

West Wyalong Solar Farm

State Significant
Development Assessment
(SSD 9504)

November 2019

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Cover photo

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Lightsource Development Services Australia Pty Ltd (Lightsource BP) proposes to develop a new 90 megawatt (MW) solar farm with 50 MW/90 MW-hour (MWh) of battery storage approximately 16 kilometres (km) northeast of West Wyalong in the Riverina Murray region of NSW.

The site is located in a rural area, with the nearest non-associated dwelling located about 1.7 km away from the proposed development footprint. The project site is located approximately 8 km from the Newell Highway and would connect to the electricity network via the nearby Essential Energy 132 kilovolt (kV) overhead transmission line.

Engagement

The Department exhibited the Environmental Impact Statement for the project and received advice from 10 government agencies. No submissions were received from the general public or special interest groups. The Department also consulted with Bland Shire Council (Council) and the relevant government agencies throughout the assessment and inspected the site on 19 November 2018.

Assessment

The Department has undertaken a comprehensive assessment of the merits of the project and considered all potential issues in accordance with the requirements of the *Environmental Planning and Assessment Act 1979*. The key assessment issues identified for the project are land use compatibility, construction traffic and impacts on flooding and biodiversity.

The project site is currently used for agricultural purposes, including cropping and grazing, and the soils are classified as having Class 3 High Land Capability under the *Land and Soil Capability Mapping in NSW* (OEH, 2017), meaning that the land is capable of sustaining cultivation on a rotational basis. The development footprint (211 hectares) does not include any mapped Biophysical Strategic Agricultural Land.

The Department considers that the project would not significantly reduce the overall agricultural productivity of the region, that the inherent agricultural capability of the land would not be affected and is satisfied that the site could be returned to agricultural uses in the future. The Department also notes that Lightsource BP intends to graze sheep on the site during operation of the project and that part of the site would be retained for agricultural purposes.

The potential traffic impacts would be relatively short-term, minor in nature and can be managed in accordance with Government policy. The site access route and road upgrades have been designed to satisfy the relevant road safety standards and the requirements of Council and the Roads and Maritime Services. The Department has recommended strict conditions requiring road upgrades and a comprehensive Traffic Management Plan.

The site is not mapped as flood prone land under the *Bland Local Environmental Plan 2011* (Bland LEP). However, flood modelling undertaken for the project indicates that the south eastern portion of the site would be inundated during extreme flood events, but concluded that the project would be unlikely to have a consequential impact on flooding within and downstream of the site.

Further, Council raised no concerns about flooding, and the Department's Water Group raised no concerns subject to the implementation of appropriate design measures. The Department has recommended strict conditions requiring Lightsource BP to ensure the solar panels and ancillary infrastructure (including security fencing) are designed, constructed and maintained to reduce impacts on flooding at the site, and to prepare a flood response plan detailing procedures and options for safe access to and from the site in the event of flooding.

The project has been designed to largely avoid impacts on vegetation and threatened species in the locality and all unavoidable impacts (including 1.4 ha of native vegetation clearing) would be offset in accordance with Government policy, which is included as a requirement in the recommended conditions.

The project would employ up to 300 workers during the 12 month construction period. The Department has recommended a condition requiring an accommodation and employment strategy be prepared and implemented by Lightsource BP to ensure there would be sufficient accommodation to house construction workers, and to prioritise the employment of local workers.

Given the distance of the project from other proposed projects in the region, with Wyalong Solar Farm located approximately seven km from the site and the next closest solar farm (Jemalong Solar Farm) located over 50 km from the site, there would be minimal localised cumulative impacts, including no visual or noise impacts and no cumulative impact on local roads along the project's transport route.

To address the residual impacts of the project, including visual, noise, heritage, bushfire, hazards and erosion, the Department has recommended a range of detailed conditions, developed in conjunction with agencies and Council, to ensure these impacts are effectively minimised or offset.

Summary

Overall, the Department considers the site to be appropriate for a solar farm as it has good solar resources and available capacity on the existing electricity network and is consistent with the Department's Large-Scale Solar Energy Guideline.

The project is consistent with the Commonwealth's *Renewable Energy Target* and NSW's *Climate Change Policy Framework* and *Renewable Energy Action* Plan, as it would contribute 90 MW of renewable energy to the National Electricity Market, including a battery storage facility with a capacity of 50 MW/90 MWh. Importantly, the battery would enable the project to store solar energy for dispatch to the grid outside of daylight hours and / or during periods of peak demand, which has the potential to contribute to increased grid stability and energy security. The project would also provide flow-on benefits to the local community, including up to 300 construction jobs and a capital investment of \$136 million.

The Department considers that the project would result in benefits to the State of NSW and the local community and is therefore in the public interest.



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1. Project

Lightsource Development Services Australia Pty Ltd (Lightsource BP) proposes to develop a new State significant development solar farm approximately 16 kilometres (km) northeast of West Wyalong, in the Bland Shire local government area (LGA) (see **Figure 1**, **Figure 2** and **Figure 3**).

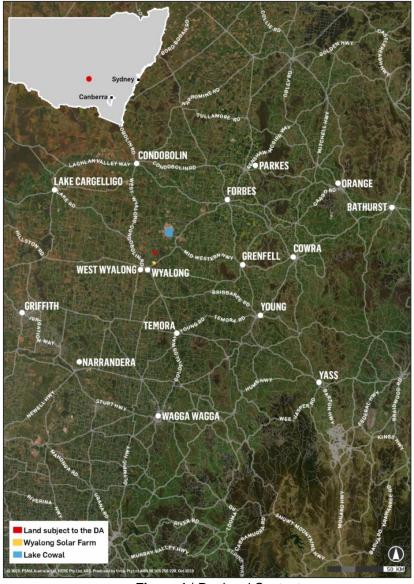


Figure 1 | Regional Context

The project involves the construction of a new solar farm with a generating capacity of approximately 90 megawatts (MW) and 50 MW/90 MW-hour (MWh) of battery storage. It also involves the upgrading and decommissioning of infrastructure and equipment in the future. While the capacity of the project may increase over time as technology improves, the footprint of the development would not increase.

The solar farm would connect to Essential Energy's existing 132 kilovolt (kV) overhead transmission line located approximately 700 metres (m) east of the development site via Myers Lane.

The key components of the project are summarised in **Table 1**, depicted in **Figure 3**, and described in the Environmental Impact Statement (EIS) (see **Appendix B**), amended development application and Submissions Report (see **Appendix E**).

Table 1 | Main Components of the Project

Aspect	Description	
Project summary	 The project includes: approximately 296,000 single-axis tracking solar panels (up to 4 m high) and 15 inverters (up to three m high); 30 lithium-ion battery units with a total capacity of 50 MW/90 MWh; an on-site substation and connection to Essential Energy's 132 kV transmission line via overhead or underground transmission lines along Myers Lane; and internal access tracks, staff amenities, maintenance buildings (up to five m high), offices, laydown areas, car park, vegetation screening and security fencing. 	
Project area	562 ha (with a 211 ha development footprint)	
Access route	 All over-dimensional and heavy vehicles would access the site via the Newell Highway, Bodells Lane and Blands Lane. All light vehicles and shuttle buses would access the site via the Newell Highway, Clear Ridge Road and Blands Lane. 	
Site entry and road upgrades	 Site entry would be via an existing access point on Blands Lane. Roadworks include upgrades to: the intersection of the Newell Highway and Bodells Lane; a 50 m section of Bodells Lane from its intersection with the Newell Highway (including sealing); Blands Lane (including grading and an all-weather seal); and the site entry point on Blands Lane. 	
Operational life	 The expected operational life of the infrastructure is approximately 30 years. However, the project may involve infrastructure upgrades that could extend the operational life. The project also includes decommissioning at the end of the project life, which would involve removing all infrastructure. 	
Construction	 The construction period would last for up to 12 months. Construction hours would be limited to Monday to Friday 7 am to 6 pm, and Saturday 8 am to 1 pm. 	
Hours of operation	Daily operations and maintenance would be undertaken Monday to Friday 7 am to 6 pm, and on Saturday 8 am to 1 pm.	
Employment	Up to 300 construction jobs and three operational jobs.	
Capital investment value	\$136.6 million	



Figure 2 | Project Site (looking south across the site from the central internal access road)

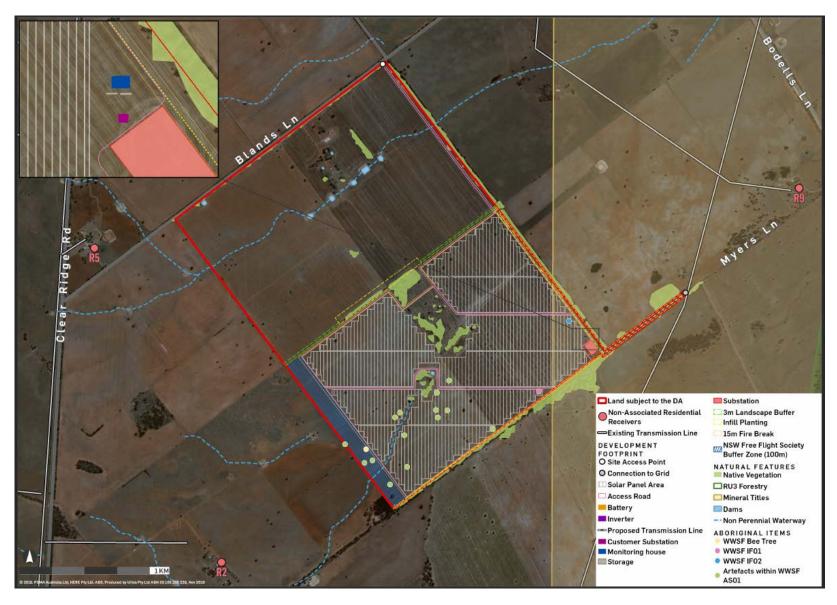


Figure 3 | Project Layout



2.1 Site and Surrounds

The project is located on a 562 hectare (ha) site on the northern fringes of the Riverina Murray region of NSW. The site is zoned RU1 (Primary Production) under the *Bland Local Environmental Plan 2011* (Bland LEP) and is used for agricultural purposes, including cropping and grazing.

Areas of remnant native vegetation are located centrally within the site, adjacent to fence lines and along the Myers Lane road reserve. The site is located within the Lachlan River Catchment. Two ephemeral watercourses traverse the site and flow from west to southeast.

The proposed development footprint is 211 ha and was designed to avoid site constraints, including native vegetation, Aboriginal heritage items of high significance and the northernmost watercourse (see **Figure 3**).

Land surrounding the site is also zoned RU1 and is primarily used for agricultural purposes (cropping and grazing). Two non-associated dwellings are located within 2 km of the site (R5 and R9). The closest dwelling is about 1.7 km northwest of the development footprint (R5) and would have distant views of the site that are partially screened by existing vegetation.

The NSW Free Flight Society occupies and uses land immediately southwest of the site to fly model airplanes. The Free Flight Society's clubhouse (R2) is located approximately 1.3 km southwest of the development footprint.

The Cowal Gold Mine, owned and operated Evolution Mining Pty Limited (Evolution Mining), is located about 17 km north of the site. Evolution also holds existing mineral rights over the south eastern corner of the site.

An Essential Energy 132 kV transmission line is located approximately 700 m east of the site. The solar farm would connect to the transmission line via an easement along Myers Lane.

With the exception of the site access road, all project infrastructure would be located in the southern half of the project site. In addition to avoiding site constraints, this design would increase the distance between the closest residential receiver to the northwest and the development footprint, and minimise the distance between the proposed on-site substation and Essential Energy's 132 kV transmission line.

2.2 Other Solar Farms

The Riverina Murray region of NSW has attracted considerable interest from solar developers given the presence of major transmission lines and existing electricity substations. There are three approved State significant development solar projects within approximately 100 km of the project, with the closest solar farm located approximately 7 km to the south of the site (see **Table 2** and **Figure 4**).

Table 2 | Nearby solar farms

Project	Capacity (MW)	Status	Approximate distance from the project (km)
Wyalong Solar Farm	100	Approved	7
Jemalong Solar Farm	50	Approved	53
Sebastopol Solar Farm	150	Approved	90

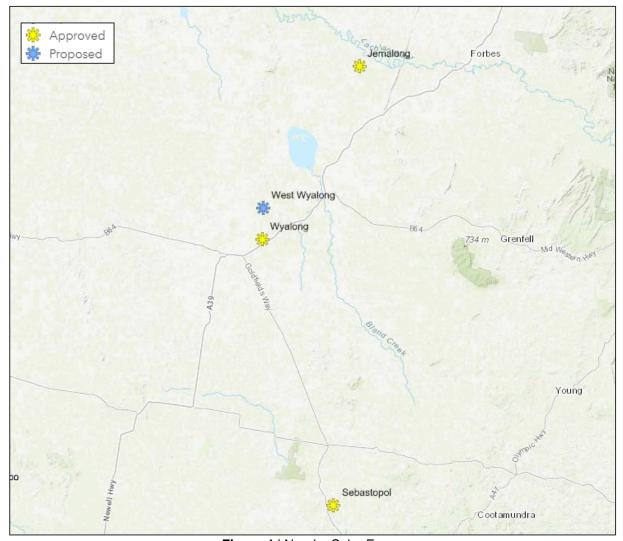


Figure 4 | Nearby Solar Farms

Given the distance of the West Wyalong Solar Farm from other nearby projects, there would be no significant cumulative visual or noise impacts. In addition, while the surrounding regional road network may experience an increase in traffic numbers, there would be no significant cumulative impact on the local roads along the proposed transport route, as discussed further in **section 5.2**.

Other potential cumulative impacts at a regional level relate to agricultural land and workforce accommodation.

There is the potential for the construction of the project to overlap with the construction of Jemalong Solar Farm, Sebastapol Solar Farm and Wyalong Solar Farm. Workforce accommodation for these solar projects would be sourced from the local and wider region, including neighbouring LGAs and the towns of West Wyalong, Temora, Forbes, Parkes and Narrandera, as discussed further in **section 5.4**.

The potential cumulative impacts on agricultural land in the region is discussed further in section 5.1.

2.3 Energy Context

In 2018, NSW derived approximately 17.4% of its energy from renewable sources. The rest was derived from fossil fuels, including 79% from coal and 3.1% from gas. However, there are currently no plans for the development of new coal power stations in NSW, and the development of renewable energy sources, like wind and solar farms, is experiencing rapid growth.

This is highlighted in the 2017 *Independent Review into the Future Security of the National Electricity Market* (the Finkel Review), which outlines a strategic approach to ensuring an orderly transition from traditional coal and gas fired power generation to generation with lower emissions. It notes that Australia is heading towards zero emissions in the second half of the century.

The *United Nations Framework Convention on Climate Change* has adopted the Paris Agreement, which aims to limit global warming to well below 2°C, with an aspirational goal of 1.5°C. Australia's contribution towards this target is a commitment to reduce greenhouse gas emissions by 26% to 28% below 2005 levels by 2030.

One of the key initiatives to deliver on this commitment is the Commonwealth Government's Renewable Energy Target. Under this target, more than 20% of Australia's electricity would come from renewable energy by 2020.

The NSW Climate Change Policy Framework, released in November 2016, sets an aspirational objective for NSW to achieve net zero emissions by 2050. The NSW Government also has a Renewable Energy Action Plan, which promotes the development of renewable energy in NSW.

The Department released the *Large-Scale Solar Energy Guideline* in December 2018 to provide the community, industry and regulators with guidance on the planning framework for the assessment of large-scale solar projects, and identify the key planning considerations relevant to solar energy development in NSW.

The Guideline aims to support the growth of the solar industry, whilst ensuring that impacts are adequately assessed, effective stakeholder engagement is undertaken, and that attracting investment is balanced with considering the interests of the community. Lightsource BP submitted its EIS in January 2019 and its assessment is consistent with the principles of the Guideline.

The Guideline also acknowledges that large scale solar projects could help to reduce reliance on fossil fuels, thereby contributing to reductions in air pollution and greenhouse gas emissions, whilst also supporting regional NSW through job creation and investment in communities that may not have similar opportunities from other industries.

NSW is one of the nation's leaders in large-scale solar, with nine major operational projects and an additional eight under construction.

In March 2018, the NSW Government identified 10 potential Energy Zones across three broad regional areas, including the New England, Central West and South West regions of NSW. The identified energy zones are aimed at encouraging "investment in new electricity infrastructure and unlocking additional generation capacity in order to ensure secure and reliable energy in NSW".

The project would be located within one of the five Solar Energy Zones and would have access to the electrical grid at a location with available network capacity. With a capacity of 90 MW, the project would generate enough electricity to power around 33,600 homes, and is therefore consistent with both the Commonwealth's *Renewable Energy Target* and NSW's *Renewable Energy Action Plan*.



3. Statutory Context

3.1 State Significant Development

The project is classified as State significant development under Section 4.36 of the *Environmental Planning and Assessment Act 1979* (EP&A Act). This is because it triggers the criteria in Clause 20 of Schedule 1 of *State Environmental Planning Policy (SEPP)* (*State and Regional Development*) 2011, as it is development for the purpose of electricity generating works with a capital investment value of more than \$30 million.

Consequently, the Minister for Planning and Public Spaces is the consent authority for the development. However, under the Minister's delegation of 11 October 2017, the Executive Director, Energy and Resource Assessments, may determine the development application as Council did not object, there were no objections from the general public and a political donations disclosure statement has not been made.

3.2 Permissibility

The site is located wholly within land zoned RU1 Primary Production under the Bland LEP, the provisions of which are discussed in **section 5.1**. The RU1 zone includes various land uses that are both permitted with and without consent. As a solar farm is not expressly listed as permitted with or without consent, it is a prohibited land use under a strict reading of the LEP. However, the LEP expressly references the *State Environmental Planning Policy (Infrastructure)* 2007 (Infrastructure SEPP) and acknowledges that electricity generating works are regulated by the Infrastructure SEPP, rather than the LEP.

Under the Infrastructure SEPP, electricity generating works are permissible on any land in a prescribed rural, industrial or special use zone. Land zoned RU1 Primary Production is a prescribed rural zone pursuant to the Infrastructure SEPP. Consequently, the project is permissible with development consent.

3.3 Integrated and Other Approvals

Under Section 4.41 of the EP&A Act, a number of other approvals are integrated into the State significant development approval process, and therefore are not required to be separately obtained for the proposal.

Under Section 4.42 of the EP&A Act, a number of further approvals are required, but must be substantially consistent with any development consent for the proposal (e.g. approvals for any works under the *Roads Act 1993*).

The Department has consulted with the relevant government agencies responsible for the integrated and other approvals, considered their advice in its assessment of the project, and included suitable conditions in the recommended conditions of consent to address these matters (see **Appendix F**).

Lightsource BP referred the project to the Commonwealth Minister for the Environment and Energy as the project would clear a small area of native vegetation and fauna habitat listed under the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act) (as discussed further in **section 5.4**). However, on 9 May 2019, the Minister for the Environment and Energy determined that the project is not a controlled action and does not need further assessment and approval under the EPBC Act.

3.4 Mandatory Matters for Consideration

Section 4.15 of the EP&A Act outlines the matters that a consent authority must take into consideration when determining development applications. These matters are summarised as:

- the provisions of environmental planning instruments (including draft instruments), development control plans, planning agreements, and the EP&A Regulations;
- the environmental, social and economic impacts of the development;
- the suitability of the site;
- any submissions; and
- the public interest, including the objects in the EP&A Act and the encouragement of ecologically sustainable development (ESD).

The Department has considered all these matters in its assessment of the project, as well as Lightsource BP's consideration of environmental planning instruments in its EIS, as summarised in **section 5** of this report. The Department has also considered relevant provisions of the environmental planning instruments in **Appendix C**.



4.1 Department's Engagement

The Department publicly exhibited the EIS from 13 February 2019 until 13 March 2019, advertised the exhibition in the *Condobolin Argus, West Wyalong Advocate* and the *Wagga Wagga Riverina Leader*, and notified adjoining landowners adjacent to the project boundary.

The Department also consulted with Council and the relevant government agencies throughout the assessment and inspected the site on 19 November 2018.

The Department notified and sought comment from Essential Energy and RMS in accordance with the Infrastructure SEPP and this is discussed further in **section 4.3** of this report.

4.2 Submissions and Submissions Report

During the exhibition of the EIS, the Department received advice from 10 government agencies, including Bland Shire Council. No submissions were received from the general public or special interest groups.

Full copies of the agency advice are attached in **Appendix D**. Lightsource BP provided a response to all matters raised in the agency advice (see **Appendix E**).

4.3 Key Issues – Government Agencies

Bland Shire Council supports the project, but initially raised concerns or made recommendations relating to construction traffic, potential impacts on West Wyalong landfill, bush fire management, feral animals, locally sourcing construction workers where possible, workforce accommodation, financial contributions and decommissioning. To address Council's concerns about construction traffic, Lightsource BP revised its haulage route and Traffic Impact Assessment, and has committed to upgrade local roads along the haulage route (see section 5.2 of this report for further discussion). All other matters raised by Council were addressed by Lightsource BP in its Submissions Report. The Department has also recommended a range of conditions of consent to address these issues, which are discussed in section 5. Council has confirmed it supports the recommended conditions and has no residual concerns.

The **Department's Water Group** (DPIE Water) requested additional information about water supply and flooding; recommended that site infrastructure, including security fencing, be designed and constructed to avoid impacts on floodwaters; and requested that Lightsource BP prepare an Erosion and Sediment Control Plan. The **Department's Primary Industries Group** (DPIE Primary Industries) requested that Lightsource BP prepare a Decommissioning Plan, including a rehabilitation strategy, and recommended that the land be returned to its existing agricultural use. These matters were addressed by Lightsource BP in its Submissions Report, and the Department has also recommended

a range of conditions of consent to address these issues, which are discussed in **section 5**, and DPIE Water and DPIE Primary Industries have confirmed they have no residual concerns.

Roads and Maritime Services (RMS) recommended that Lightsource BP prepare a comprehensive Traffic Management Plan and undertake the relevant road upgrades prior to construction. These recommendations are discussed in **section 5.2** and have been incorporated into the recommended conditions of consent.

The **Biodiversity Conservation Division within the Department** (BCD) (formerly Office of Environment and Heritage) initially raised concerns about the adequacy of Lightsource BP's Aboriginal Cultural Heritage Assessment Report (ACHAR) and Biodiversity Development Assessment Report (BDAR). BCD also recommended specific fauna management and revegetation measures and requested further justification for the proposed vegetation clearing within the Myers Lane road reserve. To address BCD's concerns, Lightsource BP revised its ACHAR and BDAR, and provided additional information in its Submissions Report and during the Department's assessment. The Department has also recommended a range of conditions of consent, which are discussed in **section 5.4**, and BCD has confirmed it supports the recommended conditions and has no further concerns.

The **Division of Resources and Geoscience** (DRG) initially raised concerns about Lightsource BP's effort to consult with Evolution Mining. This matter was addressed by Lightsource BP in its Submissions Report, and DRG confirmed that it is satisfied with the consultation and that the project would not sterilise any mineral resources (see **section 5.1**).

The **Rural Fire Service** (RFS) and **Fire & Rescue NSW** (F&R NSW) recommended specific operating requirements related to bushfire and hazard preparation and management, which have been incorporated into the recommended conditions of consent.

The Environment Protection Authority, Heritage Council of NSW and Essential Energy raised no concerns about the project and made no recommendations.

5. Assessment

The Department has undertaken a comprehensive assessment of the merits of the project. This report provides a detailed discussion of the three key issues, namely the compatibility of the proposed land use, construction traffic and flooding.

The key constraints for the project are depicted in **Figure 1**. The Department has also considered the full range of potential impacts associated with the project and has included a summary of the conclusions in **section 5.4**. A list of the key documents that informed the Department's assessment is provided in **Appendix A**.

5.1 Compatibility of Proposed Land Use

Provisions of the Bland LEP

The site is located wholly within the RU1 Primary Production zone under the LEP. As discussed in **section 3.2**, a solar farm is a prohibited land use under a strict reading of the LEP.

However, based on a broader reading of the LEP, and consideration of the objectives of the RU1 zone and other strategic documents for the region, the Department considers that there is no clear intention to prevent the development of a solar farm on the project site.

Firstly, the LEP expressly references the Infrastructure SEPP and acknowledges that electricity generating works are regulated by the Infrastructure SEPP, rather than the LEP. As described above, a solar farm is permitted with consent on land zoned RU1 under the Infrastructure SEPP.

Secondly, the project is not inconsistent with the objectives of the RU1 zone, particularly in relation to:

- encouraging diversity in primary industry enterprises and systems appropriate for the area; and
- minimising fragmentation and alienation of resource lands.

While the Bland Shire LGA has traditionally relied upon agriculture and mining, the introduction of solar energy generation would contribute to a more diverse local industry, thereby supporting the local economy and community. In addition, the proposed solar farm would encourage renewable energy resources, which is consistent with the *Bland Shire Council Community Strategic Plan 2017-2027*.

The project is also consistent with the Department's *Riverina Murray Regional Plan 2036* which identifies the development of renewable energy generation as a priority growth sector for the region.

The development would not fragment or alienate resource lands in the LGA and the land could be easily returned to agricultural land following decommissioning as the inherent agricultural capability of the land would not be affected.

Finally, and most importantly, Council supports the project, subject to the implementation of appropriate environmental mitigation measures.

Potential Impacts on Agricultural Land

The project is located within the Riverina Murray region, which makes the largest regional contribution to agricultural production in NSW, with over 9.1 million ha of the region being used for agricultural output.

While the development footprint (211 ha) does not include any mapped Biophysical Strategic Agricultural Land (BSAL), the soils are classified as having Class 3 High Land Capability under the Land and Soil Capability Mapping in NSW (OEH, 2017). As such, the land is capable of sustaining cultivation on a rotational basis and the site is currently used for cropping and grazing. The development of the solar farm would therefore reduce the agricultural output of the site while the solar farm remains operational.

The development footprint of the project combined with the other approved and/or operational SSD solar farms in the Riverina Murray region would be 7,071 ha. However, the loss of 7,071 ha of agricultural land represents a very small fraction (0.08 %) of the 9.1 million ha of land being used for agricultural output in the Riverina Murray region¹ and would result in a negligible reduction in the overall productivity of the region.

The Department notes that during operation of the project, Lightsource BP proposes to manage the land through sheep grazing. Additionally, no infrastructure is proposed to be constructed within the northern half of the project site, allowing agricultural activities to continue unimpeded on this part of the site.

The Department also notes that neither Council nor the Department's Water Group raised concerns about the impacts of the project on agricultural land, subject to appropriate mitigation and management measures to ensure the land can be returned to its existing agricultural use.

Lightsource BP proposes to return the land back to existing levels of agricultural capability and the Department has included rehabilitation objectives in the recommended conditions to maintain the productivity of the agricultural land during the construction and operation of the project, and to fully reinstate the agricultural capability of the land following decommissioning of the project.

Furthermore, the inherent agricultural capability of the land would not be affected by the project due to the relatively low scale of the development and the Department has included requirements to maintain the land capability of the site (including ground cover). To this end, the land would be returned to agricultural use following decommissioning.

The potential loss of a small area of cropping and grazing land in the region must be balanced against:

- the broader strategic goals of the Commonwealth and NSW governments for the development of renewable energy into the future;
- the environmental benefits of solar energy, particularly in relation to reducing greenhouse gas emissions;

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¹ Riverina Murray Agricultural Industries Final Report, Department of Planning and Environment, January 2016.

- the economic benefits of solar energy in an area with good solar resources and capacity in the existing electricity infrastructure; and
- the benefits of dispatchable energy for grid stability and reliability.

Based on these considerations, the Department considers that the proposed solar farm represents an effective and compatible use of the land within the region.

Potential Impacts on Mining and Exploration

The small portion of the south eastern corner of the site includes land with existing mineral rights held by Evolution Mining (Exploration Licence 7750) (see **Figure 3**). Evolution Mining has confirmed that it has no concerns about the proposal being located on this land.

DRG has also confirmed that Lightsource BP has undertaken adequate consultation with Evolution Mining and that sufficient information has been provided about the potential land use conflicts of the solar farm and the existing exploration licence.

While the ability to access the underlying mineral resource would be prevented during operation of the solar farm, the Department is satisfied that access to this resource would not be sterilised in the long term following decommissioning and rehabilitation of the project.

5.2 Traffic and Transport

Traffic Volumes

The main increase in project related traffic would occur during the 12 month construction period, with a peak period of four months. During this peak, a maximum of 25 heavy vehicles, 40 shuttle buses (20 in the morning and 20 in the evening) and five light vehicles would access the site each day.

Additionally, there would be a total of one over-dimensional vehicle during construction.

The Department notes that Lightsource BP proposes to use a shuttle bus service to transport workers to and from the site to minimise light vehicle access, which may include nearby towns such as West Wyalong, Temora, Forbes, Parkes and Narrandera. The Department has included a requirement within the Traffic Management Plan for Lightsource BP to develop measures to ensure employee use of this service, which is supported by RMS and Council.

Traffic generation during operations would be negligible (i.e. one heavy vehicle and two light vehicles per day).

Transport Route and Site Access

All over-dimensional and heavy vehicles would access the site via the Newell Highway, Bodells Lane, Blands Lane and the existing access point on Blands Lane. Heavy vehicles approaching Bodells Lane from the southwest along the Newell Highway would travel via the West Wyalong Heavy Vehicle Bypass to avoid the centre of town (see **Figure 5**).

All shuttle buses and light vehicles would access the site via the Newell Highway, Clear Ridge Road, Blands Lane and the existing access point on Blands Lane (see **Figure 5**).

The Newell Highway is a State road that serves as a key transport route for traffic travelling to local, regional and interstate locations. Clear Ridge Road is a sealed local rural collector road. Bodells Lane and Blands Lane are both unsealed local roads typically used by local traffic, and which may experience flooding during extreme storm events (as discussed in **section 5.3**).

Following advice from Council, Lightsource BP revised its proposed transport routes to avoid light vehicles (including shuttle buses) using Bodells Lane to reduce potential dust generation along this route and travel to the site via Clear Ridge Road.

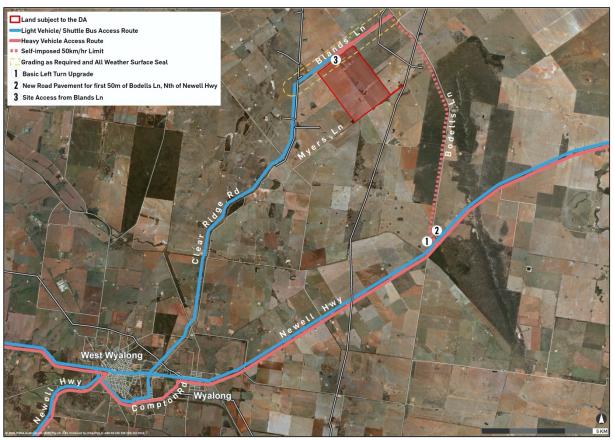


Figure 5 | Site Access and Road Upgrades

Road Upgrades and Maintenance

The RMS and Council support the proposed transport route, provided the required road upgrades are undertaken to support the increased traffic.

These include the following:

- upgrade the intersection of the Newell Highway and Bodells Lane, including a Basic Left Turn (BAL) treatment to cater for the largest vehicle accessing the site;
- upgrade and seal Bodells Lane for a minimum of 50 m from its intersection with the Newell Highway to a standard that allows two-way heavy vehicle movements (to minimise gravel being tracked onto the Newwell Highway);
- upgrade Blands Lane between Bodells Lane and Clear Ridge Road, including grading and an allweather seal;

 design the site access point on Blands Lane with a Rural Property Access type treatment to cater for the largest vehicle accessing the site.

Lightsource BP has accepted the proposed upgrades and has confirmed the upgrades would be designed and constructed to the satisfaction of the relevant roads authority. Additionally, Lightsource BP has committed to preparing road dilapidation surveys and repairing any damage resulting from the construction traffic.

To further minimise dust, and consistent with Council's advice, Lightsource BP has also committed to apply a polymer dust suppressant to Bodells Lane and Blands Lane.

Recommended Conditions

The Department has recommended conditions of consent requiring Lightsource BP to:

- undertake the relevant road upgrades prior to the commencement of construction;
- restrict the number of vehicles during construction, upgrading and decommissioning to the peak volumes identified in the EIS;
- ensure the length of vehicles (excluding over-dimensional vehicles) does not exceed 26 m; and
- prepare a Traffic Management Plan in consultation with RMS and Council, including provisions
 for dilapidation surveys, road safety and dust management, details of the employee shuttle bus
 service and preparation of a flood response plan detailing procedures and options for safe access
 to and from the site in the event of flooding.

Subject to the recommended conditions, the Department, RMS and Council are satisfied that the project would not result in significant impacts on road network capacity, efficiency or safety.

5.3 Flooding

Flooding

The site is located within the Lachlan River Catchment. Two ephemeral watercourses traverse the project site, but only the southernmost watercourse crosses the development footprint (see **Figure 3**). Surface water typically flows from west to southeast, and discharges at the south eastern site boundary, where it eventually reaches a confluence of watercourses and streams 2 km from the site.

The site is not mapped as flood prone land under the LEP. However, flood modelling undertaken for the project indicates that the south eastern section of the site would be inundated during 1 in 100 year (1%) and 1 in 200 year (0.5%) Annual Exceedance Probability (AEP) flood events. The assessment concluded that the site is located below the 'flood planning level' under the Bland LEP (which is the 1% AEP flood event plus 0.5 m freeboard).

Under the LEP, a consent authority must not grant consent to a development located on land below the 'flood planning level' unless it is satisfied the development would not significantly adversely affect flood behaviour on the surrounding environment during a 1% AEP event.

Lightsource BP has assessed the impact of the project on flood behaviour for the more extreme 0.5% AEP flood event and has proposed design measures for this type of flood event.

The assessment demonstrated that for 0.5% AEP event (and therefore the 1% AEP event), the project is unlikely to have a consequential impact on flooding within and downstream of the development.

Council raised no concerns about flooding, and DPIE Water raised no concerns subject to the implementation of appropriate design measures. In this regard, the solar panels in the eastern section of the site, and the substation and batteries, would be elevated above the predicted flood levels (plus freeboard) for the 0.5% AEP storm event. Where the overland flow path crosses the site access driveway, a cattle grid crossing or at grade causeway would be used to convey runoff across the road.

Further, in response to concerns initially raised by DPIE Water, Lightsource BP has committed to design security fencing in the affected zones (i.e. along the eastern boundaries) to enable floodwaters and any small debris to pass through without causing localised damming immediately upstream of the fence, which may include drop-down fencing.

Any erosion and sedimentation risks associated with the project can be effectively managed using best practice construction techniques.

The project is not expected to affect groundwater resources.

Water Demands

The project would require around 75 megalitres (ML) of water during construction (mainly for dust suppression) and up to 25 ML of water annually during operation. A static water supply (45,000 litres) would also be established and maintained for fire protection.

Water would be sourced from on-site farm dams and/or rainwater tanks in accordance with harvestable rights (estimated at 43 ML per year) and trucked to site via a West Wyalong water cartage service. Following confirmation of these sources, DPIE Water raised no further concerns about water supply or licencing.

Recommended Conditions

To ensure that impacts on flooding are minimised, the Department has recommended conditions requiring Lightsource BP to:

- ensure the solar panels and ancillary infrastructure (including security fencing) are designed, constructed and maintained to reduce impacts on flooding and groundwater at the site;
- minimise any soil erosion associated with the construction, upgrading or decommissioning of the project in accordance with OEH's *Managing Urban Stormwater: Soils and Construction* (Landcom, 2004) manual;
- ensure the solar panels and ancillary infrastructure are designed, constructed and maintained to avoid causing any erosion on site;
- ensure all works are undertaken in accordance with *Guidelines for Controlled Activities on Waterfront Land* (NRAR, 2018) and *Why Do Fish Need to Cross the Road? Fish Passage Requirements for Waterway Crossings* (2004);
- prepare a flood response plan as part of the Traffic Management Plan, including procedures and options for safe access to and from the site in the event of flooding.

Subject to the recommended conditions, the Department and DPIE Water consider that the project would not result in significant impacts on water resources or flooding.

5.4 Other Issues

The Department's consideration of other issues is summarised in **Table 3**.

Table 3 | Other Issues

Recommended Condition Issue **Findings**

Biodiversity

- The site is mostly comprised of cleared agricultural land. However, approximately 37 ha of native vegetation is located centrally within the site, along property boundaries and within the Myers Lane road reserve (i.e. the location of the proposed transmission lines) (see Figure 3).
- The project has been designed to avoid native vegetation within the site, with the exception of 32 scattered paddock trees (including 11 hollow-bearing trees) and up to 1.4 ha of native vegetation located within the road reserve, being:
 - 1.2 ha of Belah woodland (PCT 55); and
 - 0.2 ha of Weeping Myall open woodland (PCT 26), an endangered ecological community under the Biodiversity Conservation Act 2016 (BC Act) and the EPBC Act.
- The 32 scattered paddock trees are consistent with PCT 55, Western Grey Box tall grassy woodland (PCT 76) and Blue Mallee - Bull Mallee - Green Mallee very tall mallee shrubland (PCT 177).
- No threatened or endangered flora species were detected during site surveys.
- Twenty-seven threatened fauna species listed under the BC Act are predicted to use habitat on the site and within the road reserve. Three threatened fauna species listed under the BC Act were identified during site surveys, being the Grey-crowned Babbler, the Painted Honeyeater and the Inland Forest Bat. The Painted Honeyeater is also listed under the EPBC Act.
- The Minister for the Environment and Energy determined that the project is not a controlled action and does not need to further assessment and approval under the EPBC Act.
- The impact on native vegetation and native species would generate 61 ecosystem credits under the BC Act, including the credits for the species that were assumed to be present. The credit requirement would be retired in accordance with the NSW Biodiversity Offset Scheme and BCD has confirmed that the credits have been calculated correctly.
- The Department notes that BCD raised concerns about the clearance of native vegetation and habitat within the road reserve, and considers that impacts could be minimised further through the design of the transmission line. In response, Lightsource BP confirmed that it was unable to obtain access to adjacent cleared land and that the use of the road reserve would be the only viable option to connect the project to the grid.

- Minimise the clearing of native vegetation and fauna habitat within the Myers Lane road reserve.
- Retire the applicable biodiversity offset credits in accordance with the Biodiversity Offsets Scheme.
- Prepare and implement a **Biodiversity Management** Plan in consultation with BCD, including avoiding removal of hollowbearing trees during spring to avoid the main breeding period for hollow-dependent fauna.

Issue Findings Recommended Condition

• Additionally, Lightsource BP proposes to minimise the clearing of vegetation within the road reserve during

- clearing of vegetation within the road reserve during detailed design of the transmission line and the Department has recommended conditions of consent to ensure this occurs.
- With these measures, both BCD and the Department consider that the project is unlikely to result in a significant impact on the biodiversity values of the locality.

Heritage

- Site surveys identified four Aboriginal heritage sites, including a scarred tree (Bee Tree), an artefact scatter with 14 items (AS01) and two isolated artefacts (IF01 and IF02).
- The scarred tree was assessed to be of high significance and the artefact scatter and isolated finds were assessed to be of moderate and low significance, respectively.
- The development footprint has been designed with an exclusion zone to avoid and protect the scarred tree and part of the artefact scatter.
- Lightsource BP has committed to salvage and relocate all the remaining items, in consultation with Aboriginal stakeholders.
- If Aboriginal artefacts or skeletal material are identified, all work would cease, and an unexpected finds procedure would be implemented.
- There are no known items of historic heritage value within or surrounding the site.
- With these measures, the Department and BCD consider that the project would not significantly impact the heritage values of the locality.

- Ensure the development does not cause any direct or indirect impacts on any items located within exclusion zones or outside the approved development footprint.
- Salvage and relocate Aboriginal items to suitable alternative locations.
- Prepare and implement a Heritage Management
 Plan in consultation with BCD and Aboriginal
 Stakeholders, including procedures for unexpected finds.

Visual

- The solar panels would be up to 4 m high, and the maintenance building, substation and battery storage facilities would be a similar size to agricultural sheds commonly utilised in the area.
- Two non-associated dwellings are located within 2 km of the development footprint, including R5 (1.7 km to the northwest) and R9 (1.9 km to the east). Distance and existing vegetation would reduce views of the project from these dwellings, resulting in a low (R5) and very low (R9) visual impact. No objection was received from either landowner.
- The visual impact at all other assessed locations (i.e. the NSW Flight Society club house (R2), roads and other dwellings) would be low or nil due to distance and existing vegetation.
- Nonetheless, Lightsource BP has committed to implement
 measures to further minimise the visual impact of the
 project, including a vegetation buffer and infill planting
 along the northwestern side of the development footprint
 and infill buffer planting along the northeastern and
 southwestern site boundaries prior to operation (see
 Figure 3). Further, Lightsource BP would avoid
 unnecessary lighting and signage and ensure the visual
 appearance of infrastructure (including paint colours)
 further minimises the visual impact on the surrounding
 landscape.

- Prepare a detailed Landscaping Plan for the site
- Ensure that external lighting is minimised and complies with the relevant Australian Standards.
- Prohibit any signage or advertising on the site, unless it is for safety purposes.

Issue Findings Recommended Condition

- The Department also notes that photovoltaic panels are designed to absorb rather than reflect sunlight, and the Department is satisfied that the project would not cause noticeable glint or glare compared to other building surfaces.
- Following consultation with the NSW Free Flight Society,
 Lightsource BP designed to the project to include a 100 m
 buffer between R2 and the development footprint
 (including the security fencing). This has increased the
 distance between the development footprint and R2
 (1.3 km). Additionally, it would allow model airplanes to be
 retrieved if they overshoot the NSW Free Flight Society's
 property boundary. No objection was received from the
 NSW Free Flight Society.
- Council and RMS raised no concerns about visual impacts, subject to the proposed visual mitigation measures.
- The Department considers the visual impact of the project on the surrounding residences and road users to be minimal.

Noise

- Noise generated by the proposed construction, upgrading and decommissioning activities was predicted to be 37 dB(A) at the non-associated receiver (R9) and less than 35 dB(A) at all other non-associated receivers (including R5), and therefore would be well below the 'noise affected' criterion of 45 dB(A) in the EPA's Interim Construction Noise Guideline (ICNG) at all non-associated residences.
- Notwithstanding, Lightsource BP has committed to implement the noise mitigation work practices set out in the ICNG, including scheduling activities to minimise noise (such as not all plant and machinery would be operated concurrently), using quieter equipment and establishing a complaint handling procedure.
- There would be negligible noise during operation.

Battery storage facility

- Lightsource BP is proposing on-site lithium-ion battery storage with 50MW/90MWh of storage capacity, comprising 30 battery units housed within eight subsystems located throughout the site (adjacent to the inverters; see Figure 3). Each sub-system would include up to 4 containerised units and deliver up to 6.7 MW.
- The preliminary risk screening included in the EIS was undertaken in accordance with SEPP No.33 – Hazardous and Offensive Development and determined that a Preliminary Hazard Assessment was not required for the proposed configuration and capacity.
- Lightsource BP would implement a range of hazard prevention and mitigation measures including (but not limited to):
 - minimum 10 m Asset Protection Zones (APZ) around the batteries and site infrastructure;
 - automated monitoring and control systems, with alarm and shutdown capability;
 - isolation of each sub-system in the event of an emergency; and
 - appropriate separation between each sub-system.
- Subject to the recommended conditions, the Department is satisfied that risks associated with the facility would be negligible.

- Minimise the noise generated by construction, upgrading or decommissioning activities on site in accordance with best practice requirements outlined in the ICNG.
- Restrict construction to the standard hours in the ICNG (i.e. Monday to Friday 7 am to 6 pm, and Saturday 8 am to 1 pm).
- Prepare a Fire Safety
 Study consistent with the
 Department's Hazardous
 Industry Advisory Paper
 No. 2, 'Fire Safety Study'
 guideline and the 'Best
 Practice Guidelines for
 Contaminated Water
 Retention and Treatment
 Systems'.
- Prepare an Emergency Plan consistent with the Department's Hazardous Industry Advisory Paper No. 1.

Issue **Findings Recommended Condition**

Other hazards

- The project would comply with the International Commission on Non-Ionizing Radiation Protection (ICNIRP) guidelines for electric, magnetic and electromagnetic fields.
- The site is not mapped as bushfire prone land. Notwithstanding, Lightsource BP has committed to managing the entire site as an Asset Protection Zone and preparing a Fire Safety Study and Emergency Plan to manage fire risk.
- Lightsource BP intends to manage ground cover and its associated fire hazard on site by using sheep grazing.
- The Department is satisfied that the bushfire risks can be suitably controlled through the implementation of standard fire management procedures and recommendations made by the RFS and Fire and Rescue NSW.
- Ensure that the development complies with the relevant asset protection requirements in the RFS's Planning for Bushfire Protection 2006.
- Prepare a Fire Safety Study and an Emergency Plan in consultation with RFS and Fire and Rescue NSW.

Workforce accommodation

- Up to 300 workers would be required during the construction period and would be sourced from the local community where possible.
- There is the potential for construction of the project to overlap with the construction of Wyalong Solar Farm, Jemalong Solar Farm and Sebastapol Solar Farm. Should this occur, up to 675 construction personnel may be required in the region. However, the Department considers that it is unlikely the entire construction periods of these four projects would overlap.
- In addition to West Wyalong, the nearby towns of Temora, Forbes, Parkes and Narrandera (between 70 and 120 km from the site) would provide a source of workers and accommodation options.
- Council raised concerns about accommodation availability and requested that workers be sourced locally.
- While the Department considers there to be sufficient workers accommodation available for this project, to manage the potential cumulative impacts associated with multiple projects in the region and to encourage locally sourced workers, Lightsource BP would be required to develop an Accommodation and Employment Strategy. The Strategy would require Lightsource BP to:

- propose a strategy to ensure there is sufficient accommodation for the workforce associated with the project;
- consider cumulative impacts with other projects in the
- prioritise employment of local workers; and
- monitor and review the effectiveness of the strategy, including regular monitoring during construction.
- Community contributions
- The Department considered the need for developer contributions in its assessment of this project and whether it would create any additional demand on public services and infrastructure.
- The assessment found that the only material additional demand on services and infrastructure related to roads.

Prepare an Accommodation and Employment Strategy for the project in consultation with Council, with consideration of the cumulative impacts associated with other State significant development projects in the area.

No specific conditions required.

- As such, the Department has recommended strict conditions of consent that would require Lightsource BP to pay for all relevant road and intersection upgrades.
 Further, Lightsource BP would be required to pay for the repairs of any project-related impacts on the road network.
 These conditions have been agreed with the Applicant and Council.
- The Department also considered the demand created by the construction workforce (up to 300 workers). As noted above, to ensure there would be sufficient existing accommodation to house construction workers, Lightsource BP would be required to develop an Accommodation and Employment Strategy in consultation with Council. This condition is supported by Council.
- Given the relatively low level of employment generated once it is operational (approximately 3 workers), the project is unlikely to result in significant additional demand on community services and infrastructure during the operational stage of the project.
- The Department notes that Council initially requested contributions in line with its Section 94A Development Contributions Plan. While the Contributions Plan is a relevant matter for consideration by the consent authority, it is not binding on State significant developments. Further, as outlined above, the Department has considered the demand on public services and infrastructure and is satisfied that its recommended conditions address the only material impact of the project on these matters (i.e. roads). Consequently, the Department does not consider that a Section 7.12 levy is either necessary or warranted in this case.
- Additionally, the project would generate both direct and indirect benefits to the local community, including:
 - generating up to 300 jobs during 12 months of construction and 3 jobs during operation of the project;
 - expenditure on accommodation and businesses in the local economy by workers; and
 - the procurement of goods and services by Lightsource BP and any associated contractors.



The Department has prepared recommended conditions of consent for the project (see **Appendix F**).

The Department consulted with Lightsource BP and the relevant agencies on the conditions for the project, particularly Council and RMS in regard to the road upgrades and maintenance requirements, and BCD to determine the appropriate biodiversity offset requirements for the project.

These conditions are required to:

- prevent, minimise, and/or offset adverse impacts of the project;
- ensure standards and performance measures for acceptable environmental performance;
- ensure regular monitoring and reporting; and
- provide for the ongoing environmental management of the project.

The recommended conditions use a risk-based approach that focuses on performance-based outcomes. This reflects current government policy and the fact that solar farms require relatively limited ongoing environmental management once the project has commenced operations.

In line with this approach, the Department has recommended operating conditions to minimise traffic, flooding, water, biodiversity, heritage, amenity and bushfire impacts, and required the following management plans be prepared and implemented:

- Traffic Management Plan, including a flood response plan to ensure safe access to and from the site:
- Landscaping Plan;
- Biodiversity Management Plan;
- Heritage Management Plan; and
- Emergency Plan.

The recommended conditions also require Lightsource BP to provide detailed final layout plans to the Department prior to construction.

Other key recommended conditions include:

- roads requiring relevant road upgrades are undertaken prior to the commencement of construction;
- biodiversity offsets retiring biodiversity offset credits in accordance with the NSW Biodiversity
 Offsets Scheme;
- flooding and water ensuring the solar panels and ancillary infrastructure (including security fencing) are designed, constructed and maintained to reduce impacts on localised flooding and groundwater at the site;
- *fire* ensuring that the development complies with the relevant asset protection requirements in the RFS's *Planning for Bushfire Protection 2006*; and

accommodation and employment – requiring an accommodation and employment strategy be
prepared and implemented to ensure there would be sufficient accommodation to house
construction workers, and to prioritise the employment of local workers.



The Department has assessed the development application, EIS, submissions, Submissions Report and amended development application provided by Lightsource BP and advice received from relevant government agencies. The Department has also considered the objectives and relevant considerations under Section 4.15 of the EP&A Act.

The project site is located in a rural area, with the nearest non-associated dwelling located about 1.7 km away from the proposed development footprint. The Newell Highway is located about 8 km southeast of the proposed site and the project would connect to the electricity network via Essential Energy's existing 132 kV overhead transmission line, which is located in close proximity to the site.

The Department considers the site to be appropriate for a solar farm as it has good solar resources and available capacity on the existing electricity network. None of the surrounding landowners provided comments or objected to the project. Views from surrounding residences and roads would mostly be screened by existing vegetation and distance to the nearest non-associated dwellings.

The project has also been designed to largely avoid key constraints, including the northern watercourse and impacts on flooding, remnant native vegetation and Aboriginal heritage items. Any residual impacts would be minor and can be managed through the recommended conditions of consent.

Following advice from Council, Lightsource BP revised the proposed transport routes to minimise the number of vehicles accessing the site via Bodells Lane, which has led to better road safety outcomes by reducing the potential for dust generation along unsealed roads.

Given the distance of the project from other proposed projects in the region, with Wyalong Solar Farm located approximately 7 km from the site and the next closest solar farm (Jemalong Solar Farm) located over 50 km from the site, there would be minimal localised cumulative impacts, including no visual or noise impacts and no cumulative impact on local roads along the project's transport route.

Both the Department and Council consider a solar farm development to be a suitable land use for the site. The project would not result in any significant reduction in the overall agricultural productivity of the region and Lightsource BP intends to graze sheep on the site during operation of the project. Additionally, the site could be returned to agricultural uses after the project is decommissioned and the inherent agricultural capability of the land would not be affected.

To address the residual impacts of the project, the Department has recommended a range of detailed conditions, developed in conjunction with agencies and Council, to ensure these impacts are effectively minimised, managed and/or offset. Lightsource BP has reviewed the conditions and does not object to them.

Importantly, the project would assist in transitioning the electricity sector from coal and gas-fired power stations to low emissions sources. It would generate over 198,000 MWh of clean electricity annually, which is enough to power over 33,600 homes and save over 190,000 tonnes of greenhouse gas emissions per year. It is therefore consistent with the goals of the *Commonwealth's Renewable Energy Target* and NSW's *Renewable Energy Action Plan*.

Further, the project includes an energy storage facility, with a capacity of 50 MW/90 MWh, that would enable the project to store solar energy for dispatch to the grid outside of daylight hours and / or during periods of peak demand, which has the potential to contribute to increased grid stability and energy security.

The Department considers that the project achieves an appropriate balance between maximising the efficiency of the solar resource development and minimising the potential impacts on surrounding land users and the environment. The project would also stimulate economic investment in renewable energy and provide flow-on benefits to the local community, through job creation and capital investment.

On balance, the Department believes that the project is in the public interest and should be approved, subject to the recommended conditions of consent.



8. Recommendation

It is recommended that the Executive Director, as delegate of the Minister for Planning and Public Spaces:

- considers the findings and recommendations of this report;
- accepts and adopts all of the findings and recommendations in this report as the reasons for making the decision to grant consent to the application;
- agrees with the key reasons for approval listed in the notice of decision;
- grants consent to the application in respect of the West Wyalong Solar Farm (SSD 9504); and
- signs the attached development consent and recommended conditions of consent (see Appendix F).

Recommended by:

Iwan Davies

Team Leader

Energy Assessments

Recommended by:

Nicole Brewer

Director

Energy Assessments

26/11/2019



9. Determination

The recommendation is Adopted / Not adopted by:

Mike Young
A/Executive Director
Energy and Resource Assessments

Appendices

Appendix A – List of Documents

West Wyalong Solar Farm Environmental Impact Statement, Urbis Pty Ltd, January 2019.

Additional information received from Lightsource BP on 15 May 2019 and 18 May 2019.

West Wyalong Solar Farm Amended Development Application letter, Lightsource BP, 12 September 2019.

West Wyalong Solar Farm Submissions Report, Urbis Pty Ltd, October 2019.

Additional information received from Lightsource BP on 3 October 2019.

Appendix B – Environmental Impact Statement

See the Department's website at:

Appendix C – Statutory Considerations

In line with the requirements of Section 4.15 of the EP&A Act, the Department's assessment of the project has given detailed consideration to a number of statutory requirements. These include:

- the objects found in Section 1.3 of the EP&A Act; and
- the matters listed under Section 4.15(1) of the EP&A Act, including applicable environmental planning instruments and regulations.

The Department has considered all of these matters in its assessment of the project and has provided a summary of this assessment below.

Aspect Summary

Objects of the EP&A
Act

The objects of most relevance to the Minister's decision on whether or not to approve the project are found in Section 1.3(a), (b), (c), (e) and (f) of the EP&A Act.

The Department is satisfied that the project encourages the proper development of natural resources (Object 1.3(a)) and the promotion of orderly and economic use of land (Object 5(c)), particularly as the project:

- is a permissible land use on the subject land;
- is located in a logical location for efficient solar energy development;
- is able to be managed such that the impacts of the project could be adequately minimised, managed, or at least compensated for, to an acceptable standard;
- would contribute to a more diverse local industry, thereby supporting the local economy and community;
- would not fragment or alienate resource lands in the LGA;
- would allow agricultural activities to continue unimpeded on half of the project site;
- is consistent with the goals of the *Renewable Energy Action Plan* and would assist in meeting Australia's renewable energy targets whilst reducing greenhouse gas emissions.

The Department has considered the encouragement of ESD (Object 1.3(b)) in its assessment of the project. This assessment integrates all significant socio-economic and environmental considerations and seeks to avoid any potential serious or irreversible environmental damage, based on an assessment of risk-weighted consequences.

In addition, the Department considers that appropriately designed SSD solar development, in itself, is consistent with many of the principles of ESD. Lightsource BP has also considered the project against the principles of ESD. Following its consideration, the Department considers that the project can be carried out in a manner that is consistent with the principles of ESD.

Consideration of environmental protection (Object 1.3(e)) is provided in **section 5.4** of this report. Following its consideration, the Department considers that the project is able to be undertaken in a manner that would improve or at least maintain the biodiversity values of the locality over the medium to long term and would not significantly impact threatened species and ecological communities of the locality. The

Aspect Summary Department is also satisfied that any residual biodiversity impacts can be managed and/or mitigated by imposing appropriate conditions and retiring the required biodiversity offset credits. Consideration of the sustainable management of built and cultural heritage (Object 1.3(f)) is provided in **section 5.4** of this report. Following its consideration, the Department considers the project would not significantly impact the built or cultural heritage of the locality. State significant Under Section 4.36 of the EP&A Act the project is considered a State significant development development. The Minister for Planning is the consent authority for the development. Under the Minister's delegation of 11 October 2017, the Executive Director, Energy and Resource Assessments, may determine the project. The Bland Local Environment Plan 2011 (Bland LEP) applies and is discussed in Environmental Planning Instruments sections 2.1, 3.2, 5.1 and 5.4 of this report, particularly regarding permissibility, land use zoning, flooding and subdivision. The project is permissible under the Infrastructure SEPP. In accordance with the Infrastructure SEPP, the Department has given written notice of the project to Essential Energy and RMS. Lightsource BP completed a preliminary risk screening in accordance with SEPP No.33 - Hazardous and Offensive Development, which determined that a Preliminary Hazard Assessment was not required. The Department's consideration of this analysis is discussed in section 5.4. The Department has considered the provisions of the SEPP (Primary Production and Rural Development) 2019. Of relevance to the project, the SEPP aims to facilitate the orderly economic use and development of lands for primary production, to reduce land use conflict and sterilisation of rural land and to identify State significant agricultural land. While the location of State significant agricultural land has not been finalised, the Department has considered all of these matters in section 5.1 of this report. The Department has considered the provisions of SEPP No. 55 - Remediation of Land. A preliminary assessment of the land found no contaminated land within the project site, and the Department is satisfied the site is suitable for the development.

Appendix D – Submissions

See the Department's website at:

Appendix E – Submissions Report

See the Department's website at:

Appendix F – Recommended Conditions of Consent

See the Department's website at: