<i>Elymus scaber var. scaber</i>	Common wheat grass	0.4 X 0.2m	76, 79, 80, 266, 276, 277, 309	1	18.8	
<i>Euchiton involucreatus</i>	Common cudweed	0.5 X 0.5m	79	0.8	15.04	
<i>Lythrum hysopifolia</i>	Hysop Loosestrife	0.5 X 0.5m	79	0.8	15.04	
<i>Microlaena stipoides var. stipoides</i>	Weeping Grass	0.2 X 0.1m	79, 309	0.8	15.04	
<i>Rumex brownii</i>	Swamp Dock	0.8 X 0.5m	79, 80, 266, 276	0.8	15.04	
<i>Wahlenbergia stricta subsp. stricta</i>	Tall Bluebell	0.9 X 0.4m	79, 347	0.8	15.04	
GROUND COVER						
<i>Acaena echinata</i>	Sheep's burr	0.4 X 0.5m	79	1.4	26.32	
<i>Arthropodium minus</i>	Small vanilla lily	0.3 X 0.2m	79, 80	1.4	26.32	
<i>Gratiola peruviana</i>	Austral Brooklime	0.3 X 0.5m	79	1.4	26.32	
<i>Hypericum gramineum</i>	Small St. John's Wort	0.4 X 0.2m	79, 266, 347	1.4	26.32	
<i>Pratia pedunculata</i>	Trailing Pratia	0.1 X 1.5m	79	1.4	26.32	
<i>Scutellaria humilis</i>	Dwarf Skullcap	0.3 X 0.6m	79, 266	1.4	26.32	
				TOTAL SEED WEIGHT	20	376

PLANTING SCHEDULE - JUNCTION PLANTING TYPE A						
BOTANICAL NAME	COMMON NAME	MAXIMUM HGT+SPD AT 12 Years	PCT APPEARANCE	APPLICATION RATE OF SEED (KG PER HECTARE)	Total (KG) For 5.1Ha	QTY
SMALL TREE / LARGE SHRUB						
<i>Hibbertia obtusifolia</i>	Hoary Guinea Flower	0.6 X 1.5m	277, 309, 347	Individual as shown on plans		4
<i>Atriplex nummularia</i>	Old Man Saltbush	3 X 4m	Community Consultation	Individual as shown on plans		4
<i>Hibiscus heterophyllus</i>	Native hibiscus	6 X 2m	Community Consultation	Individual as shown on plans		3
SMALL SHRUB / GRASSES						
<i>Aristida ramosa</i>	Purple wiregrass	1.2 X 0.5m	79, 80, 266, 277, 347	0.8		4.08
<i>Anthropodium strictum</i>	Chocolate lilies	1.2 X 1.2m	Community Consultation	0.8		4.08
<i>Austrodanthonia auriculata</i>	Lobed Wallaby-grass	0.5 X 0.5m	79, 266, 276, 277	0.8		4.08
<i>Austrodanthonia setacea</i>	Small-flowered wallaby-grass	0.6 X 0.6m	76, 80, 276, 277, 347	1.6		8.16
<i>Austrostipa bigeniculata</i>	Knead Spear-grass	1.2 X 0.5m	76, 79, 266, 276, 277	1.6		8.16
<i>Chloris truncata</i>	Australian fingergrass	0.5 X 0.5m	76, 266, 276, 277	1.4		7.14
<i>Dianella revoluta</i>	Flax lily	1 X 0.8m	Community Consultation	0.8		4.08
<i>Elymus scaber var. scaber</i>	Common wheat grass	0.4 X 0.2m	76, 79, 80, 266, 276, 277, 309	0.9		4.59
<i>Enteropogon acicularis</i>	Spider Grass	0.4 X 0.3m	80, 266, 277	1		5.1
<i>Panicum effusum</i>	Hairy panic	0.7 X 0.5m	266, 277	0.8		4.08
<i>Themeda triandra</i>	Kangaroo grass	1.5 X 0.5m	Community Consultation	1.7		8.67
<i>Vittadinia cuneata</i>	Purple Fuzzweed	0.4 X 0.5m	266, 276, 277	0.8		4.08
GROUNDCOVER						
<i>Boerhavia diffusa</i>	Tarvine	0.1 X 0.5m	Community Consultation	1		5.1
<i>Carpobrotus glaucescens</i>	Native pigface	0.3 X 2m	Community Consultation	0.5		2.55
<i>Convolvulus graminetinus</i>	Grassland Bindweed	0.5 X 0.5m	276, 277	1		5.1
<i>Hardenbergia violacea</i>	Native sarsaparilla	2 X 1m	Community Consultation	1		5.1
<i>Hibbertia obtusifolia</i>	Hoary guinea flower	0.8 X 2m	277, 309, 347	1		5.1
<i>Microseris lanceolata</i>	Yam daisies	0.3 X 0.3m	Community Consultation	1		5.1
<i>Sida corrugata</i>	Corrugated Sida	0.1 X 0.3m	76, 80, 276, 277	1.5		7.65
			TOTAL SEED WEIGHT	20		102

PLANTING SCHEDULE - JUNCTION PLANTING TYPE B						
BOTANICAL NAME	COMMON NAME	MAXIMUM HGT+SPD AT 12 Years	PCT APPEARANCE	APPLICATION RATE OF SEED (KG PER HECTARE)	Total (KG) For 3.6Ha	QTY
TALL TREE						
<i>Allocasuarina luehmannii</i>	Bull-oak	15 X 10m	76, 80	Individual as shown on plans		3
<i>Callitris glaucophylla</i>	White cypress pine	20 X 4m	76, 80, 277	Individual as shown on plans		3
SMALL TREE / LARGE SHRUB						
<i>Atriplex nummularia</i>	Old Man Saltbush	3 X 4m	Community Consultation	Individual as shown on plans		8
<i>Bursaria spinosa subsp. spinosa</i>	Christmas Bush	5 X 4m	76, 266	Individual as shown on plans		8
<i>Dodonaea viscosa subsp. Cuneata</i>	Wedge-leaved Hop Bush	4 X 2m	76, 80, 266	Individual as shown on plans		8
<i>Hibiscus heterophyllus</i>	Native hibiscus	6 X 2m	Community Consultation	Individual as shown on plans		8
SMALL SHRUB / GRASSES						
<i>Aristida behriana</i>	Bunch wire grass	0.4 X 0.5m	76, 80, 266	0.8		2.88
<i>Anthropodium strictum</i>	Chocolate lilies	1.2 X 1.2m	Community Consultation	0.6		2.16
<i>Austrodanthonia caespitosa</i>	Common wallaby-grass	0.9 X 0.12m	76, 80, 266	1		3.6
<i>Austrodanthonia setacea</i>	Small-flowered wallaby-grass	0.6 X 0.6m	76, 80, 276, 277, 347	1.2		4.32
<i>Austrostipa bigeniculata</i>	Knead Spear-grass	1.2 X 0.5m	76, 79, 266, 276, 277	1.2		4.32
<i>Chloris truncata</i>	Australian fingergrass	0.5 X 0.5m	76, 266, 276, 277	1.2		4.32
<i>Dianella revoluta</i>	Flax lily	1 X 0.8m	Community Consultation	1.2		4.32
<i>Elymus scaber var. scaber</i>	Common wheat grass	0.4 X 0.2m	76, 79, 80, 266, 276, 277, 309	1.6		5.76
<i>Paspalidium constrictum</i>	Box grass	0.6 X 0.5m	76	0.8		2.88
<i>Themeda triandra</i>	Kangaroo grass	1.5 X 0.5m	Community Consultation	2		7.2
GROUNDCOVER						
<i>Boerhavia diffusa</i>	Tarvine	0.1 X 0.5m	Community Consultation	1		3.6
<i>Carpobrotus glaucescens</i>	Native pigface	0.3 X 2m	Community Consultation	0.5		1.8
<i>Einadia nutans subsp. nutans</i>	Climbing Saltbush	0.3 X 1.2m	76, 79, 80	1		3.6
<i>Hardenbergia violacea</i>	Native sarsaparilla	2 X 1m	Community Consultation	1		3.6
<i>Microseris lanceolata</i>	Yam daisies	0.3 X 0.3m	Community Consultation	1		3.6
<i>Oxalis perennans</i>	Native Oxalis	0.1 X 0.3m	76, 80, 266, 347	1		3.6
<i>Sida corrugata</i>	Corrugated Sida	0.1 X 0.3m	76, 80, 276, 277	1.9		6.84
<i>Wahlenbergia gracilis</i>	Australian Bluebell	0.4 X 0.4m	76	1		3.6
			TOTAL SEED WEIGHT	20		72

NOTES:

1. THE PLANTING SPECIES ARE REPRESENTATIVE OF THE SPECIES WITHIN ADJACENT PCTS.
2. SEED AVAILABILITY IS SUBJECT TO SEASONAL CONDITIONS.

PLANTING SCHEDULE - TREE / LARGE SHRUB FOR RIPARIAN CORRIDORS					
BOTANICAL NAME	COMMON NAME	MAXIMUM HGT+SPD AT 12 Years	PCT APPEARANCE	APPLICATION OF SEED	
TALL TREE					
<i>Callitris glaucophylla</i>	White cypress pine	20 X 4m	76, 80, 277	Individual as shown on plans	
SMALL TREE / LARGE SHRUB					
<i>Atriplex nummularia</i>	Old Man Saltbush	3 X 4m	Community Consultation	Individual as shown on plans	
<i>Brachyloma daphnoides subsp. daphnoides</i>	Daphne Heath	1.5 X 1.5m	309, 347	Individual as shown on plans	
<i>Dodonaea viscosa subsp. cuneata</i>	Wedge-leaved Hop Bush	4 X 2m	76, 80, 266	Individual as shown on plans	
<i>Hibiscus heterophyllus</i>	Native hibiscus	6 X 2m	Community Consultation	Individual as shown on plans	
<i>Kunzea ericoides</i>	White tea-tree	8 X 4m	79, 309	Individual as shown on plans	

PLANTING SCHEDULE - FOR LEVEL CROSSING SIGHT LINE AREA					
BOTANICAL NAME	COMMON NAME	MAXIMUM HGT+SPD AT 12 Years	PCT APPEARANCE	APPLICATION RATE OF SEED (KG PER HECTARE)	
SMALL SHRUB / GRASSES					
<i>Aristida behriana</i>	Bunch wire grass	0.4 X 0.5m	76, 80, 266	0.8	
<i>Austrodanthonia auriculata</i>	Lobed Wallaby-grass	0.5 X 0.5m	79, 266, 276, 277	0.8	
<i>Austrodanthonia fulva</i>	Wallaby grass	0.4 X 0.4m	79, 80	0.8	
<i>Chloris truncata</i>	Australian fingergrass	0.5 X 0.5m	76, 266, 276, 277	0.9	
<i>Elymus scaber var. scaber</i>	Common wheat grass	0.4 X 0.2m	76, 79, 80, 266, 276, 277, 309	1	
<i>Enteropogon acicularis</i>	Spider Grass	0.4 X 0.3m	80, 266, 277	0.8	
<i>Maireana enchylaenoides</i>	Wingless bluebush	0.2 X 0.6m	80	0.8	
<i>Paspalidium constrictum</i>	Box grass	0.6 X 0.5m	76	0.8	
<i>Vittadinia cuneata</i>	Purple Fuzzweed	0.4 X 0.5m	266, 276, 277	0.9	
GROUNDCOVER					
<i>Boerhavia diffusa</i>	Tarvine	0.1 X 0.5m	Community Consultation	0.5	
<i>Calotis cuneifolia</i>	Purple burr-daisy	0.6 X 0.6m	80	0.9	
<i>Carpobrotus glaucescens</i>	Native pigface	0.3 X 2m	Community Consultation	0.5	
<i>Convolvulus graminetinus</i>	Grassland Bindweed	0.5 X 0.5m	276, 277	1	
<i>Cymbonotus lawsonianus</i>	Bear's Ear	0.3 X 0.3m	266	1	
<i>Einadia nutans subsp. nutans</i>	Climbing Saltbush	0.3 X 1.2m	76, 79, 80	1	
<i>Goodenia pinnatifida</i>	Cut-leaf Goodenia	0.4 X 0.15m	80, 266, 276	1.2	
<i>Microseris lanceolata</i>	Yam daisies	0.3 X 0.3m	Community Consultation	0.9	
<i>Oxalis perennans</i>	Native Oxalis	0.1 X 0.3m	76, 80, 266, 347	1.2	
<i>Sida corrugata</i>	Corrugated Sida	0.1 X 0.3m	76, 80, 276, 277	1.3	
<i>Sturtia muelleri</i>	Spoon-leaved Cudweed	0.1 X 0.3m	80	0.8	
<i>Wahlenbergia gracilis</i>	Australian Bluebell	0.4 X 0.4m	76	0.8	
<i>Wumbea dioica</i>	Early Nancy	0.3 X 0.3m	80, 266, 309, 347	1.3	

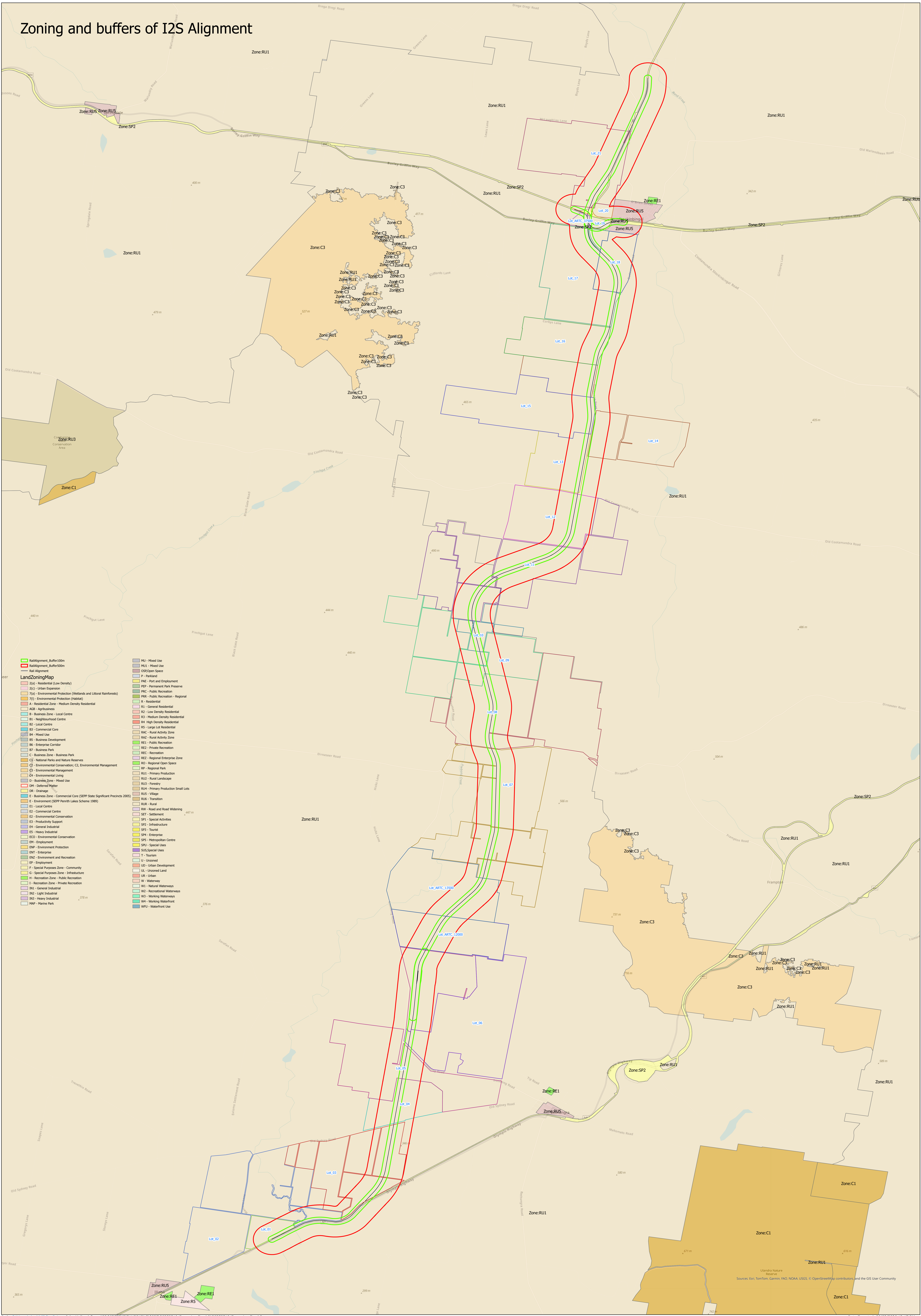
Note: Seed for level crossing sight line area will be shared with fill strategy, cut strategy, and grass-lined drains



Appendix C

Land Zoning Plan

Zoning and buffers of I2S Alignment



- LandZoningMap**
- 2(a) - Residential (Low Density)
 - 2(c) - Urban Expansion
 - 7(a) - Environmental Protection (Wetlands and Littoral Rainforests)
 - 7(b) - Environmental Protection (Habitat)
 - A - Residential Zone - Medium Density Residential
 - HSP - Highways
 - B - Business Zone - Local Centre
 - B1 - Neighbourhood Centre
 - B2 - Local Centre
 - B3 - Commercial Core
 - B4 - Mixed Use
 - B5 - Business Development
 - B6 - Enterprise Corridor
 - B7 - Business Park
 - C - Business Zone - Business Park
 - C1 - National Parks and Nature Reserves
 - C2 - Environmental Conservation; C2 - Environmental Management
 - C3 - Environmental Management
 - E4 - Environmental Living
 - D - Business Zone - Mixed Use
 - DH - Deferred Matter
 - DR - Drainage
 - E - Business Zone - Commercial Core (SEPP State Significant Precincts 2005)
 - E - Environment (SEPP Ninth Lakes Scheme 1989)
 - E1 - Local Centre
 - E2 - Commercial Centre
 - E3 - Environmental Conservation
 - E3 - Productivity Support
 - E4 - General Industrial
 - E5 - Heavy Industrial
 - E5D - Environmental Conservation
 - EM - Employment
 - EMP - Environmental Protection
 - DNT - Enterprise
 - BNZ - Environment and Recreation
 - EP - Employment
 - F - Special Purposes Zone - Community
 - G - Special Purposes Zone - Infrastructure
 - H - Recreation Zone - Public Recreation
 - I - Recreation Zone - Private Recreation
 - IM1 - General Industrial
 - IM2 - Light Industrial
 - IM3 - Heavy Industrial
 - MAP - Marine Park
 - MU - Mixed Use
 - RU1 - Mixed Use
 - OSP/Open Space
 - P - Parkland
 - PAE - Port and Employment
 - RP - Remotest Park Preserve
 - PRC - Public Recreation
 - PRR - Public Recreation - Regional
 - R - Residential
 - R1 - General Residential
 - R2 - Low Density Residential
 - R3 - Medium Density Residential
 - R4 - High Density Residential
 - R5 - Large Lot Residential
 - RAC - Rural Activity Zone
 - RAZ - Rural Activity Zone
 - RE1 - Public Recreation
 - RE2 - Private Recreation
 - REC - Recreation
 - REZ - Regional Enterprise Zone
 - RO - Regional Open Space
 - RP - Regional Park
 - RU1 - Primary Production
 - RU2 - Rural Landscape
 - RU3 - Forestry
 - RU4 - Primary Production Small Lots
 - RUS - Village
 - RUS - Transition
 - RUR - Rural
 - RW - Road and Road Widening
 - SET - Settlement
 - SP1 - Special Activities
 - SP2 - Infrastructure
 - SP3 - Tourist
 - SM - Enterprise
 - SPS - Metropolitan Centre
 - SPJ - Special Uses
 - SUS - Special Uses
 - T - Tourism
 - U - Unzoned
 - UD - Urban Development
 - UL - Unzoned Land
 - UR - Urban
 - W - Waterway
 - W1 - Natural Waterways
 - W2 - Recreational Waterways
 - W3 - Working Waterways
 - W4 - Working Waterfront
 - WPU - Waterfront Use

Ulandra Nature Reserve
Sources: Esri, TomTom, Garmin, FAO, NOAA, USGS, © OpenStreetMap contributors and the GIS User Community



INLAND RAIL
ILLABO TO
STOCKINBINGAL

