

EPBC Act referral



Australian Government
Department of Agriculture, Water and the Environment

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Title of proposal	2021/8992 - Natta 3D Seismic Acquisition Survey, 36 km east of Dongara, Western Australia
Section 1	
Summary of your proposed action	
1.1 Project industry type	Exploration (mineral, oil and gas - non-marine)
1.2 Provide a detailed description of the proposed action, including all proposed activities	
<p>Strike West Pty Ltd (Strike Energy; the Proponent) is proposing to undertake a three-dimensional (3D) seismic acquisition survey (Natta 3D Seismic Survey, the Proposed Action) within EP 320, EP 368, EP 426, EP 469 and petroleum license L 22; and acquisition of 2D seismic data along a single (east-west) seismic line within EP 320, to tie into the existing Munganooka 1 well (Figure 1).</p> <p>The Proposed Action will largely be undertaken Unallocated Crown Land (UCL) and agricultural land. The seismic lines have been aligned to use previously cleared areas where possible to undertake the Proposed Action with the minimum amount of clearing and disturbance of native vegetation. The Proposed Action will require temporary disturbance of no more than 67.98 ha of native vegetation (disturbance footprint) to create access tracks for the vibroseis trucks and light vehicles.</p> <p>The Proposed Action is located within the Shires of Irwin, Mingenew and Three Springs in the Midwest region of Western Australia (WA) and comprises the completion of 525.5 Line kilometres (Lkm) of seismic survey, of which approximately 194 Lkm where clearing is required.</p> <p>The Proposed Action covers an area of approximately 15,854 ha within the Perth Basin (the Proposed Action Area). The western extent of the Proposed Action Area is approximately 36 km east of Dongara and the eastern extent is approximately 15 km south Mingenew and 40 km northwest of Three Springs. The Proposed Action Area extends along Yandanooka West Road (north) and Tomkins Road (south).</p> <p>Where native vegetation is required to be cleared for the creation of tracks, this will occur via 'single-pass' cutting vegetation above ground level using cutting and mulching, as close to the ground surface as possible, leaving topsoil and root-stock undisturbed. Cut vegetation will be mulched and returned to its place of origin along lanes.</p> <p>The seismic survey is proposed to be undertaken between February 2022 and April 2022 over a total activity period of 13 weeks (including mobilization and demobilization).</p>	
1.3 What is the extent and location of your proposed action?	
See Appendix B	
1.5 Provide a brief physical description of the property on which the proposed action will take place and the location of the proposed action (e.g. proximity to major towns, or for off-shore actions, shortest distance to mainland)	
<p>The Proposed Action will take place in the Shires of Irwin, Mingenew and Three Springs in the Midwest region of WA, within petroleum exploration permits EP 320, EP 368, EP 426, EP 469 and petroleum license L 22, approximately 50 km southeast of Dongara and 234 km north of Perth. The western extent of the Project Area is approximately 36 km east of Dongara and the eastern extent is approximately 15 km south Mingenew and 40 km northwest of Three Springs. Land uses within the Project Area include agricultural, gas infrastructure, rehabilitation and public roads.</p> <p>The Project Area contains approximately 6,546 ha of native vegetation, with the remaining 9,308 ha has been cleared for farming and infrastructure. The Proposed Action will largely be undertaken on UCL and agricultural land, and the seismic lines have been aligned to use previously cleared areas where possible to minimize disturbance to native vegetation (refer Figure 1).</p>	
1.6 What is the size of the proposed action area development footprint (or work area) including disturbance footprint and avoidance footprint (if relevant)?	
<p>The Proposed Action boundary comprises approximately 15,854 ha within the Perth Basin. The disturbance footprint refers to the seismic lines that require disturbance to native vegetation (the clearing area; the disturbance footprint), which is a total of up to 67.98 ha and comprises approximately 194 Lkm of seismic lines at approximately 3.5 m width (refer Figure 2).</p>	
1.7 Proposed action location	
Address - Yandanooka West Road, Mooriary, WA, 6522, Australia	



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1.8 Primary jurisdiction	Western Australia
1.9 Has the person proposing to take the action received any Australian Government grant funding to undertake this project?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
1.10 Is the proposed action subject to local government planning approval?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
1.11 Provide an estimated start and estimated end date for the proposed action	Start Date 01/02/2022 End Date 29/04/2022
1.12 Provide details of the context, planning framework and state and/or local Government requirements	
<p>Commonwealth:</p> <p>Environment Protection and Biodiversity Conservation (EPBC) Act 1999 (this Referral) - The Act is the primary Commonwealth legislation directed to protecting the environment in relation to Commonwealth land and controlling significant impacts on matters of national environmental significance. The Act requires assessment and approval of actions that are likely to have a significant impact on a matter of national environmental significance or are undertaken by a Commonwealth agency or involve Commonwealth land and will have a significant impact on the environment. The EPBC Act also protects a range of shorebirds listed under the JAMBA and CAMBA Migratory Bird Agreements.</p> <p>State:</p> <p>Petroleum and Geothermal Energy Resources Act 1967 (WA) - All onshore petroleum activities are regulated through the Petroleum and Geothermal Energy Resources Act 1967 (PGER Act) and its associated Petroleum and Geothermal Energy Resources (Environment) Regulations 2012. The Proposed Action Area is primarily within Petroleum Exploration Permit 469. Under the Regulations, an Environment Plan (EP) must be prepared and approved by the Department of Mines, Industry Regulation and Safety (DMIRS) [WA]. The Regulations mandate that any petroleum activity is carried out in a manner consistent with the principles of Ecologically Sustainable Development (ESD). The EP presents a detailed description of the project, the legislative framework, the existing environment and an Environmental Impact Assessment (EIA).</p> <p>Environmental Protection Act (EP Act) 1986 - The EP Act is the primary legislation that governs environmental impact assessment and environmental protection in WA. Significant proposals require referral to the Environmental Protection Authority (EPA) under Section 38 (s38) of the EP Act. A Memorandum of Understanding (MOU) 2016 has also been established between DMIRS and the EPA Services to ensure an efficient and transparent administrative process for DMIRS to refer petroleum activities that have or are likely to have significant environmental impacts to the EPA. The significance of the Proposed Action Area, and associated referral requirement, has been considered by Strike Energy. The Proposed Action requires the disturbance of native vegetation which supports State-listed species and communities and is concurrently being referred to the EPA under s38 of the EP Act for a decision on whether or not formal environmental impact assessment is required.</p> <p>Approval Bilateral Agreement between Western Australia and Commonwealth - Should the Department of Agriculture, Water and the Environment (DAWE) and the EPA decide that the Proposed Action is both a controlled action and a significant proposal, it could be assessed under the EPBC Act accredited process by WA authorities.</p> <p>Environmental Protection (Clearing of Native Vegetation) Regulations 2004 (WA) - Vegetation clearing associated with low impact petroleum exploration activities carried out under the PGER Act 1967 is exempt from a clearing permit under Regulation 5, Item 20, Part V of the EP Act 1986 provided the clearing occurs outside of Environmentally Sensitive Areas (ESAs). This exemption does not apply for areas declared under Section 5B of the EP Act 1986 and managed for the purpose of conservation. Clearing, the proposal may be assessed under the Part V (Clearing Permit) of the EP Act. This assessment process is also accredited under State/Commonwealth Approval Bilateral Agreement to assess a proposal that is considered a "controlled action" under the EPBC Act. Clearing of native vegetation needed for the Proposed Action will either be assessed under Part IV of the EP Act (as described above) or through a Native Vegetation Clearing Permit.</p> <p>Native Title Act 1993 (Commonwealth) - The Project Area is located within the Yamatji Nation Claim area (as awarded in February 2020).</p>	



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Aboriginal Heritage Act 1972 (WA) - The Aboriginal Heritage Act (AH Act) 1972 provides provisions for the preservation on behalf of the community of places and objects customarily used by or traditional to the original inhabitants of Australia or their descendants, or associated therewith, and for other purposes incidental thereto. No Registered Aboriginal Sites occur within the Proposed Action Area. Strike Energy will comply with the requirements of the AH Act and ensure ongoing consultation with Traditional Owners and any pre-clearance requirements.

1.13 Describe any public consultation that has been, is being or will be undertaken, including with Indigenous stakeholders

Strike Energy as the operator of EP 469 for the Joint Venture between Warrego Energy Pty Ltd (Warrego) and Strike Energy, has been consulting with stakeholders according to the West Erregulla Project Stakeholder Engagement Strategy. This process is ongoing and includes consulting landholders regarding land access requirements for the Natta 3D Seismic Survey.

Warrego Energy, as previous operator of the permit, consulted with the Amangu People and their representatives, the Yamatji Marlpa Aboriginal Corporation, following the acquisition of EP 469 in 2008 with respect to their native title claim (WC04/2) over lands including the Project Area. A Heritage Protection Agreement (HPA) with the Amangu People for undertaking low impact and ground disturbing petroleum operations on the land within EP 469 (previously referred to as EP 25/07-8) has been in place since 2009, but remains unsigned.

A cultural heritage survey was conducted by Terra Rosa Cultural Resources Management (Terra Rosa), with the Amangu Traditional Owners, the Yamatji Marlpa Aboriginal Corporation and Warrego Energy in February 2014 (Terra Rosa, 2014). The Survey identified two (2) restricted access areas, both of which are located along Sand Plain Creek. Awareness regarding these and other Cultural Heritage aspects will be included in all site inductions.

Strike Energy will continue to consult and engage with these stakeholders to implement the Cultural Heritage Management Plan, and amend as appropriate, and ensure an appropriate level of awareness of all Strike Energy personnel and contractors with regard to cultural heritage matters.

1.14 Describe any environmental impact assessments that have been or will be carried out under Commonwealth, State or Territory legislation including relevant impacts of the project

Environmental impacts being considered in this referral include direct impacts resulting from mulching of native vegetation including temporary loss of habitat for flora and fauna species, including Black Cockatoo habitat; indirect impacts on surface and groundwaters in the event of a fuel spill.

In the event that formal assessment is not required, a clearing permit application will be lodged under Part V of the EP Act.

An assessment of the environmental impacts for the Proposed Action has been conducted as required under the PGER Act, in accordance with the Department of Mines and Petroleum (DMP) guideline, the "Guideline for the Development of Petroleum and Geothermal Environment Plans in WA – November 2016". The Environment Plan will be submitted to DMIRS for assessment following this referral.

1.15 Is this action part of a staged development (or a component of a larger project)?

Yes No

1.16 Is the proposed action related to other actions or proposals in the region?

Yes No



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Section 2

Matters of national environmental significance

2.1 Is the proposed action likely to have any direct or indirect impact on the values of any World Heritage properties?

Yes No

2.2 Is the proposed action likely to have any direct or indirect impact on the values of any National Heritage places?

Yes No

2.3 Is the proposed action likely to have any direct or indirect impact on the ecological character of a Ramsar wetland?

Yes No

2.4 Is the proposed action likely to have any direct or indirect impact on the members of any listed species or any threatened ecological community, or their habitat?

Yes No

Species or threatened ecological community

Beautiful Daviesia (*Daviesia speciosa*) [Threatened]

Impact

Beautiful Daviesia is known from five (5) populations north-east of Eneabba, WA. Its range extends over 40 km. Two (2) populations occur within Tathra National Park and in gravel pits beside road verges near Mingenew, and there are an estimated 850 plants in total. The plants grow in dense low shrubland in shallow, gravelly sand over gravelly, red clay or lateritic loams. New stems are produced from the rootstock following disturbance and it flowers from March to June (DEWHA 2008).

The site survey (Strategen-JBSG 2021a) recorded two (2) individuals of *Daviesia speciosa*, within the Proposed Action Area, with this taxon located on the top a steep laterite ridge. The survey was completed during the main flowering season for flora in the mid-west botanical region and for the listed Threatened flora species identified as having the potential to occur in the Proposed Action area.

Impacts to these individuals recorded will be avoided through deviation of the seismic lines by at least a 50 m radius. No significant impact to the species is expected as a result of the Proposed Action.

The known locations of these species will be demarcated using GPS data points, entered into the GPS navigation system used during the Proposed Action and the seismic survey lines have been deviated to avoid direct Impacts to these individuals.

Refer to Attachment 1 (Att-1 Flor&Veg Survey, Section 3.1).

Species or threatened ecological community

Sandplain Duck Orchid (*Paracaleana dixonii*) [Threatened]

Impact

A considerable number of *Paracaleana dixonii* were identified by Ecologia in 2011 (Ecologia 2012) adjacent to the Proposed Action Area. Some of the areas where *Paracaleana dixonii* occurred was burned during the 2018/19 fire season. No *Paracaleana dixonii* were identified by Strategen-JBS&G during the 2020 survey (Strategen-JBS&G 2021a). There is potential for this species to be present and not recorded within these areas. This is likely due to an absence of above ground features



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during the survey period. Although fire plays an important part in the flowering of the species, burning may be detrimental if it occurs during the growing period (May to December). Given this, recovery of individuals post fire may be sporadic.

The Proposed Action will be undertaken during the during the dormant period (January to April) to prevent damage to vegetative structures and as such is not considered to impact on this species.

Refer to Attachment 1 (Att-1 Flor&Veg Survey, Section 3.1).

Species or threatened ecological community

Carnaby's Black-Cockatoo (*Calyptorhynchus latirostris*) [Endangered]

Impact

The Proposed Action Area is located at the northern limit of the breeding range and within the non-breeding range for the species. Habitat and targeted fauna surveys completed in Spring 2020 determined that there is approximately 6,546 ha of mapped potential foraging habitat within the Proposed Action Area which ranges between 'Low' (330.40 ha) and 'Low to Moderate' quality (5,913.53 ha) [Strategen-JBS&G 2021b]. The Survey did not identify any potential hollow bearing trees or suitable breeding habitat within the Project Area (Strategen-JBS&G 2021b). Roost sites for Carnaby's Black-Cockatoo (CBC) are known in the general region of the Proposed Action Area, with the nearest known roost locations situated approximately 17.5 km to the southeast and 20 km northwest of the Survey Area.

The Proposed Action will result in the clearing of up to 67.98 ha of potential habitat (1.67 ha of low and 62.21 ha of low to moderate foraging habitat) for the species. This represents 1% of the mapped habitat within the Project Area. No breeding trees occur within the Project area and foraging habitat is expected to be regeneration at the completion of the Proposed Action.

Refer to Attachment 2 (Att-2-Fauna Survey, Section 3.1)

2.4.2 Do you consider this impact to be significant?

Yes No

2.5 Is the proposed action likely to have any direct or indirect impact on the members of any listed migratory species or their habitat?

Yes No

Migratory species

Fork-tailed Swift (*Apus pacificus*) [Listed Migratory species under CAMBA, JAMBA, ROKAMBA]

Impact

Potential to occur based on presence of habitat. This species is almost exclusively aerial and is unlikely to be reliant on habitat within the Proposed Action Area. Given the temporary disturbance to native vegetation (67.98 ha cleared by mulching) and that this represents 1.0% of the native vegetation within the Proposed Action Area, no impacts to this species are anticipated as a result of the Proposed Action.

2.5.2 Do you consider this impact to be significant?

Yes No

2.6 Is the proposed action to be undertaken in a marine environment (outside Commonwealth marine areas)?

Yes No

2.7 Is the proposed action likely to be taken on or near Commonwealth land?

Yes No



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2.8 Is the proposed action taking place in the Great Barrier Reef Marine Park? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
2.9 Is the proposed action likely to have any direct or indirect impact on a water resource from coal seam gas or large coal mining development? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
2.10 Is the proposed action a nuclear action? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
2.11 Is the proposed action to be taken by a Commonwealth agency? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
2.12 Is the proposed action to be undertaken in a Commonwealth Heritage place overseas? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
2.13 Is the proposed action likely to have any direct or indirect impact on any part of the environment in the Commonwealth marine area? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No



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Section 3

Description of the project area

3.1 Describe the flora and fauna relevant to the project area

The Proposed Action is located within the Lesueur Sandplain IBRA Subregion which is dominated by Banksia or Tuart on sandy soils, Casuarina obesa on outwash plains and paperbark (Melaleuca) in swampy areas (Mitchell et al. 2002).

Flora:

A desktop survey determined that five (5) listed threatened species have previously been identified within the Proposed Action Area:

- * Daviesia speciosa (T-EN);
- * Eucalyptus crispata (T-EN);
- * Eucalyptus leprophloia (T-EN);
- * Paracaleana dixonii (T-VU); and
- * Thelymitra stellata (T-EN).

The site survey recorded one (1) Threatened flora species, Daviesia speciosa, on two (2) separate occasions. The survey was completed during the main flowering season for flora in the Midwest Botanical Region and for the listed Threatened flora species identified as having the potential to occur in the Proposed Action Area (Strategen-JBS&G 2021a). A further 6 Priority (State) flora species were recorded during the 2020 ecological survey (Strategen-JBS&G 2021a) [Figure 5].

Previous surveys completed in the vicinity of the Proposed Action Area (e.g., Ecologia 2012) identified a considerable number of Paracaleana dixonii (Vulnerable). These areas were subsequently burnt during the 2018/19 fire season and no individuals were identified during the 2020 ecological survey (Strategen-JBS&G 2021a). It should be noted that there is potential for this species to be present and not recorded within these areas. This is likely due to an absence of above ground features during the survey period.

Threatened and Priority Ecological Communities:

No Threatened or Priority Ecological Communities (TECs/PECs) were recorded within the Proposed Action Area (Ecologia 2012; Strategen-JBS&G 2021a).

Fauna:

An ecological survey (Strategen-JBS&G 2021b) and assessment of the fauna habitats and terrestrial fauna identified:

* Four (4) habitats within the Proposed Action Area comprising proteaceous shrubland eucalypt woodland, lateritic ridges and rises and riparian areas (Figure 6). All habitats are considered to be well represented within the local and regional area.

* 330.4 ha of 'Low' quality and 5,913.53 ha of 'Low to Medium' quality value Carnaby's Black-Cockatoo foraging habitat (Figure 7).

* Only one (1) listed threatened species (Carnaby's Black-Cockatoo: Endangered) is considered likely to occur. It is considered likely to be a regular migrant that may utilize the remnant native vegetation habitats within the Proposed Action Area to forage. Noting that the Proposed Action is located at the northern most extent of the mapped breeding range for Carnaby's Black-Cockatoo (DSEWPac 2012). Carnaby's Black-Cockatoo forages in proteaceous heath, banksia woodlands and eucalypt woodlands. This foraging habitat does occur in the Proposed Action Area. Breeding is considered unlikely given the lack of suitable large trees across the Proposed Action Area (Coffey 2013). Roost sites for Carnaby's Black-Cockatoo are known in the general region. The nearest known roost locations are situated approximately 17.5 km to the southeast and 20 km northwest of the Survey Area (Figure 8).

3.2 Describe the hydrology relevant to the project area (including water flows)

Surface Water:

The coastal region between Perth and Geraldton is dominated by the Swan Coastal Plain, a low-lying, gently undulating plain with numerous wetlands and coastal sand dunes (DoW 2017). The Proposed Action Area exists on two (2) hydrographic catchments, both of which are within the larger Greenough River basin:

- * Arrowsmith River Catchment; and
- * Irwin River Catchment.

Within the Proposed Action Area there are numerous ephemeral surface water courses and lakes, including the named



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Beharra Spring, ArrowSmith River and Sand Plain Creek. The Greenough catchment is fed by runoff from the Woolalong Hills, passing through the Waterloo Ranges before descending to the coastal plain from which numerous surface water bodies originate including the Irwin River and Lockier River.

Most surface water drainage patterns near the Proposed Action Area are generally towards the west, reflecting the general slope of the landscape. The Proposed Action's activities will not impact surface waters.

No geomorphic, Nationally Important (Directory) or RAMSAR-listed wetlands are present within the Proposed Action Area (DAWE).

Groundwater:

The largest fresh groundwater resources within the northern Perth Basin are in the Superficial/Surficial, Leederville, Leederville-Parmelia and Yarragadee aquifers. There are also three (3) secondary aquifers: the Mirrabooka, Cattamarra and Eneabba-Lesueur aquifers. In addition to these groundwater resources, there are minor shallow and fractured-rock aquifers that are locally significant sources of water. Hydraulic connection between aquifers is often impeded across faults and low permeability units, both within and between aquifers (DoW 2017).

Groundwater is contained within superficial aquifers including the Leederville aquifer west of the Proposed Action, the Leederville-Parmelia aquifer east of the Proposed Action and the Yarragadee aquifer on the coastal plain and the Dandaragan Land System (DoW 2017). Groundwater is understood to be fairly shallow with a depth of <20 mbgl and the groundwater quality in the general area is understood to be marginal (as per Perth Groundwater map), with a salinity of 500 to 1000 mg/L (Perth groundwater map, DWER).

The Leederville aquifer comprises sandstone and shale with a thickness of up to 550 m. The aquifer is semi-confined to confined with a generally fresh groundwater quality. The Leederville-Parmelia aquifer consists of the interconnected Leederville formation and the Parmelia Group, comprising sandstone and shale. The aquifer is semi-confined to the north becoming confined to the south with generally fresh groundwater quality.

The Yarragadee Formation comprises sandstone, shales and siltstone, varies in thickness between 500 and 2,000 m and extends to depths of up to 2,000 m below existing ground level (mbgl). The aquifer is unconfined to confined with generally fresh groundwater quality, but high groundwater salinity exists along the Darling Fault, located approximately 20 km east of the Proposed Action.

The Proposed Action is situated within the Parmelia group which consists of sandstone, siltstone and shale that were deposited across the east of the northern Perth Basin in a fluvial to lacustrine environment during the Early Cretaceous. Within the Parmelia Group, the Proposed Action is situated within the Leederville-Parmelia and Perth-Otorowiri confined aquifers (DOW 2010). The Parmelia formation is underlain by the Yarragadee Formation that consists of felspathic sandstone, siltstone, and claystone.

The Proposed Action is located within the Arrowsmith Groundwater Management Area, as proclaimed under the Rights in Water and Irrigation Act 1914 (RIWI Act). No groundwater abstraction is required for the Proposed Action.

The main use of groundwater in the area from the Yarragadee Formation aquifer is irrigation and cattle grazing.

3.3 Describe the soil and vegetation characteristics relevant to the project area

Geology:

The Perth Basin is an onshore and offshore sedimentary basin that extends approximately 1,300 km along the southwestern margin of the Australian continent. The basin formed during the separation of the Australian and Great Indian plates in the Permian to early Cretaceous (Geoscience 2020).

The basin is structurally complex because of rifting between the Permian and Cretaceous periods. The basin comprises sandstones, siltstones, shales, and limestones which are sources and reservoirs of the oil and gas reserves being explored by Strike Energy.

Soil:

The Geraldton Sandplains are characterized by a series of old dunes which run parallel to the coast. The younger Quindalup dunes occur near the contemporary coastline, with the Spearwood dunes occurring further inland. The soils are typically sandy with some areas of exposed limestone, and a series of wetlands occurs along the plains. In the east lateritic rises occur.



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The Proposed Action covers several soil-landscape systems as described below (CSIRO 1991):

* AC3 - Gently undulating plateau underlain by sedimentary rocks: chief soils are yellow earthy sands (Uc5.22) with a higher clay content than those of unit AC2. Associated are patches of (KS-Uc2.12), (Dy5.84), and gravelly (Dy5.82) soils; minor areas of (Uc1.22) soils; and inclusions of unit Ub101 soils near areas of major dissection;

* JK9 - Undulating dune landscape with some steep dune slopes and underlain by aeolianite at depth: chief soils are brown sands (Uc4.22). Associated are siliceous sands (Uc1.22) on the deeper dunes, especially on the western side of the unit; and leached sands (Uc2.21) on the more subdued dunes, especially on the eastern side of the unit;

* Wd9 - Broad valleys and undulating interfluvial areas with some discontinuous breakaways and occasional mesas; lateritic materials mantle the area: chief soils are sandy acidic yellow mottled soils, (Dy5.81) containing much ironstone gravel in the A horizons, and (Dy5.84), both forming a complex pattern with each other and with lateritic sandy gravels (KS-Uc2.12). Associated are leached sands (Uc2.21) underlain by lateritic gravels and mottled clays that occur at a progressively greater depth down slope;

* Ca27 - Sandy plains with occasional pockets of sand dunes, a few small swamps, and stream courses: chief soils are leached sands (Uc2.21), often with a sandy clay substrate between 3 and 6 ft in depth. Associated are (Dy5.61) and gravelly (Dy5.81) soils with (Uc1.22) soils on the dunes; and

* Ub97 - Very gently undulating plain: chief soils are neutral, and also alkaline, yellow mottled soils (Dy3.42 and Dy3.43) overlying siliceous pans at depth.

Acid Sulfate Soils (ASS) are naturally occurring, iron-sulfide rich soils, sediments, or organic substrates, formed under waterlogged conditions. If exposed to air, these sulfides can oxidize and release sulfuric acid and heavy metals. This process can occur due to drainage, dewatering or excavation. A review of the Australian Soil Resources Inquiry System database indicated that there are no mapped risks ('extremely low probability') of ASS within the Proposed Action Area.

Regional Vegetation - IBRA Region & Subregion:

The Proposed Action occurs within the Lesueur Sandplain IBRA Subregion which is dominated by Banksia or Tuart on sandy soils, Casuarina obesa on outwash plains and paperbark (Melaleuca) in swampy areas (Mitchell et al. 2002).

Vegetation Types:

The Proposed Action spans two (2) vegetation systems, Tathra, and Eridoon and four (4) vegetation associations. At a vegetation association level, the Proposed Action Area comprises four (4) Beard (1981) associations which are well represented on the Lesueur Sandplains Subregion (GoWA 2019a):

* Eridoon 378 - Shrublands; scrub-heath with scattered Banksia spp, Eucalyptus tottiana & Xylomelum angustifolium on deep sandy flats in the Geraldton Sandplain Region;

* Tathra 49 - Shrublands; mixed heath;

* Tathra 352 - Medium woodland, York gum; and

* Tathra 379 - Shrublands; scrub-heath on lateritic sandplain in the central Geraldton Sandplain Region.

With the exception of the Beard (1981) Vegetation Association Tathra 379, the vegetation associations to be impacted exist at > 30% of their original extent. The current extent of Tathra 379 is 23.74%.

3.4 Describe any outstanding natural features and/or any other important or unique values relevant to the project area

No conservation reserves or other lands managed by the WA Department of Biodiversity, Conservation and Attractions occur within the Proposed Action Area. The nearest Conservation Reserve is Yandanogo Nature Reserve, approximately 13.7 km to the west of the Proposed Action.

3.5 Describe the status of native vegetation relevant to the project area

Ecological surveys (Strategen-JBS&G 2021a) delineated five (5) vegetation types within the Proposed Action Area (Figure 2), consisting of low mixed heathlands associated with laterite (VT 1, 486.69 ha); Shrubland associated with drainage lines (VT 2, 330.40ha); Banksia heathland associated with areas of yellow or grey-brown sand (VT 3, 1,637.77 ha); Low woodland over shrubland associated with areas (VT 4, 3,719.07 ha); cleared or cropped land (9,308.28 ha) and an 'Unsurveyed' being an area not accessible during the Survey (301.85 ha) [Strategen-JBS&G 2021a].

The majority of vegetation within the Project Area and surrounds is intact and has not been subjected to any significant disturbance (Figure 4). Disturbance is usually related to historical access lines for exploration drilling and seismic surveys, firebreaks and vehicle tracks. As such, vegetation condition within the Proposed Action area is predominantly in Excellent to Pristine condition (EPA 2016) .

Reduced vegetation condition occurs where human/livestock traffic is frequent such as farmland and near tracks (Strategen-JBS&G 2021a). Man-made disturbances in the area included access tracks; exploration tracks for drilling or seismic surveys; borrow pit; fences and firebreaks; stock grazing; off-track vehicle traffic; and man-made structures such as



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sheds.

In addition to man-made disturbance, the Project Area has a varied fire history, with the most recent occurring in 2018. While the floristic composition has been impacted, no evidence of frequent fire impacts were recorded.

3.6 Describe the gradient (or depth range if action is to be taken in a marine area) relevant to the project area

Landforms across the Proposed Action Area can be described as undulating with well-defined ridge lines (lateritic) and breakaways towards the west and south west with ground levels varying between 140 m above Australian Height Datum (AHD) to 220 mAHD. An ephemeral drainage channel traverses from the southeast to the north with ground levels of between 175 mAHD and 120 mAHD, respectively (Landgate 2021).

3.7 Describe the current condition of the environment relevant to the project area

The Proposed Action Area contains approximately 6,546 ha of native vegetation, with the remaining 9,308 ha has been cleared for farming and infrastructure. The Proposed Action will largely be undertaken on Unallocated Crown Land and agricultural land used for livestock and cereal cropping.

The majority of native vegetation within the Proposed Action Area and surrounds is intact and has not been subjected to any significant disturbance. Disturbance is usually related to historical access lines for exploration drilling and seismic surveys, firebreaks and vehicle tracks. Native vegetation condition within the Proposed Action Area is predominantly in 'Excellent to Pristine' condition, with few weeds and high native species richness (Strategen-JBS&G 2021a).

Glevan Consulting (2012) undertook an assessment for the presence of Phytophthora dieback within EP 469. No areas of remnant vegetation within the UCL were observed to be affected, infected or altered by any previous introduction of Phytophthora dieback, and therefore the majority of the area surveyed was classified as 'uninfested (Protectable)'.

The uninfested (Protectable) dieback management area is assigned to the areas of native vegetation within UCL. This means that the UCL is currently considered free from the Phytophthora Dieback disease and is able to be protected from the introduction of dieback arising from project operations provided appropriate management measures are in place.

The unmappable dieback management area is assigned to the remainder of the land within EP 469 due to the absence of suitable indicator species.

3.8 Describe any Commonwealth Heritage places or other places recognised as having heritage values relevant to the project

Not applicable. No Commonwealth Heritage places or other places recognised as having heritage values relevant to the project area.

3.9 Describe any Indigenous heritage values relevant to the project area

In WA, the Aboriginal Heritage Act 1972 (AH Act) protects Aboriginal sites defined under Section 5 of the Act. It is an offence under Section 17 of the AH Act to excavate, destroy or damage a site unless the person is acting with the authorisation of the Registrar under Section 16, or the consent of the Minister under Section 18 of the AHA.

A place search for Aboriginal heritage was conducted in January 2021 on the Department of Planning, Lands and Heritage (DPLH) database.

No registered Aboriginal heritage sites are located within the Proposed Action Area, therefore do not require assessment against Section 5 of the Aboriginal Heritage Act 1972; however, there are three (3) Aboriginal heritage sites in proximity to the Proposed Action:

- * The Irwin River (Site ID 18907, Historical, Mythological, Camp, Natural Feature, Water Source);
- * The Lockier River (Site ID 24381, Mythological, Water Source); and
- * Stoney Hill (Site ID S00447, Food Resource/Yam).

Furthermore, no 'other' heritage places overlap the Proposed Action Area (e.g., heritage places that have been lodged with the Department of Aboriginal Affairs (DAA) and are waiting assessment by the Aboriginal Cultural Heritage Material Committee under Section 5 of the AH Act).

3.10 Describe the tenure of the action area (e.g. freehold, leasehold) relevant to the project area

The land tenure of the Proposed Action is Unallocated Crown Land (UCL), which is managed by the Department of Biodiversity, Conservation and Attractions (DBCA) and freehold land.

3.11 Describe any existing or any proposed uses relevant to the project area

The nearest townsites (with population greater than 500) include Dongara to the northwest (36 km), and Mingenew to the



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

north (15 km).

Existing land use across the Proposed Action Area includes agriculture (livestock and cropping) and onshore oil and gas exploration. Proposed uses relevant to the Proposed Action includes the Australian Gas Infrastructure Group's proposed gas processing infrastructure within the West Erregulla gas field and Strike Energy's proposed Field Development Program (EPBC 2021/8985) within EP 469.



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Section 4

Measures to avoid or reduce impacts

4.1 Describe the measures you will undertake to avoid or reduce impact from your proposed action

Proposed measures to be undertaken to avoid or reduce impact from the Proposed Action include:

- * Desktop assessment of existing environmentally sensitive features including conservation areas, heritage areas, mapped listed species and communities, surface water features etc. to potential impact by seismic lines. Where relevant, the lines have been deviated or truncated to avoid or minimize impacts on these features to the extent possible.
- * Consultation with private landholders and Traditional Owners to identify culturally or economically sensitive areas to avoid.
- * Ecological field survey and fauna assessments undertaken to establish baseline conditions by identifying communities and individuals of threatened flora species, suitable breeding and feeding habitat for protected fauna species and mapping their locations and extent.
- * The seismic lines have been aligned to use previously cleared areas where possible to undertake the Proposed Action with the minimum amount of clearing and disturbance of native vegetation. This has been achieved using review of existing aerial imagery and ground truthing during ecological field surveys.
- * The Project will require temporary disturbance (via mulching) of no more than 67.98 ha of native vegetation, which is foraging habitat for Carnaby's Black-Cockatoo, to create access tracks for the vibroseis trucks and light vehicles to a maximum width of 3.5 m. No breeding habitat or roosting trees occur within the Proposed Action Area.
- * Avoidance of impacts to *Davisia speciosa* by deviating planned seismic lines around known populations/records.
- * Clear GPS delineation of vegetation areas proposed for retention to ensure no accidental clearing occurs. Avoidance areas (e.g. surface water features and heritage site 30068) will be uploaded to vehicle GPS navigation systems with alarms set at predefined buffers.
- * Implementation of a Dieback and Weed Management Plan to ensure seismic activities do not introduce weeds or Dieback to the Project Area.
- * Line clearing methods will involve cutting and mulching to protect rootstock and topsoil and minimize ground surface disturbance. Disturbance will be restricted to vegetation with a diameter of less than 100 mm. Cut vegetation will be mulched in situ along the seismic lines. This will facilitate return of seed-stock and biomass and provide cover to minimize the risk of soil erosion. The vibroseis vehicle has a ground clearance of 46 cm, sufficient to leave the mulched vegetation intact along the seismic lines. No stockpiling of mulch will be needed.
- * This method of vegetation clearing ensures optimal conditions for successful rehabilitation within a minimized footprint.
- * The proposed cutting and mulching method ensures there is no topsoil disturbance, reducing the risks of erosion and impacts on water filtration into the thin topsoil layer containing the seed resource. In turn, this minimizes the potential to leave the area prone to weed invasion.
- * Return of the mulched material to its source location will ensure a maximum rate of humus production and includes facilitation of recolonisation by micro-fauna (particularly burrowing invertebrates) and an increase in nutrient cycling within the topsoil.
- * Rehabilitation of seismic lines commencing upon completion of the Proposed Action, through natural regeneration from mulched vegetation and seedstock.
- * Monitoring of rehabilitation of the clearing lines to ensure native vegetation of these lines returns to a composition and structure that is comparable to their pre-disturbance state.

4.2 For matters protected by the EPBC Act that may be affected by the proposed action, describe the proposed environmental outcomes to be achieved

The Proposed Action will result in temporary disturbance to 1.67 ha of 'Low to Moderate' and 62.22 ha of 'Low' value Carnaby's Black-Cockatoo foraging habitat (Strategen-JBS&G 2021b). No breeding trees or habitat suitable for breeding occurs within the Proposed Action Area.

The proposed environmental outcomes to be achieved is the maintenance of the area of occupancy of, and suitable foraging habitat for, the Carnaby's Black-Cockatoo. The Proposed Action Area is located at the northern limit of the breeding range and within the non-breeding range for the species and the clearing is expected to result in temporary loss of 'Low to Moderate' quality foraging habitat. Upon completion of the seismic survey, the vegetation within the cleared lines is anticipated to self-regenerate from the seedbank within the mulched material. Monitoring of rehabilitation of the clearing lines to ensure native vegetation of these lines returns to a composition and structure that is comparable to their pre-disturbance state.

The Proposed Action will result in temporary clearing of 67.98 ha of native vegetation via cutting and mulching, which provides habitat for the listed Threatened flora species *Davisia speciosa*. Two (2) individuals of the EPBC listed Threatened flora *Davisia speciosa* were recorded within the Proposed Action Area (Strategen-JBS&G 2021a). The seismic survey lines have been deviated to avoid direct Impacts to these individuals. The expected environmental outcome is the retention of the known locations of this species within the Proposed Action Area and impact to vegetation habitat supporting this species reduced to As Low As Reasonably Practicable (ALARP).



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

There is potential for *Paracaleana dixonii* to be present, although not recorded by Strategen-JBS&G (2021a) during the 2020 Spring survey, likely due to an absence of above ground features during the survey period. The limitation of the mulching methodology to the top 5 cm to 10 cm above ground, and the undertaking of the seismic survey during the dormant period (January to April) will minimize potential impact to this species. The proposed clearing of native vegetation within habitat suitable for this species will be temporary and as a result, the proposed environmental outcome of the Proposed Action is that availability of habitat suitable for occupancy of the species will be maintained.



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Section 5

Conclusion on the likelihood of significant impacts

5.1 You indicated the below ticked items to be of significant impact and therefore you consider the action to be a controlled action

- World Heritage properties
- National Heritage places
- Wetlands of international importance (declared Ramsar wetlands)
- Listed threatened species or any threatened ecological community
- Listed migratory species
- Marine environment outside Commonwealth marine areas
- Protection of the environment from actions involving Commonwealth land
- Great Barrier Reef Marine Park
- A water resource, in relation to coal seam gas development and large coal mining development
- Protection of the environment from nuclear actions
- Protection of the environment from Commonwealth actions
- Commonwealth Heritage places overseas
- Commonwealth marine areas

5.2 If no significant matters are identified, provide the key reasons why you think the proposed action is not likely to have a significant impact on a matter protected under the EPBC Act and therefore not a controlled action

In consideration of the MNES Significant Impact Guidelines (DoE 2013) the Proposed Action is not considered likely to result in a significant impact to the following MNES.

Beautiful *Daviesia* (*Daviesia speciosa*) is known from five populations north-east of Eneabba, WA. Its range extends over 40 km, with an estimated 850 plants in total (DEWHA 2008). The ecological survey recorded two (2) individuals within the Proposed Action Area located on the top a steep laterite ridge. Direct impacts to these individuals recorded will be avoided through deviation of the seismic lines by at least a 50 m radius and by the fact that the steep ridge is not accessible to the vibroseis trucks. Indirect impacts (e.g. such as increased weeds or spread of dieback) will be managed by implementation of the Dieback and Weed Management Plan within the Project Area during survey activities.

Sandplain Duck Orchid (*Paracaleana dixonii*) was identified in considerable numbers in 2011 adjacent to the Proposed Action Area. Some of the areas where these occurred was burned during the 2018/19 fire season. No *Paracaleana dixonii* were identified during the 2020 survey. There is potential for this species to be present and not recorded within these areas, likely due to an absence of above ground features during the survey period. The proposed clearing method of cutting and mulching, protects rootstock and topsoil and minimize ground surface disturbance. The Proposed Action will be undertaken during the dormant period (January to April) to prevent damage to vegetative structures and as such is not considered to impact on this species.

The temporary disturbance of 67.98 ha of native vegetation along 3.5 wide seismic lines, within the native vegetation of the Project Area (6,546 ha) is not considered likely to significantly reduce the quantity or availability of habitat available for the survival of either Threatened flora species. No significant impact to either species is expected as a result of the Proposed Action.

The Proposed Action is not expected to lead to a long-term decrease in the size of Carnaby's Black-Cockatoo (CBC) populations as occurrence of suitable habitat extends occurs within avoided native vegetation and also extends outside of the Proposed Action Area.

The Proposed Action consists of approximately 6,546 ha of potential foraging habitat (mapped) of 'Low' and 'Low to Moderate' quality with the vegetation widespread throughout the region. The removal of 67.98 ha (1%) of potential foraging habitat is unlikely to reduce the area of occupancy of CBC or fragment populations of the species as they are highly mobile. As suitable foraging habitat is widespread locally outside of the broader Project Area, they are not likely to be dependent on a particular patch of foraging habitat within the Proposed Action Area and are expected to forage outside in large patches of suitable foraging habitat within the local area.

Based on a 3.5 m wide clearing footprint, the temporary low impact clearing for tracks created by the Proposed Action is unlikely to fragment an existing population into several.

The Proposed Action is not expected to impact habitat critical to the survival of or disrupt the breeding cycle of a population of CBC as the Proposed Action Area comprises no suitable breeding habitat. Suitable breeding habitat occurs outside of the Proposed Action Area within the local and regional area which is considered more likely to be critical habitat to the species.



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

The Proposed Action is not expected to impact the availability or quality of habitat to the extent that CBCs are likely to decline, as the clearing of 67.98 ha of potential habitat represents a 1.0% reduction in potential foraging habitat within the Proposed Action Area.

The Proposed Action is unlikely to modify, destroy, remove, isolate, or decrease the availability or quality of habitat to the extent that this species is likely to decline. It is expected that native vegetation will rehabilitate along seismic lines and return to a composition and structure comparable to the pre-disturbance state.

The Proposed Action is unlikely to introduce harmful or invasive species that reduce the extent or quality of suitable foraging habitat to the CBC within the Proposed Action and surrounds. Freehold farmland and existing roads together with vehicles and machinery material from external areas are the primary existing sources of weed propagules. The Proposed Action will include measures to manage the potential spread of weeds or dieback into adjacent vegetation that could comprise habitat for the species.

There are no known diseases that may be introduced to the area that may cause the population to decline and it is unlikely that any disease already exists in the Proposed Action Area that may be spread by its implementation.

The Proposed Action is consistent with the State Recovery Plan for the CBC.



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Section 6

Environmental record of the person proposing to take the action

6.1 Does the person taking the action have a satisfactory record of responsible environmental management? Explain in further detail

Strike Energy ensures all projects are implemented in accordance with relevant environmental approvals, sought in consultation with local, state and Commonwealth government as required. All projects are managed in accordance with management commitments, detailed as part of its environmental approvals. Strike Energy maintains relationships with key stakeholders, ensuring consultation is undertaken throughout the environmental approvals processes and throughout project operation and closure.

6.2 Provide details of any past or present proceedings under a Commonwealth, State or Territory law for the protection of the environment or the conservation and sustainable use of natural resources against either (a) the person proposing to take the action or, (b) if a permit has been applied for in relation to the action – the person making the application

No proceedings have occurred against either the person taking the action or making referral application.

6.3 If it is a corporation undertaking the action will the action be taken in accordance with the corporation's environmental policy and framework?

Yes No

6.3.1 If the person taking the action is a corporation, provide details of the corporation's environmental policy and planning framework

Strike Energy, as documented within its Environmental Policy (Attachment 3), is committed to conducting all its activities in a responsible manner and consistent with the principles of Sustainable Development.

Strike Energy will engage the services of an experienced third-party seismic contractor to undertake the Proposed Action who will be managing the completion of all acquisition activities on behalf of Strike Energy.

Strike Energy has a HSE Management System and against which major contractor management systems are evaluated. Contractors, suppliers, and partners shall comply with all HSE Policies and Standards. Strike Energy's HSE contractor management system requirements include:

- * The selection process for contractors, suppliers and partners shall incorporate a risk based HSE evaluation that includes a review of past HSE performance, prior to contractual arrangements being established.
- * Contracts and agreements shall include specific health, safety, and environment obligations to ensure Strike standards are met. Consequences of non-compliance shall be stipulated in the contract conditions.
- * A system shall be in place to ensure that HSE performance of contractors, suppliers and partners, and their compliance with Strike HSE requirements, are monitored and reported.
- * All Strike Energy personnel shall be responsible for assuring the HSE performance of contractors they are working with.

6.4 Has the person taking the action previously referred an action under the EPBC Act, or been responsible for undertaking an action referred under the EPBC Act?

Yes No

6.4.1 EPBC Act No and/or Name of Proposal

EPBC 2017/7970 Ocean Hill 3D Seismic Survey, Eneabba, WA

This proposal has been determined to be a controlled action, and will require assessment and approval under the EPBC Act before it can proceed. (Note: Ocean Hill Pty Ltd is a subsidiary of Strike Energy Ltd).

EPBC 2021/8991 West Erregulla Field Development Program, 40km southeast of Dongara, WA

This proposal has been referred to DAWE for determination of whether or not it is a controlled action, and is pending a decision on this matter.



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Section 7

Information sources

Reference source

Beard JS 1981, Swan, 1:1 000 000 vegetation series: explanatory notes to sheet 7: the vegetation of the Swan area, University of Western Australia Press, Nedlands, Western Australia.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

Brown, A, Thomson-Dans, C and Marchant, N (eds) (1998) Western Australia's Threatened Flora, Department of Conservation and Land Management, Western Australia.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

Coffey (2013) West Erregulla Exploration Program 3D Seismic Survey Level 1 Fauna Assessment Unpublished Report for Warrego Energy. September 2013.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

CSIRO, 1991. Digital Atlas of Australian Soils.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

DEWHA, 2008: <http://www.environment.gov.au/biodiversity/threatened/species/pubs/56698-conservation-advice.pdf>

Reliability

Reliable.

Uncertainties

Nil.

Reference source

DOW, 2010. Department of Water, Arrowsmith Groundwater Allocation Plan, August 2010. Retrieved from: http://www.water.wa.gov.au/data/assets/pdf_file/0008/1610/95132.pdf.

Reliability



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Reliable.

Uncertainties

Nil.

Reference source

DOW, 2017. Department of Water, Northern Perth Basin: Geology, hydrogeology and groundwater resources, Hydrogeological bulletin series, report no. HB1, Department of Water, Government of Western Australia, Perth. 2017.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

DSEWPaC. (2012). EPBC Act referral guidelines for three threatened black cockatoo species: Carnaby's cockatoo (endangered) *Calyptorhynchus latirostris*, Baudin's cockatoo (vulnerable) *Calyptorhynchus baudinii*, Forest red-tailed black cockatoo (vulnerable) *Calyptorhynchus banksii naso*. Department of Sustainability, Environment, Water, Population and Communities, Canberra, Australian Capital Territory.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

Ecologia. (2012). DRAFT RPS Origin Dongara Targeted Flora Assessment. West Perth: Unpublished report produced for RPS Group Australia by Ecologia Environment (Ecologia).

Reliability

Reliable.

Uncertainties

Nil.

Reference source

Glevan Consulting 2012. Phytophthora Dieback Occurrence Assessment for Warrego Energy, unpublished report for Woodman Environmental Consulting Pty Ltd. December 2012.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

Government of Western Australia (GoWA), 2019a, 2018 Statewide Vegetation Statistics incorporating the CAR Reserve Analysis (Full Report), Current as of October 2018, Department of Parks and Wildlife, Perth.

Reliability

Reliable

Uncertainties



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Nil.

Reference source

Mitchell et al (2002). Mitchell D, Williams K, Desmond A. Swan Coastal Plain 2, A Biodiversity Audit of Western Australia's 53 Biogeographical Subregions in 2002. Department of Conservation and Land Management.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

Patrick, S and Brown, A (2001) Declared Rare & Poorly Known Flora in the Moora District, Western Australia Wildlife Management.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

Strategen-JBS&G (2021a), Flora and vegetation survey of Natta 3D Seismic Survey Area, unpublished report prepared for Strike West Limited, Strategen-JBS&G, April 2021.

Reliability

Reliable.

Uncertainties

Nil.

Reference source

Strategen-JBS&G (2021b), Fauna desktop and Black Cockatoo Habitat Assessment of Natta 3D Seismic Survey Area, unpublished report prepared for Strike West Limited, Strategen-JBS&G, April 2021.

Reliability

Reliable

Uncertainties

Nil.

Reference source

Terra Rosa (2014), Report of an Archaeological Work Area Clearance Heritage Survey of West Erregulla Project Area Near Dongara. Report prepared for Warrego Energy by Terra Rosa Cultural Resource management Pty Ltd, Perth, Western Australia.

Reliability

Reliable.

Uncertainties

Nil.



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Section 8

Proposed alternatives

Do you have any feasible alternatives to taking the proposed action?

Yes



No



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Section 9	
Person proposing the action	
9.1.1 Is the person proposing the action an organisation or business? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	
Organisation	
Organisation name (as registered for ABN/ACN)	STRIKE WEST PTY. LTD.
Business name	
ABN	91625161846
ACN	
Business address	66 Kings Park Rd, Level 2, West Perth, 6005, WA, Australia
Postal address	
Main Phone number	+61 (08) 7099 7400
Fax	
Primary email address	peter.bouteloup@strikeenergy.com.au
Secondary email address	
9.1.2 I qualify for exemption from fees under Regulation 5.23(1)(ii) of the EPBC Regulations because I am: <input type="checkbox"/> Small business <input checked="" type="checkbox"/> Not applicable	
9.1.2.2 I would like to apply for a waiver of full or partial fees under Regulation 5.21A of the EPBC Regulations <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	
9.1.3 Contact (for an organisation - the contact details of the person authorised to sign on behalf of the organisation)	
First name	Peter
Last name	Bouteloup
Job title	Approvals Coordinator
Phone	+61 (08) 7099 7400
Mobile	Not applicable
Fax	
Email	peter.bouteloup@strikeenergy.com.au
Primary address	66 Kings Park Rd, Level 2, West Perth, 6005, WA, Australia
Address	
Declaration: Person proposing the action (To be signed by the person at 9.1.3)	
I, Peter Bouteloup , declare that to the best of my knowledge the information I have given on, or attached to the EPBC Act Referral is complete, current and correct. I understand that giving false or misleading information is a serious offence. I declare that I am not taking the action on behalf or for the benefit of any other person or entity.	
Signature: <i>P Bouteloup</i> Date: 14/07/2021	
I, Peter Bouteloup , the person proposing the action, consent to the designation of Strike West Pty Ltd as the proponent for the purposes of the action described in this EPBC Act Referral.	
Signature: <i>P Bouteloup</i> Date: 14/07/2021	



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Proposed designated proponent

9.2.1 Is the proposed designated proponent an organisation or business?
 Yes No

Organisation

Organisation name (as registered for ABN/ACN) STRIKE WEST PTY. LTD.

Business name

ABN 91625161846

ACN

Business address 66 Kings Park Rd, Level 2, West Perth, 6005, WA, Australia

Postal address

Main Phone number +61 (08) 7099 7400

Fax

Primary email address peter.bouteloup@strikeenergy.com.au

Secondary email address

9.2.2 Contact (for an organisation - the contact details of the person authorised to sign on behalf of the organisation)

First name Peter

Last name Bouteloup

Job title Approvals Coordinator

Phone +61 (08) 7099 7400

Mobile

Fax

Email peter.bouteloup@strikeenergy.com.au

Primary address 66 Kings Park Rd, Level 2, West Perth, 6005, WA, Australia

Address

Declaration: Proposed Designated Proponent

I, **Peter Bouteloup**, the proposed designated proponent, consent to the designation of myself as the proponent for the purposes of the action described in this EPBC Act Referral.

Signature: *P Bouteloup* Date: **14/07/2021**



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Referring party (person preparing the information)	
9.3.1 Is the referring party an organisation or a business?	
<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	
Organisation	
Organisation name (as registered for ABN/ACN)	JBS&G AUSTRALIA PTY LTD
Business name	Strategen JBS&G
ABN	62100220479
ACN	
Business address	50 Subiaco Square Rd, Level 1, Subiaco, 6008, WA, Australia
Postal address	
Main Phone number	+61 (08) 9380 310
Fax	
Primary email address	adminwa@jbsg.com.au
Secondary email address	
9.3.2 Contact (for an organisation - the contact details of the person authorised to sign on behalf of the organisation)	
First name	Annette
Last name	Latto
Job title	Senior Associate
Phone	+61 (08) 9380 3100
Mobile	
Fax	
Email	alatto@jbsg.com.au
Primary address	50 Subiaco Square Rd, Level 1, Subiaco, 6008, WA, Australia
Address	
Declaration: Referring party (person preparing the information)	
I, Annette Latto , declare that to the best of my knowledge the information I have given on, or attached to this EPBC Act Referral is complete, current and correct. I understand that giving false or misleading information is a serious offence.	
	
Signature:	Date: 12/07/2021



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

Appendix A	
Attachment	
Document Type	File Name
action_area_images	Fig1_RegLocn.pdf
action_area_images	Fig2_ProjectArea.pdf
action_area_images	Fig3_BeardVeg.pdf
action_area_images	Fig4_VegTypes.pdf
action_area_images	Fig5_VegCond.pdf
action_area_images	Fig6_ConSigFlora.pdf
action_area_images	Fig7_FaunaHabitat.pdf
action_area_images	Fig8_RegBCHabitat.pdf
action_area_images	Strike Seismic Survey Lines.shp
action_area_images	Strike Disturbance Footprint.shp
flora_fauna_investigation	Att_1_Flora and Vegetation Survey.pdf
flora_fauna_investigation	Att_2_Fauna Survey.pdf
corp_env_policy_docs	Att_3_Strike Env Policy.pdf

Appendix B
Coordinates
Area 1
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-29.398337674086,115.30933302377
-29.410858414096,115.30242799194
-29.412409914824,115.30157221943
-29.414325232981,115.30051573026
-29.421166983582,115.30040184275
-29.430423958385,115.30024768862
-29.436084678484,115.30015338639
-29.441149749306,115.30006898417
-29.451480678205,115.29989676672
-29.455624329661,115.29982766637
-29.457318845222,115.2997573329
-29.457286066919,115.2971935441
-29.456530970411,115.25956616199
-29.456326596732,115.24400774631
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-29.447875700121,115.24416373135
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-29.443463622457,115.24423969387
-29.441876566104,115.24426701399



Note: PDF may contain fields not relevant to your application. These fields will appear blank or unticked. Please disregard these fields.

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-29.407091132196,115.24494793459
-29.406910655585,115.24495103562
-29.406730268278,115.24495413508
-29.406549881869,115.2449572345
-29.406369405242,115.24496033544
-29.40618901792,115.24496343482
-29.406008541284,115.2449665357
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