

Springdale Solar Farm

Response to Submissions Report

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ABN 20 093 846 925

29-May-2020

Job No.: 60555008

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Quality Information

Document Springdale Solar Farm
60555008

Ref c:\users\mcmahonj3\desktop\springdale\rts\final_rts\ssf_rts v4.2 20200530
clean.docx

Date 29-May-2020

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Reviewed by Jamie McMahon

Revision History

Rev	Revision Date	Details	Authorised	
			Name/Position	Signature
1	13-Aug-2018	Initial draft	Jamie McMahon	
1.1	10-Oct-2018	Updated overall structure and added initial agency/org responses	Sumaya Osman	
1.2	15-Oct-2018	Community submission issue topics and summaries added	Ben Tuckwell/Madeleine Wheeler	
2	25-Oct-2018	Updated working draft issued to Renew Estate for review	Sumaya Osman	
3	23 May 2020	Client comments addressed. Updates made to make document current	Jamie McMahon	
4	26 May 2020	Clean for review	Jamie McMahon	
4.1	29 May 2020	Comments addressed and formatting	Jamie McMahon	

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Acronyms and Abbreviations

Acronym/Abbreviation	Term
AACHIA	Aboriginal Archaeological and Cultural Heritage Impact Assessment
AADT	Average annual daily traffic
AC	Alternating current
ACH	Aboriginal cultural heritage
ACHMP	Aboriginal Cultural Heritage Management Plan
ACT	Australian Capital Territory
AEMO	Australian Energy Market Operator
AEP	Annual Exceedance Probability
ANZ	Australia and New Zealand
AS	Australian Standard
ASC	Australian Soil Classification
BAM	Biodiversity Assessment Methodology
BC Act	Biodiversity Conservation Act 2016 (NSW)
BDAR	Biodiversity Development Assessment Report
BMP	Biodiversity Management Plan
BSAL	Biophysical Strategic Agricultural Land
CCTV	Closed circuit television
CEMP	Construction Environmental Management Plan
DC	Direct current
DFL	Defect liability
DPIE	Department of Planning, Industry, and Environment
EIS	Environmental Impact Statement
EOI	Expression of interest
EP&A Act	<i>Environmental Planning and Assessment Act 1979 (NSW)</i>
EPBC Act	<i>Environment Protection and Biodiversity Conservation Act 1999 (Cth)</i>
ERP	Emergency Response Plan
ESCP	Erosion and Sedimentation Control Plan
EVA	Eunony Valley Association
FAA	Federal Aviation Administration
GSM	Golden Sun Moth
GSNSW	Division of Resources and Geoscience
GW	Gigawatts
GWh	Gigawatt hours
HHIA	Historic Heritage Impact Assessment
HIPAP	Hazardous Industry Planning Advisory Paper

Acronym/Abbreviation	Term
HPGTP	high pressure gas transmission pipelines
ISEPP	<i>State Environmental Planning Policy (Infrastructure) 2007</i>
kL	Kilolitres
km	Kilometres
kV	Kilovolt
LALC	Local Aboriginal Land Council
LEMC	local emergency management committee
LEP	Local Environment Plan
LGA	Local Government Area
LSC	Land and soil capability
LUCRA	Land Use Conflict Risk Assessment
LVIA	Landscape and Visual Impact Assessment
m	Metres
MAOP	Maximum allowable operating pressure
mm	Millimetres
MW	Megawatt
MWac	Megawatt alternating current
MWdc	Megawatt direct current
MWp	Megawatt
NEM	National Electricity Market
NMP	Noise Management Plan
NSW	New South Wales
O&M	Operation and maintenance
OEH	Office of Environment and Heritage (formerly DECCW, DECC, DEC)
OEMP	Operational Environmental Management Plan
PCBU	Person conducting a business or undertaking
PCS	Power Conversion Stations
PV	Photovoltaic
RAP	Registered Aboriginal Party
RBL	Rating Background Level
REZ	Renewable Energy Zones
RFS	NSW Rural Fire Service
RNP	Road Noise Policy
RtS	Response to Submissions
SCADA	Supervisory control and data acquisition
SDCAI	Sutton District Community Association Inc
SERREE	South East Region of Renewable Energy Excellence

Acronym/Abbreviation	Term
SHR	State Heritage Register
SLL	Striped Legless Lizard
SMS	Safety Management Study
SSD	State Significant Development
TAPR	TransGrid's Transmission Annual Planning Report
TCP	Traffic Control Plans
TMP	Traffic Management Plan
VPA	Voluntary Planning Agreement
WHS	Work, Health and Safety Act 2011
YVC	Yass Valley Council

1.0 Introduction

1.1 Background

RES Australia Pty. Ltd (the proponent) is proposing the construction, operation and decommissioning of the Springdale Solar Farm near Sutton, NSW (the Project). RES, the world's largest independent renewable energy company, announced its acquisition of the Springdale Solar Farm from Renew Estate (the former proponent) in April 2020. The Project has been temporarily on hold since summer 2018/19. RES has now undertaken a thorough review of the Project, has undergone further consultation with NSW Department of Planning, Industry and Environment (DPIE), stakeholders and the community during the difficulties presented by the Covid-19 pandemic.

The project is classified as State Significant Development (SSD) under the *State Environmental Planning Policy (State and Regional Development) 2011* and requires development consent under Part 4 of the *Environmental Planning and Assessment Act 1979* (EP&A Act). An Environmental Impact Statement (EIS) was prepared by AECOM Australia Pty Ltd (AECOM) to support the development application and assessed the environmental and social issues associated with the Project. The EIS was submitted to the DPIE and placed on public exhibition from 18 July 2018 to 29 August 2018. During the exhibition period, the public and government agencies were invited to make submissions. A total of 239 submissions were received by DPIE including four duplicates. Following the close of the exhibition period, the proponent is required submit a report detailing responses to issues raised in the submissions as well as provide additional information to support their assessment of the Project.

This Response to Submissions (RtS) report addresses the requirement that all submissions received are appropriately addressed. This report also provides additional assessment information and updated mitigation measures that would be implemented to minimise potential adverse impacts of the Project.

As outlined in Chapter 3.0 of the EIS (Project description), the Project description and associated assessment presented in the EIS is based on an initial concept design which is subject to refinement as the project design develops. Subsequent to the EIS being exhibited, the proponent has made several refinements to the project. To describe and assess these proposed changes in full, an Amendment Report has been prepared in tandem to this RtS (Appendix G). These design changes are also discussed in more detail below, and in Section 6.0.

The structure of this RtS report is as follows:

- Section 2 – overview of the proposed development
- Section 3 – summary of consultation undertaken during EIS exhibition
- Section 4 – summary of submissions received
- Section 5 – responses to submissions received
- Section 6 – changes to the proposed development
- Section 7 – additional assessment undertaken
- Section 8 – updated mitigation measures
- Section 9 – conclusion.

2.0 The Project

As described in the EIS, the project includes solar generation equipment and associated infrastructure. The project would have a capacity of up to 120 megawatts of direct current (MWdc) and 100 megawatts (MW) of export capacity (alternating current) (MWac). The project site (the Site) is generally greenfield and is located approximately 3.5 km north of the New South Wales (NSW) border with the Australian Capital Territory (ACT), and approximately 7 km northwest of Sutton village.

The project would include the following key components:

- Photovoltaic (PV) solar modules on a single-axis tracking system mounted on steel piles. The single-axis tracking system would orient the solar modules to follow the sun from east to west throughout the day.
- Approximately 22 containerised power conversion stations, containing electrical switchgear, inverters and transformers.
- An electrical switchyard and substation that would be connected to the existing 132 kilovolt (kV) TransGrid transmission line that traverses the Site.
- Direct current (DC) and alternating current (AC) cabling for electrical reticulation.
- A control building including office, supervisory control and data acquisition (SCADA) systems, operation and maintenance (O&M) facilities, staff amenities, and associated carpark.
- Two meteorological stations.
- Internal all-weather access tracks.
- Security fencing.
- Landscaping.

Since the publication of the EIS, the Tintinhull Road upgrade works previously proposed as part of the project have been completed. This work was carried out independently of the project and independently of the proponent. As such, this work will no longer form part of the project.

As discussed above, design refinements to the project have been proposed. In tandem to this report, an Amendment Report (Appendix G) has been prepared that describes and assesses these design refinements, which include:

- Removal of one development area – one block of solar panels in the south-eastern part of the Site, to the south of Tallagandra lane, would be removed from the project design.
- Springdale Solar farm substation - the footprint for the solar farm's substation would be slightly reoriented within the same location and a surrounding APZ area would be added.
- Internal access tracks – internal access tracks would be slightly realigned, with one additional access track crossing of the gas pipeline.
- Adjustment of the northern development area footprint and extension of screening vegetation to mitigate impacts to a new receptor.
- Extension of operational period - the operational lifetime of the solar farm would be extended from 30 years to 35 years.

These proposed design changes are discussed in more detail in Chapter 6.0 of this report, and in the accompanying Amendment Report.

As mentioned, the operational lifetime of the project is anticipated to be approximately 35 years. Decommissioning at the end of the operational life of the solar farm would remove all above ground infrastructure and rehabilitate the Site suitable for agricultural use.

3.0 Consultation during exhibition

3.1 Community information sessions

Consultation undertaken during the early planning phases, EIS scoping and EIS preparation is summarised in Chapter 5 of the EIS. The proponent has continued to engage with the community and key stakeholders since submitting the EIS to DPIE, through meetings, email and telephone correspondence, newsletters, television and radio news coverage and hosting a community information session during the EIS exhibition period. This section summarises the outcomes of this information session, held at Sutton Hall on 8 August 2018.

3.1.1 Information provided

3.1.1.1 Display boards

A large volume of information was available at the information session across more than 20 display boards as listed below:

- Project pipeline for the proponent and its development partners
- Site location and site photos
- Indicative solar farm layout
- Land use zoning
- Project benefits
- Commitments to the community
- Community Investment Opportunity
- Delivering low-cost energy
- Behind the meter solutions
- Traffic - volumes
- Traffic - site access
- Construction timeline
- Operational noise
- Environmental constraints
- Environmental management
- Visual impact
- Landscaping
- Land and soil capability
- Biodiversity
- Our commitments to the community - \$100,000 community fund.

Ideas board for people to provide their feedback on how the \$100,000 community fund could be Also on display was a video showing existing similar solar farms developed by Renew Estate's partners.

3.1.1.2 Handouts

A number of printed handouts were available which the community were encouraged to take away and/or fill out. These included:

- Iterations of proposed layout
- Survey form (for providing general feedback to Renew Estate)
- Local Service Opportunities form (for informing Renew Estate of local service providers)
- A general information sheet about solar farms
- Springdale Solar Farm Factsheet
- Investment Opportunity Feedback Form

3.1.1.3 Attendees

The session was well attended with an estimated 60 people attending in total. Those attended included the general public and representatives of the following organisations and interest groups:

- Local business owners

- Sutton Solar Action Group
- Sutton & District Community Association
- TAFE Queanbeyan
- Landcare Sutton
- Canberra based businesses and service providers
- Industry Capability Network Illawarra/South Eastern Region NSW
- The member for Goulburn (Pru Goward's) Senior Electorate Officer
- Yass Tribune
- Regional Development Australia – ACT
- South East Region of Renewable Energy Excellence (SERREE)

3.1.1.4 Community response

The community response to the proposal and information session was broadly positive. The proposal was perceived by many as being beneficial to the local economy and one of the largest capital investments in the region in recent times. The session was well attended by local business owners who were enthusiastic about the prospects of business and employment opportunities.

Some nearby landowners and members of the local community repeated those concerns and queries that had already been raised with the proponent at the earlier community information sessions, during face to face meetings and email exchanges. The key issues raised were related to visual impact, impact on value of land, traffic, taking agricultural land out of production, glare, noise and proposed landscaping. These issues are reflected in the public submissions in Section 5.1.

4.0 Summary of submissions on the EIS

A summary of the composition of submissions made during the EIS exhibition period is provided in Table 4.1. A total of 239 submissions were made including 4 duplicates. Of the 239 submissions, 13 were from agencies and organisations and 226 from members of the public. The submissions were categorised by DPIE as supporting, objecting or commenting on the Project.

DPIE assigned each submitter a unique submitter identification number (Submitter ID). Copies of the full submissions can be viewed or downloaded from the NSW Major Projects website¹.

Submissions were provided by the following agencies and organisations:

- APA Group
- Sutton District Community Association Inc
- Nature Conservation Council of NSW
- TransGrid
- Department of Industry, Lands and Water
- Environment Protection Authority NSW
- Division of Resources and Geoscience
- Fire and Rescue NSW
- NSW Rural Fire Service
- Office of Environment and Heritage

¹ http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=8703

- Office of Environment and Heritage, Heritage Division
- Roads and Maritime Services
- Yass Valley Council

Table 4.1 Summary of submissions received

Position	Number of submissions from government agencies and other organisations	Number of submissions from community members	Total
Support	1	117	118
Comment	12	0	12
Object	0	109	109
<i>Total</i>			239

5.0 Response to issues raised

This section provides an overview of the submissions received as well as responses provided by the project team, which includes the proponent and EIS team members.

5.1 Issues raised by the community

Key issues raised in the community submissions, based on the number of times the issue was raised, included the following:

- Suitability of the project location
- Justification for the project
- Scale of the development
- Amenity impacts on rural character
- Visual impacts of the project
- Loss of agricultural land.

Table 5.1 provides responses to the key issues raised. The issues have been extracted and collated from the community submissions that objected to or raised comments on the Project. Where similar issues have been raised in different submissions, a single response has been provided. Issues that have been considered to be outside of the scope of the assessment refers to issues that are deemed to be non-material to the assessments of the environmental considerations of the Project. In this context, assessment means the assessment undertaken as part of the EIS, RtS and Amendment Report. Regardless, these submissions have still been summarised and provided responses in Table 5.1.

Submissions that support the Project have been noted but no further responses are provided.

Table 5.1 Responses to community submissions received

Issue category	Issue topic	Issue summary	Response	Submitter IDs
General	Environmental impacts	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> About the environment That the development will contribute to pollution That the development will cause severe environmental impacts. 	<p>Section 21.3 of the EIS concludes that the Project is considered socially acceptable, environmentally sound and economically viable. Measures to minimise environmental impacts of the Project are provided in Chapter 8.0.</p> <p>The Project has been designed to minimise impacts on biodiversity values, Aboriginal heritage sites, and visual amenity, as well as reduce flood risk.</p> <p>In addition, the Project will have the potential to generate at least 100 Megawatt alternating current (MWac) of electricity with minimal water use, air pollution and waste generation throughout its 35 year lifespan. This increase in renewable energy would reduce the National Energy Market's dependence upon fossil fuels and mitigate climate change.</p>	272737 275769 276168
	Against the development	<p>Submitters object to the development because:</p> <ul style="list-style-type: none"> The local community and council do not support the development It is not in the best interest of residents <p>Submitter supports renewable energy but not this Project.</p>	<p>Section 2.3.1 of the EIS discusses the Site selection process and consideration of alternative sites. There is a multitude of factors which inform the suitability of any Project development site. The former proponent undertook a comprehensive process of site exploration, screening and evaluation before the selection of the Project Site.</p> <p>Responses to comments from Yass Valley Council (YVC) are provided in Section 5.2.12.</p>	275459 275481 275666
Approval process	Adequacy of the EIS	<p>Submitters believe the EIS is inadequate because:</p> <ul style="list-style-type: none"> Surveys did not mention drought conditions It does not present information transparently and there are inaccuracies 	<p>The EIS was prepared in accordance with the requirements of Part 4 of the <i>Environmental Planning and Assessment Act 1979</i>, <i>Environmental Planning and Assessment Regulation 2000</i>, and the Secretary's Environmental Assessment Requirements issued on 26 September 2017 and supplemented on 2 May 2018. Figure 3 of the EIS outlines the proposed development footprint. Following the exhibition of the EIS minor amendments have since been made to the development footprint as described in Chapter 6.0.</p>	274089 275919 276160 277439 277757 276650 277480

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> It inaccurately shows that the community supports the development It includes patronising comments regarding the benefits of the development It was produced prematurely with no detailed plans, surveys and deadlines The distances between the project site and surrounding townships is incorrect Older residents were not equipped with computers to access and comment on the EIS The assessment method regarding identification of nearby residents and towns was incorrect according to the Victorian Department of Environment, Land, Water and Planning Community Engagement and Benefit Sharing in Renewable Energy Development Guide The mitigation measures are at risk of failure due to site specific constraints. 	<p>Native vegetation and flora surveys were undertaken by Niche Environment and Heritage between 24 and 27 October 2017 and 2 to 3 June 2018 using survey methods consistent with the NSW Biodiversity Assessment Method (BAM). In addition, a targeted Golden Sun Moth (GSM) survey (by specialist Alison Rowell) and Striped Legless Lizard (SLL) habitat survey (by specialist Robert Speirs) were undertaken in December 2017 and 15 June 2018 respectively. All surveys were undertaken by experienced, reputable ecologists and the wide extent of the survey period is considered to provide an acceptable environmental baseline for the Site.</p> <p>Following exhibition of the EIS, the proponent received 117 community submissions in support of the Project for a variety of reasons including the benefits to the surrounding community and environment.</p> <p>For State Significant Developments, it is typical for EISs to be prepared prior to the development of the detailed design. This is because detailed design involves significant investment and therefore is not commenced until there is a development consent. The level of design assessed in the EIS provides sufficient information to assess the potential impacts of the Project. The detailed design would not exceed the design parameters assessed in the EIS.</p> <p>The centre of Canberra (identified as Parliament House), classified as the nearest major centre to the Site, is located almost exactly 22 kilometres (km) from the southern boundary of the Site. The southwest corner of the Site is 3.3 km from the ACT border and 4.3 km from the nearest suburb of Canberra (Bonner). Distances have been measured in a</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>direct path and road travel distances would exceed stated distances by varying amounts depending on the route taken.</p> <p>The EIS was placed on public exhibition between 18 June 2018 and 29 August 2018 both online and in hard copy. Printed copies of the EIS were available at the YVC office, community information sessions and the Sutton and Gundaroo Post Offices.</p> <p>The identification of potential receptors for environmental issues was determined based on the relevant criteria and guidelines for each environmental aspect, as described in the EIS.</p> <p>The initial identification of potential receptors and stakeholders was undertaken at the beginning of the Project planning phase and is described in more detail below. This list is anticipated to undergo revision and continue to evolve in response to the various stages of the Project's development.</p> <p>Mitigation measures proposed in the EIS are designed to avoid, minimise, mitigate, rehabilitate/remediate, monitor and/or offset the potential impacts of the Project. Where possible, the first priority has been to avoid the impact. In instances where this is not possible or feasible, impacts would be reduced at the source or at the receptor through a suite of mitigation and management measures. Finally, where avoidance or reduction cannot be achieved to a practicable or acceptable level offsetting may be possible. Further detailed and/or site specific measures during construction would be identified by the appointed construction contractor during the detailed design and construction planning stage of the Project and development of environmental management plans</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
	Project proponent	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> • That Renew Estate has unethically offered incentives to local community groups and council for project support including: <ul style="list-style-type: none"> - Community incentives - Road upgrades - Additional tree plantings • Politicians are benefitting from the development at the community's expense • The major beneficiaries of the development are not the local community • Renew Estate are incapable of delivering consultation and negotiation functions prescribed in the EIS • That government subsidies and expected profits are driving Renew Estate • Concern that the proponent would have an unequal stake in the approval process due to access to resources, when compared to the community • Renew Estate have provided conflicting information on how the project would be funded 	<p>As discussed previously, the proponent announced its acquisition of the Springdale Solar Farm the former proponent in April 2020.</p> <p>A community fund of \$100,000 has been set aside for the benefit of the community. Use of this fund will be determined through further consultation with the surrounding community. Shared benefits have also been offered to landowners within 1 km of the Project, offering a choice of either an ongoing payment from the solar farm, or a roof-top solar PV and battery system. Additional community benefits would include the sealing of part of Tallagandra Lane, which would provide improved access to the Site and would only be undertaken if a Voluntary Planning Agreement is able to be reached with YVC. This is discussed in more detail in section 5.2.12.</p> <p>None of the Project's shareholders are politicians or ex-politicians.</p> <p>It is expected that the average workforce during construction would be approximately 50 full time equivalent positions, with up to 200 people during peak construction. In addition, five long term full time equivalent positions are expected to be created for the operation of the Project. Where practicable, the workforce would be recruited from the local community and local sub-contractors would be used providing economic benefit to the local community.</p> <p>The former proponent, identified a list of relevant stakeholders at the beginning of the Project's planning phase and have undertaken extensive consultation with the community during and following preparation of the EIS including:</p> <ul style="list-style-type: none"> • Two community information sessions; • Additional meetings with neighbour groups; 	<p>277773 276179 276650 276736 277480 277757</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<ul style="list-style-type: none"> Wide distribution of newsletters; and Maintenance of a Project website. <p>Specific details regarding consultation undertaken during exhibition of the EIS are provided in Chapter 3.0.</p> <p>The estimated gross capital investment value of the Project would be approximately \$138,000,000. Sources of investment would be from private investors. The proponent is not receiving any government funds in the form of subsidies or investment for the construction of the Project.</p>	
	Project approval/post-approval phase	<p>Submitters believe that:</p> <ul style="list-style-type: none"> The development does not adhere to government guidelines and rules If the development is approved and causes damages, legal action may be pursued An independent review of the proposed development is required due to substantial impacts on the environment and the community There are too many commitments in the EIS that are subject to completion of the detailed design which only happens after approval The development does not have council support as stated in the EIS A contract to upgrade Tallagandra Lane should be approved before this development is approved 	<p>The assessment and approval process for the Project is being carried out in accordance with the EP&A Act, which governs the planning controls for all developments in NSW. As part of the development, the EIS was subject to a review by AECOM subject matter experts. Where relevant, peer review comments have also been incorporated into this response to submission report. The EIS, including all detailed technical studies, was reviewed by DPIE to confirm that it adequately addressed the SEARs prior to being placed on public exhibition. The establishment of any additional independent review is beyond the scope and approval process of this Project and associated EIS, though it is likely that the final determination of development consent for this Project would be made by the Independent Planning Commission (IPC), which is an independent body set up to assess large development such as this.</p> <p>As outlined in Section 4.1 of the EIS, the Project is permissible with consent on land zoned RU1 Primary Production under clause 34(7) of the State Environmental Planning Policy (Infrastructure) 2007.</p> <p>A range of management and mitigation measures have been proposed (refer to Chapter 8.0) to minimise the potential</p>	<p>275749 275921 276413 277439 277757</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>environmental impacts of the Project during both construction and operation. With effective implementation of the identified management measures, significant impacts to the surrounding environment are not anticipated. These measures would form part of the Conditions of Consent for the Project, should it be approved, and the proponent would therefore be obligated to comply with them. The mitigation measures would be further detailed within a suite of management plans which need to be approved by DPIE as part of the Conditions of Consent.</p> <p>Should any of the committed measures need to be amended following detailed design, the proponent would need to seek approval from DPIE (with suitable justification).</p> <p>Both YVC and the proponent are continuing to work through details regarding the development of a Voluntary Planning Agreement (VPA) regarding the upgrade of Tallagandra Lane. No works would occur on Tallagandra Lane prior to a VPA being agreed upon by both parties. Responses to issues raised by YVC are provided in Section 5.2.12.</p>	
	Statutory planning framework	<p>Submitters are concerned that:</p> <ul style="list-style-type: none"> The development is not consistent with the local planning strategy The development is bypassing the planning process due to being inconsistent and incompatible with the current zoning The development is not consistent with councils settlement strategy and is 	<p>At the time of EIS publication, the area in which the Project is located was zoned RU1 Primary Production under the <i>Yass Valley Local Environment Plan 2013</i>. Electrical generation is not listed as permissible with consent in this zone under this policy; however, the proposed development is made permissible with consent on land zoned Primary Production (RU1) under clause 34(7) of the <i>State Environmental Planning Policy (Infrastructure) 2007</i> (ISEPP). As outlined in clause 8 of the ISEPP, where there is an inconsistency between the ISEPP and any other environmental planning instrument, the ISEPP prevails to the extent of the inconsistency. The Project is therefore permitted with consent within the RU1 zone.</p>	<p>278098 277784 275743 275879 276884 277757</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>making a mockery of the planning process</p> <ul style="list-style-type: none"> The development is contrary to the RU1 or RU6 zoning and would set an unhealthy precedent if approved The council settlement strategy and implications of the Site being located in the RU6 Transition Zone has not been fully considered in the EIS. 	<p>The Yass Valley Settlement Strategy 2036 (YVC, 2017) proposes an RU6 Transition Zone of 5 km from the ACT border to separate rural from urban lands and protect natural rural land and high quality natural environments. The Project may be located within this proposed zone (depending on final RU6 boundaries). While a solar farm is not an agricultural use, the presence of it would not comprise the village character or surrounding agricultural uses due to the stringent mitigation and management measures proposed to substantially reduce amenity impacts.</p> <p>A Land Use Conflict Risk Assessment (LUCRA) has been prepared for the Project and is attached in Appendix C. The purpose of the LUCRA is to assess the potential for land use conflict to occur between neighbouring land uses. The LUCRA has identified the Yass Valley Settlement Strategy 2036 as a document that provides a clear direction for long term growth and development within the Yass Valley Local Government Area (LGA).</p> <p>The Yass Valley Settlement Strategy seeks to compliment the Regional Growth Plan with a more comprehensive settlement strategy for Yass Valley LGA. In order to achieve sustainable growth in the region securing a new water supply is required. The Strategy outlines that it is not recommended that water supply from the ACT water infrastructure be sought for areas to the north east of Canberra, including Sutton. The Strategy determines that because of a lack of a secure water supply and adequate sewerage treatment, limited future development should be permitted where its impact does not compromise existing village characters or surrounding agricultural uses.</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			The LUCRA has found that as Sutton has not been identified as a priority urban growth area for the Yass Valley LGA, the development of a solar farm would not preclude the overall goals of the Yass Valley Settlement Strategy 2036 of accommodating for future urban growth. This is because the solar farm would not be located in a part of the Yass Valley LGA that is intended to support urban development and would not prevent urban development from occurring. While a solar farm is not an agricultural use, the presence of it would not comprise the village character or surrounding agricultural uses due to the stringent mitigation and management measures proposed to substantially amenity impacts.	
Project need and justification	Strategic context	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> • Greater public transparency on Project financing is necessary • The location of the development is not suitable • The location of the development should not be on prime agricultural land • The location has the potential for residential expansion • The development will hinder the growth of the Gungahlin area • The Site location is inconsistent with rural land uses • The Site would ruin the rural character of the region • The Site is located within a 5km development exclusion zone • The development is inconsistent with the Yass Valley Council Settlement Strategy 	<p>Based on the initial design and the current solar engineering, procurement and construction market, the estimated gross capital investment value of the Project would be approximately \$138,000,000. Financing for the Project would be from private investors.</p> <p>As outlined in Section 2.3.1 of the EIS an extensive site selection process was undertaken and involved the consideration of a number of alternative locations for the proposed solar farm. The Site was shown to be more suitable than alternative locations considered and was selected on the following basis:</p> <p>The Site has a high-level of solar resource and ideal climatic conditions for a commercial-scale solar farm;</p> <p>The Site is in close proximity to existing electrical infrastructure with sufficient connection capacity;</p> <p>Other network electrical efficiencies: alleviating transmission and distribution losses for generation at this connection point in the network due to high, and growing, energy demands in the region;</p>	278278 278026 278006 277814 277786 277782 277771 277735 277775 277773 277969 275306 275300 274725 272731 272733 272835 273912 274089 275713 275459

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> The development is inconsistent with councils proposed plans for types of development in the area (proposed RU6 zone) The land is better suited to farming land and not commercial purposes as reflected in RU1 zoning The development should respect long term planning goals The Site location was decided in a rush to meet the Paris Agreement and long term planning decisions should be made on good policy and community benefits The Site is in too close proximity to Canberra The Site location in the Sutton valley is not suitable as the area is regularly subjected to fog and other poor weather conditions The development does not comply with AEMO suggested renewable energy zones The development is not located in a renewable energy zone identified by the NSW Government The Site is unsuitable as the development requires higher voltage than 132 kV power lines for more efficient energy transfer The proponent prematurely selected the Site before 	<p>The Site has been previously disturbed, and as such, would avoid any requirements for significant vegetation clearance, limiting the potential to impacts on native flora and fauna</p> <p>Availability of land of a suitable scale for a viable commercial-scale solar farm project; and</p> <p>Suitability of the land for solar farm construction and operation, including minimal shading, suitable topography, site accessibility, low flood risk and proximity to existing townships and access to a local labour force.</p> <p>The Project, including site selection, design and assessment is considered to be in accordance with the Solar Guidelines (DPIE, 2018) as the Project would located where:</p> <ul style="list-style-type: none"> There are optimal solar resources There is suitable land area There is suitable geology It would avoid flood prone areas There is adequate road access Land that minimises local impacts, including impacts to visual amenity Would avoid significant native vegetation impacts Land can be rehabilitated to pre-existing or better condition The community broadly supports the Project The area has been designated as optimal for renewable energy It is in proximity to electricity network and connection capacity <p>The COP21 commitments of the Australian Government, announced in Paris in December 2015 (the Paris Agreement) did not influence the Site selection for the Project.</p>	275481 275749 275769 275773 275775 275919 275879 275921 275930 276005 276033 276077 276047 276062 276143 276158 276168 276175 276179 276294 276413 276561 276650 276736 276884 277044 277458 277480 277555 277597 277633 276166 277439 277643 277757

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>determining the financial feasibility of the Project</p> <ul style="list-style-type: none"> The development does not meet Draft Large-Scale Solar Energy Guidelines The topography of the land will inhibit operations Impacts to the natural environment in the area The size of the development in the area The development is an insensitive use of land Far reaching impacts due to shared boundaries with multiple properties The sustainability of the Site as there are other areas more suited with more sunlight and higher solar generation capabilities Flora, fauna, health and amenity impacts should be considered more when choosing the Site The Yass Valley LEP protects high quality agricultural land One family financially benefiting at the expense of the surrounding community The development will benefit the ACT economy The development should provide employment in rural areas away from the nation's capital 	<p>The Site is currently utilised for livestock grazing which would continue, appropriately, albeit at a lower level during operation of the Project. The Site is not designated as prime agricultural land. Soils on the Site generally have a low agricultural potential with high acidity and low chemical fertility.</p> <p>The Land and Soils Capability Assessment Scheme (OEH, 2012) has rated the majority of the Site as Class 4 lands indicating that limitations exist for high impact land uses including agriculture. In addition, the Site is not listed as Biophysical Strategic Agricultural Land (BSAL). The closest area of BSAL is located in the township of Tarago approximately 40 km to the east.</p> <p>Future residential expansion into the surrounding region would be subject to revised zoning. It is noted that residential expansion would generally not support the objectives of the proposed RU6 Zone and is therefore considered unlikely.</p> <p>The Project is anticipated to support growth in the surrounding area through: The generation of employment through both construction and operation; Opportunities for training and up-skilling of the local and regional workforce to further contribute to the delivery of renewable energy projects across Australia; and Significant contribution to local and regional economies through increased demand for accommodation, goods and services from travelling contractors.</p> <p>The Site has been zoned RU1 Primary Production under the Yass Valley LEP.</p>	<p>277437 277595 277639 276166 277439 277643 278023 278015 278016 278006 277883 277814 277788 277786 277735 277775 277889 275286 275243 272833 275654 276062 298392 298394 298416 298424 298428 299500 272733</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> • The Yass Valley Region and Sutton will not directly benefit from the development • Other areas would be more suited for a solar development of this magnitude • The development is not suited to the landscape of a scenic rural valley • The development has the potential to expand for batteries and more solar panels requiring a larger area 	<p>The Yass Valley Settlement Strategy 2036 (YVC, 2017) proposes an RU6 Transition Zone of 5 km from the ACT border to separate rural from urban lands and protect natural rural land and high quality natural environments. The Project may be located within this proposed zone (depending on final RU6 boundaries). While a solar farm is not an agricultural use, the presence of it would not comprise the village character or surrounding agricultural uses by virtue of the stringent mitigation and management measures aimed at significantly reducing amenity impacts.</p> <p>The centre of Canberra (identified as Parliament House), classified as the nearest major centre to the Site is located almost exactly 22 km from the southern boundary of the Site. The southwest corner of the Site is 3.3 km from the ACT border and 4.3 km from the nearest suburb of Canberra (Bonner). Due to the nature of the Project not resulting in significant impacts from noise, pollutants or waste, it is considered that the Project would pose no impact on the Canberra metropolitan area.</p> <p>The objective of the Project is to develop a viable, commercial-scale solar energy plant, which would deliver a low cost, low carbon, renewable energy source for the benefit of all energy users within the National Electricity Market (NEM). The NEM supplies around 9 million customers.</p> <p>The idea of the Renewable Energy Zones (REZ) in the Australian Energy Market Operator's (AEMO) Integrated System Plan is to encourage cost-effective integration of new generation by targeting transmission network upgrades to these areas. The Springdale Project connects to an existing transmission line with adequate capacity and no need for a network upgrade.</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>Notwithstanding, the Project is located within the Southern NSW Tablelands Renewable Energy Zone (REZ 11) identified by AEMO Integrated System Plan. While the REZ 11 zone was identified as primarily a wind priority area, AEMO also identified the capacity for up 1,000 MW of potential solar capacity within this zone.</p> <p>The NSW Government provided a submission to AEMO on its Integrated System Plan. The submission is supportive of renewable energy zones (including three priority zones) to support the future development of efficient and strategic transmission investment across the NEM. However, as discussed above, the aim of these zones is for strategic and cost-effective upgrade of the transmission network to allow for a much higher penetration of renewable energy generation in Australia. It does not preclude the development of distinct renewable energy projects on parts of the transmission network that do not require upgrade, such as the Springdale Solar Farm.</p> <p>Topography on the Site is gently undulating and suitable for a solar farm. Operations would not be inhibited by the topography.</p> <p>As outlined in Chapter 5.0 of the EIS, surrounding landowners were extensively consulted throughout the planning of the Project. Visual impacts to neighbouring properties would be reduced through the planting of screening vegetation (refer to the Landscape and Visual Impact assessment addendum report attached in Appendix B).</p> <p>A community fund of \$100,000 has been set aside for the benefit of the wider community. The use of this fund would be subject to ongoing discussion with the surrounding</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>community. Additional community benefits would include the sealing of part of Tallagandra Lane, which would provide improved access to the Site and for nearby residents. It is noted that this upgrade would only be undertaken if a Voluntary Planning Agreement is able to be reached with YVC.</p> <p>The Project is proposed to operate as a 100 MWac PV solar facility for a period of 35 years prior to decommissioning and returning the Site to existing agricultural land uses. Should expansion or extension of operations be proposed in the future, these would be subject to further environmental assessment and approval.</p>	
	Project need and justification	<p>Submitters are concerned that:</p> <ul style="list-style-type: none"> • The information that has been presented has been unjust and misleading to the community • Lack of transparency about the need and justification for the development regarding demand and supply • The surrounding Sutton community, the Yass Valley Region or NSW does not directly benefit from the development as it benefits the ACT • Uncertain how this site was selected and why it was selected for this area • The ACT would be purchasing the energy generated • The development needs to be located on land that will not impact a local community 	<p>As outlined in Section 2.2.5 of the EIS, the Australian energy market is largely dominated by the generation of electricity from fossil fuels. With an ageing fleet of coal-fired power stations approaching the end of their operating lives, significant new capacity is needed over the medium to long term. It is estimated that in total, 8,000 MW of new generation capacity is be required to replace these coal assets upon their retirement. The Project, being a large scale source of renewable energy, would assist in meeting this generation requirement.</p> <p>The objective of the Project is to develop a viable, commercial-scale solar energy plant, which would deliver a low cost, low carbon, renewable energy source for the benefit of all energy users within the NEM. The NEM incorporates around 40,000 km of transmission lines and cables, about 200 terawatt hours of electricity and supplies around 9 million customers. Through providing 100 MWac of electricity to the NEM, the Project would provide benefit to all of the 9 million customers of the NEM.</p>	<p>277889 275286 275243 274725 274089 275459 275654 275666 275715 275769 275743 275787 275919 276047 276143 276160 276413 276650 277437 277593 277597 276166</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> While the location was selected for political reasons and for the landowner's financial benefit, the development should also be compatible with community expectations The proposed Site has low solar exposure levels and does not fall within the optimal solar generation of the region The development will increase electricity prices The development is not worth the 30 years of usage Who are the beneficiaries? The ACT does not have a high electricity demand The ACT roof top solar growth is efficient and will continue without this development. Other NSW solar developments that benefit NSW should be a priority over this development Questions the Project need given that a second energy supply is planned to open in 2020 in the northern suburbs of the ACT Questions the alternative options for site locations and various destinations for power in the ACT 	<p>As outlined in Section 2.3.1 of the EIS, an extensive site selection process was undertaken and involved the consideration of a number of alternative locations for the proposed solar farm. The Site was shown to be more suitable than alternative locations considered and was selected on the following basis:</p> <ul style="list-style-type: none"> The Site has a high-level of solar resource and ideal climatic conditions for a commercial-scale solar farm; The Site is in close, optimum proximity to existing electrical grid infrastructure with sufficient connection capacity; Other network electrical efficiencies: alleviating transmission and distribution losses for generation at this connection point in the network due to high, and growing, energy demands in the region; Availability of land of a suitable scale for a viable commercial-scale solar farm project; and Suitability of the land for solar farm construction and operation, including minimal shading, suitable topography, site accessibility, low flood risk and proximity to existing townships and access to a local labour force. <p>The Project would provide an ongoing supply of low-cost energy to the region, this addition to the regions renewable energy portfolio will contribute to reducing energy price pressures on industry and households and reducing loss factors in the region.</p>	277643 277757 277775 277773
	Strategic alternatives to the project	<p>Submitters:</p> <ul style="list-style-type: none"> Queried why the development is not being proposed in Armidale, Dubbo or Hay – the three suggested areas 	<p>The Project is located within the Southern NSW Tablelands Renewable Energy Zone (REZ 11) identified by the AEMO Integrated System Plan. While the REZ 11 zone was identified as primarily a wind priority area, AEMO also</p>	276033 276143 276158 276736 277480

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> Suggest keeping the current land use and increasing solar panels on rural residential buildings Suggest there are other suitable locations that do not impact on communities Believe the government should invest in independent renewable energy for households Believe that NorthArm Cove would be more suitable 	<p>identified the capacity for up 1,000 MW of potential solar capacity within this zone.</p> <p>As outlined in Section 2.3.1 of the EIS an extensive site selection process was undertaken and involved the consideration of a number of alternative locations for the proposed solar farm. The Site was shown to be more suitable than alternative locations considered.</p> <p>Given the estimated loss of up to 8,000 MW of energy capacity as a result of the retirement of ageing coal-fired power stations, large scale renewable energy projects are required across the whole NEM to meet this deficiency. Large scale projects provide a stable and low-cost supply of energy. Despite this, the Project has proposed the option of a rooftop solar PV and battery system for all landowners within 1 km of the Project.</p>	277555 274811
	Project options	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> The location of the development near a major city Whether other options were considered and if the Site selection process was adequate The energy generated being for the ACT and suggesting the Site should therefore be located in the ACT Seeing a detailed proposal as to how a single access tracking solar development will work on an undulating site The criteria for site selection needing to be more appropriate, responsible, safe and transparent 	<p>The Site is uniquely located to contribute to the additional electricity demand across the whole NEM over the coming decades. Annual NSW & ACT energy consumption is forecast to grow at an average rate of 0.5% per annum over the next 10 years, as a result of projected population and economic growth. TransGrid already supplies over 386 MWac of peak demand into the Canberra substation, and another 76 MW into Queanbeyan. These numbers are projected to increase in Queanbeyan in particular, according to TransGrid's Transmission Annual Planning Report 2019 (TAPR).</p> <p>As outlined in Section 2.3.1 of the EIS an extensive site selection process was undertaken and involved the consideration of a number of alternative locations for the proposed solar farm. The Site was shown to be more suitable than alternative locations considered and was selected on the following basis:</p>	278611 278278 277775 274811 276047 276179 277593

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> • Were the original options proposed by the NSW government considered? • Whether there are other available sites in the Yass Valley Region that could be used. 	<ul style="list-style-type: none"> • The Site has a high-level of solar resource and ideal climatic conditions for a commercial-scale solar farm; • The Site is in close proximity to existing electrical infrastructure with sufficient connection capacity; • Other network electrical efficiencies: alleviating transmission and distribution losses for generation at this connection point in the network due to high, and growing, energy demands in the region; • Availability of land of a suitable scale for a viable commercial-scale solar farm project; and • Suitability of the land for solar farm construction and operation, including minimal shading, suitable topography, site accessibility, low flood risk and proximity to existing townships and access to a local labour force. <p>The objective of the Project is to develop a viable, commercial-scale solar energy plant, which would deliver a low cost, low carbon, renewable energy source for the benefit of all energy users within the NEM. The NEM incorporates around 40,000 km of transmission lines and cables, about 200 terawatt hours of electricity and supplies around 9 million customers. Through providing 100 MW of electricity to the NEM, the Project would provide benefit to all of the 9 million customers of the NEM.</p> <p>Solar panel mounting technologies considered included fixed-tilt, north-facing panel mounting systems and single-axis tracking systems. Single-axis tracking systems are typically aligned north-south and track the sun east to west moving throughout the day following the movement of the sun. This range of motion allows for the solar panels to maximise their sun exposure, including when located at sites such as that of the Project. Spacing between rows of panels would be sufficient to avoid significant self-shading.</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>The Site is currently utilised for livestock grazing which would continue appropriately, albeit at a lower intensity during operation of the Project. Soils on the Site generally have a low agricultural potential with high acidity and low chemical fertility. The Land and Soils Capability Assessment Scheme (OEH, 2012) has rated the majority of the Site as Class 4 lands indicating that limitations exist for high impact land uses including agriculture. In addition, the Site is not listed as BSAL. The closest area of BSAL is located in the township of Tarago approximately 40 km to the east.</p>	
Project description	Project description	<p>Submitters are seeking clarification on:</p> <ul style="list-style-type: none"> • The method and frequency of site maintenance • The source of the labour force, equipment and supplies during construction and operation • How the Project will be powered • Firefighting capacity, equipment and plans • Site access for fire trucks and proximity to neighbouring boundaries • Whether the tree plantings will be fire resistant • How decommissioning would be financed • What type of solar cells are proposed • The extent of earthworks to level the Site for the panel tracking arrays • Expected noise generation from fans and water pumps 	<p>A description of the Project including a site description, key project components, construction activities and operation and decommissioning details are provided in Chapter 3.0 of the EIS.</p> <p>Operation of the Project would be largely automatically controlled with inputs from the meteorological stations and other equipment. Planned maintenance activities would likely include:</p> <p>At minimum monthly inspections covering electrical, civil and environmental operational performance; Annual cleaning of modules and meteorological stations; Vegetation management in line with a Biodiversity Management Plan. It may be possible that sheep grazing could be retained within the Site to maintain undergrowth as well as to retain agricultural productivity of the land. Grazing would reduce fuel use and emissions associated with grass cutting, as well as lowering bushfire threat and maintaining habitat for threatened species; Preventative maintenance and other activities as defined in the operation and maintenance management plans; Corrective maintenance activities would include testing and replacing of faulty plant components such as modules, fuses</p>	<p>277788 277784 277735 289428 275743 276650 277044 277480 277555 277633 277639 277643 277757 299500</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> How surplus energy would be dissipated Effects of weather on the construction timeframe The investment value of the development The vague project description creates opportunities for the Project to change during construction and operation and lead to further impacts on the environment and community Vehicle access to and from private property where the driveways go through the Project Site Project details as information provided has been vague and inadequate What security measures to control public access to the Site would be put in place The Project design has not considered a gas pipeline and two national fibre optic cables that run through the Site Tintinhull Road re-alignment works have commenced by another developer Would the proposed substation be decommissioned as it would be owned by TransGrid Further details requested on Project operation and maintenance including use of 	<p>and other corrective actions within the operation and maintenance scope; and Weed and pest control.</p> <p>Ongoing consultation with TransGrid has identified that sufficient capacity is available on the existing 132 kV transmission line for the inclusion of the Project operating at maximum capacity. Surplus energy is therefore not anticipated.</p> <p>In the early stages of design development, a constraints analysis was undertaken that identified the location of all utility assets that may be located within the Project area. During this exercise a gas pipeline was among the utilities identified. As such, the Project has been designed in such way as to avoid this pipeline and to ensure appropriate clearances are met from other utility assets.</p> <p>Water pumps would be required for the operation of fixtures including toilets and taps within the office building, however given the size of the pump required; potential impacts at surrounding properties are not anticipated. While pumping of water for the cleaning of solar panels may be required during the operation of the Project. Water carts would be used for this task. The noise output of a watercart is similar to a small tractor or similar farm machinery. Additionally, cleaning tasks would generally be located a significant distance from neighbouring properties. As such, any noise impacts would be intermittent, short in duration and minimal.</p> <p>Construction workers, equipment and materials would be sourced from the local area as much as practicable. The operational workforce would similarly be sourced from the local area and consist of approximately five long term full time equivalent positions with an additional up to five to ten full time positions during the initial defect liability period of</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		sensor lighting, maintaining grass cover and washing of the solar panels.	<p>operation (an estimated two years). Further details regarding employment are provided in Sections 3.3.4 to 3.3.6 of the EIS.</p> <p>The control building and project infrastructure would be powered by either a direct connection from the local distribution network or via the auxiliary supply of the high voltage transformer. In order to ensure safe and continuous operation of the facility, backup systems would be provided.</p> <p>A static water supply for firefighting/bushfire management at the Site would be provided and would include: A 20 kL water supply tank within four metres of the control building hard stand or a suitable all-weather access track; and Fittings compliant with Rural Fire Service truck requirements.</p> <p>In consideration of the potential for fire risk as a result of the planting of screening vegetation, this vegetation would consist of planted native vegetation and would be planted outside of an asset protection zone. The asset protection zone provides a minimum of 10 metres from the perimeter of the solar PV arrays. The screening vegetation would be located an additional 10 metres from the asset protection zone, providing a minimum 20 metre buffer between the solar PV arrays and the screening vegetation.</p> <p>The capacity for the NSW Rural Fire Service (RFS) to service the Project in the event of an emergency, any associated firefighting equipment requirements and plans will be determined in consultation with RFS as part of the Fire and Emergency Management Plan.</p> <p>No private access driveways to neighbouring properties pass through the Site. Two public roads, Tallagandra Lane</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>and Tintinhull Road, which cross portions of the Site, would remain open for public use throughout construction and operation of the Project.</p> <p>Following the 35 year operational lifetime of the Project, decommissioning activities would remove all above ground infrastructure and rehabilitate the Site to return it to its current predevelopment condition with the aim of resuming agricultural activities. The proponent will set aside a fund to finance any decommissioning activities. Specific works to be undertaken as part of decommissioning activities are outlined in Section 3.5 of the EIS. Infrastructure owned by other parties, such as TransGrid, would not be decommissioned as part of the Project.</p> <p>The operation of the inverters within the containerised power stations on site would require the operation of fans to dissipate generated heat. These fans are the contributing factor for noise generated from sound power stations and has been included in the noise assessment for the Project, as outlined in Chapter 12 and Appendix G of the EIS.</p> <p>A security fence, indicatively 2.2 metres in height, would be constructed around the solar arrays. The fence would be designed to minimise the visual impact of the fencing while ensuring it is appropriate for security and safety purposes. In addition, closed circuit television (CCTV) cameras would be installed around the perimeter to further ensure site security. The project's security fence would also include a lockable entrance gate to ensure security of the facility is maintained outside of manned operational hours and to prevent unauthorised access. The location of emergency access gates in the security fence will be determined in consultation the Rural Fire Service as part of the Fire and Emergency Management Plan</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>The construction period is expected to be approximately 12 months in duration (not including commissioning). This estimated duration takes into account expected weather conditions over that extended period at the Site. It is noted that the majority of construction activities would continue under all conditions, when safe to do so.</p> <p>The project is expected to require minimal bulk civil earthworks as the layout of the solar panels and tracking system would generally follow the existing topography of the Site. Minor grading or earthworks may be required for levelling some areas of land to accommodate the construction of tracking systems, as well as access tracks, and the footings of the substation and power conversion stations.</p> <p>Based on the initial design and the current solar engineering, procurement and construction market the estimated gross capital investment value of the Project would be approximately \$138,000,000.</p> <p>The proponent has entered into a Connection Process Agreement with TransGrid for the scoping, design and interconnection of the Project into the TransGrid transmission network. Ongoing consultation with TransGrid has confirmed that there is sufficient capacity on the existing 132 kV transmission line for the Project during operation.</p> <p>As outlined in Section 15.2.2 of EIS, based on the distance of solar farm infrastructure from the Site boundary, the Project would be compliant with criteria for human exposure for magnetic and electric fields for offsite receptors.</p> <p>Since the publication of the EIS, the</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>Tintinhull Road upgrade works have been completed. This work was carried out independently of the Project and independently of the proponent. As such, this work no longer will form part of the Project.</p> <p>Sensor lighting for security would only be associated with the operation of maintenance facilities and electrical switchyard and substation. No grazing activities would be undertaken in the vicinity of these facilities that have the potential to unintentionally trigger any sensor lighting. In addition, neighbouring properties are also located a significant distance from these facilities.</p> <p>Grass cover beneath the solar panels would be maintained to reduce potential issues associated with erosion and surface water runoff. After seeding, grasses would be left to grow naturally and would be maintained through the grazing of sheep between solar panels, with supplementary mechanical slashing.</p> <p>It is generally considered that rainfall is sufficient to clean the solar arrays and use of supplied tankered water would be used only when required. Should manual or robotic cleaning be required, this could potentially require approximately 1 litre of water per panel.</p>	
	Project suggestions	<p>Submitters have suggested:</p> <ul style="list-style-type: none"> Altering the design to reduce impacts on visual amenity by: <ul style="list-style-type: none"> Widening planting belts to allow for greater species diversity and ecological offsets Smaller boundary fences on the inside of plantings rather 	<p>Screen planting would be provided to reduce visual impact on surrounding properties. Screen planning areas have been designed to include a minimum screen planting width of 20 metres in most areas and include a mix of native trees, shrubs and grasses. A full list of proposed species is provided in the updated Landscape Plan (Refer to the LVIA addendum report attached in Appendix B). Selected species are considered consistent with the vegetation in the surrounding region and would not pose a greater fire risk to the Site or surrounding community. The existing pocket of</p>	<p>278015 278016 277824 276158 277555 277757 273912 277775</p>

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		<p>than at site boundaries to be less intrusive</p> <ul style="list-style-type: none"> • Additional mitigation measures for traffic safety during school hours including extra traffic management and traffic calming measures between 7:30-9am and 3:00-5:30pm • Traffic turning right into Tallagandra Lane not left onto private driveway after entering Mulligans Flat Road • Fire retardant trees should be planted • Reducing the size of the development • Increasing the number of trees to be planted • Using ground mounted photovoltaic systems • Alternative traffic routes to avoid Sutton Village and most houses including an alternative route for trucks from Sydney taking Shingle Hill Way then left into Sutton Road, then right into Mulligans Flat Road, then left into Tallagandra Lane • Alternative traffic route to avoid school zones, sharp corners and less traffic - Gunning to Sutton Road, Murrumbateman Road and Tallagandra Lane. 	<p>vegetation in the western portion of the Site would not be impacted by the Project.</p> <p>Fencing would be designed to ensure appropriate security of the Site is maintained. This would involve a fence of an indicative height of 2.2 metres, inside the screening vegetation where possible.</p> <p>Heavy vehicles are proposed to be excluded from the school zone on Bywong Street and Victoria Street during the periods where the 40km/h speed limit is enforced (8.00–9.30 am and 2.30–4 pm on school days). This will be confirmed through the development of the Traffic Management Plan in consultation with the Yass Valley Council and Roads and Maritime Services, along with associated management measures for the successful implementation of this exclusion period.</p> <p>Section 14.2.1 of the EIS incorrectly stated that the traffic route identified for the construction of the Project would involve a left turn 300 metres after entering Mulligans Flat Road. This should instead be read that a right turn onto Tallagandra Lane would be undertaken 300 metres after entering Mulligans Flat Road.</p> <p>The project has been designed with the objective of developing a viable, commercial-scale solar energy plant, which would deliver a low cost, low carbon, renewable energy source for the benefit of all energy users within the NEM. Given the constraints of the Site, this has resulted in an estimated generation capacity of 100 MWac.</p> <p>The proposed tracking structures would be mounted on piles, which would be screw or pile driven depending on final geotechnical analysis. This eliminates the need for concrete</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>and foundations which significantly reduces the impact of construction, keeping ground disturbance to a minimum and allowing the design to follow the existing topography. Pile mounted panels also allow for the use of single axis tracking systems which track the sun east to west throughout the day. Single axis tracking systems have the benefit of improving the yield per panel, therefore allowing a smaller development footprint for the Project. Reducing the development footprint provides for increased flexibility in site design to avoid environmental constraints and reduce impacts. Since the publication of the EIS the proponent has continued to seek opportunities to reduce the project footprint. As discussed in Chapter 6.0, the proponent is proposing to remove a bank of solar panels to the south of the Site from the project footprint.</p> <p>The proposed traffic route has been selected based on an assessment of potential constraints including:</p> <ul style="list-style-type: none"> • Road grades; • Possible overhead clearance obstructions; • Bridges and culverts; • Road widths and turning radii; and • Road surface. <p>The proposed route provides the most direct access while also providing the most accessible site access route for heavy vehicles. However, the proposed route as detailed in the Project EIS will be subject to review in response to ongoing consultation with Transport for NSW (TfNSW) and Council during the development of the Traffic Management Plan (TMP) for the Project. All viable routes will be considered as part of this process.</p>	
Consultation	Pre-EIS exhibition	<p>Submitters are concerned that:</p> <ul style="list-style-type: none"> • Pre-EIS consultation with the community has been inadequate 	<p>Consultation objectives and activities are discussed in detail in Chapter 5 of the EIS.</p>	<p>278015 278016 277814</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>resulting in a lack of trust in the EIS</p> <ul style="list-style-type: none"> • Consultation has not been undertaken with all affected neighbouring properties • Quantifiable evidence of community support for the Project has not been provided • The level and quality of consultation at information sessions has been inadequate • They have been misinformed about project impacts and that conflicting information has been provided by the proponent • Site selection was not based on community consultation rather an agreement with the landowner • Decision making has not been transparent • Information flow from Renew Estate has been poor • Promotional information provided during consultation was a misrepresentation of the proposed project • The consultation process with the Yass Valley Council has been inadequate • That Renew Estate are incapable of carrying out the consultation and negotiation functions as set out in the EIS 	<p>A number of engagement activities were undertaken during early project planning, EIS scoping and EIS preparation. These activities included:</p> <ul style="list-style-type: none"> • Project website <ul style="list-style-type: none"> - www.springdalesolarfarm.com.au went live in October 2017 and is updated with new project information as it becomes available. • Newsletters <ul style="list-style-type: none"> - five community update newsletters provided key information about the Project, answered community questions, notified the community about information sessions and provided updates on the Project timeline • Community information sessions <ul style="list-style-type: none"> - The first community information session held on 7 December 2017 provided key information about the Project and gave the community access to Renew Estate Staff. - An additional community information session was held during EIS exhibition on 8 August 2018 which provided further project information and a forum for community members to have concerns heard by Renew Estate staff. <p>An initial project briefing and ongoing face-to-face meetings, emails and telephone calls have been undertaken with adjoining landowners to identify and understand any concerns or land use conflicts, and to discuss mitigation measures for potential impacts. In addition, several local landowners have formed a consolidated neighbour group and several face-to-face meetings were held with this group.</p> <p>Following exhibition of the EIS, the proponent received 117 community submissions in support of the Project in addition to 109 community submissions objecting to or raising</p>	<p>277735 277775 277773 277889 275479 276650 277480 277593 277439 277643 277757</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> The consultation process has not resulted in the voices of locals being heard The community was not given enough notice before the EIS exhibition Community consultation was not meaningful but merely a tick box exercise. 	<p>concerns about the Project. Given that more submissions were received in support than in objection, the proponent believes there is significant community support for the Project. All of these submissions are available on the DPIE Major Projects website.</p> <p>As described in Section 2.3.3 of the EIS, the initial design of the Project was developed in consideration of community feedback collected prior to the exhibition of the EIS. As part of this process, the development envelope reduced in the west to mitigate visual impacts to residential receivers. Since the exhibition of the EIS, and as discussed in more detail in Section 6.0, the proponent has proposed a number of design refinements in response to feedback received by the community, aimed at reducing potential impacts to nearby receivers.</p> <p>Consultation with YVC has been regular and ongoing during the preparation of the EIS. A number of meetings were undertaken providing updates on the Project and to discuss the potential VPA.</p>	
	During EIS exhibition	<p>Submitter is concerned that:</p> <ul style="list-style-type: none"> The EIS exhibition period is not long enough The EIS exhibition process is heavily weighted against the community 	<p>The EIS was placed on public exhibition for 42 days between 18 July 2018 and 29 August 2018. This exceeds the minimum public exhibition period for State Significant Development applications outlined in Schedule 1 of the <i>Environmental Planning and Assessment Act 1979</i> of 28 days.</p> <p>During the public exhibition period, the proponent received 226 submissions, indicating that the length of the submission period was sufficient to the extent that the community were given an appropriate opportunity to respond to the EIS. In the process of developing this RtS report, each individual community submission was examined in detail to identify and understand the issues raised. The</p>	277773

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			content of each community submission was reviewed and categorised according to the key issues (eg traffic and transport) and sub-issues (eg construction traffic, or operational traffic, etc.) raised. The issues raised in each submission were then extracted, summarised, and collated within this table, and responses have been provided that are proportionate to the relevance of the issue. As such, it is considered that the proponent has ensured that community feedback has been appropriately sought, reviewed, and responded to as part of the EIS exhibition process.	
Biodiversity	Adequacy of assessment	<p>Submitters believe the EIS is inadequate because:</p> <ul style="list-style-type: none"> • There is insufficient information about impacts to native wildlife and migratory birds • It lacks an assessment on movement corridors and impacts of fences on native wildlife • The method regarding bird surveys was unclear • There is not sufficient mention of the importance of: <ul style="list-style-type: none"> - Mulligans Flat Reserve - Goorooyarroo Nature Reserve - Yellow Box – Red Gum Grassy Woodland - Horse Park Wetland - Jerrabomberra Wetland • It does not discuss the impacts of heat and temperature rise from solar panels on: <ul style="list-style-type: none"> - migratory birds - golden sun moth 	<p>Appendix 5 of the Biodiversity Development Assessment Report (BDAR) (refer to Appendix B of the EIS and the updated BDAR in Appendix A of this RtS report) provides a threatened species matrix and status and likelihood of occurrence table. This table assesses the potential for impacts upon numerous native species and migratory birds.</p> <p>A diurnal bird survey and checks around hollow trees was undertaken between 24 - 27 October 2017 and consisted of 4 x 20 - 60 minute bird surveys as well as opportunistic observations.</p> <p>At its closest point, the Mulligans Flat Reserve and Goorooyarroo Nature Reserve are located approximately 3.8 km and 5.5 km to the south of the Site respectively. Due to significant historical agricultural clearing, there is a lack of bridging vegetation between the reserves and the Site. Impacts on the reserves from the Project are therefore not anticipated. However, as discussed in Section 7.2 despite the lack of contiguous habitat connectivity between the Project and, Goorooyarroo Nature Reserve, the Project would contribute positively towards management directions for Goorooyarroo Nature Reserve.</p>	278023 277773 275286 274089 275459 275666 275921 276005 276650 276884 277597 277439 277757 299500

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> - legless lizard • It does not discuss the impact of drought as a reason for the following threatened species not being present during survey: <ul style="list-style-type: none"> - Yellow Box Blakely's Red Gum Woodland - Derived Native Grassland of the South Eastern Highlands - Golden Sun Moth - Superb Parrot - Dusky Wood swallow - Scarlett Robin - Sittella - Striped Legless Lizard 	<p>Similarly, Jerrabomberra Wetland is located about 15 km from the Site and as such impacts from the Project are not anticipated. For this reason, these items were scoped out of requirements for detailed assessment.</p> <p>As described in the EIS, PV solar panels with their darker surfaces, are typically less reflective of energy (or heat), leading to increased heat absorption (as opposed to heat amplification and reflection) in the context of the surrounding landscape. As such, it is considered highly unlikely that the solar farm would result in heat impacts to migratory birds, GGS and SLL. The extent to which the solar farm would be likely to heat the surrounding area and cause injury to animals is discussed in more detail in the section below.</p> <p>The project will improve the condition of woodland through the establishment and management of a Woodland Enhancement Zone, as shown in Figure 7 of the BDAR attached in Appendix A.</p> <p>Patches of Yellow Box Blakely's Red Gum Woodland Derived Grassland occur in the north western corner of the Site as well as within the development envelope. Based on the vegetation plot surveys within and surrounding the development envelope, vegetation within the development envelope correlating to Yellow Box Blakely's Red Gum Woodland (Derived Native Grassland) did not have sufficient vegetation integrity scores (i.e. plot score of <15) to require further assessment under the BAM. Further assessment was therefore not required.</p> <p>Native vegetation and flora surveys were undertaken by Niche Environment and Heritage between 24 and 27 October 2017 and 2 to 3 June 2018 using survey methods</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>consistent with the NSW BAM. In addition, the following were undertaken:</p> <p>Targeted GSM survey (by Alison Rowell) in accordance with “EPBC Act Policy Statement 3.12 – Significant Impact Guidelines for the Critically Endangered Golden Sun Moth (<i>Synemon plana</i>)” (2009).</p> <p>SLL habitat survey (by Robert Speirs) was undertaken in December 2017 and 15 June 2018 respectively.</p> <p>The wide extent of the survey period is considered to provide an acceptable environmental baseline for the Site.</p>	
	Construction impacts	<p>Submitters are concerned that construction will:</p> <ul style="list-style-type: none"> • Cause heavy equipment to impact on wildlife including skinks and turtles • Cause increased traffic to impact on wildlife • Level the ground and threaten flora and fauna • Remove trees causing impacts to <ul style="list-style-type: none"> - Birdlife - CO₂ increase - Erosion - Wind breaks - Loss of shade. 	<p>The BDAR did not identify any species of skinks or turtles including the Grass Skink (<i>Lampropholis delicata</i>) and Eastern Earless Three-toed Skink (<i>Hemiergis talbingoensis</i>) that would be affected by the Project.</p> <p>Although increased construction traffic has the potential to impact upon surrounding wildlife, potential impacts would be minimised as far as practicable through ensuring vehicles remain on designated roads and tracks whenever possible, through use of signposting and driver education during the induction process and in ongoing project discussions. This would be outlined in the Traffic Management Plan for the Project.</p> <p>The extent of clearing of native vegetation communities is conservatively estimated at 5.38 ha. The majority of vegetation likely to be affected by the proposed solar farm has been subject to historic clearing and other agricultural activities such as grazing and cropping and is therefore thinned, fragmented and predominantly consists of exotic pasture. Only seven paddock trees containing tree hollows including <i>Eucalyptus mannifera</i>, <i>E. bridgesiana</i> trees would require removal, which would not result in a significant impact upon birdlife, CO₂ emissions, erosion, wind breaks or</p>	<p>277771 277969 277757 277814</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			shade impacts. In addition, the Project would include planting native screening trees which have the potential to provide bird habitat, shade, wind breaks and reduce erosion.	
	Operation impacts	<p>Submitters are concerned that operation will:</p> <ul style="list-style-type: none"> • Create shade and negatively impact biodiversity • Create a “lake effect” and increase death of birds and insects • Result in birds wings getting burnt from heat off the solar panels • Impact on bird flight paths • Create fences that block wildlife movements • Degrade soil and encourage the growth of: <ul style="list-style-type: none"> - Patterson’s curse - St John’s Wort - Sorrel - Yass River Tussocks weeds. 	<p>Shading of grassland has the potential to affect GSM, however, the Project has been designed to avoid the majority of areas identified as significant habitat therefore minimising potential impacts. In addition, A GSM conservation area and a woodland enhancement area would be established with the aim of preserving and enhancing possible GSM and suburb parrot habitat. Also, the Project has been designed such that a stand of hollow-bearing <i>Eucalyptus mannifera</i> (Brittle Gum) in the south-east corner of the Site, adjacent to Tintinhull Road, that is potential Superb Parrot breeding habitat, will be retained. Additionally, as discussed in the BDAR (Appendix A) the discontinuation of current pasture improvement practices and the limitation of grazing intensity in the area should lead to overall ecological improvements within the Site.</p> <p>Pole mounted solar panels can be anticipated to reach approximately 25°C above the ambient air temperature² on their surface. Generally PV solar panels are rated for operation at an ambient temperature of 25°C and are therefore designed to operate as close to this temperature as possible. Given the above, it may be possible for birds or other fauna to come into contact with solar panels during hot weather where the panels may exceed 50°C, however, this would be infrequent in nature due to the panels only reaching these temperatures during the middle of the day, on clear days, during the middle of summer. At these higher temperatures it is considered unlikely that injury to fauna would occur. In addition, it is anticipated that birds and other fauna would, upon contact with hot panels, move on to avoid</p>	<p>278006 277883 277784 275654 275743 277757 277788 277458</p>

² <https://solarcalculator.com.au/solar-panel-temperature/>

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			<p>further contact. Furthermore, PV solar panels are designed to absorb energy as efficiently as possible, as a primary function of their intended purpose – to convert this energy to electricity. As described in the EIS, PV solar panels with their darker surfaces, are typically less reflective of energy (or heat), leading to increased heat absorption (as opposed to heat amplification and reflection) in the context of the surrounding landscape. As such, it is considered highly unlikely that the solar farm would result in heat injuries to birds should they fly above the Site. To provide context, it is generally accepted that a solar farm would reflect less than, or no more heat than a typical residential development, or carpark, and that this heat would dissipate rapidly whereby air temperatures at a height of 2 m above large solar farms have been measured at about 0.7 degrees Celsius hotter in the summer (Barron-Gafford et al 2016 and Yang et al 2017).</p> <p>The Department of Planning (DoP 2010) Discussion Paper for Renewable Energy Generation was referenced in the EIS to confirm that solar panels do not produce noticeable glare compared to existing roofs or building surfaces. The findings were supported by other sources including the FAA Technical Guidance for Evaluating Selected Solar Technologies on Airports (FAA, 2010).</p> <p>As such, it is concluded that solar panels would generally appear as regular ground surface for birds. In addition, solar field areas are not proposed to exceed 750 metres in width at any point across the Site, allowing a suitable distance between bird habitat areas. Between solar farm areas, the land would remain vegetated and consist of either pasture or trees and would provide suitable refuge for bird and fauna species on the Site.</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>Solar panels would extend up to four metres above the natural ground level and would therefore be below the flightpath of migrating birds.</p> <p>It is recognised that certain fencing types have the potential to limit the movement of certain wildlife (such as small and medium mammals) through the landscape. Whilst 2.2 m security fencing is proposed around parts of the Site the use of this fence type would be limited to the operational areas only. The perimeter of the land would remain with rural style post and wire fencing, allowing movement of native animals. It is also noted that security fencing would not prevent the movement of important species such as GSM and superb parrot.</p> <p>Four high threat weeds were recorded during field surveys during preparation of the EIS. The high threat weed species are sporadically distributed throughout the Site particularly where high levels of soil disturbance and nutrient enrichment have occurred. High threat weeds include:</p> <ul style="list-style-type: none"> • Dallas Grass (<i>Paspalum dilatatum</i>); • Ripgut Brome (<i>Bromus diandrus</i>); • Sheep's Sorrel (<i>Acetosella vulgaris</i>); and • Serrated Tussock (<i>Nassella trichotoma</i>). <p>The project would implement a number of management and mitigation measures during both construction and operation to manage the growth and spread of weeds (refer to Chapter 8.0).</p>	
	Management and mitigation measures	<p>Submitters believe management and mitigation measures in the EIS:</p> <ul style="list-style-type: none"> • Are inadequate • Require proof from government departments that nature reserves 	<p>Management and mitigation measures outlined in Chapter 20 of the EIS aimed to reduce the impacts of the Project on biodiversity as far as practicable. As described previously, a range of management and mitigation measures have been proposed (refer to Chapter 8.0) to minimise the potential environmental impacts of the Project during both</p>	<p>275743 276650 277480 299500</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>and wildlife movements will not be impacted</p> <ul style="list-style-type: none"> • Lack research on weed and feral species management • Require more detailed information on habitat loss for: <ul style="list-style-type: none"> - Striped Legless Lizard - Scarlett Robin - Kangaroo - Pest species • Are at risk of failure leading to detrimental impacts to the following: <ul style="list-style-type: none"> - Yellow Box Blakely's Red Gum - Natural Temperature Grassland - Golden Sun Moth - Superb Parrot. 	<p>construction and operation. With effective implementation of the identified management measures, significant impacts to the surrounding environment are not anticipated. These measures would form part of the Conditions of Consent for the Project, should it be approved, and the proponent would therefore be obligated to comply with them. The mitigation measures would be further detailed within a suite of management plans which need to be approved by DPIE as part of the Condition of Consent.</p> <p>In addition, the proponent has aimed to avoid and minimise environmental impacts from the Project during the design process with a particular emphasis on avoiding impacts, including the following:</p> <ul style="list-style-type: none"> • Avoidance of threatened ecological communities (i.e. Box Gum Woodland and derived native grassland); • Potential Striped legless lizard habitat would be completely avoided and protected; • The majority of GSM habitat would be avoided and habitat a GSM habitat conservation and improvement zone would be established; and • Superb Parrot breeding and foraging habitat would be retained and clearing controls incorporating survey for the species and provision of breeding and foraging habitat around the development envelope. <p>Where relevant, the mitigation and management measures provided in Chapter 8.0 have been updated to reflect these avoidance and mitigation management features. These measures also include provision of how weeds would be managed.</p>	
	Not specified	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> • Impacts of site fencing native wildlife including their movement 	<p>The project has been designed to minimise impacts on flora and fauna as far as practicable with a particular emphasis on the following:</p>	<p>278026 278006 277824 277786</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> Effects of the projects large area on habitat connectivity and coverage for fauna from predators Loss of critically endangered habitat for key species including: <ul style="list-style-type: none"> Golden Sun Moth Legless Lizard Superb parrot Hawks Wedge Tailed Eagle White owl Proximity to, and impacts on nearby nature reserves including: <ul style="list-style-type: none"> Goorooyarroo Nature Reserve Mulligans Flat The introduction and spread of weeds as a result of the Project Impacts to wildlife movement corridors and flight paths including for: <ul style="list-style-type: none"> Golden Sun Moth Superb Parrot Legless Lizard Kangaroos Echidnas Lizards Kangaroo mortality from vehicle strikes by project employees Tree planting proposed for the Project is inadequate in mitigating impacts on biodiversity. 	<ul style="list-style-type: none"> Avoidance of threatened ecological communities (i.e. Box Gum Woodland and derived native grassland); Potential Striped legless lizard habitat would be completely avoided and protected; The majority of GSM habitat would be avoided and habitat a GSM habitat conservation and improvement zone would be established; and Superb Parrot breeding and foraging habitat would be retained and clearing controls incorporating survey for the species and there would be provision of breeding and foraging habitat around the development envelope. <p>The design of the Project has incorporated a range of avoidance, mitigation and management measures with regard to impacts on threatened and non-threatened species. As outlined above, the impact of the development upon birds arising from heat effects is considered to be negligible. This is true for all species, particularly birds of prey such as hawks and eagles, and nocturnal birds such as owls.</p> <p>It is recognised that certain fencing types have the potential to limit the movement of certain wildlife (such as small and medium mammals) through the landscape. Whilst 2.2 m security fencing is proposed around parts of the Site the use of this fence type would be limited to the operational areas only. The perimeter of the land would remain with rural style post and wire fencing, allowing movement of native animals. It is also noted that security fencing would not prevent the movement of important species such as GSM and superb parrot.</p> <p>Proposed vegetation planting is outlined in the Draft Landscape Plan (refer to Appendix B). Vegetation would consist of 20 metre wide screen planting zones, in the</p>	277775 277969 275243 274811 274725 272739 272737 272835 274089 275459 275479 275481 275654 275666 275749 275919 276043 276062 276168 276175 276179 276561 276884 277044 277437 277480 277595 277597 276166 277757 277773 298428

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			<p>majority of locations, containing a variety of native trees, shrubs and grasses and is generally considered to provide additional habitat for fauna species. Areas identified as medium quality GSM habitat have been avoided during the design of both the solar field area and landscape plan.</p> <p>As discussed above, at its closest point, the Mulligans Flat Reserve and Goorooyarroo Nature Reserve are located approximately 3.8 km and 5.5 km to the south of the Site respectively. Due to significant historical agricultural clearing, there is a lack of bridging vegetation between the reserves and the Site. Impacts on the reserves from the Project are therefore not anticipated. However, as discussed in Section 7.2 despite the lack of contiguous habitat connectivity between the Project and, Goorooyarroo Nature Reserve, the Project would contribute positively towards management directions for Goorooyarroo Nature Reserve.</p> <p>Measures to prevent and manage Broad-leaved weeds in GSM conservation zone and solar field areas would be implemented in the Biodiversity Management Plan for the Project. While the Project has the potential to result in the dispersal and spread of weeds through the use of vehicles, control would primarily be through confining vehicle and machinery movements to formed access tracks where possible. A vehicle wash down procedure may also be implemented for vehicles entering and exiting the Site.</p> <p>Construction traffic would be limited as far as practicable through the provision of a shuttle bus for workers that would minimise vehicle numbers throughout construction and decommissioning. In addition, strict speed limits would be implemented for workers both on and offset. These measures (as described in Chapter 8.0) would assist in</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			ensuring road safety and would also limit the potential for kangaroo mortality from vehicle strikes by project vehicles.	
Aboriginal heritage	Adequacy of assessment	<p>Submitters believe the EIS is inadequate because:</p> <ul style="list-style-type: none"> It underestimates the cultural and archaeological significance of the valley Consultation with RAPs and the EIS failed to acknowledge the cultural significance of the project area to local Aboriginal communities Local Aboriginal heritage values have not been appropriately identified and recorded The archaeological and cultural heritage survey undertaken was too cursory The surveys were undertaken at a time of poor visibility which hampered the identification of artefacts The report omits information on important artefact sites such as the Reidsdale Collection of over 7,000 artefacts within 1.5 km of the Project Site There is no mention of the nearby Ochre Quarry which is 3km from the Project Site. <p>Submitters queried:</p> <ul style="list-style-type: none"> Whether there has been a native title claim with 2 km of the Site 	<p>A specialist Aboriginal Archaeological and Cultural Heritage Impact Assessment (AACHIA) was conducted to identify the Aboriginal cultural values associated with the Site and assess the potential impact of the Project on identified Aboriginal cultural heritage values. During the survey it was noted that poor soil visibility conditions were present on the Site and therefore subsurface testing would be necessary to adequately characterise the Aboriginal archaeological record of the Site. However, a review of the existing archaeological and environmental context of the Site suggests that material evidence of past Aboriginal activity within the area is likely to be restricted to flaked stone artefacts in surface and subsurface contexts and scarred trees where mature trees remain. The archaeological survey was therefore able to identify:</p> <ul style="list-style-type: none"> A total of 145 individual stone artefacts; A total of 15 Aboriginal archaeological sites, comprising: 12 open artefact sites comprising four isolated artefacts and 8 artefact scatters, and 3 potential Aboriginal scarred trees. <p>Consultation throughout the assessment was undertaken in accordance with OEH's <i>Aboriginal Cultural Heritage Consultation Requirements for Proponents</i> (DECCW, 2010). During this consultation process, four Registered Aboriginal Parties (RAPs) provided input on the draft methodology. No specific cultural heritage values relating to the Site were identified by RAP respondents.</p> <p>During preparation of the AACHIA, a public notice was placed in the Bungendore Weekly on 18 October 2017 and letters were written inviting expressions of interest (EOI)</p>	<p>278015 278016 277755 277757 276062</p>

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		<ul style="list-style-type: none"> Whether impacts on Aboriginal communities had been fully assessed. 	<p>from Aboriginal people who hold cultural knowledge of the area. These parties were requested to provide assistance in determining the significance of Aboriginal object(s) and/or places in the vicinity of the Project. A total of seven organisations (RAPs) registered an interest in the assessment:</p> <ul style="list-style-type: none"> Corroboree Aboriginal Corporation; Didge Ngunawal Clan; Thunderstone Aboriginal Cultural and Land Management Services Aboriginal Corporation; Gulgunya Ngunawal Heritage Aboriginal Consultancy; Muragadi Heritage Indigenous Corporation; Murri Bidgee Mullangari Aboriginal Corporation; and Ngambri Local Aboriginal Land Council (LALC). <p>Information regarding the Project was then provided to the RAPs prior to a fieldwork component undertaken with a total of five RAPs participating. RAPs were then sent a draft of the AACHIA and the Project's AAR for review and comment. The RAPs were provided with 28 days to provide comments. Following this period, RAPs who had not provided comments were contacted again. All RAP comments were accepted up to submission of the AACHIA. This process is deemed acceptable for members of RAPs to provide input into the development.</p> <p>The AACHIA identified the Reidsdale campsite as containing 1,500 or more stone artefacts and manuports. However, as it is located a suitable distance from the Site (4.5 km), no impacts are anticipated.</p> <p>The one and a half hectare Gollion Ochre Quarry was gazetted as a place of Aboriginal Significance on 17 August 2018, four months after the completion of the AACHIA in April 2018. The quarry, which is located approximately 3.5</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>km to the west of the Site, would not be impacted by the Project.</p> <p>Searches of the Schedule of Applications (unregistered claimant applications), Register of Native Title Claims, National Native Title Register, Register of Indigenous Land Use Agreements and Notified Indigenous Land Use Agreements were undertaken in November 2017, with no relevant listings identified for the Site.</p>	
	Construction impacts	<p>Submitters raised concerns about:</p> <ul style="list-style-type: none"> The discovery of additional Aboriginal archaeological artefacts being identified at the Site Additional Aboriginal archaeological artefacts being disturbed. 	<p>A total of 15 Aboriginal archaeological sites, comprising 12 open artefact sites and three potential Aboriginal scarred trees were identified within the Site. Consideration of the location of these archaeological sites within the Site and proposed exclusion areas for environmental constraints, indicates that three open artefact sites comprising two artefact scatters and one isolated artefact site would be wholly impacted by the Project. No potential scarred trees would be affected.</p> <p>As discussed in more detail below, an archaeological salvage program comprising focussed test excavations, is proposed to be undertaken prior to construction commencing. This program would further investigate any potential for previously unidentified Aboriginal archaeological sites to be present on the Site. In addition, the management and mitigation measures for the Project include “an unexpected find protocol” that would be implemented (refer to Chapter 8.0)</p> <p>It is noted that should any subsurface sites be identified through the test excavations that warrant mitigation through archaeological salvage (i.e., open area excavations) the triggers and provisions for this will be detailed within the Aboriginal Cultural Heritage Management Plan (ACHMP) for the Project.</p>	274089 275459

Issue category	Issue topic	Issue summary	Response	Submitter IDs
	Management and mitigation measures	<p>Submitter suggests that:</p> <ul style="list-style-type: none"> A comprehensive archaeological salvage program be undertaken prior to ground disturbance, as mentioned in the EIS 	<p>An archaeological salvage program is proposed to be undertaken prior to construction commencing.</p> <p>The proponent has undergone consultation with DPIE to discuss timing of the archaeological salvage program. As part of this consultation, a heritage specialist was engaged to provide advice regarding the suitability of a post-approval archaeological salvage program. This timing is considered appropriate based on the following:</p> <ul style="list-style-type: none"> It is anticipated that sites identified during the archaeological test excavation will be consistent with those identified during the archaeological survey for the Project (i.e., low to moderate density artefact sites) The presence of sites of high significance within the Project Site, such as burials, stone arrangements or regionally rare artefact scatters are not anticipated. Regardless, the proponent has committed to the <i>in-situ</i> conservation of any such sites and this would be included in the Project's ACHM Should any subsurface sites be identified through the test excavation program that warrant mitigation through archaeological salvage (i.e., open area excavations) the triggers and provisions for this will be detailed within the ACHMP. <p>Details for the test excavation program and any associated mitigation measures, including conservation policies, will be included in the Project's ACHMP. RAPs will be provided with an opportunity to review and contribute to the ACHMP prior to its assessment and approval by DPIE. Completion of the test excavation post-approval provides an opportunity for detailed design to occur, allowing for a more targeted test excavation program, should impact areas be reduced, that can be focused on areas that will be subject to ground disturbances as a result of the Project.</p>	<p>277439 277755</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
Landscape and visual	Adequacy of assessment	<p>Submitters are concerned that:</p> <ul style="list-style-type: none"> The EIS lacked design detail about size, height, construction material and colour which would impact on visual amenity Impacts to visual amenity were not adequately addressed as residents were not consulted The EIS understates the impacts on visual receptors The Discussion Paper by the Department of Planning on solar panels not producing noticeable glare is a disputed information source The description of residential dwellings with direct views is inaccurate The EIS did not adequately address the issue of properties on high ground that would have a view of the solar farm in the valley The lack of design detail could lead to changes in the development and proposed screening measures The EIS did not adequately consider the impacts of glint and glare Photographs used to assess visual impacts were a misrepresentation of the visual landscape from their home. 	<p>Chapter 4 of the EIS identified key details and indicative images regarding the design of solar farm components including:</p> <ul style="list-style-type: none"> The modules would extend up to four metres above the natural ground surface, at their highest point during operation; PV solar panels would likely consist of polycrystalline silicon modules; The tracking structures would be mounted on galvanised steel piles; Power Conversion Stations (PCS) would have a total elevation of no more than four metres above ground. The PCS would be painted colours that best blends with the landscape; The switchyard and substation have been designed with an indicative footprint of 50 x 90 metres; and A steel control building would be constructed with a footprint of approximately 450 m². <p>The Department of Planning (DoP 2010) Discussion Paper for Renewable Energy Generation was referenced in the EIS to confirm that solar panels do not produce noticeable glare compared to existing roofs or building surfaces. The findings were supported by other sources including the FAA Technical Guidance for Evaluating Selected Solar Technologies on Airports (FAA, 2010).</p> <p>As demonstrated in Chapter 5.0 Consultation of the EIS, the former proponent developed a Landowner, Government & Community Engagement Plan for the Project. Forming part of the Engagement Plan is an Engagement Register which is a record of all significant meetings and telephone conversations with stakeholders and their contact details. Table 6 of the EIS sets forth the detailed captured in the Engagement Register, demonstrating that consultation with</p>	<p>278015 278016 277775 277773 276160 276650 277480 277597 277439 277643 277757</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>residents was carried out and included community meetings to discuss project design as well as site visits to relevant residents for the purposes of the Landscape and Visual Impact Assessment. As a result of this consultation, and as described in table 1 of the EIS, the preliminary development envelope was reduced to the west of the Site to mitigate visual impacts to residential receivers. In addition, as discussed in more detailed in Section 6.0 and in the Amendment Report, the initial design has been subject to refinement in response to consultation feedback received. As such, subsequent to the EIS being exhibited, and in response to community feedback, the proponent is proposing a number of design refinements to the Project to manage potential visual impacts. These include</p> <ul style="list-style-type: none"> Removal of one development area - one block of solar panels in the southeastern part of the Site, to the south of Tallagandra lane, would be removed from the project design Adjustment of the northern development area footprint and extension of screening vegetation. <p>The initial LVIA was conducted based on the layout design provided in Figure 3 of the EIS and was undertaken in accordance with industry standards with reference to methodologies set out in the following guidelines:</p> <ul style="list-style-type: none"> The Guidelines for Landscape and Visual Impact Assessment, Third Edition (2013), United Kingdom Landscape Institute and Institute for Environmental Management; and Guideline for Landscape Character and Visual Impact Assessment (v.2), Transport for NSW - RMS. <p>Key potential residential receptors were identified through a desktop review of topographic maps and aerial photography. This was followed by fieldwork including photographs to determine and confirm the potential extent and visibility of</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>the Project and ancillary structures from surrounding residential receptors. Photomontages showing the likely extent of visual impacts from select receptors were then prepared utilising a 3D model of the Project.</p> <p>The EIS assessed an initial design which would be subject to further refinement following approval, if granted. Potential changes to the design of the Project would be consistent with Conditions of Consent obtained for the Project and the impacts and development envelopes assessed within the EIS.</p> <p>An LVIA addendum report has been prepared to support this RtS and is attached in Appendix B. The LVIA addendum report has taken into account the proposed design changes listed above and in Section 6.0. While similar to the methodology undertaken the original LVIA produced for the EIS, the LVIA addendum also considers the following:</p> <ul style="list-style-type: none"> • The proposed design changes described above and in Section 6.0 • New residential receptors are included in the assessment. These consist of 2 new dwellings that were recently constructed and not assessed as part of the original LVIA, and dwellings that were captured in the expanded study area (see next point) • A larger receiving environment has been assessed in response to comments provided by DPIE (as shown on Figure 2 of the LVIA addendum report in Appendix B). <p>A glint and glare assessment was undertaken for the Project and provided in Appendix B of the EIS. This glint and glare assessment simulates the annual sun path against the proposed solar infrastructure. The results from this desktop glint and glare assessment identified that, for the Project,</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			there is no glare hazard predicted to be generated from the operation of the proposed single axis tracking solar array.	
	Operation impacts	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> The development causing a loss of visual amenity The development will cause glint and glare from the solar panels Higher lying property will not be screened from the development and therefore would be subject to glare and visual amenity impacts Glint and glare from the metal frames, supporting steel posts and associated infrastructure in a rural environment Proposed tree screening will not benefit elevated properties or provide screening until fully mature in about 20 years' time Sensor lighting during operation will impact on lifestyle and visual amenity Visual amenity impacts on current and future wineries and other community facilities (such as a wedding venue) will turn tourists away The Site is below an international flight path causing an eye sore and glare for tourists Power conversion stations will be an eyesore 	<p>The LVIA assessed potential visual impacts on both residential receptors and road users. The results of this assessment are provided in Section 9.3.2 of the EIS and identified that the majority of receptors would experience a negligible to low visual impact and an additional four receivers would experience a 'moderate' visual impact. Two residential receptors are predicted to experience a 'high-moderate' impact whereby their elevated location would result in views of the Project and only partial effectiveness of the proposed screen planting.</p> <p>As discussed above, an LVIA addendum (attached in Appendix B) has been prepared to support this RtS. In summary, the LVIA addendum produced a series of additional photomontages and additional assessment in consideration of the following:</p> <ul style="list-style-type: none"> Proposed design changes Addition of 2 new residential receptors (V16 and V17, constructed during the SSD planning process for the Project) Concerns raised regarding the effectiveness of the landscape screen planting A larger receiving environment has been assessed (resulting in additional photomontages) <p>The findings of the LVIA addendum are mostly consistent with the results of the original LVIA. An assessment of the additional photomontages that were provided for selected receivers found that the visual impacts of the Project to the residences are generally consistent with those identified and assessed as part of the original LVIA as follows:</p>	<p>278611 278026 277883 277824 277889 275304 276962 275459 275773 275921 275930 276033 276062 276650 277480 277757 299500</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<ul style="list-style-type: none"> Receptor V04 was assessed as having a visual impact rating of Moderate in the original LVIA, this has been reassessed as Moderate – Low in the LVIA addendum Receptor V05 was assessed as having a visual impact rating of High – Moderate. This has been reassessed as Moderate in the LVIA addendum V11 was assessed as having a visual impact rating of Moderate This has been reassessed as Moderate – Low in the LVIA addendum V14 was assessed as having a visual impact rating of High This rating is consistent in the LVIA addendum <p>The visual impacts to the new residential receptor (V16) at the new dwelling that was recently constructed after the public display of the EIS were found to be high, due to the close proximity of their residence to the Project. V17 would be subject to Moderate - Low visual impacts due to its elevated location and long-distance views of only a small area of the Project.</p> <p>Given these findings, the outcomes and recommendations of the assessment undertaken in the LVIA are still relevant and applicable. In order to reduce impacts to the new residential receptor, the proponent has proposed a design change whereby the boundary of one of the solar development areas would be shifted south, away for residential receptor V16 to allow for the extension of screening vegetation behind this receiver, while also avoiding the encroachment of screening vegetation into mapped GSM habitat. Further detail regarding this design change is provided in Section 6.0 and in the Amendment Report for the Project Amendment</p> <p>The potential for glint or glare associated with PV solar systems which do not involve solar concentrating through</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>the use of mirrors or lenses, are relatively limited. The nature of PV solar panels requires them to absorb as much solar energy as possible in order to maximise electricity generation. Notwithstanding this, a glint and glare assessment was undertaken (Appendix B of the EIS) which concluded that there is no glare hazard predicted to be generated as a result of the operation of the Project.</p> <p>Screening vegetation for the Project, as outlined in the updated Landscape Plan (refer to Appendix B) would include 20 metre wide screen planting zones, in most areas, containing a mix of native trees, shrubs and grasses. The selection of species considered and selected comprise those that are relatively quick to establish, to increase the likelihood that screening is provided early in the operation of the Project. Potential screening benefits of screen planting zones would continue to improve throughout the operation of the Project.</p> <p>Sensor lighting for security purposes would be installed at maintenance facilities and the electrical switchyard and substation. The nearest structure or dwelling to areas where sensor lighting is proposed is located approximately 650 metres away and filtered by mature trees, therefore no impacts are predicted.</p> <p>The nearest winery to the Site, Tallagandra Hill, is located approximately 5.5 km to the north of the Site and visual impacts on this property are not anticipated.</p> <p>Section 15.3 of the EIS identifies that given the low reflectivity of solar panels and the significant distance (19 km) to the nearest airstrip, the Project would not create any significant glint or glare issues for pilots.</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
	Management and mitigation measures	<p>Submitters believe:</p> <ul style="list-style-type: none"> Mitigation measures in the EIS are ineffective Proposed screening trees are not sufficient to reduce impacts on visual amenity Properties on elevated topography will not benefit from mitigation measures in the EIS Management measures in the EIS will not adequately prevent impacts of night lighting There are questions relating to how glare will be mitigated to not impact on drivers The project has not completed a Landscape Plan. 	<p>Mitigation measures have been identified with the objective to avoid, minimise, mitigate, rehabilitate/remediate, monitor and/or offset the potential impacts of the Project. Where possible, the first priority has been to avoid the impact. In instances where this is not possible or feasible, impacts would be reduced at the source or at the receptor through a suite of mitigation and management measures.</p> <p>As described in the EIS, there would be no lighting except for sensor lighting for security associated with the operation and maintenance facilities and electrical switchyard and substation. As no permanent lighting is proposed, the duration of visibility would tend to be occasional and temporary.</p> <p>During the operation of the Project, it may be necessary to undertake maintenance on the solar panels and power conversion stations at night time when the solar farm is not generating electricity. In such cases, localised temporary lighting may be required to ensure safe conduct of the maintenance work. Any such activities are expected to be short term and temporary, and any impacts are expected to be minor due to the nature of the rural area of the Site where there is a significant distance from most sensitive receivers. Additionally, the establishment of screening vegetation would further minimise the potential for any light spill impacts. That said, any future maintenance works would seek to minimise the impacts of nightworks by avoiding temporary light spill beyond the construction site where temporary lighting is required.</p> <p>An updated Landscape Plan is provided in Appendix B. This landscape plan considered community input through consultation activities and includes well integrated planted buffer areas of a minimum width (in most locations) of</p>	<p>278006 277883 277824 277784 277775 277773 277889 276005 276650 277480 277555 277597 277439 277643</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>twenty metres along sections of the Project boundaries to minimise the extent of the solar array when seen from surrounding receptor locations. The location of screening vegetation proposed in the EIS will undergo additional design refinement in consultation with DPIE to develop a detailed landscaping plan prior to construction. This plan would be submitted to DPIE for approval and would include further details on density, species, planting protocols, timing, monitoring and ongoing management.</p> <p>The potential for glint or glare associated with PV solar systems which do not involve solar concentrating through the use of mirrors or lenses, are relatively limited. The nature of PV solar panels requires them to absorb as much solar energy as possible in order to maximise electricity generation. Notwithstanding this, a glint and glare assessment was undertaken (Appendix B of the EIS) which concluded that there is no glare hazard predicted to be generated including to road users as a result of the operation of the Project.</p>	
	Not specified	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> • The loss of visual amenity • Impacts to visual amenity in a rural setting and with scenic views • Visual impacts of the solar farm being heightened due to existing population density • The large scale of the solar farm impacting visual amenity • The visual amenity of more residents will be impacted than stated in the EIS due to the undulating topography of the Site 	<p>Please also refer to the responses provided above for Operation impacts.</p> <p>The Site and its immediate surrounds are considered consistent with the general characteristics of the YVC LGA, being largely rural and undeveloped. The YVC LGA has a population density of 0.04 persons per hectare which is notably less than the average population density for NSW of 0.09 persons per hectare (ABS, 2016). The surrounding area is therefore considered to have a low population density and visual impacts would be restricted to receptors identified in Chapter 9.0 of the EIS.</p> <p>The project is not located within the immediate vicinity of any significant tourism sites or routes. Tallagandra Lane, being a</p>	<p>278146 278098 278023 278015 278016 278009 278006 277814 277788 277786 277784 277771 277733 275312 275308</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> Impacts to visual amenity affecting the development of their property Impacts to visual amenity on rural properties and lifestyle How the view of the development will impact businesses who have invested in building a function centre for weddings at the top of Talagandra Hill Tree plantings to screen the development are not effective as the trees are not big enough and take too long to mature The loss of visual amenity decreasing property values The size of the development impacting the landscape The development's visual impact affecting tourists. 	<p>low traffic thoroughfare, is not anticipated to be traversed by tourists on a regular basis and is anticipated to generally support access for local residents. The project is therefore not anticipated to result in a notable visual impact for tourists.</p> <p>Chapter 9.0 of the EIS assessed the impact on the magnitude of change for three landscape character zones. The change in landscape was assessed as moderate, however, with the implementation of screening vegetation and considering the temporary lifetime of the Project (35 years), the magnitude of impacts to the surrounding landscape character can be minimised to a low rating.</p>	275306 275286 274725 274089 275459 275666 275919 275921 276043 276062 276158 276160 276179 276294 276561 276736 277437 277458 277480 277555 277595 277597 277633 277639 276166 277643 277757
Water	Adequacy of assessment	<p>Submitters believe that the EIS was inadequate due to:</p> <ul style="list-style-type: none"> The flooding potential of the Site is well beyond that assessed in the EIS. The flood drawings are not realistic and should be reassessed 	<p>A flood assessment was undertaken for the Site using a two dimensional (2D) TUFLOW hydraulic model, with inputs from a hydrologic model using WBNM software, to evaluate the existing flood risk across the Site, provide input into the design of the Project and develop mitigation measures where necessary (Appendix F of the EIS).</p>	277824 277775 275286 275459 276033 276062 277555 277439

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> The flood assessment does not consider land conditions and project infrastructure once operational but rather assesses the existing environment Vague language in the EIS allows for changes to project scope and potential for more impacts such as related to groundwater. 	<p>This flood assessment identified the floodplain of the unnamed creek ranging from 150 m to 250 m wide, with 1% Annual Exceedance Probability (AEP) flood depths of less than 0.5 m. AEP refers to the probability of a flood event occurring in any year, as a percentage. A large flood which would have a 1% chance to occur in any one year, is described as 1% AEP. The floodplain along Back Creek is slightly more extensive, ranging from about 200 m to 350 m wide within the Site. The flood depths on the Back Creek floodplain are generally less than 1 m in the 1% AEP.</p> <p>The proposed locations of the solar fields have been set outside 1% AEP flood depths of >0.4m, which is the maximum depth beyond which is deemed by the proponent as an unacceptable risk to the asset. During a storm event the modules can be stowed horizontally until flood levels subside. In addition, the location of the control building has been set outside 1% AEP flood depths of >0.25 m and the location of the substation has also been set outside the 1% AEP flood extent.</p> <p>The results of the flood study for the Project concluded that flood impacts to surrounding properties would be negligible as the footprint of the temporary works compared to the wider floodplain area would be small.</p> <p>Groundwater standing water levels on the Site typically range from between 5 and 13 metres below the ground surface. It is proposed that high voltage cables would be buried around 1200 mm below the ground surface while steel piles for mounting solar panels would extend to approximately 2 to 3 m below the ground surface. Given the depth of groundwater onsite, it is considered unlikely that any works associated with the Project would intercept groundwater.</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
	Construction impacts	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> Contamination of the creek on site and groundwater as a result of construction The maintenance of natural water courses during construction Construction runoff into surface and groundwater catchments. 	<p>Potential impacts to surface water quality and quantity during construction would be managed through the implementation of an Erosion and Sediment Control Plan (ESCP), prepared in accordance with <i>Managing Urban Stormwater: Soils and Construction</i> (Landcom, 2004). This plan would manage potential impacts associated with erosion, mobilisation of sediment and other contaminants, changes in runoff characteristics and construction wastewater. In addition, procedures would be implemented and outlined in the Construction Environmental Management Plan (CEMP) for chemical storage, use and emergency spill management. Areas where groundcover is cleared or disturbed below the panels and in areas only used during construction would also be revegetated when practicable to further reduce potential surface water impacts.</p> <p>There is a minor risk of contamination of groundwater due to accidental spillages of fuel, lubricants, herbicides, sewage and other chemicals. This risk would be controlled through the implementation of procedures for chemical storage and use, and emergency spill management in accordance with the CEMP.</p>	277824 277784 275459 298432
	Operation impacts	<p>Submitters are concerned that the operation of the solar farm will:</p> <ul style="list-style-type: none"> Cause increased salinity Raise the water table Increase levels of silt and salt in runoff Negatively impact the Murrumbidgee catchment area Contaminate groundwater and the creek in the project area Use too much water in cleaning of solar panels 	<p>The project would not require the extraction of any water or affect the overall infiltration of water at the Site. In addition, the Site would remain vegetated with grasses throughout the operation of the Project. No impacts to salinity or the water table are therefore anticipated during operation.</p> <p>The groundcover maintained between and under all solar panels would ensure that surface water runoff and overland flow to the creeks onsite do not contain elevated levels of silt and therefore do not impact upon the Murrumbidgee catchment area. During operation, the runoff characteristics of the Site would be monitored. Should runoff regularly exceed that of the pre-development Site appropriate controls</p>	278006 277824 277775 277889 277757

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> • Cause cleaning chemicals to impact the local water catchment • Be subjected to flooding. 	<p>would be implemented. These may include the establishment of dams, vegetation, retention basins, infiltration trenches or swales.</p> <p>During operation it is considered that rainfall is generally sufficient to clean the solar arrays. In the rare instance it is not, tank water (using water carts) would be used when required. Should manual or robotic cleaning be required, this could potentially require approximately 1 litre of water per panel.</p> <p>The minor risk of contamination due to accidental spillages would be controlled through the implementation of operational procedures for chemical storage and use, and emergency spill management. These procedures would be documented in an Operation Environment Management Plan (OEMP).</p> <p>There is a risk of minor inundation of the solar field arrays. During a storm event the modules can be stowed horizontally until flood levels subside. Key infrastructure will be designed to accommodate sporadic inundation.</p> <p>Flood impacts to surrounding properties are not anticipated as the solar panels are raised above the floodplain. The installation of impervious solar arrays would not increase runoff from the Site, as they would allow rainwater to drain to the ground underneath the arrays and follow similar flow paths to those currently present on the Site.</p>	
	Management and mitigation measures	<p>Submitters are concerned that:</p> <ul style="list-style-type: none"> • While local bore water would not be suitable for solar panel washing, the Project should also be prohibited from using other 	<p>Water demands during operation would be satisfied by water imported (trucked in) to site or rainwater. Water obtained from groundwater bores is not proposed to be used for the washing of solar panels. In addition, no extraction of water from Back Creek or the unnamed creek on the Site is proposed.</p>	<p>278015 278016 277735 277773 277555 277439</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>valuable sources such as dam or stream water</p> <ul style="list-style-type: none"> Monitoring of the Project is required to ensure no impacts on the Yass River (on the Site) which feeds the town water supply Further information is required about mitigation and water management including about irrigation, recycling and panel washing The decision making process regarding selection and implementation of water control measures More detailed information will only be provided in an ESCP, which is yet to be developed. 	<p>As the water demands during operation would be satisfied by water imported to site (trucked in) and rainfall, the Project would not affect adjacent licensed water users or basic landholder rights.</p> <p>No irrigation is required for groundcover between solar panels which would be maintained through natural rainfall.</p> <p>Storage of hazardous materials such as oils, chemicals and refuelling activities would occur within appropriately bunded areas. Incidental spills, should they occur, would be intercepted by active spill management practices.</p> <p>The ESCP for the Project would be developed prior to construction activities commencing and updated as required as work progresses.</p>	277643
	Not specified	<p>Submitters are concerned that:</p> <ul style="list-style-type: none"> The project is in a floodplain and this could impact the development Groundwater could be contaminated from spills of chemicals during construction or operation Water contamination from cleaning chemicals or chemical spills could impact the Yass Valley Water catchment, dams and groundwater Contamination risks to water ways including the creek in the Project area, Back Creek and the 	<p>Measures to manage chemical storage, use and emergency spill management would be implemented and outlined in the CEMP during construction and the Operation Environment Management Plan (OEMP) during operation. In addition, the storage of hazardous materials such as oils, chemicals and refuelling activities would occur in bunded areas. No contamination originating from the Project is therefore anticipated to enter the creeks traversing the Site or into the Yass River catchment.</p> <p>Further responses regarding flood and contamination risk are provided above under Construction impacts and Operation impacts.</p>	277883 277814 274089 276561 277044 277480 277639 277757

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		Yass Valley water catchment are unacceptable.		
Land	Adequacy of assessment	<p>Submitters believe the EIS is inadequate because:</p> <ul style="list-style-type: none"> • It does not address possible soil contamination • It does not provide; <ul style="list-style-type: none"> - Geotechnical analysis - Land degradation - In-depth land impacts assessment • The land was inaccurately classified as poor due to the survey being undertaken during a drought • It incorrectly identifies the surrounding properties as large agricultural land holdings • Residents in close proximity on East Tallagandra Lane and Mulligans Flat Road should be included • The EIS provides too much scope for change in the development • Concerns of the old existing pine trees along the western side of Back Creek 	<p>Section 11.2.1 of the EIS outlines that potential agricultural derived contaminants could be present within the Site boundary. However, due to historic use of the Site for grazing and low level cropping any contamination within the Site would be low in quantity and would not pose a significant risk to the proposed development. Section 11.3 of the EIS also provides that there is a minor risk for contamination impacts could occur during the construction phase as a result of exposure of soils during earthworks and also due to accidental spillages of chemicals used in the construction process and potential sewage leakages from ablution facilities. However, this risk would be managed through the implementation of an Erosion and Sediment Control Plan (ESCP) and chemical storage and spill management procedures as part of a Construction Environmental Management Plan (CEMP). The risk of soil contamination during construction would be low with the implementation of this plan.</p> <p>Geotechnical analysis would be undertaken to determine the constructability of detailed design following approval of the Project. Geotechnical and constructability analysis is not required to obtain approval for solar developments.</p> <p>No targeted survey was undertaken to inform the land assessment in the EIS, which was therefore undertaken as a desktop study. This desktop study utilised extracts from a variety of publicly available online datasets that are considered to present an accurate and reliable representation of land conditions in the areas, and are appropriate for the assessment including:</p> <ul style="list-style-type: none"> • Australian Soil Classification (ASC) Soil Type Map of NSW 	278023 277775 277773 272731 276650 276884 277480 277439 277757 275286

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<ul style="list-style-type: none"> Land and Soil Capability (LSC) Mapping for NSW Estimated inherent Soil Fertility NSW 1500k Surface Geology Hydrologic Groups of Soils in NSW <p>Available information including the land use zoning of the surrounding area (RU1) indicates a minimum lot size of 40 hectares, and the classification of large agricultural land holdings.</p> <p>Impacts to residents in close proximity on both East Tallagandra Land and Mulligans Flat Road were assessed separately in other Sections of the EIS including Chapter 9: Landscape and visual impacts.</p> <p>The placement of solar panels would result in the removal of some existing trees however, the proposed solar field layout avoids areas associated with the two creek lines on the Site.</p> <p>To support the Land assessment provided in the EIS, a LUCRA has been prepared for the Project and is attached in Appendix C. The purpose of the LUCRA is to provide a detailed assessment regarding the potential for land use conflict to occur between neighbouring land uses. Whilst the LUCRA has identified several potential sources of land use conflict, it is recognised that the development would generally allow nearby existing land-uses to continue largely unaffected. The potential for land use conflict is considered to be manageable, especially in light of the mitigation/management measures and environmental management plans that will be implemented to manage amenity and other off-site impacts.</p>	
	Construction impacts	Submitters are concerned:	The project is expected to require minimal bulk civil earthworks as the layout of the solar panels and tracking system would generally follow the existing topography of the	275286 277757

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> The spreading of soil compaction during construction to surrounding properties The large-scale earthworks requirement to level the Site 	<p>Site. As described in Section 11.3.1 of the EIS the Project would result in varying levels of disturbance of approximately 190 ha within the Site during the construction phase. This disturbance has the potential to decrease the stability of soils and increase their susceptibility to erosion if not appropriately managed. In addition, soil compaction would occur where hardstand areas and internal access roads are created, reducing soil permeability. This would increase run off and the potential for concentrated flows, which may also contribute to erosion if not managed.</p> <p>However, the risk of erosion is considered low where appropriate erosion and sediment controls are implemented as part of the CEMP as described in Chapter 8.0.</p>	
	Operation impacts	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> The operation of the development will cause soil to be dislodged increasing the level of silt in the run-off The heat-island effect caused by the development will impact their land productivity Land contamination from the cleaning products used to maintain the development negatively impact the soil functioning The degradation of soil 	<p>As outlined in Section 1.3.2 of the EIS, once the Project is constructed and commissioned, minimal operational impacts to soils are likely to occur.</p> <p>PV solar panels are designed to absorb energy as efficiently as possible, as a primary function of their intended purpose – to convert this energy to electricity. As described in the EIS, PV solar panels with their darker surfaces, are typically less reflective of energy (or heat), leading to increased heat absorption (as opposed to heat amplification and reflection) in the context of the surrounding landscape. As such, it is considered highly unlikely that the solar farm would result a loss of productivity on neighbouring properties. To provide context, it is generally accepted that a solar farm would reflect less than, or no more heat than a typical residential development, or carpark. It has also been established that this heat would dissipate rapidly, whereby air temperatures at a height of 2 m above large solar farms have been measured at about 0.7 degrees Celsius hotter in the summer, and where a large solar farms have been measured to result in minimal temperature increase of</p>	<p>278006 277889 274089 275743</p>

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			<p>between 1.5 and 3 degrees Celsius in the immediate adjacent area (Barron-Gafford et al 2016 and Yang et al 2017).</p> <p>During operation the substances stored on-site would be limited to herbicides for weed control and small amounts of hydrocarbon fuels and oils on-site. Impacts of these chemicals would be minimised through appropriately storing such chemicals and only applying herbicides in appropriate areas as outlined in Section 11.3.2 of the EIS.</p>	
	Management and mitigation measures	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> About how Renew Estate will provide stabilisation and prevent erosion of the floodplain once mature pine trees are removed About impacts to existing dams cover by solar arrays and question if they will be filled in and excavated at decommissioning There is a lack of information on long term soil management of land under solar panels The development is in the wrong location and this cannot be mitigated 	<p>As outlined in Section 11.4 of the EIS, an ESCP would be prepared in accordance with the <i>Managing Urban Stormwater: Soils & Construction</i> (Landcom 2004) (Blue Book) to include provisions for stabilisation and soil erosion.</p> <p>The CEMP would ensure that all retained farm dams and associated drainage infrastructure would be maintained in a functional condition. However, if required due to solar field layout, existing dams would be filled in. During construction, any potential erosion and sedimentation impacts associated with soil disturbance would be minimised by undertaking works in accordance with the <i>Managing Urban Stormwater: Soils and Construction</i>, Volume 1, 4th edition (Landcom 2004) (the Blue Book).</p> <p>Upon decommissioning, solar infrastructure would be removed and the Site would be returned to a condition near to its current state, which would be suitable for future agricultural activities such as the current grazing regime.</p> <p>There would be further soil management measures to ensure the future viability of the Site for agricultural production, including guidance to mitigate pest and weed infestation, soil contamination and erosion. Further</p>	<p>277775 275743 277757</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>information regarding long term soil management is outlined in Section 11.3.2 and Section 11.4 of the EIS.</p> <p>Section 2.3.1 of the EIS provides justification of the Site selection process and conclusion. Suitable mitigation measures are provided in Section 11.4 of the EIS.</p>	
	Not specified	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> • Tree removal, earthworks and heavy storms would result in land erosion • Silt would occur on slopes if the earth is bare or covered in minimal grass • The development is not compatible with current adjacent land uses • The surrounding land should be rezoned industrial so people can financially benefit from other land uses • The development is a misuse of land • The development will impact agricultural land surrounding it • Solar arrays will impact soil functioning • The development will impact property access • The misuse of land will impact future residential and agricultural uses • The land provides an important buffer zone for maintaining a rural landscape 	<p>Measures to manage soil erosion would be implemented and outlined in the CEMP during construction and the OEMP during operation.</p> <p>Land use conflicts during construction to surrounding grazing and farming activities are expected to be minor, and any impacts would be temporary (approximately 12 months). In addition, upon decommissioning, the project would be readily returned to its original agricultural use.</p> <p>The project is considered compatible with the existing zoning of the Site (RU1 Primary Production) through supporting the ongoing use of the Site and surrounding area for agricultural purposes.</p> <p>As discussed above, to support the Land assessment provided in the EIS, a LUCRA has been prepared for the Project and is attached in Appendix C. The purpose of the LUCRA is to provide a detailed assessment regarding the potential for land use conflict to occur between neighbouring land uses. Whilst the LUCRA has identified several potential sources of land use conflict, it is recognised that the development would generally allow nearby existing land-uses to continue largely unaffected. The potential for land use conflict is considered to be manageable, especially in light of the mitigation and management measures and environmental management plans that will be implemented to manage amenity and other off-site impacts, as provided in Chapter 8.0.</p>	<p>277883 277720 274811 274725 275459 275666 275749 275743 276062 276294 276650 276884 277595 277639 277757 277458</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> Subdivision of land into smaller lots to allow the substation to remain after decommissioning would change future use The industrial development will change the nature of the land and spoil the environment 	<p>Property access during construction would be managed through a TMP to manage all construction related vehicle movement. Access to properties will be maintained throughout construction and operation. During operation, it is expected that internal site movements utilising the identified access roads would be minimal on the basis that the solar farm requires only intermittent monitoring and maintenance.</p> <p>Visual impacts to the existing rural landscape during construction are temporary in nature. The landscape plan (see Appendix B) provides well integrated planted buffer areas of a minimum width of 20 metres along much of the solar field boundaries to minimise the extent of the solar array would be visible from surrounding receptor locations.</p>	
Noise and vibration	Adequacy of assessment	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> The noise assessment does not account for the fact that noise will be deflected on to residents on the eastern side of the Project Site The EIS did not mention the impacts to proposed routes which include schools who will be impacted by extra noise of vehicles That the EIS raises questions regarding the noise assessment and which rural areas were used for the simulations and what was the topography of the areas That the EIS provides too much scope for changes in the development and operation of the facility eg: as part of the 	<p>Noise modelling for construction activities has been undertaken using the SoundPLAN 7.3 (industry standard) noise modelling software (refer to Appendix G of the EIS). The noise model was created to represent 'reasonable' worst periods and scenarios of construction works and included the following features:</p> <ul style="list-style-type: none"> Ground topography Ground absorption and reflection Receivers Construction noise sources <p>It can be expected that there may be differences between predicted and measured noise levels due to variations in instantaneous operating conditions, plant in operation during the measurement and also the location of the plant equipment. However, given that modelling represents a potential worst case scenario, impacts would be generally less than presented in the EIS.</p>	277775 277773 277439 277757 298432

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>noise management and mitigation measures “consider using bored piling for construction works where practicable”</p> <ul style="list-style-type: none"> That the EIS is uninformed and does not adequately assess the impacts of noise to neighbours 	<p>In addition, a construction traffic noise assessment was undertaken utilising conservative levels of traffic generation for both Mulligans Flat Road and Tallagandra Lane along the proposed haulage route. It was concluded that predicted road traffic noise levels were significantly less than the criteria outlined in the NSW Road Noise Policy (DECCW, 2011).</p> <p>Mitigation measures proposed in the EIS are designed to avoid, minimise, mitigate, rehabilitate/remediate, monitor and/or offset the potential impacts of the Project. Where possible, the first priority has been to avoid the impact. In instances where this is not possible or feasible, impacts would be reduced at the source or at the receptor through a suite of mitigation and management measures. Finally, where avoidance or reduction cannot be achieved to a practicable or acceptable level offsetting may be possible. Further detailed and/or site specific measures during construction would be identified by the appointed construction contractor during the detailed design and construction planning stage of the Project and development of environmental management plans.</p>	
	Construction impacts	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> Construction noise in a rural setting Construction noise from pile-driving excavation works The soil structure and topography in the valley heightening sound impacts from construction The noise of compressed brakes by construction traffic along the construction route 	<p>Predicted noise and vibration impacts during construction are presented in Section 12.3.4 of the EIS. Thirty four receivers were identified within a 2 km buffer of the Site and include a mix of residential dwellings and sheds. The noise impact assessment concluded that construction activities are expected to comply with the recommended Noise Management Levels (NMLs) at most receiver locations with the exception of four receivers, R1 360 Tallagandra Lane, R2 156 Kiaora Lane, R3 141 Tallagandra Lane, Sutton and R5 during certain construction stages.</p> <p>Exceedances of 11 dB(A) have been predicted during the Site establishment stage at receivers R1, R2, R3 and R5.</p>	<p>278611 278015 278016 277883 275459 275919 276650 277480 277555 277633 277643 277757</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> The close proximity to neighbours and the impacts of noise and vibration during construction The noise pollution as a result of increased heavy vehicle movement during construction How noise will be controlled and monitored during the construction phase Impacts of construction noise on wildlife Construction noise impacting nearby homes by exceeding noise in three categories: Site establishment, piling/foundations and assembly Questions raised about preventing construction noise impact on nearby homes 	<p>During the piling/foundations stage exceedances of up to 10 dB(A) have been predicted at R1 and R2. Exceedances of up to 4 dB(A) are predicted at R1 and R2 during the assembly stage. While these exceedances have been predicted, the construction noise levels at all the receivers for all the construction scenarios are typically predicted to be well below the 'highly noise affected' level of 75 dB(A). It is noted that the noise assessment is considered to represent a worst case scenario and noise levels would be lower than presented for significant periods of time as works that have an associated higher noise output are anticipated to be short term and temporary.</p> <p>Safe working distances for vibration with regard for structural damage and human response would be complied with when using piling rigs during construction. No vibration impacts are anticipated.</p> <p>A construction traffic noise assessment was undertaken utilising conservative levels of traffic generation for both Mulligans Flat Road and Tallagandra Lane along the proposed haulage route. It was concluded that predicted road traffic noise levels were significantly less than the criteria outlined in the NSW Road Noise Policy (DECCW, 2011).</p> <p>Construction activities would typically be undertaken during standard construction hours and would therefore not have significant impacts upon the surrounding wildlife, as the most active times for most species is typically at dawn and dusk.</p> <p>A Noise Management Plan (NMP) would be implemented for construction activities in order to manage potential noise impacts during construction. The NMP would contain a</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			variety of measures as outlined in Section 12.4 of the EIS. In addition a complaints management system would be established in the CEMP for the Project to ensure any community complaints regarding noise emissions are quickly and efficiently addressed.	
	Operation impacts	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> Operational noise from the solar farm including noise from: <ul style="list-style-type: none"> Monitors of solar panels Substation Transformers Switching gears Inverter stations Washing of panels Vehicles and machinery The noise pollution as a result of increased heavy vehicle movement during operation Questions regarding the noise created by the process of converting DC current to AC current 	<p>The operational noise assessment included the following assumptions in modelling operational noise scenarios:</p> <ul style="list-style-type: none"> All equipment would be operating simultaneously Emissions have been modelled under both neutral and adverse weather conditions Location of equipment, including inverters and substation, is as shown in the Site layout plan provided in Appendix G of the EIS. <p>The predicted operational noise levels comply with the most stringent (evening time) operational noise criteria at all locations. It is expected that the inverters (which are the dominant noise sources), would operate at a reduced load in the evening compared to during the daytime and as such the noise emission levels would also be reduced.</p> <p>Operation of the solar farm would generally not require heavy vehicles to access the Site. Minimal traffic movement generation is expected as a result of the operation of the solar farm, restricted to light vehicle movements of operational staff. Noise impacts caused by operational traffic were therefore considered negligible.</p>	273912 275459 277480 277555 277883 278016 278015 277757
	Management and mitigation measures	<p>Submitters</p> <ul style="list-style-type: none"> Question how noise will be managed and mitigated during construction and operation of the Project Believe the EIS does not propose mitigation measures for increased noise pollution from 	<p>Mitigation and management measures to minimise potential noise and vibration impacts are outlined in Section 12.4 of the EIS. As provided in the mitigation and management measures, a NMP would be developed and implemented for the project.</p> <p>To maintain operational noise levels below the applicable noise criteria a 2 m high, three sided 'horseshoe' shaped</p>	277735 277480 277555 298432

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>heavy vehicle movements as a result of trucking in water for the Project</p> <ul style="list-style-type: none"> Request additional mitigation measures for noise and vibration, including during nightworks 	noise wall would be included around select inverters as specified in Appendix G of the EIS.	
	Not specified	<p>Submitters are concerned</p> <ul style="list-style-type: none"> Population density will heighten the noise impacts of the solar farm The topography and wind will cause additional noise impacts Noise from the Site and additional traffic will impact surrounding properties Noise levels will increase in the area Noise pollution will cause anxiety amongst locals and impact on safety 	<p>The surrounding area is typical of the YVC LGA being of a rural nature. Based on this existing environment, minimum rating background levels (RBL) were assumed for residential receivers in the area based on Table 2.1 of the Noise Policy for Industry.</p> <p>A review of the Yass Valley Settlement Strategy has found that Sutton has not been identified as a priority urban growth area for the Yass Valley LGA. As such, it is not considered likely that the land use or population of the area surrounding the Site would increase such that the results of the noise assessment would no longer be considered relevant.</p> <p>Modelling undertaken for the Noise and Vibration Impact Assessment considered factors such as: topography, ground absorption and reflection, distance to receivers and construction noise sources. Additionally, the noise assessment was based on a 'worst-case scenario' for the construction and operation of the Project.</p> <p>Predicted road traffic noise levels are significantly less than the TfNSW Road Noise Policy (RNP) criteria during construction and are therefore considered negligible. In addition, the predicted operational traffic would be restricted to light vehicle access of operational staff which is also anticipated to result in negligible road traffic noise impacts.</p> <p>As outlined in Chapter 12 of the EIS, noise impacts are anticipated to be minor throughout both construction and</p>	<p>275459 275919 276294 277593 277643 277757</p>

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			operation of the Project. It is therefore considered unlikely that noise pollution would result in either anxiety or safety consequences within the surrounding community.	
Non-Aboriginal heritage	Adequacy of assessment	<p>Submitters believe the EIS does not adequately address:</p> <ul style="list-style-type: none"> The historical significance of the Site or surrounding areas with regard to family heritage. 	<p>A Historic Heritage Impact Assessment (HHIA) (Non-Aboriginal) was undertaken and provided in Appendix E of the EIS. The HHA was undertaken in accordance with the <i>NSW Heritage Manual</i> (NSW Heritage Office & NSW Department of Urban Affairs and Planning, 1996a) and with reference to the Burra Charter (the Australia ICOMOS Charter for Places of Cultural Significance) (ICOMOS (Australia), 2013).</p> <p>The HHIA identifies the historic history of the Reid/Read family who purchased small plots of land in the western portion of the Site in the late 1850's. Notwithstanding this and the historical values associated with its use as farm land from the early Nineteenth Century, the assessment of significance found that the significance criteria at a State or local level was not reached. As such, the Site's cultural landscape is not considered to have heritage significance. The assessment concluded that based on background historical research and field survey of the Site, it is concluded that the Project would not impact any historical heritage values.</p>	276650 277757
	Not specified	<p>Submitters believe:</p> <ul style="list-style-type: none"> The Site location has significant agricultural heritage value and is therefore not appropriate for development The Project Site has significant cultural and historic significance A house in close proximity to the Site was constructed in the 1880s. 	<p>The HHIA concluded that although the Site's cultural landscape contains aesthetic, natural and archaeological values associated with its occupation by Aboriginal people and historical values associated with its use as farm land from the early Nineteenth Century, based on an assessment of significance of these values, they do not meet significance criteria at a State or local level. As such, the Site's cultural landscape is not considered to have heritage significance.</p> <p>Based on background historical research and field survey of the Site, it is therefore concluded that the Project would not</p>	277786 277775 277555

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			impact any historical heritage values, including views and vistas from the historic villages of Gundaroo and Sutton.	
Traffic and transport	Adequacy of assessment	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> • That the traffic assessment data is out of date and does not adequately assess the traffic impacts of the Project • Traffic statistics were taken before the sealing of roads which now see increased use • Classifying traffic movements on Tallagandra Lane as minor is incorrect • The EIS has not addressed the impacts of the transport route going through school zones and emission impacts on schools • That they disagree with impacts on traffic and transport during construction identified in the EIS • The Project application provides too much scope for change eg: approximately 400 light vehicles and 75 heavy vehicle movements per day are anticipated • Extensive road works and light rail works in the ACT have caused drivers to utilise the route around the proposed development which the EIS did not address 	<p>The traffic and transport assessment provided in Chapter 14 of the EIS utilised traffic count data from the YVC Asset Management Program. Available data from YVC ranged from January 2008 to May 2016 and is considered to remain valid to the Project.</p> <p>A review of historical imagery from the identified traffic count locations in Table 48 of the EIS reveals that with the exception of one location (Tallagandra Lane, South of Casey Close), all locations were sealed at the time of sampling and remain sealed. The Tallagandra Lane location was not sealed and remains unsealed today. Traffic counts therefore remain valid.</p> <p>Traffic count volumes identified in the 2009 YVC that on average 147 vehicle movements occurred per day. This averages throughout the day to approximately one vehicle every 10 minutes which is therefore considered minor, according to the RNP. It is noted that traffic numbers would be expected to be largely contained to daylight hours and the early evening. Construction traffic would only occur during and immediately before and after standard construction hours.</p> <p>Heavy vehicles are proposed to be excluded from the school zone on Bywong Street and Victoria Street during the periods where the 40km/h speed limit is enforced (8.00–9.30 am and 2.30–4 pm on school days). This will be confirmed through the development of the Traffic Management Plan in consultation with the YVC and TfNSW, along with associated management measures for the successful implementation of this exclusion period.</p>	<p>278015 278016 277773 276884 277439 277757</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> The EIS was inaccurate in describing traffic as evenly spread throughout the day The EIS did not account for existing heavy vehicle movements from the recent introduction of spoil trucks depositing near Tallagandra Lane intermittently The measurement device on East Tallagandra Lane was broken at the time of 2015 traffic volume counts and provided the EIS with inaccurate information 	<p>Identified traffic movements in the EIS are based on anticipated volumes during peak construction activities (e.g. for heavy vehicles, a period of 2 months). For the majority of construction activities traffic volumes and subsequent potential impacts would be significantly decreased.</p> <p>Given the relative distance to the Site, developments within the Canberra metropolitan region would have a negligible effect on potential traffic on the road network surrounding the Site.</p> <p>Heavy vehicle movements associated with the depositing of spoil was not identified during site investigations and no information was available through online searches. Cumulative impacts with potential spoil dumping activities were therefore unable to be determined.</p>	
	Construction impacts	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> Impacts to road safety as a result of construction traffic Impacts to road quality during construction Increased traffic on Tallagandra Lane during construction Impacts to local driveways including the driveway at 156 Tallagandra Lane during construction Construction traffic impacting on: <ul style="list-style-type: none"> Cyclists Schools Day-care centres Sutton Village Sutton Post Office Wineries 	<p>Construction traffic has the potential to result in impacts to safety due to increased potential for conflicts with other vehicles, cyclists, pedestrians, stock and wildlife and increased levels of dust. To minimise the safety risk associated with additional project-related traffic a TMP would be developed that includes measures for all drivers to be under strict obligation to obey all speed limits, traffic controls and other road rules. Dust suppression measures would be employed to reduce the potential for any dust impacts as a result of construction traffic. Construction activities would be undertaken during standard working hours to further reduce amenity impacts. With appropriate controls no impact on human safety due to traffic volumes are anticipated</p> <p>In selecting the proposed heavy vehicle route for the delivery of materials, the nature of existing road surfaces, as well as the potential impact of project vehicles was</p>	278611 278098 278006 277883 277824 277788 277775 277969 277889 276997 275302 277005 276962 275286 274661 275771 273912 274089

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		<ul style="list-style-type: none"> - School buses - Horse riders - Bakery - General store • Construction traffic impacting the Camp street causeway and East Tallagandra Lane as a result of heavy vehicles needing to cross onto the wrong side of the road to navigate the roads • Alternative roads and routes were not explored for construction traffic • Road upgrades were not proposed before construction traffic • Impacts from construction traffic on narrow roads, Sutton Bridge and the culvert on Tallagandra Lane • Dust created from construction traffic • Current road conditions not being suitable for increased movement including: <ul style="list-style-type: none"> - East Tallagandra Lane - Tallagandra Lane - Mulligans Flat Road • Construction traffic adding to congestion • Construction traffic will create noise pollution • Policing of construction traffic 	<p>considered. The selected route generally travels along large regional, sealed arterial roads which are designed to handle such vehicles. Ongoing maintenance of the unsealed Section of Tallagandra Lane would be undertaken as required throughout construction.</p> <p>Within the two month peak delivery period, up to approximately 75 heavy vehicle movements per day are anticipated. Reviewing these additional 75 heavy vehicles and 400 light vehicle movements per day with respect to the existing traffic volumes, it is not expected that these additional vehicles would affect the Level of Service experienced on local roads such as Tallagandra Lane. In addition, the additional traffic volumes are not anticipated to impact upon the town of Sutton. The peak of heavy vehicle movements, being contained to two months would be relatively short in duration and avoid school pick up and drop off times.</p> <p>Access would be maintained to Tintinhull Road at all times.</p> <p>The proposed heavy vehicle route has been selected based on an assessment of potential constraints including:</p> <ul style="list-style-type: none"> • Road grades; • Possible overhead clearance obstructions; • Bridges and culverts; • Road widths and turning radii; and • Road surface. <p>The proposed heavy vehicle route provides the most direct access while also providing the most accessible site access route for heavy vehicles. The primary heavy vehicle route is considered suitable for construction traffic with the following enabling works being undertaken:</p>	275459 275481 275654 275666 275715 275773 275919 275930 276005 276033 276043 276062 276168 276413 277044 277480 277555 277633 277643 277757 298416 298428 299500

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> Construction traffic will not be well dispersed across the local road network like the EIS states 	<ul style="list-style-type: none"> Potential upgrade of the culvert on Tallagandra Lane, subject to further review prior to construction; Potential temporary relocation of signage at turn locations; Further review of transmission line heights to confirm there is sufficient clearance with heavy vehicles; and Minor road grading and paving of Tallagandra Lane if required, to restore the driving surface to a suitable smoothness and shape. This would apply to the unsealed portion of Tallagandra Lane that would be used for site access, extending from the northern-most site access point adjacent to the substation, to the point at which the road becomes sealed 150 m south of the Site Maintenance of the newly upgraded Tintinhull Road, where it would be used as part of the heavy vehicle route, as and when required. <p>Ongoing maintenance of Tallagandra Lane and the newly created Tintinhull Road section, would be undertaken as required throughout construction including grading and dust suppression.</p> <p>It is noted however, that the proposed heavy vehicle route as detailed in the Project EIS will be subject to review in response to ongoing consultation with Transport for NSW (TfNSW) and Council during the development of the TMP for the Project. All viable routes will be considered as part of this process. Regardless of any changes, appropriate management measures would still be applied as relevant.</p>	
	Operation impacts	<p>Submitters are concerned</p> <ul style="list-style-type: none"> The EIS did not account for an increase in traffic during operation from tourists visiting the solar farm 	<p>The Project is not anticipated to impact upon the potential future growth or numbers of tourists visiting the Sutton area.</p> <p>During the defect liability (DFL) period of two years, it is assumed that approximately 10 personnel would enter and</p>	<p>277782 276650 276736 277480</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> Increased road use will cause safety risks to children and local road users as well as wildlife and stock The lack of water in the area will lead to increased heavy vehicle movements during operation 	<p>depart the Site each day. This accounts for approximately 20 light vehicle movements. Post-DLF period, it is expected that approximately five personnel would enter and depart the Site each day. This equates to 10 light vehicle movements per day, assuming no car-pooling. It is expected that the volume of staff accessing the Site would have a very minimal increase in traffic flow on local roads based on their existing low traffic volumes.</p> <p>Water may be required to be transported to site to allow for the cleaning of the solar arrays. It is generally considered that rainfall is sufficient to clean the solar arrays and use of supplied tankered water would be used only when required. Should manual or robotic cleaning be required, this could potentially require approximately 1 litre of water per panel. This need is not expected to lead to significant increases in truck movements during operation.</p>	
	Management and mitigation measures	<p>Submitters are concerned</p> <ul style="list-style-type: none"> About who will pay for and facilitate repairs and maintenance to roads Construction traffic dust emission mitigation measure of water trucks spraying the road is not going to suppress the dust Removing signs to allow for plant and equipment will pose safety threats to the community Further mitigation measures are required The EIS does not adequately mitigate for the amount of trucks brining water to the area Construction workers will not use the proposed route and 	<p>Ongoing maintenance of the road surface would be undertaken by the Project as required throughout construction including grading and dust suppression. While reasonable effort has been undertaken to identify all likely constraints in the EIS, the contractor would undertake a risk assessment for suitability prior to installing the transformer or any major equipment on-site. Where upgrades are required this would be facilitated by the contractor in consultation with YVC and TfNSW.</p> <p>Prior to the commencement of construction an independent dilapidation survey ('pre-construction dilapidation survey') will be commissioned to document the condition of the site access route. Within one month following completion of construction, another independent dilapidation survey will be commissioned to document the condition of the route post-construction ('post-construction dilapidation survey'). Any</p>	277735 277775 276650 276884 277480 277555 277439

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>questions are raised about how this will be policed and issues reported</p> <ul style="list-style-type: none"> Concern that construction traffic will not follow the approved route, suggesting that compensation should be offered to those community members that may be impacted by any non-compliances The EIS is premature as there is no Traffic Management Plan Removing school speed signs at the corner of Bywong and Victoria Street may occur to allow for the passage of vehicles Mitigation measures of car pooling and shuttle bus arrangements to minimise traffic during construction will not be utilised 	<p>damage attributable to the Project will be reinstated to the pre-construction condition at the Project's cost.</p> <p>The TMP would be prepared prior to construction in consultation with YVC and TfNSW. The TMP would include a variety of measures to manage potential traffic impacts of the Project. It is standard practice to prepare the TMP after development consent is obtained.</p> <p>Traffic Control Plans (TCP) would also be prepared to detail the layout and nature of temporary traffic control devices necessary to ensure the safe movement within a particular area on the public road network. TCPs may include temporary signage/devices to notify road users, speed limits, detours, UHF frequencies and other changes to traffic conditions. The requirement for a TCP would be guided by regulatory requirements and HSE Risk Assessments.</p> <p>TCPs would be prepared by a suitability qualified person and would comply with the requirements of Australian Standard AS 1742.3 2009 <i>Manual of uniform traffic control</i> devices, Traffic control for works in roads and the Traffic Control at Work Sites manual (RTA 2010).</p> <p>Signs are not proposed to be removed; however there remains the potential for signage relocation to facilitate the safe movement of heavy vehicles. This would be undertaken in a way which avoids safety risks to road users.</p> <p>As outlined in Section 10.3.2 of the EIS plant establishment is estimated to require 900 kL of imported water to the Site. While water tanker volumes vary and would be subject to the supplying contractor, given a 20 kL Water Tanker Truck, 45 deliveries would be required to the Site throughout the entire construction period (12 months). This is not</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>considered to significantly alter the predicted construction traffic impacts.</p> <p>The majority of the labour force would arrive to site via shuttle buses. A minimum utilisation of shuttle buses will be established and monitored, which would be detailed in the TMP.</p> <p>Heavy vehicles would be made to utilise the designated heavy vehicle route and this requirement would form part of key supplier contracts. Repeated contract breaches would result in termination.</p> <p>The use of a water cart to spray unsealed road surfaces is a standard practice to reduce dust emissions from construction activities. Water carts would be implemented as required during construction.</p> <p>A complaints management system would be implemented as part of the CEMP to ensure any community concerns regarding traffic are addressed effectively and promptly.</p>	
	Not specified	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> • Additional traffic generation along Tallagandra Lane during construction and operation • Transport issues will be heightened due to high population density • Existing roads already under pressure and unable to cope with the additional traffic • Impacts to other road users on Mulligans Flat Road and Tallagandra Lane including: <ul style="list-style-type: none"> - Cyclists 	<p>Please also refer to the responses to issues captured above under Construction impacts.</p> <p>Within the two month peak delivery period, up to approximately 75 heavy vehicle movements per day are anticipated. Reviewing these additional 75 heavy vehicles and 400 light vehicle movements per day with respect to the existing traffic volumes, it is not expected that these additional vehicles would affect the Level of Service experienced on local roads such as Tallagandra Lane.</p> <p>During the defect liability (DFL) period of two years, it is assumed that approximately 10 personnel would enter and depart the Site each day. This accounts for approximately</p>	<p>278611 278026 278023 277883 277816 277814 277771 277735 277733 277775 277969 276983 276962 275919</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> - Pedestrians - Horse riders • The lack of marked crossings and inadequate signage along the proposed route • Traffic impacts including noise and road maintenance issues • Additional fatalities will occur as a result of traffic generated from the Project • How the roads will be improved to accommodate additional traffic • Safety impacts to residents and children due to increased traffic • Hazards to road users in and around the Sutton Village and proposed route to site • Road capacities and suggests sealing roads • Dust generation from additional traffic • Increased traffic going across narrow bridges • Dust generated on Tallagandra Lane and the potential to impair the effectiveness of the panels • Degradation of local roads • Inexperienced drivers on local roads with high kangaroo presence and inferior road conditions • Traffic impacts on wildlife trying to leave the area • Existing speed limits on surrounding roads 	<p>20 light vehicle movements. Post-DFL period, it is expected that approximately five personnel would enter and depart the Site each day. This equates to 10 light vehicle movements per day, assuming no car-pooling. It is expected that the volume of staff accessing the Site would have a very minimal increase in traffic flow on local roads based on their existing low traffic volumes and uncongested nature.</p> <p>The Site and its immediate surrounds are considered consistent with the general characteristics of the Yass Valley Council Local Government Area, being largely rural and undeveloped. The YVC LGA has a population density of 0.04 persons per hectare which is notably less than the average population density for NSW of 0.09 persons per hectare (ABS, 2016). The surrounding area is therefore considered of a low population density.</p> <p>The Yass Valley Council as part of its Asset Management Program conducts traffic counts around the Yass Valley Local Government Area on a fortnightly basis and this data has been used to provide an analysis of existing traffic volumes for Tallagandra Lane and surrounding roads. From a review of these values heavy vehicle volumes appear to be relatively well-dispersed across the local network. There does not appear to be any one road that would be considered to be carrying too many heavy vehicles or that could be expected to become notably congested or have capacity issues due to the addition of construction traffic. In particular Tallagandra Lane is known to have a low amount of existing traffic overall (light and heavy vehicles) and the additional construction traffic during the relatively short construction period is expected to be easily accommodated.</p>	<p>276294 276561 276650 276736 276884 277044 277437 277480 277593 277595 277633 277639 277643</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> Safety to residents accessing driveways along the proposed route Road safety in the area surrounding Sutton Public School as there are no pedestrian crossings 	<p>Signage, crossings and speed limits on the surrounding road network remains the responsibility of YVC and TfNSW and is out of scope for the project.</p> <p>The impacts of the project during construction are considered manageable without the need for any significant upgrade or sealing of any roads. Despite this, however, the proponent is investigating opportunities to provide an additional public benefit by providing upgrades to Tallagandra Lane. This would be subject to a Voluntary Planning Agreement with YVC to. With the potential sealing of Tallagandra Lane and low traffic volumes, dust impacts to the operation of solar panels are considered negligible.</p> <p>Drivers of heavy vehicles to the Site would be subject to the requirements outlined in the TMP, including obeying speed limits and all road rules. This would ensure that safety of drivers, the community and wildlife is maintained as far as practicable.</p>	
Hazards	Adequacy of assessment	<p>Submitters believe:</p> <ul style="list-style-type: none"> Fire hazards impacting the solar farm and surrounding properties have not been addressed in the EIS The EIS did not adequately assess the potential flood risks to the Project Site, as flood risks will vary after construction The proximity to fire stations mentioned in the EIS was incorrect, stating the Wallaroo and Charnwood stations are approx. 25km, not within 16km as per EIS 	<p>The Site does not lie on an area designated as bushfire prone land and therefore, a bushfire Assessment is not required. Notwithstanding this, a qualitative assessment has been undertaken to determine controls to mitigate residual risk that may be present. Section 15.1 of the EIS provides further details regarding fire hazards.</p> <p>A flood assessment was undertaken for the Site using a two dimensional (2D) TUFLOW hydraulic model, with inputs from a hydrologic model using WBNM software, to evaluate the existing flood risk across the Site, provide input into the design of the Project and develop mitigation measures where necessary (Appendix F of the EIS). The results of the flood study for the Project concluded that flood impacts to surrounding properties would be negligible as the footprint of</p>	<p>277883 277773 276650 277439</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> There are questions regarding the Project impacts on aviation and the impacts if flight schedules increase There are requests for further information on risks glare could have on morning flights turning north to south in a westerly direction when the panels are facing east Stating that the Site is not on designated bushfire prone land leads to underestimating the threat of bushfire to the area 	<p>the temporary works compared to the wider floodplain area would be small.</p> <p>The nature of flight patterns around Canberra Airport and the location of the Site results in a significant percentage of air traffic overflying the Site during both approach and departure. However, PV solar panels reflect only around 2% of received light comparable to forest cover (FAA, 2010). A discussion paper for renewable energy generation confirms that solar panels do not produce noticeable glare compared to existing roofs or building surfaces (Department of Planning 2010).</p> <p>The proximity of the fire stations to the Site were measured linearly, which provides a measurable distance of 16 km.</p>	
	Construction impacts	<p>Submitter is concerned:</p> <ul style="list-style-type: none"> The use of welding equipment during construction could start fires Residents will be trapped in the event of a fire due to restrictions and congestion caused by the development construction 	<p>The bushfire danger period for the Site and Yass Valley generally is typically between 1 October and 31 March, subject to local climate variability. Dry and hot summer conditions coupled with high wind speeds pose a risk of grass fires during this period. However, as the Site is on mildly undulating terrain that features planted windbreaks (radiata pine), and is 90 m from the closest woodland, the residual bushfire risk at the Site is considered to be low. This is reflected in the Yass Valley Council bushfire prone land map 2014, whereby the Site is located over 800 m from the closest mapped fire-prone land.</p> <p>Bushfire risk at the Site is considered to be highly manageable employing the mitigation and management measures proposed in the CEMP.</p> <p>Access and egress roads to the Site would be maintained to be free from being blocked by parked vehicles or other items so as to be readily accessible by emergency services at all times in the event of a bushfire. Access along all public</p>	277044 298428

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			roads will be maintained at all times allowing use by residents. Additionally, a Fire and Emergency Management Plan for the Project will be developed in consultation with the RFS and Fire and Rescue NSW.	
	Operation impacts	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> That there will be health impacts (electromagnetic hypersensitivity, electromagnetic radiation) resulting from electromagnetic fields generated by the operation of the solar farm Fire hazards will increase as a result of the Site operation Evacuation procedures, access and firefighting during operation Electrical equipment may cause fires 	<p>The proposed solar farm electrical installation is considered to be compliant in regards to magnetic field levels exposed to personnel and the public.</p> <p>All electrical equipment would be designed in accordance to applicable ANZ engineering design standards, industry codes and best practice standards. Installation, operation and maintenance work shall be carried out by competent persons.</p> <p>Bushfire risk at the Site is considered to be manageable through fuel management and fire management protocols.</p> <p>A Fire Management and Emergency Response Plan will be developed in consultation with the RFS and Fire and Rescue NSW. Two copies of the Fire Management and Emergency Response Plan will be stored in a prominent 'Emergency Information Cabinet'.</p> <p>Static water supplies of 20 kL for firefighting would be provided at the Site. This would be reviewed in consultation with the RFS throughout the detailed design process.</p>	<p>277883 277773 272739 275459 276650 277480 277757 298428</p>
	Management and mitigation measures	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> Management and mitigation measures outlined in the EIS are not sufficient to mitigate fire hazards and manage evacuation methods Residents require their own water supply for fire fighting The EIS lacked detail regarding mitigation measures including a 	<p>Section 15.1.3 of the EIS provides a detailed list of measures to respond to fire hazards. The mitigation and management measures outlined in the EIS would be implemented to ensure safety and mitigate fire hazards during construction, operation and decommissioning, for all hours.</p> <p>A Fire Management and Emergency Response Plan will be developed in consultation with the RFS and Fire and Rescue NSW which will detail fire management and evacuation</p>	<p>278026 277824 277786 277735 277733 277775 277889 274089 275459 276561</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>fire management plan, on-site water storage for fire control, restricted access to the Site from proposed boundary fencing</p> <ul style="list-style-type: none"> About the lack of water supply for fire fighting Evacuation procedures in the EIS are not adequate Residents may get trapped within the Project Site in the case of a fire Using sheep to manage fire risk from vegetation growth is ineffective Increased fire risk to personal safety There are not sufficient safeguards for fire prevention About after hours fire management plans Further bushfire mitigation measures are required Regarding the control of chemical spills 	<p>procedures. This will include protocols in place for a fire occurring when no operational personnel are onsite.</p> <p>Grazing by sheep stocked at suitable levels so as to maintain a low level of vegetation is only one of the many mitigation and management measures implemented to minimise bushfire risk. Grazing would be supplemented by slashing when required to maintain low fuel levels.</p> <p>Residents would require their own water supply in the event of a fire on their property, however, a 'mutual assistance' agreement would be sought with local property owners to use dams as water sources in the event of an emergency. Furthermore, static water supplies of 20 kL for firefighting/bushfire management would be provided at the Site for use in the event of a fire in the vicinity of the Site, regardless of its origin. It is noted that the capacity for the NSW Rural Fire Service (RFS) to service the Project in the event of an emergency, any associated firefighting equipment requirements and plans will be determined in consultation with RFS as part of the Fire and Emergency Management Plan. Should any changes to the static water supply capacity be identified as a result of this consultation, the proponent would respond accordingly.</p> <p>Access and egress roads to the Site would be maintained to be free from being blocked by parked vehicles or other items so as to be readily accessible by emergency services at all times in the event of a bushfire. Access along all public roads will be maintained at all times allowing use by residents.</p> <p>Fuels and oils would be appropriately banded and stored to reduce the impact of any potential spill. Mitigation measures</p>	<p>276650 277044 277480 277555 277439 277643</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			would be outlined in the OEMP to minimise the likelihood of adverse soil contamination due to chemical leaks and spills.	
	Not specified	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> • There is higher risk to safety in the event of a fire from the new land use • Deliberate arson may occur • Hazards will arise from the Project including <ul style="list-style-type: none"> - The heat island effect (which could have implications for bushfire risk) - Health implications - Low humidity levels • There is an inadequate evacuation procedure, emergency access and firefighting water supply • There is not enough information regarding the available water for fighting fires and how many tankers will be on site permanently • Government study is necessary to show no health risks are associated with living near a solar farm • The development will hinder pest control methods and render population control methods (shooting and baiting) less effective • Compensation should be offered if fire starts at the development 	<p>As discussed above, the Site does not lie on an area designated as bushfire prone land and therefore, a bushfire assessment is not required. Notwithstanding this, a qualitative assessment has been undertaken to determine controls to mitigate residual risk that may be present. Section 15.1 of the EIS provides further details regarding fire hazards.</p> <p>A Fire Management and Emergency Response Plan will be developed in consultation with the RFS and Fire and Rescue NSW and approved by the DPIE which will detail fire fighting facilities and procedures that would be employed during the operation of the Project. Once approved this plan will be publicly available on the Project website. Safety management processes such as policies to control hot works, fuel storage, use of flammable materials will be in place to mitigate fires.</p> <p>Any risks as a result of arson would be managed by the provision of security features as described in Chapter 3.0 of the EIS, which would include security fencing, security lighting and the engagement of security personnel.</p> <p>Section 15.1.2 of the EIS outlines details regarding the available water for fighting fires on Site. As discussed above, static water supplies of 20 kL for firefighting/bushfire management would be provided at the Site for use in the event of a fire in the vicinity of the Site. The capacity of this supply would be reviewed in consultation with the RFS.</p> <p>Proposed planting may increase risk of propagating bushfire however, fire risk would be manageable during construction</p>	<p>278026 277788 277782 277735 275300 275479 275654 275919 276294 276650 277437 277480 277555 277593 277639 277643 277757 277784 298432</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p>and affects neighbouring properties</p> <ul style="list-style-type: none"> • Safety will be impacted upon due to the risk of chemical exposure • There are questions about escape routes from properties where driveways goes through the development if there is a fire at the Site • Tree plantings will increase the risk of fire • The development could be a terrorist target. 	<p>through measures in the Fire Management and Emergency Response Plan.</p> <p>PV solar panels are designed to absorb energy as efficiently as possible, as a primary function of their intended purpose – to convert this energy to electricity. As described in the EIS, PV solar panels with their darker surfaces, are typically less reflective of energy (or heat), leading to increased heat absorption (as opposed to heat amplification and reflection) in the context of the surrounding landscape. As such, it is considered highly unlikely that the solar farm would result in a hazardous heat island affect that would contribute to the risk of bushfire. To provide context, it is generally accepted that a solar farm would reflect less than, or no more heat than a typical residential development, or carpark. It has also been established that this heat would dissipate rapidly, whereby air temperatures at a height of 2 m above large solar farms have been measured at about 0.7 degrees Celsius hotter in the summer, and where a large solar farms have been measured to result in minimal temperature increase of between 1.5 and 3 degrees Celsius in the immediate adjacent area (Barron-Gafford et al 2016 and Yang et al 2017).</p> <p>Section 15.2.2 of the EIS outlines research undertaken to assess magnetic fields. The recommended magnetic field limits are provided in the EIS, alongside a summary the latest updates in Australian publications that plan to develop formal standards in this area. It is confirmed that the recommended levels would not be exceeded at any nearby residences.</p> <p>The pest and weed management measures of the Biodiversity Management Plan would be prepared in accordance with requirements of the NSW Department of</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>Primary Industries, and in consultation with the Yass Valley Council. Management measures would focus on preventing pests and weeds being introduced to the Site or tracked off site, early identification and ongoing monitoring of invasive pest and weed species, and a regular pest and weed maintenance program.</p> <p>The concern raised regarding the development being a terrorist target is considered unlikely given the relatively small size of the Project and its isolated location.</p>	
Socio-economic	Adequacy of assessment	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> The claims regarding economic benefit to the Yass Valley are unsubstantiated There are questions regarding the modelling used to justify economic benefits The EIS does not document health impacts from living near a solar farm The information regarding socio economic benefits are naïve Socio economic benefits would benefit the ACT rather than the Yass region The EIS claiming the Project has local and broader community support is incorrect The EIS contains little information on impact of solar developments on property prices The EIS makes broad statements that provide too much scope for change eg: “construction works <u>are generally</u> 	<p>The socio-economic assessment was undertaken using publicly available demographic profiles and census data for the Yass Valley LGA.</p> <p>Generally, the Project promotes socio-economic wellbeing through offering opportunities for employment, training and up-skilling of the local and regional workforce throughout its construction and operation.</p> <p>During construction of the proposed project, it is considered that both positive and negative socio-economic impacts would be generated. Positive impacts would include:</p> <ul style="list-style-type: none"> Generation of employment, with up to 200 staff employed during peak construction. Where possible, these staff would be drawn from the local area, where practicable; Opportunities for training and up-skilling of the local and regional workforce to further contribute to the delivery of renewable energy projects across Australia; and Significant contribution to local and regional economies through increased demand for accommodation, goods and services from travelling contractors. <p>Potential negative impacts include:</p>	<p>277775 277773 275749 277480 277555 277439 277757 299500</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<p><u>not proposed</u> to be conducted at night time; there for a sleep disturbance assessment for the construction works is not required”</p> <ul style="list-style-type: none"> The EIS focused on residents within 2km of the proposed development but questions using a 5km zone. 	<ul style="list-style-type: none"> Increased traffic on local roads during construction and hazards associated with heavy vehicles and plant (see EIS Section 13.2); Change in the visual amenity of the area (see EIS Chapter 9.0); Change in noise amenity of the immediate surrounding area during construction (see EIS Chapter 12.0); Increased dust emissions during construction (see EIS Section 13.6); and Influx of construction workers may put pressure on local community services. <p>Following exhibition of the EIS, 117 community submissions were received in support of the Project in addition to 109 submissions objecting to the Project. Given that more submissions were received in support that in objection, the proponent believes there is significant community support for the Project.</p> <p>There is very little information on the impact of solar farms on property values however studies have been undertaken into properties surrounding wind farms. Wind farm projects have a longer history in Australia than solar farms and are considered to have greater visibility and noise emissions when operational.</p> <p>The NSW Department of Lands' analysis of property sales (2009) data found that wind farms did not negatively affect property values in most cases. In addition to that, a report commissioned by the Office of Environment and Heritage in 2016 (OEH, 2016b) commended that there were no conclusive findings relating to value impacts on properties located close to a wind farm. The report noted that their findings from the review of case studies in NSW and Victoria did not identify any conclusive trends that would indicate that</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>wind farms have negatively impacted on property values, and that their resale analysis indicated that all of the properties examined demonstrated capital growth that aligned with the broader property market of the time.</p> <p>In addition, the proponent is considering opportunities to offer a “shared benefits scheme” to landowners within 1 km of the Project, which may provide a tangible and positive contribution to property values within this area.</p>	
	Construction impacts	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> Local service providers will not benefit from the construction due to highly mobile 457 visa workers About physical and mental health impacts cause by the Project as a result of retired locals being at home during construction activity 	<p>The 457 Visa has been abolished since 18 March 2018 and has since been replaced by the 482 Visa which enables employers to address labour shortages by bringing in genuinely skilled workers where they cannot source an appropriately skilled Australian. It facilitates targeted use of overseas workers to address temporary skill shortages, while ensuring that Australian workers get priority. the proponent propose to source both construction and operational workers from the local region as far as practicable. This would provide opportunities for training and up-skilling of the local and regional workforce to further contribute to the delivery of renewable energy projects across Australia.</p> <p>The EIS investigated potential risks to human health as a result of the Project. The project would be designed, constructed and operated to avoid significant risk to human health, life or property or to the biophysical environment. Therefore, it is considered that the proposal does not constitute a hazardous or offensive development nor is it potentially hazardous or potentially offensive development.</p>	<p>277788 277773 275459 276650 299500</p>
	Operation impacts	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> Physical medical and mental health impacts caused by the development 	<p>As discussed above, The EIS investigated potential risks to human health as a result of the Project. Given the predicted scale of impacts associated with the Project in the EIS, health impacts caused by the Project are considered unlikely.</p>	<p>278611 277733 277775 275286 275459</p>

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> Socio economic benefits during construction and operation would benefit the ACT rather than the local community Properties needing to be sold at a lower price due to the eyesore of the development Operational noise and vibration impacting on lifestyle and amenity Tourism declines in Sutton Visitors having to drive through an ocean of solar panels and associated buildings 	<p>The proponent proposes to source both construction and operational workers from the local region as far as practicable. This would provide opportunities for training and up-skilling of the local and regional workforce to further contribute to the delivery of renewable energy projects across Australia.</p> <p>There is very little information on the impact of solar farms on property values however studies have been undertaken into properties surrounding wind farms. Wind farm projects have a longer history in Australia than solar farms and are considered to have greater visibility and noise emissions when operational.</p> <p>The Project is not located within the immediate vicinity of any significant tourism sites or routes. Tallagandra Lane being a low traffic thoroughfare is not anticipated to be traversed by tourists on a regular basis and is generally anticipated to generally support access for local residents. The Project is therefore not anticipated to result in a notable negative impact on tourism within the Sutton area.</p> <p>The NSW Department of Lands' analysis of property sales (2009) data found that wind farms did not negatively affect property values in most cases. In addition to that, a report commissioned by the Office of Environment and Heritage in 2016 (OEH, 2016b) commended that there were no conclusive findings relating to value impacts on properties located close to a wind farm. The report noted that their findings from the review of case studies in NSW and Victoria did not identify any conclusive trends that would indicate that wind farms have negatively impacted on property values, and that their resale analysis indicated that all of the</p>	277480 277757

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>properties examined demonstrated capital growth that aligned with the broader property market of the time.</p> <p>In addition, the proponent is considering opportunities to offer a “shared benefits scheme” to landowners within 1 km of the Project, which may provide a tangible and positive contribution to property values within this area.</p> <p>To minimise operational impacts inverters would be located as far as practicable from residential dwellings. If required a 2 m high, three sided ‘horseshoe’ shaped noise wall would be included around inverters specified in Appendix G of the EIS to further minimise potential operational noise impacts. With these measures in place, no notable noise and vibration impacts during operation are predicted.</p> <p>The Project would install infrastructure along Tallagandra Lane for approximately 1.4 km and it is therefore possible that visitors to the area would experience views of the Project. While the majority of solar infrastructure would be located away from the roadway, screening vegetation as outlined in the Landscape Plan would be implemented to minimise potential impacts as far as practicable. It is also noted, that since the public exhibition of the EIS, the proponent has continued to seek opportunities to address issues raised during ongoing community and stakeholder consultation for the Project, particularly with regard to visual impacts. To this end, the proponent has prepared an Amendment Report (Appendix G) to assess the following project design improvements, which aim to further reduce the potential for visual impacts:</p> <ul style="list-style-type: none"> Removal of one development area – one block of solar panels in the south-eastern part of the Site, to the south of Tallagandra lane, would be removed from the project design 	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<ul style="list-style-type: none"> Adjustment of one development area footprint and extension of screening vegetation – The footprint of one development area would be relocated slightly south of the northern boundary of the Site to allow for the screening vegetation to be extended without impacting on any mapped GSM habitat 	
	Management and mitigation measures	<p>Submitter is concerned</p> <ul style="list-style-type: none"> Mitigation measure of screening the Site will take many years to provide benefit to locals and visitors The sensor lighting impacting on lifestyle and amenity as the mitigation measures are inadequate 	<p>Screening vegetation would consist of a 20 metre wide (in most locations) screen planning zone containing a mix of trees, shrubs and grasses to ensure sufficient screening is provided. The selection of species considered and selected comprise those that are relatively quick to establish, to increase the likelihood that screening is provided early in the operation of the Project. The benefits of the screen planting zones would continue to improve throughout the operation of the Project.</p> <p>Sensor lighting for security purposes would be installed at maintenance facilities and electrical switchyard and substation. The nearest structure or dwelling to areas where sensor lighting is proposed is located approximately 650 metres away and shielded by mature trees. Additionally, the sensor lighting would only be on when triggered, and as such, it is assumed that it would rarely be on. Therefore, the impacts of sensor lighting are considered to be negligible.</p>	276884 277480
	Not specified	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> General direct impacts to surrounding residents Impacts to small businesses including: <ul style="list-style-type: none"> Local childcare centre/pre-school in Sutton Businesses on Tallagandra Lane Wineries 	<p>Small businesses in the region are predicted to generally receive a positive impact as a result of the Project. Local businesses would benefit from the influx of up to 200 workers during the peak construction period. While workers would generally be sourced from the local community, these workers would likely utilise nearby restaurants and accommodation facilities within the Sutton area.</p> <p>While property values are not anticipated to decrease as a result of the Project, a community fund of \$100,000 is</p>	278146 278009 278006 277883 277824 277816 277735 277733 277788 277786

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		<ul style="list-style-type: none"> - Restaurants • Properties will be devalued because of: <ul style="list-style-type: none"> - Loss of visual amenity - Perceived danger of solar farm - Noise impacts - Health impacts • How locals will be compensated for the decrease in property values • The solar farm impacting on the country lifestyle and safety • The Project disregarding economic and environmental concerns of Sutton residents • Socio economic benefits being to the ACT rather than the local community • The land being more valuable for residential purposes • Impacts to physical, mental health and wellbeing as a result of the development • The development causing stress and financial concerns for the community and local property owners • Adding cumulative pressure to the drought crisis • Tourists visiting the solar farm degrading local roads and not contributing economically to the local area 	<p>proposed to be paid for the benefit of the wider community. In addition, the proponent is considering opportunities to offer a “shared benefits scheme” to landowners within 1 km of the Project, which may provide a tangible and positive contribution to property values within this area. Additional community benefits would include the potential sealing of part of Tallagandra Lane. No negative financial impact is therefore anticipated for members of the surrounding community.</p> <p>The proponent considers that sealing Tallagandra Lane is the most appropriate approach to providing a community benefit given the nature of the project. Unlike a wind farm (in relation to which YVC’s Community Enhancement Fund Policy has been developed), the visual impacts of the project on the wider community will be limited. Accordingly, upgrading the road network in the vicinity of the project would provide a targeted benefit to those members of the community who are most likely to be affected by the traffic impacts associated with the project.</p> <p>Chapter 15 of the EIS outlines potential hazards associated with the Project including bushfire and electromagnetic fields. Chapter 15 concludes that with the outlined mitigation measures, residual hazard risk is considered minimal.</p> <p>The proposed Site has been zoned RU1 Primary Production under the Yass Valley LEP. The objectives of the RU1 zone, amongst other things include:</p> <p><i>“To encourage the use of rural land for agriculture and other forms of development that are associated with rural industry or that require an isolated or rural location.”</i></p>	277784 277782 277771 277775 277889 277720 275298 276962 275243 274725 274661 275771 272733 274089 275459 275479 275481 275715 275775 275879 275930 276005 276062 276143 276158 276160 276175 276179 276413 276561 276650 276736 276884 277044 277437

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> A lack of community and economic benefits The divide in the community as a result of the proposal and proposed compensation Suggestions regarding rezoning the surrounding land as industrial so land holders can financially benefit from other land uses like the owner of the Project Site Questions raised regarding site remediation funds Questions raised regarding decommissioning and what materials will be removed and recycled Compensation offered being inadequate and should be increased A loss of development potential for surrounding suburbs Adjusting council rates to reflect the decrease in property value Impacts to visitors to the area as a result of the view of the development The sensor lighting impacting on lifestyle and amenity The increased traffic will have impacts on local residents safety and travel times Not being able to account for such a development when purchasing their homes in a rural area 	<p>The development of the Site for solar development is considered consistent with the objectives of the RU1 zone and would continue to support the use of the region for agricultural purposes. The use of the Site for residential purposes would not support the objectives of the RU1 zone. While Electrical generation is not listed as permissible with consent in this zone, the proposed development is permissible with consent on any land under clause 34(7) of the <i>State Environmental Planning Policy (Infrastructure) 2007</i> (ISEPP). As outlined in clause 8 of the ISEPP, where there is an inconsistency between the ISEPP and any other environmental planning instrument, the ISEPP prevails to the extent of the inconsistency. Solar development is therefore, permitted with consent within the RU1 zone.</p> <p>Additionally, as discussed previously, The Yass Valley Settlement Strategy seeks to compliment the Regional Growth Plan with a more comprehensive settlement strategy for Yass Valley LGA. In order to achieve sustainable growth in the region securing a new water supply is required. The Strategy outlines that it is not recommended that water supply from the ACT water infrastructure be sought for areas to the north east of Canberra including Sutton. The Strategy determines that because of a lack of a secure water supply and adequate sewerage treatment, limited future development should be permitted where its impact does not compromise existing village characters or surrounding agricultural uses.</p> <p>The LUCRA has found that as Sutton has not been identified as a priority urban growth area for the Yass Valley LGA, the development of a solar farm would not preclude the overall goals of the Yass Valley Settlement Strategy 2036 of accommodating for future urban growth. This is because the solar farm would not be located in a part of the Yass Valley</p>	277458 277458 277480 277555 277593 277633 277639 276166 277643 277757 276043 276158 299500

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> The reduction of growth in the area would negatively impact the community and place pressure on schools and local businesses Compensation if a fire starts at the development and spreads to adjoining properties The development lacking respect for the values of the community High levels of community opposition and local action groups that have been formed Information on compensation has been misleading Questions raised regarding the workforce including 457 visa workers and economic benefit to locals A lack of information regarding compensation The compensation for adjoining property owners including full compensation for a range of factors including devalue of property, disturbance and mental health issues Impacts to retirement years as a result of the financial impacts of the Project Remaining objections to the development despite mitigation measures regarding project size, increased trees and compensation 	<p>LGA that is intended to support urban development and would not prevent urban development from occurring. While a solar farm is not an agricultural use, the presence of it would not comprise the village character or surrounding agricultural uses because of stringent mitigation and management measures in place aimed at significantly reducing its amenity impacts.</p> <p>The Project would not involve the extraction or use of significant volumes of water. During operation it is considered that rainfall is generally sufficient to clean the solar arrays and use of supplied water would be minimised and only be used when required. Cumulative impacts with drought conditions are therefore not anticipated.</p> <p>The Project is not anticipated to impact upon the potential future growth or numbers of tourists visiting the Sutton area.</p> <p>A community fund is proposed to be paid for the benefit of the wider community. The use of this fund would be in subject of ongoing discussion with the surrounding community. Further benefit sharing is still under discussion with YVC.</p> <p>The proponent is considering opportunities to offer a “shared benefits scheme” to landowners within 1 km of the Project, which may provide a tangible and positive contribution to property values within this area.</p> <p>An overview of activities undertaken as part of decommissioning is provided in Section 3.5 of the EIS. Generally, it is anticipated that tracker posts, control building and all electrical components including PV modules would be recycled at a designated recycling facility.</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>Sensor lighting for security purposes would be installed at maintenance facilities and electrical switchyard and substation. The nearest structure or dwelling to areas where sensor lighting is proposed is located approximately 650 metres away and shielded by mature trees, no impacts are therefore predicted.</p> <p>Chapter 14 of the EIS outlines potential impacts on traffic as a result of the Project. Chapter 14 concludes that potential traffic impacts would be restricted to construction and would result in the following potential impacts:</p> <p>Traffic efficiency, including:</p> <ul style="list-style-type: none"> • Very minor potential for disruption to four school bus services that travel on Tallagandra Lane each day • Minor delays to trip times as a result of movements of project-related vehicles through Sutton and along the major transport routes • Delays due to temporary road or lane closures. It should be noted that no road closures are currently planned during construction, operation or decommissioning of the Project. • Safety, due to increased conflicts with other vehicles, cyclists, pedestrians, stock, wildlife and increased levels of dust. • Local amenity, due to associated noise and dust generation. • Damage to road pavement on local roads. <p>Whilst the majority of roads in the local area are generally low traffic, the above issues would be manageable through careful project planning, including scheduling of movements. These protocols would be documented in a project-specific Traffic Management Plan. This Plan would be developed in consultation with the local authorities and communicated to</p>	

Issue category	Issue topic	Issue summary	Response	Submitter IDs
			<p>all key stakeholders, particularly the contractors and the local community.</p> <p>During operation, bushfire risks would predominantly be associated with electrical component faults, maintenance works and possibly cigarette butts from vehicles travelling along Tallagandra Lane. There would be no smoking permitted within the Site at all times. Bushfire risk at the Site is considered to be manageable employing the mitigation and management measures proposed. Developing the Bushfire Management Plan at the beginning of the construction phase and conducting training would facilitate bushfire prevention and effective response if necessary.</p>	
Air quality	Construction impacts	<p>Submitters are concerned that:</p> <ul style="list-style-type: none"> Construction vehicles will create dust that will foul residential water sources and homes. 	<p>Air emissions would be generated from vehicles transporting workers to and from the Site, trucks delivering construction materials and construction machinery such as piling rigs, excavators, graders and diesel generators. The emissions would peak during the peak of construction but would be temporary in nature. Emissions are expected to be dispersed by prevailing winds and not significantly impact local air quality.</p> <p>Taking into consideration the temporary nature of the construction works and the distance between nearby receptors to project elements, air quality impacts during the construction phase are not considered to be significant and would be managed through the CEMP.</p>	277643
	Not specified	<p>Submitters are concerned:</p> <ul style="list-style-type: none"> Project vehicles will generate dust especially during dry conditions when ground cover is limited Dust pollution will be significant. 	<p>The project would lead to dust generated by vehicles accessing the Site during both construction and operation. However, due to the scale of proposed activities during both construction and operation and with the implementation of appropriate management measures (including dust suppression measures), dust impacts on local and regional air quality is expected to be negligible.</p>	278611 278026 277633 277639

Issue category	Issue topic	Issue summary	Response	Submitter IDs
Cumulative impacts	Adequacy of assessment	<p>Submitter believes:</p> <ul style="list-style-type: none"> Using Yass in the EIS as the reference point for the assessment of cumulative impacts is misleading and inaccurate. 	Cumulative impacts result from the aggregation and interaction of environmental impacts on the same receptor from multiple developments, and may occur concurrently or sequentially. For this project, the assessment of cumulative impacts has considered any other approved or proposed developments in the area, including but not limited to the approved Collector Wind Farm, the proposed Gunning Solar Farm and existing Tallagandra Pit.	277480
	Not specified	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> The cumulative effect of multiple renewable energy developments in the region of which there are already too many The proximity of wind farm developments to the Site is making the area inconvenient to live in The cumulative effect of the Project and other residential and commercial developments in the local area on prime grazing land and primary production potential The cumulative effect of project vehicles and road changes as a result of the Barton highway expansion generating more traffic on local roads. 	<p>There are no other solar or wind farms or large scale developments visible from the Site, and as such the Project would not create significant impacts causing additional inconveniences to the community.</p> <p>Construction traffic and associated impacts on the local road network and users are temporary in nature. With the implementation of a Traffic Management Plan for the Project, residual impacts are considered to be minor and given the lack of large-scale developments in this locality the potential for cumulative impacts during construction are considered to be negligible.</p>	277775 277044
Issues outside of the scope of the assessment	Out of scope - relevant	<p>Submitters are concerned about:</p> <ul style="list-style-type: none"> High vandalism activity in the area Development does not meet the NSW Solar energy guidelines as the development is not applicable to prospective resource developments 	<p>The Project is unlikely to cause an increase in vandalism activity in the area given the remote location of the Site.</p> <p>Section 2.2 of the EIS outlines strategic justifications making reference to the relevant guidelines such as NSW Renewable Energy Action Plan, NSW Climate Change Policy Framework and Australian Renewable Energy Target.</p>	274089 275459 276175

Issue category	Issue topic	Issue summary	Response	Submitter IDs
		<ul style="list-style-type: none"> Canberra's growing population will eventually extend to the land between Bonne and Gundaroo. 	Future residential development potential is outside the scope of the EIS and has not been considered.	
	Out of scope – not relevant	<p>Submitters noted that:</p> <ul style="list-style-type: none"> 457 visa workers have worked on solar farms in Queensland and are a highly mobile workforce <p>Their farm insurance policy would likely increase</p>	<p>The average workforce during construction is expected to be approximately 50 full time equivalent positions, with up to 200 people during peak construction. Where practicable the workforce would be recruited from the local community and local sub-contractors would be used.</p> <p>Potential changes to farm insurance policies are outside the scope of the EIS.</p>	274089 277555

5.2 Issues raised by agencies/organisations

This section provides responses to the key issues raised by agencies and organisations. The extracted submission text is provided verbatim from the submission. Submitter ID numbers are provided in brackets.

5.2.1 APA Group (277840)

Submission	Response										
<p>Background</p> <p>APA owns the Dalton – Canberra Lateral Pipeline located through the subject Site in a 20m wide easement (see Table 1 for details):</p> <p>Table 1: Transmission gas pipelines in the area of consideration</p> <table><tr><th>Pipeline</th><th>Pipeline licence</th><th>Easement width</th><th>Diameter (mm)</th><th>Measurement length (m)</th></tr><tr><td>Dalton – Canberra Lateral</td><td>21</td><td>20</td><td>250</td><td>240</td></tr></table> <p>Note: measurement length is applied to either side of the pipeline.</p> <p>The former proponent has lodged a Development Application and the EIS, which was on public exhibition, until 30th August 2018. The former proponent did not engage with APA during preparation of the EIS. However, subsequently the former proponent engaged with APA and commissioned a Safety Management Study to address issues associated with development in vicinity of the high pressure gas transmission pipeline. This study is attached in Appendix E.</p> <p>APA statutory obligations</p> <p>SEPP (Infrastructure) 2007 states that risks associated with development applications adjacent to a gas pipeline corridor needs to be assessed and those risks included in considerations prior to determining an application for development (Clause 55 'Development adjacent to corridor' in Division 9). The EIS considers the SEPP in relation to the delivery of solar energy infrastructure but does not give any consideration in relation to the potential impacts on existing gas transmission infrastructure of regional importance. This should be addressed in a revised EIS.</p> <p>As a licence holder for high pressure gas transmission pipelines (HPGTPs) APA has statutory obligations under the <i>Pipelines Act 1967</i> (the Act). The associated Pipelines Regulation 2013, states that a licensee must ensure that the design, construction, operation and maintenance is in accordance with Australian Standards 2885 (AS2885). These are the Standards that APA must consider in assessing and addressing risks associated with development applications under the Infrastructure SEPP.</p>	Pipeline	Pipeline licence	Easement width	Diameter (mm)	Measurement length (m)	Dalton – Canberra Lateral	21	20	250	240	<p>APAs statutory obligations and requirements for engagement around the high pressure gas transmission pipeline (HPGTP) are noted.</p> <p>All project plans going forward will have the HPGTP labelled on them. To clarify, no solar panels are proposed to be located within the HPGTP ML.</p> <p>The proponent notes that APA seeks to minimise the number of easement crossings and that perpendicular crossings are preferable.</p> <p>Details of all proposed crossings and works within the easement area will be developed in consultation with APA during the detailed design phase. Final details will be submitted to APA for authorisation and all works will comply with conditions imposed by APA.</p> <p>The proponent will continue to work with APA to comply with APA's requirements. The proponent notes that some conditions of approval for the Project can only be satisfied during the detailed design phase of the Project once an EPC contractor has been appointed. APA has acknowledged this.</p> <p>It is noted that Condition 6. High Voltage Powerlines discusses the Young to Wagga</p>
Pipeline	Pipeline licence	Easement width	Diameter (mm)	Measurement length (m)							
Dalton – Canberra Lateral	21	20	250	240							

Submission	Response
<p>In considering a development proposal APA is obligated to ensure its pipelines are not damaged, nor subject to development which may increase the future risk of damage. Furthermore, APA must ensure the pipeline is designed to “reflect the threats to pipeline integrity, and risks to people, property and the environment” (AS2885.1, s4.3.1). Location classes are used to determine the appropriate pipeline design and management for the circumstances. The location class considers the land use and activities within the Measurement Length (ML), which is the area of consequence in the case of full bore pipeline rupture. The subject pipeline has a ML each side of the pipeline of the distances shown in Table 1 above.</p> <p>AS2885.1, s2.6 states “a pipeline in the vicinity of electricity supply powerlines or facilities shall be analysed to determine if controls are required to provide for electrical safety”. Section 2.6 refers to Appendix R, which references the requirements of AS4853 for electrical analysis (earth potential rise and low frequency induction). Potential impacts arise from transmission lines crossing the pipeline or running alongside the pipeline. In addition to impacts directly on the pipeline, electrical currents have the potential to impede the effective operation of cathodic protection measures (addressed in AS2832). Electrical currents of concern may include feeder lines, transformers, and transmission lines.</p> <p>Pipeline Risk Profile and the Measurement Length</p> <p>In managing HPGTP’s and considering land use changes, APA must focus on that area geographically defined by AS2885 as the Measurement Length (ML). The ML area is the heat radiation zone associated with a full-bore pipeline rupture. APA is mandated to consider community safety in the ML due to the high consequences of pipeline rupture to life, property and the economy. The ML for the Dalton – Canberra Lateral is 240m each side of the pipeline.</p> <p>The ML is determined by the design parameters of the pipe (driven by the surrounding environment at the time of construction) and the Maximum Allowable Operating Pressure (MAOP) of the pipe. APA must consider any change of land uses within the ML area to determine the effect of a new use on the risk profile of the pipeline.</p> <p>Location classes (based on land use) are used to determine the appropriate pipeline design and management for the circumstances. If the location class changes within the ML, a Safety Management Study (SMS) is required to assess the additional risk and ensure actions are taken to reduce the risk to an acceptable level. The proposed use will change the location class of the pipeline in the area of the development.</p>	<p>Wagga Pipeline, which is not applicable to this project.</p>

Proposed Development

The proposal plan indicates a linear gap in the development footprint which appears to align with APA's pipeline and easement, however it is not accurately labelled as a 'high pressure gas transmission pipeline'. There is no statement or plan indicating the high pressure gas transmission pipeline (HPGTP) easement is clear of the siting of solar panels. The proposed development has significant areas of panels to both the east and west of the pipeline easement, and it appears these extend to the edge of the HPGTP easement. The proposed plan shows an internal road crossing of the pipeline in the northern part of the Site.

A single area for both control building and substation is located to the south-west of the development Site, west of APA's pipeline. Regardless of the final area for control building and substation, the need for crossings of the pipeline is anticipated. These are expected to include:

- Electrical feeder lines (either above or underground) to transformers and the on-site substation
- Electrical transmission lines from the substation to transmission grid connection point
- Access tracks (for construction and operation).

APA seeks to minimise the number of crossings and have these perpendicular to the pipelines. No work on the easements, including crossings, changes in ground level or other works, may occur without the prior authorisation of APA. Detailed design for crossings will need to be informed by field works to positively locate the pipeline (alignment and depth). Such field works must only be performed under APA permit.

Comments

AS2885 requires a Safety Management Study (SMS) to be undertaken whenever the land use classification within the ML changes. A Safety Management Study has been conducted by Sage Consulting Solutions, dated 29 June 2018. The Safety Management Study outlines 11 actions which will need to be implemented to the satisfaction of APA, with all costs to be borne by the applicant.

Electrical works near the pipeline (including crossings) have the potential to impact on the pipelines safe operation and studies in accordance with AS4853 are necessary. The cost of these studies and any necessary mitigations must be borne by the development proponent. The studies will need to be referred to, and endorsed, by APA as per action 2 of the Safety Management Study.

Details of all proposed crossings, and works within the easement, must be submitted to APA for consideration. No crossings may occur without the prior authorisation of APA and must be completed in accordance with any conditions imposed by APA. This includes the existing location of the Tallagandra Lane crossing. This is reflected in action 3 of the Safety Management Study.

Submission	Response
<p>APA acceptance of the proposed development is subject to compliance with the actions of the SMS and the following conditions.</p> <p>Conditions</p> <p>1. No improvements within Easement Buildings, structures, roadway, pavement, pipeline, cable, fence, change in ground level, or any other improvement on or under the land, must not be constructed within the gas transmission pipeline easement, without the prior authorisation of APA. This includes both temporary and permanent improvements of the type detailed above. All construction workers on site must be made aware of this requirement.</p> <p>2. Safety Management Study Development must occur in accordance with requirements of the Safety Management Study (SMS), by Sage Consulting Solutions Pty Ltd, dated 29th June 2018. All of the SMS's recommendations/actions must be implemented to the satisfaction of APA. All costs associated with the SMS, and implementing its recommendations/actions are to be borne by the applicant.</p> <p>3. Risk Assessment Required Prior to the development commencing, and to inform detailed design, the applicant must conduct electrical hazard studies in accordance with (the requirements of) Australian Standard 4853-2012 (for Low Frequency Induction and Earth Potential Rise). The applicant must address any relevant requirements and any recommendations and/or actions must be implemented to the satisfaction of APA. All costs associated with the study, and implementing its recommendations and/or actions are to be borne by the applicant. The applicant must complete validation testing upon completion of construction.</p> <p>4. Electrical Interference Studies The applicant must conduct electrical interference studies in accordance with the requirements of AS2832 once detailed design is complete.</p> <p>5. Amend Design to Comply with Australian Standards The applicant must amend its design as required in order to obtain results for the electrical interference studies and electrical hazard studies which comply with the applicable Australian Standard and promptly provide a copy of the studies and reports to APA.</p>	

Submission	Response
<p>6. High Voltage Powerlines The applicant must make good (at the applicant's cost) any hazards or risks to the Young to Wagga Wagga Pipeline (including cathodic protection systems), caused by any powerlines, or associated infrastructure.</p> <p>7. Construction Management Plan Prior to the commencement of any works, including demolition, on land within 50 metres of the pipeline easement, a construction management plan must be submitted to and approved by APA. The plan must:</p> <ul style="list-style-type: none"> • Prohibit the use of rippers or horizontal directional drills unless otherwise agreed by the operator of the gas transmission pipeline. • Avoid significant vibration, heavy loadings stored over the pipeline and heavy vehicle / plant crossings of the pipeline within the easement. • Be endorsed by the operator of the gas transmission pipeline where the works are within or crossing the relevant gas transmission easement. <p>8. Easement Delineation On Site During construction, the boundary of the easement must be clearly delineated on site by temporary fencing (or other means as agreed by APA), and clearly marked as a hazardous work zone/ restricted area. Any ongoing fencing, or access restriction, as determined by the SMS will be implemented by the proponent. Crossing of the easement during construction must only be at points agreed to by APA, and designed and built to APA's standards.</p> <p>9. Easement Delineation On Plans All plans which include the area of the gas pipeline easement must have the easement clearly identified with hatching on the full width of the easement. The easement must also be clearly labelled as 'high pressure gas pipeline easement – no works to occur without the prior authorisation of the pipeline operator'.</p> <p>10. Pipeline Operator Access The ability of the pipeline operator to access the easement must be maintained at all times to facilitate prompt maintenance and repairs. This may be through interlocking padlocks so APA has keyed access as any time. APA field officers will undertake any necessary site induction to facilitate unaccompanied access.</p>	

5.2.2 Sutton District Community Association Inc (SDCAI) (277812)

Submission	Response
<p>As a Community Association, we trust that NSW State departments will adequately assess avoidance, mitigation and management of all aspects of the EIS, especially those relating to biodiversity, especially any potential impacts on the Greater Gooroyaroo project, Aboriginal Heritage, Bush fire prevention and impact on roads and traffic through Sutton village.</p> <p>For SDCAI, there are three main issues:</p> <ul style="list-style-type: none"> • Ongoing community consultation • Road impacts • Bush fire prevention <p>Community consultation</p> <p>SDCAI is keen that the NSW Dept of Planning and Environment responds to community concerns, both from those significantly impacted by the proposed development, and residents of Sutton village who will be greatly impacted during the construction phase. Traffic and possible road deterioration will also impact the wider community. Following the exhibition period, a public meeting held in Sutton with the Planning Assessment Commission would provide local residents with a further opportunity to share their views and be assured that the consultation process is comprehensive and that the panel is able to see first hand the potential impacts. If the proposed development were to go ahead, ongoing community consultation would be vital so that the impacts on our community are minimised. A clear process for Sutton residents to raise their concerns is necessary so that any complaints are dealt with promptly and efficiently. The Community and Stakeholder Consultation Plan mentioned in the EIS needs to be easily accessed and issues dealt with promptly.</p>	<p>The SDCAIs key issues of concern and requirements around ongoing community consultation are noted.</p>
<p>Roads</p> <p>The route suggested passes through Sutton village. Sutton is a small community with a road system dating back over 150 years. The dog-leg system is from that time. Traffic assessment states that during construction for over 5 months there will be 400 light vehicles movements a day and when bringing the panels, 75 heavy vehicles movements per day (for two months). In addition there may be up to 16 oversized vehicles. The delivery of the transformer has an even greater impact. The EIS states that “protocols would be documented in a project specific Traffic Management Plan and communicated to all key stakeholders, particularly the contractors and the local community.” The local school and residents should be consulted on developing aspects of the Traffic Management Plan, rather than it be communicated to them. We believe the following aspects need to be addressed.</p>	<p>Responses to the specific issues are provided below.</p>
<p>Safety of school children and their families</p> <p>Vehicles coming from the Federal Highway heading north through Sutton, on Bywong Street, pass very close to Sutton Public School grounds and Country Bumpkins Childcare facility. Large</p>	<p>Heavy vehicles are proposed to be excluded from the school zone on Bywong Street and Victoria Street during the periods where the</p>

Submission	Response
<p>vehicles coming into Sutton will then negotiate a sharp left hand bend into Victoria Street. Access to the Recreation ground, Hall, Tennis Courts, Baker and Post Office all require pedestrians to cross the main road from the School. A right hand bend follows from Victoria into Camp Street. This corner is the access to the Pony Club grounds. During drop off and pick up, families not living in the village park opposite the school on Victoria St, however, many walk down Victoria St on the School side, crossing across Bywong St to enter the Oval, or tennis, or playground. This is the corner where all heavy trucks will turn. Heavy vehicles must adhere to times outside drop-off and pick up. Is this planned to be 40 kmh times in NSW - 8.00 – 9.30am and 2.30 – 4pm ? When leaving Sydney or Wollongong, will large trucks be likely to travel in convoy? Where will they stop if they are at risk of entering Sutton during drop-off and pickup? The traffic management plan needs to provide adequate detail to prevent stationary vehicles waiting on the Sutton road south of Sutton from the Federal Highway. Equally, heavy vehicles returning from the Site will need to go through Sutton before 2.30 or wait until after 4.00pm. After 4.00 all vehicles returning from Canberra and Queanbeyan to Sutton, Gundaroo and other areas, will be travelling northwards in the opposite direction. Traffic management needs to consider the large vehicles returning to the Federal Highway from East Tallagandra Lane and turning right onto the Sutton Road then meeting all oncoming traffic on the culvert entering the village from Gundaroo.</p>	<p>40km/h speed limit is enforced (8.00–9.30 am and 2.30–4 pm on school days). This will be confirmed through the development of the TMP in consultation with the Yass Valley Council and Roads and Maritime Services, along with associated management measures for the successful implementation of this exclusion period. The final TMP will be reviewed and approved by DPIE.</p>
<p>Days and times In the EIS, days are detailed 7.00am to 6pm including Saturdays and 8-6pm Sundays and public holidays. For the safety of Sutton's school children and families, the timings mentioned above on school days need to be addressed. On Saturdays large numbers of cyclists and local residents visit and travel through the village to local businesses and sport events. Large trucks travelling through at this time need to be equally vigilant. On Sundays the Pony Club, directly on Camp Street, attracts large numbers of vehicles including horse floats.</p>	<p>As stated in the EIS, standard construction hours are 7:00 am–6:00 pm Monday to Friday and 8:00 am to 1:00 pm Saturday, with no works on Sundays or public holidays.</p> <p>The reference to 8:00 am-6:00 pm on Sundays and public holidays refers to the definition of 'Day' time under the NSW Industrial Noise Policy, and is not the standard construction hours.</p> <p>Cyclist, visitor and horse float traffic on the weekends is noted and will be considered during the development of the TMP.</p>
<p>Culvert north of village The culvert, north of Sutton, leaving the village has not been identified as one that needs to be upgraded. The culvert was built by local people in 1950s. We trust that not only will the infrastructure of the culvert be thoroughly assessed but also that additional signage be considered if so many additional large trucks are crossing it daily, in both directions.</p>	<p>Acknowledged. Should the approved heavy vehicle route cross this culvert, this will be considered as part of the TMP.</p>

Submission	Response
<p>Light vehicles and car pooling/minibus</p> <p>Renew's traffic mitigation involves the potential of car pooling or mini buses. If this were to take place, where would the pick-up points be? There is the potential problem of having cars parked in Sutton all day while the workers go to the Site. There needs to be provision for a designated place, not in Sutton village, where workers can leave their cars. The area opposite the Baker is often full with horse floats, or caravans where visitors are visiting the Baker, Sutton Store, Pony Club or the recreation ground picnic shelter, playground and toilets. Around the Hall and public toilets the car parking is used for Hall bookings and for the tennis courts. The empty blocks in the centre of the village, near the village Blackboard is regularly used for School functions. Sutton businesses and local residents will suffer if additional parking is taken by workers for the Site.</p>	<p>Acknowledged. The car parking area would be agreed with the council during the development of the TMP.</p> <p>A shuttle bus would be provided to transport to and from the agreed parking area and the Project work site. Pick up locations would be determined once the workforce plan has been prepared and the quantity of workers and their likely distribution and general origin of commute is known.</p>
<p>Water for cleaning the arrays</p> <p>All the above traffic considerations are for the construction time only. In the EIS, it states that water will be brought in for cleaning the arrays if there is no adequate rainfall. How many trucks would be needed to clean the arrays? Is this likely to be annually?</p>	<p>It is generally considered that rainfall is sufficient to clean the solar arrays. The need for water to be transported to the Site for the cleaning of the PV panels would be wholly dependent on the frequency and volume of rainfall at the Site over any given year. However, the need for water to be transported is expected to be infrequent.</p>
<p>Bush fire prevention</p> <p>SDCAI trusts that NSW authorities will assess if adequate provision has been made for Bushfire prevention. Is 20 kilolitres static water on site adequate? How will the 2200 mm security fencing impact on quick accessibility to the site should a bushfire occur? We expect NSW Dept of Environment and Planning to use their expertise to ensure residents close to the Site and also Sutton village are not put at unnecessary risk.</p>	<p>Static water supplies of 20 kL for firefighting/bushfire management would be provided for use in the event of a fire in the vicinity of the Site. The capacity of this supply would be reviewed in consultation with the RFS.</p>

5.2.3 Nature Conservation Council of NSW (278243)

Submission	Response
<p>It is our position that this proposed solar farm would deliver a net-positive impact on nature and for the citizens of New South Wales and as such we support planning approval for this project with conditions.</p>	<p>Noted.</p> <p>The project footprint has been revised to avoid a stand of Brittle Gum trees in the southeast of the Site. These trees will be retained and the stand</p>

Submission	Response
<p>Increased investment in renewable energy projects such as solar farms is an essential step towards a low-carbon future. This project will significantly add to the installed renewable energy capacity in NSW.</p> <p>Climate change is already having significant impacts to nature and these will only get worse unless projects such as the Springdale solar farm are rapidly deployed. Climate change is already harming the residents of New South Wales for example through a longer bushfire season, more intense heatwaves, more intense droughts in the South of the state, and impacts on infrastructure. Renewable energy projects such as the Springdale solar farm are crucial to avoiding dangerous climate change. We ask that your assessment of this project considers the broader benefits of avoiding climate change by proceeding with this project.</p> <p>We would like to highlight some of the benefits that the Springdale Solar farm would offer to the people of NSW:</p> <ul style="list-style-type: none"> • The Springdale Solar Farm would produce around 200 GWh of renewable energy each year, enough to power 35,000 homes; • By reducing fossil fuel generation it would reduce airborne pollutants, including over 120,000 tonnes of CO₂ each year, as well as SO₂, NO_x and PM 2.5 pollution; • It would reduce reliance on coal fired power plants – diversifying the state's energy mix and promoting renewable energy production; • Construction would result in up to 200 jobs and a further 5 full time jobs during operation; • It would contribute to our efforts to avoid dangerous global warming, which is threatening human and ecosystem health. • Sheep grazing will occur on the Site, between the rows of panels, continuing the agricultural productivity of the land, in addition to the clean energy production. <p>We recognise that there will be some disturbance to habitat of the Golden Sun Moth (GSM). We would like to highlight the importance of identifying appropriate offset GSM habitat and protecting it in perpetuity to minimise impact on this critically endangered species.</p> <p>We would like to express concern regarding the clearing of paddock trees including 14 hollow-bearing paddock trees (Biodiversity Development Assessment Report, EIS Appendix B, p28). Paddock trees play a vital ecosystem role and support threatened species.</p>	<p>will be fenced to exclude grazing for a minimum of 5 years to allow natural regeneration.</p> <p>Section 2.1.2 of the updated BDAR (refer to Appendix A of this report) details that the stand of hollow-bearing <i>Eucalyptus mannifera</i> (Brittle Gum) in the south-east corner of the Site, adjacent to Tintinhull Road, that is potential Superb Parrot breeding habitat, will be retained. Further, the BMP will include actions to protect Superb Parrot in the long term, such as excluding grazing to promote tree regeneration.</p> <p>The proponent will also establishment a GSM habitat conservation zone measuring approximately 60 hectares throughout the western portion of the Site, which will protect and enhance GSM habitat</p>

Submission	Response
<p>The majority of hollow bearing and stag trees are located in the south east corner of the proposed Site (EIS Appendix B, figure 6). We suggest that this area is excluded from the development Site and conserved.</p> <p>We also strongly advise that the hollow bearing tree that is known Superb Parrot habitat is not removed as part of the development and is instead conserved. Nest boxes are unlikely to provide the appropriate habitat in comparison to the hollow bearing tree that is known Superb Parrot habitat. If the hollow bearing tree that is known Superb Parrot habitat is to be removed, we advise that this occurs outside of breeding season; and if chicks/eggs are found, that the removal of the tree is postponed until the eggs have hatched and the chicks have reached independent maturity.</p>	

5.2.4 Transgrid

Submission	Response
<p>We can confirm the proponent is in discussions with TransGrid as the Transmission Network Service Provider to develop their proposed project. They are in the process of working through the connection process, in accordance with the National Electricity Rules and TransGrid's requirements.</p> <p>The proposed design of the substation and switchbay for the Springdale farm is consistent with the descriptions in the Environmental Impact Statement on display with NSW Planning and Environment. However, it is unclear in the EIS that the transmission line works is included in the scope of works. It may be referred to as "associated infrastructure". To clarify its inclusion, it is requested that the submissions report clarifies that the transmission line works includes replacement of existing poles with new structures and guy wires, as well as like for like replacement of conductors and earth wire.</p>	<p>The proposed project works will include all works required to connect the proposed new substation and switchbay into the existing 132 kilovolt transmission line at the site. This includes the replacement of existing poles with new structures and guy wires, as well as like for like replacement of conductors and earth wire. The impacts of these works have been considered and assessed in the EIS.</p>

5.2.5 Department of Industry, Lands & Water (276111)

Submission	Response
<p>Recommendations Prior to Project Approval</p> <p>The EIS should be updated to correct stream order listings and riparian buffer widths for Back Creek and the Central Tributary.</p>	<p>Response provided below under 'Attachment A', 'Water Resources'.</p>

Submission	Response
<p>Details of a viable source of water that is to be trucked onto the Site for use over the life of the Project, including project decommissioning, should be identified in the EIS.</p>	<p>The highest water use will be during the construction phase of the Project when approximately 2 ML would be used, principally for dust suppression and earth compaction where required (see Section 10.3.1 of the EIS). A similar amount of water would be required during decommissioning.</p> <p>Water would initially be sourced from onsite dams, if available and depending on the season and recent rainfall. The EPC Contractor would then look to source water from nearby council supplies. Yass Valley Council have confirmed there is a council supply pipe in North Yass that could be utilised for the Projects water requirements.</p> <p>Water requirements during the operational phase are relatively lower with approximately 1.6 ML per annum required for the Control Building facilities (see Section 10.3.2 of the EIS). This water would be sourced from rainfall and nearby council supplies.</p>
<p>The EIS should assess the impacts on crown lands and crown roads directly affected by, or adjacent to the proposed development area as identified in Attachment A.</p>	<p>The matters identified in Attachment A of this submission are addressed below.</p>
<p>The detailed design plans should confirm excavation depths of all earthworks, and include of any proposed construction plans for drainage features and scour protection. Potential for groundwater impacts should be readdressed when final design plans are completed.</p>	<p>The detailed design stage would consider these requirements in detail.</p>
<p>Recommended conditions of approval A Soil and Water Management Plan should be prepared prior to commencement of construction activities at the Site.</p>	<p>An Erosion and Sediment Control Plan (ESCP) will be prepared for the Project which will include measures to manage runoff, erosion and stockpile management. Soil and water management measures which do not apply to erosion and sediment control such as water resource management, will be incorporated into the</p>

Submission	Response
	Construction Environmental Management Plan (CEMP).
The design and construction of any watercourse crossings on the Site should be undertaken in accordance with the Department's Policy and Guidelines for Fish Friendly Waterway Crossings (2004) and Why Do Fish Need to Cross the Road? Fish Passage Requirements for Waterway Crossings (2004). These documents are available at https://www.dpi.nsw.gov.au/fishing/habitat/publications/pubs .	The requirements outlined in these guidance documents will be considered in further depth during detailed design.
Proposed plans and construction methodologies for all waterway crossings over key fish habitat (3rd order or above waterways) should be designed in consultation with DPI Fisheries.	Acknowledged.
Infrastructure (including security fencing) should be located outside the vegetated buffer zones (apart from infrastructure such as road crossings).	Infrastructure including security fencing will be located outside the vegetated buffer zones, except for crossings.
Works within waterfront land must be carried out in accordance with the Guidelines for Controlled Activities on Waterfront Land (Natural Resources Access Regulator 2018).	Acknowledged.
Relevant licences and consents must be obtained from DoI Lands prior to accessing or undertaking any activity on crown land.	Acknowledged.
All Crown public roads within the development envelope should be closed and purchased by Yass Valley Council.	<p>Crown roads within the Project Site are discussed in Section 4.2.4 of the EIS. The majority of Crown roads are in the process of being closed and ownership will be transferred to the current project landowner as the neighbouring landowner. There are two Crown roads where the proponent would enter into a licence agreement with Crown lands for road and/or cable crossings of the Crown road as outlined below:</p> <p>Between Lots 161 and 15, DP754908 (cable crossing only).</p> <p>Between Lot 1 DP198933 and Lot 54 DP754908) (road and cable crossing).</p> <p>No Crown roads within the development envelope will be purchased by Yass Valley Council.</p>

Submission	Response
All below-ground infrastructure should be removed when the Project is decommissioned.	Acknowledged. All below-ground infrastructure will be removed as far as is practicable and beneficial when the Project is decommissioned in accordance with landowner obligations.
A Site Rehabilitation plan should be developed at least two years prior to decommissioning and include standards to show successful rehabilitation and rehabilitation methods.	Acknowledged. A site Rehabilitation plan will be developed prior to decommissioning and include standards to show successful rehabilitation and rehabilitation methods.
<p>Attachment A: Water Resources</p> <p><u>Watercourses</u></p> <p>Lands and Water databases indicate Back Creek and the central Tributary on the Project Site are 4th order and 3rd order watercourses respectively. Table 25 on p 105 of the EIS Report and Figure 22 should be corrected to reflect this and the relevant vegetated buffers be applied.</p>	<p>As there appears to be no publicly available information that is consistent with Lands and Water databases, the stream orders applied in the EIS were based upon application of the Strahler system according to the number of identifiable tributaries upstream of the development.</p> <p>For SSD projects, Section 4.4.1(1)(g) of the EP&A Act provides that controlled activity approvals do not apply. Despite this, the proponent has sought to implement good practice by seeking to comply with the intent of the NSW Office of Water <i>'Guidelines for riparian corridors on waterfront land'</i> (2012) wherever practical. As such, the vast majority of the development envelope has been placed outside of the recommended riparian corridors for waterways flowing through the Site.</p> <p>The proponent has sought, and will continue to seek, to retain existing native vegetation within these riparian corridors throughout detailed design and construction.</p>
A number of first order watercourses are located within the solar panel array footprint. The riparian value of these is recognised to be limited, however it is recognised based on the flood modelling that flows will be conveyed via these watercourses. Management of vegetated buffers and of these flow lines should focus on retaining adequate vegetation cover to mitigate erosion.	The Operational Environmental Management Plan (OEMP) will include the requirement to maintain groundcover (grass) between and under all solar panel arrays during operation, including along the

Submission	Response
	first order watercourses. This is consistent with the current vegetation along the watercourses. The OEMP will identify the location of all watercourses to allow these areas to be targeted during monitoring.
It is understood the Project requires the crossing of watercourses for road crossings and cable installation. The locations and potential impacts of installing and operating this infrastructure should be detailed in the EIS.	<p>The location of road crossings is identified in the EIS on Figure 22. The underground cable crossings would be at the same locations, installed within the road corridor.</p> <p>The road and cable crossings would be designed to ensure there are no adverse impacts to the watercourses, potential fish habitat, or flood behaviour.</p>
The infrastructure is proposed to be located outside of the 1 in 100yr flood event of the two main watercourses, or at ground level if within. The risk of impacts by flooding on and off the Site is considered low.	Acknowledged.
<p>Water Requirements</p> <p>In order for Lands and Water to provide a complete assessment of all water issues the proponent must detail water requirements and access for the entire duration of the Project, including decommissioning requirements. The water requirements are minor, indicated as 2ML during construction and 1.6ML/yr for operations.</p>	It is estimated that the water requirements during decommissioning would be similar to that of the construction phase, which is approximately 2 ML, to be used for dust suppression, site amenities and vehicle washing.
<p>Agriculture</p> <p>The beneficial use of the land through the use of sheep grazing to maintain ground cover and control of weeds in the area of the solar farm is supported. There will need to be adequate provision of watering points and shelter provision in the resulting paddocks to accommodate the sheep.</p>	Adequate resources for sheep will be provided as per any requirements under any agistment agreement. The solar arrays retained woodland and scattered trees would provide adequate shelter.
Removal of all underground infrastructure following decommissioning of the Site is recommended to avoid nuisance interference during cultivation activities.	Following the 35 year operational lifetime of the Project, decommissioning activities would remove all above ground infrastructure and rehabilitate the Site to return it to its current predevelopment condition with the aim of resuming agricultural activities.

Submission	Response
	All below-ground infrastructure will be removed as far as is practicable and beneficial when the Project is decommissioned.
A Construction Environment Management Plan (CEMP) should be developed and include indicators and standards to measure successful rehabilitation of disturbed areas. These indicators and standards should also be applied to rehabilitation activities once the solar farm is decommissioned.	The CEMP will outline measures for rehabilitation as well as monitoring requirements and will document performance indicators to determine the effectiveness of the measures and any corrective actions required.
Crown Lands Infrastructure located on Crown roads subject to a Crown lands licence application, including underground infrastructure, should be removed during demobilisation and rehabilitation	<p>Noted. It is assumed that ‘demobilisation’ in this case refers to decommissioning of the solar farm infrastructure at the end of its operational life.</p> <p>The proponent anticipates the removal of all infrastructure will be a condition of the licence agreement with the DPIE. If underground infrastructure is proposed to be left in the ground after decommissioning, the Project owner will be required to seek a new licence or easement agreement.</p>
Road works on the internal road section that coincides with the Crown road within Lot 54 DP 754908 should be confined to minor road works with no waterway crossing structures.	<p>The existing Crown road within Lot 54 DP 754908 (shaded blue in Figure 13 of Section 4.2.4 of the EIS) will be closed with ownership transferred to the landowner.</p> <p>Tintinhull Road is a Crown road that is adjacent to Lot 54 DP 754908. The proponent is seeking a licence agreement with Crown lands to cross this road between Lot 1 DP198933 and Lot 54 DP754908, as described in Section 4.2.4 of the EIS. There are no waterway crossings required within this section of Crown road and road works are expected to be minor.</p>
Figure 3 – Springdale Solar Farm development envelope shows the proposed Tintinhull Road realignment as a site access. If the access is continued along the Crown road section of Tintinhull Road and if works are required on the Crown section of Tintinhull Road then it should	The Crown road section of Tintinhull Road will not be used by the Project during construction or operation.

Submission	Response
be transferred to Yass Valley Council under the Administration of Crown Roads policy. The proponent should clarify if access is to be along the new proposed road route or directly into Lot 202 DP 754908 from the point shown as Site Access 3 in the EIS.	The Site Access 3 point shown in Figure 3 is an error. Site access will be from the new section of Tintinhull Road where it connects to the proposed internal road. Refer to the updated constraints map in the LVIA addendum, provided in Appendix B.
It is noted that as part of the licence assessment process the proponent has recently decided to not install any waterway crossing structures on the Crown roads. This should be reflected in the Environmental Impact Statement.	Acknowledged. This commitment has been added as a mitigation measure in Section 8.0 of this report.

5.2.6 Environment Protection Authority NSW (275617)

Submission	Response
The EPA notes that solar farms are not a scheduled activity under Schedule 1 of the <i>Protection of the Environment Operations Act 1997</i> and therefore an Environment Protection Licence will not be required for the proposal. As such, the EPA does not have a formal role in the matter and accordingly, does not have any comments to make on the proposal.	Acknowledged.

5.2.7 Division of Resources and Geoscience (GSNSW) (275701)

Submission	Response
GSNSW specific requirements for the Springdale Solar Farm Project (SSD 8703) required the proponent to include in the Environmental Impact Statement (EIS) a mining and exploration title and application search referencing DRGs MinView databases. Further, the proponent was required to consult with Yass Valley Council regarding the operational status of the Tallagandra Pit, located approximately 400 metres south of the proposal area, with a record of consultation to be included in the EIS. In addition, GSNSW was to be consulted in regard to any proposed biodiversity offset measures to ensure that there are no potential sterilisation impacts to resources (Our ref: OUT17/38489).	The operational status of Tallagandra Pit was sought from YVC in a meeting in January 2018.
GSNSW has reviewed and assessed the EIS and acknowledge that the proponent has addressed mining, exploration and minerals in the EIS, and has reviewed the Divisions online	The YVC advised that the pit is only used occasionally, which was reflected in the EIS. Email correspondence with YVC has been attached in Appendix F to evidence the status of Tallagandra Pit. GSNSWs requirement to be consulted further on biodiversity offset measures is noted.

Submission	Response
<p>MinView database, successfully identifying that there are no mining or exploration title or applications indicated over or in the vicinity of the Project Site (refer to page 119 of EIS).</p> <p>In relation to Tallagandra Pit, the proponent states “... surrounding mineral extraction points have been generally decommissioned with the exception of Tallagandra Pit where construction materials are extracted only intermittently. Despite potential increases in traffic along Tallagandra Lane which runs alongside Tallagandra Pit, no extraction of minerals or activities under extractive licences would be directly affected by the construction of the proposal” (refer to page 121 of EIS). GSNSW requires the proponent to consult with Yass Valley Council regarding the operational status of Tallagandra Pit and provide evidence and any outcomes of consultation.</p> <p>GSNSW note biodiversity offset measures have been proposed for the retirement of 48 species credits generated from the potential impacts of the Project. GSNSW request to be consulted in relation to the proposed location of any offsite biodiversity offset areas or any supplementary biodiversity measures to ensure there is no consequent reduction in access to prospective land for mineral exploration, or potential for sterilisation of mineral or extractive resources.</p>	

5.2.8 Fire and Rescue NSW (275994)

Submission	Response
<p>FRNSW notes that the facility's proposed location is within a NSW Rural Fire Services' (RFS) bush fire prone area. Notwithstanding, in the event of a significant fire event (either on or off-site in proximity to the development) or hazardous material incident FRNSW will be responded to either assist the RFS or to fulfil the role of designated combat agency.</p> <p>It is FRNSW experience that small and large scale photovoltaic installations present unique electrical hazard risks to our personnel when fulfilling their emergency first responder role (n.b. the <i>Fire Brigades Act 1989</i> imposes specific statutory functions and duties upon the Commissioner of FRNSW).</p> <p>In addition, the <i>Work, Health and Safety (WHS) Act 2011</i> (and its subordinate Regulation) classify FRNSW as a person (entity) conducting a business or undertaking (PCBU). Clauses 34 and 35 of the WHS Regulation impose specific obligations upon a PCBU to identify hazards and manage risks at workplaces.</p>	<p>As identified in Section 15.1 of the EIS, the Project Site is not within an area designated as bushfire prone land Yass Valley Council LGA Bush Fire Prone Land Map (6 June 2014).</p> <p>Notwithstanding, it is recognised that the Project Site and surrounding land could still be affected by an off-site or on-site fire event. A Fire Management and Emergency Response Plan will be developed for the Project in consultation with the RFS. The final Fire Management and Emergency Response Plan would be reviewed and approved by DPIE.</p>

Submission	Response
<p>Due to the electrical hazards associated with large scale photovoltaic installations and the potential risk to the health and safety of firefighters, both FRNSW and the NSW Rural Fire Service must be able to implement effective and appropriate risk control measures when managing an emergency incident at the proposed Site.</p>	
<p>Recommendations</p> <p>Should a fire or hazardous material incident occur, it is important that first responders have ready access to information which enables effective control measures to be quickly implemented. Without limiting the scope of the emergency response plan (ERP), the following matters are recommended to be addressed:</p> <p>That a comprehensive ERP is developed for the Site.</p> <p>That the ERP specifically addresses foreseeable on-site and off-site fire events and other emergency incidents (e.g fires involving solar panel arrays, bushfires in the immediate vicinity or potential hazmat incidents).</p> <p>That the ERP develop appropriate risk control measures that would need to be implemented in order to safely mitigate potentials risks to the health and safety of firefighters and other first responders (including electrical hazards). Such measures would include the level of personal protective clothing required to be worn, the minimum level of respiratory protection required, decontamination procedures, minimum evacuation zone distances and a safe method of shutting down and isolating the photovoltaic system (either in it's entirety or partially, as determined by the risk assessment).</p> <p>Other risk control measures that may need to be implemented in a fire emergency due to any unique hazards specific to the Site should also be included in the ERP.</p> <p>That two copies of the ERP (detailed in recommendation 1 above) be stored in a prominent 'Emergency Information Cabinet' that shall be located in a position directly adjacent to the Site's main entry points.</p> <p>Once constructed and prior to operation, the operator of the facility must contact the relevant local emergency management committee (LEMC). The LEMC is a committee established by Section 28 of the State Emergency and Rescue Management Act 1989. LEMCs are required to be established so that emergency services organisations and other government agencies can proactively develop comprehensive inter-agency local emergency procedures for significant</p>	<p>A Fire Management and Emergency Response Plan will be developed for the Project in consultation with the proponent and will incorporate the items recommended in an ERP.</p> <p>Two copies of the Fire Management and Emergency Response Plan will be stored in a prominent 'Emergency Information Cabinet' that will be in a position directly adjacent to the entry of the solar farm control building. The local LEMC would be contacted prior to operations at the solar farm commencing.</p>

Submission	Response
hazardous sites within their particular local government area. The contact details of members of the LEMC can be obtained from the relevant local council.	

5.2.9 Office of Environment and Heritage (OEH)

Submission	Response
<p>Aboriginal Cultural Heritage</p> <p>The Aboriginal cultural heritage assessment did not include test excavation and as a result there is currently insufficient understanding of the values that may be impacted by the Project. The accepted standard for assessing areas of archaeological sensitivity is to undertake test excavation as part of the project design. Test excavations contribute to the understanding of site characteristics and local and regional prehistory and they inform conservation goals and harm mitigation measures for the proposed activity. Early identification of values provides the best opportunity to conserve Aboriginal objects and gives certainty to all parties about the Aboriginal cultural heritage management requirements. The results of the testing program also determine whether subsurface salvage is needed and how it should be carried out.</p> <p>If any significant objects are located requiring protection it could affect the layout of the facility. It is therefore recommended that subsurface archaeological test excavation be undertaken across all areas that will be impacted by the solar farm, including ancillary infrastructure, prior to the finalisation of the design of the solar farm and the commencement of construction.</p> <p>OEH supports the conservation of a sample of the surface artefact scatters and the identified possible Aboriginal scarred trees. A method for managing the conservation of these sites should be included in the Aboriginal Cultural Heritage Management Plan (ACHMP). Further detailed comments on Aboriginal cultural heritage (ACH) matters have been included in Attachment A.</p>	<p>The proponent has undergone consultation with DPIE to discuss timing of the archaeological salvage program. As part of this consultation, a heritage specialised was engaged to provide advice regarding the suitability of a post-approval archaeological salvage program (see letter to DPIE attached in Appendix D). This timing is considered appropriate based on the following:</p> <p>It is anticipated that sites identified during the archaeological test excavation will be consistent with those identified during the archaeological survey for the Project (i.e., low to moderate density artefact sites)</p> <p>The presence of sites of high significance within the Project Site such as burials, stone arrangements or regionally rare artefact scatters are not anticipated. Regardless, the proponent has committed to the in-situ conservation of any such sites and this would be included in the Project's Aboriginal Cultural Heritage Management Plan (ACHMP)</p> <p>Should any subsurface sites be identified through the test excavation program that warrant mitigation through archaeological salvage (i.e., open area excavations) the triggers and provisions for this will be detailed within the ACHMP.</p>

Submission	Response
	<p>Details for the test excavation program and any associated mitigation measures, including conservation policies, will be included in the Project's ACHMP. RAPs will be provided with an opportunity to review and contribute to the ACHMP prior to its assessment and approval by DPIE.</p> <p>Completion of the test excavation post-approval provides an opportunity for detailed design to occur, allowing for a more targeted test excavation program, should impact areas be reduced, that can be focused on areas that will be subject to ground disturbances as a result of the Project.</p> <p>The ACHMP will include all management measures set forth in the AACHIA and the EIS, as listed in Chapter 8.0 of this report.</p>
<p>Attachment A Key Issues Subsurface archaeological testing prior to consent is recommended</p> <p>The management and mitigation strategy is focused on managing the impact to surface sites only. The presence of subsurface sites is suggested throughout the AACHIA but no investigation has been undertaken to determine if subsurface sites exist. It is therefore not possible to determine the significance and conservation value of subsurface sites that may be present in the pProject area or their impacts from construction.</p> <p>AECOM (2018:37, 47) note in several sections of the AACHIA that surface sites are not a reliable indicator of subsurface deposit. AECOM (2018:37) state "... the presence or absence of surface artefacts... is not a reliable indicator of Aboriginal archaeological sensitivity." Despite noting this, there has been no consideration of identifying subsurface sites.</p> <p>The management recommendation that archaeological excavation be left to post approval is at odds with the assessment developed in consultation with the Registered Aboriginal Parties (RAPs) that "owing to generally poor visibility conditions, subsurface testing will be necessary to adequately characterise the Aboriginal archaeological record of the proposal Site. Any</p>	<p>As discussed above.</p>

Submission	Response
<p>subsurface investigation within the proposal Site should utilise a landscape-based sampling strategy" (AECOM 2018:14).</p> <p>It is therefore recommended that subsurface archaeological test excavation be undertaken across all areas that will be impacted by the solar farm, including ancillary infrastructure, prior to the finalisation of the design of the solar farm and the commencement of construction.</p>	
<p>The proposed subsurface archaeological salvage program should be conducted after subsurface test excavation has been completed</p> <p>The AACHIA recommends that an archaeological surface and subsurface salvage program is completed. The proposed subsurface archaeological salvage program suggests that a landscape based program of subsurface investigation be completed across areas recorded as both high and low Aboriginal archaeological sensitivity. No further detail about this planned excavation is provided. This strategy aligns more closely with testing methods rather than salvage methods. Test excavation is part of the assessment process in order to determine the presence and significance of Aboriginal objects. Salvage excavation is a mitigation measure. Subsurface archaeological testing should therefore be undertaken prior to any salvage excavation. The results of the testing program would determine whether subsurface salvage excavation as a mitigation measure is necessary and guide the salvage program method if required.</p>	<p>As discussed above.</p>
<p>Conservation management of surface sites should be considered</p> <p>The Environmental Impact Statement (EIS) states that ancillary infrastructure (such as underground cabling and fencing) may be needed outside the development envelope but still within the Project Site. Landscaping works are also currently planned to minimise the visual impacts of the proposal.</p> <p>These ancillary works could impact known Aboriginal objects. The AACHIA recommends conservation of all surface sites that will not be impacted by the development footprint. If surface sites are to be conserved, a management plan outlining various strategies should be prepared to ensure the protection of these sites from direct and inadvertent impacts. This would assist in preventing inadvertent impacts from ancillary activities.</p>	<p>A management strategy to address the impacts of the Project on the known and potential Aboriginal archaeological resources within the Project would be development for the Project. The development of this Aboriginal Cultural Heritage Management Plan (ACHMP) would take place in consultation with RAPs, and to the satisfaction of OEH and DP&I. Subject to Development Consent under Part 4, Division 4.1 of EP&A Act, this ACHMP will guide the management of the known and potential Aboriginal archaeological resource of the Site, as well identified cultural values.</p> <p>A comprehensive archaeological salvage program will also be undertaken for the Project prior to the commencement of any ground</p>

Submission	Response
	disturbance works within the Site, including cabling, fencing and landscaping. The ACHMP for the Project will include a detailed research design for the surface collection and excavation components of the salvage program.
<p>Suggested improvements to the AACHIA <u>Further details in the Literature Review may assist in developing management recommendations</u> The literature review should provide a comprehensive review of the AHIMS sites that were found in the AHIMS database search discussing features such as site size, raw material and subsurface potential. These details may assist in further developing the predictive model for the area and determining the subsurface potential of sites.</p>	<p>The AACHIA for the Project included a search of the AHIMS database (undertaken on 23 October 2017) for a 10 x 10 km area centred on the Site. A total of 14 Aboriginal archaeological sites were identified within the search area all comprising open artefact sites. Following this, an archaeological survey was conducted to was to identify, record and map Aboriginal heritage values within the Site. To this end, where appropriate the survey inspected areas of known or potential Aboriginal cultural value, including AHIMS sites, and areas identified by RAP representatives.</p> <p>The archaeological salvage program that will be conducted prior to ground disturbance works and will be developed following detailed design. This would allow for survey and test excavations to be more accurately focused on areas that will be subject to ground disturbances as a result of the Project, across selected areas of low and high Aboriginal archaeological sensitivity, as determined through consultation with RAPs.</p>
<p>Clarification of artefact types should be included in the AACHIA The AACHIA notes that the assemblage is dominated by non-flake debitage (i.e. angular shatter). Site SSF-AS-17 includes a large number of non-diagnostic quartz angular shatter over a large surface area. The subject area is noted to contain natural outcropping quartz. Further clarification should be provided in the ACCHIA to explain how the non-diagnostic angular quartz was differentiated from natural outcropping quartz and quartz gravels.</p>	<p>A table of recorded artefacts has been provided in the AACHIA (refer to table 16 and Appendix I of the AACHIA, provided in Appendix C of the EIS), both of which include detail relevant to site SSF-AS-17.</p>

Submission	Response
It would be beneficial to include a table or list of recorded artefacts in an appendix of the report.	
<p>Registered Aboriginal Party correspondence should be clarified</p> <p>The Aboriginal cultural heritage consultation requirements for proponents' stages 1, 2 and 3 appear to have been combined. While this is unlikely to have altered the consultation outcomes it is not in accordance with OEH guidelines. In future, stage 1 should not be combined with stages 2 and 3.</p> <p>The report references letters to Native Title Services Corporation (NTSCorp) and the Native Title Tribunal but these are not included in Appendix B along with other agency letters. These should be included. Appendix E contains agency notification correspondence of the RAPs for the Project. The log contains a letter informing OEH of the RAPs for a different project and does not match the correspondence received to date by OEH. This should be amended.</p> <p>One of the submissions included in Appendix G indicates that a particular RAP group has requested that their details are not provided to OEH and the relevant Local Aboriginal Land Council (LALC). This submission and the name of the RAP group should be redacted throughout the report.</p>	<p>Acknowledged.</p> <p>The AACHIA attached to the EIS included the following agency letters attached in Appendix B:</p> <ul style="list-style-type: none"> • The Office of Environment and Heritage; • Ngambri Local Aboriginal Land Council (Ngambri LALC); • Office of the Registrar, Aboriginal Land Rights Act 1983 (NSW); • Yass Valley Council; and • South East Local Land Services (SE LLS). <p>It is acknowledged that the omission of the letters to the Native Title Services Corporation (NTSCorp) and the Native Title Tribunal was an oversight. A full compilation of notification letters to agencies, including to NTSCorp and the Native Title Tribunal is provided in Appendix D.</p>
<p>Biodiversity</p> <p>We have reviewed the Biodiversity Development Assessment Report (BDAR) which is required by the <i>Biodiversity Conservation Act 2016</i>. The BDAR is good quality although it does not take account of the impact of shading that will impact upon Golden sun moths. Further detail on this issue is provided below. We note that a Biodiversity Management Plan (BMP) is being developed. OEH request being consulted when the plan is being developed.</p>	<p>Section 2.1.2 of the updated BDAR (refer to Appendix A of this report) has been amended to reflect consultation with OEH during the development of the BMP.</p>
<p>Golden sun moths</p> <p>The Draft Landscape plan L01 shows a proposed 20m wide tree planting along the boundary. The impact of these plantings has not been considered. The trees will eventually shade out some of the known occupied habitat of Golden sun moth and potentially affect movement of the moth between patches of habitat on site and the population to the east of the boundary. Ideally, trees should not be planted in this area. Alternatively, the area that will be shaded should be considered cleared for the purpose of calculating credit requirements for the Golden sun moth.</p>	<p>The landscape plan has been altered to remove tall plantings where they may impact on GSM habitat. See Figure 8 of the updated BDAR.</p> <p>The impact of transient shading on GSM caused by structures (including trees) placed adjacent to GSM habitat is not well understood (A.Rowell, verbal advice, 2018). However, as pointed out by Ecologist, Alison Rowell (verbal advice, 2018) the impact is evident within the Project Site already, where a row of pine trees was established along the western boundary of Lot 182 DP754908, west</p>

Submission	Response
	<p>of GSM habitat (Figure 14 of the EIS shows the location of GSM habitat). These pines are approximately 15m tall. The GSM habitat patch is offset approximately 15m west of the pine trees demonstrating a 15m extent of shading impact resulting from a 15m tall row of trees. This is also evident east of the Project Site where GSM habitat within Lot 144 and 145 DP754908 is approximately 15m offset from a row of pine trees (also ~15m tall) planted along the western boundaries of these lots (refer to Image 2 below this table).</p> <p>It is assumed that the shading impact from the proposed vegetation screening will be proportional to the impact demonstrated above. As such, the proposed screening locations have been refined such that the screening vegetation is at least 15 m offset from GSM habitat. The changes to the screening are shown in Figure 1 of the LVIA addendum report, attached in Appendix B. While shadows would only be cast in an east to west direction (and to some extent south depending on the time of year) the minimum 15 m offset has been applied regardless of the direction to the GSM habitat. Only very small areas of proposed landscaping screening adjacent to GSM habitat needed to be reduced back to meet the minimum 15 m offset as illustrated in Figure 1 of the LVIA addendum report, attached in Appendix B.</p> <p>Additionally, proposed screening vegetation in SLL habitat has also been removed to ensure no impacts on SLL.</p>

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	<p>The proposed screening along the eastern boundary of Lot 1 DP198933 is not expected to have a shading or movement barrier impact on the GSM in Lot 144 and 154 DP754908 due to its distance from the GSM habitat (>35m) and the fact that there is already an existing row of pine trees located at this location, though closer to the GSM habitat (refer to Image 2).</p>
<p>Superb parrots There is a stand of hollow bearing <i>Eucalyptus mannifera</i> (Brittle gum) in the south-east corner of the Site, adjacent to Tintinhull Road, as shown in Figure 6 of the BDAR. This area is suitable Superb parrot breeding habitat and should be avoided or offset using the Biodiversity Assessment Method. If the trees are retained, the BMP should include actions to protect them in the long term such as excluding grazing to promote tree regeneration. Mitigation and Management Measure B17 states that any hollow (that is suitable for breeding by Superb parrots) removed will be replaced by at least two nest boxes. This measure is unlikely to be effective as there is no evidence that Superb parrots utilise nest boxes. Trials are currently underway in the ACT to relocate whole trees to new locations as it is expected that they are more likely to be utilised. Given the difficulties in offsetting breeding habitat for this species the preferred approach would be retaining the trees.</p>	<p>Section 2.1.2 of the updated BDAR (refer to Appendix A of this report) details that the stand of hollow-bearing <i>Eucalyptus mannifera</i> (Brittle Gum) in the south-east corner of the Site, adjacent to Tintinhull Road, that is potential Superb Parrot breeding habitat, will be retained. Further, the BMP will include actions to protect Superb Parrot in the long term, such as excluding grazing to promote tree regeneration.</p>
<p>Attachment B <u>Superb parrot habitat</u> The small stand of mature Brittle Gums (<i>Eucalyptus mannifera</i>), where Superb Parrots were recorded during the Site biodiversity assessment in 2017, was inspected by OEH threatened species and planning staff on 7 August 2018. In recent years, Superb Parrots have been recorded breeding in the hollows of this tree species both in the ACT (L.Rayner, ACT Parks unpubl. Data) and also nearby in Gundaroo where a community member has annual records of Superb Parrots nesting in up to 6 trees on their property in <i>E. mannifera</i>.</p> <p>Until recently, this information was not incorporated into the NSW Threatened Species Profile Database, and hence the BAM assessment would have overlooked this issue. The database is now up to date to reflect new information about breeding tree species for the Superb Parrot. Of the dozen or so trees in the small clump, at least half had hollows or hollow entrances that would be of a suitable size as Superb Parrot nesting sites.</p>	<p>Nest boxes are no longer required, as trees identified as potential breeding habitat for Superb Parrot will now be retained. This mitigation measure has been removed from the updated BDAR and is reflected in the updated mitigation measures in Section 8.0 of this report.</p>

Submission	Response
<p>OEH recommends avoiding the loss of these trees by fencing the small patch on the hill and destocking temporarily (5 years at least) to allow natural regeneration of trees to provide future replacement trees as the mature trees age, die and eventually fall down.</p> <p>If this is not the desired option for the proponent, then they can either assume loss of Superb Parrot breeding habitat and look for suitable offset options OR undertake surveys in the breeding season (mid Oct-mid Nov is optimal) to determine whether these trees represent breeding habitat or not.</p>	
<p>Striped Legless Lizard</p> <p>Although most of the impact area will avoid the area mapped as SSL habitat, it will be important to manage the retained area in the long term. For example; the retained area needs to be protected from construction/maintenance vehicles and weeds need to be managed. These measures should be documented within the BMP.</p>	<p>The construction footprint has been revised to avoid all SLL habitat – refer to Section 2.1.2 of the updated BDAR in Appendix A of this report. The retained area will be subject to a SLL management plan as part of the BMP and will include weed management and exclusion of construction/maintenance vehicles with the exception of the vehicles required to install underground power cables to connect the solar field areas.</p> <p>These underground cables were considered in the SLL expert report: “Minor, temporary ground disturbance may occur to install underground power cables between solar arrays, however the Project is unlikely to result in direct or indirect impacts to substantial areas beyond the designated development envelope” (pg 17, Capital Ecology, 2018).</p>
<p>Flooding</p> <p>OEH has reviewed Appendix F of the EIS and do not have any concerns in relation to the adequacy of the flooding assessment.</p>	<p>Noted.</p>

5.2.10 OEHL, Heritage Division (275705)

Submission	Response
<p>The subject Site is not within the curtilage or the vicinity of any State Heritage Register (SHR) items, nor have any historical archaeological sites been identified. Consequently, no specific comments are provided as no impacts to SHR items or State or local archaeological remains have been identified.</p> <p>However, it is noted that the abovementioned heritage assessment report recommends that unexpected archaeological finds protocols be imposed to manage any unforeseen finds during construction. This approach is supported and the recommendations in Section 8.2 should be imposed as conditions of consent.</p>	Acknowledged

5.2.11 Roads and Maritime Services (275697)

Submission	Response
<p>The development Site is located to the north of Sutton and is proposed to be accessed from Tallagandra Lane which is classed as a local road therefore any access driveway should be consistent with the requirements of the Council. The development proposal also includes the realignment of Tintinhull Road. This should also comply with the requirements of the Council as it is a local road. As a minimum the design of the proposed new road and its intersections with the existing public road network shall comply with the requirements of the Austroads Guide to Road Design, particularly the sight distance criteria, for the posted speed limit for road safety reasons.</p>	Acknowledged. It is noted the construction of the Tintinhull Road re-alignment has been provided independent of the proponent and the Project since the publication of the EIS.
<p>Due to the characteristics of such a development the significant proportion of traffic generation (for both light and heavy vehicles) occurs during the construction and decommissioning stages of the development with the operational phase of the development generating limited traffic. The construction period is to be approximately 10 Months. The documentation identifies the proposed haulage route for the components for the development but does not appear to address the source of, or the preferred route for the delivery of, other products, such as the aggregate, water and sand for construction of the development.</p>	The source of other products such as aggregate and sand will be identified by the EPC contractor. The transport route for these products will be considered in the Traffic Management Plan.
<p>The development Site is remote from the classified road network however due to the location of the development Site to the north of Sutton the transportation of the components for the development will be via the Federal Highway and Sutton Road, which are both classified roads and then to East Tallagandra Lane, which is classed as a local road. The haulage route is through the urban area of Sutton therefore consideration needs to be given to potential impacts on this urbanised area. The haulage route from the Federal Highway is limited to general access</p>	Acknowledged. Any required permits will be obtained.

Submission	Response
vehicles only therefore transportation of components is limited to 19 m articulated heavy vehicles or smaller. Transportation of the transformer to the Site will require a special permit for an oversize and over-mass vehicle.	
Section 14.3 of the EIS lists mitigation and management measures to address traffic issues which includes the preparation of a Traffic Management Plan for the construction period. As the proposal relies on access via the classified and local road network this plan should be finalised in consultation with the relevant road authorities, in this case being both the Roads and Maritime Services and Council. Rather than adopting the route as outlined in the submitted documentation the Traffic Management Plan would provide an opportunity to better understand and define the transportation route for delivery of the components and specialist vehicles to the development Site.	The TMP will be developed in consultation with TfNSW Yass Valley Council.
Roads and Maritime is mainly concerned with the impact of the development on the safety and efficiency of the road network. Roads and Maritime emphasises the need, particularly in the construction phase of this development, to minimise the impacts on the existing road network and maintain the safety, efficiency and standard of maintenance along the existing road network and to minimise the impact and distraction to the road user.	Acknowledged.
<p>Roads and Maritime Services has assessed the Development Application based on the documentation provided and would raise no objection to the development proposal subject to the Consent Authority ensuring that the development is undertaken in accordance with the information submitted as amended by the inclusion of the following as conditions of consent (if approved):-</p> <p>1. A Haulage Traffic Management Plan shall be prepared in consultation with the relevant road authorities (Council and Roads and Maritime Services) to outline measures to manage traffic related issues associated with the development, particularly during the construction and decommission processes. The appointed transport contractor shall be involved in the preparation of this plan. The plan shall address all light and heavy traffic generation to the development Site and detail the potential impacts associated with the development, the mitigation measures to be implemented, and the procedures to monitor and ensure compliance. This plan shall address, but not necessarily be limited to the following;</p> <ul style="list-style-type: none"> i) Require that delivery of components to the Site be via the route adopted and approved as part of the Traffic Management Plan, ii) Consideration of measures to address potential impacts of haulage of materials and component through the urbanised area of Sutton, 	<p>This condition will be met.</p> <p>It is noted, however that should a transport contractor not yet be appointed at the time of drafting the TMP, consultation would nonetheless be carried out as appropriate with TfNSW and YVC.</p>

Submission	Response
<ul style="list-style-type: none"> iii) Details of traffic routes to be used by heavy and light vehicles, and any associated impacts and any road-specific mitigation measures. iv) Details of measures to be employed to ensure safety of road users and minimise potential conflict with project generated traffic, v) Proposed hours for construction activities, as night time construction presents additional traffic related issues to be considered. vi) The management and coordination of the movement of vehicles for construction and worker related access to the Site and to limit disruption to other motorists, emergency vehicles, school bus timetables and school zone operating times, vii) loads, weights and lengths of haulage and construction related vehicles and the number of movements of such vehicles, viii) procedures for informing the public where any road access will be restricted as a result of the Project, ix) any proposed precautionary measures such as signage to warn road users such as motorists about the construction activities for the Project, x) a Driver Code of Conduct to address such items as; appropriate driver behaviour including adherence to all traffic regulations and speed limits, safe overtaking and maintaining appropriate distances between vehicles, etc and appropriate penalties for infringements of the Code, xi) details of procedures for receiving and addressing complaints from the community concerning traffic issues associated with truck movements to and from the Site, 	
<p>2 Any works within the road reserve of Tocumwal Road requires approval under Section 138 of the Roads Act 1993 from the road authority (Council) and concurrence from Roads and Maritime Services prior to commencement of any such works. The developer is responsible for all public utility adjustment/relocation works, necessitated by the development and as required by the various public utility authorities and/or their agents.</p>	<p>This condition appears to be an error as the proposal is not associated with Tocumwal Road.</p> <p>It is noted that any works within a road reserve will require approval under Section 138 of the <i>Roads Act 1993</i> from the relevant road authority prior to commencement of any such works.</p>
<p>3. All works associated with the Project shall be at no cost to the Roads and Maritime Services.</p>	<p>Acknowledged.</p>
<p>Further to the above the following conditions may also be appropriate for road safety reasons:</p>	<p>Acknowledged.</p>

Submission	Response
<p>1. Prior to the commencement of construction on-site, the Proponent must undertake all works to upgrade any road, its associated road reserve and any public infrastructure in that road reserve, to a standard suitable for use by heavy vehicles to meet any reasonable requirements that may be specified by the relevant roads authority. The design and specifications, and construction, of these works must be completed and certified by an appropriately qualified person to be to a standard to accommodate the traffic generating requirements of the Project. On Classified Roads the geometric road design and pavement design must be to the satisfaction of the Roads and Maritime Services.</p>	
<p>2. Glint and glare from the solar panels shall not cause a nuisance, disturbance or hazard to the travelling public on the public road network. In the event of glint or glare from the solar plant being evident from a public road, the proponent shall immediately implement glare mitigation measures such as establishment of a barrier (e.g. fence, advanced plantings) or other approved device to remove any nuisance, distraction and/or hazard caused as a result of glare from the solar panels.</p>	<p>The quantitative glare assessment in Appendix D of the EIS determined that the Project is unlikely to cause a glare hazard to surrounding receptors. This is due to solar panels being designed to absorb light with very little reflection and due to the nature of the tracking system where any reflected light is directed back into the atmosphere. Furthermore, screening vegetation is proposed on both sides of Tallagandra Lane to screen views of the solar farm from road users of this road.</p> <p>However, if the Project does result in unexpected glint or glare hazards to the travelling public on the public road network, then the Project owner will investigate and implement appropriate mitigation measures.</p>
<p>Under the provisions of the Environmental Planning & Assessment Act the Consent Authority is responsible to consider any likely impacts on the natural or built environment. Depending on the level of environmental assessment undertaken to date and nature of the works it may be necessary for the developer to undertake further environmental assessment for any ancillary road works required as a condition on the development.</p>	<p>Acknowledged.</p>

5.2.12 Yass Valley Council (YVC) (274639)

Submission	Response
<p>Settlement Strategy Council's Settlement Strategy identifies the Site as being in the 'buffer' area around the ACT/NSW border. The purpose of the buffer is to preserve the rural landscape values and restrict urban development in these areas. I note the landscape and visual assessment has identified the mitigation and management measures to minimise the adverse impacts i.e.</p> <ul style="list-style-type: none"> • Minimise tree removal and protect endemic vegetation • Review materials and colours (including use of non- reflective finishes) • Rehabilitate disturbed areas • Prepare landscape plan (in consultation with the properties with highest impacts) and maintain screen planting. 	<p>Acknowledged.</p>
<p>Road Impacts The proposed haulage route for heavy vehicles is:</p> <ul style="list-style-type: none"> • Sutton Road from the Federal Highway • Through Sutton village to East Tallagandra Lane • East Tallagandra Lane to Mulligans Flat Road • Mulligans Flat Road to Tallagandra Lane • Tallagandra Lane to the site entrances. <p>The traffic assessment indicates up to 400 light vehicles per day (over 5 months) and 75 heavy vehicles per day (over 2 months) during the construction phase. Once operating the facility will involve up to 10 vehicles per day.</p> <p>The proponent's assessment concludes that no significant road upgrades or sealing are required. However there is potential for:</p> <ul style="list-style-type: none"> • Culvert upgrade on Tallagandra Lane near the site entrance • Relocation of traffic signs at turn locations • Minor road grading of Tallagandra Lane • Ongoing maintenance (including grading and dust suppression) throughout the construction phase. <p>At its peak the daily traffic on Sutton Road through the village will increase from approximately 2,900 average annual daily traffic (AADT) to 3,400 AADT. Heavy vehicles are approximately 10% of all vehicles and will increase from approximately 290 to 370. This represents an increase of 25% in heavy vehicles over the 2 month delivery period but after this the number of heavy vehicles will reduce back to preconstruction levels. The increase in vehicle traffic does not alter the road category (i.e. Regional Road) and warrant any upgrade of the road function.</p>	<p>Heavy vehicles are proposed to be excluded from the school zone on Bywong Street and Victoria Street during the periods where the 40km/h speed limit is enforced: 8.00–9.30 am and 2.30–4 pm on school days.</p> <p>The requirement to comply with Yass Valley Council's <i>Roads Standards Policy</i> are noted. Additionally, culvert crossings will be assessed for its adequacy for the increase in heavy vehicle traffic as part of the TMP for the Project.</p> <p>It is noted the construction of the Tintinhull Road upgrade has been provided independent of the proponent and the Project since the publication of the EIS. The proponent is currently seeking additional opportunities to improve local roads, including sealing part of Tallagandra Lane.</p>

Submission	Response
<p>The proponents are only proposing to monitor traffic conditions and repair any damage attributable to construction traffic. However the culvert crossing needs to be assessed for its adequacy for the increase in heavy vehicle traffic.</p> <p>Heavy vehicle traffic through the Sutton village should be excluded during school hours to reduce conflicts with school traffic and children.</p> <p>All road work upgrades are to comply with Council's <i>Roads Standards Policy</i>.</p>	
<p>Community Enhancement Fund Under Council's Community Enhancement Fund Policy a fund is to be established based on 1% of the capital cost for the Project. The proposed solar farm has an estimated capital cost of \$138M and the contribution based on Council policy would be \$1.38M payable prior to construction. As an alternative to an upfront payment an annual contribution spreading out the contribution over the life of the Project – for this proposal with a 30 year life the annual contribution would be \$46,000 per year (adjusted with CPI). Distribution of the funds would be via a Council s355 Committee.</p> <p>In preliminary discussions with the proponent, legal access to dwellings in Tintinhull Road (off Tallagandra Lane) was identified as an issue. Access to Tintinhull Road is currently via a Crown Reserve which does not provide legal public access to the dwellings. A simple solution to this issue is to realign Tintinhull Road along the southern boundary of the solar farm Site. The cost of constructing this realignment can be offset against the Community Enhancement Fund contribution.</p> <p>The proponents have also offered to upgrade some of the unsealed sections of Tallagandra Lane as a further community benefit. If this upgrade work is above that required for adequate access to the Site then this could also be a Community Enhancement Fund offset provided this is agreed by Council.</p> <p>The proponents have indicated they will be setting up a Shared Neighbour Benefit Scheme for dwellings within 1km of the Site however this is not part of the community enhancement fund. If approved the proposal should be adjusted to provide for a Community Enhancement Fund in line with Council policy.</p>	<p>As discussed previously, the construction of the Tintinhull Road upgrade has been provided independent of the proponent and the Project since the publication of the EIS. The proponent is currently seeking additional opportunities to improve local roads. To this end, the proponent has approached YVC with an offer to carry out improvement works for Tallagandra Lane, including sealing 2.8 km of the road to provide additional and tangible benefits to the local community. This upgrade is over and above any works required to be carried out on the roads in order to facilitate the construction and operation of the project. It is understood at this stage of the negotiations and in review of this submission that YVC have a preference for the establishment of a Community Enhancement Fund, in line with the YVC Community Enhancement Fund Policy.</p> <p>The proponent considers that this is the most appropriate approach to</p>

Submission	Response
	<p>providing a community benefit given the nature of the project. Unlike a wind farm (in relation to which YVC's Community Enhancement Fund Policy has been developed), the visual impacts of the project on the wider community will be limited. Accordingly, upgrading the road network in the vicinity of the project would provide a targeted benefit to those members of the community who are most likely to be affected by the traffic impacts associated with the project.</p> <p>The proponent will continue to work with YVC to establish if improvement works for Tallagandra Lane would be delivered by the proposed, or if an adjustment would be made to the Community Enhancement Fund instead.</p>
<p>Community Consultation Community consultation for the Project includes:</p> <ul style="list-style-type: none"> • Extensive pre-lodgement consultation with the community • Formal public exhibition of the Environmental Impact Statement (including Community Information Drop In session) <p>If the Project is approved:</p> <ul style="list-style-type: none"> • Construction phase consultation (including arrangements for complaint management, community updates) • Operational phase consultation (including ongoing complaints management arrangements, community newsletters) • Both the pre-lodgement and proposed post approval consultation mechanisms are considered satisfactory. Consideration should also be given to the establishment of a Community Consultative committee (similar to wind farm projects) or the like if the Project is approved. 	<p>Acknowledged.</p> <p>Any public hearings would be held locally and would provide the opportunity for all submitters to address the members with their concerns before any determination is made.</p>

Submission	Response
<ul style="list-style-type: none"> The form and length of the community consultation for the formal public exhibition is determined by your Department. It is important that the Department takes into account the complexity of the Project and the extent of the documentation which can be daunting to laypersons. It is also important that the planning assessment examines all the issues raised by the local community and provides adequate forums for concerns to be raised and examined. The Department should consider holding a local forum for submitters to clarify the concerns and to seek responses from the proponent prior to finalising its assessment report. The assessment report should be available to all submitters and the proponent prior to any hearing or determination. <p>Any public hearing should be held locally and provide the opportunity for all submitters to address the members with their concerns before any determination is made. Ideally the hearing should be to receive representations from those submitters wishing to address the Commission following which the Commission should retire to properly consider these representations, the assessment report and make a considered and reasoned decision. Far too often the PAC has simply taken submissions and announced its decision, leaving local communities questioning the purpose of the hearing and the role of the Commission.</p>	
<p>YVC Addendum to Submission</p> <p>Further to Yass Valley Council's preliminary submission dated 30 July 2018, an addendum to this submission is provided following the resolution of the 22nd August Council Meeting to incorporate the following matters:</p> <p>The location is inconsistent with the Yass Valley Settlement Strategy and likely to negatively impact on the visual amenity of the area.</p> <p>Locating the development within the proposed RU6 transition zone undermines the intended objectives to protect the open rural landscape and environmental values of the area.</p> <p>The visual assessment is be revised to include all affected dwellings within 2 km of the Site.</p>	<p>The LVIA addendum has been revised to have consider an expanded potentially visually impacted area, 2 km of the Site, as shown in Figure 1 of the report, attached in Appendix B.</p> <p>A Land Use Compatibility Risk Assessment (LUCRA) has been undertaken to assess the Project in regard to the Yass Valley Settlement Strategy and relevant zoning controls, this is attached in Appendix C. The LUCRA has found that as Sutton has not been identified as a priority urban growth area for the Yass Valley LGA, the development of a solar farm would not preclude the overall goals of the Yass Valley Settlement Strategy 2036 of accommodating for future urban growth. This is because the solar farm</p>

Submission	Response
	<p>would not be located in a part of the Yass Valley LGA that is intended to support urban development and would not prevent urban development from occurring. While a solar farm is not an agricultural use, the presence of it would not comprise the village character or surrounding agricultural uses because of stringent mitigation and management measures in place aimed at significantly reducing its amenity impacts.</p>
<p>The project is to demonstrate how it positively contributes to the habitat connectivity outcomes of the Greater Gooroyaroo project.addendum</p>	<p>At its closest point, Goorooyaroo Nature Reserve is located approximately 5.5 km to the south of the Site. Due to significant historical agricultural clearing, there is a lack of bridging vegetation between the reserves and the Site. Adverse impacts on the reserves from the Project are therefore not anticipated. However, despite the lack of contiguous habitat connectivity, the Project would contribute positively towards the-stated management directions for Goorooyaroo Nature Reserve Vegetation, provided as strategic landscape screening around the perimeter of the Project area (avoiding areas of GSM habitat) would provide a stepping-stone for the movement of more mobile fauna through the broader landscape, particularly for birds.</p>

Submission	Response
	This would represent a substantial ecological improvement by providing additional vegetation within an area otherwise extensively cleared of all but isolated paddock trees, and in some cases, still subject to continuing clearing of native vegetation for agricultural purposes. A more detailed assessment positively contributes to the habitat connectivity outcomes of the Greater Gooroyaroo project is provided in section 7.2.
If approved, the proposed 2.2 metre high security fence is to be located inside the 20 metre wide landscape strip rather than on the boundary to Tallagandra Lane and Tintinhull Road	Acknowledged.
If approved, the Project is to be commenced within 5 years of a Consent being issued and completed within 5 years of commencement.	Acknowledged. The proponent will comply with DPIE/EP&A Act with regards to the commencement of the Project.
If approved, any landscaping plan is to incorporate species which are endemic to the local area.	Acknowledged.
Please note that the previous reference to offsetting the cost of any realignment of Tintinhull Road against the community enhancement fund is no longer relevant as this has been dealt with separately.	Acknowledged.

6.0 Changes to the proposed development

As outlined in Chapter 3.0 of the EIS (Project description), the project description and associated assessment presented in the EIS is based on an indicative initial design. The initial design is subject to refinement as the Project is further evaluated and consultation feedback is received. As such, subsequent to the EIS being exhibited, the proponent is proposing a number of design refinements to the Project to manage potential impacts. The Amendment Report, prepared in tandem to this RtS, outlines these changes, provides an assessment of their impact and proposed further mitigation measures, as required. The Amendment Report has been prepared in accordance with the EP&A Act and describes design refinements that:

- Address issues raised during ongoing community and stakeholder consultation for the Project, including:
 - Design inputs and requirements provided by TransGrid
 - Responding to community feedback regarding visual impacts to users of Tallagandra Lane and to nearby residents
- Aim to further reduce environmental and community impacts whilst maintaining the Project's overall viability
- Address potential design and construction requirements.

A summary of the proposed design changes and the findings of the Amendment report (attached in Appendix G) is provided in the following sections.

New residential receptor

It should be noted that several of the changes below have been implemented as a result of the presence of a new receptor. This receptor, a residential property, has been subdivided and constructed since the lodgement and public exhibition of the EIS for this Project. Despite this, the Proponent has made efforts as outlined below to change elements of the Project to manage amenity impacts. A summary outline of the amenity impacts to this receptor is provided below:

Table 6.1 Assessment of amenity impacts to new receptor

Factor	Potential impact
Visual amenity	Rated as high in the Landscape and Visual Impact Assessment (LVIA) Addendum. Note that the development has been reduced away from this receptor and the extent of screening vegetation has been extended to mitigate views of the solar farm.
Noise	The new receptor would be subject to elevated noise levels during construction. This would however be limited to period when construction was in close proximity to this location. Operational noise at the façade for this receptor is likely to be slightly above the criterion but still well below normal daytime background levels.
Air quality	This receptor is likely to be subject to elevated dust emissions during the construction phase. This would be temporary and managed as far as practical through the construction process. There would be no change to air quality during operation.
Traffic	This property is accessed via Tintinhull Road. During construction there would be a slightly elevated level of traffic on this road, though private property access would be maintained at all times. Operational traffic impacts are expected to be negligible.

Whilst this receptor would be subject to a slightly moderate degree of impact during construction due to their proximity, operational impacts are expected to be low overall. Visual impacts would be expected to decline over time as screening vegetation matures, to the point that the solar farm is likely to be fully blocked from view eventually.

6.1 Removal of one development area

Chapter 3.0 of the EIS (Project description) describes the location and extent of the solar panels as follows:

- The project would involve the installation of approximately 350,000 individual photovoltaic (PV) solar modules, arranged on tracking structures referred to as trackers or tracker tables
- The modules would extend up to 4 m above the natural ground level, depending on the tracking system manufacturer used
- Solar modules and trackers would be arranged into six power blocks of between 5.0 and 5.5 MVA, each with a centralised power conversion station, resulting in approximately 22 power conversion stations (PCS) throughout the extent of the Project.
- Each PCS would be a containerised design, mounted on a concrete pad or piles, and would incorporate two inverters and a single transformer
- The power conversion stations have an indicative height of 3.5 m, and would have a total elevation of no more than 4 m above the natural ground level (including foundations)
- Each PCS would also contain the tracker controller units, Supervisory control and data acquisition (SCADA) system along with other automation and monitoring components
- All PCS would be interlinked via a buried 33 kV circuit for reticulation to the solar farm substation and switchyard.

Based on the feedback received from key stakeholders and ongoing design refinement, an opportunity has been identified to further reduce the potential environmental and community impact of the Project. In this case one of the development areas to the south of Tallagandra lane is proposed to be removed from the project design (refer to Figure 1 of the LVIA addendum attached in Appendix B). This development area is approximately 2400m² in area. The removal of this development area would also result in the removal of the following from the Project:

- One PCS associated with this area (including concrete pad or piles, as well as the inverters and transformers themselves) would no longer be constructed
- A reduction in the extent of the security fencing and landscaping that would be located around this part of the Site
- Removal of the previously proposed buried 33 kV circuit to connect this area to the substation and switchyard
- Reconfiguration of the previously proposed internal access track that providing access to this area (discussed in more detail in Section 6.4).

The Amendment Report concludes that the removal of this development area to the south of Tallagandra Lane would result in a minor reduction in the potential impacts to the environment and community that were assessed in the EIS. The environmental management and mitigation measures identified in Chapter 20.0 of the EIS and in Chapter 8.0 of this report remain relevant to the remaining development. As such, no changes to the management measures are proposed as part of this design amendment.

6.2 Adjustment of northern development area

Since the public exhibition of the Project, a new private residence has been developed on land located immediately north of the Site boundary. As this is a new dwelling that was constructed following the public exhibition of the EIS, the potential for visual impacts from the Project was not assessed for this receptor as part of the original Landscape and Visual Assessment (LVIA). As such, the proponent has addressed the impact to this receptor within the LVIA addendum report which supports the RtS.

The results of the LVIA addendum concluded that due to the proximity of the new residence to the northern boundary of the Project, potential visual impacts to this receptor would be considered significant (high).

The proponent is committed to avoiding and minimising environmental impacts from the Project as far as practicable during the design process. As such, the proponent has investigated potential design solutions to minimise the extent to which the new receptor would be impacted by the Project. To this end, design changes have been implemented to directly address visual impacts to this receptor whilst maintaining the Project's environmental commitments to preserving GSM habitat and maintaining the Project's viability. Specifically, these changes include:

- A reduction in the extent of the developable area adjacent to this receptor, drawing back the development footprint approximately 20 m to the south
- An extension to the proposed screening vegetation to the east, passing to the south of the existing golden sun moth habitat area along this northern boundary of the Site. This screening vegetation would be 10 metres in width and would extend approximately 300 metres further to the east beyond its previously proposed extent

As discussed in the Amendment Report, the installation of screening vegetation for the project was assessed in the EIS. The extension of the screening vegetation in this location would not encroach on any mapped GSM habitat. On this basis, impacts to biodiversity as a result of the construction and operation of the project would remain consistent with the EIS. Therefore, no additional assessment is required and no changes to the environmental management and mitigation measures identified in Chapter 20.0 of the EIS would be required.

The results of the LVIA addendum (attached in Appendix B) determined that should no design amendments be considered or implemented to avoid impacts; the project would result in a significant (high) visual impact to this receptor.

The provision of screening vegetation for the new residence would substantially reduce the visual impact of the project to this receptor. With the implementation of this additional screening vegetation, the potential visual impact to this receiver would be drop a moderate visual impact. The environmental management and mitigation measures identified in Chapter 20.0 of the EIS and in Chapter 3.0 of this report remain relevant and no new or revised environmental management and mitigation measures are required as a result of this change.

The construction and operation of the solar panels in this part of the Site was assessed in the EIS. The reconfiguration of this part of the development area would represent a minor design revision to the EIS. As such, it is considered that this minor adjustment would be inconsequential in terms of the potential to result in any environmental impacts that would be greater than, or different to those assessed in the EIS. Therefore, no additional assessment is required.

The environmental management and mitigation measures identified in Chapter 20.0 of the EIS remain relevant to this revised design. As such, no changes to the environmental management and mitigation measures are proposed as part of this design amendment.

6.3 Springdale Solar Farm substation

Chapter 3.0 (Project description) of the EIS describes the location and size of the Springdale Solar Farm substation as follows:

- In order to create a new lot for the proposed substation, Lot 209 DP754908 would be subdivided to create three new lots
- The substation would be constructed in association with the electrical switchyard
- The electrical switchyard and substation would contain the connection assets to enable the solar farm to connect to and export 100 Megawatt alternating current (MWac) into the National Electricity Market (NEM)
- The connection assets include the 132/33 kV transformer, 132 kV switchbays, 33 kV switchgear and associated infrastructure to facilitate the safe and reliable operation of the network, in line with the Project generator performance obligations
- The transformer would be the largest single piece of plant on the Site and is likely to be an oil filled unit surrounded by appropriate aggregate bunding to contain the oil in the unlikely event of a leak

- The switchyard and substation would comply with TransGrid requirements, with an indicative combined footprint of 50 x 90 m. The design would include all facilities as required for the safe and reasonable operation by TransGrid or solar farm employees such as a control room, workspaces and toilet(s)
- The substation would also include the provision of an associated APZ.

Based on the feedback received from key stakeholders and ongoing design refinement, an opportunity has been identified to further reduce the potential environmental and community impact of the Project. In this case the location and size of the Springdale Solar Farm substation has been revised as follows:

- The APZ associated with the substation would be increased
- The substation would be slightly reorientated to avoid GSM habitat encroaching on the APZ.

The size and location of the electrical switchyard would not change, nor would the connection assets located within the electrical switchyard and substation. The provision of facilities for workers, including a control room, workspaces and toilet(s) would also remain the same. As the substation would be constructed within the switchyard, the combined footprint would remain approximately 50 x 90 m, with the facility remaining within the same location. Lot 209 DP754908 would still be subdivided to create three new lots to facilitate the substation.

The assessment provided in the Amendment Report has concluded that minor adjustments to the location and size of the substation as described above would be inconsequential in terms of the potential for the change to result in any environmental impacts that would be greater than, or different to those assessed in the EIS. This is particularly the case given that the combined footprint of the electrical switchyard and substation would remain unchanged in terms of both size and relative location. On this basis, it has been determined that the environmental management and mitigation measures identified in Chapter 20.0 of the EIS remain relevant and no changes to these measures are proposed as part of this design amendment.

6.4 Internal access tracks

Chapter 3.0 of the EIS outlines that five internal all-weather access tracks between development area, solar arrays, and public roads, would be established for the construction and operation of the Project. As described in the EIS, internal access tracks that are not required as part of the operational phase of the Project would be removed, and the ground made good following construction.

Based on ongoing design refinement and opportunities to further minimise potential environmental impacts, the design of the access tracks that would be constructed on the Site have been revised as follows:

- One access tracks to the south of Tallagandra Lane would be reconfigured
- A second operational east-west internal access road is proposed in the centre of the Site.

As discussed in detail in the Amendment Report, the reconfiguration of one internal access track to the south of Tallagandra Lane would have a minor potential to reduce impacts to the environment and community that were assessed in the EIS. The addition of the internal access track in the centre of the Site would not increase the magnitude of the potential impacts of the construction and operation of as described in the EIS. On this basis the environmental management and mitigation measures identified in Chapter 20.0 of the EIS remain relevant and no changes to these measures are proposed as part of this design amendment.

6.5 Extension of operational period

The EIS for the Project describes that the operational lifetime of the solar farm would be approximately 30 years. The proponent proposes to adjust the operational lifetime of the solar farm to 35 years.

As discussed in detail in the Amendment Report, the EIS considers the full scale of impacts associated with the operation of the Project. These operational impacts are considered in a sense that is not limited by time. That is, these impacts are considered, and mitigated, on an ongoing basis without requiring that they cease at a certain point to avoid the impact crossing any environmental or

community threshold. As such, the extension of the life of the Project by an additional five years would not result in any greater intensity of impact, only the extension in the duration of these impact - which would already be within the bounds of environmental and community acceptability.

The project would still be decommissioned in accordance with the detail provided in the EIS. This would remove all above-ground infrastructure and rehabilitate the Site to a suitable condition. This would leave the Site in a condition near to its current state, which would be suitable for future agricultural activities such as grazing.

On this basis of the above, no additional assessment of impacts is required in addition to that presented in the EIS. As such, no changes to the management measures outlined in Chapter 20.0 of the EIS are proposed.

7.0 Additional assessment

DPIE has requested that the proponent provide the following additional information in this RtS report:

- A consolidated, high resolution constraints map of the Site;
- Information on how the Project positively contributes to the habitat connectivity outcomes of the Greater Gooroyaroo project
- An updated visual assessment of all affected dwellings within 2 km of the Site;
- A quantitative risk assessment to demonstrate that the Project complies with the DPIEs risk criteria for land use planning. Evidence of consultation with APA Group regarding the high pressure gas transmission pipeline was also requested; and
- A Land Use Compatibility Risk Assessment (LUCRA) with regard to the Yass Valley Settlement Strategy and relevant zoning controls.

This additional information is summarised below and provided in various appendices to this report, as indicated.

7.1 Constraints mapping

Figure 7.1 shows the amendments made to the Project and constraints at the Site. Figure 7.2 shows the constraints at the Site. The figures include the following:

- Site access points
- The Site boundary
- Development footprint
- Indicative project layout including substation location
- Key environmental constraints
- Nearby residences, differentiating between associated and non-associated
- Asset protection zone
- Proposed vegetation screening
- Creek and waterways

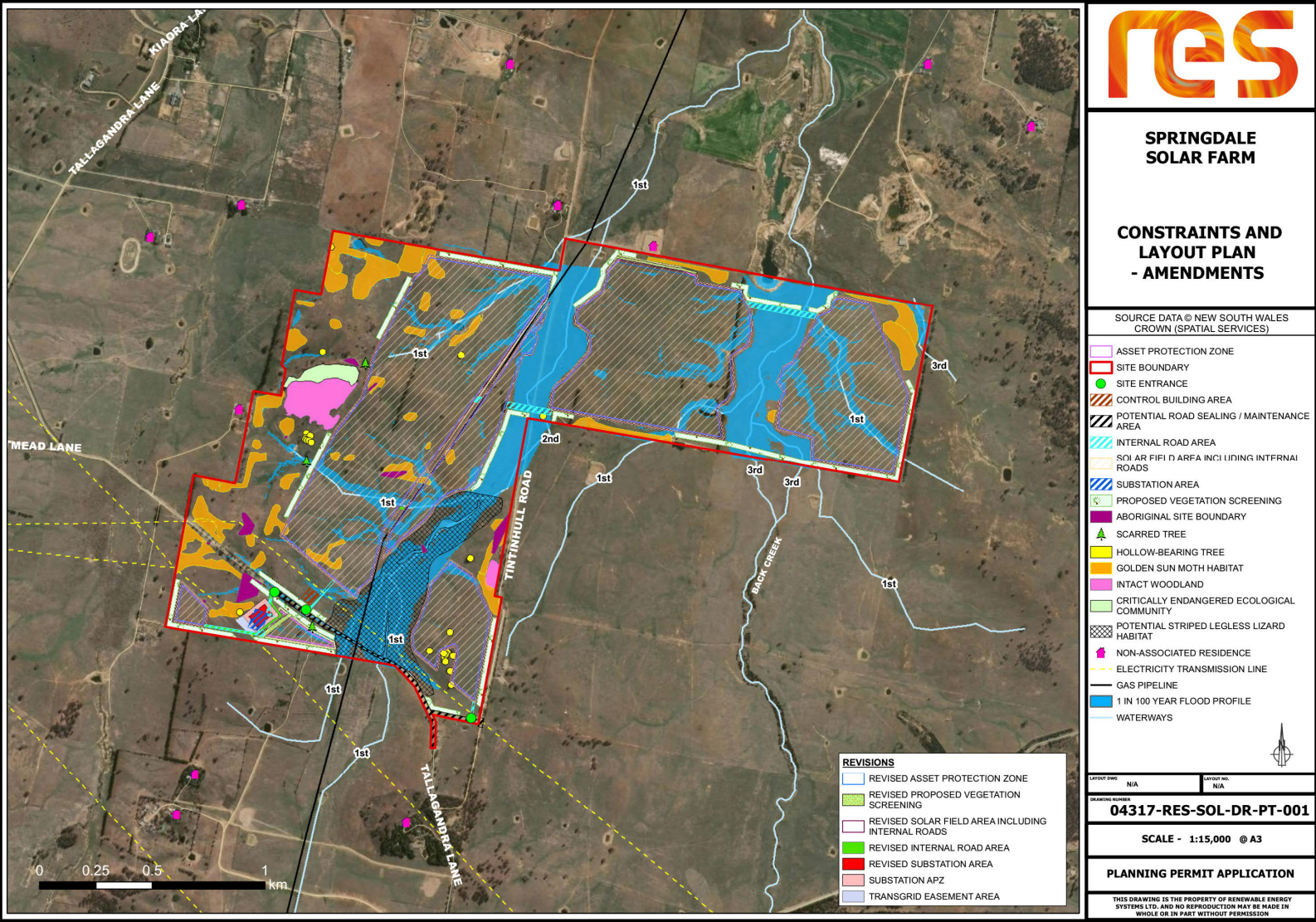


Figure 7.1 Constraints map – Amendments

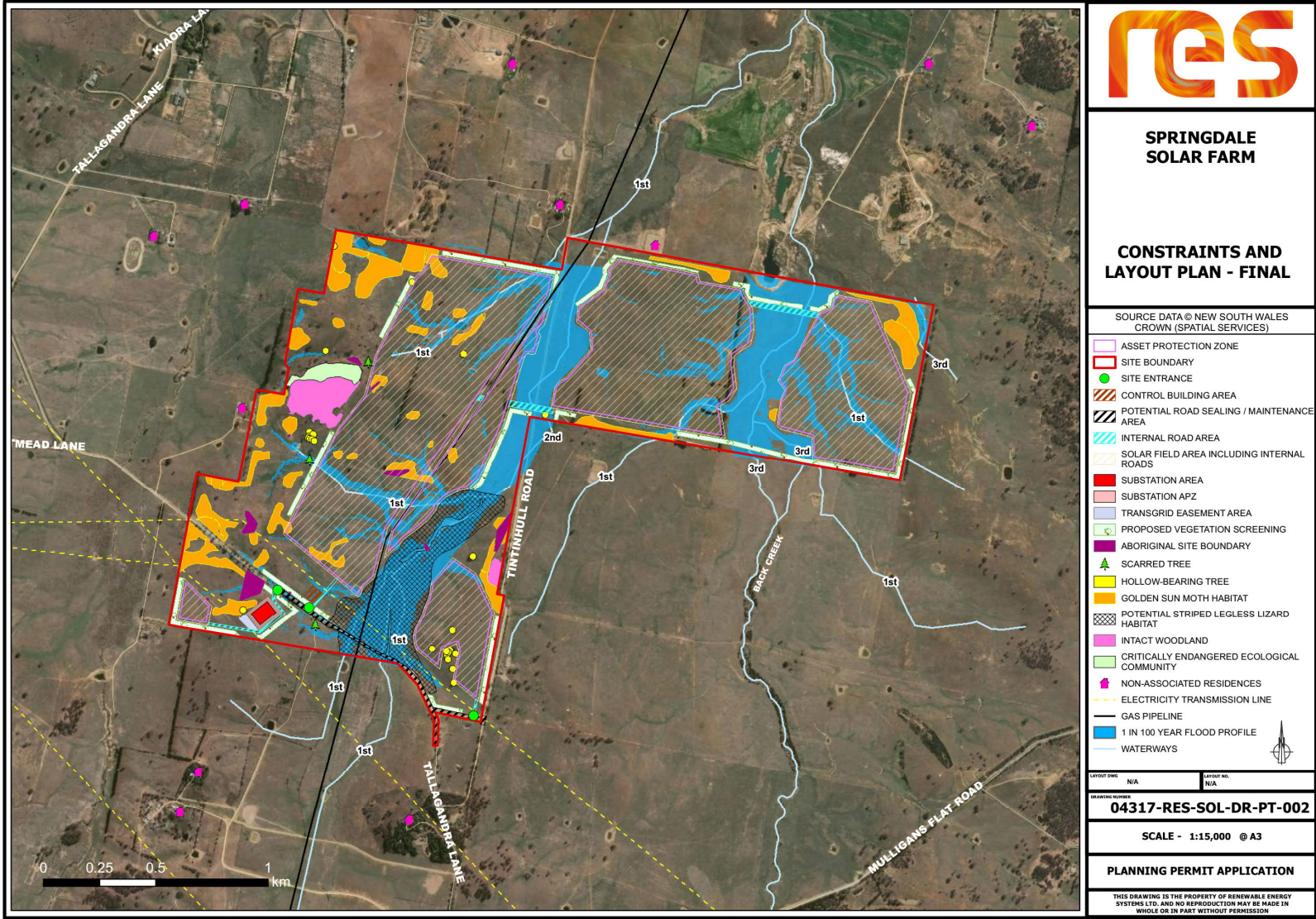


Figure 7.2 Final constraints map

7.2 Project contribution to the Greater Goorooyarroo project

The Goorooyarroo Nature Reserve Plan of Management (GNR PoM) provides the following in regard to isolation and fragmentation:

Much of the area surrounding Goorooyarroo Nature Reserve has been extensively cleared, which has resulted in a high loss of biodiversity and fragmentation of habitat in the region. Long term conservation of biodiversity depends upon the protection, enhancement and connection of remaining habitat across the landscape, incorporating vegetation remnants on both public and private lands. Nearby vegetated areas contribute to the habitat values of the reserve and provide ecological corridors to other vegetated areas. Maintaining the integrity of the remaining habitat within the reserve and, where possible, linking this to adjacent areas of vegetation to facilitate wildlife corridors is important in ensuring long term viability of the reserve's biological values. The reserve assists in maintaining and improving the Gungahlin Woodland Complex and the Box-Gum Woodlands of the region. The northern portion adjoins the ACT Goorooyarroo and Mulligans Flat Nature Reserves and increases the protected connectivity of the reserves.

In terms of specific outcomes, the GNR PoM includes as a specific management direction:

- *Maintaining and improving the connectivity of the Gungahlin woodland complex and Box-Gum Woodland in the region*

The northern-most extent of the Goorooyarroo Nature Reserve is approximately 5 km to the south of the southern-most edge of the Project area. The intervening lands have been virtually clear-felled for historic agriculture and large-block residential development, and remain subject to these land use regimes today. These land uses act to severely impede direct habitat connectivity between Goorooyarroo Nature Reserve and the Project area for all but the most mobile of species. It is noted however that there is an area of scattered woodland approximately 1.2 km to the southwest of the Project area which, despite not being in public ownership, still provides some degree of connectivity to both Goorooyarroo and Mulligans Flat Nature Reserves.

Despite the lack of contiguous habitat connectivity, the Project would contribute positively towards the above-stated management directions for Goorooyarroo Nature Reserve. This vegetation, provided as strategic landscape screening around the perimeter of the Project area to avoid areas of GSM habitat, would provide a stepping-stone for the movement of more mobile fauna through the broader landscape, particularly for birds. This would represent a substantial ecological improvement by providing additional vegetation within an area otherwise extensively cleared of all but isolated paddock trees, and in some cases, still subject to continuing clearing of native vegetation for agricultural purposes.

7.3 Landscape and Visual Impact Assessment

An LVIA addendum report has been prepared to support this RtS and is attached in Appendix B. While similar to the methodology undertaken the original LVIA produced for the EIS, the LVIA addendum also considers the following:

- The proposed design changes described in Section 6.0
- One new residential receptor is included in the assessment due to its proximity to the Project. This is a new dwelling that was recently constructed and not assessed as part of the original LVIA
- A larger receiving environment has been assessed in response to comments provided by DPIE (as shown on Figure 2 of the LVIA addendum report in Appendix B).

The findings of the LVIA addendum are largely consistent with the results of the original LVIA. An assessment of the additional photomontages that were provided for selected receivers found that the visual impacts of the Project to the residences are generally consistent with those identified and assessed as part of the original LVIA. The visual impacts to the new residential receptor (V16) at the new dwelling that was recently constructed after the public display of the EIS were found to be high, due to the close proximity of their residence to the Project.

Given these findings, the outcomes and recommendations of the assessment undertaken in the LVIA are still relevant and applicable.

In order to reduce impacts to the new residential receptor, the proponent has proposed a design change whereby one development area footprint of solar arrays would be shifted south, away from residential receptor V16 to allow for the extension of screening vegetation behind this receiver, while also avoiding the encroachment of screening vegetation into mapped GSM habitat. Further detail regarding this design change is provided in Section 6.0 and in the Amendment Report for the Project.

7.4 Risk criteria for land use planning assessment and consultation with APA Group

A Quantitative Risk Assessment (QRA) has been prepared and is appended to the RtS in Appendix E. This report addresses the request from DPIE to undertake a QRA in order to sufficiently demonstrate that the proposal will comply with the Department's Hazardous Industry Planning Advisory Paper (HIPAP) No. 4 Risk Criteria for Land Use Safety Planning and HIPAP No. 10 Land Use Safety Planning with regards to the Dalton to Canberra Pipeline traversing the Springdale Solar Farm Site.

The QRA utilised the information presented in the PHA conducted for the Young to Bomen Looping Pipeline, a pipeline approximately 125 km to the West of the Dalton to Canberra Pipeline. The PHA conducted in 2009 for the Looping Pipeline presented the relevant individual fatality, injury and property damage and accident propagation risk transects.

There is an APA Mainline Valve site adjacent to Tallagandra Lane, south of the Springdale Solar Farm solar panel Site boundary. Additional QRA modelling was conducted on the Mainline Valve to assess the cumulative risk from the buried pipeline and associated surface equipment.

By using the risk results of the Young to Bomen Looping Pipeline in conjunction with an analysis of the risk from the Mainline Valve to assess the cumulative risk for the Dalton to Canberra Pipeline, it was determined that all HIPAP No. 4 risk criteria are met for the control building and substation areas. This includes the cumulative risk for the individual fatality risk, injury risk and the property damage and accident propagation risk.

7.5 Land Use Compatibility Risk Assessment (LUCRA)

A LUCRA has been prepared for the Project (attached in Appendix C) with reference to *Living and Working in Rural Areas – A handbook for managing land use conflict issues on the NSW North Coast* (Learmonth et al. 2007) ('the Handbook'), as well the *Land Use Conflict Risk Assessment Guide* (NSW Department of Primary Industries, 2011) ('the Guide'). The purpose of the LUCRA is to assess the potential for land use conflict to occur between neighbouring land uses. More specifically, the LUCRA has aimed to:

- Accurately identify and address potential land use conflict issues and risk of occurrence before a new land use proceeds or a dispute arises
- Objectively assess the effect of a proposed land use on neighbouring land uses
- Increase the understanding of potential land use conflict to inform and complement development control and buffer requirements, and
- Highlight or recommend strategies to help minimise the potential for land use conflicts to occur and contribute to the negotiation, proposal, implementation and evaluation of separation strategies.

The LUCRA has assessed the compatibility of the Project with the historic and existing land uses of the Site and surrounds, as well as with the following key strategic and planning documents:

- *Yass Valley Settlement Strategy 2036*
- *The Tablelands Regional Community Strategic Plan 2016 – 2036*
- *Southern Tablelands Regional Economic Development Strategy 2018 – 2022*
- *Yass Valley Council Local Environment Plan 2013*

The LUCRA has established that while several potential sources of land use conflict were identified, it was found that the construction and operation of the Project would generally allow nearby existing land-uses to continue largely unaffected. The potential for land use conflict is therefore considered to be manageable.

It was concluded that with the application of relevant mitigation measures, each of the potential sources of landuse conflict identified in the LUCRA would be low, with the exception of visual amenity impacts. In this case the initial high-end potential conflict has been reduced to a low-middle conflict with the application of relevant mitigations. This is based on the fact that the solar farm would remain visible for some receptors despite screening vegetation proposed around the perimeter. This potential conflict is however expected to ease over time as screening vegetation matures and people become accustomed to the development.

8.0 Mitigation measures

Table 59 of the EIS presents a summary of mitigation measures proposed to be implemented during construction, operation and decommissioning to minimise any potential adverse impacts arising from the Project on the surrounding environment and community.

Table 8.1 presents an updated list of mitigation measures that take into account new or refined commitments made by the proponent as part of responses to the submissions and changes to the proposal, subject to any amendments made by the conditions of the development consent, should the Project be approved. Additional and/or modified environmental safeguards and management measures to those presented in the EIS have been underlined and deleted measures, or parts of measures, have been struck out.

Table 8.1 Updated mitigation measures

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	Biodiversity			
B1	Implementation of a Biodiversity Management Plan to include the following mitigation measures.	✓	✓	
B2	Establishment of fenced buffer areas (nominally 50 m) around retained GSM habitat, with fencing maintained throughout the construction phase of the Project.	✓		
B3	Establishment of fenced buffer areas (nominally a 50m buffer) around GSM habitat located within the development envelope until the area is required for solar array construction.	✓		
B4	Establishment of a GSM habitat conservation zone measuring no less than 60 hectares throughout the western portion of the Site	✓	✓	
B5	Implementation of a GSM Management Plan to maintain preferred conditions for the species. This plan would cover the whole Site but would have particular reference to the GSM conservation area and three western solar field areas (including the two solar fields containing GSM habitat).	✓	✓	
B6	All Site fencing should be specified allow passage of adult GSM throughout the Site.		✓	

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
B7	Discontinuation of pasture improvement practices throughout the Site including within the GSM habitat conservation zone.	✓	✓	
B8	Cease superphosphate application and sowing of pasture species in GSM conservation zone and in the development envelope	✓	✓	
B9	Stocking rates should be reduced within the Site after completion of construction.		✓	
B10	Maintain tussock level between 3 and 15 cm with regulated grazing, with short height achieved by October before the GSM flying period, and lighter grazing from November to January if season is dry.	✓	✓	
B11	Implementation of pest and weed prevention and management measures within the Site including the continued control of broad-leaved weeds in GSM conservation zone and in the development envelope.	✓	✓	
B12	Avoid creating unnecessary shading or barriers to GSM movement with landscaping or structures.	✓	✓	
B13	All landscaping should be sited so as to avoid or minimise shading of mapped GSM habitat.	✓	✓	
B14	Establishment of a woodland enhancement zone for woodland areas in the west of the Site	✓	✓	
B15	Pre-clearing inspections of hollow bearing trees to be removed to ensure the absence of roosting/breeding threatened species. Any native vertebrate fauna present within hollow trees should be managed to minimise the risk of mortality or injury. Undertake tree clearing in accordance according to best practise principles.	✓	✓	
B16	Installation of nest boxes within preferred breeding trees for Superb Parrots within the Site where trees do not already contain hollows. The number of nest boxes should be at least twice that of the existing number of hollows appropriate for Superb Parrot breeding that are to be removed by the project as determined via a final survey of hollow trees prior to clearing. A nest box management plan is to be included within the BMP. The BMP will include actions to protect Superb Parrot in the long term, such as excluding grazing to promote tree regeneration.		✓	✓
B17	<u>The potential Striped Legless Lizard habitat will be managed for retention and protection in the long-term. The BMP will detail the protection of the retained area from construction and maintenance activities and weed management required.</u>		✓	✓
B18	Landscape planting should preference endemic tree and shrub species to compensate for loss of foraging habitat due to the removal of trees.		✓	
B19	Vehicles should remain on designated roads and tracks whenever practicable. Signposting and driver education during the induction process and in ongoing project discussions should be implemented.	✓	✓	

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
B20	Establishment and regular maintenance of erosion and sediment controls during construction and until excavated areas are vegetated.	✓	✓	
B21	Appropriate on-site management and removal of all rubbish from the Site.	✓	✓	
	Aboriginal heritage			
AH1	Further avoid and/or minimise impacts to identified Aboriginal heritage sites at the detailed design stage as best practicable.	✓		
AH2	<p>Preparation of a detailed Aboriginal Cultural Heritage Management Plan (ACHMP) for the Project in consultation with RAPs and to the satisfaction of OEH and DP&I. The ACHMP shall include a strategy for the management of known and potential Aboriginal heritage resource as well as identified cultural values.</p> <p>The ACHMP should contain procedures for consultation and involvement of RAPs in the management of Aboriginal cultural heritage values within the Site. In addition, the ACHMP would include details of proposed mitigation and management strategies of all Aboriginal sites, procedures for the identification and management of previously unrecorded sites, details of an appropriate long term management for any Aboriginal objects salvaged, details of an Aboriginal cultural heritage awareness program for all contractors and personnel associated with construction activities and compliance procedures.</p> <p>The key elements of the ACHMP are:</p> <ul style="list-style-type: none"> • Archaeological salvage programme • Conservation of non-impacted sites • Aboriginal cultural heritage awareness training • Management of any previously unrecorded archaeological evidence identified during operation • Management of potential human remains in the event of discovery during the life of the Project • AHIMS site cards • Aboriginal site database <p>The above elements are detailed further in the following mitigation and management measures.</p>	✓		
AH3	<p>Undertake a comprehensive archaeological salvage programme prior to ground disturbance which incorporates:</p> <ul style="list-style-type: none"> • Surface collection of the three impacted open artefact sites (i.e., SSF-IA1-17, SSF-AS2-17, and SSF-AS4-17) of low scientific significance. • A landscape-based program of archaeological excavation across selected areas of low and high Aboriginal archaeological sensitivity within the Site, as determined through consultation with RAPs. 	✓		

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	<p>All archaeological salvage works should be undertaken by a combined field team of archaeologists and RAP field representatives. Post-salvage work for the surface collection and excavation components of the archaeological salvage program should, at minimum, include:</p> <ul style="list-style-type: none"> • The analysis and cataloguing of all recovered Aboriginal objects (e.g., stone artefacts, hearth stones) by a suitably qualified person or persons • The submission, where deemed appropriate by a qualified archaeologist and/or geomorphologist, of excavated charcoal samples for conventional or Accelerator Mass Spectrometry (AMS) radiocarbon dating • The submission, where deemed appropriate by a qualified geomorphologist, of excavated sediment samples for Optically Stimulated Luminescence (OSL) dating • The submission, where deemed appropriate by a qualified archaeologist, of a selection of stone artefacts for functional use-wear/residue analysis; and • The submission, where deemed appropriate by a qualified archaeologist, of a selection of non-artefactual rock samples to a qualified geologist for the purposes of raw material identification. <p>The ACHMP for the Project should include a detailed research design for the surface collection and excavation components of the salvage program.</p> <p>All Aboriginal objects salvaged as part of the archaeological salvage program should be curated in an appropriate manner, as determined through consultation with RAPs, OEH and DP&I during preparation of the ACHMP. Temporary off-site storage of salvaged objects should be allowed for the purposes of analysis and recording.</p> <p>Aboriginal Site Impact Recording (ASIR) forms for all salvaged sites should be submitted to OEH at the completion of the salvage program.</p>			
AH4	<p>All Aboriginal sites not impacted by the Project but within the Site should be conserved <i>in-situ</i> (i.e.: SSF-IA2-17, SSF-IA3-17, SSF-IA4-17, SSF-AS1-17, SSF-AS3-17, SSF-AS5-17, SSF-AS6-17, SSF-AS7-17, SF-AS8-18, SSF-ST1-17, SSF-ST2-17, SSF-ST3-17).</p> <p>Potential scarred tree sites should be protected via permanent stock-proof fencing and appropriate associated signage. Site fencing is to be erected after consultation with a qualified archaeologist and RAP representatives. All relevant staff and contractors are to be made aware of the nature and locations of all sites as well as Renew Estate's legal obligations with respect to them. Protected sites would need to be identified on all relevant site plans. Details for the care of protected sites should be incorporated into the ACHMP.</p>	✓		
AH5	<p>An Aboriginal cultural heritage awareness training package should be developed in consultation with RAPs for use throughout the life of the</p>	✓	✓	✓

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	<p>Project, and completed prior to the commencement any ground disturbance works. The training programme shall cover:</p> <ul style="list-style-type: none"> • Maintaining a register of all persons who completed the training throughout the life of the Project. • Training should be mandatory for all staff and contractors whose roles may reasonably bring them into contact with Aboriginal sites and/or involve consultation with local Aboriginal community members. Training should also be offered on a voluntary basis to all other staff and contractors. <p>All standard site inductions should include an Aboriginal cultural heritage component. At a minimum, this should outline current protocols and responsibilities with respect to the management of Aboriginal cultural heritage within the Site, provide an overview of the diagnostic features of potential Aboriginal site types (e.g., scarred trees) and procedures for reporting the identification of Aboriginal archaeological sites.</p>			
AH6	<p>Provisions regarding the appropriate management action(s) for previously unrecorded Aboriginal archaeological evidence identified within the Site throughout the operational life of the Project should be incorporated into the ACHMP. Management action(s) should vary according to the type of evidence identified, its significance (both scientific and cultural) and the nature of potential impacts.</p>	✓	✓	✓
AH7	<p>In the event that potential human skeletal remains are identified within the Site at any point during the life of the Project, the following standard procedure (New South Wales Police Force 2015; NSW Health 2008) should be followed.</p> <ul style="list-style-type: none"> • All work in the vicinity of the remains should cease immediately; • The location should be cordoned off and the NSW Police notified. • If the Police suspect the remains are Aboriginal, they would contact the OEH and arrange for a forensic anthropologist or archaeological expert to examine the Site. <p>Subsequent management actions would be dependent on the findings of the inspection undertaken under Point 3.</p> <ul style="list-style-type: none"> • If the remains are identified as modern and human, the area would become a crime scene under the jurisdiction of the NSW Police; • If the remains are identified as pre-contact or historic Aboriginal, OEH and all RAPs are to be formally notified in writing. Where impacts to exposed Aboriginal skeletal remains cannot be avoided an appropriate management mitigation strategy would be developed in consultation with OEH and RAPs; • If the remains are identified as historic non-Aboriginal, the Site is to be secured and the NSW Heritage Division contacted; and 	✓	✓	✓

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	<ul style="list-style-type: none"> If the remains are identified as non-human, work can recommence immediately. 			
AH8	<p>AHIMS sites cards shall be completed and submitted to OEH:</p> <ul style="list-style-type: none"> for all newly recorded sites within the Site at the completion of the assessment. in the event that a previously unidentified Aboriginal site is discovered within the Site at any point during the operational life of the Project, as promptly as possible. <p>in accordance to timing protocols the are included in the ACHMP.</p>	✓	✓	
AH9	<p>Establish a comprehensive Aboriginal site database for the Site upon commencement of the Project which would, at a minimum, contain the name, type, size (where applicable), MGA coordinates and status of all Aboriginal sites within and directly adjacent to the Site.</p> <p>The database should be regularly updated throughout the operational life of project. Printed site lists and maps should be made available to RAPs upon request.</p>	✓	✓	✓
AH10	Continued communication with the RAPs for the SSF project should be carried out. RAPs should be informed of any major changes the project design or extension, further investigations or finds.	✓	✓	
	Landscape and visual			
V1	<p>The following would be further considered as part of the detailed design of the Project:</p> <ul style="list-style-type: none"> refinement in the design and layout which may assist in the mitigation of bulk and height of proposed structures a review of materials and colour finishes for selected components in keeping with the surrounding landscape including the use of non-reflective finishes to structures. 	✓		
V2	Finalise the draft Landscape Plan (Appendix A of the LVIA) in consultation with the most affected visual receptors and other stakeholders, and implement this plan during construction.	✓		
V3	<p>The following would be implemented during construction as far as practicable:</p> <ul style="list-style-type: none"> minimise tree removal where possible retention of grass cover wherever possible avoidance of temporary light spill beyond the construction site where temporary lighting is required rehabilitation of disturbed areas protection of endemic vegetation within the Project where retained. 	✓		✓

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
V4	<p>The following would be implemented during operation as far as practicable:</p> <ul style="list-style-type: none"> ongoing maintenance and repair of constructed elements <p>long term maintenance of screen planting to maintain visual filtering and screening of external views where appropriate.</p>		✓	
	Water			
W1	<p>Prepare and Erosion and Sediment Control Plan (ESCP) in accordance with <i>Managing Urban Stormwater: Soils and Construction</i> (Landcom, 2004). This plan would be implemented in advance of site disturbance and be updated as required as work progresses. The ESCP would include, at minimum, the following provisions:</p> <ul style="list-style-type: none"> install erosion and sediment controls prior to and during construction regularly inspect and maintain erosion and sediment controls, particularly following large rainfall/wind events ensure vehicles, plant and equipment leave the Site in a clean condition to minimise mobilisation of sediment onto adjacent roads soil handling and stockpiling procedures identify exclusion zones to limit disturbance stabilise and rehabilitate disturbed areas as soon as practicable procedures for the testing, treatment and discharge of construction waste water to be established and implemented where appropriate. 	✓		✓
W2	<p>Prepare a CEMP that ensures:</p> <ul style="list-style-type: none"> All retained farm dams and associated drainage infrastructure to be maintained in a functional condition Incidental spills would be intercepted by active spill management practices Storage of hazardous materials such as oils, chemicals and refuelling activities would occur in bunded areas All works within waterfront land (as defined in the WM Act) to be undertaken in accordance with the Controlled Activities on Waterfront Land guidelines (DPI 2012). Procedures for the testing, treatment and discharge of construction waste water to be established and implemented where appropriate. Groundcover to be maintained where practicable and be re-established as soon as practicable on disturbed areas Installation of any permanent scour protection measures required for the operational phase as soon as practicable 	✓		

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	<ul style="list-style-type: none"> All construction staff to be engaged through toolbox talks or similar with appropriate training on water management practices All water required for site activities during construction and operation to be imported to site. Flood impacts would be managed by locating temporary site compounds, stockpiles and storage areas outside the 1% AEP flood extent where practicable. 			
W3	Prepare an O&M Plan for the operational phase that covers: <ul style="list-style-type: none"> Standard operating procedures for chemical storage and use, and emergency spill management Conducting toolbox talks or training on water management practices Groundcover to be maintained between and under all solar panel arrays 		✓	
W4	Potential operational flood impacts would be dealt with as part of the design including: <ul style="list-style-type: none"> The substation would be located outside the 1% AEP flood extent The control building would be set outside 1% AEP flood depths of >0.25m, which is the maximum depth beyond which is deemed by Renew Estate as an unacceptable risk Solar arrays would be set outside 1% AEP flood depths of >0.4m, which is the maximum depth beyond which is deemed by Renew Estate as an unacceptable risk to the asset Access roads required within the 1% AEP flood extent would be constructed close to existing ground levels where practicable 	✓		
Land				
L1	Preparation of a CEMP that incorporate the following measures: <ul style="list-style-type: none"> A site access protocol that lists relevant landholder's contact details and includes measures to minimise adverse impacts, such as driving carefully to minimise disturbance to surrounding livestock, crops and pastures and minimising dust generation. The timing of construction activities An unexpected finds protocol for the event that any contamination is discovered during construction works. The location of any temporary access roads to minimise the impacts to neighbouring agricultural activities and soils <u>Incorporation of pest and weed management measures in the Biodiversity Management Plan including measures for identification, management and ongoing monitoring of weeds on the Site. This would include the following:</u> 	✓		✓

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	<ul style="list-style-type: none"> - <u>To prevent the spread of weed seed, all weed material removed should be disposed of in a suitable waste facility and not mulched on site. This is to avoid the reintroduction and further spread of weeds in the area. Weed management should be undertaken in accordance the Biosecurity Act 2015</u> - <u>Machinery should be washed between sites following best practice hygiene protocols to prevent the spread of weed seed, pathogens and fungi. Hygiene protocols should be in accordance with the Biosecurity Act 2015</u> - <u>Vehicles and personnel would not enter neighbouring properties</u> • A spill response plan to be implemented during both construction and operation to reduce the potential for contamination. The plan shall include: <ul style="list-style-type: none"> - Management of any potential contaminants on-site - Mitigate and manage soil contamination by fuels, lubricants or other chemicals in accordance with EPA protocols - Prevent contaminants affecting waterways, dams and adjacent pasture. 			
L2	<p>Preparation of an Erosion and Sediment Control Plan (ESCP) in accordance with the <i>Managing Urban Stormwater: Soils & Construction</i> (Landcom 2004) (Blue Book) that include provisions to:</p> <ul style="list-style-type: none"> • Install erosion and sediment controls (if required) prior to and during construction • Regularly inspect erosion and sediment controls, particularly following large wind or rainfall events • Minimise tracking of sediment from vehicles, plant and equipment on to surrounding roads • During excavation, separate topsoils and subsoils to ensure they are replaced in their natural configuration. • Stockpile topsoil appropriately to minimise weed infestation and maintain soil organic matter, soil structure and microbial activity • Minimise the total area of disturbance from excavation and compaction • Further soil management measures to ensure the future viability of the Site for agricultural production, including guidance on: <ul style="list-style-type: none"> - Optimisation and recovery of useable subsoil and topsoil - Establishment of effective soil amelioration procedures - Separate storage of topsoil and subsoil to ensure that soil is replaced in the right order to avoid unnecessary impact on soil and the existing vegetation structure. 	✓		✓

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	<ul style="list-style-type: none"> - Where disturbance or stripping of soil is required, an ameliorant such as gypsum could be applied to manage soil sodicity and provide for effective rehabilitation outcomes. 			
L3	<p>Preparation and implementation of an OEMP to reduce the impact of the proposed project on:</p> <ul style="list-style-type: none"> • Land and soil capability within the Site • Neighbouring agricultural operations • Regional biosecurity (pest and weed management) • Erosion <p>The OEMP would cover:</p> <ul style="list-style-type: none"> • Sheep grazing as a means of vegetation maintenance and weed control throughout the life of the Project • Restricting vehicle movements to formed access tracks. • Retaining ground cover beneath the PV solar panels to manage erosion, weed infestation and surface water runoff. • Procedures for waste materials to be removed from the Site regularly and the Site kept in a clean and orderly condition in order to deter potential pest animals. • A targeted pest management program (as necessary). 		✓	
L4	Rehabilitation of the Site to its original condition as best practicable following decommissioning			✓

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	Noise and vibration			
NV1	<p>Prepare a Noise Management Plan that specifies:</p> <ul style="list-style-type: none"> • Appropriate plant and equipment should be selected for each task to minimise the noise contributions • Turn off plant that is not being used where practicable • Ensure plant is regularly maintained, and repair or replace equipment that becomes more noisy • Noisier activities to be scheduled during less noise sensitive periods • Use non-tonal reversing alarms where practicable • Wherever feasible, turning circles should be created at the end points of vehicle work legs, which should allow trucks to turn and avoid the need for reversing <p>Emphasis should be placed during driver training and site induction sessions on the potential adverse impact of reversing alarms and the need to minimise their use.</p>	✓		✓
NV2	Consider using bored piling for construction works where practicable	✓		
NV3	Incorporate barriers, attenuators, acoustic louvres and mufflers as best practicable.	✓		✓
NV4	Inverters to be selected with maximum sound power levels of less than 92 dB(A) with no tonal characteristics, if practicable. Inverters would be located as far as practicable from residential dwellings.	✓	✓	
NV5	Inverters identified as requiring noise mitigation in Appendix B of the Noise and Vibration Impact Assessment (Appendix G of this EIS) should utilise a 2 m high, three sided “horse-shoe” shaped noise walls. The noise walls should be orientated with the open side facing away from the nearest noise sensitive receivers.	✓	✓	
	Non-Aboriginal Heritage			
HH1	<p>In the event that unexpected historic finds are identified during construction, all works should immediately cease. The following procedure guides the management of unexpected and previously unidentified finds during the course of operations. Finds includes artefact scatters (glass, animal bone, ceramic, brick, metal, etc.), building foundations and earthworks of unknown origin. The procedures are:</p> <ul style="list-style-type: none"> • All work in the area is to cease immediately • Alert the Project Manager to the find • If necessary, protect the area with fencing • Engage a suitably qualified archaeologist to undertake an assessment of the find/s 	✓		

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	<ul style="list-style-type: none"> The assessment should be undertaken using the guidelines <i>Assessing Significance for Historical Archaeological Sites and 'Relics'</i> (NSW Heritage Branch, 2009) On the advice of the archaeologist, if necessary, prepare an Impact Assessment and Research design and methodology to submit to the Heritage Branch Undertake the archaeological mitigation in accordance with the prepared documents and the permit/exception issued by the Heritage Branch; and <p>Once the Site has been mitigated to the satisfaction of the archaeologist and the Heritage Branch, works may resume in the area.</p>			
HH2	<p>In the event of discovery of human remains the following procedure shall be implemented:</p> <ul style="list-style-type: none"> All work in the vicinity of the remains should cease immediately The location should be cordoned off and the NSW Police notified If the Police suspect the remains are Aboriginal, they would contact the Office of Environment and Heritage and arrange for a forensic anthropologist or archaeological expert to examine the Site and implement mitigation measure AH7. If the remains are identified as modern and human, the area would become a crime scene under the jurisdiction of the NSW Police If the remains are identified as historic non-Aboriginal, the Site is to be secured and the NSW Heritage Division contacted; and <p>If the remains are identified as non-human, work can recommence immediately.</p>	✓		

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	Traffic and transport			
T1	<p>Preparation of a Traffic Management Plan in consultation with the YVC, RMS-TfNSW and other authorities prior to construction that covers:</p> <ul style="list-style-type: none"> Programmes for monitoring road traffic conditions, to repair damage exacerbated by construction traffic The designated routes of construction traffic to the Site Carpooling. Shuttle bus arrangements to minimise vehicle numbers throughout construction and decommissioning Consideration for cumulative impacts with any nearby developments Scheduling delivery of major components where possible to minimise safety risks to other road users including avoiding major deliveries during school pick-up and drop-off times Temporary traffic controls such as signage, speed restrictions and traffic safety flagmen as necessary to ensure safety of all road users and the public. Procedure for monitoring traffic impacts and adapting controls to minimise impacts traffic risks. 	✓		✓
T2	Implementation of a communication and consultation strategy with stakeholders including RMS, emergency services, local stakeholders (landholders and business owners) regarding changes to roads uses during construction and decommissioning. RMS and YVC should also be consulted on the access route, particularly regarding the delivery of the transformer to the Site.	✓		✓
T3	Implementation of a complaints management system as part of the CEMP to ensure any community concerns regarding traffic are addressed effectively and promptly.	✓	✓	✓
	Bushfire			
BF1	A Bushfire Management Plan would be developed covering all phases of the development. This plan would outline relevant protocols, practices and other measures to minimise the risk of bushfire and to outline appropriate emergency actions should one occur.	✓	✓	✓
BF2	All electrical equipment would be designed in accordance to applicable ANZ engineering design standards, industry codes and best practice standards. Installation, operation and maintenance work shall be carried out by competent persons.	✓		
BF3	Buildings would be designed to comply with the national Construction Code (formerly the Building Code of Australia).	✓		
BF4	<p>Safety management processes/ system covering:</p> <ul style="list-style-type: none"> Induction training to all personnel and contractors on fire risk, do's and don't's, prevention and emergency response Safety hazards including bushfire and control measures 	✓	✓	✓

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	<ul style="list-style-type: none"> Preparation and implementation of job specific SWMS Emergency preparedness and response Policies and procedures to control hot works, prohibition of smoking on-site, fuel storage, use of flammable materials and use of machinery and vehicles. 			
BF5	Implement a Hot Work Permit system that would ensure: <ul style="list-style-type: none"> hot works are restricted to the maintenance workshop as best practicable stringent control of all hot works (cutting, grinding, welding, etc.), by prescribing pre-requisites and implementing specific control measures fire extinguishers would be made available during all hot works. effective implementation by all parties including contractors throughout the life of the Project. 	✓	✓	✓
BF6	Designating a site safety management representative on-site who would: <ul style="list-style-type: none"> be responsible for implementation of safety requirements, mitigation and management measures and emergency response procedures related to bushfires consult with the local RFS regarding bushfire management requirements be the point of contact onsite to assist RFS and emergency services if there is a fire on-site. 	✓	✓	✓
BF7	Effective communication to ensure fire incidents are communicated quickly including: <ul style="list-style-type: none"> use of mobile phones, with emergency communication contacts on a speed dial use of two way radio Fire Danger Warning signs located at the entrance to the Site Signs clearly showing locations of onsite SWMS and fire access tracks 	✓	✓	✓
BF8	Slashing of vegetation prior to construction activities and to maintain fuel loads.	✓	✓	
BF9	Grazing by sheep stocked at suitable levels so as to maintain a low level of vegetation whilst minimising erosion throughout the lifespan of the Project.	✓	✓	
BF10	The NSW RFS be provided with a contact for the SSF project, during construction and operation.	✓	✓	✓
BF11	Maintain access and egress roads to the Site free from being blocked by parked vehicles or other items so as to be readily accessible by	✓	✓	✓

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
	emergency services at all times and prevent entrapment of personnel in the event of a bushfire.			
BF12	Training for personnel covering fire prevention, using fire extinguishers and emergency response procedures/ drills.	✓	✓	✓
BF13	Seek 'mutual assistance' agreement with local property owners to use dams as water sources in the event of an emergency.	✓	✓	✓
BF14	Suitable and adequate emergency response equipment shall be provided and maintained on-site during the construction of the Project. This would include fire extinguishers and 20,000 litre static water supply that would be installed at the early part of the construction phase and maintained throughout the life of the Project. Equipment lists shall be detailed in the SWMS, Bushfire Management Plan and hot work permits.	✓	✓	✓
Electromagnetic fields				
E1	All electrical equipment would be designed in accordance to ANZ engineering design specification, industry codes and best practice standards. Installation, operation and maintenance work shall be carried out by competent persons.	✓		
E2	All relevant TransGrid and other procedures in relation to high voltage installation and operation would be adhered to throughout the life of the Project. Public access to the Site would be restricted throughout the life of the Project and all power stations, the substation and switchyard would be kept locked.	✓	✓	
Socio-economics				
S1	The project would aim to give preference to local workers and suppliers of construction materials and equipment where practicable.	✓	✓	

No	Mitigation and Management Measures	Construction	Operation	Decommissioning
S2	<p>Community consultation would be undertaken in accordance to the Community and Stakeholder Consultation Plan which shall include communication with local communities and stakeholders:</p> <ul style="list-style-type: none"> to provide updated information regarding the Project, including information regarding the Project's program and proposed construction activities, potential impacts to nearby sensitive receivers and potential changes to local traffic conditions provide information regarding employment and business opportunities; and as a channel to receive queries, complaints and grievances. 	✓	✓	✓
	Waste			
W1	A Waste Management Plan which identifies all waste streams and specifies management measures covering collection, handling, transportation, recycling and disposal would be incorporated in the CEMP. An environmental audit shall be carried out at the completion of the construction stage to verify all waste has been properly disposed prior to the final payment being released to the contractor(s).	✓		✓
W2	A waste management policy/ procedure/ plan shall be developed and implemented to ensure compliance to waste management legislative requirements, guidelines and best management practices throughout the operation and decommissioning phases. All waste shall be collected, properly stored and recycled or disposed at facilities licensed by the local council.		✓	
	Air Quality			
A1	<p>The CEMP and DEMP shall include procedures to minimise and mitigate dust generation. The measures shall include:</p> <ul style="list-style-type: none"> Use water trucks for dust suppression throughout the construction and decommissioning phases particularly in the vicinity of adjacent residential dwellings. All disturbed areas shall be re-vegetated as soon as practicable to minimise exposed areas Vehicle speed limits shall be controlled to minimise dust from vehicle movement 	✓		✓
A2	The CEMP and DEMP shall include procedures and best management practices to minimise emissions from vehicles and site machinery used at the Project site. This shall include carrying out inspections and maintenance of all vehicles, plant and equipment to ensure they are operating efficiently.	✓		✓

9.0 Conclusion and next steps

This report has considered the full range of community and stakeholder opinion regarding the Project. This includes substantial support of the Project, as well as a range of issues and concerns. In the case of objections, the Proponent has responded to these issues and, in some case, amended the Project so as to reduce or eliminate adverse impacts. These changes are outlined in both this report and the accompanying Amendment Report.

NSW DPIE will, on behalf of the NSW Minister for Planning and Public Spaces, review the EIS, this Response to Submissions Report and the Amendment Report for the project. Once DPIE has completed its assessment, an Environmental Assessment Report will be prepared.

The Environmental Assessment Report will be provided to the IPC, who will then approve the project (with any conditions considered appropriate) or refuse the project. A copy of the final response to Submissions Report and Amendment Report will be made publicly available on the DPIE Major Projects website.

The IPC's determination, including any conditions of consent and the Environmental Assessment Report, will be published on the DPIE Major Projects website following determination.

10.0 References

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