

Planning and Development (Oaks Estate 132kV Overhead Transmission Lines, Blocks 2066 & 2242 Jerrabomberra, Block 1 Section 10 Beard and Railway Street Road Reserve) Scoping Document 2021

Notifiable instrument NI2021– 786

made under the

Planning and Development Act 2007, section 212 (Scoping of EIS)

1 Name of instrument

This instrument is the *Planning and Development (Oaks Estate 132kV Overhead Transmission Lines, Blocks 2066 & 2242 Jerrabomberra, Block 1 Section 10 Beard and Railway Street Road Reserve) Scoping Document 2021*.

2 Commencement

This instrument commences on the day after its notification day.

3 Scoping of EIS

Under section 212 of the *Planning and Development Act 2007*, the planning and land authority has prepared the scoping document in the schedule.

George Cilliers
Delegate of the planning and land authority
22 December 2021



Scoping Document

 Under Division 8.2.2 of the *Planning and Development Act 2007*

APPLICATION NUMBER: 202100042		DATE OF THIS NOTICE: 17 December 2021	
DATE LODGED: 5 November 2021			
PROJECT: The installation of approximately 230m of 132kV overhead transmission line from the ACT/NSW border to a connection point immediately east of the Oaks Estate Transgrid substation.			
IMPACT TRACK TRIGGER: Planning and Development Act, Schedule 4, Part 4.2, Item 2(a)			
BLOCK:	SECTION:	DISTRICT/DIVISION:	LESSEE/LAND CUSTODIAN:
2066	0	Jerrabomberra	Transport Canberra City Services – City Presentation
2242	0	Jerrabomberra	ACT Parks and Conservation
1	10	Beard	ACT Parks and Conservation
Railway Street Road Reserve & Un-named Road Reserve			Transport Canberra City Services – Roads ACT
ADDRESS: Railway Street, Oaks Estate			
PROPONENT: Essential Energy			
APPLICANT: Purdon Planning Pty Ltd			

SCOPING DOCUMENT

The planning and land authority (the Authority) within the Environment, Planning and Sustainable Development Directorate received your application under section 212(1) of the *Planning and Development Act 2007* (the PD Act) for the scoping of an Environmental Impact Statement (EIS) for the above proposed development. Pursuant to section 212(2) of the PD Act, the Authority has:

- a) Identified the matters that are to be addressed by an EIS in the relation to the development proposal; and
- b) Prepared a written notice (the **scoping document**) of the matters.

NB: The EIS must conform to the requirements of this scoping document. This document does not indicate approval or support in any way, nor does it indicate approval in principle.

TERM OF SCOPING DOCUMENT

Pursuant to section 213(2) of the PD Act, the proponent must give the draft EIS to the Authority by the end of the period of 18 months starting on the day the Authority gives the scoping document for the development proposal to the applicant



ACT
Government

Environment, Planning and
Sustainable Development

Scoping Document

Under Division 8.2.2 of the *Planning and Development Act 2007*

FORM AND FORMAT OF EIS

The Authority requires that the proponent engage a suitably qualified independent consultant to prepare an EIS, OR the proponent submits, with the draft EIS, an independent review of the draft EIS undertaken by a suitably qualified consultant. The EIS must be in the following form and format:

- The EIS must be prepared in accordance with section 50 of the *Planning and Development Regulation 2008*.
- The EIS must be written in plain English and avoid the use of jargon as much as possible.
- The EIS is required to be provided in the same structure as described in this Scoping Document as closely as possible. A table that cross-references the EIS to the scoping document must be included in the EIS submission.
- The report must reference any figures or supporting information used to the supporting appendix and page number, table or figure.
- Additional technical detail, including relevant data, technical reports and other sources of the EIS analysis must be provided in appendices.
- Maps, diagrams and other illustrative material should be included in the EIS to assist readers to interpret information.
- The EIS document sized A4 with maps and drawings in A4 or A3 format.
- The proponent must supply a copy of all draft EIS and revised EIS documents in electronic formats for circulation and web posting. These are to be supplied by email, USB, or another agreed method. Digital files must not exceed 20 MB each.

COST OF PREPARATION OF EIS

The proponent is responsible for the preparation of the draft and revised EIS and any related applications and associated costs. This includes hard copies of the draft and revised EIS and other associated documents as required by the Authority from time to time.

NEXT STEPS

The proponent is now required to prepare a document (a **draft EIS**) that addresses each matter raised in this scoping document for the proposal within the timeframe specified above. Once the draft EIS has been accepted for lodgement, a public notification fee is payable in order for notification, referrals and assessment to commence. After the notification period has closed, the Authority will provide comments and any public representations received for the proponent to address in preparing a **revised EIS**, and any further instructions on the application.

If you have any queries about the requirements outlined in this scoping document, please contact Hayden Pini to arrange a suitable time to discuss.

Delegate of the planning and land authority

Contact

 17/12/2021

Craig Weller
A/g Executive Branch Manager
Statutory Planning Division

Hayden Pini
Assessment Officer
Impact Assessment
E: hayden.pini@act.gov.au
T: (02) 62078728

GPO BOX 1908, Canberra ACT 2601

www.planning.act.gov.au

Authorised by the ACT Parliamentary Counsel—also accessible at www.legislation.act.gov.au

GENERAL REQUIREMENTS FOR THE EIS

1. Cover Page

The cover page
the following:

- The name of the proposal (project title)
- The block identifier(s) and street address for the proposal
- The date of the preparation of the document
- Full name and postal address of the designated proponent
- Full name and postal address of the designated applicant
- Name and contact details of the person/organisation who prepared the documents (if different to the above)

2. Glossary

Provide a glossary of technical terms, acronyms and abbreviations used in the EIS.

3. Executive Summary

Provide a non-technical summary of the EIS including a description of the proposal, key findings, and recommendations.

4. Introduction

Summarise the proposal background and justification for the proposal.

5. Proposal Details

5.1. Project Description

Provide a description of the proposal, including:

- a) The objectives and justification for the proposal;
- b) The location of the land to which the proposal relates, including detailed maps;
- c) The division and/or district names and block and/or section numbers of the land under the *Districts Act 2002*;
- d) If the land is leased – the lessee's name;
- e) If the land is unleased or public land – the custodian of the land;
- f) The purposes for which the land may be used;
- g) A clear identification of all lands subject to direct disturbance from the proposal and associated infrastructure and geomorphic features such as waterways and wetlands. This is to be supported by a map showing all affected lands;
- h) An outline of any developments that have been, or are being, undertaken by the proponent, or other person(s) or entities, within the proposal area and broadly in the region. Describe how the proposal relates to these developments;
- i) A description of all the components of the proposal, including the proposal specifications, the predicted timescale for implementation (design, approvals, construction, and decommissioning) and project life;
- j) A plan/description of the precise location of any works to be undertaken, structures to be built or elements of the proposal that may have relevant impacts; and
- k) A description of the construction methodologies for the proposal.

5.2. Alternatives to the proposal

Provide details of alternatives considered in developing the proposal including a description of:

- a) Any alternatives to the proposal and provide reasons for selecting the preferred option with an analysis of site selection as an attachment to the EIS;
- b) The criteria used for assessing the performance of any alternative to the proposal considered;
- c) Any matters considered to avoid or reduce potential impacts prior to the selection of the preferred option; and
- d) Details of the consequences of not proceeding with the proposal.

6. Legislative and Strategic Context

A description of the EIS process including any statutory approvals obtained or required for the proposal, and how the proposal is aligned with strategic priorities for the ACT.

6.1. Statutory requirements

The description must include information on statutory requirements for the preparation of an EIS, including:

- *Planning and Development Act 2007 (including confirmation of relevant Schedule 4 triggers based on impacts identified in the scoping document and any studies undertaken in preparing the draft EIS)*
- *Planning and Development Regulation 2008*
- *Environment Protection Act 1997*
- *Environment Protection Regulation 2005*
- *Nature Conservation Act 2014*
- *Tree Protection Act 2005*
- *Environment Protection and Biodiversity Conservation Act 1999 (Commonwealth)*
- *Environment Protection and Biodiversity Conservation Regulations 2000 (Commonwealth)*
- *Related statutory approvals.*

6.2. Other requirements

The description must also include information on how each of the following has been considered in the preparation of the EIS and the development of the proposal:

- Territory Plan 2008
- ACT Planning Strategy
- National Capital Plan
- *Climate Change and Greenhouse Gas Reduction Act 2010*
- The ACT Climate Change Strategy 2019-2025
- Canberra's Living Infrastructure Plan: Cooling the City
- Relevant Environment Protection Policies and Separation Distance Guidelines for Air Emissions (<https://www.environment.act.gov.au/about-us/legislation-policies-guidelines>)
- Plans of Management for any public land
- Any relevant Master Plan
- Other relevant planning and environmental guidelines, action plans and management plans.

6.2.1. Ecologically sustainable development (ESD)

Provide a description of how the proposed development demonstrates ESD. This is to include long-term and short-term considerations related to economic development, social development, and environmental protection at local, regional, and national scales. The proponent should ensure that the EIS adequately addresses the ESD principles as defined by section 9 of the PD Act.

6.2.2. Territory Plan strategic directions

A statement must be provided regarding the proposal's consistency with the principles in the Statement of Strategic Directions in the Territory Plan 2008 (Section 2.1 - Strategic Direction).

REQUIREMENTS FOR ADDRESSING IMPACTS IN THE EIS**7. Risk Assessment****7.1. Risk Assessment Methodology**

Provide a risk assessment in accordance with the Australian and New Zealand Standard for risk management AS/NZS ISO 31000:2009 *Risk Management – Principles and guidelines*. The proposed criteria for determining which risks are potentially significant impacts must be described.

-Assessment guide-			
Provide a table with the headings below to describe the risks identified and the original risk rating without any mitigation strategies in place. This table format is one option, however alternative formats can be used provided the methodology is clearly described and in accordance with AS/NZS ISO 31000:2009 <i>Risk Management – Principles and guidelines</i>			
Risk	Likelihood	Consequence	Risk rating

The Preliminary Risk Assessment (PRA) submitted as part of the request for a scoping document must be revised to include, but not be limited to, the risks identified by the Authority in Table 1. The risks identified in Table 1 are based on the scoping document application and comments received from entities on the application. All of these risks are considered potentially significant (i.e. a medium risk level or above), and must be addressed in the EIS. Should any risk levels change during the preparation of the EIS, or any new risks become apparent, these must be assessed and included with justification in the EIS, and where relevant, the residual risk assessment.

Table 1 – Identified impacts and requirements to be addressed in the EIS

Environmental Theme	Risk identified	See section/s below for further detail
Traffic and Transport	<ul style="list-style-type: none"> Road and railway traffic disruptions during construction. 	8.2.1
Utilities	<ul style="list-style-type: none"> Impacts to existing utilities. 	8.2.2
Noise, landscape and visual	<ul style="list-style-type: none"> Noise impacts from corona discharge. Visual impacts on residents. 	8.2.3
Water Quality and Hydrology	<ul style="list-style-type: none"> Impact on water quality due to potential erosion and sedimentation during and post-construction. 	8.2.4

Ecology and Natural Environment	<ul style="list-style-type: none"> • Impacts on flora during construction and operation. • Impacts on fauna and habitat during construction and operation. 	8.2.5
Heritage Objects and/or Places	<ul style="list-style-type: none"> • Impact on known heritage objects and/or places. • Impact on unknown heritage values. 	8.2.6
Socio-economic and Health	<ul style="list-style-type: none"> • Impacts to human health and safety from exposure to electro-magnetic fields (EMF) and frequencies associated with high-voltage powerlines. 	8.2.7
Hazard and Risk	<ul style="list-style-type: none"> • Impacts from construction and operation igniting bushfire. • Impacts to workers and the public during construction, maintenance, and operation. • Impacts from earth potential rise and electromagnetic induction, including any potential impact upon materials and persons in proximity to infrastructure. • Impact from potential flooding. 	8.2.8

8. Assessment of Impacts

8.1. Standard requirements

Sufficient information is required to provide the Authority with an adequate understanding of the environmental impacts associated with the proposal. Each risk identified in Table 1, and in the proponent's PRA, must be addressed and structured as set out in sections 8.1.1-8.1.5 below.

8.1.1. Environmental conditions and values

Describe the existing environmental conditions and identify the environmental values for the environmental themes identified in Table 1. This section should discuss the baseline conditions for the area.

8.1.2. Investigations

Identify the findings and results of any environmental investigation in relation to the land to which the proposal relates.

8.1.3. Impacts

Describe the effects of the environmental impact as a result of construction and operation for the environmental themes identified in Table 1 and in the proponent's risk assessment (including cumulative, consequential, and indirect effects) on physical and ecological systems and human communities. Include a discussion of the timeframes of impacts i.e. short or long term, their nature and extent and whether they are reversible or irreversible, unknown or unpredictable. Include an analysis of the significance of the relevant impacts. Information must include any technical data and other information used or needed to make a detailed assessment of the relevant impacts.

8.1.4. Mitigation

Discuss the proposed safeguards and mitigation measures proposed to be taken for the environmental management of the land to which the proposal relates for the environmental themes identified in Table 1 and the proponent's risk assessment. This is to include:

- a) A description and an assessment of the proposed impact prevention, mitigation or offsetting measures to deal with the environmental impact of the proposal, along with which stage the mitigation measures will be adopted
- b) Any statutory or policy basis for the mitigation measures
- c) An outline of an environmental management plan (EMP) that sets out the framework for continuing management, mitigation, and monitoring programs for the relevant impacts of the action, including any provisions for independent environmental auditing
- d) The frequency, duration and objectives of monitoring proposed
- e) The name of the agency responsible for endorsing or approving each mitigation measure or monitoring program
- f) A description of the cost effectiveness of environmental mitigation or rehabilitation measures proposed and the expected or predicted effectiveness of those measures.

8.1.5. Residual risk

Provide a table that details the residual risk for the potentially significant impacts identified for the environmental themes in Table 1 and the proponent's risk assessment. A residual risk assessment is only required where the significance of impact is determined as medium or above. The calculation of the residual risk should take into account the influence of implementation of mitigation or offsetting measures on the impacts identified by the risk assessment. A discussion of how the calculations were determined should also be included, including the expected or predicted effectiveness of the mitigation measures.

-Assessment Guide-				
Provide the residual risk assessment as set out in the table below.				
Risk identified in Section 7.1	Original risk rating from items identified in 7.1	Residual likelihood	Residual consequence	Residual risk rating

8.2. Detailed requirements

The following items (sections 8.2.1 - 8.2.8), relate to the potentially significant environmental impacts identified in Table 1. They must be addressed in detail in the EIS.

NOTE: The information provided under the following headings is not an exhaustive list of matters that may be required to accurately detail the assessment scenarios.

8.2.1. Traffic and transport

- Investigate the impact the development will have on traffic congestion and road and rail safety and describe the mitigation measures that will be implemented to reduce the impacts.

8.2.2. Utilities

- Describe the existing utilities located on the land subject to this development proposal.
- Describe any new utilities, removal or realignments required as a result of this development.
- Investigate potential impacts to existing utilities and infrastructure and provide mitigation measures to reduce the impacts.
- Describe how the proposal will be designed, constructed, and maintained in accordance with the relevant Australian and International Standards.

8.2.3. Landscape and visual

- Provide a visual impact assessment that analyses the visual impacts of the development on surrounding residents, including residents in NSW. The visual impact assessment must:
 - provide perspectives of the development from residential viewpoints and approach routes and provide a comparative assessment of existing and proposed views upon immediate surround and residential areas,
 - identify impacts on important viewsheds, significant views and vistas to and from the site, and on residents surrounding the development; and,
 - identify any measures to be adopted to reduce visual impacts from the infrastructure bulk and scale.

8.2.4. Water quality and hydrology

- Provide an assessment of potential impacts to waterways that may arise during and post construction of the proposed development.
- Describe any mitigation measures required to prevent sediment and erosion from impacting on water quality.

8.2.5. Ecology and Natural Environment

- Provide a description of the ecological values, including potential threatened species and their habitat on, and adjacent to the site.
- Ecological surveys by a qualified ecologist must be undertaken for each impacted species and their habitats.
- Describe the direct and indirect impacts on ecological values including maps demonstrating the areas impacted by the proposal. The description must include all areas that may be impacted by the construction and installation of the development, including pole placement, laydown, access arrangements and any areas that will be impacted by maintenance works following completion of construction.
- Provide details of the mitigation measures proposed to reduce the impacts identified on fauna species and their habitat.
- Consider the indirect impacts of the development of fauna species listed above with particular consideration of the following:
 - Increased predation efficiency and predator abundance due to the erection of poles and lines adjacent to grasslands.
 - Increased mortality of birds due to collisions with power lines, with particular consideration for Little Eagles and other avian species known to occur in the area.
- Consider the potential for weed species to be introduced to the site or indirectly onto other sites and describe weed hygiene and other mitigation and control measures that will be implemented to avoid or minimise the impact.

8.2.6. Heritage objects and places

- A Cultural Heritage Assessment (CHA) must be prepared by a suitably qualified heritage practitioner, and in consultation with Representative Aboriginal Organisations (RAOs), and must include information as required by the ACT Heritage Council's Cultural Heritage Reporting Policy available at <https://www.environment.act.gov.au/heritage/publications-and-resources>

8.2.7. Socio-economic and health

- Consider any impact upon human health and safety as a result of exposure to electro-magnetic fields (EMF) and frequencies associated with high-voltage powerlines, and compare this risk with national and international standards.

8.2.8. Hazard and risk

- Consider the risk of ignition of bushfire from a malfunction with the project.
- Consider the risk of bushfire during construction, including the cessation of construction works during periods of escalated fire danger.
- Provide detailed bushfire protection measures to be implemented in proximity to infrastructure, including asset protection zones, vegetation management/fuel load reduction strategies.
- Consider how separation to overhead conductors will be achieved for any firefighters undertaking asset protection in the event of a fire.
- Consider the risk of any potential impact upon materials and persons in proximity to any infrastructure.
 - Consider impact to surrounding residents, workers and community.
 - Consider excessive step & touch potential due to Earth potential rise (EPR) or Electromagnetic Induction (EMI) on both in-service and abandoned metallic/conductive infrastructure such as pipelines, railway tracks, rural and urban fences, streetlight poles, Telecommunication cables/cable pits. These electrical hazards can still be experienced even if the affected private and community assets are outside the transmission system easement boundary.
 - Consider the potential severity of hazards, with consideration given to current magnitude, time duration of current flow, soil electrical resistivity, earthing systems installed on both the impacted assets and the transmission line/substation infrastructure, proximity of metallic conductors (pipelines, unearthed fences, telecommunications lines as examples).
 - Consider any impact upon materials and persons in proximity to any infrastructure. Hazard mitigation measures may include greater separation distance and/or earthing of fences, conductive pipelines, communication pits, and streetlight/conductive poles, etc.
 - Consider corona discharge noise limits.
 - Consider vegetation restrictions under transmission lines.
 - Consider Electromagnetic Field (EMF) limits.
 - Consider requirements of railway owners/operators regarding 132 kV line crossings (e.g. Line strain spans, clearance heights, etc).
- Provide details of mitigation and safety measures and evidence of compliance with Australian Standards AS 7000 and AS/NZS 4853, and Other Standards as follows:

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- HB 101-1997 (CJCS) Coordination of Power and Telecommunications- Low Frequency Induction (LFI): Code of Practice for the Mitigation of Hazardous Voltages Induced into Telecommunication Lines
 - HB 102 -1997 {CJC6} Coordination of Power and Telecommunications- Low Frequency Induction.
 - ENA Doc 025 - 2010 - EG-0 Power System Earthing Guide - Part 1: Management Principles.
 - ENA EG1 - 2006 Substation Earthing Guide.
 - T HR EL 100005 ST – Requirements for Electric Aerials Crossing RailCorp Infrastructure – Transport for NSW
 - Institute of Electrical and Electronics Engineers (IEEE) 80 - Guide for Safety in AC Substation Grounding
 - Consider any potential flood risks and describe any mitigation measures to reduce the impact.

8.3. Entity requirements

The EIS must address the entities comments provided in [Attachment A](#). If the issues raised by entities have been addressed in other sections of the EIS, this must be cross referenced.

9. Community and stakeholder consultation

The intention of the consultation in this scoping document is to ensure significant proposals include meaningful engagement with the community in the early stages of the project and provide clear expectations and an understanding of the actual development proposed. Consultation also provides an opportunity for the community to contribute to the design of the proposal and to resolve any major concerns early in the planning stages.

9.1. Consultation must be undertaken with:

- Lease holders and land managers of land potentially impacted by the proposal;
- NSW residents;
- Any recreational groups which may be affected by the proposal;
- Any volunteer conservation, landscape management or land care groups active in the area to be affected by the proposal;
- The local community; and businesses owners and employees.

9.2. Provide a consultation report that includes:

- A description of the methodology and criteria for identifying stakeholders and list of stakeholders that were consulted. Details and plans must be provided showing potential impacts on the local and wider community to justify how stakeholders were identified.
- An outline of the communication methods used. A variety of communication methods must be adopted to ensure all stakeholders are engaged appropriately, such as face to face, email/letters, community meetings and information sessions and website notifications.
- Details on the information provided during the community consultation process. Note: A plain English statement explaining the proposal and conceptual drawings must be made available to the community and stakeholders.

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- A summary of the responses and the main comments raised. Evidence must be provided demonstrating that consultation has been undertaken with each relevant group/person including specific detail on how these concerns were addressed.
 - A description on how any concerns have been considered and identify any changes that have been made to the proposal.

Consultation must occur as early as possible and avoid, or make allowances for public holidays, school holidays and the summer holiday (Christmas) shutdown period. The level of engagement must be comparable with the size, location and nature of the development and potential impact on the wider community.

9.3. Consideration of public representations from Draft EIS notification

The revised EIS must include a consultation report outlining the representations received, issues raised in the representations and a response to the issues and values identified. The summary response must clearly identify the representation(s) to which the responses relate.

10. Recommendations

Provide a summary of any commitments to impact prevention, mitigation measures, offsetting measures and other actions within the EIS.

Describe the monitoring parameters, monitoring points, frequency, data interpretation and reporting proposals.

11. Other relevant information

The proponent may wish to include issues outside the scope of the EIS as a separate section of the EIS. This allows the proponent to identify matters not required to be addressed in the EIS, but that would be subject to development assessment consideration and notification. This can provide additional context for members of the public regarding management of environmental issues, by ensuring that the public is aware that these issues will be addressed in the detailed design of the proposal.

12. References

A reference list using standard referencing systems must be included.

13. Required Appendices

13.1. Scoping document for the EIS

A copy of the scoping document should be included in the EIS. Where it is intended to bind appendices in a separate volume from the main body of the EIS, the scoping document should be bound with the main body of the EIS for ease of cross-referencing.

13.2. Scoping Document Reference

Include a table that cross-references the EIS to the scoping document. If the EIS addresses the scoping document in multiple places, then this must be also referenced.

13.3. Proponent's Environmental History

Provide details of any proceedings under a Commonwealth or Territory law for the protection of the environment or the conservation and sustainable use of natural resources against:

- The person proposing to take the action
- For an action for which a person has applied for a permit, the person making the application.

If the person proposing to take the action is a corporation, then provide details of the corporation's environmental policy and planning framework. Enough information is required to satisfy s136(4) of the EPBC Act.

13.4. Information Sources

For information given the following must be stated:

- The author or any reports or studies
- The publication date
- The source of the information
- How recent the information is (i.e. when a study was conducted or when primary sources were produced)
- How the reliability of the information was tested
- What uncertainties (if any) are in the information.

13.5. Study team

The qualifications and experience of the study team and specialist sub-consultants and expert reviewers must be provided.

13.6. Specialist studies

All reports generated based on specialist studies undertaken as part of the EIS are to be included as appendices.

13.7. Research

Any proposals for researching alternative environmental management strategies or for obtaining any further necessary information should be outlined in an appendix.

GLOSSARY

Controlled Action (EPBC): An action defined under the EPBC Act, section 67.

Development application (DA): Application for development as defined under the PD Act.

ESD: Ecological Sustainable Development principles as defined by the EPBC Act and section 9 of the PD Act (i.e. sustainable development, the inter-generational equity principle and the precautionary principle).

Environment: As defined under the *Planning and Development Act 2007* (the PD Act), each of the following is part of the environment:

- (a) the soil, atmosphere, water and other parts of the earth;
- (b) organic and inorganic matter;
- (c) living organisms;
- (d) structures, and areas, that are manufactured or modified;
- (e) ecosystems and parts of ecosystems, including people and communities;
- (f) qualities and characteristics of areas that contribute to their biological diversity, ecological integrity, scientific value, heritage value and amenity;
- (g) interactions and interdependencies within and between the things mentioned in paragraphs (a) to (f); and
- (h) social, aesthetic, cultural and economic characteristics that affect, or are affected by, the things mentioned in paragraphs (a) to (f).

Environmental Impact Statement (EIS): As defined under the PD Act.

EPBC Act: *Environment Protection and Biodiversity Conservation Act 1999* (Commonwealth)

Impact Track: An assessment track that applies to a development proposal defined under the PD Act, section 123.

Long term: Greater than 15 years duration.

Medium term: Greater than three (3) years to 15 years duration.

PD Act: *Planning and Development Act 2007* (ACT)

PRA: Preliminary Risk Assessment undertaken in accordance with ACT Government's Proponent's Guide to Environmental Impact Statements.

Regulated waste: waste defined under the *Environment Protection Act 1997*

Scoping: The process of identifying the matters that are to be addressed by an EIS in relation to the development proposal - see the PD Act, Section 212 (2).

Short term: Zero to three (3) years duration.

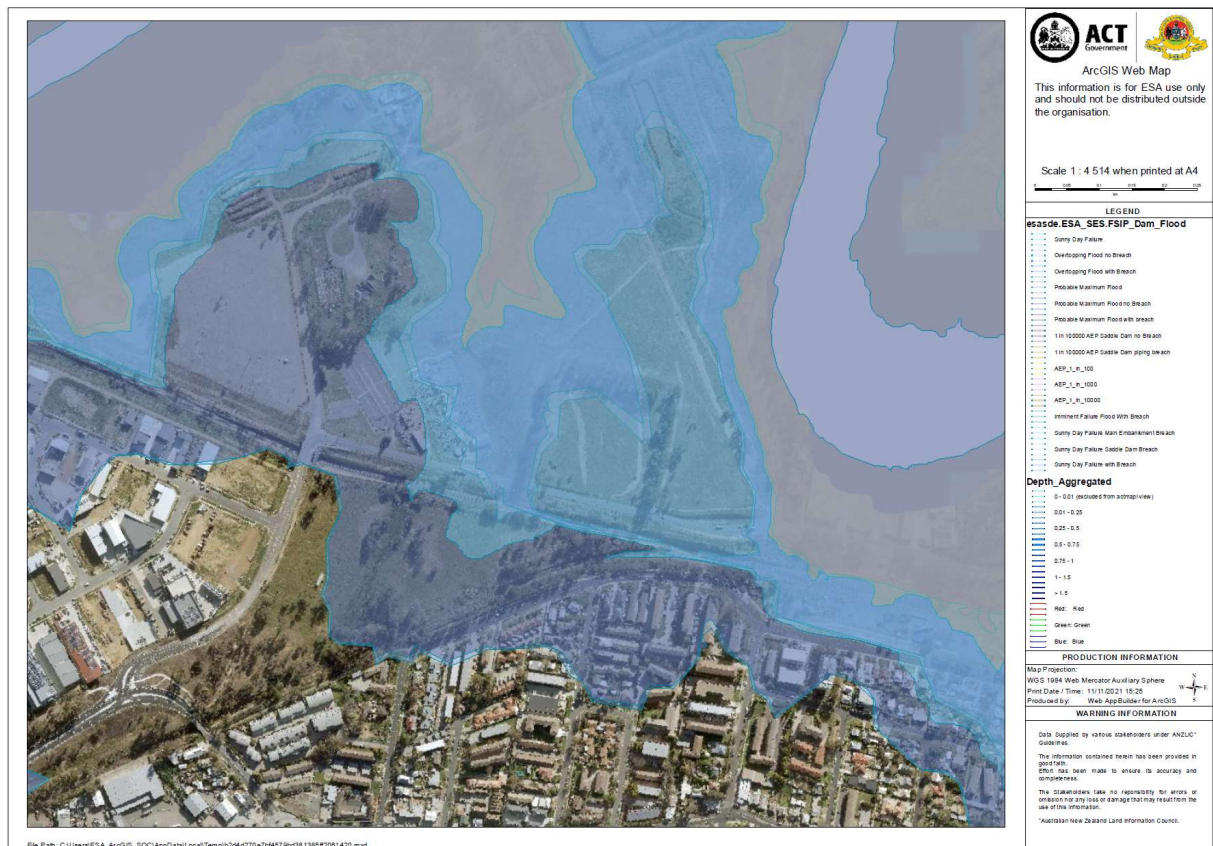
Socio-economic: Involving both social and economic factors.

The Authority: The ACT planning and land authority.

Attachment A - ENTITY REQUIREMENTS**A1. ACT Emergency Services***Identified Dam Infrastructure Failure Flood Zone:*

The proposed site is in an area that may become inundated should a dam infrastructure failure occur at Googong Dam.

While an incident of this type is rated by the ACT Government as RARE and of MEDIUM risk, it is recommended that the project risk assessment consider this risk and that specific risk control measures are detailed in the Emergency Plan for this development.

**A2. ACT Health**

The Health Protection Service (HPS) notes that a new 132 kilovolt (kV) transmission line will be approximately 230 metres long originating from the Transgrid Oaks Estate substation to south Jerrabomberra in NSW. This development will facilitate forecasted electricity demands in the area.

The HPS has reviewed the documents and advises the applicant that the HPS recommends the development of a Construction Environmental Management Plan (CEMP) with an integrated Unexpected Finds Protocol (UFP), in case there is any unforeseen contamination or hazardous materials discovered during the works.

A3. Conservator of Flora and FaunaVegetation and fauna considerations

To enable the Conservator of Flora and Fauna to assess the impact of the proposed Transmission Line, we will need information on the following matters within the proposed development area (including any areas that will be disturbed by construction equipment, access or other activities associated with the development):

- *Extent of endangered ecological communities*
- *Extent of all native vegetation communities*
- *Point data for all native species, including threatened species, where available*
- *Extent of modelled habitat for threatened species*
- *Existing connectivity modelling*
- *The proposed alignment of the transmission lines on the NSW side of the border, along with details regarding access tracks to be provided in the draft*
- *EIS.*

Avian wildlife considerations

- *Based on GPS data, Little Eagles do occur generally in the area around the proposed Oaks Estate transmission lines, but the development zone is not an area of high use.*
- *In line with advice we have provided recently for the new transmission lines along Canberra Ave and Hindmarsh Drive, we would like the potential electrocution risk to birds (including Little Eagles) to be considered, along with mitigation measures to reduce this risk, such as perch guards and line markers.*
- *Another issue that could be considered is the potential for increased predation on threatened grassland species due to the increase in perches for birds.*

Bushfire considerations

- *The project does not occur in isolation of the components that occurs in NSW and would not go ahead in the location proposed without consideration of the NSW components. The proposal appears designed to take the shortest possible route from the existing substation into NSW, from where it is assumed the lines will run SW in the railway reserve (although details are not included in the scoping application). A significant danger to bush fire fighters undertaking fire suppression is exposure to high voltage powerlines. In high temperatures, thick smoke and when high pressure hoses are being used high voltage lines can discharge to ground and injure or kill fire fighters. The development pattern in Queanbeyan has housing right up to the railway easement and this places the interface for firefighters providing asset protection in close proximity of the intended high voltage alignment. The energy industry recommends a separation of at least 25m horizontal from any fire fighter to an overhead conductor. The proponent should demonstrate how this separation will be achieved for any firefighters undertaking asset protection on the interface in Queanbeyan. Reference materials:
<https://www.essentialenergy.com.au/-/media/Project/EssentialEnergy/Website/Files/Safety/fire-safety-factsheet.pdf>, <https://www.powerlink.com.au/sites/default/files/2017-12/Fire%20and%20High%20Voltage%20Transmission%20Line%20Safety.pdf>, https://www.saiglobal.com/PDFTemp/Previews/OSH/as/misc/handbook/ENA_DOC_008-2006.pdf*

- *The risk of ignition of bushfire from a malfunction with the project should be considered.*
- *The risk to staff of bushfire during construction should be considered, including the cessation of construction works during periods of escalated fire danger.*

Water considerations

- *If the powerline is to run down the border to Tralee, there is a concern about cumulative impacts of sedimentation/erosion impacts during construction. Multiple small creeks flow from that area into Jerrabomberra creek. The soils are highly erodible, and pose a threat to Jerra creek. It also adds cumulative impacts on water quality in Lake Burley Griffin.*
- *If service roads are added to provide serviceability to the powerlines, then this poses a threat to ongoing sedimentation and erosion. Any new access roads/tracks would need to be constructed to a very high standard to mitigate additional sedimentation and erosion entering the Jerra creek system.*

A4. Environmental Protection Authority

No comments.

A5. EvoEnergy – Electricity

To date, no comment has been received.

A6. Heritage Council

The application for the EIS Scoping document states that a CHA will be completed as part of the EIS. The Council supports this as a CHA will assist in determining possible heritage impacts from the project, including any impacts on Aboriginal place, CA5. This CHA must:

- *Be undertaken by a suitably qualified heritage practitioner;*
- *Include the information as required by the Council's Cultural Heritage Reporting policy available at <https://www.environment.act.gov.au/heritage/publications-and-resources>;*
- *Include consultation with Representative Aboriginal Organisations (RAOs) about the heritage significance of any identified Aboriginal places and objects, and the impacts of proposed development or activity on Aboriginal places and objects;*
- *If the CHA identifies that proposed works will cause damage or diminish the significance of heritage places, recommendations must be presented to comply with Heritage Act 2004 provisions. This must include consideration of alternatives to avoid heritage impacts, and if these alternatives are not reasonably practicable, measures that could be adopted to minimise heritage impacts; and*
- *Dependent on the recommendations and outcomes of the CHA process Heritage Act 2004 approvals may be required. These could include an Excavation Permit and/or a Statement of Heritage Effect.*

A7. Icon Water*Analytical Services*Sewer:

- *No comments.*

Water:

- *Icon Water has bulk supply main (DN 375 mm) and reticulation mains (DN 100 mm) within study area which run parallel to proposed works. This will be approximately within 30 m range.*
- *Proposed transmission line will cross DN 100 mm reticulation main along Railway Street.*
- *Another crossing with proposed transmission line with existing bulk supply and reticulation main is at the south of block 1/ section 10.*
- *There is a PRV chamber on bulk supply main with 2 PRV inside along Rail Street.*
- *There is no existing or proposed flow meter or pressure meter within proposed study area.*

Developer Services

- *Any work(s) that require the relocation or alteration of Icon Water infrastructure must have Icon Water acceptance prior to any work being undertaken. This requirement is additional and separate to approval of this EIS.*

Building Approvals

- Any work(s) or structure(s) that are likely to impact on the Icon Water infrastructure must have Icon Water acceptance prior to any work being undertaken. This requirement is additional and separate to approval of this EIS.

A8. Jemena

No comments.

A9. National Rail Safety Regulator

To date, no comment has been received.

A10. Queanbeyan-Palerang Regional Council:

To date, no comment has been received.

A11. Transport Canberra and City Services

- The proposal must consider the SW network and assets when proposing the location of new structures.
- The proposal must be a subject to the DA and post-DA processes and assessment by Development Coordination, TCCS.
- The proposal should avoid removal of any street trees. Should any street trees be impacted by the proposal, a trees assessment by an appropriate qualified profession must be submitted.

A12. Utilities Technical Regulator

The outline of the proposed project has not identified and considered potential electrical hazards and risks arising from the proposed 132 kV overhead transmission lines.

Transmission infrastructure such as 132 kV transmission lines and zone substations may cause hazardous electrical conditions or problematic issues (especially if transmission lines run approximately parallel to or are in close proximity to or cross other metallic/conductive assets, or substations are nearby).

Potential problem issues/risks that must be assessed and addressed by the project proponent included:

- *Excessive step & touch potentials due to earth potential rise (EPR) or electromagnetic induction (EMI), on both in-service and abandoned metallic/conductive infrastructure such as pipelines, railway tracks, rural and urban fences, streetlight poles, Telecommunication cables/cable pits. These electrical hazards can still be experienced even if the affected private and community assets are outside the transmission system easement boundary (eg. TransGrid have a development exclusion/restriction distance that can extend beyond the easement boundary - Information is available on their website). Hazard mitigation measures may include greater separation distance and/or earthing of fences, conductive pipelines, communication pits, and streetlight/conductive poles, etc.*
- *Corona discharge noise limits being exceeded.*
- *Tree planting restrictions under transmission lines.*
- *Electromagnetic Field (EMF) limits also need to be observed.*

-
- *Requirements of railway owners/operators regarding 132 kV line crossings (eg. Line strain spans, clearance heights, etc).*

Relevant Australian and International standards, industry codes/guidelines and UTR technical codes need to be observed for acceptable designs and avoidance of electrical safety hazards (eg. AS 7000, AS EGO, AS EG1, AS/NZS 4853, HB 101 and HB 102, IEEE 80, RailCorp T HR EL 10005 ST Standard).