SUBMISSION TO COUNCIL IN RESPONSE TO PROPOSED DEVELOPMENT DA23/0598 FOR A LIVESTOCK PROCESSING INDUSTRY AT OURA STATION 2052 OURA ROAD, OURA

Jointly Prepared by:

TUDOR PLANNING AND DESIGN

and

OURA RIVERINE PROTECTION INC.

FEBRUARY 2024

OURA RIVERINE PROTECTION INC.

MISSION STATEMENT

To protect the natural and rural environment for the community of Oura, for the benefit of the region and future generations

Tom Kelsall
President

Oura Riverine Protection Inc.
E: ourariverineprotection@gmail.com

Signed:

Date:

29 February 2024

Michael Gheorghiu
B.Eng Civil & Building / Master Urban & Regional Planning / Master Urban Development & Design

TUDOR PLANNING AND DESIGN
PO Box 357, Bondi Junction, NSW 1355
E: michael@tudorpd.com

Signed:

Date:

29 February 2024

CONTENTS

TABLES AND FIGURES

1 Introduction

The Oura Riverine Protection Inc. (ORP) and Tudor Planning and Design (TudorPD) have jointly prepared this submission. The Oura Riverine Protection Inc. (ORP) consists of a broad member base of Oura residents and local land owners (some of who's families have been in the area for 98 years), as well as members of the Wagga Wagga and regional community. We have an intimate knowledge of the region and the natural environmental processes of the locality and subject site of the proposal.

The proposal, located at Oura Station, 2052 Oura Road, Oura (**Site**), as described by the Applicant Eringoarrah Pty Ltd, seeks consent for a livestock processing industry facility (abattoir) to process approximately 1,903 tonnes per year live weight of stock. The proposal also includes a photovoltaic system comprising a 1,300kW solar collector, a 1,500kWh battery system and an 500kVA back-up generator.

We are deeply concerned with the proposal. While the proposal's supporting environmental impact statement (**EIS**) concludes that the proposal would not have any adverse environmental impacts, it is evident to the ORP that the EIS is deficient in critical environmental information/assessment, and it has not satisfactorily assessed the cumulative impacts of the proposal. We are of the view that the proposal would have significant adverse environmental impacts, especially in context of its proximity to the Murrumbidgee River and therefore we object to the proposal.

We bring forward these concerns to you in order to highlight the seriousness of these environmental impacts. The key concerns include:

1. The proposal does not meet NSW State Government and Wagga Wagga Council strategic planning environmental priorities and objectives;
2. The proposal is out of character of the emerging tourism economy of the Oura locality and region between Wagga Wagga and Gundagai;
3. The proposal does not achieve the claimed economic and sustainable outcomes, as the assessment has not properly assessed the economic and sustainable impacts and merits of the proposal; and
4. The proposal generates significant adverse environmental impacts, including, water quality impacts, overland flow and flooding, cross contamination from the facility to dam and surface water in flooding events, surface water quality, soil quality, potential risk to threatened species, potential bushfire risk and management, impacts from effluent storage, irrigation and management, traffic impacts and odour impacts that have not been fully qualified. These issues are assessed in detail in this submission.

The proposal does not meet key objectives of the *Environmental Planning and Assessment Act 1979*, as it generates unacceptable environmental impacts. Therefore, the proposal does not satisfy the matters for consideration as listed under Section 4.15 of the *Environmental Planning and Assessment Act 1979*, hence the proposal is not within the public interest and is not suitable for the site. Therefore, the proposed development should be refused.

2 The Site

The proposal is located at Oura Station, 2052 Oura Road, Oura (Site). Figures 1 and 2 are extracts from the Applicant's EIS that show the location of the site.

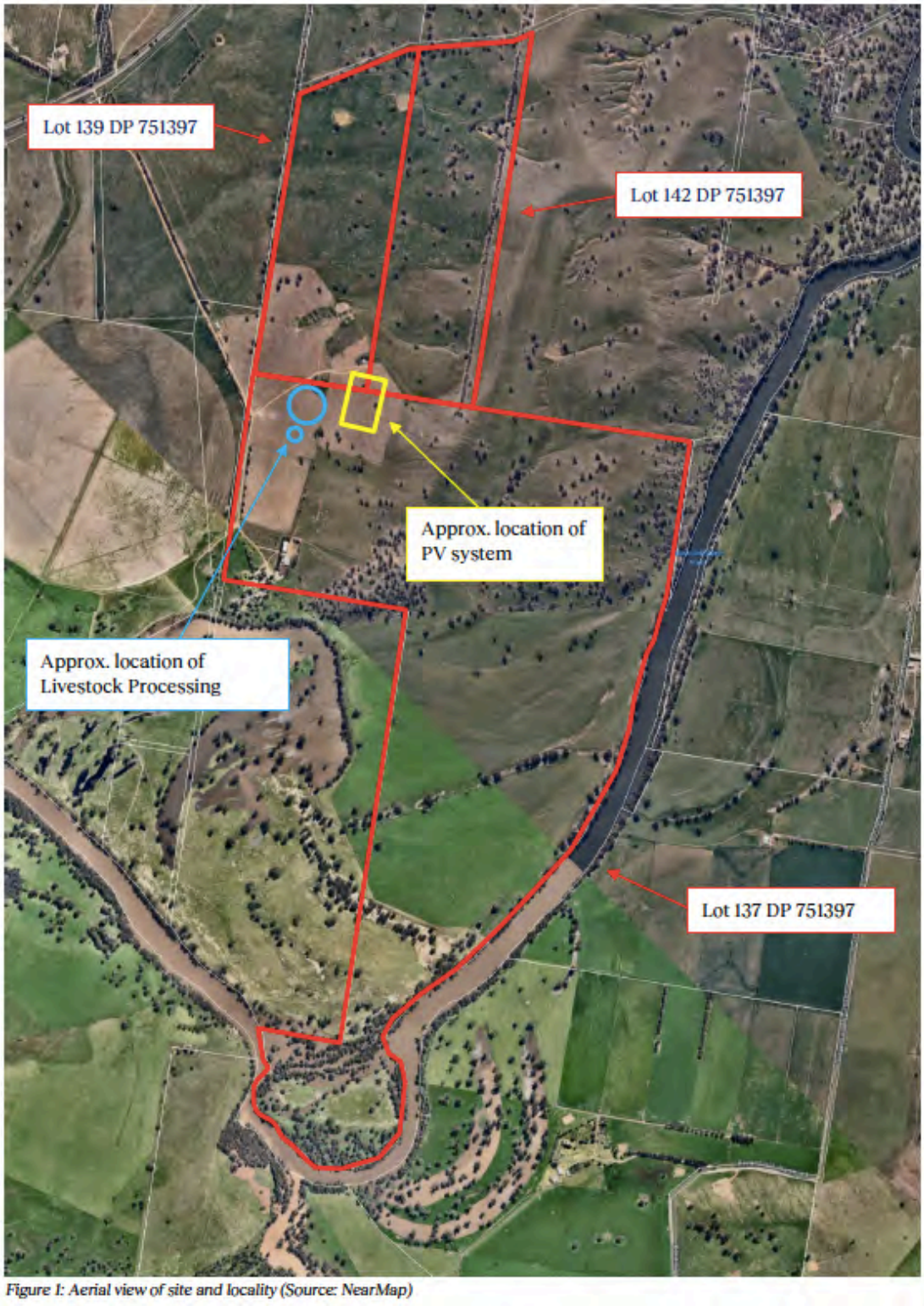


Figure 1: Aerial view of site and locality (Source: NearMap)

Figure 1. Subject site *(note: map extracted from proposed development EIS)*

Figure 2. Location of site with respect to the Wagga Wagga City Centre *(note: map extracted from proposed development EIS)*

3 The Proposal

The Applicant Eringoarrah Pty Ltd, seeks consent for a livestock processing industry facility (abattoir) to process approximately 1,903 tonnes per year live weight of stock. The proposal also includes a photovoltaic system comprising a 1,300kW solar collector, a 1,500kWh battery system and an 500kVA back-up generator.

Refer to Figures 3 and 4 for the general plans for the proposal.

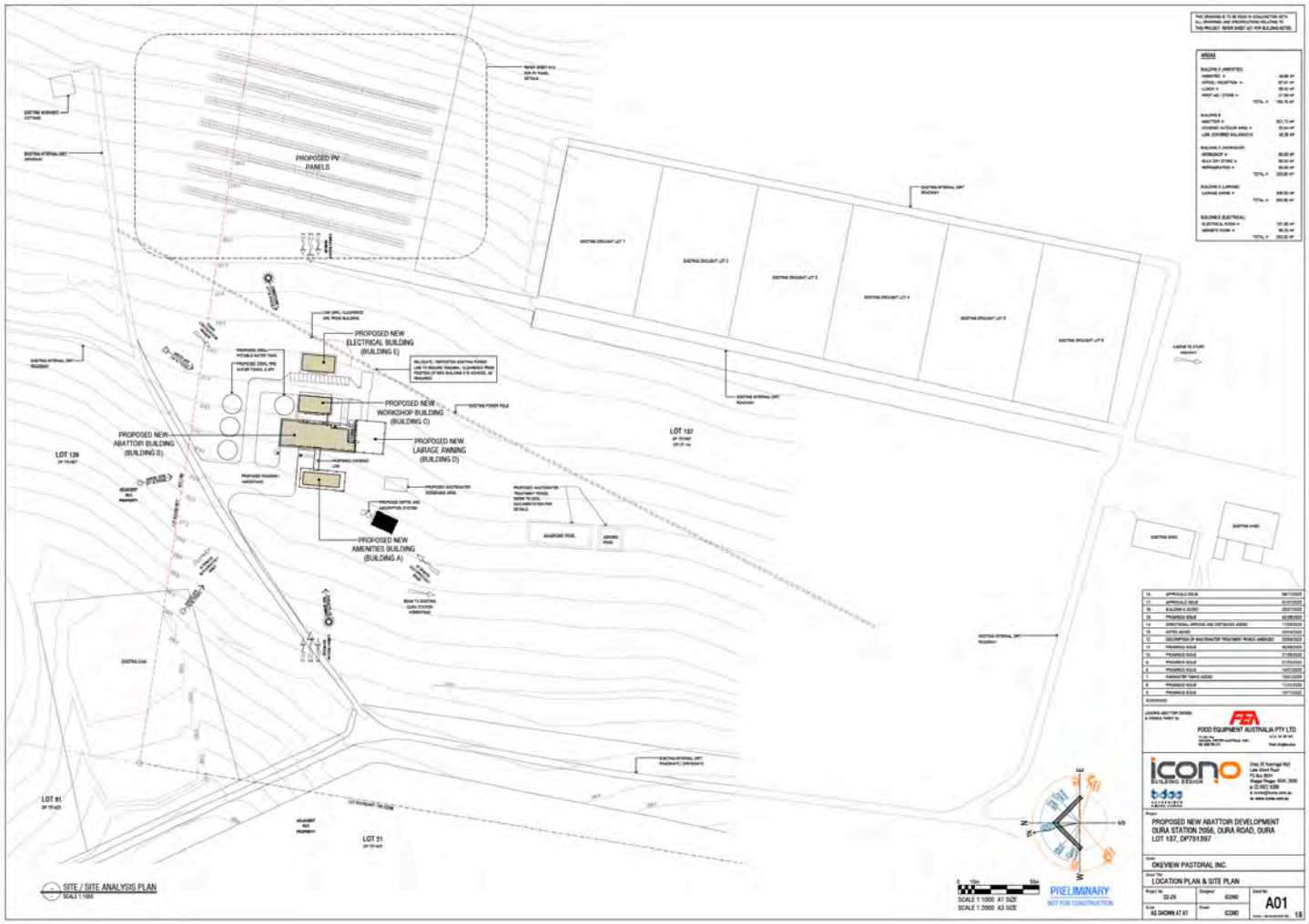


Figure 3. The Proposal, Location Plan and Site Plan (*source: Extract from the Applicant's architectural design plans*)

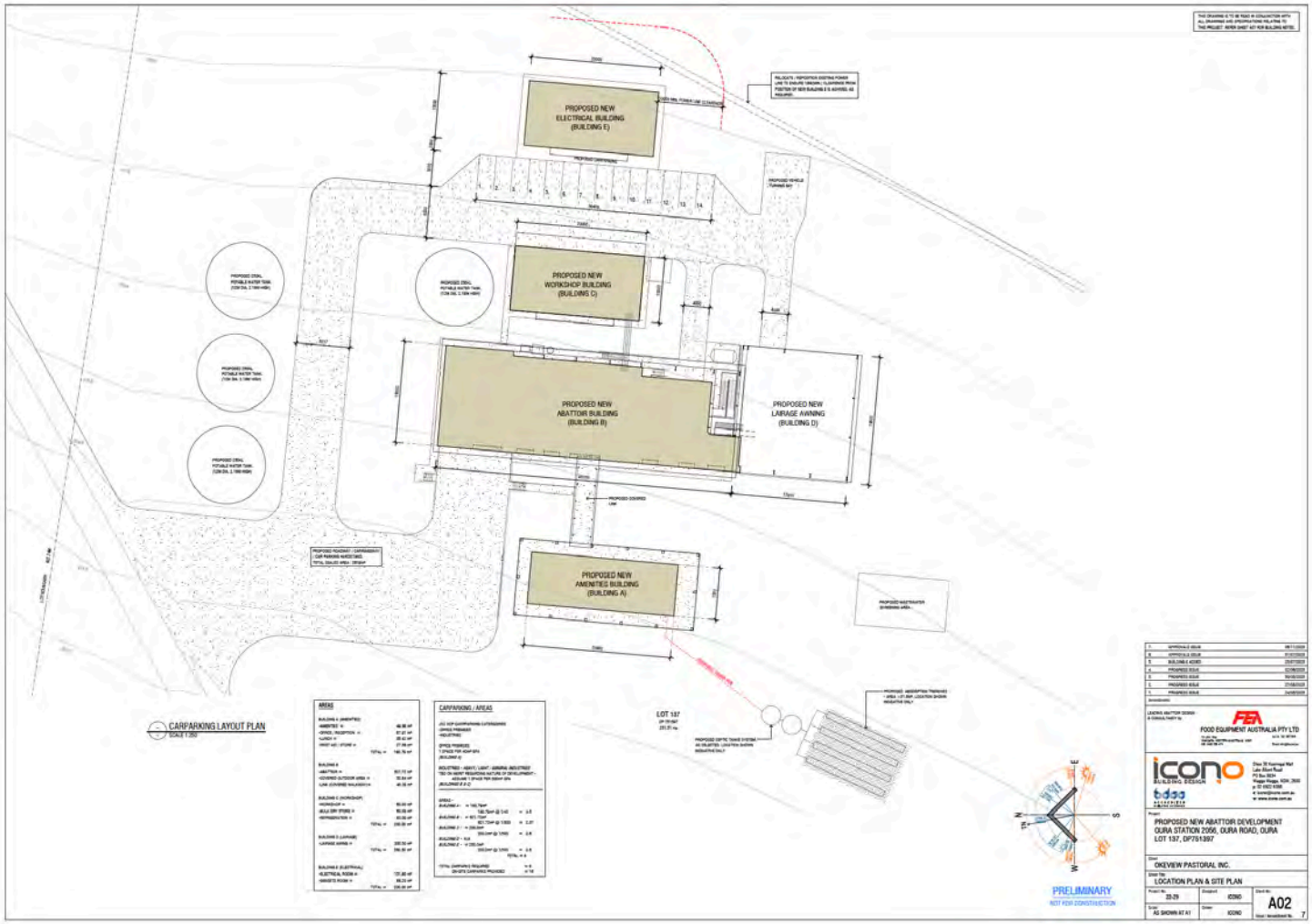


Figure 4. The Proposal Layout (*source: Extract from the Applicant's architectural design plans*)

4 Tourism

The proposal is located in an area that is an emerging tourist economy and part of well known tourist trails that extend east beyond Oura and to Gundagai. Key tourist facilities, features and trails along the Oura Road tourist corridor include:

- Eunonyhareeyha Wines;
- Kurrajong Reserve and Camp;
- Belisi Farmstay Cottages;
- The Wild Vine, Winery, cellar door and events facility;
- Oura Beach and Reserve;
- Sandy Beach;
- Fig Tree Retreat;
- Kimo Estates, luxury accommodation, weddings and events facility;
- Gundagai Vineyard;
- Tumblong Hills;
- Murrumbidgee River;
- Visit Wagga Wagga 'Drive Way'; and
- Oura Road Bicycle route (note: popular route used by the Bicycle Wagga Wagg Inc., local community and tourists).

Recently, Council publicly exhibited that the *draft Wagga Wagga Destination Management Plan* (WWDMP) (refer to link for details on the plan https://haveyoursay.wagga.nsw.gov.au/dmp).

Council identifies that:

> *"Wagga Wagga is fast gaining recognition as a leading tourism destination, attracting 1.3M visitors annually and the highest portion of visitor spending of all the Local Government Areas (LGA) in the Riverina.*
>
> *Visitors can already experience a vibrant calendar of festivals and events, a prospering food and wine scene and an array of nature-based attractions and activities.*
>
> *With significant opportunity for growth and development, strategic direction is required to ensure projects and initiatives are moving towards a unified, long-term objective which will deliver significant benefit to the city, community and region.*
>
> *A Destination Management Plan for the Wagga Wagga region will be the first of its kind for the city and result in a strategic, holistic and collaborative framework for our city's visitor economy.*
>
> *The aim of the strategy is to drive growth in current and emerging tourism sectors and unlock new market growth opportunities. The multi-faceted strategy will give consideration to value-adding tourism opportunities, tourism infrastructure, skills, innovation, marketing and branding.*
>
> *The result of the strategy will be to strengthen the Wagga Wagga and surrounding region's tourism profile, increase visitation, length of stay and visitor dispersal throughout the region for the economic and social benefit of the community."*

The *Riverina Murray Destination Management Plan 2022-2030* (RMDMP) identifies Wagga Wagga as part of the Riverina Murray visitor economy. Further to Council's identified visitors to Wagga Wagga, the Riverina Murray visitor economy delivers 6.1% of the region's jobs, supports 2,976 businesses and directly delivers 3.4% of the region's Gross Value Add, which has grown every year since 2010-11, at an average 3.6% per annum. On this basis, in relation to the potential economic boost to Wagga Wagga, promoting and growing the visitor economy along the Oura Road corridor would likely generate far greater economic benefits from tourism rather than the proposal, and likely generate far greater employment opportunities. The proposal, if approved would have a negative impact on tourism and its development in the area, resulting in a lost economic opportunity to the region.

The RMDMP describes Wagga Wagga, as follows:

> *"Wagga Wagga (informally called Wagga) is the largest inland regional city in NSW. With an urban population of more than 67,609 (2021 Census), Wagga Wagga is located midway between Sydney and Melbourne. It is also the largest retail, commercial, administrative and population centre in the Riverina Murray, servicing the needs of surrounding settlements in a catchment of over 185,000 people. Its significant economy relies on agriculture, health, defence forces and education. The intermodal hub and special activation precinct (SAP) for Wagga Wagga is now under construction, and this means the city it will continue to grow in population and servicing requirements."*

The key local priorities established by the RMDMP for Wagga Wagga and that would apply to Oura and the emerging Oura Road tourist corridor, includes:

- *Implementation of Wagga Wagga City Council Strategic and Master Plans including but not limited to the Cultural Plan 2030, Events Strategy and Wiradjuri Trail Masterplan;*
- *Development and growth of major events and festivals. Including attracting and hosting state/ nationally significant sporting events, arts and cultural tours and festivals; and*
- *Development of high-quality culinary and agritourism experiences in Wagga Wagga and surrounds.*

The RMDMP also identifies that the Riverina, which includes Wagga Wagga experienced a total 34% increase in overnight visitations between 2005-09 and 2015-2019, and an increase of 36% holiday overnight visitations over the same period.

Further, the *Wagga Wagga Local Strategic Planning Statement 2040* (LSPS) identifies the character and key features of the Wagga Wagga City Council area. Refer to Figure 5 of this submission for an extract of the Council's LSPS Strategic Plan.

The LSPS clearly identifies the area in which the proposal is located as being a 'Village character / lifestyle' and within 'Natural hazards (flooding & bushfire)'. While the Wagga Wagga City Centre and Special Activation Precinct (SAP) is identified as 'Regional service centre / industry / business / retail'. The proposal is inconsistent with the intent of the LSPS. Refer to Section 5 of this submission for detailed assessment.

The proposal is inconsistent with the emerging tourist economy along the Oura Road tourist corridor and the emerging tourist character. The proposal is clearly not suitable for the site. The local Oura area exhibits many qualities of a tourist destination, and should be promoted and reinforced as a part of Council's Destination Management Plan and visitor economy.

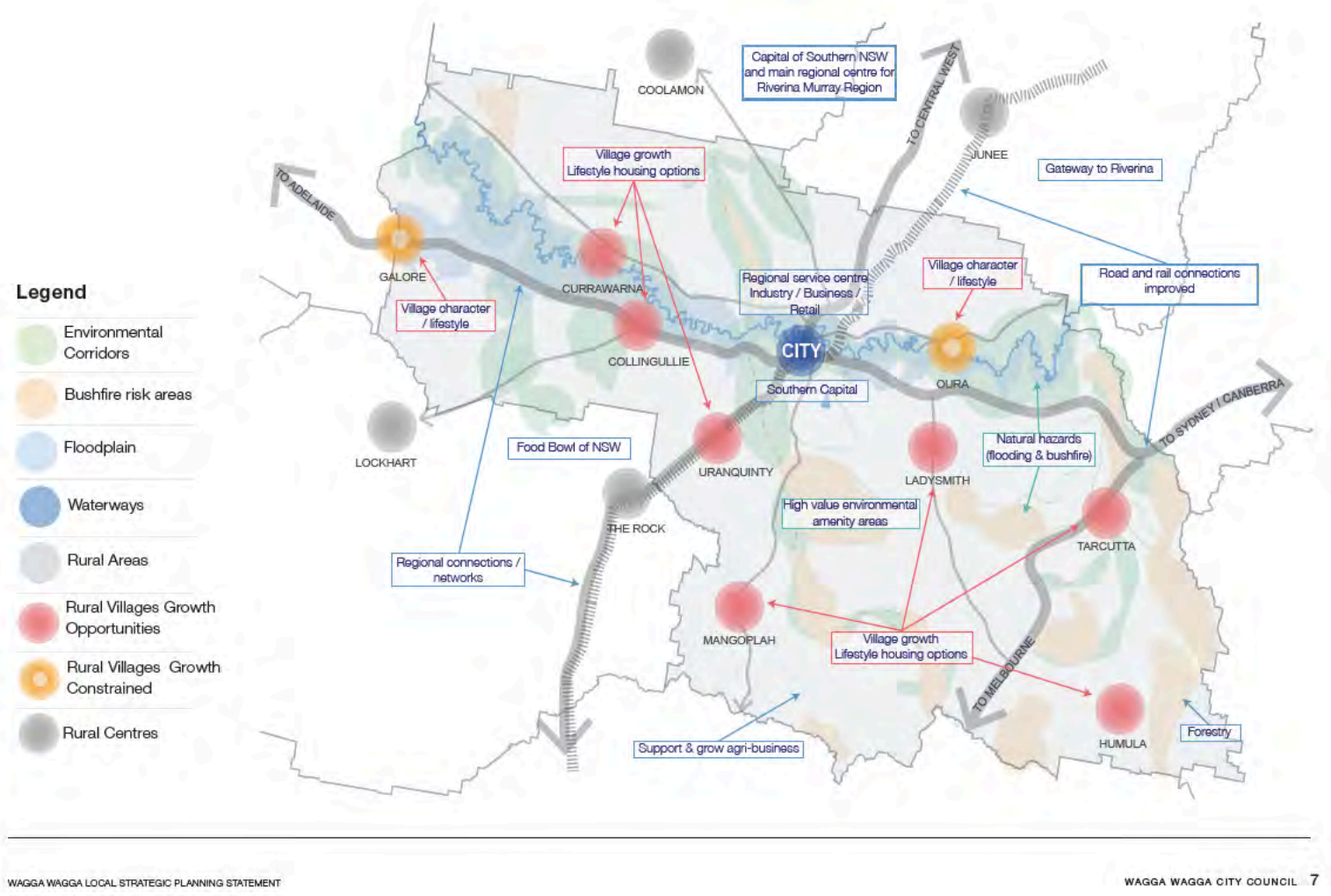


Figure 5. Wagga Wagga Council LSPS Strategic Plan

5 Planning Framework

An assessment of the proposal against the relevant planning and environmental legislation and guidelines has been undertaken to determine the proposal's compliance and adequacy with the relevant development controls.

5.1 Environmental Planning and Assessment Act 1979

Section 1.3 and Section 4.15 of the Act

The *Environmental Planning and Assessment Act 1979* (**Act**) is the governing legislation for all development matters in the NSW. Section 4.15(1) of the Act details the following matters of relevance that a consent authority is to take into consideration in determining a development application. Relevant sections of this SEE report provide an assessment to each evaluation matter under Section 4.15 of the Act.

The assessment found that the proposal offends key evaluation matters under Section 4.15(1) of the Act and as such is considered to be to be an unsuitable development for site. Refer to the section below for a summary of the evaluation matters assessment.

In accordance with Section 1.3 'Objects of Act', the proposed development undermines and does not satisfy key objects of the Act by way of the following:

- The proposal is located in an environmentally sensitive area along the Murrumbidgee River. The proposal does not promote the betterment and enhancement of the environment by conserving the State's natural resources;
- The proposal does not fully achieve the tenants of an ecologically sustainable development, as any potential benefits from the proposal are outweighed by major environmental impacts to overland flow, soil and ground conditions, water quality, bushfire risks and natural environmental conditions and processes;
- The proposal would likely have an adverse impact to endangered ecological community (EECs) in the Murrumbidgee River and existing lagoon ecosystem;
- The Murrumbidgee River is an identified 'key fish habitat' by the NSW Department of Primary Industries and contains protected riparian land, as recognised by the Department of Planning and Environment; and
- The proposal results in any adverse environmental impacts on surrounding properties resulting from water quality and overland flow contamination.

Therefore, based on the above and as supported by the evidence and assessment in this submission the proposal should be refused.

Section 4.15 of the Act Evaluation Matters Assessment

The various matters listed under Section 4.15(1) of the Act have been assessed in relevant sections of this submission. A summary of our assessment against Section 4.15(1) of the Act is provided in Table 1 of this submission.

Table 1. Section 4.15(1) of the Act Assessment

Clause No.	Clause	Assessment
(1)	Matters for consideration — general In determining a development application, a consent authority is to take into consideration such of the following matters as are of relevance to the development the subject of the development application:	
(a)	the provisions of:	
(i)	any environmental planning instrument, and	The relevant EPIs are assessed in Section 4 of this submission.
(ii)	any proposed instrument that is or has been the subject of public consultation under this Act and that has been notified to the consent authority (unless the Director-General has notified the consent authority that the making of the proposed instrument has been deferred indefinitely or has not been approved), and	Not applicable
(iii)	any development control plan, and	The relevant DCP has been assessed in Section 4 of this report.
(iiia)	any planning agreement that has been entered into under section 7.4, or any draft planning agreement that a developer has offered to enter into under section 7.4, and	Not applicable. No planning agreement has been entered into or has been offered to be entered into with Council.
(iv)	the regulations (to the extent that they prescribe matters for the purposes of this paragraph), and	It is recommended that Council check the *Environmental Planning and Assessment Regulations 2021* to ensure that the proposal meets all relevant regulations, and that the Application has been duly made and has been satisfactorily notified to relevant stakeholders.
(v)	(Repealed)	Not applicable.
(b)	the likely impacts of that development, including environmental impacts on both the natural and built environments, and social and economic impacts in the locality,	Major environmental impacts from the proposal

Clause No.	Clause	Assessment
(c)	the suitability of the site for the development,	The site is **unsuitable** for the development based on the assessment provided in this report.
(d)	any submissions made in accordance with this Act or the regulations,	Yes, this report is a submission to the proposed development, which highlights the adverse environmental impacts generated by the proposal.
(e)	the public interest.	The proposal is **not** within the public interest based on the assessment provided in this report.

5.2 Strategic Planning Assessment

5.2.1 State Infrastructure Strategy 2022 – 2042: Staying Ahead

The *State Infrastructure Strategy 2022-242: Staying Ahead* (SIS) is a macro-level State-wide policy that establishes key priorities to meet the growth of NSW over the next 20 years. Key priorities in the SIS that the project falls under include:

- Priority 3.4: A thriving regional NSW is fundamental to the State economy;
- Priorities 6.1 – 6.6: Achieve an orderly and efficient transition to Net Zero;
- Priority 8.5: Blue-green infrastructure can support biodiversity and the natural environment;

Each of the key priorities are discussed below.

Priority 3.4: A thriving regional NSW is fundamental to the State economy

The NSW State Government has spent significant resources to establish the Wagga Wagga Special Activation Precinct (SAP). The SAP has been established to concentrate industry and agri-industry businesses delivering employment opportunities to the local area and region. Further, the proposed uses are already characterised in Bomen and the SAP.

The EIS identifies that the proposal would generate 50 contractor jobs during construction. However, the number of construction jobs would be generated in any location that the proposal would be built. Therefore, in this circumstance the number of jobs created by the proposal with respect to the actual site location is redundant.

Further, the EIS identifies that the proposal would employee 12 employees. However, clarification is required by the Applicant whether these are additional employees above the current number of employees on the site, or inclusive of the total employees currently employed on the site.

Additionally, Council should not ignore the emerging Oura Road tourist corridor and visitor economy. As discussed in Section 4 of this report the site and Oura local area is better served by tourist related economic activities that also have less of an environmental impact, and are likely to generate far greater economic outcomes than the proposal.

The Application does not include an economic assessment that determines the economic contribution of the proposal to the local economy. An economic assessment should be prepared by the Applicant in order to compare the economic outcomes of the proposal with other industry in the area, including emerging tourist economy along Oura Road and role of the SAP.

It is evident that the proposal is not suitable for the site and that the adverse environmental impacts generated by the proposal should not be overshadowed by the unknown and uncertain economic considerations. Keeping in mind that an economic impact assessment has not been prepared. Moreover, the proposal does not satisfy this priority, as there is no economic data or evidence of the actual economic impact or benefits of the proposal on the area and region.

Priorities 6.1 – 6.6: Achieve an orderly and efficient transition to Net Zero

Addressing Net Zero should not be treated in isolation to achieving wholistic ecological/environmental sustainable development and general environmental outcomes. There needs to be an overall net beneficial outcome generated by the proposal. The EIS has not demonstrated the net beneficial outcome of the proposal, as the EIS is not supported by:

- An economic impact assessment;
- A social impact assessment;
- A detailed alternative options and site options assessment; and
- The EIS has insufficient information and deficient in information related to environmental impacts. Refer to discussion in latter sections of this report for details.

Therefore, the proposal has not been assessed with the rigor required to fully justify the proposal. Further, in order to fully qualify and understand the proposal's ability to achieve Net Zero, the assessment of the proposal should also include:

- Assessing the lifecycle of the project including all operational impacts;
- Assessing the lifecycle of the PV solar farm including manufacturing, installation, operation and decommissioning; and
- Assessing all associated impacts from transportation.

With respect to the PV solar farm, any potential benefits from the PV solar farm are negated by the significant adverse environmental impacts. Also, with respect to the energy generation the region is already proposed to be serviced by the South West Renewable Energy Zone (REZ), which provides the necessary renewable energy to the network and concentrates the infrastructure in a suitability located area. Refer to Figure 6 in this report for the location of the REZ.

As such, it is better to protect the site from associated environmental impacts associated with the PV solar farm and use the energy from the designated REZ. Additionally, the SAP has been established for agri-industry purposes that are also to be serviced by PV solar infrastructure.

Therefore, there is no evidence that the proposal would achieve Net Zero because as currently assessed in this submission the proposal would generate an adverse environmental outcome. Additionally, the likely environmental impact from installation of the PV solar farm would be worse than the limited benefits generated by infrastructure.

On this basis, the proposal would fail to achieve these priorities.

Priority 8.5: Blue-green infrastructure can support biodiversity and the natural environment

This report assesses and discusses the adverse environmental impacts generated by the proposal. The proposal is inconsistent with the emerging tourist economy of the area, it is inconsistent with the environmental characteristics of the area and does not enhance or achieve a betterment of the environment, and existing blue-green network.

On the basis of the significant adverse environmental impacts as assessed in this report, the proposal would fail to achieve this priority.

Therefore, with respect to the SIS, the proposal would not satisfy the priorities of the SIS and it is evident that the proposal is not suitable for the site.

5.2.2 Riverina Murray Regional Plan 2041

The Applicant's Environmental Impact Statement (EIS) ignores the *Riverina Murray Regional Plan 2041* (RMRP 2041). Refer to Figure 6 of this report for the RMRP 2041 plan. Part 1 of the RMRP 2041 relates to the environment and includes three objectives, which apply to the site:

- Objective 1: Protect, connect and enhance biodiversity throughout the region;
- Objective 2: Manage development impacts within riverine environments; and
- Objective 3: Increase natural hazard resilience.

Additionally, other key objectives of the RMRP 2041 that apply to the site include:

- Objective 4: Support Aboriginal aspirations through land use planning;
- Objective 9: Plan for resilient places that respect local character.

As assessed throughout this report, the proposal would not satisfy the above objectives as the proposal generates adverse environmental impacts. The proposal does not promote, enhance or create the betterment of the environment. Refer to detailed environmental assessment in latter sections of this report for details.

With respect to Objective 4 above, the proposal does not address how it seeks to respect, recognise and meet the aspirations of the local Aboriginal community. The NSW State Government through the Government Architect's office has developed the policy 'Connecting with Country' in order for urban development to address Aboriginal cultural representation.

While the policy applies to urban areas, there is no reason why the principles of the 'Connecting with Country' policy cannot be applied to rural development as well. It is recommended that the Council require the Applicant to prepare a response to 'Connecting with Country' principles for the proposal.

Moreover, key outcomes in the RMRP 2041 that relate to the site and proposal, include:

- *Capitalise on a changing regional economy and catalyst projects such as the Wagga Wagga Special Activation Precinct, Albury Regional Job Precinct, Inland Rail, South-West Renewable Energy Zone (South West REZ) and multiple Murray River bridge projects;*
- *Focus on rivers and riverine corridors as places for cultural connection, activation, recreation, conservation and economic activity;*
- *Ensure the aims of the Biodiversity Conservation Act 2016 are considered early in the strategic planning and development process;*
- *Support the transition to a net zero carbon emission State by 2050, including enabling the establishment of the South-West REZ; and*
- *Plan for the implications of climate change and the need for resilient and sustainable communities.*

It is evident from the assessment in this report that the proposal does not achieve the above key outcomes as a result of the following:

- The proposal should be located within or near the SAP that has been established for agri-industry uses, such as the proposal, and that can take advantage of the REZ and solar energy infrastructure proposed in the SAP;
- The proposal does not enhance and achieve the betterment of the environment and riverine corridor;
- While the Application has considered the *Biodiversity Conservation Act* 2016 it is considered that there is insufficient information related to the environmental assessment that supports the proposal;
- The proposal in its current form and proposed location would not achieve Net Zero. Refer to discussion under the Section 5.2.1 of this report; and
- As per the assessment in this report, the proposal would generate an adverse environmental impact.

It is also highlighted that since the publication of the RMRP 2041 there has been a change in priorities from the Federal and NSW State Government with respect to water management and environmental flows under the 'Murray-Darling Basin Plan'. Ultimately, the impact of the plan is that the Federal and NSW State Government is prioritising environmental outcomes over purely economic benefits.

Further to the above, it is noted that the NSW State Government is implementing the environmental flows via the Reconnecting River Country Program (RRC). Refer to further discussion on the RRC in Section 7 of this report.

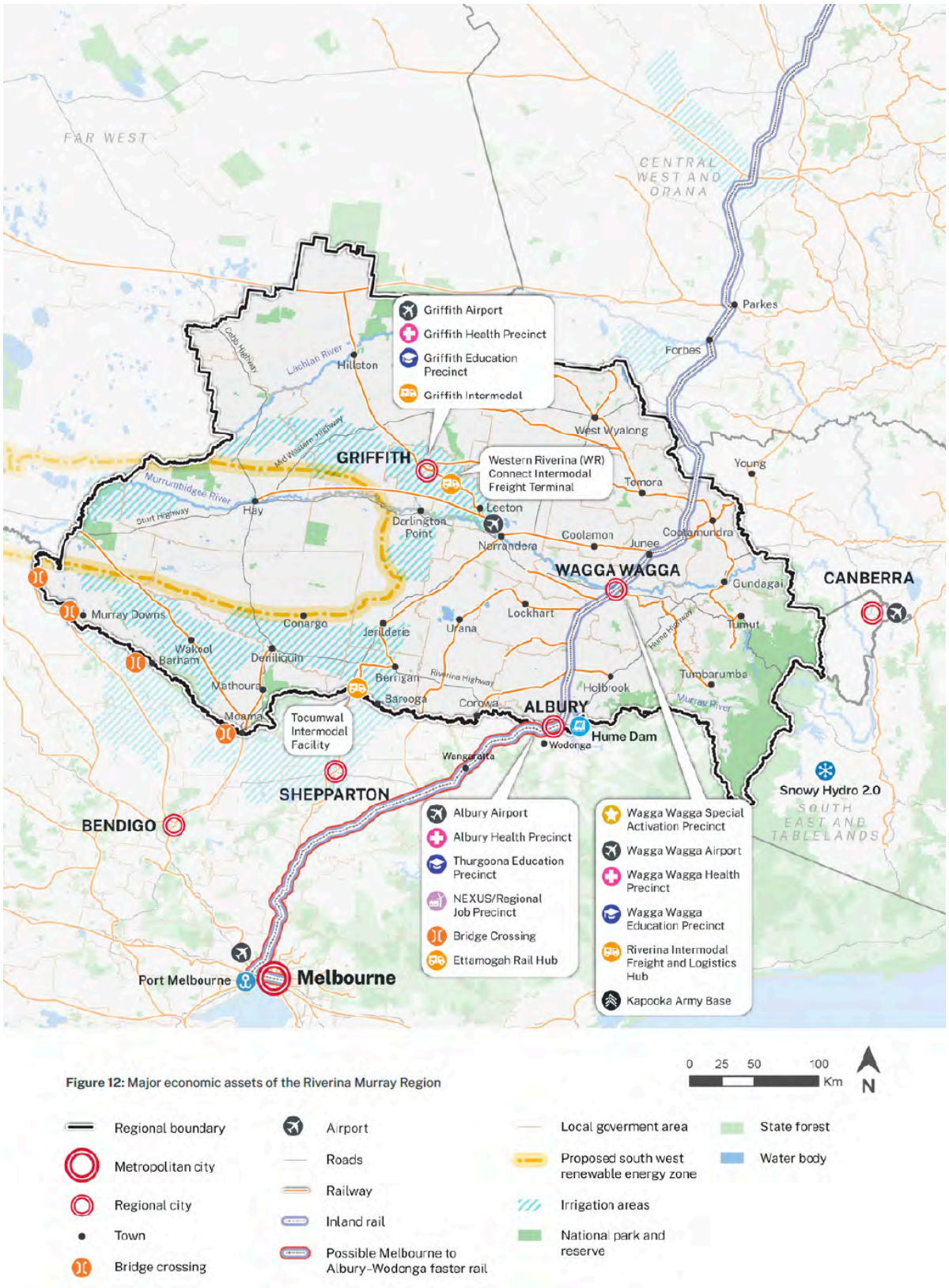


Figure 12: Major economic assets of the Riverina Murray Region

Figure 6. Riverina Murray Region Plan

5.2.3 Wagga Wagga Special Activation Precinct

The NSW State Government's *Wagga Wagga Special Activation Precinct (SAP) Master Plan*, (SAP Master Plan), dated May 2021, describes the SAP as:

> *"The Wagga Wagga Special Activation Precinct is a 4,424 hectare (ha) site, located 8 kilometres north of Wagga Wagga city centre. It incorporates the existing Bomen Business Park at its centre. The Deputy Premier announced Wagga Wagga as a Special Activation Precinct in January 2019.*
>
> *The Precinct will leverage the region's existing strengths in agriculture, transport and logistics and the eco Sydney and Melbourne, and just 10 hours' drive to Adelaide. It will also build on the success of the existing employment hub within the Precinct and major rail and logistics infrastructure investment, which has the potential to generate economic growth and business and employment opportunities for the Riverina region."*

The SAP has been created to support up to approximately 6,000 jobs by 2040 that would support a population in Wagga Wagga of approximately 90,000 people by 2036. The SAP Master Plan states

> *"As an employment centre for the Riverina region, the Special Activation Precinct will… attract industries that specialise in agri-business, … providing more jobs and boosting the region's economic development.*
>
> *Businesses already established in the Bomen Business Park will set the foundation to build a world-class sustainable precinct, with the aim of achieving net zero emissions. Existing businesses include Teys meat processing, Council-run livestock saleyards, Riverina oil and bio-energy plant, Enirgi battery recycling, Austrak sleeper manufacturing, Proway livestock equipment, Great Southern Electrical, truck and transport operators and more.*
>
> *The Wagga Wagga Special Activation Precinct will leverage the city's strategic location, its economic health and skilled workforce to become a thriving centre for economic activity, investment and innovation."*

Given the intent of the SAP, the intent proposal as a sustainable industry and based on the assessment in this submission, it is evident that the proposal is more suitable for the SAP. The SAP Structure Plan and SAP Solar Energy Farms Plan support the above description of the SAP, as well as the proposed energy generation within the SAP. Refer to Figures 7 and 8 on the following pages for each of the plans respectively.

Figure 3: Wagga Wagga Special Activation Precinct Structure Plan

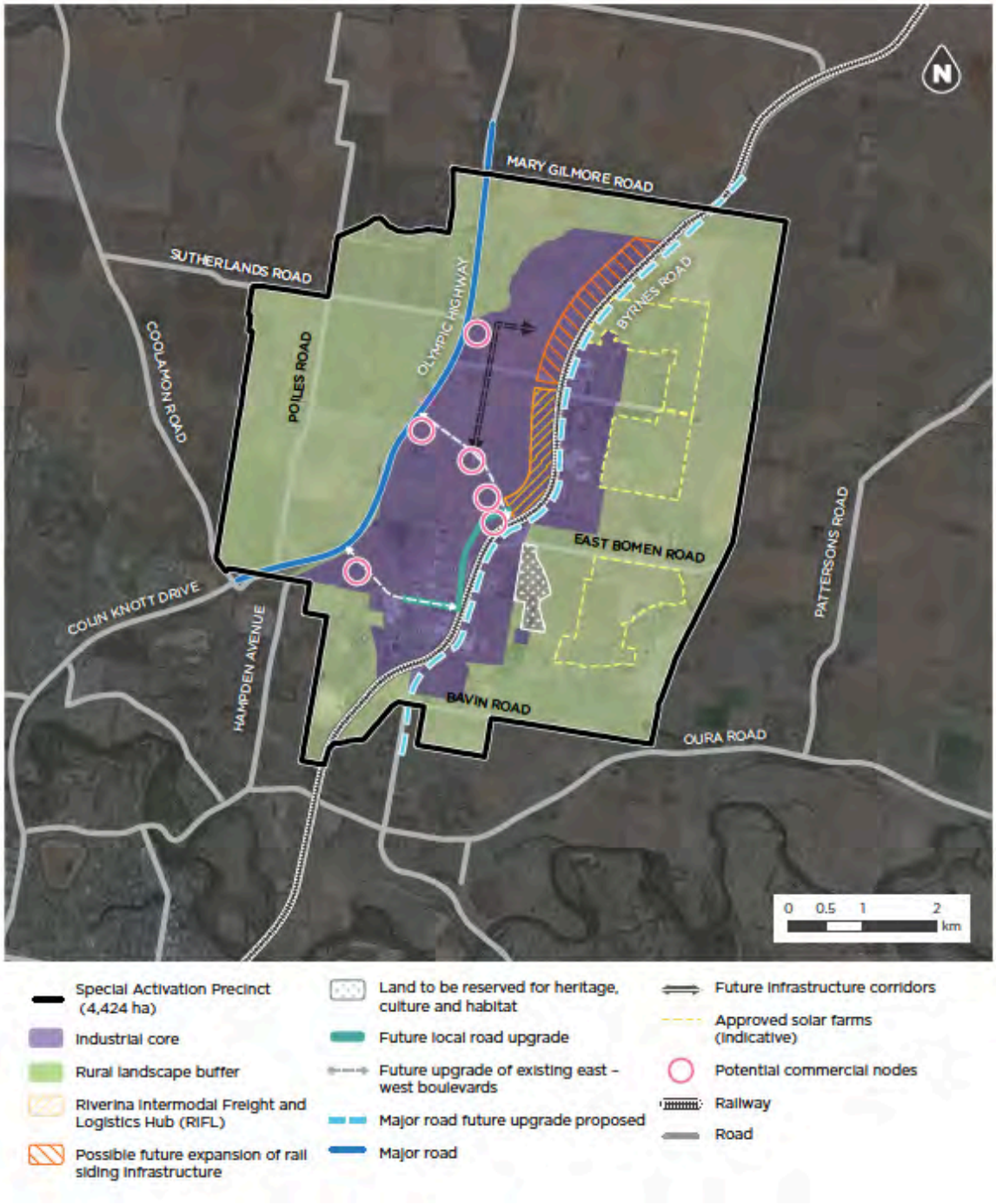


Figure 7. Wagga Wagga SAP Structure Plan (*source: extract SAP Master Plan*)

Figure 4: Permissibility of solar energy farms

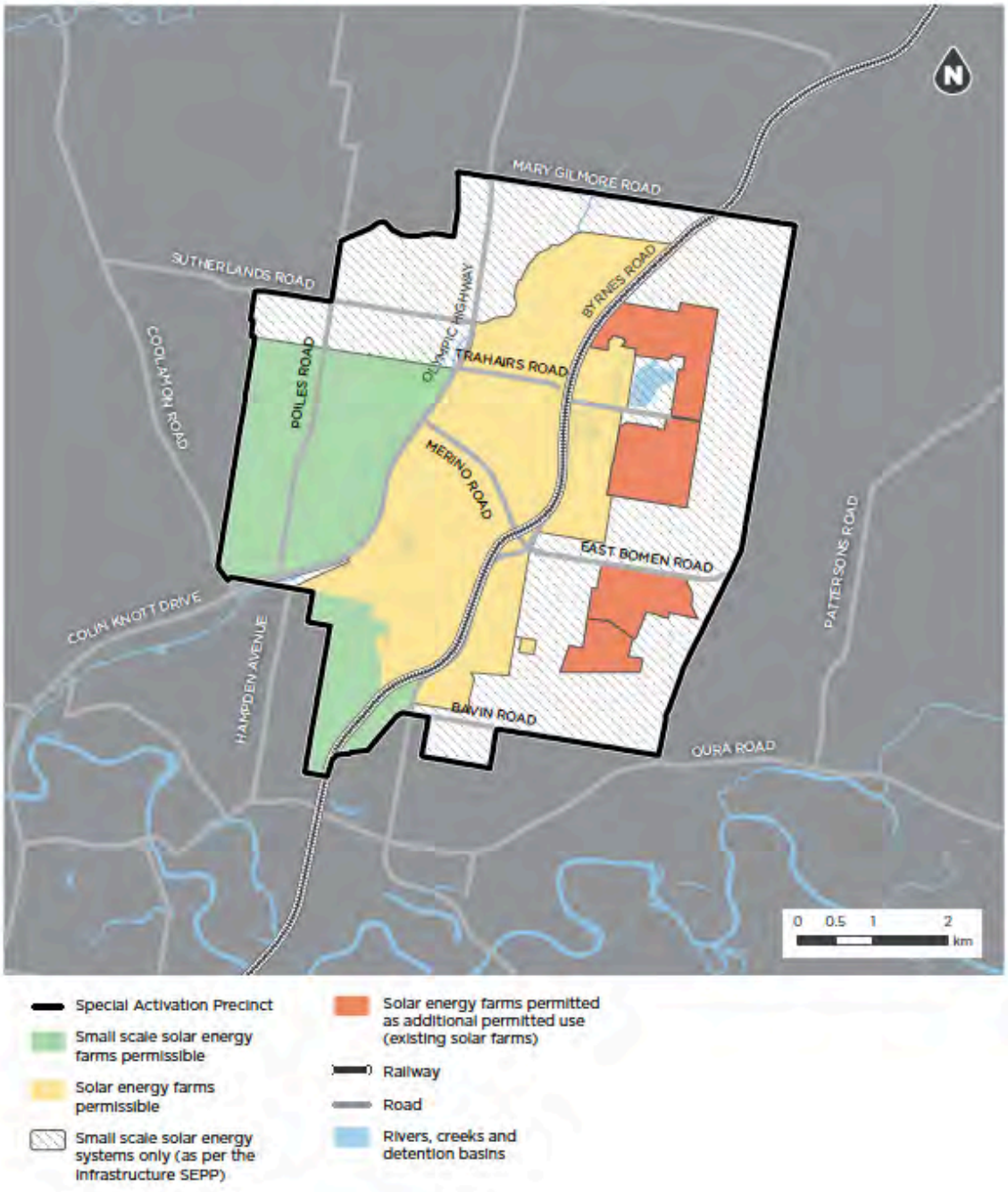


Figure 8. Wagga Wagga SAP Solar Energy Farms Plan (*source: extract SAP Master Plan*)

5.2.4 Wagga Wagga Local Strategic Planning Statement: Wagga Wagga 2040

The Applicant's assessment of the *Wagga Wagga City Council Local Strategic Planning Statement 2040* (LSPS) is deficient and ignores Council's strategic intent for the Oura local area and eastern corridor of the local government area (LGA). In particular the LSPS on page 8, states:

"The natural assets on which our city was founded continue to add value to our community's lifestyle choices, liveability but they also present significant hazards and risks that must be planned for and protected against. The Murrumbidgee Riverine corridor bisects the city and the risks and dangers to the city and community will be managed to guide future opportunities and manage existing liabilities.

Wagga 2040 sets out principles on which decisions will be made by Council based on connectivity to the central core, accessibility to services and community facilities to ensure growth is financially and environmentally sustainable."

It is also highlighted that page 10 of the LSPS states:

"This is an action-focused plan, which builds on, updates and replaces the Wagga Wagga Spatial Plan (2013) and identifies eleven key principles that:

- *Ensure our natural areas and corridors are prioritised as we grow*
- *Strengthen our resilience to natural hazards and land constraints*
- *Provide growth in a sustainable manner*
- *See Wagga Wagga grow as the regional capital of southern New South Wales*
- *Attract investment to our city*
- *Improve accessibility*
- *Provide sustainable infrastructure solutions aligned to growth*
- *Provide healthy lifestyle options*
- *Deliver high quality public spaces and engaging urban character*
- *Improve housing diversity*
- *Build strong rural and village communities"*

The Application does not acknowledge the LSPS's commitment to conserving, protecting and enhancing the natural assets of the riverine corridor. The proposal also does not assess the emerging tourist economy of the local area. ORP are of the view that the agri-tourism and tourism economy would be a more suitable outcome for the area with respect to conserving, protecting and enhancing the natural assets of the area.

The Applicant's EIS ignores key principles that apply to the site, including:

<u>The Environment</u>

Principle 1: Protect and enhance natural areas

Principle 2: Increase resilience to natural hazards and land constraints

Principle 3: Manage growth sustainably

<u>Growing Economy</u>

Principle 4: The southern capital of New South Wales

The proposal does not satisfy the environmental principles and planning priorities in the LSPS, as assessed in this submission as the proposal generates significant environmental impacts. Further, the Application has not properly assessed the cumulative impacts of the proposal, in particular with transportation, water quality, soil quality, flooding and overland flow, which may generate further adverse impacts.

Refer to Section 7 of this submission for a detailed environmental assessment.

Further, In relation to the cumulative environmental impacts, Figure 11 in this report includes an extract from the Applicant's wastewater assessment report that shows all the sites constraints. It is evident that the site is significantly constrained and in combination with the assessment provided in this report, the proposal is clearly not suitable for the site. Furthermore, Figure 12 of this report also provides an extract of the potential effluent areas on the site to support the proposal. If the proposal should expand use the areas to the north of the facility, the proposal would even greater impacts on water network and existing dam with respect to water quality, overland flow, flooding and soil quality. The combination of the issues derived from Figures 11 and 12 (see pages 24 and 25 in this report) would further hinder the proposal's ability to meet the environmental principles in the LSPS.

Additionally, as discussed in Section 7.4 of this report, the Application has not provide a Land Use Conflict Risk Assessment (LUCRA) in accordance with the Department of Primary Industries' guidelines, and therefore the proposal may further generate adverse impacts and further not satisfy key principles and planning priorities of the LSPS.

With respect to the economic principles and planning priorities of the LSPS, the Application in its current form does not demonstrate that the proposal is able to satisfy these principles and planning priorities, as an economic impact assessment has not been prepared. Further, a detailed options analysis and alternatives analysis that also provides a detailed evaluation assessment of other suitable options and alternatives for the proposal has not been prepared. Therefore, in the circumstance, Council either seek further information or refuse the Application as the Application and assessment of the proposal is incomplete.

In general terms, the LSPS identifies the character and key features of the Wagga Wagga City Council area. Refer to Figure 9 of this submission for an extract of the Council's LSPS Strategic Plan.

The LSPS clearly identifies the area in which the proposal is located as being a 'Village character / lifestyle' and within 'Natural hazards (flooding & bushfire)'. While the Wagga Wagga City Centre and Special Activation Precinct (SAP) is identified as 'Regional service centre / industry / business / retail'.

In addition, as shown in Figure 10 of this submission, a core intent of the LSPS to direct future employment and industry to the SAP.

Moreover, the proposal is inconsistent with the emerging tourist economy along the Oura Road tourist corridor and the emerging tourist character. The proposal is clearly not suitable for the site. The local Oura area exhibits many qualities of a tourist destination, and should be promoted and reinforced as a part of Council's Destination Management Plan and visitor economy.

From the environmental assessment in this submission and review of the objectives of the SAP, it is evident that the proposal is not suitable for the site, and does not meet the core principles and planning priorities of the LSPS. Therefore, the proposal is inconsistent with the intent of the LSPS and should be refused.

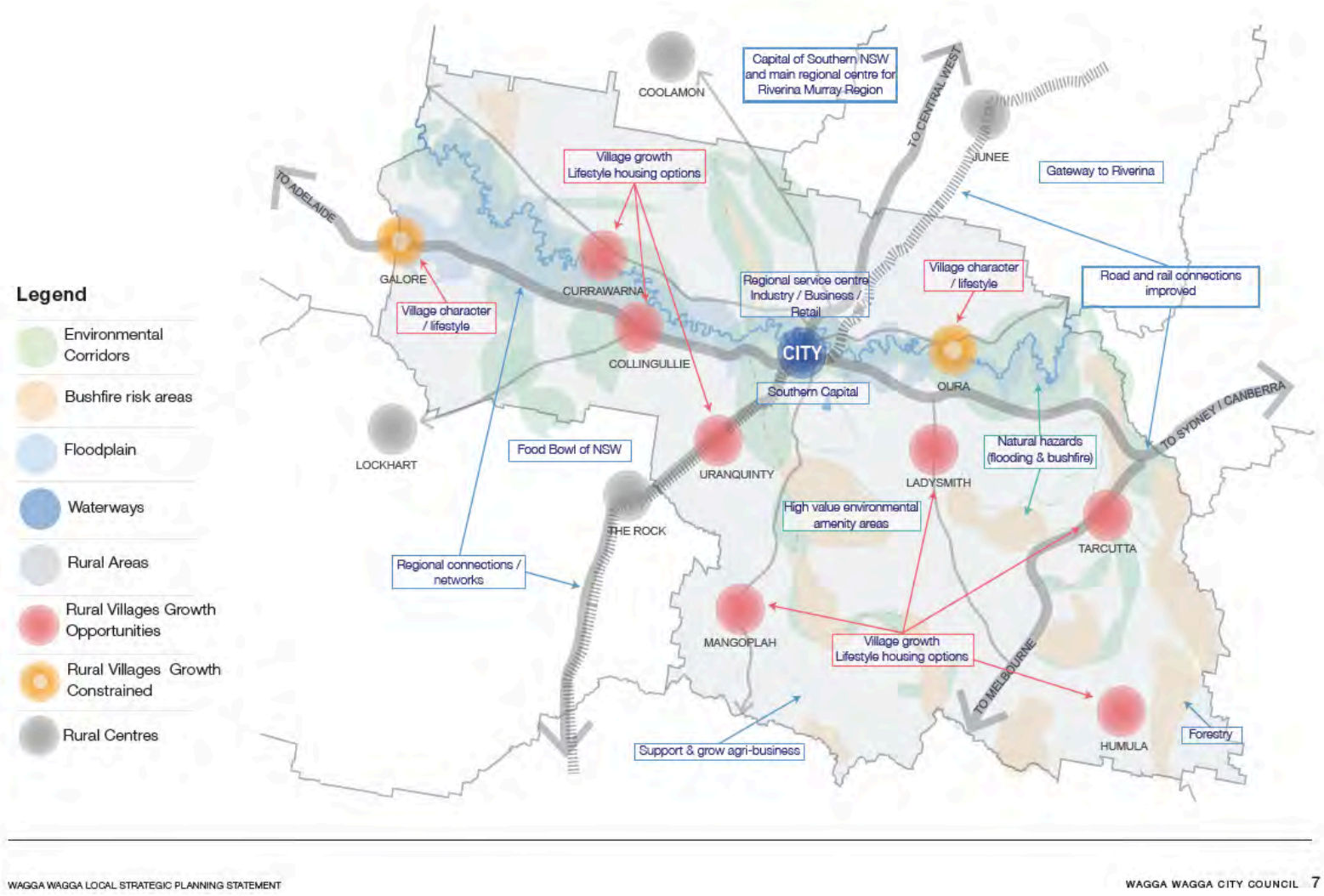


Figure 9. Wagga Wagga City Council - Strategic Plan (*source: Extract from the Wagga Wagga LSPS*)

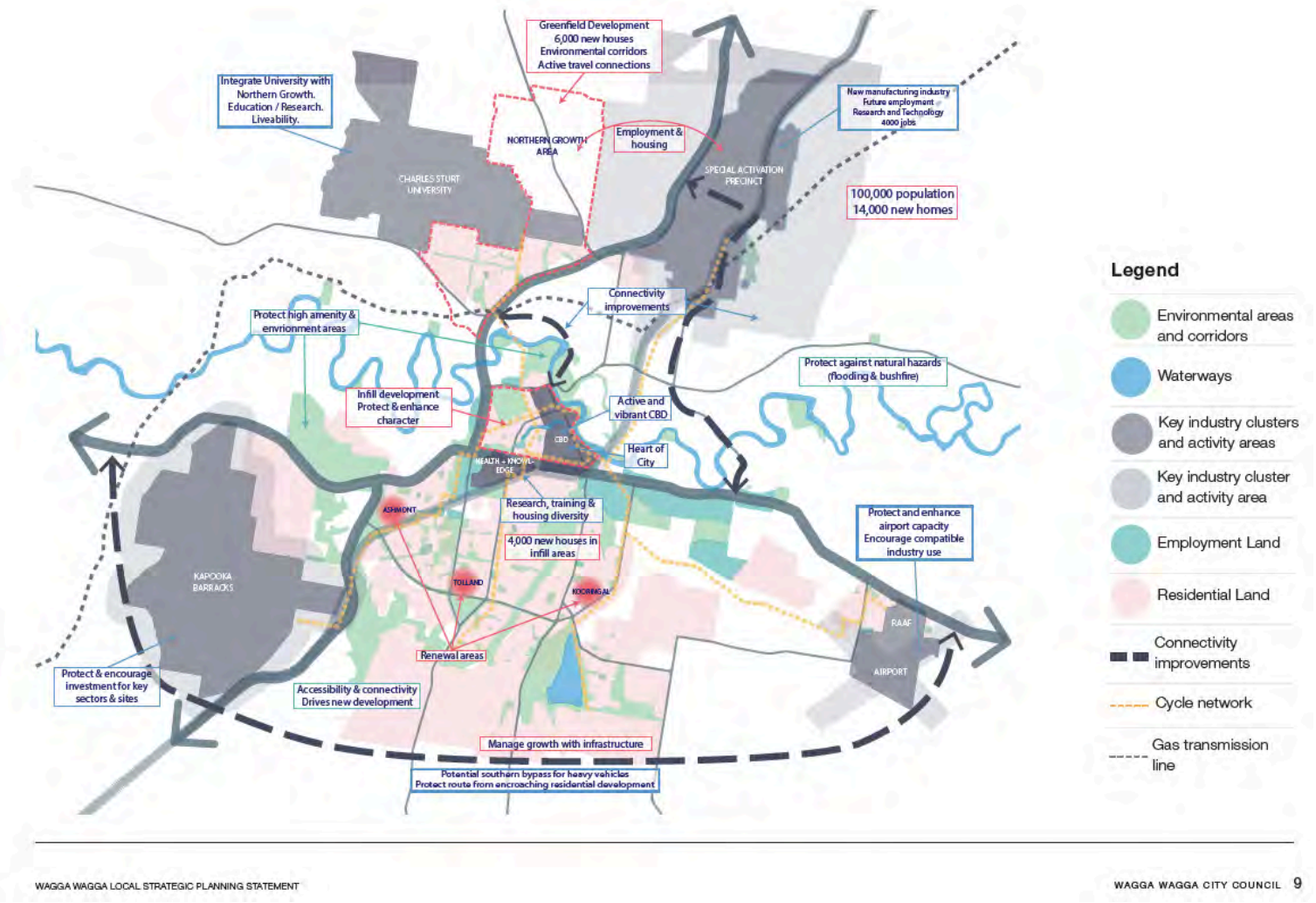


Figure 10. Wagga Wagga City Council - City Strategic Plan (*source: Extract from the Wagga Wagga LSPS*)

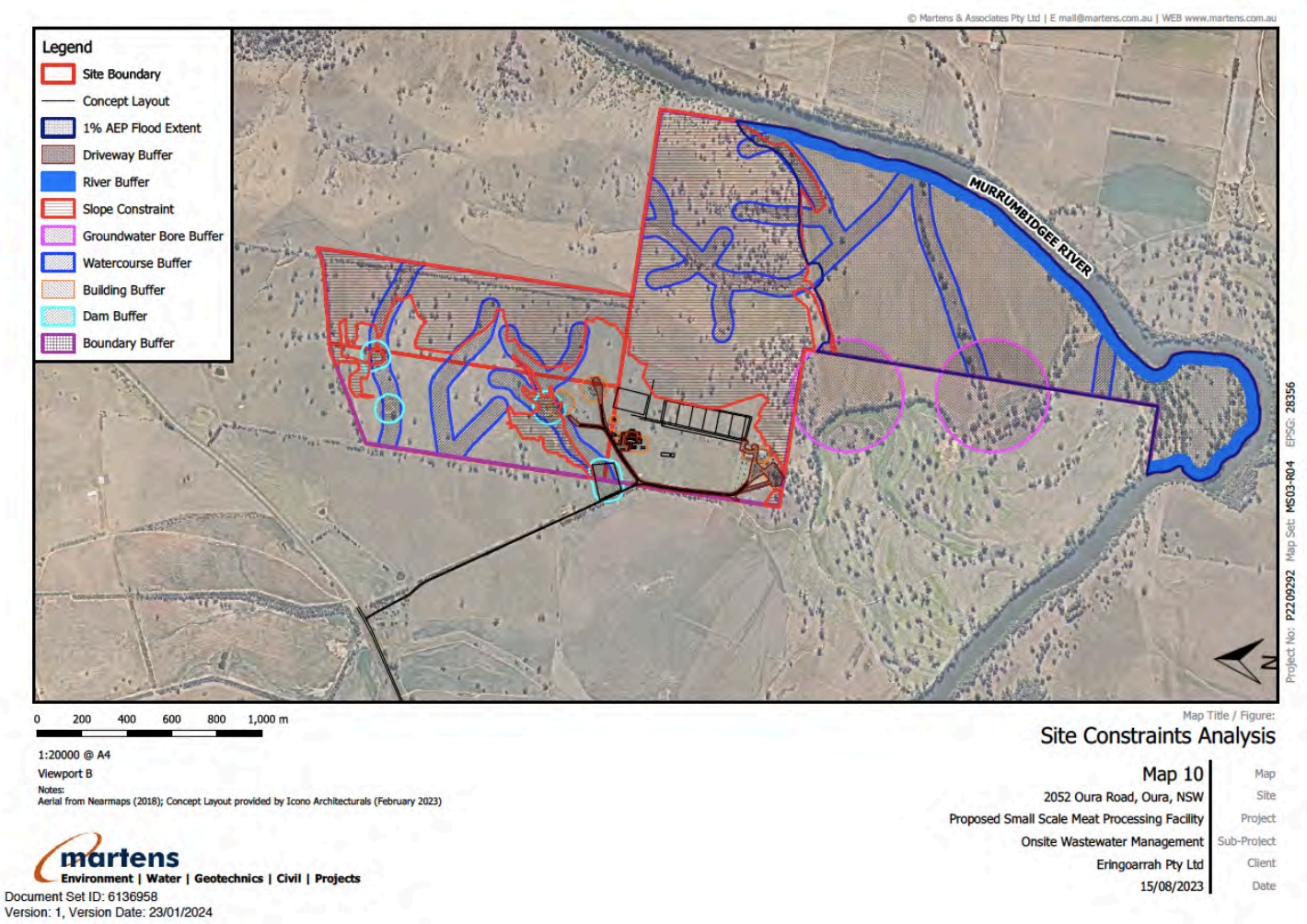


Figure 11. Site Constraints (*source: Extract from the Wastewater Management Report, Martens*)

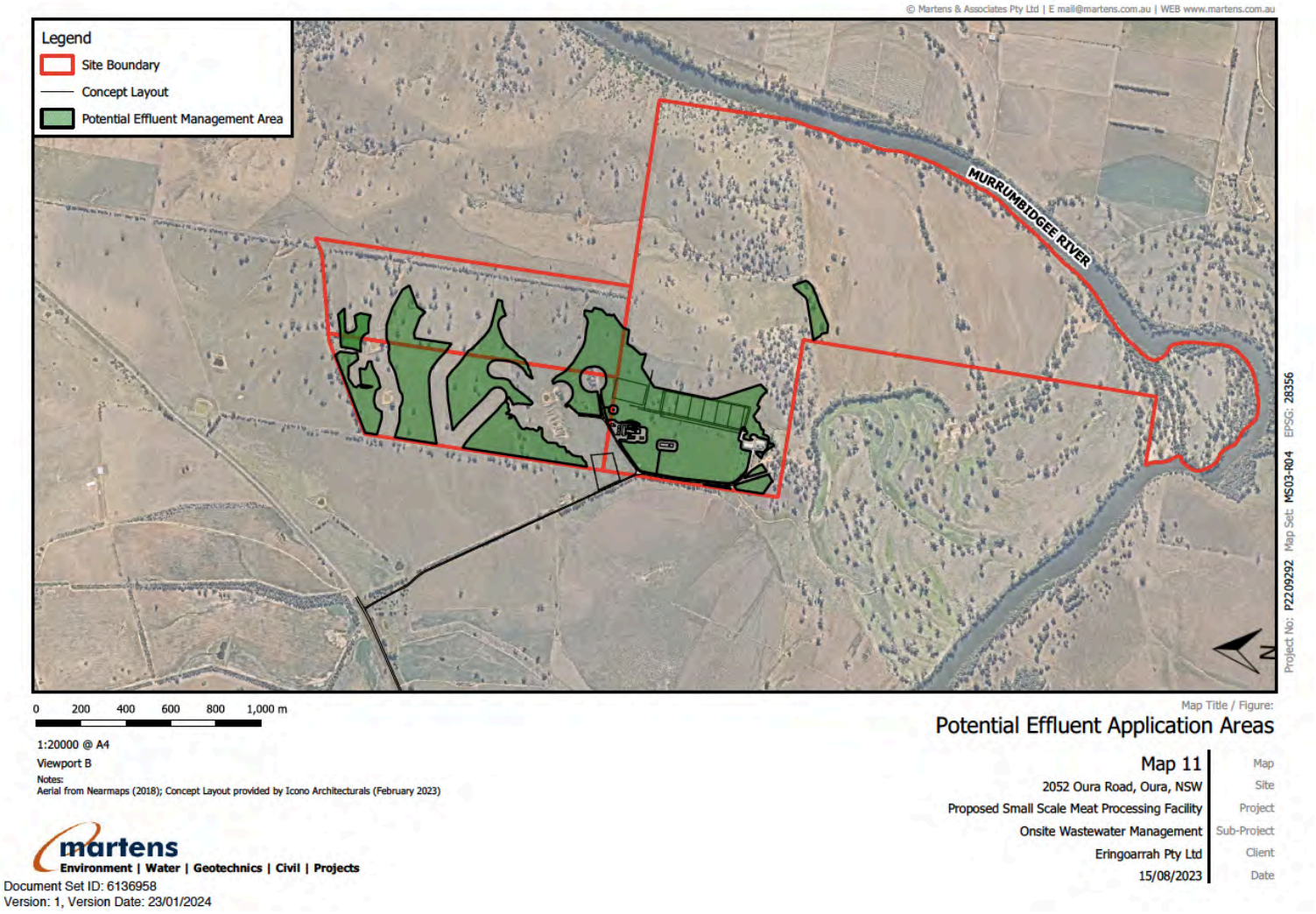


Figure 12. Site Constraints – Potential Effluent Areas (*source: Extract from the Wastewater Management Report, Martens*)

5.3 Statutory Planning Assessment

This section of the SEE report provides an assessment of the statutory planning legislation, policies and controls that apply to the site.

5.3.1 Biodiversity Conservation Act 2016

A proper assessment of the proposal against identified threatened and endangered species in order to satisfy the objectives of the *Biodiversity Conservation Act 2016* (BC Act). The Biodiversity Assessment Report (BAR) prepared by OzArk Environment & Heritage, identified a number threatened species and populations that occur near the site and within the Murrumbidgee River, including 11 flora and fauna threatened species that have a 'moderate-high' likelihood of occurring on the site.

In turn, the report also states that 52 flora species and 15 fauna species were observed during field surveys but given the short duration of the survey, and lack of targeted surveys insufficient information was collected on these species.

Moreover, the BAR does not take into consideration the proposal's impact to groundwater, overland flow and general water quality impacts associated with the proposal on the site and Murrumbidgee River and lagoon ecosystem, as well as identify endangered ecological communities (EEC) in the ecosystem.

The proposal fails to properly address the BC Act and on this basis should be refused.

5.3.2 State Environmental Planning Policies (SEPPs)

Table 2 provides an overview assessment of the key State Environmental Planning Policies (SEPPs) that need to be considered for all developments in NSW.

Table 2. Summary of relevant SEPPs

SEPP	Provision Summary	Assessment
State Environmental Planning Policy (Biodiversity and Conservation) 2021	This policy includes provisions to protect vegetation of biodiversity and ecological value, and gives power to Council's and consent authorities to allow clearing of vegetation. The policy also includes provision for Koala protection and other important river catchments, foreshore and waterways.	The Applicant's EIS identifies that the proposal meets the relevant provisions of the policy as the site does not seek any vegetation clearing, has no impact on koalas and does not impact any threatened flora and fauna. However, as stated above in Section 5.3.1 of this report, the Biodiversity Assessment Report (BAR) prepared by OzArk Environment & Heritage, identified a number threatened species and populations that

SEPP	Provision Summary	Assessment
		occur near the site and within the Murrumbidgee River, including 11 flora and fauna threatened species that have a 'moderate-high' likelihood of occurring on the site. In turn, the report also states that 52 flora species and 15 fauna species were observed during field surveys but given the short duration of the survey, and lack of targeted surveys insufficient information was collected on these species. Moreover, the BAR does not take into consideration the proposal's impact groundwater, overland flow and general water quality impacts associated with the proposal on the site and Murrumbidgee River and lagoon ecosystem. Therefore, the biodiversity assessment is considered to be deficient, as identified by OzArk, given that the field surveys were too short a duration, and there is insufficient information to conclude that the proposal would not have an impact on subject site local ecoystem. In addition, the proposal does not assess other key parts of the SEPP, including Chapter 6 impacts on water catchments The proposal clearly does not satisfy the SEPP.
State Environmental Planning Policy (Industry and Employment) 2021	The policy includes provisions related to industry and employment. There are no matters that relate to the site.	Not applicable to the proposal.

SEPP	Provision Summary	Assessment
State Environmental Planning Policy (Planning Systems) 2021	The policy includes provisions related to the delivery of State significant and regional development. The policy captures projects designated as major projects whereby the consent authority is the Minister for Planning.	The proposal is subject to Secretary's Environmental Assessment Requirements (SEARs) for the preparation of an Environmental Impact Statement (EIS) that were issued by the NSW Department of Planning and Environment on 2 September 2022. However, the consent authority for the proposal is Wagga Wagga City Council.
State Environmental Planning Policy (Housing) 2021	The policy includes provisions related to delivery of housing including affordable housing, group homes, co-living housing, build-to-rent housing and housing for seniors.	Not applicable to the proposal.
State Environmental Planning Policy (Precincts – Central River City) 2021	The policy relates to significant urban renewal areas and major projects, and partially replaces the State Environmental Planning Policy (Sydney Region Growth Centres) 2006.	Not applicable to the proposal.
State Environmental Planning Policy (Precincts – Eastern Harbour City) 2021	The policy relates to State significant sites and major projects, and partially replaces the State Environmental Planning Policy (State Significant Development) 2011.	Not applicable to the proposal.
State Environmental Planning Policy (Precincts – Regional) 2021	The policy relates to State significant sites and regional activation areas, and replaces the regional development provisions in the previous State Environmental Planning Policy (State Significant Development) 2011.	Not applicable to the proposal.

SEPP	Provision Summary	Assessment
State Environmental Planning Policy (Precincts – Western Parkland City) 2021	The policy relates to significant urban renewal areas and major projects, and partially replaces the State Environmental Planning Policy (Sydney Region Growth Centres) 2006.	Not applicable to the proposal.
State Environmental Planning Policy (Primary Production) 2021	The policy relates to agricultural and farming land uses and projects.	The proposal is located on primary production land. Generally, key aims of the policy are to promote and facilitate orderly and economic use of primary production land, while reducing land use conflicts and protecting natural vegetation, water resources and achieving positive biodiversity and sustainable outcomes. The proposal, as assessed and discussed in this submission generates significant adverse environmental impacts, conflicts with the tourist character of the area, and conflicts with the environmental sensitivity of the area and Murrumbidgee River waterway and ecosystem. The proposal is not suitable for the site and a more suitable location for the site is within or near the Wagga Wagga Special Activation Precinct, that has been established by the NSW State Government for future agri-industry and employment uses.
State Environmental Planning Policy (Resilience and Hazards) 2021	The policy relates to coastal vulnerability, wetlands, hazardous and offensive development, and captures the provisions related to contaminated land under the previous State Environmental Planning	A Preliminary and Detailed Site Assessment and Groundwater Assessment Report support the proposal. However, these reports do not conclusively demonstrate that the proposal would not have an impact on the environment because the

SEPP	Provision Summary	Assessment
	Policy No. 55 - Remediation of Contaminated Lands (SEPP 55). Chapter 4 of the policy requires that a consent authority must not grant consent to a development if it has considered whether a site is contaminated, and if it is, that it is satisfied that the land is suitable (or will be after undergoing remediation) for the proposed use.	assessments do not consider the cumulative impacts of the proposal. Refer to Section 7 of this report for detailed environmental assessment. Based on the environmental assessment in this submission, the site is not suitable for the proposal.
State Environmental Planning Policy (Resources and Energy) 2021	The policy includes provisions related to the delivery of mining and extractive industries.	Not applicable to the proposal.
State Environmental Planning Policy (Transport and Infrastructure) 2021	The policy includes provisions related to the delivery of major transport and infrastructure.	The site includes a PV solar farm that is electricity generating infrastructure. Any benefits of the solar farm are negated by the significant adverse environmental impacts. The proposal is not suitable for the site as a result of the environmental impacts. Refer to Section 7 of this submission for the detailed environmental assessment.

5.3.3 Wagga Wagga Local Environmental Plan 2010

The *Wagga Wagga Local Environmental Plan 2010* (LEP) is the primary local environmental planning instrument that applies to the site. Table 3 in this report provides an assessment of Clause 1.2 of the LEP and clearly demonstrates that the proposal does not satisfy the aims of the LEP.

Table 3. Clause 1.2 of the LEP Assessment

LEP Clauses	Clause Provision	Assessment	Compliance
1.2 Aims of Plan			
2	The particular aims of this Plan are as follows—		
(aa)	to protect and promote the use and development of land for arts and cultural activity, including music and other performance arts,	It is highlighted that the site is located within a tourism corridor east of the Wagga Wagga City Centre, along the Murrumbidgee River and Oura Road. Numerous tourist facilities are located along this corridor, which have the potential to offer cultural activities including music. The corridor also connects to numerous destination tourist locations such as Oura Beach Reserve.	The proposal is not consistent with the tourist character and uses found along Oura Road.
(a)	to optimise the management and use of resources and ensure that choices and opportunities in relation to those resources remain for future generations,	The proposal does not meet this objective as it generates significant environmental impacts as discussed in this submission. Due to the significant adverse environmental impacts the proposal does not ensure opportunities are generated for the management and use of resources in an effective manner that can be passed onto future generations. The site is unsuitable for the proposal, and the proposal is better located within or near the Wagga Wagga Special Activation Precinct, that has been established by the NSW State Government for future agri-industry and employment uses.	No

LEP Clauses	Clause Provision	Assessment	Compliance
(b)	to promote development that is consistent with the principles of ecologically sustainable development and the management of climate change,	The proposal does not meet this objective. The proposal generates significant adverse environmental impacts, as discussed in this submission, and cannot achieve ESD principles to manage future and cumulative environmental impacts. The first principle that should be applied to the site with respect to ESD principles is the 'precautionary principle' and 'do no harm to the environment'.	No
(c)	to promote the sustainability of the natural attributes of Wagga Wagga, avoid or minimise impacts on environmental values and protect environmentally sensitive areas,	The proposal does not meet this objective. The proposal generates significant adverse environmental impacts, as discussed in this submission. The proposal does not promote that natural attributes of Wagga Wagga. The site is clearly within a tourist corridor, is inconsistent with the character of the area and does not protect the environmentally sensitive conditions of the land, ground water, overland flow and soil conditions, for land within the Murrumbidgee River ecosystem.	No
(d)	to co-ordinate development with the provision of public infrastructure and services.	The proposal does not generate any benefits to public infrastructure.	No

Additionally, Table 4 in this report provides a summary of the key development standards that apply to the site under the LEP.

Table 4. LEP Summary Assessment

Control	LEP Clause	Provision	Assessment
Land Use Zone	**Cl.2.1**	**Primary Production**	
	Land Use Objectives		
	To encourage sustainable primary industry production by maintaining and enhancing the natural resource base.		The proposal does not satisfy this objective, as it does not enhance the natural resources of the site and local area. The proposal has a significant adverse environmental Impact and is not suitable for the site.
	To encourage diversity in primary industry enterprises and systems appropriate for the area.		The proposal does not satisfy this objective, as it is not an appropriate use in the area. A more appropriate location Is within or near the Wagga Wagga Special Activation Precinct, that has been established by the NSW State Government for future agri-industry and employment uses. The proposal has a significant adverse environmental Impact and is not suitable for the site. Further, the local area has an emerging agri-tourism character and uses. Refer to Section 7 of this submission for the detailed environmental assessment.
	To minimise the fragmentation and alienation of resource lands.		The proposal alienates surrounding land uses and is counter to the character of approved development on surrounding neighbouring land. Moreover, the local area is subject to an emerging agri-tourism character and activities, and the proposal would further generate land use conflicts with the future character of the area. The proposal is clearly not suitable for the site.

Control	LEP Clause	Provision	Assessment
	To minimise conflict between land uses within this zone and land uses within adjoining zones.		The land use zone is consistent with other adjoining land use zones. However, the proposed use is in conflict with the emerging tourist character of the local area. The proposal is clearly not suitable for the site, and the proposal would be better suited within or near the Wagga Wagga Special Activation Precinct.
	To foster strong, sustainable rural community lifestyles.		The proposal is completely incongruent with the emerging character of the local area and community, which has an agri-tourism focus.
	To maintain the rural landscape character of the land.		The site would maintain, for most part its rural landscape, however the proposal is inconsistent with the emerging agri-tourism character of the area. Further, the large heavy vehicles accessing the site are more akin to more intense industrial type uses. As such, the proposed uses are better suited to within or near the Wagga Wagga Special Activation Precinct.
	To allow tourist and visitor accommodation only where it is in association with agricultural activities.		The Oura local area and Oura Road, between Wagga Wagga and Gundagai, is an emerging tourism and rural recreation corridor. The corridor includes tourist destinations, as described in Section 4 of this report.
Heritage	**Cl.5.10**		
	Review of the heritage assessment reports prepared by OzArk Environment & Heritage identify that the proposal does not impact any heritage items.		

Control	LEP Clause	Provision	Assessment
Flood Planning	**Cl.5.21**		
(1)	The objectives of this clause are as follows—		
	(a) to minimise the flood risk to life and property associated with the use of land,		Refer to Section 7 of this report for detailed assessment. The proposal does not satisfy this clause as the EIS is deficient in assessing cumulative impacts of the proposal with respect to flooding, overland flow, soil and water quality impacts. As highlighted in Section 7 of this report the proposal is not suitable for the site.
	(b) to allow development on land that is compatible with the flood function and behaviour on the land, taking into account projected changes as a result of climate change,		
	(c) to avoid adverse or cumulative impacts on flood behaviour and the environment,		
	(d) to enable the safe occupation and efficient evacuation of people in the event of a flood.		
(2)	Development consent must not be granted to development on land the consent authority considers to be within the flood planning area unless the consent authority is satisfied the development—		
	(a) is compatible with the flood function and behaviour on the land, and		The proposal is not compatible with the flood function on the land, as shown in Section 7 of this report. The proposal generates additional flooding risk on the site, in particular from overland flow. There is no reason why the proposal should be generating any potential additional flood risk on the site. The proposal generates significant adverse environmental impacts as assessed in Section 7 of this report and is not suitable for the site.
	(b) will not adversely affect flood behaviour in a way that results in detrimental increases in the potential flood affectation of other development or properties, and		
	(c) will not adversely affect the safe occupation and efficient evacuation of people or exceed the capacity of existing evacuation routes for the surrounding area in the event of a flood, and		
	(d) incorporates appropriate measures to manage risk to life in the event of a flood, and		
	(e) will not adversely affect the environment or cause avoidable erosion, siltation, destruction of riparian vegetation or a reduction in the stability of river banks or		

Control	LEP Clause	Provision	Assessment
	watercourses.		
Special Flood Considerations	**Cl.5.22**		
(1)	The objectives of this clause are as follows—		
	(a) to enable the safe occupation and evacuation of people subject to flooding,		The proposal generates additional flooding risk on the site, in particular from overland flow. There is no reason why the proposal should be generating any potential additional flood risk on the site. Refer to Section 7 of this report for detailed assessment and Figure 18 (FL17 plan extracted from the Applicant's flood impact assessment).
	(b) to ensure development on land is compatible with the land's flood behaviour in the event of a flood,		Refer to assessment in Cl.5.21 above. The proposal is not suitable for the site.
	(c) to avoid adverse or cumulative impacts on flood behaviour,		As above. The proposal increases the flood risk on the site from the existing conditions, and does not generate a net beneficial outcome on the land, while also causing potential risk to property and humans. Refer to Section 7 of this report for detailed assessment and Figure 18 (FL17 plan extracted from the Applicant's flood impact assessment). The proposal is not suitable for the site.
	(d) to protect the operational capacity of emergency response facilities and critical infrastructure during flood events,		
	(e) to avoid adverse effects of hazardous development on the environment during flood events.		
(2)	This clause applies to—		
	(a) for sensitive and hazardous development—land between the flood planning area and the probable maximum flood.		As above. Refer to Section 7 of this report for detailed assessment.

Control	LEP Clause	Provision	Assessment
Biodiversity	**Cl.7.3**		
(1)	The objectives of this clause are to protect, maintain or improve the diversity of the native vegetation, including—		
	(a) protecting biological diversity of native flora and fauna, and		The proposal does not satisfy this clause due to the cumulative impacts on the proposal. Further, the EIS and supporting ecological assessments are deficient as the field survey work was limited to a short period and does not satisfactorily assess impacts on sensitive and threatened ecological communities. The assessment in the EIS also does not take into consideration water quality impacts to the ecology, endangered ecological communities and to threatened fish species in the Murrumbidgee River. Refer to Section 7 of this report for detailed assessment. The proposal is not suitable for the site.
	(b) protecting the ecological processes necessary for their continued existence, and		
	(c) encouraging the recovery of threatened species, communities or populations and their habitats.		
Vulnerable Land	**Cl.7.4**		
(1)	The objectives of this clause are to protect, maintain or improve the diversity and stability of landscapes, including—		
	(a) restricting development on land that is unsuitable for development due to steep slopes or shallow soils or both, and		Refer to Figure 11 in this report, which is an extract from the Applicant's wastewater assessment report. The plan shows all the constraints on the site including land slope constraints. The combination of the above with the assessment in Section 7 of this report demonstrates that the proposal is not suitable for the site.

Control	LEP Clause	Provision	Assessment
	(b) restricting development on land that is subject to soil salinity, and		The proposal generates significant adverse environmental and cumulative impacts as assessed in Section 7 of this report and is not suitable for the site.
	(c) restricting the removal of native vegetation, and		
	(d) restricting development on land that is subject to permanent inundation, and		
	(e) restricting development on land with a high proportion of rock outcropping.		
Riparian Lands and Waterways	**Cl.7.5**		
(1)	The objectives of this clause are to protect, maintain or improve the diversity and stability of landscapes, including—		
	(a) water quality within waterways, and		The proposal does not satisfy this clause due to the significant adverse environmental and cumulative impacts as assessed in Section 7 of this report and is not suitable for the site.
	(b) stability of the bed and banks of waterways, and		
	(c) aquatic and riparian habitats, and		
	(d) ecological processes within waterways and riparian areas, and		
	(e) threatened aquatic species, communities, populations and their habitats, and		
	(f) scenic and cultural heritage values of waterways and riparian areas, and		
	(g) catchment protection to prevent increased sediment loads and stream bank erosion from entering lakes, rivers and waterways.		

Control	LEP Clause	Provision	Assessment
Groundwater Vulnerability	**Cl.7.6**		
(1)	(1) The objective of this clause is to protect and preserve groundwater sources.		The proposal does not satisfy this clause due to the significant adverse environmental and cumulative impacts as assessed in Section 7 of this report and is not suitable for the site.
(3)	(3) Development consent must not be granted for development specified for the purposes of this clause on land to which this clause applies unless the consent authority is satisfied that the development— (a) is unlikely to adversely impact on existing groundwater sources, and (b) is unlikely to adversely impact on future extraction from groundwater sources for domestic and stock water supplies, and (c) is designed to prevent adverse environmental impacts, including the risk of contamination of groundwater sources from on-site storage or disposal facilities.		
(4)	The following development is specified for the purposes of this clause—		
	(f) rural industries,		The proposal is a ‘rural industry’ and therefore needs to assess the impact on groundwater. As per Section 7 of this report the proposal generates an adverse environmental impact.

6 Current Approved Development Surrounding Site

Development Consent on Adjoining Property at 1795 Oura Road, Oura

On 10 April 2008, Council approved DA07/0581 for a proposed rural subdivision of the property at 1795 Oura Road, Oura. The property adjoins the subject site of the proposal. The approved subdivision to create 6 x 200 hectare allotments, 4 x 4 hectare allotments and 1 x 7 hectare allotment.

On 15 July 2010, Council approved a modification application ADA10/0028 to the approved development DA07/0581 for relocation of allotments 10 and 11. Refer to the Figures 13 and 14 in this report for the approved stamped plans.

The approved development has physical commencement and is in operation. The DA is subject to a staging plan and will be realised accordingly.

Farm Stay Accommodation

The property at 2063 Oura Road, Oura immediately to the north of the subject site, of the proposal has been granted consent for a farm stay accommodation / guest accommodation. The approved development DA22/0458 includes construction of five safari style accommodation tents. Refer to the map of the site subject to the approved development DA22/0458 at Figure 15 of this report.

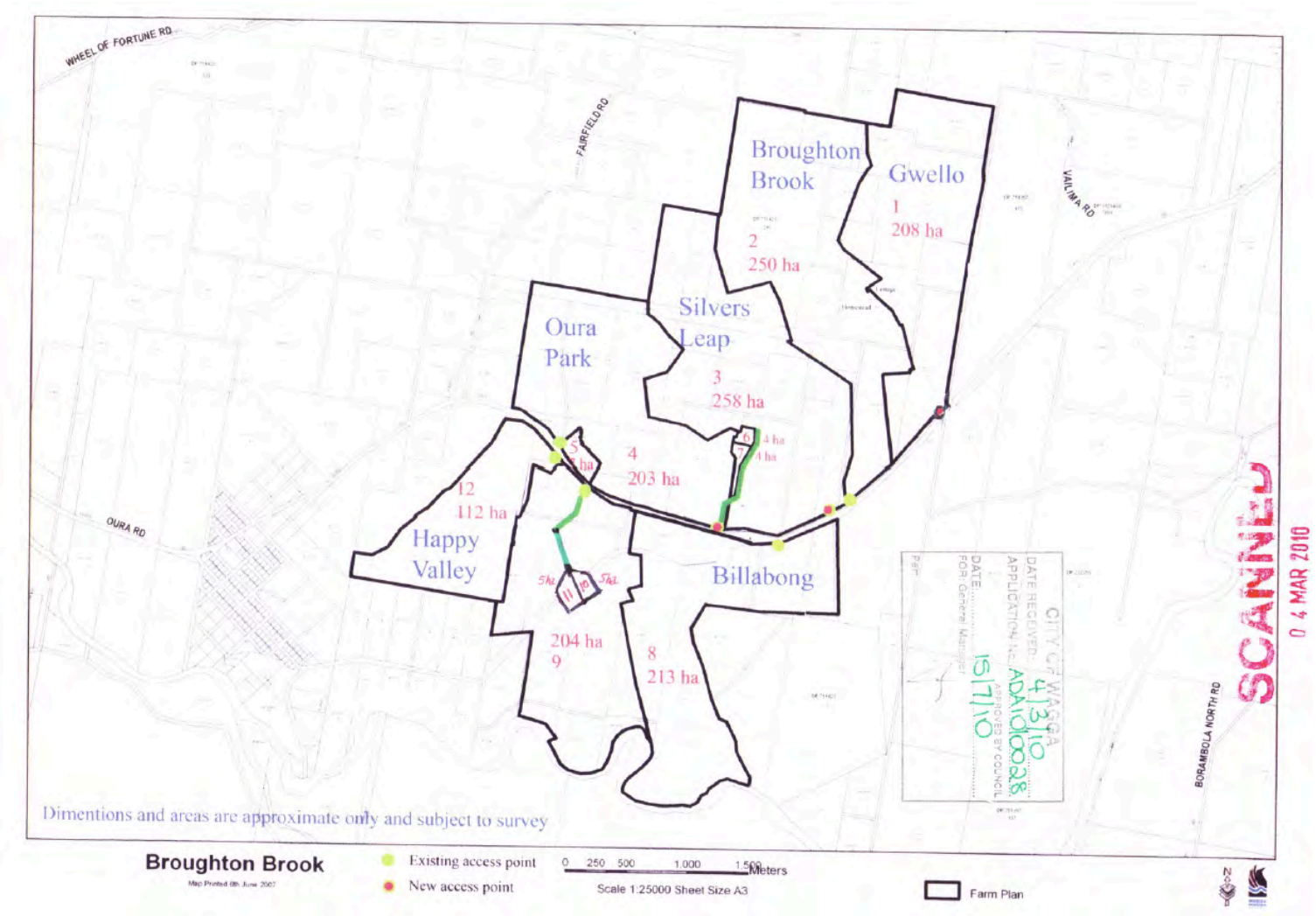


Figure 13. Approved Development ADA10/0028

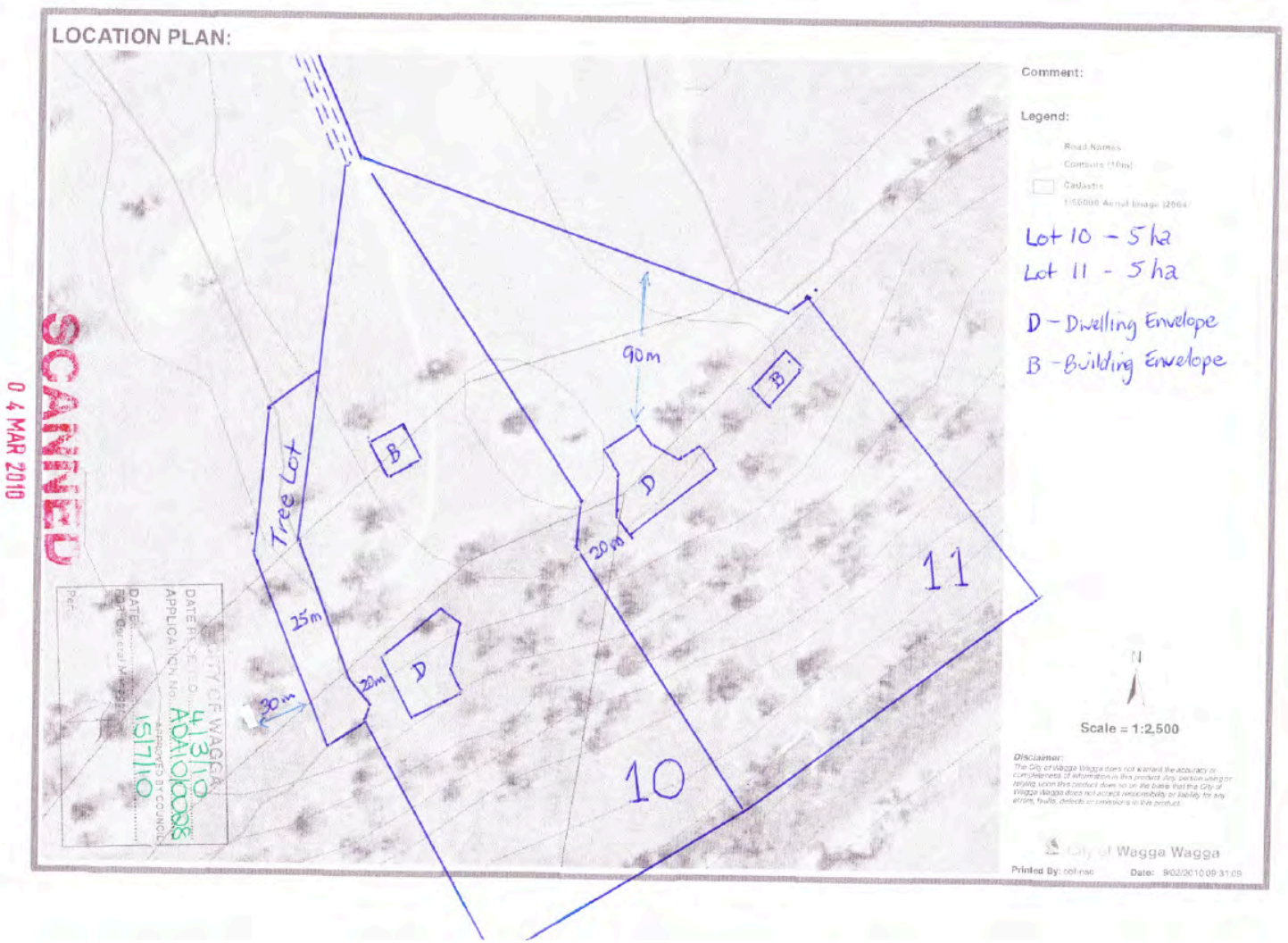
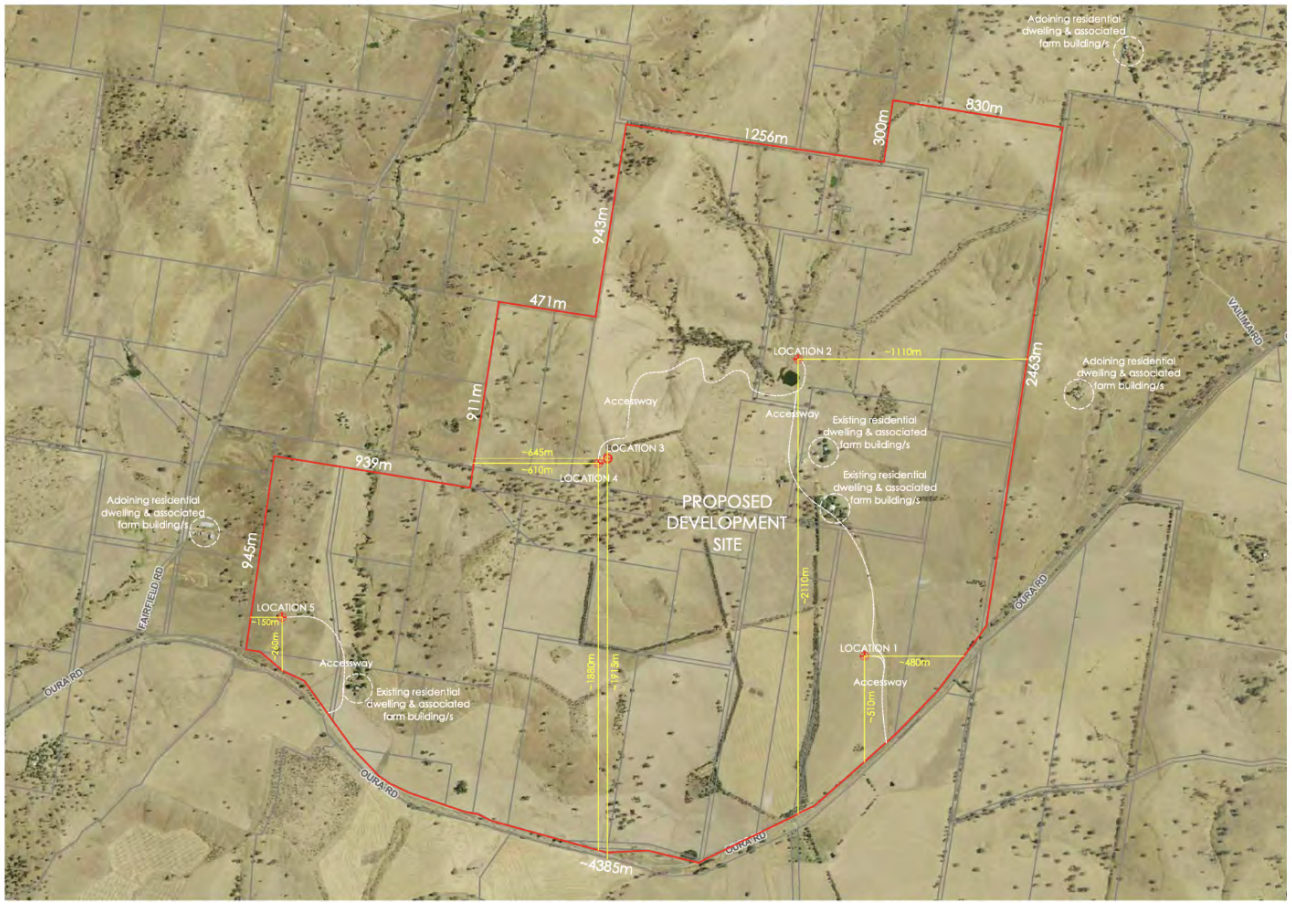


Figure 14. Approved Development as Modified under ADA10/0028



Area: 883ha

Vegetation: Scattered/sparse as indicated (typical seasonal)

Buildings: Existing buildings noted

Adjoining: Building/s on adjoining stites are of typical agricultural land use

View: SATELLITE IMAGERY OVERLAY

Project: PROPOSED SITE DEVELOPMENT

Client: Brunslea Past Co.

Address: 2063 Oura Road
Oura NSW 2650

DRAWING TITLE: SITE PLAN
DRAWN: 02.12.2022
SCALE: 1:20000 @ A3
DIMENSIONS: metres
DRAWN BY: AA/CW
PROJECT NO: SP21073
SHEET NO: 2 of 13
DRAWING NO: 21073-2
REVISION: 5

salvestroplanning
innovation . sustainability . excellence

SALVESTRO PLANNING
16 Fitzmaurice Street
Wagga Wagga NSW 2650

T: 02 6921 8588
E: admin@salvestroplanning.com.au
W: www.salvestroplanning.com.au

Document Set ID: 5803207
Version: 1, Version Date: 23/02/2023

Figure 15. Approved Development under DA22/0458

7 Environmental Assessment

This section addresses the key environmental impacts of the proposal and the heads of consideration under Section 4.15 of the Act.

7.1 Environmental Issues

The section provides an assessment of the key environmental issues related to the proposal. The ORP's key concerns with respect to environmental issues associated with the proposal, include:

1. Close proximity to the floodplain, lagoons and Murrumbidgee River;
2. Poor design next to existing infrastructure increasing environmental risks;
3. Official environmental listing confirming the fragility of the area;
4. The impact of the Reconnecting River Country Program; and
5. Planning concerns.

Each of the above concerns is discussed in each section below and can be cross referenced visually to the Site Conceptual Model (SCM) at Figure 16 of this report.

7.1.1 Close to the floodplain, lagoons and Murrumbidgee River (see Site Conceptual Map (SCM)

The Murrumbidgee River is approximately 1,500m from the proposed site. The lagoon system that feeds from the River around and through the flood plain, and returns to the river, is much closer, being approximately 800m from the proposed site. The lagoon system (wetlands) is not mentioned in the proponent's EIS or reports, which are premised on the nearest waterway being 1,500m away (Murrumbidgee River).

The lagoon system is extensive and at its most northern point begins at the edge of the proponents centre pivot irrigation area, at the junction of Sandy Creek (as it is locally known).

Sandy Creek has about an 3,300 hectare, or 33 square kilometre catchment to the North West from the upper Fairfield area. The EIS describes it as an unnamed non-perennial watercourse (p62). Sandy Creek is non-perennial above ground, and last year eroded a 4m deep gully on Broughton Brook (property to the north west) (refer to report at **Attachment 1** of this submission) from the volume and velocity of flow in storm events. However, Sandy Creek does flow perennially at a subterranean level (known from a constructed turkeys nest on the edge of Sandy Creek that has not dried up in 40 odd years) and this flow is likely to intersect with the perched water table (interflow) as reported by McMahon (refer to report at **Attachment 1**).

Figure 16. Site Conceptual Model

Consequently, any site contamination that percolates into the soil profile either from effluent pond seepage or general infiltration, is likely to find it's way into the interflow area and move horizontally through the soil profile to Sandy Creeks' subterranean flow and the lagoon system it feeds. Interflow can also return to the surface as overland flow as elevation and relative incline decreases. (Note: the lagoon system (wetlands) and Sandy Creek area is listed as a high potential groundwater dependent ecosystem (GDE) (see GDE discussion in Section 7.1.5 of this report and **Attachment 5**).

The lagoon system is currently loaded (full of water) and is likely to be loaded and flowing more frequently in future as a result of the intermittent low level flooding proposed under the State Governments Reconnecting River Country Program (RRC), as part of NSW's contribution to the Murray Darling Basin Plan (MDBP) (see RRC discussion in Section 7.1.6 of this report).

Consequently any contaminants/pollutants that make their way into the lagoon system will be more easily and frequently transported into the GDE and downstream to the Murrumbidgee River, and Oura Beach. Consequential risks of this include blue green algae formation (refer to report at **Attachment 1**), which could affect the health and well-being of people using the lagoons, river and Oura Beach (a popular recreation area for the tourists, Oura residents and Wagga residents).

7.1.2 On land with unsuitable soil formations for the kind of development proposed

Site and mapping (land and geology) reviews have been undertaken by ORP experts, along with soil pits, soil assessment and laboratory analysis. The latter has been on land adjacent to the proposed site that can be described as having the same soil, geology, landform and hydrology (refer to report at **Attachment 1**). The conclusion of this work includes the following information.

a) Soil

Soils are mapped as having severe limitations for high impact land uses such as an abattoir and feedlot (refer to report at **Attachment 1**). Specifically:

"*… sodic soil that has been subject to mass movement, with buried horizons, and waterlogging. Salinity measurements are also concentrated in the top of the soil profile indicating an impeding layer that reduces infiltration and increases displacement of salts and nutrients via interflow and overland flow. Local lateral flow of shallow groundwater and interflow in the near surface was also observed (see Attachments A, B, C & D). These soils are likely to occur with a high level of confidence directly down gradient of the abattoir site owing to the same geology and landform"* (refer to report at **Attachment 1**, page 2, point 6, item ii).

b) Surface water

Further to soil unsuitability, slope (see SCM and point 3 below) and poor site design with existing infrastructure (see point 4 below), there is also risk of surface flow of contaminants from inaccurate water balance management, of what is already described as a high nutrient load (see Paradice advice at **Attachment 4** of this report). This risk of over irrigation and waste water dam overflow in times of wet weather and storm events, could lead to overland flooding of wastewater pollutants (refer to report at Attachment 1, page 3, item b(i)) along with feedlot untreated water pollutants (see Paradice advice at **Attachment 4** of this report).

These concerns are likely increased in times of high episodic rainfall events (refer to report at **Attachment 1**, page 3, item b(ii)) occurring more frequently and of higher intensity due to climate change. This is further increased by the infrastructure, slope, soil type and groundwater interflow providing a direct pathway to the lagoon system.

c) Groundwater

As previously discussed above (a. soils), groundwater is vulnerable to contamination from the site and will also be a likely transmitter of pollutants, given the perched/interflow water table indicated moving horizontally across the area.

The nearest bore, approximately 1,200m to the west-nor-west of the site has a recorded standing water level (SWL) of 7m, and is likely higher in recent wetter than average seasons. This bore 40WA416489 is not mapped nor reported in the proponents EIS or reports.

This SWL further confirms the shallow water table in the whole area and the ease to which it can be contaminated, as well as transmit contaminants to other receiving areas in the environment and ecological system.

Deficiencies in the proponents groundwater assessment are clearly demonstrated by the fact that the maximum depth of any piezometer is 4.2mBGL and not a single piezometer was constructed to 12mBGL (or into groundwater at lesser levels) as would be standard practice (refer to report at **Attachment 1** and Paradice advice at **Attachment 4**).

The importance of the ecological risk is shown by the area being listed as a high potential GDE on the Bureau of Meteorology's (BOM) Groundwater Atlas, as mentioned previously (see discussion below and BOM GDE Atlas map in **Attachment 5**).

This has not been fully or reasonably considered by the proponents expert report which uses a selective data set to minimise the area of high potential GDE considered (refer to the OzArk GDE map, extracted here as **Attachment 6**).

7.1.3 Sited on sloping land that drains west to lagoon system and floodplain receiving environment (see SCM)

The following is apparent regarding the slope of various parts of the site and surrounds:

- Abattoir average slope 5.5%;
- Solar array average slope 8.3%;
- Effluent irrigation area average slope 6.0%; and
- "Drought" feedlot area average slope 8.1%.

  (refer to Paradice advice at **Attachment 4** and Appendix C of the advice, regarding effluent and drought feedlot slopes)

Consistent with the above, the land shows evidence of "mass movement" (i.e. soil material moving downslope) historically over time, as shown be the geological soil profiles (refer to report at **Attachment 1**). Consequently this will continue and/or be exacerbated by the construction of infrastructure on this sloping land.

We say exacerbated because of the construction of additional hard surfaces (sealed roads, carparks, roofs, paths and solar array) increasing the flow and velocity of run-off and reducing the opportunity for infiltration into the soil profile. That increased flow and velocity will not only increase the carry of pollutants down slope, it will also increase the likelihood of erosion, either surface or subsoil 'piping', or both (refer to report at **Attachment 1**).

Issues with run-off and erosion from the two solar farms located at Trahairs Lane and Windmill Lane, Bomen, have been reported by impacted neighbours and highlights the point above. We note and refer you to point 4, below, with regard to effects of the infrastructure (proposed and existing) on this sloping land.

7.1.4 Poor design next to existing infrastructure increasing environmental risks (see proponents site map and SCM)

The feedlot area has over time has been described as a "Feedlot", a "Drought Lot" and more recently in the EIS as "Containment Area". This apparent change in terminology seems to downplay the significance of this infrastructure next to the proposed abattoir in the development application.

These inconsistent descriptions leave it unclear how that aspect of the applicant's operations can be taken into account in the context of this proposal. ORP is of the view that it is a relevant and an important factor (also discussed in Paradice report at **Attachment 4**).

We note the "Drought" Feedlot appears to have been used in March 2023, October 2023 and January 2024. This indicates a pattern of use at different times of year and confirms our concerns of contamination risk from the feedlot as it has been and likely will continue to be used in the future.

We note the following factors leading to increased contamination risk for the surrounding land and waters, including the cumulative impact and commingling with effluent irrigation and any effluent treatment pond overflow:

a) Excessive slope of feedlot

"The feedlot slope from bunk-line to back gate appears to be about 8% (refer Figure 1) which would provide runoff and possible entrainment of manure in most rain events over 5mm in one day. The National Guidelines for Beef Cattle Feedlots (MLA 2012) specify that … to ensure that pens drain quickly after rainfall, but that runoff is not so rapid that it scours excessive amounts of manure from the pen surface, the downslope gradient in all new feedlot pens should be between 2.5 and 4%" (refer to Paradice advice at **Attachment 4**),

b) Location of proposed effluent irrigation area below existing feedlot

This is further exacerbated by the location of the effluent irrigation area below the feedlot, which can increase the nutrient load to the irrigation area and commingle with the treated effluent (to standard or below). This could also lead to increased run-off of untreated faeces and urine from the feedlot over the irrigated effluent area which could already be wet from irrigation.

There appears to be no effluent catchment for reuse, only a contour transfer for any run-off from both areas to the dam located to the north/west of the abattoir building complex. This means that treated effluent and untreated water containing faeces and urine from the feedlot will end up in that dam where it is at risk of percolation into the subterranean perched water table that is an interflow horizontally across the landscape to the riverine area (we refer to point 1) and groundwater generally. This dam is not fully described or assessed in the Applicant's EIS.

Additionally, in extreme storm events (see Martens Flood Impact Assessment models, particularly FL09 and FL17 (shown in Figure 17 and Figure 18, respectively in this report), as extracted from the Flood Impact Assessment), the untreated effluent from the feedlot will be washed over the contour banks that would normally direct flow to the dams, as well as over the aerobic and anaerobic treatment ponds, to the riparian receiving environment of lagoons, GDE and ultimately the River (as shown in Martens report of storm modelling). This flow will be further aided by wet soils in-between the effluent irrigation area and the lagoon system from pivot irrigation (continued in point c below).

c) Location of existing pivot irrigation area is below the effluent irrigation area (and existing feedlot)

As can be seen in all the maps and images, there is an irrigation area directly below all the proposed and existing infrastructure, the location of which in relation to proposed infrastructure and the landscape has not been specifically noted the proponents EIS or reports.

We have been told during consultation that the proponents current and planned farming program is the growing, irrigating and grazing of summer grasses (C4 pathway species) in this area. This effectively means that the irrigation area is likely to be wet throughout the year. In the summer via irrigation and in the winter via natural rainfall combined with low evapotranspiration rates.

Consequently any run-off of treated and untreated effluent (via feedlot, irrigated effluent and treatment pond overflow) that reaches the irrigation area from upslope, will naturally and easily make it's way over the surface to the lagoon system, GDE, the River and the groundwater, and potentially recreation areas along with drinking water bores at Oura (5km approx.) and Goldenfields (10km approx.).

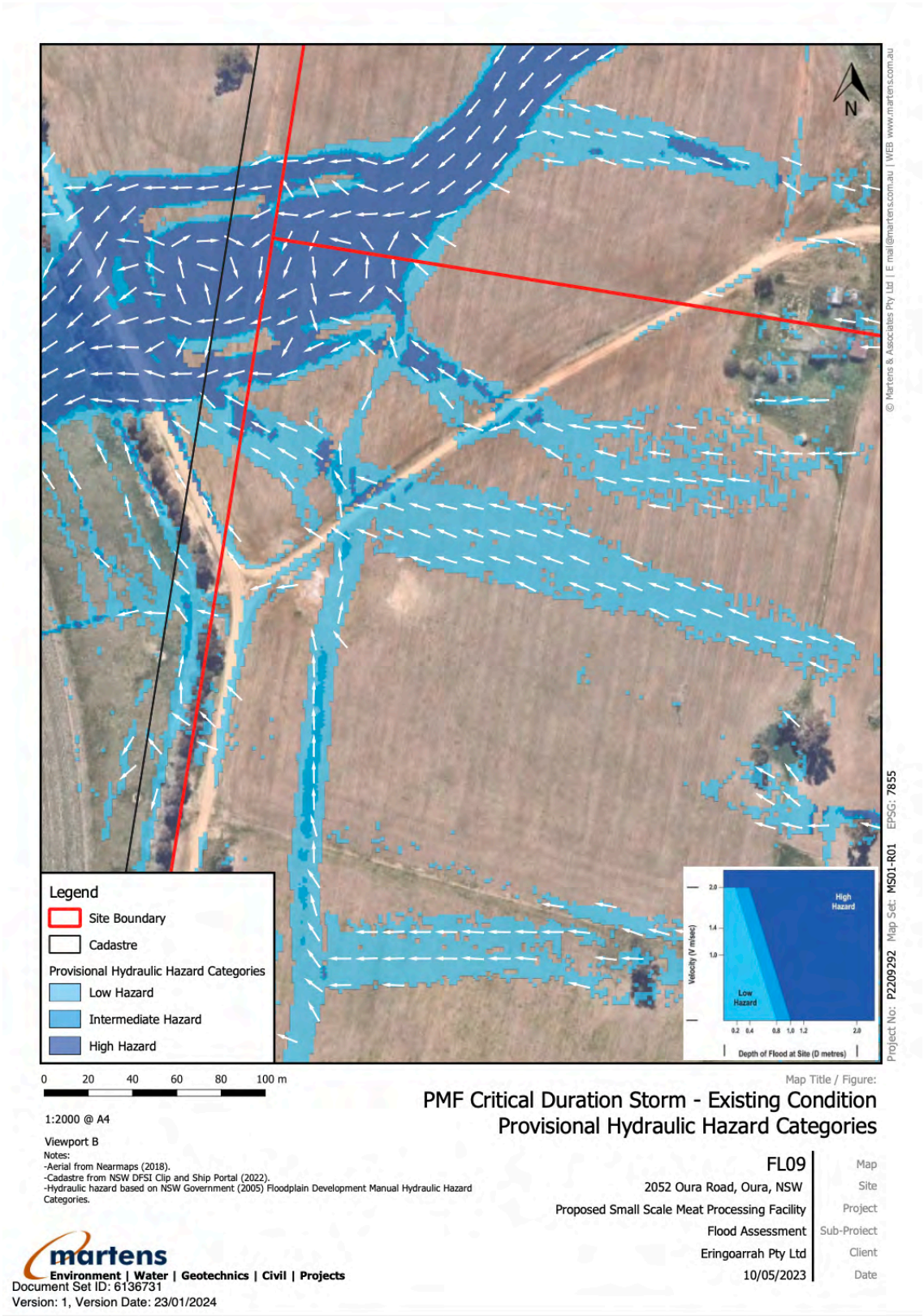


Figure 17. PMF Critical Storm Existing Conditions (*source: extract from Flood Impact Assessment*)

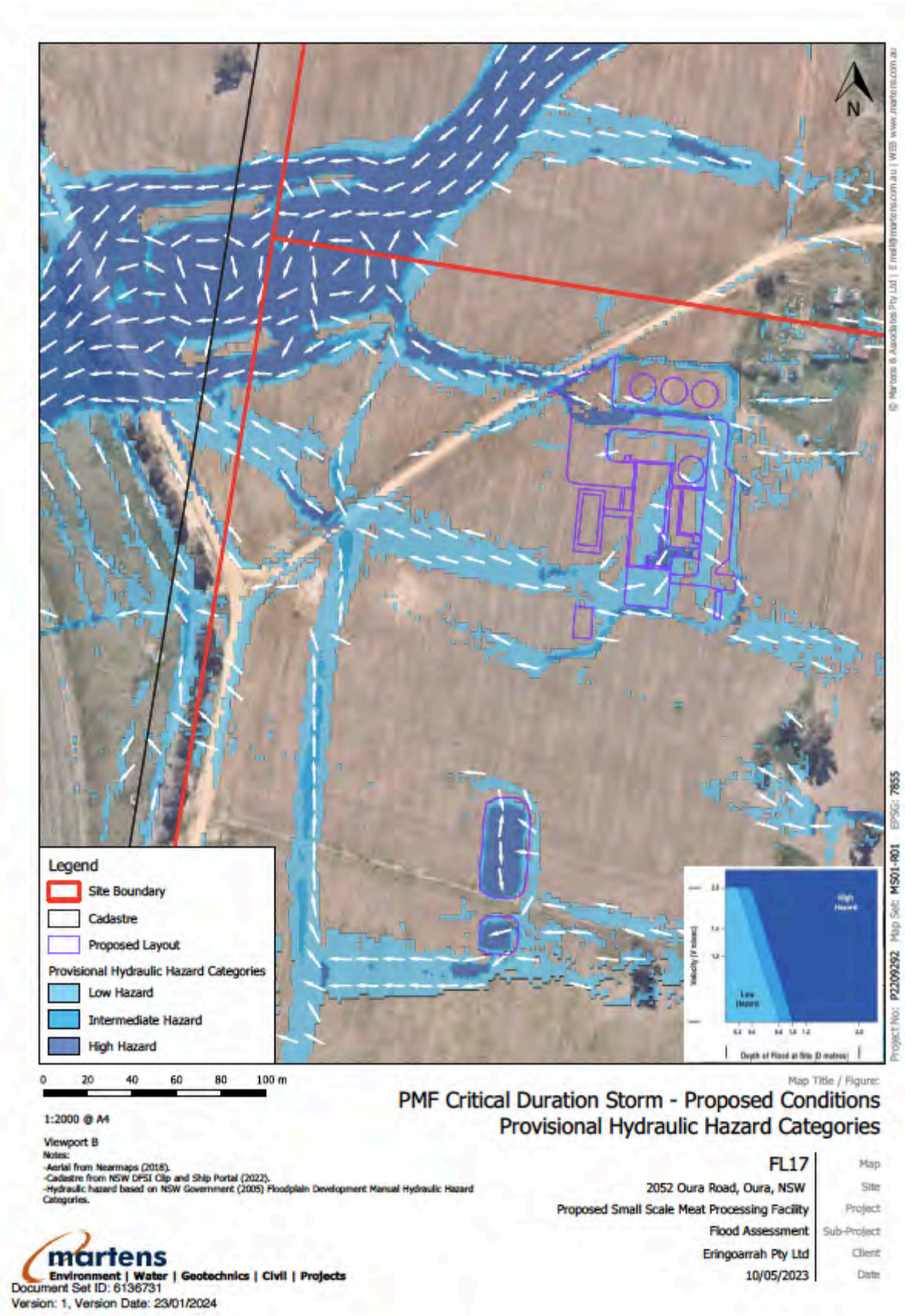


Figure 18. PMF Critical Storm Future Conditions (*source: extract from Flood Impact Assessment*)

7.1.5 Official environmental listings confirm the fragility of the area

Listings acknowledged in the proponents EIS and expert reports include the following:

- Groundwater Vulnerable;
- Flood Sensitive;
- High Potential Groundwater Dependant Ecosystem;
- Protected Riparian Land (not in current legislation); and
- Key Fish Habitat.

We add a listing not included in the proponents reports:

- Endangered Ecological Communities (EEC).

The proponents mentions these listings and we are emphasising them. The listings indicate the fragility of the environment and therefore the significance risks this proposal carries, requiring greater caution and rigour in assessing the proposal than is evident from the EIS.

The Murrumbidgee River is listed as an "Endangered Ecological Community" from Burrinjuck Dam to its Murray River junction. This listing gives a higher level of protection and a higher level of scrutiny for protecting the ecology and so gives all species inhabiting the area the same status as threatened/endangered species as under a Key Fish Habitat listing (which is also present).

The Wagga Wagga Alluvial Groundwater Source is listed as "Groundwater Vulnerable" to protect the water of the communities that rely on it, via Riverina Water (refer to **Attachment 7** for network maps) and the Goldenfields water system. It is also listed as an "At-risk" water source by WaterNSW and, as such, requires protection from excessive drawdown and contaminated recharge (see Goldenfields Supply Area map in **Attachment** 8 of this submission).

The NSW Environmental Planning Instrument for Groundwater Vulnerability states;

"shows the vulnerability (or level 4 of risk) of aquifers to contamination relating to physical characteristics of the location, such as the depth to the water table and soil type."

We have addressed these two specific risks (water table and soil type) directly and, of particularly relevance, is the interflow water (flowing below and above surface) moving horizontally through the landscape at a subterranean level, combined with perennial subterranean flow from Sandy Creek and the neighbouring bore with SWL 7m. This has also been under-investigated by the proponents with piezometer depths, which are too shallow as discussed (refer to section 7.1.4(c) in this report).

"Flood Sensitive" listing of the area is not in question and the proponents mapping shows 1% Annual Exceedance Probability (AEP) (i.e. 1/100 years) flood event with flood waters within about 200m of the site.

However we question, with well researched and reported increased volatility (i.e. variance to mean) of storm events as climate changes, if 1% AEP (EIS p64) is adequate.

Not so according to Queensland's Chief Scientist who states, *"Good Planning needs to consider more than just 1% AEP flood"* (https://www.chiefscientist.qld.gov.au/publications/understanding-floods/chances-of-a-flood).

The likelihood of these higher impact events is also more probable, given RRC programmed regular low level flooding which could happen prior to, or concurrently with, a major storm or flood increasing the scale and impact of that flood event.

"High Potential GDE" have been discussed (refer to sections 7.1.2(c) and 7.1.4(c) in this report) as mapped on Bureau of Meteorology's (BOM) Groundwater Atlas. Mapping clearly shows a relatively large area down slope in and around the lagoon system, as well as other areas of GDE closer to the proposed site (refer to the BOM Atlas map in **Attachment 5**).

While the GDE area is covered by farm/grazing land and may not have a significant population of terrestrial groundwater dependant flora or fauna, this does not mean the area is not in need of assessing or protecting from risk of contamination and degradation. For the following reasons:

- It is well reported that there are aquatic organisms such as invertebrates and crustaceans that rely on GDEs, that may be present;
- Intermittent grazing may allow dependent species to repopulate during spelled periods, given the micro-climate, habitat and landform;
- During droughts, when groundwater is most vital to dependant species, stocking rates are naturally lower, reducing grazing and trampling pressure, while the impact to the environment from nutrients and salts is higher; and
- Land use may change in future, changing the habitability of the GDE area for flora and fauna.

We suggest that an on-site assessment be made of the GDE areas close to and down slope of the proposed development site to ensure the value of, and opportunity to protect this high potential GDE is properly considered.

"Without a clear idea of how the groundwater moves, the proponents cannot rule out the impact on the floodplain and river because the soil in the riparian zone is very porous. The interface between the soil in the riparian zone and the river water is a zone of great productivity. Many immature invertebrates actually spend time in those porous areas, e.g. the gravel or fine sand, where water gently moves through. This water brings food and removes biological waste products produced by the invertebrates.

With the potential for high nutrients and goodness knows what contaminants entering this zone, either through ground water intrusion or directly through infiltration, the water in these porous areas will degrade. For example, an increase in nutrients will change the biofilm composition and clog the important interstices that the invertebrates live in.

Biofilm is an important part of the food chain and accumulates on hard surfaces. It is a combination of many different living organisms, mostly species of algae. This is eaten by some invertebrates and vertebrates. If there are high nutrient loads or toxic contaminates in the water, the biofilm composition changes. In the case of excessive nutrients the biofilm tends to support more filamentous algae that is not as desirable for invertebrates as other algae, such as diatoms.

The immature invertebrates mature in this zone, then enter the water column where they become important food for fish, birds, mammals and other larger invertebrates. Some of these larger invertebrates, e.g. Murray Crayfish, and vertebrate species, e.g. Trout Cod, are of course endangered. Like the biofilm, the immature invertebrates in the interstices will be impacted by contaminates or excessive nutrients and therefore change the dynamics of the food cycle in the Murrumbidgee River."
(Dr Patricia Murray, Aquatic Ecologist)

"Protected Riparian land" considered planning controls, native vegetation and land stability and is not part of current legislation, as we understand.

The Murrumbidgee River, along with many of the rivers, streams and lagoons that flow to and from it, is a protected "Key Fish Habitat", under the Fisheries Management Act. This protective listing maps areas of threatened and endangered species and this area include:

- Murray Crayfish; and
- Trout cod.

However, as mentioned, all species in an endangered ecological community area have the same level of protection.

Finally these listings, and the environmental factors they refer to, are interlinked and so interrelationships between them needs to be considered in any assessment.

7.1.6 Reconnecting River Country Program (RRC)

The RRC program of regular low level flooding, will increase the rate and likelihood of transmission of contaminants downstream, further exacerbating the risks and impacts. It is our understanding that the RRC flood modelling is not yet complete and may not be used by agencies (EPA, DPE Biodiversity Division etc.) to assess the contamination risk of this project. We ask, if our understanding is correct, why this pending resource would not be utilised, in the application of the precautionary principle.

The RRC program will also need to address the additional cumulative contamination risk and impact from other industrial type sites up and down stream that will be inundated from programmed flooding. It is our understanding there are at least twelve industrial type sites operating, approved or proposed on or near the Murrumbidgee River between Gundagai and Wagga. These activities are concentrated at the Gundagai and Wagga ends of the river, whereby the corridor between these activities includes tourism activities.

Any assessment of the development application needs to include RRC flood modelling and the cumulative impact of any transmission of contaminants from the industrial sites located near or close to the River and lagoons between Gundagai and Wagga Wagga.

7.1.7 Planning Comments

As already assessed earlier in this report and as related to the environmental issues raised in this submission, the proponent's Environmental Impact Statement for Designated Development (EIS), Section 2.2.6, refers to the Riverina Murray Regional Plan 2036 and highlights "Goal 1: a growing and diverse economy", out of four goals. We highlight the clear applicability of Goal 2 of said plan, which refers to also supporting a healthy environment with pristine waterways.

The same section mentions the Wagga Wagga City Council local Strategic Planning Statement (WWCC Statement) and the encouragement for growth. However it was not mentioned in the report that WWCC Statement also recognises the need to consider environmental matters and the need to refer to their biodiversity strategy. Page 23 of WWCC Statement acknowledges that economic growth places increasing pressure on the natural environment, therefore a balanced growth is needed that also considers the environmental impacts.

The EIS has not considered The Directory of Important Wetlands in Australia. The mid-Murrumbidgee wetlands are considered wetlands of national importance and the floodplain wetlands on Eringoarrah are part of those wetlands. We again note that the mid-Murrumbidgee is listed as an "Endangered Ecological Community". This listing gives a higher level of protection and a higher level of scrutiny for protecting the ecology and so gives all species inhabiting the area the same status as threatened/endangered species as under a Key Fish Habitat listing.

7.1.8 Conclusion - environmentally inappropriate location

Effectively the layout of the proposed and existing infrastructure, given the location, terrain and geology, coalesces the whole project area into a single transmission site to the receiving environment. Naturally, it is our clear conclusion that this entails great risk, and the EIS is inadequate in this regard.

Further to specific site defects discussed, official regulatory listings identify the fragility of the local environment. These listings are legislated to protect the land, water and ecosystems of the area from the impact of inappropriate development which, when 'overlaid' to site specific defects of the proposal, shows yet another level unacceptable impact.

Then, a further 'overlay' on top of both site specific defects and local area fragility, is the programmed regular low level flooding by RRC, which will increase the likelihood, impact and transmission of any contaminants and pollutants that make their way to the lagoon system. Regarding the additional and possibly significant risk from RRC programmed flooding, any approval should not be considered prior to the RRC flood modelling being completed, so the degree of risk and extent of possibly impacts can be accurately assessed for the proposed development.

The importance of delay of any further assessment to include this modelling is underscored by the recent and serious PFAS contamination entering Wagga Wagga's drinking water aquifers close to bores. This includes the risk and impact from inaccurate modelling, given PFAS contaminants reached Riverina Waters' drinking bores in two years and not the forecast fifty years.

It is clearly evident there are no number of conditions of consent that could be placed on this development application that would adequately address, and mitigate, the level of environmental impact this proposal will have on the landscape, ecosystems, farmland and community. Especially, given the combined risks and impacts of the soil type, slope, infrastructure, wet soils and sensitive receiving environment.

There is no doubt in our minds, or those of our experts, that the precautionary principal must be applied when considering whether or not to approve this development application due to these site specific risks, local area risks and changing water management under RRC.

We raise all of the concerns above for your specific attention, and suggest more broadly that the deficiencies in the EIS, indicate a lack of scientific rigour behind that document, and behind the proposal that the EIS purports to support. Some of the more significant of these deficiencies are:

- A failure to consider the lagoon system at all, and the failure to adequately consider Sandy creek, in the context of risk to waters and the Murrumbidgee River;
- A failure to identify and assess the area as an endangered ecological community;
- Deficiencies in the proponent's groundwater assessment; and
- Compounded by a failure to genuinely consider the impact of all of the infrastructure on and around the site (i.e. the existing feedlot and irrigation, and this proposal) together.

For the reasons discussed in this letter, we are of the view that the proposal should be refused. We request that your due consideration be given to the concerns raised.

7.2 Traffic Issues

7.2.1 Survey Data and Traffic Intensification

A Traffic Impact Assessment Report prepared by PDC Consultants supports the proposal. Section 2.4 of the report and in particular Table 4, identifies the existing traffic generation from the site. It is noted that Table 4 identifies a total of 26 trucks, hence 52 truck movements in-bound and out-bound from the site, for B-double and semi-trailer trucks. This section of the report also states:

"All but two (2) of the line items presented in Table 4 will continue as presented following approval of the DA; the exceptions being the B-double and single semi-trailer trips associated with the sale of cattle, which would not be required upon completion of the abattoir."

Further clarity and commitment is required from the Applicant on the total number trucks that would be expected to access (exit and enter) the site. While the Applicant states that the no trucks would be required to access the site that are associated with sale of cattle, there isn't any commitment from the Applicant with respect to restricting trucks to bring cattle to the site for slaughter.

In order to achieve the Applicant's vision for a 'sustainable' and 'environmentally friendly' abattoir, a commitment is required from the Applicant in relation to this point and would require Council to impose either a condition of consent on the proposal, or a restriction by way of a covenant on title, to ensure that truck movements would not be increased to and from the site that would also contribute to the intensification of the facility beyond what is proposed.

Chart 1 in Section 2.5.1 in the traffic impact assessment report shows the average two-way traffic volume throughout the day, for every hour, as an average of the weekday and an average over all seven days in the week. The assessment in the report states:

"The average weekday and all-days two-days traffic volume on Oura Road at the site frontage are illustrated by Chart 1, which demonstrates that two-day traffic volumes along Oura Road at the site frontage are extremely low, peaking at an average of 44 vehicles at 7-8am and 4-5pm, or one (1) vehicle every 82 seconds."

Interpreting Chart 2 on page 11 of the traffic impact assessment report, with the associated assessment found that the total number of vehicles counted at the frontage of the property over a seven day week were 538 vehicles.

The above assessment does not identify the total number of vehicles surveyed per day and report does not include the detailed daily survey counts, so that they can be checked for reliability.

Further, the report states that the 'traffic survey' was undertaken in December 2022 over a seven day period (7) but the actual survey period is not identified. It is unknown if the survey period included Christmas, public holidays and school holidays, and whether it is a true and accurate account of the total number of vehicle movements in the peak periods of the year. Also, the data is a year old and should be updated.

Section 4.4 of the report assesses the proposed service vehicle traffic generation, while Section 5.1 of the report provides an estimate of the employee traffic generation. With respect to service vehicles, the report states:

"The additional service vehicle traffic generation of the proposed development is expected to be very low, with approximately one (1) truck visiting the site per day (14 inbound + out bound movements per week)."

However, the above assessment does not assess the traffic generation of all service vehicles on the site, in combination with Table 4 in the report.

Therefore, it is incorrect to say that the additional generation is low when there is no clarity on the total number of trucks that would be expected to enter and exit the site. As discussed earlier on this page, a firm commitment is required from the Applicant and Council should also impose the necessary restrictions on the site and proposal, by way of a condition of consent, or covenant on title.

In relation to employee traffic generation, the report again ignores Table 4 in assessing the cumulative traffic generation by employees. Table 4 in the report clearly shows that the existing employee traffic generation is 140 trips per week, or 20 per day. The proposal increases the employee traffic generation with an additional 24 trips per day, or by an equivalent 120%.

Moreover, the report does not capture a full and accurate account of all existing traffic generation on Oura Road, which include all passenger vehicles, vehicles towing caravans & boats, motorhomes / recreational vehicles, motor cyclists and cyclists. The mix of vehicles is extraordinary due to Oura Road being a favourite tourist route, while also being a designated stock route. This designation allows land owners to use Oura Road to move livestock.

It is evident from the traffic report and provided data that the traffic generation and intensification from the proposal is very high. The report has not satisfactorily assessed the cumulative impact of all existing traffic generation versus the traffic generation from the proposal and site. It is requested that that Applicant undertake further assessment, including additional traffic surveys to be conducted in peak periods of the year, which are not impacted by public holidays and school holidays, and also include an accurate account of all large heavy truck movements to and from the site. This report needs to clearly show the total number of vehicles using the Oura Road before and after the proposal.

7.2.2 Traffic Intensification Impact on Safety and Cost to Maintain Road

The high increase in the traffic generation by the proposal and intensification of uses on the site does not take into account the existing Oura Road conditions and other active users of Oura Road. In particular, the intersection of the Oura Station entrance and Oura Road is a School Bus Stop, used daily during school terms for am pick-up and pm drop-off. This school bus service is a government paid transport service used by school aged children living along Oura Road.

With respect to the road conditions, the Oura Road existing conditions at the site entrance are a risk for all vehicles travelling at 100km/h or above. The existing conditions include:

- Narrow traffic lanes;
- Large and narrow culvert;
- Blindspot for traffic travelling east to west;
- Broken away edges;
- Pot holes;
- Narrow steep soft verges;
- The sealed road surface generally uneven;
- Winter months can be foggy with reduced visibility; and
- Sunshine glare in both directions, Am to east or PM to west

Refer to **Attachment 9** of this report for photographs of the existing road conditions.

The existing conditions of Oura Road, as shown in the photographs in **Attachment 9**, are described in this section of the submission.

Figure 1.Oura Road and Culvert

The photograph shows on both sides of Oura Road the water course and that the verge is a steep, grassed sandy soil ditch. The gravel road edge is narrow and soft in wet weather.

The road surface is uneven with numerous filled pot holes that after rain fill with water. They are a hazard and drivers try to avoid them.

The traffic lanes are narrow. The width of the road is variable, 6.40 meters wide or less as the bitumen road edges are broken away. The culvert under Oura Road takes the flow from Sandy Creek from the north under the road. The volume of water coming from the north west (Sandy Creek) and the property to the east varies depending upon the rainfall. During a single storm event in 2022 Sandy Creek developed 4m incised erosion, the road drains filled with sand and the water flowed over the road.

For the road conditions to be viable for all vehicles to turn safely at the entrance requires a turning lane for vehicles from both directions. There is no room given the current road width for trucks and cars to avoid vehicles stopped and waiting to turn into the Oura Station entrance to the proposed site.

The stopping distance from the culvert to the entrance is only 140 meters. The safe stopping distance of vehicles varies depending upon – size & weight, weather conditions, road surface conditions, speed and mechanical condition of vehicle.

Figure 2. Oura Road blind spot

This blind spot east of the Oura Station entrance is on a curve after the road comes off a downhill section of the road. Drivers use this section of road as an overtaking opportunity after coming up over the hills from Wantabadgery. Traffic travels at 100 to 110km/h or more on this part of road.

The blind spot is exacerbated by a slight rise in the road further reducing vision.

The Oura Station entrance is also a school bus stop for morning pick-up (south side) and afternoon drop-off (north side) of the road. Another property entrance on the north side of the road is shown by the tall poplar tree.

Page 19 and figure 5 of the Applicant's Traffic Impact Assessment Report (refer to Figure 19 in this submission with comments added by the ORP), states:

"*Sight distances along Oura Road are excellent, given the road's generally flat and straight alignment at the driveway location as illustrated by Figure 5, ensuring sight distances of at least 350 metres are achieved in each direction which far exceeds the requirements of AGRD04A and AS 2890.1."*

According to the measurements the ORP has taken shown in Attachment 3 and the image below, these sight and safety distances would seem incorrect.

Figure 5: Sight Distance Diagram

Figure 19. Site distance diagram (*source: Traffic Impact Assessment with ORP comments*)

Figure 3. Safety Concerns

The photograph is taken looking west on Oura Road just beyond the blind spot curve. An unbroken line on the road surface indicates a no overtaking zone – the blind spot. Also, the broken away edges of the sealed roadway.

Figure 4. Safety Concerns

This is the roadway width shown east of Oura Road Station entrance. The width measurement of the sealed roadway is 6.40 meters and not 7 metres are identified in the traffic impact assessment report page 7, table 3. It is noted that the width varies as the bitumen edges are broken away along Oura Road.

The A – B measurement is from the safety roadside markers. The verge on both sides of the road are relatively steep with potential what can be soft soil and deep water can be flowing through the culvert.

Figure 5 The Water Course and Culvert

A collage of four photographs shows the watercourse and the culvert in Oura Road. Refer to **Attachment 9** for details.

Figure 6. Road Edges

A close up photograph of the broken away road edges, an example of the road edges all along Oura Road.

By way of the above, the traffic impact assessment is unsatisfactory, as the true and accurate existing conditions of Oura Road have not been assessed, and in particular have not been assessed with respect to existing and future traffic generation.

The traffic impact assessment report also ignores the cumulative impacts from the increased traffic generation with the existing traffic and vehicle generation from Oura Village. Oura Village and Oura Beach form part of the local tourist trail. Oura Village residents contribute to the volume of traffic from Wagga Wagga to the Oura village. Further, the traffic impact assessment report ignores the intersection of Oura Road and Wagga Wagga Street, the main road entry to Oura and Oura Beach. In order for the assessment to be accurate this intersection should also be included in the overall assessment of the proposal.

Additionally, the report does not take into consideration that Oura Village has three streets leading off Oura Road, including Wagga Wagga Street, Macintyre Street and Jarvis Street. Oura Village residents are well aware of the danger from speeding traffic past these intersections and they take precautions for their own safety when turning. Also, Wagga Wagga Street intersection is on a curve in the road with camber. Fog in the winter mornings also reduces visibility, while sun glare also reduces visibility in the morning (east) and afternoons (west) at this intersection.

The Oura Road is a regular cycle route for individual and cycle clubs and is sign posted for drivers to beware of cyclists. Cyclists also use the Oura Road / Wagga Wagga Street intersection as a turnaround point for their ride back to Wagga Wagga.

The section of road that goes past the Oura Station proposes site is a dangerous section of road for truck and car drivers travelling at 100km/h with blind spots and two property entrances a short distance apart, and that we are concerned that has not been sufficiently addressed in the traffic impact assessment.

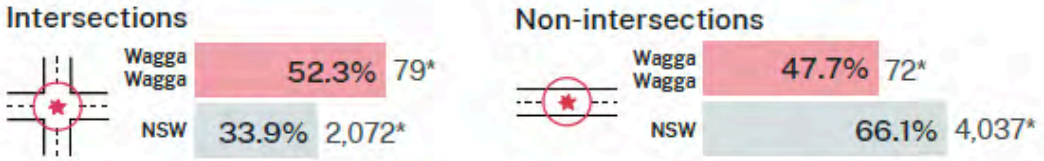
Further to the above, and with respect to safety, the traffic impact assessment report has not assessed the Wagga Wagga Transport Plan (WWTP) released by Transport for NSW in 2022. Figure 15 on page 39 of the WWTP identifies the location of major accidents in Wagga Waaga. Refer to the Figure 20 on the following page.

The figure identifies two major incident locations along Oura Road on-route between the subject site, Wagga Wagga City and to the Olympic Highway. The traffic impact assessment report cannot ignore the WWTP but also it calls into question whether the site is suitable for the proposed uses, especially where Oura Road is a current cycle route and an evolving tourist trail with numerous tourist attractions and accommodation along and off Oura Road.

The ORP are firmly of the view that the intensification of traffic generation to and from the site, and proposal is a conflict with the tourist and passenger vehicle use of Oura Road, and that the proposal is not suitable for the site.

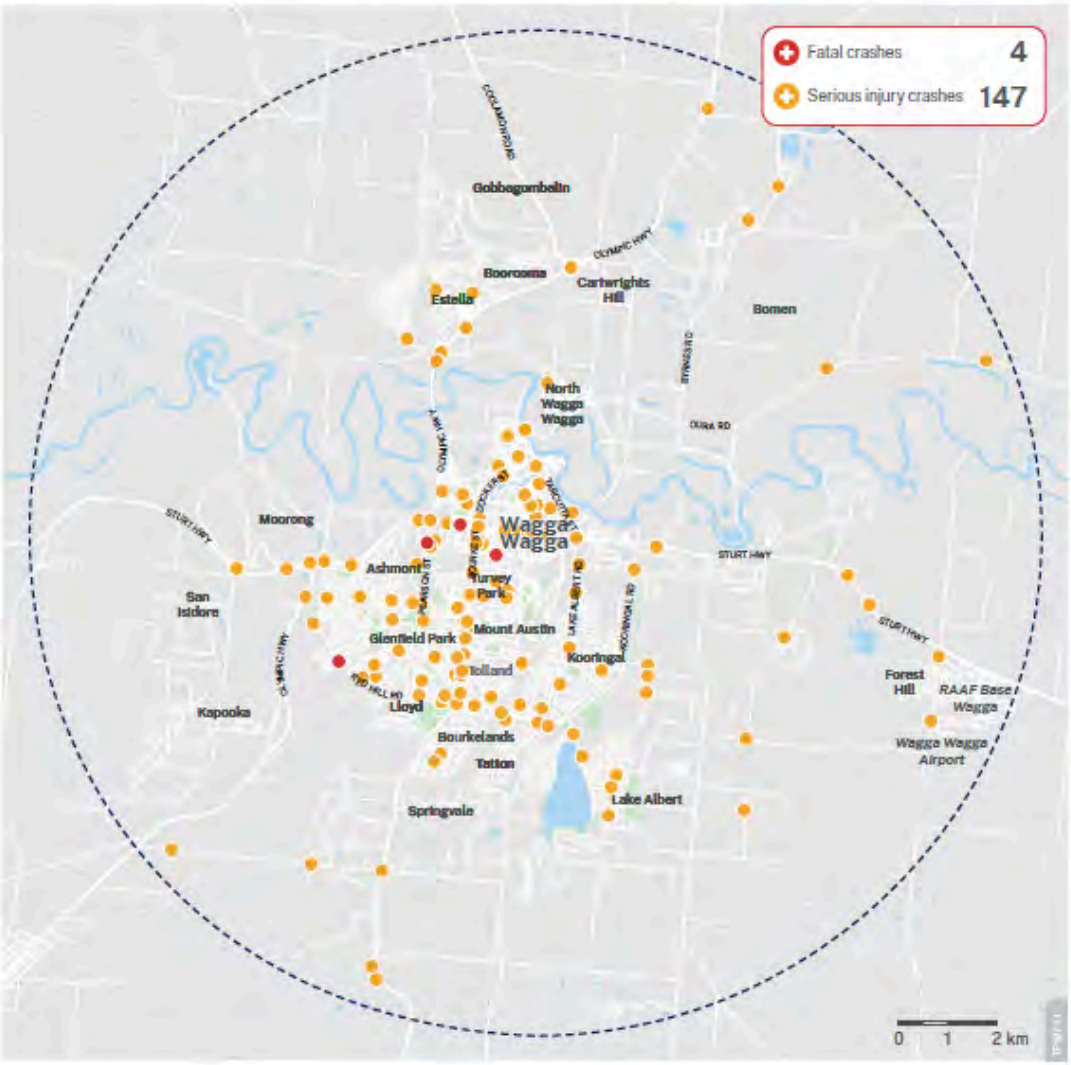
The NSW State Government established the Wagga Wagga Special Activation Precinct (SAP) in order promote economic growth in Wagga Wagga and therefore the ORP believe that the proposed uses are more suited within or around the SAP where the roads have been planned and completed for safe movement of industrial traffic. By locating the proposal in or around the SAP, this would alleviate the traffic generation intensification on Oura Road and importantly the intensification of trucks movements on Oura Road.

Should TfNSW and Council have a mind to recommend approval and eventually grant consent to the proposal, then the Applicant to should significantly contribute by way of a monetary contribution for the upgrade of a large portion of Oura Road and key intersections that are likely impacted, particularly the site entrance on the Oura Road and the intersection from Oura Road to Wagga Wagga Street, Oura, that is commensurate with the more than doubling of large heavy vehicles and all vehicles on Oura Road.



Intersection locations include crashes up to 10 metres from an intersection
*number of total crashes

Figure 14: Analysis of crash location between those recorded in Wagga Wagga and comparable urban areas across Regional NSW



KEY

- Fatal Crashes
- Serious Injury Crashes

Figure 15: Location of Fatal and Serious Injury Crashes recorded in Wagga Wagga between 2016 and 2020

Figure 20. Fig 15 extract from Wagga Wagga Transport Plan

7.3 Bushfire Issues

Bushfire Environmental Management Consultancy (BEMC) prepared a report titled, *'Bushfire Assessment Report – Development of Class 5-8 Buildings and Solar Panel Facility, Oura Meat Processing Facility, 2052 Oura Road, Oura NSW 2650',* in support of the application. Each of the points discussed below are in response to this report.

7.3.1 Inadequate Asset Protection Zones;

The BEMC bushfire report, in Section 1, 'Executive Summary and Recommendations', refers to a number of recommendations. Recommendation 1 states:

"Recommendation 1 - Asset Protection Zones

- *For the meat processing facility and battery and electrical supply equipment, a 40m APZ will be provided in all directions.*
- *For the solar farm a 10m APZ will be applied supported by a perimeter fire trail will be provided.*
- *For the class 1a staff accommodation a 50m APZ will be provided in all directions.*
- *For the existing homestead a 50m APZ will be provided in all directions.*
- *For the existing class 10 buildings a 10m APZ will be provided in all directions."*

Further to the above, the report on page 21, states:

"In this case, a moderate threat has been determined and strict compliance with PBP is not warranted due to:

- *Within the dominated fire direction, the fire fuel is highly aerated, with significant separations (>50m) between these patches with partially managed vegetation between.*
- *Forested vegetation beyond 140m form the site is scattered and isolated, forming a dominate fast moving grassland and open woodland fire event.*
- *Extreme Bush fire behaviour at the site is unlikely given the broader landscape."*

However, the report in Section 6.1 refers to the 'Lower Hunter Bushfire Risk Management' that has no relation to the subject site and region. Therefore, the basis of the assessment needs clarification and this is a matter that calls into question the scientific rigor behind, and the reliability of this report.

Additionally, although the above extract discounts the risks of the site by reference to the broader landscape, the opinion seems to be contradicted by section 6.2 of the report, which identifies that the Riverina BFMC is subject to on average 200 bush/grass fires per year, of which 2 on average are major fires, and also states (with our emphasis):

"While not having been subject to direct bush fire attack, the site and surrounds has a history of high intensity large bush fires."

While it appears that the project achieves the minimum Asset Protection Zones (APZ), ORP is of the view that given the slope, topography, access to the site and in particular the electricity generating facility (i.e. combined photovoltaic system with battery systems and back-up generator, should be increased.

Further, the ORP are concerned that fires in locations of solar farms and/or battery storage facilities have increased / elevated fire risks. In the circumstance, this risk is compounded due to the site being located within a 'bushfire prone area'. Refer to **Attachment 10** of this report the shows the 'bushfire prone land' mapped area. In light of this, the bushfire assessment report does not make any reference to or an assessment of the proposal against, *'the NSW Rural Fire Service, OP 1.2.22 Operational Protocol for Incidents Involving Photovoltaic (Solar) Arrays and Battery Electric Storage Systems.'*

7.3.2 Insufficient information on landscaping and building materials to assess bushfire impacts;

Recommendation 2 of the report, states:

"Recommendation 2 – Landscaping

- *If fencing, retaining wall, garden/path edging is within 6m of a building or in areas of BAL-29 or greater shall illustrate constructed of non-combustible materials,*
- *Locate combustible structures such as garden sheds, pergolas, and materials such as timber garden furniture away from the building."*

The report suggests that landscaping is to be constructed using no combustible materials. However, there is no landscaping plan for the abattoir facilities and buildings on the site.

Further, the bushfire report in Table 1, page 12, states that the external wall construction to be steel/colourbond cladding. Review of the architectural plans shows that the external materials predominantly include, vertical and horizontal profiled pre-weathered timber cladding, which is fixed over sarking and battens.

The ORP are concerned that the bushfire report has not satisfactorily assessed the proposed building materials with respect to bushfire risk. Additionally, it has not satisfactorily assessed the landscape design, as there was no landscape design plan available for consideration (also relevant to emergency access).

7.3.3 Non-compliance with ISSC 20 and PBP 2019;

The bushfire assessment report on page 16 refers to '*ISSC 20 – Guideline for the Management of Activities Within Electricity Easements and Close to Electricity Infrastructure'* (ISSC 20). It is not clear how the proposal assesses and achieves ISSC 20. ORP are of the view that the proposed solar farm transmission line is required to comply with ISSC 20.

Further it is noted that the objectives of *Planning for Bushfire Protection 2019 NSW Rural Fires Service* (PBP 2019) articulates the criteria to determine tolerable risk to assets and people associated with 'other' development. Although not referred to in the report, where the solar farm is not a designated State Significant Development (SSD), in ORP's view the project is not exempt from the requirement under the *Environmental Planning and Assessment Act 1979* (the Act) to comply with PBP 2019 and does require a Bushfire Safety Authority. These are matters a reliable report would and should specifically address.

It is noted that the Secretary's Environmental Assessment Requirements (SEARs) also requires the proposal's compliance with PBP 2019. It is not clear whether the level of bushfire risk to and

from the proposal has assessed the PBP 2019 or whether the PBP 2019 has been considered in the design of the proposal, or informed the bushfire management of the proposal. These are matters a reliable report would and should specifically address.

7.3.4 Insufficient Water Supply

Recommendation 4 of the report, states:

"Recommendation 4 - Water Supply

> *4 x 250K static water supply tanks are proposed totalling 1000KLts. One of these tanks shall be identified as the fir fighting water supply, with pipes and taps established to ensures that a minimum of 20,000L of static water is available to cover the meat processing and solar farm."*

Although 4 x 250k static water supply tanks are proposed, there are concerns that water may not be the appropriate strategy for fighting Solar Farm and Battery Storage facility fires. As such, assessment of the proposal should consider:

- Access to the electricity generation facility and how the live power will be dealt with by NSW RFS, and
- The absence of a plan for contaminated runoff, in the event of fire.

Additionally, ORP seek clarity from the RFS whether a 20,000L minimum static water supply is enough in the event of a major fire in this location. The ORP request NSW RFS to assess whether the project has sufficient water supply, as we are concerned that the project does not have sufficient water supply in case of a major bushfire.

7.3.5 The report references incorrect locations and references.

Generally, there are errors in the proposal's supporting bushfire report, whereby incorrect locations are referenced or incorrect bushfire risk management plans are referenced These references include:

- Mid Coast Council bush fire prone land map;
- Lower Hunter Bushfire Risk Management Plan 2009;
- Asset 36, Main North South Transgrid Powerline; and
- Lower Hunter BFMC area.

We are concerned from the above that the opinions in the bushfire report are not based upon data from the region in which the proposal is located and therefore the assessment of bushfire risk is not accurate. The ORP seek clarity from the NSW RFS on the accuracy of the bushfire report.

With respect to accuracy and depth of the assessment, the ORP also seek clarity from the NSW RFS on access to site during a bushfire event. We are concerned that there is only point of access from the site to evacuate the site during a bushfire. The bushfire assessment report does not assess the number of access points and evacuation points (including in context of the electricity generation facility and live power considerations), and any possible mitigation measures.

7.4 Agricultural Land Conflict Issues and Biosecurity Risks

The Secretary's Environmental Assessment Requirements issued by the NSW Department of Planning and Environment requires the Application to be supported by a Department of Primary Industries: Agriculture (DPI) *'Land Use Conflict Risk Assessment'* (LUCRA).

DPI's guide to preparing a LUCRA states why a LUCRA is required. Key reasons for preparing a LUCRA are to address the following.

> *"Rural amenity issues are the most common land use conflict issues, followed by environmental protection issues. Rural amenity issues include impacts to: ·*
>
> - *Air quality due to agricultural and rural industry (odour, pesticides, dust, smoke and particulates)*
> - *Use and enjoyment of neighbouring land e.g. noise from machinery, and ·*
> - *Visual amenity associated with rural industry e.g. the use of netting, planting of monocultures and impacts on views.*
>
> *Environmental protection issues include: ·*
>
> - *Soil erosion leading to land and water pollution ·*
> - *Clearing of native vegetation, and ·*
> - *Stock access to waterways."*

The LUCRA must be prepared in accordance with DPI's guidelines and in particular provide full and detailed information about the proposal's operations, capture all existing site conditions and relationship to surrounding land and identify and assess the proposal's relationship, and impacts to surrounding neighbouring properties. The LUCRA must then provide a detailed evaluation of the risk level of each proposed activity associated with the proposal.

Further to the above, the Application has also not prepared an assessment of any biosecurity contamination and risks of the proposal on the local agriculture. The proposal needs to undertake an assessment of the proposal in accordance with DPI's '*Managing biosecurity risks in land use planning and development guide'* (biosecurity guide) and the NSW State Government's '*Biosecurity Strategy 2013-2021'* (Biosecurity Strategy).

It is necessary to determine whether the proposal would have an adverse biosecurity impact given the agricultural economy gross value add of the region to New South Wales.

As identified by DPI in the biosecurity guide, understanding biosecurity risks is important because it protects the economy, environment and community from:

- Pests' animals and weeds;
- Disease and things that may spread diseases;
- Risks arising from inappropriate stock foods or fertilisers; and
- Contamination that may cause animals or plants to become chemically affected.

Given that the Application currently does not provide a LUCRA or a biosecurity assessment the Application cannot be assessed in it's fullest by Council. Therefore, Council either seek further information from the Applicant or refuse the Application.

8 Insufficient Information and Deficiencies with the Application

A detailed review of the Application and supporting expert reports was undertaken. It was found that the Application has insufficient information on which a thorough assessment could be made in order to determine the Application. Additionally, there are a number of deficiencies with the EIS and supporting expert reports. The list of identified insufficient information and deficiencies with the Application are as follows and not necessarily limited to:

- Section 192(1) of the *Environmental Planning and Assessment Regulations 2021* (**Regulations**) sets out the content for environmental impact states. Section 192(c) of the Regulations requires an EIS to include,

  '(c) an analysis of feasible alternatives to the carrying out of the development, activity or infrastructure, considering its objectives, including the consequences of not carrying out the development, activity or infrastructure'.

  The assessment of alternative options currently provided in Section 3.18 of the EIS is poor and does not undertake an alternative assessment as per the environmental planning and assessment industry standards. A detailed assessment needs to include assessment of other considered locations, especially where there are currently more suitable locations for the proposal such as the SAP, as well as other locations within the greater landholding.

  The alternative assessment, as per environmental planning and assessment industry standards needs to also provide a detailed assessment of comparable parameters and 'ranking' system;

- Section 7.5 of the EIS provides an assessment of the principles of ecological sustainable development (ESD), which is limited to a paragraph. The assessment does not satisfy Section 193 of the Regulations, as there is insufficient rigour in the assessment to conclude that the proposal achieves ESD principles. As assessed in this report, the proposal has significant adverse environmental impacts, is incongruent with the emerging tourism industry in the area and any benefits from the PV solar farm would be negated by the environmental impacts.

  Moreover, the NSW State Government, as committed to the Wagga Wagga SAP and as expressed in Council's LSPS, have identified the Wagga Wagga SAP and South-West Renewable Energy Zone as appropriate locations for mass energy generation projects. A better overall outcome for the project and for the environment is to locate the proposal in a more suitable location, such as the SAP that would be provided with a renewable energy source anyway, without generating significant environmental impacts on the site and degrading environmental value of the subject site. Refer to **Appendix 11** of this report from an agribusiness leader on ecological sustainable development principles in agriculture;

- The EIS does not include a detailed assessment of the cumulative impacts. The cumulative impact assessment is limited to minor assessment on page 35 of the EIS. A detailed cumulative impact assessment must be provided, which has also been raised by The Hon Penny Sharpe MLC, Minister for Climate Change, Minister for Energy, Minister for Environment, Minister for Heritage, Leader of the Government in the Legislative Council. Refer to **Appendix 12** of this report for the correspondence from The Hon Penny Sharpe MLC;
- The Oura village was ignored in initial notification and further not included in assessment of noise impacts, air quality/dust impacts and odour monitoring/impacts. While Oura was included in the visual impact assessment, it should have been included in the other expert reports as well;
- The EIS does not include an economic assessment to determine the economic contribution of the proposal to the local economy;
- The proposal is described in the EIS as being animal welfare focussed and a sustainable development because no livestock will be transported off site for slaughter.

  The Applicant stated that they would not consider the SAP as an alternative and viable site for the proposal because they refuse to transport livestock for 20 kilometres to the SAP for slaughter.

  However, during consultation with the Oura local community, the Applicant confirmed that livestock would continue to trucked to the facility for eventual slaughter from the Applicant's other pastoral properties, including Scone, about 600 kilometres away. The EIS does not assess the transportation impacts, sustainable development and any potential animal welfare impacts associated with this part of the operations;
- The EIS and supporting expert reports do not assess the impacts from the existing diesel pumps and the proposed back-up diesel generator;
- The air-quality and odour assessment does not assess the katabatic drift affect to the Oura village and impact on adjoining sites with approved developments for subdivision and tourism uses;
- Assessment of bore No.40WA416489 on the neighbouring property has been omitted from any assessment;
- Identification and assessment of the lagoons system has been omitted in the Application;
- The Applicant used inadequate piezometer depths and locations;
- The traffic impact assessment and EIS has incorrectly assessed the road vision distances on Oura Road, and there is no mention of the existing culvert in front of the property;
- Photograph of feedlot in the EIS and visual assessment is missing the feed troughs and roof, which reduces the visual impact of that existing infrastructure;
- Selective visual impact assessment, whereby photographs have been strategically taken from locations where the site cannot be seen, in particular photograph taken from Oura Road from the east of the site entrance;

- Inconsistent perspectives of the proposal, particularly with respect to building deign where different versions of amenity block design are found throughout the EIS and supporting reports;
- The bushfire assessment report includes numerous incorrect references that do not apply to the site and region, including identification of incorrect management plans;
- The EIS and supporting reports do not assess the emerging tourism character and economy in the area, including there is no assessment of Oura Road as a well used cycle route;
- The dam to north of the facility has not been assessed with respect dam stability, sustainability, design and effluent catchment and storage also including cross contamination from additional water entering the network from the buildings / facility, and associated cumulative impacts. As per the PMF flood impacts diagrams included in this submission, the dam will be retaining and spilling much of the overland and flood waters on the site;
- The Application does not include a landscape plan for the entire facility;
- It is unclear how the noxious waste staying on farm, such as paunch contents will be stored, transported or treated. Also, there is no odour assessment for these forms of noxious waste remaining on the farm;
- There is no detailed information provided on the by-products generated by the facility, such as hides, including amount, waste, processing, storage and air quality/odour;
- The Application does not satisfactorily assess the feedlot area and associated and cumulative impacts. Further, the feedlot area has not been included in the land survey. The Applicant agreed at the Oura local community consultation to undertake further survey works to include the feedlot;
- Singular vehicle access point for security, identified on page 43 of the EIS, contradicts the need for alternative bushfire evacuation access;
- Claim that the tree lot planted to the northwest and to the right of the neighbouring boundary will screen the view of the site from Oura Road is inaccurate. The facility will remain in view for about 1.5 kilometres of road, particularly so from high points. It is noted that the feedlot is already clearly in view from the Oura Road; and
- Figure 18 in this report shows the PMF impact through the facility and on the site, however it is not clear whether the proposal has been consistently modelled with the civil engineering plans. Further to this, there are two evident issues related to Figure 18, including 1) flood risk impacts to property and humans, and 2) cross contamination between the facility and dam / water quality.

9 Conclusion and Recommendations

Required Additional Information

Section 8 of this report, identifies all the insufficient information and deficiencies with the Application. As a minimum, in order to bring the Application closer to the necessary rigour of assessment, it is recommended that the Council request that the Applicant undertake the following:

1. Provide an update land survey that includes the feedlot area;
2. EIS to be rewritten to include feedlot assessment (odour, contamination, cumulative impacts, etc.), including a full assessment of compliance of the feedlot and the non-assessment of effluent catchment to the dam to the north of the facility. This should also assess the reuse and cumulative impact of the overall run-off and feedlot run-off;
3. Prepare an economic assessment comparing the economic outcomes of the proposal with other industry in the area, including emerging tourist economy along Oura Road and role of the SAP;
4. Assess GDE on-site and on the neighbouring properties;
5. Undertake RRC modelling of programmed flooding and to assess transmission of contamination impacts from this site, including associated cumulative impacts from other potential polluting sites along the Murrumbidgee River;
6. Undertake further biodiversity assessment to include, 1) extended period of time for field surveys and varying times of the year, 2) assessment of listed endangered ecological communities of the area, given that the distance to the river and lagoon system is located within 800 metres of the proposal, and 3) identify and assess risks and impacts to the lagoon system;
7. Assessment required of the 'test of significance' under *Fisheries Management Act 1994* of threatened fish species as the lagoon system is within 800 metres of the proposal, as acknowledged in the EIS;
8. The Bushfire Management Report is to be updated and re-assessed using correct management plans and location appropriate references, and re-assessment to be completed correcting all references;
9. Groundwater Assessment to be re-written as it is currently incomplete, addressing balance issues, salinity risk and omission of existing infrastructure. The assessment must include neighbour's bore that has currently been omitted from the proposal;
10. Water balance and treated effluent irrigation area does not confidentially meet 50-year design operation period. This assessment must be included in the Application;
11. Traffic impact assessment to be rewritten to address incorrect description and assessment of safe travel distances, as discussed in this submission. The assessment omits the critical Oura Village intersection and is unclear on the actual traffic generated by the proposal, especially with respect to truck movements and trucking cattle to the site;

12. Further assessment and/or clarification required on the odour impacts associated with the katabatic drift affect to Oura village and in particular neighbouring properties and approved subdivision development;
13. A Land Use Conflict Risk Assessment (LUCRA) and biosecurity risk assessment must be undertaken in order to satisfy the SEARs;
14. Undertake now and not as a condition of consent due to the risk a renewed Detail Site Investigation (DSI) and to be prepared by suitably qualified practitioners in accordance with relevant NSW EPA waste guidelines;
15. Update the civil engineering and flood impact assessment to ensure that they are consistent and address PMF impacts to property, humans and potential cross contamination risks;
16. A detailed alternative options assessment must be undertaken to environmental planning industry standards that is supported by a 'ranking / evaluation' system;
17. A detailed cumulative impact assessment must be undertaken;
18. The EIS must correctly identify the approved developments in the local area; and
19. A response to the NSW State Government's 'Connecting with Country' policy.

Conclusion

The ORP does not object to a livestock processing industry in the Wagga Wagga City Council area. However, we firmly object to the proposal on the subject site. As demonstrated in this report, the proposal generates unacceptable and significant adverse impacts. The proposed ecological/environmental sustainable development (ESD) outcomes are negated by the proposal's adverse impacts.

Further, the Application is not only deficient in its assessment of the proposal but also includes insufficient information that would require a complete and thorough assessment of the proposal. As such, the Application could not and should not be determined with the information that currently supports the proposal.

Moreover, it is unnecessary to burden the site with the environmental impacts generated by the imposition of the PV solar farm, when Wagga Wagga has access to renewable energy via the South-West Renewable Energy Zone and via dedicated solar farm zones within the Wagga Wagga Special Activation Precinct. The combination of the adverse environmental impacts to the site and the impacts generated by the lifecycle of the PV solar farm, including its decommissioning, do not achieve a net beneficial environment outcome for the site and the region, in spite of the claimed economic output of the proposal.

The Application has not satisfactorily assessed all the impacts of the proposal, particularly the cumulative impacts, and has not provided a detailed assessment against ecological sustainable development principles, nor a detailed assessment of alternative sites and options to locate the proposal.

Given the assessment in this report, it is evident that the proposal is not suitable for the site and is not within the public interest, therefore it is recommended that the proposal be refused.

THIS PAGE LEFT INTENTIONALLY BLANK

APPENDIX 1 – MCMAHON REPORT 2023

DM McMahon Pty Ltd
6 Jones St (PO Box 6118)
Wagga Wagga NSW 2650
t (02) **6931 0510**
www.dmmcmahon.com.au

27 September 2023

Attention: Oura Riverine Protection Inc. (ORP)
c/- 1994 Oura Road
Oura NSW 2650
ourariverineprotection@gmail.com
BY EMAIL

Dear ORP

Re: Interim Advice around the Oura Meat Processing Facility proposal

1. I refer to the written instruction from yourself to provide interim advice around the potential environmental impacts of the proposed Oura Meat Processing Facility (the abattoir). The details of the proposal are outlined in the Request for Secretary's Environmental Requirements (SEARs), SJB Development Overview for Consultation, personal communication Oura community consultation 31 July 2023. The objective of this advice is to provide the ORP with an assessment of the potential environmental impacts of the proposed abattoir and to assess the adequacy and accuracy of the information supplied in the SEARs.

2. The scope of work is to provide interim advice around potential impacts to:

a) Soil.
b) Surface water.
c) Groundwater.

It should be noted that information about the site which the abattoir is to be located on is limited, and more information will be made available when the Environmental Impact Statement is complete.

3. I am suitably competent to prepare this interim advice being a Certified Environmental Practitioner with expertise in soils and geomorphological assessment with over 25 years' experience. I am well qualified, holding an undergraduate degree in Applied Science (Agriculture) specialising in soils and land management, a graduate diploma (Water Management) specialising in geomorphology and hydrology, and a master's degree (Environmental Management) specialising in hydrogeology. I am an active member of the Environmental Institute of Australia and New Zealand, the Australasian Land and Groundwater Association, and Soil Science Australia.

4. Environmental setting

a) The proposed abattoir development area (the site) is located at 2052 Oura Road NSW with a real property address of Lot 137 DP 751397.

b) The site lies within an elevation range of around 200 to 220 mAHD with a general westerly aspect. The slope class is gently to moderately inclined.
c) The site is situated on the lower slopes of undulating to rolling hills with the higher floodplain of the Murrumbidgee River directly to the west.
d) The underlying geology lies within a contact margin between Silurian granites and Ordovician metasediments.
e) Soils are mapped as Kurosols with a Land and Soil Capability of 5 (severe limitations).
f) The nearest mapped downgradient drainage is around 1,000m to the west, this being a 4th order intermittent waterway. This waterway feeds into a semi-perennial lagoon (a mapped high potential groundwater dependant ecosystem) that is connected to the Murrumbidgee River located around 1,600m from the site. The lagoon system is located around 800m from the site.
g) Groundwater underneath the site would likely reside in fractured rock aquifers on top of the relatively impervious contact with bedrock. Local to intermediate lateral flow of shallow groundwater and interflow in the near surface would likely occur under wet conditions.
h) Groundwater to the direct west of the site on the higher Murrumbidgee River floodplain would reside in Cainozoic alluvium associated with the Cowra formation and the underlying Lachlan formation. Aquifers within these formations are associated with highly porous interbedded alluvium and are a high yielding resource.

5. Site history

From a review of the available historical aerial photography and satellite imagery (1969-2022) the site appears to be undeveloped broadacre agricultural land until a 3.5ha feedlot was developed directly to the east of the site in 2019/2020. Two dams were excavated directly north of the site in 2019/2020 and earthworks for the nearby silage pits can also be observed from the satellite imagery at this time. The proponents advise that there is a contour below the feedlot, located directly to the south of the site, that directs drainage from the feedlot to the two dams directly to the north of the site.

6. Results

a) Soil

i. Soils are mapped as having severe limitations for high impact land uses such as an abattoir and feedlot. Severe soil erosion is likely with ground disturbance. Incised erosion up to 4m deep was observed on neighbouring properties to the site in January 2023 owing to the size of the catchment as well as the volume and intensity of the flow of what is locally known as Sandy Creek that flows downgradient of the site and feeds the Murrumbidgee River via the lagoon system. These neighbouring properties have the same soil, geology, landform, and hydrology as the site.
ii. Test pits investigated in July 2023 on the neighbouring property (Lot 8 DP 1212361) found a sodic soil that has been subject to mass movement, with buried horizons, and waterlogging. Salinity measurements are also concentrated in the top of the soil profile indicating an impeding layer that reduces infiltration and increases displacement of salts and nutrients via interflow and overland flow. Local lateral flow of shallow groundwater and interflow in the near surface was also observed (see **Attachments**

A, B, C & D). These soils are likely to occur with a high level of confidence directly down gradient of the abattoir site owing to the same geology and landform.

iii. Wastewater from the abattoir is proposed to be stored and irrigated at the site. Owing to the likely severe limitations, problems associated with irrigation with wastewater can lead to:
    a. Erosion.
    b. Soil structural decline.
    c. Soil sodicity.
    d. Soil acidification.
    e. Salinity.
    f. Waterlogging.
    g. Mass movement.
    h. Soil, surface water, and groundwater contamination.

iv. Owing to the local geology it is unlikely that suitable impervious material underlies the site that could be used for construction of wastewater dams. This could lead to increased groundwater recharge and contamination.

v. The local material is also likely to be geotechnically unsuitable for use as engineering fill for wastewater dams leading to increased risk of dam failure.

b) Surface water

i. Surface waters are likely to be impacted by the development, more so if the water balance for wastewater management is inaccurate. It is well established that water balances are often inaccurate in modelling the impacts of climate change leading to increased risk of over irrigation and subsequent run-off and wastewater dams overflowing, especially in times of extended wet weather and flooding. The risk to surface waters is pollutants in the wastewater including but not limited to salt, bacteria, and nutrients. Nutrients are a major cause of blue-green algae in the catchment.

ii. The site is mapped as being within 150m of flood prone land. During periods of flooding run-off from the feedlot, wastewater dam, and irrigation is likely to adversely impact surface waters as controls are often inadequate especially during high episodic rainfall events as we are experiencing more of due to climate change.

iii. The site is also upgradient of a lagoon system and drainage with a direct pathway from the abattoir by overland flow, local lateral flow of shallow groundwater and interflow in the near surface, and deeper groundwater flow.

iv. A solar factory is also proposed for the abattoir that will increase the potential connectivity between concentrated surface water run-off from it and interflow, up gradient of the proposed area for treated effluent irrigation and the current centre pivot, all running in sequence to the lagoon system.

c) Groundwater

i. Groundwater in the underlying fractured rock aquifer and nearby alluvium is likely to be impacted by the development by increased recharge from the following:
    a. All wastewater dams leak, even when lined, this being caused by all clay being permeable to some degree and inadequate quality control during construction of synthetic liners.
    b. The irrigation of wastewater will cause increased recharge. Wastewater storages are often inadequately designed for wet weather storage leading to irrigation in winter months where more water is applied than pasture and crops can sustainably assimilate.

c. The risk to groundwater is due to an increased hydraulic load leading to a rising water table and pollutants in the wastewater including but not limited to salt and nutrients.
d. There are registered groundwater bore users down gradient of the site that could be adversely impacted by the development. The nearest registered groundwater bore has a standing water level of around 7m.
e. The site is also upgradient of a mapped high potential groundwater dependant ecosystem with a direct pathway from the abattoir by overland flow, local lateral flow of shallow groundwater and interflow in the near surface, and deeper groundwater flow.

7. Considering this interim advice and the site constraints, it is unlikely that any proposed management controls would likely be adequate to mitigate impacts to down gradient site users and the environment.

If you have any queries about the contents of this interim advice, please contact the undersigned.

Yours sincerely

David McMahon CEnvP SC
BAppSc SA
GradDip WRM
MEnvMgmt
MALGA MEIANZ MSSA

Attachments
A. Site map
B. Log sheets
C. Site photographs
D. Laboratory results

Attachment A : *Site plan*

1994 Oura Road Oura NSW

Soil investigation
Report No. 9471
August 2023

Oura Rd
Oura Rd
Oura Rd

Pit 1
Pit 2
Pit 3

Legend

- Feedlot
- Proposed abattoir
- Test pit

N

500 m

Google Earth
Image © 2023 Maxar Technologies

Attachment B : *Log sheets*

McMahon EARTH SCIENCE

Job No:	9471	**Landform:**	Lower slope
Client:	Oura Riverine Protection Inc.	**Slope:**	Very gently inclined
Site:	1994 Oura Road	**Vegetation/Surface:**	Oats/lucerne
Date:	25/07/2023	**Logged By:**	D. McMahon

Sampling Method: [ ] Hand Excavated [ ] Hand Auger [ ] Power Auger [x] Machine Excavated Other:_____

Location	Depth (m)	Sample	Description	Comments	Co-ordinates MGA GDA94 z55
Test pit 1	0-0.15	1/1	A Horizon - dark brown silty clay loam, weak pedality, nil mottling, few gravels (quartz) 2-5mm, nil segregations, well drained, many roots, gradual and smooth boundary to -	Topsoil	553820E 6115030S
	0.15-0.5	1/2	A2 Horizon - bleached brown fine sandy silty loam, massive, nil mottling, few gravels (quartz) 2-5mm, few ferromanginiferous segregations, well drained, few roots, abrupt and smooth boundary to -	Interflow observed	
	0.5-0.9	1/3	Buried Horizon - grey brown fine sandy clay, moderate structure, nil mottling, few gravels (quartz) 2-5mm, nil segregations, imperfectly drained, many roots, gradual and smooth boundary to -	Pre-European settlement alluvium	
	0.9-1.1	1/4	B-Horizon - red grey sandy clay, moderate structure, nil mottling, common gravels (quartz) 2-5mm, nil segregations, moderately well drained, few roots, clear boundary to -	Colluvium	
	1.1-1.5	1/5	C-Horizon - grey red silty sandy clay, moderate structure, nil mottling, common gravels (quartz) 2-5mm, few ferromanginiferous segregations, moderately well drained, few roots, end of pit at 1.5m.	Residuum Interflow observed Pit filled with water	

Job No: 9471	**Landform:** Lower slope
Client: Oura Riverine Protection Inc.	**Slope:** Very gently inclined
Site: 1994 Oura Road	**Vegetation/Surface:** Oats/lucerne
Date: 25/07/2023	**Logged By:** D. McMahon

Sampling Method: [ ] Hand Excavated [ ] Hand Auger [ ] Power Auger [x] Machine Excavated Other:_____

Location	Depth (m)	Sample	Description	Comments	Co-ordinates MGA GDA94 z55
Test pit 2	0-0.4	2/1	A Horizon - grey brown silty sandy clay loam, weak pedality, nil mottling, few gravels (quartz) 2-5mm, nil segregations, well drained, many roots, gradual and smooth boundary to -	Topsoil with two distinct slopewash bands of granodiorite	553830E 6114770S
	0.4-0.6	2/2	Buried Horizon - dark grey brown fine sandy clay, moderate structure, nil mottling, few gravels (quartz) 2-5mm, nil segregations, moderately well drained, many roots, gradual and smooth boundary to -	Pre-European settlement alluvium	
	0.6-1.3	2/3	B-Horizon - bleached light brown clayey sand, massive structure, common black and yellow/red mottling, few gravels (quartz) 2-5mm, few ferromanganiferous segregations, imperfectly drained, few roots, clear and smooth boundary to -	Colluvium Very weakly cemented	
	1.3-1.5	2/4	C-Horizon - grey medium clay, massive structure, few black and red mottles, few gravels (quartz) 2-5mm, nil segregations, imperfectly drained, few roots, end oif pit at 1.5m	Residual	

McMahon EARTH SCIENCE

Job No:	9471	**Landform:**	Lower slope
Client:	Oura Riverine Protection Inc.	**Slope:**	Very gently inclined
Site:	1994 Oura Road	**Vegetation/Surface:**	Oats/lucerne
Date:	25/07/2023	**Logged By:**	D. McMahon

Sampling Method: [ ] Hand Excavated [ ] Hand Auger [ ] Power Auger [x] Machine Excavated Other:_____

Location	Depth (m)	Sample	Description	Comments	Co-ordinates MGA GDA94 z55
Test pit 3	0-0.2	1/1	A Horizon - light brown fine sandy clay loam, weak pedality, nil mottling, few gravels (quartz) 2-5mm, nil segregations, well drained, many roots, gradual and smooth boundary to -	Topsoil	553835E 6114370S
	0.2-0.5	1/2	A2 Horizon - bleached brown fine sandy silty loam, massive, nil mottling, few gravels (quartz) 2-5mm, few ferromanginiferous segregations, well drained, few roots, abrupt and smooth boundary to -	Colluvium	
	0.5-0.95	1/3	B-Horizon -yellow red sandy clay loam, moderate structure, nil mottling, common gravels (quartz and siltstone) 2-60mm angular/subangular, few ferromanginiferous segregations, moderately well drained, few roots, clear boundary to -	Colluvium	
	0.95-1.5	1/4	C-Horizon - red yellow sandy clay, massive structure, few mottles red and black, common gravels (quartz) 2-5mm, nil segregations, moderately well drained, few roots, end of pit at 1.5m.	Residuum	

Attachment C : *Site photos*

Photograph 1: Test pit 1.

Photograph 2: Test pit 1 filling with water from interflow.

Photograph 3: Test pit 2.

Photograph 4: Test pit 3.

Attachment D : *Laboratory results*

Analysis Results

CSBP Soil and Plant Laboratory

98688
DM McMahon Pty Ltd

		Lab No	L1S23168	L1S23169	L1S23170	L1S23171	L1S23172	L1S23173	L1S23174	L1S23175
		Name	94711/1	94711/2	94711/3	94711/4	94711/5	9471 2/1	9471 2/2	9471 2/3
		Code	02/08/2023	02/08/2023	02/08/2023	02/08/2023	02/08/2023	02/08/2023	02/08/2023	02/08/2023
		Customer	David McMahon	David McMahon	David McMahon	David McMahon	David McMahon	David McMahon	David McMahon	David McMahon
		Depth	0-15	15-50	50-90	90-110	110-150	0-40	40-60	60-130
NH4OAc exch Calcium	meq/100g		8.99	3.77	14.20	18.23	15.04	9.47	8.44	2.16
NH4OAc exch Magnesium	meq/100g		2.42	1.46	7.20	8.57	9.41	3.52	3.11	1.20
NH4OAc exch Potassium	meq/100g		1.31	0.46	1.09	1.20	1.38	0.73	0.58	0.16
NH4OAc exch Sodium	meq/100g		0.21	0.26	1.23	1.61	2.03	0.06	0.11	0.26
Conductivity	dS/m		0.138	0.074	0.137	0.350	0.638	0.049	0.047	0.050
pH Level (CaCl2)			5.6	7.3	7.3	7.8	7.3	6.8	6.8	7.3
pH Level (H2O)			6.3	8.1	8.6	8.4	7.8	7.6	7.8	8.4
Ca:Mg NH4OAc exch.			3.71	2.58	1.97	2.13	1.60	2.69	2.71	1.80
ECEC	meq/100g		13.0	6.1	24.0	29.9	28.1	14.0	12.5	4.0
K:Mg NH4OAc exch.			0.54	0.32	0.15	0.14	0.15	0.21	0.19	0.13

CSBP Lab. Extract Value.

Analysis Results

CSBP Soil and Plant Laboratory

		Lab No	L1S23176	L1S23177	L1S23178	L1S23179	L1S23180
		Name	9471 2/4	9471 3/1	9471 3/2	9471 3/3	9471 3/4
		Code	02/08/2023	02/08/2023	02/08/2023	02/08/2023	02/08/2023
		Customer	David McMahon	David McMahon	David McMahon	David McMahon	David McMahon
		Depth	130-150	0-. 0	20-50	50-95	95-150
NH4OAc exch Calcium	meq/100g		9.42	2.73	1.96	5.11	5.12
NH4OAc exch Magnesium	meq/100g		7.43	0.63	0.61	1.73	2.44
NH4OAc exch Potassium	meq/100g		0.63	0.74	0.71	1.87	0.89
NH4OAc exch Sodium	meq/100g		2.17	0.02	0.01	0.05	0.10
Conductivity	dS/m		0.233	0.066	0.034	0.045	0.071
pH Level (CaCl2)			7.1	5.3	5.8	6.4	6.7
pH Level (H2O)			8.0	6.2	6.8	7.3	7.5
Ca:Mg NH4OAc exch.			1.27	4.33	3.21	2.95	2.10
ECEC	meq/100g		19.9	4.2	3.4	9.1	9.0
K:Mg NH4OAc exch.			0.08	1.17	1.16	1.08	0.36

CSBP Lab. Extract Value.

APPENDIX 2 – MCMAHON REPORT 2024

DM McMahon Pty Ltd
6 Jones St (PO Box 6118)
Wagga Wagga NSW 2650
t (02) **6931 0510**
www.dmmcmahon.com.au

20 February 2024

Attention: Oura Riverine Protection Inc. (ORP)
c/- 1994 Oura Road
Oura NSW 2650
ourariverineprotection@gmail.com
BY EMAIL

Dear ORP

Re: Interim Advice around the Oura Meat Processing Facility proposal (DA23/0598)

1. I refer to the verbal instruction from yourself to provide Interim Advice around the adequacy and accuracy of the technical reports submitted to Wagga Wagga City Council for the proposed Oura Meat Processing Facility (the abattoir). The technical reports I am reviewing are:

a) Groundwater Assessment Report, Martens & Associates Pty Ltd, November 2023 Report No. P2209292JR06V03.
b) Preliminary Site Investigation, Martens & Associates Pty Ltd, November 2023 Report No. P2209292JR03V04.
c) Detailed Site Investigation, Martens & Associates Pty Ltd, November 2023 Report No. P2209292JR09V03.
d) Onsite Wastewater Management Strategy, Martens & Associates Pty Ltd, November 2023 Report No. P2209292JR07V03.

It is recommended that this advice is read in conjunction with the Interim Advice I provided ORP dated 27 September 2023 around the proposed abattoir setting and potential environmental impacts.

3. I am suitably qualified and experienced to prepare this Interim Advice being a Certified Environmental Practitioner with expertise in soils and geomorphological assessment with over 25 years' experience. I am well qualified, holding an undergraduate degree in Applied Science (Agriculture) specialising in soils and land management, a graduate diploma (Water Management) specialising in geomorphology and hydrology, and a master's degree (Environmental Management) specialising in hydrogeology. I am an active member of the Environmental Institute of Australia and New Zealand, the Australasian Land and Groundwater Association, and Soil Science Australia.

4. Groundwater Assessment Report.

a) The Groundwater Assessment Report mischaracterises the groundwater processes on the proposed abattoir site and surrounds:

i. There are overlooked hydrogeological units in Tables 4 and 5 and importantly no monitoring bores have been installed targeting these units, both the identified and overlooked ones.

ii. For example, the downgradient Wagga Wagga alluvium upper aquifer (Cowra formation) starts from the surface not 25m depth and water bearing zones start at around 6-8m as identified in Table 6.

iii. Also, there is no mention of interflow where this is a common occurrence in the Oura landscape and has been identified in the Interim Advice I provided to OPR dated 27 September 2023.

iv. The fractured rock aquifer from 5m down has also been overlooked where it is well documented that water bearing zones locally reside in the relatively impervious contact between the weathered geology and underlying bedrock (usually 15 to 35m depth).

b) The four monitoring bores that were installed on site to a maximum of 4.2m depth were dry. This is not surprising given they were drilled on the higher elevations to shallow depths. These bores are inadequate to characterise groundwater on the proposed abattoir site and surrounds as:

i. There is no groundwater data to benchmark current conditions to make future monitoring meaningful.

ii. There are no deeper bores targeting all the hydrogeological units.

iii. There are no bores directly downgradient of the dam site or irrigation area.

iv. No slug tests were undertaken, nor hydraulic gradient measured.

v. There is no baseline data to gauge temporal change from any development.

vi. There is no characterisation of groundwater flow lengths, transmissivity, specific yield, sub-catchment size, recharge, residence nor responsiveness to change.

c) Overall, the report is an inadequate and inaccurate representation of likely groundwater conditions on the proposed abattoir site and downgradient of the site.

5. Preliminary & Detailed Site Investigation.

a) Although mentioned these reports do not follow the relevant guidelines and legislation, namely:

i. NSW EPA, Consultants Reporting on Contaminated Land: Contaminated Land Guidelines, (2020).

ii. State Environmental Planning Policy (Resilience and Hazards) 2021.

iii. National Environment Protection (Assessment of Site Contamination) Measure (NEPM), (2013).

b) Nor do the reports follow the Wagga Wagga City Council Contaminated Land Management Policy:

i. When reports are required to be submitted to the EPA and/or Council they must comply with the requirements of the CLM Act to be prepared, or reviewed and approved, by a practitioner certified under an EPA recognised scheme.

c) General comments are:

i. There appears to be a filled dam or filled rubbish pit on the proposed abattoir site from the historical aerial photos and this has not been investigated.
ii. Sampling for asbestos does not follow any recognised guidelines or standards.
iii. The hydrocarbon impacts at BH205, SP01 and SP04 have not been discussed.
iv. Groundwater has not been investigated.

d) In my opinion the reports cannot be relied upon unless accompanied by a Site Audit that addresses these inadequacies and inaccuracies. A Site Audit is required as to determine whether, in the auditor's opinion, the consultant's work complied with relevant procedures and guidelines, whether it provides a robust basis for decisions or actions relating to the land concerned and/or whether the land is suitable for the proposed land use.

6. Wastewater Management Strategy.

In summary, this report cannot be relied upon owing to a compromised methodology, inaccurate information, lack of scientific rigour to justify opinions, and the selective use of data, for example:

a) The climate data is inaccurate and inconsistent:
   i. Data for the project area is taken from Wagga Wagga with records only from 1941 to 2023. The patched point dataset with interpolated records dating to 1889 for Oura would be preferable to use - the result being a 300mm difference in evaporation per year, among others.
   ii. The report quotes a median annual rainfall for Wagga of 566mm while the Irrigation Field Salt Balance uses a median of 573.6mm and the water balance uses a figure of 484mm. These different figures coupled with the inaccurate evaporation data is a major deficiency of the reliability of these models.
b) Further regarding the water balance this is open to criticism owing to:
   i. The inaccurate climate data.
   ii. The percolation rate being assumed not measured.
   iii. The runoff factor is not in line with any of the detailed available data or modelling done for the area by Adamson, or McClymont and Freebairn et.al.
   iv. Higher decile rainfall has not been modelled for wet weather contingency.
c) Regarding the nutrient balance this is also open to criticism owing to:
   i. Phosphorus sorption in the soil is low and is a major limitation of the site. From my estimate it would only take a few years of irrigation of wastewater for the release of soil phosphorus to occur to both surface and subsurface runoff waters.
   ii. A phosphorus plant uptake of 20kg/ha/year has been adopted in the nutrient balance with no justification. It is well document that some fodder crops such as maize can uptake such an amount, but generally cereal crops and pasture cannot. There is a wide variety of published data around this (Reuter and Robinson for example), and it is an inadequacy of the model not to present different cropping rotations and long-term rolling scenarios.
   iii. A wastewater phosphorus figure of 20mg/L has been adopted which is borderline high strength effluent by reference to NSW EPA guidelines. In the interests of environmental protection with readily available modern technology a low strength wastewater should be pursued.

d) Regarding soil:
    i. There is no soil survey methodology which can lead to fact and opinion being blurred and site conditions mischaracterised. The soil survey appears to be low intensity (and low cost) and is inadequate for a precise and accurate survey. The soil analysis is inadequate and soil horizons have not been sampled - only predetermined depths which may misrepresent soil conditions. There are no field measurements for percolation or run off - only assumptions have been used.
    ii. There is a real erosion potential as evidenced by the mass movement down gradient I observed while digging the soil pits adjacent to the site as reported in the Interim Advice I provided ORP dated 27 September 2023, this is a risk exacerbated by the evidence of high sodium concentration in the subsoil.
    iii. There is no soil benchmarking, nor groundwater benchmarking, and no proposed ongoing monitoring locations or program.
    iv. There is no geotechnical data nor engineering recommendations around the proposed construction of the dam and how design can overcome the identified site and soil limitations.
e) Around runoff water:
    i. There is no mention of the down gradient Groundwater Dependent Ecosystem or interflow I identified in the Interim Advice I provided ORP dated 27 September 2023. Interflow being subsurface runoff in the unsaturated zone that may return to the surface as overland flow as elevation and relative incline decreases.
    ii. There is no contingency for periods of extended wet weather and dam overflow including but not limited to the dam northwest of the proposed abattoir that catches runoff from the feedlot and proposed effluent irrigation area via a contour bank.

If you have any queries about the contents of this Interim Advice, please contact the undersigned.

Yours sincerely

David McMahon CEnvP SC
BAppSc SA
GradDip WRM
MEnvMgmt
MALGA MEIANZ MSSA

APPENDIX 3 – GILBERT & SUTHERLAND REPORT

22 February 2024

Beatty Hughes & Associates
Suite 2402, L.24, Governor Macquarie Tower
1 Farrer Place
Sydney NSW 2000

Attention: Andrew Beatty – Solicitor

Dear Andrew,

Re: Peer review of the Final Advice around the Oura Meat Processing Facility Proposal prepared by McMahon Earth Science (20 February 2024) – Legal and Professional Privilege Applies

Beatty Hughes & Associates commissioned Gilbert & Sutherland Pty Ltd ('G&S') to complete a preliminary peer review of the Final Advice Report around the Oura Meat Processing Facility prepared by David McMahon of McMahon Earth Science dated 20 February 2024 ('McMahon report'). The proposed meat processing facility is located on Lot 137 DP751397, 2052 Oura Road, NSW ('the site').

We have reviewed the information and materials supplied in relation to the potential impacts to soil, surface water and groundwater at the site as a result of the proposed abattoir. This letter provides the findings and conclusions of the peer review. For ease of reference, it has been divided into sections reflecting the relevant environmental aspects identified in the McMahon report. Please not that we have not visited the site or surrounds. As such this constitutes a desktop review.

Groundwater & Surface Waters

The McMahon report contends that the Groundwater Assessment Report[1], relied upon by the Applicant, mischaracterises the surface water/groundwater processes on the proposed abattoir site and surrounds by:

1. not referencing potential hydrogeological units and failing to adequately target groundwater monitoring bores,
2. misidentifying the likely depths of a downgradient alluvial aquifer,
3. not fully referencing interflow drainage in the landform despite it being a common occurrence locally; and
4. not recognizing a near-surface fractured rock aquifer that contains water bearing zones locally.

A review of the source materials and the available borelogs included in the Groundwater Assessment Report indicates that these criticisms are valid. The absence of a sufficient Hydrogeological Conceptual model within the Groundwater Assessment Report effectively deems the assessment incomplete as it fails to address interflow drainage and the potential impacts to the downgradient Wagga Wagga alluvium upper aquifer (Cowra formation).

As to the monitoring bores, the McMahon report contends that the four monitoring bores are inadequate to characterise groundwater on the proposed abattoir site as they were drilled to shallow depths (a maximum of 4.2m, at relatively high elevations). The absence of background groundwater data to inform baseline conditions of the site, in addition to the lack of sufficient testing inclusive of permeability testing and the measurement of hydraulic gradients, indicates the Groundwater Assessment Report may not, in itself, provide reliable assessment of true site conditions.

In our opinion, a Groundwater Assessment should, at the minimum, include the characterisation of groundwater flow lengths, transmissivity, specific yield, sub-catchment size, recharge, residence and responsiveness to change. This could, in turn, affect the assessments of soils, surface waters and wastewater disposal.

Further analysis, through NSW SEED mapping, indicates the presence of High Probability groundwater dependent ecosystems (GDEs) in the southern and south-eastern portion of the site and the closest registered groundwater bore for irrigation and stock watering is approximately 1.6 km from the site. **Our findings align with the findings presented in the McMahon report with respect to groundwater.**

Potential impacts from contamination of the local groundwater system are likely to affect GDEs) and local groundwater users within proximity to the site. **We agree with the McMahon report conclusion that the Groundwater Assessment Report is an**

[1] Groundwater Assessment Report, Martens & Associates Pty Ltd, November 2023 Report No. P2209292JR06V03.

inadequate and inaccurate representation of likely groundwater conditions on the proposed abattoir site and downgradient of the site.

As to surface water impacts, the Murrumbidgee River is located on the south-eastern boundary of the site and the site is within 150m of flood prone land. The McMahon report reasonably raises potentially deleterious impacts during floods including run-off from the feedlot, wastewater dam and irrigation. The broader potential water quality impacts to downstream receiving conditions have not been adequately assessed and remain unknown in respect of the:

- sensitivity of downstream surface water consumers to increased treatment costs if nutrients and bacterial loads increase;
- likelihood of concentrated runoff delivery to surface waters during low-flow conditions; and
- ecological impacts downstream in the GDEs and surface waters should the site's capacity to adsorb nutrients be less efficient than assumed in the application materials.

Soils

The site is mapped as comprising soils with moderate to severe limitations for water erosion hazards. Data analysis of the soil samples collected and analysed in the McMahon report indicate the soils of the adjacent site (Lot 8 DP1212361) exhibit an Exchangeable Sodium Percentage ranging from 0.2% to 10.9%. In accordance with the Department of Environment and Conservation NSW's *Use of Effluent by Irrigation Environmental Guidelines*, the soils surrounding the site variously exhibit slight to severe limitations for effluent irrigation systems.

The McMahon report confirms the erosion potential as evidenced by mass movement down-gradient observed by the author while digging his soil pits next to the site. The McMahon report has taken issue with the assessment as they must comply with the requirements of the CLM Act. This is based on an apparent absence of appropriate certification.

To us, the application material's lack of reported soil survey methodology, soil benchmarking, the absence of geotechnical data or engineering recommendations and certification suggests the Preliminary Site Investigation[2] is indeed potentially inaccurate with site conditions mischaracterised. **As the McMahon report correctly identifies, such mischaracterisation, in turn, casts doubt over the feasibility of the proposed wastewater and effluent disposal strategies.**

[2] Preliminary Site Investigation, Martens & Associates Pty Ltd, November 2023 Report No. P2209292JR03V04.

Wastewater Management Strategy

The McMahon report indicates the Onsite Wastewater Management Strategy[3] fails to accurately model the nutrient, salt and water balance of the site in various inputs. While the strategy indicates a median annual rainfall of 566 mm for Wagga, the Irrigation Field Salt Balance reflects a median rainfall of approximately 573mm per year, and the Water Balance has an annual rainfall input of 484mm of rainfall. **The inconsistency of climate inputs across the models indicates the probable likelihood of variable modeling conclusions.**

Additionally, the nutrient balance adopts an unjustified phosphorus sorption rate of 20kg/ha/year, while the phosphorus sorption capacity in site soils is limited, given the sodic nature of the soils, which subsequently poses a severe limitation and constraint for this application. **It is our opinion that the input for the nutrient balance is unrealistic, rather than an actual realistic rate for phosphorus sorption and long-term scenarios.**

We would normally use the Model for Effluent Disposal by Land Irrigation (MEDLI) to accurately assess the impact of the effluent disposal to land and the long-term hydraulic performance of an effluent irrigation area. **In summary, the strategy report appears deficient in its conclusions due to the inconsistencies across the various models, the selective use of data and failing to address the piping within the irrigation area including the sustainability standard of a 50-year life for an effluent disposal area.**

Conclusions

We have reviewed the McMahon report, the cited documents within the application material and made additional enquiries of our own. **To us, the opinions expressed in the McMahon report are accurate given the available dataset and supplied site documentation and its conclusions are reasonable.**

The following items represent a summary of the conclusions drawn from our review of the supplied materials:

- the Groundwater Assessment Report presents an inaccurate representation of likely groundwater conditions on the proposed abattoir site and downgradient of the site,
- potential impacts from contamination of the local groundwater system are likely to affect groundwater dependent ecosystems (GDEs) and local groundwater users within proximity to the site,
- the broader potential surface water quality impacts to downstream receiving conditions have not been adequately assessed,

[3] Onsite Wastewater Management Strategy, Martens & Associates Pty Ltd, November 2023 Report No. P2209292JR07V03.

- the soils surrounding the site variously exhibit slight to severe limitations for effluent irrigation systems; and
- the inconsistency of inputs across the models indicates the probable likelihood of inaccurate modelling conclusions for the assessments undertaken in the Wastewater Management Strategy Report.

Given this, it is apparent that the information supporting the application is inadequate and could not be safely relied upon by a prudent assessor, or assessing authority. In short, a confident appraisal of the development's impacts cannot be made at this time.

We trust this is satisfactory. Please contact this office should you require any further details or elaboration.

Yours sincerely,

Neil Sutherland
Director/Principal Agricultural & Environmental Scientist & Hydrographer
BTEC(Hgr)Agr PGDipLanWatMan MScEnvMan PhD

Diane Ayass
Environmental Scientist & Engineer
BSc(Bio) MSc(EnvEng)

Author Neil Sutherland and Diane Ayass
Our Reference 12295_ADV1_DHA1F.docx
Your Reference
By ☐ Courier ☑ Email ☐ Facsimile ☐ Post
Enclosures - Nil

APPENDIX 4 – PARADICE REPORT

27 Marns St.
Wagga Wagga NSW 2650
22 February 2024

Lynne Wallace
Secretary
Oura Riverine Protection Inc.
OURA NSW
By email: ourariverineprotection@gmail.com

Dear Lynne,

Re: The Eringoarrah Livestock Processing Facility - Environmental Impact Statement (EIS) 2023

I write in response to an invitation from the ORPI to review the Eringoarrah Abattoir EIS.

The review is conducted "pro bono" for the purpose of increasing the appropriate knowledge of the citizens of the Oura community.

My background is as a manager of corporate feedlots and abattoirs for 30 years (1978-2008) and subsequently advisor to feedlots and abattoirs for 15 years (2009-2024). My area of expertise has evolved to include the management of environmental aspects and impacts of Australian feedlots and abattoirs.

I have read the EIS and perused some key attachments to the core document and table my observations in the notes below.

1 OBSERVATIONS

<u>Effluent disposal and utilisation</u>

1. The nutrient loads proposed in the abattoir effluent to irrigation calculations are lower than might generally be observed in other abattoirs. (The proponent has applied information from the "EPA Environmental Guidelines - Use of effluent by irrigation. Dec 2004)
2. If the nutrient loads in the irrigation wastewater are found to be higher than the N and P listed in the EIS the irrigation area required will be larger than proposed.
3. The EIS does not appear to discuss provision for capture or recycling of irrigated wastewater tailwater runoff from the designated irrigation area. (This control may be envisaged by the proponent but is not clearly enunciated.)
4. Poor operational management of the irrigation system could result in localised effluent application exceeding field capacity and creating runoff. The average slope in the irrigation area appears to be 6% as illustrated in Figure 2.
5. Runoff from the effluent irrigation that is not contained by a contour capture channel and storage would follow local drainage pathways and find its way into the riverine lagoon system about 600m to the southwest of the abattoir. Ideally the operator would create

structures and systems to mitigate against this eventuality. (The drainage line to the riverine lagoons appears to run through a "potentially saturated" irrigation pivot.)

Groundwater monitoring

6. It is noted that an array of 4 monitoring piezometers (monitoring bores) have been constructed. (Refer Appendix A.)
7. None of the monitoring peizos have been constructed to the depth of the local shallow groundwater and remained dry at testing. The maximum depth of any piezos is 4.2mBGL.
8. It is remarkable that not a single piezo was constructed to 12mBGL (or into groundwater at lesser levels) to ensure the monitoring of the water quality status of any groundwater present below the development. It appears that all MB drill holes were terminated at depths before bit refusal.

Drought feedlot runoff

9. An existing drought feedlot facility on the property is close to the proposed abattoir.
10. The feedlot is unapproved by the Wagga Wagga Council however facilities of this type are legal for use when a zone is drought declared.
11. The drought feedlot has a significant one-time standing capacity to hold and feed cattle.
12. Based on normal feedlot standards for standing area and bunk space the feedlot has capacity (a conservative estimate) for 1,200 Standard Cattle Units (SCU's).
13. The feedlot slope from bunk-line to back gate appears to be about 8% (refer Figure 1) which would provide runoff and possible entrainment of manure in most rain events over 5mm in one day.
14. The National Guidelines for Beef Cattle Feedlots (MLA 2012) specify that …"*to ensure that pens drain quickly after rainfall, but that runoff is not so rapid that it scours excessive amounts of manure from the pen surface, the downslope gradient in all new feedlot pens should be between 2.5 and 4%."*
15. The feedlot sits immediately upslope of the proposed abattoir effluent irrigation area.
16. It is understood from the EIS that runoff from the feedlot will be diverted from draining onto and through the effluent irrigation area. It is also understood that feedlot area runoff will be managed as clean water runoff diversion.
17. Runoff diversion clean water (if it is not captured) is likely to drain to the riverine lagoon system to the southwest of the feedlot and abattoir development. The drainage line appears to possibly include transiting an existing irrigation pivot.
18. It is likely that in periods of drought declaration, when the drought feedlot is in use, or has been in use for some time, the stormwater or rainfall runoff from the feedlot will carry a heavy nutrient load due to the steep slope of the pens. This water will be higher strength for nutrient, salts, and elemental density than the abattoir water. Ideally the operator would create structures and systems to mitigate against this eventuality.

Drought feedlot operation

19. The abattoir proponent advises that the drought feedlot will not be used to grow feedlot cattle to slaughter or hold/house and/or feed cattle immediately prior to slaughter. It is expected that the feedlot will be left standing and used in times of drought to support the grazing herd on the farm.
20. It seems practical and likely that in times of drought, cattle will be feed for production in the feedlot to ensure the abattoir can keep the business model running. After all, with 1,200

SCU head feedlot capacity and an abattoir kill capacity of 60 per week, the feedlot has capacity to supply 60 cattle per week with up to 140 days on feed, on a continuous basis.

21. If this is the case then the environmental impact of an operational feedlot, adjoining and assisting the abattoir in times of drought, should be assessed as an element of the EIS.
22. The abattoir has chiller rail for 60 head of cattle proposed to be used once per week. Other abattoir facilities on average use the chiller hanging rail 5 days a week for 5 separate kill runs which would give the facility the capacity to process 300 head per week. This would increase the environmental load proportionally and increase the kill throughput by 500%.
23. If the latent capacity of the proposed abattoir design is 300 head per week (15,600/annum) then this should be assessed as an element of the EIS. If this assessment is not provided, then it would be appropriate for the consent authorities to apply a limit condition of 60 head per week to the development.
24. It is remarkable that the possibilities of feedlot synergy in drought and latent abattoir processing capacity have not been explored and addressed in the EIS for the proposed abattoir development.

<u>Cattle supply in times of drought</u>

25. The EIS states that “as a general rule” all cattle will be slaughtered directly from grazing on grass at “Eringoarrah”. In the Australian situation with normal seasonal variation, drought, and variable feed quality, it is unlikely that this rule will be easy to apply.

<u>Operational flexibility</u>

26. There are operating systems outlined in the EIS and attachments that will likely change over time. For example, no cattle on trucks delivered direct to slaughter if likely to be found to be impractical in the long term.

I trust these observations are of assistance in your considerations and response to the EIS lodged with the Wagga Wagga City Council.

Yours sincerely,

Peter Paradice
0404 444650
27 Marns St
Wagga Wagga NSW 2650

2 Appendices

2.1 Appendix A: Groundwater Assessment (Extract)

The document 6143064 Groundwater Assessment Report Section 3.4 advises that the constructed monitoring bores on the development site were not drilled to depth to reach local shallow groundwater. All MW boreholes were noted as terminated without noting “bit-refusal”.

3.3 Registered Bores and Groundwater Uses

Review of the WaterNSW Real-time Water Database identified the groundwater bores ≤2,500 m of the proposed development area on the record. A summary of respective bore information is provided in Table 6.

Table 6: Registered bores and groundwater use

Bore ID	GW030160	GW030161	GW414774	GW402652
Registered use	Monitoring	Monitoring	Stock watering / domestic supply	Irrigation
Distance from development (m)	Approx 1,600	Approx 1,000	Approx 1,000	Approx 1,700
Direction from development	South	South	North	South-west
Bore depth (m)	62.4	16.1	10	58
Standing water level (m)	Water-bearing zones: 7.3-23.1 m – 5.4 25.6-51.2 – 5.4 56.3-62.3 – 6.0	5.7	4.2	7.5
Yield (L/second)	-	-	-	40
Salinity	-	-	-	-
Lithology	Gravel and sand	Gravel	Sand	Sand

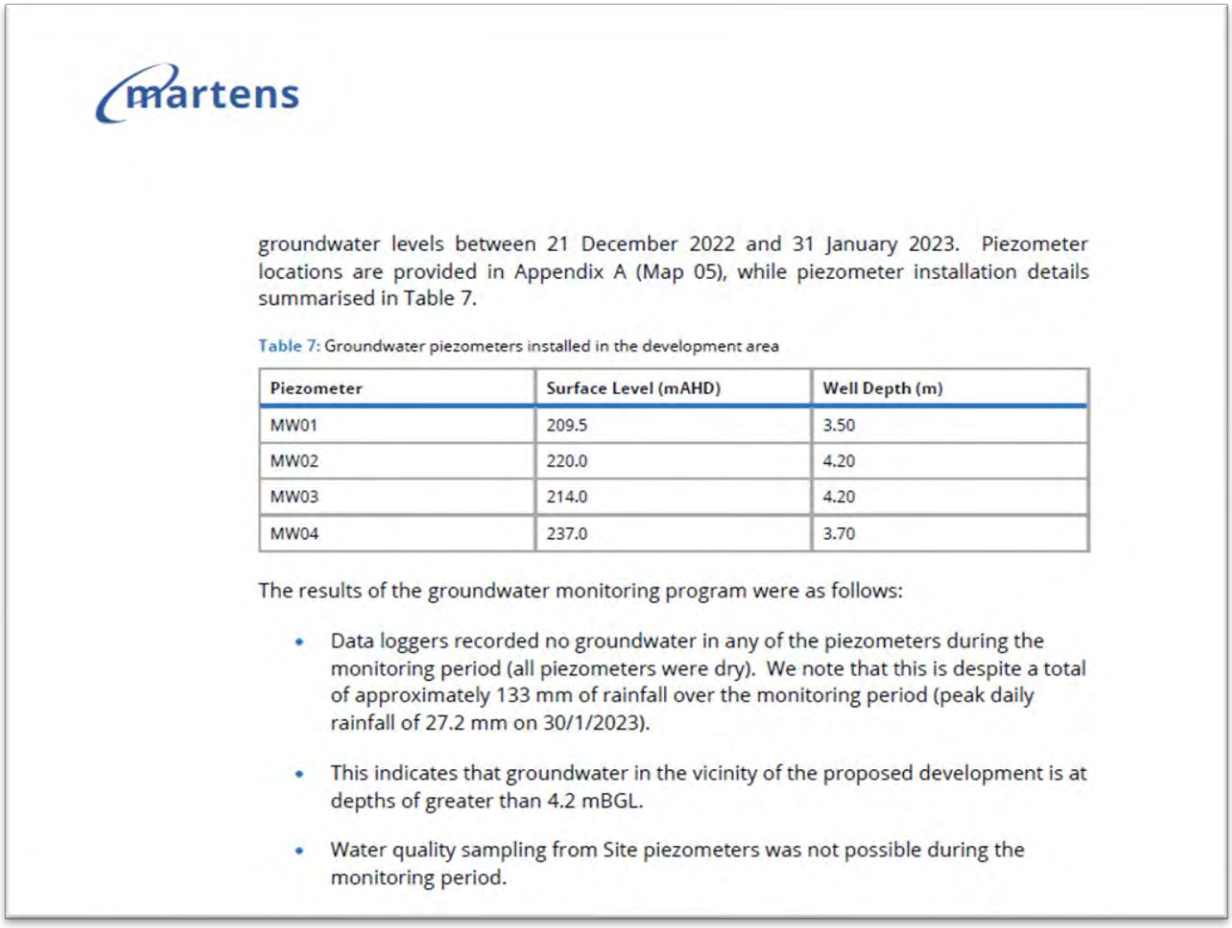
The location of each of the groundwater bores is shown in Appendix A (Map 04). Groundwater bore records are provided in Appendix D.

3.4 Site Groundwater Monitoring

Four groundwater monitoring wells were established within the proposed development area by MA in conjunction with fieldworks for the wastewater assessment (MA, 2023b). A groundwater monitoring program was established at all four locations to determine if there was shallow groundwater in the vicinity of areas identified for onsite irrigation of treated wastewater. Details relating to groundwater monitoring well installation are provided in MA (2023b).

Continuous groundwater level monitoring was completed at each of the four monitoring well locations, with each containing a pressure transducer to continuously record

Document Set ID: 6143064



groundwater levels between 21 December 2022 and 31 January 2023. Piezometer locations are provided in Appendix A (Map 05), while piezometer installation details summarised in Table 7.

Table 7: Groundwater piezometers installed in the development area

Piezometer	Surface Level (mAHD)	Well Depth (m)
MW01	209.5	3.50
MW02	220.0	4.20
MW03	214.0	4.20
MW04	237.0	3.70

The results of the groundwater monitoring program were as follows:

- Data loggers recorded no groundwater in any of the piezometers during the monitoring period (all piezometers were dry). We note that this is despite a total of approximately 133 mm of rainfall over the monitoring period (peak daily rainfall of 27.2 mm on 30/1/2023).
- This indicates that groundwater in the vicinity of the proposed development is at depths of greater than 4.2 mBGL.
- Water quality sampling from Site piezometers was not possible during the monitoring period.

2.2 Appendix B: Irrigation wastewater quality SEE Attachment 26

Detail (wastewater cropping plan, hydrological and nutrient/salt (N, P & EC) modelling) in respect of soils receiving abattoir wastewater have been reviewed in Attachment 26. Extracts and notes follow.

4.4.1 Soil Hydraulics

A minimum EMA to satisfy soil hydraulics of 8,837 m² is based on AS/NZS 1547 (2012) and Site soil profiles (Table 2). A minimum absorption bed / trenches with a base area of 51.6 m² is required to satisfy soil hydraulics for effluent generated by the staff amenities.

Table 14: Minimum EMA size based on soil hydraulics (AS/NZS 1547, 2012).

Soil Layer	Agricultural Classification	Adopted Design Loading Rate[1] (mm/day)	Adopted Design Irrigation Rate[2] (mm/day)	Minimum Absorption Bed / Trench Base Area (m²)	Minimum Irrigation Area Required (m²)
Topsoil	Sandy loam	15.0	5.0	34.4	6,186
Subsoil	Sandy clay loam	10.0	3.5	51.6	8,837
Adopted	Sandy clay loam	10.0	3.5	51.6	8,837

Notes:

1. Based on Table L1 of AS/NZS 1547 (2012).
2. Based on Table M1 of AS/NZS 1547 (2012).

4.4.2 Nutrient Balance

Nutrient balance calculations have been completed based on Site soil chemistry (Table 5, Appendix E), preliminary adopted treated effluent quality characteristics (Table 13) and effluent generation rates (Table 9). Results are summarised in Table 15, with modelling provided in Appendix F indicating that 33,197 m² is required to sustainably assimilate nutrients in effluent.

Table 15: Soil nutrient balance analysis.

Nutrient	Adopted Effluent Concentration (mg/L)	Minimum Assimilation Area Required (m²)
Nitrogen	50	28,224
Phosphorus	20	33,197

Document Set ID: 6136958
Version: 1, Version Date: 23/01/2024

It is understood that the N & P values used in irrigation modelling have come from mid-strength wastewater average used in the "EPA Environmental Guidelines – Use of effluent by irrigation Dec 2004".

The N & P values in the irrigation wastewater seem optimistically low for an abattoir operation.

More realistic numbers (adopting the precautionary principle from the real world) are:

N – 100mg/L
P – 50mg/L

If these loads are the case then the sustainable irrigation area is larger than provisioned in the EIS.

Using the numbers above in the modelling then the areas required for sustainable use of effluent in this situation are:

N – 56,448 m2
P – 82,993 m2

BOD

4.4.3 Biochemical Oxygen Demand

Analysis of the BOD_5 load is based on preliminary adopted treated effluent quality characteristics (Table 13) and the recommended maximum BOD_5 loading rate of 1,500 kg/ha/month in NSW DEC (2004) guidelines.

Monthly BOD load for the Site is 940.8 kg / month (940.8 kL/month x 1,000 mg/L). The minimum area required to allow for the sustainable application of this level of BOD_5 is 6,280 m^2 (940.8 kg/month BOD_5 / 0.15 kg BOD_5/m^2/month maximum BOD_5 loading rate).

The area provided in the EIS 3.3ha seems adequate for the likely BOD loading in the effluent.

The wastewater irrigation area has designated upslope clean runoff diverted however it is not clear that the irrigation area runoff is isolated captured, contained and recycled through the irrigation mechanism.

It is noted that an array of monitoring piezometers (bores), have been constructed.

None of the monitoring peizos have been constructed to the depth of the local groundwater and remained dry at testing. The maximum depth of any piezos 4.3m.

2.3 Appendix C: Feedlot and irrigation area slopes

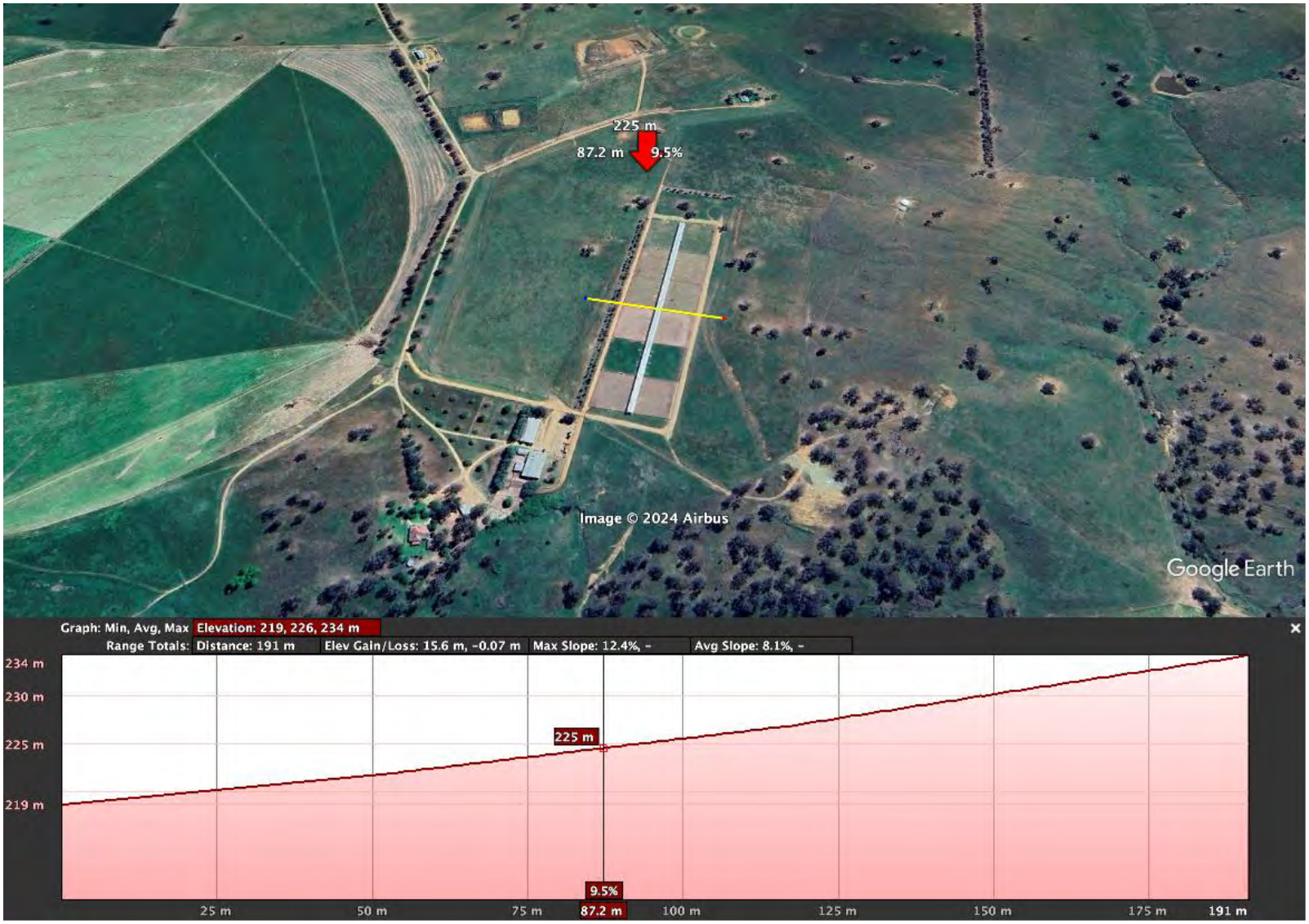


Figure 1: Average slope through existing drought feedlot (beef cattle)

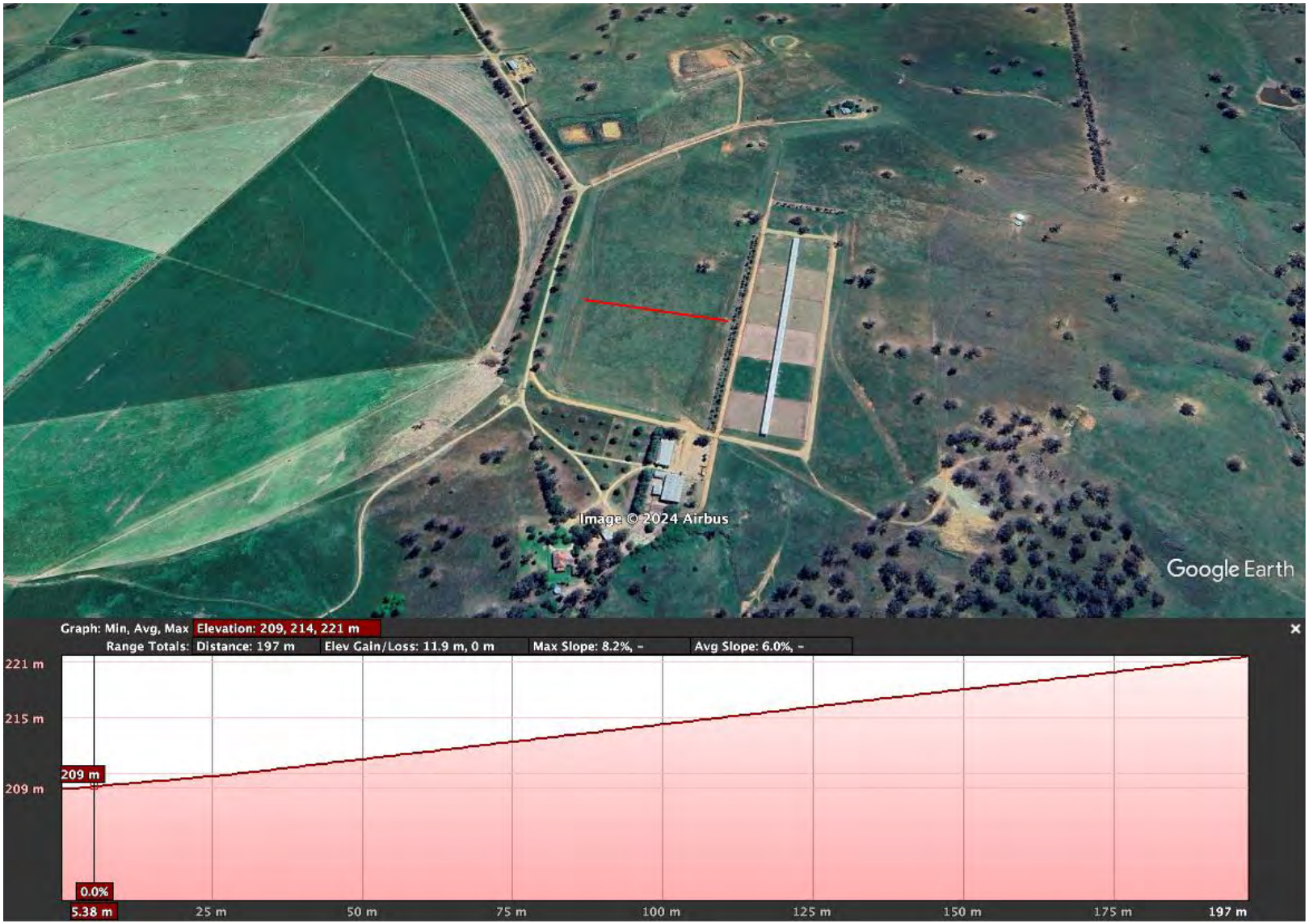
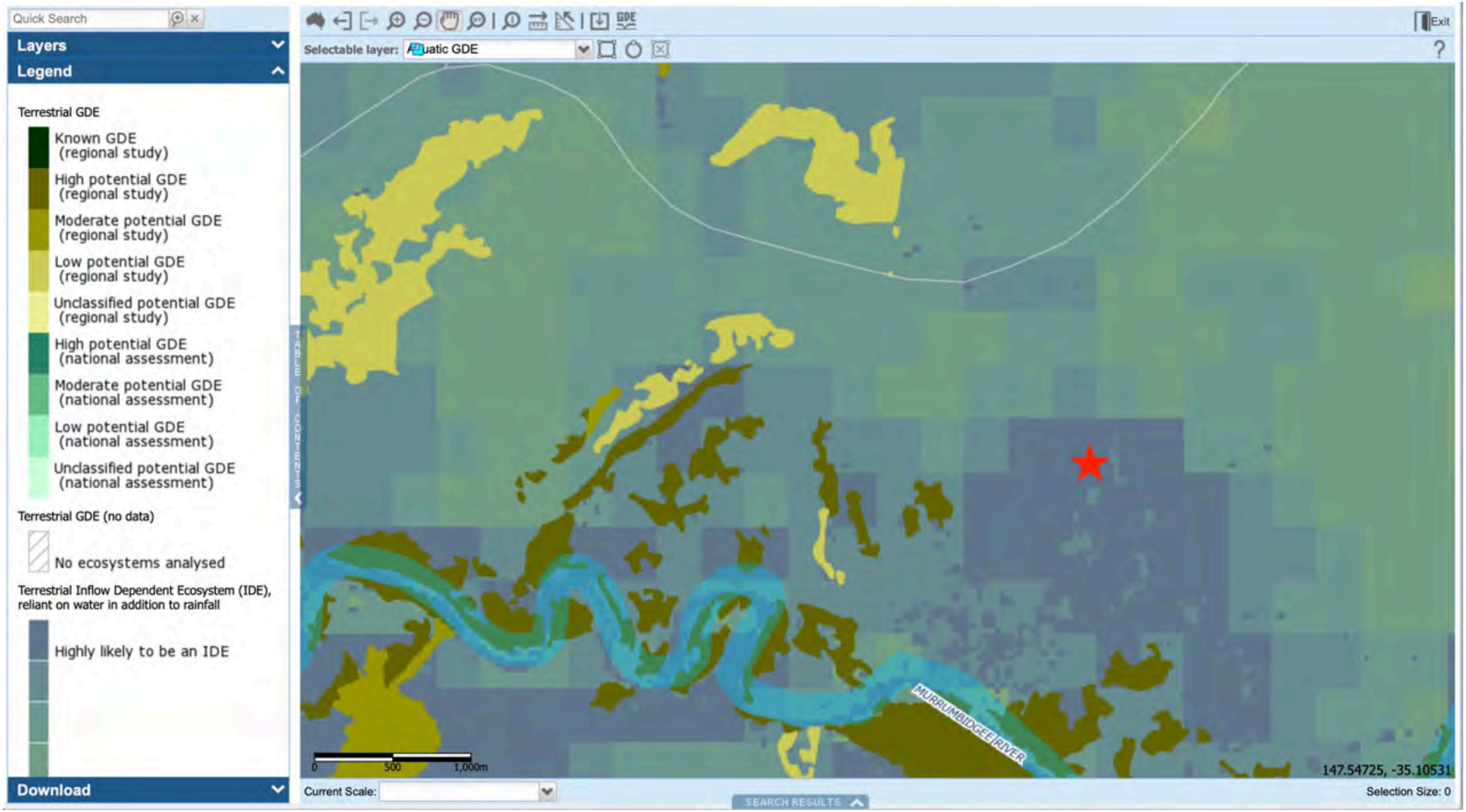


Figure 2: Average slope through proposed effluent irrigation area

APPENDIX 5 – BOM GDE ATLAS MAP


Quick Search
Layers
Legend
Terrestrial GDE
Known GDE (regional study)
High potential GDE (regional study)
Moderate potential GDE (regional study)
Low potential GDE (regional study)
Unclassified potential GDE (regional study)
High potential GDE (national assessment)
Moderate potential GDE (national assessment)
Low potential GDE (national assessment)
Unclassified potential GDE (national assessment)
Terrestrial GDE (no data)
No ecosystems analysed
Terrestrial Inflow Dependent Ecosystem (IDE), reliant on water in addition to rainfall
Highly likely to be an IDE
Download
Exit
Selectable layer: Aquatic GDE
TABLE OF CONTENTS
MURRUMBIDGEE RIVER
0
500
1,000m
147.54725, -35.10531
Current Scale:
SEARCH RESULTS
Selection Size: 0

APPENDIX 6 – OZARK GDE MAP

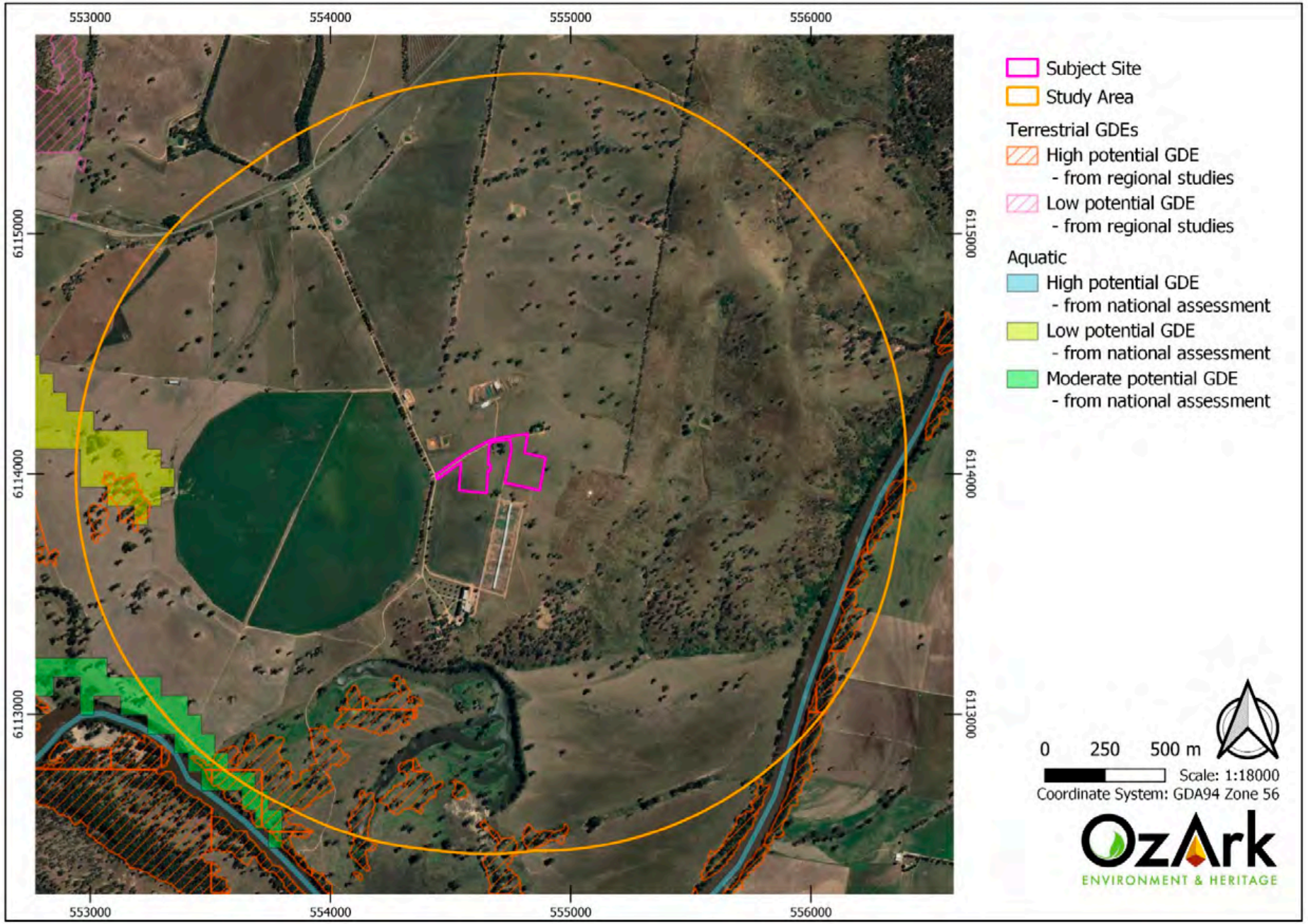
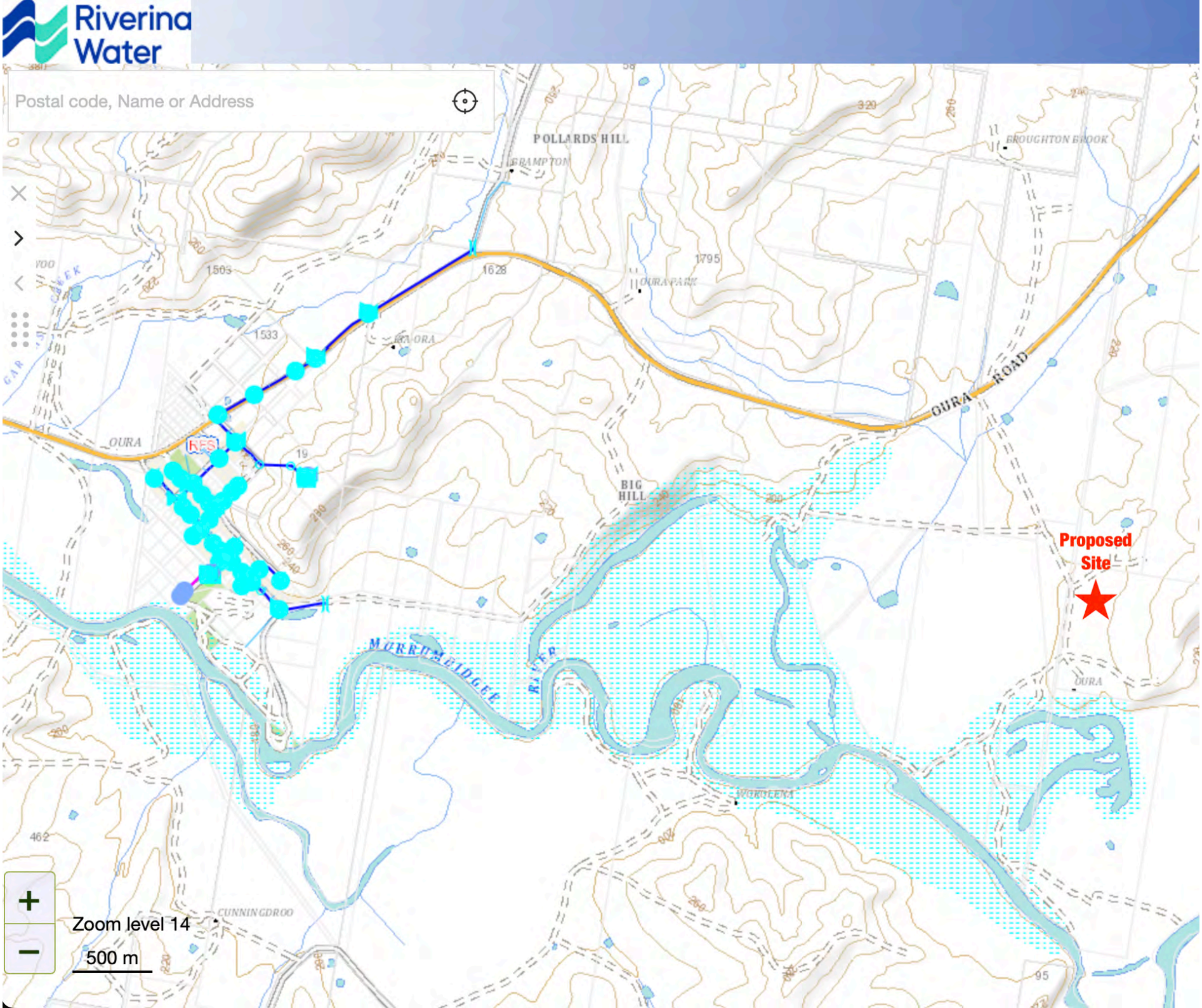
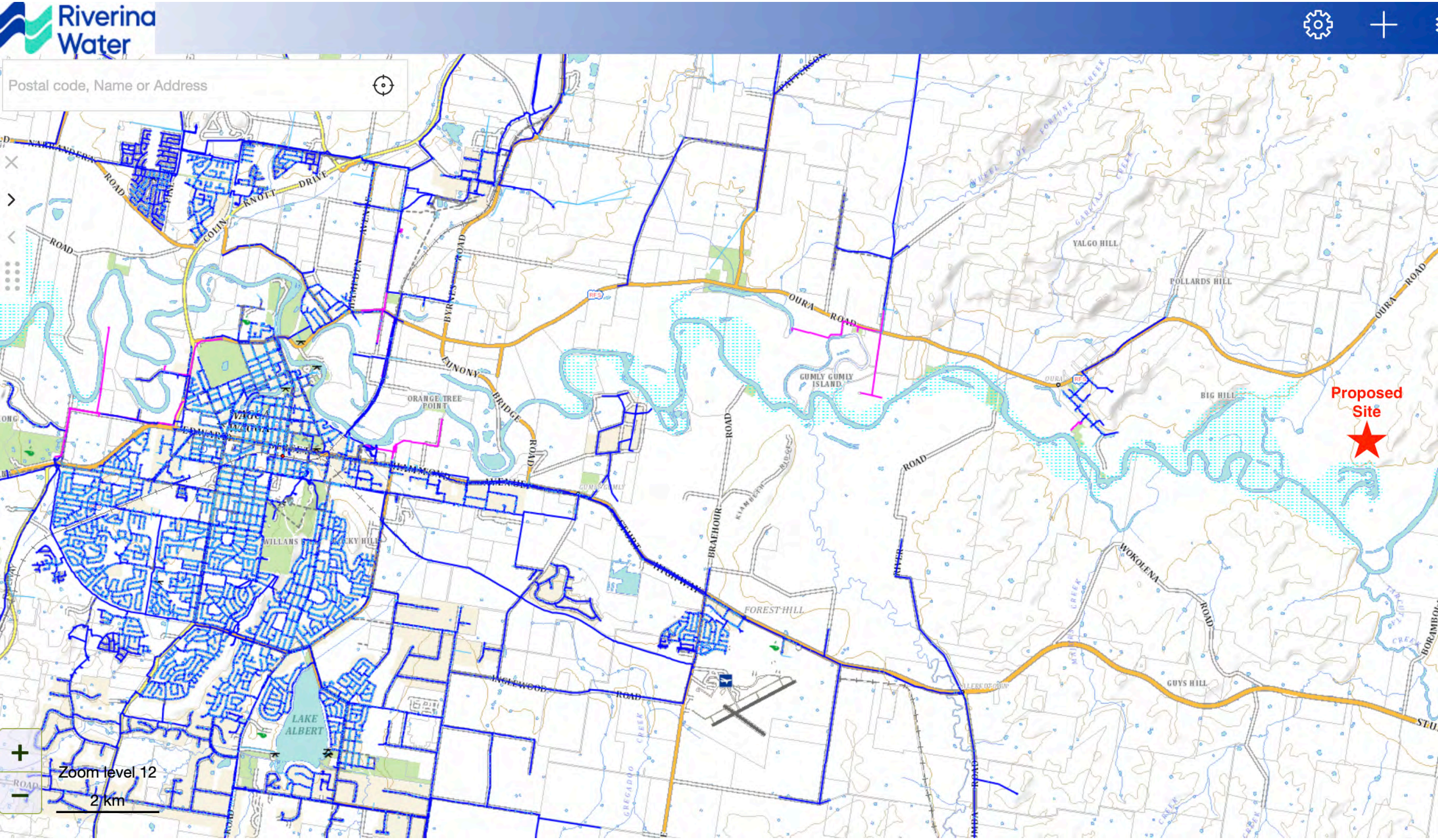


Figure 4-3. Groundwater-dependent ecosystems (GDEs) within the study area.

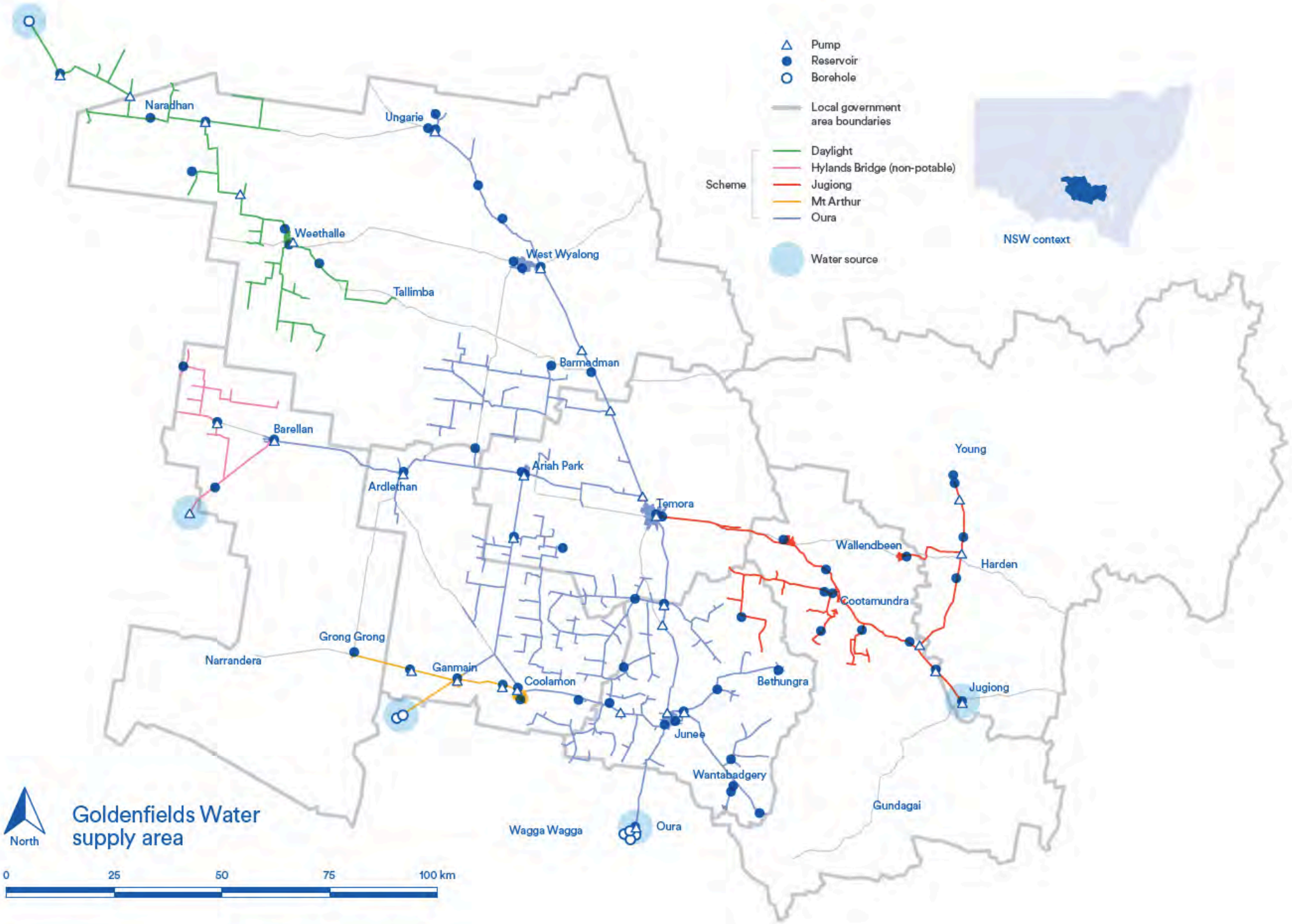
APPENDIX 7 – RIVERINA WATER NETWORK MAP

Riverina Water




Riverina Water
Postal code, Name or Address
Proposed Site
OURA ROAD
BYRNES ROAD
EUNONY BRIDGE ROAD
BRAEHOUR ROAD
WOKOLENA ROAD
FOREST HILL
YALGO HILL
POLLARDS HILL
GUMLY GUMLY ISLAND
BIG HILL
ORANGE TREE POINT
LAKE ALBERT
GUYS HILL
Zoom level 12
2 km

APPENDIX 8 – GOLDENFIELDS WATER SUPPLY MAP


Pump
Reservoir
Borehole
Local government area boundaries
Scheme
Daylight
Hylands Bridge (non-potable)
Jugiong
Mt Arthur
Oura
Water source
NSW context
Naradhan
Ungarie
Weethalle
West Wyalong
Tallimba
Barmedman
Barellan
Ariah Park
Ardlethan
Temora
Young
Wallendbeen
Harden
Cootamundra
Grong Grong
Narrandera
Ganmain
Coolamon
Bethungra
Jugiong
Junee
Wantabadgery
Gundagai
Wagga Wagga
Oura
North
Goldenfields Water supply area
0
25
50
75
100 km

APPENDIX 9 – OURA ROAD PHOTOGRAPHS

1. Oura Road and Culvert

Figure 1. Oura Road looking east towards Wantabadgery showing watercourse, culvert (point A) and Oura Station entrance (point B). Distance is 140m.

2. Oura Road Blindspot

Figure 2. Oura road looking east, showing entrance to Oura Station on the right (point A) and the blindspot (point B), which effects vehicles travelling towards Wagga Wagga.
This is also a school bus stop for morning pick-up (right side) & afternoon drop-off (left side) on the road.

3. Safety Concerns

Figure 3. Unbroken single line on left of image due to blind spot. Oura Station (site) can be seen opposite with white rail fence.

Figure 4. Road width shown east of Oura Station entrance, which is representative of the road both sides and at the entrance. Road width 6.4m

Figure 5. Oura Road looking east (top left) showing the road and drain prior to the culvert (bottom right). The culvert takes water from the north side of the road to the south side and is 140m before the Oura Station entrance (referenced in image 1). The road is subject to flooding as shown by the silt/sand build up filling the road drain (top right, bottom left). The road is narrow and does not enable safe overtaking of turning vehicles entering or exiting the site. Both sides of the road are sloping with soft soil preventing safe passing off the road surface to avoid a collision with a turning vehicle or one stopped waiting to turn.

Figure 6. Poor condition of road shown opposite entrance to the site with broken edges and pot hole repair

APPENDIX 10 – BUSHFIRE PRONE LAND MAP

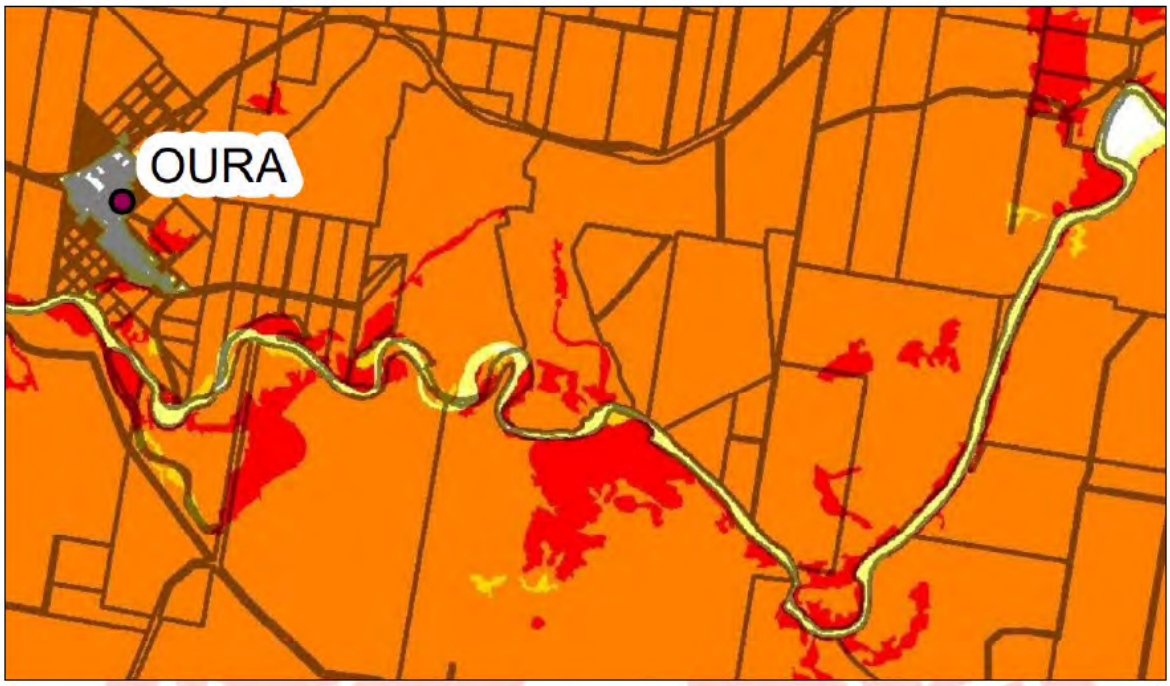


Figure 6 Bush fire Prone Land Map (Extract Wagga Wagga Council, 2022)

Note the above figure is an extract from the bushfire report. The map does not show where the proposed development is to be located.

APPENDIX 11 – MR. HULME LETTER

From: Rob Hulme
Subject: Reference: DA23/0598 Eringoarrah Pty Ltd Livestock Processing Industry – Abattoir
Date: 18 February 2024 at 7:25:15 am AEDT
To: council@wagga.nsw.gov.au

To: Wagga Wagga City Council
From: Rob Hulme

I am writing to object to the proposed abattoir development.

There are a number of well established, valid concerns over this proposal including adverse environmental impact being located so close to the Murrumbidgee River and surrounding floodplain, as well as poor community consultation and loss of local amenity for Oura precinct residents and visitors.

However from the perspective of sustainable agricultural development, this proposal has significant flaws. The NSW Government (in collaboration with the Wagga Wagga City Council) has a well established growth plan as part of the Special Activation Precincts (SAP) projects being built across regional NSW. These projects recognise the benefits that come in scaling colocated, vertically integrated facilities that attract investment, jobs and revenue, while value adding local agricultural production bases. Facilities and services include processing, cold chain, transport, waste disposal, labor, and energy.

However, building additional decentralised operations that adversely impacts local environments and communities, as outlined in DA23/0598, without first utilising the advantages of existing abattoir facilities and surrounding infrastructure at the Bowmen industrial park makes no sense and is at odds with the SAP plan and good planning process.

Establishing Good Agricultural Practice in sustainable food systems necessitates a careful consideration of all impacts and externalities. In my view this proposal does not stand up to scrutiny and I strongly urge council to reject this proposal.

Yours sincerely

Rob Hulme

CEO and Group Director
The Boralis Group Pty Ltd
Sydney, Australia
www.boralisgroup.com
Australia +61 (0)488 002208

APPENDIX 12 – THE HON. PENNY SHARPE MLC LETTER

The Hon Penny Sharpe MLC
Minister for Climate Change, Minister for Energy,
Minister for the Environment, Minister for Heritage,
Leader of the Government in the Legislative Council

NSW GOVERNMENT

Your ref: JM23798
Our ref: MD23/8431

Dr Joe McGirr MP
Member for Wagga Wagga
By email: waggawagga@parliament.nsw.gov.au

Dear Dr ~~McGirr~~ Joe,

Thank you for your letter on behalf of Mr Thomas Kelsall regarding the proposed abattoir at Oura. I appreciate you bringing his concerns to my attention. I note you also wrote to the Minister for Planning and Public Spaces, the Hon Paul Scully MP, on this matter. Your letter was referred to me and I ask that this be accepted as a response to both pieces of correspondence.

I apologise for the delay in responding over summer.

The cumulative impacts of new developments in the context of existing surrounding land uses and industrial activities are factors that need to be considered by the consent authority during the development assessment process. It is important that a cumulative impact assessment submitted as part of the planning process is broad enough to capture all relevant impacts. However, it is equally important to avoid unnecessary expansiveness, focusing only on areas where cumulative impacts are likely.

I understand that the Oura abattoir proposal is yet to be assessed in accordance with the *Environmental Planning and Assessment Act 1979*. I am also aware that Wagga Wagga City Council are the consent authority for the proposal. The development application and environmental assessment are yet to be lodged by the proponent.

The NSW Environment Protection Authority (EPA) has requested that a cumulative impact assessment be provided as part of the planning process for the abattoir in addition to the usual site-specific air, odour, water, noise and waste assessments.

The planning process incorporates a period of public exhibition which allows for submissions to be received from the public for consideration by the consent authority and any approvals bodies. I recommend that Mr Kelsall is encouraged to raise his concerns through this mechanism to ensure they are considered in the development assessment process.

The EPA maintains a public register that contains information about all environment protection licences and certain statutory notices it issues in its regulatory activities. It also administers the contaminated lands public record, which documents the significantly contaminated sites it regulates under the *Contaminated Land Management Act 1997*. These can be access on the EPA website at: www.epa.nsw.gov.au/licensing-and-regulation/public-registers.

If Mr Kelsall has any further questions about this matter, he can contact Mr Lindsay Fulloon, Acting Director Operations, EPA on 6773 7000 or at Lindsay.Fulloon@epa.nsw.gov.au.

Sincerely

Penny Sharpe MLC
Minister for Climate Change, Minister for Energy,
Minister for the Environment, Minister for Heritage
9/2/24.

THIS PAGE LEFT INTENTIONALLY BLANK

OURA RIVERINE PROTECTION INC.

To protect the natural and rural environment for the community of Oura, for the benefit of the region and future generations

TUDOR PLANNING AND DESIGN